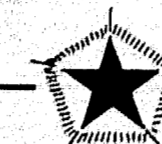


STATE OF MAINE
STATE HIGHWAY COMMISSION



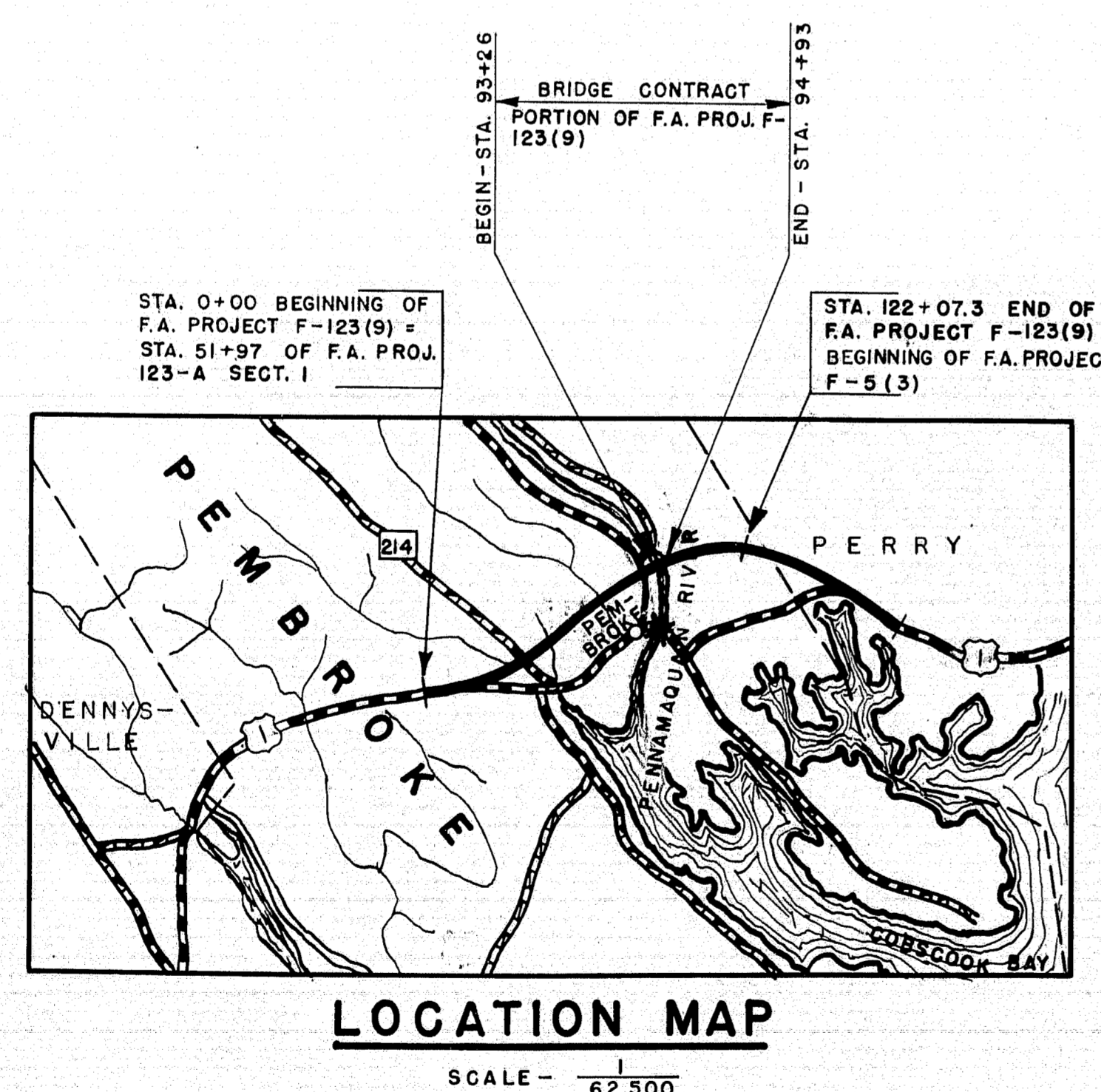
PENNAQUAN BRIDGE
OVER
PENNAQUAN RIVER
IN THE TOWN OF
PEMBROKE
WASHINGTON COUNTY
FEDERAL AID PROJECT NO. F-123(9)

LENGTH OF PENNAQUAN
BRIDGE CONTRACT .031 MILE

D. R. A. DIV. NO.	STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
1	MAINE	F-123(9)	1	7

INDEX OF SHEETS

SHEET NO. 1	TITLE SHEET
SHEET NO. 2	SURVEY PLAN
SHEET NO. 3	ABUTMENTS - DETAIL
SHEET NO. 4	PIERS 1 & 2
SHEET NO. 5	SUPERSTRUCTURE
SHEET NO. 6	REINF. STEEL & RAIL DETAIL
SHEET NO. 7	STRUCTURAL STEEL



CONCRETE CLASSIFICATIONS

Pier Columns & Caps, Roadway & Sidewalk Slabs.....Class A
Wearing Surface & Rail Posts.....Class A-A
Piers below Elev. 35.0 38.0.....Class B
Abutments.....Class X

LOADING H 20 - 44

APPROVED:
MAINE STATE HIGHWAY COMMISSION

Lloyd B. Martin CHAIRMAN
E. J. [Signature]
Harley D. Welch
Richard [Signature] CHIEF ENGINEER

DEPARTMENT OF COMMERCE
BUREAU OF PUBLIC ROADS

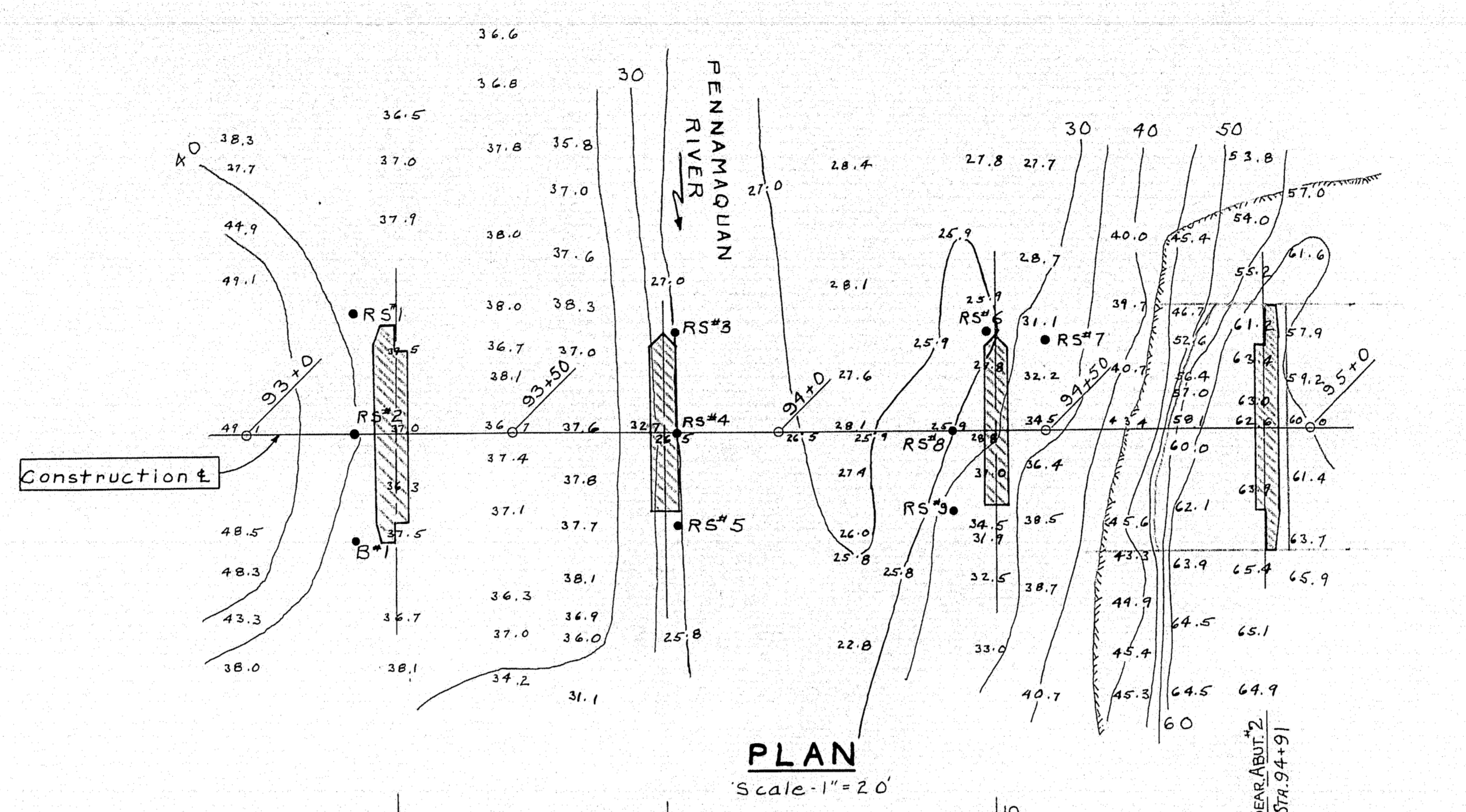
RECOMMENDED FOR APPROVAL:

DISTRICT ENGINEER DATE

APPROVED:

DIVISION ENGINEER DATE

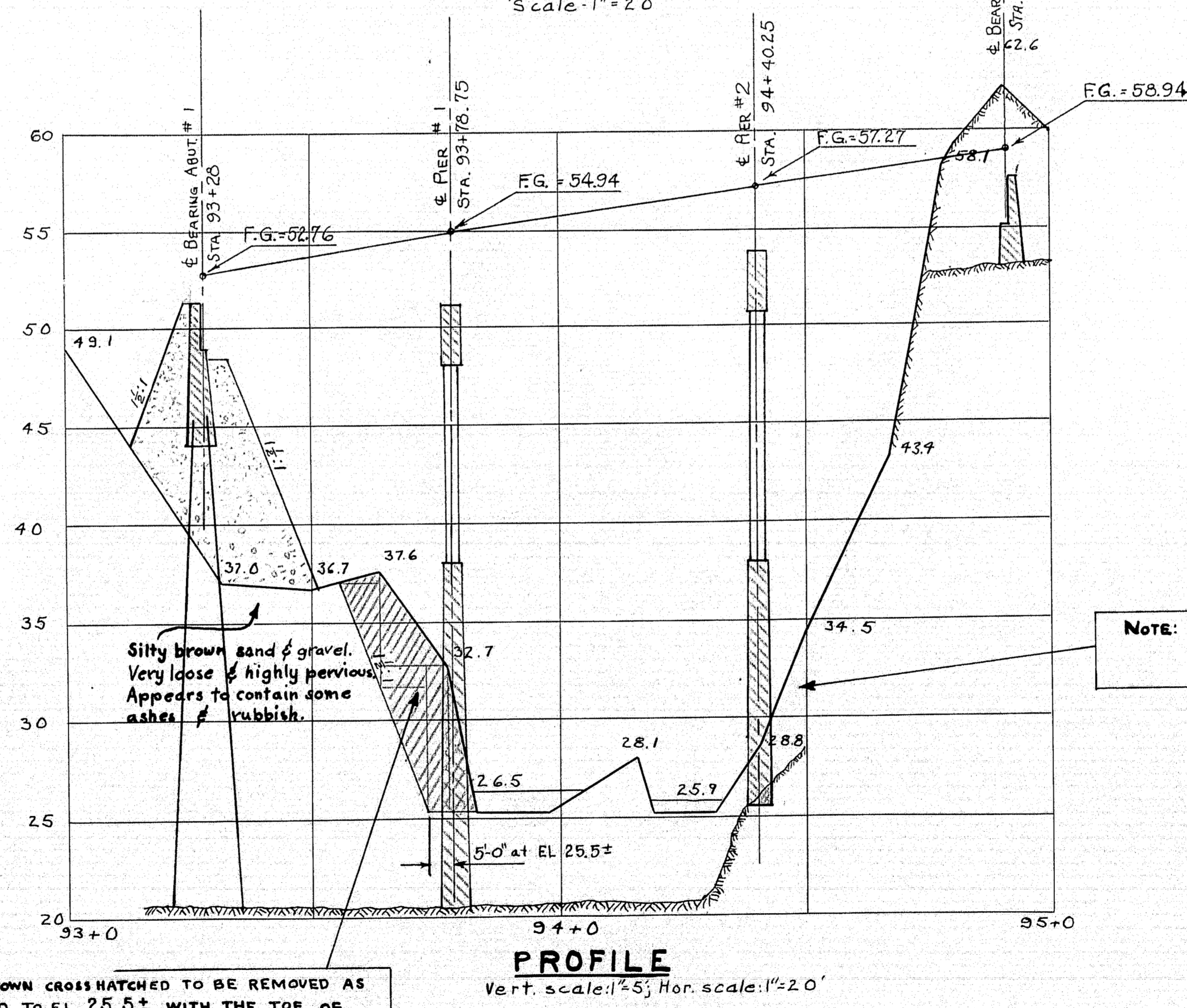
60-132



ROD SOUNDINGS	REFUSAL ELEVATIONS
RS 1	20.8 ±
RS 2	20.8 ±
RS 3	20.6 ±
RS 4	20.4 ±
RS 5	20.5 ±
RS 6	21.7 ±
RS 7	23.6 ±
RS 8	20.5 ±
RS 9	20.5 ±

Boring No. 1 Ledge at El. 20.4 ±
Penetration to El. 12.9 ± through
siltstone or shale.

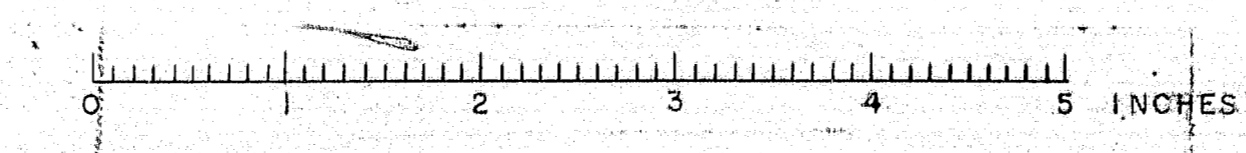
NOTES
Stream-fairly swift current. High
water El. 28.5 ±
Existing structure about 1/2 mile downstream

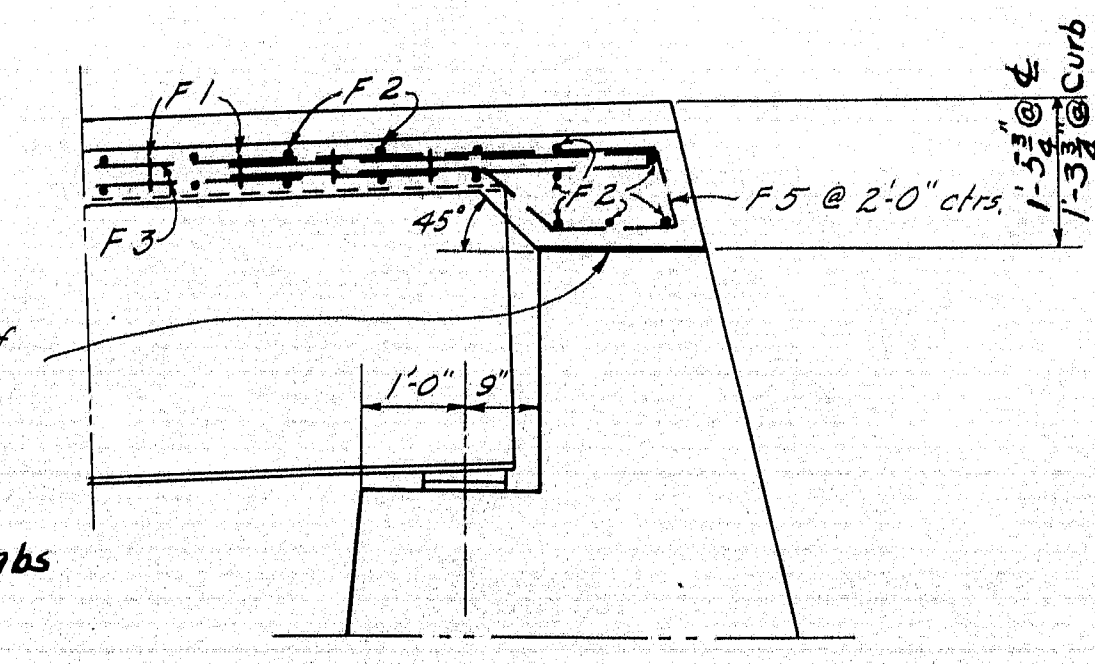
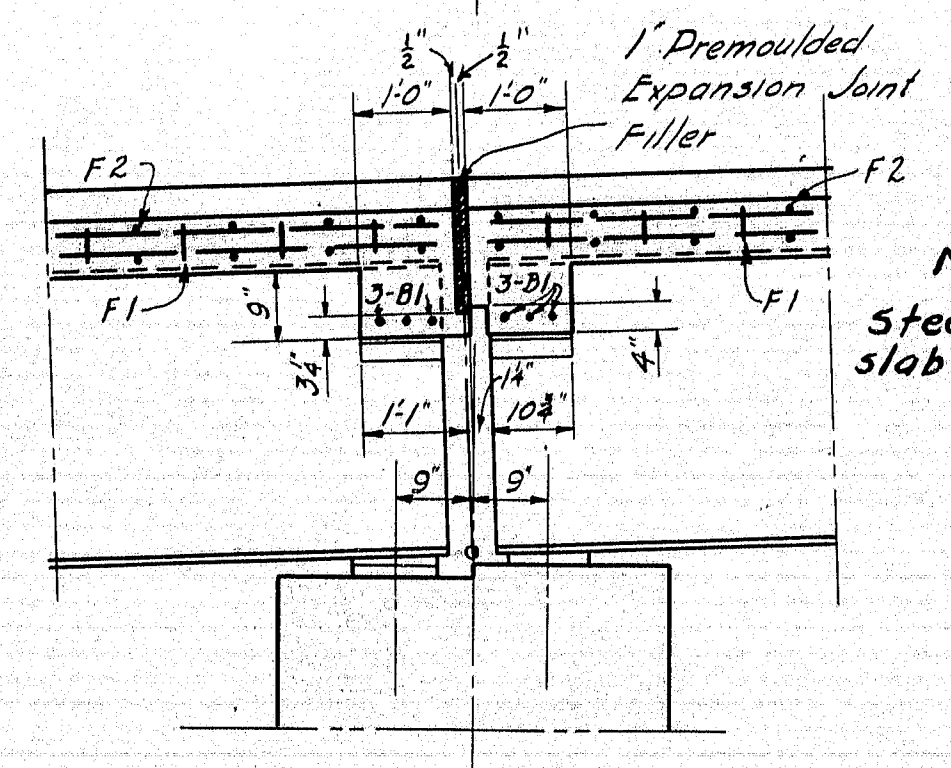
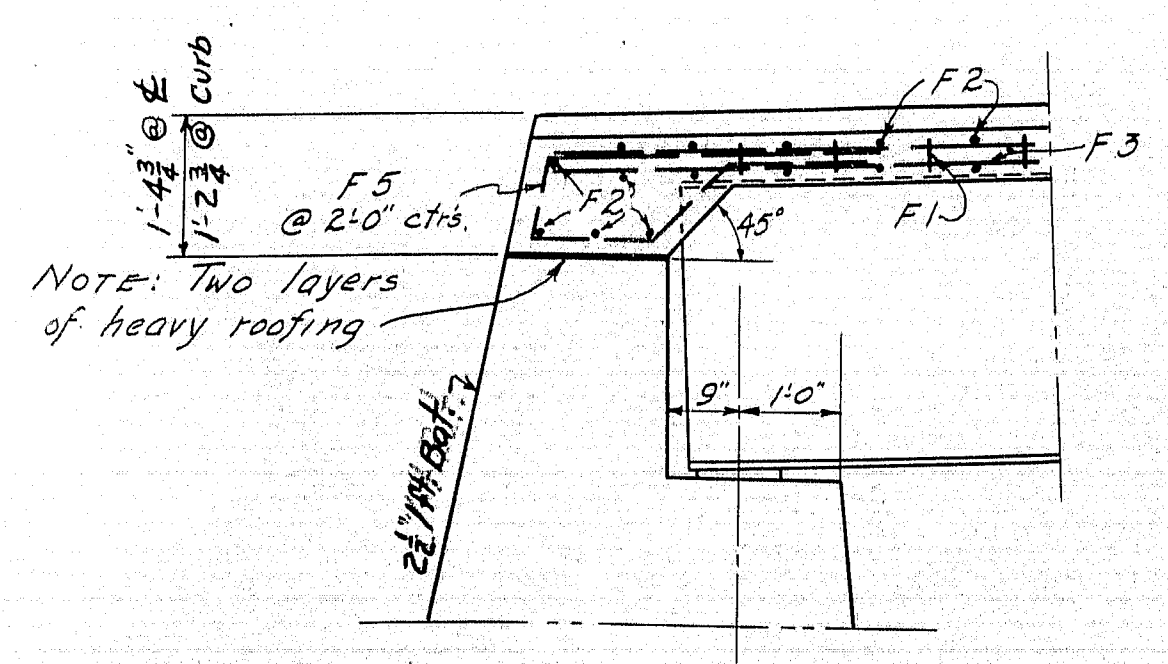
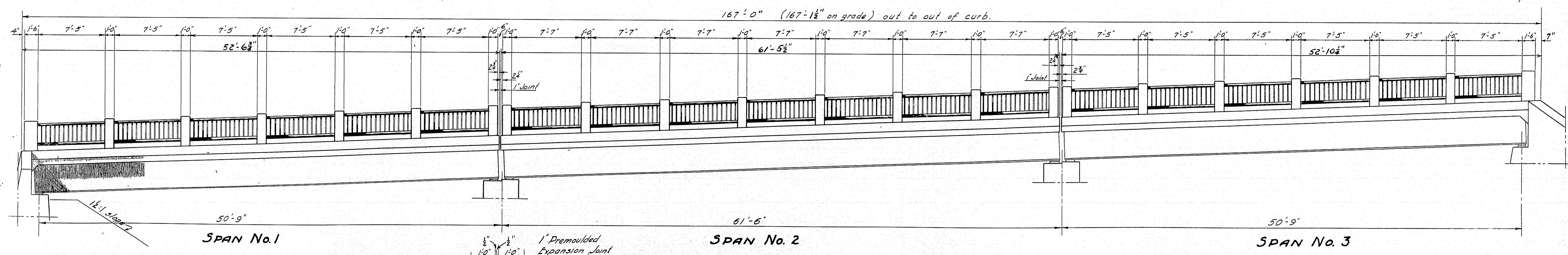
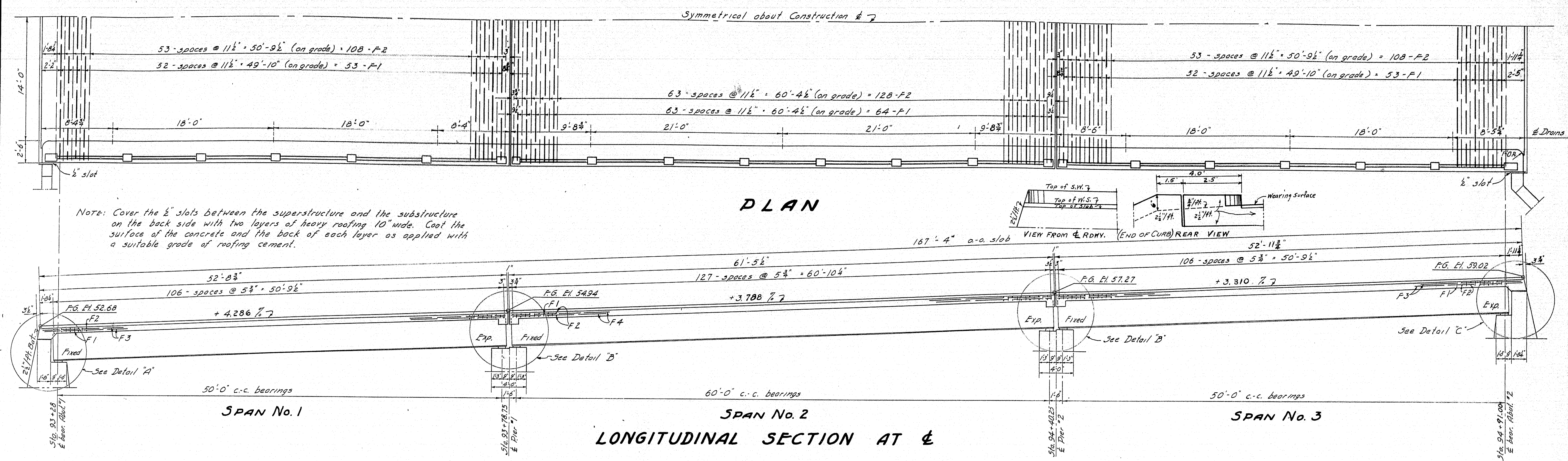


NOTE: AREA SHOWN CROSS-HATCHED TO BE REMOVED AS
INDICATED TO EL. 25.5 ± WITH THE TOP OF
SLOPE ABOUT 5'-0" FROM THE E OF PIER AND
ABOUT 5'-0" BEYOND THE ENDS OF THE PIER.
TO BE PAID FOR UNDER ITEM #7.

NOTE: EARTH TO BE REMOVED FROM SLOPING LEDGE AS
DIRECTED BY THE ENGINEER. TO BE PAID FOR UNDER
ITEM #7.

SURVEY-BLAKE PLOT & TRACE-SPARRELL		BRIDGE-5326
STATE HIGHWAY COMMISSION BRIDGE DIVISION		
PENNAMAQUAN BRIDGE OVER PENNAMAQUAN RIVER IN THE TOWN OF PEMBROKE WASHINGTON COUNTY SURVEY		
SHEET 2 OF 7	AUGUSTA, MAINE	JUNE 1950





SIDE ELEVATION DOWNSTREAM

DESIGN
 Loading - 1720-44
 $f_s = 18000 \text{ psi}$
 $f_c = 10000 \text{ psi}$
 $n = 10$

Concrete Classification
 Class A: Pier Columns and Caps
 Roadway and Sidewalk Slabs
 Class A-R: Wearing Surface
 Rail Posts
 Class B: Piers below El. 35.0
 Class X: Abutments.

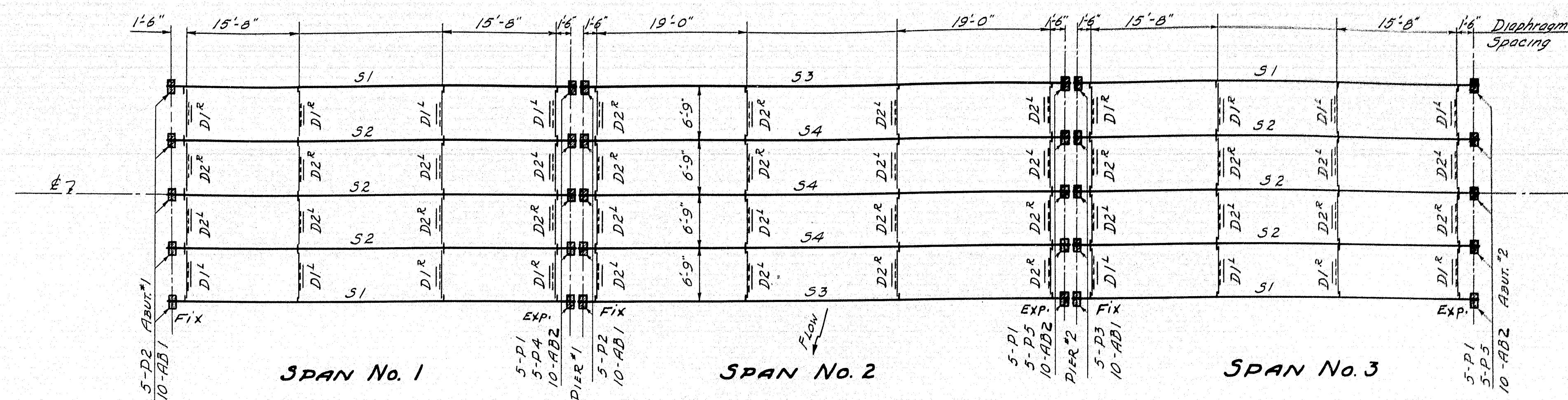
Work this sheet with sheet # 6

DESIGN & DETAIL - HAMILTON	BRIDGE - 5326
TRACE - FORTIER	
CHECK - P. WOODS	

STATE HIGHWAY COMMISSION
 BRIDGE DIVISION

PENNAQUAN BRIDGE
 OVER
PENNAQUAN RIVER
 IN THE TOWN OF
PEMBROKE
WASHINGTON COUNTY
 SUPERSTRUCTURE

SHEET 5 OF 7 AUGUSTA, MAINE FEB. 1950

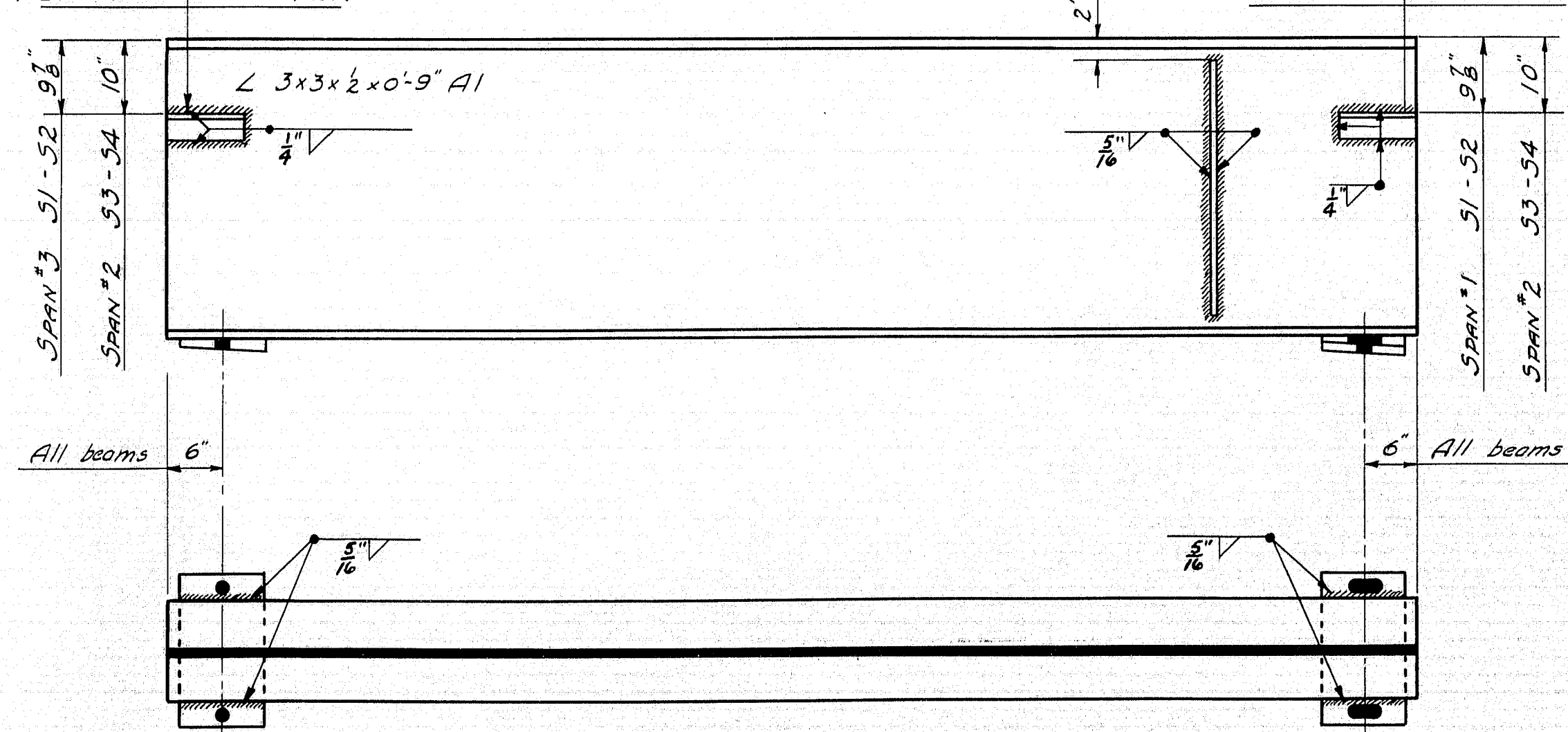


ERECTOR DIAGRAM

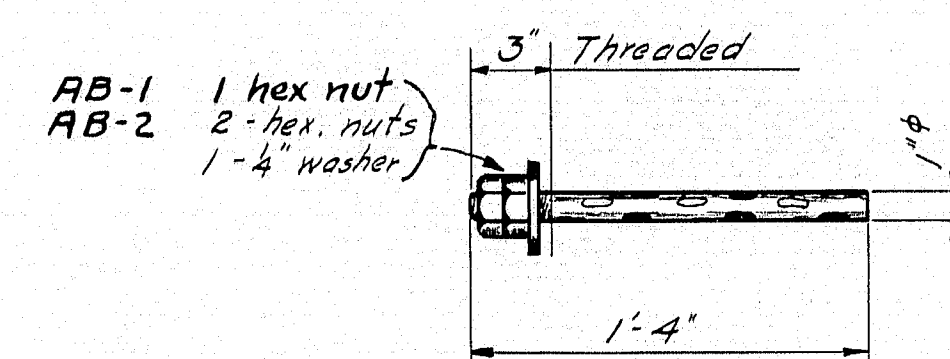
S1 = 33 1/2" W x 141	Camber 1 1/2"	51'-0 1/2" overall
S2 = 33 1/2" W x 150	Camber 1 1/4"	51'-0 1/2" overall
S3 = 36 3/8" W x 182	Camber 1 3/4"	61'-0 1/2" overall
S4 = 36 3/8" W x 182	Camber 1 3/8"	61'-0 1/2" overall

STRINGERS

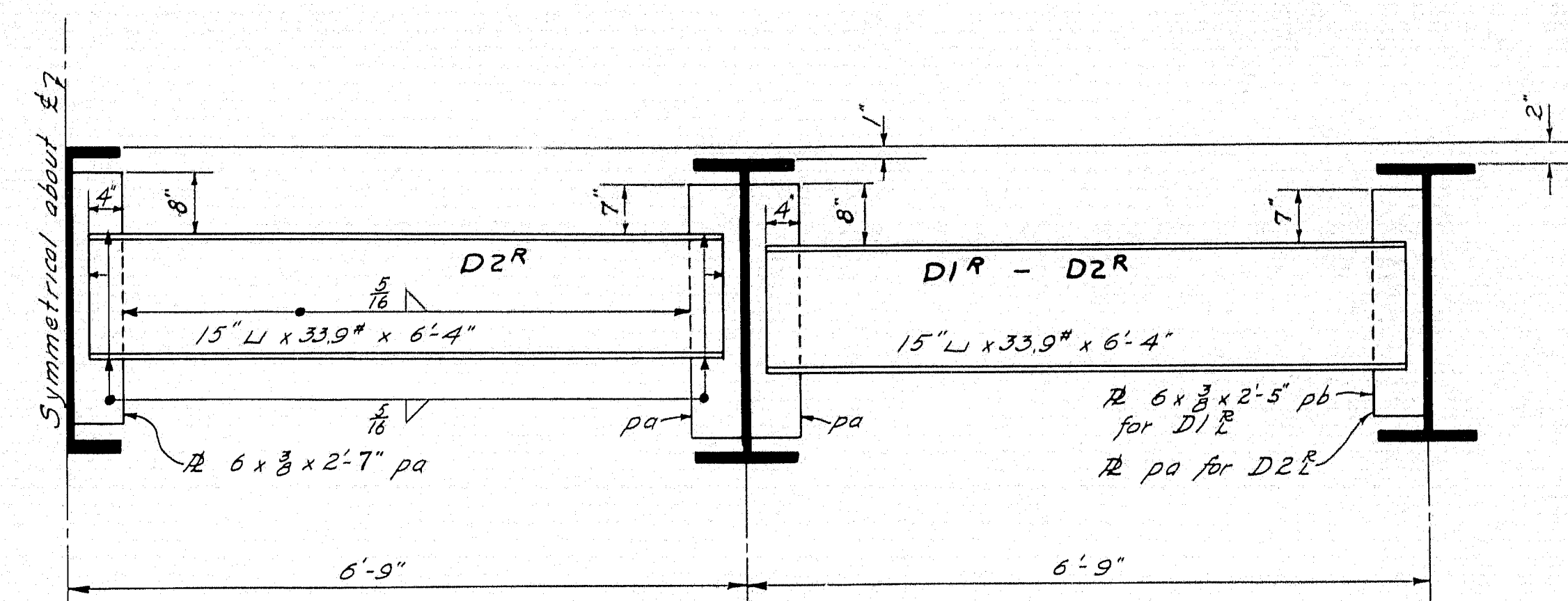
SPAN No. 2	SPAN No. 3	SPAN No. 1	SPAN No. 2
1-A1-N.S. U.S. (53)	1-A1-N.S. U.S. (51)	1-A1-N.S. U.S. (51)	1-A1-N.S. U.S. (53)
1-A1-F.S. D.S. (53)	1-A1-F.S. D.S. (51)	1-A1-F.S. D.S. (51)	1-A1-F.S. D.S. (53)
2-A1-2 3/8" (54)	2-A1-2 3/8" (52)	2-A1-2 3/8" (52)	2-A1-2 3/8" (54)



TYPICAL FIELD FABRICATION DETAILS



SWEDGED ANCHOR BOLT AB-1-2

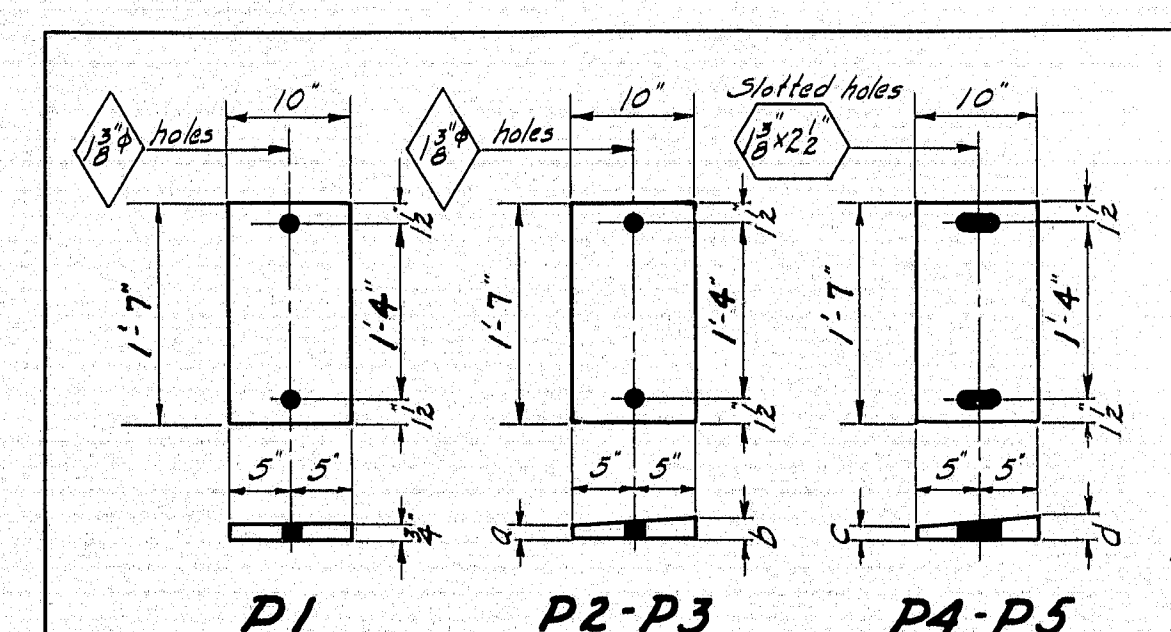


TYPICAL HALF TRANSVERSE SECTION

Diaphragm D2^R as shown } All spans
D2^L opp. hand }
D1^R as shown } Spans 1 & 3
D1^L opp. hand }
Use D2^R or D2^L as required for Span #2
(See ERECTOR DIAGRAM)

REQUIRED

QTY	DESCRIPTION	MARK
4	Stringers	S1
6	"	S2
2	"	S3
3	"	S4
32	Angles	A1
8	Diaphragms	D1 ^R
8	"	D1 ^L
16	"	D2 ^R
16	"	D2 ^L
15	Bearing Plates	P1
10	"	P2
5	"	P3
5	"	P4
10	"	P5
30	Anchor Bolts	AB1
30	"	AB2



BEARING PLATES

MARK	No.	SIZE	a	b	c	d
P1	15	10 x 3/8 x 1'-7"				
* P2	10	10 x 1/2 x 1'-7"	7/8"	1"		
* P3	5	10 x 1/2 x 1'-7"	7/8"	1 1/2"		
* P4	5	10 x 1/2 x 1'-7"			7/8"	1"
* P5	10	10 x 1/2 x 1'-7"			7/8"	1 1/2"

* Bevelled plates.

SPECIFICATIONS

Maine State Highway Commission, Bridge Division Specifications for Steel Highway Bridges, Nov. 1945.
Field connections - welded
Loading H-20-44

DESIGN & DETAIL - HAMILTON TRACE - FORTIER CHECK - REWOODS	BRIDGE - 5326
STATE HIGHWAY COMMISSION BRIDGE DIVISION	
PENNAMAQUAN BRIDGE	
OVER	
PENNAMAQUAN RIVER	
IN THE TOWN OF	
PEMBROKE	
WASHINGTON COUNTY	
STRUCTURAL STEEL	
SHEET 7 OF 7 AUGUSTA, MAINE FEB. 1950	