

MEMORANDUM

TO: Randy Hill, Public Works Director

FROM: Jon Lutz, City Engineer

SUBJECT: West Hill Sewer Separation Project – Phase 2
Approve Change Order #2

DATE: September 15th, 2014

INTRODUCTION:

The City of Muscatine is under contract with Langman Construction for the West Hill Sewer Separation Project Phase 2. The project is nearing completion and several items regarding erosion control and drainage needed to be addressed. Bid items in the contract were suitable for this work therefore a change order is necessary.

BACKGROUND:

Work items necessary:

CO 8	Erosion control diversion channel	\$4,270.00
CO 9	Erosion control excelsior mat	\$1,400.00
CO 10	Field built storm sewer manhole	\$1,000.00
	Total	\$6,670.00

A detailed description of the above work is included in the attachments below.

RECOMMENDATION/RATIONALE:

The City Engineer recommends approving change order #2 in the amount of \$6,670.00 to Langman Construction at the September 18th, 2014 Council meeting.

ADDITIONAL INFORMATION:

1. Change Order #2
2. Change Order #2 narrative from inspector Steve Dalbey.

September 9, 2014

To: Jon Lutz

From: Steve Dalbey

Subject: West Hill Sewer Project, Change Order #2, Items 8, 9, 10

As we have discussed, there are a few new items on the job for which there are no contract item numbers. Those include the construction of a drainage swale at the end of Green Street, the use of excelsior mat to help secure the seeding on the hill in the ravine, and the construction of a storm inlet in the #5 alley next to 510 Locust.

Change Order Item #8. We asked Langman to construct a storm water diversion swale at the end of Green Street. Storm water was running down the street and then down the side of the ravine hill threatening to expose the newly-placed sewer line that runs from the ravine up the side of the hill. The contractor placed concrete rubble on erosion-control mat and graded the street so the water would run down into the wooded area on the side instead of straight down the hill. Their work was also successful at diverting the water away from the driveway of the home at the end of Green Street, correcting a problem the homeowners had with water from the street flooding their driveway. The price quoted for the work was \$4,270.00.

Change Order Item #9. Related to change order #8 is the placement of an excelsior fiber mat on the side of the hill where the sanitary sewer was run up from the ravine to the manhole at the end of Green Street. This erosion control mat will help the seeding of the very steep hill to take root and avoid being washed away. The price quoted for the work was \$2.00 per square yard. The estimated quantity is 700 square yards for a total estimate of \$1,400.00.

Change Order Item #10. There was a small existing storm sewer inlet in the #5 alley next to 510 Locust that was constructed of brick and in need of replacement. The contractor was asked to construct a field-built inlet in its place. The price quoted for the work was \$1,000.00.

The total amount for these three items is \$6,670.00. They can be bundled in to a second change order for the project and submitted to the City Council for their approval at the September 18 meeting. The erosion control diversion swale (CO #8) and the field-built manhole (CO#10) have been completed. I will include them on the pay application for this pay period if they are included on the City Council agenda for approval.



City of Muscatine

West Hill Sewer Separation Project Change Order #2

Project: West Hill Sewer Separation Project **Account No.:**
Contractor: Langman Construction, Inc. **Date Prepared:** September 9, 2014

Descriptions and reasons for changes to be made:

Adds item to the Contract, No. CO 8, EROSION CONTROL DIVERSION CHANNEL

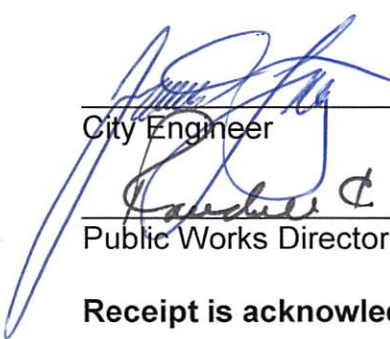
- This item involved the construction of a diversion channel from the end of Green Street to run storm water down into a wooded area on the hill instead of the area where new sanitary sewer pipe had been laid up the side of the ravine. The area was becoming deeply eroded. The price quoted for the work was \$4,270.00.

Adds item to the Contract, No. CO 9, EROSION CONTROL EXCELSIOR MAT

- Related to change order #8 is the placement of an excelsior fiber mat on the side of the hill where the sanitary sewer was run up from the ravine to the manhole at the end of Green Street. This erosion control mat will help the seeding of the very steep hill to take root and avoid being washed away. The price quoted for the work was \$2.00 per square yard. The estimated quantity is 700 square yards for a total estimate of \$1,400.00.

Adds item to the Contract, No. CO 10, FIELD-BUILT STORM SEWER MANHOLE

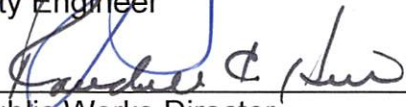
- There was a small existing storm sewer inlet in the #5 alley next to 510 Locust that was constructed of brick and was in need of replacement. The contractor was asked to construct a field-built inlet in its place. The price quoted for the work was \$1,000.00.



City Engineer

9/19/14

Date



Public Works Director

9/19/14

Date

Receipt is acknowledged of this change and terms of settlement are hereby agreed to:



Contractor

9/25/14

Date