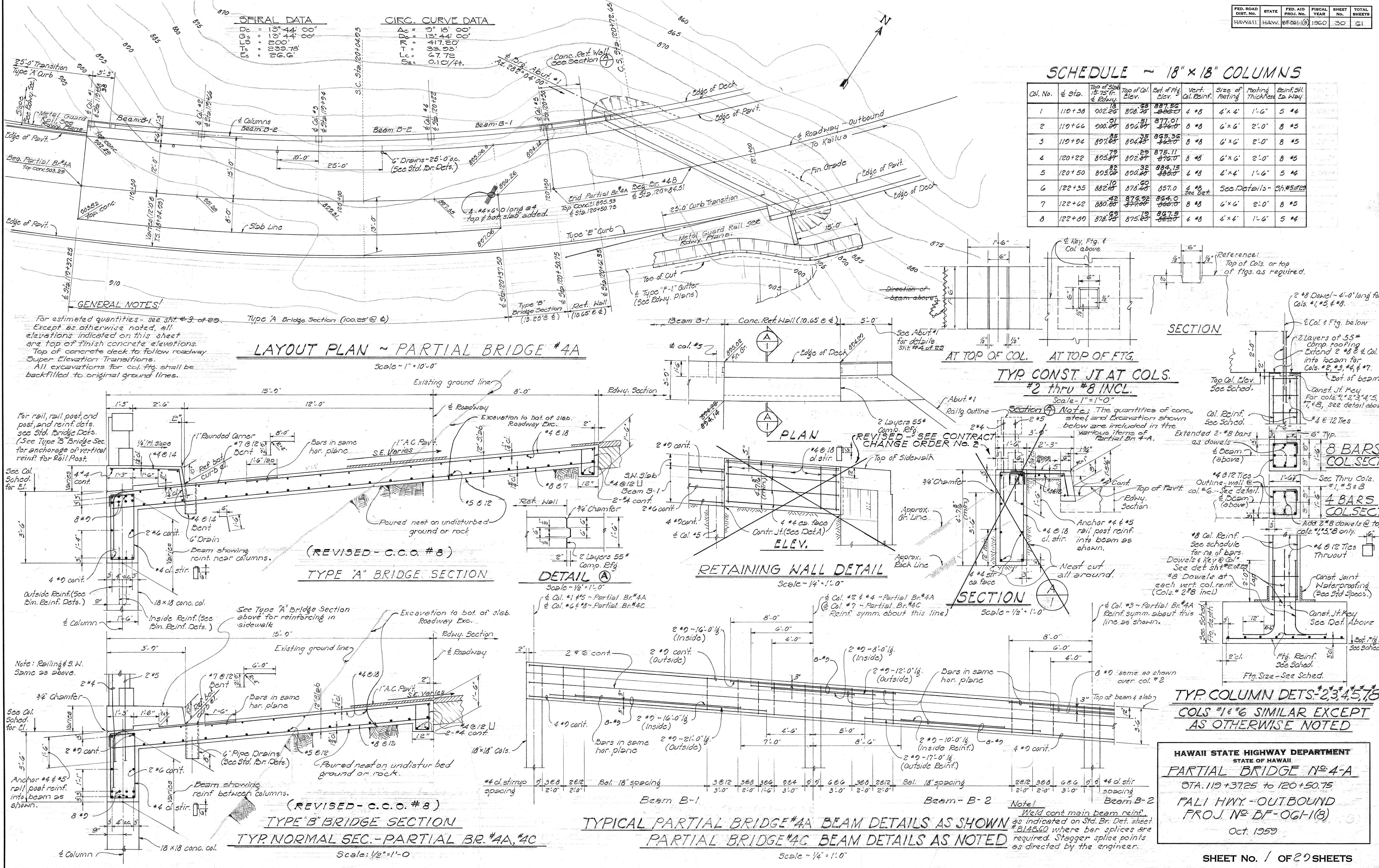
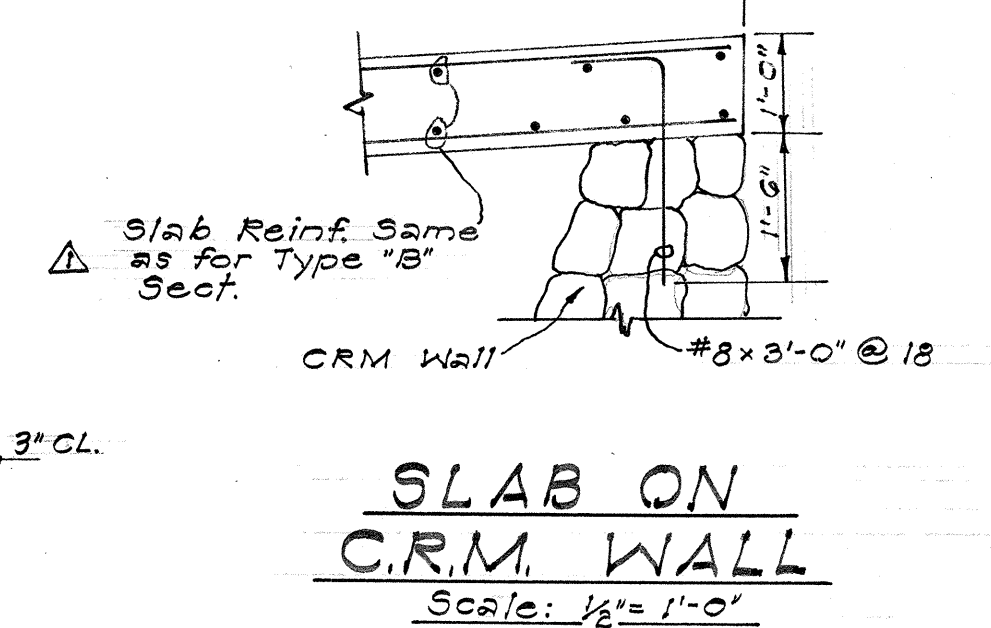
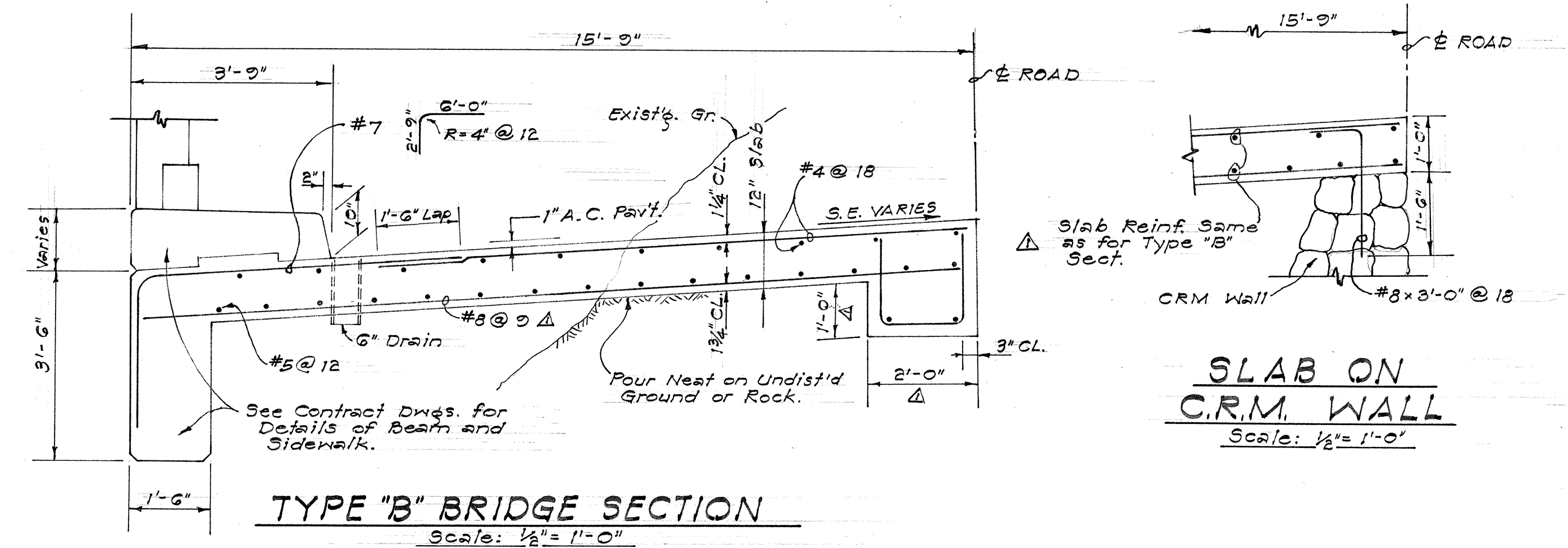
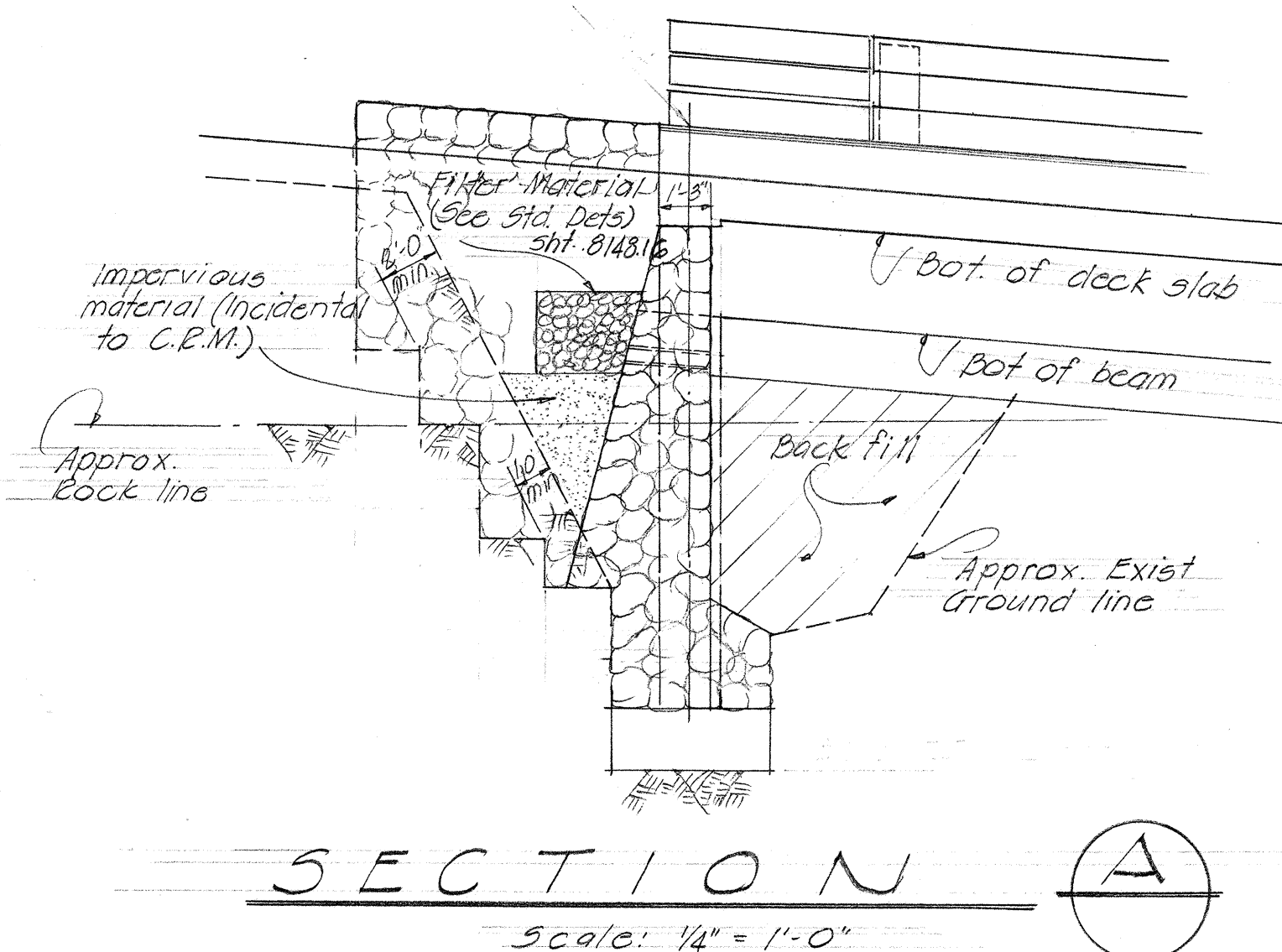
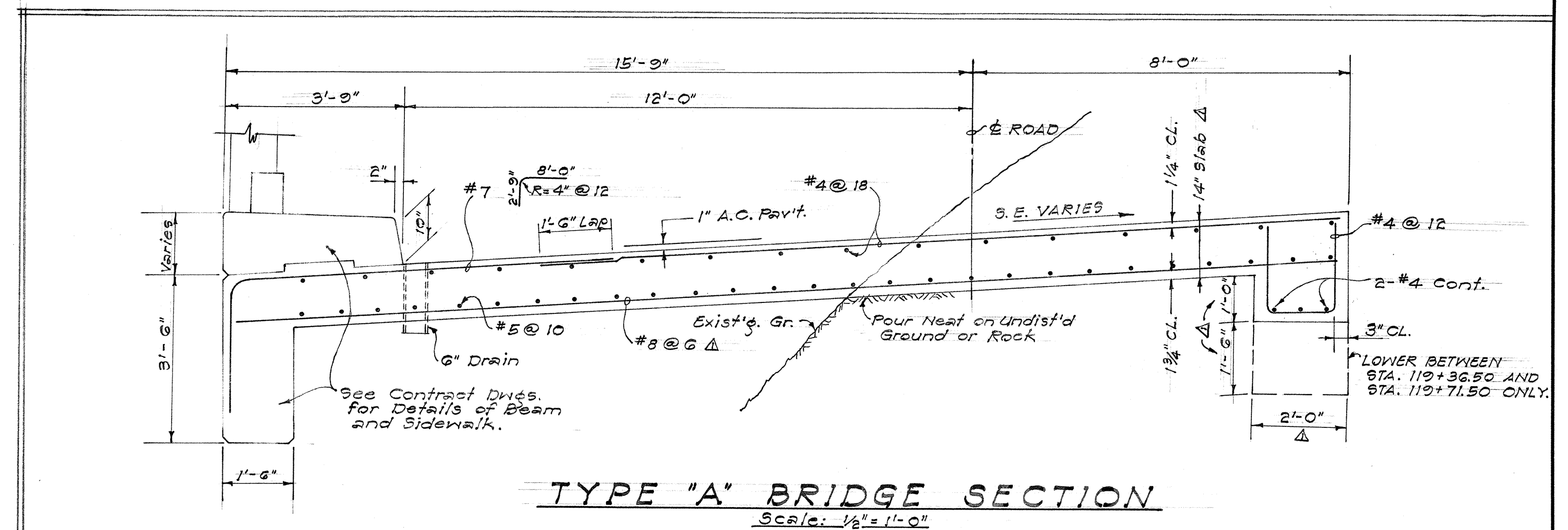
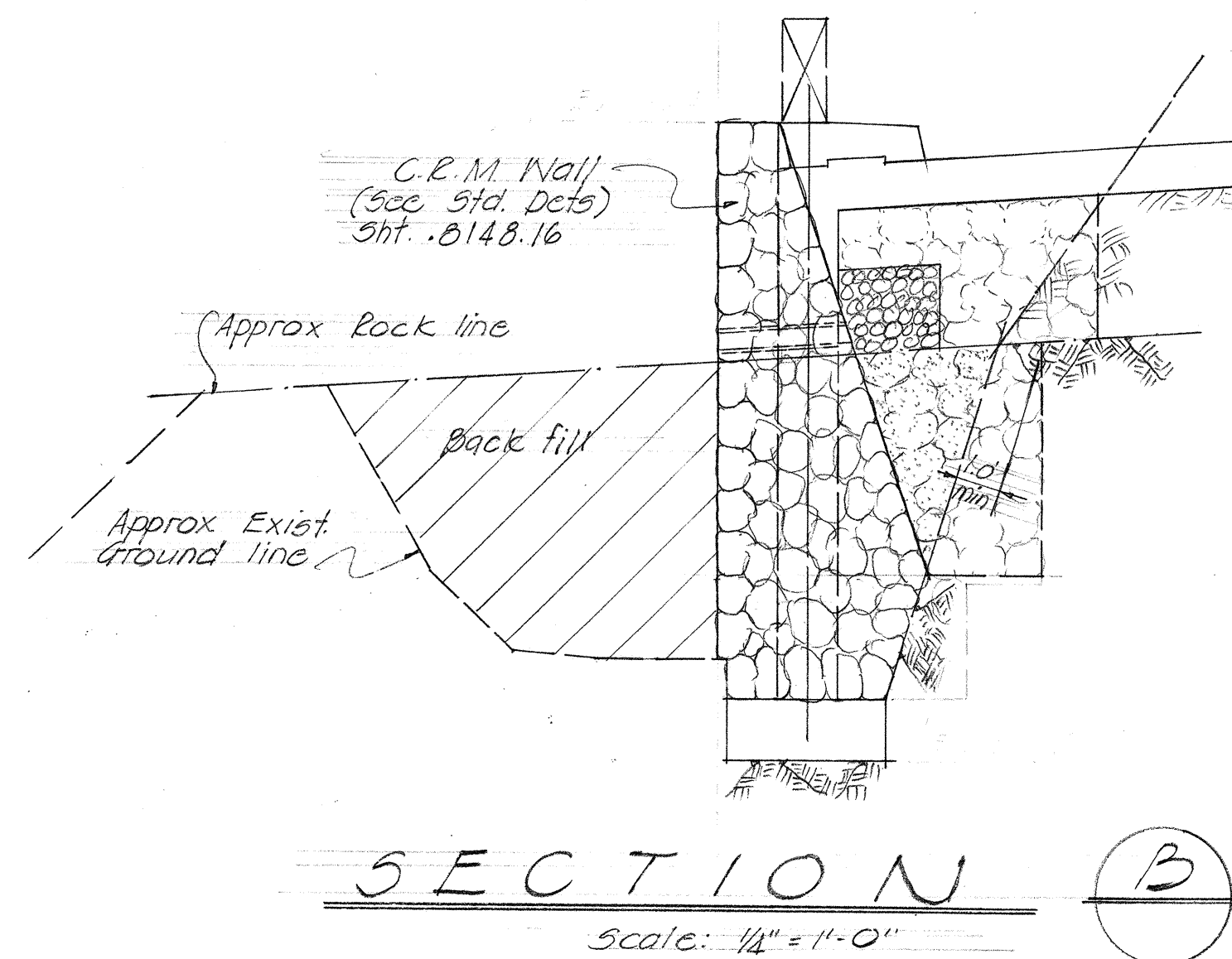
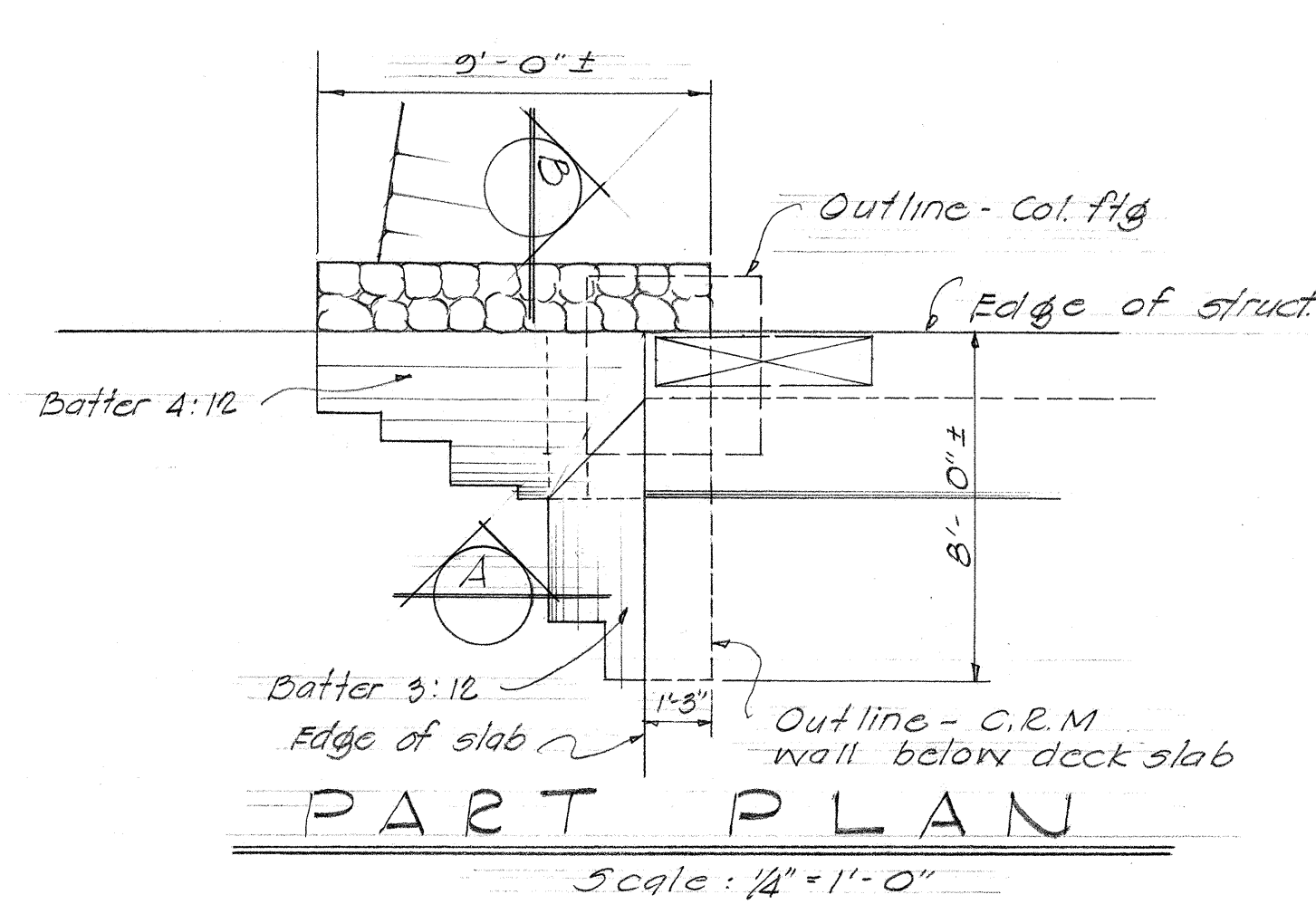




FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAWAII	BF-061-1(8)	1960		

Revision N^o 2 June 17, 1960 - Add C.R.M. Wall at col #1 Partial bridge 4A

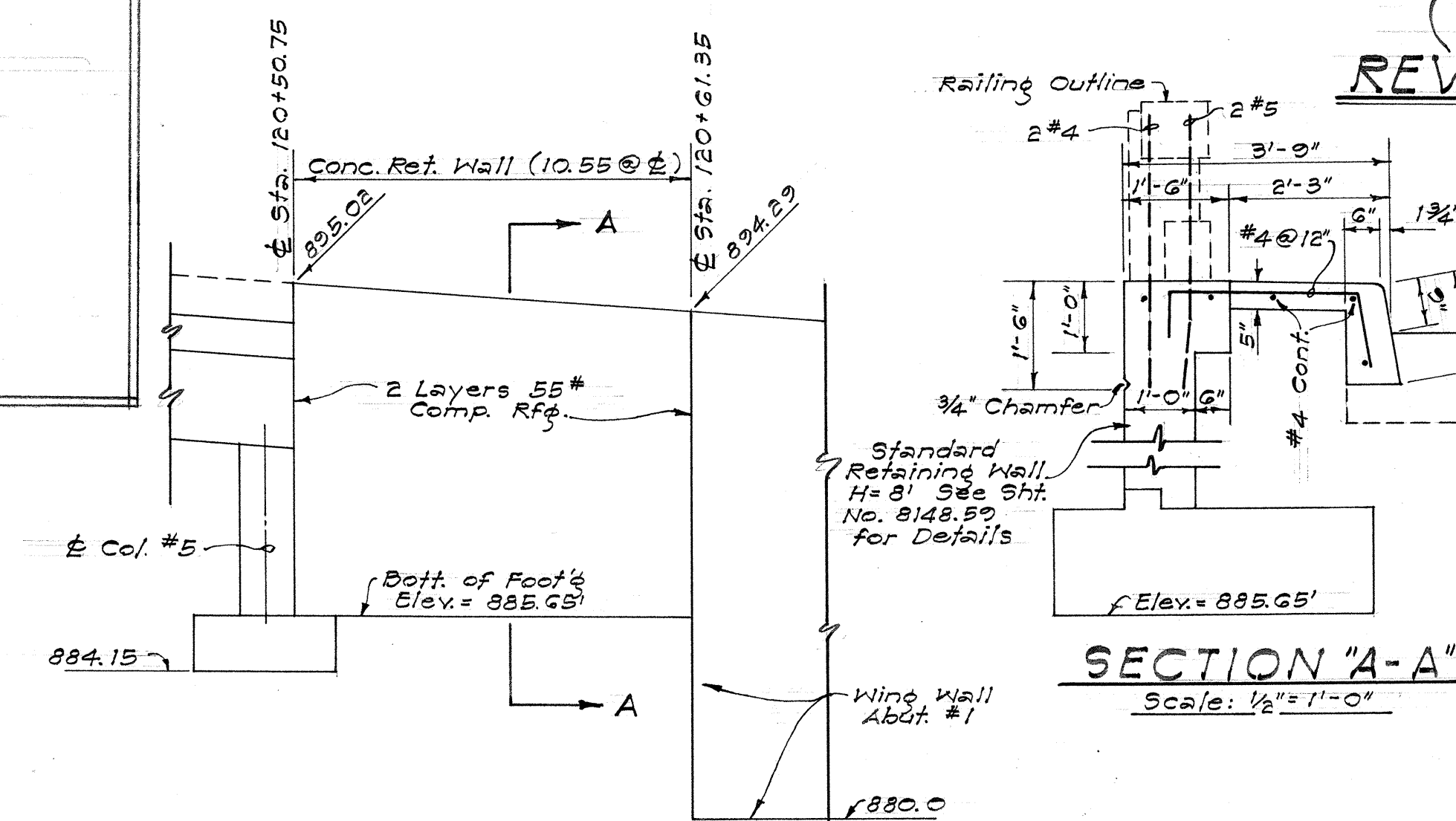


1. Details shown on this drawing revise corresponding details shown on Contract Dwg. No. 8148.30 and No. 8148.35 only.
2. Revisions shown by symbol Δ.
3. For details not indicated, see Contract Plans.

(CONTRACT CHANGE ORDER NO. 3)
REVISED DETAILS FOR BRIDGE NO. 4A AND NO. 4C
FEB. 9, 1961

REVISION N^o 2 - PARTIAL BRIDGE #4A
STA 119+37.25 TO STA. 120+50.75

(CONTRACT CHANGE ORDER NO. 2)



BRIDGE 4A
ELEV. RETAINING WALL
(FROM E. ROAD)
Scale: 1/4" = 1'-0"
(CONTRACT CHANGE ORDER NO. 2)
RETAINING WALL DETAIL
JULY 5, 1960

TERRITORIAL HIGHWAY DEPARTMENT
TERRITORY OF HAWAII
REVISION
PARTIAL BRIDGE N^o 4-A
STA. 119+37.25 TO 120+50.75
PALI HWY.-OUTBOUND
PROJ. N^o BF-061-1(8)
JUNE 1960

SHEET NO. OF SHEETS

.8148.30A

FOR CONTRACT PLANS

DATE	_____
DESIGNED BY	_____
DRAWN BY	_____
TRACED BY	_____
NOTES CHECKED BY	_____
QUANTITIES CHECKED BY	_____
NO.	_____

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BF-OGI-1(8)	1960	31	61

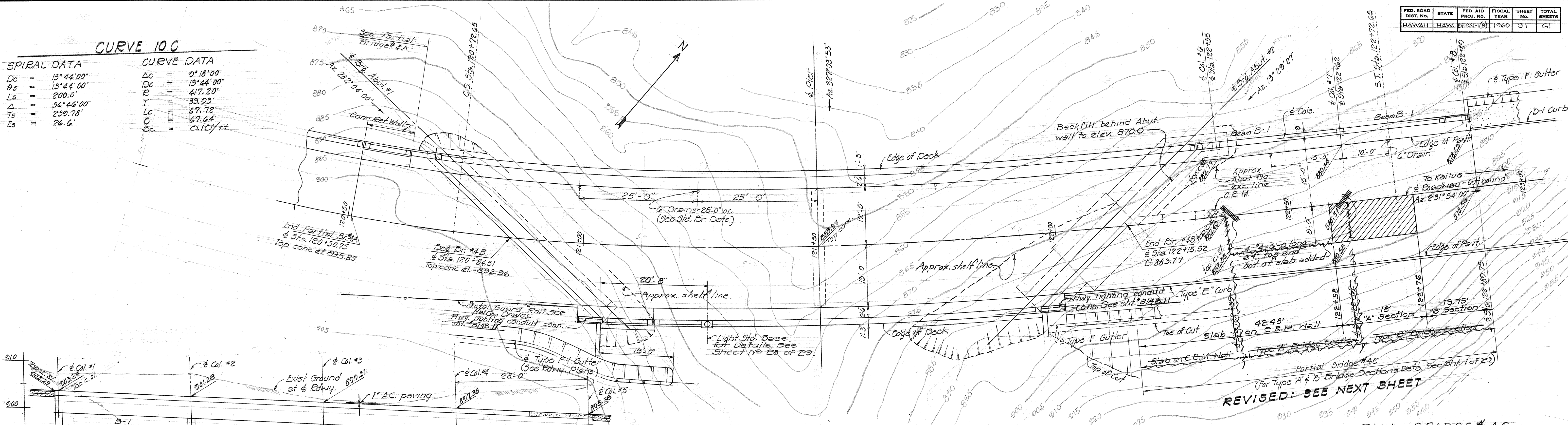
CURVE 10C

SPIRAL DATA

Dc	= 13° 44' 00"
9s	= 13° 44' 00"
Ls	= 200.0'
Δ	= 36° 46' 00"
Ts	= 239.78'
Es	= 26.6'

CURVE DATA

Δc	= 2° 18' 00"
Dc	= 13° 44' 00"
R	= 417.20'
T	= 33.03'
Lc	= 67.72'
O	= 67.64'
Sc	= 0.10/ft.

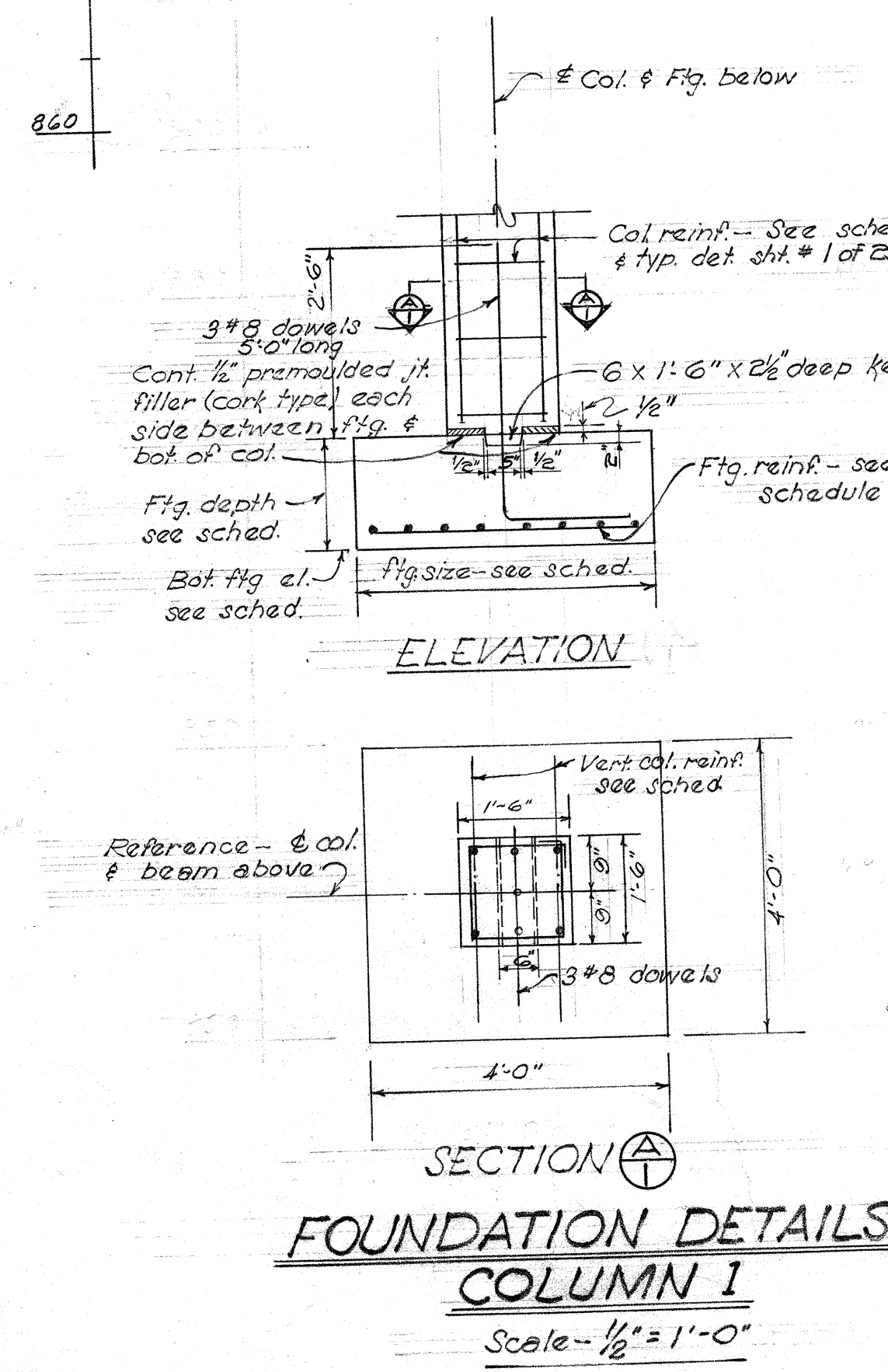


LAYOUT PLAN - BRIDGE #4B
Scale: 1" = 10'-0"

LAYOUT PLAN - PARTIAL BRIDGE #4C
Scale: 1" = 10'-0"

General Notes:
For other general notes, see sheet #29 of E9.
For Standard Bridge Details see shts. # B-148, 59, B-148, 60, & B-148, 61.
Except as otherwise noted, all elevations indicated on this sheet are top of finish concrete elevations.
Top of concrete deck to follow roadway super elevation transitions.
All excavations for Column Figs. shall be back-filled to original ground lines.
For Estimated quantities, See Sheet No. 3 of E9.

SURVEYED BY	DATE
DRAWN BY	
CHECKED BY	
NOTE BOOK NO.	

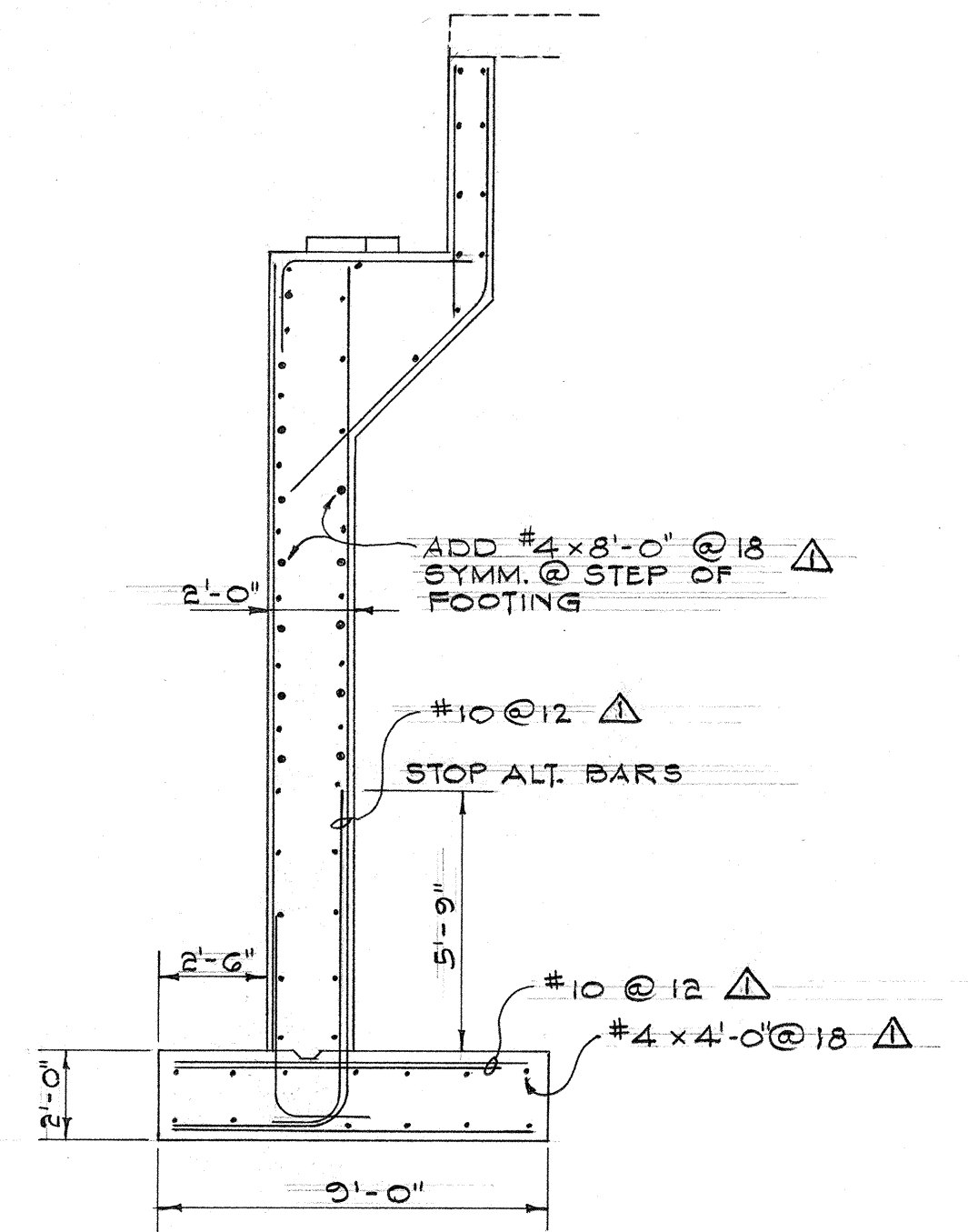


LONGITUDINAL SECTION ALONG & ROADWAY
Scale - 1" = 10'-0"

REVISED: SEE NEXT SHEET

HAWAII STATE HIGHWAY DEPARTMENT
STATE OF HAWAII
BRIDGE No. 4-B
STA. 120+84.51 to 122+15.52
PARTIAL BRIDGE No. 4-C
STA. 122+15.52 to 122+89.75
PALI HWY. OUTBOUND
PROJ. No. BF-OGI-1(8)
Oct. 1959

ORIGINAL PLAN	SURVEY PLOTTED BY	DATE
NOTE BOOK	DRAWN BY	"
	TRACED BY	"
	DESIGNED BY	"
	QUANTITIES BY	"
No.	CHECKED BY	



Scale: $\frac{1}{4}'' = 1'-0''$

FOR REINF. & DET'S. NOT
INDICATED SEE "A/5" SHT. 6 OF 29.



Scale: 1" = 10' - 0"

REVISIONS SHOWN BY SYMBOL Δ
FOR DETAILS NOT INDICATED, SEE
CONTRACT PLANS.

NOV. 14, 1960

SHEET No. OF SHEETS

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BF-061-(8)	1960	32	61

ESTIMATED QUANTITIES

PARTIAL BRIDGE #4-A

CLASS A-1 CONC. LUMP SUM (135 CU. YD.)
 REINF. STEEL LUMP SUM (28,570 LB.)
 STRUCT. EXC. 154 CU. YD.
 A.C. MIX V 14 TONS
 BIT. TACK COAT 60 GALS.
 * ROADWAY EXC. UNDER BR. 41 CU. YD.
 MET. GUARD RAIL/CONC. POSTS 50 L.F.

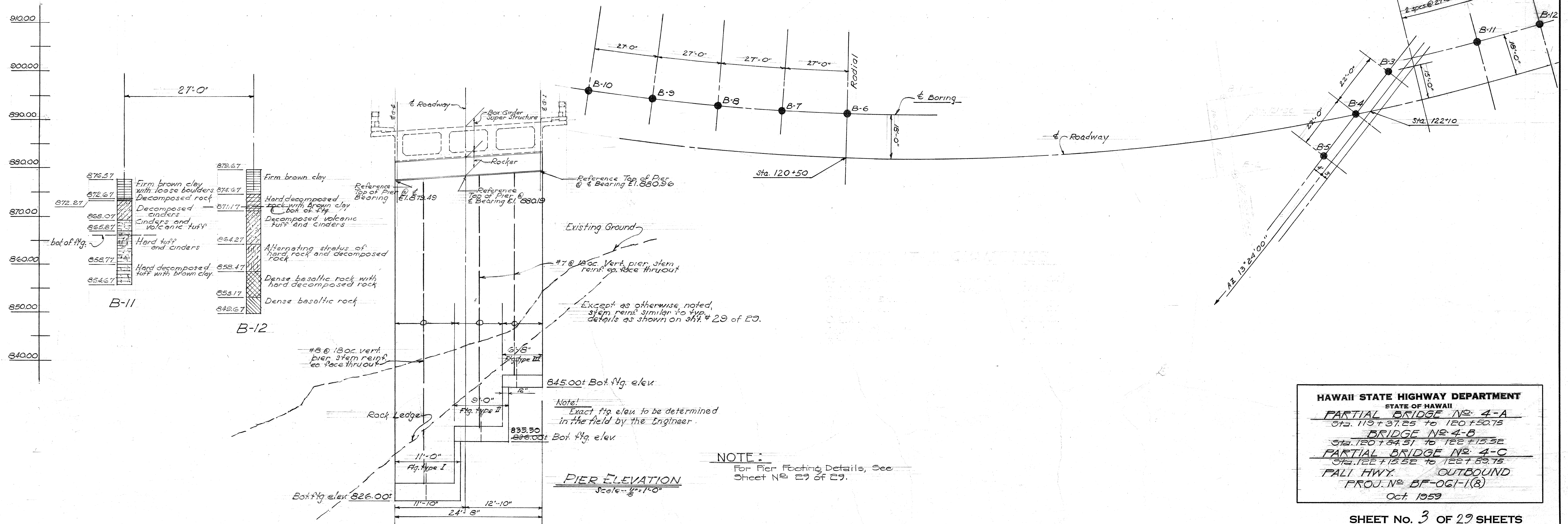
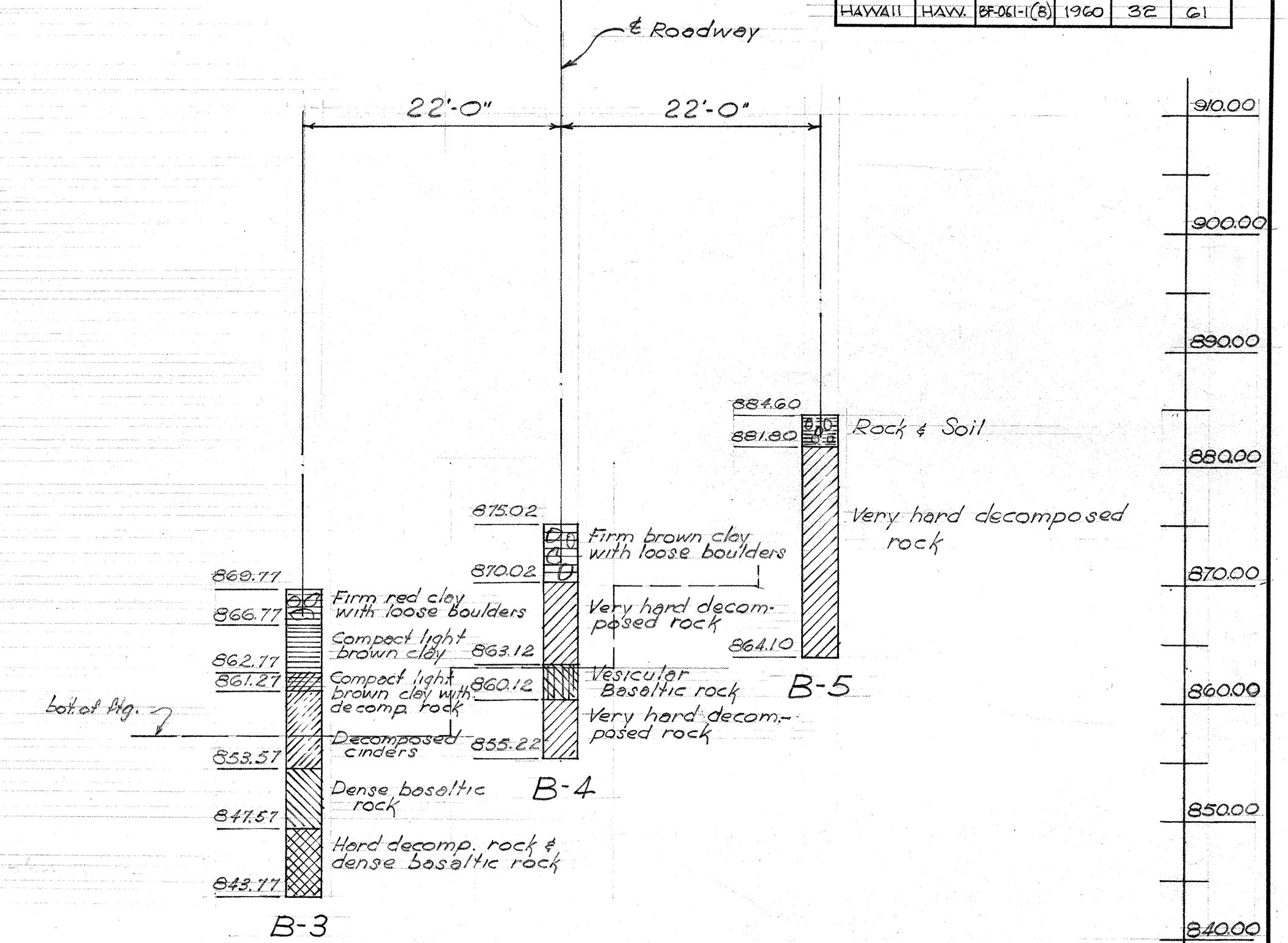
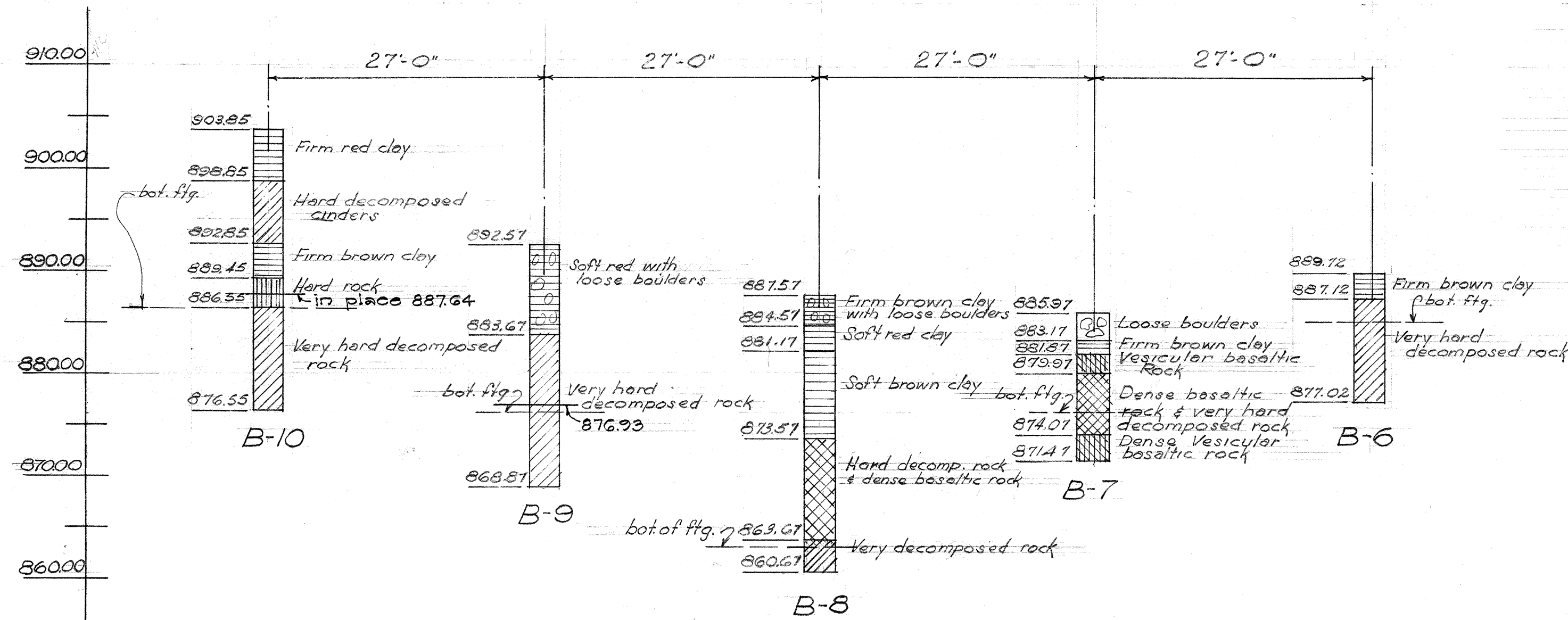
BRIDGE #4-B

CLASS A-1 CONC. LUMP SUM (615 CU. YD.)
 REINF. STEEL LUMP SUM (105,600 LB.)
 STRUCT. EXC. 693 CU. YD.
 FILTER MAT. 43 CU. YD.
 A.C. MIX V 22 TONS
 BIT. TACK COAT 91 GALS.
 METAL GUARD RAIL/CONC. POSTS 50 L.F.

PARTIAL BRIDGE #4-C

CLASS A-1 CONC. LUMP SUM (71 CU. YD.)
 REINF. STEEL LUMP SUM (10,600 LB.)
 STRUCT. EXC. 133 CU. YD.
 A.C. MIX V 7 TONS
 BIT. TACK COAT 28 GALS.
 C.R.M. 60 CU. YD.

* This item included in the quantities for Roadway Excavation, proposal item #13, and will not be paid for separately.

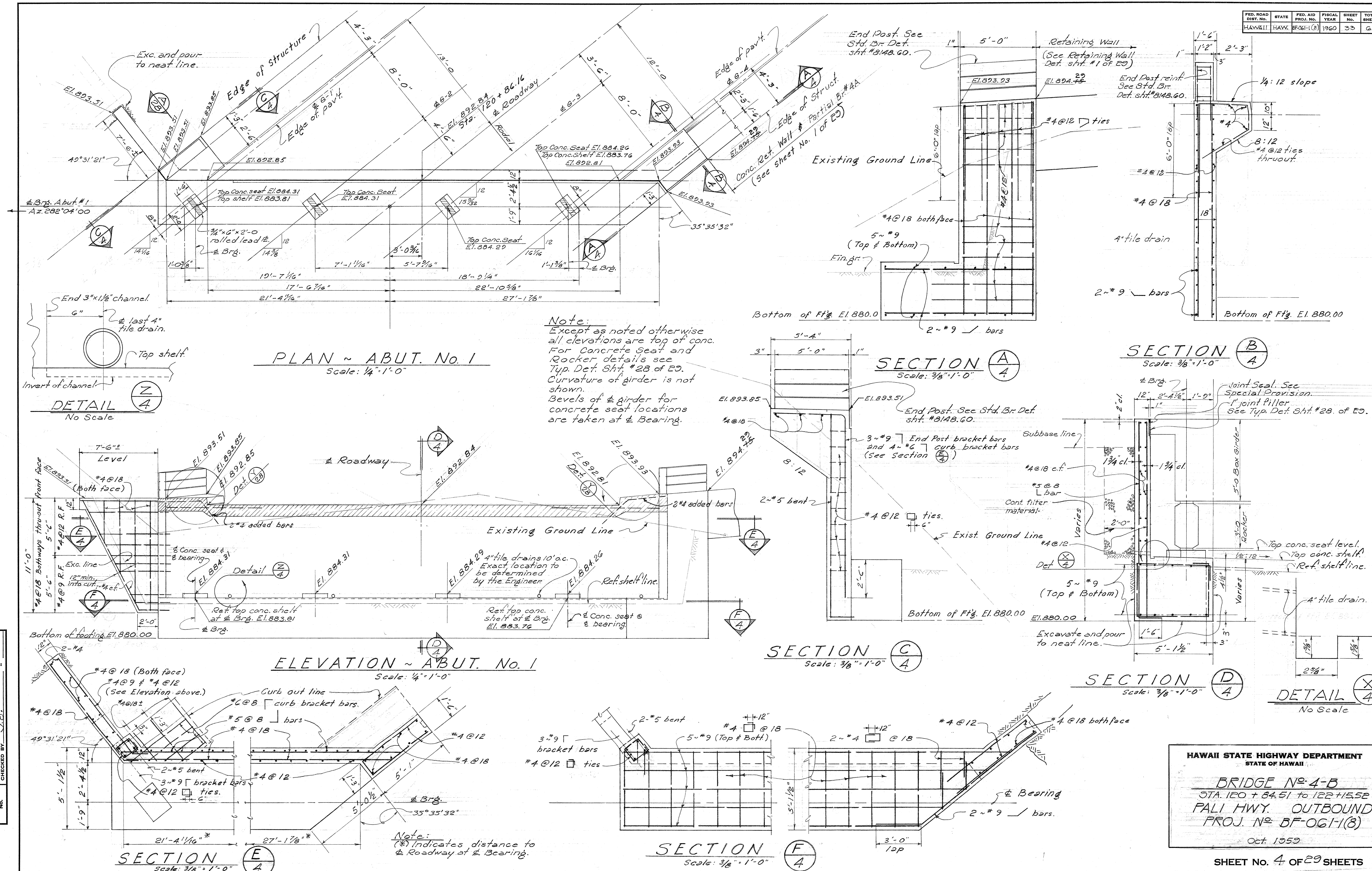


HAWAII STATE HIGHWAY DEPARTMENT
 STATE OF HAWAII
 PARTIAL BRIDGE NO. 4-A
 STA. 119+37.25 TO 120+50.75
 BRIDGE NO. 4-B
 STA. 120+54.51 TO 122+15.32
 PARTIAL BRIDGE NO. 4-C
 STA. 122+15.32 TO 123+89.75
 PALI HWY. OUTBOUND
 PROJ. NO. BF-061-(8)
 Oct. 1959

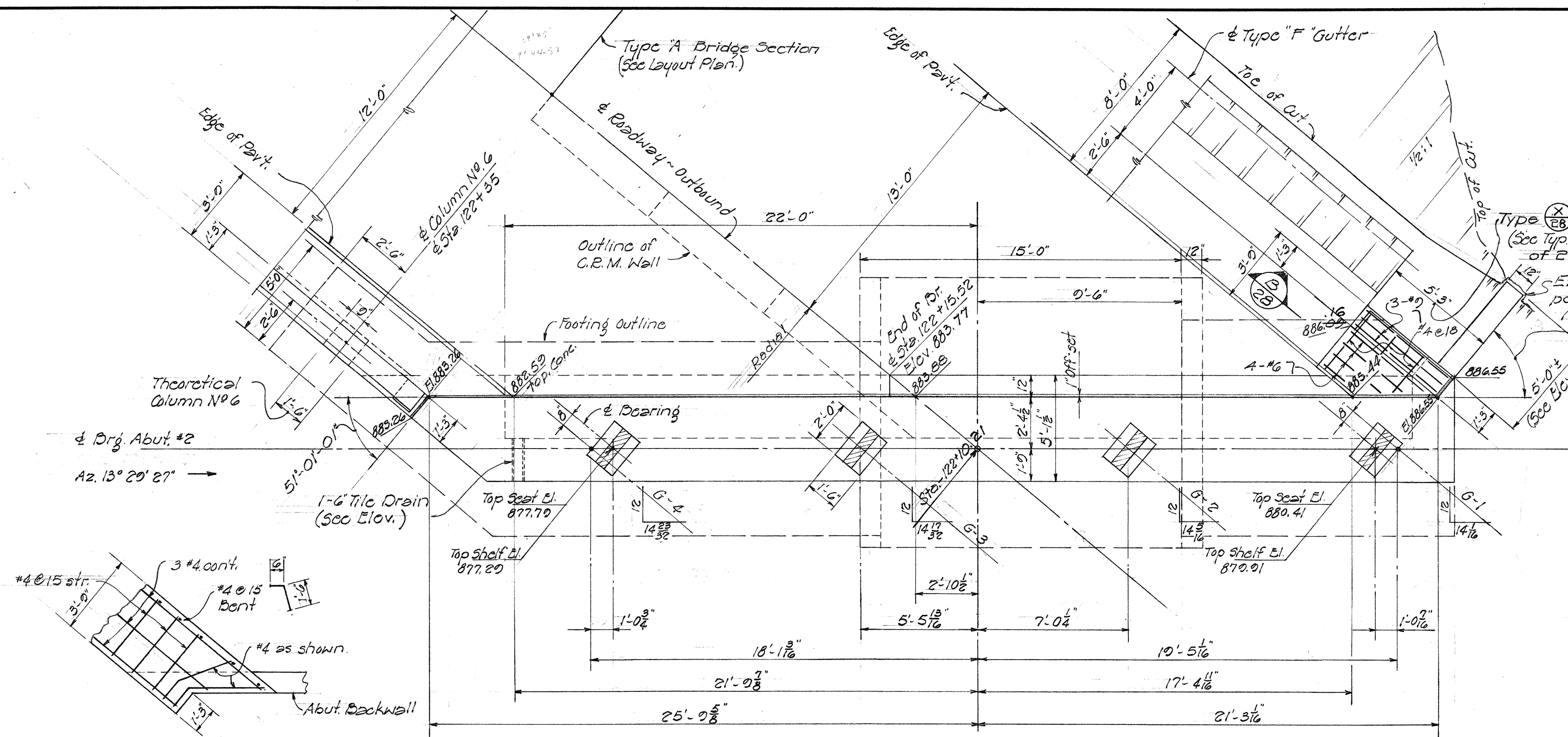
SHEET No. 3 OF 29 SHEETS

8148.32

FED. ROAD DIST. No.	STATE	FED. AID PROJ. No.	FISCAL YEAR	SHEET No.	TOT SHE
HAWAII	HAW.	BF-06-1(8)	1960	33	6



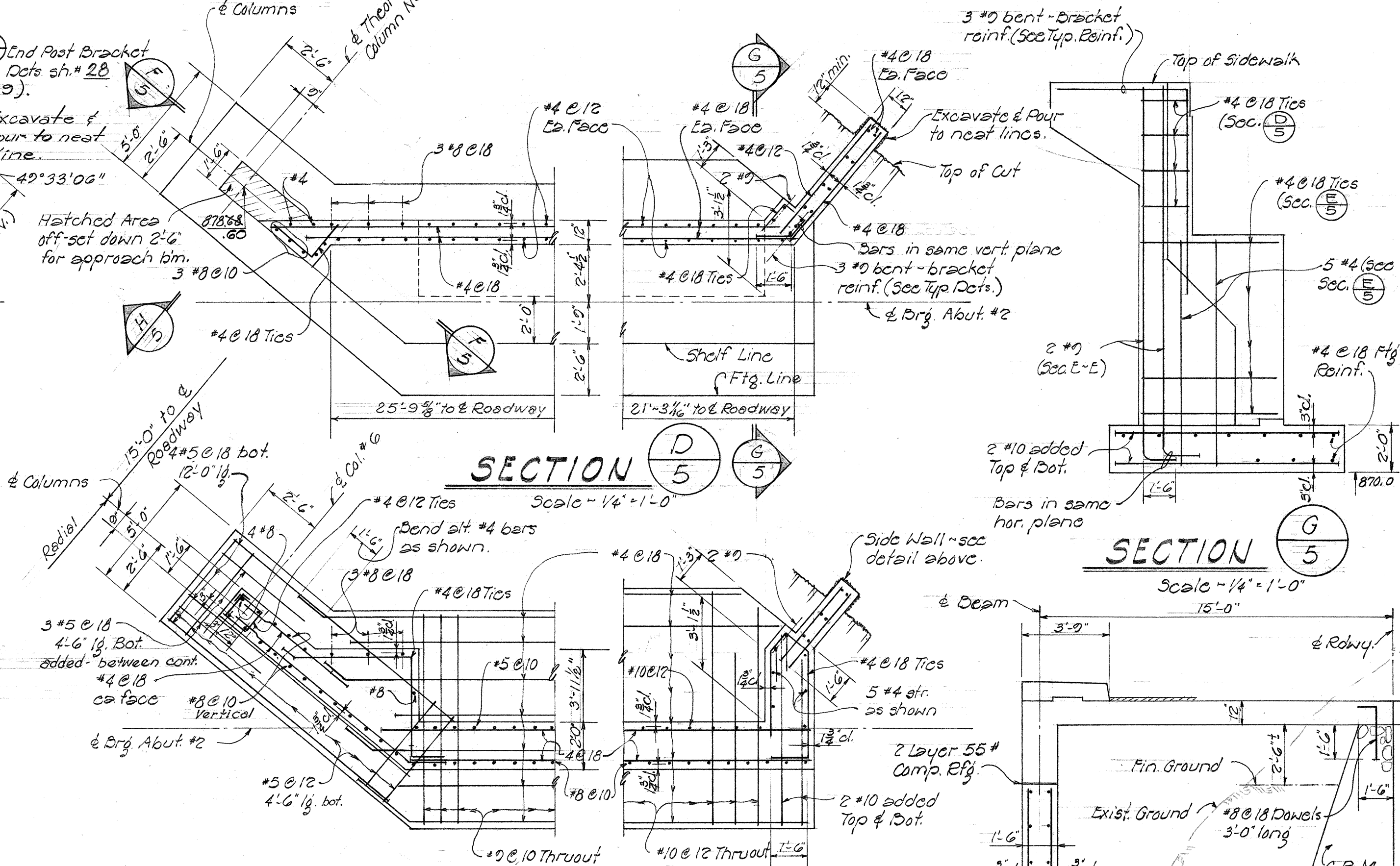
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	2F061-1(8)	1960	34	61



S.W. REINF. DET.
LEFT RAILG. - ABUT. #2
Scale 1/4" = 1'-0"

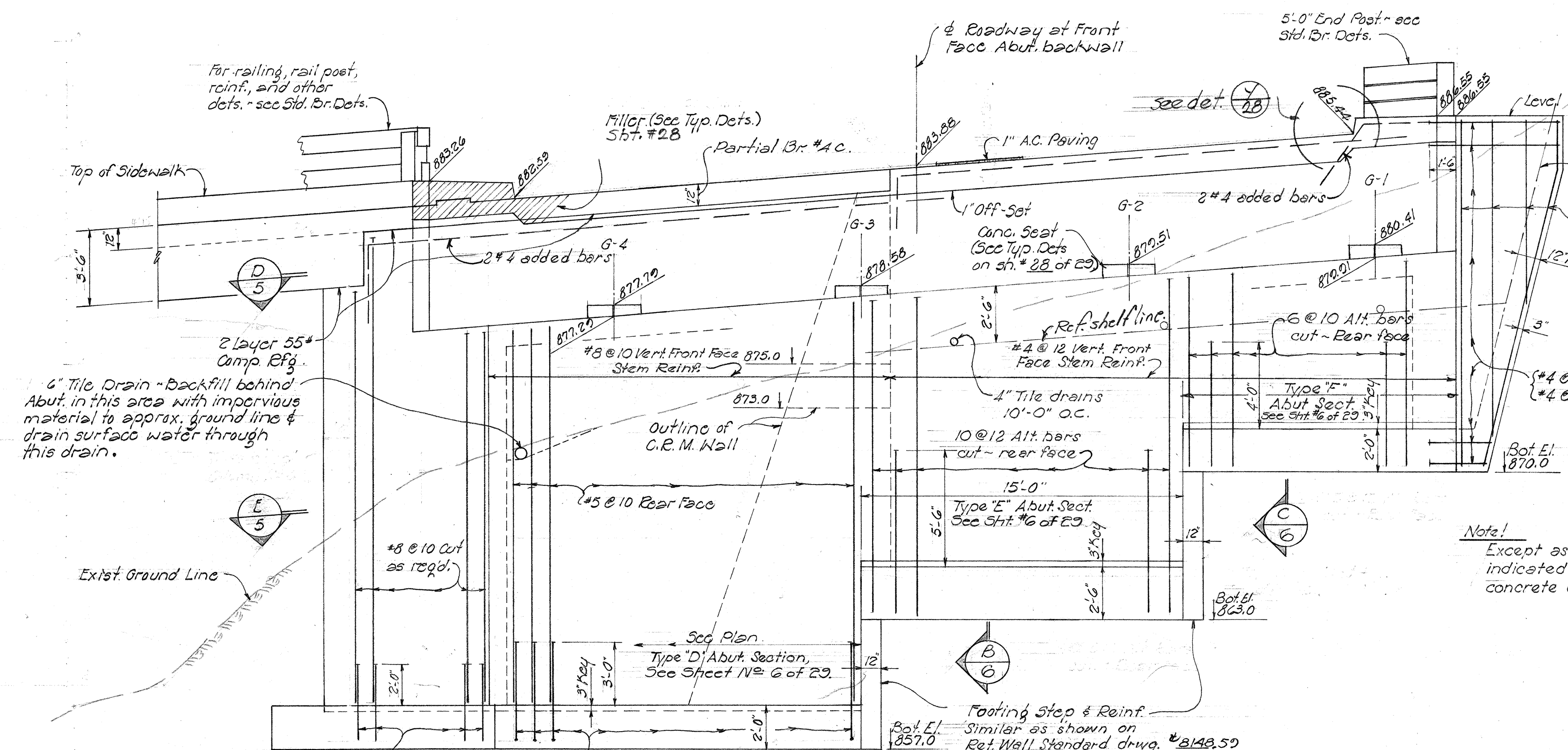
PLAN - ABUT. NO 2
Scale 1/4" = 1'-0"

Note!
Curvature of girder is not shown. Bevels of girder for concrete seat locations are taken at bearing.



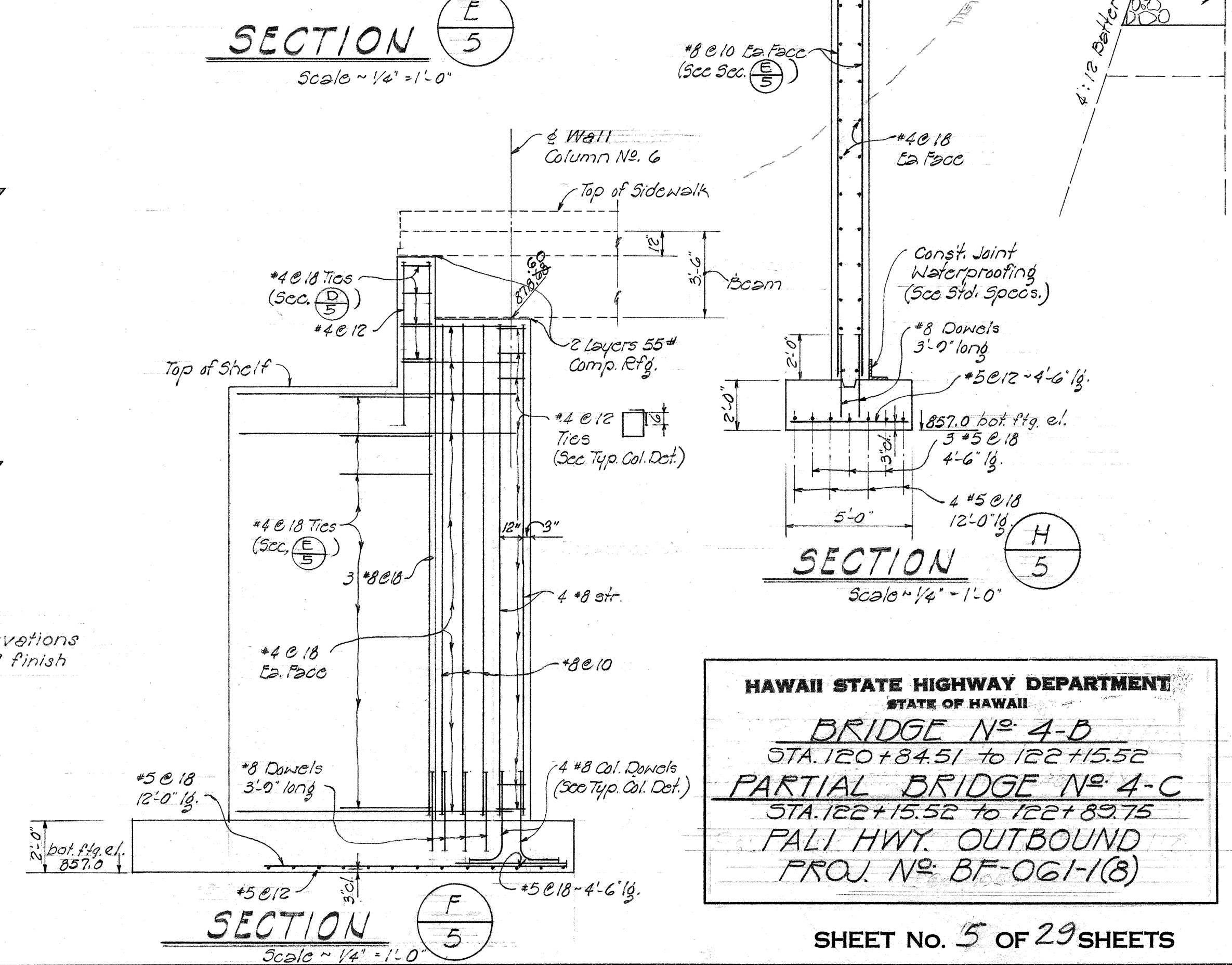
SECTION D 5
Scale 1/4" = 1'-0"

SECTION G 5
Scale 1/4" = 1'-0"



ELEV. - ABUT. NO 2
Scale 1/4" = 1'-0"

Note!
Except as otherwise noted, all elevations indicated on this sheet are top of finish concrete elevations.



SECTION E 5
Scale 1/4" = 1'-0"

SECTION H 5
Scale 1/4" = 1'-0"

HAWAII STATE HIGHWAY DEPARTMENT
STATE OF HAWAII
BRIDGE NO 4-B
STA. 120+84.51 TO 122+15.52
PARTIAL BRIDGE NO 4-C
STA. 122+15.52 TO 122+89.75
PALI HWY. OUTBOUND
PROJ. NO. BF-061-1(8)

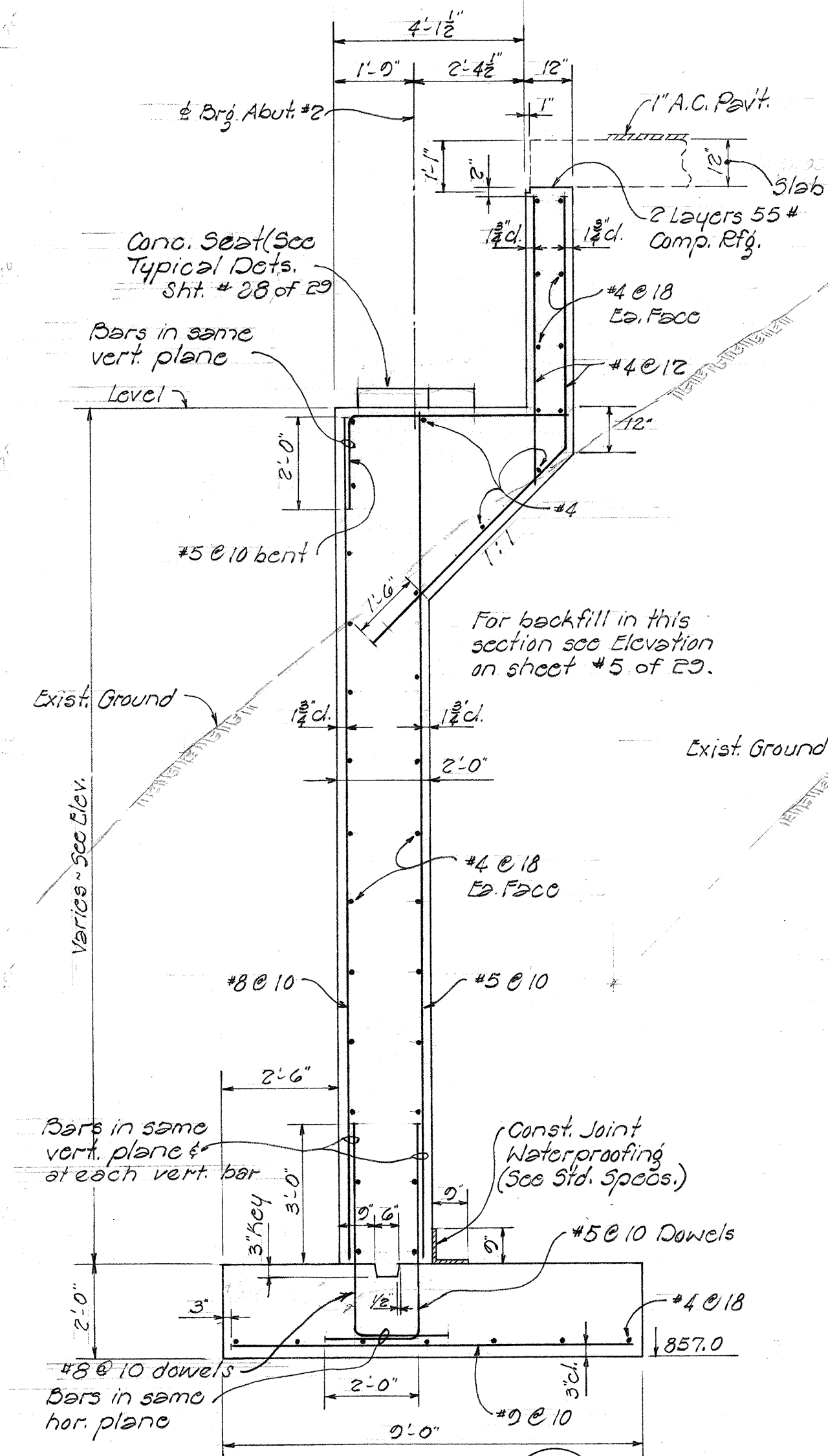
SHEET No. 5 OF 29 SHEETS

.8148.34

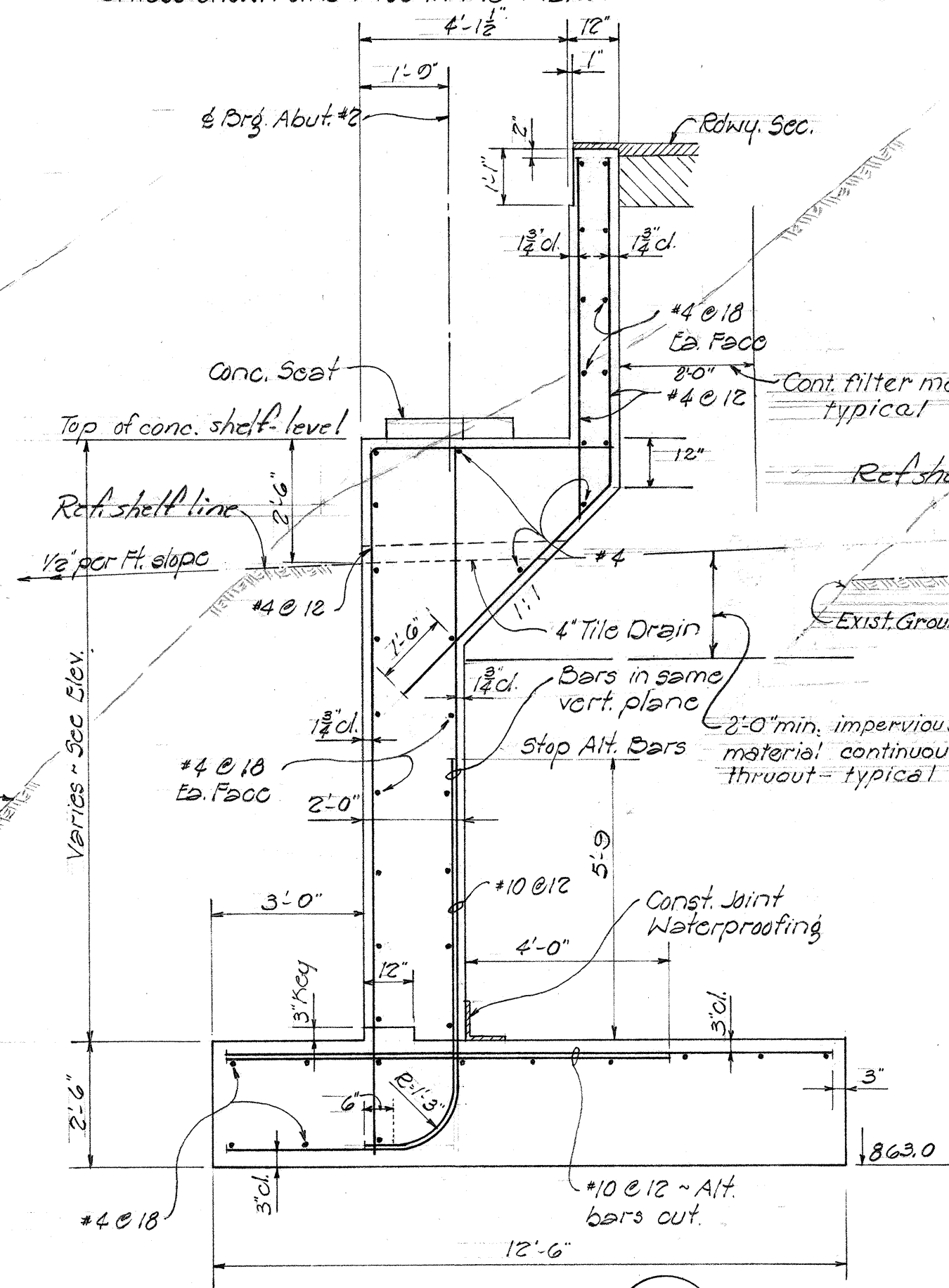
DESIGNED BY	DATE
DRAWN BY	10-14-59
CHECKED BY	10-14-59
QUANTITIES CHECKED BY	10-14-59
NOTE BOOK	
NO.	

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	25061-1(8)	1960	35	61

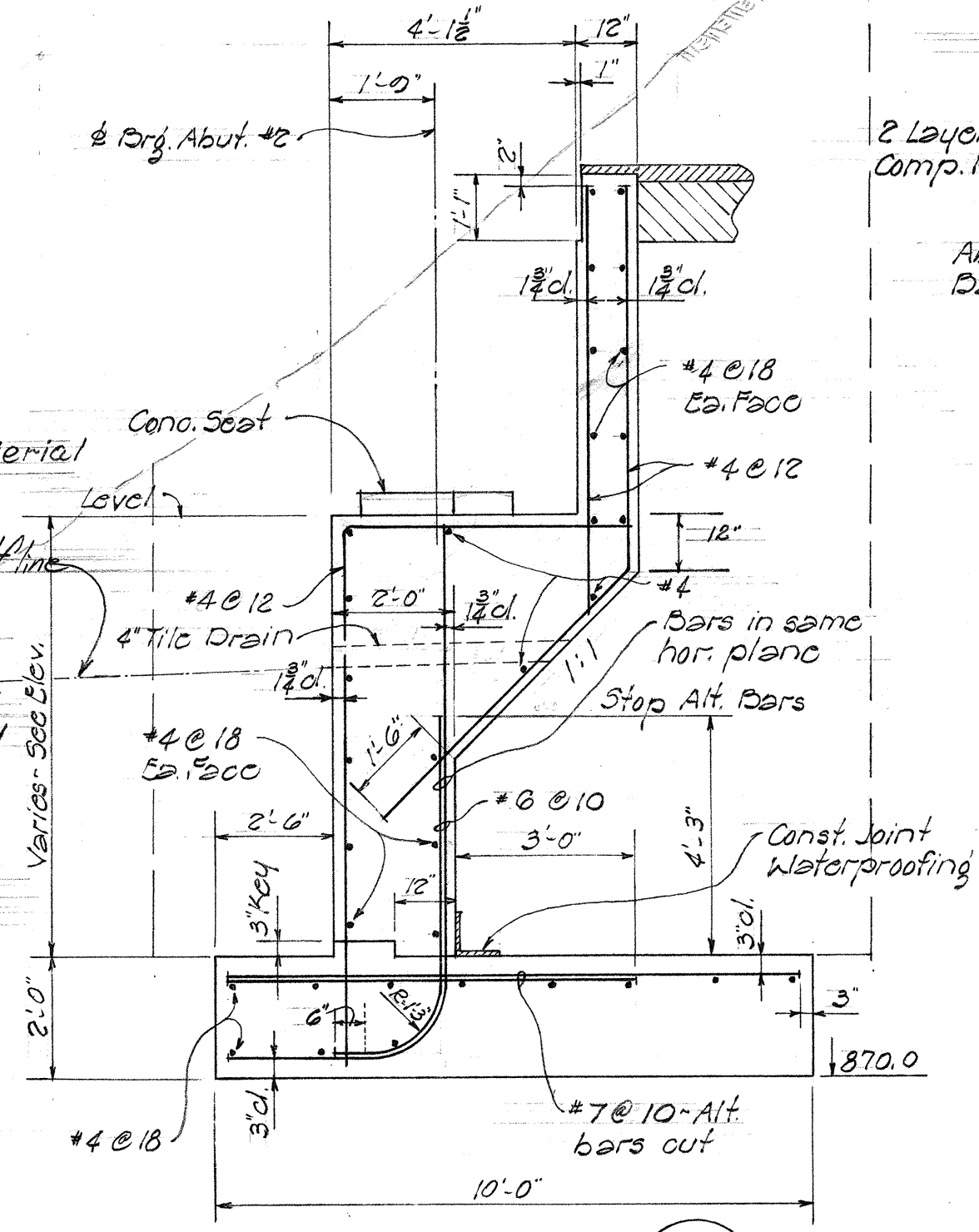
Note: For Abutment backfill see Typical Details on sheet #28 of 29. Unless shown otherwise in the Plans.



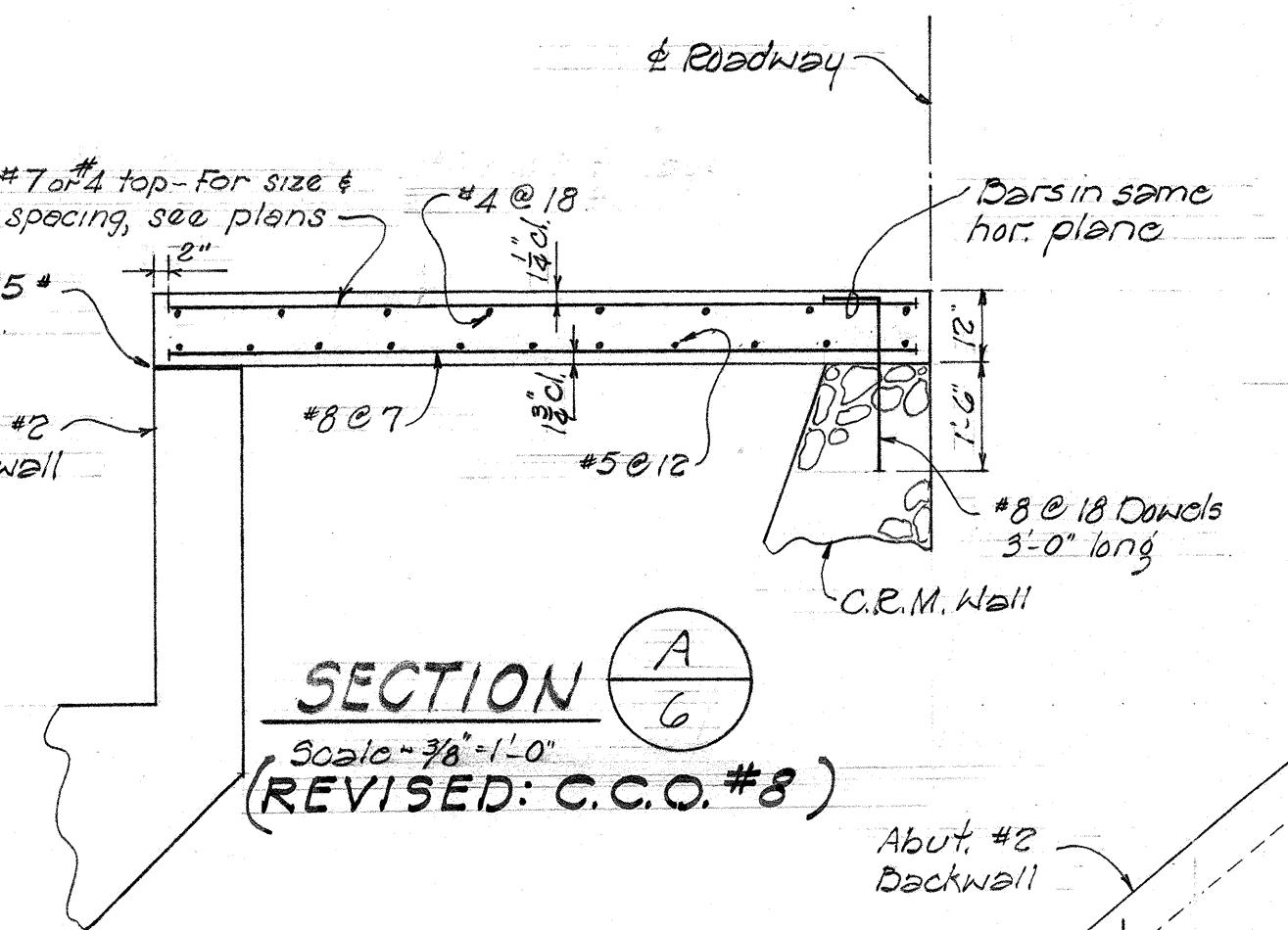
SECTION A/16 Scale 3/8" = 1'-0"
(TYPE "D" ABUT. SECTION)



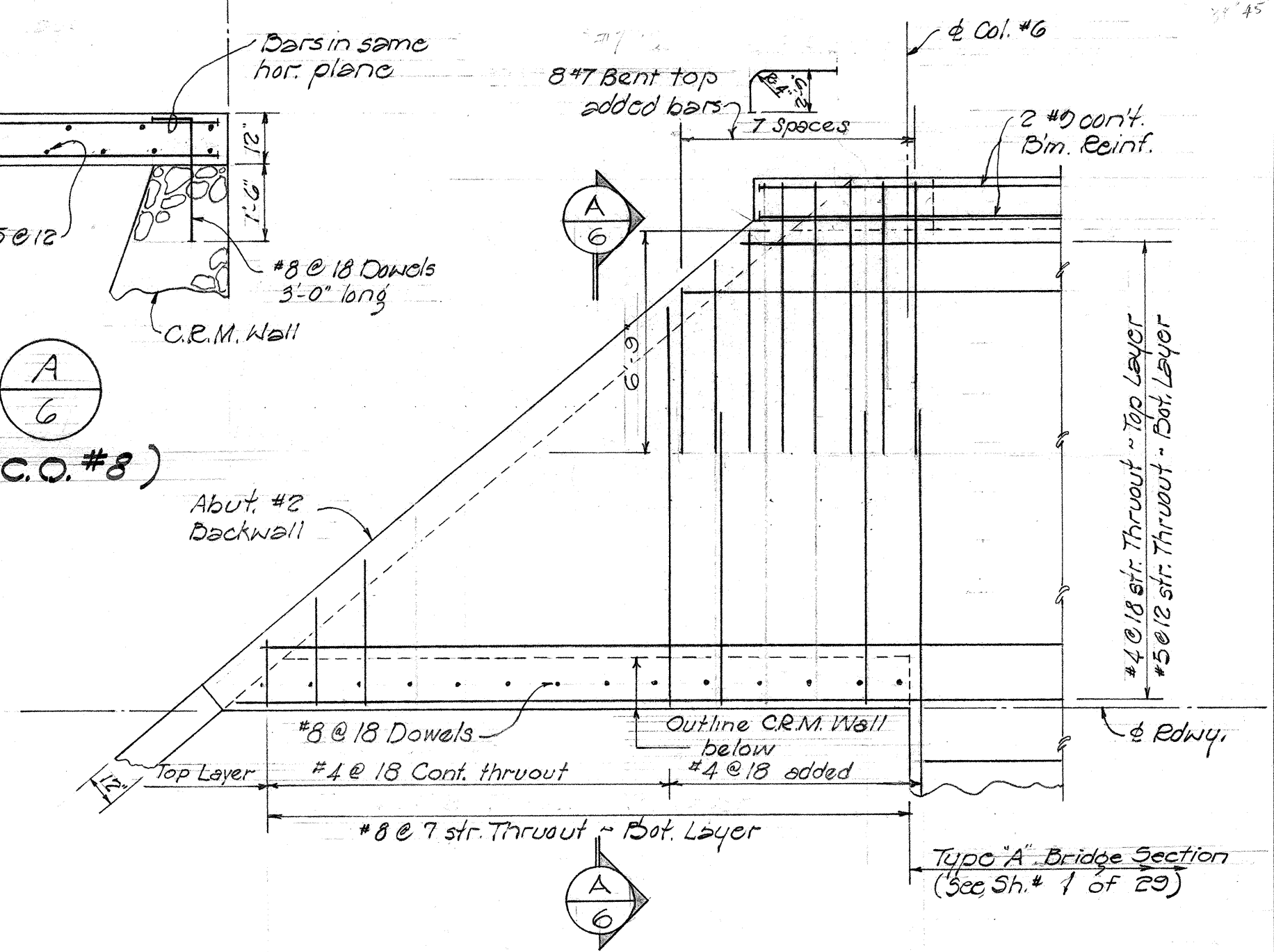
SECTION B/16 Scale 3/8" = 1'-0"
(TYPE "E" ABUT. SECTION)



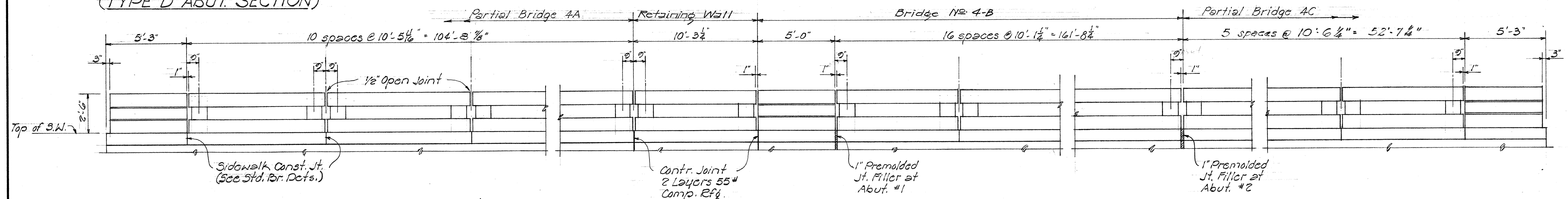
SECTION C/16 Scale 3/8" = 1'-0"
(TYPE "F" ABUT. SECTION)



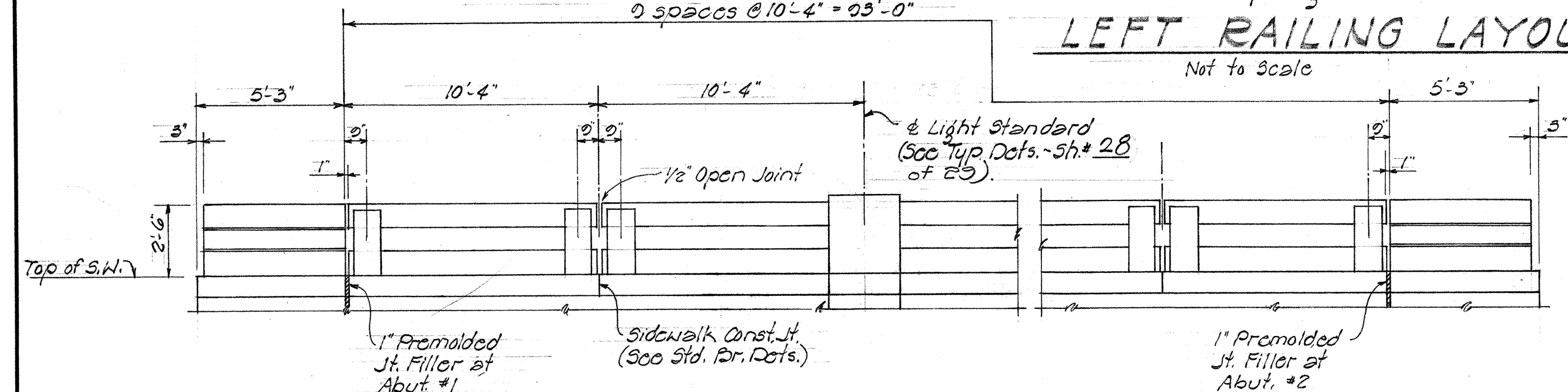
SECTION A/6 (REVISED: C.C.O. #8)
Scale 3/8" = 1'-0"



PART REINF. PLAN
(PARTIAL BRIDGE #4C AT ABUT.)
Scale 1/4" = 1'-0"



LEFT RAILING LAYOUT (LOOKING OUT)
Not to Scale



RIGHT RAILING LAYOUT (LOOKING IN)
Not to Scale

RAILING NOTE:
For rail, rail post and end post reinf. & details see Std. Bridge Details.
Rail post spacing shown are taken at inside face of railing.

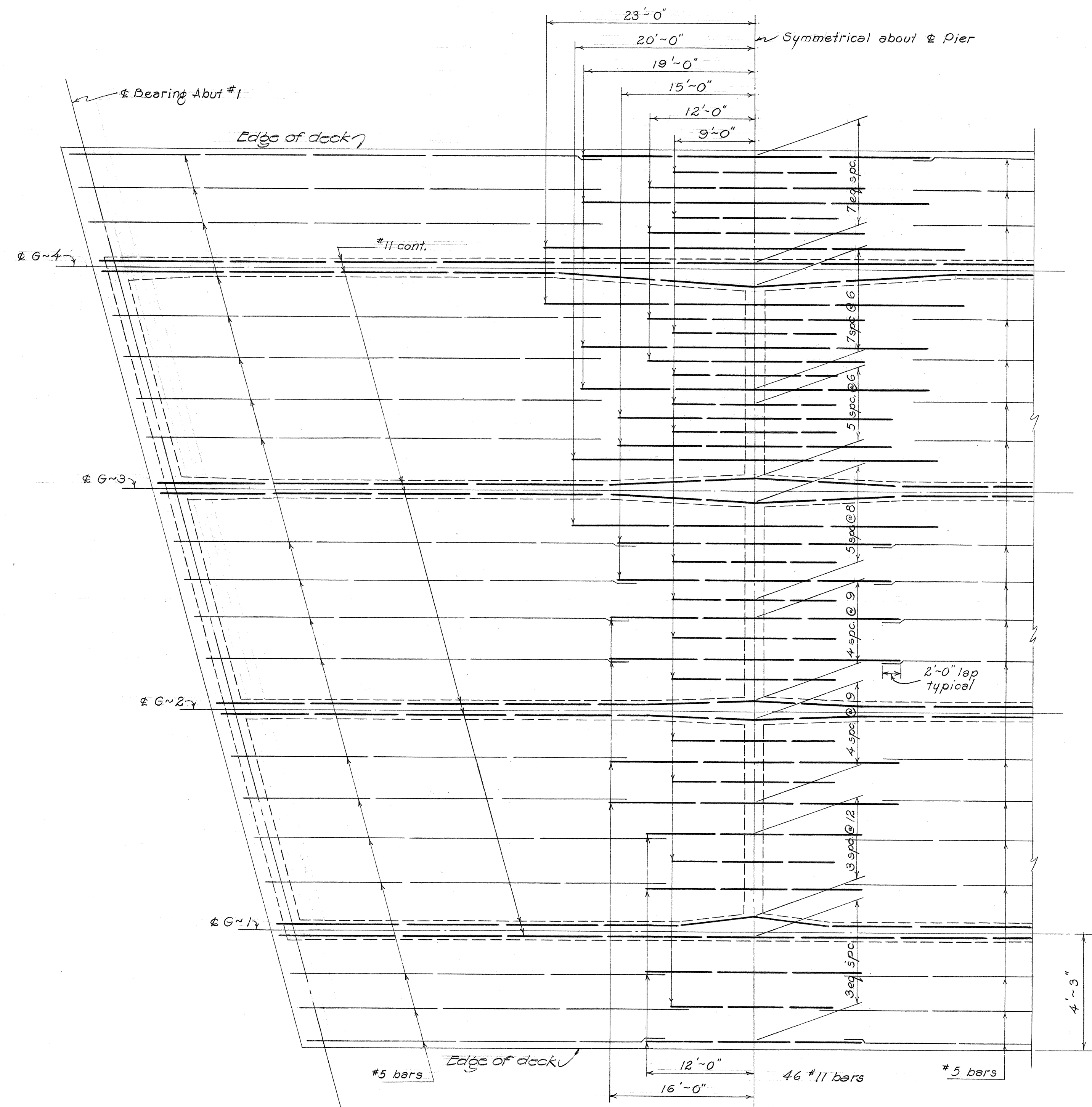
HAWAII STATE HIGHWAY DEPARTMENT				
STATE OF HAWAII				
PARTIAL BRIDGE NO. 4-A				
STA. 115+31.25 TO 120+50.75				
BRIDGE NO. 4-B				
STA. 120+84.51 TO 122+15.52				
PARTIAL BRIDGE NO. 4-C				
STA. 122+15.52 TO 122+80.75				
PALI HWY. OUTBOUND				
PROJ. NO. BF-061-1(8)				
Oct. 1959				

SHEET NO. 6 OF 20 SHEETS

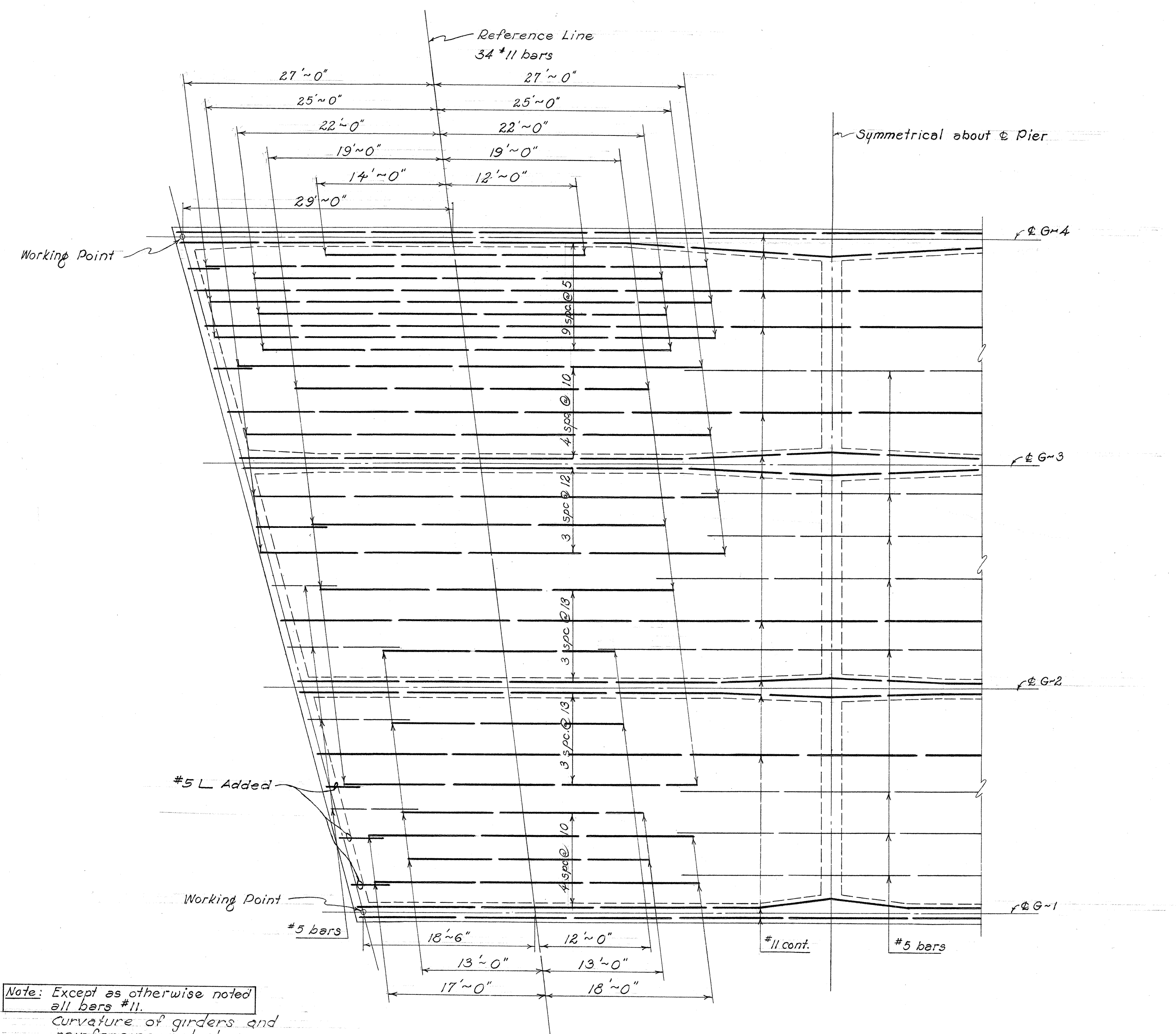
.8148.35

SURVEY PLANNED BY	DATE
DESIGNED BY	10/14/59
DRAWN BY	11
CHECKED BY	10/14/59
QUANTITIES CHECKED BY	11
NOTE BOOK	
No.	

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BF-061-1(8)	1960	36	61



PLAN
TOP SLAB TOP LAYER REINFORCING



PLAN
BOTTOM SLAB BOTTOM LAYER REINFORCING

Note: For superstructure details and reinforcements, see typical detail sheet # 27 of 29.

HAWAII STATE HIGHWAY DEPARTMENT
STATE OF HAWAII

BRIDGE #4B

STA. 120+84.51 - 122+15.52

PALI HWY-OUTBOUND

PROJ. NO BF-061-1(8)

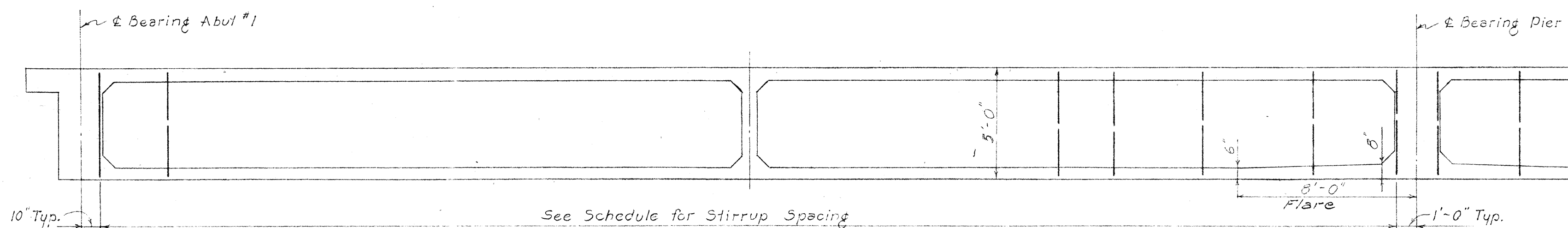
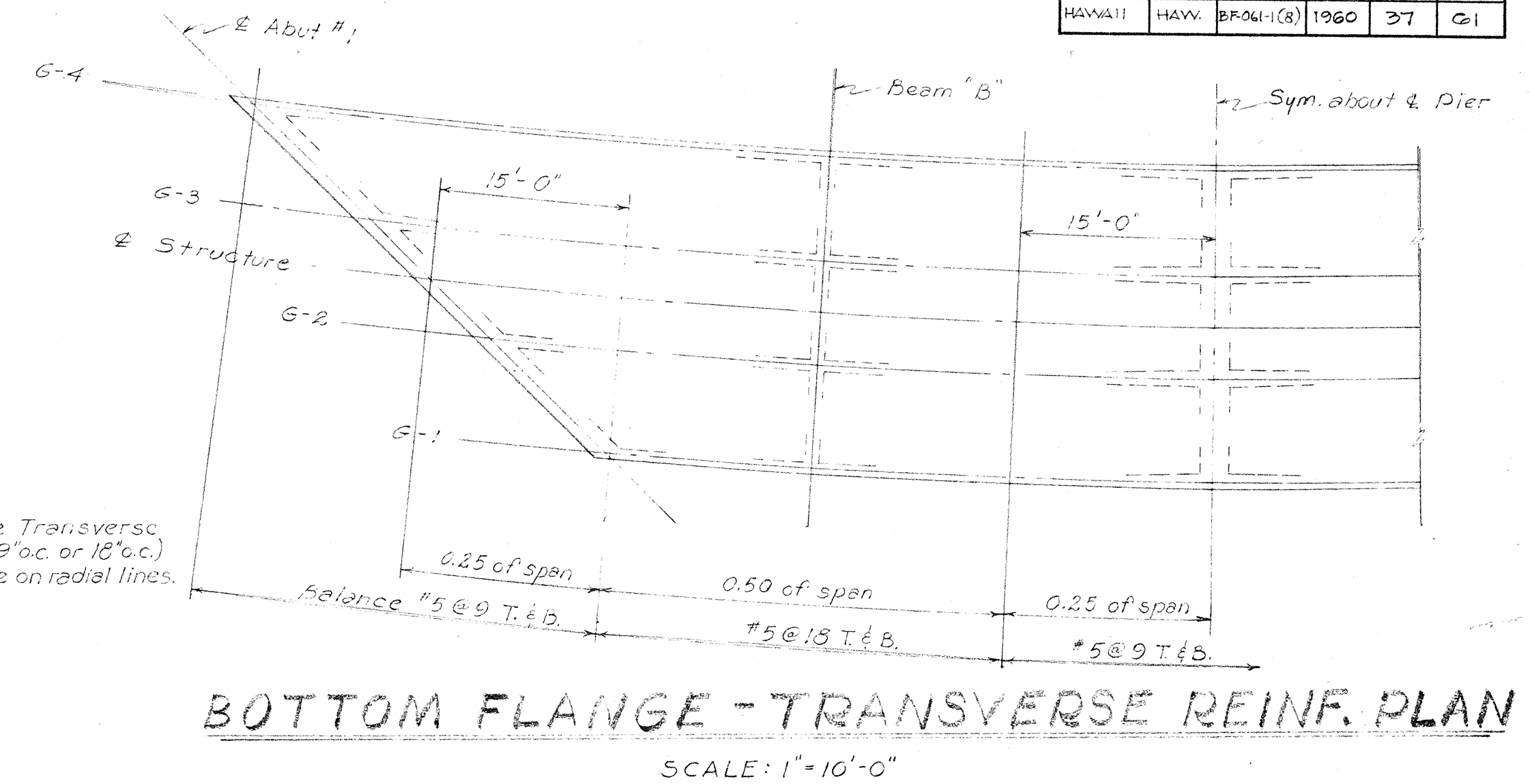
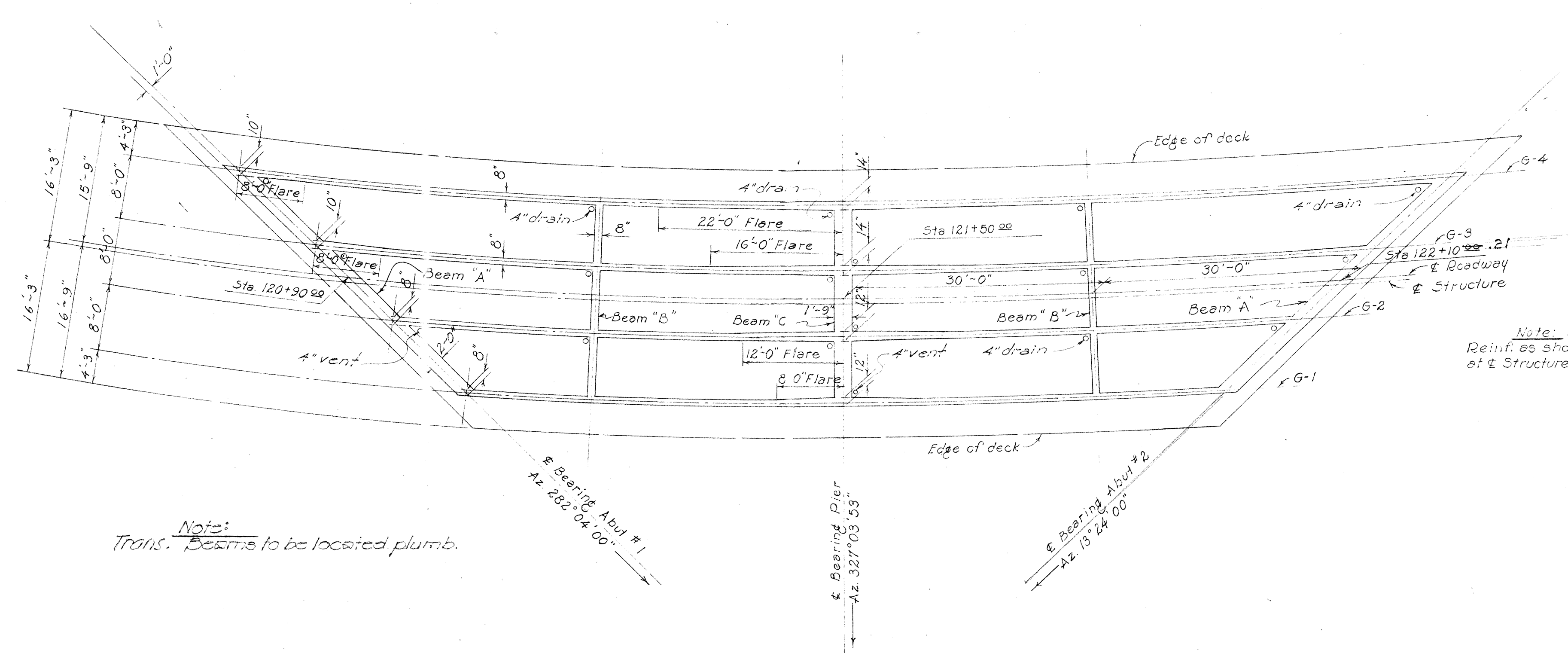
Oct. 1959

SHEET NO. 7 OF 29 SHEETS

.8148.36

BF-061-1(8)

DESIGNED BY	DATE
DRAWN BY	"
CHECKED BY	"
NOTED BY	"
QUANTITIES CHECKED BY	"
ORIGINAL PLAN	No.



Girder No.	Beam "A"	Beam "B"	Beam "C"	Fill	18" oc.	12" oc.	9" oc.	6" oc.	3" oc.	1'-0"
G-1	10' 4 @ 8" 3 @ 10" 2 @ 12" 2 @ 15"	10' 2 @ 9" 2 @ 12" 2 @ 15"	10' 4 @ 9" 3 @ 12" 2 @ 15"	10' 6 @ 9" 4 @ 12" 2 @ 15"	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	1'-0"
G-2	10' 2 @ 9" 2 @ 12" 2 @ 15"	10' 4 @ 9" 3 @ 12" 2 @ 15"	10' 6 @ 9" 4 @ 12" 2 @ 15"	10' 8 @ 9" 5 @ 12" 3 @ 15"	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	1'-0"
G-3	10' 4 @ 9" 3 @ 12" 2 @ 15"	10' 6 @ 9" 4 @ 12" 2 @ 15"	10' 8 @ 9" 5 @ 12" 3 @ 15"	10' 10 @ 9" 6 @ 12" 4 @ 15"	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	1'-0"
G-4	10' 6 @ 9" 4 @ 12" 2 @ 15"	10' 8 @ 9" 5 @ 12" 3 @ 15"	10' 10 @ 9" 6 @ 12" 4 @ 15"	10' 12 @ 9" 7 @ 12" 5 @ 15"	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	Fill 18" oc.	1'-0"

GIRDER STIRRUP SPACING SCHEDULE

HAWAII STATE HIGHWAY DEPARTMENT
STATE OF HAWAII

BRIDGE #4B
STA. 120+34.51 - 122+15.52
PALI HWY - OUTBOUND
PROJ. NO. B.F.-061-1(8)
Oct. 1959