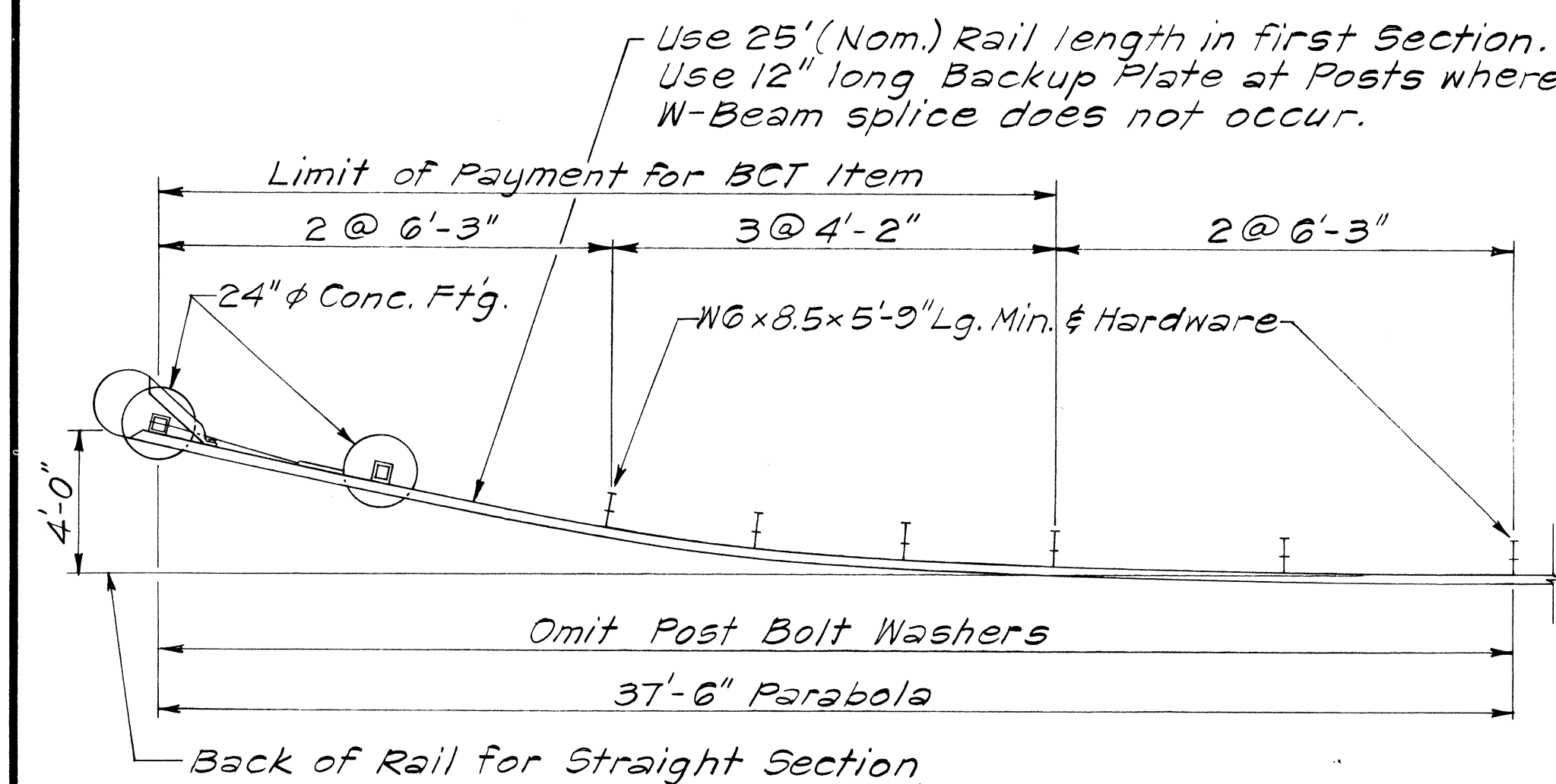
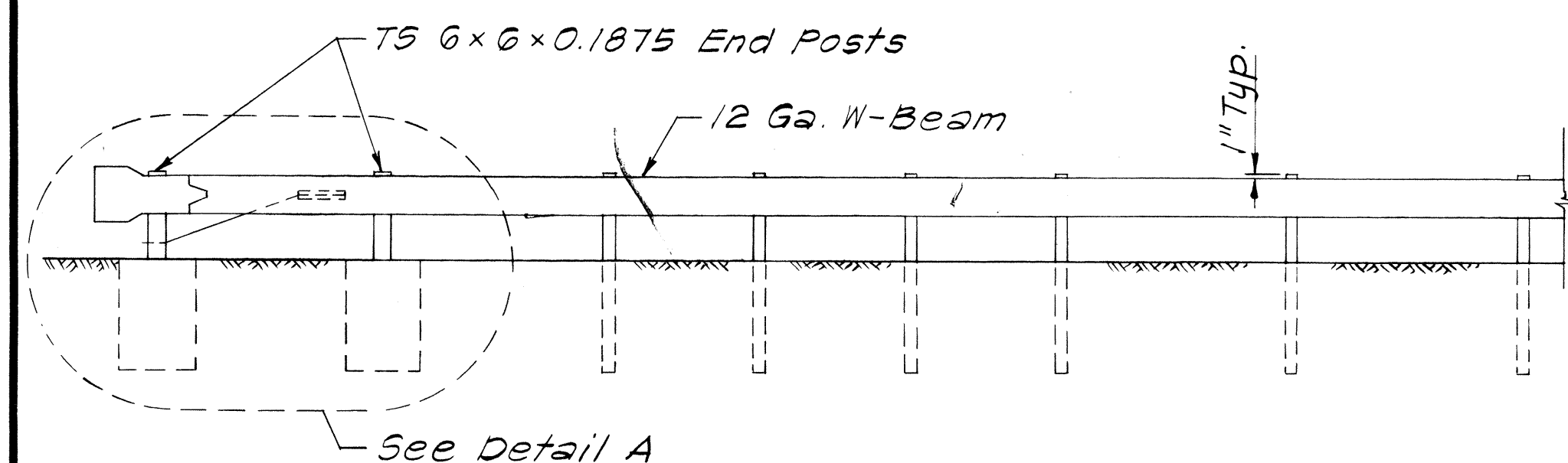


FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-078-1(17)	1978	C022S-1	164



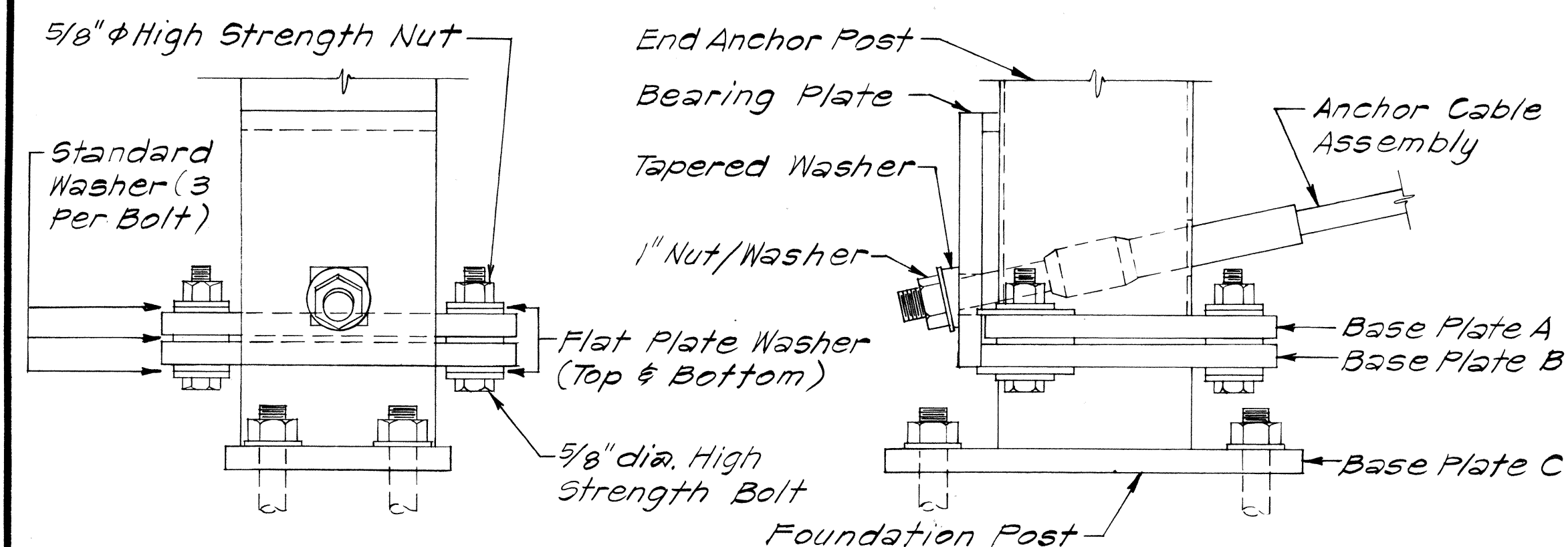
PLAN

Scale: 1/4" = 1'-0"



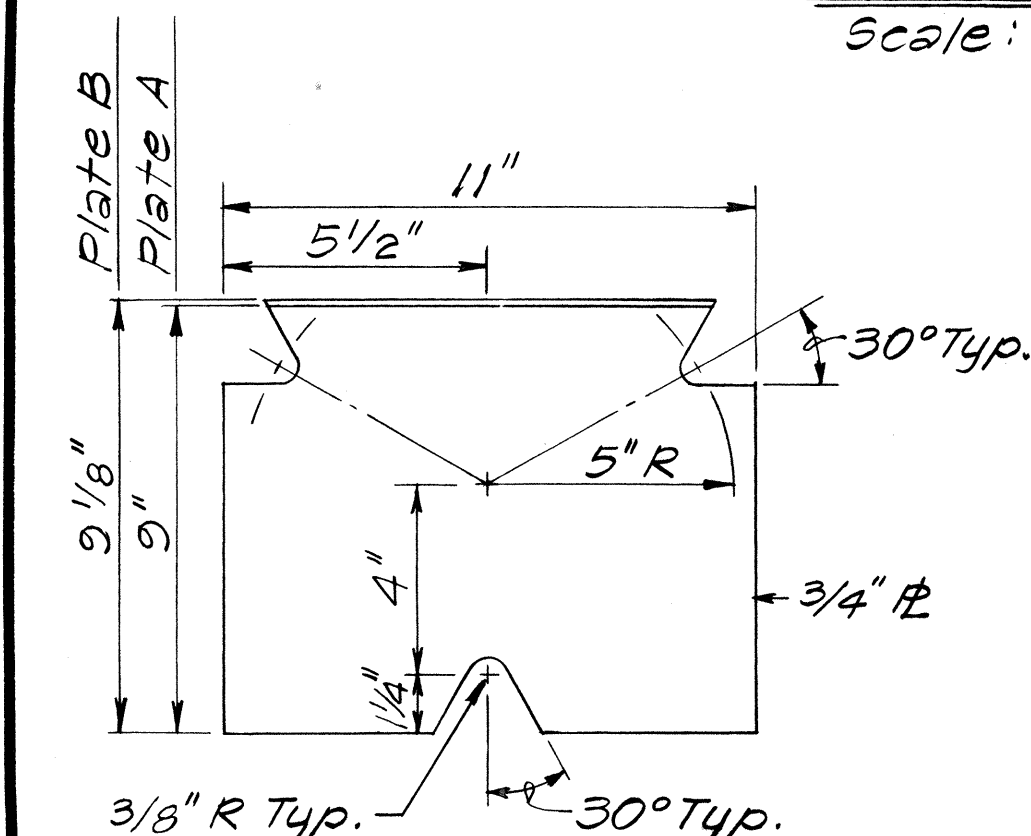
ELEVATION

Scale: 1/4" = 1'-0"



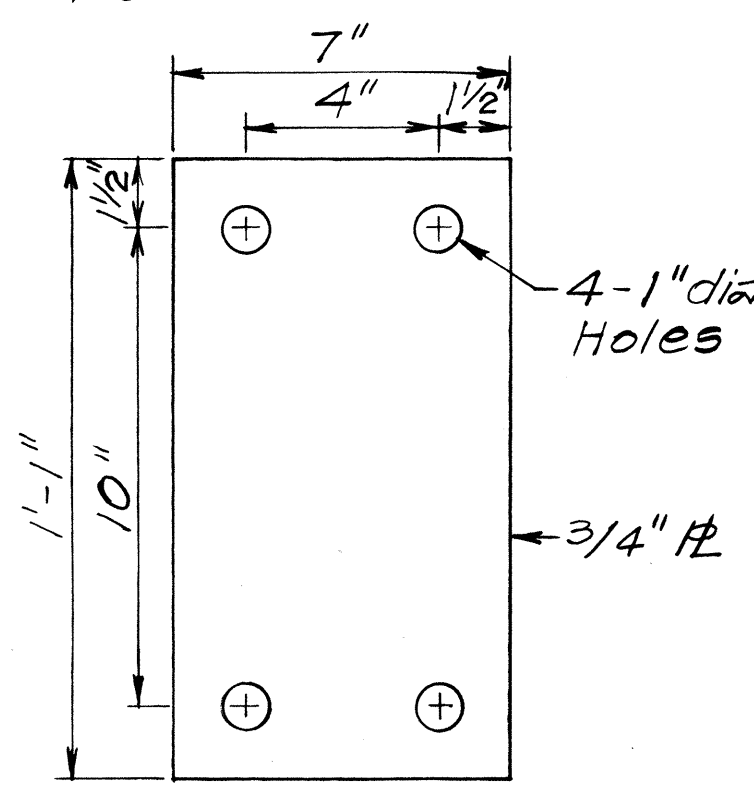
DETAIL B

Scale: 3" = 1'-0"



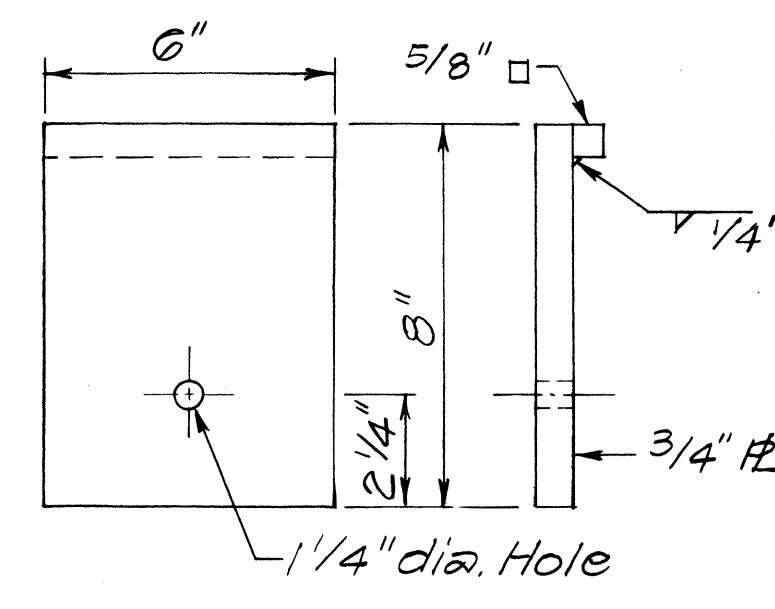
BASE PLATES A & B

Scale: 3" = 1'-0"



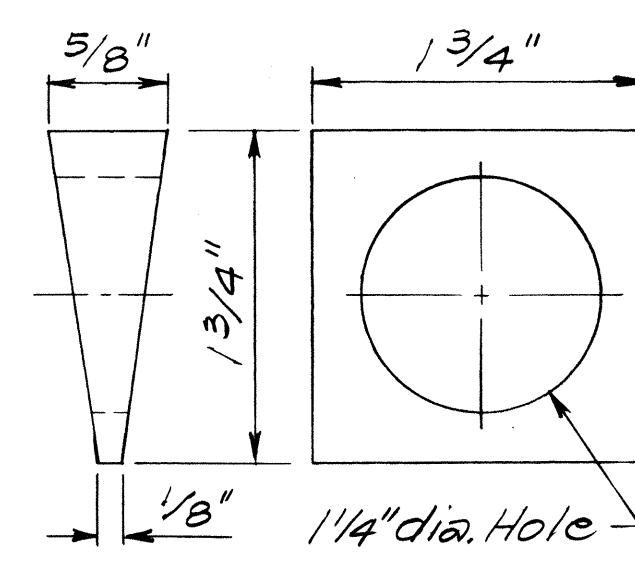
BASE PLATE C

Scale: 3" = 1'-0"



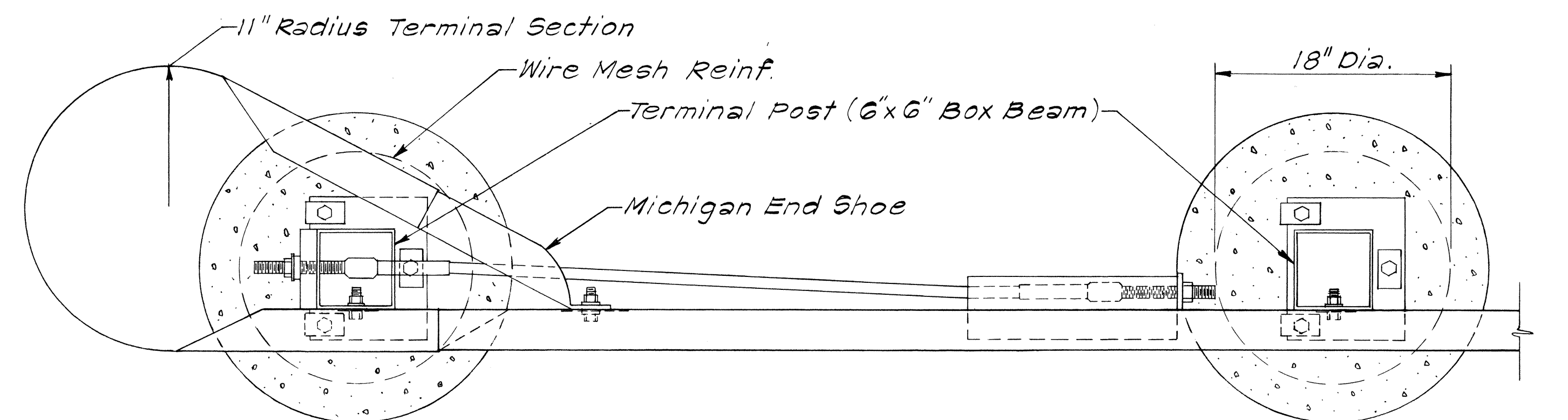
BEARING PLATE

Scale: 3" = 1'-0"

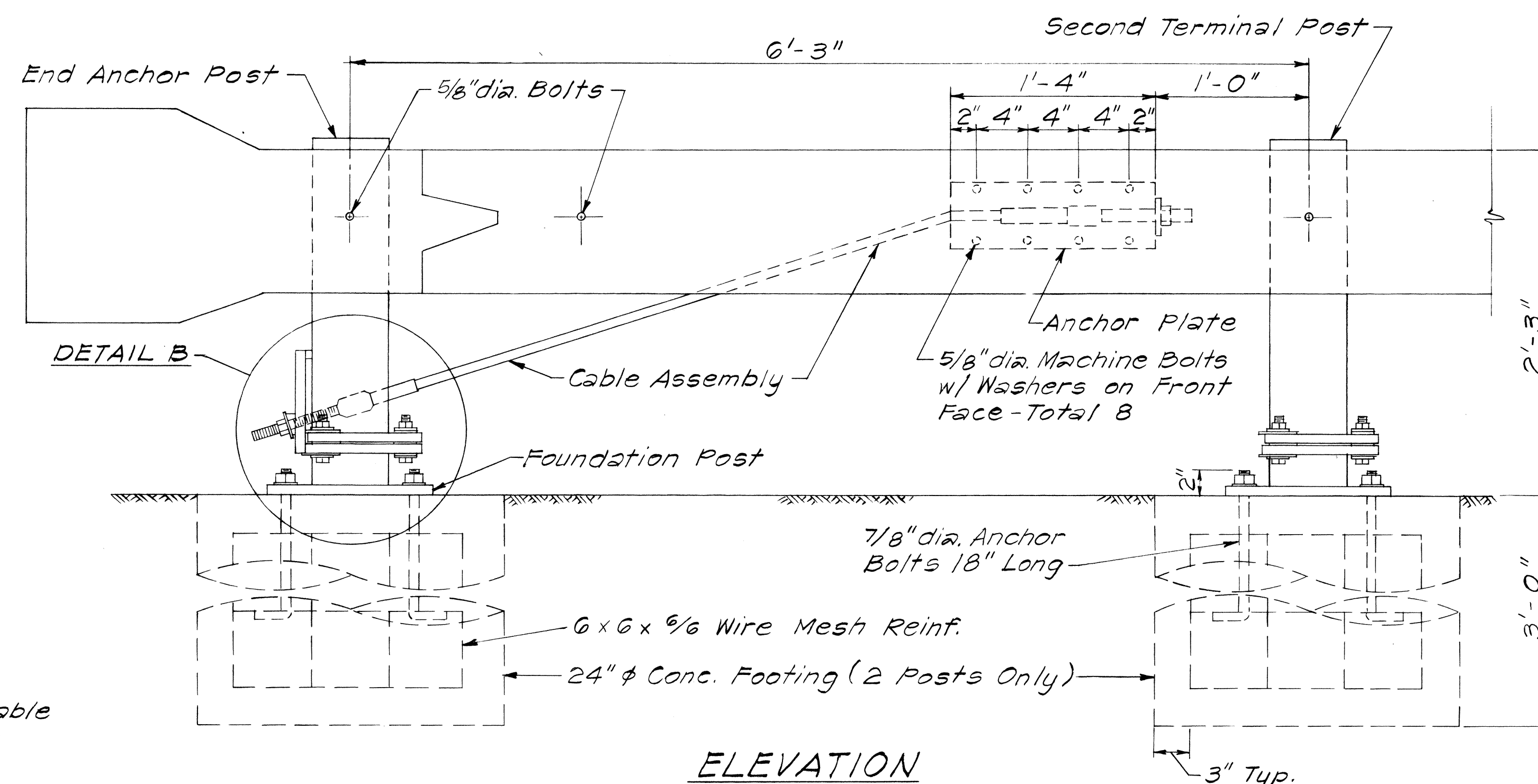


TAPERED WASHER

Scale: Full Size

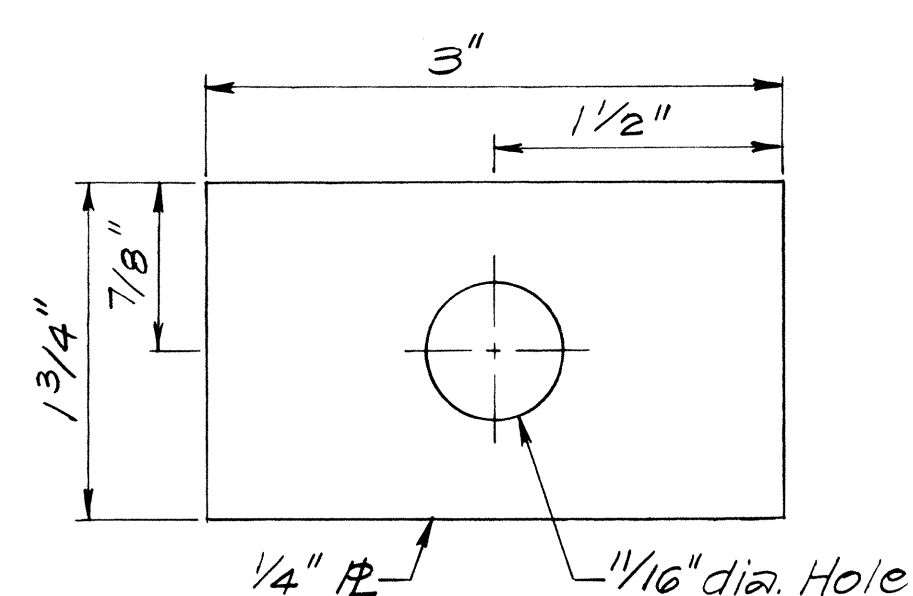


PLAN



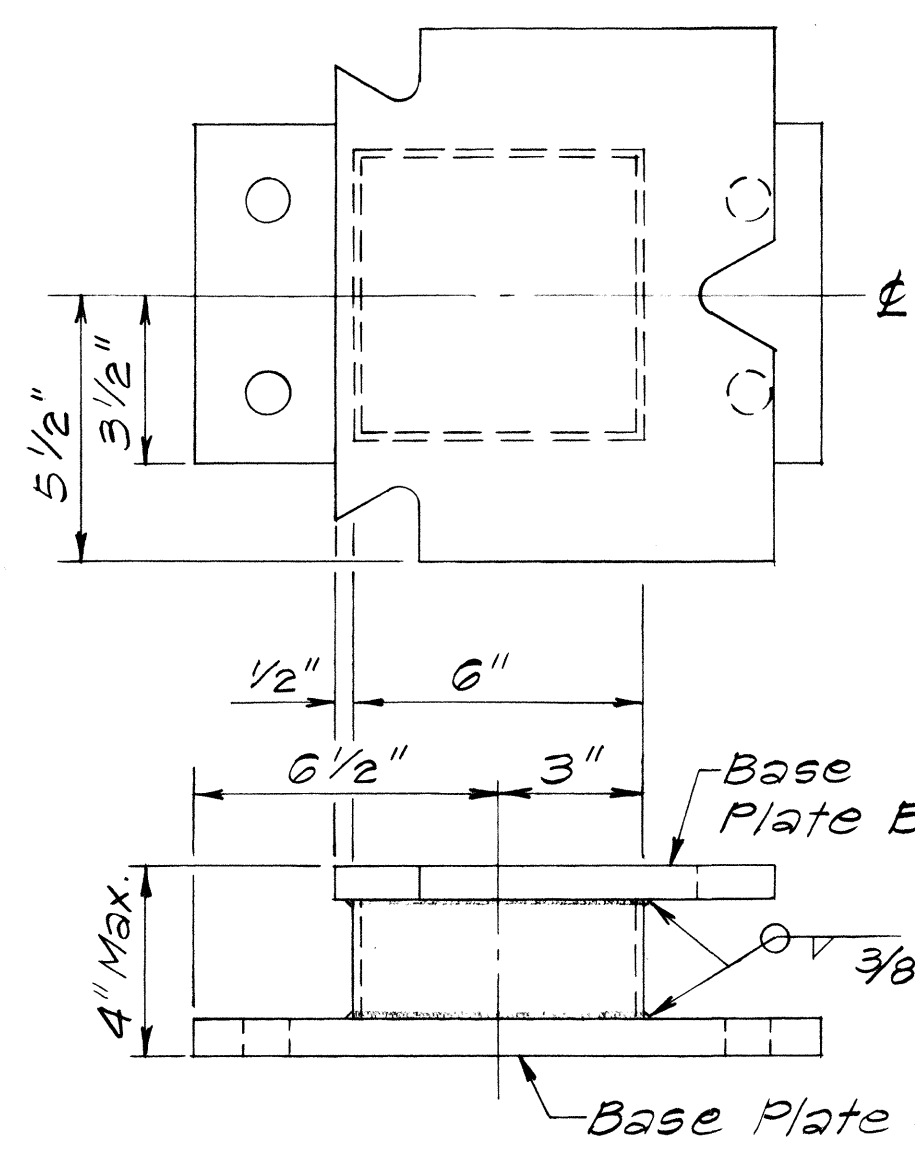
ELEVATION

Scale: 1/2" = 1'-0"



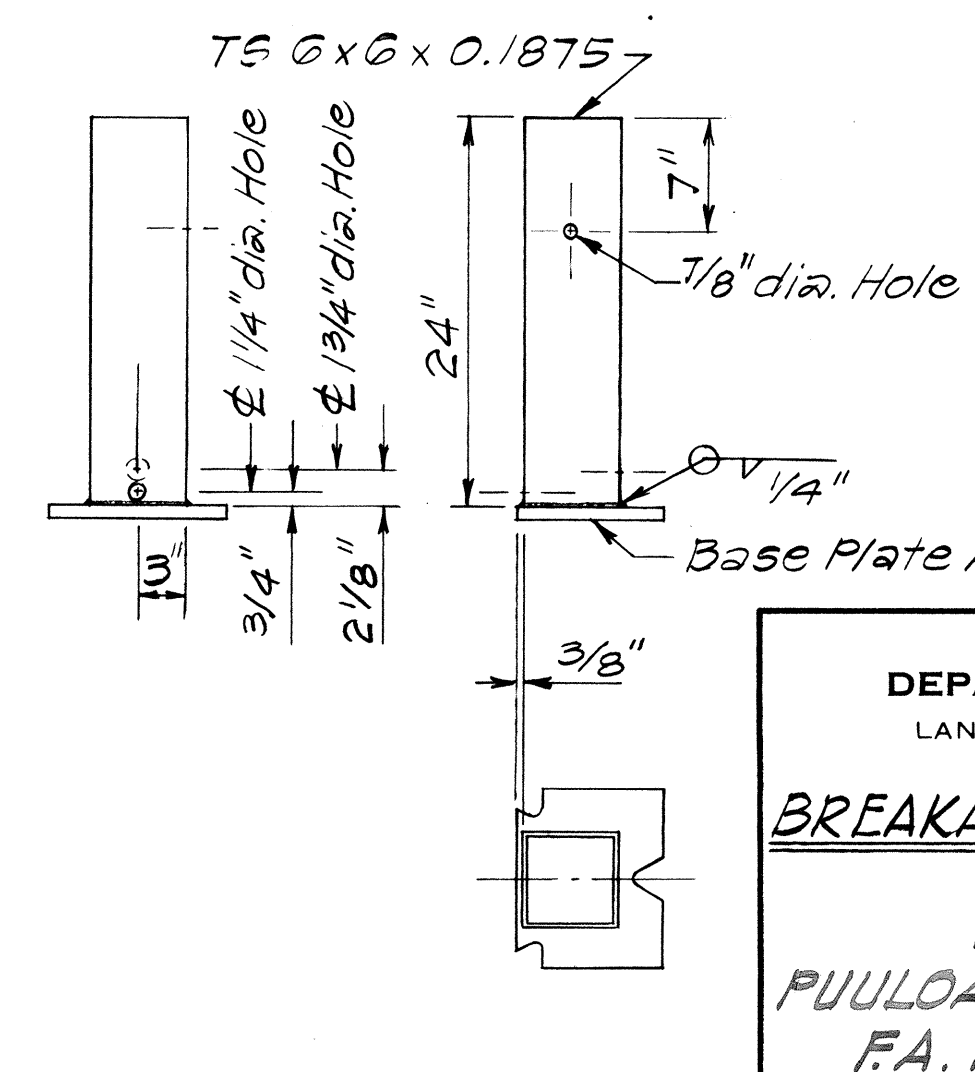
FLAT PLATE WASHER

Scale: Full Size



FOUNDATION POST

Scale: 3" = 1'-0"



TERMINAL POST

Scale: 1" = 1'-0"

- NOTES:**
1. Anchor Plate and Anchor Cable Assembly (Standard Swaged Fitting and Stud). See Standard Detail Sheet No. DT 520.
 2. Other Anchor Cable Assemblies may be used. Minimum breaking strength of Assembly should be 40,000 lbs.
 3. Second Terminal Post does not require holes to accommodate Anchor Cable.
 4. Slip Base Load shall be controlled with a Calibrated Torque Wrench ~ Torque 155-170 ft.-lbs.
 5. Concrete Footing Class A.

THIS TRACING
PREPARED DURING
"AS-BUILT" POSTING

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
LAND TRANSPORTATION FACILITIES DIVISION

BREAKAWAY CABLE TERMINAL (BCT)

MOANALUA ROAD
PUULOA I.C. TO MIDDLE ST.-UNIT 2
F.A. PROJ. NO. F-FF-078-1(17)

Scale: As Shown Date: June 1978

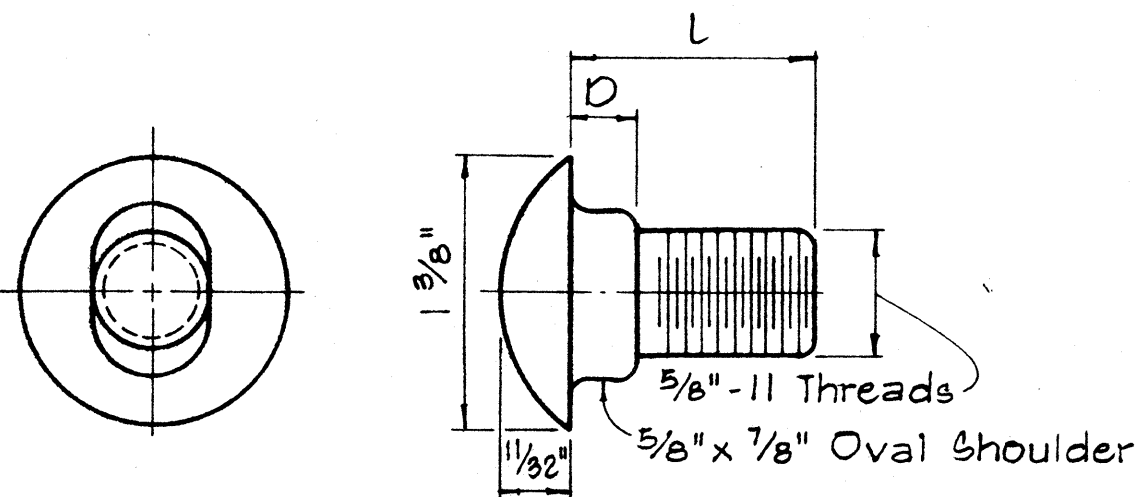
SHEET No. 1a OF 17 SHEETS

C022S-1

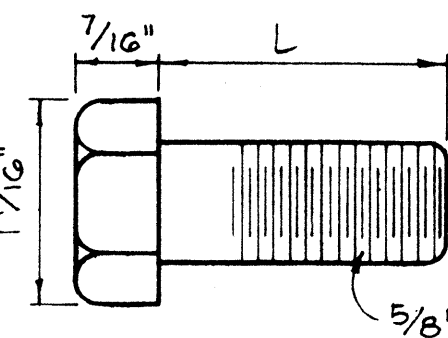
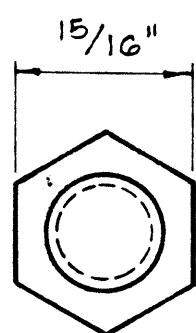
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-078-1(17) FF-078-1(17)	1977	24	164

BOLT DIMENSIONS		
TYPE A BOLT		
	D	L
Splice Bolt	5/16"	1 1/4"
Post Bolt for Conc. Post w/ Double Wood Blocks	3/32"	24"
Post Bolt for Conc. Post w/ Single Wood Block	3/32"	18"
Rail Bolt for Metal Block	3/32"	2"

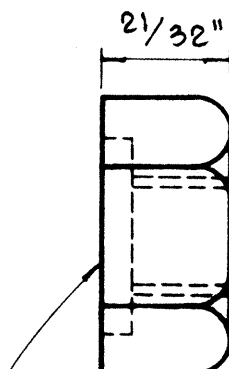
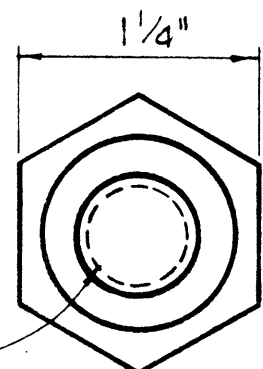
BOLT DIMENSIONS		
TYPE B BOLT		
		L
Post Bolt for Conc. Post w/ Metal Blocks		2 1/2"
Post Bolt for Metal Post w/ Metal Block		1 3/4"



TYPE A BOLT



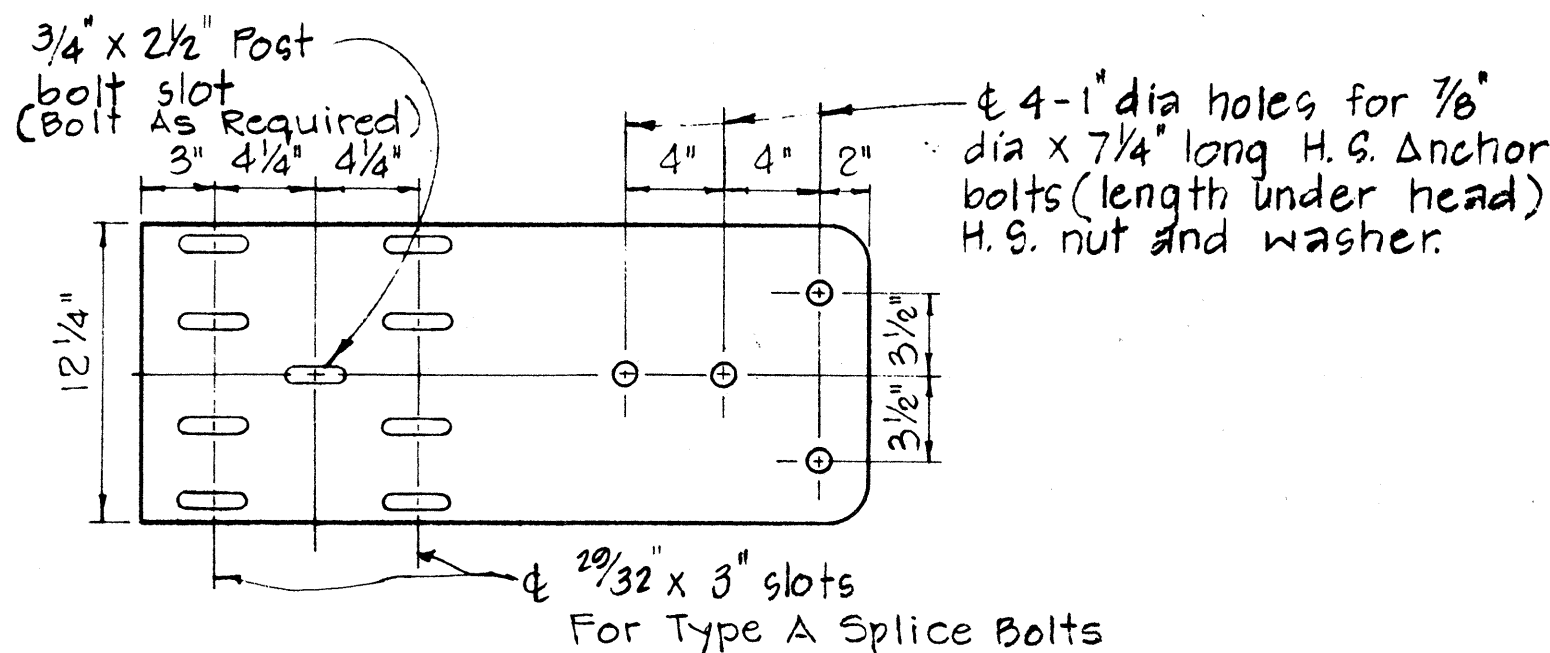
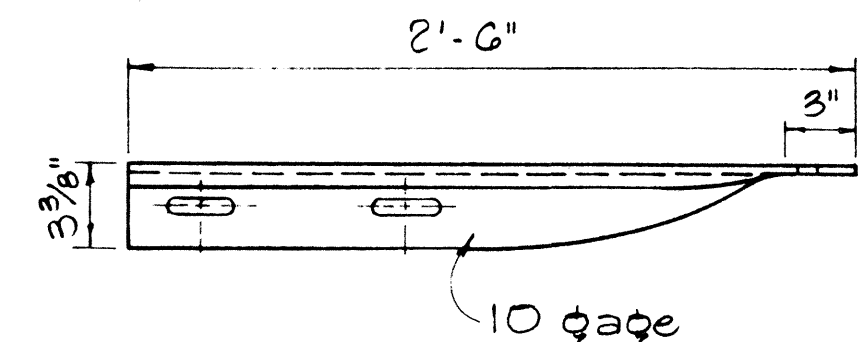
TYPE B BOLT



5/32" Deep x 1 5/16" Dia. C' Bore
for Type A Bolt only.
Plain nut for Type B Bolt.

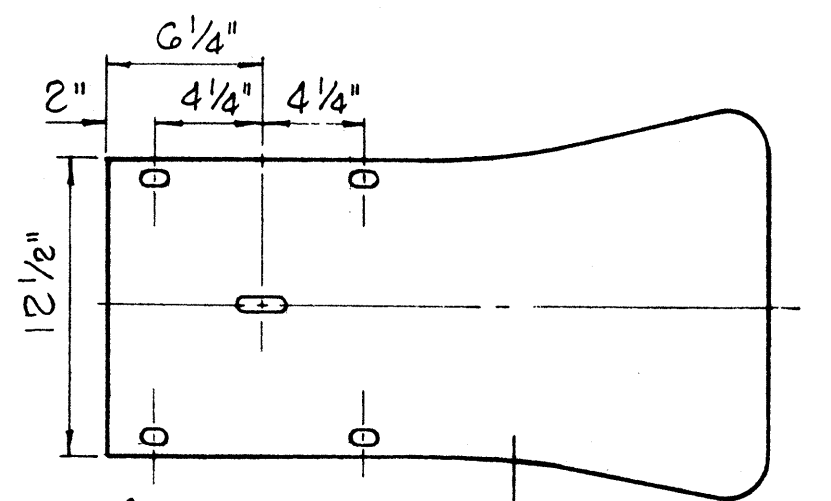
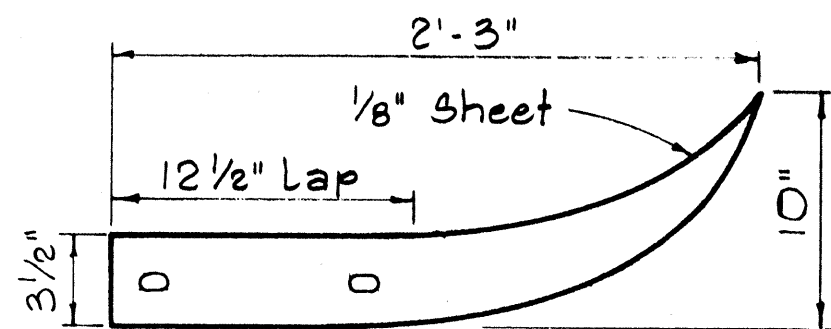
HEXAGON NUT

Scale: Full Size



SPECIAL END SHOE

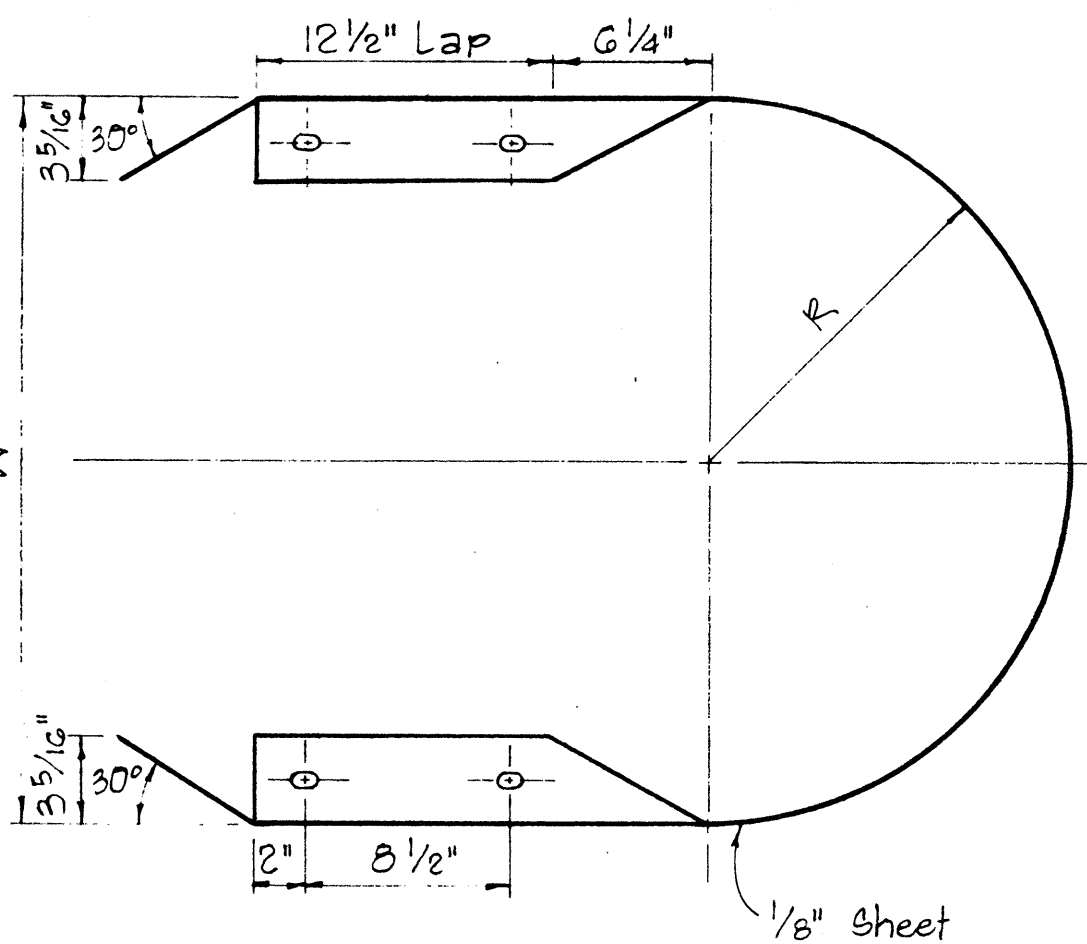
Scale: 1 1/2" = 1'-0"



Same as rail element section

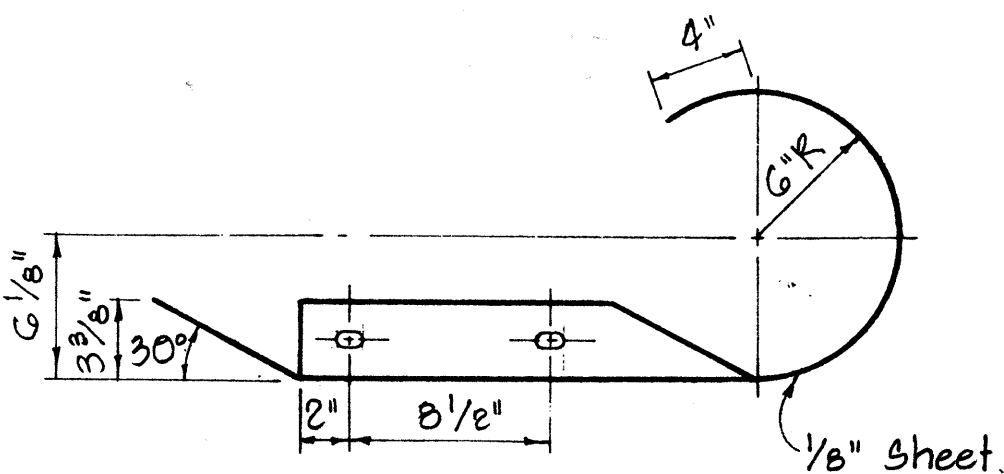
FLARED END

Scale: 1 1/2" = 1'-0"



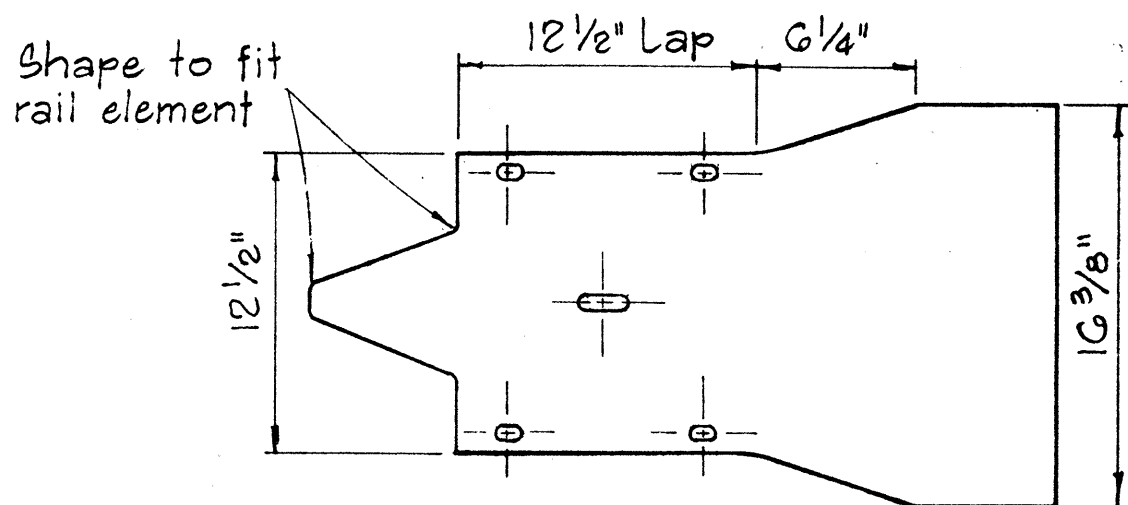
MEDIAN END

Scale: 1 1/2" = 1'-0"

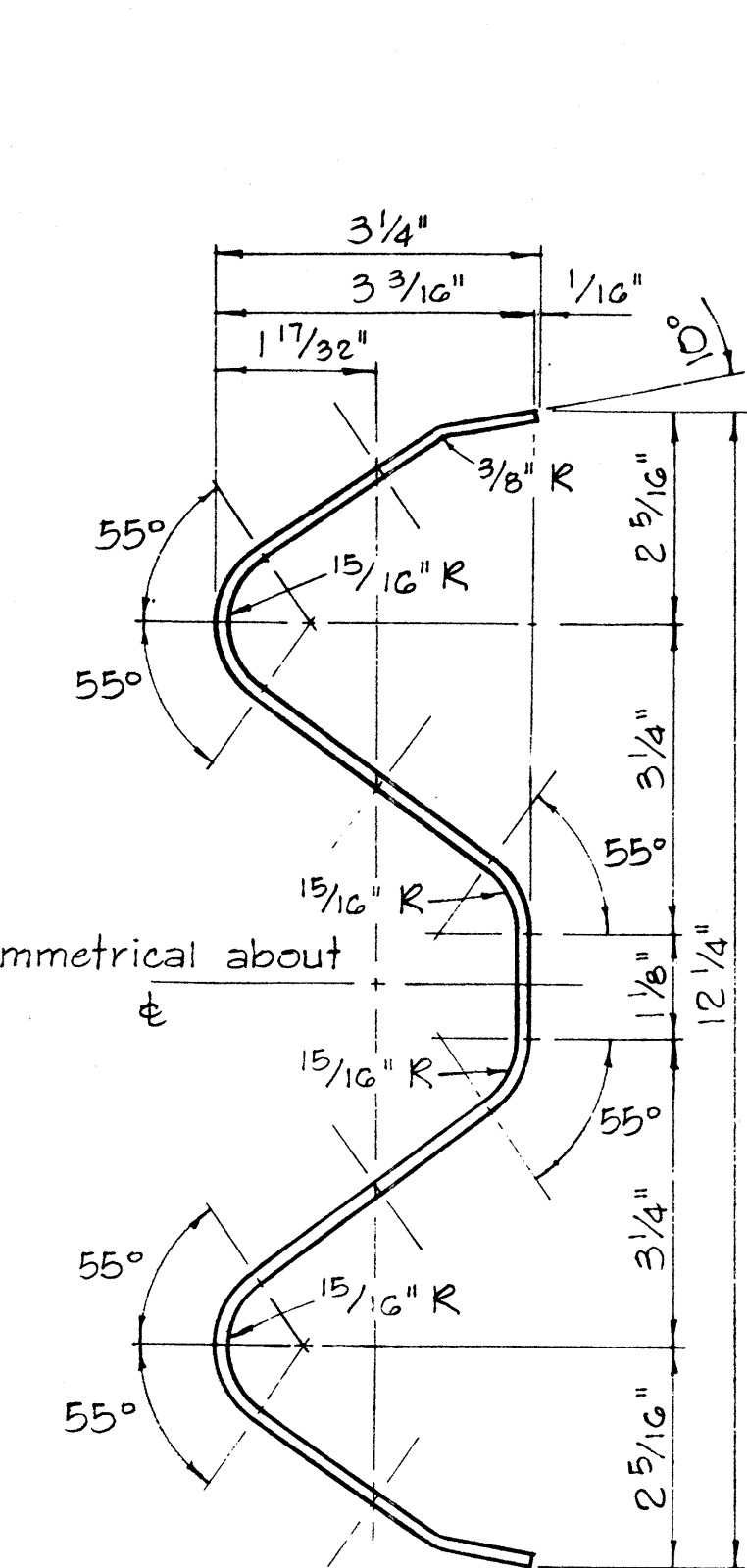


CURVED END

Scale: 1 1/2" = 1'-0"

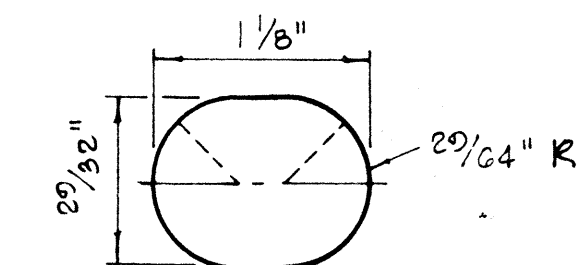


Shape to fit rail element



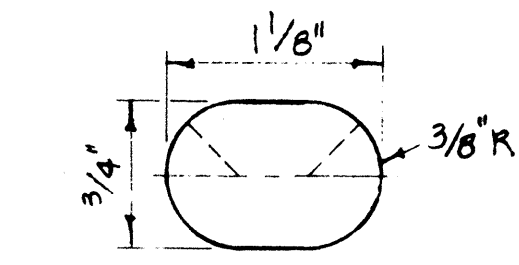
RAIL ELEMENT SECTION

Scale: 6" = 1'-0"

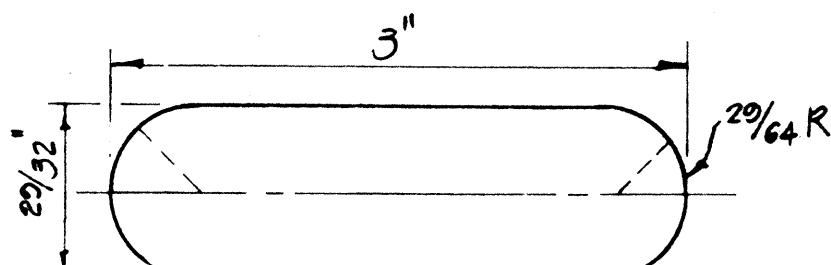


SPICE BOLT SLOT

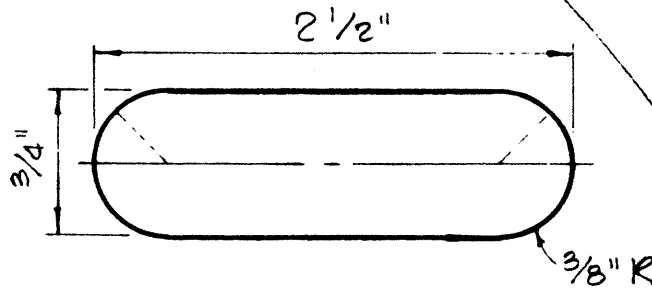
Scale: Full Size



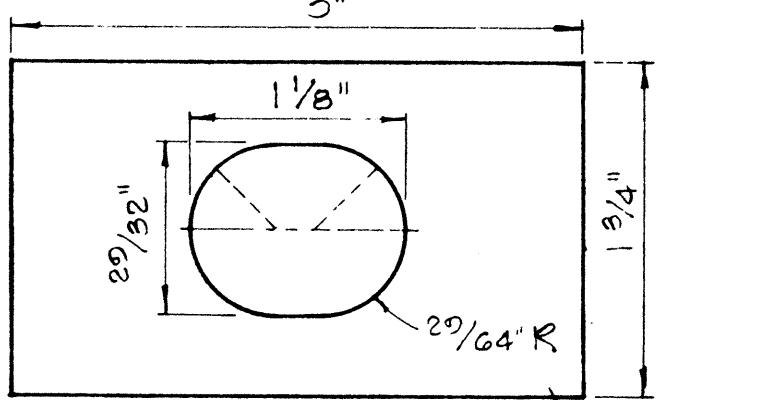
SPICE BOLT SLOT
FOR ALL ENDS



SPICE BOLT SLOT
FOR SPECIAL END SHOE



POST BOLT SLOT

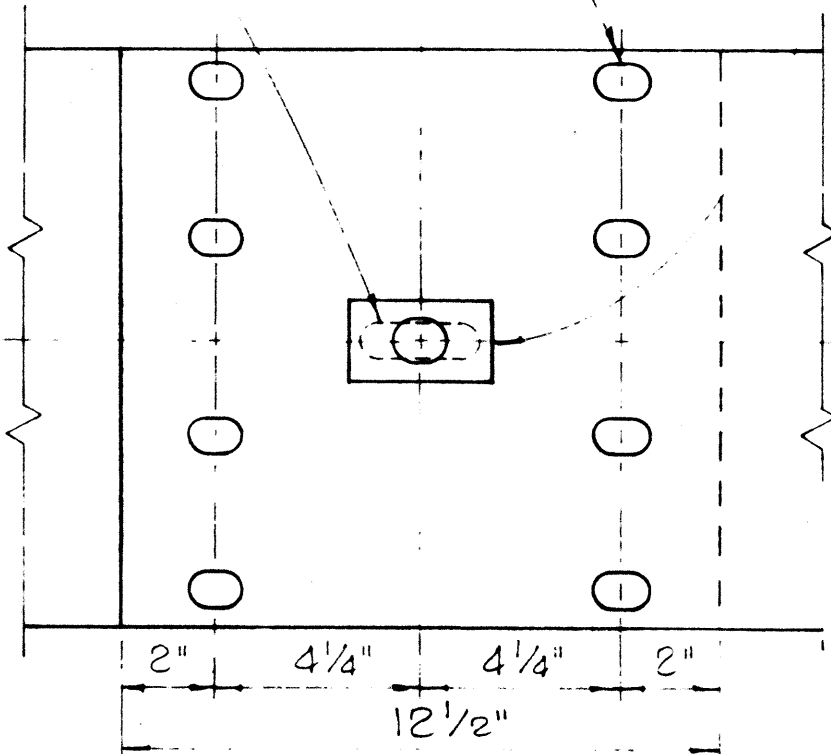


RAIL WASHER

NOTES:

1. H.S. Bolts shall conform to the requirements of ASTM A 325.
2. Special End Shoe shall be fabricated from 10 Gage steel conforming to the requirements of AASHTO 180.
3. Lap in direction of traffic.

MEDIAN END DIMENSIONS			
TYPE OF POST AND BLOCK	W	R	
Double Metal Guard Rail on Concrete Post with Wood Blocks	29 3/4"	14 7/8"	
Double Metal Guard Rail on Concrete Post with Metal Blocks (BJG)	26 1/2"	13 1/4"	
Double Metal Guard Rail on Metal Post with Metal Blocks (BJG)	24 3/8"	12 3/16"	



RAIL SPICE

Scale: 3" = 1'-0"

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

STANDARD DETAILS
METAL GUARD RAIL

Scale: As Noted

August, 1968

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	1078-1(17)	1977	25	164

PLAN
SC 1/2" = 1'-0"

The plan view shows two columns of the barrier transition. Each column is 1'-6" wide and has a 10:1 taper (minimum). The columns are separated by a construction joint. Reinforcement includes #3 bars at 6" o.c. horizontally and #3 bars at 12" o.c. vertically. A 1/2" clear space is shown at the top of the columns. The barrier is shown with a 10:1 taper (minimum) on both sides. The ground surface is indicated by a dashed line.

ELEVATION
SC 1/2" = 1'-0"

The elevation view shows the side profile of the barrier transition. It features two columns with a 10:1 taper (minimum). The columns are separated by a construction joint. Reinforcement includes #3 bars at 6" o.c. horizontally and #3 bars at 12" o.c. vertically. The ground surface is indicated by a dashed line. The barrier is shown with a 10:1 taper (minimum) on both sides.

TYP. SEC. AT TANGENT
SC 1" = 1'-0"

This section shows the barrier transition at a tangent. The barrier has a 3/4" chamfer. The reinforcement includes #3 bars at 6" o.c. horizontally and #3 bars at 12" o.c. vertically. The ground surface is indicated by a dashed line. The barrier is shown with a 10:1 taper (minimum) on both sides.

TYP. SEC. AT SUPER
SC 3/4" = 1'-0"

This section shows the barrier transition at a super. The barrier has a 3/4" chamfer. The reinforcement includes #3 bars at 6" o.c. horizontally and #3 bars at 12" o.c. vertically. The ground surface is indicated by a dashed line. The barrier is shown with a 10:1 taper (minimum) on both sides. A note indicates that the height is controlled by the higher side.

APPROVAL RECOMMENDED:
Eishi Tanaka
 TRAFFIC ENGINEER
 12/29/69
 DATE

APPROVED:
William S. S. S.
 ASSISTANT CHIEF, ENGINEERING
 12-30-69
 DATE

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
 DEPARTMENT OF TRANSPORTATION
 HIGHWAYS DIVISION
STANDARD DETAIL
CONCRETE BARRIER
TRANSITION
 Scale As Noted Feb. 1969
 SHEET No. 4 OF 17 SHEETS DT 51

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	1078-1(17)	1977	25	164

PLAN
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, 1'-6" Varies, 1'-6", 1 1/2" clear at top, Construction Joint, Apply 1-layer 55# Composition Roofing Material around Column Surface.

ELEVATION
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, 1'-6" Varies, 1'-6", Construction Joint, Finish Ground.

TYP. SEC. AT TANGENT
SC 1" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground.

TYP. SEC. AT SUPER
SC 3/4" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground, This height controlled by higher side.

APPROVAL RECOMMENDED:
Eishi Tanaka
 TRAFFIC ENGINEER
 12/29/69
 DATE

APPROVED:
William S. S. S.
 ASSISTANT CHIEF, ENGINEERING
 12-30-69
 DATE

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
 DEPARTMENT OF TRANSPORTATION
 HIGHWAYS DIVISION
STANDARD DETAIL
CONCRETE BARRIER
TRANSITION
 Scale As Noted Feb. 1969
 SHEET No. 4 OF 17 SHEETS DT 51

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	1078-1(17)	1977	25	164

PLAN
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, 1'-6" Varies, 1'-6", Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, 1/2" clear at top, Construction Joint, Apply 1-layer 55# Composition Roofing Material around Column Surface.

ELEVATION
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, 1'-6" Varies, 1'-6", Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, Construction Joint, Finish Ground.

TYP. SEC. AT TANGENT
SC 1" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground.

TYP. SEC. AT SUPER
SC 3/4" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground, This height controlled by higher side.

APPROVAL RECOMMENDED:
Eishi Tanaka
 TRAFFIC ENGINEER 12/29/69 DATE

APPROVED:
William S. S. S.
 ASSISTANT CHIEF, ENGINEERING 12-30-69 DATE

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
 DEPARTMENT OF TRANSPORTATION
 HIGHWAYS DIVISION

STANDARD DETAIL
 CONCRETE BARRIER
 TRANSITION

Scale As Noted Feb. 1969

SHEET No. 4 OF 17 SHEETS DT 51

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	1078-1(17)	1977	25	164

PLAN
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, 1'-6" Varies, 1'-6", Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, 1/2" clear at top, Construction Joint, Apply 1-layer 55# Composition Roofing Material around Column Surface.

ELEVATION
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, 1'-6" Varies, 1'-6", Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, Construction Joint, Finish Ground.

TYP. SEC. AT TANGENT
SC 1" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground.

TYP. SEC. AT SUPER
SC 3/4" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground, This height controlled by higher side.

APPROVAL RECOMMENDED:
Eishi Tanaka
 TRAFFIC ENGINEER 12/29/69 DATE

APPROVED:
William S. S. S.
 ASSISTANT CHIEF, ENGINEERING 12-30-69 DATE

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
 DEPARTMENT OF TRANSPORTATION
 HIGHWAYS DIVISION

STANDARD DETAIL
 CONCRETE BARRIER
 TRANSITION

Scale As Noted Feb. 1969

SHEET No. 4 OF 17 SHEETS DT 51

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	1078-1(17)	1977	25	164

PLAN
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, 1'-6" Varies, 1'-6", Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, 1/2" clear at top, Construction Joint, Apply 1-layer 55# Composition Roofing Material around Column Surface.

ELEVATION
SC 1/2" = 1'-0"

Labels: Conc. Barrier, 10:1 Taper (Minimum), Varies, 1'-6" Varies, 1'-6", Column, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, Construction Joint, Finish Ground.

TYP. SEC. AT TANGENT
SC 1" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground.

TYP. SEC. AT SUPER
SC 3/4" = 1'-0"

Labels: 3/4" Chamfer, #3 at 6" o.c. Hor. bars, #3 at 12" o.c. Vert. bars, R=10", 2'-0", 10", 6", Finish Ground, This height controlled by higher side.

APPROVAL RECOMMENDED:
Etsuki Tanaka
 TRAFFIC ENGINEER
 12/29/69
 DATE

APPROVED:
William S. S. S.
 ASSISTANT CHIEF, ENGINEERING
 12-30-69
 DATE

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
 DEPARTMENT OF TRANSPORTATION
 HIGHWAYS DIVISION

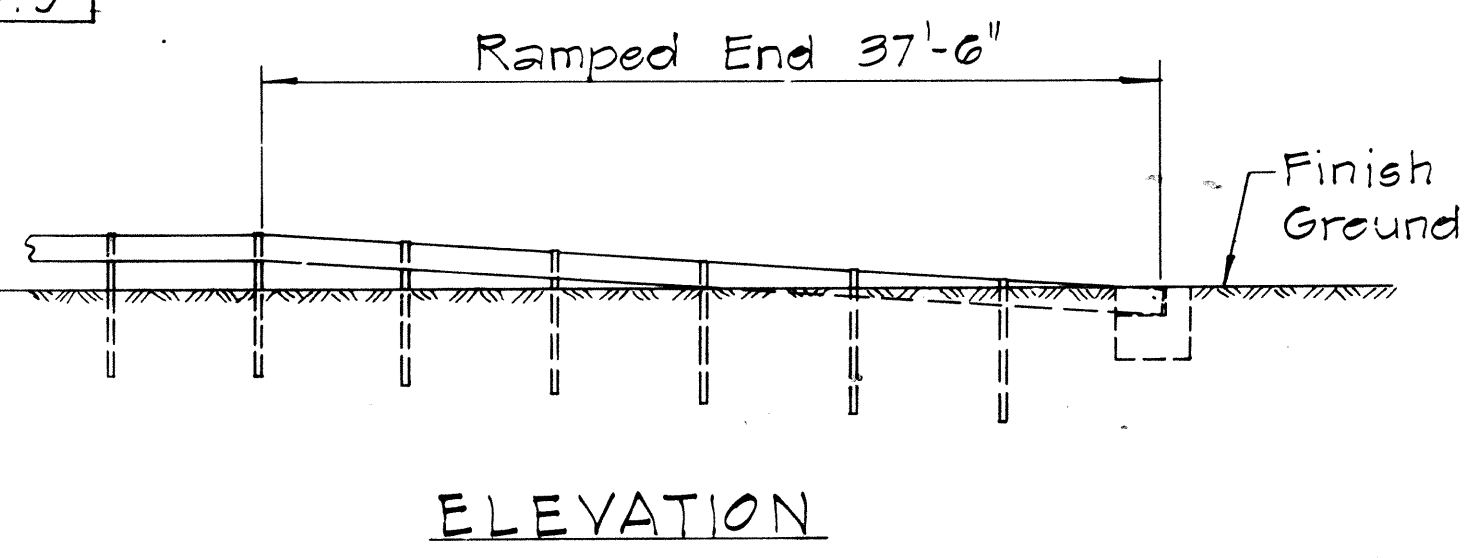
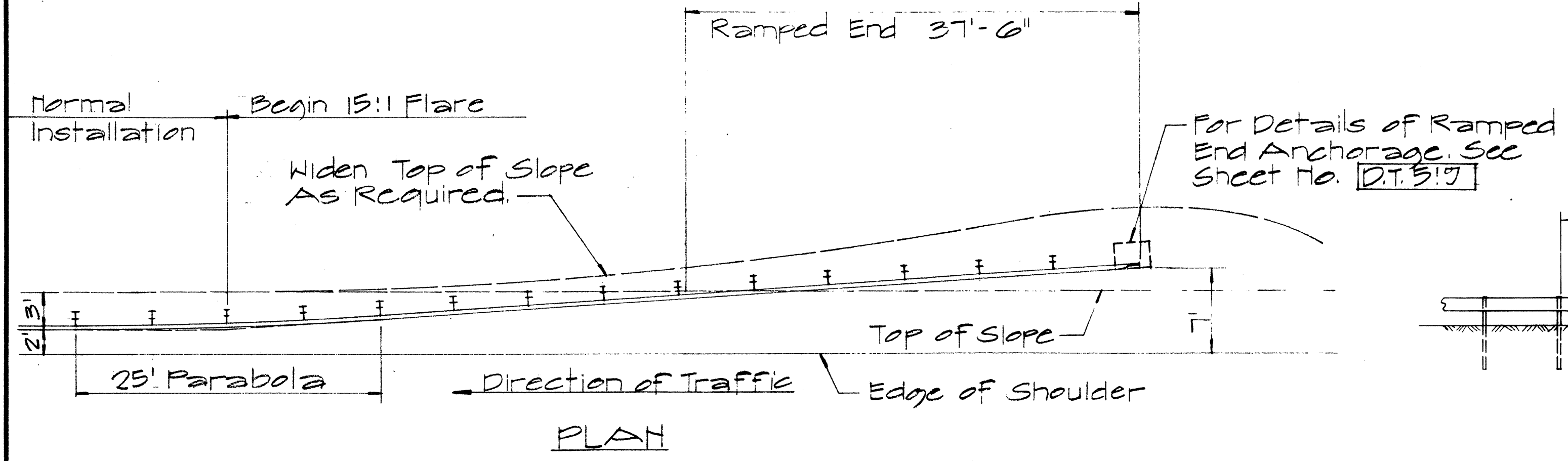
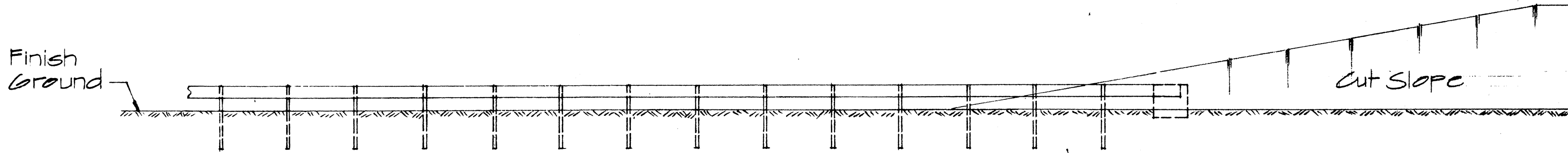
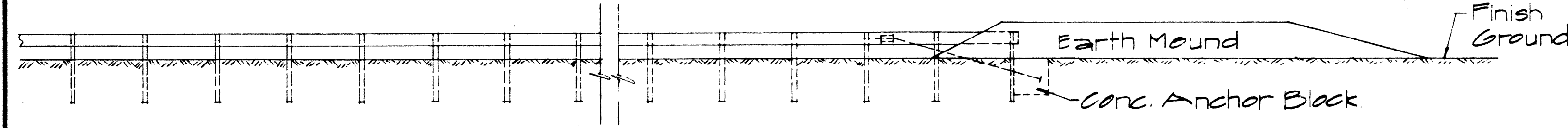
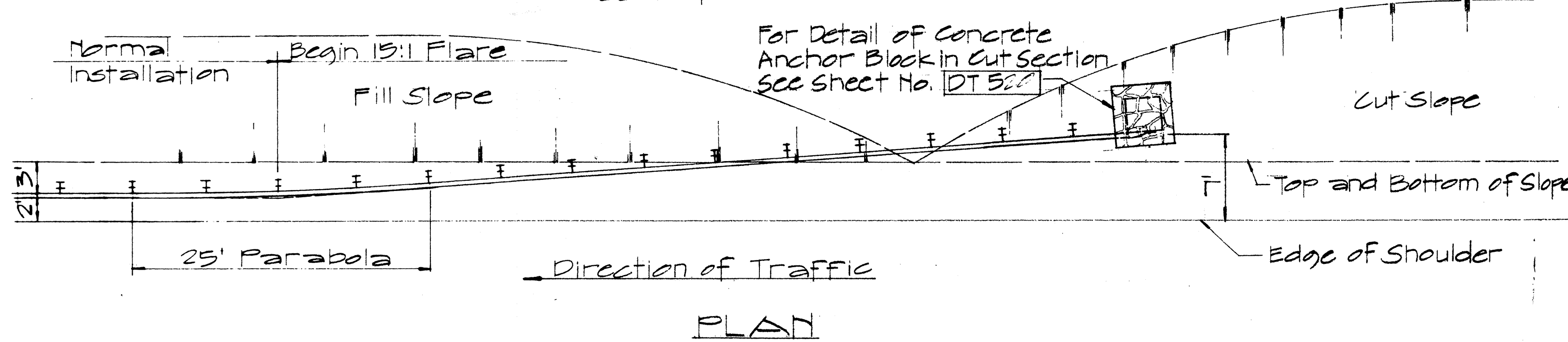
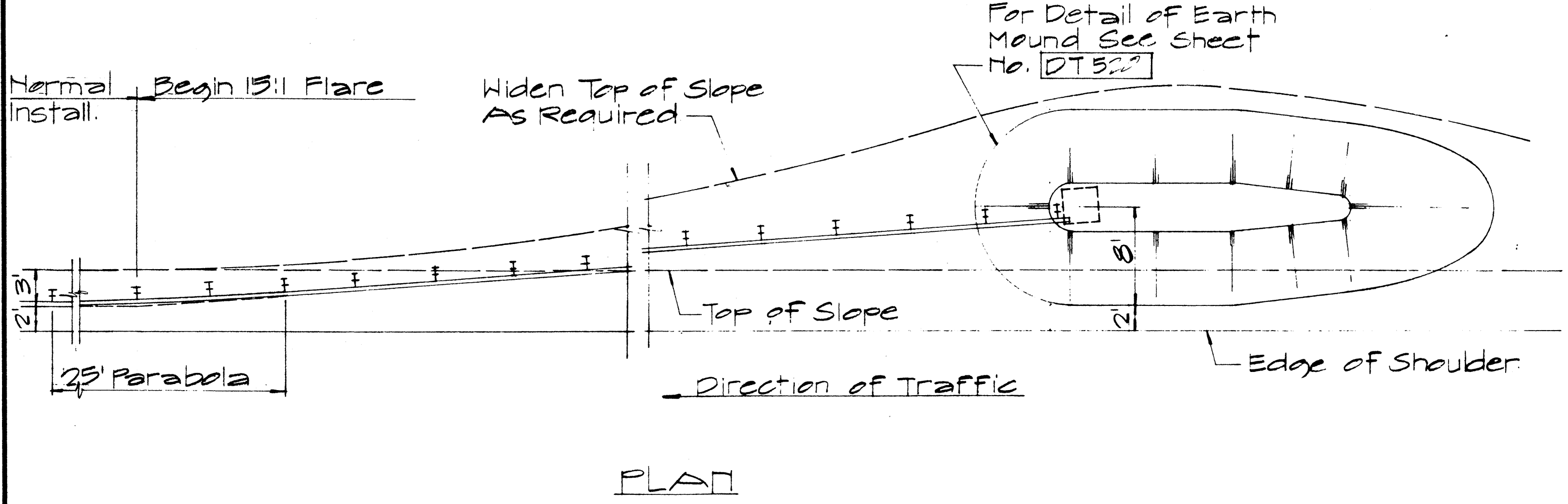
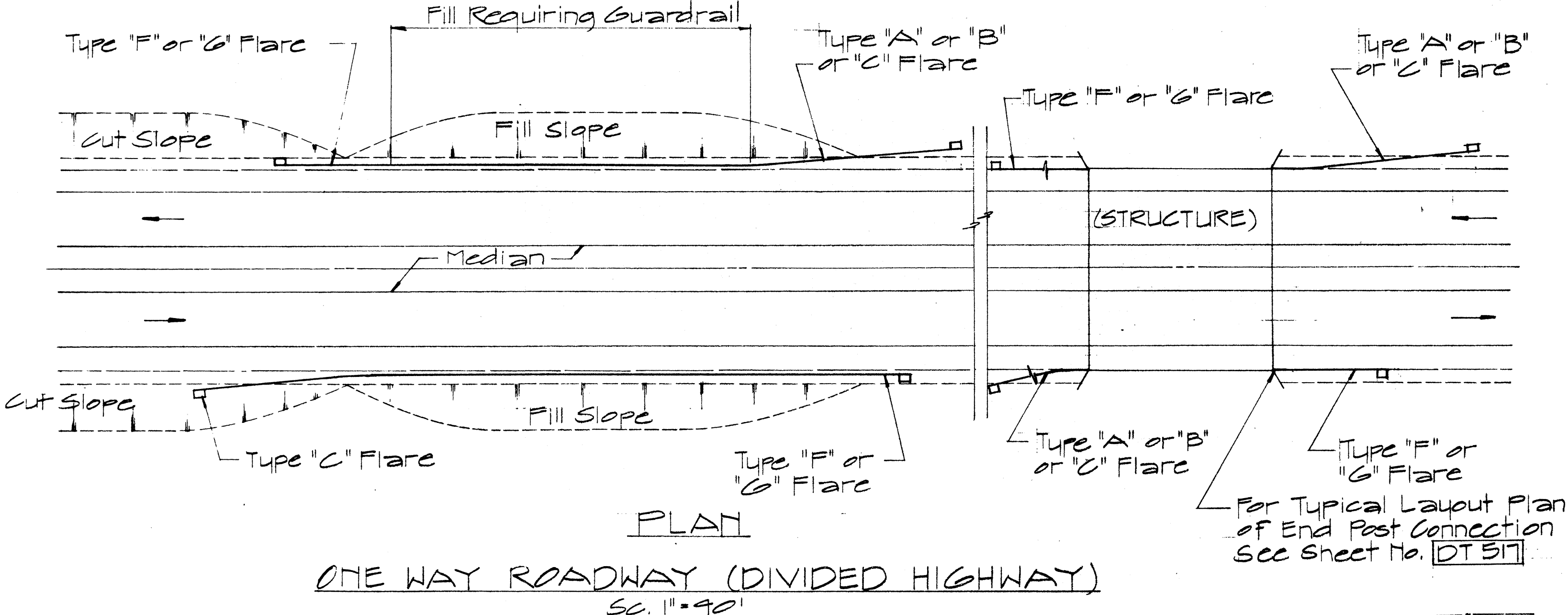
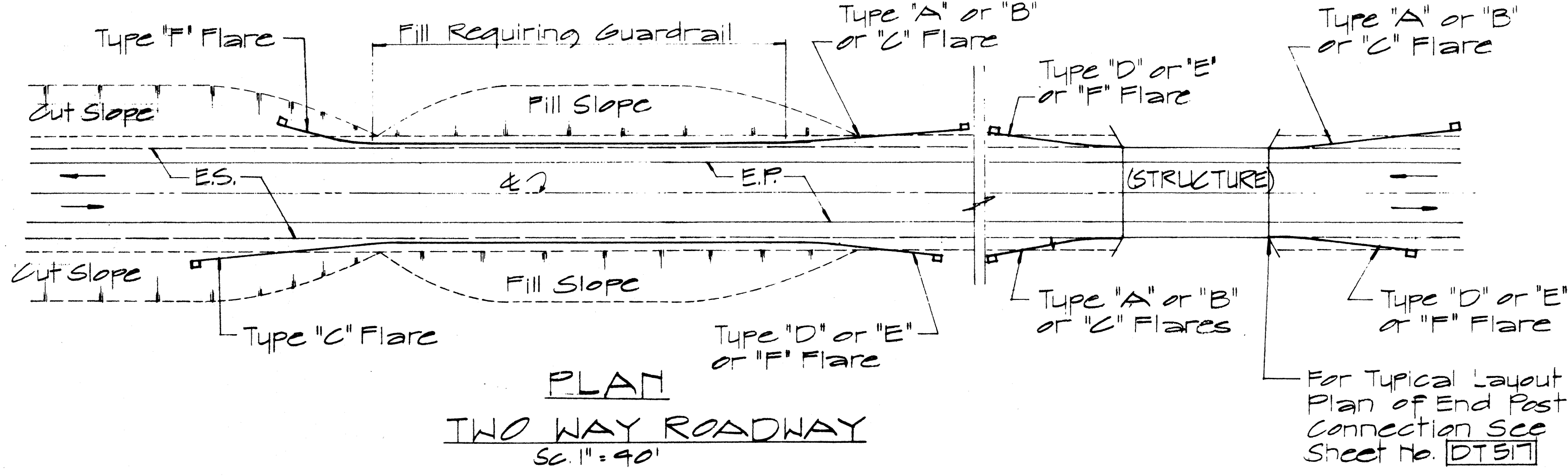
STANDARD DETAIL
CONCRETE BARRIER
TRANSITION

Scale As Noted Feb. 1969
 SHEET No. 4 OF 17 SHEETS DT 51

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-078-107 FF-078-107	1977	26	164

NOTE:

Metal guard rail connection to structures requires End Post Connection. See structure plans.



ELEVATION
TYPE "C" FLARE
SC. 1/8" = 1'-0"

NO.	REVISION	APPROVED BY	DATE

APPROVAL RECOMMENDED:
Erick Tanaka
TRAFFIC ENGINEER
12/29/62
DATE

APPROVED:
W. B. B. B.
ASSISTANT CHIEF, ENGINEERING
12-30-69
DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

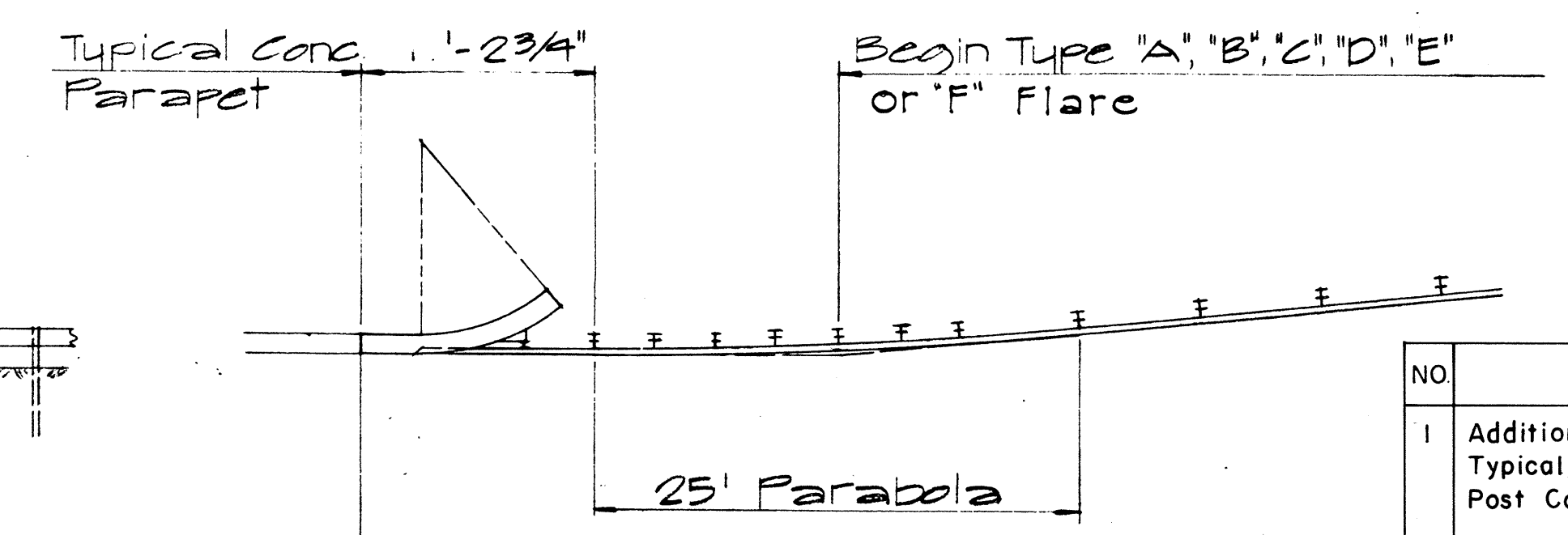
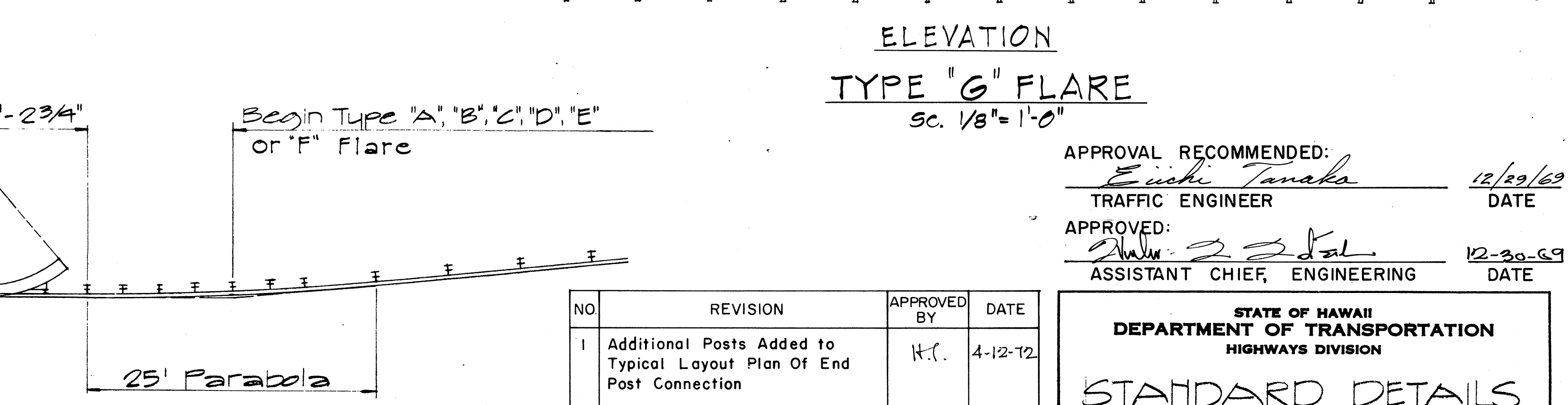
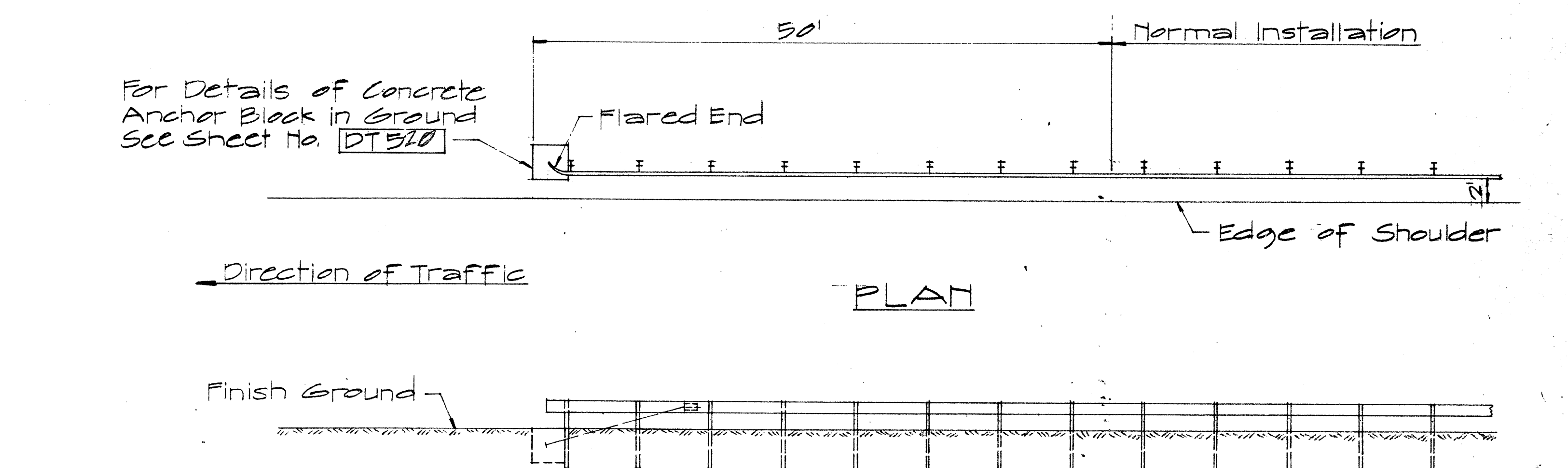
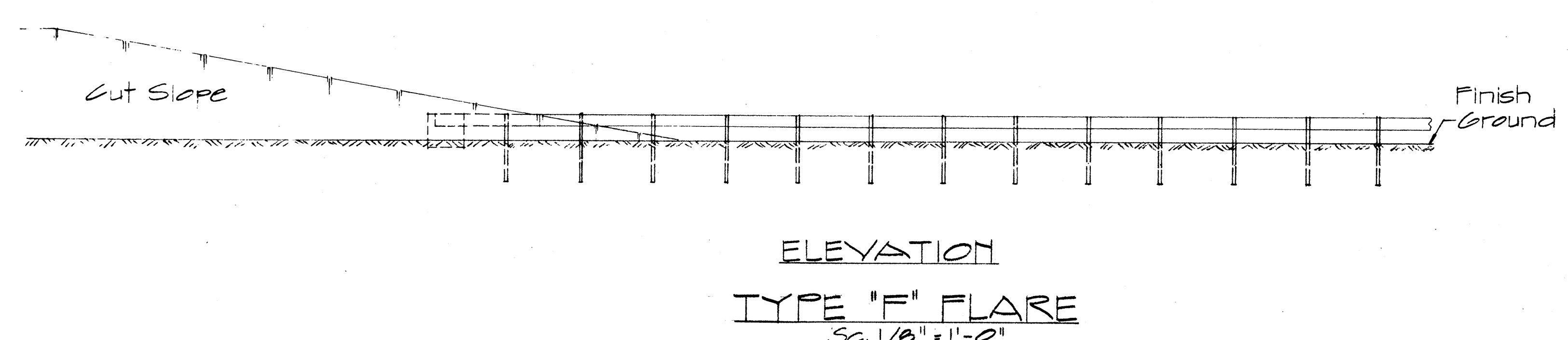
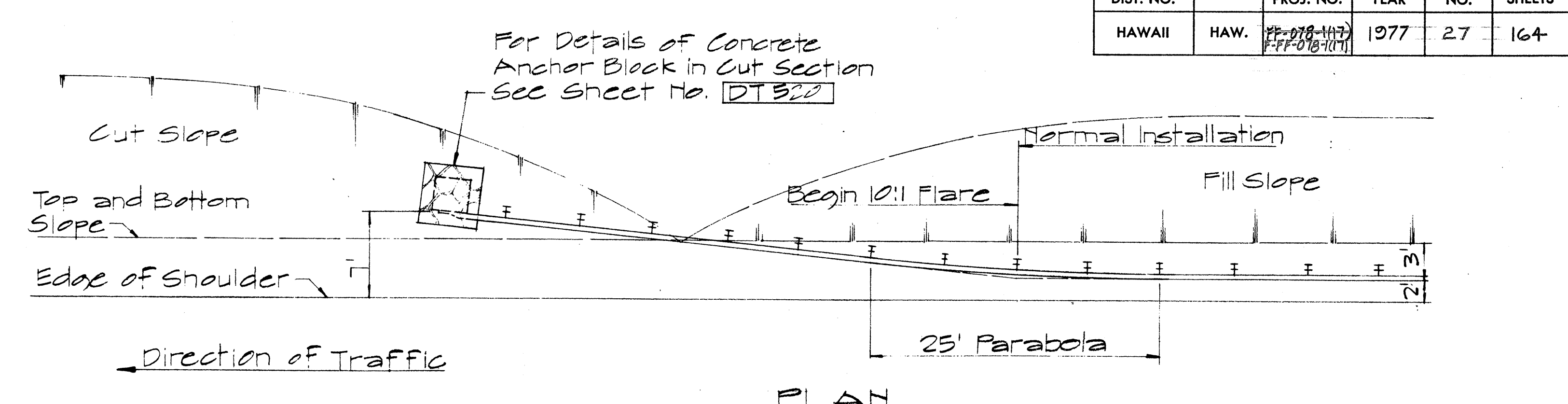
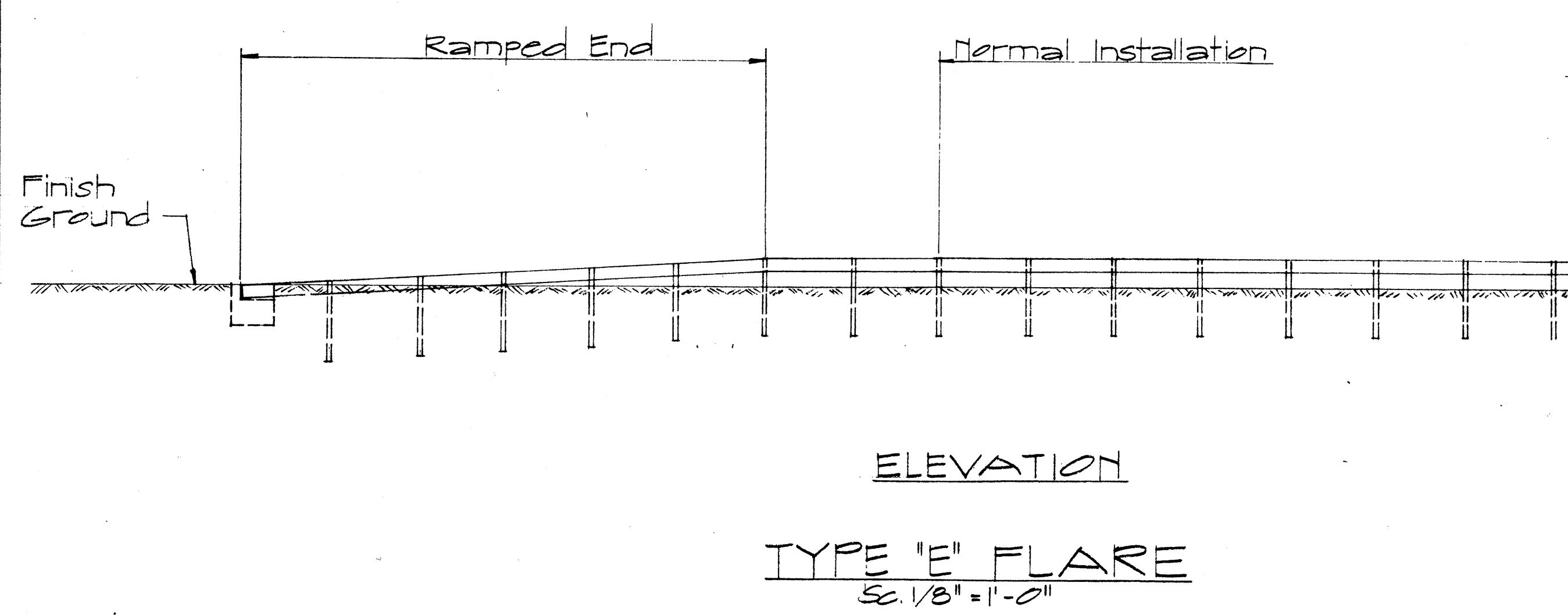
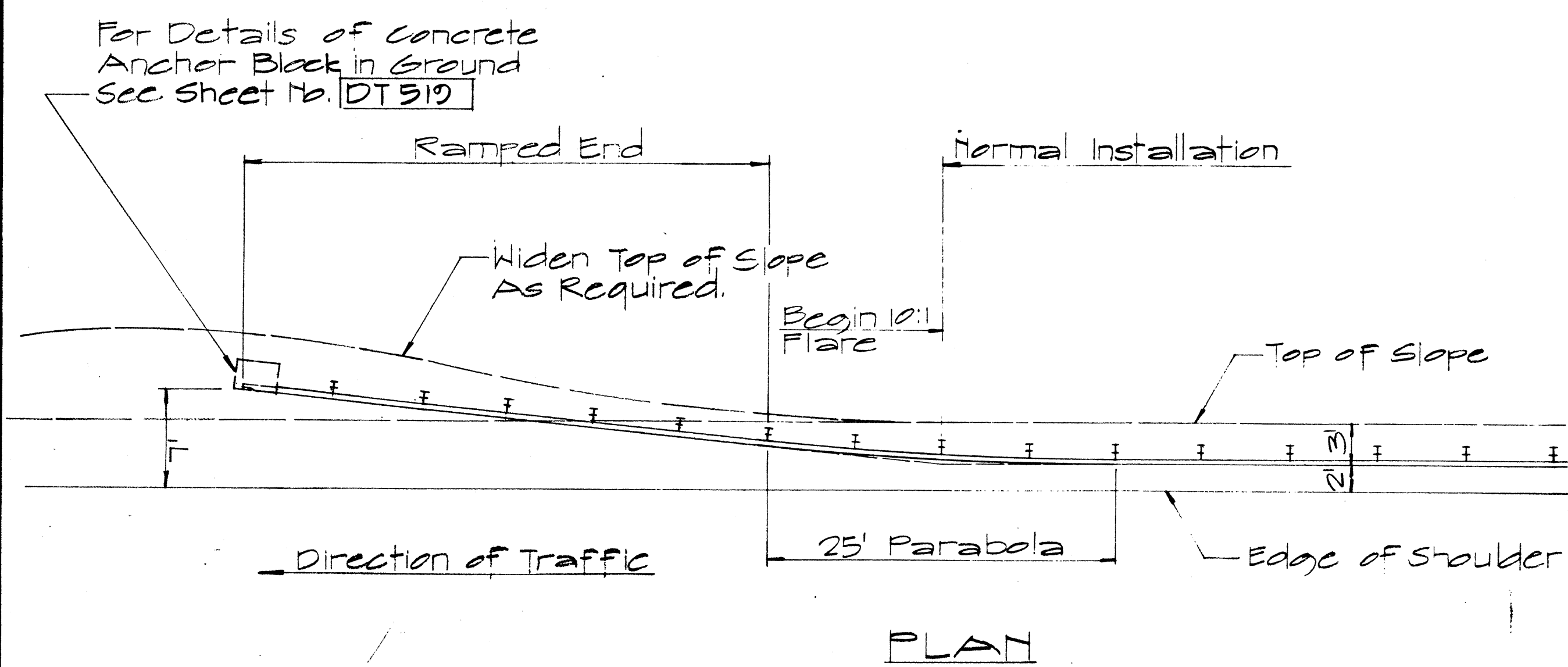
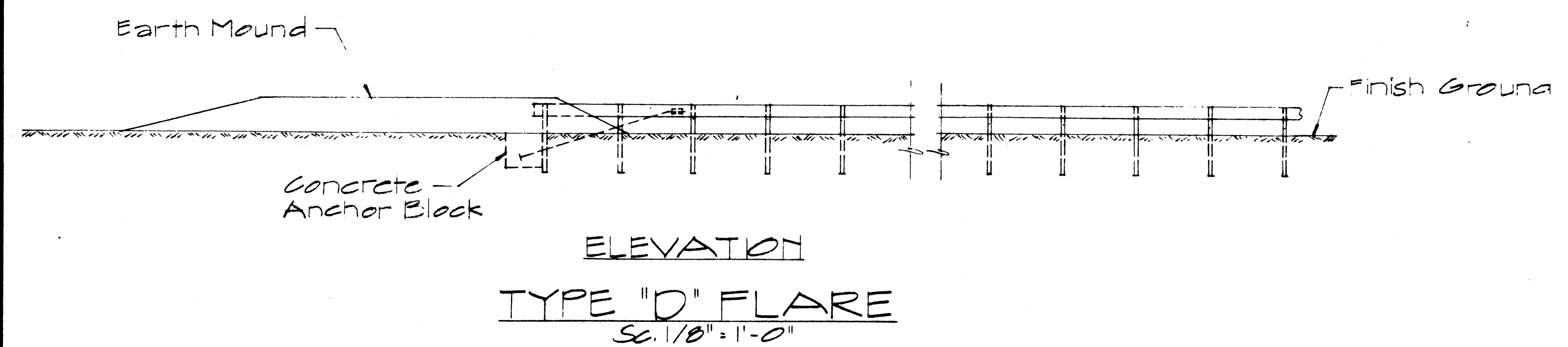
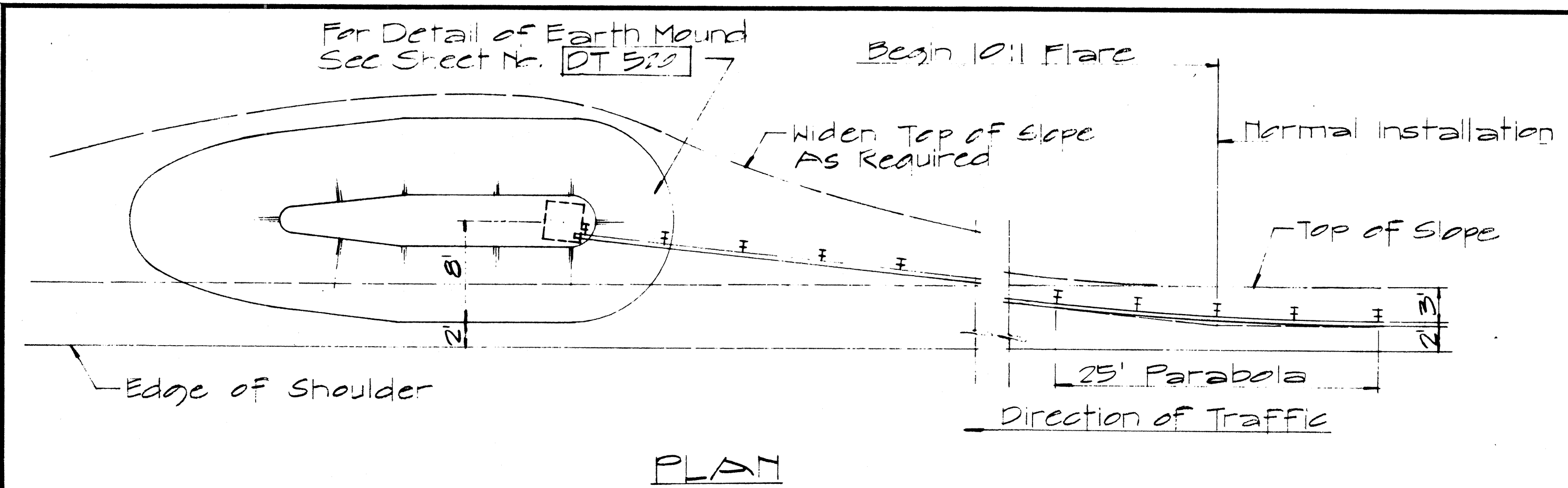
STANDARD DETAILS
OF APPROACH END
FLARE - ONE & TWO
WAY ROADWAY

SC. As Noted April 1969

SHEET No. 5 OF 17 SHEETS DT 516

DATE	
SURVEY PLANNED BY	
DRAWN BY	
DESIGNED BY	
CHECKED BY	
ORIGINAL PLAN	
NOTE BOOK	
No.	

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-018-117 FF-018-101	1977	27	164



TYPICAL LAYOUT PLAN OF END POST CONNECTION

Sc. 1/8" = 1'-0"

APPROVAL RECOMMENDED: Etsuko Tanaka 12/29/69
TRAFFIC ENGINEER DATE

APPROVED: William J. Sal 12-30-69
ASSISTANT CHIEF, ENGINEERING DATE

NO.	REVISION	APPROVED BY	DATE
1	Additional Posts Added to Typical Layout Plan Of End Post Connection	H.T.	4-12-72

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

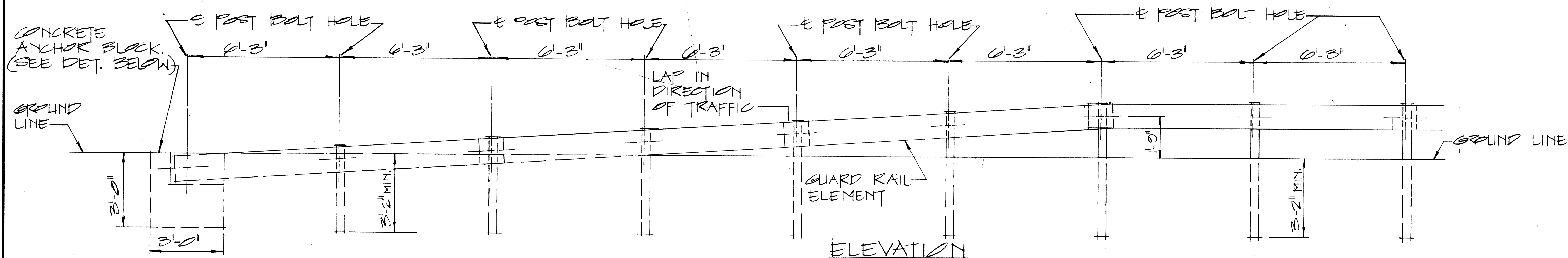
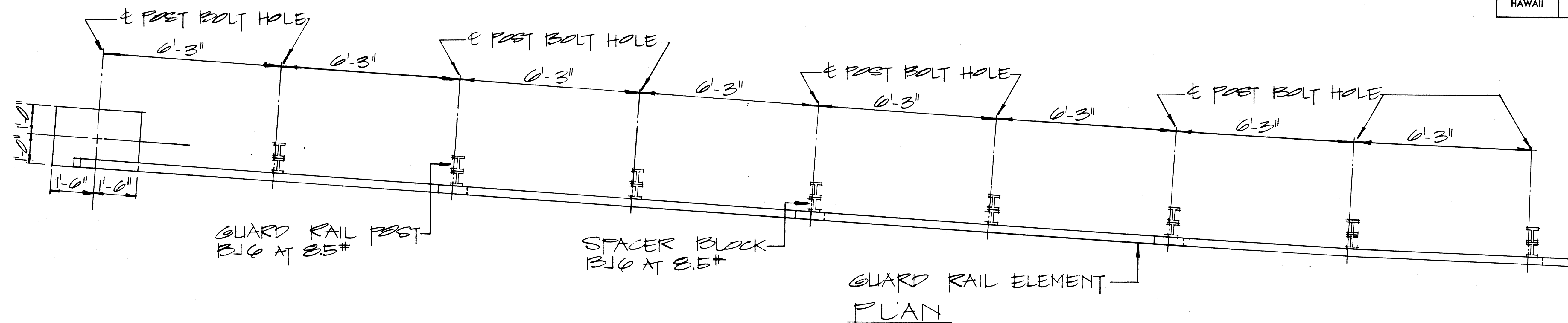
STANDARD DETAILS
TRAILING END
FLARE - ONE & TWO
WAY ROADWAY

Scale: As Noted April 1969

SHEET No. 6 OF 17 SHEETS DT 517

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

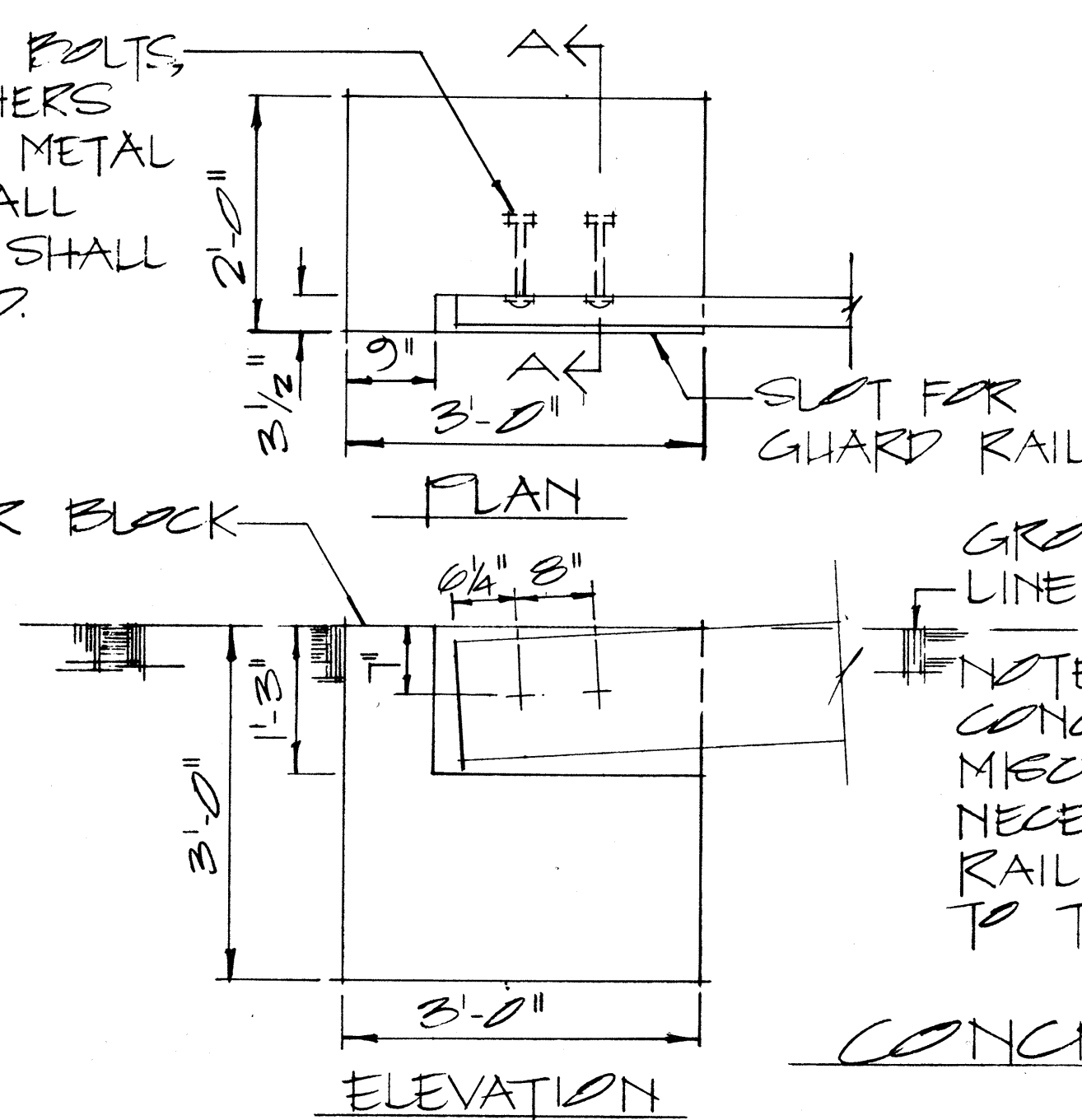
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-072-1(17) FF-072-1(17)	1977	28	164



RAMP END ANCHORAGE
SCALE: 1/2" = 1'-0"

2-5/8" x 7/4" LONG BOLTS, w/ NUTS & WASHERS INCIDENTAL TO METAL GUARD RAIL. ALL METAL PIECES SHALL BE GALVANIZED.

TOP OF ANCHOR BLOCK TO BE FLUSH w/ GROUND.



NOTE: CONCRETE, EXCAVATION AND MISCELLANEOUS APPURTENANCES NECESSARY TO ANCHOR THE GUARD RAIL ENDS, SHALL BE INCIDENTAL TO THE METAL GUARD RAIL.

CONCRETE ANCHOR BLOCK
SCALE: 3/4" = 1'-0"

APPROVAL RECOMMENDED:
Eugene Tanaka
TRAFFIC ENGINEER
12/29/69
DATE

APPROVED:
John J. J. J.
ASSISTANT CHIEF, ENGINEERING
12-30-69
DATE

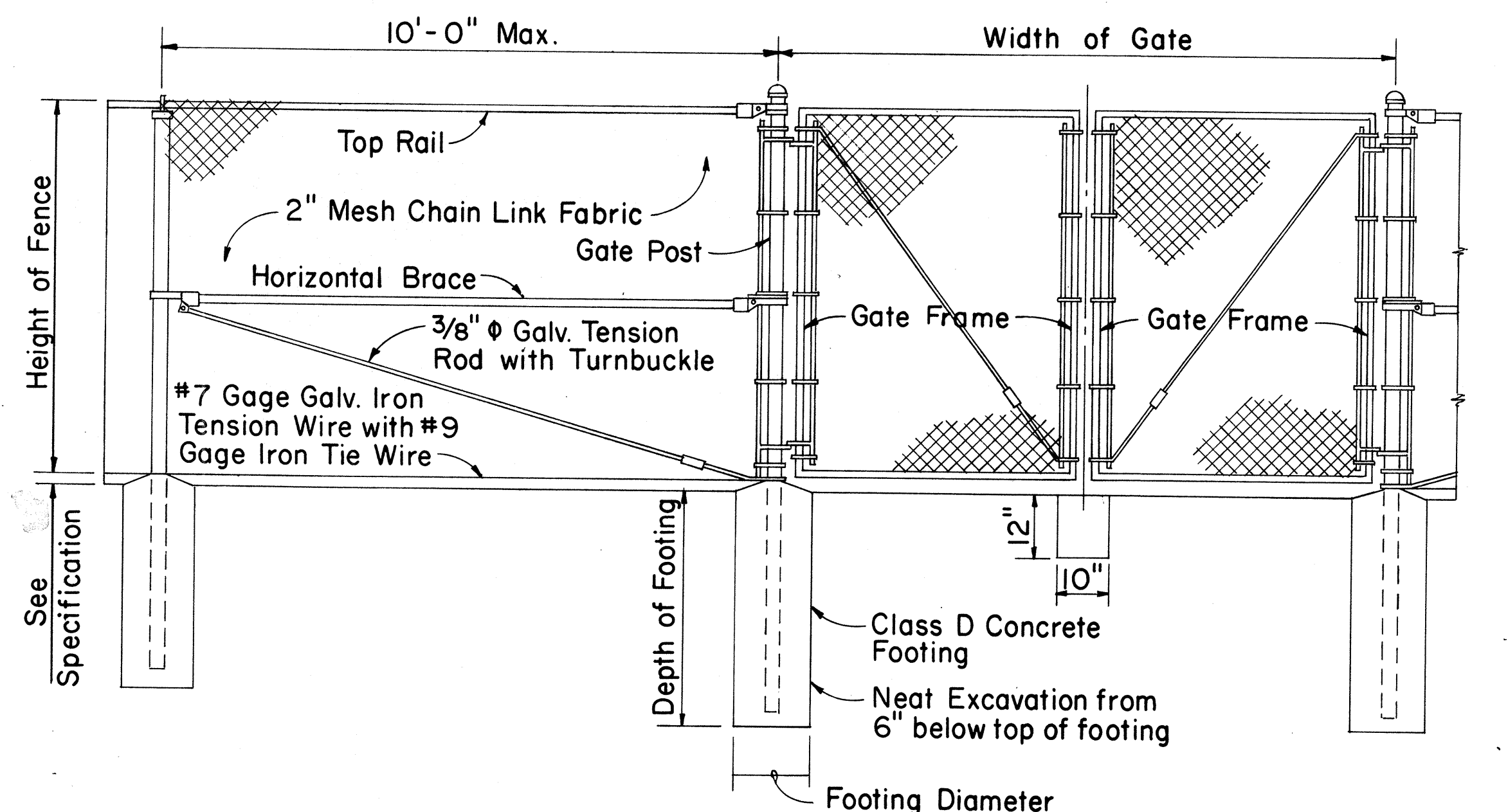
NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

STANDARD DETAILS
GUARD RAIL, TYPE 3
RAMP END ANCHORAGE

SCALE: AS SHOWN

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-078-107	1977	31	164



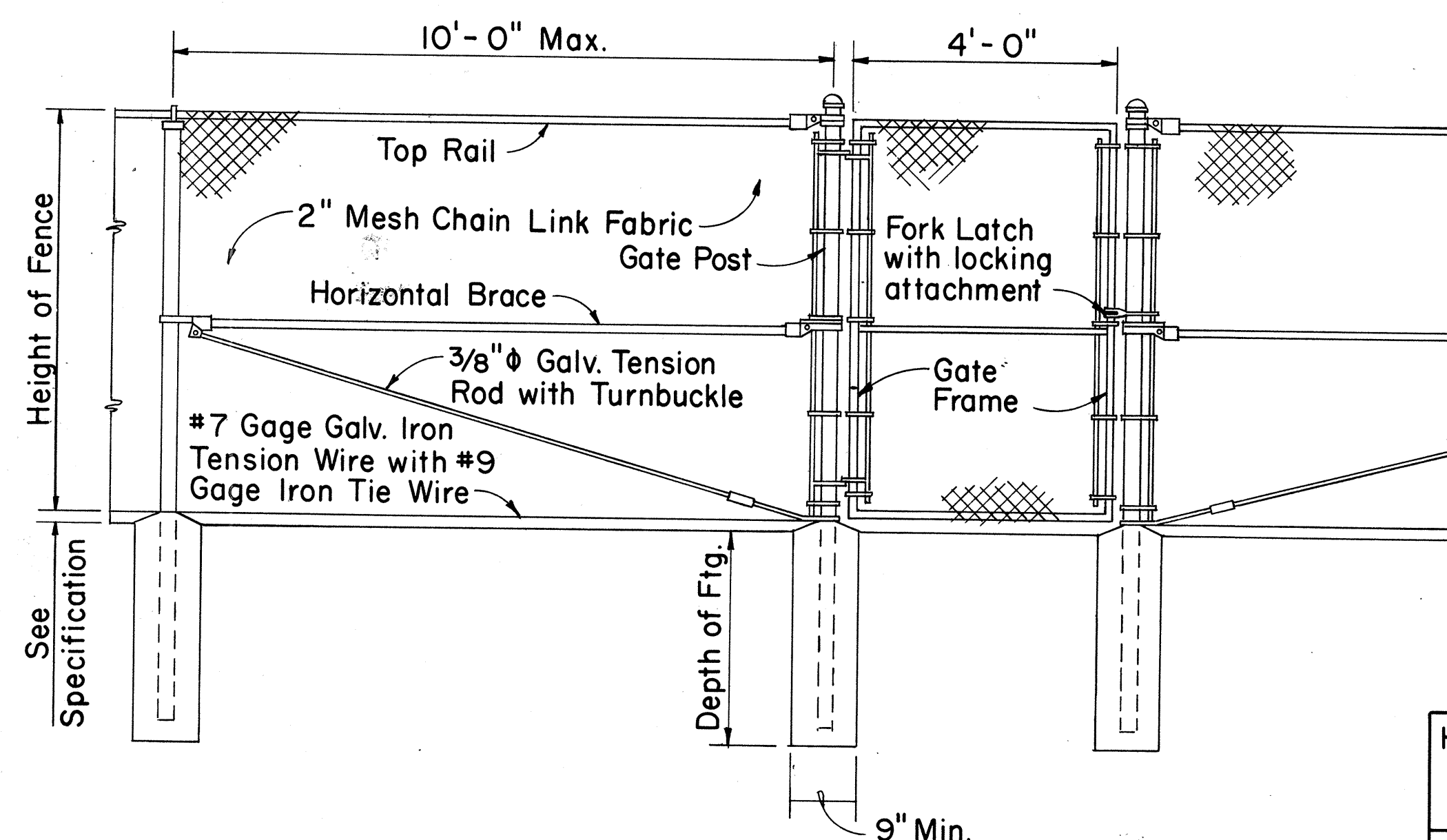
LINE POST

GATE POST

GATE POST

DETAIL OF CHAIN LINK GATE

- NOTE: 1. Gate fork latch and lock, flush plate and anchor, and plunger shall be installed with Gates, and shall be considered as incidental to Chain Link Fence Gate.
2. Gate frames shall be mitered and welded at corners.
3. Fence detail not shown shall be in accordance with the Standard Specifications.

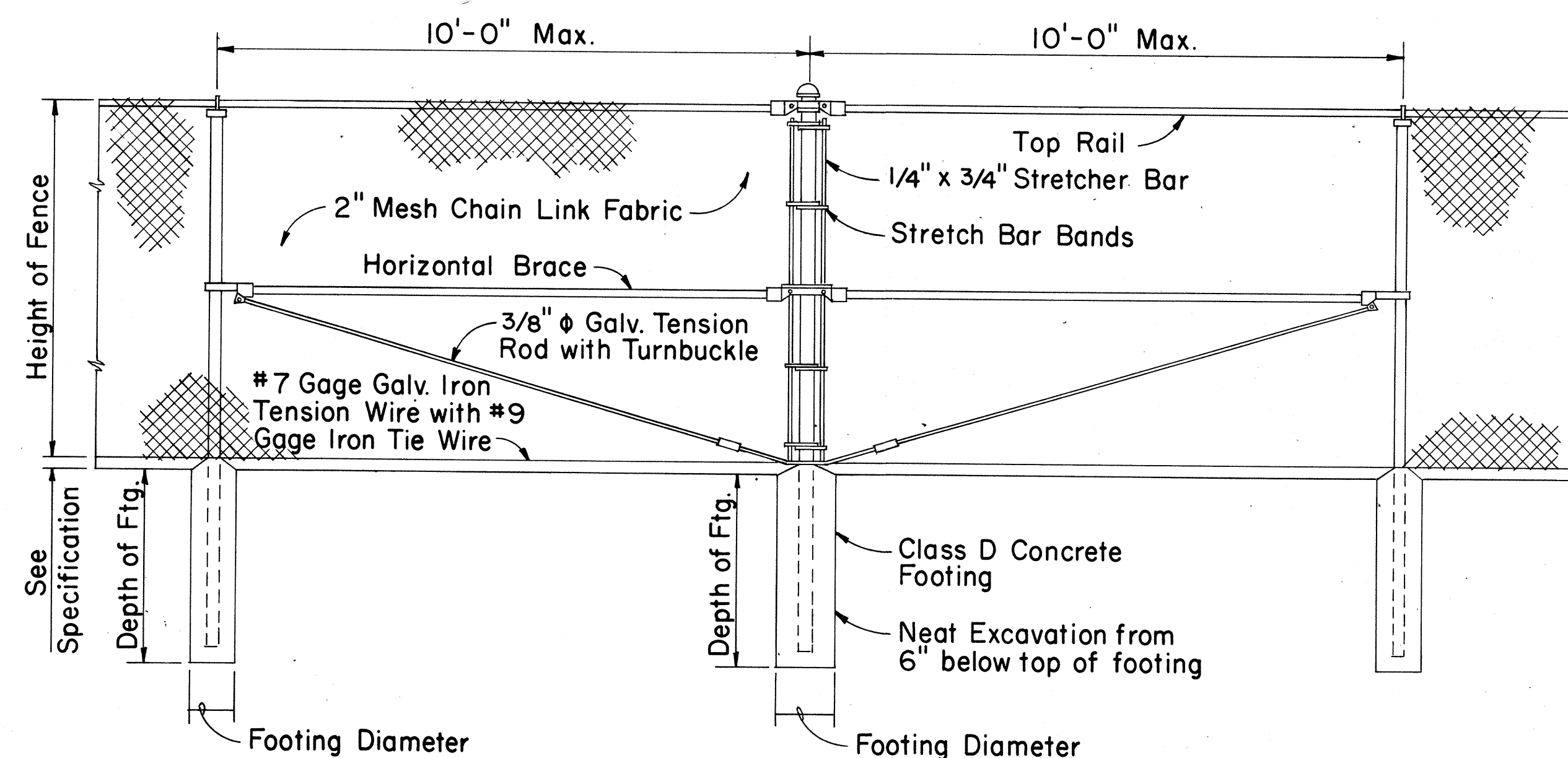


LINE POST

GATE POST

GATE POST

DETAIL OF 4 FT. CHAIN LINK GATE

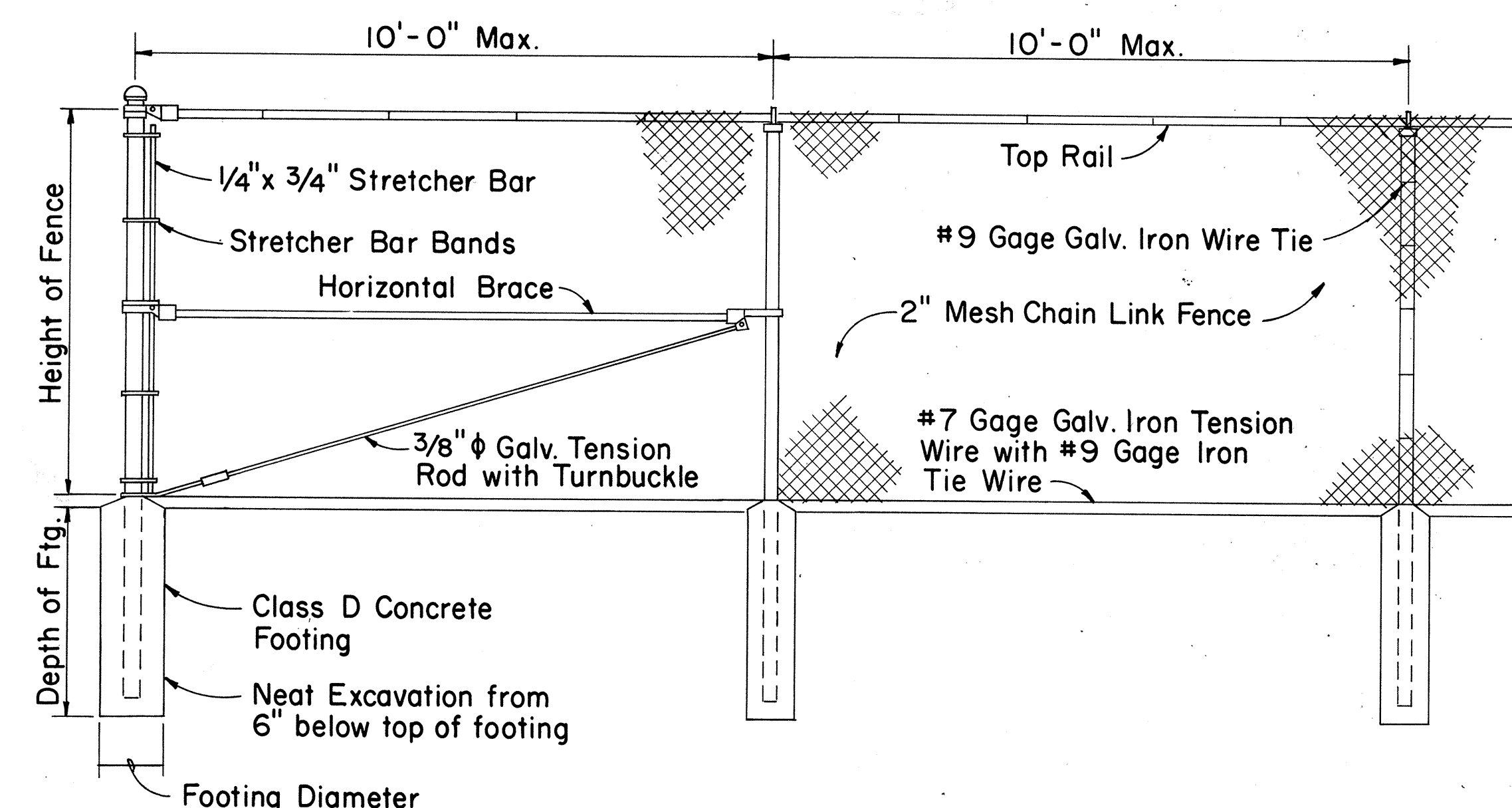


LINE POST

PULL POST

LINE POST

TYPICAL SECTION
(WITH CONCRETE FOOTING)



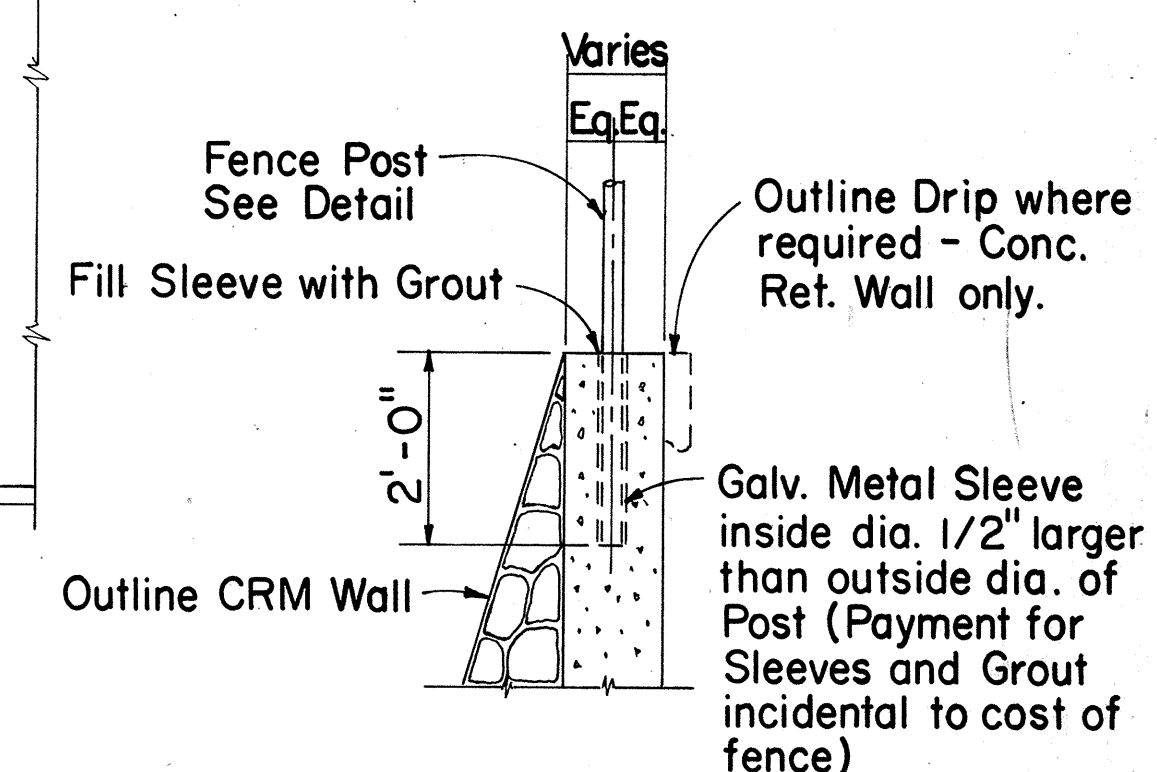
END POST

LINE POST

LINE POST

CHAIN LINK FENCE DETAILS

Height of Fence	Minimum Depth of Footing		Minimum Footing Diameter	
	Line Post	Corner, Pull, End and Gate Posts	Line Post	Corner, Pull and End Posts
3'	2'-0"	2'-6"	8"	8"
4'	2'-6"	2'-6"	8"	8"
5'	3'-0"	3'-0"	8"	8"
6'	3'-0"	3'-0"	8"	9"



TYPICAL SECTION
(ON CRM & CONC. RET. WALL)

APPROVAL RECOMMENDED:
HIGHWAY DESIGN ENGINEER
DATE: 12-4-69

APPROVED:
ASSISTANT CHIEF, ENGINEERING
DATE: 12-10-69

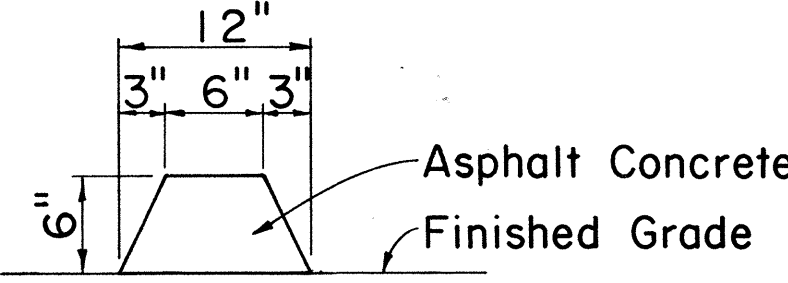
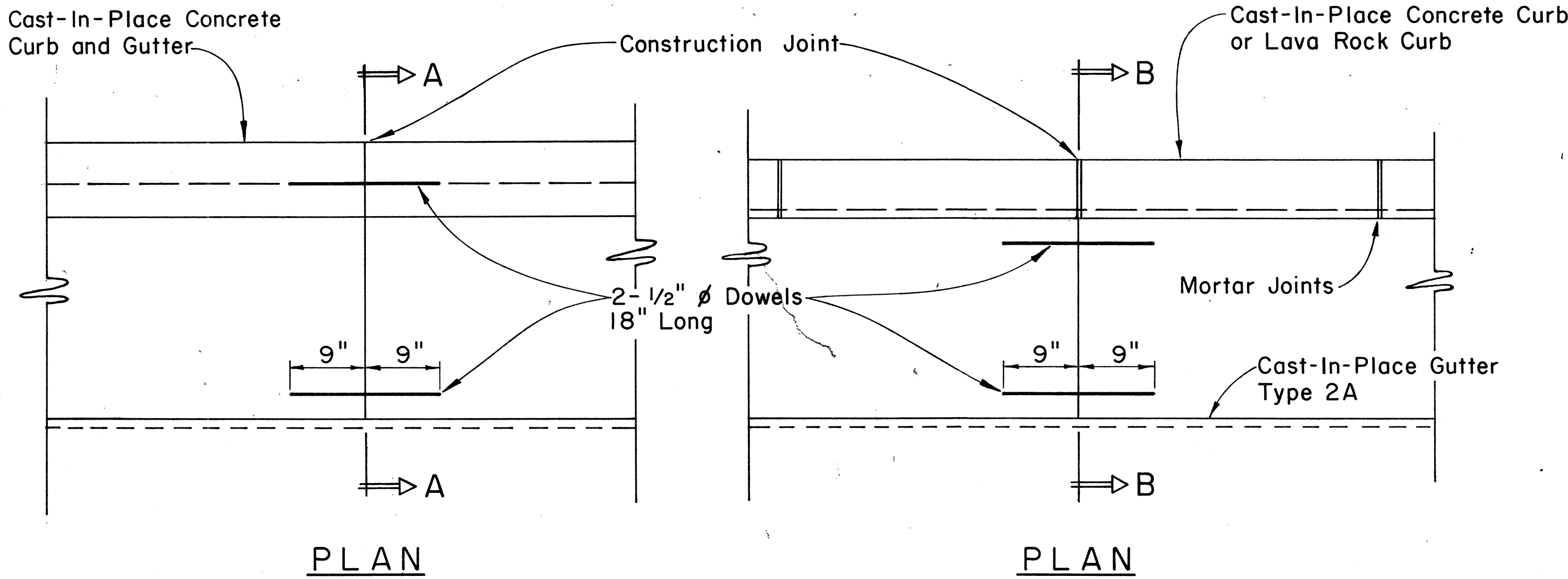
NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

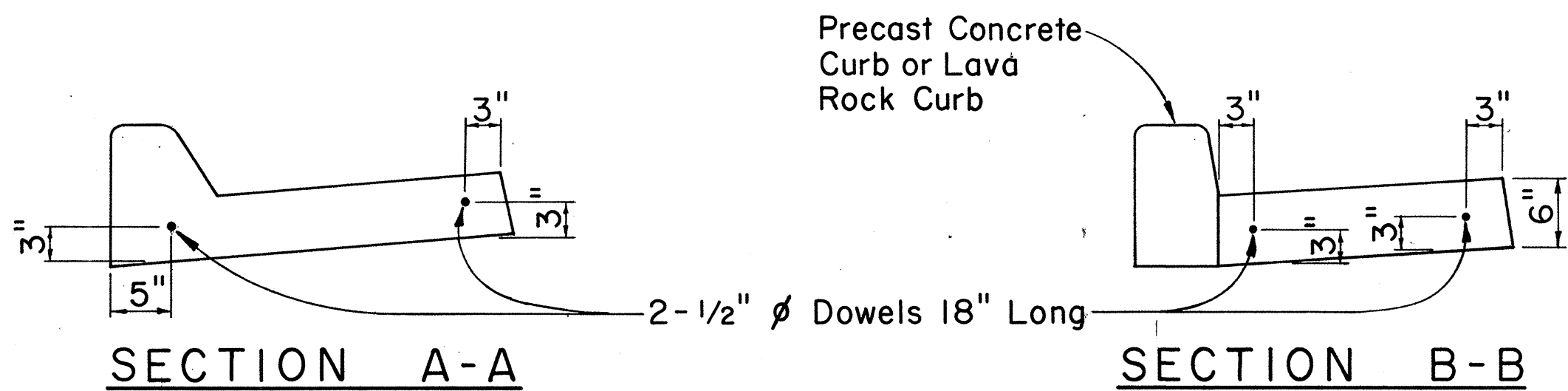
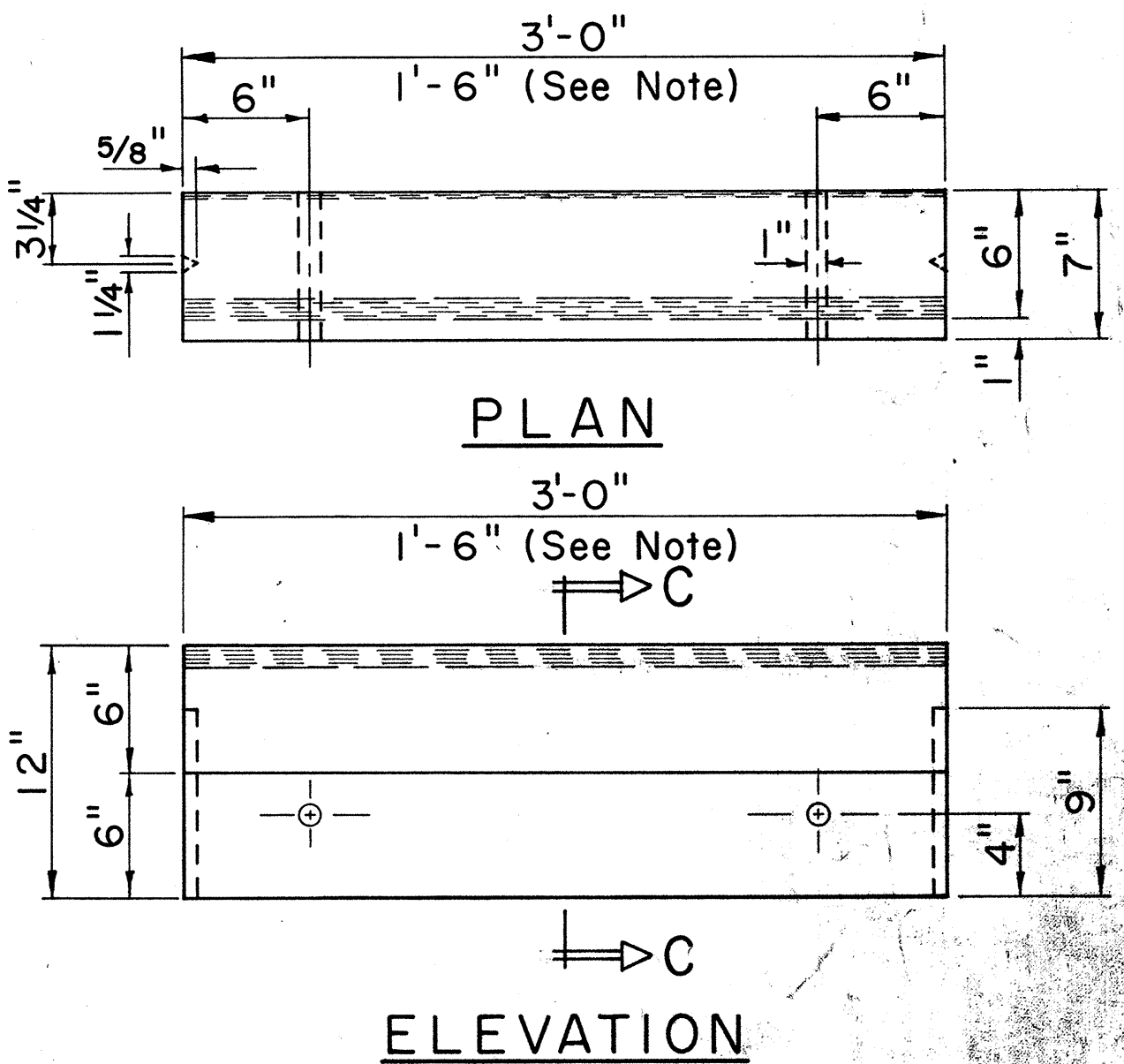
STANDARD DETAILS
CHAIN LINK FENCE
(WITH TOPRAIL)

Scale: 1/2" = 1'-0" Date:

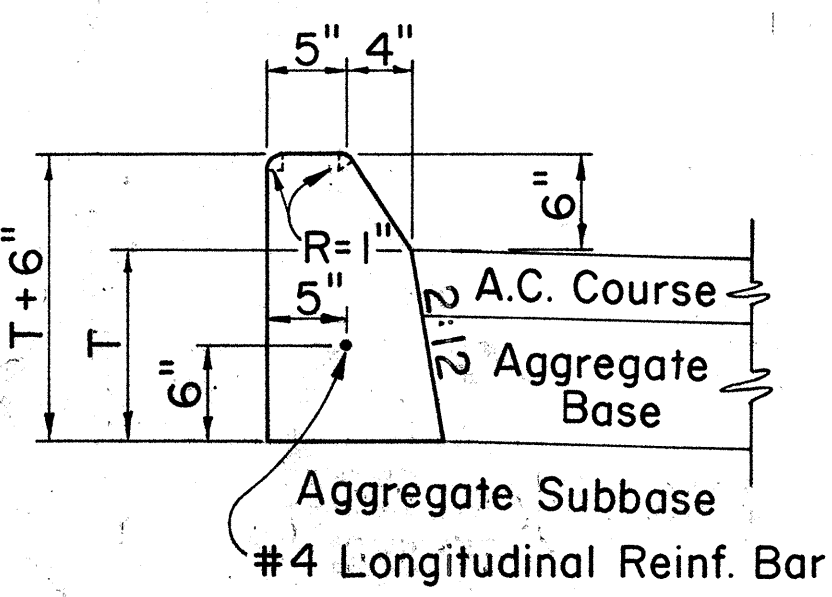
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-078-1117 FF-078-1117	1977	32	164



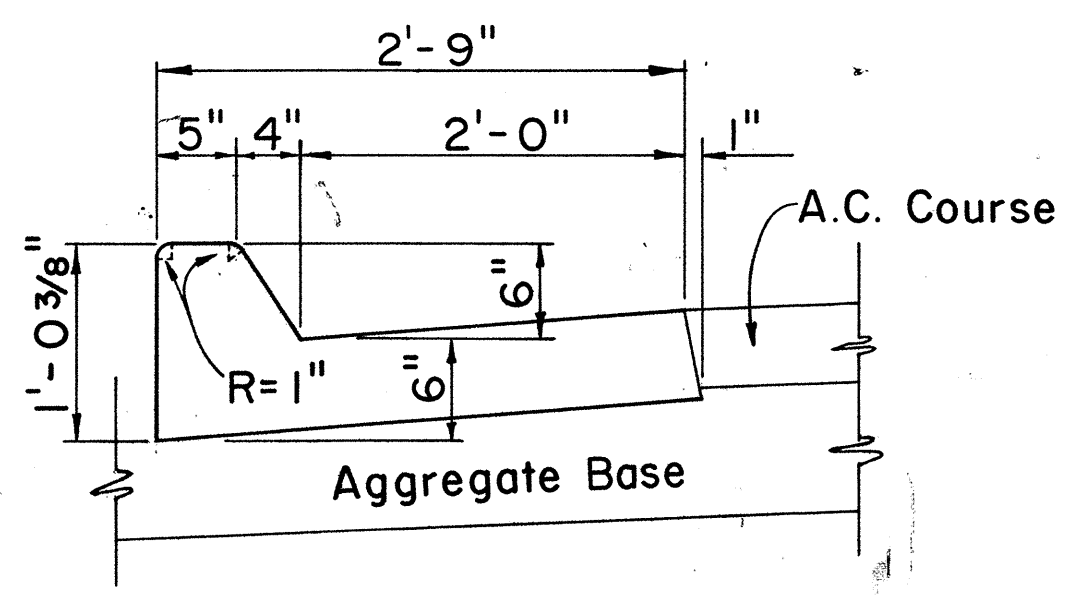
CURB, TYPE 6
BITUMINOUS CURB
Scale: 1 1/2" = 1'-0"



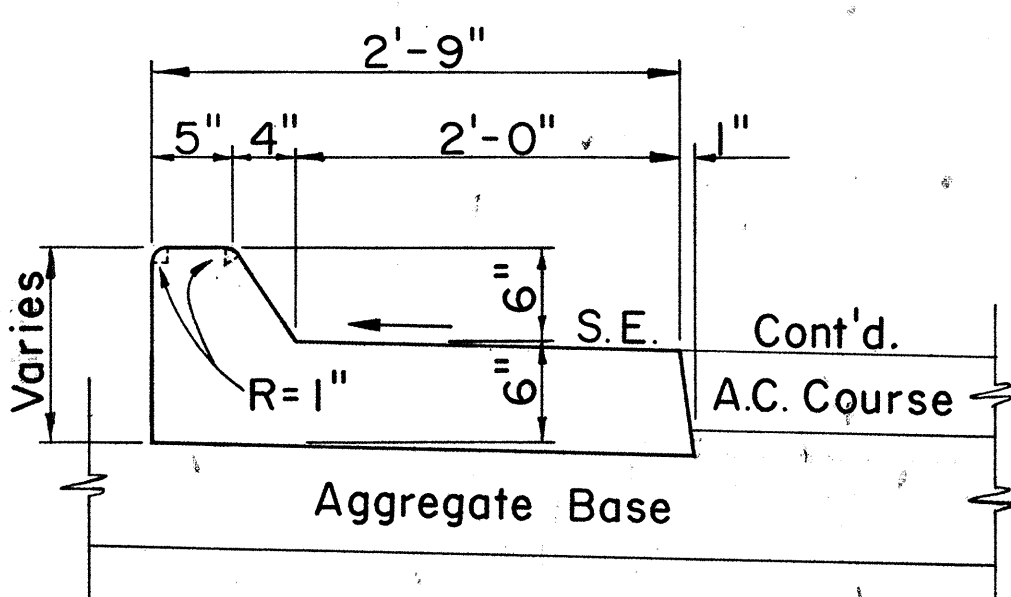
CAST-IN-PLACE CURB & GUTTER
CAST-IN-PLACE GUTTER
CONSTRUCTION JOINT DETAIL
Scale: 1" = 1'-0"



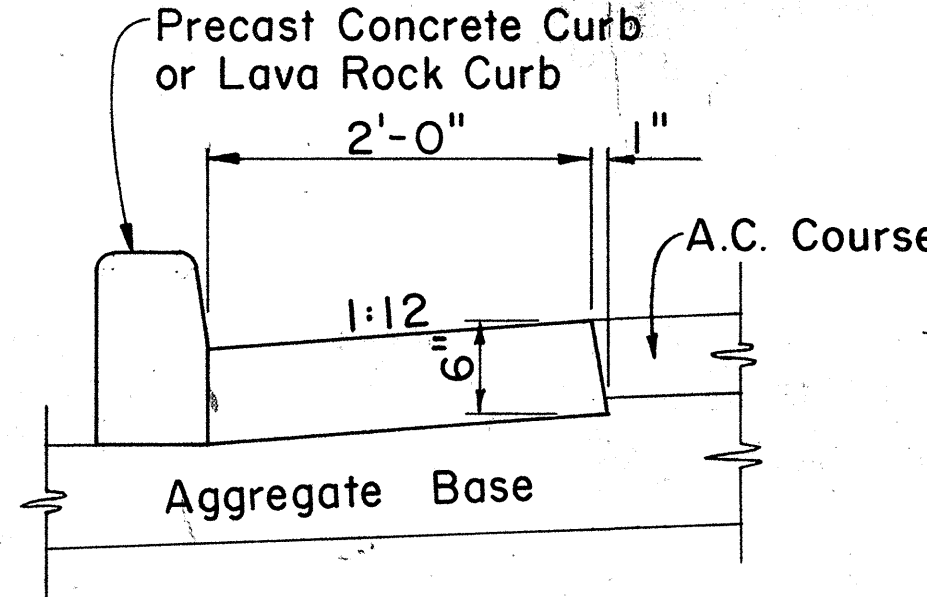
CURB, TYPE 2A



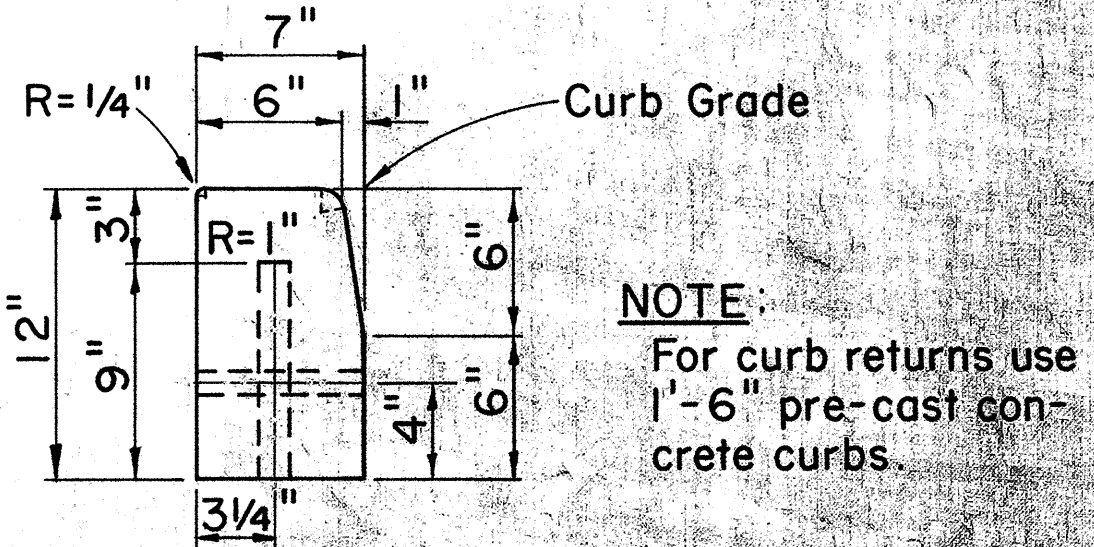
CURB & GUTTER, TYPE 2AG



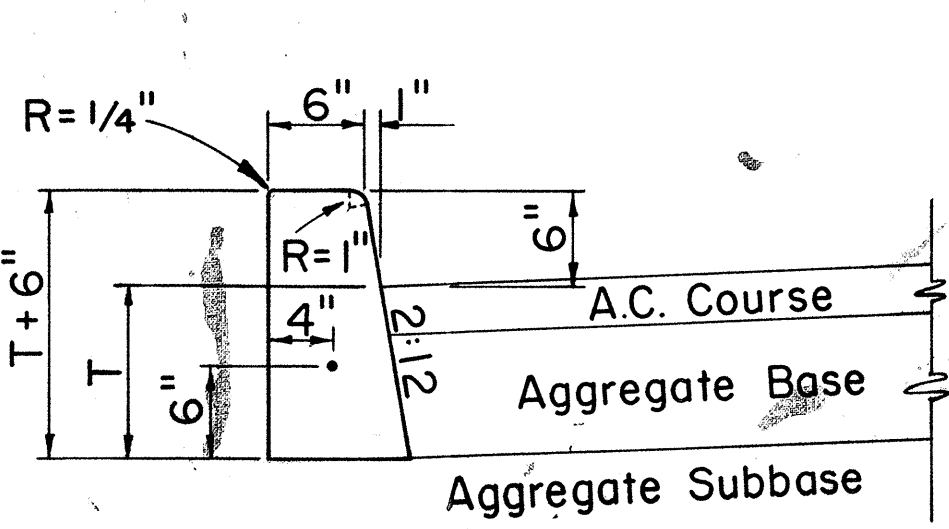
CURB & GUTTER, TYPE 2AGM



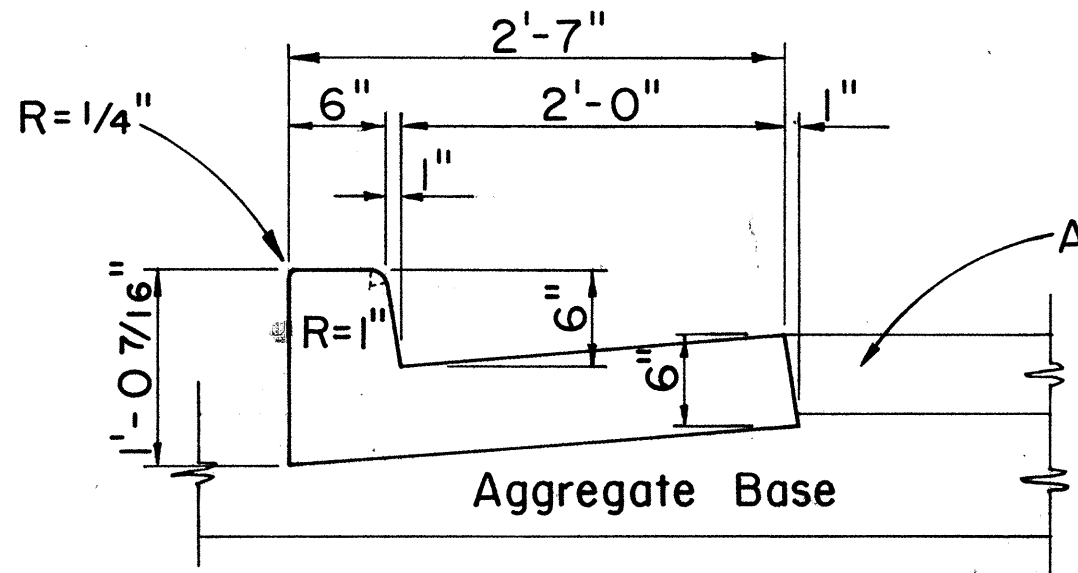
GUTTER, TYPE 2A



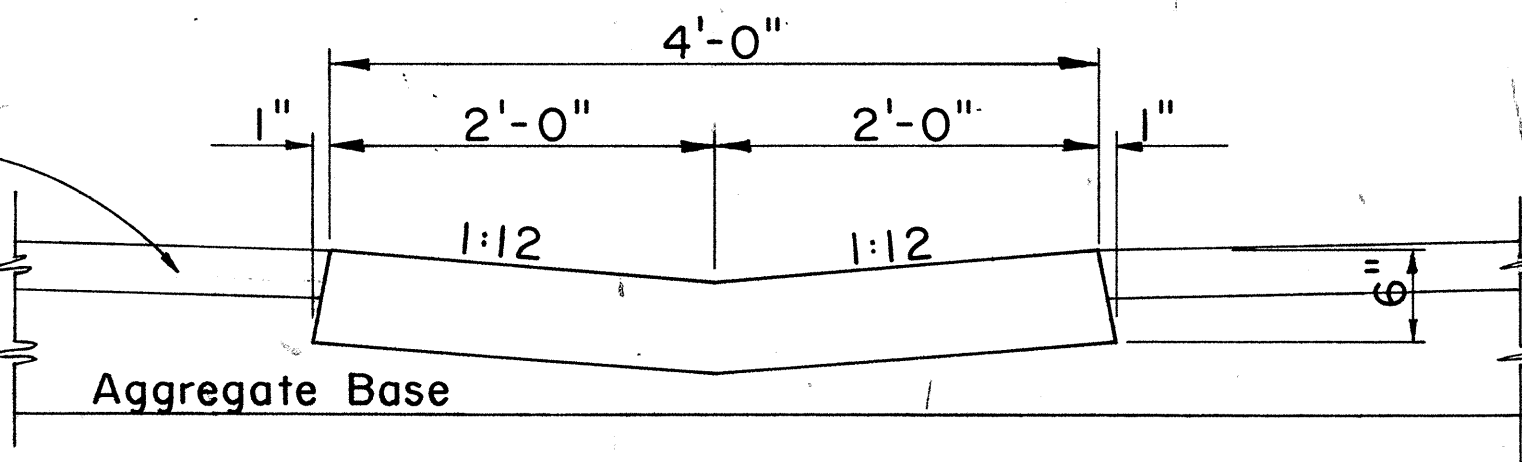
CURB, TYPE 3D
PRE-CAST CONC. CURB
Scale: 1 1/2" = 1'-0"



CURB, TYPE 2D



CURB & GUTTER, TYPE 2DG



GUTTER, TYPE 2G

CAST-IN-PLACE CONCRETE CURBS AND/OR GUTTERS
Scale: 1" = 1'-0"

APPROVAL RECOMMENDED:
HIGHWAY DESIGN ENGINEER
DATE: 12-4-67

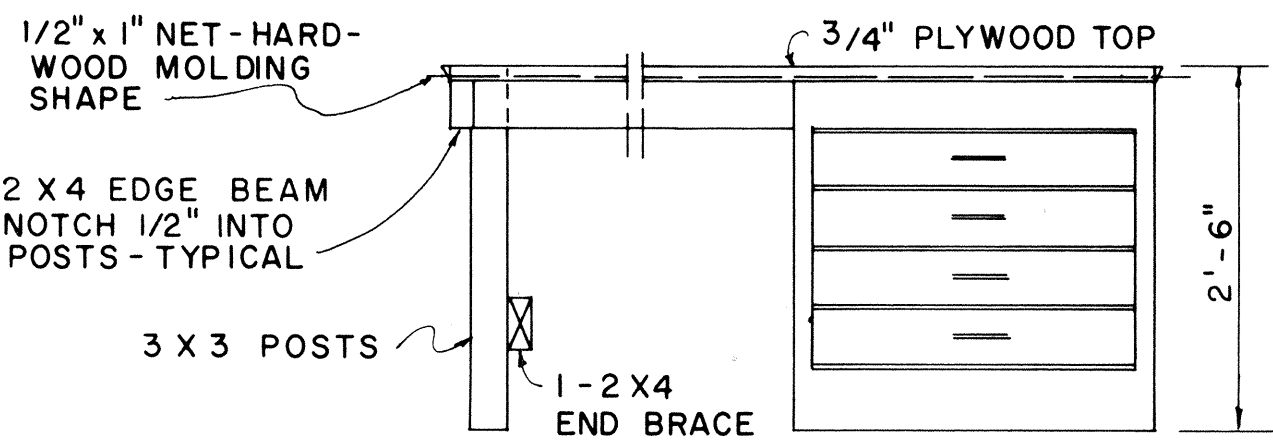
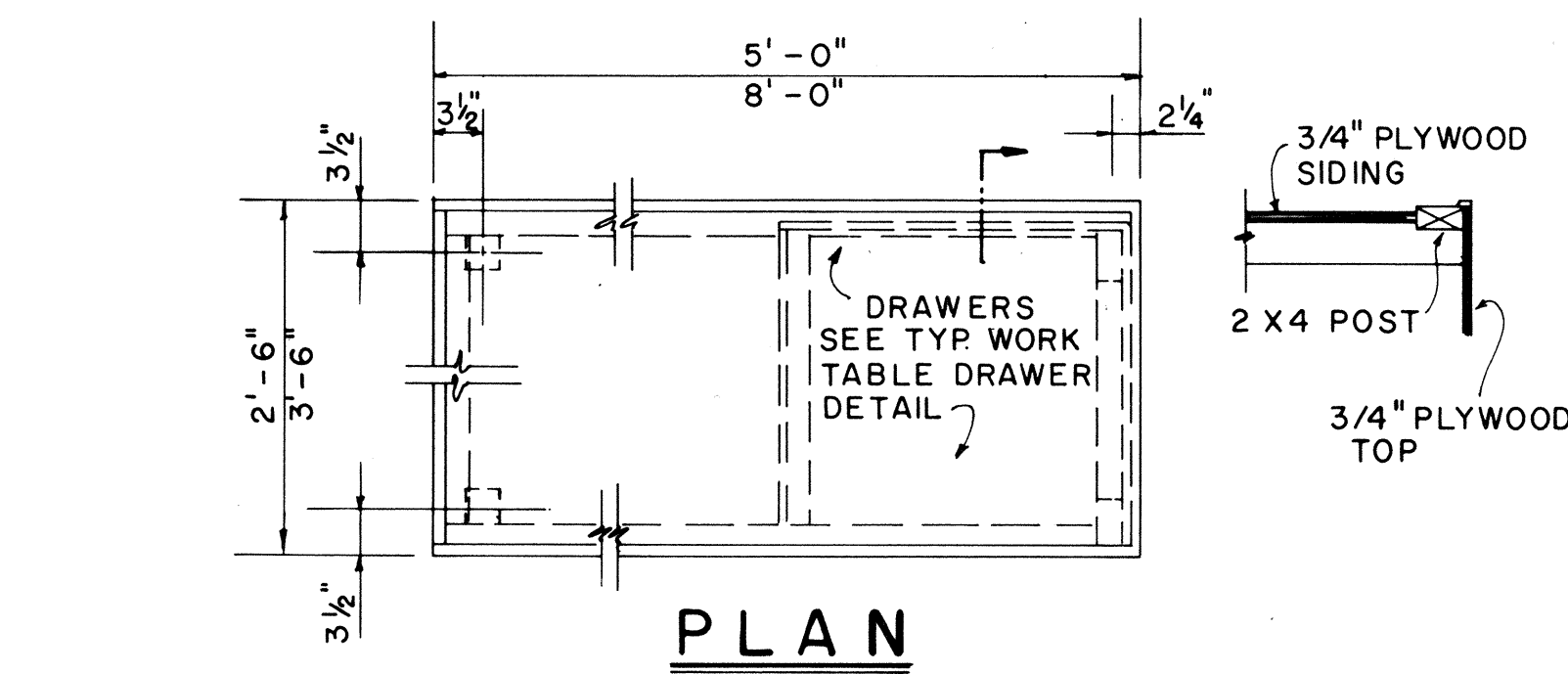
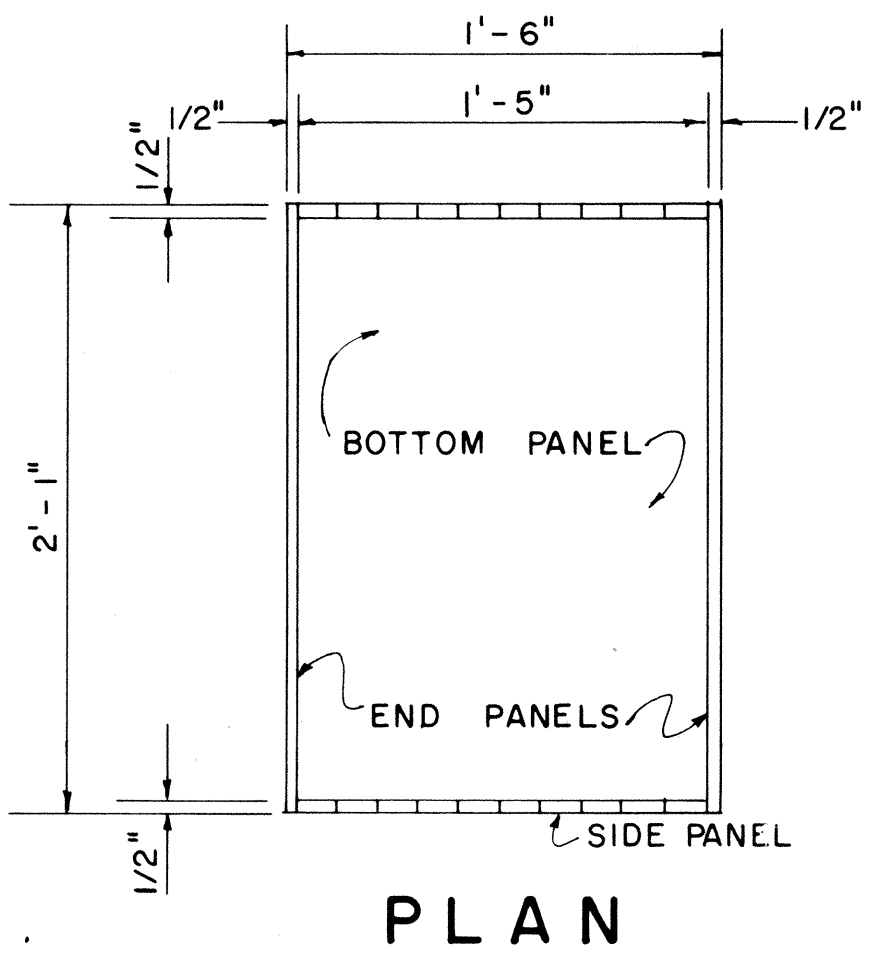
APPROVED:
ASSISTANT CHIEF, ENGINEERING
DATE: 12-10-67

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION
STANDARD DETAILS
TYPICAL DETAILS OF CURB
AND/OR GUTTERS
Scale: As Shown
SHEET No. 11 OF 17 SHEETS DD 609

ORIGINAL PLAN	DATE
NOTED BY	
DESIGNED BY	
QUANTITIES BY	
CHECKED BY	

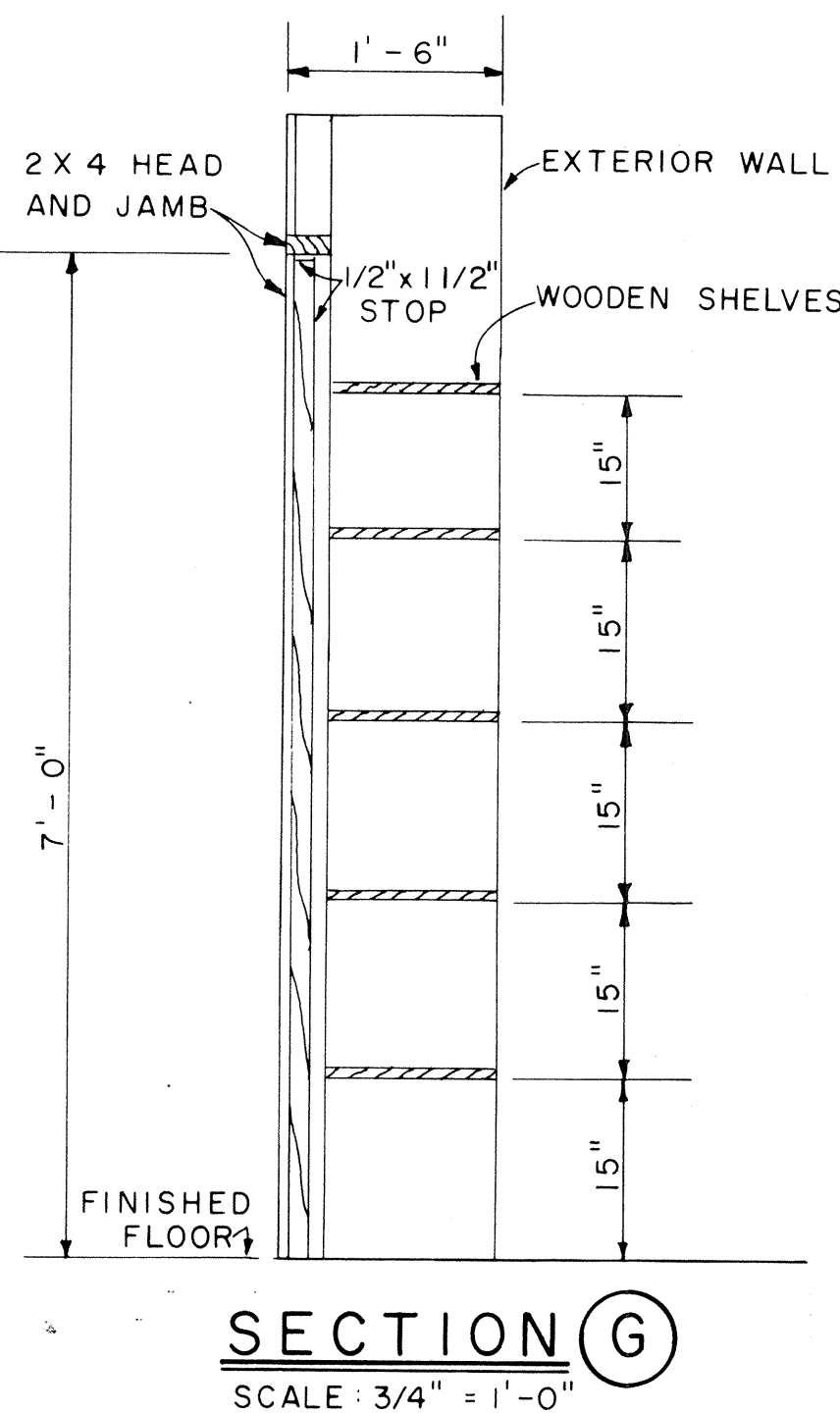
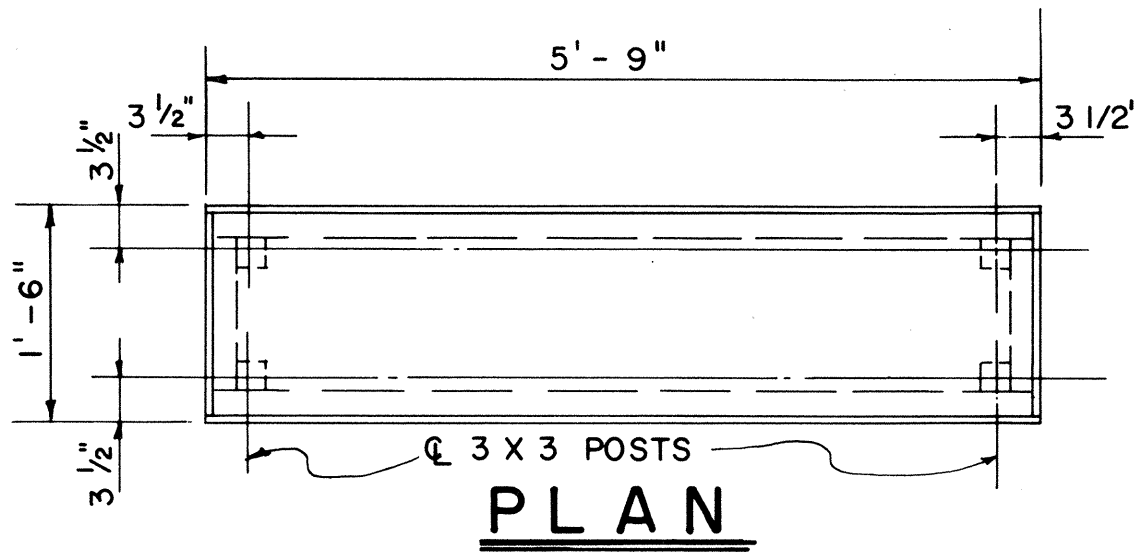
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAWAII	FF-078-1(17)	1977	35	164



- 2'-6" x 5'-0" 2 REQ'D
3'-6" x 8'-0" 1 REQ'D
2'-6" x 8'-0" 1 REQ'D

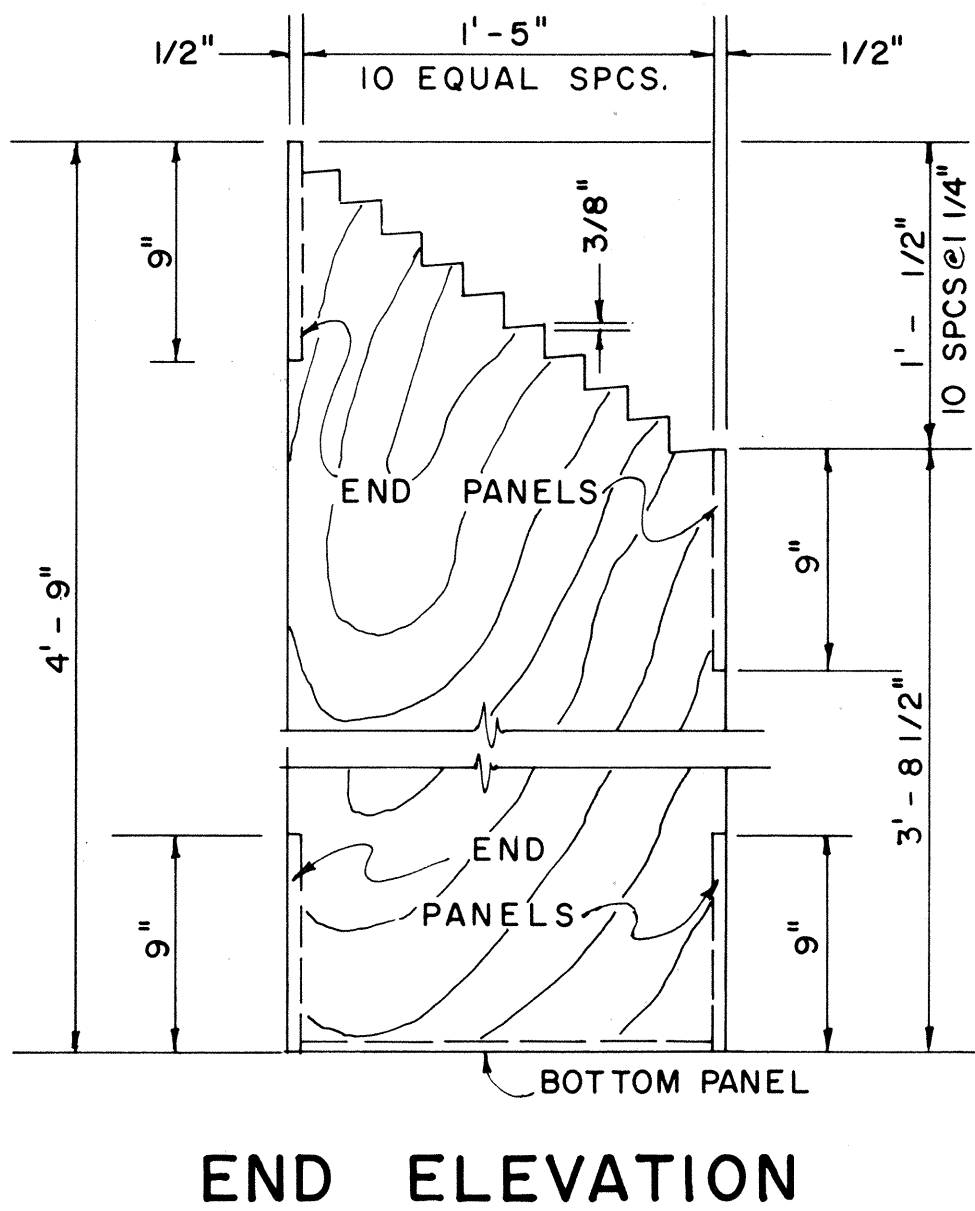
PORTABLE WORK TABLE DETAIL

SCALE: 3/4" = 1'-0"

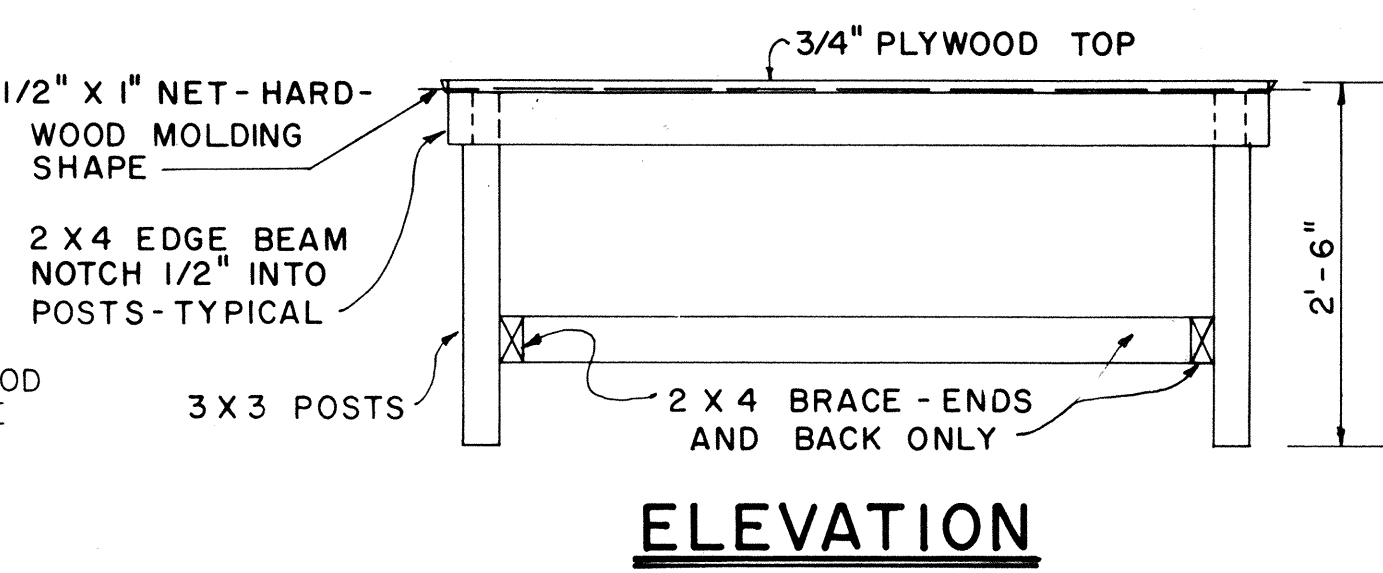
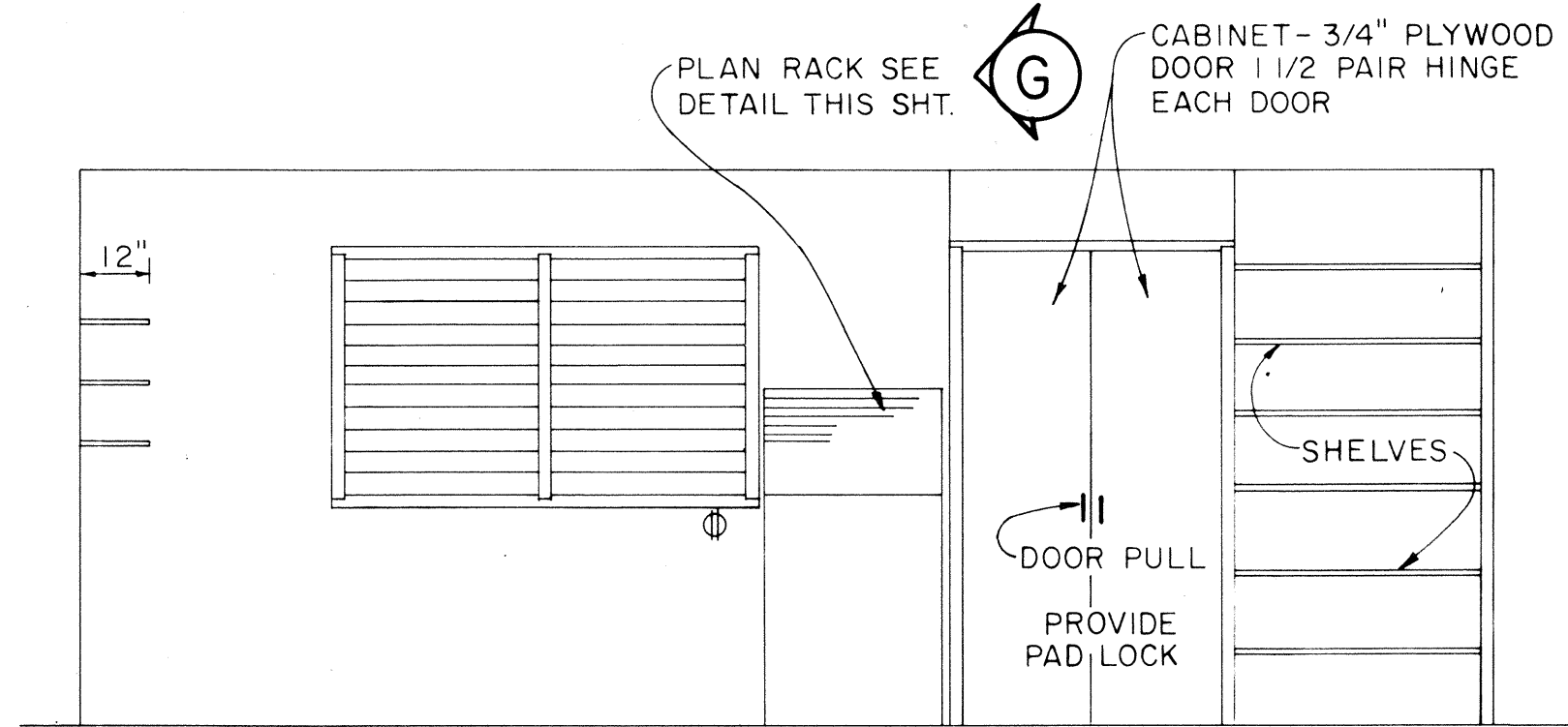


ELEVATION D1
SCALE: 3/8" = 1'-0"

ELEVATION B1
SCALE: 3/8" = 1'-0"



PLAN RACK DETAIL
SCALE: 1 1/2" = 1'-0"
(ONE REQUIRED)



1'-6" x 5'-9" PORTABLE WORK TABLE DETAIL

SCALE: 3/4" = 1'-0"

THIS WORK DELETED FROM PROJECT

APPROVAL RECOMMENDED:
Mr. Hirose 12-4-69
HIGHWAY DESIGN ENGINEER DATE

APPROVED:
Robert S. Sasaki 12-10-69
ASSISTANT CHIEF, ENGINEERING DATE

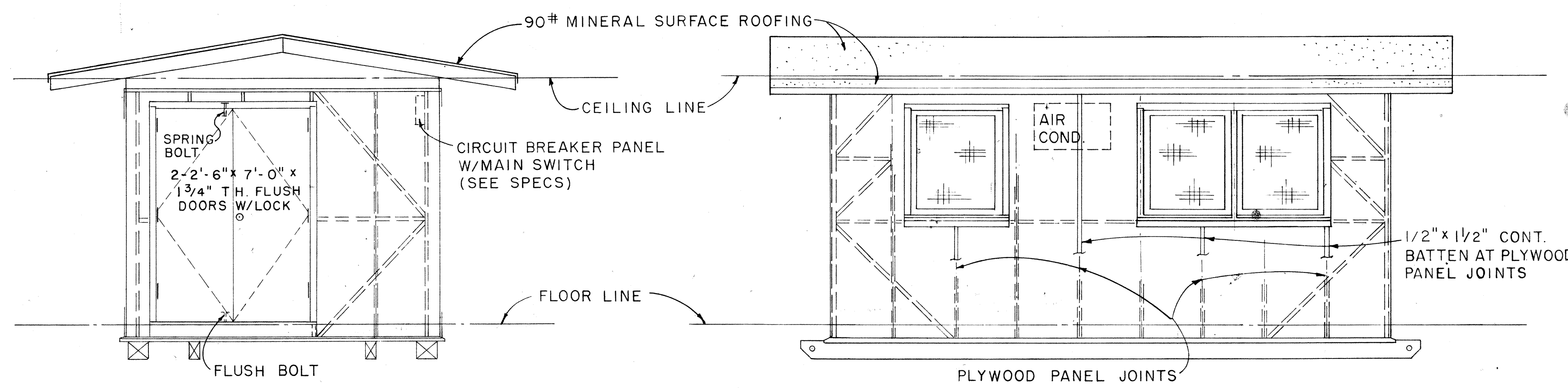
NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

FIELD OFFICE

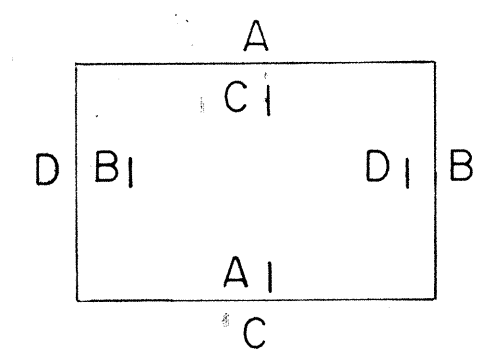
Scale: As Noted

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	FF-078-1(17) FF-078-1(17)	1977	36	164

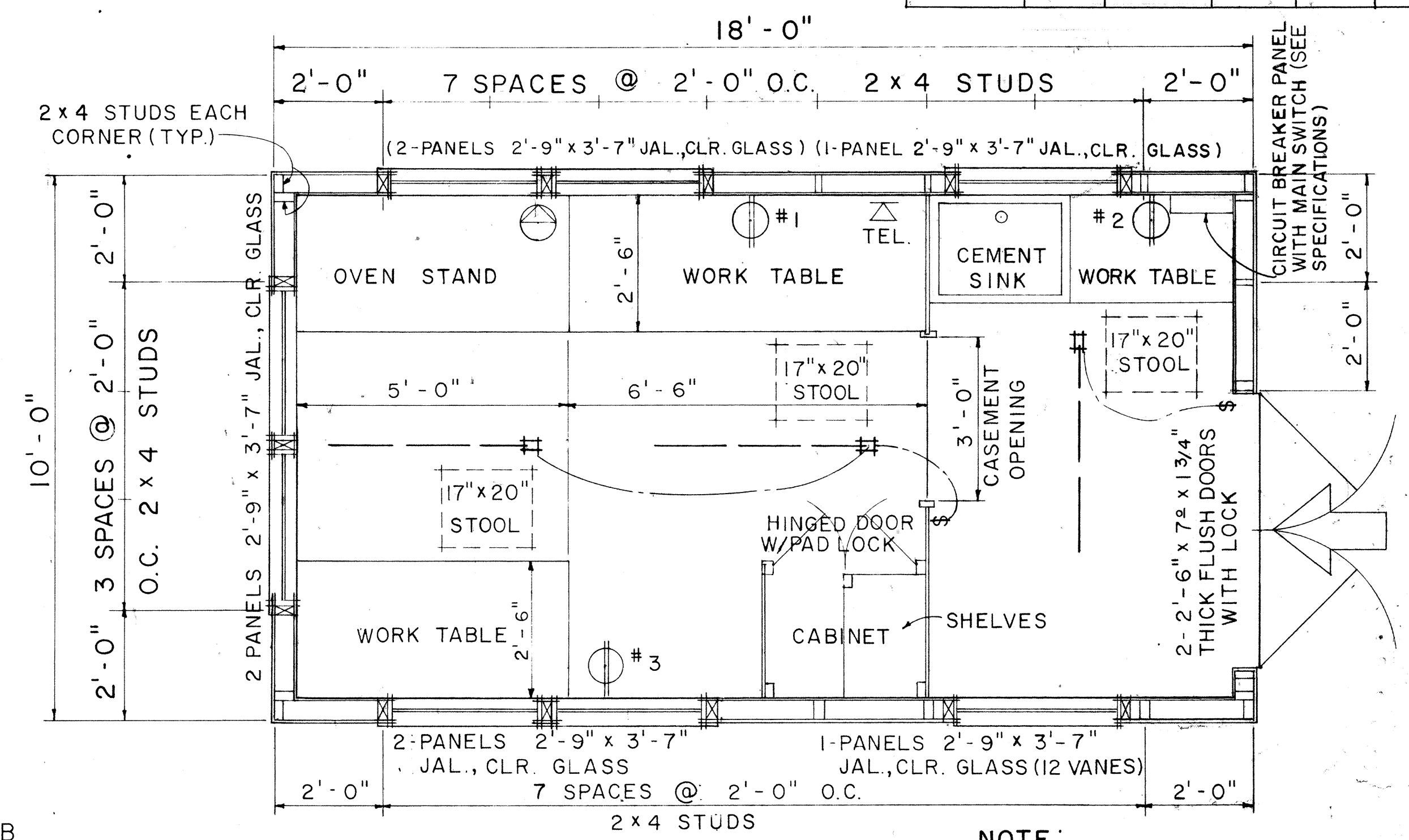


ELEVATION B
SCALE: 3/8" = 1'-0"

ELEVATION A
SCALE: 3/8" = 1'-0"

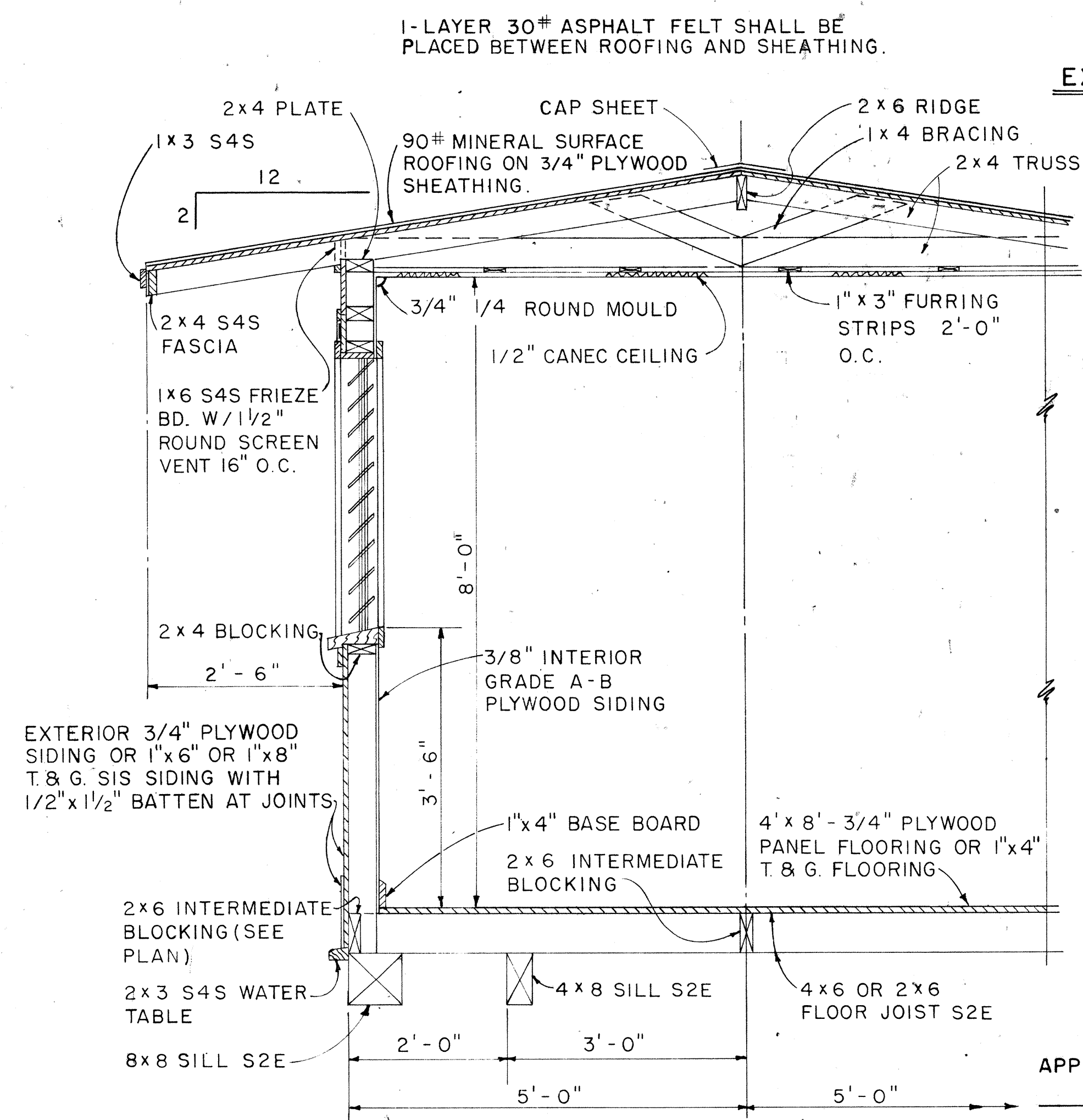


EXTERIOR & INTERIOR KEY

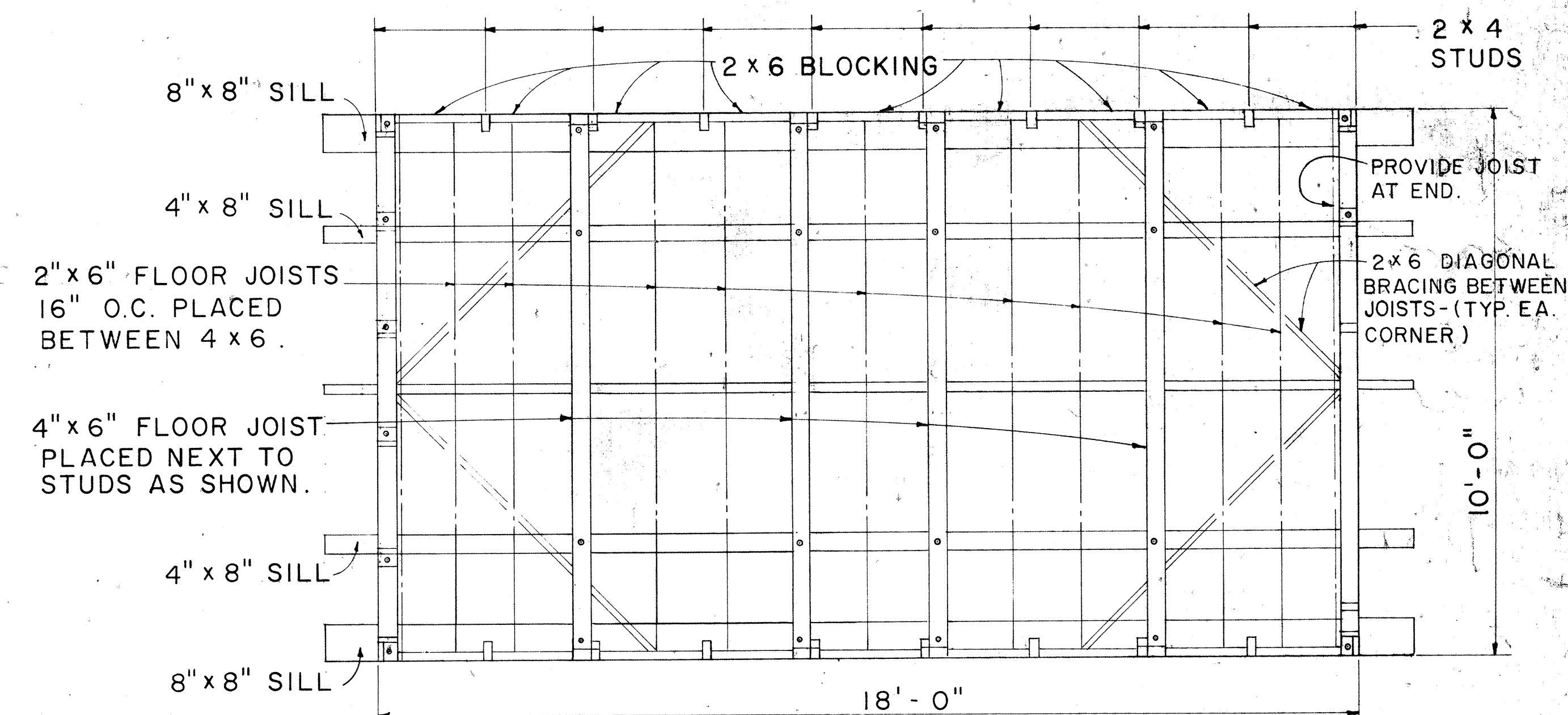


FLOOR PLAN
SCALE: 1/2" = 1'-0"

- NOTE:**
1. FLUORESCENT FIXTURE SHALL BE 48", 2 LAMP, 40 WATT, RAPID START.
 2. TELEPHONE AND WALL OUTLET 4'-0" ABOVE FLOOR.



TYPICAL SECTION
SCALE: 3/4" = 1'-0"



FLOOR FRAMING PLAN
SCALE: 1/2" = 1'-0"

THIS WORK DELETED FROM PROJECT

NOTE:
ALL 3/4" PLYWOOD SHALL BE EXTERIOR GRADE A-C OR BETTER.

APPROVAL RECOMMENDED:
HIGHWAY DESIGN ENGINEER
12-4-69
DATE

APPROVED:
ASSISTANT CHIEF, ENGINEERING
12-10-69
DATE

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

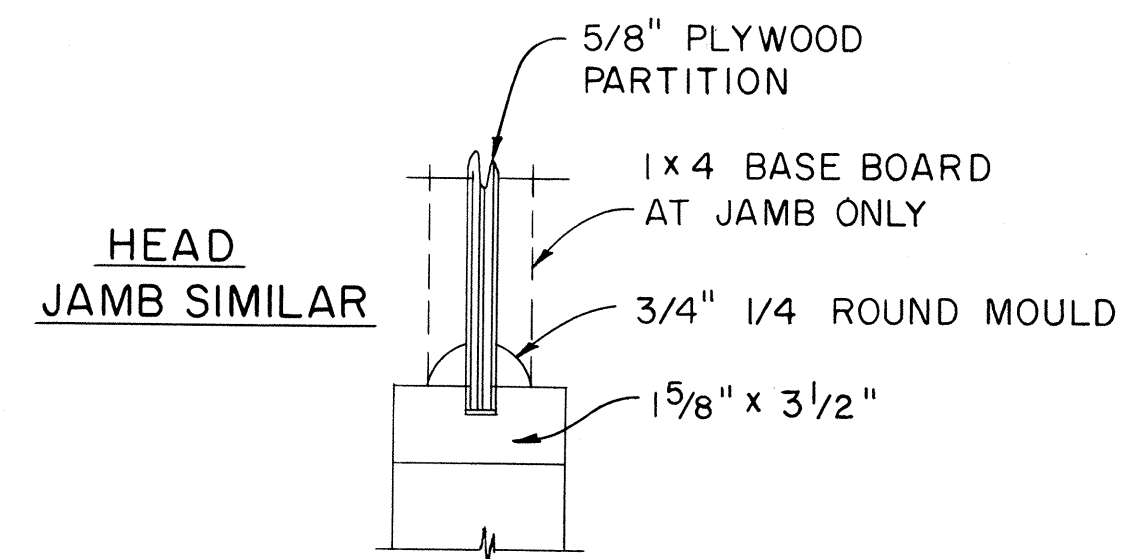
PROJECT SITE LABORATORY

Scale: As Noted

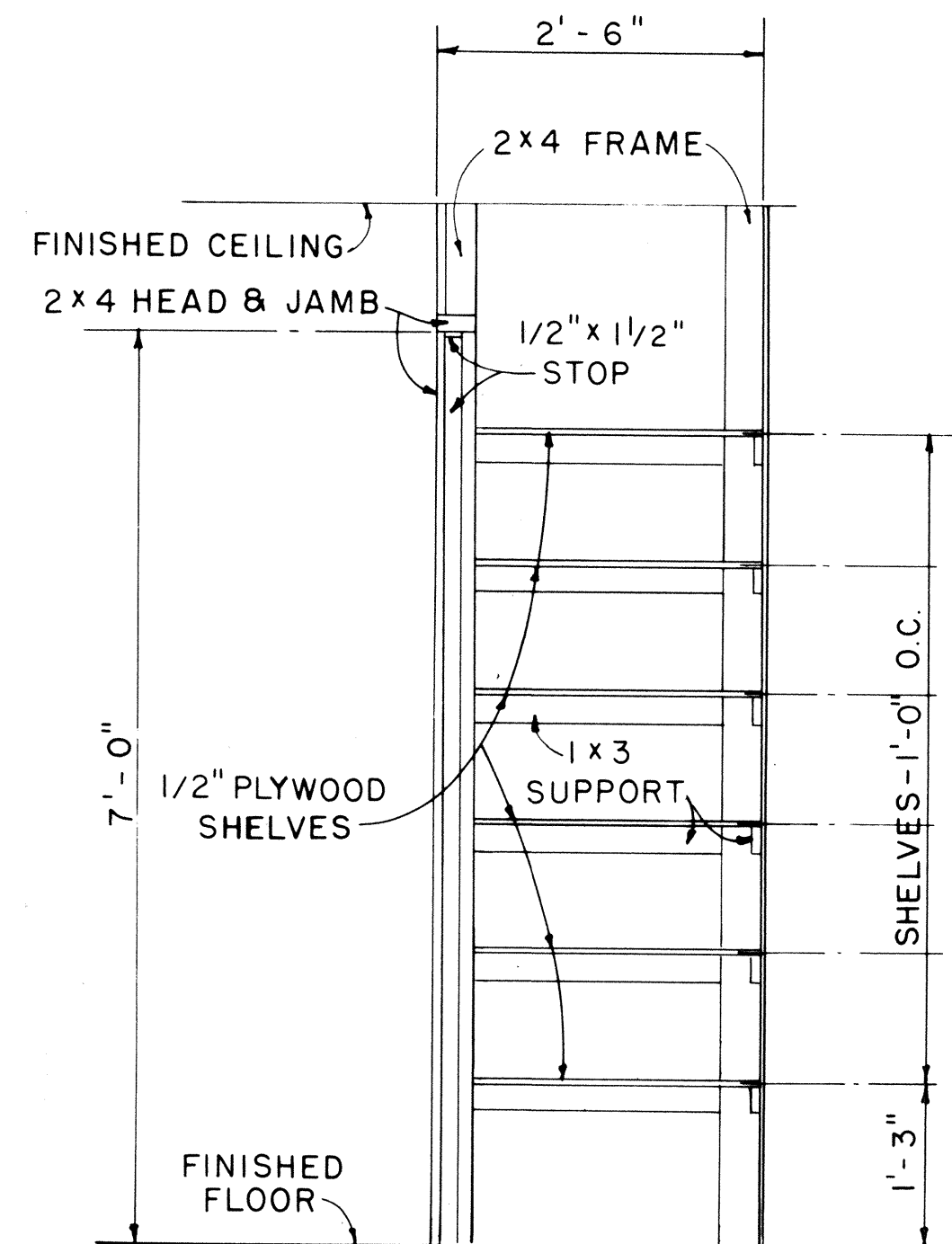
SHEET No. 15 OF 17 SHEETS DD 636.3

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

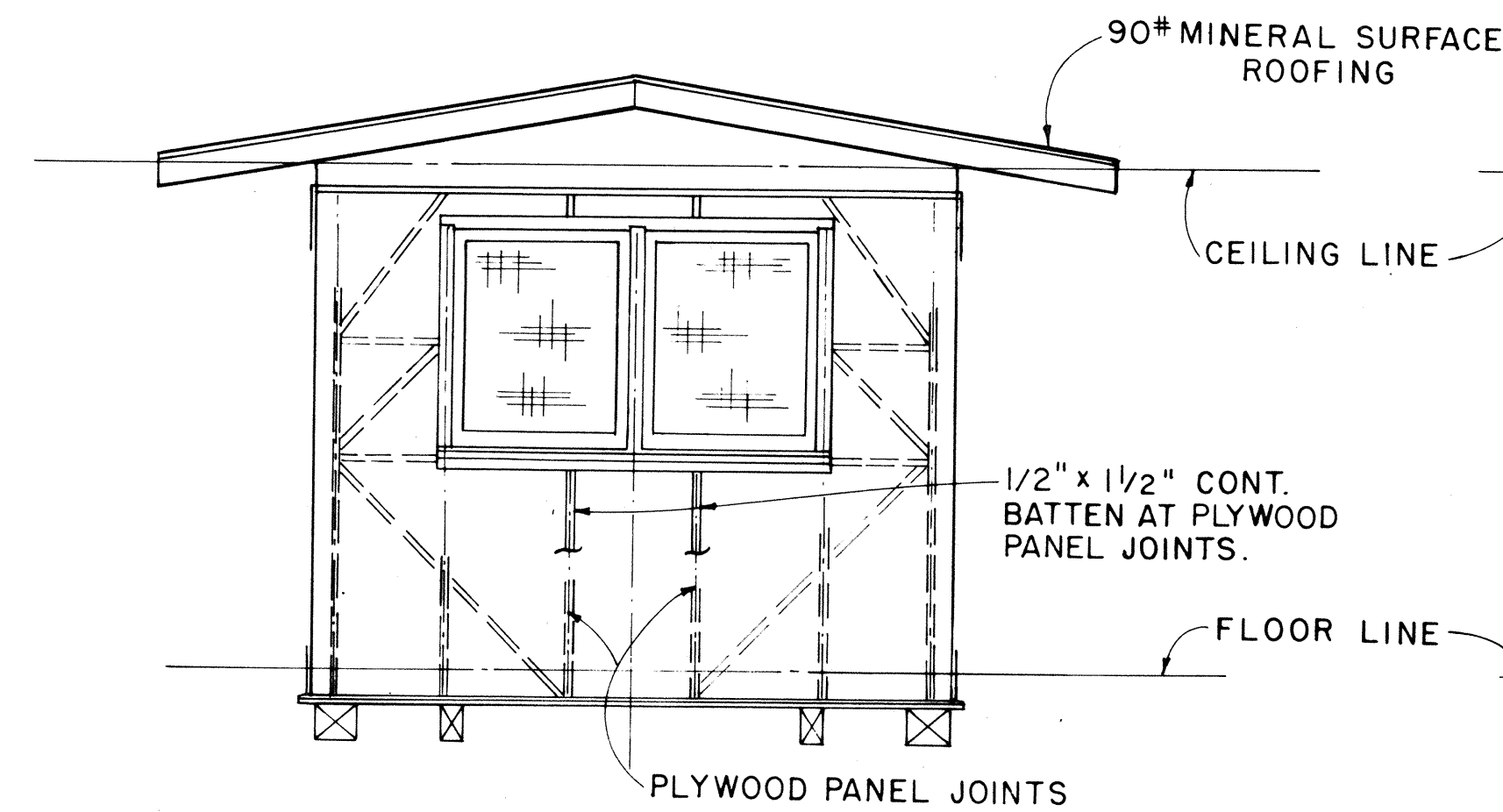
FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	F-075-1(17) F-F-078-1(17)	1977	37	164



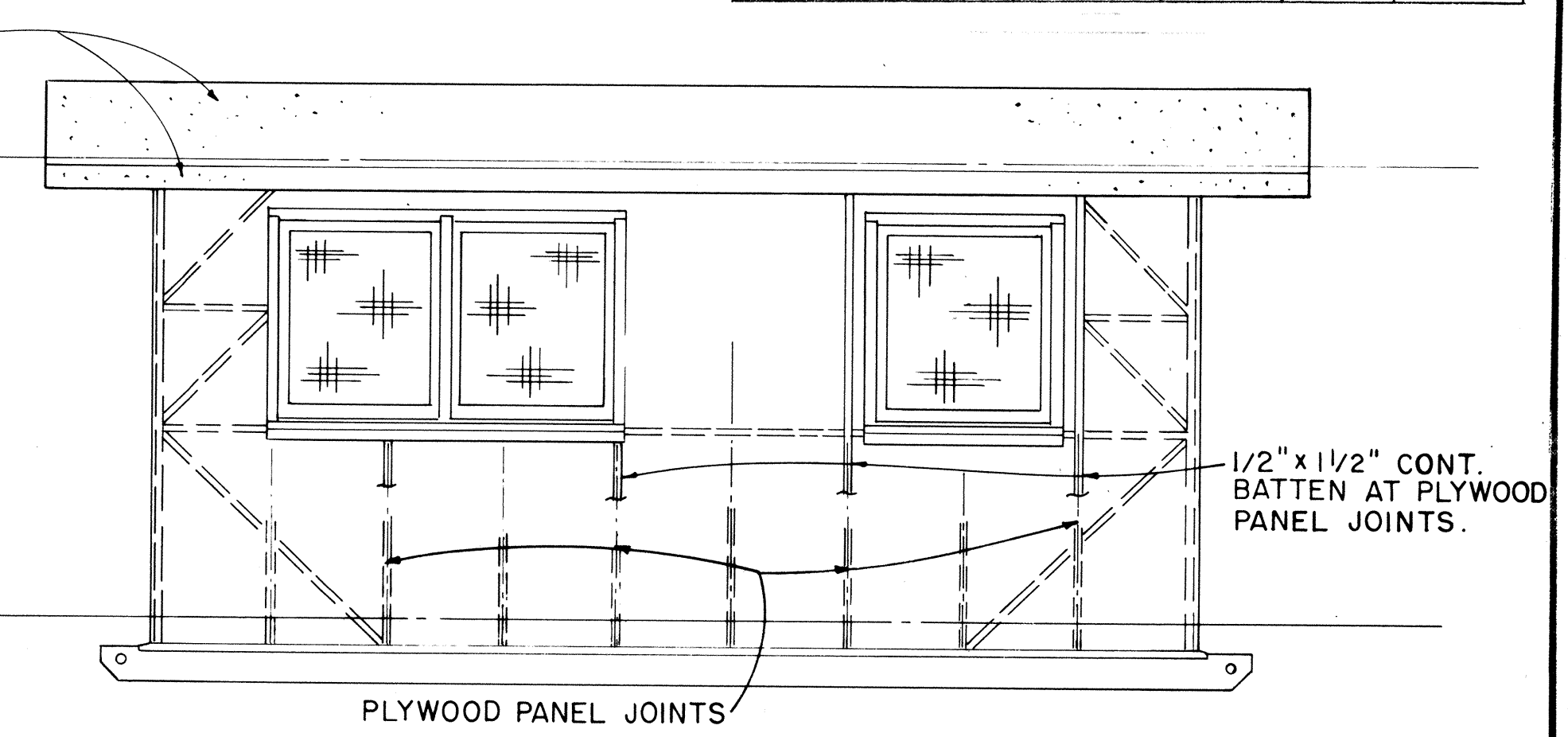
CASEMENT DETAIL
SCALE: 3" = 1'-0"



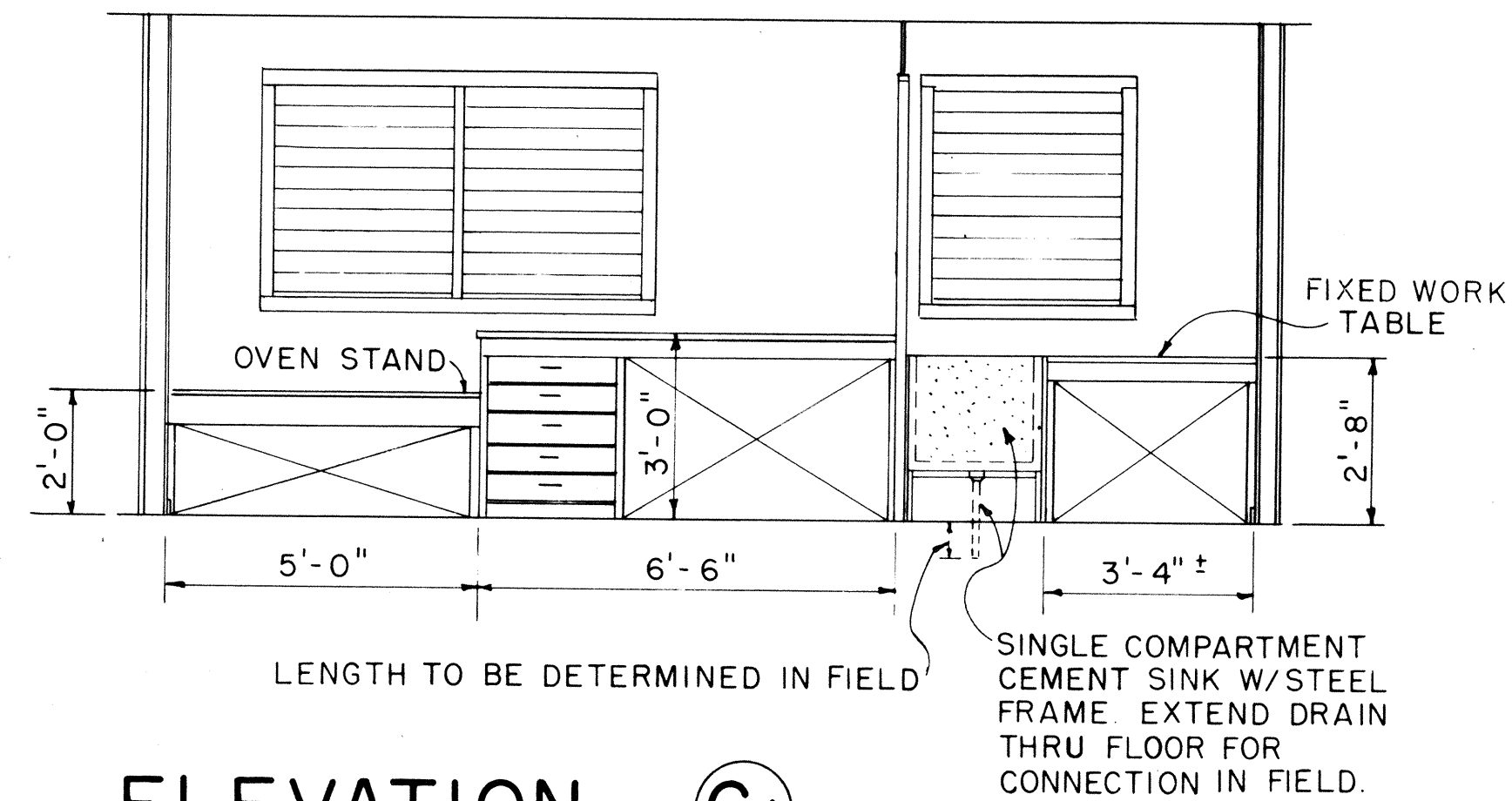
CABINET DETAIL
SCALE: 3/4" = 1'-0"



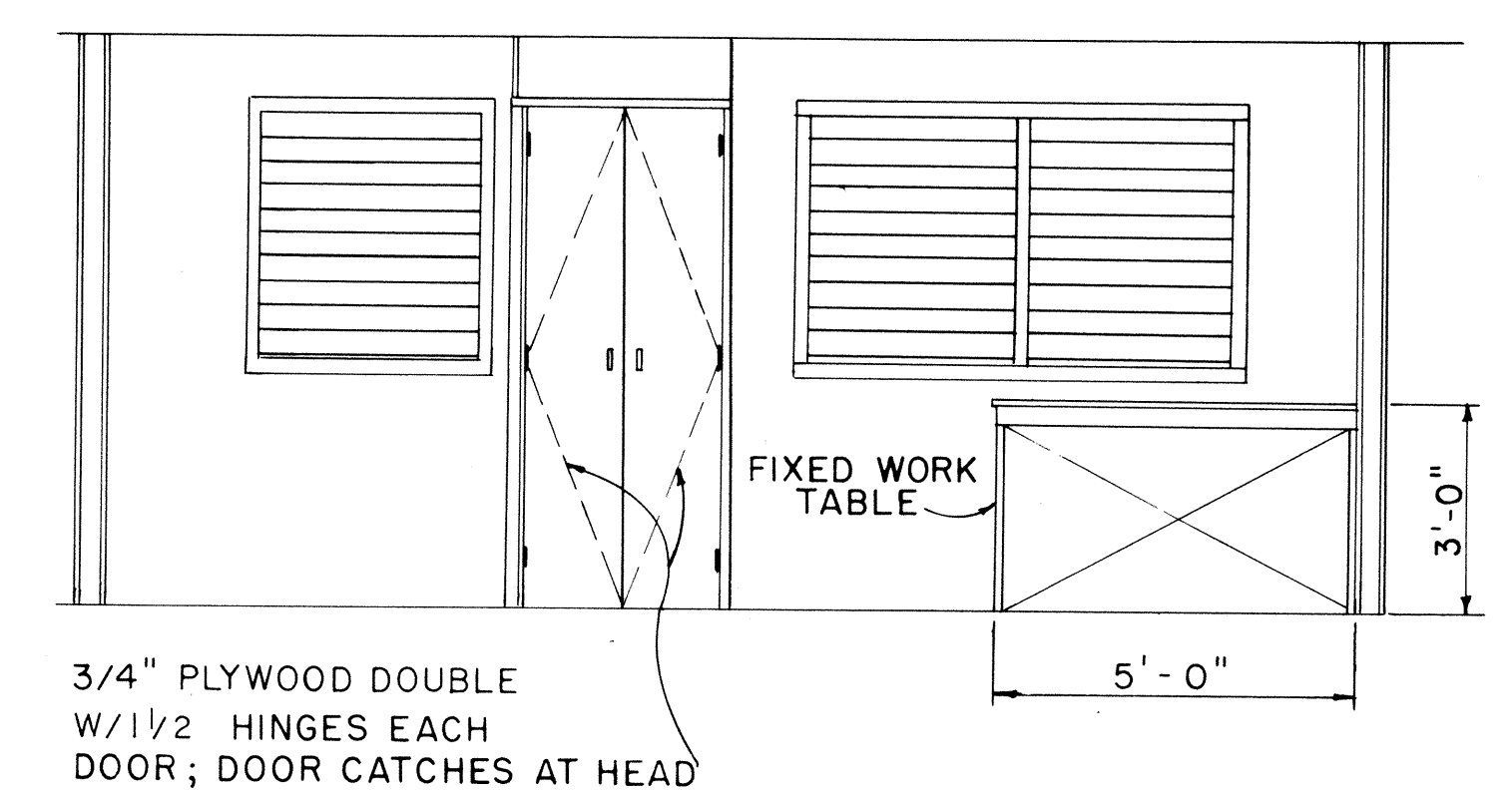
ELEVATION D
SCALE: 3/8" = 1'-0"



ELEVATION C
SCALE: 3/8" = 1'-0"



ELEVATION C1
SCALE: 3/8" = 1'-0"



ELEVATION A1
SCALE: 3/8" = 1'-0"

ORIGINAL PLAN	DATE
DESIGNED BY	
CHECKED BY	
NO.	

THIS WORK DELETED FROM PROJECT

NO.	REVISION	APPROVED BY	DATE

APPROVAL RECOMMENDED:

HIGHWAY DESIGN ENGINEER
12-4-69
DATE

APPROVED:

ASSISTANT CHIEF, ENGINEERING
12-10-69
DATE

STATE OF HAWAII DEPARTMENT OF TRANSPORTATION HIGHWAYS DIVISION
PROJECT SITE LABORATORY
Scale: As Noted

[illegible]

The diagram illustrates the cross-section of a window sill assembly, divided into two main sections: **EXTERIOR** and **INTERIOR**.

EXTERIOR SECTION:

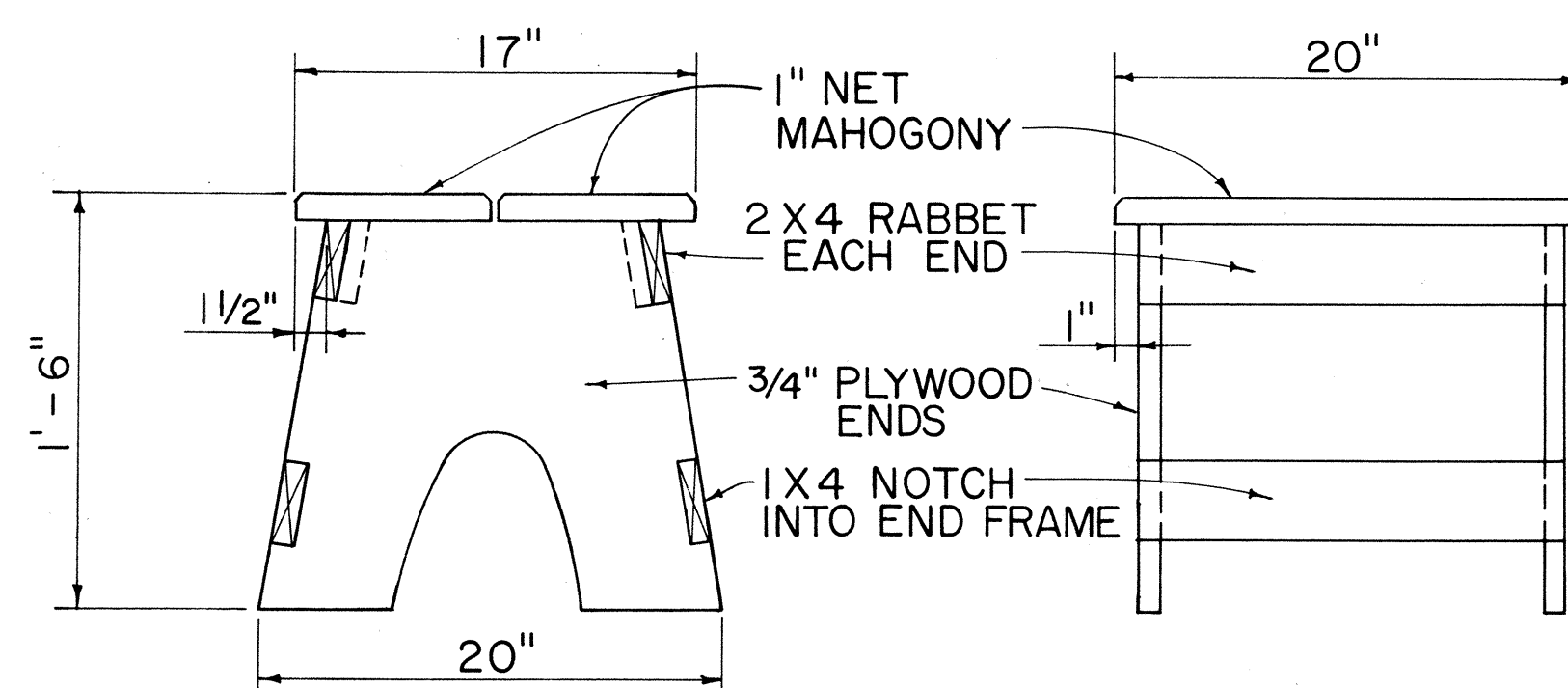
- 3/4" PLYWOOD:** The outermost layer on the exterior side.
- 3/8" X 2 5/8" 2 X 4:** A vertical structural member.
- 1 3/4" THICK FLS. DR.:** A horizontal flange or door component.
- HARDWOOD THRESHOLD:** The bottom horizontal component on the exterior side.
- PLYWOOD:** An additional layer below the threshold.

INTERIOR SECTION:

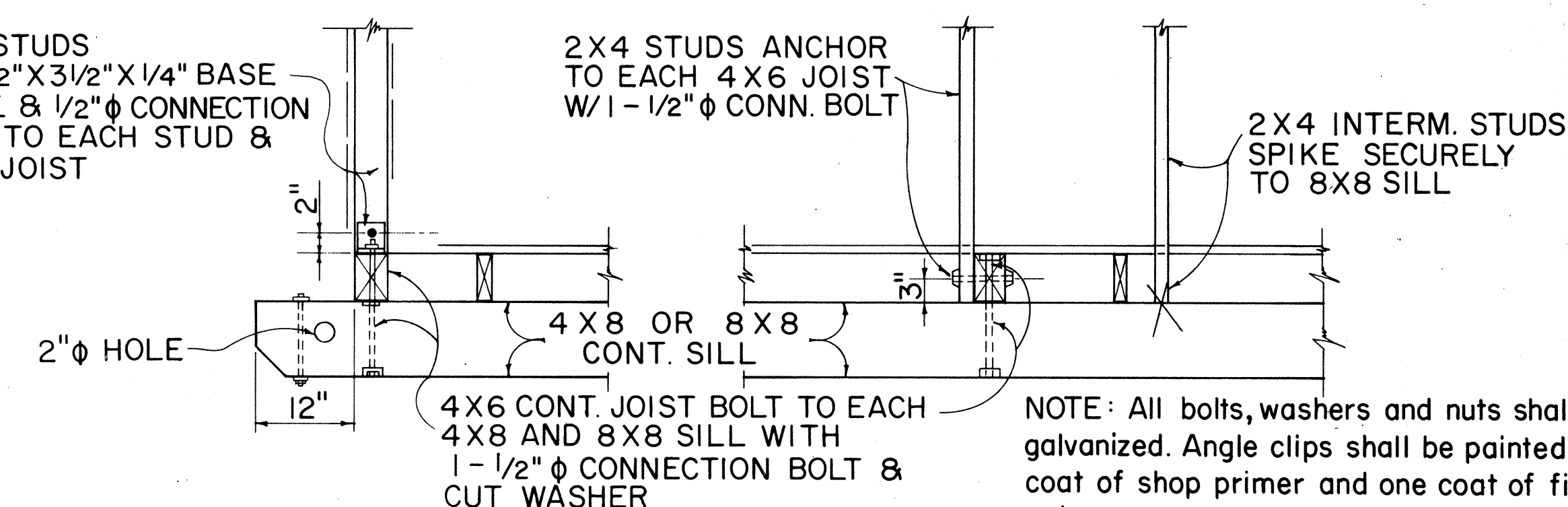
- 3/8" PLYWOOD:** The outermost layer on the interior side.
- 3/8" X 2 5/8" 1/2" X 15/8":** Vertical structural members.
- HEADER JAMB SIMILAR:** The top horizontal component on the interior side.
- FLOORING:** The floor surface on the interior side.
- 2 X 6 BLKG. 2 X 6 JOIST:** Vertical structural members supporting the floor.
- 8 X 8 SILL:** The large, central vertical support structure.

Arrows indicate the placement and orientation of these components within the assembly.

TYPICAL SINGLE OR DOUBLE
EXTERIOR DOOR DETAIL



NOTE: CONTRACTOR MAY WITH THE APPROVAL OF THE ENGINEER FURNISH THE FIELD OFFICE OR PROJECT SITE LABORATORY WITH STOOLS OTHER THAN THE TYPE SHOWN IN THE DETAIL.



AT ENDS OF BLDG. ALONG SIDES OF BLDG.

TYPICAL 2X4 STUD & 4X6 FLOOR JOIST BASE CONNECTION DETAILS

NO.	REVISION	APPROVED BY	DATE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

FIELD OFFICE
&
PROJECT SITE LABORATORY

Scale: As Noted

SHEET No. 17 OF 17 SHEETS	DD 636.5
---------------------------	----------

38

THIS WORK DELETED
FROM PROJECT

TYPICAL DETAIL JALOUSIES WINDOWS

APPROVAL RECOMMENDED:

HIGHWAY DESIGN ENGINEER

12-4-6
DATE

APPROVED:

ASSISTANT CHIEF, ENGINEERING

12-10-6
DATE

ORIGINAL PLAN

DATE _____

SURVEY PLOTTED BY _____

DRAWN BY _____

TRACED BY _____

DESIGNED BY _____

QUANTITIES BY _____

CHECKED BY _____

No. _____