SECTION 332030

ROADWAY CROSSINGS BY OPEN CUT

PART 1 - GENERAL

1.1 SCOPE

A. Provide all labor, materials, equipment, supervision and incidentals required to install the pipeline as shown on the Drawings by method of open cut.

Note: Open cutting of existing pavement is generally not preferred, but may be considered under one or more of the following conditions:

- Subsurface obstructions including rock;
- 2. Extreme high water table;
- 3. Limited space for jack and bore pits;
- 4. Condition of roadway surface including imminent resurfacing and rebuilding, provided inspection and approval beforehand is made by the City; or
- 5. Extreme economic hardship is proven with adequate supportive data.

1.2 SUBMITTALS

- A. Submit shop drawings to the Engineer for review.
- B. Before starting work, submit to the City, with a copy to the Engineer, a detailed schedule of the operations a minimum of fourteen (14) days prior to beginning work for approval. This shall include, but not be limited to, type and extent of temporary paving, and drawings and lists describing materials and traffic control methods to be used. Approval shall not relieve the Contractor of his obligation to provide a safe and proper crossing.
- C. If a detour is required, submit a traffic control plan for approval to the City and/or the Florida Department of Transportation (FDOT).
- D. Submit a plan for maintenance of traffic in accordance with FDOT Design Standards and Specifications.

PART 2 - PRODUCTS

2.1 MATERIALS

A. Use materials specified in other applicable portions of this Specification.

PART 3 – EXECUTION

- 3.1 GENERAL
- A. Trench dimensions for open cutting of road crossings are shown on the Drawings and/or Details.
- B. Where possible, limit the completion of the open-cut road crossing to a 24-hour period. Perform all work in accordance with the approved traffic control plan.
- C. Notify the City forty-eight (48) hours in advance of starting construction.
- 3.2 INSTALLATION
- A. Temporary Roadways
 - For temporary roadways required for traffic relocation use materials meeting the requirements of the FDOT. Use temporary roadways when crossing a state highway right-of-way or at the direction of the Engineer or the City.
 - 2. Maintain temporary roadways in good condition throughout their use.
 - 3. Maintain drainage through all existing ditches by the use of culvert pipe as necessary.
 - 4. Submit drawings indicating the type and location of temporary roadways for approval by the Engineer and/or City prior to beginning work.
 - 5. Provide all necessary barricades and signs where detours are permitted as required to divert the flow of traffic. Notify the City and Engineer in advance of planned detours. While traffic is detoured, expedite construction operations to minimize the period of detour.
 - 6. Perform and complete all work at the roadway crossing in a manner fully satisfactory to the City and FDOT (if applicable).
 - B Maintenance of Traffic

- 1. The Contractor shall furnish during construction and any subsequent maintenance within State secondary road right-of-ways and City streets, proper signs, signal lights, flagmen, and other warning devices for the protection of traffic all in conformance with the latest Manual on Uniform Traffic Control and Safe Streets and Highways, and the Florida Manual of Traffic Control and Safe Practices for Street and Highway Construction, Maintenance and Utility Operations. The Engineer, City, or FDOT Manager of the right-of-way or their representatives reserves the right to stop any work for non-compliance.
- 2. The Contractor shall take precautions to prevent injury to the public due to open trenches. Night watchmen may be required where special hazards exist, or police protection provided for traffic while work is in progress. Contractor shall be fully responsible for damage or injuries whether or not police protection has been provided.
- 3. Unless permission to close a city street is received in writing from the proper authority, the Contractor shall place all excavated material so that vehicular and pedestrian traffic may be maintained at all times. Repair the road surface, provide temporary ways, erect wheel guards or fences, or take other measures for safety satisfactory to the Engineer if the Contractor's operations cause traffic hazards.
- 4. The Contractor shall be fully responsible for the installation of adequate safety precautions, for maintenance of the channelization devices, and for the protection of the traveling public.
- 5. The Contractor shall maintain at all open cut crossings, a minimum of one-way traffic during the daylight hours, and two-way traffic at night.

C. Installation of Pipeline

- 1. Meet the requirements of the applicable portions of this specification for pavement removal, sheeting, shoring and bracing, excavation and backfill, and dewatering.
- 2. Install the pipe in accordance with Division 33 of these Specifications.
- 3. Backfill the trench in accordance with the requirements of Section 311020.
- 4. Replace pavement in accordance with the requirements of Section 321010.

END OF SECTION