TETRA TECH

CITY OF POMPANO BEACH
CONTINUING CONTRACT FOR ENGINEERING SERVICES FOR WATER AND REUSE TREATMENT PLANT PROJECTS

Work Authorization No. 5
Hurricane Improvements Design and Construction Administration Services for the Water Treatment Plant Filter / Administration Building with Exterior Tanks and Membrane Building

I. PROJECT DESCRIPTION

Tetra Tech, Inc. (Tetra Tech) is pleased to present this proposal for engineering design and construction administration services for the identified hurricane hardening elements at the Pompano Beach Water Treatment Plant (WTP) to include the Filter / Administration Building with Exterior Tanks and Membrane Building. Refer to the attached Site Plan which provides an aerial view of the plant with building labels. Based on the study and our discussions at the WTP on January 11, 2018, our understanding of the project is to provide design documents and other engineering services as described in Part II for the building improvements identified in the study in addition to addressing life safety items.

The services rendered pursuant to this Work Authorization No. 5 are in accordance with the terms and conditions of the Agreement for Consulting / Professional Services between the City of Pompano Beach and Tetra Tech, Inc., dated January 19, 2016 and approved by City Ordinance No. 2016-26.

II. SCOPE OF WORK

Task 1 – Data Collection, Review, and Preparation

Tetra Tech will collect and review available drawing data for the Filter / Administration Building and Exterior Tanks, and Membrane Building. Tetra Tech staff will operate lighting branch circuit breakers to review operation of egress lighting, with the anticipation that no plant or equipment outages occur during the process. Existing backgrounds for the new construction documents will be developed based on historical construction drawings and site visits. Tetra Tech assumes that copies of all existing drawing documents will be provided, if not already obtained, from the recently completed study.

Task 2 – Design

Once base site and building drawings are established or created in Task 1, Tetra Tech will proceed with preparation of design drawings and specifications, which will provide the general scope, extent, and character of the proposed work to be furnished and performed by the Contractor. Drawings and specifications will be prepared and submitted at the 60 percent complete stage. Comments received from the City will be addressed and a final submittal of the drawings and specifications will be provided. It is our understanding that the City will be responsible for the bidding and contract documents. The following drawings and specifications are anticipated to be prepared:

- Cover sheet, index and key map;
- Site plan sheets for plant improvements;
- Structural, Electrical, and Architectural sheets with associated details;
- Technical Specifications associated with the structural improvements;
- Life safety plan to include:
    - the floor plan with each room labeled,
    - information regarding the construction type and fire rating of the walls,
    - occupancy,
    - exit locations and travel distances,
    - emergency lighting*,
    - exit signs*, and
    - fire extinguisher locations;

  * Includes identifying the power source.
- Electrical plans for egress lighting and power for motorized doors; and
- Single line diagram and wiring details.
- Tetra Tech's Subconsultant, Revay Coating Consultants, Inc. (RCCI), will review the design drawings, identify and confirm what areas are to be prepared and coated, calculate the square footage of the identified surfaces, and assist the City in locating qualified and reputable paint contractors. Site visits are included, as needed. Two (2) project specifications will be prepared, custom to each building's unique site-specific details / characteristics, referencing the industry standards for surface preparation and coating; the specifications will provide instructions / guidelines for the paint contractor to adhere to, including: identification of areas to be prepared and coated, industry standards (SSPC / NACE / ASTM) for proper surface preparation, coating application, a list of recommended products / materials, color specifics, and a detailed list of QA hold point inspections and testing.

Deliverables for this task include the following and will be invoiced by the subtask number listed:

- 60 percent drawings, specifications, and cost estimate – Subtask 2.1
- Final drawings, specifications, and cost estimate – Subtask 2.2

The specific scope of work required for this work authorization will include specifications for the following items for the Filter / Administration Building and Exterior Tanks, and Membrane Building which are outlined in the attached study or discussed during the January 11th site visit:

- Filter / Administration Building
    - Repair the construction joint between the original and additional filter buildings. Water ponding was observed at the stairs in the lower level of the pipe gallery.
    - Repair spalling and rebar exposure on columns and walls,
    - Paint the stairs leading to the front entrance, on building's south side, and add grip tape,
    - Repair water seals to prevent water intrusion at single-swing pedestrian door on the west side of the piping gallery addition,
    - Prepare a Life Safety Plan including electrical,
    - Specify rain covers for the louvers, and
    - Prepare a life safety plan including electrical source location of power to emergency lights and signage, egress paths and door location identification, occupancy classification and permitted loads and information regarding construction type.

- Filter / Administration Building Exterior Tanks
    - Paint the exterior and top sides of the secondary containment area for the three tanks and also include the steel columns and cross beams holding up the roof.
    - Repair spalling and rebar exposure on columns and walls,
    - Repair leaks leading to water pockets below paint surface, and
    - Chemical feed lines and other piping will be painted per Ten States Standards and labeled
- Membrane Building
    - Repair flooding at bottom of stairs in the Caustic Room (No. 118), as identified on the architectural drawing sheet A-1 dated April 2000,
    - Repair cracking visible along exterior walls,
    - Repair interior flooding along southern wall,
    - Specify rain covers for louvers, and
    - Prepare a life safety plan including electrical source location of power to emergency lights and signage, egress paths and door location identification, occupancy classification and permitted loads and information regarding construction type.

Task 3 – Permitting

Tetra Tech will prepare an electronic drawing set, prior to the final drawings, to be uploaded to the City's Electronic Plan Review (EPR) website for Building Department review. Comments received from the Building Department will be addressed by Tetra Tech and the revised drawing set will be uploaded for review until permit approval. Please note that the permit may not be able to be secured fully until a contractor is selected.

Task 4 – Bidding Assistance

The proposed improvements will be bid as one (1) project. Bidding and award activities will be led by the City. Tetra Tech will conduct the following services during the bidding process.

1. Tetra Tech will work with the City staff to provide a master copy of the Bid Set construction drawings and specifications in electronic format (PDF) and uploaded to the EPR website. It is our understanding that the City will be responsible for the bidding and contract documents and project advertisement and distribution of bid packages to potential bidders.
2. Support with addenda. Tetra Tech will respond to technical questions forwarded by the City for addenda as part of this scope of services. Tetra Tech will respond to questions using the Addendum Form for expedited response time and will generate necessary supporting documents, as applicable, and submit them to the City for distribution to registered plan holders.
3. Tetra Tech will attend and conduct the pre-bid meeting at the City. A meeting agenda will be prepared and distributed by Tetra Tech. Responses to questions provided in writing at the meeting will be provided through an addendum.
4. Tetra Tech will tabulate and evaluate the bids' unit and total prices and provide support by checking references for the three lowest bidders and evaluation of the apparent low bidder's contractor's qualifications for undertaking the utility work on the project. Tetra Tech will provide a recommendation of award, once completed.

Task 5 – Construction Administration

Tetra Tech will provide construction administration services based on a 545-day construction period. If construction extends beyond this duration, then additional services may be required. Tetra Tech will consult with and advise the City related to the improvements issued in the contract plans and specifications

completed under this Work Authorization. During the construction phase, Tetra Tech will provide the following services:

1. Shop Drawing and Pay Application Review
    a. Review shop drawings and other required Contractor submittals up to two (2) times per submittal for general conformance with the Contract Documents.
    b. Review Contractor's testing plan for general conformance with the Contract Documents.
    c. Review the Contractor's application for payment and the accompanying data and schedules, determine the amounts owed to the Contractor based on field observation occurring after each monthly progress meeting (item 3 below), and advise the City of the recommended payments to the Contractor.
2. Interpretations and Clarifications
    a. Provide interpretation or clarification of the design documents when requested, and prepare change orders required for clarification or minor modification of the Contract Documents.
3. Construction Meetings
    a. Attend and conduct a preconstruction conference with the selected Contractor, and subcontractors. An agenda will be prepared and meeting minutes distributed.
    b. Attend up to eighteen (18) monthly progress meetings, prepare agenda and meeting minutes. Construction of this project is anticipated to take 545 days from notice-to-proceed until substantial completion. Progress meetings are anticipated monthly and will be followed by a progress report noting findings and deficiencies.
4. Painting Inspections – Each of the buildings contain unique features, such as stairs, piping/conduit, fireproofing, expansion joints, five (5) secondary containment areas, etc. as well as auxiliary 15 feet x 30 feet sheds. Tetra Tech's Subconsultant, Revay Coating Consultants, Inc. (RCCI), will perform QA Hold-Point Inspections, Testing, and Documentation of the painting contractor's surface preparation and coating application work in accordance with the specifications, and based on the Contractor's schedule, including:
    a. Pre-Surface Preparation Conditions,
    b. Required Protective Coverings Locations,
    c. Ambient Conditions and Surface Temps,
    d. Compressed Air Cleanliness,
    e. Post-Surface Preparation and Cleanliness,
    f. Materials' Data (Batch #s, Amounts, and Colors),
    g. Application Info (Method, Mix, Dates, and Times),
    h. Material Storage Location and Conditions,
    i. Wet and/or Dry Film Thicknesses,
    j. Inter-Coat Cleanliness,
    k. Recoat Times, and
    l. Final Inspections of the coating system, after the finish coat cures, will include an overall visual inspection for defects such as pinholes, voids, holidays, runs/sags, cracking, etc.

    Detailed inspection reports will include annotated photos. For a complete list of proposed inspections during construction, refer to pages 3 and 4 of RCCI's proposal.
5. Substantial and final completion inspections
    a. Conduct a substantial completion site inspection and develop a punch list of items to be corrected by the Contractor.
    b. Conduct two (2) final completion site inspections to determine if the punch list items have been completed in accordance with the Contract Documents and if the Contractor's obligations are fulfilled thereunder, and recommend final payment to the Contractor. One additional final completion site inspection is included, if needed.

6. Record Drawings
    a. Prepare three (3) certified hardcopies and one electronic file of the record drawings for the City incorporating those changes made during construction based on record information furnished by the Contractor.

III. ASSUMPTIONS AND EXCLUSIONS

We have determined the following assumptions and exclusions as being critical to our proposed scope and compensation:

- The City will provide Tetra Tech copies of all available existing construction plans and specifications and access to the site when required for field observations and measurements.
- The scope of work required for this work authorization follows the recommendations from Tetra Tech's Hurricane Hardening Study dated June 30, 2016 attached with this proposal and those items discussed at our January 11th site visit.
- Design services are limited to architectural, electrical, and structural engineering. Geotechnical services, if required, will be an additional service.
- One iteration of design-related comments from the permit reviewer is anticipated.
- Building commissioning, mechanical, and plumbing services are excluded from Tetra Tech's scope of work.
- Roof inspection of the Membrane Building is excluded.
- All painting of the buildings will match the existing tan color; City to confirm prior to 100 percent Submittal.
- Pipe labeling may be provided by the City.
- The City will state in writing whether any existing pipes should be identified for removal.
- One life safety plan will be prepared for each of the buildings mentioned above.
- Louvers will be proposed only where required and with attention to maintaining the existing natural light.
- Specifications for the replacement of staircases with handrails will be cross-coordinated with the Transfer Station Rehabilitation project.
- Specifications for polishing the wall lettering "POMPANO BEACH WATER TREATMENT PLANT" at the front entrance are not included.
- Special Building Inspector services are not included.
- The estimated fees shown below assume the complete Scopes of Work described in Section II of this proposal will be approved as one work authorization. The fees per each task do not stand alone. Each task along with the corresponding submittals will be provided together as one.

IV. COMPENSATION

The total compensation for the Scope of Services described in Section II is $195,820 and will be invoiced monthly on a percentage complete for Task Nos. 1 – 5 with exception to Subtask No. 5.4 which will be invoiced monthly on a time and materials basis. The compensation for the Scope of Work by task is summarized below.

		Approximate Fee / Building[1]		
Task	**Description**	**Filter / Admin with Tanks**	**Membrane**	**Fee**
1	Data Collection, Review, and Preparation	$4,870	$2,400	$7,270
2.1	Design – 60 percent	$35,528	$29,477	$65,005
2.2	Design – Final	$14,793	$11,822	$26,615
3	Permitting	$2,793	$2,047	$4,840
4	Bidding Assistance	$3,629	$2,626	$6,255
5	Construction Administration	$29,391	$20,774	$50,165
	Lump Sum Total			**$160,150**
5.4	Painting Inspections[2]	$18,850	$16,820	$35,670
	Combined Total	**$109,854**	**$85,966**	**$195,820**

1. The fees shown are estimated assuming the complete Scope of Work described in Section II of this proposal will be approved as one Work Authorization. The fees per each task do not stand alone. Each task along with the corresponding submittals will be provided together as one.
2. Refer to page 4 of RCCI's proposal for a complete list of proposed hold-point inspections, estimated times, and fees.

V. SCHEDULE

The project will commence within 2 weeks of Notice to Proceed. Submittal of the 60 percent deliverables are anticipated to take 12 weeks. Review time is anticipated to be 2 weeks. Permitting and final deliverables will be submitted 6 weeks after receipt of all City comments. Construction phase services for the above improvements will be provided during construction under a separate work authorization and is anticipated to extend through 18 months.

"CITY":

Witnesses:

CITY OF POMPANO BEACH

_____ By:_____
LAMAR FISHER, MAYOR

_____ By:_____
GREG HARRISON, CITY MANAGER

Attest:

_____ (SEAL)
ASCELETA HAMMOND, CITY CLERK

Approved As To Form:

_____
MARK E. BERMAN, CITY ATTORNEY

STATE OF FLORIDA
COUNTY OF BROWARD

The foregoing instrument was acknowledged before me this _____ day of _____, 2017 by **LAMAR FISHER** as Mayor, **GREG HARRISON** as City Manager and **ASCELETA HAMMOND** as City Clerk of the City of Pompano Beach, Florida, a municipal corporation, on behalf of the municipal corporation, who are personally known to me.

NOTARY'S SEAL:

_____
NOTARY PUBLIC, STATE OF FLORIDA

_____
(Name of Acknowledger Typed, Printed or Stamped)

_____
Commission Number

Witnesses:

Jenny McClain

Andrea Bell

TETRA TECH, INC. INCORPORATED FEB 4 1988 DELAWARE

"CONTRACTOR":

Tetra Tech, Inc.
(Print name of company)

By: Mark A. Rynning

Print Name: Mark A. Rynning

Title: President, U.S. Infrastructure

ACKNOWLEDGMENT OF CONTRACTOR, IF A CORPORATION

STATE OF Florida }
} ss:
COUNTY OF Orange }

On this 19th day of July, 2018, before me personally came and appeared Mark A. Rynning, to me known, who, being by me duly sworn, did depose and say that he resides at 209 Adair Ave., Longwood, FL 32750, that he is the President, US Infrastructure, of Tetra Tech, Inc., the corporation described in and which executed the foregoing instrument; that he knows the seal of said corporation; that one of the impressions affixed to said instrument is an impression of such seal; that he is the proper official of said corporation designated to execute such contract, that he has authority so to do, that he executed same for and in behalf of said corporation, and this his act is the act and deed of said corporation.

ANKE BACKER
MY COMMISSION # FF 957240
EXPIRES: February 3, 2020
Bonded Thru Notary Public Underwriters

Witness my hand and official notarial seal at _____ the day and year above written.

My Commission Expires: 2-3-2020

Notary Public

REVAY COATING CONSULTANTS, INC.

June 5, 2018

Via E-mail: Christopher.Zavatsky@tetratech.com

Tetra Tech
450 North Park Road, Suite 502
Hollywood, FL 33021

WORK AUTHORIZATION NO. 5 (WA-5)
SCOPE OF SERVICES & COST PROPOSAL – "ADMINISTRATIVE/FILTER" BUILDING &THE "MEMBRANE" BUILDING
TASK 2.0 PROJECT SPECIFICATION & TASK 5.4 QA INSPECTIONS

Dear Mr. Zavatsky,

Revay Coating Consultants, Inc. (RCCI) is pleased to provide this proposal for the subject services. This proposal covers the costs for **Task 2.0**: Produce a detailed Project Specification, as well as **Task 5.4**: Perform QA (Quality Assurance) Hold-Point Inspections during the Surface Preparation and after the Coating Application processes on the "Administrative/Filter" Building and "Membrane" Building. The Project Specification and QA Hold-Point Inspections will be performed on the "Administrative/Filter" Building and "Membrane" Building which are located at the Pompano Beach Public Works Water Treatment Plant, and the address is 1205 NE 5th Avenue, Pompano Beach, FL 33060.

SCOPE OF SERVICES

WA-5 includes two separate services that will be performed by Revay Coating Consultants, Inc.; the services will be listed as "Task 2.0" and "Task 5.4".

SCOPE OF SERVICES: WA-5 TASK 2.0 – PROJECT SPECIFICATION

RCCI will review the drawings of the "Filter/Administrative" building and the "Membrane" building, identify and confirm what areas are to be prepared and coated, calculate the square footage of the surfaces that will be prepared and coated, and assist Tetra Tech / Pompano Beach Water Authority with locating qualified and reputable paint contractors. RCCI will also perform site-visits, as needed, to ensure that the information that will be presented in the Project Specifications is accurate and up-to-date. RCCI will then produce two detailed Project Specifications, that are custom built for each of the building's unique site-specific details/characteristics. The two Project Specifications will provide instructions/guidelines for the Paint Contractor to adhere to; including the following: which areas are to be prepared and coated, industry standards (SSPC/NACE/ASTM) for proper surface preparation, coating application, a list of recommended products/materials for the paint contractor to use, and which colors will be applied to specific locations on each of the buildings. The Project Specifications will be as specific as possible, to reduce or eliminate the possibility of change orders.

REVAY COATING CONSULTANTS, INC.

June 5, 2018

Via E-mail: Christopher.Zavatsky@tetratech.com

Tetra Tech
450 North Park Road, Suite 502
Hollywood, FL 33021

WORK AUTHORIZATION NO. 5 (WA-5)
SCOPE OF SERVICES & COST PROPOSAL – "ADMINISTRATIVE/FILTER" BUILDING &THE "MEMBRANE" BUILDING
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REVAY COATING CONSULTANTS, INC.

SCOPE OF SERVICES: WA-5 TASK 5.4: QA HOLD-POINT INSPECTIONS

This Task covers all QA Hold-Point Inspections, Testing, and Documentation for the "Administrative/Filter" Building and the "Membrane" Building. Each of the Buildings contain unique features, such as stairs, piping/conduit, expansion joints, secondary containments, etc. RCCI will perform QA Hold-Point Inspections of the surface preparation and following the coating application that will be completed by a (TBD) Paint Contractor. Included in the QA Hold-Point Inspections of the two Buildings will be QA Hold-Point Inspections on any/all of the building's piping/conduit, expansion joints, and on five (5) secondary containments. The QA Hold-Point Inspections will consist of the following:

- Pre-Surface Preparation Conditions
- Required Protective Coverings Locations
- Ambient Conditions and Surface Temps
- Compressed Air Cleanliness
- Post-Surface Preparation & Cleanliness
- Materials' Data (Batch #s, Amounts, & Colors)
- Application Info (Method, Mix, Dates, & Times)
- Material Storage Location & Conditions
- Wet and/or Dry Film Thicknesses
- Inter-Coat Cleanliness
- Recoat Times
- Final Inspections
- Detailed Inspection Reports including annotated photos

Below is a list of what items will be inspected during production work on each of the buildings:

Filter / Administrative Building

QA Hold-Point Inspections of the following items:

- Exterior Coating System - excluding the roof (Surface Prep and Coating Application)
- Expansion Joints (Removal, Surface Prep, and Material Application)
- Piping / Conduit (Surface Prep and Color-Coded Coating Application)
- Exterior of Hydrofluosilicic Acid Secondary Containment
- Exterior of Hypochlorite Secondary Containment
  - :: Vertical and Horizontal Steel Supports (Canopy Frame)
  - :: Overflow Piping (Yellow Piping)
- Horizontal Steel Beams – Underside of the Eastern Overhang (W of the Hypochlorite Tanks)
- Staircases (Hardware Metals used, Surface Prep, and Coating Application if applicable).

Membrane Building

QA Hold-Point Inspections of the following items:

- Exterior Coating System - excluding the roof (Surface Prep and Coating Application)
- Expansion Joints (Removal, Surface Prep, and Material Application)
- Piping / Conduit (Surface Prep and Color-Coded Coating Application)
- Exterior of the Small Containments (North face of the Mem. building)
- Exterior of the Diesel Tank's Secondary Containment (West of the Mem. building)
- Exterior of the Anhydrous Ammonia Tanks Secondary Containment (W of the Mem. building)
- Exhaust Stack - NE of the Mem. Building (Surface Preparation and Coating Application)

PROJECT TEAM

The Project Manager will be David V. Revay and the Project's QA Inspector will either be David V. Revay (Jr.), or David M. Revay (Sr.); both are Level 3 - NACE Certified Coating Inspectors.

REVAY COATING CONSULTANTS, INC.

QUALIFICATIONS TO PROPOSAL

Revay Coating Consultants, Inc. will provide standard PPE to its employee(s) throughout the duration of the project.

WA-5 TASK 2.0 COST – PROJECT SPECIFICATION

RCCI's cost to perform the scope of work for Task 2.0, as described above, is as follows: a lumpsum of $10,000 (USD). WA-5 Task 2.0 addresses the Project Specification design and development in regard to the Exterior Coating System on the "Administrative/Filter" Building, the "Membrane" Building, as well as the Building's Secondary Containments, Piping/Conduit, and Expansion Joints. This cost is to review drawings, determine the square footage of the areas to be prepared and coated, complete the pre-construction site-visits (maximum of 3 site-visit), and attend pre-construction meetings (maximum of 2 pre-construction meetings). If the need for additional labor from RCCI, or the need for a change in work scope or cost, RCCI will first contact you to discuss our findings and obtain your approval to modify the statement of work and/or cost. If RCCI is asked to perform additional Consulting Services, beyond what is stated in this Scope and Cost Proposal, RCCI will charge $190.00/hour.

WA-5 TASK 5.4 COST – QA HOLD-POINT INSPECTIONS

RCCI's cost to perform the Scope of Services for Task 5.4, as described above, will be based off of a Time and Material Rate (T&M), in conjunction with the estimated amount of time that it will take to complete the "Administrative/Filter" Building, the "Membrane" Building, as well as the Building's Secondary Containments, Piping/Conduit, and Expansion Joints. The hourly rate to perform the QA Hold-Point Inspections is set at $145.00/hour; which includes all labor and equipment required for the on-site testing. RCCI is estimating that WA-5 Task 5.4 will take approximately 246 hours of coating inspections to complete. This estimated amount of time puts the total cost for WA-5 Task 5.4 at $35,670. RCCI will charge a minimum of 3 hours per site-visit during scheduled Inspections. However, the minimum site-visit charge is reduced down to 1-hour for general site-visits, meetings, or other on-site needs that do not involve Inspection Services. Should the actual schedule result in the need for additional or less labor for RCCI, or a change in the work scope or cost, RCCI will first contact you to discuss our findings and obtain your approval to modify the statement of work and/or cost. Page 4 of this Proposal provides a breakdown of the estimated inspections, times, and costs. RCCI has removed the "Touch-up" Inspections, as well as, the "During-Application" Inspections to reduce the overall cost of the QA Hold-Point Inspection services. If RCCI is requested to perform the "Touch-up" Inspections and/or the "During-Application" Inspections, then the hourly rate of $145/hour will apply. Also, this QA-Hold Point Inspection estimate is based-on a 2-coat system (Prime Coat + Finish Coat). If the chosen coating system consists of a 3-coat system, then additional inspections will need to be added to this estimate.

REVAY COATING CONSULTANTS, INC.

ESTIMATED INSPECTION TIME BREAKDOWN

(WA-5A) – Exterior Coating System Inspections (per Building)
(6 Hours) Pre-Surface Preparation Inspection
(16 Hours) Post-Surface Preparation Inspection (Building, Pipes/Conduit, and Expansion Joints)
(16 Hours) Post-Prime Coat Application Inspection (Building only)
(16 Hours) Post-Finish Coat Application Inspection (Building only)
(16 Hours) Final Inspection of Building's Exterior Coating System (Building only)
Per Building: 70 Hours X $145 = $10,150
Total Cost for both the "Administrative/Filter" Building and the "Membrane" Building (140 Hours) = $20,300

(WA-5B) – Piping / Conduit (for 2 buildings)
(8 Hours) Post-Prime Coat Application Inspection
(8 Hours) Post-Finish Coat Application Inspection
(16 Hours) Final Inspection of the Piping/Conduit
32 Hours X $145 = $4,640

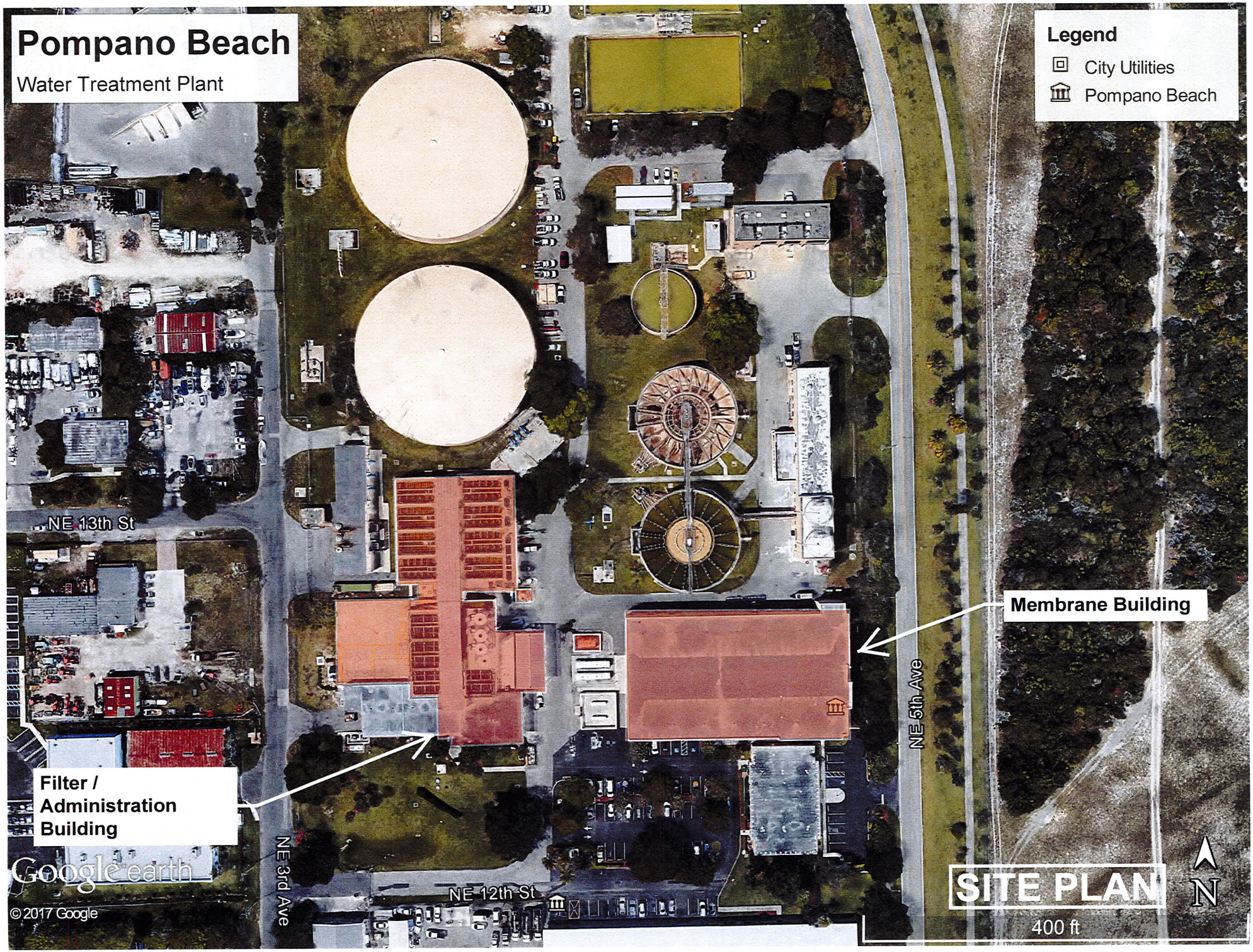
(WA-5C) – Membrane Building's Secondary Containments
(8 Hours) Post-Surface Preparation Inspection
(8 Hours) Post-Prime Coat Application Inspection
(8 Hours) Post-Finish Coat Application Inspection
(6 Hours) Final Inspection of Secondary Containments
30 Hours X $145 = $4,350

(WA-5C) – Admin/Filter Building's Secondary Containments
(12 Hours) Post-Surface Preparation Inspection
(12 Hours) Post-Prime Coat Application Inspection
(12 Hours) Post-Finish Coat Application Inspection
(8 Hours) Final Inspection of Secondary Containments
44 Hours X $145 = $6,380

Total Time and Cost Estimate for QA Inspections on the "Admin/Filter" Building and "Membrane" Building: 246 hours and $35,670.

We at Revay Coating Consultants, Inc. sincerely appreciate the opportunity to support Tetra Tech and Pompano Beach Public Works on this important project. This proposal is respectfully submitted for your review and consideration by:

David V. Revay
NACE Certified Coatings Inspector – Level 3 (#37047)
NACE CP1 – Cathodic Protection Tester (#68017)
Revay Coating Consultants, Inc.
Cell: +1 (412) 230-6715
Office: +1 (754) 206-2963
Email: D.revay@revayccs.com


Pompano Beach
Water Treatment Plant
Legend
City Utilities
Pompano Beach
NE 13th St
NE 3rd Ave
NE 12th St
NE 5th Ave
Membrane Building
Filter / Administration Building
Google earth
©2017 Google
SITE PLAN
400 ft
N

Price Proposal

Work Authorization No. 5
WTP Impr. Design-CA Services

Filter / Administration Building with Exterior Tanks and Membrane Building

Submitted to: City of Pompano Beach
(Attn: Tammy Good)

Contract Type: Lump Sum
w/ Time and Materials

Project Phases / Tasks	Total Labor Hrs	Sr. Project Manager	Project Engineer 2	Project Engineer 1	Engineering Designer 3	Engineering Designer 1	Sr. Architect 2	Architect 2	Project Admin	Construction Administrator	Sr. CAD Designer 1	Engineer 2	Engineering Technician	Labor	Subs	Travel	Task Pricing Totals
	Bill Rate >	210.00	165.00	135.00	115.00	85.00	165.00	140.00	90.00	75.00	110.00	110.00	60.00	Labor	Subs	Travel	Task Pricing Totals
		Labor Plan												Price Summary / Totals			
														Pricing by Resource			
1 - Data Collection, Review, and Preparation	45	2	-	22	8	12	-	-	1	-	-	-	-	5,420	-	1,850	7,270
2 - Design																	
2.1 - 60% Submittal	422	22	32	127	74	64	26	58	2	-	-	8	9	55,005	10,000	-	65,005
2.2 - Final Submittal	202	13	16	57	26	32	18	28	1	-	-	4	7	26,615	-	-	26,615
3 - Permitting	39	2	3	15	2	2	4	-	1	-	-	3	7	4,840	-	-	4,840
4 - Bidding Assistance	51	4	-	22	4	4	3	-	2	10	-	2	-	6,255	-	-	6,255
5 - Construction Administration	352	10	4	219	20	18	32	18	-	-	3	24	4	47,165		3,000	50,165
5.4 - Painting Inspections (Time and Materials)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	35,670	-	35,670
Totals	885	53	39	251	135	132	83	104	7	10	3	41	27	145,300	45,670	4,850	195,820