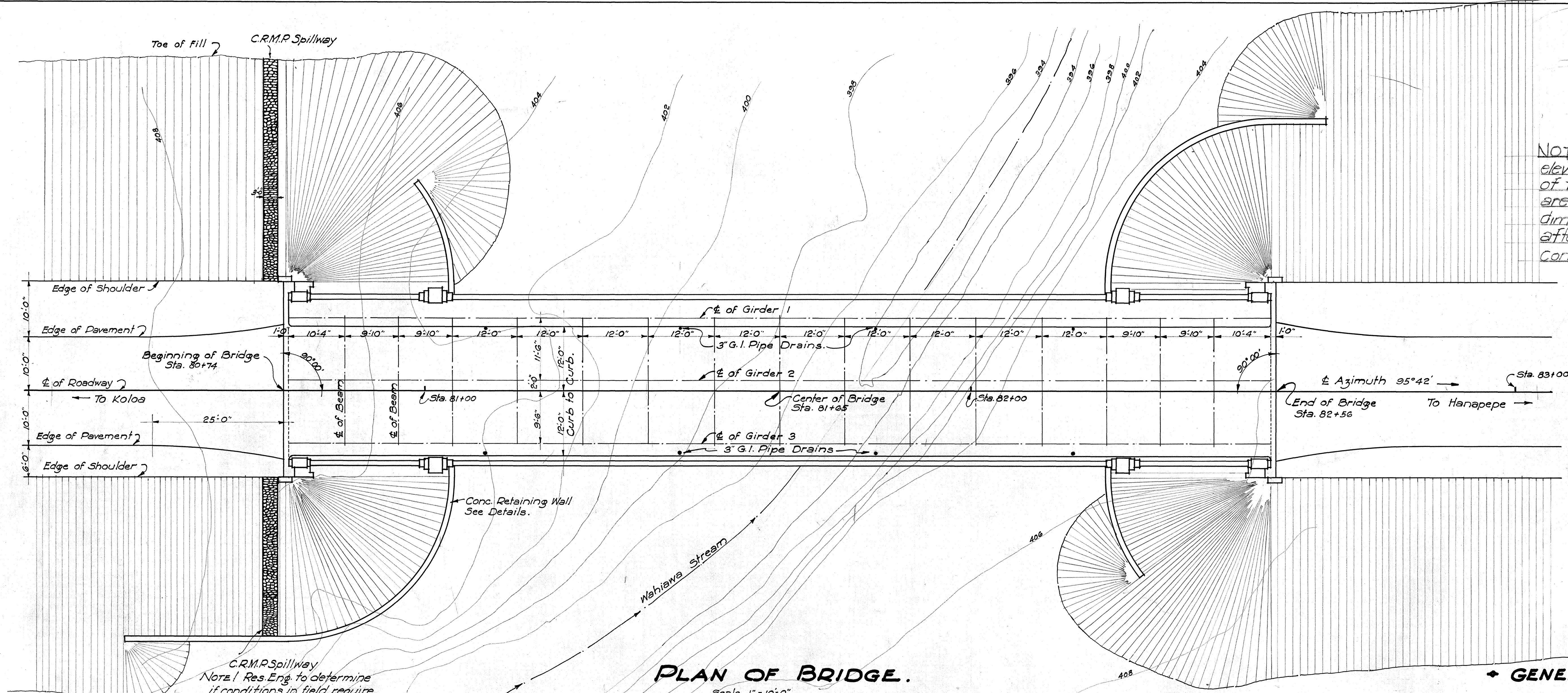




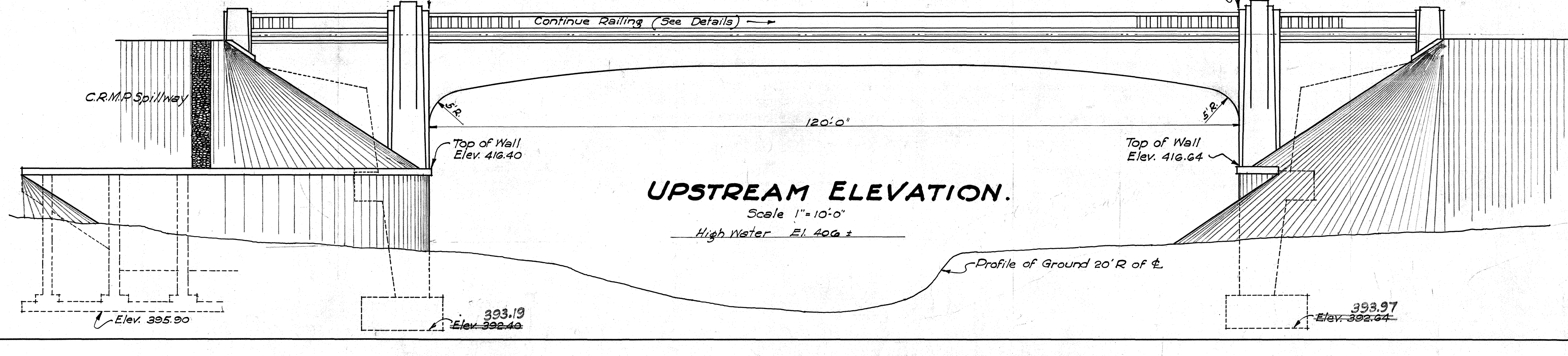
NOTE: Due to change in elevation of footings some of the vertical dimensions are incorrect. These dimensions will be changed after completion of the Contract.

PLAN OF BRIDGE.
Scale 1"=10'-0"

LOCATION	BRIDGE			WING WALLS		
	STR.	Exc.	CONCRETE REINF. STEEL	STR.	Exc.	CONCRETE REINF. STEEL
FOOTINGS	436.0 C.Y.	147.13	18214.0	624.0	91.67	6350.0
PILES & COL.		189.04	62,960.0		167.0	17567.0
SUPERSTR.		580.81	140,250.0			
RAILING		29.37	2844.0			
TOTAL	436.0 C.Y.	896.35 C.Y.	224,268.0 #	624.0 C.Y.	258.67 C.Y.	24,417.0 #

GENERAL NOTES

Dead Load: Concrete at 150# per cu. ft.
Live Load: Train of 15 ton trucks in two traffic lanes. Impact allowance $\frac{10}{\sqrt{L+25}}$.
Spacing of trucks as per diagram.
Concrete: Class A (1:2:4) with all exposed edges chamfered $\frac{3}{4}$ " unless otherwise noted. Allowable compression 650# per sq. inch.
Reinforcing Steel: Intermediate grade, allowable tensile stress 18,000# per sq. inch. All steel to be round or square deformed bars of approved design, square twisted bars not to be considered deformed. All dimensions relating to reinforcing are to centers of bars unless otherwise noted.
Where splicing of reinforcing is necessary, bars are to be lapped 40 diameters and splices are to be staggered. Regarding splicing of main longitudinal bars see below. No allowance will be made in the quantities for extra weight of steel required for splicing. Unless otherwise noted the minimum covering measured from the surface of concrete to the face of any steel shall be not less than $\frac{3}{4}$ " in abutments and abutment footings; 2" in beams, girders and handrails and $\frac{1}{4}$ " in slabs. Steel to be held rigidly & accurately in place before and during placing of concrete.
Splices: Splices are permitted in main bars exceeding trade lengths at points to be indicated by the Engineer, to be electrically arc welded using wedge cutbacks and $\frac{1}{8}$ " collars. Splices to test at least full strength.
Brush Coat Waterproofing: Remove all projections, cement film, dirt, etc. and apply waterproofing as specified. Waterproofing is incidental to the concrete used and will not be paid for separately.
Construction Joints: All construction joints to have surface roughened and 1:2 cement grout applied immediately before second pour.
Bottom construction joints to be at top of footing, top construction joints at bottom of girder haunches, railing construction joint to be at top of curb.



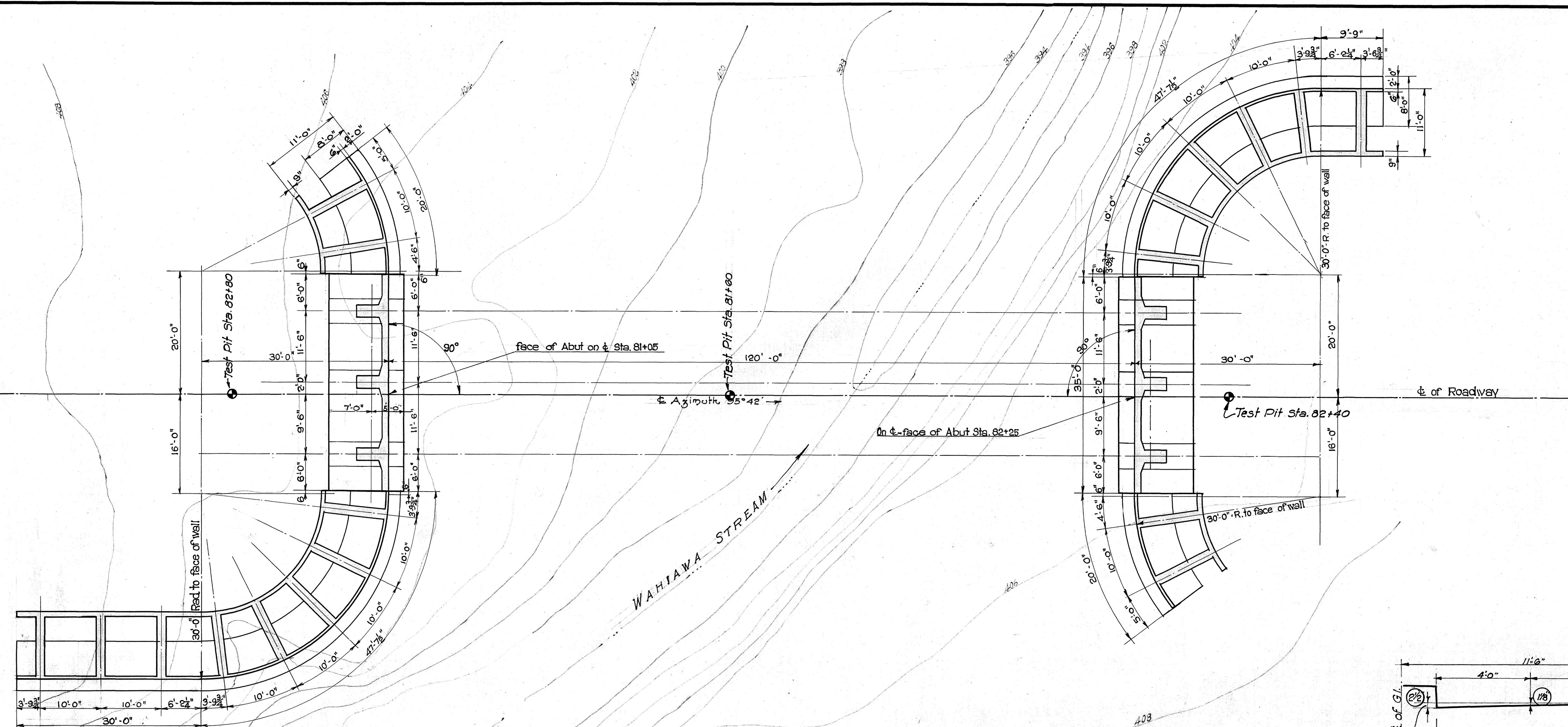
UPSTREAM ELEVATION.
Scale 1"=10'-0"
High Water El. 406 ±

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
WAHIAWA BRIDGE
NO. 6 STA. 80+74 TO STA. 82+56.
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 1 OF 17 SHEETS.

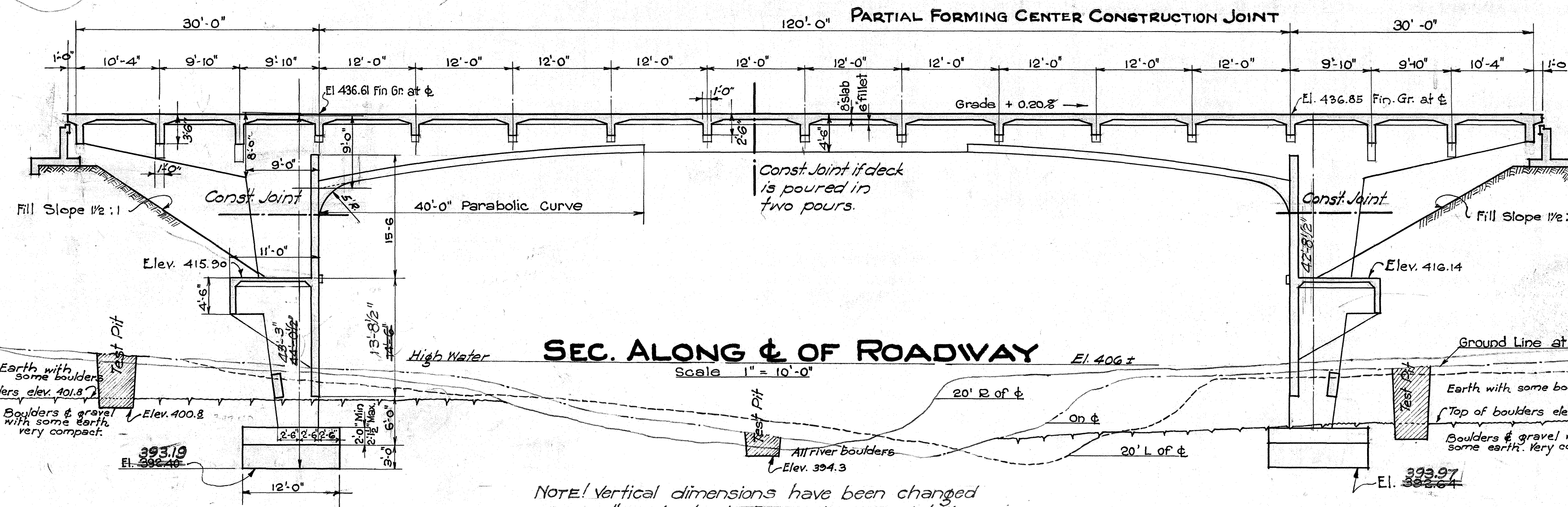
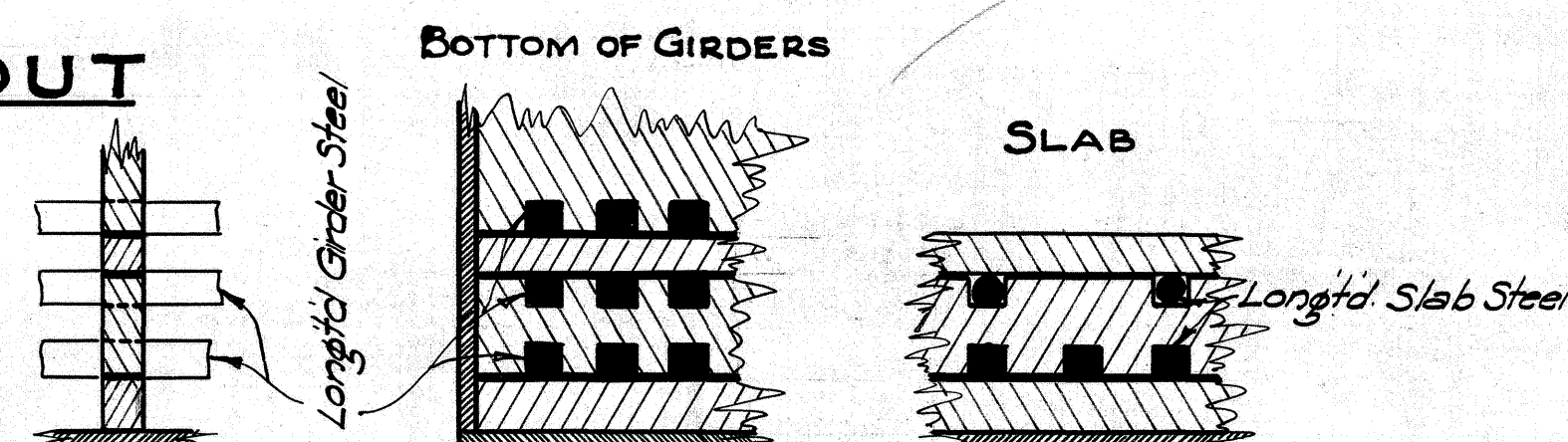
4333.9

DESIGNED BY: M. R. B. HAY
DRAWN BY: C. F. V. C. L. C. N.
CHECKED BY: S. R. B.
ORIGINAL PLAN
NOTE BOOK
No.

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	N.R.H. 12-D (1935)	1935	10	35



BRIDGE LAYOUT
Scale 1" = 10'-0"



SEC. ALONG C of ROADWAY
Scale 1" = 10'-0"

NOTE! Vertical dimensions have been changed on this sheet only. Dimensions on detail drawings have not been changed.

* TEST PIT NOTES *
No sign of any soft mud anywhere along the stream.

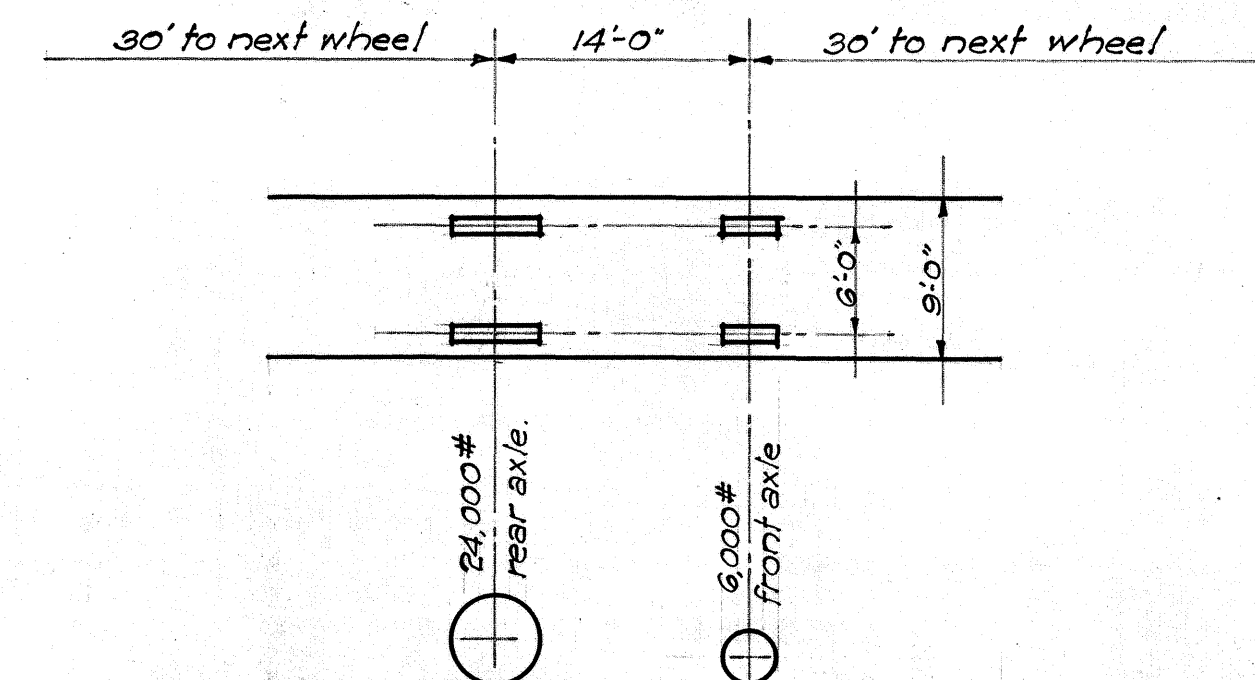
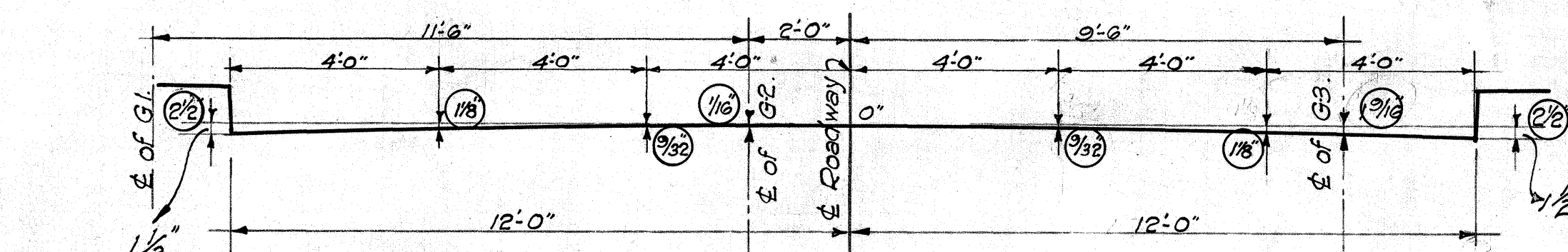


DIAGRAM OF TYPICAL 15 TON TRUCK.

Depressed "V" letters 3/8" deep
NAME **DATE**
Use correct name of stream Date of year built
LEFT HAND SIDE. RIGHT HAND SIDE.

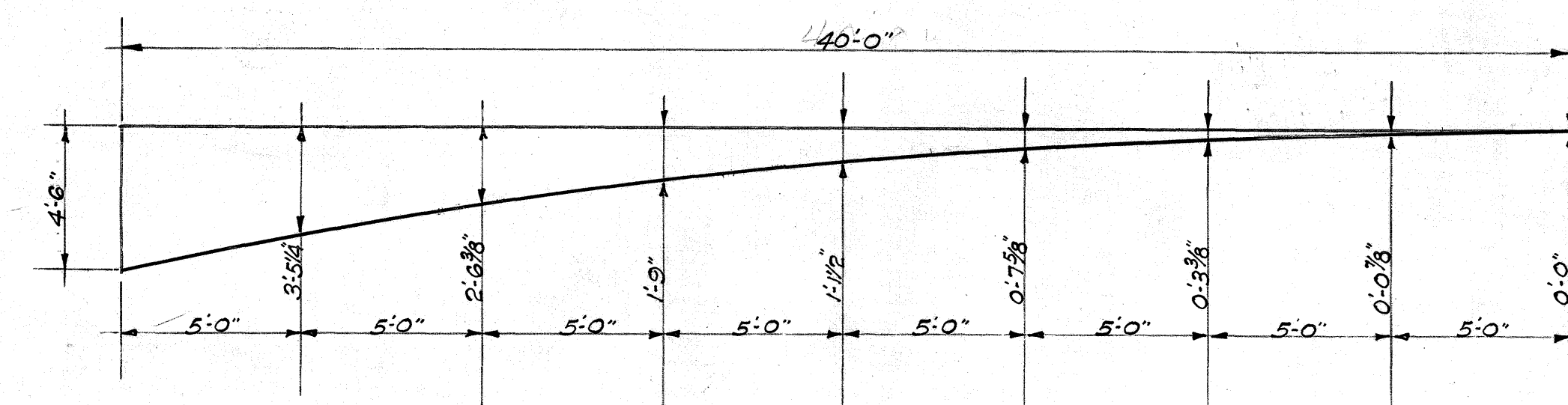
DETAIL OF LETTERS & FIGURES AT BOTH APPROACHES.

NOTE! Name of stream to be placed in left end post panels & date in right end post panels on entering bridge using standard block letters 3" in height.



NOTE: Crown ordinates changed. See Sheet 4333.2.

BRIDGE CROWN ORDINATES.
3/8" Scale.

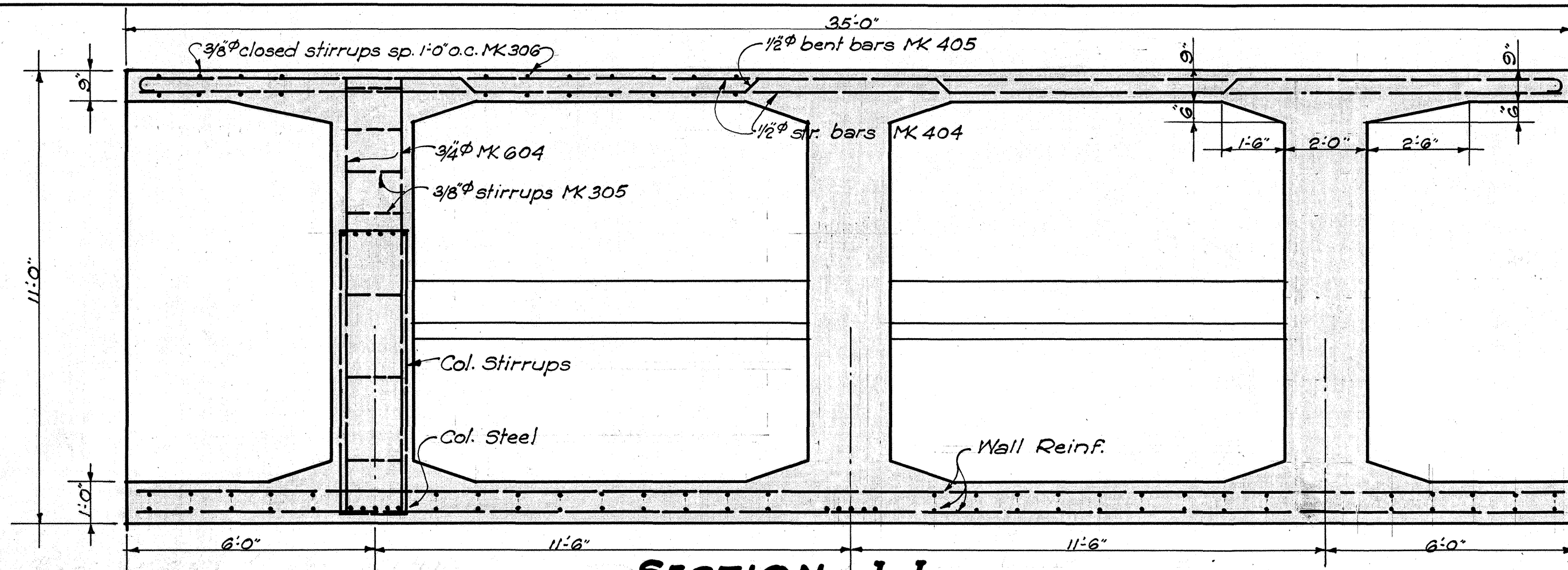


GIRDER HAUNCH ORDINATES.

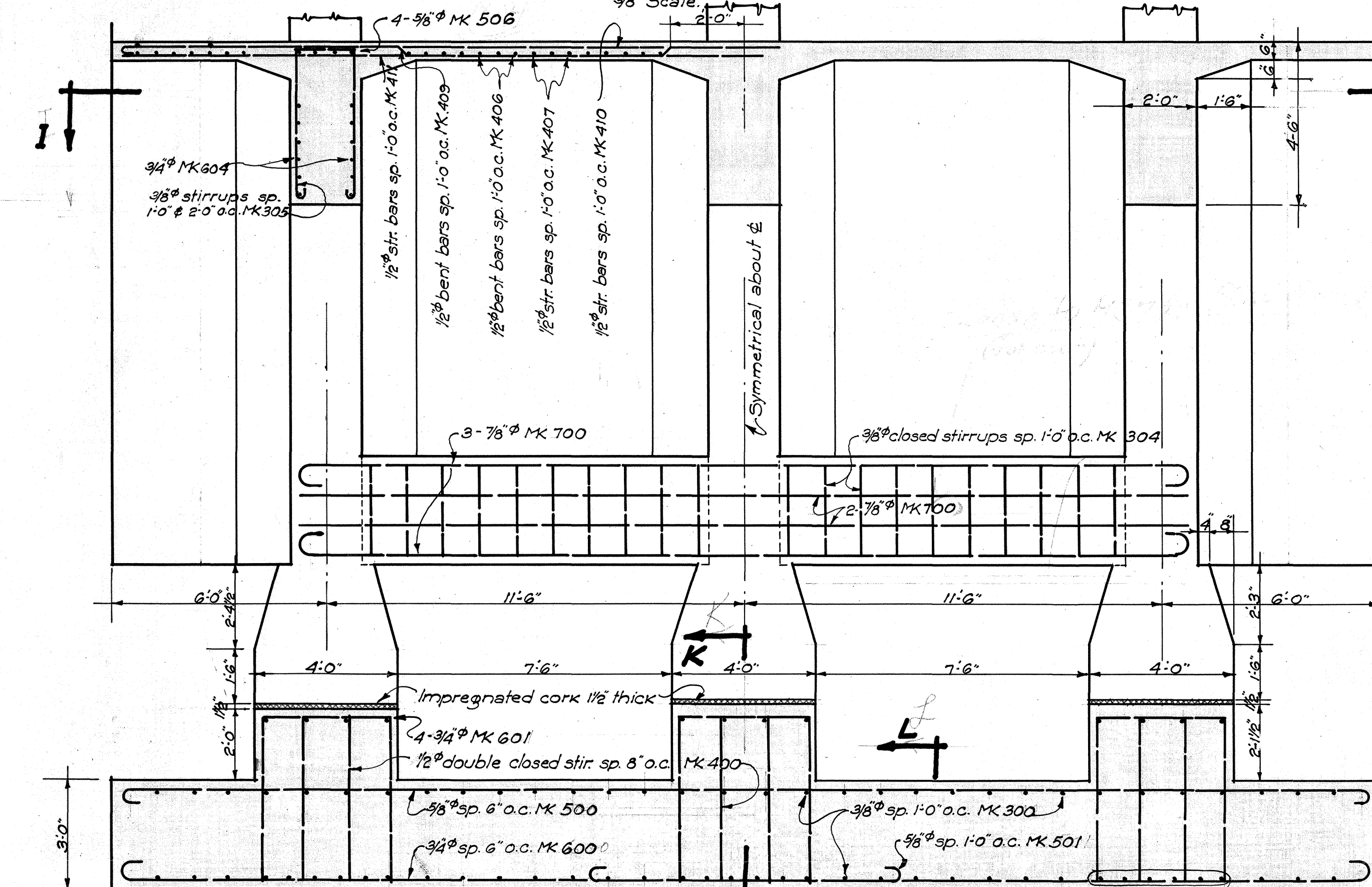
TERRITORIAL HIGHWAY DEPARTMENT
TERRITORY OF HAWAII.
WAHIAWA BRIDGE.
No. 6 STA. 80+74 TO STA. 82+56.
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 2 OF 17 SHEETS.

4333.10

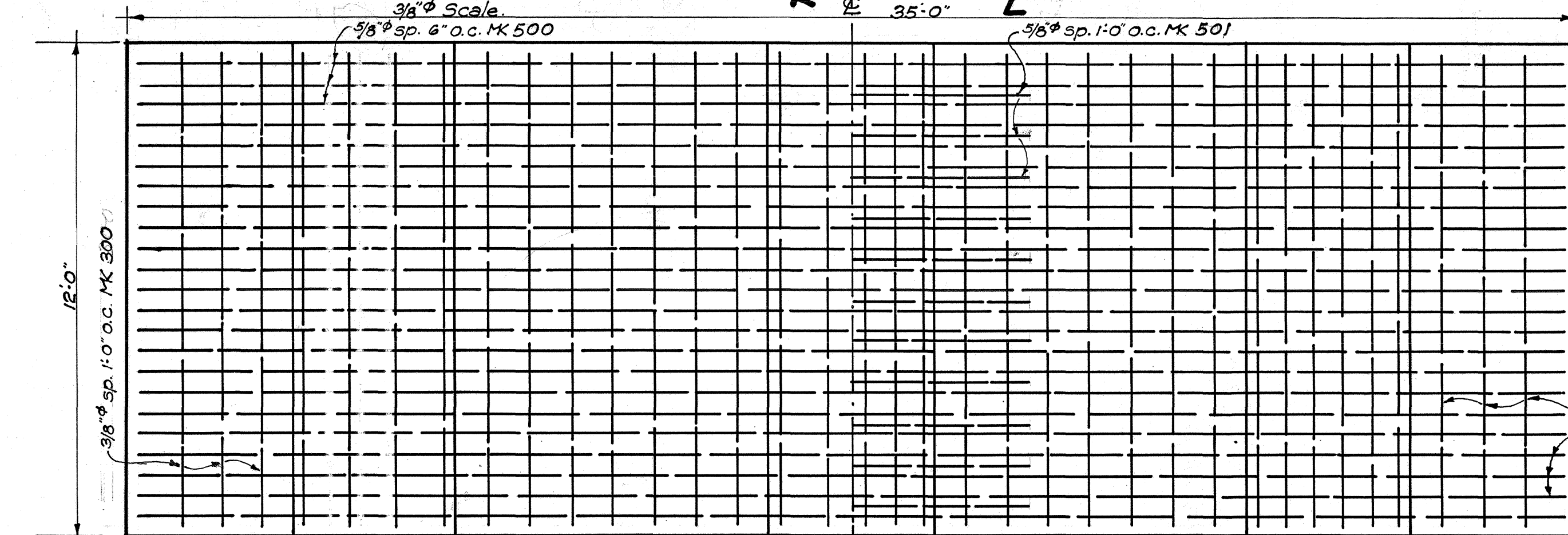
DESIGNED BY M.E.B. Mar. 1935
DRAWN BY G.E.V. Apr.
CHECKED BY S.R.B. May
NOTED BY S.R.B. May
No.



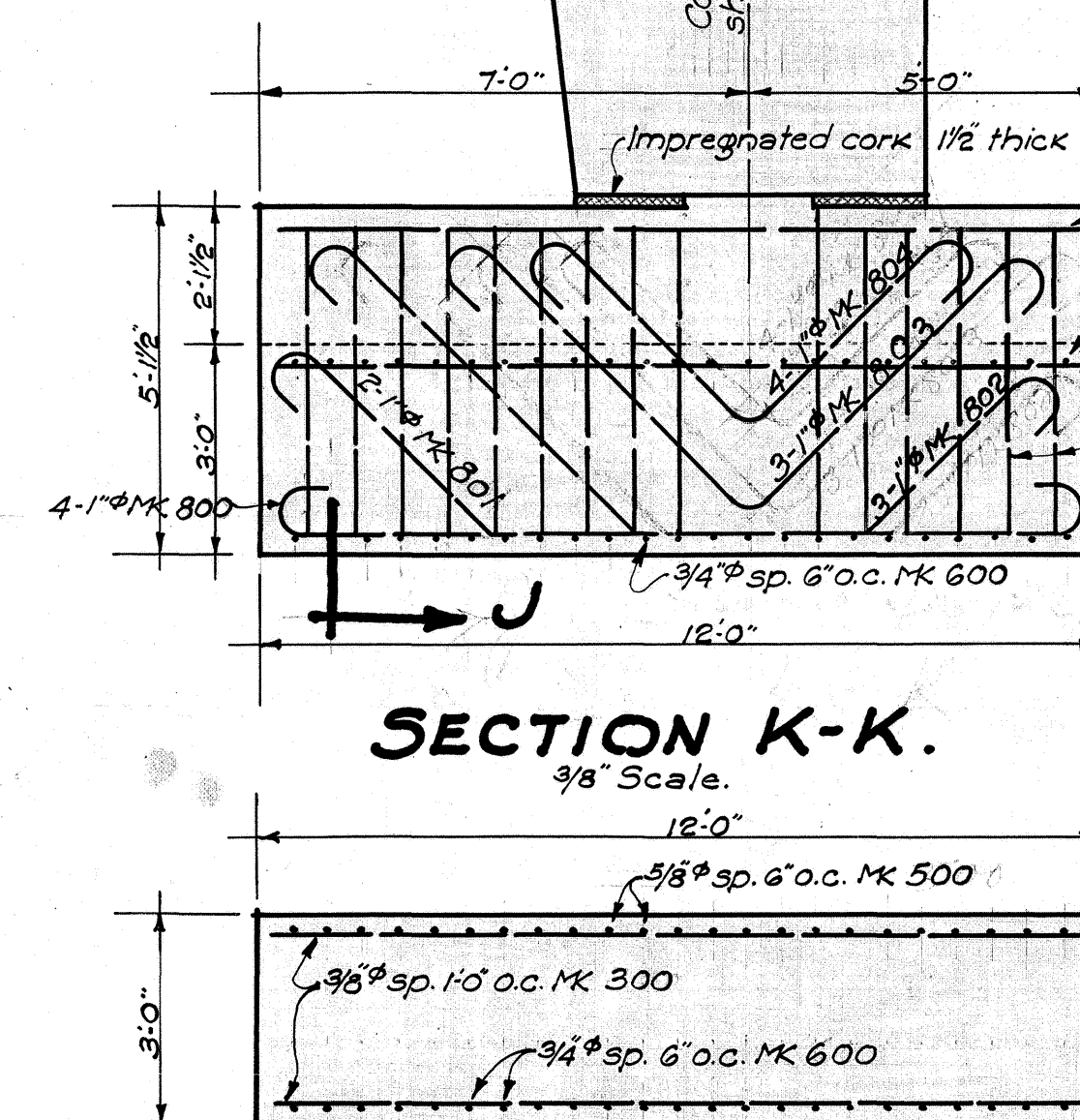
SECTION I-I.
3/8" Scale.



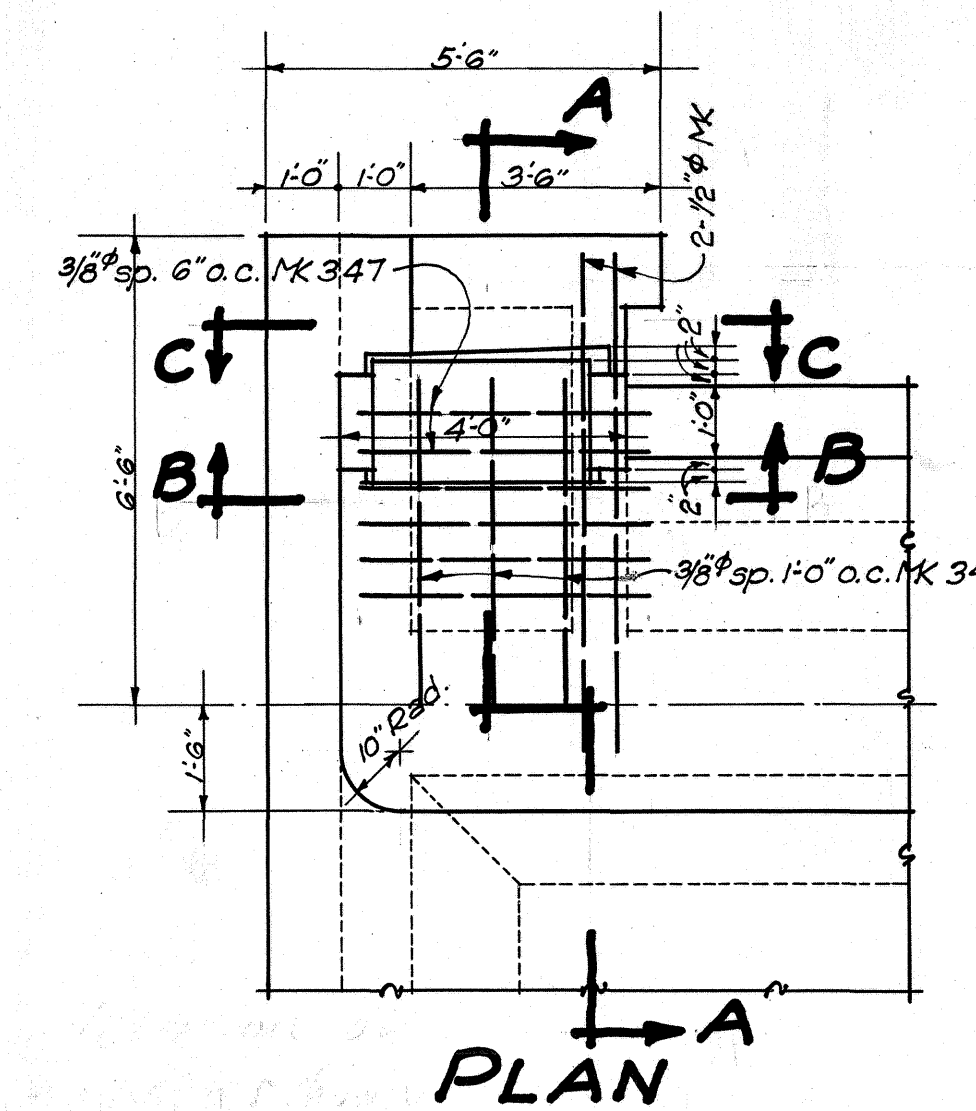
SECTION J-J.
3/8" Scale.



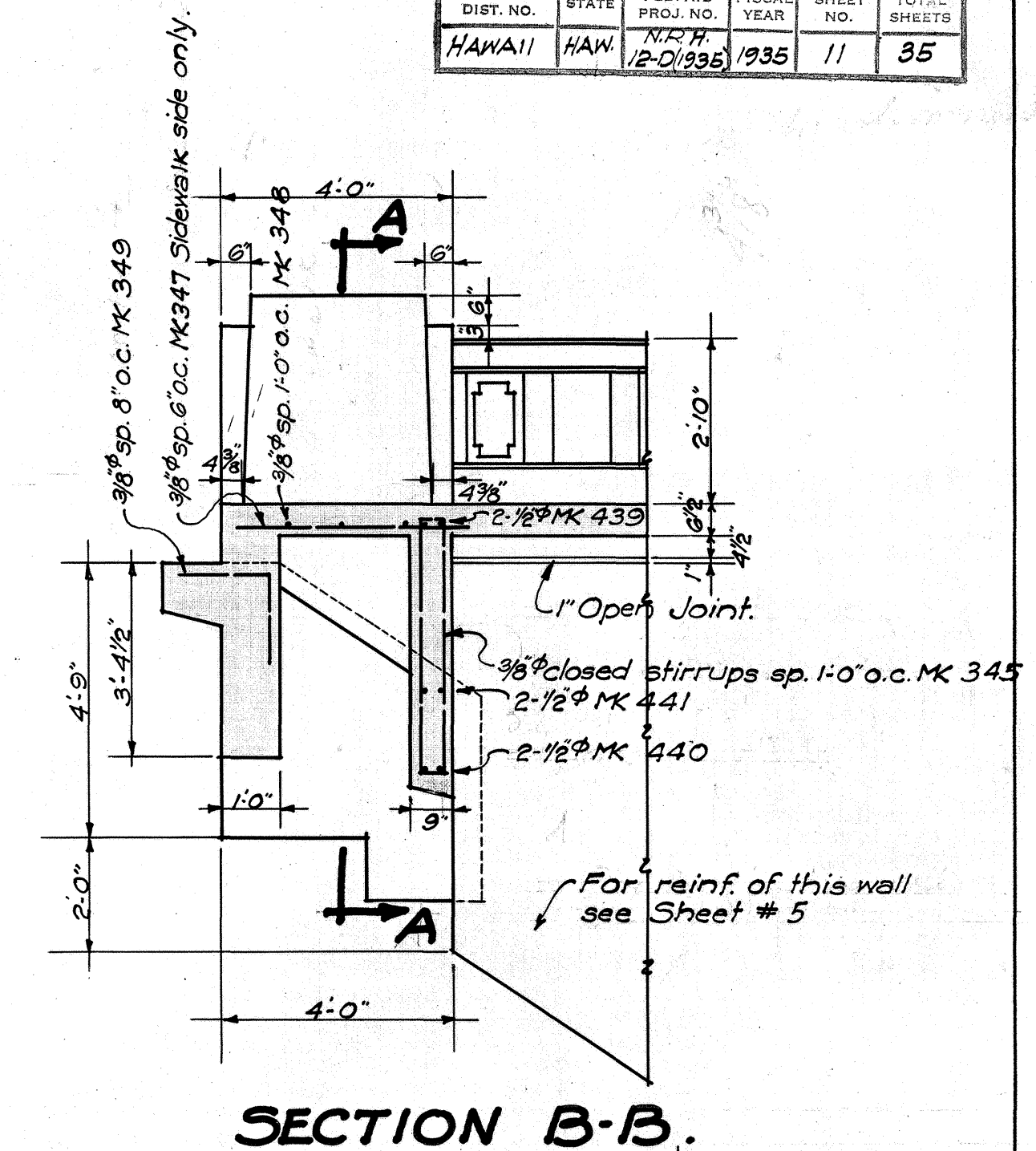
SECTION K-K.
3/8" Scale.



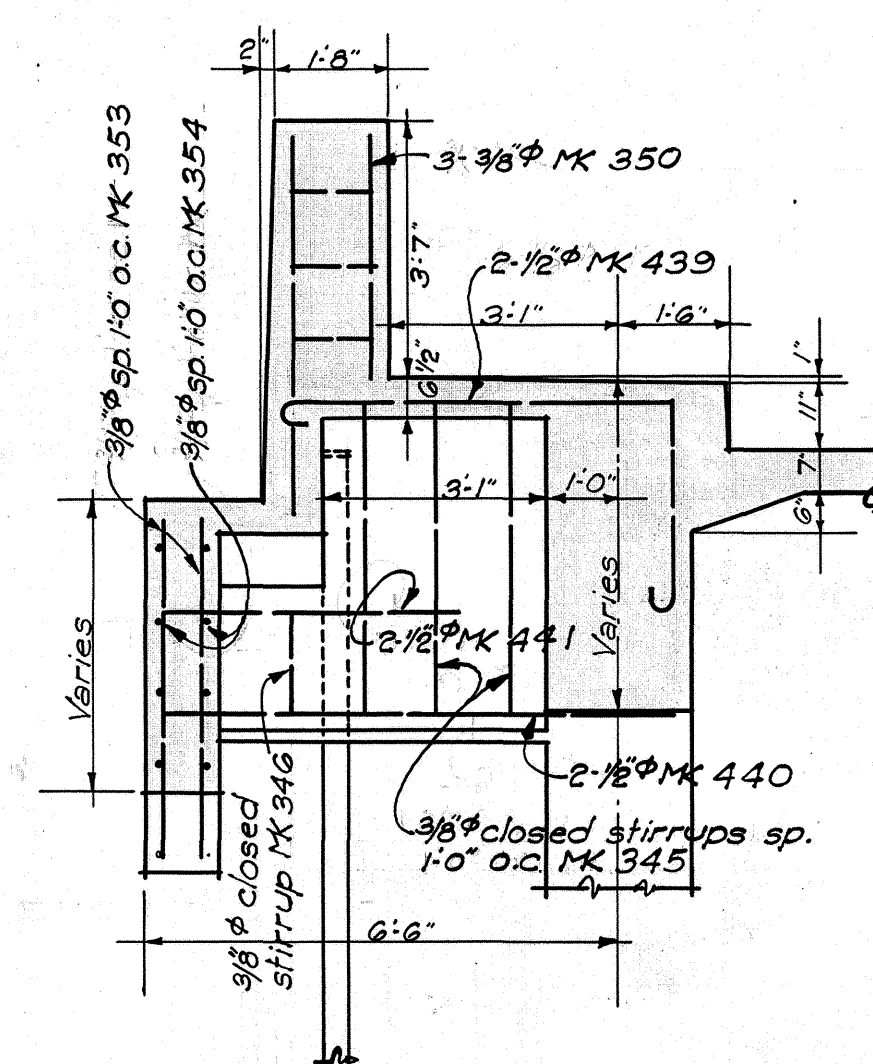
SECTION L-L.
3/8" Scale.



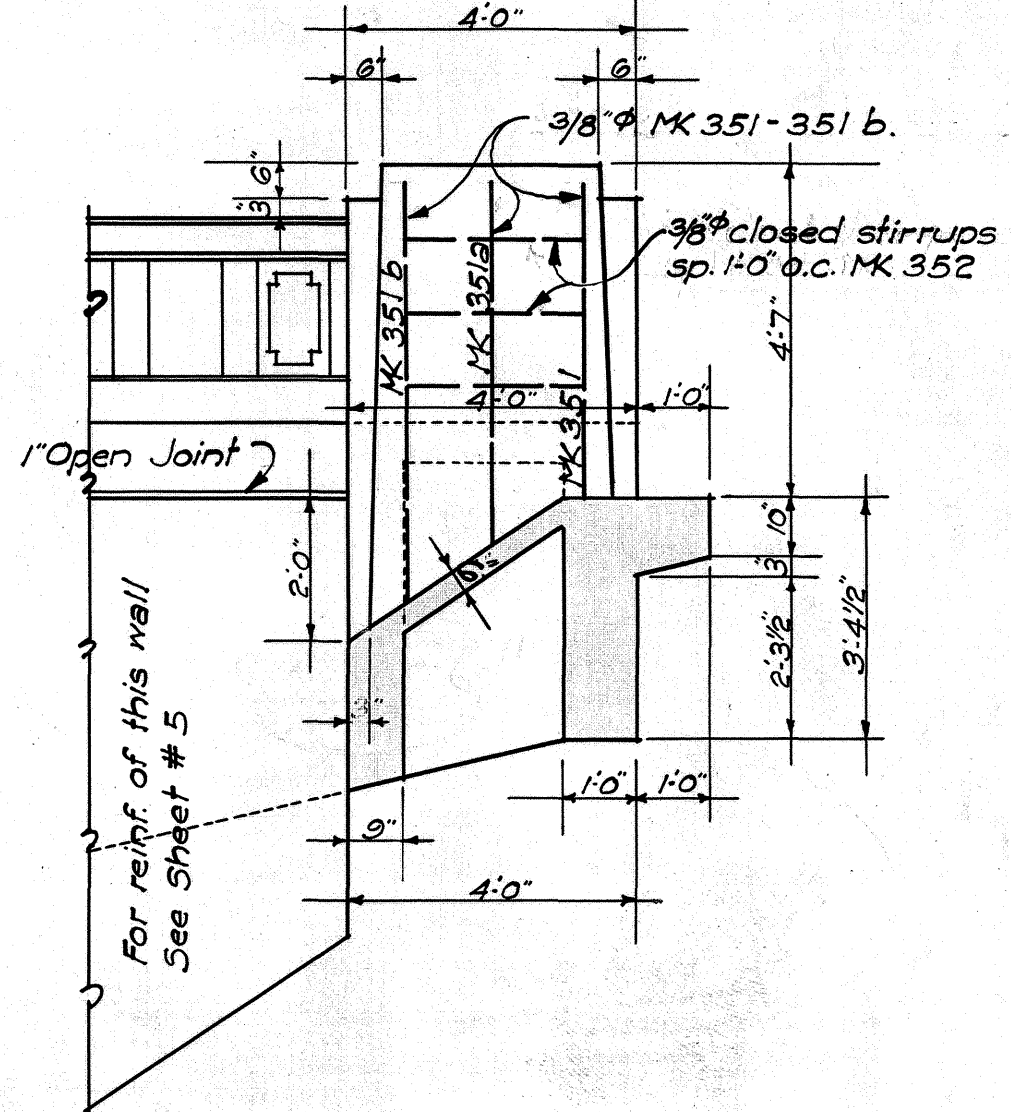
PLAN



SECTION B-B.

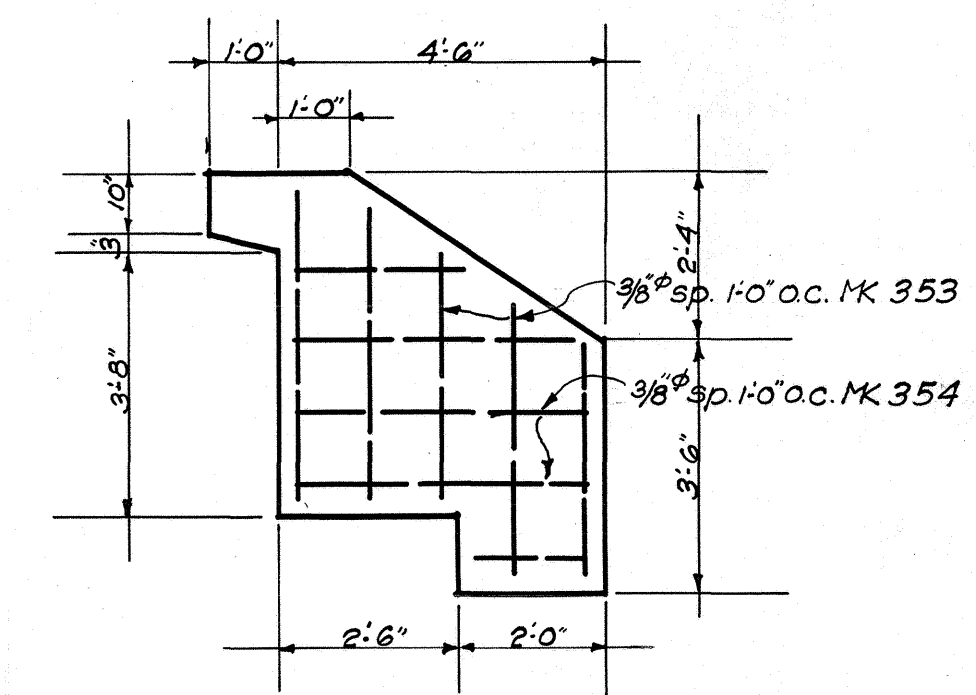


SECTION A-A.



SECTION C-C.

END POST DETAILS - SIDEWALK SIDE.



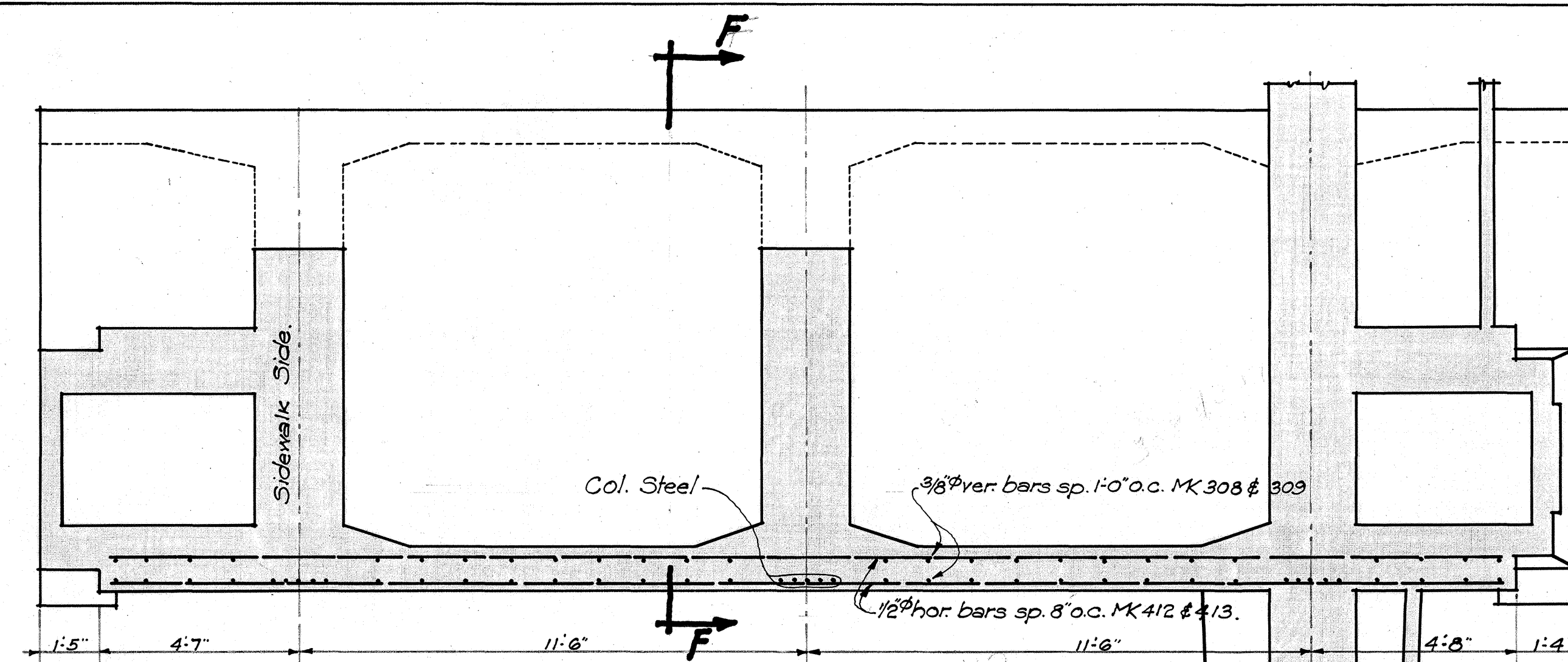
CURTAIN WALL DETAIL.

HALF TOP REINF. HALF BOTTOM REINF.

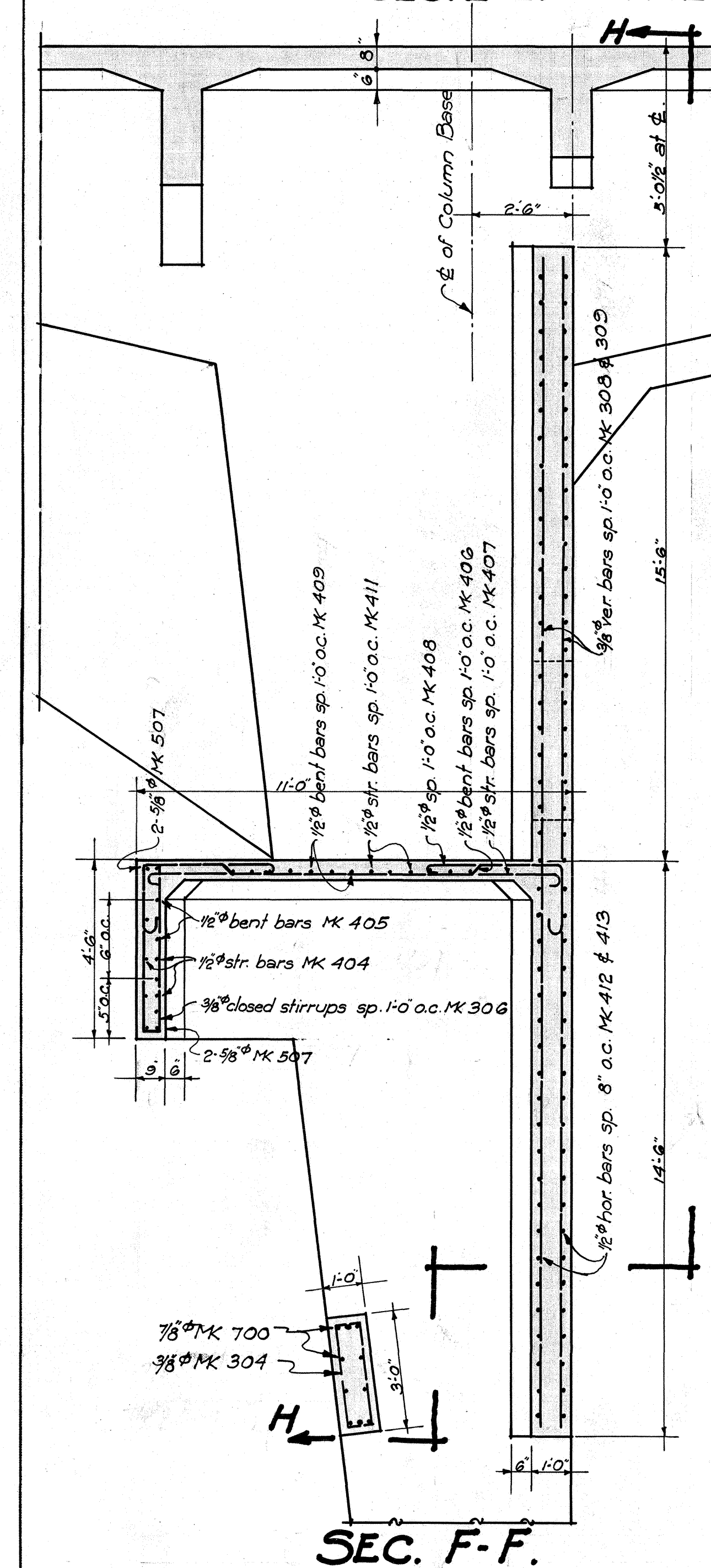
FOOTING REINFORCING.
3/8" Scale.

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
WAHIAWA BRIDGE.
NO. 6 STA. 80+14 TO STA. 82+56.
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 3 OF 17 SHEETS.

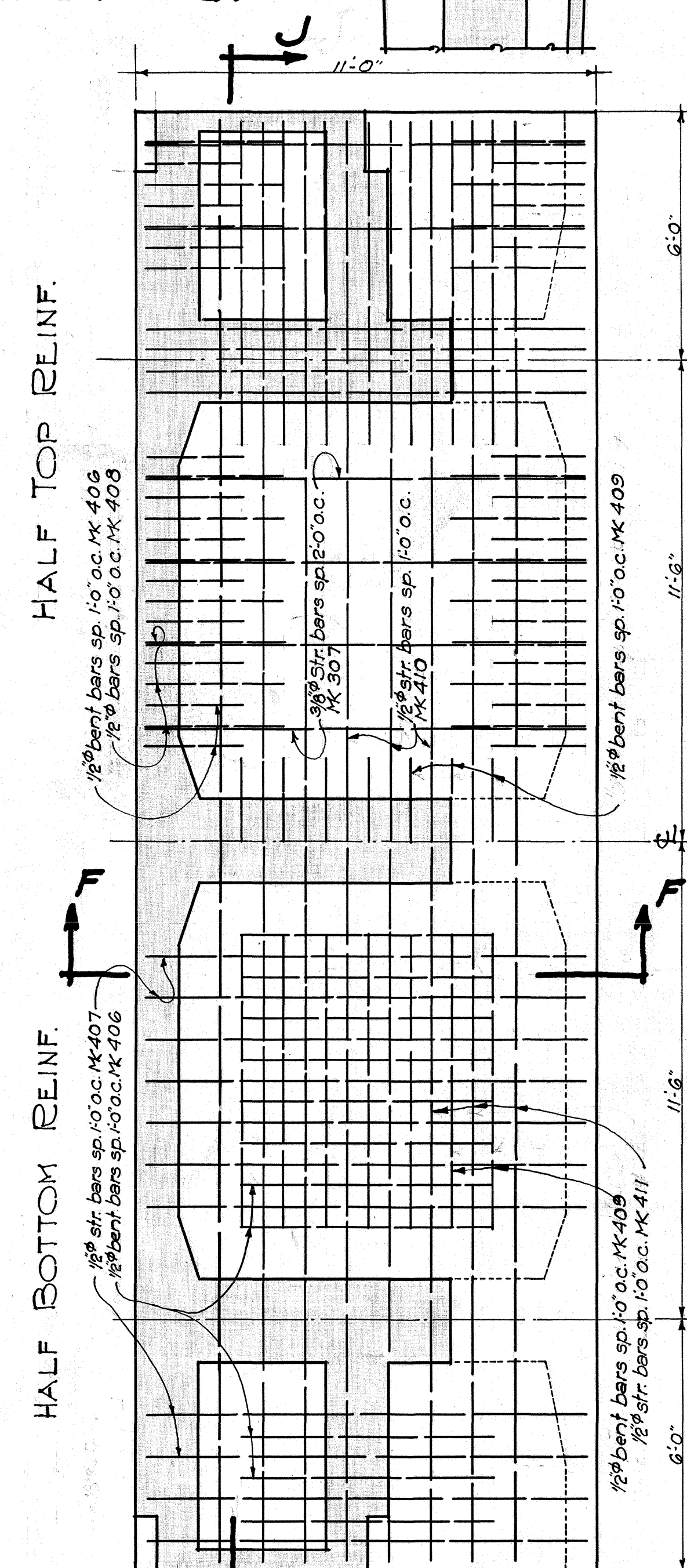
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	N.R.H. 12-0(1935)	1935	12	35



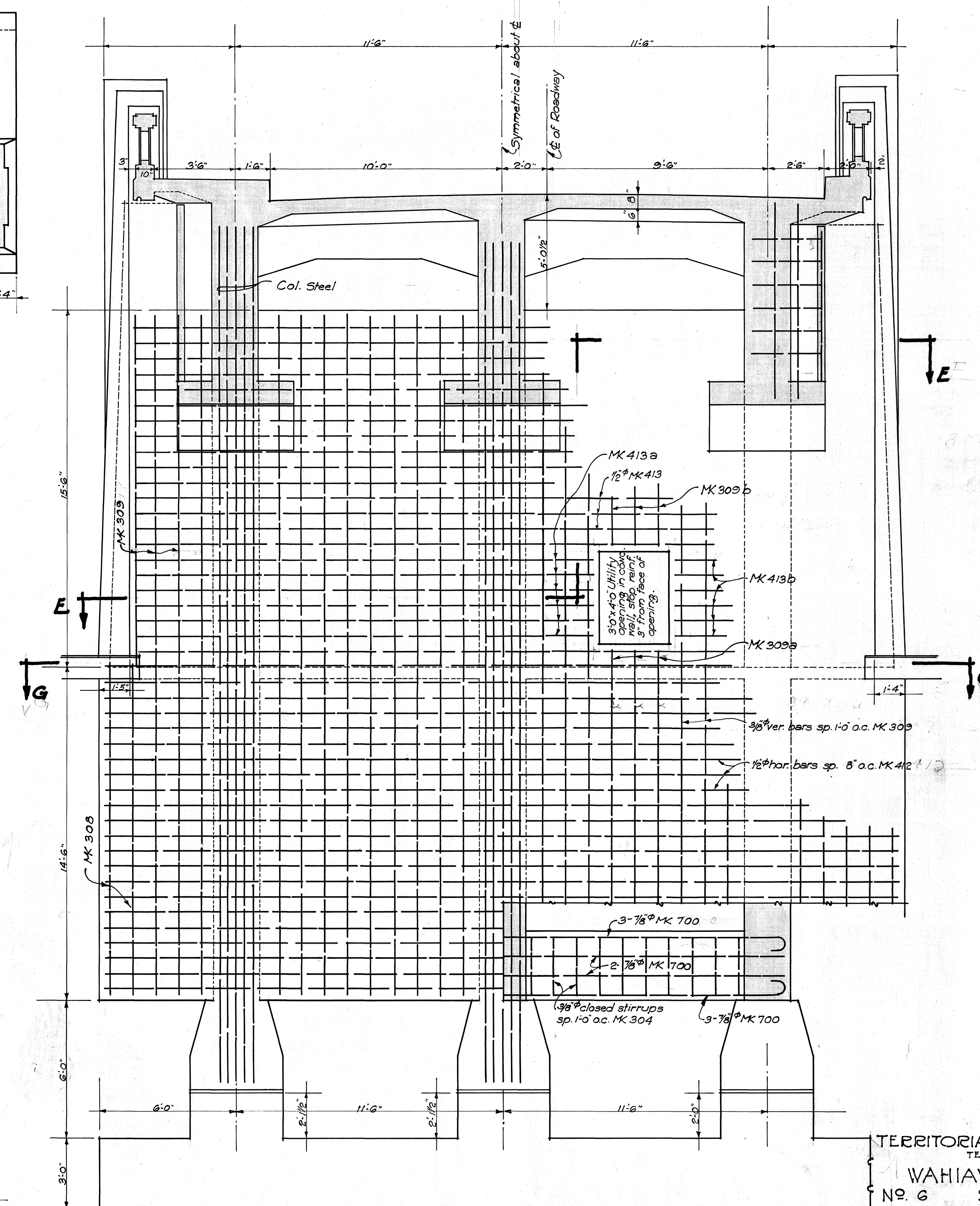
SEC. E-E. WALL REINFORCING.



SEC. F-F.



SEC. G-G.

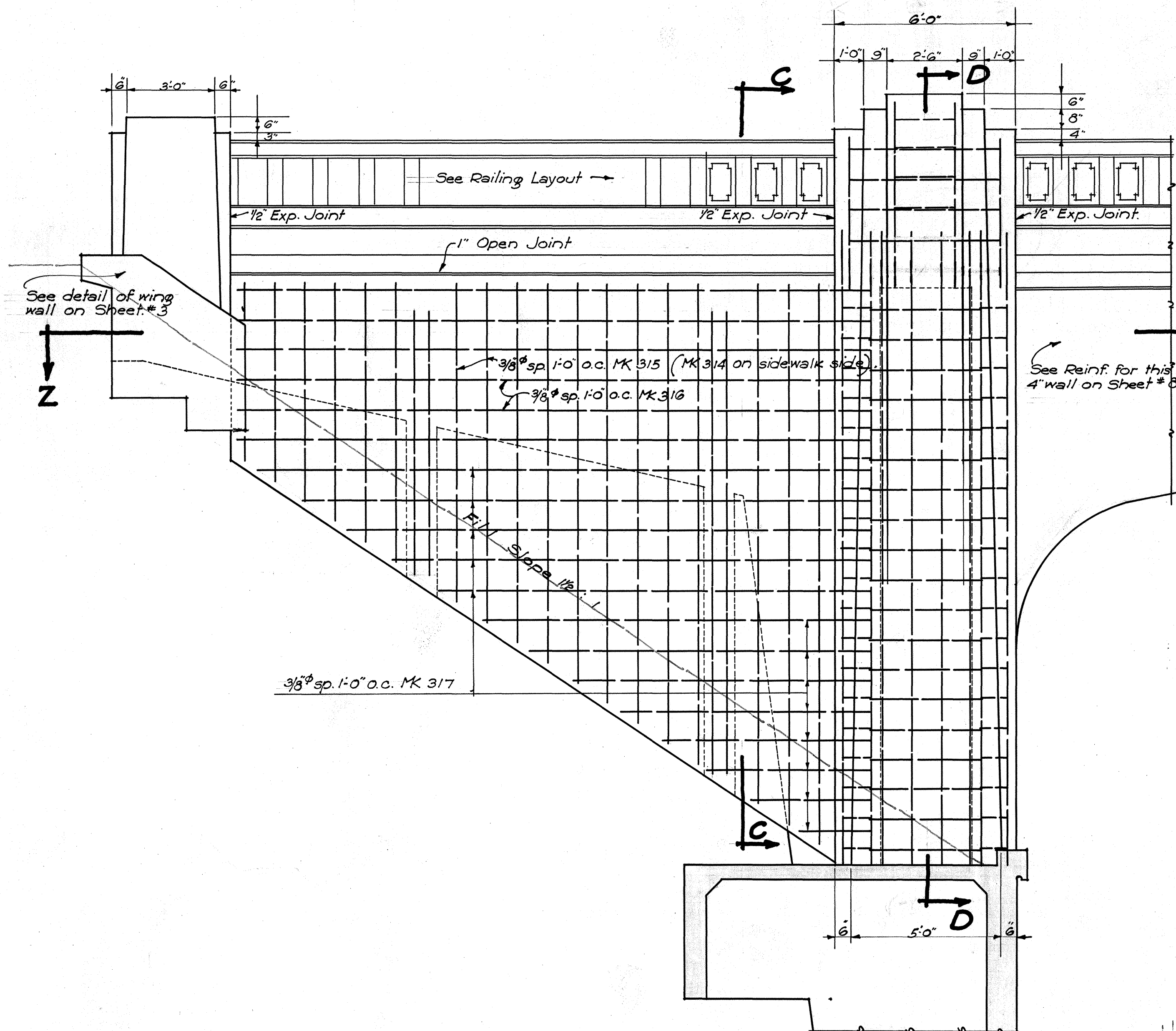


SEC. H-H. WALL REINFORCING.

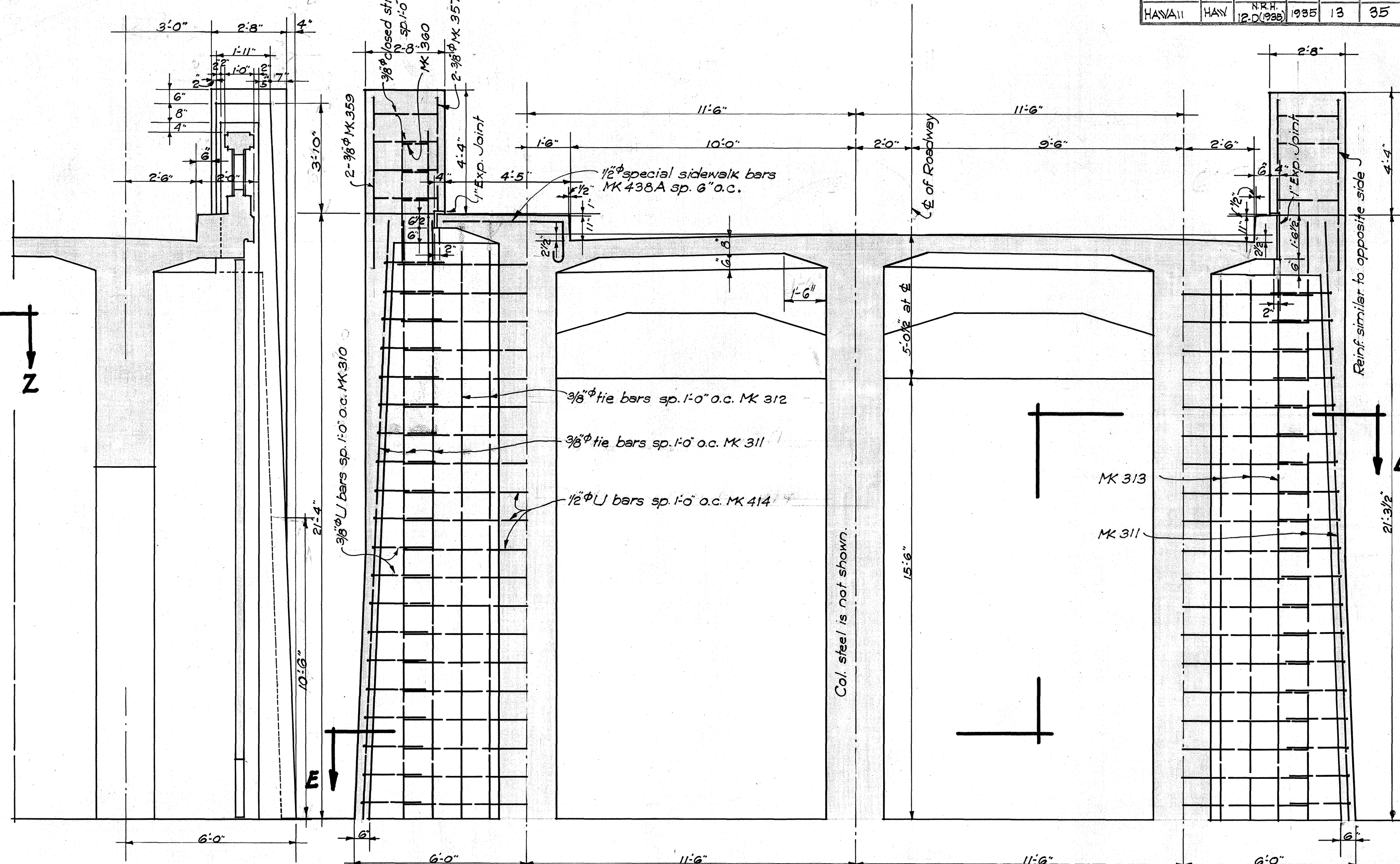
TERRITORIAL HIGHWAY DEPARTMENT
TERRITORY OF HAWAII.
WAHIAWA BRIDGE.
No. 6 STA. 80+74. TO STA. 82+56.
KAUAI BELT ROAD N.E.H. 12-D.
DATE June 1935 SHEET 4 OF 17 SHEETS.

DATE June 1935 SHEET 4 OF 17 S
4333.12

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW	N.H. 12-D	1935	13	35



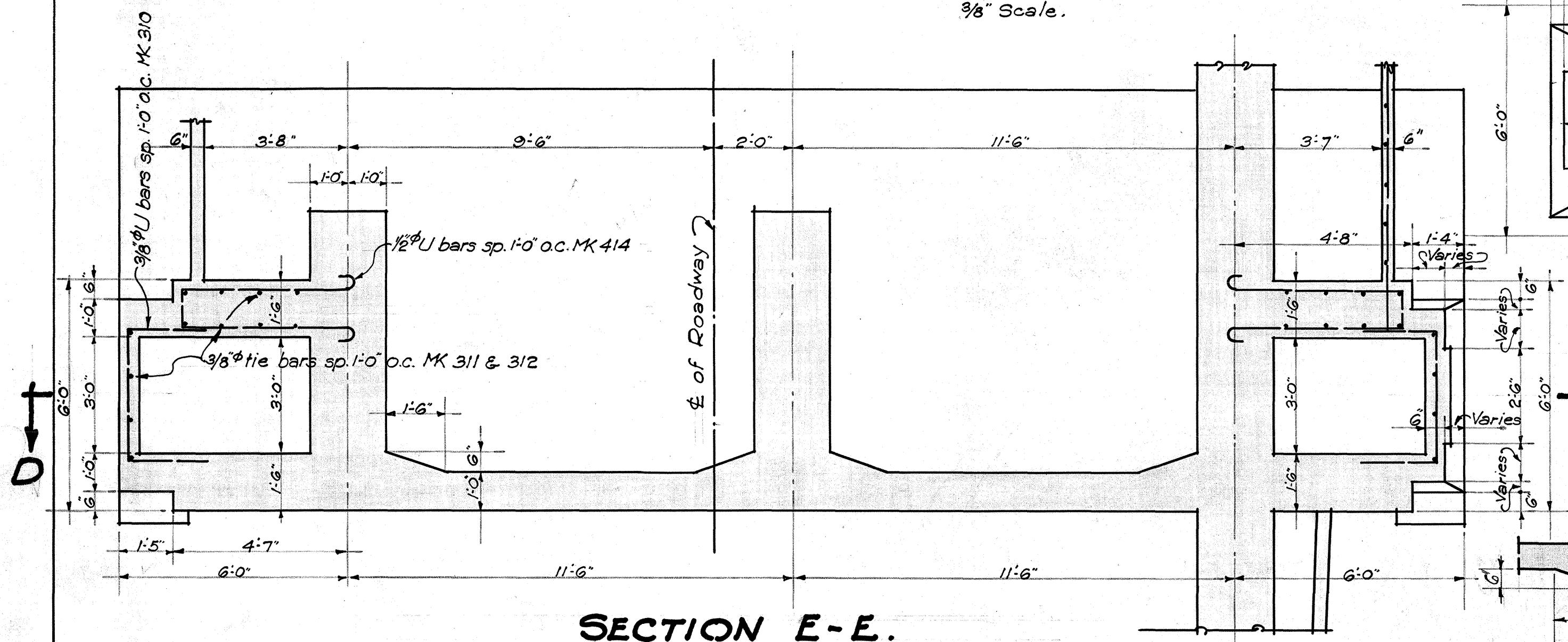
END CURTAIN WALL REINF.
3/8" Scale.



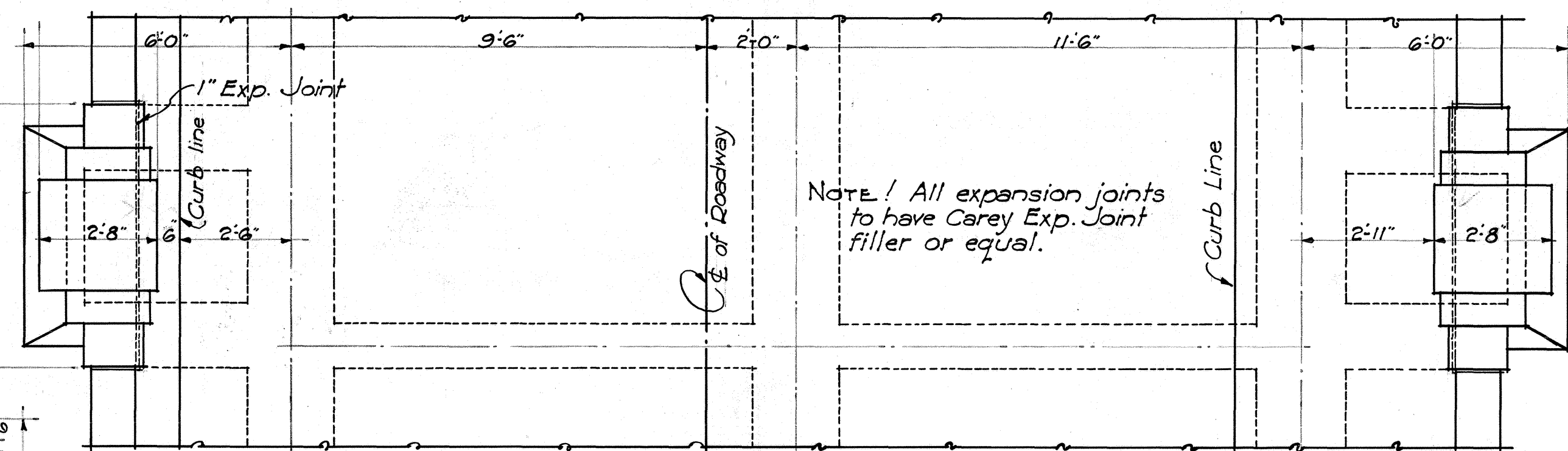
SECTION C-C.
3/8" Scale.



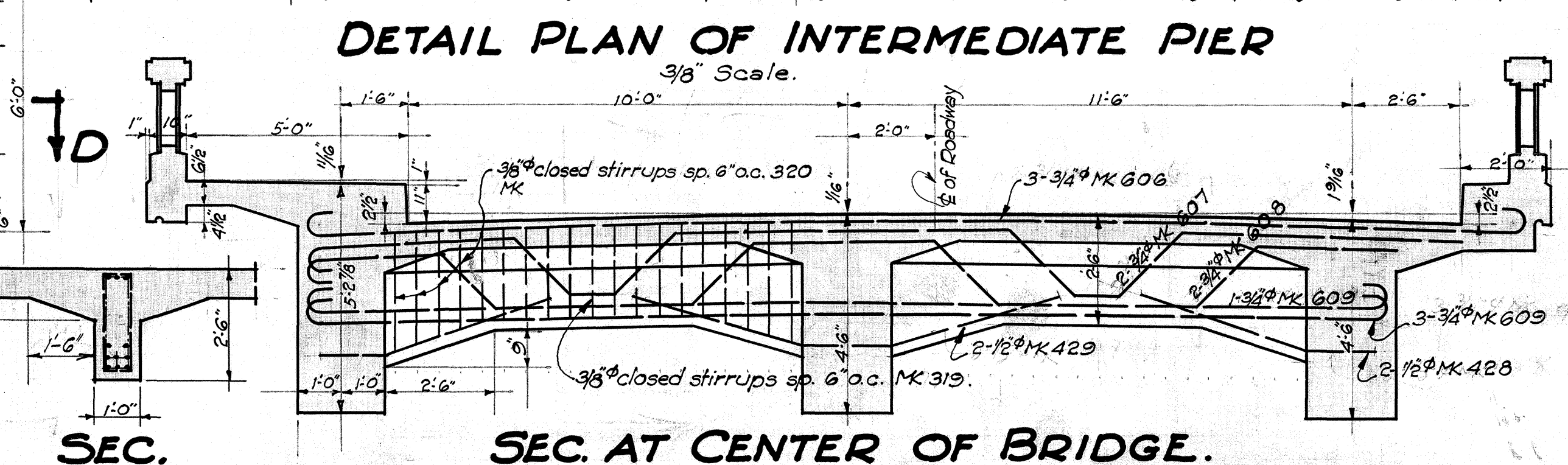
SECTION D-D.
3/8" Scale.



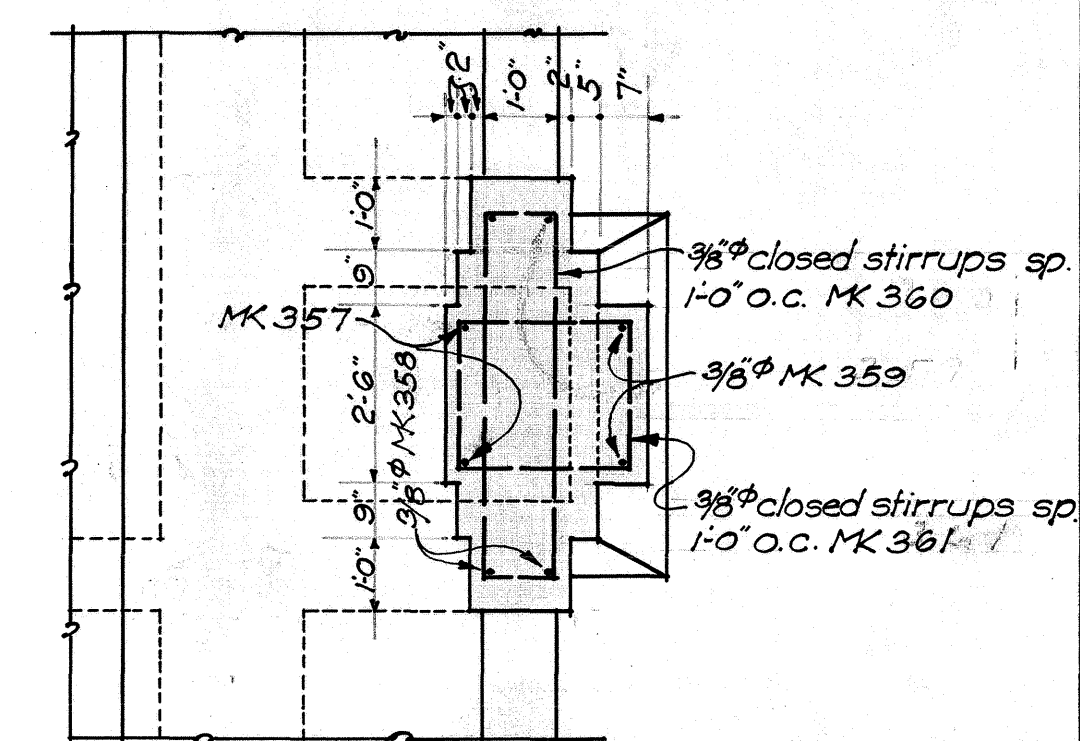
SECTION E-E.
3/8" Scale.



DETAIL PLAN OF INTERMEDIATE PIER
3/8" Scale.



SEC. AT CENTER OF BRIDGE.
3/8" Scale.

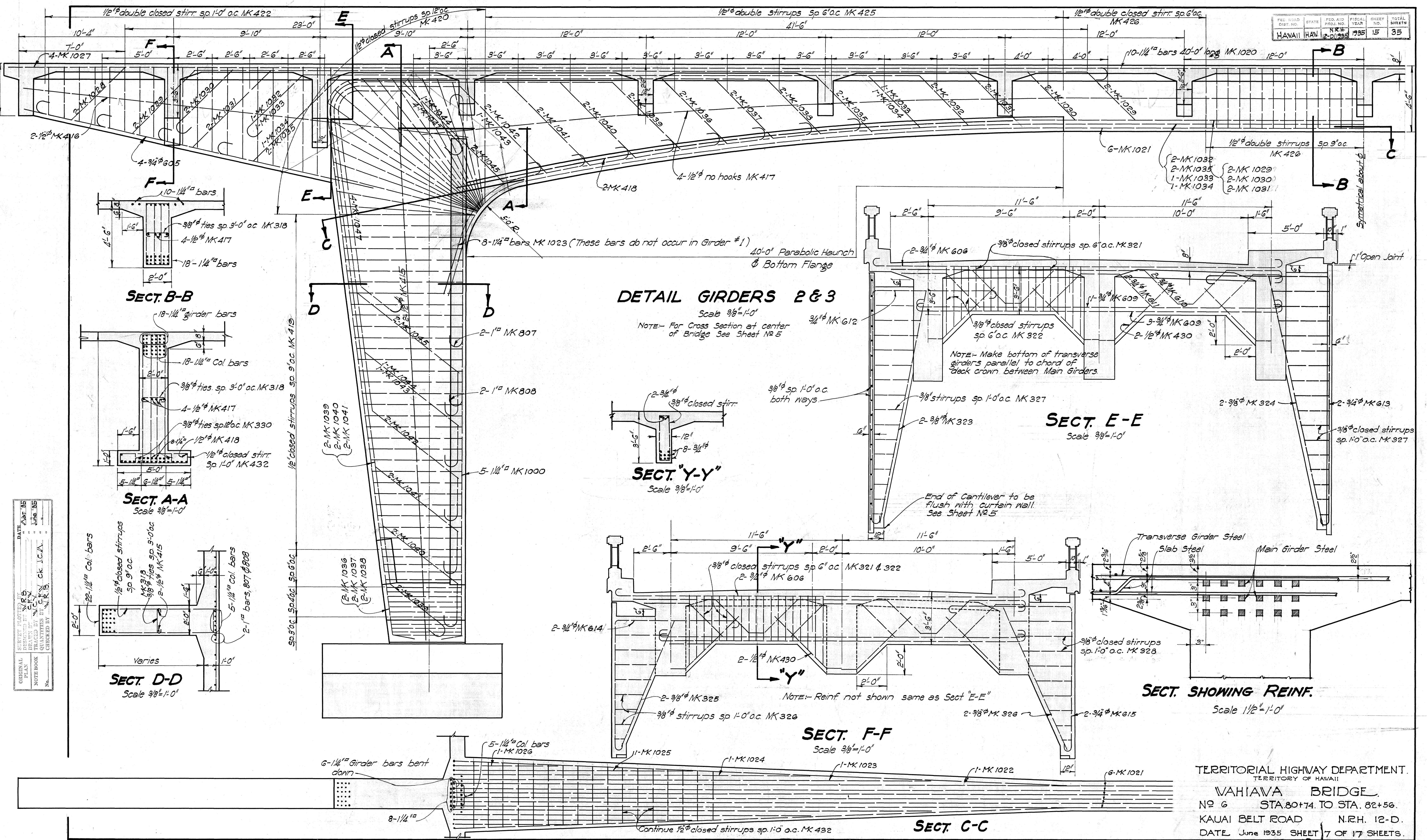


RAILING POST REINF.
3/8" Scale.

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
WAHIAWA BRIDGE.
No. 6 STA. 80+74 TO STA. 82+56.
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 5 OF 17 SHEETS.

4333.13

ORIGINAL SURVEY PLOTTED BY DATE
DESIGNED BY V.E.B. Mar. 1935
CHECKED BY G.E.W. May
NOTES BY G.E.W. ok J.C.A.
No.



DATE: Jan. 35
DESIGNED BY: C. C. K. ICA
CHECKED BY: N. R. B.
ORIGINAL PLAN
NOTE BOOK
QUANTITIES BY: C. C. K. ICA
CHECKED BY: N. R. B.

DETAIL GIRDERS 2 & 3

Scale 3/8"=1'-0"
NOTE: For Cross Section at center of Bridge See Sheet No 5

SECT. "Y-Y"
Scale 3/8"=1'-0"

SECT. E-E
Scale 3/8"=1'-0"

SECT. SHOWING REINF.
Scale 1 1/2"=1'-0"

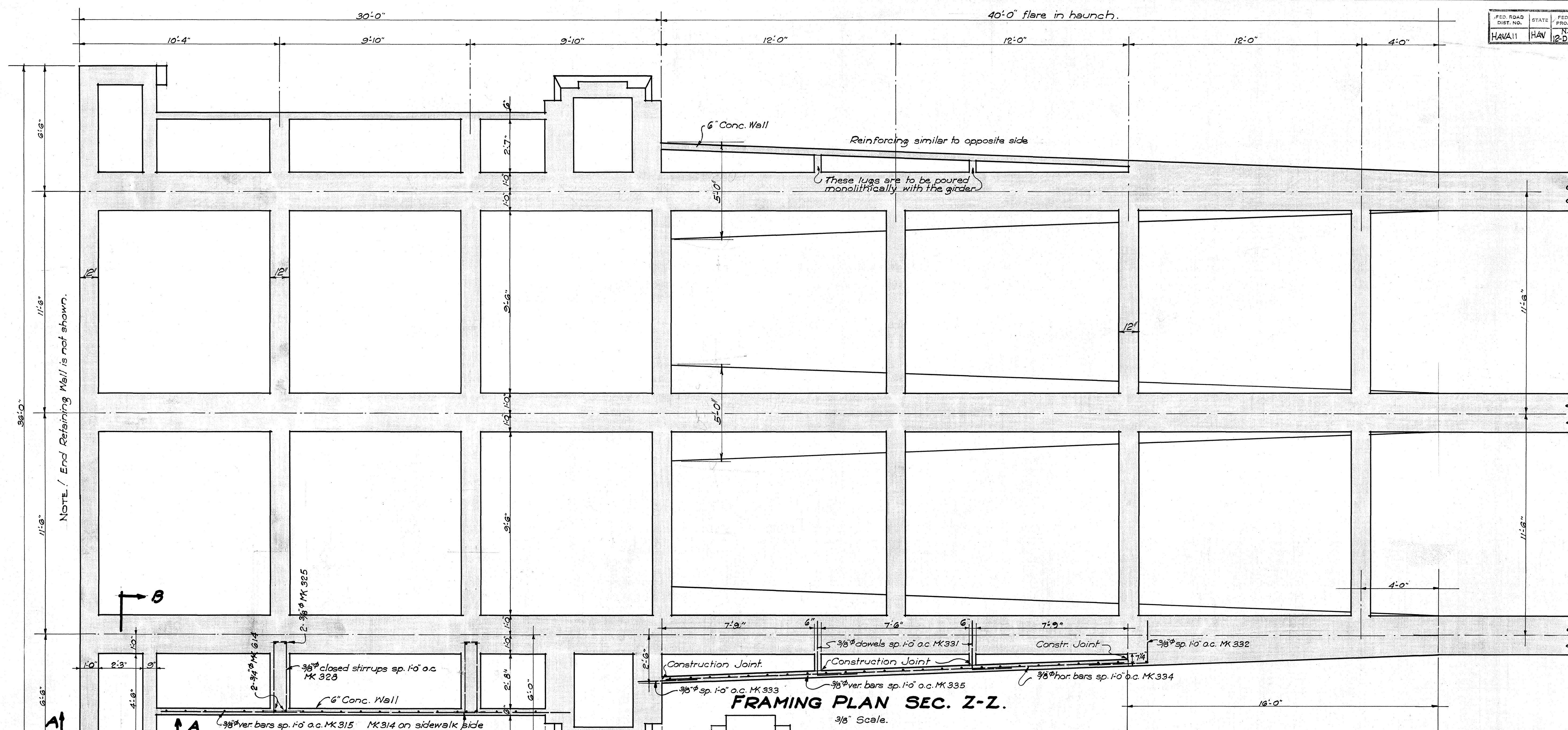
SECT. F-F
Scale 3/8"=1'-0"

SECT. C-C

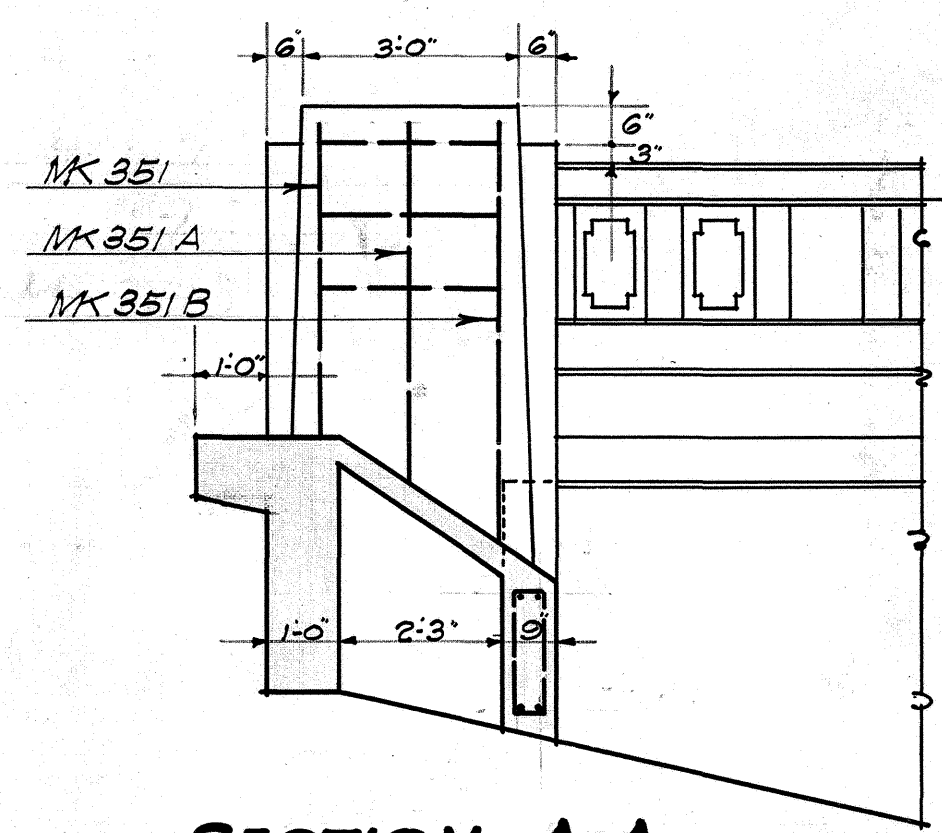
TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII
WAHIAWA BRIDGE.
No 6 STA. 80+74. TO STA. 82+56.
KAUAI BELT ROAD N.R.H. 12-D.
DATE, June 1935 SHEET 7 OF 17 SHEETS.

4333.15

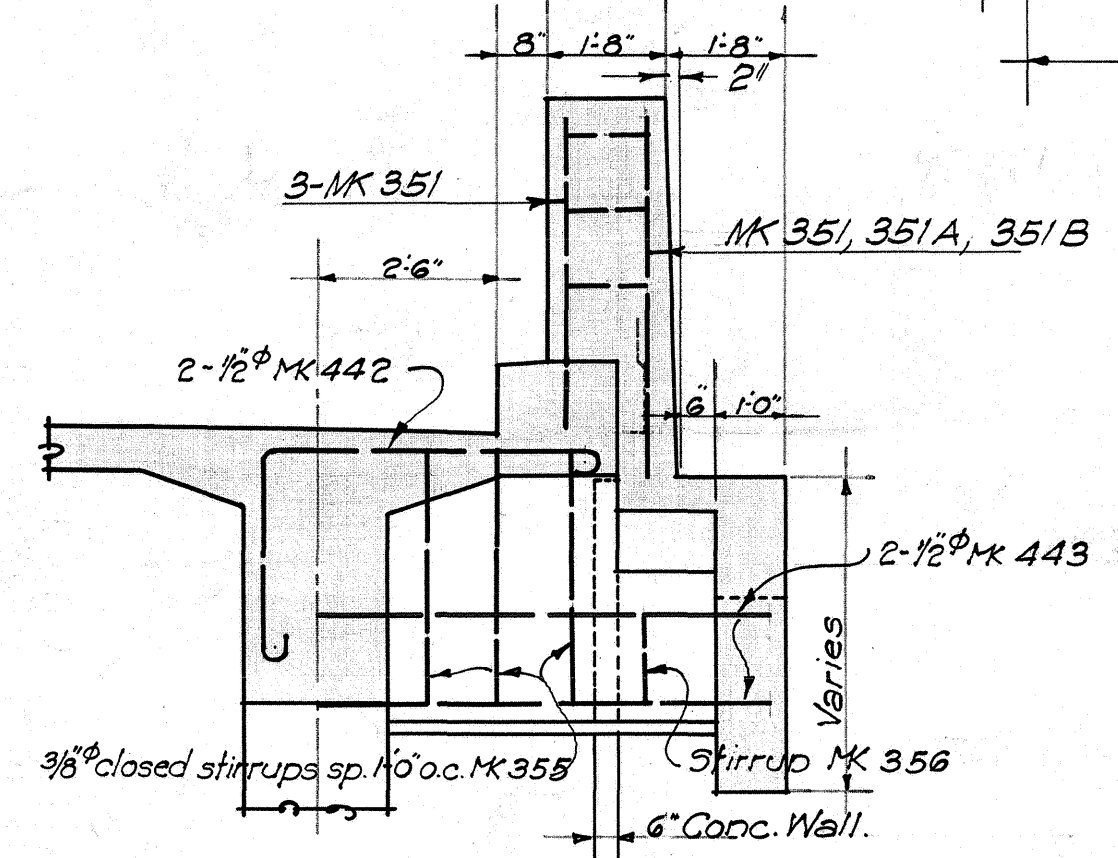
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW	N.R.H. 12-D	1935	16	35



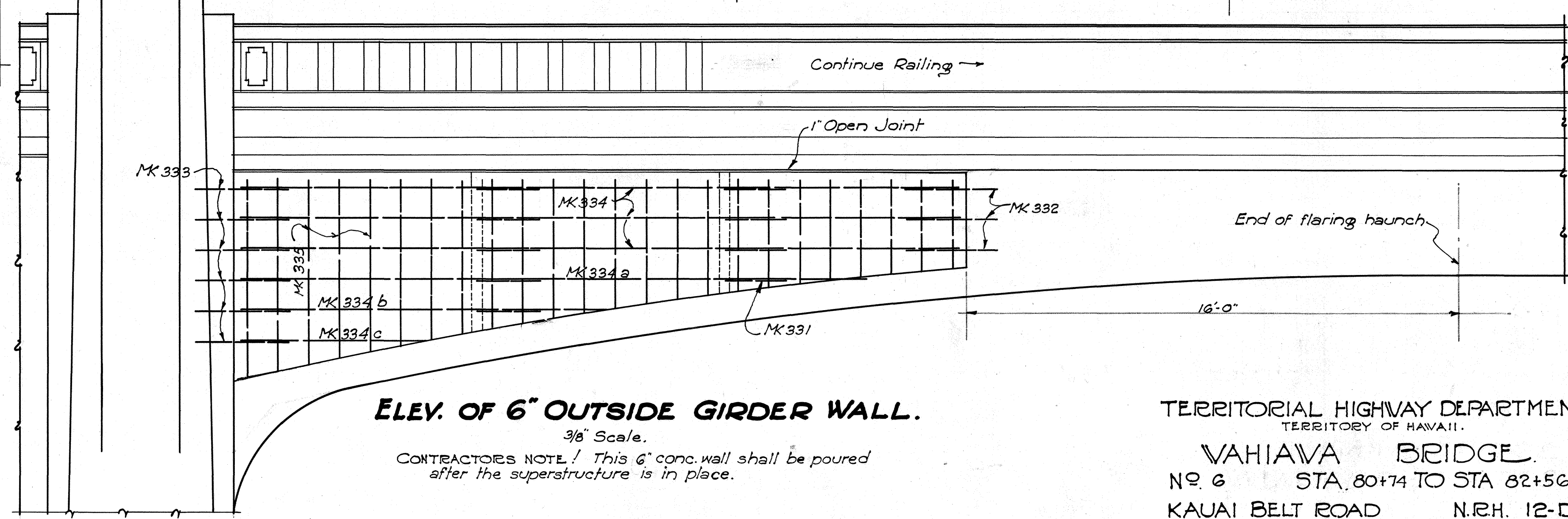
FRAMING PLAN SEC. Z-Z.
3/8" Scale.



SECTION A-A.
3/8" Scale.



SECTION B-B.
3/8" Scale.



ELEV. OF 6" OUTSIDE GIRDER WALL.
3/8" Scale.

CONTRACTORS NOTE: This 6" conc. wall shall be poured after the superstructure is in place.

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
VAHIAVA BRIDGE.
NO. 6 STA. 80+74 TO STA. 82+56
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 8 OF 17 SHEETS.

4333.16

SURVEY PLOTTED BY	DATE
DESIGNED BY	Apr. 1935
DRAWN BY	Apr.
NOTED BY	May
CHECKED BY	May
ORIGINAL PLAN	
NOTE BOOK	
NO.	

4-1/4" x 40'-0" MK 1020

1/2" sidewalk bars sp. 6' o.c. MK 436

3/8" tie bars sp. 10' o.c. MK 341

2-3/8" tie bars MK 341

1/2" bent bars sp. 10' o.c. MK 437

1/2" str. bars sp. 10' o.c. MK 436

1/2" str. bars sp. 10' o.c. MK 433

3/8" tie bar 48'-0" long MK 343

10-1/4" x 40'-0" MK 1020

2-3/8" x 48'-0" MK 343

10-1/4" bars 40'-0" long MK 1020

2-3/8" tie bars MK 341

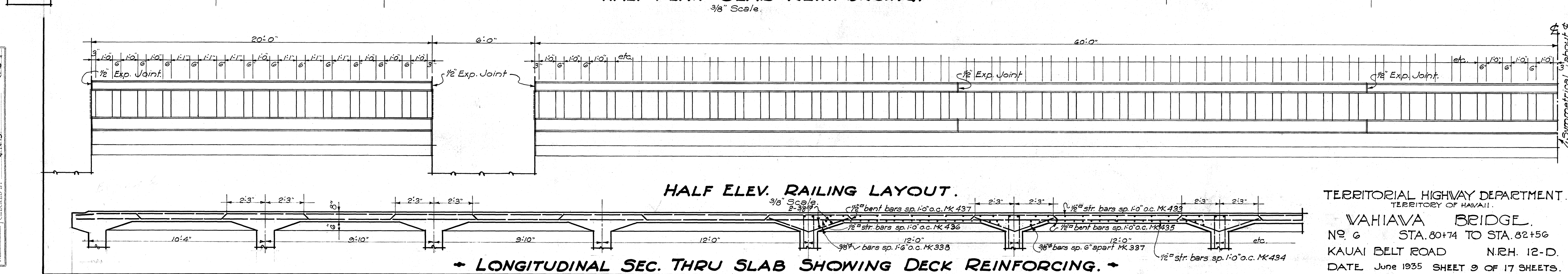
4 extra reinf. bars in every panel 1/2" sp. 6' o.c. MK 460

Typical Top Reinf.

Typical Bottom Reinf.

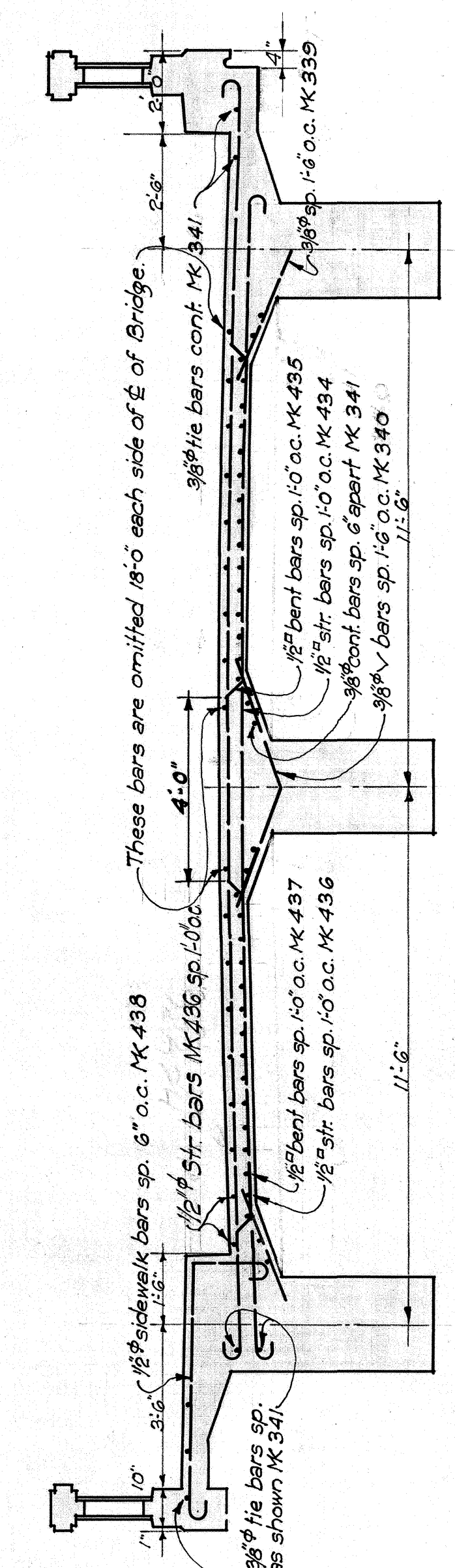
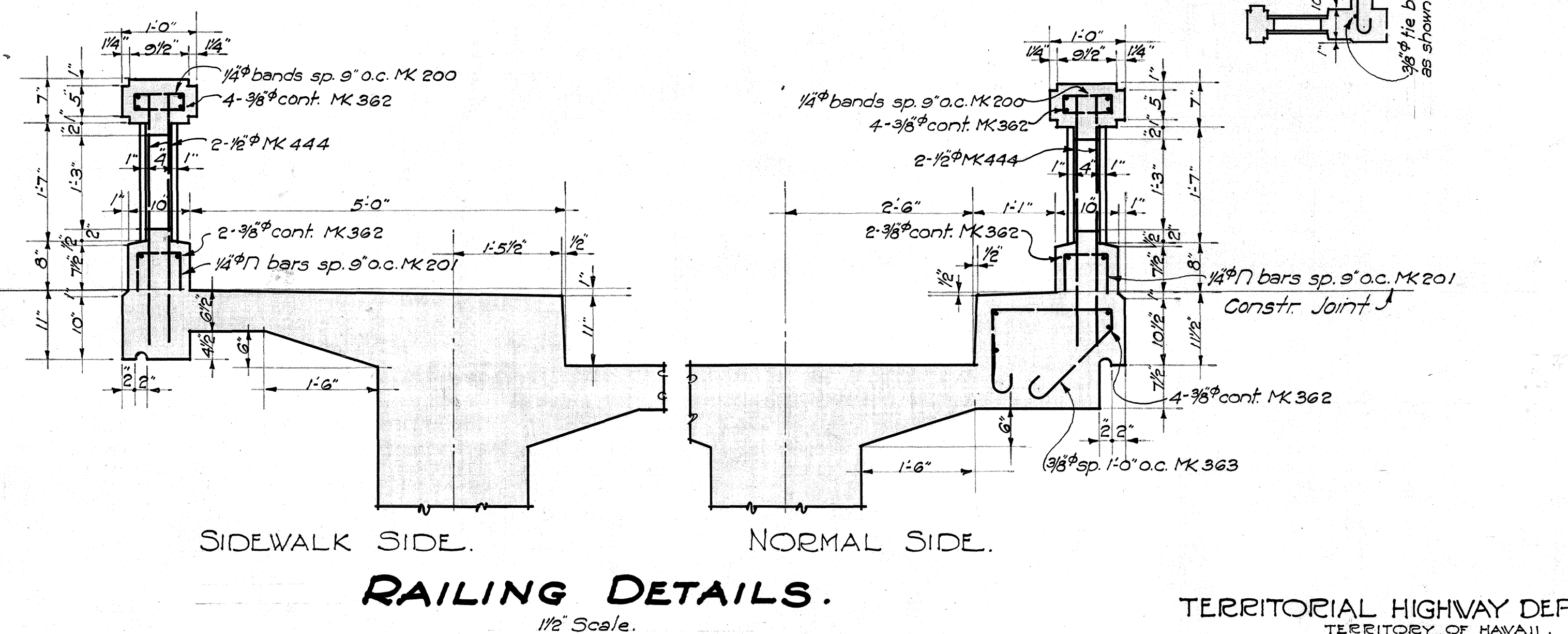
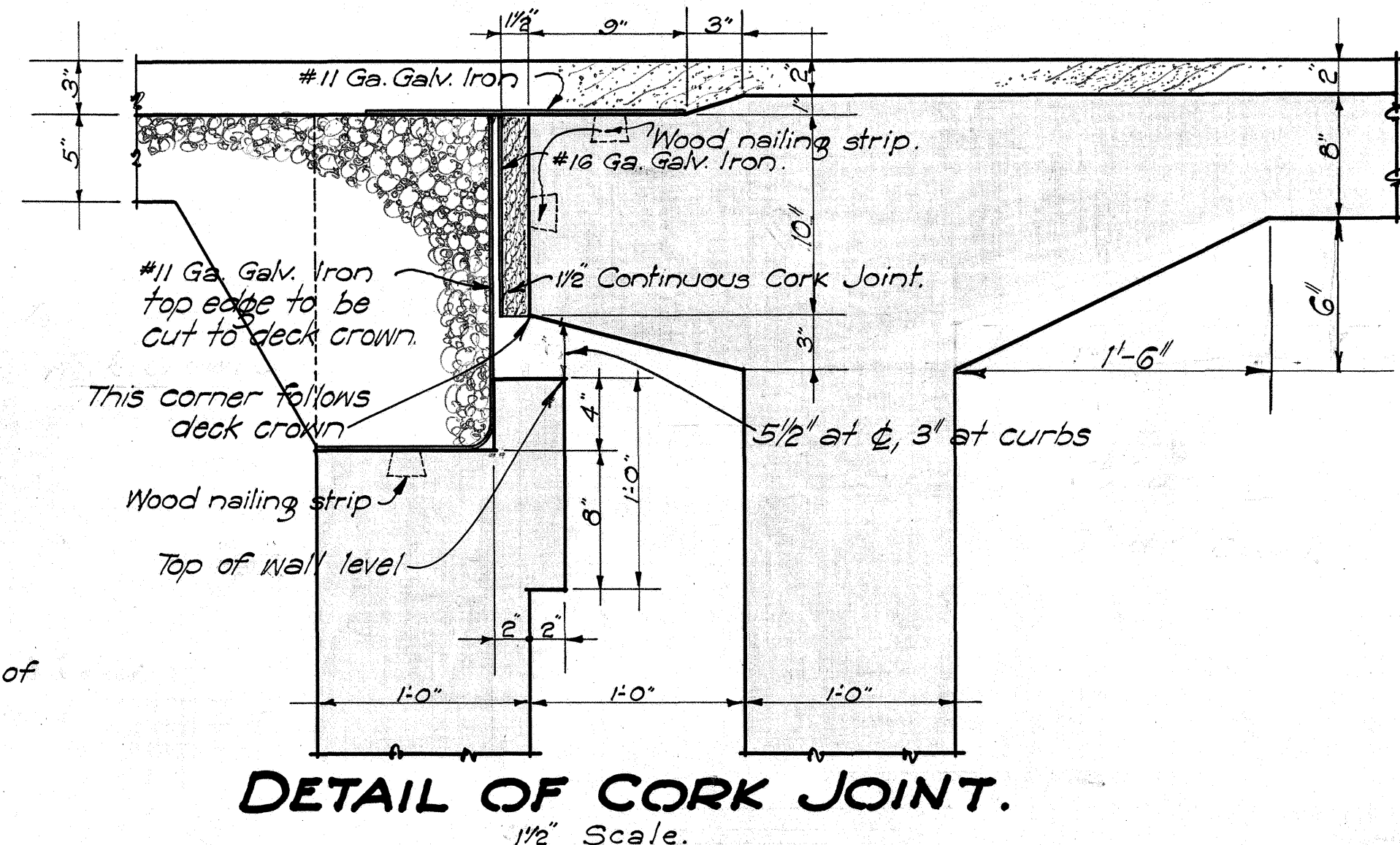
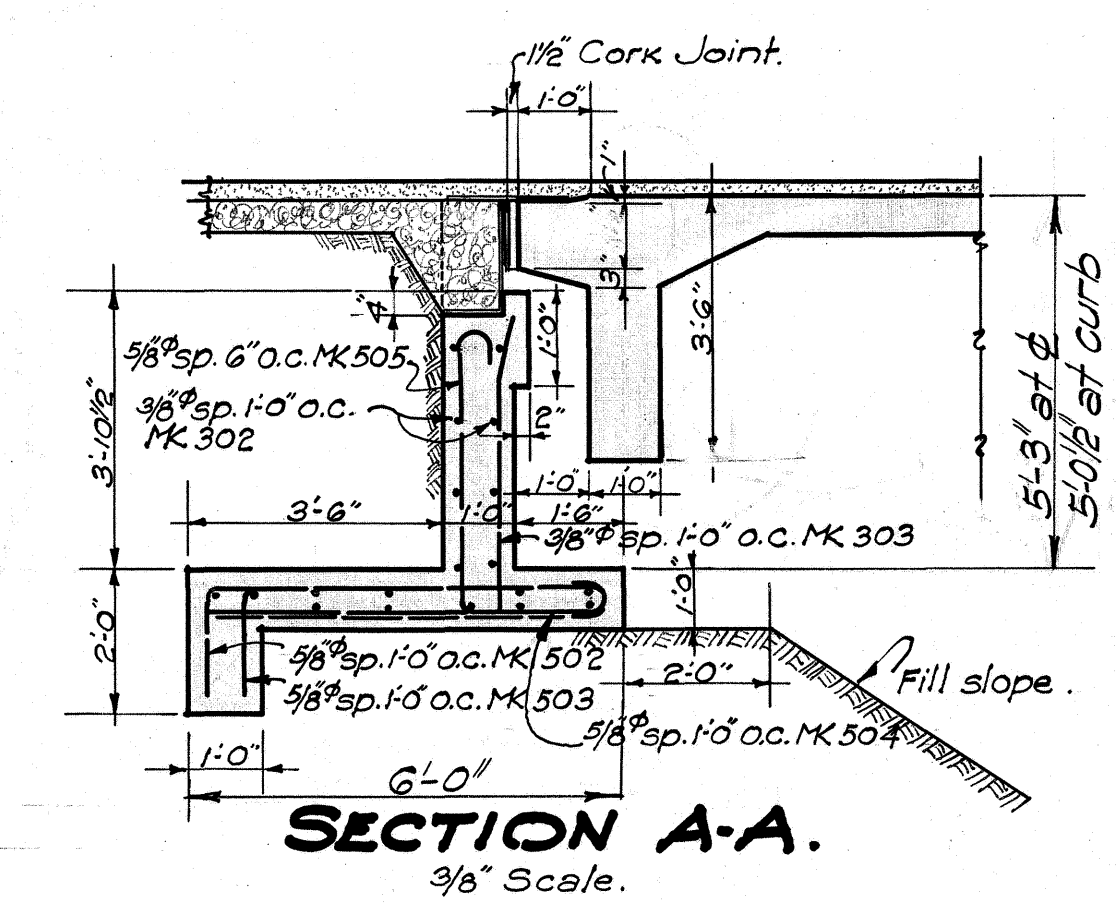
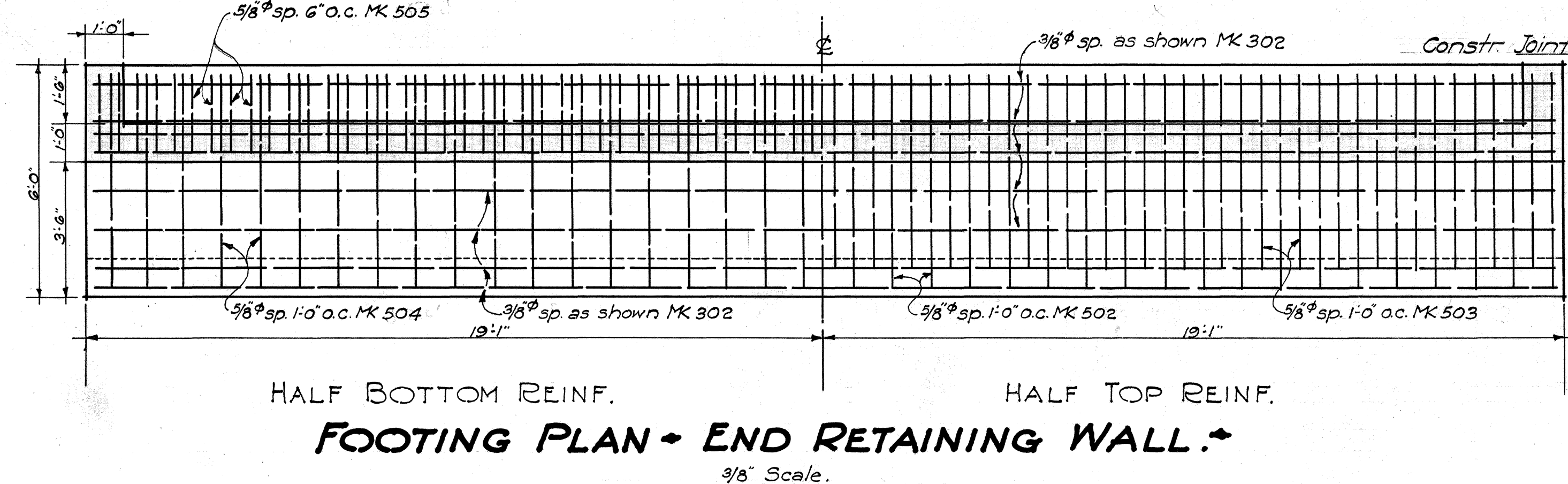
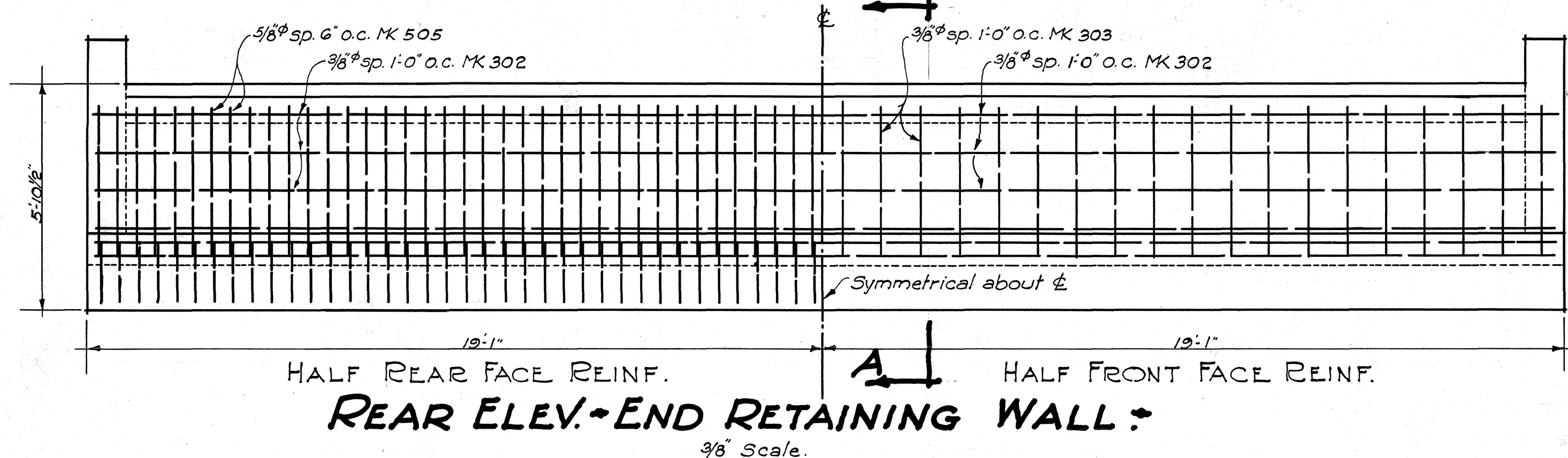
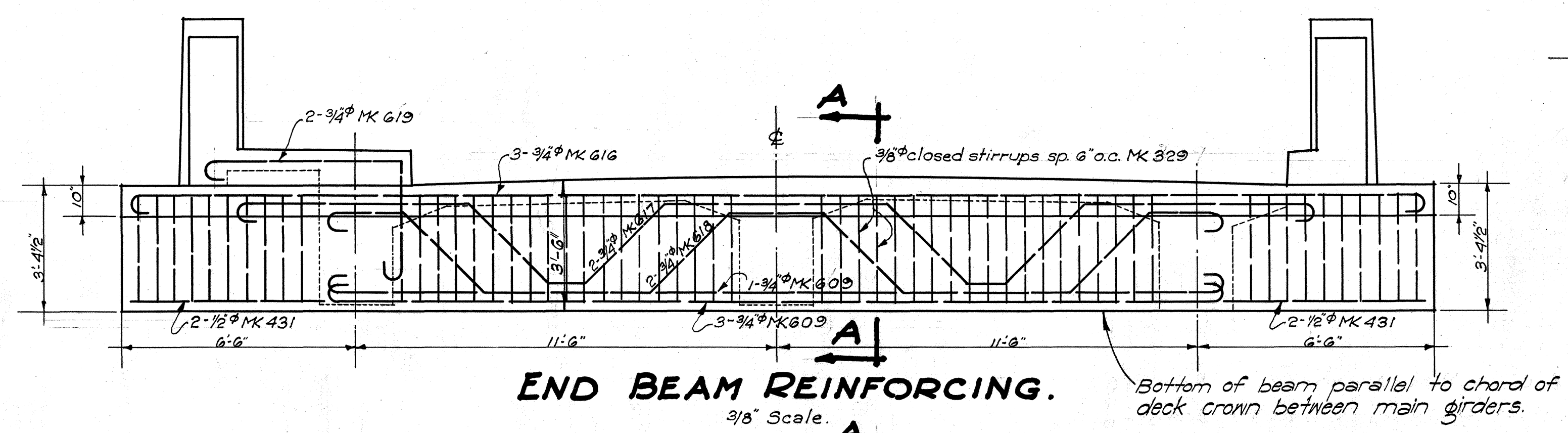
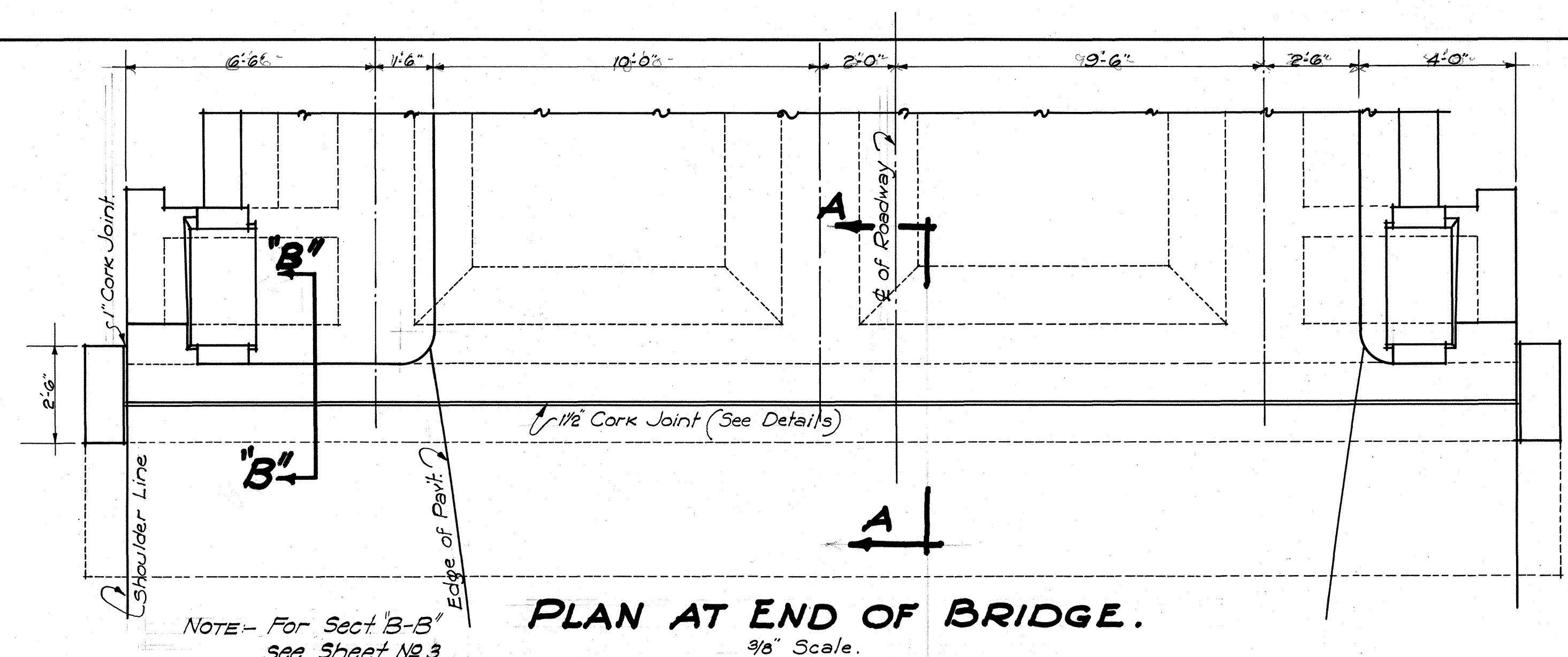
NOTE: Fillet reinforcing is not shown. See detail elsewhere.

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	12-D(235)	1935	17	35



4333.17

3/8" Scale



TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
VAHIAWA BRIDGE.
No 6 STA. 80+74. TO STA. 82+56
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 18 OF 17 SHEETS.

ORIGINAL PLAN

NOTE BOOK

No. _____

SURVEY PLOTTED BY _____

DESIGNED BY C.B.

DRAWN BY C.B.

TRACED BY S.C.

QUANTITIES BY C.B.

CHECKED BY N.B.

DATE APR 35

1 2 3 4 5 6 7 8 9 10 11 12

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
WAHIAWA BRIDGE.
NO. 6 STA. 80+74 TO STA. 82+56
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 11 OF 17 SHEETS.

STEEL SCHEDULE

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	12-0-1935	1935	22	35

MK	DESCRIPTION	LOCATION	SIZE	LENGTH	NO OF BARS IN EA UNIT	NO OF UNITS	TOTAL NO OF BARS	TOTAL LENGTH	WT PER FOOT	TOTAL WEIGHT
600		Pier footing	3/4"	36'-2"	23	2	46	1663.82	1.52	2529.0
500		" "	5/8"	35'-11"	23	2	46	1652.32	1.06	1751.0
300		" "	3/8"	11'-6"	20	2	40	1195.00	0.38	454.0
501		" "	5/8"	10'-0"	11	2	22	220.00	1.06	233.0
601		" "	3/4"	11'-6"	12	2	24	276.00	1.52	420.0
800		" "	1"	13'-8"	4	6	24	328.08	2.70	886.0
801		" "	1"	14'-4"	2	6	12	171.96	"	464.0
802		" "	1"	14'-10"	3	6	18	266.94	"	721.0
803		" "	1"	13'-1"	3	6	18	235.44	"	636.0
804		" "	1"	9'-10"	4	6	24	235.92	"	637.0
400		" "	1/2"	14'-9"	30	6	180	2655.00	0.68	1805.0
805		Gonels	1"	12'-4"	4	6	24	295.92	3.44	1018.0
806		(in spiral)	1"	7'-3"	6	6	36	261.00	"	898.0
301		Flg. Col. bars	3/8"	180'-3"	1	6	6	1081.50	0.38	411.0
401		" "	1/2"	17'-6"	6	6	36	630.00	0.68	428.0
402		" "	1/2"	4'-8"	24	6	144	672.48	"	457.0
602		" "	3/4"	3'-6"	12	6	72	252.00	1.52	383.0
403		" "	1/2"	16'-3" Av.	7	6	42	682.50	0.68	464.0
470		" "	1/2"	4'-10"	7	6	42	202.86	"	138.0
502		End Ret. Wall	5/8"	7'-8"	38	2	76	582.92	1.06	618.0
503		" "	5/8"	7'-2"	38	2	76	544.92	"	578.0
504		" "	"	5'-6"	38	2	76	418.00	"	443.0
505		" "	"	7'-4"	76	2	152	1114.16	"	1181.0
302		" "	3/8"	37'-9"	19	2	38	1434.50	0.38	545.0
303		" "	3/8"	4'-0"	38	2	76	304.00	"	116.0
700		Col tie beam	7/8"	26'-5"	10	2	20	528.00	2.07	1093.0
304		" "	3/8"	7'-0"	20	2	40	280.00	0.38	106.0
506		Col. lug on Pier Platform	5/8"	11'-11"	4	6	24	286.08	1.06	303.0
604		" "	3/4"	10'-6"	12	6	72	756.00	1.52	1149.0
305		" "	3/4"	10'-5"	7	6	42	437.64	0.38	166.0
404		Curtain Wall for Pier Platform	1/2"	34'-6"	6	2	12	414.00	0.68	282.0
405		" "	"	36'-0"	4	2	8	288.00	"	196.0
306		" "	3/8"	9'-6"	22	2	44	418.00	0.38	159.0
507		" "	5/8"	34'-6"	4	2	8	276.00	1.06	293.0
406		Slab for Pier Platform	1/2"	15'-0"	22	2	44	660.00	0.68	449.0
407		" "	1/2"	11'-5"	22	2	44	502.48	"	342.0
408		" "	1/2"	6'-0"	44	2	88	528.00	"	359.0
307		" "	3/8"	10'-6"	12	2	24	252.00	0.38	96.0

MK	DESCRIPTION	LOCATION	SIZE	LENGTH	NO OF BARS IN EA UNIT	NO OF UNITS	TOTAL NO OF BARS	TOTAL LENGTH	WT PER FOOT	TOTAL WEIGHT
409		Slab for Pier Platform	1/2"	35'-9"	7	2	14	500.50	0.68	340.0
410		" "	1/2"	35'-6"	6	2	12	426.00	"	290.0
411		" "	1/2"	34'-6"	6	2	12	414.00	"	282.0
308		Vert. bars About Wall Reinf.	3/8"	14'-3"	8	2	16	228.00	0.38	87.0
309		Vert. bars " "	3/4"	29'-6"	52	2	104	3068.00	"	1166.0
412		Hor. bars " "	1/2"	34'-6"	44	2	88	3036.00	0.68	2064.0
413		Hor. bars " "	1/2"	31'-9"	44	2	88	2794.00	"	1900.0
310		Railing Pier Post	3/8"	7'-6"	39	2	78	585.00	0.38	222.0
414		" "	1/2"	11'-0"	39	2	78	858.00	0.68	583.0
311		Sidewalk Normal	3/8"	21'-0"	14	2	28	588.00	0.38	223.0
312		Sidewalk " "	"	20'-0"	4	2	8	160.00	"	61.0
313		Normal " "	"	19'-0"	6	2	12	228.00	"	87.0
314		4" Curtain Wall	Varies 12'-10" Av.	Varies 12'-10"	18	2	36	461.88	"	176.0
315		" "	Varies 12'-3" Av.	Varies 12'-3"	18	2	36	441.00	"	168.0
316		" "	"	21'-0"	6	4	24	504.00	"	192.0
317		" "	Varies 11'-9"	Varies 11'-9"	13	4	52	611.00	"	232.0
1000		Col. Bars G-1, G-2, G-3	1/2"	39'-0"	5	6	30	1170.00	5.37	6283.0
807		" "	1"	19'-0"	2	6	12	228.00	3.44	784.0
808		" "	"	23'-0"	2	6	12	276.00	"	949.0
415		" "	1/2"	36'-0"	2	6	12	432.00	0.68	294.0
1001		" G-1	1/2"	69'-10"	2	2	4	2793.2	5.37	1500.0
1002		" G-1	1/2"	67'-4"	2	2	4	2693.2	"	1446.0
1003		" G-1	1/2"	61'-2"	2	2	4	244.68	"	1314.0
1004		" G-1	1/2"	54'-6"	2	2	4	218.00	"	1171.0
1005		" G-1	1/2"	51'-1"	1	2	2	102.16	"	549.0
1006		" G-1	1/2"	48'-5"	1	2	2	96.84	"	520.0
1007		" G-1	1/2"	45'-1"	2	2	4	180.32	"	968.0
1008		" G-1	1/2"	71'-9"	2	2	4	287.00	"	1541.0
1009		" G-1	1/2"	74'-9"	2	2	4	299.00	"	1606.0
1010		" G-1	1/2"	77'-10"	2	2	4	311.32	"	1672.0
1011		Girder bars G-1	1/2"	165'-1"	2	1	2	330.16	"	1773.0
1012		" "	1/2"	159'-4"	1	1	1	159.33	"	856.0
1017		" "	1/2"	164'-10"	1	1	1	164.83	"	885.0
1013		" "	1/2"	159'-6"	2	1	2	319.00	"	1713.0

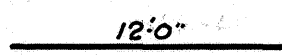
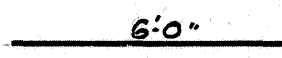
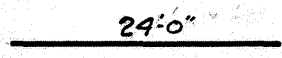
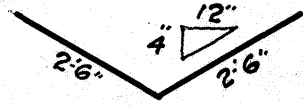
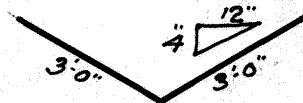
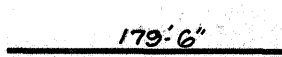
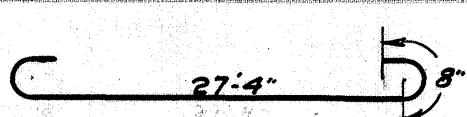
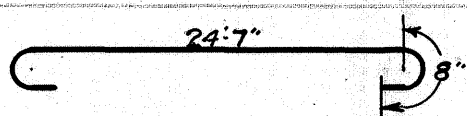
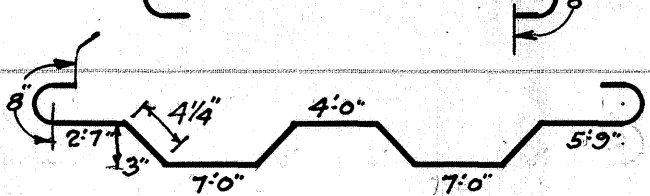
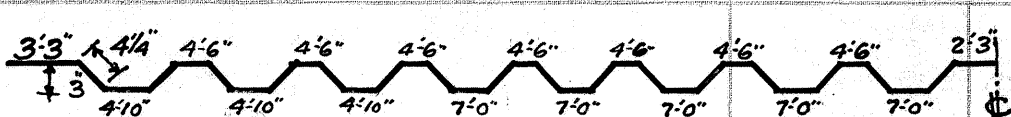
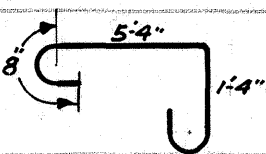
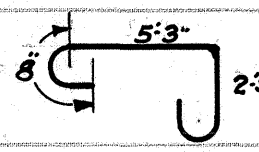
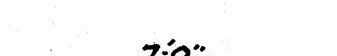
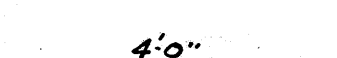
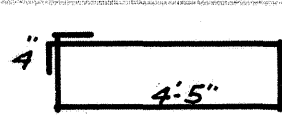
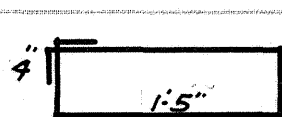
MK	DESCRIPTION	LOCATION	SIZE	LENGTH	NO OF BARS IN EA UNIT	NO OF UNITS	TOTAL NO OF BARS	TOTAL LENGTH	WT PER FOOT	TOTAL WEIGHT
1014		Girder Bars G-1	1/2"	172'-7"	2	1	2	345.16	5.37	1854.0
1015		" "	1/2"	168'-11"	2	1	2	337.84	"	1814.0
1016		" "	1/2"	179'-11"	2	1	2	359.84	"	1932.0
1019		" "	1/2"	76'-3"	2	2	4	305.00	"	1638.0
1018		" "	1/2"	74'-0"	4	2	8	592.00	"	3179.0
1020		Girder bars G-1, G-2, G-3	1/2"	40'-0"	4	10	40	960.00	"	5155.0
605		Girder bars G-1, G-2, G-3	3/4"	24'-0"	4	6	24	576.00	1.52	876.0
416		" "	1/2"	30'-0"	4	6	24	720.00	0.68	490.0
417		" "	1/2"	24'-0"	4	3	12	488.00	"	1012.0
318		Col. ties G-1, G-2, G-3	3/8"	2'-4"	12	6	72	167.76	0.38	64.0
318		Girder ties G-1, G-2, G-3	3/8"	2'-4"	61	3	183	426.39	"	162.0
1021		Girder bars G-1, G-2, G-3	1/2"	131'-6"	6	3	18	2367.00	5.37	12711.0
418		" "	1/2"	44'-0"	2	6	12	528.00	0.68	359.0
1022		" "	1/2"	47'-0"	4	3	12	574.00	5.37	3082.0
1023		" "	1/2"	37'-10"	20	2	40	1664.67	"	8939.0
1024		" "	1/2"	29'-4"	4	3	12	358.00	"	1922.0
1025		" "	1/2"	21'-10"	4	3	12	262.00	"	1407.0
1026		" "	1/2"	12'-4"	4	3	12	154.00	"	827.0
1027		Girder bars G-1, G-2, G-3	1/2"	75'-0"	4	4	16	1200.00	"	6444.0
1028		" "	1/2"	76'-0"	2	4	8	608.00	"	3265.0
1029		" "	1/2"	178'-8"	2	2	4	714.68	"	3838.0
1030		" "	1/2"	167'-8"	2	2	4	670.68	"	3602.0
1031		" "	1/2"	171'-4"	2	2	4	685.32	"	3680.0
1032		" "	1/2"	158'-4"	2	2	4	633.32	"	3401.0
1033		" "	1/2"	158'-2"	1	2	2	316.34	"	1699.0
1034		" "	1/2"	163'-8"	1	2	2	327.34	"	1758.0
1035		" "	1/2"	163'-10"	2	2	4	655.32	"	3519.0
1036		Col. bars G-2, G-3	1/2"	70'-10"	2	4	8	566.64	"	3043.0
1037		" "	1/2"	73'-9"	2	4	8	590.00	"	3168.0
1038		" "	1/2"	76'-10"	2	4	8	614.64	"	3301.0
1039		" "	1/2"	68'-9"	2	4	8	550.00	"	2954.0
1040		" "	1/2"	66'-4"	2	4	8	530.64	"	2850.0

NOTE: This steel schedule is subordinate to details on plans. In case of discrepancy between steel list and detail drawings the latter shall govern. The Territorial Highway Dept. does not assume responsibility for any errors that occur in the steel schedule. Contractor shall check steel schedule before placing order.

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.
WAHIAWA BRIDGE.
No 6 STA. 80+74 TO STA. 82+56
KAUAI BELT ROAD N.E.H. 12-D
DATE June 1935 SHEET 14 OF 17 SHEETS.

4333.22

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	N.R.H. 12-0(1935)	1935	23	35

MK	DESCRIPTION	LOCATION	SIZE	LENGTH	Bars in each unit	No. of units	Total No. of bars	Total Length	Weight per foot	Total Weight
334b		False Girder Wall	$\frac{3}{8}$ "	12'-0"	1	4	4	48.0	0.38	18
334c		"	"	6'-0"	1	4	4	24.0	"	9
335	<u>Varies 4'-9" Av.</u>	"	"	<u>Varies Av. 4'-9"</u>	24	2	48	228.0	"	87
336	<u>Varies 5'-3" Av.</u>	"	"	<u>Varies Av. 5'-3"</u>	24	2	48	252.0	"	96
337		Cross Beam Fillet Reinf.	"	24'-0"	64	1	64	1536.0	"	584
338		"	"	5'-0"	10	15	150	750.0	"	285
339		Girder	"	3'-0"	$\frac{10}{160}$	2	20	60.0		205
340		Girder Fillet Reinf.	"	6'-0"	80	1	80	480.0	"	182
341		"	"	179'-6"	8	1	8	1436.0	"	546
433		Slab.	$\frac{1}{2}$ "	28'-8"	132	1	132	3784.44	0.86	3255
434		"	"	25'-11"	132	1	132	3421.44	"	2942
435		"	"	29'-1"	116	1	116	3373.28	"	2901
342		"	$\frac{3}{8}$ "	71'-9"	4	2	8	574.0	0.38	218
341		"	"	179'-6"	7	1	7	1256.50	"	477
436		"	$\frac{1}{2}$ "	181'-0"	28	1	28	5068.0	0.86	4358
437		"	$\frac{1}{2}$ "	184'-4"	16	1	16	2949.33	"	2536
438		"	$\frac{1}{2}$ "	8'-0"	335	1	335	2680.0	0.68	1822
343		"	$\frac{3}{8}$ "	48'-0"	6	1	6	288.0	0.38	109
439		End Post Slab & Wall sidewalk side.	$\frac{1}{2}$ "	9'-4"	2	2	4	37.32	0.68	25
440		"	"	7'-0"	2	2	4	28.0	"	19
441		"	"	4'-0"	2	2	4	16.0	"	11
345		"	$\frac{3}{8}$ "	10'-3"	3	2	6	61.50	0.38	23
346		"	"	4'-3"	1	2	2	8.50	"	3

4333.23

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

STEEL SCHEDULE

FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	NRH 12-0 (1935)	1935	24	35

MK	DESCRIPTION	LOCATION	SIZE	LENGTH	Bars in each unit	No. of units	Total No. of bars	Total Length	Weight per foot	Total Weight
347		Superstr. End Post Slab & Wall	3/8"	4'-0"	6	2	12	48.0	0.38	18
348		"	3/8"	4'-6"	3	2	6	27.0	"	10
349		End Tie Beam	1/2"	3'-0"	12	2	24	72.0	"	27
350		End Post	3/8"	3'-6"	3	2	6	21.0	"	8
351		"	3/8"	4'-4"	3	2	6	43.33	"	16
351a		"	3/8"	5'-0"	1	4	4	20.0	"	8
351b		"	3/8"	5'-9"	1	4	4	23.0	"	9
352		"	3/8"	8'-0"	3	4	12	96.0	"	36
353		Curtain Wall	3/8"	37'-3"	1	4	4	149.0	"	57
354		"	3/8"	31'-3"	1	4	4	125.0	"	48
442		End Post Wall	1/2"	8'-7"	2	2	4	34.32	0.68	23
443		"	3/8"	6'-3"	4	2	8	50.0	"	34
355		"	3/8"	8'-9"	3	2	6	52.50	0.38	20
356		"	3/8"	4'-3"	1	2	2	8.50	"	3
357		Center Pier Post Reinf.	3/8"	4'-0"	2	4	8	32.0	"	12
358		"	3/8"	5'-3"	4	4	16	84.0	"	32
359		"	3/8"	6'-3"	2	4	8	50.0	"	19
360		"	3/8"	12'-6"	4	4	16	200.0	"	76
361		"	3/8"	9'-3"	4	4	16	148.0	"	56
444		Railing	3/8"	3'-4"	2	218	436	1451.88	0.68	987
362		"	3/8"	160'-0"	16	1	16	2560.0	0.38	973
200		"	1/4"	2'-3"	213	2	426	958.50	0.17	163
201		"	1/4"	1'-6"	213	2	426	639.0	"	109
363		"	3/8"	5'-0"	161	2	322	1610.0	0.38	612
1046		Col. Bars G.I.	3/8"	35'-0"	4	2	8	280.0	5.37	1504
1047		G2 & G3	3/8"	34'-11"	4	4	16	558.72	"	3000

MK	DESCRIPTION	LOCATION	SIZE	LENGTH	Bars in each unit	No. of units	Total No. of bars	Total Length	Weight per foot	Total Weight
512		R.W.W. at Beg. of Br. Footing	3/8"	6'-0"	8	1	8	552.0	1.06	585
511		"	3/8"	6'-0"	7	1	7	568.17	"	602
510		"	3/8"	7'-6"	8	1	8	602.67	"	639
365		"	3/8"	7'-6"	15	7	105	817.50	0.38	311
450		"	3/8"	12'-6"	5	8	40	500.0	0.68	340
710		W.W. Col.	3/8"	31'-1"	3	8	24	746.0	2.07	1544
711		"	3/8"	22'-3"	2	8	16	356.0	"	737
712		"	3/8"	16'-4"	2	8	16	261.33	"	541
451		"	3/8"	6'-0"	2	8	16	96.0	0.68	65
452		"	3/8"	3'-0"	2	8	16	48.0	"	33
453		"	3/8"	8'-11"	1	8	8	71.33	"	49
366		"	3/8"	30'-9"	3	8	24	738.0	0.38	280
367		"	3/8"	11'-9"	17	8	136	1598.0	"	607
368		"	3/8"	7'-6"	9	8	72	576.0	"	219
369		"	3/8"	6'-0"	6	8	48	288.0	"	109
713		"	3/8"	10'-0"	5	8	40	400.0	2.07	828
370		Col.	3/8"	3'-9"	4	8	32	120.0	0.38	46
371		Front Wall	3/8"	15'-3"	3	8	24	777.75	"	296
372		"	3/8"	7'-0"	11	1	11	99.0	"	38
373		"	3/8"	70'-6"	10	1	10	705.0	"	268
374		"	3/8"	64'-0"	8	1	8	512.0	"	195
375		"	3/8"	16'-9"	8	1	8	134.0	"	51
513		Front Wall Top Beam	3/8"	35'-4"	4	1	4	141.33	1.06	150
514		"	3/8"	37'-10"	1	1	1	37.83	"	40
376		"	3/8"	3'-3"	30	1	30	97.50	0.38	37
515		Rear Curtain Wall	3/8"	60'-6"	4	1	4	242.0	1.06	257
454		"	3/8"	61'-4"	4	2	8	490.67	0.68	334

MK	DESCRIPTION	LOCATION	SIZE	LENGTH	Bars in each unit	No. of units	Total No. of bars	Total Length	Weight per foot	Total Weight
455		Rear Curtain Wall	3/8"	63'-2"	5	1	5	315.83	0.68	215
377		"	3/8"	8'-6"	50	1	50	425.0	0.38	162
456		slab.	3/8"	11'-0"	29	1	29	319.0	0.68	217
458		"	3/8"	13'-6"	20	1	20	270.0	0.68	184
459		"	3/8"	5'-1"	23	1	23	116.84	"	79
378		"	3/8"	10'-6"	66	1	66	699.0	0.38	263
460		"	3/8"	70'-7"	7	1	7	494.08	0.68	336
461		"	3/8"	54'-0"	8	1	8	548.0	"	373
462		"	3/8"	15'-0"	7	1	7	105.0	"	71
463		"	3/8"	7'-0"	7	1	7	49.0	"	33
464		"	3/8"	17'-0"	7	1	7	119.0	"	81
379		"	3/8"	35'-0"	8	1	8	280.0	0.38	106
365	See Sketch	Small W.W. Footing	3/8"	7'-6"	30	2	60	450.0	"	171
516		"	3/8"	58'-4"	15	2	30	587.40	1.06	623
465		"	3/8"	18'-3"	8	2	16	292.0	0.68	199
450	See Sketch	"	3/8"	12'-6"	5	4	20	250.0	"	170
710		Col.	3/8"	31'-1"	3	4	12	372.96	2.07	772
711		"	3/8"	22'-3"	2	4	8	178.0	"	368
712		"	3/8"	16'-4"	2	4	8	130.64	"	270
451		"	3/8"	6'-0"	2	4	8	48.0	0.68	33
452		"	3/8"	3'-0"	2	4	8	24.0	"	16
453		"	3/8"	8'-11"	1	4	4	35.68	"	24

TERRITORIAL HIGHWAY DEPARTMENT
TERRITORY OF HAWAII
WAHIAWA BRIDGE
NO 6 STA. 80+74.70 TO STA. 82+56
KAUAI BELT ROAD N.R.H. 12-D.
DATE June 1935 SHEET 16 OF 17 SHEETS.

4333.24

ORIGINAL SURVEY PLAT BY DATE
DESIGNED BY
PLAN
NOTED BY
QUANTITIES BY
CHECKED BY
NO.

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW	N.R.H. 12-D(1935)	1935	25	35

ORIGINAL PLAN NOTEBOOK No. _____

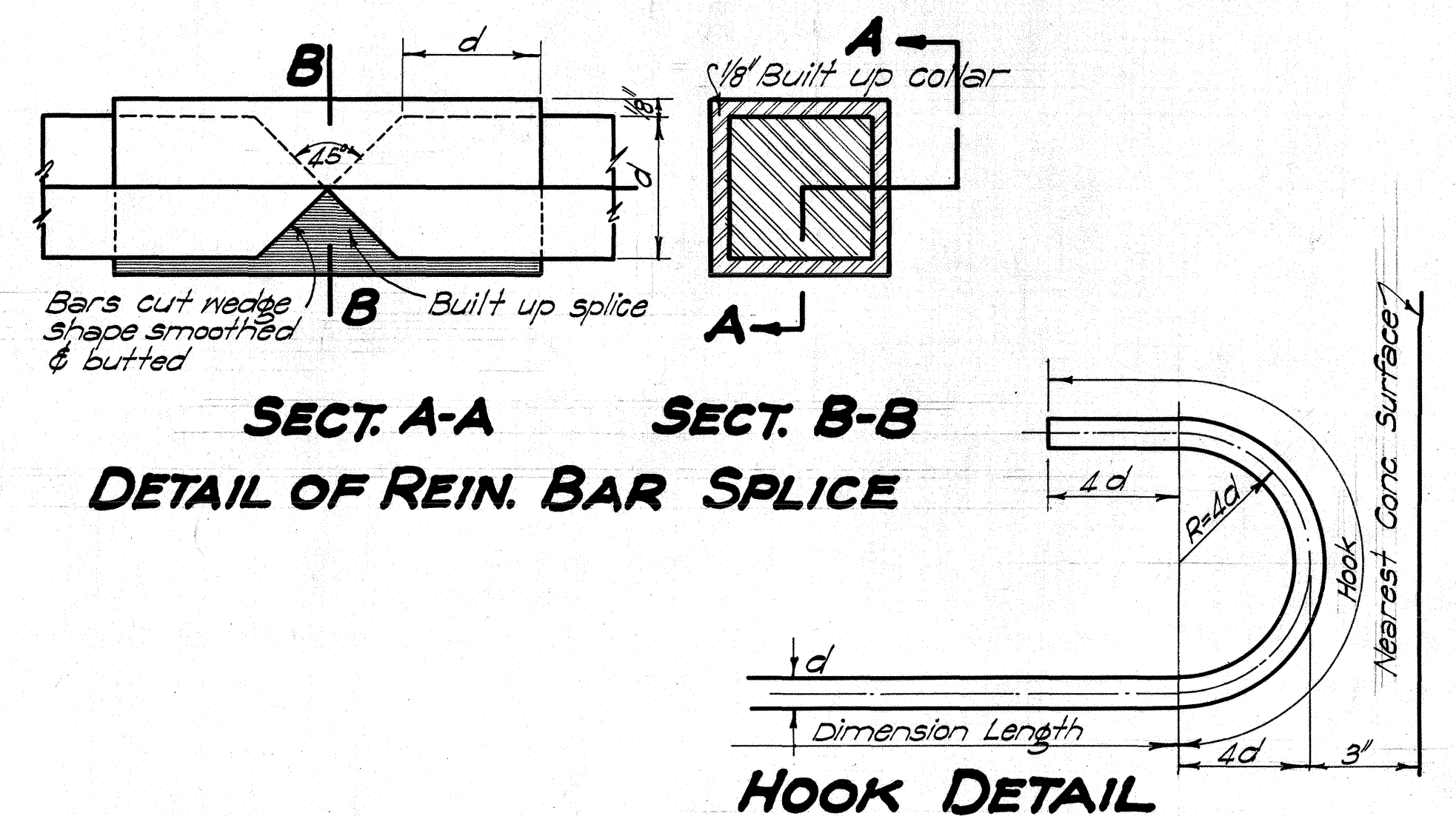
SURVEY PLOTTED BY _____ DATE _____

DESIGNED BY **V.R.B.** _____

DRAWN BY **C.F.N.** _____

CHECKED BY **C.F.N.** _____

DATE _____

[illegible]

TERRITORIAL HIGHWAY DEPARTMENT.
TERRITORY OF HAWAII.

WAHIAWA BRIDGE.

NO 6 STA. 80+74 TO STA. 82+56.

KAUAI BELT ROAD N.E.H. 12-D.

DATE June 1935 SHEET 17 OF 17 SHEETS.

4333.25