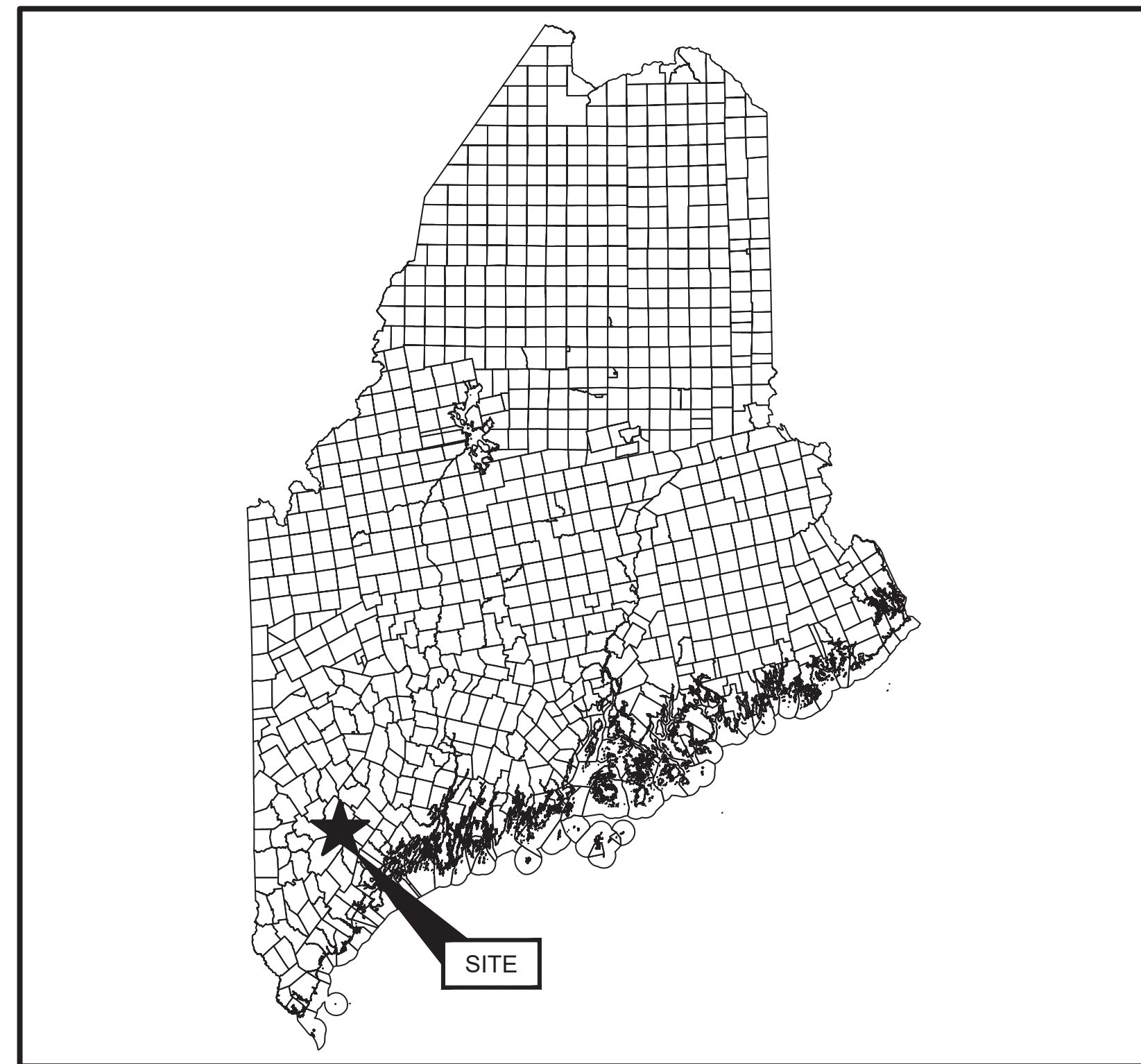


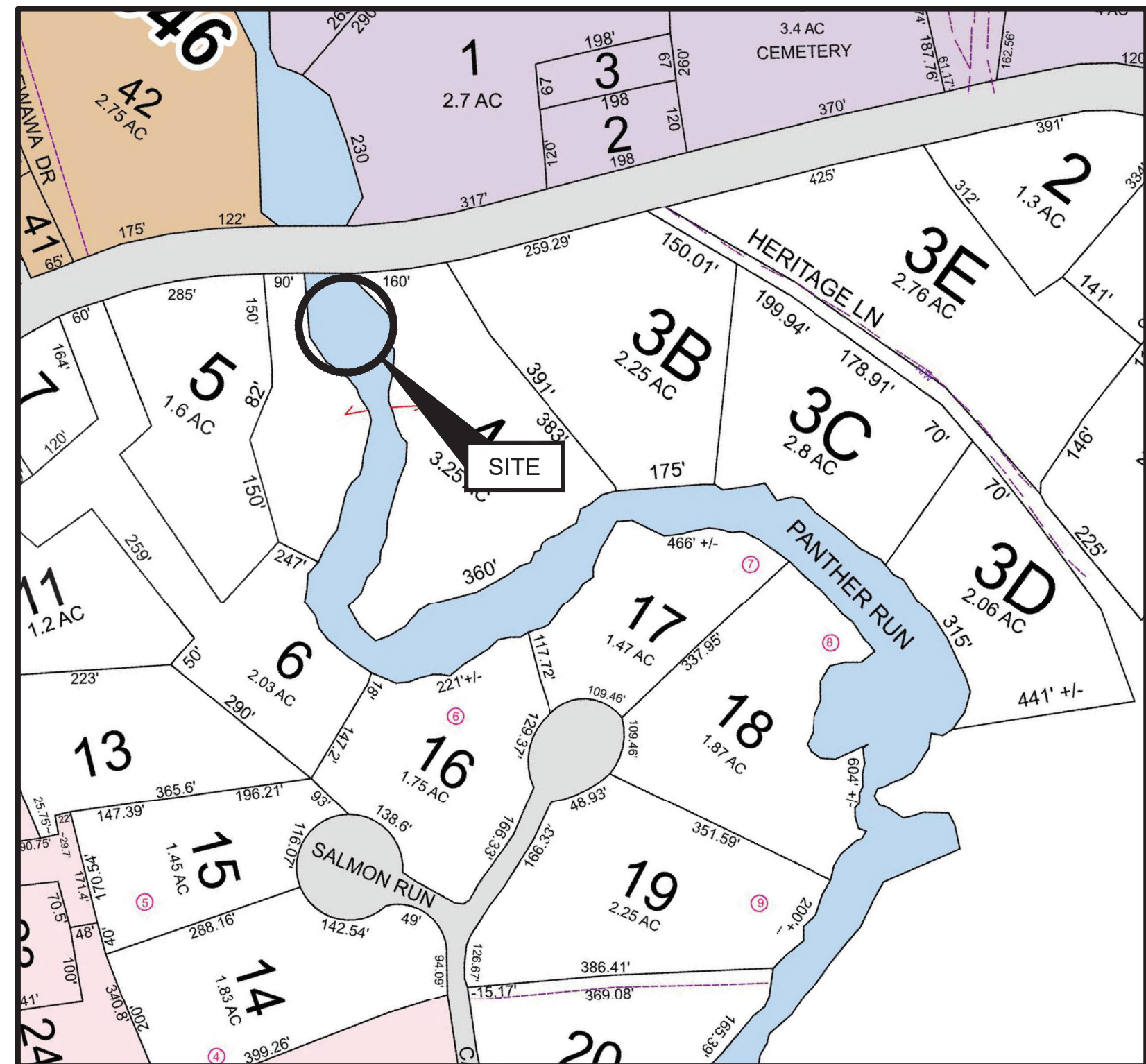
# PANTHER POND DAM RECONSTRUCTION

MEMA NO. 122 (NID ME0080)  
15 MILL STREET  
RAYMOND, MAINE 04071



SOURCE:  
STATE OF MAINE BLOCK

MAINE STATE MAP  
(NOT TO SCALE)



SOURCE:  
TAX MAP 47 TAKEN FROM RAMOND MAINE TOWN WEBSITE.

SITE LOCATION MAP  
(NOT TO SCALE)

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4	C-01	EXISTING SITE PLAN
5	C-02	SUBSURFACE PLAN & PROFILE
6	C-03	SITE ACCESS, EROSION, & SEDIMENTATION CONTROL PLAN
7	C-04	CONSTRUCTION SEQUENCING PLAN (PHASE I, II, III)
8	C-05	RETAINING WALL EXCAVATION & DEMOLITION (PHASE IV)
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19	S-04	STRUCTURAL SPILLWAY PLAN & ELEVATION
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22	S-07	STRUCTURAL SLUICE GATE SECTIONS & DETAILS
23	S-08	STRUCTURAL CATWALK PLAN, ELEVATION, & DETAILS
24	S-09	STRUCTURAL CATWALK, TRASH RACK, & INTAKE SCREEN DETAILS
25	S-10	STRUCTURAL DETAILS

PREPARED FOR:

STATE OF MAINE INLAND  
FISHERIES AND WILDLIFE  
353 WATER STREET  
AUGUSTA, MAINE 04033

PREPARED BY:

GEI CONSULTANTS, INC.  
5 MILK STREET  
PORTLAND, ME 04101  
(207)797-8901



BGS PROJECT NO. 3163  
GEI PROJECT NO. 2201662

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				SHEET NO. <b>1 OF 25</b>
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**PANTHER POND DAM  
 RECONSTRUCTION**

15 MILL STREET  
 RAYMOND, ME 04071

P.E. No.:  
 Approved: B. Baker  
 Checked: G. Williams  
 Drawn: J. Morin  
 Designed: M. Chmura  
 GEI Project 2201662

Attention: 1"  
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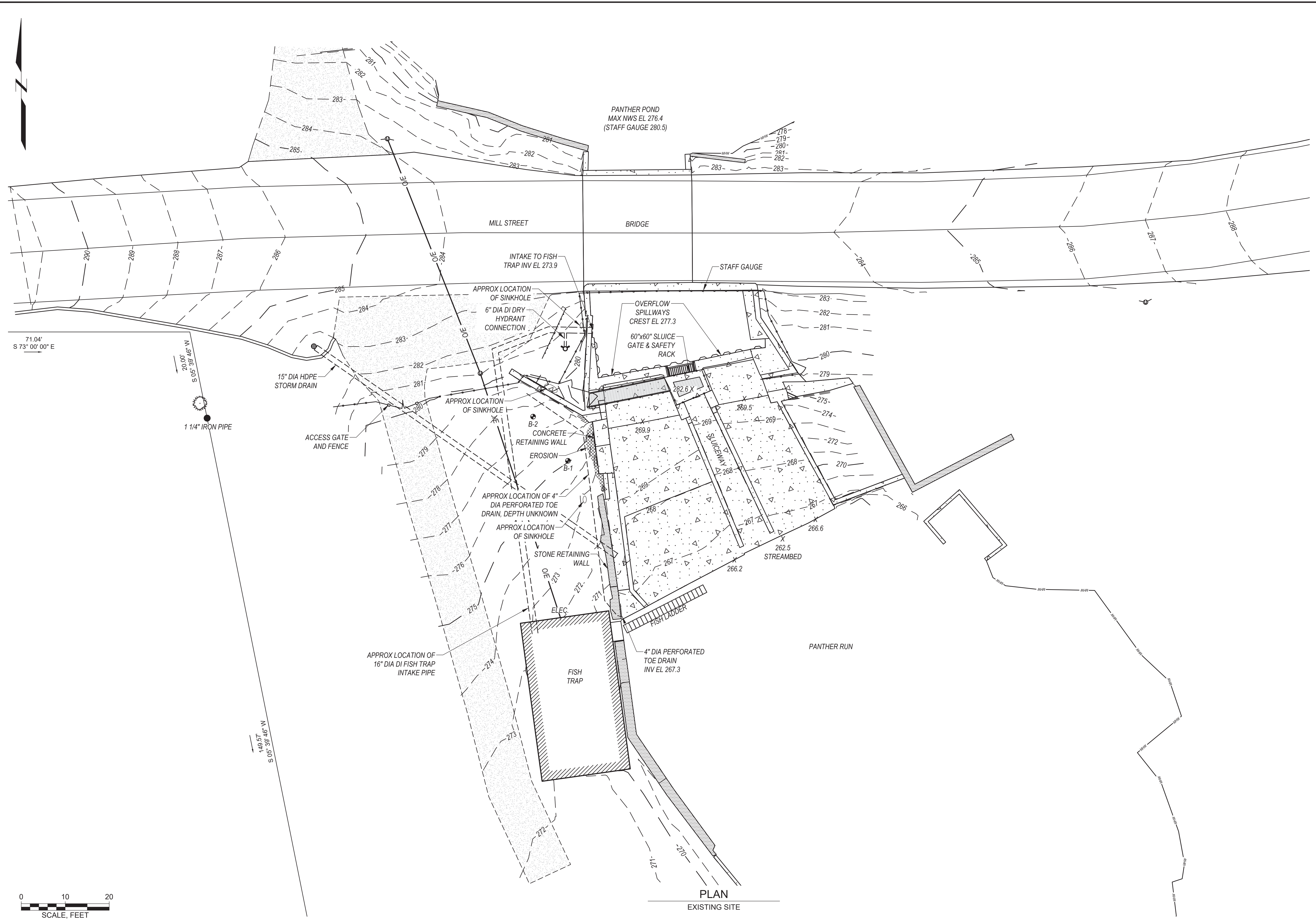
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SHEET NAME

**EXISTING SITE  
 PLAN**

SHEET NO.

**C-01**



**PLAN**  
 EXISTING SITE



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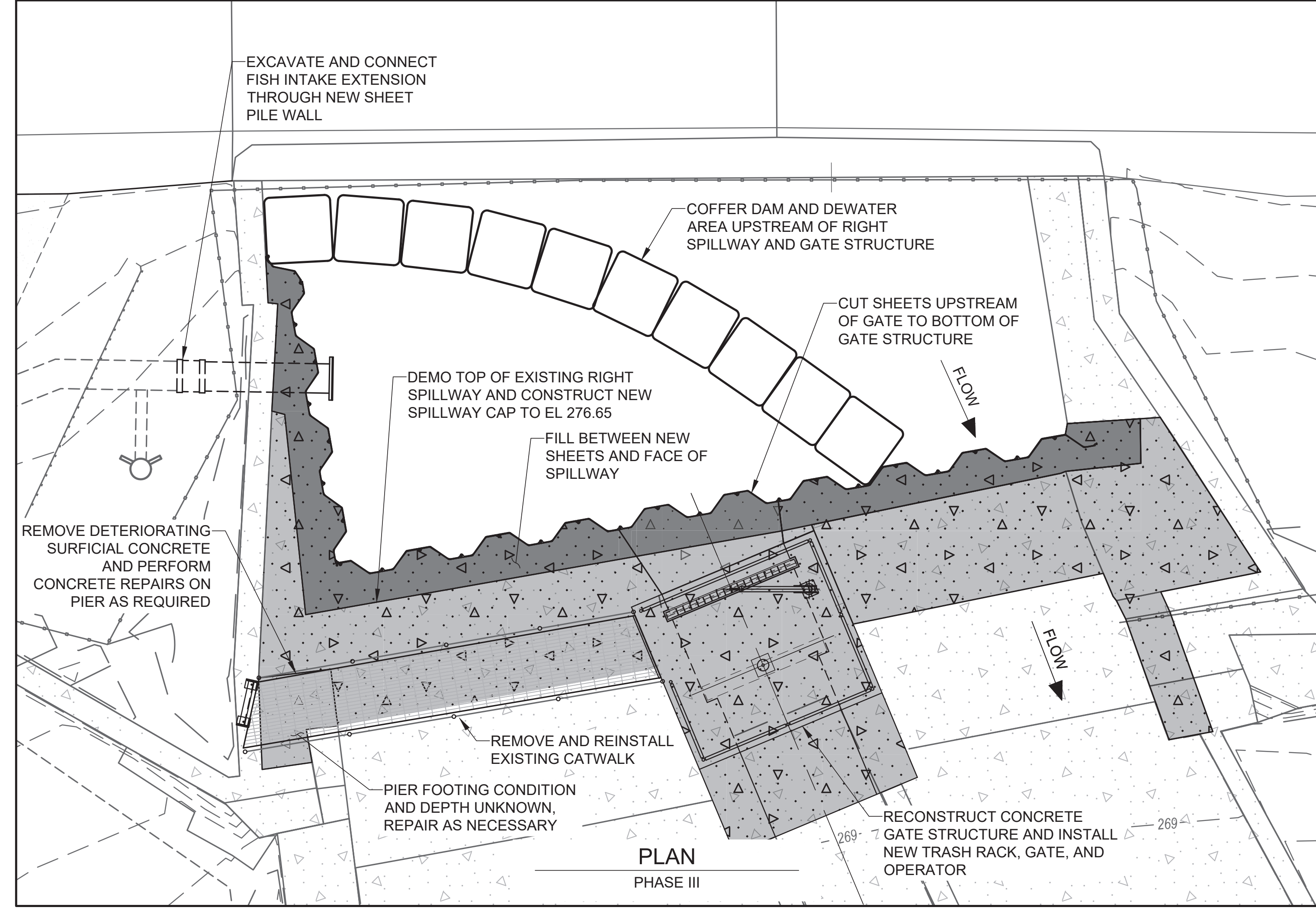
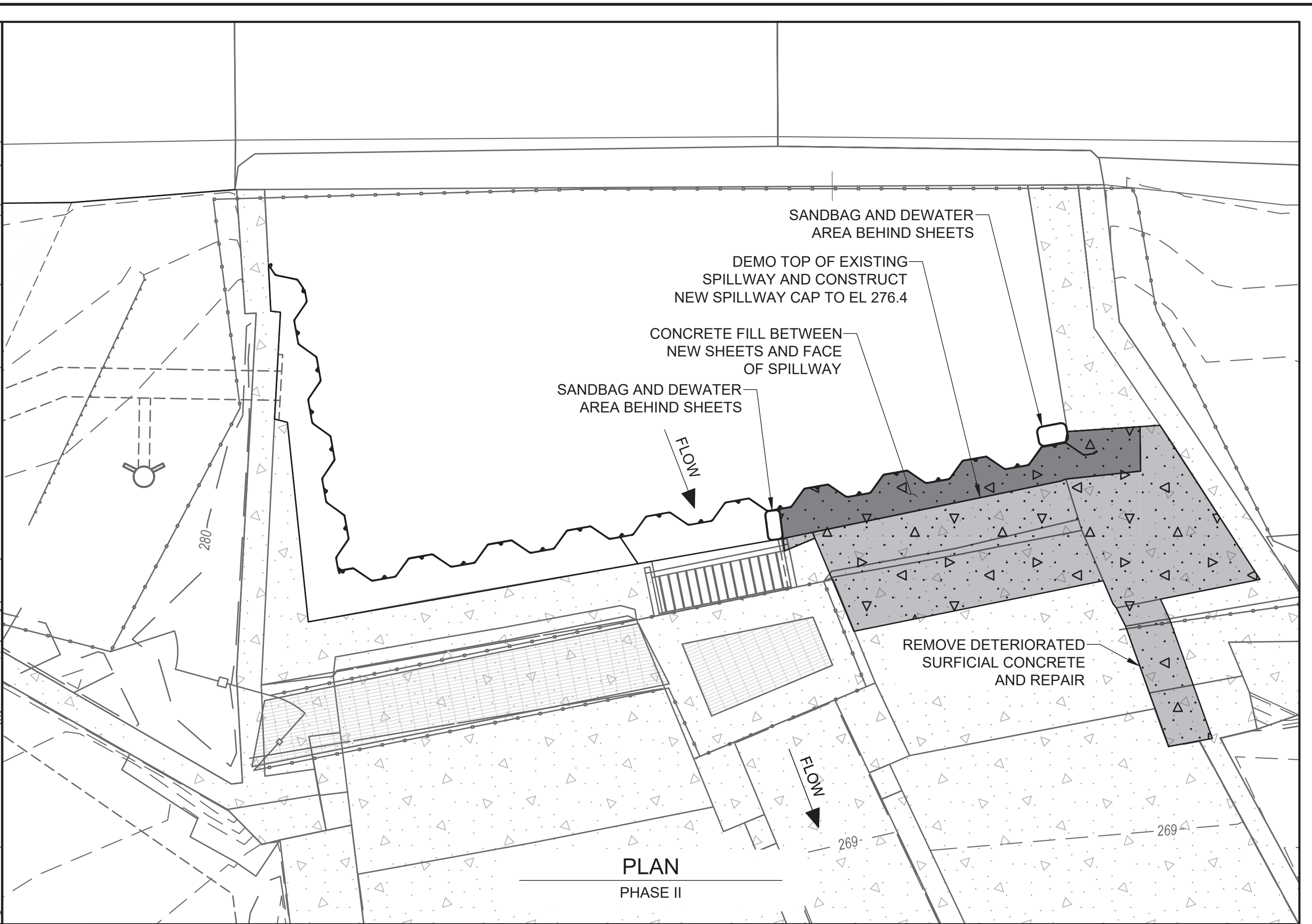
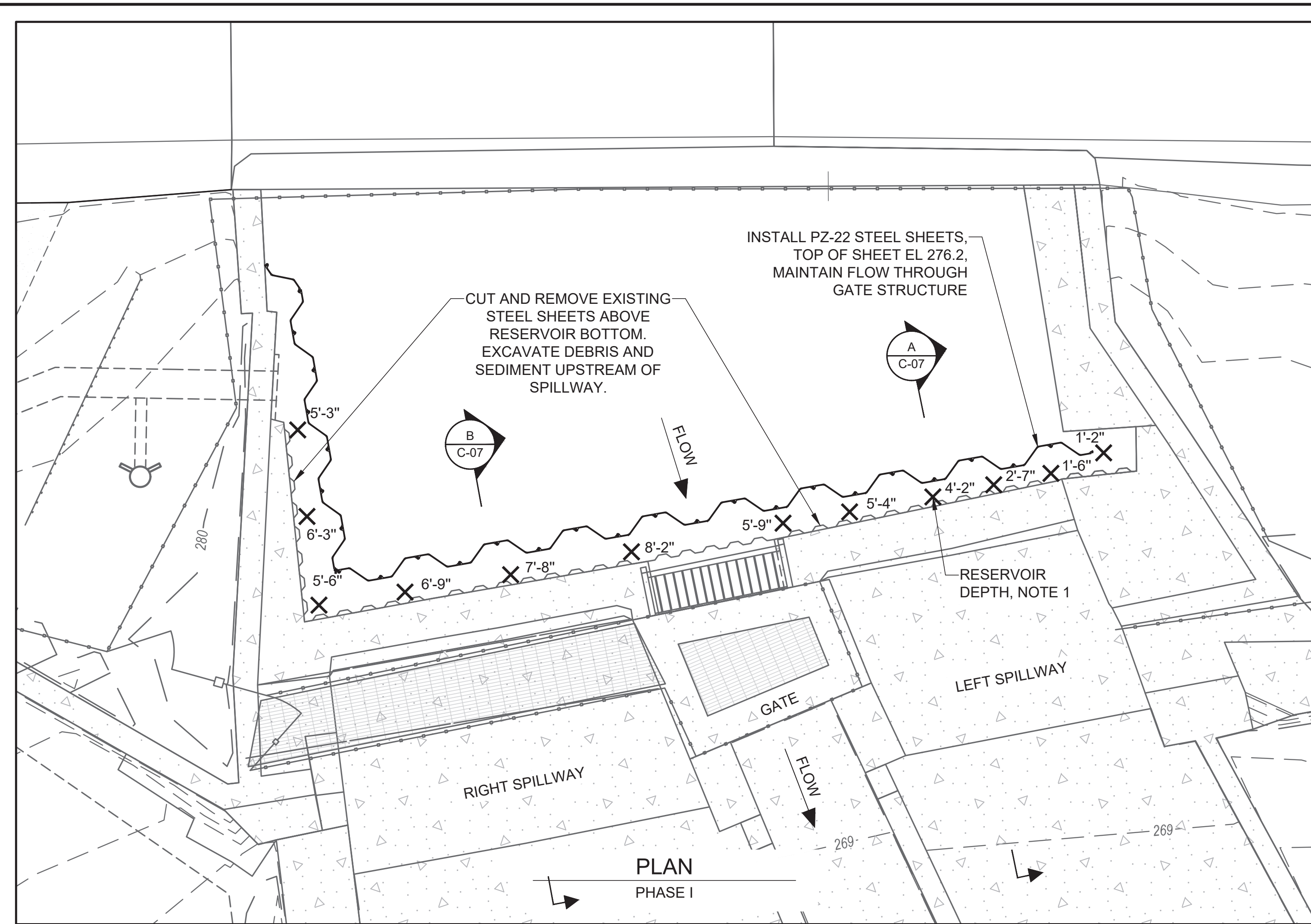
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SHEET NAME

**CONSTRUCTION  
 SEQUENCING PLAN  
 (PHASE I, II, III)**

SHEET NO.

**C-04**



**SUGGESTED CONSTRUCTION SEQUENCE:**

**PHASE I**

1. MOBILIZE TO SITE AND DEPLOY TEMPORARY SEDIMENT AND EROSION CONTROLS.
2. CUT AND REMOVE EXISTING SHEET PILES UPSTREAM OF SPILLWAY AND EXCAVATE DEBRIS/SEDIMENT UPSTREAM OF SPILLWAY. DEBRIS EXCAVATION SHALL NOT EXTEND MORE THAN 6 FT UPSTREAM OF THE DAM, PER THE PROJECT PERMIT.
3. INSTALL NEW STEEL SHEET PILES UPSTREAM OF EXISTING SPILLWAY. CONTRACTOR TO MAINTAIN POND ELEVATION EITHER BY PUMPING, BY CUTTING THE SHEETS TO FINAL ELEVATION SHOWN ON THE DRAWINGS, OR A COMBINATION THEREOF.

**PHASE II**

4. INSTALL TEMPORARY SANDBAGS AND DEWATER AREA BETWEEN NEW SHEETS AND UPSTREAM FACE OF LEFT SPILLWAY. CONTRACTOR TO MAINTAIN POND ELEVATION BY EITHER PUMPING OR CUTTING SHEETS TO ALLOW FLOW OVER THE RIGHT OGEE.
5. DEMOLISH TOP OF LEFT SPILLWAY AND CONSTRUCT NEW CONCRETE CAP TO ELEVATIONS INDICATED ON PLANS. REPAIR LEFT SPILLWAY WALL.
6. FILL AREA BETWEEN NEW SHEETS AND FACE OF LEFT SPILLWAY WITH CONCRETE.
7. REMOVE TEMPORARY SANDBAG COFFERDAM.

**PHASE III**

8. INSTALL TEMPORARY COFFERDAM TO DIVERT WATER OVER LEFT SIDE OF SPILLWAY AND DEWATER AREA UPSTREAM OF RIGHT SPILLWAY AND GATE STRUCTURE.
9. REMOVE EXISTING CATWALK STRUCTURE, TRASH RACK, AND SAFETY RACK.
10. DEMOLISH AND RECONSTRUCT EXISTING CONCRETE GATE STRUCTURE PIERS.
11. DEMOLISH TOP OF RIGHT SPILLWAY AND CONSTRUCT NEW CONCRETE CAP TO ELEVATIONS INDICATED ON PLANS.
12. EXCAVATE AND CONNECT FISH INTAKE EXTENSION THROUGH NEW SHEET PILE WALL.
13. FILL AREA BETWEEN NEW SHEETS AND FACE OF RIGHT SPILLWAY WITH CONCRETE.
14. CUT SHEETS UPSTREAM OF GATE STRUCTURE AS NEEDED FOR INSTALLATION AND OPERATION OF THE GATE.
15. REINSTALL EXISTING CATWALK STRUCTURE. INSTALL NEW TRASH RACK, SPILLWAY GATE, AND OPERATOR.

**PHASE IV**

SEE SHEET C-05

**PHASE V**

SEE SHEET C-06

**NOTE:**

1. DEPTH MEASUREMENTS MADE BY GEI ON MARCH 21, 2023. MEASUREMENTS INDICATE TOP OF RESERVOIR SEDIMENT AS MEASURED FROM TOP OF EXISTING SHEETS (EL 277.1).



**PANTHER POND DAM  
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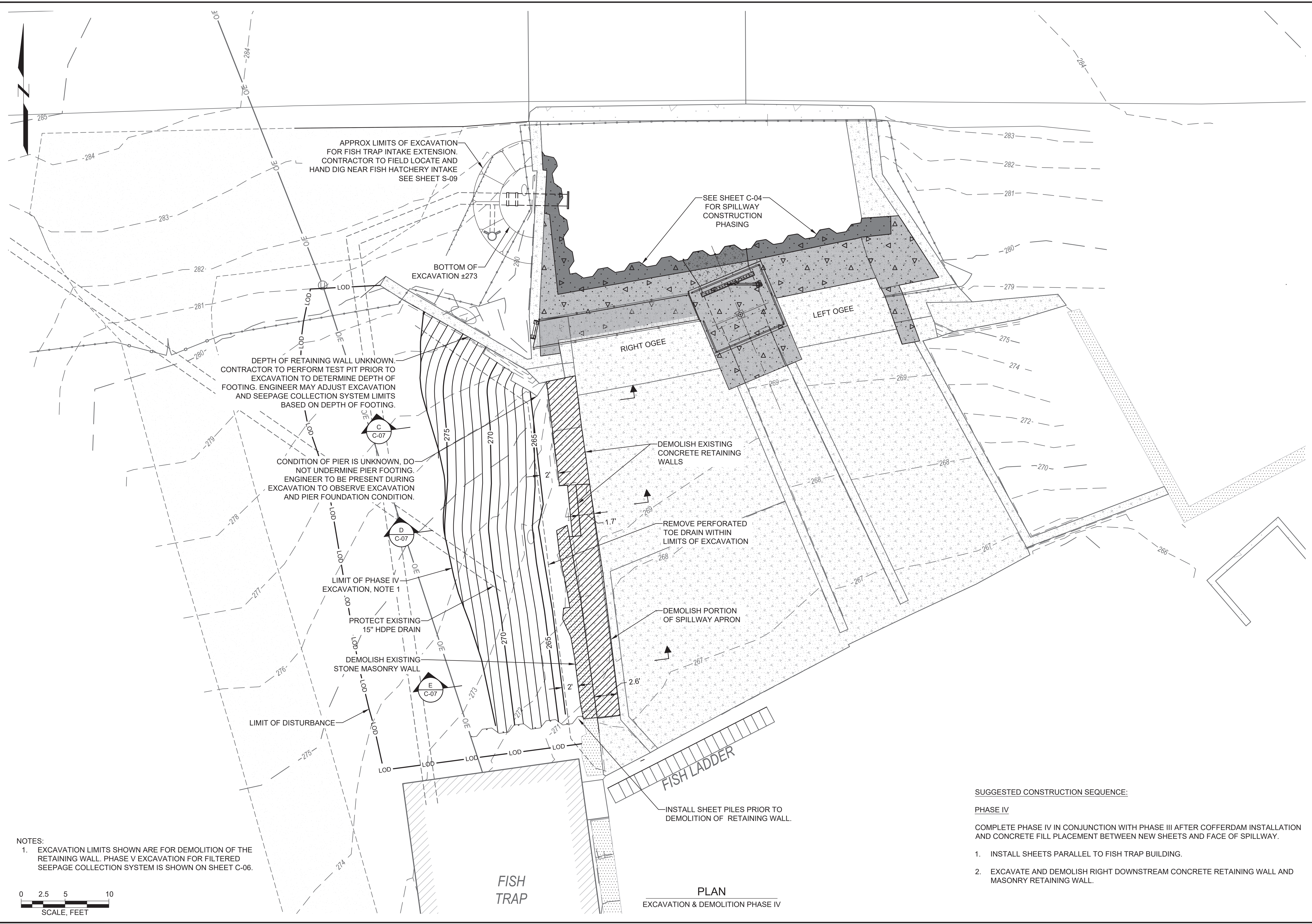
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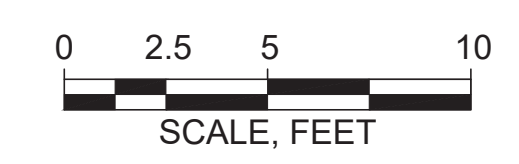
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SHEET NAME  
**RETAINING WALL  
 EXCAVATION &  
 DEMOLITION  
 (PHASE IV)**

SHEET NO.  
**C-05**



NOTES:  
 1. EXCAVATION LIMITS SHOWN ARE FOR DEMOLITION OF THE RETAINING WALL. PHASE V EXCAVATION FOR FILTERED SEEPAGE COLLECTION SYSTEM IS SHOWN ON SHEET C-06.



SUGGESTED CONSTRUCTION SEQUENCE:  
 PHASE IV  
 COMPLETE PHASE IV IN CONJUNCTION WITH PHASE III AFTER COFFERDAM INSTALLATION AND CONCRETE FILL PLACEMENT BETWEEN NEW SHEETS AND FACE OF SPILLWAY.  
 1. INSTALL SHEETS PARALLEL TO FISH TRAP BUILDING.  
 2. EXCAVATE AND DEMOLISH RIGHT DOWNSTREAM CONCRETE RETAINING WALL AND MASONRY RETAINING WALL.

**PLAN**  
 EXCAVATION & DEMOLITION PHASE IV

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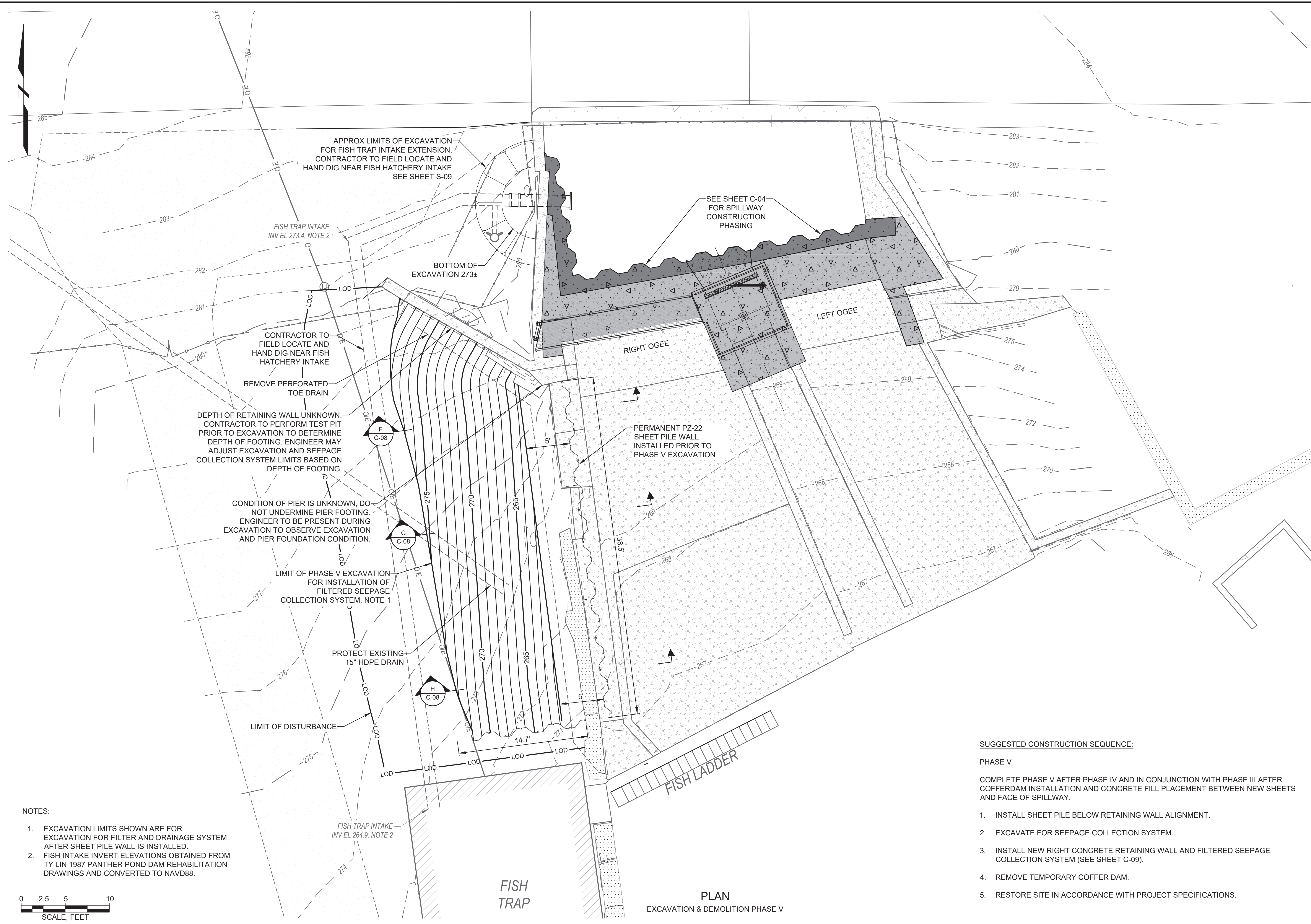
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SHEET NAME

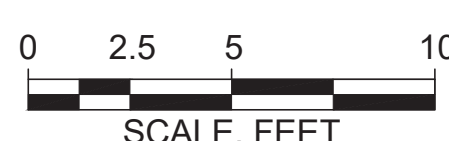
**SEEPAGE  
 COLLECTION  
 SYSTEM  
 EXCAVATION  
 (PHASE V)**

SHEET NO.

**C-06**



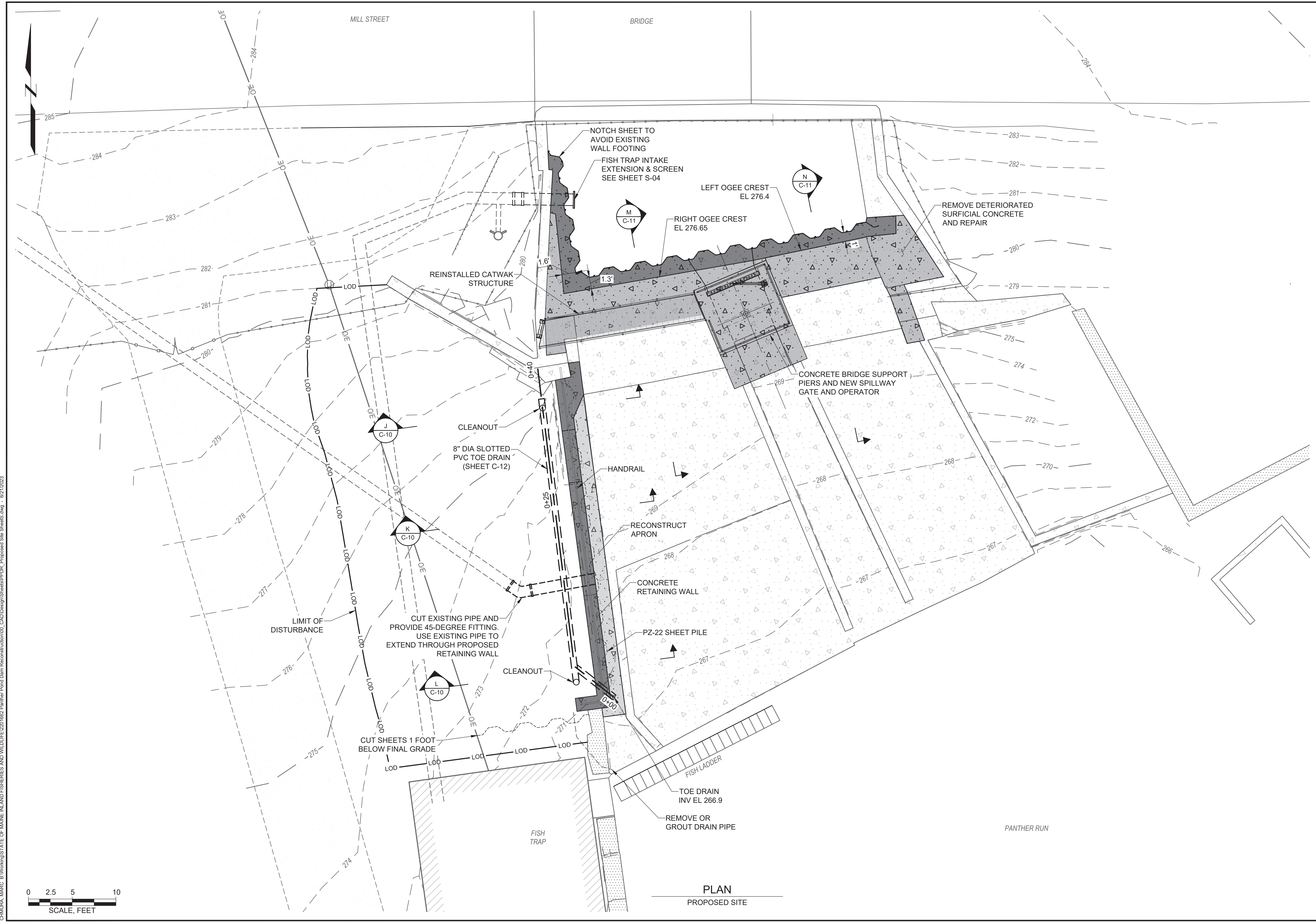
- NOTES:
- EXCAVATION LIMITS SHOWN ARE FOR EXCAVATION FOR FILTER AND DRAINAGE SYSTEM AFTER SHEET PILE WALL IS INSTALLED.
  - FISH INTAKE INVERT ELEVATIONS OBTAINED FROM TY LIN 1987 PANTHER POND DAM REHABILITATION DRAWINGS AND CONVERTED TO NAVD88.



**PLAN**  
 EXCAVATION & DEMOLITION PHASE V

- SUGGESTED CONSTRUCTION SEQUENCE:**
- PHASE V**
- COMPLETE PHASE V AFTER PHASE IV AND IN CONJUNCTION WITH PHASE III AFTER COFFERDAM INSTALLATION AND CONCRETE FILL PLACEMENT BETWEEN NEW SHEETS AND FACE OF SPILLWAY.
- INSTALL SHEET PILE BELOW RETAINING WALL ALIGNMENT.
  - EXCAVATE FOR SEEPAGE COLLECTION SYSTEM.
  - INSTALL NEW RIGHT CONCRETE RETAINING WALL AND FILTERED SEEPAGE COLLECTION SYSTEM (SEE SHEET C-09).
  - REMOVE TEMPORARY COFFER DAM.
  - RESTORE SITE IN ACCORDANCE WITH PROJECT SPECIFICATIONS.

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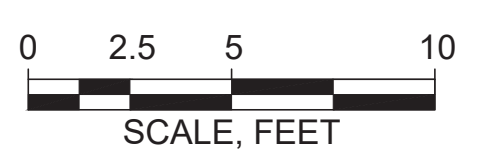
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SHEET NAME  
**PROPOSED  
 SITE PLAN**

SHEET NO.  
**C-09**

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**PLAN**  
 PROPOSED SITE

Maine IFW Water Level Recordings 2016- 2022

