

## SECTION 321030

### RESTORATION BY SEEDING OR SODDING

#### PART 1 - GENERAL

##### 1.1 SCOPE

- A. The work in this section consists of furnishing all labor, material and equipment to restore all areas disturbed during construction to match preconstruction conditions. Establish a stand of grass within the areas disturbed by furnishing and placing grass sod where required, or by seeding and mulching areas not requiring sod.

##### 1.2 REFERENCES

- A. Use materials conforming to the requirements of Florida Department of Transportation Standard Specifications for Road and Bridge Construction as follows:
1. Section 570 – Performance Turf
  2. Section 981 – Turf Materials
  3. Section 982 – Fertilizer
  4. Section 983 – Water for Grassing
- B. City of North Port Administrative Code, Chapter 22 Environmental and Natural Resources, Article II – Fertilizer and Landscape Management

##### 1.3 SUBMITTALS

- A. Submit certifications and identification labels for all seeding or sodding supplied in accordance with Division 01 General Requirements, Section 013000 Shop Drawings, Submittals and Samples.

#### PART 2 - PRODUCTS

##### 2.1 SODDING

- A. Types: Sod may be of either St. Augustine or Argentine Bahia grass or as that disturbed, as established prior to construction. Use well matted sod with roots. When replacing sod in areas that are already sodded, use sod of the same type as the existing sod.

- B. Provide sod as required in accordance with Florida Department of Transportation Specifications. Furnish sod equal to and similar in type as that disturbed. Place and water in accordance with FDOT Specifications.
- C. Use sod in commercial-size rectangles, preferably 12-inch by 24-inch or larger, except where 6-inch strip sodding is called for.
- D. Use sod that is sufficiently thick to secure a dense stand of live grass. Use sod that is live, fresh and uninjured at the time of planting, having a soil mat of sufficient thickness adhering firmly to the roots to withstand all necessary handling. It shall be reasonably free of weeds and other grasses. Plant sod as soon as possible after being dug, and shade and keep moist from the time it is dug until it is planted.
- E. Handle sod in a manner to prevent breaking or other damage. Do not handle by dumping from trucks or other vehicles. Use care to retain the native soil on the roots of each sod roll during stripping and handling. Sod that has been damaged by handling during delivery, storage or installation will be rejected.
- F. Swales: Place sod to the proper grade and cross section in all flow areas to ensure the design flow of water in the ditch. In excavating for the placement of sod, provide a minimum of 3 inches of undercut.

## 2.2 FERTILIZER

- A. Supply chemical fertilizer in accordance with the City of North Port Administrative Code, Chapter 22 Environmental and Natural Resources, Article II – Fertilizer and Landscape Management.

## 2.3 EQUIPMENT

- A. Spread fertilizer uniformly at the specified rate.

## 2.4 SEEDING

- A. Seed all unpaved areas disturbed during construction that do not require sod. Complete all seeding in conformance with FDOT Specifications Sections 570 and 981. Mulch the grassed areas in accordance with FDOT Specifications. Fertilize the grassed areas in accordance with City of North Port Administrative Code.
- B. Provide mulch material free of weeds. Mulch shall be oat straw or rye, Pangola, peanut, Coastal Bermuda, or Bahia grass hay.

- C. All seeds must have been tested within 6 months of planting. Submit a seed bag tag with final payment requests from each type or mixture of seed used.

## 2.5 TOPSOIL

- A. Topsoil stockpiled during excavation may be used. If additional topsoil is required to replace topsoil removed during construction, it shall be obtained off site at no additional cost to the City. Topsoil shall be fertile, natural surface soil, capable of producing all trees, plants, and grassing specified herein.

## 2.6 MULCH

- A. Furnish small grain straw mulch. Apply mulch at a rate of 1.5 tons per acre, corresponding to a depth not less than 1-inch or more than 3-inches according to texture and moisture content of mulch material. Apply asphalt emulsion at a rate of 150 gallons per ton of straw to anchor the straw applied.

## 2.7 WATER

Where water is required, the Contractor shall purchase it from the City. A meter will be installed on a fire hydrant, location to be determined by the Contractor and coordinated with the City. The Contractor shall pay all fees and water usage charges. Water is required during seeding and sodding operations and through the maintenance period and until the work is accepted. The Contractor shall make any arrangements that may be necessary to ensure there is an adequate supply of water to meet the needs for the work. The Contractor shall furnish all necessary hose, equipment, attachments, and accessories for the adequate irrigation of lawns and planted areas as may be required. Water shall be suitable for irrigation and free from ingredients harmful to plant life.

## PART 3 – EXECUTION

### 3.1 SOD BED PREPARATION

- A. Clear areas to be sodded and/or seeded of all rough grass, weeds, and debris, and bring soil to an even grade.
- B. Thoroughly till soil to a minimum 4-inch depth.
- C. Bring area to proper grade, free of sticks, stones, or other foreign matter over 1 inch in diameter or dimension. The surface shall conform to finish grade, less the thickness of sod, free of water-retaining

depressions, the soil friable and of uniformly firm texture.

### 3.2 INSPECTION

- A. Verify that any related preceding work has been completed.
- B. Do not start work until conditions are satisfactory.

### 3.3 SOD HANDLING AND INSTALLATION

- A. During delivery, prior to planting, and during the planting of sod areas, protect the sod panels from excessive drying and unnecessary exposure of the roots to the sun. Stack sod during construction and planting so it is not damaged by sweating or excessive heat and moisture.
- B. After completion of preparation as specified above, lay sod panels tightly together to make a solid sodded lawn area. On mounds and other slopes, the long dimension of the sod shall be laid perpendicular to the slope. Immediately following sod laying, roll the lawn areas with a lawn roller customarily used for such purposes, and then thoroughly water.
- C. Place sod at all areas where sod existed prior to construction, on slopes of 3 horizontal to 1 vertical (3:1) or greater, in areas where erosion of soils will occur, and as directed by the Engineer or Owner. On areas where the sod may slide, due to height and slope, the Engineer or Owner may direct that the sod be pegged, with pegs driven through the sod blocks into firm earth, at suitable intervals.

### 3.4 SOD MAINTENANCE

- A. The sod shall produce a dense, well-established growth. Repair and re-sod all eroded or bare spots until project acceptance. Repair to sodding shall be accomplished as in the original work.
- B. Perform sufficient watering to maintain adequate moisture for optimum development of the seeded and sodded areas, and no less than 1.5 inches of water per week for at least 2 weeks. Thereafter, apply water for a minimum of 60 days as needed until the sod takes root and starts to grow or until final acceptance, whichever is latest.

### 3.5 FERTILIZER RESTRICTIONS

- A. Consideration shall be given to City of North Port Code of Ordinances, Chapter 22 Article II, Section 22-57, Timing of Application, Fertilizer and Landscape Management. City of North Port Resolution Number

2018-R-26 which encourages a voluntary non-use of fertilizer year-round shall also be considered.

3.6 GUARANTEE

- A. Guarantee a live and vigorous stand of permanent grass at the time of acceptance of the work consisting of 80 percent minimum coverage for seeded grass areas with no bare spots greater than 5 square feet.

3.7 CLEANING

- A. Remove debris and excess materials from the project site.

END OF SECTION