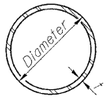
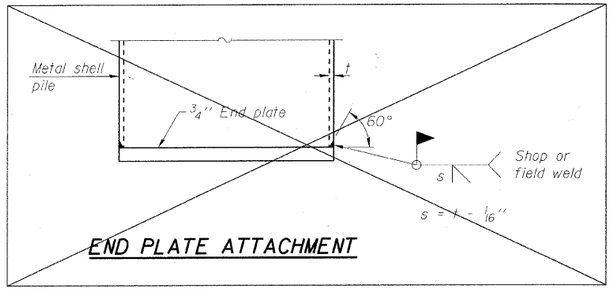
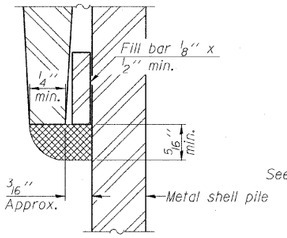


METAL SHELL PILE TABLE

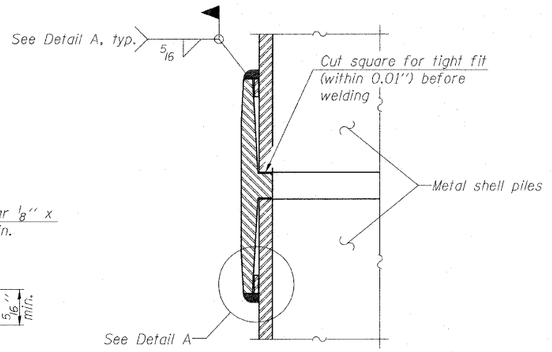
Designation and outside diameter	Wall thickness t	Weight per foot (Lbs./ft.)	Inside volume ($yd.^3$/ft.)
PP12	0.179"	22.60	0.0274
PP12	0.250"	31.37	0.0267
PP14	0.250"	36.71	0.0368
PP14	0.312"	45.61	0.0361



END PLATE ATTACHMENT

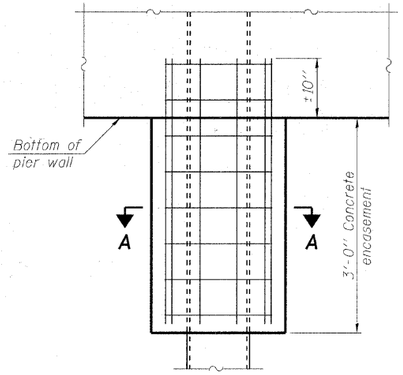


DETAIL A

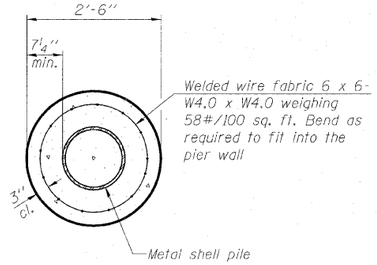


Notes:
The 1/8" x 1/2" min. fill bar may be constructed of 2 bars with a 1/8" max. gap between them.
Pile segments shall be driven to solid contact with splicer before welding.

WELDED COMMERCIAL SPLICE



ELEVATION

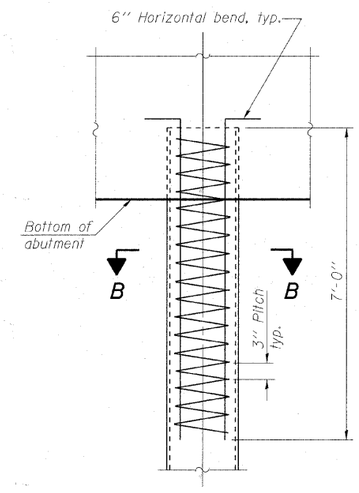


SECTION A-A

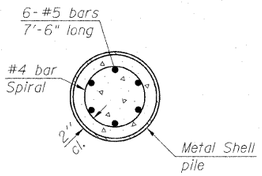
Note:
Forms for encasement may be omitted when soil conditions permit.

CONCRETE ENCASEMENT AT PIERS

Welded Wire Fabric shall be included with the cost of Concrete Encasement.



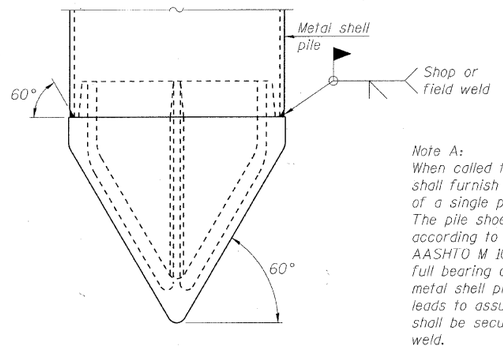
ELEVATION



SECTION B-B

METAL SHELL REINFORCEMENT AT ABUTMENTS

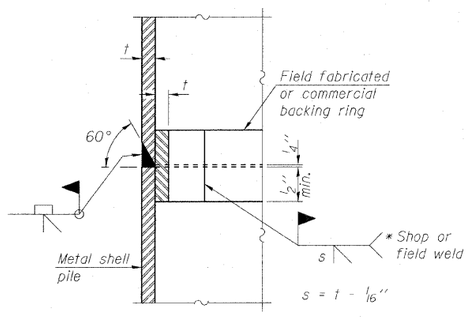
Metal Shell reinforcement at abutments shall be included with the cost of Furnishing Metal Shell Piles.



Note A:
When called for on the plans, the Contractor shall furnish metal shell pile shoes consisting of a single piece conical pile point as shown. The pile shoes shall be cast in one piece steel according to either ASTM A 148 Grade 90-60 or AASHTO M 103 Grade 65-35 and shall provide full bearing over the full circumference of the metal shell pile. The pile shoe shall have tapered leads to assure proper alignment and fitting and shall be secured to the pile with a circumferential weld.

METAL SHELL PILE SHOE ATTACHMENT

(See Note A)



COMPLETE PENETRATION WELD SPLICE

* Field fabricated backing ring may be made from pile shell by removing segment to allow reducing circumference and vertically rejoin with partial joint penetration weld.

Note:
The metal shell piles shall be according to ASTM A 252 Grade 3.

COPYRIGHT © 2010, BY BAXTER & WOODMAN, INC.
ILLINOIS PROFESSIONAL DESIGN FIRM
LICENSE NO. - 184-001121 - EXPIRES 4/30/2011
2/7/20 2:28:11 PM
...\plotdrive\VDF32\v3456\dgn.plt
...\PLOTS\Graf East\07024E.tbl
S:\Volume1\MCDOT\07024 Graf Road Bridges\Graf Road Bridges\Details.dgn

FILE NAME =	USER NAME =	DESIGNED - BLB	REVISED - PER MCDOT 12/31/10	MCHENRY COUNTY DIVISION OF TRANSPORTATION GRAF ROAD BRIDGE OVER LAWRENCE CREEK	METAL SHELL PILE DETAILS STRUCTURE NO. 056-3182 SHEET NO. 15 OF 19 SHEETS
		CHECKED - BAB	REVISED -		
	PLOT SCALE =	DRAWN - BCD	REVISED -		
	PLOT DATE =	CHECKED - BLB	REVISED -		

TR RTE	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
0037	06-00322-00-BR	MCHENRY	54	38
	C-91-358-06	CONTRACT NO. 63569		
FED. ROAD DIST. NO. 1	ILLINOIS	FED. AID PROJECT	BROS-0001(683)	