



INTEROFFICE MEMORANDUM

FROM THE DEPARTMENT OF ENVIRONMENTAL AND ENGINEERING SERVICES

DATE: April 29, 2019

TO: Samuel A. May, City Manager

THRU: Kenneth Griffin, DEES Director *KCG*

FROM: Sierra R. Marrero, Project Manager *SD*

RE: **Bid No. 2018-002 Lift Station No. 21 Renovation – Change Order**

On December 13, 2017 the City of Margate award bid No. 2018-002 for Lift Station 21 Renovation to Southeastern Engineering Contractors, Inc. (Resolution 17-154) for \$298,216.60. The scope of work included a complete renovation of the existing wet well and retro-fitting that structure into a fully functional duplex submersible lift station.

During construction, the existing wet well structure was uncovered and it was discovered that the existing structure is 6-ft in diameter; not 8-ft as shown in the bid documents. The 2-ft difference in the diameter changes the storage capacity of the wetwell and thus does not meet the specifications required for the retro-fit. After exploring several options to remedy the situation, it was determined that a new wetwell structure must be installed in order to meet the flow demands of that lift station; the new wetwell must be 22.85-ft deep and have a diameter of 8-ft.

The design plans have been revised to reflect the required changes to the project in order to meet the flow demands (attached). The change order submitted by Southeastern Engineering Contractors, Inc. (attached) includes all work required to comply with these revisions. Included in this change order is the cost for the installation of the new 8-ft diameter wet well, additional force main piping, influent gravity main, modifications of the existing wet pit into a terminal manhole, water service extension and additional demolition to the existing dry pit.

The total cost for the additional work to comply with the design changes is \$147,907.00. Since the cost of this change order exceeds the contractual limits that can be approved at the Department level, I am requesting approval to process the change order for Southeastern Engineering Contractors, Inc. Approval of this change order will bring the total project cost to \$446,123.60.

Please let me know if you need any additional information.

Attachments:

Change Order dated April 24, 2019 (2 pages)
Cost Breakdown
Revised Plan Sheets (3 pages)
Resolution No. 17-154

SECTION 00931

CHANGE ORDER

DATE OF ISSUANCE: 04-24-2019

No. #5

PROJECT: CITY OF MARGATE
LIFT STATION NO. 21 RENOVATION
CAS PROJECT NO. 08-1477C21

OWNER: CITY OF MARGATE, DEES
980 NW 66TH AVENUE
MARGATE, FL 33063

CONTRACTOR: SOUTHEASTERN ENGINEERING CONTRACTORS, INC.

ENGINEER: CRAIG A. SMITH & ASSOCIATES

CONTRACT FOR: LIFT STATION NO. 21, NEW WETWELL REVISION

YOU ARE DIRECTED TO MAKE THE FOLLOWING CHANGES IN THE CONTRACT DOCUMENTS.

DESCRIPTION: The addition of a new 22.85-ft deep wetwell to the project due to field conditions of the existing wetpit. This Change Order includes additional forcemain piping, influent gravity main, modifications of the existing wetpit into a terminal manhole, water service extension and additional demolition to the existing drypit. The addition of 212 days shall be added to the contract time to perform this additional work and make-up for time lost during the negotiations of this change order. The new completion date shall be set to August 31, 2019.

ATTACHMENTS: Cost Estimate from SEC and revised plans

CHANGE IN CONTRACT PRICE:	CHANGE IN CONTRACT TIME:
Original Contract Price	Original Contract Time
\$ 298,216.60	120 Days
Previous Change Orders	Net change from previous Change Orders
\$ 0.00	248 Days
Contract Price prior to this Change Order	Contract Time prior to this Change Order
\$ 298,216.60	368 Days

City of Margate
Lift Station No. 21
08-1477C21/09-28-2017

00931-1

Change Order

Net increase/decrease of this Change Order	Net Increase/decrease of this Change Order
\$ 147,907.00	212 Days
Contract Price with all approved Change Orders	Contract Time with all approved Change Orders
\$ 446,123.60	580 Days

RECOMMENDED :

By 
CRAIG A. SMITH & ASSOCIATES

ACCEPTED :

By 
CONTRACTOR

APPROVED :

By _____
OWNER

END OF SECTION



City of Margate Lift Station 21 Renovation

Bid No. 2018-002

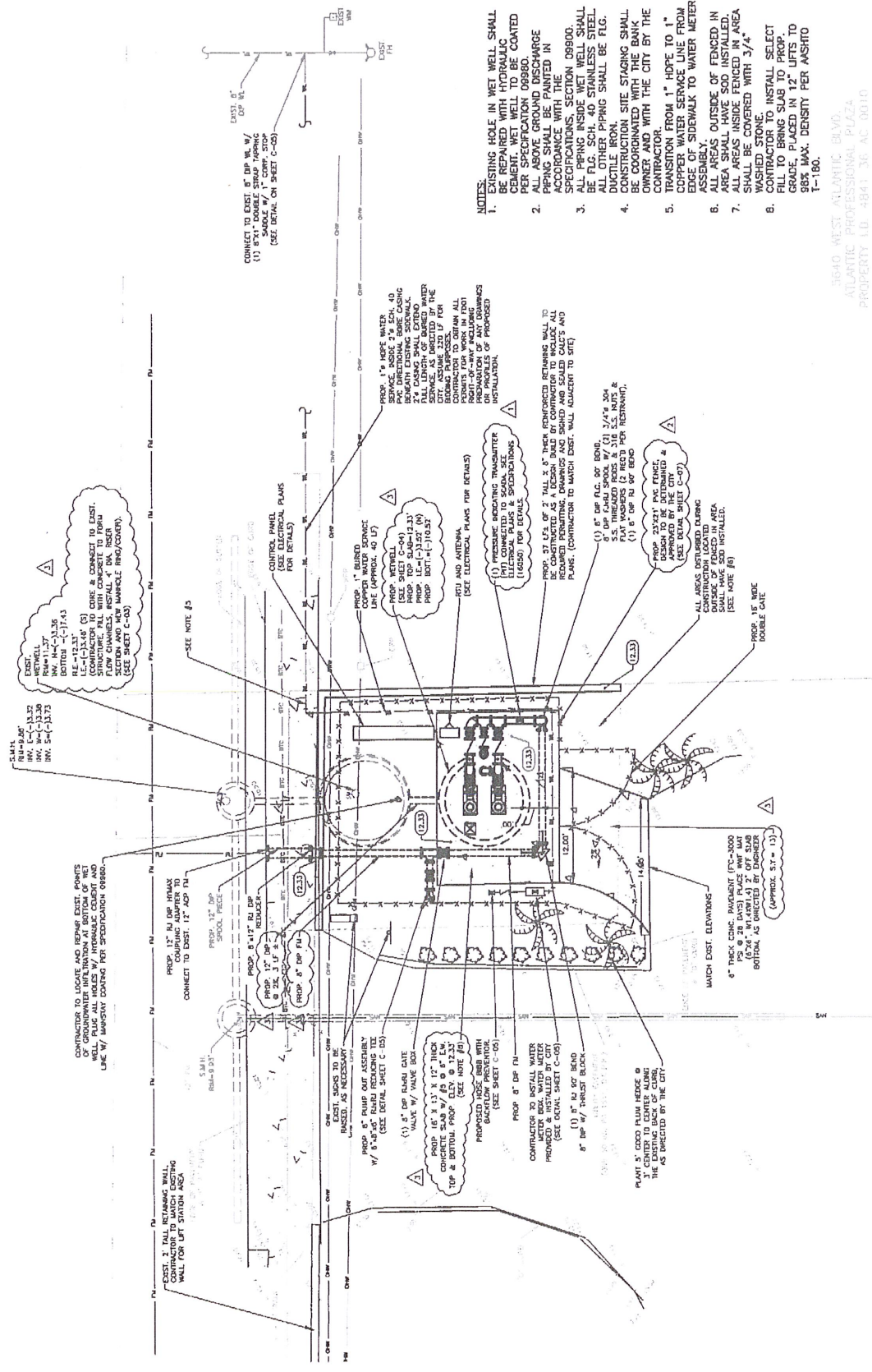
Change Order: New Wet Well

1/30/2019

Item	Description	Qty	Unit	Price	Total
1	Proposed Wetwell (22.85-ft deep, 8-ft dia.)	1	LS	132,820.00	132,820.00
2	Additional demo to existing dry well, as necessary	1	LS	5,260.00	5,260.00
3	Extend 8-inch DIP FM	13	LF	148.00	1,924.00
4	Proposed +/- 3-LF 12-inch DIP gravity sewer (Inflow pipe)	5	LF	294.00	1,470.00
5	Modify exist. Structure, Fill and Form Flow Channels	1	LS	3,380.00	3,380.00
6	Replace ring and cover and set at new elevation (12.33')	1	LS	2,715.00	2,715.00
7	Extend 1-inch copper water service	13	LF	26.00	338.00
8	Electrical Service	1	LS	0.00	0.00
Contingency Unit Price Item.					
9	Misc. Asphalt associated with this C.O., as necessary	1	SY	35.00	
				Total	\$ 147,907.00



VERTICAL CURVE SCALE
SCALE 1" = 5'-0"
HORIZONTAL SCALE
SCALE 1" = 5'-0"
NOTE: ALL DIMENSIONS ARE COORDINATED
FOR 11.5' X 17' SHEET SIZE



- NOTES:
- EXISTING HOLE IN WET WELL SHALL BE REPAIRED WITH HYDRAULIC CEMENT. WET WELL TO BE COATED PER SPECIFICATION 08800.
 - ALL PIPING SHALL BE COATED WITH 3/4" THICK EPOXY RESIN. ALL PIPING SHALL BE PAINTED IN ACCORDANCE WITH THE SPECIFICATIONS, SECTION 08900.
 - ALL PIPING INSIDE WET WELL SHALL BE FLG. SCH. 40 STAINLESS STEEL. ALL OTHER PIPING SHALL BE FLG. DUCTILE IRON.
 - CONSTRUCTION SITE STAGING SHALL BE COORDINATED WITH THE BANK OWNER AND WITH THE CITY BY THE CONTRACTOR.
 - TRANSITION FROM 1" HOPE TO 1" HOPE SHALL BE MADE WITH A 1" HOPE FROM EDGE OF SIDEWALK TO WATER METER ASSEMBLY.
 - ALL AREAS OUTSIDE OF FENCED IN AREA SHALL HAVE SOD INSTALLED.
 - ALL AREAS INSIDE FENCED IN AREA SHALL BE COVERED WITH 3/4" THICK EPOXY RESIN.
 - CONTRACTOR TO INSTALL SELECT FILL TO BRING SLAB TO PROP. GRADE, PLACED IN 12" LIFTS TO 98% MAX. DENSITY PER ASTM 1-190.

FOR CONSTRUCTION

FILE NAME: 10-1477-C-02-SIT-147
LAST DATED: 07/11/19 - 3:00pm
C-02
08-1477C21

LIFT STATION NO. 21
RENOVATION
SITE WORK PLAN

THE CITY OF MARGATE
BROWARD COUNTY, FLORIDA

CRAIG A. SMITH & ASSOCIATES
CONSULTING ENGINEERS-PLANNERS-ARCHITECTS
1700 S.W. 13th Ave., Suite 100
Fort Lauderdale, FL 33315
TEL: (954) 341-1111
FAX: (954) 341-1111
CRAIG.A.SMITH@CSA-FLA.COM

APPROVED BY: GENE R. SCHMIDT, P.E.
DATE: 07/11/19
CITY OF MARGATE ENGINEER NO. 34821

DRAWN: 08/22/18
DESIGNED: JH
CHECKED: JH
DATE: 08/22/18

NO.	DATE	REVISION
1	07/11/19	REV. SEE PLAN FOR ALL NEW WALLS, NEW DRAIN LINE, EXIST. SOD, SOD 15'-18" 8" CONCRETE
2	07/11/19	REV. SEE PLAN FOR ALL NEW WALLS, NEW DRAIN LINE, EXIST. SOD, SOD 15'-18" 8" CONCRETE
3	07/11/19	REV. SEE PLAN FOR ALL NEW WALLS, NEW DRAIN LINE, EXIST. SOD, SOD 15'-18" 8" CONCRETE



- FOR CONSTRUCTION

FILE NAME: 18-1477-C-03-PRO.dwg
LAST SAVE: 01/14/18 - 3:07pm
C-03
SHEET

LIFT STATION NO. 21
RENOVATION
PROFILE VIEW

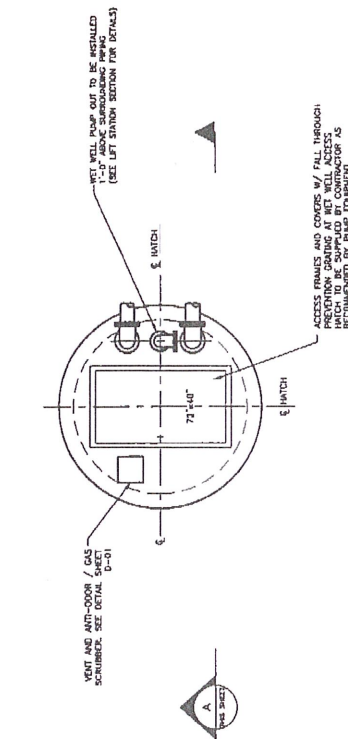
PREPARED FOR:
THE CITY OF MARGATE
BROWARD COUNTY, FLORIDA

CRAIG A. SMITH & ASSOCIATES
CONSULTING ENGINEERS-PLANNERS-SURVEYORS
1777 GLADES ROAD, SUITE 410
BOCA RATON, FLORIDA 33431

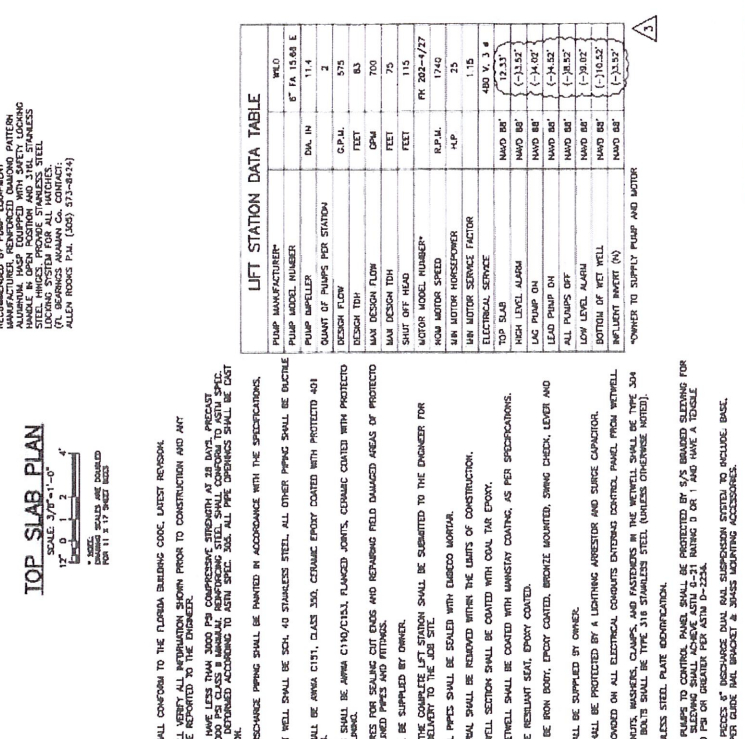
APPROVED BY GENE R. SCHWENK, P.E.

Date: 08/22/18
Designed: KS
Drawn: MD

[illegible]



Scale: 3/8"=1'-0"



1. ALL CONSTRUCTION SHALL CONFORM TO THE FLORIDA BUILDING CODE, LATEST REVISION.
2. THE CONTRACTOR SHALL VERIFY ALL INFORMATION SHOWN PRIOR TO CONSTRUCTION AND ANY DISCREPANCY SHALL BE REPORTED TO THE ENGINEER.
3. CONCRETE SHALL NOT HAVE LESS THAN 3000 PSI COMPRESSIVE STRENGTH AT 28 DAY PRECAST CONCRETE SHALL BE 5000 PSI CLASS 3 MATERIAL. ALL CONCRETE SHALL BE CAST WITH SCAFFOLDING AND FORMWORK PROPERLY DESIGNED AND PLACED TO AVOID SPALLS. ALL JOINTS SHALL BE CAST AT TIME OF FABRICATION.
4. ALL ABOVE GROUND DISCHARGE PIPING SHALL BE INSTALLED IN ACCORDANCE WITH THE SPECIFICATIONS, SECTION 08050.
5. ALL PIPING INSIDE WET WELL SHALL BE SCH. 40 STAINLESS STEEL, ALL OTHER PIPING SHALL BE DUCTILE IRON.
6. ALL PIPING ABOVE WET WELL SHALL BE ANMA C131, CLASS 350, CERAMIC EPOXY COATED WITH PROTECTED 401 CERAMIC EPOXY COATING.
7. DUCTILE IRON FITTINGS SHALL BE ANMA C140/141, FLANGED JOINTS, CERAMIC COATED WITH PROTECTED 401 CERAMIC EPOXY COATING.
8. FOLLOW ALL PROCEDURES FOR SEALING JOINT ENDS AND REMAINING FIELD DAMAGED AREAS OF PROTECTED 401 CERAMIC EPOXY UNED PIPES AND FITTINGS.
9. SERVICE PIPES SHALL BE SUPPLIED BY OWNER.
10. SHOP DRAWINGS FOR THE COMPLETE LEFT SIDEWALK SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PRIOR TO DELIVERY TO THE JOB SITE.
11. OPENINGS AROUND ALL PIPES SHALL BE SEALED WITH EUGECO MORTAR.
12. ALL UNSUITABLE MATERIAL SHALL BE REMOVED WITHIN THE LIMITS OF CONSTRUCTION.
13. OUTSIDE OF NEW WETWELL SECTION SHALL BE COATED WITH COAL TAR EPOXY.
14. INSIDE OF EXISTING WETWELL SHALL BE COATED WITH HAMSTAY COATING, AS PER SPECIFICATIONS.
15. GATE VALVES SHALL BE REBUILT SATE, EPOXY COATED.
16. CHECK VALVES SHALL BE ROW BODY, DUCT COATED, BRONZE MOUNTED, SWING CHECK, LEVER AND WEDGE.
17. ELECTRICAL PANEL SHALL BE SUPPLIED BY OWNER.
18. ELECTRICAL SYSTEM SHALL BE PROTECTED BY A LIGHTNING ARRESTOR AND SURGE CAPACITOR.
19. SCAL-OFFS TO BE PROVIDED ON ALL ELECTRICAL, CABLES, ENTENDING CABLES, PANEL, FROM WETWELL.
20. ALL PIPE SUPPORTS, WITH WASHERS, CLAMPS, AND FASTENERS IN THE WETWELL SHALL BE TYPE 316 STAINLESS STEEL, ALL BOLT SHALL BE TYPE 316 STAINLESS STEEL (UNLESS OTHERWISE NOTED).
21. ALL STEEL SHALL HAVE STAINLESS STEEL PLATE 1/8" THICK.

LIFT STATION DATA TABLE		WLO	
		6" 14.54 E	
PUMP MANUFACTURER*		DAL IN	11.4
PUMP MODEL NUMBER			2
PUMP SIZING		G.P.M.	575
QUANT OF PUMPS PER STATION		FEET	83
DESIGN FLOW		GPM	700
DESIGN THW		FEET	75
WAS DESIGN TUM		FEET	115
WAS DESIGN THW		FEET	
SHUT OFF HEAD			
MOTOR MODEL NUMBER*		R.P.M.	1740
MOTOR MOTOR SPEED		H-P	25
MIN MOTOR HORSEPOWER			1.15
MOTOR SERVICE FACTOR			
ELECTRICAL SERVICE			
TOP BLAB		400 V, 3 #	
HIGH LEVEL ALARM		NOV DBT	13.57
LAG PUMP ON		NOV DBT	-1.52
LAG PUMP ON		NOV DBT	-1.07
ALL PUMPS OFF		NOV DBT	-1.42
LOW LEVEL ALARM		NOV DBT	-16.57
BOTTOM OF ICE WELL		NOV DBT	-10.07
REPLENISHMENT (GAL)		NOV DBT	-110.52
		NOV DBT	-15.57

TRANSFER TO SUPPLY PUMP AND MOTOR

FILE NAME: 17-1477-C-04-LS.dwg
 LAST SAVED: 01/14/19 - 3:17pm
 C-04
 SHEET

THE CITY OF MARGATE
BROWARD COUNTY, FLORIDA
NEW AREAS FOUR

CRAIG A. SMITH & ASSOCIATES
CONSULTING ENGINEERS-PLANNERS-SURVEYORS
7777 CLARK ROAD, SUITE 418
FARMINGTON, CT 06030-3000
(203) 651-1100
FAX (203) 651-1101

APPROVED BY: GENE R. SCHWARTZ, P.E.

Date: 06/23/16
Designed: KH
by MD

[illegible]

CITY OF MARGATE, FLORIDA

RESOLUTION NO. 17-154

A RESOLUTION OF THE CITY OF MARGATE, FLORIDA, APPROVING AWARD OF BID NO. 2018-002 - LIFT STATION NO. 21 RENOVATION, TO SOUTHEASTERN ENGINEERING CONTRACTORS, INC., IN AN AMOUNT NOT TO EXCEED \$298,216.60; PROVIDING FOR EFFECTIVE DATE.

BE IS RESOLVED BY THE CITY COMMISSION OF THE CITY OF MARGATE, FLORIDA:

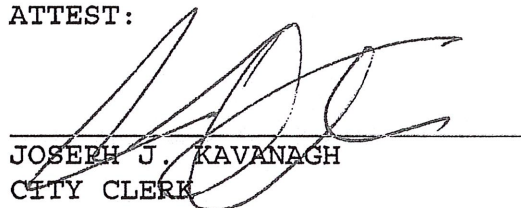
SECTION 1: That the City Commission of the City of Margate, Florida, approves award of Bid No. 2018-002 - Lift Station No. 21 Renovation, to Southeastern Engineering Contractors, Inc., in an amount not to exceed \$298,216.60.

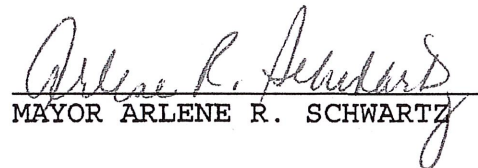
SECTION 2: That the Mayor and City Manager are authorized and directed to execute a contract for the above, or the administration is authorized to issue a purchase order to implement same.

SECTION 3: That this Resolution shall become effective immediately upon its passage.

PASSED, ADOPTED AND APPROVED THIS 13TH day of DECEMBER, 2017.

ATTEST:


JOSEPH J. KAVANAGH
CITY CLERK


MAYOR ARLENE R. SCHWARTZ

RECORD OF VOTE

Peerman	<u>YES</u>
Simone	<u>YES</u>
Ruzzano	<u>YES</u>
Caggiano	<u>YES</u>
Schwartz	<u>YES</u>