

## SERVICE AGREEMENT NO. 1004

### CLOSED CIRCUIT TELEVISED (CCTV) CLEANING AND INSPECTION OF LARGE DIAMETER WASTEWATER LINES

THIS **Closed Circuit Televised (CCTV) Cleaning and Inspection of large Diameter Wastewater Lines Agreement** ("Agreement") is entered into by and between the City of Corpus Christi, a Texas home-rule municipal corporation ("City") and CSI Consolidated, LLC dba Clean Serve, LLC ("Contractor"), effective upon execution by the City Manager or the City Manager's designee ("City Manager").

WHEREAS, Contractor has bid to provide Closed Circuit Televised (CCTV) Cleaning and Inspection of Large Diameter Wastewater Lines in response to Request for Bid/Proposal No. 1004/194 ("RFB/RFP"), which RFB/RFP includes the required scope of work and all specifications and which RFB/RFP and the Contractor's bid or proposal response, as applicable, are incorporated by reference in this Agreement as Exhibits 1 and 2, respectively, as if each were fully set out here in its entirety.

NOW, THEREFORE, City and Contractor agree as follows:

- 1. Scope.** Contractor will provide Closed Circuit Televised (CCTV) Cleaning and Inspection of Large Diameter Wastewater Lines ("Services") in accordance with the attached Scope of Work, as shown in Attachment A, the content of which is incorporated by reference into this Agreement as if fully set out here in its entirety, and in accordance with Exhibit 2.
- 2. Term.** This Agreement is for 12 months, with performance commencing upon the date of issuance of a notice to proceed from the Contract Administrator or Purchasing Division. This Agreement includes an option to extend the term for up to four additional 12-month periods ("Option Period"), provided, the parties do so prior to expiration of the original term or the then-current Option Period. The decision to exercise the option to extend the term of this Agreement is, at all times, within the sole discretion of the City and is conditioned upon the prior written agreement of the Contractor and the City Manager.
- 3. Compensation and Payment.** The total value of this Agreement is not to exceed \$536,553.75, subject to approved extensions and changes. Payment will be made for Services completed and accepted by the City within 30 days of acceptance, subject to receipt of an acceptable invoice. All pricing

must be in accordance with the attached Bid/Pricing Schedule, as shown in Attachment B, the content of which is incorporated by reference into this Agreement as if fully set out here in its entirety.

- 4. Contract Administrator.** The Contract Administrator designated by the City is responsible for approval of all phases of performance and operations under this Agreement, including deductions for non-performance and authorizations for payment. The City's Contract Administrator for this Agreement is as follows:

Name: Temple Williamson  
Department: Utilities Department  
Phone: 826-1805  
Email: Templew@cctexas.com

**5. Insurance; Bonds.**

(A) Before performance can begin under this Agreement, the Contractor must deliver a certificate of insurance ("COI"), as proof of the required insurance coverages, to the City's Risk Manager and the Contract Administrator. Additionally, the COI must state that the City will be given at least 30 days' advance written notice of cancellation, material change in coverage, or intent not to renew any of the policies. The City must be named as an additional insured. The City Attorney must be given copies of all insurance policies within 10 days of the City Manager's written request. Insurance requirements are as stated in Attachment C, the content of which is incorporated by reference into this Agreement as if fully set out here in its entirety.

(B) In the event a payment bond, a performance bond, or both, are required of the Contractor to be provided to the City under this Agreement before performance can commence, the terms, conditions, and amounts required in the bonds and appropriate surety information are as included in the RFB/RFP or as may be added to Attachment C, and such content is incorporated here in this Agreement by reference as if each bond's terms, conditions, and amounts were fully set out here in its entirety.

- 6. Purchase Release Order.** For multiple-release purchases of Services to be provided by the Contractor over a period of time, the City will exercise its right to specify time, place and quantity of Services to be delivered in the following manner: any City department or division may send to Contractor a purchase release order signed by an authorized agent of the department or division. The purchase release order must refer to this Agreement, and

Services will not be rendered until the Contractor receives the signed purchase release order.

7. **Inspection and Acceptance.** Any Services that are provided but not accepted by the City must be corrected or re-worked immediately at no charge to the City. If immediate correction or re-working at no charge cannot be made by the Contractor, a replacement service may be procured by the City on the open market and any costs incurred, including additional costs over the item's bid/proposal price, must be paid by the Contractor within 30 days of receipt of City's invoice.
8. **Warranty.** The Contractor warrants that all products supplied under this Agreement are new, quality items that are free from defects, fit for their intended purpose, and of good material and workmanship. The Contractor warrants that it has clear title to the products and that the products are free of liens or encumbrances. In addition, the products purchased under this Agreement shall be warranted by the Contractor or, if indicated in Attachment D by the manufacturer, for the period stated in Attachment D. Attachment D is attached to this Agreement and is incorporated by reference into this Agreement as if fully set out here in its entirety.
9. **Quality/Quantity Adjustments.** Any Service quantities indicated on the Bid/Pricing Schedule are estimates only and do not obligate the City to order or accept more than the City's actual requirements nor do the estimates restrict the City from ordering less than its actual needs during the term of the Agreement and including any Option Period. Substitutions and deviations from the City's product requirements or specifications are prohibited without the prior written approval of the Contract Administrator.
10. **Non-Appropriation.** The continuation of this Agreement after the close of any fiscal year of the City, which fiscal year ends on September 30<sup>th</sup> annually, is subject to appropriations and budget approval specifically covering this Agreement as an expenditure in said budget, and it is within the sole discretion of the City's City Council to determine whether or not to fund this Agreement. The City does not represent that this budget item will be adopted, as said determination is within the City Council's sole discretion when adopting each budget.
11. **Independent Contractor.** Contractor will perform the work required by this Agreement as an independent contractor and will furnish such Services in its own manner and method, and under no circumstances or conditions will any agent, servant or employee of the Contractor be considered an employee of the City.

- 12. Subcontractors.** Contractor may use subcontractors in connection with the work performed under this Agreement. When using subcontractors, however, the Contractor must obtain prior written approval from the Contract Administrator if the subcontractors were not named at the time of bid or proposal, as applicable. In using subcontractors, the Contractor is responsible for all their acts and omissions to the same extent as if the subcontractor and its employees were employees of the Contractor. All requirements set forth as part of this Agreement, including the necessity of providing a COI in advance to the City, are applicable to all subcontractors and their employees to the same extent as if the Contractor and its employees had performed the work.
- 13. Amendments.** This Agreement may be amended or modified only by written change order signed by both parties. Change orders may be used to modify quantities as deemed necessary by the City.
- 14. Waiver.** No waiver by either party of any breach of any term or condition of this Agreement waives any subsequent breach of the same.
- 15. Taxes.** The Contractor covenants to pay payroll taxes, Medicare taxes, FICA taxes, unemployment taxes and all other related taxes. Upon request, the City Manager shall be provided proof of payment of these taxes within 15 days of such request.
- 16. Notice.** Any notice required under this Agreement must be given by fax, hand delivery, or certified mail, postage prepaid, and is deemed received on the day faxed or hand-delivered or on the third day after postmark if sent by certified mail. Notice must be sent as follows:

**IF TO CITY:**

City of Corpus Christi  
Attn: Temple Williamson  
Title: Interim Assistant Director of Wastewater Treatment  
Address: 2726 Holly Road, Corpus Christi, Texas 78415  
Fax: 361-826-4317

**IF TO CONTRACTOR:**

CSI Consolidated, LLC dba Clean Serve, LLC  
Attn: David Groce  
Title: Manager  
Address: 3808 Knapp Rd.  
Pearland, TX 77581

**17. CONTRACTOR AGREES TO INDEMNIFY, HOLD HARMLESS AND DEFEND THE CITY OF CORPUS CHRISTI AND ITS OFFICERS, EMPLOYEES AND AGENTS ("INDEMNITEES") FROM AND AGAINST ANY AND ALL LIABILITY, LOSS, CLAIMS, DEMANDS, SUITS AND CAUSES OF ACTION OF ANY NATURE WHATSOEVER ON ACCOUNT OF PERSONAL INJURIES (INCLUDING DEATH AND WORKERS' COMPENSATION CLAIMS), PROPERTY LOSS OR DAMAGE, OR ANY OTHER KIND OF INJURY, LOSS, OR DAMAGE, INCLUDING ALL EXPENSES OF LITIGATION, COURT COSTS, ATTORNEYS' FEES AND EXPERT WITNESS FEES WHICH ARISE OR ARE CLAIMED TO ARISE OUT OF OR IN CONNECTION WITH THIS AGREEMENT OR THE PERFORMANCE OF THIS AGREEMENT, REGARDLESS OF WHETHER THE INJURIES, DEATH OR DAMAGES ARE CAUSED OR ARE CLAIMED TO BE CAUSED BY THE CONCURRENT OR CONTRIBUTORY NEGLIGENCE OF INDEMNITEES, BUT NOT IF BY THE SOLE NEGLIGENCE OF INDEMNITEES UNMIXED WITH THE FAULT OF ANY OTHER PERSON. CONTRACTOR MUST, AT ITS OWN EXPENSE, INVESTIGATE ALL CLAIMS AND DEMANDS, ATTEND TO THEIR SETTLEMENT OR OTHER DISPOSITION, DEFEND ALL ACTIONS BASED THEREON WITH COUNSEL SATISFACTORY TO THE CITY ATTORNEY, AND PAY ALL CHARGES OF ATTORNEYS AND ALL OTHER COSTS AND EXPENSES OF ANY KIND ARISING FROM ANY SAID LIABILITY, DAMAGE, LOSS, CLAIMS, DEMANDS, SUITS, OR ACTIONS. THE INDEMNIFICATION OBLIGATIONS OF CONTRACTOR UNDER THIS SECTION SHALL SURVIVE THE EXPIRATION OR EARLIER TERMINATION OF THIS AGREEMENT.**

**18. Termination.**

(A) The City Manager may terminate this Agreement for Contractor's failure to perform the work specified in this Agreement or to keep any required insurance policies in force during the entire term of this Agreement. The Contract Administrator must give the Contractor written notice of the breach and set out a reasonable opportunity to cure. If the Contractor has not cured within the cure period, the City Manager may terminate this Agreement immediately thereafter.

(B) Alternatively, the City Manager may terminate this Agreement for convenience upon 30 days advance written notice to the Contractor. The City Manager may also terminate this Agreement upon 24 hours written notice to the Contractor for failure to pay or provide proof of payment of taxes as set out in this Agreement.

- 19. Assignment.** No assignment of this Agreement by the Contractor, or of any right or interest contained herein, is effective unless the City Manager first gives written consent to such assignment. The performance of this Agreement by the Contractor is of the essence of this Agreement, and the City Manager's right to withhold consent to such assignment is within the sole discretion of the City Manager on any ground whatsoever.
- 20. Severability.** Each provision of this Agreement is considered to be severable and, if, for any reason, any provision or part of this Agreement is determined to be invalid and contrary to applicable law, such invalidity shall not impair the operation of nor affect those portions of this Agreement that are valid, but this Agreement shall be construed and enforced in all respects as if the invalid or unenforceable provision or part had been omitted.
- 21. Order of Precedence.** In the event of any conflicts or inconsistencies between this Agreement, its attachments, and exhibits, such conflicts and inconsistencies will be resolved by reference to the documents in the following order of priority:

  - A. this Agreement and its attachments
  - B. the bid solicitation document, including addenda (Exhibit 1)
  - C. the Contractor's bid response (Exhibit 2)
- 22. Certificate of Interested Parties.** Contractor agrees to comply with Texas Government Code Section 2252.908, as it may be amended, and to complete Form 1295 "Certificate of Interested Parties" as part of this Agreement.
- 23. Governing Law.** This Agreement is subject to all federal, State, and local laws, rules, and regulations. The applicable law for any legal disputes arising out of this Agreement is the law of the State of Texas, and such form and venue for such disputes is the appropriate district, county, or justice court in and for Nueces County, Texas.
- 24. Entire Agreement.** This Agreement constitutes the entire agreement between the parties concerning the subject matter of this Agreement and supersedes

all prior negotiations, arrangements, agreements and understandings, either oral or written, between the parties.

(SIGNATURE PAGE FOLLOWS)

**CONTRACTOR**

Signature: 

Printed Name: Kent Ford

Title: Vice President

Date: 4-13-17

**CITY OF CORPUS CHRISTI**

Signature: \_\_\_\_\_

Printed Name: \_\_\_\_\_

Title: \_\_\_\_\_

Date: \_\_\_\_\_

**Attached and Incorporated by Reference:**

- Attachment A: Scope of Work
- Attachment B: Bid/Pricing Schedule
- Attachment C: Insurance/Bond Requirements
- Attachment D: Warranty Requirements

**Incorporated by Reference Only:**

- Exhibit 1: RFB/RFP No. 1004/194
- Exhibit 2: Contractor's Bid/Proposal Response



## 1.1 **General Requirements/Background Information**

The Contractor shall provide Closed Circuit Television (CCTV) Inspection and Cleaning of Large Diameter Wastewater Line within the City's right-of-way and on public property as outlined in this Scope of Work.

## 1.2 **Scope of work**

### A. General

1. The scope of work consists of furnishing all labor, materials, equipment, supervision and performing all work necessary to internally inspect, clean and record the condition of designated wastewater collection system pipelines ranging in diameter from 18" to 60". Work includes, cleaning of the pipeline (from the most upstream reaches of the study area downstream toward the outfall or lift station) using high pressure water jets, use of mechanical cleaning equipment or other means as may be required, removal of remote obstructions, and the transport and disposal of waste materials generated by the cleaning process. **It is the intent in this project that NO flow control/bypassing of the system will be performed.** All work will be performed with active flow conditions during all phases of the work. City crews will not be available for large duration assistance on any portion of the project. Approved methods for conducting the internal inspection of pipelines include the use or combination of closed circuit television cameras, sonar equipment, or pipeline scanners that are specifically designed for use in and for the inspection of large diameter wastewater collection system pipelines. The City shall not be held responsible for any delays in the work. The Contractor shall work with the City to minimize any delays. All work will be performed in accordance with these specifications with regard to quality, workmanship, hardcopies and electronic deliverables, and schedule.
2. The Utility Department will provide reference maps highlighting the wastewater line segments to be cleaned and inspected during this project.
3. The Utility Department will provide reference ID asset numbers for all manholes and pipelines on the maps. These reference numbers shall be utilized by the Contractor(s) on the video inspection reports. An Excel spreadsheet will be provided to the Contractor that will list upstream and downstream manhole locations, location descriptions, access location (i.e. street/easement), and GIS footage. Additional columns will allow the Contractor to record linear footage cleaned, segment CCTV footage, reversal linear footage, direction of camera travel, comments, and section complete status.

4. It shall be the responsibility of the Contractor(s) to adhere to all applicable OSHA rules and regulations while performing work on any and all City-related projects or jobs (to include, but not necessarily limited to "Confined Space Entry").
5. The Contractor shall obtain all required municipal and other governmental license and permits. The Contractor shall obtain approval or consent from utilities or carriers, such as a telephone companies or other persons or organizations or authorities upon whose proper performance of work under the contract might affect. The contractor shall request written release from responsibility for the performance of work under the contract if and to the extent such work is preclude by the inability to obtain such approval or consent. For the duration of the contract, the Contractor shall abide by all federal, state, and local laws and regulations.
6. The Contractor shall notify third parties (such as public and private utilities) of their intent to perform work in an area where such parties may have rights to underground property or facilities and request maps or other descriptive information as to the nature and location of such underground facilities or property and assurance of the Contractor's ability to enter upon any public private lands to which assess is required for performance of the work under contract. The Contractor shall obtain written permission for access to private property where easement is inadequate.
7. The Contractor shall review all available information pertinent to the project site, including reports prepared under previously accomplished studies or surveys and any other data relating to the design of the project, including maps, drawings, construction specifics, sewer system records etc., as provided by the City. The Contractor shall request these documents as least five days in advance.
8. The Contractor shall obtain a secure storage area of a size that can adequately accommodate the required equipment, vehicles, and materials for the period of performance of the agreement at the Contractor's expense.
9. The Contractor shall have the ability to communicate with the City at all times.
10. The Contractor shall have a cellular telephone at which the Contractor's superintendent can be reached at any time. The Contractor shall provide daily notification of work locations to the City's designated Project Representative. The Contractor shall also immediately notify the City in the event that a point repair is required or if lodged equipment causes a blockage, spill or an overflow.

- 11.If, during the Contractor's operation in the collection system, evidence of an imminent or potential pipe collapse (such as pieces of pipe, fresh soil, or backfill are noted in the debris removed from the system) or other situations that would result in a public hazard, the Contractor shall immediately halt work on that line segment and contact the City Administrator.
- 12.The Contractor shall make every reasonable effort to control sewer and other offensive odor in the areas surrounding the work by placing odor blocks and venting or covering opened manholes when required.
- 13.In the area where brush and other vegetation make access to the sewer mains designated for cleaning and inspecting less than desirable and/or the route to the sewer access point(s) is not via a recorded easement, the Contractor shall provide its own access to sewer access points for the purpose of cleaning and inspection. Contractor will coordinate with property owner/resident to unlock gates or secure livestock and/or pets during field activities. The Contractor shall respect all private and public property owner's rights. Any fence removal and replacement, clearing, mowing, and/or trimming of trees, bushes, grass, plants, etc. for the ingress and regress by the Contractor to a designated project site will be the Contractor's responsibility.
- 14.All customer that refusal to allow access, vegetation clearing, or any other work required by the contractor shall be referred to the City Administrator as soon practicable and documented in writing within 48 hours for City action and follow-up.

B. Work and Materials Provided by the City

The Utility Department will provide the following at no cost to the Contractor:

1. Community awareness measures and project signage informing that sewer maintenance is scheduled with the Contractor.
2. Instructions on how to respond to residents that approach the Contractor during the sewer cleaning and inspection process.
3. Legal and physical access to collection system manholes on the portions of sewer within the project limits.
4. Exposure of buried manholes and assistance in opening seized manhole lids that could not be accessed or opened by the Contractor using normal industry standard procedures.
5. Any excavation, opening, backfilling, and/or repair of sewers, and/or streets, required to remove the Contractor's equipment caught in the sewer pipe due to sewer defects and not caused by the Contractor's negligence. See Section on "Emergency Pipeline Blockage Plan".

6. The Contract administrator will act as liaison between the Utility Department and the Contractor for the duration of the project.
7. A debris dump location to unload materials removed from the sewer pipes during cleaning. This facility is to be used only during the contract time limits and only for sewers located in Corpus Christi that have been authorized to be cleaned in this contract.

### **1.3 TRAFFIC CONTROL**

- A. The Contractor shall be responsible for and provide sufficient traffic control measures to ensure safe conditions and to minimize inconveniences to motorists. Temporary traffic control devices shall conform to the latest edition of the Texas Manual on Uniform Traffic Control Devices, which provides a number of typical temporary traffic control plans that may be implemented into the project. The Contractor shall determine if revisions or modifications to these typical plans are required for any specific site and, when required by City staff, shall submit the plans to the Traffic Department for approval. The Contractor is responsible for determining whether the traffic control is sufficient for road/traffic conditions and for acquiring any necessary permits from the City.
- B. For work adjacent to, in, or under TxDOT ROW, the Contractor shall obtain all necessary TxDOT permits and strictly adhere to all provisions contained therein.
- C. The Contractor shall furnish, install, move, replace, and maintain all necessary temporary traffic controls, including, but not limited to, barricades, signs, barriers, cones, lights, signals, temporary detours, temporary striping and markers, flag-men and such temporary devices, and the relocation of existing signs and devices as necessary to safely complete the project.
- D. Temporary traffic controls shall be measured and paid on a per day basis. Payment for traffic control will be based on the roadway classification where traffic control measures are required. The four classifications to be utilized in this project are arterials (assumed to be 30% of work order sites), collectors (assumed to be 11% of work order sites), local access streets (assumed to be 56% of work order sites and TxDOT ROW (assumed to be 3% of work order sites). These percentages are for information purposes only, are not guarantees, and will vary from actual quantities awarded.
- E. Arterial streets are those streets that bring traffic to and from the freeway and accommodate high volumes of cross-town traffic. Collectors are defined as those streets that collect and distribute traffic to and from local streets, other collectors, arterials, and freeway frontage roads.

- F. Local access streets are defined as those streets that provide access to individual residences, elementary schools, and parks within a neighborhood. Street classifications are defined in and may be referenced in the latest edition of the City of Corpus Christi Urban Transportation Plan found on the City of Corpus Christi's website in the following location:

<http://www.cctexas.com/Assets/Departments/Development-Services/Files/design-standards/UrbanTransportationPlanMap.pdf>

- G. TxDOT roadways/ROWs are those operated and maintained by TxDOT.

A. Water Meter

1. The Contractor will obtain and place a refundable deposit on a City-provided hydrant meter to record water used for cleaning operations. Water will be provided at no cost to the Contractor, provided the Contractor submits monthly use records, as required by the City Administrator.
2. The Contractor will be allowed to use hydrants that are near the work being performed and will adhere to any restrictions in the event that specific areas are not available to obtain water. The Contractor will use caution when opening and closing hydrants to prevent surges, damage to hydrants, or turbidity within the water main. The Contractor will be responsible for any loss or neglectful damage to the hydrant meter and any damages to hydrants; it is the Contractor's responsibility to connect to hydrants that are observed to be in good condition. The City may withhold final payment until the water meter is returned in good condition.

B. Existing Utilities

1. The Contractor shall be held responsible for the protection of existing utilities, as well as all damage that may occur as a result of the operations. The Contractor shall be responsible for temporarily relocating utilities for the convenience of the Contractor. In areas where existing utilities are within and adjacent to the established limits of work and could be damaged as a result of the Contractor's operations, the Contractor shall take all necessary precautions to protect such utilities from damage. Furthermore, in the event that damage to other utilities occur, the Contractor shall be fully responsible for the repair of any such damage without additional cost to City or the affected utility owner.
2. It shall be the Contractor's responsibility to determine the exact location of existing utilities that may impact their work.

3. Where overhead power lines are in close proximity to the work, the Contractor shall comply with all state and local regulations and laws and contact, if necessary, the appropriate owner, generally AEP or Nueces Electric Cooperative.

#### **1.4 Safety**

1. The work contemplated under this project involves activities in and around confined spaces. The Contractor and/or a Contractor-independently-retained employee or safety consultant shall implement a confined space entry program in accordance with OSHA standards to govern the presence and activities associated with working in and around confined spaces. The Contractor shall, as a function of the Health and Safety Plan, implement a confined space entry program.
2. The Contractor shall maintain a copy of the Confined Space Entry Program on-site at all times. The Contractor shall take all necessary actions to ensure that the Contractor's employees and the employees of other contractors have read, understand and follow the plan. All employees to be utilized in confined space entry work must present certificates indicating confined space entry training by an entity certified to teach such training as defined by OSHA.

##### **A. Pre-Work Submittals**

1. The submittal above shall be provided to the Contract Administrator after the Notice to proceed of the Contract but before commencing with the work. In providing approval of the above submissions, the City assumes no liability for the effectiveness of the plans and/or procedures. In no way does approval by the City relieve the Contractor of any liability under the contract. The required submittals are described in the following sections.
2. Contractor shall submit the following for approval:
  - A. Resident Notification Letter (Sample Letter Included)
  - B. Vehicular and Pedestrian Traffic Control Plan and Procedures
    - a. The Contractor shall prepare and submit a generic traffic control plan that describes the measures that will be taken to control vehicular and pedestrian traffic during the course of the project in areas where normal traffic flow will be disrupted by the Contractor's operations.
    - b. During the course of the cleaning and inspection of the wastewater collection system, it may become necessary or desirable to disrupt the normal flow of vehicular or pedestrian traffic in work area. These disruptions should be minimized and carried out in compliance with the City of Corpus Christi rules and regulations regarding temporary traffic

control and/or in compliance with other local entities having jurisdiction over the control and disruption of normal traffic flow.

- c. The Contractor shall also comply with the Texas Department of Transportation Manual on Uniform Traffic Control Devices and standards for traffic control in work areas. In the case of a conflict between standards, the local codes will govern.
- d. Any traffic control effort on major streets, arterials, or divided roads shall be submitted to the City Traffic Engineering Department for approval prior to implementing the traffic control plan. The Contractor is responsible for coordination of traffic control measures between local entities including, but not limited to, the City of Corpus Christi. The Contractor shall identify the locations of area where permits are required for work in right-of-ways in this plan. The City Administrator shall provide the right-of way permits, if necessary, identified by the Contractor upon ten (10) days advance notice by the Contractor of the requirement of the permits. The plan should cover all project areas and should have facilities and contingencies to cover all potential traffic related situations.

#### C. Sanitary Sewer Overflow/Spill Response Plan

- a. The Contractor shall prepare and submit a detailed Sanitary Sewer Overflow/Spill Response Plan that describes, in detail, the measures that the Contractor will implement in the event that the in authorized and untreated wastewater is discharged from the collection system as result of the Contractor's operations.
- b. The City Administrator shall approve the plan prior to commencing work. Approval of the plan does not, in any way, relieve the Contractor of any liability under the contract. The plan shall include the following components as a minimum:
  - Sewage containment procedures
  - Emergency notification
  - Sewage cleanup procedures
  - Flow Control/Bypass flow control and plan
- c. The Contractor will be held liable for fines and costs, direct and indirect, associated with sanitary sewer overflow/spills that are caused, directly or indirectly, by its operations. The plan should cover work areas and should have facilities and contingencies to cover all potential sanitary sewer overflow abatement situations.

#### D. Emergency Pipeline Blockage Plan

- a. The Contractor shall prepare and submit a detailed Emergency Pipeline Blockage Plan that describes, in detail, the measures that the Contractor will implement in the event that the equipment that is being utilized by the Contractor or his agents becomes lodged in the pipeline and is not retrieved by non-intrusive methods.
- b. The City Administrator shall approve the plan prior to commencing work. Approval of the plan does not, in any way, relieve the Contractor of any liability under the contract, at a minimum, the plan shall include the following components:
  - Sewage containment procedures
  - Emergency notification plan
  - Sewage cleanup procedures
  - Equipment removal
- c. The Contractor shall be responsible for the removal of equipment using non-intrusive methods. The Contractor will not utilize any intrusive methods other than via existing manholes or structures. In situations where it will be required to open the pipe for intrusive removal of equipment, the Contractor shall contract the City immediately so that the City can coordinate the removal of equipment for the Contractor.
- d. If the cause of equipment removal is due to Contractor negligence, the City will perform the operation and will in turn charge the Contractor for such work, including material, equipment, labor and overhead for repairs to pipelines, manholes, appurtenances, and surface restoration.
- e. If the removal is due to sewer defeat that were unforeseen or not avoidable (as determined by the City), then the City will provide at no cost to the Contractor.
- f. The Contractor will be held liable for fines, costs, direct, and indirect, associated with sanitary sewer overflow/spill and/or sewer blockages that are caused, directly or indirectly, by its operation.
- g. The plan should cover all project areas and should have facilities and contingencies to cover all potential pipe blockage and overflow situations.

#### E. Health and Safety Plan (Including a Confined Space Entry Plan)



- a. The Contractor shall submit a Health and Safety Plan in accordance with Occupational Safety and Health Administration (OSHA) Standards 29 CFR 1910 and 1926 to the City Administrator at or prior to the project kickoff meeting. The Health and Safety Plan will be submitted and reviewed prior to the start of work.
- b. The Health and Safety Plan shall clearly state the hazardous substances that may be encountered during the course of the Project and the protective safety procedures and equipment requirements for all tasks to be performed. Additional health and safety documents required are
  - A written Hazard Communication and written Confined Space Entry Program in accordance with City and OSHA standards.
  - Safety Data Sheet File
  - Operation guides and manuals for all equipment to be utilized on the project.
  - OSHA forms 200 and 101
- c. The Contractor shall post all documentation as required by OSHA and the City and the Contractor shall require all on-site employees and subcontractors to read, sign and follow the Health and Safety Plan. A signed copy of the Health and Safety Plan shall be kept at the work site at all times. All Contractor employees and subcontractors shall be properly trained in accordance with applicable standards and regulations. The City shall not be responsible for any hazardous materials uncovered or revealed at any site where work is being performed during this project.
- d. The Contractor shall immediately notify the City Administrator of any suspected hazardous materials before or during the performance of work and shall take all necessary precautions to avoid the further spread or contamination of the environment by the materials.

F. Sewage Backup/Building Remediation Services

G. Quality Control and Assurance Plan

H. Sewage Backup/Building Remediation Services

**1.5 Pipe Cleaning**

Technical Provisions

1. General

The work covered by these specifications consists of furnishing all equipment, materials, labor, supervision, and incidental items necessary to perform the cleaning

of the sanitary sewer collection system. Equipment shall be capable of cleaning and inspecting spans of sewer lines up to 1,500 linear feet or greater.

## 2. Cleaning Requirements

The City of Corpus Christi Utility Department Pre-Treatment Division must inspect all equipment used by the Contractor to clean sewer lines or capture and transport debris and material removed from the sewer collection system. Contact Contract Administrator to schedule the inspection. All cleaning equipment and hauling vehicles used on this project must also be registered with the TCEQ, and proof of this registration must be provided to the City prior to any work being performed under the contract.

## 3. Equipment Requirements

### a. High-Velocity Jet (hydro Cleaning) Equipment

- i. All high-velocity sewer cleaning equipment shall be constructed for ease and safety of operation. The Contractor shall have a selection of two or more high-velocity nozzle.
- ii. The nozzles shall be capable of producing a scouring action from 10 to 60 degree in all size lines designed to be cleaned. The equipment shall carry its own water tank, auxiliary engines, pumps, and hydraulically driven hose reel.

### b. Hydraulically Propelled Equipment

- i. The equipment used shall be of a movable dam type and be constructed in such a way that a portion of the dam may be collapsed at any time during the cleaning operation to protect against the flooding of the sewer. The movable dam shall be equal in diameter to the pipe being cleaned and shall provide a flexible scraper around the outer periphery to ensure grease removal.
- ii. If sewer cleaning balls or other equipment that cannot be collapsed are used, special precautions to prevent the flooding of the sewers and public or private property shall be taken by the Contractor. Damages or claims resulting from backups and flooding shall be the responsibility of the Contractor.

### c. Mechanically Powered Equipment

- i. Bucket and/or winch machines shall be in pairs with sufficient power to perform the work in an efficient manner. Machines will be belt-operated or have an overload device. Machines with a direct drive that could cause damage to the pipe will not be allowed. A power rodding machine shall be either a sectional or a continuous rod type capable of holding a minimum of 750 feet of rod. The rod shall be specially heat-treated steel.

- d. Jet Vac (Vactor) Cleaning Equipment
  - i. Vactor cleaning equipment as necessary to remove debris during cleaning operation.
- 4. Execution
  - a. General Sewer Line Cleaning
    - i. Sewer line cleaning shall be performed with hydraulically propelled high-velocity jets, and/or mechanical power equipment. Equipment shall be based on field conditions, such as access to manhole, type and quantity of debris to be removed, size of sewer, and depth of flow. Selected equipment shall be capable of cleaning spans of sewer main at a minimum of up to 1,500 linear feet without the need for a reverse set-up unless authorized by the City Administrator.
    - ii. Hydraulic or mechanical means shall be used to remove all dirt, grease, rocks, sand and other materials and obstructions from the sewer lines. The Contractor shall provide a mechanism to prevent debris from moving downstream from the line segment being cleaned. The method of cleaning for each segment shall be based on site conditions and shall be approved by the Engineer.
    - iii. Cleaning shall start from the upstream reaches of the study area or neighborhood and progress downstream.
  - b. Pre-Cleaning Exploratory Investigation
    - i. Prior to commencing work on a line segment, the Contractor shall deploy an exploratory CCTV through the pipeline to determine approximate average debris levels and/or grout levels to determine payment under "Light to Medium Cleaning", "Heavy Cleaning". "Light to Medium Grout Cleaning", and Heavy Grout Cleaning" for payment classification purposes. For pipe sections with normal wastewater debris, levels may be ascertained by debris levels at in-line manholes, with the concurrence of the Engineer.
  - c. Root Removal
    - i. Roots shall be removed within the cleaning limits and shall be considered part of sewer cleaning procedures. Special attention should be given during the cleaning operations to ensure complete removal of roots from the joints. Chemical means of root control or removal SHALL NOT be used on this project.
  - d. Grease Removal
    - ii. Grease shall be removed within the cleaning limits and shall be considered part of sewer cleaning procedures. Special attention should be given

during the cleaning operations to ensure the complete removal of grease from the top of the pipe. Procedures may include the use of mechanical equipment, such as rodding machines, bucket machine and winches using root cutters and porcupines, as well as equipment such as high-velocity jet cleaners and hot water. Chemicals means of grease removal using an EPA-approved chemical degreaser SHALL NOT be used on this project without prior authorization from the Contract Administrator.

e. Manhole Cleaning

Walls shall be washed using high pressure jet capable of 1,500 psi. Debris from the vault or manhole shall be vacuumed and disposed of in same manner as debris removed from the sewer main cleaning.

f. Debris Removal

- i. The Contractor shall dispose of debris removed from cleaning operations on this project at the Greenwood WWTP, location at 1541 Saratoga Boulevard, Corpus Christi, Texas 78415, unless otherwise directed by the City Administrator. The Contractor shall coordinate dumping with the City Utility Department at all times. The Contractor shall not be charged for disposal at the designated location for debris removed only from the City of Corpus Christi sewer system under this contract. The City will be responsible for the removal, cost, and disposal of dried solids. The Contractor will record debris volumes on the City of Corpus Christi Cleaning Logs. The Contractor shall not dispose of any debris from any other source(s) other than the City of Corpus Christi wastewater collection system at the Greenwood WWTP. Debris removal shall be included in the price bid for the various pipe line cleaning items.
- ii. The Contractor will be responsible for obtaining and maintaining all necessary permits to transport sludge waste in the State of Texas and the City of Corpus Christi.

g. Cleaning and Inspection Notification

- i. The success of the Corpus Christi Utility Department Sewer Cleaning and Inspection Program is dependent upon close coordination of the City and Contractor activities affecting the City of Corpus Christi Utility Department customers in an effort to maintain customer cooperation. The following are the requirements for notifying affected customers of cleaning and television inspection activities. All procedures must be followed:

- ii. A notice ("flyer") shall be provided to each residence and business a minimum of two (2) full working days prior to working in the area. The Notification flyer will inform the occupants of the purpose of the work, the possible events that may occur, and the telephone numbers to call if questions or problems arise. The master flyer for Notification will be provided to the Contractor for use in making all necessary copies of the flyer on white paper for distribution to residences and businesses.
  - iii. The Contractor shall, on a daily basis, document all distribution of flyers. Documentation at a minimum shall include maps that show the areas that were notified, as well as the date and name of the person completing the notification. The Contractor shall provide this information to the Engineer and the City on a daily basis. The Contractor shall schedule work to be completed within five (5) working days from the day that the notices are distributed. If the work is unable to be completed in the notified area before the end of five working days, the area will be re-notified.
- h. Cleaning Precautions
- i. During sewer cleaning operations, satisfactory precautions shall be taken in the use of cleaning equipment. When hydraulically propelled cleaning tools (that depend upon water pressure to provide their cleaning force) or tools that retard the flow in the sewer line are used, precaution shall be taken by the Contractor to ensure that the water pressure created does not damage or cause flooding of public or private property being served by the sewer.
  - ii. When additional water from fire hydrants is necessary to avoid delays in normal work procedures, the water shall be conserved and not used unnecessary. No fire hydrants shall be obstructed in case of a fire in the area served by the hydrant or as restricted by the City. The Contractor shall use a double backflow prevention device mounted on the fire hydrant in cases where the fire hose connected to the cleaning equipment is considered susceptible to contamination, regardless of the backflow configuration on the cleaning equipment.
  - iii. The Contractor shall be responsible for any damages caused by its actions during this project. The Contractor will comply with all City of Corpus Christi Utility Department requirements.
- i. Remediation of Backup into Buildings
- i. Backups into buildings that occur during cleaning, inspecting, or plugging, require immediate remediation using the services of a local firm specializing in cleaning and disinfecting residences and business.

- ii. Upon discovery that a backup has occurred, the Contractor will immediately notify the Contract Administrator who will investigate the incident. The Contractor shall dry up the spill immediately and dispatch the cleaning service to professionally clean and disinfect the area.
  - iii. The cleaning service firm shall be at the customer site within three hours of notification of backup occurrence, or otherwise schedule by customer. All communication will be through the Contract Administrator.
  - iv. Documentation of the remediation services provided shall be given to the Contract Administrator. In the event that the customer refuses the remediation services, the Contractor shall provide a business card and contact name to enable the customer to schedule shall be documented by the Contractor and provide to Utility Department Representative.
- j. CCTV Requirements
- 1. General
    - a. Closed circuit television inspection will typically be done under one or more of the conditions listed below. Requirements for on-screen labeling during each line segment set up televising, video file labeling and hard copy inspection reports will be specifically addressed. The Contractor shall neither request nor receive assistance from the City in the performance of work described in this specification.
    - b. Unless otherwise specified and at the Contractor's expense, the Contractor shall provide for the control of wastewater flows and monitoring of the collection system for back-ups and surcharges, while flow control devices are in place.
  - 2. Inspection Equipment and Methods
    - a. Electronic inspections software that is NASSCO PACP (version 6.0 or greater) compliant shall be used to record the condition of each pipe segment inspected. The minimum header information required for each inspection is presented in Header Field Checklist herein.
    - b. Video inspection is to be performed in the field by a NASSCO Pipeline Assessment and Certification Program (PACP) certified operator. The operator name and NASSCO certification number is required on each inspection.

- c. The Contractor will perform closed circuit video inspections of the sewers using current state-of-the-art technology and trained employees. CCTV camera will use high-resolution color with an adjustable iris focus.
- d. The CCTV camera will have pan-and-tilt capabilities that allow up close and right-angled inspections of defected and other significant observations. The video camera will be equipped with a minimum of 1000 feet of video cable. Lighting on video camera will be suitable to allow proper illumination and clear video image of the entire periphery of the pipe. The camera will be operative in 100% humidity conditions. The camera, television monitor, and other components of the video system will produce a high quality video image.
- e. The capture system shall have the capability of recording, digitizing, and storing single frames of video images and "real time" live video, as well as collecting, storing, and printing pipeline inspection data for graphic display and report generation. The imaging capture system shall store digitized picture images, have the ability to export picture files to industry standard formats (jpg or format acceptable to City Administrator), be transferable to flash drives, DVDs or hard drives, and have the ability to be printed. In every case, all observations will be recorded in the field by currently certified PACP operators using PACP codes and protocols. Post inspection coding in an office will not be accepted.
- f. Footage distance measured by the video system will be accurate within 1% and will be used to determine footage for reporting and payment. The PACP distance between manholes (from exit wall to entrance wall) will be the reference point used to determine footage measurements. Video inspection will not exceed a traverse rate of 30 feet per minute to ensure that the sewer line can be thoroughly examined by the City while reviewing video.
- g. During the transit, the display must show the continued distance from the insertion manhole with an accuracy of +/- 1% of the actual length to help mark observations on the report form. The video must display all notable PACP observations/codes.
- h. The Inspection Report shall consist of conditions observations recorded using computer software generated formats conforming to NASSCO PACP version 6.0 or greater. Items considered notable include: deviations in alignment and grade; abnormal conditions of the pipe barrel and joints; locations and quantities of any sources of infiltration or inflow; dropped,

broken, properly/improperly installed service taps; debris, roots or other impediments to flow; and any other conditions that may either prevent the proper completion of the inspection or affect any proposed rehabilitation process. The camera should be panned and tilted at each (if any) observed service connection.

Each pipe segment (manhole to manhole) shall be identified with an initial text screen and completed in accordance with Pipeline Assessment and Certification Program (PACP)'s CCTV inspection form header instructions and shall be as follows:

Header Field Checklist			
Field #	Header Field	Mandatory	Required for this Project
1	Surveyed By	X	
1a	Certificate No.	X	
2	Owner		X
3	Customer		X
4	Drainage Area		
5	Sheet Number	X	
6	P/O Number		
7	Pipe Segment Ref. (PSR)	X	
8	Date	X	
9	Time		
10	Street	X	
10a	City	X	
11	Location Details		
12	Upstream MH No.	X	
13	Upstream MH Rim to Invert		
14	Upstream MH Grade to Invert		
15	Upstream MH Rim to Grade		
16	Downstream MH No.	X	
17	Downstream MH Rim to Invert		
18	Downstream MH Grade to Invert		
19	Downstream MH Rim to Grade		
20	Sewer Use		X
21	Direction	X	
22	Flow Control		X
23	Height	X	
24	Width	X	



25	Shape	X	
26	Material	X	
27	Lining Method		
28	Pipe Joint Length		X
29	Total Length		X
30	Length Surveyed		X
31	Year Laid		
32	Year Renewed		
33	Media Label		
34	Purpose		
35	Sewer Category		
36	Pre-Cleaning	X	
36a	Date Cleaned		X
37	Weather		X
38	Location		X
39	Additional Info. (Street or Easement)		X
40	W/O #		X
41	Project		X
42	Pressure Value		

### 3. Flow Control

- a. The line shall be dewatered during inspection. A water jet cleaning unit will normally be running in the advance of the television camera to allow for the highest quality picture, along with a 360-degree view of the pipeline. Dewatering shall remove standing water and visible moisture from the line segment to provide a clear 360-degree view of the pipe being televised. An excessively high water level, condensation resulting in a blurred lens, or a submerged camera may be ground for rejection of the inspection.
- b. All sewer flow from intersecting lines, which cannot be drawn down with hydraulic jet nozzle, shall typically be controlled through the use of in-line plugs and/or vacuum trucks, and to the inspection for all lines sizes up to 60" inches in diameter. Plugs in interesting lines shall be installed by the Contractor. The Contractor shall also monitor the upstream system for back-ups and surcharges, which may lead to Sanitary Sewer Overflows (SSOs). The Contractor shall immediately report all sanitary sewer overflows to the City Administrator and City Call Center at (361) 826-2489. Flow Control devices shall be installed in accordance with all applicable OSHA and plug manufacturer recommendations, including, but not necessary limited to, confined space protocol. The Contractor certifies that all personnel working on the project have been trained in confined space,

use of flow control devices per manufacturer recommendation, traffic controls, and hazards associated with working in wastewater collection systems.

c. No bypass pumping is anticipated under this scope of work.

4. CCTV Reverse Set-Up

A CCTV reserve set-up is an attempt to view the line segment from the opposite direction due to an obstruction encountered during the initial set-up or a line segment that exceeds the 1000 feet CCTV cable length.

5. Easement Access

The Contractor will be responsible for providing equipment, including, but not limited to portable CCTV equipment, vehicles capable of transporting TV equipment and accessing remote easements, and adequate cleaning equipment to perform the cleaning and inspection of lines located within easement areas. Easement areas are defined as those areas not accessible to normal vehicular traffic.

6. Work Hours

Normal working hours shall be considered 8 AM to 5 PM, Monday – Friday for the duration of the project. When authorized/required by the City Administrator, the Contractor may perform inspection to be done during low flow periods, to minimize impacts on traffic safety, or for other reasons determined by the City.

7. Confined Space Entry

When necessary to complete cleaning and inspection activates (including, but not limited to plugging, flow control, etc.), the Contractor may enter manholes. All pertinent OSHA regulations will be followed, and the Contractor will provide copies of confined spaces entry permits, if requested.

8. Deliverable

a. Television Inspection Logs

Electronic media inspection logs/record shall be kept by the Contractor and will clearly show the location, by distance in 1/10 of a foot, from the manhole wall, in relation to an adjacent manhole of each observation during inspection. In addition, other points of significance, such as locations of service connections, unusual conditions, roots, storm sewer connections, unusual conditions, roots, storm sewer connections, cracks, fractures, broken pipe, presence of scale and corrosion, and other discernible features, as defined in the PACP defect codes, will be

recorded on electronic media, and a copy of such records will be taken by the Contractor. Photographs shall be located by distance in 1/10 of a foot, from the manhole wall, in relation to an adjacent manhole.

b. Electronic Media Recordings

- i. The purpose of electronic media recording shall be to supply a visual record of the entire line segment that may be viewed by the Owner. Each original electronic media recording of conditions and defeats will be delivered to the City at least monthly, which summarizes the lines completed during the period. The submittal must agree with the monthly billing request in terms of unit quantities and electronic deliverables.
- ii. The Contractor is required to provide NASSCO PACP compliant computer software-generated Inspection Report products to the Owner, as a result of each work order issued. Acceptable submission become the property of the City. The electronic recordings will have ready-only software that will facilitate the viewing and printing of additional copies of the inspection report and the digital photographs. The CD, DVD-ROM, or hard drive will also include video that can be viewed. The electronic recordings will be compatible with Microsoft Windows 7 and will be delivered to the Utility Department within ten (10) calendar days of the last day of the performance period.

c. Quality Control

- i. Inadequate main sewer preparatory cleaning, camera distortion, inadequate lighting, dirty or submerged lens, and blurry or hazy pictures that are determined to be the fault of the Contractor will be cause for rejection of the inspection effort. If the City does not approve of the quality of the deliverables, the Contractor shall repeat the documenting process at no cost to the City.

d. Upon Completion of the Project

- i. Submission of one properly labeled flash drive, hard drive, or DVD (as appropriate for the size of the project) will be required, along with one hard copy report. The media will be properly labeled to identify the contents. The media will be labeled, either typed or neatly printed, with the following information on the cover/container with electronic text included on the root drive of the media:

Project Name

- Work Order
  - Contractor Name, Address, Contact Number
  - Date
- ii. All required reports, databases, photographs, and video are to be from City approved, software-generated formats. Hard copy reports will be printed single-side on 8 ½ " x 11" paper, in color, to improve the definition of problem areas, and delivered with the media.
- iii. The final project submittal must be reconciled with the monthly billing with regards to quantities of work completed or any exceptions noted.

	Hard Copy	On Media
1. Project Summary Report (pdf or approved equal)	✓	✓
2. CCTV Defect Listing Log (pdf or approved equal)	✓	✓
3. Condition Code Summary (pdf or approved equal)	✓	✓
4. Cleaning Log (pdf or approved equal)	✓	✓
5. NASSCO PACP compliant Access Database		✓
6. Video Files (mpeg, wmv or approved equal)		✓
7. Defect photographs (jpeg or approved equal)		✓
8. Cleaning Log Summary (xls or approved equal)		✓

- iv. One report is required for each project (which may consist of an entire main line) The Contractor's supposed software must be approved before the first Work Order is initiated. The final submittal must include a table of contents that summarizes all line segments that were cleaned, televised, and inspected with CCTV logs arranged in order by the PACP PSR identification number, beginning with the lowest number up to the highest number. The Contractor shall submit a sample of the proposed report to the City for review and approval

## 9. Measurement and Payment

### A. Measurement

1. The qualities for payment under each work order shall be determined by field measurement prior to the approval of the work order being issued.

2. The City does not expressly or implicitly agree that the actual amount of the work to be done in the performance of the contract will correspond with the quantities in the Bid Proposal Sheet. The amount of work to be done may be more or less than said quantities and may be increased or decreased by the City as circumstances may require. The increase or decrease of any quantity shall not be regarded as grounds for an increase in the unit price or in the time allowed for the completion of the work, except as provided in the contract documents.

B. Payments

1. Payments to the Contractor shall be made on the basis of the prices in the contract and shall constitute full and complete payment for furnishing all materials, labor, tools and equipment, for providing all reports and data deliverables and for performing all operations necessary to complete the work included in the work orders. Such compensation shall also include payments for any loss or damages arising, directly or indirectly, from the work or from any discrepancies between the actual quantities of work and those shown in the work orders. Unless otherwise noted in contract, the prices include all costs and expenses for mobilization, including, but not limited to: taxes, labor, licenses, equipment, materials, commissions, transportation charges and expenses, patent fees and royalties, labor for handling materials during inspection, and the maintenance of traffic, along with any and all other costs and expenses for performing and completing the work, as described in the delivery order and specified herein.
2. The basis of payment for an item at the price shown in the contract shall be in accordance with its description of the item in this Section and as related to the work specified. Unit prices will be applied to the actual quantities furnished and installed in conformance with the work orders.
3. The Contractor's attention is 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, including the necessary reporting and documentation.

C. Payment Items

a. Mobilization

1. Item No. 1 Sewer Cleaning, CCTV Job Mobilization

This price shall be per each mobilization for each sewer cleaning/inspection work order unless work crews are onsite and given continuous, consecutive work orders. Payment for job mobilization shall be for all items and shall be included in the lump sum price. This item will include all operations necessary for the preparatory work and operations in mobilizing to begin work on the project, including, but not limited to: multiple operations necessary for the movement of personnel equipment, supplies, and incidentals to the project site; sanitary and other facilities as required by these specifications and state and local laws and regulations, along with any other pre-construction expense necessary for the start of the work; permits and fees, construction schedules, shop drawings, temporary facilities, lay down storage area, construction aids, pre-construction documentation, traffic control devices, work associated with the Contractor support during reviews and inspection, re-inspection and storage, and final site clean-up.

2. Item No. 2 Emergency Job Mobilization

- a. This lump sum item shall be for mobilization within 4 hours of notification and authorization from the City.
- b. Payment for emergency mobilization shall be for all items and shall be included in the lump sum price. This item will include all operations necessary for the preparatory work and operations in mobilizing to begin work on the emergency project, including, but not limited to: multiple operations necessary for the movement of personnel, equipment, supplies and incidentals to the project site, sanitary and other facilities as required by these specifications and state and local laws and regulations, along with any other pre-construction expense necessary for the start of the work; permits and fees, construction schedules, shop drawings, temporary facilities, lay down storage area, construction aids, pre-construction documentation, erosion control, traffic control devices, temporary traffic control plans, work associated with the Contractor support during reviews and inspection, re-inspection and storage, and final site clean-up.

D. Traffic Control

a. Item No. 3 Arterial Streets Traffic Control for (Five Lanes or Greater)

This lump sum price is per day for traffic control devices for arterial streets for each work order.

b. Item No. 4 Collector Streets Traffic Control for (Three or Four Lanes)

This lump sum price is per day for traffic control devices for collector streets for each work order

c. Item No. 5 Residential Streets Traffic Control for (Two Lanes)

This lump sum price is per day for traffic control devices for residential streets for each work order.

d. Item No. 6 TxDOT ROW for Traffic Control

e. This price is per day for traffic control devices for work adjacent to, in, or under TxDOT ROW for each work order.

f. Item No. 7 Changeable Variable Message Boards

Price and payment per day will be full compensation for furnishing, installing, operating, relocating, maintaining and removing changeable message signs.

E. Line Cleaning

a. Item Nos. 8 – 17 Line Cleaning, Light to Medium Cleaning

1. Light to medium cleaning is for pipes with 0% to 20% (inches of debris/diameter of pipe x100) debris levels.
2. Pipe size shall be the diameter of the pipe or slip liner.
3. Measurement shall be made and based on the horizontal projection of the centerline of pipe in which cleaning was performed between manholes, measured to the nearest foot from inside wall of the manhole to the inside wall of the other manhole, and not including the manhole chamber.
4. Payment will be paid at the unit price per linear foot for the gravity main size.

b. Item Nos. 18 – 27 Line Cleaning, Heavy Cleaning

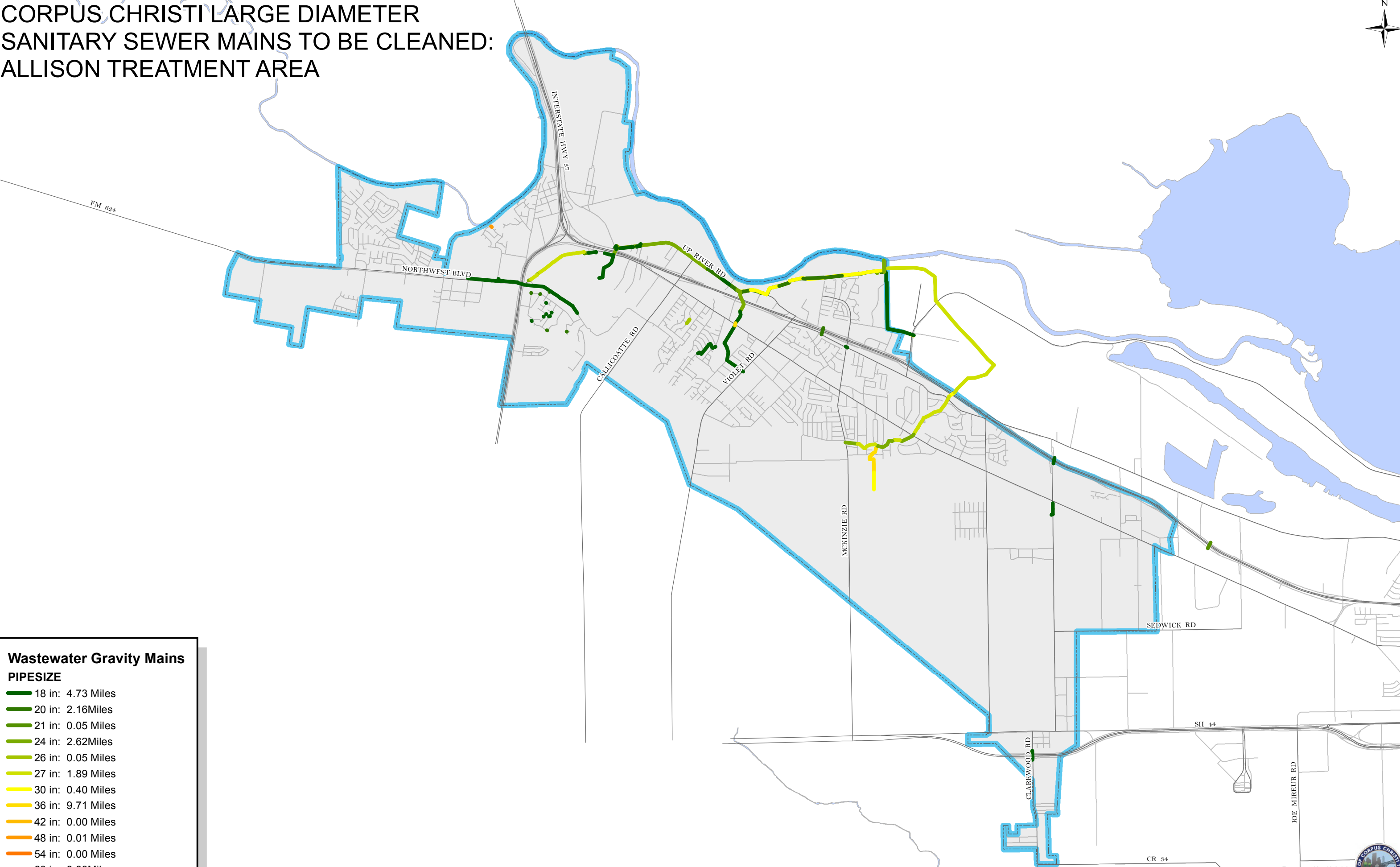
1. Heavy cleaning is for pipes with 20% or greater (inches of debris/diameter of pipe x 100) debris levels.
2. Pipe size shall be the diameter of the pipe or slip liner.
3. Measurement shall be made and based on the horizontal projection of the centerline of pipe in which cleaning was performed between manholes, measured to the nearest foot from inside wall of the manhole to the inside wall of the other manhole, and not including the manhole chamber.

4. Payment will be paid at the unit price per linear foot for the gravity main size.
- c. Item Nos. 28 – 37 Line Cleaning, Grout Removal, Light to Medium Cleaning
  1. Grout that is present in the line due to faulty previous liner installation. For pipes with 20% or less (inches of grout/diameter of pipe x 100) grout debris levels.
  2. Pipe size shall be the diameter of the pipe or slip liner.
  3. Measurement shall be made and based on the horizontal projection of the centerline of pipe in which grout cleaning was required and performed, measured to the nearest foot.
  4. Payment will be paid at the unit price per linear foot for the gravity main size.
- d. Item Nos. 38 – 47 Line Cleaning, Grout Removal, Heavy Cleaning
  1. Grout that is present in line due to faulty previous liner installation. For pipes with greater than 20% (inches of grout/diameter of pipe x 100) grout debris levels.
  2. Pipe size shall be the diameter of the pipe or slip liner.
  3. Measurement shall be made and based on the horizontal projection of the centerline of pipe in which grout cleaning was required and performed, measured to the nearest foot.
  4. Payment will be paid at the unit price per linear foot for the gravity main size.
- e. Item No. 48 Reverse Set-Up
  1. Reverse CCTV Set-Up shall only be measured and paid if an obstruction is encountered during the initial set-up that could not be removed, requiring the Contractor to relocate to another manhole, upstream or downstream of the original manhole, and/or if the segment length exceeds the cleaning hose (1500 feet) or CCTV cable (1000 feet) lengths. No reverse set-up fee will be authorized if the CCTV camera does not fit due to physical restrictions at the reverse location.
- f. Item No. 49 Add For Items 8 – 47
  1. Price per Linear Foot (additional) For Approved Scheduled After-Hours Work and/or emergency call outs, All Pipe Sizes.
- F. CCTV Inspection
  - a. Item Nos. 50 – 59 CCTV Inspection
    1. Measurement shall be based on the linear feet of sewer main televised.



2. Pipe size shall be the diameter of the pipe or slip liner.
3. Payment will be at the contract unit price shown for linear feet and shall be full compensation for the item of work completed. The deliverables shall be acceptable to the City. If the deliverable is unacceptable, the Contractor shall re-televis the sewer main to ensure that it is acceptable to the City, at the Contractor's cost. The unit price shall provide full compensation for all work required, including, but not limited to: mobilization, furnishing all labor, equipment and materials, for cleaning, flow isolation, TV inspection, and all incidentals related to sewer mains inspection.

CORPUS CHRISTI LARGE DIAMETER  
SANITARY SEWER MAINS TO BE CLEANED:  
ALLISON TREATMENT AREA



Wastewater Gravity Mains	
PIPE SIZE	
18 in:	4.73 Miles
20 in:	2.16 Miles
21 in:	0.05 Miles
24 in:	2.62 Miles
26 in:	0.05 Miles
27 in:	1.89 Miles
30 in:	0.40 Miles
36 in:	9.71 Miles
42 in:	0.00 Miles
48 in:	0.01 Miles
54 in:	0.00 Miles
60 in:	0.00 Miles

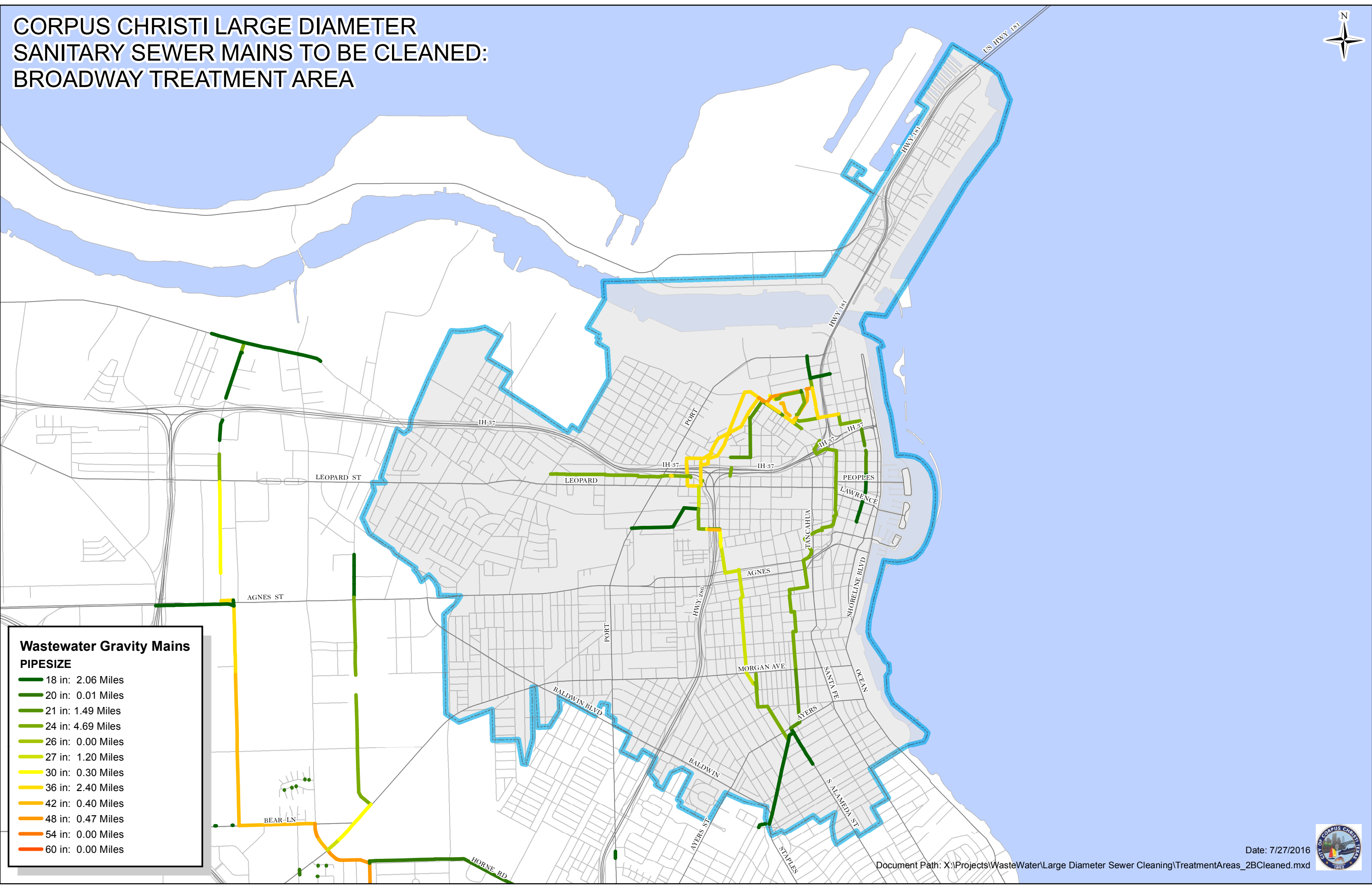


CORPUS CHRISTI LARGE DIAMETER  
SANITARY SEWER MAINS TO BE CLEANED:  
BROADWAY TREATMENT AREA



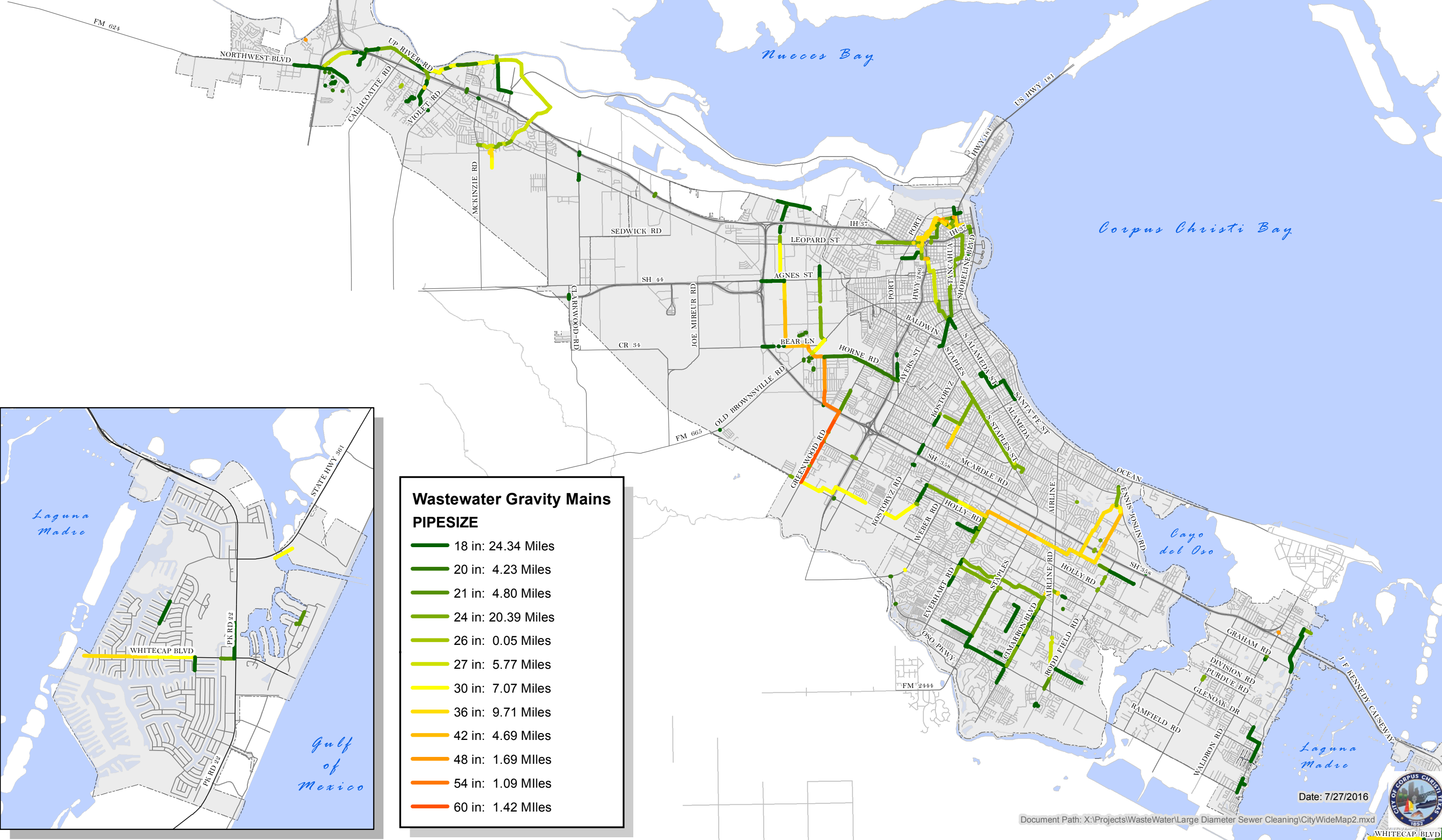
Wastewater Gravity Mains  
PIPE SIZE

- 18 in: 2.06 Miles
- 20 in: 0.01 Miles
- 21 in: 1.49 Miles
- 24 in: 4.69 Miles
- 26 in: 0.00 Miles
- 27 in: 1.20 Miles
- 30 in: 0.30 Miles
- 36 in: 2.40 Miles
- 42 in: 0.40 Miles
- 48 in: 0.47 Miles
- 54 in: 0.00 Miles
- 60 in: 0.00 Miles





# CORPUS CHRISTI LARGE DIAMETER SANITARY SEWER MAINS TO BE CLEANED



Date: 7/27/2016

Document Path: X:\Projects\WasteWater\Large Diameter Sewer Cleaning\CityWideMap2.mxd



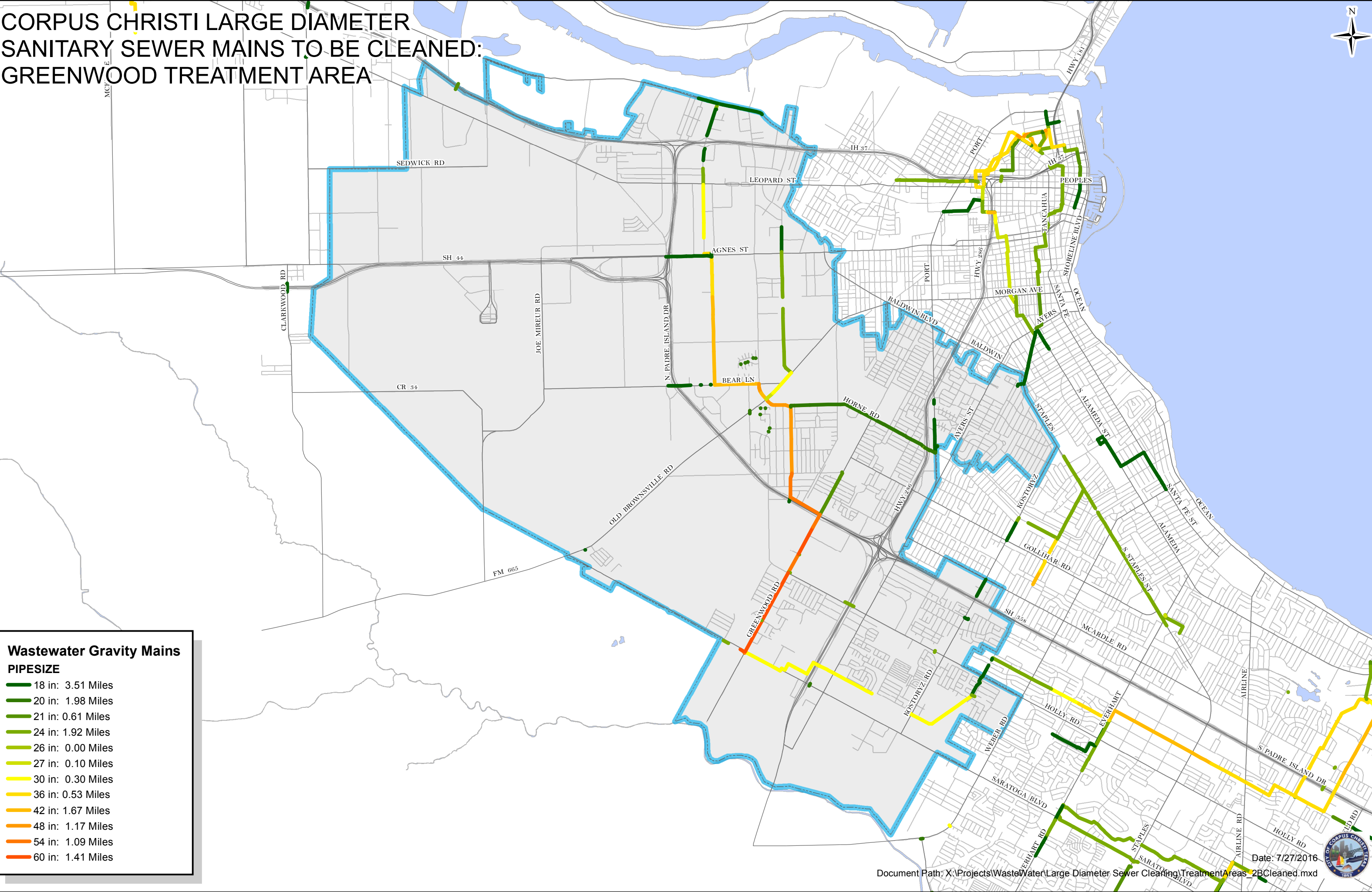
WHITECAP BLVD

# CORPUS CHRISTI LARGE DIAMETER SANITARY SEWER MAINS TO BE CLEANED: GREENWOOD TREATMENT AREA



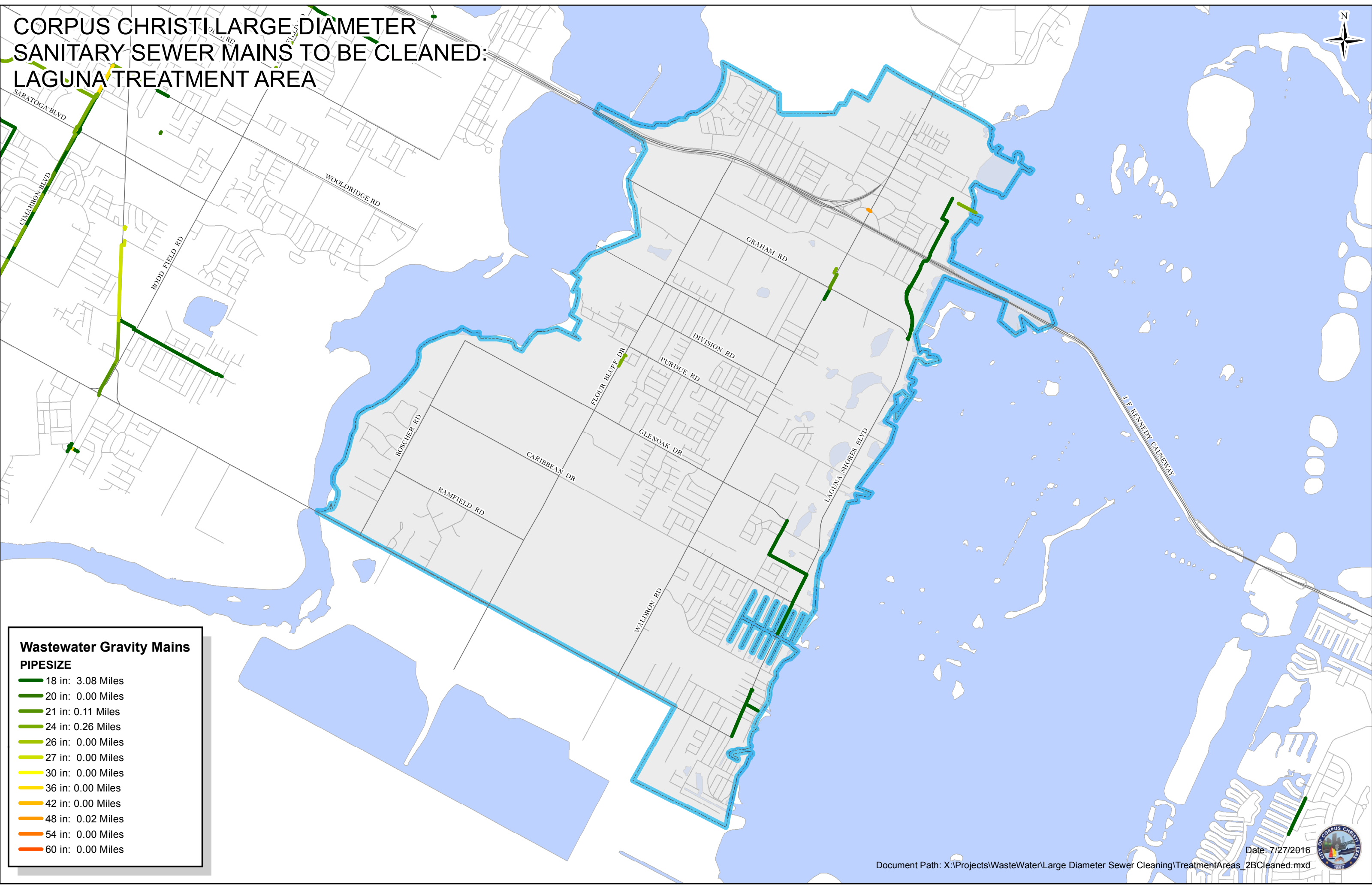
## Wastewater Gravity Mains PIPE SIZE

- 18 in: 3.51 Miles
- 20 in: 1.98 Miles
- 21 in: 0.61 Miles
- 24 in: 1.92 Miles
- 26 in: 0.00 Miles
- 27 in: 0.10 Miles
- 30 in: 0.30 Miles
- 36 in: 0.53 Miles
- 42 in: 1.67 Miles
- 48 in: 1.17 Miles
- 54 in: 1.09 Miles
- 60 in: 1.41 Miles





CORPUS CHRISTI LARGE DIAMETER  
SANITARY SEWER MAINS TO BE CLEANED:  
LAGUNA TREATMENT AREA



**Wastewater Gravity Mains**  
**PIPESIZE**

18 in:	3.08 Miles
20 in:	0.00 Miles
21 in:	0.11 Miles
24 in:	0.26 Miles
26 in:	0.00 Miles
27 in:	0.00 Miles
30 in:	0.00 Miles
36 in:	0.00 Miles
42 in:	0.00 Miles
48 in:	0.02 Miles
54 in:	0.00 Miles
60 in:	0.00 Miles

# CORPUS CHRISTI LARGE DIAMETER SANITARY SEWER MAINS TO BE CLEANED: OSO TREATMENT AREA



## Wastewater Gravity Mains PIPE SIZE

- 18 in: 10.21 Miles
- 20 in: 0.07 Miles
- 21 in: 2.20 Miles
- 24 in: 10.89 Miles
- 26 in: 0.00 Miles
- 27 in: 0.60 Miles
- 30 in: 0.53 Miles
- 36 in: 5.65 Miles
- 42 in: 2.61 Miles
- 48 in: 0.01 Miles
- 54 in: 0.00 Miles
- 60 in: 0.00 Miles



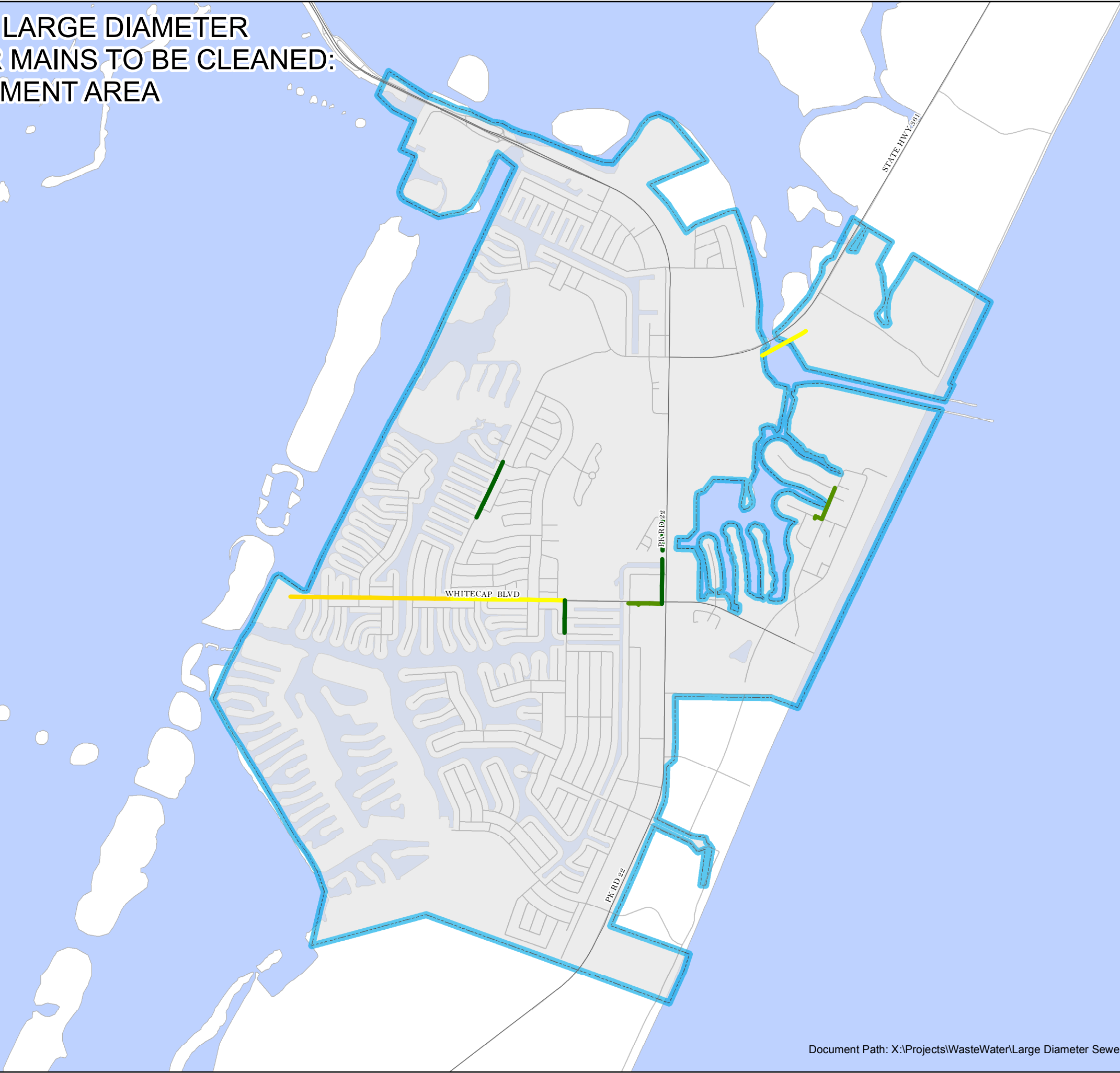


CORPUS CHRISTI LARGE DIAMETER  
SANITARY SEWER MAINS TO BE CLEANED:  
WHITECAP TREATMENT AREA

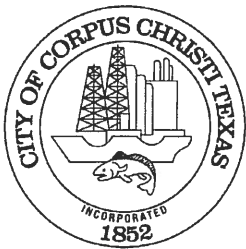


Wastewater Gravity Mains  
PIPE SIZE

18 in:	0.77 Miles
20 in:	0.00 Miles
21 in:	0.34 Miles
24 in:	0.00 Miles
26 in:	0.00 Miles
27 in:	0.00 Miles
30 in:	0.72 Miles
36 in:	0.71 Miles
42 in:	0.00 Miles
48 in:	0.01 Miles
54 in:	0.00 Miles
60 in:	0.00 Miles







## CITY OF CORPUS CHRISTI BID FORM

PURCHASING DIVISION

RFB No.194

**Closed Circuit Televised (CCTV) Cleaning and  
Inspection of Large Diameter Wastewater Line**

PAGE 1 OF 2

Date: 1-20-17Bidder: CSI Consolidated LLC dba  
Clean Serve LLCAuthorized  
Signature: \_\_\_\_\_

1. Refer to "Instructions to Bidders" and Contract Terms and Conditions before completing bid.

2. Quote your best price for each item.

3. In submitting this bid, Bidder certifies that:

- a. ✓ the prices in this bid have been arrived at independently, without consultation, communication, or agreement with any other Bidder or competitor, for the purpose of restricting competition with regard to prices;
- b. ✓ Bidder is an Equal Opportunity Employer; and the Disclosure of Interest information on file with City's purchasing office, pursuant to the Code of Ordinances, is current and true.
- c. ✓ Bidder is current with all taxes due and company is in good standing with all required governmental agencies.
- d. ✓ Bidder acknowledges receipt and review of all addenda for this RFB.
- e. ✓ The estimated quantities of services are as noted on the Bid Sheet herein. Although actual quantities may vary, the descriptions and estimated quantities are to form the basis of the unit prices submitted by the Bidder.

Item	Description		UNIT	QTY	Unit Price	Total Price
1	JOB MOBILIZATION	SEWER CLEANING, CCTV	EA	6	1,700.00	10,200.00
2	JOB MOBILIZATION	EMERGENCY	EA	1	2,500.00	2,500.00
3	TRAFFIC CONTROL	ARTERIAL STREET	DAY	20	1,200.00	24,000.00
4	TRAFFIC CONTROL	COLLECTOR STREET	DAY	10	1,500.00	15,000.00
5	TRAFFIC CONTROL	LOCAL ACCESS STREET	DAY	20	1,000	20,000.00

Item	Description		UNIT	QTY	Unit Price	Total Price
6	TRAFFIC CONTROL	TXDOT ROW	DAY	5	3,500.00	17,500.00
7	TRAFFIC CONTROL	CHANGEABLE VARIABLE MESSAGE BOARDS (EA)	DAY	40	350.00	14,000.00
8	LIGHT TO MEDIUM CLEANING	18" PIPE SIZE	LF	2,500	2.15	5,375.00
9	LIGHT TO MEDIUM CLEANING	20-21" PIPE SIZE	LF	1,500	2.15	3,225.00
10	LIGHT TO MEDIUM CLEANING	24" PIPE SIZE	LF	2,500	2.85	7,125.00
11	LIGHT TO MEDIUM CLEANING	27" PIPE SIZE	LF	1,200	2.85	3,420.00
12	LIGHT TO MEDIUM CLEANING	30" PIPE SIZE	LF	1,200	5.65	6,780.00
13	LIGHT TO MEDIUM CLEANING	36" PIPE SIZE	LF	1,500	5.65	8,475.00
14	LIGHT TO MEDIUM CLEANING	42" PIPE SIZE	LF	1,200	6.40	7,680.00
15	LIGHT TO MEDIUM CLEANING	48" PIPE SIZE	LF	800	6.40	5,120.00
16	LIGHT TO MEDIUM CLEANING	54" PIPE SIZE	LF	800	9.30	7,440.00
17	LIGHT TO MEDIUM CLEANING	60" PIPE SIZE	LF	800	9.30	7,440.00
18	HEAVY CLEANING	18" PIPE SIZE	LF	2,500	8.10	20,250.00
19	HEAVY CLEANING	20"-21" PIPE SIZE	LF	1,500	8.10	12,150.00
20	HEAVY CLEANING	24" PIPE SIZE	LF	2,500	12.35	30,875.00
21	HEAVY CLEANING	27" PIPE SIZE	LF	1,200	12.35	14,820.00
22	HEAVY CLEANING	30" PIPE SIZE	LF	1,200	24.70	29,640.00
23	HEAVY CLEANING	36" PIPE SIZE	LF	1,500	24.70	37,050.00
24	HEAVY CLEANING	42" PIPE SIZE	LF	1,200	29.15	34,980.00
25	HEAVY CLEANING	48" PIPE SIZE	LF	800	29.15	23,320.00
26	HEAVY CLEANING	54" PIPE SIZE	LF	800	41.70	33,360.00
27	HEAVY CLEANING	60" PIPE SIZE	LF	800	41.70	33,360.00
28	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	18" PIPE SIZE	LF	500	8.50	4,250.00

Item	Description		UNIT	QTY	Unit Price	Total Price
29	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	20"-21" PIPE SIZE	LF	250	8.50	2,125.00
30	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	24" PIPE SIZE	LF	500	10.40	5,200.00
31	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	27" PIPE SIZE	LF	150	10.40	1,560.00
32	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	30" PIPE SIZE	LF	150	12.75	1,912.50
33	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	36" PIPE SIZE	LF	250	12.75	3,187.50
34	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	42" PIPE SIZE	LF	150	19.00	2,850.00
35	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	48" PIPE SIZE	LF	75	19.00	1,425.00
36	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	54" PIPE SIZE	LF	75	25.50	1,912.50
37	LIGHT TO MEDIUM GROUT REMOVAL CLEANING	60" PIPE SIZE	LF	75	25.50	1,912.50
38	HEAVY GROUT REMOVAL CLEANING	18" PIPE SIZE	LF	500	20.95	10,475.00
39	HEAVY GROUT REMOVAL CLEANING	20" - 21" PIPE SIZE	LF	250	20.95	5,237.50
40	HEAVY GROUT REMOVAL CLEANING	24" PIPE SIZE	LF	500	24.55	12,275.00
41	HEAVY GROUT REMOVAL CLEANING	27" PIPE SIZE	LF	150	24.55	3,682.50
42	HEAVY GROUT REMOVAL CLEANING	30" PIPE SIZE	LF	150	29.70	4,455.00
43	HEAVY GROUT REMOVAL CLEANING	36" PIPE SIZE	LF	250	29.70	7,425.00
44	HEAVY GROUT REMOVAL CLEANING	42" PIPE SIZE	LF	150	37.55	5,632.50
45	HEAVY GROUT REMOVAL CLEANING	48" PIPE SIZE	LF	75	37.55	<del>2,816.25</del> 2,816.25
46	HEAVY GROUT REMOVAL CLEANING	54" PIPE SIZE	LF	75	56.00	4,200.00
47	HEAVY GROUT REMOVAL CLEANING	60" PIPE SIZE	LF	75	56.00	4,200.00
48	REVERSE SETUP	ALL PIPE SIZES	EA	10	100.00	1,000.00
49	ADDER FOR ITEMS 8-47	COST PER (ADDITION)	LF	100	.50	50.00
50	CCTV	18" PIPE SIZE	LF	2,500	.85	2,125.00

Item	Description		UNIT	QTY	Unit Price	Total Price
51	CCTV	20" - 21" PIPE SIZE	LF	1,500	.85	1,275.00
52	CCTV	24" PIPE SIZE	LF	2,500	.90	2,250.00
53	CCTV	27" PIPE SIZE	LF	1,200	.90	1,080.00
54	CCTV	30" PIPE SIZE	LF	1,200	1.05	1,260.00
55	CCTV	36" PIPE SIZE	LF	1,500	1.05	1,575.00
56	CCTV	42" PIPE SIZE	LF	1,200	1.10	1,320.00
57	CCTV	48" PIPE SIZE	LF	800	1.10	880.00
58	CCTV	54" PIPE SIZE	LF	800	1.20	960.00
59	CCTV	60" PIPE SIZE	LF	800	1.20	960.00
Total						536,553.75

## Attachment C: Insurance/Bond Requirements

### I. CONTRACTOR'S LIABILITY INSURANCE

- A. Contractor must not commence work under this contract until all insurance required has been obtained and such insurance has been approved by the City. Contractor must not allow any subcontractor, to commence work until all similar insurance required of any subcontractor has been obtained.
- B. Contractor must furnish to the City's Risk Manager and Contract Administrator one (1) copy of Certificates of Insurance with applicable policy endorsements showing the following minimum coverage by an insurance company(s) acceptable to the City's Risk Manager. The City must be listed as an additional insured on the General liability and Auto Liability policies **by endorsement**, and a waiver of subrogation **endorsement** is required on all applicable policies. **Endorsements** must be provided with Certificate of Insurance. Project name and/or number must be listed in Description Box of Certificate of Insurance.

TYPE OF INSURANCE	MINIMUM INSURANCE COVERAGE
<b>30-day advance written notice of cancellation, non-renewal, material change or termination required on all certificates and policies.</b>	<b>Bodily Injury and Property Damage</b> Per occurrence - aggregate
COMMERCIAL GENERAL LIABILITY including: 1. Commercial Broad Form 2. Premises – Operations 3. Products/ Completed Operations 4. Contractual Liability 5. Independent Contractors 6. Personal Injury- Advertising Injury	\$1,000,000 Per Occurrence \$2,000,000 Aggregate
AUTO LIABILITY (including) 1. Owned 2. Hired and Non-Owned 3. Rented/Leased	\$1,000,000 Combined Single Limit
WORKERS'S COMPENSATION (All States Endorsement if Company is not domiciled in Texas)	Statutory and complies with Part II of this Exhibit.
Employers Liability	\$500,000/\$500,000/\$500,000
POLLUTION	\$1,000,000.00

- C. In the event of accidents of any kind related to this contract, Contractor must furnish the Risk Manager with copies of all reports of any accidents within 10 days of the accident.

## II. ADDITIONAL REQUIREMENTS

- A. Applicable for paid employees, Contractor must obtain workers' compensation coverage through a licensed insurance company. The coverage must be written on a policy and endorsements approved by the Texas Department of Insurance. The workers' compensation coverage provided must be in statutory amounts according to the Texas Department of Insurance, Division of Workers' Compensation. An All States Endorsement shall be required if Contractor is not domiciled in the State of Texas.
- B. Contractor shall obtain and maintain in full force and effect for the duration of this Contract, and any extension hereof, at Contractor's sole expense, insurance coverage written on an occurrence basis by companies authorized and admitted to do business in the State of Texas and with an A.M. Best's rating of no less than A- VII.
- C. Contractor shall be required to submit renewal certificates of insurance throughout the term of this contract and any extensions within 10 days of the policy expiration dates. All notices under this Exhibit shall be given to City at the following address:

City of Corpus Christi  
Attn: Risk Manager  
P.O. Box 9277  
Corpus Christi, TX 78469-9277

- D. **Contractor agrees that, with respect to the above required insurance, all insurance policies are to contain or be endorsed to contain the following required provisions:**
- List the City and its officers, officials, employees, and volunteers, as additional insured by endorsement with regard to operations, completed operations, and activities of or on behalf of the named insured performed under contract with the City, with the exception of the workers' compensation policy;
  - Provide for an endorsement that the "other insurance" clause shall not apply to the City of Corpus Christi where the City is an additional insured shown on the policy;
  - Workers' compensation and employers' liability policies will provide a waiver of subrogation in favor of the City; and
  - Provide thirty (30) calendar days advance written notice directly to City of any, cancellation, non-renewal, material change or termination in coverage and not less than ten (10) calendar days advance written notice for nonpayment of premium.
- E. Within five (5) calendar days of a cancellation, non-renewal, material change or termination of coverage, Contractor shall provide a replacement Certificate of Insurance and applicable endorsements to City. City shall have the option to suspend

Contractor's performance should there be a lapse in coverage at any time during this contract. Failure to provide and to maintain the required insurance shall constitute a material breach of this contract.

- F. In addition to any other remedies the City may have upon Contractor's failure to provide and maintain any insurance or policy endorsements to the extent and within the time herein required, the City shall have the right to order Contractor to stop work hereunder, and/or withhold any payment(s) which become due to Contractor hereunder until Contractor demonstrates compliance with the requirements hereof.
- G. Nothing herein contained shall be construed as limiting in any way the extent to which Contractor may be held responsible for payments of damages to persons or property resulting from Contractor's or its subcontractor's performance of the work covered under this contract.
- H. It is agreed that Contractor's insurance shall be deemed primary and non-contributory with respect to any insurance or self-insurance carried by the City of Corpus Christi for liability arising out of operations under this contract.
- I. It is understood and agreed that the insurance required is in addition to and separate from any other obligation contained in this contract.

2016 Insurance Requirements

Wastewater

Wastewater Line Cleaning and Inspection

5/26/16 mv Risk Management

## Attachment C: Bond Requirements

No bond requirements necessary for this service agreement; section 5.(B) is null for this service agreement.



## Attachment D: Warranty Requirements

No warranty requirements necessary for this service agreement; section 8.  
Warranty is null for this service agreement.