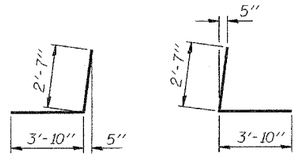
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

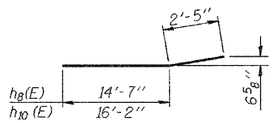
ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FAP 327	(51-23) B-3	LAWRENCE	56	36
FED. ROAD DIST. NO. 7	ILLINOIS	FED. AID PROJECT-		

SHEET NO. 19
29 SHEETS

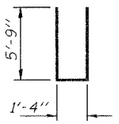
Contract No. 94967



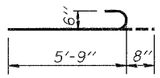
BAR $h_2(E)$ BAR $h_3(E)$



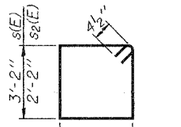
BARS $h_8(E)$ & $h_{10}(E)$



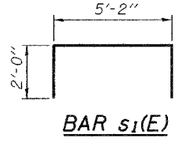
BAR $n(E)$



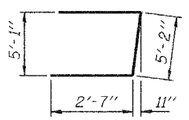
BAR $n_1(E)$



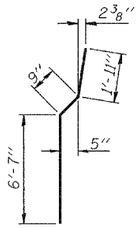
BARS $s(E)$ & $s_2(E)$



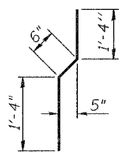
BAR $s_1(E)$



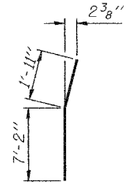
BAR $u(E)$



BAR $v_6(E)$



BAR $v_1(E)$



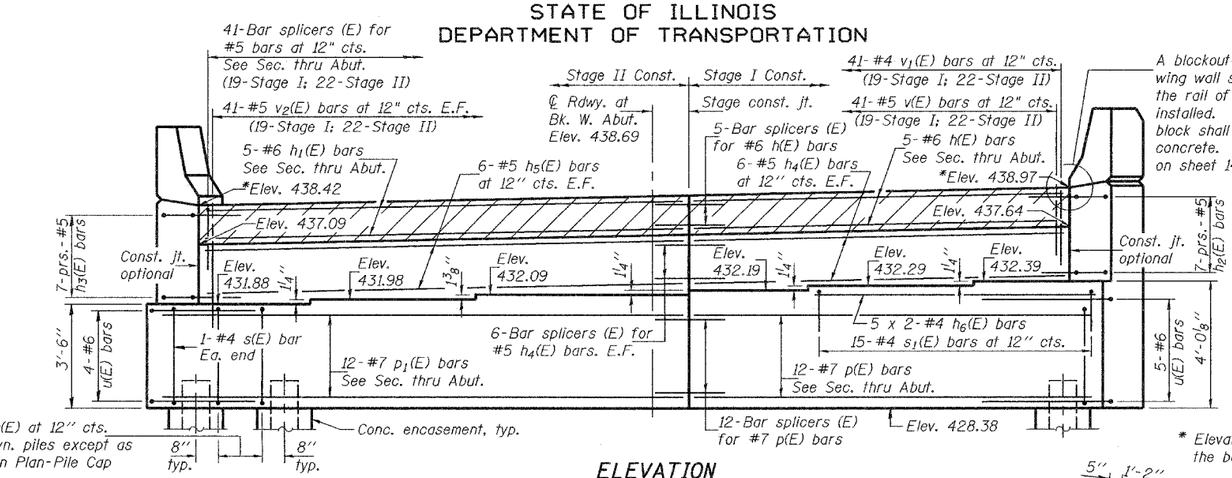
BAR $v_5(E)$

PILE DATA

Type: Steel HP12x63 w/pile shoes
Nominal Required Bearing: 460 Kips
Factored Resistance Available: 230 Kips
Est. Length: 15'
No. Production Piles: 12
No. Test Piles: 1

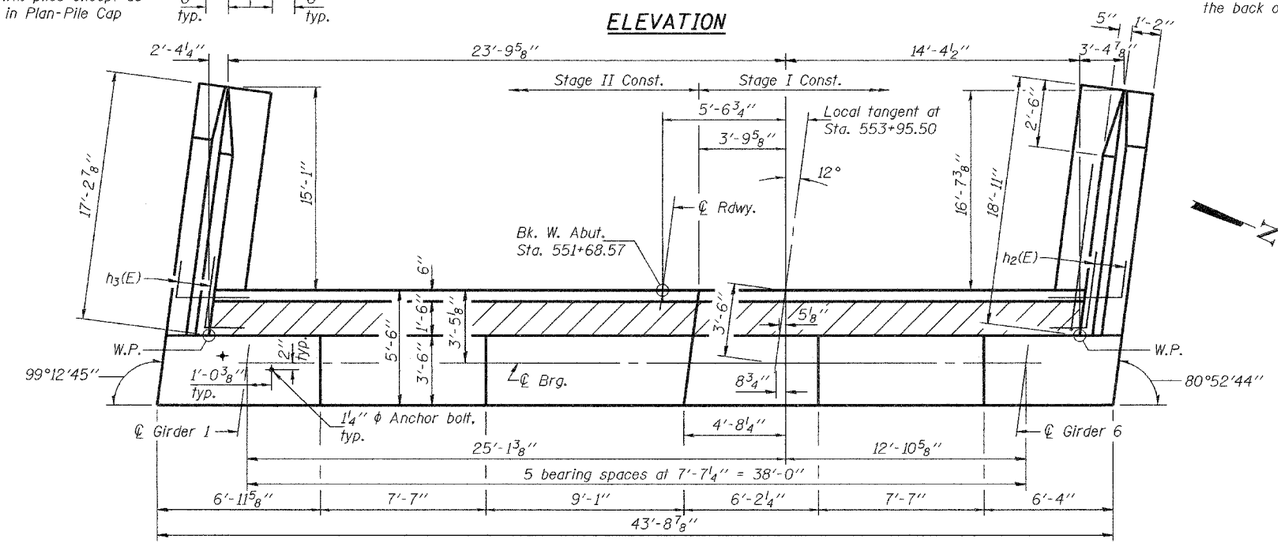
DESIGNED	Chad E. Hodel
CHECKED	Mark D. Shaffer
DRAWN	h.t. duong
CHECKED	CEH/MDS

Oct. 2, 2007
EXAMINED Thomas J. Domagalski
ENGINEER OF BRIDGE DESIGN
PASSED Ralph E. Anderson
ENGINEER OF BRIDGES AND STRUCTURES

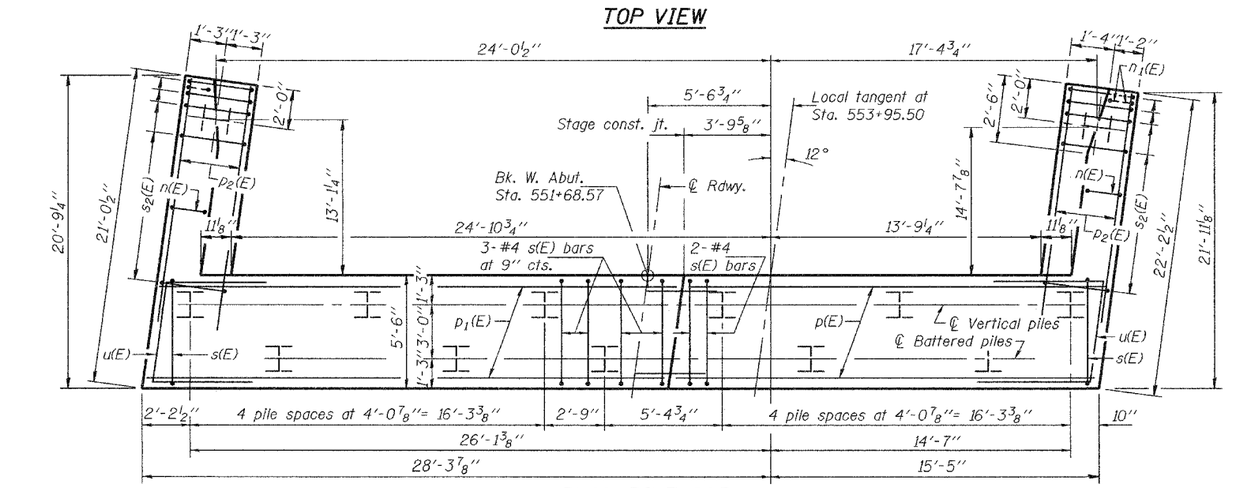


ELEVATION

* Elevations are given at the back of abutment.



TOP VIEW



PLAN-PILE CAP

A blockout may be provided in the wing wall stem as required to facilitate the rail of the expansion joint to be installed. The blockout and hatched block shall be simultaneously cast with concrete. See expansion joint details on sheet 14 of 29. Typ. ea. wing wall.

MIN. BAR LAPS

#4 bar = 1'-8"
#5 bar = 2'-2"
#6 bar = 2'-7"

ABUTMENT BILL OF MATERIAL

Bar	No.	Size	Length	Shape
h(E)	5	#6	18'-2"	
$h_1(E)$	5	#6	21'-8"	
$h_2(E)$	14	#5	6'-5"	
$h_3(E)$	14	#5	6'-5"	
$h_4(E)$	12	#5	18'-2"	
$h_5(E)$	12	#5	21'-8"	
$h_6(E)$	10	#4	8'-3"	
$h_7(E)$	13	#4	17'-0"	
$h_8(E)$	9	#4	17'-0"	
$h_9(E)$	13	#4	18'-4"	
$h_{10}(E)$	9	#4	18'-7"	
n(E)	31	#6	12'-10"	
$n_1(E)$	12	#6	6'-5"	
p(E)	12	#7	19'-9"	
$p_1(E)$	12	#7	23'-3"	
$p_2(E)$	12	#7	19'-0"	
s(E)	42	#4	17'-5"	
$s_1(E)$	15	#4	9'-2"	
$s_2(E)$	39	#4	9'-5"	
u(E)	9	#6	10'-4"	
v(E)	41	#5	3'-4"	
$v_1(E)$	41	#4	3'-2"	
$v_2(E)$	82	#5	7'-7"	
$v_4(E)$	37	#6	9'-0"	
$v_5(E)$	6	#6	9'-1"	
$v_6(E)$	31	#6	9'-3"	
Structure Excavation		Cu. Yd.	95	
Concrete Structures		Cu. Yd.	72.9	
Reinforcement Bars, Epoxy Coated		Pound	6650	
Furnishing Steel Piles, HP12x63		Foot	180	
Driving Piles		Foot	180	
Test Pile Steel HP12x63		Each	1	
Pile Shoes		Each	13	
Concrete Encasement		Cu. Yd.	4.4	
Concrete Sealer		Sq. Ft.	607	
Bar Splicers		Each	70	

For details of bar splicers, see sheet 26 of 29.

For details of piles and concrete encasement, see sheet 25 of 29.

Concrete sealer shall be applied to the bearing seats and front faces of the hatched block, back wall, and abutment cap.

Bars indicates thus 1 x 6-#5 etc. indicates 1 line of bars with 6 lengths per line.

WEST ABUTMENT
F.A.P. RT. 327 - SEC. (51-23)B-3
LAWRENCE COUNTY
STATION 553+95.50
STRUCTURE NO. 051-0063