



DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS, JACKSONVILLE DISTRICT
1520 ROYAL PALM SQUARE BLVD, SUITE 310
FORT MYERS, FLORIDA 33919

July 11, 2025

Regulatory Division
West Permits Branch
Fort Myers Permits Section
SAJ-2025-01041 (NW-SJF)

Lee County BOCC
C/o Michael Campbell
1500 Monroe Street
Fort Myers, FL 33901
Sent via email: mcampbell@leegov.com

Dear Mr. Feeney:

The U.S. Army Corps of Engineers (Corps) has completed the review of your application for a Department of the Army permit received on April 14, 2025. Your application was assigned file number SAJ-2025-01041. A review of the information and drawings provided indicates that proposed project involves the maintenance dredge of 800 feet of the previously dredged channel within Henley Canal to a depth of -5.0 feet MLW, involving the removal of 1,850 cubic yards of accumulated material from 30,750 square feet of non-vegetated tidal bottoms and temporarily stored at a temporary off-load site to be transported to an authorized upland disposal site. Turbidity curtains will be deployed around all work areas that are in/over waters of the U.S. Henley Canal. The project site is located at 2131 Oleander Street, in Section 2, Township 46 South, Range(s) 22 East, and Section 13, Township 47 South, Range 24 East, St. James City, Lee County, Florida 33956. Approximate Central Coordinates: (Latitude: 26.3725°, Longitude: -82.08194°). The project would affect waters of the United States associated with the Henley Canal adjacent to San Carlos Bay.

The activities subject to this permit are authorized pursuant to Section 10 of the Rivers and Harbors Act of 1899 (33 U.S.C. § 403).

Your project, as depicted on the enclosed drawings, is authorized by Nationwide Permit (NWP) 35 (Maintenance Dredging of Existing Basins). **This verification is valid until March 14, 2026.** Furthermore, if you commence or are under contract to commence this activity before the date that the relevant NWP is modified or revoked, you will have 12 months from the date of the modification or revocation of the NWP to complete the activity under the present terms and conditions of this NWP. In order for this NWP authorization to be valid, you must ensure that the work is performed in accordance with the NWP General Conditions and the Jacksonville District Regional Conditions, and the General and Project-Specific Special Conditions listed below. Alternatively, you can access the U.S. Army Corps of Engineers' (Corps) Jacksonville District's Regulatory Source Book web page for links to view NWP information at: <https://www.saj.usace.army.mil/Missions/Regulatory/Source-Book/>. Please be aware this Internet address is case sensitive and should be entered as it appears above. Once there select "Source Book" and then select "Nationwide Permits." These files contain the description of the NWP authorization, the NWP general conditions, and the regional conditions, which apply specifically to this NWP verification.

You must comply with all of the special and general conditions for NWP-35, including any project-specific conditions included in this letter and all conditions incorporated by reference as described above.

General Conditions (33 CFR PART 320-330):

1. The time limit for completing the work authorized ends on **March 14, 2026**.
2. You must maintain the activity authorized by this permit in good condition and in conformance with the terms and conditions of this permit. You are not relieved of this requirement if you abandon the permitted activity, although you may make a good faith transfer to a third party in compliance with General Condition 4 below. Should you wish to cease to maintain the authorized activity, or should you desire to abandon it without a good faith transfer, you must obtain a modification of this permit from this office, which may require restoration of the area.
3. If you discover any previously unknown historic or archeological remains while accomplishing the activity authorized by this permit, you must immediately notify this office of what you have found. We will initiate the Federal and state coordination required to determine if the remains warrant a recovery effort or if the site is eligible for listing in the National Register of Historic Places.
4. If you sell the property associated with this permit you must obtain the signature of the new owner on the transfer form attached to this letter and forward a copy to this office to validate the transfer of this authorization.
5. If a conditioned water quality certification has been issued for your project, you must comply with the conditions specified in the certification as special conditions to this permit. For your convenience, a copy of the certification is attached if it contains such conditions.
6. You must allow a representative from this office to inspect the authorized activity at any time deemed necessary to ensure that it is being or has been accomplished in accordance with the terms and conditions of your permit.

Project Specific Special Conditions:

The following project specific special conditions are included with this verification:

1. Reporting Address: The Permittee shall submit all reports, notifications, documentation, and correspondence required by the general and special conditions of this permit to either (not both) of the following addresses:

a. For electronic mail (preferred): SAJ-RD-Enforcement@usace.army.mil (not to exceed 15 MB).

b. For standard mail: U.S. Army Corps of Engineers, Regulatory Division, Enforcement Section, P.O. Box 4970, Jacksonville, FL 32232-0019.

The Permittee shall reference this permit number, SAJ-2025-01041(NW –SJF), on all submittals.

2. As-Built Certification: Within 60 days of completion of the work authorized by this permit, the Permittee shall submit as-built drawings of the authorized work and a completed "As-Built Certification by Professional Engineer or Surveyor" form (Attached) to the Corps. The as-built drawings shall be signed and sealed by a registered professional engineer or surveyor and include the following:

- a. A plan view drawing of the location of the authorized work footprint, as shown on the permit drawings, with an overlay of the work as constructed. The plan view drawing should show all existing water management structures and the completed structures, dredge/fill activities, and wetland impacts.
- b. A list of any deviations between the work authorized by this permit and the work as constructed. In the event that the completed work deviates, in any manner, from the authorized work, describe on the attached "As-Built Certification by Professional Engineer" form the deviations between the work authorized by this permit and the work as constructed. Clearly indicate on the as-built drawings any deviations that have been listed. Please note that the depiction and/or description of any deviations on the drawings and/or "As-Built Certification by Professional Engineer" form does not constitute approval of any deviations by the Corps.
- c. The Department of the Army permit number on all sheets submitted.

3. Dredged Material Disposal: The Permittee shall place all dredged material in a self-contained, upland disposal site. The Permittee shall maintain the upland disposal site to prevent the discharge of dredged material and associated effluent into waters of the United States.

4. Turbidity Barriers: Prior to the initiation of any of the work authorized by this permit, the Permittee shall install floating turbidity barriers with weighted skirts that extend within 1-foot of the bottom around all work areas that are in, or adjacent to, surface waters. The turbidity barriers shall remain in place and be maintained daily until the authorized work has been completed and turbidity within the construction area has returned to ambient levels. Turbidity barriers shall be removed upon stabilization of the work area.

5. Assurance of Navigation and Maintenance: The Permittee understands and agrees that, if future operations by the United States require the removal, relocation, or other alteration, of the structures or work herein authorized, or if in the opinion of the Secretary of the Army or his authorized representative, said structure or work shall cause unreasonable obstruction to the free navigation of the navigable waters, the Permittee will be required, upon due notice from the U.S. Army Corps of Engineers, to remove, relocate, or alter the structural work or obstructions caused thereby, without expense to the United States. No claim shall be made against the United States on account of any such removal or alteration.

6. Manatee Conditions: The Permittee shall abide by the enclosed standard construction conditions designed to protect the endangered West Indian manatee, 2011 (Attached).

7. Manatee Observer: A dedicated manatee observer, whose sole responsibility is to watch for manatees, must be present during in-water work. The observer must be experienced in manatee observation techniques and have prior on-the-job experience as an observer during previous in-water work where the activities were similar in nature to the proposed project. The dedicated observer shall be present and perform no other duties that may interfere with their ability to observe for protected marine species. This person shall be someone other than the dredge and equipment operators/mechanics.

8. Jacksonville District Programmatic Biological Opinion (JAXBO): Structures and activities authorized under this permit will be constructed and operated in accordance with all applicable PDCs (Attached) contained in the JAXBO, based on the permitted activity. Failure to comply with applicable PDCs will constitute noncompliance with this permit. In addition, failure to comply with the applicable PDCs, where a take of listed species occurs, would constitute an unauthorized take. The NMFS is the appropriate authority to determine compliance with the Endangered Species Act. The most current version of JAXBO can be accessed at the Jacksonville District Regulatory Division website in the Endangered Species section of the Sourcebook located at: <http://www.saj.usace.army.mil/Missions/Regulatory/SourceBook.aspx>

JAXBO may be subject to revision at any time. The most recent version of these JAXBO must be utilized during the design and construction of the permitted work.

9. Posting of Permit: The Permittee shall have available and maintain for review a copy of this permit and approved plans at the construction site.

10. Daylight Hours: All activities must be completed during daylight hours.

11. Historic Properties:

a. No structure or work shall adversely affect impact or disturb properties listed in the National Register of Historic Places (NRHP) or those eligible for inclusion in the NRHP.

b. If, during permitted activities, items that may have historic or archaeological origin are observed the Permittee shall immediately cease all activities adjacent to the discovery that may result in the destruction of these resources and shall prevent his/her employees from further removing, or otherwise damaging, such resources. The applicant shall notify both the Florida Department of State, Division of Historical Resources, Compliance Review Section at (850)-245-6333 and the Corps, of the observations within the same business day (8 hours). Examples of submerged historical, archaeological or cultural resources include shipwrecks, shipwreck debris fields (such as steam engine parts, or wood planks and beams), anchors, ballast rock, concreted iron objects, concentrations of coal, prehistoric watercraft (such as log "dugouts"), and other evidence of human activity. The materials may be deeply buried in sediment, resting in shallow

sediments or above them, or protruding into water. The Corps shall coordinate with the Florida State Historic Preservation Officer (SHPO) to assess the significance of the discovery and devise appropriate actions. Project activities shall not resume without verbal and/or written authorization from the Corps.

c. Additional cultural resources assessments may be required of the permit area in the case of unanticipated discoveries as referenced in accordance with the above Special Condition and, if deemed necessary by the SHPO or Corps, in accordance with 36 CFR 800 or 33 CFR 325, Appendix C (5). Based on the circumstances of the discovery, equity to all parties, and considerations of the public interest, the Corps may modify, suspend, or revoke the permit in accordance with 33 CFR Part 325.7. Such activity shall not resume on non-federal lands without written authorization from the SHPO for finds under his or her jurisdiction, and from the Corps.

d. In the unlikely event that unmarked human remains are identified on non-federal lands; they will be treated in accordance with Section 872.05 Florida Statutes. All work and ground disturbing activities within a 100-meter diameter of the unmarked human remains shall immediately cease and the Permittee shall immediately notify the medical examiner, Corps, and State Archaeologist within the same business day (8-hours). The Corps shall then notify the appropriate SHPO. Based on the circumstances of the discovery, equity to all parties, and considerations of the public interest, the Corps may modify, suspend, or revoke the permit in accordance with 33 CFR Part 325.7. Such activity shall not resume without written authorization from the SHPO and from the Corps.

12. Special Aquatic Site Boundary Identification: Prior to the initiation of any authorized work, the Permittee shall stake the edges of the existing submerged aquatic vegetation (SAV) or live oyster beds, every 50-feet to ensure special aquatic site boundary visibility to all construction personnel to prevent encroachment and impacts to these sensitive areas.

This letter of authorization does not include conditions that would prevent the 'take' of a state-listed fish or wildlife species. These species are protected under sec. 379.411, Florida Statutes, and listed under Rule 68A-27, Florida Administrative Code. With regard to fish and wildlife species designated as species of special concern or threatened by the State of Florida, you are responsible for coordinating directly with the Florida Fish and Wildlife Conservation Commission (FWC). You can visit the FWC license and permitting webpage (<http://www.myfwc.com/license/wildlife/>) for more information, including a list of those fish and wildlife species designated as species of special concern or threatened. The Florida Natural Areas Inventory (<http://www.fnai.org/>) also maintains updated lists, by county, of documented occurrences of those species.

This letter of authorization does not give absolute Federal authority to perform the work as specified on your application. The proposed work may be subject to local building restrictions mandated by the National Flood Insurance Program. You should contact your local office that issues building permits to determine if your site is located

in a flood-prone area, and if you must comply with the local building requirements mandated by the National Flood Insurance Program.

This letter of authorization does not preclude the necessity to obtain any other Federal, State, or local permits, which may be required.

Thank you for your cooperation with our permit program. The Corps' Jacksonville District Regulatory Division is committed to improving service to our customers. We strive to perform our duty in a friendly and timely manner while working to preserve our environment. We invite you to complete our automated Customer Service Survey at <https://regulatory.ops.usace.army.mil/customer-service-survey/>. Please be aware this Internet address is case sensitive, and you will need to enter it exactly as it appears above. Your input is appreciated – favorable or otherwise.

Should you have any questions related to this NWP verification or have issues accessing the documents reference in this letter, please contact Stephen Fleming at the letterhead address above, via telephone at 239-334-1975 x003, or via e-mail at Stephen.j.fleming@usace.army.mil.

Sincerely,

Stephen Fleming
Project Manager

Enclosures:

Department of the Army Permit Transfer Request

As-built Certification

Standard Manatee Conditions for In-Water Work

National Marine Fisheries Service's "PDCs for In-Water Activities"

National Marine Fisheries Service's "PDCs for Maintenance Dredging"

Permit Drawings

DEPARTMENT OF THE ARMY PERMIT TRANSFER REQUEST

DA PERMIT NUMBER: SAJ-2025-01041(NW-SJF)

When the structures or work authorized by this permit are still in existence at the time the property is transferred, the terms and conditions of this permit will continue to be binding on the new owner(s) of the property. Although the construction period for works authorized by Department of the Army permits is finite, the permit itself, with its limitations, does not expire.

To validate the transfer of this permit and the associated responsibilities associated with compliance with its terms and conditions, have the transferee sign and date below and mail to the U.S. Army Corps of Engineers, Enforcement Section, Post Office Box 4970, Jacksonville, FL 32232-0019 or submit via electronic mail to:

SAJ-RD-Enforcement@usace.army.mil (not to exceed 15 MB).

(TRANSFEREE-SIGNATURE)

(SUBDIVISION)

(DATE)

(LOT)

(BLOCK)

(NAME-PRINTED)

(STREET ADDRESS)

(MAILING ADDRESS)

(CITY, STATE, ZIP CODE)

AS-BUILT CERTIFICATION BY PROFESSIONAL ENGINEER

Submit this form and one set of as-built engineering drawings to the U.S. Army Corps of Engineers, Enforcement Section, P.O. Box 4970, Jacksonville, FL 32232-0019. For electronic mail saj-rd-enforcement@usace.army.mil (not to exceed 15 MB).

1. Department of the Army Permit Number: SAJ-2025-01041(NW-SJF)

2. Permittee Information:

Name: _____

Address: _____

3. Project Site Identification (physical location/address):

4. As-Built Certification: I hereby certify that the authorized work, including any mitigation required by Special Conditions to the permit, has been accomplished in accordance with the Department of the Army permit with any deviations noted below. This determination is based upon on-site observation, scheduled, and conducted by me or by a project representative under my direct supervision. I have enclosed one set of as-built engineering drawings.

Signature of Engineer

Name (*Please type*)

(FL, PR, or VI) Reg. Number

Company Name

City

State

ZIP

(Affix Seal)

Date

Telephone Number

Date Work Started: _____ Date Work Completed: _____

Identify any deviations from the approved permit drawings and/or special conditions (attach additional pages if necessary):

STANDARD MANATEE CONDITIONS FOR IN-WATER WORK

2011

The permittee shall comply with the following conditions intended to protect manatees from direct project effects:

- a. All personnel associated with the project shall be instructed about the presence of manatees and manatee speed zones, and the need to avoid collisions with and injury to manatees. The permittee shall advise all construction personnel that there are civil and criminal penalties for harming, harassing, or killing manatees which are protected under the Marine Mammal Protection Act, the Endangered Species Act, and the Florida Manatee Sanctuary Act.
- b. All vessels associated with the construction project shall operate at "Idle Speed/No Wake" at all times while in the immediate area and while in water where the draft of the vessel provides less than a four-foot clearance from the bottom. All vessels will follow routes of deep water whenever possible.
- c. Siltation or turbidity barriers shall be made of material in which manatees cannot become entangled, shall be properly secured, and shall be regularly monitored to avoid manatee entanglement or entrapment. Barriers must not impede manatee movement.
- d. All on-site project personnel are responsible for observing water-related activities for the presence of manatee(s). All in-water operations, including vessels, must be shutdown if a manatee(s) comes within 50 feet of the operation. Activities will not resume until the manatee(s) has moved beyond the 50-foot radius of the project operation, or until 30 minutes elapses if the manatee(s) has not reappeared within 50 feet of the operation. Animals must not be herded away or harassed into leaving.
- e. Any collision with or injury to a manatee shall be reported immediately to the Florida Fish and Wildlife Conservation Commission (FWC) Hotline at 1-888-404-3922. Collision and/or injury should also be reported to the U.S. Fish and Wildlife Service in Jacksonville (1-904-731-3336) for north Florida or Vero Beach (1-772-562-3909) for south Florida, and to FWC at ImperiledSpecies@myFWC.com
- f. Temporary signs concerning manatees shall be posted prior to and during all in-water project activities. All signs are to be removed by the permittee upon completion of the project. Temporary signs that have already been approved for this use by the FWC must be used. One sign which reads *Caution: Boaters* must be posted. A second sign measuring at least 8 ½" by 11" explaining the requirements for "Idle Speed/No Wake" and the shut down of in-water operations must be posted in a location prominently visible to all personnel engaged in water-related activities. These signs can be viewed at MyFWC.com/manatee. Questions concerning these signs can be sent to the email address listed above.

CAUTION: MANATEE HABITAT

All project vessels

IDLE SPEED / NO WAKE

When a manatee is within 50 feet of work
all in-water activities must

SHUT DOWN

Report any collision with or injury to a manatee:



Wildlife Alert:

1-888-404-FWCC(3922)

cell *FWC or #FWC

**U.S. Army Corps of Engineers Jacksonville District's Programmatic Biological
Opinion (JaxBO) Project Design Criteria (PDCs) for In-Water Activities**

November 20, 2017

- 1) **(AP.7.) Education and Observation:** The permittee must ensure that all personnel associated with the project are instructed about the potential presence of species protected under the ESA and the Marine Mammal Protection Act (MMPA). All on-site project personnel are responsible for observing water-related activities for the presence of protected species. All personnel shall be advised that there are civil and criminal penalties for harming, harassing, or killing ESA-listed species or marine mammals. To determine which species may be found in the project area, please review the relevant Protected Species List at:
http://sero.nmfs.noaa.gov/protected_resources/section_7/threatened_endangered/index.html
- 2) **(AP.8.) Reporting** of interactions with protected species:
 - a) Any collision(s) with and/or injury to any sea turtle, sawfish, whale, or sturgeon occurring during the construction of a project, shall be reported immediately to NMFS's Protected Resources Division (PRD) at (1-727-824-5312) or by email to takereport.nmfs@noaa.gov and SAJ-RD-Enforcement@usace.army.mil.
 - b) Smalltooth sawfish: Report sightings to 1-844-SAWFISH or email Sawfish@MyFWC.com
 - c) Sturgeon: Report dead sturgeon to 1-844-STURG 911 (1-844-788-7491) or email nmfs.ser.sturgeonnetwork@noaa.gov
 - d) Sea turtles and marine mammals: Report stranded, injured, or dead animals to 1-877-WHALE HELP (1-877-942-5343).
 - e) North Atlantic right whale: Report injured, dead, or entangled right whales to the USCG via VHF Channel 16.
- 3) **(AP.9.) Vessel Traffic and Construction Equipment:** All vessel operators must watch for and avoid collision with species protected under the ESA and MMPA. Vessel operators must avoid potential interactions with protected species and operate in accordance with the following protective measures:
 - a) *Construction Equipment:*
 - i) All vessels associated with the construction project shall operate at "Idle Speed/No Wake" at all times while operating in water depths where the draft of the vessel provides less than a 4-foot (ft) clearance from the bottom, and in all depths after a protected species has been observed in and has departed the area.
 - ii) All vessels will follow marked channels and/or routes using the maximum water depth whenever possible.
 - iii) Operation of any mechanical construction equipment, including vessels, shall cease immediately if a listed species is observed within a 50-ft radius of

construction equipment and shall not resume until the species has departed the area of its own volition.

- iv) If the detection of species is not possible during certain weather conditions (e.g., fog, rain, wind), then in-water operations will cease until weather conditions improve and detection is again feasible.

b) *All Vessels:*

- i) Sea turtles: Maintain a minimum distance of 150 ft.
- ii) North Atlantic right whale: Maintain a minimum 1,500-ft distance (500 yards).
- iii) Vessels 65 ft in length or longer must comply with the Right Whale Ship Strike Reduction Rule (50 CFR 224.105) which includes reducing speeds to 10 knots or less in Seasonal Management Areas (<http://www.fisheries.noaa.gov/pr/shipstrike/>).
- iv) Mariners shall check various communication media for general information regarding avoiding ship strikes and specific information regarding right whale sightings in the area. These include NOAA weather radio, USCG NAVTEX broadcasts, and Notices to Mariners.
- v) Marine mammals (i.e., dolphins, whales [other than North Atlantic right whales], and porpoises): Maintain a minimum distance of 300 ft.
- vi) When these animals are sighted while the vessel is underway (e.g., bow-riding), attempt to remain parallel to the animal's course. Avoid excessive speed or abrupt changes in direction until they have left the area.
- vii) Reduce speed to 10 knots or less when mother/calf pairs or groups of marine mammals are observed, when safety permits.

- 4) **(AP.10.) Turbidity Control Measures during Construction:** Turbidity must be monitored and controlled. Prior to initiating any of the work covered under this Opinion, the Permittee shall install turbidity curtains as described below. In some instances, the use of turbidity curtains may be waived by the USACE project manager if the project is deemed too minimal to generate turbidity (e.g., certain ATON installation, scientific survey device placement, marine debris removal) or if the current is too strong for the curtains to stay in place. Turbidity curtains specifications:

- a) Install floating turbidity barriers with weighted skirts that extend to within 1 ft of the bottom around all work areas that are in, or adjacent to, surface waters.
- b) Use these turbidity barriers throughout construction to control erosion and siltation and ensure that turbidity levels within the project area do not exceed background conditions.
- c) Position turbidity barriers in a way that does not block species' entry to or exit from designated critical habitat.
- d) Monitor and maintain turbidity barriers in place until the authorized work has been completed and the water quality in the project area has returned to background conditions.
- e) In the range of ESA-listed corals (St. Lucie Inlet, Martin County south to the Dry Tortugas and the U.S. Caribbean) and Johnson's seagrass (Turkey Creek/Palm

Bay south to central Biscayne Bay in the lagoon systems on the east coast of Florida):

- i) Projects that include upland earth moving (e.g., grading to install a building or parking lot associated with a dock and seawall project), must install sediment control barriers to prevent any upland sediments from reaching estuarine or marine waters.
 - ii) The turbidity curtain requirement cannot be waived for any project that moves or removes sediment (e.g., dredging, auger to create a pile, trenching to install a cableline). If turbidity curtains are not feasible in an area based on site conditions such as water current, high wave action, or stormy conditions, the project must undergo individual Section 7 consultation and is not covered under this Programmatic Opinion.
- 5) **(AP.11.) Entanglement:** All turbidity curtains and other in-water equipment must be properly secured with materials that reduce the risk of entanglement of marine species (described below). Turbidity curtains likewise must be made of materials that reduce the risk of entanglement of marine species.
- a) In-water lines (rope, chain, and cable, including the lines to secure turbidity curtains) must be stiff, taut, and non-looping. Examples of such lines are heavy metal chains or heavy cables that do not readily loop and tangle. Flexible in-water lines, such as nylon rope or any lines that could loop or tangle, must be enclosed in a plastic or rubber sleeve/tube to add rigidity and prevent the line from looping and tangling. In all instances, no excess line is allowed in the water.
 - b) Turbidity curtains and other in-water equipment must be placed in a manner that does not entrap species within the construction area or block access for them to navigate around the construction area.

Project Design Criteria

PDCs specific to Activity 3 (maintenance, minor, and muck dredging):

A3.1. Activities covered by this Opinion include:

A3.1.1. Maintenance dredging of existing areas such as canals, channels, basins, berths, marinas, boat slips, and areas around intake and discharge structures. Maintenance dredging will be limited to the depth and width previously authorized by the USACE or other regulatory authority such as FDEP or water management districts. There is no size limit for maintenance dredging so long as it meets the previously authorized depth and width. If the previous authorized depth is unknown, dredging is limited to -7.0 ft MLW including any advanced maintenance or overdredge.

A3.1.2. Minor dredging (non-maintenance) dredging as follows:

A3.1.2.1. For dredging to accommodate vessel mooring at boat slips around docks and marinas, the size is limited to the minimum necessary to accommodate vessel mooring, not to exceed 5,000 ft². The maximum allowed dredging depth (including overdredge) cannot exceed the depth of the adjacent navigational channel (i.e., controlling depth) or a maximum depth of -7 ft MLW. For projects located adjacent to federal channels (not within the dredged navigational channel), the dredging depth can exceed -7 ft MLW so long as it does not exceed the controlling depth of the federal channel.

A3.1.2.2. For treasure hunting and salvage operations that use blowers, propeller deflectors, and suctioning devices, the size is limited to a total of 5,000 ft² and is limited to sandy areas only.

A3.1.2.3. Minor dredging does not include dredging to create new navigational channels.

A3.1.2.4. Minor dredging includes dredging to accommodate the placement of shoreline stabilization, outfall structures; boat ramps; upland cut boat ramps and basins; temporary platforms, fill, and cofferdams; and placement of erosion and scour control-measures. This type of dredging is usually required to embed materials and/or to allow smooth transition of the work to the natural surrounding elevation.

A3.1.3. Muck Dredging, or removing accumulated organic to restore natural habitats and for water quality enhancement, as follows:

A3.1.3.1. Muck dredging cannot be used to increase water depths to support navigation, access, or vessel mooring.

A3.1.3.2. Dredging depths are limited to only that necessary to remove the muck layer down to natural sediments.

The following PDCs apply to all the activities described in PDC A3.1 above:

A3.2. This Opinion does not cover hopper dredging.

- A3.3. With respect to the dredged material, all dredged material must be placed in an USACE-verified upland disposal site, EPA or USACE-designated open water disposal site, USACE Dredged Material Management Area, or USACE-approved beneficial use sites for mitigation or restoration, as long as it meets PDC A3.3.1-A3.3.3 below.
- A3.3.1. The disposal sites shall employ erosion control measures such as upland erosion control, such as filtration or berms, or in-water turbidity curtains.
- A3.3.2. Handling and storage of dredged material must be completed in a manner that prevents sedimentation, erosion, and turbidity during dewatering, overflow, transferring, and storage of the dredged material. For example, the overwater transfer of dredge material should either contain the dredged material and any water to prevent sedimentation or employ other methods, such as turbidity curtains in the marine environment, to ensure that any turbidity generated as the water is returned to the marine environment is contained. If the applicant conducts sediment testing voluntarily or in compliance with other law, and such testing indicates high levels of contaminants in the sediments to be dredged, water from dewatering should not be released back into the marine environment.
- A3.3.3. This Opinion does not cover the use of in-water disposal sites (e.g., beneficial use sites or ocean disposal sites) unless the use of the in-water disposal sites has previously undergone ESA-Section 7 consultation with NMFS for disposal of material at these locations. If the applicant is seeking disposal in an in-water disposal location not previously consulted on by NMFS, then the entire project (both dredging and disposal) must be consulted on separately and is not covered under this Opinion.
- A3.3.4. This Opinion applies to upland disposal of beach quality sand on beaches if placed above the existing MHW, if the grain size analysis indicates that the dredged sand is compatible with the existing beach sand, and if the sand placement does not change the existing waterward extension of the beach. Placement of beach sand on nesting beaches above MHW that may affect ESA-listed species is under the jurisdiction of the USFWS.
- A3.4. This Opinion does not cover dredging within the mapped and authorized federal navigational channels (e.g., ICW, AIWW, GIWW, or harbors [e.g., Port Canaveral]). Dredging outside of the mapped channel in the surrounding waters is covered.

Additional PDCs for Activity 3 applicable in critical habitat:

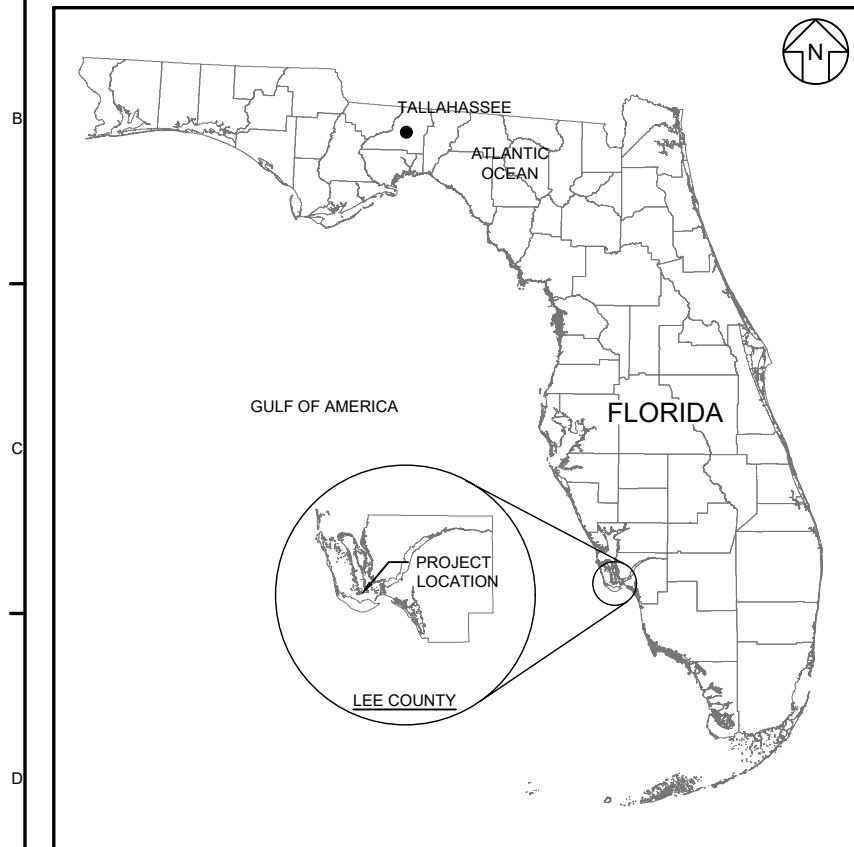
In addition to the PDCs above, the project must be designed to meet the following PDCs if the project occurs in the critical habitat as described below.

A3.5. Smalltooth sawfish critical habitat:

- A3.5.1. Maintenance dredging of canals in smalltooth sawfish critical habitat is covered under this Opinion as long as it is within the previously authorized dredge footprint and to the previously USACE authorized depth.
- A3.5.2. For minor dredging: If only the shallow euryhaline (MHWL to -3 ft MLLW) water essential feature is present (i.e., no red mangroves), dredged depths are limited to a maximum depth of -3 ft MLLW. If red mangroves are present,

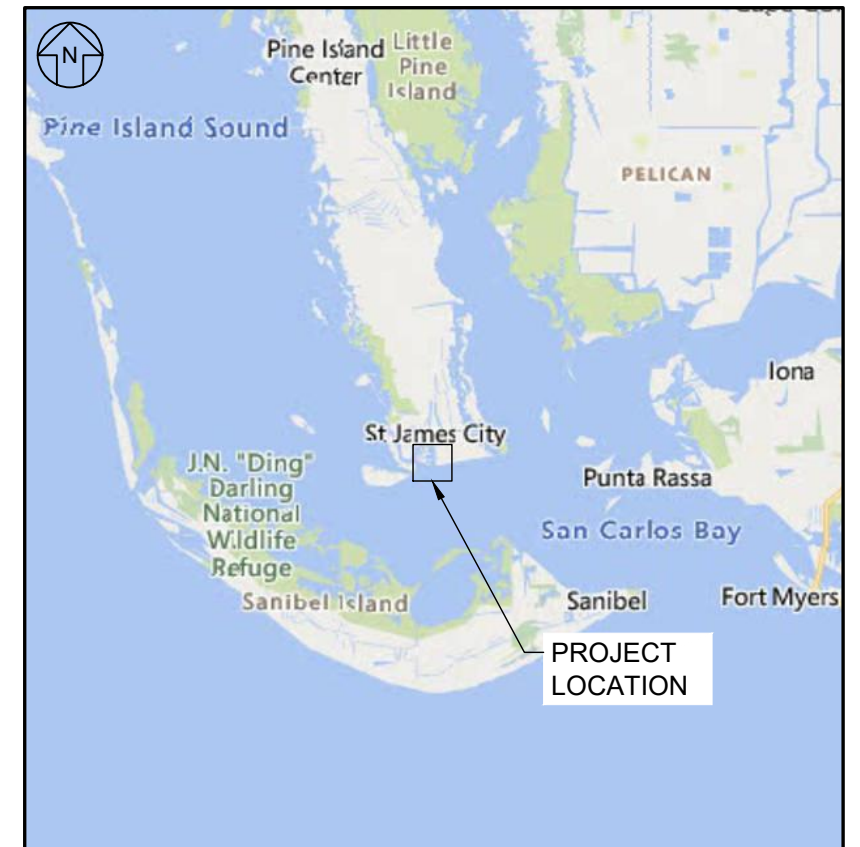
	dredging, excavation, or disposal is not allowed within 5 ft of all red mangrove prop roots.
A3.5.3.	Muck dredging, as defined in PDC A3.1.3, is not allowed in shallow, euryhaline habitat (MHWL to -3 ft MLLW)
A3.5.4.	Dredging and disposal activities are not allowed in areas identified as smalltooth sawfish limited exclusion zones, defined in Section 2.1.1.1.
A3.6.	Gulf sturgeon critical habitat: No treasure hunting or muck dredging is allowed in Gulf sturgeon critical habitat at any time of year. No maintenance or minor dredging is allowed in Gulf sturgeon critical habitat between September and March, when sturgeon are likely to be present in these areas. When allowed, maintenance and minor dredging activities shall be conducted according to the PDCs above for all dredging activities.
A3.7.	<i>Acropora</i> critical habitat and the U.S. Caribbean: This Opinion does not cover dredging (maintenance, minor, or muck) and disposal in <i>Acropora</i> critical habitat where the essential features are present or within the U.S. Caribbean. This Opinion does not cover projects requiring penetrating or removing underlying hard substrate (e.g., bedrock, hardbottom) using any methods including blasting or fracturing. Treasure hunting is not allowed in <i>Acropora</i> critical habitat or the U.S. Caribbean.
A3.8.	Johnson's seagrass critical habitat: Treasure hunting is not allowed in waters less than 12 ft (4 m) deep. Muck dredging is not allowed if the essential features are present. All other dredging is covered if conducted according to the PDCs above for all dredging activities.
A3.9.	U.S. Caribbean sea turtle critical habitat (hawksbill, leatherback, and the NA DPS of green sea turtle critical habitat) and loggerhead sea turtle critical habitat: Dredging consistent with the PDCs above can occur in these critical habitat areas.

A	WEST COAST INLAND NAVIGATION DISTRICT										PRN APP
	HENLEY CANAL - LEE COUNTY, FL										
	MAINTENANCE DREDGING										



VICINITY MAP
NOT TO SCALE

DRAWING LIST	
NUMBER	TITLE
1	TITLE SHEET
2	NOTES
3	SITE LAYOUT
4	PLAN VIEW - HENLEY CANAL
5	PLAN VIEW - MATERIAL PLACEMENT
6	CROSS SECTIONS I - HENLEY CANAL
7	CROSS SECTIONS II - HENLEY CANAL



LOCATION MAP
SCALE: 1" = 4 MILES

PREPARED BY:



engineers | scientists | innovators


2056 VISTA PARKWAY, SUITE 280
WEST PALM BEACH, FL 33411 USA
TELEPHONE: 561.659.0041

PREPARED FOR:



200 EAST MIAMI AVENUE
VENICE, LF 34285
TELEPHONE: 941.485.9402

ISSUE FOR BID
CONSTRUCTION DRAWING

 <p>Geosyntec consultants</p> <p>2055 VISTA PARKWAY, SUITE 280 WEST PALM BEACH, FL 33411 USA TELEPHONE: 561.869.0041 CERTIFICATE OF AUTHORIZATION NO. 4689</p>															
TITLE SHEET															
TITLE:															
DATE:	4 MAR 2025														
PROJECT NO.:	AT25-4300														
FILE:	AT25-430.02_01														
DRAWING NO.:	1 OF 7														
PROJECT: MAINTENANCE DREDGING															
SITE: HENLEY CANAL - LEE COUNTY, FL															
DESIGN BY: RBN															
DRAWN BY: JWO															
CHECKED BY: RBN															
REVIEWED BY: MJG															
APPROVED BY: RBN															
SIGNATURE _____															
DATE _____															
ROBERT A. NEALE, P.E. LICENSED PROFESSIONAL ENGINEER															
REV	DATE	DESCRIPTION	DRN APP												

CONSTRUCTION NOTES:

1. WCIND & LEE COUNTY INTEND TO MAINTENANCE DREDGE HENLEY CANAL TO RESTORE STORM IMPACTS IN ACCORDANCE WITH THE APPROPRIATE STATE AND FEDERAL AUTHORIZATIONS. CARE SHALL BE TAKEN TO FULFILL FULL COMPLIANCE WITH THE CONDITIONS PROVIDED IN THE AUTHORIZATIONS / PERMITS.
2. NOTIFICATION OF ANY OBSERVED NON-COMPLIANT REGULATORY ISSUE SHALL BE PROVIDED TO THE WCIND, LEE COUNTY, AND GEOSYNTEC PROJECT MANAGERS AT THE EARLIEST OPPORTUNITY AND NO LATER THAN 7 DAYS FROM THE DATE OF ACKNOWLEDGMENT.
3. THE BATHYMETRY PRESENTED HEREIN REPRESENTS CONDITIONS SURVEYED IN JUNE 2024 BY AIM ENGINEERING & SURVEYING INC. AND MAY NOT REPRESENT CURRENT CONDITIONS AT THE TIME OF CONSTRUCTION.
4. THE ELEVATIONS REFERENCED HEREIN ARE BASED ON MEAN LOW WATER DATUM AT NOAA TIDE STATION 8725391 PUNTA RASSA, SAN CARLOS BAY, FL., TIDAL EPOCH 1983-2001 AND SHOWN IN FEET.
 - A. MLW = 0.00 FT
 - B. NAVD88 = +1.40 FT
 - C. MHW = +1.71 FT
5. HORIZONTAL COORDINATES SHOWN HEREIN REFERENCE FLORIDA STATE PLANE WEST (0902) NAD 83/90 US SURVEY FEET.
6. ALL DREDGING SHALL BE PERFORMED WITHIN THE LIMITS DESIGNATED, INCLUSIVE OF THE OVERDREDGE TOLERANCE. ANY EXCEEDANCE OF THE LIMITS SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR.
7. DREDGING OPERATIONS SHALL ADHERE TO THE FWS MANATEE GUIDELINES FOR IN-WATER WORK. ALL WORK VESSELS SHALL STOP IF A MANATEE IS OBSERVED WITHIN 50-FT AND SHALL NOT RESUME UNTIL ALL MANATEE HAVE LEFT THE AREA ON THEIR OWN ACCORD.
8. DREDGING OPERATIONS SHALL MAINTAIN A 10-FT BUFFER FROM UPLAND STRUCTURES, INCLUDING SEAWALLS AND BULKHEADS AND A 5-FT BUFFER FROM ALL PILINGS, DOCKS, AND PIERS.
9. DREDGING OPERATIONS SHALL BE LIMITED TO DAYTIME HOURS (SUNRISE TO SUNSET), MONDAY THROUGH FRIDAY.
10. DREDGING OPERATIONS SHALL NOT PROHIBIT NAVIGATION ACTIVITIES BY OTHERS.
11. ALL VESSELS ASSOCIATED WITH THE MAINTENANCE DREDGING SHALL MAINTAIN THE PROPER USCG DAY MARKERS AND LIGHTS FOR THE WORK BEING PERFORMED. FAILURE TO MAINTAIN THE PROPER MARKINGS SHALL BE GROUNDS FOR REMOVAL FROM THE PROJECT.
12. WORK VESSELS SHALL NOT BE ALLOWED TO STAGE OVERNIGHT UNLESS PROPERLY AUTHORIZED AND SECURED TO A DOCK, PILE, OR MOORING SYSTEM.
13. THE CONTRACTOR SHALL PROVIDE A PRE- AND POST DREDGE SURVEY FOR THE PURPOSE OF CALCULATING DREDGE VOLUMES. THE SURVEY SHALL BE CONDUCTED BY AN INDEPENDENT 3rd PARTY SURVEYOR LICENSED IN THE STATE OF FLORIDA, IN ACCORDANCE WITH THE PROJECT SPECIFICATIONS.
14. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL NECESSARY STAGING AREAS, INCLUDING EQUIPMENT ACCESS TO THE SITE.
15. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL WATER QUALITY MONITORING REQUIREMENTS AS DEFINED IN THE SPECIFICATIONS AND PROJECT AUTHORIZATIONS / PERMITS.
16. AERIAL PHOTOGRAPHY PROVIDED BY LEE COUNTY AND DATED JANUARY - MARCH 2024.

HENLEY CANAL		
P.I. STATION	NORTHING	EASTING
0+00.00	782,871.04	629,383.53
8+00.00	783,669.85	629,339.93
11+00.00	783,969.85	629,338.95
14+00.00	784,269.76	629,331.68
16+00.00	784,469.76	629,331.60
19+50.00	784,819.48	629,317.65
20+75.00	784,944.33	629,323.75
23+40.00	785,209.28	629,318.68

	Vol to Next (CY)			Cummulative Volume to Next (CY)		
Station	Design	Overdredge	Total	Design	Overdredge	Total
6+50	20.4	98.8	119.2	20	99	119
7+00	29.9	102.6	132.5	50	201	252
7+50	20.8	96.7	117.4	71	298	369
8+00	11.1	85.8	96.9	82	384	466
8+50	32.0	86.3	118.4	114	470	584
9+00	74.6	86.9	161.5	189	557	746
9+50	68.6	77.7	146.3	257	635	892
10+00	43.1	68.3	111.3	300	703	1004
10+50	38.4	59.8	98.2	339	763	1102
11+00	37.3	61.8	99.1	376	825	1201
11+50	54.8	67.1	122.0	431	892	1323
12+00	88.2	68.6	156.8	519	960	1480
12+50	91.6	66.3	157.9	611	1027	1637
13+00	55.9	58.6	114.5	667	1085	1752
13+50	16.0	45.2	61.2	683	1130	1813
14+00	2.5	26.4	28.8	685	1157	1842
14+50	—	—	—	685	1157	1842

Geosyntec
consultants

2056 VISTA PARKWAY, SUITE 280
WEST PALM BEACH, FL 33411 USA
TELEPHONE: 561.659.0041
CERTIFICATE OF AUTHORIZATION NO. 46859

NOTES

MAINTENANCE DREDGING

HENLEY CANAL - LEE COUNTY, FL

DATE: 4 MAR 2025
PROJECT NO.: AT25-4300
FILE: AT25-430.02 02

DRAWING NO.:
2 OF 7

ISSUE FOR BID
CONSTRUCTION DRAWING




OFFLOAD / TRANSFER SITE
SCALE" 1" = 1,000'

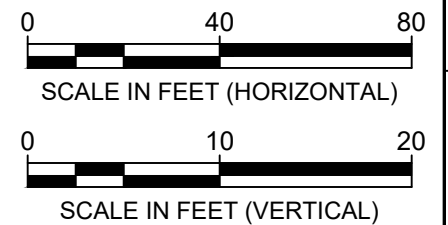
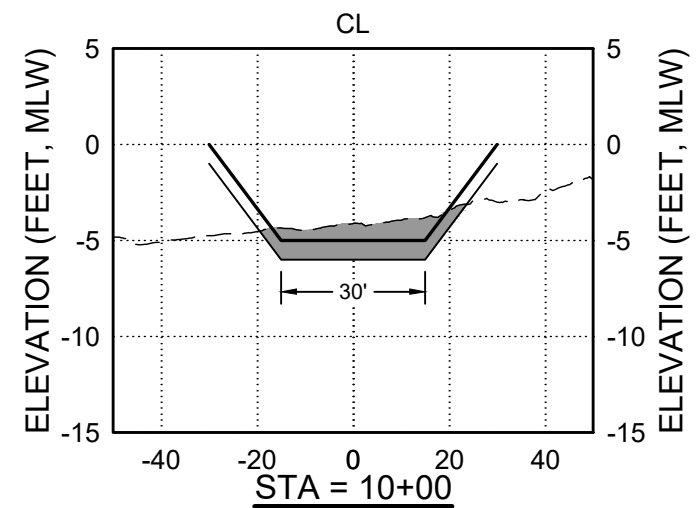
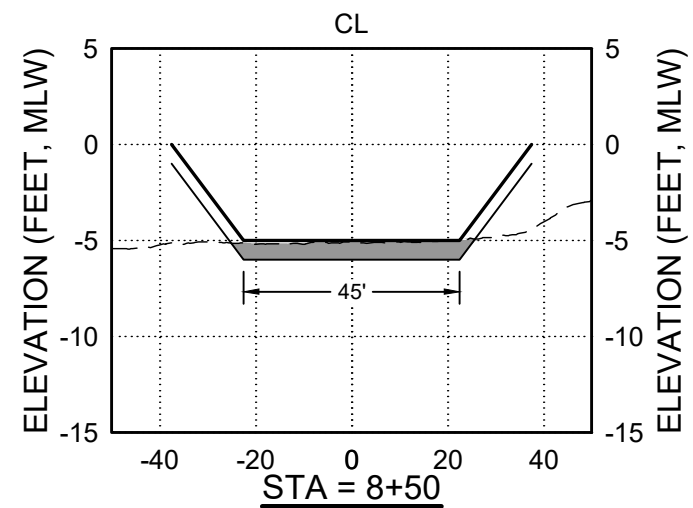
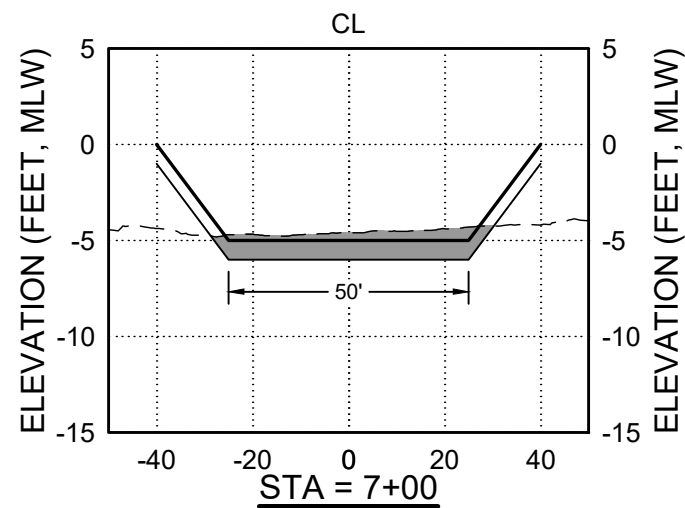
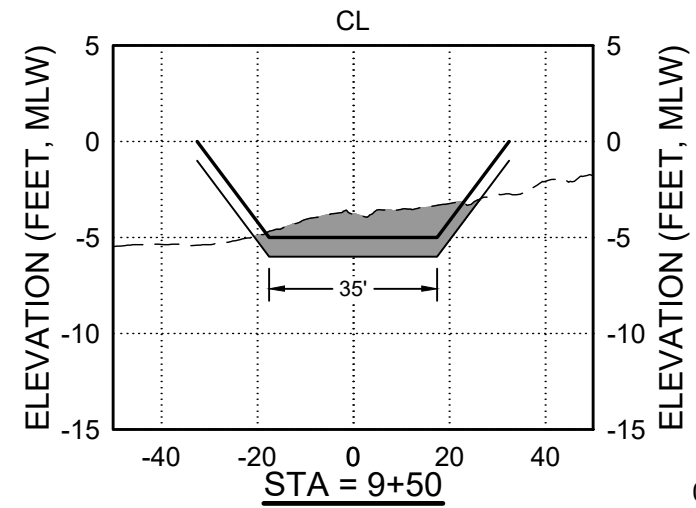
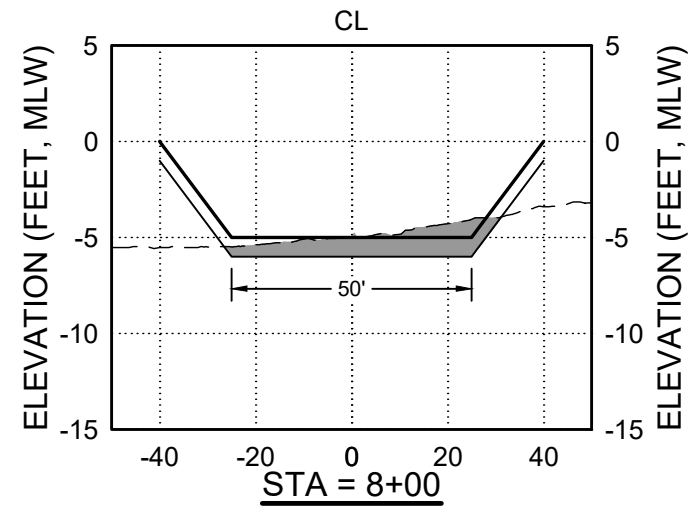
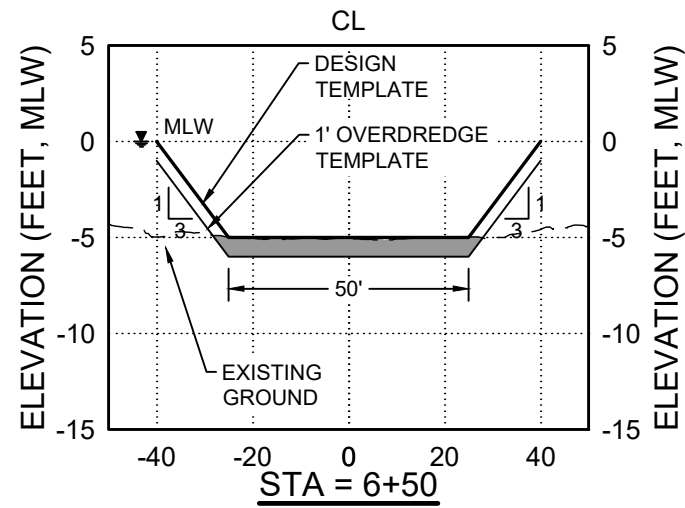
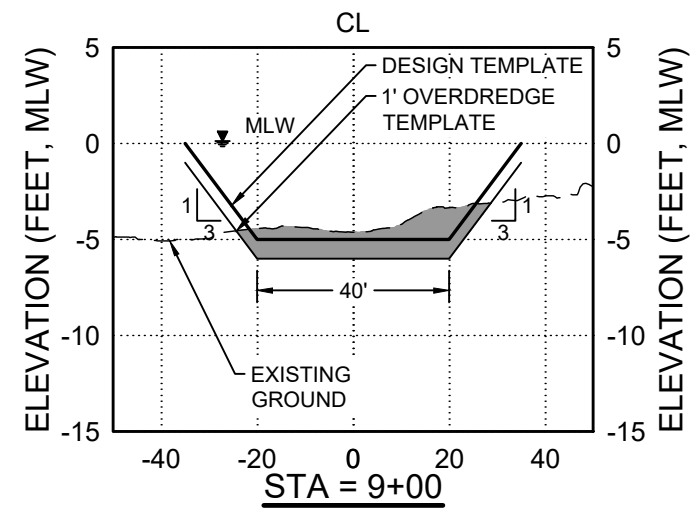
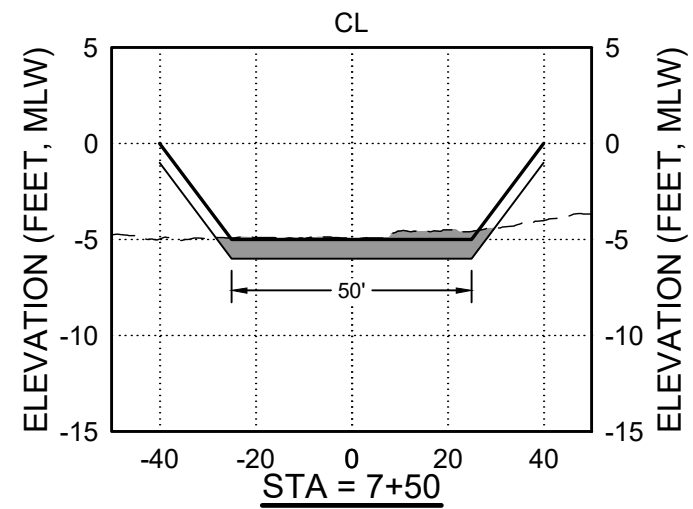


PLACEMENT SITE
SCALE" 1" = 2,000'

NOTE:

1. CONTRACTOR SHALL BE RESPONSIBLE FOR SECURING ANY AND ALL MATERIAL TRANSFER AND FINAL PLACEMENT SITES. WCIND SHALL PROVIDE CONTACT INFORMATION FOR THE ANTICIPATED SITES TO BE USED. HOWEVER, CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR ANY ARRANGEMENTS, INCLUDING SITE RESTORATION.

DATE: 4 MAR 2025		PROJECT NO.: AT25-4300		FILE: AT25-430.02_05		DRAWING NO.: 5 OF 7	
TITLE: PLAN VIEW - MATERIAL PLACEMENT		PROJECT: MAINTENANCE DREDGING		SITE: HENLEY CANAL - LEE COUNTY, FL			
 2056 VISTA PARKWAY, SUITE 280 WEST PALM BEACH, FL 33411, USA TEL: 561.833.1414 FAX: 561.833.1414 CERTIFICATE OF AUTHORIZATION NO. 4689		DESIGN BY: RBN		DRAWN BY: JWO		CHECKED BY: RBN	
		REVIEWED BY: M/JG		APPROVED BY: RBN		SIGNATURE: _____ DATE: _____	
		TURN DATE: _____					



ISSUE FOR BID
CONSTRUCTION DRAWING

Geosyntec
consultants
2056 VISTA PARKWAY, SUITE 280
WEST PALM BEACH, FL 33411 USA
TELEPHONE: 561.659.0041
CERTIFICATE OF AUTHORIZATION NO. 4669

CROSS SECTIONS 1 - HENLEY CANAL	
PROJECT:	MAINTENANCE DREDGING
SITE:	HENLEY CANAL - LEE COUNTY, FL
	ft

DATE: 4 MAR 2025
PROJECT NO.: AT25-4300
SUBJECT: AT25-430.02_06
DRAWING NO.:
6 OF 7

DRAWN BY:	JWO
CHECKED BY:	RBN
REVIEWED BY:	MJG
APPROVED BY:	RBN

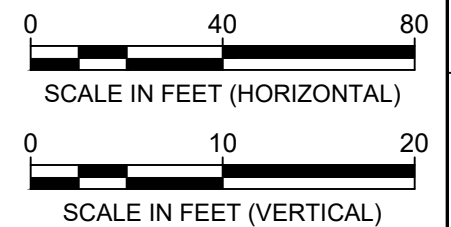
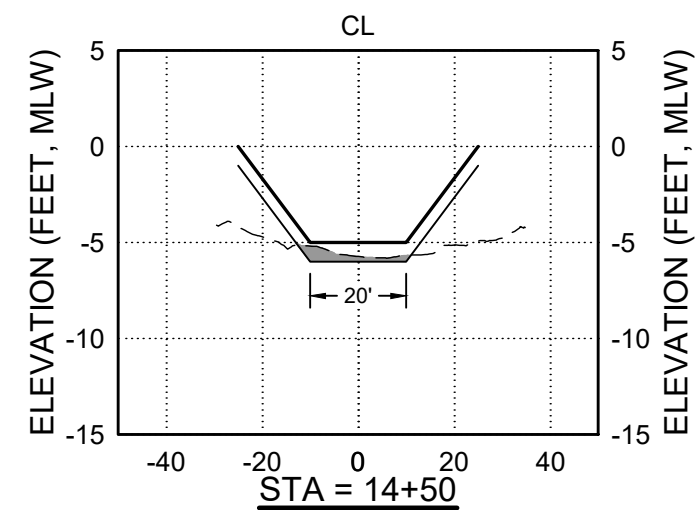
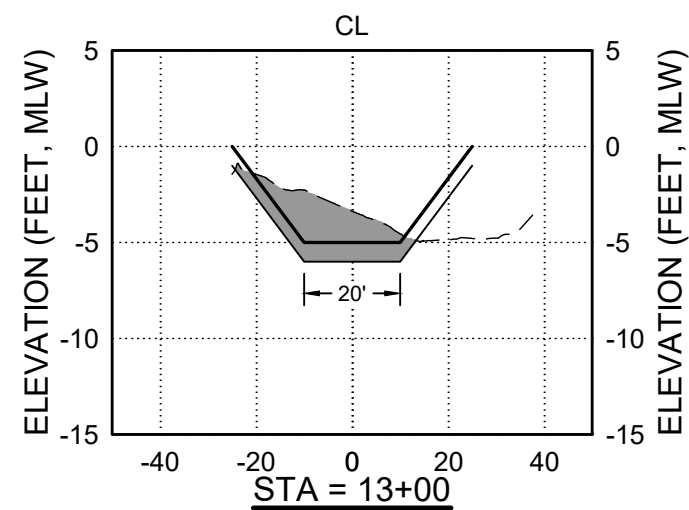
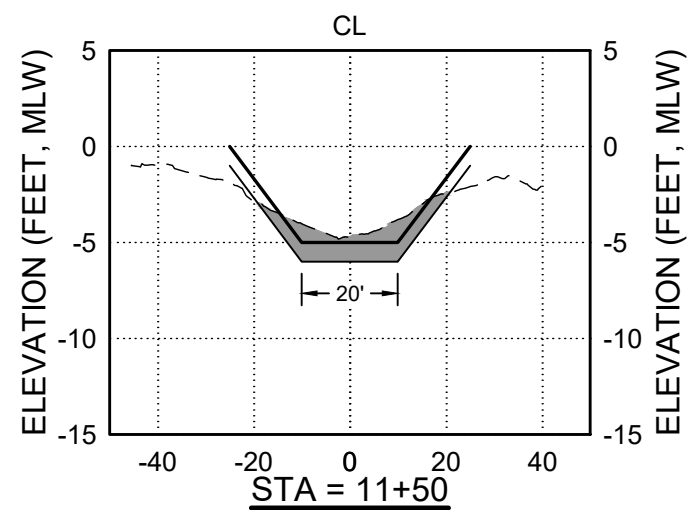
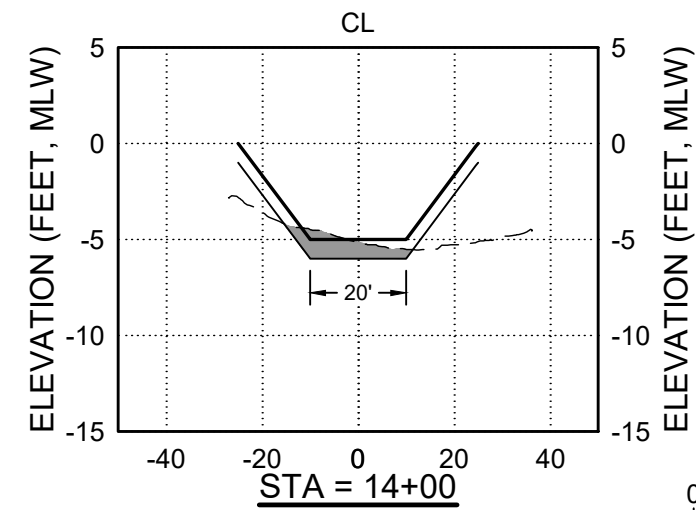
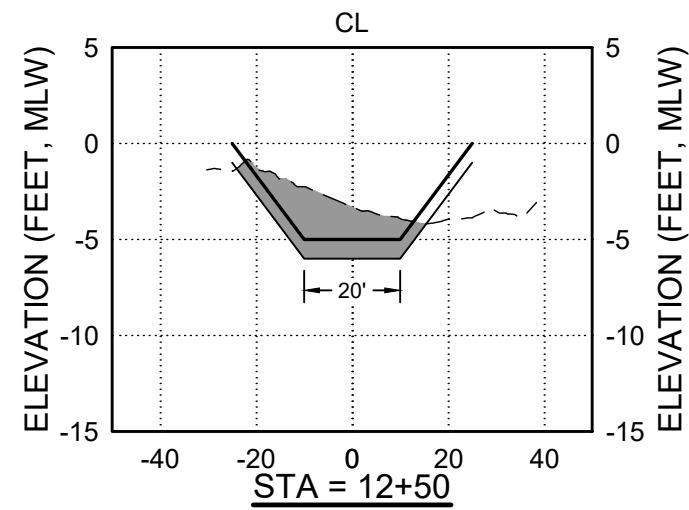
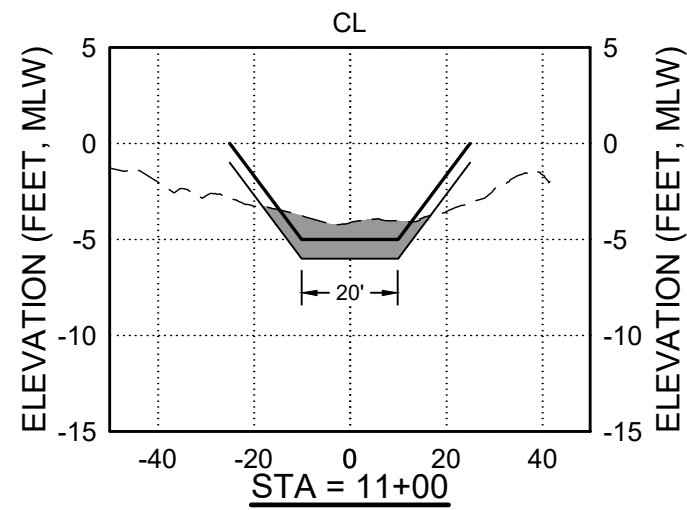
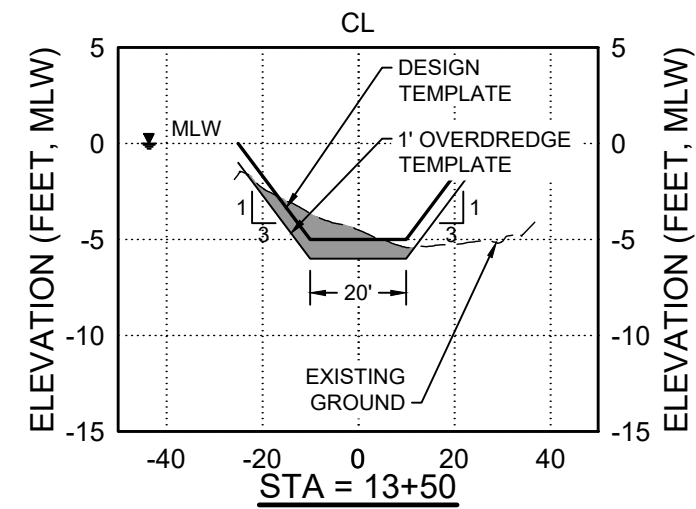
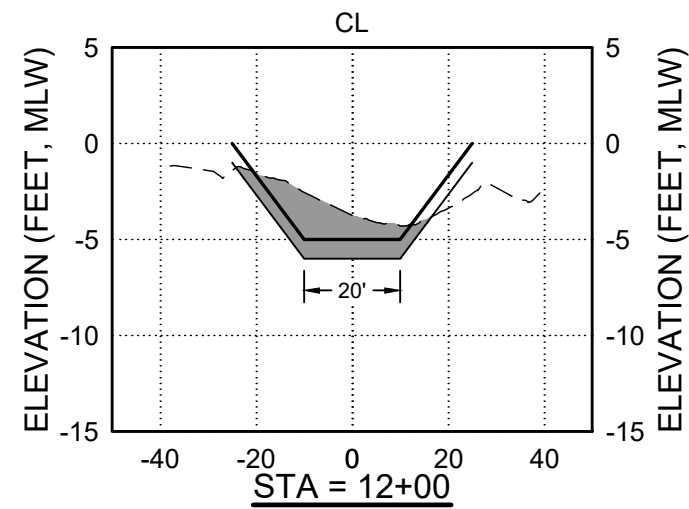
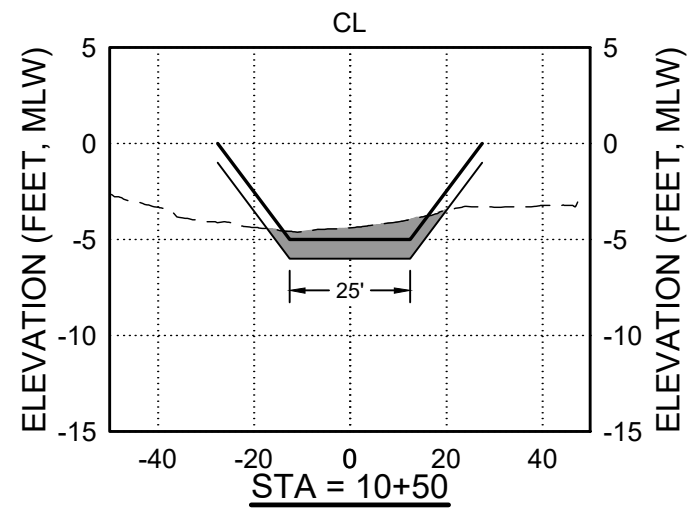
SIGNATURE _____

DATE _____


ROBERT B. NEAL, P.E.
LICENSE NO. 050016

[illegible]

PRINTED: 3-Mar-25, 7:46 PM BY: John Ordoñez
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CONSTRUCTION DRAWING

 <p>2086 VISTA PARKWAY, SUITE 280 WEST PALM BEACH, FL 33411 USA TEL: 561.831.5000 FAX: 561.831.5001 WWW.GEOSYNTEC.COM CERTIFICATE OF AUTHORIZATION NO. 4669</p>		<p>PROJECT: MAINTENANCE DREDGING</p> <p>SITE: HENLEY CANAL - LEE COUNTY, FL</p>		<p>DATE: 4 MAR 2025</p> <p>PROJECT NO.: AT25-4300</p> <p>DATE: AT25-430.02_06</p> <p>DRAWING NO.: 7 OF 7</p>		<p>SECTION: _____</p> <p>DRAWN BY: JWJO</p> <p>CHECKED BY: RBN</p> <p>REVIEWED BY: MJG</p> <p>APPROVED BY: RBN</p> <p>DATE: _____</p> <p>BY: _____</p> <p>FOR: _____</p>		<p>REV: _____</p> <p>DATE: _____</p> <p>APP: _____</p>		<p>DESCRIPTION: _____</p>	
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