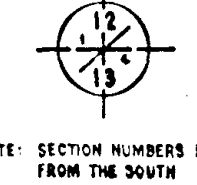
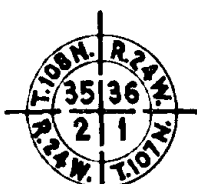


CONVENTIONAL SIGNS

STATE LINE	---
COUNTY LINE	---
TOWNSHIP OR RANGE LINE	---
SECTION LINE	---
QUARTER LINE	---
SIXTEENTH LINE	---
RIGHT-OF-WAY LINE	---
PRESENT ROAD P.W. LINE	---
LIMITED ACCESS	---
PROPERTY LINE (Estate Low Line)	---
VACATED PLATTED PROPERTY	---
CORPORATE OR CITY LIMITS	---
TOWN HIGHWAY CENTER LINE	---
RETAINING WALL	---
STEAM RAILROAD	---
ELECTRIC RAILROAD	---
RAILROAD RIGHT-OF-WAY LINE	---
CAREER	---
RAPIDS OR WATERFALL	---
DRY RUN	---
DRAINAGE DITCH	---
WATER TROUGH LINE	---
POWER POLE LINE	---
TELEPHONE OR TELEGRAPH LINE	---
TELEPHONE CONDUIT	---
GUARD RAIL	---
WIRE FENCE	---
RAILROAD SHOW FENCE	---
BOARD OR HIGHWAY SHOW FENCE	---
STONE WALL OR FENCE	---
GRASS MAW	---
WATER PIPE	---
SEWER PIPE	---
DRAIN TILE	---
GRAVEL PIT	---
SAND PIT	---
CLAY PIT	---
ROCK QUARRY	---
SPRINGS	---
MARSH	---
TIMBER	---
BURN	---
ORCHARD	---
ROCK LEDGE	---
SAND	---
EDGE OF CUT	---
TIE OF EMBANKMENT	---
CATCH BASIN	---
MANHOLE	---
DROP INLET	---
FIRE HYDRANT	---
AIR LAMP	---
OTHER LAMPS (S.M. & M.)	---
RAILROAD CROSSING SIGN	---
RAILROAD CROSSING SIGN	---
ELECTRIC MARKING SIGN	---
CROSSING GATE	---
CATTLE GUARD	---
OVERHEAD (Highway Over)	---
UNDERPASS (Highway Under)	---
ABUTMENT, WALL & PIER	---
BRIDGE	---
CONCRETE	---
BUILDING (One Story Frame)	---
CONCRETE S-STONE T-PILE B-BRICK ST-STEEL	---
HESE	---
IRON PIPE	---
STONE MONUMENT	---
WOOD STAKE OR HIGH	---
MEANDER CORNER	---



NOTE: SECTION NUMBERS READ FROM THE SOUTH



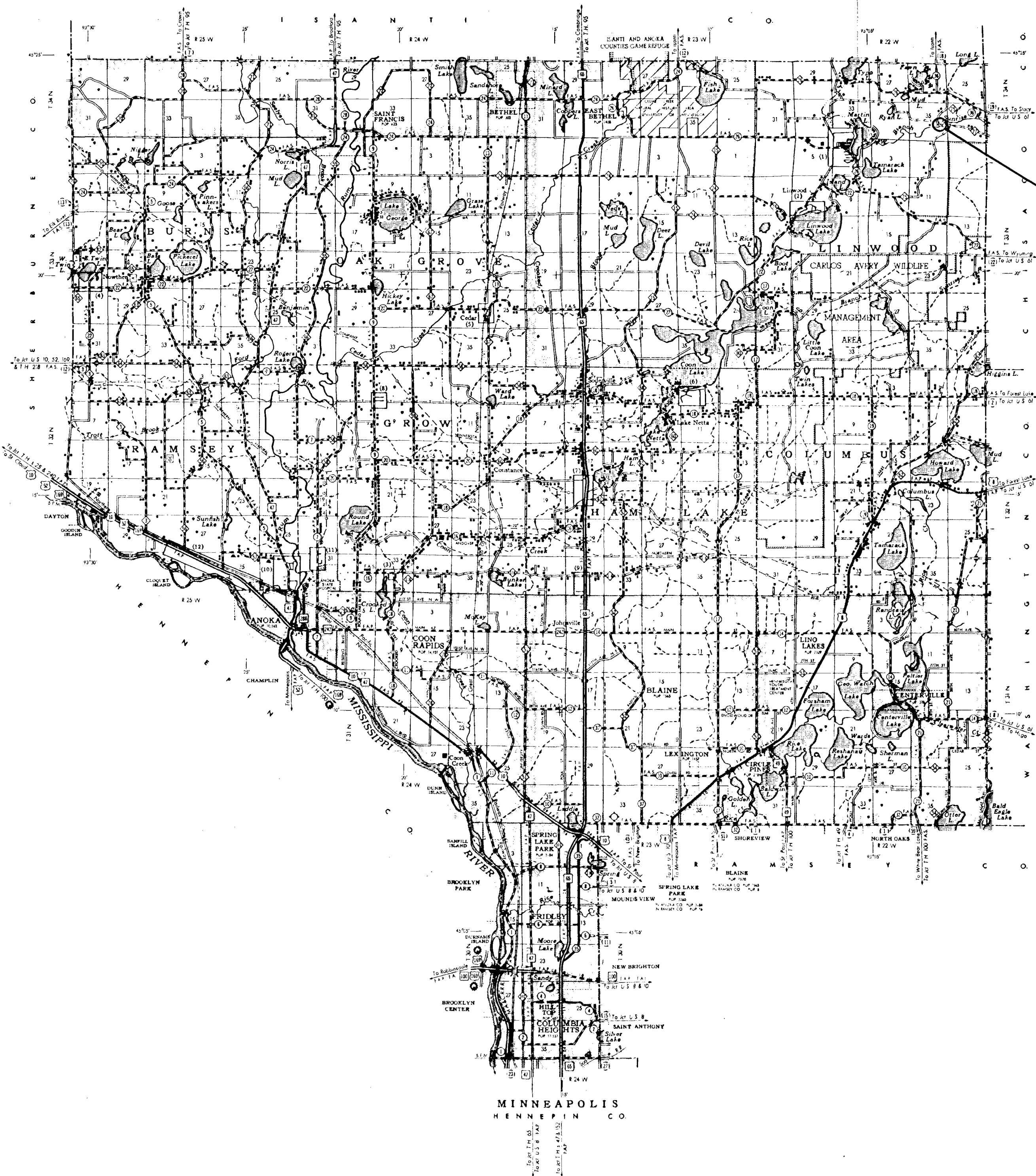
STATE OF MINNESOTA
 DEPARTMENT OF HIGHWAYS
 C.P. 64-14-75
 CONSTRUCTION PLAN FOR BRIDGE NO. 02505

County _____ Highway No. 75

ACROSS SUNRISE RIVER
 IN SECT. 35-T-34N, R 22 W

GROSS LENGTH.....2.6 FEET.....
 BRIDGES LENGTH.....2.6 FEET.....
 EXCEPTIONS LENGTH..... FEET.....
 NET LENGTH.....2.6 FEET.....

C.P. 64-14-75
 BRIDGE NO. 02516



INDEX OF SHEETS

Sheet No. 1.	Title Sheet & Layout Map
" No. 2.	PLAN DETAIL
" No. 3.	PLAN DETAIL

ALL APPLICABLE FEDERAL, STATE AND LOCAL LAWS AND ORDINANCES WILL BE COMPLIED WITH, IN THE CONSTRUCTION OF THIS PROJECT.

I HEREBY CERTIFY THAT THIS PLAN WAS PREPARED BY ME OR UNDER MY DIRECT SUPERVISION AND THAT I AM A DULY REGISTERED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MINNESOTA.

Erling J. Lundheim COUNTY ENGINEER DATE JUNE 12, 1964

ANOKA COUNTY REG. NO. 2551

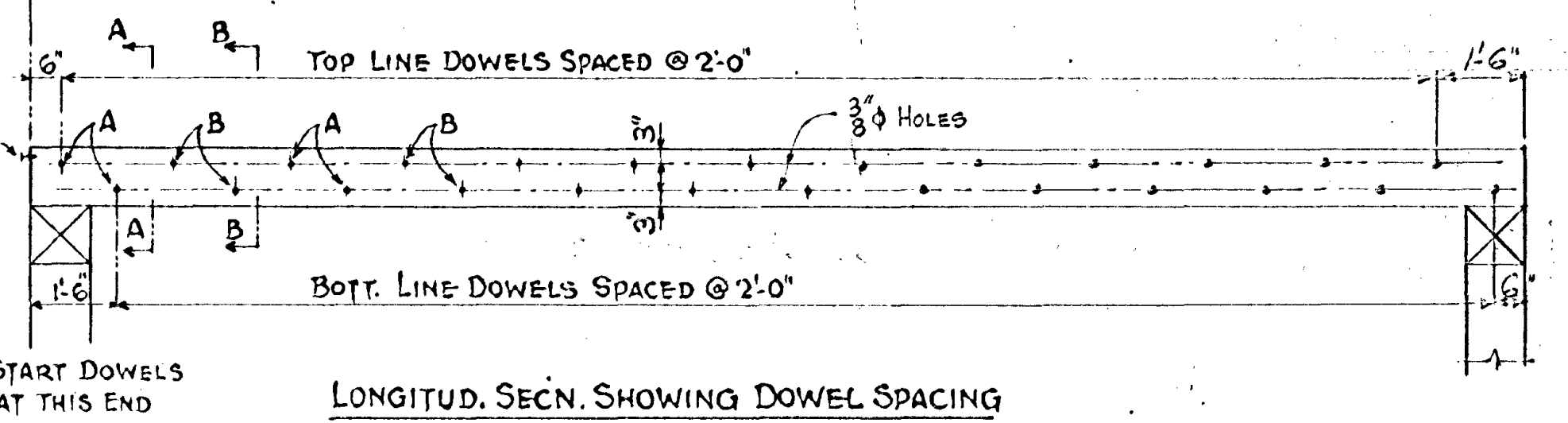
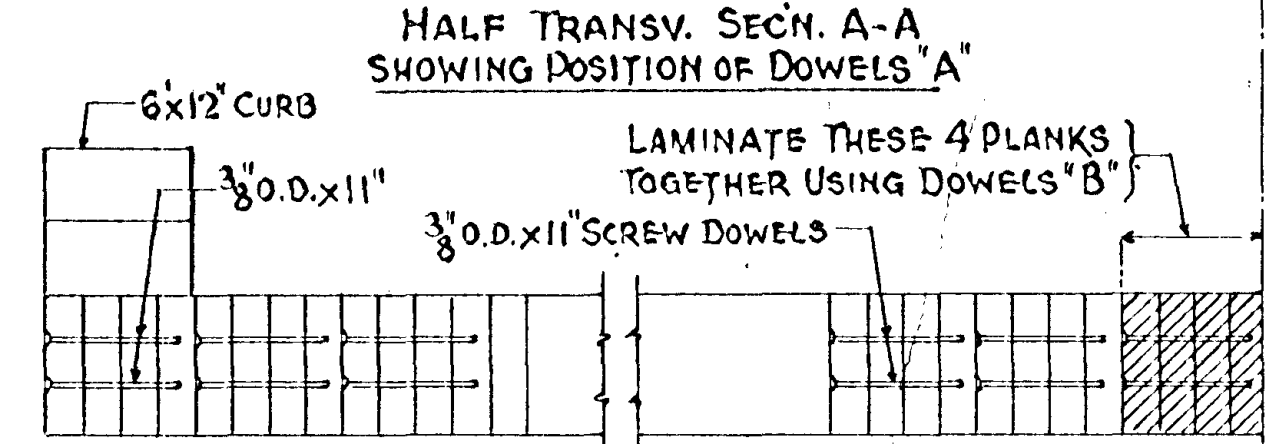
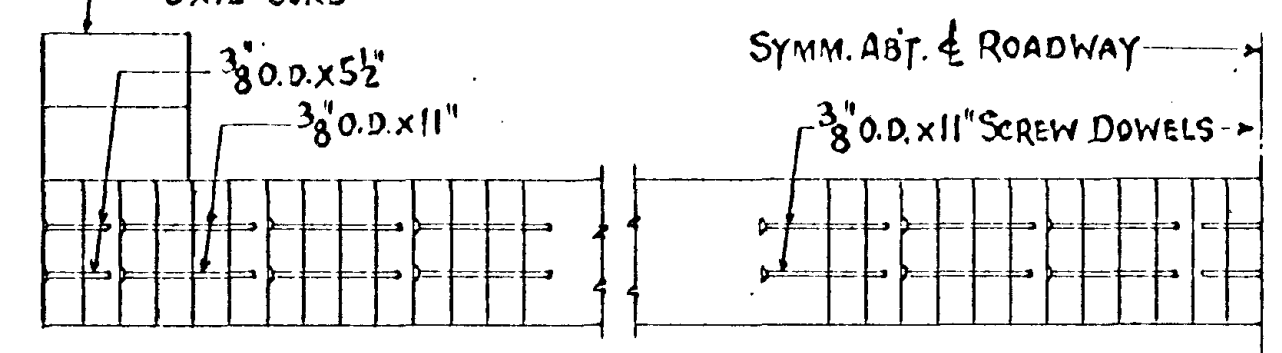
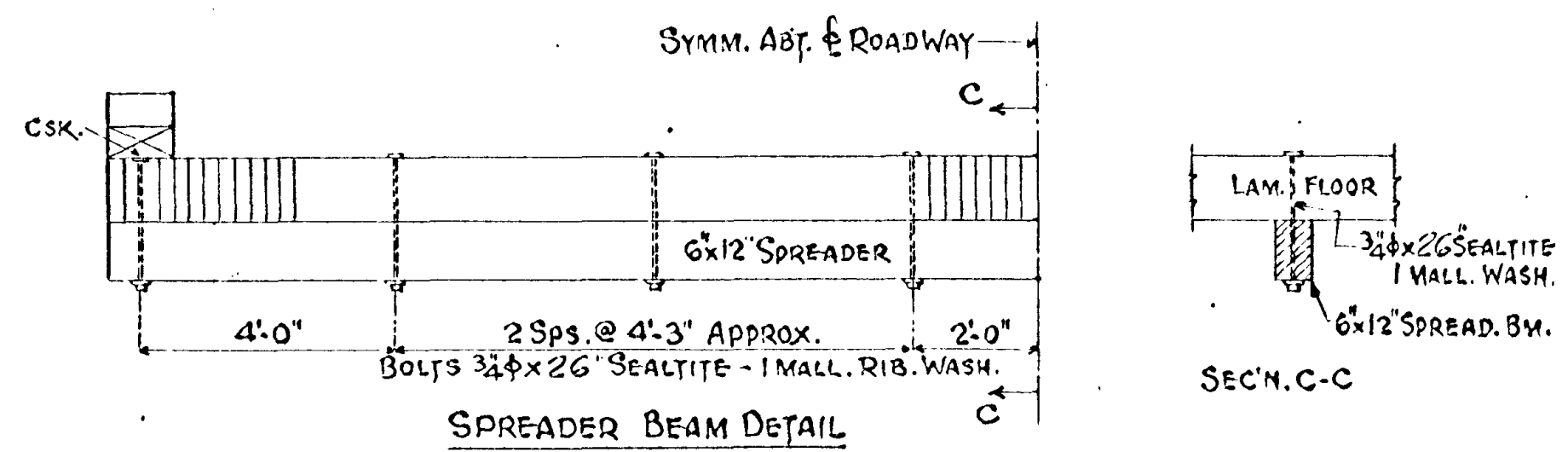
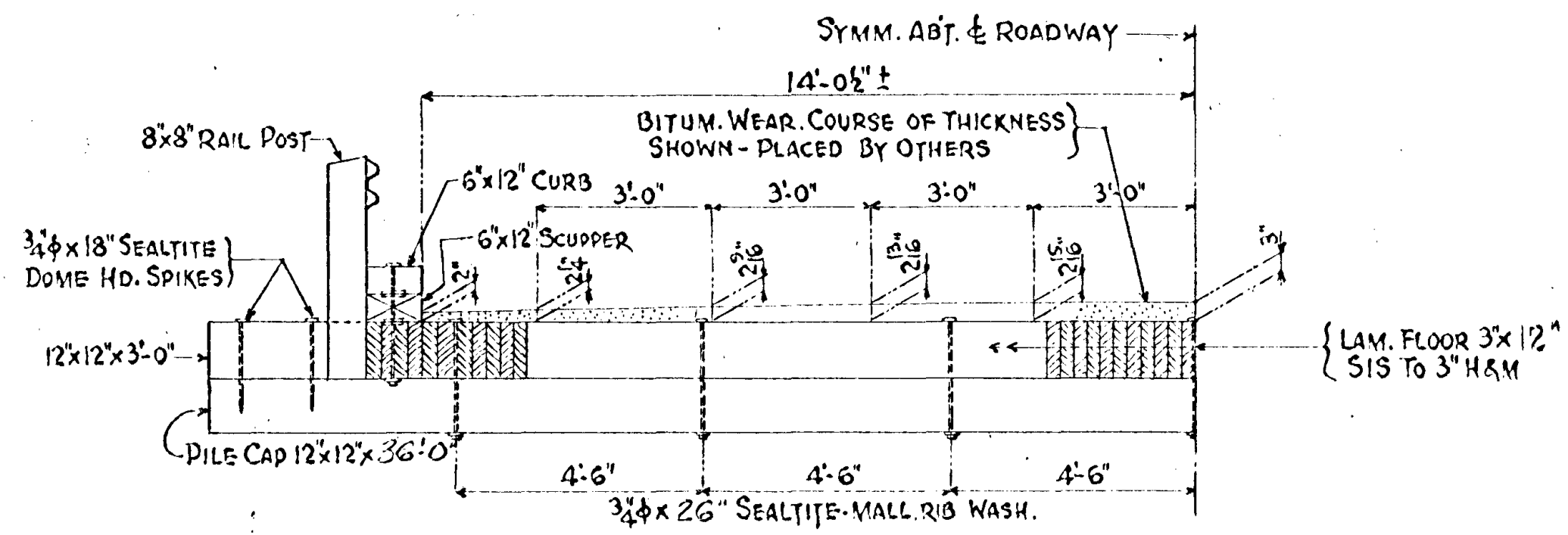
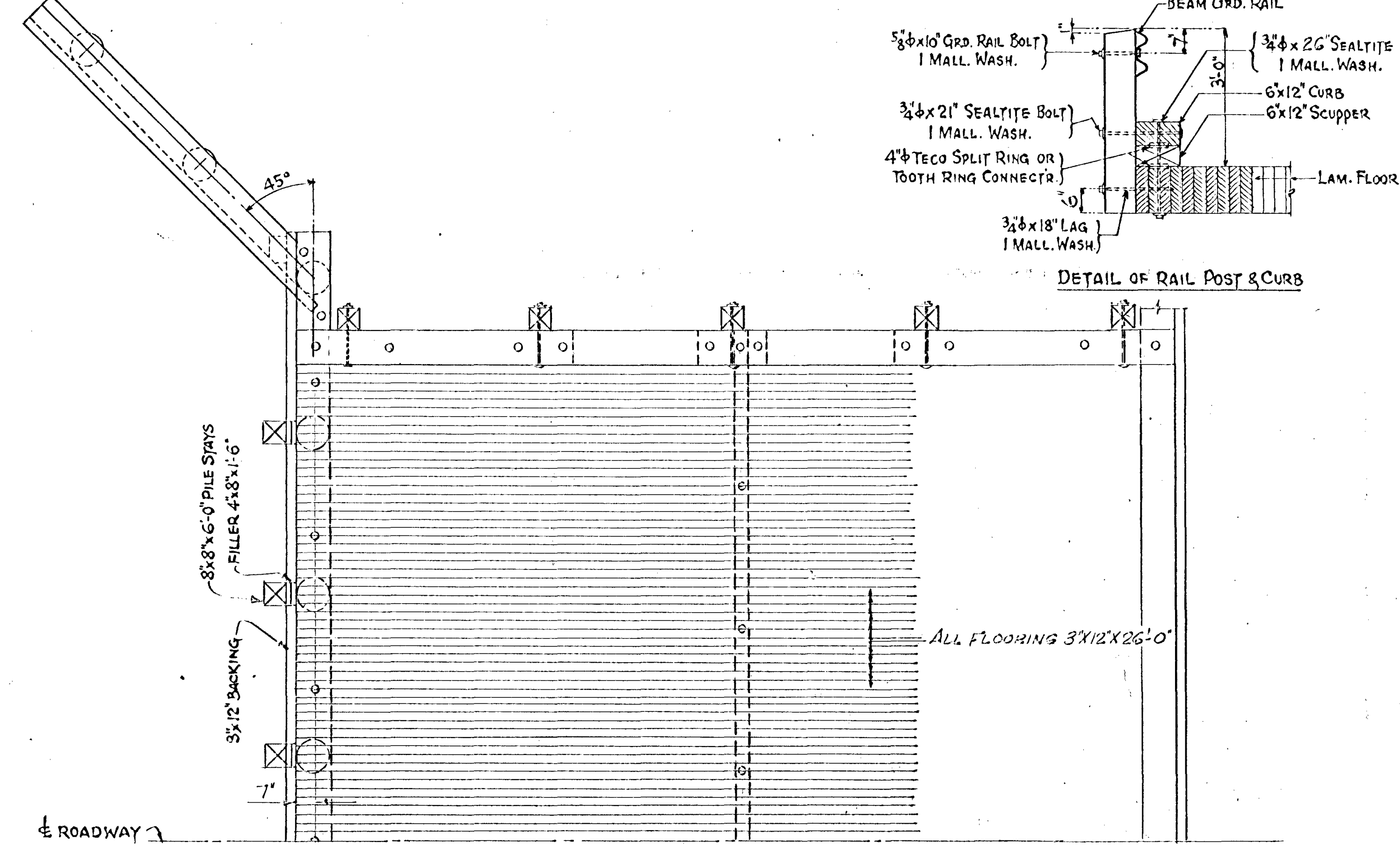
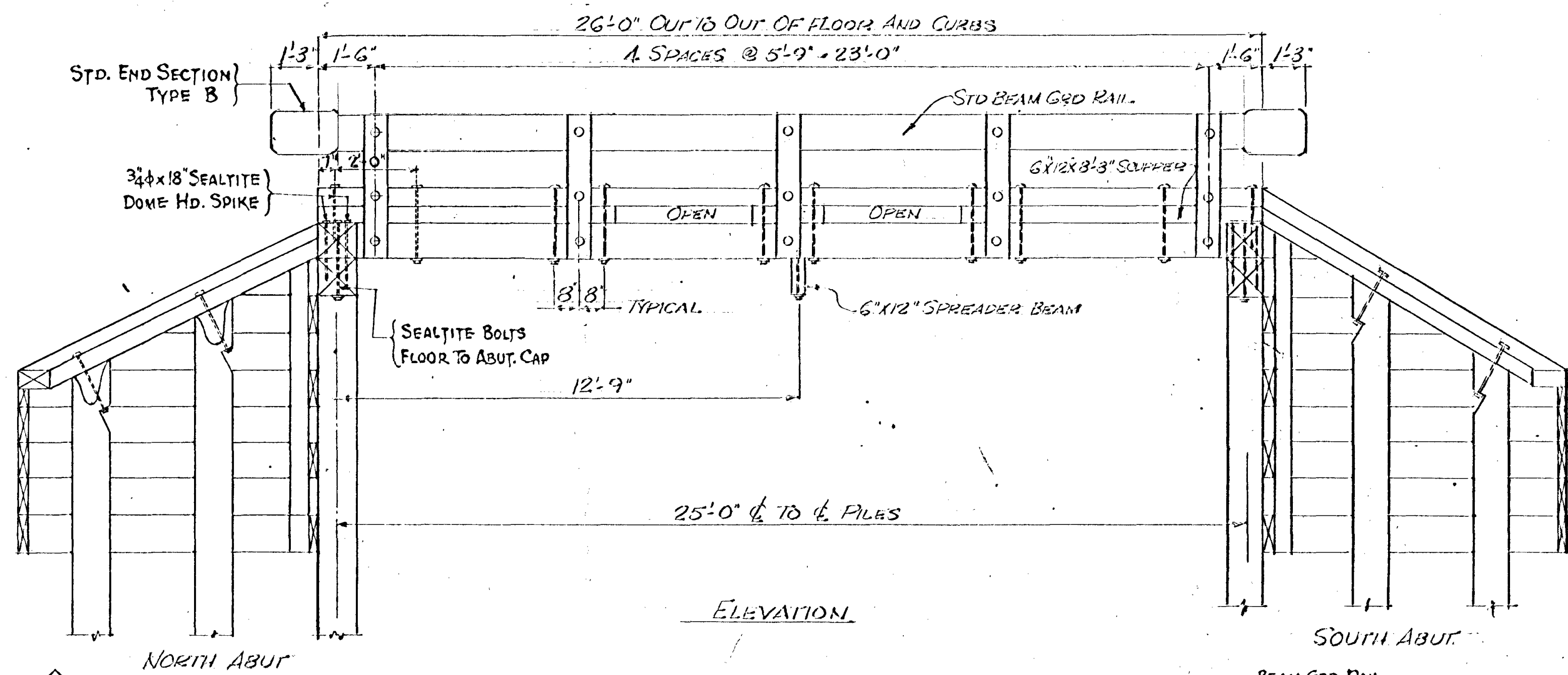
RECOMMENDED FOR APPROVAL _____ 19____ DISTRICT ENGINEER

RECOMMENDED FOR APPROVAL _____ 19____

APPROVED _____ 19____ STATE AID ENGINEER

SPECIFICATIONS
 THE "STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION", DATED JAN. 1, 1964, SHALL GOVERN.

C.P. 64-14-75
 BRIDGE NO. 02516



CONSTRUCTION NOTES
 THE MINNESOTA HIGHWAY DEPARTMENT'S STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION DATED JAN. 1, 1964 SHALL GOVERN.

CONSTRUCTION REQUIREMENTS SHALL CONFORM TO M.H.D. 2403.3
 ALL TIMBER SHALL BE AS FOLLOWS: RAIL POSTS SHALL BE 1900 F. M.H.D. 3426
 THICKNESS OF TIMBER 4" OR LESS SHALL BE 1500 F. M.H.D. 3426
 THICKNESS OF TIMBER MORE THAN 4" SHALL BE 1500 F. M.H.D. 3426
 ALL TIMBER IS ROUGH UNLESS DESIGNATED.
 ALL PILING & TIMBER TO BE CREOSOTE PRESSURE TREATED AS PER M.H.D. 3491
 ALL PILING TO MEET REQUIREMENTS OF M.H.D. 3471
 DOWELS FOR FLOOR TO BE PITTSBURG SCREW A BOLT DOUBLE GRIP SCREW TYPE - INDEPENDENT NAIL CO. STROUHGOLD OR APPROVED EQUAL.
 WHEREVER ANY ITEM IS SPECIFIED BY TRADE NAME AN APPROVED EQUAL WILL BE ALLOWED.
 ALL HARDWARE SHALL BE GALVANIZED AS PER M.H.D. 3392.
FLOORING NOTE:
 LAMINATE 4 PLANKS TOGETHER USING SCREW DOWELS IN HOLES "B" AND TO NAIL TO CAP. SO ONE EDGE IS ON ROADWAY. THEREAFTER PLACE PLANKS IN PAIRS. FOR PAIRS ON EITHER SIDE OF THE 4 PLANKS DRIVE DOWELS IN HOLES "A". FOR SUCCEEDING PAIRS ON BOTH SIDES OF USE "B" & "A" ALTERNATELY. BEFORE DRIVING SCREW DOWELS, PLANKS MUST BE SPIKED TOGETHER WITH 60# NAILS, SO DOWEL HOLES ARE LINED UP AND EACH PLANK IS IN CONTACT WITH ADJACENT PLANK THROUGHOUT ITS ENTIRE LENGTH.
 LAMINATIONS MUST BE TIGHT OVER ENTIRE ROADWAY.
 TECO SPLIT RING, TOOTH RING CONNECTORS AND SINGLE CURVE SPIKE GRIDS SHALL BE INSTALLED BY USING INSTALLATION TOOLS & METHODS RECOMMENDED BY THE MANUFACTURER.

PLATE RAILING NOTE:
 8309A
 GUARD RAIL TO BE AS PER M.H.D. STD. PLY. NO. 8307C "PLATE RAILING" TO INCLUDE GUARD RAIL, 4 CURVED END TERMINAL SECTIONS, AND ALL BOLTS, NUTS AND WASHERS REQUIRED TO ASSEMBLE RAILING AND FASTEN IT TO TIMBER RAIL POSTS. RAILING AND CURVED END TERMINAL SECTIONS TO BE GALVANIZED AFTER FABRICATION AS PER M.H.D. 3394. ALL BOLTS, NUTS AND WASHERS TO BE GALVANIZED AS PER M.H.D. 3392.
 LENGTH OF RAILING FOR PAYMENT TO BE MEASURED FROM END TO END OF GUARD RAIL. SEE SPECIAL PROVISIONS.
 SHOP DETAILS TO BE SUBMITTED TO COUNTY FOR APPROVAL.

BILL OF TIMBER FOR SUPERSTRUCTURE				
ITEM	NO.	FIN. SIZE	LENGTH	F.B.M.
LAMINATED FLOOR	120	SIS	3x12x26'-0"	9360
SPREADER BEAM	10	R	6x12x30'-0"	180
RAIL POSTS	10	R	8x8x1'-0"	213
CURB	2	S4S	6x12x26'-0"	312
END SCUPPER INT.	2	S4S	6x12x8'-3"	108
				24
TOTAL F.B.M. FOR SUPERSTRUCTURE				10287

BILL OF TIMBER FOR TWO ABUTMENTS				
PILE CAPS	2	R	12x12x36'-0"	365
ABUTMENT BACKING	6	R	3x12x34'-0"	612
	3	R	3x12x15'-6"	312
	3	R	3x12x20'-6"	472
WING BACKING	16	R	3x12x11'-0"	528
	12	R	3x12x12'-0"	432
WING CORNER NAIL BLKS.	4	R	6x10x9'-0"	180
O.S. BLOCKS ON CAP	4	R	12x12x3'-0"	144
PILE STAYS	12	R	8x8x6'-0"	324
WING CAPS	4	S4S	6x14x13'-0"	364
FILLERS	12	R	4x8x1'-6"	48
TOTAL F.B.M. FOR TWO ABUTMENTS				4121

BILL OF HARDWARE FOR SUPERSTRUCTURE				
ITEM	NO.	ITEM	QTY.	WT.
5/8x10" BOLTS-HEX NUTS RAIL TO POST	10			33
3/4x21" GRD. RAIL BOLTS POST TO CURB	33			33
3/4x26 SEALITE	3			31
3/4x26	14			55
3/4x26	16			63
3/4x18 LAG SCREWS RAIL POST TO FLOOR	20			20
3/4x18 SEALITE DOME HD SPIKES CURB TO FL.	4			9
3/4x18	8			18
3/8 O.D. x 5 1/2" SCREW DOWELS - FLOOR	28			6
3/8 O.D. x 11"	166			366
MALL. RIB. WASH. FOR 3/4" BOLTS	33			25
4" TECO SPLIT RING OR TOOTH RING CONN.	10			23
60# NAILS	10			15
57 LIN. FT. PLATE RAILING				
TOTAL HARDWARE FOR SUPERSTRUCTURE				669

BILL OF HARDWARE FOR TWO ABUTMENTS				
ITEM	NO.	ITEM	QTY.	WT.
3/4x26 SEALITE	16			60
3/4x27" BOLTS	36			135
3/4x11"	16			28
3/4x22" SEALITE BOLTS-WING CAP TO PILE	2			11
3/8 O.D. x 10" BOAT SPIKES	41			15
MALL. RIB. WASH. FOR 3/4" BOLTS	10			15
60# NAILS	28			2
16 PCS. SHEET ZINC 20"x20" 12 GA. TYPE I SOFT M.H.D. 3333				
TOTAL HARDWARE FOR TWO ABUTMENTS				312 LBS.

INCLUDED IN PRICE BID FOR OTHER ITEMS.
 D " " " " " ITEM PLATE RAILING
 Δ WEDGES CUT 2 FROM 1 IN SHOP

PLANS PREPARED BY
 ROBERT E. ERICKSON ENGINEERING CO.
 3340 REPUBLIC AVE. ST. LOUIS PARK, MINN.
 C.R. 1175 ANOKA COUNTY
 STATE OF MINNESOTA
 DEPARTMENT OF HIGHWAYS
 BRIDGE NO 02505
SUPERSTRUCTURE DETAILS
 APPROVED