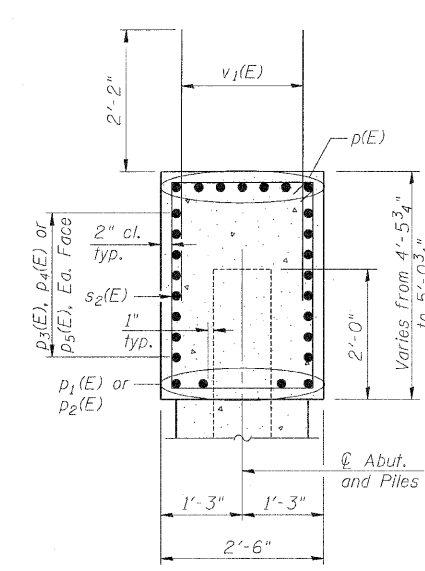
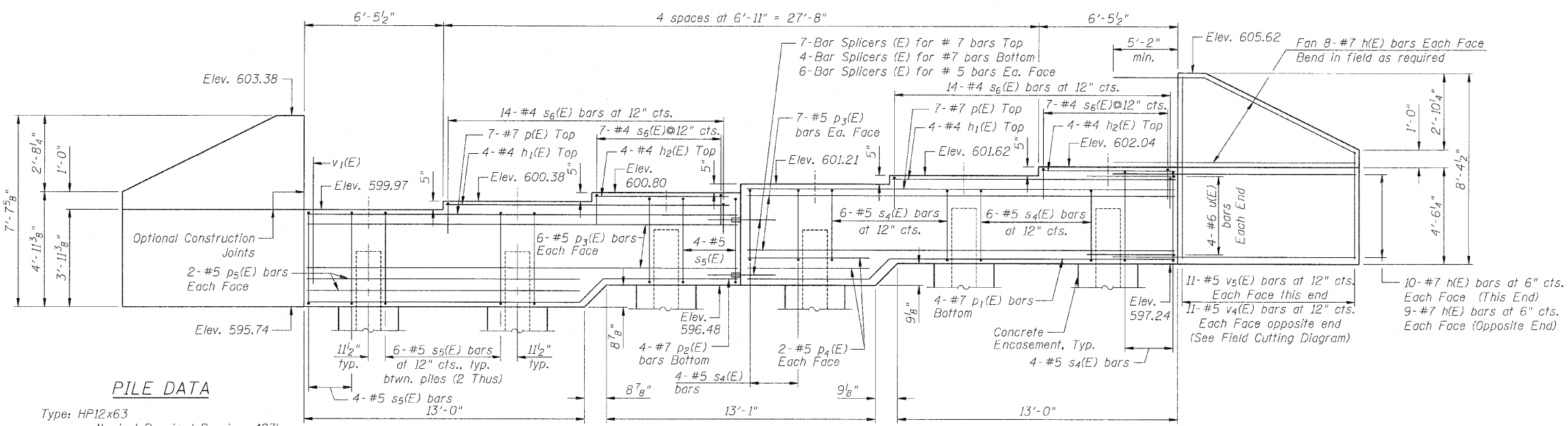


STATE OF ILLINOIS  
DEPARTMENT OF TRANSPORTATION

Notes:  
Pour steps monolithically with cap.



SEC. THRU ABUT.

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h(E)	70	#7	15'-5"	—
h1(E)	8	#4	13'-1"	—
h2(E)	8	#4	6'-1"	—
p(E)	14	#7	20'-0"	—
p1(E)	4	#7	20'-4"	—
p2(E)	4	#7	20'-4"	—
p3(E)	26	#5	20'-0"	—
p4(E)	4	#5	6'-9"	—
p5(E)	4	#5	13'-2"	—
s4(E)	20	#5	12'-5"	□
s5(E)	20	#5	11'-5"	□
s6(E)	42	#4	5'-8"	□
v1(E)	85	#5	4'-4"	—
v4(E)	11	#5	11'-11"	—
v5(E)	11	#5	13'-2"	—
u(E)	8	#6	8'-7"	□
Structure Excavation		Cu. Yd.	107	
Concrete Structures		Cu. Yd.	21.8	
Reinforcement Bars, Epoxy Coated		Pound	5,270	
Furnishing Steel Piles, HP12x63		Foot	105	
Driving Piles		Foot	105	
Test Pile, HP12x63		Each	1	
Concrete Encasement		Cu. Yd.	2.0	

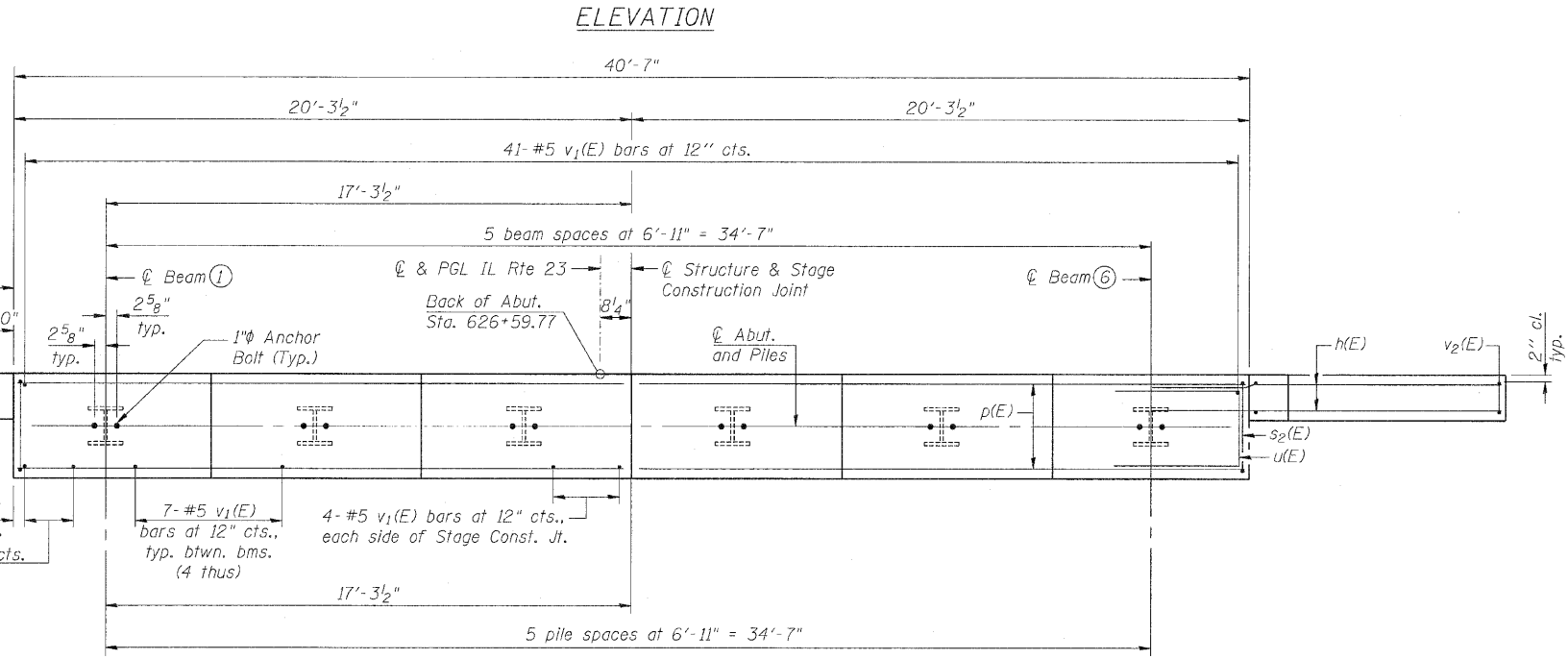
For details of Bar Splicers, see sheet 21 of 26.  
For details of piles and Concrete Encasement, see sheet 22 of 26.  
Space reinforcement in cap to miss anchor bolts.

SOUTH ABUTMENT  
STRUCTURE NO. 053-0189

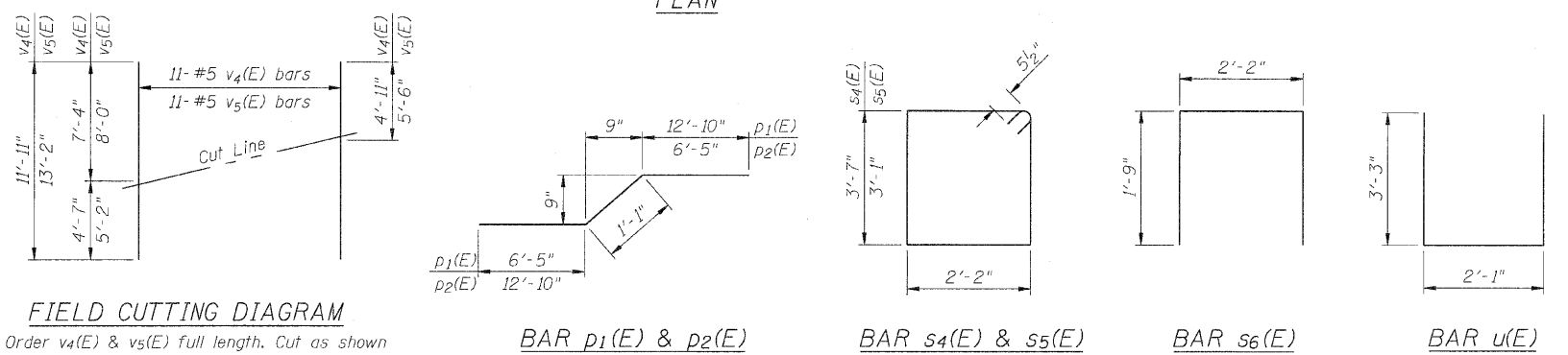
SHEET NO. 18 OF 26 SHEETS	F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
	68	(102)BR-1	LIVINGSTON	58	29
	SN 053-0189		CONTRACT NO. 66822		
FED. ROAD DIST. NO. _		ILLINOIS FED. AID PROJECT			

PILE DATA

Type: HP12x63  
Nominal Required Bearing: 497k  
Factored Resistance Available: 248k  
Est. Length: 21'  
No. Production Piles: 5  
No. Test Piles: 1



PLAN



FIELD CUTTING DIAGRAM

Order v4(E) & v5(E) full length. Cut as shown and use remainder of bars in opposite face.

ZROKA engineering  
Zroka Engineering, P.C.  
4216 North Hermitage  
Chicago, IL 60613

DESIGNED	LAS
CHECKED	JLA
DRAWN	SAW
CHECKED	LAS

AI-0 11-1-09

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