

# EXTEND METAL BOARDWALK BIG OAK TREE STATE PARK East Prairie, Missouri



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- G-101 - BOARDWALK OVERALL
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COMPONENTS
- L-502 - BOARDWALK DETAILS
- L-503 - BOARDWALK DETAILS  
- ASSEMBLY PLAN
- L-504 - BOARDWALK DETAILS

## OWNER:

STATE OF MISSOURI  
MIKE KEHOE,  
GOVERNOR

DEPARTMENT OF  
NATURAL RESOURCES  
DIVISION OF  
MISSOURI STATE PARKS

## PROJECT MANAGEMENT:

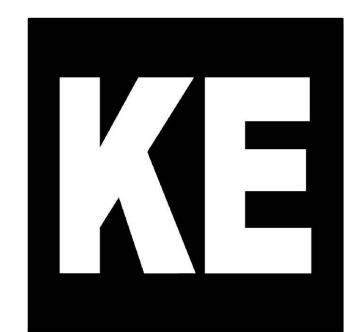
OFFICE OF ADMINISTRATION  
DIVISION OF FACILITIES  
MANAGEMENT,  
DESIGN AND CONSTRUCTION



LANDSCAPE ARCHITECT  
PLANNING DESIGN STUDIO  
2816 Sutton Boulevard, Suite 1  
Saint Louis, Missouri 63143  
314-241-3600

STRUCTURAL ENGINEERING  
FORSYTH ENGINEERING  
1102 South Eighteenth St.  
Saint Louis, Missouri 63104

GEOTECHNICAL ENGINEERING  
KOEHLER ENGINEERING  
194 Coker Lane  
Cape Girardeau, Missouri 63701  
573-335-3026



## DESIGNER:

PLANNING DESIGN STUDIO  
JEFF NILGES, PLA  
jeffnilges@planningdesignstudio.com

## PROJECT NUMBER:

X2407-01

## SITE NUMBER:

5203

## FACILITY NUMBER:

7815203011



SHEET NUMBER:

**G-001**

1 OF 9 SHEETS  
11/26/2025



NAME: JEFFREY E. NILGES  
DISCIPLINE: LANDSCAPE ARCHITECT  
LICENSE NO: 2006005037  
EXPIRATION DATE: DECEMBER 31, 2026

LANDSCAPE ARCHITECT  
**PLANNING  
DESIGN  
STUDIO**

CERT. OF AUTHORITY: LAC-2006001845  
EXPIRATION DATE: DECEMBER 31, 2026  
2816 Sutton Boulevard, Suite 1  
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DEPARTMENT OF  
NATURAL RESOURCES  
DIVISION OF STATE PARKS

EXTEND METAL BOARDWALK

BIG OAK TREE STATE PARK  
13640 MO-102  
EAST PRAIRIE, MO 63845

PROJECT # X2407-01  
SITE # 5203  
FACILITY # 7815203011

REVISION: \_\_\_\_\_  
DATE: \_\_\_\_\_  
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ISSUE DATE: 11/26/2025

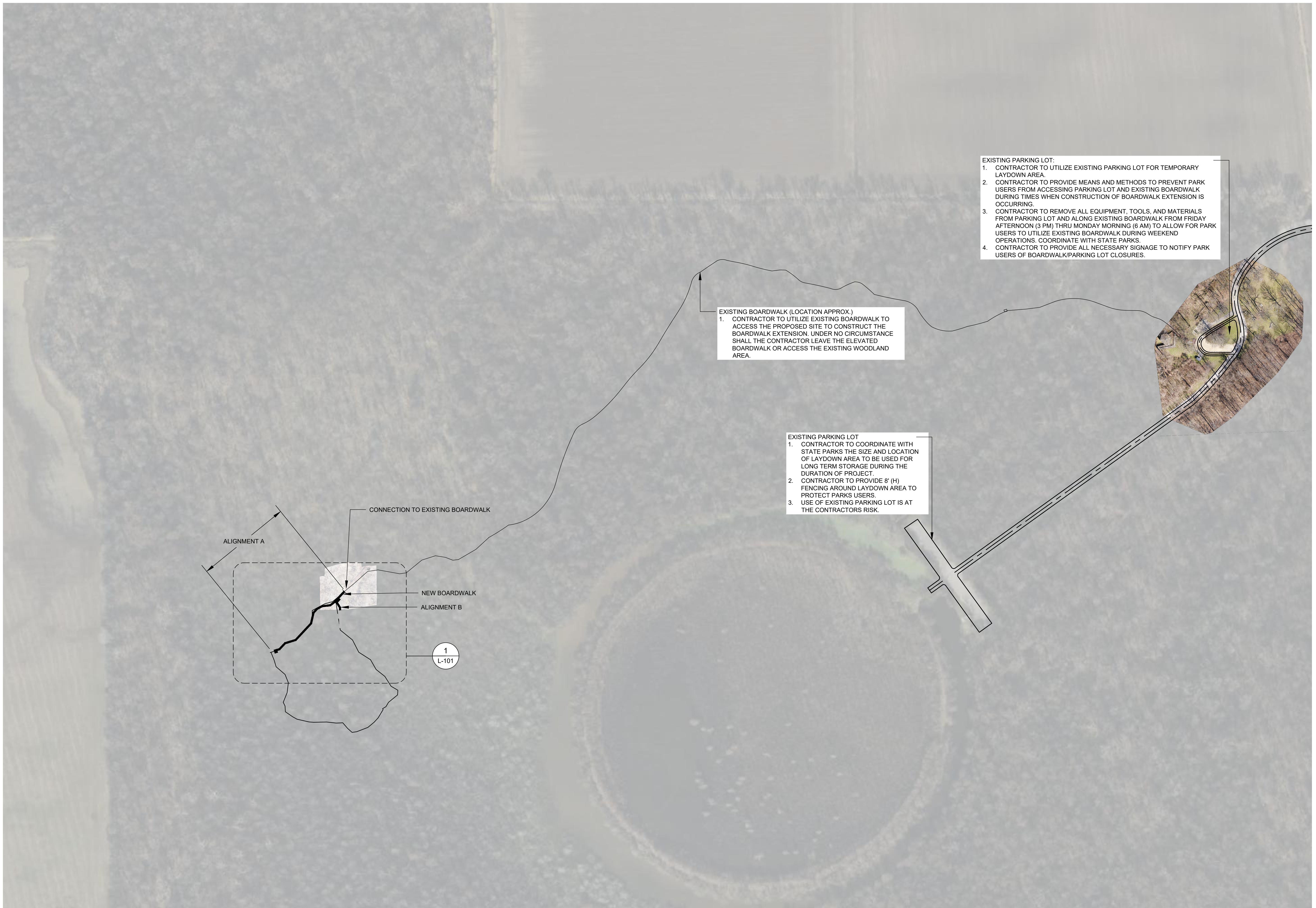
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DRAWN BY: CLS  
CHECKED BY: NTF/JEN  
DESIGNED BY: JEN

SHEET TITLE:  
**BOARDWALK  
OVERALL**

SHEET NUMBER:

**G-101**

2 OF 9 SHEETS  
11/26/2025





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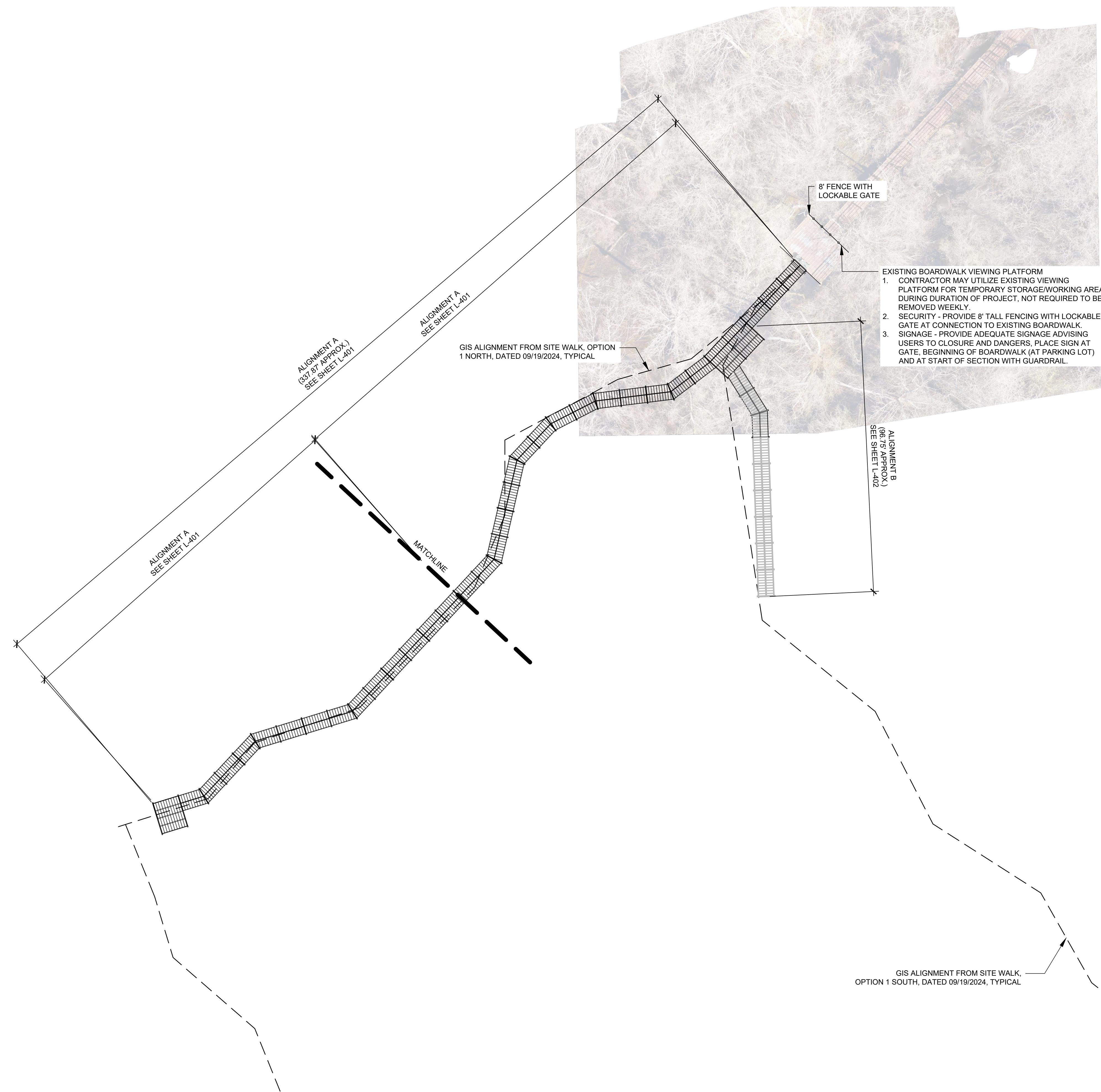
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DRAWN BY: CLS  
CHECKED BY: NTF/JEN  
DESIGNED BY: JEN

SHEET TITLE:  
**BOARDWALK  
LAYOUT**

SHEET NUMBER:

**L-101**

3 OF 9 SHEETS  
11/26/2025





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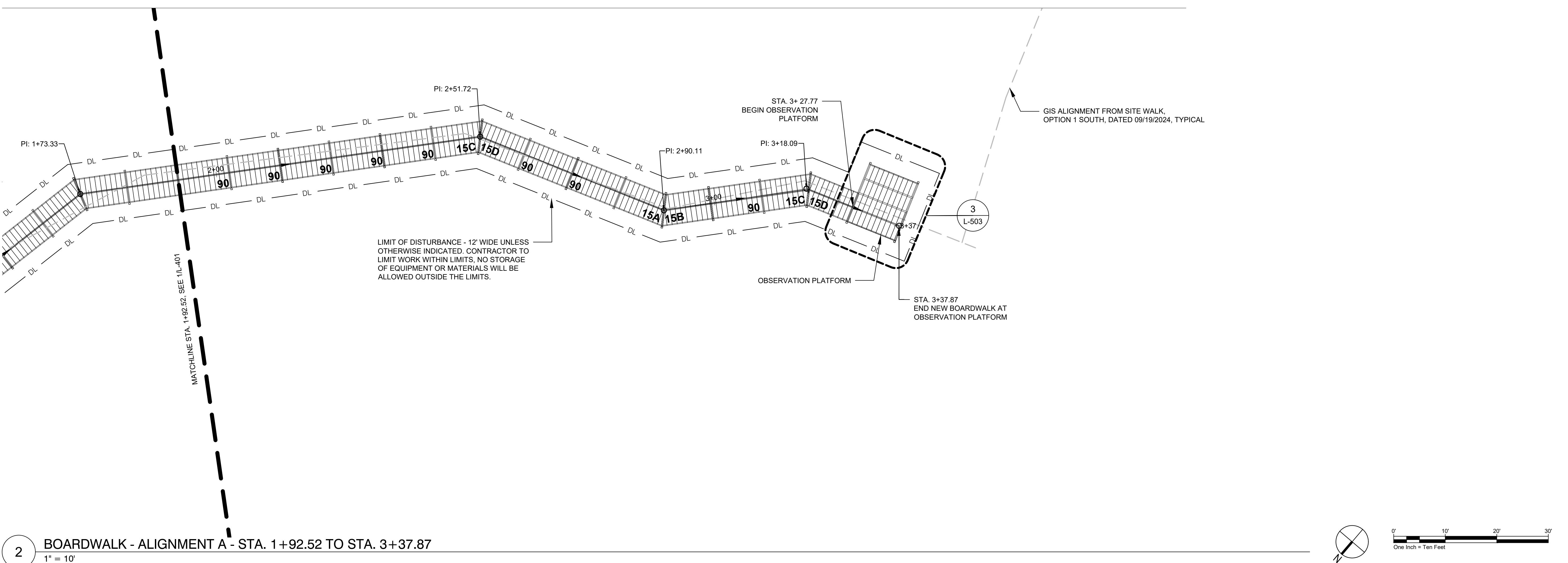
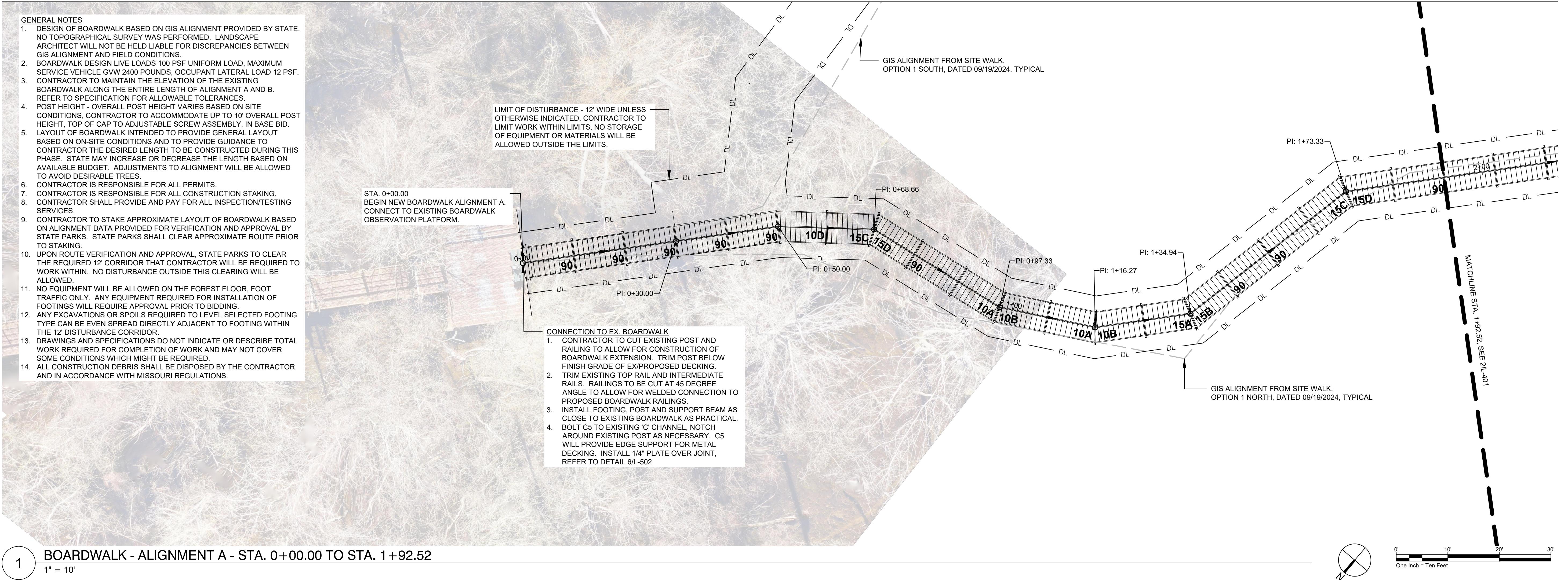
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REVISION: \_\_\_\_\_  
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DRAWN BY: CLS  
CHECKED BY: NTF/JEN  
DESIGNED BY: JEN

SHEET TITLE:  
**BOARDWALK  
ENLARGEMENT**

SHEET NUMBER:  
**L-401**





NAME: JEFFREY E. NILGES  
DISCIPLINE: LANDSCAPE ARCHITECT  
LICENSE NO: 2006005037  
EXPIRATION DATE: DECEMBER 31, 2026

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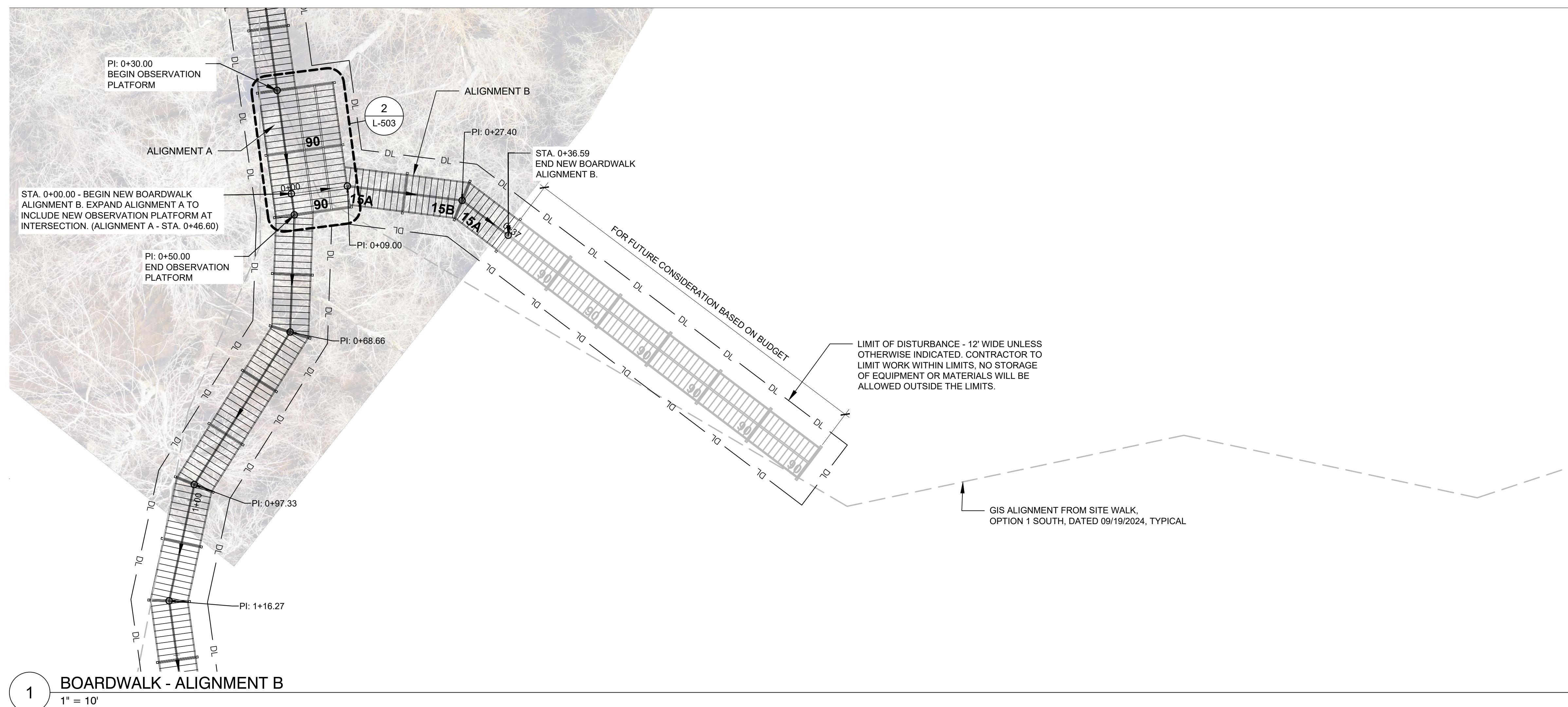
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DATE: \_\_\_\_\_  
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DRAWN BY: CLS  
CHECKED BY: NTF/JEN  
DESIGNED BY: JEN

SHEET TITLE:  
**BOARDWALK  
ENLARGEMENT**

SHEET NUMBER:

**L-402**





NAME: JEFFREY E. NILGES  
DISCIPLINE: LANDSCAPE ARCHITECT  
LICENSE NO: 2006005037  
EXPIRATION DATE: DECEMBER 31, 2026

LANDSCAPE ARCHITECT  
**PLANNING  
DESIGN  
STUDIO**

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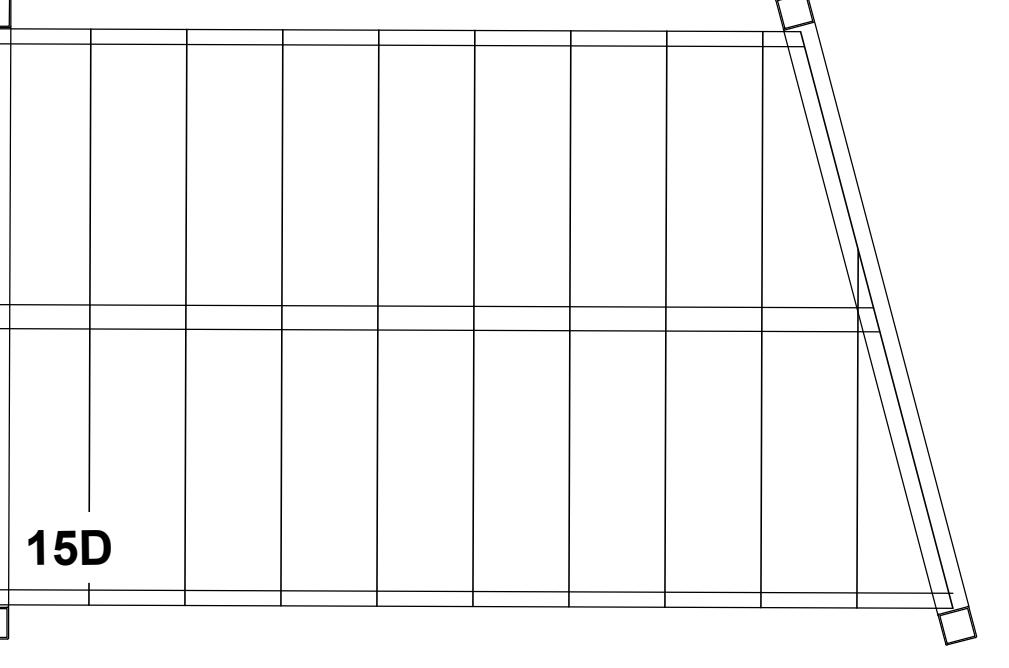
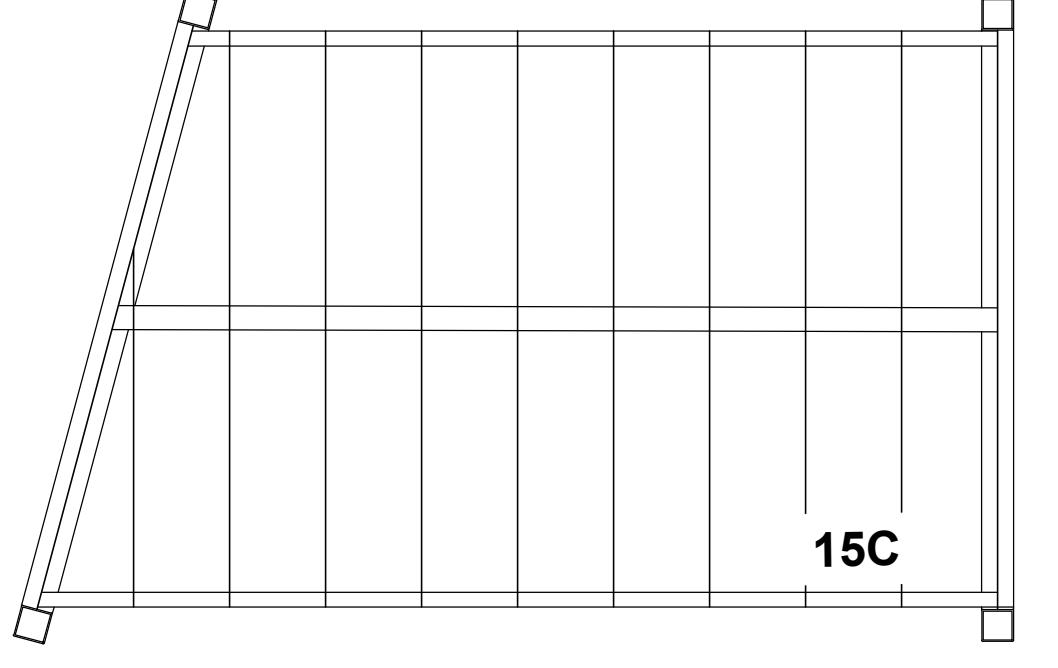
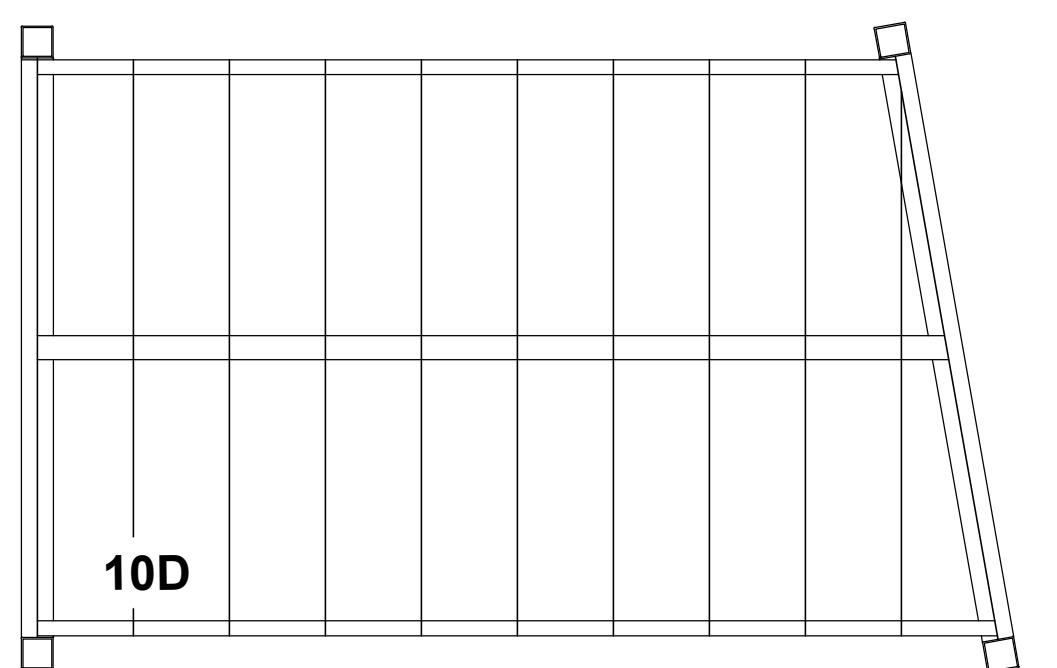
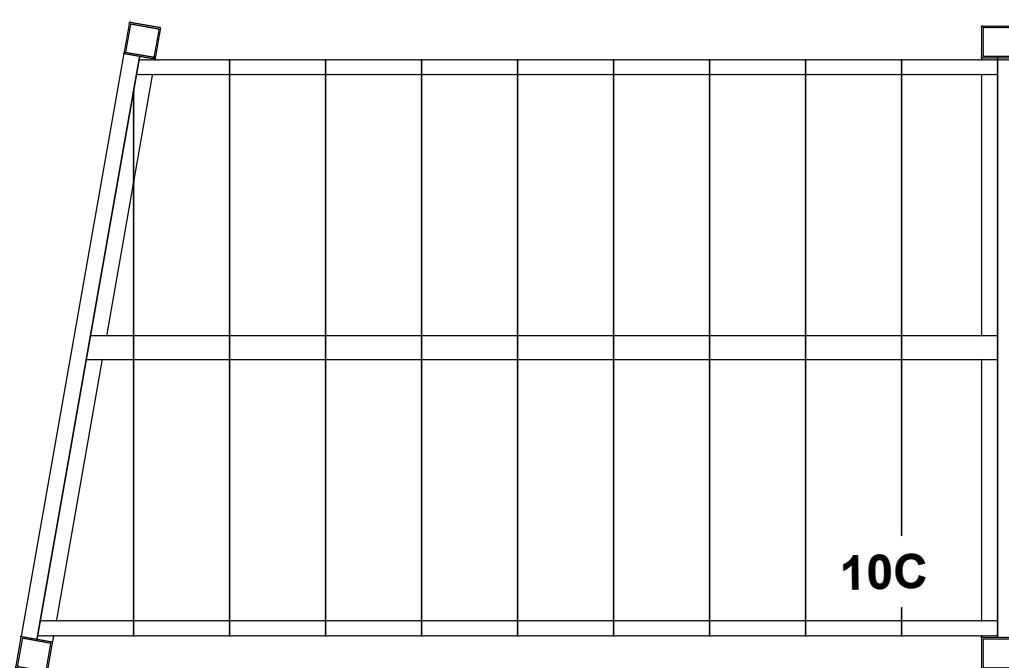
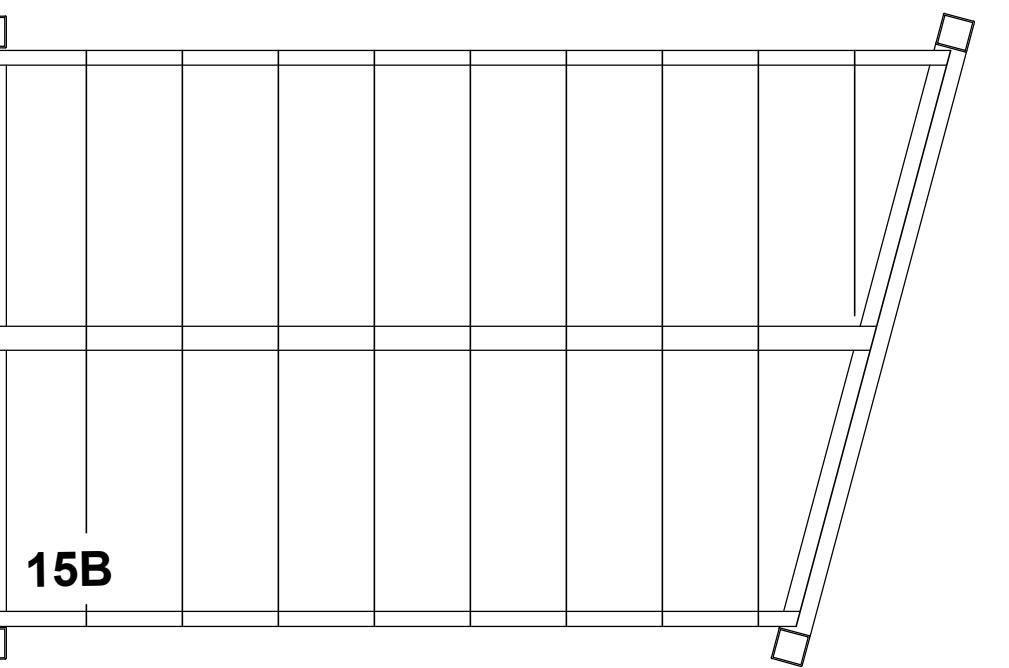
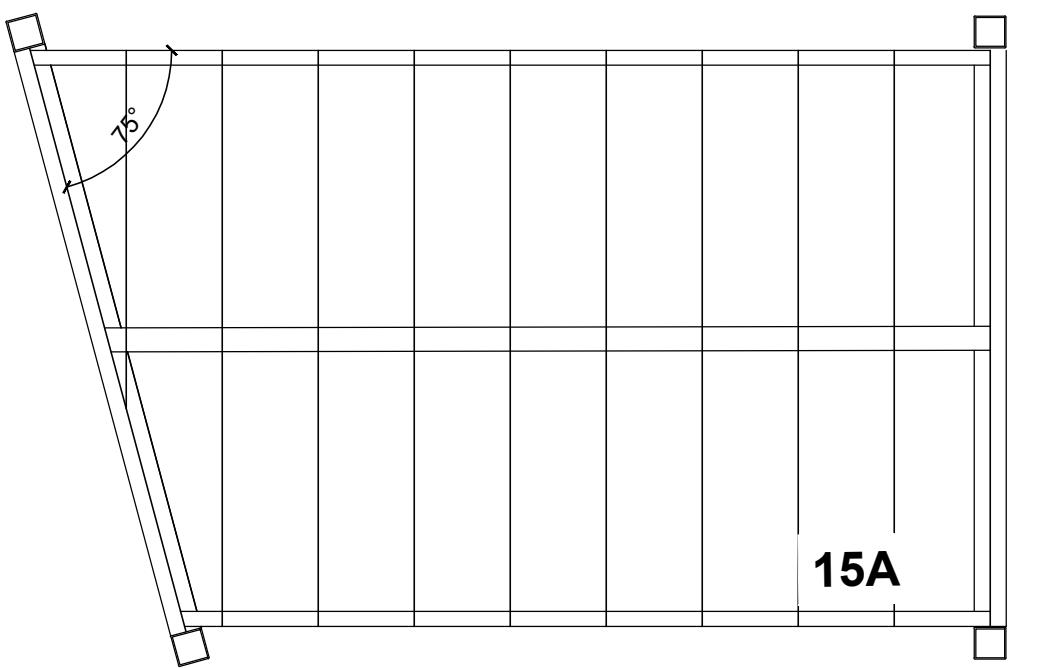
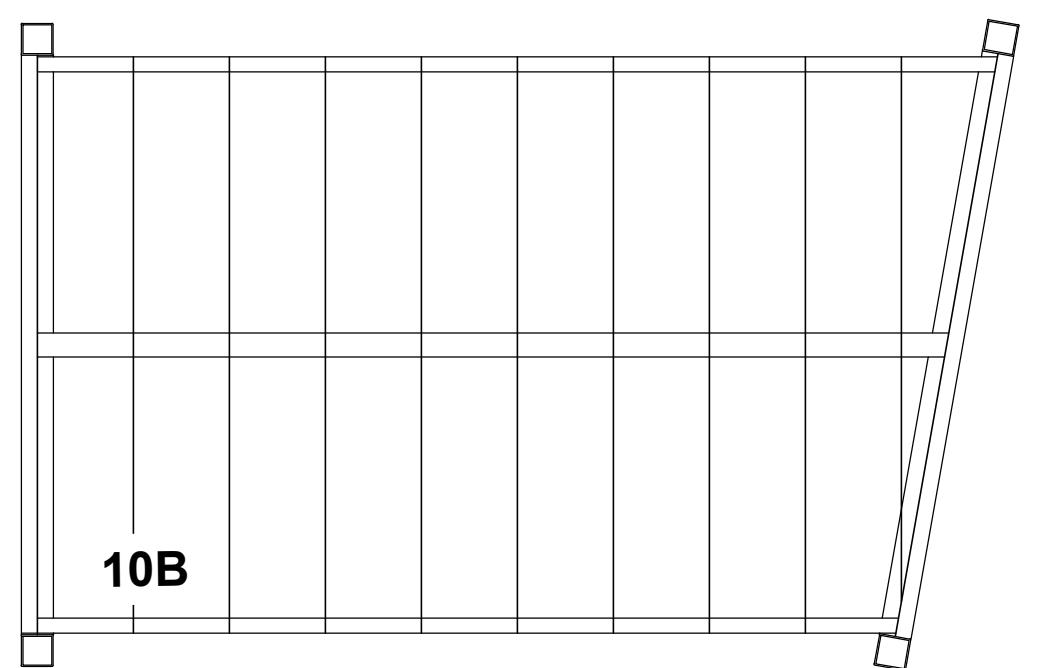
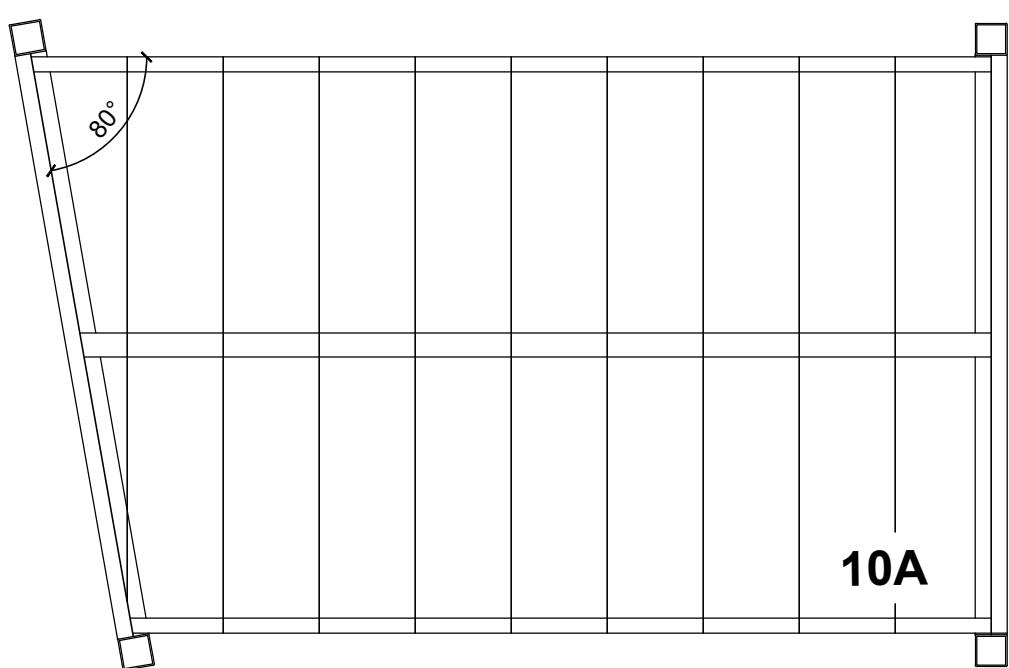
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DRAWN BY: CLS  
CHECKED BY: NTF/JEN  
DESIGNED BY: JEN

SHEET TITLE:  
**BOARDWALK  
DETAILS  
COMPONENTS**

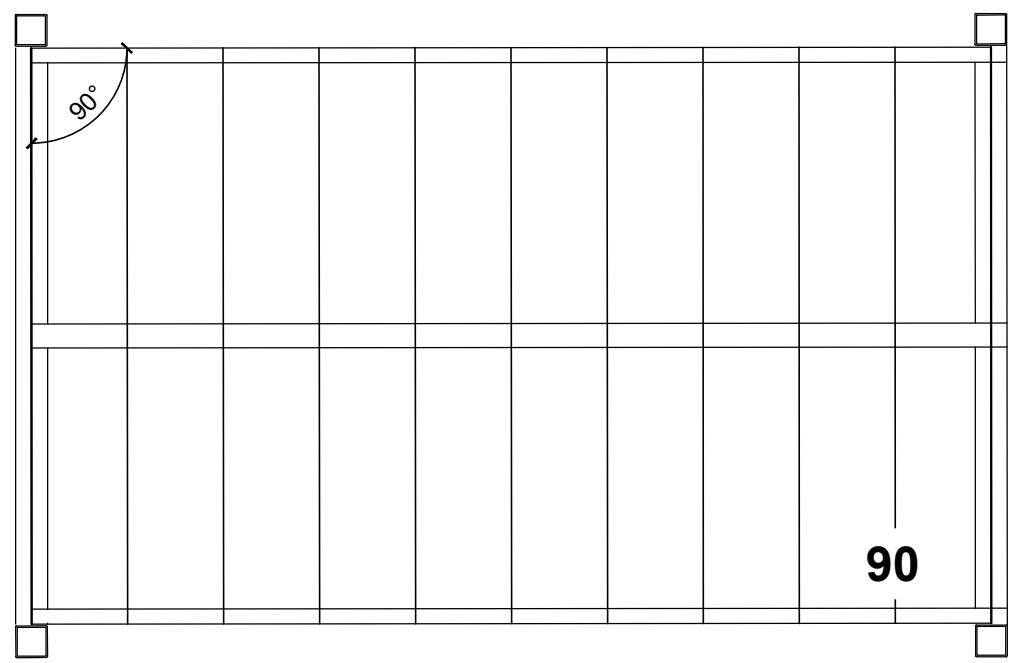
SHEET NUMBER:

**L-501**



1 10 DEGREE ANGLED BOARDWALK  
1" = 2'

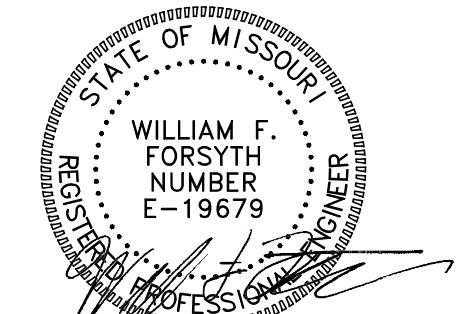
2 15 DEGREE ANGLED BOARDWALK  
1" = 2'



3 STRAIGHT BOARDWALK  
1" = 2'

COMPONENT QUANTITY			
TYPE	TOTAL	ALIGNMENT A	ALIGNMENT B
STRAIGHT (90)	19	18	1
STRAIGHT (MODIFIED)	2	1	1
10			
A	2	2	X
B	2	2	X
C	X	X	X
D	1	1	X
15			
A	4	2	2
B	3	2	1
C	4	4	X
D	4	4	X

SHEET TITLE:  
**BOARDWALK  
DETAILS  
COMPONENTS**



NAME: WILLIAM FORSYTH  
DISCIPLINE: STRUCTURAL ENGINEER  
LICENSE NO.: 19679  
EXPIRATION DATE: DECEMBER 31, 2025

LANDSCAPE ARCHITECT  
**PLANNING DESIGN STUDIO**

CERT. OF AUTHORITY: LAC-2006001845  
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13640 MO-102  
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SITE # 5203  
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CAD DWG FILE: X2407-01\_L502.37815203011.L-502.DWG  
DRAWN BY: CLS  
CHECKED BY: NTF/JEN  
DESIGNED BY: JEN

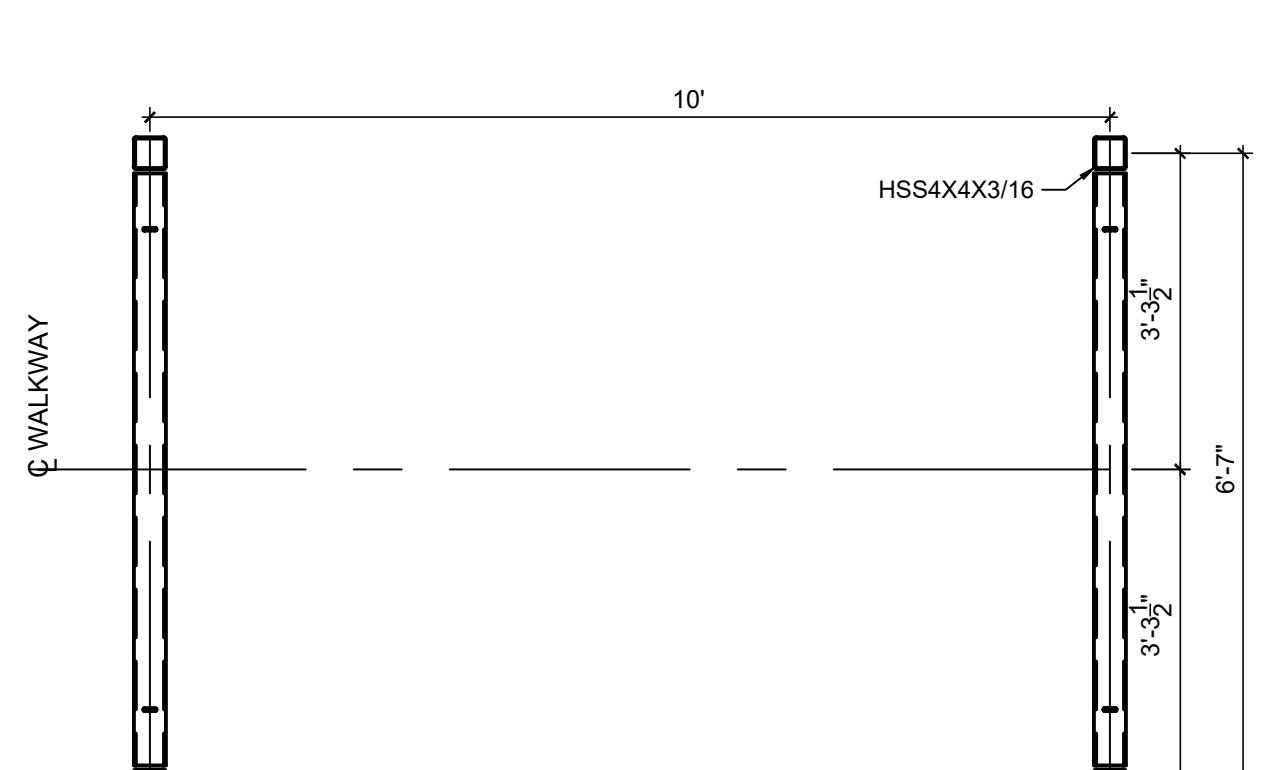
SHEET TITLE:

**BOARDWALK  
DETAILS**

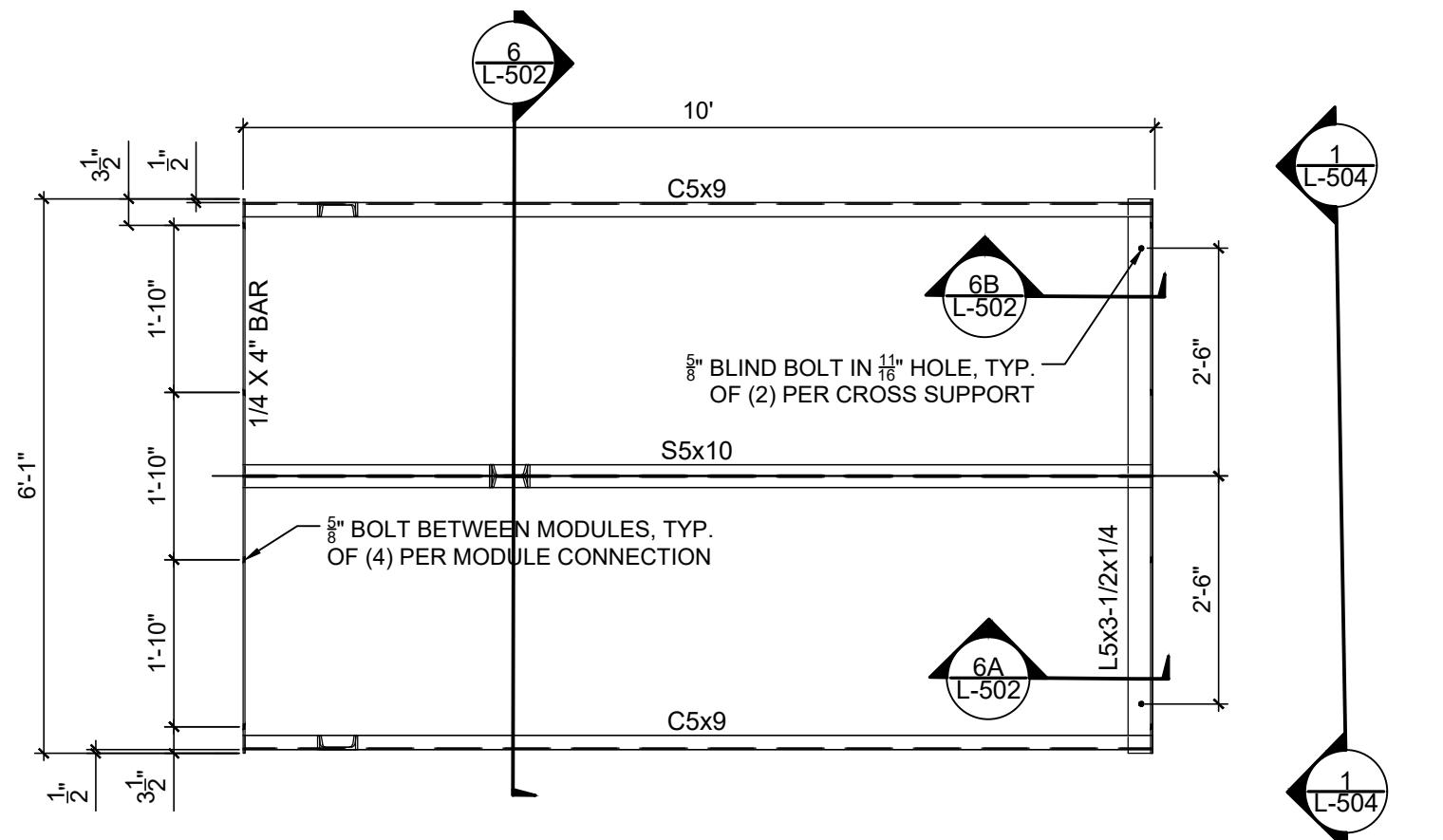
SHEET NUMBER:

**L-502**

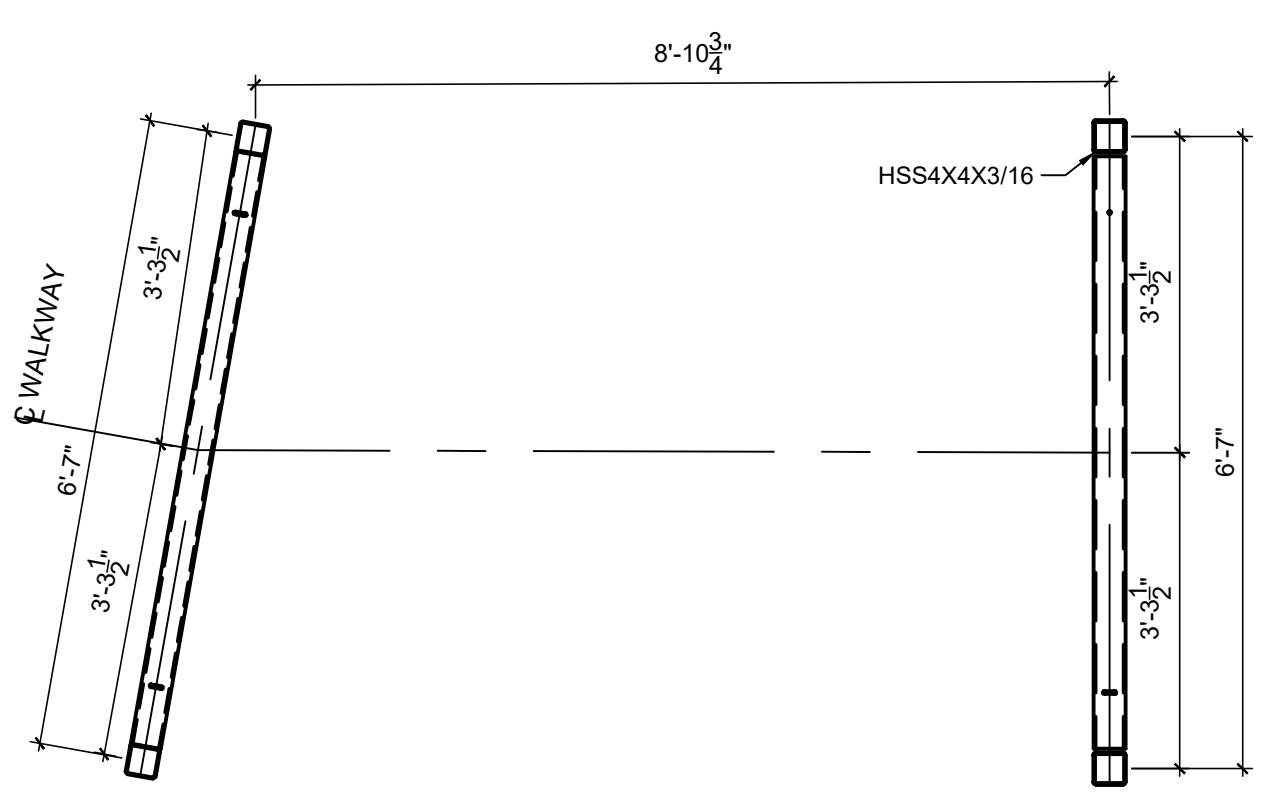
7 OF 9 SHEETS  
11/26/2025



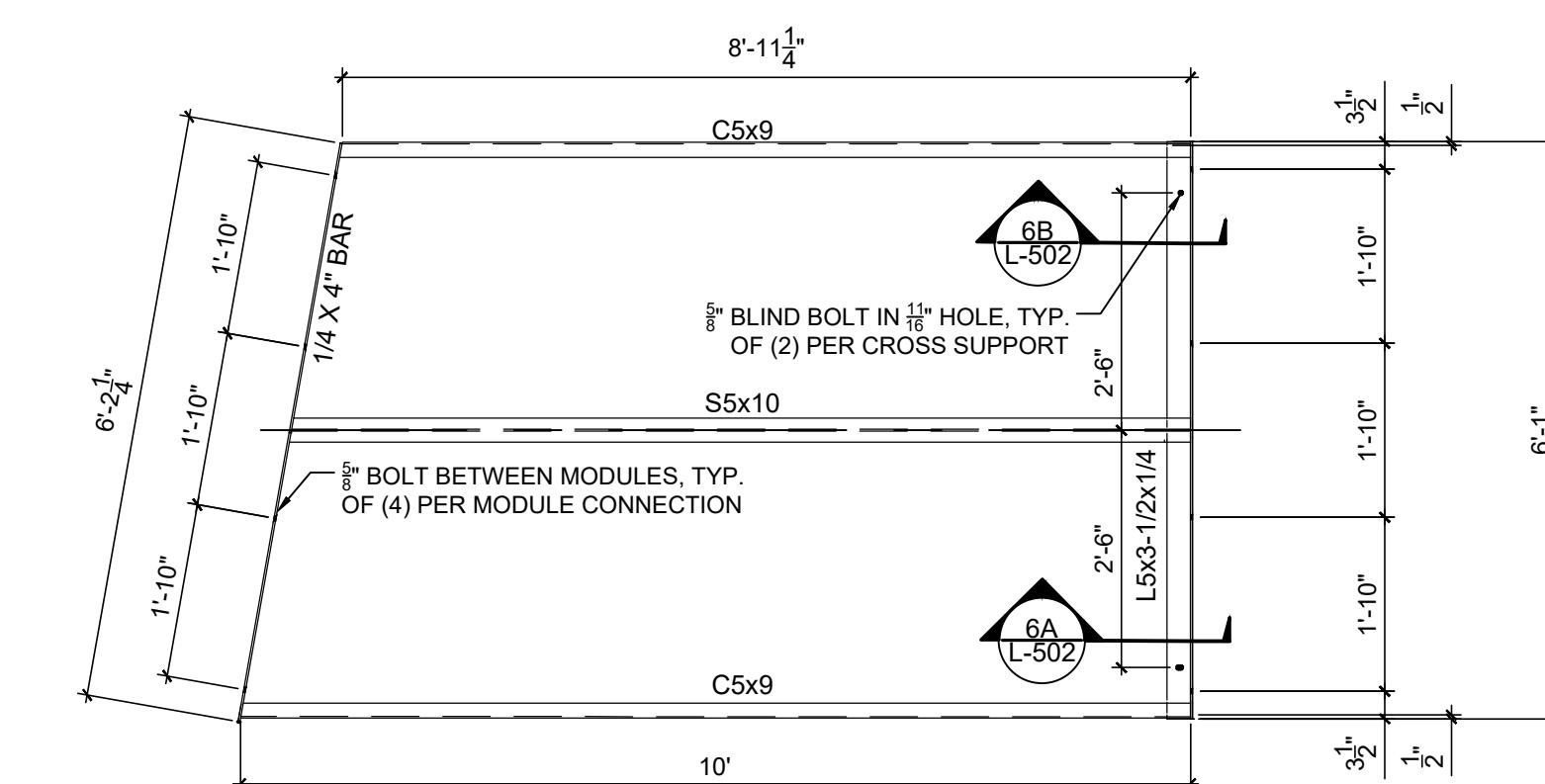
STRAIGHT MODULE



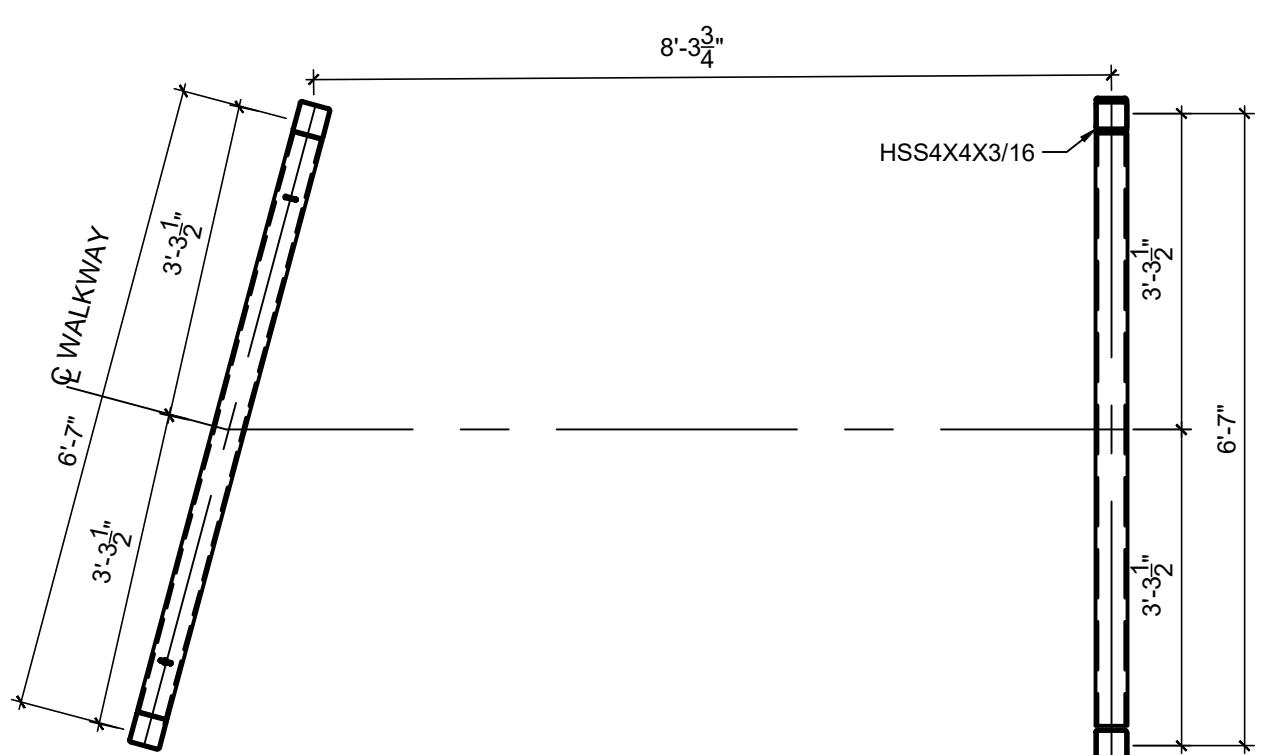
STRAIGHT MODULE



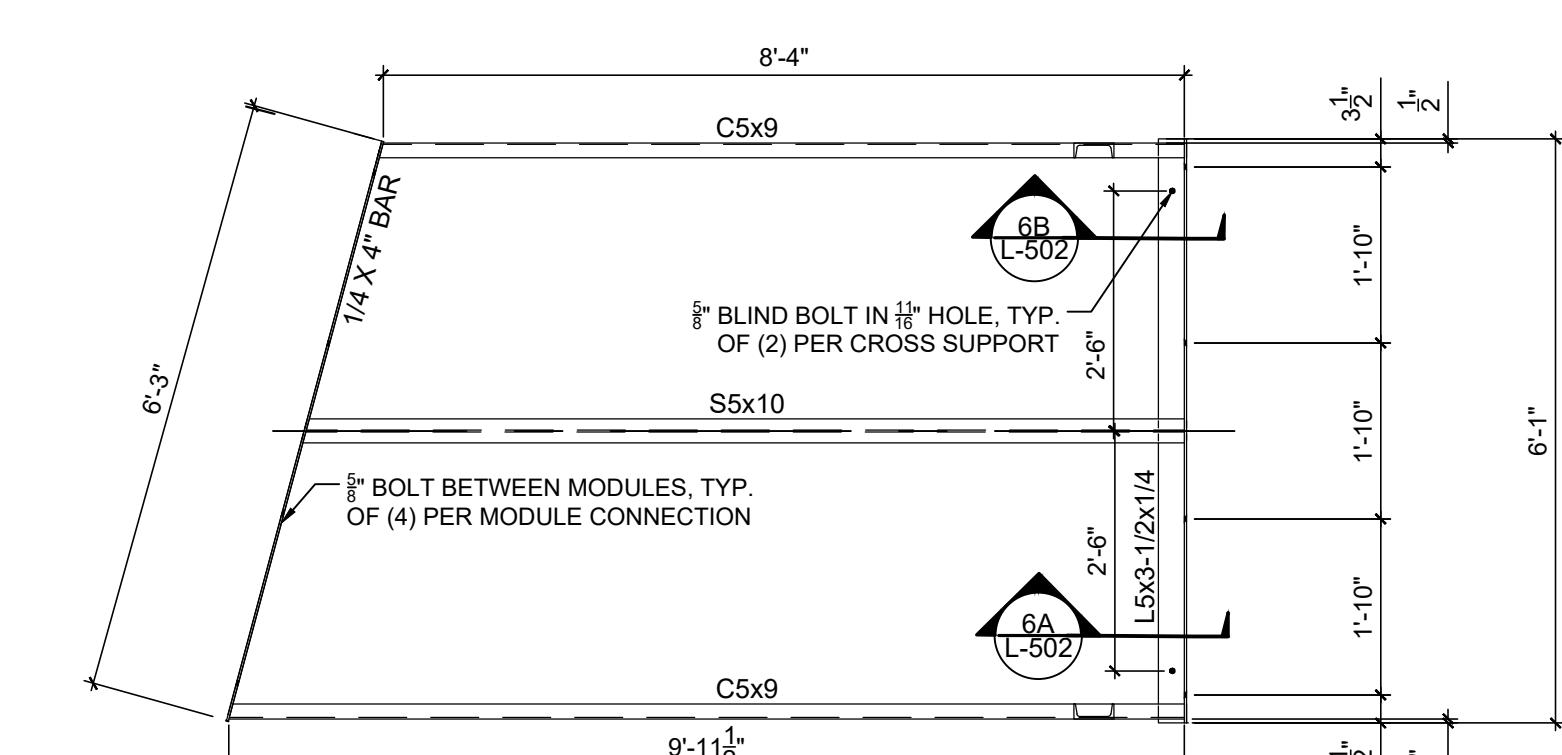
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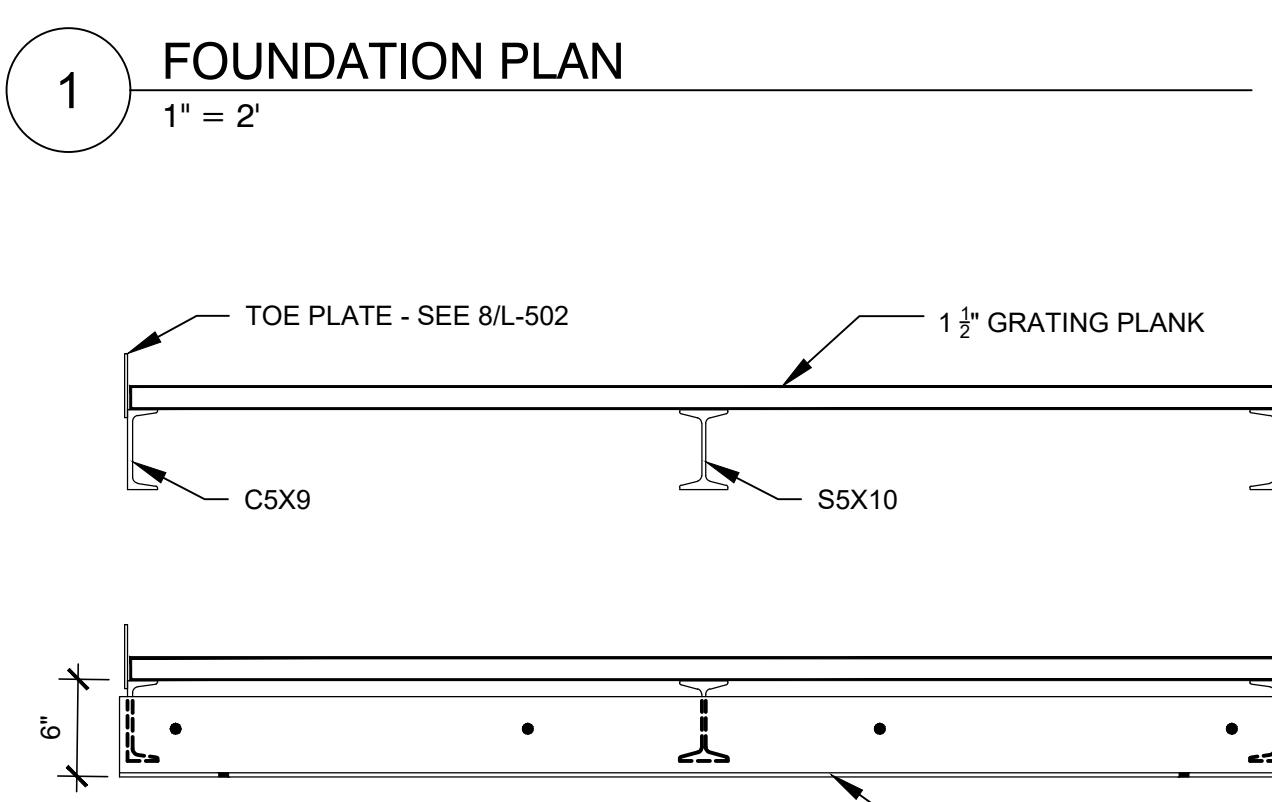
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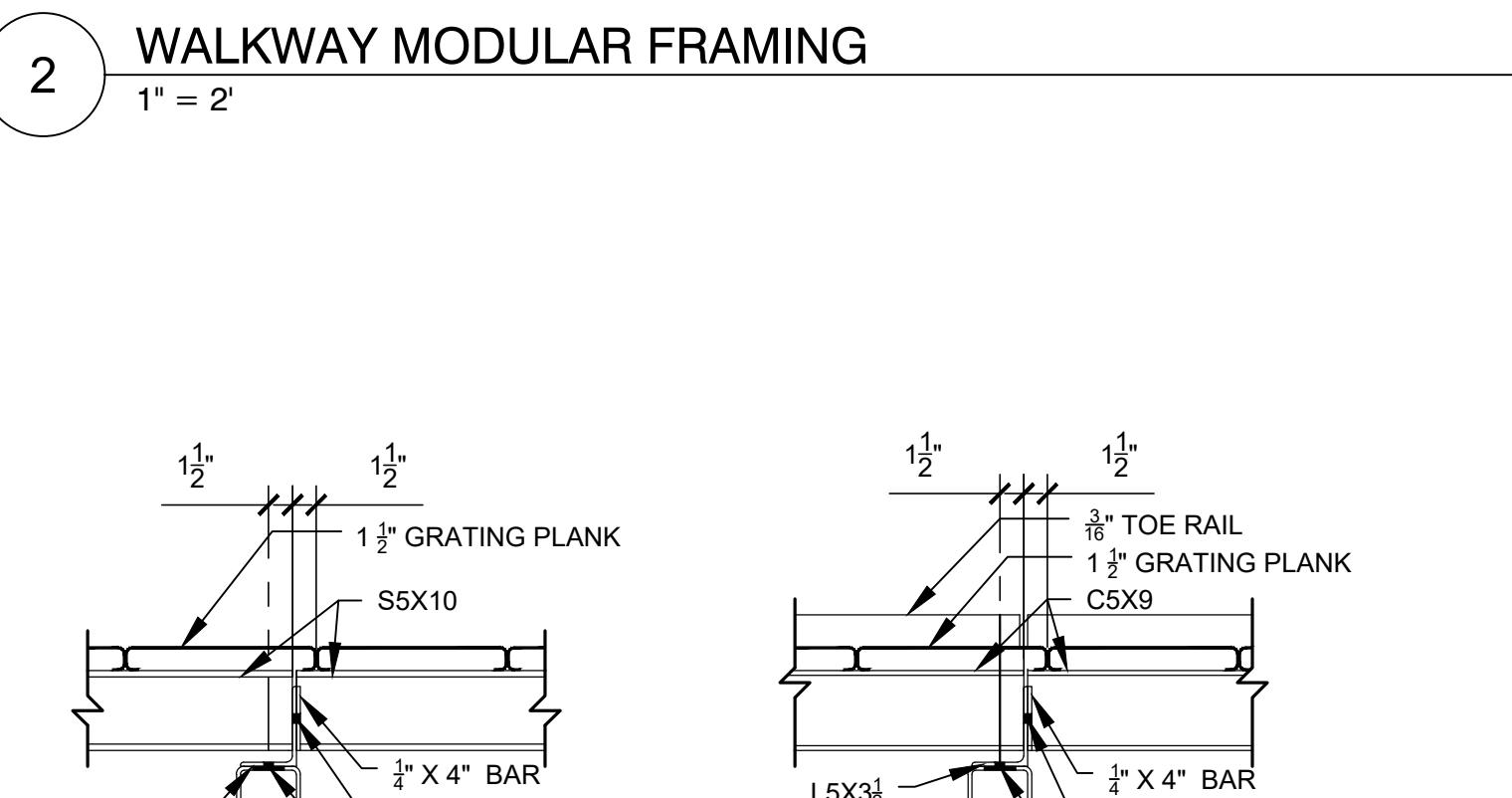
15 DEGREE MODULE



15 DEGREE MODULE

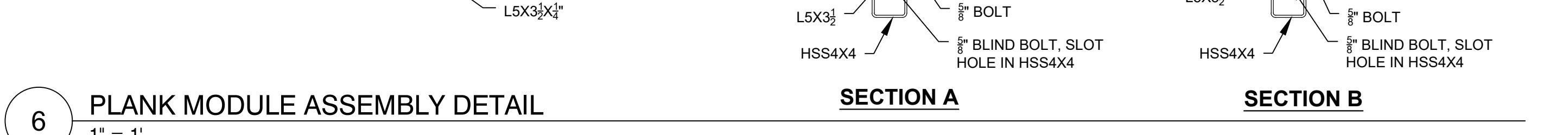


1 FOUNDATION PLAN  
1" = 2'

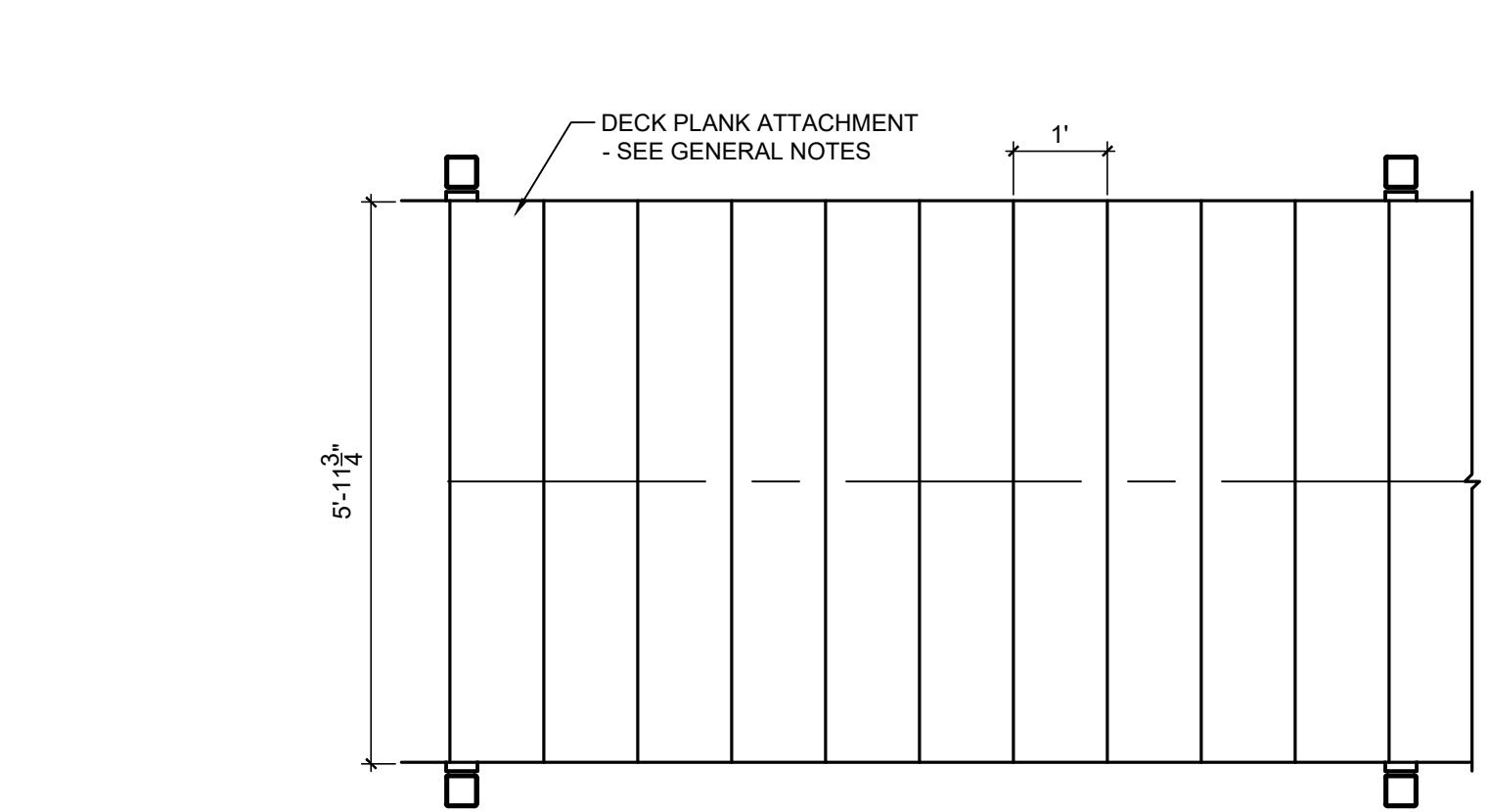


SECTION A

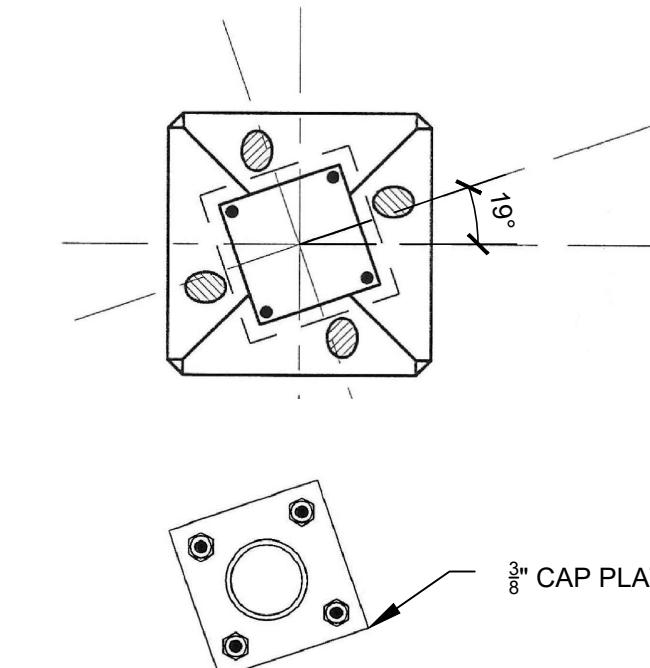
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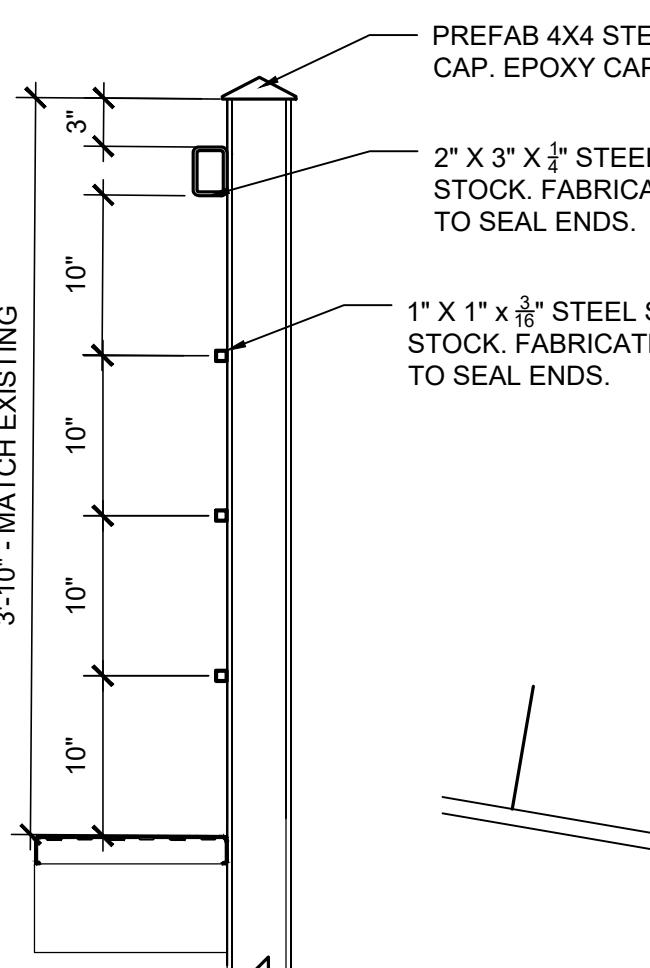
6 PLANK MODULE ASSEMBLY DETAIL  
1" = 1'



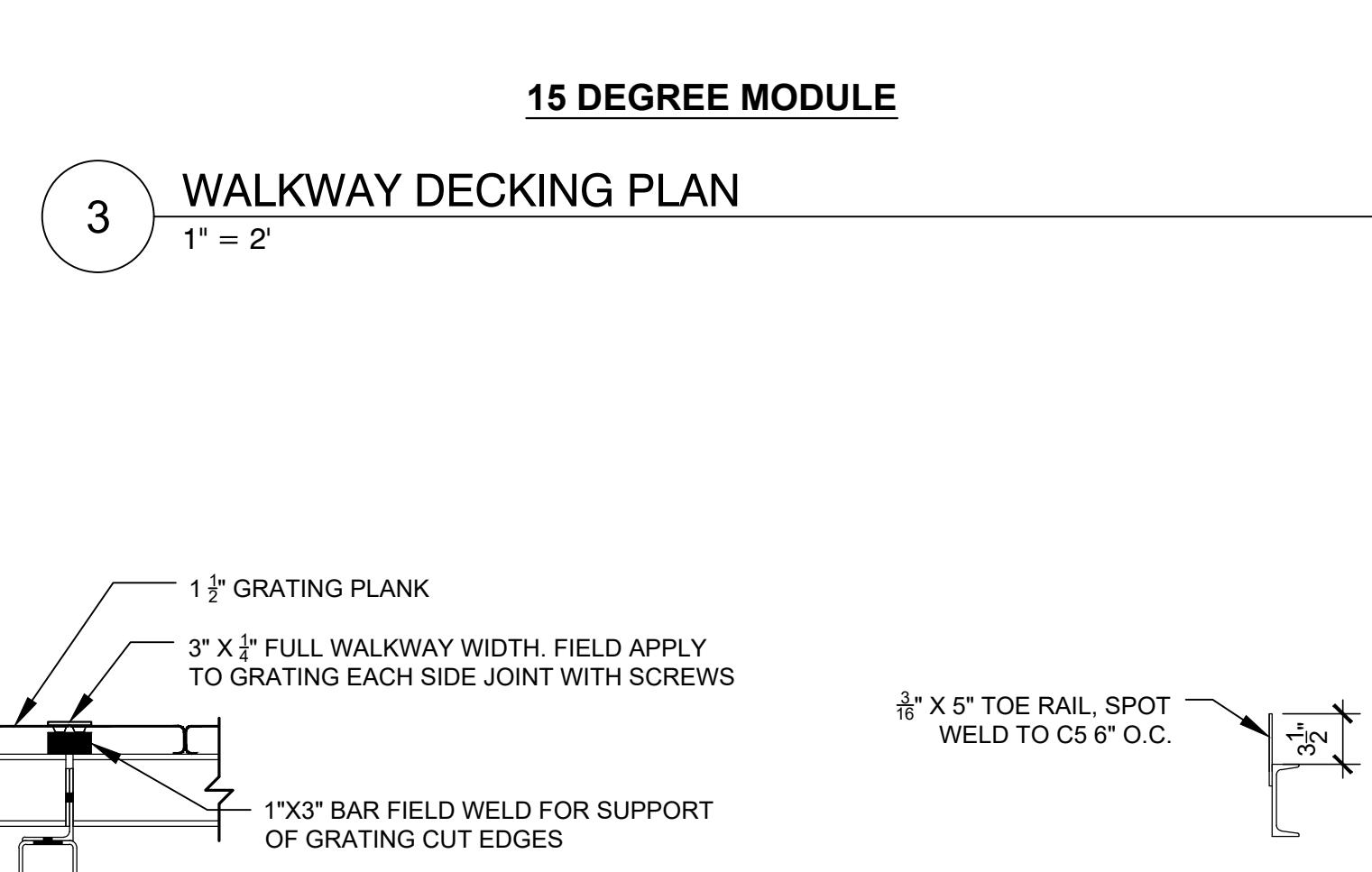
STRAIGHT MODULE



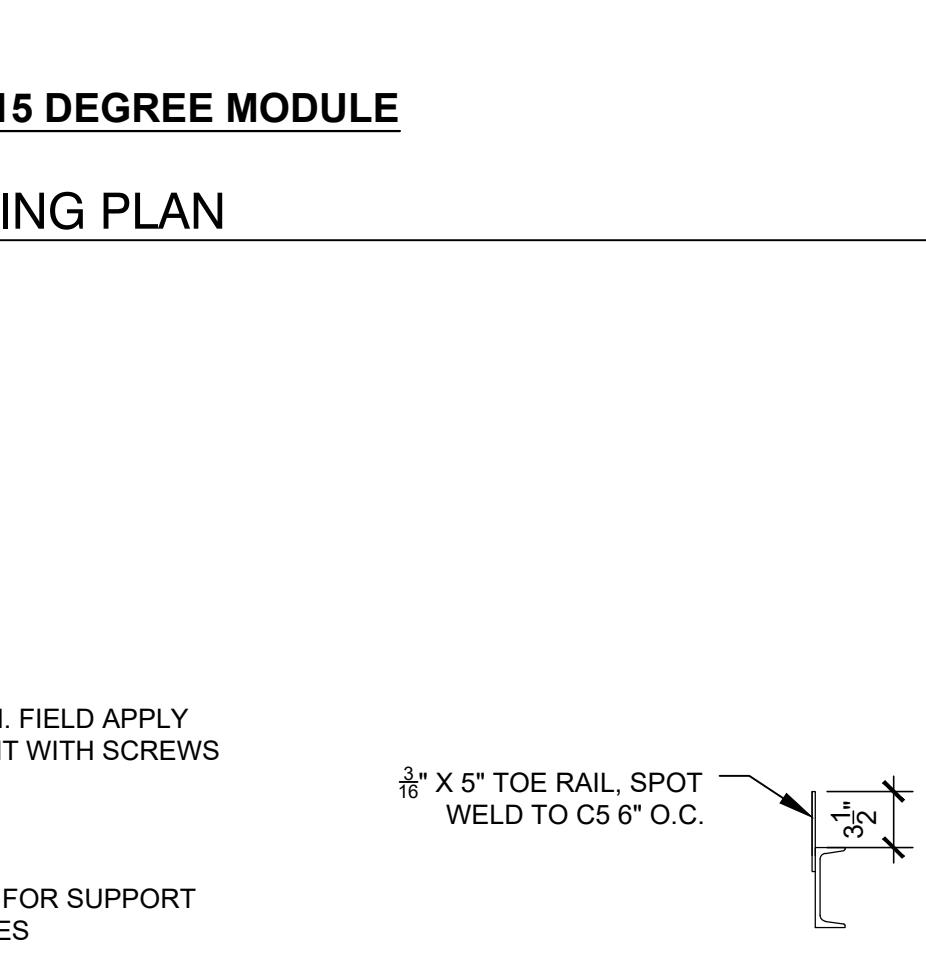
4 PIN PILE FOOTING  
2" = 1'



TYPICAL RAIL SUPPORT  
FOR ANGLED MODULES



7 ANGLED GRATING PLANK SUPPORT  
1" = 1'



8 TOE PLATE DETAIL  
1" = 1'

GENERAL NOTES  
1. CONTRACTOR TO MECHANICALLY FASTEN BOARDWALK PLANKS, MIN 3 LOCATIONS WITH 1-7/8" BOLT SEAT AND NO. 16 - 3/8" DIA. CARRIAGE BOLT OR SELF TAPPING SCREW, SIZED TO SECURE BOLT SEAT TO PERFORATED DECK PLANKS. ALL COMPONENTS TO BE GALVANIZED.  
2. CONTRACTOR TO PROVIDE EDGE SUPPORT FOR ALL CUT ENDS ON OF PERFORATED DECK PLANKS. EDGE SUPPORT TO BE CARRIER PLATES, 13 GAUGE, SIZED PER PLANK DIMENSIONS. ALL COMPONENTS TO BE GALVANIZED.

SHEET NUMBER:





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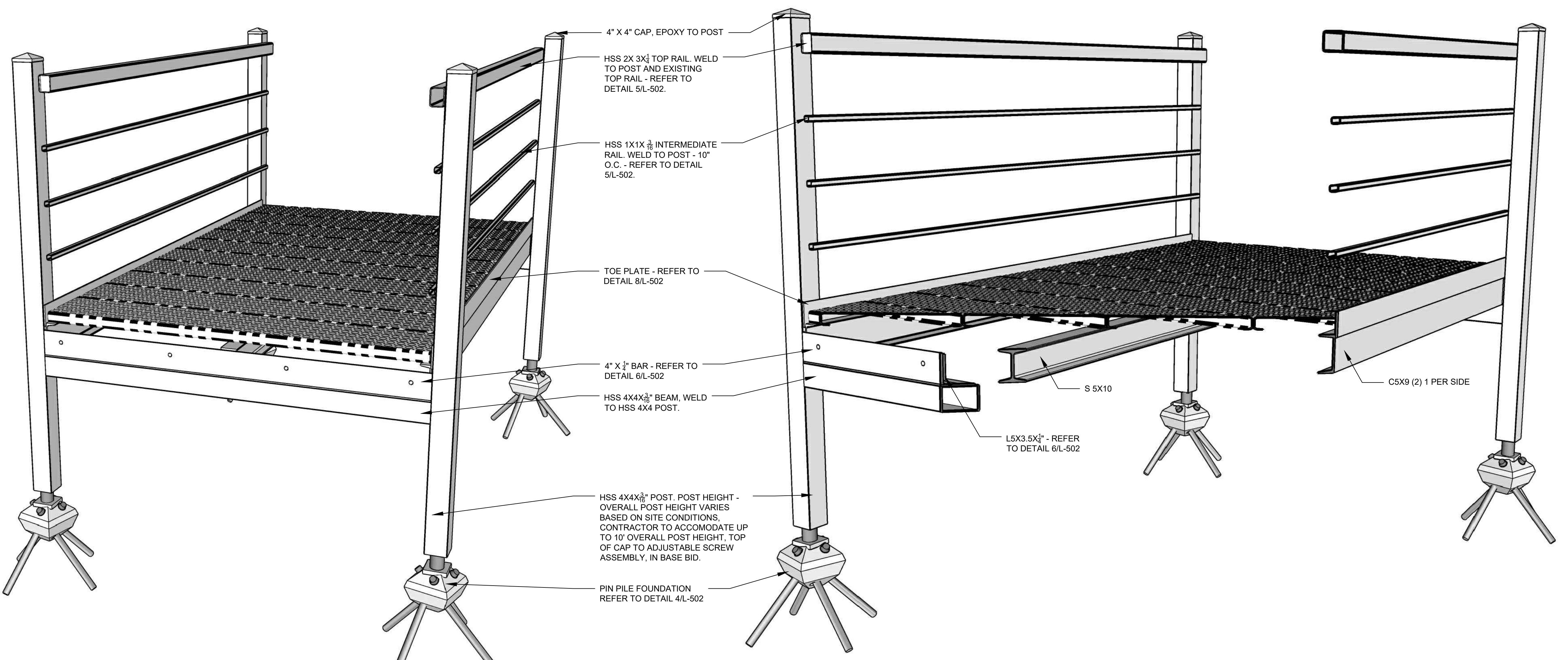
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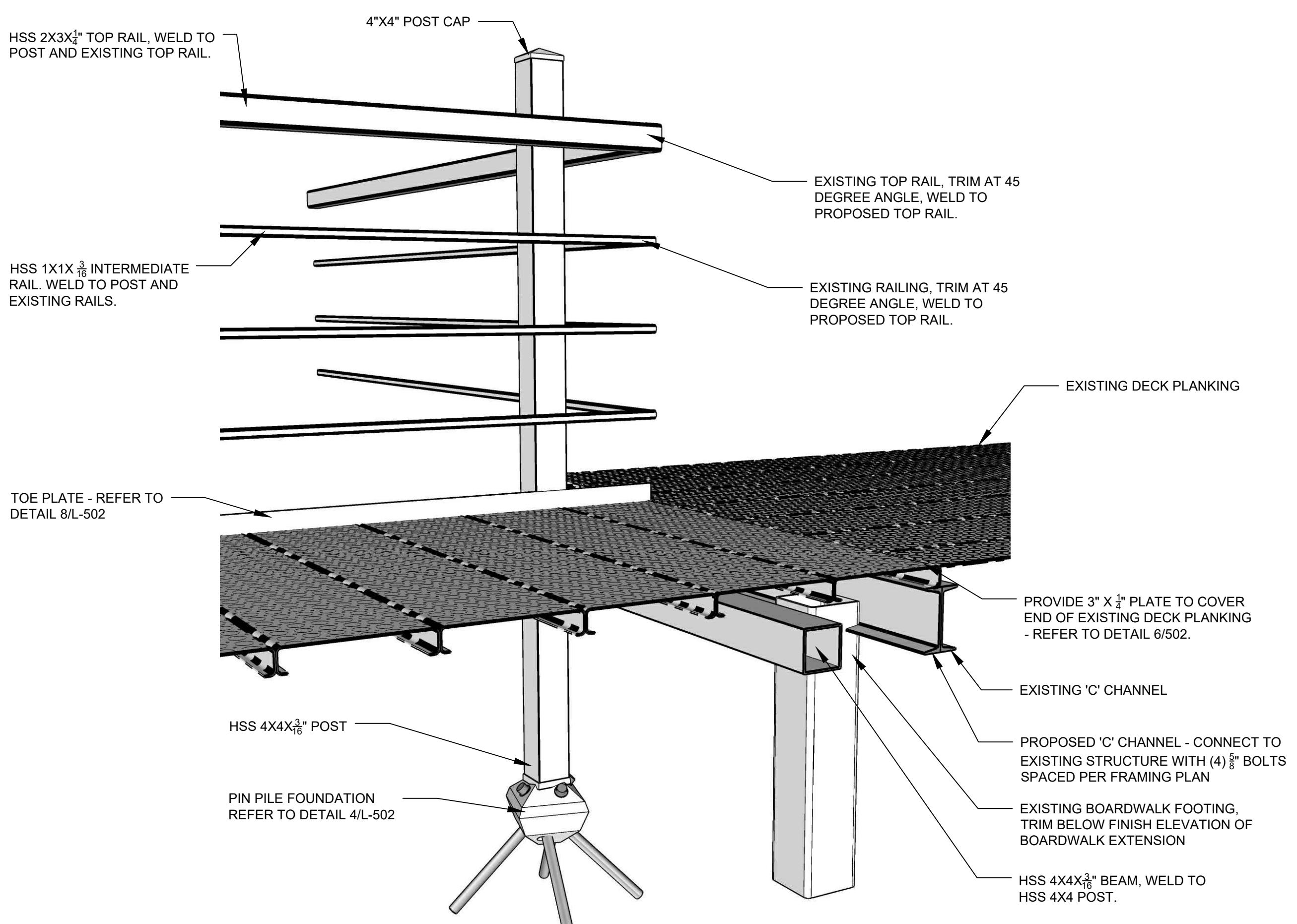
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**L-504**

9 OF 9 SHEETS  
11/26/2025



1 BOARDWALK SCHEMATIC  
NTS



2 EXISTING BOARDWALK CONNECTION SCHEMATIC  
NTS