



To: Lee R. Feldman, City Manager  
From: Paul Berg, Public Works Director  
Date: May 2, 2017  
Re: Change Order No. 2 for Project 12197

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Job Description: P12197 – Fiveash Water Treatment Plant Hydrotreaters 3 and 4 Influent Pipe Modifications

Contractor: RF Environmental Services, Inc.

Amount: \$93,388.46 and 0 additional calendar days.

Funding: PBS670101-3437 (P12197.454-6599) - \$93,388.46

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Itemized and explained as follows:

1. Repair leaks in existing 30" prestressed concrete cylinder pipe (PCCP) at Hydrotreater 3: The existing 30" PCCP on the east side of the valve vault has several significant leaks that were discovered during construction. Provide two (2) each, 30 inch sleeving systems, 10 feet long, utilizing standard EPDM WEKO-SEAL with two (2) type 304 retaining bands, shims, wedges, and lubricant.
2. Remove and install new pipe thrust blocks at Hydrotreater 4: These existing thrust blocks were not shown on the plans and were encountered during excavation. In order to replace the influent pipe at Hydrotreater 4, these thrust blocks must be removed and replaced. Once the influent pipe is replaced, new thrust blocks will be cast in place to support the new piping.
3. Pressure testing of existing sludge recirculation pipes at Hydrotreater 3 to locate existing leaks: During construction, ground water was unexpectedly found in the excavated trench. Due to the presence of a distinct odor, the groundwater was tested and found to contain chlorine. The chlorine presence suggests that the sludge recirculation piping is leaking. These pipes will be isolated and pressurized individually to find the origin of the leaks, which will be repaired as part of this change order.
4. Repair leaks at Hydrotreater 3 sludge recirculation piping.

#### **(A) DEDUCTIONS**

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**Item No.**

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**TOTAL DEDUCTIONS (\$0.00)**

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**(B) ADDITIONS**

**Item No.**

CO 2-1	Repair Leaks in Existing 30" PCCP at Hydrotreater 3	\$ 60,160.31
CO 2-2	Removal and replacement of existing thrust blocks at Hydrotreater 4.	\$ 12,967.37
CO 2-3	Pressure testing of existing sludge recirculation piping at Hydrotreater 3.	\$ 7,380.45
CO 2-4	Repair leaks in sludge recirculation piping at Hydrotreater 3.	\$12,880.33

**TOTAL ADDITIONS \$93,388.46**

**ADDITIONAL CONTRACT TIME BEING REQUESTED**

**ZERO (0) CALENDAR DAYS**

**THE TOTAL AMOUNT OF THIS CHANGE ORDER**

**\$93,388.46**

**This Change Order provides for all costs and schedule adjustments associated with completing the work, including materials, labor, equipment, bond, insurance, overhead, profit, impacts, and any and all related items or associated costs incurred or resulting from the items listed above, and is provided in accordance with Article 13 – Changes in the Work of the Contract.**

Approved:

  
Thad Buckley  
RF Environmental Services, Inc.

03/29/17  
Date

Recommended by:

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Paul A. Berg  
Public Works Director

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Date

Approved by:

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Lee R. Feldman  
ICMA-CM, City Manager

\_\_\_\_\_  
Date

cc: Alan Dodd, P.E., Deputy Public Works Director  
Christopher Bennett, P.E., Assistant City Engineer  
Scott Teschky, CCM, LEED AP BD+C, Senior Project Manager  
Financial Administrator  
Project File



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**CHANGE ORDER SUMMARY SHEET**

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ORIGINAL CONTRACT AMOUNT	\$399,096.00
COST OF CHANGE ORDERS TO DATE	\$ 10,628.43
COST OF THIS CHANGE ORDER	\$ 93,388.46
TOTAL:	\$503,112.89
ORIGINAL CONTRACT TIME	330 calendar days
TIME ADDED TO DATE	0 calendar days
TIME ADDED TO THIS CHANGE ORDER	0 calendar days
TOTAL:	330 calendar days

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**SCHEDULE OF CHANGE ORDERS TO DATE**

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C.O.#	DATE	DESCRIPTION	AMOUNT OF COST OR CREDIT
1	3/3/17	Pipeline inspection, cleaning, pipe-line video and inspection report.	\$10,628.43