

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

09.25

Existing Structure: Single Span R.C.C. Superstructure (44'-9 3/4" BK to BK Abut.) on R.C. Closed Abut. 16'-0" roadway. Built as SBI RT 164, Sec. 119B in 1928 at Sta. 773+17.5 Superstructure to be removed and replaced in part at a time by Contractor utilizing stage construction as shown. BM: Chiseled "I" on Southwest wingwall Elev. 100.00

STATE OF ILLINOIS
DIVISION OF HIGHWAYS

PROJECT NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
119	*	Tazewell	28	13
SHEET NO. 1				

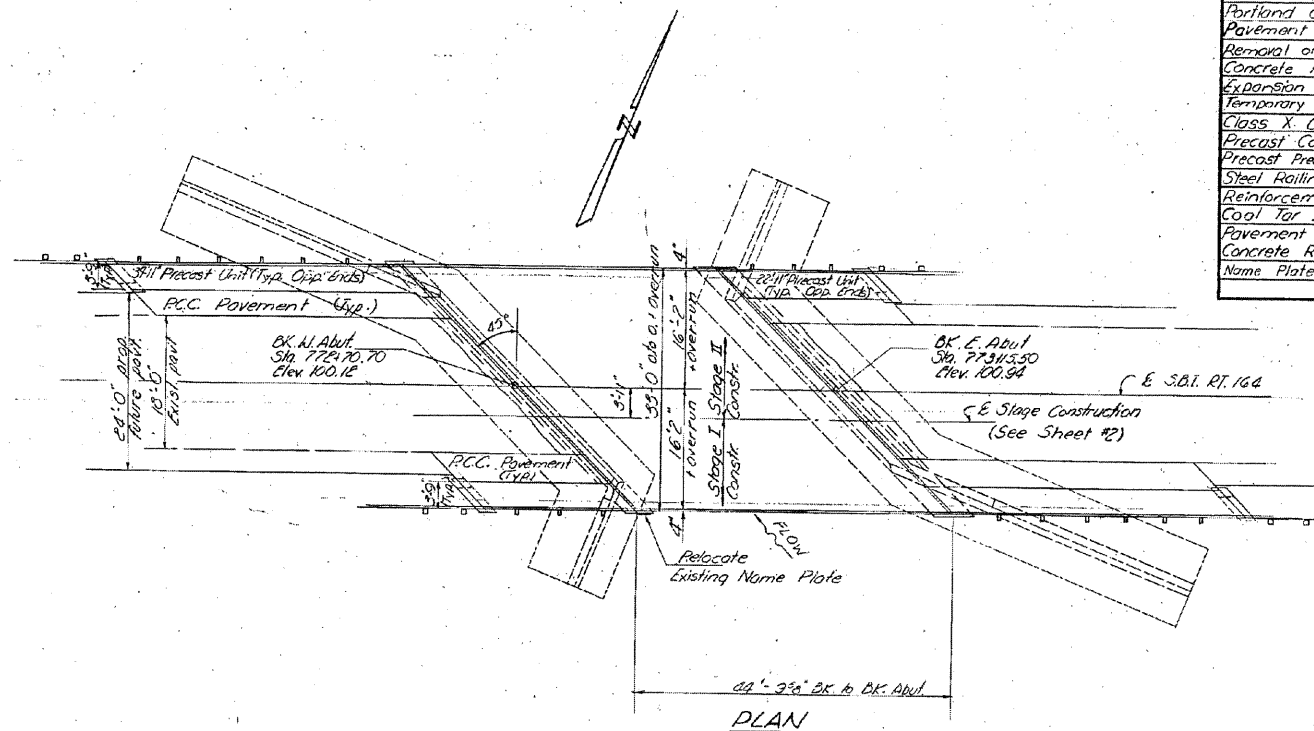
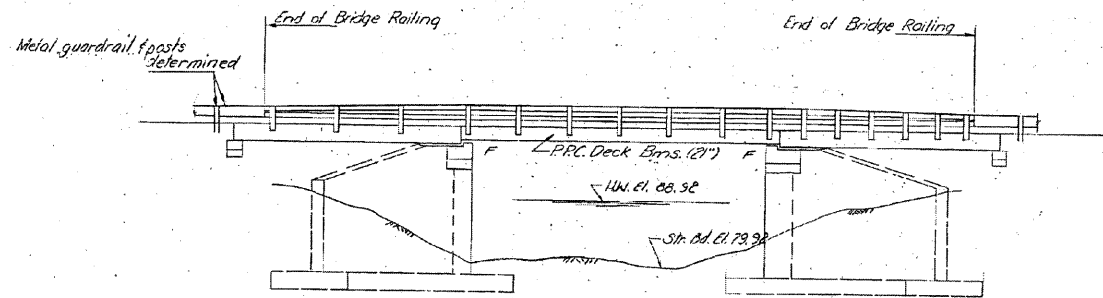
* 119 (BR, BR-2, BR-3)

GENERAL NOTES

All reinforcement bars shall be lapped 24 diameters unless otherwise shown.
It shall be the responsibility of the Contractor to verify all dimensions and conditions existing in the field prior to construction and ordering of materials.
An alternate strand pattern using Extra High Strength Prestressing Strand (270 ksi.) is permitted.
Expansion bolts shall consist of self drilling expansion anchors and 3/8 x 12" hooked bolts.
Limits of Cool Tar Interlayer Protective Coat shall be one foot beyond end of deck beams and out to out of deck.
Shoulder transition to wingwall shall be shaped with broken concrete. Cost incidental.

TOTAL BILL OF MATERIAL

Item	Unit	Super	Sub	Total
Bituminous Concrete Surface Course, Class I	Ton	30		30
Portland Cement Concrete Pavement (10")	Sq. Yd.	53		53
Pavement Fabric	Sq. Yd.	53		53
Removal of Existing Superstructure	Each	1		1
Concrete Removal	Cu. Yd.		16	16
Expansion Bolts 3/8"	Each	82	192	274
Temporary Guardrail	Lin. Ft.	45		45
Class X Concrete	Cu. Yd.		44.9	44.9
Precast Concrete Bridge Slab	Sq. Ft.	473		473
Precast Prestressed Concrete Deck Beams (21" Depth)	Sq. Ft.	1471		1471
Steel Railing, Type W	Lin. Ft.	192		192
Reinforcement Bars	Pound		2090	2090
Cool Tar Interlayer Protective Coat	Sq. Yd.	164		164
Pavement Removal and Portland Cement Concrete Replacement, Type II (10")	Sq. Yd.	12		12
Name Plate	Each			1



STATION 772+93.10
REBUILT 197 BY
STATE OF ILLINOIS
S.B.I. RT. 164 SEC. 119BR-2
LOADING HS20
NAME PLATE
See Std. 2113-1

DESIGNED *Nuria L. Rankin, P.E.*
CHECKED *Ch. Tera Chen*
DRAWN *R. Doty*
CHECKED *C. T. C.*

EXAMINED *May 21 1971*
PASSED *W. C. Baumann*
APPROVED *Richard H. Holten*

PRECAST PRESTRESSED UNITS

$f_c = 5,000$ psi
 $f_{ci} = 4,000$ psi
 $f_s = 248,000$ psi (Strands)
 $f_{si} = 173,600$ psi (Strands)

PRECAST UNITS
 $f_c = 4,500$ psi
 $f_{ci} = 1,800$ psi
 $f_s = 20,000$ psi
 $n = 8$

FIELD UNITS

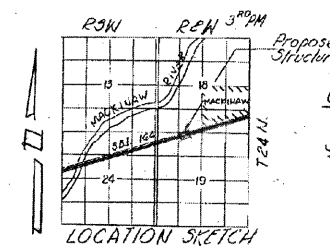
$f_c = 1,400$ psi Super
 $f_c = 1,000$ psi Sub
 $f_c = 75$ psi Footing
 $f_s = 20,000$ psi Reinf.
 $n = 10$

Loading HS 20-44

Design Specifications: AASHTO 1969, as applicable.

WATERWAY INFORMATION

Drainage Area 1408 Acres
Character
Required Opening (50 yr. flood) 315 Sq. Ft.
Present Opening 315 Sq. Ft.
Proposed Opening 315 Sq. Ft.
Ordinary Water Elev. 81.45
Low Water Elev. 81.45
 $Q = 14060$ cfs



GENERAL PLAN AND ELEVATION
ILL. RT. 9 OVER STREAM
SBI. RT. 164 SECTION 119 BR-2
TAZEWELL COUNTY
STATION 772+93.10

DESIGNED *RRD*
CHECKED *AJS*
DRAWN *KAS*
CHECKED *AJS*

SHEET NO. 22	F.A.P. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
22 SHEETS	693	(119BR-2) BR	TAZEWELL	65	39
EXISTING STRUCTURE PLAN			CONTRACT NO. 68660		
FED. ROAD DIST. NO.		ILLINOIS	FED. AID PROJECT		