



Minutes from the June 2020 Meeting of the Mariners' Advisory Committee

Captain Stuart Griffin welcomed 53 members and guests of the MAC to the June 11th 2020 meeting via Zoom.

I. Approval of Minutes Derek Pitts moved that the reading of the Minutes from the March 2020 meeting be dispensed with. Captain Nathan Hauser seconded. All voted, all approved.

II. Reports

Treasurer's Report

MAC Treasurer Captain Iulucci, reported a balance of \$18,468.98

Membership Report

MAC Membership Chairman, Captain John Gazzola asked to table the report until the next meeting.

III. USACE Reports

Tim Rooney reported on the following distribution:

Philadelphia District Corps of Engineers
Project Status Update
Mariners Advisory Committee for the Delaware River and Bay
11 June 2020

Delaware River, Main Channel Deepening

A fifth rock blasting and hydro hammering season was completed February 12, 2020 in Marcus Hook Range to fracture and remove remaining rock in 7 locations. Latest surveys show that all targeted rock outcroppings in this area have been dredged, and what remains are approximately 60 boulders that will be removed via bucket dredge in July under the current maintenance dredging contract with Norfolk Dredging Company.

Delaware River, Philadelphia to Sea

This year's annual maintenance dredging was awarded to Norfolk Dredging Company (NDC). NDC started dredging operations at Marcus Hook Range to a depth of 45+2 ft MLLW in January 2020, however, was unable to complete Marcus Hook Range high shoal area prior to the environmental window. The Dredge Essex has completed New Castle Range and is currently dredging the lower range of Deepwater Point Range to 46+1 with placement of material into the confined disposal facility (CDF) known as Killcohook. NDC is scheduled to return to Marcus Hook Range in July when the environmental window closes. Option 3 has been awarded to remove obstructions from the Federal Channel and floating plant is scheduled to be on station or shortly after June 15, 2020 in the Delaware Bay pending weather. Philadelphia District and the Delaware River Pilots will review the most recent surveys to prioritize the object removal. It is expected that the object removal work will start in the bay and then continue north. The Hopper Dredge McFarland began dredging operations to address spot shoaling and sand waves in Brandywine Range on 08 June 2020. The current tour will end on 26 June 2020. The McFarland is scheduled to go back out to Brandywine Range in July and August to complete her 40 days of dredging operations.

Delaware River, Philadelphia to Trenton

Maintenance dredging of the Fairless Turning Basin in Falls Township was completed by SumCo Eco-Contracting in January. The Hopper Dredge McFarland is scheduled to conduct dredging operations to address edge and spot shoaling between Allegheny Ave and the Turnpike Bridge this summer. A contract to dredge the upper 40-foot project between the Turnpike Bridge and Fairless Turning Basin was advertised on 28 May with dredging to be completed prior to 31 December 2020. An option to dredge the basin again is included.

Wilmington Harbor

Dredging of the outer portion of the harbor by NDC was completed on 23 March. The summer dredging contract for the entire harbor was advertised on 21 May, with dredging to occur in late July or August.

Schuylkill River

A contract for maintenance dredging above Fairmount Dam will require offloading of material at Ft. Mifflin CDF with barges being staged upstream of Rt. 95 outside of the channel by Atlantic Subsea Inc.

Chesapeake and Delaware Canal

A contract for maintenance dredging of the 35-foot channel was advertised May 21, 2020 with a current bid opening for June 22, 2020. The project includes a base and two options. The first option is for dredging shoals within the canal proper. The second option is for dredging shoals within the Maryland approach channel. The dredging will occur within the environmental window from October 1, 2020 to March 31, 2021.

Packer Avenue Marine Terminal

The Philadelphia District is in receipt of a letter from The Pilot's Association for the Bay and River Delaware and the Mariners Advisory Committee in support of removing the shoals in the turning area adjacent to the Packer Avenue Terminal. The District is in the process of evaluating the best course of action to include this area in to future dredging programs.

It was further discussed that the dredging window for the C&D Canal will be from October 31st through March 31st.

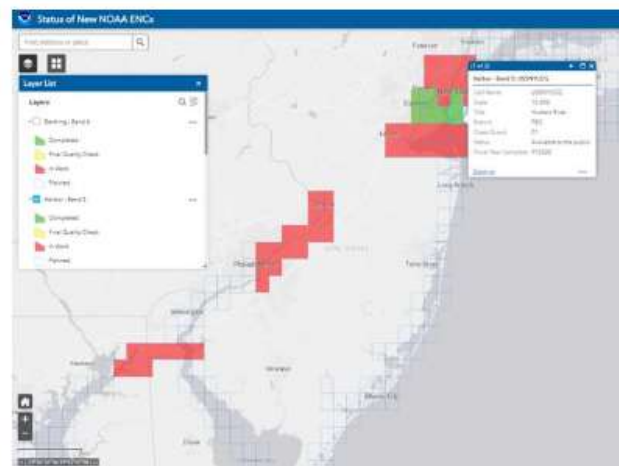
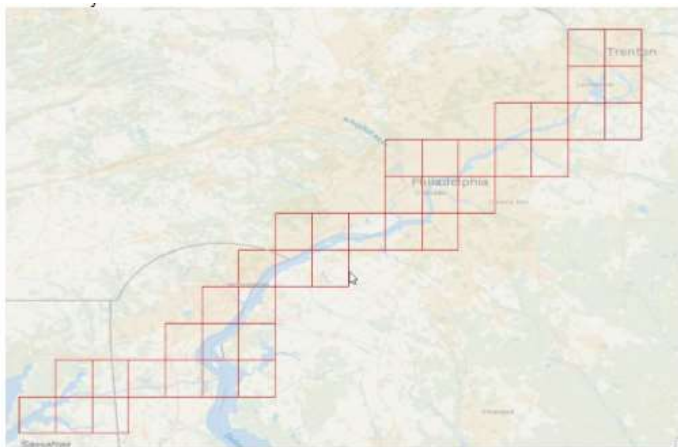
IV. NOAA Report

Lucy Hick reported on the following distribution.

Report out at Delaware River/Bay Marine Advisory Council June 11, 2020

Lucy Hick - Chief, Customer Affairs Branch, NOAA's Office of Coast Survey Lucy.Hick@noaa.gov, (240) 533-0066

- Charting Status
 - The *Bay Hydro 2* surveys from 2018 have been reviewed and QC'd and are with the charting division for application to the ENC. GeoPDFs of the data have been provided to the pilots.
 - Ban 5 ENCs have been reschemed from Trenton to the C&D Canal. These new charts at 1:10,000 scale. We are working on further updating shoreline and bathv for these cells.



- Survey Status
 - NOAA ships are currently on an operational pause due to COVID-19. *Thomas Jefferson*, (based in Norfolk, VA) got underway during the first week of June to ensure operational readiness in the event of a hurricane or other emergency
 - The Navigation Response Teams (including the *Bay Hydro 2*) are under a travel moratorium due to COVID-19. However, they ready to deploy in the event of a hurricane or other navigational emergency that poses an imminent threat to life, property, or the environment.
- CATZOC/Survey Quality for USACE data
 - NOAA is still working on a re-evaluation of the CATZOC for the channels for the Philadelphia District. We hope to have this re-evaluation complete at the end of the month.
- NOAA ENC Status Viewer
 - NOAA's Office of Coast Survey released a new and improved map viewer (<https://distribution.charts.noaa.gov/ENC/rescheme/>) featuring the status of NOAA electronic navigational charts (NOAA ENC®) as they undergo major improvements.
 - The public can now view ENC project status from the planning and creation stages all the way to completion, keeping them better informed when these enhanced navigational charts become available.
 - For more information, see <https://www.nauticalcharts.noaa.gov/updates/follow-the-status-of-electronic-navigational-chart-improvements-with-noaas-new-map-viewer/>
- NOAA Custom Chart Prototype
 - NOAA has released an improved user interface for the NOAA Custom Chart (NCC) prototype web application (<https://devgis.charttools.noaa.gov/pod/>)
 - The NCC allows users to create their own charts from the latest NOAA electronic navigational chart data
 - Improvements include:
 - simplified and more logically organized NCC settings
 - appropriate default values for depth contour labels, depth shades, and compass roses
 - implementation of the NOAA color palette from traditional NOAA paper charts
 - Users are encouraged to provide comments on the NCC through NOAA's online ASSIST feedback tool (<https://nauticalcharts.noaa.gov/customer-service/assist/>).
 - For more information and to view a video tutorial, see <https://www.nauticalcharts.noaa.gov/updates/explore-the-refreshed-enc-based-noaa-custom-chart-tool/>
- Precision Navigation Data Dissemination prototype
 - NOAA's Precision Navigation program (<https://nauticalcharts.noaa.gov/learn/precision-navigation.html>) is building a prototype data gateway for users to discover, visualize, and disseminate NOAA marine navigation products and services. The backbone of this system is machine-to-machine dissemination that allows the mariners' existing navigation software to automatically discover if NOAA has made new data available and ingest it directly into the system.
 - NOAA is planning on an initial release of its preliminary service for surface currents and high resolution bathymetry by **July 2020**. Our prototype precision

navigation dissemination system will allow systems to ingest, process, and disseminate selected NOAA marine navigation data.

- o If you are interested in participating as an early adopter for our Precision Marine Navigation Services please email your interest and information to: Christine.Burns@noaa.gov and Julia.Powell@noaa.gov.
- o For more information, please see <https://www.nauticalcharts.noaa.gov/updates/noaa-seeks-industry-feedback-as-it-begins-testing-the-precision-navigation-data-dissemination-prototype/>
- Externally sourced data (ESD)
 - o NOAA has a policy of evaluating externally sourced data (non-NOAA/non-USACE) for use in updating the chart. These can be survey acquired by private contractors or academic institutions. Please feel free to reach out to me if you are aware of datasets which are available.
- Questions or problems
 - o Everyone is encouraged to report questions or problems with NOAA charts and navigation services via our ASSIST website -- <https://www.nauticalcharts.noaa.gov/customer-service/assist/>

Chris DiVeglio, Maritime Services Program Manager for NOAA, reported on the following distribution:



Air gap and current meter station Instrument performance stats.

Criteria - Percentages report of data which

1- Passed preliminary Quality Control (public dissemination = ON)

2- Data were 18 minutes old or less when populated into the database

3/1/20- 5/31/20

Reedy Point Air Gap – 99.2 %

Delaware Memorial Bridge Air Gap – 99.1%

Ben Franklin Air Gap – 99.6%

db0301 (Philadelphia) currents – 100%

db0501 (Brown Shoal LB10) currents – 100%

Ben Franklin Construction

NOAA CO-OPS is working closely with the bridge folks waiting on updates for planned long term construction. Once safespan scaffolding is installed, NOAA will adjust the offset to account for scaffolding hanging below the bridge, add a disclaimer to PORTS® air gap pages and issue air gap notice letter to navigation community.

Reedy Point NWLON

Reedy Point NWLON is becoming more and more tough to access for various safety reason. NOAA is working on possible alternative locations or potential full removal of the station. This is a NOAA funded station and not funded by the PORTS® partner. Delaware City is nearby and provides very similar real time water level data.

Salinity data at Ship John Shoal and Brandywine Shoal Lights

Still attempting to make repairs and bring these sensors back online. There had been many travel restrictions due to COVID.

Christopher DiVeglio Maritime Services Program Manager NOAA PORTS® Program

Center for Operational Oceanographic Products & Services (CO-OPS) NOAA / National Ocean Service

1305 East-West Hwy, SSMC 4, Sta. 6609 Silver Spring, MD 20910

240-533-0571 (office) | 240-620-6919 (mobile,text)

christopher.diveglio@noaa.gov

Darren Wright, Marine Program Manager for the National Weather Service, reported on the following distribution:

The National Weather Service has established a proposal to consider getting rid of the term “advisory”, for example, in conjunction with “small craft advisory”. They are considering a more descriptive statement and would switch to “small craft **warning**” in this case.

Small Craft Advisory to Small Craft Warning Survey
<https://www.surveymonkey.com/r/VZGX6BF>

Proposal to Terminate the Term "Advisory" Survey
<https://www.surveymonkey.com/r/publichazsimp>

Katie Kirk, NOAA Representative and project lead on the tidal current survey effort, reported on the following distribution:



NOAA - NOS - CO-OPS
Delaware River & Bay Tidal Currents

The Center for Operational Oceanographic Products and Services (CO-OPS), an office of the National Oceanic and Atmospheric Administration's (NOAA) National Ocean Service (NOS), is planning an update to NOAA's Tidal Current Tables for the Delaware River & Bay. We are looking for your input on where to place stations in order to best provide currents observations and predictions.

Geographic Scope: We intend to deploy current meters at approximately 32 stations spanning from the mouth of the Delaware Bay upstream to Trenton, NJ. Proposed station locations are listed and shown on the map below. Email katie.kirk@noaa.gov if you wish to be provided with a Google Earth file with station locations.

Updating the tidal current predictions is an effort to help ensure safe navigation, so we value and appreciate your input regarding optimal station locations. **Please contact the project lead, Katie Kirk (email: katie.kirk@noaa.gov) by July 1, 2020 with suggestions on adjusting these plans, adding or removing stations to best fit your needs and priorities.**

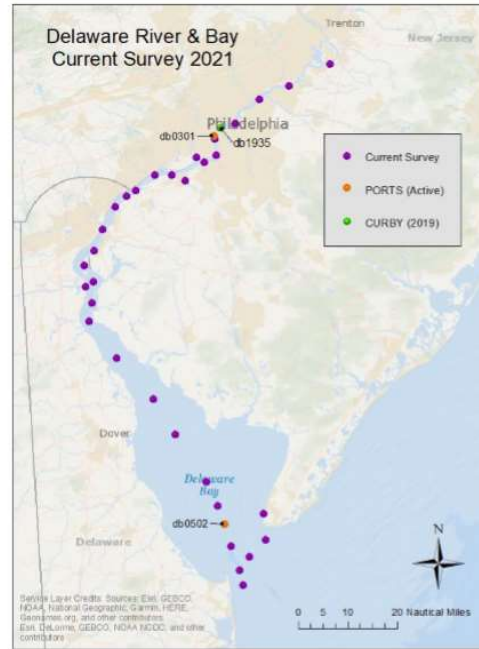
Project Timeline & Description:

- **Summer 2021:** Complete the current survey. Acoustic Doppler current profilers (ADCPs) will be deployed at each station (~32) for a minimum of 45 days in order to sample current speed and direction every six minutes. The ADCPs will be housed in bottom mounts (< 1 m tall) with no surface presence or on USCG ATONs (with prior permission) collecting a vertical profile of currents throughout the water column or horizontally mounted on existing infrastructure measuring the currents across the channel at a single depth. It is intended that all equipment will be recovered upon completion of the survey.
- **2022:** Completion of data analysis. Tidal current predictions and raw data will be available online: tidesandcurrents.noaa.gov.

The **Petty Island** tidal current predictions have been updated and assigned a new station ID: db1935. Predictions are available online (tidesandcurrents.noaa.gov) at three different depths (10, 16, and 30 ft). The predictions are based off of data collected by NOAA CO-OPS using a real-time currents buoy (CURBY, shown on map on back) deployed from July – October 2019 near the historic station location (39.9673°N, 75.1172°W). Feedback regarding the new prediction products, especially how it relates to what is observed on the water, is appreciated and should be sent to katie.kirk@noaa.gov.

Proposed NOAA Delaware River & Bay Current Survey Stations for 2021.

Station ID	Station Name	Latitude	Longitude	Nearby Historic Station(s)
DEB2101	Delaware Bay Entrance	38.78080	-75.04300	ACT4071
DEB2102	Cape Henlopen, 2 mi NE of	38.82000	-75.05330	ACT4081
DEB2103	Cape Henlopen, 4.8 nm NE of	38.85550	-75.02130	ACT4091
DEB2104	Cape May Channel	38.90000	-74.96670	ACT4056 & ACT4061
DEB2105	Cape Henlopen, 5 mi north of	38.88330	-75.08330	ACT4096
DEB2106	Cape May Canal, west end	38.96827	-74.97255	ACT4051 & ACT4126
DEB2107	Brandywine Shoal Light, 0.5 nm west of	38.98770	-75.12700	ACT4131
DEB2108	Fourteen Foot Bank Light, 1.2 E of	39.05000	-75.16670	ACT4156
DEB2109	Cross Ledge Range	39.17380	-75.27070	ACT4201
DEB2110	Ben Davis Point, 3.2 nm southwest of	39.26708	-75.34466	ACT4216
DEB2111	Arnold Point, 2.2 nm WSW of	39.37330	-75.46730	ACT4236
DEB2112	Baker Range Channel	39.46867	-75.55949	ACT4256
DEB2113	Reedy Island (off end of pier)	39.51670	-75.55000	ACT4261
DEB2114	Chesapeake and Delaware Canal Entrance	39.55893	-75.57219	ACT4276. Previous PORTS db0201.
DEB2115	Reedy Point, 1.15 nm NE of	39.57183	-75.54639	ACT4291. Previous PORTS db0201.
DEB2116	Penns Neck, 1.2 nm NW of	39.61411	-75.57595	ACT4321 & ACT4326
DEB2117	Kelly Point, 0.4 nm NW of	39.65185	-75.54443	ACT4336, ACT4331, ACT4341
DEB2118	Deepwater Point, 0.8 nm NW of	39.70690	-75.51430	ACT4346
DEB2119	Oldmans Point	39.76461	-75.47347	ACT4361
DEB2120	Marcus Hook Bar (north)	39.7927	-75.4353	ACT4366
DEB2121	Marcus Hook	39.808	-75.4028	ACT4371
DEB2122	Eddystone	39.8482	-75.3383	ACT4376



Please contact the project lead, Katie Kirk (email: katie.kirk@noaa.gov) by July 1, 2020 with feedback regarding station locations and prioritization.

DEB2123	Crab Point, 0.5 mi East of	39.8467	-75.2833	ACT4386
DEB2124	Mantua Creek US 44 Bridge Paulsboro	39.83231	-75.23665	MAC1201
DEB2125	Schuylkill River Mouth	39.8928	-75.1989	New station
DEB2126	Eagle Point, 0.2 nm northwest of	39.88030	-75.17330	ACT4406
DEB2127	Gloucester Point	39.89850	-75.13260	ACT4411 & ACT4416
DEB2128	Camden, (P.R.R. Yards), east of channel	39.94000	-75.13670	ACT4421. Previous PORTS db0301

DEB2129	Fisher Point	39.98030	-75.06940	ACT4436
DEB2130	Torresdale, west of channel	40.0415	-74.9881	ACT4446
DEB2131	College Point, 0.4 nmi east of	40.0775	-74.8867	ACT4456
DEB2132	Newbold Island north of, Maine Channel	40.1339	-74.74984	ACT4471. Previous PORTS db0401

V. USCG

COTP Captain Scott E. Anderson, Jerry Barnes, Isaac St. John, and CDR Jen Doherty reported on the following distribution:

Mariners Advisory Committee (MAC) For the Bay & River Delaware Fifth Coast Guard District and Sector Delaware Bay Waterways and Aids to Navigation Report for June 11, 2020



1. Hurricane Seasonal Alert

- Hurricane Seasonal Alert was set on June 1, 2020 and will remain in effect through November 30, 2020 unless otherwise established.
- All vessels, facilities and marinas are asked to take adequate precautions and review the U.S. Coast Guard Sector Delaware Bay Port Hurricane Contingency Plan, dated April 2016. The plan is available on the Sector Delaware Bay Homeport page.

2. Port Access Route Study

- Please see Sector Delaware Bay MSIB 11-20 for further information.
- Port Access Route Studies are designed to determine the sufficiency of current vessel routing measures, and determine if there is a necessity for additional routing measures, along the approach to Delaware Bay and the NJ Seacoast.

- c. Comments must be submitted by July 6, 2020 at www.regulations.gov. Search for "USCG-2020-0172" in order to locate the correct docket folder for comment submittal.

3. Novel Coronavirus (COVID-19)

- a. The Coast Guard is monitoring the novel coronavirus outbreak. The situation is continually evolving. We have additional screening procedures in place for vessels arrivals to include last ports of call and crew member embarkation places and dates. We are in close communication with CDC, CBP, and the local health departments.
- b. MSIBs relating to COVID-19 are available on the Sector Delaware Bay Homeport page under Maritime Transportation System (MTS) Recovery.

4. Bi-Weekly Port Partners Conference Calls.

- a. Sector Delaware Bay has been holding bi-weekly port partners conference calls in order to facilitate the passing of guidance and information regarding the impact of COVID-19 on the Maritime Transportation System.
- b. Those wishing to be included in the calls that have not previously been included may submit a request to DelawareBayWWM@uscg.mil

5. Object Removal

- a. Object removal within the Delaware River is anticipated to resume in July. A safety zone will be established for the area surrounding working vessels. Information regarding this safety zone will be disseminated as information regarding the object removal comes available.

6. Navigation Safety Equipment Deviation Request Form Update

- a. Port State Control is updating the Navigation Safety Equipment Deviation Request Form, also known as the Letter of Deviation. The new form streamlines the process to make it more efficient and also ensures consistency.

Sector Delaware Bay Aids To Navigation (ATON) Updates

1. Kinkora Upper Range Rear Light

- a. Construction has begun and it is 5% completed.

2. CGC WILLIAM TATE

- a. No updates.

3. Aids To Navigation Team (ANT) Philadelphia

- a. BMC Nick McGowen will be relieving BMC Tim Walsh as Officer in Charge of ANT Philadelphia on June 17, 2020.

4. Aids to Navigation Team (ANT) Cape May

- a. BMCS George Fleming will be relieving BOSN Elijah Reynolds as Officer in Charge of ANT Cape May on July 1, 2020.

District Five ATON Updates

1. Rebuild Liston/Reedy Range Lights

- a. This project will entail the relocation/rebuild of front and rear structures for both ranges. The new range front light will be constructed at the intersection of both ranges and will serve as a combined range front structure. Separate rear structures will be constructed. The project remains on schedule to have the design completed in FY20 and construction begin in FY21.

2. Rebuild New Castle Front/Rear Range Lights

- a. This project will entail the relocation of the front and rear structures for the range. The existing range front and rear towers located on land will be demolished. The new range front light will be constructed near the edge of the channel. The new rear light will be constructed near the shoreline in front of the existing front tower in approx. 22 feet of water. Both new structures will have mono-pile type foundations driven into the river bottom. All optics will be changed to solar power. The project remains on schedule to have the design completed in FY20 and construction begin in FY21.

3. Delaware Ice Breakwater Lights

- a. The project scope is to remove the abandoned towers (foundations to remain) at Delaware Bay Ice Breakwater Lights "W" and "2". Repair the JRIRS "W" light and install a new mono-pile structure at light "2" buoy location. Also the removal of the 30 ft leaning tower at Harbor of Refuge North End Light 1 and rebuild a new structure. The project remains on schedule pending updated information on award date.

4. Waterways Analysis and Management System Reviews:

- a. **Atlantic and Gulf Coast Seacoast System (AGCSS):** D5 is implementing changes resulting from recent AGSS WAMS, which includes removal of bells, gongs, whistles; providing landfall lights with an operational range of 5 NM from the 30 foot curve; and charting of hazards of 30 feet or less in offshore shipping lanes.

5. Port Access Route Studies, Shipping Safety Fairways:

- a. **Atlantic Coast:** In the coming months, the Coast Guard intends to publish an ANPRM regarding the possible establishment of shipping fairways for offshore and coastwise routes along the Atlantic Coast from Maine to Florida. The intent is ensure that traditional navigation routes currently used by mariners are kept free from obstructions that could impede safety.
- b. **Seacoast of New Jersey and Approaches to the Delaware Bay:** Notice of study was published in the Federal Register (USCG-2020-0172) on 05 May 2020. The Notice of Study is seeking public comment to determine whether existing or additional routing measures are necessary. Comment period closes 06 July 2020.

6. Anchorage:

- a. **Delaware Bay and Atlantic Ocean, Delaware:** On Nov 29, 2019, the Coast Guard published a notice of inquiry, request for comments, on the need to establish new anchorage grounds in the Delaware Bay and Atlantic Ocean. Docket Number: USCG-2019-0822. 42 comments were received. Initial analysis shows an overwhelming percentage of comments (66%) involved environmental concerns (including fuel bunkering spill concerns, endangered species concerns and sensitive areas in Anchorage B). 9 comments (21%) expressed concerns over view shed and tourism impacts. 5 (12%) were supportive from maritime stakeholders. 3 (7%) were from wind energy proponents that expressed concerns about anchorage locations impacting planned electrical transmission line routes. Comments are currently being reviewed.

7. Bridges:

- a. **Ben Franklin Bridge:** In April 2020, district received a maintenance request proposal for work on the Ben Franklin Bridge. The work would include a reduction in the vertical clearance of the bridge above mean high water of approximately 2.83 feet and would not include

incremental scaffolding for a period of 4 years. The USCG reached out to port stakeholders north of the Ben Franklin Bridge to determine potential impacts with the significant reduction for a long period of time. The USCG is currently evaluating the resubmittal from the owner, reducing the reduction to only approximately 2 feet.

8. Offshore Wind:

New Jersey

- a. **State Commitments:** On Nov. 19, 2019, New Jersey more than doubled its target for offshore-wind energy production under an executive order (EO No. 92) signed by Gov. Phil Murphy. The EO raises NJ's goal from 3.5 GW of offshore wind-energy generated electricity by 2030 to 7.5 GW by 2035. The New Jersey Board of Public Utilities granted the state's first award for offshore wind to Ørsted's Ocean Wind 1,100 MW project. In Jan 2020, Gov Murphy signed an offshore wind solicitation bill into law which expanded the definition of a "qualified offshore wind project" to include "offshore wind transmission facilities." On Mar 3, 2020, the State released its timetable for its 7.5GW offshore wind procurement program, which calls for solicitations of 1.2 GW in Q3 2020, Q3 2022, Q3, 2024, followed by solicitations for 1.4 GW in Q3 2026 and Q3 2028.
- b. **Ocean Wind (OCS-A 0498), 160,480 acres offshore NJ-south):** SAP approved May 17, 2018; COP submitted Aug 15, 2019; Nav Safety Risk Assessment brief to USCG was held on April 14, 2020. Orsted plans to install 91 turbines (12 MW each) capable of generating 1,104 MW and 2 substations. Facility may include up to three export transmission lines. Orsted is actively conducting site characterization activities and wind farm is expected to be operational in 2024. Orsted seeks USCG preliminary approval of turbine spacing proposal. BOEM expected to issue NOI and initiate formal review in 2020; BOEM interagency kick-off meeting held May 18. Ocean Wind submitted request to decommission 2 FLiDAR buoys in lease area.
- c. **Atlantic Shores (OCS-A 0499, 183,353 acres offshore NJ-north):** SAP submitted on January 2, 2020. MET buoy deployed. Surveys scheduled for May 2020. MET buoys approval pends. COP anticipated Fall 2020. EDF Renewables/Shell seek CG preliminary approval of turbine spacing proposal; turbine spacing meeting held May 14, 2020. Site has the potential to generate up to 2.5 GW. Project is expected to be operational in 2026.
- d. **New York / New Jersey Ocean Grid Project:** On April 30, 2019, BOEM received and application from Anbaric Development Partners for a Right of Way grant on the OCS offshore NY and NJ. The proposed project would entail the construction, installation, and operation of an offshore transmission system of approximately 185 NM of submarine cable on the OCS and approximately 118 NM of submarine cable on State submerged lands to deliver offshore wind energy generation to the onshore electric grid. BOEM recently determined there is no competitive interest. In Jan 2020, Gov Murphy signed an offshore wind solicitation bill into law which expanded the definition of a "qualified offshore wind project" to include "offshore wind transmission facilities" such as this project.
- e. **Hudson South – New York Bight Call Area:** BOEM intends to lease additional wind energy areas offshore New Jersey referred to as Hudson South. The Hudson South area is the largest of four areas under consideration in the vicinity of New York Bight.

Delaware

- f. **Skipjack Offshore Energy (OCS-A 0519, 26,332 acres offshore DE-south):** Southern portion of lease OCS-A 0492 assigned to Skipjack Offshore Energy at the request of Garden State Offshore Energy and approved by BOEM on June 12, 2018. Southern portion now carries a new lease number OCS-A 0519. Will include up to 16 wind turbines, 8 MW to 12 MW each, spaced approximately 0.7 to 0.87 nm apart, and up to 1 offshore sub-station. Blade height of 641' to 860'. COP submitted July 2019. FLiDAR buoy deployed Jan. 22, 2020. SAP approved; SAP surveys complete. Met buoy deployed. Revised COP expected July 2020. 16 turbines. BOEM initiating formal review of COP and NEPA process; interagency kick-off meeting held May 5, 2020. Operations expected 2022.
- g. **Garden State Offshore Energy I (OCS-A 0482, 70,098 acres offshore DE-north):** Site Assessment Plan (SAP) submitted Jul 25, 2018 and approved Dec 6, 2019. Orsted actively conducting site characterization activities; FLiDAR buoy deployed Jan 22, 2020. Construction and Operations Plan (COP) due to BOEM by Jun 1, 2019; however, BOEM approved term extension on Nov. 26, 2019. SAP approved Dec 6, 2019. MET buoy deployed Jan 22, 2020. COP under development. Project is expected to be operational in 2023.

Maryland

- a. **State Commitments:** In 2017, the Maryland Public Service Commission (PSC) awarded both Orsted and US Wind Offshore Wind Renewable Energy Credits (OREC) for 120 MW each, and Orsted and US Wind agreed to invest \$115 million in port infrastructure and steel fabrication facilities in Baltimore. In its announcement, Maryland estimated the projects would create 9,700 full time equivalent jobs and result in more than \$2 billion of economic activity for the state.
- b. **US Wind (OCS-A 0490, 79,707 acres offshore MD):** SAP approved Mar 22, 2018. MET tower installation delayed. The tower when installed will be located approximately 15.5 miles east of Ocean City, MD, and 6.5 miles south by southwest of Delaware Lighted Buoy D, which marks the terminus of the Southeastern Approach of the Delaware Bay Approach Traffic Separation Scheme. The exact tower location will be 38 21 09.9 N, 074 45 12.8 W. SAP surveys completed; MET buoy to be deployed in coming months. Phase 1 includes up to 57 turbines. COP expected June 2020. Reviewing new SAP changing their meteorological tower to a buoy.

PARS -Traffic Separation Schemes (TSS): Captain Griffin: I wanted to get more clarity on the PARS process to get a better handle on how we can best convey the interests and concerns of the MAC constituents. We want to get a better understanding of what the MAC needs to be thinking about as it relates to any possible changes to the TSS. There has been some historical resistance in the port to any modification for the TSSs. We plan to hold an internal meeting at the Maritime Exchange to discuss such concerns. Such a change to the TSSs may appear to make the port "further from sea" giving the perception of making the port less competitive. I'd welcome your thoughts.

VI. Unfinished Business

OFFSHORE WIND

Liz Kretovic, Orsted's Mid-Atlantic Marine Affairs Manager, reported the following: She served 21 years with NOAA before joining Orsted. Skipjack is proceeding with offshore and onshore investigations with COP. BOEM's issuance of the Notice of Intent is expected late summer, early fall this year. We look forward to an "approval of process". We have a Navigation Safety Risk Assessment almost complete for Ocean Wind and will share that with BOEM and the USCG after the completion of our internal review. We expect BOEM's Notice of Intent to be available later this year. We anticipate the start of offshore construction in 2023. We have also developed an on-line survey and would like your participation.

Captain Griffin asked John O'Keefe of Orsted that the Navigation Safety Risk Assessment be shared with the MAC as well.

Captain Griffin reported that an application has been filed by U.S. Wind for the deployment of an ocean buoy to be located in the same location as the MET Tower would have been installed.

BURLINGTON COUNTY BRISTOL BRIDGE COMMISSION

Captain Griffin reported on the 2-hour notice requirement for vessels to pass the Tacony-Palmyra Bridge, which is due to expire in early June. This has been extended until August 9th.

UPPER RIVER SHOALING

Captain Stuart Griffin reported that we adopted a temporary change to the Upper River Transit Advisories at the last MAC meeting. He added that the change takes one hour out of the arrival window and puts all ships over 32'.6" draft and up to 38'.6" to arrive no later than 8 hours and 15 minutes after slack flood at Cape Henlopen. Captain David Cuff, President of the Pilot's Association, added that we'd like to make this a permanent process, citing the safety factor. Captain Jon Kemmerley moved that the MAC adopt this. Captain Mike Nesbitt seconded. All approved.



Upriver Arrival Time change to MAC Transit Advisories 6.11.2020

Current MAC Advisory: Upper Delaware River Vessel Draft Inbound

1. Vessels less than 32'06" FW may transit on any stage of the tide or current.
2. Vessels 32'06" or greater up to 35'00" FW in draft should arrive in Philadelphia Harbor no later than 9 hours and 15 minutes, or earlier than 5 hours and 45 minutes from slack flood current at Cape Henlopen.
3. Vessels 35'01" FW or greater up to 38'06" FW in draft should arrive in Philadelphia Harbor no later than 8 hours and 15 minutes, or earlier than 5 hours and 45 minutes from slack flood current at Cape Henlopen.

Proposal is to consolidate items 2 and 3 above so that any ship greater than 32'06" arrives no later than 8 hours 15 minutes after slack flood Cape Henlopen. Specifically, section 2 will be deleted and section 3 will be changed to read, "Vessels 32'06" FW or greater up to 38'06"..."

-Due to shoaling in the Fairless turning basin we have scheduled all ships over 32'06" draft per item number 3 (no later than 8 hours and 15 minutes after slack flood at Cape Henlopen) since September 2019 MAC Meeting.

-dredging at Fairless was completed in January 2020, and the change was left in place pending discussion at the MAC

-conversation was started at the March 2020 MAC meeting and the issue was tabled pending further discussion.

Internal discussion with River and Docking Pilots have yielded support for this change for the following reasons:

- This reduction in the arrival window of one hour ensures that an inbound deeper ship will not encounter Ebb current as they round Florence Bend.
- Change also ensures that any ship over 32'06" is a high-water docking.
- Making this temporary change permanent will eliminate the need to "toggle" this restriction back and forth as shoaling occurs in the Fairless turning basin.
- There has been no expression of hardship or opposition from agents or terminal operators.

OBSTRUCTION REMOVAL

There is an obstruction removal barge due to start on the 15th. It's a 60-day process.

U.S. Army Corps of Engineers Philadelphia District Survey Section

Status of Objects / Obstructions June 23, 2020



INTRODUCTION:

This report is a summary of objects / obstructions which have been located by USACE Philadelphia Survey Section for the deepening portion of the Delaware River, Philadelphia to the Sea federal navigation project. Objects which have previously been removed are not included.

METHODOLOGY:

200khz multibeam survey methods are used to conduct channel exam surveys for this project. Lines are run generally parallel to the channel centerline, at a maximum spacing of 75', resulting in 100% bottom coverage. Real time kinematic positions are obtained by the vessel utilizing the district's Real Time Network. In cases where the network is not accessible in Real Time due to a lack of cellular coverage, or other reasons, post processed kinematic positions are computed using Applanix POSPac software.

The primary purpose of channel exam surveys is to measure and quantify shoaling within the channel prism. When objects are seen in these surveys, they are further investigated using 400khz concentrated multibeam surveys. These surveys are then used to identify the shoalest sounding on the object in question.

METADATA:

- Project Name:	Philadelphia to the Sea / Philadelphia to Trenton
- Projected Coordinate System:	State Plane NAD-83
- Datum Name:	WGS-84
- Horizontal Zone:	NJ-2900 NEW JERSEY
- Projected Coordinate Units:	US Survey Foot
- Implied Horizontal Accuracy:	+/- 0.5 Feet
- Vertical Reference Datum:	MLLW
- Tidal Epoch:	1983-2001
- Geoid Model:	Geoid 12b
- Implied Vertical Accuracy:	+/- 0.5 Feet
- Positioning System/Method:	Real Time Kinematic (RTK)
- System/Method:	Multi Beam Echosounder
- Transducer Beam Angle:	1.5 Degrees (Multi-beam)

- Shot Selection Method:	Shoal
- Shot Selection Positioning Method:	Point Positioning
- Tide Gage Location:	VRS (RTN)
- Squat Applied:	Yes
- Squat Application Method:	Real Time Kinematic (RTK)
- Heave Applied:	Yes
- Heave Applied Method:	POS MV
- Pitch/Roll Applied:	Yes

*Note – Schuylkill River, C+D Canal and Chesapeake Bay Data may have different state plane zones

OBJECTS CURRENTLY BEING TRACKED									
TGT Name	Map Label	Area or Range	Latitude	Longitude	Date Found	Min Depth (MLLW) 400KHZ	Comments	Comments 2	Approximate Dimensions (LxWxH)
Bellevue 15 4May2020	BEL22 44.6	Bellevue	39 44 727839 N	075 29 72544 W	5/4/2020	44.6'	Boulder like with scour surrounding it		6.5x6 5x4
Bellevue 14 4May2020	BEL21 44.5	Bellevue	39 44 823734 N	075 29 645945 W	5/4/2020	44.5'	Protruding formation with a flat top, likely attached to bottom but could be some sort of loose material. Sharp point at shoalest elevation		6.5x3x2
Bellevue 13 4May2020	BEL20 42.3	Bellevue	39 44 826474 N	075 29 652873 W	5/4/2020	42.3'	Large boulder like object with 3 smaller appearingly loose objects immediately adjacent, all above 45'	7x5x4.5 (largest boulder) / 17x12 (area of all 4 objects together)	17x12
Bellevue 12 4May2020	BEL19 44.7	Bellevue	39 44 829514 N	075 29 642464 W	5/4/2020	44.7'	Small lump protruding, likely attached to bottom but could be loose material of some sort		4.5x2 5x1.5
Bellevue 9 4May2020	BEL34 42.2	Bellevue	39 44 843926 N	075 29 652102 W	5/4/2020	42.2'	Boulder like with flat edge on top		8x4.5x4.5
Bellevue 10 4May2020	BEL17 43.6	Bellevue	39 44 844537 N	075 29 655821 W	5/4/2020	43.6'	Jagged pointed object, could be loose rock or possibly attached to the bottom		5x5.5x2.5
Bellevue 1 9June2020	BEL15 44.6	Bellevue	39 44 849198 N	075 29 645065 W	5/4/2020	44.6'	Boulder like		4x4x2
Bellevue 8-4May2020	BEL33 44.8	Bellevue	39 44 862824 N	075 29 647767 W	5/4/2020	44.8'	Large almost triangular boulder like object with an appearingly flat top		10x6x4
Bellevue 7 4May2020	BEL32 43.9	Bellevue	39 44 886193 N	075 29 606103 W	5/4/2020	43.9'	Large boulder like object with scour mark surrounding it		8x8x5
Bellevue 5 4May2020	BEL29 43.7	Bellevue	39 44 937838 N	075 29 561071 W	5/4/2020	43.7'	Boulder like		3x3.5x3
Bellevue 4 4May2020	BEL27 43.5	Bellevue	39 44 942564 N	075 29 55572 W	5/4/2020	43.5'	Rectangular boulder like object, doesn't seem to be uniform enough to be man made but could potentially be		6.5x3x2.5
Bellevue 5 9June2020	BEL28 44.7	Bellevue	39 44 945938 N	075 29 580305 W	5/4/2020	44.7'	Small Boulder like		3x3x3
Bellevue 3 4May2020	BEL25 43.8	Bellevue	39 44 949889 N	075 29 552366 W	5/4/2020	43.8'	Non uniform jagged object, could potentially be a formation of the bottom.		7.5x5.5x3
Bellevue 1 4May2020	BEL16 43.8	Bellevue	39 44 99465 N	075 29 538159 W	5/4/2020	43.8'	Large boulder like object with a flat top laying at an angle		7x6x4
Bellevue-9 18Feb2020	BEL9 44.7	Bellevue	39 45 2217902	75 29 3125755	Feb-20	44.7'	Boulder Like 5x6x4		
Bellevue-8 18Feb2020	BEL8 44.5	Bellevue	39 45 2303740	75 29 2774656	Feb-20	44.5'	Boulder Like 6x4x3		
Bellevue-7 18Feb2020	BEL7 45.0	Bellevue	39 45 2721251	75 29 2568259	Feb-20	45'	Boulder Like 9x5x3		
Bellevue-6 18Feb2020	BEL6 44.8	Bellevue	39 45 3175972	75 29 2038201	Feb-20	44.8'	Rock Formation 11x5x3		
Bellevue-5 18Feb2020	BEL5 43.9	Bellevue	39 45 3429762	75 29 1729188	Feb-20	43.9'	Boulder Like 10x7x4.5		
Bellevue-4 18Feb2020	BEL4 42.5	Bellevue	39 45 5419616	75 28 9948336	Feb-20	44.7'	Removed 4 boulders on 18June20 (8'x9'x7', 8'x7'x3', 5'x5'x5', 4'x5'x3') Large object still remains @44.7' as of 19June20	Old Bellevue 1 AS 12 object Now two objects	
Bellevue-2 18Feb2020	BEL2 44.2	Bellevue	39 46 3915786	75 28 2196111	Feb-20	44.2'	Boulder Like 5x5x3		

Bellevue-1 18Feb2020	BEL1 44.4	Bellevue	39 46 6897288	75 27 9177651	Feb-20	45.0	Boulder Like (5x5x4.5) with large scour surrounding it	Now @ 45' as of 5/27/2020, significantly lower than the last survey @ 44.4'. Likely not a hazard.	
Bellevue-10 19Feb2020	BEL10 44.1	Bellevue	39 46 8540512	75 27 7836375	Feb-20	44.1'	Very Flat Top Boulder (4x3x3)		
Bellevue-11 19Feb2020	BEL11 44.4	Bellevue	39 46 8785777	75 27 6585711	Feb-20	44.4'	Boulder Like 7.5x5x3		
Bellevue-12 19Feb2020	BEL12 44.5	Bellevue	39 46 8954028	75 27 6577590	Feb-20	44.5'	Boulder Like (2.5x2.5x2) Not much detail		

TGT Name	Map Label	Area or Range	Latitude	Longitude	Date Found	Min Depth (MLLW) 400KHZ	Comments	Comments 2	Approximate Dimensions (LxWxH)
Bellevue-14 19Feb2020	BEL14 44.9	Bellevue	39 46 9438532	75 27 5815086	Feb-20	44.9'	Boulder 5x4x2.5	Significant elevation change to 45.3' as of 5/27/20, likely not hazardous but possibly should be considered for removal as a precaution.	
Bellevue-13 19Feb2020	BEL13 45.1	Bellevue	39 46 9567131	75 27 6119831	Feb-20	45.1'	Boulder Like		
Marcus Hook-6 19Feb2020	MAR6 44.9	Marcus Hook	39 47 0641919	75 27 4509557	Feb-20	44.9'	Possible displaced material or boulder right next to a spud mark 4.5x5x2.5		
Marcus Hook-8 19Feb2020	MAR8 44.2	Marcus Hook	39 47 2146079	75 27 0434768	Feb-20	44.2'	Boulder Like - Flat on one side 5x6x5		
Marcus Hook-7 19Feb2020	MAR7 45.1	Marcus Hook	39 47 2332691	75 27 2063473	Feb-20	45.1'	Possible Rock Formation attached to bottom		8.5x7.5x3.5

Marcus Hook-9 19Feb2020	MAR9_44.7	Marcus Hook	39 47.2746219	75 27.0167164	Feb-20	44.7'	Boulder Like 4.5x4x4		
Marcus Hook-10 19Feb2020	MAR10_44.1	Marcus Hook	39 47.2845093	75 27.0041694	Feb-20	44.1'	Boulder Like (Big with very flat top) 7.5x9.5x3.5		
Marcus Hook-11 19Feb2020	MAR11_44.7	Marcus Hook	39 47.2961313	75 26.9869702	Feb-20	44.7'	Boulder Like 5x5x3		
Marcus Hook-12 19Feb2020	MAR12_44.6	Marcus Hook	39 47.3391540	75 26.8967299	Feb-20	44.6'	Boulder Like, but could be displaced material from depression immediately beside 7.5x7.5x4		
Marcus Hook-13 19Feb2020	MAR13_44.4	Marcus Hook	39 47.3809071	75 26.8125558	Feb-20	44.4'	Boulder Like, but could be a bottom feature 5.7x5x2.7		
Marcus Hook-14 19Feb2020	MAR14_44.6	Marcus Hook	39 47.5277847	75 26.5686033	Feb-20	44.6'	2 small boulder like objects immediately next to eachother @ 44.6' & 44.8'		
Marcus Hook-15 19Feb2020	MAR15_44.4	Marcus Hook	39 47.5455437	75 26.5359405	Feb-20	44.4'	2 small objects that look like possible bottom features, the shoalest @ 44.4'		
Marcus Hook-16 19Feb2020	MAR16_45.0	Marcus Hook	39 47.5847901	75 26.3315901	Feb-20	45'	2 boulder like objects immediately next to eachother, one very flat and one with a sharp peak. Shoalest @ 45'		
Marcus Hook-37 20Feb2020	MAR37_44.7	Marcus Hook	39 47.8353933	75 26.0856816	Feb-20	44.7'	Boulder Like 4.5x4x4		
Marcus Hook-38 20Feb2020	MAR38_44.5	Marcus Hook	39 47.8964475	75 25.9660232	Feb-20	44.5'	Mound like right next to a deep void, could be a bottom feature or displaced material.		5.5x8x3.5
Marcus Hook-39 20Feb2020	MAR39_40.1	Marcus Hook	39 48.1872697	75 25.3848909	Feb-20	40.1'	Multiple Rocks above 45', The shoalest is a flat top rock @ 40.2'	NEEDS TO BE CHARTED	
Marcus Hook-40 20Feb2020	MAR40_44.0	Marcus Hook	39 48.2040088	75 25.3472067	Feb-20	44.0'	Boulder Like 10x7.5x4.5		
Marcus Hook 5_24Apr2020	MAR46_43.8	Marcus Hook	39 49.025972 N	075 23.436082 W	24-Mar-20	43.8'	Boulder like		7x5.5x4.5
Marcus Hook 4_24Apr2020	MAR45_44.1	Marcus Hook	39 49.067745 N	075 23.313774 W	24-Mar-20	44.1'	Big cluster of what looks to be possible boulder/boulders mixed in with rock formations possible attached to bottom. Multiple soundings between 44.5-44.9. Shoalest single peak/boulder @ 44.1'		14x6x4
Marcus Hook-14- 24Apr2020	MAR55_43.3	Marcus Hook	39 49.108487 N	075 23.494861 W	24-Mar-20	43.3'	Boulder like		4.5x5x3
Marcus Hook 9_24Feb2020	MAR50_44.2	Marcus Hook	39 49.120767 N	075 23.387063 W	24-Mar-20	44.2'	Boulder like		4.5x5x4
Marcus Hook 13_24Apr2020	MAR54_42.7	Marcus Hook	39 49.123571 N	075 23.476498 W	24-Mar-20	42.7'	Jagged rock pinnacle, possibly attached to bottom		9x4.5x3.5
Marcus Hook 10_24Apr2020	MAR51_43.6	Marcus Hook	39 49.127721 N	075 23.451279 W	24-Mar-20	43.6'	Boulder like		7.5x6.5x5

TGT Name	Map Label	Area or Range	Latitude	Longitude	Date Found	Min Depth (MLLW) 400KHZ	Comments	Comments 2	Approximate Dimensions (LxWxH)
Marcus Hook 6_24Apr2020	MAR47_44.4	Marcus Hook	39 49.130142 N	075 23.347749 W	24-Mar-20	44.4'	Boulder like		9x11.5x5
Marcus Hook 11_24Apr2020	MAR52_42.9	Marcus Hook	39 49.133431 N	075 23.457871 W	24-Mar-20	42.9'	Boulder like		7.5x6.5x4
Marcus Hook 2_24Apr2020	MAR43_44.9	Marcus Hook	39 49.134585 N	075 23.176038 W	24-Mar-20	44.9'	Boulder like		8x5.5x5
Marcus Hook-19 20Feb2020	MAR19_44.6	Marcus Hook	39 49.1369663	75 23.3325205	Feb-20	44.6'	Boulder Like (5.5x5x4.5) surrounded by multiple other boulders just below 45'		
Marcus Hook 8_24Apr2020	MAR49_44.5	Marcus Hook	39 49.138592 N	075 23.374069 W	24-Mar-20	44.5'	Multiple small possible boulders, appears to be 3 separate above 45'. Data is not extremely clear.		11x3.5x2.5
Marcus Hook 7_24Apr2020	MAR48_44.5	Marcus Hook	39 49.139325 N	075 23.36878 W	24-Mar-20	44.5'	Multiple Small Boulders, 2 above 45'		11x4x3
Marcus Hook 12_24Apr2020	MAR53_42.0	Marcus Hook	39 49.141163 N	075 23.448993 W	24-Mar-20	42.0'	Boulder like		7.5x4.5x4
Marcus Hook-18 20Feb2020	MAR18_44.7	Marcus Hook	39 49.1487718	75 23.3310491	Feb-20	44.7'	Boulder Like, lots of noisy data		5x4x4
Marcus Hook-20 20Feb2020	MAR20_43.7	Marcus Hook	39 49.1514698	75 23.3229024	Feb-20	43.7'	Multiple Boulders above 45', shoalest is large boulder @ 43.7'	(Large boulder @ 43.7')	11x9.5x5
Marcus Hook-24 20Feb2020	MAR24_44.9	Marcus Hook	39 49.1531081	75 23.2788974	Feb-20	44.9'	Possible Bottom Features/ Mounds		6.5x6.5x3
Marcus Hook-17 20Feb2020	MAR17_44.6	Marcus Hook	39 49.1614078	75 23.3480235	Feb-20	44.6'	Boulder Like 4.5x5.5x3		
Marcus Hook-21 20Feb2020	MAR21_43.1	Marcus Hook	39 49.1680679	75 23.3301442	Feb-20	43.1'	Tall narrow boulder 5.5x5.5x5.5		
Marcus Hook-23 20Feb2020	MAR23_44.1	Marcus Hook	39 49.1739109	75 23.3049486	Feb-20	44.1'	Boulder like 6x4.5x4		
Marcus Hook-22 20Feb2020	MAR22_43.6	Marcus Hook	39 49.1749274	75 23.3163261	Feb-20	43.6'	Three boulders, One Above 45' 7.5x6.5x5		
Marcus Hook 3_24Apr2020	MAR44_44.8	Marcus Hook	39 49.178005 N	075 23.301626 W	24-Mar-20	44.8'	Possible boulder with flat top and sides		3x4x3.5
Marcus Hook-25 20Feb2020	MAR25_43.7	Marcus Hook	39 49.1834057	75 23.2717894	Feb-20	43.7'	Boulder Like 5.5x5x6		
Marcus Hook-26 20Feb2020	MAR26_45.1	Marcus Hook	39 49.1951071	75 23.2537825	Feb-20	45.1'	3 Large boulders, shoalest @ 45.1'	(shoalest boulder @ 45.1')	7.5x10x5.5
Marcus Hook-27 20Feb2020	MAR27_45.0	Marcus Hook	39 49.2013601	75 23.2460231	Feb-20	45'	Large boulder with very flat side 8x7x5.5		
Marcus Hook-28 20Feb2020	MAR28_44.0	Marcus Hook	39 49.2214121	75 23.1936454	Feb-20	44'	Boulder Like 4.5x7x5.5		
Marcus Hook-29 20Feb2020	MAR29_43.8	Marcus Hook	39 49.2935749	75 22.9411734	Feb-20	43.8'	Boulder Like 6x5.5x3.5		

Marcus Hook-41 20Feb2020	MAR41_44.8	Marcus Hook	39 49.2989372	75 22.9356878	Feb-20	44.8'	Three boulders, shoalest @ 44.8'		
Marcus Hook-32 20Feb2020	MAR32_44.9	Marcus Hook	39 49.3055230	75 22.8905907	Feb-20	44.9'	Boulder Like with flat top 6.2x5.5x3		
Marcus Hook-30 20Feb2020	MAR30_43.4	Marcus Hook	39 49.3078177	75 22.9441113	Feb-20	43.4"	Boulder Like 5x5x4.5		
Marcus Hook-31 20Feb2020	MAR31_43.9	Marcus Hook	39 49.3201568	75 22.9590947	Feb-20	43.9'	Boulder Like with 2 Peaks, the Shoalest @ 43.9'		
Marcus Hook-33 20Feb2020	MAR33_44.9	Marcus Hook	39 49.3399207	75 22.9573181	Feb-20	44.9'	Appears to be a bottom feature, possibly rock		

TGT Name	Map Label	Area or Range	Latitude	Longitude	Date Found	Min Depth (MLLW) 400KHZ	Comments	Comments 2	Approximate Dimensions (LxWxH)
Marcus Hook-34 20Feb2020	MAR34_44.8	Marcus Hook	39 49.3444743	75 22.9520358	Feb-20	44.8'	Boulder Like 10.5 x6.5x 4		
Marcus Hook-35 20Feb2020	MAR35_43.0	Marcus Hook	39 49.3533900	75 22.9579818	Feb-20	43'	Boulder Like with one flat side 7x5x5.5		
Marcus Hook 1_24Apr2020	MAR42_44.7	Marcus Hook	39 49.369801 N	075 22.97915 W	24-Mar-20	44.7'	Multiple boulders, hard to distinguish if they could be rock formation attached to the bottom. One boulder/pinnacle @44.8'		10x3.5x3.5
Chester-8 20Feb2020	CHE8_44.4	Chester	39 49.728676 N	075 22.326548 W	Feb-20	44.4'	Boulder Like		
Chester-1 19Feb2020	CHE1_44.9	Chester	39 50.0067548	75 21.9009939	Feb-20	44.9'	Boulder Like 3x3x5		

Chester-2 19Feb2020	CHE2_45.2	Chester	39 50.0074190	75 21.8361779	Feb-20	45.2'	Boulder Like		8x4.5x2.5
Chester-3 19Feb2020	CHE3_44.5	Chester	39 50.0467376	75 21.7986814	Feb-20	44.5'	Boulder Like/unsure possibly part of bottom		10x7x4
Chester-4 19Feb2020	CHE4_44.9	Chester	39 50.0583576	75 21.8176506	Feb-20	44.9'	Two Boulders/ One above Grade 3x3x2		
Chester-5 19Feb2020	CHE5_44.0	Chester	39 50.2198747	75 21.5106202	Feb-20	44.0'	Boulder Like 5x5x2		
Chester-6 19Feb2020	CHE6_44.0	Chester	39 50.3576234	75 21.3268416	Feb-20	44.0'	Boulder 6.3x5x6.7		
Chester-7 19Feb2020	CHE7_44.8	Chester	39 50.3620618	75 21.3370037	Feb-20	44.8'	6 total Boulders/3 above grade shoalest @44.8'		
Eddystone-8 19Feb2020	EDD8_44.7	Eddystone	39 50.6740890	75 20.8060850	Feb-20	44.7'	Boulder 8 6x3 5x2.4		
Eddystone-2 13Feb2020	EDD2_44.5	Eddystone	39 50.8938823	75 20.0761187	Feb-20	43.5	Removed small boulder that was not original target. Original Object still there and possibly shifted by dredge		10x6x2
Eddystone-3 24Feb2020	EDD3_44.9	Eddystone	39 50.9308201	75 19.7973113	Feb-20	44.9'	Boulder 3x3x2.5		
Eddystone-1 13Feb2020	EDD1_44.7	Eddystone	39 50.9465340	75 19.7901921	Feb-20	44.7'	Boulder Like		5x4x2.5
Tinicum 1_4May2020	TIN1_44.7	Tinicum	39 50.924279 N	075 16.938312 W	5/4/2020	44.7'	Stand alone object with a flat side reaching a point, depression surrounding it		7x4x3
Mifflin 3_24Apr2020	MIF3_44.5	Mifflin	39 52.748403 N	075 11.536317 W	7-Apr-20	44.5'	Boulder like with scour surrounding it		4.5x3.5x2
Mifflin 2_24Apr2020	MIF2_44.1	Mifflin	39 52.750679 N	075 11.536298 W	7-Apr-20	44.1'	Jagged object with scour marks surrounding it and a long trailing section, could possibly be a suken tree that hasn't moved for a long time.		14x5x3
Mifflin 7_24Apr2020	MIF7_44.8	Mifflin	39 52.771219 N	075 11.517453 W	7-Apr-20	44.8'	Boulder like		3.5x4.5x2
Mifflin 1_24Apr2020	MIF1_43.8	Mifflin	39 52.774103 N	075 11.506083 W	7-Apr-20	43.8'	Multiple Small Boulders, 2 above 45'		8x3x2.5 (Both boulders together)
Mifflin 6_24Apr2020	MIF6_44.4	Mifflin	39 52.780714 N	075 11.639756 W	7-Apr-20	44.4'	Jagged boulder like, could be 2 objects very close to each other		5.5x4.5x2
Mifflin 8_24Apr2020	MIF8_44.6	Mifflin	39 52.788134 N	075 11.641501 W	7-Apr-20	44.6'	Boulder like		5x4x2.5
Mifflin 5_24Apr2020	MIF5_44.5	Mifflin	39 52.789828 N	075 11.620327 W	7-Apr-20	44.5'	Boulder like		4.5x4x3
Mifflin 4_24Apr2020	MIF4_43.5	Mifflin	39 52.801476 N	075 11.619974 W	7-Apr-20	43.5'	Boulder like		6.5x3x4

Eagle Pt 1 14Apr2020	EAG_44.1	Eagle Point	39 52.812574 N	075 10.111124 W	20-Apr 44.1'	Flat top, possible man made large object with other objects scattered close by	11'x4'x3'
Eagle Pt 7 14Apr2020	EAG7_44.2	Eagle Point	39 52.824807 N	075 11.425153 W	20-Apr 44.2'	Boulder Like	4.5x4x3

TGT Name	Map Label	Area or Range	Latitude	Longitude	Date Found	Min Depth (MLLW) 400KHZ	Comments	Comments 2	Approximate Dimensions (LxWxH)
Eagle Pt 2 14Apr2020	EAG2_43.7	Eagle Point	39 52.877424 N	075 11.233042 W	20-Apr 43.7'		Cluster of boulder like objects, one large one above 45'		7x4x4
Eagle Pt 6 14Apr2020	EAG6_44.6	Eagle Point	39 52.879158 N	075 11.412427 W	20-Apr 44.6'		Large Object with very uniform curve along top. Looks unnatural		18x4x3.5
Eagle Pt 5 14Apr2020	EAG5_43.9	Eagle Point	39 52.9425 N	075 11.331935 W	20-Apr 43.9'		Pinnacle like object with a sharp angle at shallowest point		7x5.5x3.5
Eagle Pt 3 14Apr2020	EAG3_44.1	Eagle Point	39 52.970667 N	075 11.276413 W	20-Apr 44.7'		Boulder Like		4x3.5x2.5
Eagle Pt 4 14Apr2020	EAG4_43.7	Eagle Point	39 52.983602 N	075 11.284047 W	20-Apr 43.7'		Large mound like object that doesn't appear to be part of the bottom or shoal		9x6x3
Schuylikill_08Jan20	SCH1_31.6	Schuylikill	39 53.275063 N	075 11.698723 W	20-Jan 31.6			Possible tree	
Phila Harbor_28May2020	HAR1_35.7	Phila Harbor	39 54.334224 N	075 07.940211 W	20-May 35.7'		Discussed on 15 June coordination call with pilots. Low priority for removal at this time. Notification sent 16 June, requested obstruction to be charted	multiple objects just outside of channel	
Phila Harbor 4_16June2020	HAR5_38.7	Phila Harbor	39 57.692964 N	075 07.925196 W	16-Jun-20 38.7'		Possible Boulder		
Phila Harbor 3_16June2020	HAR4_38.4	Phila Harbor	39 57.703381 N	075 07.908944 W	16-Jun-20 38.4'		Two Possible boulders within 25' of each other		
Phila Harbor 2_16June2020	HAR3_39.9	Phila Harbor	39 58.011515 N	075 07.35325 W	16-Jun-20 39.9'		Possible Boulder		
Phila Harbor 1_16June2020	HAR2_21.0	Phila Harbor	39 58.163308 N	075 07.013911 W	16-Jun-20 21'		Multiple objects in shoal working into the channel		
Frankford 1	FRA1_39.7	Frankford	40 0.93065 N	075 2.098571 W	19-Dec 39.7'			Possible tree	

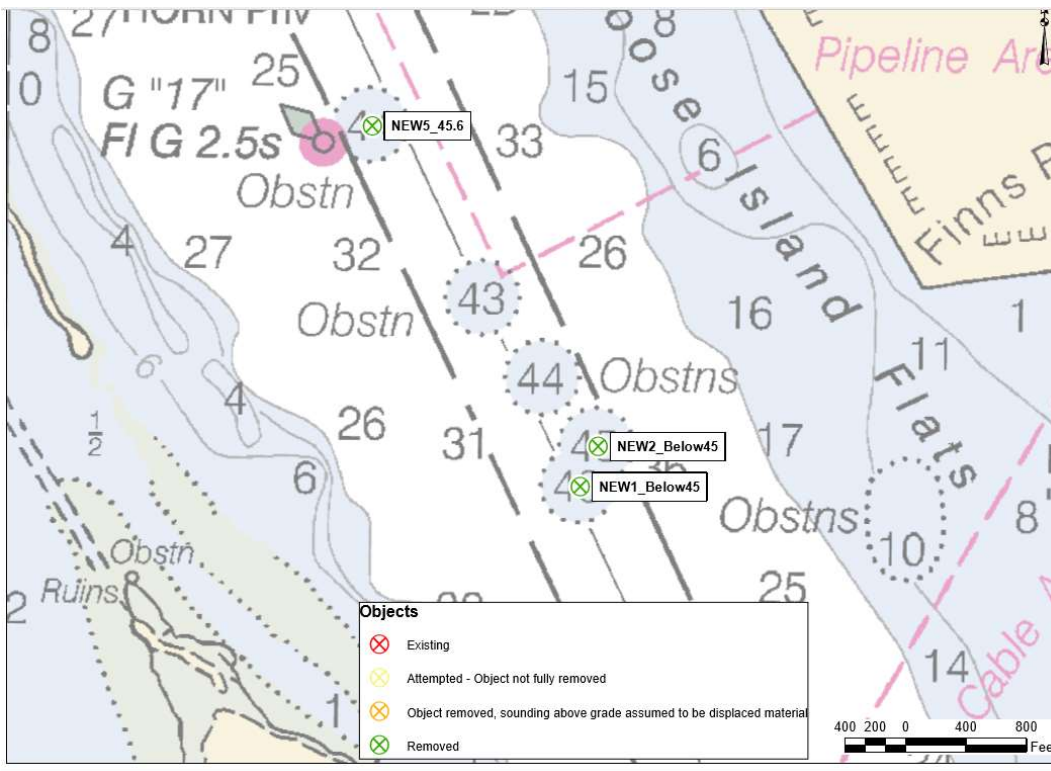
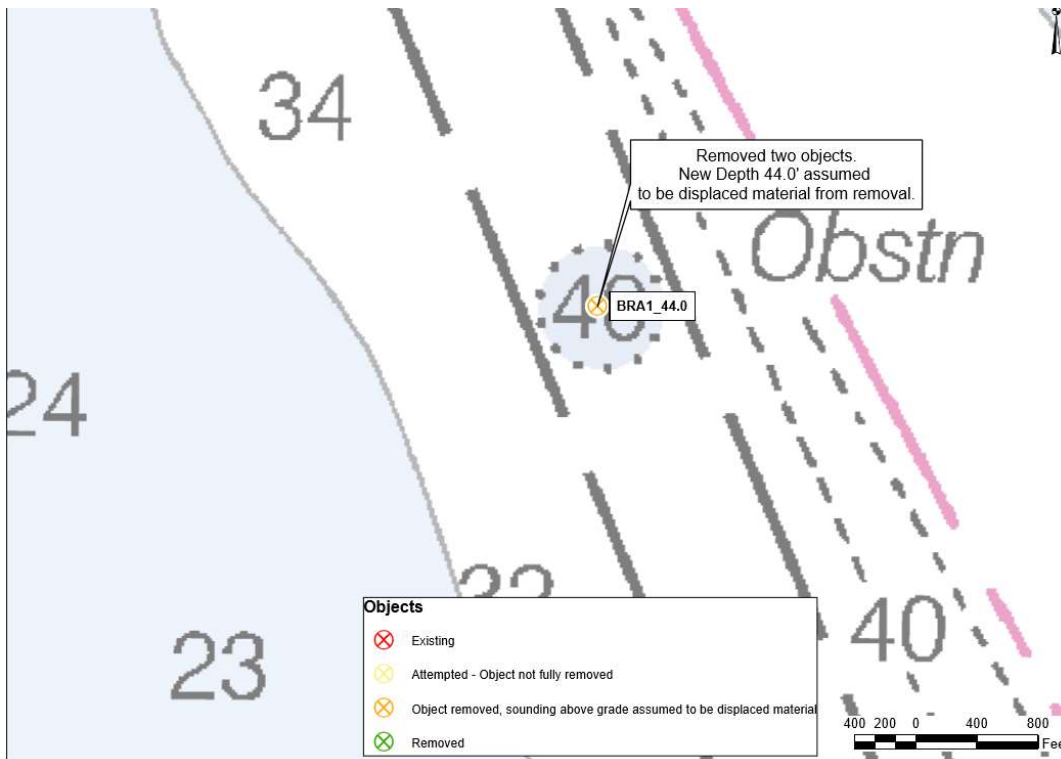
Mud Island 2	MUD2_36.2	Mud Island	40 02.56321 N	074 59.02575 W	19-Dec 36.2			Possible tree	60' long
Edgewater_30Dec19	EDG1_37.1	Edgewater	40 04.32016 N	074 54.581715 W	Dec-19 37.1'			Possible Tree	30' long
Tacony 1	TAC1_39.8	Tacony	40 1.019428 N	075 1.719766 W	19-Dec 39.8				
Torresdale 1	TOR1_38.5	Torresdale	40 2.249855 N	074 59.435075 W	Jun-19 38.5		Orange peel likely scraped top of rock/very large boulder, not recovered	Possibly two boulders within 10' of each other. Other boulder 39.2 depth	10'x10'x3'
Mud Island 1	MUD1_39.5	Mud Island	40 3.127005 N	074 58.028192 W	Jun-19 39.5		Orange peel likely scraped top of rock/very large boulder, not recovered	Possible boulder	8'x4'x3'
LEGEND									
		Not attempted / Red symbol on chartlets							
		Attempted removal, object not fully removed. *See Comments							
		Objects removed, sounding above grade assumed to be displaced material *see removed shoal remains tab / unhide rows							
		Objects removed and surveys show clear to authorized depth in vicinity. *see Removed - Cleared tab							

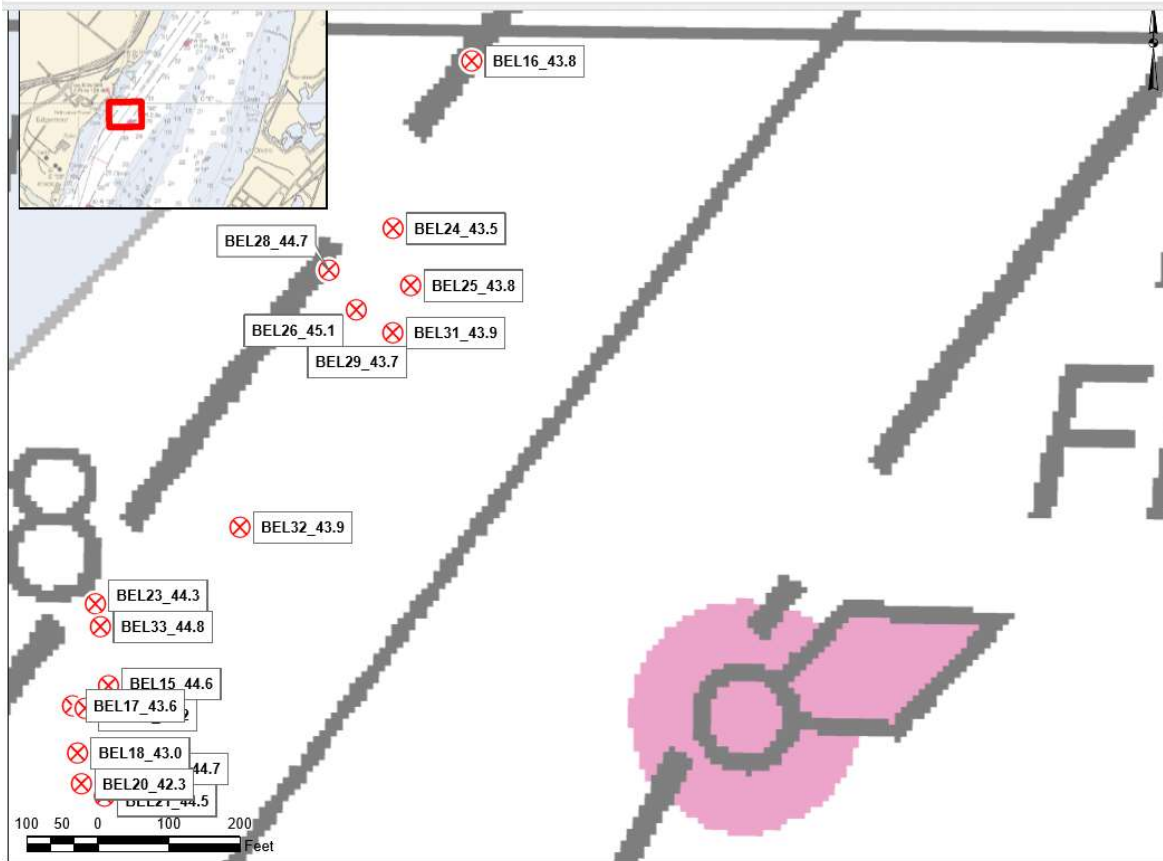
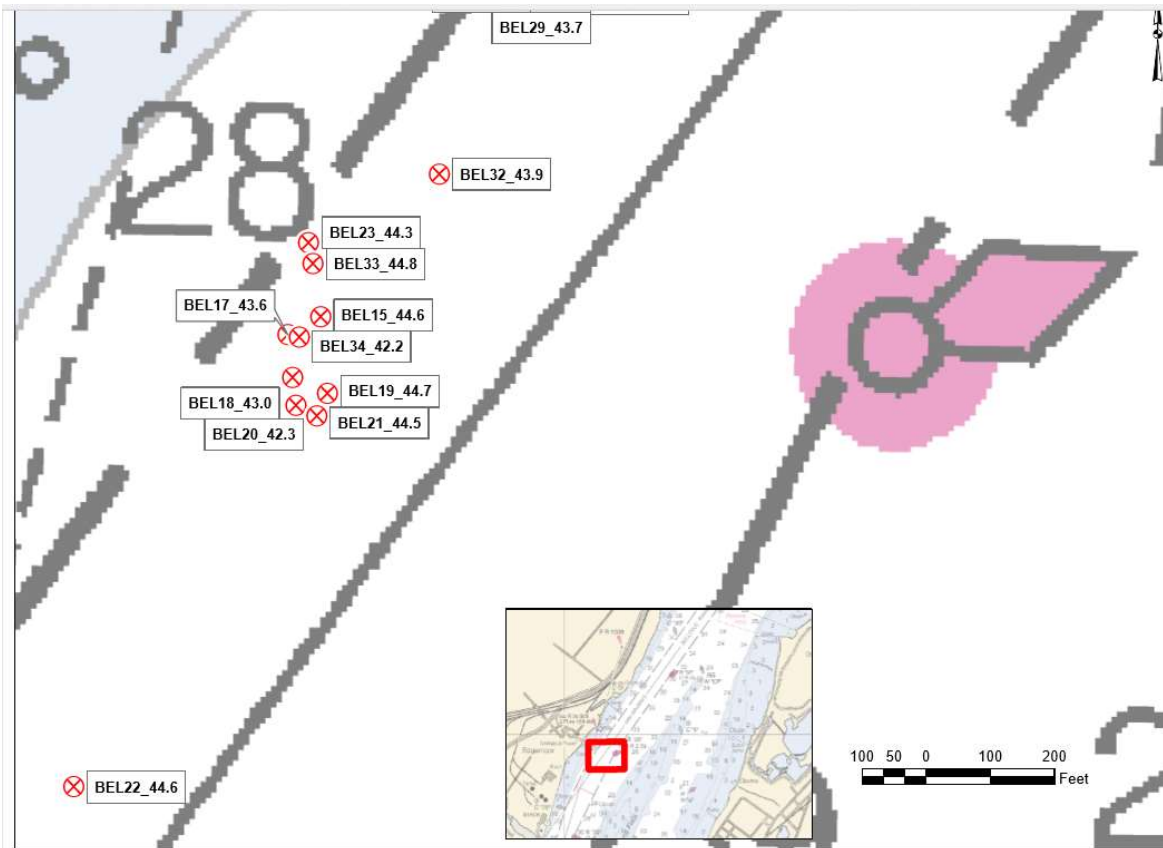
OBJECTS REMOVED - SHOAL REMAINS FROM DISPLACED MATERIAL

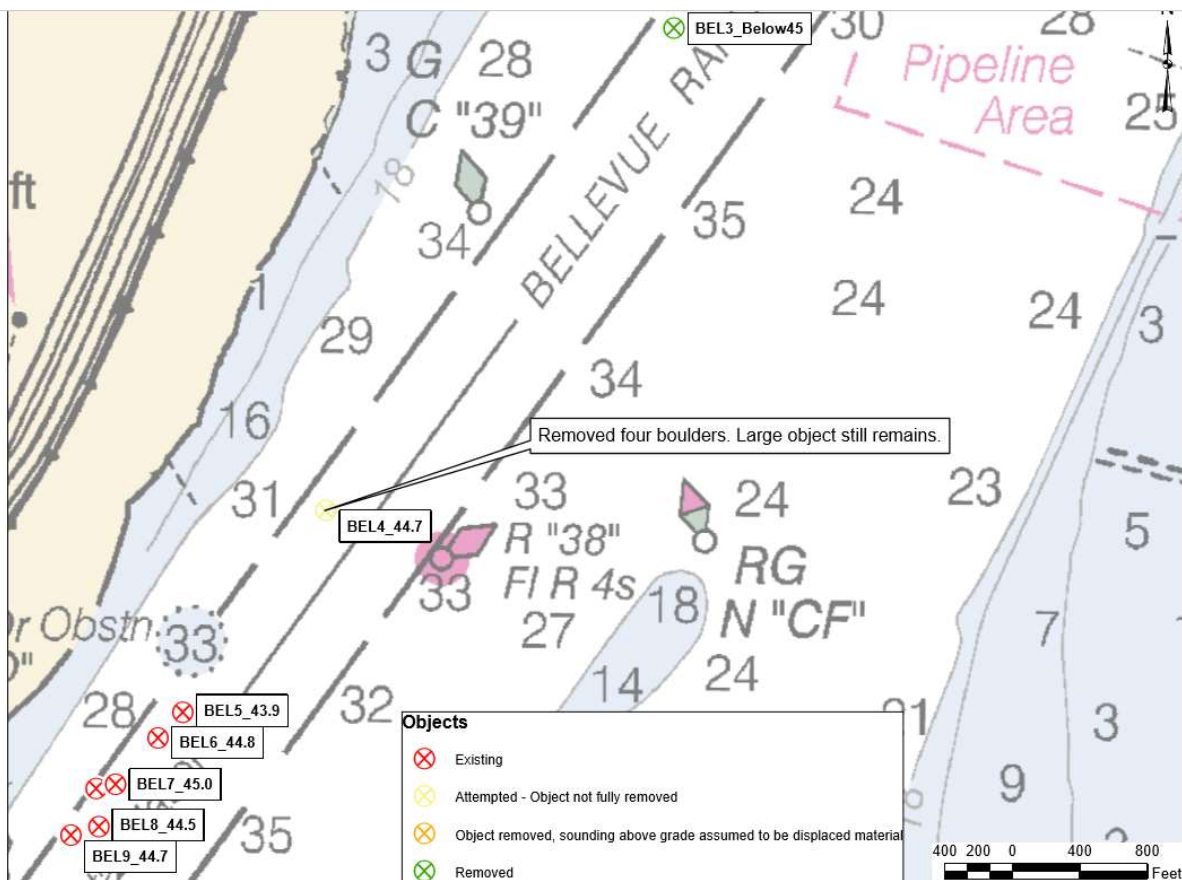
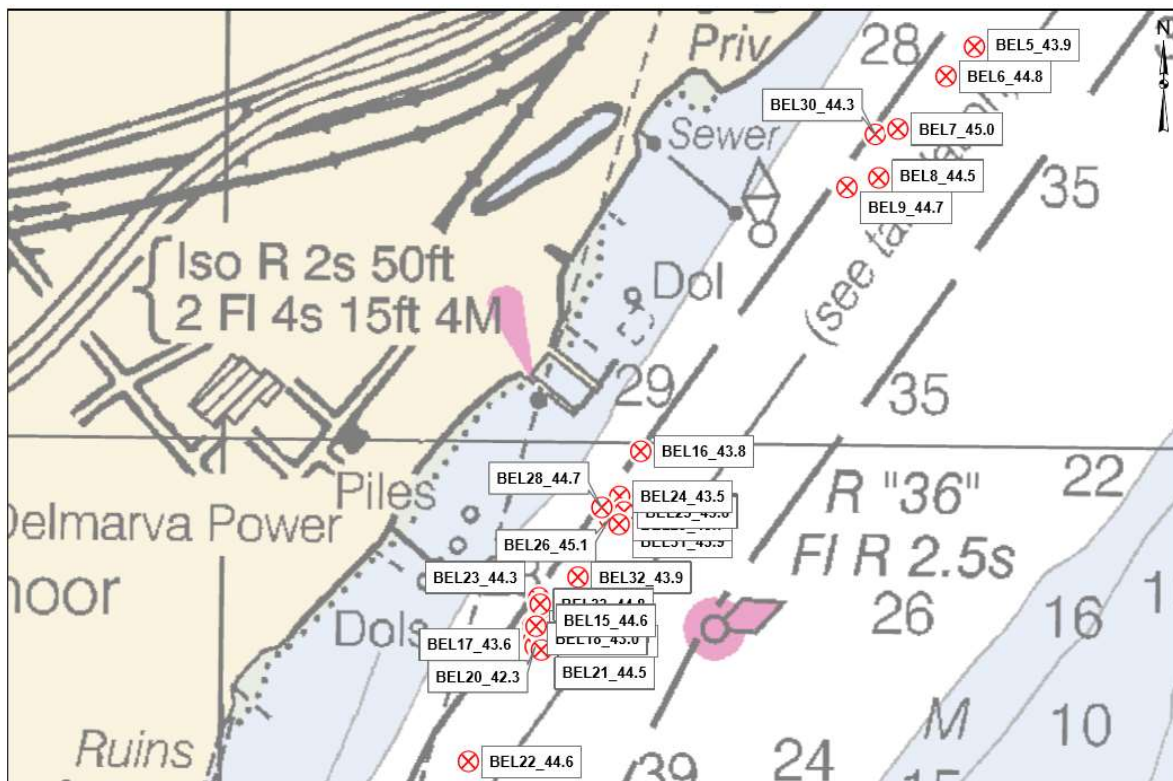
TGT Name	Map Label	Area or Range	Latitude	Longitude	Comments	Comments 2	Removal Notes	New Depth
Canal 4	CDC4_38.3	Canal Approach	39 33.50.84 N	075 32.58.67 W	Removed 2 objects: Navigation Buoy(7'x9x), Buoy Block(4'x4') on 15June20, and one object: Mangled Pipe(9'x4')on 16June20. New Depth 38.3 assumed to be displaced material from removal		Removed 2 objects: Navigation Buoy(7'x9x), Buoy Block(4'x4') on 15June20, and one object: Mangled Pipe(9'x4')on 16June20. New Depth 38.3 assumed to be displaced material from removal	38.3'
Deepwater 1	DEE1_44.7	Deepwater	39 38.0791 N	075 34.109606 W	Removed multiple objects on 17June20 Area cleared by Cherneski. Boat Fender(4'x17'x1') Buoy Can(8'x6') Bouy marker pipe(6'x1') New depth of 44.7' assumed to be displaced material from removal		Removed multiple objects on 17June20 Area cleared by Cherneski. Boat Fender(4'x17'x1') Buoy Can(8'x6') Bouy marker pipe(6'x1') New depth of 44.7' assumed to be displaced material from removal	44.7'
Brandywine 1	BRA1_44.0	Brandywine	39 4.502609 N	75 10.835414 W	Removed 2 Objects: Buoy with chain and Buoy Block on 23June20. New Depth 44' assumed to be displaced material from removal		Removed 2 Objects: Buoy with chain and Buoy Block on 23June20. New Depth 44' assumed to be displaced material from removal	44.0'
Bellevue 11_4May2020	BEL18_43.0	Bellevue	39 44.833581 N	075 29.654131 W	Multiple jagged objects with one large one @ 43', other smaller objects just above 45'. Could be scattered loose rock or a mixture of attached and loose obstructions.	11x6.5x3.5 (single large object) / 29x12 (area that all sattered objects are included in)	Removed Multiple boulders on 25June. New depth of 44.3' as	44.3'
Bellevue 6_4May2020	BEL31_43.9	Bellevue	39 44.93163 N	075 29.56094 W	Boulder like		Multiple boulders removed. New depth of 44.5' assumed to be displaced material	44.5'

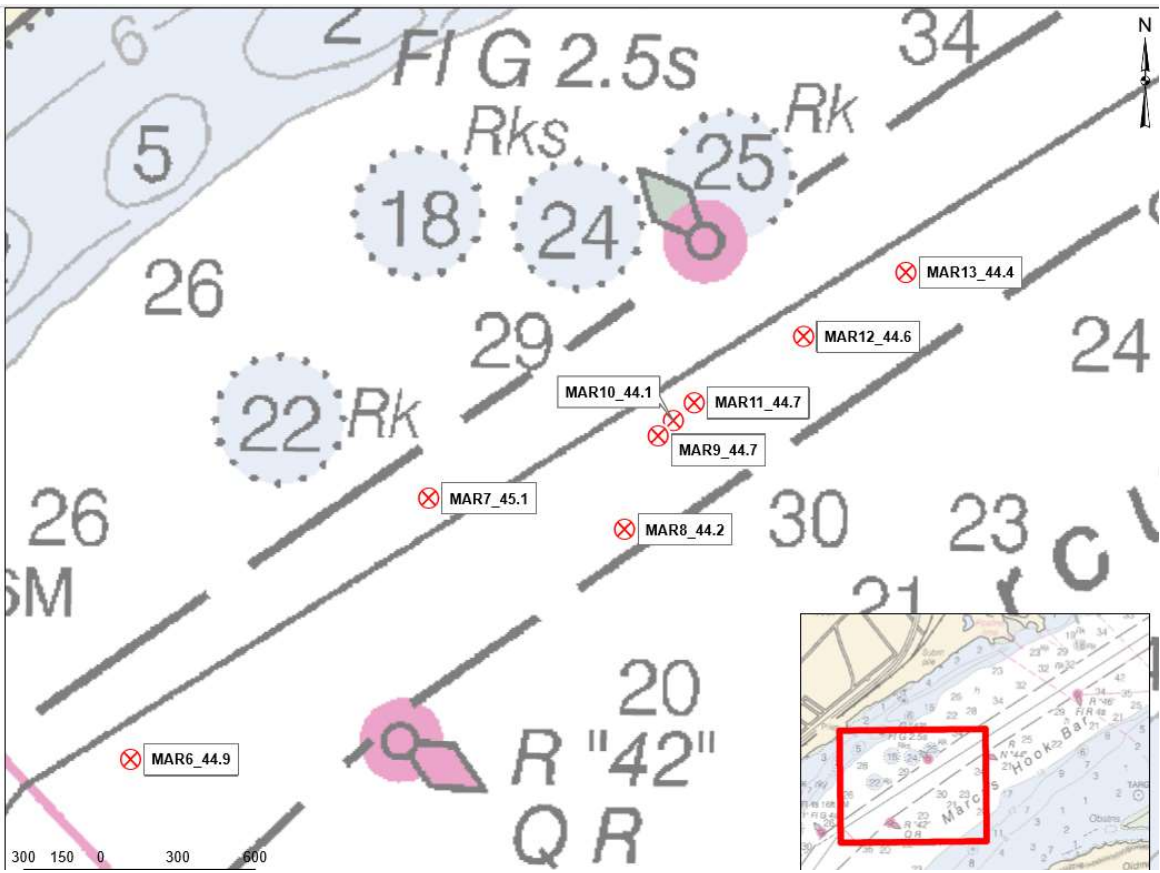
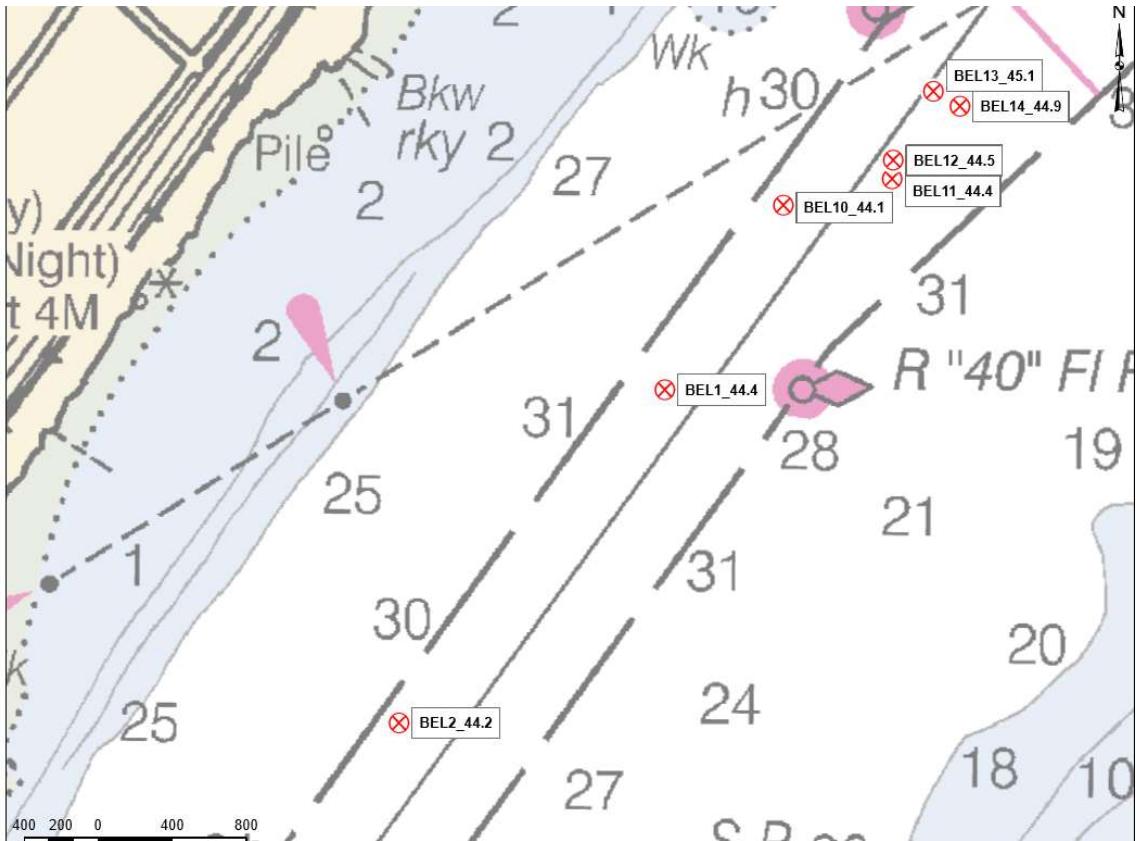
OBJECTS REMOVED - SURVEY SHOWS AREA CLEAR BELOW AUTHORIZED DEPTH

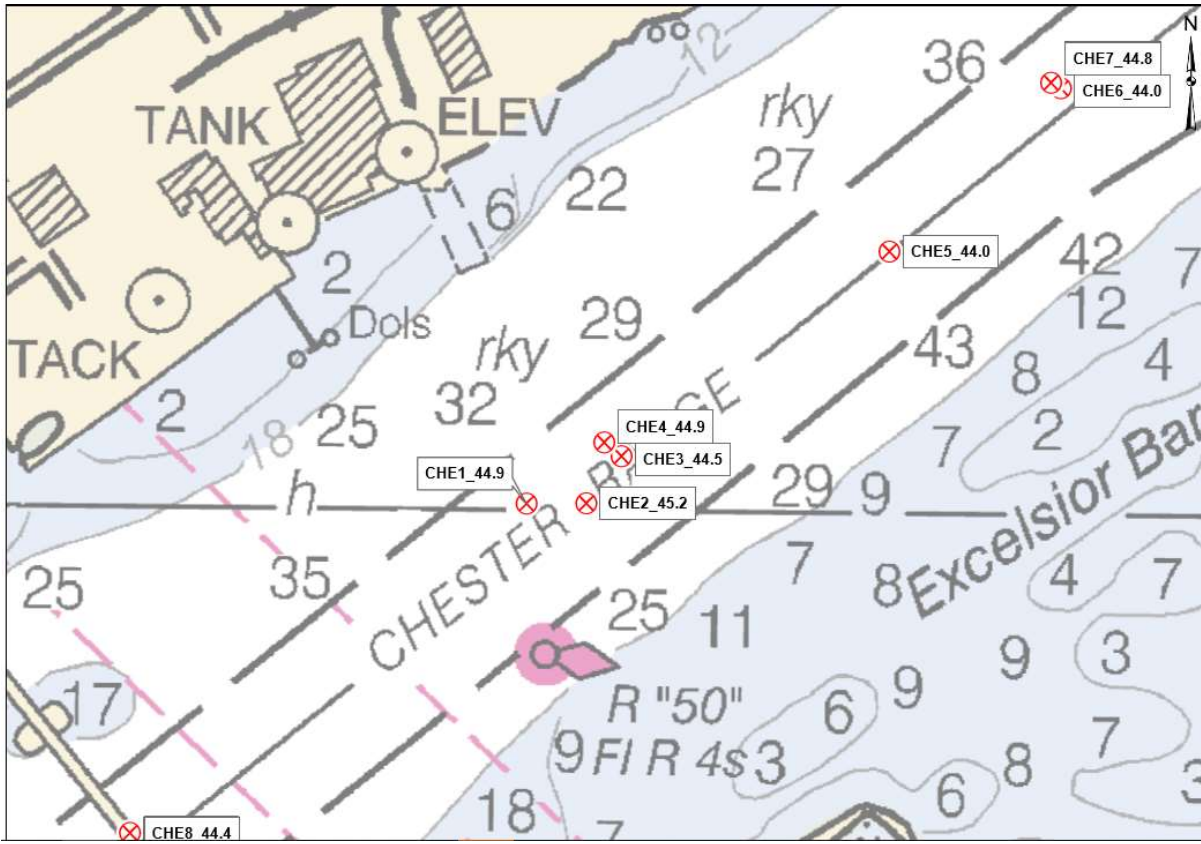
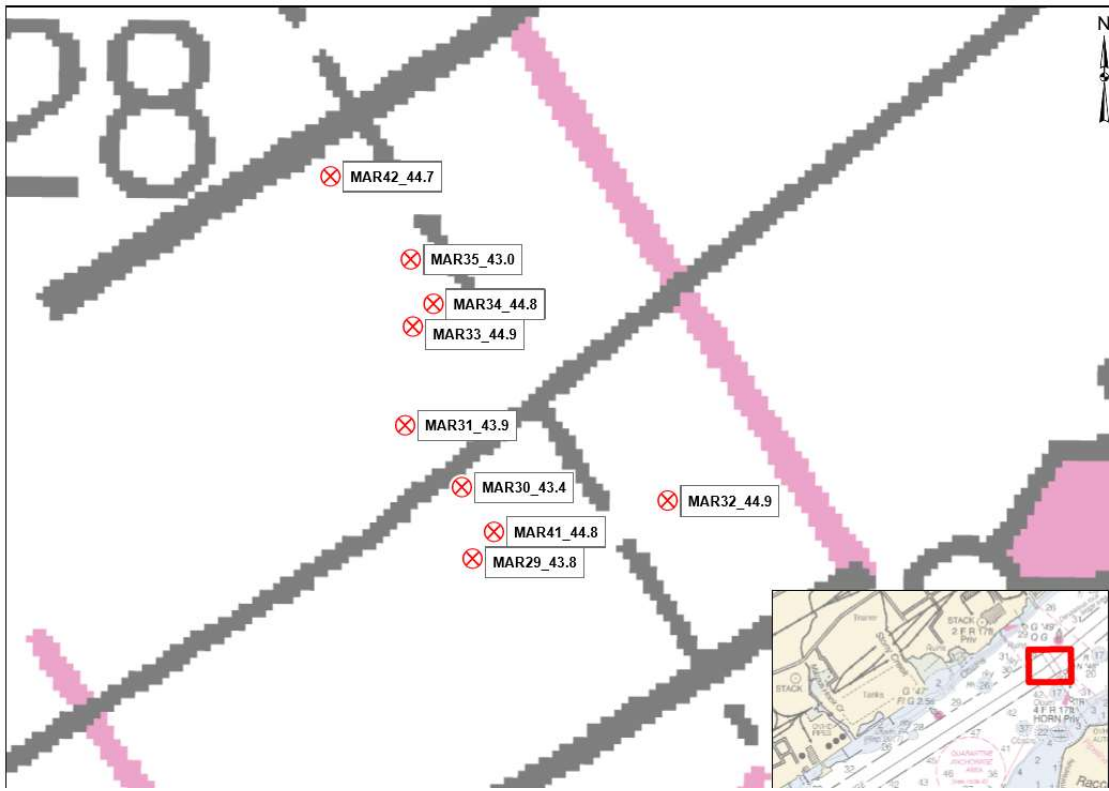
TGT Name	Map Label	Project	Area or Range	Station	Latitude	Longitude	Date Removed	Removal Notes					
New Castle 1	NEW1_Below45	Phila to Sea	New Castle	219+000	39 36.095822 N	075 34.18895 W	17-Jun-20	Removed Boulder on 17June Area cleared by Cherneski Area Below 45					
New Castle 2	NEW2_Below45	Phila to Sea	New Castle	218+800	39 36.139799 N	075 34.1641 W	17-Jun-20	Removed Boulder on 17June Area cleared by Cherneski Area below 45					
New Castle 5	NEW5_45.6	Phila to Sea	New Castle	216+250	39 36.486611 N	075 34.488215 W	17-Jun-20	Removed Boulder on 17June Area cleared by Cherneski Three objects in vicinity below 45.					
Bellevue-3 18Feb2020	BEL3_Below45	Phila to Sea	Bellevue		39 46.0167363	75 28.5609356	19-Jun-20	Removed small boulder on 19June20.					
Bellevue 6 9June2020	BEL30_44.3	Phila to Sea	Bellevue		39 45.26751 N	075 29.281416 W	26-Jun-20	Removed Boulder Area cleared below 45 by Cherneski					
Bellevue 2_4May2020	BEL24_43.5	Phila to Sea	Bellevue		39 44.955796 N	075 29.561161 W	25-Jun-20	Removed multiple boulders on 25June20. Area cleared below 45 by Cherneski					
Bellevue 2 9June2020	BEL23_44.3	Phila to Sea	Bellevue		39 44.868178 N	075 29.649299 W		Removed multiple boulders on 25June20. Area cleared below 45 by Cherneski.					
Bellevue 4 9June2020	BEL26_45.1	Phila to Sea	Bellevue		39 44.936835 N	075 29.571963 W		Removed multiple boulders on 25-26June20. Area cleared to 45.1 by Cherneski					

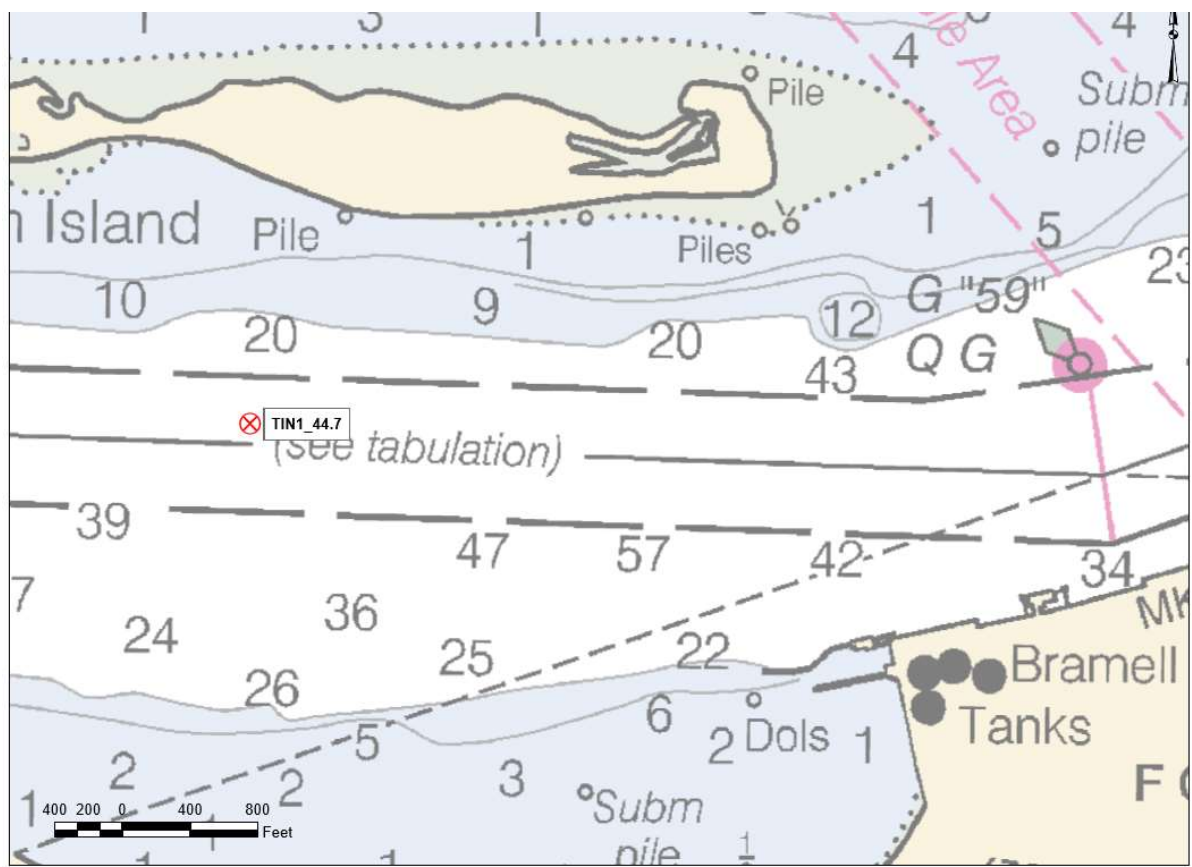
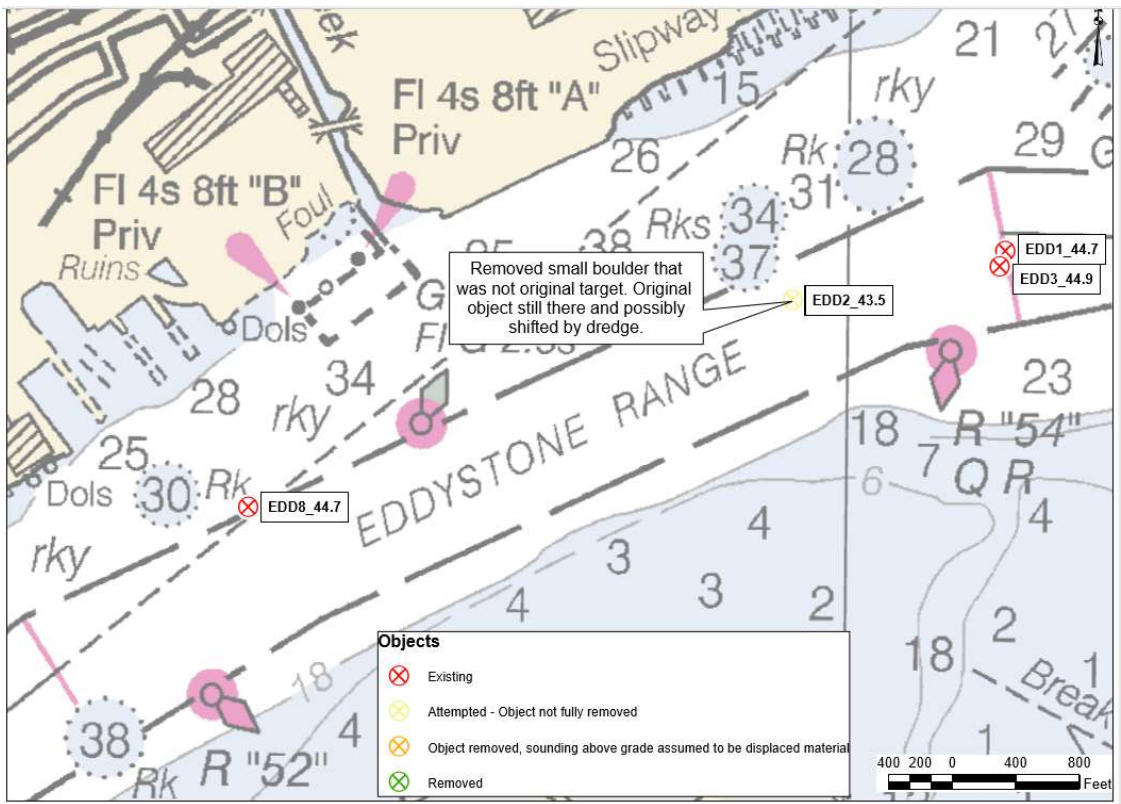


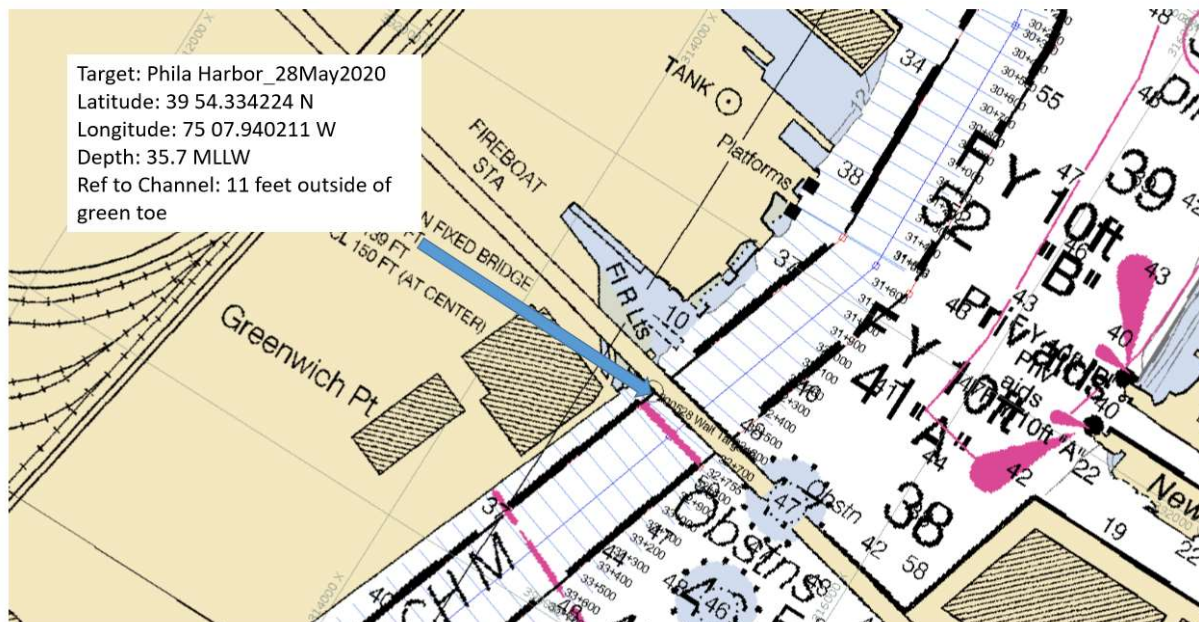
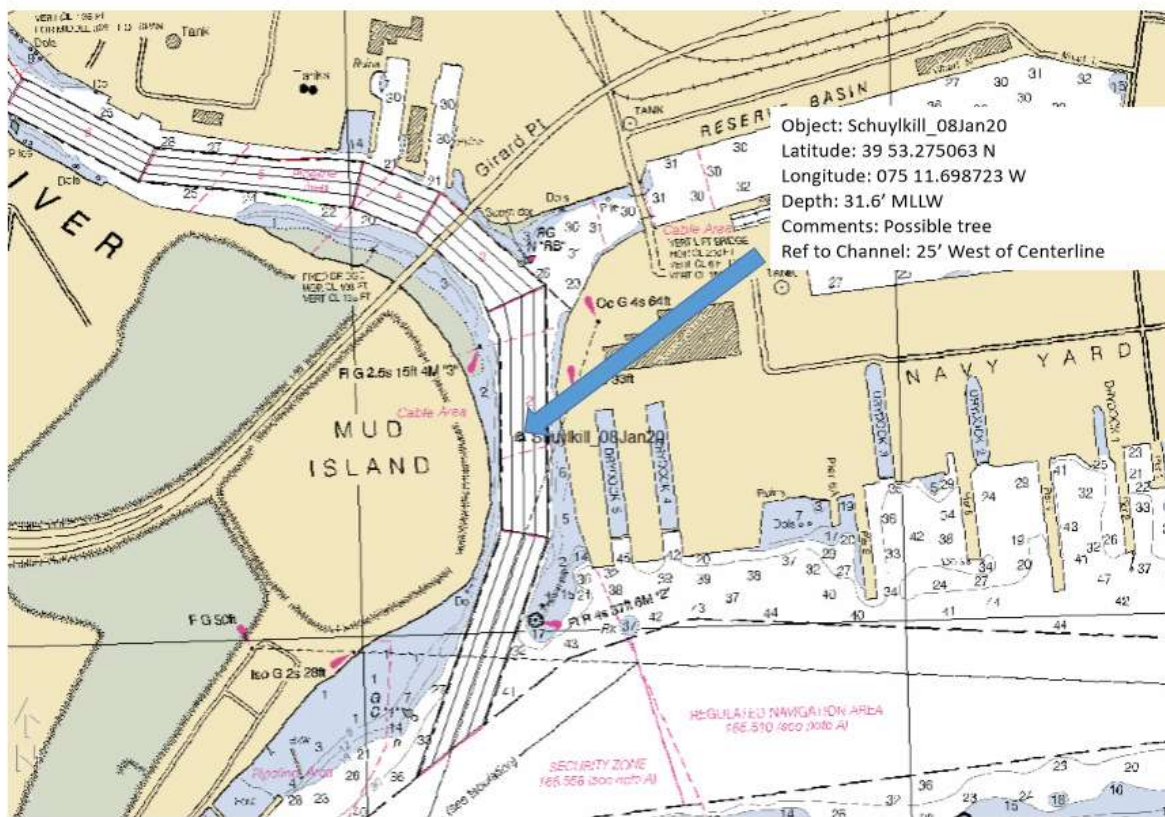


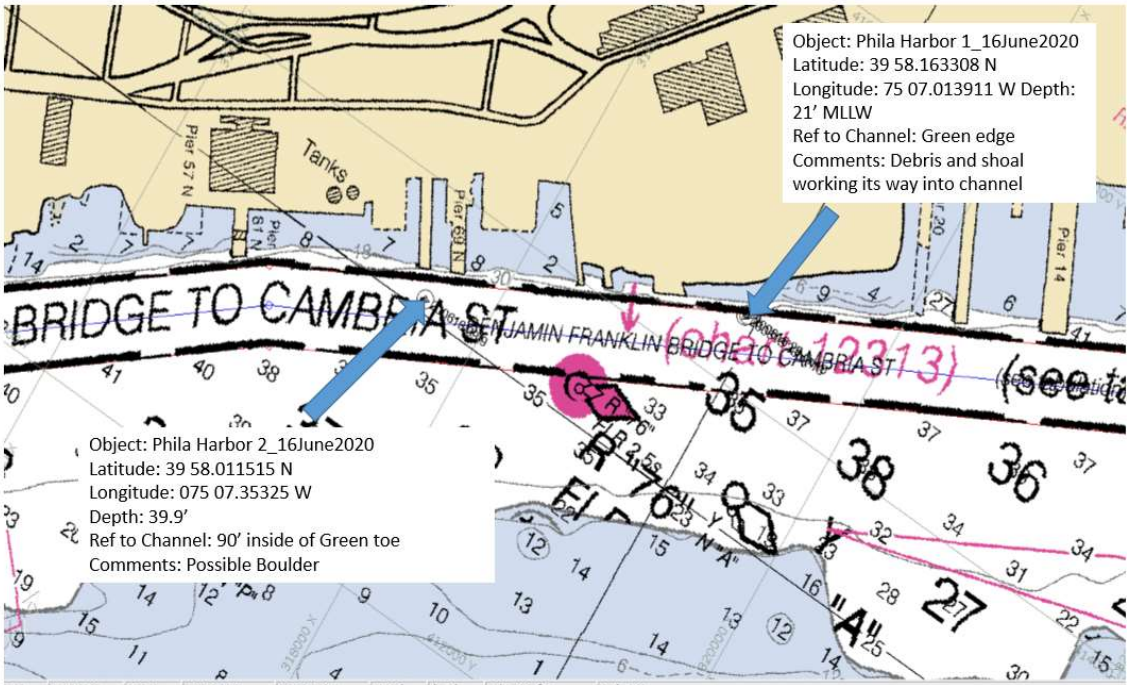
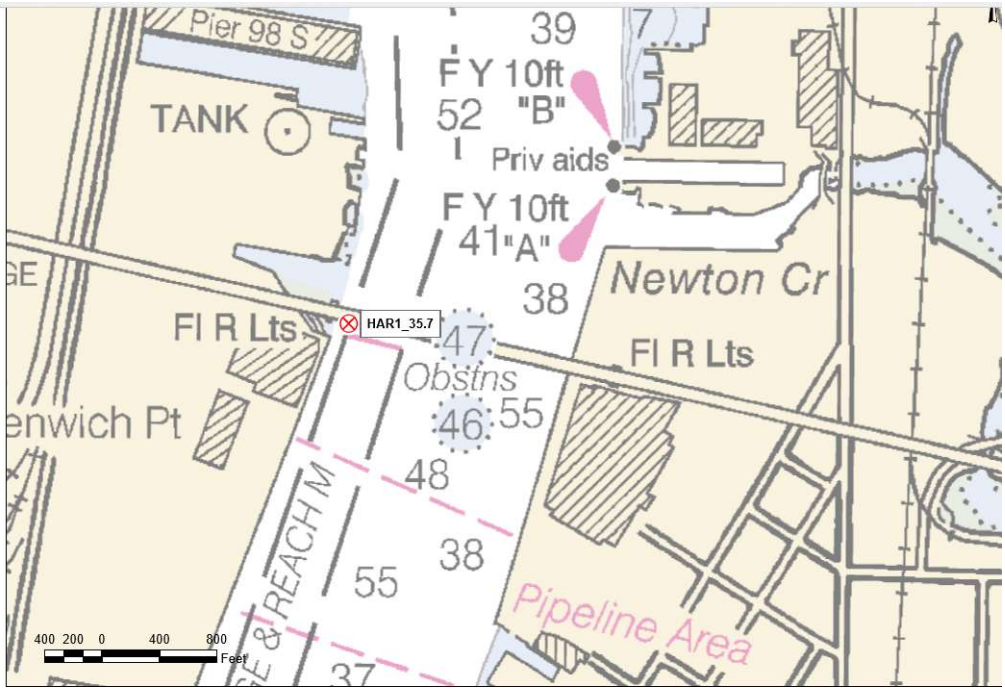


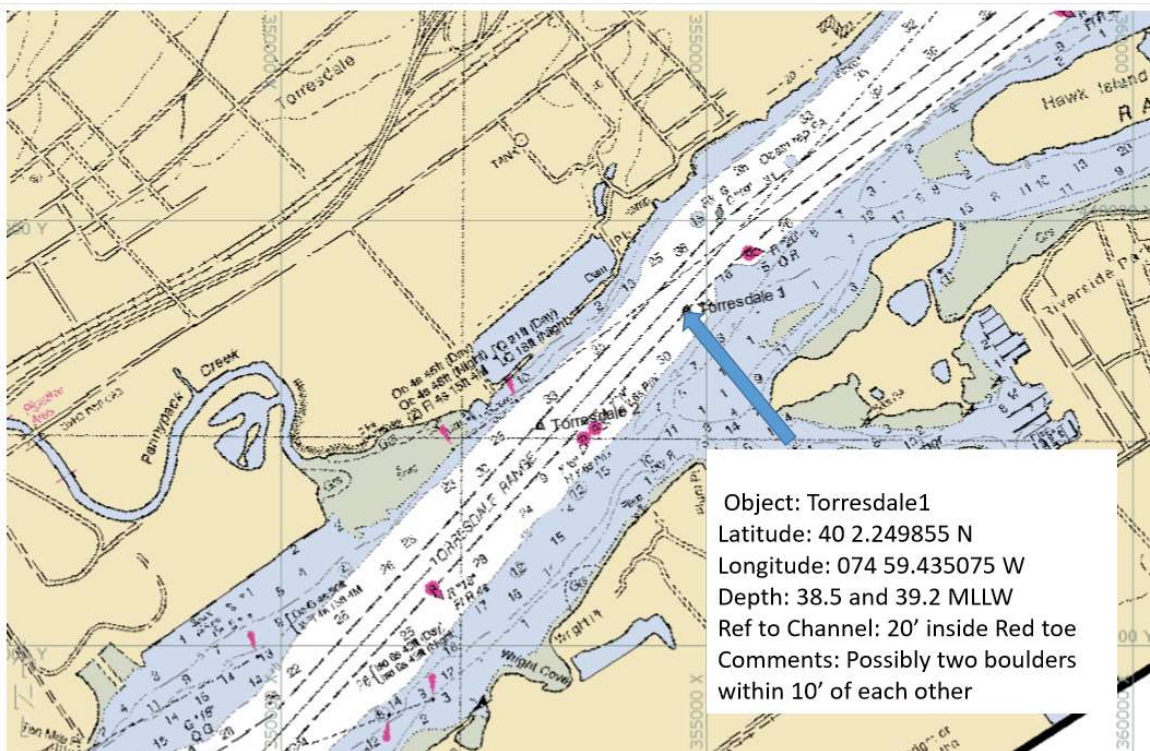
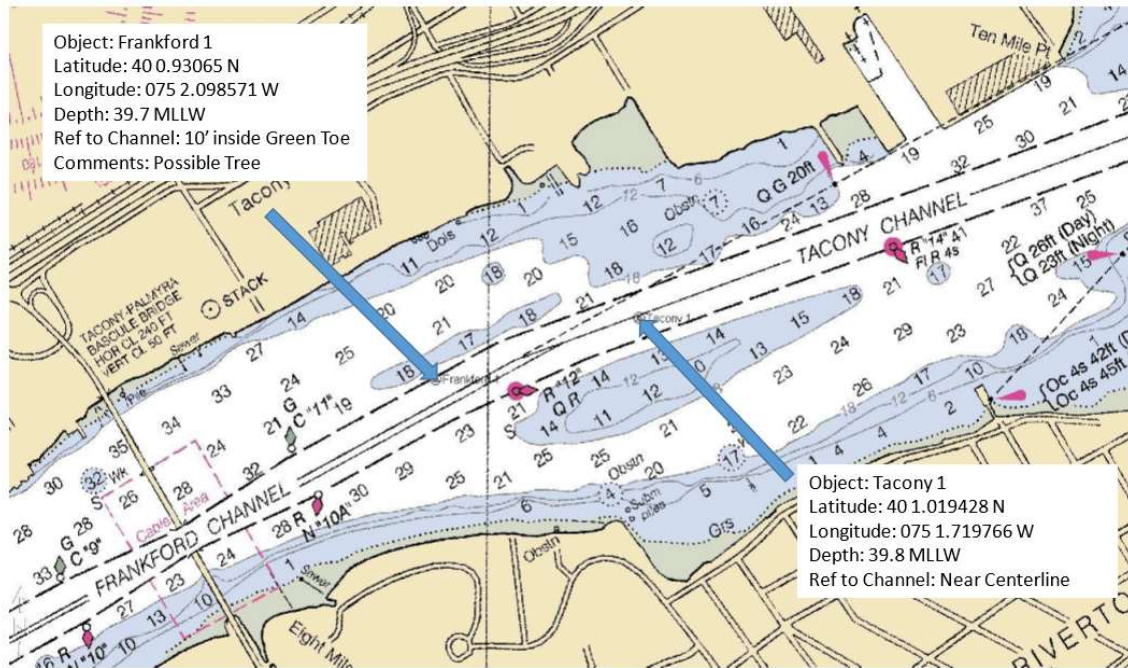


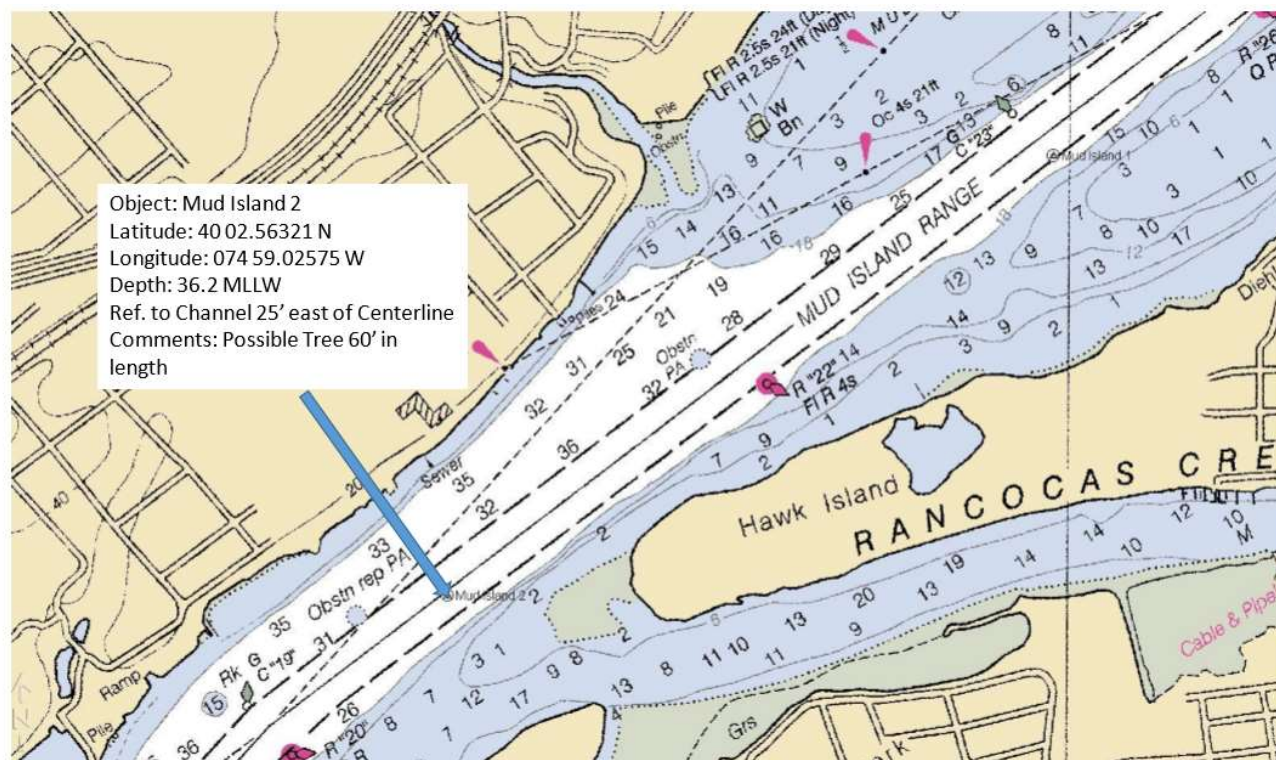
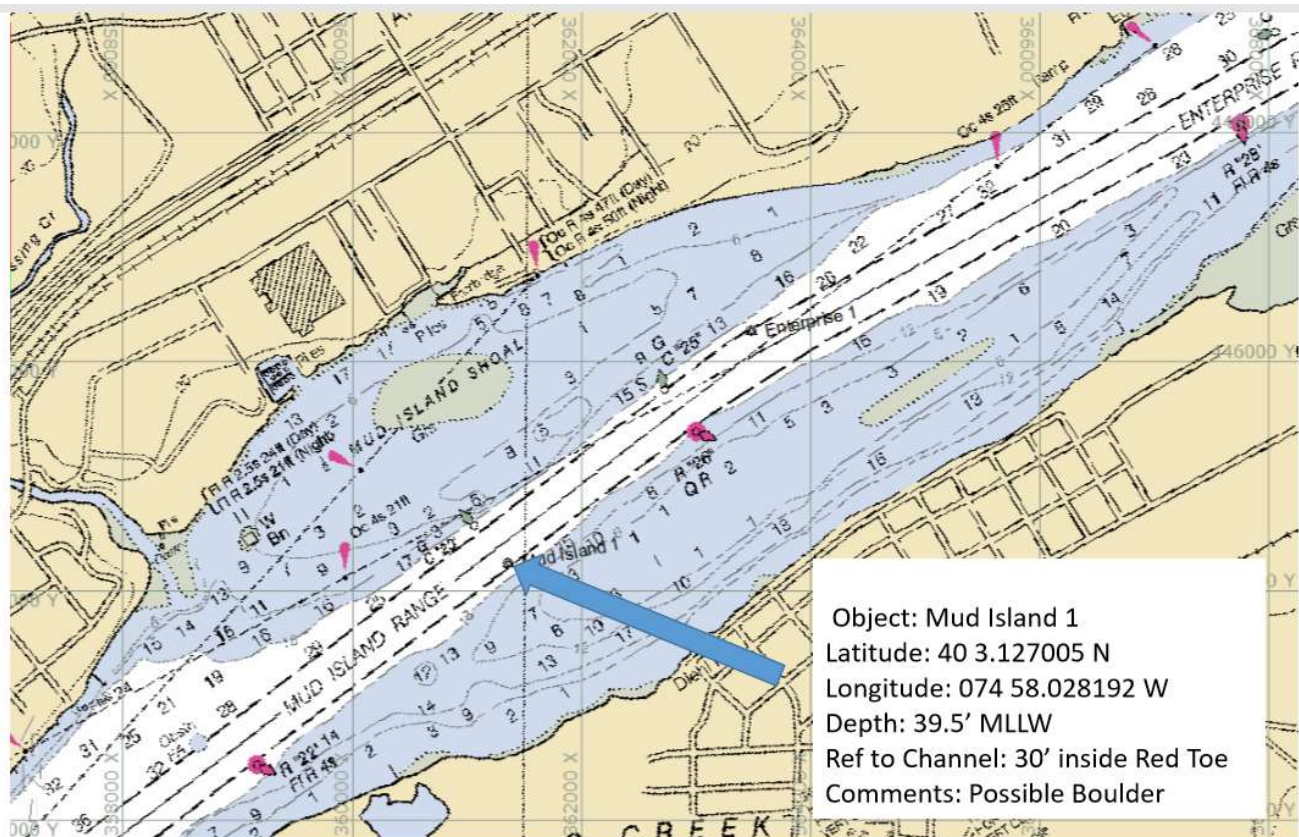


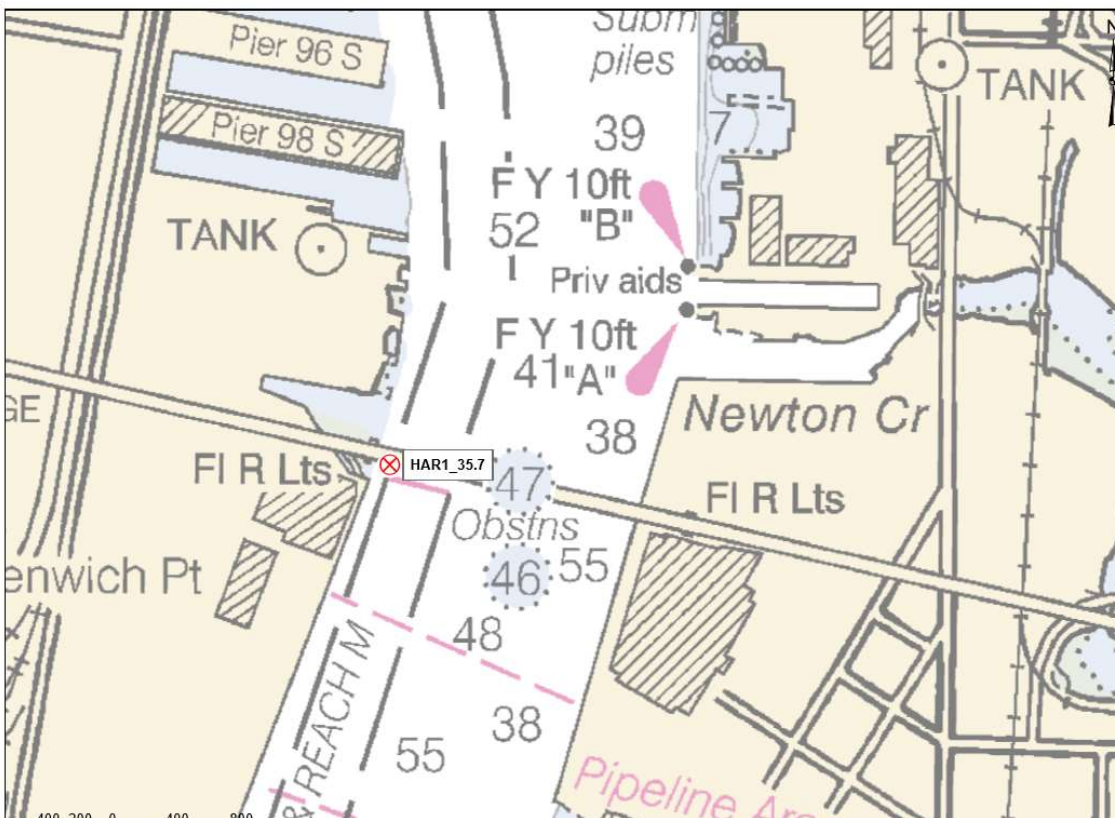
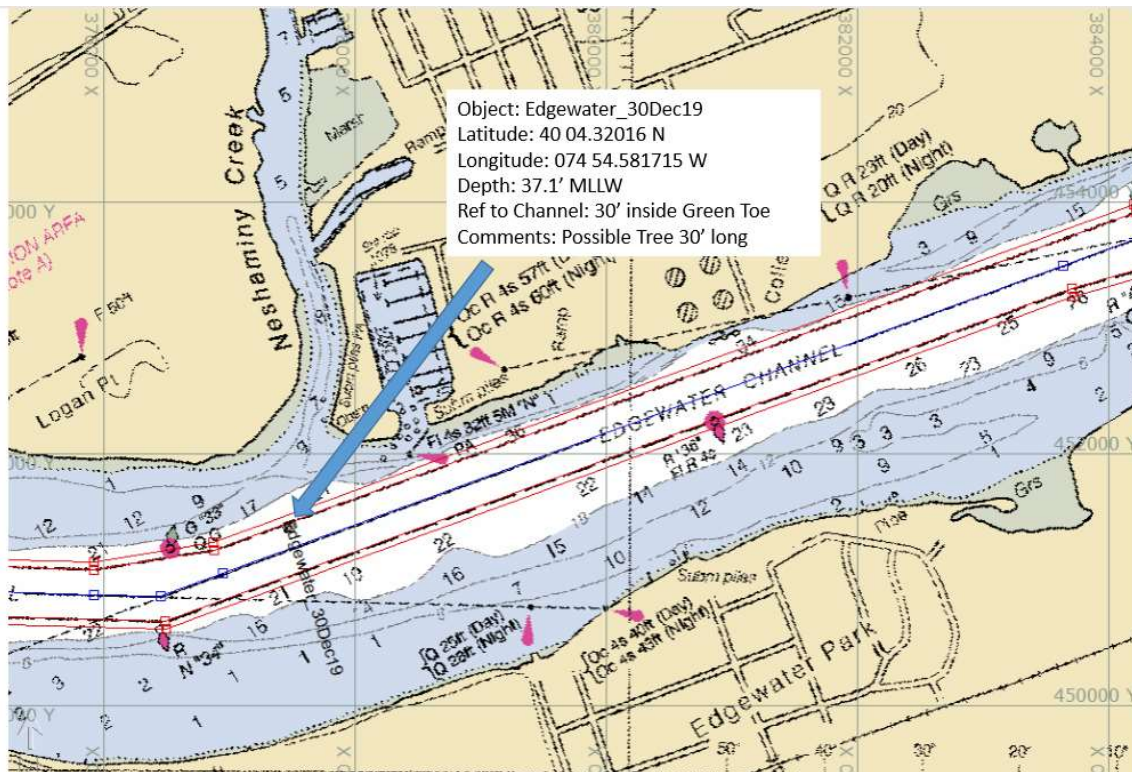


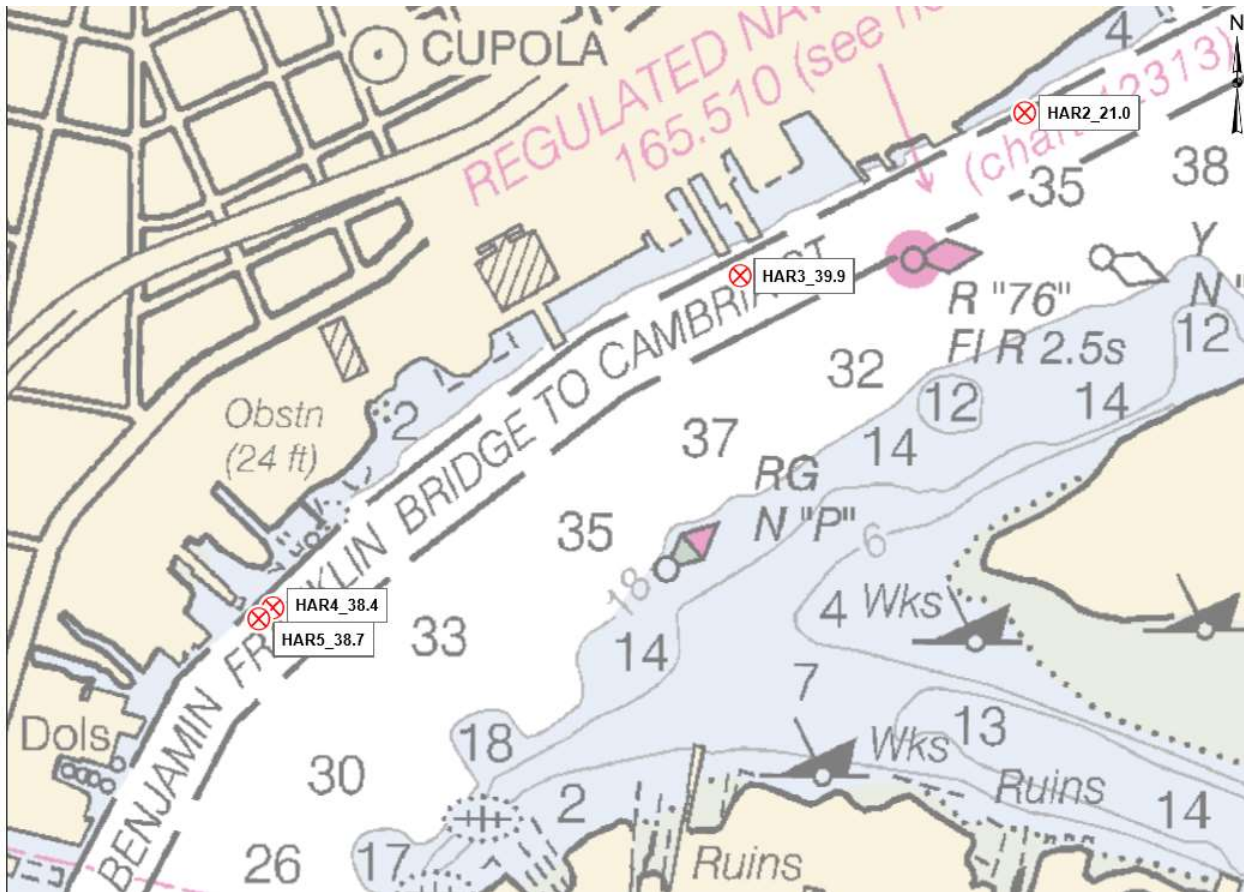












DEEPENING TRANSITION PLAN

Captain Stuart Griffin reported the following: We are holding at 42' inbound, at 40' outbound. As we get obstructions removed, we'd like to see 42' inbound and outbound. The rate of shoaling in the river is extremely dynamic and trying to keep the river at 45' will keep the ACOE very busy.

In response to a question about anchorage at MHA during the process, Captain Griffin reported that when the Dredge Essex will be working in the channel off of Trainer, there will likely be some anchoring restrictions as determined by the USCG in conjunction with the MAC/Pilot's Assoc. We will try to keep different parts of the anchorage available during the process.

VII. NEW BUSINESS

A.Pars-TSS extension- see above

B.Ben Franklin Bridge Project-

The DRPA continues to schedule dates for a reduced air draft for the Ben Franklin Bridge.
The MAC invited DRPA representatives Liz Kiawuun and Mike Venuto to report on the project:

We are working on a \$200 million project to rehabilitate the extension span of the Ben Franklin Bridge over the next 4.5 years. The platform under the bridge is being used in complex structural steel repairs and replacements. We'll adjust the NOAA air-gap sensor accordingly.

C.COTP Scott E. Anderson

The MAC recognized Scott E. Anderson, as Captain of the Port for the last three years, and also as Deputy Sector Commander for the two years preceeding.

Captain Griffin added the following: "... it has been an honor to work with you and, on behalf of everyone in the port, to say that we are so appreciative of you as a partner and for your pragmatic approach to everything. We all appreciate your collaborative efforts involving us and making us feel that our voices mattered. We are grateful for that. We wish you well in your retirement."

VIII. Open Discussion

Following a question from Captain Mike Nesbitt, CATZOC will extend to Fairless and will include the C&D Canal as per Steve Farrell, ACOE Survey Chief.

Captain Stuart Griffin announced that Captain David Cuff is the new President of the Pilot's Association.

Stuart also acknowledged outgoing Pilot President and former MAC Chairman, Captain Jon Kemmerley for his hard work and dedication. Captain Kemmerley replied in kind thanking a number of people that were instrumental with his former positions mentioned above.

IX. Adjournment

At 1348 Captain Griffin asked for a motion to adjourn. Captain David Cuff moved that we adjourn. Captain Nathan Hauser seconded. All approved.

**Next meeting: September 10, 2020 at 1100
Popi's Italian Restaurant**