

Date : 03/14/2024  
Project No : 2023C180  
Client Company : Artisan Communities  
Arrival Time : 03/14/2024 07:45  
Onsite Hours : -3:30

ASEC Report ID : 64967  
Name of the Project : Lakeside Sub., Calhoun  
Project Location : Calhoun  
Weather : Clear and Sunny  
Departure Time : 03/14/2024 05:15  
ASEC Technician Name : Devon Hall

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Our AS Engineering & Consulting, LLC representative was on site to observe construction activities, specifically the placement of backfill soils for the sanitation line. The following were noted this day:

- 1.) Lateral going under road just south of manhole 4.3. Approximately 6" of No. 57 stone placed in the excavated area underneath the 6-inch diameter sanitation pipe. Approximately 6" of No. 57 stone was placed on top of pipe. Our representative spoke to the city inspector (Kevin) regarding lift sizes of backfill placement. Recommended approximately 6" lifts and compaction with the trench compactor RTSC3. Approximately 2 ft of GAB was placed on top of 6" of No. 57 stone. Approximately 2-3 ft of soil was placed on top of the lateral pipe in an area beyond the width of the road. Area was compacted with trench compactor RTSC3. Another approximately 2-foot lift of GAB was placed on top and compacted with RTSC3. Soil was then placed in approximately 2 ft lifts on the area wider than the width of the road. Contractor added water to GAB with hose and compacted with RTSC3.
- 2.) Area 2 was a storm drain leading to a retention pond. A lot of rock was encountered in the excavated area. Work could not continue with the CAT336E. as the hammer was broken and when our representative had arrived, the rock couldn't be broken by other means. Headwall BA-1 to BA-2 was the storm drain in question according to construction crew on site. Hammer was fixed and operational by approximately 12:45 pm. Used the hammer from approximately 12:45 to approximately 1:00 pm and again between approximately 1:30 pm to approximately 2:00 pm. Alternated using hammer and excavator to remove rock and soil. Approximately 20 feet of storm pipe was installed around 2:30 pm. Hauled away rock and excavated soils with a dump truck. Brought in red clay material. Covered storm pipe with approximately 2-foot lifts of red clay material and compacted with Caterpillar 1024 riding vibratory sheepsfoot. Bulldozer Komatsu 61PX applied approximately 2 ft lifts of red clay material and compacted with Caterpillar 1024 until even with the surrounding soil level. Our representative continued to recommend that fill lift thicknesses be kept to 6 inches but the contractor elected to keep with the thicker (2 to 3 feet) lifts.
- 3.) Area 3 consisted of the area in between manholes 4.2 and 4.3. A mix of soil and rock was used on top of a 6" iron ductile pipe. First lift thickness on top of pipe was approximately 3 ft. Advised the crew to do a smaller lift approximately six inches thickness of uncompacted soil. The area probed over 1 ft deep after compaction with trench packer RTSC3 using a 3/8" diameter probe rod. The lift was found to be uneven when finished compacting. Excavator added a 2nd lift of approximately 3 ft of uncompacted soil and rock and compacted with RTSC3. Used approximately 3 ft of soil for a 3rd lift and compacted with riding vibratory sheepsfoot Caterpillar 1024. Bulldozer Komatsu 61PX applied lifts of approximately 3 ft of soil and was compacted with Caterpillar 1024 until even with the surrounding soil level. All lift thicknesses placed this day were per contractor's choosing and against ASEC's recommendations for lift thicknesses of 6 inches.

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Area 3



Area 3



Area 3



Area 2 after 20 ft of storm drain pipe was installed

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Area 1 adding water to GAB



Area 1 Lateral Sanitation Pipe going under road



Area 1 Lateral Sanitation Pipe



Area 1 Lateral Sanitation Pipe



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Area 2 before 20 ft of storm drain pipe was installed

*Kenneth Mosman*

**Kenneth Mosman**

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