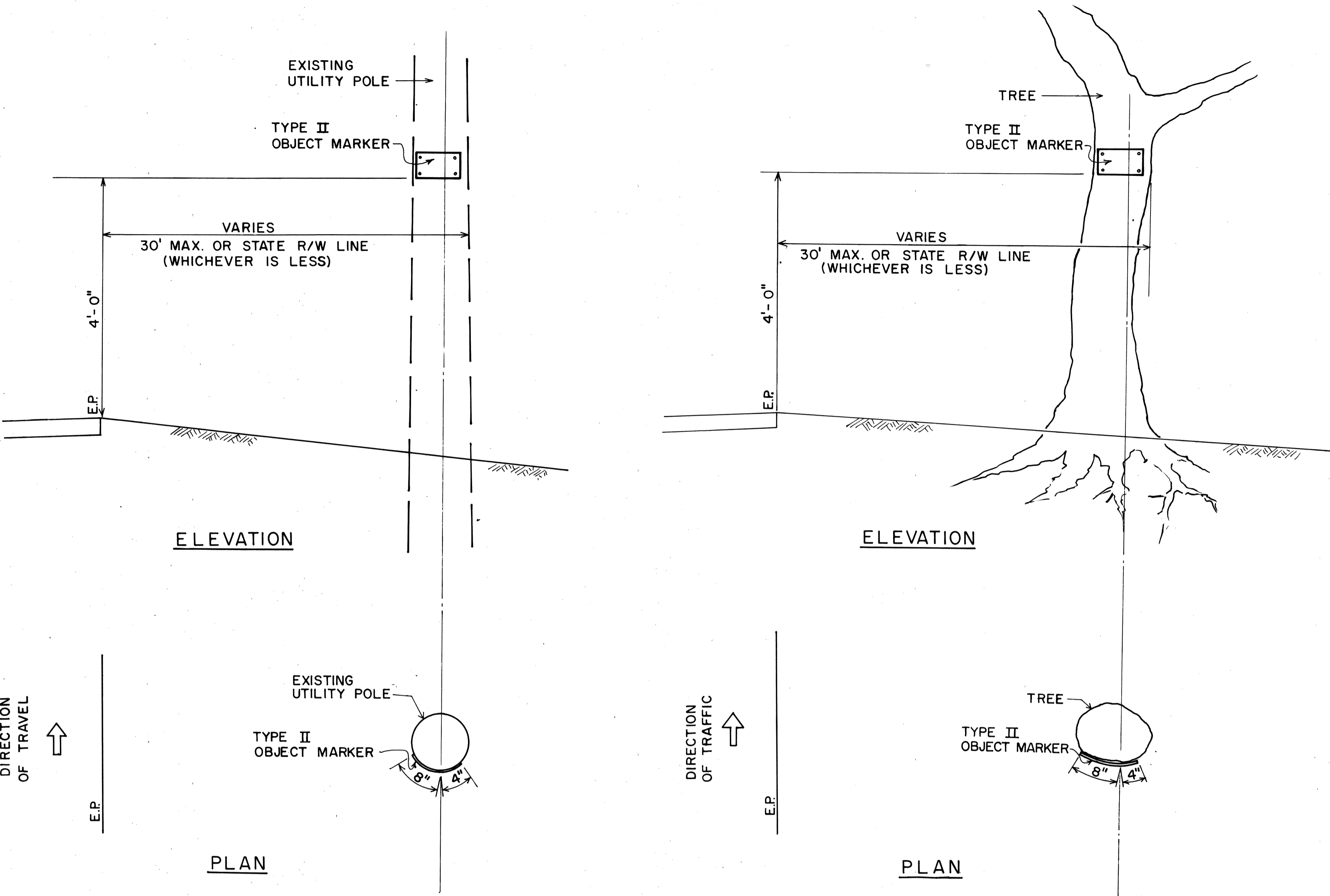


FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450B-01-80M	1980	10	18

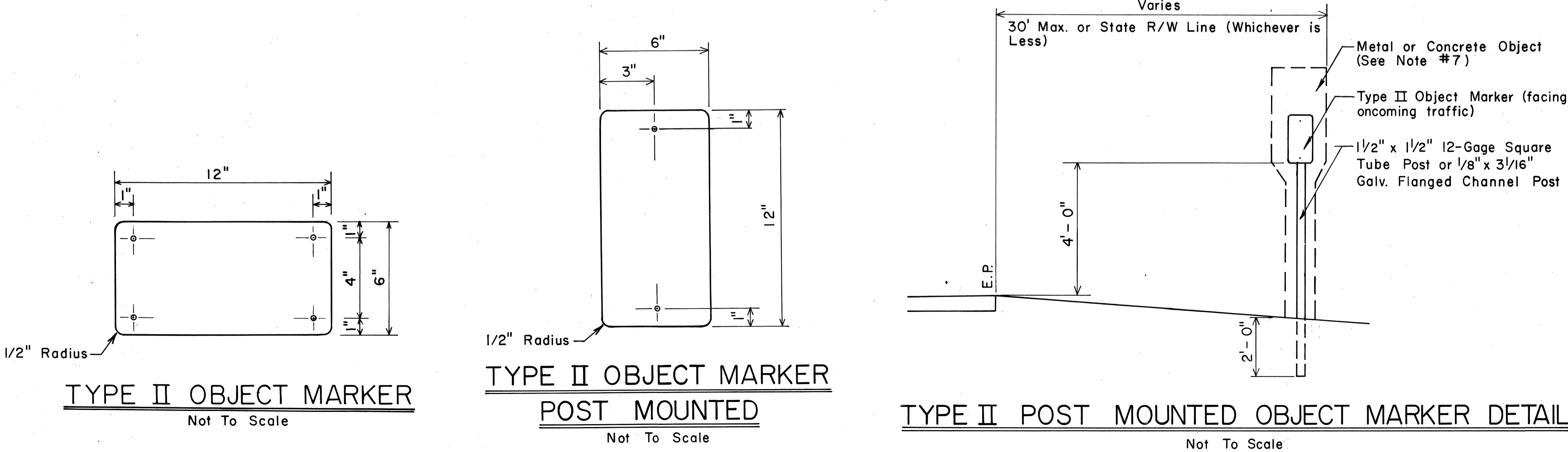
### GENERAL NOTES

- Type II Object Markers shall be of amber reflective sheeting material overlaid on 0.020" aluminum sheeting.
- Type II Object Markers shall be mounted on utility poles and trees, as shown on the plans, with 4d nails (4 ea.).
- The Contractor shall prepare the surface (of the utility pole or the tree etc.), on which the Type II Object Marker is to be placed to provide the most optimum reflecting surface to the motorist.
- Branches of trees which will obscure the object markers shall be trimmed. (Payment shall be incidental to Contract Item No. 621.4800 Type II Object Markers.)
- All objects (utility poles or trees) that are within the State highway right of way and within 30 feet of the roadway edge of pavement shall be marked.
- All objects to be marked will be determined in the field by the Engineer.
- Objects such as concrete posts, concrete or rock walls and boxes, metal posts (greater than 2 inches in diameter), or metal boxes shall be marked with post mounted object markers. Post mounted Type II Object Markers shall conform to the following requirements:
  - It shall consist of amber reflective sheeting material overlaid on 0.063 inch thick sheet aluminum backing of the dimensions shown on the plans.
  - It shall be mounted on 1/2"x 1/2", 12-gage square tube posts with 1/4"x 2" galv. bolts, nuts, and washers. Galvanized flanged 1/8" x 3 1/16" channel posts, 2 lbs. per ft., may be used as an option.



### TYPICAL TYPE II OBJECT MARKER MOUNTING DETAIL

Not To Scale



STATE OF HAWAII  
DEPARTMENT OF TRANSPORTATION  
LAND TRANSPORTATION FACILITIES DIVISION

TYPICAL DETAILS  
TYPE II OBJECT MARKERS

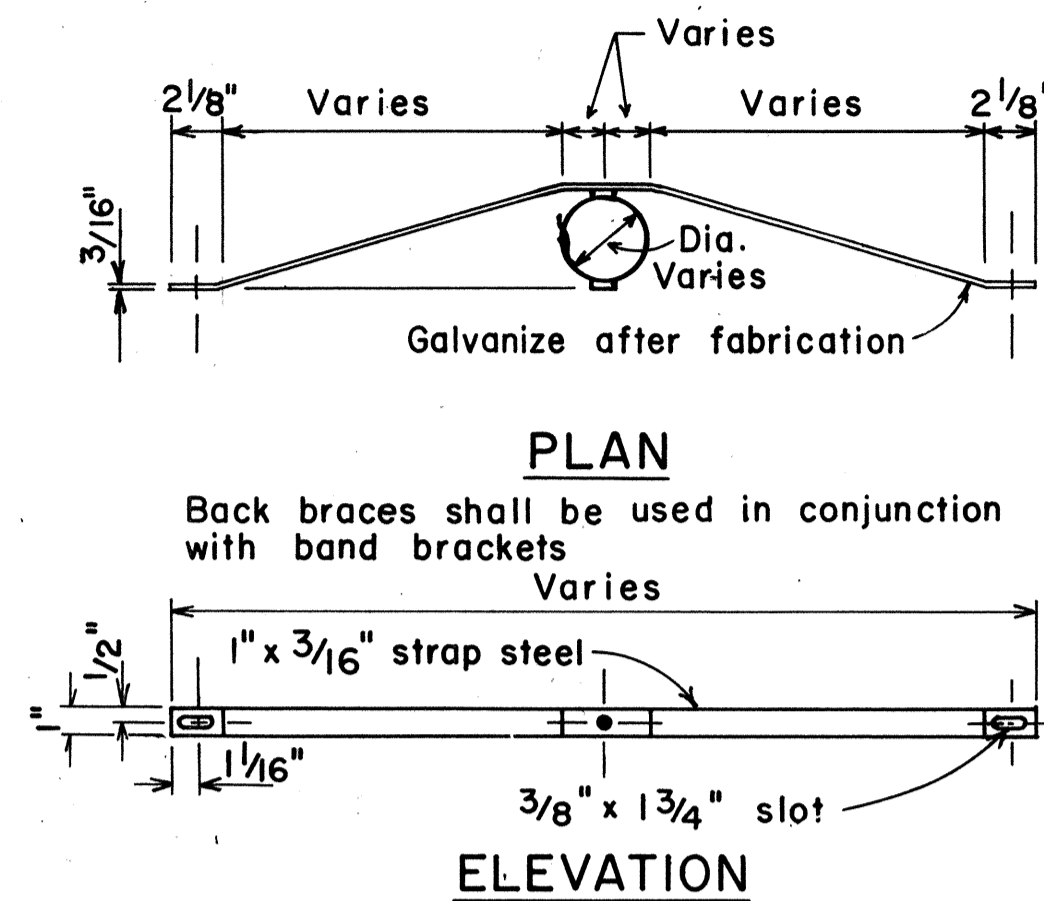
SCALE: AS SHOWN      DATE:      SHEET NO. 10 OF 18 SHEETS

SURVEY PLOTTED BY: _____	DATE: _____
DRAWN BY: _____	DESIGNED BY: _____
NOTE BOOK: _____	CHECKED BY: _____
NO. _____	

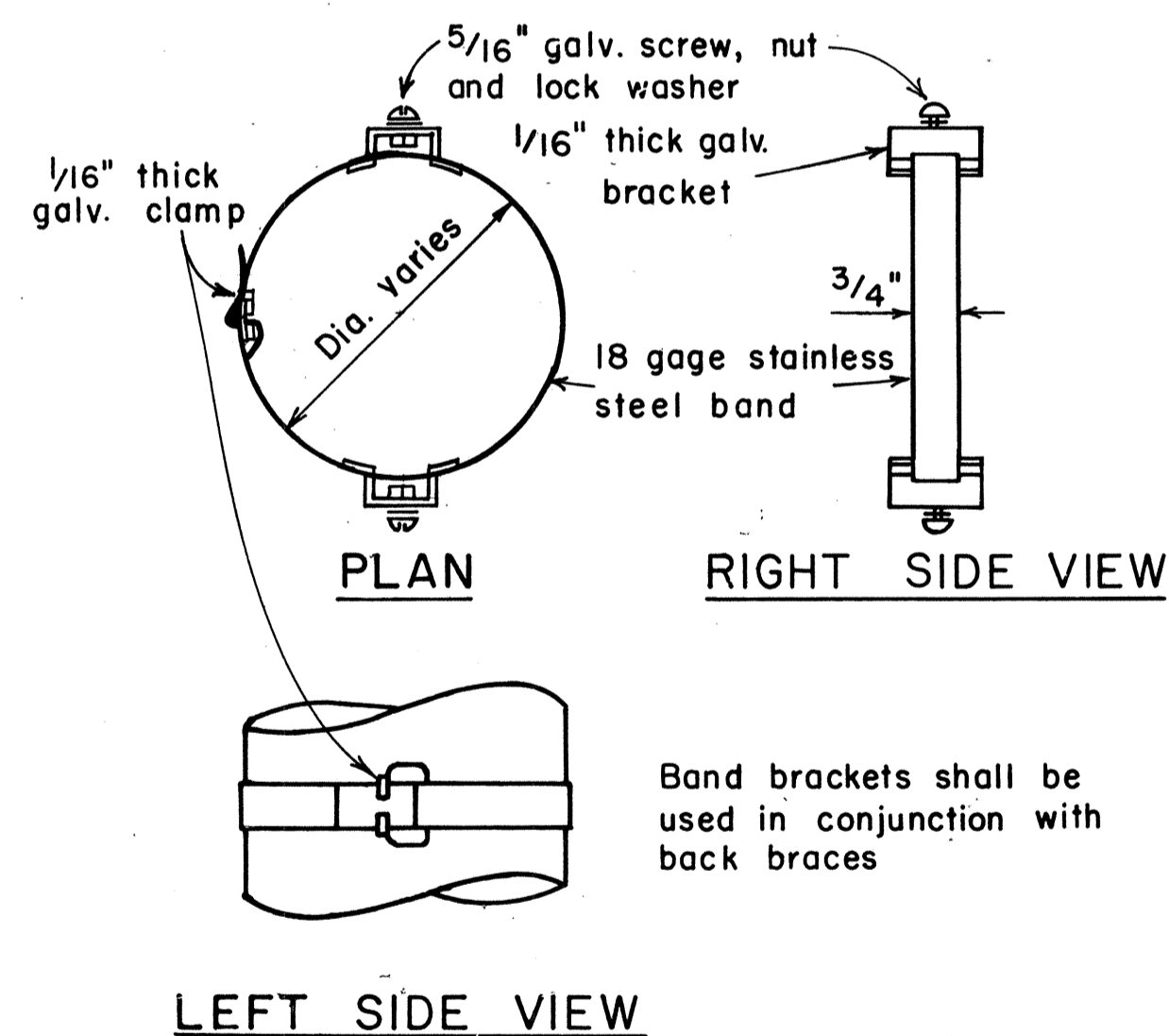
FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450B-01-80M	1980	11	18

## GENERAL NOTES

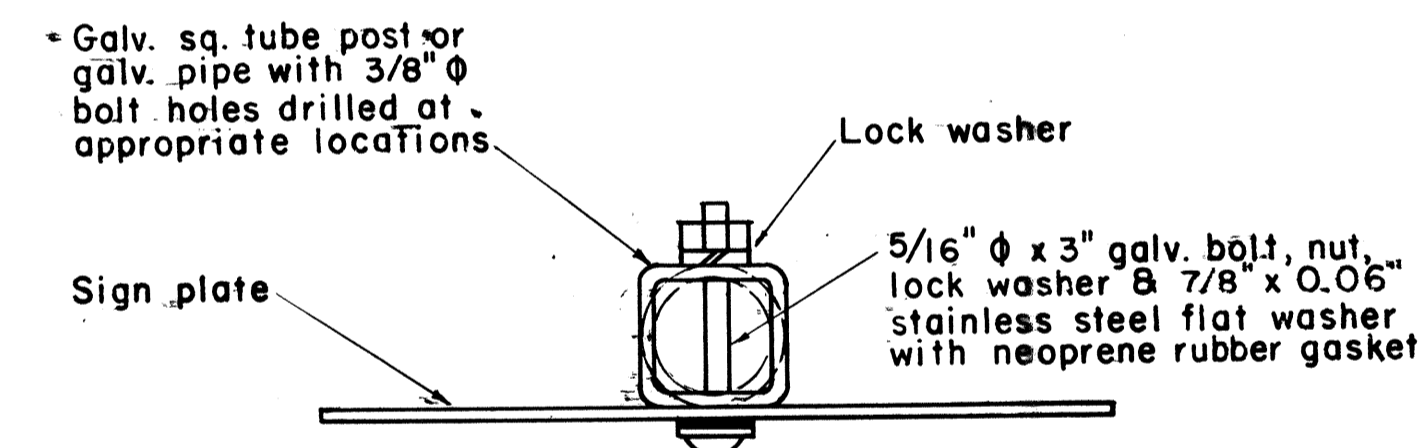
1. Signs 48" and wider or larger than 10 sq. ft. in area shall be mounted on two sign posts.
2. All signs larger than 10 sq. ft. in area or 48" inches and wider, and mounted on other than two posts supports (i.e., on highway lighting poles) shall have at least two sets of band brackets and back braces.
3. All signs 28 sq. ft. in area or larger and mounted on other than two posts supports (i.e., on highway lighting poles) shall have at least three sets of band brackets and back braces.
4. All parking restriction signs with arrows shall be mounted 45° to the line of traffic flow.
5. Sign posts shall extend 3 1/2" above sign where required for City and County street name signs.
6. (R) or (L) indicates right or left and shall be as shown on the plans.
- \*7. See plans for special details.
8. When clear roadside recovery areas are provided, Signs shall be placed as far from the edge of traveled way as possible up to a maximum of 30 feet. When possible they shall be placed in protected locations.
9. Signs in medians shall be placed at midpoint of median up to a maximum distance of 30 feet from the edge of traveled way. When appropriate, signs for opposing directions shall be placed back to back.



## BACK BRACE DETAILS FOR BALANCED SIGN INSTALLATION



GALVANIZED SQUARE TUBE POST  
(OR GALVANIZED PIPE)



BAND   BRACKET

## TYPICAL MOUNTING DETAILS

NOT TO SCALE

NO.	REVISION	APPROVED BY	DATE
1	Supercedes Sht. DT -100 approved 12/30/69	H.T.	11/15/70
2	Revised depth of signpost	H.T.	5/8/70
3	Added Notes No. 8 & No. 9	H.T.	5/18/70
4	Revised Gen. Note #4 & Mounting Details	H.T.	4/23/71

APPROVAL RECOMMENDED:  
Erick Tanaka 11/10/77  
TRAFFIC ENGINEER DATE

APPROVED: Herbert Z. Zakeishvili 11/15/17  
ASSISTANT CHIEF, ENGINEERING DATE

STATE OF HAWAII  
DEPARTMENT OF TRANSPORTATION  
HIGHWAYS DIVISION

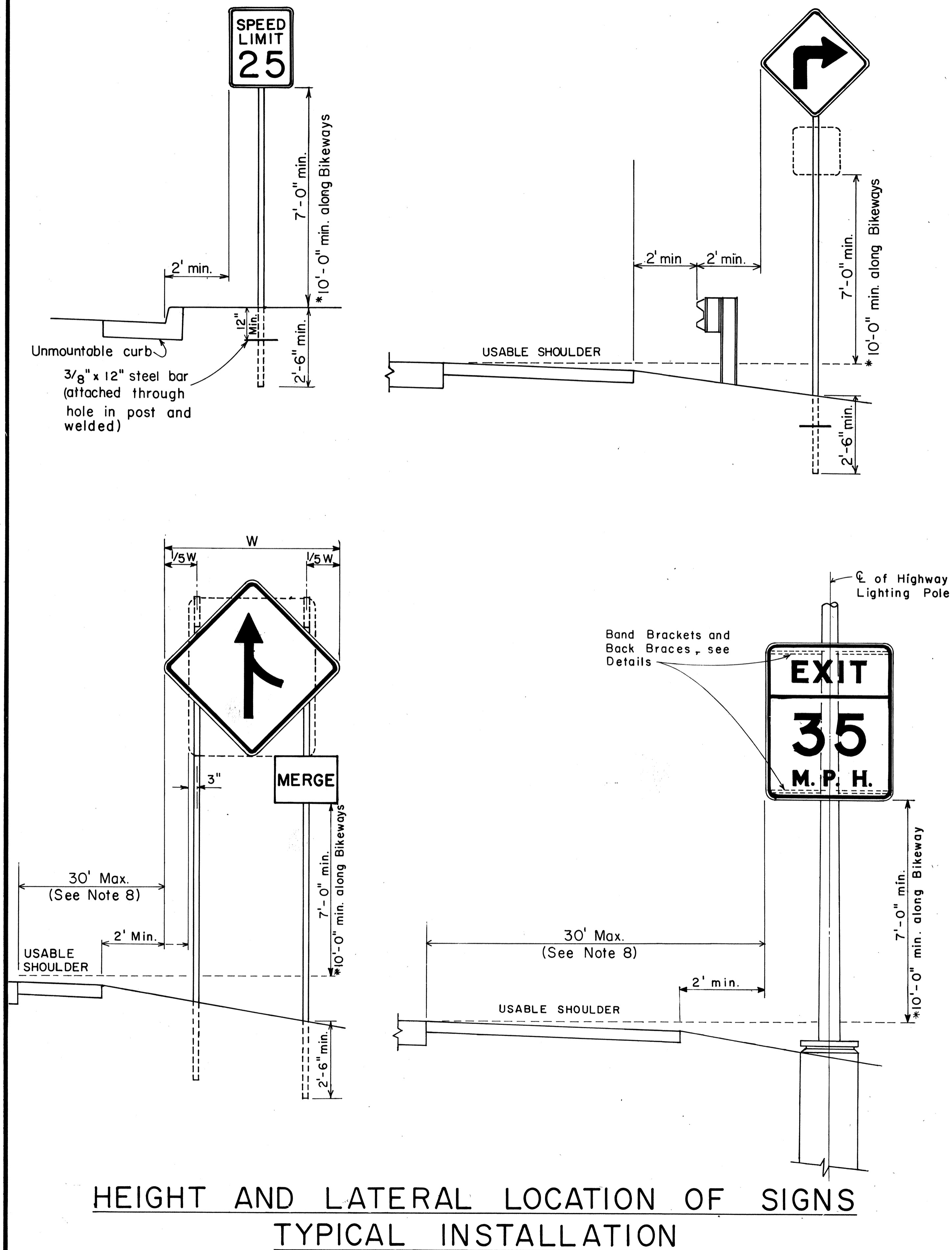
## STANDARD DETAILS

MISCELLANEOUS SIGN DETAILS`

Not to scale June, 1977

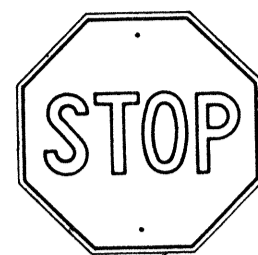
**SHEET No. 2 OF 9 SHEETS DT 100**

ADD. 11

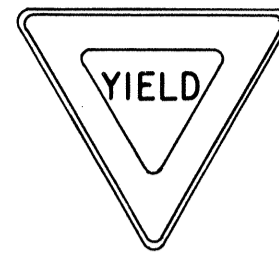


ORIGINAL PLAN	SURVEY PLOTTED BY _____	DATE _____
	DRAWN BY _____	" "
	TRACED BY _____	" "
NOTE BOOK	DESIGNED BY _____	" "
	QUANTITIES BY _____	" "
No. _____	CHECKED BY _____	" "

FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450B-01-80M	1980	12	18



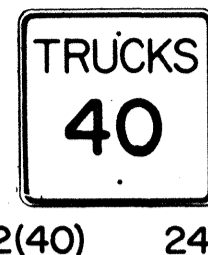
R1-1 30"x 30"  
R1-1-A 36"x 36"



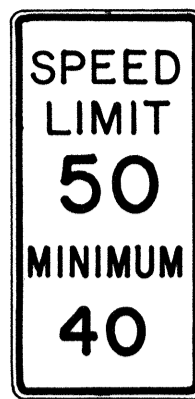
R1-2 36"x 36"x 36"  
R1-2-A 48"x 48"x 48"



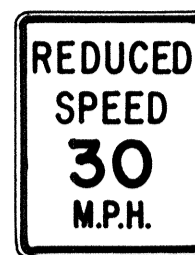
R2-1(50) 24"x 30"  
R2-1(50)-A 48"x 60"



R2-2(40) 24"x 24"  
R2-2(40)-A 48"x 48"



R2-4a(50/40) 24"x 48"  
R2-4a(50/40)-A 48"x 96"



R2-5b(30) 24"x 30"  
R2-5b(30)-A 48"x 60"



R3-1 24"x 24"  
24"x 18"  
R3-1-A 48"x 48"  
48"x 36"



R3-2 24"x 24"  
24"x 18"  
R3-2-A 48"x 48"  
48"x 36"



R3-3 24"x 24"  
R3-3-A 48"x 48"



R3-4 24"x 24"  
24"x 18"  
R3-4-A 48"x 48"  
48"x 36"



R3-5(L) 30"x 36"  
R3-5(L)-A 48"x 60"



R3-6(L) 30"x 36"  
R3-6(L)-A 48"x 60"

4-WAY

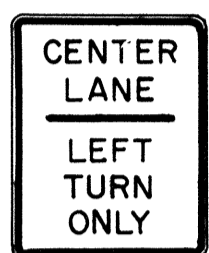
R1-3 12"x 6"  
R1-3-A 18"x 9"



R3-7(R) 30"x 30"  
R3-7(R)-A 48"x 48"



R3-8(L) 30"x 30"  
R3-8(L)-A 36"x 36"  
R3-8(L)-B 48"x 48"



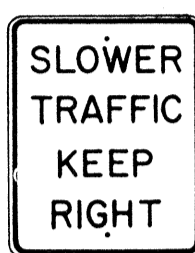
R3-9 24"x 30"



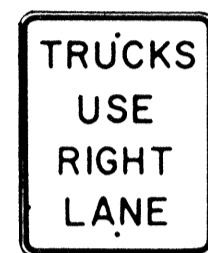
R4-1 24"x 30"



R4-2 24"x 30"



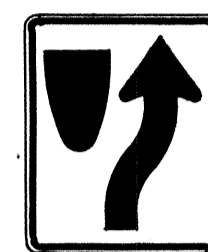
R4-3 24"x 30"  
R4-3-A 48"x 60"



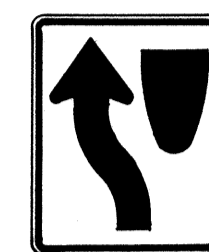
R4-5 24"x 30"



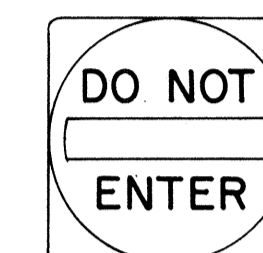
R4-6(500) 24"x 30"



R4-7 24"x 30"  
24"x 18"



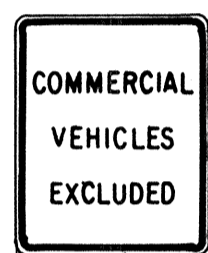
R4-8 24"x 30"  
24"x 18"



R5-1 30"x 30"  
R5-1-A 48"x 48"



R5-2 24"x 24"  
24"x 18"



R5-4 24"x 30"



R5-6 24"x 24"  
24"x 18"



R5-9 36"x 24"



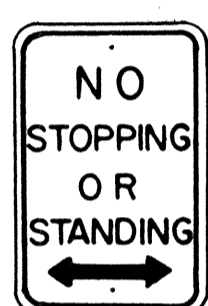
R6-1(R) 36"x 12"



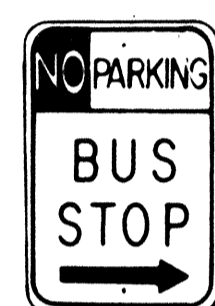
R6-2(R) 18"x 24"



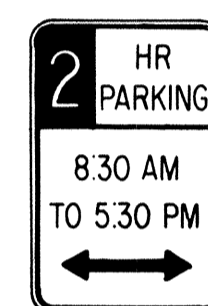
R7-1 12"x 18"  
R7-1-A 24"x 30"



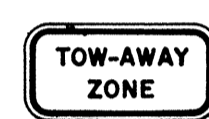
R7-4 12"x 18"  
R7-4-A 24"x 30"



R7-107(R) 12"x 18"



R7-108 12"x 18"



R7-201 12"x 6"  
R7-201-A 24"x 12"



R8-1 24"x 30"



R8-2 24"x 30"



R8-3 24"x 30"



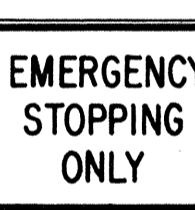
R8-4 30"x 24"  
R8-4-A 48"x 36"



R8-5 24"x 30"



R8-6 24"x 30"



R8-7 30"x 24"  
R8-7-A 48"x 36"



R9-1 18"x 24"



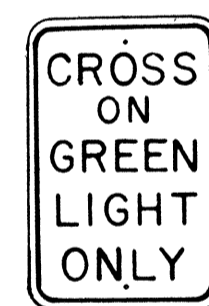
R9-2 12"x 18"



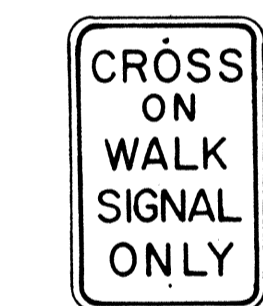
R9-3 12"x 18"



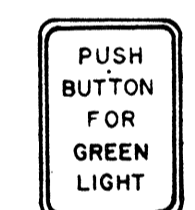
R9-4 18"x 24"



R10-1 12"x 18"



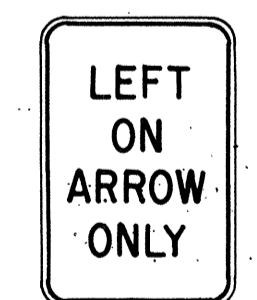
R10-2 12"x 18"



R10-3 9"x 12"



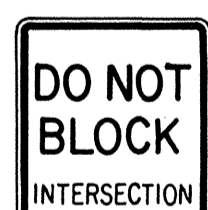
R10-4 9"x 12"



R10-5 24"x 30"



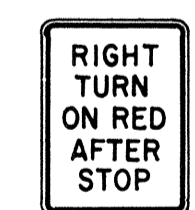
R10-6 24"x 36"



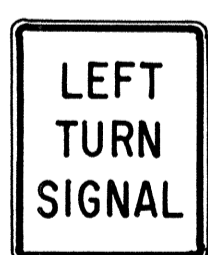
R10-7 24"x 30"



R10-8 24"x 30"



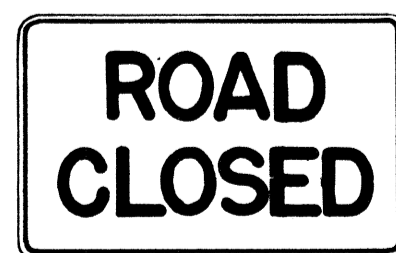
R10-9 24"x 30"



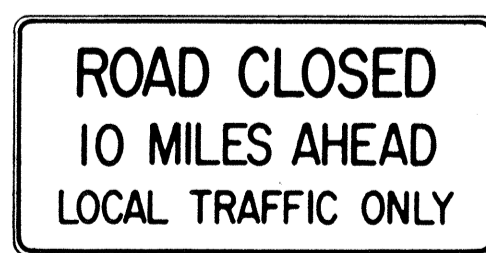
R10-10 24"x 30"



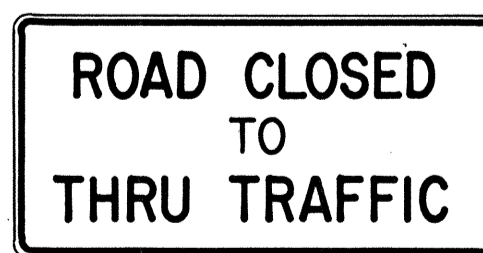
R11-1 24"x 30"



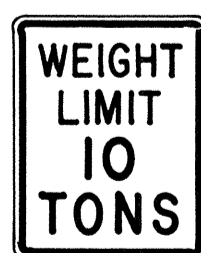
R11-2 48"x 30"



R11-3(10) 60"x 30"



R11-4 60"x 30"



R12-1(10) 24"x 30"

## GENERAL NOTES

- Sign details shall conform to the FHWA publications "Manual on Uniform Traffic Control Devices for Streets and Highways," 1971, and "Standard Highway Signs," 1972, and as amended.
- All regulatory signs shall be reflectorized unless otherwise specified.
- All regulatory signs shall have 3/8" bolt holes drilled at appropriate locations.
- Numerals in ( ) indicates numerals to be inserted for sign message. (R) or (L) indicates right or left.
- All signs shall be erected without educational plaques unless called for in the plans.

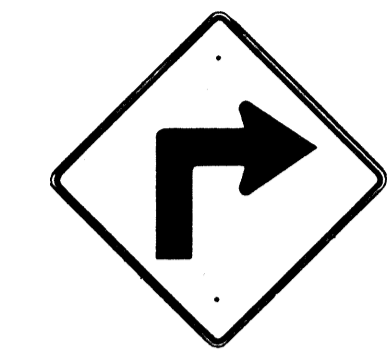
APPROVAL RECOMMENDED:  
*Frank Tanaka* 3/17/72  
TRAFFIC ENGINEER DATE

APPROVED:  
*Robert Zolner* 2-20-72  
ASSISTANT CHIEF, ENGINEERING DATE

NO.	REVISION	APPROVED BY	DATE
1	Supersedes Sht. DT 101 Approved 12-30-69	H.C.	3/20/72
2	Revised General Note 1.	H.C.	10/10/74
3	Added General Note 5	H.C.	8/9/79

STATE OF HAWAII DEPARTMENT OF TRANSPORTATION LAND TRANSPORTATION FACILITIES DIVISION
<b>STANDARD DETAILS</b> <b>REGULATORY SIGNS</b>
NOT TO SCALE
SHEET No. 3 OF 2 SHEETS DT 101

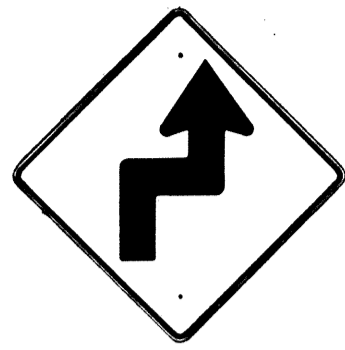
FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII *	HAW.	450B-01-80M	1980	13	18



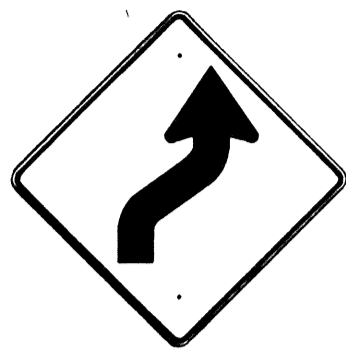
W1-1(R) 30"x 30"  
W1-1(R)-A 48"x 48"



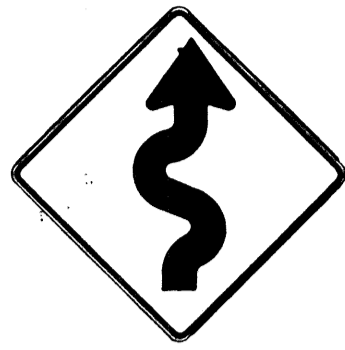
W1-2(R) 30"x 30"  
W1-2(R)-A 48"x 48"



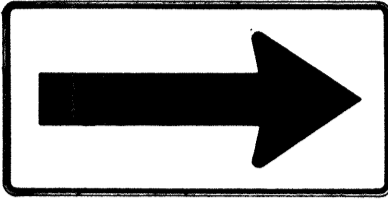
W1-3(R) 30"x 30"  
W1-3(R)-A 48"x 48"



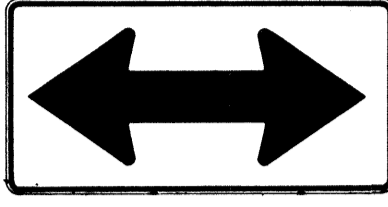
W1-4(R) 30"x 30"  
W1-4(R)-A 48"x 48"



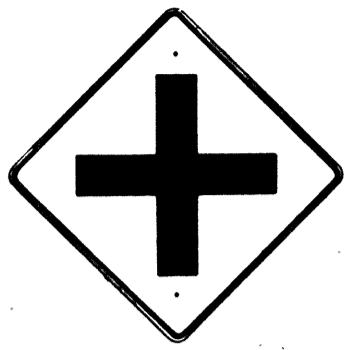
W1-5(R) 30"x 30"  
W1-5(R)-A 48"x 48"



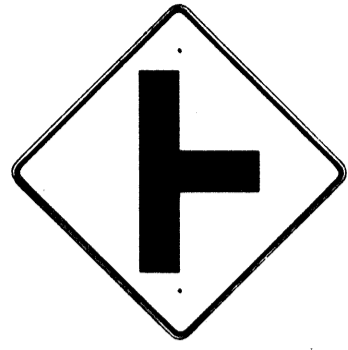
W1-6 48"x 24"



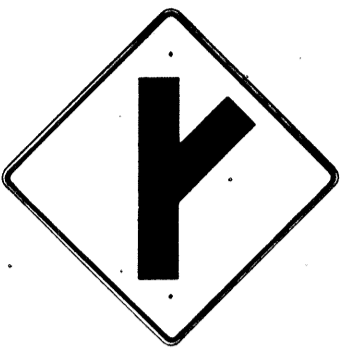
W1-7 48"x 24"



W2-1 30"x 30"  
W2-1-A 48"x 48"



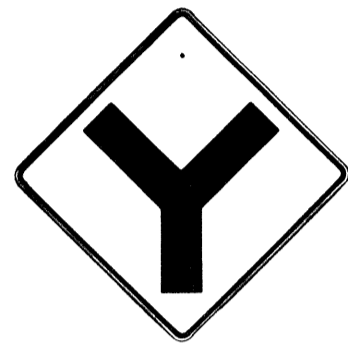
W2-2 30"x 30"  
W2-2-A 48"x 48"



W2-3(R) 30"x 30"  
W2-3(R)-A 48"x 48"



W2-4 30"x 30"  
W2-4-A 48"x 48"



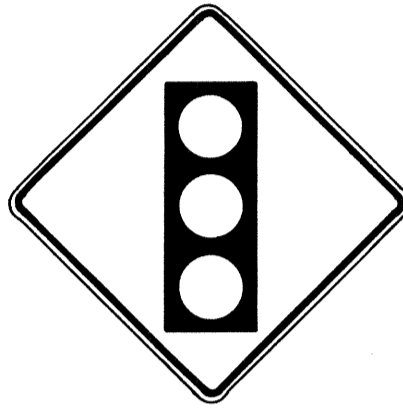
W2-5 30"x 30"  
W2-5-A 48"x 48"



W3-1 30"x 30"  
W3-1-A 36"x 36"



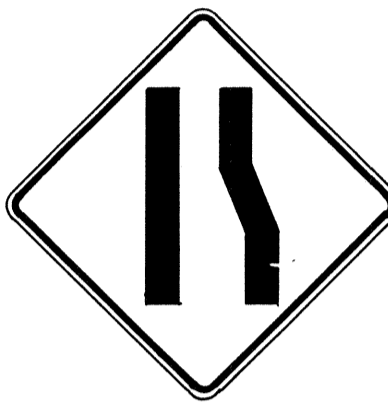
W3-2 30"x 30"  
W3-2-A 36"x 36"



SIGNAL  
AHEAD  
W3-3 36"x 36"  
24"x 18"



MERGE  
W4-1(R) 30"x 30"  
24"x 18"  
W4-1(R)-A 48"x 48"  
24"x 18"



W4-2(R) 36"x 36"  
W4-2(R)-A 48"x 48"



W5-1 36"x 36"



W5-2 30"x 30"  
W5-2-A 36"x 36"



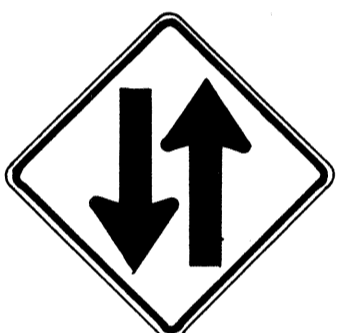
W5-3 36"x 36"



DIVIDED  
HIGHWAY  
W6-1 36"x 36"  
24"x 18"



DIVIDED  
HIGHWAY  
ENDS  
W6-2 36"x 36"  
24"x 18"



TWO WAY  
TRAFFIC  
W6-3 30"x 30"  
24"x 18"  
W6-3-A 36"x 36"  
24"x 18"  
W6-3-B 48"x 48"  
24"x 18"



HILL  
W7-1 30"x 30"  
24"x 18"  
W7-1-A 36"x 36"  
24"x 18"



USE LOW  
GEAR  
W7-2 24"x 18"



BUMP  
W8-1 30"x 30"  
W8-1-A 36"x 36"



DIP  
W8-2 30"x 30"  
W8-2-A 36"x 36"



PAVEMENT  
ENDS  
W8-3 30"x 30"  
W8-3-A 36"x 36"



SOFT  
SHOULDER  
W8-4 30"x 30"  
W8-4-A 36"x 36"



SLIPPERY  
WHEN WET  
W8-5 30"x 30"  
24"x 18"  
W8-5-A 36"x 36"  
24"x 18"



RIGHT  
LANE  
ENDS  
W9-1(R) 30"x 30"  
W9-1(R)-A 36"x 36"  
W9-1(R)-B 48"x 48"



LANE ENDS  
MERGE  
LEFT  
W9-2(L) 36"x 36"  
W9-2(L)-A 48"x 48"



W10-1 36" Diameter



BIKE  
XING  
W11-1 30"x 30"  
24"x 18"  
W11-1-A 36"x 36"  
24"x 18"



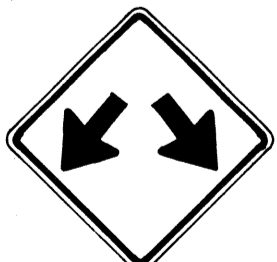
PED  
XING  
W11-2 30"x 30"  
24"x 18"  
W11-2-A 36"x 36"  
24"x 18"



CATTLE  
XING  
W11-4 30"x 30"  
24"x 18"  
W11-4-A 36"x 36"  
24"x 18"



FARM  
MACHINERY  
W11-5 30"x 30"  
24"x 18"  
W11-5-A 36"x 36"  
24"x 18"



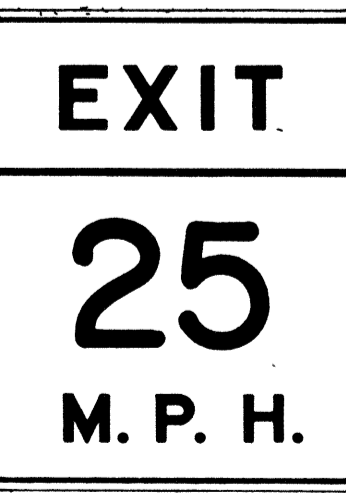
W12-1 24"x 24"  
W12-1-A 36"x 36"  
W12-1-B 48"x 48"



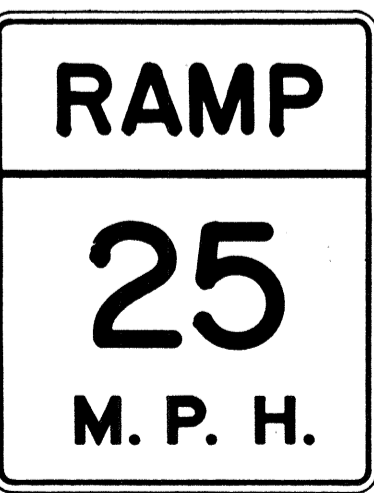
LOW  
CLEARANCE  
W12-2(12'-6") 36"x 36"  
24"x 18"



25  
M.P.H.  
W13-1(25) 18"x 18"  
W13-1(25)-A 24"x 24"



W13-2(25) 48"x 60"



W13-3(25) 48"x 60"



W14-1 30"x 30"



W14-3 36"x 48" x 48"

# GENERAL NOTES

1. Sign details shall conform to the FHWA publications "Manual on Uniform Traffic Control Devices for Streets and Highways," 1971, and "Standard Highway Signs," 1972, and as amended.
2. All warning signs shall be reflectorized unless otherwise specified.
3. All warning signs shall have 3/8" bolt holes drilled at appropriate locations.
4. Numerals in ( ) indicates numerals to be inserted for sign message. (R) or (L) indicates right or left.
5. Signs prefixed with "CW" on the plans shall indicate orange and black construction signs, and shall be reflectorized.

APPROVAL RECOMMENDED:  
*Eddie Tanaka* 3/17/12  
TRAFFIC ENGINEER DATE

APPROVED:  
*David D. Smith* 3-20-12  
ASSISTANT CHIEF, ENGINEERING DATE

NO.	REVISION	APPROVED BY	DATE
1	Supersedes Sht. DT 102 Approved 12-30-69	H.T.	3/20/12
2	Revised General Note 1	H.T.	10/16/14
3	Revised General Note 5	MA	9-16-75
4	Revised General Note 5	H.T.	9-14-76
5	Added Note 1	H.T.	11-9-79

STATE OF HAWAII  
DEPARTMENT OF TRANSPORTATION  
LAND TRANSPORTATION FACILITIES DIVISION

## STANDARD DETAILS WARNING SIGNS

NOT TO SCALE  
SHEET No. 4 OF 9 SHEETS DT 102

DATE	_____
DESIGNED BY	_____
CHECKED BY	_____
NO.	_____

FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450 B-01-80M	1980	14	18



CW20-1a 48" x 48"



CW20-2d 48" x 48"



CW20-3b 48" x 48"



CW20-4d 48" x 48"



CW20-5d(L) 48" x 48"



CW20-7c 48" x 48"



CW21-1 30" x 30"



CW21-2 30" x 30"



CW21-3 36" x 36"



CW21-4 36" x 36"



CW21-5 30" x 30"



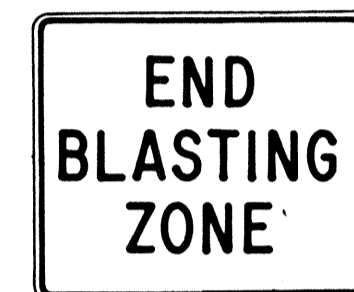
CW21-6 30" x 30"



CW22-1b 48" x 48"



CW22-2 42" x 36"



CW22-3 42" x 36"



CG20-1(5) 60" x 36"



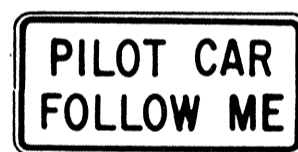
CG20-2 60" x 24"



CM4-9(R) 30" x 24"



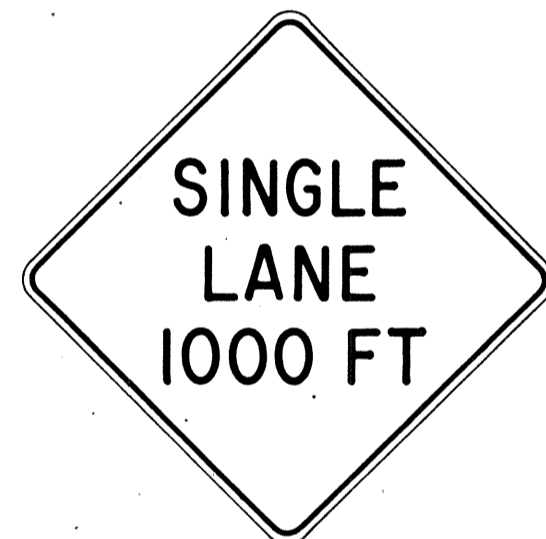
CM4-10(R) 48" x 18"



CG20-4 36" x 18"



CW23-1 36" x 36"



CW23-2b 48" x 48"



CW23-3(R) 48" x 48"

### GENERAL NOTES

- Sign details shall conform to the FHWA publications "Manual on Uniform Traffic Control Devices for Streets and Highways," 1971, and "Standard Highway Signs," 1972, and as amended.
- All construction signs shall be reflectorized.
- All construction signs shall have 3/8" bolt holes drilled at appropriate locations.
- Numerals in ( ) indicates numerals to be inserted for sign message. (R) or (L) indicates right or left.
- For "CW" series signs, suffixes a, b, c and d are as follows:  
a-1500 FT, b-1000 FT,  
c-500 FT and d-AHEAD.

NO.	REVISION	APPROVED BY	DATE
1	Supersedes Sht. DT 104 Approved 12-30-69	H.T.	3/23/72
2	Revised General Note 1	H.T.	10/10/74
3	Revised General Note 2	H.T.	9-16-75
4	Revised General Note 2 and sign CG20-1(5)	H.T.	9-14-76

APPROVAL RECOMMENDED:  
Erich Tanaka 3/21/72  
TRAFFIC ENGINEER DATE

APPROVED:  
Hubert Salsich 3/23/72  
ASSISTANT CHIEF, ENGINEERING DATE

STATE OF HAWAII DEPARTMENT OF TRANSPORTATION LAND TRANSPORTATION FACILITIES DIVISION  <b>STANDARD DETAILS</b> <b>CONSTRUCTION SIGNS</b>  NOT TO SCALE  SHEET No. 5 OF 9 SHEETS DT 104
------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------

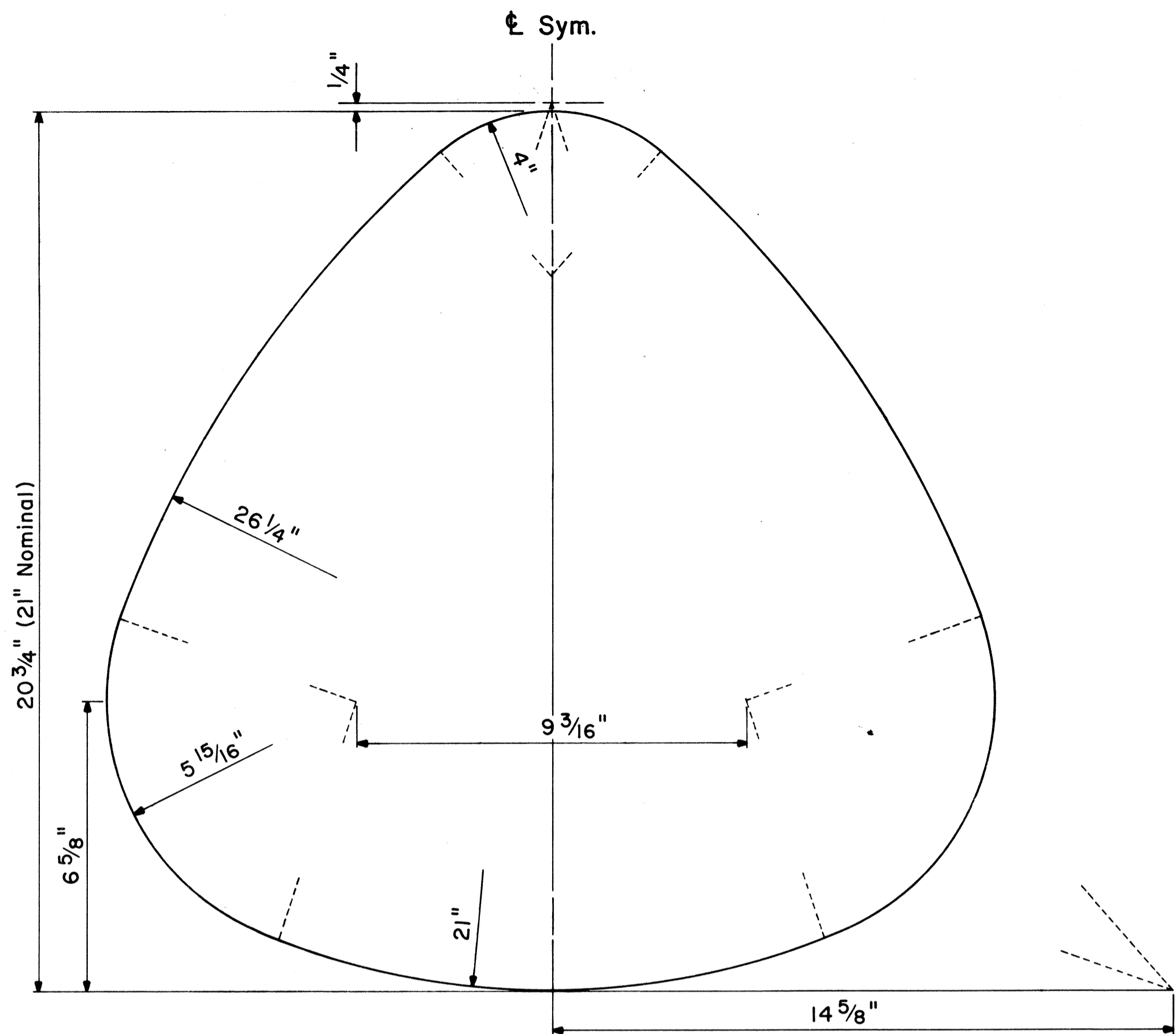
DESIGNED BY	DATE
PLANNED BY	
TRACED BY	
DESIGNED BY	
QUANTITIES BY	
CHECKED BY	
ORIGINAL PLAN	
NOTE BOOK	
No.	

FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450B-01-80M	1980	15	18

### GENERAL NOTES

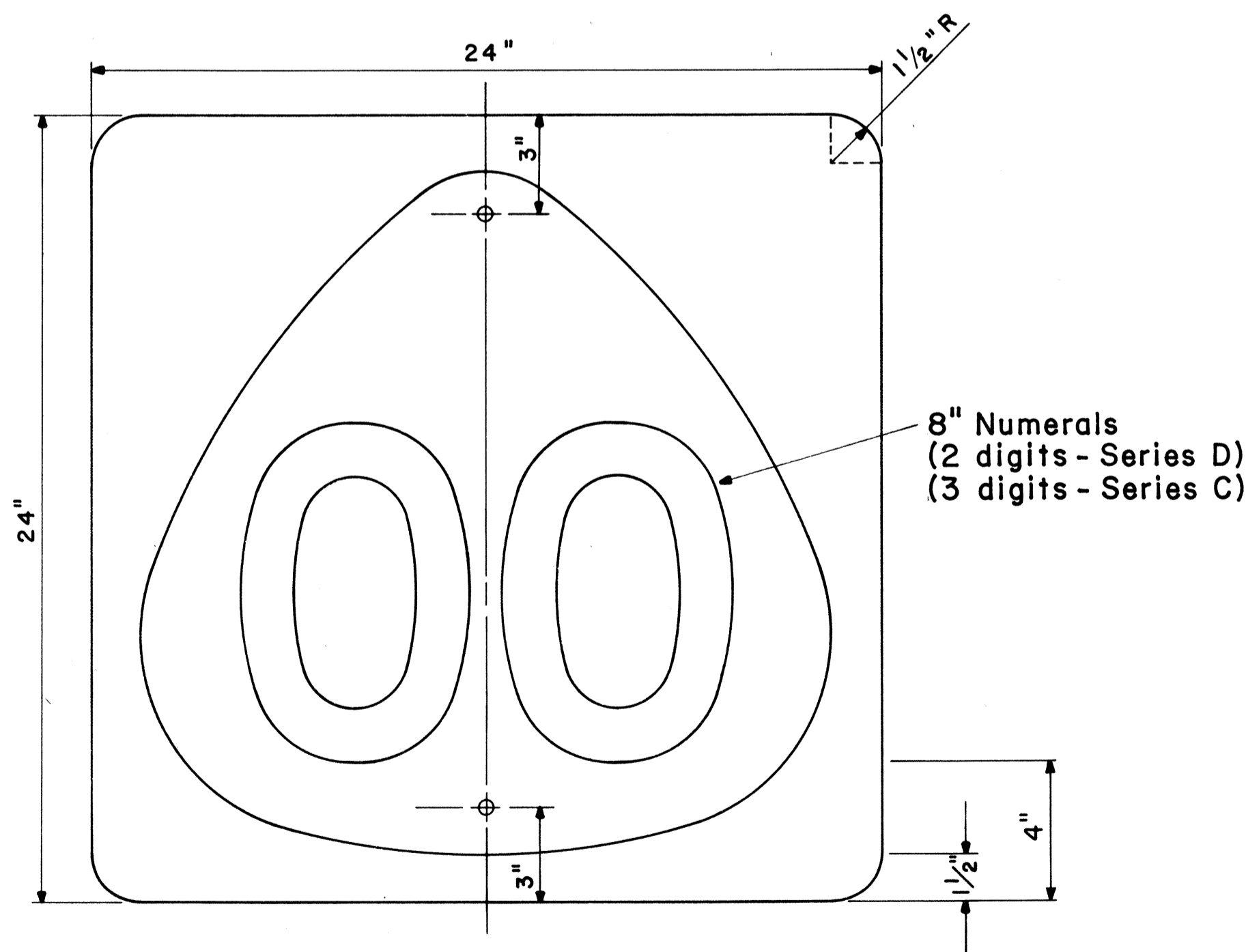
- Marker details shall conform to the FHWA publications "Manual on Uniform Traffic Control Devices for Streets and Highways," 1971, "Standard Alphabets for Highway Signs," 1966, and "Standard Highway Signs," 1972, and as amended.
- All markers shall be reflectorized unless otherwise specified.
- All markers shall have  $\frac{3}{8}$ " bolt holes drilled at appropriate locations.
- Numerals in ( ) indicates numerals to be inserted for marker message. (R) or (L) indicates right or left.
- Sign message of Cardinal Direction Marker (M3 series) shall be denoted by the following:
 

M3-1 : NORTH  
 M3-2 : EAST  
 M3-3 : SOUTH  
 M3-4 : WEST
- Markers prefixed with "IM" on the plans shall have a white legend on a blue background.



STATE ROUTE MARKER DETAIL

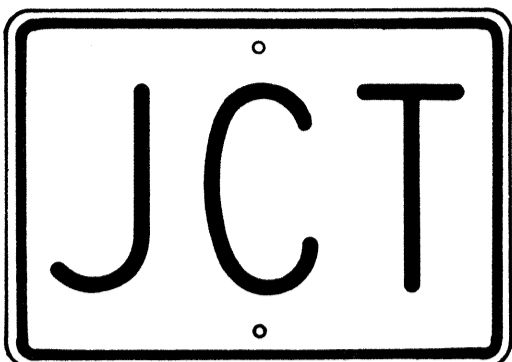
Not to Scale



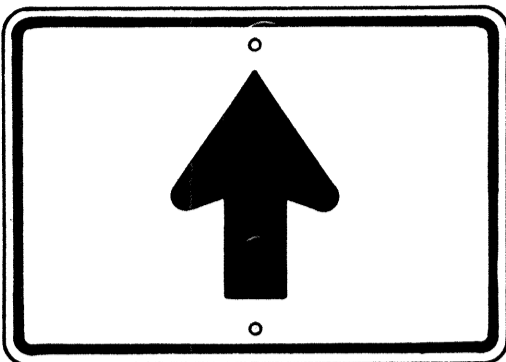
STATE ROUTE MARKER

M1-6 (00) 24"x 24"

Scale:  $\frac{1}{4}$ " = 1"



M2-1 21"x 15"



M6-3 21"x 15"



M3-1 24"x 12"  
M3-1-A 36"x 18"



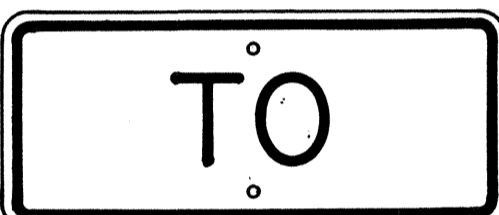
M4-1 24"x 12"



M4-2 24"x 12"



M4-3 24"x 12"



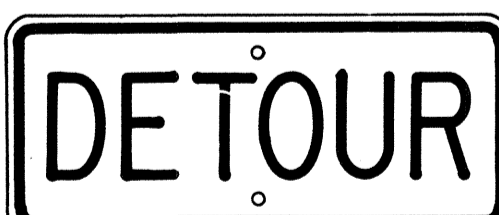
M4-5 24"x 12"



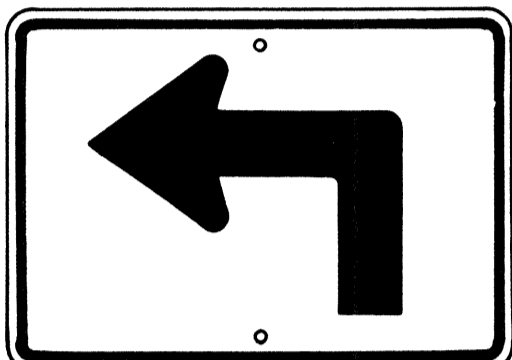
M4-6 24"x 12"



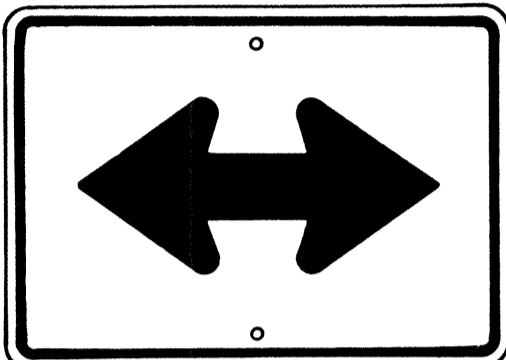
M4-7 24"x 12"



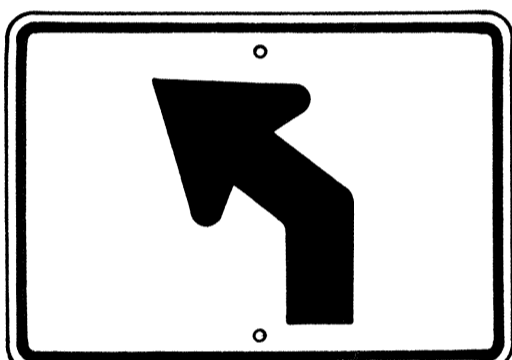
M4-8 24"x 12"



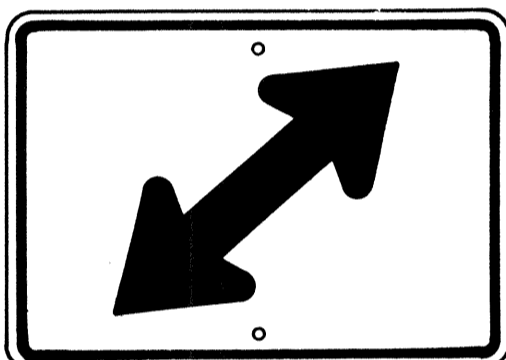
M5-1(L) 21"x 15"



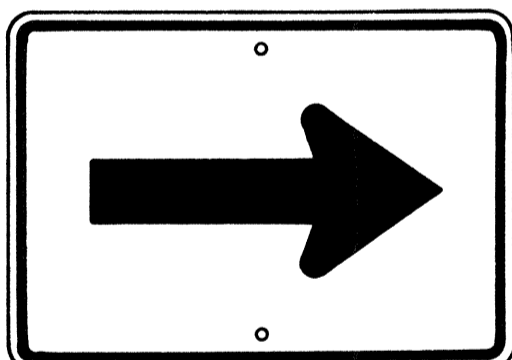
M6-4 21"x 15"



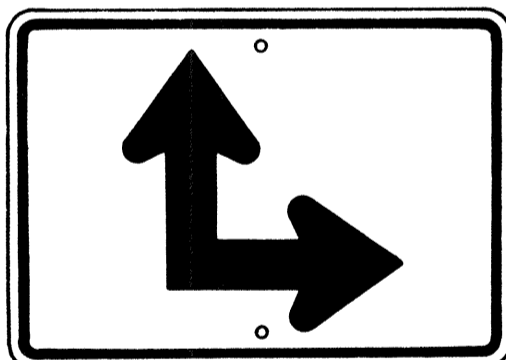
M5-2(L) 21"x 15"



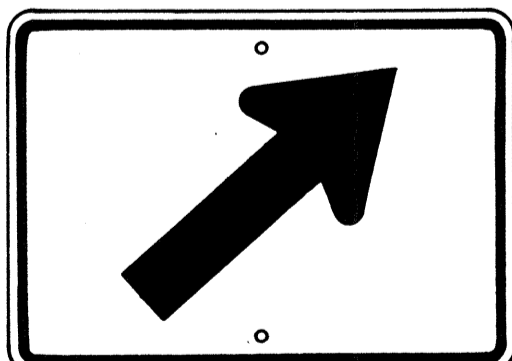
M6-5(R) 21"x 15"



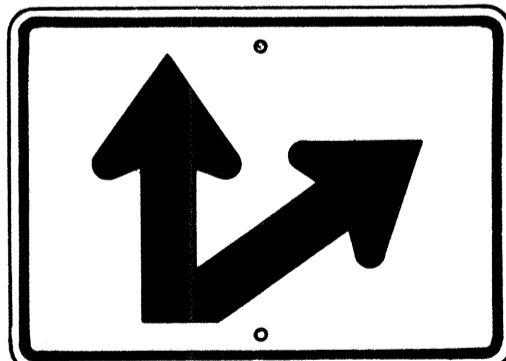
M6-1 21"x 15"



M6-6(R) 21"x 15"



M6-2(R) 21"x 15"



M6-7(R) 21"x 15"

### AUXILIARY MARKERS

Not to Scale

NO.	REVISION	APPROVED BY	DATE
1	Supersedes Sht. DT 105 Approved 12-30-69	H.T.	6/1/72
2	Revised General Note 1	H.T.	10/16/74

APPROVAL RECOMMENDED:  
*Erich Tanaka*  
 TRAFFIC ENGINEER 6/6/72  
 DATE

APPROVED:  
*Shelton S. Salsbery*  
 ASSISTANT CHIEF, ENGINEERING 6-7-72  
 DATE

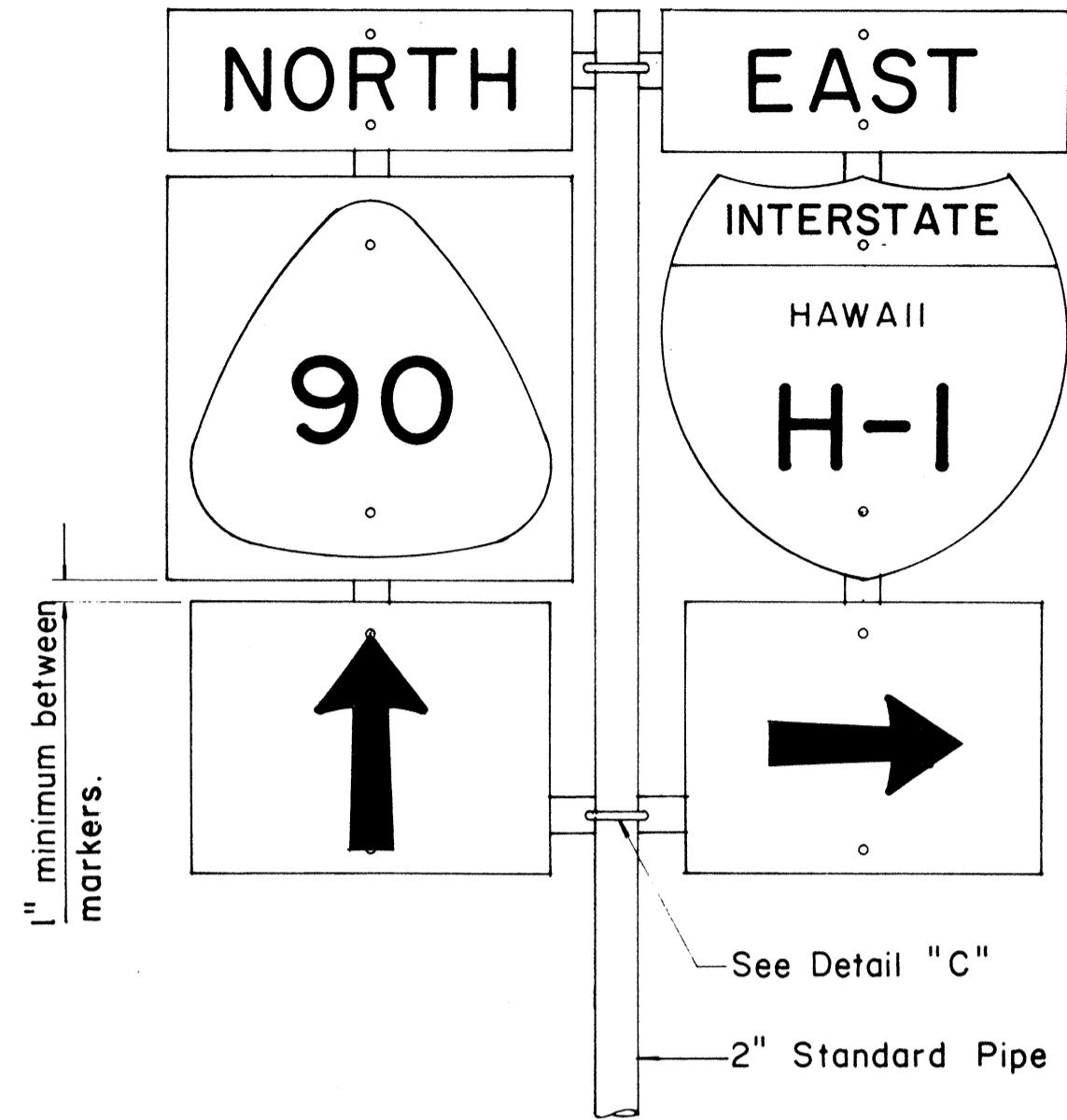
STATE OF HAWAII  
 DEPARTMENT OF TRANSPORTATION  
 LAND TRANSPORTATION FACILITIES DIVISION

STANDARD DETAILS  
 STATE ROUTE MARKER  
 AND AUXILIARY MARKERS

Scale: As Shown  
 SHEET No 6 OF 2 SHEETS DT 105

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

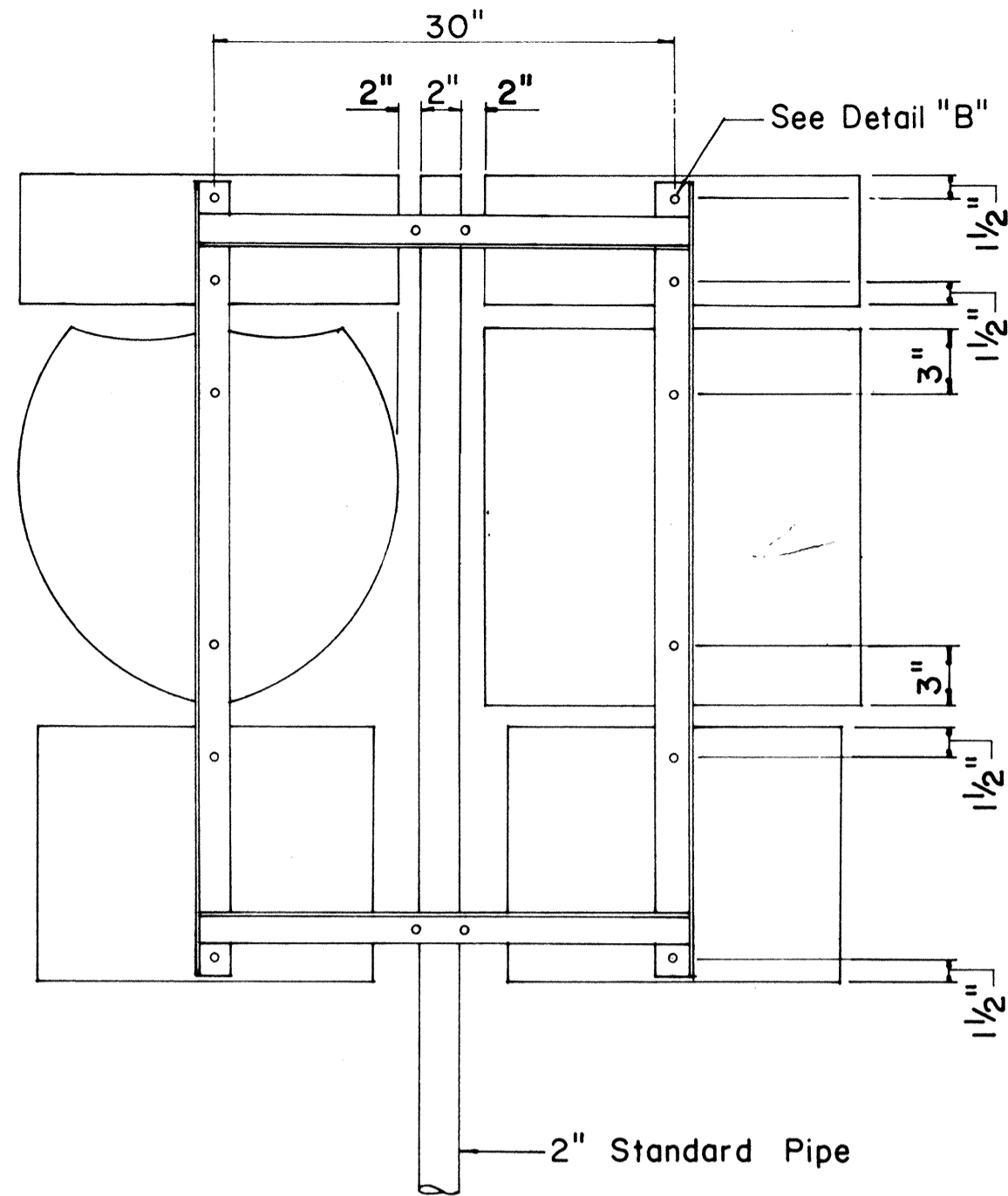
FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450 B-01-60M	1980	16	18



FRONT ELEVATION

**TYPE "B" ASSEMBLY**

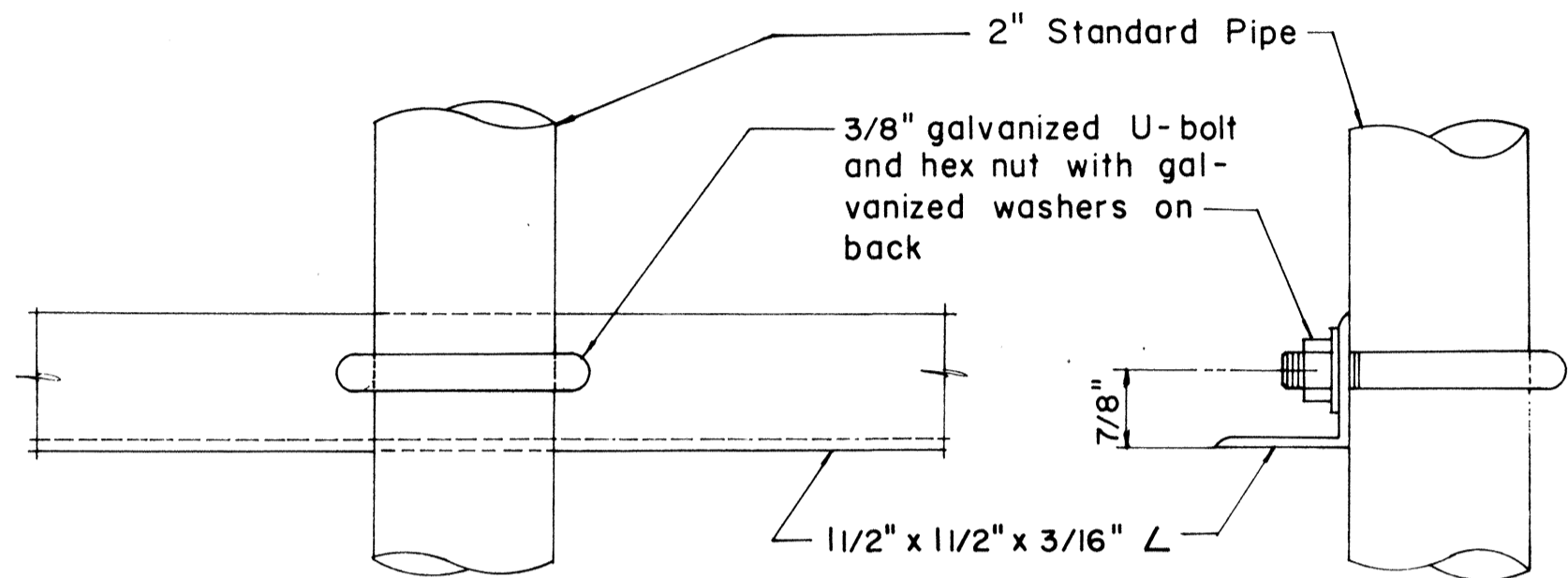
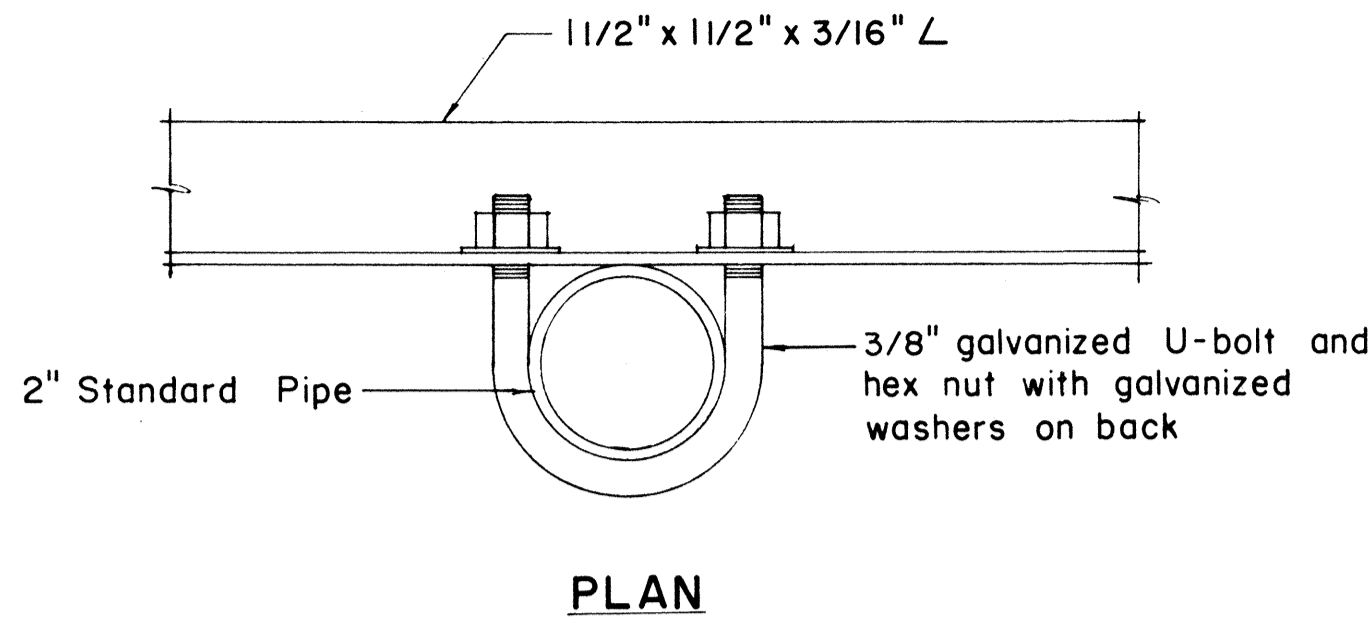
Not to Scale



REAR ELEVATION

NOTE:

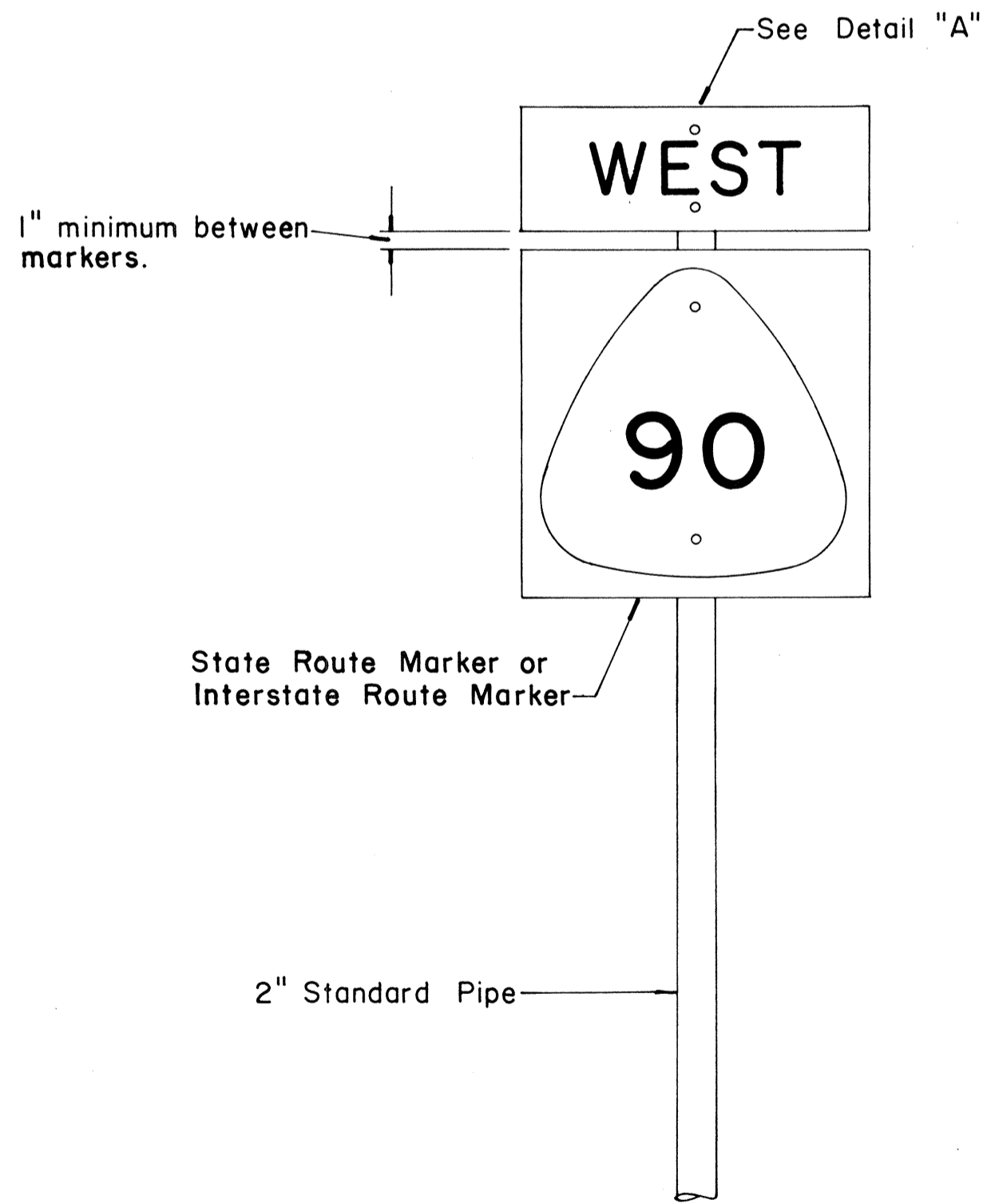
- Minimum clearance between markers shall be one inch. (Larger clearances shall be in multiples of one inch.)
- Pipe post for Type "A" & Type "B" Assembly shall be 2" Standard Pipe.



FRONT ELEVATION

SIDE ELEVATION

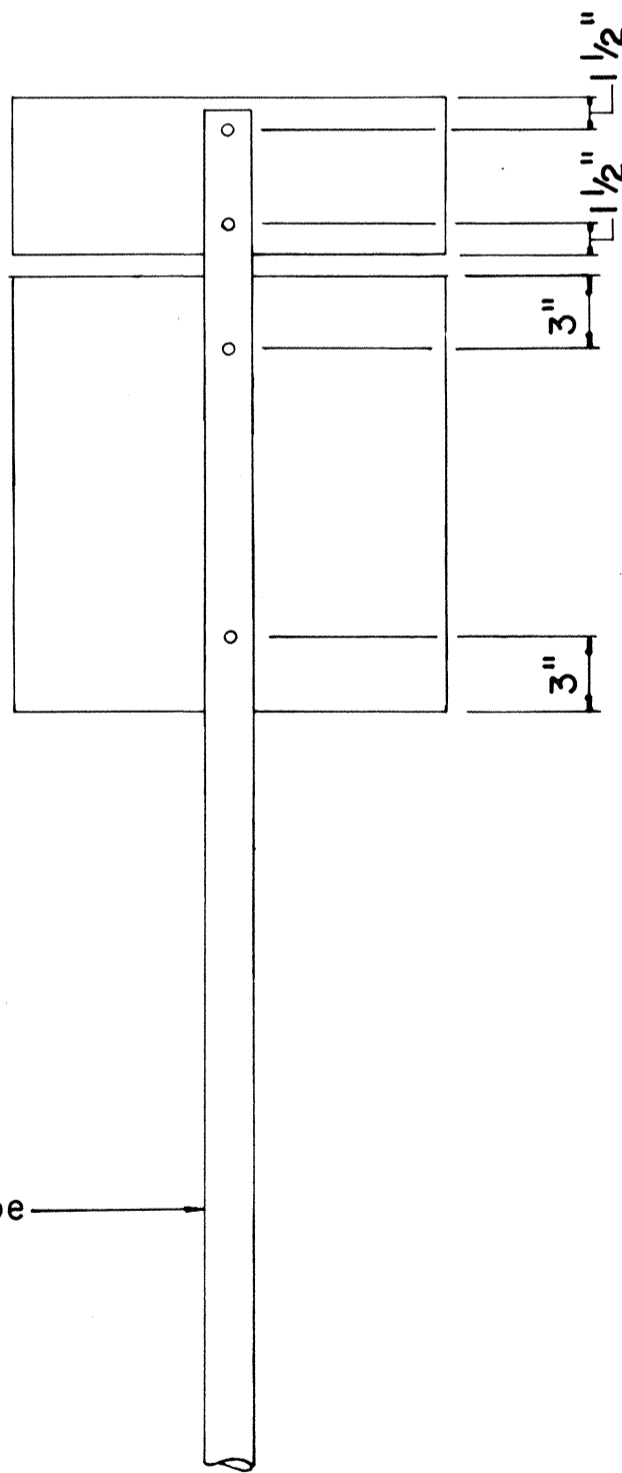
**DETAIL "C"**



FRONT ELEVATION

**TYPE "A" ASSEMBLY**

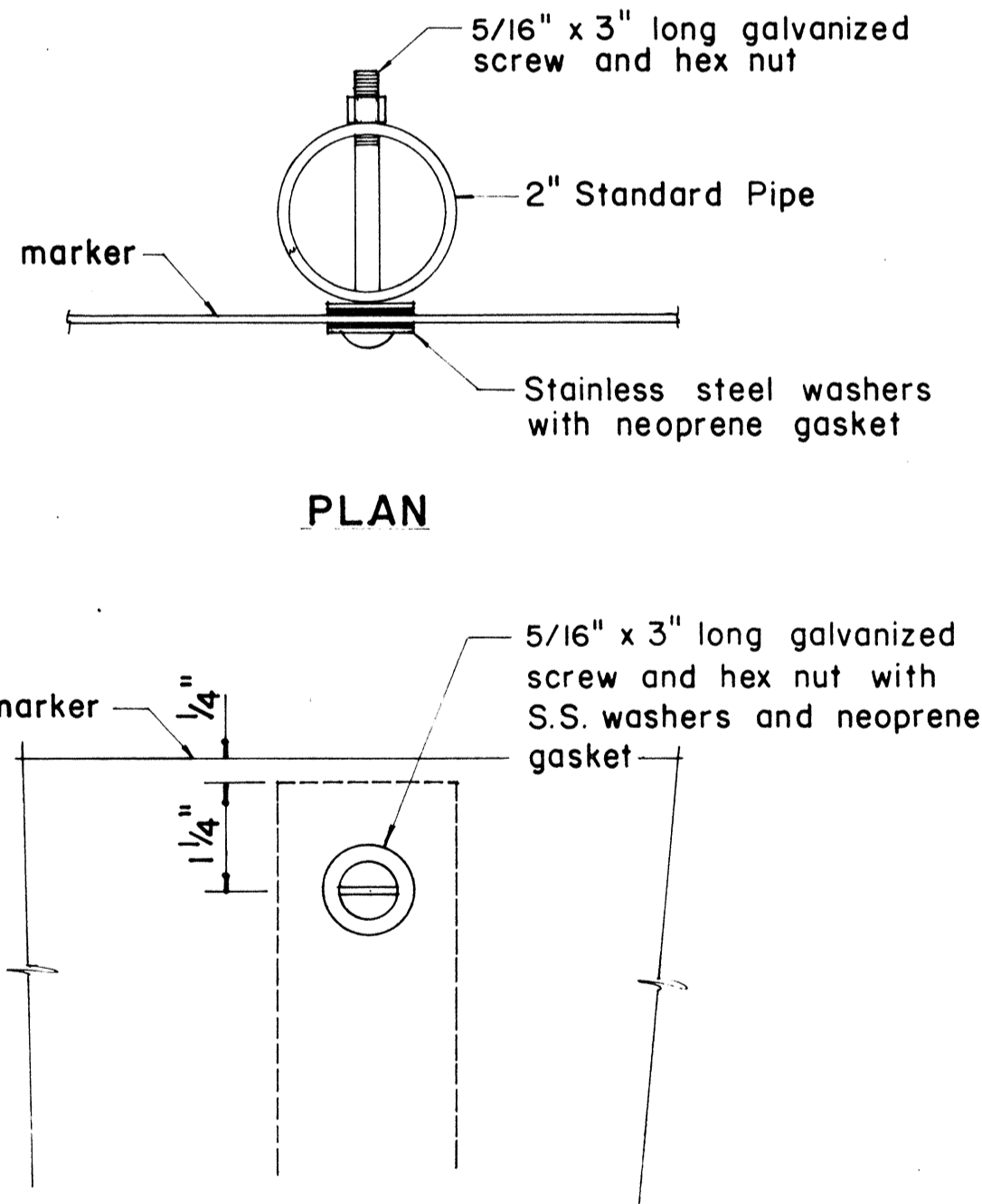
Not to Scale



REAR ELEVATION

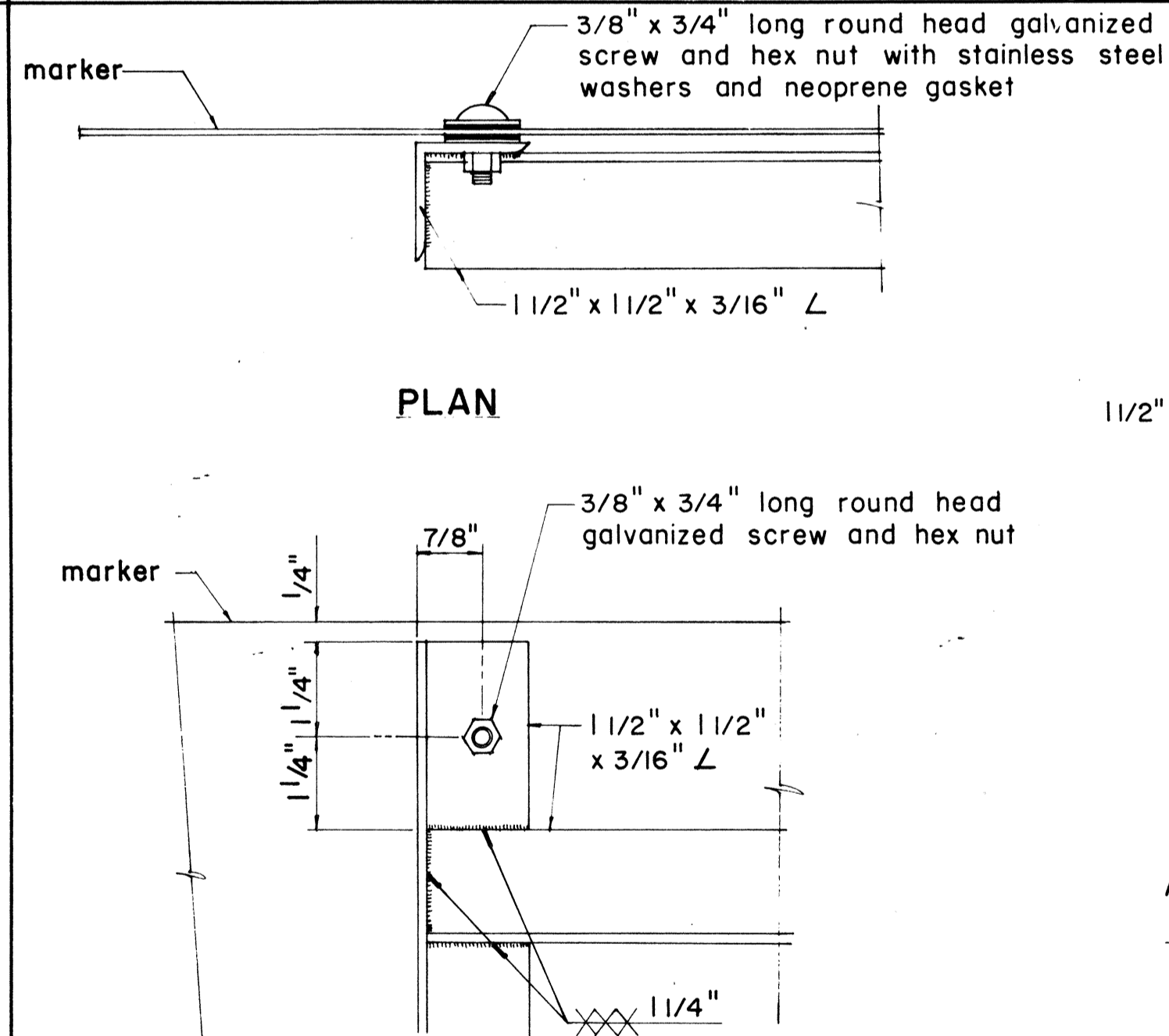
NOTE:

For height and lateral location of Route Marker Assembly, see plan sheet DT 100.



FRONT ELEVATION

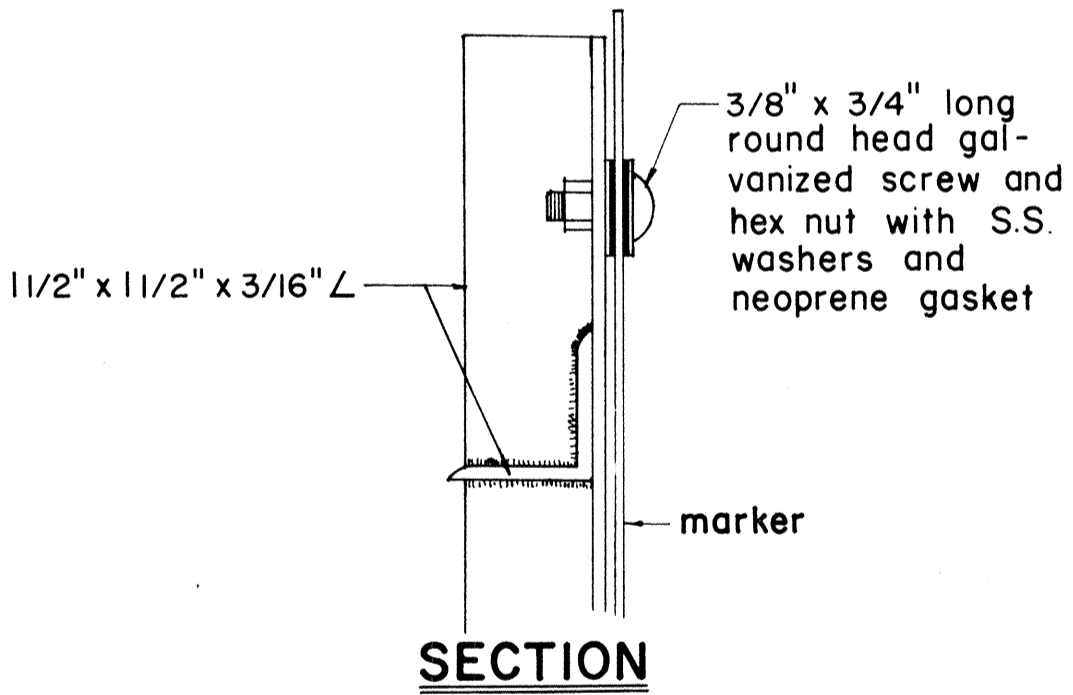
**DETAIL "A"**



**ELEVATION**

**DETAIL "B"**

NO.	REVISION	APPROVED BY	DATE
1	Revisions to Route Marker Assemblies.	H.T.	6/1/72



APPROVAL RECOMMENDED:

*E. Tanaka* 12/29/69  
TRAFFIC ENGINEER DATE

APPROVED:

*W. J. S. S. S.* 12-30-69  
ASSISTANT CHIEF, ENGINEERING DATE

STATE OF HAWAII  
DEPARTMENT OF TRANSPORTATION  
LAND TRANSPORTATION FACILITIES DIVISION

**STANDARD DETAILS**  
**ROUTE MARKER ASSEMBLIES**

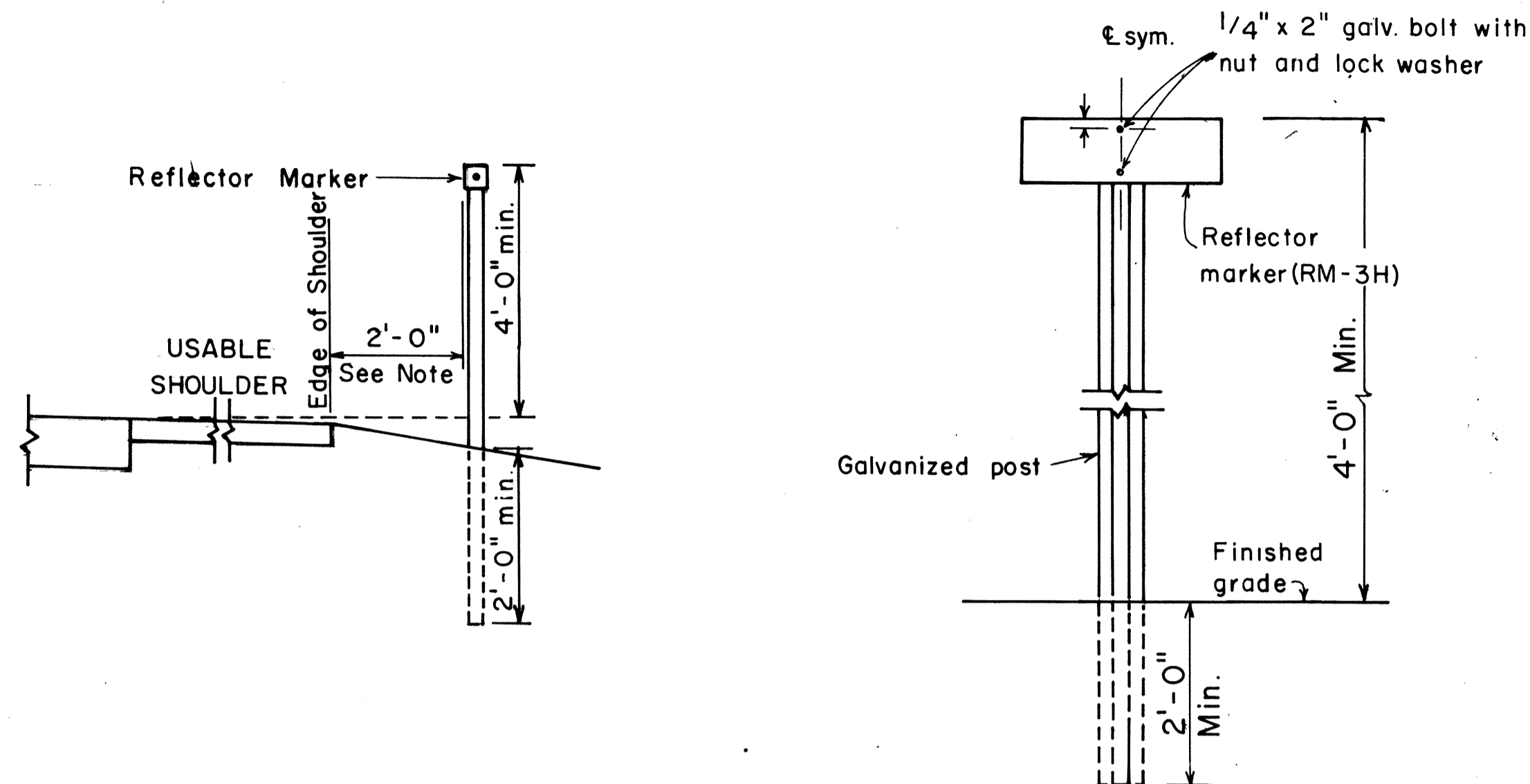
Scale: As Shown

SHEET No. 7 OF 9 SHEETS DT 107

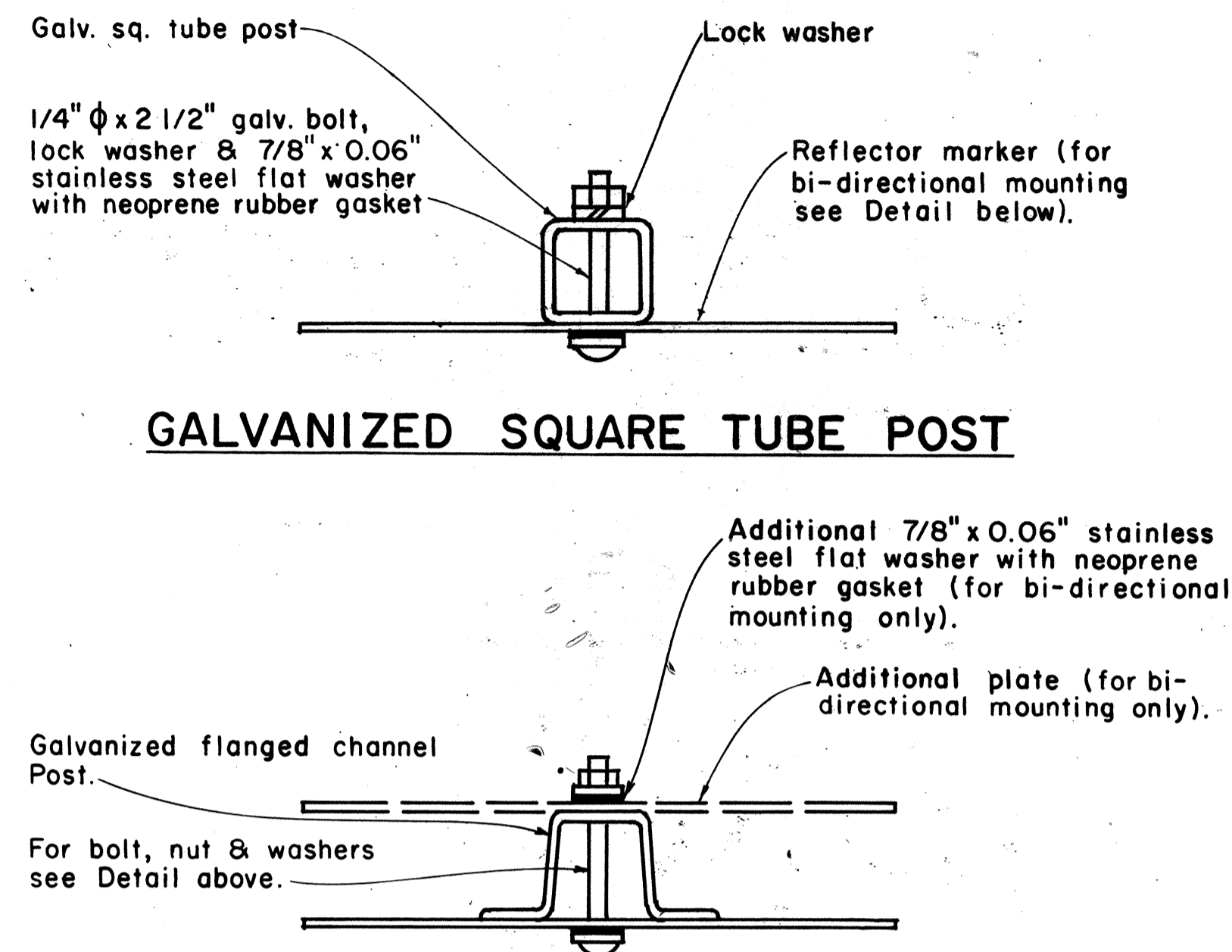
FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450B-01-80M	1980	17	18

### GENERAL NOTES:

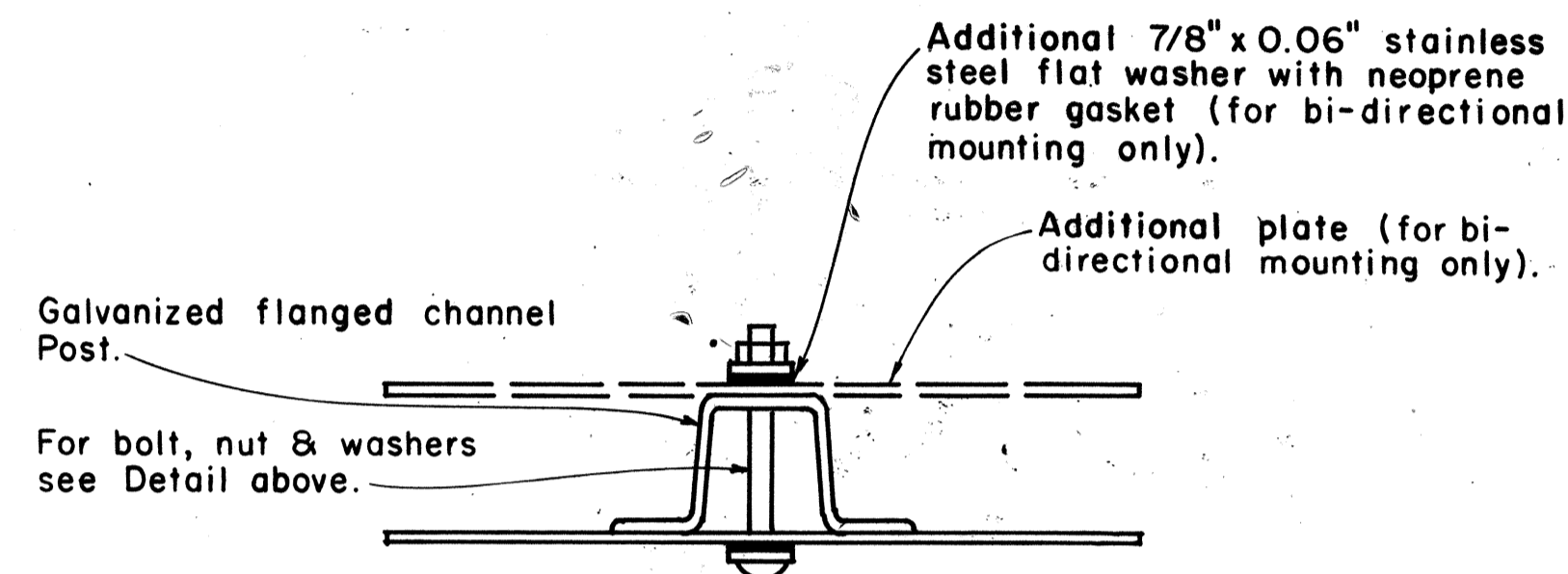
- Clearance markers (RM-3, RM-4) shall be installed with the edge of the marker in line with the inner edge of the obstruction.
- (R) or (L) indicates right or left and shall be as shown on the plans.
- Reflector markers RM-1 and RM-2 shall be:
  - Yellow if placed along the left edge of divided roadways, one-way roadways, and ramps in the direction of travel.
  - White if placed along the right edge of divided roadways, one-way roadways, and ramps in the direction of travel.
- For reflector marker RM-9, reflective sheeting material may be used as an alternate.
- For RM-4, the stripes shall slope downward at an angle of 45° in the direction of traffic.



REFLECTOR MARKER MOUNTING DETAIL

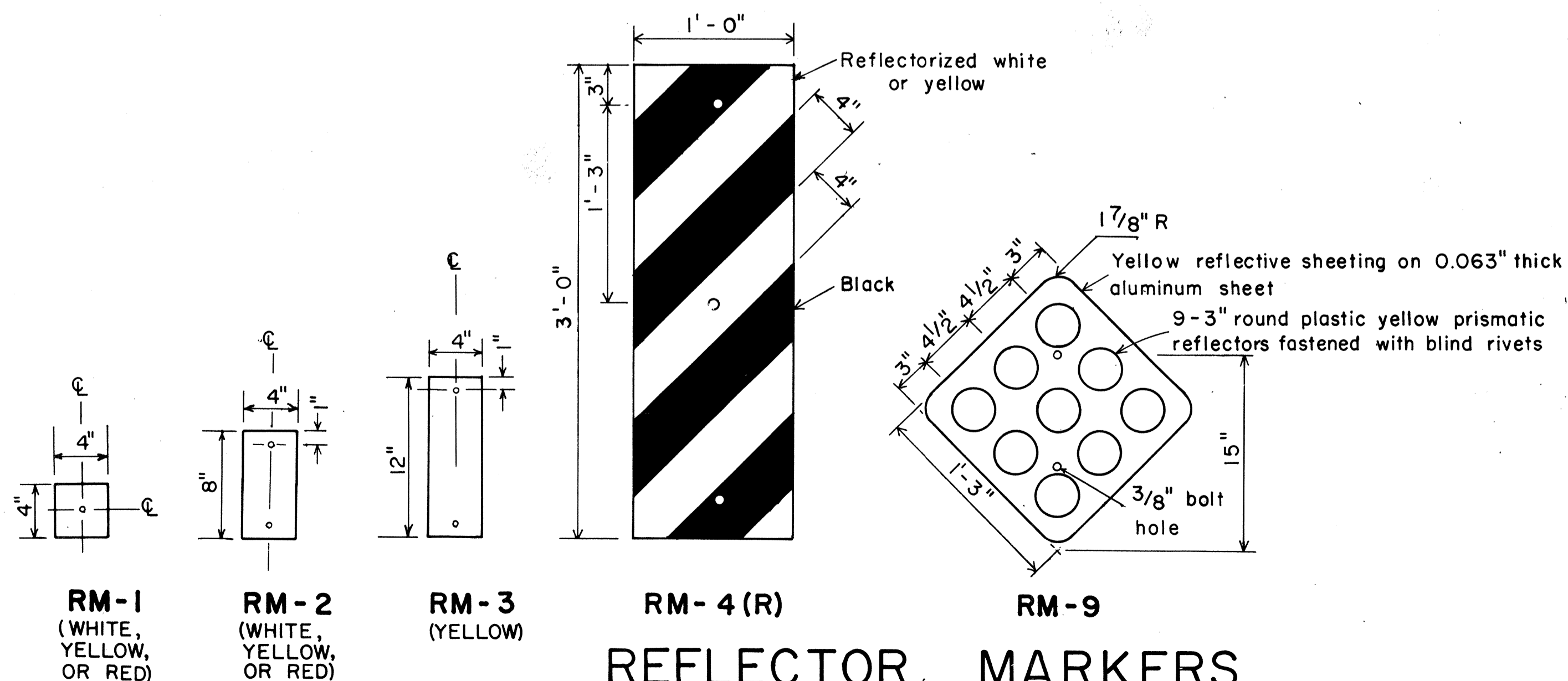


GALVANIZED SQUARE TUBE POST



GALVANIZED FLANGED CHANNEL POST

### TYPICAL MOUNTING DETAILS



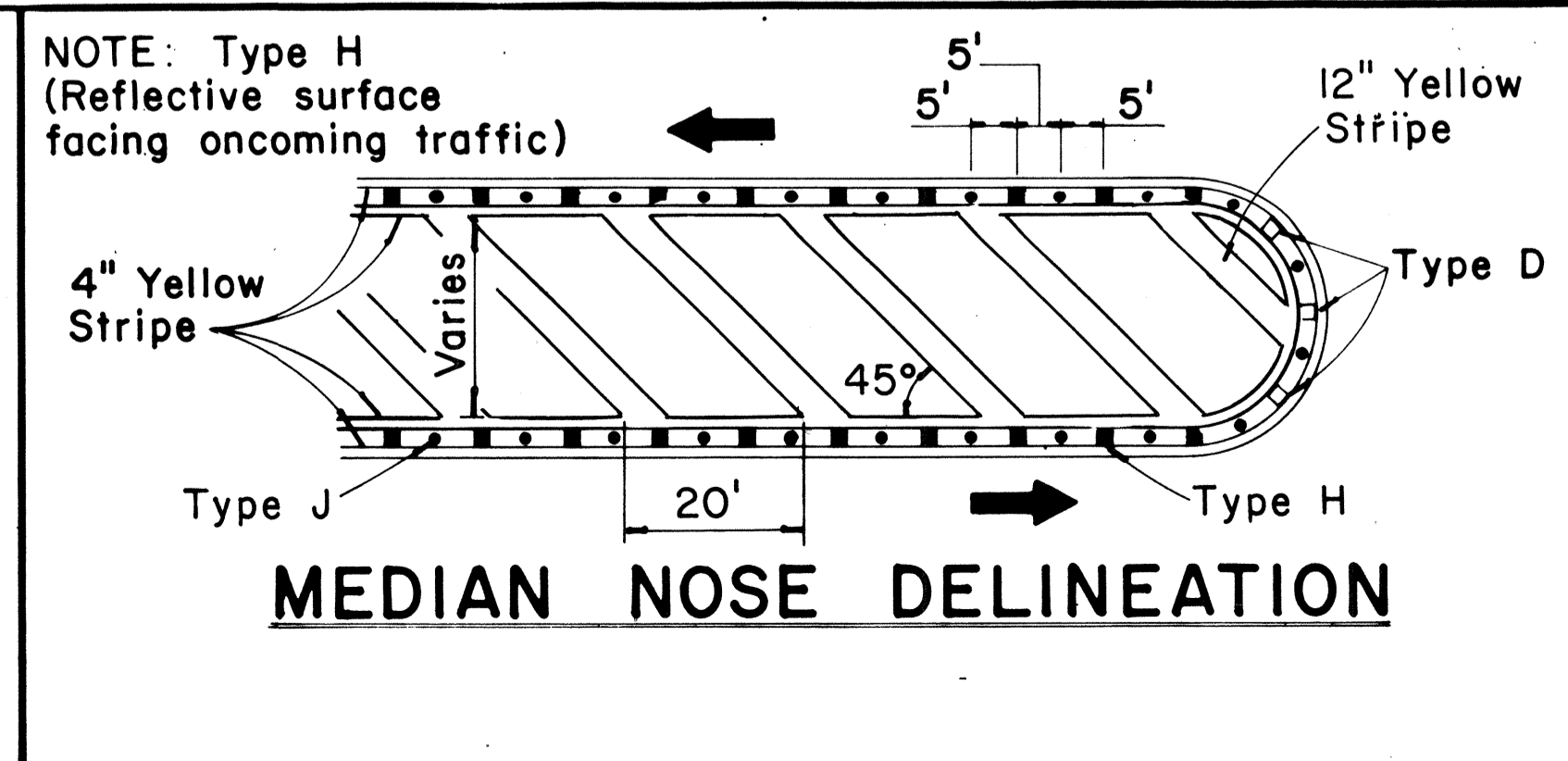
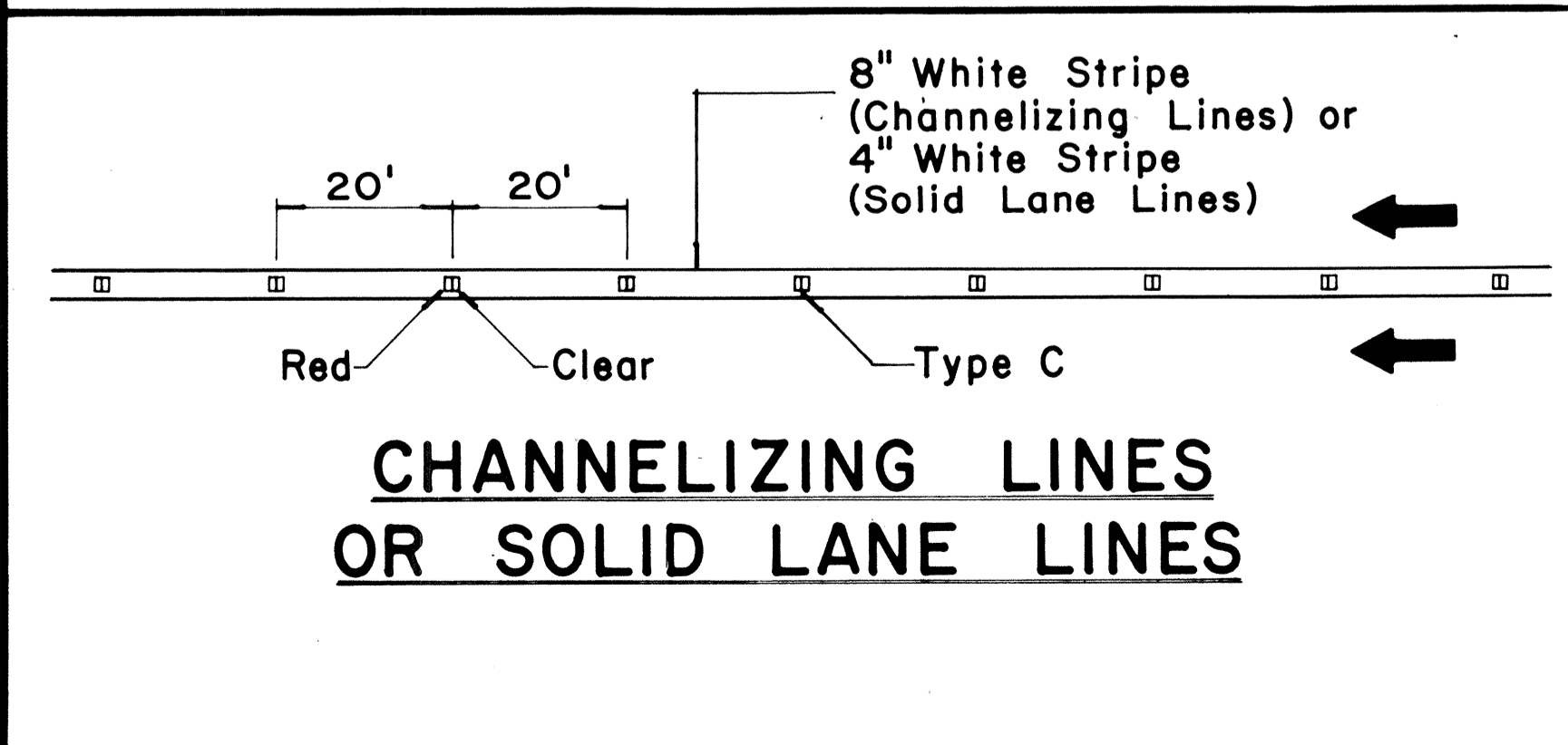
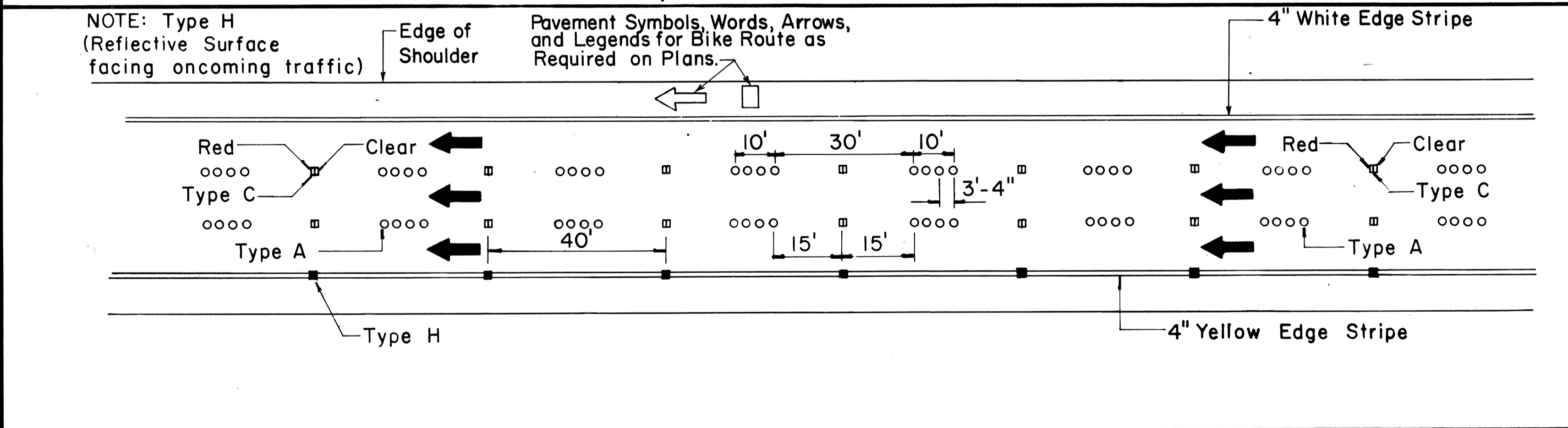
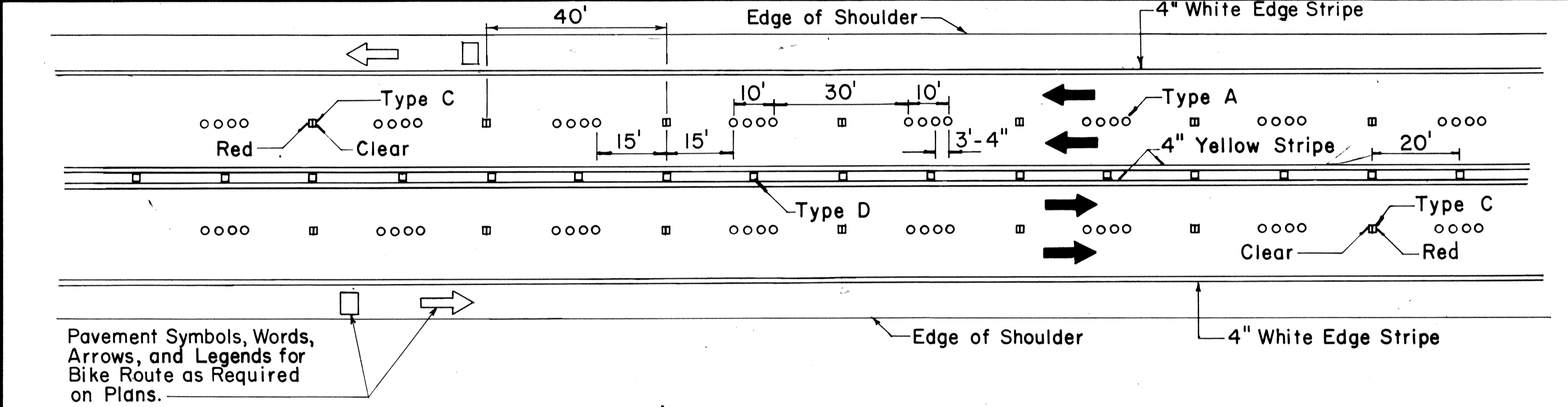
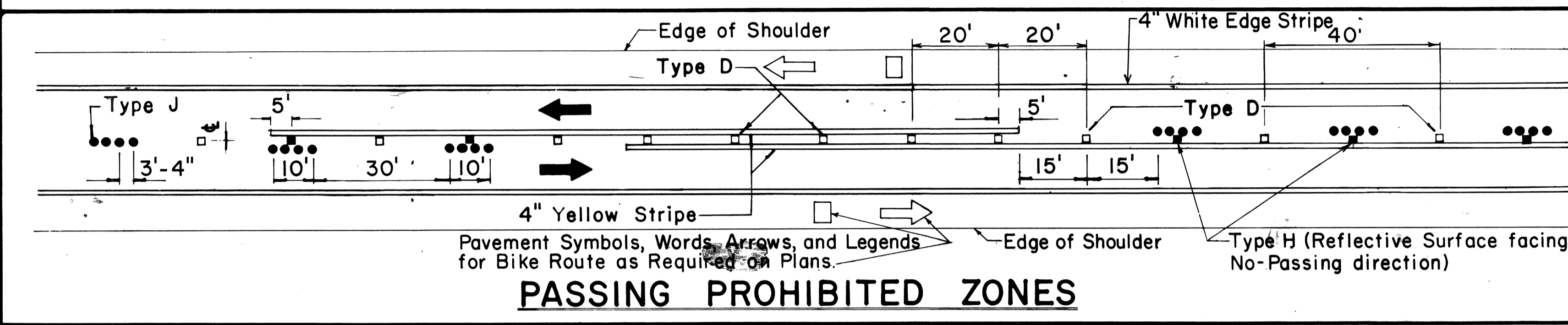
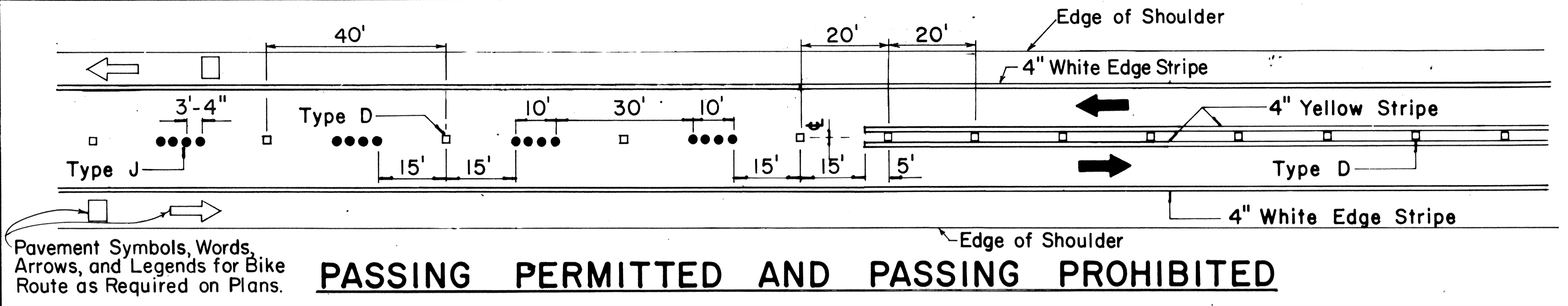
REFLECTOR MARKERS

APPROVAL RECOMMENDED:  
*Eishi Tanaka* 11/1/77  
 TRAFFIC ENGINEER DATE  
 APPROVED:  
*Herbert R. Nakai* 11/15/77  
 ASSISTANT CHIEF, ENGINEERING DATE

NO.	REVISION	APPROVED BY	DATE
1	Revised Mounting Details	H-1	4/23/80

STATE OF HAWAII  
 DEPARTMENT OF TRANSPORTATION  
 HIGHWAYS DIVISION  
**STANDARD DETAILS**  
 MISCELLANEOUS REFLECTOR MARKERS  
 Not to scale June, 1977  
 SHEET NO. 8 OF 9 SHEETS DT 110

FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	450B-01-80M	1980	18	18

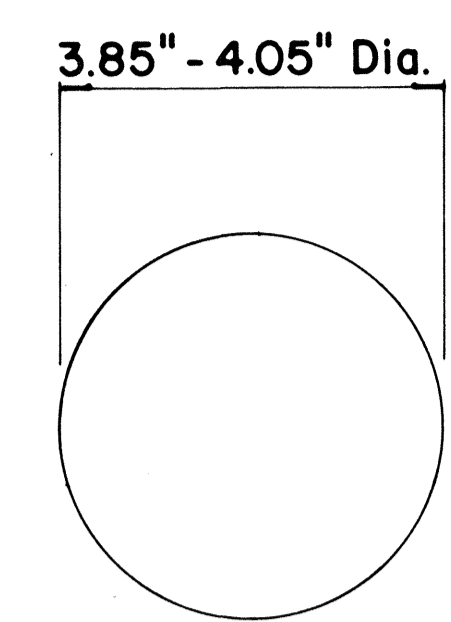


TWO - LANE

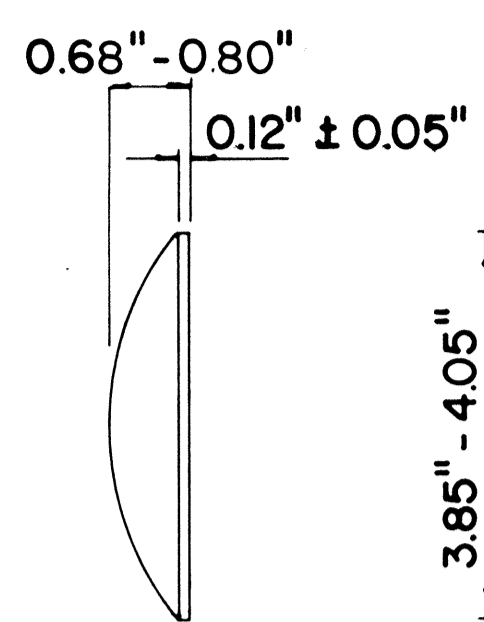
MULTI - LANE

DIVIDED HIGHWAY AND FREEWAY

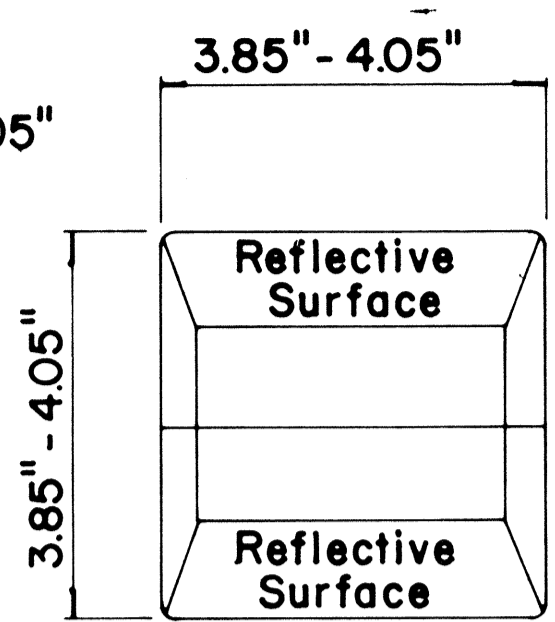
MISCELLANEOUS



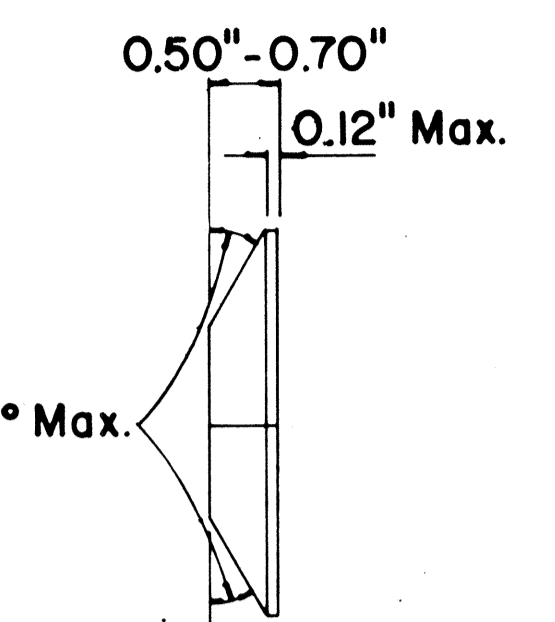
**TYPE A**  
NON-REFLECTIVE WHITE MARKER



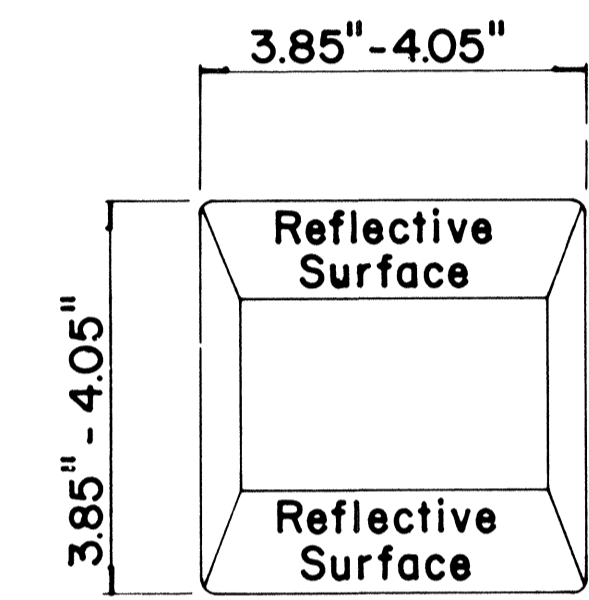
**TYPE J**  
NON-REFLECTIVE YELLOW MARKER



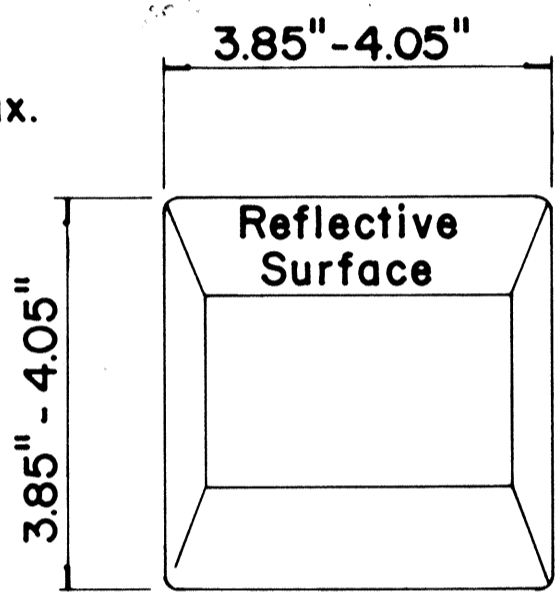
**TYPE C**  
RED-CLEAR REFLECTIVE MARKER



**TYPE H**  
ONE-WAY YELLOW REFLECTIVE MARKER



**TYPE D**  
TWO-WAY YELLOW REFLECTIVE MARKER



**GENERAL NOTES**

- Pavement marking and striping shall conform to the latest "Manual on Uniform Traffic Control Devices for Streets and Highways," and as amended.
- Layout and installation of pavement marking and striping shall be done by the Contractor. The Contractor shall check the layouts with the Engineer prior to performing work.

**LEGEND**

- Type A
- Type C
- Type D
- Type H
- Type J

No.	REVISION	APPROVED BY	DATE
1	Supersedes DT 300 approved 11/18/71.	H.T.	1/24/78
2	Delete Type A Markers from Bike Route Delineation.	H.T.	10/15/79

APPROVAL RECOMMENDED:  
*Erich Tanaka*  
 TRAFFIC ENGINEER 7/21/78 DATE

APPROVED:  
*Harbert D. Zakeish*  
 ASSISTANT CHIEF, ENGINEERING 1/24/78 DATE

STATE OF HAWAII  
 DEPARTMENT OF TRANSPORTATION  
 HIGHWAYS DIVISION

**STANDARD DETAILS**  
**RAISED PAVEMENT MARKERS**  
**AND STRIPING**

Not to Scale July 1978  
 SHEET No. 9 OF 9 SHEETS DT 300

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