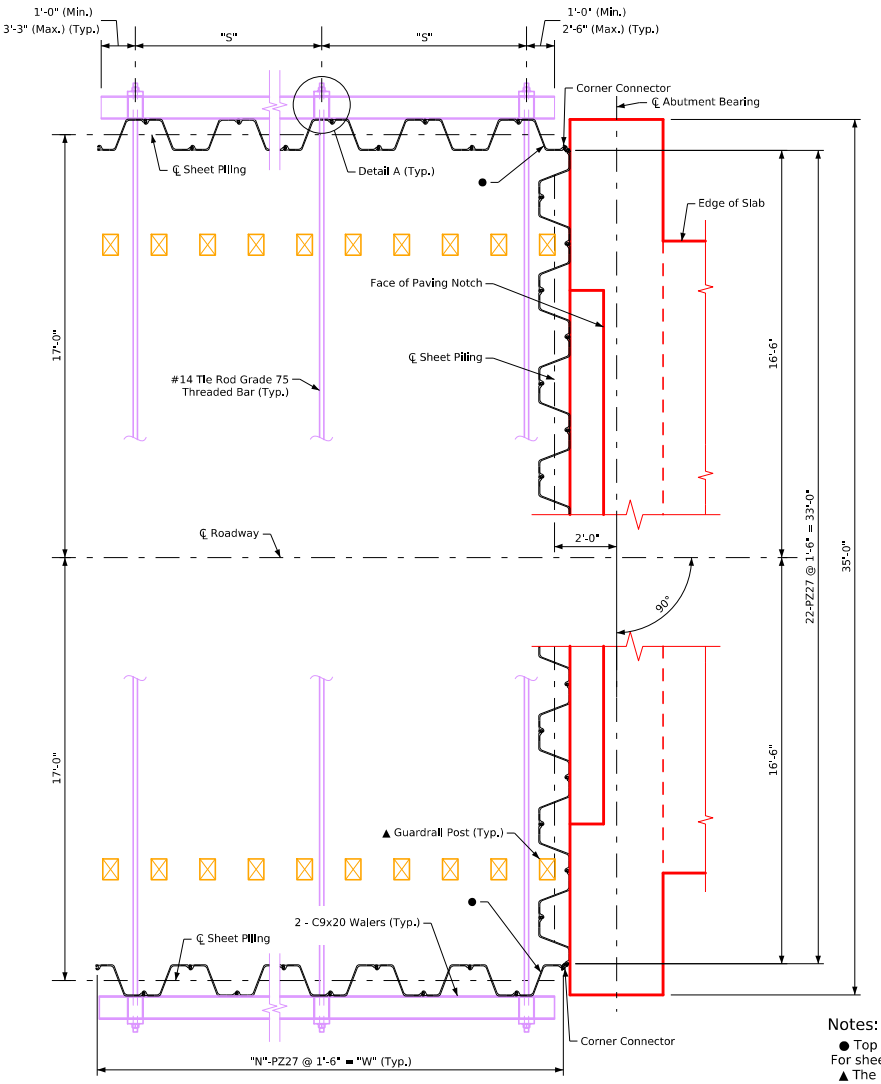


Steel Sheet Piling Plan View

(Cover Plates Not Shown For Clarity)

Notes:

● Top of sheet piling at wings to match top of abutment elevation.
For sheet pile cover plate details, see Sheets J24S-24-25 and J24S-25-25.

▲ The guardrail post #15 (open concrete rails only) may require adjustment to ensure adequate clearance from the backwall sheeting and backwall cover plate. See Sheet J24S-25-25 and roadway sheets for post locations.
The Bridge Contractor shall verify clearances for guardrail post installation, and make any necessary adjustments. Post #15 blockout lengths may be field adjusted to facilitate guardrail installation.

Sheet Pile Backwall and Wing Wall Quantities

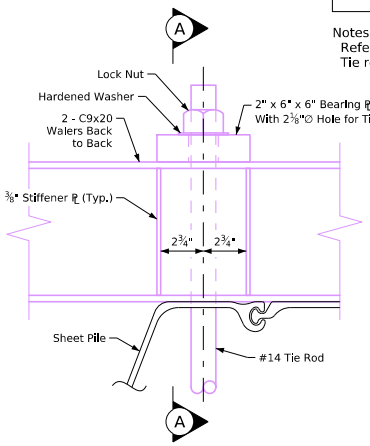
Number of Sheet Piles	Per Wing	*N = W / 1.5'	Total = 2 x N + 26
	Backwall	26	
Sheet Pile Area		(D1 + D2 + L) x W + 26 x 1.5' x (L - 2')	
Number of Tie Rods		*T = W / S + 1	

Notes:
All units are in feet.
Wing length "W" is to be calculated by the Engineer based on height from grade to top of berm "H" and wing slope.
* Number of wing wall sheet piles and tie rods shall be calculated as shown and rounded up to a whole number.
See Sheet J24S-24-25 for "D1" + "D2" values required (minimum embedment depths).

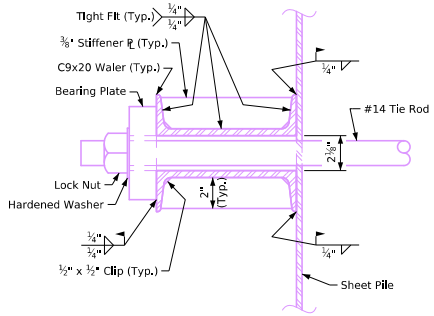
Table of Required Tie Rod Spacing

Abutment Height "H"	6'-0"	8'-0"	10'-0"	12'-0"	14'-0"
Maximum Tie Rod Spacing "S"	9'-2"	8'-4"	7'-3"	5'-11"	4'-11"

Notes:
Refer to Sheet J24S-24-25 for sheet pile height ("H") details.
Tie rod spacing ("S") shall be selected to avoid conflicts with the guardrail posts.



Detail A



Section A-A

Latest Revision Date

Approved by Bridge Engineer

IOWA DOT

Standard Design - 24'-0" Roadway, Single Span Bridge

Single Span Concrete Slab Bridges

July, 2025

Steel Sheet Piling Details
0° Skew

J24S-22-25