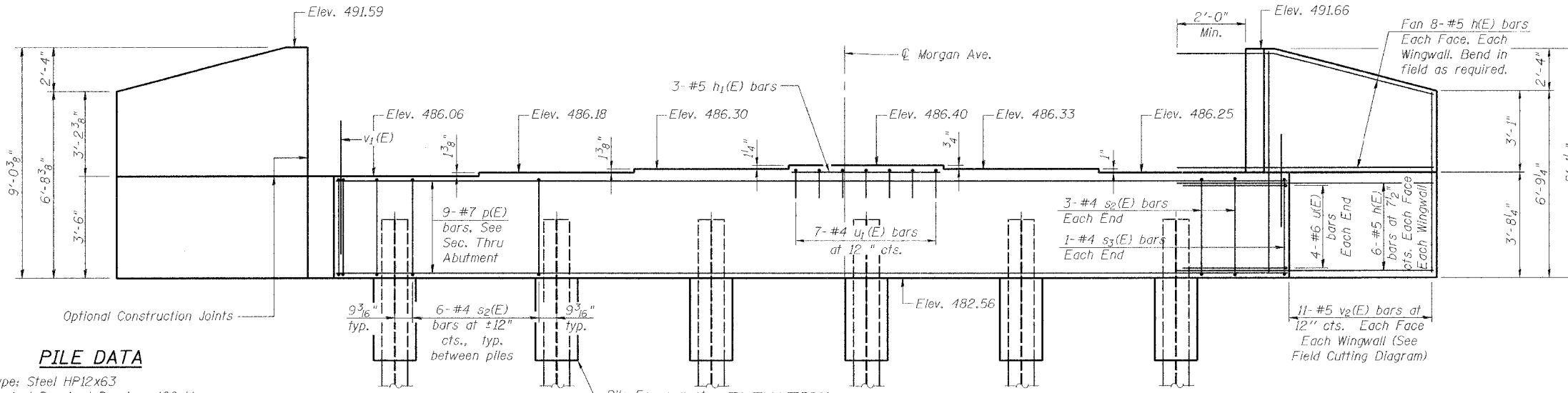


STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ROUTE NO.	SECTION	COUNTY	SHEET NO.	SHEET NO.
FAI 57	(X1-6-2)HBK	Williamson	272	157
FED. ROAD DIST. NO. 7		ILLINOIS	FED. AID PROJECT-	

Contract # 98994

Notes: Four steps monolithically with cap.
Reinforcement bars designated (E)
shall be epoxy coated.

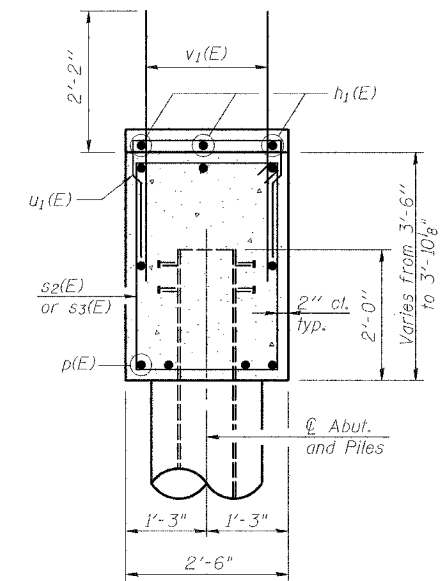


PILE DATA

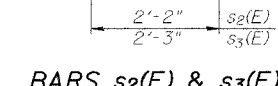
Type: Steel HP12x63
Nominal Required Bearing: 496 kips
Allowable Resistance Available: 166 kips
Est. Length: 21 Feet
No. Production Piles: 5
No. Test Piles: 1

Predrill 18" ϕ holes for the piles through the coal seam to the shale layer at Elev. 463.7'. Place pile in hole and backfill to the top of hole with dry, loose sand. Drive piles, and top-off hole with sand. The cost of predrilling holes, and backfilling with sand shall be included in the unit price bid for driving piles.

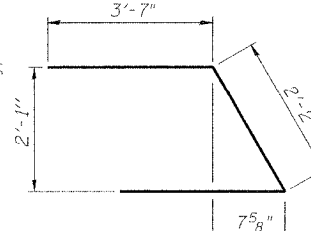
ELEVATION
(Looking West)



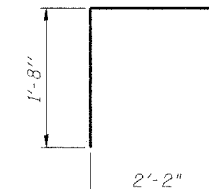
SEC. THRU ABUT.



BARS s2(E) & s3(E)



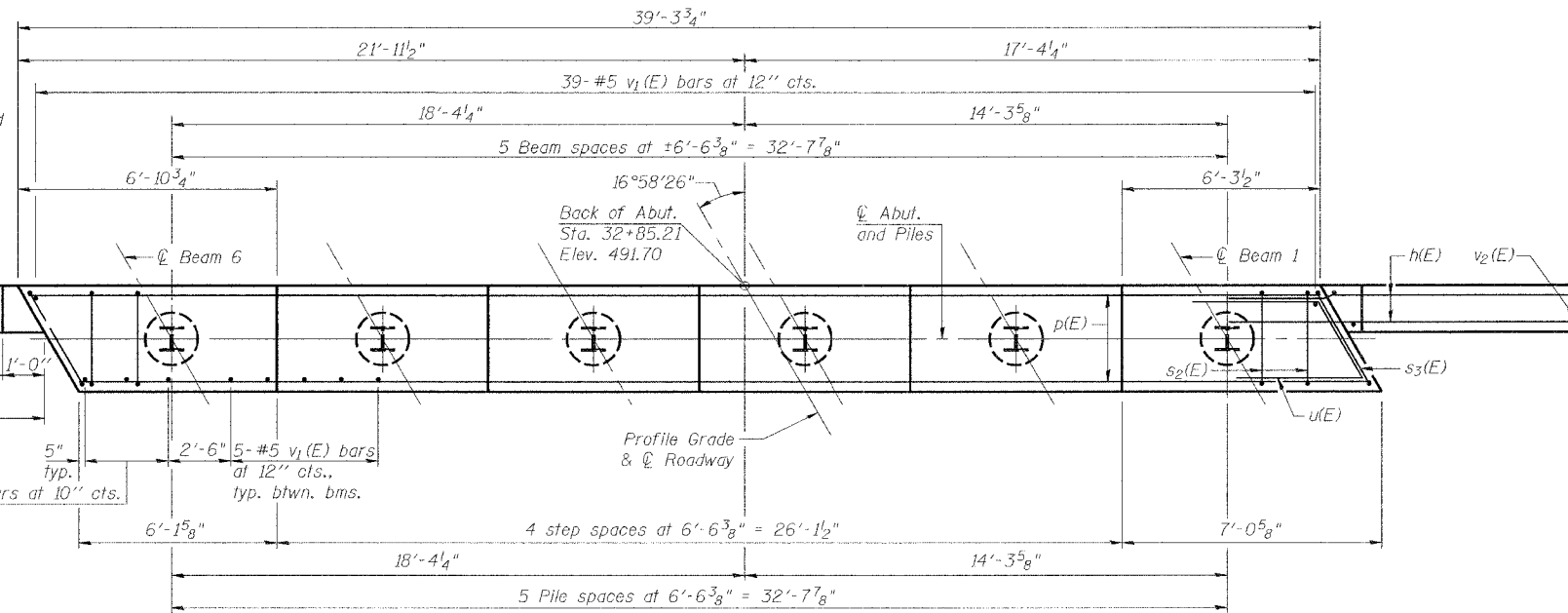
BAR u(E)



BARS u1(E)

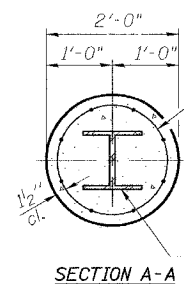
BILL OF MATERIAL

Bar	No.	Size	Length	Shape	
h(E)	56	#5	12'-0"	—	
h1(E)	3	#5	6'-2"	—	
p(E)	9	#7	38'-11"	—	
s2(E)	36	#4	11'-5"	□	
s3(E)	2	#4	11'-7"	□	
u(E)	8	#6	9'-4"	—	
u1(E)	7	#4	5'-6"	—	
v1(E)	70	#5	4'-4"	—	
v2(E)	22	#5	15'-0"	—	
Concrete Structures				Cu. Yd.	19.3
Reinforcement Bars, Epoxy Coated				Pound	2160
Structure Excavation				Cu. Yd.	98.9
Furnishing Steel Piles, HP12x63				Foot	105
Test Piles, Steel HP12x63				Each	1
Driving Piles				Foot	105
Concrete Encasement				Cu. Yd.	2.0

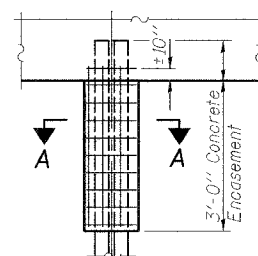


PLAN

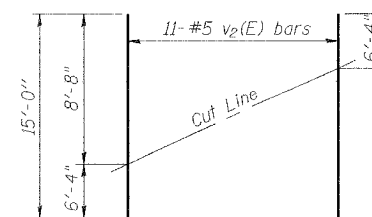
3/4" ϕ Granular or solid flux filled headed studs automatically end welded to flange. See Article 505.08 of the Standard Specifications. Cost of studs included in cost of Furnishing Steel Piles HP 12x63 (48 total each abutment)



PILE ENCASUREMENT DETAIL



PILE ANCHORAGE DETAIL



FIELD CUTTING DIAGRAM

Order v2(E) full length. Cut as shown and use remainder of bars in opposite face.

THOUVENOT, WADE & MOERCHEN, INC.



DESIGNED	BWP
CHECKED	ALN
DRAWN	KBF
CHECKED	ALN/BWP

WEST ABUTMENT
MORGAN AVE. OVER I-57
FAI ROUTE 57 - SECTION (X1-6-2)HBK
WILLIAMSON COUNTY
STATION 34+69.21
STRUCTURE NO. 100-0092