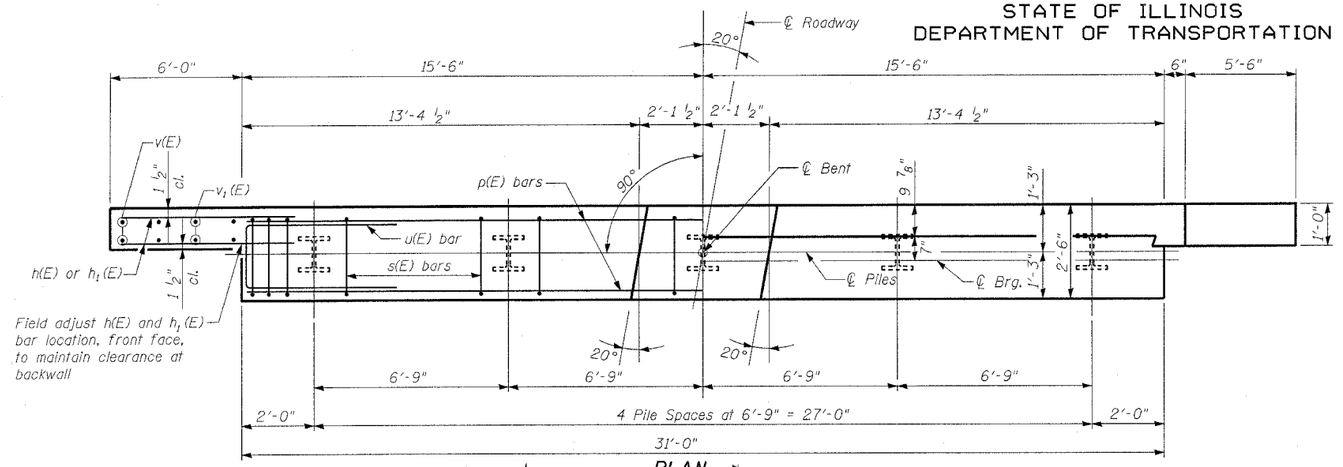
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FAP 774	107B-2	EFFINGHAM	27	24
FED. ROAD DIST. NO. 7	ILLINOIS	FED. AID PROJECT-		

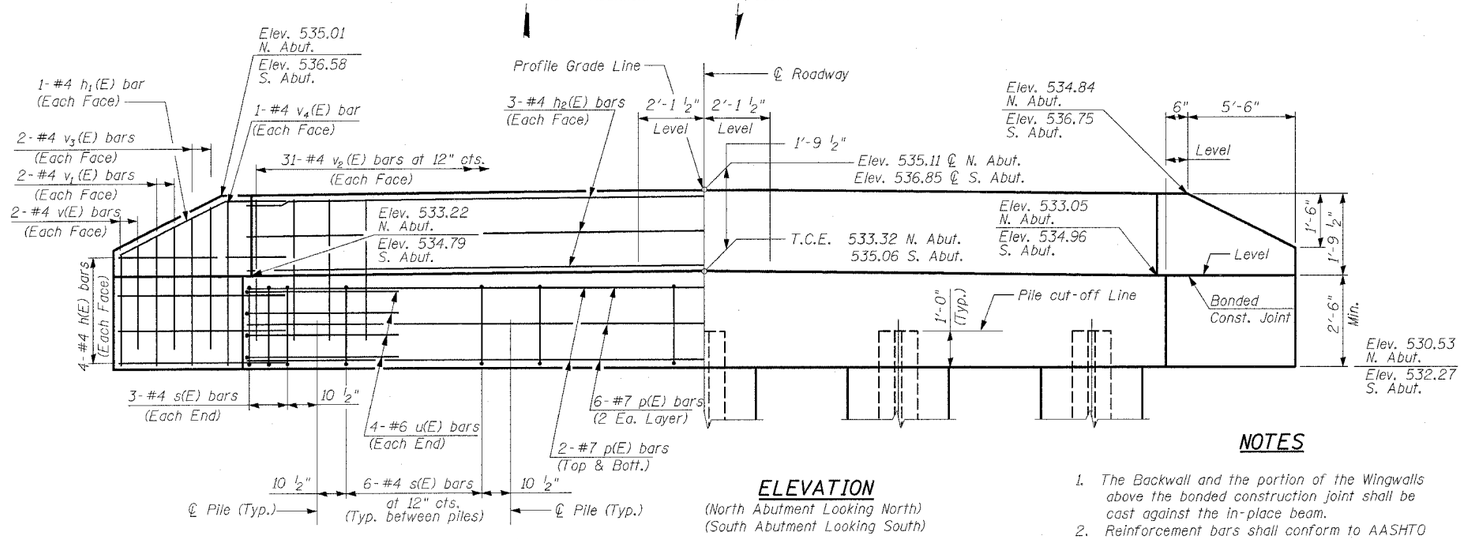
SHEET NO. 5
8 SHEETS

CONTRACT NO. 74131

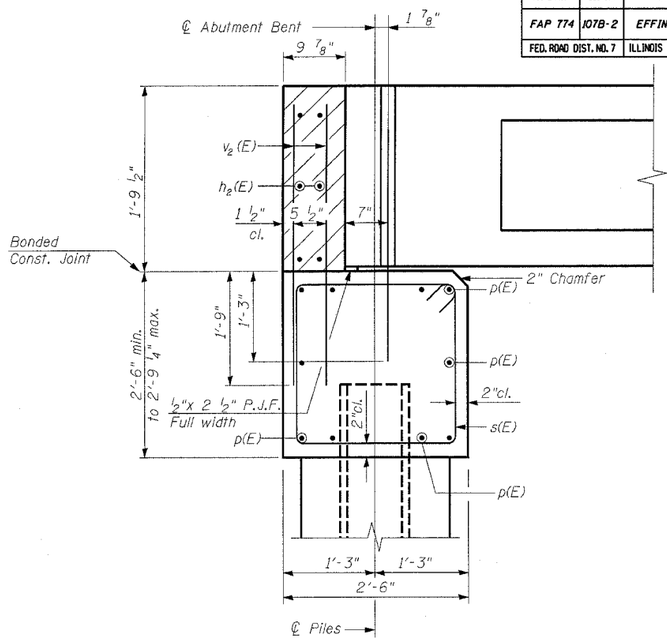


PLAN

N North Abutment N South Abutment



ELEVATION
(North Abutment Looking North)
(South Abutment Looking South)
T.C.E. = Top of Cap Elevation



SECTION THRU ABUTMENT
(At Right Angles)

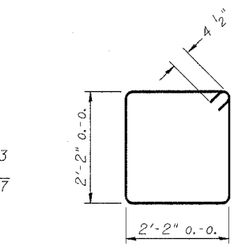
NOTES

1. The Backwall and the portion of the Wingwalls above the bonded construction joint shall be cast against the in-place beam.
2. Reinforcement bars shall conform to AASHTO M 31 or M322 Grade 60.
3. Reinforcement bars designated (E) shall be epoxy coated.
4. Hatched area to be poured after beam is placed.

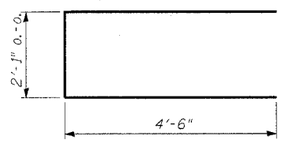
BILL OF MATERIAL
FOR ONE ABUTMENT

Bar	No.	Size	Length	Shape
h(E)	16	#4	8'-0"	
h_1(E)	4	#4	7'-7"	
h_2(E)	6	#4	30'-8"	
p(E)	10	#7	30'-8"	
s(E)	30	#4	9'-5"	
u(E)	8	#6	11'-1"	
v(E)	8	#4	2'-7"	
v_1(E)	8	#4	3'-0"	
v_2(E)	62	#4	3'-5"	
v_3(E)	8	#4	3'-6"	
v_4(E)	4	#4	4'-0"	
Concrete Structures			Cu. Yd.	11.0
Reinforcement Bars, Epoxy Coated			Pound	1381
Furnishing Steel Piles HP12x53			Foot	153
Driving Steel Piles			Foot	153
*Test Pile Steel HP12x53			Each	1
Concrete Encasement			Cu. Yd.	1.75
Structure Excavation			Cu. Yd.	35.5
Porous Granular Embankment			Cu. Yd.	26.5

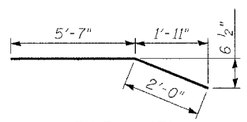
*At North Abutment only



BAR s(E)



BAR u(E)



BAR h_1(E)

PILE DATA (2-ABUTMENTS)

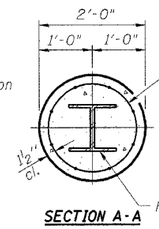
Type	HP12x53
Capacity	Driven to Refusal*
Estimated Length	34 Feet
Number Required	9
Test Pile	1 In North Abutment

*Allows for 7 Tons of negative skin friction

DESIGN STRESSES

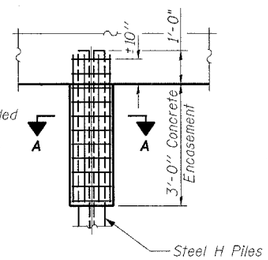
f'_c = 3,500 psi
f_y = 60,000 psi

DESIGNED	TMM
CHECKED	KCM
DRAWN	CAR
CHECKED	TMM



SECTION A-A

Welded wire fabric 6 x 6-W4.0 x W4.0 weighing 58#/100 sq. ft. The cost of Excavation, Concrete Encasement and Reinforcement is included with Concrete Encasement. Forms for Encasement may be omitted when soil conditions permit.



PILE ENCASEMENT DETAIL AT ABUTMENT

PILE BENT ABUTMENT
1200th STREET OVER GREEN CREEK
FAP RTE. 774, SECTION 107B-2
EFFINGHAM COUNTY
STATION 204+33.91
S.N. 025-3309