



DEPARTMENT OF THE ARMY
U.S. ARMY CORPS OF ENGINEERS, JACKSONVILLE DISTRICT
PALM BEACH GARDENS PERMITS SECTION
701 SAN MARCO BOULEVARD
JACKSONVILLE FLORIDA 32207-8137

July 9, 2025

South Atlantic Division
Regulatory Technical Regional
Execution Center

City of Pompano Beach
100 West Atlantic Boulevard
Pompano Beach, FL 33060
Via Email: hector.gandia@copbfl.com

Dear City Staff:

This letter is in response to the Pre-Construction Notification (PCN) you submitted to the Jacksonville District on August 16, 2024 for a Department of the Army Nationwide permit (NWP) verification. This project has been assigned the file number SAJ-2023-01398 and is known as Pompano Beach, City of/SE 6 Terr Bridge Water Main and Force Main Relocation/Broward. This file number should be referenced in all correspondence concerning this project.

A review of the information provided indicates that the proposed work would include the installation of 77 linear feet of seawall on the southern end of the canal and 105 linear feet of seawall on the northern end of the canal, within 18 inches waterward of existing seawall. Additionally, 400 cubic yards (1,120 square feet) of canal bottom is proposed to be dredged to a depth of -8.5 NAVD on the edges of the canal and slop into depths of -11.52 NAVD in the center of the canal. Placement of approximately 890 cubic yards (601 square feet) of riprap would also be placed on the bank of the south side of canal above the mean high-water line (MHWL).. The project/review area is located at the SE 6th Terrace Bridge (Bridge No. 868106) within the SFWMD G-16 Canal, within Section 01, Township 049S, Range 042E; at Latitude 26.226680 and Longitude -80.112520; in Pompano Beach, Broward County, Florida.

We have determined that the proposed work is authorized by Nationwide Permit 14 pursuant to authorities under Section 10 of the Rivers and Harbors Act of 1899 (33 U.S.C. § 403), and Section 404 of the Clean Water Act (33 U.S.C. § 1344). The proposed work must be accomplished in strict accordance with the general permit conditions, any regional conditions, the special conditions listed in this letter, the application materials, and the enclosed plans. If the extent of the project area and/or nature of the authorized impacts to waters are modified, a revised PCN must be submitted to this office for written approval before work is initiated. Any violation of

permit conditions or deviation from your submitted plans may subject the permittee to enforcement action.

This verification is valid until March 14, 2026, unless prior to this date the subject NWP(s) is suspended, revoked, or is modified such that the activity no longer complies with the terms and conditions of this NWP. 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. You can access the U.S. Army Corps of Engineers' (Corps) Jacksonville District's Regulatory Source Book webpage 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, you will need to select "Nationwide Permits." Among other things, this part of the Source Book contains links to the federal register containing the text of the pertinent NWP authorization and the associated NWP general conditions, as well as separate links to the regional conditions applicable to the pertinent NWP verification.

Project Specific Special Conditions:

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-2023-01398 (NW – AMG), on all submittals.
2. **Permit Conditions Prevail:** If information in the permit attachments conflict with the special conditions of this permit, the requirements of the permit special conditions shall prevail.
3. **Posting of Permit:** The Permittee shall have available and maintain for review a copy of this permit and approved plans at the construction site.
4. **Local Notice to Mariners:** The contractor is required to contact the United States Coast Guard office a minimum of 2 weeks prior to commencement and provide locations affected, equipment, hours of operation, and duration of the project so that the information can be published in the Local Notice to Mariners.

5. **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.

6. **Cultural Resources/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. *For activities occurring on uplands:* If, during the ground disturbing activities and construction work within the permit area, there are archaeological/cultural materials encountered which were not the subject of a previous cultural resources assessment survey (and which shall include, but not be limited to: pottery, modified shell, human remains, ceramics, stone tools or metal implements, dugout canoes, evidence of structures or any other physical remains that could be associated with native cultures or early colonial settlement), the Permittee shall immediately stop all work and ground-disturbing activities within a 100-meter diameter of the discovery and notify the Corps at the addresses listed in the **Reporting Address Special Condition** within the same business day (8 hours). The Corps shall coordinate with the Florida State Historic Preservation Officer (SHPO) to assess the significance of the discovery and devise appropriate actions.
- c. *For activities occurring in submerged lands:* 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.

- d. 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.
- e. 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.

7. 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.

- 8. Manatee Conditions:** The Permittee shall comply with the “Standard Manatee Conditions for In-Water Work – 2011” (Attached). The most recent version of the Manatee Conditions must be utilized.
- 9. Protected Species Construction Conditions:** The Permittee shall comply with National Marine Fisheries Service’s “Protected Species Construction Conditions, NOAA Fisheries Southeast Regional Office” dated May 2021 (Attached).
- 10. Dredged Material Disposal:** The Permittee shall place all dredged material in a self-contained, upland disposal site as detailed in Figure 7 of the attached drawings. The Permittee shall maintain the upland disposal site to prevent the discharge of dredged material and associated effluent into waters of the United States.
- 11. 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.
- 12. Erosion Control:** Prior to the initiation of any work authorized by this permit, the Permittee shall install erosion control measures along the perimeter of all work areas to prevent the displacement of fill material outside the work area into waters of the United States. The erosion control measures shall remain in place and be maintained until all authorized work is completed and the work areas are stabilized.
- 13. Fill Material:** The Permittee shall use only clean fill material for this project. The fill material shall be free from items such as trash, debris, automotive parts, asphalt, construction materials, concrete block with exposed reinforcement bars, and soils contaminated with any toxic substance in toxic amounts, in accordance with Section 307 of the Clean Water Act.

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 NWP verification does not preclude the necessity to obtain any other Federal, State, or local permits, licenses, and/or certifications, which may be required.

If you have any questions related to this verification or have issues accessing documents referenced in this letter, please contact Ashley Gonzalez, Senior Project Manager of the Technical Regional Execution Center at 904-613-6217, by mail at the above address, or by email at Ashley.M.Gonzalez@usace.army.mil. Please take a moment to complete our customer satisfaction survey located at <https://regulatory.ops.usace.army.mil/customer-service-survey/>.

Sincerely,

A handwritten signature in black ink, appearing to be 'Ashley Gonzalez', with a long horizontal flourish extending to the right.

Ashley Gonzalez
Senior Project Manager

Enclosures included:

General Conditions

Permit Transfer Form

Project Drawings

Standard Manatee Conditions for In-Water Work – 2011

Protected Species Construction Conditions, NOAA Fisheries Southeast Regional Office

As-Built Certification by Professional Engineer or Surveyor form

Cc (w/enclosures)

Tori Bacheler, Kimley-Horn and Associates Inc (via tori.bacheler@kimley-horn.com)

Lisia Kowalczyk, U.S. Coast Guard (via Lisia.J.Kowalczyk2@uscg.mil)

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.
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.

DEPARTMENT OF THE ARMY PERMIT TRANSFER REQUEST

DA PERMIT NUMBER: SAJ-2023-01398

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)

INDEX OF STRUCTURE PLANS

SHEET NO.	SHEET DESCRIPTION
B-01	KEY SHEET
B-02	SIGNATURE SHEET
B-03	GENERAL NOTES
B-04	PLAN AND ELEVATION
B-05	BRIDGE HYDRAULIC RECOMMENDATIONS
B-06	SECTION THROUGH BRIDGE
B-07	REPORT OF CORE BORINGS (1 OF 2)
B-08	REPORT OF CORE BORINGS (2 OF 2)
B-09	FOUNDATION LAYOUT
B-10	PILE DATA TABLE
B-11	END BENT 1 LAYOUT
B-12	END BENT 4 LAYOUT
B-13	END BENT DETAILS (1 OF 2)
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B-15	PILE BENT 2 LAYOUT
B-16	PILE BENT 3 LAYOUT
B-17	PILE BENT DETAILS (1 OF 2)
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B-19	FINISH GRADE ELEVATIONS (1 OF 2)
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B-21	TYPICAL SECTION
B-22	FRAMING PLAN (1 OF 3)
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B-24	FRAMING PLAN (3 OF 3)
B-25	SUPERSTRUCTURE PLAN (1 OF 3)
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B-27	SUPERSTRUCTURE PLAN (2 OF 3)
B-28	SUPERSTRUCTURE DETAILS (1 OF 5)
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B-32	SUPERSTRUCTURE DETAILS (5 OF 5)
B-33	APPROACH SLAB (1 OF 2)
B-34	APPROACH SLAB (2 OF 2)
B-35	REINFORCING BAR LIST
B-36	LOAD RATING TABLE

FDOT STANDARD PLANS

INDEX NO.	INDEX DESCRIPTION
400-090	APPROACH SLAB (30 ft.) (FLEXIBLE PAVEMENT APPROACHES
415-001	BAR BENDING DETAILS (STEEL)
450-450	FLORIDA SLAB BEAM TYPICAL DETAILS AND NOTES
450-451	12" FLORIDA SLAB BEAM
455-001	SQUARE PRESTRESSED CONCRETE PILES - TYPICAL DETAILS AND NOTES
455-003	SQUARE PRESTRESSED CONCRETE PILES - EDC INSTRUMENTATION
455-024	24" SQUARE PRESTRESSED CONCRETE PILE
458-110	EXPANSION JOINT SYSTEM - POURED JOINT WITH BACKER ROD
515-021	PEDESTRIAN/BICYCLE BULLET RAILING FOR TRAFFIC RAILING
515-022	PEDESTRIAN/BICYCLE BULLET RAILING DETAILS
521-422	TRAFFIC RAILING - (42" VERTICAL SHAPE)
630-010	CONDUIT DETAILS - EMBEDDED

SHEET PILE WALL SHEETS

INDEX NO.	INDEX DESCRIPTION
BW-01	SHEET PILE BULKHEAD WALL - BENT 1
BW-02	SHEET PILE BULKHEAD WALL - BENT 4
BW-03	BULKHEAD WALL SECTIONS (1 OF 2)
BW-04	BULKHEAD WALL SECTIONS (2 OF 2)

GOVERNING STANDARDS & SPECIFICATIONS:
FLORIDA DEPARTMENT OF TRANSPORTATION,
STANDARD PLANS FOR ROAD AND BRIDGE
CONSTRUCTION, FY 2023-24,AND STANDARD
SPECIFICATIONS FOR ROAD AND BRIDGE
CONSTRUCTION DATED JANUARY 2024,
AS AMENDED BY CONTRACT DOCUMENTS.

SE 6TH TERRACE
BRIDGE REPLACEMENT
PROJECT #: 19-383

PREPARED FOR:
THE CITY OF POMPANO BEACH
LOCATION:
POMPANO BEACH, FLORIDA
SECTION 1, TOWNSHIP 49S, RANGE 42E

PLANS PREPARED BY:

Kimley»Horn

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CONSULTING ENGINEERS AND PLANNERS
1920 WEKIVA WAY, SUITE 200
WEST PALM BEACH, FL 33411
(561) 845-0665

NOTE: THE SCALE OF THESE PLANS MAY
HAVE CHANGED DUE TO REPRODUCTION.

STRUCTURE PLANS
ENGINEER OF RECORD: Jamea Potter Long

P.E. NO.: 58677

FISCAL YEAR	SHEET NO.
	B-01

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

GENERAL NOTES

- A. Design Specifications:
- FDOT Structures Manual Dated January 2024.
 - American Association of State Highway and Transportation Officials (AASHTO) Load and Resistance Factor (LRFD) Bridge Design Specifications, (9th Edition).
 - FDOT Design Manual dated January 2024.
- B. Governing Standards and Construction Specifications:
- Florida Department of Transportation, FY 2023-24 Standard Plans and revised Index Drawings as appended herein, and Standard Specifications for Road and Bridge Construction, as amended in the Contract Documents.
- C. Vertical Datum:
- Vertical Datum = NAVD 88
- D. Environmental Classifications:
- Superstructure: Slightly Aggressive
- Substructure: Extremely Aggressive (Resistivity = 25 Ohm-cm)
- E. Design Methodology:
- Load and Resistance Factor Design (LRFD) method using strength, service, and fatigue limit states.
 - Redundancy Factors: Concrete Substructure $\eta R=1.00$
 - Operational Importance Factor: Concrete Superstructures and Substructures $\eta I=1.00$
- F. Structural Analysis Program:
- Leap Bridge Concrete CE V20
- FDOT Prestressed Beam V6.2
- G. Design Loads:
- Live Loads: HL-93 with Dynamic Load Allowance
 - Dead Loads:

42" Vertical Shape Traffic Railing:	590 plf
Aluminum Bullet Railing	10 plf
Cultured Stone	15 psf
Reinforced Concrete:	150 pcf

Design does not include an allowance of 15 psf for future wearing surface.

The bridge utilizes an 6½" deck thickness which includes one-half inch sacrificial thickness included in the dead load of the deck but omitted from the section properties used for design.

3. Construction Loads:
- Finishing Machine Load: xx.x kips
- Finishing Machine Wheel Location beyond the edge of deck overhang: 6 inches
- Construction Live Load: 20 psf extended over the entire bridge width and 50-feet. in logitudinal length centered on the finishing machine.
- Removal Deck Cantilever Timber Forms with Overhang Brackets: 15 psf
- Live load at or near the outside of deck during deck casting: 75 plf applied as a moving load over a length of 20 feet.
- Construction Inactive Design Wind Speed: 90 MPH
- Velocity Pressure Exposure Coefficient (k): x.xx
- Construction Active Design Wind Speed: 30 MPH

4. Utilities:
- No allowance for utility loads has been included in the design.

- H. Materials:
- Reinforcing Steel: Grade 60 carbon steel per Specifications Section 931.
 - Concrete:

Concrete Class	Min. 28 Day Compressive Strength	Location of Concrete in Structure
II	3400 psi	Traffic Railings, Sheet Pile Wall Coping Caps
II	4500 psi	Approach Slabs
II	4500 psi	C.I.P. Concrete Topping with shrinkage reducing admixture
IV	5500 psi	End Bents, Pile Bents and Sheet Pile Wall Caps
VI	8500 psi	FSB Beams
V	6500 psi	Prestressed Concrete Piles

3. Concrete Cover:

Cast-In-Place Superstructure (Top of Deck)	2½"
Cast-In-Place Superstructure (Except Top of Deck)	2"
Precast Prestressed Beams (Except Top Surface)	2"
Top Surface ofBeam Top Flange	¾"
Cast-In-Place Substructure (Cast Against Earth)	4½"
Cast-In-Place Substructure (Formed Surfaces)	4"
Retaining Walls	3"

Concrete cover dimensions shown in the plans do not include placement and fabrication tolerances unless shown as "minimum cover". See Specifications Section 415 for allowable tolerances. All dimensions pertaining to the location of reinforcing steel are to centerline of bar except where clear dimension is noted to the face of concrete.

- I. Concrete Surface Finish:
- Class 5 Finish Coating is not required on this project.
- J. Plan Dimensions:
- All dimensions in these plans are measured in feet either horizontally or vertically unless otherwise noted.
- K. Utilities:
- For plan locations of existing utilities, see Plan and Elevation and Foundation Layout sheets. Locations of utilities shown in the plans are approximate. For disposition of utilities, see Utility Adjustment Sheets in the roadway plans.
- L. Bridge Name and Number:
- Place the following bridge name and number on the traffic railing in accordance with the Traffic Railing Standard Plans:
- | | |
|-----------------------|----------------|
| SE 6TH TERRACE BRIDGE | BR. NO. XXXXXX |
|-----------------------|----------------|
- M. Screeding Decks:
- Screed the riding surface of the Bridge Deck and Approach Slabs to archive the Finish Grade Elevations shown in the plans. Account for theoretical deflections due to self weight, deck casting sequence, deck forming systems, construction loads, overlays and temporary shoring, etc. as required.
- N. Stay-In-Place Forms:
- Stay in place deck forms will not be permitted on this project.
- O. Joints in Concrete:
- Construction joints will be permitted only at the locations indicated in the plans. Additional construction joints or alterations to those shown shall require approval of the Engineer.
- P. C-I-P Topping: Thoroughly saturate the top surface of the FSBs with water in accordance with Specification 400 for 12 hours immediately prior to placing the C-I-P topping. Remove standing water prior to placing the C-I-P topping. Cure the C-I-P topping in accordance with the Specification 400 requirements for bridge decks.
- Q. Perform vibration monitoring per FDOT Standard Specifications 108.

Abbreviations:

EF = Each Face

FF = Far Face

NF = Near Face

FFBW = Front Face of Backwall

PGL = Profile Grade Line

EOR = Engineer of Record

EJ = Expansion Joint


U.O.N. = Unless otherwise Noted

PEJM = Premolded Expansion Joint Material

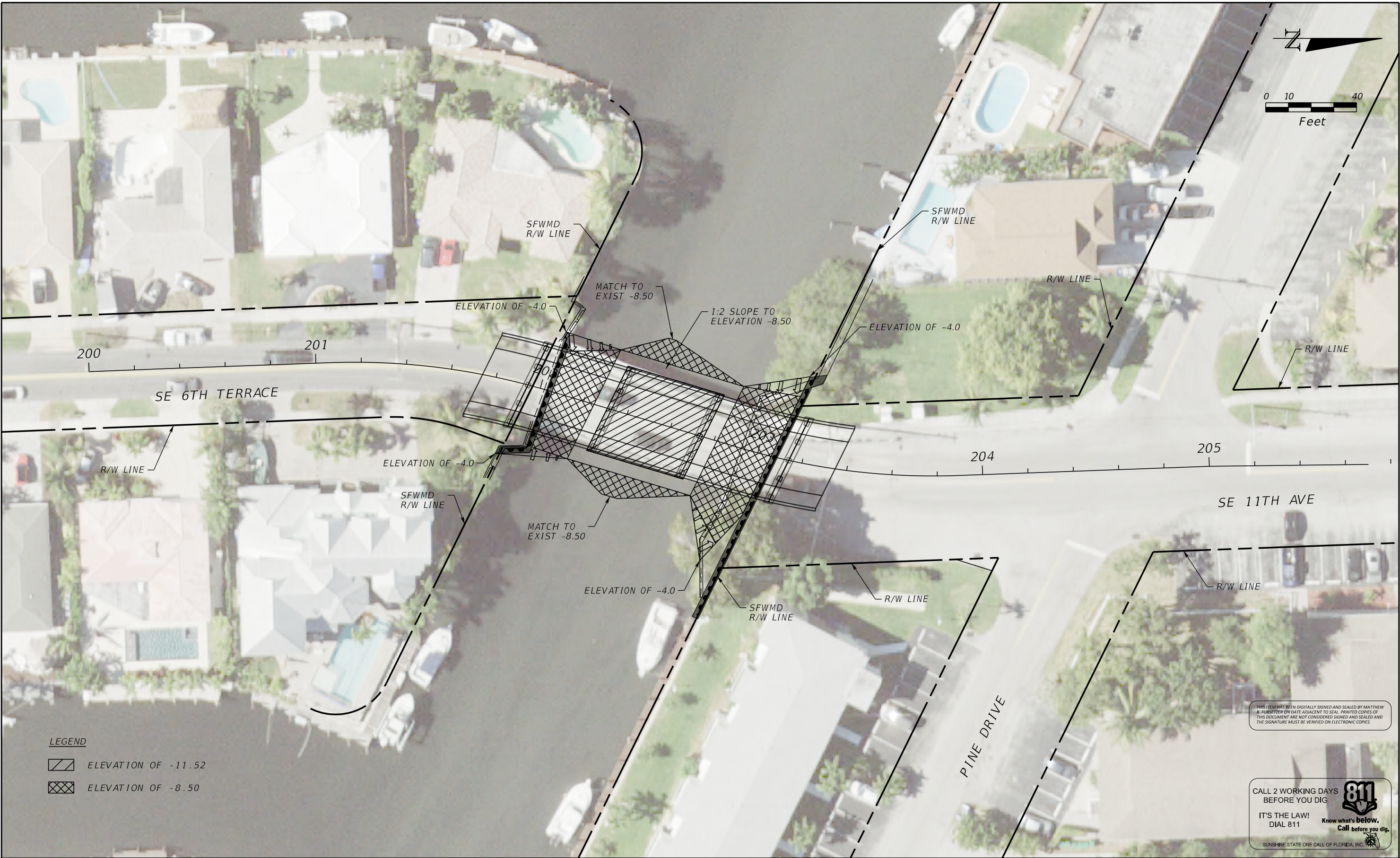
Btwn = Between

Note: For additional standard abbreviations and symbols see FDOT Design Standard Plans, Index "Abbreviations Sheet"

BRIDGE NO. XXXXXX

REVISIONS						 Registration No. 35106 Jamea Potter Long, P.E. P.E. License No. 58677 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411	Drawn By: RCA 03-24	THE CITY OF POMPANO BEACH		SHEET TITLE: GENERAL NOTES		REF. DWG. NO.
Date	By	Description	Date	By	Description		Checked by: JPL 03-24					
							Designed by: DAM 03-24	ROAD NO.	COUNTY	PROJECT NAME:		SHEET NO.
							Checked by: JPL 03-24	SE 6TH TERRACE	BROWARD	SE 6TH TERRACE BRIDGE REPLACEMENT		B-03

12/17/2024 9:05:27 AM K:\WPB_Design\040985062\roadway\archive\2024 0513\PLANRD003.dgn PLOTTED BY: AdanGarcia



No.	REVISIONS	DATE	BY



© 2024 KIMLEY-HORN AND ASSOCIATES, INC.
1920 WEKIVA WAY SUITE 200, WEST PALM BEACH, FL 33411
PHONE: 561-845-0665 FAX: 561-863-8175
WWW.KIMLEY-HORN.COM REGISTRY NO. 35106

KHA PROJECT 040985062
DATE MAY 2024
SCALE AS SHOWN
DESIGNED BY
DRAWN BY
CHECKED BY

S.E. 6TH TERRACE BRIDGE REPLACEMENT

PREPARED FOR
CITY OF POMPAÑO BEACH

CITY OF POMPAÑO FLORIDA

LICENSED PROFESSIONAL

MATTHEW B. FURSETZER

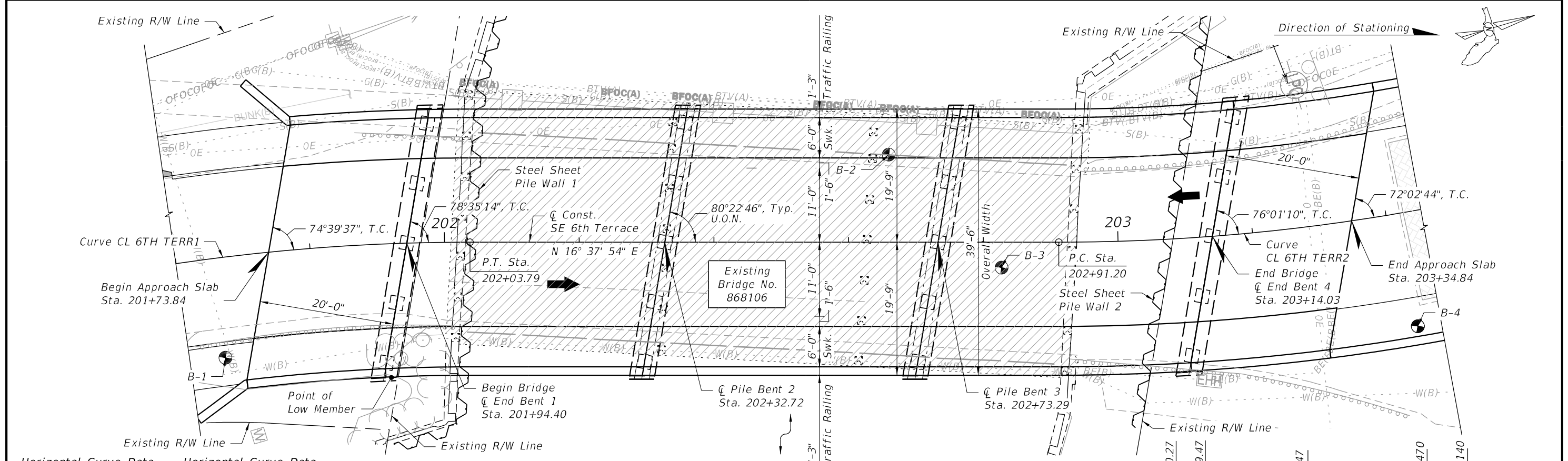
FLORIDA LICENSE NUMBER
63997

DATE:

DREDGING PLAN

SHEET NUMBER

This document, together with the contracts and design presented hereto, is an instrument of service, is intended only for the specific purpose and client for which it was prepared. Release of and improper reliance on this document without written authorization and adoption by Kimley-Horn and Associates, Inc. shall be without liability to Kimley-Horn and Associates, Inc. The official record of this sheet is the electronic file digitally signed and sealed under rule 61G15-2.004, F.A.C.



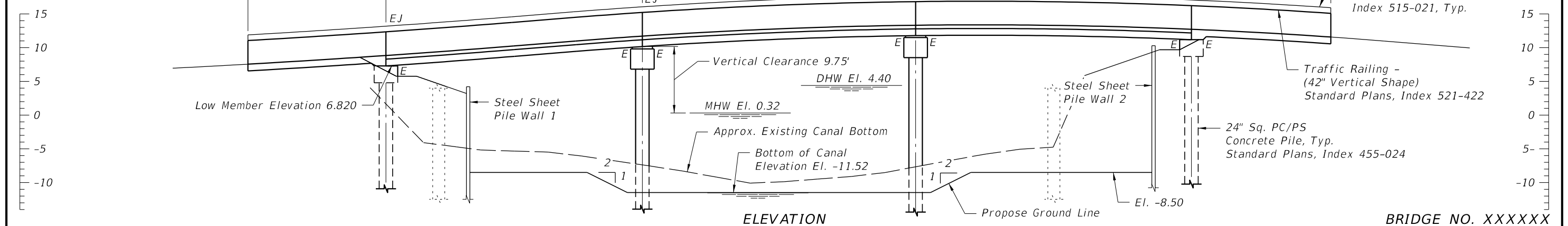
Horizontal Curve Data

Curve - CL 6TH TERR1
P.I. Sta. 201+55.21
$\Delta = 18^\circ 43' 30''$ Rt.
$D = 19^\circ 05' 55''$
$T = 49.96'$
$L = 98.04'$
$R = 300.00'$
PC = 201+05.74
PT = 202+03.79

Horizontal Curve Data

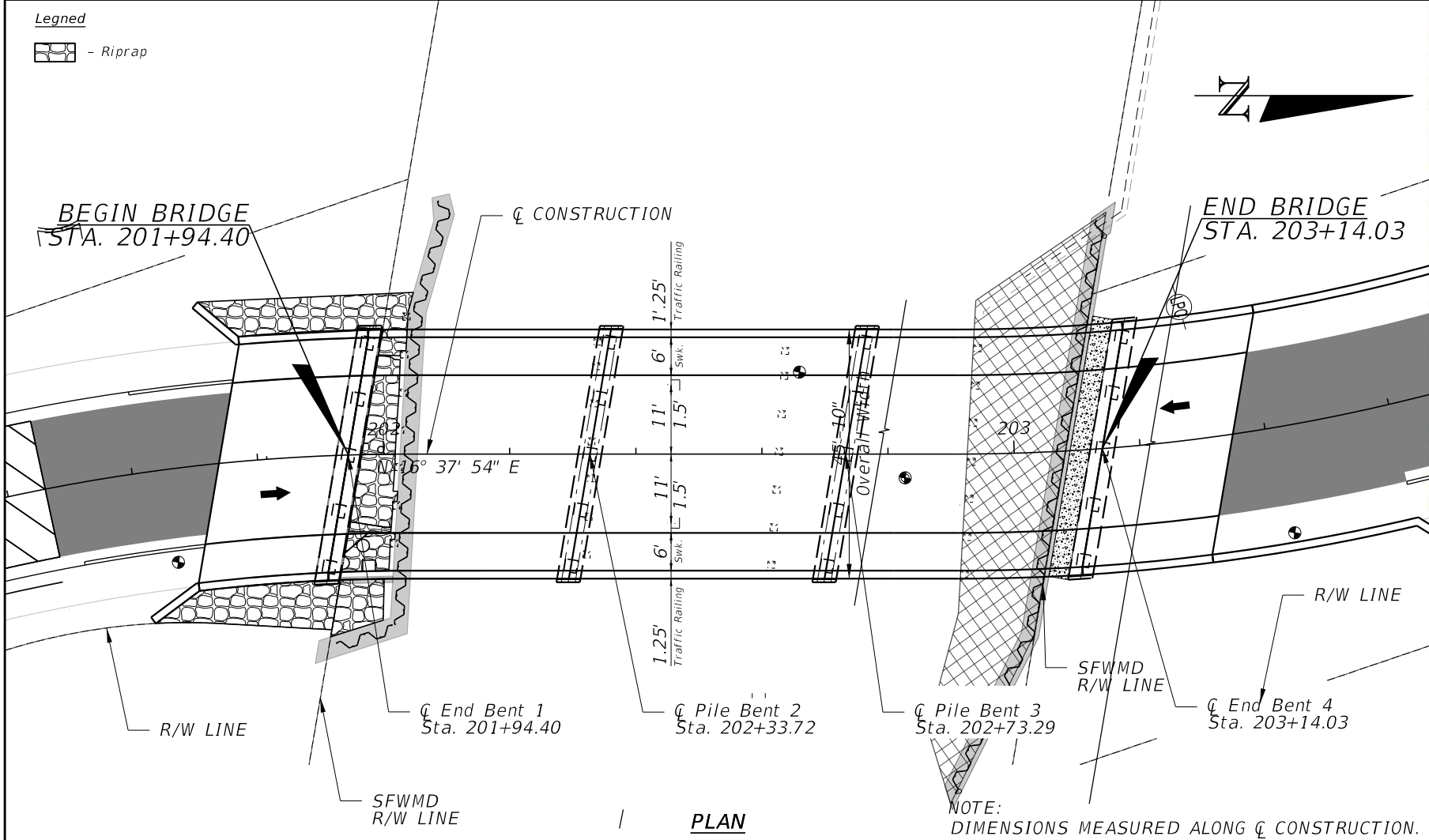
Curve - CL 6TH TERR2
P.I. Sta. 203+40.70
$\Delta = 18^\circ 44' 24''$ Lt.
$D = 19^\circ 05' 55''$
$T = 49.50'$
$L = 98.12'$
$R = 300.00'$
PC = 202+91.20
PT = 203+89.32

- Legend**
- E - Expansion Bearing
 - EJ - Expansion Joint
 - ➡ - Travel Lane
 - ⊙ - Soil Boring Location
 - ▨ - Existing Bridge Removal



REVISIONS						<div>KimleyHorn</div> <div>Registration No. 35106 Jamea Potter Long, P.E. P.E. License No. 58677 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411</div>	Drawn By: RCA 03-24	THE CITY OF POMPAÑO BEACH		SHEET TITLE:		REF. DWG. NO.	
Date	By	Description	Date	By	Description		Checked by: JPL 03-24			PLAN AND ELEVATION			
							Designed by: DAM 03-24	ROAD NO.	COUNTY	PROJECT NAME:	SHEET NO.		
							Checked by: JPL 03-24	SE 6TH TERRACE	BROWARD			SE 6TH TERRACE BRIDGE REPLACEMENT	B-04

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.



(REFERENCE) FOUNDATION	EXISTING STRUCTURES				PROPOSED STRUCTURE
	(1)	(2)	(3)	(4)	
CONCRETE PILES	91'				101'-55"
OVERALL LENGTH	2 @ 20'				4 @ 40'
SPAN LENGTH	CONCRETE				CONCRETE
TYPE CONSTRUCTION	1097 SQ. FT.				938 SQ. FT.
AREA OF OPENING @ D.F.	32'-0"				40'-2"
BRIDGE WIDTH	9.14' **				9.49' **
ELEV. LOW MEMBER					

NOTE:
The hydraulic data is shown for informational purposes only to indicate the flood discharges and water surface elevations which may be anticipated in any given year. This data was generated using highly variable factors determined by a study of the watershed. Many judgements and assumptions are required to establish these factors. The resultant hydraulic data is sensitive to changes, particularly antecedent conditions, urbanization, channelization and land use. Users of this data are cautioned against the assumption of precision which cannot be obtained.

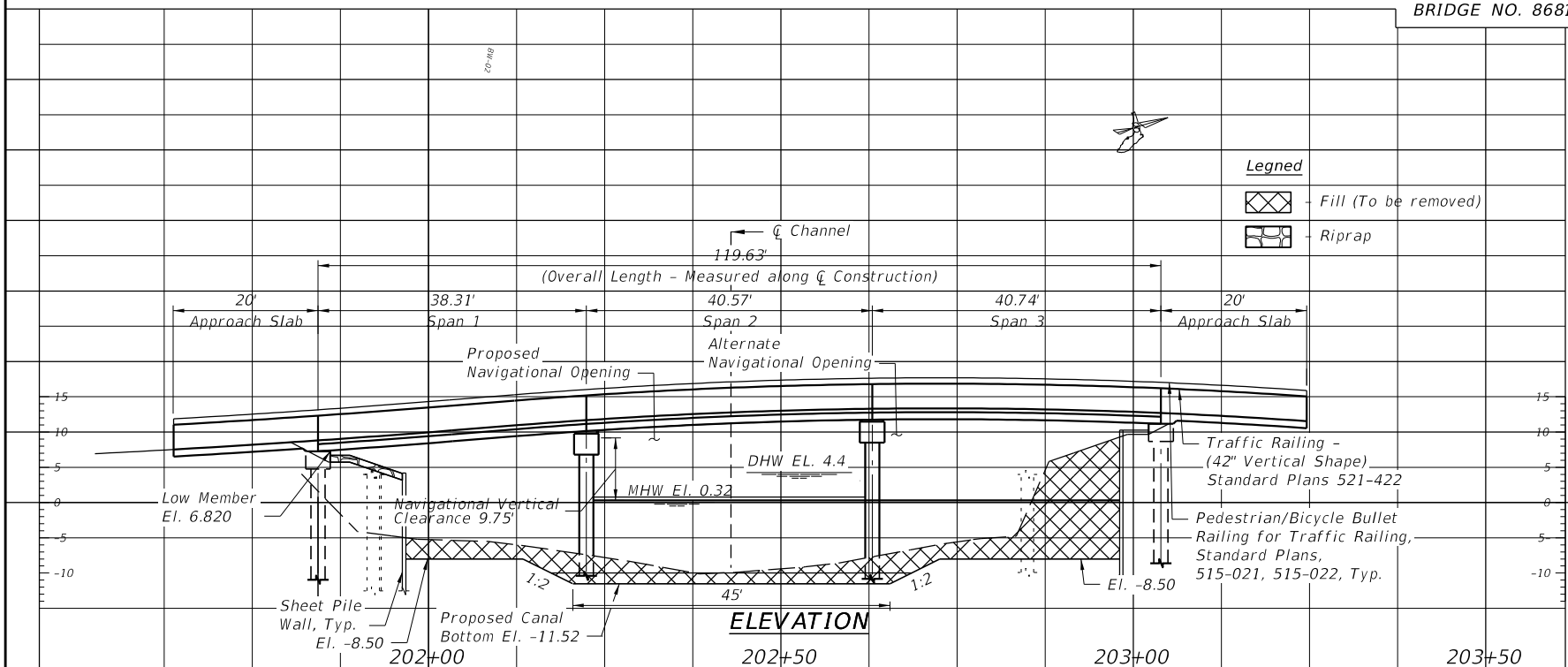
TERMS:
Design Flood: Utilized to assure a desired level of hydraulic performance.
Base Flood: Has a 1% chance of being exceeded in any given year (100 year frequency)
Overtopping Flood: Causes flow over the highway, over a watershed divide, or thru emergency relief structures.
Greatest Flood: The most severe that can be predicted where overtopping is not practicable.

WATER SURFACE ELEVATIONS:		N.H.W. (Non-Tidal)	N/A	M.H.W. (Tidal)	0.32 NAVD
		CONTROL (Non-Tidal)	N/A	M.L.W. (Tidal)	-2.00
FLOOD DATA:		MAX. EVENT OF RECORD	DESIGN FLOOD	BASE FLOOD	
STAGE ELEV. NAVD (ft)		UNKNOWN	+4.4	+4.6	+5.1
DISCHARGE (cfs)		N/A	1045	1122	1348
AVERAGE VELOCITY (f/s)		N/A	0.80	0.85	0.98
EXCEEDANCE PROB. (%)		N/A	2	1	0.1
FREQUENCY (yr.)		N/A	50	100	500
SCOUR PREDICTIONS FOR PROPOSED STRUCTURE DESCRIBED ABOVE:					
PIER INFORMATION		TOTAL SCOUR ELEVATION			
NUMBERS	SIZE AND TYPE	LONG TERM SCOUR ELEV.	WORST CASE < 100 yr. FREQ. (yr.)	WORST CASE < 500 yr. FREQ. (yr.)	
1-2	24" SQ. PCP	-13.0	-15.5	-15.5	

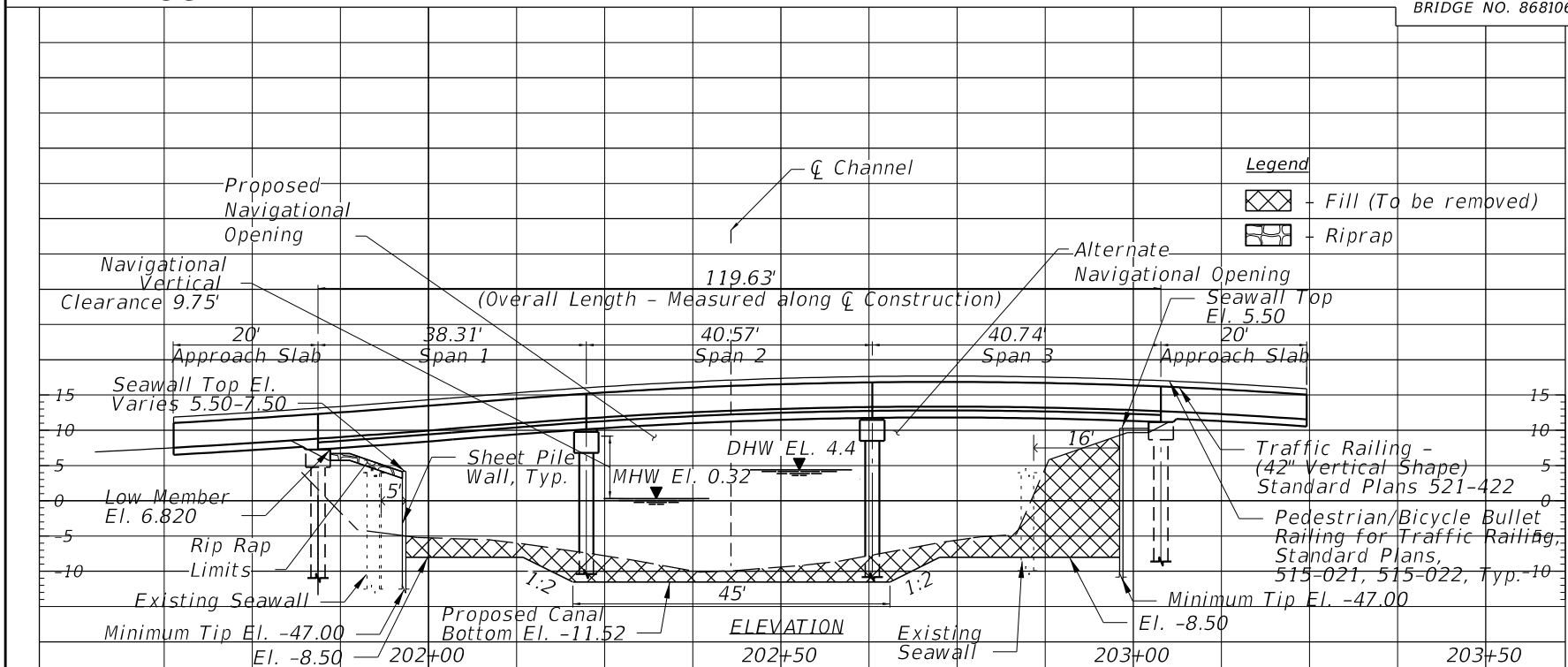
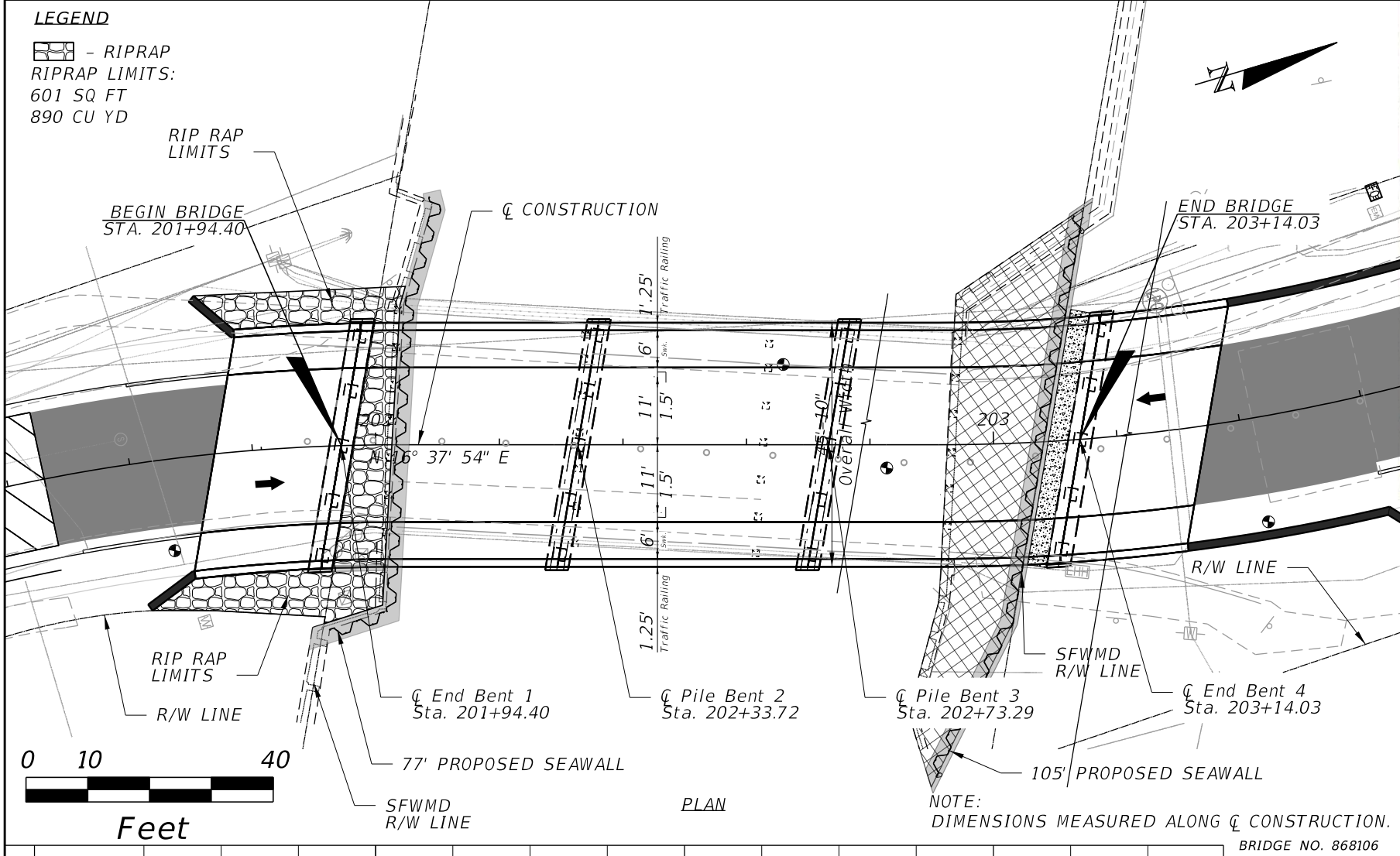
HYDRAULIC RECOMMENDATIONS					
1. BEGIN BRIDGE STATION	201+94.40		END BRIDGE STATION	203+14.03	
			SKEW ANGLE	0	
2. CLEARANCE PROVIDED:	NAV: HORIZ.	37.07'	VERT.	9.75'	ABOVE EL. 0.32
	DRIFT: HORIZ.	24.4'	VERT.	2.4'	ABOVE EL. +4.4
3. MINIMUM CLEARANCE:	NAV: HORIZ.	25'	VERT.	6'	ABOVE EL. 0.32
	DRIFT: HORIZ.	10'	VERT.	2'	ABOVE EL. +4.4
4. ABUTMENTS:					
	BEGIN BRIDGE			END BRIDGE	
	RUBBLE GRADE:			N/A	
	SLOPE:			VARIES, 1:2 MAX	
	BURIED OR NON-BURIED HORIZ. TOE:			NON-BURIED	
	TOE HORIZ. DISTANCE:				
	LIMIT OF PROTECTION:				
5. DECK DRAINAGE:	CURB TO INLETS OFF OF BRIDGE				

REMARKS: 2.00 NAVD IS THE PROJECTED SEA LEVEL RISE ELEVATION.

ALL ELEVATIONS ARE MEASURED IN DATUM NAVD 88.



REVISIONS				<div>KimleyHorn</div> <div>DEBORAH KNIGHTON, P.E. P.E. License No. 43920 201 NORHT FRANKLIN ST., SUITE 1400 TAMPA, FLORIDA 33602 PHONE (813) 510-6151</div>	<div>SE 6TH TERRACE BRIDGE REPLACEMENT PREPARED FOR THE CITY OF POMPAÑO BEACH</div>	<div>BRIDGE HYDRAULIC RECOMMENDATIONS</div>	SHEET NO.
DATE	DESCRIPTION	DATE	DESCRIPTION				B-05



(REFERENCE) FOUNDATION	EXISTING STRUCTURES				PROPOSED STRUCTURE
	(1)	(2)	(3)	(4)	
CONCRETE PILES	91'				101'-55"
OVERALL LENGTH	2 @ 20'				4 @ 40'
SPAN LENGTH	CONCRETE				CONCRETE
TYPE CONSTRUCTION	1097 SQ. FT.				938 SQ. FT.
AREA OF OPENING @ D.F.	32'-0"				40'-2"
BRIDGE WIDTH	9.14' **				9.49' **
ELEV. LOW MEMBER					

HYDRAULIC DESIGN DATA				
NOTE: The hydraulic data is shown for informational purposes only to indicate the flood discharges and water surface elevations which may be anticipated in any given year. This data was generated using highly variable factors determined by a study of the watershed. Many judgements and assumptions are required to establish these factors. The resultant hydraulic data is sensitive to changes, particularly antecedent conditions, urbanization, channelization and land use. Users of this data are cautioned against the assumption of precision which cannot be obtained.				
TERMS: Design Flood: Utilized to assure a desired level of hydraulic performance. Base Flood: Has a 1% chance of being exceeded in any given year (100 year frequency) Overtopping Flood: Causes flow over the highway, over a watershed divide, or thru emergency relief structures. Greatest Flood: The most severe that can be predicted where overtopping is not practicable.				
WATER SURFACE ELEVATIONS: N.H.W. (Non-Tidal) N/A M.H.W. (Tidal) 0.32 NAVD CONTROL (Non-Tidal) N/A M.L.W. (Tidal) -2.00				
FLOOD DATA: MAX. EVENT OF RECORD DESIGN FLOOD BASE FLOOD				
STAGE ELEV. NAVD (ft)	UNKNOWN	+4.4	+4.6	+5.1
DISCHARGE (cfs)	N/A	1045	1122	1348
AVERAGE VELOCITY (f/s)	N/A	0.80	0.85	0.98
EXCEEDANCE PROB. (%)	N/A	2	1	0.1
FREQUENCY (yr.)	N/A	50	100	500
SCOUR PREDICTIONS FOR PROPOSED STRUCTURE DESCRIBED ABOVE:				
TOTAL SCOUR ELEVATION				
PIER INFORMATION	LONG TERM	WORST CASE < 100 yr.	WORST CASE < 500 yr.	
NUMBERS	SIZE AND TYPE	SCOUR ELEV.	FREQ. (yr.)	FREQ. (yr.)
1-2	24" SQ. PCP	-13.0	100	100

HYDRAULIC RECOMMENDATIONS				
1. BEGIN BRIDGE STATION	201+94.40	END BRIDGE STATION	203+14.03	SKEW ANGLE
2. CLEARANCE PROVIDED: NAV: HORIZ. 37.07' VERT. 9.75' ABOVE EL. 0.32		DRIFT: HORIZ. 24.4' VERT. 2.4' ABOVE EL. +4.4		
3. MINIMUM CLEARANCE: NAV: HORIZ. 25' VERT. 6' ABOVE EL. 0.32		DRIFT: HORIZ. 10' VERT. 2' ABOVE EL. +4.4		
4. ABUTMENTS:				
	BEGIN BRIDGE	END BRIDGE		
	RUBBLE GRADE:	BANK AND SHORE	N/A	
	SLOPE:	VARIES, 1:2 MAX	N/A	
	BURIED OR NON-BURIED HORIZ. TOE:	NON-BURIED	N/A	
	TOE HORIZ. DISTANCE:			
	LIMIT OF PROTECTION:			
5. DECK DRAINAGE:	CURB TO INLETS OFF OF BRIDGE			
REMARKS:	2.00 NAVD IS THE PROJECTED SEA LEVEL RISE ELEVATION.			
	ALL ELEVATIONS ARE MEASURED IN DATUM NAVD 88.			

REVISIONS				SHEET NO.
DATE	DESCRIPTION	DATE	DESCRIPTION	
				19

KimleyHorn

DEBORAH KNIGHTON, P.E.
P.E. License No. 43920
201 NORHT FRANKLIN ST., SUITE 1400
TAMPA, FLORIDA 33602
PHONE (813) 510-6151

SE 6TH TERRACE
BRIDGE REPLACEMENT
PREPARED FOR
THE CITY OF POMPAÑO BEACH

**BRIDGE HYDRAULIC
RECOMMENDATIONS**

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

Property Owner:
Tracy Lago

Property Owner:
City of Pompano Bch.

Property Owner:
John & Janice Griffin


Property Owner:
Pine Drive Manor
Association, Inc.

Notes:

1. Datum NAVD 88

PLAN

Legned

 - Fill (To be removed)

ELEVATION

Scale:
H: 1"=20'
V: 1"=1'

NOTE:
ALL ELEVATIONS SHOWN
ARE BASED ON
NAVD 88 DATUM.

CONVERSION
NGVD 29-1.52'=NAVD 88.

APPLICANT/OWNER: CITY OF POMPANO BEACH
Agent: Kimley-Horn and Associates, Inc.
S.E. 6th Terrace (S.E. 11th Avenue) Bridge, mile 1.320 (Old Pompano G-16 Canal)
Lat/Long: 26°13'36.0"N 80°06'44.9"W
Pompano Beach, Broward County, FL

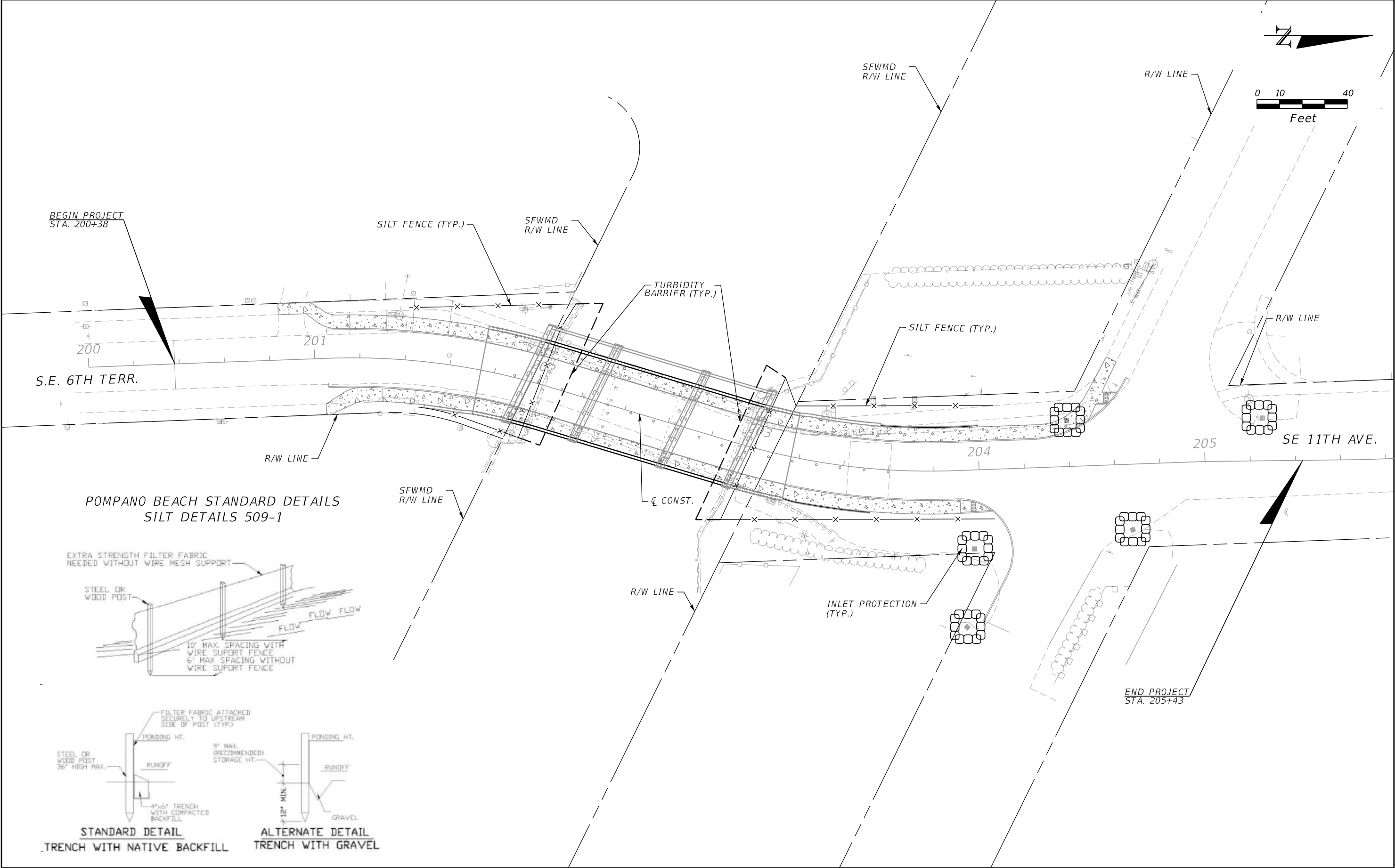
DATE OF PLANS

05/07/24

SHEET NO.

Sheet 3 of 4

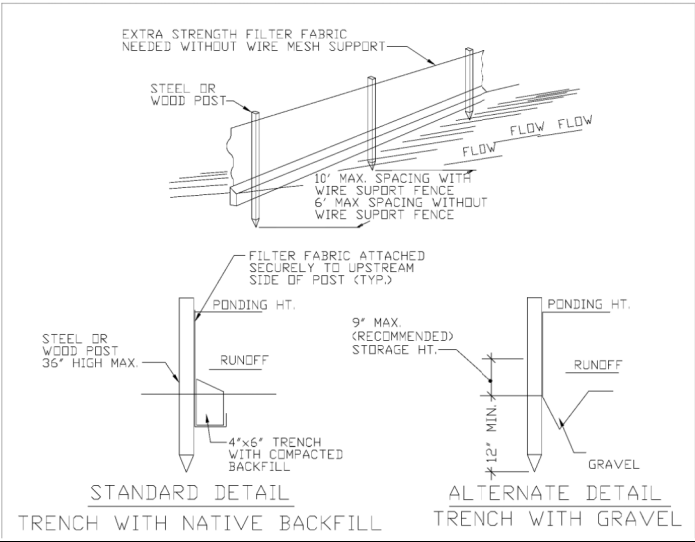
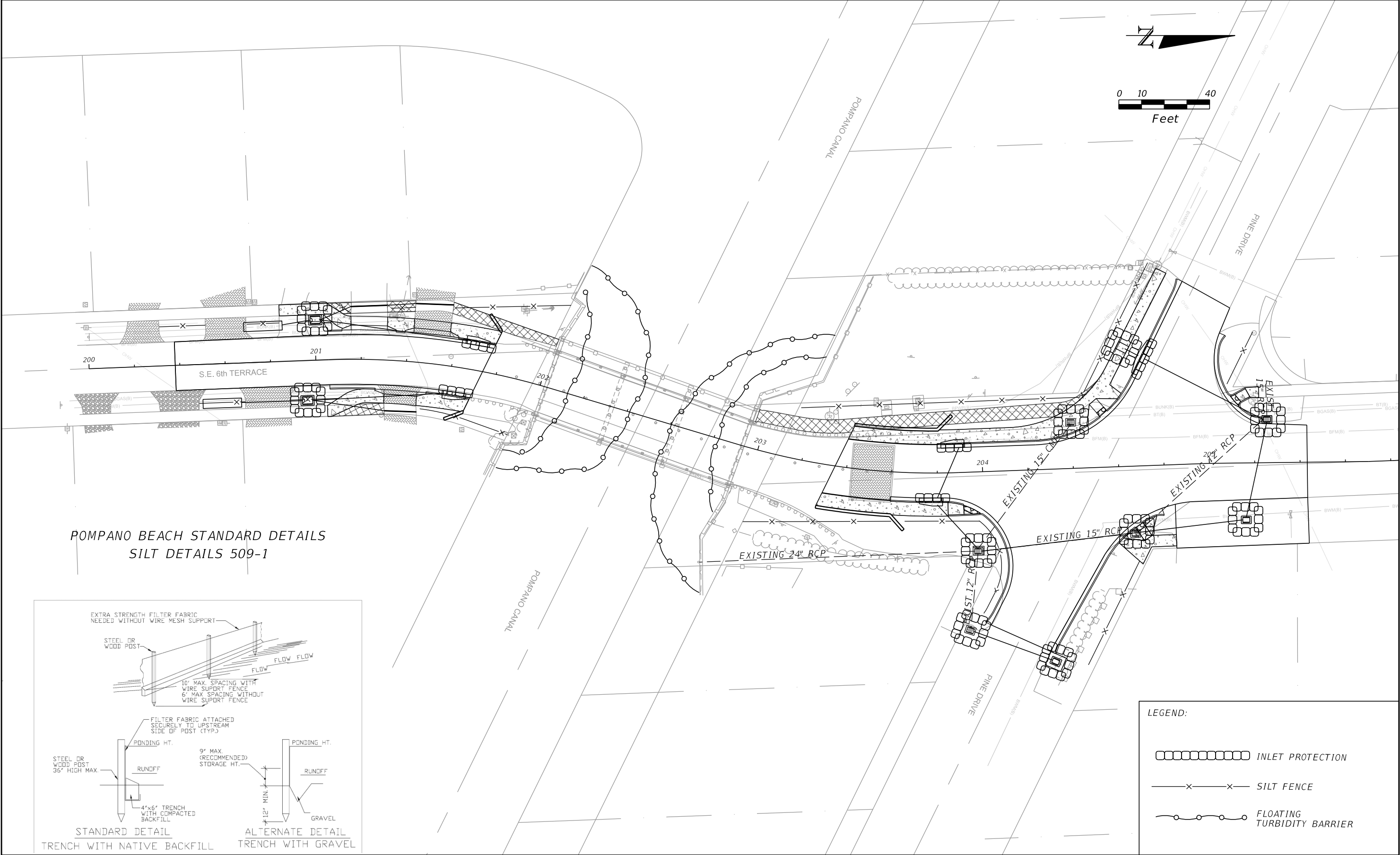
PLAN AND ELEVATION



REVISIONS				<div>KimleyHorn</div> <div>Certificate Of Authorization No. 696 Matthew B. Fursetzer, P.E. P.E. License No. 63997 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411</div>	<div>SE 6TH TERRACE BRIDGE REPLACEMENT PREPARED FOR THE CITY OF POMPAÑO BEACH</div>	S.W.P.P.P. DETAILS		SHEET NO.
DATE	DESCRIPTION	DATE	DESCRIPTION					13

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

6/5/2024 1:35:04 PM K:\WPB_Design\040985062_Pompano - SE 6th Terr\040985062_Landscp\SWPPLD01.dgn PLOTTED BY: Alyssa Davidson



LEGEND:

INLET PROTECTION

SILT FENCE

FLOATING TURBIDITY BARRIER

No.	REVISIONS	DATE	BY

© 2024 KIMLEY-HORN AND ASSOCIATES, INC.
1920 WEKIVA WAY SUITE 200, WEST PALM BEACH, FL 33411
PHONE: 561-845-0665 FAX: 561-863-8175
WWW.KIMLEY-HORN.COM REGISTRY NO. 35106

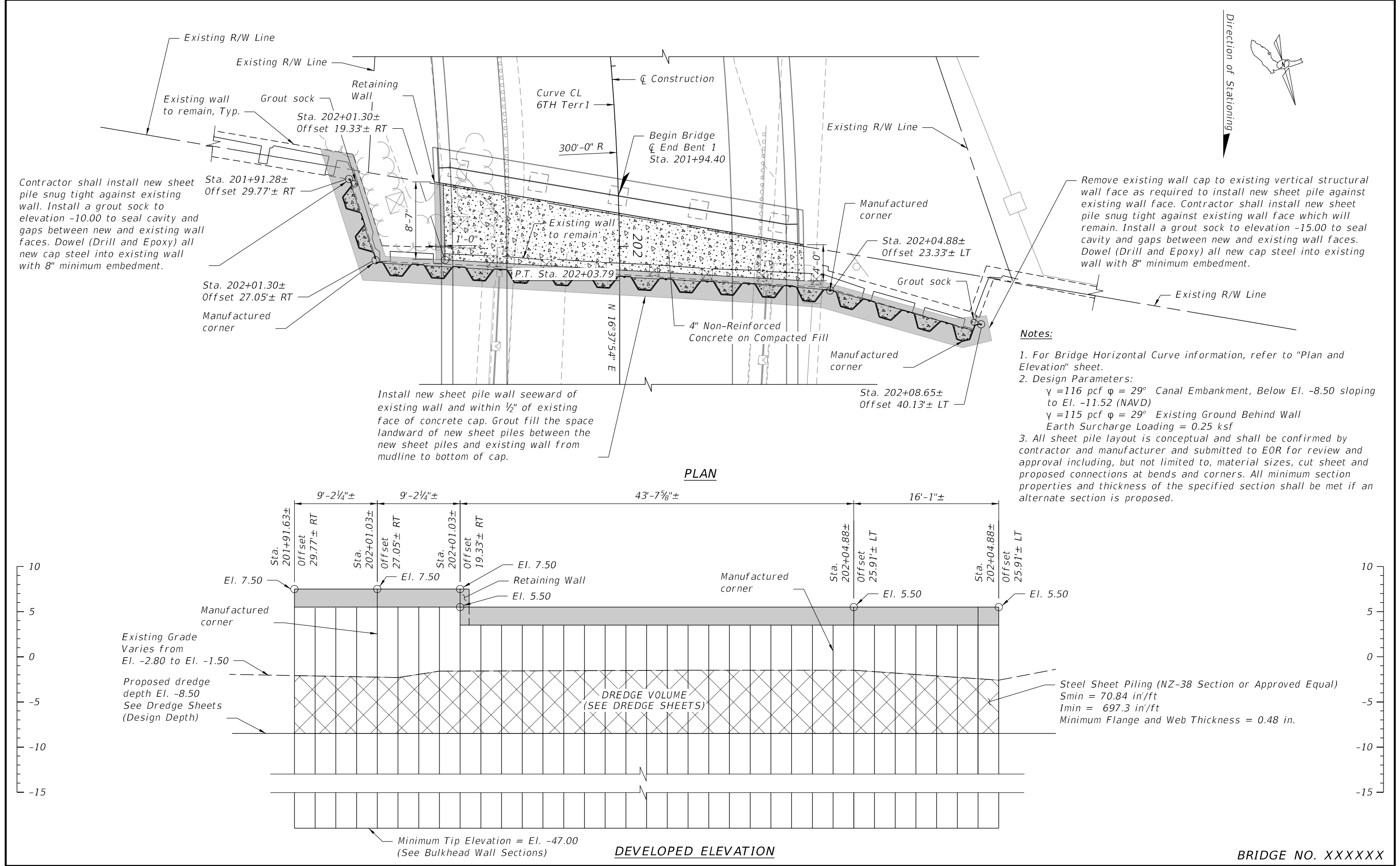
KHA PROJECT 040985062
DATE MAY 2024
SCALE AS SHOWN
DESIGNED BY
DRAWN BY
CHECKED BY

S.E. 6TH TERRACE BRIDGE
REPLACEMENT
PREPARED FOR
CITY OF POMPAÑO BEACH
CITY OF POMPAÑO FLORIDA

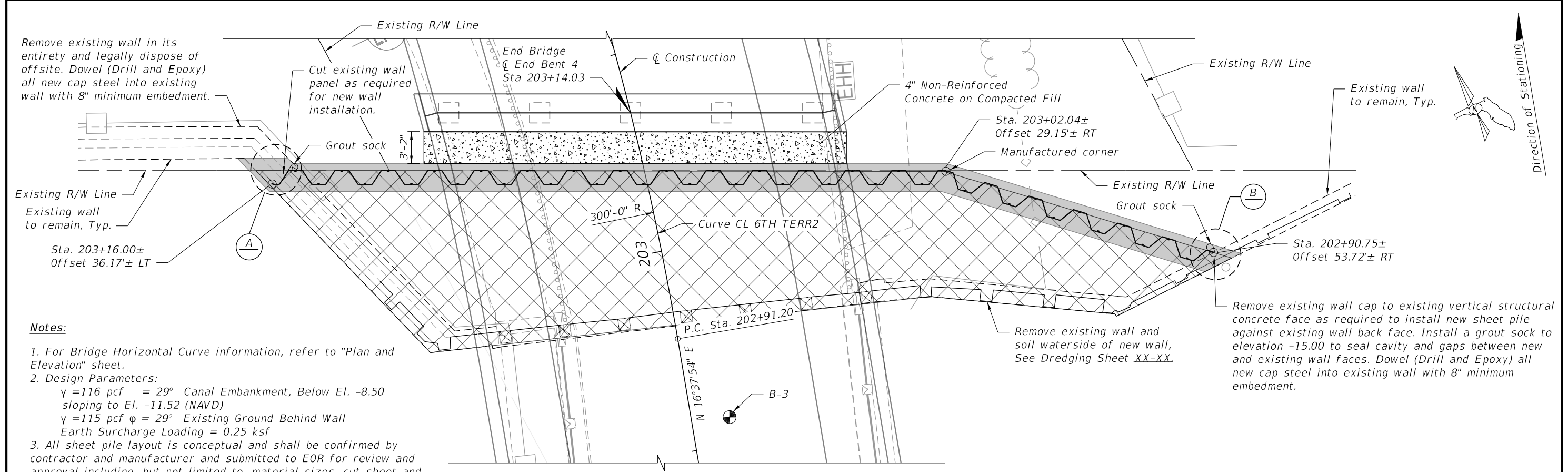
LICENSED PROFESSIONAL
DEBORAH LYNN KNIGHTON
FLORIDA LICENSE NUMBER
43920

STORMWATER POLLUTION
PREVENTION PLAN

SHEET NUMBER
18

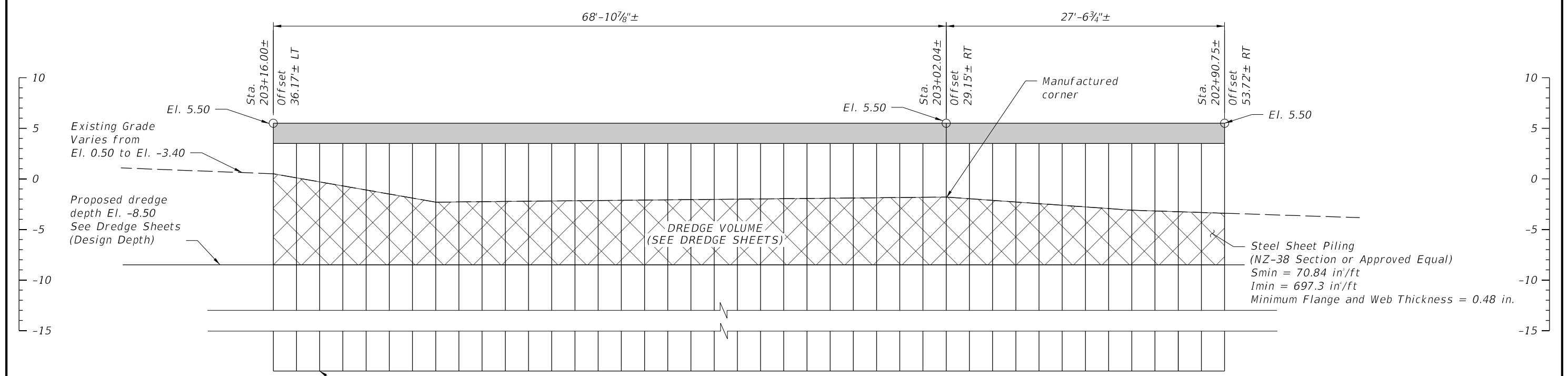


REVISIONS						<div>KimleyHorn</div> <div>Registration No. 35106 Jamea Potter Long, P.E. P.E. License No. 58677 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411</div>	Drawn By:	THE CITY OF POMPANO BEACH	SHEET TITLE:	REF. DWG. NO.
Date	By	Description	Date	By	Description		RCA 03-24		SHEET PILE BULKHEAD WALL - BENT 1	
							Checked by:			
							JPL 03-24			
							Designed by:			
						DAM 03-24	ROAD NO.	COUNTY	PROJECT NAME:	SHEET NO.
						Checked by:	SE 6TH TERRACE	BROWARD	SE 6TH TERRACE BRIDGE REPLACEMENT	BW-01
						JPL 03-24				



- Notes:**
- For Bridge Horizontal Curve information, refer to "Plan and Elevation" sheet.
 - Design Parameters:
 - $\gamma = 116 \text{ pcf} = 29^\circ$ Canal Embankment, Below El. -8.50 sloping to El. -11.52 (NAVD)
 - $\gamma = 115 \text{ pcf} \phi = 29^\circ$ Existing Ground Behind Wall
 - Earth Surcharge Loading = 0.25 ksf
 - All sheet pile layout is conceptual and shall be confirmed by contractor and manufacturer and submitted to EOR for review and approval including, but not limited to, material sizes, cut sheet and proposed connections at bends and corners. All minimum section properties and thickness of the specified section shall be met if an alternate section is proposed.

PLAN

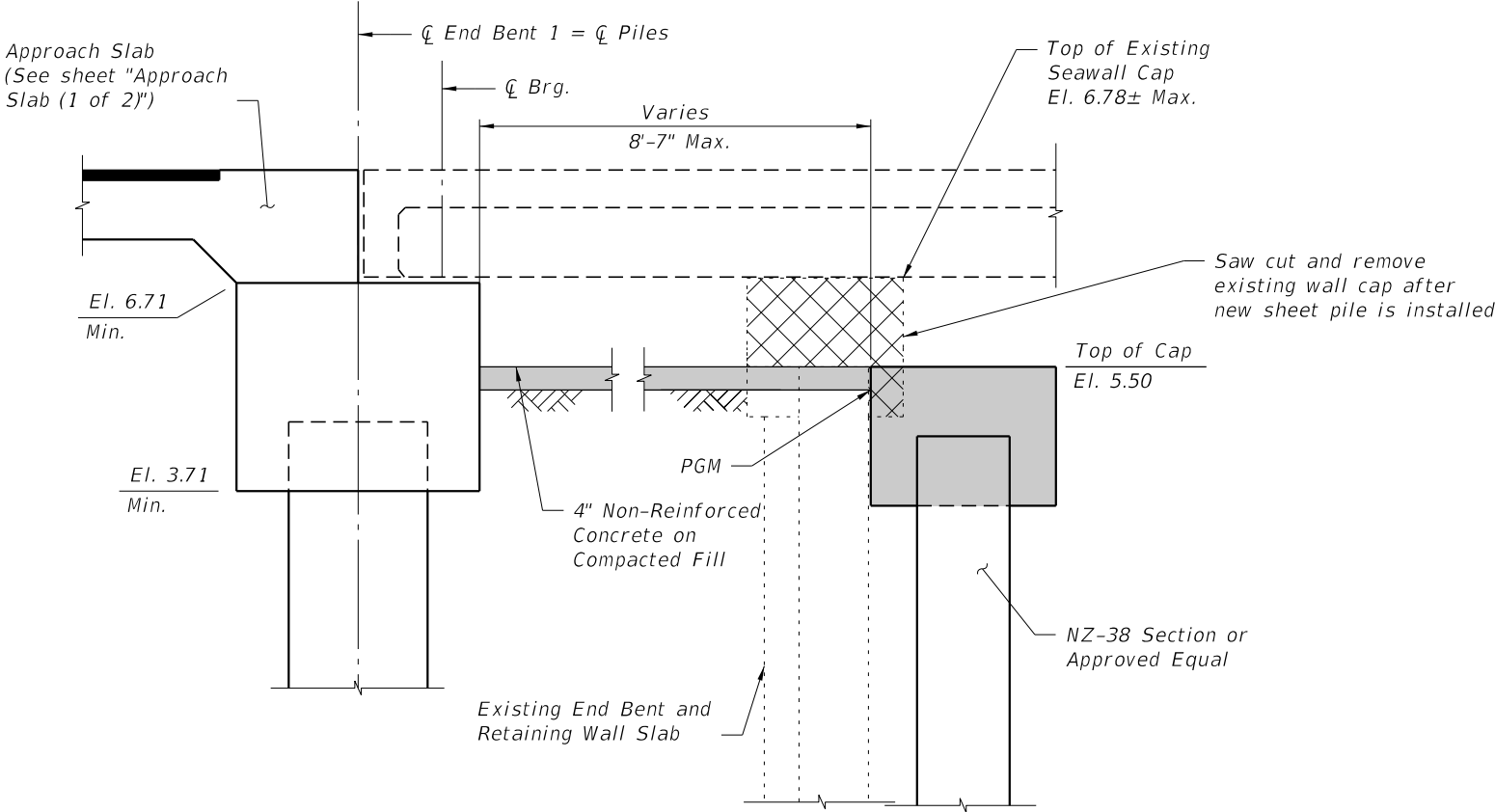


DEVELOPED ELEVATION

BRIDGE NO. XXXXXX

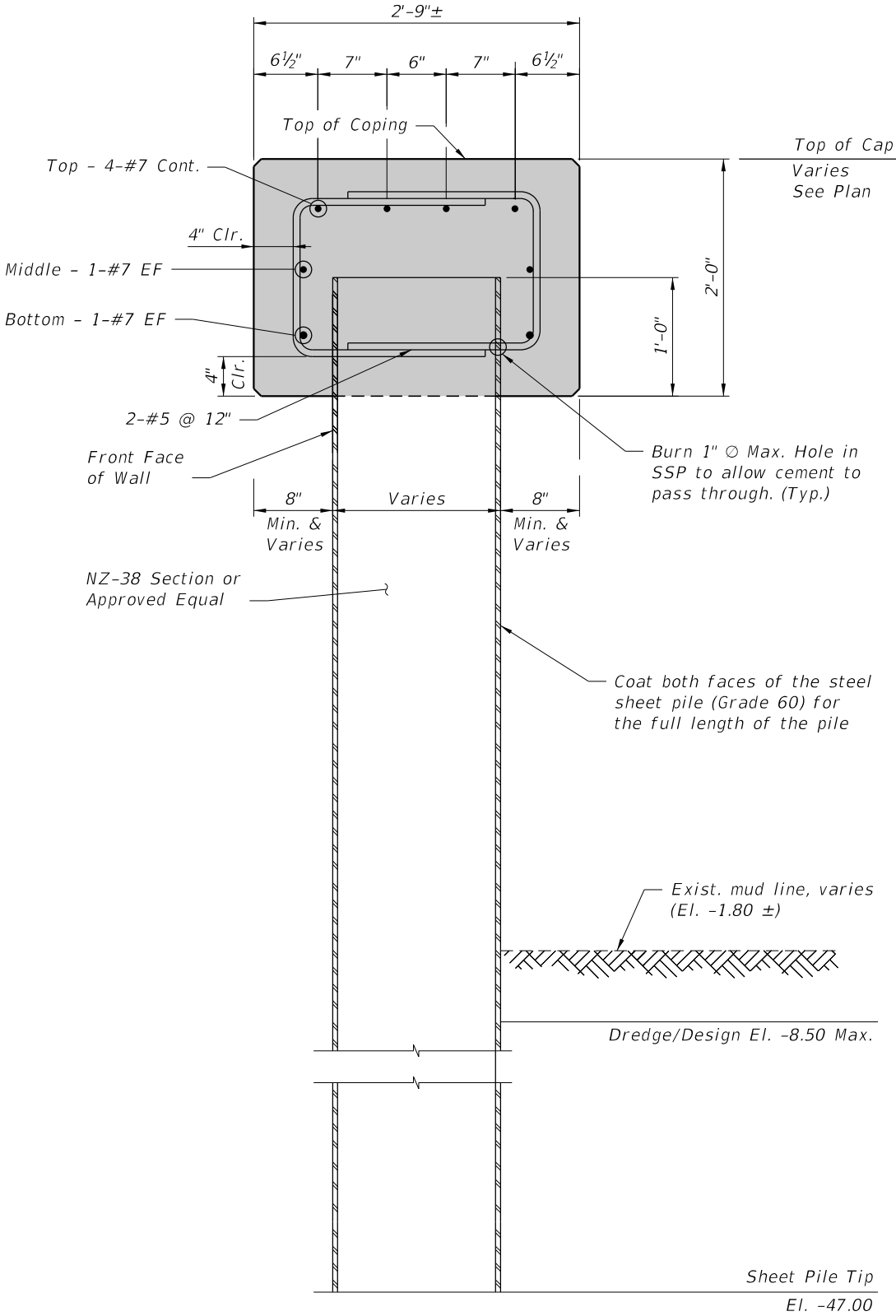
REVISIONS						<div>KimleyHorn</div> <div>Registration No. 35106</div> <div>Jamea Potter Long, P.E.</div> <div>P.E. License No. 58677</div> <div>1920 Wekiva Way, Suite 200</div> <div>West Palm Beach, Florida 33411</div>	Drawn By:	THE CITY OF POMPANO BEACH		SHEET TITLE:		REF. DWG. NO.
Date	By	Description	Date	By	Description		RCA 03-24			SHEET PILE BULKHEAD WALL - BENT 4		
							Checked by:					
							JPL 03-24					
							Designed by:	ROAD NO.	COUNTY	PROJECT NAME:	SHEET NO.	
						DAM 03-24	SE 6TH TERRACE	BROWARD	SE 6TH TERRACE BRIDGE REPLACEMENT	BW-02		
						Checked by:						
						JPL 03-24						

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SECTION @ END BENT 1

BENT 1 - BULKHEAD WALL COPING CAP QUANTITIES		
ITEM	UNIT	QUANTITY
Concrete (Typical)	CY/FT	0.204
Reinforcing Steel (Typical)	LB/FT	28.77



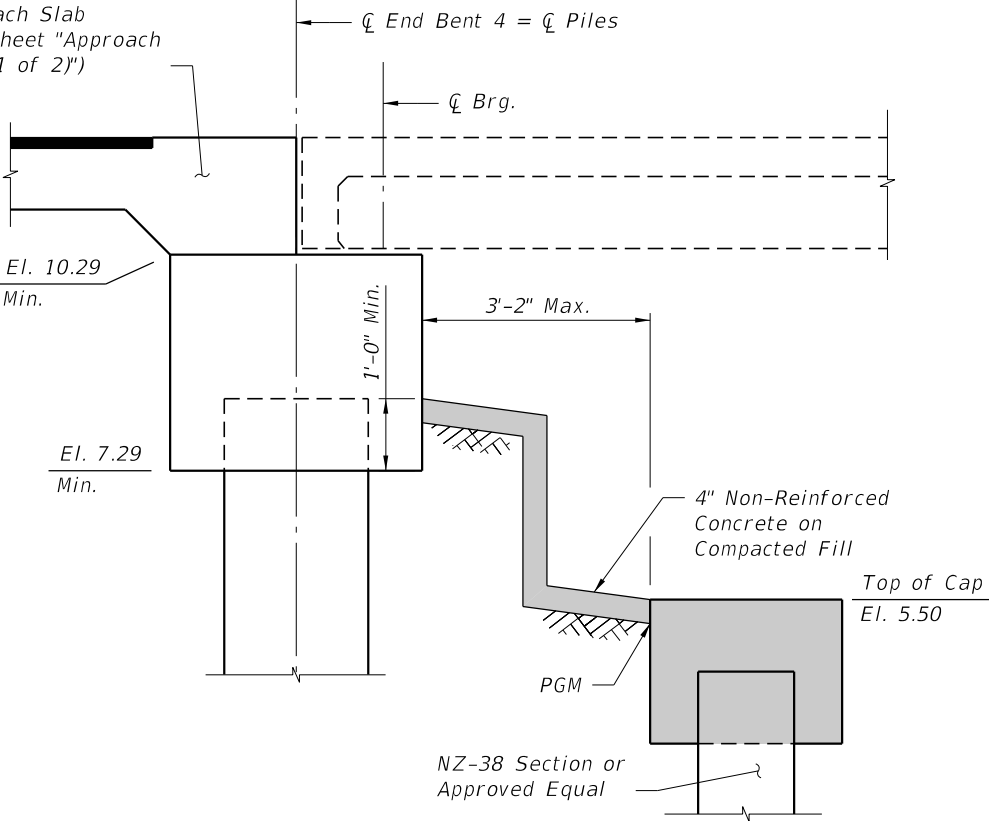
TYPICAL SECTION THRU STEEL SHEET PILE WALL WITH CAP

BRIDGE NO. XXXXXX

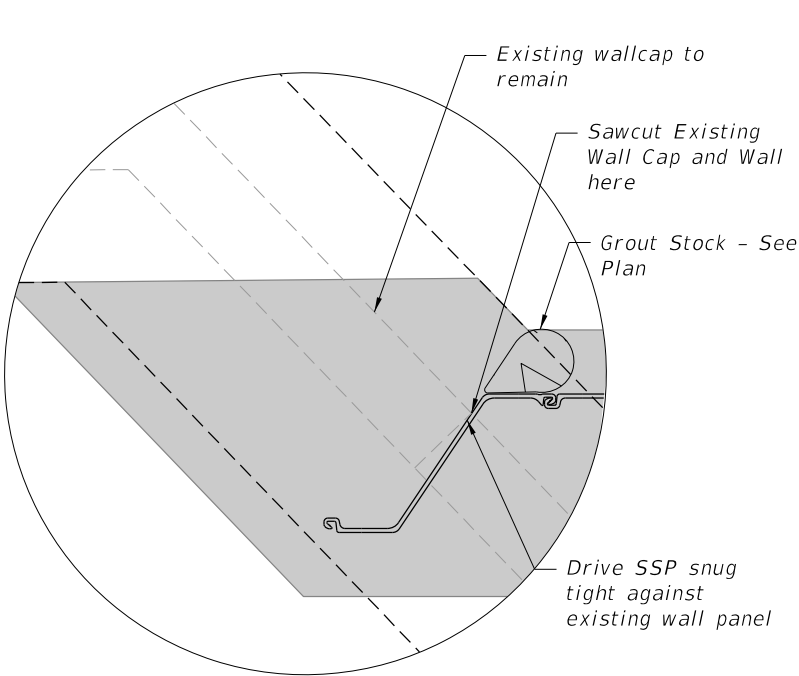
REVISIONS						 Registration No. 35106 Jamea Potter Long, P.E. P.E. License No. 58677 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411	Drawn By: RCA 03-24 Checked by: JPL 03-24 Designed by: DAM 03-24 Checked by: JPL 03-24	THE CITY OF POMPAÑO BEACH		SHEET TITLE: BULKHEAD WALL SECTIONS (1 OF 2)		REF. DWG. NO.
Date	By	Description	Date	By	Description			ROAD NO.	COUNTY	PROJECT NAME: SE 6TH TERRACE BRIDGE REPLACEMENT	SHEET NO. BW-03	
								SE 6TH TERRACE	BROWARD			

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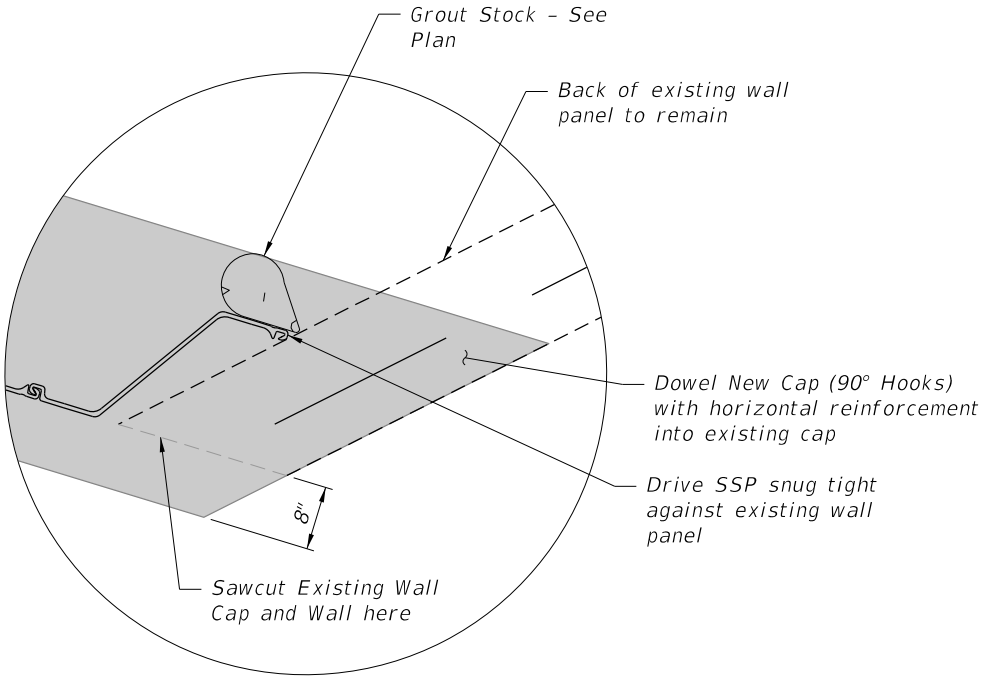
Approach Slab
(See sheet "Approach
Slab (1 of 2)")



SECTION @ END BENT 4

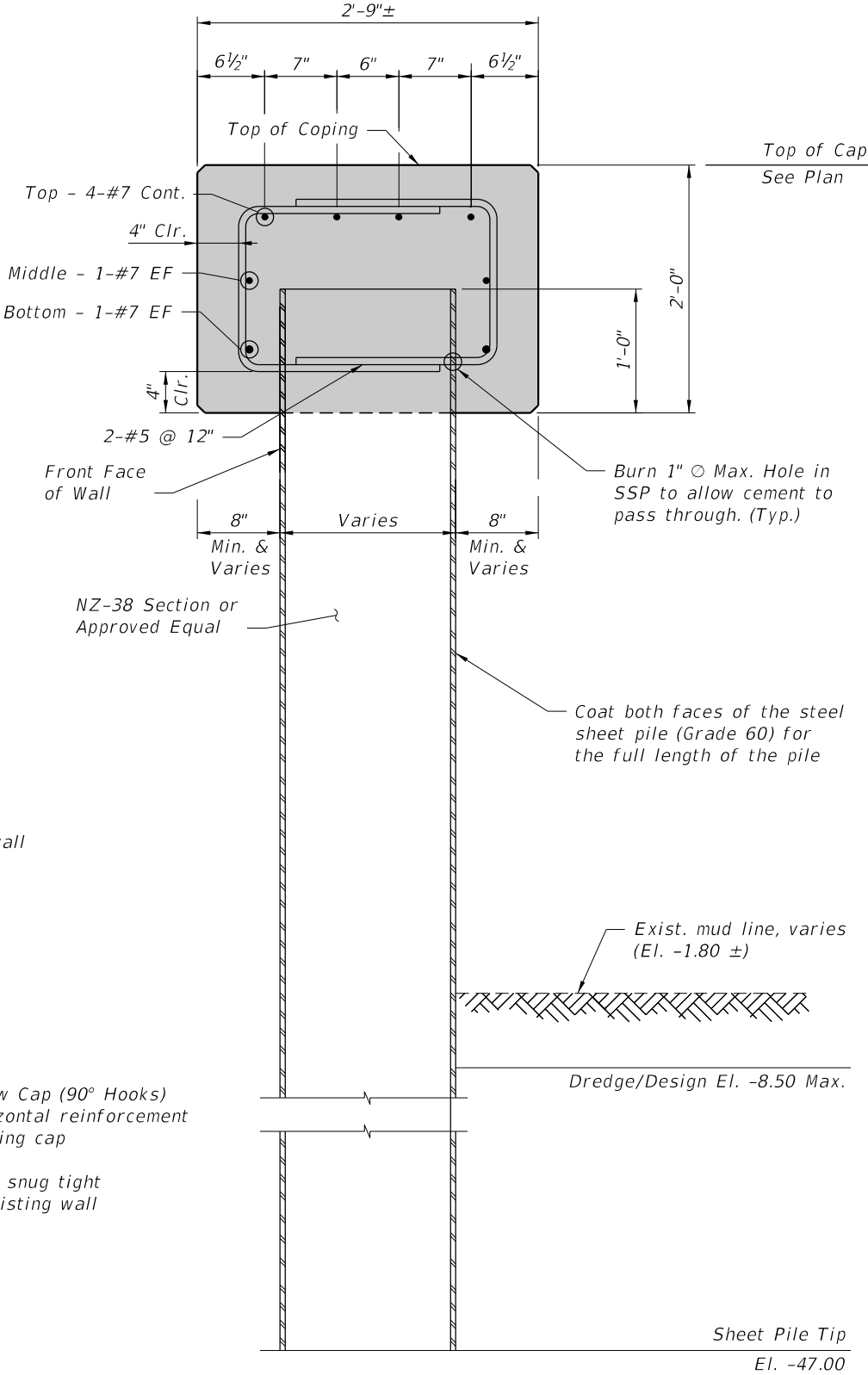


VIEWPORT A



VIEWPORT B

BENT 4 - BULKHEAD WALL COPING CAP QUANTITIES		
ITEM	UNIT	QUANTITY
Concrete (Typical)	CY/FT	0.204
Reinforcing Steel (Typical)	LB/FT	28.77

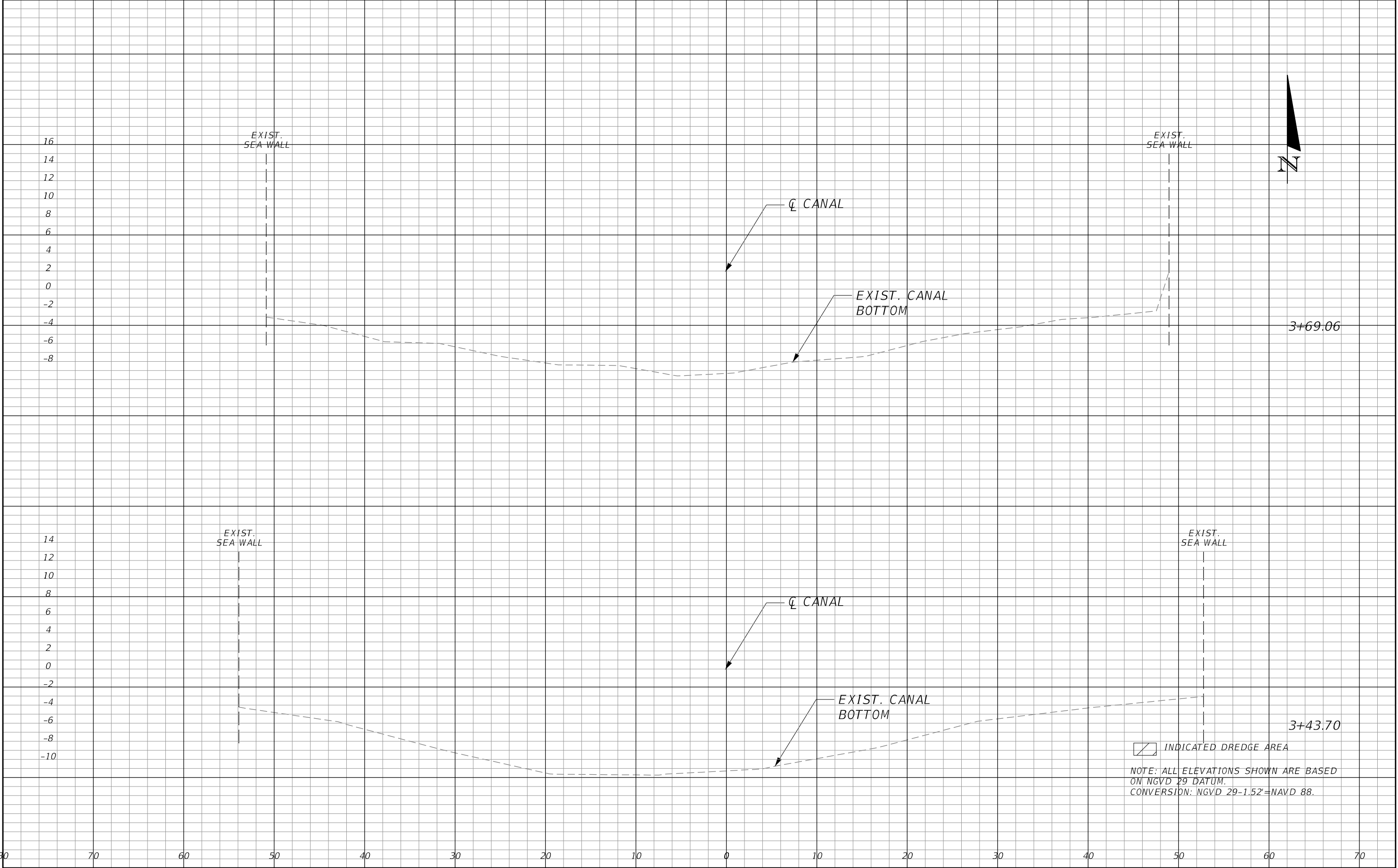


TYPICAL SECTION THRU STEEL SHEET PILE WALL WITH CAP

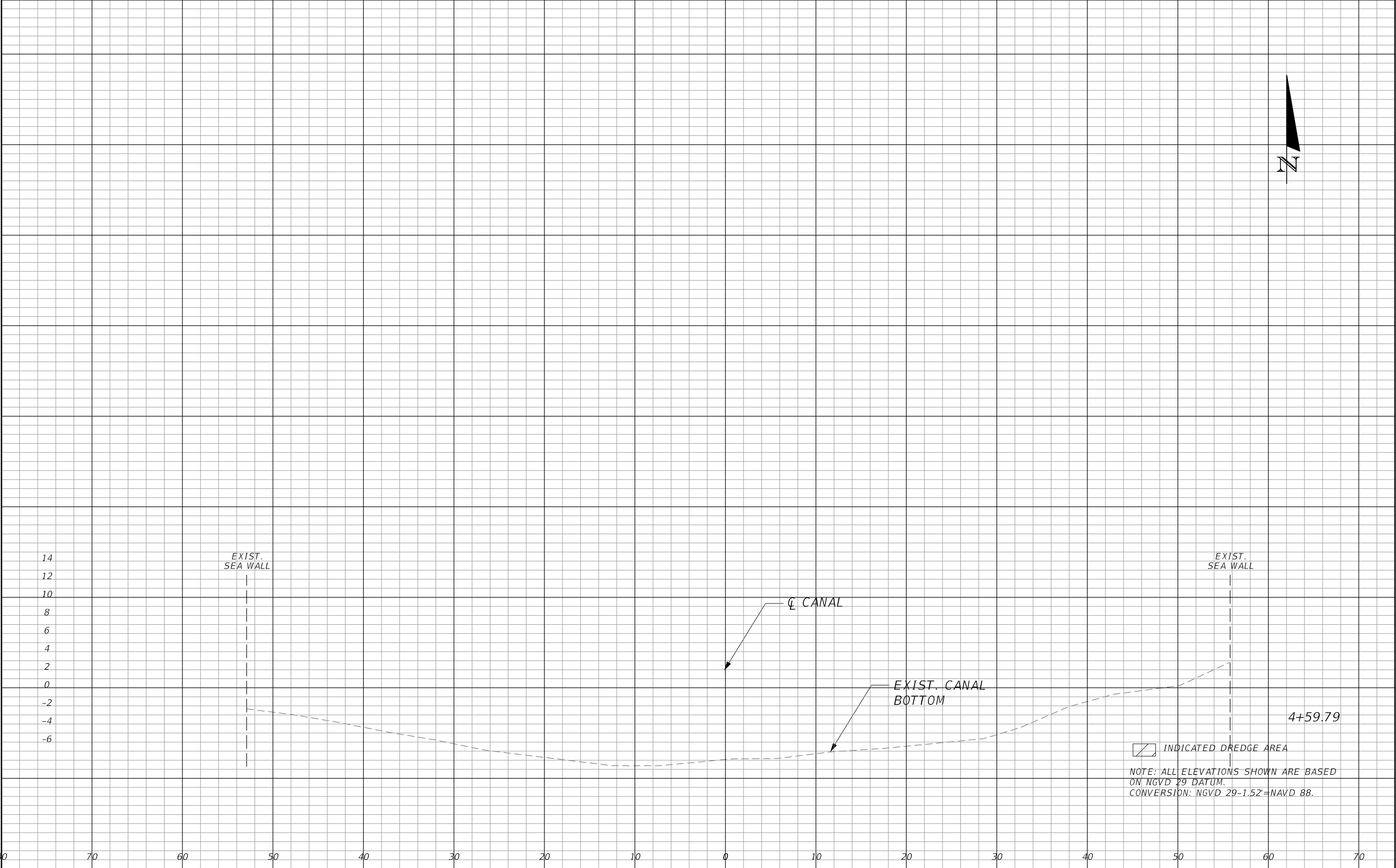
BRIDGE NO. XXXXXX

REVISIONS						KimleyHorn Registration No. 35106 Jamea Potter Long, P.E. P.E. License No. 58677 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411	Drawn By: RCA 03-24 Checked by: JPL 03-24 Designed by: DAM 03-24 Checked by: JPL 03-24	THE CITY OF POMPANO BEACH		SHEET TITLE: BULKHEAD WALL SECTIONS (2 OF 2)		REF. DWG. NO.
Date	By	Description	Date	By	Description			ROAD NO.	COUNTY	PROJECT NAME:		SHEET NO.
								SE 6TH TERRACE	BROWARD	SE 6TH TERRACE BRIDGE REPLACEMENT		BW-04

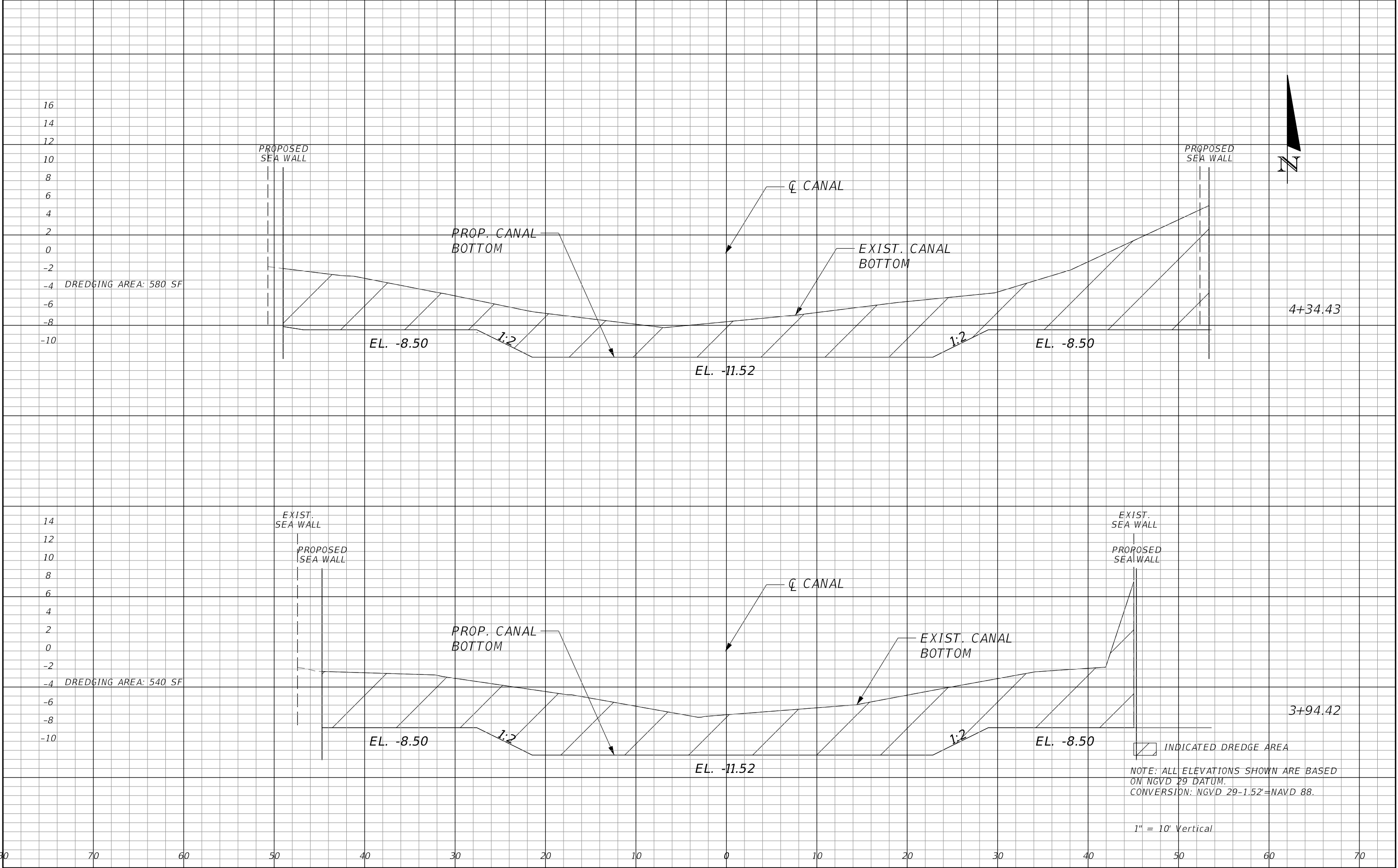
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REVISIONS				<div>Kimley»Horn</div> <div>Matthew B. Fursetzer, P.E. P.E. License No. 63997 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411</div>	<div>SE 6TH TERRACE BRIDGE REPLACEMENT PREPARED FOR THE CITY OF POMPANO BEACH</div>	<div>CANAL CROSS SECTION</div>	SHEET NO.
DATE	DESCRIPTION	DATE	DESCRIPTION				



REVISIONS				<div>Kimley»Horn</div> <div>Matthew B. Fursetzer, P.E. P.E. License No. 63997 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411</div>	<div>SE 6TH TERRACE BRIDGE REPLACEMENT PREPARED FOR THE CITY OF POMPANO BEACH</div>	<div>CANAL CROSS SECTION</div>	SHEET NO.
DATE	DESCRIPTION	DATE	DESCRIPTION				



REVISIONS				Kimley»Horn Matthew B. Fursetzer, P.E. P.E. License No. 63997 1920 Wekiva Way, Suite 200 West Palm Beach, Florida 33411	SE 6TH TERRACE BRIDGE REPLACEMENT PREPARED FOR THE CITY OF POMPAÑO BEACH	CANAL CROSS SECTION	SHEET NO.
DATE	DESCRIPTION	DATE	DESCRIPTION				

PLOTTED BY: Max.Teddy



**S.E. 6TH TERRACE BRIDGE
REPLACEMENT**
PREPARED FOR
CITY OF POMPAÑO BEACH

CITY OF POMPAÑO FLORIDA

ROADWAY PROFILE

SHEET NUMBER

8

NOTE:
ALL ELEVATIONS SHOWN ARE
BASED ON NAVD 88 DATUM.

CONVERSION
NGVD 29 -1.52'=NAVD 88.

ELEVATIONS
PROPOSED

① 9.8'
② 10.6'

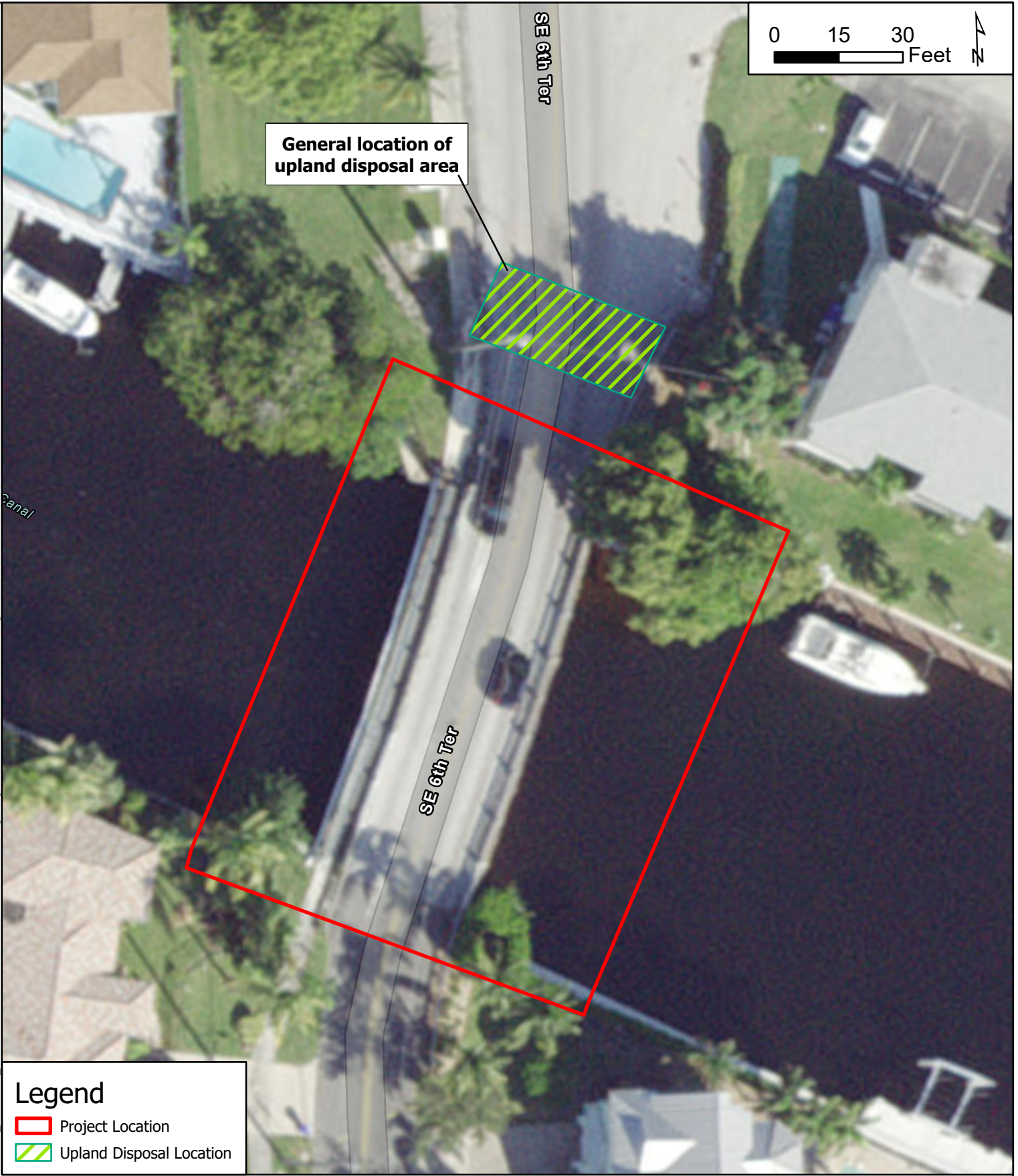
NOTE:
ALL ELEVATIONS SHOWN
ARE BASED ON
NAVD 88 DATUM.

CONVERSION
NGVD 29-1.52'=NAVD 88.

SCALE:
1"=50' HORIZ.
1"=5' VERT.

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K:\WPB_GIS\WPB_Environmental\040985070 - SE 6th Terrace Bridge Replacement 2024 GIS\MXD\ERP Figures\



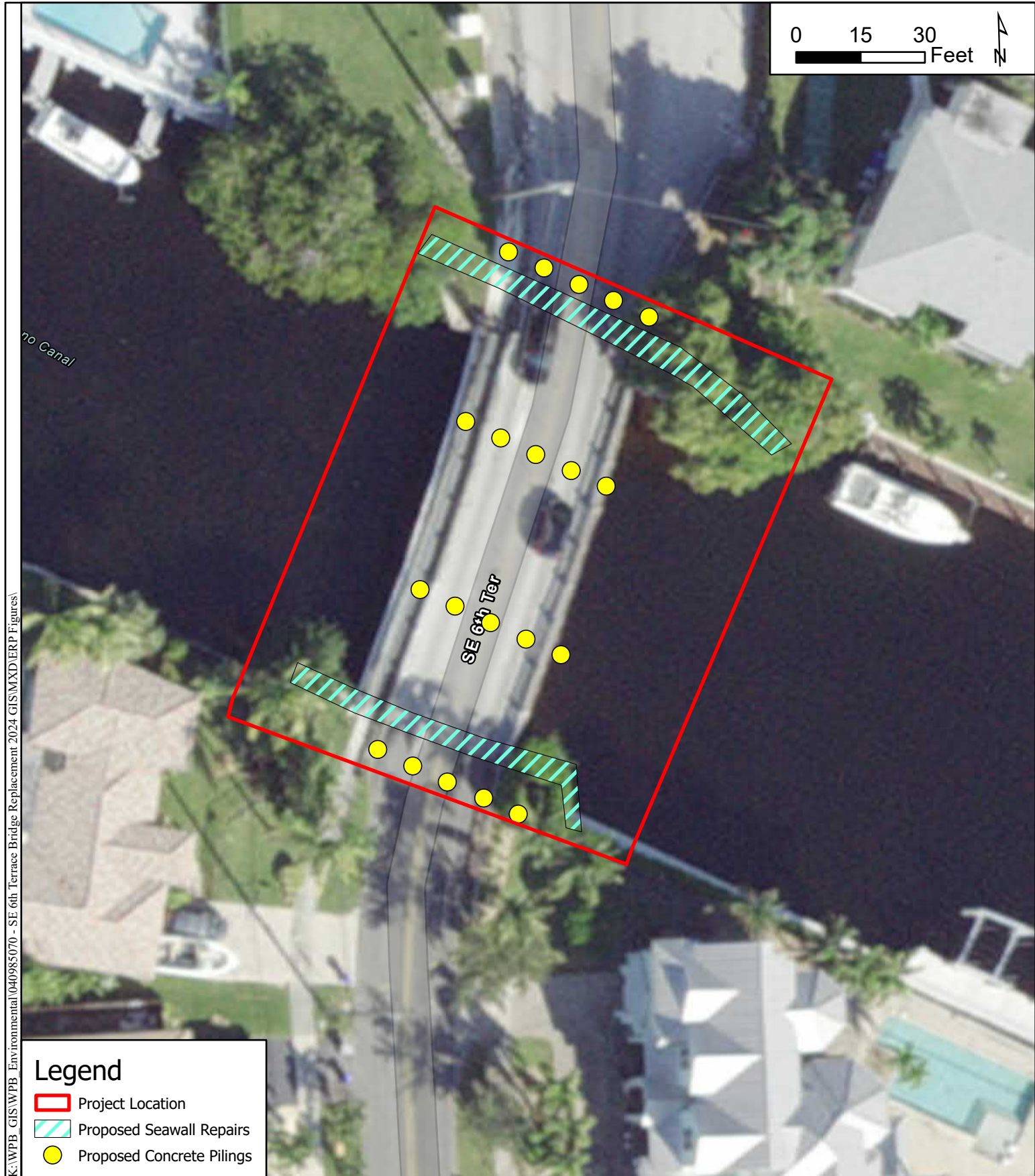
Source: ESRI, FDOT, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

Kimley»Horn

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1920 Wekiva Way, STE 200
West Palm Beach, FL 33411
Phone (561) 845-0665
www.kimley-horn.com

Upland Disposal Location Map

**6th Terrace Bridge Replacement and Seawall Repair
Broward County, Florida**



K:\WPB_GIS\WPB_Environmental\040985070 - SE 6th Terrace Bridge Replacement 2024 GIS\MXD\ERP Figures\

Source: ESRI, FDOT, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

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1920 Wekiva Way, STE 200
West Palm Beach, FL 33411
Phone (561) 845-0665
www.kimley-horn.com

Aerial Map

6th Terrace Bridge Replacement and Seawall Repair Broward County, Florida

1 inch = 30 feet

PROJECT NUMBER: 040985070

JULY 2024

FIGURE 6

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.



PROTECTED SPECIES CONSTRUCTION CONDITIONS, NOAA FISHERIES SOUTHEAST REGIONAL OFFICE

The action agency and any permittee shall comply with the following construction conditions for protected species under the jurisdiction of NOAA Fisheries Southeast Regional Office (SERO) Protected Resources Division (PRD):¹

Protected Species Sightings—The action agency and any permittee shall ensure that all personnel associated with the project are instructed about the potential presence of species protected under the Endangered Species Act (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 listed species and all marine mammals. To determine which protected species and critical habitat may be found in the transit area, please review the relevant [marine mammal](https://www.fisheries.noaa.gov/find-species) and [ESA-listed species](https://www.fisheries.noaa.gov/find-species) at Find A Species (<https://www.fisheries.noaa.gov/find-species>) and the consultation documents that have been completed for the project.

1. **Equipment**—Turbidity curtains, if used, shall be made of material in which protected species cannot become entangled and be regularly monitored to avoid protected species entrapment. All turbidity curtains and other in-water equipment shall be properly secured with materials that reduce the risk of protected species entanglement and entrapment.
 - a. In-water lines (rope, chain, and cable, including the lines to secure turbidity curtains) shall 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, shall 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 shall be allowed in the water. All anchoring shall be in areas free from hardbottom and seagrass.
 - b. Turbidity curtains and other in-water equipment shall be placed in a manner that does not entrap protected species within the project area and minimizes the extent and duration of their exclusion from the project area.
 - c. Turbidity barriers shall be positioned in a way that minimizes the extent and duration of protected species exclusion from important habitat (e.g. critical habitat, hardbottom, seagrass) in the project area.
2. **Operations**—For construction work that is generally stationary (e.g., barge-mounted equipment dredging a berth or section of river, or shore-based equipment extending into the water):
 - a. Operations of moving equipment shall cease if a protected species is observed within 150 feet of operations.

¹ Manatees are managed under the jurisdiction of the U.S. Fish and Wildlife Service.

- b. Activities shall not resume until the protected species has departed the project area of its own volition (e.g., species was observed departing or 20 minutes have passed since the animal was last seen in the area).
3. **Vessels**—For projects requiring vessels, the action agency, and any permittee shall ensure conditions in the [Vessel Strike Avoidance Measures](#) are implemented as part of the project/permit issuance (<https://www.fisheries.noaa.gov/southeast/consultations/regulations-policies-and-guidance>).
4. **Consultation Reporting Requirements**—Any interaction with a protected species shall be reported immediately to NOAA Fisheries SERO PRD and the local authorized stranding/rescue organization.

To report to NOAA Fisheries SERO PRD, send an email to takereport.nmfsser@noaa.gov. Please include the species involved, the circumstances of the interaction, the fate and disposition of the species involved, photos (if available), and contact information for the person who can provide additional details if requested. Please include the project's Environmental Consultation Organizer (ECO) number and project title in the subject line of email reports.

To report the interaction to the local stranding/rescue organization, please see the following website for the most up to date information for reporting sick, injured, or dead protected species:

Reporting Violations—To report an ESA or MMPA violation, call the NOAA Fisheries Enforcement Hotline. This hotline is available 24 hours a day, 7 days week for anyone in the United States.

NOAA Fisheries Enforcement Hotline (800) 853-1964

5. **Additional Conditions**—Any special construction conditions, required of your specific project, outside these general conditions, if applicable, will be addressed in the project consultation and must also be complied with.

For additional information, please contact NOAA Fisheries SERO PRD at:

NOAA Fisheries Service
Southeast Regional Office
263 13th Avenue South
St. Petersburg, Florida 33701
Tel: (727) 824-5312

Visit us on the web at [Protected Marine Life in the Southeast](#)
(<https://www.fisheries.noaa.gov/region/southeast#protected-marine-life>)

Revised: May 2021

CAUTION: MANATEE HABITAT

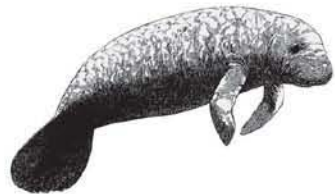
All project vessels

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

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-2023-01398 (NWP-AMG)

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):
