

## Dredging Inspection Field Report

### Site Observations

Date: 5/18/2021 Field Inspector: Mike Triano

Weather Conditions: Partly Sunny Temperature: 80s / Windy

Wood Project Number: 2402210005.01.01 Client: Isle of Palms

Contractor: Branch Diversidied (BDI) Foreman Onsite: Angel Guzman

Item	Observations	Photo
<b>Crew Size</b>	<p>Two 20' wide barges dredging at time of inspection.  Two tugs to move the barges back and forth.  One 26' Thruster Barge – not in operation at the time of the inspection  One ~ 50' X 100'+ Hopper barge staged in intracoastal east of mooring canals used to transport material to DMMA.  Angel's ~20' aluminum boat</p> <p>One 30' x 80' barge placed in vicinity of Station 18 in Baseline 1 – N Canals. Barges will offload here to avoid trip to intracoastal.</p>	Photo: 1
<b>Location of Crew</b>	<p>20' Wide barge located: actively dredging at the beginning of Baseline 6  20' Wide barge located: Actively dredging in Baseline 2  26' Wide Thruster barge: Off-site being worked on  One 30' x 80' barge placed in vicinity of Station 18 in Baseline 1 – N Canals. Barges will offload here to avoid trip to intracoastal.  One ~ 50' X 100'+ Hopper barge staged in intracoastal east of mooring canals.  Angel's ~20' aluminum boat roams throughout</p>	<p>Photo: 1  See Map</p>
<b>Equipment on Site</b>	Same as Crew size, 4 mechanical dredges (excavators), and the inactive 26' Thruster Barge	Photos:
<b>Work Completed</b>	<p>S Baseline 1 from POB to ~ Station 31  N Baseline 1 to terminus  Mooring Canals  Portions of N Baseline 2, 3, &amp; 5  Very Beginning portions of Baseline 6</p> <p>BDI indicated that the Mooring Canals are now fully completed.</p> <p>BDI indicated that dredging will resume in Baseline 5 once the 26' Thruster Barge returns. Will be back this week.</p> <p>BDI indicated that Baseline 5 has an input of material, likely to be from the rip rap along Beach BLVD, which is filling in the dredged portions of the canals. BDI stated that this input of material will be the focus of the 26' Thruster barge.</p>	See Map

	<u>BDI advised dredging occurs in two phases: on the way in for access &amp; removal of top layer of sediment and on the way out for getting canal to specified grade. This is true for all canals that barges cannot initially access.</u>	
<b>Work Underway</b>	Dredging was underway in Baseline 2 and Baseline 6 at the time of the inspection.	See Map
<b>Materials on Site</b>	<p>Stored in 100' + long X 50' wide Hopper barge in Intracoastal. Angel advised that trips to the DMMA are taken once these large barges are full, but that usually occurs once a day.</p> <p>One 30' x 80' barge placed in vicinity of Station 18 in Baseline 1 – N Canals. Barges will offload here to avoid trip to intracoastal.</p>	Photo: 1
<b>Manatee Observer</b>	All crew on barges were advised to keep eye out for Manatees - signs posted on northern and southern canals.	Photos: 6
<b>Turbidity Monitoring</b>	<p>0800 reading was 13.9 NTU. 1200 reading was 6.77 NTU – taken at the time of the inspection.</p> <p>Barrier was open at the time of the inspection.</p>	Photos: 7 & 8
<b>Dewatering</b>	Lance advised dewatering does not occur - drain holes are located in bottom of containers. Lance advised inner canals are mixing zones. Turbidity samples are being taken at the mouth of the north project area.	N/A
<b>Dredging</b>	Mechanical	
<b>Offloading Location</b>	<p>Large ~80 -100+ foot storage barge located in the Intracoastal. Angel advised that there are several barges of this size, and larger that are interchanged once full.</p> <p>Angel advised that trips to the DMMA are taken once these large barges are full, but that usually occurs once a day.</p> <p>30' x 80' barge located at Station 18, Baseline 1. Angel advised that the offloading of this barge varies, but at least off-loads once a day.</p>	Photo: 1
<b>Posted Permit</b>	Permits are not posted. Copies are kept on Angel's boat while dredging operations are taking place.	
<b>Other...</b>	See Additional Comments Below	

## Additional Notes

### Projected Schedule:

- Dredging resumed in Baseline 2
- Dredging commenced in Baseline 6
- Dredging in Baseline 5 will resume once the 26' Thruster Barge is repaired.

**Anticipated Obstacles to Meeting Schedule:**

- Equipment malfunctioning: at the time of the inspection, one dredge was out of commission – the 26' Thruster Barge was off-site being repaired at the time of the inspection.
- The very end of Baseline 3 will have to be finished later; current dredges do not have a long enough boom to reach past the two docks at the end of the canal.
- The input of material in Baseline 5 – BDI indicated that material keeps filling in the dredged location at the terminus of the canal (near Beach BLVD). BDI indicated that the likely reason for this is material within the riprap flowing out into the dredged portions. – This scenario is like what was occurring at the Mooring Canals which took longer than expected.
- Warmer weather increasing Manatee sightings

**Engineer's Notes:**

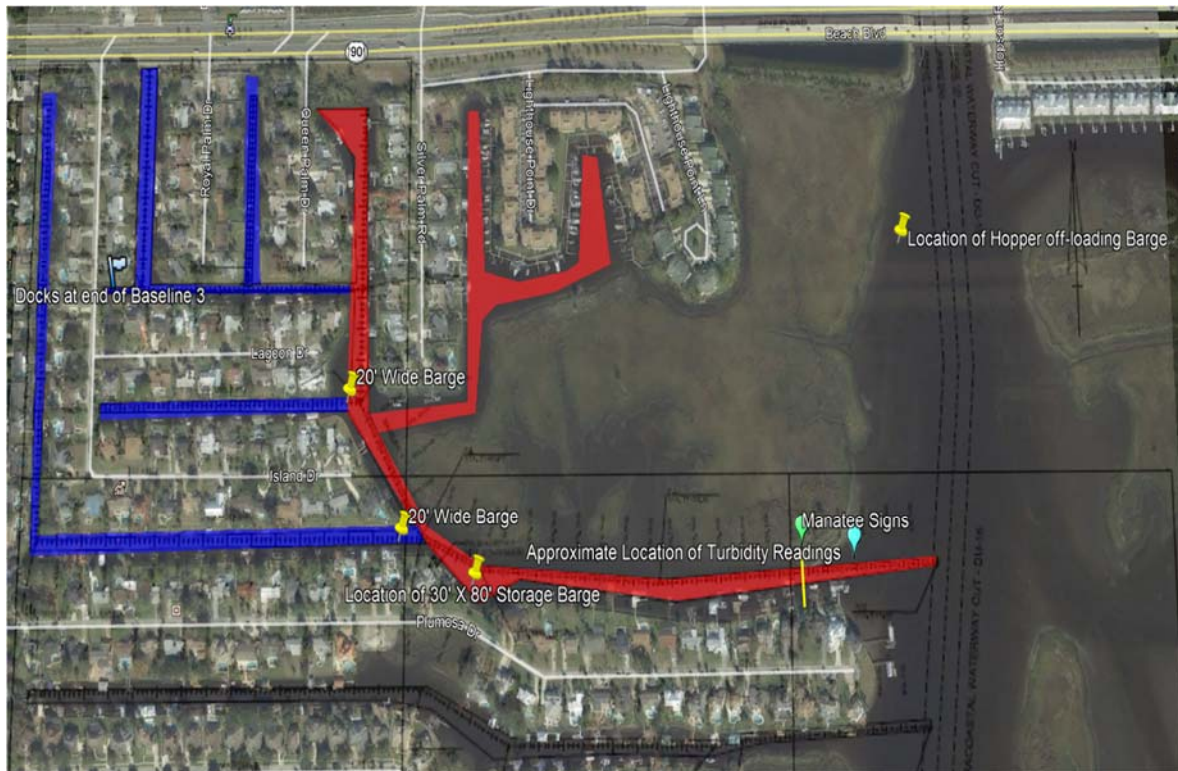
- Barge placement – will start reporting where barges are located at the time of the inspection for simplicity and difference in projected and actual locations of dredging.
- BDI indicated that FWC was on-site yesterday taking witness statements regarding the accident last week involving the 26' Thruster, and one of the 20' wide barges.

Field Engineer Signature:



Date: 5/18/2021

Maps: **Red** is completed Work **Blue** is Work to be completed





**Photograph Log:**



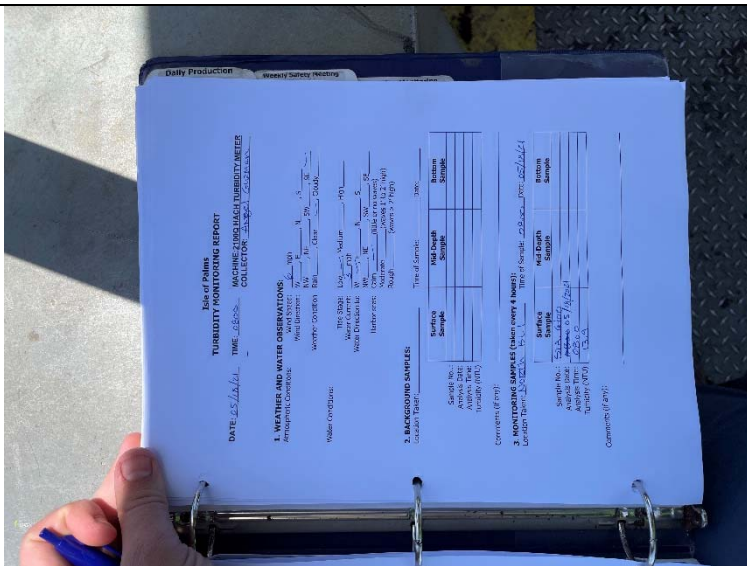
**Photo 1:** 20' Wide Barge actively dredging within Baseline 6.



**Photo 2:** 20' Wide Barge actively dredging within Baseline 2.



**Photo 3:** Material removed from Baseline 2.



**Photo 4:** 0800 Turbidity monitoring form – reading was 13.9 NTU



**Photo 5:** Typical view of large ~ 50' X 100'+ hopper barge used as transport to DMMA.



**Photo 6:** Turbidity barrier and manatee signs.





**Photo 7:** One 30' x 80' barge placed in vicinity of Station 18 in Baseline 1 – N Canals. 20' Wide Barge Actively unloading



**Photo 8:** Typical view of tug maneuvering barge.