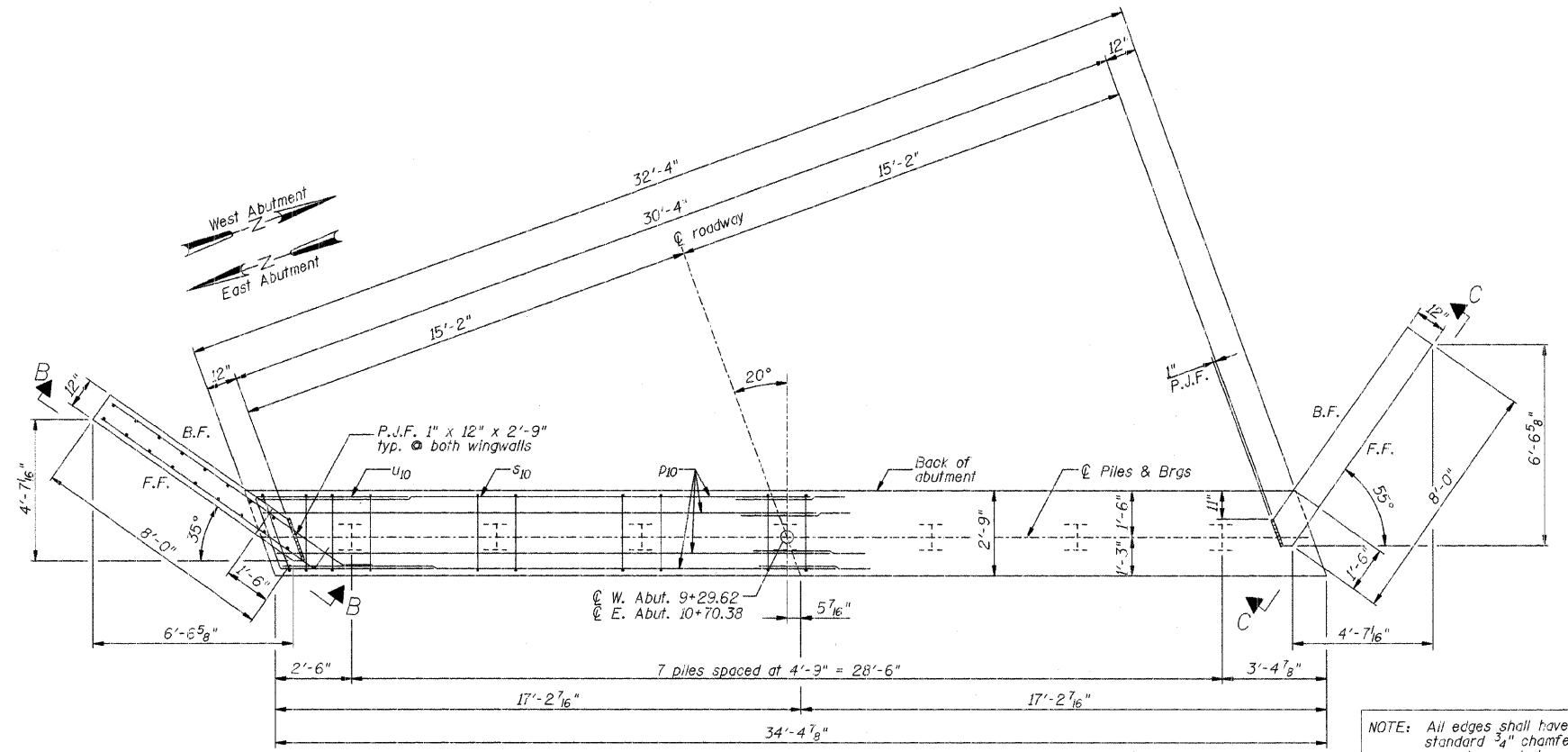
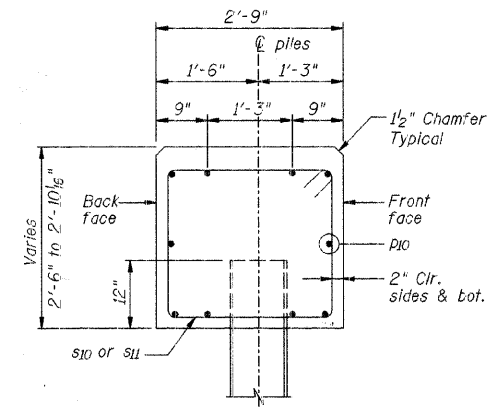


ROUTE NO.	SECTION	COUNTY	SHEET	TOTAL
FAS 496	*	Vermilion	18	8
FED. ROAD DIST. NO. 7		ILLINOIS PROJECT		



NOTE: All edges shall have standard 3/4" chamfer, except as noted.

PLAN
(Symmetrical about C of Abutment)



SECTION A
(Perpendicular to C of Abutment)

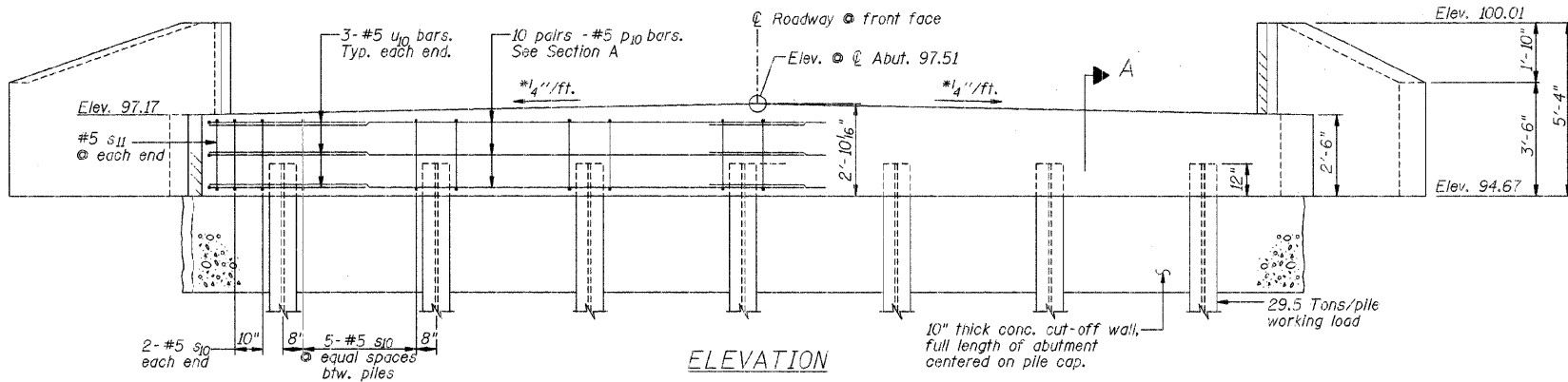
PILE DATA

Location: Abutments
 Pile Type and Size: Steel HP 10x42
 Nominal Required Bearing: 175 kips
 Factored Resistance Available: 87.5 kips
 Estimated Pile Length: 50 ft.
 No. of Production Piles: 6 @ East Abutment
 6 @ West Abutment
 No. of Test Piles: 1 @ East Abutment
 1 @ West Abutment

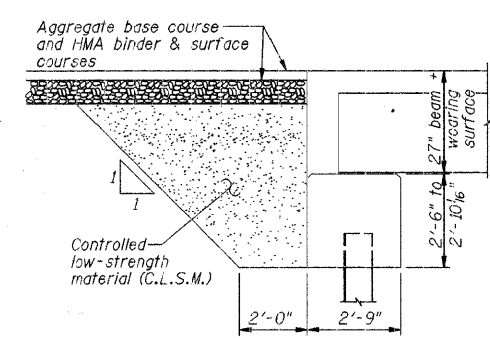
Note: The Steel H-piles shall be according to AASHTO M270 Grade 50.

BILL OF MATERIAL-2 ABUTS.

Bar	No.	Size	Length	Shape
h10	6	# 5	9'-6"	
h11	6	# 5	10'-3"	
h12	4	# 5	7'-8"	
h13	2	# 5	6'-9"	
h14	4	# 5	4'-9"	
h15	2	# 5	3'-10"	
h16	4	# 5	7'-11"	
h17	2	# 5	7'-0"	
h18	6	# 5	9'-9"	
h19	6	# 5	10'-2"	
h20	2	# 5	7'-3"	
h21	2	# 5	4'-4"	
h22	2	# 5	7'-6"	
P10	40	# 5	18'-8"	—
S10	68	# 5	10'-1"	□
S11	4	# 5	10'-4"	□
U10	12	# 5	12'-5"	□
V1	14	# 4	5'-1"	—
V2	8	# 4	4'-11"	—
V3	8	# 4	4'-7"	—
V4	8	# 4	4'-4"	—
V5	8	# 4	4'-1"	—
V6	8	# 4	3'-10"	—
V7	8	# 4	3'-7"	—
V8	8	# 4	3'-4"	—
Concrete Structures	Cu. Yds.	23.8		
Reinforcement Bars	Lbs.	2310		
Test Pile, HP10x42	Each	2		
Furnishing Steel Piles HP10x42	Foot	600		
Driving Piles	Foot	600		
Pile Shoes	Each	14		
Name Plate	Each	1		
Concrete Cut-off Wall	Cu. Yds.	6.4		
Structure Excavation	Cu. Yds.	122		
Controlled Low-Strength Material	Cu. Yds.	52		



ELEVATION
Front Projection
(Symmetrical about C of Roadway)
* Normal to Roadway



DETAIL
BEHIND ABUTMENT

DSGN	K.J. Hoffmann				
DR	K.J. Hoffmann				
CHK	J.R. Wolf				
APVD	J.A. Fraenhoffer	NO.	DATE	REVISION	BY

FRAUENHOFFER
 Fraenhoffer and Associates, P.C. Consulting Engineers
 3002 Crossing Court Champaign, Il. 61822 217-351-6268

ABUTMENTS (SHEET 1 OF 2)		SHEET 8
FAS 496 (C.H. 14) OVER MIDDLE BRANCH OF N. FORK		DWG NO. 97051-at1.dgn
SEC. 97-00141-00-BR		DATE APR 2009
VERMILION COUNTY		PROJ NO. 97051