

## SECTION 01000

### GENERAL REQUIREMENTS

#### PART 1 - GENERAL

##### 1.0 PROJECT LOCATION

(Describe in general terms the location of the project)

##### 2.0 DESCRIPTION OF WORK

(Describe in general terms the project)

##### 3.0 SCOPE OF WORK

- A. The work to be performed by the Contractor includes furnishing all materials, labor, tools, equipment, water light, power, transportation, superintendence, temporary construction of every nature, and all other services and facilities of every nature whatsoever necessary to modify, construct, complete, deliver and place in operation the subject Project as shown on the Drawings and/or as herein described as specified. All work to be in accordance with the Contract Documents.
- B. All material, equipment, labor and work to be furnished for the successful construction of this project shall be in strict compliance with the latest edition of all applicable codes, standards and referenced specifications, as well as all contract documents summarized herein.
- C. Submittals - Project submittals of all types required for this work are identified throughout the project conditions and specifications in each section. The Contractor shall be responsible for properly executing each submission with the correct forms and procedures. General requirements with respect to submittals are given in Section 01300.
- D. All work performed under the Northern contract shall conform to the latest edition of the Northern Engineering Standards Manual, unless authorized by the District Engineer. Northern Standards shall govern unless local standards prove to be more stringent.

##### 4.0 REFERENCE POINTS

- A. The reference points which will be provided by the Owner as mentioned in Article 4.4 of the General Conditions, will be the staking (or otherwise marking) of the baseline as shown on the drawings. A benchmark for vertical control will also be provided. All construction staking to be provided by the Contractor.
- B. Laying Out Work – Contractor shall, immediately upon entering project site for purpose of beginning work, locate all reference points and take such action as is necessary to prevent their destruction; lay out their own work and be responsible for all lines, elevations and measurements of the grading, excavation and/or the rework executed by them under the contract. They must exercise proper precaution to verify figures shown on drawings before laying out work and will be held responsible for any error resulting from their failure to exercise such precaution.

## **5.0 EXAMINATION OF DOCUMENTS AND SITE**

### **A. Examination Of Documents**

1. The Contractor, in undertaking the work of this contract, shall have thoroughly examined and familiarized themselves with all contract and project documents in regards to the extent of work required. No consideration will be given any claim based on lack of knowledge or understanding of the contract documents.
2. The Contractor is responsible for furnishing and installing all items identified or detailed in the Contract Drawings whether or not they are listed in the Contract Specifications. Conversely, they shall also furnish and install all items specified whether or not they be identified or detailed in the contract drawings.
3. The Contractor shall immediately inform the Engineer in writing of discrepancies or ambiguities; and request a clarification before proceeding with the work in the area of question.

### **B. Examination of the Site**

1. Each bidder shall before submitting their proposal, visit and examine the premises to satisfy themselves as to the scope of work, existing conditions and any difficulties attending to the performance of this work.
2. Once selected, the Contractor is assumed to have visited the site and to have taken into consideration all conditions which might affect their work.
3. No consideration will be given any claim based on lack of knowledge of existing conditions except where the contract documents make a definite provision for adjustment of cost or extension of time due to existing conditions which cannot be readily ascertained.

## **6.0 PROTECTION OF EXISTING STRUCTURES AND UTILITIES**

- A. All known utilities have been shown on the drawings according to the best information available. It is the Contractor's responsibility to contact all owners of structures or utilities above ground, on the surface, or below the ground, within the Project area so that said owners may stake or otherwise mark or protect their facilities. The Contractor must provide facilities and be responsible for the protection of all structures, buildings and utilities, underground, on the surface, or above ground against trenching, dewatering, or any other activity connected with the Work throughout the entire Contract Time.
- B. When structures and utilities have been properly shown or marked and are disturbed or damaged in the execution of the Work, they must be repaired immediately in conformance with best standard practice and the approval of the owner of the damaged utility or structure. In the case of structures and utilities which have not been properly shown or located as outlined above and are disturbed or damaged in the prosecution of the Work, take whatever steps are necessary for safety and notify the affected utility owner and avoid any actions which might cause further damage to the structure or utility.

- C. Should the Work require repairs, changes or modifications of the Owner's utilities as well as other utilities, it is the responsibility of the Contractor to provide for the maintenance of continuous water, sewage, electric, telephone and other utility services to all present customers of such utilities, unless approval in writing is secured from the applicable utility company or Owner for interruption of such service.
- D. The Contractor, before beginning any excavation or demolition under this Agreement, shall provide to the Engineer the "Notice of Compliance with Chapter 556, Florida Statutes", identified in paragraph 8.13 of the Agreement.

## **7.0 COORDINATION**

### **A. Responsibilities**

- 1. Only the General Contractor shall be recognized as part of this contract. It shall be their responsibility to turn over to the Owner a complete project in all respects in accordance with these drawings and specifications.
- 2. The Contractor shall generally coordinate the work of all trades and be responsible for supervising the proper fabrication, delivery, storage, handling and installation of all work.

- B. Cooperation - The General Contractor and all subcontractors shall cooperate with one another and with other Contractors and Land Owner doing related work, and shall coordinate their work with the work of other trades and other Contractors so as to facilitate the general progress of the work. Each trade shall afford all other Contractors every reasonable opportunity for the installation of their work and for the storage of their materials.

## **8.0 MAINTENANCE OF TRAFFIC**

- A. In the Contractor's use of streets and highways for the Work to be done under these Specifications, conform to all Municipal, County, State and Federal laws and regulations as applicable. Provide, erect and maintain effective barricades, warning lights, and signs on all intercepted streets or highways for protection of the Work and safety of the public. All barricades or obstructions which encroach on or are adjacent to the public rights of way should be provided with lights which are illuminated at all times between sunset and sunrise.
- B. Arrange Work to cause minimum disturbance of normal pedestrian and vehicular traffic and be responsible for providing suitable means of access to all public and private properties during all stages of the construction. Other than for an emergency safety condition, the Contractor must contact the Owner and Engineer for approval prior to completely blocking off any street to vehicular traffic during construction.
- C. Maintain traffic in accordance with Section of the Florida Department of Transportation Standard Specifications for Road and Bridge Construction, latest edition.
- D. Contractor is responsible for preparing a Maintenance of Traffic Plan. Submit plan to roadway authority (City, County, DOT) for review.

The Maintenance of Traffic Plan must be prepared by a person who is certified by the State of Florida to prepare such plan.

- E. When the Bid Form does not include a separate item for Maintenance of Traffic, the costs are to be included for payment under the several scheduled items on the Bid Form, and no separate payment will be made thereof.

## **9.0 PLACING EQUIPMENT INTO SERVICE**

- A. Do not operate or place into service or energize electrical and mechanical equipment until approved by the Owner and Engineer. Such approval may be granted only after all interested parties have been duly notified, have given approval for placing the equipment into service, and all interested parties are present or waived their right to be present. Notify the Owner and Engineer as far in advance as possible of the dates that various items and equipment will be completed and ready for start-up.

## **10.0 SALVAGEABLE MATERIAL**

- A. All salvageable material and/or equipment removed from the existing construction for which specific use, relocation or other disposal is not specifically noted on the Drawings or otherwise specified, will remain the property of the Owner and be turned over to him. All material and/or equipment not in salvageable condition as determined by the Engineer must be disposed of by the Contractor. The actual storage site for salvageable material will be designated by the Owner.

## **11.0 BORING LOGS, OTHER REPORTS AND DRAWINGS UTILIZED BY ENGINEER**

- A. Boring logs, other reports and Drawings utilized by the Engineer, if attached at the end of these Specifications, are provided for Contractor's information in accordance with paragraph 4. of the Instruction to Bidders and are not a part of the Contract Documents. There is no technical data in the Boring Logs, other reports or Drawings that should be relied on by the Contractor. There also were no other reports or drawings utilized by Engineer in preparation of the Contract Documents that contained data that could be relied on by the Contractor.

## **12.0 DISPOSAL OF EXCAVATED MATERIALS AND DEBRIS**

- A. All excess excavated material is to remain the property of the Property Owner. All debris not allowed for backfill (unless otherwise noted), broken pipe, sidewalks, curbs and other concrete items, together with all roots, boards and other debris are to be disposed of by the Contractor at an appropriate legal site.

## **13.0 UTILITY STANDARDS**

- A. All materials, construction and documentation for the water system shall be in accordance with the (Name of Utility Supplying Water and Wastewater Services). Information on the plans and within the standards of Appendix "B" (if needed), supersede the remainder of the specifications contained herein. Appendix B of the Project Manual contains the following excerpts from the (Name of Utility Supplying Water and Wastewater Services).

## **14.0 PROTECTION OF EXISTING OVERHEAD/UNDERGROUND ELECTRICAL LINES AND UTILITIES**

- A. The Contractor shall be responsible for the protection of all existing overhead and underground electrical lines and utilities whether or not shown on the plans. The Contractor shall be responsible to coordinate and pay for the de-energizing of power lines and/or power poles during construction at no additional cost to the Owner.

## **15.0 POLLUTION PREVENTION PLAN**

- A. A Pollution Prevention Plan shall be prepared and submitted to the Owner and Engineer which demonstrates the mechanisms and practices that will be employed to protect the construction site and surrounding area during construction. The Plan shall be consistent with Federal National Pollutant Discharge Elimination System (NPDES) permit requirements pertaining to pollution prevention plans. The plan shall include, but not be limited to, the locations of silt barriers, turbidity screens or temporary sheeting, emergency response practices, and other methods to prevent pollution. Refueling or storage of vehicles or equipment that utilize petroleum based products shall be prohibited anywhere within 50 feet of a water's edge.
- B. The Contractor is to submit and obtain a NPDES permit and comply with its requirements.
- C. Implement Plan during the progress of the Work.

## **16.0 COORDINATION/PROGRESS MEETINGS**

- A. Contractor's project manager and a representative of subcontractor performing work at the time of meeting shall attend on onsite coordination/progress meeting(s) during the progress of the Work. Coordination and progress meetings are to be specified by the Project Engineer.

## **17.0 WORK SCHEDULE**

- A. (Describe in general terms the Work Schedule). A work schedule shall be provided by the Contractor at the beginning of the project and updated on a monthly basis and at the time of pay application for request of payment.

**END OF SECTION**

MEASUREMENT AND PAYMENT

**PART 1 - GENERAL**

**1.01 SECTION INCLUDES**

- A. Measurement and payment criteria applicable to the Work performed under a Unit Price payment method.

**1.02 GENERAL**

- A. The Contractor shall receive and accept the compensation provided in the Proposal and the Contract under a unit price payment method for performing all operations necessary to complete the work under the Contract, and also payment for all loss or damages between the actual quantities of work and quantities herein estimated by the Project Engineer, or from the action of the elements or from any unforeseen difficulties which may be encountered during the prosecution of the work until the final acceptance by the Owner.
- B. The prices stated in the Proposal include all costs and expenses for taxes, labor, equipment, materials, commissions, transportation charges and expenses, patent fees and royalties, labor for handling materials during inspections, together with any and all other costs and expenses for performing and completing the work as shown on the Plans and specified herein. The basis of payment for an item at the unit price shown in the Proposal shall be in accordance with the description of that item in this Section.
- C. The Contractor's attention is again called to the fact that the quotations for the various items of work are intended to establish a total price for completing the work in its entirety. Should the Contractor feel that the cost for any item of work has not been established by the Bid Form or Payment Items, the Contractor shall include the cost for that work in some other applicable bid item, so that their proposal for the project does reflect their total price for completing the work in its entirety.

**1.03 VOLUME MEASUREMENT**

- A. Measured by cubic dimension using mean length, width, and height or thickness.
- B. For excavation of lakes, canals, ditches, etc., material will be measured after clearing and grubbing of the site in its original position ("in place") by a Professional Surveyor and Mapper who is licensed in the State of Florida. The Contractor will retain the Surveyor. Quantities will be based on before and after cross sections determined by the Surveyor after clearing and grubbing of the site. Payment will not be made for excavation beyond the lines shown on the Drawings.

**1.04 AREA MEASUREMENT**

- A. Measured by square dimension using mean length and width or radius.

## **1.05 LINEAR MEASUREMENT**

- A.** Measured by linear dimension, at the item centerline or mean chord.
- B.** For pipelines, the length will be measured from center of structure or fitting to center of structure of fitting.

## **PART 2 - MATERIAL (NOT USED)**

## **PART 3 - EXECUTION**

### **3.01 MEASUREMENT AND PAYMENT**

- A.** The quantities for payment under this Contract shall be determined by actual measurement of the completed items, in place, ready for service and accepted by the Owner, in accordance with the applicable method of measurement therefore contained herein unless otherwise stated. A representative of the Contractor shall witness all field measurements.
- B.** The Project Engineer will take all measurements and compute quantities unless noted otherwise herein.
- C.** Contractor to assist Project Engineer by providing necessary equipment, workers, and survey personnel as required.
- D.** Quantities and measurements indicated in the Bid Form are for bidding and Contract purposes only. Quantities and measurements supplied or placed in the Work and verified by the Project Engineer will determine payment. Waste will not be included in the measurements or quantities.
- E.** If the actual Work requires more or fewer quantities than those quantities indicated, provide the required quantities at the Contract Unit Price.
- F.** Payment for all work completed under this Contract shall be in accordance with the provisions of the Contract and upon the basis of specific provisions of this Section of the Contract Documents. The bid items for furnishing and installing work under the Contract shall include full compensation for completing all activities not limited to selling, delivery, construction, testing, vandalism, or breakage.
- G.** Payment Includes: Full compensation for all required labor, products, tools, equipment, plant, transportation, services and incidentals; erection, application or installation of an item of the Work; overhead and profit.
- H.** Final payment for Work governed by unit prices will be made on the basis of the actual measurements and quantities accepted by the Project Engineer multiplied by the unit price for Work which is incorporated in or made necessary by the Work.
- I.** Payment for lump sum items will be made on the basis of percentage complete as approved by the Project Engineer.

**END OF SECTION**

## SECTION 01068

### DEFINITIONS AND STANDARDS

#### PART 1 - GENERAL

##### 1.01 DEFINITIONS

A. Except as specifically defined otherwise, the following definitions supplement definitions of the Contract, General Conditions, Supplementary Conditions and other general contract documents, and apply to the work.

1. Owner: **NORTHERN PALM BEACH COUNTY IMPROVEMENT DISTRICT (NPBCID)**  
359 Hiatt Drive  
Palm Beach Gardens, FL 33418  
Phone: 561-624-7830
2. General Requirements: Provisions of Division 1 sections of these specifications.
3. Indicated: Shown on drawings by notes, graphics or schedules, or written into other portions of Contract Documents. Terms such as "shown", "noted", "Scheduled" and "Specified" have same meaning as "indicated", and are used to assist the reader in locating particular information.
4. Directed, Requested, Approved, Accepted, etc.: These terms imply "by the Engineer", unless otherwise indicated.
5. Approved by the Engineer: In no case releases Contractor from responsibility to fulfill requirements of Contract Documents.
6. Project Site: Space available to Contractor at location of project, either exclusively or to be shared with separate contractors, for performance of the work.
7. Furnish: Supply and deliver to project site, ready for unloading, unpacking, assembly, installation, and similar subsequent requirements.
8. Install: Operations at project site, including unloading, unpacking, assembly, erection, placing, anchoring, applying, working to dimension, finishing, curing, protecting, cleaning, and similar requirements.
9. Provide: Furnish and install, complete and ready for intended use.
10. Engineer: **NAME OF PROJECT ENGINEER OR CONSULTING ENGINEER designated by NPBCID to represent them on this project as the "ENGINEER". At times the District Engineer will be the designated owner's representative and will serve in the capacity of "ENGINEER".**  
  
(Name, Address, Telephone Number, Fax and Email Address)
11. Contractor: Prime, General Contractor; the Vendor named in the Contract.
12. Construction Completion Date: Substantial Completion Date. (Substantial Completion Date" is defined in the General Conditions.)
13. Day: Calendar day.

14. **Installer:** Entity (firm or person) engaged to install work, by Contractor, subcontractor or sub-subcontractor. Installers are required to be skilled in work they are engaged to install.
15. **Specification Text Format:** Construction Specification Institute (CSI) Master Format.
16. **Overlapping/Conflicting Requirements:** Most stringent (generally) language written directly into Contract Documents is to be used. Overlapping/conflicting requirements do not indicate that a less stringent requirement might be acceptable. Refer uncertainties to Engineer for decision before proceeding.
17. Where optional requirements are specified in a parallel manner, option is intended to be Contractor's unless otherwise indicated.
18. **Minimum Requirements:** Indicated requirements are for a specific minimum acceptable level of quality/quantity, as recognized in the industry. Actual work must comply (within specified tolerances), or may exceed minimums within reasonable limits. Refer uncertainties to Architect/Engineer before proceeding.
19. **Abbreviations, Plural Words:** Abbreviations, where not defined in Contract documents, will be interpreted to mean the normal construction industry terminology, determined by recognized grammatical rules, by the Engineer. Plural words will be interpreted as singular and singular words will be interpreted as plural where applicable for context of Contract Documents.
20. **Testing Laboratory:** An independent entity engaged for the project to provide inspections, tests, interpretations, reports and similar services.

## **1.02 STANDARDS AND REGULATIONS**

- A. **Industry Standards:** Applicable standards of construction industry have same force and effect on performance of the work as if copied directly into Contract Documents or bound and published herewith. Standards referenced in Contract Documents or in governing regulations have precedence over non-referenced standards, insofar as different standards may contain overlapping or conflicting requirements. Comply with standards in effect as of date of Contract Documents, unless otherwise indicated.
- B. **Abbreviations:** Where abbreviations or acronyms are used in Contract Documents, they mean the well recognized name of entity in building construction industry. Refer uncertainties to Engineer before proceeding.
- C. **Trade Union Jurisdictions:** Maintain current information on jurisdiction matters, regulations, actions and pending actions; and administer/supervise performance of work in a manner which will minimize possibility of dispute, conflicts, delays, claims, or losses.
- D. **Trades:** Except as otherwise indicated, the use of titles such as "carpentry" in specification text, implies neither that the work must be performed by an accredited or unionized tradesperson of corresponding generic name (such as "carpenter"), nor that specified requirements apply exclusively to work by tradesperson of that corresponding generic name.

**END OF SECTION**

## SECTION 01200

### PROJECT MEETINGS

#### PART 1 - GENERAL

##### **1.01 DESCRIPTION**

- A. The Contractor and Engineer or Engineer's representative shall be required to attend all scheduled project meetings.
- B. The location, date and time of project meetings shall be determined by the Project Engineer.

##### **1.02 PRECONSTRUCTION CONFERENCE**

- A. A preconstruction conference will be held within fourteen (14) days of the "Notice To Proceed" and before the commencement of work.
- B. See Section 01300 for submittals required at preconstruction conference.

##### **1.03 PROGRESS MEETING**

At least once a month there shall be project progress meeting. The meeting will be attended by a representative of the Owner, the Contractor, Engineer and such others as may be deemed appropriate at the time. The Engineer will coordinate these meetings.

##### **1.04 MEETINGS**

The Owner, the District Engineer and Engineer, reserve the right to convene other meetings that are deemed to be in the best interest of the Owner.

##### **1.05 CONTRACT ADMINISTRATION**

Contract Administration and project meetings shall be handled by the Engineer. The Engineer will provide construction observations at regular intervals to ensure compliance with the Contracts Documents.

##### **1.06 AGENDA**

The following topics will be discussed as well as other site-specific topics at the Pre-construction meeting.

- 1 Organizational arrangement of Contractor's forces and personnel, and those of subcontractors, materials suppliers, and the Engineer;
- 2 Channels and procedures for communication;
- 3 Construction schedules, sequence of critical work, schedule of values, details, work by subcontractors, offsite fabrication, revisions, updating, maintenance, reissue;
- 4 Contractor documents, including distribution of required copies of drawings and revisions;
- 5 Processing of Shop Drawings and other data submitted to the Engineer for review;

- 6 Processing of field decisions and Change Orders;
- 7 Project signs; PPD or BOR, Felony Trespassing, and Anti-Harassment. (No other signs are allowed.)
- 8 Assignment of Vehicular Parking and Staging Area;
- 9 Permits;
- 10 Tree protection;
- 11 Completion – time extensions – liquidated damages;
- 12 Storage facilities;
- 13 Working hours;
- 14 Utility Outages, temporary power, and metering;
- 15 Completion inspections – substantial and final;
- 16 Payment procedures and forms;
- 17 “As-Built” drawings and manuals;
- 18 Workmanship and quality;
- 19 Site supervision including work by subcontractors and sub-subcontractors.

**END OF SECTION**

## SECTION 01300

### SUBMITTALS

#### **PART 1 GENERAL**

##### **1.00 DESCRIPTION**

- A. Submittals from the Contractor to the Engineer shall be accompanied by a letter of transmittal.
- B. Materials and other items subject to approval shall not be incorporated in the project before receipt of written approval.

##### **1.01 SPECIFIED ELSEWHERE**

Measurement and Payment – See Section 01025  
Reporting and Payments – See Section 01155  
Shop Drawings - See Section 01310.

##### **1.02 CERTIFICATION OF INSURANCE**

Certificates of Insurance shall be filed with the Owner and copies to the Engineer prior to commencement of the work.

##### **1.03 CONTRACT COST BREAKDOWN**

- A. "Progress and Payment" forms shall be used to prepare values of contract cost and pay requests as required by general conditions. Contract cost breakdown shall be submitted to the Engineer within fourteen (14) days after commencement date specified in the "Notice to Proceed."
- B. No payment will be approved until contract cost breakdown is modified as requested and approved by the Engineer.

##### **1.04 LISTING OF SUBCONTRACTORS**

Submit complete list of subcontractors, including address, telephone and contact person.

##### **1.05 SAMPLES**

Submit samples as called for in the individual sections of the specifications. Samples shall be submitted at same time as shop drawings.

##### **1.06 SCHEDULE**

At Pre-Construction Conference Contractor shall submit the following:

1. Construction Schedule.
2. Shop Drawings Schedule.

3. Pollution Prevention Plan.
4. Approved Maintenance of Traffic Plan.
5. All Applicable Permits to Construct the Project.

#### **1.07 APPROVALS**

The Engineer must approve all submittals before they become usable documents.

#### **1.08 TIME FOR SUBMITTALS**

All submittals, i.e., shop drawings, samples, etc., to be made within fourteen (14) days from start date of project.

**END OF SECTION**

## **SECTION 01410**

### **TESTING LABORATORY SERVICES**

#### **1.01 SELECTION AND PAYMENT**

- A. Engineer shall employ and pay for services of an independent testing laboratory to perform all passing tests. The cost of all passing tests will be charged back to the District as a direct reimbursable expense.
- B. Employment of testing laboratory shall in no way relieve Contractor of obligation to perform work in accordance with requirements of Contract Documents.

#### **1.02 PROJECT/CONSULTING ENGINEER'S SUBMITTALS**

- A. Prior to start of work, submit testing laboratory name, address, and telephone number and responsible officer to the Owner.

#### **1.03 LABORATORY RESPONSIBILITIES**

- A. Samples to be taken by laboratory.
- B. Provide qualified personnel at site. Cooperate with Engineer and Contractor in performance of services.
- C. Perform specified inspection, sampling, and testing of Products in accordance with specified standards.
- D. Ascertain compliance of materials and mixes with requirements of Contract Documents.
- E. Promptly notify Engineer and Contractor of observed irregularities or non-conformance of work or products.

#### **1.04 LABORATORY REPORTS**

- A. After each inspection and test, promptly submit two certified copies of laboratory report to both the Engineer, and to the Contractor.
- B. Include:
  - 1. Date issued,
  - 2. Project title and number,
  - 3. Name of inspector,
  - 4. Date and time of sampling or inspection,
  - 5. Identification of product and Specifications Section,
  - 6. Location in the Project,
  - 7. Type of inspection or test,
  - 8. Date of test,
  - 9. Results of tests,
  - 10. Conformance with Contract Documents.

- C. When requested by Engineer, provide interpretation of test results.

#### **1.05 LIMITS ON TESTING LABORATORY AUTHORITY**

- A. Laboratory may not release, revoke, alter, or enlarge on requirements of Contract Documents.
- B. Laboratory may not approve or accept any portion of the Work.
- C. Laboratory may not assume any duties of Contractor.
- D. Laboratory has no authority to stop the Work.

#### **1.06 CONTRACTOR RESPONSIBILITIES**

- A. Cooperate with laboratory personnel, and provide access to the work and to manufacturer's facilities.
- B. Provide incidental labor and facilities to provide access to work to be tested, to obtain and handle samples at the site or at source of products to be tested, to facilitate tests and inspections, storage and curing of test samples.
- C. Notify laboratory 24 hours prior to expected time for operations requiring inspection and testing services.
- D. Pay costs of testing laboratory services for all failed tests or additional testing as required by the Project Engineer to verify conformance with the approved plans.
- E. Contractor shall cooperate and coordinate with engineers testing lab.

#### **1.07 SCHEDULE OF INSPECTIONS AND TESTS**

- A. See individual sections of the specifications for required inspection and testing.

**END OF SECTION**

## SECTION 01540

### SECURITY AND PROTECTION

#### PART 1 GENERAL

##### 1.01 DESCRIPTION

- A. Requirements: This section specifies minimum requirements. Temporary provisions for security and protection are the Contractor's sole responsibility, and are not limited to the minimums established by the requirements hereof. Except as otherwise indicated, the use of alternative security and protection methods of facilities, equivalent to those specified is the Contractor's option. The work of this section is defined to exclude required insurance coverage, performance/payment bonds, first aid requirements, general supervision, quality control, damage surveys, enclosure of completed work and stored materials, inspections and test of the work, instructions to Owner's personnel and similar recognized protection/security provisions, which are, nevertheless, specified in other parts of the contract documents, if required.
- B. The types of security and protection facilities and services required for the entire project include, but are not limited to, the following:
  - 1. Barricades, warning signs, lights.
  - 2. Security enclosure and lockup of work.
  - 3. Personnel security program.
  - 4. Environmental protection.

##### 1.02 QUALITY ASSURANCE

- A. Regulations: Comply with governing regulations for the installation and operation of security and protection facilities, including the rules and recommendations of fire and building departments, police, rescue squad's, watchman services, and similar local organizations and companies.

##### 1.03 JOB CONDITIONS

- A. Scheduled Uses: Provide security and protection at the times first needed at the site; and maintain, expand, and modify the facilities as needed throughout the construction period.
- B. Conditions of Use: Use security and protection facilities and services in a safe, sanitary, lawful, and publicly acceptable manner, which will not interfere unduly with performance of the work nor result in other deleterious effects.

##### 1.04 MATERIALS OF SECURITY AND PROTECTION FACILITIES

- A. General: For use in security and protection facilities, provide either new or used materials and equipment, which are in substantially undamaged and serviceable conditions. Provide types and quality levels which are recognized in the construction industry as suitable for the intended use in each application.

## **1.05 INSTALLATION OF SECURITY/PROTECTION FACILITIES**

- A. General: Use qualified tradesmen for the installation of security and protection facilities. Locate facilities where they will serve the total project construction work adequately, and result in a minimum interference with performance of the work. Relocate, modify and extend facilities as required during the course of the work, to properly accommodate the entire work of the project. Provide and maintain a reasonably neat and uniform appearance in security and protection facilities, acceptable to the Owner.

## **1.06 BARRICADES, WARNING SIGNS AND LIGHTS**

- A. General: Comply with recognized standards and code requirements for the erection of substantial and structurally adequate barricades wherever needed to prevent accidents and losses. Paint with appropriate colors, graphics and warning signs and inform personnel at the site, and the general public where exposure exists of the hazard being projected. Provide lighting where appropriate and needed for the recognition of the facility, including flashing red lights where appropriate.
- B. Storage: Where materials and equipment must be temporarily stored, prior to and during construction, and are of substantial value or attractive for possible theft, provide secure lockup and enforce strict discipline in connection with the timing of installation and release of materials, so that the opportunity for theft and vandalism is minimized.

## **1.08 ENVIRONMENTAL PROTECTION**

- A. General: Provide protection facilities, operate temporary facilities, conduct construction activities and enforce strict discipline for personnel at the project site in ways and by methods which comply with environmental protection regulations, and which will minimize the possibility that the air, waterways and subsoil might be contaminated or polluted, or that other undesirable and deleterious effects might result from performance of the work at the project site. Avoid the use of tools and equipment which produce harmful noise; and restrict the use of noise-making tools and equipment to the hours of use which will minimize noise complaints by persons or residents near the project.

## **1.09 TERMINATION AND REMOVAL**

- A. General: Maintain protection and security facilities and services in good operating condition through the time and use and until the completion and use of permanent work makes each temporary service unnecessary, or until the Owner's occupancy has replaced the need for the service or until its discontinuation has been otherwise authorized. Remove each facility promptly after its use had been terminated. Complete or restore permanent work which may have been delayed or otherwise affected by the temporary facility. Replace work which cannot be satisfactorily restored. Except as otherwise indicated, the materials and equipment of temporary security and protection facilities remain the property of the Contractor.

**END OF SECTION**

## SECTION 01700

### PROJECT CLOSE OUT

#### **PART 1 GENERAL**

##### **1.01 DESCRIPTION**

- A. The items listed in this Section shall not be considered as a complete listing and shall in no way limit requirements that may be stated in other parts of the Contract Documents, but rather should be considered as an aid in preparing for final inspection and project close out.

##### **1.02 BASIC REQUIREMENTS PRIOR TO SUBSTANTIAL COMPLETION**

- A. Punch List: The following items shall be completed prior to request for final inspection.
1. All general construction completed and the project components shall be clean.
  2. All mechanical and electrical work substantially complete, fixtures in place, connected, cleaned and ready for use.
  3. All electrical circuits shall be scheduled in panels, and all panels and disconnect switches properly labeled.
  4. All painting shall be completed, all signs installed.
  5. All surfaces, glass and metal work shall be cleaned.
  6. All finish hardware and furniture shall be installed.
  7. Project site shall be cleared of the Contractor's equipment and/or building supplies. All temporary structures and construction shall be removed.
  8. All landscaping, sod, seed and mulch shall be planted and in place. (If applicable)
  9. All signs and striping mounted, replaced and installed. (If applicable)
  10. All utility and Health Department approvals obtained.
  11. All disturbed areas re-graded and sodded or re-seeded to original condition.
- B. Record Drawings: The project record drawings shall be submitted by the Contractor for all structural work, paving, drainage, water, wastewater and any other construction done under this contract. All record drawings will be submitted to the Owner in a digital format as specified in the NPBCID Engineering Standards Manual, and as required by local utility authority.

### 1.03 BASIC REQUIREMENTS PRIOR TO FINAL COMPLETION

- A. All of the above items for Substantial Completion shall be complete; in addition, the punch list items noted at the time of substantial completion shall have been corrected and the work completed.
- B. Warranties: Furnish all manufacturers' warranties and maintenance manuals for all equipment. For corrective work during the warranty period, submit a complete list of contact persons and phone numbers for General Contractor and all Subcontractors.
- C. Guarantees and Bonds: Furnish the following written guarantees and bonds, in duplicate, signed by an authorized representative of manufacturer, supplier and/or subcontractor in accordance with the General Conditions, Supplementary General Conditions and the technical sections of the specifications.
- D. Keys and Special Wrenches: All keys and special wrenches shall be tagged with the room number or with designed use and turned over to the Owner.
- E. Maintenance Materials: Deliver to the Owner, prior to final completion of the work, maintenance materials (extra stock) as required in the technical sections of the specifications.
- F. Manuals and Instructions:
  - 1. Deliver to the Owner, prior to final completion of the work, three bound copies of maintenance and instruction manuals customarily supplied by manufacturers for items incorporated in this work and as set forth in the General Requirements for Mechanical and Electrical work.
  - 2. Contractor and subcontractors shall provide hands on demonstrations and verbal instructions for the proper operation and maintenance of appliances, machines and equipment to the Owner or their designated representative.
  - 3. Arrange, with the Owner, an appointment for specific time to give demonstrations and instructions.
- G. Listing of Equipment: A tabular listing shall be presented to the Engineer prior to Final Completion of the project and prior to final payment, which shall include all plumbing, mechanical, electrical and special equipment by name, manufacturer, model number and serial number of each item provided.
- H. Affidavits: Provide affidavits prior to final payment as follows (upon request by owner):
  - 1. Affidavit to owner as provided in Section 00670.

**END OF SECTION**

## SECTION 01020

### MOBILIZATION

#### PART 1 - GENERAL

##### 1.01 WORK INCLUDED

- A. This section covers the work necessary for the movement of personnel, equipment, safety equipment, first aid supplies, sanitary facilities, supplies and incidentals, the establishment and removal of temporary offices and the maintaining of services (mail, trash, etc.), bonds, insurance, traffic control, survey layout, and site clean up.
- B. The cost of bonds, insurance and any other pre-construction expenses necessary for the start of work, excluding the cost of materials is to be included in mobilization.

#### PART 2 – METHOD OF PAYMENT

- A. When the Bid Form includes a separate pay item for Mobilization, partial payments will be made in accordance with the following.

<u>Percent of Contract Price Less Mobilization Earned</u>	<u>Allowable Percent of the Lump Sum Price of Mobilization</u>
5	25
10	50
25	75
50	100

- B. The standard retainage will be applied to these payments. Previous payments for Mobilization and unpaid amounts on Allowances will not be considered in calculating the percent of the Contract Price earned. Payments will be made in stepped increments as shown and will not be interpolated between steps.
- C. When the Bid Form does not include a separate item for Mobilization, all Work and incidental costs specified as being covered under Mobilization is to be included for payment under the several schedules items on the bid Form and no separate payment will be made therefore.

**END OF SECTION**

## **SECTION 01060**

### **REGULATORY REQUIREMENTS**

#### **1.1. BUILDING CODE REGULATIONS:**

All work shall be done in strict accordance with applicable requirements of the following codes:

- A. Florida Building Code (FBC), Latest Edition.
- B. Life Safety Code (NFPA), Latest Edition.
- C. Pertinent NPBCID, Municipal, County and State Codes and Amendments.
- D. ADA Chapter 11 (Florida Building Code)

#### **1.2. INDUSTRY STANDARDS:**

All work shall be done in strict accordance with the following Industry Standards:

- A. Northern Palm Beach County Improvement District.
- B. Building Code Requirements for reinforced concrete (ACI 318-83).
- C. Manual of Standard Practice for detailing reinforced concrete structures (ACI-315).
- D. Manual of Standard Practice for reinforced concrete construction by the CRSI.
- E. Manual of Standard Practice for welding reinforcing steel, inserts & connections in reinforced concrete construction AWS D1.4-79 (AWS).
- F. Florida Department of Transportation Standard Specifications for Road and Bridge Construction, Latest Edition.

**END OF SECTION**

## SECTION 01155

### REPORTING AND PAYMENTS

#### PART 1 - GENERAL

##### 1.01 PROGRESS SCHEDULE AND REPORTS

GENERAL: Within 14 days after "Notice to Proceed (Commencement of Construction)", submit a comprehensive progress schedule indicating each significant category or unit of work to be performed at the site, properly sequenced and inter-meshed, and showing completion of the work on the date established for "Substantial Completion" of the work. Arrange schedule to indicate required sequencing of units, and to show time allowances for submittals, inspections and similar time margins. Carefully schedule the work to be performed so the required construction sequences and schedules will be maintained throughout the performance of the Contract.

1. Show critical submittal dates related to each time bar, or prepare separate coordinated listings of critical submittal dates.
2. Show double cost line immediately below date line in heading, shown in precalculated dollar-volume of completed work at end of each period scheduled.
3. Submit progress schedule for Owner's approval and compliance with Owner's requirements.

##### 1.02 SUBMITTAL

Following initial revision of schedule after the Owner's and Engineer's review, print and distribute schedule to entities with a need-to-know responsibility, including copies to the Owner and Engineer. Post in temporary office space. As appropriate and not in excess of every 90 days, revise schedule at intervals matching payment request and redistribute. Provide copies required with payment requests.

##### 1.03 PROGRESS MEETINGS

Conduct general progress and coordination meeting at least once each month, or as otherwise deemed appropriate attended by a representative of each primary entity engaged for performance of work. Record discussions, decisions, and any unusual events, accidents, etc. and distribute copies to those attending and others affected including the Owner and Engineer. Schedule meetings to coordinate with preparation of payment requests. A "Preconstruction Meeting" will be scheduled by the Engineer prior to "commencement of work."

##### 1.04 SCHEDULE OF BID TABULATIONS

Prepare a bid tabulation showing breakdown of Contract Sum corresponding with payment request breakdown and progress schedule line items. Show dollar value and percent of total for each unit of work scheduled. Submit schedule of values to Owner and Engineer for review and approval prior to "Commencement of Work." Change orders or other value revisions (by Contractor) shall be added as separate line items.

## 1.05 PAYMENT REQUESTS

- A. Prior to initial payment request, and as more stringently required by other sections of the specifications, submit:
  - 1. List of principal subcontractors and suppliers.
  - 2. Schedule of bid tabulations.
  - 3. Copies of permits and similar start-up authorizations or certifications.
  - 4. NPDES Pollution Prevention Plan Log.
  - 5. Pumping Logs.
  - 6. Construction progress as-builts, as applicable.
  - 7. Update schedule reflecting work completed.
  - 8. Required Testing Data.
  
- B. Following issuance by Engineer of Certificate of Substantial Completion, Contractor may submit special payment request, provided the following have been completed.
  - 1. Obtain permits, certificates of inspection and other approvals and releases by governing authorities, required for Owner's occupancy and use of project.
  - 2. Submit warranties and similar documentation.
  - 3. Submit maintenance manuals and provide instruction to Owner's operational/ maintenance personnel.
  - 4. Complete final cleaning of the work.
  - 5. Submit record documents in both electronic format and "hard" copy (record drawings).
  - 6. Submit listing of work to be completed before final acceptance.
  
- C. Following completion of the following requirements, final payment request may be submitted.
  - 1. Complete work listed as incomplete at time of substantial completion, or otherwise assures Owner of subsequent completion of individual incomplete items.
  - 2. Settle liens and other claims, or assure Owner of subsequent settlement.
  - 3. Final Release of Liens from contractor, all subcontractors and all suppliers.

4. Submit proof of payment on fees, taxes or similar obligations.
5. Transfer operational, access, security and similar provisions to Owner; then remove temporary facilities, tools and similar items.
6. Completion of requirements specified in "Project Close Out" section (Section 01700).
7. All fees paid to NPBCID.
8. Obtain consent of surety for final payment and/or partial release of retainage.

**END OF SECTION**

## SECTION 01205

### PROCEDURES AND CONTROLS

#### PART 1 GENERAL

##### 1.01 ADMINISTRATION AND SUPERVISION

Coordination: Coordinate various elements of the work and entities engaged to perform work; and coordinate the work with existing facilities/conditions, and with work by separate contractors (if any) and Owner.

##### 1.02 INSPECTIONS AND TESTING

- A. General: Provide required inspection and testing services specified to be by independent agencies, where not indicated specifically as Owner's responsibility (this provision supplements General Conditions). Neither inspection-and-test results nor failure thereof to disclose deficiencies relieves Contractor of responsibility to comply with requirements of the Contract Documents (Owner's and Contractor's), including taking and delivery of samples, patching work and similar assistance. Require engaged agencies to perform indicated testing and submit reports promptly; and to report significant observations having an important bearing on the work to the Engineer by the most expeditious means as possible.
- B. Inspections by Installer: Require Installer of each major unit of work to inspect substrata and conditions for installation, and to report (in writing) unsatisfactory conditions. Correct unsatisfactory conditions before proceeding. Inspect each product immediately before installation, and do not install damaged or defective products, materials and equipment.

##### 1.03 INSTALLATION, GENERAL

- A. Comply with the manufacturer's instructions and recommendations to the extent where the printed information is more detailed or stringent than requirements contained directly in Contract Documents.
- B. Timing: Install work during time and under condition which will ensure best possible results, coordinated with required inspection and testing.
- C. Anchor work securely in place, properly located by measured line and level, organized for best possible uniformity, visual effect, operational efficiency, durability, and similar benefit to Owner's use. Isolate non-compatible materials from contact, sufficiently to prevent deterioration.
- D. Mount individual units of work at industry-recognized mounting heights, if not otherwise indicated; refer uncertainties to Engineer before proceeding.

#### **1.04 CLEANING AND PROTECTION**

General: Clean each element of work at time of installation. Provide sufficient maintenance and protection during construction to ensure freedom from damage and deterioration at time of substantial completion.

**END OF SECTION**

## SECTION 01310

### SHOP DRAWINGS

#### **PART 1 GENERAL**

##### **1.01 DESCRIPTION**

- A. Contractor shall submit shop drawings as described in General Conditions, each individual section, and this section of the specifications as required for Engineer's proper evaluation.
- B. All costs arising from improper submittals will be borne by the Contractor.

##### **1.02 SCHEDULING**

- A. Shop Drawings shall be submitted in sufficient time to cause no delay in general progress of the work. Provide schedule of shop drawings submittal at preconstruction conference.
- B. Delay of submittals of shop drawings shall be no cause for extending contract time.
- C. Allow a minimum of two weeks time (more time for complicated or extensive shop drawings) for Project Engineer's review. Allow for possibility of rejection and resubmittal.

##### **1.03 APPROVALS**

- A. General Contractor shall review all shop drawings for compliance with Contract Documents. They shall be stamped with Contractor's stamp and show approval, initials of person approving, and date. No shop drawing will be reviewed by the Engineer without General Contractor's prior approval.
- B. Shop drawings will be reviewed by Project Engineer. Take action described as follows:
  - 1. Approved as submitted - Proceed with fabrication.
  - 2. Approved as noted - Make changes as noted.
  - 3. Revise/Resubmit - Resubmit with changes noted and/or required. Do not proceed with fabrication.
  - 4. Not Approved - Resubmit in accordance with Contract Documents.
- C. Approval of the shop drawings is merely an aid to the Contractor by the Engineer, checking only for conformance with design concept and compliance with Contract Documents and for quantities and dimension which shall be conformed and correlated at job site. Contractor shall remain responsible for fabrication processes and techniques of construction and for coordination of all trades.

- D. Work shall not proceed until shop drawings have been approved.
- E. Engineer or their representative may reject any or all items for installation for which there are no approved shop drawings.

## **PART 2 MATERIALS**

### **2.01 DRAWINGS**

- A. Shop Drawings shall be blue line or black line prints and/or manufacturer's brochures.
- B. Unless required otherwise by the Project Engineer and/or Owner, quantity shall be a minimum of five (7) sets of shop drawings or brochures. The Engineer will retain one (1) copy. Engineer will stamp all sets and return a minimum of three (3) sets to Contractor. Additional sets will be marked and stamped on request for the General Contractor.

### **2.02 ACCURACY**

- A. If shop drawings are unnecessarily inaccurate, Project Engineer will not correct all inaccuracies but will ask for resubmittal.
- B. Shop drawings, which deviate from Contract Documents, shall be accompanied by a letter from subcontractor stating deviations from Contract Documents and reasons for appropriateness for use.

**END OF SECTION**

## SECTION 01450

### ENVIRONMENTAL PROTECTION

#### **PART I GENERAL**

##### **1.01 SECTION INCLUDES:**

- A. Requirements for prevention of environmental pollution and damage as the result of construction operations under this contract.

##### **1.02 SYSTEM DESCRIPTION:**

- A. Environmental pollution and damage are defined as the presence of chemical, physical, or biological elements or agents which adversely affect human health or welfare; unfavorably alter ecological balances of importance to human life; affect other species of importance to man; or degrade the utility of the environment for aesthetic, cultural, and/or historical purposes.
- B. The control of environmental pollution and damage requires consideration of air, water, and land, and includes management of visual esthetics, noise, solid waste, radiant energy and radioactive materials, as well as other pollutants.

##### **1.03 QUALITY ASSURANCE:**

- A. Establish and maintain quality control for environmental protection of all items set forth herein.
- B. Record on daily quality control reports or attachments thereto, any problems in complying with laws, regulations and ordinances, and corrective actions taken.
- C. Comply with all requirements under the terms and conditions set out in all permit(s) obtained by the Owner.
- D. The Owner's Representative will notify the Contractor in writing of any observed noncompliance with the Federal, State, or local laws or regulations, permits and other elements of the Environmental Protection Plan.
  - 1. After receipt of such notice, inform the Owner's Representative of proposed corrective action and take such action as may be approved.
  - 2. Failure to comply promptly will be grounds for suspension or termination of the contract.

#### **PART II PRODUCTS (Not Applicable)**

## **PART III      EXECUTION**

### **3.01 PROTECTION OF ENVIRONMENTAL RESOURCES:**

- A. Protect the environmental resources within the project boundaries and those affected outside the limits of permanent work during the entire period of this contract. Confine activities to areas defined by the drawings and specifications.
- B. Disposal of Waste:
  - 1. Dispose of solid wastes (excluding clearing debris), in containers which are emptied on a regular schedule. All handling and disposal shall be conducted to prevent contamination.
  - 2. Transport all solid waste off property and dispose of it in compliance with Federal, State and local requirements for solid waste disposal.
  - 3. Store chemical waste in corrosion resistant containers, removed from the work area and disposed of in accordance with Federal, State and local regulations.
  - 4. Discarded materials other than those which can be included in the solid waste category shall be handled as directed by the Owner's Representative.

### **3.02 PROTECTION OF WATER RESOURCES:**

- A. Keep construction activities under surveillance, management and control to avoid pollution of surface and ground waters.
- B. Monitor all water areas affected by construction activities.
- C. Construction activities shall comply with the NPDES and Pollution Prevention Plan (PPP).

### **3.03 PROTECTION OF FISH AND WILDLIFE RESOURCES:**

- A. Keep construction activities under surveillance, management and control, to minimize interference with, disturbance to, and damage of fish and wildlife.

**END OF SECTION**

## SECTION 01640

### PRODUCTS AND SUBSTITUTIONS

#### PART 1 GENERAL

##### 1.01 PRODUCTS' LIST

- A. Within fourteen (14) days after commencement date of Contract, submit to Engineer two (2) copies of a complete list of all products proposed to be used, with name of the manufacturer and the installing subcontractor. Tabulate list by each specification section.
- B. For products specified under reference standards, include with listing of each product:
  - 1. Name and address of manufacturer.
  - 2. Trade name.
  - 3. Model or catalog designation.
  - 4. Manufacturer's data:
    - a. Performance and test data.
    - b. Reference standards.
- C. Contractor's Option: For products specified only by reference standards, select any product meeting that standard. For products specified by naming several products or manufacturers, select any one of the products or manufacturers names, which complies with the specifications.

##### 1.02 SUBSTITUTIONS

- A. For a period of 14 days after commencement date (Notice to Proceed) of Contract, Engineer may consider written requests from Contractor for substitution of approved products.
- B. Conditions: Refer to Supplementary Conditions. Requests by Contractor will be considered when reasonable, timely, fully documented and qualifying under one or more of the following circumstances:
  - 1. Related to an "or equal" or similar provision in contract documents.
  - 2. Required product is not acceptable to governing authority, or determined to be non-compatible, or cannot be properly coordinated, warranted or insured, or has other recognized disability as certified by Contractor.
  - 3. Substantial advantage is offered Owner after deducting offsetting disadvantages including delays, additional compensation to Engineer for redesign, investigation, evaluation, and other necessary services, and similar considerations.

- C. Submit a separate request for each product, five (5) copies of each submittal, to include the following:
1. Complete data substantiating compliance of proposed substitution with Contract Documents.
    - a. Product identification, including manufacturer name and address.
    - b. Manufacturer's literature including product description, performance and test data, and reference standards.
    - c. Samples where appropriate and/or requested.
    - d. Name and address of two similar projects on which product was used successfully in a similar application.
    - e. Detailed description of proposed construction method.
    - f. Drawings illustrating construction method.
  2. Itemized comparison of proposed substitution with product or method specified.
  3. Date relating to changes in construction schedule; any change in the contract time; effect on other trades.
  4. Accurate cost data on proposed substitution in comparison with product or method specified including a proposal of the net change in the contract sum.
- D. The Engineer will be the sole judge of the acceptability of the proposed substitution.
- E. In making request for substitution Contractor represents:
1. The Contractor has personally investigated proposed product or method, and determined that it is equal or superior in all respects to that specified.
  2. The Contractor will provide the same warranties, guarantees, or bonds for the substitution as for the product or method specified herein.
  3. The Contractor will coordinate the installation of an accepted substitution into the Work, and make such other changes as may be required to make the Work complete in all respects.
  4. The Contractor waives the right to claims for additional costs related to the substitution which may subsequently become apparent and waives all rights to additional payment and time which may subsequently be necessitated, by failure of the substitution to perform as specified, and for the required Work to make corrections thereof.
  5. Cost data is complete and includes all related costs under their contract.

- F. Substitutions will not be considered if:
  - 1. They are indicated or implied on shop drawings or project data submittals without formal request submitted in accordance with the Contract Documents.
  - 2. Acceptance will require revision of the Contract Documents.
- G. After date bids are reviewed, approval of substitutions shall be governed by change order procedure.

### **1.03 PROCEDURAL REQUIREMENTS**

- A. General Limitations: Where possible, provide entire required quantity of each generic product, material, or equipment from a single source; and, where not possible to do so, match separate products as closely as possible. To extend selection process is under Contractor's control, provide compatible products, materials, and equipment. Where available and complying with requirements, provide standard products which have been used previously and successfully in similar applications, and which are recommended by manufacturers for applications indicated.

**END OF SECTION**

## Section 01720

### Record Drawings

#### Part 1-General

##### 1.01 Description

- A. Engineer shall prepare the necessary Record Drawings as required by the Engineer and Government Agencies.

##### 1.02 Basic Requirements

- A. In the interest of timely detection of non-conforming work. Engineer shall promptly acquire record data and analyze data. Engineer shall promptly notify contractor of any non-conforming work.
- B. Engineer shall furnish copies of record drawings to contractor on an as needed basis.
- C. The Contractor shall provide 48 hours notice to Engineer for performance of record data collection. A 24-hour minimum notice shall be observed in cases of emergency with the approval of the Engineer and Northern Palm Beach County Improvement District (NPBCID). Abuse of the emergency clause shall constitute returning to the 48-hour limit for all further appointments.
- D. A 12-hour notice shall be observed for cancellation of record data collection appointments. The minimum time shall be as follows:
  - Before 4pm for next working day appointments.
- E. Contractor shall provide access to the site in order for the survey crew to obtain the record information.
- F. Contractor shall provide assistance to the survey crew for access to all improvements. No improvements shall be buried, backfilled, or in any way concealed prior to record data collection.
- G. All pipes shall remain exposed until record information is obtained. Failure of the survey crew to show up at site is not a reason for backfilling a system. Emergency backfilling to be approved by the Engineer and NPBCID.
- H. The use of "standpipes" of certain lengths as temporary markers to enable backfilling is not permissible unless the Engineer and NPBCID approve special conditions or arrangements. In the event stand pipe use is authorized, the Engineer and NPBCID shall be present at the time of backfilling and stand pipe installation.

- I. A line item price for “Incidental Services for Record Data Allowance” to cover unexpected additional requests from outside agencies not included in the standard record document requirements is included in the bid form. This shall be used only for said contingency as directed by the Engineer.

#### 1.03 Water Distribution Systems

**Key points, such as elbows, tees, conflicts, vertical elbows and crossings shall be left exposed for visual inspection at record data Collection time, unless other arrangements are made with the Engineer beforehand.**

#### 1.04 Drainage and Storm Systems

- A. Contractor to leave sand-and-debris – protector filter cloth out catch basins until data collection is performed.
- B. Dry Retention areas shall not become repositories of garbage, debris, equipment staging after construction and data collection. A second collection will be required if cleaning up of a retention area, wet or dry, is indicated by the Engineer or NPBCID.

#### 1.05 Sanitary Sewer Systems

- A. Contractor to provide access and approach to manholes during construction for data collection operations, or direct measurements to inverts during construction of corbel.
- B. Contractor to leave conflicts, crossings, service ends and DIP joints exposed until after data collection is accomplished.

#### 1.06 Lakes

Final record data to be obtained once the lake level has reached control elevation.

**End of Section**