BENCHMARK: Sawed Square on top of Northeast Wingwall,
SN 083-0037, Station 1541+78.70, 18.5' left, Elevation 366.17

EXISTING STRUCTURE: SN 083-0037 was originally built in 1932 as S.B.I. Route 143, Section 105B, Sta. 1542+00. The superstructure was replaced in 1972, and precast concrete bridge slabs were utilized to widen the approaches. The superstructure consists of one span, 21" PPC deck beams. The substructure consists of two reinforced concrete closed abutments on timber piles. The back-to-back abutments length is 53'-5¼", the out-to-out width is 33'-0". The existing superstructure and the existing bridge approach shoulders shall be removed and replaced utilizing stage construction.

No salvage.

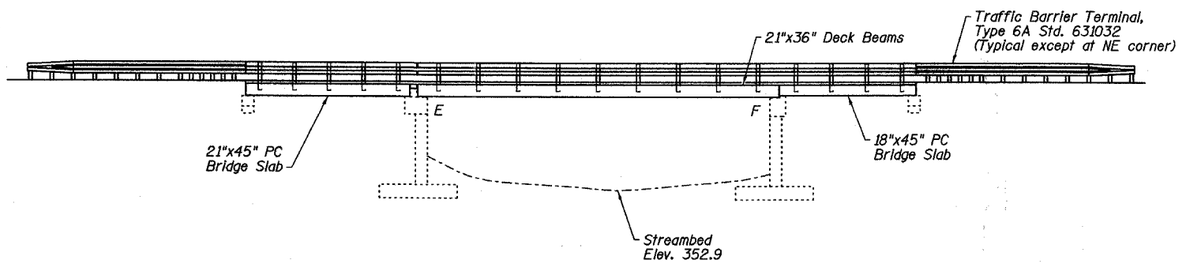
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FAP 869	105BR-1	SALINE	118	23
FED. ROAD DIST. NO. 9	ILLINOIS	FED. AID PROJECT- AID		

SHEET NO. 1
18 SHEETS

78031

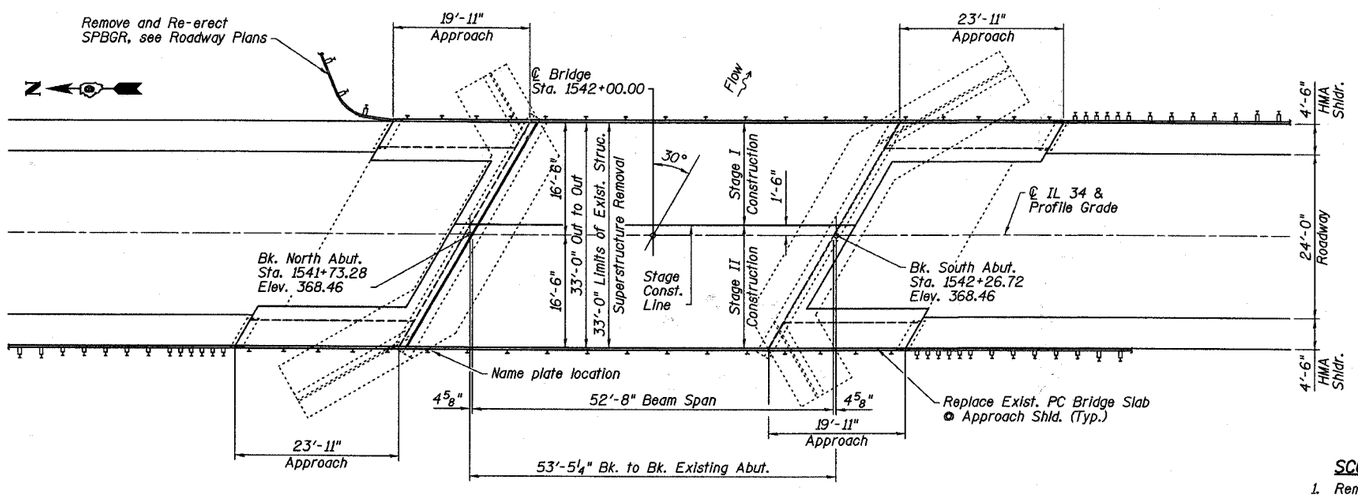
STRUCTURE INDEX OF SHEETS



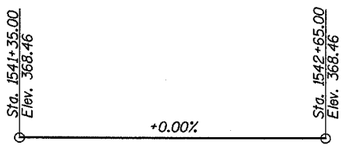
ELEVATION

STATION 1542+00.00
REBUILT 20__ BY
STATE OF ILLINOIS
F.A.P. RT. 869 SEC. 105BR-1
LOADING HS20
STR. NO. 083-0037

NAME PLATE
See Std. 515001



PLAN



PROFILE GRADE
(Along ℄ Roadway)

APPROVED
FOR STRUCTURAL ADEQUACY ONLY
Ralph E Anderson
ENGINEER OF BRIDGES AND STRUCTURES

SCOPE OF WORK

1. Remove existing surfacing, steel railing, deck beams, and approach shoulder bridge slabs.
2. Repair beam bearing seats and perform other repairs at abutments as required.
3. Reconstruct a one-span PPCD beam superstructure with Concrete Wearing Surface and Steel Railing, Type SM. Reconstruct existing approach shoulders with Precast Concrete Bridge Slabs with Concrete Wearing Surface and Steel Railing, Type SM.

DESIGN SPECIFICATION
2002 AASHTO

LOADING HS20-44
No allowance for future wearing surface

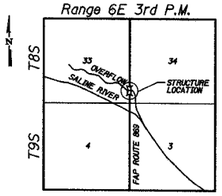
DESIGN STRESSES

FIELD UNITS
f'c = 5,000 psi (Concrete Wearing Surface)
f'c = 3,500 psi (All concrete except CWS)
fy = 60,000 psi (reinf.)

PRECAST PRESTRESSED UNITS
f'c = 6,000 psi
f'ci = 5,000 psi
f's = 270,000 psi (½"ø low lax strands)
fsi = 201,960 psi (½"ø low lax strands)

PRECAST UNITS
f'c = 4,500 psi
fy = 60,000 psi (reinf.)

STATE OF ILLINOIS
RICHARD D. PAYNE
No. 4647
REGISTERED STRUCTURAL ENGINEER
EXPIRES 11-30-08
SIGNATURE
04/04/08
DATE



LOCATION SKETCH

GENERAL PLAN
IL 34 OVER
MIDDLE FORK SALINE RIVER OVERFLOW
FAP ROUTE 869 - SECTION 105BR-1
SALINE COUNTY
STATION 1542+00.00
STRUCTURE NO. 083-0037

ESCA CONSULTANTS, INC.

DESIGNED BY:	JMS	02/08
DRAWN BY:	HAS	02/08
CHECKED BY:	ELH	04/08
APPROVED BY:	RDP	04/08