



**CITY OF NORTH PORT
FLOODPLAIN MANAGEMENT PLAN (FMP)
Updated
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PREFACE

Background

The City of North Port City was incorporated in 1959 with only 23 residents and has grown over the last 60 years to become a vibrant community with a population of 77,561 as of April 2020. North Port has an incorporated area of approximately 104 square miles and is located in southeast Sarasota County.

The City is a participant in the Federal Emergency Management Agency's (FEMA) National Flood Insurance Program (NFIP) administered Community Rating System (CRS) program since 1992. CRS is a voluntary incentive program that recognizes and encourages community floodplain management activities that exceed the minimum requirements. As a result, flood insurance premium rates are discounted to reflect the reduced flood risk resulting from meeting FEMA's three goals of the Community Rating System:

- Reduce flood damage to insurable property
- Strengthen and support the insurance aspects of the National Flood Insurance Program
- Encourage a comprehensive approach to floodplain management

There are many community benefits to joining the CRS in addition to reduced flood insurance rates. CRS floodplain management activities provide enhanced public safety, a reduction in damage to property and public infrastructure, avoidance of economic disruption and losses, reduction of human suffering and the protection of the environment.

CRS Classification structure is based on credit points earned and is comprised of a Class rating scale of 10 to 1, with Class 10 being the worst and Class 1 being the best for flood insurance discount. A Class 10 will have 0% flood insurance reduction in the high risk flood zone AE, whereas a Class 1 rating will result a maximum of 45% flood insurance reduction in high risk flood zone AE.

The City of North Port has undergone several CRS audits to improve its CRS rating. The City's continual efforts in flood protection activities has resulted in improved CRS rating each audit. The most recent 2019 audit resulted in an improvement of the City's Class 6 rating to a Class 5 rating. The Class 5 rating became effective on May 1, 2020. The change from a Class 6 to the better Class 5 rating resulted in a change from 20% (Class 6) to 25% (Class 5) flood insurance discount for high risk flood zone AE areas. The flood insurance discount will be 10% in low risk flood zone X areas.

CRS Class	% Insurance Discount for Flood Zone AE	% Insurance Discount for Flood Zone X	Total Savings to North Port Residents as of September 10, 2020
6	20%	10%	\$34,870
5	25 %	10%	\$42,635

Purpose of Floodplain Management Plan

A requirement in the CRS program is the preparation and annual update of the Floodplain Management Plan (FMP) to address the following:

- Identify existing and future flood-related hazards and their causes;
- Ensure a comprehensive review of all possible activities and mitigation measures are conducted so that the most appropriate solutions will be implemented to address the hazard;
- Ensure the recommended activities meet the goals and objectives of the City, are in coordination with land use and comprehensive planning, do not create conflicts with other activities and are coordinated so the costs of implementing individual activities are reduced;
- Ensure the criteria used in community land use and development programs account for the hazards faced by existing and new development;

- Educate residents and property owners about the hazards, loss reduction measures and the natural and beneficial functions of floodplains;
- Build public and political support for activities and projects that prevent new problems, reduce losses and protect the natural and beneficial functions of floodplains;
- Build a constituency that wants to see the plan’s recommendations implemented.

The FMP summarizes flood control projects, stormwater management activities, flood map revision, floodplain management ordinance revisions and public outreach conducted. The Plan also proposes future continuation of flood preventative activities. The FMP shall be used in conjunction with the latest edition of the City’s Comprehensive Emergency Management Plan (CEMP) Base Plan and Hazard Specific Annexes included as Attachment A. The FMP is incorporated as an annex to Sarasota County’s multi-jurisdictional Unified Local Mitigation Strategy (LMS) Plan. This FMP is organized into the ten (10) planning steps as given in the 2017 CRS Manual.

1. FLOODPLAIN MANAGEMENT COMMITTEE ORGANIZATION

The City of North Port’s CRS Committee is formed by City Resolution 2016-R-02 (Exhibit 1-1) to review the FMP to meet the above mentioned purposes of the FMP. The FMP Committee will meet sufficient number of times to involve the members in the FMP plan steps 4 through 8. The FMP Committee is comprised of the City of North Port Staff listed below. Public sector representatives on this committee will be discussed in the next section. All meetings are publicly noticed and posted on the City website and social media to encourage public participation. During the year 2020 Covid-19 pandemic, these meetings were held virtually. Input from the CRS committee was received at the beginning of the planning process in a publicly advertised meeting and again in another publicly advertised meeting when the updated draft FMP was prepared.

A meeting was held on September 17, 2020 at the beginning of the FMP update process and another meeting was held on December 3, 2020 to discuss the updated draft FMP. A list of invitees, their roles and attendees to the CRS Committee meetings and meeting minutes are all included in Exhibit 1-2. Exhibit 1-3 lists the expertise of the City Staff in implementing the following six categories of mitigation measures: 1. Preventative Activity, 2. Property Protection, 3. Natural Resource Protection, 4. Emergency Services, 5. Structure Projects, and 6. Public Information.

The Stormwater Manager coordinates the CRS meetings, serves as the chairperson of the CRS Committee and prepares and updates the FMP. The Senior Planner from the Neighborhood Development Services (NDS) Planning Division will be the alternate.

City Staff in CRS Committee

1. Neighborhood Development Services (NDS) Planning Division – Senior Planner
NDS is the department responsible for the City’s Land use and Comprehensive planning. The NDS Planner coordinates with the Stormwater Manager on the update of the City’s Floodplain Management Ordinance.
2. NDS Building Division - Building and Code Enforcement staff
The Building staff oversees all building construction within the City to meet the Florida Building code and Floodplain Management Ordinance requirements to minimize impacts of flooding to structures. NDS formed a Floodplain Task force in early 2020. The primary mission of the Floodplain Task Force to support the City of North Port’s CRS program through information, education and outreach activities. Exhibit 1-4 gives the Floodplain Task Force Work Plan. The Floodplain Task force is headed by the Building Official who is the City’s designated Floodplain Administrator. Participants in the Floodplain Task force include NDS zoning staff, NDS planning Analysis and the Stormwater Manager. With the departure of the Building Official in August 2020, a Certified Floodplain Manager (CFM) from CAPGOV was retained to serve as the Building Official.

3. **Public Works Stormwater Manager**
The Stormwater Manager is the City's CRS coordinator and prepares the FMP and CRS program elements with input from City staff and the public. The Stormwater Manager assists with Public Works Operations/Maintenance projects that prevent or reduce flooding, coordinates flood map updates, provides Special Flood Hazard Area (SFHA) information to the public, performs development review to minimize adverse impacts to the floodplain, revises the City's stormwater regulations, provides input to the revision of the Floodplain Management Ordinance and performs public outreach activities to educate the public on flood protection, SFHA information and natural floodplain functions. The Stormwater Manager also oversees the environmental protection of wetlands and is a member of the LMS work group.
4. **Public Works Engineering Division – Engineering Manager (Project Engineer as alternate)**
The Public Works Engineering Manager and Project Engineer oversees engineering design and construction projects, coordinates all stormwater design and floodplain impact issues with the Stormwater Manager, and provides input to the revision of the Floodplain Management Plan.
5. **Public Works Administration Division – Community Outreach Coordinator**
The Community Outreach Coordinator assists in public outreach for the CRS program and updates the City's website and social media on flood information.
6. **City Manager Office – Grant Writer and Community Outreach Coordinator**
The Grants Writer coordinates the City's grant applications and is also a Certified Floodplain Manager (CFM) and has experience with the CRS program. The Community Outreach Coordinator coordinates all public outreach programs for the entire City and sends preparedness messages and alerts on approaching storm events.
7. **Finance Department – Management Analyst**
The Management Analysis coordinates the City's capital improvement program.
8. **Fire Rescue – Emergency Manager**
The Emergency Manager updates the City's Comprehensive Emergency Response Plan, coordinates the City's flood warning system, performs public outreach on flood protection information and is member of the LMS work group.
9. **Department of Parks and Recreation – Parks and Recreation Manager**
The Parks and Recreation Manager coordinates a diverse year-round recreational opportunity through the preservation of open space, park settings, recreational facilities, and programs that meet the physical, mental, cultural and social needs of our residents, while enhancing the overall quality of life. Parks and Recreation is a division within the Department of General Services.
10. **Utilities Department – Utilities Engineer**
The Utilities staff oversees the water and wastewater service to the City and monitors water quality.

City Participation in Sarasota County LMS and CRS work Group Meetings

The City of North Port has three representatives, the Stormwater Manager, the Emergency Manager and the Grant Writer, who participate in the Sarasota County LMS work group. This work group includes representatives from the Cities of Sarasota and Venice, Town of Longboat Key, Sarasota County, Sarasota County Schools and Sarasota Memorial Hospital. Each jurisdiction's FMP is included as an annex to the multi-jurisdictional LMS Plan. The LMS Work Group, which has met on a quarterly basis since December of 2007, participates in the five-year update to the LMS plan and annually revises the LMS projects list. The meeting is publicly noticed, and agendas, minutes and advertisement may be found in Appendix of Sarasota County Unified Local Mitigation Strategy. The City Stormwater Manager also attends and provide input in the Sarasota County CRS committee meetings.

2. PUBLIC INVOLVEMENT

The FMP Committee includes the below public sector members. All meetings are publicly noticed and posted on the City website and social media to encourage public participation. Representatives of various public sectors were invited to the CRS committee meetings as shown on Exhibit 1-2. Input from the CRS committee

was received at the beginning of the planning process in a publicly advertised meeting and again in another publicly advertised meeting when the updated draft FMP was prepared.

Public Sector Members

1. Chamber of Commerce Representative
2. North Port Librarian
3. HOA Representatives
4. Building Industry Association (BIA) Representative
5. Developers
6. Engineering Consultants
7. Flood Insurance Representatives
8. Realtor Representatives
9. Commercial facility Representatives
10. Lending Institute Representatives
11. Civic Association Representative
12. North Port Contractors Representative
13. Sarasota County CRS Coordinator

3. COORDINATION WITH OTHER AGENCIES

Unified Local Mitigation Strategy Work Group

The City of North Port Stormwater Manager, Emergency Manager and Grants Writer participate in the Sarasota County Local Mitigation Strategy (LMS) work group. Local hazard mitigation strategy planning is the process of organizing community resources, identifying and assessing hazard risks and determining how to best minimize or manage those risks. This process culminates in a hazard mitigation plan that identifies specific mitigation actions designed to achieve both short-term planning objectives and a long-term community vision. The City staff provides input into the multi-jurisdictional LMS plan including the five-year update. Annually City staff revises the LMS projects list (Exhibit 3-1).

Flood Map Update Coordination with FEMA, SWFWMD and Sarasota County

The City of North Port coordinated extensively with representatives from FEMA, Southwest Florida Water Management District (SWFWMD) and Sarasota County in updating the City's Flood Insurance Rate Maps (FIRMs) and Flood Insurance Study (FIS) which became effective on November 4, 2016. The City is currently coordinating with FEMA and providing comments in the release of the preliminary coastal risk FIRMs dated December 31, 2019. This map update effort is discussed more in later sections of the FMP. The interactions include preparation and comments on the flood maps, public outreach efforts, hosting of open houses and comments/appeals on the draft FIRMs.

Coordination with Sarasota County on CRS Program and Development Review

City of North Port staff closely coordinates the following activities with the County:

- Participate with Sarasota County CRS coordinator in general public outreach activities such as flood mitigation workshops and dissemination of flood information at the North Port Library staffed by Sarasota County.
- Participate in the Unified Program for Public Information (PPI) along with the City of Venice, City of Sarasota and Town of Longboat Key. The PPI allows participating communities to coordinate public outreach messages vital to floodplain management.
- As part of the PPI Committee, the City also participate in the development of the Flood Insurance Promotion Plan expected to be finalized early 2021.
- The Stormwater Manager coordinates with the Sarasota County Engineer in the review of development projects within the West Villages Improvement District (WVID) area that was annexed into North Port. WVID is within the Sarasota County's Lower Myakka River Watershed, and the coordinative effect is to

avoid adverse flooding effects to the County from any new projects proposed within that watershed. The Stormwater Manager reviews the development engineering consultant's update of the County's hydraulic model to evaluate the impact of the proposed development within the development and effects of the discharge into the surrounding County.

- The City's Emergency Manager participates closely with the Sarasota County's Emergency Operations Center staff in the event of oncoming Tropical Storms and Hurricanes.

Coordination with Charlotte Harbor National Estuary Program

The City of North Port Stormwater Manager is a member of the Charlotte Harbor National Estuary Program (CHNEP) Management Committee. A City Commissioner represents North Port on the CHNEP Policy Committee. The CHNEP addresses water quality and environmental benefits related to restoration of Charlotte Harbor and protection of the estuaries. The City also hosts a booth at the CHNEP Annual Environmental Festival and disseminates information to the public on water quality protection, flood information and low impact development (LID) methods.

Coordination with Myakka River Management Coordinating Council

The City of North Port Stormwater Manager is a member of the Myakka River Management Coordinating Council (MRMCC) which was established in 1985, by the Myakka River Wild and Scenic Designation and Preservation Act (Section 258.501, Florida Statutes) (Designation Act) to provide interagency and intergovernmental coordination in the management of the river. The Florida Department of Environmental Protection (Department) coordinates the MRMCC. The MRMCC holds three meetings per year to review and make recommendations on all proposals for amendments to the Designation Act, Myakka Wild and Scenic River Management Plan, Chapter 62D-15, Florida Administrative Code, Myakka River Wild and Scenic River Rule. They also review other matters that affect the water quality, quantity issues and wildlife in the protected areas along the Myakka River. The City of North Port Stormwater Manager provides input on new development projects with discharges to the Myakka River Protection Zone.

Coordination with SWFMWD in the Environmental Resource Permit Program

The City of North Port schedules Environmental Resource Permit (ERP) pre-application meetings with the SWFMWD to solicit input on the design of new/replacement flood control projects, new city developments, dredging vegetation control projects within the City's stormwater conveyance system. The City also obtains all required ERPs and performs the SWFMWD required stormwater system recertifications.

Coordination with FDEP in the National Pollutant Discharge Elimination System Program

The City of North Port is one of 6 co-permittees (North Port, Sarasota and Venice, Town of Longboat Key, Sarasota County, and Florida Department of Transportation) in the National Pollutant Discharge Elimination System (NPDES) permit. An annual NPDES permit is submitted that documents all NPDES permit requirements relating to stormwater system inventory inspection and maintenance, water quality monitoring and pollutant load modeling, flood control projects, development review and water quality treatment and attenuation requirements, construction inspection for proper best management practices, proactive and reactive inspections and public outreach. The City has been audited several times by FDEP and found to be compliant.

Permitting with U.S. Army Corp of Engineers

The City of North Port has contacted and obtained all needed permits for new construction projects from the U.S. Army Corp of Engineers (USACOE). An example is the permit obtained to replace water control structure No. 101 on the Myakkahatchee Creek. The concern over the impact this replacement structure on the small tooth sawfish was resolved in the permitting effort.

Permitting with the US Fish and Wildlife Service and Florida Fish and Wildlife Conservation Commission

The City of North Port has contacted and obtained all needed permits for the impact of new construction projects on protected species from both Fish and Wildlife Service (FWS) and Florida Fish and Wildlife

Conservation Commission (FWC) . An example is the permit obtained to replace water control structure No. 101 on the Myakkahatchee Creek. There were existing gopher tortoise burrows within the access easement to the structure. A gopher tortoise survey was done and a FWC relocation permit was obtained and the gopher tortoises relocated prior to start of construction.

4. HAZARD ASSESSMENT

Storm Types and Flood Hazard

Tropical storms and hurricanes are large cyclonic storms with counterclockwise winds of 39 mph or greater. They are often accompanied by heavy rains and storm surge that can cause flooding. In addition, fallen trees and debris can obstruct water flow, contributing to structure damage. Hurricanes are categorized according to the below Saffir-Simpson Hurricane Wind Scale which is based on estimates of potential property damage. Hurricanes rated Category 3 and higher are considered major hurricanes because of their potential for significant damage and loss of life. While less devastating, Category 1 and 2 hurricanes are still dangerous, and they too, require preventative measures.

Category	Sustained Winds	Potential Damage
Tropical Storm	39 – 73 mph	Some
1	74 – 95 mph	Some
2	96 – 110 mph	Extensive
3	111 – 130 mph	Devastating
4	131 – 155 mph	Catastrophic
5	156 mph or higher	Catastrophic

NOAA Damage Potential for Each Category:

- **Category 1:** Very dangerous winds will produce some damage: Well-constructed frame homes could have damage to roof, shingles, vinyl siding, and gutters. Large branches of trees will snap and shallowly rooted trees may be toppled. Extensive damage to power lines and poles likely will result in power outages that could last several days.
- **Category 2:** Extremely dangerous winds will cause extensive damage: Well-constructed frame homes could sustain major roof and siding damage. Many shallowly rooted trees will be snapped or uprooted and block numerous roads. Near-total power loss is expected with outages that could last from several days to weeks.
- **Category 3:** Devastating damage will occur: Well-built framed homes may incur major damage or removal of roof decking and gable ends. Many trees will be snapped or uprooted, blocking numerous roads. Electricity and water will be unavailable for several days to weeks after the storm passes.
- **Category 4:** Catastrophic damage will occur: Well-built framed homes can sustain severe damage with loss of most of the roof structure and/or some exterior walls. Most trees will be snapped or uprooted and power poles downed. Fallen trees and power poles will isolate residential areas. Power outages will last weeks to possibly months. Most of the area will be uninhabitable for weeks or months.
- **Category 5:** Catastrophic damage will occur: A high percentage of framed homes will be destroyed, with total roof failure and wall collapse. Fallen trees and power poles will isolate residential areas.

Power outages will last for weeks to possibly months. Most of the area will be uninhabitable for weeks or months.

A detailed description of the flood hazard assessment is given in the Sarasota County Unified LMS plan and the FEMA FIS Study number 12115CV001A. The LMS plan can be accessed on the Sarasota County Website at <https://www.scgov.net/government/emergency-services/local-mitigation-strategy>. The FEMA FIS study can be accessed on the FEMA website here: <https://hazards.fema.gov/femaportal/prelimdownload/>. The City's CEMP Base Plan and Hazard Specific Annex D (Attachment A) gives a detailed flood history and the City's emergency management response to flood events.

Map of Special Flood Hazard Areas

Original 1981 and 1984 FIRMS

The original FEMA FIRMS with Special Flood Hazard Areas (SFHA) are dated September 2, 1981 and available for only a portion of North Port east of the Myakka River. The FEMA FIRMS for the City's West Villages Improvement District (WVID) annexed area that is west of the Myakka River are dated May 1, 1984. These FIRM maps are available at the City of North Port Public Works Department, the NDS department and at the North Port Library. Pdfs of the maps are available on the City website at <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/1981-1984-fema-flood-maps>. These 1981 and 1984 FIRMS are no longer effective.

Current Effective November 4, 2016 FIRMS

The 1992 and 2003 storm event are close to a 100-year storm event and the extent of flooding is much more expansive than the SFHA shown in the 1981 FEMA FIRMS. Consequently, a cooperatively funded project with SWFWMD named the Big Slough Watershed Study was initiated in 2003 and completed in 2014 (see Attachment C) to update the FIRMS and evaluate options to reduce flooding. This study is detailed in later sections of this FMP. Data is available from the study which shows the depth of flooding, velocities and peak times corresponding to peak flows. A Big Slough hydraulic model was used to evaluate the flood risk and update the SFHA. This model was calibrated with flood water elevation data determined from a video recording by North Port Fire Rescue during the June 2003 flood. Also, during public outreach efforts prior to the May 22, 2012 model approval, much input was obtained from the residents including documentation of localized highwater marks. The elevations corresponding to the high-water marks were surveyed and used to verify the hydraulic model.

The SWFWMD Governing Board approved the Big Slough hydraulic model used for preparing the FIRMS on May 22, 2012. The updated FIRMS became effective on November 4, 2016. As the FEMA FIRMS are just pdfs of the SFHA overlaid on old 2007 aerial, the City has made available on the City website a user-friendly searchable web application to view the effective FIRMS overlaid on the most current 2020 aerial with visible property lines and information links. This web application is available at the City's "FEMA Flood Map Updates Webpage" at <http://www.cityofnorthport.com/flood> provides instructions on how to assess this effective November 4, 2016 FIRMS. An overview map of the SFHA with affected parcels is given in Exhibit 4-1. An overview map of the SFHA with affected building structures is given in Exhibit 4-2.

Preliminary December 31, 2019 Coastal Flood Risk FIRMS

North Port has tidally influenced areas south of US 41 and east of the Myakka River. The West Villages annexed area west of the Myakka River is also tidally influenced. In the November 4, 2016 FIRMS, The SFHA in these tidally affected areas were prepared, by just remapping the 1981 and 1984 FIRM coastal Base Flood Elevations (BFEs) of 7ft NAVD88 on 2007 LiDAR topography. This effort resulted in major portions of North Port developments removed from the SFHA that was in 1981 and 1984 SFHA. The coastal BFE of 7ft NAVD88 was not reevaluated. Consequently, in February 2014, FEMA started an effort

to identify, assess, and update coastal flood hazard risk to incorporate storm surge, high tides, wave action in addition to freshwater flooding input. On December 31, 2019, FEMA released preliminary coastal risk maps for Sarasota County which included the City of North Port. The status of this current map update effort, impact of the SFHA changes, City’s comments and timeline for adoption is discussed in later Section 8. The web application available at the City’s “FEMA Flood Map Updates Webpage” at <http://www.cityofnorthport.com/flood> provides instructions on how to assess this interactive preliminary December 31, 2019 FIRMs.

Historic Flooding

The City of North Port is located on the southwest side of Florida in the southernmost part of Sarasota County, which is bordered on the south by Charlotte County, on the east by Desoto County and to the north by Sarasota County. The City is comprised of 104 square miles and is the third largest land area city in the state.

North Port started as a planned community in 1959 with 70,608 platted residential lots. An extensive stormwater infrastructure network was constructed by General Development Corporation (GDC) consisting of 132 miles of manmade retention ditches (R-Ditches), 1,613 miles of roadside swales and 79.1 miles of major wet waterways with 64 water control structures (WCS) and stormwater conveyance piping to support its residential, commercial and light industrial developments. The WCSs is used to control water flow in the interconnected system R-ditches, waterways and Myakkahatchee Creek (also known as the Big Slough Canal). Twenty-eight (28) of the WCSs are equipped with gates which are opened or closed to allow flood relief or release of water in a stepwise design to the downstream southerly section of Myakkahatchee Creek and the westerly end of the Cocoplum Waterway. The City’s water plant is located at the confluence of the Myakkahatchee Creek with the west end of the Cocoplum Waterway and withdraws potable water source from both water bodies.

The portion of the City that is east of the Myakka River is located within the southernmost downstream end of the 196 square miles of the Big Slough/Myakkahatchee Creek watershed boundary (Exhibit 4-3) and consequently is inundated with surface water runoff from this extremely large watershed, even during the mean annual storm event. A map of the City stormwater conveyance systems is given in Exhibit 4-4.

The City has experienced severe flooding from unnamed storms, tropical depressions, tropical storms and hurricanes as follows.

Date	Inches of Rain	Storm Magnitude	Storm
March 23-31, 1987	5.4 to 9.1	10 to 25-year storm	Unnamed storm
September 5-9, 1988	8.2 to 8.9	25-year storm	Unnamed storm
June 23 - July 2, 1992	16.2 to 20.7	500-year storm	Tropical Depression One
September 14-23, 2000	4.7	5-year storm	Unnamed storm
July 20-26, 2001	4.6 to 6.9	10-year storm	Unnamed storm
September 6-14, 2001	10.0 to 11.0	100-year storm	Tropical Storm Gabrielle
June 17-22, 2003	13.6 to 14.3	100-year storm	Unnamed storm
August 12-19, 2004	3.0 to 4.5	5-year storm	Hurricane Charlie
September 10-15, 2017	9.8	25 to 100-year storm	Hurricane Irma
November 8-12, 2020	3.5	Mean annual storm	Hurricane Eta

Map of Known Flood Hazards

During the 1992, 2003 and 2004 storms, extensive street flooding was experienced in the North Port Estates area and in areas within about 1.5 miles reach near the I-75 corridor crossing of the Myakkahatchee Creek and within the Jockey Club area. A map of these historically flood prone areas is provided in Exhibit 4-5. The flooding is due to a mix of factors including:

- Watershed location and lack of topographic relief.

- Periodic excesses of rainfall associated with cyclic and seasonal storm events.
- The Community's infrastructure, constructed in the 1960s, is designed for a 10-year storm event of 5-day duration, which is before the definition of the 100-year floodplain and the State's stormwater management regulations.
- Construction of the I-75 corridor in 1977 which redirected natural drainage patterns.
- Population growth and corresponding residential and commercial land development.
- Long-term increases in peak stormwater discharge rates and runoff volumes in upstream areas of the watershed in Sarasota, Manatee and Desoto Counties.
- Silt and vegetative debris accumulated in the stormwater conveyance system.

Recent Storms and Flooding

Hurricane Irma

The September 2017 Hurricane Irma with 9.8 inches of rain brought widespread street flooding typically experienced in the North Port Estates area and in area near the I-75 corridor crossing of the Myakkahatchee Creek. Exhibit 4-6 gives a map of the flooded locations during site reconnaissance on two separate days. The depth of flooding is also shown on the map.

The Jockey Club area streets that are typically inundated during such as storm event, were not flooded during Hurricane Irma. This is due to the City's prior efforts on R-ditch rehabilitation, major conveyance pipe replacements and the installation of swale liners in the Jockey Club area.

However, extensive flooding occurred in the "Dorothy Avenue" area located west of the Myakkahatchee Creek and just north of US 41. This is caused by freshwater run-off coupled with storm surge into tidally affected canals at high tide conditions. This caused water to back up onto the streets. Street flood retreated quickly when high tide conditions receded, and rainfall ended.

Additionally, during Hurricane Irma, the streets in the Orlando Boulevard area in the south east end of North Port was flooded due to a downstream replacement of a weir water control structure constructed by Charlotte County. This weir was constructed with an opening that was too restrictive. After the 2017 Hurricane Irma, Charlotte County widened the weir opening and no major flooding in the Orlando area has been reported during the later November 2020 Hurricane Eta, but this was a much lesser storm event.

Hurricane Eta

The November 2020 Hurricane Eta was a lesser storm event with 3.5 inches of rainfall. Historically, such a rain event would have caused some street flooding along the creek and in the North Port Estates area. However, no street flooding occurred, and this can be attributed to the City's on-going efforts in road swale regrading, pipe cleaning/replacements and removing debris and blockages in the Myakkahatchee Creek and City R-ditches.

Assessment of Less Frequent Flood Hazards –

Water Control Structures Failure

The City has an inventory and map of the 64 water control structures (WCSs) which function as dams or levees to retain water in the Cities interconnected system canals with the Myakkahatchee Creek. Twenty-eight (28) of the structures are equipped with gates that can be opened to allow flood relief or release of water in a stepwise design to the downstream southerly section of Myakkahatchee Creek and the westerly end of the Cocoplum Waterway. The City's water plant is located at the confluence of the Myakkahatchee Creek with the west end of the Cocoplum Waterway and can withdraw potable water source from either water bodies. As part of the Big Slough Watershed Study completed in 2014 (Attachment C), a best management practice analysis was conducted to determine the extent of flooding if the WCSs failed, i.e., removed in the hydraulic model. The analysis showed reduction in flooding in some areas north of Price Boulevard and east of Toledo Blade Boulevard but increased flooding in the west boundary of the City,

areas along the Creek and widespread flooding of populated areas just north of Cocoplum Waterway and west of Toledo Blade Boulevard. In this area, building structures are constructed at lower elevations (Exhibit 4-7) and are flood prone. In some of these areas, building structures are built low due to the availability of central sewer and the finished floor elevation was not raised as in homes built higher to accommodate a septic system drain field.

Localized Flooding due to Pipe Failures and Conveyance System Blockages

A considerable portion of the City's stormwater infrastructure was constructed in the late 1960's to 1970's and needs replacement. Much of the work done in the past has been reactive, many times due to collapsed pipes or frequent complaints. In fiscal year 2018, Public Works began taking a comprehensive, vigorous proactive approach to scheduling and budgeting for the maintenance, rehabilitation and replacement of the stormwater system. Details of the below drainage program improvement elements are given in the Department of Public Works Stormwater Management Plan for Fiscal Years 2020-2030 (Attachment B).

- Neighborhood Rehabilitation by Grid
- Road Crossing Pipe Replacement
- Outfall Replacement
- Retention Ditch Rehabilitation
- Targeted Projects

Impact of Future Development on Flood Hazards

In the City's Site Development Review process (SDR), per the City's Unified Land Development Code Chapter 18 Stormwater Regulations, the Stormwater Manager reviews all developments, other than single family platted lots, for floodplain impacts and required floodplain compensation and to ensure the finished floor elevation is higher than the regulatory base flood elevation. Thus, these new developments are not anticipated to worsen the floodplain.

The NDS Building division reviews proposed structures for all single-family platted lots. If a building is proposed within the SFHA footprint of the existing effective FIRM, then an elevation certificate will be required to show the building lowest floor elevation is constructed above the based flood elevation. However, floodplain compensation is not required for fill brought into the SFHA within these single-family platted lots so cumulatively, the floodplain can increase in these areas.

Hazards Other than Flood

The City's CEMP Base Plan and Hazard Specific Annexes (Attachment A) the Sarasota County LMS plans both describes the severity, history and probability of future events for other natural hazards such as earthquakes, wildfires or tornados. The LMS plan is available on the Sarasota County Website at <https://www.scgov.net/government/emergency-services/local-mitigation-strategy>.

5. PROBLEM ASSESSMENT

Vulnerability to Various Hazards

A tabulation of "Hazard Analysis" summarizing the City's vulnerability to each hazard excerpted from the City's CEMP Base Plan (Attachment A) is given in Exhibit 5-1. The anticipated frequency of occurrence, the City's vulnerability, exposure and potential for loss are addressed for the following categories of hazards, Hazardous Materials Spills, Commercial Nuclear Power Plant Incidents, Civic Disturbance, Mass Immigration, Coastal Oil Spill, Extreme Temperatures, Brush, Wildfires and Forest Fires, Thunderstorms and Tornadoes, Drought, Sinkholes and Subsidence, Terrorism, Exotic Pests and Diseases, Diseases and Pandemic Outbreaks, Critical Infrastructure Disruption, Special Events and Dam Failure, Major Transportation Incidents.

Life Safety Warnings and Evacuations

The City has a responsibility to warn the public on impending floods and the need for evacuation when necessary. The City's CEMP Base Plan Section V addresses life safety issues and response activities including evacuations (Attachment A). The CEMP Hazard Annex D details the flood warning and response activities.

The City of North Port has an [Alert Sarasota County](#) Emergency Notification System to quickly notify residents and business of an emergency or urgent situation. Residents can sign up to receive [Alert Sarasota County](#) alerts on their phone or email.

The Department of Public Works shares the cost of available USGS gages on the Myakkahatchee Creek at intersections with Tropicaire Boulevard, Price Boulevard and at Water Control Structure No. 101 at the downstream end of the Creek next to the City's Water Treatment Plant. The City's "Flood Warning" webpage at <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/flood-warning> has a link to the USGS gage on the Myakkahatchee Creek at Tropicaire Boulevard. The webpage also provides a correlation of the anticipated flooding on streets correlated with USGS gage water level readings.

Public Health Hazards from Flood Waters

Flood waters may not only cause physical structure damage to buildings but can also cause associated health risks in the following forms:

- Mold and mildew
- Contaminated drinking and washing water
- Mosquito borne diseases
- Poor sanitation from loss of water and sewer services, overflowing/plugged septic systems
- Loss of electricity, air conditioning, natural gas, phone and internet services
- Animal invasion of property, in particularly, fire ants seeking higher ground, water snakes and alligators
- Mental stress and fatigue

Due to these associated hazards, residents should have a plan on how to deal with the aftermath of a flood and seek assistance from professional sources or the public safety officials.

Protection of Critical Facilities and Infrastructure

The City of North Port's Emergency Management maintains a Critical Facilities Inventory (CFI) for the City. Given the sensitive nature of the facilities, they are protected under Florida Statutes Chapter 119 and the locations of which are not included in this Plan. The City's Comprehensive Emergency Management Plan (CEMP) Annex D Section V.B describes the City's Fire Rescue response to Critical Facilities (see Attachment A page D20 on pdf page 142). Protection of Critical Facilities is described in detail in in the CEMP Annex F Section IV.C (see Attachment A page F8 on pdf page 184). Protection efforts in the face of a threat of flooding, facilities may be protected by constructing dikes, sand-bagging, or using pumps to prevent water from entering the facility. Critical facilities that require back-up electrical power such as City Hall and Police Station, Public Work/Fleet Facilities, Utilities building, Fire Stations, Water and Wastewater Plants all have appropriate back up power generation equipment on site.

The proper operation of the wastewater lift stations is necessary to avoid sewage over flow. During power outages, portable generators are readily available to supply power to wastewater lift stations. Sewage bypass pumping at the lift stations is another method to keep the flow moving in the collection system. Portable generators are also available to operate the gates at the City's water control structures to lower the water levels in the waterways in anticipation of a large rain event and to close the gates after the passing of the storm in order to retain water in the waterways which is a source of potable water for the City.

Mitigation activities relating to the critical facilities can be found in the Sarasota County Unified Local Mitigation Strategy Plan. Maps of shelters and surge/evacuation zones and routes on the Sarasota County Emergency Management website are linked from the City of North Port’s website. Most of the critical facilities are built to withstand hurricane category 3 storm events.

The City’s Utilities Department has an inventory of the water and wastewater infrastructure and the Department of Public Works has an inventory of the road and drainage infrastructure. These infrastructure systems are carefully checked before and after a hazard event for proper functioning.

Hazard effects on Community Economy and Major Employers

The City's more than 77,561 population (Bureau of Economics & Business Research April 2020) boast a median age of 40 and is one of the youngest in the Southwest Florida region. Youth is found in more than just the nearly 10,000 school children who attend the 6 elementary, 3 middle and 2 high schools within North Port. The population provides a work force to Sarasota, Manatee, Charlotte, Lee and even as far as Collier and Pinellas Counties. The major private employers within North Port are mostly commercial establishments along the US 41, and the Toledo Blade Boulevard corridor, with light industrial employers situated within the industrial park area on the west side of Toledo Blade Boulevard and in the Pan American Boulevard/Trott Circle area.

The City has acquired Warm Mineral Springs which is a main tourist attraction. Other main employers are the Sarasota Memorial Hospital and King Plastics on Toledo Blade Boulevard, USF College at Pan American Boulevard just north of US 41 and State College of Florida in the WVID Thomas Ranch annexed area. Despite the young population, there is also a large population of retirees in several large residential developments in Island Walk and Gran Paradiso in the Wellen Park area where there are currently many homes under construction. Other developments include Heron Creek along Sumter Boulevard, Bobcat Trail and developments along Toledo Blade Boulevard. Flood and other hazard events will cause extensive property damage, negatively impact the work force in North Port by restricting access to job sites and by loss of economy from businesses and tourism.

Buildings affected by Flood Hazard

Exhibit 4-2 shows the parcels with structures affected by the SFHA in the November 4, 2016 effective FIRMs. Below is a comparison of how many properties or portions of the properties were moved into the higher-risk SFHA and how many were moved out.

Parcel Status	No. of Affected Parcels (as of 12/05/16)	No. of Affected Parcels with Insurable Structures* (as of 12/05/16)	No. of Parcels with Insurable Structures* touching the SFHA (Using 12/05/16 Sarasota County GIS Structures Layer)
<u>Parcels Added</u> Parcels not in the 1981 FIRM floodplain, but any portion(s) of the parcel are touching the November 4, 2016 FIRM SFHA	14325	5531	276
<u>Parcels Removed</u> Parcels that are in the 1981 FIRM SFHA and were removed from the November 4, 2016 FIRM SFHA	1828	921	
Parcels that are in the 1981 FIRM SFHA and are still in the November 4, 2016 FIRM SFHA	2630	720	211

* An insurable structure is a structure with at least two load-bearing walls and a roof. It must be affixed to land, and at least 51% of its value must be above ground. This definition includes almost all residential and commercial structures, as well as ancillary buildings such as garages and barns. Storage facilities such as silos and grain storage buildings are also covered. The rules do not cover structures such as gazebos, pavilions, pole barns, and storage tanks, as these buildings do not have at least two load-bearing walls and a roof. If they did not have roofs, then they would not qualify as insurable structures. Otherwise, flood insurance is required. The issue is not habitability.

Exhibit 5-2 shows a total of 2,901 flood insurance policies in North Port as of September 10, 2020 and include 211 properties in the SFHA. Exhibit 5-3 is excerpted from the City's CEMP (Attachment A) Base Plan describes the vulnerabilities to the population, and economic loss if a hurricane with sufficient storm surge or flooding in a FEMA Special Hazard Flood Area was to affect the City of North Port.

Historic Damage to Buildings, Repetitive Loss and Insurance Claims

The City of North, as of September 10, 2020, does not have Repetitive Loss properties. A Repetitive Loss property is any insurable building for which two or more claims of more than \$1,000 were paid by the National Flood Insurance Program (NFIP) within any rolling ten-year period, since 1978. Flood insurance data about private property, including repetitive loss properties, are protected under the Privacy Act. The locations of flood insurance claims within North Port were reviewed. A generalized map of these areas is provided in Exhibit 4-5. The claims are mostly single family residential homes (Exhibit 5-2) and mostly located in the following areas near the Myakkahatchee Creek:

1. North Port Estates area near the Myakkahatchee Creek
2. Areas near the Myakkahatchee Creek north and south of Interstate 75
3. Jockey Club area north of US 41 and west of the Myakkahatchee Creek
4. Area subject to tidal inundation south of US 41 near the Myakkahatchee Creek

The City has completed a detailed flood reduction study in fiscal year 2016 to evaluate methods to reduce flooding in the above first three areas. This is discussed in greater detail in Section 8. The data included in Exhibit 5-2 shows that of the 60 paid losses, only 28 are in the SFHA flood zone AE. The remaining paid losses are in the lower risk flood zone X. This shows the importance of flood insurance coverage as SFHA in flood maps do not always predict which homes will be flooded. The number and value of losses in pre-FIRM homes and post FIRM homes are also given in Exhibit 5-2.

Natural and Beneficial Functions within the Floodplain

Floodplain areas are recognized as having an intrinsic value of their own as a part of the interconnected ecosystem and an influential role in increasing a community's quality of life. The recognized benefits of a naturally functioning floodplain include the storage and conveyance of flood waters, the recharging of groundwater; the maintenance of surface water quality, and the provision of habitats for fish and wildlife. These areas also provide diverse recreational opportunities, scenic value, and a source of community identity and pride. The existing floodplain along the City's Myakkahatchee Creek, provides a habitat for all forms of fish and wildlife. The City has acquired and continues to acquire property in this floodplain to preserve the habitat and protect the watershed from pollutants entering the Myakkahatchee Creek, the City's primary drinking water supply.

Wetlands as defined in 373.019(27), Florida Statutes are "areas that are inundated or saturated by surface or groundwater at a frequency and a duration sufficient to support, and under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soils". There is an abundance of wetlands in the City in particularly in the North Port Estates area north of I-75, along the Myakkahatchee Creek slough system, northeast annexed quadrant north of Snover Waterway and east of Toledo Blade and the annexed WVID area. Wetlands are strictly protected, and during the City's Site Development Review (SDR) process, the proposed development must avoid destruction of the wetland and wetland 25 ft buffer to the maximum extent possible. Destruction of wetlands require proof of state (SWFWMD or FDEP) and federal (USACE) permit approvals. Wetland mitigation will be required through purchase of mitigation credits from a wetland mitigation bank or reconstruction of an equivalent wetland near the destroyed wetland site. Wetlands are

typically part of a floodplain and serve the aforementioned beneficial functions of a floodplain. Wetlands provide treatment for surface runoff pollutants such as turbidity through settlement. Nitrogen and phosphorus nutrients and organics can be assimilated by the vegetation in the wetlands.

Development, Redevelopment and Population Trends Impact on the Watershed and Natural Resources

The City of North is not built-out and has large amounts of undeveloped property particularly in the North Port Estates area and areas east of Toledo Blade, the northeast annexed quadrant area north of Snover Waterway and east of Toledo Blade, and the annexed WVID area. There is minimal redevelopment occurring in North Port as most new developments are on areas not previously developed. As mentioned in Section 4, all new major development and redevelopment (single family platted lots excluded) must be reviewed through the City's Site Development Review (SDR) process, for floodplain impacts and required floodplain compensation. Stormwater attenuation is required so the new development peak runoff flow rate does not exceed the pre-development peak runoff flow rate. The pre-development condition allows stormwater recharge of the groundwater over a large surface area. This will be greatly reduced with the new development due to increased impervious areas which will prevent ground water recharge. Single family platted lots building on property that has wetlands will need to provide mitigation for any destruction of wetland and its flood waters storage capacity.

The City has strict water quality treatment requirements in the Unified Land Development Code (ULDC). For example, in the design of dry retention stormwater ponds, the City's regulation requires 100% more treatment volume than SWFWMD. The ULDC requires the low impact development methods such as use of pervious pavements to be evaluated for all new developments, as the pervious nature will assist in the recharge of groundwater and reduce runoff volume. The City has an aggressive public outreach program that will be discussed in later sections to minimize the developmental impact of surface water quality and quantity on the watershed and natural resources. All these regulatory requirements and public outreach efforts should help minimize the effects of new developments on the watershed and the City's natural resources.

In the building boom years during 2006 to 2009, the population trend increased at a rapid rate in North Port. Increased population can generally affect the natural resources such as increase in pollutant generation, increase potable water supply needs and additional stormwater runoff from constructed impervious areas. The City of North Port has one of the lowest per-capita water use rates in the region. This can be attributed to an extensive conservation program which includes a tiered rate structure, reuse water program, irrigation enforcement, and a comprehensive public education and outreach program that promotes water conservation, protection of City and regional resources, and encourages public participation in flood control efforts. The City's water conservation efforts and other sustainable development activities earned North Port the Florida Green Building Coalition's "Gold" level local government certification in 2011 and a "Silver" level upon recertification in July 2017.

Future Flooding Impact on People, Property and Natural Floodplain Functions

Due to the City of North Port being located at the most downstream end of the Big Slough Watershed, a severe storm event over North Port and the upstream reaches of the Big Slough watershed with several inches of heavy rains over a prolonged period during the rainy summer months, when the ground is already saturated, can cause street flooding and possible property and infrastructure damage. Flooding will cause severe economic impact on the community.

The Public Works staff has gained experience on correlating rainfall predictions with rise of flood waters in the Myakkahatchee Creek. The existing USGS rain gages are constantly monitored even after normal work hours. Staff is on standby to open gates well in advance of pending storms to lower canal water levels to provide additional attenuation storage volume and reduce the chance of flooding. This has worked well during the rainy season in which minimal street flooding occurred. A localized event with heavy rains may only result in flooding in a limited area of the City and would have relatively little long-term economic impact.

Future catastrophic storms that last over several days can cause widespread flooding even with the above gate opening activities performed. Cost to repair property damages must be borne by the owner or the NFIP flood insurance if in place. Subsequently, widespread NFIP flood insurance rates may increase. Property values can decline severely following such a storm which not only affects the property owner but will reduce the City's property tax revenue.

The City reserve funds would need to be drawn upon to pay for damages to City infrastructure which can include storm pipe failures, severe bank erosion, road collapse, damage to City buildings and equipment, and damages to the City's Water and Wastewater Treatment Plant, pump stations and utilities infrastructure. The infrastructure downtime and inconveniences to the public will cost lost revenues to businesses and lost wages to workers.

Also, the extensive property damage can severely affect the City financially due to the recent conversion to being self-insured. Tourism can be expected to decline. The sales tax revenue generated from purchases of supplies and replacement goods may offset in part the loss of sales tax revenue from a drop in tourism and visitors to the City due to the storm.

6. FLOODPLAIN MANAGEMENT PROGRAM GOALS

1. Reduce Flooding of Roadways and Existing Properties

- Complete structural projects that can minimize flooding of roadways and properties
- Evaluate the feasibility of localized and regional projects to reduce flooding
- Adopt updated flood maps that reflect the SFHA more accurately

2. Acquire Properties and Avoid Building in the SFHA

- Increase publicly owned natural areas within flood prone areas and jointly creates recreational opportunities if possible.
- Protect buildings from flooding by raising lowest flood elevation above the base flood elevation, incorporate flood proofing techniques
- Continue to enforce regulatory measures that ensure that new development will not increase flood threats to existing properties
- Relocate flood-prone buildings where warranted

3. Protect Public Lives and Health from Dangers of Natural Hazards

- Educate the public on flood protection methods availability of flood insurance, and flood protection methods
- Provide warning system for rising flood waters and other natural disasters
- Have a flood response plan ready prior to flood threat and implement plan during floods events
- Minimize standing water to prevent mosquitoes breeding.
- Adopt updated flood map that reflect the SFHA more accurately so buildings can be built above an accurate base flood elevation

4. Minimize Cost to The City and Property Owners

- Prioritize mitigation projects, starting with those sites facing the greatest threat to life, health, and property.
- Maximize the use of outside sources of funding such grants from SWFMWD, FEMA, FDEP, EPA
- Educate the owner in mitigation efforts to protect their own properties.
- Encourage property owner to acquire flood insurance.

5. Protect our Environmental Resources

- Implement LID practices to the maximum practicable.
- Educate the public on the beneficial functions of the wetlands and floodplains
- Improve water quality and habitat.
- Maintain an attractive parks and other open spaces such as wetlands

7. REVIEW OF POSSIBLE ACTIVITIES

Preventative activities through Zoning, and Development Regulations

Preventive activities keep flood problems from getting worse. The current comprehensive planning, stormwater and floodplain regulations are effective in preventing an increase of SFHA areas. They are administered by Department of Public Works and NDS Building and Planning Divisions.

- The NDS Planning Division coordinates input from the various departments to update the existing Comprehensive Plan. Future Land use and Zoning is a key element in the Comprehensive Plan and NDS planning staff updates the land use and zoning as needed with consideration for environmental protection.
- The Florida Building Code (FBC) was adopted by the City of North Port per City Ordinance 2015-10 on April 13, 2015 which amends the North Port, Florida – Administrative Code Chapter 14 which can be viewed at https://library.municode.com/fl/north_port/codes/code_of_the_city?nodeId=PTIICOOR_CH14BUCORE
- Per Section 14-20 (a) *“The Florida Building Code, as adopted by the Florida Building Commission, (excluding Chapter 1, Administration) including all appendices and/or amendments thereto, and all such revisions, recodification, appendices and/or amendments as may be hereafter promulgated by the Florida Building Commission, is hereby adopted as the North Port Building Code in and for the City of North Port and shall be construed to be an integral part hereto”.*
- The NDS Building Division reviews all building permits to be in compliance with the FBC. The NDS Building Division also offers information on building retrofitting for flood protection. Workshops on Building mitigation to withstand floods and hurricane are held for the public jointly with Sarasota County staff.
- Each City Department is represented in a Site Development Review (SDR) process to ensure all new developments meet the City’s Unified Land Development Code (ULDC) regulations and intent of the Comprehensive planning. The City’s ULDC is available on Municode website at https://library.municode.com/fl/north_port.
- The ULDC Chapter 18 – Stormwater Regulations was adopted by City Commission in 2010. These regulations give clear design criteria for water quality treatment and attenuation requirements, and floodplain compensation requirements for all new major developments. The City is currently working on the revision of the entire ULDC including Chapter 18. This effort is anticipated to be completed in 2021. Proposed revisions to stormwater regulations provide for permit fast track incentives to encourage Low Impact Development (LID) implementation in new developments. LIDs are stormwater management practices, non-structural techniques, and better site planning to mimic natural hydrologic runoff characteristics and minimize the impact of land development on water resources. In the proposed regulations, all proposed parking above the minimum City required amount is preferred to be constructed of pervious pavement. A lower coefficient of runoff or curve number can be allowed for the pervious pavement. The City have had much success with new developments incorporating LIDs. This is discussed further under Section 8.
- The ULDC Chapter 37 Section 37-14 and Chapter 53 Section 53-113 (B) give Open Space requirements for developments. Policy 1.5 of the Recreation and Open Space Element of the City's adopted Comprehensive Plan specifies minimum criteria for determining that adequate capacity exists for recreation/open space facilities impacted by a proposed development.
- Annually, the ULDC is evaluated on whether revisions are needed. The Comprehensive Plan is updated every 5 years.

Floodplain Management Regulatory Standards

- The NDS Planning Division, Public Works Stormwater Manager and Engineering Manager, City Attorney have revised the State model floodplain ordinance per comments from the State. This modified State Floodplain Ordinance has been adopted by the City in May 2016 and is currently the ULDC Chapter 17 Flood Damage Prevention Regulations.
- The ULDC Chapter 18 – Stormwater Regulations include requirements for floodplain compensation to be provided if a new major development impacts the floodplain. These regulations are effective at preventing new development from adversely affecting the floodplain and neighboring properties.
- The City is adhering to the latest edition of the Florida Building Code (FBC) which has minimum freeboard requirement for the finished flood elevation (FFE) for all types of structures. Freeboard is a margin of safety added to the base flood elevation to account for waves, debris, miscalculations, lack of data, or changes in climate. The FBC follows the requirements of ASCE 24 Standard which provides minimum requirements for flood-resistant design and construction of structures located in flood hazard areas. For residential homes, the FFE must be at least 1 ft higher than the BFE.
- For all commercial, industrial, institutional, residential subdivisions developments any filling impact of the SFHA will required floodplain compensation However, floodplain compensation is not required for fill brought into the SFHA within single family platted lots, so cumulatively; the floodplain can increase in these areas. The City is evaluating large regional projects to reduce flooding, so this issue may be addressed through those projects.
- City is currently working with FEMA on updating the coastal flood risk FIRMs with correct information and will adopt the updated FIRMs within six months of FEMA approval. Due to the large increase in affected properties, there will be a significant economic impact. The availability of more accurate FIRMS will help homeowners in their decision on whether to purchase flood insurance and to avoid the SFHA and build more responsibly.

Property Protection Activities

- Increasing publicly owned natural areas within flood prone areas is an extremely effective way to limit building in the SFHA. The City has already purchased much of the properties along both sides of the Myakkahatchee Creek and is in the process of acquiring more land by direct purchase or by land swapping.
- In the City's aggressive public outreach efforts in the public open houses and other community events to discuss the impacts of the new draft FIRMs on affected parcels; flood insurance experts are available to discuss the protection offer by flood insurance. The City website and the City's flood information flyer also encourage the purchase of flood insurance.

Natural and Beneficial Function of Floodplain and Wetlands Protection

- Wetland protection is required in ULDC Chapter 49. All new developments are reviewed through the SDR process and building permitting review to limit impacts to wetlands and if impacts are unavoidable, wetland mitigation are required together with the required State and Federal permits. Protecting wetlands not only protect the wildlife habitat but also preserves flood water storage capacity and provides water quality treatment for nitrogen and phosphorus nutrients and organics through assimilation by the vegetation in the wetlands.
- In the City's public outreach program, efforts are made to educate the public on the beneficial functions of a floodplain for water quantity storage to lessen the effects of flooding. Developers and residents are advised to not build within the floodplain.

Emergency Services Activities

- There is a need to provide a flood warning and hazards notification to the general public. The Emergency Manager provides emergency services to including activating the [Alert Sarasota County](#) Emergency Notification System warning system when needed. The [Alert Sarasota County](#) telephone system quickly

notifies residents and business of an emergency or urgent situation. The Emergency Manager also performs public outreach disseminating information on flood protection and flood warning.

Structural projects

- Flood reduction can be achieved by keeping the City's stormwater conveyance system clear of debris and restrictive vegetation and ensuring the 64 water control structures are operable. The City has an ongoing program of structural projects such as water control structure rehabilitation/replacement, clearing R-ditches and canals, swale regrading and pipe replacement. These efforts have already shown a reduction in the frequency and extent of flooded streets in the recent summer rains.
- The Big Slough Watershed hydraulic model can be used to evaluate large regional improvement projects such as diversion of flood waters, retention storage reservoirs, bypassing flood water around the City and staging up of flood waters north of the City boundaries. These types of project will require large amounts of funding and the permitting effort will be challenging. The City has plans in the next year to evaluate the feasibility of these types of projects.

Public Information Activities

- Increasing public awareness of known flood hazard areas and availability of draft FIRMs will reduce building in the SFHA both in the existing 1981/1984 FIRMs and in the draft FIRMS. This knowledge can encourage early purchase of flood insurance.
- A large number of the public is not aware of the beneficial functions of wetlands and floodplain and related regulations against destruction. Sharing this information with the Public will result in greater protection of the wetland and floodplains.

8. ACTION PLAN AND REVIEW OF CURRENT ACTIVITIES

Preventative Activities

- Public Works shall continue the program of major water control structure improvements and minor water control structure repairs for increased reliability.
- Public Works has improved and will continue to schedule proactive (rather than reactive) increased maintenance efforts such as retention ditch/swale regrading and culvert cleaning, aquatic vegetation management and failing drainage pipe replacement. This will eliminate or reduce localized street flooding.
- With the completion of the Big Slough watershed study in September 2014, the City had coordinated with FEMA on the updating of the FIRMs and adopt the new flood maps which became effective in November 4, 2016. These maps are available on the City website.
- Public Works has performed a subsequent Flood Reduction study which was completed in 2019. This study evaluated feasible projects to relieve localized and regional flooding.

Regulatory Activities

- Public Works and Neighborhood Development Services continue to coordinate the development review process per the City's ULDC, to minimize the amount of fill brought into a flood prone area. The Stormwater Manager shall continue reviewing new development project to make sure the design does not cause adverse on-site or off-site flooding. The ULCD Chapter 18 Stormwater Regulations shall be updated as needed, in addition to Stormwater elements in the City's Comprehensive Plan.
- Through active participation in the Site Development Review process, The City will continue to encourage developers and consulting engineers to provide site designs that will minimize impervious areas, and to evaluate implementing LIDs design to the maximum extent practicable such as use of pervious pavement, green roofs, rain cisterns, reuse of stormwater for irrigation, direct runoff to bioretention/biotreatment vegetated swale areas prior to discharge stormwater pond, Florida friendly native landscaping, and other surface water quality improvement controls and devices.

Property Protection Activities

The City Manager's office in cooperation with the Department Parks and Recreation is continuing the acquisition of parcels along the Myakkahatchee Creek Corridor to prevent building in the floodplain, creation of open space park land and protection of wetlands. The land on each side of the creek will also serve to protect the water quality of the creek as this is a major potable water supply for the City.

The ULDC regulations and NDS Building Division permitting process prevent new homes proposed at a higher elevation from flooding adjacent existing homes built at a lower elevation. Elevation certificates are required for houses built in the SFHA. NDS staff and Stormwater Manager provide advice to home builders to avoid building in SFHA and requirement to set lower floor elevations above the effective FIRMs BFEs and preferably also above new draft FIRMs base flood elevations even before the FIRMs are effective.

Natural Resource Protection Activities

The City shall continue to acquire properties along the Myakkahatchee Creek which will protect these environmentally sensitive flood prone lands from development. The public outreach program shall include educating the public on the beneficial functions of floodplains and wetlands.

Emergency Services Activities

The Emergency Manager shall coordinate public warning on impending floods and evacuation when necessary. The City's Comprehensive Emergency Management Plan (CEMP) Base Plan Section V (Attachment A) addresses life safety issues and response activities including evacuations. The City's CEMP Hazard Annex D details the flood warning and response activities.

The City of North Port has a [Alert Sarasota County](https://www.cityofnorthport.com/government/city-services/fire-rescue/emergency-management) telephone system to quickly notify residents and business of an emergency or urgent situation. Residents can register their phone number in the [Alert Sarasota County](https://www.cityofnorthport.com/government/city-services/fire-rescue/emergency-management) system at the City website link <https://www.cityofnorthport.com/government/city-services/fire-rescue/emergency-management>.

Structural Projects

Over the last several years the City has implemented a proactive program of water control structure (WCS) rehabilitation/replacement. The City has received several sources of grant funding such as the Community Budget Issue Requests (CBIRS) grant and SWFWMD Cooperative Funding Initiative (CFI). Grant applications to secure supplemental funding for WCS replacements are also submitted to funding sources such as FEMA's Hazard Mitigation Grant Program, (HMGP) and the Community Development Block Grant. The City plans to continue the program of performing at least one major water control structure rehabilitation/replacement each year. Minor repairs to remaining water control structures shall be implemented each year to prolong the life of the structure.

The Big Slough Watershed study has provided an extremely useful hydraulic model that can be used to determine effective flood reduction improvement projects. The following sections discuss upcoming flood reduction feasibility study to relieve regional flood and historic flooding in localized areas.

The Public Works Department has a program of drainage pipe replacements to avoid pipe failure. The adequacy of pipe conveyance capacity is checked and adjusted as needed.

Public Outreach Activities

The City shall continue participating in disseminating flood protection information through the various community events, civic organizations, newspaper and TV media, flyer mail outs and City website. The City shall continue to public outreach activities to disseminate information the new draft FIRMs.

Specific Action Plan Items

Following are description of action items and accomplishments that meets the City's floodplain management goals. These action items are summarized in Table 8-1 and lists the Floodplain Management Activities 1 through 6 that are met by the action items.

Table 8-1 Action Items, Goals and Compliance with Floodplain Management Activities									
	Action Item	Priority	Goal 1. Reduce Flooding of Roadways and Existing Properties	Goal 2. Acquire Properties & Build Responsibly in the SFHA	Goal 3. Protect Public Lives and Health from Dangers of Natural Hazards	Goal 4. Minimize Cost to City and Property Owners	Goal 5. Protect our Environ. Resources	Flood- plain Mgt Activities met by Action *	Deadline
Administrative Action Items									
	Plan Adoption		X	X	X	X	X		Feb 2021
	Monitoring and Reporting		X	X	X	X	X		May 1 each year
	Community Rating System		X	X	X	X	X		CRS Verification. Visit
Program Action Items									
8.1	Major Water Control Structures Improvements	High	X		X			5	Ongoing
8.2	Minor Water Control Structure Repairs	Med	X		X			5	Ongoing
8.3	Retention (R) - Ditches and Major Canal Dredging	Med	X		X	X	X	1, 2, 3	Ongoing
8.4	Grid System for Stormwater Conveyance System, Rehabilitation	Med	X		X	X	X	1, 2, 3	Ongoing
8.5	Drainage Pipe Replacement	High	X		X	X	X	1, 2, 3	Ongoing
8.6	Blockage Removal in Stormwater Conveyance	High	X		X	X	X	1, 2, 3	
8.7	FEMA Flood Map Updates	Med		X	X			1, 2, 6	Ongoing
8.8	Big Slough Flood Reduction Study	Low	X	X	X	X		1, 2, 5	Completed 2019
8.9	Review and Implementation of Stormwater Regulations	Med	X		X		X	1, 3	Ongoing
8.10	Incorporation of Low Impact Development (LID) Design in Developments	High	X		X		X	1,3	Ongoing
8.11	Grant Funding of Projects	High				X		5	Ongoing
8.12	Property Acquisition in the SFHA & Open Space Areas	Med		X				1, 2, 3	Ongoing
Public Information Items									
8.13	Public Outreach Meetings and Open Houses	Med	X		X	X	X	1,2,3,4,6	Ongoing
8.14	Presentations at Seminars and Workshops	Med	X		X	X	X	1,2,3,4,6	Ongoing
8.15	Brochure Handouts at Community Events	Med	X		X	X	X	1,2,3,4,6	Ongoing
8.16	Newsletter/News Releases, Television and Social Media Public Outreach	High	X		X	X	X	1,2,3,4,6	Ongoing
8.17	City Website	High	X		X	X	X	1,2,3,4,6	Ongoing
8.18	FIRM Information Available to The Public	High	X		X	X	X	1,2,6	Ongoing
8.19	Flood Warning, Response and Evacuation	High	X		X	X	X	1,2,4,6	Ongoing
8.20	Participant in Sarasota County PPI Program	High	X		X	X	X	1,2,3,4,6	

8.1 Major Water Control Structures (WCS) Improvements

Responsible Department for Action: Public Works Department, Engineering Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District and Surtax

The City's waterway system is designed to accommodate several needs: a source for potable water supply, water quality treatment, and stormwater conveyance and attenuation. The waterways form a grid pattern and are interconnected with each other and with the Myakkahatchee Creek. There are 64 water control structures (WCS) of which 28 are gated.

Age, function and structural integrity conditions vary between WCSs and many are in dire need of rehabilitation or complete replacement. Delays in the rehabilitation/replacement schedule increase the possibility and risk for a potential massive failure of the deteriorated structures especially during a severe storm event. Water control structure failures could trigger other catastrophic mishaps such as downstream flooding and washout of roads and bridges.

All WCSs are inspected annually and prioritized for replacement. The priority is re-evaluated each year as rate of structure deterioration differs over time. A ranking system was developed based on condition of the key components of the structure and the location of the structure. In addition, the potential extent of flooding and population affected should a massive failure occurs, is also considered in the ranking system. The results of the 2020 inspection of WCS are given in Exhibit 8-1. The WCSs that received major rehabilitation or were replaced are listed on pdf page 7 of Exhibit 8-1. The proposed 5-year Capital Improvement Projects (CIP) budget for WCS replacement is in Exhibit 8-2. Depending on available funding, the annual plan each year is to design the replacement of one structure, while constructing the structure that was designed the previous year. Attachment B also give the 10-year Stormwater Management plan for rehabilitation and maintenance.

8.1.1 Construction of WCS No. 106 Replacement

WCS No. 106 is a gated weir structure on the Cocoplum Waterway just west of North Port Boulevard. The Cocoplum Waterway discharges to the Myakkahatchee Creek. The existing WCS is equipped with six gates, which in the closed position, allow storage of water like a reservoir. In anticipation of pending rainstorm events and as the water level rises, the gates are opened as needed to reduce the potential for flooding. The water in the Cocoplum Waterway and the Myakkahatchee Creek serves as a raw water supply for the City's Water Treatment Plant. Thus, the proper functioning of these gates and structure is critical to the City's ability to control water levels, minimize adverse impacts from a storm event, and supplement the City's potable water supply. WCS No. 106 was constructed in 1959. Over time, the concrete supports for the gates and catwalk have severely deteriorated and extensive corrosion has developed in the sheet metal weir, gates and catwalk.

A new replacement WCS No. 106 was proposed to be completed in fiscal year 2019-2020. The new WCS will include a coated sheet metal weir with reinforced concrete cap; catwalk; eight automated gates with the capability of manual or remote gate operation via telemetry control; cameras; a lighting system; and riprap for erosion control. Work will include dewatering, flow by-passing, and removal and disposal of all demolished material of the existing WCS. The upstream kayak portage will be relocated further east on the Cocoplum Waterway to accommodate the construction of the new WCS.

Summary of Accomplishments

Construction of the new replacement weir structure has been completed in August 2020 within budget and schedule.

Budget and Schedule for Completion

Activity	Costs	Time of Completion
Consultant for design, permitting and construction engineering services	\$168,000.00	Design Completed November 2018
Project Construction	\$2,304,436.58	August 11, 2020
Total	\$2,472,436.58	

8.1.2 Design of WCS No. 108 Replacement

WCS No. 108 is located on the Cocoplum canal just west of Collingswood Boulevard in the City of North Port. The structure is equipped with six gates which are operated in the closed position in order to allow storage of water similar to a reservoir. In anticipation of pending rainstorm events and as the water level rises, the gates are opened as needed to reduce flooding and discharge water into downstream segments of Cocoplum waterway which ultimately discharge into the Myakkahatchee Creek. The water in the Cocoplum canal serves as a raw water supply for the City's Water Treatment Plant. Thus, the proper functioning of these gates and structure is critical to the City's ability to control water levels, minimize adverse impacts from a storm event and supplement the City's potable water supply. This structure was constructed in the 1950's. Over time, extensive corrosion has developed in the sheet metal weir piling, concrete supports, gates and catwalk. Design of a new replacement WCS No. 108 was proposed to be completed in fiscal year 2020-2021.

Summary of Accomplishments

A Consultant was selected for design, permitting and construction engineering services for the WCS No. 108 replacement Structure. Four of the existing gates will be replaced with manually operated stainless steel pull-up type gates. The two center gates will be replaced with manually operated stainless steel push-down type gates. Design will include all hydraulic modeling needed to receive approved permits from the Southwest Florida Water Management District (SWFWMD) and the US Army Corps of Engineers (USACE).

Budget and Schedule for Completion

Activity	Costs	Time of Completion
Consultant for design, permitting and construction engineering services	\$142,006.12	FY 2020-2021
Project Construction	To be determined	FY 2021-2022

8.2 Minor Water Control Structure Repairs

Responsible Department for Action: Public Works Department, Operations and Maintenance Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

During the annual inspection of all water control structures, a list of needed minor repairs is compiled to extend the life of the structure until it is completely replaced. Repairs consist of welding new sections or replacement of corroded horizontal and vertical I-beams, tie rods, repair or replacements of gates, gate tracks, catwalk, gear boxes and patching of corroded sections of weir sheet piling. Bank erosion near the structures is also inspected and repaired as needed.

Summary of Accomplishments

To be more cost efficient, a full time City Welder was hired to join the Public Works team. The welder will prioritize and perform the minor repairs described starting on pdf page 9 of Exhibit 8-1. All current and historic repairs for each structure are included in this exhibit.

8.3 Retention (R) - Ditches and Major Canal Dredging

Responsible Department for Action: Public Works Department, Operations and Maintenance Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District and Surtax

The City has an aggressive program of clearing R-ditches and canals of vegetation and silt deposits. Several segments of R-ditches and canals require annual maintenance dredging due to their location, surrounding development and need to restore flow conveyance capacity.

Summary of Accomplishments

Exhibit 8-3 provides a monthly reporting of length of R-ditches and canals which have been rehabilitated. The silt and vegetation removal effort will continue each year.

8.4 Grid System for Stormwater Conveyance System, Rehabilitation

Responsible Department for Action: Public Works Department, Operations and Maintenance Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District and Surtax

Silt debris and vegetation accumulation in roadside swales affect drainage flow. Most of the drainage pipes installed by General Development Corporation (GDC) in the 1970's were corrugated metal pipes which have corroded and deteriorated over time. Over the past several years, Public Works staff has vastly increased the maintenance activities on the roadside drainage system to include swale regrading, pipe replacement and roadside mowing.

A work management system (WMS) has also been implemented to efficiently track drainage issues reported by residents. The public can contact Public Works customer service at (941)240-8050 to report any drainage issues. The information received is then entered in the WMS and the issue is addressed.

With many different components making up the stormwater drainage system, it is difficult to effectively maintain the system by continually operating in a reactionary mode. A proactive approach that better utilizes resources is to rehabilitate an entire neighborhood system of swales, road crossing pipes, outfalls and retention ditches. Neighborhoods are divided into grids as shown in Exhibit 8-4. The prioritization of grids for rehabilitation is based on the following criteria: known flooding, impact on other infrastructure (roads, waterways, etc.), present condition of system, residential density and impact to community facilities (schools, parks, etc.).

Summary of Accomplishments

Within the last 12 months, Grid 205 rehabilitation was completed, and Grid 407 rehabilitation was started and on schedule to be completed in December 2020. Grid 307 rehabilitation has started and is anticipated to be completed by March 2021. Rehabilitation of the east section of Grid 204 is proposed for FY2021. The budget for Grid 407 rehabilitation is \$985,240 and the budget for Grid 307 rehabilitation is \$469,500, which covers pipes, catch basins, asphalt, rip rap, concrete, sod, hydroseed and surveying.

8.5 Drainage Pipe Replacement

Responsible Department for Action: Public Works Department, Engineering, and Operations and Maintenance Divisions

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District and Surtax

The quality of the City's roads was one of the largest issues facing North Port. Originally paved in the 1960s, many of North Port's neighborhood streets had fallen into severe disrepair. On November 6, 2012, nearly 60 percent of the voters approved a referendum authorizing the City to obtain a \$46 million bond to upgrade 266 miles of substandard roads in the City. The City began this road rehabilitation program in 2014 and completed the project in 2019. As with all roadwork done in the City, road related drainage improvements are included in the rehabilitation of the roadway. Corrugated metal pipe (CMP) was typically used by General Development Corporation in the 1960s for drainage pipes. Over time, many of these CMPs have corroded and the City's road rehabilitation program includes replacing failing drainage pipe with reinforced concrete pipe (RCP). RCP culvert pipes crossings are also installed to replace the "Texas swales" to allow stormwater to cross under the road instead of just sheet flowing over the asphalt and causing deterioration.

Summary of Accomplishments

Exhibit 8-3 includes the monthly reporting of pipes replaced. This effort will continue each year.

8.6 Blockage Removal in Stormwater Conveyance

Responsible Department for Action: Public Works Department, Engineer, and Operations and Maintenance Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

8.6.1 Aquatic Vegetation Management

It is vital to control excessive growth of nuisance vegetation which impedes flow in the extensive system of R-ditches and canals in the City. A team of licensed and well-trained City staff perform aquatic vegetation control. Spraying herbicides for aquatic vegetation control is conducted only under calm weather conditions. Windy conditions are avoided to prevent over-spraying. Staff closely monitors the effects of spraying. Typically, the lower end of the manufacturer's recommended dose is used. The herbicide is reapplied only if needed. Record keeping of the date and time of spraying, licensed applicator, size of treatment area, type and amount of herbicide used, and application method is carefully documented.

Summary of Accomplishments

Operations has developed a systematic method of controlling the nuisance vegetation by applying herbicides to the young developing plants before maturity. This minimizes the number of mature plants reproducing at a rapid rate. A planned stretch of waterway is sprayed rather than scattered reactive treatment of vegetative blooms. This systematic method has reduced the number of herbicides used. Exhibit 8-3 includes the monthly reporting of the aquatic vegetation control performed. This maintenance effort will continue each year. Additionally, in 2019, an amphibious machine was acquired to remove vegetation and minimize the use of herbicide.

8.6.2 Myakkahatchee Creek Blockage Removal

Historic extensive flooding is experienced in the areas adjacent to the Myakkahatchee Creek (creek) near I-75. Debris in the creek can cause the following adverse effects:

- Debris blockages can restrict flow and contribute to upstream flooding.
- Debris can be washed down into the City's Water Control Structure No. 101 and can damage the gates and structure. Opening of the gates are critical to flood control and closing of the gates is vital for storage of potable water supply.

During the dry season in 2017 and 2018, Public Work staff conducted detailed inspections of the extent of debris blockages in the creek. In 2017, a 3,615 feet segment of the creek was inspected from Price Boulevard to the creek intersection with Snover Waterway. In 2018, a 5,500 ft segment of the creek was

inspected from the intersection with Snover Waterway to Sensation St. Exhibit 8-5 is a map of the creek segments. Severe blockages were found and include:

- Overgrown Brazilian Peppers trees that created an almost impenetrable barrier across the entire creek at multiple locations.
- Several huge fallen trees including root balls, lying in and across the entire creek channel.
- Branches and fallen trees trapping other debris including hot water heater, wooden planks, tires, truck bedliner, etc. These in turn trap and create sand bars which adds to the blockage.

The City had obtained a written approval of Permit Exemption #648689 from Southwest Florida Water Management District (SWFMWD) to remove blockages in the creek with the following conditions:

- All work within the creek shall be performed by manual labor utilizing chainsaws and other hand-held tools.
- Invasive Brazilian Pepper trees within or directly adjacent to the creek shall be cut no less than 12 inches above natural grade. Stumps shall remain in place to minimize erosion.
- All cutting and debris shall be removed from the creek with the assistance of machinery which must be located on uplands adjacent to the creek.
- The City of North Port shall implement effective erosion, sediment and turbidity control measures within the proposed work zones where applicable.

Summary of Accomplishments

Operations Staff cleared all creek blockages in the inspected sections during the 2017 and 2018 dry seasons, while adhering to the conditions of the SWFMWD approval. The success of creek blockage removal projects was evident in the subsequent rainy seasons by evaluating the data from the upstream United States Geological Society (USGS) water level gage that is located on the creek at the Tropicaire Boulevard bridge, upstream of the creek blockage removal projects. The positive results are as follows:

- Before the 2017 and 2018 creek blockage removal projects, one inch of rainfall resulted in a 0.75ft rise in creek level. After the 2017 and 2018 creek blockage removal projects, one inch of rainfall resulted in a 0.4ft rise in creek level. This is a 47% improvement.
- Before the 2017 and 2018 creek blockage removal projects, a USGS gage water level reading of 21.35ft resulted in street flooding in areas near the Myakkahatchee Creek north of Kumquat Ave to just south of Tropicaire Blvd. After the 2017 and 2018 creek blockage removal projects, there was no street flooding in the areas indicated above during the 2018 rainy season with USGS gage readings of over 21.35ft. Even during an unusually large rainstorm event in December 2018, when the USGS gage water level reading was 22.15ft, there was still no street flooding in the areas indicated above. Exhibit 8-5 includes a graph of the USGS gage readings for rain events after the 2018 creek clearing.

Based on the success of the 2017 and 2018 creek blockage removal projects, the City continued inspecting the creek for blockage in 2019 and 2020 and found several more blockages in the creek. These locations are shown in pdf page 2 of Exhibit 8-5. In preparation to clear these and future blockages, the following activities will include:

- A Cultural Resources Assessment Survey (CRAS) dated August 1, 2019, was conducted for the City of North Port, on a 4.92 mile corridor including Myakkahatchee Creek and extending 50 feet from the top of the creek banks on the east and west sides. The project corridor extends northward from Price Boulevard to the northern City boundary. The CRAS concluded that the City's ongoing maintenance efforts along the creek should have no adverse effects on sites eligible for the National Register of Historic Places and recommends no additional archaeological investigation within the project area.
- Access paths for maintenance vehicles and machinery access will be delineated from the nearest roadway so as to minimize the amount of land disturbance.
- A wetland and wildlife survey will be conducted along these access paths.

- Approvals will be obtained from Southwest Florida Water Management District (SWFWMD) for clearing these access path(s).

8.7 FEMA Flood Map Updates

Responsible Department for Action: Public Works Department, Engineering Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

8.7.1 Effective FEMA Flood Insurance Rate Maps Dated November 4, 2016

The FEMA flood insurance rate maps (FIRMs) with an effective date of November 4, 2016, have been in use since the City Commission approved Ordinance 2016-21 on September 13, 2016 to adopt the FIRMs. These maps can be viewed on the City Web page at <http://www.cityofnorthport.com/flood>.

8.7.2 Preliminary FEMA Coastal Flood Risk FIRMS Dated December 31, 2019

In February 2014, FEMA started a new Coastal Risk Mapping, Assessment and Planning (Risk Map) effort to identify, assess, and update coastal flood hazard Risk Maps that incorporate storm surge, high tides, wave action in addition to freshwater inputs.

On December 31, 2019, FEMA released preliminary Coastal Risk Maps for Sarasota County which included the City of North Port. The maps can be viewed through the City interactive map application at <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/fema-flood-map-updates>. These maps show major portions of North Port developments that were removed from the high-risk AE zone in the November 4, 2016 effective FIRMs, will again be in a high-risk flood zone AE if the maps become effective. In some areas, the base flood elevations increased from 7ft NAVD88 to as much as 9ft NAVD88. Exhibit 8-6 gives a tabulation of the number of parcels added (“1% increase”) to the SFHA and number of parcels taken out (“1% decrease”) of the SFHA for North Port and other municipalities within Sarasota County. In North Port, there are 3,601 affected parcels in which all or a portion of the parcel is impacted by the SFHA. Fifty (50) North Port parcels are removed from the SFHA. Following are general description of the North Port areas that are affected by the SFHA in these preliminary maps:

Areas West of Myakka River

- Portions of Gran Paradiso, The Preserve, Renaissance, Oasis, Lake Geraldine
- Village D, E and G in West Villages

Areas East of Myakka River

- Talon Bay
- Duck Key
- Residential and Commercial area South of US41
- Couple streets in Dorothy Ave. area

Summary of Accomplishments

Public outreach conducted by the City of North Port, Sarasota County and FEMA included three public open house events in early March 2020. Due to the 2020 Covid-19 pandemic, FEMA has delayed the 90-day period for Public comments and appeals. Meanwhile, the City has reviewed the preliminary Coastal Risk Maps and has sent FEMA a letter on September 15, 2020 with an extensive list of comments (Exhibit 8-7).

8.8 Big Slough Flood Reduction Study

Responsible Department for Action: Public Works Department, Engineering Division

Schedule for Completion of Action: Completed December 31, 2019

Funding Source: Road and Drainage District, Surtax and Southwest Florida Water Management District (SWFWMD) Cooperative Funding Initiative Grant

In October 2016, the City received a SWFWMD Cooperative Funding of up to \$125,000 of the \$300,000 budgeted for a flood reduction study. A Consultant was retained to evaluate alternatives to accomplish the following:

1. Reduce historic flooding in the following two localized areas in the City:
 - Area near the Myakkahatchee Creek just north and south of interstate I-75.
 - Area near Dorothy Avenue west of Biscayne Drive and north of US 41.
2. Complete a regional stormwater study to reduce the extensive floodplain that is delineated in the new FEMA FIRMs.

Existing site conditions were evaluated, and the Big Slough Watershed model used to model flood reduction projects also known as Best Management Practices (BMPs). A BMP implementation plan was developed with prioritized recommendations and probable costs for implementation of selected BMPs. The Consultant's recommended flood reduction plan had the following phased BMP components:

- Widen and deepen the existing retention ditch/conveyance system and upsizing road crossing culverts in the Dorothy Avenue area.
- Construction of a new bypass canal parallel to the Myakkahatchee Creek within a portion of the City's Tier I lots that are located north of Price Boulevard.
- Increasing the conveyance capacity through widening and upsizing pipe culverts in the R-36 retention ditch/conveyance system that runs along the northern and western boundaries of the City.
- Inflow Reduction Option - Restriction/reduction of high flow into Myakkahatchee Creek near the north City Boundary by constructing inflow reduction devices north of the City Boundary. This will cause additional storage of stormwater on the Carlton Tract which is jointly owned by the SWFWMD and Sarasota County

The draft Report, conceptual drawings and checklist were received in February 2019. A City Commission Workshop was held on March 4, 2019, to review the Study recommendations. City Commission consensus was received to submit the Consultant's recommended plan for SWFWMD Conceptual Environmental Resource Permit application with minor changes. Consensus was also received on the following staff recommendations:

- Continue Debris/Vegetation Blockage Removal Project.
- Evaluate localized drainage improvements in the Dorothy Avenue area upstream of the retention ditches.
- Do not proceed with researching grant fund to acquire flooded properties, but to schedule a future workshop with Commission on recommended flooded property acquisition.
- Continue reaching out to the SWFWMD and Sarasota County on viability of the Inflow Reduction Option.

Summary of Accomplishments

Final Flood Reduction Study Reports

The Consultant's recommended May 2019 flood reduction plan is provided in Attachment D. In an email on October 28, 2019, the SWFWMD Bureau Chief Environmental Resource Permit Bureau, Regulation Division indicated that SWFWMD *"does not support installation of improvements and/or resultant changes in hydrology on District property"*. In an email on November 14, 2019, the Interim Senior Manager of Sarasota County's Stormwater Environmental Utility, indicated the additional storage of stormwater on the Carlton Tract is *"inconsistent with the objective of the purchase and preservation"* of the land. As the inflow reduction option is no longer viable, the Consultant prepared an update to the plan in November 2019 to remove the inflow reduction option (Exhibit 8-8). The key elements of the final recommendation are:

- Improvements to the existing retention ditch/conveyance system and upsizing road crossing culverts in the Dorothy Avenue area.

- Construction of a new bypass canal parallel to the Myakkahatchee Creek within a portion of the City's Tier 1 lots from south of Tropicaire Boulevard to north of Price Boulevard.
- Increasing conveyance capacity through canal widening and upsizing pipe culverts in the R-36 retention ditch/conveyance system along the northern and western boundary of the city.

Flooded Property Acquisition

A workshop was held on December 2, 2019 to present the recommended parcels for acquisition which are at least 50% or more inundated by a 10-year storm and parcels along flooded streets and the cost of the acquisition. Exhibit 8-9 is a presentation to City Commission. The City Commission request an estimate of the revenue that will be lost if these properties are acquired by the City. The financial impact of removal of parcels from tax roll is provided in a subsequent memo on September 4, 2020 to the City Commission (Exhibit 8-10).

SWFWMD Conceptual Environmental Resource Permit

As a result of the decisions by SWFWMD and Sarasota County, the inflow reduction option was removed from the application to SWFWMD for a Conceptual Environmental Resource Permit. The SWFWMD Conceptual Environmental Resource Permit No. 49044123.000 was approved on December 27, 2019 and includes the following future conceptual drainage system improvements:

1. Future widening and dredging of existing Channel R36 (approximately 43,000 LF) with bottom widths ranging from 30 to 66 feet.
2. Future modification of existing Water Control Structure WCS-162 including the addition of operable gates. Water Control Structure WCS-162 is located within existing Channel R36 just north of Tropicaire Boulevard.
3. Addition of future dual 48" diameter culverts at the existing Channel R36 crossing of Interstate I-75.
4. Replacement/upsizing of the existing culverts with future quadruple 60" culverts at the existing Channel R36 crossing of Tropicaire Boulevard.
5. Future widening and dredging of existing Channel R70 (approximately 2,800 LF) with bottom widths ranging from 10 to 20 feet.
6. Future widening and dredging of existing Channel R69 (approximately 2,500 LF) with bottom widths ranging from 10 to 20 feet.
7. Replacement/upsizing of the existing culverts with future triple 6'x4' box culverts at the existing Channels R69 and R70 crossings of Trionfo Avenue, Porto Bello Avenue, Herbison Avenue, Eager Street, Allen Road, and South Biscayne Drive.
8. Future removal of the existing Channel R69 weir structure (located at the downstream end of existing Channel R69).
9. Future creation of four (4) proposed trapezoidal bypass channels (approximately 13,500 LF in total length with bottoms approximately 50 feet wide) located parallel to Myakkahatchee Creek. The upstream and downstream ends of each of the four (4) future Bypass Channels will connect to Myakkahatchee Creek via broad-crested weirs at elevations approximately 2 feet above the Myakkahatchee Creek bottom.

8.9 Review and Implementation of Stormwater Regulations

Responsible Department for Action: Public Works Department, Engineering Division, in cooperation with Planning Division of the Neighborhood Development Services (NDS) Department

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

All major site developments in North Port, whether on private or City property, must go through pre-application meeting in the City's Site Development Review (SDR) process. Key City staff members from all relevant departments provide site specific input, so that the development meets the City's Unified Land Development Code (ULDC) requirements in the formal submittal. During the mandatory SDR pre-

application process, the City Stormwater Manager reiterates the stormwater treatment, attenuation and floodplain mitigation requirements in the City's ULDC. A stormwater checklist is available on the City website to assist the developer's consultant with a complete submittal that meets all stormwater treatment, attenuation and floodplain analysis and compensation requirements. Specific attention is paid in the review to check that new developments do not adversely affect or cause flooding onto adjacent properties.

The Stormwater Manager also reviews and addresses all Environmental Wetland and Wildlife protection issues and all stormwater and environmental construction issues.

ULDC Chapter 17 Flood Damage Prevention Regulations

Responsible Department for Action: Public Works, Stormwater Manager, NDS Building Official

Schedule for Completion of Action: Complete

The City's ULDC Chapter 17 provides flood damage prevention regulations. The Florida Building Code (FBC), that was effective on March 2012, incorporates the flood provisions from the model International Code Series. Therefore, changes to floodplain management regulations were implemented to properly coordinate with the FBC and meet requirements of the National Flood Insurance Program (NFIP).

The City revised ULDC Chapter 17 flood damage prevention regulations using the State Model Floodplain Management Ordinance and obtained approval from the Florida Division of Emergency Management Contractor. The revised ULDC Chapter 17 flood damage prevention regulations were adopted by the City of North Port Commission on May 10, 2016.

Summary of Accomplishments

In the development review process, the City continues to implement the ULDC Chapter 17 Flood Damage Prevention Regulations.

ULDC Chapter 18 Stormwater Regulations and Chapter 49 Wetlands Protection Regulations

Responsible Department for Action: Public Works, Stormwater Manager

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

On June 14, 2010, the City of North Port adopted a complete revision of the ULDC which included consolidating all stormwater regulations into one new Chapter 18. Chapter 49 Wetlands Protection Regulations were also revised to meet State regulations. In 2011, all City departments reviewed the ULDC code that was adopted on June 14, 2010 and proposed needed revisions. On January 30, 2012, ULDC Chapter 18 – Stormwater Regulations, Section 18-10 (C)(2) was amended to require the proposed length and material of the pipe to be submitted with the permit application. ULDC Chapter 33 – Minor and Major Site Development Regulations, Sections 33-6 and 33-8 were amended to provide additional requirements for survey, site and drainage design, driveway culverts and swale piping requirements. As the City's stormwater swales/ditch/canals/creek system serves not only as a stormwater conveyance system, stormwater also is the main raw water supply for the City's Water Treatment Plant, thus the need for greater water quality treatment and protection. The ULDC Chapter 18 – Stormwater Regulations was revised in June 2010 to incorporate additional water quality improvement requirements. These requirements exceed, or are in addition, to those required by SWFMWD.

Summary of Accomplishments

In November 2019, a draft list of proposed stormwater and environmental regulations changes to the ULDC was submitted. The changes include clarifications of regulations, need to evaluate and use of Low Impact Development methods, improvement to design of stormwater treatment and attenuation and

conveyance system to improve water quality, reduce flooding, reduce erosion and added protections for the environmental and protected wildlife species.

8.10 Incorporation of Low Impact Development (LID) Design in Developments

Responsible Department for Action: Public Works Department, Engineering Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

In the Site Development Review (SDR) review process, developers are encouraged to implement Low Impact Development (LID) design to the maximum extent practicable such as minimization of impervious areas, use of pervious pavement, green roofs, rain cisterns, reuse of stormwater for irrigation, direct runoff to bioretention/biotreatment vegetated swale areas prior to discharge stormwater pond, Florida friendly native landscaping, and other surface water quality improvement controls and devices.

Summary of Accomplishments

Exhibit 8-11 provides a detailed list of LIDs implemented to date to reduce stormwater impact from new development for both City projects and Developer projects.

8.11 Grant Funding of Projects

Responsible Department for Action: Public Works Department, Engineering Division and City Manager's Office

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

The City has pursued several sources of grant funding such as the Community Budget Issue Requests (CBIRS) grant and has received a total grant allocation of \$1,600,000. Southwest Florida Water Management District (SWFWMD) and the City have cooperatively funded the construction of the new replacement Water Control structure (WCS) No. 101 located on the Myakkahatchee Creek near the Water Treatment Plant. The City has received reimbursements from SWFWMD for \$658,630.75 of the \$1,317,261.50 spent on the replacement structure.

The City Public Work Department shall continue to apply for grant funding from agencies such as SWFWMD, Federal Emergency Management Agency, Environmental Protection Agency, Florida Department of Environmental Protection Agency, and CBIRS to offset the cost of the flood reduction projects to the City and its residents.

Summary of Accomplishments

- SWFMWD awarded the City a cooperative grant funding up to \$125,000 of the \$300,000 budgeted for the afore mentioned Big Slough Flood Reduction Study. As of December 2019, the study is completed, and the City received the maximum grant reimbursements totaling \$125,000.
- A request for FEMA Hazard Mitigation Grant Program (HMGP) funding for the design and construction of the replacement of WCS 113 has been submitted for \$3,118,500 in March 2020. A similar application of funding for this project has also been submitted for a Community Development Block Grant in August 2020. Status and timeline of grant award from these two sources is unknown as of this writing.

8.12 Property Acquisition in the SFHA and Open Space Areas

Responsible Department for Action: City Manager's Office and Parks and Recreation Department

Schedule for Completion of Action: Ongoing

Funding Source: General Fund

Over the last sixteen years, the City has applied for and received grant funding and with supplemental City funding, has acquired a significant portion of the lands immediately adjacent to Myakkahatchee Creek from Price Boulevard north to the City limits. The Tier I lots are the strip of lots immediately adjacent to on both sides of the creek and the Tier II are the next nearest strip of lots. Most of these properties are in the 100-year floodplain.

Summary of Accomplishments

Exhibit 8-12 provides a map of the Tier I and Tier II properties acquired. The City is currently continuing this effort of land acquisition.

8.13 Public Outreach Meetings and Open Houses

Responsible Department for Action: Public Works Department, Engineering Division and Neighborhood Development Services Department

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

Extensive public outreach has been conducted in response to FEMA's December 31, 2019, release of the preliminary Coastal Flood Risk FIRMs for Sarasota County which included the City of North Port.

Summary of Accomplishments

FEMA, in coordination with the City of North Port and Sarasota County staff, conducted three public outreach open houses on the preliminary Coastal Flood Risk FIRMs. These meetings occurred on March 4-5, 2020, in Sarasota, Venice and North Port. FEMA will designate a 90-day public comment and appeal period after publishing a notice in two local newspapers and a notice in the Federal Register. The start of this 90-day period has not been established as of this writing.

In addition to the three FEMA public outreach open houses, the City of North Port had planned the following three additional City of North Port Public Open Houses:

- Morgan Family Center – March 26, 2020 5pm to 8pm
- Talon Bay HOA meeting – March 18, 2020 4pm to 6pm (only for Talon Bay Residents)
- Gran Paradiso HOA meeting – March 19, 2020 5pm to 8pm (only for Gran Paradiso Residents)

The additional three public outreach open houses scheduled by the City of North Port to be held in March 2020 had to be cancelled due to the Covid-19 pandemic.

Following are other forms of public outreach implemented by the City of North Port on the preliminary Coastal Flood Risk FIRMs:

- Posted City News Releases
- Updated City web page "FEMA Map Updates" at <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/fema-flood-map-updates>
- Created a user friendly, searchable interactive online [City Flood web application](#) with a link from the FEMA Map Updates web page.
- Created of a user friendly, searchable [side by side comparison](#) of the new preliminary FEMA Dec 31st, 2019, flood maps with the current FEMA Nov 4, 2016, flood map, with a link from the FEMA Map Updates web page.
- Sent mailer invitations to affected properties to attend public open houses.
- Sent Facebook and Twitter notices of the Public Open House events
- Established new telephone hotline (941-429-1052) to handle resident's inquiries
- Communicated information with the Homeowners Associations (HOA) representatives at the City's HOA meeting.

- Gave presentation at a local Peace River Engineering Society meeting.
- Sent email correspondence with the design Engineering Consultants, developers and HOA representatives.

8.14 Presentations at Seminars and Workshops

Responsible Department for Action: Public Works Department, Engineering Division

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

Public Works staff spoke at many seminars and workshops on topics that included flood map updates and flood prevention, stormwater issues, environmental protection, green development, fertilizer use, and pollution prevention. Annually, the Fire Rescue Emergency Manager also conducts multiple public outreach activities on Hurricane preparedness with Homeowners' Associations and civic groups. A list of these activities is included in Exhibit 8-13, Items highlighted in yellow are directly related to flood protection.

8.15 Brochure Handouts at Community Events

Responsible Department for Action: Public Works Department, Engineering and Administration Divisions

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

City staff volunteers at many community events and host booths with displays of the City's stormwater system, flood maps and offers an array of free brochures and education material. The City 10 CRS Topics flyer on Flood Information produced in-house by the City staff is distributed at these public events and at the afore mentioned seminars and workshops. This brochure is also available in kiosks at the three floors on City Hall and at Public Works building. Examples of community events are included in Exhibit 8-13.

8.16 Newsletters/New Releases, Television and Social Media Public Outreach

Responsible Department for Action: Public Works Department, Engineering and Administration Divisions

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

Flood Information is disseminated through various forms of news media and social media. Exhibit 8-14 provides a listing and range of distribution. Items highlighted in yellow are directly related to flood protection and includes:

- North RePort Newsletter mailed to every home in North Port
- Facebook and Twitter message releases
- North Port Sun and Herald Tribune Newspapers articles
- City Website News Releases
- Flood Awareness Week Social Media Postings
- Utility bill message
- Youtube Videos

8.17 City Website

Responsible Department for Action: Public Works Department, Engineering and Administration Divisions

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

The City of North Port posts the most current information concerning stormwater and flooding potential on the City's website. The City has added a Flood Information page that provides information on FEMA

flood map Updates, flood warning, CRS program and available flood elevation certificates at <http://www.cityofnorthport.com/flood>.

The City provides a link to a searchable user-friendly web application to view flood zones and obtain base flood elevations on the new FEMA FIRMs through the City's FEMA Flood Map Updates webpage at <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/fema-flood-map-updates>.

Elevation Certificates are also available on the City webpage at: <http://www.cityofnorthport.com/government/city-services/public-works/flood-information/elevation-certificates-3188>

The City's Emergency Management webpage "Hazards We Face" provides useful information on storm preparation and dealing with hazards: <http://www.cityofnorthport.com/government/city-services/fire-rescue/emergency-management/hazards-we-face>

Links are provided to related websites such as National Flood Insurance Program, Floodsmart, Florida Disaster, Sarasota County Library Catalog on Flood information, Sarasota CRS webpage and FEMA site on FIRM maps.

8.18 FIRMs Available to The Public

Responsible Department for Action: Public Works Department, Engineering Division and Neighborhood Development Services Department

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District

The November 4, 2016, FEMA FIRMs panels are available on the FEMA website, but these map panels are not currently searchable with an address and the underlying aerial is from early 2007. Homes built after the aerial date are not be visible. The pdfs of the new preliminary FIRMS panels are available from the FEMA website at: <https://hazards.fema.gov/femaportal/prelimdownload/>.

The City has subsequently released a user-friendly web map application that allows searching the new FIRMS by Address, Parcel Identification Number, or Name. The map is also overlaid on the 2018 aerial to allow easy location of houses. Flood zones, property lines and base flood elevations are easily visible on this web application which can be accessed from the City's FEMA Flood Map Updates webpage at: <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/fema-flood-map-updates>.

Since the release of the December 31, 2019, preliminary Coastal Flood Risk FIRMs the City Stormwater Manager and Neighborhood Development Services Department staff have responded to multiple requests for flood information. Anyone who desires a written determination of the existing and proposed flood zones, can submit a Flood Information Request form to the City's Stormwater Manager. The request form can be downloaded from the City's website at: <https://www.cityofnorthport.com/home/showdocument?id=15195>

Annually, the City mails letters offering flood protection and mapping information services to Insurance Companies, Realtors, Financial Institutions, and Abstract and Title companies that are registered with the City of North Port. The letter is also mailed to the President of North Port Realtors Board and to President of the North Port Chamber of Commerce.

8.19 Flood Warning, Response and Evacuation

Responsible Department for Action: Public Works Department, Operations Division and Fire Rescue Department

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District and Fire and Rescue District

The City has funded two United States Geological Survey (USGS) gages, in the Myakkahatchee Creek, one at Tropicaire Boulevard and the other at WCS 101 located further south near the City's Water Treatment Plant. These USGS gages monitor the water level in the creek and precipitation and provide real time data. The City has correlated the levels in the Creek at the Tropicaire gage with known areas of flooding and this information, together with a link to the USGS gage, is available on the City website at: <https://www.cityofnorthport.com/government/city-services/public-works/flood-information/flood-warning>.

The Emergency Manager (EM) and Public Works Operations staff monitors weather conditions and the Myakkahatchee Creek USGS gages during rain events. Public Works Operations staff will raise/lower gates at water control structures to move, retain, or redirect water flow to avoid flooding. Once water levels have reached an action stage, warnings are provided to the public through door-to-door contact, advisories through the City web site, advisories through local and cable broadcast media, and/or National Oceanic and Atmospheric Administration weather alert radios. If the situation is severe, the City has the ability to release a geographically targeted telephonic and text message to affected individuals through the new Mass Notification software system provided through the Florida Dept of Emergency Management. The alert is known as "Alert Sarasota County" and will utilize geo-fencing technology to distribute flooding, flash flooding, and evacuation notices to residents. In 2019, the City of North Port was fortunate not to experience a storm event that required Alert Sarasota County Community Emergency Notification System.

The City of North Port has worked with the Peace River/Manasota Regional Water Supply Authority (PRMRWSA) in the development of the Emergency Action Plan (EAP) for the new Peace River Reservoir #2. Computer modeling has shown that failure of the reservoir embankment can affect the City of North Port, particularly in the eastern areas of the City. The City has participated in the Statewide Hurricane exercise in a tabletop exercise on August 27, 2019, as part of a simulation of a breach at the PRMRWSA reservoir. Notification was received from PRMRWSA and maps were reviewed to determine impacts to City. The City receives an updated hard copy of (PRMRWSA) EAP each year near the beginning of the year. The updated January 2020 EAP is available from the Emergency Manager.

The City was recognized on July 28, 2014, by the National Weather Service as the third municipality in the State of Florida to achieve the designation of Storm Ready. This designation is reserved for locations which go above and beyond to protect their citizens from the impacts of hazardous weather. This program helps citizens feel safer knowing that our Emergency Management and the National Weather Service are working together through enhanced planning, education and awareness programs. The Storm Ready designation that was renewed on November 18, 2019, is valid until July 8, 2023 (Exhibit 8-15).

The City has become in 2019 a Weather-Ready Nation (WRN) Ambassador. The Weather-Ready Nation Ambassador initiative is the National Oceanic and Atmospheric Administration's (NOAA) effort to formally recognize NOAA partners who are improving the nation's readiness, responsiveness, and overall resilience against extreme weather, water, and climate events. As a WRN Ambassador, partners commit to working with NOAA and other Ambassadors to strengthen national resilience against extreme weather. In effect, the WRN Ambassador initiative helps unify the efforts across government, non-profits, academia, and private industry toward making the nation more ready, responsive, and resilient against extreme environmental hazards. The hyperlink to the WRN Ambassador initiative site can be assessed from the

North Port Fire Rescue web page <https://www.cityofnorthport.com/government/city-services/fire-rescue>
This program is accessible to the public and helps to warn and educate residents on developing flood conditions and hazards.

The City of North Port Emergency Management Division of the Fire Rescue Department has installed four-inch, reflective vinyl collars (traffic-grade reflective yellow tape with zone labels) on street-sign posts to mark hurricane evacuation zones A and B. The zones represent a storm surge threat to a neighborhood. The “A” zone (including manufactured housing communities) is at most risk and will be advised to evacuate first, while zones marked by other letters (B through E) are less likely to see floodwaters from the Gulf of Mexico or the Myakka River.

8.20 Participant in Sarasota County PPI Program

Responsible Department for Action: Public Works Department, Operations Division and Fire Rescue Department

Schedule for Completion of Action: Ongoing

Funding Source: Road and Drainage District and Fire and Rescue District

The City has adopted on July 23, 2019 a Resolution 2019-R-06 (Exhibit 8-16) to join the Sarasota County Program for Public Information (PPI) Committee formed under the Sarasota County’s CRS program. The PPI is a FEMA planning tool, to effectively coordinate public outreach. The PPI Committee is comprised of a cross-section of employees and community stakeholder members from Sarasota County Government, the City of Sarasota, the City of Venice, the City of North Port, the Town of Longboat Key, the Sarasota Bay Estuary Program, Mote Marine, and local business representatives such as Realtors, Insurance Agents, and Mortgage Lenders, is open for participation by all interested parties including private citizens, and is chaired by the Sarasota County Stormwater Department Director or designee.

The City’s Stormwater Manager is the City’s coordinate on the PPI committee and the North Port stakeholders to the committee include the City Senior Planner, Insurance agents, surveyor and volunteer from the North Port Canal Watch Group and previous Environmental Advisory Board member.

Post Disaster Mitigation Policies and Procedures

Post-disaster actions, mitigation policies and procedures are intended to help guide redevelopment in a pre-planned and more sustainable manner. The City’s post-disaster recovery plan is given in CEMP Annex A (given in Attachment A pdf pages 97 -108). Per CEMP Annex A Section I. A (Attachment page A1, pdf page 97), the North Port Emergency Manager is part of the Sarasota County’s team in post-disaster recovery efforts. Sarasota County’s has a Post-Disaster Redevelopment Plan (PDRP) which can be assessed from the Sarasota County’s website at:

https://www.scgov.net/government/planning-and-development-services/planning-and-zoning/-folder-225#docan7171_11681_7055

The City reviews and provides feedback to on Sarasota County’s PDRP which is currently being updated. After a disaster has occurred, Staff will establish or revise post-disaster redevelopment and mitigation policies and procedures as needed. The anticipated worst hit areas of damage by floods are most likely the same areas described in earlier Section 4 - Historic flooding.

Policies are established in Annex A Section III.B (Attachment page A8, pdf page 104) to determine whether structures will be rebuilt if substantially damaged. Annex A Section III.B specifies *“Once the damage assessment process is complete, the City of North Port Neighborhood Development Services Department conducts the post-disaster habitability inspections. The purpose of these inspections is to ensure that all structures are safe for entry and that water, electric, and gas services may be reconnected to the structure. These inspections are not conducted until the damage assessment process has been completed. All buildings*

damaged must be permitted for rebuilding or restoration and all new work must be up to current codes. Condemnation of severely damaged buildings and structures will be accomplished when they become public safety issues. Annex A provides responsibilities for public information, code enforcement, planning, and other efforts that encourage, mandate, and/or fund loss reduction activities. "

Action Items to Mitigate other Hazards

The above Sections 8.1 through 8.19 includes action items other than public information activities, to mitigate the effects of natural hazards which are mostly from flooding and storm damage. Additional action items will be developed as needed in coordination with the City's post-disaster recovery plan given in CEMP Annex A Section (given in Attachment A pdf pages 97 -108). Staff will review the policies and procedures of this Annex, as well as mitigation activities, for other hazards listed in Exhibit 5-1 that was excerpted from the CEMP Base Plan.

9. PLAN ADOPTION

The multi-jurisdictional Unified Local Mitigation Strategy (LMS) Plan is prepared by Sarasota County with input from the various jurisdictions including Cities of North Port, Sarasota and Venice, Town of Longboat Key, Sarasota County, Sarasota County Schools and Sarasota Memorial Hospital. The FMPs from the various jurisdictions are incorporated as annexes to the LMS Plan. After the Board of Sarasota County Commission adopts the LMS and associated FMPs in Spring 2021, the City of North Port Commission will adopt the LMS Plan and associated North Port FMP.

10. PLAN IMPLEMENTATION AND EVALUATION

Five year FMP Update

No plan is perfect. As FMP implementation proceeds, flaws will be discovered, and changes may be needed. Hazard conditions, goals and objectives may change. Implementation, evaluation and updates of the City's FMP will be coordinated by the Department of Public Works Stormwater Manager with input from the CRS committee which include members from various City Departments and public sectors as described in earlier Section 1. Input from the CRS committee will be solicited at the beginning of the planning process in a publicly advertised meeting and again in another publicly advertised meeting when the updated draft FMP was prepared. The previous November 2015 FMP together with the 2016 Sarasota Unified Local Mitigation Strategy (LMS) was adopted by City Resolution 2016-R-02 (Exhibit 1-1) on February 9, 2016. The FMP will be updated every 5 years and will be attached as annex to the Sarasota County 2021 LMS. The 2021 LMS with the updated FMP annex, is anticipated to be adopted by City of North Port Commission by resolution in Spring 2021.

Annual FMP Action Plan Update

The department(s) listed in the Section 8 Action Plan shall be responsible for overseeing implementation of the Action Plan. The FMP and Section 8 Action Plan items shall be evaluated annually by the City Department representatives in the CRS Committee and recommendations for changes will be included in the CRS Section 510 FMP progress report required as part of the annual CRS recertification. The Action Plan accomplishments over the previous 12 months will be included. The report will be submitted to the City Manager for approval and copied to City Commission prior to May 1 each year. The FMP will be made available to the public at the North Port Library, on the City of North Port Website and will be released to the media.



City of North Port

RESOLUTION NO. 2016-R-02

A RESOLUTION OF THE CITY OF NORTH PORT, FLORIDA, ADOPTING THE 2016 SARASOTA COUNTY UNIFIED LOCAL MITIGATION STRATEGY, WITH THE NORTH PORT FLOODPLAIN MANAGEMENT PLAN ANNEX, AS THE FORMAL GUIDE FOR THE CITY OF NORTH PORT'S HAZARD MITIGATION AND FLOODPLAIN MANAGEMENT ACTIVITIES IN ACCORDANCE WITH PUBLIC LAW 106-390, THE FEDERAL DISASTER MITIGATION ACT 2000 (44 CFR §201.6), AND THE FLORIDA ADMINISTRATIVE CODE RULE 9-G22; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING FOR AN EFFECTIVE DATE.

WHEREAS, City of North Port is subject to hazards including, severe weather, hurricanes, tornadoes, floods and wildfires and the City faces potential damage to life, property, natural resources and the local economy; and

WHEREAS, the Sarasota County Unified Local Mitigation Strategy Work Group is comprised of staff of Sarasota County Government; the Cities of North Port, Sarasota, and Venice; the Town of Longboat Key; Sarasota County School Board; and Sarasota Memorial Hospital, and community members is open for participation to any and all interested parties; and

WHEREAS, a City of North Port Community Rating System Work Group has also been formed to review and update the Floodplain Management Plan and is comprised of key City Department and community representatives, with the City's Stormwater Manager as the work group coordinator (City planner as an alternate) and those meetings are open for participation to any and all interested parties; and

WHEREAS, the Work Groups have identified these local hazards and have assessed County- and City-wide vulnerability and risk to these hazards, ultimately identifying and prioritizing mitigation initiatives that would reduce local vulnerability; and

WHEREAS, The Sarasota County Unified Local Mitigation Strategy and the North Port Floodplain Management Plan annex represents the City of North Port's commitment to reduce vulnerability and risks from all hazards, while it serves as a policy guide as resources are committed toward reducing the effects of all hazards, and is required of all communities

participating in the Community Rating System program through which provides flood insurance discounts through the National Flood Insurance Program; and

WHEREAS, initiatives identified, based upon established and accepted criteria, on the Unified Local Mitigation Strategy Project Lists are given greater consideration by State-managed funding programs, including but not limited to the Hazard Mitigation Grant program, the Flood Mitigation Assistance Program, the Pre-Disaster Mitigation Competitive Grant Program, Communities Trust, Community Development Block Grant, Coastal Partnerships Initiative; and

NOW THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA, THAT:

SECTION 1

- 1.01 The foregoing "WHEREAS" clauses above are hereby ratified as true and correct, and incorporated herein by reference.
- 1.02 The Sarasota County Unified Local Mitigation Strategy, with the North Port Floodplain Management Plan Annex, is adopted as the formal guide for the City of North Port's hazard mitigation and floodplain management activities.
- 1.03 The City Manager or his designee is authorized to apply for funding to support these activities.

SECTION 2 CONFLICTS

- 2.01 If there is any conflict between this Resolution and any other Resolution or Ordinance, or portions thereof, the provisions of this Resolution shall prevail to the extent of such conflict.

SECTION 3 SEVERABILITY

- 3.01 If any section, subsection, sentence, clause, phrase or portion of this Resolution is for any reason held invalid or unconstitutional by any court of competent jurisdiction, such portion shall be deemed a separate, distinct, and independent provision and such holding shall not affect the validity of the remaining portions.

SECTION 4 EFFECTIVE DATE

4.01 This Resolution shall take effect immediately upon execution by the Chair.

PASSED AND DULY ADOPTED by the City Commission of the City of North Port, Florida this 9th day of February, 2016

CITY OF NORTH PORT

By: Jacqueline Moore
Jacqueline Moore
Mayor

ATTEST:

By: Helen M. Raimbeau
Helen Raimbeau, MMC
City Clerk

Approved as to form and legal sufficiency:

By: Mark Moriarty
Mark Moriarty
City Attorney

CRS Committee Meeting Invitees List

Full Name	Organization	Title	Dept	Division
Valerie Malingowski	City of North Port	Grant Writer	City Manager Office	Administration
Josh Taylor	City of North Port	Community Outreach Coordinator	City Manager Office	Community Outreach
Michael Fear	City of North Port	Alternate Community Outreach Coordinator	City Manager Office and Public Works	Administration
Angela Hollister	City of North Port	Accountant III	Finance	Accounting Services
Eric Tiefenthaler	City of North Port	Div Chief -Emergency Manager	Fire Rescue	Administration
Peter Marietti III	City of North Port	Fire Marshall	Fire Rescue	Administration
Alexander Bahorski	City of North Port	Planning Analyst	Neighborhood Development Services (NDS)	Planning and Zoning
Savannah White	City of North Port	Environmental Tech	NDS and PW	Planning and Zoning, Engineering
Josh Thurmer	City of North Port	Chief Plans Examiner	NDS	Building
Tommy Lasprogato	City of North Port	Building Division Manager	NDS	Building
Kevin Raducci	City of North Port	Code Enforcement Manager	NDS	Building Code Enforcement
Alison Christie	City of North Port	Senior Planner	NDS	Planning and Zoning
Rhea Lopes	City of North Port	Senior Planner	NDS	Planning and Zoning
Sherry Willette	City of North Port	Planner	NDS	Planning and Zoning
Sandy Pfundheller	City of North Port	Director	Parks and Recreation	Administration
Monica Bramble	City of North Port	Acting Public Works Director	Public Works	Administration
Benjamin E. Newman	City of North Port	Project Engineer	Public Works	PW Engineering
Elizabeth Wong	City of North Port	Stormwater Manager	Public Works	PW Engineering
Colleen Hibbitts	City of North Port	Community Outreach Coordinator	Utilities	Community Outreach
Jennifer Fehrs	City of North Port	Utilities Engineer	Utilities	Utilities Engineering
Michael Acosta	City of North Port	Engineering Manager	Utilities	Utilities Engineering
Justin Box	Allstate Insurance	insurance Company Owner		
Bobbi Claybrooke	AM Engineering	Consultant Engineer		
Kimberley Quigley	BB&T	Lending Institution		
Todd Mathes	Benderson	Developer		
Kevin Feuser	Brightway insurance	insurance Company Owner		
Jon Mast	Building Industria Assoc.	Builder		
Bridget Spence	Casey Management	Developer		
Matthew Dill	Chamber of Commerce	Commerce		
Manager	Charlotte Desoto Building Industria Assoc.	Building Industria Rep		
Deborah Snowden	Coldwell Banker Sunstar Realty	Realtor		
Fred Koenig	Duck Key	HOA member		
Terrence Kirschner	Gran Paradiso - Lennar Homes	Developer		
Matthew Koratich	Gran Paradiso Development	HOA Manager		
Grant Gorski	Gran Paradiso Management	HOA Manager		
Strickland Smith	Heidt Engineering	Consultant Engineer		
Bruce Henry	Keller Williams Realty	Broker Associate/Realtor		
Peter Van Buskirk	Kimley-Horn Associates	Consultant Engineer		
Ty Gremaux	Kimley-Horn Associates	Consultant Engineer		
Matther Koratich	Lennar Homes - Gran Paradiso	Developer		
Brad Soule	Matty Corporation	Developer		
Bill Murray	MQ Partners	Developer		
Paul Morgan	NP Contractor Association and Past PZAB Member	Contractor		
Mellisa Ginn	Presto Air	Contractor		
Linda Pizzaro	Realtor Association	Realtor		
Lex van Brero	Resident of Gran Paradiso	Resident		
Donna Bailey	Sarasota County	CRS Coordinator	Public Works	Stormwater
Janita Wisch	Sarasota County	Librarian for City of North Port		
Doug Brauer	Stantec Engineering	Consultant Engineer		
Markowitz, Rachel	Stantec Engineering	Consultant Engineer		
Dean McConville	State Farm insurance	insurance Company Owner		
Mary Foster	State Farm insurance	Insurance agent		
John Shope	Suncoast Credit Union	Lending Institution		
Ralph Bienne	Suncoast Credit Union	Lending Institution		
Darryl Denson	Sundance Builder	Builder		
Richard Ives	Talon Bay HOA	HOA member		
Ron Carroll	Talon Bay HOA	HOA member		
Alan Fish	VBF Surveying	Surveyor		
Lisa Haseley	Wells Fargo	Lending Institution		
Clint Cuffie	WRA Egnineering, LLC	Consultant Engineer		
Clint Cuffie	WRA Engineering	Consultant Engineer		

Attendees List at CRS Committee Meetings

Full Name	Organization	Title	Dept	Division	FMP Review Meeting Attendance	
					9/17/2020	12/3/2020
Valerie Malingowski	City of North Port	Grant Writer	City Manager Office	Administration	x	
Michael Fear	City of North Port	Community Outreach Coordinator	City Manager Office and Public Works	Administration	x	x
Angela Hollister	City of North Port	Accountant III	Finance	Accounting Services	x	x
Eric Tiefenthaler	City of North Port	Div Chief -Emergency Manager	Fire Rescue	Administration	x	x
Peter Marietti III	City of North Port	Fire Marshall	Fire Rescue	Administration	x	x
Kevin Raducci	City of North Port	Code Enforcement Manager	Neighborhood Development Services (NDS)	Building Code Enforcement	x	
Alexander Bahorski	City of North Port	Planning Analyst	NDS	Planning and Zoning		x
Alison Christie	City of North Port	Senior Planner	NDS	Planning and Zoning	x	x
Rhea Lopes	City of North Port	Senior Planner	NDS	Planning and Zoning	x	x
Savannah White	City of North Port	Environmental Tech	NDS and PW	Planning and Zoning, Engineering	x	
Sandy Pfundheller	City of North Port	Director	Parks and Recreation	Administration	x	
Elizabeth Wong	City of North Port	Stormwater Manager	Public Works	PW Engineering	x	x
Benjamin E. Newman	City of North Port	Project Engineer	Public Works	PW Engineering	x	x
Jennifer Fehrs	City of North Port	Utilities Engineer	Utilities	Utilities Engineering	x	x
Michael Acosta	City of North Port	Engineering Manager	Utilities	Utilities Engineering	x	x
Donna Bailey	Sarasota County	CRS Coordinator	Public Works	Stormwater	x	x
Bruce Henry	Keller Williams Realty	Broker Associate/Realtor			x	x
Clint Cuffle	WRA Egnineering, LLC	Engineer , Vice President			x	
Grant Gorski	Gran Paradiso Development	General Manager			x	
Justin Box	Allstate Insurance	insurance Company Owner			x	x
Kevin Feuser	Brightway insurance	insurance Company Owner			x	x
Lex van Brero	Resident of Gran Paradiso	Resident			x	
Markowitz, Rachel	Stantec Engineering	Civil Engineer			x	x
Mary Foster	State Farm insurance	Insurance agent			x	x
Matthew Koratich	Gran Paradiso Development	HOA Operations Manager			x	x
Ronnie Carroll	Talon Bay Development	HOA Representative			x	
Terrence Kirschner	Gran Paradiso - Lennar Homes	Developer			x	
Bobbi Claybrooke	AM Engineering	Civil Engineer				x
Gremaux, Ty	Kimley-Horn and Assoc	Civil Engineer				x
Strackbein, Trenton	Kimley-Horn and Assoc	Civil Engineer				x

Noth Port Staff Role in 6 Mitigation Measures

Full Name	Title	Dept	Division	Role in 6 Mitigation Measure *					
				1. Preventative	2. Property Protection	3. Natural Resource Protection	4. Emergency Services	5. Structural Projects	6. Public Information
Alison Christie Rhea Lopes Alexander Bahorski	Senior Planner Planning Analyst	Neighborhood Development Services (NDS)	Planning	<ul style="list-style-type: none"> Floodplain mapping and data Planning and zoning Open space preservation Building codes 	<ul style="list-style-type: none"> Building elevation Insurance 				<ul style="list-style-type: none"> Map information Real estate disclosure
Angela Hollister	Accountant III	Finance	Accounting Services		<ul style="list-style-type: none"> Property Acquisition 				
Benjamin E. Newman	Project Engineer	Public Works	Engineering	<ul style="list-style-type: none"> Building codes Planning and zoning 		<ul style="list-style-type: none"> Wetlands protection 	<ul style="list-style-type: none"> Post-disaster mitigation actions 	<ul style="list-style-type: none"> Storm drain improvements 	<ul style="list-style-type: none"> Outreach projects
Elizabeth Wong	Stormwater Manager	Public Works	Engineering	<ul style="list-style-type: none"> Floodplain mapping and data Planning and zoning Open space preservation Stormwater management Floodplain regulations Drainage system maintenance Erosion setbacks Building codes 	<ul style="list-style-type: none"> Property Acquisition Building elevation Insurance 	<ul style="list-style-type: none"> Wetlands protection Water quality improvement Erosion and sediment control Natural area preservation Environmental corridors Natural area restoration Natural functions protection 	<ul style="list-style-type: none"> Hazard warning Health and safety maintenance Post-disaster mitigation actions 	<ul style="list-style-type: none"> Reservoirs Channel modifications Levees/floodwalls Storm drain improvements Diversions 	<ul style="list-style-type: none"> Map information Library Outreach projects Technical assistance Real estate disclosure Environmental education
Eric Tiefenthaler Peter Marietti III	Div Chief - Emergency Manager, Fire Marshall	Fire Rescue	Administration				<ul style="list-style-type: none"> Hazard threat recognition Critical facilities protection Hazard warning Health and safety maintenance Hazard response operations Post-disaster mitigation actions 		<ul style="list-style-type: none"> Outreach projects
Michael Acosta Jennifer Fehrs	Engineering Manager Utilities Engineer	Utilities	Engineering		<ul style="list-style-type: none"> Sewer backup protection 		<ul style="list-style-type: none"> Critical facilities protection Health and safety maintenance Hazard response operations Post-disaster mitigation actions 	<ul style="list-style-type: none"> Reservoirs Levees/floodwalls 	<ul style="list-style-type: none"> Outreach projects
Kevin Raducci Tommy Lasprogato Josh Thurmer	Code Enforcement Manager, Building Division Manager, Chief Plans Examiner	Neighborhood Development Services (NDS)	Building	<ul style="list-style-type: none"> Planning and zoning Erosion setbacks Building codes 	<ul style="list-style-type: none"> Building elevation 	<ul style="list-style-type: none"> Wetlands protection 			<ul style="list-style-type: none"> Map information Real estate disclosure
Michael Fear	Alternate Community Outreach Coordinator	City Manager Office and Public Works	Administration						<ul style="list-style-type: none"> Outreach projects
Sandy Pfundheller	Director	Parks and Recreation	Administration			<ul style="list-style-type: none"> Natural area preservation Environmental corridors Natural area restoration Natural functions protection 			
Savannah White	Environmental Tech	NDS and PW	Planning, Operations	<ul style="list-style-type: none"> Floodplain mapping and data 		<ul style="list-style-type: none"> Wetlands protection Water quality improvement Erosion and sediment control Natural area preservation Environmental corridors Natural area restoration Natural functions protection 			<ul style="list-style-type: none"> Map information Outreach projects Real estate disclosure Environmental education
Valerie Malingowski	Grant Writer	City Manager Office	Administration		<ul style="list-style-type: none"> Property Acquisition 				<ul style="list-style-type: none"> Map information Outreach projects

* 6 mitigation Measures as defined in CRS 2017 Manual page 510-20



Neighborhood Development Services

Floodplain "Task Force" Work Plan

1. Overview

The primary mission of the Floodplain Task Force to support the City of North Port's Community Rating System (CRS) through information, education and outreach activities to develop multiple knowledgeable Certified Floodplain Managers. Historically, the City's CRS Coordinator has provided significant input on the CRS Program and flood insurance rules and guidelines propagated by FEMA. The Task Force will also be very active in ASFPM membership and Florida Floodplain Mangers membership to stay informed of upcoming changes to the NFIP and potential effects these changes could have.

The committee will be headed by the Building Official who is designated the Floodplain Administrator listed below.

Anthony Warren CBO, CFM, Building Official/Floodplain Administrator

The membership is composed of interested employees within Neighborhood Development Services. The Floodplain Administrator will use an initial selected group of members who are interested in continuing education, on the job work experience and essential personnel that are already involved in different aspects of Floodplain Management. The CRS Coordinator will serve as an outside source but will work in a collective effort.

Initial Members are listed below.

Melissa McThenia, Zoning Plans Examiner

Kyla Guilbault, Development Tech II

Justin Bryde, GIS Analyst Addressing Specialist

Outside Source

Elizabeth Wong P.E., Stormwater Manager/CRS Coordinator



Achieve Anything

www.cityofnorthport.com

Neighborhood Development Services: 941.429.7044, 4970 City Hall Boulevard, North Port, FL 34286

2. Task Outline

2020 – Initial Work Items

Task Name	Task Leader	Task Duration	Task Description
Self-Studies	Floodplain Administrator	Ongoing Until Complete	Complete EMI Self Studies as assigned by Floodplain Administrator
Annual Conference	Floodplain Administrator	4 days Annually	(2-3) Members should be prepared to attend for networking, continuing education and new industry standards
Elevation Certificates	Zoning/Permit Supervisor	Ongoing/As Needed	Verify Elevation Certificates for completeness prior to submitting to CRS Coordinator
Prepare assigned CRS sections	Floodplain Administrator/CRS Coordinator	Prior to Annual Renewal and Prior to 5 Year Cycle	Each member will be selected for preparing information to submit to the CRS Coordinator.
Information Log(s)	Floodplain Administrator	Ongoing/As Needed	Documenting phone calls, emails and walk ins for any items related to floodplain management.
Public Outreach	Floodplain Administrator/Outreach Personnel	Ongoing	Provide Public Outreach through social media, pamphlets, utility bill mailouts, onsite speaking engagements
ASFPM/FLFLOODS Committees	Floodplain Administrator	Ongoing	Actively participate in the Florida and National Floodplain Committees

3. Floodplain Courses

*A. FEMA EMI Independent Self Study (introductory courses)*Free Online*

IS-1100 Increased Cost of Compliance, IS-1102 Theory of Elevation Rating, IS-1103 Elevation Certificate for Surveyors, IS-1105a Elevation Certificate Made Easy, IS-1106a FEMA Mapping, IS-1113 Coastal Barrier Resources Act

*B. One Day Class (Face To Face and more in depth) *Fee*

Fundamentals In Floodplain Management, Elevation Certificate Basics

*C. CFM Courses (4 day classes followed my CFM Test. Only 1 is needed) *Fee*

E-0273, L-0273, G-0273

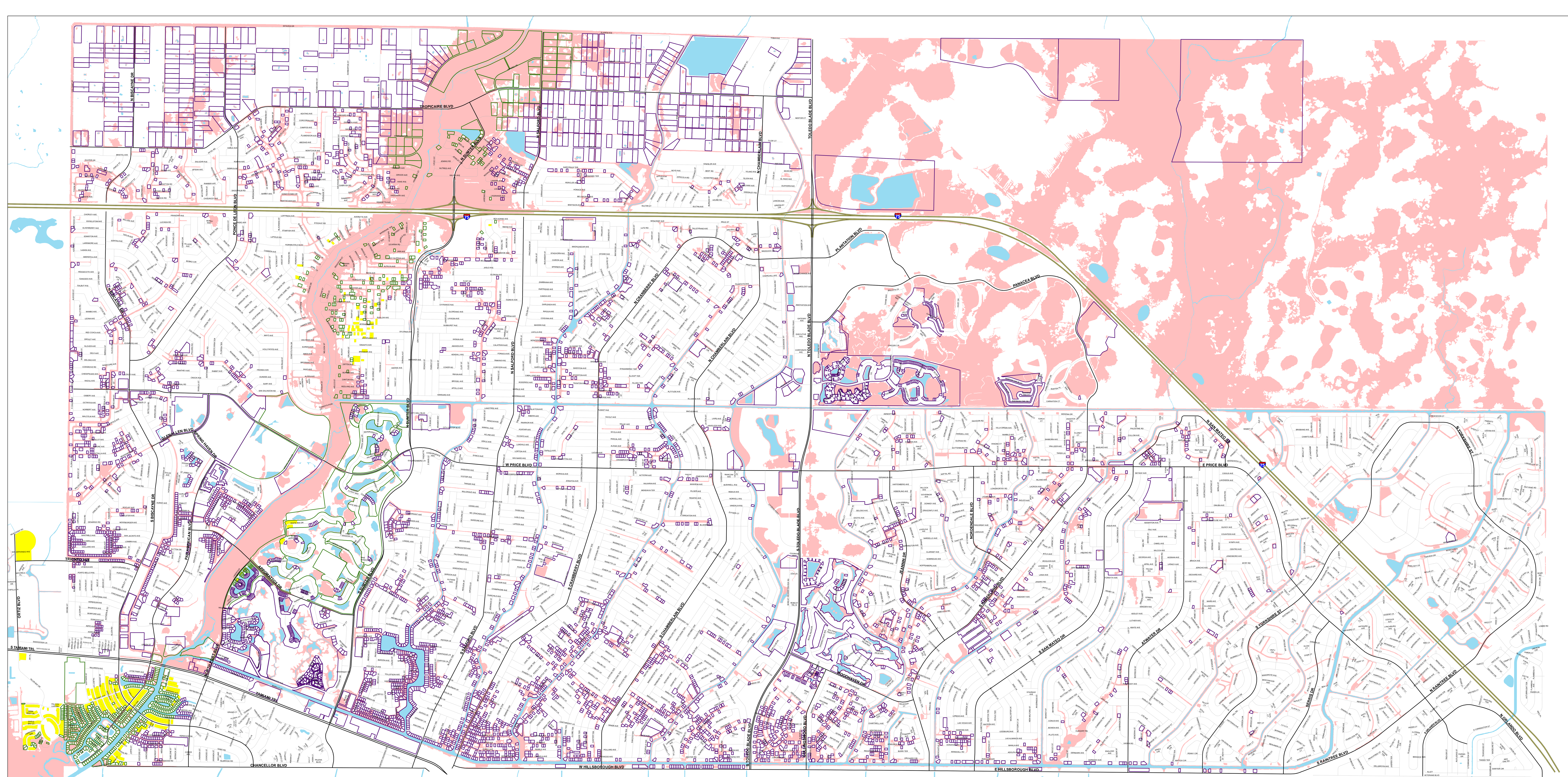
*D. FEMA EMI Independent Self Study (follow up courses)*Free Online*

IS-162 Hazard Mitigation Floodplain Management, IS-279a Introduction to Retrofitting, IS-280 Engineering Principles, IS-321 Hurricane Mitigation, IS-322 Flood Mitigation, IS-727 Floodplain Management and Protecting Wetlands

Primary	Description of Project	Agency Responsible for Implementation	Priority	Estimated Cost	Funding Source	Hazard Mitigation Strategy	Hazards Mitigated	Jurisdiction Project #	Jurisdiction Project Owner	Jurisdiction Project Benefit	Mitigation Goals Achieved	Timeframe for Project Completion	Project Status (COMPLETED)	Project Status (DEFERRED)	Project Status (DELETED)	Project Status (IN PROGRESS)	Project Status (NEW)	If Deferred; Why?	Mitigate New or Existing	Comments
Purchase lots along the Myakkahatchee Creek	Purchase lots to reduce flood vulnerability	CM, NDS, PW	High	\$3.5M	FDEP Grants	1	All	N/A	NP	1	2, 4	As funding is available		TRUE				Funding	E (Existing)	
Deer Prairie Creek Bridge	Install bridge in order to decrease response time	Fire Rescue	High	\$1M	CIP Grants Infrastructure Surtax III	5	All	N/A	NP	1	5	2024		TRUE				Funding	E (Existing)	
City EOC/Fire Rescue HQ/Data Center/PD 911 Dispatch/Property Evidence Building	Build a new facility to accommodate emergency operations center to include showers, and back-up emergency power to entire bldg	Public Works, FM	High	\$6M	Grants HMGP Other City Funds	2	All	N/A	NP	ALL	5	As funding is available		TRUE				Funding	E (Existing)	100% of Plans received, Plans in NP SDR review, and moving into the permitting phase. Pegasus filed a PoP extension that has been approved but is still in processing with the state. The state also requested a SOW environmental review, but we anticipate no issues with approval. A cost increase was also submitted to the state and is currently going through a CBA.
North Port Utilities Admin/Field Operations	Replace buildings with hardened structures	Utilities	High	\$13.2M	Revenue Bonds User Rates	2 3	All	N/A	NP	ALL	5	2023				TRUE			E (Existing)	Planning started.
North Port Utilities construction of additional source for R/O	To add additional wells to the current wellfield to increase drought tolerance and protect the existing system	Utilities	Medium	\$4.5M	Capacity Fees	5	4	N/A	NP	ALL	1 4 5					TRUE			E (Existing)	
Hardening of water & sewer utility structures	Upgrade utility structures at bridge crossings, etc.	Utilities	Medium	\$600K	User Rates	5	All	N/A	NP	ALL	5	2020				TRUE			E (Existing)	
Additional emergency water interconnect	12" Potable water emergency inter-connect between Sarasota and NP	Utilities	Medium	\$32K	County User Rates	5	All	N/A	NP	1 4	5	2021		TRUE					E (Existing)	
Replacement of shallow depth water and wastewater lines at Lazy River		Utilities	High	\$150K	User Rates	5	4	N/A	NP	1 2 4	1 2 5		TRUE						E (Existing)	
Inflow & infiltration in identified areas of the City		Utilities	High	\$300K	User Rates	2 5	10	N/A	NP	1 5	1 4 5					TRUE			E (Existing)	
Vault style master pumping lift station #12 rehabilitation to ground level		Utilities	High	\$370K	User Rates	2 5 7	All	N/A	NP	1	1 2 4 5	2021				TRUE			E (Existing)	
Phase 1 Water Treatment Plant rehabilitation of Flocculation #1		Utilities	High	\$575K	User Rates	2 5	All	N/A	NP	1 5	2 4 5	2021	TRUE						E (Existing)	
Distribution line installation to serve the Western reaches of the City based on hydraulic modeling		Utilities	High	\$3.5M	Capacity Fees	5	4	N/A	NP	1 4 5	1 4 4	2021				TRUE			N (New)	
Rehabilitation of lift stations that are 30 plus years old that have been identified in need		Utilities	High	\$150K	User Rates	2 5 7	All	N/A	NP	1 5	1 2 5	2021				TRUE			E (Existing)	
VFDs installed on current raw water intake structures at the Water Treatment Plant		Utilities	High	\$30K	User Rates	2 5	All	N/A	NP	1 4 5	1 4 4	2021				TRUE			E (Existing)	
Installation of additional analyzers and integration to SCADA to achieve 24 hour operations at the Water Treatment Plant		Utilities	High	\$48K	User Rates	2	All	N/A	NP	1 4 5	1 2 4	2021				TRUE			E (Existing)	
Upgrade the 14 year old control panel at the Wastewater Treatment Plant to improve operational efficiency		Utilities	High	\$35K	User Rates	2	All	N/A	NP	1 4 5	1 2 5		TRUE						E (Existing)	
Public Works Administration Building	Replace buildings with hardened structures	Public Works	Medium	\$6.28M	RDA	2 3	All	N/A	NP	ALL	5	As funding is available		TRUE				Funding	N (New)	
Pipe Lining on major outfalls	CMP pipes that are difficult to replace can be lined. Only those that are deemed structurally sufficient can be lined. All others will need to be replaced.	Public Works	High	\$1M	RDA	2 5 6 7	All	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)	
Design 4 Lane Price Blvd Sumter to Toledo Blade	Four-lane and elevate roadway.	Public Works	NA	\$2.2M	Surtax III	5	All	N/A	NP	ALL	5	2020			TRUE				E (Existing)	
Construct 4 Lane Price Blvd Sumter to Toledo Blade	Four-lane and elevate roadway.	Public Works	NA	\$43M	Grants Other City Funds Surtax III	5	All	N/A	NP	ALL	5	2022				TRUE			E (Existing)	
Design 4 Lane Price Blvd Sumter to West of North Port High School	Four-lane and elevate roadway.	Public Works	High	\$7M	Grants Other City Funds Surtax III	5	All	N/A	NP	ALL	5	As funding is available		TRUE				Funding	E (Existing)	
Construct 4 Lane Price Blvd Sumter to West of North Port High School	Four-lane and elevate roadway.	Public Works	High	\$33M	Grants Other City Funds Surtax III	5	All	N/A	NP	ALL	5	As funding is available		TRUE				Funding	E (Existing)	
Design 4 Lane Price Blvd Toledo Blade to Haberland	Four-lane and elevate roadway.	Public Works	High	\$5.6M	Surtax III	5	All	N/A	NP	ALL	5	As funding is available		TRUE				Level of Service	E (Existing)	

Primary	Description of Project	Agency Responsible for Implementation	Priority	Estimated Cost	Funding Source	Hazard Mitigation Strategy	Hazards Mitigated	Jurisdiction Project #	Jurisdiction Project Owner	Jurisdiction Project Benefit	Mitigation Goals Achieved	Timeframe for Project Completion	Project Status (COMPLETED)	Project Status (DEFERRED)	Project Status (DELETED)	Project Status (IN PROGRESS)	Project Status (NEW)	If Deferred; Why?	Mitigate New or Existing	Comments	
Construct 4 Lane Price Blvd Toledo Blade to Haberland	Four-lane and elevate roadway.	Public Works	High	\$30.7M	Surtax III	5	All	N/A	NP	ALL	5	As funding is available		TRUE				Level of Service	E (Existing)		
Design 4 Lane Price Blvd Haberland to Veterans	Four-lane and elevate roadway.	Public Works	High	\$6.7M	Surtax III	5	All	N/A	NP	ALL	5	As funding is available		TRUE				Level of Service	E (Existing)		
Construct 4 Lane Price Blvd Haberland to Veterans	Four-lane and elevate roadway.	Public Works	High	\$34M	Surtax III	5	All	N/A	NP	ALL	5	As funding is available		TRUE				Level of Service	E (Existing)		
Toledo Blade Blvd Extension, Tropicaire Blvd to SR72	Roadway extension	Public Works	High	\$16M	Revenue Bonds	2	9	N/A	NP 4	1	1	As funding is available				TRUE			N (New)		
Big Slough Flood Reduction Study	Consultant to recommend solutions to reduce flooding in 2 areas	Public Works	High	\$300K	RDA	2 5 6 7	2 7	N/A	NP	1 4	1 2 5	2020	TRUE						E (Existing)	Funded by SWFWMD	
Design replacement for flood control structure #115	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$109K	RDA	2 5 6 7	2 3 6 7 9 11	N/A	NP	1 4	1 2 5	2017	TRUE						E (Existing)		
Construct replacement for flood control structure #115	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$165K	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	2018	TRUE						E (Existing)		
Design replacement for flood control structure #106	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$168K	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	2018	TRUE						E (Existing)		
Construct replacement for flood control structure #106	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$2.274M	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	2020	TRUE						E (Existing)		
Design replacement for flood control structure #108	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$192K	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	2020				TRUE			E (Existing)		
Construct replacement for flood control structure #108	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	2.48M	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	2021		TRUE				Funding	E (Existing)		
Design replacement for flood control structure #113	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$308K	HMGP RDA Surtax III	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)		
Construct replacement for flood control structure #113	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$3.85M	HMGP RDA Surtax III	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)		
Design replacement for flood control structure #114	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$300K	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)		
Construct replacement for flood control structure #114	Corroded Structure Need to rehab. replace for flood protection	Public Works	High	\$3.6M	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)		
Design replacement for flood control structure #157	Corroded structure. Needs rehabilitated and replaced for flood protection.	Public Works	High	\$175K	Grants RDA Surtax III	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5										
Construct replacement for flood control structure #157	Corroded structure. Needs rehabilitated and replaced for flood protection.	Public Works	High	\$1.8M	Grants RDA Surtax III	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5										
Design replacement for other flood control structures	Corroded Structure Need to rehab. replace for flood protection	Public Works	Medium	\$500K	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)		

Primary	Description of Project	Agency Responsible for Implementation	Priority	Estimated Cost	Funding Source	Hazard Mitigation Strategy	Hazards Mitigated	Jurisdiction Project #	Jurisdiction Project Owner	Jurisdiction Project Benefit	Mitigation Goals Achieved	Timeframe for Project Completion	Project Status (COMPLETED)	Project Status (DEFERRED)	Project Status (DELETED)	Project Status (IN PROGRESS)	Project Status (NEW)	If Deferred; Why?	Mitigate New or Existing	Comments
Construct replacement for other flood control structures	Corroded Structure Need to rehab, replace for flood protection	Public Works	Medium	\$3M	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)	
Drainage System Improvements	Rehab and replacement of swales, ditches, pipes, outfalls and canals	Public Works	Medium	\$1.5M	RDA Surtax III	5 6 7	2 7 9 11	N/A	NP	1	1 2	As funding is available					TRUE		E (Existing)	
Bridge Rehabilitation and Repairs	Repairs to evacuation route bridges	Public Works	Medium	\$1.5M	RDA Surtax III	3	2 9	N/A	NP	1 4	1	As funding is available					TRUE		E (Existing)	
Big Slough Flood Reduction Projects	Implementation of projects to reduce flooding	Public Works	Medium	\$43M	RDA	2 5 6 7	2 3 6 7 9 10	N/A	NP	1 4	1 2 5	As funding is available		TRUE				Funding	E (Existing)	
Property Maintenance Yard	Replace buildings with hardened structures	Parks and Rec	High	\$7M	CIP HMGP	2 3	All	N/A	NP	ALL	5	As funding is available		TRUE			TRUE	Funding	E (Existing)	
Generator for City Hall	Add emergency power to entire building	Public Works FM	High	\$1M	CIP HMGP	2 3	All	N/A	NP	ALL	5					TRUE			E (Existing)	
Lift station bypass pump project	Upgrade existing lift stations to include bypass pumps at all major stations.	Utilities	High	\$5M	User Rates	2 3 5	All	N/A	NP	1	All	2029					TRUE		E (Existing)	
North Port THIRA Update	Update to the THIRA Plan	Fire	Medium	\$30K	General Revenues Grants	All	All	N/A	NP	1	All						TRUE			
Public Outreach	Public outreach programs for all jurisdictions	LMS Work Group	High	\$10K	NA	All	All	NA	LBK NP Sarasota County Sarasota Hospital Board SRQ Venice	ALL	3	Continuous				TRUE			E (Existing)	

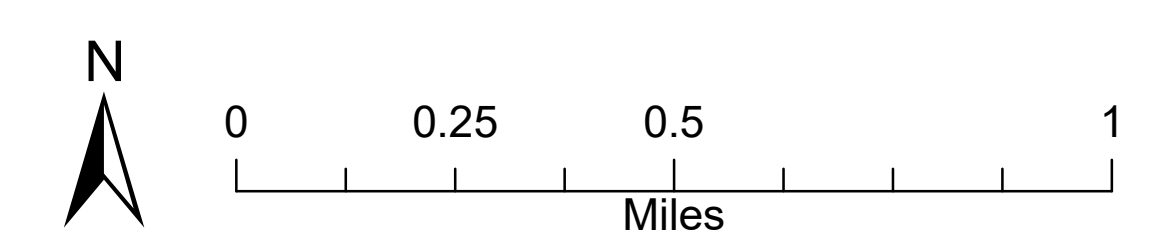


Parcels Touching SFHA with Structures in November 4, 2016 and in existing 1981 & 1984 FIRMs

- Legend**
- Parcels in SFHA with Structures
 - Parcels in SFHA in 1981 & 1984 maps with Structures
 - Parcels with Structures Removed from SFHA in 1981 & 1984
 - FEMA Zone AE
 - I-75
 - Major Roads
 - Local Roads
 - Water

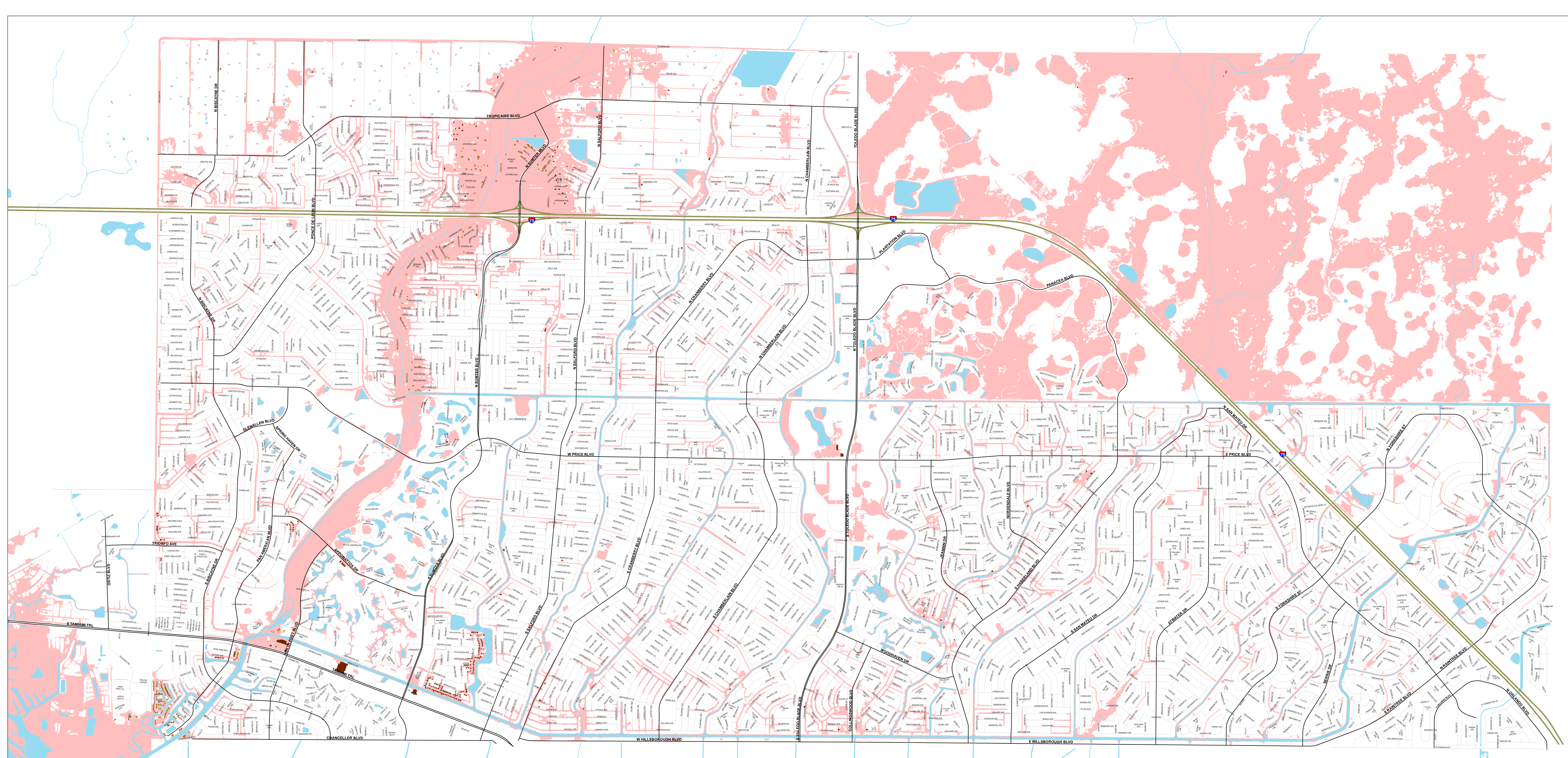
Parcel Status	No. of Affected Parcels (as of 12/05/16)	No. of Affected Structures* (as of 12/05/16)	No. of Parcels with Insurable Structures* (Using 12/05/16 Sarasota County GIS Structures Layer)
Parcels Added Parcels not in the 1981 FIRM floodplain, but any portion(s) of the parcel are touching the November 4, 2016 FIRM SFHA.	14325	5531	276
Parcels Removed Parcels that are in the 1981 FIRM SFHA and were removed from the November 4, 2016 FIRM SFHA.	3828	921	
Parcels that are in the 1981 FIRM SFHA and are still in the November 4, 2016 FIRM SFHA.	2630	720	211

* An insurable structure is a structure with at least two load-bearing walls and a roof. It must be affixed to land, and at least 55% of its value must be above ground. This definition includes almost all residential and commercial structures, as well as ancillary buildings such as garages and barns. Storage facilities such as silos and grain storage buildings are also covered. The rules do not cover structures such as gazebos, pavilions, pole barns, and storage tanks, as these buildings do not have at least two load-bearing walls and a roof. If they did not have roofs, then they would not qualify as insurable structures. Otherwise, flood insurance is required. The issue is not habitability.



Prepared by GIS Services
December 7, 2016

Disclaimer: This map is for reference purposes only and is not to be construed as a legal document. Any reliance on the information contained herein is at the user's risk. The City of North Port and its agents assume no responsibility for any use of the information contained herein or any loss resulting therefrom.

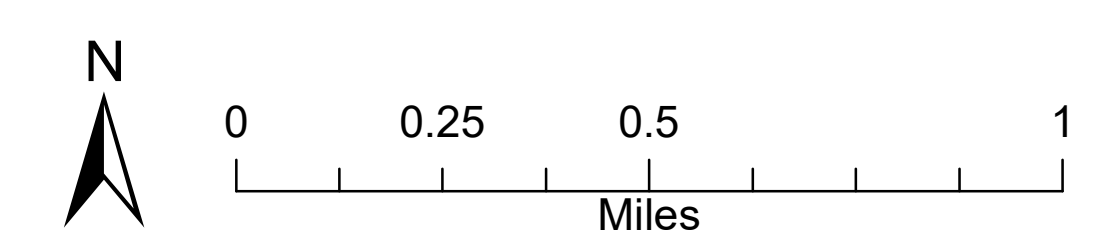


Structures Touching SFHA in November 4, 2016 and in existing 1981 & 1984 FIRMs

- Legend**
- Structures Touching SFHA - Added
 - Structures touching SFHA in 1981 & 1984
 - FEMA Zone AE
 - I-75
 - Major Roads
 - Local Roads
 - Water

Parcel Status	No. of Affected Parcels (as of 12/05/16)	No. of Affected Structures* (as of 12/05/16)	No. of Parcels with Insurable Structures* (Using 12/05/16 Sarasota County GIS Structures Layer)
Parcels Added Parcels not in the 1981 FIRM floodplain, but any portion(s) of the parcel are touching the November 4, 2016 FIRM SFHA	1425	551	276
Parcels Removed Parcels that are in the 1981 FIRM SFHA and were removed from the November 4, 2016 FIRM SFHA	1828	921	
Parcels that are in the 1981 FIRM SFHA and are still in the November 4, 2016 FIRM SFHA	2630	720	211

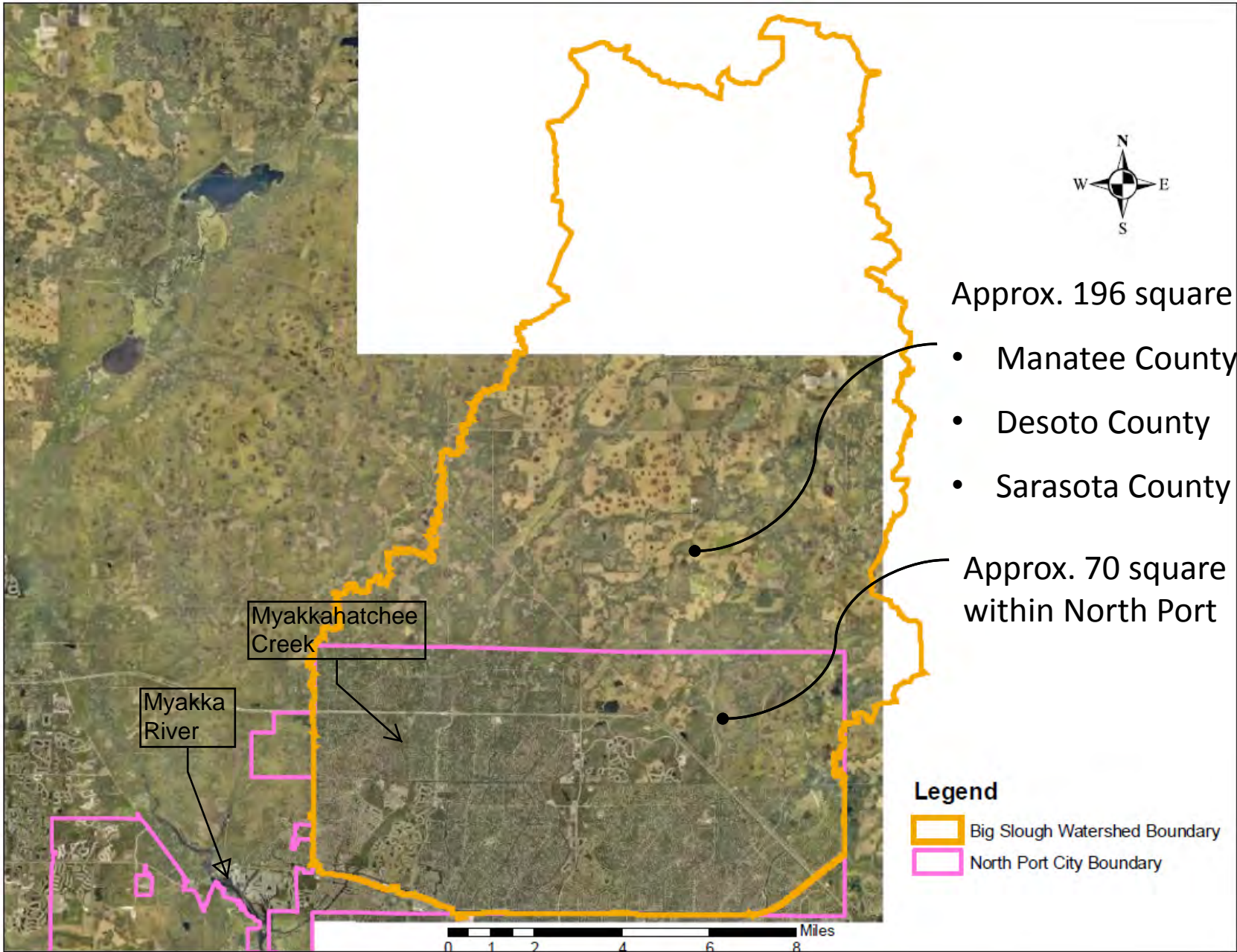
*An insurable structure is a structure with at least two load-bearing walls and a roof. It must be affixed to land, and at least 51% of its value must be above ground. This definition includes almost all residential and commercial structures, as well as existing buildings such as garages and barns. Storage facilities such as silos and grain storage buildings are also covered. The rules do not cover structures such as gazebos, pavilions, pole barns, and storage tanks, as these buildings do not have at least two load-bearing walls and a roof. If they did not have roofs, then they would not qualify as insurable structures. Otherwise, flood insurance is required. The issue is not habitability.



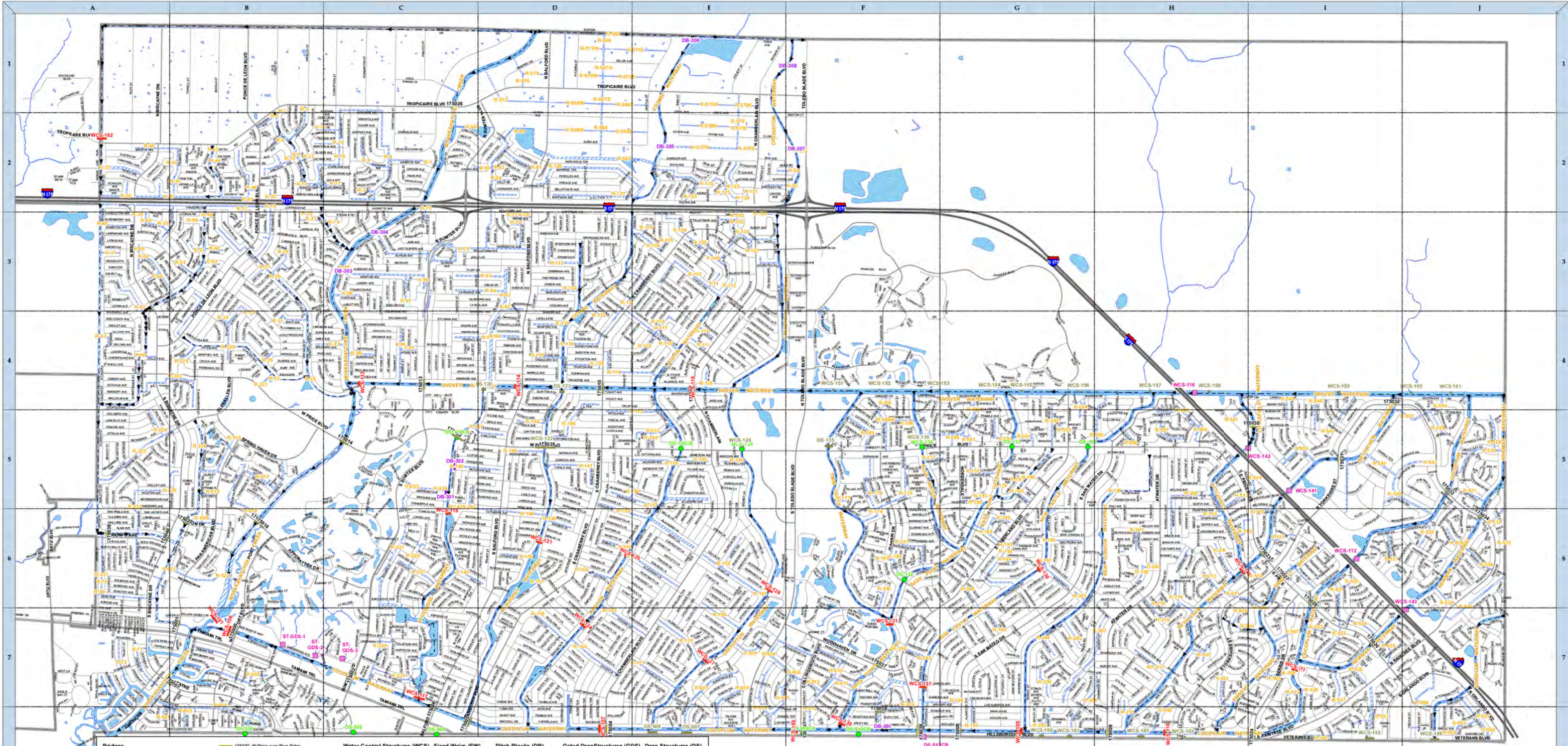
Prepared by GIS Services
December 7, 2016

Disclaimer: This map is for reference purposes only and is not to be construed as a legal document. Any reliance on the information contained herein is at the user's risk. The City of North Port and its agents assume no responsibility for any use of the information contained herein or any loss resulting therefrom.

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Big Slough Watershed Boundary (196 square miles)



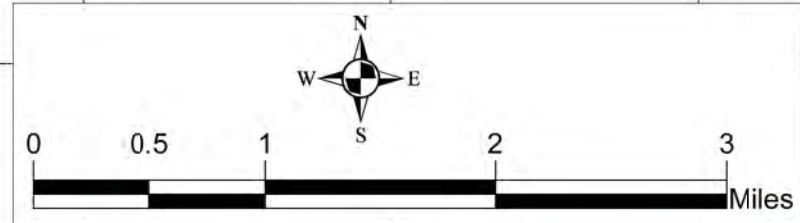
Bridges		Water Control Structures (WCS)		Fixed Weirs (FW)		Ditch Blocks (DB)		Gated Drop Structures (GDS)		Drop Structures (DS)	
Bridge Number	Bridge Location	Grid Structure Number	Grid Structure Number	Grid Structure Number	Grid Structure Number	Grid Ditch Block Number	Grid Ditch Block Number	Grid Structure Number	Grid Structure Number	Grid Structure Number	Grid Structure Number
175000	North Port over Coco Plum	A2, WCS-182	D4, DS-120	D4, DS-120	C3, DB-305	B7, ST-GDS-1	B8, DS-501		C5, DS-119CB		
175001	Pan American over Coco Plum	B7, WCS-101	D4, DS-123	D4, DS-123	C3, DB-306	B7, ST-GDS-2	C8, DS-503		C8, DS-504		
175002	S Sumter over Coco Plum	B7, WCS-106	D5, WCS-122	D5, WCS-122	C5, DB-301	C7, ST-GDS-3	E5, DS-126CB		F5, WCS-136		
175003	Collingswood over Coco Plum	C4, WCS-113	E5, WCS-129	E5, WCS-129	C5, DB-302	F8, DS-512CB	F8, DS-512CB		F8, DS-510CB		
175004	S Chamberlain over Coco Plum	C6, WCS-118	E8, DS-506	E8, DS-506	C5, DB-303	H4, WCS-116	H4, WCS-116		G5, DS-133		
175005	S Cranberry over Coco Plum	C7, WCS-117	E8, DS-507	E8, DS-507	C5, DB-304	I5, WCS-141	I5, WCS-141		G5, DS-139		
175006	S Salford over Cooplum	D4, WCS-114	F4, WCS-136	F4, WCS-136	E1, DB-308	I5, WCS-142	I5, WCS-142				
175007	S Biscayne over Myakkahatchee	D6, WCS-121	F4, WCS-151	F4, WCS-151	E2, DB-307	I6, WCS-112	I6, WCS-112				
175008	S San Mateo over Coco Plum	D6, WCS-125	F4, WCS-152	F4, WCS-152	F1, DB-311	J7, WCS-143	J7, WCS-143				
175009	Abwater over Coco Plum	D7, WCS-124	F5, DS-135	F5, DS-135	F2, DB-309						
175010	N Chamberlain over Snover	D8, WCS-107	G4, WCS-154	G4, WCS-154	G8, DB-310						
175011	N Chamberlain over Snover	E4, WCS-115	G4, WCS-155	G4, WCS-155							
175012	N Salford over Snover	E6, WCS-128	G4, WCS-156	G4, WCS-156							
175013	Sumter over Snover	E7, WCS-127	G4, WCS-157	G4, WCS-157							
175014	W Price over Myakkahatchee Creek	F7, WCS-131	G8, WCS-180	G8, WCS-180							
175015	Appomattox over Myakkahatchee Creek	F7, WCS-137	G8, WCS-181	G8, WCS-181							
175019	Appomattox over Myakkahatchee Canal	F8, WCS-108	H4, WCS-157	H4, WCS-157							
175020	Elyton over R226	F8, WCS-130	H8, WCS-182	H8, WCS-182							
		G8, WCS-109	H8, WCS-183	H8, WCS-183							
		H8, WCS-140	I4, WCS-159	I4, WCS-159							
		H8, WCS-110	I8, WCS-185	I8, WCS-185							
		I7, WCS-111	J4, WCS-160	J4, WCS-160							
			J4, WCS-161	J4, WCS-161							
			J8, WCS-196	J8, WCS-196							

City of North Port Stormwater Structures

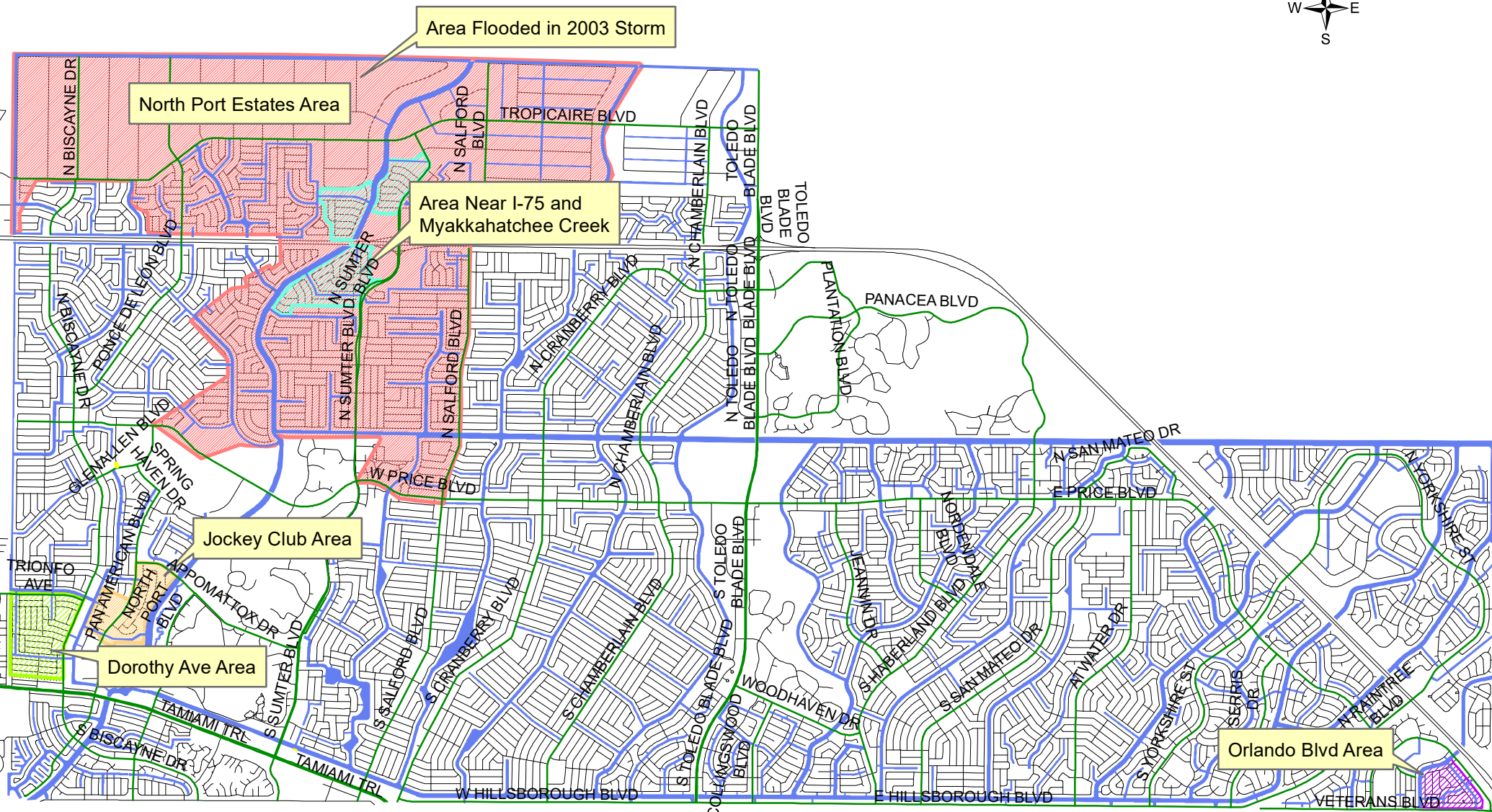


Prepared by
Infrastructure Management Division
Public Works
City of North Port

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Area Flooded in 2003 Storm

North Port Estates Area

Area Near I-75 and Myakkahatchee Creek

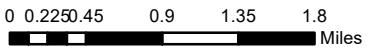
Jockey Club Area

Dorothy Ave Area

Orlando Blvd Area

Legend

- Waterways and R-Ditches
- Jockey_Club
- Area Near I-75 and Myakkahatchee Creek
- North Port Estates Area Flooded in Storm 2003
- Orlando Blvd Area
- Dorothy Ave Area



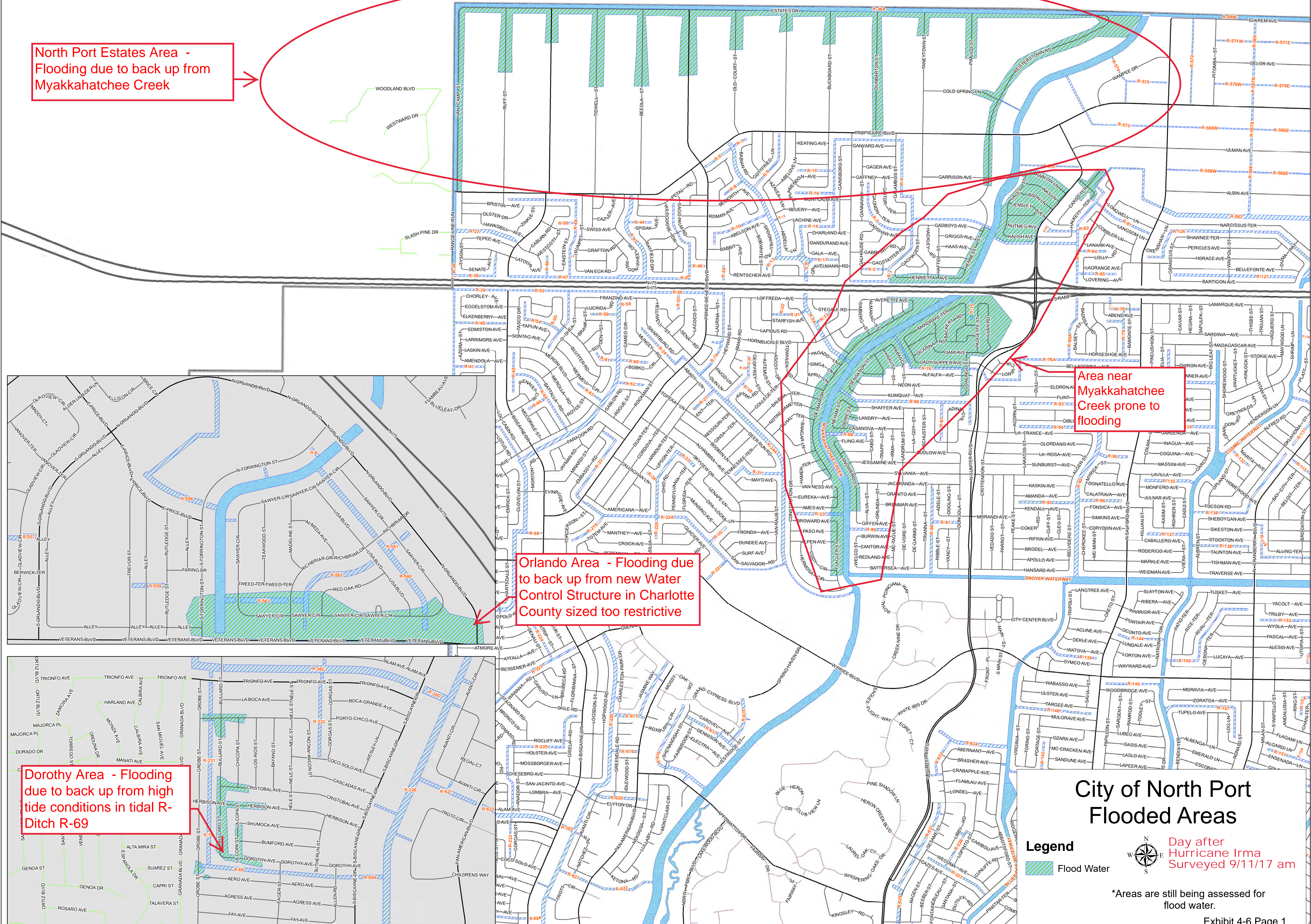
City of North Port Flood Prone Areas

North Port Estates Area - Flooding due to back up from Myakkahatchee Creek

Area near Myakkahatchee Creek prone to flooding

Orlando Area - Flooding due to back up from new Water Control Structure in Charlotte County sized too restrictive

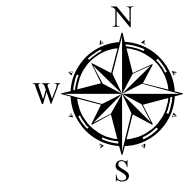
Dorothy Area - Flooding due to back up from high tide conditions in tidal R-Ditch R-69



City of North Port Flooded Areas

Legend

Flood Water



Day after Hurricane Irma
Surveyed 9/11/17 am

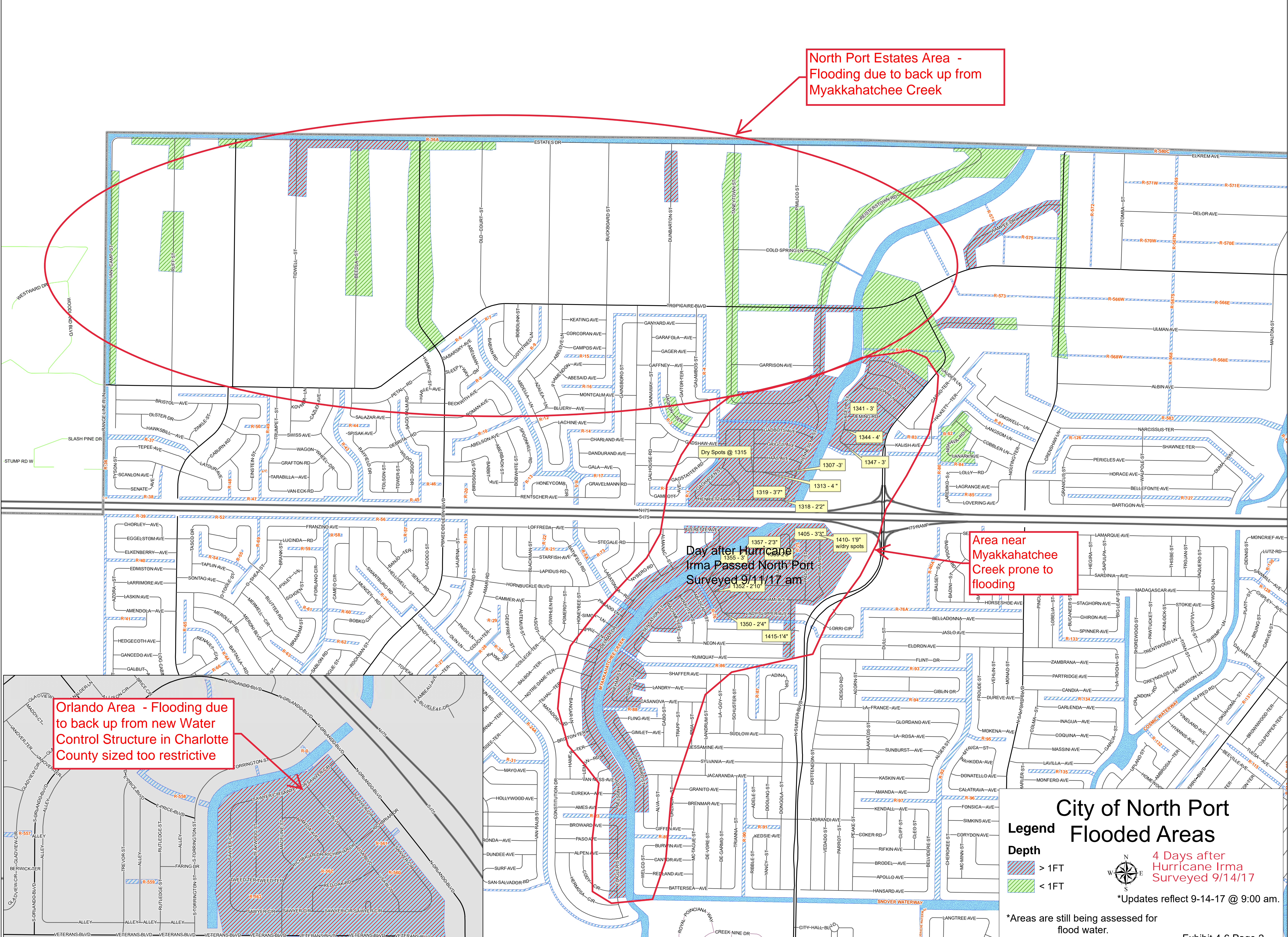
*Areas are still being assessed for flood water.

North Port Estates Area -
Flooding due to back up from
Myakkahatchee Creek

Area near
Myakkahatchee
Creek prone to
flooding

Day after Hurricane
Irma Passed North Port
Surveyed 9/11/17 am

Orlando Area - Flooding due
to back up from new Water
Control Structure in Charlotte
County sized too restrictive



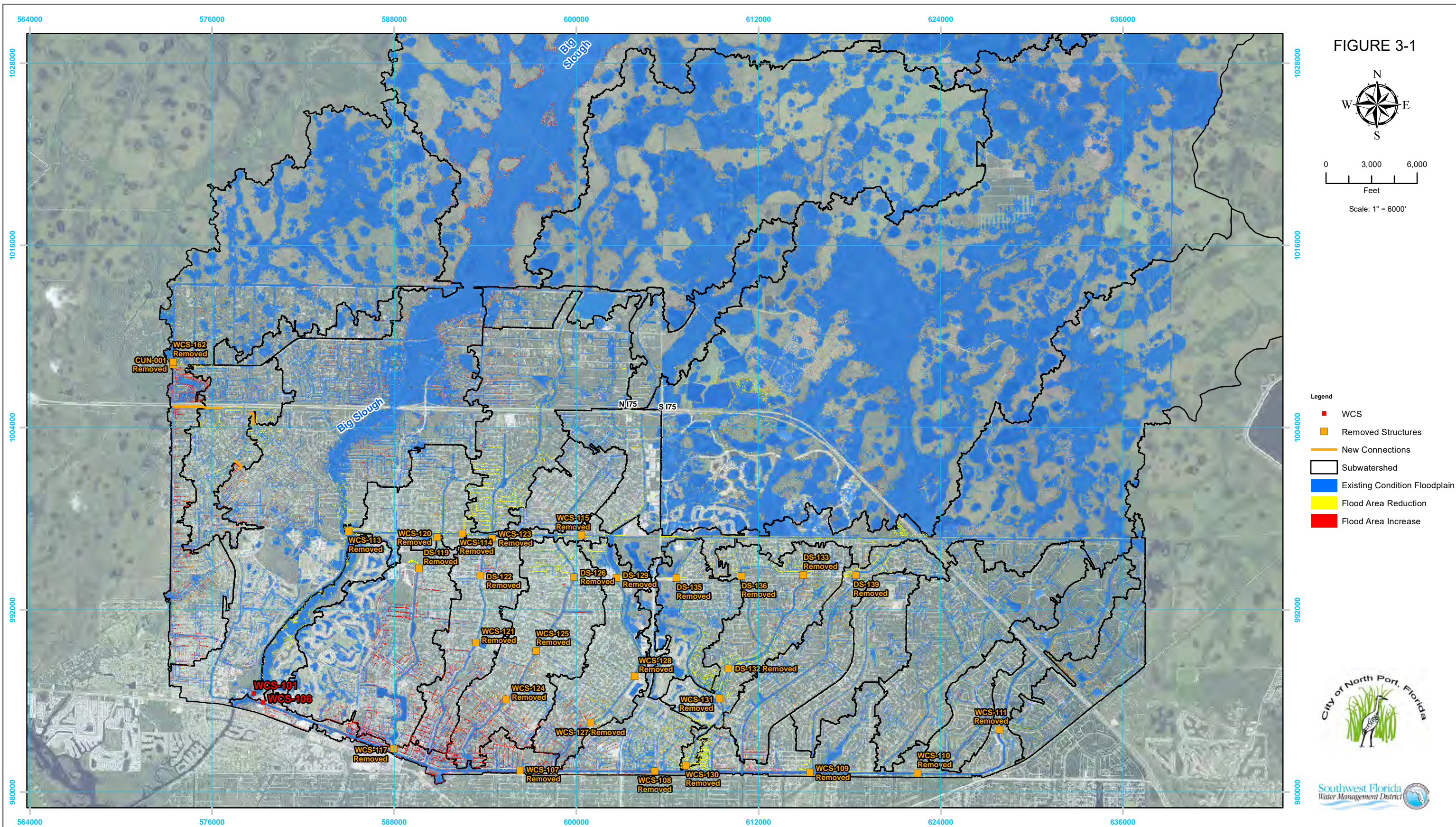
City of North Port
Legend Flooded Areas

Depth
 > 1FT
 < 1FT

4 Days after
Hurricane Irma
Surveyed 9/14/17

*Updates reflect 9-14-17 @ 9:00 am.

*Areas are still being assessed for
flood water.



Project: 03-065	Projection: Florida East West
Prepared: 10-11-07	Horizontal Datum: NAD83 Vertical Datum: N/A
Prepared by: CGG	Modified by: Modified:
File: \\03-065\ArcGIS\ArcLayouts\20140909 - Final BMP Figures\BMP1.mxd	

NORTH PORT / BIG SLOUGH WMP BMP ALTERNATIVE 1 - 1 DAY 100 YEAR EVALUATION

Ardaman & Associates, Inc.
 Geotechnical, Environmental and
 Materials Consultants
 Phone: 407-855-3860 Fax: 407-859-8121
 8008 South Orange Avenue
 Orlando, Florida 32809



II. SITUATION

A. Hazard Analysis

The City of North Port has exposure to numerous and diverse types of hazards. This Section will attempt to identify the threat posed by each to assist planners in anticipating future needs. The hazards are listed in the sequence identified by the Florida Division of Emergency Management (FDEM) CEMP Review Criteria.

Table 1: Hazard Analysis

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
High Winds from Tropical Cyclone Events	<p>The City of North Port has only been indirectly affected by a tropical cyclone event. However, The City of North Port (Port Charlotte statistical area) has been exposed to 54 hurricanes/tropical storms since 1871¹.</p> <p>The hurricanes of the 2004 and 2005 seasons had some minimal to moderate impact on the City. The City was included in the Presidential Declarations for Hurricanes Charley, Frances, Ivan, Jeanne (2004) and Wilma (2005); and Tropical Storm Gabrielle (2001). In 2008, the City activated for TS Fay, but quickly demobilized when the storm turned in a southerly direction missing the City. A comparable situation occurred in 2012 with Tropical Storm Isaac.</p>	<p>Injured and/or entrapped persons and the loss of life. Mass traffic congestion and other evacuation-related issues. Temporary and long-term sheltering needs. Private property loss. Damage to City infrastructure. Lost business revenue, with accompanying unemployment and loss of tax revenue. Fire, hazardous materials releases, search and rescue operations related to storm activity. Looting and increased crime due to economic conditions created by long-term recovery. Potential loss of water and/or sewer service.</p>	<p>A Gulf Coast landfall is one of the three most likely Florida hurricane tracks based on planning models. Among the hazards analyzed in this section, hurricane activities pose the greatest threat to the broadest population in North Port.</p>	Frequency	Low to Moderate
				Vulnerability	Low to Moderate
				Exposure	Moderate
				Risk	Moderate

¹ <http://www.hurricanecity.com/city/portcharlotte.htm>.

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	In September 2017, the City experienced minor disruptions because of Hurricane Irma. Power outages, localized flooding and vegetative debris were among the key impacts.				
Storm Surge from Tropical Cyclone Events (See Figure 1 Hurricane Evacuation Level, which are built from SLOSH models)	The City of North Port has never been affected by storm surge from a tropical cyclone; however, areas adjacent to the tributaries of the Myakka River are subject to tidal influences, which themselves are affected by storm surge.	Injured and/or entrapped persons and the loss of life. Mass traffic congestion and other evacuation-related issues. Temporary and long-term sheltering needs. Private property loss. Damage to City infrastructure. Lost business revenue, with accompanying unemployment and loss of tax revenue. Fire, hazardous materials releases, search and rescue operations related to storm activity. Looting and increased crime due to economic conditions created by long-term recovery. Potential loss of water and/or sewer service.	<p>Since the updated storm surge maps in 2017, all North Port is still in at least one storm surge zone. Areas west of I-75 are most susceptible; and the risk of storm zone increases in proximity to the Myakka River, and to the Gulf of Mexico.</p> <p>The Holiday Park Mobile Home community is in Evacuation Level B.</p> <p>Several City-owned critical infrastructures are also located in the storm surge areas:</p> <p><u>B Zone</u> - Utilities' Water Treatment Plant, Utilities' Wastewater Treatment Plant, Fire Station 82 and Police Department's District 2 substation, Family Service Center, Property Maintenance Yard (fueling station)</p> <p><u>C Zone</u> - Utilities' Hillsborough and Southwest water booster stations.</p> <p><u>D Zone</u> - Municipal Complex (City Hall, Fire Station 81, Police Department and Mullen's Center), Fire Stations 83, 84 and 85, Utilities' central office, Utilities' Northeast water booster station, Public Works Complex (fueling station)</p>	Frequency	Low to Moderate
				Vulnerability	Low to High
				Exposure	Moderate
				Risk	Moderate
Floods (See Figure 2)	At least 750 residences were affected for more than a week in the City due to continued major flooding on the Myakka River and Myakkahatchee Creek from the Spring Flooding Event of 2003.	Possible evacuation of residents. Temporary sheltering and congregate feeding. Evacuation traffic and traffic related to road closures. Property and infrastructure damage. Loss of business revenue. Possible search and rescue operations. Possible shutdown of water treatment facilities. Possible contamination of water systems. Possible waste water system overload.	Seasonal flooding is a re-occurring issue in Florida, most specifically for those areas which are near the Florida coast, adjacent to bays or inlets, or which contain river systems. Per the risk analysis of the Sarasota County Emergency Management, increased development causes an increase in flooding risk due to the interruption of the natural swamp	Frequency	Moderate to High
				Vulnerability	Low to High
				Exposure	Moderate
				Risk	Moderate

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
			<p>and marsh systems ability to mitigate the excess water. The City of North Port fits all the criteria of a flood prone area.</p> <p>The Community Rating System (CRS) is a set of flood mitigation initiatives set forth by the National Flood Insurance Program (NFIP), which allows participating communities to participate in and initiate programs which reduce the flood hazard in the community. For each initiative, there are points that can be awarded, which equate to a Class when enough points are gained by the community. The City of North Port is an active member of the Community Rating System under the National Flood Insurance Program. At this writing, the City of North Port stands at a Class 6 in the Community Rating System under the National Flood Insurance Program. This equates to a 15% saving on flood insurance for policy holders in the Special Flood Hazard Area (SFHA) in both the City and the County.</p>		
Hazardous Material Spills	<p>On February 2, 2004, a gasoline tanker traveling on I-75 exploded over the Myakkahatchee Creek bridge. An unknown amount of gasoline and diesel fuel entered the creek but was contained prior to reaching the main drinking water intake at the Water Treatment Plant.</p> <p>Two nearly identical gasoline tanker accidents occurred in 2016 on I75. Contamination was limited to the local area, however a threat to the City's drinking supply resulted in closure of the Water Treatment Plant and purchase of water from the Peace River system.</p>	<p>Area evacuation and related traffic issues. The possibility of significant numbers of people being injured or becoming ill due to the hazardous materials release. Temporary sheltering of evacuated residents. Adequate equipment and trained personnel for hazardous materials containment and disposal. Adequate disposal facilities. Possible contamination of surface water, and source water for the water treatment plant.</p>	<p>There are few end users of large amounts of industrial or agricultural chemicals and other hazardous materials in North Port. The only fixed facilities using Extremely Hazardous Substances (EHS), as defined by the US Environmental Protection Agency (EPA), are owned and operated by the City of North Port Utilities Department. Other fixed facilities subject to federal reporting have been identified and maintained in Fire Rescue's records' management system. Significant amounts of a wide variety of hazardous materials are transported on I-75. It is considered the leading risk area for hazardous materials incidents in the County. Significant amounts of hazardous materials transit through North Port on US 41.</p> <p>The Sarasota County Fire Department is first responding to hazardous materials incidents in the City of North Port.</p>	Frequency	Low
				Vulnerability	Moderate
				Exposure	Moderate
				Risk	Moderate
Commercial Nuclear Power Plant Incidents	<p>North Port is not within the Emergency Planning Zone or Ingestion Pathway Zone of a</p>	<p>North Port may receive a request to assist in furnishing mutual aid under provisions of the Florida Statewide Mutual Aid Agreement. Should an incident be of such magnitude as to require the evacuation of Tampa Bay,</p>	<p>Evacuees from a mishap at Florida Power Corporation nuclear generating facility at Crystal River, might arrive in Sarasota County seeking shelter.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	nuclear generating facility, thus is not considered at risk.	traffic control could be an issue.		Risk Low	
Civil Disturbance	The City of North Port has no history of civil disturbance.	The vulnerability of businesses on US 41 to looting. The possibility that North Port might be requested to furnish mutual aid.	The City does not face some of the challenges present in other Florida communities where conflict exists between cultural groups. Similarly, Sarasota County has had no recent incident of civil disorder of any significance.	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Mass Immigration	<p>There is no evidence that concerns caused by mass immigration has impacted the City of North Port. However, recent events along the Southwest coast of Florida indicate the potential for an event.</p> <p>In July 2007, 30 refugees from Cuba landed on Little Gasparilla Island; June 2007, 33 migrants from Cuba arrived on Sanibel Island; and in December 2006, 25 Cuban refugees landed on Longboat Key.</p>	<p>The City of North Port does not have a coastline for landings. However, if the refugees boated up the Myakka River or Myakkahatchee Creek, the City would be directly impacted.</p> <p>Otherwise, the City may provide mutual aid support to Charlotte and/or Sarasota counties for medical and/or law enforcement assistance.</p>	<p>While mass immigration to Florida from the Caribbean, Central America and South America has increased dramatically since 1980, the City is too far north and inland to directly receive arriving "boat people," and is not a likely settlement site.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Coastal Oil Spill	<p>The City of North Port does not include any portion of the Gulf of Mexico's coast. However, given the tidal influence on the Myakka River, if a spill were to occur in the Gulf, there exists a potential for product to flow up the Myakka River towards the City.</p> <p>The City of North Port was not impacted by the Deepwater Horizon oil spill in 2010 which affected numerous interests to the north of Sarasota County in the Gulf of Mexico.</p>	<p>Economic impact due to temporary loss of recreational activities in Charlotte Harbor. Furnishing mutual aid support to communities on Charlotte Harbor.</p> <p>Regarding proposed drilling off the Gulf coast of Florida, the US Department of the Interior's Minerals Management Service (MMS) states "[f]or the foreseeable future any proposed development operations within 100 miles of the coast of Florida would be only for the development of natural gas fields. Even if a blowout were to occur, no oil would be released. Any pipelines proposed would carry only dry natural gas." They do indicate one potential for a worse case situation would be if the supply vessel carrying diesel oil to the drilling rig lost all its diesel during transfer operations - this could result in a spill of about 1,800 bbl. The MMS can and has required mitigation</p>	<p>Traffic exists along Florida's Gulf Coast which could allow for a mishap to occur. The hazardous materials release could enter parts of Charlotte Harbor, but it is more likely that existing currents would move the release past the Harbor. A hazardous materials release in the Gulf would be responded to by Federal and State authorities. Public Works may receive mutual aid requests or be involved in environmental damage response to properties located on the Charlotte Harbor shoreline, City of Venice or unincorporated Sarasota and/or Charlotte counties.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low

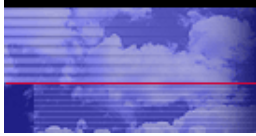
Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
		during past drilling operations to minimize this remote possibility.			
Extreme Temperatures	<p>Freeze conditions in Florida are seasonal and relatively predictable.</p> <p>Florida Severe Freeze 2000 for which Sarasota County was included in the declared counties.</p> <p>The last significant winter storm to occur in Sarasota County was the "no name" storm in March 1993.</p>	<p>Temporary sheltering of lower income persons whose homes may lack adequate heating capability. Increased utility costs to the City of North Port in maintaining City facilities with adequate heating for workers and the public.</p> <p>In 2012, a coalition of services for the homeless began to establish freezing weather shelters at local churches. These facilities open when the National Weather Service posts a freeze watch for our area.</p>	<p>There are few agriculture interests within the City which might suffer economic loss. Some temporary shortages of utility resources might take place. Potable water lines have frozen in past years causing a water service disruption to some houses.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Brush, Wildfires and Forest Fires	<p>Brush or forest fires are generally seasonable during late winter to spring and predictable based on weather conditions.</p> <p>Sarasota County was included in the declared counties for the Florida Extreme Fire Hazard in 1998.</p> <p>The largest wildfire in the City was experienced in May 2017 during which more than 1000 acres with the City's boundaries were burned and an additional 4000 acres just outside the City limits.</p>	<p>Wildland-Urban interface fuel loading is high, as compared to normal. Area evacuation and traffic control. Temporary sheltering of evacuees. Mutual aid support to other impacted communities, or requests for assistance to North Port.</p> <p>See Tables 3 and 4 Seasonal KBDI Values for Florida Forest Service's South Region and Sarasota County as a measure that conditions are favorable for the occurrence and spread of wildfires.</p>	<p>As the population density increases, the probability factor will decrease, but the impact factor will increase. The scattered development within the City, and the lack of land clearance, creates an environment in which many residences are grouped in relatively isolated areas surrounded by forested land. There is a history of arsonist activity in South Sarasota County. The possibility of an accidental fire caused by construction equipment, or controlled burning by contracts is a possibility.</p> <p>The City of North Port Fire Rescue participates in the Firewise program to mitigate the effects of wildfires. Four communities Harbor Isles, La Casa, Riverwalk Mobile Home Village, and Woodland Estates have met the requirements of the program.</p>	Frequency	Moderate to High
				Vulnerability	Moderate to High
				Exposure	Moderate to High
				Risk	Moderate to High
Thunder Storms and Tornadoes	<p>Heavy rains, winds and storm action are common in Florida.</p> <p>On May 24, 2012, an EF-0 tornado affected residences in the Highland Ridge Community of North Port. No injuries were</p>	<p>Possible area evacuation. Road blockage from debris. Temporary sheltering of small numbers of persons whose residences became significantly damaged by the storm or winds. The possible loss of water and/or sewer service.</p>	<p>North Port is not located in an area with a high incident of tornado activity. Tornadoes are common occurrences with thunderstorms. Florida has the second highest record of tornadoes in the United States.</p>	Frequency	Low
				Vulnerability	Low to Moderate
				Exposure	Moderate

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	<p>reported, but an estimated \$50,000 in damages was recorded.</p> <p>In January 2015, a Myakka State Forest Ranger reported tornado damage to a ranger station and a mobile home trailer at around 3:50 a.m. A subsequent NWS storm survey classified the tornado as an EF-0.</p>		<p>Given the number of mobile homes in the City and adjoining areas, there exists significant exposure should a tornado move through the region.</p>	<p>Risk</p> <p>Low to Moderate</p>	
Drought	<p>Droughts are occurring with frequency in Southwest Florida.</p> <p>The Keetch-Byram drought index typically indicates a severe value during the spring season.</p> <p>The US Drought Monitor indicates the State ranges from Abnormally to Exceptionally Dry, with Sarasota County on the upper scale of drought conditions.</p>	<p>Necessary slow-down in planned city projects due to water restrictions. Assistance to residents on well-water supply systems. Increased responses to wildfire events. Potential damage to residential and commercial structures, and City infrastructure.</p>	<p>Droughts generally impact the most on agricultural-based communities. Water restrictions and enforcement might be required. Droughts have an impact on wildfires.</p> <p>The Florida Forest Service has analyzed weather data over a 35-year period was examined to determine average Keetch-Byram drought index (KBDI) values for each region of Florida on a seasonal basis. These average KBDI values are given in the following table as the "NORMAL" classification. Departures from this average value were related to fire activity to determine the breakpoints for the other classes. (See tables 2 and 3).</p>	Frequency	Moderate to High
				Vulnerability	Moderate to High
				Exposure	Moderate to High
				Risk	Moderate to High
Sinkholes and Subsidence	<p>Sinkholes of a significant magnitude are an infrequent occurrence.</p> <p>Since July of 1981, Sarasota County and the jurisdictions within have recorded seven sinkhole events, all less than ten feet in diameter, and each was centered on a specific property. Of the seven Subsidence Incident Reports in Sarasota County, only one occurred in the last seven years. Reported on July 7, 2013 several small holes were reported after heavy rainfall. The</p>	<p>Property loss. Damage to the infrastructure. Area evacuation, closure, traffic control and security.</p>	<p>Allowing for the vastness of the City limits, the probability of a sinkhole development threatening property is very significant. Sinkhole development could require area security to prevent members of the public from risk.</p>	Frequency	Low
				Vulnerability	Low to Moderate
				Exposure	Low
				Risk	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	maximum dimensions were 2-8' wide with no property damage.				
Terrorism	There is no specific reason to believe that a terrorist type of occurrence is anticipated.	Potential mass casualties. Public panic. Environmental concerns.	One tactic of terrorists is to target "innocent" person rather than a specific group for which hostility exists. The news media would inundate the City should it be the focal point of an incident. The City does not possess targets of interest to an international terrorist; however, an individual with a hatred of local government, or a disgruntled employee may pose a greater risk to the security of City facilities, staff and visitors.	Frequency	Low
				Vulnerability	Moderate to High
				Exposure	Low
				Risk	Low
Exotic Pests and Diseases	The City of North Port has not had any known reports of such diseases or pests, but the threat exists on a consistent basis.	Infectious disease control. Quarantine for livestock or people. Need for many treatment agents. Disposal of deceased animals.	Exotic threats and diseases are a pervasive threat to the agricultural interests in the City. This biological hazard is associated with any insect, animal, or pathogen that could pose an economic or health threat. The Mediterranean fruit fly and citrus canker are two examples of this threat. There is also a possibility for the importation of pathogens that could have a negative effect on the livestock industry.	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Disease and Pandemic Outbreaks	<p>The City of North Port has not had any known reports of such diseases or outbreaks, but the threat exists on a consistent basis.</p> <p>The City of North Port was not significantly impacted by the H1N1 Pandemic in 2009 or the Ebola event of 2014.</p>	Economic loss. Mass casualty/fatality. Infectious disease control. Disproportionate effects on elderly and children. Disposal of diseased livestock/agricultural stock. Need for mass feeding. Mass care. Quarantine of people and/or livestock. Large number of treatment agents	The City is vulnerable to epidemic on a constant basis. Although the threat is minimal, an epidemic is still possible. With tourists coming in from all over the world during the months of October through April, there is an increased vulnerability during this time. The environment is regularly monitored for diseases and pathogens by local and state agencies.	Frequency	Low
				Vulnerability	Moderate
				Exposure	Low
				Risk	Low
Critical Infrastructure Disruption	<p>Utility disruptions are an infrequent event, typically arising from a severe weather event, an accidental cutting through of a transmission line by a contractor or nesting bird.</p> <p>On January 12, 2015 components of an osprey nest contacted high voltage wires which started a fire at the top of an electrical pole on Greenwood Avenue between</p>	Evacuation. Sheltering. Mass feeding. Mass casualty. Large scale contamination. Contamination of water supply. Decontamination. Economic loss. Agricultural loss. Inability of public safety officials to communicate. Civil unrest. Inability to provide critical support functions at medical facilities.	This technological hazard is a consistent threat in the City. This hazard may become present through an accident, sabotage, or terrorism. This hazard includes, but is not limited to, utility disruptions and communications system failures. This hazard can cause other hazardous incidents to occur. These may include, but are not limited to, hazardous material spills, delay of medical operations, and loss of ability to provide power or communications, and loss of ability to provide utility services.	Frequency	Low
				Vulnerability	Moderate
				Exposure	Low
				Risk	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	Greenway Drive and S. Sumter Boulevard in North Port. The fire caused damage to the feeder lines resulting in a secondary emergency – that of a power outage impacting 3,510 FPL customers including traffic lights at several intersections and the City of North Port municipal complex. Telephone lines to Sarasota County 9-1-1 were overwhelmed and callers were unable to reach the North Port Police dispatch center.				
Special Events	The City of North Port has no history of dignitary visits, cultural events, or a significant impact from spring break.	Public safety resources overwhelmed. Potential for terrorism, mass casualty, civil unrest.	<p>With Special Events, the need for additional logistics and manpower to handle the possibility of large crowds increases significantly. The possibility for acts of terrorism or civil disobedience in these events also increase.</p> <p>The North Port High School’s Performing Arts Center is the second largest theater in Sarasota County. With 1,023 seats, it presents unique challenges during an emergency.</p> <p>The City-sponsored July 4th celebration attracts more than 5,000 attendees.</p> <p>A spring training complex for the Atlanta Braves will be situated in the West Villages-section of the City. The stadium will have 6,200 fixed seats and 2,200 berm seating along with suites.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Dam Failure	The Peace River Manasota Regional Water Supply Authority has constructed a 6-billion-gallon reservoir adjacent to their water treatment plant on US 17 in Desoto County. As this is a relatively new facility, there is no history of incidents; however,	Possible evacuation of residents. Temporary sheltering and congregate feeding. Evacuation traffic and traffic related to road closures. Property and infrastructure damage. Loss of business revenue. Possible search and rescue operations. Possible shutdown of water treatment facilities. Possible contamination of water systems. Possible waste water system overload.	Based on the construction of the retention walls and the distance from the reservoir, the effects on the City of North Port may be minimal.	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	similar type reservoirs have experienced retention wall cracks, but no failures.				
Major Transportation Incidents	Motor vehicle accidents are a frequent occurrence on the roadways in North Port. However, most which are minor in nature, and have minimal impact on the City.	Traffic rerouting issues. Environmental impacts from release of hazardous materials.	In the City of North Port, I-75 extends from mile marker 171 (Charlotte County line) to 185 in an east to west direction. Exits are at mile marker 179 (Toledo Blade Blvd.), and mile marker 182 (Sumter Blvd.). This is a two-lane roadway in each direction, with a posted speed limit of 70 mph. US 41 extends from Cranberry Blvd. (Charlotte County line) to Ortiz Blvd. This is a two-lane roadway, with a posted speed limit of 45 mph. Significant amounts of a wide variety of hazardous materials are transported on I-75. It is considered the leading risk area for hazardous materials incidents in the County. Significant amounts of hazardous materials transit through North Port on US 41.	Frequency	Moderate
				Vulnerability	Moderate
				Exposure	Moderate
				Risk	Low to Moderate



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CRS What-If

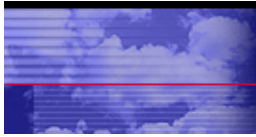
Application	CRS Coord.	2ndPOC	Activity Points	Chronology	Comments	What If	GTA
Community:	NORTH PORT, CITY OF	State:	FLORIDA				
County:	SARASOTA COUNTY <input type="button" value="v"/>	CID:	120279				

Current CRS Class = 5

[\[Printable Version\]](#)

		TOTAL	SFHA *	X-STD/AR/A99 **	PRP ***
	PIF	2,901	211	66	2,624
	PREMIUM	\$1,122,810	\$116,486	\$34,258	\$972,066
	AVERAGE PREMIUM	\$387	\$552	\$519	\$370
CRS Class					
09	Per Policy	\$3	\$37	\$29	\$0
	Per Community	\$9,669	\$7,766	\$1,903	\$0
08	Per Policy	\$6	\$74	\$29	\$0
	Per Community	\$17,435	\$15,531	\$1,903	\$0
07	Per Policy	\$9	\$110	\$29	\$0
	Per Community	\$25,201	\$23,297	\$1,903	\$0
06	Per Policy	\$12	\$147	\$58	\$0
	Per Community	\$34,870	\$31,063	\$3,806	\$0
05	Per Policy	\$15	\$184	\$58	\$0
	Per Community	\$42,635	\$38,829	\$3,806	\$0
04	Per Policy	\$17	\$221	\$58	\$0
	Per Community	\$50,401	\$46,595	\$3,806	\$0
03	Per Policy	\$20	\$258	\$58	\$0
	Per Community	\$58,167	\$54,361	\$3,806	\$0
02	Per Policy	\$23	\$294	\$58	\$0
	Per Community	\$65,933	\$62,126	\$3,806	\$0
01	Per Policy	\$25	\$331	\$58	\$0
	Per Community	\$73,698	\$69,892	\$3,806	\$0

- * SHFA (Zones A, AE, A1-A30, V, V1-V30, AO, and AH): Discount varies depending on class.
- ** SFHA (Zones A99, AR, AR/A, AR/AE, AR/A1-A30, AR/AH, and AR/AO): 10% discount for Classes 1-6; 5% discount for Classes 7-9.
- *** Preferred Risk Policies are not eligible for CRS Premium Discounts.



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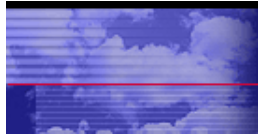
Insurance Occupancy

As of 09/02/2020

Community:	NORTH PORT, CITY OF	State:	FLORIDA
County:	SARASOTA COUNTY	CID:	120279

Overview	Occupancy	Zone	Pre/Post FIRM			
	Policies in Force	Premium	Insurance in Force	Number of Closed Paid Losses	\$ of Closed Paid Losses	Adjustment Expense
Single Family	2,826	\$1,077,149	\$866,308,900	87	\$992,284.74	\$46,011.85
2-4 Family	45	\$16,837	\$11,580,000	0	\$0.00	\$0.00
All Other Residential	17	\$5,414	\$4,638,000	1	\$0.00	\$95.00
Non Residential	13	\$23,410	\$5,225,000	0	\$0.00	\$0.00
Total	2,901	\$1,122,810	\$887,751,900	88	\$992,284.74	\$46,106.85

	Policies in Force	Premium	Insurance in Force	Number of Closed Paid Losses	\$ of Closed Paid Losses	Adjustment Expense
Condo	40	\$13,488	\$7,435,000	1	\$0.00	\$95.00
Non Condo	2,861	\$1,109,322	\$880,316,900	87	\$992,284.74	\$46,011.85
Total	2,901	\$1,122,810	\$887,751,900	88	\$992,284.74	\$46,106.85



Insurance Zone

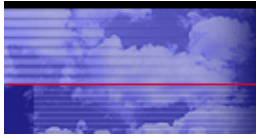
As of 09/02/2020

Community:	NORTH PORT, CITY OF	State:	FLORIDA
County:	SARASOTA COUNTY	CID:	120279

Overview	Occupancy	Zone	Pre/Post FIRM
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	Policies in Force	Premium	Insurance in Force	Number of Closed Paid Losses	\$ of Closed Paid Losses	Adjustment Expense
A01-30 & AE Zones	165	\$99,720	\$39,746,400	24	\$88,191.55	\$6,860.00
A Zones	1	\$531	\$350,000	0	\$0.00	\$0.00
AO Zones	5	\$4,652	\$992,300	4	\$3,881.50	\$1,915.00
AH Zones	0	\$0	\$0	0	\$0.00	\$0.00
AR Zones	0	\$0	\$0	0	\$0.00	\$0.00
A99 Zones	0	\$0	\$0	0	\$0.00	\$0.00
V01-30 & VE Zones	0	\$0	\$0	0	\$0.00	\$0.00
V Zones	0	\$0	\$0	0	\$0.00	\$0.00
D Zones	0	\$0	\$0	0	\$0.00	\$0.00
B, C & X Zone						
Standard	66	\$34,258	\$17,198,800	7	\$31,883.44	\$2,175.00
Preferred	2,624	\$972,066	\$818,600,000	25	\$147,952.69	\$12,365.00
Total	2,861	\$1,111,227	\$876,887,500	60	\$271,909.18	\$23,315.00

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Insurance Pre/Post FIRM

As of 09/02/2020

Community:	NORTH PORT, CITY OF	State:	FLORIDA
County:	SARASOTA COUNTY	CID:	120279

Overview	Occupancy	Zone	Pre/Post FIRM
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Pre-FIRM

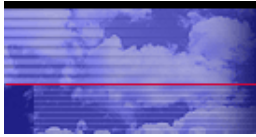
	Policies in Force	Premium	Insurance in Force	Number of Closed Paid Losses	\$ of Closed Paid Losses	Adjustment Expense
A01-30 & AE Zones	61	\$56,393	\$12,354,600	23	\$88,191.55	\$6,735.00
A Zones	0	\$0	\$0	0	\$0.00	\$0.00
AO Zones	1	\$1,042	\$350,000	0	\$0.00	\$0.00
AH Zones	0	\$0	\$0	0	\$0.00	\$0.00
AR Zones	0	\$0	\$0	0	\$0.00	\$0.00
A99 Zones	0	\$0	\$0	0	\$0.00	\$0.00
V01-30 & VE Zones	0	\$0	\$0	0	\$0.00	\$0.00
V Zones	0	\$0	\$0	0	\$0.00	\$0.00
D Zones	0	\$0	\$0	0	\$0.00	\$0.00
B, C & X Zone	236	\$86,083	\$60,221,000	19	\$39,660.41	\$4,965.00
Standard	32	\$15,268	\$8,292,000	7	\$31,883.44	\$2,175.00
Preferred	204	\$70,815	\$51,929,000	12	\$7,776.97	\$2,790.00
Grand Total	298	\$143,518	\$72,925,600	42	\$127,851.96	\$11,700.00

Post-FIRM

	Policies in Force	Premium	Insurance in Force	Number of Closed Paid Losses	\$ of Closed Paid Losses	Adjustment Expense
A01-30 & AE Zones	104	\$43,327	\$27,391,800	1	\$0.00	\$125.00

Insurance Pre/Post FIRM

A Zones	1	\$531	\$350,000	0	\$0.00	\$0.00
AO Zones	4	\$3,610	\$642,300	4	\$3,881.50	\$1,915.00
AH Zones	0	\$0	\$0	0	\$0.00	\$0.00
AR Zones	0	\$0	\$0	0	\$0.00	\$0.00
A99 Zones	0	\$0	\$0	0	\$0.00	\$0.00
V01-30 & VE Zones	0	\$0	\$0	0	\$0.00	\$0.00
V Zones	0	\$0	\$0	0	\$0.00	\$0.00
D Zones	0	\$0	\$0	0	\$0.00	\$0.00
B, C & X Zone	2,454	\$920,241	\$775,577,800	13	\$140,175.72	\$9,575.00
Standard	34	\$18,990	\$8,906,800	0	\$0.00	\$0.00
Preferred	2,420	\$901,251	\$766,671,000	13	\$140,175.72	\$9,575.00
Grand Total	2,563	\$967,709	\$803,961,900	18	\$144,057.22	\$11,615.00



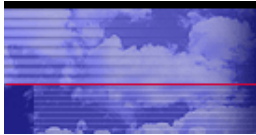
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Insurance Overview

As of 09/02/2020

Community:	NORTH PORT, CITY OF	State:	FLORIDA
County:	SARASOTA COUNTY	CID:	120279

Overview	Occupancy	Zone	Pre/Post FIRM
Total by Community		Group Flood Insurance	
Total Number of Policies:	2,901	Total Number of Policies:	0
Total Premiums:	\$1,122,810	Total Premiums:	\$0
Insurance in Force:	\$887,751,900	Insurance in Force:	\$0
Total Number of Closed Paid Losses:	88	Total Number of Closed Paid Losses:	0
\$ of Closed Paid Losses:	\$992,285	\$ of Closed Paid Losses:	\$0
Post Firm Minus Rated Policies		Manufactured Homes	
Total Number of Minus Rated Policies:	0	Total Number of Policies:	12
A Zone Minus Rated Policies:	0	Total Number of Closed Paid Losses:	0
V Zone Minus Rated Policies:	0	\$ of Closed Paid Losses:	\$0
ICC		1316	
Total Number of ICC Closed Paid Losses:	0	Number of Properties by Community:	0
\$ of ICC Closed Paid Losses:	\$0		
Substantial Damage Losses			
Number of Substantial Damage Closed Paid Losses:	7		



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Community:	NORTH PORT, CITY OF	State:	FLORIDA
County:	SARASOTA COUNTY	CID:	120279

Program:	Regular	Emergency Entry:	08/27/1974	Regular Entry:	09/02/1981
Status:	PARTICIPATING	Status Effective:	09/02/1981		
Current Map:	11/04/2016	Study Underway:	NO	Level of Regs:	D
FIRM Status:	ORIGINAL	Initial FIRM:	09/02/1981		
FHBM Status:	SUPERCEDED BY FIRM	Initial FHBM:	06/10/1977		
Probation Status:					
Probation Effective:		Probation Ended:			
Suspension Effective:		Reinstated Effective:			
Withdrawal Effective:		Reinstated Effective:			
CRS Class / Discount:	05 / 25%	Policies in Force:	2,901		
Effective Date:	05/01/2020	Insurance in Force:	\$887,751,900.00		
CAV Date:	12/13/2018	Workshop Date:	03/04/2020	No. of Paid Losses:	88
CAC Date:	11/07/2017	GTA Date:	07/20/2020	Total Losses Paid:	\$992,284.74
<input type="checkbox"/> Tribal	Community Website: http://www.cityofnorthport.com		Sub. Damage Claims Since 1978:	7	
<input type="checkbox"/> Upton Jones Claims		<input type="checkbox"/> HMGP Projects			
<input type="checkbox"/> ICC Claims		<input type="checkbox"/> FMA Projects			

Table 10: Vulnerabilities by Population and Property Loss

Residential Non-Residential / Population / Valuation Information in Storm Evacuation Zones and FEMA Hazardous Zones

Evacuation Zones	Non-Residential	Residential		Total Units	Total Potential Property Value Loss	Residential Population (Units *2.65)
	Units	Potential Property Value Loss	Units			
A	4	\$2,800,300	289	293	\$50,216,100	766
B	209	\$245,514,000	4,394	4,603	\$610,020,800	11,644
C	11	\$12,962,000	8,777	8,788	\$1,290,643,000	23,259
D	95	\$269,482,000	12,693	12,788	\$2,218,415,600	33,636
E	137	\$74,981,300	2,629	2,766	\$557,499,200	6,967
Grand Total	456	\$605,739,600	28,782	29,238	\$4,726,794,700	76,272

FEMA Zone	Non-Residential	Residential		Total Units	Total Potential Property Value Loss	Residential Population (Units *2.65)
Units	Potential Property Value Loss	Units	Potential Property Value Loss			
FEMA AE Zone	92	\$384,014,800	6,122	6,214	\$1,352,214,200	16,223

Notes:

Known units not currently on 2017 taxroll is estimated values and included in unit counts.

Residential Units include individual Condo Units.

Residential Units only count one per apartment complex.

Total Value Loss includes total value of apartment complex.

Non-Residential includes individual Business Condo Units.

Centers under one ownership is counted as one unit and includes total value complex.

All data is based on GIS Data (August 2017): Surge Zones, FEMA A / AE Zone, Sarasota County Property Apprasier Parcels and Attribute tables.

The 2.65 multiplier is the average household size.

The valuation is from the JUST value from the Preoperty Appraisers Office data (2017 Tax Role).

D. Economic Characteristics

1. Economic Profile

- a. Employment by Major Sector. Most residents are employed in the service sector or government – 32% are retired.
- b. Unemployment Rate. Per the US Bureau of Labor Statistics, the unemployment rate for the North Port-Bradenton-Sarasota Metropolitan Statistical Area (MSA) in the spring of 2018 was 3.6%.
- c. Average Property Value. \$192,800
- d. Median Income. \$49,465

Exhibit 8-1

2020 Water Control Structures Inspection

Metal, Gates, Pipes and Risers: 1 = No Corrosion, 2 = Surface Rust, 3 = Some Rot, 4 = Major Corrosion Overall: 1 = Good, 2 = Fair, 3 = Poor, 4 = Bac
 Concrete: 1 = Good, 2 = Few chips/cracks, 3 = Some Spalling, 4 = Major Chips/Cracks Deterioration Bank Condition: 1 = Good, 2 = Fair, 3 = Poor, 4 = Bac
 Structure Location: Replaced or Rehabilitated = 0, Structure located in undeveloped areas (1), east of Toledo Blade (2), west of Toledo Blade (3), developed areas Snover & Cocoplum (4)

Structure #	Waterway	Date	Metal			Gates				Pipes	Risers	Concrete		Bank Condition	Overall	Structure Location	Replacement Priority Score	Other Observations	Previous Repairs Completed
			Sheet Piling	I-Beams	Catwalk	# of Gates	Gate	Hardware	Operational (yes, no, list#)			Columns	Cap						
WCS 108	Cocoplum	3/18/20	4	3	1	6	1.5	1.5	No			4		2.5	4	4	14	Holes in sheet pile, concrete pillars bad shape, gates do not open all of the way. Needs replacement.	4/2011 - Replaced 3 Gates Nos. 1, 2 and 5 9/7/12 - Replace corroded horizontal I-beams and corroded sections of vertical I-beams, and repair holes in sheet metal pile. 12/17/15 - Replaced 3 more Gates (including the existing electric gate). Use an existing actuator (from the old WCS 101). Needed two new left hand threaded rods, fabricate 3 new gates #3, 4, and 6 and tracks, minor concrete and sheet pile repair. 1/30/19 PO #047665 - Fixed catwalk grate rusted through in one location.
WCS 113	Snover	3/16/20	3	2	2	4	2	2	Yes			4		2.5	3	4	12	Hole in sheet pile by I beam on walkway, top of sheet pile is rotted out, needs more rip rap, rebar is showing in concrete pillar 3.	7/28/14 - Repaired erosion below existing concrete slab on the northwest side of WCS No. 113 by injecting flowable fill (cementitious grout) to fill all voids
WCS 114	Snover	3/16/20	2	2	2	4	2	2	Yes			4		2	3	4	10.5	Holes in catwalk I beam, concrete columns chipped.	5/12 - Replaced all 4 gates with new steel gates epoxy coated, replace all gate supports, gate slide frameworks, both horizontal I-beams and replaced corroded section of vertical I-beams, rebuilt corroded sections of all 4 lift rods 9/30/15 - Troubleshoot why gates nos. 1 and 2 not opening easily, replace corroded or bent sections of lift rods as needed; if needed, remove and replace 1 gear box with existing gear box at the public works facility; remove corroded first 14 feet long sections of two-strand horizontal and vertical catwalk railing (both sides of railing) and weld on new galvanized steel two-strand horizontal and vertical railing and paint. 12/2016 - Repaired damage to gate, tracks and gear 1/30/19 Fixed PO #047665 - Fixed hole in S. side sheet piling. Repaired Gate #2 as it does not close all the way down, need to physically hammer gate down
FW 157	Snover	3/24/20	4	4								4		2	4	2	8	Needs to be dug out and replaced.	
FW 158	Snover	3/25/20	1	1								1.5		2	4	2	8	Washout high side, concrete separated from sheet pile.	
WCS 121	MacCaughey	3/16/20	2	4	2	4	3	3	1&4 Yes 2&3 No			3	2	2	2.5	3	7.5	Washout on low side, I beams rotted out on low side, concrete slab is chipped, support bars rotted at water level.	
WCS 128	Creighton	3/17/20	2.5	1.5	1	2	3	2	Gate 1 No Gate 2 yes			2		1	2	3	6	Hole in gate 1, chips in concrete, hole in sheet pile by support bar.	9/14/12 - Replace corroded horizontal cap and corroded sections of vertical I-beams
WCS 127	Creighton	3/17/20	2.5	1	2	2	2	2	Yes			2		2	2	3	6	Washouts on low side, concrete pillars chipped and cracked, some hardware rusted.	1/30/19 PO#047665 - Repaired hole in Vertical beams and repaired hole in sheet piling by support bar

2020 Water Control Structures Inspection

Metal, Gates, Pipes and Risers: 1 = No Corrosion, 2 = Surface Rust, 3 = Some Rot, 4 = Major Corrosion Overall: 1 = Good, 2 = Fair, 3 = Poor, 4 = Bac
 Concrete: 1 = Good, 2 = Few chips/cracks, 3 = Some Spalling, 4 = Major Chips/Cracks Deterioration Bank Condition: 1 = Good, 2 = Fair, 3 = Poor, 4 = Bac
 Structure Location: Replaced or Rehabilitated = 0, Structure located in undeveloped areas (1), east of Toledo Blade (2), west of Toledo Blade (3), developed areas Snover & Cocoplum (4)

Structure #	Waterway	Date	Metal			Gates				Pipes	Risers	Concrete		Bank Condition	Overall	Structure Location	Replacement Priority Score	Other Observations	Previous Repairs Completed
			Sheet Piling	I-Beams	Cat walk	# of Gates	Gate	Hardware	Operational (yes, no, list#)			Columns	Cap						
WCS 124	Lagoon	3/16/20	2	2	3	4	2	2	1 No 2,3,4 Yes			3		2	2	3	6	Washout on low side, walkway I beam rotting out, gate 1 needs track and door.	6/13/12 - Remove gate sill bottoms as these are corroded and prevent gate from closing and replace angles welded to gate bottoms 11/6/15 - Replace track guide systems for 3 gates and change anchors in track guide systems; clean and lubricate all 3 lift rods for gates; for all 3 tie rods, weld new equivalent 3 ft sections; replace 3 ft corroded sections of weir vertical I-beams at both side banks and encase new sections of I-beam in concrete; repair hole in sheet piling, install 3 new gates. 1/30/19 PO #047665 - Repaired holes in east side sheet piling and repaired vertical I-Beam. Retrofit surplus actuator in place of non-working actuator
WCS 118	Blueridge	3/16/20	2	4	2	2	2	2	Yes			2		1	2	3	6	Both I beams rotted out, gate 1 needs door and track.	9/12/13 - Replace corroded sections of horizontal and vertical railing 6/4/18 - Replaced I Beam, inspect gear box, clean rod, maintain tracks, maintain gate 1/30/19 PO #047588 - Replaced both horizontal I-beam webs that had holes. Repaired tracks for Gate #2 as it does not close all the way down. Maintained gear box and rod.
WCS 117	Blueridge	3/16/20	2	3	2	2	2	2	Yes			2		1	2	3	6	Missing 2 nuts on track.	
WCS 138	New Castle	3/19/20	3	1.5	1	2	1.5	1.5	Yes			2.5		1.5	3	2	6	Sheet pile rotted out all along top, concrete slab broken from washout, support bars are bent.	8/07 - Replace gates and corroded members. Washout by walkway fixed
WCS 110	Cocoplum	3/20/20	3	3	1	6	2.5	2.5	Yes			1.5		2	3	2	6	Hole in sheet pile.	1/30/19 PO #047665 Fixed top bars in gate frames very corroded, one hole behind I-beam
FW 160	Snover	3/25/20	2	1								4		2	3	2	6	Concrete separated from sheet pile, cement cracked.	
FW 155	Snover	3/24/20	2	4								2		2	3	2	6	Cracks in concrete, concrete slab broken, I beam rusted and rotted, needs to be cleared of vegetation	
FW 159	Snover	3/25/20	1	2								2		1	3	2	6	Washout, concreted separated from sheet pile.	

2020 Water Control Structures Inspection

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 Structure Location: Replaced or Rehabilitated = 0, Structure located in undeveloped areas (1), east of Toledo Blade (2), west of Toledo Blade (3), developed areas Snover & Cocoplum (4)

Structure #	Waterway	Date	Metal			Gates				Pipes	Risers	Concrete		Bank Condition	Overall	Structure Location	Replacement Priority Score	Other Observations	Previous Repairs Completed
			Sheet Piling	I-Beams	Cat walk	# of Gates	Gate	Hardware	Operational (yes, no, list#)			Columns	Cap						
WCS 130	Bass Point	3/19/20	3	1.5	1	2	2	2	Yes			2	4	2.5	2	5	Washout on low side	8/07 - Replaced gates and corroded horizontal channels. 6/4/18 - Replaced I-Beam, inspect gear box, clean rod, maintain tracks, maintain gate 1/30/19 PO #047588 - Replaced I-beam webs that had holes. Repaired tracks. Maintained gear box and rod.	
WCS 131	Bass Point	3/19/20	2.5	1	1	2	4	4	1 No 2 Yes			3	1	2.5	2	5	Ok besides gate 2 not working.	9/25/13 Replaced corroded horizontal support beams and corroded sections of tie rods and vertical I-beams on both west and east sides of the structure, patched a small leak in the sheet metal piling and welded new boxes for both gate stems. 8/07 - Weld boxes on gate stems on each gate.	
WCS 137	New Castle	3/19/20	2.5	1	1	2	1	1	Yes			2	2	2.5	2	5	All good	8/07 - Replace gates and corroded members. 6/4/18 - Replace I Beam, Inspect Rod, clean and repair any bad threads, Gear box- open, replace any bad bearings, check key ways in gear drives. Check brass lifting bushing. Tracks, replace spacer bars as needed or tracks as needed. Adjust, clean and inspect door for proper operation. 1/30/19 PO #047588 - Replaced both horizontal I-beams which have rotted off.	
WCS 111	Cocoplum	3/26/20	2.5	2	1	4	2	2	Yes			1.5	4	2.5	2	5		9/12/12 - Replaced corroded horizontal I-beam and corroded sections of vertical support for "cat walk" 1/30/19 PO #047665 - Fixed top bars in gate frames that was corroded 1/30/19 - Fixed W. downstream bank minor erosion.	
FW 122	MacCaughey	3/17/20	2									1	1	1.5	3	4.5	Cracked concrete		
FW 506	Crestwood	3/20/20	2							1		1	2	1.5	3	4.5	All good		
FW 507	Flamingo	3/20/20	2							2		1	1	1.5	3	4.5	All good		
FW 123	MacCaughey	3/17/20	1.5									1	1.5	1.5	3	4.5	Broke off concrete due to washout.		
FW 120	Blueridge	3/17/20	1.5	1.5									1.5	1.5	3	4.5	2 washouts 1 each high and low side, no concrete cap, sheet pile rusted, I beam rotted.		

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 Structure Location: Replaced or Rehabilitated = 0, Structure located in undeveloped areas (1), east of Toledo Blade (2), west of Toledo Blade (3), developed areas Snover & Cocoplum (4)

Structure #	Waterway	Date	Metal			Gates				Pipes	Risers	Concrete		Bank Condition	Overall	Structure Location	Replacement Priority Score	Other Observations	Previous Repairs Completed
			Sheet Piling	I-Beams	Cat walk	# of Gates	Gate	Hardware	Operational (yes, no, list#)			Columns	Cap						
DS 119	Blueridge	3/25/20								1	1.5	1.5	1.5	1	1.5	3	4.5	Pipe downstream rotted.	1/30/19 - Fixed sidewalk washing out.
DS 126	Lagoon	3/17/20								1	1	1	1	2	1.5	3	4.5	Guardrail damaged, starting to washout.	1/30/19 - Fixed erosion of rip rap bank near guardrail
WCS 106	Cocoplum		1	1	1	8	1	1				1	1	1	1	4	4		Replacement under construction April 2019 to May 2020
FW 154	Snover	3/24/20	2	4									2	2	2	2	4	Cracks in concrete, I beam rotted out, needs to be cleared of vegetation.	
FW 161	Snover	3/25/20	1	1									3	1	2	2	4	Concrete separated from sheet pile, cement cracked.	4-16-19 - Dead cabbage palm removed
DS 508	Auburn	3/18/20								1		1	1	1	2	2	4	Needs new grate	4/5/19 Uretek chemical foam grout seal used to repair wash out under fabriform and hole near roadway guardrail
GDS 116	Snover	3/25/20			2	1	4	4	No	4	4			4	4	1	4	Need replaced, gate rotted, holes in pipe.	
GDS 141	Bethlehem	3/23/20			1	1	1	4	No	4	4			1	4	1	4	Holes in pipe, grate in the mud.	
GDS 142	Littlefield	3/23/20			1	1	4	4	No	4	4			4	4	1	4	Needs replaced, walkway good.	1/30/19 - Removed massive amount of dead willows and debris clogging structure. Repaired bank erosion. Remove toy car in upstream
GDS 143	Newman	3/25/20			2	1	1	2	Yes	4	4			1	4	1	4	Holes in pipes, handrail corroded, washout on bank.	
WCS 125	Lagoon	3/16/20	2	2	3	4	2	2	1&4 Yes 2&3 No			2		3	1	3	3	Washout on low side, I beam on walkway rusted out.	6/13/12 - Remove gate sill bottoms as these are corroded and prevent gate from closing and replace angles welded to gate bottoms
FW 129	Creighton	3/18/20	1							3.5		1	1	1	1	3	3	Pipes corroded and sheet pile rusted	1/30/19 Fixed - Remove fabric and debris over downstream pipes
WCS 162	R - 36	3/16/20	1		1	1	1	1	Yes	1		1	1	2	1	3	3	Washout far side of structure and beside pipe	6/4/15 Repaired erosion below existing concrete slab on the northwest side of WCS No. 113 by injecting flowable fill (cementitious grout) to fill all voids 1/20/10 - Removed willows in R-36 and fixed rip
FW 136	Blue Waters	3/18/20	1.5							2		1	1	1	1.5	2	3	Downstream pipes corroded, need to be replaced.	
WCS 140	Bethlehem	3/23/20	3.5	1	1	2	1	1	Yes			1.5		1	3	1	3	Hole in sheet pile, washout on low side.	12/2017 - Repair one horizontal I beam, Repair one Vertical I beam, Replace gate #1, Replace gate #2 1/30/19 - Fixed Horizontal I-beam that has fallen

2020 Water Control Structures Inspection

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Structure #	Waterway	Date	Metal			Gates				Pipes	Risers	Concrete		Bank Condition	Overall	Structure Location	Replacement Priority Score	Other Observations	Previous Repairs Completed
			Sheet Piling	I-Beams	Cat walk	# of Gates	Gate	Hardware	Operational (yes, no, list#)			Columns	Cap						
FW 151	Snover	3/24/20	1	1								1	1	1	2	2	Minor crack in concrete upstream		
FW 152	Snover	3/24/20	1	1								1	1	1	2	2	Crack in concrete, concrete separating from sheet pile, needs to be cleared of heavy vegetation and trees.		
FW 153	Snover	3/24/20	1	1								1	1	1	2	2	Concrete separated for sheet piling, sheet pile rusted in the middle of structure, needs to be cleared of vegetation.		
FW 156	Snover	3/24/20	1	1								1	1	1	2	2	Cracks in concrete, 1 beam rotted out, needs to be cleared of vegetation.		
DS 510	Courtland	3/18/20								1		1	1	1	2	2	All good	1/30/19 - Small "island" downstream in Charlotte County removed.	
GDS 512	Pellam	3/18/20			1	2	1	1	Yes			1		2	1	2	2	All good	
FW 180	Lion Heart	3/20/20	2							1.5		1	1	2	1.5	1	1.5	Sheet pile rusted, pipes are good, island on Charlotte County side.	
FW 181	Sunset	3/20/20	2							1		1	1	1	1.5	1	1.5	Island on Charlotte County side.	
FW 183	Morning Star	3/20/20	1.5							2.5			1	1	1.5	1	1.5	Pinhole in sheet pile	
FW 182	Dorchester	3/20/20	1.5							1		1	1	1.5	1	1	1	Sheet pile rusting	
FW 185	Elkcam	3/24/20	1							1			1	1	1	1	1	All good	
FW 186	Fordham	3/25/20	1							1			1	1	1	1	1	All good	
WCS 101	Myakkahatchee	3/16/20	1	1	1	6	1	1	Yes			1	1	1	1	0	0	Hydraulic leak on gate 2.	5/9/14 - Completed replacement of existing structure with new structure, two additional gates for a total of 6 gates, gate automation and telemetry
WCS 107	Cocoplum	3/17/20	1	1	1	6	1	1	Yes			1	1	1	1	0	0	All good	Jan 2011 - Retrofitted with concrete weir wall, 6 new stainless steel gates, concrete spillway and large revetment.
WCS 109	Cocoplum	3/18/20	1	1	1	6	1	1	Yes			1	1	1	1	0	0	All good	12/17/2015

2020 Water Control Structures Inspection

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Structure #	Waterway	Date	Metal			Gates				Pipes	Risers	Concrete		Bank Condition	Overall	Structure Location	Replacement Priority Score	Other Observations	Previous Repairs Completed
			Sheet Piling	I-Beams	Catwalk	# of Gates	Gate	Hardware	Operational (yes, no, list#)			Columns	Cap						
WCS 115	Snover	3/16/20	1	1	1	4	1	1	Yes			1	1	1	1	0	0	Missing Light.	8/31/18 - Completed replacement of existing structure with new structure, 4 automated gates with remote telemetry control
FW 132	Bass Point	3/19/20	1							1		1	1	1	1	0	0	All good	5/2011 - Severely corroded corrugated metal pipes CMP, erosion and undermining of side banks. Replace with open concrete weir and RCP culvert pipes.
FW 133	Bass Point	3/19/20	1							1		1	1	1	1	0	0	All good	11/2014 - Severely corroded corrugated metal pipes CMP, erosion and undermining of side banks. Replace with open concrete weir and RCP culvert pipes.
FW 135	Twin Lakes	3/17/20	1							1		1	1	1	1	0	0	All good	8/2009 Replaced concrete drop structure with concrete open weir replaced as part of the Toledo Blade widening project
FW 139	New Castle	3/19/20	1							1		1	1	1	1	0	0	Washout by structure, pipe separated from other pipe.	4/2012 Severely corroded corrugated metal pipes CMP, erosion and undermining of side banks. Replaced with open concrete weir and RCP culvert pipes.
DS 503	Apollo	3/17/20								2		1	1	1	1	0	0	All good	9/2009 Corroded Triple 72" Diameter CMP drop pipes structure and culvert replacement with concrete box structure with fiberglass skimmer and triple 72" concrete RCP and headwall.
DS 504	Jupiter	3/17/20								2		1	1	1	1	0	0	Skimmer down, needs to be placed back up.	8/2009 Corroded Triple 72" Diameter CMP drop pipes structure and culvert replacement with concrete box structure with fiberglass skimmer
DS 501	Cheshire	3/17/20								1					1	0	0	All good	7/2009 Rebuilt covered concrete structure and replaced corroded 60' diameter CMP pipe with 60" RCP.

GDS 112	Cocoplum	3/25/20			none	none	none	none	No	none	none			4	4	1		No catwalk, no gate.	Drop structure with 1 gate destroyed in storm in 9/13/16 and removed in 2017. Only horizontal culvert pipes left in place. Will need perform hydraulic modeling and obtain approval from SWFWMD not to replace structure.
CRE 5.09		3/18/20	None							1		1	1	1	4	2		2 box Culverts with deteriorated weir connecting Cocoplum with Charlotte County Crestville Waterway. No work	Was weir replacement done? Not fixed.

Structure priority for replacement is based on the following in order with the largest score:

- Column R - Replacement Priority Score
- Column Q - Structure Location
- Column D - Sheet Piling condition
- Column M - Concrete Column condition
- Column N - Concrete Cap condition
- Column E - I-Beams condition
- Column A - Structure No.

**Water Control Structures (WCS) Completely Rehabilitated or Replaced
As of 11/30/20**

Item	Water Control Structures	Waterway	Location	Rehab Issues	Project Start Date	Engineering / Permitting/Other or non-Construction Costs	Actual Construction Costs Includes Contingency Spent	Total Final Design and Construction Cost Spent	Engineering Consultant / P.E.	Contractor / Supervisor	Project Status	City Project Manager	Comments
1	WCS 109	Cocoplum	East of San Mateo	Severe metal sheet piling corrosions, gates, two gates will not open. Retrofit with concrete weir wall and 6 new stainless steel gates and concrete spillway and large revetment.	Started Design in 2007	\$49,594.36	\$311,650.00	\$361,244.36	KHA / Nathan Lee Seth Schmid	Keesling Construction Inc. / Klint Keesling	Completed Sept 2009	Elizabeth Wong	
2	DS 501	Cheshire	Chancellor Between Sumter and North Port Blvd	Rebuilt covered concrete structure and replaced corroded 60" diameter CMP pipe with 60" RCP.	Started Design in 2006	\$16,622.67	\$77,488.37	\$94,111.04	DRMP / Scott Garth	Southwest Utilities Systems Inc / Rick Mauch	Completed July 2009	Elizabeth Wong	Charlotte County and City of North Port split cost 50/50. John elias is Charlotte County Project manager
3	DS 504	Jupiter	Chancellor Just east of Salford	Corroded Triple 72" Diameter CMP drop pipes structure and culvert replacement with concrete box structure with fiberglass skimmer and triple 72" concrete RCP and headwall.	Started Design in 2006	\$16,622.67	\$203,833.09	\$220,455.76	DRMP / Scott Garth	Armadillo / Keith Richmond	Completed August 2009	Elizabeth Wong	
4	DS 503	Apollo	Chancellor Just east of Sumter	Corroded Triple 72" Diameter CMP drop pipes structure and culvert replacement with concrete box structure with fiberglass skimmer and triple 72" concrete RCP and headwall.	Started Design in 2006	\$16,622.67	\$193,938.85	\$210,561.52	DRMP / Scott Garth	Dave Foote Environmental / George Foote	Completed Sept 2009	Elizabeth Wong	
5	WCS 135	Twin Lakes	Price East of Toledo Blade	Replace concrete drop structure with concrete open weir replaced as part of the Toledo Blade widening project	2009	Included in umbrella project of Toledo Blade Widening	\$134,860.00	\$134,860.00	Wilson Miller Prime	Apac is prime, Lovin Construction built structure	Completed August 2009	Ben Newman	Design Cost unknown as it was included in the Toledo Blade Widening contract
6	WCS 107	Cocoplum	Just west of Chamberlain	Severe metal sheet piling corrosions, gates, two gate will not open. Retrofit with concrete weir wall and 6 new stainless steel gates and concrete spillway and large revetment.	Start Design in 9/30/09	\$43,783.16	\$545,267.26	\$589,050.42	KHA / Nathan Lee Seth Schmid	Coral Sands	Completed January 2011	A. Carrasquillo	Costs include a large Emergency Change Order of \$125,000 due to unforeseen concrete in canal bottom downstream of structure.
7	DS 132 and culverts	Bass Point	At Jeannin Dr	Severely corroded corrugated metal pipes CMP, erosion and undermining of side banks. Replace with open concrete weir and RCP culvert pipes.	Design Start 10/09	\$40,987.22	\$436,615.82	\$477,603.04	DMK / Mary Ann Lind	Thomas Marine/Mark Mabee	Completed May 2011	Angel Carrasquillo	
8	DS 139 and culverts	Snover	East of Haberland	Severely corroded corrugated metal pipes CMP, erosion and undermining of side banks. Replace with open concrete weir and RCP culvert pipes.	Design Start 10/09, construction start 1/4/12	\$40,987.22	\$488,104.70	\$529,091.92	DMK / Mary Ann Lind	GCS/John Matz	Completed April 2012	A. Carrasquillo (design & permitting) E. Wong (construction)	
9	WCS 101	Cocoplum	Myakkahatchee Creek near WTP	Design, permitting and construction services for the replacement of WCS 101	5/29/2012	\$127,754.00		\$1,317,261.50	AIM Engineering / Lee Flynn and Tim Denger		Design 3/26/13 (USACOE Permit), construction 4/18/14	Elizabeth Wong	This is a SWFWMD cooperatively funded project. Engineering/Permitting cost include land and easement purchase and Gopher Tortoise relocation
				Gopher Tortoise Relocation	5/2/2013	\$4,400.00			Ian Vincent & Associates	Completed 5/22/13			
				Land/Easement Acquisition	8/9/2012	\$13,860.00			American Acquisition Group	Complete 4/6/13			
					8/9/2012	\$21,776.50			American Government Services	Complete 4/6/13			
				Complete replacement of existing structure with new structure, two additional gates for a total of 6 gates, gate automation and telemetry	Started construction May 28, 2013		\$1,149,471.00			Shoreline Foundation Inc/Charles Diveto/Neil Davis	Completed 5/9/14		
10	DS 133 and culverts	Snover	West of Haberland	Severely corroded corrugated metal pipes CMP, erosion and undermining of side banks. Replace with open concrete weir and RCP culvert pipes.	Design start 10/09, construction start 5/20/14	\$49,355.60	\$549,796.80	\$599,152.40	DMK / Mary Ann Lind and Kreg Maheu	Olympus Painting Contractors Inc. Ed Freeman	Completed 11/20/14	A. Carrasquillo (design & permitting) Elizabeth Wong (construction)	
11	WCS 115	Snover	East of Chamberlain Blvd	Severe corrosion of metal sheet piling corrosions and gates. Water level could not be retained upstream by structure. Will either replace or rehabilitate entire structure.	Start design in FY 2016	\$108,081.00	\$1,064,496.00	\$1,172,577.00	AIM Engineering / Lee Flynn	V & H Construction, Inc. (Rade Vujakijia and Joe Martin)	Completed 8/31/18	Elizabeth Wong	

**Water Control Structures (WCS) Completely Rehabilitated or Replaced
As of 11/30/20**

Item	Water Control Structures	Waterway	Location	Rehab Issues	Project Start Date	Engineering / Permitting/Other non-Construction Costs	Actual Construction Costs Includes Contingency Spent	Total Final Design and Construction Cost Spent	Engineering Consultant / P.E.	Contractor / Supervisor	Project Status	City Project Manager	Comments
12	WCS 106	Cocoplum	West of North Port Blvd Near WTP	Severe deterioration of concrete columns that support the gates and catwalk. Corrosion of sheet pilings	Start design in 8/8/17 Construction start 4/7/19	\$168,000.00	\$2,304,436.58	\$2,472,436.58	KHA / Peter Vanbuskirk, Seth Schmid	ZEP Construction, Inc (Jamie Booth, Kirk Scribner)	Completed 8/11/20	Elizabeth Wong	
13	WCS 108	Cocoplum	West of Collingswood	Severe deterioration of entire structure	Start design in 11/2/20	\$143,006.12			KHA / Peter Vanbuskirk, Ty Gremaux		Ongoing		
Total						\$861,453.19	\$7,459,958.47	\$8,178,405.54					

Minor Repairs to Water Control Structures
As of 11/30/20

Item	Water Control Structures	Waterway	Location	Rehab Issues	Project Start Date	Engineering / Permitting/Other non-Construction Costs	Actual Construction Costs Includes Contingency Spent	Engineering Consultant / P.E.	Contractor / Supervisor	Project Status	City Project Manager	Comments
1	WCS137	Newcastle	Between Diamond Ave and Napa Ln	Replace gates and corroded members.	May-07	None	\$55,500	PBSJ / Tony Russo	Pittsfield Construction Inc. / Sam Matthews	Completed August 2007	Elizabeth Wong	Due to inoperable gates, obtained an emergency order and award the contract to Pittsfield
2	WCS138	Newcastle	At Monterey Ln	Replace gates and corroded members.	May-07	None	\$55,500	PBSJ / Tony Russo	Pittsfield Construction Inc. / Sam Matthews	Completed August 2007	Elizabeth Wong	
3	WCS 130	Bass Point	Near Cocoplum	Replace gates and corroded horizontal channels.	May-07	In house	\$77,500	PBSJ / Tony Russo	Pittsfield Construction Inc. / Sam Matthews	Completed August 2007	Elizabeth Wong	
4	WCS 131	Bass Point	Just downstream of the Twin Lakes intersection	Weld boxes on gate stems on each gate.	May-07	In house		PBSJ / Tony Russo	Pittsfield Construction Inc. / Sam Matthews	Completed August 2007	Elizabeth Wong	
5	WCS 108	Cocoplum	Just west of Collingwood	Replaced 3 Gates Nos. 1, 2 and 5	Apr-11	In house	\$9,350.00	PW staff	MS Welding. Mark Spalding	Completed April 2011	Angel Carrasquillo	Gates were so deteriorated, could not wait until future complete WCS replacement.
6	WCS 101	Cocoplum	Myakkahatchee Creek near WTP	Replaced 3 Gates	Sep-11	In house	\$13,245.00	PW staff	MS Welding. Mark Spalding	Completed Sept 2011	Angel Carrasquillo	Gates were so deteriorated, could not wait until future complete WCS replacement.
7	WCS 124	Lagoon	North of Cocoplum Near Parlay Ln	Remove gate sill bottoms as these are corroded and prevent gate from closing and replace angles welded to gate bottoms	May-12	In house	\$2,000.00	PW staff	MS Welding. Mark Spalding	Completed 6/13/12	Elizabeth Wong/Rick St Louis	These are minor repairs. Angles on gate bottoms found in good condition and not replaced
8	WCS 125	Lagoon	South of Price near Thomas Ln	Remove gate sill bottoms as these are corroded and prevent gate from closing and replace angles welded to gate bottoms	May-12	In house	\$2,000.00	PW staff	MS Welding. Mark Spalding	Completed 6/13/12	Elizabeth Wong/Rick St Louis	These are minor repairs. Angles on gate bottoms found in good condition and not replaced
9	WCS 114	Snover	Just west of Salford Blvd	Replace all 4 gates with new steel gates epoxy coated, replace all gate supports, gate slide frameworks, both horizontal I-beams and replaced corroded section of vertical I-beams, rebuilt corroded sections of all 4 lift rods	May-12	In house	\$18,000.00	PW staff	MS Welding. Mark Spalding	Completed 7/17/12	Elizabeth Wong/Rick St Louis	These are minor repairs
10	WCS 108	Cocoplum	Just west of Collingwood	Replace corroded horizontal I-beams and corroded sections of vertical I-beams, and repair holes in sheet metal pile	Aug-12	In house	\$18,400.00	PW staff	MS Welding. Mark Spalding	Completed 9/7/12	Elizabeth Wong/Rick St Louis	These are minor repairs
11	WCS 128	Newcastle	South of Price Blvd, near Oregon Ln	Replace corroded horizontal cap and corroded sections of vertical I-beams	Aug-12	In house	\$9,500.00	PW staff	MS Welding. Mark Spalding	Completed 9/14/12	Elizabeth Wong/Rick St Louis	These are minor repairs
12	WCS 111	Cocoplum	South of Price Blvd, near Newmand Dr.	Replace corroded horizontal I-beam and corroded sections of vertical support for "cat walk"	Aug-12	In house	\$6,600.00	PW staff	MS Welding. Mark Spalding	Completed 9/12/12	Elizabeth Wong/Rick St Louis	These are minor repairs
13	WCS 106	Cocoplum	Near WTP	Disassemble Gear box at one gate to evaluate repairs needed	11/5/2012	In house	\$300.00	PW staff	MS Welding. Mark Spalding	Completed 12/11/12	Elizabeth Wong/Rick St Louis	Gear box defective
14		Cocoplum	Near WTP	Provide a reconditioned gear box and all necessary parts and labor with 1 year warranty on one gate	3/1/2013	In house	\$4,550.00	PW staff	MS Welding. Mark Spalding	Completed 3/12/13	Elizabeth Wong/Rick St Louis	
15	WCS 118	Blueridge	Cuthbert Ave	Replace corroded sections of horizontal and vertical railing	9/1/13	In house	\$2,457.00	PW staff	Raber Industries Inc.	Completed 9/12/13	Elizabeth Wong/Rick St Louis	
16	WCS 131	Bass Point	Johannesberg Rd	Replaced corroded horizontal support beams and corroded sections of tie rods and vertical I-beams on both west and east sides of the structure, patched a small leak in the sheet metal piling and welded new boxes for both gate stems.	9/1/13	In house	\$8,557.00	PW staff	Raber Industries Inc.	Completed 9/25/13	Elizabeth Wong/Rick St Louis	
17	WCS 113	Snover	Just East of Myakkahatchee Creek	Repaired erosion below existing concrete slab on the northwest side of WCS No. 113 by injecting flowable fill (cementitious grout) to fill all voids	7/25/14	In house	\$14,000.00	PW staff	Thomas Marine Construction, Inc.	Completed 7/28/2014	Elizabeth Wong/Rick St Louis	
18	WCS 162	Snover	Van Camp/Tropicaire	Repaired erosion between weir and MES. Demo concrete adjacent to MES, install filter fabric, install morrow over fabric and install 12-inch diameter rip rap.	5/21/15	In house	\$7,000.00	PW staff	Genesis Construction Group sub'd to Charlotte County Seawalls Zac Futait	Completed 6/4/15	Elizabeth Wong/Rick St Louis	Ed Freeman of Genesis subcontractor entire job to Charlotte County Seawalls

Minor Repairs to Water Control Structures
As of 11/30/20

Item	Water Control Structures	Waterway	Location	Rehab Issues	Project Start Date	Engineering / Permitting/Other non-Construction Costs	Actual Construction Costs Includes Contingency Spent	Engineering Consultant / P.E.	Contractor / Supervisor	Project Status	City Project Manager	Comments
19	WCS 124	Lagoon	South of Coldwater Ln	Replace track guide systems for 3 gates and change anchors in track guide systems as needed for workable gates; clean and lubricate all 3 lift rods for gates; for all 3 tie rods to dead men, weld new equivalent 3 ft sections of tie rods to reinforce corroded sections near water surface; replace 3 ft corroded sections of weir vertical I-beams at both side banks, chip concrete to existing solid metal beam, cut out corroded section of the I-beams and re-weld new vertical sections of I-beams onto solid metal, repair chipped concrete and encase new sections of I-beam in concrete; repair hole in sheet piling by welding or applying two-part epoxy grout, an 18" x 18" patch comprising a minimum 3/16" steel plate onto existing cleaned solid sheet metal piling; all dewatering costs as needed. Emergency procurement fabrication and installation of 3 new gates. PO# 046481	9/30/15	In house	\$23,500.00	PW staff	MS Welding, Mark Spalding	Completed 11/6/15	Elizabeth Wong/Rick St Louis	
20	WCS 125	Lagoon	North of Thomas Lane	Replace track guide systems for 2 gates and change anchors in track guide systems as needed for workable gates; clean and lubricate 2 lift rods for gates; for all 3 tie rods to dead men, weld new equivalent 3 ft sections of tie rods to reinforce corroded sections near water surface; replace 3 ft corroded sections of weir vertical I-beams at both side banks, chip concrete to existing solid metal beam, cut out corroded section of the I-beams and re-weld new vertical sections of I-beams onto solid metal; repair chipped concrete and encase new sections of I-beam in concrete; all dewatering costs needed. PO# 046481	9/30/15	In house	\$7,000.00	PW staff	MS Welding, Mark Spalding	Completed 9/28/15	Elizabeth Wong/Rick St Louis	
21	WCS 114	Snover		Troubleshoot why gates nos. 1 and 2 not opening easily, replace corroded or bent sections of lift rods as needed; if needed, remove and replace 1 gear box with existing gear box at the public works facility (contractor to pick up and transport equipment from public works to work site); remove corroded first 14 feet long sections of two-strand horizontal and vertical catwalk railing (both sides of railing) and weld on new galvanized steel two-strand horizontal and vertical railing to match the diameter of the rest of the adjacent catwalk railing; ensure all new welded joints are smooth; on all welded joints and new railing, apply zinc chromate primer and paint the replacement railing with at least two coats of 2-part epoxy Sherwin Williams marine grade green paint to match adjacent catwalk railing color. PO# 046481	9/30/15	In house	\$5,200.00	PW staff	MS Welding, Mark Spalding	Completed 9-30-15	Elizabeth Wong/Rick St Louis	Cost less than anticipated once Mark got into project
22	WCS 108	Cocoplum	Just west of Collingwood	Replaced 3 more Gates (including the existing electric gate). Use an existing actuator (from the old WCS 101). Needed two new left hand threaded rods, fabricate 3 new gates #3, 4, and 6 and tracks, flat bars and spacers as needed, minor concrete and sheet pile repair. This was an emergency order job. PO #046626	12/1/15	In house	\$34,900.00	PW staff	MS Welding, Mark Spalding	Completed 12-17-15	Elizabeth Wong/Rick St Louis	Gates were so deteriorated, could not wait until future complete WCS replacement.
23	WCS 106	Cocoplum	Near WTP	Replaced all six Gates. This was an emergency order job as 3 of the 6 gates were not working and the other three are the same age. Replaced corroded sections of all tie rods. The existing concrete sill at the bottom of the gates are in bad condition. The structure is planned for complete replacement in 2018. PO# 046747	4/4/16	In house	\$68,000.00	PW staff	MS Welding, Mark Spalding	Completed 4/8/2016	Elizabeth Wong/Rick St Louis	Gates were so deteriorated, could not wait until future complete WCS replacement.
24	WCS 101	Myakkahatchee Creek		Excessive rains and debris cause sand bar formation on upstream side of WCS 101 blocking push-down gate operation and bent two rods. MS removed bend section of rod, pumped out sand and welded new rod so gate remains functional until permanent repair can be made. Meanwhile Tom McCluin of Golden Harverst gates provided 2 new stainless steel rods (free) as he had determined that the clutch on the actuator was not set correctly to shut off the motor if there is too much torque on the stems. SS rods are on the floor in the RO building.	11/8/16	In house	\$7,500.00	PW staff	MS Welding, Mark Spalding	Completed End of 2016	Rick St Louis	Emergency Procurement
25	WCS 114	Snover		Excessive rains and debris caused damage to gate, tracks and gear. Emergency repairs make to make gates functional until a permanent repair can be made	11/8/16	In house	\$5,500.00	PW staff	MS Welding, Mark Spalding	Completed End of 2016	Rick St Louis	Emergency Procurement

Minor Repairs to Water Control Structures

As of 11/30/20

Item	Water Control Structures	Waterway	Location	Rehab Issues	Project Start Date	Engineering / Permitting/Other non-Construction Costs	Actual Construction Costs Includes Contingency Spent	Engineering Consultant / P.E.	Contractor / Supervisor	Project Status	City Project Manager	Comments
26	GDS 112			2016 storm broke off riser, gate and portion of catwalk and eroded bank. All broken parts removed in March 2017. Only horizontal pipes left in place and part of catwalk, banks stabilized. Need to get SWFWMD approval to not replace structure in kind.	March 2018	In house						
27	WCS 140	Bethlehem		Repair one horizontal I beam, Repair one Vertical I beam, Replace gate #1, Replace gate #2. PO# 047293	Last week in Sept 2017	In house	\$25,000.00	PW staff	MS Welding, Mark Spalding	Completed End of 2017	Chuck Speake	
28	WCS 137	New Castle	Near Laredo Ave	Replace I Beam- with painted with 2 part epoxy coating Inspect Rod, clean and repair any bad threads Gear box- open, replace any bad bearings, check key ways in gear drives. Check brass lifting bushing. Tracks, replace spacer bars as needed or tracks as needed. Adjust, clean and inspect door for proper operation. Minor repairs if needed. Inspect concrete and base of structure (under water) PO# 047588	3/23/2018	In house	\$9,000.00	PW staff	MS Welding, Mark Spalding	Completed 6/4/18	Chuck Speake	
29	WCS130	Bass Point	Just north of Cocoplum	Replace I Beam -with painted with 2 part epoxy coating Inspect Rod, clean and repair any bad threads Gear box- open, replace any bad bearings, check key ways in gear drives. Check brass lifting bushing. Tracks, replace spacer bars as needed or tracks as needed. Adjust, clean and inspect door for proper operation. Minor repairs if needed Inspect concrete and base of structure (under water)	3/23/2018	In house	\$8,000.00	PW staff	MS Welding, Mark Spalding	Completed 6/4/18	Chuck Speake	
30	WCS 118	Blueridge	at Ridgewood Dr	Replace I Beam- with painted with 2 part epoxy coating Inspect Rod, clean and repair any bad threads Gear box- open, replace any bad bearings, check key ways in gear drives. Check brass lifting bushing. Tracks, replace spacer bars as needed or tracks as needed. Adjust, clean and inspect door for proper operation. Minor repairs if needed. Inspect concrete and base of structure (under water)	3/23/2018	In house	\$8,000.00	PW staff	MS Welding, Mark Spalding	Completed 6/4/18	Chuck Speake	
31	WCS 108	Cocoplum	West of Collingswood Blvd	Fixed catwalk grate rusted through in one location	6/27/2018	In house	\$7,500.00	PW staff	MS Welding, Mark Spalding	Completed 1/30/19	John Hodge	
32	WCS 110	Cocoplum	West of Yorkshire St	Fixed top bars in gate frames very corroded, one hole behind I-beam	6/27/2018	In house	\$8,000.00	PW staff	MS Welding, Mark Spalding	Completed 1/30/19	John Hodge	
33	WCS 111	Cocoplum	Near Newman Dr.	Fixed top bars in gate frames that was corroded	6/27/2018	In house	\$8,500.00	PW staff	MS Welding, Mark Spalding	Completed 1/30/19	John Hodge	
34	WCS 114	Snover	West of Salford Blvd	Fixed hole in S. side sheet piling. Repaired Gate #2 as it does not close all the way down	6/27/2018	In house	\$9,000.00	PW staff	MS Welding, Mark Spalding	Completed 1/30/19	John Hodge	
35	WCS 124	Lagoon	North of Cocoplum Near Parlay Ln	Repaired holes in east side sheet piling and repaired vertical I-Beam. Retrofit surplus actuator in place of non-working actuator	6/27/2018	In house	\$8,000.00	PW staff	MS Welding, Mark Spalding	Completed 1/30/19	John Hodge	
36	WCS 127	Creighton	Near Alabelle Ln	Repaired hole in Vertical I-beams and repaired hole in sheet piling by support bar	6/27/2018	In house	\$8,500.00	PW staff	MS Welding, Mark Spalding	Completed 1/30/19	John Hodge	
37	WCS 101	Myakkahatchee Creek	At WTP	Telemetry malfunction, replace part no, NL120 CSI Ethernet Interface	9/5/2018	In house	\$446.00	PW staff	Locher Environmental Technology (mike Vega)	9/5/2018	Chuck Speake	
38	WCS 143	Newman	Fielders Rd	Washout on the bank of the Gated Drop Structure. WO# 20-005616	8/27/2020	In house	\$879.00	PW staff	PW Operations	Completed 8/27/20	Menelik Roberts	
39	WCS 158	Snover	Joewood Cir	Washout on the highside. WO# 20-005607	8/27/2020	In house	\$879.00	PW staff	PW Operations	Completed 8/27/20	Menelik Roberts	
40	WCS 130	Bass Point	Hightower Rd	Washout on Low side. WO# 20-005614	8/28/2020	In house	\$1,640.00	PW staff	PW Operations	Completed 8/28/20	Menelik Roberts	
41	DS 120	Blueridge	Tripoli St	Washout on both the High and Low side. Erosion repair. WO#20-005615	8/31/2020	In house	\$901.00	PW staff	PW Operations	Completed 8/31/20	Menelik Roberts	
42	DS 139	New Castle	E Price Blvd & Brewsterrd	Washout by structure. Erosion repair. WO# 20-005620	8/31/2020	In house	\$401.00	PW staff	PW Operations	Completed 8/31/20	Menelik Roberts	
43	WCS 125	Blueridge	Petunia Ter	Washout on Low side. Erosion repair. WO# 20-005619	8/31/2020	In house	\$707.00	PW staff	PW Operations	Completed 8/31/20	Menelik Roberts	
44	WCS 127	Blueridge	Malinda Ter	Washout on both the High and Low side. WO# 20-005612	8/31/2020	In house	\$901.00	PW staff	PW Operations	Completed 8/31/20	Menelik Roberts	

Minor Repairs to Water Control Structures

As of 11/30/20

Item	Water Control Structures	Waterway	Location	Rehab Issues	Project Start Date	Engineering / Permitting/Other non-Construction Costs	Actual Construction Costs Includes Contingency Spent	Engineering Consultant / P.E.	Contractor / Supervisor	Project Status	City Project Manager	Comments
45	WCS 121	Mac Caughey	Nimbus Dr	Washout on the low side. Erosion repair. WO#20-005609	9/3/2020	In house	\$1,970.00	PW staff	PW Operations	Completed 9/3/20	Menelik Roberts	
46	WCS 124	Lagoon	Parade Ter	Washout on Low side. Erosion repair. WO# 20-005613	9/4/2020	In house	\$881.00	PW staff	PW Operations	Completed 9/4/20	Menelik Roberts	
	Total						\$565,164.00					

WCS Replacement Plan

The priority for the replacement of the major WCS's is updated annually (Figure 3-2). Since 2006, 11 major WCS's have been completely replaced or rehabilitated, one is in construction, and one is being designed (Attachment C). The current Public Works plan is to annually design and permit one WCS replacement while constructing a previously designed and permitted WCS.

The rehabilitation of WCS 106 on the Cocoplum Waterway just west of North Port Boulevard is underway with completion expected in Spring of 2020. Design for WCS 108 on the Cocoplum Waterway west of Collingswood Boulevard is anticipated to be completed in Fall of 2020 and will be followed by construction budgeted for fiscal year 2021.

Beyond the 5-year budget projections shown, WCS 124, WCS 127, WCS 138, WCS 118, WCS 121 and WCS 125, are anticipated to be constructed in years 2025, 2026, 2027, 2028, 2029 and 2030 respectively. Budget amounts will be proposed when the structure is within the 5-year replacement window.

WCS Repair Plan

Preventative maintenance and minor repairs prolong the life of the WCS's and keep them in good working order. Minor repairs include repair or replacement of: gates, gate actuators, gate stems, gate tracks, tie backs, catwalk deck/railing, vertical and horizontal I-beams, weir sheet metal erosion, and adjacent bank erosion.

The WCS's that have not been replaced are at a vulnerable age when unforeseen component failures can occur. Due to the significant expense and time needed to design, permit and construct replacement WCS's, significant repairs may need to be done on a WCS that is scheduled to be replaced in the near future. Generally, components such as gates, actuators and stems that are in good condition can be salvaged and become spares for use in other failing WCS's.

Public Works Operations staff perform annual inspection of all structures and prioritize major and minor WCS repairs or replacements (Attachment B). Figure 3-3 reflects the fiscal year 2020 repair budget for WCS's.

Figure 3-2
5-year WCS Replacement Budget Plan

	2020	2021	2022	2023	2024
Design	WCS 108	WCS 113	WCS 114	FW 157	WCS 124
Costs	\$199,000	\$308,000	\$203,000	\$234,000	\$241,000
Construction	WCS 106	WCS 108	WCS 113	WCS 114	FW 157
Costs	\$2,500,000	\$2,480,000	\$3,850,000	\$2,540,000	\$2,920,000
	WCS 106	WCS 108	WCS 113	WCS 114	FW 157
Total Costs	2,668,000	\$2,679,000	\$4,158,000	\$2,743,000	\$3,154,000



Figure 3-3
Fiscal Year 2020 WCS Repair Budget Plan

Structure	Description	Budget Estimate
WCS 108	Repair holes in sheet piling	\$10,000
WCS 113	Repair holes in sheet piling, repair gate stem attachment points, evaluate for gate replacement	\$15,000-\$30,000
WCS 118	Replace #1 gate and track, evaluate for gate replacement	\$15,000-\$20,000
WCS 124	Replace #1 gate and track, evaluate for gate replacement	\$15,000-\$20,000
WCS 125	Replace actuator	\$20,000

Water Control Structure Locations

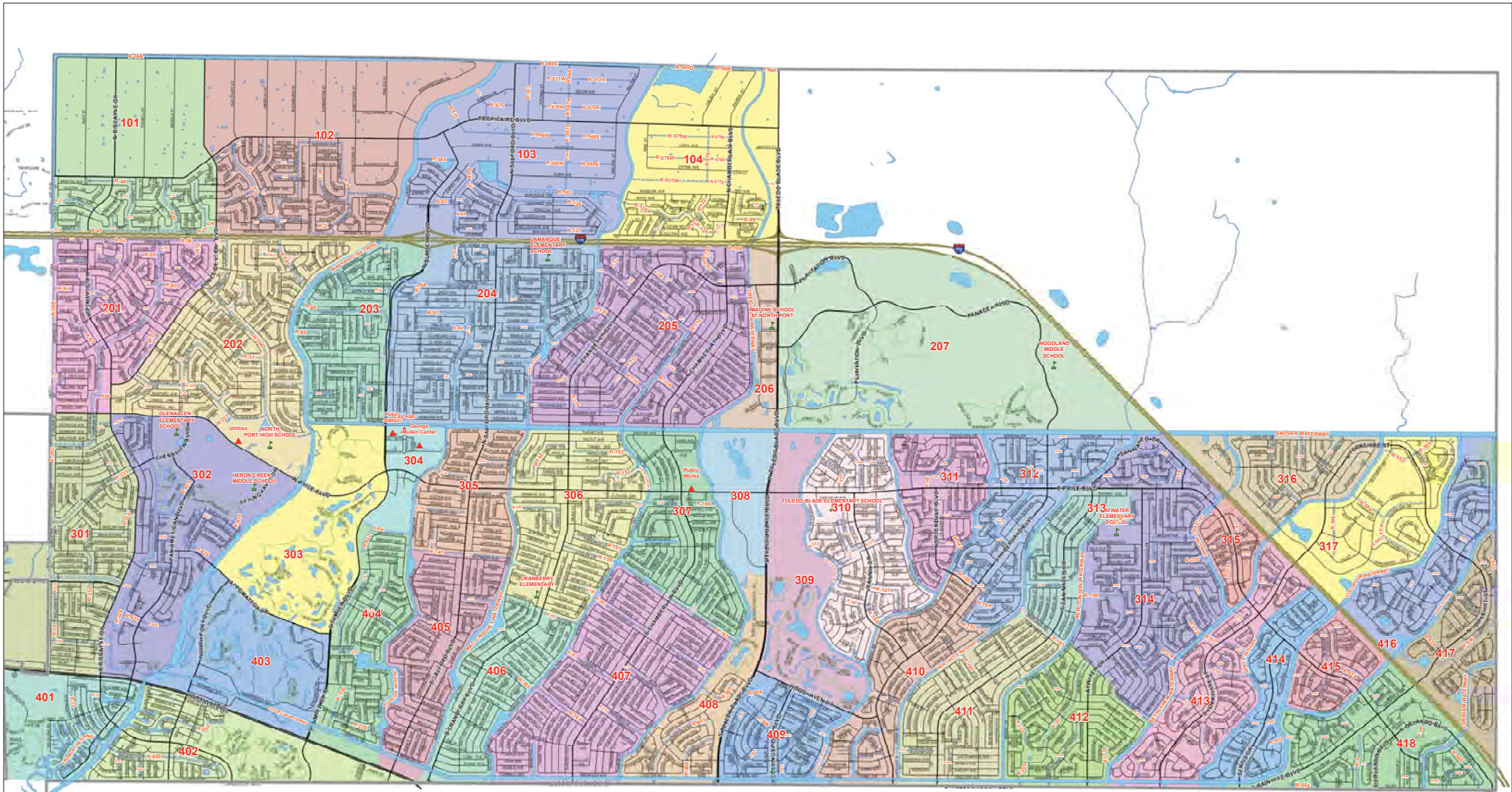
WCS 106	North Port Blvd and Cocoplum Waterway
WCS 108	Collingswood Blvd and Cocoplum Waterway
WCS 113	Snover Waterway and Myakkahatchee Creek
WCS 114	N Salford Blvd and Snover Waterway

WCS 118	Abbotsford St and Blueridge Waterway
WCS 124	Parade Terrace and Lagoon Waterway
WCS 125	Parkmount Terrace and Lagoon Waterway
FW 157	Panacea Blvd and Snover Waterway

2019 Activities

2019 Maintenance Activities in Monthly Reports to Commission

TYPE	January	February	March	April	May	June	July	August	September	October	November	December	Total
Retention (R) Ditches and Canals Rehabilitated (<i>linear miles</i>)	2.509	2.278	2.569	2.420	1.503	2.658	1.900	2.662	2.447	2.911	1.026	1.688	26.57
Swales Rehabilitated (<i>linear miles</i>)	5.407	5.244	5.714	5.898	6.195	5.890	5.386	5.506	5.359	6.613	5.506	4.826	67.544
Asphalt Placed – Pothole Repairs (<i>tons</i>)	19	12	16	12	15	16	18	22	15	8	4.71	10.25	168
Roadside Mowing (<i>acres</i>)	1283	447	1336	2187	2878	2243	2000	2400	2000	1800	2435	800	21,809
Drainage Right of Way (ROW) Mowing (<i>acres</i>)	0	167	0	251	230	195	0	20	80	65	70	0	1,078
Aquatic Spraying (<i>acres</i>)	49	42	65	55	32	40	46	26	22	22	22	16	437
Boom Mowing R-Ditch Bottoms (<i>linear miles</i>)	4.87	1.34	19	25.8	14.5	10.8	9.5	11	13.7	9.36	14	6.4	140
Pipes Installed (<i>linear miles</i>)	0.215	0.118	0.199	0.205	0.207	0.121	0.176	0.094	0.164	0.157	0.147	0.130	1.932
Catch Basins/Culvert Boxes Installed	2	12	8	11	9	8	6	3	1	9	5	7	81
Drainage pipe cleaning (each)	73	91	151	182	174	113	101	61	64	78	114	165	1,367

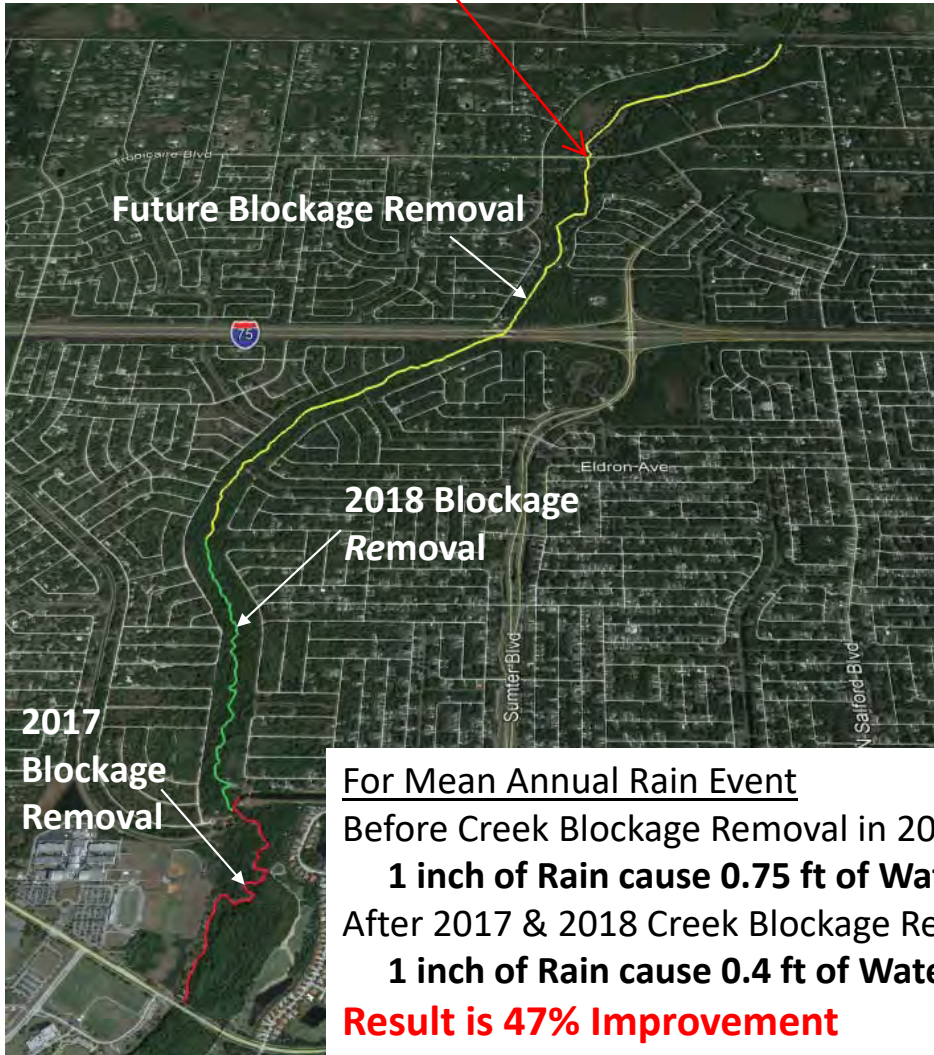


- Legend**
- ▲ Critical Facilities
 - ⚡ Schools
 - ▨ DROW
 - ▒ Waterway
 - City Limits
 - Interstate
 - Major Roads
 - Local Roads
 - Private Roads

Disclaimer: This map is for reference purposes only and is not to be construed as a legal document. Any reliance on the information contained herein is at the user's risk. The City of North Port and its agents assume no responsibility for any use of the information contained herein or any loss resulting there from.

USGS Rain Gage
at Tropicaire Blvd

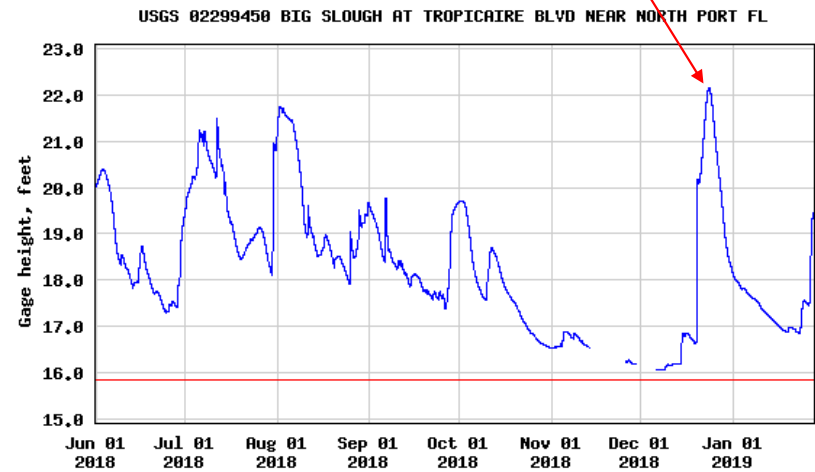
After 2017 - 2018 Creek Blockage Removal



**No street flooding after
2017 - 2018 project
Tropicaire Blvd USGS gage at 22.15'**

Gage height, feet

Most recent instantaneous value: 19.45 01-28-2019 12:00 EST



● Future Blockages to Remove



City of North Port Myakkahatchee Creek Blockages



Disclaimer: This map is for reference purposes only and is not to be construed as a legal document. Any reliance on the information contained herein is at the user's risk. The City of North Port and its agents assume no responsibility for any use of the information contained herein or any loss resulting therefrom.

Document Path: W:\Information\2022\Draw\0_CreekBlockages\CreekBlockages.mxd

Changes Between the FEMA Preliminary Coastal Flood Risk FIRMS Dated 12/31/19 and Existing Effective FIRMS dated 11/4/16

Address List Parcels (Centroids)	1% Increase	1 % Decrease	1% Increase Exclusively	1 % Decrease Exclusively	Share Both	TOTAL
<i>Countywide Total</i>	<u>27,284</u>	<u>20,891</u>	<u>25,087</u>	<u>18,694</u>	<u>2,197</u>	<u>45,978</u>
Town of Longboat Key		373	0	373	0	373
City of Sarasota	672	1,697	640	1,665	32	2,337
City of Venice	47	1,231	17	1,201	30	1,248
City of North Port	3,601	50	3,588	37	13	3,638
Unincorporated	22,964	17,540	20,842	15,418	2,122	38,382
<i>BBC Districts Total (Centroids)</i>	<u>27,284</u>	<u>20,891</u>	<u>25,087</u>	<u>18,694</u>	<u>2,197</u>	<u>45,978</u>
Michael A. Moran - 1	7,704	3,128	7,068	2,492	636	10,196
Christian Ziegler - 2	1,806	2,760	1,630	2,584	176	4,390
Nancy C. Detert - 3	5,652	4,501	4,709	3,558	943	9,210
Alan Maio - 4	6,722	5,211	6,526	5,015	196	11,737
Charles D. Hines - 5	5,400	5,291	5,154	5,045	246	10,445
Buildings (Intersected)	1% Increase	1 % Decrease	1% Increase Exclusively	1 % Decrease Exclusively	Share Both	TOTAL
<i>Countywide Total</i>	<u>7,750</u>	<u>16,360</u>	<u>7,619</u>	<u>16,229</u>	<u>131</u>	<u>23,979</u>
Town of Longboat Key	0	376	0	376	0	376
City of Sarasota	206	1,396	201	1,391	5	1,597
City of Venice	7	1,152	6	1,151	1	1,158
City of North Port	1,495	3	1,495	3	0	1,498
Unincorporated	6,042	13,433	5,917	13,308	125	19,350

"Exclusively" means parcels that only have one type of change. Some parcels include both areas added to the one-percent annual chance flood and areas removed from the one-percent annual chance flood.

"Share Both" means a parcel crossed both the increase and decrease layers of the CSLF layer from FEMA. The floodplain was essentially reshaped on those parcels



City of North Port

Office of the City Manager

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September 15, 2020

Mark A. Vieira, P.E.
Senior Civil Engineer
FEMA Region IV
Mitigation Division, RA Branch
US Department of Homeland Security
770-220-5450

Re: City of North Port Review of the December 31, 2019, Preliminary Coastal Risk Flood Insurance Rate Maps and Flood Insurance Study

Dear Mr. Vierra:

The City of North Port appreciates the cooperative efforts by the Federal Emergency Management Agency (FEMA) to revise the City's November 4, 2016, Flood Insurance Rate Maps (FIRMs) for the coastal area. Attached are the City's concerns and recommendations on the December 31, 2019, Preliminary Coastal Risk FIRMs and Flood Insurance Study (FIS). The City would appreciate a response to these comments prior to FEMA finalizing the FIRMs and FIS. Any questions or comments should be directed to Elizabeth Wong, P.E., City of North Port Stormwater Manager via email to ewong@cityofnorthport.com or by phone at (941) 240-8321 or (941) 628-1475.

Sincerely,

Jason Yarborough, ICMA-CM
Acting City Manager

c. by email

Cari Branco, Assistance City Manager
Juliana B. Bellia, Director, Department of Public Works
Rick Newkirk, Utilities Director
Scott Titus, Fire Chief
Eric Tiefenthaler, Emergency Manager
Monica Bramble, Assistant Director, Department of Public Works
Gerardo Traverso, P.E., PMP, Engineering Manager, Department of Public Works
Elizabeth Wong, P.E. Stormwater Manager, Department of Public Works
Mike Taylor, P.E. Project Manager, AECOM

**CITY OF NORTH PORT COMMENTS ON
PRELIMINARY RISK FIRMS DATED DECEMBER 31, 2019**

1. 2007 LiDAR Topographic Data Should be Updated to Prepare the Preliminary Risk FIRMs –

Concern: In a 2/13/20 email response from Mark Vierra, he indicated *“The coastal portion of Sarasota County is using LiDAR flown in 2015. However, for inland areas of Sarasota County including the City of North Port, 2007 LiDAR is the most current that we have.”* The 2007 LiDAR topography done over 13 years ago, is very outdated. Most of Florida has experienced a huge building boom after 2007 and many structures are built higher than the elevations in 2007. These higher elevations are not reflected in the new flood maps as they are based on outdated 2007 topography.

Proposed Solution:

a. It is recommended that FEMA acquire up to date LiDAR data before revising the flood maps.

2. Properties already Built higher than the proposed BFEs –

Concern: The City and FEMA’s consultant AECOM, have received much input from many property owners in areas west of the Myakka River in the West Villages area (Gran Paradiso, The Preserve, Renaissance, Oasis) and in Talon Bay east of the Myakka River. A large portion of these properties were in flood zone AE per the 1981 and 1984 FIRMs, then remapped as flood zone X in the 2016 FIRMs, and now remapped back into flood zone AE in the December 31, 2019 preliminary Risk FIRMs.

Many of these properties were built higher than the proposed BFE, but the lower elevations corresponding to undeveloped conditions in the 2007 LiDAR data were used for the December 31, 2019 preliminary Risk FIRMs. The 2007 LiDAR data show these properties remapped into Flood zone AE. Mark Vierra had indicated that these properties cannot qualify for a no-fee letter of map amendment (LOMA) as the very first 1984 FIRM shows them to be in AE. Consequently, they will have to pay FEMA to file for a letter of map revision based on fill (LOMR-F). Many properties were built after the flood zone changed from Zone AE in 1984, to Zone X in the 11/4/16 FIRMs. Thus, these properties were not required to obtain Elevation Certificates. Now to file for a LOMR-F they will have to pay for both an elevation certificate (about \$300) and the FEMA LOMR-F filing fee (\$425 per lot or \$800 for multiple lots).

Proposed Solution:

a. A list of these developments is provided in Attachment A. The corresponding Southwest Florida Water Management District (SWFMWD) permitted plans, record drawings and several elevations certificates are available. Due to the large file sizes, pdfs of these documents are sent separately in an email to the FEMA’s Project Manager and FEMA’s Consultant AECOM to access files through “One Drive “.

- b. It is recommended that FEMA download and review this data. Properties that are already built higher than the new BFEs should be removed out of the zone AE before finalizing the FIRMs.
- c. For properties already built higher than the revised BFEs before the new FIRMs effective date, FEMA should consider waiving the LOMR-F filing fee for MT-1 applications and process application as a no-fee LOMA.
- d. Property owners that sent FEMA's consultant as-built surveys and elevation certificates before and during or the 90-day Public Comment period should also have their properties removed out of the zone AE before FEMA finalizes of the new FIRMs.

3. Three Myakka River Bridge Effects –

Concern: FEMA's consultant AECOM indicated that the modeling used to prepare the Preliminary Risk FIRMs did not include the storm surge and wave action dampening effects of the following three (3) parallel bridges that spans the mouth of the Myakka River near El Jobean. Only the bridge approaches were in the model.

- I. Old railroad trestle bridge that is a fishing pier
- II. North-bound State Road 776 Bridge
- III. South-bound State Road 776 Bridge

On a typical windy day with winds that frequently come out of the southeast, there is a huge visible difference in wave action heights and between the upstream and downstream sides of these bridges. The very tightly spaced railroad trestle pilings, the deck stringers (elevation 8ft NAVD88) and the hand railing (elevation 11.5ft NAVD88) will likely dampen the storm surge and wave action and may lower the BFE of 11 ft NAVD88 in the preliminary Risk Maps.

Proposed Solution:

The three bridges need to be incorporated into the modeling used to prepare the Preliminary Risk FIRMs

- A pdf copy of the old railroad trestle bridge plans named "*EL JOBEAN BRIDGE REHAB 6-9-15*" is available. These plans correspond with the current day condition of the north half of the old railroad trestle bridge that is now a fishing pier, and shows elevation of the deck, stringers and railing. The south half of the old railroad trestle bridge is similar to the north.
- Florida Department of Transportation provided plans for the north and south bound concrete bridges. All available plans, photos and videos of these three bridges are sent separately in an email to the FEMA's Project Manager and FEMA's Consultant AECOM to access files through "One Drive".

4. **Model Validation in North Port area** - In the model validation report file name "R4_SWFL_IDS2_Feb2017.pdf", please clarify what is used to validate the proposed flood elevations in the Myakka River that affects North Port.

5. 500-Year Model Results

- a. There are many areas where the 0.2% risk is increased. Was the 500-year storm (0.2% risk) modeled? Where can the 500-year storm flood elevations be found?

6. Other comments on Flood Insurance Study

- a. Flood Insurance Study FIS Vol 2 Pdf page 29 - Table 22 Topo Elev - the year the topographic elevation is used to prepare the maps needs to be specified.

7. Other comments on Preliminary Risk Firms Dated December 31, 2019

- a. The notes on all the FIRM panels referenced year 2017 for the ortho imagery aerial. This is misleading flood data as flood data does not match the 2007 LiDAR topography used in risk mapping. Suggest either using a corresponding 2007 ortho imagery aerial for the FIRM panels or adding another note that indicates 2007 topography was used in the special flood hazard area mapping.
- b. Wrong street name Panel 12115C0362G –Road south of US 41 on the west side of the State College of Florida, is misnamed “*S. Tamiami Trl*”. This should be “*West Villages Parkway South*”.

► MEMORANDUM

To: Elizabeth Wong, P.E. (City of North Port)
From: Dave DeLoach, P.E.; Trillian Baldassari, P.E.

File: 16-00400-00

Subject: Update to Conceptual Plan

November 13, 2019

Update to Conceptual Plan

On October 29, 2019, the City of North Port directed DeLoach Engineering Science, PLLC (DES) to remove the Inflow Reduction element of the conceptual design from the set of planned improvements. The conceptual-level design drawings and corresponding models were updated to reflect this change, and the conceptual plan now includes the following major project components:

- Improvements to the existing retention ditch/conveyance system and upsizing road crossing culverts in the Dorothy Avenue area.
- Construction of a new bypass canal parallel to the Myakkahatchee Creek within a portion of the City's Tier 1 lots from south of Tropicaire Boulevard to north of Price Boulevard.
- Increasing conveyance capacity through canal widening and upsizing pipe culverts in the R-36 retention ditch/conveyance system along the northern and western boundary of the city.

Engineer's Opinion of Probable Cost

Estimated project costs were updated to reflect the removal of the inflow reduction element of the conceptual plan. As discussed in the Stormwater Management Plan Report (May 2019), estimated costs, including engineering design, permitting, and construction, are based on RS Means 2017 Heavy Construction Costs with national average values adjusted to the Ft Myers/Sarasota County area. Estimates include a 30% contingency and were projected to future years (up to 2035) assuming 4% inflation. Combined costs for each of those projections were annualized over 50 years at 7%.

Engineer's Opinion of Probable Construction Cost					
	2017	2020	2025	2030	2035
Dorothy (Triple Box Culvert)	\$ 5,628,495	\$ 6,331,291	\$ 7,702,984	\$ 9,371,858	\$ 11,402,298
R-36 Improvements	\$ 15,379,020	\$ 17,299,306	\$ 21,047,251	\$ 25,607,199	\$ 31,155,073
Bypass	\$ 17,121,876	\$ 19,259,782	\$ 23,432,470	\$ 28,509,182	\$ 34,685,779
Estimated Combined Cost	\$ 38,129,391	\$ 42,890,379	\$ 52,182,704	\$ 63,488,239	\$ 77,243,150
Estimated Annualized Cost*	\$ 2,762,850	\$ 3,107,830	\$ 3,781,151	\$ 4,600,348	\$ 5,597,027

* Combined cost annualized over 50 years at 7%, 13.8 PV Annuity Factor (capital cost only, excludes O&M)

Benefits and Benefit to Cost Ratio (BCR)

Benefits are based upon flood reduction achieved across a range of simulated storm events compared to the existing condition. For roadway removed from floodplain, benefits reflect avoidance of repair costs at a rate of \$50,000 per mile. For parcels removed from the floodplain, benefits reflect avoidance of \$6,300 per occurrence, based on historical NFIP claims statistics reduced by 85 percent to account for lot vacancy.

	With Inflow Reduction Element			Without Inflow Reduction Element		
	Flood Reduction (acres)	Road Flood Reduction (miles)	Parcels Reduction (centroid*)	Flood Reduction (acres)	Road Flood Reduction (miles)	Parcels Reduction (centroid*)
2.33-year	244	8	234	223	8	234
5-year	359	13	405	333	12	402
10-year	460	18	538	427	17	515
25-year	495	21	542	448	18	515
50-year	518	21	562	466	18	509
100-year	557	24	558	489	22	505

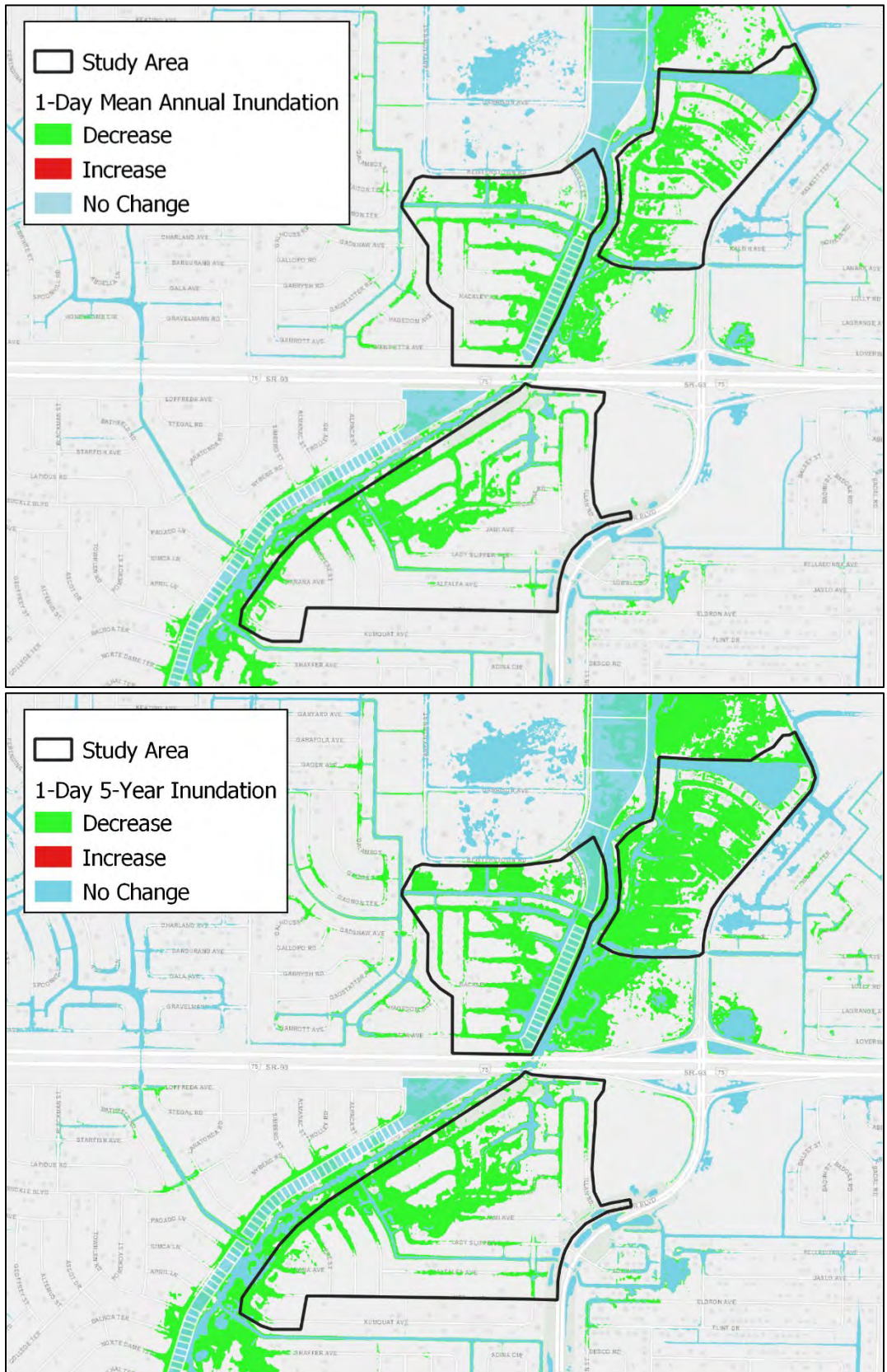
* number of parcels where the center of the parcel is no longer inundated

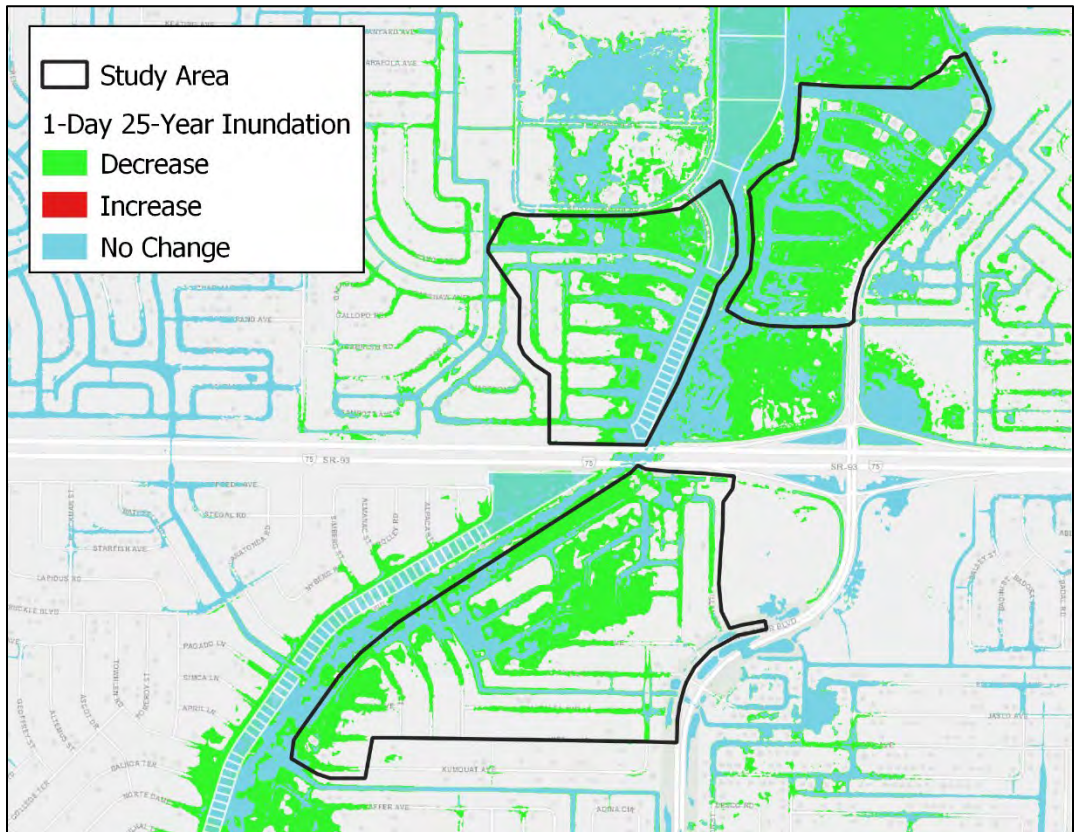
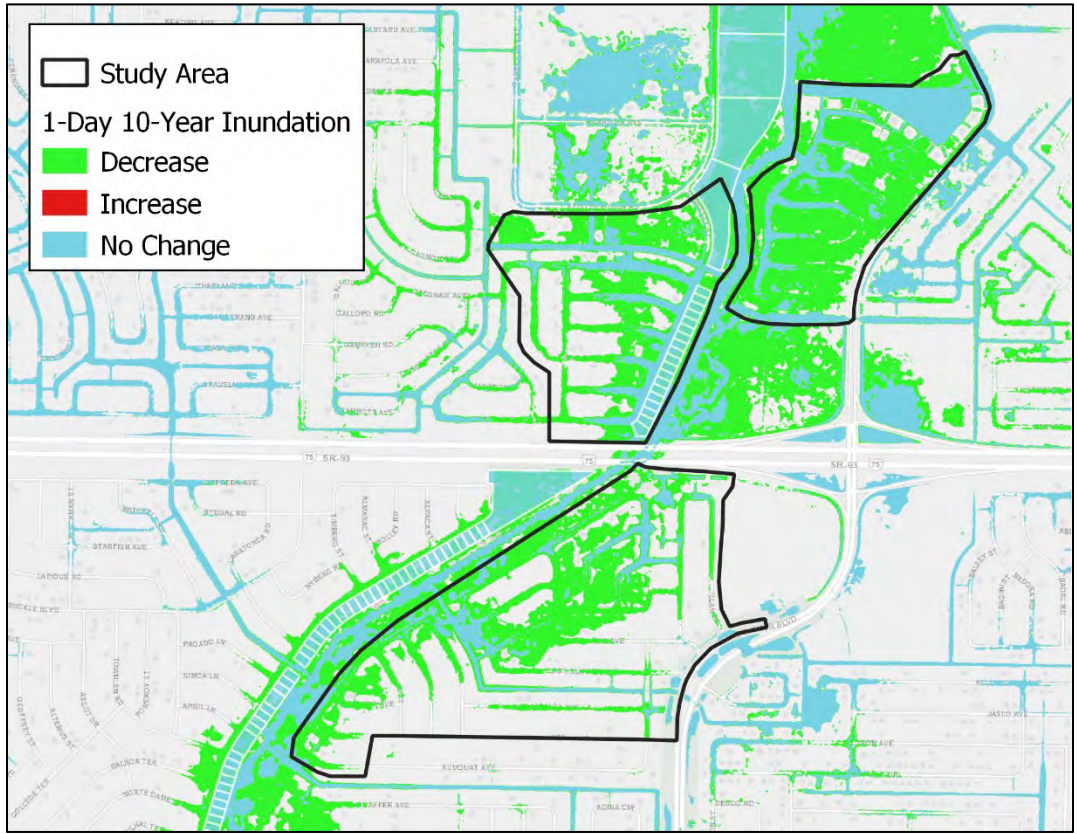
Annual benefit is calculated by multiplying total project benefits for a storm event simulation by the event probability then summing across events simulated. In the case of the revised stormwater management plan, annualized benefits accrue to \$1,909,295 with a BCR of 69 percent (calculations included in Appendix A).

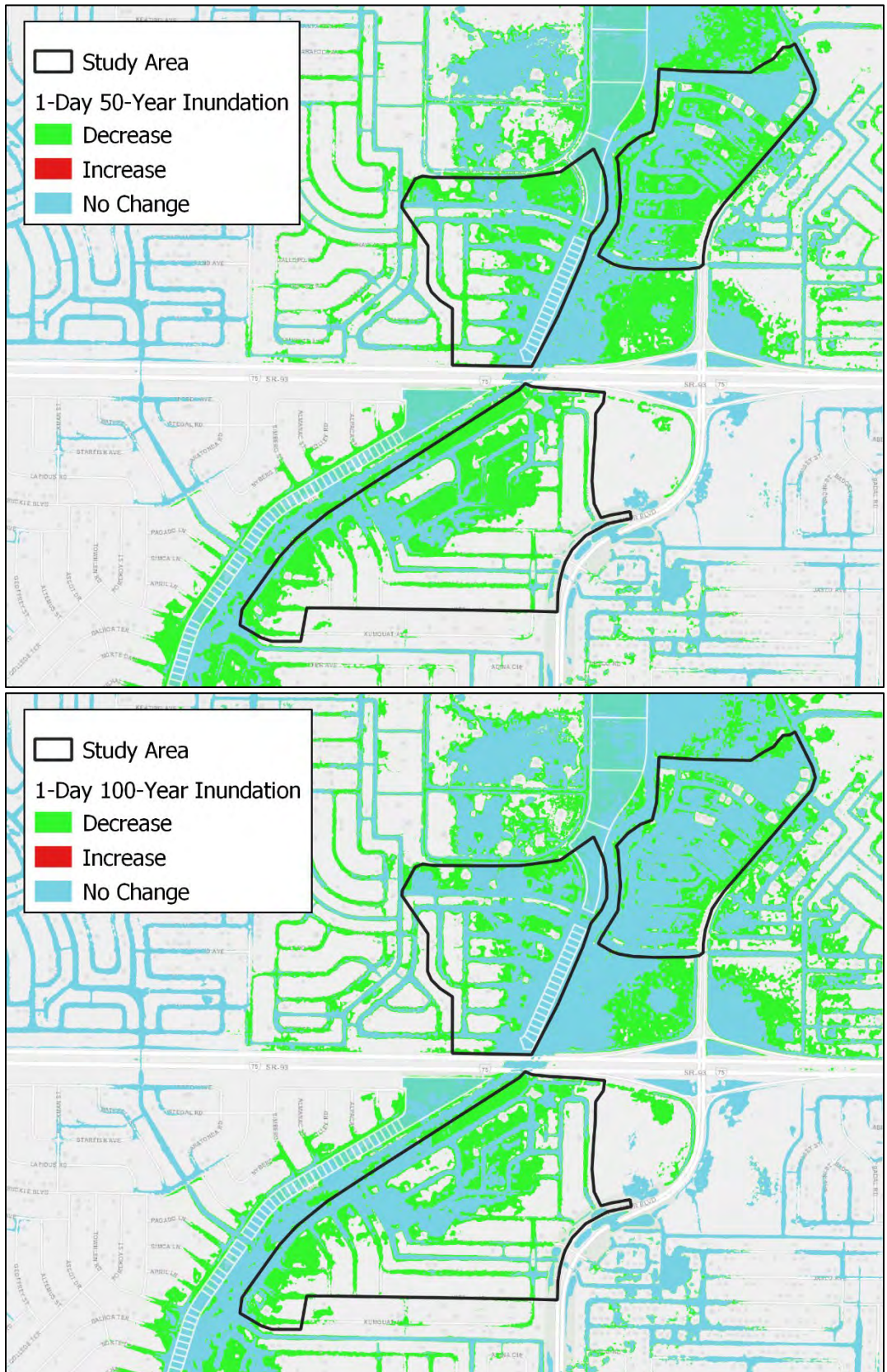
Flood Area Reduction in the I-75 Study Area

The following figures illustrate the reduced extent of inundation in the I-75 study area for Mean Annual through 100-year storm events for the updated stormwater management master plan model, excluding the inflow reduction option.

The conceptual plan focuses on improvements to primary components of the stormwater management system to reduce large-scale regional flooding in the City of North Port. Adjacent areas where minor increases may result from primary system improvements have been identified. Appurtenant facilities may be required to eliminate local increases in some isolated areas. It is understood that design of additional facilities (not yet specified) may be included in future applications for phased construction, including, but not limited to, addition of flap gates, local collection system modifications, and/or construction of storage areas to eliminate local impacts from small stage increase in the primary system, if any.



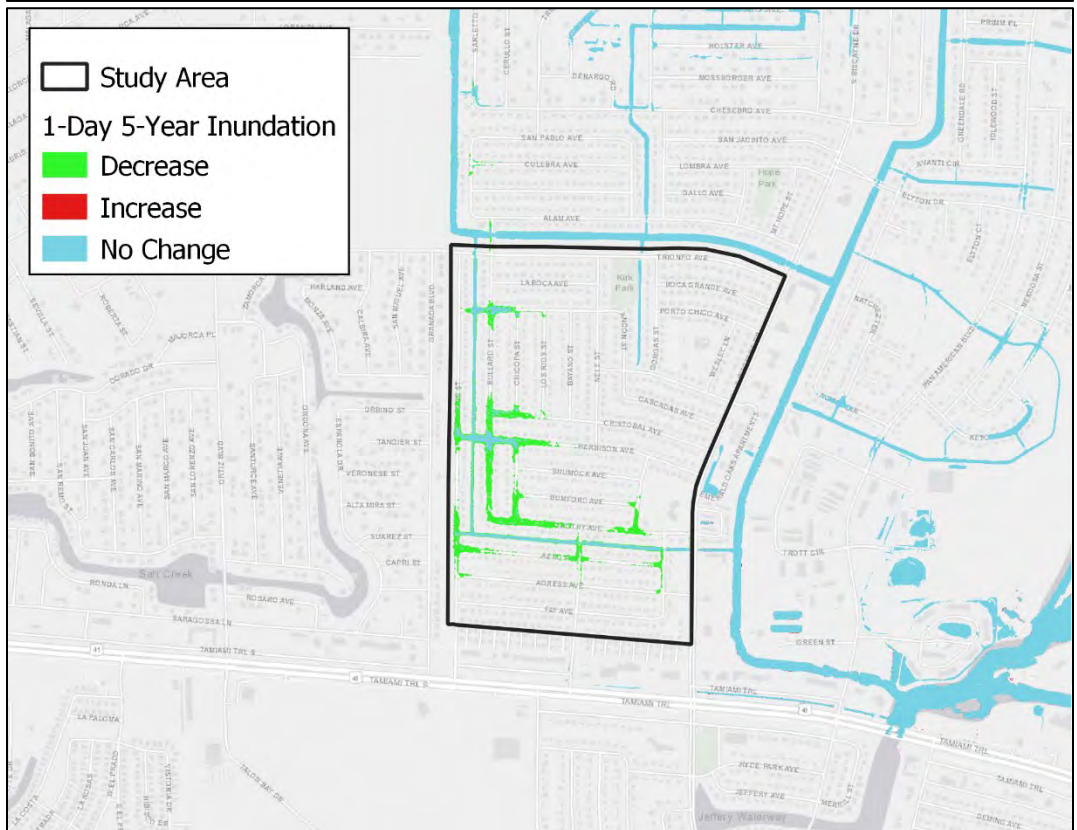
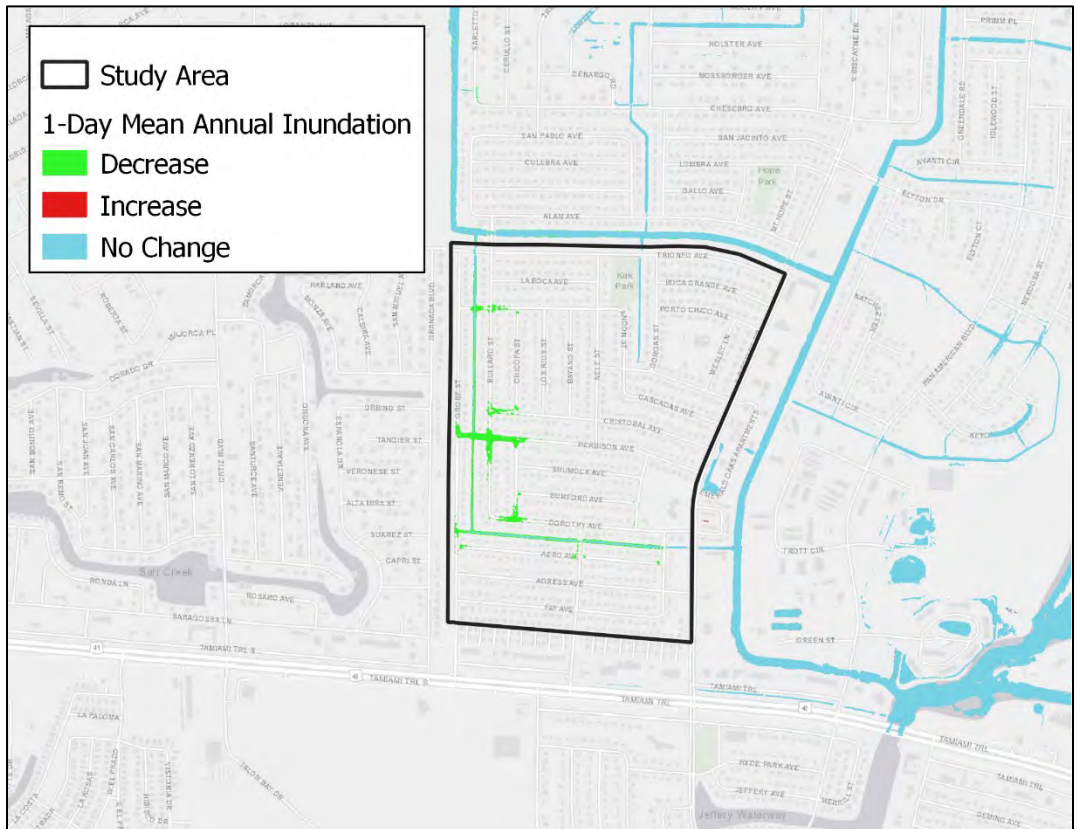


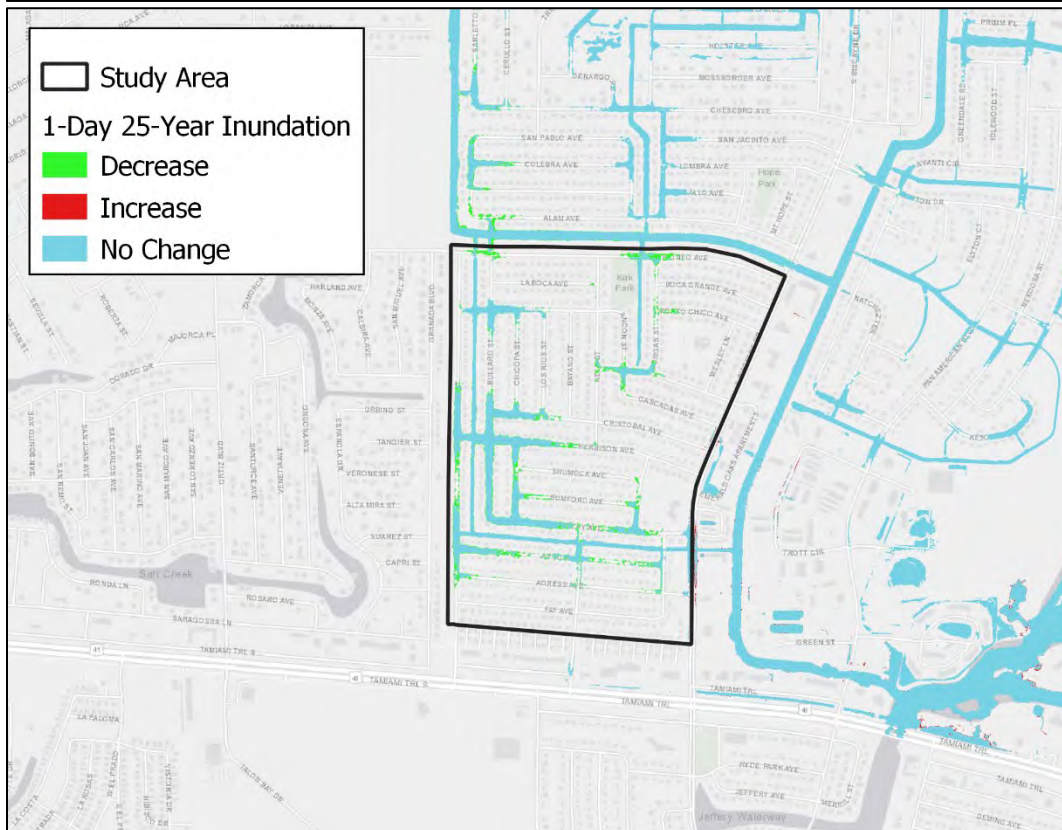
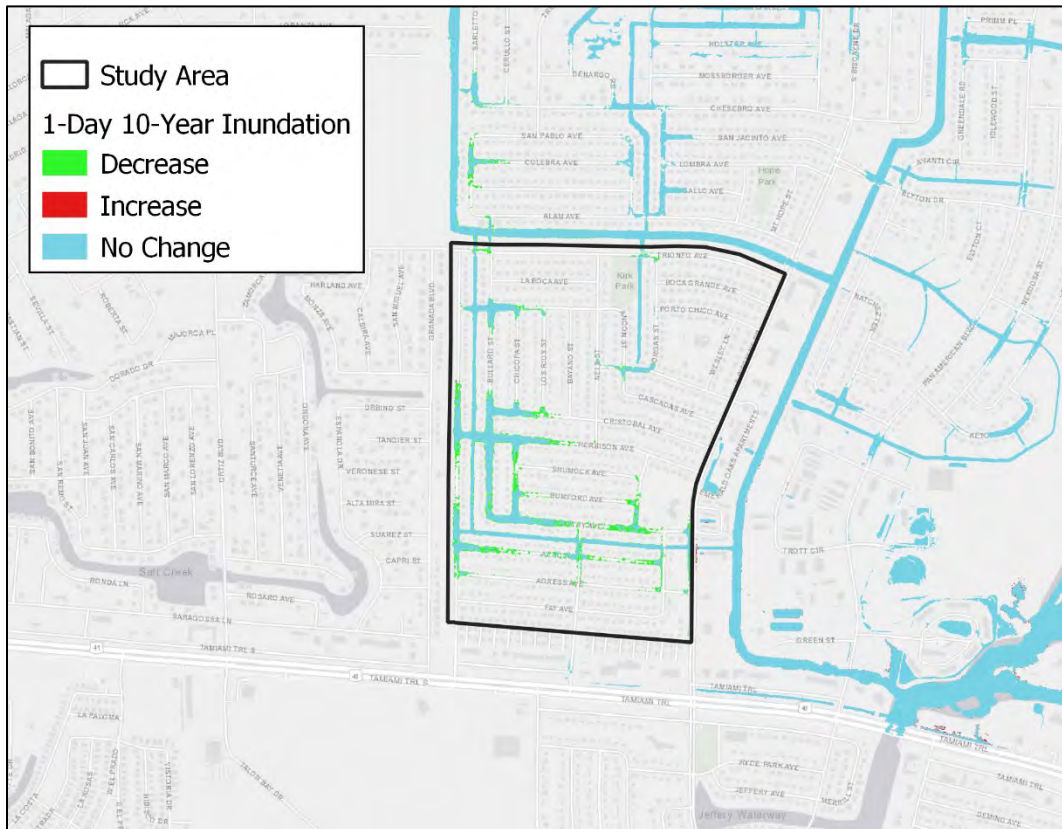


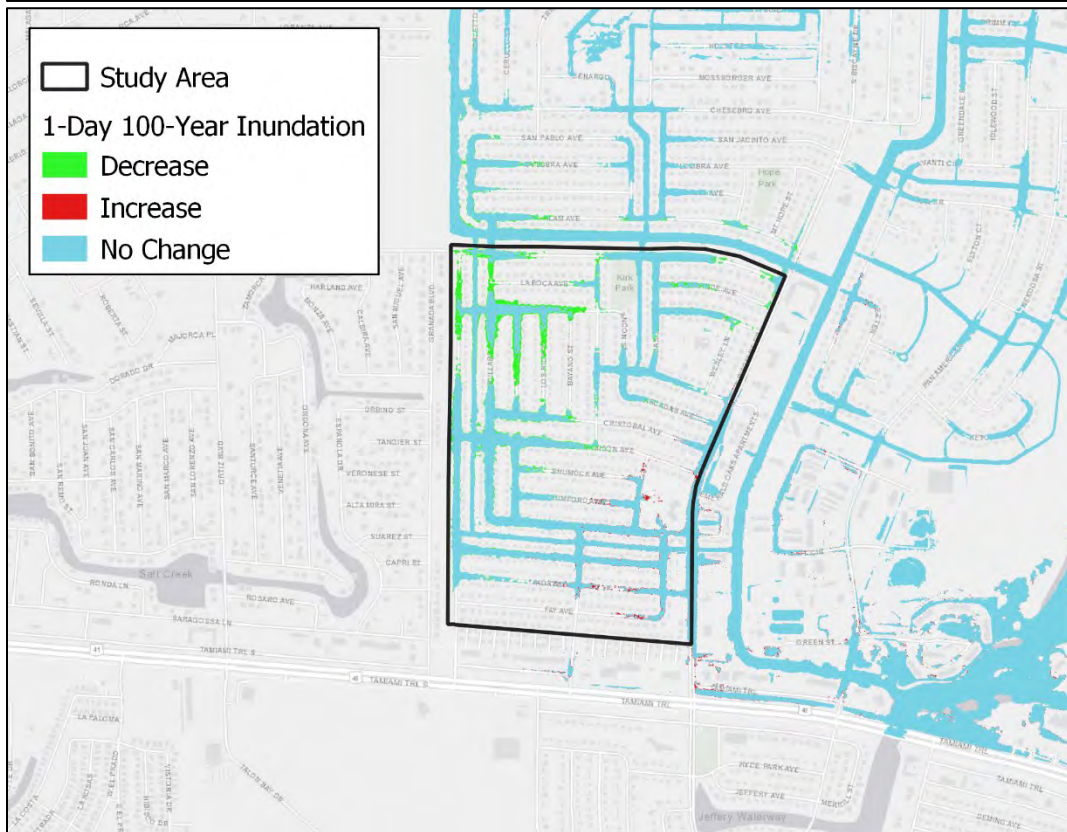
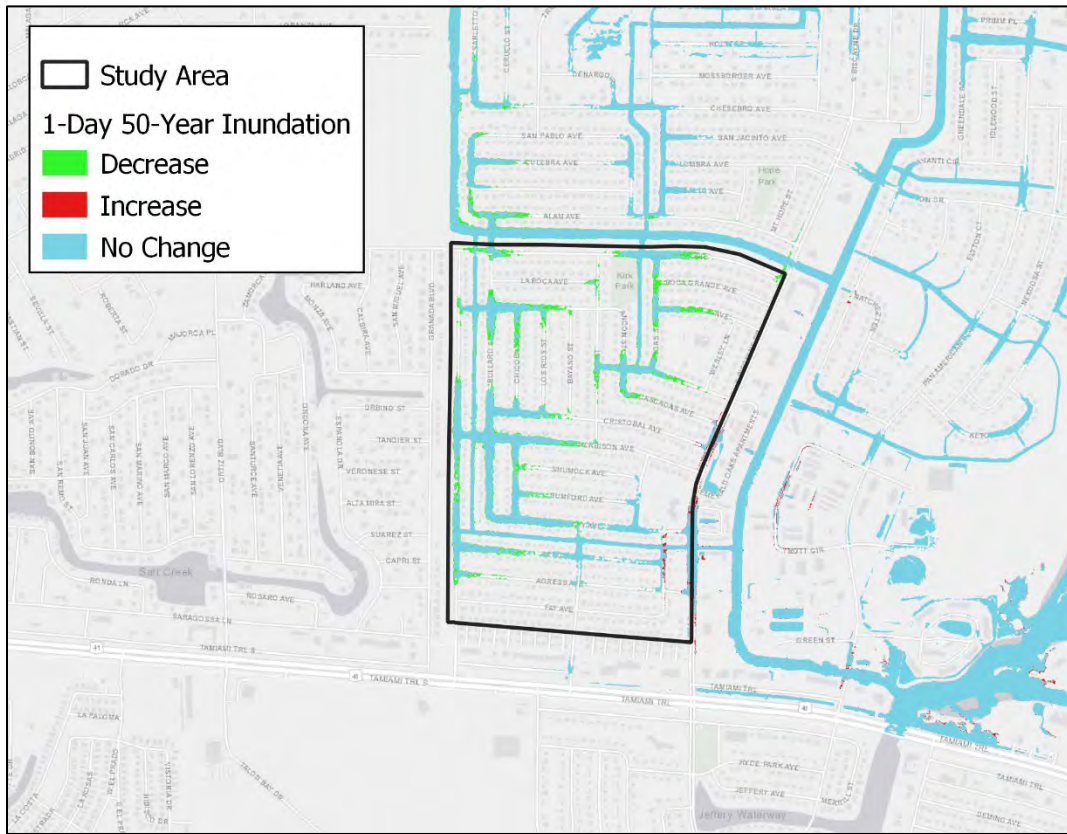
Flood Area Reduction in the Dorothy Avenue Study Area

The following figures illustrate the reduced extent of inundation in the Dorothy Avenue study area for Mean Annual through 100-year storm events for the updated stormwater management master plan model, excluding the inflow reduction option.

The conceptual plan focuses on improvements to primary components of the stormwater management system to reduce large-scale regional flooding in the City of North Port. Adjacent areas where minor increases may result from primary system improvements have been identified. Appurtenant facilities may be required to eliminate local increases in some isolated areas. It is understood that design of additional facilities (not yet specified) may be included in future applications for phased construction, including, but not limited to, addition of flap gates, local collection system modifications, and/or construction of storage areas to eliminate local impacts from small stage increase in the primary system, if any.







Appendix A
Benefit Cost Ratio Calculations

Drainage Improvement Components and Probable Construction Costs

Project Components	Existing		Full Plan	
	101	104B	101	104B
Existing Condition*	x	x	-	-
Dorothy (Single Box Culvert)	-	-	-	-
Dorothy (Triple Box Culvert)	-	x	-	-
R-36 Improvements	-	x	-	-
Bypass (flowway, n = 0.040)	-	x	-	-
Bypass (wetland, n = 0.150)	-	-	-	-
Reduce Northern Inflows	-	-	-	-
Other Planned Improvements	-	-	-	-
Estimated Combined Cost	\$ -	\$ -	\$ 38,129,391	\$ -
Estimated Annualized Cost	\$ -	\$ -	\$ 2,762,850	\$ -

Engineer's Estimate of Probable Construction Cost (by Component)

Existing Condition	\$ -
Dorothy (Single Box Culvert)	\$ 1,299,000
Dorothy (Triple Box Culvert)	\$ 5,628,495
R-36 Improvements	\$ 15,379,020
Bypass (flowway, n = 0.040)	\$ 17,121,876
Bypass (wetland, n = 0.150)	\$ 20,546,251
Other Planned Improvements	\$ 2,000,000

1.2 = multiplier on Bypass cost to create wetland

7% Interest Rate
50 Number of Years
13.800746 Present Value Annuity Factor
(Considers capital cost only, no annual maint., etc.)

Flood Area Reduction and Cost (\$1000 per acre removed)

Flood Area (acres)	2.33-year		5-year		10-year		25-year		50-year		100-year	
	Area	7891	7668	9076	8744	10342	9915	11094	10647	11898	11432	13366
Reduction (acres)	-	223	-	332	-	427	-	447	-	466	-	489
Cost \$1000/ac removed	-	\$171	-	\$115	-	\$89	-	\$85	-	\$82	-	\$78

Estimates of Benefits and BCR - Road Flood Reduction

Flooded Road (feet)	2.33-year		5-year		10-year		25-year		50-year		100-year	
	Area	83668	43056	196065	131741	417032	326657	597989	501959	828185	730820	1246274
Reduction (miles)	-	7.7	-	12.2	-	17.1	-	18.2	-	18.4	-	22.0
Cost \$1000/mi removed	-	\$4,957	-	\$3,130	-	\$2,228	-	\$2,096	-	\$2,068	-	\$1,735

Est. Annualized Benefit (A) \$ 364,339
Est. Benefit/Cost Ratio (BCR) 0.13

Lit Review	North Port Bond	Miles	\$/mile	\$/LF	\$/LF 2-Ln Rd
	\$ 46,000,000.00	266	\$ 172,932	\$ 32.75	\$ 65.50

(RS Means vs Bond)	RS Means	RS Means	RS Means	width	SY	\$/SY	Cost	\$/mile
	planing and cleansing	\$ 1.53	32.01	16.71	5200			
	grooving	\$ 1.01	32.01	16.71	5350			
	paving	\$ 19.00	3212	16.19	0200			
	15	2340800	\$ 21.54	\$ 50,420,832.00	\$ 189,552.00			

other sources for range
\$ 120,000 per mile asphalt repaving
\$ 350,000 per mile asphalt repaving
\$ 23 per LF
\$ 66 per LF

USE:
\$200,000 per mile flood removed
\$50,000 Average benefit (or damages averted) per mi of 2-ln roadway
0 Est revenue revenue generated by change in property's flood frequency status

Assume: \$50,000 Roadway Benefit per mile per Flood Avoided

Estimates of Benefits and BCR - Parcels Flooded Reduction (touch)

Flooded Parcels (touch)	2.33-year		5-year		10-year		25-year		50-year		100-year	
	Area	7780	6960	12373	11303	18134	17073	21844	20817	25887	24788	32011
Reduction (touch)	-	820	-	1070	-	1061	-	1027	-	1099	-	1175
Cost \$1000/parcel removed	-	\$46	-	\$36	-	\$36	-	\$37	-	\$35	-	\$32

Est. Annualized Benefit (B) \$ 148,337
Est. Benefit/Cost Ratio (BCR) 0.05

Assume: (For partially impacted lots)
\$ 250.00 Per Parcel Benefit per Flood Avoided

250 Average benefit (or damages averted) per parcel per event
0 Est TAX revenue generated by change in property's flood frequency status

Estimates of Benefits and BCR - Parcels Flooded Reduction (centroid)

Flooded Parcels (centroid)	2.33-year		5-year		10-year		25-year		50-year		100-year	
	Area	783	549	1091	689	1399	884	1580	1065	1799	1290	2408
Reduction (centroid)	-	234	-	402	-	515	-	515	-	509	-	505
Cost \$1000/parcel removed	-	\$163	-	\$95	-	\$74	-	\$74	-	\$75	-	\$76

Est. Annualized Benefit (C) \$ 1,396,620
Est. Benefit/Cost Ratio (BCR) 0.51

Assume: (For fully inundated lots)
\$ 6,300.00 Average Per Parcel Benefit per Flood Avoided

42000 Ave Flood Claim 2008-2012 (FEMA, 2017)
15% Adj down from Ave Flood Claim
Adjust down to account for vacant lots

6300 Add'l average benefit (or damages averted) per parcel per event for Centroid Inundated
0 Est tax revenue revenue generated by change in property's flood frequency status

Typ Home Value: 0 > 0 assumes conversion to occupied lot
Millage: 15.4017 Total (0 or \$150,000)
11.9947 Countywide NPT
3.407 NPT

0 est. non-ad velorem (0 or \$ 540)

	Flood Reduction (acres)	Road Flood Reduction (miles)	Parcels Reduction (centroid)
2.33-year	223	7.7	234
5-year	333	12.2	402
10-year	427	17.1	515
25-year	448	18.2	515
50-year	466	18.4	509
100-year	489	22.0	505

4.0% 13.800746

Engineer's Estimate of Probable Construction Cost (Based on RS Means 2017, with costs projected at 4% inflation)

	2017	2020	2025	2030	2035
Dorothy (Triple Box Culvert)	\$ 5,628,495	\$ 6,331,291	\$ 7,702,984	\$ 9,371,858	\$ 11,402,298
R-36 Improvements	\$ 15,379,020	\$ 17,299,306	\$ 21,047,251	\$ 25,607,199	\$ 31,155,073
Bypass (flowway, n = 0.040)	\$ 17,121,876	\$ 19,259,782	\$ 23,432,470	\$ 28,509,182	\$ 34,685,779
Estimated Combined Cost	\$ 38,129,391	\$ 42,890,379	\$ 52,182,704	\$ 63,488,239	\$ 77,243,150
Estimated Annualized Cost*	\$ 2,762,850	\$ 3,107,830	\$ 3,781,151	\$ 4,600,348	\$ 5,597,027

* Combined construction cost annualized over 50 years at 7%, 13.8 PV Annuity Factor (capital cost only, excludes O&M)

Preliminary Estimate of Acquisition Cost

	2019	2020	2025	2030	2035
Estimated Property Value*	\$ 4,325,200	\$ 4,498,208	\$ 5,472,758	\$ 6,658,447	\$ 8,101,018
Estimated Annualized Cost**	\$ 313,403	\$ 325,939	\$ 396,555	\$ 482,470	\$ 586,999

* Combined "Just Value" of properties inundated 50% or more by flooding from the 10-year 24-Hour Storm Event



ACQUISITION OF FLOODED PROPERTIES IN BIG SLOUGH FLOOD STUDY AREA

**City of North Port
Commission
Workshop
December 2, 2019**



Slide 1

Purpose of Workshop

- Review Commission direction from the March 4, 2019, Commission Workshop on Big Slough Flood Reduction Study.
- Discuss acquisition of flooded properties.
- Discuss available grant funding.
- Discuss priorities of property acquisition.

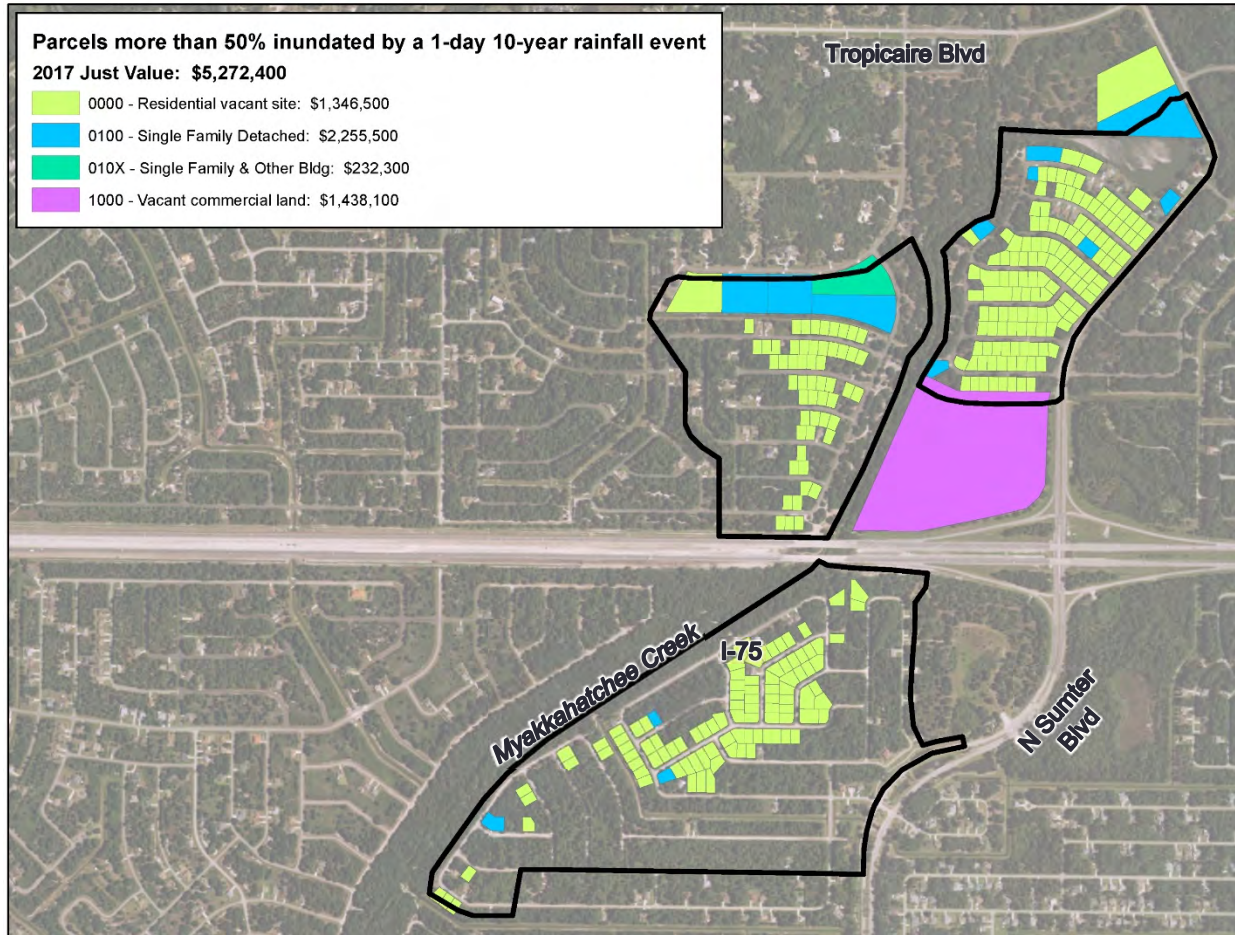
Recap of Consultant's Engineer's Opinion of Probable Cost in March 4, 2019, Workshop

	Engineer's Estimate of Probable Construction Cost (Based on RS Means 2017, with costs projected at 4% inflation)				
	<u>2017</u>	<u>2020</u>	<u>2025</u>	<u>2030</u>	<u>2035</u>
Dorothy (Triple Box Culvert)	\$ 5,628,495	\$ 6,331,291	\$ 7,702,984	\$ 9,371,858	\$ 11,402,298
R-36 Improvements	\$ 15,379,020	\$ 17,299,306	\$ 21,047,251	\$ 25,607,199	\$ 31,155,073
Bypass (flowway, n = 0.040)	\$ 17,121,876	\$ 19,259,782	\$ 23,432,470	\$ 28,509,182	\$ 34,685,779
Reduce Northern Inflows	\$ 2,575,105	\$ 2,896,643	\$ 3,524,209	\$ 4,287,739	\$ 5,216,690
Estimated Combined Cost	\$ 40,704,496	\$ 45,787,022	\$ 55,706,913	\$ 67,775,978	\$ 82,459,840
Estimated Annualized Cost*	\$ 2,949,442	\$ 3,317,721	\$ 4,036,515	\$ 4,911,037	\$ 5,975,028

** Combined construction cost annualized over 50 years at 7%, 13.8 PV Annuity Factor (capital cost only, excludes O&M)*

RS Means Heavy Construction Costs, adjusted to Ft Myers/Sarasota County area, for engineering design, permitting and construction with 30% contingency.

March 4, 2019, Workshop – Flooded Properties Based on 50% Inundated by a 1-day 10-year Rainfall

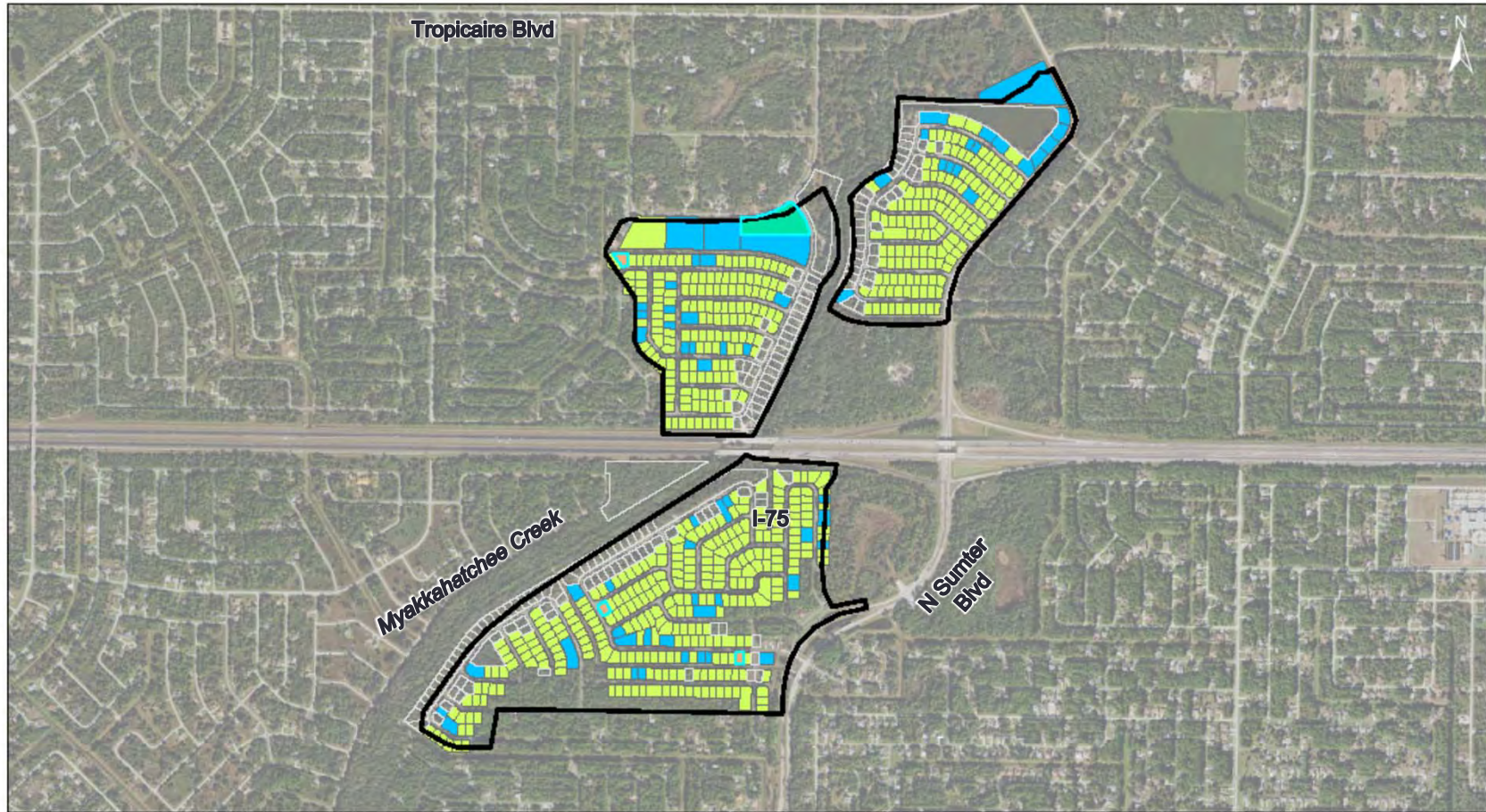


	Preliminary Estimate of Acquisition Cost (Based on Sarasota County Property Appraiser 2017, projected at 4% inflation)				
	2017	2020	2025	2030	2035
Estimated Property Value*	\$ 5,272,400	\$ 5,930,733	\$ 7,215,643	\$ 8,778,934	\$ 10,680,915
Estimated Annualized Cost**	\$ 382,037	\$ 429,740	\$ 522,844	\$ 636,120	\$ 773,937

* Combined "Just Value" of properties inundated 50% or more by flooding from the 10-year 24-Hour Storm Event
 ** Cost annualized over 50 years at 7%, 13.8 PV Annuity Factor (estimated acquisition cost only)

Update Based on Flood Properties 50% Inundated by a 1-day 10-year Rainfall and Include Parcels Along Flooded Streets

Path: E:\Long Term Archives\Deloach\eei\16-00400-00\GIS\ArcLayouts\20190805 - Parcel Acquisition Analysis\1D10Y Inundation.mxd



Study Area	0100 - Single Family Detached (64): \$11,430,800
0000 - Residential Vacant Site (570): \$2,556,400	010X - Single Family & Other Bldg (1): \$252,400
0001 - Residential New Construction, not Complete (3): \$19,700	Publicly Owned Parcels (152): \$1,065,200

PARCELS MORE THAN 50% INUNDATED OR IN PROXIMITY TO A ROAD FLOODED BY A 1-DAY 10-YEAR RAINFALL EVENT

CITY OF NORTH PORT

1 inch = 1,000 feet

DeLoach Engineering Science
water resources and civil engineering





Notes:

Project: 16-00400-00	Date: 8/6/2019	Author: CGG
Projection: Projection: NAD83 StatePlane Florida West HARN		

Flooded Properties Acquisition Costs

April 4, 2019 - Just Values of Properties

- 50% flooded in a 1-day 10-year Storm Event.
- Along flooded roadway.

Legend	Parcel Type	No. of Parcels	April 4, 2019 Just Value
	Residential Vacant	570	\$2,556,400
	Residential Single Family Home	64	\$11,430,900
	Residential New Construction, Not Complete	3	\$19,700
	Single Family & Other Building	1	\$252,400
	Total	638	\$14,259,400

Consultant Cost for Acquisition

- Include property information reports (title searches) and appraisals for the single family homes.
- Does not include eminent domain condemnation efforts.

Consultant Activity	Cost Estimate August 2019
Property Information Reports (Title Searches)	\$319,000
Land Acquisition Negotiations	\$2,552,000
Appraisal	\$100,000
Closings	\$200,000
Total	\$3,171,000

Slide 7

Grant Funding

- Florida Communities Trust (FCT)

<https://floridadep.gov/lands/land-and-recreation-grants/content/fct-florida-communities-trust-home>

- FDEP administered program with funding from Florida Forever proceeds.
- Provides funding to local governments and eligible nonprofit organizations to acquire land for parks, open space, greenways.

- Trust for Public Lands (TPL)

<https://www.tpl.org/>

- TPL helps structure, negotiate, and complete land transactions that create parks, playgrounds, and protected natural areas.
- TPL buy land from willing landowners and then transfers it to public agencies, land trusts, or other groups for permanent protection.

- Federal Emergency Management Agency Hazard Mitigation Grant Program (HMGP)

<https://www.fema.gov/hazard-mitigation-grant-program>

- Following Presidential Major Disaster Declaration, HMGP grants may be available to individuals, businesses and private nonprofits via local governments to purchase property that has been subject to or is in danger of repetitive damage.

Discussion / Recommendations

- Continue with the Myakkahatchee Creek blockage removal efforts.
- After completing creek blockage removal project, re-evaluate the need to acquire properties after two or three rainy seasons.
- Continue flow channel maintenance efforts of creek, canals, retention ditches and roadside swales.
- Install “**Road Subject to Flooding**” signs at key locations.
- Prioritize acquisition of vacant lots within Study area.
 1. Vacant parcels nearest to Myakkahatchee Creek along flooded streets. Negotiate first with willing sellers.
 2. Vacant parcels 50% inundated in 1-day 10-year storm.
- Same priority as above except add acquisition of parcels with constructed homes ?
- Pursue grant funding for property acquisition.




City of North Port
DEPARTMENT OF PUBLIC WORKS
Office: 941.240.8050
Fax: 941.240.8063



MEMORANDUM

TO: Jason Yarborough, ICMA-CM, Acting City Manager

THROUGH: Cari Branco, Assistant City Manager

FROM: Juliana B. Bellia, Director 

SUBJECT: Item No. 246: Financial Impact of Removing Suggested Purchase Properties with the Big Slough Flood Study Area from Tax Roll

DATE: September 4, 2020

During the City Commission Workshop held on December 2, 2019, staff was directed to provide the financial impact of removing suggested purchased properties within Big Slough Flood Study area from tax roll, provide map of locations along creek where our Operations personnel will be removing creek blocks, and investigate available property for possible "property swap."

FINANCIAL IMPACT TO THE TAX ROLL OF REMOVED LOTS

The Big Slough Flood Reduction Study identified a total of 647 properties/lots within the Study area near the Myakkahatchee Creek and I-75 bridge that will be subject to flooding for the 10-year, 25-year and 100-year storm events. The following provides a breakdown of the 647 affected properties:

- Vacant single-family lots: 579
- Lots developed with single family residences: 65
- Lots in the construction process for single-family residences: 3

The financial impact of removing these lots from the tax roll was determined utilizing 2019 data from the websites of the Sarasota County Tax Collector and the Sarasota County Property Appraiser. The financial impacts only include the City of North Port mileage portion and the Non-Ad Valorem Assessments for the Fire Rescue District, Road and Drainage District, Solid Waste District and Capital Road Bond.

Jason Yarborough, ICMA-CM, Acting City Manager
September 4, 2020
Page Two

Based on the 2019 data included in the Sarasota County Tax Collector's website, the financial impact of removing all the lots subject to flooding and highlighted by the Big Slough Flood Reduction Study will total approximately \$272,500.00 per year. *(See Attachment 1).*

MAP DELINEATING MYAKKAHATCHEE CREEK BLOCKAGES

The Myakkahatchee Creek Blockage Removal Project typically takes place in the dry season between the months of December and May. The blockages have been identified and are delineated on a map. *(See Attachment 2).*

The direct pathway to each blockage has not yet been determined and therefore are not delineated on the attached map. Staff is currently evaluating potential pathways/access points to determine the alternatives that will have the least environmental impact.

Prior to the start of the Myakkahatchee Creek Blockage Removal Project, environmental surveys of the selected pathways/access points will be completed, and the entire Project Plan will be presented to the Commission.

AVAILABLE CITY-OWNED PROPERTY FOR POTENTIAL "PROPERTY SWAP"

The City of North Port currently owns a total of 554 single family residential lots within the City limits that can be considered for a property swap with the vacant single family lots included in the Big Slough Flood Reduction Study.

Should you have any questions, or desire any additional information, please do not hesitate to contact me.

JBB/jbb

Attachments:

- 1) Spreadsheets for Breakdown of Taxes and Assessments
- 2) Map Delineating Myakkahatchee Creek Blockages

Cc: PW Electronic File
Gerardo Traverso, P.E., P.M.P., Engineering Manager
Chuck Speake, Operations and Maintenance Manager
Frank Miles, MPA, Director, Department of Neighborhood Development Services

Attachment 1

RESIDENTIAL LOTS CONSTRUCTION STARTED BUT NOT COMPLETED TO DATE

	Account	Owner Name	2019 Ad-Valorem			2019 Non Ad-Valorem				Total
			Ass/Tax Value	Millage Rate-City	Total Tax	Fire & Rescue	Road & Drainage	Capital Road Bond	Solid Waste	
1	954142463	MAKSIMCHUK VASILYI	\$4,246.00	3.8735	\$16.45	\$85.66	\$171.56	\$46.00	\$245.00	\$564.67
2	953152605	HOMES MADE POSSIBLE HOMES LLC	\$3,171.00	3.8735	\$12.28	\$85.66	\$171.56	\$46.00	\$0.00	\$315.50
3	954142701	TERRA CORAL LLC	\$4,392.00	3.8735	\$17.01	\$85.66	\$171.56	\$46.00	\$245.00	\$565.23

\$45.74 \$256.98 \$514.68 \$138.00 \$490.00

Totals \$1,445.40 \$1,445.40

Total all Properties. **\$265,635.69**

SINGLE DETACHED HOMES

	Account	Owner Name	2019 Ad-Valorem			2019 Non Ad-Valorem				Totals
			Ass/Tax Value	Millage Rate-City	Total Tax	Fire & Rescue	Road & Drainage	Capital Road Bond	Solid Waste	
1	942153204	FOLLMER RAYMOND	\$175,299.00	3.8735	\$679.02	\$310.28	\$171.56	\$46.00	\$245.00	\$1,451.86
2	942080003	PARFENCHUK RUTH A	\$188,691.38	3.8735	\$730.90	\$333.98	\$171.56	\$46.00	\$245.00	\$1,527.44
3	954142913	SCHIAU SERGHEI	\$173,787.77	3.8735	\$673.17	\$307.60	\$171.56	\$46.00	\$245.00	\$1,443.33
4	942080002	HARRIS DEWEY R	\$211,473.86	3.8735	\$819.14	\$374.31	\$171.56	\$46.00	\$245.00	\$1,656.01
5	954142926	HAYES CORY ALLEN	\$118,662.30	3.8735	\$459.64	\$210.03	\$171.56	\$46.00	\$245.00	\$1,132.23
6	942153307	NEW VISTA RESIDENCES INC	\$153,768.96	3.8735	\$595.62	\$272.17	\$171.56	\$46.00	\$245.00	\$1,330.36
7	954141738	KING BOBBY G	\$135,655.44	3.8735	\$525.46	\$240.11	\$171.56	\$46.00	\$245.00	\$1,228.13
8	954143217	ANGOTTI SONDR A CHARISLE	\$168,909.00	3.8735	\$654.27	\$298.97	\$171.56	\$46.00	\$245.00	\$1,415.80
9	954142459	HOWETT RICHARD R	\$43,997.28	3.8735	\$170.42	\$267.16	\$171.56	\$46.00	\$245.00	\$900.14
10	953151931	FITZNER KENNETH ROBERT	\$0.00	3.8735	\$0.00	\$223.16	\$171.56	\$46.00	\$245.00	\$685.72
11	954143221	YORK JOSHUA	\$210,422.70	3.8735	\$815.07	\$372.45	\$171.56	\$46.00	\$245.00	\$1,650.08
12	954142437	COMPERDA MICHAEL G	\$133,965.29	3.8735	\$518.91	\$237.12	\$171.56	\$46.00	\$245.00	\$1,218.59
13	955153218	DE CLERCQ JEFFREY	\$118,438.65	3.8735	\$458.77	\$232.70	\$171.56	\$46.00	\$245.00	\$1,154.03
14	954142522	CHAPMAN BYRON JAMES	\$34,055.51	3.8735	\$131.91	\$235.00	\$171.56	\$46.00	\$245.00	\$829.47
15	954142467	IAFRATE JOSEPH C	\$148,485.50	3.8735	\$575.16	\$262.82	\$171.56	\$46.00	\$245.00	\$1,300.54
16	954142930	FORREST CHRISTOPHER D	\$173,748.36	3.8735	\$673.01	\$307.53	\$171.56	\$46.00	\$245.00	\$1,443.11
17	942080008	WAGNER ANA C	\$137,444.64	3.8735	\$532.39	\$243.28	\$171.56	\$46.00	\$245.00	\$1,238.23
18	954143329	KELLEY TRACY L	\$92,587.91	3.8735	\$358.64	\$238.95	\$171.56	\$46.00	\$245.00	\$1,060.15
19	954142128	ANDERSON DEBBIE A	\$191,983.29	3.8735	\$743.65	\$339.81	\$171.56	\$46.00	\$245.00	\$1,546.02
20	942080004	BORER ELIZABETH	\$277,853.18	3.8735	\$1,076.26	\$491.80	\$171.56	\$46.00	\$245.00	\$2,030.62
21	942080001	WIERSMA VERNON L	\$191,130.23	3.8735	\$740.34	\$338.30	\$171.56	\$46.00	\$245.00	\$1,541.20
22	954142456	MAKSIMCHUK DMITRY	\$102,600.00	3.8735	\$397.42	\$239.66	\$171.56	\$46.00	\$245.00	\$1,099.64
23	942080011	PORTER SHARON F	\$202,626.90	3.8735	\$784.88	\$358.65	\$171.56	\$46.00	\$245.00	\$1,606.08
24	954142925	PAUL ALAN & PAMELA JUNE LUTZ REVOCABLE TRUST	\$165,707.61	3.8735	\$641.87	\$293.30	\$171.56	\$46.00	\$245.00	\$1,397.73
25	942080007	LA CROIX FREDERICK R	\$130,189.86	3.8735	\$504.29	\$230.44	\$171.56	\$46.00	\$245.00	\$1,197.29
26	953152217	BRENTWOOD NP LLC	\$169,628.94	3.8735	\$657.06	\$300.24	\$171.56	\$46.00	\$245.00	\$1,419.86
27	954141810	OSBORNE JOHN R	\$50,397.93	3.8735	\$195.22	\$267.16	\$171.56	\$46.00	\$245.00	\$924.94
28	953151934	KOSZ MONIKA	\$90,768.89	3.8735	\$351.59	\$223.00	\$171.56	\$46.00	\$245.00	\$1,037.15
29	942153205	HINGER RICHARD	\$80,060.31	3.8735	\$310.11	\$254.00	\$171.56	\$46.00	\$245.00	\$1,026.67
30	954142518	POLOVICH PHILIP	\$132,805.50	3.8735	\$514.42	\$235.07	\$171.56	\$46.00	\$245.00	\$1,212.05
31	954142605	FORTH CHARLES A	\$62,128.91	3.8735	\$240.66	\$238.00	\$171.56	\$46.00	\$245.00	\$941.22
32	953152214	GLENRIDGE ESTATES LLC	\$131,128.13	3.8735	\$507.92	\$232.10	\$171.56	\$46.00	\$245.00	\$1,202.58
33	942153301	ATKINSON CURTIS M	\$55,979.60	3.8735	\$216.84	\$278.00	\$171.56	\$46.00	\$245.00	\$957.40
34	953141113	MORNINGSTAR JOSEPH H	\$235,078.52	3.8735	\$910.58	\$416.09	\$171.56	\$46.00	\$245.00	\$1,789.23
35	953152103	MATHIEU PAUL	\$292,555.50	3.8735	\$1,133.21	\$517.82	\$171.56	\$46.00	\$245.00	\$2,113.60
36	942080005	NEWHALL SUSAN RAE	\$258,688.50	3.8735	\$1,002.03	\$457.88	\$171.56	\$46.00	\$245.00	\$1,922.47
37	944152728	KAPPELMANN KEITH D	\$26,625.00	3.8735	\$103.13	\$215.00	\$171.56	\$46.00	\$245.00	\$780.69
38	953152222	TILLMAN DAVID S	\$164,968.50	3.8735	\$639.01	\$291.99	\$171.56	\$46.00	\$245.00	\$1,393.56
39	954143311	EDWARDS LENA E	\$86,487.59	3.8735	\$335.01	\$256.00	\$171.56	\$46.00	\$245.00	\$1,053.57

SINGLE DETACHED HOMES

40	954142520	THOMPSON DAVID L (CO-TTEE)	\$238,879.50	3.8735	\$925.30	\$422.82	\$171.56	\$46.00	\$245.00	\$1,810.68
41	954143215	RIVERA LEONARDO JR	\$61,695.45	3.8735	\$238.98	\$243.00	\$171.56	\$46.00	\$245.00	\$944.54
42	953152324	WINTER MARTIN D	\$26,092.50	3.8735	\$101.07	\$217.89	\$171.56	\$46.00	\$245.00	\$781.52
43	953152614	MAIGRET STEPHEN	\$101,481.72	3.8735	\$393.09	\$223.00	\$171.56	\$46.00	\$245.00	\$1,078.65
44	942153206	MANNING LAWRENCE W	\$54,960.39	3.8735	\$212.89	\$239.76	\$171.56	\$46.00	\$245.00	\$915.21
45	942153308	NEW VISTA RESIDENCES INC	\$131,504.07	3.8735	\$509.38	\$232.76	\$171.56	\$46.00	\$245.00	\$1,204.70
46	954142458	WILLIAMS ANNIE M	\$186,481.50	3.8735	\$722.34	\$330.07	\$171.56	\$46.00	\$245.00	\$1,514.97
47	953152628	ABAJIAN ANN	\$75,010.08	3.8735	\$290.55	\$234.00	\$171.56	\$46.00	\$245.00	\$987.11
48	967060743	MERRING AUSTIN	\$159,111.00	3.8735	\$616.32	\$281.63	\$171.56	\$46.00	\$245.00	\$1,360.50
49	953152515	KLEIN ANNA	\$161,880.00	3.8735	\$627.04	\$286.53	\$171.56	\$46.00	\$245.00	\$1,376.13
50	953152518	HOWETT KRISTIN	\$68,909.76	3.8735	\$266.92	\$265.90	\$171.56	\$46.00	\$245.00	\$995.38
51	954141739	ADORNA TOM	\$86,689.94	3.8735	\$335.79	\$254.80	\$171.56	\$46.00	\$245.00	\$1,053.15
52	953141110	THURSTON JEFFREY M	\$115,047.69	3.8735	\$445.64	\$203.63	\$171.56	\$46.00	\$245.00	\$1,111.83
53	954142627	WJHFL LLC	\$131,600.00	3.8735	\$509.75	\$232.93	\$171.56	\$46.00	\$245.00	\$1,205.24
54	954142515	CSMA FT LLC	\$113,422.50	3.8735	\$439.34	\$200.76	\$171.56	\$46.00	\$245.00	\$1,102.66
55	954142630	SUTTER JOHN	\$149,600.00	3.8735	\$579.48	\$264.79	\$171.56	\$46.00	\$245.00	\$1,306.83
56	967060701	MULLEN MARK F	\$194,469.00	3.8735	\$753.28	\$344.21	\$171.56	\$46.00	\$245.00	\$1,560.05
57	942041904	SCOTT JOSEPH W	\$111,701.46	3.8735	\$432.68	\$243.00	\$171.56	\$46.00	\$245.00	\$1,138.24
58	953152415	MC MILLAN MICHAEL	\$143,624.84	3.8735	\$556.33	\$254.22	\$171.56	\$46.00	\$245.00	\$1,273.11
59	953152221	LONG JR DAVID L	\$26,625.00	3.8735	\$103.13	\$254.67	\$171.56	\$46.00	\$245.00	\$820.36
60	953152513	CABRERA ROLANDO	\$130,462.50	3.8735	\$505.35	\$230.92	\$171.56	\$46.00	\$245.00	\$1,198.83
61	953151933	MINA CYNTHIA G	\$81,642.90	3.8735	\$316.24	\$256.00	\$171.56	\$46.00	\$245.00	\$1,034.80
62	954142803	GAILLARD CHELSEA	\$142,446.95	3.8735	\$551.77	\$252.13	\$171.56	\$46.00	\$245.00	\$1,266.46
63	953152713	DE CLERQ JR DONALD H	\$26,625.00	3.8735	\$103.13	\$247.98	\$171.56	\$46.00	\$245.00	\$813.67
64	953141111	TRUST AGREEMENT DATED 02/09/1999	\$230,892.00	3.8735	\$894.36	\$408.68	\$171.56	\$46.00	\$245.00	\$1,765.60
65	953141112	UTT KEITH V	\$111,656.73	3.8735	\$432.50	\$265.00	\$425.26	\$46.00	\$245.00	\$1,413.76

\$33,239.66 \$18,333.01 \$11,405.10 \$2,990.00 \$15,925.00

Totals \$81,892.77 \$81,892.77

VACANT LOTS

	Account	Owner Name	2019 Ad-Valorem			2019 Non Ad-Valorem				Total
			Ass/Tax Value	Millage Rate-City	Total Tax	Fire & Rescue	Road & Drainage	Capital Road Bond	Solid Waste	
1	942153207	RE & C INVESTMENT LLC	\$3,800.00	3.8735	\$14.72	\$85.66	\$171.56	\$46.00	\$0.00	\$317.94
2	942153326	NEW VISTA PROPERTIES INC	\$3,400.00	3.8735	\$13.17	\$85.66	\$171.56	\$46.00	\$0.00	\$316.39
3	942080009	NORMAN WILLIAM	\$18,041.10	3.8735	\$69.88	\$85.66	\$171.56	\$46.00	\$0.00	\$373.10
4	942153324	ABREU VICTOR A	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
5	954142808	RIVERSIDE LAND HOLDINGS LLC	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
6	955153007	GMINDER RUSSELL	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
7	954142717	IVANENKO PETER	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
8	942153208	SILVER FROND INVESTMENTS LLC	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
9	953152011	AIEL INVESTMENT LLC	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
10	942153323	CRONKEY JOSEPH E	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
11	953152117	CAMPBELL CARL G	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
12	942153310	NEW VISTA PROPERTIES INC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
13	954141727	PHAM DUC M	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
14	955152912	WILLIAMS WALTER E JR	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
15	954142528	MONTALVO EDUARDO R	\$4,961.84	3.8735	\$19.22	\$85.66	\$171.56	\$46.00	\$0.00	\$322.44
16	954142233	JIMENEZ HERBERT	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
17	954142221	PHILLIPS ANDREW	\$14,458.44	3.8735	\$56.00	\$85.66	\$171.56	\$46.00	\$0.00	\$359.22
18	954142457	NEVIS FOUR LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
19	953152322	HALE ROBERT D	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
20	953152201	BURKE DARCI L	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
21	955153128	PROVIDENT TRUST GROUP LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
22	955153214	MC GRATH JOSEPH P	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
23	954142224	PURFEERST JOSEPH E (TTEE)	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
24	954142236	CHEN QIAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
25	954142625	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
26	954142403	EQUITY TRUST COMPANY CUST	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
27	953152316	NEW VISTA PROPERTIES INC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
28	954143216	FICHTENBERG RONALD	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
29	955153107	CHADWICK REI6 LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
30	955153010	PLANAS TEOBALDO	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
31	954141804	OVERSEAS INVESTMENT LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
32	954142602	SMITH WILLARD J	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
33	954143114	MOORE EDWARD M JR	\$5,670.06	3.8735	\$21.96	\$85.66	\$171.56	\$46.00	\$0.00	\$325.18
34	954143115	LOY WILLIAM M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
35	954142811	PAJUNAR AMOR G (TTEE)	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
36	954142920	DAGUE RICK JOSEPH	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
37	953152302	DELVILLAR ANGELO R	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
38	954143318	NORTH PORT LOTS AND REAL PROPERTY LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
39	954143205	HAUBER EDWARD R (TTEE)	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

40	955153115	SYNERGIC INVESTMENTS INC	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
41	955153110	EPPS MONTE (TTEE)	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
42	955153003	BURKE CHRISTOPHER P	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
43	954142804	ANTOSH WAYNE	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
44	954141729	SHABURA VLADIMIR	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
45	955153004	NEW VISTA PROPERTIES INC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
46	954142801	PERCIAL MARTHA A	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
47	954142917	VEREMCHUK ALEKSANDR	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
48	954143214	PICKETT KENNETH	\$4,639.14	3.8735	\$17.97	\$85.66	\$171.56	\$46.00	\$0.00	\$321.19
49	954142120	KRACHKO ANDREY	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
50	954142526	NOLAND JASON	\$5,245.13	3.8735	\$20.32	\$85.66	\$171.56	\$46.00	\$0.00	\$323.54
51	954142439	ZEIS ERNEST	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
52	954143317	AMBURGEY TOMMY W	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
53	954141736	HERCHENHAHN JEAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
54	953152107	SUNBELT SALES & DEVELOPMENT CORP	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
55	954143110	ADAMS GERALD (TTEE)	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
56	954143314	HOFFER CHRISTOPHER F	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
57	953151932	SUSAN CAROL FITZPATRICK REVOC LIVING TRUST	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
58	953152401	RAZZAQUE ANJUMAN J	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
59	953152313	DENIS SILVIA M	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
60	942153306	Q SMITH HOMES LLC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
61	955152707	PRIVATE EQUITY SOLUTIONS LLC	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
62	955152704	NANDIGAM KOUSHALYA	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
63	955152811	NORTH PORT LOTS AND REAL PROPERTY LLC	\$2,875.50	3.8735	\$11.14	\$85.66	\$171.56	\$46.00	\$0.00	\$314.36
64	955153108	MARINA LUPYAN TRUST	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
65	955153111	LANGE BARBARA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
66	954141748	PORCO DOMENICO	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
67	954142228	RODRIGUEZ WAYNE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
68	954143202	POWELL MICHAEL J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
69	954141723	DE LEON OSCAR	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
70	954142902	SMITH DAN	\$4,677.48	3.8735	\$18.12	\$85.66	\$171.56	\$46.00	\$0.00	\$321.34
71	955152916	NORTH PORT LOTS AND REAL PROPERTY LLC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
72	954142907	COGOLLOS ANGELA	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
73	954141751	LOURO PHILIP	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
74	954142910	CHU WANG LING	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
75	955152706	MYERS DAVID C	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
76	953151638	PAUYO CASSANDRA	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
77	954143011	OVERSEAS INVESTMENT LLC	\$4,579.50	3.8735	\$17.74	\$85.66	\$171.56	\$46.00	\$0.00	\$320.96
78	955153113	GROZA DELIA M	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
79	954142443	BALIUS GENE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
80	955153013	VIRNAN NADIA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
81	955153212	VINNIK IGOR	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
82	955153127	PROVIDENT TRUST GROUP LLC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83

VACANT LOTS

83	954142517	QUEEN VIRGINIA P	\$5,528.42	3.8735	\$21.41	\$85.66	\$171.56	\$46.00	\$0.00	\$324.63
84	954141744	BURNS JOHN J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
85	954142802	MORGAN JEFFREY C	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
86	955153125	SUSAN CAROL FITZPATRICK REVOC LIVING TRUST	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
87	955152908	SLABAUGH GLEN	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
88	954142906	HOMA GINA L	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
89	955153124	NEW VISTA PROPERTIES INC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
90	953151639	NORTH PORT LOTS AND REAL PROPERTY LLC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
91	954142601	SMITH WILLARD J	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
92	954142122	KRACHKO ANDREY	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
93	955153216	MAGGIO RONALD J	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
94	955152806	KOBEL KATHRYN	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
95	955152701	UB PROPERTIES LLC	\$2,343.00	3.8735	\$9.08	\$85.66	\$171.56	\$46.00	\$0.00	\$312.30
96	955153105	SNYDER DEVELOPMENT CORP	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
97	955153112	GOGREEN PROPERTY MGMT LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
98	954142511	CHUNG WINIFRED C	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
99	954142301	BARNETT JERRY A	\$4,677.48	3.8735	\$18.12	\$85.66	\$171.56	\$46.00	\$0.00	\$321.34
100	955152921	KOSTESKI SIMON	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
101	954142805	PAIK SON K	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
102	954143010	ALEXSOFF DEAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
103	954143009	KOSTESKI SIMON	\$4,677.48	3.8735	\$18.12	\$85.66	\$171.56	\$46.00	\$0.00	\$321.34
104	942153311	MANNELL ROBERT A	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
105	953152208	SERFOZO STEVE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
106	954142530	KARR MARTIN PALMER	\$5,005.50	3.8735	\$19.39	\$85.66	\$171.56	\$46.00	\$0.00	\$322.61
107	954142451	VERENCHUK IGOR	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
108	954142461	ESTANDA FIDEL	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
109	954142464	GMINDER RUSSELL	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
110	954142444	BALIUS GENE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
111	955152812	PEDRIQUEZ VIRGILIO V	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
112	942153304	MOLTER GREGORY	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
113	955152805	GULF COAST CONSULTING LLC	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
114	953152113	BERRYHILL TIMOTHY	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
115	954142523	BARJUCA OCTAVIAN	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
116	954142524	BEACHY FREEMAN	\$4,961.84	3.8735	\$19.22	\$85.66	\$171.56	\$46.00	\$0.00	\$322.44
117	953151633	DOWDEN SR CURLL C	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
118	954142237	DAVIS LEWIN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
119	954143320	KOLANEK IRENA (E LIFE EST)	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
120	954143204	MAKSIMCHUK VLADISLAV	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
121	954143313	HOFER CHRISTOPHER F	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
122	953152205	BRISSETT BERYL M	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
123	942153314	NORTH PORT LOTS AND REAL PROPERTY LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
124	953152102	FLORIDA RESERVE HOMES LLC	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
125	955152702	NICHOLS MEGAN	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66

VACANT LOTS

126	955152817	CANINO JOHN A JR	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
127	953152114	CAMPBELL CARL G	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
128	954142021	BRIAN W BRANCH AND DEBORAH A HUNT TRUST	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
129	954143321	SANJEF ENTERPRISES LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
130	954142404	ILLSLEY RICHARD R	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
131	955152705	DIANGSON TEODORO M	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
132	954143103	MACKE JOHN E	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
133	953151635	NEW VISTA PROPERTIES INC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
134	954142904	ROMANS REMODELING LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
135	953141109	KINNARD ALAN F	\$74,277.36	3.8735	\$287.71	\$85.66	\$171.56	\$46.00	\$0.00	\$590.93
136	954141747	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
137	954142514	PARKHILL GARY	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
138	954142624	EVANS JOAN	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
139	955153126	AGMA INTERNATIONAL LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
140	954141904	LAMKIN DOLORES	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
141	954142007	Q SMITH HOMES LLC	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
142	954143325	SANFORD STANLEY	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
143	954142448	MAO ALICE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
144	942153320	LI-CHUAN CHUANG	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
145	953152105	CHRISTOPHER ALEXANDER	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
146	942153222	WERNER FAMILY TRUST	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
147	942153305	CILLEY KATHERINE E	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
148	955153219	KARELLA ANTHONY H	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
149	954141914	HUMMEL DAVID M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
150	954143220	HILAIRE JEAN MICHEL	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
151	942153318	AMERICAN ESTATE AND TRUST	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
152	954142447	Q SMITH HOMES LLC	\$4,961.84	3.8735	\$19.22	\$85.66	\$171.56	\$46.00	\$0.00	\$322.44
153	954142004	BACCHUS ALBAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
154	954141746	GRAY JASON	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
155	954141737	HORIZON TRUST COMPANY	\$5,857.50	3.8735	\$22.69	\$85.66	\$171.56	\$46.00	\$0.00	\$325.91
156	954142709	MARTIN FAMILY TRUST	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
157	954142525	HEIVA HOLDINGS USA LLC	\$4,961.84	3.8735	\$19.22	\$85.66	\$171.56	\$46.00	\$0.00	\$322.44
158	954142705	LEWIS MIKE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
159	954141807	MILLS ERIC M	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
160	954142702	ADAMS GERALD	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
161	954141903	LAMKIN DOLORES	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
162	954141725	RAMSUBHAG OMA A	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
163	954142631	AGUAMARINA OF FLORIDA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
164	954141724	RAMSUBHAG OMA A	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
165	955153109	EPPS MONTE (TTEE)	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
166	954141808	OSBORNE JOHN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
167	954141915	SALAZAR J OCTAVIO	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
168	954143222	LYNCH MICHAEL	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

169	954143309	BALIUS GENE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
170	954143330	NGUYEN THUYLINH N	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
171	954142103	PROTOS INC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
172	953152402	MC LAIN KURT	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
173	954142617	FARRELL KEVIN M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
174	942153202	SUN PROPERTY VENTURES LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
175	954143003	BEACHY FREEMAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
176	954143106	PHAM DUC M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
177	954142718	HOWARD ANNA V	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
178	954143211	NELSON MARVIN D	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
179	953152005	BOUNDS BARBARA A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
180	954143312	HOFER CHRISTOPHER F	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
181	954143319	DAWSON PETERGAY	\$4,579.50	3.8735	\$17.74	\$85.66	\$171.56	\$46.00	\$0.00	\$320.96
182	954141802	JACOB MANOJ	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
183	953152010	CHANG TE CHUAN	\$3,401.61	3.8735	\$13.18	\$85.66	\$171.56	\$46.00	\$0.00	\$316.40
184	942153317	LORUSSO JOSEPH J	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
185	953151920	SWIFT CLEAR INVESTMENT LLC	\$3,544.32	3.8735	\$13.73	\$85.66	\$171.56	\$46.00	\$0.00	\$316.95
186	954142408	BERKHOFF-HORNIG JURGEN	\$6,603.00	3.8735	\$25.58	\$85.66	\$171.56	\$46.00	\$0.00	\$328.80
187	954143308	CHU WANG LING	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
188	953152215	NORTH PORT LOTS AND REAL PROPERTY LLC	\$3,962.87	3.8735	\$15.35	\$85.66	\$171.56	\$46.00	\$0.00	\$318.57
189	953152116	CAMPBELL CARL G	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
190	953152203	MIRRIONE JAMES	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
191	953152101	MALDONADO RADAMES	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
192	954142706	HARRIS INA P TTEE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
193	954142512	THE KINGDOM TRUST COMPANY (CUST)	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
194	954142708	COGOLLOS ANGELA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
195	953152820	ANDERS JEFFREY L	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
196	954143111	ADAMS GERALD (TTEE)	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
197	954143213	ZORO PROPERTIES LLC	\$5,927.79	3.8735	\$22.96	\$85.66	\$171.56	\$46.00	\$0.00	\$326.18
198	954143109	BROWN A EARL	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
199	954142932	MUYOT JOSEFINO F	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
200	954143113	MOORE EDWARD M JR	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
201	955153014	HUNT CHRISTOPHER	\$10,224.00	3.8735	\$39.60	\$85.66	\$171.56	\$46.00	\$0.00	\$342.82
202	954143207	CHELNOKOV VLADIMIR	\$4,381.41	3.8735	\$16.97	\$85.66	\$171.56	\$46.00	\$0.00	\$320.19
203	953152323	THOMPSON TIMOTHY A	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
204	953152003	FELIX MILHOUSE	\$3,401.61	3.8735	\$13.18	\$85.66	\$171.56	\$46.00	\$0.00	\$316.40
205	954143019	JOHANNSEN LINDA K	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
206	953152312	KOWLESSAR DEOMATTIE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
207	953152209	MALLEY JOSEPH A	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
208	954143006	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
209	953151937	GUTIERREZ REYNALDO D	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
210	955152907	ANDREWS ELIZABETH	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
211	953151634	ATCHISON THOMAS J	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50

VACANT LOTS

212	955153114	WOODS ISAAC H	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
213	955153118	RESTREPO JULIANA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
214	953151640	COMIAN X TAX LIEN FUND LLC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
215	954143002	CID DEMETRIO	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
216	954142908	HEIVA HOLDINGS USA LLC	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
217	954142931	WALLS DIANE R	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
218	954143112	CRUM CATHY	\$4,961.84	3.8735	\$19.22	\$85.66	\$171.56	\$46.00	\$0.00	\$322.44
219	954142022	WRIGHT GREGORY P	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
220	954142006	LEWIS MIKE	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
221	954142020	HUNT-BRANCH AARON	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
222	955152703	HERNANDEZ JIMMY	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
223	954143315	L I CHOICE INC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
224	955152917	SANDEEP GO LLC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
225	954142922	HEIVA HOLDINGS USA LLC	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
226	954143102	QUEEN GALEN K S	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
227	954143017	DE ANGELIS ELENA M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
228	954142806	DONN THUY VAN	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
229	953151938	ABONADO CARLITO	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
230	942153328	CHARLETTA RICHARD J	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
231	942153312	ZACZEK ELIZABETH J	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
232	953152014	GILBERT THOMAS J	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
233	954143203	POWELL MICHAEL J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
234	955152804	DILENDICK BRIAN	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
235	953152220	MARTIN URSULA	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
236	955153008	JOVE JOSE I	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
237	955152815	WEXLER DONNA	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
238	953152308	HAGGERTY DENICE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
239	953152115	CAMPBELL CARL G	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
240	953152006	BOUNDS BARBARA A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
241	955152918	HENDRICKS JR BERNARD D	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
242	954142713	LANGSTON LEROY	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
243	955152920	WRIGHT ROBERT PHILIP	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
244	954143201	COGOLLOS ANGELA	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
245	954142914	RUSSELL RICHARD	\$4,896.87	3.8735	\$18.97	\$85.66	\$171.56	\$46.00	\$0.00	\$322.19
246	942153325	WOLFE CLAUDINE	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
247	954143008	EDGERTON FAMILY LIVING TRUST	\$4,677.48	3.8735	\$18.12	\$85.66	\$171.56	\$46.00	\$0.00	\$321.34
248	954143107	NORTH PORT LOTS AND REAL PROPERTY LLC	\$4,579.50	3.8735	\$17.74	\$85.66	\$171.56	\$46.00	\$0.00	\$320.96
249	953152503	GREEN JR MICHAEL B	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
250	954143208	MAYFIELD CAMELLIA	\$5,541.20	3.8735	\$21.46	\$85.66	\$171.56	\$46.00	\$0.00	\$324.68
251	954142714	REALIZA BONG	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
252	954143016	GADEN ROGER C	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
253	954142401	TORRANCE BARBARA J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
254	954142238	DEWAR EDWARD W	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

255	954142513	DABANDAN EDGARDO	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
256	954142240	EIGHT HOLDINGS LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
257	954143212	NORTH PORT LOTS AND REAL PROPERTY LLC	\$4,768.01	3.8735	\$18.47	\$85.66	\$171.56	\$46.00	\$0.00	\$321.69
258	954143206	WATT MONTE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
259	954142232	CHUNG WINIFRED C	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
260	954142127	CHALMERS GEOFFREY T	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
261	955152913	JEVRIC VERA	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
262	954143013	NORTH PORT LOTS AND REAL PROPERTY LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
263	954143108	JOSEPH MARJORIE NELSON	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
264	954142453	SURAPANENI SRINIVAS	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
265	954142225	JOSEPH E PURFEERST REVOCABLE TRUST	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
266	953152218	SARASOTA CAPITAL LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
267	953152321	ADAMS GERALD I	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
268	942153302	DE HAVEN MARY C B	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
269	954142510	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
270	954142507	CLEARE DELONE Y	\$8,930.03	3.8735	\$34.59	\$85.66	\$171.56	\$46.00	\$0.00	\$337.81
271	953152310	GOETZE LORALEE J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
272	954142126	CHALMERS GEOFFREY T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
273	955153117	GEIST JAMES S (TTEE)	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
274	954142227	PURFEERST JAMES M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
275	954142531	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
276	954142519	BUSER CHRISTOPHE	\$5,103.48	3.8735	\$19.77	\$85.66	\$171.56	\$46.00	\$0.00	\$322.99
277	955153211	ROTH GUENTER (TTEE)	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
278	955153009	HABITAT FOR HUMANITY SOUTH SARASOTA COUNTY INC	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
279	954142239	DEWAR EDWARD W	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
280	955152904	LOPEZ MONICA	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
281	953152802	GEORGIEV ZORNITSA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
282	953152106	CHRISTOPHER ALEXANDER	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
283	953152004	BOUNDS BARBARA A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
284	954142455	VEMULAPALLI SUSHMA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
285	954142450	FIRST CHOICE HOME BUILDERS LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
286	954142460	FALNESS DAVID E	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
287	954143322	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
288	953152118	NP 11 LLC	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
289	953153001	NARDINI-CALLAHAN DAWN	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
290	954142618	FARRELL BRIAN J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
291	953151936	MILLER DARRELL J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
292	954142302	BARNETT JERRY A	\$5,005.50	3.8735	\$19.39	\$85.66	\$171.56	\$46.00	\$0.00	\$322.61
293	955152911	WHITEHOUSE JOHN F	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
294	954142912	MEANS RICHARD T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
295	942080010	NORMAN WILLIAM	\$25,453.50	3.8735	\$98.59	\$85.66	\$171.56	\$46.00	\$0.00	\$401.81
296	942153203	OVERSEAS INVESTMENT LLC	\$3,834.00	3.8735	\$14.85	\$85.66	\$171.56	\$46.00	\$0.00	\$318.07
297	967060946	LAWRENCE STEVE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

298	955152903	NEW VISTA PROPERTIES INC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
299	953152002	BOUNDS BARBARA A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
300	953152404	SANIXAY CHANSAMONE	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
301	954141752	SHERMAN OFELIA TTEE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
302	953152210	DASCZYNSKI WARREN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
303	955153005	AMERICAN ESTATE AND TRUST	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
304	953152607	BIRA HOLDINGS LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
305	955152922	VAZIRI HOSHMAND	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
306	954143101	PEREIRA JOSE C J	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
307	954142905	DEMONTEVERDE MARIE H	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
308	954143018	BEACHY FREEMAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
309	954141755	LANG WILLIE L	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
310	954143007	I DREAMS ESTATES LLC	\$4,639.14	3.8735	\$17.97	\$85.66	\$171.56	\$46.00	\$0.00	\$321.19
311	953152609	NGUYEN THU	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
312	953152508	NEW VISTA PROPERTIES INC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
313	944152727	KAPPELMANN KEITH	\$4,366.50	3.8735	\$16.91	\$85.66	\$171.56	\$46.00	\$0.00	\$320.13
314	954142807	VERO ATLANTIC 2 LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
315	954141809	HENRY MARIE C	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
316	942153223	COLONIAL RESTORATION LLC	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
317	955152919	WOOD PETER	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
318	955152807	BOWSER WILLIAM T	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
319	954142509	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
320	953152623	SPRINGCROFT PROPERTIES LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
321	953152216	OLIVIERI WILLIAM M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
322	955153104	SNYDER DEVELOPMENT CORP	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
323	955152906	GEORGIOU TASOS	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
324	954142440	BOUNDS RAYMOND	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
325	954142303	OVERSEAS INVESTMENT LLC	\$5,005.50	3.8735	\$19.39	\$85.66	\$171.56	\$46.00	\$0.00	\$322.61
326	954142445	NORTH PORT LOTS AND REAL PROPERTY LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
327	942153220	CARLOS DOMINGOS	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
328	953151926	BINGLE CHRIS	\$4,792.50	3.8735	\$18.56	\$85.66	\$171.56	\$46.00	\$0.00	\$321.78
329	953152317	BRANCH ADINA M	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
330	967060947	CATENA JENNIFER	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
331	954142441	COMPERDA FRANK M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
332	954142119	CHUNG WINIFRED C	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
333	954142452	SURAPANENI SRINIVAS	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
334	955153123	HENDERSHOT BRUCE D	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
335	955153210	SILVER FROND INVESTMENTS LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
336	954143105	HEIVA HOLDINGS USA LLC	\$5,103.48	3.8735	\$19.77	\$85.66	\$171.56	\$46.00	\$0.00	\$322.99
337	954142918	HASTINGS KENNETH R	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
338	953152013	FLUBACHER RONALD	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
339	954142234	ADORNA THOMAS M	\$8,930.03	3.8735	\$34.59	\$85.66	\$171.56	\$46.00	\$0.00	\$337.81
340	954142712	LANGSTON LEROY	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

341	953152408	OVERSEAS INVESTMENT LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
342	953152307	BELLS REALTY INVESTMENTS	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
343	954142230	LOURO ALEX T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
344	954142229	VOGT JORGE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
345	953152819	NEW VISTA PROPERTIES INC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
346	955153106	AMERICAN ESTATE AND TRUST	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
347	953152511	LAU CHI-HO A	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
348	955153011	BECERRA ELPIDIO L	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
349	953152710	WESTON MICHAEL	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
350	953152419	SILVA ROBERT L	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
351	967060740	MULLEN MARK F	\$5,154.60	3.8735	\$19.97	\$85.66	\$171.56	\$46.00	\$0.00	\$323.19
352	953152622	SPRINGCROFT PROPERTIES LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
353	953152510	LAU CHI-HO A	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
354	954142018	GIFFONE MICHAEL F	\$4,677.48	3.8735	\$18.12	\$85.66	\$171.56	\$46.00	\$0.00	\$321.34
355	953152624	K & N PROPERTY INVESTMENTS LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
356	942153321	OVERSEAS INVESTMENT LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
357	954142454	GUGLIELMO MATTHEW	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
358	954143326	PAPE EDWARD	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
359	953152407	CONNELL JERRY L	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
360	953152219	KORELL LINDSEY ROTH IRA F/B/O	\$3,834.00	3.8735	\$14.85	\$85.66	\$171.56	\$46.00	\$0.00	\$318.07
361	942153319	LI-CHUAN CHUANG	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
362	953152119	GRECO KATHLENE	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
363	955152909	TYNDALE RICARDO ANTHONY	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
364	953151901	VAN TRUONG JIMMY L	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
365	953152509	PIZZARIELLO VITO	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
366	967060945	BASTANTE JOSEPH	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
367	953151636	NELIGAN DEAN A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
368	953152504	ERWIN DAVID	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
369	942153313	GOGREEN PROPERTY MGMT LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
370	954141749	LOURO MARCELLO	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
371	953152403	TAYLOR DUANE	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
372	954142019	KARAM ROSE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
373	954141913	PEDERSON KAREN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
374	954142506	THOMAS GERHARDT A TTEE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
375	955152810	CABRERA VIRGILIO D	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
376	954142231	WEISS JOSEPH G	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
377	953152007	BOUNDS BARBARA A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
378	942153209	SILVER FROND INVESTMENTS LLC	\$3,834.00	3.8735	\$14.85	\$85.66	\$171.56	\$46.00	\$0.00	\$318.07
379	953152619	KUBACKA JOLANTA	\$3,834.00	3.8735	\$14.85	\$85.66	\$171.56	\$46.00	\$0.00	\$318.07
380	954141735	CHOU DHURI SANTANU	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
381	955152910	ALEXSOFF NAUMCE	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
382	953151902	MADISON ANNA C	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
383	954141750	LOURO MICHAEL	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

384	953152015	CORNERSTONE PROPERTIES OF SARASOTA INC	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
385	953152512	HEINKE STEPHAN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
386	954142916	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
387	953152309	GOETZE LORALEE J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
388	953151641	NEW VISTA PROPERTIES INC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
389	954143219	GOODWIN DAVID	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
390	954142921	JEANNINE ELIZABETH BELL REVOCABLE TRUST	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
391	954143210	KRACKOVIC DANNE	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
392	954142704	ADAMS GERALD	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
393	953152610	ETTLIN DOMINIK	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
394	954142005	ZANCA HEDWIG I	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
395	953152202	AEG INVESTMENTS LP	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
396	954142707	PRIVATE EQUITY SOLUTIONS LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
397	967060738	RIBEIRO ANTONIO A	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
398	955153213	OVERHOLSER MERLE W	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
399	954142534	JOHNSON SCOTT	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
400	954142105	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
401	954143104	FIRST REALTY CONSULTING LLC	\$5,927.79	3.8735	\$22.96	\$85.66	\$171.56	\$46.00	\$0.00	\$326.18
402	954142810	CADIENTE SAMSON S	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
403	954141742	BROUSSARD JR LAWLESS	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
404	955153121	FITZPATRICK CHRISTINA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
405	955153116	STOJAK BARBARA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
406	953152620	ALPHA FLORIDA REAL ESTATE LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
407	954143316	NORTH PORT LOTS AND REAL PROPERTY LLC	\$3,544.32	3.8735	\$13.73	\$85.66	\$171.56	\$46.00	\$0.00	\$316.95
408	953152409	BURGOS IRIS	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
409	954141741	Q SMITH HOMES LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
410	953152426	EL SHADDAI BIBLE MINISTRIES	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
411	954143012	COMPARETTO ANTONIO J	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
412	955153012	VIRNAN NADIA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
413	954141803	OVERSEAS INVESTMENT LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
414	953152301	GRAY WALTER	\$3,544.32	3.8735	\$13.73	\$85.66	\$171.56	\$46.00	\$0.00	\$316.95
415	955153120	CHAMBERLAIN ALFRED C	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
416	954143001	HEIVA HOLDINGS USA LLC	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
417	954141743	SHABURA VLADIMIR	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
418	955153122	UNDERWOOD PAT	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
419	953152204	DAVIS AUDREY H V M	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
420	942153309	OVERSEAS INVESTMENT LLC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
421	953151637	NEW VISTA PROPERTIES INC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
422	953152501	HEARN ANASTASIA	\$3,544.32	3.8735	\$13.73	\$85.66	\$171.56	\$46.00	\$0.00	\$316.95
423	953152428	AMERICAN ESTATE AND TRUST	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
424	953152613	YAREMCHUK VOLODYMYR	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
425	954142125	CHALMERS GEOFFREY T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
426	954142462	BALIUS GENE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14

VACANT LOTS

427	953152608	NGUYEN PROPERTY MANAGEMENT LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
428	953152606	BIRA HOLDINGS LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
429	953152618	MALLOY SHARON (TTEE)	\$3,834.00	3.8735	\$14.85	\$85.66	\$171.56	\$46.00	\$0.00	\$318.07
430	953152818	HERNANDEZ JIMMY	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
431	953152420	SALAM ELIZABETH C	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
432	953152621	MUNZ MIKE	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
433	953152626	ASKEW ASHLEY LYNN	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
434	954141728	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
435	954143015	JAEN RUBEN	\$4,677.48	3.8735	\$18.12	\$85.66	\$171.56	\$46.00	\$0.00	\$321.34
436	954142924	BROWN JOE W	\$4,381.41	3.8735	\$16.97	\$85.66	\$171.56	\$46.00	\$0.00	\$320.19
437	954142532	ALAVERYDAN SUREN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
438	954142505	MAYS RONALD L	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
439	953152405	MASTRATI JOHN A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
440	954141740	Q SMITH HOMES LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
441	953152412	CABRERA EDELMIRA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
442	953152617	ATINA ENTERPRISES LLC	\$3,834.00	3.8735	\$14.85	\$85.66	\$171.56	\$46.00	\$0.00	\$318.07
443	953151923	WORMER LESLIE A	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
444	953152612	YAREMCHUK VOLODYMYR	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
445	953152902	PORTER ROBERT C	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
446	953152517	AMERICAN ESTATE AND TRUST	\$4,260.00	3.8735	\$16.50	\$85.66	\$171.56	\$46.00	\$0.00	\$319.72
447	955152915	ADAMS GERALD	\$2,662.50	3.8735	\$10.31	\$85.66	\$171.56	\$46.00	\$0.00	\$313.53
448	953152709	NEW VISTA PROPERTIES INC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
449	953152505	ROSELAND LEO J	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
450	955152809	SHAW PATRICIA A	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
451	954142529	KARR MARTIN PALMER	\$5,740.35	3.8735	\$22.24	\$85.66	\$171.56	\$46.00	\$0.00	\$325.46
452	954142623	OVERSEAS INVESTMENT LLC	\$5,218.50	3.8735	\$20.21	\$85.66	\$171.56	\$46.00	\$0.00	\$323.43
453	953153002	K4K LLC	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
454	954142710	DIH TAX PARTNERS LLC	\$5,005.50	3.8735	\$19.39	\$85.66	\$171.56	\$46.00	\$0.00	\$322.61
455	953153017	VOJNIKA MAZLUM	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
456	953152213	OVERSEAS INVESTMENT LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
457	967060704	CRUZ ALBERTO	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
458	954142619	JONES DONALD F JR	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
459	953152611	TEREMBES MICHAEL	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
460	953151935	DOWNING GERALD B	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
461	954141905	LIVITS LEONARD	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
462	967060944	SILVA NANCIANCENA D	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
463	953151927	SZAFARZ MARY K (TTEE)	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
464	954142711	COGOLLOS ANGELA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
465	953152708	NANDIGAM SINDHURA	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
466	954142715	MOORE LISA	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
467	953151928	MACHADO-CUNHA HUGO M	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
468	954143223	MORROW BARTLEY E	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
469	954142003	PRIVATE EQUITY SOLUTIONS LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20

VACANT LOTS

470	953152410	FARRELL MARK V	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
471	967060741	MULLEN MARK F	\$4,896.87	3.8735	\$18.97	\$85.66	\$171.56	\$46.00	\$0.00	\$322.19
472	942153316	LORUSSO JOSEPH J	\$3,195.00	3.8735	\$12.38	\$85.66	\$171.56	\$46.00	\$0.00	\$315.60
473	942153221	WERNER FAMILY TRUST	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48
474	953152418	MOSELEY STARLA	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
475	954142446	LEE HILTON	\$5,798.93	3.8735	\$22.46	\$85.66	\$171.56	\$46.00	\$0.00	\$325.68
476	954142449	TURGEON JR JOHN L	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
477	954142402	TORRANCE BARBARA J	\$3,969.26	3.8735	\$15.37	\$85.66	\$171.56	\$46.00	\$0.00	\$318.59
478	953152506	FERNANDEZ MARGARITA	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
479	953152001	DE VANEY WILLIAM B	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
480	953152306	PERNA III MANUEL	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
481	953152421	RICKETTS ELIZABETH A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
482	955153006	CALVERT MICHAEL K	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
483	967060703	HUYNH KIM T T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
484	967060943	VARNER III ARCHIE D	\$4,535.84	3.8735	\$17.57	\$85.66	\$171.56	\$46.00	\$0.00	\$320.79
485	955153215	MAGGIO RONALD J	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
486	967060739	TRAN TUNG V	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
487	953152305	DEITZ SANDRA N CO-TTEE	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
488	953152304	KERESTES PAUL A	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
489	953151924	ESTEVEZ JOSE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
490	953152320	PROSPER TERRANCE	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
491	954142629	WJHFL LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
492	954142632	GILBERT DIANE L	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
493	942080006	AXLINE JUDITH J (CO-TTEE)	\$18,041.10	3.8735	\$69.88	\$85.66	\$171.56	\$46.00	\$0.00	\$373.10
494	953152424	HOLINKO BRIAN J	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
495	954142604	COGOLLOS ANGELA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
496	954142703	ADAMS GERALD	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
497	953152422	JOHN E AND LORRAINE M KUHN REVOCABLE LIVING TRUST	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
498	953152319	SGD INVESTMENTS LLC	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
499	953152311	GRIGGS AVENUE LAND TRUST	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
500	954142533	JOHNSON SCOTT	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
501	954142104	BUCCELLATO GIOVANNA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
502	954142716	MOORE LISA	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
503	953152016	BECKER STEPHEN	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
504	954141726	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
505	954143005	UNDERHILL WILLIAM R	\$5,103.48	3.8735	\$19.77	\$85.66	\$171.56	\$46.00	\$0.00	\$322.99
506	954142405	NEW VISTA PROPERTIES INC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
507	954142121	KRACHKO ANDREY	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
508	954142123	JACKSON EMMA D	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
509	954142809	HEIVA HOLDINGS USA LLC	\$5,103.48	3.8735	\$19.77	\$85.66	\$171.56	\$46.00	\$0.00	\$322.99
510	953152519	SCHOELICH RONNIE IRA F/B/O	\$4,366.50	3.8735	\$16.91	\$85.66	\$171.56	\$46.00	\$0.00	\$320.13
511	954143327	ESTRADA DAVID	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
512	955152816	NEW VISTA PROPERTIES INC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83

VACANT LOTS

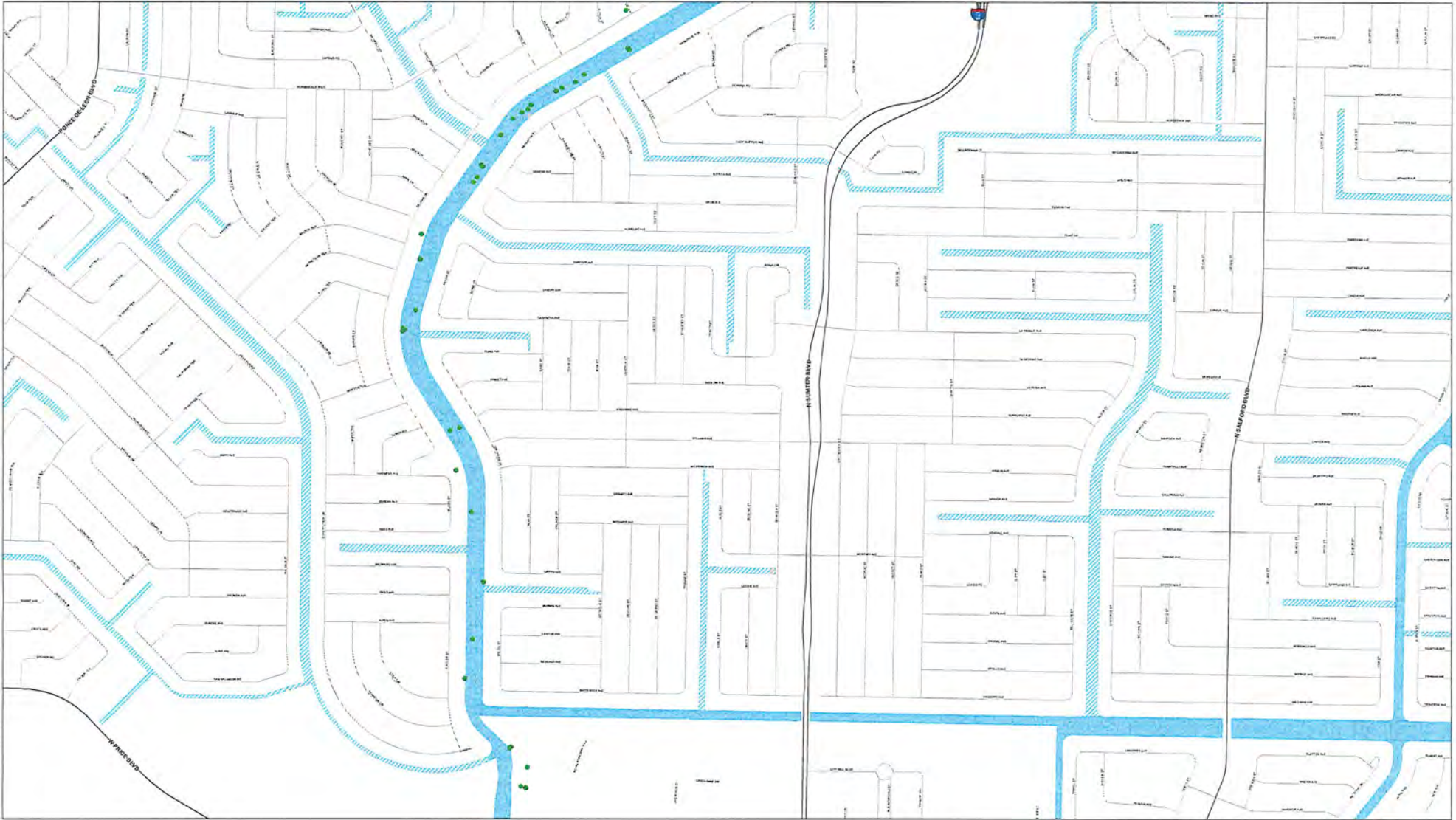
513	954143324	SANFORD STANLEY	\$4,579.50	3.8735	\$17.74	\$85.66	\$171.56	\$46.00	\$0.00	\$320.96
514	954142911	COOK JOYCE R	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
515	954141730	KRACHER EDITH M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
516	955152814	MARY ACCOUNTING INC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
517	954143323	DRES JUANITO T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
518	954141805	EZER TOSIA	\$4,252.55	3.8735	\$16.47	\$85.66	\$171.56	\$46.00	\$0.00	\$319.69
519	954142603	COGOLLOS ANGELA	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
520	953152008	HENRY BRYAN	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
521	954143004	OVERSEAS INVESTMENT LLC	\$5,218.50	3.8735	\$20.21	\$85.66	\$171.56	\$46.00	\$0.00	\$323.43
522	954142903	ARSENAULT CHRISTINE	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
523	953152411	ROWE STUART J TTEE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
524	954142909	CHU WANG LING	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
525	953152514	GREENHALGH DAVID L	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
526	954142626	JACKSON MARYBETH ANN	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
527	953151925	BINGLE CHRIS	\$4,047.00	3.8735	\$15.68	\$85.66	\$171.56	\$46.00	\$0.00	\$318.90
528	942153322	COOGAN NANCY E	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
529	953152803	NORTH PORT LOTS AND REAL PROPERTY LLC	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
530	954142622	BURTON JAMES R	\$7,455.00	3.8735	\$28.88	\$85.66	\$171.56	\$46.00	\$0.00	\$332.10
531	953152516	DESROCHERS PATRICIA I	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
532	953152423	GRINDSTONE PARTNERS LLC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
533	954142608	PHAM PHUONG LAN T	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
534	954142442	RICHARDSON KARIN B	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
535	954142620	DELL PAMELA D	\$10,347.54	3.8735	\$40.08	\$85.66	\$171.56	\$46.00	\$0.00	\$343.30
536	953152427	AMERICAN ESTATE AND TRUST	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
537	953152604	LIN XIAOYING	\$5,103.48	3.8735	\$19.77	\$85.66	\$171.56	\$46.00	\$0.00	\$322.99
538	953152413	PEREZ MOSES	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
539	967060942	DIODATI FRANCESCO (CO-TTEE)	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
540	953152314	LONGO RICHARD B	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
541	955152905	MOSES GAYLE	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
542	955153119	GEIST LOWELL K	\$3,408.00	3.8735	\$13.20	\$85.66	\$171.56	\$46.00	\$0.00	\$316.42
543	954142226	PURFEERST JAMES M	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
544	953151922	SEGUIN JEANNETTE	\$3,827.61	3.8735	\$14.83	\$85.66	\$171.56	\$46.00	\$0.00	\$318.05
545	953152318	MC RAE CHRISTINE	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
546	953152303	KERESTES PAUL A	\$3,621.00	3.8735	\$14.03	\$85.66	\$171.56	\$46.00	\$0.00	\$317.25
547	953152206	POLISHCHUK GRIGORY	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
548	954142527	GIBSON DOROTHEA	\$4,961.84	3.8735	\$19.22	\$85.66	\$171.56	\$46.00	\$0.00	\$322.44
549	954141906	HOUNG IRENE	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
550	954143014	LIM RONNIE B	\$4,819.13	3.8735	\$18.67	\$85.66	\$171.56	\$46.00	\$0.00	\$321.89
551	954142915	ORKNEY BERTHA A C (TTEE)	\$4,394.19	3.8735	\$17.02	\$85.66	\$171.56	\$46.00	\$0.00	\$320.24
552	955152813	SPANO WILLIAM A	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
553	954142628	WJHFL LLC	\$4,899.00	3.8735	\$18.98	\$85.66	\$171.56	\$46.00	\$0.00	\$322.20
554	953152502	ENLIGHTENING INVESTMENT LLC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
555	953152625	K & N PROPERTY INVESTMENTS LLC	\$3,940.50	3.8735	\$15.26	\$85.66	\$171.56	\$46.00	\$0.00	\$318.48

VACANT LOTS

556	953152923	BARTOLOME DELILAH	\$3,088.50	3.8735	\$11.96	\$85.66	\$171.56	\$46.00	\$0.00	\$315.18
557	953152425	BATHORY STEVE	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
558	955152808	NEW VISTA PROPERTIES INC	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
559	954142124	HEIVA HOLDINGS USA LLC	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
560	953151921	SWIFT CLEAR INVESTMENTS LLC	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
561	953152507	SINCLAIR M A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
562	953152417	KALLOO JOAN A (TTEE)	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
563	953152207	BRESA LINO	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
564	942153315	BRAINERD III HAROLD W	\$3,301.50	3.8735	\$12.79	\$85.66	\$171.56	\$46.00	\$0.00	\$316.01
565	953151903	KOSTESKI SIMON	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
566	953151929	SCHMIDT ROBERT R	\$4,110.90	3.8735	\$15.92	\$85.66	\$171.56	\$46.00	\$0.00	\$319.14
567	942153224	TODARO PHILLIP S	\$3,727.50	3.8735	\$14.44	\$85.66	\$171.56	\$46.00	\$0.00	\$317.66
568	953152406	MASTRATI JOHN A	\$3,685.97	3.8735	\$14.28	\$85.66	\$171.56	\$46.00	\$0.00	\$317.50
569	942153303	NEW VISTA PROPERTIES INC	\$3,514.50	3.8735	\$13.61	\$85.66	\$171.56	\$46.00	\$0.00	\$316.83
570	955152914	NEW VISTA PROPERTIES INC	\$3,088.50	3.8735	\$11.96	\$85.66	\$171.56	\$46.00	\$0.00	\$315.18

\$9,462.11 \$48,826.20 \$97,789.20 \$26,220.00 \$0.00

Totals \$182,297.51 \$182,297.51



City of North Port Myakkahatchee Creek Blockages



Disclaimer: This map is for reference purposes only and is not to be construed as a legal document. Any reliance on the information contained herein is at the user's risk. The City of North Port and its agents assume no responsibility for any use of the information contained herein or any loss resulting therefrom.

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CITY OF NORTH PORT
LOW IMPACT DEVELOPMENT (LID) PROJECTS AND CITY "GREEN ACHIEVEMENTS"
as of 11/30/20

Year Installed	Project number	Project Name	Description
~2007		Public Works Site	Use stormwater from Creighton Waterway for irrigation. Use of grass swales for pretreatment prior to entering master stormwater pond system.
2005 and continuing		Islandwalk @ The West Villages all phases	Stormwater harvesting for irrigation
2007		Fertilizer Ordinance	Adopted a City-wide Fertilizer Ordinance which prohibited a fertilization of lawns during the wet season period between June 1 and September 30. Required 50% slow release fertilizer if used in the allowable periods.
2008		North Port Medical Specialist facility on US 41 near Espanola Ave.	Developer installed 7 pervious asphalt parking spaces at a new North Port Medical Specialist facility along US 41.
2009		Sumter Boulevard Phase 2 widening project	City installed 3 aeration fountains in wet detention ponds and planted non-invasive littoral zone plants as part of the Sumter Boulevard Phase 2 widening project
2009		Lowe's store	Stormwater harvesting for irrigation. A shallow well recharges the wet pond during the dry periods.
2009		PBSJ Study North Port Enhancement Project Report	City study cooperatively funded with SWFWMD indicated that the total nitrogen levels within North Port waterways are "lower than the reference levels for natural Florida Streams generated in the 1996 FDEP 305(b) report". This is due to the extensive grass swales system in North Port.
2010		SWFWMD Community Education Grant for \$1,761.94	Grant funded purchase 100 stormdrain markers which were installed with assistance from the Community and kids. Conducted public education on water quality protection and installed two educational signs
2010		City of North Port Unified Land Development Code (ULDC) New Stormwater Regulations	City adopted new ULDC Chapter 18 - Stormwater Regulations in June 2010 which required all developments to incorporate LIDs to the maximum extent practicable. City water quality regulations required treatment volume of 1-inch of runoff for any systems, wet or dry. This is above the SWFWMD requirement for 1/2" of runoff for dry systems. City required aeration systems in wet ponds and planted littoral zone with non-invasive aquatic plants with 85% survival rate.
2010		Grass parking at Morgan Family Center/Butler Park	Many parking spaces at these facilities were installed as grass parking.
2010	MAS-08-093	Cocoplum Village Shoppes on US 41 near Salford Blvd	Stormwater harvesting for irrigation.
2010		Toledo Blade Boulevard Widening Project	City planted littoral zones and entire pond periphery with cord grass (Spartina Bakeri) at two stormwater ponds.
2011		City Hall near Post Office	City installed an aeration fountain in a wet detention pond.
2011		Florida Green Building Coalition Gold Rating	City received the FGBC Gold Rating which is the highest rating achieved at that time in Florida for good environmental practices in "green" development
2011		Kingdom Hall Church	Kingdom Hall new church facility incorporated 10 pervious concrete parking spaces
2011		City's Atwater Park	Stormwater harvesting for irrigation with recharge well. Also installed an aeration fountain in a wet detention pond.
2012		SWFWMD Community Education Grant for \$4136	Grant funded planting of non-invasive aquatic plants around the periphery area of the North Port Library pond, Public workshops on proper fertilizer usage and aquatic planting benefits, two major City clean up events and six educational signs installed throughout the City to encourage protection of waterways.
2012		Sarasota County Area Transit at City Center	City coordinated with SCAT to install 15 pervious concrete parking spaces, along with a bioswale between parking spaces.
2012	MAS-08-093	Cocoplum Village Shoppes on US 41 new Salford Blvd	Developer installed aeration fountains in two wet detention ponds
2014		City Center George Mullen Activity Center (GMAC)	City installed a new section of Pervious Concrete sidewalk as part of the Phase 1 GMAC improvements
2014		Sarasota County Area Transit (SCAT) at City Center	An electric car charging station was added in June 2014.
2014	MAS-13-141	Turnberry Trace Recreation Center	Installed 7 parking spaces with Pervious Concrete
2014	MAS-14-032	Gran Paradiso Amenity Center Phase 2	Brick pavers on sand for sidewalks and decking, grassed swales for conveyance before entering inlets and ponds, FF landscaping, oversized stormwater pond, aeration in Lake 34. Project completed in March 2016
2015	MAS-13-137	Aldi food Store on US 41/Salford Blvd	Constructed 11 pervious concrete parking spaces
2015		City Center George Mullen Activity Center (GMAC)	City installed a new section of Pervious Concrete sidewalk as part of the Phase 2 GMAC improvements
2016	MAS 14-105	Goodwill	* 8 Pervious parking stalls - 2.36" thick "Aquaflow" Pavers on 2" thick 1/4" diameter clean crushed stone, over 140N Mirafi over 6" FDOT #57 stone 95% Modified Proctor, over 140N Mirafi, 12" Subgrade 98% Modified Proctor. Grass swales before inlets.
2017	MAS-15-129	Lowe's Outparcel	Stormwater harvesting for irrigation.
2017	MAS-16-070	Autozone at Toledo Creek (S of Price, west side of Toledo Blade	20 pervious concrete parking spaces, grass retention area before master stormwater pond, deep sump at several inlets
2017	INF-15-089	Toledo Creek	Floguard inlet inserts installed on 9 Type 9 Index 214 inlets
2018	MAS-15-180	Circle K at Heron Creek Town Center	Less impervious than allowable, 77.88% vs 94.0%
2017	MAS-16-055	7-Eleven Store #37298 at Toledo Creek	70% impervious compared with allowable 95% impervious. Pervious concrete sidewalks adjacent to store
2017	INF-14-149	Gran Paradiso Phase 3	All of the driveways for the paired villa (duplex) units are pavers on sand. There are swales along the rear of lots 687-734 which will provide open flow contact time / pre-treatment prior to discharging to lake 29. There is also a 1,000± LF swale outfalling a portion of Renaissance Boulevard prior to draining into lake 68. This swale will also provide some open flow contact time / pre-treatment prior to discharging to the lake

Year Installed	Project number	Project Name	Description
2017	INF-16-122	Gran Paradiso Phase 7	<ul style="list-style-type: none"> Minimize impervious area - The overall Gran Paradiso property (± 1,068.09 acres) will consist of approximately±231.36 acres of conservation areas, including wetland and gopher tortoise preserves. There will also be approximately± 222.84 acres of lake area and± 135.72 acres of additional open space. Thus, as a percentage of the total development there will be 21.7% conservation area, 20.9% lake area, and 12.7% open area. Overland flow areas <p>Where achievable, stormwater runoff is allowed to sheet flow across areas of vegetation prior to flowing into on-site retention areas or wetland areas.</p> <ul style="list-style-type: none"> Minimizing of sidewalk widths in areas with lower pedestrian traffic <p>In strategic areas of the community (e.g. along Prestigio Boulevard), sidewalk widths were decreased, thus decreasing impervious area. This was done in order to minimize the amount of required disturbance of native vegetation and habitats.</p> <ul style="list-style-type: none"> Inclusion of aerators in lakes <p>Aerators have been added to lakes throughout the development, with 3 included in the Phase 7 project.</p> <ul style="list-style-type: none"> Use of pavers throughout the development <p>Where possible, pavers have been used in lieu of concrete pavement. This is most prevalent at the entrance l clubhouse area and driveways of home sites throughout</p>
2017	INF-16-022	Islandwalk Phase 5	Stormwater reuse for irrigation
2017	MAS-16-172	Gran Paradiso, Coach Homes-2 and Mass Grading	<ul style="list-style-type: none"> Limiting the footprint of improvements on the property. <p>The overall Gran Paradiso property (± 1,068.09 acres) will consist of approximately ± 231.36 acres of conservation areas, including wetland and gopher tortoise preserves. There will also be approximately± 222.84 acres of lake area and± 135.72 acres of additional open space. Thus, as a percentage of the total development there will be 21.7% conservation area, 20.9% lake area, and 12.7% open area.</p> <ul style="list-style-type: none"> Overland flow areas <p>Where achievable, stormwater runoff is allowed to sheet flow across areas of vegetation prior to flowing into on-site retention areas or wetland areas.</p> <ul style="list-style-type: none"> Minimizing of sidewalk widths in areas with lower pedestrian traffic <p>In strategic areas of the community (e.g. along Prestigio Boulevard), sidewalk widths were decreased, thus decreasing impervious area. This was done in order to minimize the amount of required disturbance of native vegetation and habitats.</p> <ul style="list-style-type: none"> Inclusion of aerators in lakes <p>Aerators have been added to lakes throughout the development, with 3 included in the Phase 7 project.</p> <ul style="list-style-type: none"> Use of pavers throughout the development <p>Where possible, pavers have been used in lieu of concrete pavement. This is most prevalent at the entrance / clubhouse area and driveways of home sites throughout</p>
2017	INF-14-089	Suncoast Plaza	Long Bioswales for additional treatment along roadways, fountains in wet ponds
1/24/18	MAS-17-013	Heartland Dental	Runoff into two grass retention swales prior to discharge into the master stormwater piping/pond system. Impervious area is 68% compared to allowable 95%
1/24/18	MAS-16-020	Jiffy Lube	Runoff into three grass retention swales prior to discharge into the master stormwater piping/pond system. Ditch bottom inlets in the grass retention swales are set 0.5' higher than swale bottom. 41.7% impervious compared with allowable 95% impervious .
1/24/18	GEN-15-172	North Port Library Parking Expansion	23 Pervious Concrete parking stalls for this parking expansion
2/9/18	MAS-15-179	Sherwin Williams	Long linear rgrass swales before entering dry retention pond
2/26/18	MAS-17-001	7-11 at Cranberry	3 Pervious Pavers parking stalls
2/27/18	MAS-16-131	Heron Creek Animal Hospital	Impervious area reduced by 20% from allowable
3/3/18	MAS-14-053	Pine Park Walking Trails	4ft wide Pervious path 1.5" Flexipave HD 1500 over 4" #57 stone over Filter Fabric US160NW over Stabilized Subgrade max 95% modified Proctor Density ASTM D-1557
5/2/18	MAS-17-030	O Reilly Auto Parks	Runoff into two grass retention swales prior to discharge into the master stormwater piping/pond system. . Minimized impervious from 70% to 58.73%
5/16/18	INF-15-174	Oasis	Stormwater reuse for irrigation, 3 fountains for aeration in wet ponds, 684 sf (4 parking spaces) in pervious concrete at Amenity Center.
5/17/18	MAS-16-191	Tract C North Port Industrial Park (MTI)	8 Pervious Concrete Stalls, less impervious than allowed
Oct 2018	INF-15-153	Dog Park under included Renaissance	Stormwater Harvesting from Lake 3-2
12/7/2018	MAS-17-218	Taco Bell at Heron Creek Town Center	Less impervious than allowable, 63.8% vs 94.0%. Florida Friendly Landscaping used
5/23/19	INF-15-153	Renaissance At West Villages	Stormwater Harvesting for irrigation from Lake 5 with recharge well, Impervious area reduced by 8% from allowable
5/23/19	MAS-17-075	Braves Stadium	Stormwater Harvesting for irrigation with recharge from existing borrow pit, grass bioswales, grass parking >2000 spaces, fountains
12/4/19	MAS-17-107	Waffle House at Heron Creek Town Center	Less impervious than allowable, 60.6% vs 94.0%. Two grass pretreatment areas before entering master system.
3/25/20	MAS-18-186	Heartland Dental West Villages	3 Turf block pavers, small grass swale pretreatment area
7/6/20	MAS-18-081	Lakeside Medical Building	Grass pretreatment swales, 7 pervious concrete parking stalls
9/11/20	CIP-19-218	Garden of 5 Senses Walking Trail	Pervious Walking Trail 1.5" KBI Flexi-oave HD2000 on 4: of #57 stone on stabilized sub base LBR40. Two KBI Permadrive Parking Stalls 1.5-inch Permadrive with 4" #57 stone on stabilized sub base LBR40
11/3/20	INF-17-093	Gran Paradiso Phase 5B	<ul style="list-style-type: none"> Inclusion of aerators in lakes Use of pavers on driveways Preservation of Native and wetlands vegetation where possible Use of Florida Friendly landscaping Rear yards swales for extra treatment
11/3/20	INF-17-217	Gran Paradiso Phase 8	Use of pavers on driveways to minimize amount of impervious coverage, preservation of native vegetation where possible, the use of aerators to increase dissolved oxygen in lakes, implementation of rear yard swales to promote additional treatment prior to discharge, and the use of Florida Friendly Landscaping throughout the development.
Under Construcion	MAS -18-015	Oasis Amenity Center	Grass Swales before entering wet detention pond, 2728 sf pervious pavers
Under Construcion	MAS-18-127	Tire Kingdom / Coastal Car Wash	Runoff into two grass retention swales prior to discharge into the master stormwater piping/pond system
Under Construcion	INF-17-111	The Preserve Phase 3	Stormwater harvesting for irrigation from Pond 5-1P with recharge well, grass bioswale, fountain
Under Construcion	MAS-18-078	Kenvil Apartments	Multiple grass swale pre-treatment and 10 grass parking
Under Construcion	MAS-18-064	Hampton Inn & Suites @5664 Tuscola Blvd	Less impervious than allowable, 77.65% vs allowable 90%. Florida Friendly Landscaping used, stormwater harvesting.
Under Construcion	MAS-19-035	West Villages Welcome Center	Pavers proposed at the entrance are set on sand as a pervious pavement.
Under Construcion	MAS-19-140	Experience Living at North Port	Major Grass Swale discharges before entering stormwater pond. Only 20.23% percent impervious proposed when 69% is allowed.

Year Installed	Project number	Project Name	Description
Under Construcion	MAS-19-282	Chase Bank at West Villages Marketplace	15 parking stalls in pervious pavers Pave Drain. Runoff to grass swales for pretreatment prior to entering master stormwater system
Under Construcion	INF-20-051	West Villages Downtown Phase 1 Wellen Park	1. Stormwater harvesting for irrigation. 2 Use of pervious pavers that are set on shell material rather than concrete (In total, project proposes 25,660 SF of pervious pavers)
Under Construcion	INF-19-017	Tortuga	Stormwater harvesting for irrigation and paver driveways
Under Construcion	INF-20-19	Gran Park	Utilize paver driveways. Irrigation will be supplied through reuse provided by the WVID
Under Construcion	MAS-19-318	Palm Port Apartments	Stormwater harvesting for irrigation from 2 wet ponds with recharge well. 19 turf block parking stalls.
Under Construcion	MAS-20-091	Florida Cancer Specialists	Several large grass retention pretreatment swales prior to master stormwater system.
Future	MAS-17-003	Villas of Holly Brook	According to OPI (Office Professional Institutional) zone district, Section 5394-Maximum lot coverage; Buildings can cover up to 50% of available lot area. The current site design has a total impervious coverage of 55% (including building, parking, and sidewalks) so impervious area was kept at a minimum. Two landscaped gardens are provided between the building and the Cocoplum Waterway. The garden's runoff travels through yard drains which are all located in grassed depressions. The larger garden drains to the yard drains which then flow into a dry grassed swale before ultimately meeting the dry retention pond. The northwest parking lot quadrant was also regraded so the area flows into a grassed depression before draining to the dry pond.
Future	MAS-17-038	Wawa - Toledo Blade & Price	Modification of previous Bioswale #3 plus 2 more bioswales increase bioswale volume from 0.03 ac-ft to 0.086 ac-ft. impervious area is 74.2% compared to allowable 85%. 9 pervious pavement parking stalls
Future	MAS-18-047	Checkers only formerly included Fuzzy Taco at Shoppes of North Port	Redevelopment of existing shopping center reduce the impervious area from 39,525.29 SF to 35,962.46 SF. Impervious area under traffic is reduce by 13,530.00 SF.
Future	MAS-17-221	Gateway at Cocoplum Phase 2 part 1 Texas Road House	27 Pervious concrete parking spaces, 5" pervious concrete over 4" #57 stone
Future	MAS-18-289	Racetrac At Talon Bay MAS-18-289	Less impervious than allowable, 65% vs allowable 70%. Run off to long grass swales.
Future	INF-19-116	Oasis Phase 3	Grass swales for 8 lots before pond
Future		Kenvil Park Apartments MAS-19-090	The development has been designed to be as compact as possible, minimizing impervious areas. Large portions of the roofs are directed to green areas, to disconnect impervious areas. In addition, treated stormwater from the site is discharged through the proposed floodplain compensation pond, such that the discharge must travel through the entire length of the pond prior to leaving the site, which provides additional sediment settling capacity and nutrient assimilation beyond the treatment provided by the effluent filtration system. We have also included a floating fountain/aerator in the floodplain compensation pond to supplement the available dissolved oxygen supply and to provide an aesthetically pleasing visual amenity.
Future	PRE-19-203	US41 Linear Parking on Zagrobelny Way on north side of US41 between North Port Blvd and Espanola Ave.	76 pervious concrete parking between North Port Blvd and Espanola on the US 41 North access road
Future	MAS-20-055	North Port Village	Grass pretreatment swales.
Future	MAS-20-094	FIRESTONE STORE #912085 - NORTH PORT	Site approved max 85% impervious, only 64.75% impervious proposed. Vegetated treatment swale used prior to master stormwater system
Future	MAS-20-034	BISCAYNE SQUARE	Stormwater Reuse
Future	INF-20-120	West Villages - Village F-1 Phase 1	Stormwater harvesting for irrigation
Future	INF-20-218	Playmore Drive Extension	Master irrigation system which uses a combination of reuse, stormwater, and groundwater sources for its irrigation water

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/ Workshop on Water Quality	Special Event on Water Quality
Sumter Pond Clean up - Keep Sarasota beautiful Great American Cleanup, brought display of stormwater system		09/25/10							50	50		1			
Kiwanis Harvest Festival at Mullen Center	Know where your drinking water comes from (approved by Robin Grantham at SWFWMD)	10/16/10	3	10/16/10	0	3			300	300		1			
	Fertilizer Fact Sheet		12		0	12									
Jockey Club HOA presentation on Stormwater and Fertilizer Ordinance, brought display of stormwater system and draft flood map	Know where your drinking water comes from (approved by Robin Grantham at SWFWMD)	10/21/10	28	10/21/10	0	28			50	50	1				
	Fertilizer Fact Sheet		37		0	37	6								
Jeffery Waterway nearby Residents	letter mailer to not pollute	10/27/10				153									
Glenallen Elementary School, stormwater presentation to three classes for Government week	Fertilizer Fact Sheet	10/26/10	80	10/26/10	0	80			100	100			1	1	
North Port Newcomer's Day at North Port Library	Know where your drinking water comes from (approved by Robin Grantham at SWFWMD)	10/30/10	10	10/30/10	0	10			500	500					1
	Fertilizer Fact Sheet		10		0	10									
Charlotte County Green Expo	Know where your drinking water comes from (approved by Robin Grantham at SWFWMD)	11/13/10	15	11/13/10	9	6			300	300		1			1
	Fertilizer Fact Sheet		45		39	6									
CHNEP Nature Festival	Know where your drinking water comes from (approved by Robin Grantham at SWFWMD)	11/20/10	50	11/20/10	46	4			500	500		1			1
	Fertilizer Fact Sheet		50		45	5									
E. Wong gave a powerpoint presentation Noon Kiwanis at Family Table Restaurant	Fertilizer Fact Sheet	01/05/11	46	1/5/11	36	10				16			1	1	
	Know Where Your Drinking Water Comes From		45	1/5/11	33	12									
Commission/Public Meeting on Big Slough Watershed Flood Maps Model and Peer Review		01/26/11							38				1	1	
E. Wong gave a powerpoint presentation and training on NPDES to Utilities Operators trianees		02/26/11							4	4			1	1	
E. Wong gave a powerpoint presentation and training on NPDES to Utilities Operators trianees		02/27/11							6	6			1	1	
Ecofest at Warm Mineral Springs - City Booth	Fertilizer Fact Sheet and floodmap on easel	3/19/2011 to 3/20/11				25			500	500		1			1
	Know Where Your Drinking Water Comes From					10									
City Hall 2nd Floor table display	Fertilizer Fact Sheet	03/22/11	50	8/9/11	5	45									
City Hall 3rd Floor PZE Front Waiting area	Fertilizer Fact Sheet	03/22/11	50	8/9/11	49	1									
Great American Cleanup		04/02/11							18	18		1			
North Port Library Flood Awareness Seminar - Sarasota County CRS Coordinator Des Companion hosted	FEMA Brochures	04/14/11							12	12					1
Tree Festival	Fertilizer Fact Sheet	04/30/11	50	4/30/11	49	1			250	250		1			1
	Know Where Your Drinking Water Comes From														
North Port Newcomer's Day at North Port Library	Fertilizer Fact Sheet and floodmap on easel	05/07/11				1						1			1
North Port Environmental Festival	Fertilizer Fact Sheet	05/14/11	25	5/14/11	2	23			200	200		1			1
	Know Where Your Drinking Water Comes From		10	5/14/11	5	5									
	Flood Information 10 Topics Flyer and floodmap on easel		25	5/14/11	4	21		21							
North Port Library Flood Awareness Seminar - Des Companion hosted	Flood Information 10 Topics Flyer	05/26/11	20						2						1
City Hall 1st Floor Kiosk	Flood Information 10 Topics Flyer	05/27/11	100	8/9/11	85	15		15							
City Hall 2nd Floor table display	Flood Information 10 Topics Flyer	05/27/11	50	8/9/11	38	12		12							
City Hall 3rd Floor PZE Front Waiting area	Flood Information 10 Topics Flyer	05/27/11	30	8/9/11	27	3		3							
City Hall 1st Floor Kiosk	Know Where Your Drinking Water Comes From	05/27/11	50	8/9/11	42	8									

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/ Workshop on Water Quality	Special Event on Water Quality
City Hall 2nd Floor table display	Know Where Your Drinking Water Comes From	05/27/11	50	8/9/11	24	26									
City Hall 3rd Floor PZE Front Waiting area	Know Where Your Drinking Water Comes From	05/27/11	50	10/3/11	29	21									
Presentation to the Planning Zoning and Advisory Board on Flood map update and stormwater maintenance discussions		06/16/11							11	11			1	1	
Mullen Center, City of North Port Summer Camp Kids, taught 4 x 1hr sessions of summer camp kids for a total of 120 kids on Don't Pollute and Flood Information. Kids range from 5yr to 13yr old	Fertilizer Fact Sheet	7/20/11 to 7/21/11	100	7/20/11 to 7/21/11	4	96			120	120			4	4	
	Know Where Your Drinking Water Comes From		100		1	99									
	Flood Information 10 Topics Flyer and floodmap on easel		100		2	98		98							
International Coastal Cleanup		09/24/11													1
Charlotte County Green Expo	Fertilizer Fact Sheet	10/01/11	47	7/20/11 to 7/21/11	35	12			1000	1000		1			1
	Know Where Your Drinking Water Comes From		49		22	27									
	Flood Information 10 Topics Flyer and floodmap on easel		27		4	23		23							
City Hall 3rd Floor Lobby area	Fertilizer Fact Sheet	10/10/11	25	3/5/11	0	25									
	Know Where Your Drinking Water Comes From		16		0	16									
	Flood Information 10 Topics Flyer		21		0	21		21							
North Port Community Garden at Warm Mineral Springs	Fertilizer Fact Sheet	10/10/11	20	10/10/11	10	10			11	11			1	1	
	Know Where Your Drinking Water Comes From		20		8	12									
	Flood Information 10 Topics Flyer		20		11	9		9							
North Port Democratic Club	Fertilizer Fact Sheet	10/17/11	5	10/17/11	0	5			35	35	1				
CHNEP Nature Festival	Fertilizer Fact Sheet	11/19/11	50		40	10			3000	3000		1			1
	Know Where Your Drinking Water Comes From		22		14	8									
	Flood Information 10 Topics Flyer and floodmap on easel		50		38	12		12							
North Port Library Flood Awareness Seminar - Des Companion hosted	Flood Information 10 Topics Flyer	12/1/2011	38		38	0		0	2	2					1
SWFWMD Public Open House on Draft Flood Maps	Flood Information 10 Topics Flyer and floodmap on easel	12/6/2011	50	12/7/11	45	5		5	523				1	1	
Wood Haven Estates HOA new Draft Floodmaps	Flood Information 10 Topics Flyer and floodmap on easel	1/17/2012	30	1/17/2012	27	3		3	36	36	1				
Jockey Club HOA Stormwater System and Pollution Prevention	Fertilizer Fact Sheet	01/19/12	40	01/19/12	30	10	10		50	50	1				
	Know Where Your Drinking Water Comes From		14		6	8	8								
	Flood Information 10 Topics Flyer and floodmap on easel		27		26	1	1								
	Grandfathering insurance FEMA brochure		30		30	0	0								
Warm Mineral Springs Open House	Fertilizer Fact Sheet	01/21/12	30		23	7			50	50		1			1
	Flood Information 10 Topics Flyer and floodmap on easel		20		15	5		5							
	Know Where Your Drinking Water Comes From		6		1	5									
Warm Mineral Springs Open Forum	Fertilizer Fact Sheet	1/26/12 and 2/2/12	30	2/10/12	21	9			40	40					
City Hall 1stFloor Lobby area	Fertilizer Fact Sheet	03/06/12	30		0	30									
	Know Where Your Drinking Water Comes From		30		0	30									
	Flood Information 10 Topics Flyer		30		0	30		30							
City Hall 2nd Floor Lobby area	Fertilizer Fact Sheet	03/06/12	37		37	0									
	Know Where Your Drinking Water Comes From		30		11	19									
	Flood Information 10 Topics Flyer		30		28	2		2							
City Hall 3rd Floor Lobby area	Fertilizer Fact Sheet	03/06/12	30		0	30									

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/ Workshop on Water Quality	Special Event on Water Quality
	Know Where Your Drinking Water Comes From		30		15	15									
	Flood Information 10 Topics Flyer		30		0	30		30							
Warm Mineral Springs Ecofest	Fertilizer Fact Sheet	03/17/12	25		20	5			300	300		1			1
	Know Where Your Drinking Water Comes From		25		20	5									
	Flood Information 10 Topics Flyer		25		20	5		5							
Great American Cleanup	Fertilizer Fact Sheet	04/07/12	20		14	6			9	9					1
	Know Where Your Drinking Water Comes From		20		14	6									
	Flood Information 10 Topics Flyer							0							
North Port Second Nature Environmental Festival	Fertilizer Fact Sheet	05/12/12	30		27	3			200	200		1			1
	Know Where Your Drinking Water Comes From		30		27	3									
	Flood Information 10 Topics Flyer		14		12	2		2							
Commission Presentation of the Improved CRS Rating		05/29/12							50						
Fertilizer and Aquatic plants Workshop	Fertilizer Fact Sheet	06/23/12	60		52	8			8	8			1	1	
	Know Where Your Drinking Water Comes From		60		52	8									
	Flood Information 10 Topics Flyer		60		52	8		8							
Commission Public Meeting Presenting NPDES Year 4 (2011) Report		7/10/2012							50	50			1	1	
Mullen Center, City of North Port Summer Camp Kids, taught 2 x 1.5hr sessions of summer camp kids for a total of 77 camp kids and 6 City staff on Fertilizers, Aquatic plants, Don't Pollute and Flood Information. Kids range from 5yr to 13yr old	Fertilizer Fact Sheet	08/13/12	120		77	43	43		83	83			2	2	
	Flood Information 10 Topics Flyer		120		82	38		38							
City Hall 1stFloor Lobby area	Fertilizer Fact Sheet	08/31/12	30	9/12/13	0	30	30								
	Know Where Your Drinking Water Comes From		30		0	30	30								
	Flood Information 10 Topics Flyer		30		0	30		30							
City Hall 2nd Floor Lobby area	Fertilizer Fact Sheet	08/31/12	37	9/12/13	0	37	37								
	Know Where Your Drinking Water Comes From		30		0	30	30								
	Flood Information 10 Topics Flyer		30		8	22		22							
City Hall 3rd Floor Lobby area	Fertilizer Fact Sheet	08/31/12	30	9/12/13	0	30	30								
	Know Where Your Drinking Water Comes From		27		0	27	27								
	Flood Information 10 Topics Flyer		30		0	30		30							
2012 International Coastal Cleanup	Fertilizer Fact Sheet	09/15/12	30		18	12	12		17	17			1	1	
	Know Where Your Drinking Water Comes From		30		18	12	12								
	Flood Information 10 Topics Flyer		30		19	11		11							
Public Works Office	Fertilizer Fact Sheet	09/17/12	30	9/12/13	20	10	10								
	Know Where Your Drinking Water Comes From		25		22	3	3								
	Flood Information 10 Topics Flyer		30		24	6		6							
Newcomers Day	Fertilizer Fact Sheet	11/03/12	18		0	18	18		256	256					1
	Know Where Your Drinking Water Comes From		18		0	18	18								
	Flood Information 10 Topics Flyer		19		0	19		19							
CHNEP Nature Festival	Fertilizer Fact Sheet	11/17/12	50		24	26	26		3000	3000		1			1
	Know Where Your Drinking Water Comes From		50		36	14	14								
	Flood Information 10 Topics Flyer and		14		7	7		7							
North Port Second Nature Environmental Festival	Fertilizer Fact Sheet	02/09/13	54		43	11	11		500	500		1			1
	Know Where Your Drinking Water Comes From		66		54	12	12								

Public Outreach Activities

Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality	
	Flood Information 10 Topics Flyer and floodmap on easel		37		33	4		4								
FDEP Public Workshop	Fertilizer Fact Sheet	03/07/13	43		41	2	2		50	50		1			1	
	Know Where Your Drinking Water Comes From		54		52	2	2									
	Flood Information 10 Topics Flyer and floodmap on easel		33		31	2	2									
Great American Cleanup	Fertilizer Fact Sheet	04/27/13	41		30	11	11		20	20		1			1	
	Know Where Your Drinking Water Comes From		52		40	12	12									
	Flood Information 10 Topics Flyer and floodmap on easel		31		19	12	12									
Newcomers Day	Fertilizer Fact Sheet	05/04/13	30		24	6	6		20	20					1	
	Know Where Your Drinking Water Comes From		40		32	8	8									
	Flood Information 10 Topics Flyer and floodmap on easel		19		13	6	6									
Green Tour of North Port - hosted by E.Wong for Lisa Beever, Director CHNEP and other citizens									6	6						1
Mullen Center, City of North Port Summer Camp Kids, taught 50 summer camp kids 3 City staff on Fertilizers, Aquatic plants, Don't Pollute and Flood Information. Kids range from 5yr to 8yr old	Fertilizer Fact Sheet	07/19/13	30		2	28	28		50	50					1	
	Know Where Your Drinking Water Comes From		30		0	30	30									
	Flood Information 10 Topics Flyer and floodmap on easel		30		1	29	29									
City Hall 1stFloor Lobby area	Fertilizer Fact Sheet	09/12/13	30	9/11/14	0	30	30									
	Know Where Your Drinking Water Comes From		30		0	30	30									
	Flood Information 10 Topics Flyer		30		0	30	30									
City Hall 2nd Floor Lobby area	Fertilizer Fact Sheet	09/12/13	30	9/11/14	0	30	30									
	Know Where Your Drinking Water Comes From		30		14	16	16									
	Flood Information 10 Topics Flyer		30		7	23	23									
City Hall 3rd Floor Lobby area	Fertilizer Fact Sheet	09/12/13	30	9/11/14	0	30	30									
	Know Where Your Drinking Water Comes From		30		0	30	30									
	Flood Information 10 Topics Flyer		30		0	30	30									
Public Works Office	Fertilizer Fact Sheet	09/12/13	30	9/11/14	0	30	30									
	Know Where Your Drinking Water Comes From		30		1	29	29									
	Flood Information 10 Topics Flyer		30		11	19	19									
2013 International Coastal Cleanup	Fertilizer Fact Sheet	09/20/13	30			30	30		30	30			1	1		
	Know Where Your Drinking Water Comes From		24			24	24									
	Flood Information 10 Topics Flyer		30			30	30									
North Port Cub Scouts	Fertilizer Fact Sheet	11/19/13	15		0	15	15								1	
	Know Where Your Drinking Water Comes From		15		10	5	5									
	Sustainability		15		6	9	9									
CHNEP Nature Festival	Fertilizer Fact Sheet	11/23/13	50	11/25/13	41	9	9		3500	3500		1			1	
	Know Where Your Drinking Water Comes From		50		38	12	12									
	Flood Information 10 Topics Flyer and floodmap on easel		50		35	15	15									
Public Works Road-eo	Fertilizer Fact Sheet	01/25/14	50	01/25/14	36	14	14		600	600		1			1	
	Know Where Your Drinking Water Comes From		50		38	12	12									
	Flood Information 10 Topics Flyer and floodmap on easel		50		42	8	8									
North Port Second Nature Environmental Festival	Fertilizer Fact Sheet	02/08/14	36	02/08/14	24	12	12		400	400		1			1	
	Know Where Your Drinking Water Comes From		38		22	16	16									
	Flood Information 10 Topics Flyer and floodmap on easel		42		28	14	14									
Newcomers Day	Fertilizer Fact Sheet	02/01/14				0	0		20	20					1	
	Know Where Your Drinking Water Comes From				10	10										

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality
	Flood Information 10 Topics Flyer and					10		10							
Great American Cleanup	Fertilizer Fact Sheet	03/15/14	28	03/15/14		28	28		65	65	1				
	Know Where Your Drinking Water Comes From		28			28									
	Flood Information 10 Topics Flyer and		28			28	28								
Make Mitigation Happen Community Workshop held at North Port Library	Make Mitigation Happen Community Powerpoint	05/20/14							5	5					
Woodland Middle School Speaker, spoke to 6th, 7th and 8th graders on pollution prevention and pervious pavement use at STEM program	Fertilizer Fact Sheet	03/21/14	34	3/21/14	30	4	4		20	20			1		
Mullen Center, City of North Port Summer Camp Kids, taught 2 sessions 1.5hr to 41 summer camp kids 2 City camp counsellor on Fertilizers, Aquatic plants, Don't Pollute and Flood Information. Kids range from 5yr to 13yr old	Fertilizer Fact Sheet	08/08/14	60	08/08/14	32	28	28		43	43				2	
	Know Where Your Drinking Water Comes From		30		9	21	21								
	Flood Information 10 Topics Flyer and floodmap on easel		30		20	10		10							
City Hall Three Floors Lobby area	Fertilizer Fact Sheet	9/11/14	90	9/14/15	0	90	90								
	Know Where Your Drinking Water Comes From		90		21	69	69								
	Flood Information 10 Topics Flyer		90		11	79		79							
International Coastal Cleanup		9/20/14							61	61	1				
Commission Workshop on Big Slough Watershed study and draft Flood map		9/25/14							14	14					
Public Works Office	Fertilizer Fact Sheet	9/29/14	29	9/14/15	0	29	29								
	Know Where Your Drinking Water Comes From		30		19	11	11								
	Flood Information 10 Topics Flyer		50		36	14		14							
2014 International Coastal Cleanup	Fertilizer Fact Sheet	9/27/14	30	9/27/14	0	30	30		65	65	1				
	Know Where Your Drinking Water Comes From		30		0	30	30								
	Flood Information 10 Topics Flyer		30		0	30		30							
GIS Day at North Port Library - New draft flood map on display	Flood Information 10 Topics Flyer	11/19/14	50		48	2		2	2	2					
CHNEP Nature Festival	Fertilizer Fact Sheet	11/22/14	50	11/22/14	0	50	50		2500	2500	1				1
	Know Where Your Drinking Water Comes From		50		0	50	50								
	Flood Information 10 Topics Flyer and floodmap on easel		50		0	50		50							
Flood Map Changes Stakeholder Meeting	Sarasota County Organized with North Port coordination	1/9/15							90						
Sarasota County/FEMA 1st Public Open House on Draft FIRMs		1/20/15							140						
Venice/Sarasota County/FEMA 1st Public Open House on Draft FIRMs		1/21/15							503						
North Port/Sarasota County/FEMA 1st Public Open House on Draft FIRMs		1/22/15							452						
Public Works Road-eo	Fertilizer Fact Sheet	01/24/15	50	01/26/15	45	5	5		700	700					1
	Know Where Your Drinking Water Comes From		50		49	1	1								
	Flood Information 10 Topics Flyer and floodmap on easel		50		39	11		11							
Ecofest City Hall	Fertilizer Fact Sheet	02/07/15	45	02/07/15	33	12	12		1000	1000		1			1
	Know Where Your Drinking Water Comes From		49		46	3	3								
	Flood Information 10 Topics Flyer and floodmap on easel		50		35	15		15							
Sarasota County/FEMA 2nd Public Open House on Draft FIRMs		2/24/15							18						
Venice/Sarasota County/FEMA 2nd Public Open House on Draft FIRMs		3/4/15							60						

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/ Workshop on Water Quality	Special Event on Water Quality
North Port/Sarasota County/FEMA 2nd Public Open House on Draft FIRMs	Fertilizer Fact Sheet	3/12/15	33			33	33		105						
	Know Where Your Drinking Water Comes From		46	3/12/15	45	1	1								
	Flood Information 10 Topics Flyer and floodmap on easel		75	3/12/15	65	10		10							
	Flood Insurance Premium Comparisons		25	3/12/15	22	3		3							
Public Works Office	Flood Insurance Premium Comparisons	3/12/15	21		10	11		11							
	Effect of Map Changes on Insurance		25	9/14/15	0	25		25							
	Electronic LOMA		25		0	25		25							
Great American Cleanup	Fertilizer Fact Sheet	03/28/15	28	03/28/15		28	28		50	50					1
	Know Where Your Drinking Water Comes From		28			28	28								
	Flood Information 10 Topics Flyer and floodmap on easel		28			28	28								
Charlotte County Board of Realtors, 3320 Loveland Blvd, Port Charlotte, FL 33980	Flood Information 10 Topics Flyer and floodmap on easel	04/09/15	21	04/09/15	0	21		21	80	80	1				
	Flood Insurance Premium Comparisons		19		18	1		1							
North Port Business Club	Flood Information 10 Topics Flyer and draft floodmap on easel	04/21/15	20	04/21/15	17	3		3	13	13	1				
TIGER Bay Club Monthly - Flood map updates		05/08/15							40						
Hurricane Exercise, and distribution of water and flyer at Atwater Park	Hurricane Disaster Planning Guide	05/20/15				100		100	100						
Utility Bill Mailer with Pet Waste Message June 2 to July 1st, 2015	Utilities Bill mailer included message "Keep our waterways and drinking water supply clean. Please collect your pet's waste and dispose in garbage."	06/01/15				20000	20000								
Lions Club meeting Speaker on new draft flood maps	Flood Information 10 Topics Flyer and draft floodmap on easel	06/02/15	17	06/02/15	0	17		17	20	20				1	
July 4th Fireworks Festival	Fertilizer Fact Sheet	07/04/15	45	07/07/15		45	45		5000	5000					1
	Know Where Your Drinking Water Comes From		45		44	1	1								
	Flood Information 10 Topics Flyer and floodmap on easel		45			45		45							
Mullen Center, City of North Port Summer Camp Kids, taught 2 sessions 1hr each to summer camp kids and City camp counsellor on Fertilizers, Dont Pollute and Flood Information. Kids range from 5yr to 13yr old	Fertilizer Fact Sheet	08/03/15	60	08/03/15	0	60	60		103	103			2		
	Know Where Your Drinking Water Comes From		60		0	60	60								
	Flood Information 10 Topics Flyer and floodmap on easel		60		21	39		39							
City Hall Three Floors Lobby area	Fertilizer Fact Sheet	9/16/15	90		0	90	90								
	Know Where Your Drinking Water Comes From		90		6	84	84								
	Flood Information 10 Topics Flyer		90		6	84		84							
Public Works Office	Fertilizer Fact Sheet	9/16/15	30		0	30	30								
	Know Where Your Drinking Water Comes From		30		10	20	20								
	Flood Information 10 Topics Flyer		30		23	7		7							
International Coastal Cleanup - ulie Bellia discussed water quality and flood info		09/19/15			0	0			65	65					1
CRS first quarterly meeting City Staff and Public Sector Representatives	Fertilizer Fact Sheet	10/30/15	30	10/30/15	10	20	20		21	21				1	
	Know Where Your Drinking Water Comes From		30		11	19	19								
	Flood Information 10 Topics Flyer and floodmap on easel		30		11	19		19							
CHNEP Nature Festival	Fertilizer Fact Sheet	11/21/15	33	11/23/15	22	11	11		1500	1500		1			1

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality
	Know Where Your Drinking Water Comes From		44		39	5	5								
	Flood Information 10 Topics Flyer and floodmap on easel		37		30	7		7							
North Port Library Flood Zone Workshops	Flood Information 10 Topics Flyer and floodmap on easel	01/13/16				2		2	2						
2016 Public Works Road-E-O	Fertilizer Fact Sheet	01/30/16	50		35	15	15		900	900		1			1
	Know Where Your Drinking Water Comes From		50		30	20	20								
	Flood Information 10 Topics Flyer and floodmap on easel		50		30	20	20								
Newcomer Day	Fertilizer Fact Sheet	02/06/16	35		0	35	35		300	300					1
	Know Where Your Drinking Water Comes From		30		0	30	30								
	Flood Information 10 Topics Flyer and floodmap on easel		30		0	30	30								
North Port Library Flood Zone Workshops	Flood Information 10 Topics Flyer and floodmap on easel	02/08/16				2		2	3						
Roadways & Waterways Celebration @ McKibben Park	Fertilizer Fact Sheet	02/27/16	50		30	20	20		150	150					1
	Know Where Your Drinking Water Comes From		50		35	15	15								
	Flood Information 10 Topics Flyer and floodmap on easel		50		30	20	20								
North Port Library Flood Zone Workshops	Flood Information 10 Topics Flyer and floodmap on easel	03/15/16				2		2	3						
City Commission Meeting on Status of FEMA Draft Flood Maps		03/22/16							20						
HOA Presentation @ Talon Bay	Fertilizer Fact Sheet	03/23/16	65		0	65	65		65	65				1	
	Know Where Your Drinking Water Comes From		65		0	65	65								
	Flood Information 10 Topics Flyer and floodmap on easel		65		0	65	65								
Great American Cleanup	Fertilizer Fact Sheet	04/16/16	30	04/16/16	28	2	2		35	35	1				
	Know Where Your Drinking Water Comes From		30		26	4	4								
	Flood Information 10 Topics Flyer and floodmap on easel		30		28	2	2								
Public Works Office	Fertilizer Fact Sheet	4/21/16	30	12/31/16	0	30	30								
	Know Where Your Drinking Water Comes From		30			10	20	20							
	Flood Information 10 Topics Flyer		30			23	7	7							
6th Annual Regional Reverse Trade Show & Conference in Sarasota	Fertilizer Fact Sheet	04/22/16	28	04/22/16	28	0	0		322	322					1
	Know Where Your Drinking Water Comes From		26			26	0	0							
	Flood Information 10 Topics Flyer and floodmap on easel		28			28	0	0							

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality
City Hall Three Floors Lobby area	Fertilizer Fact Sheet	4/25/16	90	12/31/16	24	66	66								
	Know Where Your Drinking Water Comes From		96		58	38	38								
	Flood Information 10 Topics Flyer		96		31	65		65							
Lamarque Elementary Earth Night	Fertilizer Fact Sheet	03/24/16	50	03/24/16	27	23	23		25	25			1		
	Know Where Your Drinking Water Comes From		50		22	28	28								
	Flood Information 10 Topics Flyer and floodmap on easel		50		20	30		30							
Newcomer Day	Fertilizer Fact Sheet	05/07/16	50	05/07/16	30	20	20		50	50					1
	Know Where Your Drinking Water Comes From		50		26	24	24								
	Flood Information 10 Topics Flyer and floodmap on easel		50		30	20		20							
Toledo Blade Elementary Spring Showcase	Fertilizer Fact Sheet	05/12/16	50	05/12/16	35	15	15		50	50			1		
	Know Where Your Drinking Water Comes From		50		40	10	10								
	Flood Information 10 Topics Flyer and floodmap on easel		50		42	8		8							
Heron Creek HOA - Head from each Block	Flood Information 10 Topics Flyer and floodmap on easel	06/09/16	30		0	30		30	20	20				1	
Final FEMA flood map Public Open Houses 6/20/16, 6/21/16 6/23/16, 6/27/16 6/28/16, 6/29/16	Fertilizer Fact Sheet	06/23/16	50	06/24/16	48	2	2		155						
	Know Where Your Drinking Water Comes From		50		43	7	7								
	Flood Information 10 Topics Flyer and floodmap on easel		50		38	12		12							
North Port Commission Meeting on Ordinance 2016-21 to revise ULDC Chapter 17 to adopt new FIRMs		07/26/16					0		30						
North Port Library Flood Zone Workshops	Flood Information 10 Topics Flyer and floodmap on easel	08/23/16					0		8						
North Port Commission Meeting on Ordinance 2016-21 to revise ULDC Chapter 17 to adopt new FIRMs		09/13/16					0		30						
International Coastal Cleanup	Fertilizer Fact Sheet	09/17/16	100	09/17/16			0		125	150	1				
North Port GIS Day at the North Port Library	Flood Information 10 Topics Flyer	11/16/16	38		38	0	0	0	50						
CHNEP Nature Festival	Fertilizer Fact Sheet	11/19/16	43	11/19/16	32	11	11		2000	2000		1			1
	Know Where Your Drinking Water Comes From		43		31	12	12								
	Flood Information 10 Topics Flyer and floodmap on easel		38		20	18		18							
Leadership North Port Tour	Fertilizer Fact Sheet	01/13/17	25	01/13/17	0	25	25		25	25				1	
	Know Where It Flows		25		0	25	25								
	Flood Information Sheet		25		0	25		25							
Meeting with Canal Watch Program Volunteers	Fertilizer Fact Sheet	01/17/17	32	01/17/17	22	10	10			7	1				
	Know Where Your Drinking Water Comes From		31		25	6	6								
Public Works Road-E-O	Fertilizer Fact Sheet	01/28/17	50	01/28/17	38	12	12		2000	2000		1			1
	Know Where Your Drinking Water Comes From		50		37	13	13								
	Flood Information 10 Topics Flyer and floodmap on easel		50		43	7		7							
Newcomer Day	Fertilizer Fact Sheet	02/04/17	300	02/04/17	50	250	250		300	300		1		1	
	Know Where It Flows		300		47	253	253								
	Flood Information 10 Topics Flyer and floodmap on easel		300		0	300		300							
Lamarque Elementary Earth Night	Fertilizer Fact Sheet	02/14/17	75	02/14/17	10	65	65		100	100			1		
	Know Where It Flows		75		13	62	62								

Public Outreach Activities

Flood Information Related															
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/ Workshop on Water Quality	Special Event on Water Quality
	Flood Information 10 Topics Flyer and floodmap on easel		75		17	58		58							
Great American Cleanup	Fertilizer Fact Sheet	04/22/17	38	4/23/17	17	21	21		50	50					1
	Know Where Your Drinking Water Comes From		37		17	20	20								
	Flood Information 10 Topics Flyer		43		24	19		19							
Newcomer Day	Fertilizer Fact Sheet	05/06/17	200	05/06/17	53	147	147		200	200		1		1	
	Know Where It Flows		200		45	155	155								
	Flood Information 10 Topics Flyer		200		48	152		152							
Toledo Blade Elementary Spring Showcase	Fertilizer Fact Sheet	05/18/17	150	05/18/17	101	49	49		150	150			1		
	Know Where It Flows		150		97	53	53								
	Flood Information 10 Topics Flyer		150		86	64		64							
Public Works Office	Fertilizer Fact Sheet	6/15/17	42			42	42					1			
	Know Where Your Drinking Water Comes From		30			30	30								
	Flood Information 10 Topics Flyer		30			30		30							
City Hall Three Floors Lobby area and Planning Dept	Fertilizer Fact Sheet	6/16/17	120	10/19/17	25	95	95					1			
	Know Where Your Drinking Water Comes From		120		80	40	40								
	Flood Information 10 Topics Flyer		120		100	20		20							
SKYWARN® spotter training class on June 28, 2017		06/28/17							76						
Radio interview with WKDW FM Radio		9/14/17							500						
City Hall Three Floors Lobby area and Planning Dept	Fertilizer Fact Sheet	10/19/17	25		0	25	25					4			
	Know Where Your Drinking Water Comes From		80		29	51	51								
	Flood Information 10 Topics Flyer		40		2	38		38							
Utilities Office	Fertilizer Fact Sheet	10/20/17	20		0	20	20					1			
	Know Where Your Drinking Water Comes From		19		0	19	19								
	Flood Information 10 Topics Flyer		20		0	20		20							
International Coastal Cleanup	Fertilizer Fact Sheet	10/28/17	30	10/28/17	12	18	18		21	21					1
	Know Where Your Drinking Water Comes From		30		12	18	18								
	Flood Information 10 Topics Flyer		30		12	18		18							
Newcomer Day brochures - for Edie Driest to distribute	Fertilizer Fact Sheet	11/4/17	30			30	30		30	30					
	Know Where Your Drinking Water Comes From		30			30	30								
	Flood Information 10 Topics Flyer		30			30		30							
Newcomer Day - Public Works Customer Service handed out	Fertilizer Fact Sheet	11/3/17	50			42	42		35	42		1		1	
	Know Where Your Drinking Water Comes From		50			37	37								
	Flood Information 10 Topics Flyer		50			35		35							
Newcomer Day	Fertilizer Fact Sheet	11/04/17	200		0	200	200		300	300		1		1	1
	Know Where Your Drinking Water Comes From		200		0	200	200								
	Flood Information 10 Topics Flyer		200		0	200		200							
CHNEP Nature Festival	Fertilizer Fact Sheet	11/18/17	50		0	50	50		2000	2000		1			1
	Know Where Your Drinking Water Comes From		50		41	9	9								

Public Outreach Activities

Event	Flood Information Related Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/ Workshop on Water Quality	Special Event on Water Quality
	Flood Information 10 Topics Flyer and floodmap on easel		50		48	2		2							
Leadership North Port Tour	Drainage System Tips	1/12/18	20				20	20	20	20				1	
	Flood Information 10 Topics Flyer		20				20	20							
Newcomer Day - Public Works Customer Service	Drainage System Tips	2/3/18	200	2/3/18	0	200	200	300	300	200				1	
	Flood Information 10 Topics Flyer		200			0	200				150				
Public Works Road-ee	Fertilizer Fact Sheet	02/24/18	50	02/24/18	38	12	12		2200	2200	1				1
	Know Where Your Drinking Water Comes From		50			43	7	7							
	Flood Information 10 Topics Flyer and		50			27	23					23			
Gran Paradiso Coach Homes HOA Pres Vlad Basch	Flood Information 10 Topics Flyer	03/13/18	27		0	27		27	1						
Florida Native Plant Society Mangrove Chapter	Fertilizer Fact Sheet	03/13/18	38	03/13/18	20	18	18			23				1	
	Know Where Your Drinking Water Comes From		38			19	19	19							
West Villages Town Hall	Fertilizer Fact Sheet	03/15/18	50	03/15/18	0	50	50		400	400	1				
	Know Where Your Drinking Water Comes From		50			0	50	50							
	Flood Information 10 Topics Flyer		50			0	50					50			
Earth Night - Lamarque Elementary	Fertilizer Fact Sheet	03/22/18	50	03/22/18	0	50	50		75	75			1		
	Know Where Your Drinking Water Comes From		50			0	50	50							
	Flood Information 10 Topics Flyer		50			0	50				50				
Great American Cleanup		03/24/18		4/23/17					23	23					1
Peace River Engineering Society	Flood Information 10 Topics Flyer	04/10/18	20	4/10/18	13	7		7	12	12				1	
Oscar Scherer Park for the Earth Day celebration	Flood Information 10 Topics Flyer	04/27/19	200	04/21/18	0	200		200	200						
Toledo Blade Elementary Spring Fling	Fertilizer Fact Sheet	05/10/18	50	05/10/18	0	50	50		400	400			1		
	Know Where Your Drinking Water Comes From		50			0	50	50							
	Flood Information 10 Topics Flyer		50			0	50				50				
Atwater Elementary School Earth Day	Fertilizer Fact Sheet	05/11/18	43		21	22	22		200	200			1		
	Know Where Your Drinking Water Comes From		43			21	22	22							
	Flood Information 10 Topics Flyer		43			21	22				22				
July 4th Freedom Festival	Fertilizer Fact Sheet	07/04/18	30	07/09/18	27	3	3		5	5					1
	Know Where Your Drinking Water Comes From		30			25	5	5							
	Flood Information 10 Topics Flyer		30			26	4				4				
City of North Port Summer kids camp	Fertilizer Fact Sheet	07/19/18	30	07/19/18	3	27	27		150	150			1		
	Know Where Your Drinking Water Comes From		30			5	25	25							
	Flood Information 10 Topics Flyer		30			5	25				25				
Canal Watch Group members + outreach	Fertilizer Fact Sheet	07/19/18	30	08/02/18	44	16	16		7	7				1	
	Know Where Your Drinking Water Comes From		30			11	19	19							
	Flood Information 10 Topics Flyer		30			32	7				7				

Public Outreach Activities

Flood Information Related																
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality	
Water Control Structure No. 115 Ribbon Cutting Ceremony									55	55					1	
International Coastal Cleanup	Fertilizer Fact Sheet	09/15/18	30		0	30	30		100	100					1	
	Know Where Your Drinking Water Comes From		30		0	30	30									
	Flood Information 10 Topics Flyer		30		0	30		30								
Canal Watch Group members + outreach + WTP tour	Know Where Your Drinking Water Comes From	10/25/218	80		0	80	80			10				1		
CHNEP Nature Festival	Fertilizer Fact Sheet	11/17/18	30	11/19/18	25	5	5		1750	1750		1			1	
	Know Where Your Drinking Water Comes From		30		18	12	12									
	Flood Information 10 Topics Flyer		30		26	4		4								
Public Works Road-E-O	Fertilizer Fact Sheet	01/25/19	39	01/25/19	0	39	39		2400	2400		1			1	
	Fertilizer Resolution Sheet		91			0	91	91								
	Know Where Your Drinking Water Comes From		49			0	49	49								
	Flood Information 10 Topics Flyer and floodmap on easel		47			46	1									1
Flood Reduction Study Public Outreach Meeting	Fertilizer Fact Sheet	02/13/19	50	02/13/19	0	50	50		47							
	Know Where Your Drinking Water Comes From		29			0	29	29								
	Flood Information 10 Topics Flyer and floodmap on easel		46			0	46									46
Clean up of Myakkahatchee Canal using kayaks		02/23/19							6	6						1
Fertilizer Regulation for HOAs and subcontractors	Fertilizer Fact Sheet	03/12/19	2		0	2	2			2	1					
NP Friends of Wildlife Seminar	Fertilizer Fact Sheet	03/20/19	20		0	20	20			20				1		
Fertilizer Regulation for HOAs and subcontractors and Illicit Discharge	Fertilizer Fact Sheet	03/26/19	20		4	16	16			9	1					
Clean up of Myakkahatchee Canal using kayaks		03/30/19							9	9						1
Fertilizer Regulation for Gran Paradiso HOA manager Landscape Management subcontractor	Fertilizer Fact Sheet	04/11/19	2		0	2	2			2				1		
Great American Cleanup		04/13/19							14	14						1
Canal Watch Group Meeting	Fertilizer Fact Sheet	04/23/19	50	04/23/19	0	50	50		8	8					1	
	Know Where Your Drinking Water Comes From		50			0	50	50								
	Flood Information 10 Topics Flyer		50			0	50									50

Public Outreach Activities

Event	Flood Information Related Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality
Atwater Elementary School Earth Day	Know Where Your Drinking Water Comes From	04/26/19	20		0	20	20		160	160			1		
Earth Day Celebration at Oscar Scherer	Flood Information 10 Topics Flyer	04/27/19	250		0	250		250	1783						
City Hall Three Floors Lobby area and Planning Dept	Fertilizer Fact Sheet	5/10/19	120	5/13/20	78	42	42					4			
	Know Where Your Drinking Water Comes From		120		55	65	65								
	Flood Information 10 Topics Flyer		120		50	70	70								
Water Quality Public Outreach Workshop by IFAS		05/16/19								16				1	
City of North Port Hurricane Preparedness Training		05/22/19							13						
July 4th Celebration at Braves Stadium	Fertilizer Fact Sheet	7/4/19	30		0	30	30		30	30					1
	Know Where Your Drinking Water Comes From		30		0	30	30								
	Flood Information 10 Topics Flyer		30		0	30	30								
ERA Advantage Realty associates Presentation on Flood Information, Flood Insurance CRS and Water/Sewer	Fertilizer Fact Sheet	7/4/19	30		0	30	30		25	25					1
	Know Where Your Drinking Water Comes From		30		0	30	30								
	Flood Information 10 Topics Flyer		30		0	30	30								
Hurricane / Flooding Preparedness Presentation to City Staff		7/8/19	26						26						
Annual Summer Camp at George Mullens Activity Center	Fertilizer Fact Sheet	7/12/19	30	7/12/19	2	28	28		120	120			2		1
	Know Where Your Drinking Water Comes From		30		2	28	28								
	Flood Information 10 Topics Flyer		30		2	28	28								
Hurricane Preparedness Exercise		7/17/19							108						
City Hall Three Floors Lobby area and Planning	Fertilizer New Flyer (CHNEP funded)	8/5/19	120	5/13/20	36	84	84								
Environmental Advisory Board (EAB)	Fertilizer New Flyer (CHNEP funded)	09/09/19	48		0	48	48			4				1	
Commissioner McDowell	Fertilizer New Flyer (CHNEP funded)	09/16/19	1		0	1	1			1					
International Coastal Cleanup	Fertilizer New Flyer (CHNEP funded)	09/21/19	30		30	0	0		70	70					
	Flood Information 10 Topics Flyer		30	30	0	0									
Halloween at City Hall	Fertilizer Fact Sheet	10/25/19	50	7/12/19	49	1	1		2000	2000		1			1
	Fertilizer New Flyer (CHNEP funded)		500		499	1	1								
	Know Where Your Drinking Water Comes From		83		82	1	1								
	Flood Information 10 Topics Flyer		50		49	1	1								
CHNEP Nature Festival	Fertilizer New Flyer (CHNEP funded)	11/16/19	300	11/16/19	0	300	300		1000	1000		1			1
NWS Skywarn Severe Weather Spotter Class		11/18/19							42						
Public Works Road-e-O	Fertilizer Fact Sheet	2/22/20	20	2/22/20	19	1	1		2000	2000		1			1
	Fertilizer New Flyer (CHNEP funded)		17		17	0	0								
	Know Where Your Drinking Water Comes From		20		15	5	5								
	Flood Information 10 Topics Flyer		16		14	2	2								
FEMA new Preliminary 12/31/19 Coastal Risk Maps One on One Meetings with Commissioner		2/7/20							5						

Public Outreach Activities

Flood Information Related																
Event	Brochure Type	Date of Event	Amount Available	Date Remaining Brochures Counted	Amount Remaining	Amount of Flyers Given	Water Quality Protection Flyers	Flood Info. Flyers	No. of Participants (flood Related)	No. of Participants (Water Quality Related)	Neighborhood Presentation	Public Displays on Water Quality	School Presentation on Water Quality	Seminar/Workshop on Water Quality	Special Event on Water Quality	
FEMA new Preliminary 12/31/19 Coastal Risk Maps HOA reps meeting with CM		2/19/20							15							
FEMA new Preliminary 12/31/19 Coastal Risk Maps Venice Public Outreach Meeting		3/4/2020 4pm to 7pm							315							
FEMA new Preliminary 12/31/19 Coastal Risk Maps SCF Public Outreach Meeting	Fertilizer Fact Sheet	3/5/2020 9am to 12n	19	3/6/20	19	0	0		191							
	Fertilizer New Flyer (CHNEP funded)		17		17	0	0									
	Know Where Your Drinking Water Comes From		15		13	2	2									
	Flood Information 10 Topics Flyer		39			39										39
FEMA new Preliminary 12/31/19 Coastal Risk Maps SCTI Public Outreach Meeting		3/5/2020 4pm to 7pm							272							
City Hall Three Floors Lobby area and Planning Dept	Fertilizer Fact Sheet	5/13/20	78			78	78					4				
	Know Where Your Drinking Water Comes From		55			55	55									
	Flood Information 10 Topics Flyer		50			50										50
	Fertilizer New Flyer (CHNEP funded)		36			36										36
2020 Hurricane Preparedness in the Age of Covid-19	Presentation to Gran Paradiso	7/14/20	28			28		28	28							
2020 Hurricane Preparedness in the Age of Covid-19	Presentation to Gran Paradiso	7/29/20	21			21		21	21							
Hurricane Preparedness email to all City Employees	2 FEMA brochures (1)FEMA How To Prepare for a Hurricane - Before During After (2)create-your-family-emergency-communication-plan	8/7/20							600							
Annual Summer Camp at George Mullens Activity Center		8/6/20							50	50			50			
Virtual CRS meeting for City staff and Stake holders and General Public to encourage Participation	Virtual TEAMS meeting	9/17/20														
Radio WKDW 97.5 Talk Show with John Rawlings - DiscussED Canal / Creek system for potable water supply and Flood protection, fertilizer usage, flood mapping efforts, CRS flood insurance discounts.		9/28/20							2						1	
Total from 9/25/10 to 10/27/20							26743	4415	57100	50475	15	53	82	40	65	

News, Newsletters, Social Media Public Outreach

Date	Description	No. of Distribution	Water Quality	Flood Related
Sept 2010 and Oct 2010	Message on the Utility bills is: "Help keep our drinking water clean. Prevent domestic animal waste from reaching our swales, canals and the Myakkahatchee Creek. Pick up after your animals."	36000	36000	
Oct-10	City Insight Newsletter Article "25th Annual International Coastal Cleanup"	569	569	
Oct-10	City Insight Newsletter Article "Drainage Project Programs"	569	569	
Oct-10	City	7400	7400	
Mar-11	City Insight Newsletter Article on Neighborhood Clean-up on 2/12/11 and 2/19/11	580	580	
Jun-11	Journal for Surface Water Quality Professionals - E.Wong contribution to article on "Public Outreach and Education"	26000	26000	
Jun-11	Journal for Surface Water Quality Professionals - E.Wong contribution to article on "Pollution Prevention and Good Housekeeping"	26000	26000	
Jun-11	CHNEP Charlotte Harbor Happenings - City of North Port Rainwater Harvesting	13700	13700	
6/14/11	Ad in North Port Sun Herald Newspaper on Flood Information 10 CRS topic flyer	7400	7400	7400
Aug-11	City Insight Newsletter Article Camp Kids workshop on Don't Pollute and Hurricane Flood Preparedness	580	580	580
Sep-11	City Insight Newsletter Article on Learning about Stormwater	580	580	
Dec-11	North Port Presents" TV show on draft Flood Maps in run every Monday in January 2012	59,231	59,231	59231
5/31/12	North Port Sun Herald Newspaper Article - Flood Insurance Discount from North Port's CRS Program	4,192	4,192	4192
Spring 2012	CHNEP article on "The City of North Port's environmental stewardship is golden"	13700	13700	
5/30/12	Ad in North Port Sun Herald Newspaper on Flood Information 10 CRS topic flyer	4,192	4,192	4192
June-12	North Port Presents" TV show on Proper Fertilizer usage in run every Monday in July 2012	59,231	59,231	
6/12/13	Ad in North Port Sun Herald Newspaper on Flood Information 10 CRS topic flyer	4,192	4,192	4192
6/4/14	Ad in North Port Sun Herald Newspaper on Flood Information 10 CRS topic flyer	4,192	4,192	4192
8/25/14	North Port Sun Herald Newspaper Article - Help Keep Drinking Water Clean	4,192	4,192	
9/10/14	North Port Currents Newsletter (27,580 mailers) on Flood info.	30,652	30,652	30652
December 2014	City Insight news article on Promoting Environmental Protection (sent to all City Employees)	591	591	
12/22/14	North Port Website News Release - Learn more about Flood Maps and changes to North Port	3,500	3,500	3500
12/31/14	Federal Register - FEMA placed Ad on preliminary FIRMS	Unknown	Unknown	Unknown
Jan-15	Utility Billing message on FEMA Public Outreach 1/22/15 meeting	12,908	12,908	12908
Jan-15	City Insight Newsletter Article "New Flood Maps for the City"	567	567	567
1/20/15	North Port Website News Release on First Preliminary Flood Map Open House Hosted by FEMA - Learn more about Flood Maps and changes to North Port	3,500	3,500	3500
1/20/15	ABC Website New - FEMA's Update Flood Map Workshops heading next to Venice, North Port	Unknown	Unknown	Unknown
1/21/15	Englewood Sun Herald Newspaper - Flooded with questions	Unknown	Unknown	Unknown
1/21/15	North Port Sun Herald Newspaper - Flood map may cause real estate 'crisis'	4,192	4,192	4192
1/23/15	FEMA placed Ad on preliminary FIRMS in North Port Sun Herald, Sarasota Herald Tribune and other Newspapers - see Mike Taylor email 1/29/15	4,192	4,192	4192
1/30/15	FEMA placed Ad on preliminary FIRMS in North Port Sun Herald, Sarasota Herald Tribune and other Newspapers - see Mike Taylor email 1/29/15	4,192	4,192	4192
1/23/15	Sarasota Herald-Tribune - FEMA placed Ad on preliminary FIRMS	2,106	2,106	2106
1/30/15	Sarasota Herald-Tribune - FEMA placed Ad on preliminary FIRMS	2,106	2,106	2106
1/23/15	North Port Sun Herald Newspaper - FEMA placed Ad on preliminary FIRMS	4,192	4,192	4192
1/30/15	North Port Sun Herald Newspaper - FEMA placed Ad on preliminary FIRMS	4,192	4,192	4192
2/4/15	North Port Sun Herald Newspaper - Flood map appeal process begins	4,192	4,192	4192
2/10/15	North Port Sun Herald Newspaper - User-friendly maps released	4,192	4,192	4192
2/11/15	Herald Tribune -\$20 Million expected for flood control	2,106	2,106	2106
2/24/15	North Port Sun Herald Newspaper - Chamber to discuss updated FEMA flood maps	6,298	6,298	6298
2/27/15	North Port Currents Newsletter	30,652	30,652	
3/3/15	Mailed 758 postcards inviting property owners of all building structures affected by the new draft FIRMS to the March 12, 2015 public outreach open house in North Port.	758	758	758
3/6/15	North Port Website Second News Release on Second Preliminary Flood Map Open House Hosted by Sarasota County/CNP - Learn more about Flood Maps and changes to North Port	3,500	3,500	3500
3/6/15	Email Blast of News Release for Second Open House on draft FEMA Flood Maps	4,702	4,702	4702
3/12/15	City Calendar for 3/12/16 Public Open House	Unknown	Unknown	Unknown
April 2015	North Port Magazine Article on Flood map changes April 2015	6,500	6,500	6500
4/17/15	North Port Website News Release on Appeals Period on FEMA Preliminary FIRMS	3,500	3,500	3500
9/14/14	North Port Sun Herald Newspaper Article - New floodplain maps await final approval	4,192	4,192	4192
4/26/15	Sarasota Herald-Tribune - Flooding Classification for area FEMA maps Questioned	3,388	3,388	3388
5/24/15	Hurricane Season Preparation Week topical message to residents on hurricane hazards and preparedness tips	1,074	1,074	1074
6/3/15	Ad in North Port Sun Herald Newspaper on Flood Information 10 CRS topic flyer	4,192	4,192	4192
12/1/15	North Port Website News Release on Second draft of FIRMS	3,500	3,500	3500

News, Newsletters, Social Media Public Outreach

Date	Description	No. of Distribution	Water Quality	Flood Related
3/16/16	Sun Herald Newspaper Article on Changes in Flood Maps Coming Soon	4,192		4,192
6/1/16	North Port Facebook News Release on FIRMs Will Become Effective Nov 4, 2016 and 6 more open houses in June 2016	2,099		2,099
6/1/16	North Port Website News Release on FIRMs Will Become Effective Nov 4, 2016 and 6 more open houses in June 2016	1,401		1,401
6/8/16	Ad in North Port Sun Herald Newspaper on Flood Information 10 CRS topic flyer and June Open Houses on Flood Maps, 10 topics include water quality protection	4,192	4,192	4,192
6/3/16	Sarasota Herald-Tribune - Article on 28K more properties deemed high-risk	2,106		2,106
6/3/16	ABC and SNN TV news on new Flood Maps. Julie Bellia was interviewed, E. Wong assisted	unknown		unknown
6/16/16	City fo North Port Facebook News Release - Reminder of Open houase	2,341		2,341
6/16/16	City Website News Release - Reminder of Open houase	2,659		2,659
6/16/16	City Email to All Employees on 6/23/16 Final FIRMs Open House	300		300
June 2016	Sarasota County mailed on behalf of the City of North Port 483 flyers on June, 2016 inviting property owners of all building structures affected by the new draft FIRMs to the June 23, 2016 public outreach open house in North Port	483		483
7/18/16	Sun Article - Managing Local Systems 7-18-16	4,192		4,192
7/22/16	City of North Port mailed 472 letters on July 22, 2016 inviting property owners of all building structures affected by the new draft FIRMs to the March 12, 2015 public outreach open house in North Port	472		472
7/29/16	Charlotte Sun - Get an Insurance Checkup	unknown		unknown
9/20/16	North Port Website News Release - New Flood Maps approved by Commission and will become effective on November 4, 2016	3,500		3,500
11/10/16	North Port Facebook News Release - New Flood effective on November 4, 2016.	4,514		4,514
11/10/16	North Port Website News Release - New Flood effective on November 4, 2016.	6,500		6,500
Summer 2017	North RePort Newsletter to all Every Home in North Port with Flood Protection Tips	30,000		30,000
1/11/18	New pervious concrete installed by the NP Library on Facebook	6,457		6,457
1/12/18	NBC and WBBH news "North Port introducing new material to help with flooding"	unknown		unknown
3/15/18	Facebook Posting of Annual Household Hazardous Waste Collection	1,505	1,505	
3/20/18	Flood Zone Workshops North Port Sun Newspaper	4,192		4,192
4/28/18 to 5/5/18	For flood awareness week, North Port Facebook and Twitter messages on 8 Topics related Flood Protection, one topic per day	16,000		16,000
8/30/18	North Port Environmental Board Kicks Off Sun Newspaper Article	4,192	4,192	
9/10/18	Facebook Posting - Recycle Plastic Bags	9,911	9,911	
10/17/18	ABC News on Canal Neighborhood Watch and water quality protection	unknown	unknown	
10/23/18	News Release City encouraging the voluntary non-use 10-23-18	11,000	11,000	
10/24/18	Utility Bill Message encouraging Fertilizer non-use	22,000	22,000	
11/1/18	Herald Tribune Newspaper Article 11-1-18 Local officials unite in fight against red tide	2,106	2,106	
12/18/18	We are more than Garbage Man Christmas Video Sun Newspaper Article	4,192	4,192	
Holiday 2018	North RePort Newsletter to all Every Home in North Port with Flood Protection	30,000		30,000
2018	Disaster Planning Guide	1,000		1,000
1/29/19	City Web News Release Household Hazardous Waste Collection Event	38	38	
2/25/19	Clean up of the Myakkahatchee Creek Facebook news release	3,200	3,200	3,200
3/1/2019 - 4/1/19	Utility Billing message on Flood Awareness "Flood Awareness Week March 11-17. Be prepared. Look up your flood zone and buy flood insurance if needed because it only takes one storm. For more information, visit Cityofnorthport.com (keyword flood information) or call 941-240-8050." to send 03/01/19 to 4/1/19. 17,724 people via paper cycle bills, 7,331 e-bills	25,055		25,055
3/9-16/2019	Flood Awareness message on Facebook and Twitter	6,976		16,000
4/5/19	Annual CRS mailer to Real Estate Broker, Financial Institutions, Insurance Agency, Insurance Company and Abstract & Title Co.	187		187
5/16/19	Water Quality Education Outreach Team Meeting message on Facebook	16,000	16,000	
7/18/19	Facebook Post - Water Quality Protection Fertilizers, Pet Waste	9,911	9,911	
7/18/19	Facebook North Port Friends of Wildlife - Edie Driest Posts 7-18-19	14	14	
8/1/19	North RePort Newsletter to all Residents with Flood Information	70,631		70,631
9/16/19	Herald Tribune Article - Water Control structures and North Port Canals	2,106	2,106	2,106
2/26/20	City Webpage "FEMA Flood Map Updates Updated re FEMA new Preliminary 12/31/19 Coastal Risk Maps	4329		4329
2/26/20	News Release re FEMA new Preliminary 12/31/19 Coastal Risk Maps	161		161
2/26/20	Facebook postings re new Preliminary 12/31/19 Coastal Risk Maps	3,800		3,800
2/26/20	Twitter postings re new Preliminary 12/31/19 Coastal Risk Maps	3,682		3,682
3/4/20	Facebook News Release to encourage attendance at 3/5/20 FEMA meeting on new Preliminary 12/31/19 Coastal Risk Maps	3,294		3,294
3/4/20	Twitter News Release to encourage attendance at 3/5/20 FEMA meeting on new Preliminary 12/31/19 Coastal Risk Maps	3,682		3,682
3/5/20	Facebook News Release of 3/5/20 FEMA morning meeting on new Preliminary 12/31/19 Coastal Risk Maps and encourage attendance at the next 3/26/20 meeting	2,196		2,196

News, Newsletters, Social Media Public Outreach

Date	Description	No. of Distribution	Water Quality	Flood Related
3/5/20	Twitter News Release of 3/5/20 FEMA morning meeting on new Preliminary 12/31/19 Coastal Risk Maps and encourage attendance at the next 3/26/20 meeting	3,682		3,682
5/1/20	Posted on Facebook, Twitter, Instagram and Nextdoor - North Port Receives Increased Discount on Flood Insurance Effective May 1, 2020	11353		11353
5/1/20	City News Release - North Port Receives Increased Discount on Flood Insurance Effective May 1, 2020	546		546
5/28/20	Facebook Post reminding residents of the Fertilizer Ban that starts June 1st	3764	3764	
6/30/20	Utility bill message " <i>To protect the water quality in our waterways, no fertilizers containing nitrogen and/or phosphorus can be applied to lawns during the rainy season from June 1 – Sept 30. However, we are encouraging residents to voluntarily avoid using fertilizer year-round.</i> "	26,595	26,595	
7/2/20	Facebook post by Colleen Hibbits in Utilities reminding resident to refrain from Fertilizer year round and fertilizing restriction June 1 to Sept 30	7,508	7,508	
7/31/20	Utilities bill message " <i>Rainy season is here. Please access the City's website at www.cityofnorthport.com/flood for flood protection information. Know your flood zone and purchase flood insurance if needed.</i> "	26,595		26,595
8/29/20	Virtual CRS meeting posted on City Calendar of Events to encourage Public Participation			
9/28/20	Facebook and City's North RePort podcast and the WKDW Radio 97.5 Talk Show with John Rawlings - Discuss Canal / Creek system for potable water supply and Flood protection, flood mapping efforts, CRS flood insurance	983	983	983
Total as of 10/27/20		845,440	561,353	515,964

Youtube

Date	Youtube Videos	Date of Views recorded	No. of Views	Flood Related Info.	Water Quality	Flood Related
6/20/19	Hurricane Season Solid Waste Tips	4/16/20	1,300		1,300	
6/25/19	Plastic Bags Not Accepted	4/16/20	5,300		5,300	
7/31/19	Concrete poured at Water Control structure (WCS) #106	4/16/20	1,200	1		1,200
8/21/19	WCS #106 Update	4/16/20	2,000			2,000
9/23/19	Imagine a Day Without Water	4/16/20	853		853	
11/27/19	Recycling Center Update	4/16/20	2,000		2,000	
12/6/19	Recycling Tips	4/16/20	6,700		6,700	
12/20/19	NP Solid Waste Let It Go	4/16/20	53,500		53,500	
12/23/19	Amphibious Vehicle Video for clearing City Waterways for flood prevention and water quality	4/16/20	3,100,000		3,100,000	3,100,000
3/20/20	Help Utilities By Only Flushing the 3 P's	4/16/20	8,300		8,300	
3/31/20	Solid Waste starting COVID-19 precautions on April 6	4/16/20	3,500		3,500	
Total for 2019			3,184,653		3,181,453	3,103,200

2019 Web hits

Webpage Name	Web page URL	No of Hits 1/1/19 - 12/31/19	Water Quality	Flood Related
Flood Information	http://www.cityofnorthport.com/index.aspx?page=956	1581		1581
FEMA Flood Map Updates	http://www.cityofnorthport.com/index.aspx?page=1004	4950		4950
Is My Property in a Flood Zone?	http://www.cityofnorthport.com/index.aspx?page=217	2902		2902
1981/1984 FEMA Flood Maps	http://www.cityofnorthport.com/index.aspx?page=1271	409		409
Elevation Certificates	http://www.cityofnorthport.com/index.aspx?page=1269	533		533
Community Rating System (CRS) & Flood Insurance	http://www.cityofnorthport.com/index.aspx?page=1264	174		174
Flood Warning	http://www.cityofnorthport.com/index.aspx?page=1513	189		189
Environmental Services	http://www.cityofnorthport.com/index.aspx?page=1508	829	829	
Storm Water Management	http://www.cityofnorthport.com/index.aspx?page=1044	652	652	652
Total		12219	1481	11390

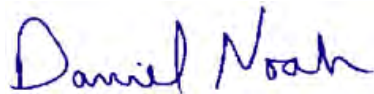
November 18, 2019

Eric Tiefenthaler
Chief of Emergency Management
City of North Port
4980 City Center Blvd
North Port, FL 34286

Dear Eric,

Congratulations on the successful *StormReady* application for North Port. The recognition is valid until July 8, 2023 at which time the City will have the opportunity to renew. North Port has been recognized as StormReady since 2014. Your efforts, and those of your team, will better prepare North Port to protect life and property from the onslaught of hazardous weather through better planning, education, and awareness. No community is storm proof, but *StormReady* can help save lives.

Sincerely,



Daniel Noah
Warning Coordination Meteorologist
National Weather Service – Tampa Bay Area
(813) 645-2323

Cc: *StormReady* Advisory Board



The West Central and Southwest Florida Storm Ready
Advisory Board has Recognized

North Port

as a

STORM READY COMMUNITY

until July 8, 2023



Daniel Noah

Daniel Noah, Warning Coordination Meteorologist
National Weather Service, Ruskin, FL



City of North Port

RESOLUTION NO. 2019-R-06

A RESOLUTION OF THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA, ADOPTING THE SARASOTA COUNTY PROGRAM FOR PUBLIC INFORMATION; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING AN EFFECTIVE DATE.

WHEREAS, the City of North Port, Florida, is a participant in the National Flood Insurance Program Community Rating System ("CRS"), a national program developed by the Federal Emergency Management Agency ("FEMA") to provide flood insurance premium reductions to participating communities; and

WHEREAS, the reductions in flood insurance premiums are based on a community's floodplain management programs, which include public information outreach activities; and

WHEREAS, in accordance with the 2018 CRS audit results, the City of North Port received a CRS rating of 6, which corresponds to a twenty percent (20%) flood insurance discount for structures within the Special Flood Hazard Area ("SFHA") and a ten percent (10%) flood insurance discount for structures outside of the SFHA; and

WHEREAS, Sarasota County initiated the Program for Public Information ("PPI"), a FEMA planning tool, to coordinate such outreach; and

WHEREAS, Sarasota County's PPI has a number of ongoing outreach efforts with goals to increase flood hazard awareness, encourage flood insurance coverage, protect people from the flood hazard, protect property, build responsibly, protect the natural functions of floodplains, encourage hurricane preparations, educate people about flood economics and inform people about how sea level rise will affect the community; and

WHEREAS, the Sarasota County Program for Public Information ("PPI") Committee is comprised of a cross-section of employees and community stakeholder members from Sarasota County Government, the City of Sarasota, the City of Venice, the City of North Port, the Town of Longboat Key, the Sarasota Bay Estuary Program, Mote Marine, and local business representatives such as Realtors, Insurance Agents, and Mortgage Lenders, is open for participation by all interested parties including private citizens, and is chaired by the Sarasota County Stormwater Department Director or designee; and

WHEREAS, by adopting Sarasota County's PPI, the City of North Port may achieve a CRS rating of 5, which will increase the City's flood insurance discount for structures within the SFHA to twenty-five percent (25%); and

WHEREAS, the City Commission of the City of North Port, Florida finds that it serves the public health, safety, and welfare of the citizens of the City to adopt Sarasota County's Program for Public Information.

NOW, THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA:

SECTION 1 – INCORPORATION OF RECITALS

1.01 The above recitals are hereby ratified and confirmed as being true and correct and are incorporated herein by reference.

SECTION 2 – RESOLUTION

2.01 The City Commission hereby adopts the Sarasota County Program for Public Information.

2.02 The City Commission directs the City Manager to assign a coordinator on the Sarasota County Program for Public Information Committee.

SECTION 3 – CONFLICTS

3.01 In the event of any conflict between the provisions of this resolution and any other resolution or portions thereof, the provisions of this resolution shall prevail to the extent of such conflict.

SECTION 4 – SEVERABILITY

4.01 If any section, subsection, sentence, clause, or phrase of this resolution is held invalid or unconstitutional by any court of competent jurisdiction, such provision shall be deemed a separate, distinct, and independent provision and such holding shall not affect the validity of the remaining portions hereof.

SECTION 5 – EFFECTIVE DATE

5.01 This resolution shall take effect immediately upon adoption by the City Commission of the City of North Port, Florida.

PASSED and DULY ADOPTED by the City Commission of the City of North Port, Florida this 23rd day of July 2019.

THE CITY OF NORTH PORT, FLORIDA




CHRISTOPHER HANKS
MAYOR

ATTEST

for 
KATHRYN WONG
CITY CLERK

APPROVED AS TO FORM AND CORRECTNESS



AMBER L. SLAYTON
CITY ATTORNEY



**City of North Port
City Manager's Office**

Interoffice Memorandum

To: Cari Branco, Assistant City Manager
Jason Yarborough, Assistant City Manager
Julie Bellia, Public Works Director
Kimberly Ferrell, Finance Director
Todd Garrison, Police Chief
Christine McDade, Human Resources Director
Frank Miles, Neighborhood Development Services Director
Rick Newkirk, Utilities Director
Sandy Pfundheller, Parks & Recreation Director
Scott Titus, Fire Chief
Katy Wong, City Clerk
Amber Slayton, City Attorney

From: Peter D. Lear, City Manager 

Date: July 26, 2019

RE: Sarasota County Program for Public Information

Pursuant to Resolution 2019-R-06, the City will be participating in the Sarasota County Program for Public Information (PPI) and I am designating Elizabeth Wong to be the City's Coordinator on the PPI Committee.

PDL/amd



Elizabeth Wong

From: Elizabeth Wong
Sent: Thursday, October 4, 2018 4:28 PM
To: Donna Bailey
Cc: Dean McConville (dean.mcconville.p6je@statefarm.com); Mary Foster (mary.foster.hzp4@statefarm.com); Barbara Lockhart (bml3220@gmail.com); Alan Fish (landsurveyor@vbfainc.com); Heather Hansen - Clatsop County (hhansen@co.clatsop.or.us); Craig Carpenter - CRS Specialist (BCarpenter@iso.com); Gerardo Traverso; Julie Bellia
Subject: City of North Port Joining the County's PPI program for CRS Program

Hello Donna, thank you so much for letting us join your Sarasota County Program for Public Information (PPI) program to share information with the public on flood protection. Following are the North Port Team staff and stakeholder members to add to your PPI plan. Can you please send our team (cc'd on this email) a copy of your PPI plan when finalized?

Craig, I am copying you so you know we are on track hopefully towards the better rating of CRS 5.

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A City where you can "Achieve Anything."

The City of North Port, Florida

Comprehensive Emergency Management Plan

***A STRATEGIC GUIDE FOR A CITYWIDE PREVENTION OF,
PREPARATION FOR, RESPONSE TO, AND RECOVERY
FROM MAJOR EMERGENCIES AND DISASTERS***

***Revised
2019***

Prepared By:

***City of North Port Fire Rescue
Division of Emergency Management***

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i. DISTRIBUTION

- 1 each North Port City Commissioners
- 3 North Port City Manager
- 1 North Port City Attorney
- 2 North Port City Clerk
- 1 North Port Emergency Manager
- 1 each North Port City Department Directors
- 1 North Port Public Library
- 2 Sarasota County Emergency Management
- 1 Florida Division of Emergency Management

iii. EXECUTIVE SUMMARY

The City of North Port is vulnerable to a variety of natural, man-made and technological hazards that can potentially threaten the citizens, businesses, and environment. The *City of North Port Comprehensive Emergency Management Plan* (CEMP) establishes the framework to ensure that the City will be adequately prepared to deal with these hazards. The CEMP outlines the general roles and responsibilities of City departments when preparing for, responding to, or recovering from a large-scale emergency or disaster. The CEMP also coordinates emergency and disaster activities with volunteer organizations and businesses that serve the City of North Port. To ensure consistency between the City's CEMP and Sarasota County's CEMP (as well as State guidelines), much of the language contained in this Plan is drawn from the County's Plan, which is then adapted to meet the City's specific needs.

The CEMP addresses all four phases of emergency management: mitigation, preparedness, response, and recovery. These phases parallel activities set forth in three key documents: the Sarasota County CEMP, State of Florida CEMP and the National Response Framework (NRF). The City of North Port CEMP also describes how resources from local, State, Federal, national and other sources will be coordinated to supplement City resources for disaster response.

The CEMP is divided into three sections: The Base Plan, Hazard-Specific Annexes, and Appendices. The following is a brief description of the CEMP.

1. The Base Plan - The Base Plan describes, in general terms, how the City of North Port will mitigate, prepare for, respond to, and recover from the impacts of a large-scale emergency or disaster. The Base Plan contains sections that address specific operations and planning areas such as: an analysis of the hazards which the City may encounter, the responsibilities of the City government, method of operations, and financial policies that will be adhered to during times of emergency or disaster.
2. The Hazard Specific Annexes - The CEMP contains annexes that are specific to hazards that require special action.
3. The Appendices - These are sample documents, guidelines, or procedures which support the CEMP.

BASE PLAN

I. INTRODUCTION

A. Purpose. The CEMP establishes a framework for an effective system of comprehensive emergency management for:

1. Reducing loss of life, injury and property damage and loss resulting from natural or man-made emergencies;
2. Preparing for prompt and efficient response and recovery activities to protect lives and property impacted by emergencies;
3. Responding to emergencies with the effective use of all relevant plans and resources deemed appropriate;
4. Recovering from emergencies by providing for the rapid and orderly implementation of restoration and rehabilitation programs for persons and properties affected by emergencies; and
5. Assisting in awareness, recognition, education, prevention and mitigation of emergencies that may be caused or aggravated by inadequate planning for, and regulation of, public and private facilities and land use.

B. Scope.

1. The CEMP establishes the basic policies, assumptions and strategies for a comprehensive all-hazards Citywide emergency management program.
2. The CEMP is Citywide in scope and encompasses coordination with its municipal jurisdictions and other special.
3. The CEMP provides an all-hazard organizational structure to emergency operations.
4. The CEMP establishes basic direction and control for all levels of disasters creating a consistent unified approach to emergency management.
5. The CEMP is functional in a multi-jurisdictional setting where cross coordination is required.
6. The CEMP assigns specific functional responsibilities to appropriate local departments and agencies, as well as private sector groups and volunteer

organizations, and defines means of prioritizing and coordinating with municipal, state, and federal partners to maximize resource utilization.

7. The CEMP prioritizes protection of human life as a priority, with the preservation and protection of property being the second priority.
8. The CEMP provides a format for the shift of focus of the EOC from Response to Recovery and Mitigation. Long-range recovery and mitigation is addressed by the ability of the EOC to continue operations in a modified form, after the response phase has been terminated.
9. The CEMP establishes an effective format for emergency management by identifying the types of hazards that can occur within the City; determining the City's vulnerability to diverse types of disasters, and identifying the most threatening so that appropriate preparedness, mitigation and planning steps can be taken and addressing each phase of the emergency management cycle:
 - a. **Preparedness:** Preparedness actions utilize lessons learned and best practices from previous disasters, locally and elsewhere, to determine what is likely to occur during types of and intensity of disasters. Typical community needs can be identified and prioritized. Adequate planning pre-determines the best utilization of resources in responding to needs. Identification and training of personnel for roles and responsibilities during the disaster is included in this phase. It involves working with the private sector, residents and volunteer organizations to assist them in pre-disaster education and planning activities to lessen the impact of disasters.
 - b. **Response:** The response phase is the operational implementation of the CEMP. The county responds to emergencies by activating its plan, incrementally increasing response as needed, giving direction and control to the emergency management effort and looking ahead to recovery. Response actions are conducted in accordance with the National Incident Management System. During response, decision-making will be implemented utilizing the City's emergency response organizational structure found in the Method of Operations in this Plan.
 - c. **Recovery:** The recovery phase begins after life safety and property preservation have been addressed. Recovery actions can occur simultaneously during the response phase. The emergency management organization initiates procedures to assess needs and resources, establish priorities, review state and federal aid criteria

and coordinate with representatives from both levels of government. Once the extent of the recovery effort is determined, the appointed recovery team members determine how best to manage the specific activities, what resources and personnel will be required and what other actions are needed to return the impacted areas to normal operations as quickly as possible. Assessment of both short and long-term mitigation measures takes place during this phase and the “after action” evaluation process is conducted.

- d. **Mitigation:** This phase involves identifying preventative and/or corrective measures and actions to prevent or limit bodily injury, loss of life or property damage from disasters. It includes policy issues as well as structural projects within government and the private sector. A separate Local Mitigation Strategy serves as the guidance document for both pre-disaster mitigation planning and post-disaster recovery.

C. Methodology.

1. Planning Process

The CEMP is a dynamic document that adapts to changes in local policies, state and federal guidance, and after-action recommendations from exercises and real-world incident. The City of North Port considers the CEMP to be a living document and as such the plan is to be regularly updated to reflect these changes and to ensure compliance with the State of Florida and the National Incident Management System. ~~The City Manager shall determine whether changes to the plan reach a level of significance to require Commission review and approval.~~ The CEMP will be presented to the City Commissioners for approval at every update cycle required by the Florida Division of Emergency Management which are typically every four years.- Local ordinances, state and federal statutes, regulations and priorities provide the foundation for the CEMP. Development is further guided by best practices and lessons learned.

2. Implementation Process:

Implementation of the CEMP involves the following actions:

- a. A promulgation letter from the ~~Mayor of the~~ North Port City Commission displayed at the front of this document.

- b. Signed Concurrence acknowledging and accepting plan responsibilities displayed at the front of this document.
- c. A distribution list of the Comprehensive Emergency Management Plan is displayed at the front of this document.
- d. The Emergency Manager is responsible for ensuring that all changes have been distributed to recipients of the CEMP. The distribution list displayed at the front of this document is used to verify that all appropriate persons/offices are copied.
- e. A Record of Changes Log displayed at the front of this document is used to record all published changes as those holding copies of the CEMP receive them. The holder of the copy is responsible for making the appropriate changes and updating the Log.
- f. A master copy of the CEMP, with a master Record of Changes Log, is maintained in Emergency Management. A comparison of the master copy with any other will allow a determination to be made as to whether the copy in question has been posted to it with all appropriate changes.

II. SITUATION

A. Hazard Analysis

The City of North Port has exposure to numerous and diverse types of hazards. This Section will attempt to identify the threat posed by each to assist planners in anticipating future needs. The hazards are listed in the sequence identified by the Florida Division of Emergency Management (FDEM) CEMP Review Criteria.

Table 1: Hazard Analysis

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
High Winds from Tropical Cyclone Events	<p>The City of North Port has only been indirectly affected by a tropical cyclone event. However, The City of North Port (Port Charlotte statistical area) has been exposed to 54 hurricanes/tropical storms since 1871¹.</p> <p>The hurricanes of the 2004 and 2005 seasons had some minimal to moderate impact on the City. The City was included in the Presidential Declarations for Hurricanes Charley, Frances, Ivan, Jeanne (2004) and Wilma (2005); and Tropical Storm Gabrielle (2001). In 2008, the City activated for TS Fay, but quickly demobilized when the storm turned in a southerly direction missing the City. A comparable situation occurred in 2012 with Tropical Storm Isaac.</p>	<p>Injured and/or entrapped persons and the loss of life. Mass traffic congestion and other evacuation-related issues. Temporary and long-term sheltering needs. Private property loss. Damage to City infrastructure. Lost business revenue, with accompanying unemployment and loss of tax revenue. Fire, hazardous materials releases, search and rescue operations related to storm activity. Looting and increased crime due to economic conditions created by long-term recovery. Potential loss of water and/or sewer service.</p>	<p>A Gulf Coast landfall is one of the three most likely Florida hurricane tracks based on planning models. Among the hazards analyzed in this section, hurricane activities pose the greatest threat to the broadest population in North Port.</p>	Frequency	Low to Moderate
				Vulnerability	Low to Moderate
				Exposure	Moderate
				Risk	Moderate

¹ <http://www.hurricanecity.com/city/portcharlotte.htm>.

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	In September 2017, the City experienced minor disruptions because of Hurricane Irma. Power outages, localized flooding and vegetative debris were among the key impacts.				
Storm Surge from Tropical Cyclone Events (See Figure 1 Hurricane Evacuation Level, which are built from SLOSH models)	The City of North Port has never been affected by storm surge from a tropical cyclone; however, areas adjacent to the tributaries of the Myakka River are subject to tidal influences, which themselves are affected by storm surge.	Injured and/or entrapped persons and the loss of life. Mass traffic congestion and other evacuation-related issues. Temporary and long-term sheltering needs. Private property loss. Damage to City infrastructure. Lost business revenue, with accompanying unemployment and loss of tax revenue. Fire, hazardous materials releases, search and rescue operations related to storm activity. Looting and increased crime due to economic conditions created by long-term recovery. Potential loss of water and/or sewer service.	<p>Since the updated storm surge maps in 2017, all North Port is still in at least one storm surge zone. Areas west of I-75 are most susceptible; and the risk of storm zone increases in proximity to the Myakka River, and to the Gulf of Mexico.</p> <p>The Holiday Park Mobile Home community is in Evacuation Level B.</p> <p>Several City-owned critical infrastructures are also located in the storm surge areas:</p> <p><u>B Zone</u> - Utilities' Water Treatment Plant, Utilities' Wastewater Treatment Plant, Fire Station 82 and Police Department's District 2 substation, Family Service Center, Property Maintenance Yard (fueling station)</p> <p><u>C Zone</u> - Utilities' Hillsborough and Southwest water booster stations.</p> <p><u>D Zone</u> - Municipal Complex (City Hall, Fire Station 81, Police Department and Mullen's Center), Fire Stations 83, 84 and 85, Utilities' central office, Utilities' Northeast water booster station, Public Works Complex (fueling station)</p>	Frequency	Low to Moderate
				Vulnerability	Low to High
				Exposure	Moderate
				Risk	Moderate
Floods (See Figure 2)	At least 750 residences were affected for more than a week in the City due to continued major flooding on the Myakka River and Myakkahatchee Creek from the Spring Flooding Event of 2003.	Possible evacuation of residents. Temporary sheltering and congregate feeding. Evacuation traffic and traffic related to road closures. Property and infrastructure damage. Loss of business revenue. Possible search and rescue operations. Possible shutdown of water treatment facilities. Possible contamination of water systems. Possible waste water system overload.	Seasonal flooding is a re-occurring issue in Florida, most specifically for those areas which are near the Florida coast, adjacent to bays or inlets, or which contain river systems. Per the risk analysis of the Sarasota County Emergency Management, increased development causes an increase in flooding risk due to the interruption of the natural swamp	Frequency	Moderate to High
				Vulnerability	Low to High
				Exposure	Moderate
				Risk	Moderate

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
			<p>and marsh systems ability to mitigate the excess water. The City of North Port fits all the criteria of a flood prone area.</p> <p>The Community Rating System (CRS) is a set of flood mitigation initiatives set forth by the National Flood Insurance Program (NFIP), which allows participating communities to participate in and initiate programs which reduce the flood hazard in the community. For each initiative, there are points that can be awarded, which equate to a Class when enough points are gained by the community. The City of North Port is an active member of the Community Rating System under the National Flood Insurance Program. At this writing, the City of North Port stands at a Class 6 in the Community Rating System under the National Flood Insurance Program. This equates to a 15% saving on flood insurance for policy holders in the Special Flood Hazard Area (SFHA) in both the City and the County.</p>		
Hazardous Material Spills	<p>On February 2, 2004, a gasoline tanker traveling on I-75 exploded over the Myakkahatchee Creek bridge. An unknown amount of gasoline and diesel fuel entered the creek but was contained prior to reaching the main drinking water intake at the Water Treatment Plant.</p> <p>Two nearly identical gasoline tanker accidents occurred in 2016 on I75. Contamination was limited to the local area, however a threat to the City's drinking supply resulted in closure of the Water Treatment Plant and purchase of water from the Peace River system.</p>	<p>Area evacuation and related traffic issues. The possibility of significant numbers of people being injured or becoming ill due to the hazardous materials release. Temporary sheltering of evacuated residents. Adequate equipment and trained personnel for hazardous materials containment and disposal. Adequate disposal facilities. Possible contamination of surface water, and source water for the water treatment plant.</p>	<p>There are few end users of large amounts of industrial or agricultural chemicals and other hazardous materials in North Port. The only fixed facilities using Extremely Hazardous Substances (EHS), as defined by the US Environmental Protection Agency (EPA), are owned and operated by the City of North Port Utilities Department. Other fixed facilities subject to federal reporting have been identified and maintained in Fire Rescue's records' management system. Significant amounts of a wide variety of hazardous materials are transported on I-75. It is considered the leading risk area for hazardous materials incidents in the County. Significant amounts of hazardous materials transit through North Port on US 41.</p> <p>The Sarasota County Fire Department is first responding to hazardous materials incidents in the City of North Port.</p>	Frequency	Low
				Vulnerability	Moderate
				Exposure	Moderate
				Risk	Moderate
Commercial Nuclear Power Plant Incidents	<p>North Port is not within the Emergency Planning Zone or Ingestion Pathway Zone of a</p>	<p>North Port may receive a request to assist in furnishing mutual aid under provisions of the Florida Statewide Mutual Aid Agreement. Should an incident be of such magnitude as to require the evacuation of Tampa Bay,</p>	<p>Evacuees from a mishap at Florida Power Corporation nuclear generating facility at Crystal River, might arrive in Sarasota County seeking shelter.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	nuclear generating facility, thus is not considered at risk.	traffic control could be an issue.		Risk Low	
Civil Disturbance	The City of North Port has no history of civil disturbance.	The vulnerability of businesses on US 41 to looting. The possibility that North Port might be requested to furnish mutual aid.	The City does not face some of the challenges present in other Florida communities where conflict exists between cultural groups. Similarly, Sarasota County has had no recent incident of civil disorder of any significance.	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Mass Immigration	<p>There is no evidence that concerns caused by mass immigration has impacted the City of North Port. However, recent events along the Southwest coast of Florida indicate the potential for an event.</p> <p>In July 2007, 30 refugees from Cuba landed on Little Gasparilla Island; June 2007, 33 migrants from Cuba arrived on Sanibel Island; and in December 2006, 25 Cuban refugees landed on Longboat Key.</p>	<p>The City of North Port does not have a coastline for landings. However, if the refugees boated up the Myakka River or Myakkahatchee Creek, the City would be directly impacted.</p> <p>Otherwise, the City may provide mutual aid support to Charlotte and/or Sarasota counties for medical and/or law enforcement assistance.</p>	<p>While mass immigration to Florida from the Caribbean, Central America and South America has increased dramatically since 1980, the City is too far north and inland to directly receive arriving "boat people," and is not a likely settlement site.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Coastal Oil Spill	<p>The City of North Port does not include any portion of the Gulf of Mexico's coast. However, given the tidal influence on the Myakka River, if a spill were to occur in the Gulf, there exists a potential for product to flow up the Myakka River towards the City.</p> <p>The City of North Port was not impacted by the Deepwater Horizon oil spill in 2010 which affected numerous interests to the north of Sarasota County in the Gulf of Mexico.</p>	<p>Economic impact due to temporary loss of recreational activities in Charlotte Harbor. Furnishing mutual aid support to communities on Charlotte Harbor.</p> <p>Regarding proposed drilling off the Gulf coast of Florida, the US Department of the Interior's Minerals Management Service (MMS) states "[f]or the foreseeable future any proposed development operations within 100 miles of the coast of Florida would be only for the development of natural gas fields. Even if a blowout were to occur, no oil would be released. Any pipelines proposed would carry only dry natural gas." They do indicate one potential for a worse case situation would be if the supply vessel carrying diesel oil to the drilling rig lost all its diesel during transfer operations - this could result in a spill of about 1,800 bbl. The MMS can and has required mitigation</p>	<p>Traffic exists along Florida's Gulf Coast which could allow for a mishap to occur. The hazardous materials release could enter parts of Charlotte Harbor, but it is more likely that existing currents would move the release past the Harbor. A hazardous materials release in the Gulf would be responded to by Federal and State authorities. Public Works may receive mutual aid requests or be involved in environmental damage response to properties located on the Charlotte Harbor shoreline, City of Venice or unincorporated Sarasota and/or Charlotte counties.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
		during past drilling operations to minimize this remote possibility.			
Extreme Temperatures	<p>Freeze conditions in Florida are seasonal and relatively predictable.</p> <p>Florida Severe Freeze 2000 for which Sarasota County was included in the declared counties.</p> <p>The last significant winter storm to occur in Sarasota County was the “no name” storm in March 1993.</p>	<p>Temporary sheltering of lower income persons whose homes may lack adequate heating capability. Increased utility costs to the City of North Port in maintaining City facilities with adequate heating for workers and the public.</p> <p>In 2012, a coalition of services for the homeless began to establish freezing weather shelters at local churches. These facilities open when the National Weather Service posts a freeze watch for our area.</p>	<p>There are few agriculture interests within the City which might suffer economic loss. Some temporary shortages of utility resources might take place. Potable water lines have frozen in past years causing a water service disruption to some houses.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Brush, Wildfires and Forest Fires	<p>Brush or forest fires are generally seasonable during late winter to spring and predictable based on weather conditions.</p> <p>Sarasota County was included in the declared counties for the Florida Extreme Fire Hazard in 1998.</p> <p>The largest wildfire in the City was experienced in May 2017 during which more than 1000 acres with the City’s boundaries were burned and an additional 4000 acres just outside the City limits.</p>	<p>Wildland-Urban interface fuel loading is high, as compared to normal. Area evacuation and traffic control. Temporary sheltering of evacuees. Mutual aid support to other impacted communities, or requests for assistance to North Port.</p> <p>See Tables 3 and 4 Seasonal KBDI Values for Florida Forest Service’s South Region and Sarasota County as a measure that conditions are favorable for the occurrence and spread of wildfires.</p>	<p>As the population density increases, the probability factor will decrease, but the impact factor will increase. The scattered development within the City, and the lack of land clearance, creates an environment in which many residences are grouped in relatively isolated areas surrounded by forested land. There is a history of arsonist activity in South Sarasota County. The possibility of an accidental fire caused by construction equipment, or controlled burning by contracts is a possibility.</p> <p>The City of North Port Fire Rescue participates in the Firewise program to mitigate the effects of wildfires. Four communities Harbor Isles, La Casa, Riverwalk Mobile Home Village, and Woodland Estates have met the requirements of the program.</p>	Frequency	Moderate to High
				Vulnerability	Moderate to High
				Exposure	Moderate to High
				Risk	Moderate to High
Thunder Storms and Tornadoes	<p>Heavy rains, winds and storm action are common in Florida.</p> <p>On May 24, 2012, an EF-0 tornado affected residences in the Highland Ridge Community of North Port. No injuries were</p>	<p>Possible area evacuation. Road blockage from debris. Temporary sheltering of small numbers of persons whose residences became significantly damaged by the storm or winds. The possible loss of water and/or sewer service.</p>	<p>North Port is not located in an area with a high incident of tornado activity. Tornadoes are common occurrences with thunderstorms. Florida has the second highest record of tornadoes in the United States.</p>	Frequency	Low
				Vulnerability	Low to Moderate
				Exposure	Moderate

Hazard Category	Hazard Evaluation			
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)
	<p>reported, but an estimated \$50,000 in damages was recorded.</p> <p>In January 2015, a Myakka State Forest Ranger reported tornado damage to a ranger station and a mobile home trailer at around 3:50 a.m. A subsequent NWS storm survey classified the tornado as an EF-0.</p>		<p>Given the number of mobile homes in the City and adjoining areas, there exists significant exposure should a tornado move through the region.</p>	<p>Risk</p> <p>Low to Moderate</p>
Drought	<p>Droughts are occurring with frequency in Southwest Florida.</p> <p>The Keetch-Byram drought index typically indicates a severe value during the spring season.</p> <p>The US Drought Monitor indicates the State ranges from Abnormally to Exceptionally Dry, with Sarasota County on the upper scale of drought conditions.</p>	<p>Necessary slow-down in planned city projects due to water restrictions. Assistance to residents on well-water supply systems. Increased responses to wildfire events. Potential damage to residential and commercial structures, and City infrastructure.</p>	<p>Droughts generally impact the most on agricultural-based communities. Water restrictions and enforcement might be required. Droughts have an impact on wildfires.</p> <p>The Florida Forest Service has analyzed weather data over a 35-year period was examined to determine average Keetch-Byram drought index (KBDI) values for each region of Florida on a seasonal basis. These average KBDI values are given in the following table as the "NORMAL" classification. Departures from this average value were related to fire activity to determine the breakpoints for the other classes. (See tables 2 and 3).</p>	<p>Frequency</p> <p>Moderate to High</p>
				<p>Vulnerability</p> <p>Moderate to High</p>
				<p>Exposure</p> <p>Moderate to High</p>
				<p>Risk</p> <p>Moderate to High</p>
Sinkholes and Subsidence	<p>Sinkholes of a significant magnitude are an infrequent occurrence.</p> <p>Since July of 1981, Sarasota County and the jurisdictions within have recorded seven sinkhole events, all less than ten feet in diameter, and each was centered on a specific property. Of the seven Subsidence Incident Reports in Sarasota County, only one occurred in the last seven years. Reported on July 7, 2013 several small holes were reported after heavy rainfall. The</p>	<p>Property loss. Damage to the infrastructure. Area evacuation, closure, traffic control and security.</p>	<p>Allowing for the vastness of the City limits, the probability of a sinkhole development threatening property is very significant. Sinkhole development could require area security to prevent members of the public from risk.</p>	<p>Frequency</p> <p>Low</p>
				<p>Vulnerability</p> <p>Low to Moderate</p>
				<p>Exposure</p> <p>Low</p>
				<p>Risk</p> <p>Low</p>

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	maximum dimensions were 2-8' wide with no property damage.				
Terrorism	There is no specific reason to believe that a terrorist type of occurrence is anticipated.	Potential mass casualties. Public panic. Environmental concerns.	One tactic of terrorists is to target "innocent" person rather than a specific group for which hostility exists. The news media would inundate the City should it be the focal point of an incident. The City does not possess targets of interest to an international terrorist; however, an individual with a hatred of local government, or a disgruntled employee may pose a greater risk to the security of City facilities, staff and visitors.	Frequency	Low
				Vulnerability	Moderate to High
				Exposure	Low
				Risk	Low
Exotic Pests and Diseases	The City of North Port has not had any known reports of such diseases or pests, but the threat exists on a consistent basis.	Infectious disease control. Quarantine for livestock or people. Need for many treatment agents. Disposal of deceased animals.	Exotic threats and diseases are a pervasive threat to the agricultural interests in the City. This biological hazard is associated with any insect, animal, or pathogen that could pose an economic or health threat. The Mediterranean fruit fly and citrus canker are two examples of this threat. There is also a possibility for the importation of pathogens that could have a negative effect on the livestock industry.	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Disease and Pandemic Outbreaks	<p>The City of North Port has not had any known reports of such diseases or outbreaks, but the threat exists on a consistent basis.</p> <p>The City of North Port was not significantly impacted by the H1N1 Pandemic in 2009 or the Ebola event of 2014.</p>	Economic loss. Mass casualty/fatality. Infectious disease control. Disproportionate effects on elderly and children. Disposal of diseased livestock/agricultural stock. Need for mass feeding. Mass care. Quarantine of people and/or livestock. Large number of treatment agents	The City is vulnerable to epidemic on a constant basis. Although the threat is minimal, an epidemic is still possible. With tourists coming in from all over the world during the months of October through April, there is an increased vulnerability during this time. The environment is regularly monitored for diseases and pathogens by local and state agencies.	Frequency	Low
				Vulnerability	Moderate
				Exposure	Low
				Risk	Low
Critical Infrastructure Disruption	<p>Utility disruptions are an infrequent event, typically arising from a severe weather event, an accidental cutting through of a transmission line by a contractor or nesting bird.</p> <p>On January 12, 2015 components of an osprey nest contacted high voltage wires which started a fire at the top of an electrical pole on Greenwood Avenue between</p>	Evacuation. Sheltering. Mass feeding. Mass casualty. Large scale contamination. Contamination of water supply. Decontamination. Economic loss. Agricultural loss. Inability of public safety officials to communicate. Civil unrest. Inability to provide critical support functions at medical facilities.	This technological hazard is a consistent threat in the City. This hazard may become present through an accident, sabotage, or terrorism. This hazard includes, but is not limited to, utility disruptions and communications system failures. This hazard can cause other hazardous incidents to occur. These may include, but are not limited to, hazardous material spills, delay of medical operations, and loss of ability to provide power or communications, and loss of ability to provide utility services.	Frequency	Low
				Vulnerability	Moderate
				Exposure	Low
				Risk	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	Greenway Drive and S. Sumter Boulevard in North Port. The fire caused damage to the feeder lines resulting in a secondary emergency – that of a power outage impacting 3,510 FPL customers including traffic lights at several intersections and the City of North Port municipal complex. Telephone lines to Sarasota County 9-1-1 were overwhelmed and callers were unable to reach the North Port Police dispatch center.				
Special Events	The City of North Port has no history of dignitary visits, cultural events, or a significant impact from spring break.	Public safety resources overwhelmed. Potential for terrorism, mass casualty, civil unrest.	<p>With Special Events, the need for additional logistics and manpower to handle the possibility of large crowds increases significantly. The possibility for acts of terrorism or civil disobedience in these events also increase.</p> <p>The North Port High School’s Performing Arts Center is the second largest theater in Sarasota County. With 1,023 seats, it presents unique challenges during an emergency.</p> <p>The City-sponsored July 4th celebration attracts more than 5,000 attendees.</p> <p>A spring training complex for the Atlanta Braves will be situated in the West Villages-section of the City. The stadium will have 6,200 fixed seats and 2,200 berm seating along with suites.</p>	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low
Dam Failure	The Peace River Manasota Regional Water Supply Authority has constructed a 6-billion-gallon reservoir adjacent to their water treatment plant on US 17 in Desoto County. As this is a relatively new facility, there is no history of incidents; however,	Possible evacuation of residents. Temporary sheltering and congregate feeding. Evacuation traffic and traffic related to road closures. Property and infrastructure damage. Loss of business revenue. Possible search and rescue operations. Possible shutdown of water treatment facilities. Possible contamination of water systems. Possible waste water system overload.	Based on the construction of the retention walls and the distance from the reservoir, the effects on the City of North Port may be minimal.	Frequency	Low
				Vulnerability	Low
				Exposure	Low
				Risk	Low

Hazard Category	Hazard Evaluation				
	Frequency	Vulnerability	Exposure	Risk (Potential for Loss)	
	similar type reservoirs have experienced retention wall cracks, but no failures.				
Major Transportation Incidents	Motor vehicle accidents are a frequent occurrence on the roadways in North Port. However, most which are minor in nature, and have minimal impact on the City.	Traffic rerouting issues. Environmental impacts from release of hazardous materials.	In the City of North Port, I-75 extends from mile marker 171 (Charlotte County line) to 185 in an east to west direction. Exits are at mile marker 179 (Toledo Blade Blvd.), and mile marker 182 (Sumter Blvd.). This is a two-lane roadway in each direction, with a posted speed limit of 70 mph. US 41 extends from Cranberry Blvd. (Charlotte County line) to Ortiz Blvd. This is a two-lane roadway, with a posted speed limit of 45 mph. Significant amounts of a wide variety of hazardous materials are transported on I-75. It is considered the leading risk area for hazardous materials incidents in the County. Significant amounts of hazardous materials transit through North Port on US 41.	Frequency	Moderate
				Vulnerability	Moderate
				Exposure	Moderate
				Risk	Low to Moderate

Figure 2: Sarasota County Hurricane Evacuation Levels
(2017 Revision)

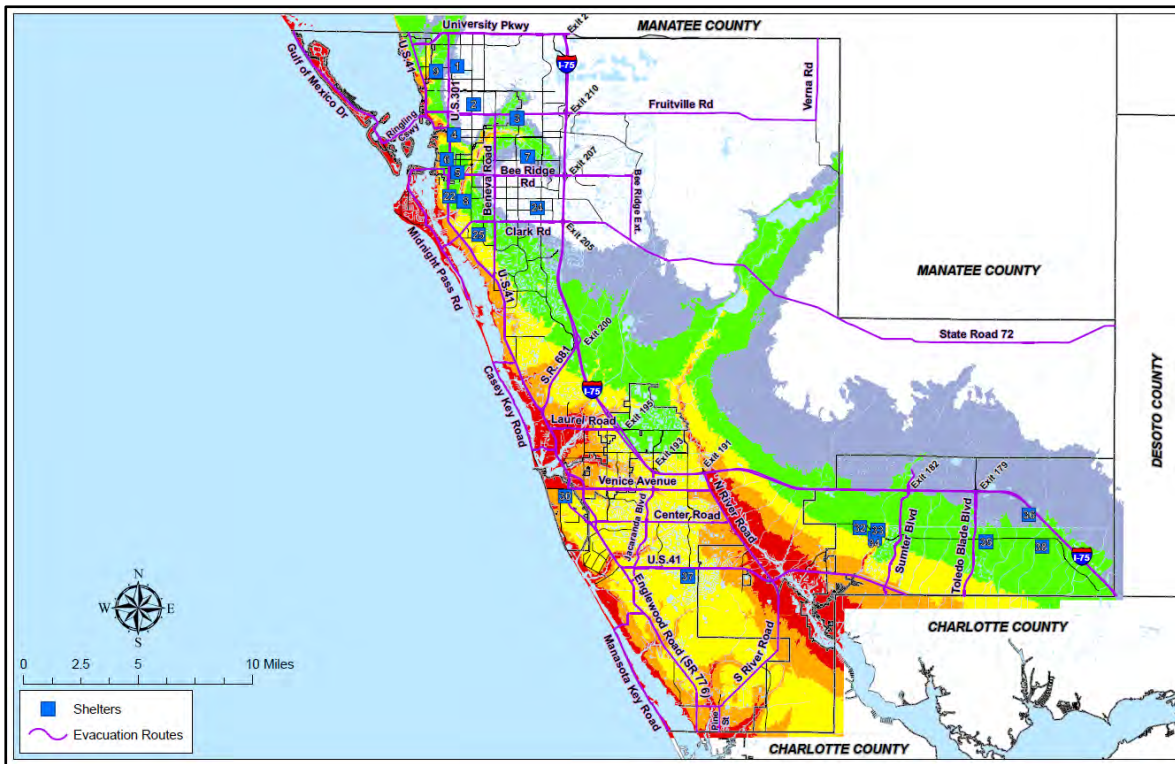


Table 3: Seasonal KBDI Values in the Southern Region of Florida²

	Winter	Spring	Summer	Fall
Very low	0-230	0-260	0-150	0-220
Low	231-300	261-340	151-200	221-270
Normal	301-490	341-550	201-350	271-420
Moderate	491-630	551-700	351-450	421-510
Severe	631-800	701-800	451-800	511-800

² Florida Forestry Service, <http://www.freshfromflorida.com/Divisions-Offices/Florida-Forest-Service/Wildland-Fire/Keetch-Byram-Drought-Index-KBDI/Regional-Seasonal-Drought-Classification>

**Table 4: Seasonal KBDI Values for Sarasota County³
Monthly Average from 2014 to 2017**

Year	Winter	Spring	Summer	Fall
2014				295
2015	454	537	339	413
2016	291	445	340	493
2017	375	453	179	411

[Note regarding Tables 5 and 6: The Keetch-Byram drought index (KBDI) is a continuous reference scale for estimating the dryness of the soil and duff layers. The index increases for each day without rain (the amount of increase depends on the daily high temperature) and decreases when it rains. The scale ranges from zero (no moisture deficit) to 800. The range of the index is determined if there is eight inches of moisture in a saturated soil that is readily available to the vegetation.

For different soil types, the depth of soil required to hold 8 inches of moisture varies (loam = 30", clay = 25" and sand = 80"). A prolonged drought (high KBDI) influences fire intensity largely because more fuel is available for combustion (i.e. fuels have a lower moisture content). In addition, the drying of organic material in the soil can lead to increased difficulty in fire suppression.

High values of the KBDI are an indication that conditions are favorable for the occurrence and spread of wildfires, but drought is not by itself a prerequisite for wildfires. Other weather factors, such as wind, temperature, relative humidity and atmospheric stability, play a significant role in determining the actual fire danger.⁴

North Port Fire Rescue references the KBDI when making operational decisions on staffing, resource availability, dispatch procedures, etc.

B. Geographic Information

1. Area in Square Miles. The City of North Port occupies 104 square miles of southeast Sarasota County midway between the cities of Sarasota and Fort Myers, east of the Gulf of Mexico.
2. Topography of the Land. Sarasota County consists of a lying coastal plain. The City of North Port is generally consistent with the County at large.
3. Land Use Patterns. The City of North Port is a predominant low density

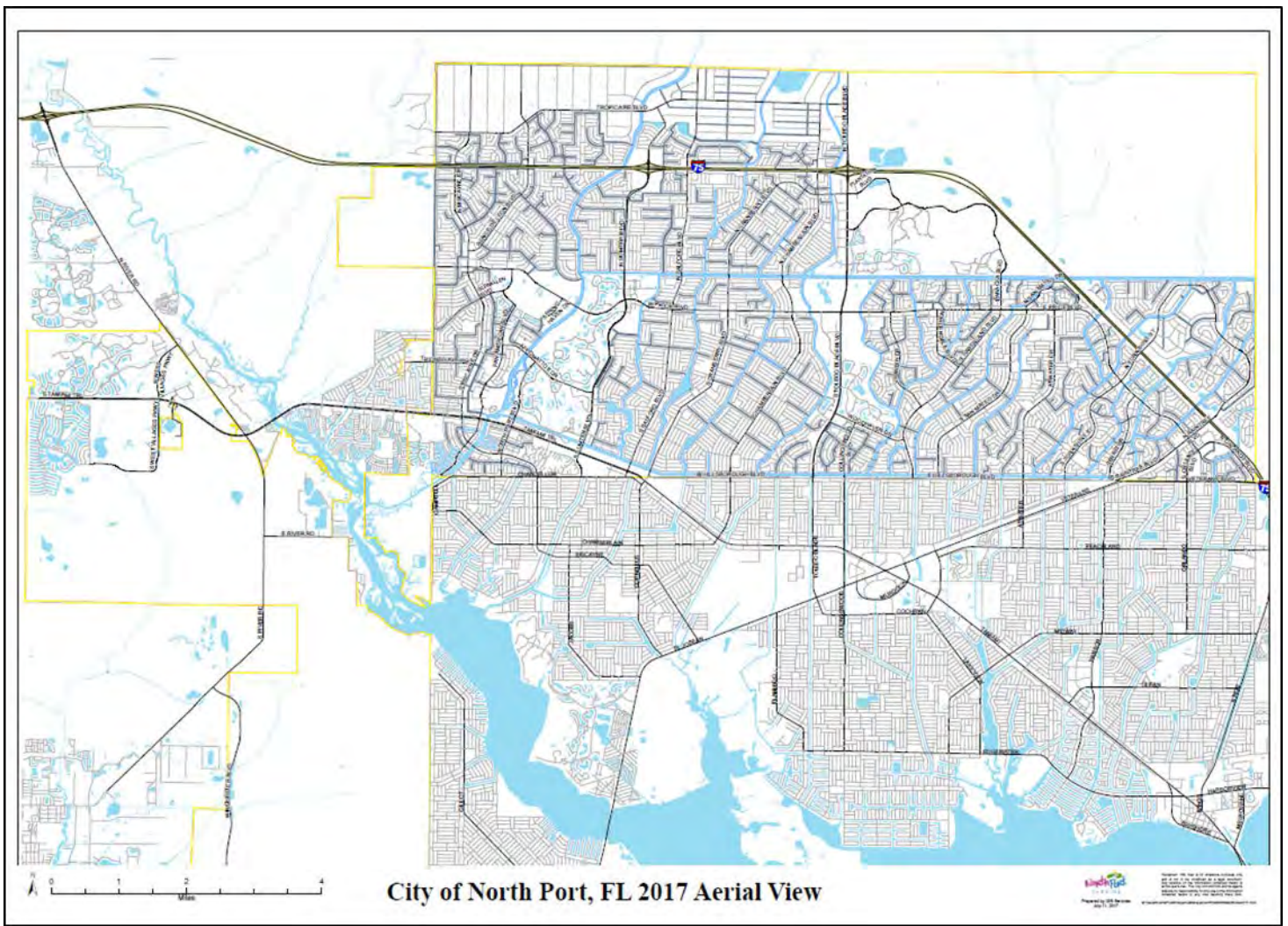
³ Florida Forestry Service. Pre-Fall 2014 data not available.

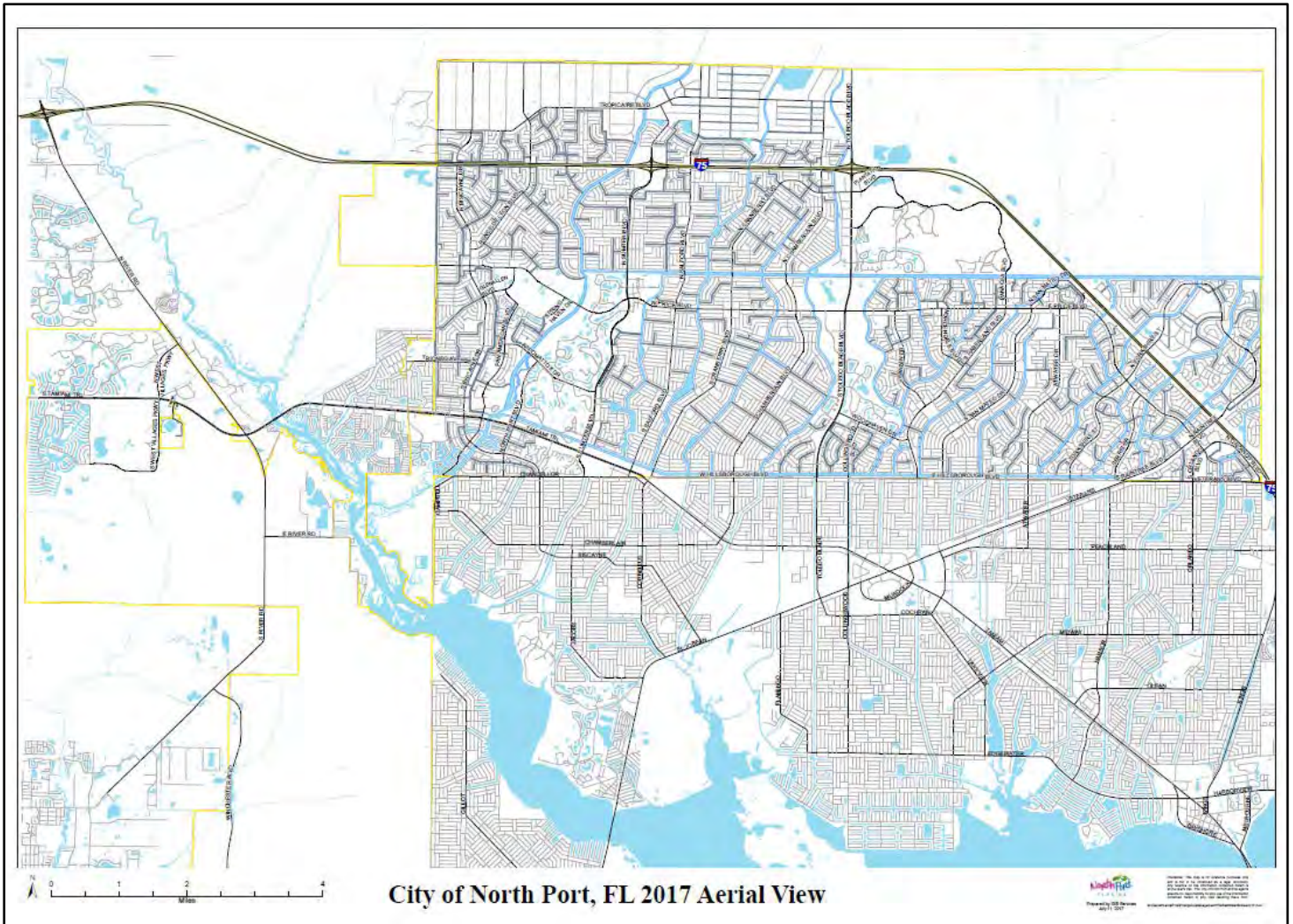
residential community. Medium and high-density development is planned, primarily for the southwestern portion of the City, north-central areas, and extreme eastern part of North Port. Agricultural/estates are planned for the areas north of the I-75 corridor. Commercial, industrial and professional developments are generally co-located along major roads.

Recreational/open space, public land and activity centers are generally adjacent to medium and high-density areas. Two portions of the City consist of approximately 10,000 acres of the Myakka River State Forest.

4. Water Area. Total area not available, see Figure 5 for map.

Figure 5: City of North Port Water Bodies





5. Drainage Patterns. Generally, drainage takes place into the Myakkahatchee Creek (Big Slough), Myakka River and toward the swamps and marshes located along Charlotte Harbor. A concern of emergency planners is the disruption of normal drainage caused by development and the reliance on controlled canal and lock systems.
6. Environmentally Sensitive Areas. All Federal and State lands are considered environmentally sensitive by the Florida Department of Environmental Protection, as are areas continuous with river systems, bays and harbors.
 - i. Little Salt Spring is an archaeological and paleontological site located at 6701 West Price Boulevard. On July 10, 1979, it was added to the U.S. National Register of Historic Places. The

Rosenstiel School's Division of Marine Affairs manages an underwater archeological and ecological preserve. Donated to the University in 1982, the spring is surrounded by undisturbed native hydric hammock containing several rare and endangered plant and animal species.

During early prehistoric times (12,000–7,000 years ago) the sinkhole was an oasis in the peninsula that attracted seasonal hunters and gatherers. The site has produced the second-oldest dated artifact ever found in the southeast United States — a sharpened wooden stake some 12,000 years old. Little Salt Spring contains some of the oldest cultural remains in the United States.

The unique anoxic water that fills most of the sinkhole (below 5 meters/16 feet depth) has preserved a great range of organic materials including wood, textile fragments, hair, skin and brain tissue dating back to the Late Paleoindian and Early Archaic stages of Florida's prehistory, ca. 9,500–7,000 radiocarbon years ago. Archaeological remains exist both in the spring basin and the "27 meters/90 feet ledge," a natural cavern at that depth below the spring surface.⁵

- ii. Immediately to the west of 6664 West Price Boulevard (roughly across the road from Little Salt Spring), exists a Native American burial ground for the Timucuan peoples dating back 12,000 to 40,000 years. The platted property is owned by the School Board of Sarasota County and Sarasota County government.
- iii. Warm Mineral Springs, 12200 San Servando Ave, is listed in the National Register of Historic Places, as one of the most important underwater archaeological sites in America. As for the buildings and cyclorama, these are recommended by the State of Florida that they are eligible to list on the State Register and may also be eligible for the National Register (but neither is completed as of this update). The City of North Port did add the entire Warm Mineral Springs property (water and buildings) to the City's historic register in 2017.

Warm Mineral Springs is considered a health spa, visited by thousands of people seeking the warm soothing mineral waters believed to be helpful in healing many ailments. Fifty years ago, William Royal, the first diver to ever venture below the surface,

⁵ <http://www.rsmas.miami.edu/groups/little-salt-spring>

discovered extinct animal bones, stalactite formations, and human remains. The archaeological world initially dismissed his findings as a farce because, according to fossil records, it was believed that man arrived in Florida no earlier than seven thousand years ago. For the last forty years, several archaeological projects have been conducted in and around Warm Mineral Springs resulting in many outstanding discoveries. The most astonishing was the discovery of a ten-thousand-year-old human skull still containing brain matter.

When the Indians arrived, Warm Mineral Springs was a giant pit surrounded by a huge forest. This giant pit dropped quickly from the surrounding forest vegetation. Water trickled down the walls and into the pit below. This is revealed today by the water channels sculpted into the walls at depths from 40 to 55 feet. At 32 feet, the walls undercut themselves making a natural shelter from the outside elements. These early Paleo Indians must have considered Warm Mineral Springs a sacred place because they buried their dead along the walls at 35 feet. Human remains and primitive tools dating from three to ten thousand years old have been excavated from the sink and the surrounding lands over the last forty years.

Geologically, Warm Mineral Springs is a solution hole descending into one of the deepest Florida aquifers. The water flowing from this spring is anaerobic (low in oxygen) and is believed to have been trapped underground for over thirty thousand years at depths exceeding 7000 feet. Under these great pressures, the water is geothermally heated to 97° degrees Fahrenheit and flows from several small caves located on the northern wall at depths from 195 to 210 feet. As the water rises towards the surface, it mixes with cooler water from colder vents. When it reaches the surface, the temperature drops to 85° degrees Fahrenheit. Eight million gallons of water a day flow down a natural run on the surface and eventually into the Gulf of Mexico.⁶

- iv. The Myakkahatchee Creek Environmental Park, located at 6968 Reisterstown Road, is a publicly-owned natural resource conservation and outdoor recreation area that includes approximately 160 acres. The park provides an Old Florida nature experience with winding rustic paths, footbridges, wooded trails, overlook, pavilion, primitive camping site (by permit only) and restroom. The park is owned by the City of North Port and is operated by Sarasota County through an interlocal agreement

⁶ <http://www.warmmineral.com/>

adopted in 1993. Activities at the park include birding, hiking, horseback riding, and biking. The park is also home to the Myakkahatchee Creek Connector Bridge which connects the park to Sarasota County's Carlton Reserve.⁷

- v. Myakka State Forest was purchased in 1995 as part of the Myakka Estuary Conservation and Recreation Lands project. The purchase was made using Preservation 2000 and Save Our Rivers funds.

The Florida Forest Service manages the forest for multiple uses, including timber, outdoor recreation, wildlife, and ecological and hydrological restoration. The Southwest Water Management District provided funding to purchase half of the state forest and is an important cooperater in the management of the property, especially regarding hydrological management.

Most the forest falls within the city limits of North Port. Access is available off River Road, about 11 miles south of I-75.

Myakka State Forest is made up primarily of mesic flatwoods with a mixture of longleaf pine and slash pine overstory with a palmetto understory. Numerous depression marshes are scattered throughout the flatwoods, providing many opportunities for viewing wading birds and other wildlife. The forest includes approximately 2.5 miles of frontage on the Myakka River, which is designated as an Outstanding Florida Water and a Wild and Scenic River. The Myakkahatchee Creek flows through the forest for 1.5 miles and provides an additional water resource.⁸

1. Flood-Prone Areas. Flood Prone Areas in Sarasota County are identified as those areas within the 100-year floodplain, and other areas subject to repetitive flooding along the rivers and creeks (Figure 5).

Figure 6: City of North Port FEMA Flood Zones

⁷ <http://www.cityofnorthport.com/government/city-services/parks-recreation/parks/myakkahatchee-creek-environmental-park>

⁸ <https://www.freshfromflorida.com/Divisions-Offices/Florida-Forest-Service/Our-Forests/State-Forests/Myakka-State-Forest>

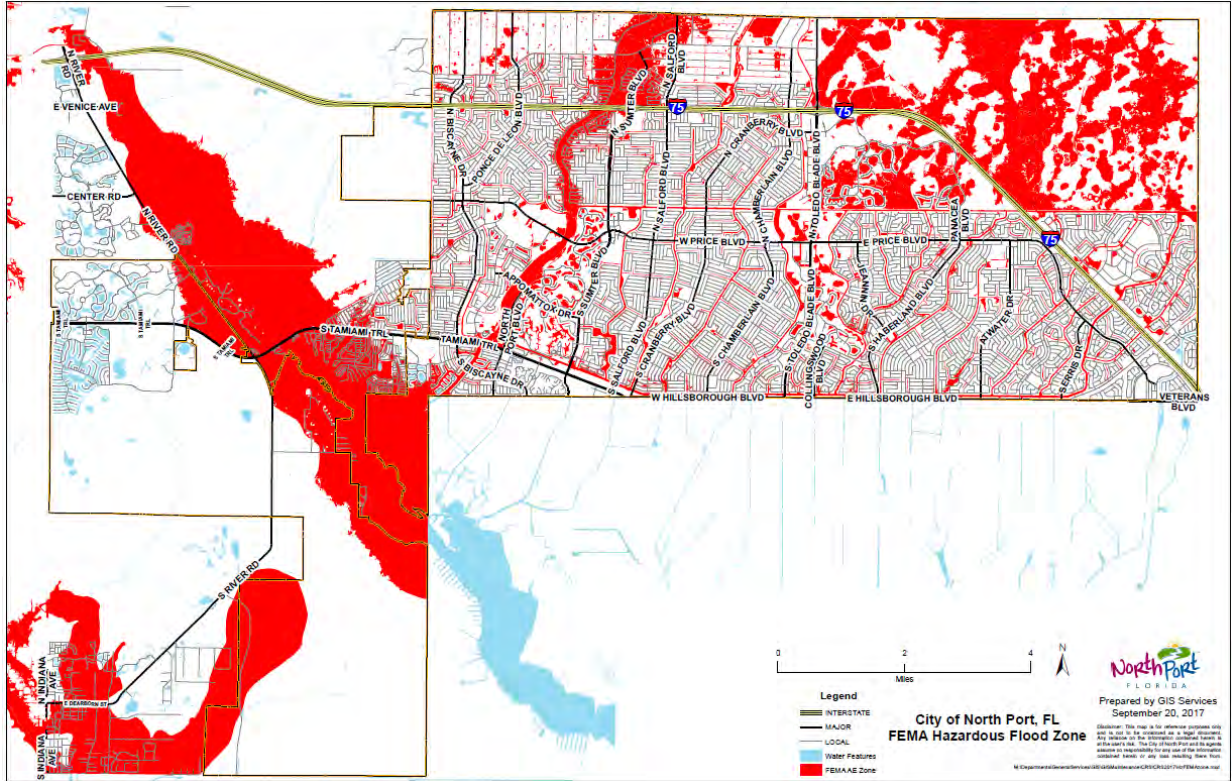


Figure 7: City of North Port Aerial View



C. Demographic Information

1. Population of the City

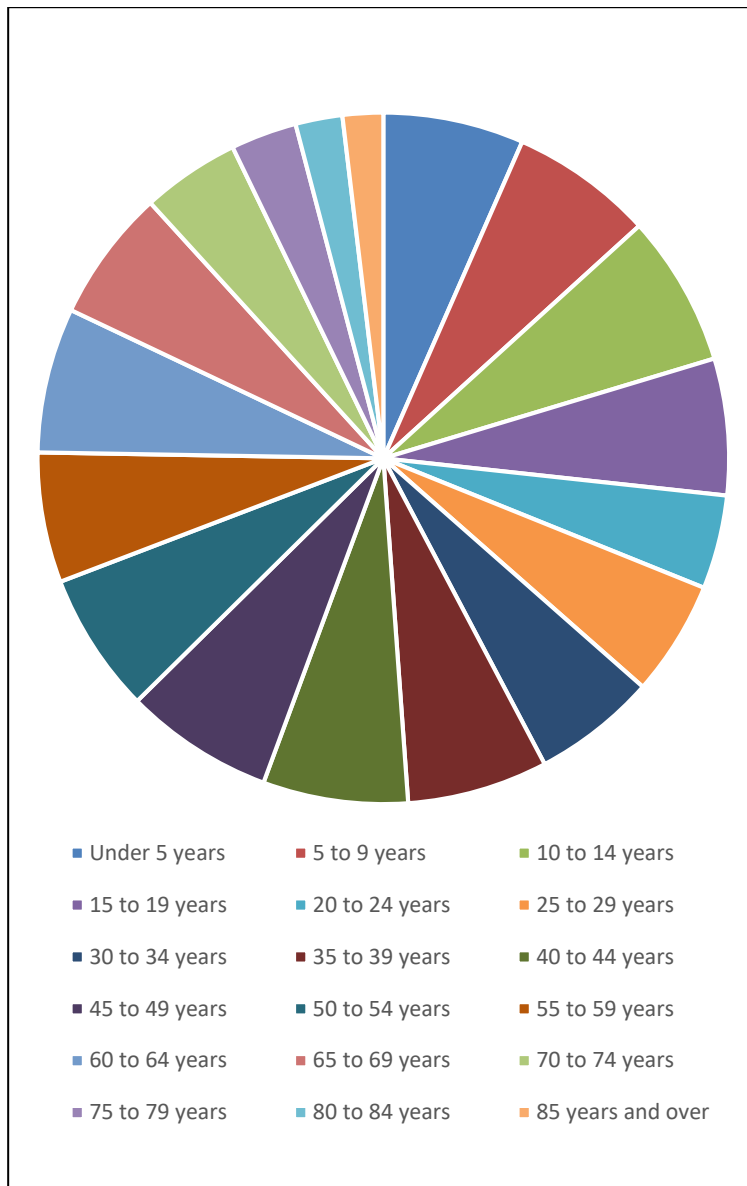
- a. Total Population (2018).⁹ 67,235
- b. Population Density and Distribution (2018). Approximately 650 persons per square mile, less the State forest. The greatest population will continue to be in the western and northern portions of the city.
- c. Distribution of Population by Age.

⁹ Bureau of Economic and Business Research.

Table 8a: Distribution of Population by Age

Population by Age	Number	Percent
Under 5 years	3,531	6.6
5 to 9 years	3,869	6.7
10 to 14 years	4,079	7.1
15 to 19 years	3,673	6.4
20 to 24 years	2,511	4.4
25 to 29 years	3,069	5.4
30 to 34 years	3,351	5.8
35 to 39 years	3,811	6.6
40 to 44 years	3,895	6.8
45 to 49 years	4,035	7.0
50 to 54 years	3,811	6.6
55 to 59 years	3,526	6.1
60 to 64 years	3,909	6.8
65 to 69 years	3,549	6.2
70 to 74 years	2,613	4.6
75 to 79 years	1,760	3.1
80 to 84 years	1,237	2.2
85 years and over	1,085	1.9
Median Age	40.9	

Figure 8b: Distribution of Population by Age



- d. Medically Dependent Population. For the 2018 Hurricane Season, Sarasota County Emergency Management is reporting 228 individuals are registered as Medically Dependent Persons with North Port’s area of responsibility.
- e. Farm Workers. The City of North Port has no commercial agricultural operations which use migrant farm workers.
- f. Areas of Large Tourist Population (including annual tourist and seasonal population). Season population may represent an

increase of 30% over resident population. There is no specific area where the seasonal population resides.

The City of North Port has no major hotels, but a single tourist attraction. Warm Mineral Springs, which is believed to be the “Original Fountain of Youth” sought by the Spanish explorer Ponce de Leon, is located just within the City’s northern boundary at 12200 San Servando Avenue.

- g. Non-English-Speaking Populations (including persons when English is not the first language) and persons with hearing impairment or loss. Figures for the City of North Port are not available; however, per the 2010 US Census, approximately 11% of the respondents reported speaking language other than English. It should also be noted that among the “other” languages being reported, a large population of Ukrainian immigrants and/or descendants live in the City, an estimate of which is between eight and 10% of the City’s population. The City addresses language barrier by making Spanish-language versions of the annual Hurricane Guide available and creating a Ukrainian-language version of the “Stay-or-Go?” literature. All of them are available from either Fire Rescue headquarters or Fire Rescue’s Emergency Management website.

No figures are available for persons with hearing impairment or loss and will be handled by the dispatch center through the Telecommunications Device for the Deaf (TDD) equipment as needed.

- h. Transient Populations. The City of North Port has no recognizable issue with transient populations.
- i. Manufactured Housing Parks and Population. The City of North Port has only one mobile home park within its limits (Holiday Park). However, there are four additional mobile home parks for which the City of North Port Fire Rescue provides fire protection and emergency medical services. For hurricane evacuation purposes, all manufactured housing is in “A” zone. For property risk purposes, the Surge Zone column represents the actual zone in which the park is located. (See Table 10: Mobile Home Communities Served by North Port Fire Rescue)

Table 9: Mobile Home Communities Served by North Port Fire Rescue

Name	Office Address	Units	Surge Zone
Holiday Park	5401 Holiday Park Blvd	865	B
Harbor Cove	499 Imperial Drive	805	A/B
La Casa Mobile Home Park	300 El Prado	974	A/B
Lazy River Village Inc	10500 Tamiami Trail South	356	A/B
Riverwalk Mobile Home Village	150 Riverwalk Drive	223	A/B

j. Inmate Population. There are no correctional facilities within the City of North Port.

2. Vulnerable Populations

Table 11 describes the potential effects to the population, and economic loss if a hurricane with sufficient storm surge, or flooding in a FEMA Special Hazard Flood Area were to affect the City of North Port.

Assisted Living Facilities (ALF). Per the Florida Agency for Health Care Administration (AHCA), five ALFs are registered within the City of North Port:

Name and AHCA Registration Number	Street Address	Licensed Beds	Evacuation Level
Gardens of North Port (The) - 11966640	4900 S Sumter Blvd	50	C
Joy of Living, Inc - 11966162	8548 Alam Avenue	6	C
La Belle La Vie, LLC - 11968629	3973 Lubec Avenue	3	D
North Port Retirement Center - 11912071	4950 Pocatella Ave	50	C
The Springs at South Biscayne - 11968855	6235 Hoffman St	147	B

Nursing Homes. According to the Florida Agency for Health Care Administration, One Nursing Home Is Registered Within the City of North Port:

Name and AHCA Registration Number	Street Address	Licensed Beds	Evacuation Level
Quality Health Care of North Port - 85810	6940 Outreach Way	120	B

Table 10: Vulnerabilities by Population and Property Loss

Residential Non-Residential / Population / Valuation Information in Storm Evacuation Zones and FEMA Hazardous Zones

Evacuation Zones	Non-Residential	Residential		Total Units	Total Potential Property Value Loss	Residential Population (Units *2.65)
	Units	Potential Property Value Loss	Units			
A	4	\$2,800,300	289	293	\$50,216,100	766
B	209	\$245,514,000	4,394	4,603	\$610,020,800	11,644
C	11	\$12,962,000	8,777	8,788	\$1,290,643,000	23,259
D	95	\$269,482,000	12,693	12,788	\$2,218,415,600	33,636
E	137	\$74,981,300	2,629	2,766	\$557,499,200	6,967
Grand Total	456	\$605,739,600	28,782	29,238	\$4,726,794,700	76,272

FEMA Zone	Non-Residential	Residential		Total Units	Total Potential Property Value Loss	Residential Population (Units *2.65)
	Units	Potential Property Value Loss	Units			
FEMA AE Zone	92	\$384,014,800	6,122	6,214	\$1,352,214,200	16,223

Notes:

Known units not currently on 2017 taxroll is estimated values and included in unit counts.

Residential Units include individual Condo Units.

Residential Units only count one per apartment complex.

Total Value Loss includes total value of apartment complex.

Non-Residential includes individual Business Condo Units.

Centers under one ownership is counted as one unit and includes total value complex.

All data is based on GIS Data (August 2017): Surge Zones, FEMA A / AE Zone, Sarasota County Property Apprasier Parcels and Attribute tables.

The 2.65 multiplier is the average household size.

The valuation is from the JUST value from the Preoperty Appraisers Office data (2017 Tax Role).

D. Economic Characteristics

1. Economic Profile

- a. Employment by Major Sector. Most residents are employed in the service sector or government – 32% are retired.
- b. Unemployment Rate. Per the US Bureau of Labor Statistics, the unemployment rate for the North Port-Bradenton-Sarasota Metropolitan Statistical Area (MSA) in the spring of 2018 was 3.6%.
- c. Average Property Value. \$192,800
- d. Median Income. \$49,465

2. Potential Property Value Loss

See Figure 11: Vulnerabilities by Population and Property Loss (above).

E. Emergency Management Support Facilities

1. Critical Facilities. North Port Emergency Management maintains a Critical Facilities Inventory (CFI) for the City. Given the sensitive nature of the facilities, they are protected under Florida Statutes Chapter 119, the locations of which are not included in this Plan.
2. Logistical Staging Areas. Potential staging areas should have adequate space to store palletized resources, maneuver and service vehicles and stock end use items. Some site security should be possible. Pre-identified sites may include:
 - a. Utilities Department Work Yard
 - b. Public Works Department Complex
 - c. Municipal Complex – City Center
 - d. George Mullen’s Activity Center
 - e. Morgan Family Community Center
 - f. Property Maintenance Yard
3. Neighborhood Points of Distribution. Neighborhood Points of Distribution (NPOD) is a County-led operation for the establishment and operation of sites at which the public may acquire emergency commodities in a post-disaster environment. If, due to power outages or road closures, the public is unable to procure food, water, ice or tarps, NPODs will be established at pre-identified locations throughout the City. However, consistent with State policy, no NPOD shall be opened within five miles of an operating retail store selling these commodities. Emergency Management’s Standard Operating Procedure 200.001 details how NPODs will be established and managed.
4. Emergency Helispots. The City of North Port has registered two helispots with the Florida Department of Transportation and the Federal Aviation Administration located at the Fire Stations 81 and 84.

III. METHOD OF OPERATIONS

A. Organization

1. Emergency Management Organization

- a. The City Manager is responsible for appointing an Emergency Manager (EM). The EM is responsible for day-to-day planning and operations.
- b. The EM is responsible for preparedness and training coordination during normal or “blue skies” conditions. The EM will be responsible for:
 - i. Maintaining ongoing coordination with County and State counterparts.
 - ii. Advising the City Manager and department directors of training and exercise opportunities as well as coordinating the City’s involvement in such.
 - iii. Coordinate the development of internal training programs.
 - iv. Maintain and update the CEMP, approve and make changes to the CEMP and distribute copies of updates or changes to copy holders of the CEMP.
 - v. Maintain the EOC and supporting supplies in a state of readiness.
 - vi. Coordinate public awareness and education campaigns.
- c. The City of North Port has adopted the National Incident Management System (NIMS), to include the Incident Command System (ICS) as the standard by which “no-notice events/incidents and pre-planned events will be organized and managed (See Appendix C). Based on ICS guidance, and City protocols, ICS may be implemented at any level of emergency, for any situation, and by any qualified individual. The use of ICS includes all the standardized forms approved by the National Wildfire Coordinating Group, or the NIMS Integration Center of the US Department of Homeland Security.
 - i. ICS implementation must include the consistent application

of Incident Action Planning, and Common Communications Plans, as appropriate.

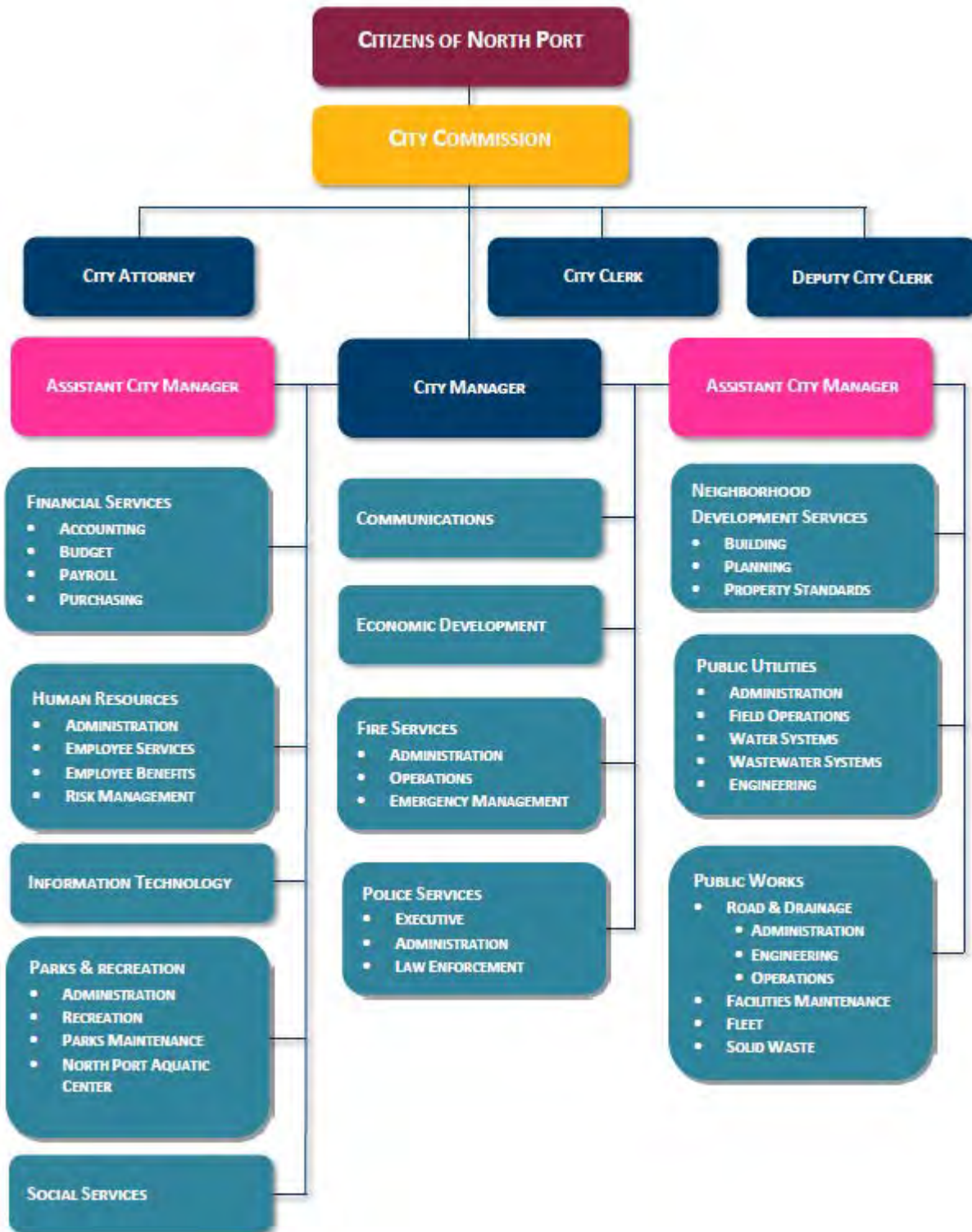
- d. When the ICS has been instituted to manage a current emergency, the EMD's position will be suspended, and the EMD will assume a position with the ICS structure as assigned by, or, if selected by the City Manager, as the Incident Commander.
 - i. The Incident Management Team, comprised of the City Manager, Assistant City Manager, Police and Fire Chiefs, Public Works Director and Emergency Manager is responsible, and has the authority to manage the incident or disaster under the direction of the Incident Commander.
 - ii. The City Manager will function as the coordinator and communication link from the Incident Management Team to the ~~Mayer and the assembled board of Commissioners of the North Port~~ City Commission.
 - iii. The City Manager will continue to oversee non-emergency operations of the City.
 - iv. The City ~~of North Port Mayor and~~ Commissioners may give guidance and recommendations to the City Manager but will not give specific direction to the Incident Management Team or attempt themselves to assume management of the incident or disaster.
- e. All employees are required to assist in the City's disaster response and recovery efforts. The City has instituted an Employee Disaster Role Registration program. As supported by the City Manager, all City employees will be designated as one of the following:
 - i. Department Essential for their Continuity of Operations (COOP). Each department is responsible for designating their employees COOP- or EOC-essential. Department essential employees are required to report to their regular work assignment to assist with the department's role in the response and recovery effort.
 - ii. Emergency Operations Center (EOC) Essential. Employees designated as EOC-essential are required to report to their EOC work assignment to assist with the Emergency Management's role in the response and recovery efforts.

- iii. Support role. All employees not previously designated.

All new employees will complete the Employee Disaster Role Registration form on arriving at their workplace for orientation.

The forms will be maintained by the Emergency Management Division and EOC managers during a disaster.

Figure 11: Organizational Chart of the City of North Port Government



2. Lines of Succession^[SB1]
 - a. The Line of Succession from the City Commission Mayor is to the Vice-Mayor.
 - b. The Line of Succession from the City Manager is ~~to the Assistant City Manager~~ as provided in the Department COOP.
 - c. Each department director shall identify two alternates as successors as outlined in the Department COOP. Realizing that some departments may not have such depth, plans will be established to utilize supervisors or managers from other departments as appropriate.
3. ICS and CEMP Activation. The North Port CEMP will be activated, and ICS implemented, under the following conditions:
 - a. On the issuance of a declaration of a State of Emergency by the President of the United States for a geographic area which includes the City of North Port, or
 - b. On the issuance of a declaration of a State of Emergency by the Governor of the State of Florida, for a geographic area that includes the City of North Port, or
 - c. On the issuance of a declaration of a Local State of Emergency by the Sarasota County Board of County Commissioners, or
 - d. On notification of the Sarasota County Emergency Management, or the Sarasota County EOC, that Sarasota County has implemented its CEMP, or
 - e. On a declaration by the City of North Port Commissioners, or the City of North Port City Manager, that a Local State of Emergency exists, or
 - f. The senior employee present from any department of the City of North Port, who is responsible for management of an emergency, may activate the City of North Port CEMP and initiate the Incident Command System, if in the best judgment of the employee in-charge of the incident, circumstances necessitate such action. The senior employee present will serve as Incident Commander until the City Manager selects a permanent Incident Commander.

4. **Actions by the City Manager.** On activation of the CEMP and initiation of the ICS, the City Manager will notify the various department directors, and City Commissioners, regarding the situation and identifying the Incident Commander.
 - a. The Incident Commander will be selected by the City Manager from a pool of qualified individuals within the City staff or he may assume the role himself. The Incident Commander will have overall responsibility for management of the disaster.
 - i. The choice of Incident Commander and management structure may be made on the nature of the event. The City Manager may select an individual with subject matter expertise (e.g., Police Chief for a terrorist attack, or Fire Chief for wildfire, Utilities director for a drinking water emergency, etc.).
 - ii. The City Manager may decide to implement a Unified Command structure, by which each department providing resources to the incident may provide a director or senior division manager to share in command decision-making.
 - b. The Operations Section Chief will be appointed by the Incident Commander from a pool of qualified individuals within the City staff. The Operations Section Chief may be selected based on the nature of the incident. For instance, the Deputy Fire Chief may be appointed as Operations Section Chief for firefighting and hazardous materials, or the Superintendent of the Water Treatment Plant for a water contamination issue. This selection process will apply to other incident categories.
 - c. The Finance Section Chief will be selected by the Incident Commander from a pool of qualified individuals within the City staff.
 - d. The Logistics Section Chief will be selected by the Incident Commander from a pool of qualified individuals within the City staff.
 - e. The Plans Section Chief will be selected by the Incident Commander from a pool of qualified individuals within the City staff.
 - f. The Public Information Officer shall be filled by individual holding

Commander based on the nature of the incident, and the capability of the building. They include, but are not limited to:

- i. Municipal Complex – Fire Rescue Headquarters or Police Headquarters
 - ii. Morgan Family Community Center or George Mullen Activity Center
7. Public Information System. The Incident Commander/Unified Command will establish a Joint Information Center (JIC) to disseminate public information. Information released by the JIC must be pre-approved by the Incident Commander/Unified Command members. The JIC will be composed of Public Information Officer (PIO) elements from each responding department/agency to include but not limited to City, State and Federal. This center will release public preparedness, response, recovery, and mitigation information, as well as certain information on the disaster or emergency at hand such as evacuation center information, danger zones, and open or closed businesses. The JIC will establish a schedule for press briefings and release other information as needed.

B. Levels of Emergencies and Disasters

1. The City of North Port closely follows the definitions of “emergency” and the various levels of “disasters” provided in Florida Statutes §252.34. Those definitions and their relationship to EOC activation levels are as follows:
 - a. Level III - Minor Emergency (EOC Monitoring)
 - i. Defined. Any unexpected occurrence that can be met with a single department's normally available resources. “Normally available resources” may include the response of other City departments in a routine capacity.
 - ii. Responsibility. The department that would normally handle the situation is responsible for the decision making to properly resolve the incident.
 - iii. Notifications. None
 - iv. Action. The responsible department may set up an on-site command post if it so desires. No City-wide action is required. Press relations will be handled by the responsible

- department. Needed logistical support, additional personnel, or other resources will be the responsibility of the responsible department.
- b. Level II - Major Disaster (EOC Partial Activation)
- i. Defined. Any unexpected occurrence that requires response by two or more City departments above a routine capacity, or where outside agencies have responded to render such assistance. Such emergencies require a cooperative effort and a commitment of personnel, equipment, or resources of personnel, and equipment from many departments.
 - ii. Responsibility. The primary decision-making responsibility rests with the department which would normally handle the situation, but a cooperative effort with departments that are responding in support is required. The cooperative efforts should be designed to properly resolve the incident.
 - iii. Notifications. The City Manager and the Emergency Management Director should be notified to the situation by the department(s) involved.
 - iv. Action. An on-site command post should be set up by the responsible department and all responding departments should be notified of its location. The responsible department may also set up an administrative command post (usually at its main facility or possibly the City EOC). The City Manager and the Emergency Management Director should be notified of its location. Press relations will be handled by the responsible department.- Needed logistical support, additional support, or other resources will be the added responsibility of the responsible department.
- c. Level I - Catastrophic Disaster (EOC Full Activation)
- i. Defined. Any extraordinary occurrence of such magnitude that all City departments and resources must be utilized or where the combination of City departments and outside agencies has been mobilized to handle the situation.
 - ii. Responsibility. The primary responsibility for decision making rests with the Incident Commander or Unified

Command. The on-site commanders may make those decisions necessary to protect life and property and to stabilize the situation. Decisions designed to properly resolve the entire emergency shall be the responsibility of the Incident Commander. This level of emergency usually results in an "Ordinance of a State of Local Emergency" by the Commission of the City of North Port, who invokes the emergency powers of the office.

- iii. Notifications. The following personnel will be notified (or, in their absence, an alternate from their department): City Manager, Emergency Manager, Fire Chief, Police Chief, and all other department directors as seen necessary for primary EOC activation. The initiating department shall have the responsibility for making the above notifications. The initiating departments may get assistance in any instance by notifying dispatch or the City Emergency Management Director of the need for such assistance.
 - iv. Action. The senior representative of the initiating department shall establish an on-site command post and notify all departments of the location. The City EOC shall be activated. All members of the Incident Management Team and support staff will report to the EOC. Press Relations will be assumed by the EOC. The further acquisition of personnel, equipment, or other resources will become the duty of the EOC. The City EOC will assume the incident-related communications functions during a Level I activation. All other department heads and those with designated responsibilities elsewhere in this plan should report to their regular areas of business (other instructions may be given at time of mobilization).
2. Full activation of the EOC does not occur in every emergency event. Even situations with multi-discipline and mutual aid involvements are often managed effectively in the field using the Incident Command Systems' principles practiced by responders in the County.
- a. The EOC may be activated simply to provide support to the Incident Commander(s) in the field.
 - b. Any incident may escalate from a field command emergency to one managed from the EOC.

C. Department Roles and Responsibilities

1. General

- a. Elected officials and other governmental authorities of the City operate essentially the same during normal and emergency times. Non-emergency activities may be suspended, and resultant uncommitted personnel reallocated to the City EOC.
- b. The scene of decision-making may shift from the normal City Commission conference rooms and Department offices to the City EOC and/or other special facilities.
- c. The City of North Port's organization for disaster management commits all units of local government to provide the service and assistance for which they are best trained and most experienced. Those organizations that have no inherent emergency management roles will make their personnel available to support disaster operations as may be directed.

2. The Mayor of the City Commission's Responsibilities:

~~a. Provide the City Manager with a listing of the Commissioners specifying their succession in authority to exercise the emergency powers of the Mayor in his absence or inability to function.~~

~~a.~~ ~~b.~~ Analyze the Citywide social and economic impact of the situation and provide policy and guidance as requested.

~~b.~~ ~~c.~~ Prepare to participate in public information presentations and media briefings.

~~c.~~ ~~d.~~ Delegate policy and direction, including authority to declare a Citywide emergency/disaster, to the City Manager ensuring continuity of government, one-voice decisions and unified community support as requested.

~~d.~~ ~~e.~~ Convene ~~the Commission to continuous~~ emergency session as soon as is practicable. ~~Exercise all essential emergency functions of the Commission unilaterally until the full Commission can be convened.~~

3. **The City Manager's Responsibilities:**
 - a. Proclaim/declare State of Local Emergency declarations pursuant to F.S. 252.38(3)(a)(5). Extend or terminate disaster declarations as required.
 - b. Provide to Emergency Management a line of succession, naming the two officials in sequence authorized to act with his authority in his absence.
 - c. Function as the coordination point between the Commission ~~Mayor~~ and the City department and office heads and private and volunteer sector representatives.
 - d. Provide the City EOC with an empowered representative to assist in coordination of City-County emergency operations.
 - e. Ensure participation throughout the event on the part of City police, fire, public works and other City government offices in coordination with the overall City's operations.
 - f. Ensure the establishment of Standard Operating Guidelines (SOG) for all elements in City government as needed to implement this Plan. Establish readiness procedures that ensure the availability of trained personnel and requisite equipment and facilities in time of emergency.
4. **The City Attorney's Responsibilities:**
 - a. Provide a two-person successor list to the Emergency Manager ~~Management Director~~.
 - b. Provide legal counsel as required throughout the emergency with emphasis on SLE/disaster declarations, curfew, sales restrictions, and re-entry issues.
5. **The Police Chief's Responsibilities:**
 - a. Provide a two-person successor list to the Emergency Manager ~~Management Director~~.

- b. Staff the City EOC on request.
 - c. Provide professional advice and expertise as well as resources to the City Commission, City Manager and other elements of City government operations particularly in support of evacuations, public warnings and notifications, physical security activities, and movement control.
 - d. Request, coordinate and control all other law enforcement resources brought in to assist the City.
 - e. Draft and coordinate requests for “Military Support of Civil Authority” in coordination with the City EOC for forwarding to the County EOC.
 - f. Operate a central 9-1-1 and police dispatch system and center throughout the emergency.
 - g. Provide field incident commanders upon request.
 - h. Maintain mutual aid agreements with State-wide and adjacent law enforcement agencies.
 - i. Provide resources to the Tactical First-In Team Task Force.
 - j. Provide security for the City EOC, each shelter, and incident facilities.
6. The Fire Rescue Chief’s Responsibilities:
- a. Provide a two-person successor list.
 - b. Staff the City EOC on request.
 - c. Coordinate the activities of all fire rescue organizations used in the City throughout the emergency with overall City operations.
 - d. Submit requests for mutual aid and other forms of external aid through the City EOC to the County EOC.
 - e. Assist in the evacuation of Medically Dependent Persons.
 - f. Provide resources to the Tactical First-In Team Task Force.

- e. Provide emergency procurement support for supplies and equipment needed by City agencies under authority of the Sec. 2-408, Emergency Procurement, of the Code of the City of North Port.
- f. Develop and promulgate emergency procurement procedures to be used by departments and offices funded by City government that are compatible with State and Federal financial reporting requirements.

9. The Director of the Public Works Department's Responsibilities:

- a. Provide a two-person successor list to Emergency Manager ~~Management Director~~.
- b. Staff the City EOC on request.
- c. Conduct damage assessment of public infrastructure in coordination with the Utilities and Neighborhood Development Services Departments.
- d. Provide maintenance services as needed to keep evacuation routes open, flooded or otherwise blocked road areas barricaded, and traffic rerouting coordinated with law enforcement agencies.
- e. Monitor water flow in the waterway system and adjust water control facilities.
- f. Implement the Debris Management Plan through management of post-disaster debris clearance, removal, monitoring, transportation and disposal.
- g. Provide resources to the Tactical First-In Team Task Force.
- h. Provide for emergency fueling and repairs of City vehicles.
- i. Ensure that all City buildings are prepared/protected during emergency and disaster events.
- j. Provide servicing and repair of governmental buildings to ensure operational ability and prevention of damage if needed.
- j. Work with Emergency Management to identify projects that could reduce damage to government buildings.

- k. Provide for on-site facility maintenance and janitorial duties in City Hall during disaster operations.
 - l. Coordinate facility closings with the EOC and PIO.
 - m. Provide facility technicians to resolve problems related to mechanical, plumbing, electrical, or otherwise for the City EOC.
10. The Public Information Officer Responsibilities:
- a. Provide a two-person successor list to Emergency ~~Management Director~~ **Manager**.
 - b. Establish and operate a Joint Information Center (JIC) and Call Center near the EOC, collecting information in the EOC, and from field unit Public Information Officer (PIO). The JIC will be composed of PIO elements from each responding department/agency to include but not limited to City, State and Federal.
 - c. Activate the Crisis Communication and Public Information appendix.
 - d. Organize, schedule and manage media briefings regarding actual emergency preparedness, response and recovery operations.
 - e. Prepare and disseminate emergency public information materials incidental to an emergency operation.
 - f. During and following an emergency, serve as the single official point of contact between City government and all media representatives.
 - g. Coordinate public information releases and rumor items with representatives of County, State and Federal governmental agencies as may be on scene in any official capacity.
 - h. Assist the essential services in developing and disseminating post-disaster health and safety instructions for the reoccupation of evacuated areas and storm damaged homes.
11. The Director of Parks and Recreation Department's Responsibilities:
- a. Provide a two-person successor list to Emergency ~~Management Director~~ **Manager**.

- b. Staff the EOC as requested.
- c. Staff the Morgan Center's employee dependent shelter
- d. Provide the availability of park facilities (structures and land) for disaster preparedness, response, sheltering and recovery operations as needed by the City.

12. The City Clerk's Responsibilities:

- a. Provide a two-person successor list to Emergency Manager ~~Management Director~~.
- b. Staff the City EOC on request.
- c. Draft the Emergency Ordinance of a State of Local Emergency (SLE) declaration for the City Commission or City Manager.
- d. Schedule the City Commission to continuous emergency session as soon as is practicable.
- e. Provide administrative staff support for maintenance of an official operations log in the City EOC when activated to Level I, maintain the City official log of situations and events encountered, decisions rendered, and actions taken.
- f. Provide technical advice and assistance to the activated EOC regarding records for each specific disaster or emergency.

13. The Director of the Utilities Department's Responsibilities:

- a. Provide a two-person successor list to Emergency Manager ~~Management Director~~.
- b. Staff the City EOC as requested.
- c. Issue any precautionary notices as required.
- d. Provide support to other emergency response agencies as needed.
- e. Provide resources to the Tactical First-In Team Task Force.

- f. Conduct damage assessment of public infrastructure in coordination with the Public Works and Neighborhood Development Services Departments.
 - g. Provide emergency supplies of potable water, when required.
14. The Director of the Human Resources' Department's Responsibilities:
- a. Provide a two-person successor list to Emergency Manager ~~Management Director~~.
 - b. Maintain insurance records and support the Workers' Compensation program.
 - c. Conduct damage assessment of City facilities in conjunction with Facilities Maintenance.
 - d. Provide staff for the Call Center.
 - e. Develop and maintain a roster of government employees who have foreign language or sign language capability.
15. The Office of Information Technology's Responsibilities:
- a. Provide Geographic Information Systems staffing for the EOC following an event for mapping and plotting of damage, areas of concern, and other items as required.
 - b. Provide on-site computer technicians to resolve problems related to computers, printers, networking, or otherwise for the City EOC.
 - c. Provide network systems' technical support for all City departments to ensure continuity of operations.
16. The Office of Economic Development's Responsibilities:
- a. The Economic Development Manager, within the City Manager's Office, shall serve as point of contact for business/industry related issues in pre- and post-disaster scenarios, and assist in identification of and collection of information from businesses that have been affected by a disaster event.
- D. Emergency Support Function to City Department Crosswalk

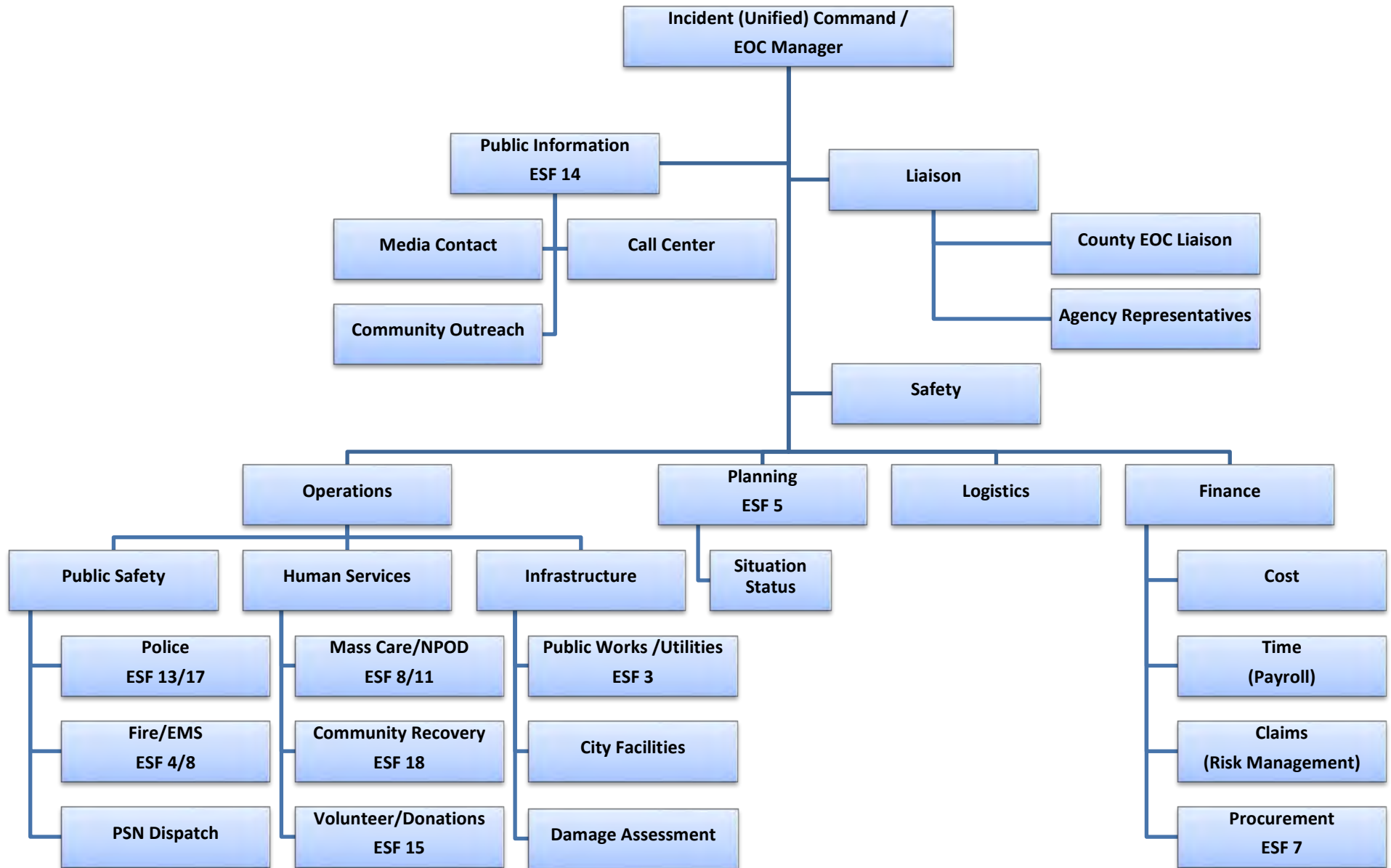
The City of North Port's Emergency Operations Center (EOC) is organized by the standards of the Incident Command System (ICS). This is to ensure consistency with the Sarasota County EOC and State of Florida EOCs. Given there is some difference in the way other EOCs are organized, the below table (12) and organizational chart (Figure 13) crosswalks the traditional Emergency Service Functions to the ICS organizational component or department found in the City of North Port EOC.

Table 12: Emergency Support Function to City Department Crosswalk

ESF	Discipline	ICS Position (CNP Lead Agency)
ESF-1	Transportation	Sarasota County
ESF-2	Communications	Verizon
ESF-3	Public Works and Engineering	Operations (CNP Public Works)
ESF-4	Firefighting	Operations (CNP Fire Rescue)
ESF-5	Information and Planning	Planning (CNP Neighborhood Development Services)
ESF-6	Mass Care	Sarasota County
ESF-7	Resource Support	Finance (CNP Purchasing)
ESF-8	Health and Medical	Operations (CNP Fire Rescue)
ESF-9	Search and Rescue	Operations (CNP Fire Rescue)
ESF-10	Hazardous Materials	Sarasota County
ESF-11	Food and Water	Sarasota County
ESF-12	Energy	FP&L
ESF-13	Military Support	Florida National Guard
ESF-14	Public Information	PIO (CNP City Manager)
ESF-15	Volunteers and Donations	Operations (CNP Social Services)
ESF-16	Law Enforcement and Security	Operations (CNP Police)
ESF-17	Animal Protection	Sarasota County Sheriff's Office
n/a	Damage Assessment	Operations (CNP Neighborhood Development Svcs.)
n/a	Environmental Protection	Sarasota County
n/a	Community Relations	CNP City Manager
n/a	Disaster Recovery Centers	Sarasota County
n/a	Infrastructure / Public Assistance	As identified by the City
n/a	Unmet Needs Coordination	Sarasota County
n/a	Emergency Housing	Sarasota County
n/a	Debris Management	Operations (CNP Public Works)
n/a	Disaster Field Office	Sarasota County
n/a	Mitigation Assessment	CNP Public Works
n/a	Business Recovery	CNP City Manager
n/a	Others	As identified by the City

- E. Demobilization of the City EOC. The release of personnel from the EOC and the ultimate closure of the EOC should be preplanned and conducted in an orderly method. The Incident Commander and general staff should determine when and how such draw down and closure will be accomplished. Considerations include, but are not limited to:
1. Determining which positions are no longer required to operate on a continuous 24-hour basis and reducing their hours of operation.
 2. Determining which positions can be consolidated to release some personnel.
 3. Determining which personnel should be released first due to fatigue, family and personal needs, or the requirement for them to return to their normal duty positions.
 4. Determining if some new personnel should be integrated into the EOC to allow for others to be released, or if the release can take place without the infusion of new personnel.
 5. Ensuring all financial records are completed and collected by the EOC Cost Unit.
 6. Verifying that historical documentation is transferred to the City Clerk for custodial care.
 7. Appointing a person or persons to assure that all EOC supplies, forms, displays and equipment are returned to the City Emergency Manager for future utilization.
 8. Notifying the City Manager of the intention to close the EOC with an estimated effective time.

**Figure 13: Organization Chart of the City of North Port
Emergency Operations Center**



IV. PREPAREDNESS ACTIVITIES

A. General Issues

1. The Emergency Management Director is responsible for updating the City CEMP and assuring that changes are distributed to copy holders of the CEMP. Department directors are responsible for furnishing necessary updated information to the Emergency Management Director for inclusion in revision. Each City department shall develop and annually maintain its own procedures to address its preparedness and response to a disaster.
2. The City Clerk is responsible for assuring that vital records are maintained. The City Manager may task department directors with the responsibility for capturing and maintaining department specific information and furnish appropriate information to the Clerk for preservation.
3. Sarasota County Emergency Management is statutorily-responsible for the registration of persons with special needs. The City's Emergency Manager will provide information on the program during preparedness talks.

B. Public Awareness and Education

1. Throughout the year, Public Service Announcements are submitted to local broadcast, cable, print and social media on topics relevant to current events, time of year, or special programs.
2. Dissemination of recovery information is primarily the responsibility of Sarasota County. The City of North Port will supplement their information with advisories to local media, the City of North Port web site, social media and, if electricity is out, use of variable message boards strategically placed around the City.
3. Maps of centers and surge/evacuation level and routes on the Sarasota County Emergency Management website are linked from the City of North Port's website.
4. City-produced brochures on emergency preparedness, pet-friendly centers and medically-dependent persons are made available from Fire Rescue Headquarters. Additionally, the County-sponsored annual disaster preparedness guides are also available from Fire Rescue, City Hall, community centers, and distributed to homeowner/condominium/mobile home park associations, and other locations as requested.

- C. Exercise
1. Exercise Opportunities
 - a. The City of North Port will develop and conduct emergency management-oriented exercises.
 - b. The City of North Port will participate in similar exercises conducted by other government entities.
 - c. The Emergency Management ~~Director~~ will seek out exercise opportunities by coordinating with regional, State and Federal entities which offer such.
 2. City-wide exercises will be coordinated by the Emergency Management ~~Director~~. Department directors will participate in coordination meetings with the Emergency Management ~~Director~~ in planning such exercises.
 3. All exercises will incorporate NIMS/ICS principles.
 4. There is no formal exercise schedule established. The City may participate in exercises scheduled by other agencies, such as Florida Division of Emergency Management, or Sarasota County Emergency Management.
 5. Exercise Evaluation
 - a. When conducting internal exercises, the Emergency Management ~~Director~~ may select one or more non-involved third parties to observe and evaluate the process.
 - b. The evaluators should be versed in emergency management and have subject matter expertise the disaster being exercised.
 - c. Evaluators will prepare their reports in a format consistent with the Homeland Security Exercise and Evaluation Program (HSEEP), or a more appropriate format as selected by the Emergency Management ~~Director~~, based on recommendations from the City Manager and department directors.

- d. The City Manager will conduct a post-exercise meeting with the Emergency Management Director and other department directors or individuals, to critique the exercises. The meeting will determine what types of corrective actions are needed, if any. It will also be determined if modifications are required of the CEMP, departmental SOPs or other guidance.
- e. An After-Action Report will be created to document corrective actions and lessons learned from the exercise and present a schedule and mechanism for their implementation and monitoring.

D. Training

1. General

- a. The Emergency Management Director is responsible for identifying and coordinating subject-related training opportunities.
- b. The Emergency Management Director will give notice to the department directors relative to available training opportunities.
- c. Individual department directors will advise the Emergency Management Director of training opportunities for the possible inclusion of other departments.
- d. Department directors will designate Emergency Coordinators within their organization.

2. Training Levels. Whether conducted in-house, or whether available through other sources, consideration should be given to the differing needs of employee/community functions. Levels may include:

- a. Responder Training for the response workers which focuses of their immediate actions and safety.
- b. Supervisor Training focuses on the needs of the first line supervisors, with emphasis on prioritizing response needs, safety of personnel and record/time keeping.
- c. Management Training for those with a broad range of authorities and responsibilities. Emphasis will be on fiscal management, resource utilization, inter-government dynamics and recovery and mitigation concerns.

- d. Community-based awareness, self-help, population protection procedures, and public awareness training for the public.
3. Training by Emergency Management Function
- a. Mitigation/Preparedness Training
 - i. Department directors and Emergency Coordinators will participate in risk assessment and plans development training to better prepare their organizations for responding to emergencies/disasters.
 - b. Response Training
 - i. The Florida Division of Emergency Management provides on-site training for law enforcement, medical, fire services, utilities and emergency management personnel, as well as local appointed officials and their staffs.
 - ii. Resident training at the Emergency Management Institute and other US Department of Homeland Security facilities, is encouraged for response groups from the jurisdiction to better understand the Integrated Comprehensive Emergency Management concept and the local Plan.
 - iii. The objectives of Emergency Management training are to develop team skills for the City of North Port Emergency Operations Center, field operations, information systems, technical information related to hazard mitigation, preparedness, response and recovery, and roles and responsibilities of all levels of government and the private sector in the face of emergencies or disasters.
 - iv. Group training is encouraged for the City of North Port Emergency Operations Center staff, Incident Management Team, individuals, information officers, all department directors and their Emergency Coordinators, damage assessment teams, etc.
 - v. Internal training consists of the concepts of field operations and key components of the City of North Port Comprehensive Emergency Management Plan.

- vi. Internal training should be done on-site, and in-groups.
 - vii. Community awareness programs are provided to train citizens as to what actions are expected of them before, during and after an emergency/ disaster.
 - viii. Preparing citizens for protective action and self-help practices immediately following a disaster is part of the Emergency Management training program, through the Community Emergency Response Team program.
- c. Recovery Training
- i. This training would include planning for the long-term recovery, financial reimbursement, assistance to the public and businesses, etc.
4. Required Basic Levels of NIMS and ICS Training
- a. All City personnel are deemed essential and shall complete Incident Command System training per their role in the response/recovery organization.

The following is consistent with Department of Homeland Security (DHS) recommendations for NIMS and ICS training.

- i. All employees shall complete the Introduction to the Incident Command System (ICS-100) and Introduction to the National Incident Management System (IS-700).
- ii. First line supervisors, single resource leaders, field supervisors, and other emergency management/response personnel shall complete Basic Incident Command (ICS-200).
- iii. Mid-level management including strike team leaders, task force leaders, unit leaders, division/group supervisors, branch directors, and EOC staff shall complete the Intermediate Incident Command System for Expanding Incidents (ICS-300).

- iv. Executives, command and general staff, select department heads with multi-agency coordination system responsibilities, area commanders, and emergency managers shall complete the Advanced Incident Command System (ICS-400).
 - v. City Commissioners should receive the Incident Command System (ICS) Overview for Executives/Senior Officials (ICS-402).
 - vi. The Emergency Management ~~Director~~ and Emergency Management Division staff shall complete the Introduction to the National Response Framework course (IS-800).
- b. City personnel will receive additional ICS and subject matter training on their specific role and responsibility within the ICS organization.
- E. Continuity of Operations Planning. It is the intent of City of North Port to have in place a comprehensive program to ensure continuation of essential functions under all circumstances. COOP is defined as the activities of individual departments and agencies to ensure that their essential functions are performed. This includes plans and procedures that delineate essential functions, specify emergency delegation of authority, provide for safekeeping of vital records/resources, identify alternate facilities, provide interoperable communications, and validate these operations through tests, training, and exercises.

COOP is a “good business practice” – part of the fundamental mission of agencies as responsible and reliable public institutions. Due to the changing threat environment, and the potential for “no notice” emergencies (i.e., acts of nature, accidents, technological emergencies, terrorist incidents), the need for COOP capabilities that enable agencies to continue their essential functions has increased. This environment has emphasized the criticality to ensure the continuity of essential government functions.

The Continuity of Operations (COOP) Plan establishes policy and guidance to ensure the continued execution of City of North Port mission-essential functions. This may be required if an emergency threatens or incapacitates operations, and the relocation of selected personnel/functions is required.

The COOP Plan is composed of two parts:

1. A Base Plan which serves as a City-wide policy guide
2. Individual plans specific to the needs of each City department

This Plan is designed to:

1. Ensure that the City will provide critical services in an environment that is threatened, diminished, or incapacitated.
 2. Provide a means of information coordination to the City of North Port government to ensure uninterrupted communications within the internal organization of the City and externally to all identified critical customers.
 3. Provide timely direction, control, and coordination to the City leadership and other critical customers before, during, and after an event or upon notification of a credible threat.
 4. Establish and enact time-phased implementation procedures to activate various components of the "Plan" to provide sufficient operational capabilities relative to the event or threat thereof to the City of North Port.
 5. Facilitate the return to normal operating conditions as soon as practical, based on circumstances and the threat environment.
 6. Ensure that the City of North Port COOP Plan is viable and operational and is compliant with all guidance documents.
 7. Ensure that the City of North Port COOP Plan is fully capable of addressing all types of emergencies, or "all hazards" and that mission-essential functions can continue with minimal or no disruption during all types of emergencies.
- F. Resource Management. The Emergency Management Director will inventory City of North Port assets to conform to US Department of Homeland Security resources' typing standards.

To the extent possible, the City's acquisition program incorporates the Standard Equipment List (SEL) and other Federal equipment standards data when purchasing interoperable equipment.

V. RESPONSE ACTIVITIES**A. General Issues**

1. The City Manager and Emergency Management Director will, when deemed necessary, begin the process of requesting an Emergency Ordinance of a State of Local Emergency using the following measures:
 - a. Solicit draft Emergency Ordinance of a State of Local Emergency (document) input from City departments, including recommendations to modify, suspend, or cancel enforcement of ordinances and other rules in which they have an interest or responsibility.
 - b. With the assistance of the City Attorney and City Clerk, draft the Emergency Ordinance of a State of Local Emergency document.
 - c. Request for an Emergency Ordinance of a State of Local Emergency before the City of North Port Commission at a duly-convened Commission meeting
 - i. Under Section 2-54 of the Code of the City of North Port, “[t]he city manager and any one commissioner may call an emergency meeting. An emergency meeting shall be called only when the conditions and circumstances indicate that emergency measures must be taken.”
 - d. Disseminate the original, and all subsequent ordinances to all department directors, County and State emergency management, other affected entities, and the media. [A sample Emergency Ordinance of a State of Local Emergency Document may be found as Appendix A to the CEMP.]
2. Closing of Schools and Businesses
 - a. The decision for the closing of schools will be made by the School Board of Sarasota County School, with the advice of the Sarasota County Emergency Operations.
 - b. Businesses will close using the decision of their owners/managers, and under recommendations from the City EOC.

3. Requesting State Assistance

- a. All requests for County and State assistance from City agencies will follow this protocol:
 - i. The requesting department will forward its request to their respective liaison in the City EOC.
 - ii. The message will then be analyzed and forwarded to the City Liaison Officer at the County EOC as seen necessary once all local resources have been exhausted.
- b. Departments shall not initiate resource requests directly to the County or State. All requests for County or State Assistance must be made through the City of North Port City EOC.

4. Departmental Pre-Storm Checklists

A department/office-specific checklist has been developed to serve as job aid for tasks which should be either reviewed or completed within certain time-frames relative to the onset of Tropical Storm-force winds. When directed, department directors will initiate the checklist and report status during director- and EOC operational-briefings.

B. Evacuation Routes

Through the City of North Port, River Road, Sumter Boulevard, Toledo Blade Boulevard, Tamiami Trail (US 41) and I-75 are designated as primary evacuation routes. Although all routes can be considered primary, citizens are urged to use I-75 and US 41 as a last resort. The reason for this is that most people are familiar with I-75 and US 41, and therefore use of these roads during an evacuation will be high. However, since these routes run along the coast, and, historically, these roads are normally crowded in an evacuation, people are urged to use US 17, County Road 74, and Kings Highway to evacuate North Port. These roads will take people inland, away from the high wind and storm surge threat.

C. Medically Dependent Persons Program. Sarasota County is mandated under Florida Statutes §252.355 to register all persons who have special transportation or medical needs during an evacuation situation. The process for registration is as follows:

1. The presence of the Medically Dependent Person (MDP) registration is advertised in many different formats throughout the year.

2. People are urged not to register unless it is needed. If people have friends or family that can transport them and/or take care of them, then they need to use those options. The reason for this is that the City of North Port, as of Summer 2018, has 228 people registered in this program. City resources to transport and shelter this population is extremely limited.
 3. Once interest is shown in the program, a form is sent to this person, or their caregiver, to fill out. The form requests information such as name, address, special needs, and how many people they are to bring with them.
 4. Once Sarasota County Emergency Management is in receipt of this returned form and eligibility is confirmed, the name is then entered their database, which is maintained by Sarasota County.
 5. Once a storm threatens, and evacuation orders are imminent, the persons on the list which are residing in the potentially threatened area are called by a phone bank, which has been staffed and trained by Sarasota County Emergency Management and managed from the County EOC. The people are notified that they are about to be picked up, and that they need to get their personal effects together.
 6. The list is given to the MDP Operations at the County EOC which develops routes to pick up these people via school bus with hydraulic lift, the Sarasota County Area Transit (SCAT) via buses with hydraulic lift, and North Port Fire Rescue for transport of non-ambulatory clients.
 7. These individuals and their caregivers will then be picked up and brought to a designated facility in county, if the situation allows for it, or out of county, for larger incidents.
- D. Facilities Needing Attention During Evacuation. Lists of facilities needing special attention during the evacuation process may be found in the City EOC.
- E. Re-entry. Re-entry to evacuated areas is a controlled activity for residents, people who work in the area and for contractors, and others seeking work in the evacuated area. Re-entry will be permitted only during daylight hours.
1. The Police Department will manage appropriate Traffic Control Points (TCP), as identified by number and intersection on the TCP maps maintained in the EOC.
 2. Proof of residency in the area or area employment must be presented at the TCP to gain re-entry.

- a. For residents, a driver license listing an address in the evacuated area is acceptable for re-entry. Lacking that specific documentation of residency in the evacuated area can be established by photo ID along with a utility bill addressed to the bearer at the area address, or a lease or proof of building ownership.
 - b. Employees of businesses in the evacuated area must present a photo ID issued by that business for the address in the evacuated area, or a photo ID along with other proof of employment at the business address in the evacuated area such as a paycheck stub.
3. Re-entry to evacuated areas will begin and will be only during daylight hours, and as damage assessment, debris removal and the status of utilities restoration permits. When the evacuated area is large or involves multiple sectors, re-entry is likely to take place in phases. Local radio broadcasts will be used to announce which areas are open for re-entry, and when re-entry will commence.
 4. Persons evacuated under the PSN program will be returned to their homes after their homes are determined to be habitable.

F. Sheltering

1. Within the City of North Port are six hurricane evacuation centers and two medical dependent persons' centers which are operated by the Sarasota County Health Department and School Board of Sarasota County. The City of North Port will support those centers with fire inspection, law enforcement and emergency medical personnel as needed.

2. Sheltering of Emergency Worker Families

The City of North Port has draft a plan for an emergency worker family center program. At the inception of an event, City department heads are to poll their employees to find out how many spaces their employees' families might need should they need to work in the EOC (or elsewhere in the County) during a disaster.

3. Refuges of Last Resort

The Emergency Management Director, based on the authority granted in the Governor's declaration, will authorize that identified facilities be commandeered for use as refuges of last resort. Refuges of Last Resort are structures/buildings designated as the best possible accommodation for

people who cannot or do not evacuate in time to reach safe public evacuation centers. Refuges provide no special accommodations such as food, water, security, first aid, or parking. These structures are not guaranteed to be structurally sound in strong hurricane situations; however, they are deemed better than persons trapped on the road in their vehicle during strong winds and rising waters. Refuges are viewed as a last resort until the hurricane or other disaster passes.

G. Mutual Aid Agreements and Memoranda of Understanding

1. The City of North Port is a signatory to the Florida Statewide Mutual Aid Assistance program (see Appendix D) and the Florida Fire Chiefs Association's Statewide Emergency Response Plan. When resource needs beyond the capabilities of the City are identified, all mutual aid requested will be processed through the Sarasota County Emergency Operations Center.
2. Given availability of resources, City of North Port assets may respond to requests for assistance, received through the appropriate channels. Requests for mutual aid will be directed to the appropriate signatory of the inter-local mutual aid agreement. If mutual aid is required for which no agreement has been pre-established, the request will be forwarded to Sarasota County Emergency Management.
3. Various municipal departments may enter mutual aid agreements specific to their needs. All mutual aid agreements, whether called letters of agreement, memoranda of understanding, or other designation will be reviewed by the City Attorney prior to the City becoming a signatory.
4. If Florida Statutes so requires, or the City Attorney believes it appropriate, a specific mutual aid agreement may be required to have the approval of the City Commission prior to the City becoming a signatory.
5. When appropriate, the City will seek financial reimbursement from the requesting agency.
6. The North Port EOC is the coordination point (i.e., agency dispatch) for mutual aid activities for assets of the City when the CEMP has been activated.

H. Communications

1. Establishment of Plain Language Communications
 - a. During disaster operations when mutual aid resources are operating, personnel will use common terms and definitions that can be understood by individuals from all responder disciplines. When communicating with others, all personnel shall employ “plain speak” or “clear text” language. The use of 10-codes, signals or other jargon is prohibited.
 - b. Personnel will also use commonly accepted language that is consistent with policies, plans or procedures in the NIMS, NRF, or CEMP (State, County or City) to facilitate multi-agency, multi-disciplinary or multi-jurisdictional communications during an incident.
 - c. Standardized terminology will also be used in all publications.
2. Telephone
 - a. All command and supervisory personnel are issued cellular smartphones.
 - b. The City EOC has landline telephone and facsimile services.
 - c. Prior to full activation of the EOC, a listing of all key personnel and their contact numbers shall be widely distributed.
 - d. In the event of a loss of landline and cellular telephone communication, two satellite telephones are available from the Police Department. Additional satellite-based telephone units are available from the Sarasota County EOC.
3. Radio
 - a. All Fire Rescue and Police Department units and some Public Works’ and Utilities vehicles have the capability to communicate on the County’s 800 MHz radio system, on their respective talkgroups. Fire Rescue also maintains a VHF system for communications with the Florida Forest Service and as a back-up to the 800 MHz system.
 - b. During an emergency or disaster, units on the 800 MHz system may operate off the County’s “wide-area” talkgroups (A-10 to A-15) for mutual aid or mission-specific purposes. In addition, units may

operate on the State Mutual Aid channel (Fire Rescue talkgroup B-10) and the National Public Safety Radio channels (Fire Rescue talkgroups B-11 to B-15) to communicate with out-of-county resources.

- c. In the event of an 800 MHz system failure, units shall switch to the talk-around channels (Fire Rescue talkgroups B-7, B-8 or B-9), and relay information to Dispatch via Command.
- d. Combination satellite radio/telephone units are available from the Sarasota County EOC should all land-based communications fail. Two satellite phones are available from the North Port Police Department.

4. Data

- a. The City has internet functionality provided by Verizon FIOS, Comcast cable access and broadband wireless connections.
- b. The City EOC has wired and wireless network/internet capability.
- c. When requested to report to the EOC, City personnel shall bring their City-issued laptop and smartphone (which may be tethered to provide a last-resort measure of internet connectivity).

I. Fuel

1. Availability During Normal Conditions

- a. During normal operations, the City of North Port may purchase motor vehicle fuel from local service stations using a fleet credit card.
- b. Fleet Management maintains a supply of 10,000 gallons of gasoline and 20,000 gallons of diesel fuel at the facility at 1100 N. Chamberlain Blvd and 5455 Pan American Blvd.
- c. Road and Drainage has vehicles with 100-gallon L-tanks with diesel fuel. They also have a portable fuel trailer with the capability of holding 500 gallons of fuel. This unit would be topped off and if necessary driven out of the City of North Port until the effective scope of the storm until the storm passes.

2. Availability During Emergency Conditions

- a. During the preparatory stages of an event, Fleet will ensure the tanks are full and their generator functional.
 - b. Prior to a storm, an email would be issued by Fleet reminding all employees to immediately top-off their tanks at the local gas stations.
 - c. If, during an emergency, City vehicles are unable to obtain fuel from a commercial source, they will be permitted to fuel at the Fleet Management facility.
 - d. The City has a fuel supplier who can obtain fuel from any refinery and has multiple contracts with almost every fuel shipping vendor in the state. They also give priority to local governments over retail establishment.
 - e. If necessary, the City may request the fuel truck from Sarasota County.
- J. Community Emergency Response Team. The City of North Port Emergency Management is the primary liaison to the North Port Community Emergency Response Team and neighborhood-based teams at Islandwalk and Cypress Falls. Membership consists of individuals who have completed the 21-hour CERT training program and have applied to become a member.

There are three levels of membership:

- Level 1-Trained but inactive: Applies to those who have completed CERT basic training to gain knowledge about preparing for and surviving a disaster and responding to the post disaster needs of their family and neighbors. These are individuals who do not want to be part of the North Port CERT organization and will not be part of the NP CERT City response plan.
- Level 2-Trained with basic skills: Applies to those who have completed CERT basic training and meet the membership eligibility requirement of the North Port CERT organization. These individuals will, after taking care of their families and neighbors, respond to other neighborhoods as members of a district team if necessary. To qualify as a Level 2 a person must be certified in CPR/AED and Advanced First Aid per either the American Heart Association or the

Red Cross curriculum [SB2]and must have completed ICS100 and ICS700 training.

- Level 3-Trained with advanced skills: Applies to those who have completed CERT basic training, training in more advanced skills and meet the membership eligibility requirements of the North Port CERT organization. These individuals will be part of the North Port CERT response plan. To qualify as a Level 3 a person must have been a Level 2 for a minimum of six months and must have completed the recommended training protocols and agreed to abide by the guidelines outlined in the organization's standard operation procedures (SOPs) and standard operating guidelines (SOGs) in any of the six emergency response and community support disciplines outlined below.
 - i. Communications - Includes Amateur Radio licensure and/or communications equipment training in accordance with the communications needs of NP CERT and the City of North Port. Members of this team might be called upon to provide communications links between NP CERT teams and the City of North Port Emergency Operations Center (NPEOC) or the NPEOC and other disaster response agencies.
 - ii. Damage Assessment - Includes training in the County's and City's damage assessment process in accordance with the needs of the City of North Port. Members of this team are assigned as scribes and ride along as part of a three-member team assessing the damage to properties throughout the City.
 - iii. Grid Search - Includes pattern search training. Training to be provided by an agency approved/recognized by the City of North Port. Members of this team would participate as part of a large-scale search rescue operation under the direction of a law enforcement or fire rescue agency.
 - iv. Medical Operations - Includes an acceptable level of medical response training to include applicable American Heart Association, Red Cross, Sarasota County Department of Health or other recognized current first responder training programs, including EMT/Paramedic. Members of this team would provide stand-alone first aid/medical

services in times of overwhelming community need exceeding CERT basic training skills.

- v. Neighborhood Point of Distribution (NPOD) - Includes training in establishing and managing a NPOD per the City of North Port's Comprehensive Emergency Management Plan and North Port Emergency Management SOP 200.001. Members of this team would lead/assist in the operations of a NPOD which includes handing out water, ready-to-eat meals, tarps and ice to citizens, keep track of inventory, ordering more inventory, managing the NPOD rehab area, assigning duties to on-site personnel, overseeing the safety and wellbeing of on-site personnel, and working with other agencies such as North Port Police, North Port Fire Rescue, other City departments, etc.
- vi. Center Support - Includes training by Red Cross for emergency center management and operations in times of community or disaster deployment. Members of this team would provide support to the center management or medical staff as appropriate.

Organization, management and operation of CERT will be under the direction of the CERT Volunteer Coordinator from each team with support provided by City Emergency Management. CERT members shall follow the policies and procedures described in the CERT Operations Manual. In no cases, will a CERT member self-deploy to a mission within or outside of the City of North Port.

K. Public Emergency Notification.

The ability to save lives and protect property during an emergency activation depends upon rapid, accurate, and coordinated information distribution to all segments of the population utilizing all available distribution mechanisms. The City's Management Team, comprised of directors of each of the City's departments, will meet periodically before, during and after an emergency to minimize conflicting information being disseminated to the public. A Crisis Communication Plan has been developed and attached to the Plan as Appendix G. The Plan outlines the roles, responsibilities and protocols that will guide the City in promptly sharing information with all of City's audiences during an emergency or crisis.

- 1. Media Releases. The PIO prepares and distributes regular press releases, schedules press briefings and media interviews. All press releases must be reviewed and approved by the Incident Commander prior to distribution.

2. Emergency Alert System (EAS). The Emergency Alert System (EAS) is a national public warning system that requires TV and radio broadcasters, cable television systems, wireless cable systems, satellite digital audio radio service (SDARS) providers, direct broadcast satellite (DBS) service providers and wireline video service providers to offer to the President the communications capability to address the American public during a national emergency. The system also may be used by state and local authorities to deliver important emergency information such as AMBER (missing children) alerts and emergency weather information targeted to a specific area.

a. Primary and Back-Up Warning Systems - During periods of County Emergency Operation Center activations, WMTX 100.7 FM (the LP1 and LP2A stations), WWRM 94.9 FM (the LP2B station), WHPT 102.5 FM (the LP2C station) and local government access (Comcast cable channel 19, Verizon FIOS channel 32) may broadcast directly from Sarasota County. Other EAS Operational Stations in Sarasota County include:

WKXY AM 930	WJIS FM 88.1
WFLA AM 970	WLTQ FM 92.1
WTMY AM 1280	WKZM FM 104.3
WDDV AM 1320	WCTQ FM 106.5
WSDV AM 1450	WSRZ FM 107.9

b. All other media sources will be fed information from the City EOC via facsimile or email.

c. Television customers will see the warning as a “crawl” at the bottom of the TV screen. The Weather Channel (Comcast cable channel 31 and 522, Verizon FIOS channel 119) routinely transmits all warnings for this area on receipt.

d. The National Weather Service Office in Tampa Bay will activate the EAS on request of the City EOC.

e. A low-wattage radio station serving the North Port-area, WKDW at 97.5 FM and live internet stream via <http://kdwradio.com/> may provide City-specific information during emergencies.

3. Interpreter for the Deaf and Foreign Language Translators. During activations, the EOC may be staffed by an interpreter for the hearing

impaired and translators for the Spanish and Ukrainian speaking population of the City. The Sarasota County Public Safety Communication's Center and City of North Port Police Department dispatch use TDD equipment for providing information to the hearing impaired.

4. Internet Website. An Internet website containing City of North Port emergency management information that would be of interest to the public and official agencies is available. This information is regularly updated, especially when the EOC is activated.
5. Direct Notification. If necessary due to a nighttime threat or a quickly escalating threat to residents, sirens and loudspeakers from police and fire vehicles may be utilized to warn the public of impending flood conditions, tornado potential, or hazard materials spill. Vehicles with sirens will pass through the threatened neighborhood to awaken the public with instructions to tune into local media stations for further information on the impending dangers.
6. City Contact Center. During an emergency/disaster that may affect parts of the City, a team of telephone operators will be assembled near the EOC to provide information to the public. At least one of the operators may be bilingual (to include Spanish and Ukrainian).
7. Telephone Notification System. Emergency Management operates the North Port Community Notification System (CodeRED®) which is an emergency notification system for recorded messages, text and email.
8. Social Media. The City of North Port provides routine and emergency information via Twitter and Facebook.

VI. FISCAL MANAGEMENT

- A. It is the practice of City of North Port employees to use the same process to fill-out and file financial reports in daily activities as it is during emergency situations. These procedures are compatible with State and Federal financial procedures. City and County finance agents work together to ensure continuity in financial procedures during emergency and disaster events; however, FS §252.38(2) states a municipality is not required to coordinate requests for reimbursement under Federal public disaster assistance programs.
- B. The City's Finance Department will work as a team to support preparedness, response, recovery, and mitigation activities on an everyday basis. This includes any training and guidance as needed. All disaster costs will be captured and handled through a Disaster/Emergency Account established by the Finance Department.
- C. The City's Purchasing Division will provide procurement support for supplies, facilities, equipment, and supplies needed by City agencies. Items that may be included are meals, vehicle repair parts, construction materials, and rental equipment. Under Section 2-408, Emergency Procurement, of the Code of the City of North Port, the normal competitive process is waived, and the purchase of certain equipment and contracts is authorized with the approval of the department director, City Manager or City Commission, depending on the cost.
- D. City emergency operations are initially funded by the budgeted allocations of each department engaged in emergency operations.
- E. The City may allocate and expend funds as appropriate for local emergency operations in accordance with FS §252.37. As a rule, funding availability may be assumed for all emergency response efforts.
- F. Close expenditure controls must be exercised during any emergency operation. The City Manager, operating from the EOC, is the screen point for expense authorization. The City Purchasing Manager will provide technical overview of this area. No emergency staff shall make funding commitments without the coordination of the Finance Department director and City Manager.
- G. Complete and accurate accounts of emergency expenditures and obligations, including personnel and equipment costs, must be maintained. Accounting is required on a daily (sometimes more regular) basis to identify and document personnel costs, supplies and materials used, and equipment hours committed to each specific preparation, response and recovery task. Equipment use charges must be associated with an equipment operator. All personnel hours must be identified with a specific and definable task. When responding to another

jurisdiction for mutual aid, the responding party must obtain a mission number or tracking number which will be used to identify costs. Once costs are figured at the end of the event, the department head shall forward all costs to the Cost Unit Leader, who shall then forward any costs to the hosting jurisdiction. In cases of mutual aid requests from the State, City Finance shall forward costs, along with the appropriate paperwork to the Florida Division of Emergency Management (FDEM). Required forms may be obtained from City Emergency Management.

- H. Following an event, the City Emergency Management will coordinate with all departments and volunteers to compile costs and proper documentation needed for reimbursement under Public Assistance procedures. A member of the City Finance Department, Emergency Management, and pertinent department officials will be present during the reimbursement application process with FEMA and/or FDEM.
- I. When Federal Public Assistance is provided under the Stafford Act, local projects approved by the FEMA are subject to both State and Federal audit (except small projects approved under Section 419 of Public Law 92-288 which require only Federal inspection).
- J. There are several funding agreements that are made available to counties and other local jurisdictions during peacetime, as well as disasters. Most of these agreements come in the form of grants. The following is a list of examples of funding agreements that can and/or will assist the City of North Port in emergency and disaster mitigation, preparedness, response, and recovery:
 - 1. Emergency Management Preparedness and Assistance (EMPA) Competitive Grant. This is a competitive grant for which municipalities may opt to apply for each year. This competitive grant, sponsored by the Florida Division of Emergency Management, awards monies to communities who submit projects that will enhance emergency management capabilities on local, regional, and state levels. Submitted projects can consist of mitigation activities, preparedness activities, response capability upgrades, and recovery needs. Once projects are submitted, they are reviewed for consistency with State and local plans and awarded points to establish a priority of projects. Each year, the City reviews its list of projects and decides on sufficiency and rationality of submitting a project to this grant process.
 - 2. Program/Technical Funding. On occasion, funding becomes available from the State to implement programs on the local level. The City of North Port uses monies from these funding sources as necessary to enhance its program capabilities.

3. Mitigation Program Funding. This category includes programs such as the Flood Mitigation Assistance Program (FMAP) and the Hazard Mitigation Grant Program (HMGP). The City reviews its situation annually to determine if there are any outstanding projects which might qualify for these types of programs. Once identified, the City works with the property owners to fill out an application for these programs and submits the application on behalf of the property owner. If the application is approved, the City enters an agreement with the State of Florida to oversee and manage the project and reimbursement process. The City of North Port works with the Florida Division of Emergency Management to identify funding sources that can be used to implement programs and enhance already-existing programs. Any programs that are made available are reviewed by the City Emergency Management and used as needed to enhance emergency mitigation, preparedness, response, and recovery capabilities in the City of North Port.

IX. AUTHORITIES AND REFERENCES

- A. Primary Enabling Legislation
 - 1. Florida Statutes, Chapter 252 which delineates specific local responsibilities regarding emergency management.

- B. Applicable Laws, Ordinances, Rules and other Regulations
 - 1. Federal Statutes, Regulations and Directives
 - a. Homeland Security Presidential Directive 8
 - b. Public Law 93-234, Flood Disaster Protection Act of 1973
 - c. Public Law 106-390, Disaster Mitigation Act of 2000
 - d. Public Law 99-499, Community Right to Know Act of 1986
 - e. Public Law 95-510, Comprehensive Emergency Response, Compensation and Liability Act of 1980
 - f. Public Law 84-99, Flood Emergencies (1976)
 - g. Public Law 89-665, National Historic Preservation Act (1966)
 - h. National Flood Insurance Act of 1968
 - i. 44 CFR Parts 59-76, National Flood Insurance Program
 - j. 44 CFR Part 206, Federal Disaster Assistance
 - k. National Response Framework
 - 2. *Constitution of the State of Florida*
 - a. Article VIII S.2(b), Municipal Powers
 - 3. State of Florida Statutes
 - a. Chapter 23, Florida Mutual Aid Act (1998)
 - b. Chapter 119, Public Records

- c. Chapter 125, County Government
- d. Chapter 252, Emergency Management
4. State of Florida References
 - a. State of Florida Comprehensive Emergency Management Plan and Administrative Rules, Chapter 9G-2
 - b. Southwest Florida Regional Planning Council, Local Emergency Planning Committee Plans and Standard Operating Procedures
 - c. State of Florida Hazard Mitigation Plan
 - d. Florida Fire Chiefs Association's Statewide Emergency Response Plan
5. Sarasota County References
 - a. Sarasota County Comprehensive Emergency Management Plan, and accompanying Standard Operating Procedures
 - b. Sarasota County Unified Local Mitigation Strategy 2015
6. City of North Port References
 - a. Charter and Code of the City of North Port
 - b. [General Services](#)[Human Resources](#) Department, Risk Management Manual
 - c. Human Resources Department, Personnel Rules and Regulations
 - d. Finance Department, Claims Handling Procedures
 - e. Fire Rescue, Standard Operations Guidelines
 - f. Police Department, Emergency Operations
 - g. Utility Department, Standard Operating Procedures

7. Other References

- a. U.S. Coast Guard, Tampa, Area Contingency Plan for Oil and Hazardous Materials Substance Pollution Response
- b. National Response Framework
- c. National Wildfire Coordinating Group, Incident Command System forms

X. GLOSSARY

- A -

After Action Report (AAR). The AAR documents the performance of exercise related tasks and makes recommendations for improvements. The Improvement Plan outlines the actions that the exercising jurisdiction(s) plans to take to address recommendations contained in the AAR.

Assembly Site. A pre-identified temporary field site.

- B -

- C -

Call Tree. A matrix of people and their telephone numbers, with instructions on who should call whom, and in what order.

Common Communication Plan (CCP). An interoperable communications plan designed to be utilized for multi-agency and multi-jurisdictional incident management operations. All entities involved in managing the incident will utilize common terminology, prescribed by the NIMS, for communications.

Comprehensive Emergency Management (CEM). An integrated approach to the management of emergency programs and activities for all four emergency phases (mitigation, preparedness, response, and recovery), for all types of emergencies and disasters (natural, manmade, and attack), and for all levels of government (local, state, and Federal) and the private sector. A CEM program supports the mission, vision, and strategic goals of the organization to ensure the safety of patients, staff, and resources, and provides for COOP in the event of a disaster or emergency that affects the organization. The overall goal of CEM is the prevention or minimization of the loss of life and injuries, and the provision for the continuity of the organization's critical operations.

Contingency. A future event that is likely but not certain to happen. The consequences of the occurrence are such that one must prepare for the event.

Contingency Plan. Describes how an agency intends to respond to events, which disrupts normal operations. It provides instructions on how to perform recovery tasks to continue essential functions.

Continuity of Operations (COOP). An internal effort within an organization to assure that the capability exists to continue essential business functions across a wide range of potential emergencies, including localized acts of nature, accidents, and technological and/or attack/terrorist-related emergencies. In addition to the CEM phase of mitigation, preparedness,

response and recovery, COOP planning includes resumption and restoration phases. The goal of COOP is that an effective CEM process would guarantee that critical business functions would continue without interruption. COOP adds a resumption phase that identifies efforts that are directed to restoring the organization's critical operations if a disaster or emergency disrupts essential functions.

Continuity of Operations Plan. Describe activities that will enable an agency to continue to perform essential functions after a disruption has occurred.

Corrective Actions. Improved procedures that are based on lessons learned from actual incidents or from training and exercises.

Critical Infrastructure. Systems and assets, whether physical or virtual, so vital to the United States that the incapacity or destruction of such systems and assets would have a debilitating impact on security, national economic security, national public health or safety, or any combination of those matters.

- D -

Damage Assessment. An appraisal or determination of the effects of the disaster on human, physical, economic, and natural resources.

Direction, Control and Coordination. Development of the capability for the chief executive and key staff to direct, control and coordinate response and recovery operations.

Disaster. Accidental or uncontrollable events, actual or threatened, that are concentrated in time and space, in which a society undergoes severe danger and incurs such losses to its members and physical appurtenances that the social structure is disrupted and the fulfillment of all or some of the essential functions of the society is prevented.

Disaster Levels.

- Minor

An occurrence which may be managed by the resources of the City with some inter-local mutual aid support.

- Major

An occurrence of such magnitude that the County Board of Commissioners has declared a Local State of Emergency. All County resources are utilized and mutual aid from other counties, or the State of Florida, are likely. The Governor may have issued a Disaster Declaration.

- **Catastrophic**

An occurrence of such magnitude that several counties have been impacted. The Governor has most likely issued a Disaster Declaration. Federal resources may have been requested and a Disaster Declaration may have been issued by the President.

- E -

Education, Training and Exercises. Assessment, development, and implementation of a training or educational program and evaluation of emergency response plans and capabilities through a program of regularly scheduled tests and exercises.

Emergency. An unexpected, serious occurrence or situation urgently requiring prompt action.

Emergency Management. The discipline and the profession of applying science, technology, planning, and management to deal with extreme events that can injure or kill large numbers of people, do extensive damage to property and disrupt community life.

Emergency Management Program. A program that implements the mission, vision, and strategic goals and objectives as well as the management framework of the program and organization.

Emergency Management Team. Individuals that are authorized to declare a disaster and activate the Continuity of Operations Plan (COOP). The purpose of this team is to provide immediate and ongoing coordination of the contingency and recovery processes during an interruption in service.

Entry-level First Responders. Entry-level first responders are defined as any responders who are not a supervisor or manager.

Essential Functions. Functions that must occur to enable a department or agency to perform services.

Exercise. Exercises are a planned and coordinated activity allowing homeland security and emergency management personnel—from first responders to senior officials—to demonstrate training, exercise plans, and practice prevention, protection, response, and recovery capabilities in a realistic but risk-free environment. Exercises are a valuable tool for assessing and improving performance, while demonstrating community resolve to prepare for major incidents.

Evaluations. Tools used after exercises or actual events to document strengths and weaknesses in a jurisdiction's preparedness, e.g., Lessons learned or after-action reports.

- F -

Finance and Administration. Development of fiscal and administration procedures to support

emergency measures before, during, and after disaster events and to preserve vital records.

- G -

- H -

Hazard. Natural, technological, or civil threats to people, property, and the environment.

Hazard Identification and Risk Assessment. The process of identifying situations or conditions that have the potential of causing injury to people, damage to property, or damage to the environment, and the assessment of the likelihood, vulnerability and magnitude of incidents that could result from exposure to hazards.

Hazard Management. Systematic management approach to eliminate hazards that constitute a significant threat to the entity or to reduce the effects of hazards that cannot be eliminated through a program of hazard mitigation.

Homeland Security Exercise and Evaluation Program (HSEEP). A capability- and performance-based exercise program that provides a standardized policy, methodology, and language for designing, developing, conducting, and evaluating all exercises. HSEEP also facilitates the creation of self-sustaining, capabilities-based exercise programs by providing tools and resources such as guidance, training, technology, and direct support

- I -

Incident Action Plan (IAP). An oral or written plan containing general objectives reflecting the overall strategy for managing an incident.

Incident Command System (ICS). A standardized organizational structure used to command, control, and coordinate the use of resources and personnel that have responded to the scene of an emergency. The concepts and principles for ICS include common terminology, modular organization, integrated communication, unified command structure, consolidated action plan, manageable span of control, designated incident facilities, and comprehensive resource management. It's sometimes referred to as the National Incident Management System.

Information Technology (IT). Applied computer systems - both hardware and software, and often including networking and telecommunications, usually in the context of a business or other enterprise.

Interoperable. A principle of the NIMS that holds that systems must be able to work together and should not interfere with one another if the multiple jurisdictions, organizations, and functions that come together under the NIMS are to be effective in domestic incident management. Interoperability and compatibility are achieved through the use of such tools as common communications and data standards, digital data formats, equipment standards, and

design standards.

- J -

Joint Information Center (JIC). A facility established to coordinate all incident-related public information activities. It is the central point of contact for all news media at the scene of the incident. Public information officials from all participating agencies should collocate at the JIC.

Joint Information System (JIS). Integrates incident information and public affairs into a cohesive organization designed to provide consistent, coordinated, timely information during a crisis or incident operations. The JIS provides a structure for developing and delivering coordinated interagency messages; developing, recommending, and executing public information plans and strategies on behalf of the Incident Commander (IC); advising the IC concerning public affairs issues that could affect a response effort; and controlling rumors and inaccurate information that could undermine public confidence in the emergency response effort.

- K -

- L -

Laws and Authorities. Federal, state, and local statutes and any implementing regulations that establish the legal authority for the development and maintenance of the emergency management program and organization, and define the emergency powers, authorities and responsibilities of the chief executive official and the emergency program manager.

Lessons Learned. Knowledge gained through operational experience (actual events or exercises) that improve performance of others in the same discipline.

Logistics and Facilities. Identification, location, acquisition, distribution, and accounting for services, resources, materials and facilities to support emergency management.

- M -

Multi-Agency Coordination System (MACS). A MACS is a combination of facilities, equipment, personnel, procedures, and communications integrated into a common system with responsibility for coordinating and supporting domestic incident management activities.

Mitigation. Activities taken to eliminate or reduce the degree of risk to life and property from hazards, either prior to or following a disaster or emergency.

- N -

National Response Framework (NRF). A planning tool mandated by HSPD-5 that integrates National domestic prevention, preparedness, response, and recovery plans into one all-discipline, all-hazards plan.

NIMS Compliance Assistance Support Tool (NIMSCAST). The NIMSCAST will be a self-assessment instrument for State, territorial, tribal, local, private sector, and non-governmental organizations to evaluate and report their jurisdiction's achievement of all NIMS implementation activities.

No-Notice Event/ Incident. An occurrence or event, natural or human-caused, that requires an emergency response to protect life or property (i.e., terrorist attacks and threats, wild land and urban fires, floods, hazardous materials spills, nuclear accident, aircraft accident, earthquakes, hurricanes, tornadoes, public health and medical emergencies etc.)

- O -

Operations and Procedures. Development, coordination, and implementation of operational policies, plans, and procedures.

- P -

Planning. The collection, analysis, and use of information, and also the development, promulgation, and maintenance of the organizational comprehensive emergency management plan, action plans and mitigation plans.

Plain Language. Common terms and definitions that can be understood by individuals from all responder disciplines. The intent of plain language is to ensure the clear and accurate communication of information during an incident.

Preparedness. Activities, programs, and systems developed prior to a disaster or emergency that are used to support and enhance mitigation of, response to, and recovery from disasters or emergencies.

Preplanned Event. A non-emergency activity. ICS can be used as the management system for a wide range of events, e.g., parades, concerts, or sporting events.

Public Information. Procedures to disseminate and respond to requests for pre-disaster, disaster, and post-disaster information involving employees, the public and the media. Also, an effective public education program regarding hazards affecting the jurisdiction.

- Q -

- R -

Records Management. The planning, controlling, directing, organizing, training, promoting, and other managerial activities involved with respect to records creation, records maintenance and use, and records disposition in order to achieve adequate and proper documentation of the policies and transactions of the Federal government and effective and economical management of agency operations.

Recovery. Activities and programs designed to return the entity to an acceptable condition.

Resource Management. Systematic development of methodologies to assure the prompt and effective identification, distribution, accounting, and use of personnel and major items of equipment for essential emergency functions.

Resource Typing. Resource typing is the categorization of resources that are commonly exchanged through mutual aid during disasters. Resource typing definitions help define resource capabilities for ease of ordering and mobilization during a disaster.

Response. Activities designed to address the immediate and short-term effects of the disaster or emergency.

Response Asset Inventory. An inventory of the jurisdiction's resources that have been identified and typed according to NIMS Resource Typing Standards. Development of a Response Asset Inventory requires resource typing of equipment, personnel, and supplies identified in the inventories of City resources.

Response Assets/Resources. Response Resources are defined as assets that include equipment, personnel and supplies that are available for use during an incident.

Risk. The probability that a hazard will occur.

- S -

Saffir-Simpson Scale. The Saffir-Simpson Hurricane Scale is a 1-5 rating based on the hurricane's present intensity. This is used to give an estimate of the potential property damage and flooding expected along the coast from a hurricane landfall. Wind speed is the determining factor in the scale, as storm surge values are highly dependent on the slope of the continental shelf and the shape of the coastline, in the landfall region. Note that all winds are using the U.S. 1-minute average.

Category One Hurricane: Winds 74-95 mph (64-82 knot or 119-153 km/hour). Storm surge generally 4-5 feet above normal. No real damage to building structures. Damage primarily to unanchored mobile homes, shrubbery, and trees. Some damage to poorly constructed signs. Also, some coastal road flooding and minor pier damage.

Category Two Hurricane: Winds 96-110 mph (83-95 knot or 154-177 km/hour). Storm surge generally 6-8 feet above normal. Some roofing material, door, and window damage of buildings. Considerable damage to shrubbery and trees with some trees blown down. Considerable damage to mobile homes, poorly constructed signs, and piers. Coastal and low-lying escape routes flood 2-4 hours before arrival of the hurricane center. Small craft in unprotected anchorages break moorings.

Category Three Hurricane: Winds 111-130 mph (96-113 knot or 178-209 km/hour). Storm surge generally 9-12 feet above normal. Some structural damage to small residences and utility buildings with a minor amount of curtain-wall failures. Damage to shrubbery and trees with foliage blown off trees and large trees blown down. Mobile homes and poorly constructed signs are destroyed. Low-lying escape routes are cut by rising water 3-5 hours before arrival of the center of the hurricane. Flooding near the coast destroys smaller structures with larger structures damaged by battering from floating debris. Terrain continuously lower than 5 feet above mean sea level may be flooded inland 8 miles (13 km) or more. Evacuation of low-lying residences with several blocks of the shoreline may be required.

Category Four Hurricane: Winds 131-155 mph (114-135 knot or 210-249 km/hour). Storm surge generally 13-18 feet above normal. More extensive curtain-wall failures with some complete roof structure failures on small residences. Shrubs, trees, and all signs are blown down. Complete destruction of mobile homes. Extensive damage to doors and windows. Low-lying escape routes may be cut by rising water 3-5 hours before arrival of the center of the hurricane. Major damage to lower floors of structures near the shore. Terrain lower than 10 ft above sea level may be flooded requiring massive evacuation of residential areas as far inland as 6 miles (10 km).

Category Five Hurricane: Winds greater than 155 mph (135 knot or 249 km/hour). Storm surge generally greater than 18 feet above normal. Complete roof failure on many residences and industrial buildings. Some complete building failures with small utility buildings blown over or away. All shrubs, trees, and signs blown down. Complete destruction of mobile homes. Severe and extensive window and door damage. Low-lying escape routes are cut by rising water 3-5 hours before arrival of the center of the hurricane. Major damage to lower floors of all structures located less than 15 feet above sea level and within 500 yards of the shoreline. Massive evacuation of residential areas on low ground within 5-10 miles (8-16 km) of the shoreline may be required.

Standardized Equipment List (SEL). A list issued annually to promote interoperability and standardization across the response community at the local, state, and Federal levels by offering a standard reference and a common set of terminology. It is provided to the responder community by the Interagency Board for Equipment Standardization and Interoperability (IAB). The SEL contains a list of generic equipment recommended by the IAB to organizations in preparing for and responding to all-hazards.

Standard Operating Procedures or Guidelines (SOP or G). A complete reference document that details the procedures or guidelines for performing a single function or several interdependent functions.

Standardized Terminology. Commonly accepted language that is consistent with policies, plans, or procedures in the NIMS and NRP to facilitate multi-agency, multi-disciplinary or multi-jurisdictional communications during an incident.

- T -

Task. An action that is performed to complete an essential function.

- U -

- V -

Vulnerability. The susceptibility to injury and damage from hazards.

- W - X - Y - Z -

XI. ACRONYMS

This list is not designed to be an authoritative source, merely a handy reference. Certain organizations and terms listed herein are obsolete but are included because they may still appear in publications and other correspondence.

AAR	After Action Report
ALF	Assisted Living Facility
ARES	Amateur Radio Emergency Services
CAP	Civil Air Patrol
CCP	Crisis Communications Plan
CEMP	Comprehensive Emergency Management Plan
CERT	Community Emergency Response Team
CISD	Critical Incident Stress Debriefing
CNP	City of North Port
COG	Continuity of Government
COOP	Continuity of Operations
CRS	Community Rating System
DACS	[FL] Department of Agriculture and Consumer Services
DBPR	[FL] Department of Business and Professional Regulations
DEM	[FL] Division of Emergency Management
DEP	[FL] Department of Environmental Protection
DFO	Disaster Field Office
DHS	[US] Department of Homeland Security
DMAT	Disaster Medical Assistance Team
DMORT	Disaster Mortuary Response Team
DMS	[FL] Department of Management Services
DOC	[FL] Department of Corrections
DOH	[FL] Department of Health
DOT	[FL] Department of Transportation
DRM	Disaster Recovery Manager
DSCO	Deputy State Coordinating Officer
DST	Damage Survey Team
EAS	Emergency Alert System
ECO	Emergency Coordination Officer
EHS	Extremely Hazardous Substance
EM	Emergency Manager
EMAC	Emergency Management Assistance Compact
EMPA	Emergency Management Preparedness and Assistance
EMS	Emergency Medical Services
EMT	Emergency Medical Technician
EOC	Emergency Operations Center
EPA	[US] Environmental Protection Agency
ERT	Emergency Response Team

ESATCOM	Emergency Satellite Communications System
ESF	Emergency Support Function
F-SERT	Forward State Emergency Response Team
FAC	Florida Administrative Code
FBI	Federal Bureau of Investigation
FCO	Federal Coordinating Officer
FDLE	Florida Department of Law Enforcement
FEMA	Federal Emergency Management Agency
FEPA	Florida Emergency Preparedness Association
FFCA	Florida Fire Chiefs Association
FHP	Florida Highway Patrol
FLNG	Florida National Guard
FMAP	Flood Mitigation Assistance Program
FPCA	Florida Police Chiefs' Association
FP&L	Florida Power & Light Company
FRP	Federal Response Plan
FSERT	Forward State Emergency Response Team
FS	Florida Statutes
GIS	Geographic Information System
HMGP	Hazard Mitigation Grants Program
HSEEP	Homeland Security Exercise and Evaluation Program
IAP	Incident Action Plan
ICS	Incident Command System
IMT	Incident Management Team
JIC	Joint Information Center
LSA	Logistical Staging Area
LMS	Local Mitigation Strategy
MACS	Multi-Agency Coordination System
MHz	Megahertz
MME	Mass Migration Event
MOU	Memorandum of Understanding
MSU	Medical Support Unit
NAWAS	National Warning System
NFIP	National Flood Insurance Program
NOAA	National Oceanic Atmospheric Administration
NWS	National Weather Service
PAO	Public Assistance Officer
PDA	Preliminary Damage Assessment
PDAT	Preliminary Damage Assessment Team
PIO	Public Information Officer
PSN	Person with Special Needs
PW	Project Worksheet
RIAT	Rapid Impact Assessment Team
ROC	Regional Operations Center

RPA	Request for Public Assistance
RRT	Rapid Response Team
SAR	Search and Rescue
SBA	Small Business Administration
SCO	State Coordinating Officer
SEL	Standard Equipment List
SEOC	State Emergency Operations Center
SERT	State Emergency Response Team
SOG	Standard Operating Guideline
SOP	Standard Operating Procedure
SMO	State Mitigation Officer
SWFWMD	Southwest Florida Water Management District
SWO	State Warning Office
TDD	Telecommunications Device for the Deaf
USAR	Urban Search and Rescue
VHF	Very High Frequency
VOAD	Voluntary Organizations Active in Disasters

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CITY OF NORTH PORT
COMPREHENSIVE EMERGENCY MANAGEMENT PLAN
ANNEXES

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ANNEX A

RECOVERY ACTIVITIES

- I. General. In the post-disaster phase of a disaster, the Emergency Operations Center will manage, coordinate, control and direct the response and recovery efforts. The EOC charts in the Organizational Charts Appendix define the assumptions and functions associated with the EOC. The EOC will serve as the coordination point for establishing the Rapid Impact Assessment Teams (RIAT's), staging areas and other sites for coordinated assistance. The EOC will be manned by representatives from each ESF and other agencies involved in the recovery process. The EOC will be organized consistent with the state and federal response and recovery systems.

Direction, control and coordination during the immediate recovery phase focuses on the following types of activities:

- Establishment of an inter-county recovery network designed to provide the support for movement of response actions, relief supplies and services into the county.
- Acquisition, allocation and administration of the distribution of emergency supplies including food, water, ice and medications.
- Managing post-event sheltering operations.
- Initiating preliminary damage assessment (airborne and ground), debris removal and the restoration of utilities.

The primary local coordinating agency for requesting resources and relief supplies and support within the City is Emergency Management.

- A. Sarasota County Emergency Management has primary responsibility for coordinating Countywide recovery efforts. The Emergency Management Chief will appoint the local representative to the Joint Field Office (JFO) and state recovery staff, upon activation of the JFO.
- B. The National Disaster Recovery Framework states that jurisdictions will designate a Local Disaster Recovery Manager (LDRM). For Sarasota County, the LDRM shall be appointed by the County administrator. The role of the LDRM is to organize, coordinate and advance the recovery at the local level. This position will manage and coordinate the redevelopment and rebuilding of the community. The LDRM should be able to represent and speak on behalf of the chief executives. The LDRM will serve as the county's primary point of contact with the State.
- C. For incidents that necessitate an LDRM, the Emergency Management chief will designate individuals with the necessary knowledge, skills and abilities to assist the LDRM with the task of redevelopment and rebuilding of the county. The LDRM

will coordinate the long-term recovery needs of the community utilizing a committee comprised of infrastructure, planning & development, emergency services, along with various volunteer organizations active in county disaster groups.

1. The Emergency Management Chief will request the State to participate in establishing Disaster Recovery Centers (DRCs) and will appoint a representative to the State Recovery Staff. Individual ESF's in the EOC will coordinate with their state counterparts during response and recovery operations. To assure the flow of accurate and timely recovery information, and to coordinate relief and recovery efforts, state and federal agencies will coordinate with the Local Disaster Recovery Manager in the EOC.
2. The Local Disaster Recovery Manager or designee will coordinate recovery activities with the municipalities. Individual ESF's in the EOC will coordinate with their municipal counterparts during response and recovery operations. To assure the flow of accurate and timely recovery information, and to coordinate relief and recovery efforts, municipalities will be encouraged to have representatives in the EOC.
3. All recovery activities are coordinated through the Local Disaster Recovery Manager and begin during the response phase with an evaluation of:
 - situation reports
 - mission assignments logged and tracked
 - municipal status update reports received from local governments
 - EOC briefings
 - local conference calls
 - impact assessment data, as well as other impact information received from other sources
 - damage reports received from citizens

These information sources are reviewed and monitored to start the identification of areas that should receive priority for damage assessment and human needs assessment. This gathering of intelligence sets the stage for the operational transition from response to recovery activities, which takes place as the incident begins to stabilize

4. The Coordinator for ESF-14 is the Public Information Officer (PIO) and is responsible for providing public information and education programs regarding the recovery effort and available local, state and federal assistance. The PIO will follow procedures established in ESF-14 Public Information for the dissemination of information as well as the EOC

ROG's/ROP's. The PIO will participate in the Joint Information Center (JIC). Public information programs will use all the resources outlined above in reaching the population in Sarasota County. Special efforts will be made to reach the hearing/sight impaired; non-English speaking or those that are not in touch with traditional communications outlets.

5. The Local Disaster Recovery Manager or designee is responsible for the county participation in the Disaster Recovery Center for the affected area. The Local Disaster Recovery Manager or designee will serve as the Special Projects Coordinator/County Recovery Center Coordinator to coordinate with state and federal individual assistance officers in the establishment of a Joint Field Office.
6. The Emergency Management Chief is responsible for the following items in support of the State of Florida RECON.
 - Pre-designation of helicopter landing zones for RECON aviation support. Landing zone locations (GPS coordinates) are listed in the Critical Facilities Inventory and have been transmitted to State of Florida Division of Emergency Management.
 - Pre-designation of staging areas and sites for RECON operations. Staging area locations (GPS coordinates) have been transmitted to State of Florida Division of Emergency Management.
7. The City utilizes the established process under the Stafford Act, as amended by the Disaster Mitigation Act 2002, for obtaining and administering state and federal disaster assistance. When the President issues a disaster declaration that includes Sarasota County, the County will receive notice from the State directly as well as through the media coverage. The County Emergency Management Chief will ensure that this information is transmitted to the municipalities for coordination of financial reimbursement with county agencies while maintaining compliance procedures for financial transaction, accurate accounting, grants management, document tracking and payroll procedures. Each City department is responsible for the collection and documentation of reimbursement information, identification of public assistance projects, and submission to the contractor consolidation and submission to FEMA.

The Local Disaster Recovery Manager will transmit disaster declaration, recovery assistance information and technical assistance resources to the municipalities, special taxing districts and not-for-profit organizations, who perform essential governmental type services, as described in FEMA

regulations via fax, conference calls, e-mail and Internet, media outlets and other communications mechanisms.

8. The LDRM will assign representatives to solicit and provide technical assistance and support to municipal jurisdictions throughout Sarasota County to assist in community-wide recovery efforts. The Municipal Liaison will also ensure that multi-jurisdictional issues which require coordination, such as infrastructure restoration of roads, bridges, utility systems and telecommunications, can be effectively coordinated across jurisdictional lines. The lead coordination agency will work directly with the city managers for each impacted jurisdiction and request that a staff assignment is made for recovery working groups requiring representation from the municipality. These assignments may be based upon level of impact to the municipality, available technical expertise within the municipality, level of interest, need for coordination, and jurisdictional regulatory authority.
9. During a disaster event, the county recovery activities outlined in this section are the same for declared and non-declared disasters except for available federal and/or state resources. Without a federal disaster declaration, financial assistance for victims is limited and heavy reliance is placed on the American Red Cross, Salvation Army, charitable agencies, volunteer donations and insurance coverage. In the absence of a Presidential disaster declaration, agency declarations, such as by the Small Business Administration, may provide other sources of funding to assist with costs of the incident. Businesses must depend on insurance coverage or obtain loans/refinancing for recovery. The County and municipal governments must meet infrastructure recovery needs through existing operating funds and insurance or issue bonds to fund disaster recovery. The unmet needs committee may be an additional source of recovery resources and will be convened to identify victims' needs and possible recovery assistance.
10. The primary departments and agencies that have lead or support roles for the implementation of long term recovery are the following:
 - Emergency Management
 - Property Appraiser
 - School Board
 - Planning and Development Services
 - Community Services
 - Health and Human Services
 - Talent and Performance Management
 - Environmental Services

- Public Works
- Administrative Services
- Information Technology
- Office of Financial Management
- Sarasota Community Organizations Active in Disasters (COADs)

II. Transition to Recovery

While there is no clear line of differentiation between the Response Phase and the Recovery Phase, there are general activities which begin to occur in recovery that signify a gradual de-escalation of the response phase. The recovery phase marks the transition from response to recovery, and in Sarasota County, it begins as soon as the Response is initiated. The county may implement a Disaster Recovery Center to assist the transition to its long-term recovery, which is guided by the Post Disaster Redevelopment Plan (PDRP) and the Long-Term Recovery Coalition (LTRC) manual.

The core principles and organizational constructs in the Recovery Annex coexist with the CEMP and build upon its organizational structure and resources to more effectively address recovery needs. The CEMP fully transitions to the recovery when the disaster-specific mission objectives of the Emergency Support Functions (ESFs) are met and the EOC begins to demobilize. Response organizations will deactivate at the end of the response phase. Other organizations will remain active and/or transform into a broader post-disaster recovery role. Such organizations can include, but are not limited to, infrastructure repair, housing reconstruction, economic stabilization, and health and social services. As these post disaster redevelopment actions are implemented, oversight for long-term recovery will transition back to organizations which are typically responsible for overseeing these activities during normal operations.

The recovery process is best described as a sequence of interdependent and often concurrent activities that progressively advance the county toward a successful recovery. However, decisions made and priorities set early in the recovery process will have a cascading effect on the nature and speed of the recovery progress.

- A. Joint Field Office Coordination - The Joint Field Office is a temporary Federal multi-agency coordination center. It is established locally to facilitate field-level, domestic, incident-management activities. The Joint Field Office provides a central location for coordination of federal, state, local, non-governmental and private sector organizations. The Local Disaster Recovery Manager will coordinate all activities with state and federal recovery personnel at the Joint Field Office. The Local Disaster Recovery Manager, through the County Emergency Management Chief, will liaison with the State Recovery Staff and will provide local representation if necessary. A municipal representative, selected by the Local Disaster Recover Manager will coordinate recovery activities with the municipalities.

The bulk of federal recovery field operations during a declared event are coordinated through the JFO. Unlike the State Emergency Operations Center, the Joint Field Office facility is determined by, and under the authority of, the Federal Emergency Management Agency. The Joint Field Office will be staffed with representatives from federal agencies having emergency responsibilities, and may be co-located with the office of the State Coordinating Officer. Joint Field Office site selection will be made by the Federal Coordinating Officer and the State Division of Emergency Management director. State Emergency Response Team personnel work alongside their Federal Emergency Management Agency counterparts to achieve mutual objectives. For additional information, see the State's Recovery Operations for the Joint/Disaster Field Office Standard Operating Guidelines.

- B. State and Federal Disaster Assistance Process - To receive a Federal disaster declaration under the Stafford Act, the following steps must be conducted. Each step is addressed in detail in an upcoming section of this Plan. Following is a brief overview:
1. Local State of Emergency Declaration: The process for issuing a local state of emergency is outlined in the Sarasota Comprehensive Emergency Management Plan. A local state of emergency may be issued at any time deemed necessary by the executive leadership. However, to receive recovery assistance from a higher level of government (state and federal), a local state of emergency must be declared by Sarasota County.
 2. Rapid Impact Assessment and Initial Damage Assessment: Sarasota County Planning and Development Services Damage Assessment Branch (consisting of members of Sarasota County, and its municipalities) will assess the impacts of the disaster as detailed in the Rapid Impact Assessment and Initial Damage Assessment of this annex. These assessments provide an initial overview of the type and extent of the damage and include inputs from municipalities, special districts and other eligible entities within the county. The initial assessment is transmitted to the State Emergency Operations Center from Sarasota County Emergency Operations Center.
 3. State of Emergency Declaration by the Governor: When deemed appropriate, the Governor will issue an executive order or proclamation in support of the County's request for assistance. This will provide the authority to activate State emergency response resources to assist the County's efforts.

4. Preliminary Damage Assessment: The State Emergency Response Team and the Federal Emergency Management Agency will initiate a damage assessment with Sarasota County to document the severity of the impact and to justify the need to pursue a request for a Presidential Declaration. When the damage is of such magnitude and severity that it would appear a declaration is imminent, this assessment may not be necessary.
5. Emergency Declaration Request and Notification: When the minimum thresholds have been exceeded for a Presidential Disaster Declaration, the Governor requests a Federal Disaster Declaration, in writing to the President, through the Federal Emergency Management Agency's Region IV Headquarters in Atlanta, Georgia. If the Federal Emergency Management Agency concurs with the request, it is sent to the President who determines whether the request will be approved or rejected. Approval may be for any or all the three primary categories of Federal Disaster Assistance that are made available through the Stafford Act: Request for Public Assistance, the Individual and Household Program, and Small Business Administration loans. The response is transmitted back to the Governor through the Federal Emergency Management Agency's Region IV Headquarters. Once the State Emergency Operations Center receives the official notification, it will notify each of the counties within the State of Florida. It is the responsibility of the County Emergency Operations Center to notify all municipal jurisdictions and special districts within the County of the Federal Disaster Declaration.

III. Damage Assessment

Damage assessment is the basis for determining the type and amount of state and/or Federal financial assistance necessary for recovery and mitigation. An initial damage assessment is conducted during the response and immediate recovery phase to support a request for a gubernatorial proclamation and for the state to request a presidential declaration. Damage assessment has a two-fold mission:

- To identify the immediate needs and resources required to assist disaster victims.
 - To substantiate requests for supplemental assistance.
- A. Initial Impact Assessment Survey. In the immediate aftermath of the disaster, a City-wide "Initial Impact Assessment Survey" will be conducted. The goal of this survey is to determine the magnitude and severity of damage to private and public buildings and infrastructure; and, in the event of a severe rainfall event, determine the level of flooding damage. All Impact Survey Team members must report impact survey results to the City EOC within hours of disaster impact. The results are mapped in the City EOC on a Geographic Information System map. The impact survey data provides a City-wide general overview of the most significantly

impacted areas and, therefore, establishes a prioritization mechanism for damage assessment team deployment, resource allocation, and disaster assistance.

- B. Damage Assessment Process. While response activities (such as search and rescue, firefighting and care for the injured) are in full operation, recovery field operations begin with clearing debris from all major roads to assist emergency units in their response operations and to facilitate access to impacted areas by joint County/City Damage Assessment Teams.

Rapid and accurate damage assessment of both the private and public sectors is essential to determine:

- Type of assistance to request
- Prioritization of resource distribution for disaster victims
- Prioritization of infrastructure restoration

A damage assessment report is created which includes the damage assessment data Citywide. The joint County/City Damage Assessment Teams are composed of individuals representing building inspections, clerical and other support. The Public Works Department and Utilities Department will coordinate damage assessment data for all public infrastructure.

Damage assessment data is reported to the recovery staff at the County EOC, which is reviewed, then transmitted to the City EOC.

Based on the magnitude and severity of the disaster impact as well as intelligence data gathered from City situation reports and mission requests, the County or State may deploy a State or joint State/Federal Preliminary Damage Assessment Team to the City of North Port before the City-wide damage assessment and reporting is complete. If this circumstance occurs, the County EOC will coordinate the activities of the City/County/State/Federal Preliminary Damage Assessment Teams with that of the City EOC. The goal is to ensure a complete and accurate damage assessment of the disaster event's impact upon the City of North Port and to assist the Governor in making a timely request for a Presidential Disaster Declaration.

Once the damage assessment process is complete, the City of North Port Neighborhood Development Services Department conducts the post-disaster habitability inspections. The purpose of these inspections is to ensure that all structures are safe for entry and that water, electric, and gas services may be reconnected to the structure. These inspections are not conducted until the damage assessment process has been completed. All buildings damaged must be permitted for rebuilding or restoration and all new work must be up to current codes. Condemnation of severely damaged buildings and structures will be

accomplished when they become public safety issues. These are legal responsibilities of all jurisdictions within the City.

- III. Disaster Recovery Center. A Disaster Recovery Center may be established in the area to provide “one-stop” assistance for information and tele-registration. The County EOC will initiate a request through the State Emergency Operations Center for the establishment of a DRC within Sarasota County. The Recovery Section Chief will coordinate with the Florida Division of Emergency Management for the establishment of Disaster Recovery Centers. This coordination includes ensuring the selected facilities or locations can support DRC operations for extended periods. Although only one DRC may be established after an incident, Sarasota County Emergency Management has pre-identified a variety of locations to serve as DRC’s. The location will be selected based on community need and structural suitability. The Emergency Management Coordinator has lead responsibility for coordination with the County, State and FEMA for the establishment of a Disaster Recovery Center and will work with Sarasota County to identify potential location(s).
- IV. Public Assistance Process. When the President issues a major disaster declaration that includes Sarasota County, the City will receive notice from the State. The City EOC will ensure that this information is transmitted to City departments for coordination of financial reimbursement. Each City department is then responsible for the collection and documentation of reimbursement information and identification of Public Assistance projects.

The Emergency Management Director will transmit disaster declaration, recovery assistance information, and technical assistance resources to the City departments via fax, conference calls, internet e-mail and web page, media outlets, and other communications mechanisms.

- V. Debris Management. In some cases, debris clearance, removal and disposal actions can be accomplished quickly using community resources augmented by assistance from neighboring communities, State agencies and contractor resources. In many other cases, however, the damage and debris are so extensive that a comprehensive debris clearance, removal and disposal management plan is required to efficiently and effectively control the operations.

The City of North Port developed, and approved by FEMA, a Debris Management Plan (Appendix H) to provide guidance to City management in planning, mobilizing, organizing and controlling a large-scale debris clearance, removal and disposal operation. These response efforts may be accomplished with local force account labor and equipment, contractors, volunteers and assistance from adjacent communities. The Plan identifies key staff members and their responsibilities for managing and controlling debris clearing, removal and disposal operations. This staff will be immediately activated whenever a natural disaster occurs. Staff members will document the critical decisions made in

response to the disaster and provide the debris manager and local, State and Federal officials with a clear plan of action. The debris clearing, removal and disposal operations may extend for weeks or months and insufficient documentation of the evolving plan could cause confusion and inefficiency.

VI. Community Outreach/Relations Teams. Private citizens and businesses are advised through the media and Community Outreach/Relations Teams of:

- Open shelter locations for immediate housing needs
- City, American Red Cross, Salvation Army, and other distribution points where food and water can be obtained
- FEMA's toll-free number to register for long term disaster recovery assistance (through the Individual Assistance Program)
- Location and hours of operation of Disaster Recovery Centers that can assist and guide persons in their individual recovery efforts.

The Community Outreach teams consist of a Federal, State, and local team member.

VII. Unmet Needs Coordination.

The Sarasota County Human Service Director, in conjunction with Sarasota County COADs, has the lead responsibility for coordinating unmet needs during long-term recovery. With assistance from the member groups and other volunteer organizations, the COAD will utilize existing lists of community service providers, local churches, community outreach programs and municipalities to fulfill all requests. A volunteer center may be established in the county to support unmet needs coordination and operations. Human Needs Assessment Teams, municipalities and local officials will meet to help identify unmet needs. The Sarasota COAD maintains the lists of volunteers and community organizations.

Generally, agencies (both nonprofit and profit) will notify the EOC of the needs of the communities which they canvas. SCEM has a cooperative relationship with a multitude of field agencies in both emergency and non-emergency times. During a major disaster operation, FEMA will provide Community Relations Teams. Sarasota County, along with the American Red Cross, will field damage assessment teams to get a sense of the community's needs. Emphasis areas for the teams will be:

- A. Areas of the greatest disaster impact
- B. Isolated and rural areas
- C. Low socio-economic areas
- D. Elderly, special needs, and socially isolated individuals

Training and workshops are available through several resources such as health care organizations that specialize in home health care, workshops provided or coordinated by

SCEM staff, and training provided to members of volunteer organizations such as American Red Cross and United Way.

- VIII. Post-Disaster Emergency Housing. In a catastrophic disaster, many homes may be destroyed which may require the use of non-permanent structures, such as mobile homes, travel trailer and recreational vehicles, as temporary housing by individuals and families who have been displaced from their primary residence. In general, City Code prohibits the use of these structures.

In 2009, City Commission adopted an ordinance (09-08) which permits the use of these structures for temporary housing on their declaration of a housing emergency. Residents would be able to live in a trailer on their property while their home is being repaired, and allow the creation of a FEMA-style mobile home park for those from apartment buildings or condominiums until they can locate and transition into permanent housing. All structures must have water, sanitary sewer and electricity connections approved by the City. Residents would be permitted to remain in the temporary structure for up to 18 months, with additional increments of six months on application to the City's Neighborhood Development Services Department.

The county may establish an expedited permitting process which may include "one-stop permitting" centers staffed by county permitting representatives for implementing streamlined permit processing. The purpose of this process is to expedite repair and reconstruction of buildings, and to provide information support for provision of temporary housing and encouragement of business resumption and industrial recovery. The County may establish such centers and procedures in coordination with other governmental entities that may provide services and support, such as the Florida Division of Emergency Management, FEMA, SBA, and HUD. These centers combine the presence of multiple agencies to provide better coordination of information that disaster victims may need to rebuild.

A. Transitional Housing

If it is determined that shelter residents and evacuees will not be able to return to their homes for an extended period, it may be necessary to activate transitional shelters until more suitable, longer-term housing options are available. Such transitional shelters can be operated in churches, community centers, convention centers, barracks, or similar existing structures. The Federal Emergency Management Agency's Transitional Sheltering Assistance (TSA) Program may approve, fund, and administer the use of hotels and motels as transitional shelters, which is not charged against disaster survivors' maximum amount of Individual and Housing Program financial assistance. The Federal Emergency Management Agency can also provide reimbursement for hotel/motel accommodations to eligible applicants (County/municipality/special district) through the

Housing Assistance Program, which is subject to the Individual and Housing Program financial assistance limit.

B. Interim Housing

The main objective of interim housing is to identify interim housing solutions with the goal of providing safe and functional temporary housing that allows a family to live together, with a reasonable amount of privacy, while meeting the physical accessibility needs of the household. This includes providing essential utilities, and access to areas for food preparation and bath facilities. Interim housing requires coordination between the Disaster Housing Task Force, municipal partners, and the Joint Field Office. Interim housing is designed to provide a solution for a period of generally up to 18 months. Interim housing may include:

- Rental properties
- Hotels and motels
- Mobile home and RV parks
- Seasonal housing units
- Mobile housing units on private property or group sites
- Big box facilities
- Cruise ships

ANNEX B**MITIGATION ACTIVITIES**

- I. The City of North Port has adopted the Sarasota County Local Mitigation Strategy Multi-Jurisdictional Plan – which is State and FEMA-approved, and expires on February 9, 2020 (Appendix E). A copy of which is available for download from:
<https://www.scgov.net/government/emergency-services/documents-forms-and-plans>.
- II. The City' Emergency Manager is responsible for coordinating mitigation activities with the Local Mitigation Strategy Group. This person currently serves as the Vice-Chairperson of the Group and coordinates all City mitigation activities that are required to maintain compliance with the Sarasota County Local Mitigation Strategy Multi-Jurisdictional Plan.
- III. The City of North Port Emergency Manager in conjunction with the Sarasota County Emergency Management Recovery Section, Damage Assessment Branch, is responsible for conducting damage assessment operations throughout the City including Special Flood Hazard Areas (SFHAs), in collaboration with the jurisdiction. The Recovery Section will forward all damage assessment reports to the Planning Section Documentation Unit. The Planning Section Chief will forward to each jurisdiction's Floodplain Manager the final damage assessment reports including damage to SFHAs, for their review. Additional assistance for the Floodplain Managers can be found within each jurisdiction damage assessment division or by requesting assistance to the Recovery Section Chief through the Planning Section Chief.

ANNEX C

WILDFIRE OPERATIONS

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- A. General
- B. Scope and Purpose
- C. Assumptions

II. RESPONSE ORGANIZATION

- A. Local
- B. State

III. RESPONSIBILITIES

- A. City of North Port Fire Rescue
- B. Sarasota County Emergency Management
- C. Florida Forest Service, Myakka District
- D. Florida Department of Agriculture and Consumer Service
- E. Florida Division of Emergency Management
- F. Florida Fire Chiefs' Association
- G. Florida Division of State Fire Marshal

IV. METHOD OF OPERATION

- A. General
- B. Levels of Activation
- C. Medical Unit
- D. Air Operations
- E. Resources
- F. Logistical Support

V. PUBLIC INFORMATION AND INFORMATION FLOW

- A. General
- B. Unified Public Information
- C. Information Flow

VI. AUTHORITIES AND REFERENCES

VII. ACRONYMS

EXECUTIVE SUMMARY

The Wildfire Operations Annex to the City of North Port Comprehensive Emergency Management Plan identifies the actions that may be taken by the Florida Forest Service and those State and local agencies in support of the Forest Service in preparing for, responding to, and recovering from wildfire event(s). This Annex addresses the role of State and local government in providing the necessary support to the Florida Forest Service in its statutory responsibilities in responding to, controlling and suppressing wildfires. The City of North Port Fire Rescue, in cooperation with the Forest Service, will update and coordinate the plans with other response and support agencies.

The Annex is a living document; being reviewed and updated after a major wild land fire event or annually. It is presently divided into four (4) Chapters as follows:

- I. **Introduction:** Provides a discussion of the purpose and planning assumptions used to prepare the annex.
- II. **Response Organization:** Identifies the various levels of support that may be provided through a Unified Command structure. It describes the circumstances under which the various agencies will unify under a single command structure in responding to, controlling and suppressing wildfires and the responsibilities of the Unified Command components (agencies). This Chapter also addresses the delegation of authority during a wildfire event.
- III. **Responsibilities:** Identifies the response organizations, and their roles and responsibilities specific to wildfire operations.
- IV. **Method of Operation:** Presents the key guidelines that will be used to make key decisions during the event. Based on joint considerations discussed and determined by the City's liaison agencies of the Unified Command (Forest Service, North Port Fire Rescue), guidelines for the three levels of activation (Monitoring, Partial, and Full) for the City of North Port Emergency Operations Center during a wildfire event have been developed. This Chapter also addresses medical unit activation, air operations, logistical support, and resources.
- IV. **Public Information and Information Flow:** Discusses the notification process for active wildfires to the public, and State Warning Point, and the coordination of situation reports and incident action plans.

I. INTRODUCTION

A. General

This Annex identifies the actions that may be taken by the Florida Forest Service and those State and local agencies in support of the Forest Service in preparing for, responding to, and recovering from wildfire event(s). This Annex addresses the role of State and local government in providing the necessary support to the Florida Forest Service in its statutory responsibilities in responding to, controlling and suppressing wildfires.

B. Scope and Purpose

This Annex covers all wildfires to which the City of North Port that the Forest Service respond. The purpose of the response is to contain, control and extinguish the wildfire.

C. Planning Assumptions

1. The Forest Service is statutorily responsible for wildfire prevention, detection, and suppression on 26,000,000 acres in Florida.
2. The United States Forest Service and the Department of Interior are responsible for wildfire suppression on their respective Federal lands throughout the State.
3. Each year, lightning fires that are associated with Florida's thunderstorm season (April through September) can create tremendous wildfire activity when associated with the State's dry Spring conditions.
4. Nationwide, from 2000 through 2016, an average of 73,303 wildfires occurred per year, burning an average of 114,323,903 acres¹.
5. In Florida, the Deceiving Wildfire burned 173,000 acres in 1999 – which represented the most significant wildfire from 1981 to 2008². However, the most intense fire season on record occurred in 1998 due to the escalating wildland/urban interface in the State.
6. The President of the United States is authorized to aid, including grants, equipment, supplies, and personnel, to any State for the suppression of

¹ https://www.nifc.gov/fireInfo/fireInfo_stats_totalFires.html

² <http://www.freshfromflorida.com/Divisions-Offices/Florida-Forest-Service/Wildland-Fire/Significant-Wildfires-in-Florida-1981-2008>

any fire on publicly or privately-owned forest or grassland, which threatens such destruction as would constitute a major disaster.

II. RESPONSE ORGANIZATION

A. General

This Chapter of the Annex describes the organization to be used to coordinate the City of North Port's agencies support of the Forest Service's response during wildfire events. It describes the Unified Command structure the various agencies will work under to control and suppress wildfires. Also, it addresses the circumstances under which the unified structure will support Forestry in its response to wildfires. The Unified Command structure will be the process used to manage serious wildfire events.

B. Response Organization

1. Local

The Incident Management Team (IMT) comprised of locally-trained State and local firefighters will be used to manage fire-fighting operation when two mutual aid departments and Forest Service assets are engaged in a wildland fire-fighting operation. The Incident Management Team will request activation of the City and County Emergency Operations Center and/or State's response system when the wildland fire is expected to exceed local firefighting capabilities.

2. State

The Unified Command is established as conditions warrant based on a joint decision by the State Forester and the Forest Supervisor of the National Forest in Florida and/or a representative of the Department of the Interior. Unified Command is organized like a State Multi-Agency Coordination (MAC) group, but with the important difference being that the Unified State Command also retains operational command of resources as well as provides logistical coordination. The Unified Command is set up so that an Incident Commander is provided from the primary jurisdictional agencies on which the wildfires are occurring. Unified Commanders will include the Florida Forest Service and either the USDA Forest Service, National Park Service, the United States Fish and Wildlife Service, or the Bureau of Indian Affairs.

In addition to the Incident Commanders and jurisdictional agency liaisons, the Command Staff will also include liaisons from several key support

agencies. These support agencies include the Division of Emergency Management, Division of State Fire Marshal, Florida Fire Chief's Association; Florida National Guard, and if involved, the Federal Emergency Management Agency.

III. RESPONSIBILITIES

A. City of North Port Fire Rescue and Emergency Management

1. Conduct wildland firefighting operations.
2. Operate and manage the City EOC.
3. Monitor the operation to request the City Commissioners issue a Local State of Emergency and issue warnings to the affected communities as the situation warrants.
4. Transmit resource requests to the Sarasota County EOC.

B. Sarasota County Emergency Management

1. Support wildland firefighting operations with logistical support.
2. Enter resource requests to the State Emergency Operations Center.
3. Monitor the operation to request the Board of County Commissioners issue a Local Declaration of Emergency and issue warnings to the affected communities as the situation warrants.
4. Activate the Emergency Alerting System to facilitate area evacuation(s).
5. Activate sheltering/cooling operations for those evacuated.

C. Florida Forest Service, Myakka District

The FFS Myakka District manager, or designated representative, will activate the Incident Management Team when the situation warrants.

D. Florida Department of Agriculture and Consumer Service, Forest Service

The Department of Agriculture and Consumer Services, Forest Service has statutory responsibility for the suppression of wildland fires in the State of Florida. The Forest Service has the lead role in determining when a State Unified Command will be established. In consultation with other State and Federal partners, the

Forest Service will appoint one member of their organization and at least one alternate to serve as State Incident Commander. The Incident Commander will determine the scope and structure of the Unified Command for the wildland(s) burning in the State.

E. Florida Division of Emergency Management

The Florida Division of Emergency Management has statutory responsibility for coordinating State and local support to the Forest Service in the response and recovery from wildland fires. A liaison will be appointed to coordinate the Division's Support Role. Various support elements will be initiated as requested by the Incident Commander.

F. Florida Fire Chiefs' Association

The Florida Fire Chiefs' Association provides the Forest Service logistical support through the services of fire departments throughout the State. This support effort will be initiated per the Florida Fire Chiefs' Association State Emergency Response Plan (SERP) that is activated by request for Emergency Support Function 4, Firefighting.

G. Florida Division of State Fire Marshal

The State Fire Marshal appoints an Emergency Coordination Officer for Emergency Support Function 4, Firefighting. Emergency Support Function 4 is responsible for logistical request from State and local governments for firefighting and EMS resources. These resources are then dispatched per the requirements of the Florida Fire Chiefs' Association State Emergency Response Plan.

IV. METHOD OF OPERATION

A. General

This section of the Annex presents key guidelines that can be used to make key decisions during the event. These decisions will be based on experience, the best evaluation of the current situation, and the forecast for the near future. All wildfire responses will use the National Incident Management System (NIMS) as the emergency response organizational management structure.

Based on joint considerations discussed and determined by the liaison agencies of the Unified Command (Forest Service, and the Fire Chief(s) of the affected area(s)), guidelines for the three levels of activation (Monitoring, Partial, and Full) for the City of North Port Emergency Operations Center during a wildfire event will be

developed. When the EOC is activated in support of the Wildfire Response it will act as a Multi-Agency Coordination Center in support of the Unified Command.

B. Levels of Activation

1. Level III, Monitoring Phase

When two mutual-aid departments and Forest Service or one Strike Team is called out, the City of North Port Fire Rescue may deploy a liaison to the scene upon request of the Incident Commander. The City of North Port Fire Rescue will maintain a liaison with the Incident Management Team at the point when the Multi-Agency Coordination Vehicle Post is deployed. When wildland fire-fighting activities increase whereby greater logistical support is anticipated and the State's Incident Management Team is not in place, the City and/or County Emergency Operations Center will be activated to support all logistics operations. The Emergency Management liaison will remain in contact with the Forest Service and the Emergency Operations Center, unless a firefighter liaison is deployed to the EOC.

2. Level II, Partial Activation

The City and/or County Emergency Operations Center may be activated to a Level II based on a variety of considerations.

a. When appropriate, the City Manager and the Emergency Manager will request a Local State of Emergency from the City Commissioners based on the following factors:

- i. When the wildland fire is out of control and threatening a community.
- ii. When the Emergency Management Director or the IMT requests additional powers to speed the logistical support effort.
- iii. When community evacuations may be required.

3. Level I, Full Activation

a. The Emergency Manager, in consultation with the City Manager, will make the decision when to activate the City Emergency Operations Center to a Level I. The following factors may be used in the decision-making process:

- i. When a response to a wildfire event requires the resource and/or logistical support from most the City's Emergency Support Functions.
 - ii. When a wildfire event necessitates evacuations that require resource support from neighboring counties.
- b. The City of North Port Liaison to the County Emergency Operations Center

Once the County Emergency Operations Center has gone to Level I, the City of North Port Fire Rescue will liaison between the City and the County Emergency Operations Center, and provide information coordination for the County Emergency Support Functions.

C. Medical Unit

A medical unit may be activated when an Incident Management Team is put in place to coordinate large numbers of firefighters or emergency personnel. If the Incident Management Team requests a Medical Unit, the request will go through the County Emergency Operations Center.

D. Air Operations

When the Forest Service and the United States Department of Agriculture, Forest Service, under increased wildfire activity, establish Unified Air Operations for statewide wildfire aviation coordination, the Unified Air Operations will establish an Air Operations Plan that will coordinate all aircraft associated with fire operations or flying within wildland fire aviation air space. Within Sarasota County, the Myakka District Forestry manager, or designated representative, oversees the local air space around the wildland fire. This includes:

- Forestry Aircraft
- Fire agency aircraft
- Law Enforcement aircraft
- Military aircraft
- Contractor aircraft
- Media aircraft

E. Resources

The Forest Service and North Port Fire Rescue will be responsible for command and control of all operational elements of the wildfire response to include

resource ordering for wildfire incidents. The City and County EOCs will support the wildland fire-fighting operations by managing and coordinating any non-wildfire resource ordering through the Emergency Support Functions and the State Emergency Operations Center. The Incident Commander will order fire-fighting resources through local dispatch.

F. Logistical Support

Separate processes exist for the ordering of resources and other logistical support for the wildfire events and the Incident Management Teams commanding the suppression of wildfires. In addition, the linkage needed between these resources and logistical ordering processes to provide the correct resource, to ensure that it is provided in a timely manner, and that they are provided cost-effectively.

The primary method in which resources and logistical support is ordered for wildfire events include:

1. The Logistics Section of the City and County Emergency Operations Centers.
2. The Florida Fire Chiefs' Association State Emergency Response Plan (SERP) in support of the Division of State Fire Marshal as the Lead Agency for Emergency Support Function 4 (Firefighting), 8 (Health and Medical), 9 (Search & Rescue) and 10 (Hazardous Materials).
3. Florida Forest Service.

V. PUBLIC INFORMATION AND INFORMATION FLOW

A. General

This Chapter provides how information will be shared during a wildfire event. During a wildfire event a Joint Information Center (JIC) will be established at the scene comprised of representatives of the City of North Port and the Florida Forest Service. During the activation of the City Emergency Operations Center, the EOC representative to the JIC will establish a mechanism that efficiently provides and disseminates information to the public. The EOC's lead Public Information Officer will facilitate the logistical support and orientation for all Public Information Officers working in the City Emergency Operations Center.

B. Unified Public Information

When the City Emergency Operations Center is activated (Level II or I), City, County and State agencies will provide experienced Public Information Officers or provide

access to Public Information Officers to respond to information requests of that agency. In the initial stages of an Incident Management Team Information Flow, a plan will be developed. During Level II Activation, the additional Public Information Officers may include:

- The Florida Division of Emergency Management
- The Florida Department of Agriculture and Consumer Services, Florida Forest Service

During Level I Activation, staffing may increase based on the needs of the response and may include the Federal Emergency Management Agency, the Florida National Guard, and others as warranted. Each agency will become part of the Unified Public Information.

C. Information Flow

1. Fire Activity

- a. The Forest Service, Myakka District will notify the State Watch Office of any significant fires that develop.
- b. The City of North Port Fire Rescue will notify the County Emergency Management liaison or Emergency Operations Center of any significant fires that develop.
- c. The criteria for significant fires includes:
 - i. Wildfires that threaten structures, or where structures are lost.
 - ii. That forces or has the potential to force evacuations of citizens.
 - iii. Wildfires that cause the injury or death.
 - iv. Wildfires that create significant smoke problems that may cause road closures to major thoroughfares.
 - v. Large significant wildfires that require movement of out of district forestry resources.

2. Situation Report Information
 - a. The Forest Service will continue to produce a daily wildfire summary, which is available at their website <http://www.freshfromflorida.com/Divisions-Offices/Florida-Forest-Service/Wildland-Fire/Current-Fire-Conditions>.
 - b. The City's PIO will extract pertinent information from that scene and liaison officers for its situation reports, which will be completed and transmitted to the County Emergency Operations Center.
3. Public Reporting
 - a. Information may be shared with the public in several ways:
 - i. City of North Port's Community Notification System.
 - ii. City's Web Site for local fire conditions and the social media sites Twitter and Facebook.
 - iii. Local government access Comcast channel 19 or Verizon FIOS channel 32.
 - iv. Variable message boards positioned at strategic locations.
 - v. CodeRED emergency notification system

VI. AUTHORTIES AND REFERENCES

The authority for the development, implementation and maintenance of this Annex and all compatible county/municipal plans in support of the Florida Forest Service and Division of Emergency Management in its statutory responsibilities in responding to, controlling and suppressing wildfires is derived from Chapter 252.38(1)(a) of the Florida Statutes.

This Annex further serves as the fundamental governing policy as prescribed for the Forest Service under Chapter 590 of the Florida Statutes.

The Federal Emergency Management Agency policy on requesting Fire Suppression Assistance is contained within 44 CFR Part 206, Subpart L.

The Federal Emergency Management Agency's Interim Policy on Fire Suppression Assistance, April 1999.

Statewide Mutual Aid Agreement between the City and State, and the State Emergency Response Plan with the Florida Fire Chief's Association.

VII. ACRONYMS

EOC	Emergency Operations Center
FDEM	Florida Division of Emergency Management
FEMA	Federal Emergency Management Agency
FFCA	Florida Fire Chiefs' Association
FFS	Florida Forest Service
IMT	Incident Management Team
ICS	Incident Command System
KBDI	Keetch-Byram Drought Index
MAC	Multi-Agency Coordination
NIMS	National Incident Management System
PIO	Public Information Officer
SCO	State Coordinating Officer
SEOC	State Emergency Operations Center
SERP	State Emergency Response Plan
USDA	United States Department of Agriculture

ANNEX D**FLOOD WARNING AND RESPONSE****I. INTRODUCTION**

- A. Purpose
- B. Scope
- C. Planning Assumptions
- D. Situation

II. HAZARDS ANALYSIS AND DEMOGRAPHICS

- A. Hazards Analysis
- B. City Geographic Information (See Base Plan, section II(B))
- C. City Demographics (See Base Plan, section II(C))

III. PREPAREDNESS

- A. Exercises
- B. Public Information

IV. METHOD OF OPERATIONS

- A. General
- B. Supplemental Assistance
- C. Sources of Weather-Related Data and Warnings

V. RESPONSE

- A. Public Notification
- B. Critical Facilities Inventory
- C. Activation Levels and Department Responsibilities
- D. Re-entry

VI. ADMINISTRATION

- A. Records Preservation and Restoration
- B. Funding and Accounting
- C. Emergency Purchasing
- D. Maintenance and Auxiliary Activation of the City of North Port Flood Warning and Response Program

VII. [AUTHORITIES AND REFERENCES](#)

VIII. [ACRONYMS](#)

IX. [LIST OF FIGURES](#)

I. INTRODUCTION

A. Purpose

1. This program establishes a framework through which the City of North Port may mitigate the impacts of, prepare for, respond to, and recover from fresh water flooding conditions that could adversely affect the health, safety and general welfare of North Port residents, businesses and guests.
2. Provisions are made for the needed flexibility of direction, coordination, and method of operation to enable government and non-government entities to accomplish their objectives of mitigation, preparedness, response and recovery. This Annex also provides the framework for rendering support to other counties, municipalities, States and the Federal government in their flood management efforts.

B. Scope

1. Describes the various types of flooding that could occur and provides procedures for disseminating warning information and for determining, assessing and reporting the severity and magnitude of flooded areas.
2. Establishes the concepts under which the City government will operate in response to flood emergencies.
3. Creates a framework for expeditious, effective and coordinated employment of local resources.
4. The National Weather Service administers/disseminates flood warning information to the County, City and other municipalities.
5. Response operations are conducted under the authority of the City of North Port and Sarasota County Comprehensive Emergency Management Plans.

C. Planning Assumptions

1. The business centers of Sarasota County government and State agencies of Florida have certain expertise and resources at their disposal that may be used in relieving emergency or disaster related problems that are beyond the City's capability.
2. When the City declares a State of Local Emergency and requests County and State assistance following a flooding disaster, the Governor may

declare a State of Disaster Emergency, and the State Emergency Operations Center (SEOC) will be activated if conditions warrant.

3. Should State assistance be inadequate to cope with the flooding disaster, the Governor will request Federal assistance under a Presidential Disaster Declaration.
4. The National Weather Service (NWS), Tampa Bay, will issue flood advisory, watches and warning information to both government and the citizens via the Emergency Alert System (EAS). The State Warning Point will follow-up the NWS' warning information with direct contact with the Sarasota County Warning Point, who will issue a notification alert to the City of North Port.

D. Situation

1. Because of the seasonal possibility of large-scale flooding events within the City of North Port, the City must be adequately prepared to reduce the vulnerability to, deal with, and recover from these flood emergencies. The Emergency Management functions within the City must be coordinated as much as possible with other City government and non-governmental agencies as well as with Sarasota County Emergency Management and Florida Division of Emergency Management and surrounding jurisdictions to ensure the most effective preparation and use of manpower, resources, and facilities in response to flood threats and/or emergencies.
2. The principal causes of flooding affecting the City of North Port are as follows:
 - a. Weather systems, both tropical and non-tropical, can produce up to 20 inches of rain over a five-day period. These occur primarily during the hurricane season but can occur at other times. This flooding can cause the Myakkahatchee Creek and canals to overflow their banks.
 - b. Severe thunderstorms, which are local in nature, can cause flashflood-like isolated flooding from torrential rains, which may or may not be accompanied by high winds. These usually occur late May to late September, but also can occur at any time of the year.
 - c. Hurricanes/tropical storms generate high winds and widespread flooding over much of the populated area of the City. Storm surge has the potential to affect up to 100% of the population depending on the intensity of the storm. Although tropical systems can form

during any month of the year, hurricane season begins on June 1 and ends on November 30.

3. The City of North Port is in the southern portion of the Big Slough Watershed, which covers approximately 195 square miles (See Figure 1). The current land uses within the watershed north of the City boundaries are predominantly agricultural with some mining activities. A large portion of the runoff from the Big Slough Watershed drains through tributaries to the Myakkahatchee Creek, which runs through the City of North Port.

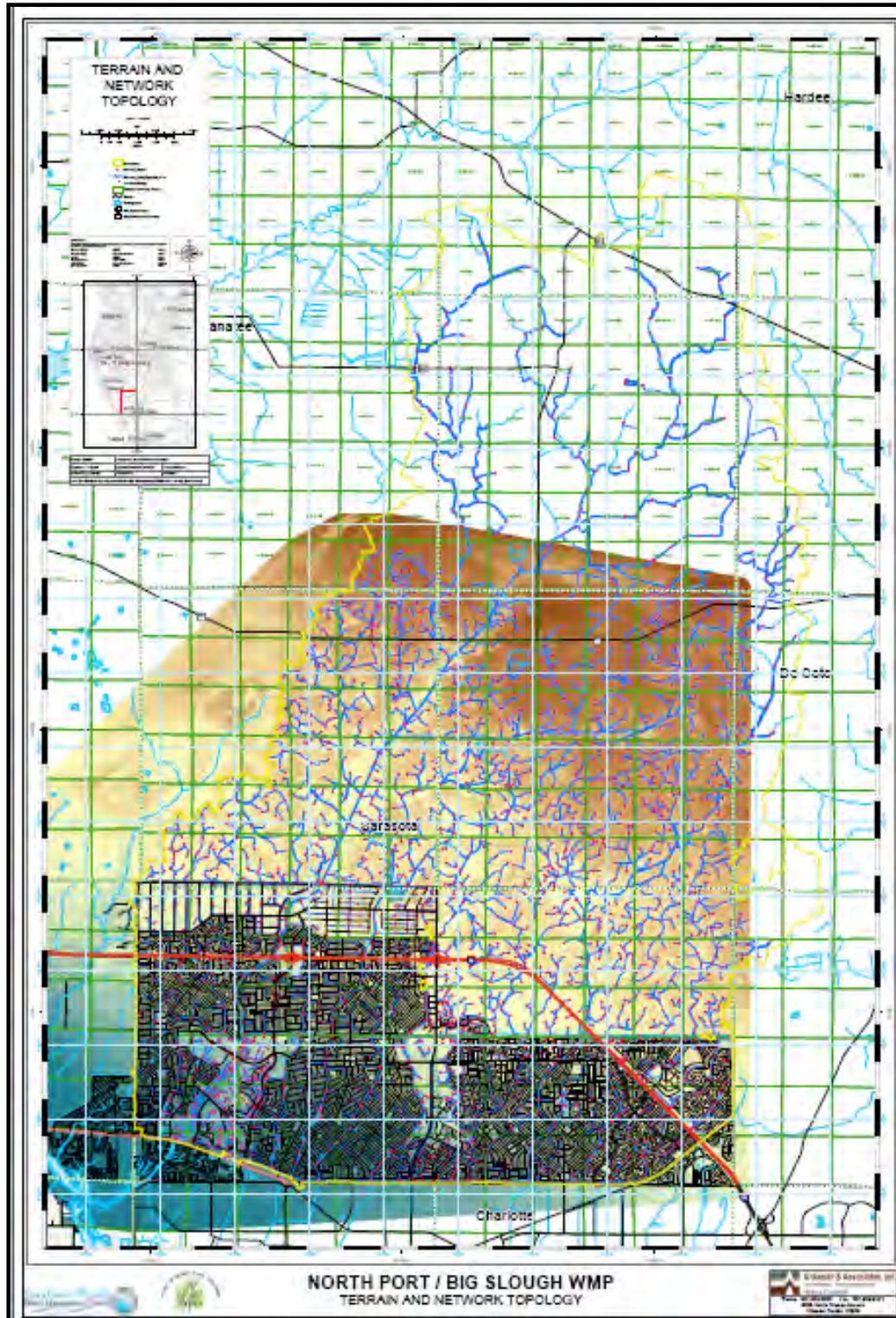
As the City of North Port is located at the low end of the Big Slough Watershed/Myakkahatchee Creek “pipeline,” the City’s current flooding and water quality conditions are attributed not only to the City’s growth, but also to upstream runoff in the Sarasota, Manatee and Desoto County portions of the Big Slough Watershed.

During the mid-2000s, the Big Slough Watershed Study was conducted under a cooperative funding agreement with the Southwest Florida Water Management District (SWFWMD) and the City of North Port. Included is a detailed watershed computer model created to simulate the hydraulic conditions of the Big Slough Watershed. Once the model is calibrated to simulate historic storm conditions, it can be used as a tool to predict the level of flooding in the City under various storm events. The model will be used to revise the 100-year FEMA flood maps, and to evaluate options for drainage improvement projects to reduce the flooding currently experienced within the City. Viable drainage improvement projects are expected to be costly, and are likely to take five to 10 years to complete. Implementation of these projects will require cooperation with Sarasota County and Manatee County, acquisition of large tracts of land and rigorous review and permitting by Federal, State and local agencies.

The City has begun a program to clear the City canals of sediment deposits that have accumulated over time. The City will also clear fallen trees and debris in the Myakkahatchee Creek. This will help restore the flow capacity of the canals and creek.

4. Due to Statewide Building Code requirements, all new construction is above the flood plain, and therefore the structure is typically not subject to flooding. However, streets may flood resulting in “islands” of structures, and strand residents. Delivery of emergency commodities or rescue using high-clearance vehicles or boats may be necessary.

Figure 1: City of North Port / Big Slough Water Shed Map



II. HAZARDS ANALYSIS AND DEMOGRAPHICS

A. Hazards Analysis

1. Non-Tropical/Severe Thunderstorm Flooding

Flooding from non-tropical and severe thunderstorms provide the greatest flood threats to the City of North Port. The City is especially vulnerable to flooding from canal overflow and ponding.

- a. Flooding from Myakkahatchee Creek and canal overflow is almost always caused by heavy rains within a drainage area and the subsequent inability of the Myakkahatchee Creek and canal to accommodate the additional runoff. Myakkahatchee Creek and canal overflow would occur following an extended period of rainfall causing most bodies of water within the City to overflow their banks. The problem would be compounded if abnormally heavy rains were to fall in South and Central Florida.
- b. Ponding occurs in low-lying areas that are characterized by poorly drained or super-saturated soils (high water table). This type of flooding in the City occurs in all areas of the City where it is flat and drainage conveyance capacity is limited and the water table is high.
- c. History

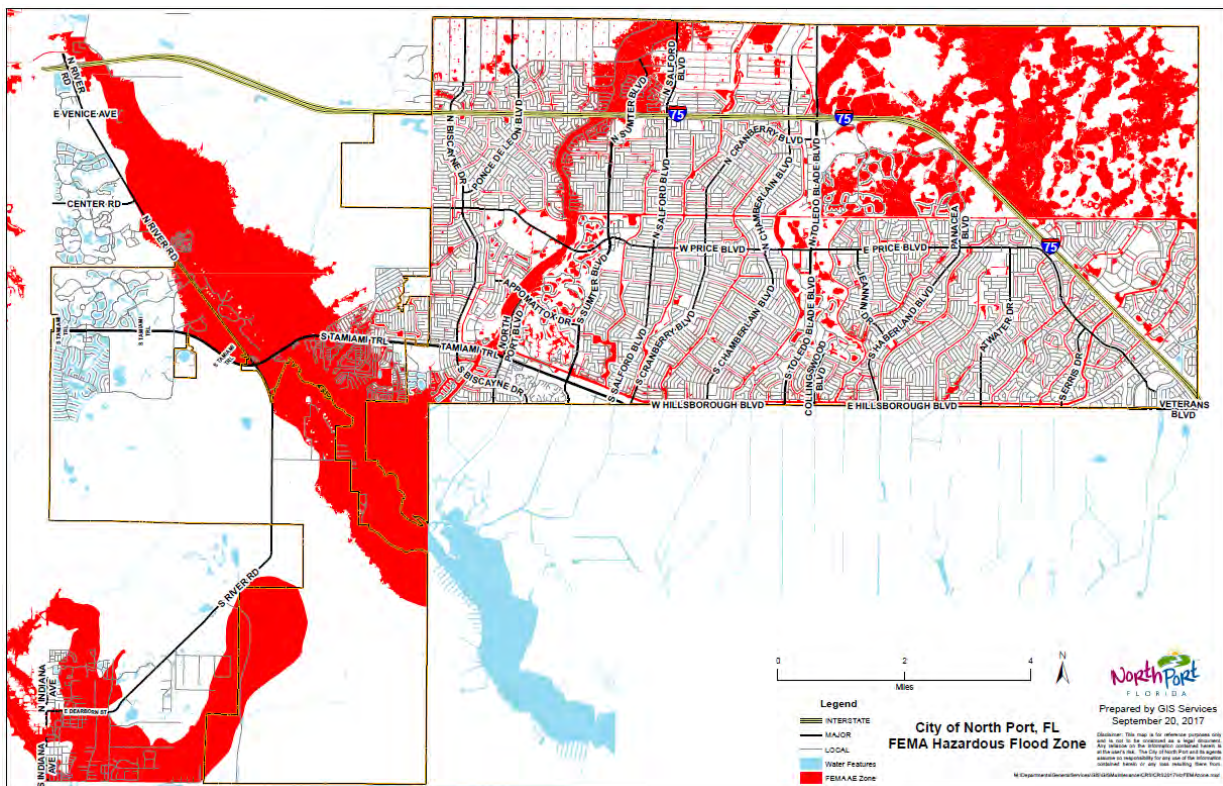
March 23-31, 1987	5.4 to 9.1 inches
September 5-9, 1988	8.2 to 8.9 inches
June 23 - July 2, 1992	16.2 to 20.7 inches
September 14-23, 2000	4.7 inches
July 20-26, 2001	4.6 to 6.9 inches
September 6-14, 2001	10.0 to 11.0 inches
June 17-22, 2003	13.6 to 14.3 inches
August 12-19, 2004	3.0 to 4.5 inches
September 10-15, 2018	9.8 inches

Seasonal flooding is experienced each year. Rainfall amounts of several inches per day spread over two to three days will have a significant impact on riverine flooding (particularly from the Myakkahatchee Creek) and street flooding due to the City's location downstream of a 200 square mile watershed and limited stormwater designed conveyance capacity.

d. Population at Risk

Areas particularly at risk are those in North Port Estates, where overflow from the canal or Myakkahatchee Creek affects the streets between Tropicaire Boulevard and Estates Drive. In addition, the residential area southwest of the I-75 interchange with Sumter Boulevard is also subject to flooding from the Myakkahatchee Creek.

Figure 2: City of North Port FEMA Flood Zones



2. Tropical Cyclone Flooding and Storm Surge

- a. A Category 2 land falling or paralleling storm with a storm surge up to 10 feet would force the evacuation of most of the coastal area to the south and west of US 41. A Category 3 storm with a storm surge up to 13 feet could result in the evacuation of 20% of the City’s population, which includes all the mobile home parks within and adjacent to the City.

b. History

The City of North Port (Port Charlotte statistical area) has been exposed to 44 hurricanes/tropical storms since 1870¹. Most recently:

1960 Hurricane Donna September 10th, barometric pressure 28.08 inches, caused heavy storm surge flooding and damage, with gusts over 130 mph, water was first pulled out into Gulf then brought back in as eye passed north causing heavy damage.

2004 Friday, August 13th, Hurricane Charley hits with 145 mph winds. Very heavy destruction in Charlotte and Desoto counties from wind. A rather small but powerful hurricane with a six- to 10-mile wide eye. Thirty-three people were killed, with five deaths in Charlotte county. More than 14 billion dollars in damage. Surge was less than 7 feet on the Gulf, and only 1.5 feet in coastal waters.

2017 Hurricane Irma, September 10th passes just 18 miles to the east while moving north with 100mph winds. Rainfall from September 10th through 15th totaled 9.8 inches and flooded many streets in the Estates area and north/south of I75 along the Creek.

c. Population at Risk

Per the 2017 updated count, there are 64,472 persons living in North Port

The below table describes the potential effects to the population, and economic loss if a hurricane with sufficient storm surge, or flooding in a FEMA Special Hazard Flood Area were to affect the City of North Port.

¹ <http://www.hurricanecity.com/city/portcharlotte.htm>.

Residential Non-Residential / Population / Valuation Information in Storm Evacuation Zones and FEMA Hazardous Zones

Evacuation Zones	Non-Residential	Residential		Total Units	Total Potential Property Value Loss		Residential Population (Units *2.65)
	Units	Potential Property Value Loss	Units		Potential Property Value Loss		
A	4	\$2,800,300	289	293	\$47,415,800	\$50,216,100	766
B	209	\$245,514,000	4,394	4,603	\$364,506,800	\$610,020,800	11,644
C	11	\$12,962,000	8,777	8,788	\$1,277,681,000	\$1,290,643,000	23,259
D	95	\$269,482,000	12,693	12,788	\$1,948,933,600	\$2,218,415,600	33,636
E	137	\$74,981,300	2,629	2,766	\$482,517,900	\$557,499,200	6,967
Grand Total	456	\$605,739,600	28,782	29,238	\$4,121,055,100	\$4,726,794,700	76,272

FEMA Zone	Non-Residential	Residential		Total Units	Total Potential Property Value Loss		Residential Population (Units *2.65)
	Units	Potential Property Value Loss	Units		Potential Property Value Loss		
FEMA AE Zone	92	\$384,014,800	6,122	6,214	\$968,199,400	\$1,352,214,200	16,223

Notes:

Known units not currently on 2017 taxroll is estimated values and included in unit counts.

Residential Units include individual Condo Units.

Residential Units only count one per apartment complex.

Total Value Loss includes total value of apartment complex.

Non-Residential includes individual Business Condo Units.

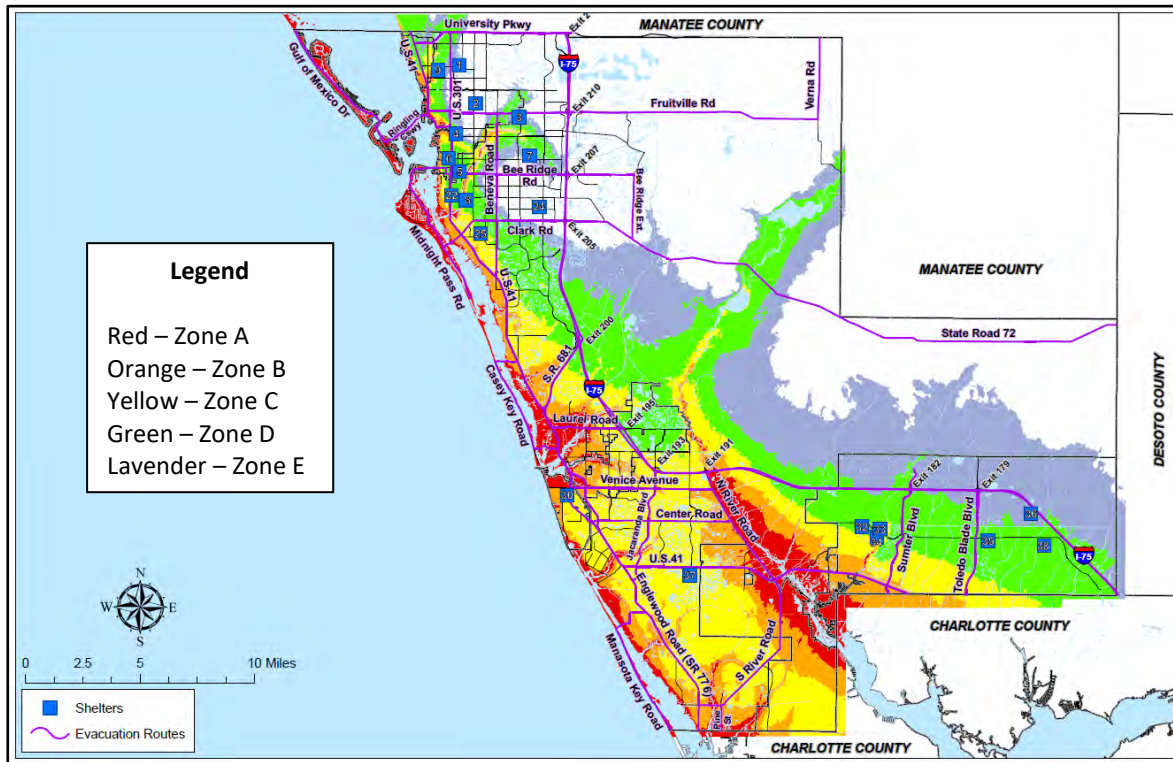
Centers under one ownership is counted as one unit and includes total value complex.

All data is based on GIS Data (August 2017): Surge Zones, FEMA A / AE Zone, Sarasota County Property Apprasier Parcels and Attribute tables.

The 2.65 multiplier is the average household size.

The valuation is from the JUST value from the Preoperty Appraisers Office data (2017 Tax Role).

**Figure 3: Sarasota County Hurricane Evacuation Zones
(Potential Areas of Storm Surge)**



B. City Geographic Information (See Base Plan, section II(B))

C. City Demographics (See Base Plan, section II(C))

III. PREPAREDNESS

A. Exercises

1. General

- a. Exercises must be conducted at least annually to verify the Flood Warning and Response Program and the skills of emergency response personnel. Results of these exercises provide a basis for changes to the Program, implementing procedures, and for further scheduling of training for response personnel. A real-world flooding type event can fulfill the exercise requirement providing a written After-Action Report was accomplished and timelines for corrective actions were established.

- b. Generally, during the Statewide Hurricane Exercise, elements of the Flood Warning and Response Program may be tested and the After-Action Report will highlight those relevant portions of the plan. If the State opts not to conduct a Statewide Hurricane Exercise during a year, then the City Emergency Manager may develop and conduct it.

2. Concept of Operations

- a. An exercise is an event that tests the integrated response capability and major elements within the flood warning program. The emergency preparedness exercise will simulate a flood emergency that may result in massive evacuation and sheltering.

- b. There are three types of exercises

- i. Table-Top Exercise is a simulation in which response activities are discussed. There is no mobilization of emergency personnel and resources.
- ii. Functional Exercise is designed to demonstrate one or more functions or capabilities specified in the flood warning program. Mobilization of local personnel and resources will be limited.
- iii. Full Scale Exercise is designed to fully demonstrate the emergency capabilities of appropriate agencies and organizations. Mobilization of local personnel and resources will be demonstrated.

- c. Scheduling and Scenario Development

- i. Exercises will be scheduled jointly by the response agencies and the Emergency Manager. Scenarios will be developed with inputs from all participating agencies. Scenarios will be varied from year to year such that all major elements of the Flood Warning and Response Program are tested during a four-year period. The scenarios will include, but not be limited to the following:
 - Objectives of the exercise and appropriate evaluation criteria
 - Date, time, place and participating organizations

- The simulated event
- A time schedule of real and simulated events
- A narrative summary describing the conduct of the exercises
- A description of arrangements for advance materials to be provided to observers

d. Critiques and Reports

A critique will be conducted after each exercise to evaluate the capability of each participating agency to implement plans and procedures.

An After-Action Report will be developed to document the event scenario, evaluation and recommendations for improvements.

B. Public Education

1. The Emergency Manager is responsible for coordinating public information programs and related activities about flood emergencies or disasters. This responsibility includes public awareness programs in schools, civic organizations, community subdivisions and other organized groups including radio and television when requested. Preparedness information will be posted on the City's website and social media sites. The Emergency Management Division conducts a number hurricane seminars per year. In each seminar, storm surge vulnerability is stressed, along with flood insurance requirements and methods to mitigate against any damage from flooding. In these talks to the community, information regarding evacuation routes and shelters is also made available.
2. The Sarasota County "Disaster Planning Guide" is updated on an annual basis, and distributed throughout the community, and provided during presentations. Additionally, the City Emergency Management internet site <http://cityofnorthport.com/government/city-services/fire-rescue/emergency-management>, Public Works website <http://www.cityofnorthport.com/government/city-services/public-works/flood-information> and various social media sites (City of North Port, Sarasota County Emergency Services, National Weather Service, National Hurricane Center, etc.) have preparedness information on a variety of disaster- and weather-related topics.

3. Since the main flood threat to the City of North Port's residents is from non-tropical storms, every effort will be made to educate the public concerning this threat. Additional tips will be provided via helpful hints to the daily and/or weekly papers. In all the presentations, the following items must be stressed:
 - a. Areas that are particularly vulnerable to flooding from small stream or canal flooding.
 - b. The use of pre-disaster checklists
 - c. Flood and homeowner's insurance
 - d. Preparedness tips to minimize disaster related losses
 - e. Shelter locations and evacuation routes
 - f. Recovery information
 - g. Point of contact for additional information

IV. METHOD OF OPERATIONS

A. General

1. This program is based on the principle that the City bears the initial responsibility for disaster response and recovery. As a corollary to this principal, each department within local government will accomplish the functions for which it is responsible, requesting relief from the next higher level of government only after resources at that level are inadequate to respond to the flood emergency or disaster. Requests for assistance will be made to the Florida Division of Emergency Management, through Sarasota County Emergency Management only after the City Commission has adopted a State of Local Emergency.
2. The Emergency Manager may activate portions of the plan, if a flood disaster/emergency threatens, prior to the City Commissioners' decision to issue a Declaration of State of Local Emergency. In this situation, the Emergency Management Division will coordinate increased readiness procedures and such emergency response actions as might be necessary for the immediate protection of life and property.

B. Supplemental Assistance

1. Requests for State assistance must be forwarded to the Sarasota County Emergency Operations Center for assessment and approval before deployment of State resources. Prior to requesting State assistance, the current situation must be identified, the current and projected resource needs must be assessed, and a time frame indicating how long state resources would be needed must be identified.
2. When City, County and State resources are determined to be inadequate to the flood emergency, the Governor will request assistance through FEMA. The request will be based on local and state damage assessments and expenditure reports that are to be maintained and supplied by the City, County and/or State for each flood disaster related activity.

C. Sources of Weather-Related Data and Warnings

When conditions are favorable for either storm surge or fresh water flooding, the following actions will be taken by the agencies listed below:

1. Meteorological information will be obtained from the National Weather Service's Weather Prediction Center (WPC) for all flood threats. Tampa Bay Weather will issue flood advisories that may affect Sarasota County. Additionally, Sarasota County obtains meteorological information and images via a private meteorological service, StormGeo. Information may also be gathered from meteorological weather sites on the internet.
 - a. The National Weather Service's (NWS) "Interactive NWS" or iNWS, is a source of information of impending severe weather for emergency managers through text messages sent to a registered smartphone. The message displays a map of the warning area and the nature of the severe weather. Based on the severity of the weather, this text message is forwarded to City public safety and public works managers or followed-up with a telephone call to alert them of the impending weather.
 - b. All City-owned facilities are equipped with NOAA weather alert radios which activate when the NWS in Tampa Bay transmits a message indicating impending severe weather conditions.
2. Hurricanes and their related storm surge and inland precipitation amounts present a flood threat to citizens of the City; therefore, all tropical advisories will be monitored.

3. The WPC issues advisories at least at six-hour intervals during the progress of all tropical depressions, storms, and hurricanes. The National Hurricane Center (NHC) issues tropical and Hurricane “Watch” (48 hour) or “Warnings” (36 hour) for specified coastal areas. The Storm Surge Unit within the NHC will issue similar watches and warnings for storm surge potentials.
 - a. When a watch or warning has been issued for Southwest Florida, the Emergency Manager will assess the situation and if appropriate, call a briefing session with the directors of all City departments.
 - b. The Public Information Officer (PIO) in coordination with Emergency Management will begin issuing news advisories.
 - c. Depending on the situation, all advisories received from Tampa Bay Weather, the WPC, or Sarasota County will be condensed and retransmitted via email to all City department directors.
 - d. Announcement of pertinent information in the Sarasota County “Disaster Planning Guide” and the other sources will be brought to the public's attention.
4. The United States Geological Survey (USGS) and National Weather Service has established a monitoring system of gauges to display data on streamflow, precipitation and height. Personnel may subscribe to the USGS “WaterAlert” System to receive daily emails whenever a pre-determined gauge height has been exceeded. This data is then used by City Emergency Management and Public Works to determine the potential for stormwater flooding.
 - a. A gauge at the Myakkahatchee Creek at Tropicaire Boulevard is a key sentinel point for determination of flood probability and response by emergency personnel and public works. Historically, one inch of rainfall at the Creek is equivalent to 0.6 to 0.7 feet of rise in the Creek’s level. Adverse conditions (i.e., backup of the drainage system resulting in water-covered streets) are typically encountered at a gauge height of 23.00 feet. The City of North Port financially-supports the cost of this gauge with the USGS.
 - http://waterdata.usgs.gov/nwis/uv?site_no=02299450.

- b. The headwaters of the Creek at SR 72 in Myakka City are a secondary source of data from which the City makes assumptions of stormwater flow. Historically, rainfall in Myakka City flowing down the Myakkahatchee Creek will typically take about 12 to 24 hours to reach the City. The historic correlation of Tropicaire gauge height to extent of street flooding is used to establish potential impacts on the streets in the Estates and downstream adjacent to the Creek.
- http://waterdata.usgs.gov/usa/nwis/uv?site_no=02299410.
- c. The Myakka River gauge at US 41 allows personnel to view stormwater effects from upstream against tidal flows from the River and Charlotte Harbor. From this information, we can make assumptions on drainage from the Myakkahatchee Creek and east/west waterways into the Myakka River. If the flow from the River is high and there is an incoming high tide and storm surge, flow from the Creek and waterways will be prevented from draining and may backup.
- https://waterdata.usgs.gov/nwis/uv/?site_no=02299230.
- d. Another gauge on the Myakka River at the Myakka River State Park, operated by the National Weather Service, Southeast River Forecasting Center, presents data on flow upstream of US 41 and therefore gives us, as with the headwaters of the Myakkahatchee Creek, an idea of what flow is headed to North Port.
- <https://water.weather.gov/ahps2/hydrograph.php?wfo=tbw&gage=mkcf1>.
- e. A USGS gauge on the Myakkahatchee Creek at the Water Treatment Plant (Water Control Structure 101) allows operators and stormwater managers to see the level at the plant's intake pipe. As stormwater managers open water control structures to divert flow, they must coordinate their actions with plant operators to ensure sufficient depth for water to gravity flow into the intake pipe.
- <https://waterdata.usgs.gov/nwis/uv?02299484>.

f. The gauge at the Myakkahatchee Creek at W. Price Boulevard serves as a backup to our primary point at Tropicaire Boulevard.

- https://nwis.waterdata.usgs.gov/fl/nwis/uv?site_no=02299472.

5. All North Port Fire Rescue stations are equipped with weather stations which transmit real-time data to Fire Rescue's internet site: <http://cityofnorthport.com/government/city-services/fire-rescue/weather>. The information provided by the weather stations gives our emergency managers and the public a Citywide view to monitor changing weather conditions, make informed decisions, communicate with those involved, and take appropriate precautionary measures.

V. RESPONSE

A. Public Notification

Increasing the public's awareness of flood hazards and the methods they can use for protecting themselves from the effects of these hazards is a necessary part of reducing disaster potential, preparing for disasters as well as a continuing responsibility of public officials. In addition, providing accurate information immediately before, during and after a flood emergency or disaster is very important for saving lives, minimizing damage, and informing people of various assistance programs. This Annex describes the organization and procedures for providing accurate information to the public.

1. The City's Management Team, comprised of directors of each of the City's departments, will meet periodically before, during and after a flood emergency to minimize conflicting information being disseminated to the public.
2. Emergency Management operates the North Port Community Notification System (CodeRED®) which is an emergency notification system for recorded messages, text and email.
3. The City of North Port provides routine and emergency information via Twitter, Facebook and news releases on the City's website.
4. An Internet website containing City of North Port emergency management information that would be of interest to the public and official agencies is available. This information is regularly updated, especially when the EOC is activated.

5. The Crisis Communication and Public Information appendix to the Comprehensive Emergency Management Plan describes how the City will alert and continually update the public on impending or actual emergencies. Pre-scripted emails and text messages have been developed for use by the Public Information Officer in quickly disseminating relevant information.
 - a. During an emergency/disaster that might result in flooding over parts of the community, a team of telephone operators will be assembled near the EOC to provide information to the public. At least one of the operators may be bilingual (to include Spanish and Ukrainian).
6. The City may contact the National Weather Service to activate weather alert radio for North Port-specific flooding or for other emergencies, such as hazardous materials releases, wildfires and civil disturbances.
7. A low-wattage radio station serving the North Port-area, WKDW at 97.5 FM and live internet stream via <http://kdwradio.com/> may provide City-specific information during emergencies.
8. If necessary due to a nighttime threat or a quickly escalating threat to residents, sirens and loudspeakers from police and fire vehicles may be utilized to warn the public of impending flood conditions, tornado potential, or hazard materials spill. Vehicles with sirens will pass through the threatened neighborhood to awaken the public with instructions to tune into local media stations for further information on the impending dangers. A map will be produced for the specific area to be notified and provided to field personnel.
9. During periods of County Emergency Operation Center activations, WMTX 100.7 FM (the Local Primary (LP) 1 and LP2A stations), WWRM 94.9 FM (the LP2B station), WHPT 102.5 FM (the LP2C station) and local government access (Comcast cable channel 19, Verizon FIOS channel 32) may broadcast directly from Sarasota County. Other Emergency Alert System (EAS) Operational Stations in Sarasota County include:

WKXY AM 930	WJIS FM 88.1
WFLA AM 970	WLTQ FM 92.1
WTMY AM 1280	WKZM FM 104.3
WDDV AM 1320	WCTQ FM 106.5
WSDV AM 1450	WSRZ FM 107.9

10. The City of North Port does not use outside warning sirens for alerting the public of a weather-related emergency. A siren system cannot be as specific as the alert radio. Emergency Management for the City of North Port recommends the purchase of a NOAA weather radio, as opposed to using outside warning sirens, for the notification of weather-related emergencies.
 11. Television customers will see the warning as a “crawl” at the bottom of the TV screen. The Weather Channel (Comcast cable channel 31 and 522, Verizon FIOS channel 119) routinely transmits all warnings for this area on receipt.
 12. Sarasota County is mandated under Florida Statutes [§252.355](#) to register all persons who have special transportation or medical needs during an evacuation situation. The process for notification is as follows:
 - a. Once a storm threatens, and evacuation orders are imminent, the persons on the list which are residing in the potentially threatened area are called by a phone bank, which has been staffed and trained by Sarasota County Emergency Management and managed from the County EOC. The people are notified that they are about to be picked up, and that they need to get their personal effects together.
 - b. The list is given to the Medically Dependent Person (MDP) Operations at the County EOC which develops routes to pick up these people via school bus with hydraulic lift, the Sarasota County Area Transit (SCAT) via buses with hydraulic lift, and North Port Fire Rescue for transport of non-ambulatory clients.
 - c. These individuals and their caregivers will then be picked up and brought to a designated facility in county, if the situation allows for it, or out of county, for larger incidents.
- B. North Port Emergency Management maintains a Critical Facilities Inventory (CFI) for the City. Given the sensitive nature of the facilities, they are protected under Florida Statute Chapter 119, the locations of which are not included in this Plan. Contact information for each facility is maintained in Fire Rescue’s records management system.
- C. Activation Levels and Department Responsibilities

In addition to the common roles and responsibilities of City departments in the CEMP's Base Plan (Section III(C)), the following missions are flood-specific during a level of EOC activation:

1. Flood Threat Recognition Phase (Level III, Monitoring Phase)

This phase may have several pre-disposing conditions whereby any, or all those conditions being absent may not warrant a flood threat concern. The following conditions, compounded, increase the flood threat concern and result in the associated Emergency Operations Center activation level.

- Saturated grounds due to prolonged rainy periods whereby absorption into the soil is hindered, and/or a period of three to five inches has fallen in the City or over the Big Slough Watershed within a 24-hour period.
 - A series of rain clouds producing a "training effect" (i.e., repeated areas of rain, typically associated with thunderstorms, that move over the same region in a relatively brief period and are capable of producing excessive rainfall totals over an area).
 - Condition of Myakkahatchee Creek's USGS gauge reading is at 21.00 feet and rising (Action Level)
 - Condition of headwaters of Myakkahatchee Creek at State Road 72 in Myakka City is at gauge reading 27.00 feet and rising
- a. Emergency Management will:
- i. Monitor the flooding potential and disseminate the information to those most affected via means identified in the Base Plan (e.g., City email, North Port's Community Notification system).
 - ii. Collaborate with both the National Weather Service in Tampa Bay and Sarasota County Emergency Management on the flooding event potential.
 - iii. Using Geographic Information System (GIS) mapping products depicting areas susceptible to past flooding events, alert response agencies based on the weather forecasts.
 - iv. Brief the City Management Team, as needed.

- b. Public Works Department will maintain 24-hours x 7-day capability to respond to public regarding roadway, waterway, and drainage system concerns. They can also deploy low-draft water craft.
- c. The Police Department will be prepared to provide traffic control and rerouting in flooded areas.
- d. Fire Rescue will deploy high-clearance vehicles for potential rescue or delivery of emergency supplies.

2. Emergency Warning Dissemination (Level II, Partial Activation)

During this phase the National Weather Service - Tampa Bay has issued a "Flood Watch" and the conditions cited above are the most unfavorable for the grounds absorbing a heavy rainfall amount and therefore roadway flooding, etc., will present hazardous/adverse conditions to the public. Additional considerations for activating to this level:

- Public Works has redirected flow away from the Creek and additional capacity is limited
 - Condition of Creek is at 23.00 feet and rising (Flood Level)
 - Stormwater drainage system showing signs of being inundated
 - Water beginning to approach road surfaces in historically impacted areas
 - Water is covering road surfaces in areas typically unaffected by severe storms
 - Water is covering road surfaces of collector or arterial streets
 - Water is threatening critical infrastructure
- a. Emergency Management will:
 - i. Continue with all activities in the Threat Recognition Stage.
 - ii. Coordinate with the PIO regular updates via email/Web Page to City staff, and the public.

- iii. Assemble partial City EOC staff, and brief at the initial stages of Level II Activation, depending on the anticipated severity of the event.
 - iv. Monitor the flooding event and disseminate details of the impacts via all means identified in the CEMP's Base Plan.
 - v. Continue to collaborate with Sarasota County Emergency Management on situation status, and need for additional resources.
 - vi. Pre-identify and coordinate shelter openings with the County and partner agencies, as required.
 - vii. Initiate actions for a Local State of Emergency, if warranted.
- b. Fire Rescue will:
- i. Coordinate resource requests and mission assignments for high-clearance vehicles for rescue and delivery of emergency commodities.
 - ii. Provide a liaison to the City EOC.
- c. Police will:
- i. Coordinate road blockage and traffic rerouting.
 - ii. Provide a liaison to the City EOC.
- d. Public Works Department will:
- i. Provide a liaison to the City EOC to maintain an accurate, current listing of affected roadways.
 - ii. Take reports from the public regarding flooding and maintain flooding records.
 - iii. Blockade flooded roadways as necessary.
 - iv. Monitor water flow in the waterway system, and adjust water control facilities.

- v. Provide analysis of flood waters, and coordinate with Public Works to adjust water control facilities.
- vi. Provide low-draft watercraft
- e. Other Participating Departments will:
 - i. Initiate tasks common to department irrespective of disaster (e.g., Damage Assessment - Buildings, Cost Accounting - Finance, Purchasing - Finance, etc.).
 - ii. Provide a liaison to the City EOC, as requested.
- 3. Emergency Response Elements (Level I, Full Activation)
 - a. Emergency Management will:
 - i. Activate the City EOC to Level I, and request full staffing from participating City departments.
 - ii. Coordinate the inter-departmental response and recovery to the event from the City EOC.
 - iii. Submit resource requests and situation status to the County EOC.
- D. Re-entry to evacuated areas is a controlled activity for residents, people who work in the area and for contractors, and others seeking work in the evacuated area. Re-entry will be permitted only during daylight hours.
 - 1. The Police Department will manage appropriate Traffic Control Points (TCP), as identified by number and intersection on the TCP maps maintained in the EOC.
 - 2. Proof of residency in the area or area employment must be presented at the TCP to gain re-entry.
 - a. For residents, a driver license listing an address in the evacuated area is acceptable for re-entry. Lacking that specific documentation of residency in the evacuated area can be established by photo ID along with a utility bill addressed to the bearer at the area address, or a lease or proof of building ownership.

- b. Employees of businesses in the evacuated area must present a photo ID issued by that business for the address in the evacuated area, or a photo ID along with other proof of employment at the business address in the evacuated area such as a paycheck stub.
3. Re-entry to evacuated areas will begin and will be only during daylight hours, and as damage assessment, debris removal and the status of utilities restoration permits. When the evacuated area is large or involves multiple sectors, re-entry is likely to take place in phases. Local radio broadcasts will be used to announce which areas are open for re-entry, and when re-entry will commence.
4. Persons evacuated under the Medically Dependent Person (MDP) program will be returned to their homes after their homes are determined to be habitable.

VI. ADMINISTRATION

A. Records Preservation and Restoration

1. The City Clerk is responsible for the maintenance and preservation of all records. All City departments, to specifically include the Information and Technology Division, must ensure the protection of vital records so that normal activities may continue after the disaster. These records may also be necessary for the rapid recovery from the effects of a flood disaster.
2. Damage to records is most often the result of fire and water damage. These records can often be saved by prompt salvage action. Technical guidance for records preservation can be obtained from the City Clerk's office.

B. Funding and Accounting

1. The City of North Port may allocate and expend funds as appropriate for local emergency operations. Depending on the onset of hazardous weather conditions, any of the following mechanisms may be implemented:

- a. Local Accounting

Complete accurate accounts of emergency expenditures and obligations, including personnel and equipment costs, must be maintained. Accurate accounting is required to identify and document:

- i. The determination of eligibility under the FEMA Public Assistance grant program. Funds for which Federal reimbursement will be requested should a Presidential Declaration be made for a Major Disaster.
- ii. Processing of insurance claims.

b. Cost Centers

Given the time and the urgency of the threat, the Emergency Manager may ask the Finance Department, via the City Manager, to establish and fund any, or all the following types of cost centers:

- i. Departmental – This cost center will be used to fund all extraordinary departmental activities in response to, or associated with, the hazardous weather event.
- ii. Debris Removal - This cost center draw will be limited only to those activities associated with debris removal (e.g., contractor services or force labor).

- 2. When the EOC is activated, all agencies should regularly, or upon request, report their expenditures so that the total budgetary impact to the City can be related to the County Emergency Operations Center.

C. Emergency Purchasing

Under Section 2-408, Emergency Procurement, of the Code of the City of North Port, the normal competitive process is waived, and the purchase of certain equipment and contracts is authorized with the approval of the department director, City manager or City Commission, depending on the cost.

D. Maintenance and Auxiliary Activation of the City of North Port Flood Warning and Response Program

The Emergency Manager will maintain and update this program as required. Portions of this program will be activated periodically to conduct exercises as part of the review process.

VII. AUTHORITIES AND REFERENCES

A. Public Law 91-606, Disaster Relief Act of 1970

- B. Public Law 93-288, Disaster Relief Act of 1984
- C. Public Law 100-707, Stafford Act
- D. Chapter 252, Florida Statutes, as amended
- E. City of North Port Charter, and Code of the City of North Port
- F. City of North Port Comprehensive Emergency Management Plan
- G. Sarasota County Comprehensive Emergency Management Plan
- H. Mutual Aid Agreements (e.g., Statewide Mutual Aid Assistance, Statewide, Florida Fire Chiefs, etc.)

VIII. ACRONYMS

CEMP	Comprehensive Emergency Management Plan
DCA	[Florida] Department of Community Affairs
EAS	Emergency Alert System
EOC	Emergency Operations Center
FDEM	Florida Division of Emergency Management
FFCA	Florida Fire Chiefs' Association
FEMA	Federal Emergency Management Agency
FLNG	Florida National Guard
FS	Florida Statutes
GIS	Geographic Information System
ICS	Incident Command System
LP1	Local Primary 1 [EAS operational radio station]
LP2	Local Primary 2 [EAS operational radio station]
MDP	Medically Dependent Person (People)
NHC	National Hurricane Center
NOAA	National Oceanographic and Atmospheric Administration
NWS	National Weather Service
PIO	Public Information Officer
SEOC	[Florida] State Emergency Operations Center
SMAA	Statewide Mutual Aid Agreement
SWFWMD	Southwest Florida Water Management District
SWP	[Florida] State Warning Point
TPC	Tropical Prediction Center

IX. LIST OF FIGURES

Figure 1: City of North Port / Big Slough Water Shed Map

Figure 2: City of North Port FEMA Flood Zones

Figure 3: Sarasota County Hurricane Evacuation Zones

ANNEX E**HAZARDOUS MATERIALS AND OIL SPILL RESPONSE****I. PURPOSE****II. EXPLANATION OF TERMS**

- A. Acronyms
- B. Definitions
- C. References

III. SITUATION AND ASSUMPTIONS

- A. Situation
- B. Assumptions

IV. METHOD OF OPERATIONS

- A. General
- B. Incident Classification
- C. Reporting
- D. Determining Affected Areas and Protective Actions
- E. Phases of Emergency Management
- F. National Incident Management System

V. ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES

- A. Organization
- B. Assignment of Responsibilities
- C. Relationship to Other Plans

VI. ADMINISTRATION AND SUPPORT

- A. Support
- B. Documentation and Investigative Follow-up
- C. Resources, Training and Exercises
- D. Cost Recovery

VI. ANNEX DEVELOPMENT & MAINTENANCE

- A. Responsibility
- B. Schedule for Annex Updating

APPENDICES

1. Personal Protection of Citizens
2. Containment and Clean-up
3. Regulated Hazardous Materials Facilities
4. Transportation Routes

I. PURPOSE

- A. The purpose of this annex is to establish guidelines under which the City will operate in the event of a hazardous material or oil spill incident.
- B. It defines the roles, responsibilities and inter/intra organizational relationships of government and private entities in response to a hazardous material or oil spill incident.
- C. It provides guidance to protect the population and the environment from a hazardous material or oil spill incident.

II. EXPLANATION OF TERMS

A. Acronyms

CEC	Community Emergency Coordinator
CEMP	Comprehensive Emergency Management Plan
CHEMTREC	Chemical Transportation Emergency Center
EPA	[US] Environmental Protection Agency
EPCRA	Emergency Planning, and Community Right-to-Know Act of 1986
FEMA	Federal Emergency Management Agency
FDEM	Florida Division of Emergency Management
FDEP	Florida Department of Environmental Protection
FDOH	Florida Department of Health
FDOT	Florida Department of Transportation
FHP	Florida Highway Patrol
FOSC	Federal On-Scene Coordinator
HMRT	Hazardous Material Response Team
IC	Incident Commander
ICP	Incident Command Post
ICS	Incident Command System
LEPC	Local Emergency Planning Committee
NIMS	National Incident Management System
NPFR(D)	North Port Fire Rescue (District)
NPPD	North Port Police Department
OPA	Oil Pollution Act of 1990
PIO	Public Information Officer
RP	Responsible Party
SCFD	Sarasota County Fire Department
SOSC	State On-Scene Coordinator
SWO	State Watch Office
USCG	United States Coast Guard

B. Definitions

1. **Accident Site:** The location of an unexpected occurrence, failure, or loss, either at a facility or along a transport route, resulting in a release of listed chemicals.
2. **Acute Exposure:** Exposures that occur for relatively short periods of time, generally hours to 1-2 days.
3. **CHEMTREC:** The Chemical Emergency Transportation Center (CHEMTREC) is a centralized toll-free telephone service advice on the nature of the product and steps to be taken in handling the early stages of transportation emergencies where hazardous chemicals are involved. CHEMTREC promptly contacts the shipper of the material involved for more detailed information and appropriate follow-up action including on-scene assistance when feasible.
4. **Contingency Plan:** A document developed to identify and catalog all the elements required to respond to an emergency, to define responsibilities and specific tasks, and to serve as a response guide.
5. **Exclusion Zone:** Is the area where contamination does or could occur.
6. **Extremely Hazardous Substances:** Chemicals listed by EPCRA which can cause both severe short- and long-term health effects after a single, brief exposure (short duration). These chemicals can cause damage to living tissue, impairment of the central nervous system, severe illness or in extreme cases, death when ingested, inhaled, or absorbed through the skin.
7. **Fixed Facility:** A plant site where manufacturing, handling/transferring, processing, storage, and/or disposal of chemicals is performed.
8. **Hazard:** A situation that may result in death or injury to persons or in damage to property. Includes effects of toxicity, fire, explosion, shock, concussion, fragmentation and corrosivity.
9. **Hazard Analysis:** In this context, use of a simplified vapor dispersion model which looks at the movement of toxic or explosive vapors over distance at a concentration level of concern to determine whether the amount of chemical at a facility or in a transport container poses a threat to the surrounding community, requiring more detailed analysis and planning.

10. **Hazardous Materials:** Chemicals that are explosive, flammable, poisonous, corrosive, reactive, or radioactive and require special care in handling because of the hazards they pose to public health and the environment.
11. **NCP:** The National Contingency Plan establishes the structure by which the Federal government responds to episodic hazardous material release and oil spill events.
12. **Off-site:** The area outside the boundary of the on-site area that may be affected by the consequences of an extraordinary situation.
13. **On-scene:** The total area that may be impacted by the effects of an extraordinary situation. The on-scene area is divided into mutually exclusive on-site and off-site areas.
14. **On-scene Command Post:** Facility at a safe distance from an accident site, where the IC, responders and technical representatives can make response decisions, deploy manpower and equipment, maintain liaison with media and handle communications.
15. **On-site:** The area within the boundary established by the owner of a fixed facility.
16. **Plume:** A vapor cloud formation that has shape and buoyancy.
17. **Response:** The efforts to minimize the hazards created by an emergency by protecting the people, the environment, property and returning the scene to normal pre-emergency conditions.
18. **Terrorist Activities:** A violent act, or an act dangerous to human life, in violation of the criminal laws of the United States or of any State, to intimidate or coerce a government, the civilian population, or any segment thereof, in furtherance of political or social objectives.
19. **Weapons of Mass Destruction:** Any destructive device as defined in 18 U.S.C. §§ 921 and 2332a, which reads: (1) any explosive, incendiary, or poison gas, bomb, grenade, rocket having a propellant charge of more than four ounces, missile having an explosive or incendiary charge of more than one quarter ounce, mine or device similar to the above; (2) poison gas; (3) any weapon involving a disease organism; or (4) any weapon that is designed to release radiation or radioactivity at a level dangerous to human life.

C. References

1. Emergency Planning and Community Right-to-Know Act (EPCRA), also known as Title III to the Superfund Amendments and Reauthorization Act of 1986, 42 U.S.C. § 11000.
2. Resource Conservation and Recovery Act (RCRA), 42 U.S.C. §§ 6901-6992k.
3. Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), also known as the Superfund Law, 42 U.S.C. §§ 9601–9675.
4. Section 112r of the Clean Air Act Amendments of 1990, 42 U.S.C § 7412.
5. Oil Pollution Act, 33 U.S.C. § 2701.
6. Hazardous Waste Operations and Emergency Response, 29 C.F.R. § 1910.120.
7. Florida Emergency Planning and Community Right-To-Know Act, F.S. §§ 252.81-252.90.
8. Hazard Communication Standard, 29 C.F.R. § 1910.1200, as amended by 52 F.R. 31,852, August 24, 1987.
9. USCG Marine Safety Office Tampa Bay, Area Contingency Plan.
10. EPA Region IV Oil and Hazardous Substances Pollution Contingency Plan.

III. SITUATION AND ASSUMPTIONS

A. Situation

1. Hazardous materials are commonly produced, stored, used, distributed and transported in the City; hence, hazardous materials incidents may occur as the result of natural disasters, human error or accident, or terrorist acts.
2. The North Port Fire Rescue District's personnel are trained to the hazardous materials awareness level. The closest technician-level service is from the Sarasota County Fire Department (SCFD) which will be requested for hazardous materials incidents within the City.
3. The SCFD Hazardous Materials Response Team (HMRT) will have, to the extent possible, the capability to make protective responses in the event

of an incident involving the transportation, storage, usage, or manufacture of hazardous materials.

4. The resources of industry, environmental consultants; emergency response companies; and local, State or Federal governments, separately or in combination, may be required to effectively manage the situation.
5. Information on sites regulated by EPCRA is maintained by the Southwest Florida LEPC, and the North Port Fire Rescue, Division of Emergency Management. Refer to Appendix 3 for a map of regulated facilities.
6. Underground natural gas and propane distribution lines are ubiquitous in the City and are identified with above-ground pipeline markers. Tampa Electric (Peoples' Gas) is responsible for natural gas, and AmeriGas propane distribution lines; the AmeriGas lines are in the process of being vacated with the expectation of elimination by 2020.
7. Major transportation routes for hazardous materials cargo are indicated in Appendix 4 to this Annex.
8. Evacuation routes should be determined by the Incident Commander and disseminated to the residents in the affected area based on the current and projected situation.

B. Assumptions

1. The existence of fixed hazardous materials facilities and natural gas/propane distribution lines provide the potential for an episodic air release with the possibility of being hazardous to the populous located within the proximity of each fixed hazardous materials facility.
2. Protective actions include alerting, in-place sheltering, evacuation, and notification of any environmental contamination.
3. The amount of time available to determine the scope and magnitude of the incident (i.e., lead-time) will impact the recommended protective actions.
4. In the event of a hazardous material incident, many of the residents in the vulnerable zone may choose to evacuate spontaneously without official recommendation. Many may leave by way of routes not designated as main evacuation routes.

5. In the event of an evacuation, some of the populace may relocate to private homes or hotel/motel facilities.
6. A transportation incident involving hazardous materials may require the evacuation of the public at any location within the City.
7. Hazardous materials entering the wastewater (i.e., sanitary sewers, lift stations and/or treatment plants) systems may necessitate the shutdown of the affected system or its components which may result in the release (bypass) of untreated wastewater. Hazardous Materials entering the stormwater system (i.e., storm sewers, roadside swales, streams) may require containment to prevent or otherwise restrict further downstream flow.
8. Wind shifts may occur that result in changes in protective action measures.

IV. METHOD OF OPERATIONS

A. General

This Annex will become effective during any situation in which there is a danger to life, health, property or the environment because of an accident involving the uncontrolled release or spill of any hazardous materials. The primary agencies involved will be the City's fire and police departments, assisted by other City and County departments as appropriate. The extent of the hazard and circumstances involved may require the activation of the Emergency Operations Center (EOC) and full disaster response from City agencies and outside organizations as outlined in the City's Comprehensive Emergency Management Plan (CEMP).

Depending upon the seriousness of the incident, protective actions could include alerting, sheltering in-place, evacuation and notification of other appropriate agencies.

The Incident Commander (IC) / Unified Command (UC) will direct and control all on-site operations involving hazardous material emergencies that may include estimating the areas and population affected by a hazardous materials release and provide warning to and implementation of protective actions for the public in the immediate vicinity of the incident site.

B. Incident Classification

The North Port Fire Rescue District classifies the response to hazardous materials into two basic categories:

1. First Responder Operations - those events of a hazardous materials nature that can typically be resolved by first responders without the intervention of a hazardous materials response team. This may include:
 - a. Minor spills of a petroleum product
 - b. Natural gas/propane distribution line break
 - c. Other hazardous materials for which personnel have had specific training, and whose structural firefighting gear is sufficient protection
 2. Hazardous Materials Incident - those events of a hazardous materials nature that cannot typically be resolved by first responders and require the intervention of a hazardous materials response team.
- C. Reporting
1. First responders arriving upon a scene where hazardous materials are found to be involved will immediately notify their dispatcher and provide the following size-up insofar as possible:
 - a. Location of accident
 - b. Type of material involved
 - c. Extent of injuries and damage
 - d. Estimate of need for additional resources
 - e. Estimate of need for anticipated area evacuation
 - f. The actions being taken
 2. In the event the initial report is through police radio channels, the North Port Police Department dispatcher will immediately pass the above information to the Sarasota County fire dispatcher.
 3. **Special Statement: IF THE SITUATION OBVIOUSLY REQUIRES IMMEDIATE ACTION TO ISOLATE THE AREA OR TO EVACUATE NEARBY RESIDENTS OR BUILDING OCCUPANTS (i.e., IF THERE IS IMMINENT DANGER OF EXPLOSION OR RELEASE OF TOXIC GAS), THE FIRST OFFICER ON THE SCENE (EITHER FIRE OR POLICE) SHOULD RECOMMEND EVACUATION**

IMMEDIATELY. Adjustment of the evacuation zone can be made later after the senior fire official arrives on the scene.

4. Notification
 - a. On notification of an incident involving hazardous materials, the fire dispatcher will:
 - i. Dispatch NPFR units and the SCFD HMRT.
 - ii. If the situation warrants, notify the following departments:
 - North Port Police
 - North Port Public Works
 - North Port Utilities
 - b. The Emergency Management Coordinator, or other on-scene officer, shall contact the State Watch Office, and provide information on the incident.

D. Determining Affected Areas and Protective Actions

1. The Incident Commander shall estimate areas and population affected by a hazardous materials release. Aids for determining the size of the area affected may include:
 - a. The US Department of Transportation Emergency Response Guidebook
 - b. Computerized release modeling (CAMEO/other software)
 - c. Assistance by the responsible party
 - d. Assistance by expert sources such as CHEMTREC
 - e. Assistance by State and Federal agencies
2. The Incident Commander shall determine required protective actions for response personnel and the public. See Appendix 1 for emergency responder safety considerations. See Appendix 2 for public protective action information.

3. The Incident Commander will typically provide warning to and implement protective actions for the public in the immediate vicinity of the incident site. The Emergency Manager will normally oversee dissemination of warning and implementation of protective actions for the public beyond the immediate incident site and related activities such as traffic control and activation of shelters.

E. Phases of Emergency Management

1. Mitigation

- a. Develop inspection guidelines
- b. Conduct site inspections
- c. Enforce current fire and other City codes

2. Preparedness

- a. Conduct public orientation/education programs
- b. Provide for training for all emergency response personnel
- c. Conduct preplanning activities at regulated facilities
- d. Identify resources (e.g., contractors and specialized equipment)
- e. Develop recovery guidelines

3. Response

- a. Determine hazard and its potential
- b. Initiate protective actions to protect life, property and the environment
- c. Contain and control the hazard

4. Recovery

- a. Monitor/survey to declare area safe
- b. Coordinate the removal of contaminants

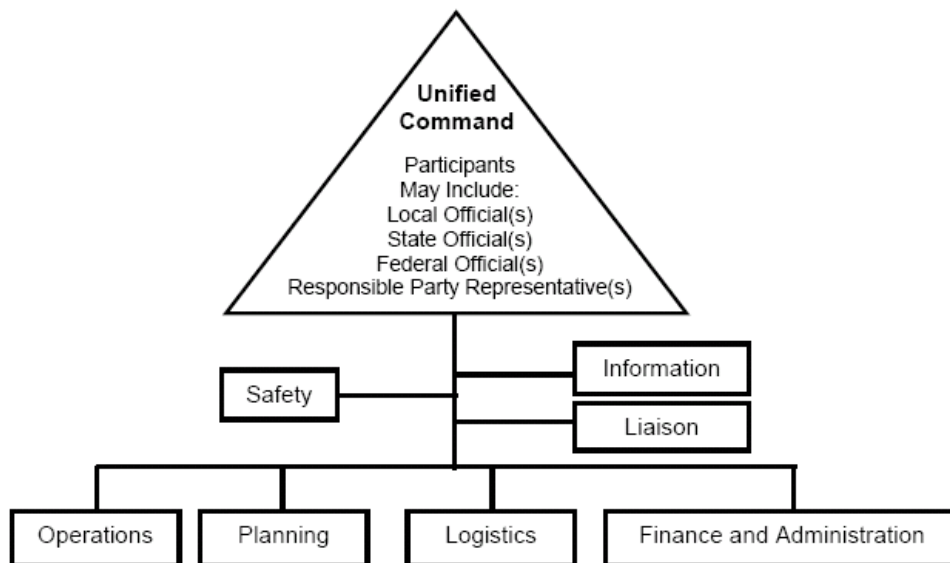
- c. Document event
 - d. Recover costs
- F. National Incident Management System (NIMS)

The National Incident Management System (NIMS) will be used to manage and efficiently mitigate any such incident by integrating a combination of facilities, equipment, personnel, procedures, and communications into a common organizational structure.

V. ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES

A. Organization

- 1. See City’s Base Plan.
- 2. Effective response to a hazardous materials incident or oil spill may also require response assistance from the responsible party (RP) for the spill and in some situations, by State and Federal agencies with responsibilities for hazardous materials spills. In this instance, a Unified Command (UC) structure would be established.



B. Assignment of Responsibilities

1. Southwest Florida Local Emergency Planning Committee

- a. Coordinate with the emergency coordinators of regulated facilities and vulnerable facilities to maintain the list of regulated facilities and the list of vulnerable facilities.
- b. Maintain an accurate and up-to-date hazardous materials emergency contact roster that provides 24-hour contact information for regulated facilities, local hazardous materials transportation companies, vulnerable facilities, State and Federal hazardous materials response agencies, and technical assistance organizations such as CHEMTREC. Disseminate this roster to local emergency responders.
- c. Ensure each regulated facility and local hazardous materials transportation company is notified of the telephone number to be used to report hazardous materials incidents to local authorities.
- d. Coordinate the review of regulated facility emergency plans by local officials.

2. North Port Fire Rescue

- a. The first fire department officer arriving on the scene
 - i. Assume duties of IC until relieved by a higher-ranking fire officer.
 - ii. Establish an Incident Command Post (ICP) and determine the safest approach route (either upwind or crosswind).
 - iii. Take immediate steps to identify the hazardous material, and report to fire dispatch.
 - iv. Isolate the area and deny entry to all but necessary emergency response personnel.
 - v. Develop and initiate a plan of action appropriate to the situation, in accordance with North Port Fire Rescue procedures.

- vi. Determine the need for emergency protective measures and ensure implementation of plan.
 - b. Initiate mass gross decontamination of victims.
 - c. Provide support to the HMRT as appropriate.
 - d. Provide a PIO as department spokesperson and coordinate public information and media releases with the City PIO.
 - e. If a Responsible Party (RP) has not been identified or is unwilling to assume the responsibility for cleanup and disposal of the hazardous substance and contaminated materials, it may be necessary for the City to contract with a hazardous materials cleanup company to perform those tasks.
3. The Sarasota County Fire Department HMRT
- a. Identify the hazardous material if possible and determine its hazards and any appropriate action(s) to be taken to manage the incident.
 - b. Confine or contain the hazardous material to the smallest area possible.
 - c. Stabilize the emergency through limiting or stopping further release of the hazardous material.
 - d. Serve as an advisor to the IC.
 - e. Decontaminate victims, personnel, equipment and facilities.
 - f. Work with the Responsible Party and hazardous materials clean-up contractor to identify appropriate methods for removal of hazardous substances and contaminated materials.
4. North Port Police
- a. The senior police officer at the incident scene will report to the ICP.
 - b. Initiate evacuation of persons from the danger area when requested to do so by the IC.

- c. Cordon-off access to the scene and restrict entry by unauthorized personnel. Entry by non-emergency personnel will be permitted based on officer judgment or proper identification.
 - d. When necessary, coordinate local law enforcement activities with State and Federal law enforcement agencies.
5. North Port Emergency Management
- a. Emergency Management Coordinator will respond to the scene and report to the ICP.
 - b. Determine if use of a mass notification system is required and/or press briefings are needed to keep the public informed. Coordinate with NPFR and other Department PIO representatives before any releases are forwarded to the media.
 - c. Coordinate efforts of volunteer groups in relocating, sheltering and feeding evacuees.
 - d. When the IC recommends evacuation, coordinate the evacuation operations.
 - e. When directed by the IC, activate and manage the EOC.
 - f. Coordinate with other City departments and outside agencies as required.
 - g. Initiate and coordinate cost recovery.
6. American Red Cross
- a. Staff and operate shelter/mass care facilities
 - b. Register evacuees
 - c. Provide emergency clothing
 - d. Provide emergency food
 - e. Process inquiries from concerned families outside the disaster area

- f. Maintain a current list of shelters, emergency feeding sites, and lodging facilities
 7. Recommended roles of transportation shippers and fixed facility operators of Hazardous Materials within the Incident Command System (ICS)
 - a. Designate a facility emergency coordinator to be assigned to the ICP
 - b. Implement facility contingency plan
 - c. Provide technical support to IC
 - d. Provide post planning support for dealing with contingency planning to include Risk Management plans
 - e. Provide expertise to the EOC
 - f. Provide emergency service representative (fire brigade) to the ICP
 - g. Provide public information representative to the ICP
 - h. Provide for the removal and ultimate disposal of hazardous substances and contaminated materials, and restoration of affected area.
 8. State Agencies with responsibility include:
 - a. Florida Division of Emergency Management (FDEM)
 - b. Florida Department of Environmental Protection (FDEP)
 - c. Florida Highway Patrol (FHP)
 9. Federal agencies with responsibility may include the Department Environmental Protection Agency (DEP), Federal Emergency Management Agency (FEMA) and the US Coast Guard (USCG) which may respond to certain hazardous materials incidents and oil spills when required by Federal environmental protection plans or requested to do so by the State.
- C. Relationship to Other Plans
1. See the City's Comprehensive Emergency Management Base Plan.

2. The SCFD's HMRT SOG establish operational concepts and activities for team activation, assessment, personnel safety, site control, identification containment, command post, staging areas, monitoring, on-site/off-site response coordination and recovery.
3. Extremely Hazardous Substance Fixed Facility Contingency Plan. Each fixed facility having extremely hazardous substances (as defined by EPCRA) is required to develop an on-site contingency plan that specifies notification, emergency response organization and responsibilities; emergency response organization procedures and coordination procedures for interfacing with off-site authorities and response organizations.
4. EPA and USCG Regional and Area Contingency Plans are required under OPA and the National Contingency Plan. They describe Federal response and recovery operations, and coordination with local and state agencies in the event of a spill or release of a hazardous material or oil in their respective areas of responsibility.

VI. ADMINISTRATION AND SUPPORT

A. Support

See the City's Basic Plan.

B. Documentation and Investigative Follow-up

1. The fixed-site facility is responsible for documentation of accidental releases and preparing the following:
 - a. Fixed-site version of the incident including time, cause of spills, material and quantity released, location, response actions, etc.
 - b. Chronological log that details a minute-by-minute account of spill response activities (e.g., emergency response team activation, notification of off-site authorities, significant changes in situation, time of recommendations to off-site authorities, etc.).
2. The on-scene NPFR senior officer is responsible for preparing an event log that summarizes the incident including cause of incident, incident critique, damage assessment and conclusion.
3. The North Port Emergency Manager will prepare an After-Action Report to document the event, and "lessons learned."

C. Cost Recovery

1. The City may directly invoice the responsible party for costs incurred during the response and recovery from the incident.
2. The US Environmental Protection Agency's (EPA) Local Governments Reimbursement Program provides Federal funds to local governments for costs related to temporary emergency measures conducted in response to releases or threatened releases of hazardous substances. Eligible local governments may submit applications to EPA for reimbursement of up to \$25,000 per incident.
3. If the incident involves an oil spill incident(s) which has impacted or substantially threatened the navigable waters of the U.S, the City may recover costs and damages under the Federal Oil Pollution Act (OPA) which is managed by the US Coast Guard.
4. If the disaster of a such magnitude that a Major Disaster Declaration is designated by the President of the United States, the City will seek reimbursement under the Stafford Act administered by FEMA.

D. Resources, Training and Exercises

1. Resources

NPFR will provide its front-line suppression units with limited equipment and supplies for product identification, and, based on department procedures, mitigation of the spill or release.

2. Training

- a. Initial hazardous materials training is conducted during basic firefighter class, and refresher training is provided on an annual basis.
- b. Specialized Response Training and Equipment for SCFD HMRT is the responsibility of the SCFD HMRT Training Coordinator.

3. Exercises

- a. Methods for exercising this annex are the Tabletop, Functional, and Full-Scale models for Hazardous Materials Emergency Events.

- b. NPFR will conduct its own and participate in County-wide exercises as needed.

VII. ANNEX DEVELOPMENT & MAINTENANCE

A. Responsibility

1. The Emergency Manager will be responsible for the development and maintenance of this Annex.
2. Each department and tasked agency should develop its own implementing instructions and procedures to support this Annex and reviewing these annually.

B. Schedule for Annex Updating

This annex will be maintained in accordance with the following schedule:

1. The Annex will be updated with each updating of the City's Comprehensive Emergency Management Plan.
2. The Annex will be reviewed after each exercise and/or actual response to a hazardous materials event and modified as necessary.
3. The annex will be reviewed and revised, if needed, after each of the following types of events:
 - a. A major change in applicable Federal or State laws, regulations, or policies.
 - b. Major advances in applicable response technology and/or operational concepts.

APPENDICES

- Appendix 1 - Personal Protection of Citizens
- Appendix 2 - Containment and Clean-up
- Appendix 3 - Regulated Facilities
- Appendix 4 - Transportation Routes

APPENDIX 1 TO ANNEX E PERSONAL PROTECTION OF CITIZENS

The following establishes policies and guidelines regarding the personal protection of citizens potentially affected by a hazardous materials incident. It includes the strategies of in-place sheltering and evacuation as well as relocation, water supply protection, and wastewater system protection

1. Sheltering In-place

- a. In some cases, advising people to stay indoors and to attempt to reduce the flow of air into a structure may be the most effective protective option. Emergency officials have used this strategy when it has been recognized that people could not be evacuated from an area prior to the arrival of a toxic chemical cloud.
- b. For an indoors protective strategy to be effective, planning and preparedness activities should provide:
 - i. In-place sheltering or evacuation guidelines to be developed by the SCFD HMRT for determining when sheltering or evacuation is appropriate based on decision-making criteria such as the type of chemical, toxicity, duration, etc.
 - ii. A public information and notification system to warn and advise the public of immediate danger.
 - iii. A system for determining when a toxic chemical cloud has dissipated or cleared an area.
 - iv. Notification procedure for advising people to evacuate a building at an appropriate time.
 - v. Public education on the value of indoor protection and on expedient means to reduce ventilation rates.

2. Evacuation

- a. Evacuation can be an effective means of protecting the public if it can be accomplished prior to the arrival of the toxic cloud at a particular location. The effectiveness of evacuation is dependent upon the time required to evacuate an area, and the size of the area compared to the time available before the cloud arrives.

- b. The responsibility for recommending an evacuation normally rests with the IC. The NPPD working with NPFR will carry out the evacuation. In situations where rapid evacuation is critical to the continued health and safety of the population, the IC may advise the public in the immediate vicinity to evacuate. Emergency Management will coordinate with the City Parks manager for the opening of a nearby Community Center(s) as a shelter for evacuees, if required.
 - c. If the emergency warrants and the IC recommends evacuation, NPPD officers will immediately initiate an evacuation. (Recommended evacuation distance guidelines for specific hazardous materials are contained in the Emergency Response Guidebook). The IC will determine the routes of evacuation.
 - d. Ingress for incoming personnel must be identified, so as not to endanger their lives in the process of reporting to the incident site. Evacuation guidelines must be coordinated with liaison personnel at the on-scene ICP to ensure the safety of everyone.
 - e. If an ordinance declaring a Local State of Local Emergency is adopted by City Commission, the EOC will be activated to coordinate the efforts of other County and municipal agencies and response personnel per the City's Comprehensive Emergency Management Plan.
3. Other Public Protection Strategies
- a. Relocation: Some hazardous materials incidents may contaminate the soil, surfaces or water of an area and pose a lingering threat to people living there. It may be necessary for people to move out of the area for a substantial period until the area has been decontaminated or until natural microbiological degradation of the chemical has occurred with time.
 - b. Water Supply Protection: Surface and ground water supplies can be contaminated by a hazardous chemical spill or release. Recovery and restoration planning must provide for the quick identification of a threat of contamination to the drinking water supply and notification to the public and private water system operators, as well as warning of the public.
 - c. Wastewater and Stormwater Handling Systems: Hazardous chemicals entering stormwater and/or wastewater systems can cause serious and long-term damage to the environment or to a water/wastewater treatment plant. If wastewater is diverted, it could create public health and environmental problems.

APPENDIX 2 TO ANNEX E CONTAINMENT AND CLEAN-UP

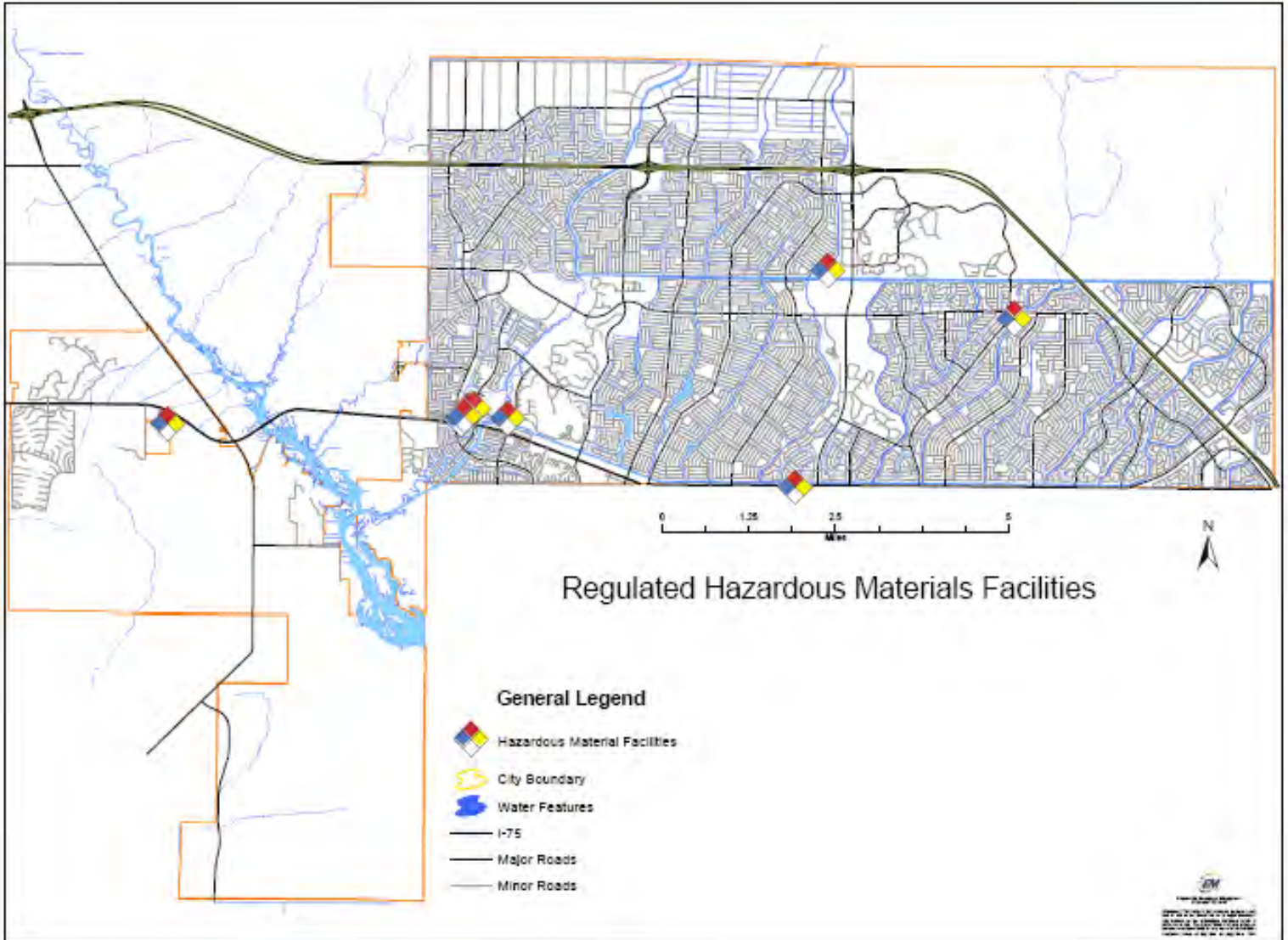
This Appendix provides for containment and clean-up operations and identifies resources available for clean-up and disposal.

1. Techniques for Spill Containment and Clean-up
 - a. The responsibility for selecting and implementing the appropriate countermeasures is assigned to the IC in coordination with the State/Federal on-scene coordinator.
 - b. The spiller is, by law, responsible for all clean-up counter-measures.
 - c. The IC is responsible for monitoring the response activity to ensure that appropriate containment/displacement techniques are being initiated.
 - d. Containment methods may include:
 - i. Dikes
 - ii. Berms and drains
 - iii. Trenches
 - iv. Booms
 - v. Barriers in soil
 - vi. Stream diversion
 - vii. Patching and plugging of containers or vessels
 - viii. Portable catch basins
 - ix. Over-packed drums or other forms of containerization
 - x. Re-orientation of the container
 - e. The IC, in the absence of a responsible party, may secure private contractors for displacement techniques. These may include:
 - i. Hydraulic and mechanical dredging

- ii. Excavating
 - iii. Skimming
 - iv. Pumping
 - v. Dispersing/dilution
 - vi. Vacuuming
- f. Treatment of spilled hazardous substances can be physical, chemical or biological in nature. Treatment operations are the responsibility of the operator. Monitoring responsibility is assigned to the FDEP, in accordance with the State of Florida Oil and Hazardous Substances Spill Contingency Plan.
- g. Exposure Assessment: Initial assessment of the incident is the responsibility of the fixed facility. It should be recognized that industrial capability to assess the situation is supported by in-depth knowledge of the chemicals, facilities and the environment. The fixed facility is liable for damages resulting from a release and is motivated to provide timely and accurate assessment of each situation. Other assessment capability is available.
- i. The HMRT has equipment to provide monitoring and assessment capability.
 - ii. The FDEP has an air toxic response program with personnel and equipment to sample suspected airborne toxic compounds.
- h. Restoration
- i. Treatment of contaminated soils and sediments is a responsibility of the owner of the property and/or the spiller.
 - ii. When feasible, contaminated soils and sediments will be treated on the site. Technologies available include:
 - Incineration
 - Wet air oxidation
 - Solidification
 - Encapsulation

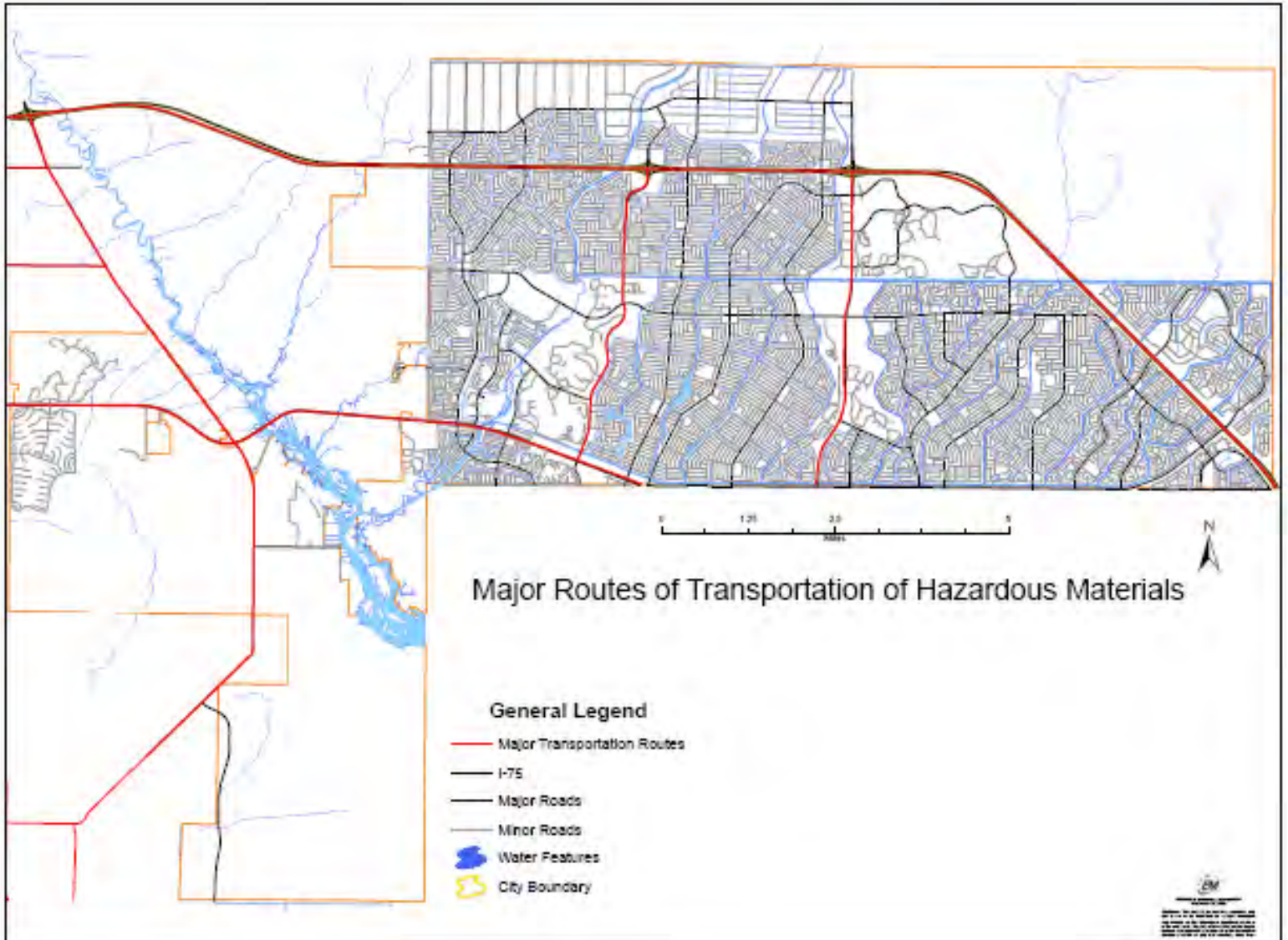
- Solution mining (soil washing or soil flushing)
 - Neutralization/detoxification
 - Microbiological degradation
- iii. Off-site transportation or storage, treatment, destruction, or secure disposition off-site may be provided in cases where State/Federal On-Scene Coordinator(s) determines such actions:
- Are most cost effective
 - Will create increased capacity to manage
 - Are necessary to protect public health, welfare or the environment
- iv. Contaminated soils and sediments may be removed from the site. Technologies used to remove contaminated sediments from soils include:
- Excavation
 - Hydraulic Dredging
 - Mechanical Dredging
- v. Provision of alternative water supplies can be provided in several ways:
- Individual treatment units
 - Water distribution system
 - New wells or deeper wells
 - Cisterns
 - Bottled water
 - Trucked-in water

APPENDIX 3 TO ANNEX E REGULATED HAZARDOUS MATERIALS FACILITIES¹



¹ The Tier II Emergency and Hazardous Chemical Inventory form identifies the specific locations and inventory of hazardous materials at a fixed facility. In accordance with 42 U.S.C. 11044], this information is available from the Southwest Florida Local Emergency Planning Committee during normal working hours.

APPENDIX 4 TO ANNEX E MAJOR ROUTES OF TRANSPORTATION OF HAZARDOUS MATERIALS



ANNEX F

UTILITIES DISRUPTION AND RESTORATION

I. PURPOSE

II. SITUATION AND ASSUMPTIONS

- A. Situation
- B. Assumptions

III. METHOD OF OPERATIONS

- A. General
- B. Organization
- C. Assignment of Responsibilities
- D. Restoration Priorities

IV. RESPONSE OPERATIONS

- A. City Response
- B. Facilitating Utility Response
- C. Protecting Resources and Preserving Capabilities
- D. Utility Support for Emergency Response Operations
- E. Utility Support for Disaster Recovery Operations
- F. Public Information
- G. Phases of Management

V. ADMINISTRATION AND TRAINING

- A. Administration
- B. Training

APPENDICIES

- 1. Local Utility Information & Service Area Maps
- 2. Utility Restoration Priorities for Critical Facilities
- 3. Emergency Generator Forms
- 4. Utility Conservation Measures

I. PURPOSE

The purpose of this Annex is to describe the organization, operational concepts and responsibilities to respond to and recover from a disruption of utility services.

II. SITUATION AND ASSUMPTIONS

A. Situation

1. During or after an emergency there may be a disruption of service in electrical power, telephone service, water and wastewater services as well as natural gas service.
2. The loss of utility services, particularly extended outages, could adversely affect the capability of local personnel to respond to and recover from the emergency that caused the disruption of utility service and create additional health and safety risks for the public.
3. Public utilities are defined as those companies and organizations that are authorized to provide utility services, including electricity, water, sewer service, natural gas, and telecommunications, to the public in a specified geographic area. Utilities may be owned and/or operated by a municipality, a municipal utility district, a regional utility authority, investors, or a by a private non-profit organization such as member of a cooperative (co-op).
4. Virtually all utilities are required by State regulators to have emergency operations plans for restoring disrupted services. Many utilities maintain emergency operations centers and those that do not, normally have procedures to establish temporary facilities when they need them.
5. Extended electrical outages can direct impact other utility systems, particularly water and wastewater systems. In areas where telephone service is proved by above ground lines that share poles with electrical distribution lines, telecommunications providers may not be able to make repairs to the telephone system until electric utilities restore power lines to a safe condition.
6. Municipal utilities and private non-profit utilities, such as electrical cooperatives, may be eligible for reimbursement of a portion of the costs for repair and restoration of damages and infrastructure in the event the emergency, which caused the damage, is approved for a Presidential disaster declaration that includes Public Assistance (PA).

7. Utility disruptions may delay return of individuals to their residences from evacuation shelters. An effect of which, the shelter (usually a public school), will not be able to re-open to students until the evacuees have departed. This will slow the return to normalcy in the post-disaster environment.

B. Assumptions

1. In the event of damage to or disruption of utility systems, utility operators will put forward their best effort to restore services as quickly as possible.
2. A major disaster or a disaster affecting a wide area may require extensive repairs and reconstruction of portions of utility systems that may take a considerable time to complete.
3. Damage to electrical distribution systems and sewer and water systems may create secondary hazards such as increased risk of fire and/or public health concerns.
4. Each utility will direct and control its own resources and plan and carry out its own response operations, coordinating as necessary with local government and other utilities.
5. Individual utility operators, particularly small companies, may not have sufficient resources to restore utility systems affected by a major disaster or one having widespread effects. Utilities typically obtain supplementary repair and restoration assistance from other utilities pursuant to mutual aid agreements, and by using contractors hired by the utility.
6. Equipment and personnel from other City departments may be employed to assist the municipal utility in repairing its systems and restoring service to the public.

III. METHOD OF OPERATIONS

A. General

The basic operational concept is that the various divisions within the City of North Port Utilities Department and private utility companies will continue their normal day to day responsibilities regardless of the emergency or disaster situation. Priority actions will be taken to restore interrupted services and provide for movement of vehicular traffic. Some specific actions to be accomplished are:

1. Make emergency repairs and restore vital utility services

2. Provide emergency power
 3. Replace damaged or destroyed utilities equipment
 4. Insure that adequate supplies of potable water are available and identify sources of additional supplies, if needed.
- B. Organization
1. City-owned water and wastewater operations and facilities will be managed by the City of North Port Utilities Department.
 2. Utilities not owned and operated by the City will be managed by those organizations based on their respective emergency operations plans.
- C. Assignment of Responsibilities
1. See City's Comprehensive Emergency Management Base Plan.
 - a. The Director of the Utilities Department will:

In an activation of the City EOC, the Utilities Group Director will be responsible for the overall coordination of public and private utilities during a disaster. If the disaster affects only the Utilities Department, the City Manager may appoint the Director as Incident Commander.
 - b. The Public Information Officer will:

Coordinate with the EOC and utilities representatives to provide timely, accurate, and consistent information to the public regarding utility outages, including communicating:

 - i. Protective measures, such as "boil water" orders.
 - ii. Conservation guidance.
 - iii. Instructions, including where to obtain water, ice, and other essentials.
 - c. The EOC will monitor utility response and recovery operations regarding major utility interruptions that may affect public health and safety or threaten public or private property.

2. Non-City owned and operated utilities will be responsible for the maintenance, repair and restoration of their respective utilities.
 - a. Each utility organization, both City and privately-owned and -operated, will direct its response and recovery activities.
 - b. Utility crews responding from other geographical areas pursuant to a utility mutual aid agreement and contractors hired by utilities to make repairs will normally receive their assignments from the utility that summoned or hired them.

D. Restoration Priorities

Priorities for utility restoration will depend on the nature, location, and extent of the incident. Vulnerable populations and facilities essential for public safety and health will be considered first. These facilities may include medical facilities, nursing homes, water and wastewater treatment facilities, schools, grocery stores, government buildings, telecommunications and power facilities. Other facilities may be determined as dependent by the nature of the disaster and location of the event. The Base Plan of the Comprehensive Emergency Management Plan (CEMP) identifies locations designated as "Critical Infrastructure," which would receive priority restoration.

IV. RESPONSE OPERATIONS

A. City Response

1. It is essential to obtain an initial estimate of the likely duration of a major utility outage from the utility as soon as possible after it occurs. Once the estimate is obtained, a determination of the anticipated impact and actions required to protect public health and safety, and public and private property can be made.
2. Extended utility outages may require the City to act to protect public health and safety and public and private property. Such actions may include:
 - a. Water or Wastewater Outage
 - i. Curtail general water service to residents to retain water for firefighting and for controlled distribution to residents in containers.

- ii. Arrange for supplies of emergency potable drinking water for the public and for bulk water for those critical facilities that require it to continue operations.
 - Open Neighborhood Points of Distribution (NPOD) in areas where access to open retail outlets is limited.
 - iii. If wastewater service is disrupted, arrange for portable toilets and hand washing facilities to meet sanitary needs.
- b. Electrical or Natural Gas Outage
- i. Operate emergency generators to power water pumping stations, water treatment facilities, wastewater lift stations, wastewater treatment facilities, fueling facilities, and other critical sites.
 - ii. During periods of extreme cold weather, coordinate the establishment of shelters for residents who lack heat in their homes.
 - iii. During periods of extreme heat, coordinate the establishment of “cooling sites” for residents who do not have air conditioning in their homes.
 - iv. Request appropriate volunteer groups to set up mass feeding facilities, as necessary, for those who do not have electrical or gas service and cannot prepare meals.
 - v. Arrange for fuel deliveries to keep emergency generators running at critical City facilities.
- c. Telecommunications Outage
- i. Request telecommunications providers to implement priority service restoration plans to include establishment of cellular on wheels units (COW).
 - ii. Activate amateur radio support, as needed.
 - iii. Request external assistance (e.g., telecommunication providers, Sarasota County, State Division of Emergency

Management, etc.) in obtaining additional radios and repeaters or satellite telephones.

d. General

- i. Isolate damaged portions of utility systems so as to restore service quickly to those areas where systems are substantially undamaged.
- ii. In cooperation with utilities, institute conservation measures. See Appendix 4 to this Annex.
- iii. Disseminate public information requesting conservation of utilities and water advisories (e.g., health issues such as a “boil water” advisory for emergency water purification.)
- iv. Coordinate with medical facilities that must relocate patients, residential schools and similar institutions that cannot maintain the required level of service for their clients.
- v. Assign law enforcement personnel at key intersections if traffic control devices are inoperative.
- vi. Consider increased security patrols and staging fire equipment in areas without electrical or water service.
- vii. Provide inspection services prior to restoration of service at building.

B. Facilitating Utility Response

1. The City may facilitate utility response by:
 - a. Coordinating with utility companies on utility outage areas that have been reported to the City.
 - b. Requesting citizens to initiate conservation measures. See Appendix 4.
 - c. Coordinating with the utility on priorities for clearing debris from roads which also provides access to damaged utility equipment.

- d. Providing access and traffic control in utility repair areas where appropriate.

2. Large-scale Emergency Situations/Disasters

In large-scale emergency situations which produce catastrophic damage in a limited area (such as a tornado) or severe damage over a wide area (such as a hurricane), utilities are typically faced with a massive repair and rebuilding effort that cannot be completed in a reasonable time without external support. In such circumstances, utilities typically bring in equipment and crews from other utilities pursuant to mutual aid agreements and from specialized contractors.

- C. Protecting Resources and Preserving Capabilities

In the event of a slowly developing emergency, it is possible that utilities may be able to mitigate some of the effects of a major emergency or disaster by protecting key facilities and equipment.

1. In the face of a threat of flooding, facilities may be protected by constructing dikes, sand-bagging, or using pumps to prevent water from entering the facility. To preserve pumps, electrical control panels, and other vital equipment, it may also be prudent in some cases to remove the equipment from facilities to prevent damage due to rising water.
2. Loss of power could severely affect critical functions such as communications, water pumping, purification and distribution, wastewater disposal, traffic control and operation of critical medical equipment. Critical facilities that require back-up electrical power should have appropriate generation equipment on site. If this is not feasible, emergency generator requirements should be pre-determined to facilitate timely arrangements for such equipment during emergency situations. Appendix 3 provides forms to record information on existing backup generators and to identify requirements for additional emergency generators.

- D. Utility Support for Emergency Response Operations

The assistance of utility providers may be needed to support other emergency response and recovery operations. Such assistance may include:

1. Rendering downed or damaged electric lines safe to facilitate debris removal from roadways.

2. Cutting off utilities to facilitate the emergency response to fires, explosions, building collapses, and other emergency situations.
3. Facilitating search and rescue operations by cutting off electrical power, gas, and water to areas to be searched.
4. Establishing temporary utility hookups to facilitate response activities.

E. Utility Support for Disaster Recovery Operations

Utilities play a primary role in the recovery process relating to:

1. Rendering electrical lines and gas distribution lines safe before local officials authorize re-entry of property owners into affected areas to salvage belongings and/or repair damage to their homes and businesses.
2. Participating in inspections of affected structures to identify hazards created by damaged utilities and eliminating those hazards.
3. Restoring utility systems to their pre-disaster condition.

F. Public Information

1. It is essential to provide the public information on utility status, the anticipated time it will take to restore service, recommendations on dealing with the consequences of a utility outage, conservation measures, and information on sources of essential life support items. Public information relating to utility outages should be developed by the utility/utilities affected to ensure that messages are accurate and consistent.
2. In some emergency situations, many of the normal means of disseminating public information may be unavailable and alternative methods of getting information out to the public will be necessary.
3. Utilities are complex systems and service may be restored on a patchwork basis as damaged components are repaired or replaced. Some neighborhoods may have utility service restored while adjacent neighborhoods may not.

G. Phases of Management

1. Mitigation

- a. Review proposed utility construction or renovation activities to determine if existing hazards will be increased by such activities.
 - b. Utilities should assess the vulnerability of their systems to known hazards and act to lessen such vulnerability.
 - c. Maintain portable generators and pumps to meet unexpected needs and/or identify sources for such equipment that can be accessed during an emergency.
2. Preparedness
- a. Work with utilities to identify damage assessment information they can normally provide in an emergency.
 - b. Ensure the EOC has emergency contact numbers for the utilities providers.
 - c. Request that utilities brief the EOC staff on their emergency service restoration plans periodically.
 - d. Encourage the utilities to participate in drills and exercises conducted by the City.
 - e. Utilities should ensure emergency plans are up-to-date and equipment is in good repair and secure.
3. Response
- a. Coordinate with utility companies to obtain regular reports on their operational status, number of customers affected by service outages and areas affected. Representatives from the City Utilities Department, Verizon, and Florida Power and Light may be present in the EOC.
 - b. Provide expedient substitutes for inoperable utilities at critical facilities to the extent possible or relocate those facilities if necessary. Update utility restoration priorities for critical facilities as necessary.
 - c. If an extended utility outage is anticipated, take those actions necessary to protect public health and safety, private and public property and implement utility conservation measures.

- d. Facilitate utility emergency response to the extent possible.
 - e. Include utility status information in the Situation Reports produced during major emergencies and disasters.
4. Recovery
- a. Request regular reports concerning the operational status, the number of customers affected by service outages and areas affected for utilities with system damage.
 - b. Obtain estimates of damages for inclusion in the City's requests for disaster assistance.
 - c. Update utility restoration priorities for critical facilities as appropriate.
 - d. Request utilities that participate in major emergency operations to participate in any post-incident review of such operations.

V. ADMINISTRATION AND TRAINING

A. Administration

1. A record of costs and expenses incurred in direct support of an emergency or disaster situation will be maintained to support subsequent reimbursement claims to state and federal government. Examples of fiscal expenditures which should be recorded, fully detailed, and maintained are:
 - a. Personnel costs which exceed "normal" costs, i.e., overtime.
 - b. Equipment rental or lease.
2. The persons responsible for the implementation of this Annex will annually review the Annex to insure currency.

B. Training

The individuals responsible for the Utilities function will participate in planning and training exercises conducted for the Emergency Operations Center Staff.

APPENDIX 1 TO ANNEX F**LOCAL UTILITY INFORMATION****1. Electric**

Florida Power and Electric, its mutual aid electric companies and private contractors, would be responsible for repair, restoration and maintenance of its infrastructure should an emergency or disaster damage it.

2. Telecommunications

Frontier, its mutual aid telephone companies and private contractors would be responsible for repair, restoration and maintenance of its infrastructure should an emergency or disaster damage it.

Verizon is the City's providers of cellular service and would be responsible for repair, restoration and maintenance of its infrastructure.

3. Natural Gas

Peoples Gas System, its mutual aid natural gas companies and private contractors would be responsible for repair, restoration and maintenance of its infrastructure should an emergency or disaster damage it.

4. Propane

AmeriGas, its mutual aid propane gas companies and private contractors would be responsible for repair, restoration and maintenance of its infrastructure should an emergency or disaster damage it.

5. Water

Owned by the City of North Port and operated by the Utilities Department, Water Treatment Plant.

6. Wastewater

Owned by the City of North Port and operated by the Utilities Department, Wastewater Treatment Plant.

7. Cable Television

Comcast and Frontier, their mutual aid natural cable television companies and private contractors would be responsible for repair, restoration and maintenance of their infrastructure should an emergency or disaster damage it.

APPENDIX 2 TO ANNEX F

UTILITY RESTORATION PRIORITIES FOR CRITICAL FACILITIES

Florida Power and Light maintains a listing of utility restoration priorities for critical facilities, emergency notification procedures, emergency telephone numbers and designated emergency points of contact.

This list is updated on an annual basis, prior to the beginning of hurricane season.

APPENDIX 3 TO ANNEX F

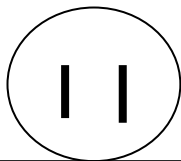
EMERGENCY GENERATOR FORMS

1. The emergency generator forms which follow are provided to facilitate pre-planning for emergency generator requirements, either to obtain a generator which does not have one or replace an existing generator which has failed.
 - a. The Emergency Generator Information – Existing Installation form should be used to record information on existing emergency generators in case they must be replaced.
 - b. The Emergency Generator Information – Additional Equipment form should be used to identify requirements for additional emergency generators for critical facilities that do not currently have such generators.
2. Forms should be completed by the owner or operator of the facility that has or may need a generator and provided to the local EMC. A separate form should be completed for each existing generator or additional generator that is required. The EMC will maintain completed forms for use during emergencies. It is suggested that individuals completing these forms retain a copy for their own records.
3. In completing these forms, keep the following in mind:
 - a. If in doubt about what type of capability is needed, consult a qualified electrician.
 - b. Generators are often quite heavy and should be placed on a firm, level site, and preferably a paved area.
 - c. A forklift is normally used to place a skid-mounted generator. The forklift operator must have adequate room to maneuver.
 - d. In considering emergency generator siting, remember that generators are often noisy and produce exhaust fumes that may be sucked into nearby ventilation intakes. Vehicle access will be needed to refuel.

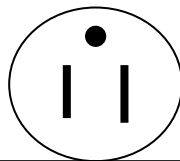
APPENDIX 3 TO ANNEX F

**EMERGENCY GENERATOR INFORMATION
(Existing Installation)**

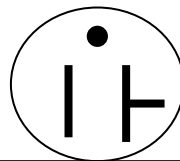
1	Facility Name:
2	Facility Address:
3	Facility Type: <input type="checkbox"/> EOC <input type="checkbox"/> Communications Ctr <input type="checkbox"/> Medical Facility <input type="checkbox"/> Fuel Facility <input type="checkbox"/> Law Enforcement <input type="checkbox"/> Fire/Rescue Facility <input type="checkbox"/> EMS Facility <input type="checkbox"/> Water Pumping /Treatment <input type="checkbox"/> Wastewater Pumping/Treatment <input type="checkbox"/> Other (specify)
4	Facility Point of Contact: Phone:
5	If more than one generator exists, provide generator number or location within facility:
6	Electrical Requirements: Kilowatts: Volts: Amperes: Phase: <input type="checkbox"/> Single <input type="checkbox"/> 3-Phase Wye <input type="checkbox"/> 3-Phase Delta <input type="checkbox"/> Other:
7	Fuel: <input type="checkbox"/> Gas <input type="checkbox"/> Diesel <input type="checkbox"/> Propane <input type="checkbox"/> Other:
8	Fuel Tank Size: Gallons: Pounds:
9	Fuel Tank Type: <input type="checkbox"/> Attached to generator <input type="checkbox"/> Separate tank
10	Generator Weight: <input type="checkbox"/> Pounds: Tons:
11	Starting: <input type="checkbox"/> Automatic <input type="checkbox"/> Manual/Recoil <input type="checkbox"/> Other:
12	Generator Support: <input type="checkbox"/> Pad/Permanent Installation <input type="checkbox"/> Skid <input type="checkbox"/> Trailer
13	Generator in Weather Housing: <input type="checkbox"/> Yes <input type="checkbox"/> No
14	Electrician On-site or Available: <input type="checkbox"/> Yes <input type="checkbox"/> No
15	Is Generator Hard Wired to Electrical System? <input type="checkbox"/> Yes <input type="checkbox"/> No
16	Generator Receptacles Required (indicate numbers and types; see illustrations below):
17	Other Pertinent Information:



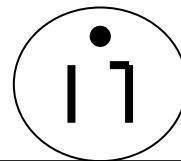
15A-125V
NEMA 1-15R



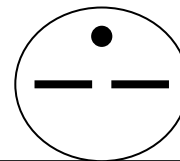
15A-125V
NEMA 5-15R



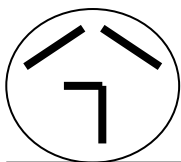
20A-125V
NEMA 5-20R



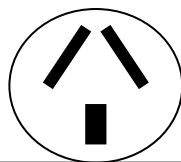
30A-125V
NEMA 5-30R



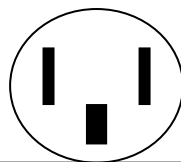
30A-250V
NEMA 6-30R



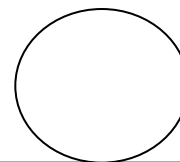
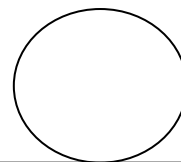
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NEMA 5-30R



50A-125/250V
NEMA 10-50R



50A-250V
NEMA 6-50R

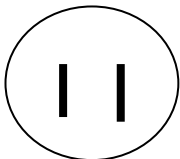


If illustrations don't match what you have, draw your receptacles

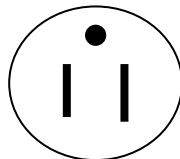
APPENDIX 3 TO ANNEX F

**EMERGENCY GENERATOR INFORMATION
(Additional Equipment)**

1	Facility Name:
2	Facility Address:
3	Facility Type: <input type="checkbox"/> EOC <input type="checkbox"/> Communications Ctr. <input type="checkbox"/> Medical Facility <input type="checkbox"/> Fuel Facility <input type="checkbox"/> Law Enforcement <input type="checkbox"/> Fire/Rescue Facility <input type="checkbox"/> EMS Facility <input type="checkbox"/> Water Pumping /Treatment <input type="checkbox"/> Wastewater Pumping/Treatment <input type="checkbox"/> Other (specify)
4	Facility Point of Contact: Phone:
5	Electrical Requirements: Kilowatts: _____ Volts: _____ Amperes: _____ . Phase: <input type="checkbox"/> Single <input type="checkbox"/> 3-Phase Wye <input type="checkbox"/> 3-Phase Delta <input type="checkbox"/> Other:
6	Fuel Available: <input type="checkbox"/> Gas <input type="checkbox"/> Diesel <input type="checkbox"/> Propane <input type="checkbox"/> Other:
7	Site Access: Site accessible for emplacing trailer-mounted unit? <input type="checkbox"/> Yes <input type="checkbox"/> No Site accessible for unloading/positioning skid-mounted unit? <input type="checkbox"/> Yes <input type="checkbox"/> No
14	Electrician On-site or Available: <input type="checkbox"/> Yes <input type="checkbox"/> No
16	Generator Receptacles Needed (indicate numbers and types; see illustrations below):



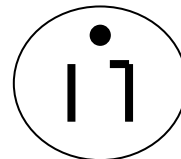
15A-125V
NEMA 1-15R



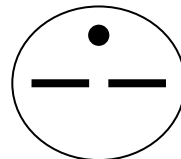
15A-125V
NEMA 5-15R



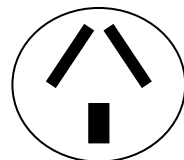
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NEMA 5-20R



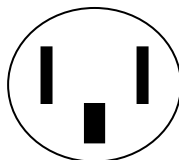
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NEMA 5-30R



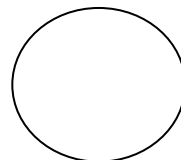
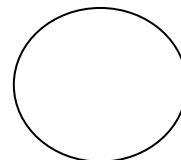
30A-250V
NEMA 6-30R



50A-125/250V
NEMA 10-50R



50A-250V
NEMA 6-50R



If illustrations don't match what you have, draw your receptacles

APPENDIX 3 TO ANNEX F

**EMERGENCY GENERATOR INFORMATION
(Facility Assessment Worksheet)**

Facility Name: _____ Remarks: _____
 Location: _____
 City: _____ State: _____
 County/Municipality: _____
 Building Use: _____ Alt POC: _____

AGENCY CONTACT INFORMATION:

Power(kW) Voltage Point of Contact: _____
 Agency: _____
 Pre-Assessment Phone: _____
 (User) site data Amperage Phase (1/3) FAX: _____
 E-mail: _____

ASSESSMENT DETAILS

Main Breaker # of Service
 Current: (Amps) _____ Drops _____
 Service Drop type: Transformer Mount:
 Site Voltage _____ Feeder Cable Size: _____ Overhead Pad
 Underground Pole

Backup/Existing Generator Information (if Applicable):

Latitude (North) Longitude (West):
 Power(kW): _____ Voltage (V) _____
 Degrees: _____ Degrees: _____
 Internal Fuel
 Capacity: _____ Hours: _____ Minutes: _____ Minutes: _____
 Fuel Type: _____ Phase: _____ Seconds: _____ Seconds: _____

Needed Generator Information:

Power (kW): _____ N
 _____ W

Voltage: _____ Generator Connection Point:
 Phase(s): _____
 Configuration: _____

Assessment Remarks: *Below, provide the materials required to mate the facility with the generator.*

<u>BOM</u>	<u>Category</u>	<u>Description</u>	<u>QTY Required</u>	<u>Unit</u>
------------	-----------------	--------------------	---------------------	-------------

APPENDIX 4 TO ANNEX F

UTILITY CONSERVATION MEASURES

The utility conservation measures outlined in this appendix are suggested measures. The specific measures to be implemented should be agreed upon by the City and the utilities concerned.

I. Conservation Measures for Natural Gas

A. Step 1. Discontinue:

1. Use of gas-fueled air conditioning systems except where necessary to maintain the operation of critical equipment.
2. All residential uses of natural gas, except refrigeration, cooking, heating, and heating water.
3. Use of gas-fueled clothes dryers.

B. Step 2. Reduce:

1. Thermostat settings for gas-heated buildings to 65 degrees during the day and 50 degrees at night.
2. Use of hot water from gas-fueled water heaters.

II. Conservation Measures for Electric Power

A. Step 1. Discontinue:

1. All advertising, decorative, or display lighting.
2. Use of electric air conditioning systems except where necessary to maintain the operation of critical equipment.
3. Use of electric ovens and electric clothes dryers.
4. Use of all residential electric appliances, except those needed to store or cook food and televisions and radios.

B. Step 2. Reduce:

1. Reduce thermostat setting for electrically heated buildings to a maximum of 65 degrees during the day and 50 degrees at night.

2. Minimize use of hot water in buildings that use electric water heaters.
 3. Reduce both public and private outdoor lighting.
 4. Reduce lighting by 50 percent in homes, commercial establishments, and public buildings.
- C. Step 3. Cut off electricity to:
1. Non-essential public facilities.
 2. Recreational facilities and places of amusement such as theaters.
- D. Step 4. Cut off electricity to:
1. Retail stores, offices, businesses, and warehouses, except those that distribute food, fuel, water, ice, pharmaceuticals, and medical supplies.
 2. Industrial facilities that manufacture, process, or store goods other than food, ice, fuel, pharmaceuticals, or medical supplies or are determined to be essential to the response and recovery process.
 3. Office buildings except those that house agencies or organizations providing essential services.

III. Water Conservation Measures

- A. Step 1.
1. Restrict or prohibit outdoor watering and washing of cars.
 2. Close car washes.
- B. Step 2
1. Restrict or curtail water service to large industrial users, except those that provide essential goods and services.
 2. Restrict or prohibit use of public water supplies for irrigation and filling of swimming pools.
 3. Place limits on residential water use.

C. Step 3

1. Restrict or cut off water service to industrial facilities not previously addressed, except those that provide essential goods and services.
2. Restrict or cut off water service to offices and commercial establishments, except those that provide essential goods and services.

D. Step 4

1. Restrict or curtail residential water use.

ANNEX G**TERRORISM****I. PURPOSE****II. EXPLANATION OF TERMS**

- A. Acronyms
- B. Definitions
- C. References

III. SITUATION AND ASSUMPTIONS

- A. Situation
- B. Assumptions

IV. METHOD OF OPERATIONS

- A. General
- B. Prevention
- C. Detection, Notification and Classification of a Terrorist Event
- D. Response
- E. Coordination of Incident Management Activities
- F. Implementation of the Incident Command System
- G. Protective Actions
- H. Requesting External Assistance
- I. Phases of Management

V. ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES

- A. Organization
- B. Assignment of Responsibilities
- C. General Response Checklist

VI. DIRECTION AND CONTROL**VII. ADMINISTRATION & SUPPORT**

- A. Reports & Records
- B. Preservation of Records
- C. Post-Incident Review

VIII. ANNEX DEVELOPMENT & MAINTENANCE

- A. Responsibility
- B. Schedule for Annex Updating
- C. Security Considerations - General Exemptions from Public Inspection

APPENDICES

- Appendix 1 Terrorist Incident Response Checklist
- Appendix 2 Background Information on Chemical, Biological, Radiological, Nuclear, Explosive Agents
- Appendix 3 Guidance for City Government Activities During a “Severe Risk of Terrorist Attack,” Code Red
- Appendix 4 Procedure for Management of Victims of a Terrorist Incident Involving Biological, Chemical or Radiological Materials
- Appendix 5 Notification of Regional Domestic Security Task Force

I. PURPOSE

- A. To establish operational concepts and to clarify roles and responsibilities to lessen probable confusion resulting from a threat of terrorism or an actual event.
- B. This Annex defines how the City of North Port will operate during the crisis and consequence management phases of anticipated or actual acts of terrorism.
- C. The Annex provides for coordinated integration and joint operations in accordance with Federal and State emergency management plans as well as related contingency plans.

II. EXPLANATION OF TERMS

A. Acronyms

ATTF	U.S. Attorney's Anti-Terrorism Task Force
CBRNE	Chemical, Biological, Radiological, Nuclear, Explosives
EMS	Emergency Medical Services
EOC	Emergency Operations Center
FBI	Federal Bureau of Investigation
FDEM	Florida Division of Emergency Management
FEMA	Federal Emergency Management Agency
IC	Incident Command
ICP	Incident Command Post
ICS	Incident Command System
JIC	Joint Information Center
JOC	Joint Operations Center
JTTF	Joint Terrorism Task Force
MACS	Multi-Agency Coordination System
NIMS	National Incident Management System
NRF	National Response Framework
NTAS	National Terrorism Advisory System
PPE	Personal Protective Equipment
SOG	Standard Operating Guidelines
UC	Unified Command
WMD	Weapon of Mass Destruction

B. Definitions

1. **Attack.** Sabotage or the use of bombs, chemical or biological agents, nuclear or radiological materials, or armed assault with firearms or other weapons by a terrorist or quasi-terrorist actor that causes or may cause substantial damage or injury to persons or property in any manner.

2. **Biological Agents.** Living organisms or the materials derived from them that cause disease in or harm to humans, animals, or plants, or cause deterioration of material. Biological agents may be used as liquid droplets, aerosols, or dry powders.
3. **Chemical Agents.** A substance with chemical properties that is intended for use in military operations to kill, seriously injures, or incapacitates people through its physiological effects. Excluded from consideration are riot control agents, and smoke and flame materials. The agent may appear as a vapor, aerosol, or liquid; it can be either a casualty/toxic agent or an incapacitating agent.
4. **Contamination.** The deposit of absorption of chemical or biological warfare agents (or conventional hazardous materials) on structures, areas, personnel, or objects
5. **Control Zones.** The geographical areas established to control a hazardous materials incident (including those involving CBRNE agents). The three zones most commonly used are the exclusion (hot) zone, contamination reduction (warm) zone, and support (cold) zone.
6. **Decontamination (Decon).** The action that is required to physically remove or chemically change contaminants from personnel and equipment. Decon is the process used to reduce the hazards of CBRNE agents to safe levels.
7. **National Response Framework (NRF).** The interdepartmental planning mechanism, developed under the leadership of the Department of Homeland Security (DHS), by which the Federal government prepares for a response to the consequences of catastrophic disasters. Federal planning and response are coordinated on a functional basis – known as emergency support functions – with designated lead and support agencies for each identified functional area.
8. **CBRNE Emergencies.** An actual or imminent set of conditions in which CBRNE agents are intentionally introduced within a specific operational area. These incidents can involve the release of warfare agents or the intentional release of industrial agents. Thus, such incidents are essentially deliberate Hazmat incidents and constitute a complex emergency
9. **Personal Protective Equipment (PPE).** Equipment and clothing required to shield or isolate personnel from the chemical, physical and biologic hazards that may be encountered at the site.

10. **Significant Threat.** The confirmed presence of an CBRNE device capable of causing a significant destructive or hazardous event, prior to actual injury or property loss.
11. **Terrorist Incident.** A violent act, or an act dangerous to human life, in violation of the criminal laws of the United States or of any State, to intimidate or coerce a government, in furtherance of political or social objectives.

FBI Categories:

- *Domestic* – groups or individuals whose terrorist activities are directed at elements of our government or population without foreign direction.
 - *International* – terrorist activity committed by groups or individuals who are foreign-based and/or directed by countries or groups outside the US or whose activities transcend national boundaries.
12. **Weapon of Mass Destruction (WMD).** (A) Any destructive device as defined in section 921 of 18 U.S.C., section 2332a, (which reads) any explosive, incendiary, or poison gas, bomb, grenade, rocket having a propellant charge of more than four ounces, missile having an explosive or incendiary charge more than one quarter ounce, mine or device similar to the above; (B) poison gas; (C) any weapon involving a disease organism; or (D) any weapon that is designed to release radiation or radioactivity at a level dangerous to human life.

C. References

1. FEMA, Guide for All-hazard Emergency Operations Planning (SLG-100).
2. US Department of Transportation/Transport Canada, Emergency Response Guidebook
3. Jane's Information Group, Jane's Chem-Bio Handbook

III. SITUATION AND ASSUMPTIONS

A. Situation

1. Acts of terrorism can occur without warning. The City of North Port, its governmental entities, its public and private institutions, its businesses, and its people may all be targets of terrorism.

2. Federal law dictates that all acts of terrorism planned or executed are subject to Federal jurisdiction. Federal laws assign the primary authority to the Federal government for prevention and response to acts of terrorism; local governments will provide initial response, supported by State and Federal resources as required.
3. Since terrorist acts may be violations of local, State, and Federal law, the response to a significant local terrorist threat or actual incident may include State and Federal response agencies.
4. In the event of a significant terrorist threat or incident, it is anticipated that regional, State and Federal resources will be requested in order to supplement local capabilities.
5. The presence of chemical, biological, radiological, nuclear, or explosive (CBRNE) agents may not be detected immediately. In the case of chemical, biological, or nuclear materials, they may not be discovered until sometime after casualties occur. There may be a delay in identifying the agent present and in determining the appropriate protective measures. Such agents may quickly dissipate or be persistent.

B. Assumptions

1. The Terrorism Annex could be activated based solely on a Homeland Security Advisory color change, without any specific threat information for Sarasota County or the City of North Port.
2. Public safety agencies of the City of North Port will be the “first responders” to the scene of a terrorist incident or the locations in the City where the impacts of the event are experienced.
3. A terrorist incident may be made clear to the responding organizations by the characteristics of the impacts or a declaration on the part of the perpetrators, or may be very difficult to initially detect and identify because of uncertainty as to the cause or extent of the situation.
4. The resources and/or expertise of local agencies in the City of North Port could quickly be depleted by a response to a major terrorist incident and its consequences. Extensive use of regional, State, and Federal resources and intrastate mutual aid agreements must therefore be anticipated.
5. Specialized resources, as well as those normally utilized in disaster situations, will be needed to support the response to a terrorist incident.

- Such resources may not be in Sarasota County, the FDLE Region or in the State of Florida.
6. The Florida Department of Health will have a minimum of three Biosafety Level 3 laboratories available for analytical services to assist in the response to a terrorist event in Florida.
 7. Resources from local, State, and Federal agencies, as well as from private organizations, will be made available on a timely basis upon request.
 8. All State and local response agencies and organizations will establish and participate in a unified command structure at or near the scene, and the Emergency Operations Center of Sarasota County will be activated and staffed (if indicated by the size or scope of the incident).
 9. Federal agencies with statutory authority for response to a terrorist incident, or for the geographic location in which it occurs or has impacted, will participate in and cooperate with the unified command structure established by response organizations from the City of North Port and Sarasota County.
 10. A terrorist event will result in the timely activation of the City of North Port's and Sarasota County's Comprehensive Emergency Management Plans. When needed, and the Florida Division of Emergency Management (FDEM) will activate the State Comprehensive Emergency Management Plan (CEMP).
 11. Responding agencies of the City of North Port and Sarasota County will have the supportive plans and procedures, as well as appropriately trained and equipped personnel, that may be needed for the general response operations related to management of the terrorist incident. This Annex assumes the resources and procedures for such related operations as hazardous material response, mass casualty incident management, law enforcement, search and rescue, and others will be in place to be utilized when needed during a terrorist incident.
 12. For terrorist events involving weapons of mass destruction, there may be many casualties. Injured or ill victims will require specialized medical treatment, potentially including decontamination and medical facilities and may require establishing temporary medical operations in the field. Fatally injured victims may be numerous, and their bodies contaminated or infectious. Special mortuary arrangements are likely to be necessary.

13. Terrorist incidents may involve damage or disruption to computer systems, telecommunications networks, or Internet systems; disturbance to vital community networks for utilities, transportation, or communication; and/or could endanger the health and safety of the population at risk, interrupt emergency response operations, and result in substantial economic losses.
14. There will be very extensive media interest in a terrorist event and media management operations will require resources beyond those needed for other types of emergency management operations.
15. The City of North Port Police Department and Sarasota County Sheriff's Office are or will be subscribers to the Secure Florida Alert System (when available) and are on the FBI Law Enforcement Online (LEO) Network.
16. The City of North Port has taken proper precautions such as implementing "firewalls" and password access to their computer systems and have implemented the same reporting mechanism that was used during Y2K for cyber incidents.
17. The City of North Port is developing the capability to implement response and recovery operations for computer networks and databases disrupted by a cyber terrorist incident.
18. The 44th WMD Civil Support Team of the Florida National Guard is available for deployment to actual/suspected WMD events in a local jurisdiction. Travel time to Sarasota County from approval of the request of the State is approximately six hours.
19. Once notified of a suspected terrorist incident, the State Watch Office will make notifications specifically to the Florida Division of Law Enforcement (FDLE) and the Federal Bureau of Investigation (FBI).
20. It is possible that the use of a weapon of mass destruction, such as a biological agent, could occur resulting in widespread illness, fatalities, or environmental contamination without a readily defined incident scene. In this case emergency operations at the local level would be coordinated through the local emergency operations center. Response operations such as mass casualty management, environmental decontamination, and public information would be provided on a region-wide basis, with coordination being done through the RDSTF and the State Emergency Operations Center. The State EOC and Department of Health will conduct cross regional coordination. Sarasota County EOC will remain operational if the State or Regional EOC is activated for a local or regional event.

21. Receipt and distribution of Strategic National Stockpile will be in concert with current Florida Department of Health policies. Health policies will be coordinated with the Sarasota County Emergency Management and the Sarasota County Health Department.

IV. METHOD OF OPERATIONS

A. General

1. The organizational structure for emergency response operations is pursuant to NIMS, which employs two levels of incident management structures.
 - a. The Incident Command System (ICS) includes a core set of concepts, principles, and terminology applicable to single or multiple incidents regardless of their scope.
 - b. A Multi-Agency Coordination System (MACS) integrates a combination of facilities, equipment, personnel, procedures, and communications into a common framework, which allows for the coordination and support of incident management.
2. During a terrorist event, a MACS may be advisable. Central to this system is the Emergency Operations Center (EOC), which is the nucleus of all coordination of information and resources. The Incident / Unified Command (IC/UC) will manage and direct the on-scene response from the Incident Command Post (ICP). The City EOC will mobilize and deploy resources for use by the IC/UC, coordinate external resources and technical support, research problems, provide information to senior managers, disseminate emergency public information, and perform other tasks to support on-scene operations.
3. This Annex is implemented whenever there is evidence of a threat or a suspected terrorist incident. Otherwise, the normal actions outlined in the City of North Port Comprehensive Emergency Management Plan and Standard Operating Guidelines (SOG) for responding to and recovering from any emergency or disaster situation will remain in effect.

B. Prevention

1. Prior to the occurrence of a terrorist incident, there are intelligence functions that may take place. These will be the responsibility of appropriate law enforcement agencies (i.e., North Port Police Department

(NPPD), Sarasota County Sheriff's Office (SSO), Florida Department of Law Enforcement (FDLE) and the Federal Bureau of Investigation (FBI)), and will not be addressed in this annex.

- a. Lead Agencies
 - i. NPPD – Lead local law enforcement agency
 - ii. SSO – Lead County law enforcement agency
 - iii. FDLE – Lead State law enforcement agency
 - iv. FBI – Lead Federal law enforcement agency
 - b. An IC/UC structure will be used to provide law enforcement direction and control during crisis management operations. A Joint Operations Center (JOC) may be established to coordinate law enforcement actions.
 - c. NPPD will work in cooperation and coordination with the FBI exercising authority for managing the response at the incident site, additional coordination with other local, State or Federal agencies will be addressed as needed.
 - d. Briefings of emergency management personnel and other key City officials will be conducted by NPPD throughout operations.
- C. Detection, Notification and Classification of a Terrorist Event

1. Detection

Detection of an actual, suspected or threatened terrorist or cyber terrorist incident may occur through the following types of mechanisms:

- a. Law enforcement intelligence efforts
- b. Warnings or announcements by the perpetrators
- c. The characteristics of the event, such as an explosion or chemical recognition
- c. Witness accounts
- d. The medical or physical symptoms of victims

- e. Laboratory results from samples taken at the scene or from victims' bodies
- f. Monitoring of a community's morbidity and mortality on a routine basis
- g. Syndromatic Surveillance
- h. Unexplained disruption or failure of a computer network, telecommunications system or Internet service

In many cases, such detection most likely would be by City or County first responding units. Information regarding the event and its consequences would then be reported from the scene to the County Warning Point.

Should detection of the event be from a telephone call or other communication threatening a terrorist action or declaring that one has occurred, the County Warning Point will utilize existing procedures to initiate an investigation and make appropriate notifications, as indicated below.

Detection of a suspected terrorist event may be from a source other than the first arriving unit or a communicated threat or declaration, such as from monitoring of morbidity or mortality statistics in the county, reports from hospital emergency departments, laboratory results from incident victims or environmental sampling, etc. In such cases, the facility or individual recognizing the indications of a terrorist event would notify the County Warning Point, and follow-up notification would be made by the County Warning Point to the State Warning Point.

Regardless of the method of detection of a known or suspected terrorist event, within the meaning of this Annex, the Sarasota County Warning Point will be notified accordingly.

2. Classification (based on the National System)

Every known, suspected or threatened terrorist event occurring in Sarasota County or its municipalities will be classified in a manner consistent with Federal policy. The Sarasota County Warning Point will be informed of the classification and will, in turn, notify the incident commander and the County EOC, if activated.

As for in this Annex, each threat level provides for an escalating range of actions that will be implemented concurrently for crisis and consequence management. Specific actions will take place, which are synchronized to each threat level, ensuring that all agencies are operating jointly with consistent executed plans. Federal and State government will notify and coordinate with local governments, as necessary. These threat levels are described below:

In response to recent terrorist attacks both foreign and domestic, the Department of Homeland Security (DHS) has updated the National Terrorism Advisory System (NTAS). NTAS communicates threat information to the public, first responders, the private sector, transportation modes and other critical infrastructure sectors.

- BULLETIN -- Describes current developments or general trends regarding threats of terrorism.
- ELEVATED ALERT -- Warns of a credible terrorism threat against the United States.
- IMMEDIATE ALERT -- Warns of a credible, specific and impending terrorism threat against the United States.

The Department of Homeland Security, when warranted by conditions, may change the classification at any time. The State Warning Point will then notify or confirm notification of the change through the County Warning Point to local incident commander, the unified command, FDLE and the FBI.

The incident commander for the City of North Port, or Sarasota County will also notify the County Warning Point of one of the following two situations:

- State and/or Federal resources are requested to support local operations, or
- Local capabilities are deemed to be adequate for local crisis and consequence management response operations.

The County Warning Point will then notify the State Warning Point accordingly.

If the actual or potential consequences of the incident are such that county, State and Federal resources and assistance are likely to be needed,

these will be requested by the unified command through the county Emergency Operations Center in accordance with provisions of the City of North Port CEMP.

3. Notification

Upon receipt of notification that:

- a. The NTAS changes from Bulletin to Elevated Alert the State Warning Point will notify the County Warning Point and Sarasota County Emergency Management (SCEM). SCEM will disseminate this change and recommended protective actions to members of the Public Safety Advisory Group (PSAG).
- b. The NTAS changes from Elevated Alert to Imminent Alert, the State Warning Point will contact the County Warning and SCEM. SCEM will disseminate this change and recommended protective actions to members of the PSAG. The Emergency Management Chief will schedule a meeting to brief PSAG representatives on the current situation and will consider activating the County EOC.
- c. A known or suspected terrorist event has occurred, is occurring or may occur, the On-Duty Communications Supervisor of the County Warning Point will notify the State Warning Point, as well as county and municipal agencies in accord with existing procedures. Regardless of the source of the detection of a known, suspected or threatened terrorist event, pursuant to this annex, under all circumstances, the County Warning Point will immediately notify State Warning Point (SWP) that a terrorist incident may have occurred or has been threatened. The County Warning Point shall immediately notify the Emergency Management Chief, or his designee, following the notification to the SWP.

D. Response

Activities undertaken to deal with effects of a terrorist incident are conducted in essentially the same manner as the response for other emergencies or disasters. Post-incident activities, such as investigation, evidence gathering, and pursuit of suspects, will continue. The agency with primary jurisdictional authority over the incident designates the individual at the scene responsible for establishing command.

1. Emergency Management will coordinate consequence management and will interface with Sarasota County Emergency Management, Florida

Division of Emergency Management (FDEM) and FEMA. Field response will operate under an Incident / Unified Command (IC/UC) for initial emergency response, resolution of the life safety issues, and initial recovery actions.

2. Actions taken early primarily deal with life safety and incident stabilization.
3. Briefings of key City officials and response agencies will be conducted by Emergency Management throughout response and recovery operations.
4. If an incident involving terrorism has taken place where injuries and/or deaths have or may soon occur, all activities will be conducted under an IC/UC structure with priority given to life safety, rescue, and incident stabilization. Cooperation between functions will be critical to prevent compromise of other operations.
5. Possible indicators of a terrorist incident could be, but are not limited to:
 - a. Unexplained odors
 - b. Dead animals/birds/fish
 - c. Blisters/rashes
 - d. Mass or unusual casualties
 - e. Unusual pattern of casualties
 - f. Illness associated with a specific geographic area
6. Coordination of Local Medical Response to Biological Weapons Incidents

As the medical response to an incident involving biological agents must include the local medical community as a group, the County and State health departments as well as Federal health agencies directing the response should undertake to coordinate the efforts of local medical providers to ensure that a consistent approach to health issues is taken. Hence, concise information on the threat, recommendations on what should be done to combat it, and instructions on handling victims must be provided to all hospitals, clinics, nursing homes, home health care agencies, individual physicians, pharmacies, school nursing staffs, and other medical providers. The County health department will typically take the lead in coordinating the local medical response. They may request

assistance from local professional organizations in providing information to all members of the local medical community.

E. Coordination of Incident Management Activities

1. Law enforcement agencies involved in consequence management shall keep those agencies and/or departments responsible for response and recovery efforts informed of decisions made that may have implications on the placement of resources should it be necessary. Because of the sensitivity of law enforcement sources and methods it may be necessary to restrict dissemination of some information to selected emergency management and public health officials who have a need to know. Those individuals may have to carry out some preparedness activities surreptitiously.
2. Until law enforcement and emergency management personnel agree that investigation activities have been concluded, law enforcement personnel shall participate in incident command or EOC operations to advise those carrying out consequence management operations with respect to protection of the crime scene, evidence collection, and investigation results that may have bearing on emergency operations. FDLE and the FBI will normally provide personnel to participate in an IC/UC operation to coordinate State and Federal law enforcement assistance.

F. Implementation of the Incident Command System (ICS)

Refer to the Base Plan.

G. Protective Actions

1. Responders. Emergency personnel responding to a terrorist incident must be protected from the various hazards that a terrorist incident can produce. These include: blast effects, penetrating and fragmenting weapons, fire, asphyxiation, hazardous chemicals, toxic substances, radioactive materials, and disease-causing material. See the discussion of threat weapons and their effects in Appendix 3. Though the type of protection required varies depending on the hazard, there are three basic principles of protection that apply to all hazards: time, distance, and shielding.
 - a. Time. Emergency workers should spend the shortest time possible in the hazard area or exposed to the hazard. Use techniques such as rapid entries to execute reconnaissance or rescue and rotate personnel in the hazard area.

- b. Distance. Maximize the distance between hazards and emergency responders and the public. For chemical, radiological, and explosive hazards, recommended isolation and protective action distances are included in the *Emergency Response Guidebook* (ERG).
 - c. Shielding. Use appropriate shielding to address specific hazards. Shielding can include vehicles, buildings, protective clothing, and personnel protective equipment.
2. The Public. Protective actions for the public must be selected and implemented based on the hazards present and appropriate instructions and information provided to the public through usual means of warning and public information. Protective actions for the public may include:
- a. Evacuation.
 - b. Shelter-in-place.
 - c. Access control to deny entry into contaminated areas.
 - d. Restrictions on the use of contaminated foodstuffs, normally imposed by the Florida Department of Health Services (DOH).
 - e. Restrictions on the use of contaminated agricultural products before processing will normally be imposed by the Florida Department of Agriculture and Consumer Services. These are products destined for food use after processing.
 - f. Restrictions on the use of contaminated public water supplies, normally imposed by the Florida Department of Environmental Protection (FDEP).
 - g. For incidents involving biological agents, protective actions taken to prevent the spread of disease may include:
 - i. Isolation of diseased victims within medical facilities.
 - ii. Quarantines to restrict movement of people and/or livestock in specific geographic areas.
 - iii. Closure of schools and businesses.

- iv. Restrictions on mass gatherings, such as sporting events.

Such measures are normally recommended and imposed by public health authorities.

H. Requesting External Assistance

Refer to the Base Plan.

I. Phases of Management

This Annex follows a basic approach and acknowledges that most responsibilities and functions performed during an emergency are not specific.

1. Mitigation

- a. Establish guidelines for terrorist incident response
- b. Identify high-risk targets and their associated hazards
- c. Institute security programs for the high risk and most vulnerable areas
- e. Exchange information and intelligence on activities with the Joint Terrorism Task Force (JTTF) and other appropriate agencies.

2. Preparedness

- a. Conduct training sessions for other response personnel
- b. Ensure detection and monitoring equipment are available and operational
- c. Establish decontamination protocols
- d. Maintain medical and sampling supplies and equipment
- e. Maintain personal protective equipment (PPE)

3. Response

- a. Establish control zones for scene security, crowds, media and Hazmat operations.

- b. Conduct fire and rescue, hazardous materials, and law enforcement operations
 - c. Stage and deploy appropriate resources
 - d. Alert and/or activate medical strike teams
 - e. Establish effective communications with all response groups
4. Recovery
- a. Initiate community mental health services
 - b. Restore normal services

V. ORGANIZATION & ASSIGNMENT OF RESPONSIBILITIES

A. Organization

1. City departments and public safety agencies will continue to use a functional approach to solve problems and aid, as necessary.
2. While all emergency management agencies and emergency support functions may be involved in responding to a terrorist incident, certain agencies are anticipated to play a more active role in the event.

Because of the nature of terrorism, NPPD will act as the City's lead agency for coordinating local, mutual aid, State, and Federal response during acts of terrorism.

3. Intelligence and Prevention

Intelligence and prevention are primarily a law enforcement direction and control function at all levels of government and will be coordinated locally by NPPD.

4. Response and Recovery Operations

- a. Are performed in the same manner as any other operation conducted for an emergency or disaster in North Port.
- b. Emergency Management will coordinate the response and recovery with support provided from State and Federal government as required.

5. The coordinating agency for the Health and Medical function is the Sarasota County Health Department.

B. Assignment of Responsibilities

1. The Emergency Manager will be responsible for coordinating all EOC operations, as required.
 - a. Develop and maintain a resources database
 - b. Assist in identifying high risk targets and their associated hazards
 - c. Determine the vulnerabilities of the high-risk areas and their impact upon the population
 - d. Coordinate periodic exercises to test response
 - e. Develop and promote public awareness programs
 - f. Develop communication procedures
2. North Port Police Department
 - a. Assign liaison personnel to the EOC
 - b. Coordinate all law enforcement activities within the City
 - c. Coordinate with the JTTF, and all other law enforcement agencies
 - d. Develop awareness and prevention training programs for law enforcement personnel
 - e. Institute security programs for the high risk and most vulnerable areas
 - f. Conduct briefing sessions for emergency management and response personnel
 - g. Maintain terrorist activity information
 - h. Establish scene security
 - i. Provide traffic control, as necessary

- j. Notify appropriate Federal, State and County law enforcement agencies when activated
3. North Port Fire Rescue
- a. Assign liaison personnel to the Emergency Operations Center (EOC)
 - b. Coordinate all fire and EMS service activities within the City
 - c. Provide fire suppression, search, and rescue operations, including evacuation, as needed
 - d. Remain on scene with unsafe structures until the scene is rendered safe
 - e. Respond to medical emergency calls, establish triage if needed, provide emergency medical care to the injured, including advanced life support when appropriate
 - f. Transport sorted patients in a timely manner to the appropriate medical facility
 - g. Alert hospitals of mass casualty incident with suspected CBRNE agents so they may initiate protective action plans
 - h. Establish control zones, PPE requirements, decon procedures, containment of product, and product identification
 - i. Request activation of the Sarasota County Fire Department HMRT, as needed
 - j. Activate mutual aid, as needed
5. Sarasota County Health and Human Services (SCHHS)
- a. Assign liaison personnel to the EOC
 - b. Coordinate the City's Health and Medical infrastructure
 - c. Conduct epidemiological investigation
 - d. Alert hospitals of CBRNE incident so they may initiate protective action plans

- e. Conduct ongoing surveillance activities
 - f. Provide diagnostic and reference laboratory support for the community
 - g. Provide ongoing analysis of data to support decision-making during an event
- 6. Routine operations will be conducted in accordance to standard procedures and guidelines
 - 7. State and Federal support will be called upon when needed
 - 8. All mutual aid resources will function under the direction of the City and immediate control of their respective supervisors
- C. General Response Checklist - These steps are not in any specific order and may be performed by various individuals from various locations.
- 1. Be suspicious if any indicators are present and respond with heightened awareness
 - 2. Approach with caution from uphill and upwind
 - 3. Establish Command Post and initial perimeter, restrict entry, consider secondary devices, and treat as a potential crime scene
 - 4. Identify a safe staging area
 - 5. Establish command structure (fire, hazardous materials, law enforcement, emergency management, public health and medical)
 - 6. Establish appropriate level of personal protective equipment required
 - 7. Establish treatment plan for victims and decedents (include triage, treatment, transport and decon as appropriate)
 - 8. Make additional notifications (Mutual-aid, City departments, County, State, and Federal)
 - 9. Make protective action recommendations to the public

- a. Basic shelter-in-place guidance should be given for residents indoors located near the incident site.
- b. Quickly establish control of ingress and restrict egress from incident site to prevent contamination spread.
- c. Evacuation of non-injured/non-contaminated persons must include coordination with investigating law enforcement personnel.
- d. Disseminate guidance for persons in the area at the time of the event via media resources at earliest opportunity after agent identification.

10. Coordinate media

VI. DIRECTION & CONTROL

- A. The Incident Commander shall, pursuant to the CEMP and NIMS, provide general guidance for emergency operations, including the response to terrorist incidents. During periods of heightened terrorist threat or after an incident has occurred, the local EOC will be activated.
- B. The IC/UC, assisted by a staff sufficient for the tasks to be performed, will manage the emergency response at the incident site from an ICP. If terrorist attacks affect multiple widely separated facilities, separate incident command operations may be set up.
- C. If City resources are insufficient or inappropriate to deal with an emergency, the City may request assistance from other jurisdictions pursuant to mutual aid agreements or from organized volunteer groups. Mutual aid personnel and volunteers will normally work under the immediate control of their own supervisors. All response agencies are expected to conform to the general guidance provided by our senior decision-makers and carry out mission assignments directed by the IC/UC or the EOC.
- D. In a large-scale terrorist incident, significant assistance may be needed from other local governments, State agencies, and the Federal government. As these external resources arrive, they will be integrated into the operation consistent with the NIMS guidance.

VII. ADMINISTRATION AND SUPPORT

- A. Reports and Records

1. Situation Report. During emergency operations for terrorist incidents, a daily situation report should be prepared and distributed to the County EOC.
2. Records Relating to Emergency Operations
See Base Plan.

B. Preservation of Records

As terrorist often target government facilities, government records are at risk during terrorist incidents. To the extent possible, legal, property and tax records should be protected. If government records are damaged during the incident response, the EOC should be promptly advised so that timely professional assistance can be sought to preserve and restore them.

C. Post-Incident Review

See Base Plan.

VIII. ANNEX DEVELOPMENT AND MAINTENANCE

A. Responsibility

Each agency identified in section VI(B) of this Annex will develop SOGs that address assigned tasks. Emergency Management is responsible for reviewing this annex annually and updating as necessary.

B. Schedule for Annex Updating

This annex will be maintained in accordance with the following schedule:

1. The annex will be updated with each updating of the City's Comprehensive Emergency Management Plan.
2. The annex will be reviewed after each exercise and/or actual response to a terrorist event, and modified as necessary.
3. The annex will be reviewed and revised, if needed, after each of the following types of events:
 - a. A major change in applicable Federal or State laws, regulations, or policies,

- b. A major terrorist or cyber terrorist event impacting a jurisdiction in Sarasota County,
- c. The findings of ongoing vulnerability and needs assessments in Florida, and
- d. Major advances in applicable response technology and/or operational concepts
- e. Security Considerations - General Exemptions from Public Inspection

Certain security procedures and plans developed resulting from this Annex to the City of North Port Comprehensive Emergency Management Plan, may, and should be exempt from public inspection under F.S. Chapter 119.

APPENDICES

- Appendix 1 Terrorist Incident Response Checklist
- Appendix 2 Background Information on Chemical, Biological, Radiological, Nuclear, Explosive Agents
- Appendix 3 Guidance for City Government Activities During a “Severe Risk of Terrorist Attack,” Code Red
- Appendix 4 Procedure for Management of Victims of a Terrorist Incident Involving Biological, Chemical or Radiological Materials
- Appendix 5 Notification of Regional Domestic Security Task Force (RDSTF)

APPENDIX 1 TO ANNEX G**Terrorist Incident Response Checklist****I. INDICATORS**

- A. Is the response to a target hazard or target event?
- B. Has there been a threat?
- C. Are there multiple victims?
- D. Are responders victims?
- E. Are hazardous substances involved?
- F. Has there been an explosion?
- G. Has there been a secondary attack/explosion?

II. RESPONSE ACTIONS

- A. Be suspicious if any indicators are present and respond with heightened awareness
- B. Approach with caution from uphill and upwind
- C. Establish Command Post and initial perimeter, restrict entry, consider secondary devices, and treat as a potential crime scene
- D. Identify a safe staging area
- E. Establish command structure (fire, hazardous materials, law enforcement, medical, and emergency management)
- F. Establish appropriate level of personal protective equipment required
- G. Establish treatment plan for victims and decedents (include triage, treatment, transport and decon as appropriate)
- H. Make additional notifications (Mutual-aid, City departments, County, State, and Federal)

- I. Make protective action recommendations to the public
 - 1. Basic shelter-in-place guidance should be given for residents indoors located near the incident site.
 - 2. Quickly establish control of ingress and restrict egress from incident site to prevent contamination spread.
 - 3. Evacuation of non-injured/non-contaminated persons must include coordination with investigating law enforcement personnel.
 - 4. Disseminate guidance for persons in the area at the time of the event via media resources at earliest opportunity after agent identification.

- J. Coordinate media

These steps are not in any specific order and may be performed by various individuals from various locations.

III. RESPONSE RESOURCES

- A. Urban search and rescue teams for collapsed structures
- B. Mortuary support for mass fatalities
- C. Investigative resources
- D. Specialized pharmaceuticals
- E. Public health prevention programs
- F. Personnel support for quarantine operations

APPENDIX 2 TO ANNEX G

Background Information on Chemical, Biological, Radiological, Nuclear, Explosive Agents

I. PURPOSE

This Appendix to Annex G of the City of North Port CEMP is to provide background information regarding the CBRNE agents that could be involved in a terrorist incident in the City of North Port.

II. TYPES

A. Ballistics/Explosives

Ballistic injuries resulting from terrorist attacks are still the most common and have the highest “lethality index.” A determined individual or group of individuals armed with assault-type weapons can produce a high rate of casualties in a short period.

Table 1 - Lethality Index for Ballistic Injuries¹

Weapon	Fatalities	Nonfatal Injuries	Lethality Index*
Bullets			
Low Velocity	35	430	0.08
High Velocity	152	261	0.37
Fragmentation Munitions	5	33	0.13
Homemade Bombs	10	164	0.06
High explosive Devices	79	281	0.22
Hand Thrown missiles	0	304	0
<i>*Lethality Index is the number of fatalities divided by the number of injuries and fatalities combined [LI=fatalities / (injuries + fatalities)].</i>			
Information derived from Journal of the Royal Army Medical Corps			

Bombs are the most common weapons of terrorists. Bombs are easy to make from ordinary household materials and can be very effective. A fertilizer bomb blasted the Alfred P. Murrah Federal Building in Oklahoma City. When a bomb of this type explodes, it sends a shockwave in all directions and smashes into buildings blocks away. As this shock wave travels, a powerful vacuum forms behind it, sucking in the entire atmosphere that has been displaced by the original

¹ Owen-Smith MS. *A computerized data retrieval system for the wounds of war: The Northern Ireland casualties.* *J R Army Med Corps.* 1981; 127:31-54.

shockwave. The surrounding area is smashed a second time by the aftershock. All this takes less than a second. Materials in the way of these shockwaves become high velocity projectiles. Walls move away from the blast and then back toward the blast before finally crumbling. Floors and roofs defy gravity for a split second before collapsing to the ground. This can all be accomplished using common household substances.

Most fertilizer bombs, like the Oklahoma City bomb, generate blast waves that can exceed 6800 miles per hour. High-order military explosives, such as C4 and Semtex, can create blast waves almost three times as fast.

Table 2 - Mechanisms of Blast Injuries ²

Type of Blast Injury	Mechanism	Injuries	Diagnostic Procedures	Treatment
Primary	Injury from blast wave as it travels through the air or water	Pulmonary contusion Hollow viscous perforation (possibly delayed) Perforated eardrums	History and Physical examination Chest Radiograph Serial abdominal examination	Pulmonary toilet Ventilatory support Laparotomy as indicated
Secondary	Injury from primary and secondary missiles as they are propelled outward by the explosion	Penetrating missile injury Orthopedic injuries	History and physical examination Neurovascular evaluation of involved extremities Director skeletal radiographs	Fracture stabilization Debridement Tetanus prophylaxis Laparotomy or thoracotomy as indicated
Tertiary	Injury sustained when the casualty is	Closed head injury	History and physical examination	Neurosurgical intervention for intracranial mass lesions

² **Terrorism in America, An Evolving Threat:** Matthew S. Slater, MD; Donald D. Trunkey, MD; **Archives of Surgery**, Special Article B October 1997.

	propelled (displaced) through the air and then impacts onto a relatively fixed object	Cervical spine injury Orthopedic injuries	Cervical spine evaluation Computed tomography of the head as indicated Direct skeletal radiographs	Fracture Stabilization
Miscellaneous	Burn injuries, inhalation injuries, and injuries related to structural collapse	Burns Inhalation injury Crush syndrome Compartment syndrome	History and physical examination Creatine kinase level	Secure airway Fluid resuscitation Burn coverage
<i>Primary missiles are those derived from the bomb container itself. Secondary missiles are those generated from the surrounding blast environment (e.g. Glass and other building materials).</i>				

B. Nuclear/Radiation

Radiation is defined as high-energy particles or gamma rays that are emitted by an atom as the substance undergoes radioactive decay, which is the process in which a radioactive nucleus emits radiation and changes to a different isotope or element. The types of radiation are in the following forms of energetic particles:

Particles lose their energy by depositing it in the material they move through, whether that material is air, water, people, or lead. Radiation, regardless of intensity, has the potential to produce harmful effects on human beings, animals, and plant life. Background (natural) radiation poses little threat to our systems. However, serious health consequences can be expected if a person is subjected to large amounts of radiation. The types of radiation and their effects are as follows:

1. **Alpha** (particulate) radiation particles cannot penetrate the outer layer of skin. They can be stopped by thin layers of light materials (such as a sheet of paper) and pose no direct or external radiation threat. *However, they pose a serious health threat if inhaled or ingested.* Therefore, a respirator or the use of Self-Contained Breathing Apparatus (SCBA) is recommended. The range in air for alpha particles is 1 to 3 centimeters.
2. **Beta** (particulate) radiation particles can penetrate skin, but not vital organs (lungs, gastrointestinal tract, heart, etc.) and represent a hazard

both internally and externally. Beta radiation can be lethal depending upon the dose and length of time of exposure. It is easily shielded by aluminum. The range in air for beta particles is approximately 10 feet. Initial symptoms are itching and burning of the skin, with later symptoms that include reddening of the skin and more severe changes in pigmentation, hair loss, and sores.

3. **Gamma** (Energy) and **Neutron** radiation particles can penetrate through the body and represent a hazard both internally and externally. These rays have high energy and a short wavelength. Shielding against gamma radiation requires thick layers of dense materials, such as lead. Gamma and neutron radiation typically have a range in air of several hundred feet.

Table 3 - Nuclear Agents³

Agent	Particles	Planned Use	Potential for Terrorist Use	Mode of Contamination	Critical Body Site
Uranium 235 & 238	Alpha Beta Gamma	Reactor fuel Nuclear weapons	Nuclear weapons	Inhalation Skin Wound absorption	Bone
Plutonium 239	Alpha Gamma	Reactor fuel Nuclear weapons	Nuclear weapons	Inhalation Wound absorption	Bone
Cesium 137	Beta Gamma	Medical & Industrial radiation source	Radiation Poisoning	Inhalation Skin Gastrointestinal	Total Body
Iodine 131	Beta Gamma	Medical	Radiation Poisoning	Inhalation Skin Gastrointestinal	Thyroid
Cobalt 60	Gamma	Medical & Industrial radiation source	Radiation Poisoning	Inhalation Gastrointestinal	Gastro-intestinal

The main concern with radiation is that it is an invisible hazard. Unless the responding public safety agency has radiological detection equipment, or the nuclear material at issue is clearly marked and identified, there is a strong chance

³ *Adapted from* Textbook of Military Medicine.

that the initial identification of a radiological or nuclear hazard will go unnoticed. Although, there is no one piece of equipment available on the market to meet all detection requirements, there are separate detectors for each type of radiation. An additional concern would be the availability of protective clothing and breathing gear, in sufficient quantities, to protect first responders. If first responders are subjected to large amounts of radiation due to major radiation accidents or nuclear attack, they can expect serious consequences to their health. *It should be noted that individuals suffering from radiation injuries are NOT radioactive.*

Of importance is the dose or amount of radiation absorbed over a period of time. There are many terms used to measure the dose of radiation. One is the Roentgen Equivalent Man (REM), which is a unit of absorbed dose that takes into account the relative effectiveness of the radiation involved in causing health effects. Another measurement of the absorbed dose of radiation is known as rad. Sometimes rad measurements are referred to as Gray, which is the equivalent of 100 rad. In this document, health effects are expressed in rad.

1. 50 to 200 rad - Approximately 6 hours after exposure, the individual may have symptoms ranging from none to transient mild headaches. There may be a slight decrease in the ability to conduct normal activities. Less than 5 percent of individuals in the upper part of the exposure range will require hospitalization. Average hospital stay will be 45 to 60 days, with no deaths.
2. 200 to 500 rad - Approximately 4 to 6 hours after exposure, individuals will experience headaches, malaise, nausea, and vomiting. Symptoms are not relieved by antiemetics in the upper exposure range. Individuals can perform routine tasks, but any activity-requiring moderate to heavy exertion will be hampered for 6 to 20 hours. After this period, individuals will appear to recover and enter a latent period of 17 to 21 days. If individuals have received 300 rads or more, they will have large quantities of hair loss between 12 to 18 days after exposure. Following the latent stage, symptoms will return, requiring 90 percent of the personnel to be hospitalized for 60 to 90 days. Probably less than 5 percent of those at the lower dose range will die, the percentage increasing toward the upper end of the dose range.
3. 500 to 1,000 rads - Approximately 1 to 4 hours after exposure, severe and prolonged nausea and vomiting will develop that are difficult to control. Diarrhea and fever develop early in individuals in the upper part of the exposure range. Significant incapacitation is seen in the upper ranges. Initial symptoms last for more than 24 hours, then go into a latent period lasting 7 to 10 days. Following the latent stage, the symptoms return

requiring 100 percent of the individuals to be hospitalized. Of those in the lower range, 50 percent will die, the percentage increasing toward the upper range. All deaths occur within 45 days. The survivors require 90 to 120 days of hospitalization before recovery.

4. 1,000 rad or more - Less than 1 hour after exposure, individuals develop severe vomiting, diarrhea, and prostration. There is no latent period. All individuals require hospitalization and die within 30 days.

C. Biological Agents

Governments have used biological warfare as long as civilization has depended on agriculture. Today, various governments continue to research the development of poisonous toxins that are far more deadly than chemical warfare agents. Two of the earliest reported uses of toxins occurred in the sixth century BC: the Assyrian poisoning of enemy wells with rye ergot, and Solon’s use of the purgative herb hellebore during the siege of Krissa.

The use of biological agents is the oldest weapon of the NBC triad. Biological agents are more deadly than chemical agents and occur in nature and are being artificially developed in the laboratory. Large numbers of naturally occurring poisons have also been examined to determine their value as warfare agents. These include Capsaicin (and extract of cayenne pepper and paprika), Ricin (a toxic substance found in the castor bean), and Saxitoxin (a toxic substance secreted by certain shellfish).

Table 7 - Biological Agent Quick Information Chart ⁴

Agent	Class	Transmission	Symptoms	Treatment
Anthrax <i>(Bacillus anthracis)</i>	Bacteria	Inhalation of bacillus or spores	Dyspnea Cyanosis Pulmonary edema Respiratory failure	Vaccination Antibiotics
Bubonic plague <i>(Yersinia pestis)</i>	Bacteria	Fleas	Fever Delirium Cutaneous lesions	Vaccination Antibiotics
Salmonella species	Bacteria	Ingestion	Gastrointestinal symptoms Fever	Antibiotics

⁴ **Terrorism in America, An Evolving Threat:** Matthew S. Slater, MD; Donald D. Trunkey, MD; **Archives of Surgery**, Special Article, October 1997.

Botulinum toxin (<i>Clostridium botulinum</i>)	Bacterial (Neurotoxin)	Inhalation Contact (skin wound)	Paralysis	Supportive
Gas gangrene (<i>Clostridium perfringens</i>)	Bacteria	Wound infection	Necrotizing Soft tissue infection	Antibiotics Surgical Debridement
Ebola	Virus (Filoviridae)	Body fluids	Fever Hemorrhage Convulsions	Supportive No specific treatment

1. Biological agents generally fall into one of three types:
 - a. Pathogens - Living, reproducing, disease-producing organisms.
 - i. Bacteria. Capable of reproducing outside living cells. Examples: anthrax, tularemia, bubonic plague, cholera, and typhoid fever.
 - ii. Viruses. Infective agents composed of DNA or RNA that can only reproduce inside living cells. Examples: Venezuelan equine encephalitis (VEE), yellow fever, smallpox, hemorrhagic fever (Marburg and Ebola), and human immunodeficiency virus (HIV).
 - iii. Rickettsia. Parasitic microorganisms whose diseases are transmitted by the bite of ticks, lice, and fleas. These parasites require a living host as opposed to bacteria. Examples: Rocky Mountain spotted fever, Q fever, and flea-borne typhus.
 - iv. Yeast and Fungi (Mycotoxins). Mycotoxins were allegedly used in aerosol form ("yellow rain") to produce lethal and non-lethal casualties in Laos (1975-1982), Kampuchea (1979-1981), and Afghanistan (1979-1981). Since the alleged victims were usually unprotected civilians or guerilla forces in remote jungle areas, it was extremely difficult to confirm the attacks or recover samples.

However, over 10,000 deaths have been attributed to the use of these agents in these three campaigns.⁵

- iv. Genetically-Engineered Pathogens. Through advanced biochemical techniques, pathogens are subject to enhancement to increase their utility. Examples: antibiotic-resistant bacteria, bacteria genetically altered to have advanced aerosol and environmental durability, immunologically altered viruses resistant to standard vaccines and not identifiable to classical serological means.
- b. Toxins - Non-living, poisonous chemical compounds produced through the metabolic activities of living organisms. Toxins are 1,000 times more lethal or effective than standard chemical agents. Examples: snake venom, scorpion venom, Ricin, Saxitoxin (produced by marine algae), and puffer fish venom.
- c. Endogenous Biological Regulators (EBR) - Chemical substances produced in the body to regulate various body functions such as muscle contractions, blood pressure, heart rate, temperature, and immune responses. Examples: hormones, adrenalin, and delta sleep-inducing peptide.

2. Use

The most practical method of initiating infection using biological agents is through the dispersal of agents as minute, airborne particles (aerosols). Finely divided particles of liquid or solid suspended in a gas are sprayed over a target where the particles may be inhaled. An aerosol may be effective for some time after delivery, since it will be deposited on clothing, equipment, and soil. When the decontaminated clothing is used later, or dust is stirred up, responding personnel may be subject to a secondary dispersal.

Biological agents may be able to use portals of entry into the body other than the respiratory tract. Individuals may be infected by ingestion of contaminated food and water or even by direct contact with the skin or mucous membranes through abraded or broken skin. This makes the use of protective clothing a must, along with protection of the respiratory tract through the use of a mask with biological filters or SCBA.

⁵ Jane's Chem-Bio Handbook. Frederick R. Sidell, MD; Dr. William C. Patrick, III; and Thomas R. Dashneill. Jane's Information Group, 1998. Page 147.

Exposure to biological agents, unlike chemical agents, may not be immediately apparent. Casualties may occur minutes or hours to days or weeks after an incident has occurred. The time required before symptoms are observed is dependent on the agent used. There are currently no effective monitoring devices available for first responders for use in determining whether they are involved in an incident involving biological agents, though work continues developing such devices. Often the first clue will come from blood tests, or by other means used by medical personnel, or by observing possible symptoms of people exposed in the area. Hazardous materials response teams and local FBI special response teams have field test kits and procedures to detect the presence of some biological agents such as anthrax.

Some clues may be present that could be indicators that an NBC incident involving biological agents has taken place:

- a. Unusual numbers of sick or dying people and animals are present. For example, all the birds that are usually present at outside trash bins are dead; no insect sounds, etc.
- b. Reported illness reflects an unusual or impossible agent for the geographic area or there is an unusual distribution of the disease (that is, the casualties are aligned with the wind direction outdoors).

Biological attacks will be different from natural outbreaks of disease. For example, a steady stream of patients presents to medical facilities instead of the usual peaks and valleys. Or the illness may occur in an unusual environment or time of year (such as cases of anthrax showing up where none have occurred before).

Early warning and rapid identification of biological agents is of primary importance. This warning can sometimes be supplied by intelligence sources, but early warning is not usually available.

3. Some of the more common or anticipated biological weapons are as follows:
 - a. **Anthrax** is an acute infectious disease caused by the spore-forming bacterium *Bacillus anthracis*. It occurs most frequently in cattle, goats, and sheep that acquire spores from direct contact with contaminated soil. Humans usually become infected through contact with, ingestion of, or inhalation of anthrax spores from infected animals or their products (like goat hair). Human-to-

human transmission has not been documented. Following are sample guidelines for responding to a WMD threat involving anthrax.⁶

1. Anonymous caller indicating a WMD threat (including anthrax)
 - a. Law enforcement response including, Department of Health, local authorities, State Watch Office, and FBI.
 - b. Fire department/hazardous materials response not recommended unless device or substance is found
 - c. Routine law enforcement investigation.
 - d. Investigative actions during this response may include:
 - Information gathering at the scene
 - Building evacuation/search following local protocol
 - Taking control of the building ventilation system may be warranted, but only if based upon investigative findings.
 - Attention should be focused on appliances or devices foreign to the surroundings.
 - Included should be an assessment of the building ventilation system to rule out forced entry and tampering.
 - Protective equipment should not be required unless hazards or risks are indicated.
 - Investigations like a telephonic bomb threat.

⁶ Adapted from National Domestic Preparedness Office, Special Bulletin Number 6. January 12, 2000.

- e. Suspicious findings during investigation should initiate a public safety response including:
 - Fire/EMS/hazardous materials
 - EOD team.
 - Notifications per local plan which should include local and state health departments.
2. Potential WMD device located
 - a. Follow local protocols for risk assessment and evaluation of potential explosive devices. Included in the response should be:
 - Law enforcement including local authorities, State Watch Office, and FBI.
 - Fire/EMS/hazardous materials.
 - EOD team.
 - Local and state health departments
 - b. If explosive device is not ruled out, coordinate efforts with local/regional EOD authority and notify FBI Bomb Data Center (BDC).
 - c. If explosive device is ruled out:
 - Evaluate for potential chemical, biological, or radioactive filler.
 - If radioactive filler appears to be present, follow plans for requesting additional assistance, to include Department of Health, Bureau of Radiation Control.
 - If no hazardous materials appear to be present, response continues as a law enforcement investigation.

- d. Device with potential chemical or biological filler or supplement.
 - Follow local and FBI ERT protocols for documentation of the crime scene.
 - Contain the package following recommendations from a hazardous materials authority. FBI will assure notification of FBI/HMRU.
 - Options include double bagging, steel cans, poly containment vessels, or utilization of a hazardous materials over-pack.
 - Control the material as evidence and follow plan for laboratory analysis.
 - e. Potential release of WMD material from a device.
 - Control the ventilation system.
 - Follow protocols for a hazardous materials incident.
 - Evaluate the extent of contamination.
 - Evacuation of affected areas and decontamination procedures should be selected based on an incident and risk assessment.
 - Provide medical attention following the recommendations from the local/regional public health medical authority.
 - Control and/or isolate the hazard.
 - Treat as a hazardous materials crime scene.
 - FBI will request assistance from FBI/HMRU.
3. Specific situations - envelope with potential threat of anthrax, letter opened, and material present.

- a. Public safety response including local authorities, State Watch Office, and FBI.
 - b. Contain the package following recommendations from a hazardous materials authority.
 - Options include double-bagging, steel cans, poly containment vessels, or utilization of a hazardous materials over-pack.
 - Control the material as evidence and follow plan for laboratory analysis.
 - c. Provide medical attention/decontamination following the recommendations from the local/regional public health medical authority.
 - Evaluate the extent of contamination.
 - Evacuation of the affected area and decontamination procedures should be selected based on an incident hazard and risk assessment.
 - Generally, medical prophylaxis and decontamination have not been indicated except for washing hands with soap and warm water.
4. Specific Situations - envelope with potential threat of anthrax, letter opened, and no specific material present.
- a. Law enforcement response including local authorities, State Watch Office, and FBI
 - Fire department/EMS/hazardous materials response not recommended unless suspicious material is found or individuals are presenting symptoms.
 - b. Handle the package following local and FBI ERT protocols

- Double bag the material and place in a suitable container such as an evidence paint can.
 - Control the material as evidence and follow plan for laboratory analysis.
- c. No medical attention/decontamination is necessary unless symptoms are present, although local public health authorities should be notified.
- d. Handle as a law enforcement investigation.
5. Specific situations - envelope with potential threat of anthrax, letter not opened.
- a. Law enforcement response including local authorities, State Watch Office, and FBI.
- Fire department/hazardous materials response not recommended unless unsuspecting material is found.
- b. Handle the package following local and FBI ERT protocols.
- Double bag the material and place in a suitable container such as evidence paint can.
 - Control the material as evidence and follow plan for laboratory analysis.
- c. No medical attention/decontamination is necessary.
- d. Handle as a law enforcement investigation.

Note: Per the CDC, hand washing is sufficient for those who have touched the envelope and letter. Decontamination or prophylaxis is not warranted.

- b. Smallpox** - The last reported case in the world was in 1977, and the last case in the U.S. was in 1949. This devastating disease, for which

there is no therapy, has a 30% mortality rate and commonly leaves survivors blind or seriously scarred. Smallpox is spread by aerosol or droplets and has an incubation period of 14 days. Initial symptoms resemble the flu but are followed by a rash which, unlike chicken pox, evolves with lesions in identical stages of evolution. The disease is infectious only during the rash phase. The major mechanisms of disease control are isolation (quarantine) and vaccination. Vaccination up to 4-5 days after exposure may prevent mortality.

Vaccination is confounded by two problems: first, the national stockpile is not currently sufficient for more than several million people. The second problem is adverse reaction to the vaccination (occurs with a frequency of 3 per million--40% of these cases are fatal and the rest usually have residual neurologic problems).

This disease has historically been the most feared in medicine and now represents a highly attractive form of biological weapon. Smallpox is attractive as an agent of bioterrorism in part because abandonment of vaccine programs has resulted in near universal vulnerability to smallpox.⁷

D. Chemical Agents

Chemical agents are defined as any chemical substance intended to kill, seriously injure, or incapacitate humans due of its physiological effects. They are compounds that, through their chemical properties, produce lethal or damaging effects on man.

Persistency is an expression of the duration of effectiveness of a chemical agent. The level of persistency is used to describe the tactical use of chemical agents and should not be used as terms to technically classify the agent:

Non-persistent Agents - Remain in the target for a relatively short period. The hazard, predominately vapor, will exist for minutes or, in exceptional cases, hours after dissemination of the agent. As a rule of thumb, non-persistent agent duration will be less than 12 hours.

Persistent Agents - Remain in the target area for longer periods of time. Hazards from both vapors and liquids may exist for hours, days, or even weeks after dissemination of the agent. As a rule of thumb, persistent agent duration will be greater than 12 hours. There are many factors that will affect the persistency of chemical agents:

⁷ D.A. Henderson, Director, Johns Hopkins Center for Civilian Biodefense Studies, reviewed.

1. **Type of Agent** - Different agents have various consistencies or viscosity with similarities ranging from rubbing alcohol to motor oil and will evaporate or dissipate at approximately the same rate.
2. **Amount of Agent** - Different amounts and dispersal methods used (aerosol, splash) also determine the persistency of an agent.
3. **Terrain** - The terrain will also affect the duration of an agent (open area, vegetative, urban, soil composition).
4. **Weather** - Wind, temperature, humidity, solar radiation, and precipitation all impact on the duration of an agent.

Types of Chemical Agents

The menu of chemical agents is enormous as there are agents typically used by the military, agents found in industry, agents concocted in clandestine labs, and combination agents (more than one chemical agent combined for dual effects).

It would be impossible to put together a complete list of all possible chemical agents and their possible combinations, but it is feasible to list a group of chemical agents that have more likelihood for being used in the field by terrorist agents. This list is presented in symptom logic order:

- a. Nerve Agents
- b. Blister Agents
- c. Choking Agents
- d. Blood Agents
- e. Incapacitating Agents
- f. Vomiting Agents
- g. Compound/Mixed Agents
- h. Irritant or Tear Gas

These agents are further described in more detail in the following pages.

Table 4 - Chemical Agent Quick Information Chart ⁸

Class	Examples	Mechanism	Symptoms	Treatment
Nerve Agents	Tabun, Sarin, Soman, VX, malathion, parathion, sevin	Inhibition of acetylcholine-esterase	Weakness Salivation Miosis Paralysis Hypoxia	Atropine 2 - Pralidoxime
Vesicants (Blister Agents)	Mustard Gas, Lewisite, Nitrogen Mustard Gas	Alkylation	Eye inflammation or upper respiratory tract irritation	Decontamination
Choking Agents	Phosgene, Diphosgen	Variable	Tearing, coughing, Dyspnea Pulmonary edema	Supportive
Cyanide (Blood Agents)	Hydrogen cyanide (AC), Cyanogen halides (cyanogen chloride)	Form stable complexes with metallo-porphyrins	Hypoxia	Nitrites
Incapacitating Agents	Quinuclidinyl benzilate Cannabinols Barbituates	Variable	Central nervous system alterations	Physostigmine

E. Nerve Agents

Nerve agents acquired their name because they affect the transmission of nerve impulses in the nervous system. All nerve agents belong chemically to the group of organo-phosphorus compounds. They are stable, easily dispersed, highly toxic, and have rapid effects both when absorbed through the skin and via respiration.

All these nerve agents produce the same basic physiological effect: they act upon enzymes at the myoneural (muscle-nerve) junction, causing immediate convulsions, paralysis, and death. They can enter the body either through the lungs or the skin and are deadly in very small quantities.

Nerve agents may be absorbed through the skin, respiratory tract, gastrointestinal tract, and the eyes. However, significant absorption through the skin takes a period of minutes, and prompt medical treatment and decontamination are imperative and sometimes quite successful.

1. Physical and Chemical Properties

⁸ Adapted from; Terrorism in America, An Evolving Threat; Matthew S. Slater, MD; Donald D. Trunkey, MD; Archives of Surgery, Special Article, October 1997.

The most commonly mentioned nerve agents are listed below⁹:

The "G" series of nerve agents include **Tabun (GA)**, **Sarin (GB)**, and **Soman (GD)**. These military nerve agents are generally volatile and will evaporate at approximately the same rate as water. As a liquid, these substances are heavier than water and will sink. As a vapor, they are heavier than air and will tend to sink to the lowest level (like basements and subways).

VX is a persistent military nerve agent that does not evaporate readily and is significantly heavier than air. Its primary contact hazard is as a liquid.

Parathion and Malathion are commercial pesticides. They are quickly metabolized in the body and cause effects like those of nerve agents. However, they are significantly less toxic.

Sevin (carbaryl) is a commonly used insecticide that is absorbed by ingestion and through the skin and eyes. Carbamates cause similar effects as nerve agents. However, unlike the organophosphate compounds, the toxic effect is not permanent. After several hours, the carbamate will spontaneously leave the system. This should be considered in victim care and medical treatment.

2. Mechanism of Action

A characteristic of nerve agents is that they are extremely toxic and that they have very rapid effect. The nerve agent, either as a gas, aerosol, or liquid enters the body through inhalation or through the skin. Poisoning may also occur through consumption of liquids or foods contaminated with nerve agents. The route for entering the body is of importance for the period required for the nerve agent to start having effect. It also influences the symptoms developed and, to some extent, the sequence of the different symptoms. Generally, the poisoning works faster when the agent is absorbed through the respiratory system than via other routes.

Poisoning takes longer when the nerve agent enters the body through the skin. Since the first symptoms do not occur until 20-30 minutes after the initial exposure, immediate decontamination is essential. The poisoning process may be rapid, however, if the total dose of nerve agent is high.

⁹ Jane's Chem-Bio Handbook. Frederick R. Sidell, MD; Dr. William C. Patrick, III; and Thomas R. Dashneill. Jane's Information Group, 1998. Pages 32-52.

3. Symptoms

The most identifiable characteristic of nerve agent exposure is the extreme constriction of the iris (miosis) causing pinpoint pupils. Other characteristic symptoms include increased production of saliva, a running nose, and a feeling of pressure on the chest. Short-range vision also deteriorates and the victim feels pain when they try to focus on an object nearby. This is usually accompanied by headache. More unspecific symptoms are tiredness, slurred speech, hallucinations, and nausea.

Exposure to a higher dose leads to more pronounced symptoms. Tightening of the chest and dramatic mucous membrane secretions (eyes, nose, and mouth) lead to coughing and difficulty in breathing. Discomfort in the gastrointestinal tract may develop into cramps and vomiting. Involuntary discharge of urine and defecation may also occur. Symptoms, like twitching, from the skeletal muscles are very typical. If the poisoning is moderate, this may express itself as muscular weakness, local tremors, or convulsions.

When exposed to a high dose of nerve agent, the muscular symptoms are more pronounced. The victim may suffer convulsions and lose consciousness. To some extent, the poisoning process may be so rapid that earlier mentioned symptoms may never have time to develop. Muscular paralysis caused by nerve agents also affects the respiratory muscles, which is the direct cause of death. Consequently, death caused by nerve agents is a kind of death by suffocation.

Table 5 - Effects of Nerve Agents in Humans ¹⁰

Organ or System	Effect
Eye	Meiosis (pinpoint pupils), conjunctival injection; pain in or around eye; complaints of dim or blurred vision
Nose	Dramatic mucous discharge (Rhinorrhea)
Mouth	Increased salivation
Pulmonary Tract	Tightness of chest (Bronchoconstriction) and increased secretions, cough; shortness of breath; on exam: wheezing, rales, rhonchi
Gastrointestinal Tract	Increase in secretions and motility; nausea, vomiting, diarrhea; complaints of abdominal cramps, pain
Skin and Sweat Glands	Sweating

¹⁰ Adapted from: Recommended therapy for casualties of nerve agents; Textbook of Military Medicine Part I; Warfare, Weapons, and the Casualty; Medical Aspects of Chemical and Biological Warfare, Office of the Surgeon General, Department of the Army, United States of America: 1997, page 145: #97-22242.

Muscular	Fasciculations (“rippling”), local or generalized; twitching of muscle groups, flaccid paralysis; complaints of twitching, weakness
Cardiovascular	Decrease or increase in heart rate; usually increase in blood pressure
Central Nervous System	<i>Acute effects of severe exposure:</i> loss of consciousness, convulsions (or seizures after muscular paralysis), depression of respiratory center to produce apnea <i>Acute effects of mild or moderate exposure:</i> forgetfulness, irritability, impaired judgment, decreased comprehension, a feeling of tenseness or uneasiness, depression, insomnia, nightmares, difficulties with expression

Table 6 - Recommended Therapy for Casualties of Nerve Agents ¹¹

Exposure Route	Exposure Category	Signs and Symptoms	Therapy
Inhalation (Vapor)	Minimal	Pin-point pupils with or without nasal discharge; reflex nausea and vomiting	<5 min of exposure: 1 MARK I kit >5 min of exposure*: observation
	Mild	Pin-point pupils; nasal discharge; mild difficulty breathing; reflex nausea and vomiting	<5 min of exposure: 2 MARK I kits >5 min of exposure: 0 or 1 MARK I kit, depending on severity of difficulty in breathing
	Moderate	Pin-point pupils; nasal discharge; moderate to severe difficulty breathing; reflex nausea and vomiting	<5 min of exposure: 3 MARK I kits + diazepam >5 min of exposure: 1 - 2 MARK I kits
	Moderately Severe	Severe difficulty breathing; gastrointestinal or neuromuscular signs	3 MARK I kits; standby ventilatory support; diazepam

¹¹ Adapted from: Recommended therapy for casualties of nerve agents; Textbook of Military Medicine Part I; Warfare, Weapons, and the Casualty; Medical Aspects of Chemical and Biological Warfare, Office of the Surgeon General, Department of the Army, United States of America: 1997, page 167: #97-22242.

	Severe	Loss of consciousness; convulsions; flaccid paralysis; breathing stops	3 MARK I kits; ventilatory support; suction; diazepam
Dermal (Liquid on Skin)	Mild	Localized sweating, twitching	1 MARK I kit
	Moderate	Gastrointestinal signs and symptoms	1 MARK I kit
	Moderately Severe	Gastrointestinal signs plus, respiratory or neuromuscular signs	3 MARK I kits; standby ventilatory support
	Severe	Same as for severe vapor exposure	3 MARK I kits; ventilatory support; suction; diazepam
<i>*Casualty has been out of contaminated environment during this time</i>			

F. Blister / Mustard Agents

These are chemical agents that affect the eyes, respiratory tract, and skin. Blister agents initially cause irritation of the eyes (and respiratory tract, if inhaled), erythema (reddening of the skin), then blistering or ulcerations, followed by systemic poisoning. There are three types of blister agents: mustards, arsenicals, and urticants.

Mustard is usually classified as a blistering agent owing to the wounds caused by this substance resembling burns and blisters. However, blister agents also cause severe damage to the eyes, respiratory system, and internal organs. The effect of mustard agent is delayed and the first symptoms do not occur until 2-24 hours after exposure. Lewisite and phosgene oxime, however, produce immediate pain on whatever part of the body meets the liquid or vapor, such as the eyes or skin.

1. Physical and Chemical Properties

Mustard “gas” is a liquid that is much heavier than water and its vapor is heavier than air. It has an odor of mustard, onions, or garlic that is usually detected when concentrations are close to toxic levels. Mustard can be absorbed into the body through the eyes, the skin, and the airways within seconds of contact.¹²

2. Symptoms

There are no immediate physical signs of mustard exposure. The first sign of exposure to mustard is usually redness of the skin. Over a period of hours small blisters appear and gradually combine to form larger blisters. Irritation and

¹² Jane's Chem-Bio Handbook. Frederick R. Sidell, MD.; Dr. William C. Patrick, III; and Thomas R. Dashneill. Jane's Information Group, 1998. Pages 63-74.

redness are usually the first effects in the eyes. Victims may complain of not being able to see; this is usually due to swelling and inflaming eyelids.

Signs of damage to the upper airways may include sinus pain, irritation of the nose, a sore throat, or a hacking cough. If more than a minimal amount is inhaled symptoms may include voice changes, with hoarseness or loss of voice. If large amounts are inhaled it can lead to damage of the lower airways producing shortness of breath and a severe productive cough. The shorter the onset time of these lower airway effects, the more threatening the diagnosis. Survival is unlikely if these symptoms appear earlier than 4 hours after exposure. Absorption of a large amount will also damage the bone marrow. However, these effects are not evident for approximately 3-5 days.

3. Antidotes & Treatments

There is no treatment or antidote that can affect the basic cause of mustard agent injury. Therefore, the most important measure is to rapidly and thoroughly decontaminate the patient with soap and water. Eyes are rinsed with water or a physiological salt solution for at least five minutes. A casualty should remain under observation since no signs or symptoms occur within the first few hours.

Medical treatment may include antibiotics and local anesthetics to relieve pain. Despite treatment, inflammation and light sensitivity in the eyes may remain for long periods.

G. Cyanides/Blood Agents

Cyanide produces clinical effects by causing cell death. It does so by entering each contaminated cell of the body and poisoning the mechanism that uses oxygen. Oxygen enters the body through the lungs and is carried by the blood to the cells. Cyanide prevents the cells from using the oxygen and they suffocate.

The body can destroy small amounts of cyanide and leave no effects on the body. Large amounts will affect the brain or central nervous system. The brain and central nervous system are dependent on oxygen and most effects of cyanide poisoning are those caused by a lack of oxygen in the brain. Exposure to a large amount will cause a sudden loss of consciousness, followed by convulsions. After 3-5 minutes breathing will stop. Death will usually occur within 10 minutes.

H. Incapacitating / Irritating Agents

Riot control agents such as CS, CN, CR, and pepper spray are commonly used in the civilian world. These agents are solids that are usually dispersed in a liquid spray. There are minor differences between riot control agents, however, the effects are similar: they cause pain or burning on exposed mucous membranes and skin.

Tearing, reddening, and closing of the eyes usually accompany burning in the eyes. If these substances are inhaled, there will be a difficulty in breathing and tightening in the chest. Skin may also become irritated and burn. The effects of these agents begin within seconds of contact and decrease as the casualty moves to clean air. It is rare for these agents to produce serious harm to a casualty, unless disseminated in a forceful manner.

I. Compound/Mixed Agents

The possible mixing of chemical agents presents an additional concern to first responders in that it will be difficult to identify (by symptoms alone) which type of chemical agent is being used.

APPENDIX 3 TO ANNEX G

**Guidance for City Government Activities During a
“Severe Risk of Terrorist Attack,” Code Red**

- A. The following planning guidance will be used whenever the U.S. Department of Homeland Security places the nation under a Severe Risk of Terrorism Attack (Red). The information provided will serve as a guide and is not intended to be all-inclusive. The following scenarios have been developed as potential threats.
 - 1. A credible threat to the City of North Port (R1)
 - 2. A credible threat to Sarasota County. (R1)
 - 3. A credible threat to FDLE Region 6. (R2)
 - 4. A credible threat to the State of Florida. (R3)
 - 5. A credible threat to the United States. (R4)

- B. Notification: Following notification of a change in threat condition from Alert to Imminent from the Department of Homeland Security, the Federal Emergency Management Agency (FEMA) will broadcast this threat condition to the State Warning Point in Tallahassee. The State Warning Point will disseminate the change in threat conditions to the Sarasota County Sheriff’s Office – Communications and the Sarasota County EOC. During non-duty hours, the SSO will contact the County Emergency Management Chief. Sarasota County Emergency Management will forward the threat change with recommended protective actions to the City Emergency Management Director, who will re-transmit to City employees via e-mail.

- C. Organizational Responsibilities:

Emergency Management	R1	R2	R3	R4	R5
Activate Emergency Operations Center to Level 2 utilizing	X	X	X		
Establish Citizen Information Line (Phone Bank)	X	X	X		
Consider the Issuance of a State of Local Emergency	X				
Obtain Project Number from Finance Department and disseminate the number to all City agencies for use in documenting all personnel & operating costs pertinent to the event	X	X	X		
Ensure provisions for the establishment of an alternate Emergency Operations Center have been considered	X	X			
Monitor all National News Networks for current information.	X	X	X	X	

Monitor intelligence from other law enforcement agencies.	X	X	X		
Property Management - Security	R1	R2	R3	R4	R5
Consider 24-hour staffing of Government Security Center.	X	X	X		
Consider restricting traffic / parking outside of a 300 perimeter for specified government buildings	X	X	X		
Ensure all exterior security cameras are working properly	X	X	X	X	
Coordinate with the North Port Police Department for increased patrols at specific government facilities.	X	X	X	X	
Consider increasing the frequency of security inspections of government building exteriors	X	X	X		
Ensure all fuel tanks serving back-up generators are full	X	X	X		
Consider verifying the contents of all shipments & deliveries to all government buildings	X	X	X		
Remove external trash containers and dumpsters that are within 100 feet of buildings	X	X	X		
Manager’s Office	R1	R2	R3	R4	R5
Consider the cancellation of night meetings in government buildings	X	X			
Consider the reduction in hours of operation for non-essential government services	X				
Consider recommending the cancellation of public events such as concerts, sports events, etc.	X	X			
Clerk’s Office - Mail Distribution	R1	R2	R3	R4	R5
Consider “out of building” mail & package screening	X	X	X	X	
Consider verifying the contents of all shipments and deliveries to government buildings	X	X	X		
Utilities – Water and Wastewater	R1	R2	R3	R4	R5
Consider increasing the frequency of testing for contaminants at each water facility	X	X	X	X	
Public Works - Fleet Management	R1	R2	R3	R4	R5
Ensure that all tanks at City-maintained fueling centers are full.	X	X	X		
Public Information Officer	R1	R2	R3	R4	R5
Consider establishing a Joint Information Center (JIC) to include all Fire, Law Enforcement, Utilities and Public Works PIOs	X	X	X		

Information Technology	R1	R2	R3	R4	R5
Consider increasing the frequency of system back-ups to more than once per day	X	X	X		
Department Directors	R1	R2	R3	R4	R5
Consider restricting specific areas of government buildings to authorized personnel	X	X	X	X	

Verify for accuracy all emergency contact numbers of critical staff members	X	X	X	X	
Consider placing all critical staff members on call for emergency response	X	X	X		
Check emergency supplies and, if necessary, re-stock for a minimum of 72 hours	X	X	X		
Consider storing a three-day supply of potable water and non-perishable food at work sites	X	X			
Ensure that all personnel and operating costs pertinent to the potential terrorism threat are documented	X	X	X		
Consider the provision of escorts for visitors in secure / sensitive areas	X	X	X		
Ensure that all government vehicles necessary for emergency response have at least ½ tank of fuel	X	X	X		
Ensure that City-issued ID cards are visibly worn by all employees while on duty	X	X	X	X	
Assist Property Management with the implementation of all security measures	X	X			
Individual Employee Responsibilities	R1	R2	R3	R4	R5
Report suspicious activities and call 9-1-1	X	X	X	X	
Expect delays, searches of purses & bags, and restricted access to public buildings	X	X	X	X	
Expect traffic delays and restrictions	X	X	X	X	
Take personal security precautions	X	X	X	X	
Avoid crowded public areas and gatherings	X	X	X	X	
Keep emergency supplies accessible. Maintain ½ tank of fuel in personal vehicles	X	X	X		
Be suspicious of persons taking photos of critical facilities or asking detailed questions about physical security arrangements	X	X	X	X	
Monitor local and world events	X	X	X	X	
Verify contents of all shipments & deliveries	X	X	X		
Assist neighbors and co-workers	X	X	X	X	
Update personal / family disaster plan to include emergency contact information	X	X	X	X	
Limit travel	X	X	X		
Create an emergency contact list for each family member to carry	X	X	X	X	
Be familiar with emergency exits when inside buildings	X	X	X	X	
When off-duty, maintain contact with your supervisor to determine status of work	X	X	X		
Carry your City-issued identification with you	X	X	X	X	

APPENDIX 4 TO ANNEX G**Procedure for Management of Victims of a Terrorist Incident
Involving Biological, Chemical or Radiological Materials****I. PURPOSE**

This document is an Appendix to the Terrorism Incident Response Annex of the City of North Port Comprehensive Emergency Management Plan. It provides guidance for City emergency response officials on the management of victims potentially contaminated or infected by biological, chemical or radiological agents released during a terrorist incident.

II. REMOVAL OF CASUALTIES/FATALITIES

Designated and properly protected response personnel will extricate victims who are unable to move themselves outside of the hot or warm zones. The extrication of victims will be done in accordance to either standard or specialized triage practices. Obvious fatalities will be left in place pending the activation and arrival of the Medical Examiner's Team and/or Disaster Mortuary Operational Response Team (D-MORT).

III. DECONTAMINATION OF CASUALTIES

The standard hazardous material decontamination procedure will be followed. If it is determined that an alternate decontamination method is needed due to a contaminant, the on-scene Medical Officer in Charge, Poison Control, CHEMTREC, local hazardous materials response team, Department of Health and/or the military will be consulted.

Decontamination (decon) is to proceed as soon as possible, based on three considerations:

1. Whether a person or an article is contaminated;
2. The type and physical property of the contaminant (gas, liquid, or solid); and
3. The medical condition of the victim (triage).

In all cases, as much contamination as possible should be left in the Hot Zone. Priority must be given to the decontamination of persons. Generation of diluted contaminant (due to flushing or any other action) requires the capture and confinement of that material, whenever possible. In decontamination, time is of the essence, the longer that a person remains in contact with a hazardous material, the greater the absorption of the contaminant by that person. Quick decontamination of victim(s) is the goal of first responders. The most effective decontamination time is within 1 to 2 minutes after

exposure. The simple removal of the victims' clothing can effectively remove much of the contaminants.

All decontamination actions conducted by first responders will be carried out using the appropriate personal protection equipment (PPE) as determined by the senior Hazardous Materials Officer on-scene or by the appropriate Standard Operating Procedures (SOPs). ***In the event of gas or vapor contamination, the simple removal of the outer layer of clothing on the victim may be sufficient decontamination.*** If further, or more thorough, decontamination is necessary, it will be performed in the following three stages:

1. Gross decontamination involves the safe removal of the victim from the contaminated environment, complete removal of the victims' clothes, and a complete head to toe rinse with the appropriate solution (usually plain water or a combination of water and soap.)
2. Secondary decontamination involves more thorough washing of the victim in a head to toe fashion possibly using a decontamination solution, which is then followed by a complete rinsing.
3. Definitive decontamination is carried out by a series of washes and rinses until such time that it is certain that all contaminants have been removed from the victim. Definitive decontamination will usually take place at a medical facility.

First responding units arriving at a suspected terrorist attack will position their apparatus and equipment in an up-wind position and prepare to set up a drench decontamination corridor using on-board appliances and water supply, if necessary. If and when possible, first-in engine or aerial companies should connect to an appropriate hydrant and conduct a forward lay to provide a supply line to guarantee an uninterrupted water supply to adequately perform gross decontamination operations and anticipate the initial elements of a decontamination corridor. In the absence of a hydrant, a secondary source of water must be located, drafting operations should be considered, and the appropriate tanker apparatus should be deployed.

IV. TRIAGE OF CASUALTIES

Triage will be coordinated by the Medical Officer and may be highly specialized to the extent of the type of agent involved and its level/method of exposure in comparison to the victim's injuries. Otherwise, triage will be performed in accordance with the Simple Triage and Rapid Treatment (S.T.A.R.T) method. Most Florida fire/rescue/EMS departments have adopted this Mass Casualty Incident (MCI) triage method. Every local fire department should have START kits on their first response apparatus as part of their standard equipment inventory.

START is a tag system designed to assess a large number of victims rapidly and can be used by all personnel regardless of their medical training. The initial triage is accomplished by the assessment of respiratory rate, perfusion, and mental status. Triage ribbons/tags are used to identify the priority of the patients.

- **RED - First Priority** – Immediate
- **YELLOW - Second Priority** – Delayed
- **GREEN - Third Priority** – Ambulatory
- **BLACK - Deceased**

Secondary triage is performed on all patients during the treatment phase in the medical sector. During this phase patients can be up-graded or downgraded depending upon the dynamics of their injuries.

V. TREATMENT OF CASUALTIES

The reality of an incident of large proportions has shown that victims will leave the scene and either walk to or find a rapid transport to a medical facility--usually the facility closest to the incident site. The danger in this is that victims may be contaminated with an agent that could then contaminate other people, vehicles, and medical facilities that will, in turn, increase the number of casualties and overwhelm the facility. Emergency personnel on scene should plan to have a staging area for victims. Local medical facilities will be contacted as soon as possible for them to prepare an exterior triage and decontamination area to ensure the safety of their staff and facility. Medical and other personnel will be apprised of conditions that may develop over time in case patients develop complications later. Patients who exhibit suspect symptoms will be treated by established protocols.

VI. ISOLATION AND QUARANTINING OF THE INJURED AND EXPOSED

The criteria and procedures for isolating/quarantining the injured and other exposed people who cannot be safely extracted, pending arrival of appropriate assistance, should be addressed in the local fire/rescue department's procedure manuals. Usually the first arriving unit will perform the initial size-up. An approximation of the number of victims and MCI level will be announced. Special needs such as isolation or quarantining exposed victims will be determined at this point. Incident command and a staging area will be established.

Most fire department hazardous materials operating policies require that the area be isolated and entry denied to all personnel until the material(s) has/have been identified. Protective clothing and equipment necessary to operate safely in the affected area must be utilized. Decisions regarding long-term quarantining of the community for highly contagious biological agents will be made by Sarasota County Emergency Management in consultation with the County Health Department, State Health Department, and the Centers for Disease Control and Prevention (CDC).

VII. TRANSPORT OF VICTIMS

Victims should be decontaminated at the scene prior to transportation. Transportation of decontaminated patients to the appropriate facilities will follow the Standard Protocols for a Mass Casualty Incident. In-place, on-scene, temporary sheltering of victims may be deemed necessary while receiving facility resources are stabilized. Coordination with other County, State, and Federal resources will be conducted through the Florida Division of Emergency Management.

VIII. STOCKS OF AVAILABLE ANTIDOTES

To treat a large-scale contamination, three approaches should be taken:

1. The Regional Domestic Security Task Force has stockpiled antidotes available for distribution to field responders and local hospitals. Local hospitals may also be able to provide rescue trucks with antidotes, depending upon the antidote and required amount.
2. Second, additional supplies may be available from State and/or Federal sources, but these sources must be pre-identified and pre-planned prior to an incident. Additional antidotes may be available from surrounding Veterans Administration Medical Centers, Fire/Rescue Supply Bureaus, EMS supply bureaus, and local pharmaceutical distribution warehouses.
3. Finally, through activation of National Disaster Medical Services (NDMS), additional resources can be requested.

Appendix 5 to Annex G

Notification of Regional Domestic Security Task Force

When the City is affected by a suspected terrorist situation, the incident or unified command structure will request additional assistance from the County EOC. When the County EOC appears at risk of exhausting all local resources or determines local responders need additional resources, a request for additional assistance will be made through the County EOC to the State Warning Point in State EOC.

The State EOC will notify the ESF 16 emergency coordinating officer, the Florida Department of Law Enforcement (FDLE), who in turn will notify their Regional Operations Center(s) to notify the Regional Domestic Security Task Force (RDSTF) and to place them on alert.

The RDSTF's primary role in the response phase is to coordinate the use of the Domestic Security Response Teams. Its mission is to support the local incident command structure and not to assume command and control of the incident. However, if the County requests such command and control support, then the Task Force may coordinate the activation of a separate overhead Incident Command System team to handle this operation in coordination with the State EOC, these teams will be made up of emergency service personnel trained in the ICS positions needed to assume command and control operations.

Request for Assistance & Response:

Once the initial call for additional resources has been made, all requests for Domestic Security Response Team assistance will be coordinated with the Regional Domestic Security Task Force Coordinator through the County EOC. Initial requests for resources may be verbal as response conditions dictate, but must be followed with a written request utilizing forms contained in the State Comprehensive Emergency Management Plan for requesting mutual aid resources. The requesting jurisdiction will complete the forms, assuring that an explanation of the mission to which those resources will be assigned is included. The Regional Domestic Security Task Force Coordinator will facilitate the verbal or written request through the County EOC to the State EOC for processing. The Regional Domestic Security Task Force Coordinator, in consultation with the task force chair and/or co-chair and the State and County EOC, will determine the appropriate level of response by the Domestic Security Response Teams to the request. If determined that one or more of these teams are necessary, then the Regional Domestic Security Task Force Coordinator will activate other task force members to facilitate resource mobilization and deployment. The State EOC will provide the Regional Domestic Security Task Force Coordinator with the State Mission Number(s) through the County EOC.

The appropriate task force liaison will then notify the activated resources as soon as practicable and provide the resource supervisor (leader) with the following information regarding the mission:

- The State assigned mission number
- The location and directions of travel to the staging area at the scene of the incident
- The point of contact either at the incident scene or at the affected jurisdiction's EOC
- The cell phone number, radio frequency or telephone number where the point of contact can be reached
- A brief size-up of the incident that is being responded to
- The primary mission objective and any special instructions
- 24-hour contact numbers for the response liaisons to allow team supervisor the ability to submit daily situation reports and maintain any necessary emergency communications.

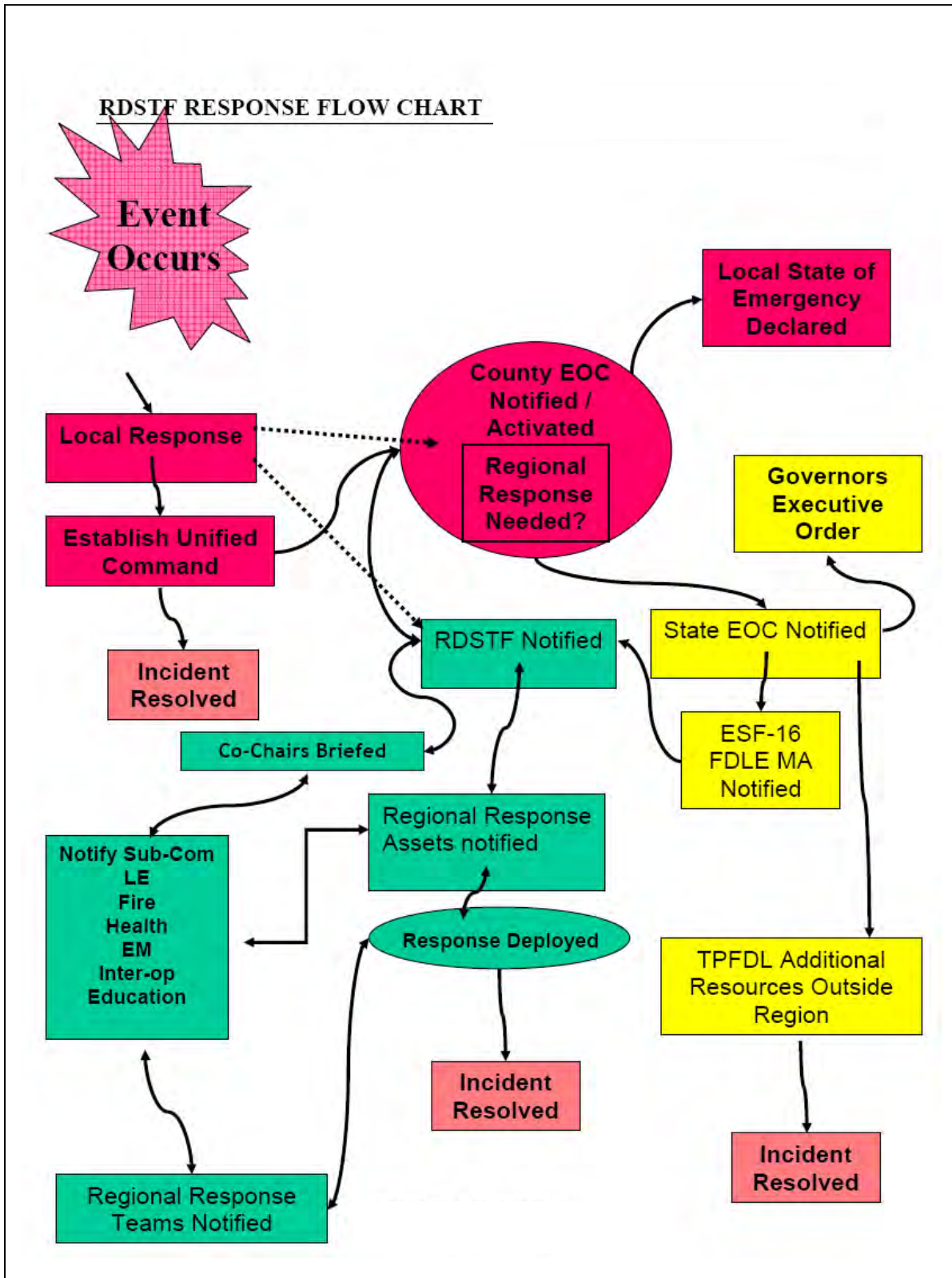
The Regional Domestic Security Task Force Coordinator or liaison will also furnish an approximate estimated time of arrival at the assigned staging area. This information will be sent to the affected County EOC and the State EOC. The Regional Domestic Security Task Force Coordinator will be responsible for tracking these resources within the region, using standardized forms for ordering resources and forms compliant with the state and Federal guidelines governing mutual aid.

Regional Response Template Quick Reference Guide

1. Event occurs in the County without warning; public safety response and unified command established.
2. County Emergency Operations Center (EOC) activated and notifies State Warning Point.
3. Unified Command requests additional resources from County EOC. (Local Mutual Aid exhausted)
4. County EOC responds with resources (declares local State of Emergency, if necessary).
5. County EOC evaluates need for State support, and makes request to State EOC if needed.
6. State EOC notifies ESF-16, FDLE notifies Regional Operations Center, Regional Director (RD) notifies RDSTF leadership team, RDSTF Team placed on stand-by/alert.

7. County EOC contacts RDSTF for a courtesy call Situation Report (SITREP).
8. Task Force (TF) Coordinator contacts local impacted county Emergency Management Director to establish communications and obtain current SITREP and immediate needs.
9. If the affected jurisdiction struggles to control the event and requests command and support, RDSTF will coordinate activation of separate overhead ICS team in coordination with State EOC through a request from the County EOC.
10. RDSTF will serve a regional coordinator role for the State Command and State EOC.
11. TF Coordinator notifies the following liaisons; Fire-Rescue Chair, EMS Chair, Law Enforcement Chair, Health/Medical Chair, SERT Liaison, PIO Chair, Education Chair, and Interoperability Chair. TF provides SITREP.
12. TF Coordinator in consultation with TF Chair/co-chair and State and County EOC, will determine which regional response teams to deploy based on requests received (as time allows, a written request utilizing the forms in State CEMP for requesting mutual aid is completed by requesting jurisdiction) and notify response teams to mobilize and deploy.
13. TF Coordinator to obtain a State Mission Number(s) from State EOC. Advise TF Liaisons with mission number and all details necessary for response to staging area. Response teams use TPFDL principles and concepts for deployment and response standards.
14. Coordination of out of Region resources will be conducted by TF Coordinator, State EOC, and TF Chair/Co-chair from the requesting and responding regions.
15. TF Liaison notify appropriate activated resources as soon as possible and provide resource supervisor (Team Leader) with necessary response information (mission number, location and direction travel, Point of Contact (POC) on scene or at County EOC, contact information for the POC, brief size-up of incident, primary mission objective and any special instructions, 24 hour contact numbers for the response liaisons for team supervisor to submit daily SITREPS and maintain necessary communications).
16. TF Coordinator provides approximate time of arrival of resources to staging area to County and State EOC.

17. TF Coordinator responsible for tracking resources within the region using standardized forms for ordering resources and forms compliant with State and Federal guidelines governing mutual aid agreements (TPFDL).
18. Unless otherwise specified, all regional task force resources deployed will respond to the affected jurisdiction within two hours. A deployment form will be provided to appropriate task force liaison that will provide information to the State EOC.
19. When RDSTF Response Team is deployed, the respective liaison will assure team supervisor (leader) maintains the following information until deployment is complete; appropriate ICS forms and SITREPS, contact lists, equipment/supplies inventory lists, expense activity forms.
20. Task force to determine if affected jurisdiction can maintain logistical support and service needs of activated teams. If additional logistical support is needed, RDSTF Coordinator will appoint forward liaison to serve as link between County EOC and State EOC.



ANNEX H

DAM FAILURE

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II. EXPLANATION OF TERMS

- A. Acronyms
- B. References

III. SITUATION AND ASSUMPTIONS

- A. Situation
- B. Assumptions

IV. METHOD OF OPERATIONS

- A. General
- B. Phases of Management

V. ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES

- A. Organization
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VI. ADMINISTRATION & SUPPORT

- A. Reports & Records
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- A. Responsibility
- B. Schedule for Annex Updating
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APPENDICES

Appendix 1 Inundation Maps

I. PURPOSE

To facilitate the evacuation of downstream residents or notification of the public in the event of an imminent or impending dam failure. City officials should be prepared for reacting to unlikely but potential failure conditions at the Peace River Reservoir #2. By pre-planning the coordination of actions by the Dam Owner, the Peace River Manasota Regional Water Supply Authority, and responsible emergency management officials, timely notification, warning and evacuation can occur which will save lives and minimize property damage.

II. EXPLANATION OF TERMS

A. Acronyms

1. EAP - Emergency Action Plan
2. FDEP - Florida Department of Environmental Protection
3. MSL - Mean Sea Level
4. PRMRWSA - Peace River Manasota Regional Water Supply Authority

B. References

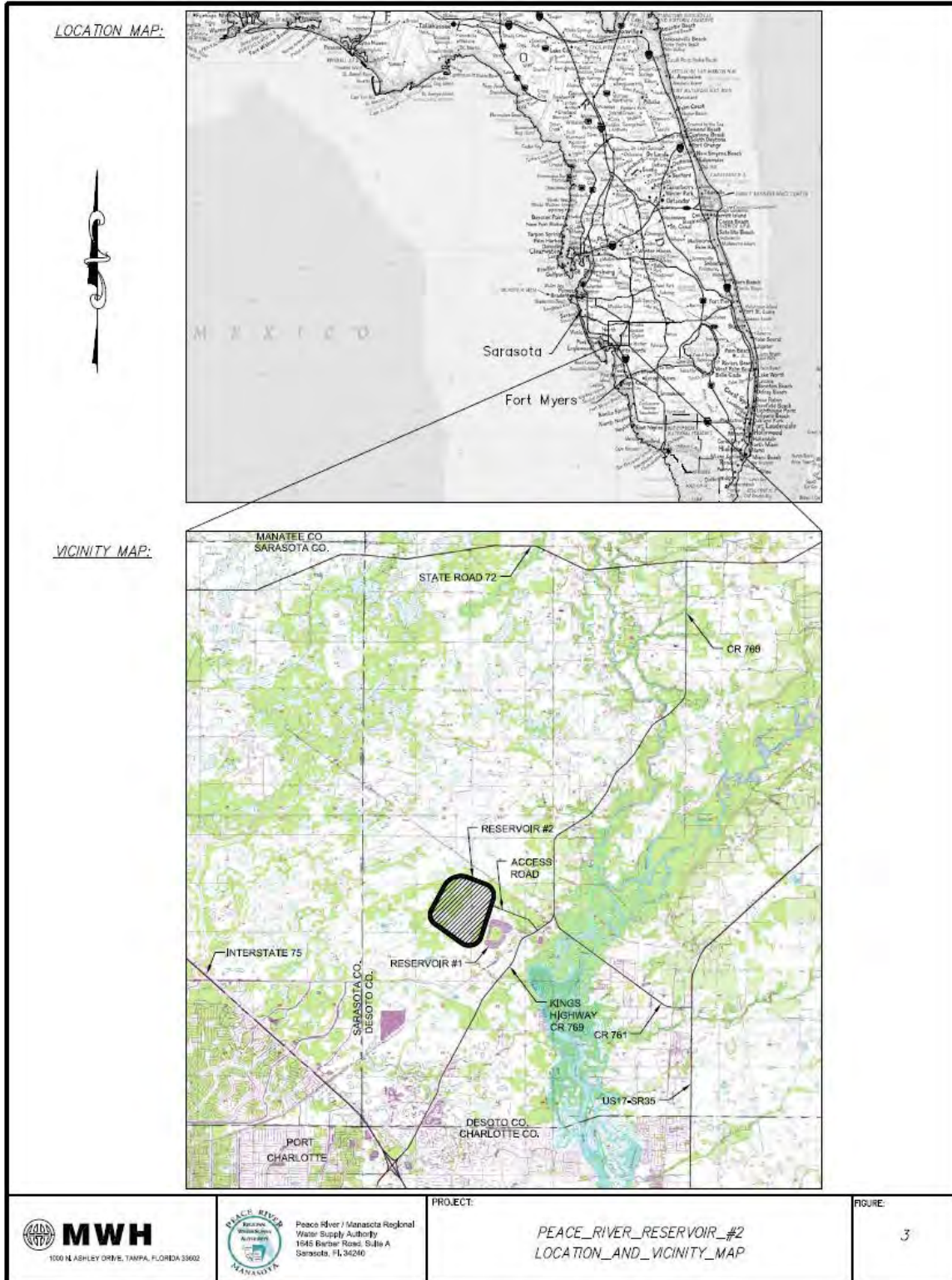
1. City of North Port Comprehensive Emergency Management Plan, Annex D - Flood Warning and Response
2. Peace River/Manasota Regional Water Supply Authority Reservoir, Emergency Action Plan (henceforth referred to as the EAP)

III. SITUATION AND ASSUMPTIONS

A. Situation

1. Location of Reservoir

Reservoir #2, can be accessed from the west by traveling approximately 6.5 miles northeast on Kings Highway (CR 769) from the I-75 interchange (Milepost 170) east of Port Charlotte, Florida; turn left (northwest) on a gated unpaved road that goes directly to the Reservoir #2 inlet structure. Keys for the lock on the gate are available from the Knox Box at the gate. Note that this road is in the inundation area, and may be flooded.



2. Description of Reservoir

Peace River Reservoir #2 is an off-stream, above-ground reservoir that provides 18,412 acre-feet (6-billion gallons) of normal operating raw water storage for water supply to the PRMRWSA. PRMRWSA's Reservoir #1 is primarily a below-grade reservoir with approximately 2,000 acre-feet (625 million gallons) of storage located east of Reservoir #2.

Reservoir #2 is located within R.V. Griffin Reserve, an area bounded by:

- An abandoned railroad grade to the north;
- Reservoir #1 to the east;
- An old railroad grade and a residential area to the south; and,
- Undeveloped platted land to the west.

Site access is from Kings Highway to a perimeter road at the exterior toe of the embankment. The site access road extends from an intersection at King's Highway near the main entrance to the water treatment plant following an alignment approximately 100 feet north of Reservoir #1. A control gate located at the main entrance will provide security for the project site. Additionally, a perimeter fence around the reservoir will be constructed to restrict access to non-authorized personnel.

Reservoir #2 is a mostly above-ground impoundment surrounded by an earthen embankment consisting of compacted fill with a geosynthetic membrane water retaining core. A soil-bentonite slurry (cutoff) wall is constructed to limit seepage underneath the embankment, and extends from the geosynthetic membrane to an underlying low permeability clayey soil layer. In addition, an internal drain is installed to intercept potential seepage through the embankment. A perimeter drain at the downstream toe of the embankment will collect and convey seepage, from the embankment and foundation, to seepage outlets located around the perimeter of the embankment.

The normal maximum operating water level in the reservoir will be approximately 26 feet above the natural ground level (or 61.8 feet above MSL). Water will be pumped into Reservoir #2 through a submerged inlet structure. Releases from Reservoir #2 will be controlled by a gated outlet structure with an overflow spillway to Reservoir #1. The raw water source is Peace River. Water is pumped from the River via the raw water pump

station, through two 48-inch pipelines, which connect to a 66-inch supply pipeline that discharges into Reservoir #2.

B. Assumptions

1. Dam breach analyses were performed for development of this EAP. Dam-breach studies are designed to evaluate a severe hypothetical failure of the dam under a range of assumed concurrent conditions. The evacuation areas shown on EAP Figure 2 reflect the specific failure assumptions considered in the dam breach analyses. The assumptions were selected to give a “worst-case” scenario of downstream flooding for a selected reservoir condition, which would be maximum reservoir water level, and an extreme wet-weather inflow condition and an overflow failure.
2. The Peace River Reservoir #2 (Reservoir #2) project area is relatively flat with no well-defined stream/river channel, and consists of a fully encircling embankment. With an approximately 4-mile long embankment, the location of a hypothetical breach could occur at any location along the embankment. Most dam breaches occur at penetrations through the embankment (e.g. filling or outlet pipes), or at foundation defects. Therefore, model simulations included dam breach modeling at six locations around the perimeter. Flood inundation modeling of the dam breach was performed for six different locations around the dam, and the Inundation Maps showing the assumed breach location and the maximum theoretical flood wave depth, are provided in Appendix 1. Two of the modeled breach locations consisted of the pipe penetrations (the inlet pipe and the outlet/spillway pipe) through the embankment.
3. Foundation defects that are unknown cannot be predicted. The four other breach locations were selected based on proximity to population areas and to provide coverage at each of the primary compass directions (North, NE, South, SE, West, and East). Since the location of a hypothetical breach cannot be predicted, a composite map of the results for the six breach locations, presenting the hypothetical extent of inundation is shown as an evacuation map on EAP Figure 2. The evacuation map illustrates the time of arrival for the leading edge of a dam breach flood wave, time to 1-foot flood depth. An actual failure of the dam could result in different downstream flooding. Therefore, this map should serve as a guide for warning and evacuation, but should not replace the judgment and local experience of emergency management officials.

IV. METHOD OF OPERATIONS

A. General

1. In general, any release from the Reservoir is a flooding event, and would be managed per City of North Port Comprehensive Emergency Management Plan, Annex B - Flood Warning and Response.

B. Phases of Detection

1. Step 1 Emergency Condition Detection - This step describes the detection of an unusual or emergency event. Information is provided herein to assist the Dam Owner in determining the appropriate emergency level for the event. Unusual or emergency events may be detected by:
 - a. Observations at or near the dam by PRMRWSA or other government personnel (local, state, or federal), landowners, visitors to the dam, or the public. All reports of an unusual or emergency event should be verified by the Dam Owner.
 - b. Evaluation of instrumentation data
 - c. Forewarning of conditions which may cause an unusual event or emergency event at the dam (for example, a severe weather or hurricane forecast)
 - d. Sinkholes in or near the embankment
2. Step 2 Emergency Level Determination - After an unusual or emergency event is detected and verified, the EAP Officer is responsible for classifying the event into one of the following three levels:
 - a. Emergency Level I - Urgent; dam failure is imminent or in progress:
 - i. This is an extremely urgent situation when a dam failure is occurring or obviously is about to occur and cannot be prevented. Flooding will occur downstream of the dam. The appropriate Emergency Operations Center(s) should be contacted immediately so emergency services can begin evacuations of all at-risk people and close roads as needed.

ii. Examples of Emergency Level 1 Events:

- Rapid flow rate increase with cloudy discharge from existing seepage area(s) near the dam
- Rapid flow rate increase with cloudy seepage or evidence of significant, active, and continuing material movement from the drain system outfall(s)
- Sudden or rapidly progressing slides of the embankment slopes
- Overtopping flow not eroding the embankment slope; reservoir level expected to rise
- Overtopping flow eroding the embankment slope
- Detonated bomb that has resulted in damage to the dam or appurtenances
- Damage to dam or appurtenances that has resulted in uncontrolled water release
- Earthquake resulting in uncontrolled release of water from the dam

b. Emergency Level II - Potential dam failure situation, rapidly developing:

- i. This situation may eventually lead to dam failure and flash flooding downstream, but there is not an immediate threat of dam failure. The appropriate Emergency Operations Center(s) should be notified of this emergency and placed on alert. The Dam Owner should closely monitor the condition of the dam and periodically report the status of the situation to the Emergency Operations Center(s) and FDEP Dam Safety Engineer.

- ii. If the dam condition worsens and failure becomes imminent, the appropriate Emergency Operations Center(s) must be notified immediately of the change in the emergency level to evacuate the people at risk downstream.
- iii. The Owner's Engineer of Record for the dam and the FDEP Dam Safety Engineer should be contacted to evaluate the situation and recommend remedial actions to prevent failure of the dam. The Dam Owner should initiate remedial repairs (note local resources that may be available – See EAP Appendix C-5). Time available to employ remedial actions may be hours or days.
- iv. This emergency level is also applicable when discharge from the outlet-works/spillway has, or is expected to result in flooding of downstream areas where people near the channel could be endangered. Emergency services should be on alert to initiate evacuations or road closures if the flooding increases.
- v. Examples of Emergency Level 2 Events:
 - The reservoir level has reached El. 67.0 and is experiencing high winds.
 - New seepage areas with cloudy discharge or increasing flow rate
 - Rapidly enlarging sinkhole
 - Cracks in the embankment with seepage
 - Un-verified bomb threat that, if carried out, could result in damage to the dam
 - Damage to dam or appurtenances that has resulted in seepage flow
 - Earthquake resulting in visible damage to the dam or appurtenances

- c. Level III - Monitoring; Operation & Maintenance Condition; Non-emergency incident; unusual event; slowly developing situation:
- i. This situation is not normal but has not yet threatened the operation or structural integrity of the dam, but possibly could if it continues to develop, and/or a general state of monitoring exists during the hurricane season.
 - ii. The condition of the dam should be closely monitored, especially during storm events, to detect any development of a potential or imminent dam failure situation. The appropriate Emergency Operations Center(s) should be informed if it is determined that the conditions may possibly develop into a more serious condition that may require emergency actions.
 - iii. Examples of Level III Events:
 - A hurricane is expected to make landfall near the project site
 - New wet spots on the face of the dam, and the toe of the dam
 - New soft spots on the face of the dam
 - New seepage areas in or near the dam
 - Observation of new sinkhole in reservoir area or on embankment
 - Erosion gully in embankment slope of 3 feet or deeper below grade.
 - New cracks in the embankment greater than 1-inch wide without seepage
 - Visual movement/slippage of the embankment slope

- Instrumentation readings beyond predetermined values
- Damage to dam or appurtenances with no impacts to the functioning of the dam
- Modification to the dam or appurtenances that could adversely impact the functioning of the dam
- Measurable earthquake felt or reported on or within 50 miles of the dam

3. Step 3 Notification and Communication Notification:

After the emergency level has been determined, people on the notification flowcharts (See EAP Page 2) shall be notified immediately.

a. Emergency Level I - Urgent; dam failure is imminent or in progress:

- i. The EAP Officer should immediately contact the appropriate Emergency Operations Center(s) and communicate that dam failure is imminent or in progress and the potentially flooded area must be evacuated (see Page 2). The following actions should be taken:

- Call the Emergency Operations Center and use the following message to describe the situation:

“This is an emergency. This is (identify yourself; name, position). Peace River Reservoir #2, located on Kings Highway, is failing. The failure is occurring at the (North, NE, South, West, East) portion of the reservoir. All potential inundation area residents must be evacuated immediately. Repeat, Peace River Reservoir #2 is failing; evacuate inundation area residents immediately. This is not a test.

We have activated the Emergency Action Plan for this reservoir and are currently under Emergency Level I. Reference the inundation map in your copy of this Emergency Action Plan.

I can be contacted at the following number _____ . If you cannot reach me, please call the following alternative number _____ .”

- Do whatever is necessary to bring people in immediate danger to safety (anyone on the dam, or within the inundation area). See EAP Appendix A and Appendix B.
 - Keep in frequent contact with the Emergency Operations Center(s) to keep them up-to- date on the condition of the dam. They will tell you how you can help handle the emergency.
 - If all means of communication are lost and can't quickly be re-established: (1) try to get to another radio or telephone that works, or (2) Send a PRMRWSA representative to the DeSoto County Fire Station 2 on Highway 761 near Kings Highway to summon help and re-establish communications. If these means fail, handle the immediate problems as well as you can, and periodically try to reestablish contact with the EAP Officer and emergency services.
- ii. The following pre-scripted message may be used as a guide for the Emergency Operations Center staff to communicate the status of the emergency with the public:

“Attention: This is an emergency message from (Your Name and Title). Listen carefully. Your life may depend on immediate action.

Peace River Reservoir #2 located along Kings Highway is failing. Repeat. Peace River Reservoir #2 is failing. Serious flooding will result. If you are in or near this area, evacuate immediately. Do not travel on (names of roads or highways) or return to your home to recover your possessions. You cannot outrun or drive away from the flood wave. Evacuate immediately.”

Repeat message.

b. Emergency Level II - Potential dam failure situation; rapidly developing:

i. Any PRMRWSA employee observing a potential situation, or receiving word of such must contact the EAP Officer immediately and describe the situation. If the EAP Officer cannot be reached the following designees, in order of responsibility, shall assume all responsibilities of the EAP Officer:

- PRMRWSA Environmental Affairs Coordinator
- PRMRWSA Water Resources Director

ii. The EAP Officer, or their designee, will contact the Dam Owner's Engineer of Record the appropriate Emergency Operations Center(s) and the FDEP Dam Safety Officer, describe the situation, and request technical assistance on the next steps that should be taken. The following message may be used to help describe the emergency situation to the emergency management personnel:

"This is (identify yourself; name, position). We have an emergency condition at Peace River Reservoir #2, located along Kings Highway. We have activated the Emergency Action Plan for this dam and are currently under Emergency Level 2.

We are implementing predetermined actions to respond to a rapidly developing situation occurring at the reservoir. Please prepare to evacuate the inundation area.

Reference the inundation maps in your copy of the Emergency Action Plan.

We will advise when this situation is resolved or if the situation gets worse.

I can be contacted at the following number _____. If you cannot reach me, please call the following alternative number _____."

- c. Level III - Monitoring; Operation & Maintenance Condition; Non-emergency incident; unusual event; slowly developing situation:

The following actions should be taken:

1. The Dam Owner shall identify the situation.
2. The Dam Owner should contact the Dam Owner's Engineer of Record, describe the situation, and request technical assistance on appropriate steps that should be taken.
3. The Dam Owner should notify FDEP Dam Safety Officer of the situation.

V. ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES

A. Organization

B. Assignment of Responsibilities

1. Peace River Manasota Regional Water Supply Authority - Dam Owner
 - a. Daily monitoring and management of Reservoir # 2.
 - b. Respond to observed or reported conditions, incidents, or unusual events to detect if an existing or potential emergency exists (See Step 1 - Event Detection, above).
 - c. When an emergency event is detected immediately contact the EAP Officer.
 - d. Immediately notify the personnel in the order shown on the notification flow chart for the appropriate emergency level.
2. Peace River Manasota Regional Water Supply Authority - Emergency Action Plan Officer(s)
 - a. Serve as the primary contact person responsible for coordination of all emergency actions.
 - b. When an emergency event is detected, immediately determine the emergency level (see Step 2 - Emergency Level Determination, above).

- i. Emergency Level I: Urgent; Dam failure is imminent or in progress
 - ii. Emergency Level II: Potential dam failure situation; Rapidly developing
 - iii. Level III: Monitoring; Operation & Maintenance; Non-emergency incident Unusual event; Slowly developing situation
 - c. During Level III conditions
 - i. Monitor conditions
 - ii. Arrange repairs as needed
 - d. Immediately notify the personnel in the order shown on the notification flow chart for the appropriate emergency level.
 - e. Respond to specific requests from the Emergency Operation Center(s) to help minimize the impacts of an emergency event.
 - f. Provide updates of the situation to the Emergency Operations Center(s) to assist them in making timely and accurate decisions regarding warnings and evacuations.
 - g. Provide leadership to assure the EAP is reviewed, understood, and updated annually and copies of the revised EAP are distributed to all who received copies of the original EAP.
 - h. Facilitate exercise of the EAP as necessary to ensure the effectiveness of the EAP and emergency response.
 - i. Participate in annual review and update of the EAP.
- 3. City of North Port
 - a. Emergency Management
 - i. Maintain communication with media.
 - ii. When an Emergency Level I situation occurs:

- Initiate warnings and order evacuation of people at risk downstream of the dam.
 - Carry out the evacuation of people and close roads within the evacuation area (See Appendix A for Inundation Maps).
 - Alert the public of the emergency.
- iii. When an Emergency Level II situation occurs:
- Prepare emergency management personnel for possible evacuations that may be needed if an Emergency Level I situation occurs.

VI. ADMINISTRATION & SUPPORT

A. Reports and Records

1. Situation Report. During emergency operations, a daily situation report should be prepared and distributed to the County EOC.
2. Records Relating to Emergency Operations

See Base Plan.

B. Preservation of Records

If government records are damaged during the incident response, the EOC should be promptly advised so that timely professional assistance can be sought to preserve and restore them.

C. Post-Incident Review

See Base Plan.

VII. ANNEX DEVELOPMENT & MAINTENANCE

A. Responsibility

The Dam Owner is responsible for review and update of their emergency response plan on an annual basis. North Port Emergency Management will be the Plan-holder for the City and will participate in plan review and exercises.

B. Schedule for Annex Updating

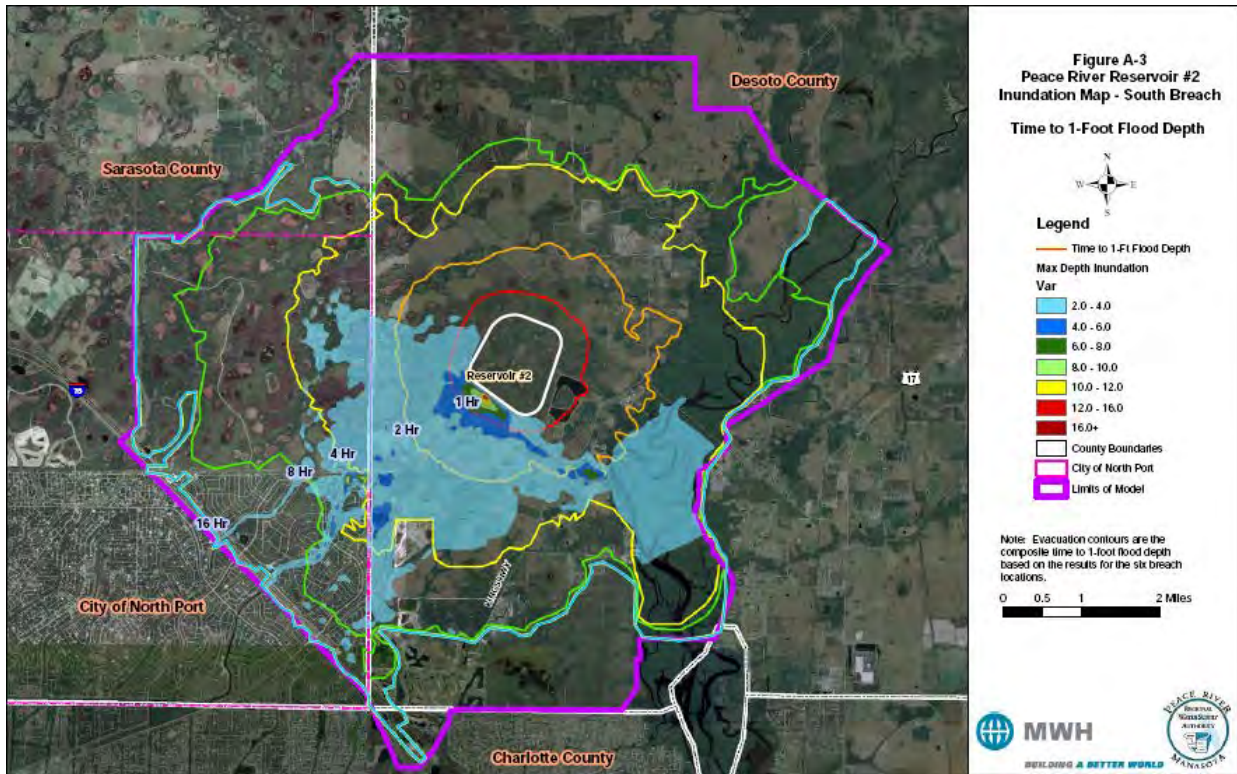
This annex will be maintained in accordance with the following schedule:

1. The annex will be updated with each updating of the City's Comprehensive Emergency Management Plan.
2. The annex will be reviewed after each exercise and/or actual response to a dam-related emergency event and modified as necessary.
3. The annex will be reviewed and revised, if needed, after each of the following types of events:
 - a. A major change in applicable Federal or State laws, regulations, or policies,
 - b. The findings of ongoing vulnerability and needs assessments in Florida, and
 - c. Major advances in applicable response technology and/or operational concepts

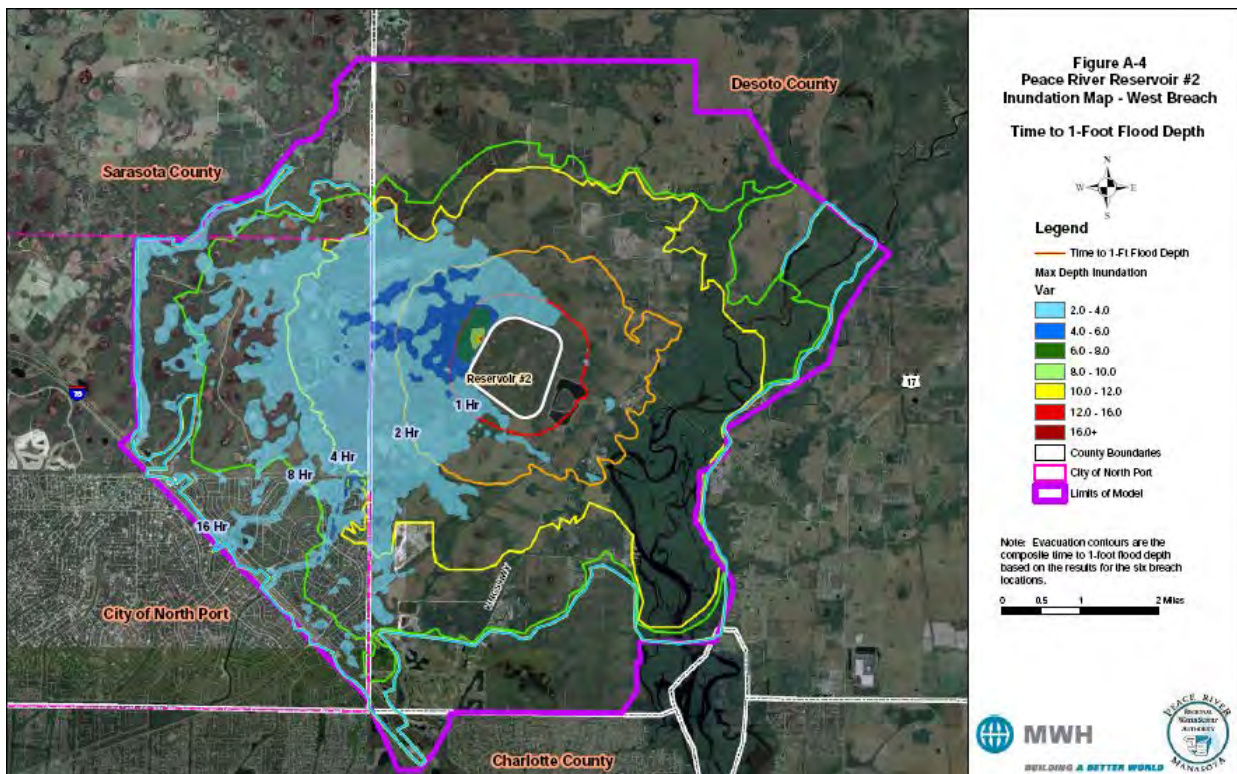
C. Security Considerations - General Exemptions from Public Inspection

Certain security procedures and plans developed resulting from this Annex to the City of North Port Comprehensive Emergency Management Plan may be exempt from public inspection under Florida Statutes Chapter 119.

Inundation Map - South Breach



Inundation Map - West Breach



ANNEX I

COLD WEATHER EMERGENCY SHELTERING

I. **PURPOSE**

II. **DEFINITIONS**

III. **SITUATION AND ASSUMPTIONS**

- A. Situation
- B. Assumptions

IV. **METHOD OF OPERATIONS**

- A. General
- B. Phases of Management

V. **ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES**

- A. Organization
- B. Assignment of Responsibilities

VI. **ADMINISTRATION & SUPPORT**

- A. Reports & Records
- B. Post-Incident Review

VII. **ANNEX DEVELOPMENT & MAINTENANCE**

- A. Responsibility
- B. Schedule for Annex Updating

I. PURPOSE

This document outlines measures for the City of North Port and its community partners to coordinate public and private resources when outside temperatures pose an immediate danger to the life and health of unsheltered people, especially families and those living with medical or mental health conditions that render them more vulnerable in inclement weather.

Experiences in other communities demonstrate that it is best for a group of community members and organizations to lead and organize – hosted at a non-governmental facility. The City of North Port is prepared to help in ways it can (e.g., inspections in a timely manner, etc.), but it will take the community to create and implement a cold weather shelter.

While the objective of the Plan is to safeguard the lives of vulnerable homeless families and individuals by providing temporary shelter during inclement weather conditions that pose a threat to those living without adequate shelter, all applicable City and State health and safety codes and regulations remain in effect and must be followed. The Plan allows some exemptions from zoning regulations, but not health and safety codes and regulations.

II. DEFINITIONS

- A. Freeze Watch is issued when there is a potential for significant, widespread freezing temperatures within the next 24-36 hours.
- B. Freeze Warning is issued when significant, widespread freezing temperatures are expected.
- C. Frost Advisory is issued when the minimum temperature is forecast to be 33° to 36° F on clear and calm nights during the growing season.
- D. Wind Chill Advisory is issued when wind chills of -5° F to -19° F are expected.
- E. Wind Chill Warning is issued when wind chills of -20° F or lower are expected.

III. SITUATION AND ASSUMPTIONS

- A. Situation
 - 1. Although infrequent, Sarasota County does experience freezing and near-freezing weather during wintertime. Since 1956, per the National Weather Service Tampa Bay Office, the area has seen an annual average of 4.7 days with minimum temperature equal to or below 32° F.

2. There exists a population of homeless persons in North Port. Some may be transients, whereas others may be residents of the City who have been displaced from their home. Community members who serve meals responded to this question, indicating that persons who are homeless are spread out over the 104 square miles of the City. There is an established network among persons in the community who are homeless, and they can get out the word quickly.
 3. Sarasota County Emergency Management is responsible for “Risk Shelters,” which include hurricanes. Local government (cities and counties) traditionally do not operate cold weather shelters.
 4. The Salvation Army expands services for the homeless during cold weather emergencies. The shelters in the City of Sarasota and Port Charlotte open earlier and admit non-traditional clients.
 5. Churches in North Port, Englewood, and Venice have operated cold weather shelters but they are subject to change.
 - a. Englewood – St. David’s
 - b. Venice – Center of Hope
 - c. North Port- New Hope
- B. Assumptions
1. Any facility that develops a shelter agreement with Red Cross, including their training, will be covered under their liability.
 2. Red Cross can provide the training and some of the equipment.

IV. METHOD OF OPERATIONS

- A. General
1. When the outside temperature reaches 40° F (freeze watch advisory) or below (by ambient or wind-chill measure) as measured the National Weather Service, churches located within or adjacent to the City of North Port may act as temporary cold weather shelters. The Plan is in effect until the outside temperature reaches 33° F or above.
 - a. Hours of operation are from 6:00 p.m. to 7:00 a.m.; however, that is at the facility’s discretion.

2. While initiation of The Plan may exempt designated churches from certain zoning regulations:
 - a. Facilities must be surveyed by the Red Cross.
 - b. The facilities must be inspected by North Port Fire Rescue for a change in occupancy type.
 - c. Volunteers and paid staff must be adequately trained (as determined by the Red Cross).
 - d. The plan and protocols for churches shall include provisions limiting use of their facilities as a temporary cold weather shelter for homeless families and individuals who are not under the influence of alcohol or controlled substances not prescribed to the individual.
 - e. The facilities must meet any additional requirements deemed necessary by the City.
3. While official notification from the City is not necessary to initiate the plan, the Emergency Management Coordinator will develop and maintain a contact list for those City Departments and Community Partners affected by initiation of The Plan. This process has been employed so City Departments and Community Partners can coordinate their efforts.

C. Phases of Management

1. Preparation (*prior to weather event*)
 - a. The City will engage the faith-based and community organizations to participate in the providing of temporary shelter services. An orientation will be delivered to participating shelter provider organization on the Severe Weather Shelter Response Plan. The shelter will provide site location, contact information, shelter capacity, hours of intake, shelter amenities, and population to be sheltered (e.g. – singles, families with children). The Service Provider Organization Directory will be updated.
 - b. The Shelter shall contact North Port Emergency Management requesting to be added to the email distribution of the National Weather Service forecast updates. Shelter provider organization will provide an email address to receive the National Weather Service forecast and will monitor the weather for activation.

- c. North Port Emergency Management will add the shelter contact information to the email distribution.
 - d. Prior to use, a facility to be approved:
 - i. Survey – basic information on site and conformity to standards.
2. Response (*during weather event*):
- a. The shelter provider organization will review North Port Emergency Management weather updates received via email, the National Weather Service Forecast Office, and/or weather updates available on local TV/Radio broadcasts. Shelters will determine when their facility will open to provide shelter services to the homeless.
 - b. The shelter provider organization, upon determination to open as a shelter, shall conduct a review of the site checklist with a facility representative.
 - c. The shelter provider organization(s) forwards a copy of their facility information via email (preferred) to the volunteer program coordinator.
 - d. The volunteer program coordinator shall retransmit the information to the Sarasota County Call Center.
 - e. Sarasota County Call Center manager will distribute shelter information to staff and post on the SCGOV.net website.
 - f. Program Coordinator will compile a list of shelter sites with amenities and distribute the information to:
 - i. Sarasota County and North Port non-emergency dispatch for relay to law enforcement and fire/EMS agencies in the County/City.
 - The North Port Police Department should be notified if an inebriated individual requests shelter in a designated temporary cold weather shelter located in a church.
 - ii. Shelter provider organizations.

- iii. Sarasota County and City of North Port Emergency Management.
 - f. Feeding would be provided by the shelter provider organization.
- 3. Deactivation (*following weather event*):
 - a. The shelter provider organization monitors weather updates and determines when to terminate shelter services (list date and time of closure) and forward via email (preferred) to the volunteer program coordinator.
 - b. The volunteer program coordinator shall retransmit the information to the Sarasota County Call Center.
 - c. Sarasota County Call Center Manager will advise Call Center staff that the shelter is closing and remove data from the website.
 - d. The volunteer program coordinator will update list of shelters to reflect deactivation and distributes information to:
 - i. Sarasota County and North Port non-emergency dispatch for relay to law enforcement and fire/EMS agencies in the county.
 - ii. Shelter provider organizations.
 - iii. Sarasota County and City North Port Emergency Management.
 - d. The shelter provider organization, upon determination to close, shall conduct a re-review of the site checklist with a facility representative.

V. ORGANIZATION AND ASSIGNMENT OF RESPONSIBILITIES

- A. Organization
 - 1. See City's Base Plan.
- B. Assignment of Responsibilities
 - 1. Emergency Management – alerts Red Cross and community as to cold weather warning, or incident requiring an open shelter.

2. North Port Police – As resources are available, can transport individuals to cold weather shelter in North Port and surrounding communities.
2. Red Cross – Red Cross helps establish temporary emergency shelters, which are used for events, such as cold weather and fire evacuation, and “post” shelters which are used to help after an event such as a hurricane. Training of volunteers (become a Red Cross volunteer), shelter survey and agreement.
3. North Port Community Health Action Team (CHAT) -- Maintain schedule of church availability.
4. Facility
 - a. It is up to facility if they store cots
 - b. Work with volunteer coordinator to staff
5. Volunteers
 - a. Identify Volunteer Program Coordinator
 - b. Create Contact List
 - c. Receive Red Cross Training and volunteer status

VI. ADMINISTRATION & SUPPORT

- A. Reports & Records
 1. Shelter providing organizations shall transmit shelter counts to the volunteer program coordinator who should then prepare a report for transmission to City and County Emergency.
 2. Records of facility use (e.g., agreements, inspections, counts, etc.) shall be provided to the volunteer program coordinator by each shelter. Records will be maintained for a minimum of one year.
- B. Post-Incident Review
 1. An after-action report should be prepared by the volunteer program coordinator after each exercise and/or actual response to a cold weather event.

VII. ANNEX DEVELOPMENT & MAINTENANCE

A. Responsibility

Each agency identified in this Annex will develop Standard Operating Guidelines that address assigned tasks. North Port Emergency Management is responsible for reviewing and updating this annex as necessary.

B. Schedule for Annex Updating

This annex will be maintained in accordance with the following schedule:

1. The annex will be updated with each revision of the City's Comprehensive Emergency Management Plan.
2. The annex will be reviewed after each exercise and/or actual response to a cold weather event, and modified as necessary.
3. The annex will be reviewed and revised, if needed, after each of the following types of events:
 - a. A major change in applicable Federal or State laws, regulations, or policies,
 - b. The findings of ongoing vulnerability and needs assessments in North Port and Sarasota County.

ANNEX J

HAZARDOUS WEATHER RESPONSE

I. INTRODUCTION

- A. General
- B. Scope and Purpose
- C. Assumptions

II. RESPONSE ORGANIZATION

- A. General
- B. Responsibilities

III. METHOD OF OPERATION

- A. General
- B. Extreme Cold/Freeze
- C. Thunderstorm/Lightning/Tornado
- D. Drought
- E. Tropical Storm/Hurricane

IV. REIMBURSEMENT

V. TRAINING AND EXERCISES

I. Introduction

- A. General: This Annex establishes a framework through which the City of North Port (“City”) may prevent or mitigate the impacts of, prepare for, respond to, and recover from non-flooding/tropical conditions that could adversely affect the health, safety, and general welfare of City residents and guests. This Annex details each weather hazard that can affect the City and our response from the level of Emergency Operations Center activation perspective.
- B. Purpose & Scope
 - 1. The purpose of this Annex is to describe the unique response/recovery procedures for hazardous weather events. This Annex describes the most frequent weather phenomena that can affect the City.
 - 2. The weather hazards addressed in this Annex are:
 - a. Extreme Cold/Freeze.
 - b. Thunderstorm/Lightning/Tornado.
 - c. Drought.
 - d. Tropical Storm/Hurricane. (See Annex K, Tropical Cyclone Response, for greater detail.)
- C. Assumptions
 - 1. The City will usually receive advanced warning about the onset of hazardous weather conditions but not necessarily the severity or impact location. When hazardous weather information from the National Weather Service or the Florida Division of Emergency Management is received by the Emergency Management Department, it will be transmitted to Weather Spotters, critical facilities, and other governmental agencies.
 - 2. The Emergency Operations Center (“EOC”) will not be activated pre-event for most hazardous weather conditions, except for Tropical Storms & Hurricanes.

II. The Response Organization

- A. General: Most responses to weather events will be by on-duty forces. The response to a hazardous weather event will depend on reports from the public

and governmental entities. For major hazardous weather events, the response organization will be as described in the Base Plan, with the Emergency Management Division serving as Lead Agency for pre-event activities and Neighborhood Development Services leading post-disaster recovery activities.

B. Responsibilities

1. As the situation warrants, the Emergency Management Division will:
 - a. Be the Lead Agency responsible for this Annex as well as all pre-event hazardous weather activities;
 - b. Monitor the weather and activate the warning system(s) described in the Base Plan;
 - c. Contact Sarasota County Emergency Management regarding shelter openings;
 - d. Activate the EOC;
 - e. Request the activation of the City Call Center; and
 - f. Request the City Manager declare a State of Local Emergency pursuant to F.S. 252.38(3)(a)(5).
2. Should a disaster occur, Neighborhood Development Services will be Lead Agency for damage/impact assessment and Recovery Operations.
3. The Department of Public Works will close roads and barricade as necessary.
4. The North Port Police Department will assist with evacuation and transportation operations.
5. Emergency Services (Police & Fire) will provide damage/impact assessment.
6. Local Response: In addition to on-duty forces, specialized teams may be needed to assist in the response, such as: CERT, City volunteers, and Skywarn Spotters.

III. Method of Operation

- A. General: When the EOC is activated, the Response Organization will be organized and operate under the Incident Command System as outlined in the Base Plan. This section will address unique activities corresponding to a specific hazardous weather event.
- B. Extreme Cold/Freeze: Extreme cold and freezes are relatively infrequent events in the City. The main threats from these events are to the lives/health of people with insufficient shelter. This part of the plan is implemented when temperatures are expected to drop below 40 degrees, including wind chill, for at least two hours. There is no EOC activation anticipated. Additional information on this type of event is contained in Annex I – Cold Weather.
1. Level Three, Monitoring Phase.
 2. The Emergency Management Division will monitor weather conditions, coordinate the opening of homeless shelters, and disseminate the opening of shelter information to the media and the public.
- C. Thunderstorm/Lightning/Tornado: Severe thunderstorms, which have lightning and the potential for tornadoes, are frequent in the City during the summer and fall months. The EOC is not likely to be activated beyond a Level Three, unless an EF-1 tornado, or greater, occurs somewhere in the City resulting in loss of life and/or property; in which case the EOC will be in a post-disaster type operation. The main activity for City government is to maintain contact with the Weather Service Office and disseminate weather warnings/updates via communication systems as addressed in the Base Plan.
1. Level Three, Monitoring Phase. The Emergency Management Division will monitor the storm system's potential and disseminate the information to those most affected via means identified in the Base Plan.
 2. Level Two, Partial Activation.
 - a. The Emergency Management Division will:
 - (1) Activate the City Call Center based on the impact of the event;
 - (2) Provide on-going situation reporting to the County;

- (3) Maintain contact with the Weather Service and disseminate weather updates and other information to the media and public; and
 - (4) Request shelter openings as needed.
 - b. Neighborhood Development Services will:
 - (1) Provide a liaison to the EOC post-disaster impact; and
 - (2) Assume Lead Agency responsibilities for damage assessment and Recovery Operations.
 - c. North Port Police Department will:
 - (1) Provide a liaison to the EOC as requested; and
 - (2) Coordinate traffic activities
 - d. The Public Information Officer will activate the Crisis Communication Plan in the EOC upon the Incident Commander's request.
 3. Level One, Full Activation. This level of activation would occur if a catastrophic F-3 tornado, or greater, impacted lives and property within the City. Should this, occur, all actions described in the Base Plan will occur.
- D. Drought: The main hazard with drought is the extreme reduction of the water level in wells. In these situations, well services are usually so far behind in drilling new wells that governmental intervention is needed to keep people in their homes. An associated hazard with drought is the possibility of sinkholes. No EOC activation is anticipated.
1. Level Three, Monitoring Phase.
 - a. The Emergency Management Division will:
 - (1) Monitor activities related to the drought, participate in conference calls with the County, and closely coordinate remedial activities such as water rationing information dissemination to the public.

- c. The Emergency Management Division will:
 - (1) Recommend the City Manager declare a State of Local Emergency in order to take prudent action as necessary to ensure the health, safety, and welfare of the community;
 - (2) Disseminate warning information and situation reporting to the media and the public;
 - (3) Determine and coordinate area evacuation operations; and
 - (4) Coordinate recovery operations with the County.
- d. The North Port Police Department will:
 - (1) Support shelter operations security; and
 - (2) Assist with evacuation operations, including denying reentry to evacuation area(s).

IV. Reimbursement and Finance

As stipulated in the Base Plan.

V. Training and Exercises

- A. General: Training to support hazardous weather operations is on-going and recurring. The State of Florida and FEMA provide a variety of training courses, as well as Independent Study Courses, at no expense to the individual. The Emergency Management Division can develop a tailored training program for any agency desiring the service.
- B. Training Program Development & Implementation: The Base Plan provides a chart outlining the recommended training. Other/new training offerings will be disseminated via the Emergency Management Division to all City departments.
- C. Training Exercise: The City participates in the State of Florida's Annual Hurricane Exercise conducted in the spring. City departments are encouraged to conduct their own tabletop exercises, especially when procedures and/or equipment change.

ANNEX K

TROPICAL CYCLONE RESPONSE

EXECUTIVE SUMMARY

I. INTRODUCTION

- A. General
- B. Scope and Purpose
- C. Assumptions

II. RESPONSE ORGANIZATION

- A. General
- B. Response Organization
- C. Responsibilities

III. METHOD OF OPERATION

- A. General
- B. Level 3, Monitoring Phase
- C. Level 2, Partial Activation
- D. Level 1, Full Activation
- E. Resources

IV. PUBLIC INFORMATION and INFORMATION FLOW

V. REIMBURSEMENT

VI. TRAINING AND EXERCISES

EXECUTIVE SUMMARY

This Annex addresses the role of local government in providing the necessary support to the City of North Port (“City”) in its responsibilities in responding to and recovering from the effects of a hurricane or tropical cyclone event.

The City’s Emergency Management Division has the overall responsibility to update and coordinate this Annex with other response and support agencies. The Annex is a living document, being reviewed and updated at least annually and at the end of each hurricane or tropical cyclone exercise or event. It is presently divided into the following four Sections:

Section I – Introduction: Provides the purpose, scope, and planning assumptions used to prepare the Annex.

Section II – The Response Organization: Identifies the various levels of support that may be provided through the Emergency Operations Center (“EOC”) structure. It describes the circumstances under which the various agencies will unify under a single command structure in preparing for, responding to, recovering from, and mitigating the effects of a hurricane by the components of governmental agencies. This Section also addresses the delegation of authority during a hurricane or tropical cyclone event.

Section III – The Concept of Operation: Presents the guidelines that will be used to make key decisions during a hurricane or tropical cyclone event, as well as Pre- and Post-Disaster Operations and Activities.

Section IV – Public Information and Information Flow: Provides the information, notification, and warning process for hurricane and tropical cyclone activities to the public, governmental agencies, and Sarasota County.

Section V – Reimbursement: Identifies how the City shall recover funds expended during a Presidentially-declared disaster.

Section VI – Exercises and Training: Identifies how City personnel shall prepare for hurricanes and tropical cyclone events.

I. INTRODUCTION

- A. General: This Annex identifies the actions that may be taken by the governmental agencies within the City while preparing for, responding to, and recovering from a hurricane or tropical cyclone event.
- B. Purpose: The City's Emergency Management Division has the overall responsibility for coordination of support in response to a hurricane or tropical cyclone event in the City. The Emergency Management Division will update and coordinate with other response and support agencies.
- C. Scope: This Annex addresses hurricanes and tropical cyclone events that affect the City. The purpose of the response is to protect lives, property, and mitigate the effects of the storm/event.
- D. Assumptions:
 - 1. The City Manager is responsible for preparing for, responding to, and recovering from the damaging effects a hurricane or tropical cyclone event has on the residents of the City following the declaration of a State of Local Emergency pursuant to F.S. 252.38(3)(a)(5).
 - 2. Once under a Declaration , the Sarasota County Emergency Management will order evacuations as necessary to protect the public.
 - 3. The City's resources will be overwhelmed by the direct hit of any category of hurricane or tropical cyclone event and will require mutual aid, State, and Federal assistance to recover from the effects of the disaster.

II. RESPONSE ORGANIZATION

- A. General: This Section describes the organization to be used in coordinating the City's departments in support of the response during a hurricane or tropical cyclone event. It describes the Unified Command Structure the various agencies will work under in responding to and recovering from a hurricane or tropical cyclone event. It addresses the circumstances under which the City will support other jurisdictions in Sarasota County and the State of Florida in response to a hurricane or tropical cyclone event.

- B. Response Organization:
1. Local: Using the principles of the National Incident Management System (NIMS), the EOC's team is organized as described in the Base Plan. This team will direct implementation of response and recovery activities.
 2. County: The City will provide liaisons to the Sarasota County Multi-Agency Coordination Center (MACC) to coordinate the sharing of information and resource requests between the City and County.
- C. Responsibilities:
1. As the situation warrants, the Emergency Management Division will:
 - a. Monitor storm development, keeping governmental agencies and the public informed about the potential impact;
 - b. Participate in local and National Weather Service conference calls;
 - c. Activate the EOC to the level appropriate for the threat;
 - d. Monitor the operation and determine when to request the City Manager declare a State of Local Emergency pursuant to F.S. 252.38(3)(a)(5); and
 - e. Act as the Functional Lead for each Incident Management activity at the EOC for the City Manager; i.e. Operations, Planning/Intelligence, Administration, and Logistics.
 2. **Department Directors: Directors will prepare their personnel and organizations for the hurricane or tropical cyclone event and staff positions within the EOC as required by the Response Manager.** When requested, directors will make City assets available for deployment to other areas of Sarasota County or the State of Florida. Asset sharing will be done through the Sarasota County Multi-Agency Coordination Center to ensure proper tracking and accounting.

III. METHOD OF OPERATIONS

- A. General: This section of the Annex presents guidelines that can be used to make key decisions during the event. These decisions will be based on experience, the best evaluation of the current situation, and the forecast for the near future. All hurricane and tropical cyclone event responses will fall under the umbrella of the Incident Command System. Since a hurricane or tropical cyclone event is a disaster that can be seen approaching, general phases of activity are defined based on the anticipated arrival of tropical storm force winds. Guidelines for the three levels of activation (Monitoring, Partial, and Full) are presented below:
- B. Level 3, Monitoring Phase: The Emergency Management Division will:
1. Monitor the weather system;
 2. Participate in/initiate conference calls with Sarasota County and the National Weather Service;
 3. Regularly transmit warning and preparedness information through all communications media;
 4. Brief the department directors; and
 5. Prepare to activate the EOC.
- C. Level 2, Partial Activation: The City's EOC may be activated to a Level 2 based on a variety of considerations.
1. Request to **issue a State of Local Emergency**: When appropriate and for the following factors, the Emergency Management Division will request the City Manager declare a State of Local Emergency pursuant to F.S. 252.38(3)(a)(5):
 - a. Evacuation(s) ordered by Sarasota County and/or decision by the County to activate to a Level 2;
 - b. Closing down/reducing "normal" governmental operations;
or
 - c. Expending City monies in response to the threat of a hurricane or tropical cyclone event.

2. Department Directors will initiate their preparations using the Departmental Pre-Storm Checklist to ensure all necessary tasks are completed.
 3. Staffing the City's EOC: Once the City's EOC has gone to Level 2, the following agencies will maintain a presence in the EOC while it is activated:
 - a. Division of Public Works;
 - b. Fire Rescue Department;
 - c. Department of Public Utilities;
 - d. North Port Police Department; and
 - e. The City's Public Information Officer.
- D. Level 1, Full Activation: The Emergency Management Division Guidelines to Fully Activate the City's EOC are as follows.
1. The Emergency Manager, in consultation with the City Manager, will make the decision of when to activate the City's EOC to a Level 1. The following factors may be used in the decision-making process:
 - a. When a response to the hurricane or tropical cyclone event requires the resource and/or logistical support from a majority of the City's Incident Command Functions; and
 - b. When the threat of a hurricane or tropical cyclone event necessitates evacuations that require resource support from neighboring counties.
 2. City's Employee Shelter Activation: When the EOC becomes fully activated due to the threat of a hurricane or tropical cyclone event and a major evacuation is anticipated, the City Manager may direct the opening of an Employee Shelter so that the dependents of City employees may have a safe place to stay.
- E. Resources: All resource requests will be coordinated through the Logistics Section.

IV. PUBLIC INFORMATION and INFORMATION FLOW

- A. General: This Section provides how information will be shared during the activation of the City's EOC. The Public Information Officer has the responsibility to establish a mechanism that efficiently provides and disseminates information to the public. The City Manager will appoint a Lead Public Information Officer who will facilitate the logistical support and orientation for all Public Information Officers working in the City's EOC. (See Appendix G – Crisis Communication and Public Information Plan.)
- B. Unified Public Information: When the County Emergency Operations Center is activated (Level 2 or 1) the City's Public Information Officer will coordinate information and media releases with Sarasota County to ensure consistent messaging across all formats.
- C. Information Flow:
1. Hurricane and tropical cyclone event Response Activity:
 - a. The Emergency Manager will notify the Sarasota County Multi-Agency Coordination Center of any significant activities that develop.
 - b. The Public Information Officer will notify the EOC Manager of any significant activities that develop; such as the following:
 - (1) Lives and/or property imminently jeopardized;
 - (2) Evacuation issues/problems;
 - (3) Injuries or deaths related to the hurricane or tropical cyclone event; or
 - (4) Road closures to major thoroughfares.
 2. Situation Report **Information**: The Plans Section Chief will produce situation reports on a frequency and format consistent with ICS Planning and with the needs and requirements of the Sarasota County Multi-Agency Coordination Center.

V. REIMBURSEMENT (See Base Plan, Section VI.)

- A. When anticipating a Presidential Declaration of a Major Disaster that includes Sarasota County, and the City encounters any damage to its infrastructure or expends funds for emergency protective measures or debris removal, the City shall apply to the federal government for reimbursement consistent with the Stafford Act and its applicable regulations.
- B. Complete and accurate accounts of emergency expenditures and obligations, including personnel and equipment costs, must be maintained. The Finance Department will create project and payroll codes to track all costs.
- C. Following a hurricane or tropical cyclone event, the City's Emergency Management Division will coordinate with all departments and volunteers to compile costs and proper documentation needed for reimbursement under Public Assistance procedures. A member of the City's Finance Department, Emergency Management Division, and pertinent department officials must be involved with the reimbursement application process with FEMA. The Finance Department, and other City departments as necessary, will coordinate the submission of payroll reports to FEMA; individual departments will be responsible for equipment, materials, and contracts.

VI. EXERCISES AND TRAINING (See Base Plan, Section IV, Subsections C and D.)

- A. The City will develop and conduct emergency management oriented exercises and participate in similar exercises conducted by other government entities.
- B. Exercises shall be drawn from existing plans/procedures to evaluate their ability to meet the goals and objectives.
- C. Exercises shall be evaluated, and an After-Action Review/Improvement Plan will be created to draw-on strengths and identify areas for improvement.
- D. The Emergency Management Division will work with department directors to identify generic and task-specific training opportunities for operations related to hurricane and tropical cyclone events.
- E. All training shall be consistent with NIMS/ICS principles.

CITY OF NORTH PORT
COMPREHENSIVE EMERGENCY MANAGEMENT PLAN
APPENDICES

- A. EMERGENCY ORDINANCE OF A STATE OF LOCAL EMERGENCY**
- B. INCIDENT COMMAND SYSTEM GENERAL GUIDANCE AND POSITION MISSION STATEMENTS**
- C. CITY OF NORTH PORT RESOLUTION 06-R-10 IMPLEMENTING NIMS**
- D. CITY OF NORTH PORT RESOLUTION 01-R-44 ADOPTING THE STATEWIDE MUTUAL AID AGREEMENT**
- E. CITY OF NORTH PORT RESOLUTION 2016-R-02 ADOPTING THE SARASOTA COUNTY UNIFIED LOCAL MITIGATION STRATEGY**
- F. CITY OF NORTH PORT RESOLUTION 2019-R-10 ADOPTING THE COMPREHENSIVE EMERGENCY MANAGEMENT PLAN AS THE FORMAL GUIDE FOR THE CITY OF NORTH PORT'S EMERGENCY MANAGEMENT ACTIVITIES**
- G. CRISIS COMMUNICATIONS AND PUBLIC INFORMATION**
- H. DEBRIS MANAGEMENT**

APPENDIX A**EMERGENCY ORDINANCE DECLARING
A STATE OF LOCAL EMERGENCY**

AN ORDINANCE OF THE CITY OF NORTH PORT, FLORIDA, DECLARING A STATE OF LOCAL EMERGENCY, GRANTING TO THE CITY MANAGER OR DESIGNEE THE AUTHORITY TO TAKE ACTIONS IN ACCORDANCE WITH FLORIDA STATUTES SECTION 252.38(3)(a), AND SUSPENDING STANDARD PROCEDURES FOR THE PROCUREMENT OF GOODS AND SERVICES NECESSARY TO ADDRESS THE DECLARED EMERGENCY CAUSED BY THE THREAT POSED BY [ENTER EVENT]; PROVIDING FOR FINDINGS; PROVIDING FOR DURATION; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING AN EFFECTIVE DATE.

WHEREAS, [ENTER EVENT] poses an immediate danger to the public health, safety, or welfare to the City of North Port, Florida and its residents; and

WHEREAS, these circumstances constitute an emergency which warrant the adoption of this ordinance under the procedures provided in the Charter of the City of North Port, Section 7.02 - Emergency Ordinance; and

WHEREAS, the City Commission has, by a vote of at least four members of the Commission, deemed the adoption of this ordinance as necessary for the immediate preservation of the public health, safety, and welfare of the City.

NOW, THEREFORE, BE IT ORDAINED BY THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA, AS FOLLOWS:

SECTION 1 – FINDINGS:

1.01. The above recitals are hereby ratified and confirmed as being true and correct and are incorporated herein by reference.

SECTION 2 – DECLARATION OF EMERGENCY AND EMERGENCY PROCEDURES:

2.01 The City Commission of the City of North Port, Florida hereby declares a state of local emergency due to [EVENT], an emergency affecting the City.

2.02 The City Commission of the City of North Port, Florida hereby authorizes the City Manager or the City Manager's designee the power and authority set forth in Florida Statutes Section 252.38(3)(a), and to take any and all action of a temporary nature deemed necessary during this state of emergency.

2.03 The City Commission of the City of North Port, Florida hereby determines that this emergency necessitates the waiver of the general procedures and formalities required by law pertaining to the City Manager's procurement of goods and services requiring emergency action, notwithstanding the provisions of Chapter 2, Code of the City of North Port, Florida. Procurements should be made

with the greatest degree of competition that circumstances will permit.

SECTION 3 – DURATION:

3.01 This ordinance shall remain in effect until it expires by operation of law or until the emergency conditions no longer exist as determined by the City Manager

SECTION 4 – CONFLICTS:

4.01 In the event of any conflict between the provisions of this ordinance and any other ordinance or portions thereof, the provisions of this ordinance shall prevail to the extent of such conflict.

SECTION 5 – SEVERABILITY:

5.01 If any section, subsection, sentence, clause, phrase, or provision of this ordinance is for any reason held invalid or unconstitutional by any court of competent jurisdiction, such provision shall be deemed a separate, distinct, and independent provision and such holding shall not affect the validity of the remaining portions hereof.

SECTION 6 – EFFECTIVE DATE:

6.01 This ordinance shall take effect immediately after adoption by the City Commission of the City of North Port, Florida.

Read in its entirety in a public session this _____ day of _____ 20__.

PASSED and ADOPTED by the City Commission of the City of North Port, Florida public session this _____ day of _____ 20__.

CITY OF NORTH PORT, FLORIDA

MAYOR

ATTEST:

CITY CLERK

APPROVED AS TO FORM AND CORRECTNESS:

CITY ATTORNEY

APPENDIX B

INCIDENT COMMAND SYSTEM GENERAL GUIDANCE AND POSITION MISSION STATEMENTS

General Guidance for ICS Personnel

1. On receiving your incident assignment, be certain you clearly understand the location you are to report to and the time you are expected to begin in the incident assignment.
2. On your arrival, check in with the appropriate supervisor or “check-in” location if you have been given a telephone number to call upon arrival.
3. In the event you are working in the EOC, request a copy of the EOC Activation SOP if you are not furnished one. Ask questions if you are not certain what your duties are. Request a briefing.
4. Use clear “open text” when communicating on the telephone or in written memoranda, such as multi-part message forms or Situation Reports. This means that you should not use codes, signals or jargon.
5. Acquire any office materials you may need, such as multi-part message forms or note pads.
6. Accountability of personnel is critical. Remember the principal of Unity of Command that each person is reportable to only one supervisor. Each supervisor is responsible for the accountability of those they supervise.
7. Continuously brief subordinates relative to new information you have received which pertains to their activities.
8. Advise the Incident Commander, Section Chief, or your supervisor, when personnel have accomplished their last mission and are available for new tasking.
9. Complete, maintain, or forward forms and reports as necessary.
10. Brief your subordinates about potential demobilization so they can prepare to conclude their necessary reports and activities in a timely manner.
11. Notify your subordinates when they can demobilize. Receive a final accountability report for all personnel, and advise the Incident Commander or your supervisors when you subordinates have demobilized and the status of personnel.

POSITION MISSION STATEMENT FOR Incident Commander

- Location:** On scene of the Incident or at North Port EOC.
- Recommended Staffing:** First arriving officer-in-charge (OIC) until relieved by Higher Authority
- North Port City Manager or his designated representative which may include the North Port Emergency Management Director.
- Activation:** Any situation which in the judgment of the on-scene ranking OIC requires the utilization of the ICS due to the concern for public safety, the safety of response personnel at the scene, and effective management of the incident.
- Responsibilities:** The Incident Commander is ultimately responsible for all incident activities including the development and implementation of strategic decisions and the utilization of extended resources. This individual must process information to and from the primary Section Chiefs and Staff operating within their span of control.
- General Procedures:**
- Arrive at the scene, or EOC, and establish command. Obtain an incident briefing from the OIC or previous incident commander.
 - Assess the incident and conduct an initial strategy briefing with the current operation command personnel.
 - Select and activate ICS elements as needed.
 - Brief the Command Staff and Section Chiefs
 - Participate in the preparation and authorize implementation of the *Incident Action Plan*.
 - Determine needs, make command decisions, and related the needs/decisions to the Command Staff and Section Chiefs.
 - Coordinate primary staff activities.
 - Manage overall incident.
 - Approve requests for and utilization of extended resources.
 - Brief the City Manager, or their designated representative, relative to on-going operations and significant changes in the situation.
 - Authorize release of information to the news media.
 - Obtain briefings from the Section Chiefs, Command Staff and other representatives as appropriate.
 - Ensure that the *Incident Status Form* (work sheet) is utilized and completed.
 - Obtain information on environmental concerns.

- Review the progress of the incident and channel organizational efforts toward the highest priority tasks.
- Insure that safety procedures and disciplines are practiced and maintained by all personnel.
- Approve the demobilization plan and oversee the return to normal operations.
- Participate in and approve a final incident summary, media briefing, reports and other documentation.
- Assure that historical records are transferred to the City Clerk for final custody.
- Accumulates after actions reports from those involved in the incident and develops a list of Lessons Learned, and transmits to all involved City departments, and external agencies. If appropriate make recommended changes to the North Port Comprehensive Emergency Management Plan.

**POSITION MISSION STATEMENT FOR
Incident Command Aide**

Location:	Command Post or North Port EOC
Recommended Staffing:	Any qualified individual appointed by the Incident Commander
Reports to:	Incident Commander
Activation:	When deemed necessary by the Incident Commander to assist with maintaining paperwork, records or communications or to assist the incident commander.
Purpose:	The Aide provides administrative and operational assistance to the IC, manages the command area and processes information that does not require the attention of the IC. This position requires a person with knowledge of the City's various departmental operating responsibilities and procedures, applicable ICS tactics and strategy and command terminology. This position may formulate decisions and issue directives to a level that has been designated by the IC.

General Procedures:

- Establish and secure the EOC area. If necessary, obtain assistance from the City of North Port Police Department.
- Obtain initial briefing and assignments from the IC.
- Initiate and maintain the IC worksheet. Log all pertinent information, or if a Historian is present, direct such information to the Historian for appropriate entries.
- Assist with the research and analysis of resource and reference materials as necessary to assist the IC or Command Staff.
- Operate various communications systems as needed. Relay command directives from the Incident Commander to the Command Staff and Section Chiefs as needed.
- Disseminate and assist in the processing of information both upward and downward as needed.
- Anticipate the needs of the IC and be prepared to respond accordingly.
- Assist the PIO by relating current incident information.
- Assist the liaison officer with management of representatives from other agencies.
- Observe operations and make suggestions and recommendations to the IC.
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Liaison Officer**

Location:	On the Scene at the Command Post or the North Port EOC
Recommended Staffing:	Any Qualified Individual Appointed by the Incident Commander
Reports to:	Incident Commander
Activation:	When a separate point of contact is needed due to the number of agencies represented on an incident. A liaison may also be furnished to the Sarasota County EOC for coordination during a county-wide or multiple county incident.
Purpose:	The Liaison Officer is a member of the Command Staff selected to serve as point of contact for other agencies to assist in communications and coordination with such.
Responsibilities:	The coordination of inter-agency activities and to assure communications exists between the City of North Port and other levels of emergency response, such as: Sarasota County, the State of Florida, Florida National Guard and/or Federal government.

General Procedures:

- Obtain initial in-briefing from the Incident Commander.
- Serve as a Point of Contact for assisting, coordinating and communicating with other agency representatives.
- Identify agency representatives for each response organization and establishing a means of communications with them.
- Attempt to limit communications with other agencies to one point of contact per agency to avoid confusion and unnecessary duplication of effort.
- Respond to all requests for agencies for special needs assistance.
- Respond to requests from North Port Incident Commander for any inter-agency contacts.
- Monitor the incident operations to identify current or potential inter-agency needs or problems.
- Maintain an on-going list of response involvement, such as personnel, equipment and mutual aid supplies from other agencies involved in the response effort. Maintain a list of activities which other agencies are currently involved in.
- Participate in planning meetings by providing status, limitations and capabilities of other agencies involved in the response effort.
- Upon agency request, provide specific information about the incident relative to: Operational Activities Anticipated During of Activities.
- Status of agency personnel involved in the operations Expected demobilization schedule

- If required to do so, be prepared to serve as a liaison from the City of North Port to other organizational EOCs.
- Serve a point of contact from North Port to the other organization Communicate information and requests between the organizations.
- Coordinate actions with the other agency on behalf of the North Port Incident Commander
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Public Information Officer**

Location:	At the Scene or in the North Port EOC
Recommended Staffing:	Any individual appointed by the Incident Commander
Reports to:	Incident Commander
Activation:	At the discretion of the IC for any incident of such significance that news media attention is attracted and assistance is required.
Purpose:	The PIO is the focal point for the official release of information to the news media.
Responsibilities:	The PIO is the contact person for media representatives. Coordinates release of all incident information.

General Procedures:

- Establishes and maintains a media gathering area, schedules regular news briefings and news conferences if deemed necessary and helpful.
- Issues news releases and gathers factual background information for the news media.
- Ensures the accuracy of information and shall remain knowledgeable of current incident information, operations and status.
- Is sensitive to misinformation or rumors developing within the media or public, and develops plans to correct the misinformation or rumors.
- Obtains initial in-briefing from the IC.
- Begins to log and track incident information.
- Establishes a media area which offers safety to the media from hazards created by the incident. Requests law enforcement assistance as needed.
- Meets with arriving media to give them an initial in-briefing. Provides on-going updates based on information from the IC.
- Seeks photo opportunities for the news media and facilitates their ability to take pictures.
- Serves as escort as needed.
- Conducts briefings and news conferences for the media, releasing only information and does not speculate in response to media inquiries.
- Responds to media requests for background information and updates.
- Updates the IC on information released to the news media and request which have been received by the media.
- Files all media news releases with reports.
- Corrects misinformation and/or rumors developing within the media or public at large.
- Seeks media support in furnishing correct information to the public when rumors have

- been identified.
- Arranges and organizes adequate staff, equipment and facilities to support the PIO functions
 - Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Safety Officer**

Location:	On Scene or the North Port EOC
Recommended Staffing:	Any trained Individual Appointed by the Incident Commander
Reports to:	Incident Commander
Activation:	When in the opinion of the Incident Commander personnel may be operating in any type of hazardous environment or when potentially dangerous operation.
Purpose:	To ensure that all personnel at the scene are operating in as safe a manner as possible, consistent with current standards and practices.
Responsibilities:	The Safety Officer is the member of the Command Staff with the foremost responsibility for the safety of personnel operating at the scene. The Safety Officer will continuously monitor and assess situations for unsafe or hazardous conditions and will develop countermeasures for assuring the safety of personnel.

General Procedures:

- Obtain an in-briefing from the IC relative their duties, responsibilities and current situation.
- Identify hazardous situation associated with the incident.
- Participate in planning meetings to advise the IC and operations Chief relative to personnel safety.
- Exercise emergency authority to halt and/or prevent unsafe acts.
- Conduct initial accident investigations that have occurred within the incident area.
- Establish safety assistants or seek specialized input as needed.
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Logistics Section Chief**

Location:	Incident Scene or North Port EOC
Recommended Staffing:	Ranking Qualified Officer Available
Reports To:	Incident Commander
Activation:	Any incident requiring resource move-ups or mutual aid
Purpose:	To provide management of facilities, services, equipment and supplies. Coordinates move-ups or mutual aid support.
Responsibilities:	Acquires, secures and maintains adequate inventories to support incident response activities. Will provide for the personal service needs of all personnel operating at the incident.

General Procedures:

- Obtain initial in-briefing from the Incident Commander.
- Plan for the organization of the Logistics Section and determines the need for additional personnel and resources.
- Assigns tasks and locations to Logistical Section personnel.
- Participates in the preparation of the incident action plan.
- Identifies current and anticipated future service and support requirements for the planned and expected operations.
- Coordinates with the Planning Chief regarding anticipated future resource needs.
- Reviews and provides input for the Communications Plan, Traffic Plan and Medical Plan, if needed.
- Identifies and provides support requirements for the personnel operating at the incident.
- Coordinates and processes requests for additional resources.
- Ensures move-ups or mutual aid requests are made when needed.
- Establishes secondary staging areas as needed.
- Prepares for the return of mutual aid equipment during demobilization.
- Develops a Logistics Section Demobilization Plan.
- Contributes to the development of an After-Action Report with Lessons Learned.

POSITION MISSION STATEMENT FOR Operations Section Chief

On the Scene in Forward Area, the Command Post, or the North Port EOC

- Recommended Staffing:** Ranking Qualified Officer Available, designated by Command
- Reports to:** Incident Commander
- Activation:** On any incident which taxes the span of control of the Incident Commander
- Purpose:** Encompasses most incident mitigation activities. This includes all task oriented Divisions/Groups participating in the incident scene.
- Responsibilities:** Is a member of the General Staff, organizes the initial incident control activities and subsequent implementation of the incident action plan.

General Procedures:

- Obtains an initial in-brief from the Incident Commander
- Establishes Branches and Divisions/Groups as needed to initiate operation control measures
- Begins development work on the incident action plan needed for initial and immediate control of the incident
- Supervises operational aspects of the incident and the Branches or Divisions/Groups associated with that function
- Determines the need for and requests additional resources
- Advises the Incident Commander of special concerns or requirements that may impact the development of an extended incident action plan
- Makes tactical decisions and changes to the operation on an immediate basis if needed.
- Assembles and disassembles Strike Teams/Task Forces
- Assigns a Rehabilitation Officer and ensures that a remote area is established for this activity
- Establishes and maintains Staging Areas as needed and assigns a staging officer to maintain the staging area.
- Prepares a final summary of activity and demobilization report to be submitted to the Incident Commander
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Planning Section Chief**

Location:	On the incident scene or the North Port EOC
Recommended Staffing:	Ranking Qualified Officer Available
Reports to:	Incident Commander
Activation:	When the incident has reached a magnitude in which the Incident Commander cannot effectively forecast the future action plan due to the incident size, constraints on the IC, or complexity.
Purpose:	To coordinate the preparation of the incident action plan, advises the command of potential operational impacts, and maintains alternative strategies for potential and possible incident developments. The Planning Section serves as the clearing house for analysis of incoming information.
Responsibilities:	Develops and maintains the incident action plan. Collects and obtains information relative to the incident, identifies special resources as indicated by need, and provides vital information such as weather data, environmental data, special equipment needs to the Incident Commander.

General Procedures:

- Obtains initial in-briefing from the Incident Commander.
- Identifies additional staffing, equipment and supply needs.
- Identifies requirements for documentation.
- Identifies specific environmental issues.
- Continuously receives new or updated information for analysis regarding resources, weather and other incident related matters.
- Prepares and coordinates Command Staff meetings to outline the incident action plan.
- Prepares a written Incident Action Plan for the Incident Commander.
- Monitors the incident progress, updates and modifies the Incident Action Plan as needed.
- Assists with evacuation and sheltering plans as needed, or assumes this responsibility in the absence of a Relocation Officer.
- Provides the Incident Commander with special interest information such as weather predictions, weather changes, environmental concerns and critical resource shortages.
- Provides plans for demobilization and incident termination.
- Writes the final Incident Summary for approval by Incident Commander
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Administration/Finance Section Chief**

- Location:** As designated by the Incident Commander
- Recommended Staffing:** Any qualified individual designated by the Incident Commander
- Reports to:** Incident Commander
- Activation:** When in the judgment of the Incident Commander the position is required to manage financial and administrative issues due to the magnitude or complexity of the incident.
- Purpose:** To assure that financial documentation is maintained in compliance with municipal state and Federal requirements. To maximize the opportunities for financial reimbursement and to perform necessary administrative services to allow the Incident Commander and the Command and general Staffs to focus on incident management.
- Responsibilities:** Tracks the use of reserve personnel and internal resources for overtime costs. Coordinates all extraneous costs incurred relative to the incident involving personnel, equipment, supplies and contract services. Documents line of duty injury reports, damage to or destruction of equipment. Assuring that appropriate Federal guidelines are followed to seek reimbursement.
- General Policies:**
- Obtains initial in-briefing from the IC.
 - Plans the Administration/Finance Section organization and determines the need for staffing.
 - Assigns work locations and preliminary work tasks to section personnel
 - Participates in the preparation of the Incident Action Plan.
 - Identifies any special financial needs for the incident.
 - Coordinates personnel-hours tracking and recall of off-duty personnel.
 - Ensures prompt financial payment and insurance claims processing relative to personal injuries.
 - Maintains daily contact with County, State and Federal agencies involved in the incident management relative to administrative and financial matters.
 - Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Branch Director**

Location:	On Scene or any prescribed location by Command
Recommended Staffing:	Ranking Qualified Officer Available
Reports To:	Operations or Logistics Section Chief or Incident Commander, as appropriate
Activation:	When multiple City departments are working the same general incident location and coordination is needed, or when the span of control requires that Section Chiefs need to establish a level of management between themselves and response personnel.
Purpose:	Provide coordination, direction and control to operational staff activities within a specific function or geographic location. Functional areas may include: Operations Section - Public Safety, Human Services, and Infrastructure; Logistics Section - Services and Supply.
Responsibilities:	Directs and maintains the continuity of functions occurring within the prescribed functional or geographic area of responsibility. Maintains communications with the Operations Section Chief/Incident Commander concerning specific needs and on-going activities at their site.

General Procedures:

- Obtains initial in-briefing from the Incident Commander or Operations Section Chief
- Coordinates the activities of personnel assigned to the Branch in carrying out the incident control activities.
- Reviews assignments with field personnel as necessary.
- Updates the Operations Chief or Incident Commander on changes in conditions that will affect the plan of action in their sector.
- Coordinates activities with other Branch Directors or Group Supervisors through the Operations Section Chief or Incident Commander.
- Determines the need for and requests additional personnel, supplies, equipment, contract services or other resources as needed to accomplish the mission.
- Makes recommendations to the Operations Section Chief or Incident Commander relative to changes in the action plan and initiates critical decisions relative to immediate actions as needed.
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Group / Division Supervisor**

Location:	As Needed for Task Completion
Recommended Staffing:	Ranking Qualified Officer Available
Reports to:	Operations Section Chief, Branch Director, or Incident Commander
Activation:	When a need exists to assign multiple departmental units to a specific task.
Purpose:	To provide supervisory support to the Unit-level resources regardless of the functional area or geographic location of the response personnel involved. Group/Division may be located within a Branch in the Operations Section.
Responsibilities:	Provides direction and control to resources assigned to the Group to coordinate their operations with other Groups or Divisions. Assures the work unit is efficient and effective in the performance of its mission by maximizing the use of resources.

General Procedures:

- Receives initial in-brief from the Operations Section Chief or the Incident Commander to determine the action plan and identify the companies which are to be assigned to the Group.
- Determines the safety of the work area and assures that crews have appropriate safety or protective equipment, and that such equipment is properly used.
- Conduct on-going analysis of the current situation, develop an operating plan, and make appropriate assignments to accomplish the mission. Adjusts the operating plan as needed.
- Coordinate with other Division or Group Supervisors to ensure that a mutually supporting effort is being conducted.
- Requests additional personnel and other resources as needed to accomplish the mission.
- Ensure scene integrity so that evidence is preserved for subsequent investigation should such be required.
- Contributes to the development of an After-Action Report with Lessons Learned.

**POSITION MISSION STATEMENT FOR
Staging Area Manager**

Location:	As designated near the scene or a remote location
Recommended Staffing:	Any Qualified and Trained Individual Appointed by Command
Reports To:	Incident Commander or Operations Section Chief
Activation:	When Command determines that a staging area must be established to provide adequate resources to the incident operations or when resources are being assembled in a resource pool for a special or future need.
Purpose:	To manage the personnel, vehicular and equipment resources in a manner which will help prevent congestion at the incident scene; to create a pool of resources and manage resource distribution.
Responsibilities:	Locate and maintain an area that allows for an effective retrieval of personnel, equipment, and supplies. Fulfill resource requests from the Operations Section Chief or Incident Commander. Maintain a sufficient pool of resources to support operations.

General Procedures:

- Obtains an initial in-briefing from the Incident Commander or Operations Section Chief.
- Functions as a member of the Operations Staff advising the Operations Section Chief or Incident Commander of potential resource requirements and shortages.
- Fulfills resource requests from the Operations Section Chief or Incident Commander. Directs units of where to report, who to report to, and their anticipated assignment.
- Ensures that resources are pre-positioned in such a way as to expedite their response to the incident scene.
- Coordinates with law enforcement to ensure access from the staging area to the incident scene.
- Maintains accountability for the dispatching of mutual aid resources.
- Positions resources to coordinate team/task force later use
- Prepares a demobilization plan for the Staging Area and directs demobilization activities when appropriate.
- Contributes to the development of an After-Action Report with Lessons Learned.

APPENDIX C**CITY OF NORTH PORT RESOLUTION 06-R-10 IMPLEMENTING NIMS****City of North Port****RESOLUTION NO. 06-R-10**

A RESOLUTION OF THE CITY OF NORTH PORT, FLORIDA IMPLEMENTING THE NATIONAL INCIDENT MANAGEMENT SYSTEM (NIMS) AS THE CITY OF NORTH PORT'S INCIDENT MANAGEMENT SYSTEM; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING FOR AN EFFECTIVE DATE

WHEREAS, in Homeland Security Directive (HSPD)-5, the President directed the Secretary of the Department of Homeland Security to develop and administer a National Incident Management System (NIMS), which would provide a consistent nationwide approach for federal, state, local and tribal government to work together more effectively and efficiently to prevent, prepare for, respond to, and recover from domestic incidents, regardless of cause, size or complexity; and

WHEREAS, the collective input and guidance from all federal, state, local and tribal homeland security partners has been, and will continue to be, vital to the development, effective implementation and utilization of a comprehensive NIMS; and

WHEREAS, it is necessary that all federal, state, local, and tribal emergency agencies and personnel coordinate their efforts to effectively and efficiently provide the highest levels of incident management; and

WHEREAS, to facilitate the most efficient and effective emergency management it is critical that the federal, state, local, and tribal organizations utilize standardized terminology, standardized organizational structures, interoperable communications, consolidated action plans, unified command structures, uniform personnel qualification standards, uniform standards for planning, training and exercising, comprehensive resource management, and designated incident facilities during emergencies and disasters; and

WHEREAS, the NIMS standardized procedures for managing personnel, communications, facilities, and resources will improve the City's ability to utilize federal funding to enhance local readiness, maintain first responder safety, and streamline the incident management processes; and

WHEREAS, the Incident Command System components of NIMS are already an integral part of various incident management activities throughout the City, including all public safety and emergency response organization programs; and

WHEREAS, the National Commission on Terrorism Attacks (9-11 Commission) recommended adoption of a standardized Incident Command System,

RESOLUTION NO. 06-R-10

NOW THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION, OF THE CITY OF NORTH PORT, FLORIDA, TO WIT:

SECTION 1

- 1.01 Hereby mandates the National Incident Management System (NIMS) to be utilized for all incident management in the City of North Port.
- 10.2 The City Manager shall coordinate, or designate coordination of, required NIMS training for all required City officials and/or employees with overall emergency management responsibilities; employees with overall emergency management responsibilities through delegation; and employees primarily involved in emergency planning.

SECTION 2 CONFLICTS

- 2.01 If there is any conflict between this Resolution and any other resolution or ordinance, or portions thereof, the provisions of this Resolution shall prevail to the extent of such conflict.

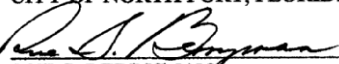
SECTION 3 SEVERABILITY

- 3.01 If any section, subsection, sentence, clause, phrase or portion of this Resolution is for any reason held invalid or unconstitutional by any court of competent jurisdiction, such portion shall be deemed a separate, distinct, and independent provision and such holding shall not affect the validity of the remaining portions.

SECTION 4 EFFECTIVE DATE

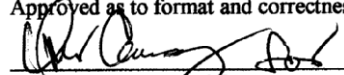
- 4.01 This Resolution shall take effect immediately upon execution by the Chair.

PASSED AND DULY ADOPTED by the City Commission of the City of North Port, Florida this 23rd day of January, 2006.

CITY OF NORTH PORT, FLORIDA

 RUE S. BERRYMAN
 COMMISSION CHAIR

ATTEST:

 HELEN M. RAIMBEAU, CMC
 CITY CLERK

Approved as to format and correctness

 ROBERT K. ROBINSON
 CITY ATTORNEY

APPENDIX D**CITY OF NORTH PORT RESOLUTION 01-R-44
ADOPTING THE STATEWIDE MUTUAL AID AGREEMENT****City of North Port****RESOLUTION NO. 01-R-44****A RESOLUTION OF THE CITY OF NORTH PORT,
FLORIDA, ADOPTING A STATEWIDE MUTUAL AID
AGREEMENT, PROVIDING FOR SEVERABILITY; AND
PROVIDING AN EFFECTIVE DATE.**

WHEREAS, THE State of Florida is vulnerable to a wide range of disasters that are likely to cause the disruption of essential services and the destruction of the infrastructure needed to deliver those services; and

WHEREAS, such disasters are likely to exceed the capability of any one local government to cope with the disaster with existing resources; and

WHEREAS, such disasters may also give rise to unusual technical needs that the local government may be unable to meet with existing resources, but that other local governments may be able to offer; and

WHEREAS, the Emergency Management Act, as amended, gives the local governments of the State, authority to make agreements for mutual assistance in emergencies and through such agreements ensure the timely reimbursement of costs incurred by the local governments which render such assistance.

NOW, THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA, TO WIT:

SECTION 1. Acceptance. We the governing body of the City of North Port and its Municipal Districts by means of this Resolution accept and authorize signing of the Statewide Mutual Aid Agreement, attached hereto as Exhibit A.

SECTION 2. Severability. If any section, subsection, sentence, clause, phrase or portion of this Resolution is for any reason held invalid or unconstitutional by any court of competent jurisdiction, such portion shall be deemed a separate, distinct and independent provision and such holding shall not affect the validity of the remaining portions.

Page 1 of 2

RESOLUTION NO. 01-R-44

SECTION 3. Effective Date. This Resolution shall take effect upon its adoption by the city Commission.

PASSED AND DULY ADOPTED by the City Commission of the City of North Port, Florida, this 23rd day of July, 2001.

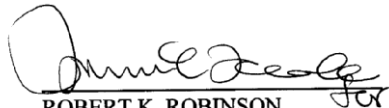
CITY OF NORTH PORT, FLORIDA


RUE S. BERRYMAN
Commission Chairperson

ATTEST:


DORIS J. BRIGGS
City Clerk

Approved as to form and correctness:


ROBERT K. ROBINSON
City Attorney

APPENDIX E

CITY OF NORTH PORT RESOLUTION 2016-R-02 ADOPTING THE SARASOTA COUNTY UNIFIED LOCAL MITIGATION STRATEGY

Resolution No. 2016-R-02



City of North Port

RESOLUTION NO. 2016-R-02

A RESOLUTION OF THE CITY OF NORTH PORT, FLORIDA, ADOPTING THE 2016 SARASOTA COUNTY UNIFIED LOCAL MITIGATION STRATEGY, WITH THE NORTH PORT FLOODPLAIN MANAGEMENT PLAN ANNEX, AS THE FORMAL GUIDE FOR THE CITY OF NORTH PORT'S HAZARD MITIGATION AND FLOODPLAIN MANAGEMENT ACTIVITIES IN ACCORDANCE WITH PUBLIC LAW 106-390, THE FEDERAL DISASTER MITIGATION ACT 2000 (44 CFR §201.6), AND THE FLORIDA ADMINISTRATIVE CODE RULE 9-G22; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING FOR AN EFFECTIVE DATE.

WHEREAS, City of North Port is subject to hazards including, severe weather, hurricanes, tornadoes, floods and wildfires and the City faces potential damage to life, property, natural resources and the local economy; and

WHEREAS, the Sarasota County Unified Local Mitigation Strategy Work Group is comprised of staff of Sarasota County Government; the Cities of North Port, Sarasota, and Venice; the Town of Longboat Key; Sarasota County School Board; and Sarasota Memorial Hospital, and community members is open for participation to any and all interested parties; and

WHEREAS, a City of North Port Community Rating System Work Group has also been formed to review and update the Floodplain Management Plan and is comprised of key City Department and community representatives, with the City's Stormwater Manager as the work group coordinator (City planner as an alternate) and those meetings are open for participation to any and all interested parties; and

WHEREAS, the Work Groups have identified these local hazards and have assessed County- and City-wide vulnerability and risk to these hazards, ultimately identifying and prioritizing mitigation initiatives that would reduce local vulnerability; and

WHEREAS, The Sarasota County Unified Local Mitigation Strategy and the North Port Floodplain Management Plan annex represents the City of North Port's commitment to reduce vulnerability and risks from all hazards, while it serves as a policy guide as resources are committed toward reducing the effects of all hazards, and is required of all communities

Resolution No. 2016-R-02

participating in the Community Rating System program through which provides flood insurance discounts through the National Flood Insurance Program; and

WHEREAS, initiatives identified, based upon established and accepted criteria, on the Unified Local Mitigation Strategy Project Lists are given greater consideration by State-managed funding programs, including but not limited to the Hazard Mitigation Grant program, the Flood Mitigation Assistance Program, the Pre-Disaster Mitigation Competitive Grant Program, Communities Trust, Community Development Block Grant, Coastal Partnerships Initiative; and

NOW THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA, THAT:

SECTION 1

- 1.01 The foregoing "WHEREAS" clauses above are hereby ratified as true and correct, and incorporated herein by reference.
- 1.02 The Sarasota County Unified Local Mitigation Strategy, with the North Port Floodplain Management Plan Annex, is adopted as the formal guide for the City of North Port's hazard mitigation and floodplain management activities.
- 1.03 The City Manager or his designee is authorized to apply for funding to support these activities.

SECTION 2 CONFLICTS

- 2.01 If there is any conflict between this Resolution and any other Resolution or Ordinance, or portions thereof, the provisions of this Resolution shall prevail to the extent of such conflict.

SECTION 3 SEVERABILITY

- 3.01 If any section, subsection, sentence, clause, phrase or portion of this Resolution is for any reason held invalid or unconstitutional by any court of competent jurisdiction, such portion shall be deemed a separate, distinct, and independent provision and such holding shall not affect the validity of the remaining portions.

Resolution No. 2016-R-02

SECTION 4 EFFECTIVE DATE

4.01 This Resolution shall take effect immediately upon execution by the Chair.

PASSED AND DULY ADOPTED by the City Commission of the City of North Port, Florida this 9th day of February, 2016

CITY OF NORTH PORT

By: Jacqueline Moore
Jacqueline Moore
Mayor

ATTEST:

By: Helen M. Raimbeau
Helen Raimbeau, MMC
City Clerk

Approved as to form and legal sufficiency:

By: Mark Moriarty
Mark Moriarty
City Attorney

APPENDIX F**CITY OF NORTH PORT RESOLUTION 2019-R-10 ADOPTING THE COMPREHENSIVE EMERGENCY MANAGEMENT PLAN AS THE FORMAL GUIDE FOR THE CITY OF NORTH PORT'S EMERGENCY MANAGEMENT ACTIVITIES****City of North Port****RESOLUTION NO. 2019-R-10**

A RESOLUTION OF THE CITY OF NORTH PORT, FLORIDA, ADOPTING THE 2018 REVISIONS TO THE CITY OF NORTH PORT, FLORIDA COMPREHENSIVE EMERGENCY MANAGEMENT PLAN AS THE FORMAL GUIDE OF THE CITY OF NORTH PORT'S EMERGENCY MANAGEMENT ACTIVITIES; INCORPORATING RECITALS; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING FOR AN EFFECTIVE DATE.

WHEREAS, the 2019 revisions to the City of North Port's Comprehensive Emergency Management Plan (the "Plan"), attached hereto as Exhibit "A" and incorporated herein by reference, provide a detailed description of the hazards, consequences, emergencies, or disasters that may be generated by natural, technological, or manmade causes within the City, as well as the processes to follow in the event of such hazards, consequences, emergencies, or disasters occurring within the City; and

WHEREAS, because the City of North Port has implemented an emergency management program, Rule 27P-6.010, Florida Administrative Code, requires that a Comprehensive Emergency Management Plan be developed, submitted to, and adopted by the City Commission; and

WHEREAS, the Sarasota County Department of Emergency Management has reviewed and determined that the City's 2019 Plan revisions comply with the established criteria as required by Rule 27P-6.010, Florida Administrative Code; and

WHEREAS, as it has been determined that the City's 2019 Plan revisions are in compliance with the terms of Chapter 27P-6, Florida Administrative Code, Rule 27P-6.010(8), Florida Administrative Code, requires that the Plan be adopted by resolution before it becomes effective; and

WHEREAS, the City's 2019 Plan revisions apply to City agencies and resources, assign lead and support responsibilities for City agencies and personnel that coordinate with the emergency support functions outlined in the County and State plans, and interface with plans of contiguous jurisdictions, regional municipalities, and State plans; and

WHEREAS, the City Commission of the City of North Port, Florida, finds that it serves the public health, safety, and welfare of the citizens of the City to adopt the 2019 revisions to the City of North Port’s Comprehensive Emergency Management Plan as presented.

NOW, THEREFORE, BE IT RESOLVED BY THE CITY COMMISSION OF THE CITY OF NORTH PORT, FLORIDA, AS FOLLOWS:

SECTION 1 – INCORPORATION OF RECITALS

1.01 The recitals outlined above are incorporated by reference as findings of fact as if expressly set forth herein.

SECTION 2 – RESOLUTION

2.01 The City Commission adopts the 2019 revision to the City of North Port Comprehensive Emergency Management Plan as the formal guide for the City of North Port’s emergency management activities.

SECTION 3 – CONFLICTS

3.01 In the event of any conflict between the provisions of this Resolution and any other resolution or portions thereof, the provisions of this Resolution shall prevail to the extent of such conflict.

SECTION 4 – SEVERABILITY

4.01 If any section, sentence, clause or phrase of this Resolution is for any reason held to be invalid or unconstitutional by any court of competent jurisdiction, such provision shall be deemed a separate, distinct, and independent provision and such holding shall not affect the validity of the remaining portions hereof.

SECTION 5 – EFFECTIVE DATE

5.01 This Resolution shall take effect immediately upon adoption by the City Commission of the City of North Port, Florida.

PASSED and DULY ADOPTED by the City Commission of the City of North Port this ___ day of _____ 201__.

CITY OF NORTH PORT, FLORIDA

CHRISTOPHER HANKS
MAYOR

ATTEST:

KATHRYN WONG
CITY CLERK

APPROVED AS TO FORM AND CORRECTNESS:

AMBER L. SLAYTON
CITY ATTORNEY

APPENDIX G

CRISIS COMMUNICATION AND PUBLIC INFORMATION



**City of
North Port, Florida**

**Crisis Communications and
Public Information Plan**

TABLE OF CONTENTS

- i. Record of Changes
- I. Introduction
 - A. Purpose
 - B. Scope
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 - B. Crisis Communications Team Representatives
 - C. Convening the Crisis Communications Team
 - D. Location
- IV. Response
 - A. Implementation
 - B. Immediate Response
 - C. Secondary Response
 - D. Approvals of outgoing information
 - E. The End of the Crisis
 - F. After-Action Review
- V. Training and Plan Maintenance
 - A. Spokesperson Training
 - B. Updating
 - C. Exercising

Appendices

- A. Emergency Notifications Scripts
- B. Joint Information Center Toolkit

I. INTRODUCTION

A. Purpose

The City of North Port's Crisis Communications Plan outlines the roles, responsibilities and protocols that will guide the City in promptly sharing information with all of City's audiences during an emergency or crisis. This plan is a part of City of North Port's Comprehensive Emergency Management Plan, adopted by the City Commission of the City of North Port and administered by the Emergency Manager.

For the purposes of this plan, a crisis is defined as a significant event that prompts significant, often sustained, news coverage and public scrutiny and has the potential to impact the City. A crisis could be precipitated by an emergency or a controversy. An emergency is a fire, hurricane, crime or other event that presents a threat and typically involves a response from police, fire or emergency medical personnel. A controversy better describes events such as a protest.

B. Scope

The audiences for this plan include City staff, residents, commerce, visitors, the media, national and international publics, and state and federal officials.

C. Consistent with the National Incident Management System

The City of North Port has adopted the National Incident Management System (NIMS), to include the Incident Command System (ICS) as the standard by which "no-notice events/incidents and pre-planned events will be organized and managed. Based on ICS guidance, and City protocols, ICS may be implemented at any level of emergency, for any situation, and by any qualified individual. The use of ICS includes all the standardized forms approved by the National Wildfire Coordinating Group, or the NIMS Integration Center of the US Department of Homeland Security.

II. OBJECTIVES OF THE PLAN

Our guiding principle will be to communicate facts as quickly as possible, updating information regularly as circumstances change, to ensure the safety of the City and the continued operation of essential services. Our efforts to be simultaneously accurate and quick may mean that some communications are incomplete. We accept this, knowing that how we communicate in an emergency or a crisis will affect public perceptions of the City. Honesty and speed are the most effective means to avoid lasting impact to the institution and widespread second-guessing by the public, which expects immediate access to accurate information. A good offense is the best defense.

At the same time, we realize that in a crisis, people will likely expect us to have more information than we may have. That makes it imperative to speak with accuracy about what we know and not to speculate about details we do not know.

We will use multiple mediums to reach as many of our population as possible with accurate, timely information. This is especially important in the first hours and days of an emergency or a crisis. Our goal is to be open, accountable and accessible to all audiences, while also being mindful of legal and privacy concerns.

The objectives of this Plan are to establish and assign the public information functions for emergency or disaster activations. The public information plan is designed to inform and educate the public about hazards, threats to public safety, and risk reduction through various media. The public information plan provides for timely and effective dissemination of information to protect public health and safety, including response to public inquiries and rumors. Protocols are in place to interface with public officials and VIPs. Procedures include a process for obtaining and disseminating public information materials in alternative formats.

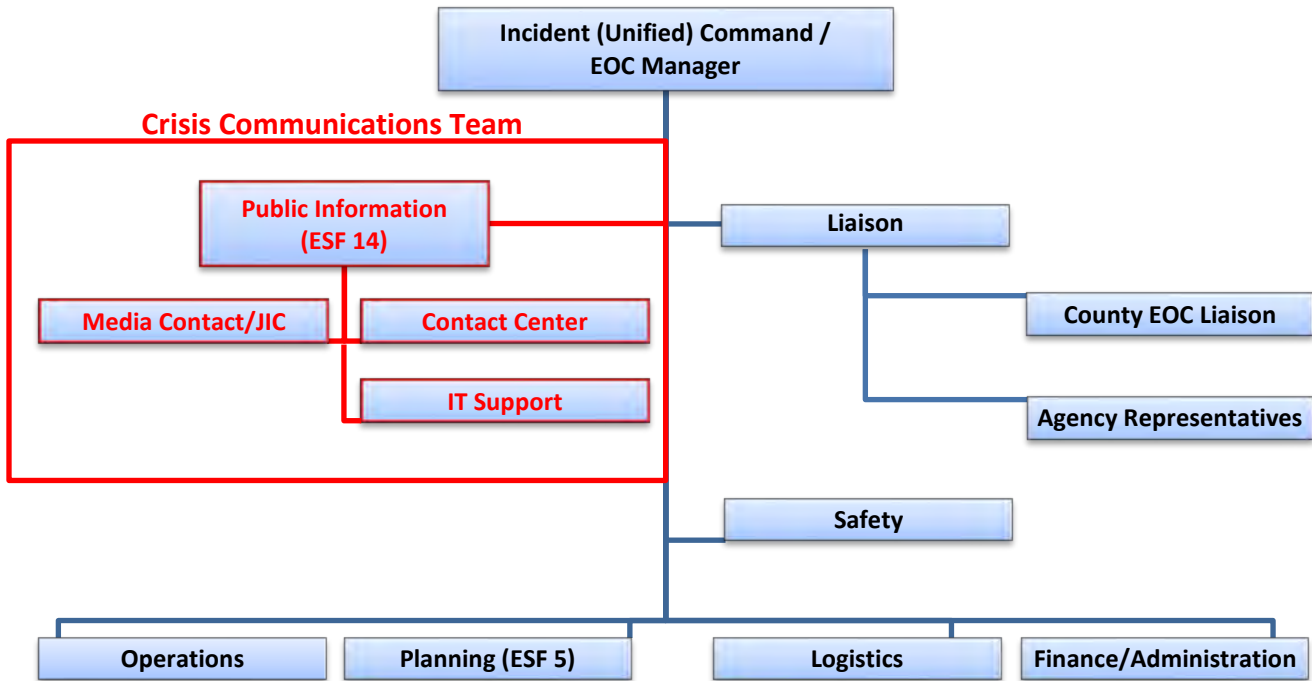
The emergency public information capability includes:

- a central contact facility for the media (i.e., Joint Information Center);
- pre-scripted information bulletins;
- method to coordinate and clear information for release;
- capability of communicating with special needs and diverse populations;
- protective measures guidelines; and
- designated and trained spokesperson(s) who have been qualified to deliver the City's message, appropriate to hazard and audience.

III. ORGANIZATION AND RESPONSIBILITIES

A. Organization

1. The Public Information Officer (PIO) position is established within the Incident Command System Organization as part of the Incident Commander's Command Staff. The City Manager shall appoint the PIO(s) for an event, crisis, or disaster.
2. The PIO is responsible to:
 - a. Provide a two-person successor list to Emergency Management Director.
 - b. Assemble and manage the Crisis Communications Team and function within the Emergency Operations Center.
 - c. Establish and operate a Joint Information Center (JIC) and Contact Center near the EOC, collecting information in the EOC, and from field unit PIOs. The JIC will be composed of PIO elements from each responding department/agency to include but not limited to City, State and Federal agencies.
 - d. Organize, schedule and manage media briefings regarding actual emergency preparedness, response, and recovery operations.
 - e. Prepare and disseminate emergency public information materials incidental to an emergency operation.
 - f. During and following an emergency, serve as the single official point of contact between City government and all media representatives.
 - g. Coordinate public information releases and rumor items with spokespersons for emergency response organizations and representatives of County, State and Federal governmental agencies as may be on scene in any official capacity.
 - h. Assist the essential services in developing and disseminating post-disaster health and safety instructions for the reoccupation of evacuated areas and storm damaged homes.



B. Crisis Communications Team Staffing

1. Public Information Officer, City Manager’s Office
2. Community Outreach Manager, City Manager’s Office
3. Customer Service Coordinators from Public Works and Utilities Departments
4. Information Technology support
5. Others as needed
 - Communicators for Contact Center
 - Field PIOs
 - Writers
 - JIC Facility Manager
 - Media Handlers

The City Manager or his/her designee will add or authorize the addition of other team members as appropriate under the circumstances and availability of staff.

C. Convening the Crisis Communications Team

The Crisis Communications Team will convene when the City Manager declares a Level 1 Emergency (the most severe category that presents significant risk to the

community) or has requested to assess communication needs for Level 2 or Level 3 emergencies. The City Public Information Officer or his/her designee will contact each member by phone and/or email to convene immediately.

Given the urgency of rapid communications, the City's Public Information Officer (PIO) or his/her designee has the authority to begin acting immediately, in consultation with the City Manager or his/her designee, until a broader decision can be made about how the City should proceed.

Also, the Public Information Officer may identify a potential crisis or controversy that is not an immediate emergency and assemble the Crisis Communications Team to prepare a communications strategy – again, as part of a coordinated City response.

Depending on the nature of the emergency or crisis, it may not be possible for the Emergency Leadership Team or their designees to convene prior to the timely notification. Once the Emergency Leadership Team meets and can determine whether the City is facing an emergency, execution of this plan can be adjusted accordingly.

D. Location

The Crisis Communications Team headquarters for most crises will be City Hall Room 243. The City PIO will maintain stocks of press packets, press identification badges, parking passes, and copies of this plan.

Since this room has limited conference capabilities, it may be replaced with another facility in the event of an extended crisis or emergency. The primary back-up location is the George Mullen's Activity Center (GMAC) or Morgan Family Community Center (MFCC). The team may move its headquarters to GMAC or MFCC in several circumstances, including technical limitations at City Hall or a need to be near the news media if they are set up at the disaster scene.

IV. RESPONSE

A. Implementation

The Crisis Communications Team will implement some, or all, of the steps outlined below based on circumstances, coordinating with the Emergency Leadership Team. Throughout a crisis, the team will meet frequently to review changing facts, assess whether key messages are reaching audiences and determine whether strategies need to change. The success of this plan rests on open and frequent communications among the City's Emergency Leadership Team and the Crisis Communications Team.

Contact information for leadership and communication officials is included in documents located on the City government's network P: drive.

- Team Contact List
- Senior Administrators
- Crisis Communications Team

Also, the document Checklist for Crisis Communications includes phone and mobile phone numbers and e-mail addresses for key communications personnel tasked with providing initial response.

In an emergency, our goal is to issue our first communication to key City audiences within 30 minutes of notification of the event, with regular updates as needed. Some situations may require even faster initial communications.

B. Immediate Response

The team will carry out these initial tasks immediately:

1. Convene the Crisis Communications Team for any Level 1 emergency.
2. Send management memo as appropriate.
3. Send media alert as appropriate.
4. Convene other communicators for emergency call center or other needs.

C. Secondary Response

Once the Crisis Communication Team convenes, the following tasks will be carried out by this team:

1. **Designate a secretary** who can maintain meeting notes, to-do lists, information files on the ongoing crisis and other items.
2. **Review and write down known facts** – those that can and cannot be released to the public — and determine whether a response is needed, and if that response is needed for all the City's key audiences. These facts will be used to fill in pre-scripted templates (see appendix) for news releases, text messages and other items that have already been developed. It is critical as the situation changes for new fact sheets to be developed.
3. **Develop several key messages** that will be included in all City communications.

One message typically will address what the City of North Port is doing to ensure the safety of community members. Identify protective measures

guidelines to be taken to provide the public with essential information on evacuation, sheltering, sheltering special needs populations and pet sheltering. [Examples: public messages that include instructions for tornadoes (i.e., sheltering in center of home), mosquito-borne illnesses (i.e., using repellent, wearing clothing that covers arms and legs), etc.] Another may need to be forward-looking and address what we are doing to make sure the crisis, or a problem with our response, doesn't happen again. Determine methods for obtaining and disseminating public information materials in alternative formats (e.g., flyers/ brochures/ handouts; internet; phone/CodeRED; or print, radio or television broadcast).

All the messages should evolve as circumstances change but will always aim to restore and maintain confidence and calm, balancing a sense of concern with resolve and action. Sample messages are included in the approved pre-scripted templates (see appendix). It is critical that City Emergency Leadership Team have copies of the most recent news releases and other messages so everyone is clear on what is being shared with the public.

4. **Determine who will act as spokespeople** – the City Manager will be the public face of the City, while the PIO will run briefings and handle media questions between such formal press gatherings. One or more members of the Crisis Communications Team may communicate key messages specific to their department.
5. **Update CityofNorthPort.com website** is paramount. Consideration should be made for written translations for the foreign-speaking residents of the City. The Team should keep in mind that the parties interested in the information will not always be solely residents and should be aware that seasonal residents and out-of-state family members may also need to be apprised of on-going emergency events.
6. **Open the Contact Center** to handle phone calls using a script developed from the key messages, facts and frequently asked questions (FAQs) the Crisis Communications Team has developed or have been obtained from the Sarasota County Contact Center.
 - a. Staff would initially come from customer service personnel from Utilities, Neighborhood Development Services and Public Works Departments. Supplemental staff may come from other departments.
 - b. Assign staff or volunteer to greet visitors at City Hall reception desk.

- c. Calls to City Hall's main number, 941-429-7000, would be forwarded to the Contact Center.
7. **Develop communications for the City Manager**, as appropriate. The City Manager will be tasked with keeping the City Commissioners informed and up-to-date with the latest key messages. The PIO will be responsible for generating and reviewing communications, including correspondence, e-mail messages, talking points, speeches or op-eds, in consultation with the appropriate members of the Crisis Communications Team. The PIO will then provide the City Manager the communications for distribution.
8. **Coordinate with Sarasota County Communications (ESF-14) and the Charlotte County Public Information Office**, to ensure a consistent message between jurisdictions and to obtain a copy of their frequently-asked questions (FAQs) from their Contact Centers. Attend meetings, via conference call or in-person, as necessary and available.
9. **Establish a Joint Information Center (JIC)** for the centralization of media personnel. The JIC will be composed of Public Information Officer (PIO) elements from each responding department/agency to include but not limited to City, State and Federal. This center will release public preparedness, response, recovery, and mitigation information, as well as certain information on the disaster or emergency at hand such as shelter information, danger zones, and open or closed businesses. The JIC will establish a schedule for press briefings and release other information as needed.
 - a. It is the City's normal practice to permit news reporters and photographers to have open access to the City facilities for conducting interviews after they check in with the Public Information Officer. However, during crisis situations the PIO or his/her designee will determine if access needs to be restricted to avoid disruption to essential services and programs.
 - b. If that determination has been made, then news reporters and photographers will first be directed to a staging area at City Hall. During a severe crisis or in severe weather, the media area may be moved to the Mullen's or Morgan Centers. The PIO may also use other rooms for press events, as needed. The PIO will be responsible for opening this facility, bringing needed supplies (including identification badges, parking passes, media guidelines and press packets) and determining a schedule for 24-hour staffing. (See appendices for JIC Toolkit)

- c. Where practical, pool cameras can be set up for television journalists to share.
 - d. The PIO will coordinate press conferences and related media advisories, as needed. If the emergency requires the opening of a JIC, the PIO will coordinate equipping this center with such items as tables, chairs, podium, sound system, etc. Some emergencies may require that the JIC remain open 24 hours a day for an indefinite period. Should that occur, the City Manager has the authority to use communicators from around City government for staffing. In such a situation, no single person can or should be expected to work around the clock. Rather, the City Manager or his/her designee must tap and empower other communicators to assist with managing the facility and answering media requests.
 - e. The PIO shall arrange for a hearing-impaired interpreter to translate briefings to the deaf and hard-of-hearing community. Consideration should be made for a live or written translation for the Ukrainian and Russian residents of the City.
 - f. A security officer should be assigned to the JIC to prevent access to other parts of the building.
10. **Assign a staff member to monitor media, social media, and online coverage** to anticipate any problems in the way information is flowing to the news media and on the Internet. Summaries of relevant coverage will be provided to the City's Emergency Leadership and Crisis Communications Teams on at least a daily basis, or more frequently as needed.
11. **Schedule media briefings**, a minimum of one media briefing per day, to be held at a time when the information can have the best possible media/public exposure. The PIO shall brief staff members or officials that are requested to speak at the media briefings.
12. **Coordinate all VIP visits** and tours and chaperon them. The PIO will arrange briefings or meetings for visiting dignitaries, and provide the media with information regarding all visits and tours by dignitaries. If visiting dignitaries or public officials visit the EOC, the media shall be allowed access to them upon approval by the Incident Commander and the EOC Manager.
13. **Media Access to the EOC** shall be restricted unless approval is received from the Incident Commander and the EOC Manager. If permission is granted, media shall be escorted always by a member of the PIO team.

14. **Evaluate how to help our community recover**, return to normal and, if needed, regain faith in City government after the trigger event of the crisis is over, in coordination with the City Emergency Team. This may include the need for town hall meetings, letters from the Mayor expressing sympathy, detailed plans to prevent another such crisis, etc. The Community Outreach Manager shall manage this activity.

D. Approvals of outgoing information

Typically, the City uses a collegial approach of multiple approvals before communications pieces, including emails and news releases, are distributed. That system will not work in a crisis. Seconds matter in a crisis, and we will be judged by how quickly we share information with key audiences.

As a matter of policy, the City is committed to trying to meet these expectations. It recognizes the need for unusually crisp decision-making during a crisis to enable rapid, accurate communication in coordination with the institution's broader process. Pre-scripted templates have been approved in advance by City leadership and legal counsel to expedite the approval process during a crisis (see appendices). **Final approval for all communications rests with the Incident Commander or his/her designee.**

E. The End of the Crisis

The City Manager will determine when an emergency has ended and routine communications processes can resume. The decision to declare the emergency over will trigger a review of how the crisis was handled and how communications can improve.

F. After-Action Review

Within 10 days of the end of the event, assess how this plan functioned, address any needed updates and recognize the work of partners whose help was invaluable (i.e., assistance from communicators from other departments/agencies).

Coordinate the review of communications and information with the Emergency Manager who would be preparing the event's After-Action Report and Improvement Plan.

V. TRAINING AND PLAN MAINTENANCE

A. Spokesperson Training

The PIO and Emergency Manager will work together in identifying training opportunities for those selected as City or department spokespersons. At a minimum, spokespersons shall complete the following training programs:

- FEMA, IS-700: Introduction to the National Incident Management System (NIMS)
- FEMA, IS-702: NIMS Public Information
- FEMA, ICS-100: Introduction to the Incident Command System
- FEMA, ICS-200: Basic Incident Command System
- FEMA, ICS-300: Intermediate Incident Command System
- FEMA, G-290: Basic Public Information Course

Resource and time-permitting, spokespersons should complete the following programs:

- Texas A&M Engineering Extension Service, MGT-318: Public Information in an All-Hazards Incident
- National Disaster Preparedness Training Center, PER-300: Social Media for Natural Disaster Response and Recovery

Training records shall be maintained by the Human Resources Division.

As part of this process, the PIO will schedule media training sessions for senior administrators and key team members. After the initial session to train all key officials, sessions will be scheduled annually for people who are new to the Emergency Leadership Team, the Emergency Management Team or the Crisis Communications Team. Every two years, all members will attend a refresher course in media training.

Media training also will be necessary for certain officials who are neither part of the Emergency Leadership Team nor the Crisis Communications Team. The PIO will develop a list of such officials and offer media training on an annual basis.

B. Updating

Annually, this plan will be reviewed and updated as necessary.

The PIO will update phone lists for members of the Emergency Leadership Team and Crisis Communications Team. The PIO will oversee updates and improvements to email lists for internal audiences and updates of media lists and fact sheets.

C. Exercising

The City will conduct an annual drill of emergency management with participation by members of the Emergency Leadership Team. The crisis communications plan will be tested at these times with participation by members of the Crisis Communications Team.

The City, resources permitting, will also conduct at least one test annually of the CodeRED communication tools, which include email, text messaging, website, and phone line.

Appendix G1

Emergency Notifications Scripts

General Guidelines:

- Text messages may not be longer than (140) characters. They may also be used as social media posts.
- E-mail and voice mail messages should generally be the same message.
- There are two categories of notices for text messaging: Emergency and Urgent Situation.
 - **Emergency** – An incident or condition, expected or unexpected, that threatens life or safety and requires immediate action.
 - **Urgent Situation** – An incident or condition that does not pose an immediate threat to life or safety, but that is of a nature where timely receipt of information or instructions may directly affect the well-being of the recipient.
- Keep in mind the principles of public information officers: Be First, Be Right, and Be Credible. In other words, make sure the messages are timely, accurate, and useful.
- Each message should consist of the following three components:
 - Alerting (Attention management) – calling the user’s attention to the issue at hand
 - Informing (Information transfer) – what is happening, and what the user should and should not do
 - Reassuring (Affective or emotional payload) – be aware of the degree of sensitivity as to the audience.

Pre-scripted Messages

TEST

This is a test of City of North Port emergency alert system. If you have received this in error, send email to (individual).

This is a test of City of North Port Emergency Notification Service. This is only a test. In the event of an actual emergency, you would be given brief details and directed to visit the Web at (Emergency Website) for more information and instructions. If you have received this message in error or have difficulty with the transmission of this call, please send email to (individual). Thank you for participating in the City of North Port Alert Emergency Notification System.

ACTIVE SHOOTER /ARMED INTRUDER/SHELTER IN PLACE

Text Message/Social Media Post

EMERGENCY: A suspect with a weapon is (at location). Go to the nearest room and lock door. Follow authorities' instructions.

E-mail Message

City of North Port EMERGENCY! There is a suspect with a [type] weapon (at location). [Shots have been fired.] If you are on site, go into the nearest available room and lock the door. If you are not on (at location), stay away. THIS IS NOT A TEST! Wait for the all clear notification from City of North Port officials.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. There is a suspect with a [type] weapon (at location). [Shots have been fired.] If you are on site, go into the nearest available room and lock the door. If you are not (at location), stay away. THIS IS NOT A TEST! Wait for the all clear notification from City of North Port officials.

BIOLOGICAL THREAT

Text Message/Social Media Post

EMERGENCY: City received a biological threat. Prepare to evacuate. Follow authorities' instructions.

E-mail Message

City of North Port EMERGENCY! A biological threat has been received (at location). If you are near the area, prepare immediately for possible evacuation. Listen for instructions from City of North Port officials and follow them quickly and carefully. For additional information and updates go to (Emergency Website)

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. We have received a biological threat that we deem credible. If you are near (at location), prepare immediately for possible evacuation. Listen for instructions from City of North Port officials and follow them quickly and carefully.

BOMB THREAT

Text Message/Social Media Post

ALERT: City received a bomb threat (at location). Evacuate. Follow authorities' instructions.

E-mail Message

City of North Port EMERGENCY! A bomb threat has been received (at location). If you are near (at location), prepare immediately for possible evacuation. Listen for instructions from City of North Port officials and follow them quickly and carefully. For additional information and updates go to (Emergency Website)

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. We have received a bomb threat that we deem credible. If you are near (at location), prepare immediately for possible evacuation. Listen for instructions from City of North Port officials and follow them quickly and carefully. For additional information and updates go to (Emergency Website)

BOMB FOUND

Text Message/Social Media Post

EMERGENCY: A bomb has been found (location). Prepare to evacuate. Follow authorities' instructions.

E-mail Message

City of North Port EMERGENCY! A bomb has been found on the (location) in the [building]. Avoid the area, prepare immediately for possible evacuation. Listen for instructions from City of North Port officials and follow them quickly and carefully. Repeat, a bomb has been found (at location). For additional information and updates go to (Emergency Website)

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. A bomb has been found (at location). Avoid the location, prepare immediately for possible evacuation. Listen for instructions from City of North Port officials and follow them quickly and carefully. Repeat, a bomb has been found in the (location). For additional information and updates go to (Emergency Website)

CIVIL DISTURBANCE*Text Message/Social Media Post*

EMERGENCY: A violent disturbance is occurring (location). Leave the area. Follow authorities' instructions. (135)

E-mail Message

City of North Port EMERGENCY! A violent disturbance has broken out (location). There is a risk of danger to participants and bystanders. For your own safety, leave the area. If you are not in the area, stay away. Follow instructions from City of North Port officials. For additional information and updates go to (Emergency Website)

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. A violent disturbance has broken out (at location). There is a risk of danger to participants and bystanders. For your own safety, leave the area. If you are not in the area, stay away. Follow instructions from City of North Port officials. For additional information and updates go to (Emergency Website)

CHILD ABDUCTION*Text Message/Social Media Post*

IMPORTANT: A child has been abducted from (at location). For information on the suspect or child go to (Emergency Website)

E-Mail

A child has been abducted from (at location). Call 9-1-1 if the following suspect or child is seen: [type description of suspect and child]

Voice Mail

A child has been abducted from (at location). Call 9-1-1 if the following suspect or child is seen: [Give description of suspect and child]

EARTHQUAKE*Text Message/Social Media Post*

ALERT: An earthquake has occurred. Evacuate all buildings (at location) and remain outside until further notice.

E-mail message

Emergency! An earthquake has just occurred. For you safety, evacuate all buildings (at location). Remain outside for further information. We will provide updates as we receive more information. For additional information and updates listen to NOAA weather radio.

Voicemail message

This is [name, title] with an emergency alert from City of North Port. An earthquake has just occurred. For your safety, evacuate all buildings (at location). Remain outside for further information. We will provide updates as we receive more information. For additional information and updates listen to NOAA weather radio.

EVACUATION

This is the City of North Port. Officers are responding to a report of **(problem)** at **(location)**. Calmly evacuate the building using all available exits. Move away from the building. **(Repeat message three times)**

Problem Resolved: This is the City of North Port. The incident at **(location)** has been resolved and it is safe to return to normal activity. **(Repeat message three times)**

Building Evacuation to a specific direction

This is the City of North Port. Officers are responding to a report of **(problem)** at **(location)**. Calmly evacuate the building. Avoid **(location)**. Go to **(direction/landmark)**. **(Repeat message three times)**

Problem Resolved: This is the City of North Port. The incident at **(location)** has been resolved and it is safe to return to normal activity. **(Repeat message three times)**

EXPLOSION

Text Message/Social Media Post

EMERGENCY: There has been an explosion (at location). Prepare to evacuate. Follow authorities' instructions. (120)

E-mail Message

EMERGENCY! There has been an explosion (at location). If you are in the immediate vicinity, you should evacuate as instructed to by City of North Port officials. If you are not in the area, avoid the area so that emergency units can work unimpeded. Follow instructions from City of North Port officials.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. There has been an explosion (at location). If you are in the building or in the vicinity, you should evacuate as instructed to by City of North Port officials. If you are not in the area, you should keep at a safe distance so that emergency units can work unimpeded. Follow instructions from City of North Port officials.

FIRE

Text Message/Social Media Post

ALERT! There is a fire (at location). Evacuate. If you are not in the area, stay clear of the area.

E-mail Message

City of North Port EMERGENCY! A fire has been reported (at location), if you are in the [building], evacuate immediately. If you are not in the area, stay clear so that emergency units and firefighters can work unimpeded. Follow instructions from City of North Port officials.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. A fire has been reported (at location). If you are in the (at location), evacuate immediately. If you are not in the area, stay clear of the (at location) so that emergency units and firefighters can work unimpeded. Follow instructions from City of North Port officials.

FLOODING*Text Message/Social Media Post*

EMERGENCY: (At location) is currently flooding. Avoid the area. Monitor NOAA weather radio.

E-mail message

(Affected location) is currently flooding. If you are in the area, seek higher ground immediately. For additional information and updates listen to NOAA weather radio.

Voicemail message

This is [name, title] with an emergency alert from City of North Port. (Affected location) is currently flooding. If you are in the area, seek higher ground immediately. For additional information and updates listen to NOAA weather radio.

GAS LEAK*Text Message/Social Media Post*

ALERT: There is a gas leak and threat of fire (at location). Extinguish all flammable items. Follow authorities' instructions. (129)

E-mail Message

City of North Port EMERGENCY! There is a gas leak (at location) posing a threat of fire from accidental ignition. If you are in the vicinity, immediately extinguish any burners or other flames and prepared to evacuate. If you are not in the area, stay away. Follow instructions from City of North Port.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. There is a gas leak in (at location). It poses a threat of fire from accidental ignition. If you are in the vicinity, immediately extinguish any burners or other flames and prepared to evacuate. If you are not in the area, stay away. Follow instructions from City of North Port officials.

HAZARDOUS MATERIALS

Text Message/Social Media Post

ALERT! There has been a hazardous release (at location). Prepare to evacuate. Follow authorities' instructions. (127)

E-mail Message

City of North Port EMERGENCY! There has been a release of a hazardous material (at location). If you are near the are leave now, all others stay away from this location so that emergency units and hazmat teams can work unimpeded. Follow instructions from City of North Port officials.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. There has been a release of a hazardous material (at location). If you are in the area leave now, all others stay away from this location so that emergency units and hazmat teams can work unimpeded. Follow instructions from City of North Port officials.

More Details

At approximately (time) today, a potentially hazardous material was released on the City of North Port in Building "?". As a result, building "?" is being evacuated while City of North Port officials are conducting a thorough investigation.

Occupants of Building "?" should take shelter in (location here) until further notice. All other members of the community should avoid the area. Building "?" will be re-opened once it is determined that the building is safe for occupancy. An update will be posted on this site at (time).

HOSTAGE INCIDENT

Text message/Social Media Post

ALERT– A hostage incident is unfolding in (at location). Evacuate immediately and avoid this area.

ISOLATED SHOOTING / STABBING EVENT, SUSPECT NOT IN CUSTODY

Text message/Social Media Post

City of North Port Alert: A [shooting/stabbing] has occurred (at location). A suspect is NOT in custody, Shelter in place. See email for more information. (138)

Email message

City of North Port Alert: A [shooting/stabbing] incident occurred [approximate time] at (at location). Police are on the scene and investigating. A suspect is NOT in custody. If you are (at location), go into the nearest room and lock door, if you are not (at location) stay away. Contact

9-1-1 if you see anything suspicious or have information on the case. Wait for the all clear form City of North Port officials.

Voicemail message

This is [name, title] with an emergency alert from City of North Port. A [shooting/stabbing] incident occurred [approximate time] (at location). Police are on the scene and investigating. A suspect is NOT in custody. If you are (at location), go into the nearest room and lock door, if you are not (at location) stay away. Contact 9-1-1 if you see anything suspicious or have information on the case. Wait for the all clear form City of North Port officials. For additional information and updates go to (Emergency Website)

ISOLATED SHOOTING / STABBING EVENT, SUSPECT IN CUSTODY

Text message/Social Media Post

ALERT: A [shooting/stabbing] has occurred at [building]. A suspect is in custody. Police are on scene.

Email message

City of North Port Alert: A [shooting/stabbing] incident occurred [approximate time] at [building location]. Police are on the scene investigating. This appears to be an isolated incident and a suspect is in custody. Even so, please be cautious and contact the Police at 9-1-1 if you see anything suspicious or have information regarding the crime.

Voicemail

This is [name, title] with an emergency alert from City of North Port. A [shooting/stabbing] incident occurred [approximate time] at [building location]. Police are on the scene investigating. This appears to be an isolated incident and a suspect is in custody. Even so, please be cautious and contact 9-1-1 if you see anything suspicious or have information regarding the crime.

LIGHTNING

Text Message/Social Media Post

EMERGENCY: Electrical storm! Lightning is striking on or near (location). Stay inside and away from metal objects.

E-mail Message

City of North Port EMERGENCY! Electrical storm lightning is striking on or near (location). Stay inside and away from metal objects until the storm has stopped. Monitor a NOAA weather radio.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. A major electrical storm with powerful and frequent lightning strikes is hitting City of North Port. Seek cover, stay away from metal objects, and remain inside until the storm has stopped. listen to NOAA weather radio.

MICRO BURST*Text Message/Social Media Post*

EMERGENCY: Micro Burst! Micro Bursts are striking (at location). Stay inside and away from doors and windows.

E-mail Message

City of North Port EMERGENCY! Micro Bursts are striking (at location). Stay inside and away from doors and windows until the storm has stopped. For additional information and updates listen to NOAA weather radio.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port. A major storm with powerful and frequent Microbursts is hitting City of North Port. Seek cover, stay away from doors and windows, and remain inside until the storm has stopped. For additional information and updates listen to NOAA weather radio.

MISSING PERSON

ALERT: (Individual) has been reported missing. Contact 9-1-1 with any information.

SEVERE WEATHER

ALERT: A Severe Weather report indicates potential impact to (at location). Monitor NOAA weather radio.

SEVERE ACCIDENT

City of North Port ALERT severe accident has occurred (at location). Check (City of North Port website) and email.

SHELTER IN PLACE

This is the City of North Port. Officers are responding to a report of **(problem)** at **(location)**. Get to a safe place and take precautions until given the all clear. **(Repeat message three times)**

Problem Resolved: This is the City of North Port. The incident at **(location)** has been resolved and it is safe to return to normal activity. **(Repeat message three times)**

STRUCTURAL FAILURE

City of North Port ALERT. A structural failure occurred in _____. Evacuate immediately and avoid this area. Check (Emergency Website) for further details.

SUSPICIOUS PACKAGE

City of North Port ALERT. A suspicious package found (at location). Evacuate immediately and avoid this area.

SUSPICIOUS PERSON

City of North Port ALERT. Police are checking a suspicious person around (at location). Find a secure location, lock doors, and stay away from windows.

TORNADO*Text Message/Social Media Post*

ALERT: A tornado warning has been issued for City of North Port. Listen to NOAA weather radio for more details.

E-Mail Message

City of North Port Alert: A tornado warning has been issued for the City of North Port. A tornado warning means that a tornado has been sighted on the ground and you should take immediate action to take cover. Stay away from windows, doors and walls that face the building's exterior.

- Go to a shelter area, such as a basement or the lowest level in the building;
- If there is no basement, go to the center of an interior room on the lowest level (closet, interior hallway) away from corners, windows, doors and outside walls;
- Put as many walls as possible between you and the outside;
- Get under a sturdy table and use your arms to protect your head and neck
- Do not open the windows.

If a tornado hits and you sustain injuries, or witness others being injured, call 9-1-1.

If the tornado warning is extended or lifted, an update will be posted at (Emergency Website)

Voice Mail Message

This is a City of North Port Alert emergency message for the City of North Port. A tornado warning has been issued until (time) today. A tornado warning means that a tornado has been sighted on the ground and you should take immediate action to take cover. For more details and updates listen to NOAA weather radio.

UNKNOWN SITUATION*Text Message/Social Media Post*

ALERT: Police are investigating an incident (at location). Please avoid the area. See email for more information (126)

E-mail Message

City of North Port EMERGENCY! Police are investigating an incident (at location). Please avoid the area. As we learn more information, we will provide further updates. Again for your safety avoid (at location) until you have been advised its All Clear.

Voicemail Message

This is [name and title] with an EMERGENCY alert from City of North Port! Police are investigating an incident (at location). Please avoid the area. As we learn more information, we will provide further updates. Again for your safety avoid (at location) until you have been advised its All Clear.

WILDFIRE EVACUATION

Text Message/Social Media Post

ALERT: There is a fast moving wildfire near the City. If you are (at location), evacuate immediately to (location).

E-mail Message

City of North Port Emergency! There is a fast moving wildfire near City of North Port. Evacuations have been ordered. If you are on (at location), evacuate immediately to (location). If you are not in the area, stay away.

Voicemail Message

This is [name and title] with an emergency from City of North Port. There is a fast-moving wildfire near City of North Port. Evacuations have been ordered. If you are (at location), evacuate immediately to (location). If you are not in the area, stay away.

WATER or SEWER FAILURE

ALERT: A water/sewer failure has occurred in (at location). The area is temporarily closed until the area is safe for re-entry.

More Details

At approximately (time) today, a water/sewer failure occurred (at location) in the City of North Port. The area will be closed until the area is safe for re-entry. An update will be posted on this site at (time). The City of North Port appreciates your patience, cooperation and understanding during this incident

ALL CLEAR

Text Message/Social Media Post

ALL CLEAR: The situation is all clear, see you email for more information. (87)

E-mail Message

Will need to be written real time after event to include summary of event and any safety tips (if applicable)

Voicemail Message

This will be written real time after event include summary of event and any safety tips (if applicable)

Warning – General Incident

1. The [County/City] Emergency Management [Office/Department] has issued the following warning for those who live, work, or are visiting in [County/the City]
2. An emergency involving [County/city] is currently in progress at: *[Describe location by reference to facility name (if known), street and cross street, other geographic features (rivers, rail lines, etc.), and neighborhood name where appropriate]*
3. Emergency personnel are currently responding to this incident and local officials are monitoring the situation. To keep yourself safe and avoid impeding the emergency response, please avoid this area until further notice.
4. To repeat, an emergency involving [County/City] is currently in progress at: *(Repeat location in 2 above)*. Please avoid this area.
5. Do not call [911] for information about the emergency. Instead, stay tuned to this station for additional official information.

Warning – Road/Facility Closure

- 1. The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
- 2. It has been necessary to close certain local streets and highways due to:
 - flooding
 - heavy accumulations of snow and ice
 - fire / explosion
 - incident involving hazardous materials
 - Other:

- 3. As of _____ today, the following roads have been closed by law enforcement officials:

Street or Route _____ At or Between _____

Please avoid these routes.

- 4. If you must travel, use alternate routes, such as:
- 5. We recommend that you refrain from driving and remain at home due to the extremely bad travel conditions.
- 6. In addition, the following facilities have been closed due to the emergency situation:
- 7. Again, the roads and streets that have been closed are: *(Repeat list in 3 above)*
- 8. Please stay tuned to this station for additional information on the current emergency.

Warning - Shelter-in-Place

1. The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
2. There has been an accidental release of hazardous material that is affecting a portion of the local area. People in the following area must take protective measures:
3. If you are located in this area, do the following immediately in order to protect yourself:
 - A. Go inside your home, workplace, or the nearest building that appears to be reasonably airtight and stay there. Take your pets with you.
 - B. Close all doors, windows, and any fireplace dampers.
 - C. Turn off any heating or cooling system that draws in air from the outside.
 - D. Keep your radio on and tuned to receive emergency announcements and instructions
 - E. Gather items that you may need to take with you if you are advised to evacuate.
4. People traveling in vehicles should seek shelter in the nearest airtight structure. If a suitable structure is not immediately available, travelers should roll up car windows, close air vents, and turn off the heater or air conditioner until they reach a suitable building.
5. If shelter is not immediately available, keep a handkerchief, towel, or damp cloth snugly over your nose and mouth until you get indoors.
6. (If school is in session.)
 Students at the following school(s) are taking shelter at their schools:

Parents should not attempt to pick up students at school until the hazardous situation is resolved and they are advised it is safe to do so.

 Students at the following school(s) [have been/are being] evacuated to other facilities:

Parents should not attempt to pick up students from schools that have been evacuated. Local officials will provide information on where to pick up school children as soon as it is available.
7. If you know of any neighbors or co-workers with hearing or language problems or functional and access needs, please advise them of this message.
8. Please do not call [911] or local emergency officials for information. Stay tuned to this station for additional information.

Special News Advisory – Pre-Evacuation

1. The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
2. Due to the threat of [_____], it may be necessary for people who live, work or are visiting in the certain local areas to evacuate in the near future. This area(s) that may be at risk include:
3. Evacuation is NOT being recommended at this time. Local officials will advise you if evacuation is necessary. However, you should be prepared to evacuate if needed. To prepare, you should:
 - A. Assemble the following emergency supplies:
 - Clothing for your family for several days
 - Bedding, pillows, and towels
 - Prescription medicines & spare eyeglasses
 - Soap and toiletries
 - Baby food and diapers
 - Your address book or list of important telephone numbers
 - Your checkbook, credit cards, and cash
 - Your driver’s license and identification cards
 - A portable radio and flashlight.
 - B. You should also:
 - Gather suitcases, boxes, or bags to hold your emergency supplies.
 - Be prepared to secure your home or office and your property before you depart.
 - Ensure your car is in good shape and you have adequate fuel.
 - Decide where you will go if you must evacuate. Decide with relatives or friends or consider making hotel or motel reservations.
4. Potential evacuation routes from the area(s) at risk include:
5. Potential evacuation routes from the area(s) at risk are described in:
6. If you know of any neighbors or co-workers with hearing or language problems or functional and access needs, please advise them of this message. And if you have neighbors or co-workers who do not have transportation, offer to assist them if you can.
7. We want to emphasize that this is a PRECAUTIONARY message about possible evacuation. Evacuation is NOT being recommended now.

8. Keep your radio or TV on and listen for further information about this situation. Please do not call [911] or local emergency officials for information as this ties up telephone lines needed for emergency operations.

Warning Message – Urgent Evacuation

1. The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
2. Due to [_____] that [threatens/is affecting a portion of the local area, the [County Judge/City Mayor] recommend that people in the following area evacuate immediately to protect their health and safety:

3. Recommended evacuation routes from the area(s) at risk include:

4. Be sure to take essential items such as:

- prescription medicines
- eyeglasses
- identification cards
- checkbook
- credit cards
- valuable papers

Do not delay your departure to collect other belongings.

5. Take your pets with you, but make sure you bring a leash, crate, or cage for them. Some shelters will not accept pets.
6. If you have no means of transportation or if you are physically unable to evacuate on your own, ask a neighbor to assist you.
7. If you know of any neighbors or co-workers with hearing or language problems or functional and access needs, please advise them of this message. And if you have neighbors or co-workers who need help or do not have transportation, offer to assist them if you can.
8. Repeating, local officials recommend the people in the following area(s) evacuate now: *(Repeat the area description in paragraph 2 above.)*
9. Please do not use your telephone except to report a true emergency. Stay tuned to this station for more information and instructions from local officials.

Warning Message – Mandatory Evacuation

1. The [The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
2. Due to [___], the City Commission of the City of North Port, under Florida law, has ordered that people evacuate immediately the following area to protect their health and safety and the health and safety of possible rescuers:
3. Recommended evacuation routes from the area(s) at risk include:

4. Be sure to take essential items such as:

- prescription medicines
- eyeglasses
- baby supplies
- personal care items
- identification cards
- checkbook and credit cards
- valuable papers

Listen to this station for more information on what you need to take with you. Secure your home before you depart.

5. Take your pets with you, but make sure you bring a leash, crate, or cage for them. Remember some shelters will not accept pets
6. Decide where you will stay until the emergency is resolved. Staying with relatives or friends or in a hotel or motel is a good choice.
7. If you can't stay with friends or relatives or find a motel room, listen to this station for more information on the locations of public shelters.
8. If you have no means of transportation or if you are physically unable to evacuate on your own, ask a neighbor to assist you.
9. If you know of any neighbors or co-workers with hearing or language problems or functional and access needs, please advise them of this message. And if you have neighbors or co-workers who need help or do not have transportation, offer to assist them if you can.
10. Repeating, local officials, under Florida law, are ordering the people in the following area(s) to evacuate immediately: *(Repeat the area description in paragraph 2 above.)*

11. Please do not use your telephone except to report a true emergency. Stay tuned to this station for more information and instructions from local officials.

Special News Advisory – Supplemental Evacuation Information

1. The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
2. Due to the threat of [____], local officials have recommended that people who live, work or are visiting in the following areas evacuate to protect their health and safety:
3. Use the following evacuation routes: [list evacuation routes]
4. You should take the following emergency supplies with you:
 - clothing for your family for several days
 - bedding, pillows, and towels for each family member
 - prescription medicines & spare eyeglasses
 - soap and toiletries
 - baby food and diapers
 - address book or list of important telephone numbers
 - checkbook, credit cards, and cash
 - driver's license and identification cards
 - portable radio and flashlight, with extra batteries
5. Plan where you will stay until the emergency is resolved. Staying with relatives or friends or in a hotel or motel is a good choice.
6. If you cannot find another place to stay, temporary public shelters will be/have been opened at:
7. Take your pets with you, but make sure you bring a leash, crate, or cage for them as well as pet food.
8. Secure your property before you depart. Shut off all appliances, except refrigerators and freezers. Lock all doors and windows.
9. Expect travel delays on evacuation routes. If you have a substantial distance to drive, you may want to take drinks and ready-to-eat food in your car in case you are delayed.
10. If you have no means of transportation or if you are physically unable to evacuate on your own, ask a neighbor to help you.
11. If you have neighbors or co-workers, who need help or do not have transportation, offer to assist them if you can.

12. If you know of any neighbors or co-workers with hearing or language problems or functional and access needs, please advise them of this message.
13. Please do not use your telephone except to report a true emergency. Stay tuned to this station for more information and instructions from local officials. If you missed some of the information in this advisory, it will be broadcast again soon.

Special News Advisory – School & Public Facilities

1. The City of North Port Emergency Management has issued the following warning for those who live, work, or are visiting in the City of North Port.
2. The current emergency involving [_____] has affected the operation of the number of local facilities. This advisory is intended to provide you an update on the status of schools, hospitals, nursing homes, and other key facilities.
3. All local public schools have been closed.
4. The following schools have been closed and students [are being/have been] returned to their homes:
5. The following schools have been evacuated and their students relocated to other facilities:

School _____ Students relocated to:

Parents should pick up their children at these host facilities.

6. The following hospitals and nursing homes have been evacuated and their patients relocated to other facilities:

Facility _____ Patients relocated to:

7. The following government offices, parks, recreation areas, and other public facilities have been closed:
8. Please stay tuned to this station for more information and instructions from local officials.
9. And please refrain from using the telephone unless you have a true emergency.

Appendix G2

Joint Information Center Toolkit

News Release Procedures

Procedures:

- News releases come from the Lead PIO and agency PIOs.
- All news releases are sent through the PIO.
- All news releases are to be approved by the Incident Commander.

The Lead PIO and staff are responsible for news releases throughout the course of the incident. These releases should provide a comprehensive, “big-picture” view of the incident and meet the JIC goals established by the Lead PIO.

Agency PIOs can release their own specific information. They can send out their own news releases, or incorporate their information into a Lead PIO release.

Agency PIOs can do their own releases if their information is time sensitive and can't wait for a Lead PIO release to be compiled. A separate news release also can be done if the information is extensive or better served if it is a stand-alone release. For instance, the American Red Cross might choose to have a listing of blood donation locations included in a Lead PIO release, but may want to do a longer, stand-alone release about severe blood shortages.

Agency PIOs who issue separate releases are encouraged to use the template. This template provides for agency PIOs having their agency's title displayed prominently at the top of the release but maintains JIC uniformity to let the news media know the news release is coming from the JIC.

The Lead PIO office and agency PIOs should have them approved by their director and the Incident Commander. Once the news release is ready to be issued to the news media, the writer records the news release on the Release Log maintained by the PIO. This will assign a number to the news release. The PIO will take care of distribution.

News Conferences

General Objectives and Aides:

- Adhere to the talking points.
- Avoid making conference political.
- Utilize the checklist.

When dealing with multiple agencies during an event, it's important to make sure all agencies have a voice in the news conferences without bogging it down with endless speakers and politics. News agencies attend/cover a news conference if pertinent information is offered.

It's essential to plan news conferences well in advance. The JIC should have established basic goals when first formed, and it's important to ensure the news conferences are focusing on those goals.

Basic talking points should be established and stressed up front. Talking points should address the questions foremost in the public's mind and focus on public safety. The talking points should be communicated to all speakers and speakers should be encouraged to stay on message.

Checklist: Opening a JIC**Steps taken by Lead PIO, Assistant Lead PIOs, and JIC Facility Manager**

- Determine who is the Lead PIO.
- Determine the JIC location.
- Assign a JIC Facility Manager (contact Property Maintenance)
- Ensure the chosen location is available and usable.
- Send PIO call-out. Include in message where to meet and who to call for more information.
- Check/assemble supplies and equipment.
- Test equipment. Are phones and faxes working, etc.?
- Maintain roster of responding PIOs and other support personnel.
- Assign PIOs and other personnel to roles as applicable.
- Once a majority of PIOs are present, hold a situation assessment briefing.
- Announce to the news media that the JIC is operational.
- First news release lists JIC personnel, phone and fax numbers etc.

Recommended Items for a PIO “Go Kit”

The following items are recommended for stocking an Agency PIO’s “Go Pack.”

- Agency identification
- Business cards
- Lap top computer (with battery, charger, AC plug) and broadband card
- Smartphone (with charger, AC plug, car charger)
- 800 MHz radio with charger
- Flashlight with batteries
- Inverter (for car accessory outlet)
- Office supplies (pads of paper, folders, pens, pencils, sharpener, stapler, staples, paper clips, tape, scissors, markers, etc.)
- Contact lists (for news media and your agency) and your agency’s news release templates in the following forms:
 - On hard drive of lap top
 - In memory stick
 - Hard copies
- Map Book
- Rain/weather gear
- Safety vest
- Basic personal grooming/hygiene supplies
- Waterproof container to pack it all in

JIC Technology and Equipment

- Printer
- Printer paper
- Flash drive or disks/CDs
- JIS plan and other such file resources
- Copies of various forms and checklists, etc.
- Extra notebooks, pens and pencils
- Blank nametags or something for news media credential IDs
- Corkboard and/or dry erase board
- Thumbtacks, dry erase markers, eraser
- Tape
- Sticky Pads
- Clipboards
- Paperclips, binder clips, rubber bands
- Markers
- Scissors
- Stapler
- Surge protector/power strip and extension cord

**NEWS RELEASE Agency Name Here
from the Joint Information Center**

Phone: (XXX) XXX-XXXX

FAX: (XXX) XXX-XXXX

Time/Date

Contact: John Doe / (386) 123-4567 / Email:

Event Title and Release number (such as: Hurricane AI, Release #22)

HEADLINE WILL GO HERE

Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here.

Body of the release here. Body of the release here.

Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here. Body of the release here.

NEW INFORMATION:

- Bulleted list of the new facts not previously reported.
- Bulleted list of the new facts not previously reported.
- Bulleted list of the new facts not previously reported.

BACKGROUND:

- Bulleted list of facts previously reported of the incident.
- Bulleted list of the facts previously reported.
- Bulleted list of the facts previously reported.

NEXT UPDATE

Time and date of the next press release update and/or press conference.

Information for inclusion in JIC news release

From: Agency Name

POC: Agency PIO

Date and Time Submitted to Lead PIO office: Jan 1, 2009, 1:30 p.m.

LEAD PIO OFFICE NOTES FOR WHEN RELEASE IS COMPLETE:

Release number this information was included in: List
any changes that were made:

AGENCY PIO NOTES TO LEAD PIO OFFICE:

Include here notes/directions for the Lead PIO office news release writer.

TEXT FOR RELEASE:

Put the text of what you want put in the news release here exactly as you would like to see it published so that the news release writer can just copy and paste.

Checklist: Holding a News Conference

- Decide who needs to be present by determining the types of questions that need to be answered. (If no new information is available, do not hold a news conference/briefing.)
- Take deadlines for print/broadcast media and other community events into consideration when scheduling a conference (as a guideline, no later than 3 p.m. for print publications or evening news, no later than 9 p.m. for nightly news).
- Notify news media of time, location and topic of the briefing/conference.
- If possible, include visual aids such as large, colorful maps, photos, etc. (If possible, have visual aids available online for download.)
- Attempt to hold informational portion of the conference to less than 30 minutes and provide ample time to answer news media questions.
- At the end, announce time and location of next news conference.

Room set-up: (Contact Property Maintenance)

- Rows of chairs with wide aisles between them.
- Raised stage areas in the back of the room for photographers.
- Raised stage in front of room complete with podium and possibly a table and chairs for speakers.
- No white background behind stage. Use a color and decorate with plants.
- Visible Web site address and JIC signage/logo.
- Appropriate lighting and sound system.
- Provide water and glasses for speakers.
- Provide easy ins and outs for speakers. (Use security if necessary.)

Speaker tips:

- Arrange speakers in order of appearance.
- Prepare speakers on angles/types of questions they may be asked.
- Discuss how to transition between speakers.
- Discuss management of questions and timeframe.

News Media Inquiry (Intake Form)

No. _____ (in order received)

Date: _____

Time: _____ A.M./P.M.

Inquiry Received from: _____ (person)

Phone: _____

E-mail: Reporter/Editor with: _____ (organization)

Deadline:

Question/Inquiry:

Response:

Is follow-up needed? _____ If so, when? _____

Notes:

First 48 Hours Checklist

Critical First Steps After Verification

Notification

- 1. Ensure your leadership is aware of the emergency and that they know you are involved.
- 2. Use your crisis plan’s notification list to ensure all of the communication chain of command is aware and know you are involved.
- 3. Give leadership your first assessment of the emergency from a communications perspective and inform them of the next steps you are taking.
- 4. Use the internal communication system (e-mail) to notify employees that their agency is involved in the response and that updates will follow. Ask for their support.

Coordination

- 1. Contact local, State, and Federal partners now.
- 2. If potential criminal investigation, contact FBI counterpart now.
- 3. Secure spokesperson as designated in the plan.
- 4. Initiate alert notification and call in extra communication staff, per the plan.
- 5. Connect with the Joint Information Center-make your presence known.

Media

- 1. Be first: Provide a statement that your agency is aware of the emergency and is involved in the response. (Use the Template for Pre-scripted, Immediate Response to Media Inquiries.)
- 2. Be credible: Give directions to media about when and where to get updates from your agency.
- 3. Be right: Start monitoring media for misinformation that must be corrected now.

Media

- 1. Trigger your public information number operation now if you anticipate the public will be seeking reassurance or information directly from your organization. (You can adjust hours of operation and number of call managers as needed.)
- 2. Use your initial media statement as your first message to the public.
- 3. Ensure your statement expresses empathy and acknowledges the public’s concern about the
- 4. Give the pre-cleared facts you have, and refer the public to other information sites, as appropriate.
- 5. Remind the public that your agency has a process in place to mitigate the crisis.
- 6. Start monitoring public calls to catch trends or rumors now.

Partners/Stakeholders

- 1. Send a basic statement to partners (the same as to the media) to let them know you are thinking about them.
- 2. Use prearranged notification systems.
- 3. Engage leadership to make important first phone calls, based on your plan, to partners and key stakeholders to let them know your agency is responding.

Incident Situation Summary

Date and time:

Location:

Nature of incident:

Estimated number of victims:

Potential or critical infrastructure involved:

Evacuation status:

Response status:

Protective measures initiated: Lead

Agency:

Incident Verification

It is important to verify the initial reports of an incident and to make sure that you have correct information. Verified information is a critical factor in making appropriate decisions regarding the incident.

Have all the facts been received? (to the best of your knowledge?)

Did the information collected come from formal, credible sources such as a local, state, or federal agency?

Do you have similar reports about the incident from more than one source?

Is the information from different sources consistent?

Is the characterization of the event plausible?

If necessary, was information clarified through subject matter experts?

If you can answer “yes” to these key checkpoints, you have completed the key steps to verifying the situation.

Note: Verification is not a function for just one person. It requires input from a variety of sources.

Message Development for Emergency Communication

Step 1: Consider the following general factors

- A. Target audience(s) (e.g., general public, health providers):
- B. Purpose of messages (e.g., give facts/update, respond to media):
- C. Method of delivery (e.g., TV interview, press release):

Step 2: Consider the six basic emergency message components

- A. Expression of empathy:
- B. Clarifying facts (Who: What: Where: When: Why: How:)
- C. What we don't know:
- D. Process to get answers:
- E. Statement of commitment:
- F. Referrals (for more information):
- G. Next scheduled update:

Step 3: Decide what are the three most important message topics for you to cover

- A. 1.
- B. 2.
- C. 3.

Step 4: Develop a complete key message for each of your three message topics

TOPIC 1:

Complete message:

Additional supporting facts (if any): Soundbite:

TOPIC 2:

Complete message:

Additional supporting facts (if any): Soundbite:

TOPIC 3:

Complete message:

Additional supporting facts (if any): Soundbite:

Step 5: Check your messages for the following and revise, if needed

- Positive action steps
- Honest/open tone
- Applied risk communication
- Test for Clarity
- Use simple words, short sentences
- Avoid jargon
- Avoid humor
- Avoid extreme speculation
- Avoid judgmental phrase

JIC Equipment and Supplies Checklist

Equipment	Location	How to obtain it
Fax machine (preprogrammed for broadcast fax releases to media and partners)		
Computers (on LAN designated for partners and media)		
Laptop computers		
Printers for every computer		
Copier (and backup)		
Several tables		
Smartphones		
Visible calendars, flow charts, bulletin boards, easels		
Designated personal message board		
Small refrigerator		
Paper		
Color copier		
A/V equipment		
Portable microphones		
Podium		
TVs with cable hookup		
DVD/CD		
Paper shredder		
Copier toner		
Printer ink		
Paper		
Pens		

Equipment	Location	How to obtain it
Markers		
Highlighters		
Erasable markers		
UPS/FedEx/USPS supplies		
Sticky Notes		
Tape		
Notebooks		
Poster board		
Standard press kit folders		
Formatted computer disks		
Color-coded everything (folders, inks, etc.)		
Baskets (to contain items not ready to be thrown away)		
Organizers to support your clearance and release system		
Expandable folders (indexed by alphabet or days of the month)		
Staplers (several)		
Paper punch		
Three-ring binders		
Organization's press kit or its logo on a sticker		
Colored copier paper (for door-to-door flyers)		
Paper clips (all sizes)		

Template for Pre-scripted, Immediate Response to Media Inquiries

Use this template if the media is “at your door” and you need time to assemble the facts for the initial press release statement. Getting the facts is a priority. It is important that your organization not give in to pressure to confirm or release information before you have confirmation from your management and field staff, emergency operations center, etc.

The purpose of this initial press statement is to answer the basic questions: who, what, where, when. This statement should also provide whatever guidance is possible at this point, express the association and administration’s concern, and detail how further information will be disseminated. If possible, the statement should give phone numbers or contacts for more information or assistance. Remember that this template is meant only to provide you with guidance. One template will not work for every situation.

The following are responses which give you the necessary time to collect the facts. Use the Template for Press Statement for providing an initial press release statement after the facts are gathered. NOTE: Be sure you are first authorized to give out the following information.

If on Phone to Media:

- We’ve just learned about the situation and are trying to get more complete information now. How can I reach you when I have more information?
- All our efforts are directed at bringing the situation under control, so I’m not going to speculate about the cause of the incident. How can I reach you when I have more information?
- I’m not the authority on this subject. Let me have (name) call you right back.
- We’re preparing a statement on that now. Can I fax it to you when it’s ready?
- You may check our Web site for background information, and I will fax/e-mail you with the time of our next update.

If in person at incident site or in front of press meeting:

- This is an evolving emergency and I know that, just like we do, you want as much information as possible right now. While we work to get your questions answered as quickly as possible, I want to tell you what we can confirm right now:
- At approximately (time), a (brief description of what happened).
- At this point, we do not know the number of (persons ill, persons exposed, injuries, deaths, etc.).
- We have a (system, plan, procedure, operation) in place for just such an emergency and we are being assisted by (police, FBI, DHS) as part of that plan.
- The situation is (under) (not yet under) control and we are working with (local, State, Federal)

authorities to (contain this situation, determine how this happened, determine what actions may be needed by individuals and the community to prevent this from happening again).

- We will continue to gather information and release it to you as soon as possible. I will be back to you within (amount of time, 2 hours or less) to give you an update. As soon as we have more confirmed information, it will be provided.
- We ask for your patience as we respond to this emergency.

Notes: Depending on the incident, immediate protective measures may need to be provided. Consider using an expression of empathy, if appropriate.

FOR IMMEDIATE RELEASE

CONTACT: (name of contact)

PHONE: (number of contact)

Date of release: (date)

Headline—Insert your primary message to the public

Dateline (your location)—Describe the current situation in two or three sentences.

Insert a quote from an official spokesperson demonstrating leadership and concern for victims. “ ”

Insert actions being taken.

List actions that will be taken.

List information on possible reactions of the public and ways citizens can help. Insert a quote from an official spokesperson providing reassurance. “ ”

List contact information, ways to get more information, and other resources.

List information on possible reactions of the public and ways citizens can help.

Insert a quote from an official spokesperson providing reassurance. “ ”

List contact information, ways to get more information, and other resources.

NEW INFORMATION:

- Bulleted list of the new facts not previously reported.
- Bulleted list of the new facts not previously reported.
- Bulleted list of the new facts not previously reported.

BACKGROUND:

- Bulleted list of facts previously reported of the incident.

- Bulleted list of the facts previously reported.
- Bulleted list of the facts previously reported.

NEXT UPDATE

Time and date of the next press release update and/or press conference.

APPENDIX H**DEBRIS MANAGEMENT****TABLE OF CONTENTS**

- i. [FOREWORD](#)
- ii. [ACRONYMS USED IN THIS DOCUMENT](#)
- iii. [TERMS USED IN THIS DOCUMENT](#)

- I. [LOCAL, STATE AND FEDERAL DISASTER RESPONSE ACTIONS](#)
 - A. Natural Disasters
 - B. Local Disaster Response Actions
 - C. State Disaster Response Actions
 - D. Federal Disaster Response Actions
 - E. Disaster Declaration Process
 - F. Federal Response Framework
 - G. FEMA Debris Mission Response Actions
 - H. FEMA Debris Eligibility Criteria
 - I. FEMA Building Demolition Criteria

- II. [PRE-DISASTER PLANNING](#)
 - A. Identifying Potential Types and Amounts of Debris
 - B. Identifying Temporary Debris Storage and Reduction Sites
 - C. Mutual Aid Agreements

- III. [DEBRIS MANAGEMENT STAFF ORGANIZATION AND RESPONSIBILITIES](#)
 - A. Debris Management Staff Organization
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- IV. [METHOD OF OPERATIONS](#)
 - A. Phase I: Emergency Roadway Debris Clearance
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V. CONTRACTING PROCEDURES

- A. Contracting Office Responsibilities
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VI. SPECIAL DEMOLITION AND DEBRIS REMOVAL SITUATIONS

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- A. Temporary Debris Storage Sites
- B. Household Hazardous Waste
- C. Commercial, Agricultural and Industrial Hazardous and Toxic Waste
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VIII. TEMPORARY DEBRIS STORAGE AND REDUCTION SITE ENVIRONMENTAL CONSIDERATIONS

- A. Air Quality Monitoring
- B. Site Closeout Procedures
- C. Ash, Soil and Groundwater Testing

APPENDICES

- [Appendix A](#) USACE Hurricane Debris Estimating Model
- [Appendix B](#) Privately-Owned Roads in the City of North Port
- [Appendix C](#) Right of Entry Agreement onto Private Property
- [Appendix D](#) Federal-Aid Roads in North Port
- [Appendix E](#) Aerial View of the FDEP Pre-Approved Temporary Debris Storage and Reduction Site
- [Appendix F](#) Aerial View of The City of North Port
- [Appendix G](#) FDEP Temporary Debris Storage and Reduction Site Pre-Approval Letter
- [Appendix H](#) Health and Safety Supplement
- [Appendix I](#) FEMA Letter of Plan Approval

i. FOREWORD

Each year, local officials from hundreds of communities are faced with the task of removing debris caused by natural disasters. In the past 20 years alone, over 700 major disasters have been declared by the President to facilitate Federal assistance to communities struck by hurricanes, tornadoes, floods, earthquakes, wild fires and other natural disasters.

In some cases, debris clearance, removal and disposal actions can be accomplished quickly using community resources augmented by assistance from neighboring communities, State agencies and contractor resources. In many other cases, however, the damage and debris are so extensive that a comprehensive debris clearance, removal and disposal management plan is required to efficiently and effectively control the operations.

The City of North Port developed this document to provide guidance to community leaders in planning, mobilizing, organizing and controlling a large-scale debris clearance, removal and disposal operation. Although this manual has been developed for large-scale debris clearance, removal and disposal operations, portions of all sections can be utilized on smaller operations. The sections are arranged to enable the reader to progress in a logical manner from one planning element to another. It is recommended that the sections be read consecutively because information presented in one section will be helpful in understanding materials presented in subsequent sections. The guide does not address the removal or disposal of material and products from institutional, commercial, recreational, industrial or agricultural sources that contain certain chemicals as defined by the U.S. Environmental Protection Agency to be toxic, flammable, corrosive or reactive.

This Plan will be reviewed on an annual basis to ensure compliance and consistency with local, State and Federal regulations.

ii. ACRONYMS USED IN THIS DOCUMENT

C&D	Construction and Demolition
DMTF	Debris Management Task Force
DOT	Department of Transportation
DPW	Department of Public Works
DRM	Disaster / Operations Recovery Manager
EOC	Emergency Operations Center
EPA	[U.S.] Environmental Protection Agency
ER	Emergency Relief
ESF	Emergency Support Function
FCO	Federal Coordinating Officer
FEMA	Federal Emergency Management Agency
FDEM	Florida Division of Emergency Management
FDEP	Florida Department of Environmental Protection
FDOT	Florida Department of Transportation
FHWA	Federal Highway Administration
GAR	Governor's Authorized Representative
GIS	Geographic Information System
HHW	Household Hazardous Waste
NRF	National Response Framework
PA	Public Assistance
PIO	Public Information Officer
SCO	State Coordinating Officer
SHPO	State Historic Preservation Office
SWM	Department of Solid Waste Management
TDSRS	Temporary Debris Storage and Reduction Site
USACE	U.S. Army Corps of Engineers
USDA	U.S. Department of Agriculture

iii. TERMS USED IN THIS DOCUMENT

Chipping - Reducing wood related material by mechanical means into small pieces to be used as mulch or fuel. Chipping and mulching are often used interchangeably.

Debris - Scattered items and materials broken, destroyed, or displaced by a natural disaster. Example: trees, construction and demolition material, personal property.

Debris Clearance - Clearing the major road arteries by pushing debris to the roadside to accommodate emergency traffic.

Debris Removal - Picking up debris and taking it to a temporary storage site or permanent landfill.

Debris Disposal - Placing mixed debris and/or residue from volume reduction operations into an approved landfill.

Department of Public Works (DPW) - Department typically responsible for clearing debris from the roads and rights-of-way.

Force Account Labor - State or local government employees engaged in debris removal activities.

Garbage - Waste that is regularly picked up by the Department of Solid Waste Management. Example: food, plastics, wrapping, papers.

Hazardous Waste - Material and products from institutional, commercial, recreational, industrial and agricultural sources that contain certain chemicals with one or more the following characteristics, as defined by the Environmental Protection Agency: 1) Toxic, 2) Flammable, 3) Corrosive; and/or 4) Reactive.

Household Hazardous Waste (HHW) - Used or leftover contents of consumer products that contain chemicals with one or more of the following characteristics, as defined by the Environmental Protection Agency: (1) Toxic, (2) Flammable, (3) Corrosive and/or (4) Reactive. Examples of household hazardous waste include small quantities of normal household cleaning and maintenance products, latex and oil based paint, cleaning solvents, gasoline, oils, swimming pool chemicals, pesticides, propane gas cylinders.

Hot Spots - Illegal dump sites that may pose health and safety threats.

Mutual Aid Agreement - An understanding between communities and States obligating assistance during a disaster.

National Response Framework - A document developed to facilitate the delivery of all types of Federal response assistance to States following a disaster. It outlines the planning assumptions, policies, concept of operations, organizational structures and specific assignments and agencies in providing Federal response assistance to supplement the State and local response efforts.

Recycling - The recovery and reuse of metals, soils and construction materials that may have a residual monetary value.

Rights-of-Way - The portions of land over which a facility, such as highways, railroads, or power lines are built. Includes land on both sides of the highway up to the private property line.

Scale/Weigh Station - A scale used to weigh trucks as they enter and leave a landfill. The difference in weight determines the tonnage dumped and a tipping fee is charged accordingly.

Storage Site - A location where debris is temporarily stored until it is reduced in volume and/or taken to a permanent landfill.

Sweeps - The number of times a contractor passes through a community to collect all disaster-related debris from the rights-of-way. Usually limited to three passes through the community.

Tipping Fee - A fee based on weight or volume of debris dumped that is charged by landfills or other waste management facilities to cover their operating and maintenance costs.

Trash - Non-disaster related yard waste, white metals, or household furnishings placed on the curbside for pickup by local solid waste management personnel. A resident must call for pickup. Not synonymous with garbage.

United States Army Corps of Engineers (USACE) - A component of the U.S. Department of the Army which is responsible for constructing and maintaining all military bases and other government-owned and controlled entities. The USACE may be used by FEMA when direct Federal assistance, issued through a mission assignment, is needed.

White Goods – Discarded household appliances such as refrigerators, freezers, air conditioners, heat pumps, ovens, ranges, washing machines, clothes dryers, and water heaters. Many white goods contain ozone-depleting refrigerants, mercury, or compressor oils.

White Metals - Household appliances, such as refrigerators, freezers, stoves, washers and dryers.

I. LOCAL, STATE AND FEDERAL DISASTER RESPONSE ACTIONS

This section provides an overview of local, State and Federal disaster response actions available following a debris-generating natural disaster. Detailed information on the declaration process and eligibility criteria is contained in the Public Assistance Guide, FEMA publication 322.

A. Natural Disasters

1. Hurricanes - The damaging forces of hurricanes and tropical storms include high-velocity winds (up to 150 miles per hour or higher in gusts), storm surge and wave action. The most severe damage frequently occurs in the shore lands adjacent to the ocean. The resultant debris consists primarily of trees; construction materials from damaged or destroyed structures, personal property and sediment. Although the greatest concentration of debris will be located along the shoreline, flooding and tornadoes spawned by hurricanes can cause damage and leave extensive amounts of natural and manmade debris far inland.
2. Tornadoes - Damage from tornadoes is caused by high-velocity rotating winds. The severity of the damage depends on the velocity of the tornado funnel and the length of time the funnel is on the ground. Tornado debris consists primarily of trees, construction materials from damaged or destroyed structures and personal property. Damage is generally confined to a narrow path, which can be up to ½ mile wide and from 100 yards to several miles long.
3. Floods - Damage to structures from flooding is caused either by inundation or high velocity water flow. Structural damage is usually limited to the floodway and the floodplain area immediately adjacent to the river. Heavy structural damage may result from high velocity waters in mountainous areas or failure of a flood control project, such as a dam or levee. Flood debris consists of sediment, wreckage, personal belongings and sometimes hazardous materials deposited on public and private property. Additionally, heavy rains and floods may produce landslides; in such cases, debris consists primarily of soil, gravel, rock and some construction materials.
4. Earthquakes - Damage to structures is caused by shockwaves and earth movements along fault lines. Secondary damage, such as fires and explosions, may result from the disruption of utility systems. Debris consists of building materials, personal property and sediment caused by landslides.

4. Wildfires - Debris from wildfires consists of burned out structures, cars and/or other metal objects, ash and charred wood waste. Large-scale loss of ground cover may lead to mudslides, resulting in clogged drainage structures and possible damage to homes and bridges.

B. Local Disaster Response Actions

1. The City of North Port is the first to respond to a disaster. Response efforts are first directed to activities that protect lives, public health and safety, such as evacuations, sheltering, firefighting, utility restoration and clearing roads of debris. These response efforts may be accomplished with local force account labor and equipment, contractors, volunteers and assistance from adjacent communities.
2. The City of North Port has a Comprehensive Emergency Management Plan (CEMP) which identifies key staff members and their responsibilities for managing and controlling debris clearing, removal and disposal operations. This staff will be immediately activated whenever a natural disaster occurs. Staff members will document the critical decisions made in response to the disaster and provide the debris manager and local, State and Federal officials with a clear plan of action. The debris clearing, removal and disposal operations may extend for weeks or months and insufficient documentation of the evolving plan could cause confusion and inefficiency.
3. Safety assessments will be conducted to identify necessary lifesaving actions, assess the magnitude of damage and determine if additional resources are needed from other local governments and the State. Safety assessments shall be conducted in accordance with State/local health and safety standards/requirements.
4. This Debris Management Plan will divide the City into sectors to assess the extent of debris. Sector boundaries can be determined based on the following criteria:
 - a. Type of debris (structural, trees, sediment and mixed)
 - b. Location of debris
 - c. Volume of debris (large versus small)
 - d. Land use (residential, business, agricultural)

- e. Location of existing and potential temporary storage and volume reduction sites
 - f. Location of existing and potential permanent disposal sites (public and/or private landfills)
5. The damage assessment team will then investigate the damaged areas by sector to record the extent of damage and to identify specific assistance requirements. Damage assessment teams will also estimate the amount and composition of debris observed in each sector and annotate the locations on community maps.
 6. The debris staff will initiate actions to assess the availability of local, State, Federal and other resources to provide immediate and long-term assistance. Experience has shown that resources will not be used effectively unless work assignments and cleanup priorities are coordinated and controlled by the debris manager (Solid Waste Manger). The designated local debris manager will have total responsibility and authority for managing the debris cleanup operation. The following are examples of local, State, Federal and other resources available for cleanup activities:
 - a. Local Government - The City of North Port maintains equipment, such as trucks, rubber tire loaders, graders, chippers, chain saws, small cranes, dozers and backhoes with experienced operators who can be used to open roads and remove debris. Temporary hires may be added to provide additional labor and equipment operators for 24-hour-a-day operations, if needed. The principal advantage to using local government force account equipment and operators is their lower cost and flexibility in assignment. This equipment generally represents the only resources the community can immediately commit to an emergency debris clearance and cleanup operation.
 - b. Mutual Aid Agreements - A Mutual Aid Agreement is an agreement among neighboring communities (and possibly States) to provide assistance to one another in time of need. The operators and equipment of neighboring communities can be used to quickly augment local force account resources and have many of the same advantages.
 - c. State Agencies - The National Guard, Florida Department of Transportation (FDOT) and Florida Department of Environmental Protection (FDEP) have equipment and personnel that may provide limited assistance on a short-

term basis. The FDOT is normally responsible for debris clearance and removal on State roads. This assistance may be obtained by contacting the Florida Division of Emergency Management (FDEM) through the Sarasota County Emergency Operations Center (EOC).

- d. Volunteers - Historically, volunteers have played a significant role in large-scale debris removal operations. Volunteer organizations can assist private property owners or provide financial assistance in the removal of debris from private property. Additionally, community organizations, such as civic clubs, student groups and neighborhood organizations have proven to be a tremendous community resource in past disasters. To provide for maximum utilization of these resources, community leaders will be prepared to organize volunteer groups and keep the debris management staff informed of their activities. They will document the number of volunteers, the type of work performed and the hours worked. Sponsoring organizations will ensure that personnel are properly equipped and that common sense safety precautions are followed.
- e. Federal Agencies - The U.S. Army Corps of Engineers (USACE) may be able to respond for up to 10 days without a Presidential Declaration. Additionally, the Federal Highway Administration (FHWA) and the National Resource Conservation Service (NRCS) may provide grant assistance to State and local governments for debris clearing, removal and repair of roads on the designated Federal Aid System and clearing debris from canals.
- f. Contractors - Labor and equipment for debris clearance, removal and disposal will be available from local contractors. Following a major disaster, emergency contracts can be executed to augment local force account resources.
- g. Immediately following a disaster, engineering personnel on the debris management staff will explore alternative courses of action and update the existing Debris Management Plan based on the initial safety assessment, available resources and any new information. The updated plan can be hand-written initially and later converted to a more formal document.

- h. Maps of the affected area will be annotated to identify damaged sectors, locations of key facilities and disposal sites and distributed with the updated Debris Management Plan. Information will also be entered into a Geographic Information System (GIS) database, if available.

C. State Disaster Response Actions

1. When the response efforts appear to be beyond the capability of the City, Sarasota County normally provides the next level of assistance by declaring a State of Emergency. Florida Division of Emergency Management typically evaluates the disaster situation and provides advice to the Governor on the availability of State resources that could assist local efforts. State resources may consist of the FDOT, the Florida Department of Health, the FDEP and the National Guard. These State resources can assist the City in its immediate response efforts, including debris clearance, removal and disposal activities.

D. Federal Disaster Response Actions

1. The Robert T. Stafford Disaster Relief and Emergency Assistance Act, Public Law 93288, as amended, was enacted into law in 1988. It is the centerpiece of the Federal Disaster Relief Programs that are managed by the Federal Emergency Management Agency (FEMA).
2. When a disaster occurs and a locality has responded to the best of its ability but is or will be overwhelmed by the magnitude of the damage, it turns to the State for help. The Governor, after examining the situation, may direct that the State's Emergency Plan be executed. If it is evident that the situation is or will be beyond the capabilities of local and State resources, the Governor may request that the President declare that an emergency or major disaster exists in the State under the authority of the Stafford Act.
3. While the request is being processed, local and State government officials will not delay in taking actions to respond to whether there will be Federal assistance. Commensurate with the supplemental nature of Stafford Act assistance, the Federal share of eligible recovery expenses for declared disasters is normally limited to 75% of eligible costs.

E. Disaster Declaration Process

1. The request for a declaration must come from the Governor or Acting Governor. Before sending a formal request letter to the President, the Governor will request that FEMA conduct a joint preliminary safety assessment (PDA) with the State to verify actual damages and estimate the amount of supplemental assistance that may be needed. After this assessment is complete and if the Governor believes that Federal assistance is necessary, the Governor sends the request letter to the President, through the Regional Director of the appropriate FEMA Region. The request is reviewed by the Regional Director and forwarded with a recommendation to the Director of FEMA who, in turn, makes a recommendation to the President. The President makes the decision whether or not to declare a major disaster or emergency. After the initial declaration, the person designated by the Governor as the Governor's Authorized Representative (GAR) may make requests for additional areas to be eligible for assistance or for additional types of assistance as deemed necessary.
2. After a declaration is made, FEMA will designate the area eligible for assistance and the types of assistance available. With the declaration, a Federal Coordinating Officer (FCO) is appointed who is responsible for coordinating all Federal disaster assistance programs administered by FEMA, other Federal departments and agencies and voluntary organizations. At the same time, the Regional Director or one of his/her staff will be appointed as the Disaster Recovery Manager (DRM), who is responsible for managing the FEMA assistance programs. The same person most often holds these two titles (FCO and DRM). Similarly, the State Coordinating Officer (SCO) and the GAR are generally the same person.

F. National Response Framework

1. The National Response Framework (NRF) is implemented to coordinate the overall delivery of Federal assistance to disaster victims. The plan is organized functionally by Emergency Support Functions (ESF). Each ESF is composed of a lead or primary agency and supporting agencies grouped together to deliver specific services and resources. Delivery of assistance under the Framework is flexible to best meet the unique needs of each disaster. Under the NRF, emergency assistance is provided either by Federal agencies under their own authorities, or under reimbursable mission assignments from FEMA.

G. FEMA Debris Mission Response Actions

1. In catastrophic disasters, FEMA can provide direct Federal assistance to support local and State governments in performing some of the activities related to debris clearance, removal and disposal. The response capabilities of the local and State governments must be clearly exceeded before this level of assistance can be provided. The work that can be performed under this authority is limited to emergency work and debris removal under Sections 402(4), 403 and 407 of the Stafford Act. The assistance will be subject to the cost-sharing provisions as specified in the FEMA-State Agreement. The grantee will reimburse FEMA for the appropriate non-Federal share of the cost of the work, including any administrative costs of the performing Federal agency. According to Florida Statutes Chapters 119 and 257, the Applicant must retain records up to five years after the close of the contract.
2. Following a Presidential Declaration, FEMA may elect to use its mission assignment authority to have the USACE contract for and manage debris clearance, removal and disposal operations. At the County-level, the debris and removal mission assignment is coordinated by Emergency Support Function #3 (ESF #3), Engineering and Public Works liaison officer. Within the structure of the City EOC, the Debris Management Team Leader, through the Public Works Group Supervisor, will be responsible for all functions of debris management.
3. The Debris Management team will meet regularly with FEMA, FDEM, and Sarasota County officials to collect and coordinate information necessary to accomplish the assigned mission.
4. ESF #10, Hazardous Materials liaison officer from the County, will also be included in all debris planning to coordinate the cleanup, transportation and disposal of hazardous materials.

H. FEMA Debris Eligibility Criteria

1. FEMA Public Assistance (PA) funds may be used for debris clearance, removal and disposal operations. Debris that may be eligible for clearance, removal and disposal includes trees, sand and gravel, building wreckage, vehicles and personal property. The debris must be a direct result of the declared event, must occur within the designated disaster area and must be the responsibility

of the applicant at the time of the disaster. Debris removal may be eligible when it:

- a. Eliminates immediate threats to lives, public health and safety;
 - b. Eliminates immediate threats of significant damage to improved public or private property; and/or
 - c. Ensures economic recovery of the affected areas to the benefit of the community-at-large.
2. Debris Removal from Public Property - In general, debris that is on public property must be removed to allow continued safe operation of governmental functions and, therefore, is eligible under one of the first two criteria. However, not all public property clearance is necessarily eligible. Debris that is blocking streets and highways is a threat to public health and safety because it blocks passage of emergency vehicles or it blocks access to emergency facilities such as hospitals. Debris in a stream or flood channel may cause flooding from a future storm. If such flooding would cause an immediate threat of damage to improved property, removal of the debris only to the extent necessary to protect against an event that could reasonably be expected to occur within five years may be eligible. On the other hand, removal of fallen trees in a forested or wilderness area is not normally eligible.
3. Debris Removal from Private Property - Debris on private property (to include privately-owned roads and gated communities) is treated somewhat differently. Debris removal from private property is the responsibility of the individual property owner or homeowners' association, aided by insurance settlements and assistance from volunteer agencies. Most insurance policies, such as, homeowner, fire and extended coverage policies, have specific coverage for debris removal and demolition of heavily damaged structures. FEMA assistance is generally not available to reimburse private property owners for the cost of removing debris from their property; however, an eligible local or State government may pick up and dispose of disaster-related debris placed at the curb by those private individuals. The extent and duration of this type of work is carefully controlled. FEMA, State and local officials will agree on a time frame during which pick-up from the curb will be eligible for PA funding.

If the debris on private business and residential property is so widespread that public health, safety, or the economic recovery of the community is threatened, the actual removal of debris from the

private property may be eligible. In such situations, the work normally must be done or be contracted for by an eligible applicant, and a Right-of-Entry Agreement must be in-place to permit access onto private property.

4. Debris Removal from Drainage Structures - Debris removal from certain drainage structures may have to meet the following criteria:
 - a. Reservoirs - Removal of disaster-related debris from reservoirs may be eligible if evidence is provided to FEMA that the reservoirs were regularly cleaned prior to the disaster and the pre-disaster level can be established. In addition, removal of debris that poses an immediate threat of clogging or damaging intake or adjacent structures may be eligible.
 - b. Natural Streams - Debris removal from natural streams normally is not eligible for assistance. Only debris that causes a threat to lives or public health and safety or damage to improved property from an event that could be reasonably expected to occur within five years is eligible. Any work in natural streams must also be closely reviewed and monitored to minimize undesirable environmental effects. This type of work will often require a Clean Water Act Section 404 permit from the USACE. The Natural Resources Conservation Service also has the authority to clear streams of debris.
 - c. Engineered Channels and Debris Basins - Debris removal from engineered channels, lined or unlined and debris basins may be eligible. Knowing the pre-disaster level of debris in the channel or basin is required in determining the amount of disaster-related debris. Such facilities must also have had a regular schedule of debris removal to be eligible for clearance.
5. Debris Removal from Roads and Highways - Debris may be removed from roads and highways, including the travel lanes, roadside ditches and drainage structures and the maintained right-of-way.
 - a. Federal Highway Administration's (FHWA) Emergency Relief (ER) Program provides financial assistance to States to repair or reconstruct national highways that are damaged by natural disasters or catastrophic failures from

an external cause. This funding speeds the restoration of major highways following a disaster. Only highways that are normally eligible for under FHWA's Federal Aid Highway Program are eligible for assistance from the FHWA ER program. While ER funds repairs to "Federal Aid" eligible highways, the Federal Emergency Management Agency (FEMA) addresses all other disaster-damaged roads and public infrastructure.

The City of North Port has a number of Federal-Aid roads (See Appendix D) which require special attention for debris clearance. Eligible debris clearance criteria includes: the restoration of essential traffic along Federal-Aid roads (first push), the first pass collection of debris on Federal-Aid roads, minimize the extent of damages to public property, or protect a remaining facility from further damages. Documentation and Reimbursement requirements differ from those used by FEMA. The Detailed Damage Inspection Reports must be used, and to receive full reimbursement for debris removal activities, all work must be completed within 180 days.

Debris clearance and removal from roadways not under the jurisdiction of the FHWA-ER program may be reimbursable under FEMA's Public Assistance program.

- b. Privately-Owned Roads (See Appendix B) - FEMA will not reimburse expenses incurred for debris clearance, removal or disposal from privately-owned roads (to include gated communities), with the following exceptions: (1) The applicant must provide documentation stating that disaster-generated debris on private property in the designated area constitutes an immediate threat to life, public health, and safety, and (2) the applicant has legal responsibility to remove debris from private property through the Right-of-Entry Agreement (Appendix C).
 - i. In 2008, the City has adopted an ordinance which, during a declared emergency, authorizes the City to enter onto privately-owned roads and into gated communities, and collect debris to ensure public health and safety (See City of North Port Codes, Article IV, Disaster Debris Management).

6. Debris Removal from Recreational and Wilderness Areas
 - a. The removal of debris from public parks and recreational areas used by the public is eligible when it affects public health or safety or proper utilization of such facilities.
 - b. Hazardous trees within a naturalized area of public parks or golf courses that are unstable and leaning into the areas used by the public are eligible for removal only, not replacement. Normally, trees requiring removal are flush cut at the ground. Hazardous limbs are also eligible for removal. Hazardous limbs are defined as limbs greater than two inches in diameter that are still hanging in the tree and are threatening a public-use area, such as a trail, sidewalk, road, or golf cart path.
 - c. Generally, stump removal is not considered eligible for reimbursement, except if the stump itself is determined to be a hazard, as when the tree has been uprooted. When eligible, stump removal is accomplished by the least expensive means.
 - d. A tree with more than 50% of the tree crown destroyed or damaged, a split trunk, or broken branches that expose the heartwood, or a tree that has been felled or uprooted is eligible for removal, especially if it is in a location approximate to or within public-use areas. If the applicant chooses to attempt to save a tree that has any of the conditions described above that justify its removal, the expense is the applicant's.
 - c. Removal of debris that does not pose a health or safety threat in wilderness or forested areas of these facilities is not eligible for FEMA reimbursement.

I. FEMA Building Demolition Criteria

1. FEMA Public Assistance (PA) funds may be used for demolition and removal of resulting debris under the authority of Section 403, Essential Assistance, of the Stafford Act. This section allows for the demolition of unsafe structures that pose an immediate threat to life, property, or public health and safety.
2. Health and Safety - The primary responsibility for demolition of unsafe structures lies with the owner. Most insurance policies have

a clause that provides payment for demolishing houses damaged beyond repair. The applicant must certify that no insurance exists that would pay for the demolition, the owner is not capable of paying for such work and there is no opportunity to recoup the cost from the owner. If permission for demolition is not provided, the applicant must follow legal condemnation. The applicant must obtain right of entry and hold harmless agreements prior to start of the work. The ownership of the property remains in the hands of the original owner.

- a. All properties must be reviewed in accordance with environmental, historic and other Federal laws being provided for the demolition. The State will provide each applicant with a demolition checklist that must be completed and returned by the applicant prior to any actual demolition of the property.
- b. The checklist will contain a list of items with which the applicant must comply prior with demolition. These items include verification that the applicant has obtained right of entry and hold harmless agreements and investigated insurance coverage and liens. The applicant will also be provided forms pertaining to historic preservation, environmental, hazardous materials and wetland/floodplain requirements. The applicant must sign and return these forms indicating he/she has read them and understands that it is his/her responsibility to ensure full compliance with all local, State and Federal rules and regulations.
- c. The applicant must provide FEMA with a copy of the bid specifications, final property list and bid results prior to demolition. FEMA reviews the bid specifications to ensure that the specifications contain the proper scope of eligible work.
- d. Once all necessary information has been received and reviewed, FEMA will notify the State that they have no objection to the applicant's proceeding with the demolition of the properties identified in the demolition bid. The State provides the applicant with written authorization to proceed with the demolition project.
- e. Eligible work under health and safety demolition is limited to the demolition and removal of structures that may

represent an immediate threat to public health and safety. An inspection team may inspect each facility to make a determination on the structural integrity of the unit and review the reports of the applicant's building inspector. Structures that are in danger of collapse, thus representing an immediate threat to life and safety, are documented and recommended as eligible for demolition.

- f. Other eligible project descriptions under the health and safety category may include cleaning septic systems, backfilling basements, capping wells, clearing debris and any other actions to mitigate an immediate threat to public health and safety.
- g. Items such as slabs on grade, driveways, fences and structurally sound buildings normally are not eligible for demolition under the public health and safety category because they do not represent an immediate threat to public health and safety.
- h. At the completion of the project, the State notifies FEMA that the applicant's demolition has been completed. A joint FEMA/State team inspects the applicant's demolition sites to ensure full compliance with the project description identified in the report form.
- i. Eligible costs may include any cost incurred by the applicant to complete the demolition project. Costs for monitoring and managing demolition and removal activities are eligible costs. Necessary costs of requesting, obtaining and administering the grant assistance, however, are covered by the Sub grantee Administrative Allowance and are not identified separately as eligible costs.

See the Public Assistance Guide, FEMA publication 322, for more information on the Sub-grantee Administrative Allowance.

- 3. Archaeological Sites or Historic Structures - listed on the National Register of Historic Places or potentially eligible must be reviewed by the State Historic Preservation Officer (SHPO) prior to any demolition. Information and forms outlining the necessary step-by-step procedures to obtain SHPO approval will be provided to the applicant by the State. It is the applicant's responsibility to obtain SHPO approval before demolishing any possible historic structures

or performing ground disturbing activities. Costs associated with the applicant's obtaining SHPO clearance may be eligible.

- a. Each structure must be inspected for hazardous materials, such as asbestos or lead-based paint, prior to actual demolition of the structure. Normally, a representative of the applicant, such as a building inspector or fire marshal, will conduct a preliminary inspection of each structure. If hazardous materials are determined to exist in the structure, the applicant will contract with a certified asbestos or lead-based paint inspector. If the inspection report indicates the presence of asbestos material or lead-based paint, a certified abatement contractor must remove the material prior to demolition. Costs associated with asbestos and lead-based paint inspections, asbestos abatement and third party air monitoring may be eligible.
4. Attractive Nuisance - Private structures that are found to be structurally sound but require extensive repair are normally not eligible for demolition. The primary responsibility for securing the structures until repairs are completed lies with the owners. The applicant must certify that the structure is a health and safety threat to the public if the owners have no insurance or are not capable of paying for such work.
 - a. The applicant must obtain rights of entry and hold harmless agreements prior to start of the work.
 - b. Eligible work under this category is limited to securing the perimeter of the structure to prevent entrance into the structure and may include fencing, where necessary. FEMA can provide funding for materials (plywood or fencing) and labor as part of the project description to secure the structures from access. This funding meets the required need to protect life and safety.
5. Health Hazard - The project description on the report may include the cost of cleaning or removing items such as household hazardous waste (HHW), debris, food, chemical hazardous waste, freezers and refrigerators that may contain Freon and other items that may represent a health hazard.
 - a. The applicant must certify that no insurance exists that would pay for such work, the owner is not capable of paying for such work and there is no opportunity to recoup the cost

from the owner. The applicant must obtain rights of entry and hold harmless agreements prior to start of the work.

II. PRE-DISASTER PLANNING

Major natural disasters can generate enormous volumes of debris in short periods of time. Debris clearance, removal and disposal operations must be implemented quickly to expedite recovery operations and to protect public health and safety of the local population. However, the speed of initial debris clearance, removal and disposal operations depends upon the depth of pre-disaster planning by City, County and State emergency managers.

A. Identifying Potential Types and Amounts of Debris

1. Before selecting temporary debris storage and reduction sites, it is necessary to identify the areas that may be subject to widespread devastation (such as parks, tree-lined streets, orchards, groves, nurseries, mobile home parks and residential, commercial and industrial areas) and the types and amounts of resultant debris. The types and amounts of debris can be forecast on a land-use basis (such as rural, urban, industrial, or mixed use) and by examining historic records. For example, if an area has not been affected by a major storm for a long period of time, a dense tree canopy may have developed, which will result in a large amount of vegetative debris following a major storm.
2. In addition, the U.S. Army Corps of Engineers (USACE) Emergency Management staff has developed a modeling methodology designed to forecast potential amounts of hurricane-generated debris using actual data from Hurricanes Frederic, Hugo and Andrew. The estimated quantities produced by the model have a predicted accuracy of $\pm 30\%$. The primary factor used by the model is the number of households in a developed urban/suburban area. The other factors are cubic yards of debris generated per household, vegetative cover, commercial density and precipitation.

B. Identifying Temporary Debris Storage and Reduction Sites

1. All activities associated with massive debris clearance, removal and ultimate disposal operations depend upon the availability of suitable temporary debris storage and reduction sites. Identifying these potential sites before a major natural disaster will expedite debris removal and subsequent volume reduction and disposal actions. The Public Works Director and staff will work closely with other City, County and State officials to develop and maintain

current listings of potential debris storage and reduction sites in areas prone to natural disasters. Pre-disaster site selection teams will include local officials who are familiar with the area. The teams will also consult and coordinate with local residents, conservation agencies and environmental groups, if possible, to help identify potential problems. Considerations for evaluating potential temporary debris storage and reduction sites include the following:

- a. Use public lands first to avoid costly leases. Pre-designated sites will be on public property and consist of between 50-100 acres, depending on anticipated needs. Consider locations with respect to noise, traffic and the environment. Use private land only if public sites are unavailable.
- b. When selecting public or private sites consider pre-existing conditions that will have to be restored upon site closeout. Have attorneys review leases for private land to avoid extensive damage claims upon site closeout.
- c. The required size of the site will depend on the expected volume of debris to be collected and planned volume reduction methods. As a general rule, larger sites mean fewer sites and, hence, easier site closeout. However, larger sites may create logistical problems.
- d. Environmentally sensitive areas (such as wetlands, areas with endangered animal and plant species, critical habitats, well fields and surface water supplies and historic/archaeological sites) will be avoided. However, if use of such areas is unavoidable, procedures for temporary waivers will be developed. Consult and coordinate with local residents, conservation agencies, environmental groups and agencies and the State Historic Preservation Office (SHPO).
- e. Public acceptability is largely dependent upon the activities planned for the site. Smoke from burning, around-the-clock light and noise from equipment operation, dust and traffic are tolerated early in the disaster, but may have to be curtailed later. Whenever possible, avoid locating near residential areas, schools, churches, hospitals and other such sensitive areas. Notify citizens early about planned site activities and possible ramifications.

- f. Look for sites with good ingress/egress to accommodate heavy truck traffic.
- g. Consider adjusting traffic signals to accommodate projected truck traffic on critical haul routes.
- h. Identify nearby landfills and determine their present debris capacity and logistical capabilities. Also include any State-to-State or county-to-county agreements.
- i. Identify recycling possibilities, such as timber agreements, mulch and chip disposal in the agriculture community and fuel sources for incinerators or heating. Recycling success will depend on the types of debris and the local recycling environment.
- j. Review local and State ordinances on such items as tarps and tailgates on trucks, traffic control, truck priority, curfew, defining roadway rights-of-way and load limits. coordinate with responsible agencies to develop waiver procedures to expedite emergency operations.
- k. Clearly show critical routes and priorities for clearing debris on local maps. Target emergency routes for City, County, State or Federal clearance efforts. GIS will be used as an efficient mapping tool, if available.
- l. The following questions will help to identify and prioritize appropriate sites based on local requirements and conditions.
 - i. Potential Site Ownership
 - Are public lands available?
 - Are private land lease terms long enough?
 - Are private land lease terms automatically renewable?
 - Does the private land lease include a landscape restoration agreement?
 - ii. Potential Site Size
 - Is the site large enough to accommodate the planned debris storage and/or reduction methods?

- Will the site configuration allow for an efficient layout?
- iii. Potential Site Location
- Does site have good ingress/egress?
 - Does site have good transportation arteries?
 - Does site have open, flat topography?
 - Does site have wetlands? If unavoidable, require the contractor to flag the area and establish buffers and/or sediment barriers.
 - Does site have public water supplies, including well fields and surface waters?
 - Does site have threatened and endangered animal and plant species?
 - Does site have threatened and endangered species' critical habitats?
 - Does site have rare ecosystems?
 - Does site have historic sites?
 - Does site have archaeological sites?
 - Does site have sensitive surrounding land use, such as residential, school and church?
2. To ensure the City has a site where debris may be temporarily stored in the immediate aftermath of a storm, one temporary debris storage and reduction site (TDSRS) has been designated, and received pre-approval by the Florida Department of Environmental Protection (FDEP). The following is a list of the City's pre-approved TDSRS. See Appendix G for pre-approval letters:
- a. Greenland Street Golf Course

C. Negotiating Mutual Aid Agreements

1. Mutual aid agreements will be negotiated and in place prior to a disaster. Mutual Aid providers normally consist of local and county Departments of Public Works from around the State under the Statewide Mutual Aid Agreement. These departments usually offer their assistance in the form of equipment and personnel. All requests for mutual aid will be placed through the Sarasota County EOC.
2. The mutual aid agreement will outline the responsibilities of each party, including the types of costs that will be reimbursed. To ensure that mutual aid providers adhere to the agreements, the

Public Works Director will assign coordinators to monitor each provider. The coordinators will be responsible for tracking the type of work performed and type of equipment used by each mutual aid provider.

3. To be eligible for FEMA assistance, reimbursement by the receiving party must not be conditioned on receipt of FEMA assistance.

III. DEBRIS MANAGEMENT STAFF ORGANIZATION AND RESPONSIBILITIES

This section provides guidelines for debris management staff organization and defines the key responsibilities involved in pre- and post-disaster planning and information management.

A. Debris Management Staff Organization

1. The size and composition of City staff organized to deal with debris clearance, removal and disposal issues will depend on the magnitude of the disaster and the size of the community. A pre-disaster debris planning staff may be quite small; however, following a major disaster, additional staff members may be required. The City debris staff will be comprised of full-time personnel supplemented with personnel from other staffs and agencies. It is essential that prospective staff members have as much training as possible and interface with other agencies responsible for debris clearance, removal and disposal activities, such as the Florida Department of Transportation (FDOT), Federal Emergency Management Agency (FEMA) and the U.S. Army Corps of Engineers (USACE), prior to any anticipated disaster.

City staff will be comprised of personnel to perform the following generic functions:

- a. Administration - Housekeeping supplies, equipment, funding and accounting.
- b. Contracting and Procurement - Bidding requirements, advertisements for bids, instructions to bidders and contract development.
- c. Legal - Contract review, rights of entry permits, community liability, indemnification, condemnation of buildings, land acquisition for temporary staging and reduction sites, site closure/restoration and insurance.

- d. Operations - Supervision of government and contract resources and overall project management.
- e. Engineering and Public Works - Detailed safety assessments, identification of project tasks, assignments of tasks, preparation of cost estimates, scopes of work and specifications for debris contracts.
- f. Public Information - Coordination of press releases, maintenance of contacts with local organizations, individuals, the media and drafting of public notices for debris clearance, removal and disposal operations.

B. General Debris Staff Responsibilities

1. Primary response personnel will be alerted before the disaster and deployed either before or immediately after the disaster. If possible, they will remain part of the debris management staff throughout the disaster cleanup to maintain continuity during the debris clearance, removal and disposal operations. The staff will develop disposal plans either in advance or concurrently with the removal efforts.
2. The Department of Public Works Operations Manager will be responsible for coordinating all removal and disposal activities. The staff will need to coordinate closely with all City, County, State and Federal agencies responsible for disaster response and recovery operations. They may also need to contract removal and disposal services and develop requests for additional assistance from FEMA. They must be prepared to react to evolving needs and available technologies.
 - a. The Operations Manager must be able to assess debris based on:
 - i. Quantities and types.
 - ii. Rural, urban and/or agricultural locations.
 - iii. Number of private homes, mobile homes, public facilities and commercial establishments damaged or destroyed.
 - iv. Miles of roads affected, categorized by type, such as rural, urban and/or expressways.
 - v. Quantity and types of household hazardous wastes.

- b. The Operations Manager and debris staff will be prepared to take the following actions:
- i. Develop a reliable initial assessment of the disaster's magnitude. This will enable decision-makers to assess human and material requirements for responding to the debris disposal situation.
 - ii. Coordinate with local procurement agencies to establish a contracted work force capable of expeditiously removing the debris.
 - iii. Identify the need to consult with an environmental or historic preservation specialist to assure that legal requirements in these areas are met.
 - iv. Evaluate damaged utility systems, structurally unstable buildings, and other heavily damaged public facilities and determine if they will be expeditiously repaired, deactivated, barricaded or removed. Activities involving these facilities will be structures that constitute a public health and safety threat may be deferred if access to the area can be controlled.
 - v. Develop a Debris Management team using City personnel to monitor the debris removal activities. This will allow the Solid Waste Manager and debris staff to obtain accurate information about the progress of the debris removal operation. The field inspection team becomes the debris manager's "eyes and ears" in the field. The cost for personnel to monitor debris removal activities is reimbursable.
 - vi. Conduct daily update briefings with key debris managers and other officials. Ensure that all debris clearance, removal and disposal actions are reviewed and approved by the local debris manager.
 - vii. Ensure that a debris staff representative attend all briefings to resolve any coordination problems between County, State and Federal debris removal efforts and City debris removal and disposal efforts.
 - viii. Coordinate with City police and FDOT to ensure that traffic control measures expedite debris removal activities.
 - ix. Develop a traffic control plan. Traffic control devices will not be allowed to return to normal operations until all debris operations have been completed. Debris clearance and removal activities must be

given priority at every major intersection to ensure efficient and timely debris operations.

- x. Establish and maintain direct coordination with other City, County and State officials and their staffs with regard to priorities and areas of responsibility. Finally, the debris staff must be able to inform the public in understandable terms of the magnitude of the disaster and about actions the public must take.

C. Building and Engineering Staff Responsibilities

1. The debris management staff will have access to qualified engineering expertise to assess the full scope of the debris clearance, removal and disposal effort. The City may need to hire a local engineering firm if the Public Works' Engineering Division staff is heavily involved with the repair and replacement of publicly-owned facilities damaged by the disaster.
2. The Building Department and Engineering Division within the Department of Public Works will need the following personnel:
 - a. Inspectors to inventory the type and amount of debris within the disaster area.
 - b. Engineers to plan the work for maximum efficiency and to develop the government debris clearance, removal and disposal cost estimate.
 - c. Contract specialists and draftspersons to prepare contract scopes of work and/or specifications. Engineering personnel perform tasks such as the following:
 - i. Define the project scope, if the This is done by specifically defining the disaster area in which work is to be the debris to be removed and disposed of for that area.
 - ii. Determine if the existing landfills have sufficient capacity for the expected volume of debris from the preliminary safety assessment.
 - iii. Consider using pre-identified temporary storage sites for reducing the volume of debris by incinerating, grinding and/or recycling to reduce the impact on landfill sites.
 - iv. If sufficient landfill capacity is not available, identify alternative landfill sites.

- d. The engineering staff might be required to develop scopes of work and specifications if local contractors are used for debris clearing, removal and disposal operations. The following factors will be considered because they will affect overall contract costs:
 - i. Truck Size - Smaller trucks require more trips for a given volume of debris, which increases the driver's time, fuel cost, maintenance and depreciation cost.
 - ii. Length of Haul - The longer the haul, the greater time required to reach the disposal site, which increases costs for labor and equipment.
 - iii. Traffic Conditions - Hauling over heavily traveled streets and roads also increases labor and equipment costs.
 - iv. Roadway Conditions - Poor roadway conditions, such as potholes, unpaved surfaces and deteriorated pavement, increase maintenance costs as well as operational costs.
 - v. Temporary/Permanent Site Access - Single lane unpaved access roads increase cost because of delays caused by restrictions for allowing loaded and empty trucks to pass. In addition, poor weather conditions may make the access road impassable.
- e. Once the above factors are considered, the limits of the disaster area can be clearly defined. For debris contracting and debris management purposes, the boundaries of the disaster area will be delineated on a map. The map will identify the work area or areas to be included in the contract. If multiple contracts are used, this element of contract preparation is extremely important to ensure that the contractors remain in their assigned work areas. The establishment of the work area is also important to identify key items, such as ingress and egress routes to the debris removal area, location of utilities and distance to temporary staging and reduction sites or permanent landfill sites.
- f. A quantitative estimate is extremely important to clearly identify to contractors the scope of work they are being asked to perform. This estimate will also assist in preparing project cost data.
- g. Quantity estimates, or "takeoffs," will be made in the units that are going to be used in establishing contract line-item

prices. Units will be selected based on the method that will be used to verify pay quantities for work under the contract. For debris removal, units are normally "cubic yards," "tons," or "each." Therefore, if a contractor is to be paid for the volume of material removed from a work site by approximate measurement of that volume, the unit will be cubic yards. If it is more convenient to pay the contractor by weighing the trucks used to haul the material to a disposal site, the units will be by weight (tons). If the contractor is to be paid by the number of items removed from the project site (i.e., trees, damaged vehicles, etc.), the unit will be established as "each." Because it is difficult in most debris operations to estimate the weight of material to be removed, the general rule is to use volume and number measurements. An estimate of length, width and height of the material can approximate the volume of debris in question. The amount of material to be removed and the accuracy desired in the estimate will determine the procedures used for this volume measurement. For a large-scale disaster, marking the area on a scaled map and approximating an average height can derive an approximate quantity estimate. When developing quantity estimates, inspectors will be instructed to note the type and location of the debris.

- h. The next step is to develop unit cost data after the quantity, location and type of the debris within the disaster area has been established. Several sources exist that may assist in determining the proper unit price to be used once the project scope has been defined and contract type selected. Many nationally published cost data reports do not take into account the abnormal conditions encountered by contractors in debris operations. They also do not account for the increase in cost due to a disaster or emergency situation. The following sources will be able to provide current cost data necessary to develop the unit price estimate:
 - i. Area engineering and construction firms.
 - ii. Local public works departments.
 - iii. FDOT and Florida Forest Service. The development of a government estimated unit price includes many variables. Factors that influence the unit price are the type of debris, method of removal, distance to

the disposal site, routes to the disposal site, permitting requirements and work-site limitations.

- i. The safety assessment report will provide the engineering staff with information that addresses all items to be included in the government cost estimate. These items will include the actual work that may be required to accomplish the specific tasks.
- j. The individuals performing the government cost estimate will put themselves in the place of the contractor who is being asked to submit a price for the work. This is very important in a disaster situation, where there might be a considerable variety of factors affecting the contractor's pricing. After the cost estimate is prepared, the scope of the project can be defined and the type of contract selected.
- k. The engineering staff will have an understanding of FEMA debris eligibility criteria and be aware that FEMA will only reimburse "reasonable costs" associated with debris clearance, removal and disposal actions. Moreover, plans must include a means to monitor the contractor's activities and certify the accuracy of the amount of debris handled.

D. Public Information Management

1. Public Information Officer (PIO) - A full-time public information specialist will be assigned to work with the debris management staff. This specialist will be responsible for coordination with other public information agencies to keep the public informed on all debris removal activities and schedules. Immediately after a disaster and continually throughout the removal and disposal operation, this person will arrange public notification of all ongoing and planned debris clearance, removal and disposal activities. Notification will include information bulletins, hotline responses, public service announcements for radio and television, handbills, door hangers and newspaper notices in the language(s) prevalent in the affected communities. Provision will be made to compensate for disruption of normal means of mass communication caused by power outages following a major natural disaster.
2. Public Participation - Public notices will emphasize actions that the public can perform to expedite the cleanup process, such as the following:

- a. Separating flammable and nonflammable debris.
 - b. Segregating household hazardous waste.
 - c. Placing debris at the curbside.
 - d. Keeping debris piles away from fire hydrants and valves.
 - e. Reporting locations of illegal dump sites or incidents of illegal dumping.
 - f. Segregating recyclable materials.
3. Important Debris Removal Activities - The public will be kept informed of the following debris removal activities and regulations:
- a. Debris pick-up schedules.
 - b. Disposal methods and ongoing actions to comply with State and Environmental Protection Agency regulations.
 - c. Disposal procedures for self-help and independent contractors.
 - d. Restrictions and penalties for creating illegal dumps.
4. Questions from the Public - The information officer will develop a means of responding to debris removal questions from the press and local residents. Questions that might be asked include the following:
- a. What is the pick-up system?
 - b. What is the schedule of pick-up in my area?
 - c. Who will pick-up and how can I contact the operator?
 - d. Will I separate the different debris materials and how?
 - e. How do I handle household hazardous waste?
 - f. What if I am elderly or infirm?

IV. METHOD OF OPERATIONS

This section discusses how the City will implement a large-scale debris clearance, removal management by dividing the operation into two phases. Phase I consists of clearing the debris that hinders immediate lifesaving actions and that poses an immediate threat to public health and safety. Phase II consists of removing and disposing the debris that hinders the orderly recovery of the community and poses less immediate threats to health and safety. The entities responsible for implementing the strategy will be identified in advance.

A. Phase I: Emergency Roadway Debris Clearance

1. The City EOC will identify in advance which routes are essential to emergency operations. This will allow them to direct local efforts and to target areas for possible State/Federal assistance.
2. The Public Works Director and staff will be aware of City, County and State agencies' capabilities to provide service for emergency roadway debris clearance. Available resources will include the following:
 - a. Municipal force account workers and equipment.
 - b. Florida Department of Transportation (FDOT) workers and equipment.
 - c. Local contractors hired by the City.
3. The Public Works Department Solid Waste and Operations Divisions will be responsible for debris clearance activities. These divisions have the necessary personnel, equipment and contracting experience.
4. A day before a foreseeable disaster, the Solid Waste portion of the debris management plan will be put into effect. Solid Waste and Operations will disperse vehicles throughout the area to minimize the risk of vehicle damage. Anticipated supplies and equipment necessary to complete the work will be purchased or rented. A strategy will be developed to clear all designated emergency roads using all available local force account labor and equipment, military personnel, mutual aid providers and local contractors.
5. Following a disaster, the top priority is to clear major arterial roads, including roads leading to health care facilities. The Public Works Director will organize participants based on personnel and equipment and assign each of them responsibility for certain roadways. At least one lane will be cleared on each arterial, major and secondary road as soon as possible. Available public property will be identified for use as temporary storage areas, with preference to locations that would be less expensive to restore, such as open fields and parks.
6. Debris may include tree blow-down and broken limbs; yard trash such as outdoor furniture and trash cans; utility poles, power, telephone and cable television lines, transformers and other electrical devices; building debris, such as roofs, sheds, block walls

and chimneys; and personal property, such as clothing, appliances, boats, cars, trucks and trailers.

7. In Phase I, roadway debris is quickly moved to the side of the road to provide access into devastated areas. No attempt is made to remove or dispose of the debris, only to provide clear access routes to allow for:
 - a. Movement of emergency vehicles.
 - b. Law enforcement.
 - c. Resumption of critical services.
 - d. Safety assessment of critical public facilities and utilities.
8. The requirements for City services increase dramatically following a major natural disaster. Therefore, after emergency access will be provided to emergency care centers, and police and fire stations, the next priority is to open access to other critical infrastructure, such as schools, municipal buildings, water treatment plants, and wastewater treatment plants.
9. The difficulty of assessing the amounts and types of debris to be removed from key routes slows the deployment of the right mix of equipment and labor, especially when contracting for additional resources. Moreover, local equipment and labor capabilities could be limited. Therefore, the City will be prepared to execute Time and Material (i.e., equipment rental) contracts during Phase I operations. They allow the flexibility to respond to local hot spots at a reasonable cost. Time and Material contracts for services will be very limited in scope and duration. For example, a local construction company may be awarded a Time and Material contract as a stop-gap measure to clear debris from the right-of-way until the contracted debris removal companies are fully mobilized under unit price contracts.

See Section V for additional information on contracting procedures.

B. Phase II: Debris Removal and Disposal Responsibilities

1. The initial roadside piles of debris created during Phase I will become the dumping locations for additional yard waste and other storm-generated debris. Therefore, a private contractor may be required to perform the final disposal of all disaster-related debris from the rights-of-way or storage and reduction sites. The contract will cover hauling and disposal of debris at an approved landfill. If

local contractors are used, the area will be divided into definable sectors for control purposes and bids solicited based on the sectors and the estimated cubic yards of debris in each. Contractors are then responsible for hauling debris from the public rights-of-way to assigned temporary storage areas or approved landfills.

C. Debris Issues Requiring Close Coordination

1. The Public Works Director and debris staff will be faced with a monumental task of coordinating removal of debris that represents a significant health and safety hazard to the community. Expedient removal of debris from in front of residents' homes becomes a high priority because it is a positive sign that recovery actions are underway and expedites the replacement of key utilities located along public rights-of-way.
2. The following issues will require close coordination when removing debris from public rights-of-way:
 - a. Curbside Separation - Good curbside separation is critical in the early stages of cleanup. However, even when the homeowner takes time to separate flammable, nonflammable and other hazardous debris, many contractors place everything into the truck or push the curbside debris to a cul-de-sac or an intersection and load it there. Therefore, contractor performance will be closely monitored, with emphasis being placed on curbside sorting. This monitoring will pay dividends in the long run because good sorting will make the final disposal much faster and cheaper.
 - b. Monitoring Contractor Activities - To ensure that contract haulers are in compliance with their contract, the City has contracted with a company to perform debris monitoring services. The monitors will be responsible for initial load tickets where trucks are loaded and verifying the estimated amount of debris hauled at the temporary storage area or landfill. Solid Waste officials will provide overall supervision. The contractor must provide a notarized listing of the measured bed size in cubic yards and license plate number of all trucks to be used to move debris upon award of the contract.
 - i. Once a truck is loaded with debris at the work site, the site monitor will fill out a load ticket, which

usually consists of one white original copy and two carbon copies (yellow and pink). The load tickets issued by the monitors are the basis for debris contractor payment.

- ii. Each ticket will include the following information:
 - Preprinted ticket number.
 - Contract number.
 - Prime Contractor's name.
 - Date.
 - Truck number.
 - Truck capacity in cubic yards.
 - Load size, either cubic yards or tons.
 - Truck driver's name.
 - Debris classification.
 - Burnable
 - Non-burnable
 - Mixed
 - Other
 - Zone/Sector.
 - Dumpsite location.
 - Loading time (from work site).
 - Dumping time (at disposal site).
 - Loading site monitor.
 - Dumping site monitor.

- c. The load ticket copies will be processed in the following manner:
 - i. White copy - The pickup site monitor will fill in the date, truck number, contractor and departure time and sign the ticket. The pickup site monitor will keep the white copy and give the other two copies to the driver.

 - ii. Yellow copy - On arrival at the disposal facility, the driver will give both the yellow and pink tickets to the disposal site monitor. The disposal site monitor will fill out the arrival time, estimate the amount of material on the truck in cubic yards and sign the ticket. The disposal site monitor keeps the yellow ticket.

- iii. Pink copy - This copy will be returned to the driver, who then provides it to the contractor.
 - d. At the end of each day, the white and yellow copies will be submitted to Solid Waste personnel, who will match and compare the tickets. These procedures can be modified to meet local requirements.
 - e. The Federal Emergency Management Agency (FEMA) will reimburse only reasonable costs. Therefore, it is essential that the City be responsible for monitoring debris clearance, removal and disposal activity and be prepared to certify the accuracy of the amounts of debris hauled.
3. Special Monitoring Issues

The issues described below highlight the need for Solid Waste officials to closely monitor large contracted debris clearance, removal and disposal activities. The issues focus on some of the problems associated with major debris disposal contracts and justifies the need to monitor activities at local temporary storage and reduction sites and at final disposal landfill sites. Many of the questionable actions can be attributed to human error or they may be deliberate attempts to defraud the Federal government. In either case, it is essential that Public Works Department contracting officials work closely with FEMA to ensure that contractor's perform the services required and that the services are performed at a reasonable cost.

- a. Site delays - Delays in moving debris and traffic problems on adjacent highways can be caused by the need to establish initial tare weights for each truck going across the landfill site's scale. Tare weights will be established using other scales, if available, before debris hauling begins.
- b. Overweight or unsafe trucks - FDOT enforcement officers will be available to issue fines for overweight vehicles and/or obvious safety hazards.
- c. Tipping fees - Vehicles other than those under contract to the DPW and USACE will be required to pay the normal tipping fee at the landfill. Commercial containerized haulers will not be allowed to dump for free because they normally include the tipping fee as part of their overall costs.

- d. Excessively wet debris - Local site monitors will monitor temporary storage area loading sites to ensure that contractors do not add excessive amounts of water to debris prior to loading. This practice will add unnecessary weight to the load, resulting in overpayment based on weight. Minimal amounts of water may be necessary to keep down dust.
- e. Excessive dirt and sand - Local site monitors will monitor storage area loading sites to ensure that contractors do not add excessive amounts of non-debris related dirt and sand. Excavating dirt and sand from a site will add unnecessary weight to the load, resulting in overpayment based in weight and will add to the cost of site restoration. Some minimal dirt pickup is unavoidable.

D. Recycling

The City of North Port shall recycle debris to the greatest extent possible. Local site monitors will identify opportunities for the City to recover materials from disaster debris for beneficial uses. The salvage value for various recyclable or reusable debris materials depends on the regional recycling markets and the City will consider selling disaster debris for a salvage value to offset the cost of eligible debris removal work by the revenues received from the sale of the debris.

V. CONTRACTING PROCEDURES

This section highlights the procedures necessary to contract additional private debris clearance, removal and disposal resources and services. Contracting for labor and equipment may be necessary if the magnitude of the emergency debris clearance, removal and disposal operation is beyond the capabilities of local force account or contracted resources, State resources, mutual aid agreements and volunteer labor and equipment. The Public Works Director and staff will be familiar with contracting procedures, as they will be required to define specific debris removal tasks and recommend specific contract types based on the magnitude of the debris clearance, removal and disposal operation and the site clearance and restoration requirements.

To ensure the availability of qualified contractors in the immediate aftermath of a disaster, when appropriate resources are scarce, the City has competitively bid, reviewed and awarded debris clearance and removal contracts with three privately-owned companies, and a single contract for debris monitoring. These

contracts will be reviewed, extended/or re-bid on a three-year cycle. During the current contracting cycle, the following contractors have been pre-qualified:

Debris Removal

- CrowderGulf (Primary)
- TAG Grinding Services, Inc. (Secondary)
- AshBritt, Inc. (Tertiary)

Monitoring:

- Rostan Solutions (Primary)
- Thompson Consulting Services (Secondary)

A. Contracting Office Responsibilities

The City's Purchasing Division will have key personnel available to develop, process and administer debris clearance, removal and disposal contracts. The responsibilities entail the following actions:

1. Determine the type and method of contracting needed to satisfy specific debris clearance, removal and disposal requirements of an unusual and compelling urgency.
2. Solicit bids, evaluate offers, award contracts and issue notices to proceed with all contract assignments.
 - a. To ensure objectivity and fairness in selection of a contractor, bidders may be rated by criteria to reflect their qualifications for Disaster Experience, Financial Strength, Operational Plan, and Compensation Schedule.
3. Supervise the full acquisition process for service and supply contracts and the oversight of contract actions to ensure conformance to regulatory requirements.
4. Coordinate with the Public Works Department.
5. The Emergency Operations Center and Public Works Department must take care to avoid the solicitation of assistance from the general public and giving the impression that compensation will be provided for such assistance. Such instances would be considered by FEMA as a request for volunteer resources and treated in that manner. In addition, there are a number of other issues involved with such a solicitation, including licensing, bonding, insurance, the

potential for the communities to incur liability in the event of injury or death, supervision and certification of work done.

B. Contracting Procedures for Immediate Response (Phase I)

Most State procurement regulations allow for abbreviated contract procedures when the Governor declares a State of Emergency. In emergency situations, City Code authorizes the waiver of certain procurement regulations, and grants the City Manager signature authority on contracts to a specified dollar amount.

Although normally not an ideal alternative, the Time and Material (i.e., equipment rental) contract is an acceptable method of contracting during Phase I. Under this type of contract, the contractor is paid on the basis of time spent in accomplishing a particular task. The contract will be set on an hourly basis for the equipment and operator because Phase I debris operations involve primarily equipment usage. Work orders will be issued for a particular piece of equipment and operator for a set number of hours. To ensure competitive bidding, hourly rates will be solicited from several contractors. Additionally, for simplicity, bid requests will specify that the hourly rate includes the operator, fuel, maintenance and repair. This will greatly simplify bookkeeping, auditing and monitoring of the work.

1. A Time and Material contract will clearly state that:
 - a. The price for the equipment applies only when the equipment is operating.
 - b. The hourly rate includes the operator, fuel, maintenance and repair.
 - c. The community reserves the right to terminate the contract at its convenience.
 - d. The community does not guarantee a minimum number of hours.
 - e. The contract has either a dollar ceiling or a not-to-exceed number of hours clause.
2. Time and Material contracts will be limited to a maximum of 70 hours of actual emergency debris clearance work and will be used only after all available City and State government equipment has been committed. Time and Material contracts for debris clearing, hauling and/or disposal will be terminated once the designated not-to-exceed number of hours is reached. On occasion, Time and Material contracts may be extended for a short period when

absolutely necessary, for example, until appropriate Unit Price contracts have been prepared and executed.

3. Supervision of Time and Material contracts is extremely important. Work inspection reports will be prepared each day. These reports will clearly state the amount of work accomplished that day in quantitative terms, such as the number of cubic yards of debris hauled, the type and number of trucks used and the number of hours worked.
4. Load tickets may be used if debris is being hauled based on cubic yards under a Time and Material contract as a way of checking contractor efficiency. Solid Waste inspection personnel will verify certification of work performed and copies of the inspection reports will be furnished to the contractor to expedite the submittal of invoices for payment.

C. Contracting Procedures for Recovery Operations (Phase II)

It will become readily apparent during Phase I whether the magnitude of the debris clearance, removal and disposal operation is within the capabilities of local force account, mutual aid agreements, State and limited contract resources. If it is determined that the situation is beyond the capabilities of existing resources, immediate action must be taken to develop an organization to administer and manage Phase II recovery operations using contractors.

The primary factors influencing Phase II recovery operations are the composition and volume of debris, the size of the area of debris concentration, the location of temporary storage and volume reduction sites, the location of public or private landfill disposal sites, the need for private property debris removal and requirement for site closure and restoration.

D. Unit Price and Lump Sum Contracts

1. Unit Price and Lump Sum contracts are recommended after the immediate response phase.
2. Cost plus percentage-of-cost contracts and contingency contracts are not eligible for FEMA reimbursement and will not be used.
3. A contract proposal will always be structured to encourage prompt performance of the work; however, the proposal will not, by its

requirements, place heavy or unusual risk factors on the contractor. Such risk will be reflected in higher bids.

4. Unit Price Contract - The unit price contract uses construction units and prices for these units to develop line item costs and total contract cost. The unit price contract is used when the scope of work is difficult to define and is based on estimated quantities. It will be noted that the total "bottom line" of the contract could increase or decrease depending upon the accuracy of the final unit quantity. For this reason, it is as important to properly estimate units as it is to estimate unit cost. Change orders to adjust the estimated bid quantity to that quantity actually removed may be issued during or at the end of the contract.
 - a. The advantage of the unit price contract is that the scope of work can be easily increased or decreased, because unit pricing for the work accomplished is established at the time of the bidding process. The contract also provides line items for the contractor to list all charges associated with the work, thereby taking the guesswork out of the contractor's bidding procedure. The units used in the unit price contracts will be as accurately estimated as possible; otherwise, the final amount of the contract could be significantly different from the contract bid received at the bid opening.
 - b. Unit Price Contract Verification - Proper and efficient management of a temporary storage and reduction site or landfill disposal site is essential with unit price contracts because the site becomes the focal point for quantity verification for payment.
 - i. Well-organized and managed inspection stations will be established near the entrance of the site. When the contract unit trucks as they enter the site. If the contract unit of measurement is cubic yards, inspection stands will be built for the inspection of loaded trucks.
 - c. Payment under a unit price contract is normally made on the basis of load tickets. The following procedures will be followed when using load tickets:
 - i. Load tickets will be treated as accounting forms.

- ii. A work site supervisor will examine all contract trucks leaving a designated contract area and record the following information on the load ticket:
- Preprinted ticket number
 - Contract number
 - Prime Contractor's name
 - Date
 - Truck number
 - Truck capacity in cubic yards
 - Load size, either cubic yards or tons
 - Truck driver's name
 - Debris classification
 - Burnable
 - Non-burnable
 - Mixed
 - Other
 - Zone/Sector
 - Dumpsite location
 - Loading time (from work site)
 - Dumping time (at disposal site)
 - Loading site monitor
 - Dumping site monitor
- d. To expedite filling out the form, all contract trucks will have the contractor's name or initials, the truck number and the measured capacity of the truck, as determined by a government representative, clearly visible on both sides of the vehicle.
- e. The work site monitors will retain one copy of the form, which is returned to the operations office and give two copies to the truck driver after completing the initial information.
- f. The temporary storage and reduction site or disposal site monitor will estimate the volume of debris and note arrival time and volume in cubic yards on the load ticket. The truck driver will keep one copy and the site monitor will keep the other. The site monitor's copy will be returned to the operations office to be matched against the work site inspector's copy for pay verification. The truck driver's copy is the basis of contract billings.

requires the contractor to conduct a one-time pass to remove all debris from the curbside and deposit it at the local landfill for a fixed fee.

- ii. Pass Method Example - Debris will be placed at the curbside as homeowners repair their homes over a 3-week period. The scope of work requires the contractor to conduct a minimum of three passes throughout the community during the 3-week period (one pass per week) and deposit the debris at the local landfill for a fixed fee.

E. Contract Monitoring Responsibilities

1. The Public Works Director will assign a debris staff member to work directly with other City officials in developing and monitoring debris clearance, removal and disposal contracts. The following will be considered when developing and monitoring local debris removal and disposal contracts:
 - a. Existing landfill capacities
 - b. Tipping fees
 - c. Scale house operations
 - d. Private commercial haulers
 - e. Law enforcement
 - f. Ingress/egress to site
 - g. Site logistics
 - h. Truck weight restrictions
 - i. Highway and bridge weight restrictions
 - j. Household hazardous waste
 - k. Hazardous and toxic waste
 - l. Mixed debris
 - m. Construction and demolition debris
 - n. Ash
 - o. Traffic control
 - p. Illegal dumping
 - q. Environmental issues
 - r. Site closure/restoration requirements
2. Contract Administration - This term is generally used to encompass all of the activities that will take place after a contract is awarded and work commences. Contract administration ensures that the contract is performed as agreed.

3. Monitoring Performance - Continuous monitoring of all activities of a contractor promotes satisfactory performance. In evaluating a contractor's performance, primary interest is in the progress toward completion of the services called for and the financial status of the contract. It is important that the contract provide for submission of reports and payment estimates to aid in evaluating the contractor's progress. In lieu of progress reports, frequent visits to the job sites can be a productive method of monitoring performance.
4. Contract Modification - During the administration of the contract, modifications may be necessary to provide contractual coverage for situations that develop after the contract is awarded. All modifications will be in writing to protect the interests of both parties. The contract will contain a clause that permits the Contracting Officer to make changes unilaterally within the scope of the contract, subject to an equitable adjustment of the contract price.
5. Inspection - The City of North Port will maintain an inspection and control system under their own supervision to ensure that the work being performed complies with the terms of the contract. In addition to load ticketing, the inspection and control process will consider the following factors:
 - a. Bond requirements
 - b. Insurance requirements
 - c. Rights-of-way and indemnification
 - d. Mobilization of proper equipment
 - e. Posting of permits
 - f. Contractor personnel safety standards
 - g. General public safety standards
 - h. Completion schedules
 - i. Clearance procedures
 - j. Demobilization procedures
 - k. Site closure/restoration procedures
6. Acceptance and Payment - Final inspection and the method of interim and final payments are part of the general conditions of the contract. The following will be set forth in the original specification or other contract documents:
 - a. Parts of or all of the work will be accepted only after verification through the inspection process that the work

was performed in accordance with the standards stipulated in the contract.

- b. If the contract period is less than one calendar month, normal payment will be made in one total sum. In the event the authorized work tenure exceeds a period of one month, provisions can be made to make progress payments to the contractor at least monthly.
7. Closing Out Contracts - A contract is complete when all of the services or items called for have been delivered or performed and accepted. The contract is not administratively complete, however, until all actions taken in compliance with the contract have been properly documented and final payment has been made.

VI. SPECIAL DEMOLITION AND DEBRIS REMOVAL SITUATIONS

This section provides guidance on private property demolition and removal of debris from mobile home parks and waterways that may present a health and safety hazard.

A. Private Property Demolition and Debris Removal

1. Although flood insurance policies do not provide coverage for debris removal, most homeowner, fire and extended coverage insurance policies have specific coverage for debris removal from private property and for demolition of heavily damaged structures.
2. Demolishing or securing remaining structures that threaten the health and safety of adjacent residents will be the responsibility of the owner or local government; however, experience has shown that unsafe structures will remain because of lack of insurance, absentee landlords, or understaffed and under-equipped local governments. Consequently, ensuring the demolition of these structures may become the responsibility of the local Public Works Director and staff, which requires complete cooperation of numerous local and State government officials and may require resources from any or all of the following:
 - a. Tax office
 - b. Local law and/or code enforcement agencies
 - c. State Historic Preservation Office
 - d. Environmental contractors qualified to remove asbestos and lead-based paint

- e. Field teams to photograph and document the sites before and after demolition. Health and Safety program requirements contained in 29 and 40 CFR will be adhered to with respect to hazardous waste. When removing any suspected hazardous waste workers will only work in well-ventilated areas, wear chemical protective clothing and evacuate the area if a chemical odor is noticed.
3. Demolition of private property will present significant coordination problems. The checklist shown below identifies key tasks that local officials will perform before the structure is approved for demolition. To expedite the overall effort, many of the tasks will be conducted concurrently.
 4. Private Property Documentation Checklist
 - a. Obtain copies of all ordinances that authorize the community to condemn privately-owned structures. The authority to condemn privately-owned structures might be different from the authority for the demolition of publicly owned structures.
 - b. Coordinate use of adjacent lands, easements and rights-of-way necessary for accomplishing the approved work.
 - c. Implement laws that reduce the time it takes to go from condemnation to demolition.
 - d. Obtain copies of all applicable permits required for demolition of subject structure(s).
 - e. Document the age of the structure to determine if eligible or on the National Registration of Historic Places with the SHPO.
 - f. Obtain copies of pertinent temporary well-capping standards.
 - g. Obtain executed right-of-entry and hold harmless agreements that have been signed by the owner and by renter, if rented. Right-of-entry will indicate any known intent by owner to rebuild to ensure foundation and utilities are not damaged. If these agreements are not executed, document reason(s).
 5. Agreement example
 - a. Use radio, public meetings and newspaper ads to give notice to property owners and their renters to remove personal property in advance of demolition.

- b. Document name of owner on the title, the complete address and legal description of the property and the source of this information.
6. Document name of renter, if available
 - a. Ensure property will be vacated by demolition date.
 - b. Provide written notice to property owners that clearly and completely describe the structures designated for demolition. Additionally, provide a list that identifies related structures, trees, shrubs, fences and other items to remain on the respective property.
 - c. Notify mortgagor of record.
 - d. Provide the property owner the opportunity to participate in the decision on whether the property can be repaired.
 - e. Determine the existence and amount of insurance on the property prior to demolition.
 - f. Specify procedures to determine when cleanup of a property is completed.
7. Private Property Inspection Checklist
 - a. Coordinate all pertinent site inspections with local, State and Federal inspection team(s). Identify asbestos and lead-based paint materials prior to demolition.
 - b. Notify the owner and/or renter of all site inspections.
 - c. Verify that all personal property has been removed from private structure(s).
 - d. Immediately prior to demolition, verify that the building is unoccupied.
 - e. Ensure that the property is properly posted.
 - f. Obtain a clear, concise and accurate property description and demolition verification.
 - g. Include a Public Health official on the demolition inspection team.
 - h. Evaluate the structural integrity of the building and also demonstrate "imminent and impending peril" to public health and safety caused by the structure.
 - i. Make arrangements to remove and transport all asbestos and lead-based paint materials to a permitted facility prior to building demolition.
 - j. Obtain photographs of the property and verify the address. Provide additional photographs of the property taken immediately prior to and following demolition.

8. Private Property Utilities Checklist
 - a. Locate, mark, turn off and disconnect all water and sewer lines.
 - b. Locate, mark, turn off and disconnect electrical, telephone and cable television services.
 - c. Locate, mark, turn off and disconnect gas service.

9. Private Property Demolition and Debris Removal Checklist - The following actions will require close coordination when removing debris from demolished buildings on private property:
 - a. Ensure that buildings have been properly condemned according to local ordinances.
 - b. Ensure that right-of-entry and hold harmless agreements are properly executed.
 - c. Ensure that local officials remove any legal residents or squatters from the building before demolition and debris removal begins.
 - d. Ensure that buildings identified for demolition are properly inspected to verify that they are unsafe, cannot be repaired and present a hazard to the community.
 - e. Ensure that the inspection team includes a structural engineer and a hazardous materials specialist. Any household hazardous waste, such as paints, oils, cleaning supplies and pesticides that are found will be removed prior to demolition. Houses that contain asbestos or lead-based paint will be demolished and debris removed according to current environmental regulations under a separate contract.
 - f. Local code enforcement officers will accompany the contractor to ensure that they do not tear down the wrong house. The responsibility is on the community to identify the correct structure.
 - g. Demolition work and debris removal will be coordinated with utility companies to ensure that all services are turned off.

B. Mobile Home Park Debris Removal

1. Post-Disaster Requirements - Hurricanes and tornadoes can cause severe damage to mobile homes and create extensive amounts of mixed debris confined to relatively small areas. The following are examples that comprise mixed debris:

- a. Tree blow-down
 - b. Out buildings
 - c. Screened porches
 - d. Mobile home frames
 - e. Personal property, such as clothing, food and furniture
 - f. Appliances, such as stoves, refrigerators, washers and dryers
 - g. Household cleaners and paints
 - h. Propane and oxygen tanks
 - i. Gasoline, oil and lubricants
 - j. Automobiles, trucks and boats
 - k. Bicycles and lawn mowers
 - m. Utility hookups
2. Local mobile home parks will be surveyed and arrangements will be made with park owners for City resources or contractors to clear the parks of debris. The Public Works Director and staff will need to closely coordinate the cleanup activities and enforce condemnation procedures. Legal, health and safety concerns will have an important impact on the debris removal activities.
 3. Planning Issues - Prior to a major natural disaster, local officials will do the following:
 - a. Develop generic scopes of work for debris removal.
 - b. Identify sites suitable for temporary storage of mobile home debris.
 - c. Prioritize mobile home parks for debris removal.
 - d. Develop a set of procedures to be followed that will combine debris removal activities and utility repair/replacement at mobile home parks into a single operation.
 4. Documentation Checklist - City officials will provide the following documentation:
 - a. Copies of the local ordinance authorizing condemnation of mobile home parks. Condemnation for health issues is associated with prolonged exposure of trailer contents to the natural elements.
 - b. A copy of the local government resolution with appropriate recitals required to support adoption or enactment of ordinances to condemn, demolish and remove mobile home park contents.

- c. Maps showing easements and rights-of-way access to the property.
 - d. Documentation signed by the mobile home park owner and mobile home owner that holds the local, State or Federal government free from liability for damage caused by the requested work and indemnifies the local, State or Federal government against any claims arising from such work.
 - e. Documents allowing right-of-entry to the mobile home parks.
 - f. Notice to individual mobile home owners to remove items of personal property in accordance with local ordinances.
 - g. Documentation providing the names of mobile home parks and of mobile home park owners, complete addresses and legal descriptions of the properties and limits, if any, of debris clearance to occur within the parks. Additional materials will include plats of the mobile home parks and any information about existing utilities.
 - h. Standards for capping all utilities.
 - i. All applicable permits necessary for any demolition work in the mobile home park.
5. Inspection Prior to Debris Removal - City officials will perform the following actions:
- a. Ensure that the mobile home park will be vacated prior to the removal of any debris from the site.
 - b. Describe clearly and completely the extent of debris removal required within the mobile home park. Specify any structures, other than mobile homes, that are to be removed.
 - c. Locate and estimate amount of household hazardous waste within the park and ensure that appropriate procedures are established for separation and removal of such materials prior to debris removal. Household hazardous waste typically found on-site includes cleaning supplies, propane tanks, paint cans, paint thinners, pesticides, refrigerators and freezers. A qualified environmental contractor will be hired to ensure proper removal and disposal of asbestos, lead-based paint and other commercial, agricultural or industrial hazardous waste.
 - d. Conduct initial inspections of the mobile home park with representatives from the local government, public health office, building and zoning office, real estate office and other State and Federal officials.

- e. Ensure that the contract scope of work reflects findings of the field inspection.
 - f. Ensure that the mobile homes are unoccupied.
 - g. Ensure that the property is posted in accordance with local regulations and that mobile home owners have removed their personal property.
 - h. To avoid subsequent disputes, ensure that any agreement made with the mobile home park owner is in writing.
 - i. Obtain photographic documentation of mobile home sites prior to commencement of work.
 - j. Have organic and perishable materials removed from the site.
6. Mobile Home Park Utilities - City officials will accomplish the following actions:
- a. Consider whether using heavy equipment will cause further damage to existing utilities.
 - b. Be responsible for turning off utility services, such as water, telephone, electricity, natural gas and propane gas.
 - c. Flag septic tank locations prior to debris removal. Special care must be given to protect septic tanks during debris removal operations.

C. Debris Removal Contracts

1. Contracts will include provisions for the following:
 - a. Provide that all private automobiles are stored in a specific location within the park to be retrieved later by the owners.
 - b. Provide salvage rights to the contractor for materials remaining on-site at the time of debris removal where beneficial to the government.
 - c. Require flagging of existing utilities prior to debris removal.
 - d. Use rubber tire vehicles and backhoe with grapple attachments to protect existing utilities.
 - e. Require the contractor to phase debris removal operations to allow utility repair and or replacement to begin immediately after an area has been cleared. Navigation Hazard Removal
2. Coordination - Damage to publicly-owned marinas caused by a major natural disaster can include abandoned sunken boats and other debris that may impede navigation. The Public Works Director and staff will coordinate with the U.S. Coast Guard, Florida

Fish and Wildlife Commission, legal counsel, contractors specializing in marine salvage operations, commercial divers and certified surveyors to ensure that navigation hazards are removed safely and efficiently.

VII. TEMPORARY DEBRIS STORAGE SITE OPERATIONS AND VOLUME REDUCTION METHODS

The preparation and operation of a temporary debris storage and reduction site are usually left to the contractor. However, the Public Works Director and debris staff will understand how a temporary debris storage and reduction site is set up and operated. This information will be extremely valuable in developing ultimate disposal plans, keeping local government officials and the public informed on debris clearance, removal and disposal operations and ensuring compliance with various regulations. This section provides guidelines on temporary site operations, the handling of household hazardous waste and the volume reduction methods in priority of recycling, , chipping, grinding and incineration.

A. Temporary Debris Storage Site

1. Site Preparation - The topography and soil/substrate conditions will be evaluated to determine best site layout. When planning site preparation, think of ways to make site closure and restoration easier. For example, if the local soils are very thin, the topsoil can be scraped to bedrock and stockpiled in perimeter berms. Upon site closeout, the uncontaminated soil can be re-spread to preserve the integrity of the tillable soils.
2. Site Operations - Lined temporary storage areas will be established for ash, household hazardous waste, fuels and other materials that may contaminate soils and groundwater. Plastic liners will be placed under stationary equipment such as generators and mobile lighting plants. These actions will be included as a requirement in the contract scope of work.
 - a. If the site is also an equipment storage area, fueling and equipment repair will be monitored to prevent and mitigate spills of petroleum products and hydraulic fluids. Include clauses in the contract to require immediate cleanup by the contractor.
 - b. Be aware of and lessen the effects of operations that might irritate occupants of neighboring areas. Establishment of a

- buffer zone can abate concerns over smoke, dust, noise and traffic.
- c. Consider on-site traffic patterns and segregate materials based on planned volume reduction methods.
 - d. Operations that modify the landscape, such as substrate compaction and over excavation of soils when loading debris for final disposal, will adversely affect landscape restoration.
 - e. Debris removal and disposal will be viewed as a multi-staged operation with continuous volume reduction. There will be no significant accumulation of debris at temporary storage sites. Instead, debris volume will be constantly reduced and residue sent to recyclers, incinerators or a landfill in that priority.
3. Baseline Data Collection - Private land and public land used as debris storage and reduction sites will be returned to its original condition following site closeout. Baseline data are essential to document the condition of the land before it is used as a debris storage and reduction site. As soon as a site is selected, the Public Works Director and staff will work closely with County and State officials to develop baseline data. The following actions will be taken to develop baseline data on all selected sites:
- a. Videotape and Photograph the Site - Thoroughly videotape and/or photograph (ground or aerial) each site before any activities begin and periodically update video and photographic documentation to track site evolution.
 - b. Document Physical Features - Notations about existing structures, fences, culverts, irrigation systems and landscaping can help evaluate possible damage claims made later.
 - c. Sample Soil and Water - Random soil samples can be easily collected prior to volume reduction activities. More time-consuming groundwater sampling can be done soon after operations commence. Household hazardous waste, ash and fuel storage areas will be sampled prior to site setup. Advance planning with community and State environmental agencies can establish requirements, chain of custody, acceptable collection methods, certified

laboratories and test parameters. If in-house assets are not available, consider establishing an off-the-shelf contract with an environmental consulting firm that can respond rapidly.

- d. Sketch Site Operation Layout - Periodically map or sketch activity locations so that areas of concern can be pinpointed later for additional sampling.
- e. Document Quality Assurance Issues - Document contractor operations that will have a bearing on site closeout, such as petroleum spills at fueling sites, hydraulic fluid spills at equipment breakdowns, contractor installation of water wells for stock pile cooling or dust control, discovery of household hazardous waste in debris and details on any commercial, agricultural or industrial hazardous and toxic waste storage and disposal.
- f. Plan Environmental Remediation - Final restoration of the landscape must be acceptable to the landowner. Therefore, plan the landscape restoration as early as possible, preferably incorporating a basic plan in the lease. Come to an agreement with the landowner prior to occupancy to establish reasonable expectations of site conditions upon site closeout.
- g. Baseline Data Checklist - The following is a suggested baseline data checklist:
 - i. Before activities begin
 - Take ground or aerial video/photographs.
 - Note important features, such as structures, fences, culverts and landscaping.
 - Check with the State Historic Preservation Officer to determine if any structures identified are listed on or eligible for the National Register of Historic Places.
 - Take random soil samples.
 - Take water samples from existing wells.
 - Check the site for volatile organic compounds.
 - ii. After activities begin

- Establish groundwater monitoring wells.
 - Take groundwater samples.
 - Take spot soil samples at household hazardous waste, ash and fuel storage areas.
- iii. Progressive updates
- Update videos and photographs.
 - Update maps and sketches of site layout.
 - Update quality assurance reports and fuel spill reports.

B. Household Hazardous Waste

1. Pre-Disaster Planning - The Public Works Director and staff are aware of the effects that household hazardous waste can have on the overall debris clearance, removal and disposal mission. Pre-disaster planning will include having professional hazardous waste response teams assigned ahead of time to provide assistance in identifying and disposing of household hazardous waste.
 - a. Household hazardous waste generated by a natural disaster may consist of common household cleaning supplies, pesticides, motor oil, lubricants, transmission and brake fluid, gasoline, anti-freeze, paints, propane tanks, oxygen cylinders and auto/marine batteries. Household hazardous waste may become mixed with other debris, requiring close attention throughout the debris clearance, removal and disposal process.
 - b. White goods are defined as discarded household appliances such as refrigerators, freezers, air conditioners, heat pumps, ovens, ranges, washing machines, clothes dryers, and water heaters. Many white goods contain ozone-depleting refrigerants, mercury, or compressor oils. The Clean Air Act prohibits the release of refrigerants into the atmosphere, and requires that certified technicians extract refrigerants from white goods before they are disposed of or recycled. Some States also require certified technicians to extract compressor oils before disposing of or recycling white goods. Applicants should follow all Federal, State, and local requirements concerning ozone-depleting refrigerants, mercury, or oils. Documentation of proper disposal may be required for Public Assistance grant consideration.

- c. The Public Works Director and staff will implement the following pre-disaster planning actions:
 - i. Assign trained hazardous waste response teams to collect, sort, store and dispose of excessive quantities of household hazardous waste.
 - ii. Have emergency hazardous waste contracts in place or prepare generic scopes of work that can be fine-tuned with minimal effort for removal and disposal of accumulated household hazardous waste.
 - iii. Coordinate with County, State and Federal regulatory agencies concerning possible regulatory waivers and other emergency response requirements.
2. Removal and Disposal Operations - Household hazardous waste items will be segregated at curbside or brought to a designated drop-off site. Specially trained field technicians can identify dangerous product constituents, segregate incompatible chemicals and properly store or pack the waste for transportation to a facility specially permitted to accept hazardous waste. The following actions are required to ensure that household hazardous waste items are removed and disposed of safely:
 - a. Where possible, separate household hazardous waste from other debris before removal. Arrange for salvageable household hazardous waste materials to be collected and segregated based on their intended use.
 - b. Properly trained environmental contractors or emergency response personnel will remove industrial, commercial or agricultural hazardous and toxic waste.
 - c. Maintain contact with regulatory agencies to ensure cleanup actions meet County, State and Federal regulations.
 - d. Complete household hazardous waste identification and segregation before any demolition work begins.
 - e. Qualified environmental contractors will remove any questionable debris that may be contaminated by household or commercial hazardous waste.
 - f. Regular demolition contractors can remove uncontaminated debris.
3. Special Handling at Temporary Storage Sites - A separate storage area for household hazardous waste materials, contaminated soils

and contaminated debris will be established at each site. The household hazardous waste storage site will be lined with an impermeable material and bermed to prevent contamination of the groundwater and surrounding area. Household hazardous waste materials will be removed from the temporary storage area and disposed of by a qualified environmental contractor in accordance with County, State and Federal regulations.

C. Commercial, Agricultural and Industrial Hazardous and Toxic Waste

1. Removal and disposal of large quantities of commercial, agricultural and industrial hazardous and toxic waste, such as asbestos, lead-based paint, pesticides, or fertilizers, may require the use of professional hazardous and toxic waste contractors. A contractor's inspection team will do the following:
 - a. Establish contacts with County, State and Federal regulatory agencies.
 - b. Interview tenants and building owners.
 - c. Assess sites to document potential commercial or agricultural hazardous and toxic waste problems.
 - d. Search buildings to establish potential hazards, such as asbestos, lead-based paint and underground tanks.
 - e. Prioritize problems based on risk to human health and safety.

D. Volume Reduction Methods Listed by Priority

1. Volume Reduction by Recycling - Recycling will be considered early in the debris clearance, removal and disposal operation because it may present an opportunity to reduce the overall cost of the operation. Metals, wood and soils are prime candidates for recycling.
 - a. Hurricanes and earthquakes may present opportunities to contract large-scale recycling operations and achieve an economic return from some of the prime contractors who exercise their initiative to segregate and recycle debris as it arrives at the storage and reduction sites.
 - b. Specialized contractors will be available to bid on disposal of debris by recycling, if it is well sorted. Contracts and monitoring procedures will be developed to ensure that the recycling contractors comply with County, State and Federal environmental regulations.

- c. Residue that cannot be recycled, such as cloth, plastic, mattresses, rugs and trash, will be shredded to reduce volume before being sent to a landfill for final disposal.
- d. The following materials are suitable for recycling:
 - i. Metals - Hurricanes and tornadoes can cause extensive damage to mobile homes, sun porches and green houses. Most of the nonferrous and ferrous metals are suitable for recycling. Metal maulers and shredders can be used to shred trailer frames, trailer parts, appliances and other metal items. Ferrous and non-ferrous metals are separated using an electromagnet and then sold to metal recycling firms.
 - ii. Soil - Cleanup operations using large pieces of equipment pick up large amounts of soil. The soil is transported to the temporary combined with other organic materials that will decompose over time. Large amounts of soil can be recovered if the material is put through some type of screen or shaker system. This procedure can produce significant amounts of soil that can either be sold or recycled back into the agricultural community. It is more expensive to transport and pay tipping fees at local before moving the material. Shakers can be used to remove dirt from mixed debris. The cover material or sold to the agricultural community.

In agricultural areas where chemical fertilizers are used heavily, recovered soil may be too contaminated for use on residential or existing agricultural land. Monitoring and testing the soil may be necessary to ensure that it is not contaminated with chemicals. If the soil is not suitable for any agricultural use and is a risk to the public health, it may be used as cover material at a landfill.
 - iii. Construction Materials - Construction and demolition waste is material generated in the demolition of disaster damaged structures and facilities. This waste stream includes concrete,

asphalt, gypsum, wood waste, glass, red clay bricks, clay roofing tile and asphalt roofing tile. Much of this material can be recycled, if recycling contractors are readily available.

- iv. Wood - Clean, woody debris can be ground, chipped, shredded, or removed by timber operations or pulpwood cutters.
2. Volume Reduction by Grinding and Chipping - Hurricanes, tornadoes and ice storms may present the opportunity to employ large-scale grinding and chipping operations as part of the overall debris volume reduction strategy. Hurricanes can blow away scarce topsoil in the agricultural areas and cause extensive tree damage and blow-down. This two-fold loss, combined with local climatic conditions, may present an opportunity to reduce clean, woody debris into suitable mulch that can be used to replenish the topsoil and retain soil moisture.
 - a. The economic feasibility of grinding and chipping woody debris must be studied carefully. The cost of chipping and grinding is basically equal to that of incineration; however, there are significant differences in volume reduction. Incineration, for example, reduces the volume approximately 95%, leaving only an ash residue for disposal. Chipping and grinding reduces the volume on a 4-to-1 ratio (four cubic yards is reduced to one cubic yard) or by 75%. For chipping and grinding to be feasible, the 25% of volume remaining must have some benefit or use. The ability to use the recycled wood chips as mulch for agricultural purposes or as fuel for industrial heating or in a cogeneration plant helps to tip the economic scale toward chipping and grinding. Because of shallow topsoil conditions in some locations, mulch is a desirable product. In other locations, however, the mulch may become nothing more than a landfill product. The Public Works Director and staff will work closely with local environmental and agricultural groups to determine if there is a market for mulch.
 - b. There are numerous makes and models of grinders and chippers on the market. When contracting, the most important item to specify is the size of the mulch. If the grinding operation is strictly for volume reduction, size is not important; however, mulch to be used for agricultural

purposes must be of a certain size and virtually free of paper, plastic and dirt.

- c. Grinders are ideal for use at debris storage and reduction sites because of their high volume reduction capacity. However, there is a need for a large area to hold the resulting mulch. Ingress and egress to the site is also an important consideration. Finally, properly locating the grinders is critical for noise and safety considerations.
- d. The following specifications will provide a mulch product that is suitable for agricultural purposes:
 - i. The average size of wood chips produced will not exceed four inches in length and ½ inch in diameter.
 - ii. Production output will average 100 to 150 cubic yards per hour when debris is moderately contaminated with plastic and dirt and feeding operations are slow and 200 to 250 cubic yards per hour for relatively clean debris. Note that this is not machine capability; this is contractor output or performance capability.
 - iii. Chips or mulch will be stored in piles no higher than 15 feet and located so as not to hinder hauling operations.
 - iv. Contaminants are all materials other than wood products and will be held to 10% or less for the mulch to be acceptable.
 - v. Plastics will be eliminated completely. To help eliminate contaminants, root rake loaders will be used to feed or crowd materials to the chipper or grinder. Bucket-loaders tend to scoop up earth, causing excessive wear to the grinder or chipper. Hand laborers will remove contaminants prior to feeding the grinders. Shaker screens will be used when processing stumps with root balls or when large amounts of soil are present in the woody debris. The separated soil can also be recycled back to the agricultural community.
- e. Brush chippers are ideal for use in residential areas, orchards, or groves. The damaged and uprooted trees present significant problems if they are pushed to the right-of-way to wait for eventual pick-up and transport to storage and reduction sites. In addition, the use of on-site chippers

allows the material to be used as mulch in the area where it is chipped, thereby saving the cost of transporting it.

3. Volume Reduction by Incineration - There are several incineration methods available for volume reduction. Each method will be considered in developing a volume education strategy. The appropriate State regulatory agencies (e.g., Department of Environmental Protection and Florida Forest Service) will be contacted to acquire all respective permits for burn authorizations when using this option as a reducing technique. This will include permits for the disposal of all products of incineration.
4. Uncontrolled Open-Air Incineration - The least desirable method of volume reduction is uncontrolled open-air incineration because it lacks any type of environmental control. However, in the haste to make progress, local officials and/or independent landowners may employ this method early in a disaster. Uncontrolled open-air incineration will be closely monitored to ensure that only clean, woody debris is incinerated.
5. Controlled Open-Air Incineration - Controlled open-air incineration is a cost-effective method for reducing clean, woody debris in rural areas. Incineration of clean woody debris presents little environmental damage and the local agricultural community can use the resulting ash as a soil additive. Local agricultural extension personnel will be consulted to determine if the resulting ash can be recycled as a soil additive. The controlled open-air incineration option will be terminated if mixed debris enters the waste stream.
6. Air Curtain Pit Incineration - Air curtain pit incineration offers an effective means to expedite the volume reduction process while substantially reducing the environmental concerns caused by open-air incineration. The air curtain incineration method uses a pit constructed by digging below grade or building above grade (if a high water table exists) and a blower unit. The blower unit and pit comprise an engineered system that must be precisely configured to function properly.
 - a. The blower units deliver air at predetermined velocities and capacities. The blower unit must have adequate air velocity to provide a "curtain effect" to hold smoke in and to feed air to the fire below. A nozzle 20 feet long will provide air at a velocity of over 120 miles per hour and will deliver over 20,000 cubic feet of air per minute to the fire. The air traps smoke and small particles and re-circulates them to

enhance combustion, which reaches over 2,500 degrees Fahrenheit. Manufacturers claim that combustion rates of approximately 25 tons per hour are achievable while still meeting emission standards.

- b. Specifications and statements of work will be developed to expedite the proper use of the system. Before awarding a contract, the Public Works Director and staff need to ensure that the contractors are knowledgeable about air curtain pit incinerator design and operating procedures.
 - c. Following are recommendations and warnings to assist the Public Works Director and debris staff in planning for air curtain pit incineration operations:
 - i. Be aware that there are no industrial standards for air curtain pit incinerator operations. The set-up has to be customized using the information provided by the manufacturer and will consider such specifications as minimum blower air velocity, pit construction configuration, pit materials, ash handling, acceptable smoke levels and air monitoring requirements.
 - ii. Pits must be constructed out of a highly compacted material that will hold its shape.
 - iii. The water table elevation governs whether the pit is constructed above or below grade.
 - iv. Controls will be implemented to prevent contamination of the ground water. An acceptable solution is to use compacted limestone fill placed over an impervious clay layer.
 - v. Planners will take the initiative in keeping the public informed. Local officials, environmental groups and local residents will be thoroughly briefed on the incineration means being used, how the systems work, environmental standards, health issues and the risk associated with each type of incineration. A proactive public information strategy will be included in any operation that uses incineration as a primary means of volume reduction.
7. Portable Air Curtain Incinerators - Portable incinerators use the same methods as air curtain pit incinerator systems. The only difference is that portable incinerators off-site constructed earth/limestone pit. Portable air curtain incinerators are the most

efficient incineration systems available because the pre-manufactured pit is engineered to precise dimensions to complement the blower system. The pre-manufactured pit requires little or no maintenance as compared to earth/limestone constructed pits, which are susceptible to erosion. Portable air curtain units are ideal for areas with high water tables and sandy soils and areas where smoke opacity must be kept to a minimum.

8. Environmental Controls - The following are recommended environmental controls for all incineration methods:
 - a. A setback of at least 100 feet will be maintained between the debris piles and the incineration area. Keep at least 1,000 feet between the incineration area and the nearest building. Contractors will use fencing and warning signs to keep the public away from the incineration area.
 - b. The fire will be extinguished approximately two hours before anticipated removal of the ash mound. The ash mound will be removed when it reaches two feet below the lip of the incineration pit.
 - c. The incineration pit will be either constructed above ground or below ground so that it is less than eight feet wide and between nine and 14 feet deep.
 - d. The incineration pits will be constructed with limestone and reinforced with earth anchors or wire mesh to support the weight of the loaders. There will be a one foot impervious layer of clay or limestone on the bottom of the pit to seal the ash from the aquifer.
 - e. The ends of the pits will be sealed with dirt or ash to a height of four feet.
 - f. A 12-inch dirt seal will be placed on the lip of the incineration pit area to seal the blower nozzle. The nozzle will be three to six inches from the end of the pit.
 - g. There will be one foot high nonflammable warning stops along the edge of the pit's length to prevent the loader from damaging the lip of the incineration pit.
 - h. To prevent explosions, hazardous or contaminated flammable material will not be placed in the pit.
 - i. The airflow will hit the wall of the pit approximately two feet below the top edge of the pit opposite the blower and the debris will not break the path of the airflow except during dumping.
 - j. The pit will be no longer than the length of the blower system and will be loaded uniformly along its length.

- k. Check with appropriate State agencies for Florida-specific requirements.
9. Smoke - Smoke generated by any of the above incineration methods is often interpreted by the general public as having an environmental impact. Therefore, it is important to also address smoke as part of the air monitoring guidelines. The visual measure of smoke emitted by a burning source is referred to as its "opacity." For disaster situations, the recommended opacity requirements will be set at 15% for 50 minutes out of an hour, not to exceed 40% for the remaining 10 minutes. This allows for additional debris that may be put into the incinerator during that hour. A 30-minute start-up time with a maximum of 40% opacity will be allowed.

VIII. TEMPORARY DEBRIS STORAGE AND REDUCTION SITE ENVIRONMENTAL CONSIDERATIONS

Debris clearance, removal and disposal activities can have significant environmental ramifications. The temporary storage and reduction sites must be setup, operated and closed out properly to minimize environmental harm. This section provides guidelines for air quality monitoring and site closeout procedures, including ash, soil and groundwater testing.

A. Air Quality Monitoring

1. Following a major natural disaster, emphasis is on rapid debris removal from the public rights-of-way. This results in debris coming into a temporary storage site faster than it can be reduced and ultimately disposed of. As a result, organic matter in debris piles begins to decompose and may create toxic or volatile vapors. Incineration operations may also produce pollutants that impact the air quality of the area. Air quality must be monitored to ensure compliance with County, State and Federal environmental regulations.
2. Air quality monitoring will be instituted at all debris storage and reduction sites to check for volatile organic vapors of a petrochemical origin and airborne pollutants caused by incineration operations.
3. Actions will be taken by the temporary debris storage and reduction site operators to keep pollutants at or below acceptable local, State and Federal environmental standards. Testing procedures will include readings for ozone, carbon monoxide,

nitrogen dioxide, sulfur dioxide, lead and particulate matter smaller than 2.5 microns.

4. Flame- and photo-ionization detectors will be used to detect volatile organic vapors. The flame-ionization detector is used to establish parts-per-million at the debris pile. If readings are above acceptable standards, the photo-ionization detector will be used to verify the initial readings.
5. Incineration site readings will be taken at the edge of the incineration pit and approximately 150 feet away. Scattered locations will be established and checked periodically. Wind direction, temperature and any other pertinent meteorological information will be recorded.
6. Coordinate with the appropriate County, State and Federal environmental agency responsible for implementing the Quality Assurance Sampling Plan.
7. The following situations may negatively affect the air quality at a temporary storage and reduction site:
 - a. The incineration pit is not properly constructed.
 - b. The incineration pit has degraded to the point where key specifications are no longer met.
 - c. A poorly trained operator improperly feeds the pits.
 - d. The material is not properly segregated.
 - e. Prolonged rains may accelerate the decomposition process, thereby causing the emission of volatile organic gases. Site Closeout Procedures
8. Each temporary debris storage and reduction site will eventually be emptied of all material and restored to its previous condition and use. The contractor must assure the Public Works Director and staff that all sites are properly restored. Local, State and Federal government monitors will verify this. Site restoration will go smoothly if baseline data were properly collected and site operation procedures were followed.

B. Site Closeout Procedures

1. The key to timely closeout of the sites is the efficient advance scheduling of activities for multiple sites.
2. The basic closeout steps are:

- a. Remove all debris from the site.
 - b. Conduct an environmental audit or assessment.
 - c. Develop a restoration plan.
 - d. Submit the plan for review and approval by the appropriate State regulatory agency
 - e. Execute the plan
 - f. Get acceptance from the landowner
 - g. Terminate lease payments
3. Potential Problems:
- a. The length and terms of private property leases can create suspense dates that become very costly to meet and difficult to manage.
 - b. Differences between local, State and Federal government environmental regulations may cause problems.
 - c. Failure to collect baseline data can result in fraudulent claims for damage to nonexistent structures or the land itself. Videotape recordings and/or photographs will be taken prior to opening a site to prevent fraudulent claims. Background soil and water samples will also be taken before site activities begin to compare with closeout soil and water samples.
4. Planning Requirements - The following planning requirements will be implemented to closeout a temporary storage and reduction site:
- a. Coordinate with local and State officials responsible for construction, real estate, contracting, project management and legal counseling regarding requirements and support for implementation of a site restoration plan.
 - b. Establish a testing and monitoring program for air, ash, soil and groundwater.
 - c. Ensure that the contractors are required to remove all residual debris from temporary sites to approved landfills prior to closure.
 - d. Reference appropriate and applicable environmental regulations.
 - e. Prioritize site closures.
 - f. Schedule closeout activities.
 - g. Develop cost estimates.
 - h. Develop decision criteria for certifying satisfactory closure based on limited baseline information.

- i. Develop administrative procedures and contractual arrangements for site closeout.
 - j. Designate approving authority to review and evaluate contractor closure activities and progress.
 - k. Retain staff during the closure phase to develop site-specific restoration actions.
5. Temporary Site Closure Checklist - The following is a recommended temporary site closure checklist. Narrative responses may be required along with other closure documents.
- a. Site number and location
 - b. Date closure complete
 - c. State regulatory permits observed
 - d. Household hazardous waste removed
 - e. Contractor equipment and temporary structures removed
 - f. Contractor petroleum spills cleaned
 - g. Ash piles removed
 - h. Comparison of baseline information to conditions after the contractor has vacated the temporary site
 - i. Appendices
 - j. Closure documents
 - k. Contracting status reports
 - l. Contract
 - m. Testing results
 - n. Correspondence
 - no. Narrative responses

C. Ash, Soil and Groundwater Testing

Ash, soil and groundwater need to be tested to determine that no long-term environmental contamination is left on the site. High levels of site activity may require additional testing and contaminated material may need to be disposed of in an approved landfill.

1. Ash Testing - All ash piles will be tested using the Toxicity Characteristic Leaching Procedure. One composite sample from each separate ash pile will be analyzed. A minimum of ten samples taken from different strata within the pile is appropriate to develop the composite sample. If unacceptable contamination is not found, ash may be placed in a Class I landfill. If unacceptable levels of contamination are detected, the material will be further evaluated, if appropriate and placed in a hazardous material landfill, as appropriate.

2. Soil Testing - After the stockpiles are removed from the site, soils will be tested for the presence of volatile hydrocarbon contamination. Samples will be taken immediately below the surface, if it is determined that the contractor spilled hazardous materials, such as oil or diesel fuel, on the site.

The entire incineration site will be inspected for any areas of discoloration, odor, or obvious problems. Such areas will be identified and restored, as necessary.

3. Groundwater Testing - Runoff from the incineration sites and other debris stockpiled within storage areas have the potential to contaminate the aquifer. Although the probability of contamination is low, consideration will be given to placing ground water monitoring wells around the perimeter of the site, if it is adjacent to an important aquifer. Groundwater will be tested to determine the probable effects of rainfall leaching through either the ash areas or the stockpile areas and be compared to generally accepted water quality standards.

APPENDIX A

U.S. ARMY CORPS OF ENGINEERS

HURRICANE DEBRIS ESTIMATING MODEL

Background

- The U.S. Army Corps of Engineers (USACE) emergency management staff has developed a modeling methodology designed to forecast potential amounts of hurricane generated debris, based on actual data from Hurricanes Frederic, Hugo and Andres
- The estimated quantities produced by the model have a predicted accuracy of plus or minus 30%
- The primary factor used by the model is the number of households in a developed urban/suburban area
- Other factors utilized are:
 1. Cubic yards of debris generated per household per storm category
 2. Vegetative cover
 3. Commercial density
 4. Precipitation
- Household debris includes damage to the house, contents and surrounding shrubs/trees
- Vegetative cover includes all trees and shrubbery located along public rights-of-way, parks and residential areas
- Commercial density includes debris generated by damage to businesses and industrial facilities
- Private contractors will remove the majority of commercial related debris; however, disposal/reduction space is still required
- Very wet storms will cause ground saturations, increasing tree fall

Initial Planning Data

- For planning purposes, the worst case scenario should be used for the subject area
- The most accurate process is to determine the defined areas by using Doppler radar (National Weather Service Broadcasts) and geographical information systems (GIS)
- Doppler radar will define the storm's intensity and the exact track of the eye of the storm in relation to the affected area
- Track the storm and plot the eye path and 5-mile wide bands out from the eye to defined areas and estimate wind speeds
- The wind speed of the eye wall normally determines the reported storm category with the outward or 5-mile bands being a lesser category
- Track to storm inland until the wind speeds dissipate below hurricane strength

- Divide outlined areas by storm category
- Enter coordinates into a GIS database to determine areas and demographic information such as: Populations, Schools and Businesses

STEP 1 –ESTIMATED DEBRIS QUANTITIES

The formula used in this model will generate debris quantity as an absolute value based on a known/estimated population or a debris quantity per square mile based upon population density per square mile.

- Determine population (P) in the affected area
- For example, 2007 census data for North Port, FL is 57,000, therefore P = 57,000
- The assumption of 3 persons per household (H) is used for this model
- Known/estimated population (P) for a jurisdiction may be used to determine a value for H or $H=P/3$

Example

A Category 4 storm passes through the City of North Port. The area is primarily single family dwellings with some apartment complexes, schools, and shopping centers. Vegetation characteristic is heavy because of the proliferation of residential landscape shrubbery and trees throughout the area. The storm is very wet, with rain before and continuing for a few days after the hurricane.

Formula: $Q = (H)(C)(V)(B)(S)$

Q is the quantity of debris in cubic yards
H is the number of households
C is the storm category factor in cubic yards
V is the vegetation characteristic multiplier
B is the commercial/business/industrial use multiplier
S is the storm precipitation characteristic multiplier

$H = P/3 = 57,000/3 = 19,000$ (3 persons per household)
 $C = 50$ (Factor for a Category 4 storm)
 $V = 1.5$ (Multiplier for heavy vegetation)
 $B = 1.3$ (Multiplier for heavy commercial due to schools/stores/apartments)
 $S = 1.3$ (Multiplier for wet storm event)

Then $Q = 19,000 \times 50 \times 1.3 \times 1.3 = 1,605,500$ cubic yards of debris or 1.6 million CY

C is the storm category factor as shown below. It expresses debris quantity in cubic yards (yd³) per household by hurricane category and includes the house and its contents, plus land foliage

Hurricane Category	Value of "C" Factor
1	2 yd ³
2	8 yd ³
3	26 yd ³
4	50 yd ³
5	80 yd ³

V is the vegetation multiplier as shown below. It acts to increase the quantity of debris by adding vegetation, including shrubbery and trees on public rights-of-way.

Vegetative Cover	Value of "V" Multiplier
Light	½
Medium	1.3
Heavy	1.5

B is the multiplier that takes into account areas that are not solely single-family residential, but includes small retail stores, schools, apartments, shopping centers, and light industrial/manufacturing facilities. Built into this multiplier is the offsetting commercial insurance requirement for owner/operator salvage operations.

Commercial Density	Value of "B" Multiplier
Light	1.0
Medium	1.2
Heavy	1.3

S is the precipitation multiplier that takes into account either a "wet" or "dry" storm event. A "wet" storm for Category 3 or greater storms will generate more vegetative debris due to the uprooting of complete trees.

Precipitation Characteristics	Value of "S" Multiplier
None To Light	1.0
Medium To Heavy	1.2

NOTE: Steps 2 and 3 of this model can also be applied to other debris generating events once an estimated quantity of debris is established.

STEP 2 – DEBRIS STORAGE SITE REQUIREMENTS

- Estimate debris pile stack height of 10 feet
- 60% usage of land area to provide for roads, safety buffers, burn pits and household hazardous waste areas

$$1 \text{ acre (ac)} = 4,840 \text{ square yards (yd}^2\text{)}$$

$$10 \text{ foot stack height} = 3.33 \text{ yards (y)}$$

$$\text{Total volume per acre} = 4,840 \text{ yd}^2/\text{ac} \times 3.33 \text{ y} = 16,117 \text{ yd}^3/\text{ac}$$

- From the example above, the acreage required for debris reduction site is:

$$1,600,000 / 16,117 \text{ yd}^3/\text{ac} = 99 \text{ acres (required for debris storage only)}$$

- To provide for roads and buffers, the acreage must be increased by a factor of 1.66

$$99 \text{ ac} \times 1.66 = 164.34 \text{ acres or, since one square mile (mi}^2\text{)} = 640 \text{ acres}$$

$$164 \text{ ac}/640\text{as}/\text{mi}^2 = 0.26 \text{ mi}^2$$

- If you assume a 100 acre storage site can be cycled every 45 to 60 days or one time during the recovery period, then $720/2 = 360$ ac, or four 100 acre sites would be required.
- The number of sites varies with size, distance from source, speed of reduction (mixed debris is slower than clean woody debris)
- Removal urgency
- The USACE commonly removes approximately 70% of the total volume generated with local governments, volunteer groups, and private individuals removing the remainder.

If 1.6 million cy were estimated, the USACE would estimate removing approximately 1.12 million yd³ of debris

STEP 3 – CATEGORIES OF DEBRIS

Debris removed will consist of two broad categories: clean wood debris and construction and demolition (C&D) debris

- The clean debris will come early in the removal process as residents and local governments clear yards and rights-of-way
- The debris removal mission can be facilitated if debris is segregated as much as possible at the origin along the right-of-way, according to type
- The public should be informed regarding debris segregation as soon as possible after the storm
- Time periods should be set for removal, the first seven to 10 days clean woody debris only, then followed by other debris, with the metals segregated from non-metals
- Most common hurricane-generated debris will consist of the following:

30 % Clean woody debris

70% Mixed C&D

Of the 70% Mixed C&D:

42% burnable, but required sorting

5% soil

14% metals

38 % landfilled

- Based on the above, 1,600,000 yd³ of debris would break down as follows:

480,000 yd³ clean, woody debris

1,120,000 yd³ mixed, C&D

- Of the 1,120,000 yd³ of mixed C&D:

470,400 yd³ is burnable but requires sorting

56,000 yd³ is soil

156,800 yd³ is metals

425,600 is landfilled

- Burning will produce about 95% volume reduction
- Chipping and grinding reduce the debris volume on a 4 to 1 ratio (4 yd³ is reduced to 1 yd³) or by 75%
- The rate of burning is basically equal to the rate of chipping/grinding, about 200 yd³/hr. However, chipping requires on-site storage and disposal of the chips/mulch.

APPENDIX B**PRIVATELY-OWNED ROADS IN THE CITY OF NORTH PORT**

Acacia Ct.	Greenview Court	Osprey Circle
Alani Court	Greenwood Drive	Palena Blvd.
Amoko Court	Haawi Court	Palm Court
Anapa Court	Haele Court	Palmetto Way
Apopo Court	Haki Court	Park Blvd.
Awana Court	Hauli Court	Park Circle
Bailey Palm Court	Herron Creek Blvd.	Parkview Ct.
Bayhill Court	Hidden Oak Court	Peach Circle
Berkley Ct.	Hikina Drive	Pecan Drive
Berry St.	Hoemi Ct.	Phoenix Palm Ter.
Birkdale Court	Holiday Park Blvd.	Pickwick Road
Blossom St.	Holo Court	Pine Shadow Circle
Bobcat Trail	Honu Court	Pine Shadow Court
Boulton Ct.	Jasmine Way	Pine Shadow Lane
Boxwood Street	Joy Ct.	Pinehurst Court
Canary Palm Way	Keena Court	Plantation Blvd.
Carlton Ct.	Kentia Palm Court	Pleasant Ct.
Center Lane	Keystone Ct.	Randwick Ct.
Charm Court	Kilepa Court	Regency Ct.
Chelsea Ct.	Kilohee Court	Rivera Court
Coconut Palm Circle	Kimball Road	Royal Palm Drive
Concord Drive	Kipa Court	Rufus Road
Cottonwood Lane	Kula Ct.	Rutherford Court
Creek Nine Drive	Lady Palm Court	Sable Trace Drive
Dixie Lane	Lakeview Lane	Sage Lane
Dogwood Court	Laurel Ct.	Savannah Drive
Dover Ct.	Lynx Run	Savoy Ct.
Eager St.	Lynx Trail	Scarlett Avenue
Egret Court	Magnolia Drive	Seville Ct.
Elton Ct.	Mallory Ct.	Silver Palm Way
Fairway Court	Marlowe Ct.	Solitaire Palm Court
Fairway Drive	Meade Ct.	St. James Court
Fairway Place	Medinah Court	Tara Drive
Fantasy Ct.	Moonlight Court	Tuscola Blvd.
Filesmere Ct.	Moonlight Cove	Vista Lane
Fishtail Palm Court	Neighborly Court	Whispering Oaks Court
Fleetwood Court	Night Wind Terrace	Whispering Oaks Drive
Floral Court	Oakmont Court	White Ibis Court
Grand Terrace	Ocean Court	White Ibis Drive

APPENDIX C

RIGHT OF ENTRY AGREEMENT

I/We _____, the owner(s)
of the property commonly identified as _____,
(street)

_____, _____,
(city/town) (county)

State of _____ do hereby grant and give feely and without coercion, the
right of access and entry to said property in the County/City of _____,
its agencies, contractors, and subcontractors thereof, for the purpose of removing and
clearing any or all storm-generated debris of whatever nature from the above described
property.

It is fully understood that this permit is not an obligation to perform debris clearance.
The undersigned agrees and warrants to hold harmless the City of

_____,
State of _____, its agencies, contractors, and subcontractors, for damage of
any type, whatsoever, either to the above described property or persons situated
thereon and hereby release, discharge, and waive any action, either legal or equitable
that might arise out of any activities on the above described property. The property
owner(s) will mark any storm damaged sewer lines, water lines, and other utility lines
located on the described property.

I/We (have ____, have not ____) (will ____, will not ____) received any compensation
for debris removal from any other source including Small Business Administration (SBA),
National Resource Conservation Service (NRCS), private insurance, individual and family
grant program or any other public assistance program. I will report for this property
any insurance settlements to me or my family for debris removal that has been
performed at government expense. For the considerations and purposes set forth
herein, I set my hand this ____ day of _____, 20__.

Witness

Owner

Owner

Telephone Number

Address

APPENDIX D

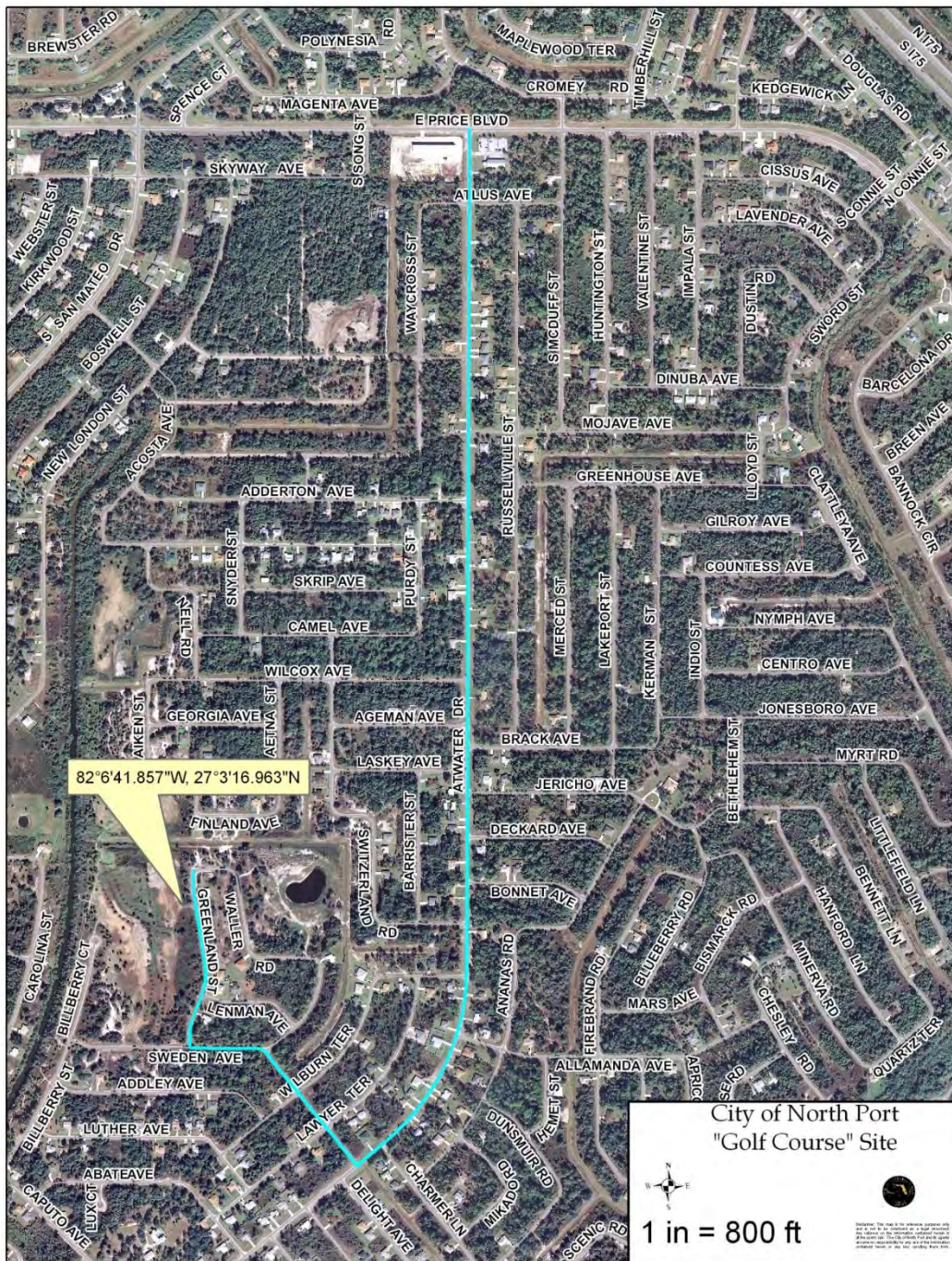
FEDERAL AID ROADWAYS IN THE CITY OF NORTH PORT

Local Name	Mile Point +/- .005	From (Beginning of this segment)	Mile Point +/- .005	To (End of this segment)	Net Length
Appomattox Drive	0.000	Pan American Blvd.	1.560	So. Sumter Blvd.	1.560
Atwater Blvd.	0.000	Hillsborough Blvd-Co/L	2.700	E. Price Blvd.	2.700
Chamberlain Blvd.	0.000	Hillsborough Blvd-Co/L	2.800	W. Price Blvd.	2.800
Cranberry Blvd.	0.000	Hillsborough Blvd-Co/L	2.900	W. Price Blvd.	2.900
Elyton Drive	0.000	Biscayne Drive	0.335	Pan American Blvd.	0.335
N. Biscayne Blvd.	0.000	Trionfo Ave.	1.552		1.552
N. Biscayne Blvd.	1.552		1.803	Ponce De Leon Blvd.	0.251
N. River Road	0.000	SR 45/US 41	5.596	SR 93/I-75	5.596
N. Sumter Blvd.	0.000	W. Price Blvd.	2.132		2.132
N. Sumter Blvd.	2.132		2.377		0.245
N. Sumter Blvd.	2.377		3.120	Tropicaire Blvd.	0.743
North Port Blvd.	0.000	S. Biscayne Blvd.	1.482	Appomattox Drive	1.482
Ortiz Blvd.	2.223	Deleon Dr.	2.436		0.213
Ortiz Blvd.	3.440		4.245	SR 45/US 41	0.805
Ortiz Blvd.	0.000	SR 45/US 41	0.739	Trionfo Ave.	0.739
Pan American Blvd.	0.167	Biscayne Drive	0.555	SR 45/US 41	0.388
Pan American Blvd.	0.000	SR 45/US 41	1.187	Appomattox Drive	1.187
Ponce De Leon Blvd.	0.000	N. Biscayne Blvd.	1.143		1.143
Ponce De Leon Blvd.	1.143		2.302	SR 93/I-75	1.159
Price Blvd.	0.000	Toledo Blade Blvd.	0.294		0.294
Price Blvd.	0.294		6.200	Raintree Blvd.	5.906
Raintree Blvd.	0.000	Charlotte Co. Line	1.600	SR 93/I-75	1.600
Rockley Blvd.	0.000	SR 45/US 41	2.000	Center Street	2.000
S. Biscayne Blvd.	0.000	Chancellor Blvd-Co/L	1.630	SR 45/US 41	1.630
S. Salford Blvd.	0.000	SR 45/US 41	2.541	W. Price Blvd.	2.541
S. Sumter Blvd.	0.000	SR 45/US 41	2.400	W. Price Blvd.	2.400
S. River Road	0.000	SR 45/US 41	1.460		1.460
S. River Road	1.460		3.478		2.018
S. River Road	3.478		6.790	Pine Street	3.312
San Mateo Dr.	0.000	Hillsborough Blvd-Co/L	3.000	E. Price Blvd.	3.000
SR 93/I-75	0.000	Charlotte Co Line	MM 171	City Limit	MM 187
Sumter Blvd.	0.000	Chancellor Blvd.	0.383	SR 45/Us 41	0.383
Tamiami Trail	0.000	Charlotte Co Line	6.141	CR 777/River Rd	6.141
Tamiami Trail	6.141	CR 777/River Rd	9.495		3.354
Tamiami Trail	9.495		14.895	SR 45A (US 41)	5.400
Tamiami Trail	14.895	SR 45a (Us 41)	17.131	CR 772	2.236
Toledo Blade Blvd.	0.000	Hillsborough Blvd-Co/L	4.651	SR 93/I-75	4.651
Tropicaire Blvd.	0.000	Van Camp Street	3.793		3.793
Tropicaire Blvd.	3.793		6.254	Choctaw Blvd	2.461
Tuscola Blvd.	0.000	S. Biscayne Blvd	0.445	SR 45/US 41	0.445
W. Price Blvd.	0.000	N. Biscayne Blvd.	3.300	Salford Blvd.	3.300
W. Price Blvd.	0.000	Salford Blvd.	2.510	Toledo Blade Blvd.	2.510
Winchester Blvd.	0.000	Charlotte Co. Line	3.152	River Road/CR 777	3.152
Yorkshire Blvd.	0.000	Hillsborough Blvd-Co/L	2.384	SR 93/I-75	2.384

APPENDIX E

AERIAL VIEW OF THE FDEP PRE-APPROVED TEMPORARY DEBRIS STORAGE AND REDUCTION SITE

Greenland Street TDSRS



APPENDIX F

AERIAL VIEW OF THE CITY OF NORTH PORT



APPENDIX G

TEMPORARY DEBRIS STORAGE REDUCTION SITES
FDEP PRE-APPROVAL LETTERFLORIDA DEPARTMENT OF
ENVIRONMENTAL PROTECTIONSouth District Office
2295 Victoria Avenue, Suite 364
Fort Myers, Florida 33901-3881RICK SCOTT
GOVERNORCARLOS LOPEZ-CANTERA
LT. GOVERNORRYAN E. MATTHEWS
INTERIM SECRETARYSent via email to: mbramble@cityofnorthport.com

Date: 5/18/2017

Monica Bramble
1100 N Chamberlain Blvd
North Port, FL 34286

RE: 2017 - Pre-Authorization for Disaster Debris Management Sites (DDMS)

Dear Monica Bramble:

This is to notify you that on 5/18/2017, we approved your request for pre-authorization of a disaster debris management site (DDMS) located in Sarasota County for 2017. Disaster debris includes hurricane/storm-generated debris and all other types of disaster debris.

The Department has evaluated your request for a DDMS at the following location:

WACS ID: 100033
Greenland Street
Golf Course Site, North Port
Lat 27:3:23.826 / Long 82:6:46.512
Waste Planned for Management: Yard Trash

In the event of a major storm event or other disaster which results in the Department issuing an Emergency Final Order (the Order) for your county, you may begin using this temporary DDMS as necessary, while also requesting issuance of a field authorization from the Department. Once activated, a DDMS is subject to the following conditions, in addition to the requirements of the Order and Florida Statute 403.7071:

1. Standing water must not be allowed to accumulate in or within 50 feet of areas used to store or process disaster debris;

2. The Department must be notified when the site is opened and begins accepting debris, and when the site is closed and stops accepting debris;
3. Access must be controlled to prevent unauthorized dumping and scavenging;
4. A DDMS must have spotters to correctly identify and segregate waste types for appropriate management;
5. Once the site is open, a spotter must be located in the area where waste is being deposited in order to spot and remove prohibited waste items;
6. The DDMS is limited to managing the type(s) of debris listed above; any putrescible waste received at the DDMS must be removed from the site within 48 hours; all other types of prohibited waste should be managed in accordance with the guidance document (see link below);
7. Unless otherwise approved by the Department in response to a written request from you, the DDMS must cease operation and all disaster debris must be removed from the sites on or before the expiration date of an Order that has been executed by the Department, unless it is modified or extended by further authorization.

The Department has also prepared a guidance document on the establishment, operation and closure of a DDMS for disaster debris. This guidance includes recommended practices, which you are expected to follow as much as practicable, as well as additional requirements from the Order. A copy of this guidance document is available on the DEP website http://www.dep.state.fl.us/mainpage/em/files/debris_guidance.pdf

If you have any questions or comments on this pre-authorization letter, please feel free to contact Rick Roudebush by E-mail at rick.roudebush@dep.state.fl.us or by phone at (239) 344-5653. In order to provide better service to you, the Department is using electronic documents as much as possible. Please provide your E-mail address when replying.

Sincerely,



5/18/2017

Ryan Snyder
South District

Date

RS / rr

Cc: rick.roudebush@dep.state.fl.us , samuel.cannon@em.myflorida.com ,
enrique.hernandez@em.myflorida.com , richard.knowles@em.myflorida.com ,
timothy.parsons@dos.myflorida.com , rick.roudebush@dep.state.fl.us , chad.fetrow@dep.state.fl.us ,
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Appendix H

Health and Safety Supplement

Purpose

The purpose of this Health and Safety Supplement is to support the existing City safety plan and/or procedures in regards to debris removal activities. These are recommended baseline safety provisions. Ultimately, health and safety is the responsibility of the contracted parties involved in debris removal activities. This document will outline some of the general steps necessary to provide a safe work environment for debris removal and monitoring employees. In addition, this document will identify some representative work hazards and the appropriate measures to reduce risk of injury.

1.0 Dissemination of Information

The debris removal contractor and monitoring firm project managers will be provided with this document and will be expected to disseminate the information and guidelines to their respective personnel. A copy of the document should be available for consultation. In addition, elements of the document will be reviewed periodically during the project to increase worker awareness.

2.0 Compliance

The debris removal contractor and monitoring firm project managers are responsible for health and safety compliance of their respective personnel and subcontractors. Any crews or individuals that are not compliant shall be suspended from debris removal activities until the situation is remedied. Frequent offenders of safety policies and procedures will be dismissed from the project entirely.

3.0 Job Hazard Assessment

Though debris removal activities are fairly similar among events, assessing the particular hazards of each disaster is an important part of maintaining health and safety for the debris removal workers. At a minimum, the following areas of focus should be considered as part of job hazard assessment:

- **Disaster Debris** – Disasters that result in property damage typically generate large quantities of debris which must be collected and transported for disposal. The type of debris varies depending on the characteristics of the region (e.g. terrain, climate, dwelling and building types, population, etc.) and the debris-generating event (e.g. type, event strength, duration, etc.). In addition, the disaster debris produces a host of uneven surfaces, which must be negotiated.

- **Debris Removal** – Often the removal of disaster debris involves working with splintered, sharp edges of vegetative or construction material debris. Many disasters involve heavy rains or flooding. Consequently, disaster debris is damp and heavier than usual. As weights increase, so does the risk of injury.
- **Removal Equipment** – In most disasters, debris must be removed from the public Right-of-Way (ROW) to provide access for emergency vehicles and subsequent recovery efforts. Debris collection and removal requires the use of heavy equipment and power tools to trim, separate and clear disaster debris.
- **Traffic Safety** – The ROW is located primarily on publicly-maintained roads. As a result, much of the debris removal process takes place in traffic of varying levels of congestion. In addition, disasters often damage road signs, challenging safety on the road.
- **Wildlife Awareness** – Disasters are traumatic events for people as well as wildlife. Displaced animals, reptiles and insects pose a hazard to debris removal workers.
- **Debris Disposal** – After disaster debris is collected it is often transported to a temporary disposal, storage and reduction site (DMS). Upon entry to a DMS, the monitoring firm will assess the volume of disaster debris being transported. The collection vehicle will then dispose of the disaster debris and the debris will be reduced either through a grinding operation or incineration. The DMS is a common area for injury. Response and recovery workers in this environment are more likely to be exposed to falling debris, heavy construction traffic, high noise levels, dust and airborne particles from the reduction process.
- **Climate** – Debris-generating disasters often occur in areas or seasons with extreme weather conditions. The effects of temperature and humidity on physical labor must be monitored, and proper work-rest intervals must be assessed.

4.0 Administrative and Engineering Controls

The use of administrative and engineering controls can greatly reduce the threats to public health and safety in debris removal activities. Some common administrative and engineering controls used in the debris removal process are:

Collection Operations

- Conduct debris removal operations during daylight hours only.
- Limit clean-up operations to one side of the road at a time.
- Limit collection work under overhead lines.

- Inspect piles before using heavy equipment to remove them to ensure that there are no hazardous obstructions.
- Make sure that all collection vehicles have properly functioning lights, horns and back-up alarms.
- Load collection vehicles properly (not overloaded or unbalanced).
- Cover and secure loads, if necessary.
- When monitoring the collection process, stay alert in traffic and use safe driving techniques.

Power Tools

- Inspect all power tools before use.
- Do not use damaged or defective equipment.
- Use power tools for their intended purpose.
- Avoid using power tools in wet areas.

Debris Reducing Machinery (Grinders/Wood Chippers)

- Do not wear loose-fitting clothing.
- Follow the manufacturer's guidelines and safety instructions.
- Guard the feed and discharge ports.
- Do not open access doors while equipment is running.
- Always chock the trailer wheels to restrict rolling.
- Maintain safe distances.
- Never reach into operating equipment.
- Use lock out/tag out protocol when maintaining equipment.

DMS/Disposal Operations

- Use jersey barriers and cones to properly mark traffic patterns.
- Use proper flagging techniques for directing traffic.
- Monitor towers must not exit into traffic and should have hand and guard rails to reduce trips and falls.
- Monitor towers must have properly constructed access stairways with proper treads and risers and proper ascent angle (4:1 height/width ratio).
- Monitor towers must be surrounded by jersey barriers which protect the tower and monitors from being struck by inbound or outbound collection vehicles.
- Monitor towers should be located upwind from dust- and particulate generating activities.
- A water truck should spray the site daily to control airborne dust and debris.

5.0 Personal Protective Equipment

Personal Protective Equipment (PPE) is the last resort to providing a safe working environment for workers. PPE does not eliminate or even reduce hazards as

administrative and engineering controls do. PPE works to reduce the risk of injury by creating a protective barrier between the individuals and work place hazards.

Proper use of PPE includes using PPE for its intended purpose. For example, using the wrong type of respirator might expose the worker to carcinogenic particulates. Properly fitting the equipment to the user may require examination by a medical professional. PPE that does not fit well will not provide maximum protection and will decrease the likelihood of the individual continuing to use the equipment. In addition, improper use may result in serious injury or death. The proper use of the equipment is outlined in detail in the manufacturer's instructions.

The following PPE may be applicable in standard ROW, Right-of-Entry (ROE), and vegetative and construction & demolition debris removal activities:

- **Head Protection** – Equipment designed to provide protection for an individual's head against hazards such as falling objects or the possibility of striking one's head against low hanging objects. PPE used to protect the head must comply with ANSI Z89.1-1986, "American National Standard for Personnel Protection - Protective Headwear for Industrial Workers – Requirements."
- **Foot Protection** – Equipment designed to provide protection for an individual's feet and toes against hazards such as falling or rolling objects, objects that may pierce the sole or upper section of the foot, etc. PPE used to protect the feet and toes must comply with ANSI Z-41-1991, "American National Standard for Personal Protection-Protective Footwear."
- **Hand Protection** – Equipment designed to provide protection for an individual's hands against hazards such as sharp or abrasive surfaces. The proper hand protection necessary is dependent upon the situation and characteristics of the gloves. For instance, specific gloves would be used for protection against electrical hazards while the same gloves may not be appropriate in dealing with sharp or abrasive surfaces.
- **Vision/Face Protection** – Equipment designed to provide protection for an individual's eyes or face against hazards such as flying objects. PPE used to protect eyes and face must comply with ANSI Z87.1-1989, "American National Standard Practice for Occupational and Educational Eye and Face Protection." Again, the proper eye/face protection necessary is dependent upon the situation and characteristics of the equipment. For instance, eye and face protection used by individuals who are welding may not be appropriate for individuals operating a wood chipper.
- **Hearing Protection** – Equipment designed to provide protection for an individual's hearing against prolonged exposure to high noise levels. According to OSHA, the permissible level of sound is an average of 90 decibels over the course of an eight (8) hour work day. Above the sound exposure level, hearing

protection is required. PPE used to protect hearing must comply with ANSI S3.19-1974, "American National Standard Practice for Personal Protection-Hearing Protection."

- **Respiratory Protection** – Equipment designed to provide protection for an individual's respiratory system against breathing air contaminated with hazardous gases, vapors, airborne particles, etc. PPE used to the respiratory system must comply with ANSI Z88.2-1992. In addition, the use of respiratory protection requires a qualitative fit test and in some cases a pulmonary fit test by a licensed medical professional.

6.0 PPE Debris Removal Activity

PPE requirements are made based upon the results of the job hazards assessment. The following list of PPE is organized by debris removal activity and is meant to be a representative list. Specific PPE requirements vary from location to location. In general, individuals involved in the debris removal process should personally monitor water consumption to avoid dehydration and use appropriate skin protection (breathable clothes, light colors, sunscreen, etc.). Ultimately, the selection of PPE is the responsibility of the debris removal contractor and monitoring firm project managers.

Debris Collection Monitoring

The hazards of disaster debris collection monitoring include, but are not limited to: struck by vehicles, falls or trips on uneven surfaces, cuts, abrasions or punctures from vegetative or C&D sharps. PPE requirements include:

- Reflective vest;
- Foot protection (rugged shoes or boots, steel toe and shank if required); and
- Long pants.

Debris Disposal Monitoring

The hazards of disaster debris disposal monitoring include, but are not limited to: struck by or caught in/between vehicles, falls or trips on stairs or uneven surfaces, cuts, abrasions or punctures from vegetative or C&D sharps and struck by falling disaster debris. Monitor towers must be equipped with a first aid kit. PPE requirements include:

- Reflective vest;
- Foot protection (rugged shoes or boots, steel toe if required);
- Long pants; and
- Hard Hat.

Debris Removal

The hazards of disaster debris removal include, but are not limited to: struck by vehicles, falls or trips on uneven surfaces, cuts, abrasions or punctures from vegetative or C&D sharps and airborne debris. In addition, PPE requirements include:

- Reflective vest;
- Vision and hearing protection;
- Foot protection (rugged shoes or boots, steel toe and shank if required); and
- Long pants.

Debris Disposal and Reduction

The hazards of disaster debris disposal and reduction include, but are not limited to: struck by or caught in/between vehicles, falls or trips on uneven surfaces, cuts, abrasions or punctures from vegetative or C&D sharps, struck by falling disaster debris and airborne particles. PPE requirements include:

- Reflective Vest;
- Foot protection (rugged shoes or boots, steel toe if required);
- Vision and hearing protection;
- Long pants;
- Gloves; and
- Hard Hat.

Debris Cutting and Trim Work

The hazards of disaster debris cutting and trimming work include, but are not limited to: struck by or caught in/between vehicles, falls or trips on uneven surfaces, cuts, abrasions or punctures from power tools, vegetative or C&D sharps, struck by falling disaster debris and airborne particles. PPE requirements include:

- Reflective Vest;
- Hand and Foot protection (rugged shoes or boots, steel toe if required);
- Vision and hearing protection
- Long pants; and
- Hard Hat

For additional information regarding health and safety requirements, contact OSHA.

Health and Safety Contact Information	
Occupational Safety & Health Administration	800-321-6742
City Contact	(941) 429-7130

Appendix I

FEMA Letter of Plan Approval

U.S. Department of Homeland Security
Region IV
3603 Chambliss-Tucker Road
Atlanta, GA 30341



FEMA

June 30, 2014

Mr. Bryan W. Koon, Director
Florida Division of Emergency Management
2555 Shumard Oak Boulevard
Tallahassee, Florida 32399-2100

Attention: Steve Hyatt

Reference: Public Assistance Pilot Program
Debris Management Plan Review
City of North Port

Dear Mr. Koon:

This letter responds to the Florida Division of Emergency Management request dated April 22, 2014, for the U.S. Department of Homeland Security's Federal Emergency Management Agency (FEMA) to accept the City of North Port's Debris Management Plan (Plan) for participation in the Public Assistance (PA) Alternative Procedures Pilot Program for Debris Removal. This pilot program allows a one-time two (2) percent Federal cost share increase for debris removal operations performed within 90 days from the start of the incident period of a major disaster or emergency declaration.

FEMA Region IV has determined that the Plan:

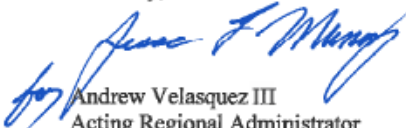
- Contains the basic planning elements of a Debris Management Plan along with at least one prequalified debris and wreckage removal contractor (see enclosed Debris Management Plan Checklist). Therefore, FEMA has determined the Plan is acceptable. Accordingly, the City of North Port may receive a one-time two (2) percent Federal cost share increase as part of the PA Alternative Procedures Pilot Program for Debris Removal. Your office should notify FEMA when the City of North Port wishes to apply the incentive to its debris removal work.**
- Does not contain the basic planning elements as noted in the enclosed Debris Management Plan Checklist. The City of North Port may revise its Plan and resubmit it to FEMA, through your office, for reconsideration.

www.fema.gov

Once the Plan is accepted, it does not mean that FEMA is approving any operational component of the plan nor does it mean that the Federal government will fund work conducted under any aspect of the Plan. Eligibility of costs for debris removal and management in a declared major disaster or emergency will be determined based on established PA Program authorities, regulations, policies and guidance. Subgrantees must comply with Federal procurement requirements (i.e., competitive bidding), as outlined in 44 CFR §13.36 in the procurement of debris removal services.

If you have questions or need additional information, please contact Mr. Jesse F. Munoz, CEM, Director, Recovery Division, at (770) 220-5300.

Sincerely,



Andrew Velasquez III
Acting Regional Administrator