EAU JANUARY 2016

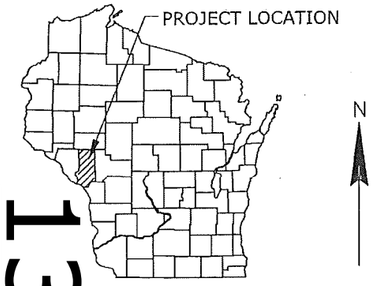
PROJECT ID: 1630-01-73
WITH: 1630-02-71

COUNTY: TREMPEALEAU

ORDER OF SHEETS

Section No.	1	Title
Section No.	2	Typical Sections and Details
Section No.	3	Estimate of Quantities
Section No.	3	Miscellaneous Quantities
~~Section No.~~	~~4~~	~~Right of Way Plat~~
Section No.	5	Plan and Profile (Includes Erosion Control Plan)
Section No.	6	Standard Detail Drawings
~~Section No.~~	~~7~~	~~Sign Plates~~
Section No.	8	Structure Plans
~~Section No.~~	~~9~~	~~Computer Earthwork Data~~
Section No.	9	Cross Sections

TOTAL SHEETS = 90



DESIGN DESIGNATION

A.D.T. (2016)	= 8,700
A.D.T. (2036)	= 9,900
D.H.V. (2036)	= 554 (5.6%)
D.D.	= 60/40
T. (A.D.T.)	= 6.7%
DESIGN SPEED	= 45 MPH
ESALS	= 1,467,300

CONVENTIONAL SYMBOLS

PLAN
- CORPORATE LIMITS
- PROPERTY LINE
- LOT LINE
- LIMITED HIGHWAY EASEMENT
- EXISTING RIGHT OF WAY
- PROPOSED OR NEW R/W LINE
- SLOPE INTERCEPT
- REFERENCE LINE
- EXISTING CULVERT
- PROPOSED CULVERT (Box or Pipe)
- COMBUSTIBLE FLUIDS (CAUTION)
- MARSH AREA
- WOODED OR SHRUB AREA

PROFILE
- GRADE LINE
- ORIGINAL GROUND
- MARSH OR ROCK PROFILE (To be noted as such) (ROCK)
- SPECIAL DITCH (LABEL)
- GRADE ELEVATION (95.36)
- CULVERT (Profile View)

UTILITIES
- ELECTRIC (E)
- FIBER OPTIC (FO)
- GAS (G)
- SANITARY SEWER (SAN)
- STORM SEWER (SS)
- TELEPHONE (T)
- WATER (W)
- UTILITY PEDESTAL
- POWER POLE
- TELEPHONE POLE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PLAN OF PROPOSED IMPROVEMENT

GALESVILLE - WHITEHALL

TREMPEALEAU RIVER BRIDGE B-61-0050

USH 53

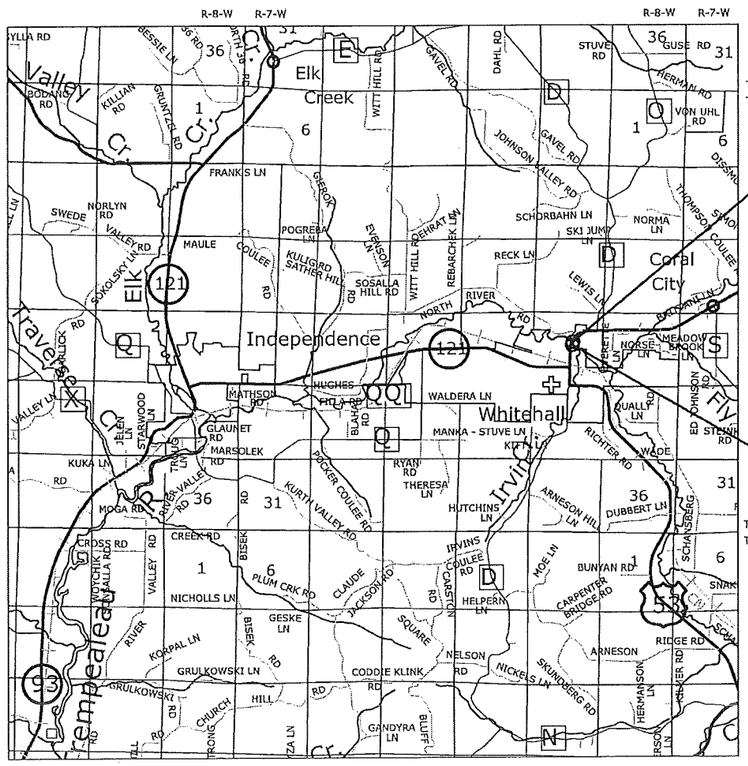
TREMPEALEAU COUNTY

STATE PROJECT NUMBER
1630-01-73

STATE PROJECT	FEDERAL PROJECT	
	PROJECT	CONTRACT
1630-01-73	WISC 2015195	1

AS-BUILT PLAN

PROJECT LEADER:
PRIME CONTRACTOR:Mathy Construction Co.
BEGIN CONSTRUCTION:
END CONSTRUCTION:
FINAL CONSTRUCTION COSTS: $
CONTRACT MOD #'S:
CONTRACT ID: 20160112013

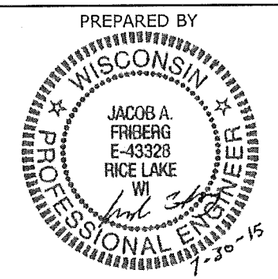


LAYOUT
SCALE 0 1 MILE

TOTAL NET LENGTH OF CENTERLINE = 0.206 MI.

COORDINATE NOTE:
COORDINATES ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM, TREMPEALEAU COUNTY.

PREPARED BY



COOPER ENGINEERING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PREPARED BY

Surveyor	COOPER ENGINEERING
Designer	COOPER ENGINEERING
Regional Examiner	CHRISTINE KOSKI
Regional Supervisor	TIMOTHY MASON
C.O. Examiner	

APPROVED FOR DEPARTMENT
DATE: 11/2/2015 (Signature)

E

FILE NAME: G:\2012-proj\12445024\dwg\Plan Set\010101_tl.dwg PLOT DATE: Jul 30, 2015 - 01:27pm PLOT BY:owner PLOT NAME: CEC-PLAN ORG. DATE: Dec 05, 2007 Originator : Originator PLOT SCALE : Half-Scale

LIST OF STANDARD ABBREVIATIONS

ABUT	ABUTMENT
AC	ACRES
AGG	AGGREGATE
AH	AHEAD
ADT	AVERAGE DAILY TRAFFIC
AVG.	AVERAGE
ASPH	ASPHALTIC
BK.	BACK
BM	BENCHMARK
△	CENTRAL ANGLE OR DELTA
℄, C/L	CENTERLINE
C & G	CURB AND GUTTER
CABC	CRUSHED AGGREGATE BASE COURSE
CONC.	CONCRETE
COR	CORNER
CORR	CORRUGATED
CSCP	CORRUGATED STEEL CULVERT PIPE
CSPA	CORRUGATED STEEL PIPE ARCH
CTH	COUNTY TRUNK HIGHWAY
CP.	CULVERT PIPE
CY	CUBIC YARD
CWT.	HUNDREDWEIGHT
DIA	DIAMETER
D	DEGREE OF CURVE
DHV	DESIGN HOURLY VOLUME
DWY	DRIVEWAY
EBS	EXC. BELOW SUB GRADE
ELEV., EL	ELEVATION
ELEC.	ELECTRIC
EXC	EXCAVATION
EXIST	EXISTING
E	EAST
FE	FIELD ENTRANCE
FF.	FACE TO FACE
FL, F/L	FLOW LINE
FS	FULL SUPERELEVATION
G	GARAGE
GN	GRID NORTH
H	HOUSE
HYD	HYDRANT
I	INTERSECTION ANGLE
INTERS	INTERSECTION
INV.	INVERT
IP	IRON PIN OR PIPE
LC	LONG CHORD OF CURVE
LF	LINEAR FOOT
LHF	LEFT HAND FORWARD
L	LENGTH OF CURVE
LT.	LEFT
LS	LUMP SUM
MH	MANHOLE
N	NORTH
NC	NORMAL CROWN
PAVT	PAVEMENT
PC	POINT OF CURVATURE
PE	PRIVATE ENTRANCE
PI	POINT OF INTERSECTION
PL	PROPERTY LINE
PP	POWER POLE
PT	POINT OF TANGENCY
R	RANGE , RADIUS
RCCP	REINFORCED CONCRETE CULVERT PIPE
RD	ROAD
REBAR	REINFORCEMENT BAR
REQD	REQUIRED
RDWY	ROADWAY
RHF	RIGHT HAND FORWARD
RL, R/L	REFERENCE LINE
RR	RAILROAD
RT.	RIGHT
R/W	RIGHT-OF-WAY
S	SOUTH
SAN S	SANITARY SEWER
SDD	STANDARD DETAIL DRAWING
SE	SUPER ELEVATION
SF.	SQUARE FEET
SHLDR	SHOULDER
SPECS	SPECIFICATIONS
SQ.	SQUARE
SS.	STORM SEWER
SY.	SQUARE YARD
STH	STATE TRUNK HIGHWAY
ST.	STREET
STA.	STATION
SW	SIDEWALK
T	TANGENT
TC	TOP OF CURB
℡ , T/L	TRANSIT LINE
TEL	TELEPHONE
TEMP	TEMPORARY
TLE	TEMPORARY LIMITED EASEMENT
TYP	TYPICAL
USH	UNITED STATES HIGHWAY
UG	UNDERGROUND
V	DESIGN SPEED
VAR.	VARIABLE
VERT	VERTICAL
YD	YARD

UTILITY CONTACTS

COMMUNICATIONS

CENTURYLINK
ATTN.: DONNA SMOTHERS
311 S. COURT STREET
SPARTA, WI 54656
TEL.: (608) 269-0820
EMEGENCY TEL.: 800-824-2877

NATURAL GAS

MIDWEST NATURAL GAS INC.
ATTN.: DOUG DICKENSON
P.O. BOX 429
LA CROSSE, WI 54602
TEL.: (608) 781-1011
EMEGENCY TEL.: 877-817-3119

ELECTRIC, SANITARY, & WATER

WHITEHALL PUBLIC WORKS
ATTN.: RANDY OLSON
P.O. BOX 155
WHITEHALL, WI 54773
TEL.: (231) 894-4048

ALL UTILITIES LISTED ARE MEMBERS OF DIGGERS HOTLINE

DIGGERS HOTLINE

Dial 811 or (800)242-8511

www.DiggersHotline.com

OTHER CONTACTS

DESIGN CONSULTANT

COOPER ENGINEERING CO. INC.
2600 COLLEGE DRIVE
RICE LAKE, WI. 54868
PHONE (715) 234-7008

DNR NORTHERN REGIONAL HQ

DNR/DOT LIAISON
ATTN.: KAREN KALVELAGE
3550 MORMON COURT
LA CROSSE, WI 54601
TEL.: (608) 785-9115
EMAIL: KAREN.KALVELAGE@WISCONSIN.GOV

GENERAL NOTES:

NO TREES OR SHRUBS SHALL BE REMOVED UNLESS SUCH TREES OR SHRUBS HAVE BEEN DESIGNATED FOR REMOVAL BY THE ENGINEER.

ACCESS TO ALL RESIDENCES SHALL BE MAINTAINED DURING CONSTRUCTION.

THE LOCATION OF EXISTING UTILITY INSTALLATIONS AS SHOWN ON THE PLANS ARE APPROXIMATE. THERE MAY BE OTHER UTILITY INSTALLATIONS WITHIN THE PROJECT AREA THAT ARE NOW SHOWN.

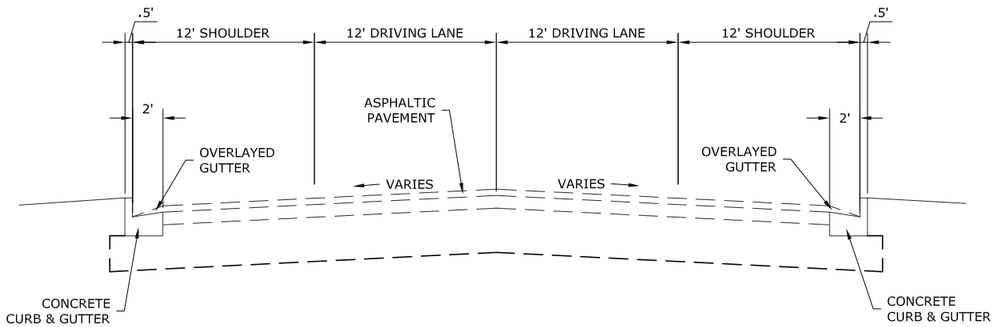
THE CONTRACTOR SHALL NOTIFY DIGGERS HOTLINE AND AFFECTED UTILITIES PRIOR TO THE START OF WORK. ANY UTILITY WHICH IS NOT A MEMBER OF THE DIGGERS HOTLINE MUST BE CONTACTED SEPARATELY.

PAVEMENT MARKING SHALL MEET MUTCD STANDARDS.

RUNOFF COEFFICIENT TABLE

	HYDROLOGIC SOIL GROUP											
	A			B			C			D		
	SLOPE RANGE (%)			SLOPE RANGE (%)			SLOPE RANGE (%)			SLOPE RANGE (%)		
LAND USE:	0-2	2-6	6 & OVER	0-2	2-6	6 & OVER	0-2	2-6	6 & OVER	0-2	2-6	6 & OVER
ROW CROPS	.08 .22	.16 .30	.22 .38	.12 .26	.20 .34	.27 .44	.15 .30	.24 .37	.33 .50	.19 .34	.28 .41	.38 .56
MEDIAN STRIP-TURF	.19 .24	.20 .26	.24 .30	.19 .25	.22 .28	.26 .33	.20 .26	.23 .30	.30 .37	.20 .27	.25 .32	.30 .40
SIDE SLOPE-TURF			.25 .32			.27 .34			.28 .36			.30 .38
PAVEMENT:												
ASPHALT	.70 - .95											
CONCRETE	.80 - .95											
BRICK	.70 - .80											
DRIVES, WALKS	.75 - .85											
ROOFS	.75 - .95											
GRAVEL ROADS, SHOULDERS	.40 - .60											

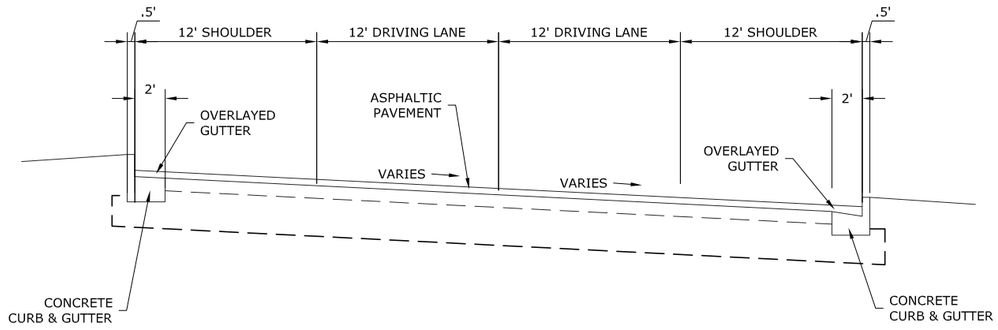
TOTAL PROJECT AREA = 24 ACRES
TOTAL AREA EXPECTED TO BE DISTURBED BY CONSTRUCTION ACTIVITIES = 24 ACRES



TYPICAL EXISTING SECTION

USH 53

STA 15+87.66 TO STA 16+92.39



TYPICAL EXISTING SECTION

USH 53

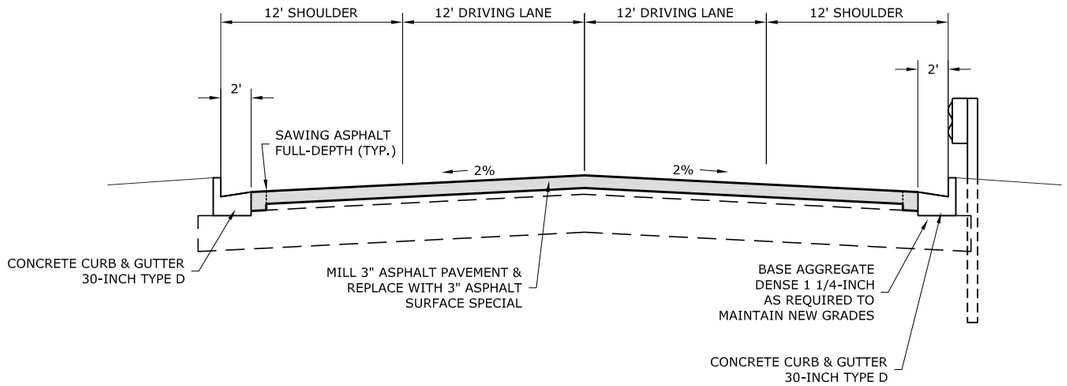
STA 18+80.24 TO STA 26+75

PROJECT NUMBER: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	USH 53 TYPICAL SECTION SHEET	SHEET NO: 3	E

FILE NAME: G:\2012-proj\12445024\dwg\Plan Set\020301_ts.dwg PLOT DATE: Nov 05, 2014 - 01:00pm PLOT BY:Owner PLOT NAME: Layout1 (2) ORG. DATE: Oct 18, 1999 Originator : J.C.A. PLOT SCALE :

WISDOT/CADDS SHEET 42

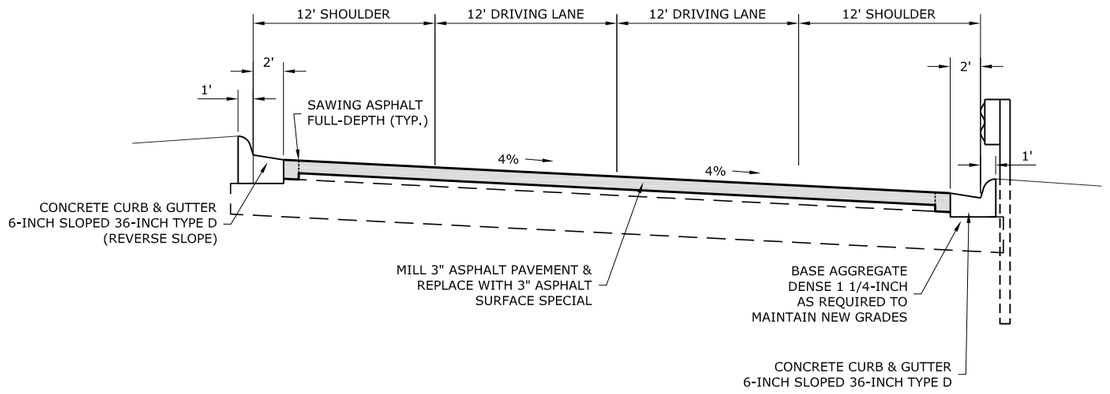
2



TYPICAL FINISHED SECTION

USH 53

STA 15+87.66 TO STA 16+72.81



TYPICAL FINISHED SECTION

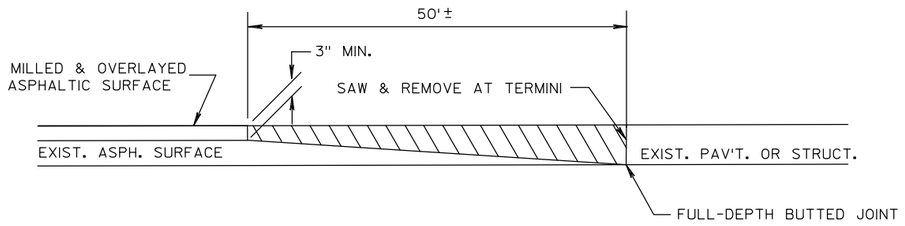
USH 53

STA 18+98.02 TO STA 26+75

PROJECT NUMBER: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	USH 53 TYPICAL SECTION SHEET	SHEET NO: 4	E

FILE NAME: G:\2012-proj\12445024\dwg\Plan Set\020301_ts.dwg PLOT DATE: Jul 29, 2015 - 12:53pm PLOT BY:owner PLOT NAME: Layout1 (3) ORG. DATE: Oct 18, 1999 Originator : J.C.A. PLOT SCALE :

WISDOT/CADDS SHEET 42



PAID FOR AS "REMOVING ASPHALTIC SURFACE BUTT JOINTS."

BUTT JOINT DETAIL

PROJECT NUMBER: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CONSTRUCTION DETAILS	SHEET NO: 5	E

FILE NAME: G:\2012-proj\12445024\dwg\TREMPEAULEAU-RV-BASE.dwg PLOT DATE: Nov 05, 2014 - 01:01pm PLOT BY:Owner PLOT NAME: CD ORG. DATE: Jul 10, 2012 Originator : J.C.A. PLOT SCALE :

WISDOT/CADDS SHEET 42

NOTES:
(1) NORTHWEST SLOPED CURB IS REVERSE SLOPE.
(2) SOUTHWEST SLOPED CURB IS CAPTURE.
(3) NORTH ISLAND CURB IS CAPTURE.
(4) SOUTH ISLAND CURB IS REVERSE SLOPE.

STAKING NOTES - FLAG OF CURB			
POINT No.	STATION	OFFSET	ELEVATION
1	24+79.73	58.60' L BEG. CURVE	824.17
2	24+83.89	61.72' L END REJECT	824.29
3	24+87.33	57.75' L END CURVE	824.25
4	24+87.40	43.35' L MIDPOINT	824.13
5	24+87.46	30.87' L BEG. CURVE	824.05
6	24+86.70	26.39' L BEG. REJECT	824.02
7	24+84.64	24.73' L END CURVE	823.98
8	24+78.98	22.36' L BEG. CURVE	823.89
9	24+74.45	23.09' L MIDPOINT	823.82
10	24+72.99	27.51' L END CURVE	823.83
11	24+76.40	43.05' L MIDPOINT	823.96

SCALE
0' 5' 10' 20'

NORTH RIVER ROAD

STA 24+19.01, 72.00' LT
CENTER OF 50' RADIUS

TBC STA 24+63.37, 63.30' LT
END CURB & GUTTER
FLAG ELEV. = 824.03

TBC STA 24+62.07, 58.52' LT
END 50' RADIUS
FLAG ELEV. = 823.94

TRANSITION FROM CAPTURE
CURB TO REVERSE CURB.
INSURE FLOWLINE DOES
NOT CAPTURE WATER.

CONCRETE SIDEWALK 4-INCH

TBC STA 24+46.14, 34.35' LT
MIDPOINT 50' RADIUS
FLAG ELEV. = 823.38

TBC STA 24+19.01, 25.00' LT
BEGIN 50' RADIUS
FLAG ELEV. = 823.01

R50'

INT

SLOPE

CONCRETE CURB & GUTTER
6-INCH SLOPED 36-INCH TYPE D
(REVERSE SLOPE)

23 LF PAVEMENT
MARKING STOP LINE
EPOXY 24-INCH (WHITE)

STA 24+77.30, 26.53' LT
CENTER OF 4.5' RADIUS

35 LF PAVEMENT
MARKING EPOXY
8-INCH (WHITE)

END CONSTRUCTION 65' LT

STA 24+83.49, 57.74' LT
CENTER OF 4' RADIUS

MOVING SIGNS TYPE II
MOVING SMALL SIGN SUPPORTS

STA 24+83.06, 28.94' LT
CENTER OF 4.5' RADIUS

12 LF PAVEMENT
MARKING STOP LINE
EPOXY 24-INCH (WHITE)

TBC STA 25+21.16, 59.54' LT
END CURB & GUTTER
FLAG ELEV. = 824.60

TBC STA 25+23.48, 49.31' LT
END 35' RADIUS
FLAG ELEV. = 824.67

STA 25+53.43, 57.00' LT
CENTER OF 35' RADIUS

TBC STA 25+34.26, 31.83' LT
MIDPOINT 35' RADIUS
FLAG ELEV. = 824.82

R35'

TBC STA 25+53.43, 25.00' LT
BEGIN 35' RADIUS
FLAG ELEV. = 824.98

100 LF PAVEMENT
MARKING EPOXY
8-INCH (WHITE)

24+00
25+00
26+00

INTERSECTION POINT
STA 24+99.21 USH 53 =
NORTH RIVER ROAD

CONCRETE CURB & GUTTER
6-INCH SLOPED 36-INCH TYPE D

SAW CUT
(TYP.)

END PROJECT
STA 26+75.00
Y = 442,185.61
X = 856,787.93

PROJECT NUMBER: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	INTERSECTION DETAIL SHEET	SHEET NO: 6	E

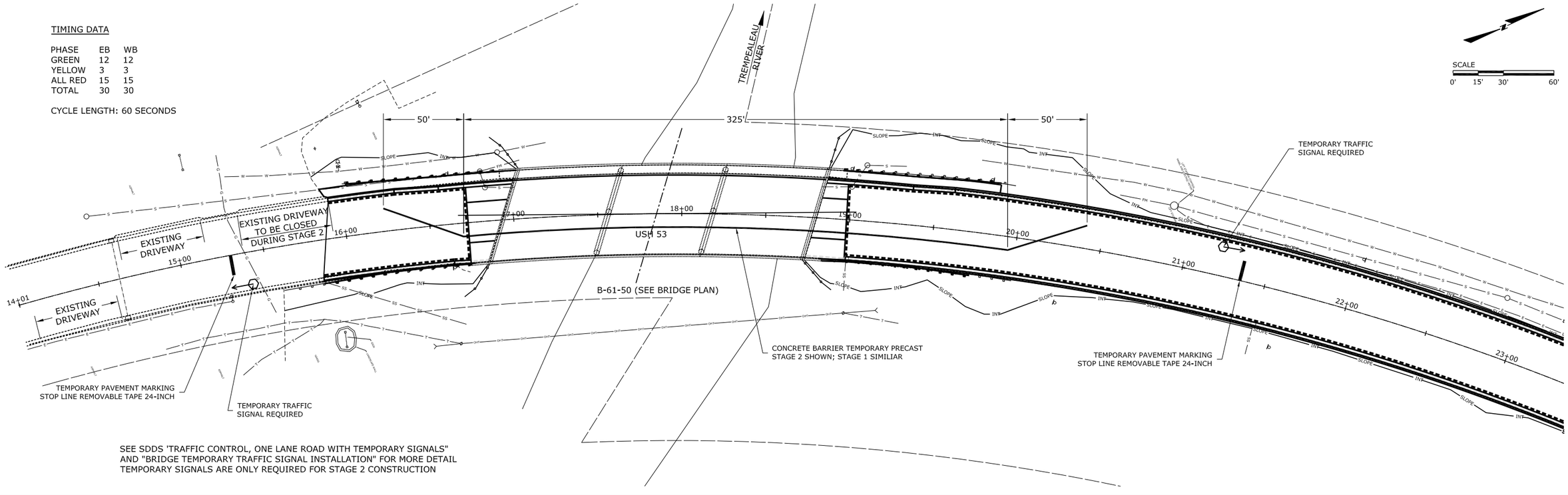
FILE NAME: G:\2012-proj\12445024\dwg\TREMPEAULEAU-RV-BASE.dwg PLOT DATE: Nov 05, 2014 - 01:02pm PLOT BY:Owner PLOT NAME: ID ORG. DATE: Jul 10, 2012 Originator : J.C.A. PLOT SCALE :

WISDOT/CADDS SHEET 42

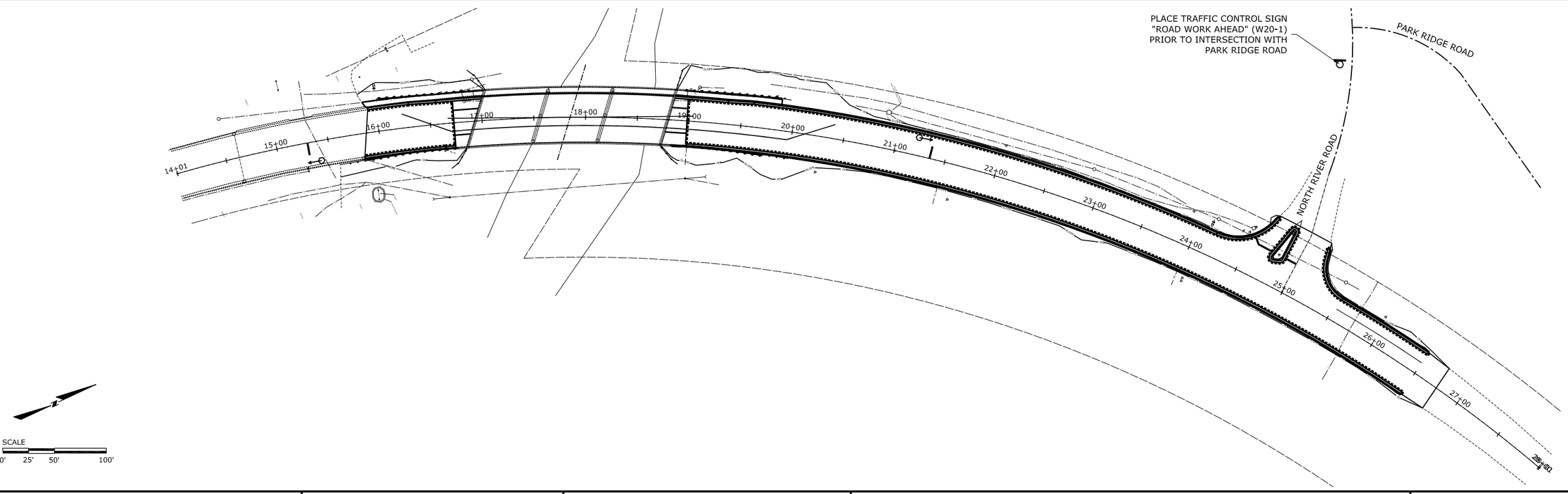
TIMING DATA

PHASE	EB	WB
GREEN	12	12
YELLOW	3	3
ALL RED	15	15
TOTAL	30	30

CYCLE LENGTH: 60 SECONDS



SEE SDDS 'TRAFFIC CONTROL, ONE LANE ROAD WITH TEMPORARY SIGNALS" AND "BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION" FOR MORE DETAIL
TEMPORARY SIGNALS ARE ONLY REQUIRED FOR STAGE 2 CONSTRUCTION



PROJECT NUMBER: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	TRAFFIC CONTROL OVERVIEW	SHEET NO: 7	E

DATE 16NOV15 — E S T I M A T E O F Q U A N T I T I E S

LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1630-01-73 QUANTITY
0010	203.0600.S	Removing Old Structure Over Waterway With Minimal Debris (station) 01. STA 17+85	LS	1.000	1.000
0020	204.0110	Removing Asphaltic Surface	SY	410.000	410.000
0030	204.0115	Removing Asphaltic Surface Butt Joints	SY	250.000	250.000
0040	204.0120	Removing Asphaltic Surface Milling	SY	4,300.000	4,300.000
0050	204.0150	Removing Curb & Gutter	LF	1,800.000	1,800.000
0060	204.0155	Removing Concrete Sidewalk	SY	10.000	10.000
0070	204.0210	Removing Manholes	EACH	2.000	2.000
0090	204.0245	Removing Storm Sewer (size) 01. 8-Inch Sanitary	LF	55.000	55.000
0100	204.0280	Sealing Pipes	EACH	2.000	2.000
0110	205.0100	Excavation Common	CY	1,100.000	1,100.000
0130	206.1000	Excavation for Structures Bridges (structure) 01. B-61-0050	LS	1.000	1.000
0140	210.0100	Backfill Structure	CY	10.000	10.000
0150	213.0100	Finishing Roadway (project) 01. 1630-01-73	EACH	1.000	1.000
0180	305.0120	Base Aggregate Dense 1 1/4-Inch	TON	450.000	450.000
0200	415.0070	Concrete Pavement 7-Inch	SY	90.000	90.000
0210	415.0410	Concrete Pavement Approach Slab	SY	105.000	105.000
0230	455.0605	Tack Coat	GAL	300.000	300.000
0290	502.0100	Concrete Masonry Bridges	CY	400.000	400.000
0300	505.0600	Bar Steel Reinforcement HS Coated Structures	LB	98,560.000	98,560.000
0310	506.4000	Steel Diaphragms (structure) 01. B-61-0050	EACH	12.000	12.000
0320	509.1500	Concrete Surface Repair	SF	35.000	35.000
0330	513.7006	Railing Steel Type C1 (structure) 01. B-61-0050	LF	1.000	1.000
0380	601.0411	Concrete Curb & Gutter 30-Inch Type D	LF	210.000	210.000
0390	601.0511	Concrete Curb & Gutter Integral 6-Inch Sloped 36-Inch	LF	10.000	10.000
0400	601.0557	Concrete Curb & Gutter 6-Inch Sloped 36-Inch Type D	LF	1,580.000	1,580.000
0410	602.0405	Concrete Sidewalk 4-Inch	SF	1,300.000	1,300.000
0440	603.8000	Concrete Barrier Temporary Precast Delivered	LF	425.000	425.000
0450	603.8125	Concrete Barrier Temporary Precast Installed	LF	850.000	850.000
0470	611.0615	Inlet Covers Type F	EACH	3.000	3.000
0510	611.8115	Adjusting Inlet Covers	EACH	3.000	3.000
0530	614.0150	Anchor Assemblies for Steel Plate Beam Guard	EACH	4.000	4.000
0580	614.0920	Salvaged Rail	LF	430.000	430.000
0600	614.2500	MGS Thrie Beam Transition	LF	156.000	156.000
0610	614.2610	MGS Guardrail Terminal EAT	EACH	4.000	4.000
0630	619.1000	Mobilization	EACH	0.200	0.200
0660	625.0100	Topsoil	SY	1,450.000	1,450.000
0690	628.1504	Silt Fence	LF	100.000	100.000
0700	628.1520	Silt Fence Maintenance	LF	100.000	100.000
0710	628.1905	Mobilizations Erosion Control	EACH	4.000	4.000
0720	628.1910	Mobilizations Emergency Erosion Control	EACH	1.000	1.000
0730	628.2008	Erosion Mat Urban Class I Type B	SY	1,450.000	1,450.000
0760	628.7015	Inlet Protection Type C	EACH	6.000	6.000
0790	629.0210	Fertilizer Type B	CWT	1.000	1.000

3

DATE 16NOV15 E S T I M A T E O F Q U A N T I T I E S

LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1630-01-73 QUANTITY
0810	630.0140	Seeding Mixture No. 40	LB	30.000	30.000
0910	638.2102	Moving Signs Type II	EACH	6.000	6.000
0940	638.4000	Moving Small Sign Supports	EACH	5.000	5.000
0950	642.5201	Field Office Type C	EACH	0.200	0.200
0960	643.0100	Traffic Control (project) 01. 1630-01-73	EACH	1.000	1.000
0980	643.0300	Traffic Control Drums	DAY	4,950.000	4,950.000
0990	643.0420	Traffic Control Barricades Type III	DAY	90.000	90.000
1000	643.0705	Traffic Control Warning Lights Type A	DAY	180.000	180.000
1010	643.0715	Traffic Control Warning Lights Type C	DAY	900.000	900.000
1020	643.0900	Traffic Control Signs	DAY	2,430.000	2,430.000
1030	646.0106	Pavement Marking Epoxy 4-Inch	LF	4,300.000	4,300.000
1040	646.0126	Pavement Marking Epoxy 8-Inch	LF	135.000	135.000
1060	646.0600	Removing Pavement Markings	LF	90.000	90.000
1100	647.0456	Pavement Marking Curb Epoxy	LF	80.000	80.000
1120	647.0576	Pavement Marking Stop Line Epoxy 24-Inch	LF	35.000	35.000
1180	649.0400	Temporary Pavement Marking Removable Tape 4-Inch	LF	1,030.000	1,030.000
1190	649.0402	Temporary Pavement Marking Paint 4-Inch	LF	2,050.000	2,050.000
1200	649.1400	Temporary Pavement Marking Stop Line Removable Tape 24-Inch	LF	24.000	24.000
1240	650.5500	Construction Staking Curb Gutter and Curb & Gutter	LF	1,790.000	1,790.000
1250	650.6500	Construction Staking Structure Layout (structure) 01. B-61-0050	LS	1.000	1.000
1260	650.7000	Construction Staking Concrete Pavement	LF	50.000	50.000
1270	650.8000	Construction Staking Resurfacing Reference	LF	925.000	925.000
1280	650.9910	Construction Staking Supplemental Control (project) 01. 1630-01-73	LS	1.000	1.000
1310	661.0100	Temporary Traffic Signals for Bridges (structure) 01. B-61-0050	LS	1.000	1.000
1320	690.0150	Sawing Asphalt	LF	1,850.000	1,850.000
1340	715.0502	Incentive Strength Concrete Structures	DOL	4,000.000	4,000.000
1350	SPV.0090	Special 01. Concrete Curb and Gutter Cure and Seal Treatment	LF	1,790.000	1,790.000
1400	SPV.0165	Special 01. Concrete Sidewalk Cure and Seal Treatment	SF	1,300.000	1,300.000
1430	SPV.0195	Special 02. Asphaltic Surface Special	TON	825.000	825.000

3

NOTE: ALL ITEMS ARE CATEGORY 0010 UNLESS SPECIFIED DIFFERENTLY

CATEGORY	STATION TO STATION	SIDE	WIDTH (FT)	THICKNESS (IN)	LAYERS	REMOVING ASPHALTIC SURFACE 204.0110 SY	REMOVING ASPHALTIC SURFACE BUTT JOINTS 204.0115 SY	REMOVING ASPHALTIC SURFACE MILLING 204.0120 SY	CONCRETE PAVEMENT 7-INCH 415.0070 SY	CONCRETE APPROACH SLAB 415.0410 SY	TACK COAT 455.0605 GAL	CONSTRUCTION STAKING CONCRETE PAVEMENT 650.7000 LF	CONSTRUCTION STAKING RESURFACING REFERENCE 650.8000 LF	SAWING ASPHALT 690.0150 LF	ASPHALTIC SURFACE SPECIAL SPV.0195.02 TON	REMARKS
0010	15+88 - 16+73	LT/RT	44	3	1	20	250	200	-	-	14	-	85	170	100	MILL AND OVERLAY; REPLACE C&G
0010	16+73 - 16+92	LT/RT	44			110	-	-	45	55	-	27	-	45	-	REMOVE AND REPLACE WITH CONCRETE
0010	18+80 - 18+98	LT/RT	44			100	-	-	45	50	-	23	-	45	-	REMOVE AND REPLACE WITH CONCRETE
0010	18+98 - 26+75	LT/RT	44	3	1	160	-	3,800	-	-	265	-	775	1,370	640	MILL AND OVERLAY; REPLACE C&G
0010	NORTH RIVER ROAD	LT	VARIES	3	1	20	-	300	-	-	21	-	65	220	50	NORTH RIVER ROAD INTERSECTION WORK
0010	UNDISTRIBUTED					-	-	-	-	-	-	-	-	-	35	CURB & GUTTER
				TOTAL 0010		410	250	4,300	90	105	300	50	925	1,850	825	

CATEGORY	STATION TO STATION	LOCATION	REMOVING CURB & GUTTER 204.0150 LF	REMOVING CONCRETE SIDEWALK 204.0155 SY	EXCAVATION COMMON 205.0100 CY	BASE AGGREGATE DENSE 1 1/4-INCH 305.0120 TON	CONCRETE CURB & GUTTER 30-INCH TYPE D 601.0411 LF	CONCRETE CURB & GUTTER INTEGRAL 6-INCH SLOPED 36-INCH 601.0511 LF	CONCRETE CURB & GUTTER 6-INCH SLOPED 36-INCH TYPE D 601.0557 LF	CONCRETE SIDEWALK 4-INCH 602.0405 SF	CONSTRUCTION STAKING CURB GUTTER AND CURB & GUTTER 650.5500 LF	CONCRETE CURB AND GUTTER CURE AND SEAL TREATMENT SPV.0090.01 LF	CONCRETE SIDEWALK CURE AND SEAL TREATMENT SPV.0165.01 SF	REMARKS
0010	15+83 - 16+73	RT	95	-	50	15	95	-	-	-	95	95	-	
0010	15+92 - 17+01	LT	115	-	62	16	115	-	-	-	115	115	-	REVERSE SLOPE GUTTER
0010	16+93 - 17+03	LT	-	5	-	-	-	-	-	-	-	-	-	
0010	15+88 - 17+03	LT	-	-	15	25	-	-	-	625	-	-	625	
0010	18+86 - 18+97	LT	-	5	-	-	-	-	-	-	-	-	-	
0010	18+86 - 19+87	LT	-	-	10	20	-	-	-	500	-	-	500	
0010	18+85 - 18+98	RT	10	-	8	4	-	10	-	-	-	-	-	
0010	19+00 - 26+47	RT	750	-	400	115	-	-	750	-	750	750	-	
0010	18+86 - 24+19	LT	535	-	290	85	-	-	535	-	535	535	-	REVERSE SLOPE GUTTER
0010	25+53 - 26+45	LT	95	-	55	15	-	-	95	-	95	95	-	REVERSE SLOPE GUTTER
0010	NORTH RIVER ROAD	LT	200	-	110	35	-	-	200	175	200	200	175	PORTIONS REVERSE SLOPE
0010	CONCRETE APPROACH SLABS	LT/RT	-	-	100	120	-	-	-	-	-	-	-	
0010	UNDISTRIBUTED		-	-	-	-	-	-	-	-	-	-	-	
		TOTAL 0010	1,800	10	1,100	450	210	10	1580	1300	1790	1790	1300	

CATEGORY	STATION	LOCATION	REMOVING MANHOLES 204.0210 EA	REMOVING STORM SEWER (8" SANITARY) 204.0245 LF	SEALING PIPES 204.0280 EA
0030	16+84	20' LT	1	15	-
0030	16+82	28' LT	-	10	1
0030	19+00	20' LT	1	15	-
0030	19+07	32' LT	-	15	1
		TOTAL 0030	2	55	2

CATEGORY	STATION TO STATION	CONCRETE BARRIER TEMPORARY PRECAST DELIVERED 603.8000 LF	CONCRETE BARRIER TEMPORARY PRECAST INSTALLED 603.8125 LF
0010	16+20 - 20+45	425	850
	TOTAL 0010	425	850

CATEGORY	STATION	LOCATION	INLET COVERS TYPE F 611.0615 EA	ADJUSTING INLET COVERS 611.8115 EA	INLET PROTECTION TYPE C 628.7015 EA
0010	14+62	RT/LT	-	-	2
0010	15+82	RT	-	-	1
0010	18+99	23.6' RT	1	1	1
0010	21+49	23.6' RT	1	1	1
0010	23+99	23.6' RT	1	1	1
		TOTAL 0010	3	3	6

NOTE: ALL ITEMS ARE CATEGORY 0010 UNLESS SPECIFIED DIFFERENTLY

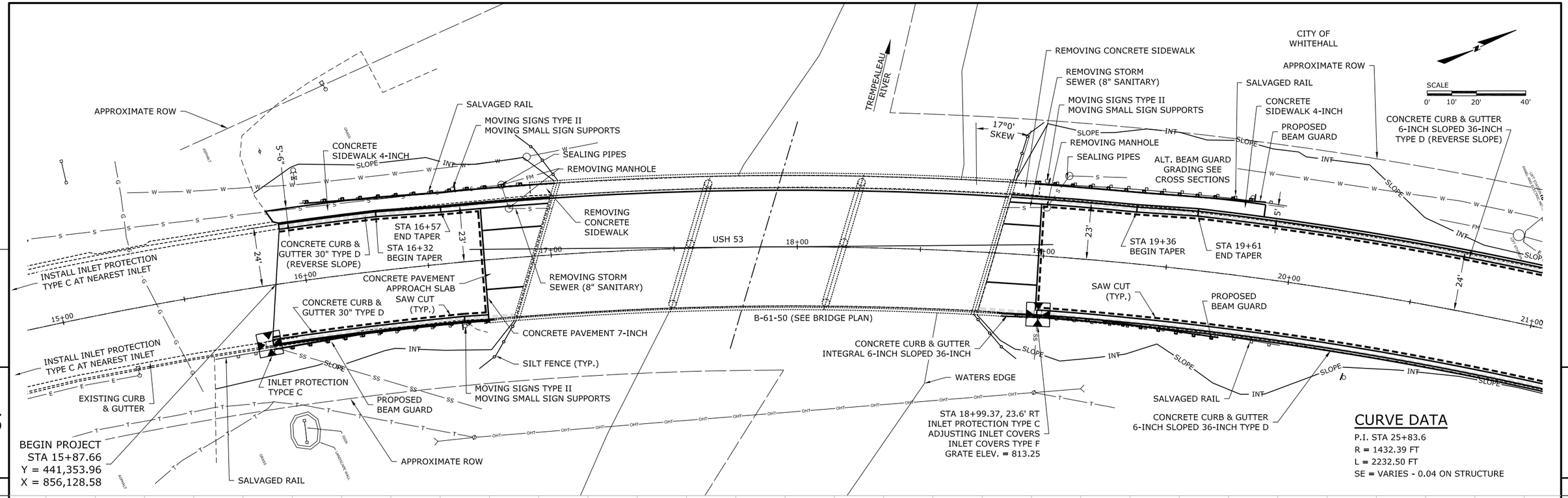
CATEGORY	STATION TO	STATION	LOCATION	SALVAGED RAIL 614.0920 LF	MGS THRIE BEAM TRANSITION 614.2500 LF	MGS GUARDRAIL TERMINAL EAT 614.2610 EA	REMARKS
0010	15+58	16+76	RT	120	-	-	
0010	15+83	16+36	RT	-	-	1	
0010	16+36	16+75	RT	-	39	-	
0010	16+02	16+95	LT	95	-	-	
0010	16+03	16+56	LT	-	-	1	
0010	16+56	16+96	LT	-	39	-	
0010	18+83	20+00	RT	115	-	-	
0010	18+82	19+21	RT	-	39	-	
0010	19+21	19+75	RT	-	-	1	
0010	18+95	19+95	LT	100	-	-	
0010	18+94	19+34	LT	-	39	-	
0010	19+34	19+87	LT	-	-	1	
0010	UNDISTRIBUTED			-	-	-	
			TOTAL 0010	430	156	4	

CATEGORY	LOCATION	TOPSOIL 625.0100 SY	SILT FENCE 628.1504 LF	SILT FENCE MAINTENANCE 628.1520 LF	EROSION MAT URBAN CLASS I TYPE B 628.2008 SY	FERTILIZER TYPE B 629.0210 CWT	SEEDING MIX NO. 40 630.0140 LB
0010	B-61-50 SE	100	25	25	100	0.1	2
0010	B-61-50 SW	130	25	25	130	0.1	3
0010	B-61-50 NE	470	25	25	470	0.3	10
0010	B-61-50 NW	750	25	25	750	0.5	15
	TOTAL 0010	1450	100	100	1450	1	30

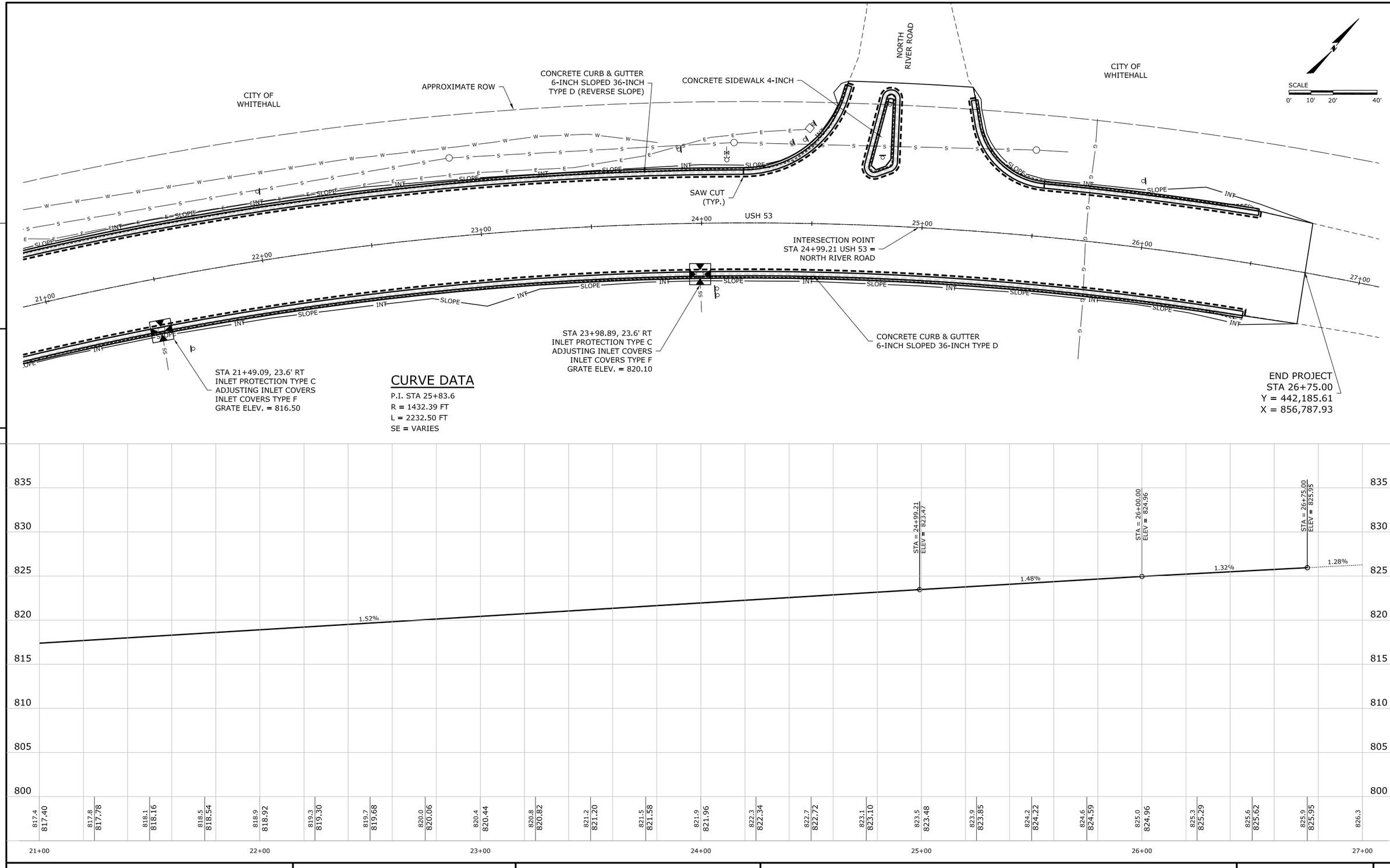
CATEGORY	STATION	SIDE	MOVING SIGNS TYPE II 638.2102 EA	MOVING SMALL SIGN SUPPORTS 638.4000 EA	REMARKS
0010	16+63	RT	2	1	SPEED LIMIT/TREMPEALEAU RIVER
0010	16+63	LT	1	1	SPEED LIMIT
0010	18+99	LT	1	1	TREMPEALEAU RIVER
0010	24+82	LT	2	2	STOP SIGN/ARROW
		TOTAL 0010	6	5	

CATEGORY	DAYS	TRAFFIC CONTROL DRUMS 643.0300 #	DAYS	TRAFFIC CONTROL BARRICADES TYPE III 643.0420 #	DAYS	TRAFFIC CONTROL WARNING LIGHTS TYPE A 643.0705 #	DAYS	TRAFFIC CONTROL WARNING LIGHTS TYPE C 643.0715 #	DAYS	TRAFFIC CONTROL SIGNS 643.0900 #	DAYS	TEMPORARY TRAFFIC SIGNALS FOR BRIDGES 661.0100 LS
0010	90	55	4,950	1	90	2	180	10	900	27	2,430	1
TOTAL 0010			4,950		90		180		900		2,430	1

CATEGORY	STATION TO	STATION	SIDE	PAVEMENT MARKING EPOXY 4-INCH 646.0106 LF	PAVEMENT MARKING EPOXY 8-INCH 646.0126 LF	REMOVING PAVEMENT MARKINGS 646.0600 LF	PAVEMENT MARKING CURB EPOXY 647.0456 LF	PAVEMENT MARKING STOP LINE EPOXY 24-INCH 647.0576 LF	TEMPORARY PAVEMENT MARKING REMOVABLE TAPE 4-INCH 649.0400 LF	TEMPORARY PAVEMENT MARKING PAINT 4-INCH 649.0402 LF	TEMPORARY PAVEMENT MARKING STOP LINE REMOVABLE TAPE 24-INCH 649.1400 LF	REMARKS
0010	15+30		RT	-	-	-	-	-	-	-	12	STOP LINE
0010	15+30	15+88	CL	90	-	90	-	-	-	-	-	YELLOW CENTERLINE
0010	15+92	21+35	LT	-	-	-	-	-	-	545	-	LT WHITE EDGELINE
0010	16+20	20+45	LT	-	-	-	-	-	-	425	-	RT BARRIER EDGELINE
0010	21+35		LT	-	-	-	-	-	-	-	12	STOP LINE
0010	21+35	26+75	CL	-	-	-	-	-	-	1080	-	TEMP. CENTERLINE
0010	15+30	21+35	RT	-	-	-	-	-	605	-	-	STAGE 2 WHITE EDGELINE
0010	16+20	20+45	RT	-	-	-	-	-	425	-	-	STAGE 2 BARRIER EDGELINE
0010	15+88	26+75	CL	2170	-	-	-	-	-	-	-	YELLOW CENTERLINE
0010	15+92	24+19	LT	830	-	-	-	-	-	-	-	LT EDGELINE
0010	25+53	26+75	LT	120	-	-	-	-	-	-	-	LT EDGELINE
0010	15+83	26+75	RT	1090	-	-	-	-	-	-	-	RT EDGELINE
0010	25+53	26+50	LT	-	100	-	-	-	-	-	-	RT TURN LANE CHANNELIZATION
0010	NORTH RIVER ROAD		LT	-	35	-	80	35	-	-	-	ISLAND CHANNEL/STOP LINE
			TOTAL 0010	4300	135	90	80	35	1030	2050	24	



PROJECT NUMBER: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN & PROFILE	SHEET NO: 12	E



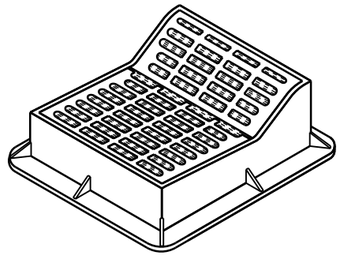
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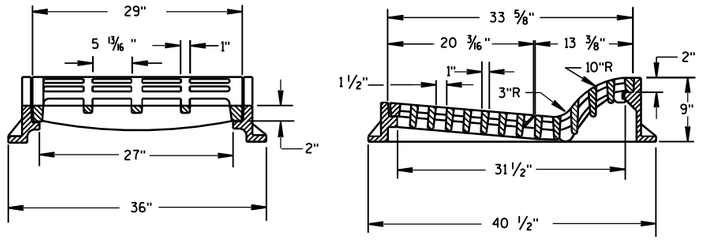
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Standard Detail Drawing List

08A05-19C	INLET COVERS TYPE F, HM, HM-S, S, T, V, HM-GJ, & HM-GJ-S
08D01-18	CONCRETE CURB, CONCRETE CURB AND GUTTER AND TIES
08E09-06	SILT FENCE
08E10-02	INLET PROTECTION TYPE A, B, C AND D
09G02-03A	BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION
09G02-03B	BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION
09G02-03C	BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION
12A03-10	NAME PLATE (STRUCTURES)
13A03-06	CONCRETE PAVEMENT SHOULDERS
13B02-08A	CONCRETE PAVEMENT APPROACH SLAB
14B07-14A	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14B	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14C	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14D	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14E	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14F	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14G	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B07-14H	CONCRETE BARRIER TEMPORARY PRECAST, 12'-6"
14B08-02A	CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS
14B08-02B	CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS
14B08-02C	CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS
14B08-02D	CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS
14B08-02E	CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS
14B42-03A	MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL
14B42-03B	MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL
14B42-03C	MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL
14B44-02A	MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)
14B44-02B	MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)
14B44-02C	MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)
14B45-04A	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04B	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04C	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04D	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04E	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04F	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04G	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04H	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04I	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04J	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04K	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-04L	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
15C04-02	TRAFFIC CONTROL, ADVANCE WARNING SIGNS 45 M.P.H. OR GREATER TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC
15C08-16A	PAVEMENT MARKING (MAINLINE)
15C08-16F	PAVEMENT MARKING (ISLANDS)
15C12-04	TRAFFIC CONTROL FOR LANE CLOSURE (SUITABLE FOR MOVING OPERATIONS)
15C33-01	STOP LINE AND CROSSWALK PAVEMENT MARKING
15D28-03	TRAFFIC CONTROL, WORK ON SHOULDER OR PARKING LANE, UNDIVIDED ROADWAY
15D33-03	TRAFFIC CONTROL, ONE LANE ROAD WITH TEMPORARY SIGNALS

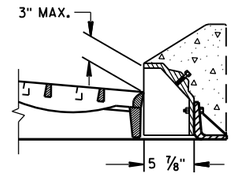
6





TYPE "F"

USE WITH TYPES A & D CONCRETE CURB & GUTTER, 36 INCH.



ALTERNATIVE CURB BOX FOR TYPE "HM" COVER

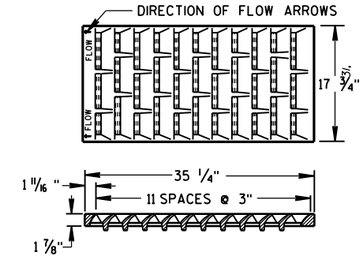
USE WITH TYPES G & J CONCRETE CURB & GUTTER, 30 INCH
NOTED AS TYPE HM-GJ ON DRAINAGE TABLE

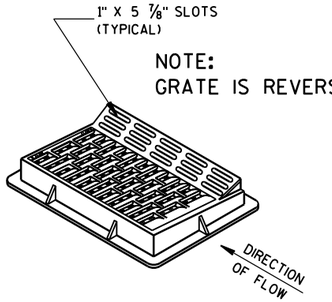
NOTE:
SPECIAL GRATE FOR THE
TYPE "H" COVER MAY ALSO BE
USED FOR THE TYPE "HM-GJ" COVER
NOTED AS TYPE HM-GJ-S ON DRAINAGE TABLE

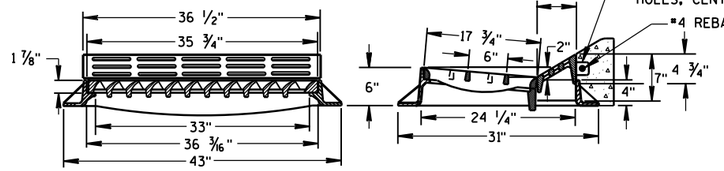
GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

DETAIL DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR INLET COVERS SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PROVIDING THAT SUCH ALTERNATE DESIGNS MAKE PROVISION FOR EQUIVALENT CAPACITY AND STRENGTH.



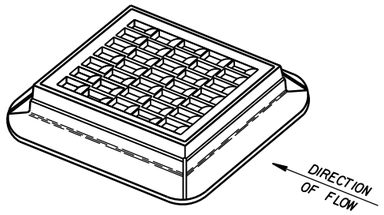


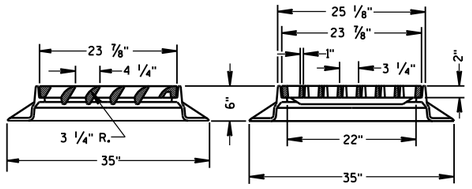


TYPE "HM"

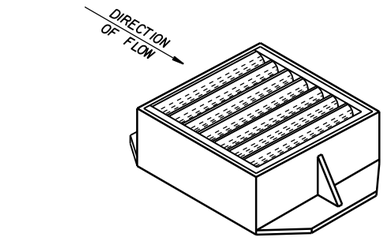
USE WITH TYPES A & D CONCRETE CURB & GUTTER, 36 INCH.

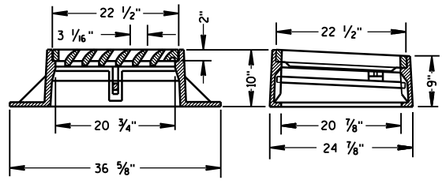
NOTE:
SPECIAL GRATE FOR THE
TYPE "H" COVER MAY ALSO BE
USED FOR THE TYPE "HM" COVER
NOTED AS TYPE HM-S ON DRAINAGE TABLE



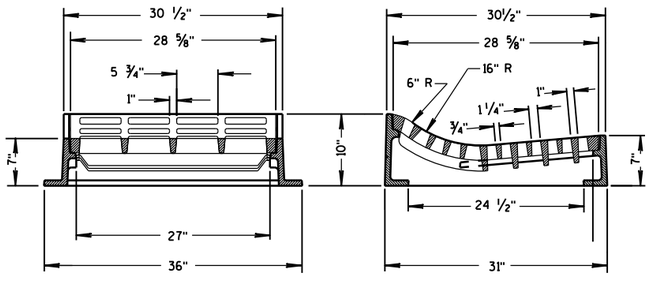


TYPE "S"



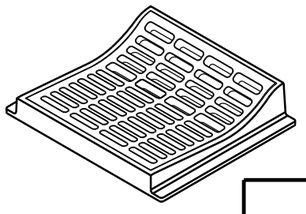


TYPE "V"



TYPE "T"

USE WITH TYPES R & T CONCRETE CURB & GUTTER, 36 INCH.



INLET COVERS
TYPE F, HM, HM-S, S, T, V, HM-GJ, & HM-GJ-S

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
11/27/2013
DATE

/S/ Jerry H. Zogg
ROADWAY STANDARDS ENGINEER

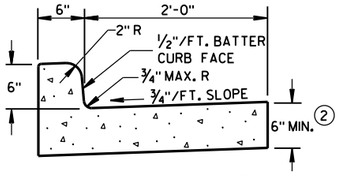
FHWA

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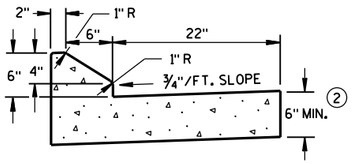
S.D.D. 8 A 5-19c

6

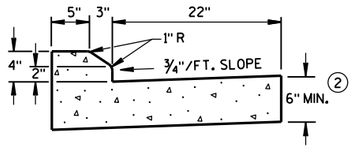
S.D.D. 8 A 5-19c



TYPES A & D ①

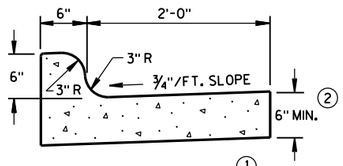


6" SLOPED CURB TYPES G & J ①

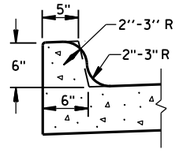


4" SLOPED CURB TYPES G & J ①

CONCRETE CURB & GUTTER 30"

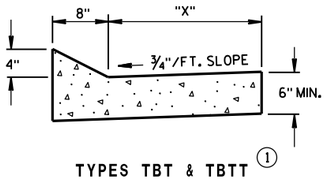


TYPES K & L ①



OPTIONAL CURB SHAPE FOR TYPES K & L ①

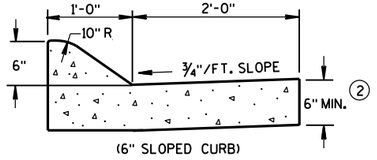
CONCRETE CURB & GUTTER 30"



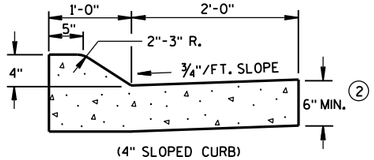
TYPES TBT & TBTT ①

CONCRETE CURB & GUTTER

TBT & TBTT	"X"
30"	22"
36"	28"

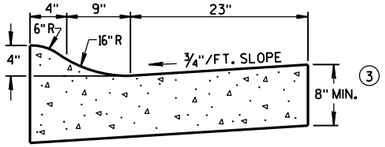


(6" SLOPED CURB)



(4" SLOPED CURB)

TYPES A & D ①



4" SLOPED CURB TYPES R & T ① ④

CONCRETE CURB & GUTTER 36"

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE CONTRACT.

PAVEMENT TIES AND TIE BARS SHALL BE EPOXY COATED IN CONFORMANCE WITH SUBSECTION 505.2.6.2 OF THE STANDARD SPECIFICATIONS.

INTEGRAL CURB & GUTTER SHALL CONFORM TO THE DETAILS SHOWN FOR CONCRETE CURB & GUTTER INCLUDING THE TRANSVERSE GUTTER SLOPE. A LONGITUDINAL CONSTRUCTION JOINT IS NOT REQUIRED WITH INTEGRAL CURB AND GUTTER.

WHERE THE TRANSVERSE JOINTS IN THE PAVEMENT ARE REQUIRED TO BE SEALED, THE JOINTS IN THE INTEGRAL CURB AND GUTTER SHALL BE SEALED TO THE FACE OF CURB WITH THE SAME TYPE OF SEALANT. THE COST OF FURNISHING AND INSTALLING THIS SEALANT SHALL BE INCIDENTAL TO THE ITEM CONCRETE CURB AND GUTTER.

UNLESS OTHERWISE SHOWN ON THE TYPICAL CROSS SECTIONS, THE BASE AGGREGATE AND COMMON EXCAVATION LIMITS ARE 2'-0" BEHIND THE BACK OF CURBS.

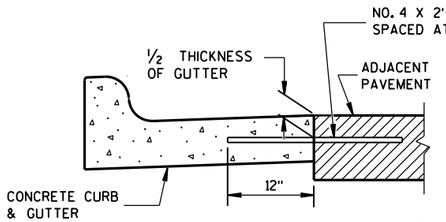
① TIE BARS ARE REQUIRED FOR CURB AND GUTTER TYPES A, G, K, R AND TBTT.

② THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 6" MINIMUM GUTTER THICKNESS IS MAINTAINED.

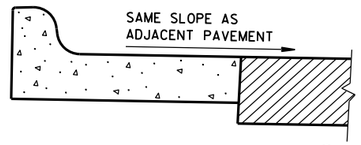
③ THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 8" MINIMUM GUTTER THICKNESS IS MAINTAINED.

④ THE FACE OF CURB IS 6" FROM THE BACK OF CURB.

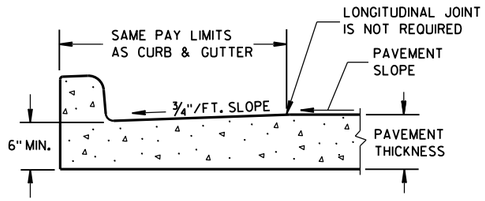
⑤ WHEN REVERSE SLOPE GUTTER IS REQUIRED, THE LOCATION(S) WILL BE SHOWN ELSEWHERE IN THE PLAN.



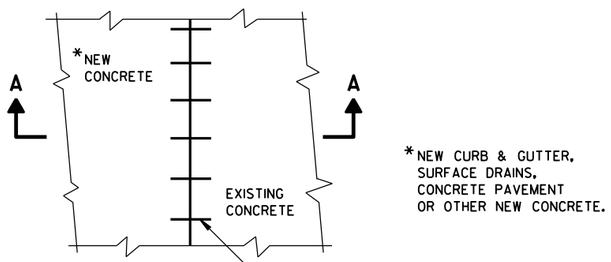
TYPICAL TIE BAR LOCATION ①



REVERSE SLOPE GUTTER ⑤
(TYPICAL FOR ALL CURB & GUTTER TYPES)

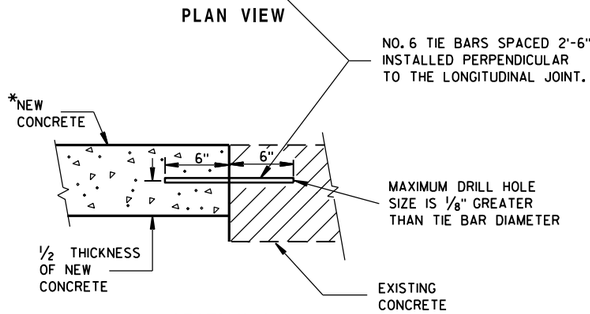


PARTIAL SECTION OF PAVEMENT
WITH INTEGRAL CURB & GUTTER



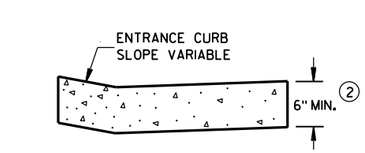
*NEW CURB & GUTTER, SURFACE DRAINS, CONCRETE PAVEMENT OR OTHER NEW CONCRETE.

PLAN VIEW

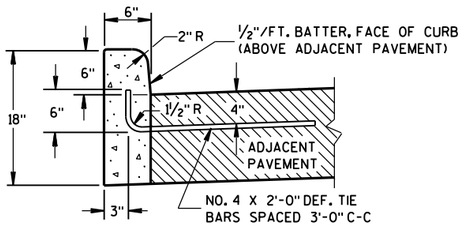


SECTION A-A

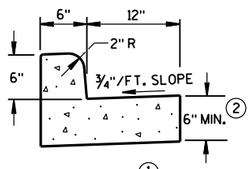
TIE BARS DRILLED
INTO EXISTING PAVEMENT



DRIVEWAY ENTRANCE CURB
(WHEN DIRECTED BY THE ENGINEER)

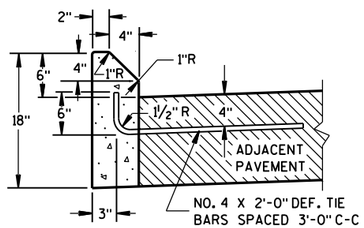


① TYPES A & D

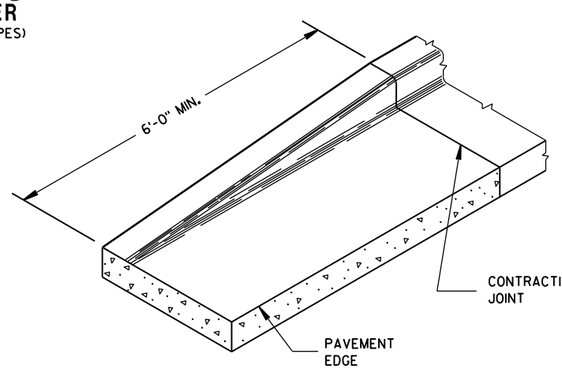


① TYPES A & D

CONCRETE CURB & GUTTER 18"



① TYPES G & J



END SECTION CURB & GUTTER

CONCRETE CURB

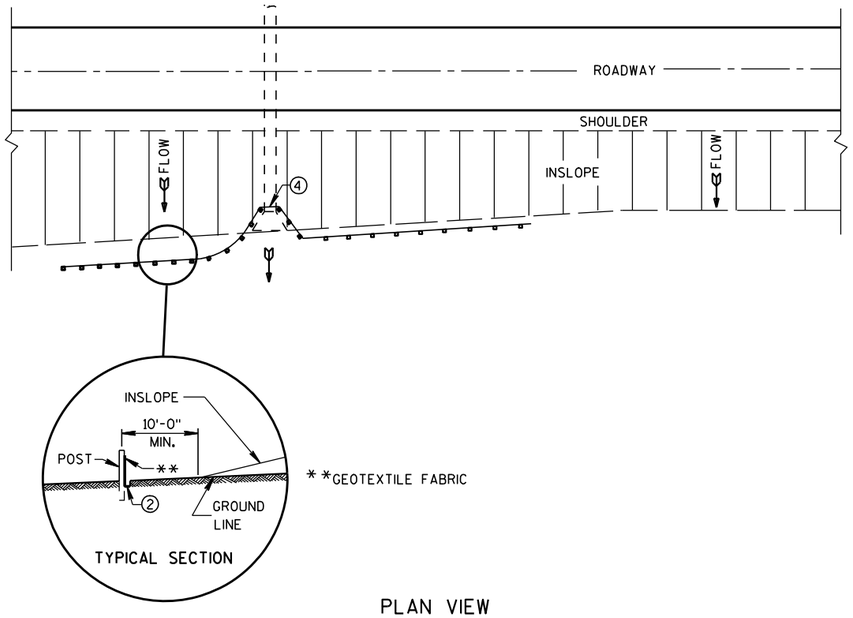
CONCRETE CURB, CONCRETE CURB & GUTTER AND TIES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

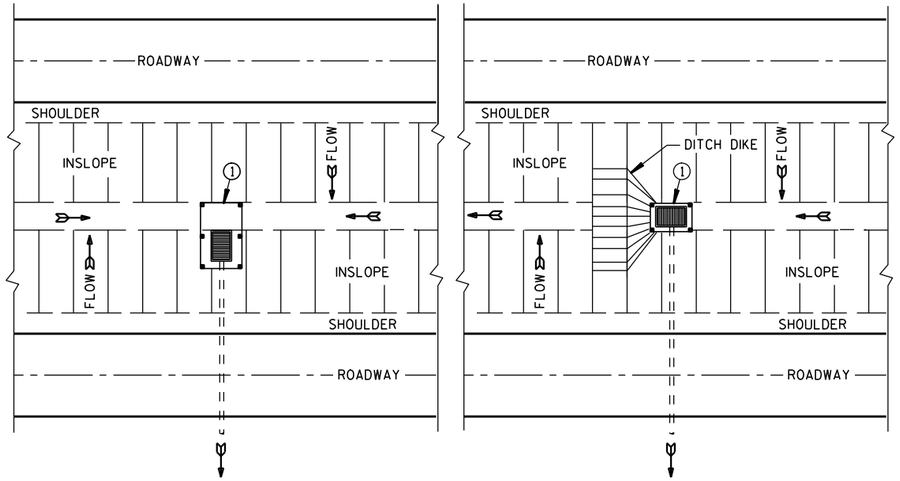
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S.D.D. 8 D 1-18



PLAN VIEW

TYPICAL APPLICATION OF SILT FENCE



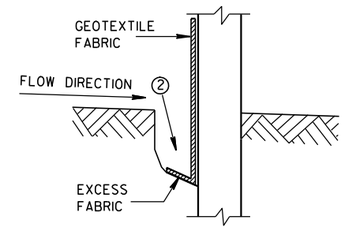
PLAN VIEW

SILT FENCE AT MEDIAN SURFACE DRAINS

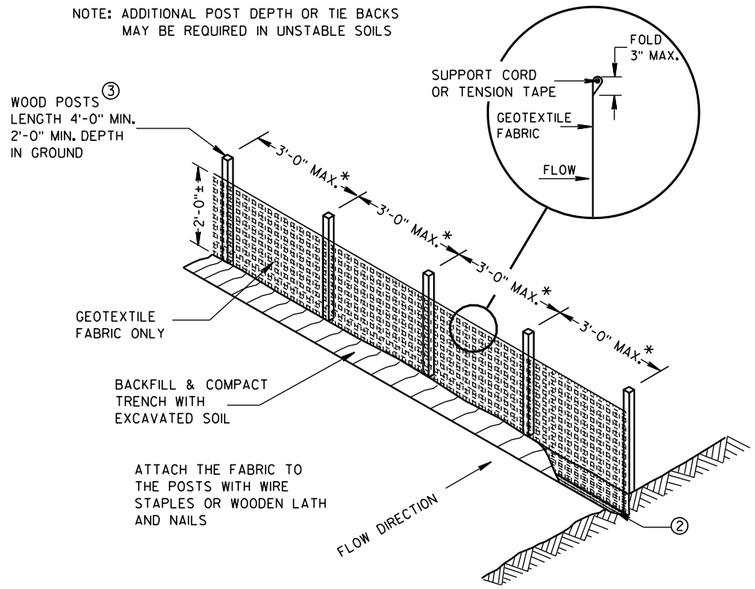
GENERAL NOTES

DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

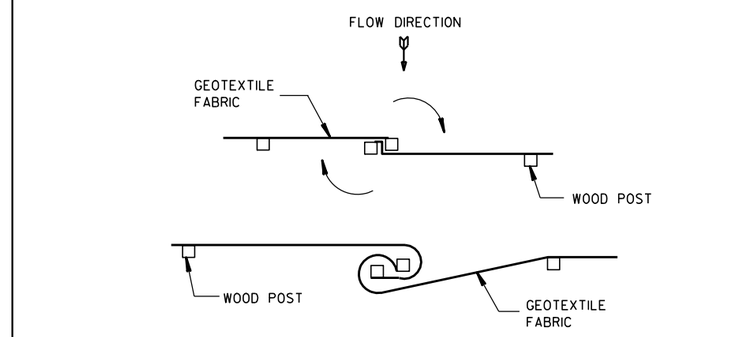
1. HORIZONTAL BRACE REQUIRED WITH 2" X 4" WOODEN FRAME OR EQUIVALENT AT TOP OF POSTS.
2. FOR MANUAL INSTALLATIONS THE TRENCH SHALL BE A MINIMUM OF 4" WIDE & 6" DEEP TO BURY AND ANCHOR THE GEOTEXTILE FABRIC. FOLD MATERIAL TO FIT TRENCH AND BACKFILL & COMPACT TRENCH WITH EXCAVATED SOIL.
3. WOOD POSTS SHALL BE A MINIMUM SIZE OF 1⅛" X 1⅛" OF OAK OR HICKORY.
4. SILT FENCE TO EXTEND ACROSS THE TOP OF THE PIPE.
5. CONSTRUCT SILT FENCE FROM A CONTINUOUS ROLL IF POSSIBLE BY CUTTING LENGTHS TO AVOID JOINTS. IF A JOINT IS NECESSARY USE ONE OF THE FOLLOWING TWO METHODS; A) OVERLAP THE END POSTS AND TWIST, OR ROTATE, AT LEAST 180 DEGREES, B) HOOK THE END OF EACH SILT FENCE LENGTH.



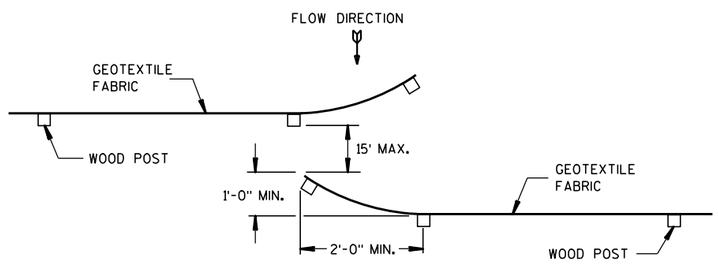
TRENCH DETAIL



SILT FENCE

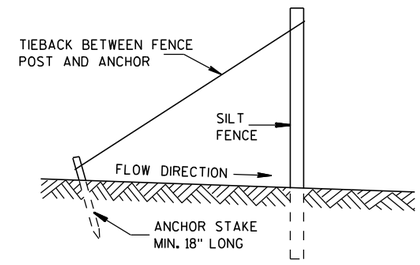


TWIST METHOD



HOOK METHOD

JOINING TWO LENGTHS OF SILT FENCE 5



SILT FENCE TIE BACK

(WHEN REQUIRED BY THE ENGINEER)

SILT FENCE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

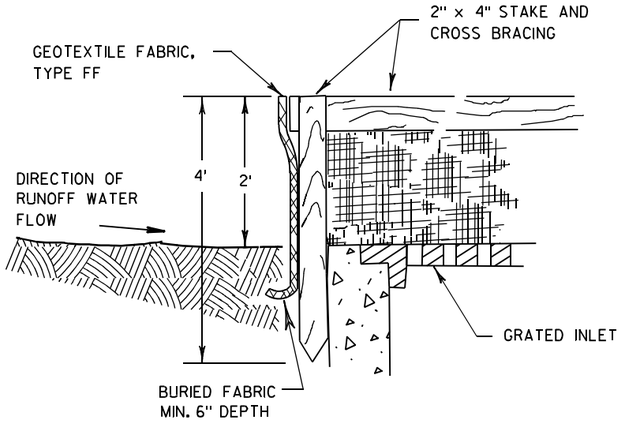
APPROVED
4-29-05 DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

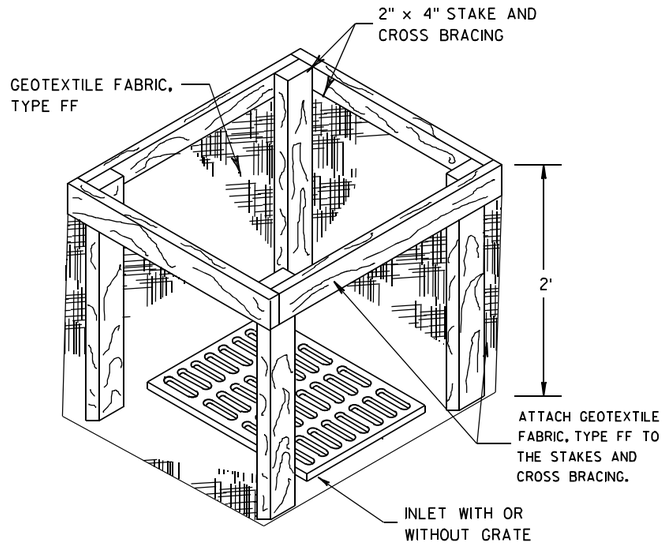
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S.D.D. 8 E 9-6

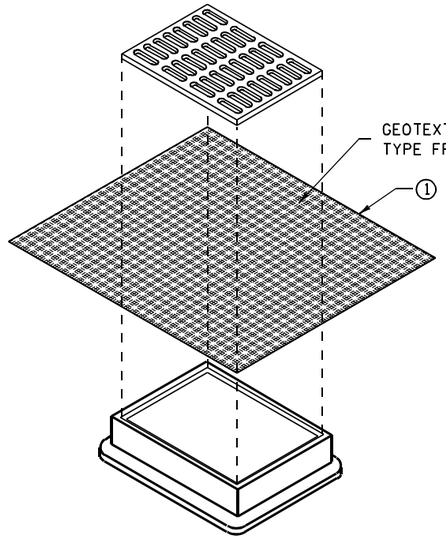
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S.D.D. 8 E 9-6



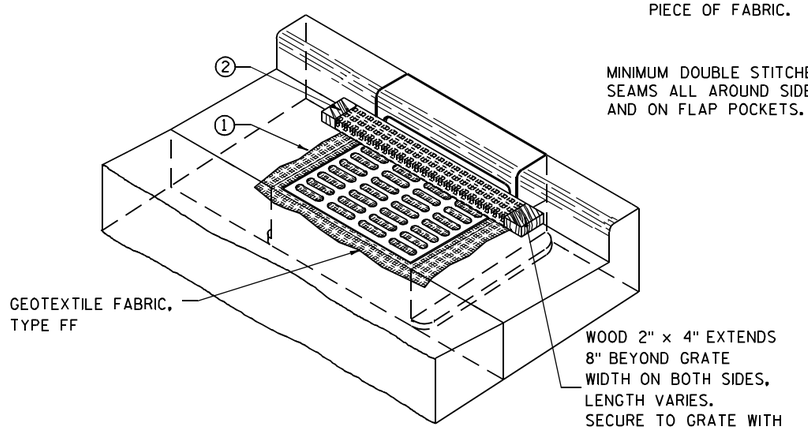


INLET PROTECTION, TYPE A

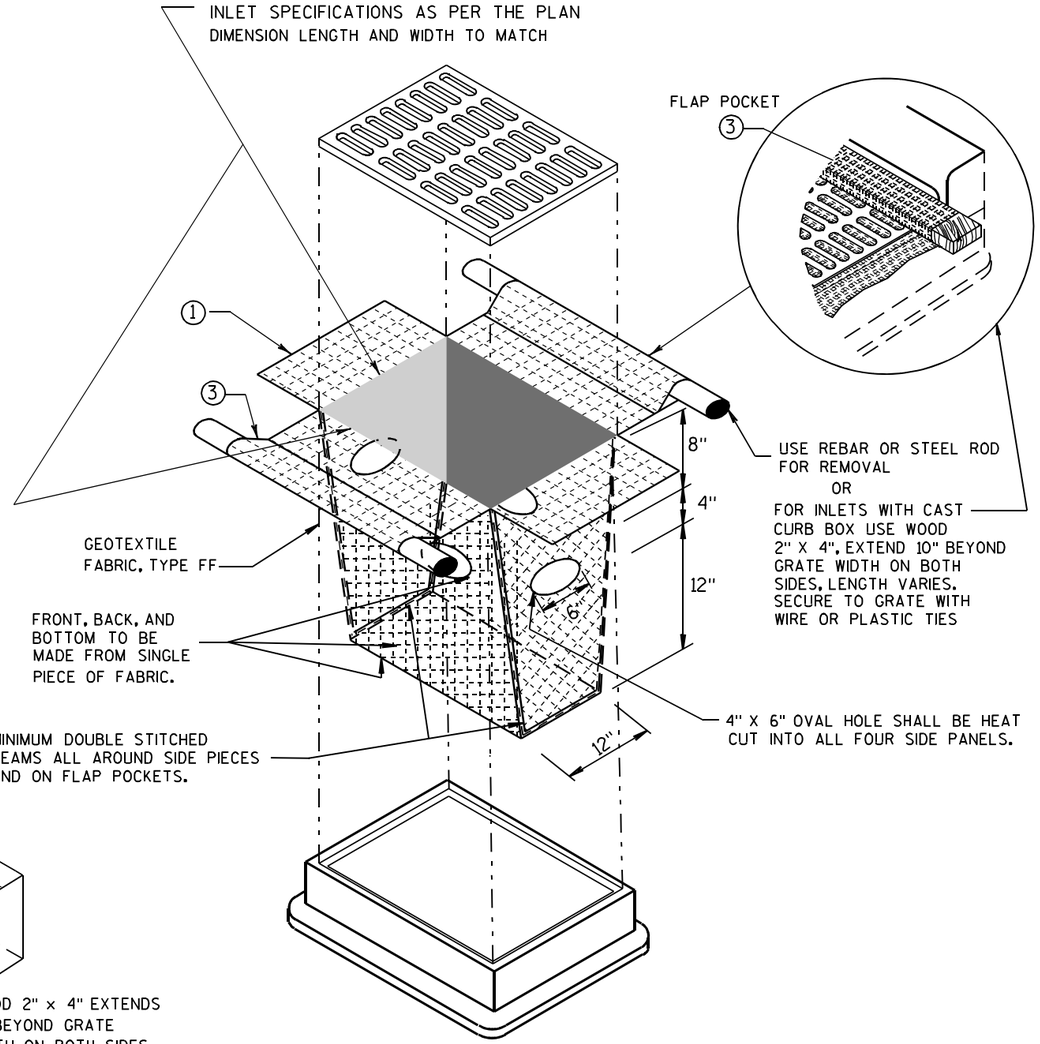


INLET PROTECTION, TYPE B
(WITHOUT CURB BOX)

(CAN BE INSTALLED IN ANY INLET WITHOUT A CURB BOX)



INLET PROTECTION, TYPE C (WITH CURB BOX)



INLET PROTECTION, TYPE D

(CAN BE INSTALLED IN ANY INLET TYPE WITH
OR WITHOUT A CURB BOX AS PER NOTE ②)

GENERAL NOTES

INLET PROTECTION DEVICES SHALL BE MAINTAINED OR REPLACED AT THE DIRECTION OF THE ENGINEER.

MANUFACTURED ALTERNATIVES APPROVED AND LISTED ON THE DEPARTMENT'S EROSION CONTROL PRODUCT ACCEPTABILITY LIST MAY BE SUBSTITUTED.

WHEN REMOVING OR MAINTAINING INLET PROTECTION, CARE SHALL BE TAKEN SO THAT THE SEDIMENT TRAPPED ON THE GEOTEXTILE FABRIC DOES NOT FALL INTO THE INLET. ANY MATERIAL FALLING INTO THE INLET SHALL BE REMOVED IMMEDIATELY.

① FINISHED SIZE, INCLUDING FLAP POCKETS WHERE REQUIRED, SHALL EXTEND A MINIMUM OF 10" AROUND THE PERIMETER TO FACILITATE MAINTENANCE OR REMOVAL.

② FOR INLET PROTECTION, TYPE C (WITH CURB BOX), AN ADDITIONAL 18" OF FABRIC IS WRAPPED AROUND THE WOOD AND SECURED WITH STAPLES. THE WOOD SHALL NOT BLOCK THE ENTIRE HEIGHT OF THE CURB BOX OPENING.

③ FLAP POCKETS SHALL BE LARGE ENOUGH TO ACCEPT WOOD 2X4.

INSTALLATION NOTES

TYPE B & C

TRIM EXCESS FABRIC IN THE FLOW LINE TO WITHIN 3" OF THE GRATE.

THE CONTRACTOR SHALL DEMONSTRATE A METHOD OF MAINTENANCE, USING A SEWN FLAP, HAND HOLDS OR OTHER METHOD TO PREVENT ACCUMULATED SEDIMENT FROM ENTERING THE INLET.

TYPE D

DO NOT INSTALL INLET PROTECTION TYPE D IN INLETS SHALLOWER THAN 30", MEASURED FROM THE BOTTOM OF THE INLET TO THE TOP OF THE GRATE.

TRIM EXCESS FABRIC IN THE FLOW LINE TO WITHIN 3" OF THE GRATE.

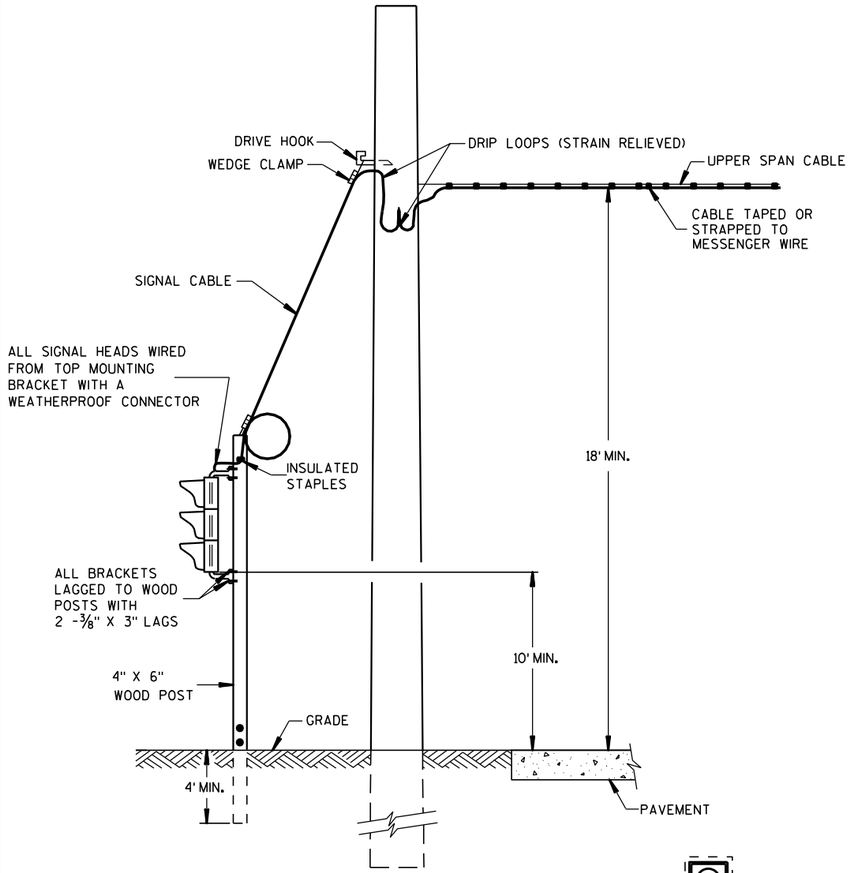
THE INSTALLED BAG SHALL HAVE A MINIMUM SIDE CLEARANCE, BETWEEN THE INLET WALLS AND THE BAG, MEASURED AT THE BOTTOM OF THE OVERFLOW HOLES, OF 3". WHERE NECESSARY THE CONTRACTOR SHALL CINCH THE BAG, USING PLASTIC ZIP TIES, TO ACHIEVE THE 3" CLEARANCE. THE TIES SHALL BE PLACED AT A MAXIMUM OF 4" FROM THE BOTTOM OF THE BAG.

INLET PROTECTION
TYPE A, B, C, AND D

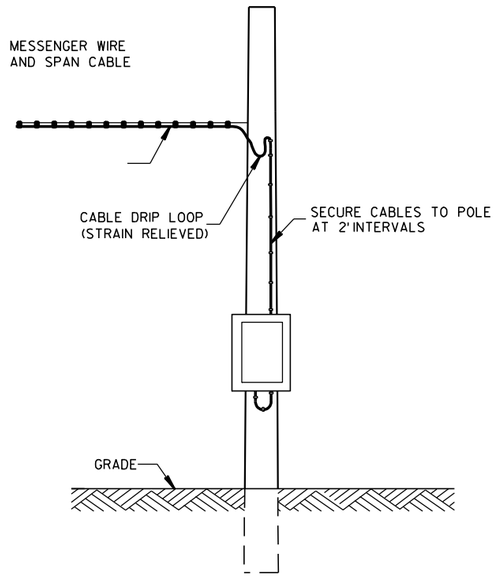
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
10/16/02
DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

6
S.D.D. 8 E 10-2



TYPICAL DROP TO TRAFFIC SIGNAL FACE



POLE MOUNT CABINET INSTALLATION

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE CONTRACT.

POLE MOUNTED TRAFFIC SIGNAL CONTROL CABINET MAYBE MOUNTED ON THE SERVICE POLE IF THE ELECTRICAL UTILITY ALLOWS THE INSTALLATION.

WHEN UTILITY PLOLES ARE USED TO SPAN THE TEMPORARY OVERHEAD CABLE, WRITTEN PERMISSION MUST BE OBTAINED FROM THE OWNER OF THE POLES AND GIVEN TO THE PROJECT MANAGER. ALL PERTINENT UTILITY AND CODE CLEARANCES SHALL BE MAINTAINED.

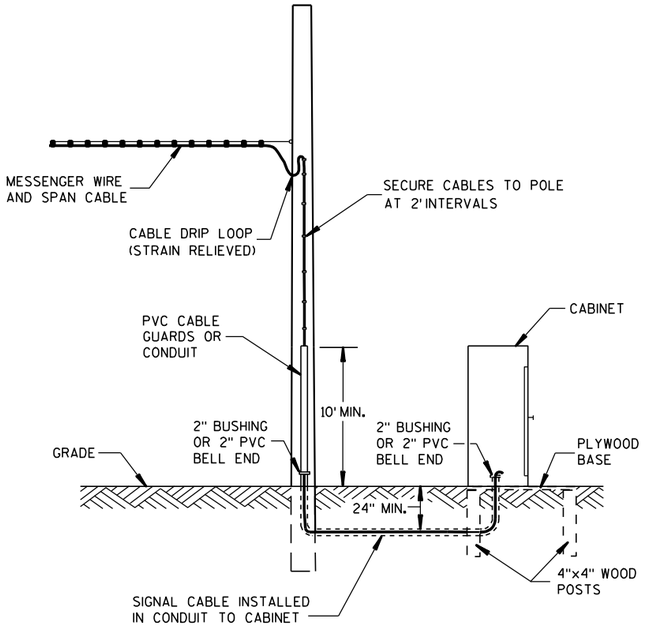
WOOD POLES (NONBREAKAWAY) SHALL BE NO CLOSER TO EDGE OF PAVEMENT THAN OFFSET DISTANCE CHART ALLOWS OR 4 FEET BEHIND PROTECTIVE BARRIER (BEAMGUARD, ETC.).

WOOD POSTS (BREAKAWAY) SHALL BE NO CLOSER THAN 2 FEET OUTSIDE OF SHOULDER.

VERTICAL CLEARANCE ETC. PER NEC.

TRAFFIC SIGNAL FACES SHALL BE TYPICALLY PLACED 12 FEET FROM EDGE OF PAVEMENT.

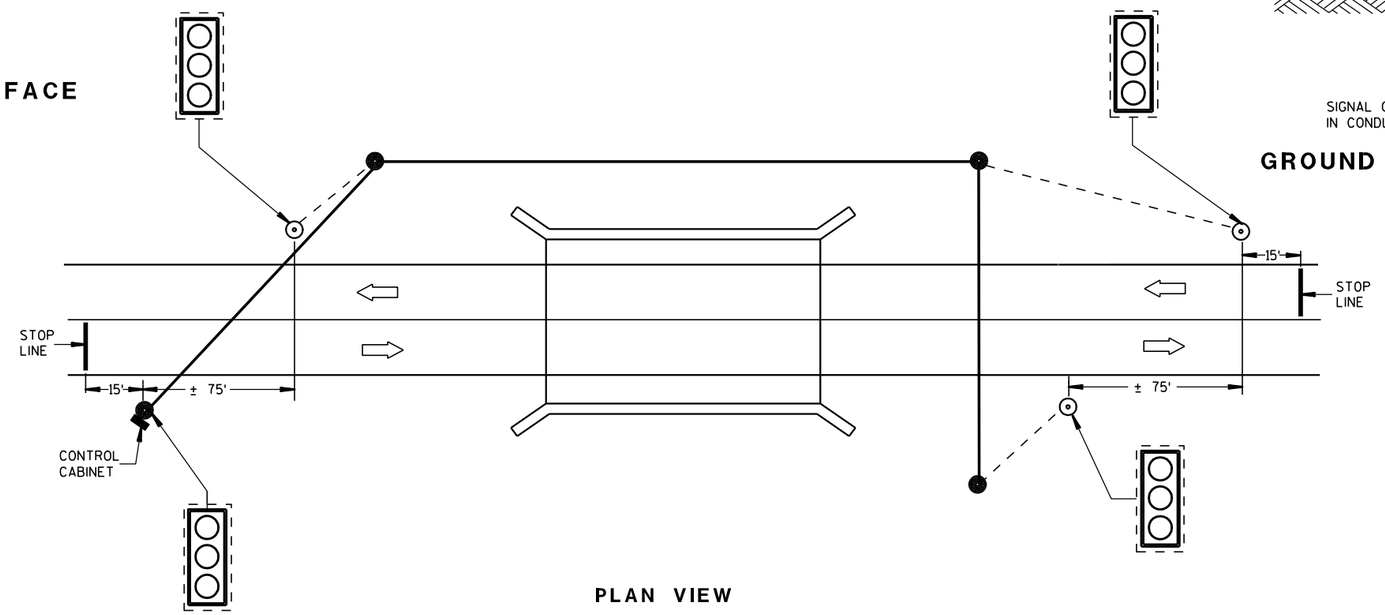
EACH TRAFFIC SIGNAL FACE SHALL HAVE A BACKPLATE.



GROUND MOUNT CABINET INSTALLATION

OFFSET DISTANCES FOR TEMPORARY NON-BREAKAWAY POLES	
SPEED LIMIT	OFFSET DISTANCE**
GREATER THAN 45 MPH	18 FT
45 MPH OR LESS	12 FT
45 MPH OR LESS W/ CURBS	2 FT

**NOTE: OFFSET MEASURED FROM OUTER EDGE OF OUTSIDE THRU LANE.



PLAN VIEW

TYPICAL BRIDGE TEMPORARY TRAFFIC SIGNAL LOCATION

LEGEND

- WOOD POLE (NONBREAKAWAY)
- WOOD POST (BREAKAWAY)
- SIGNAL CABLE
- SIGNAL CABLE W/MESSENGER
- LED TRAFFIC SIGNAL FACE WITH BACKPLATE (3-12")
- DIRECTION OF TRAFFIC

MINIMUM POLE LENGHTS	CLASS	MINIMUM BURIAL DEPTHS
25 FEET	V	5 FEET
30 FEET	V	6 FEET
35 FEET	IV	7 FEET
40 FEET	IV	8 FEET
45 FEET	IV	9 FEET

BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

3/2/2011 DATE — /S/ Thomas J. Gosling STATE ELECTRICAL ENGI — HWYS

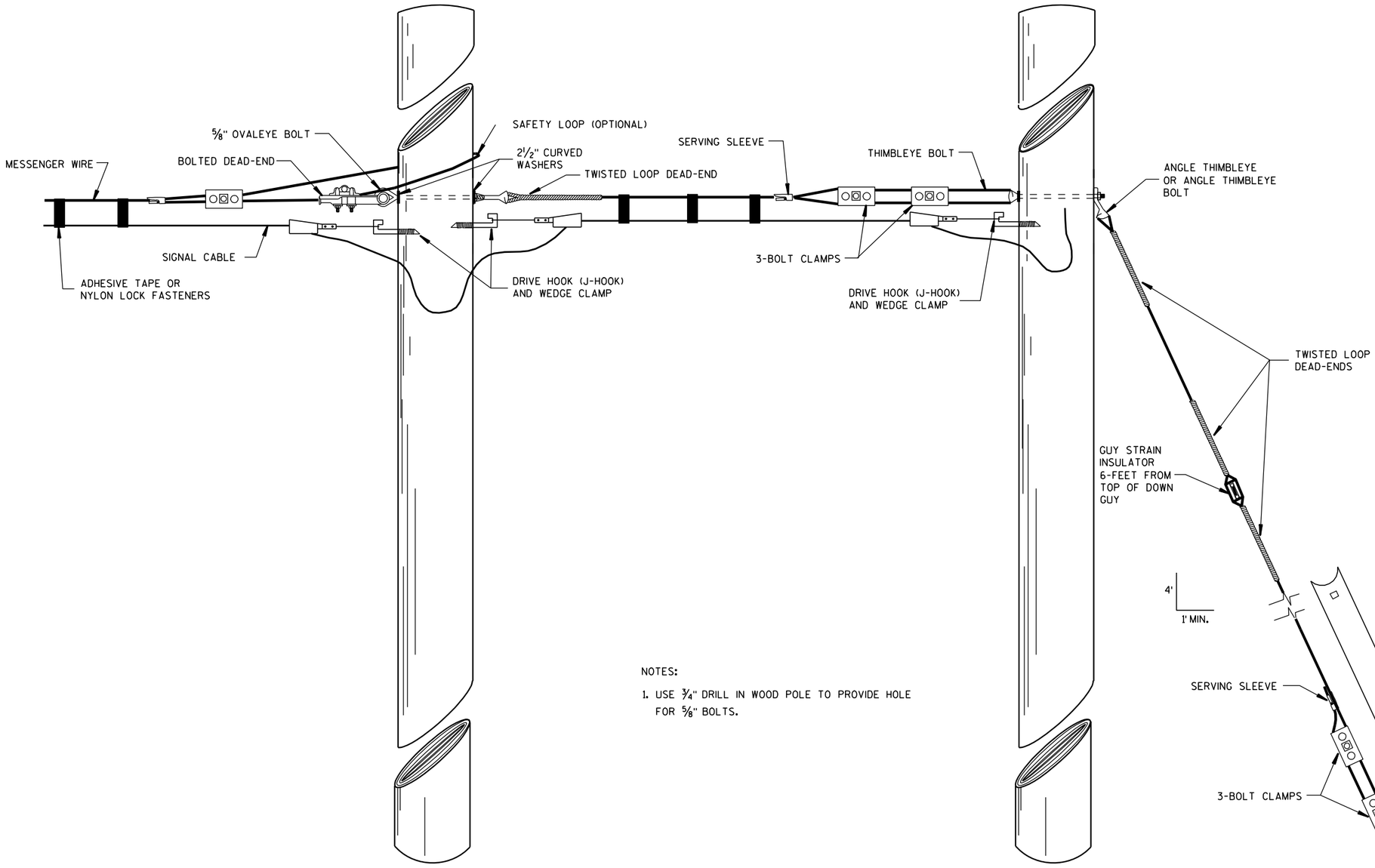
FHWA

6

S.D.D. 9 G 2-3a

6

S.D.D. 9 G 2-3a



SPAN WIRE POLE

GUY POLE

NOTES:

1. USE 3/4" DRILL IN WOOD POLE TO PROVIDE HOLE FOR 5/8" BOLTS.

TYPICAL DEAD-ENDINGS OR GUYING

BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

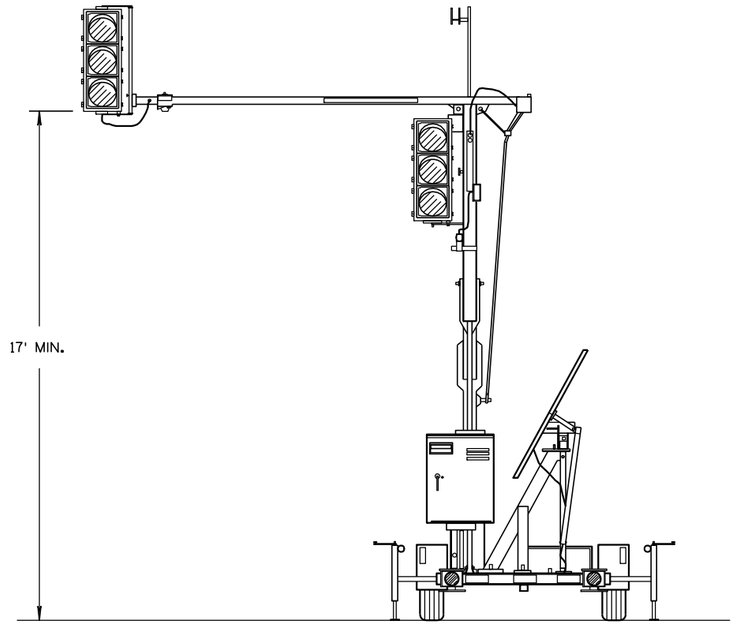
APPROVED

3/2/2011 DATE — /S/ Thomas J. G... STATE ELECTRICAL ENGI — HWYS

FHWA

6

S.D.D. 9 G 2-3b

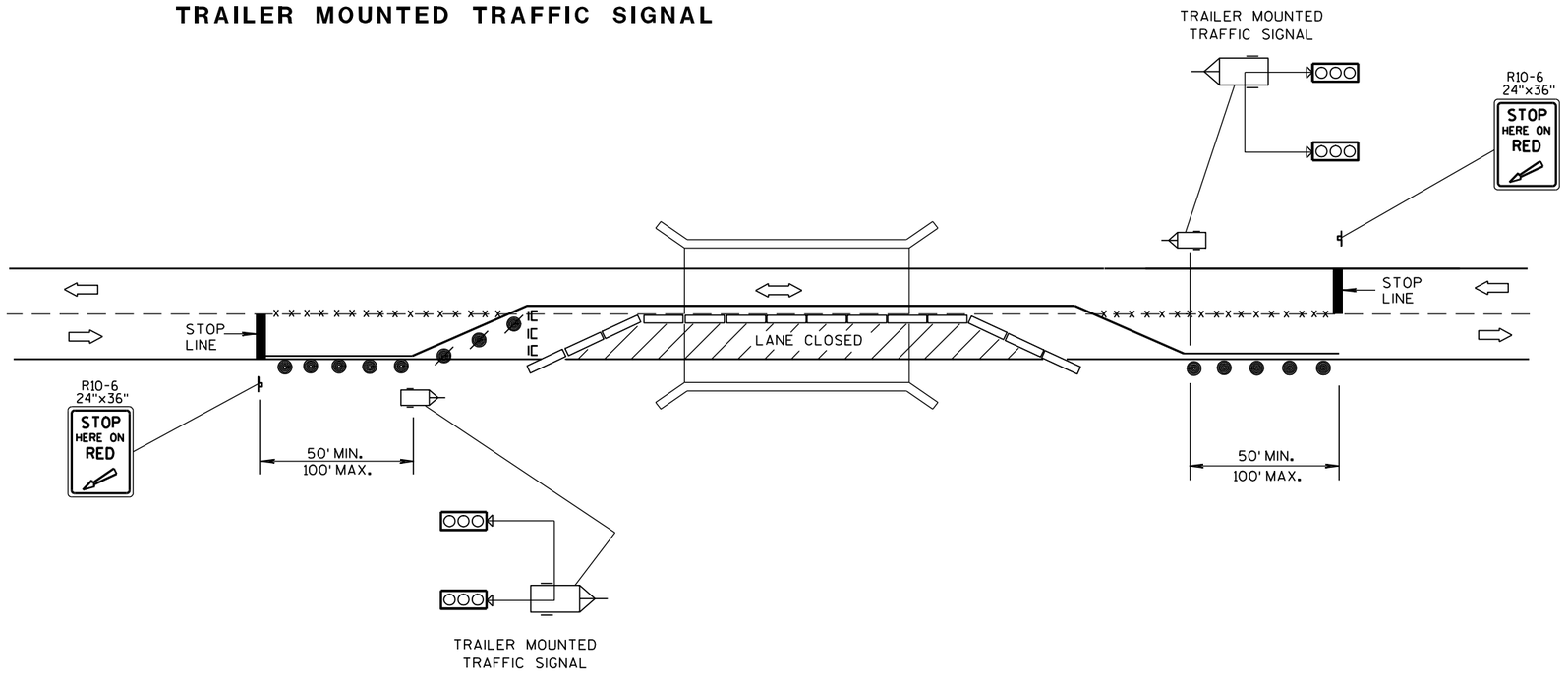


TRAILER MOUNTED TRAFFIC SIGNAL

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE CONTRACT.

SIGNING, PAVEMENT MARKING AND LANE CONTROL REQUIREMENTS SHALL CONFORM TO STANDARD DETAIL DRAWING 15 D 33.



TYPICAL TRAILER MOUNTED TRAFFIC SIGNAL LOCATION

LEGEND

- POST MOUNTED SIGN
- REMOVING PAVEMENT MARKING
- TYPE III BARRICADE WITH SIGN
- DRUM WITH/WITHOUT WARNING LIGHT, TYPE C (STEADY-BURN)
- TEMPORARY PRECAST CONCRETE BARRIER
- TRAILER MOUNTED TRAFFIC SIGNAL
- DIRECTION OF TRAFFIC FLOW

BRIDGE TEMPORARY TRAFFIC SIGNAL INSTALLATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

3/2/2011 — DATE

/S/ Thomas J. Gosling — STATE ELECTRICAL ENGI

FHWA

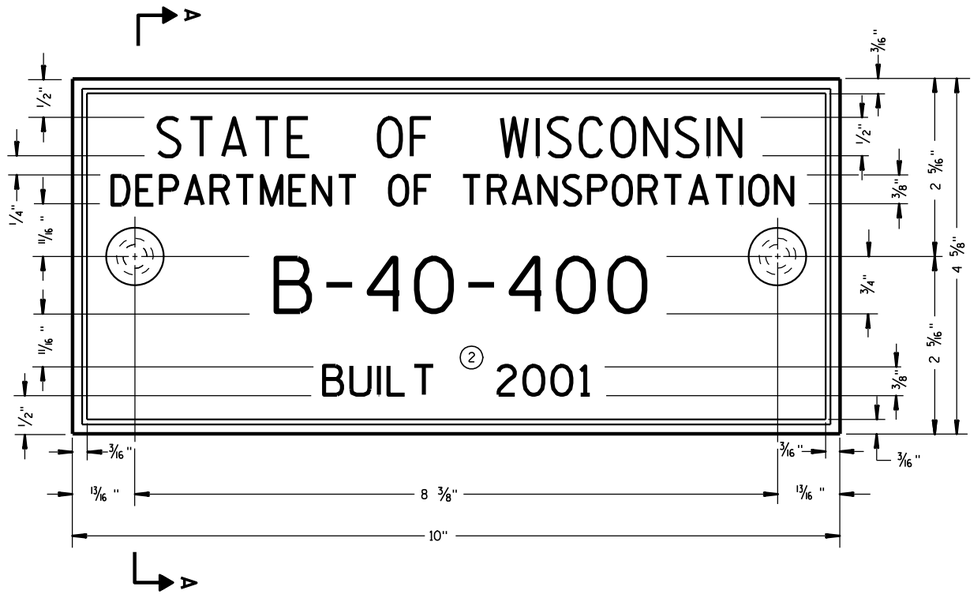
HWYS

6

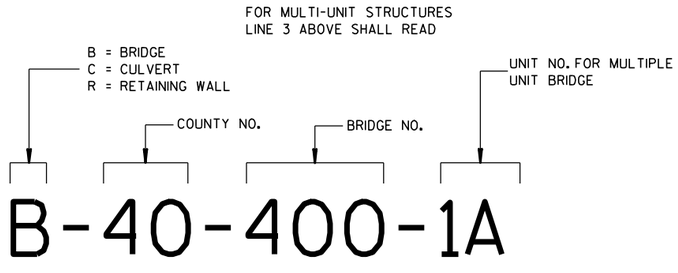
S.D.D. 9 G 2-3c

6

S.D.D. 9 G 2-3c



TYPICAL NAME PLATE
(BRIDGES, CULVERTS, AND RETAINING WALLS)



NUMBERING DESIGNATION
MULTI-UNIT STRUCTURES

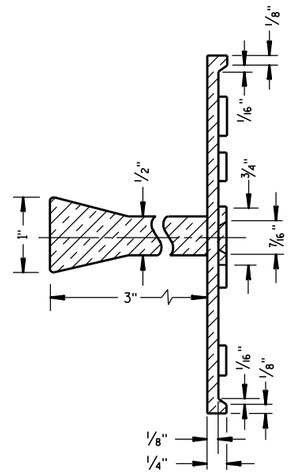
GENERAL NOTES

NAME PLATES TO BE INSTALLED ON BRIDGES, CULVERTS, AND RETAINING WALLS SHALL CONFORM TO THE REQUIREMENTS OF SECTION 502.3.11 OF THE STANDARD SPECIFICATIONS.

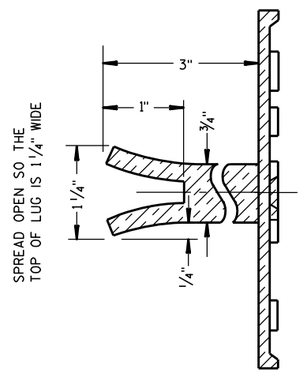
THE BRIDGE NUMBER AND YEAR BUILT SHOWN ON THIS DRAWING ARE EXAMPLES ONLY. SEE CONSTRUCTION PLANS FOR INDIVIDUAL NUMBERING AND YEAR BUILT.

(1) EPOXY RESIN SHALL BE FROM AN APPROVED MANUFACTURER AND USED IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS.

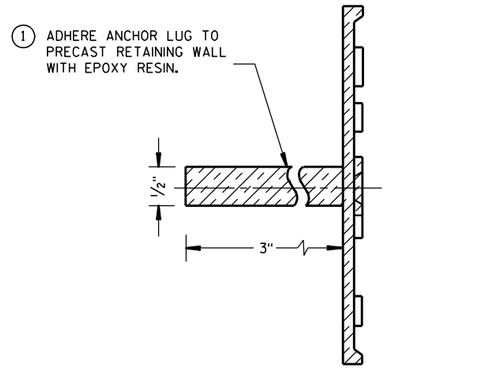
(2) REHABILITATION OF AN EXISTING STRUCTURE SHOULD USE THE DATE OF ORIGINAL STRUCTURE CONSTRUCTION.



SECTION A-A



ALTERNATE LUG



ALTERNATE LUG
(FOR ATTACHMENT TO PRECAST STRUCTURES)

NAME PLATE (STRUCTURES)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

3/26/10 DATE — /S/ Scot Beck — CHIEF STRUCTURAL DEVELOPMENT ENGINEER

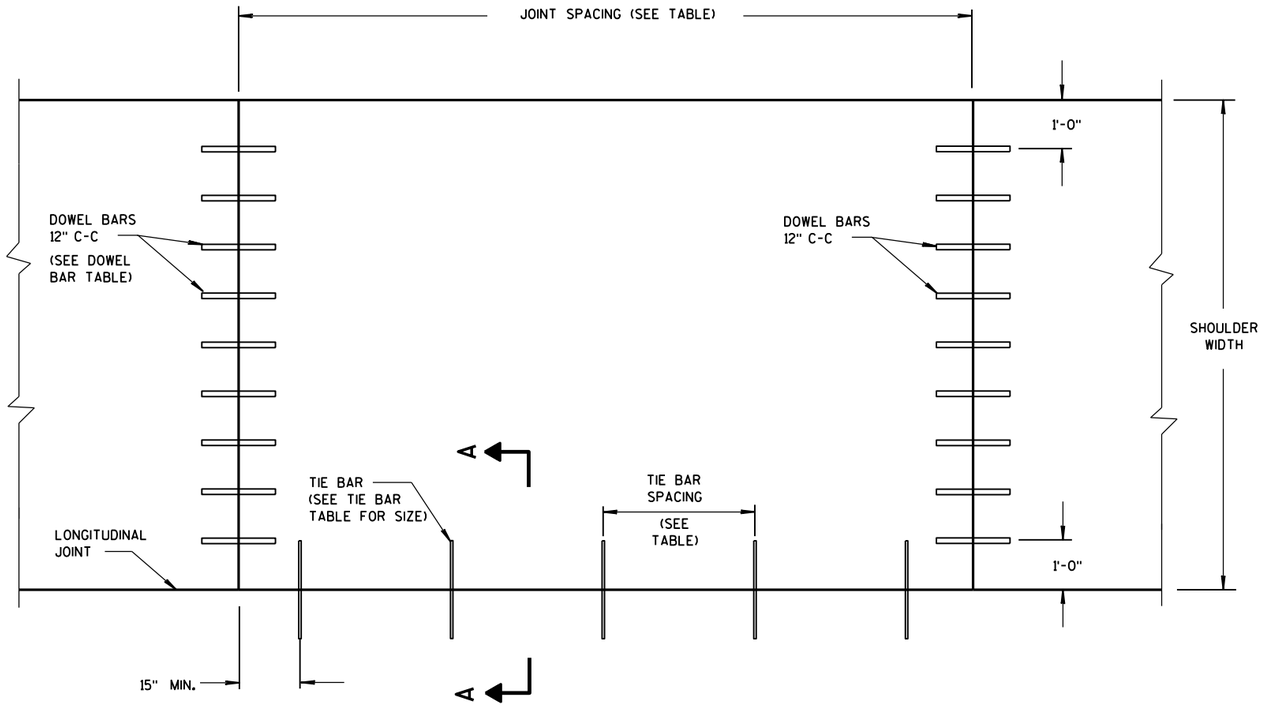
FHWA

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S.D.D. 12 A 3-10

6

S.D.D. 12 A 3-10



PLAN VIEW

CONCRETE PAVEMENT SHOULDER

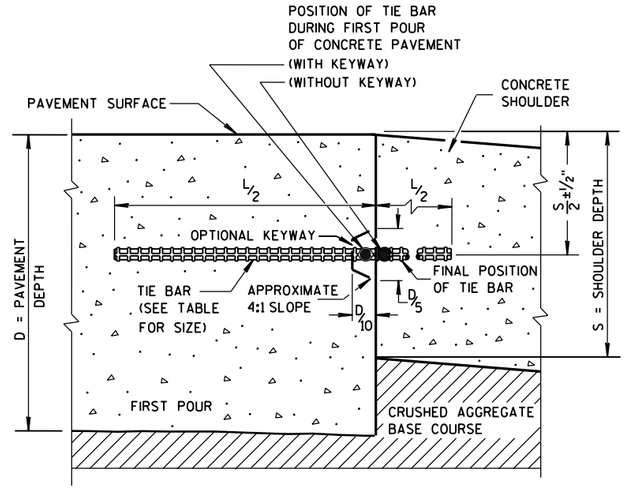
GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

TRANSVERSE JOINT DETAILS ARE SHOWN ELSEWHERE IN THE PLAN.

FINISH THE SHOULDER PAVEMENT CONFORMING TO SUBSECTION 415.3.8 OF THE STANDARD SPECIFICATIONS.

TIE BARS SHALL CONFORM TO SUBSECTION 505.2.4 OF THE STANDARD SPECIFICATIONS.



SECTION A-A

LONGITUDINAL CONSTRUCTION JOINT

TIE BAR TABLE

PAVEMENT DEPTH (D)	TIE BAR SIZE	TIE BAR LENGTH (L)	MAX. TIE BAR SPACING
< 10 ½"	NO. 4	30"	36"
≥ 10 ½"	NO. 5	36"	36"
	NO. 4*	30"	24"**

* SUBSTITUTE BENT BARS AT LONGITUDINAL JOINTS WHEN EQUIPMENT LIMITATIONS DURING CONSTRUCTION WARRANT (e.g. AUXILIARY LANES OR TURN LANES)

** CONFORM TO 15" MINUMUM SPACING FROM TRANSVERSE JOINTS; SPACING BETWEEN TIE BARS WILL BE 30" AT TRANSVERSE JOINTS.

PAVEMENT DEPTH, DOWEL BAR SIZE AND JOINT SPACING TABLE

PAVEMENT DEPTH (D)	DOWEL BAR DIAMETER***	CONTRACTION JOINT SPACING
5 ½", 6", 6 ½"	NONE	12'
7", 7 ½"	1"	14'
8", 8 ½"	1 ¼"	15'
9", 9 ½"	1 ¼"	15'
10" & ABOVE	1 ½"	15'

*** FOR DOWELED CONCRETE SHOULDERS WITH TRAPEZOIDAL CROSS SECTIONS, CHOSE THE APPROPRIATE DOWEL BAR DIAMETER BASED ON THE SMALLER PAVEMENT DEPTH (LIKELY THE OUTSIDE EDGE OF THE SHOULDER). IF USING BASKETS, USE BASKETS FOR THE AVERAGE THICKNESS OF THE CROSS SECTION.

CONCRETE PAVEMENT SHOULDERS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

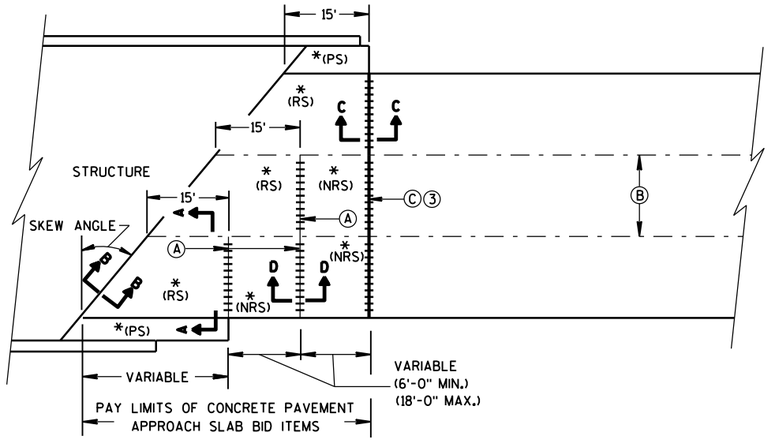
APPROVED
June, 2015 — DATE
/S/ Peter Kemp, P.E. — PAVEMENT SUPER
FHWA

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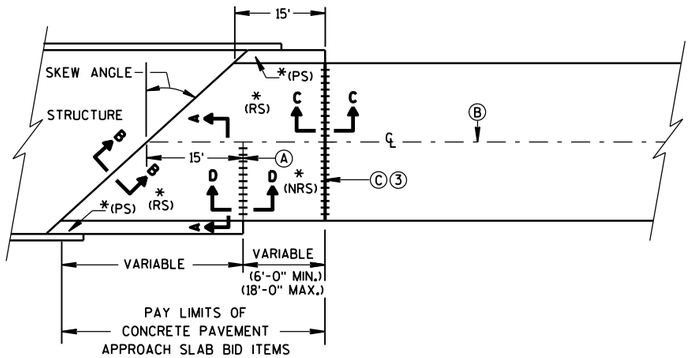
S.D.D. 13 A 3-6

6

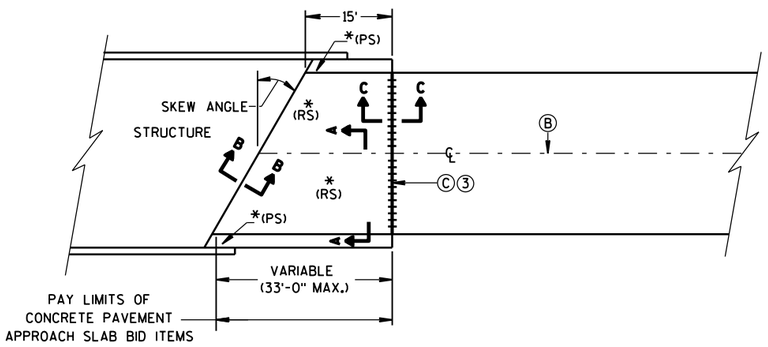
S.D.D. 13 A 3-6



SKEWED APPROACH
(PAVEMENT MORE THAN 2 LANES)



SKEWS >20°
(PAVEMENT WIDTH ≤30')



SKEWS ≤20°
(PAVEMENT WIDTH ≤30')

APPROACH SLAB AND ADJACENT PAVEMENT

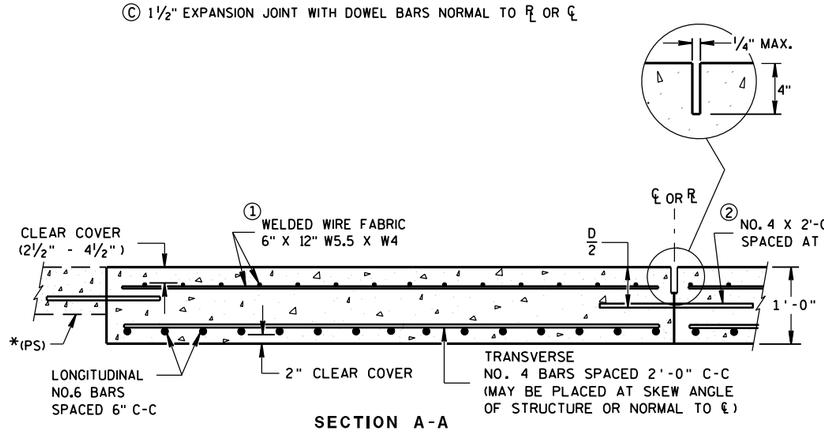
*(RS) = REINFORCED CONCRETE SLAB
*(PS) = PAVED CONCRETE SHOULDER OR CONCRETE DRAINAGE SLAB
(SEE DETAILS ELSEWHERE IN THE PLAN)
*(NRS) = NON-REINFORCED CONCRETE SLAB

***STANDARD DOWEL BAR DIAMETER
(SEE SDD 13C11, & SDD 13C13)

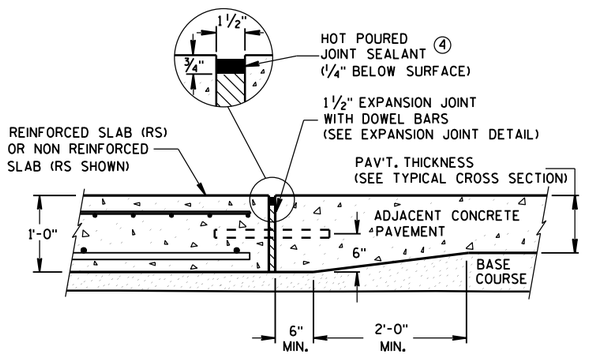
Ⓐ STANDARD CONTRACTION JOINT NORMAL TO ℄ OR ℄

Ⓑ STANDARD LONGITUDINAL JOINT WITH TIE BARS.

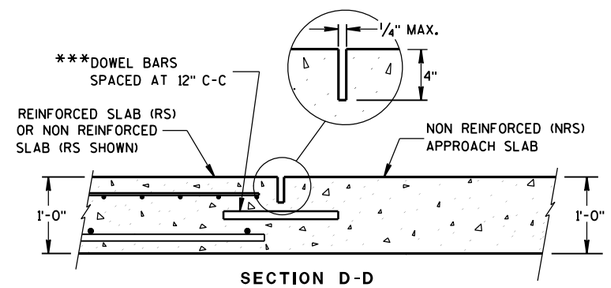
Ⓒ 1½" EXPANSION JOINT WITH DOWEL BARS NORMAL TO ℄ OR ℄



SECTION A-A
REINFORCEMENT POSITIONING DETAIL



SECTION C-C
TRANSITION DETAIL
APPROACH SLAB TO ADJACENT PAVEMENT



SECTION D-D
CONTRACTION JOINT

GENERAL NOTES

THE CONTRACTOR MAY SPLICE NO. 6 BARS IN THE APPROACH SLAB FOR SKEWED STRUCTURES ONLY. STAGGER SPLICES WITH A MAXIMUM OF ONE SPLICE PER BAR. THE LENGTH OF LAP IS 20 INCHES.

TACK WELD DOWEL BARS TO THE BASKETS ON ALTERNATE ENDS.

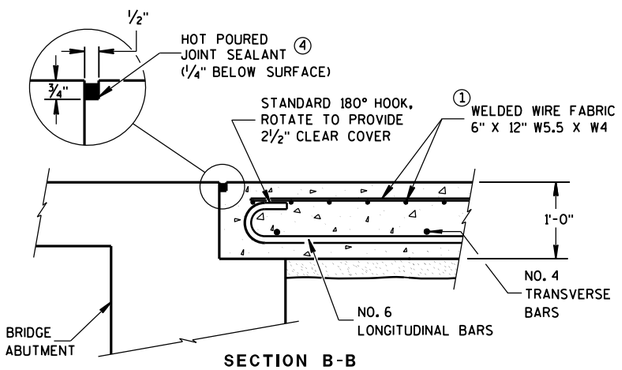
① THE CONTRACTOR MAY USE NO. 4 BARS SPACED AT 2'-0" C-C IN BOTH THE LONGITUDINAL AND TRANSVERSE DIRECTIONS FOR TOP REINFORCEMENT AS AN ALTERNATIVE TO THE WELDED WIRE FABRIC.

② THE CONTRACTOR MAY OMIT TIE BARS BETWEEN REINFORCED SLABS WHERE SLAB REINFORCEMENT BARS EXTEND ACROSS THE CENTERLINE OR REFERENCE LINE.

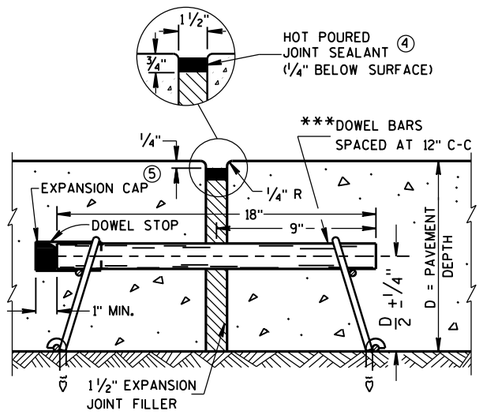
③ DO NOT CONSTRUCT AN EXPANSION JOINT OR INSTALL DOWEL BARS WHEN ABUTTING AN HMA PAVEMENT.

④ USE A JOINT SEALANT MEETING THE REQUIREMENTS OF ASTM D6690.

⑤ PLACE EXPANSION CAP ON THE END OF THE DOWEL THAT IS NOT TACK WELDED TO THE BASKET. DO NOT FORCE DOWEL BAR PAST THE DOWEL STOP.



SECTION B-B
BEND DETAIL
BOTTOM REINFORCEMENT



EXPANSION JOINT DETAIL

CONCRETE PAVEMENT APPROACH SLAB

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

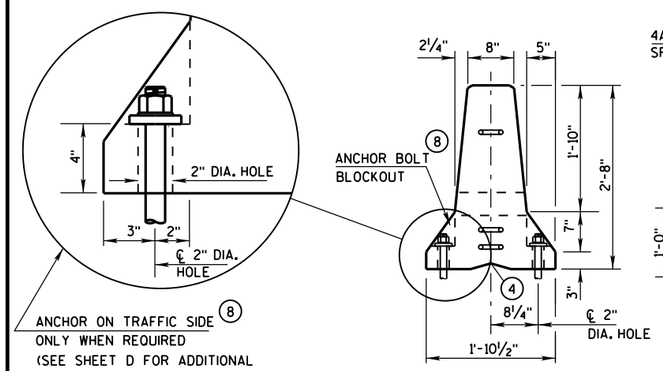
APPROVED
June, 2015
DATE
/S/ Peter Kemp, P.E.
PAVEMENT SUPER
FHWA

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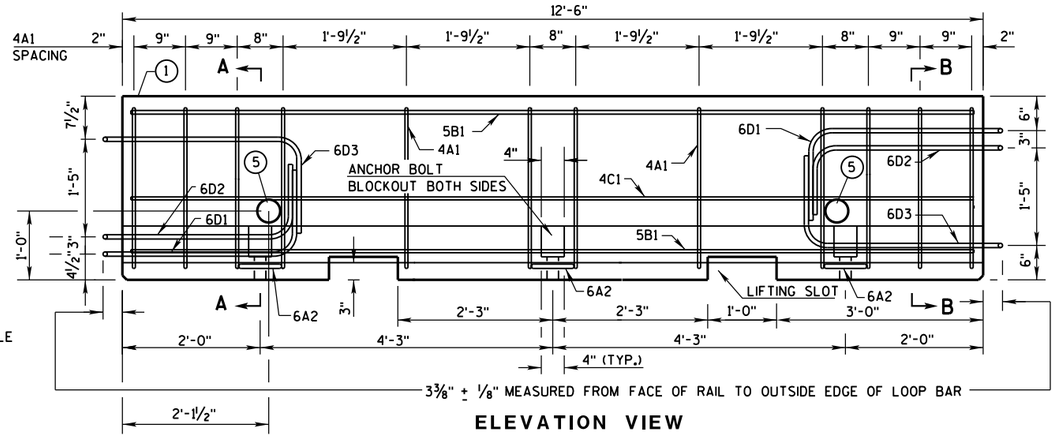
S.D.D. 13 B 2-8a

6

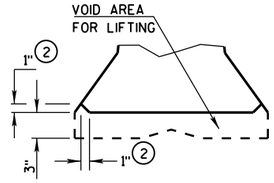
S.D.D. 13 B 2-8a



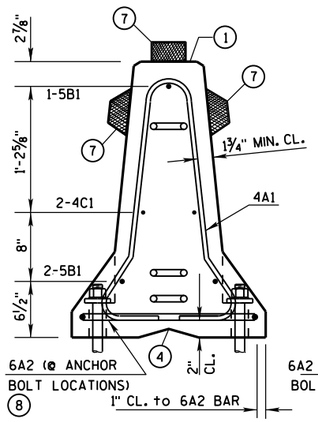
END VIEW



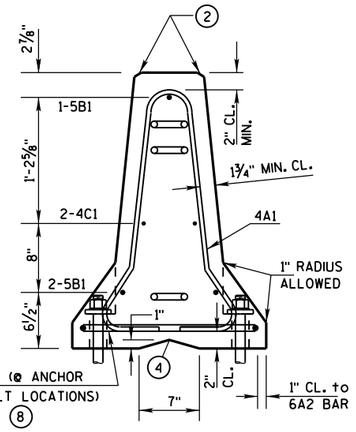
ELEVATION VIEW



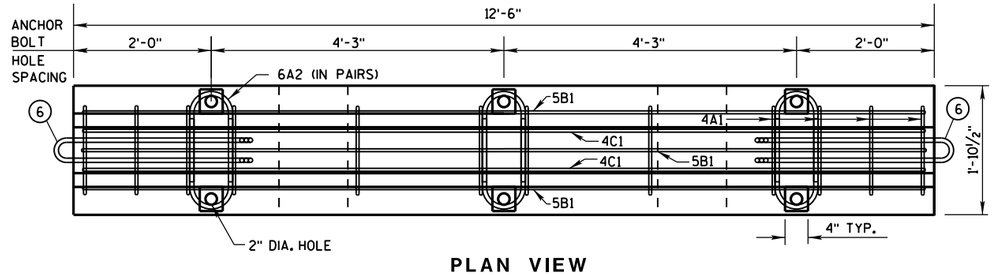
DETAIL "B"
LIFTING SLOT DETAIL



SECTION A-A
(STIRRUP PLACEMENT)



SECTION B-B
(STIRRUP PLACEMENT)



PLAN VIEW

DETAILS OF BARRIER SECTION

GENERAL NOTES

THESE GENERAL NOTES APPLY TO SHEETS 14B7-14(a) THRU 14B7-14(h).

DO NOT INTERMIX CONCRETE BARRIER TEMPORARY PRCAST, 12'-6" (CBTP12.5) WITH OTHER TEMPORARY CONCRETE BARRIERS.

USE ASTM A-615, GRADE 60, DEFORMED STEEL BARS FOR BARS 4A1, 6A2, 5B1 AND 4C1 IN THE BARRIER SECTION AND FOR 4V1, 4V2, 4V3, 4V4, 4V5, 4V6, 4F1, 4F2 AND 5F3 IN THE BARRIER TAPER SECTION.

LOOP BARS 6D1, 6D2 AND 6D3 SHALL BE ¾" SMOOTH STEEL BARS WITH A MINIMUM YIELD STRENGTH OF 60 KSI, A TENSILE STRENGTH OF NOT LESS THAN 1.25 TIMES THE YIELD STRENGTH BUT A MINIMUM OF 80 KSI, A MINIMUM 14% ELONGATION IN 8 INCHES AND PASSING A 180 DEGREE BEND TEST USING A 3-½" PIN BEND DIAMETER FOR BEND TESTS. THE LOOPS SHALL BE INSTALLED WITHIN ⅛" OF THE PLAN DIMENSION.

CONSTRUCT LIFTING SLOTS AS SPECIFIED ON THE PLANS TO FACILITATE THE DRAINAGE OF WATER AFTER INSTALLATION.

PLACE BARRIER ON A PAVED SURFACE. REMOVE ALL LOOSE DIRT AND SAND FROM THE ROADWAY SURFACE PRIOR TO PLACEMENT OF THE BARRIER.

INSTALL MECHANICAL OR ADHESIVE ANCHORS PER MANUFACTURER'S RECOMMENDATIONS. PROVIDE MANUFACTURER'S INFORMATION TO PROJECT ENGINEER.

(1) MARK ONE END OF EACH BARRIER PERMANENTLY BY FORMING INTO THE BARRIER THE FOLLOWING INFORMATION:
- a. TYPE: WI CBTP
- b. MANUFACTURER
- c. DATE MANUFACTURED (MONTH AND YEAR)

(2) 1" CHAMFER TO PREVENT SPALLING.

(3) A ⅜" HOLE IN THE CONNECTION PIN, AT THE LOCATION SHOWN, IS ACCEPTABLE, BUT NOT REQUIRED..

(4) "V" NOTCH IS OPTIONAL.

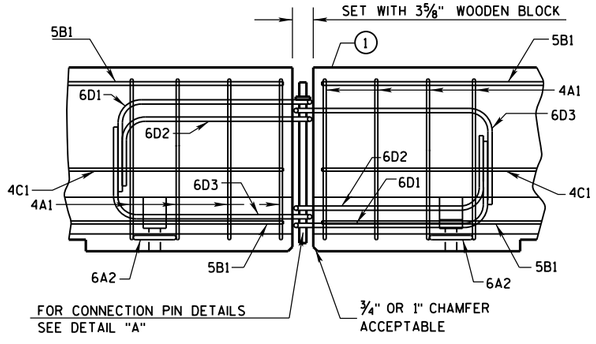
(5) THE 4" DIAMETER, 11 GAUGE STEEL, ROUND MECHANICAL TUBING SLEEVE FOR LIFTING (OPTIONAL).

(6) NEVER USE LOOP BARS (6D1, 6D2 OR 6D3) TO LIFT, MOVE OR REPOSITION THE BARRIER.

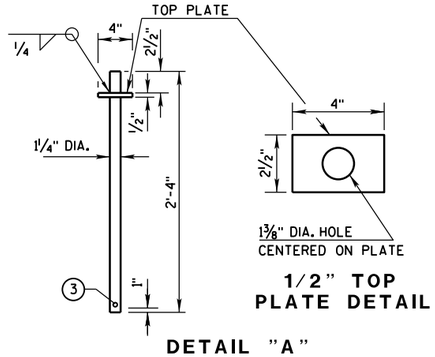
(7) USE DELINEATORS CONFORMING TO SECTION 633 OF THE STANDARD SPECIFICATIONS. CONTRACTOR MAY USE ALTERNATE SHAPES AND HOUSING. INSTALL DELINEATORS ACCORDING TO MANUFACTURES INSTRUCTION. INSTALL YELLOW REFLECTORS WHEN BARRIER IS LOCATED TO THE LEFT OF TRAFFIC AND WHITE REFLECTORS WHEN BARRIER IS LOCATED TO THE RIGHT OF TRAFFIC. SPACE DELINEATORS A MAXIMUM OF 25 FEET APART. PROVIDE TOP MOUNTED DELINEATORS IN ADDITION TO THE SIDE MOUNTED DELINEATORS ON ALL BARRIER INSTALLATIONS LOCATED ON A CURVED ALIGNMENT LONGER THAN 200 FEET AND ON BARRIERS USED TO SEPARATE OPPOSING TRAFFIC.

(8) SEE SHEET D FOR ANCHORING CRITERIA.

(9) 1" CHAMFER OPTIONAL.

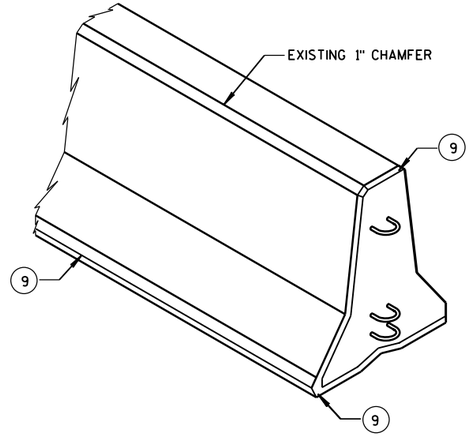


DETAILS OF BARRIER CONNECTION



1/2" TOP PLATE DETAIL

DETAIL "A"
CONNECTION PIN
(A36 STEEL (10.9 LB EACH))

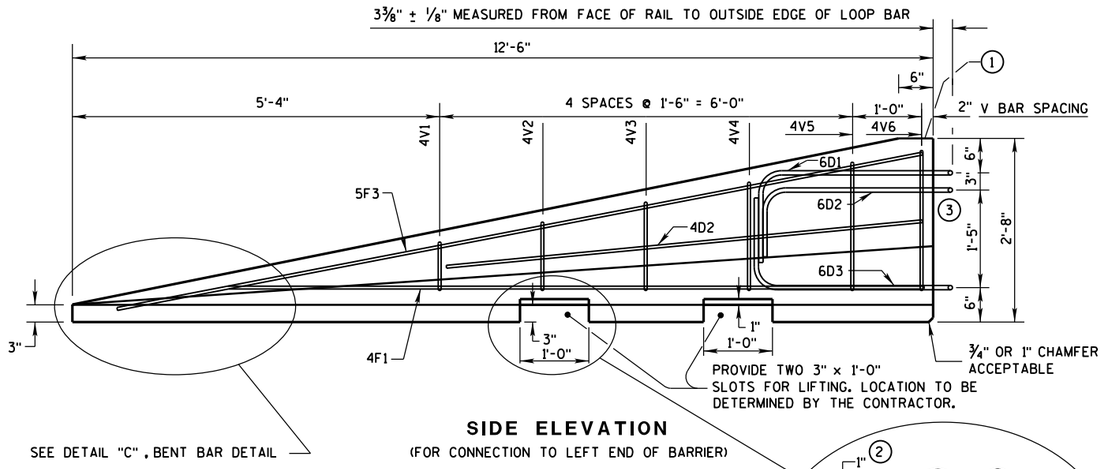


CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

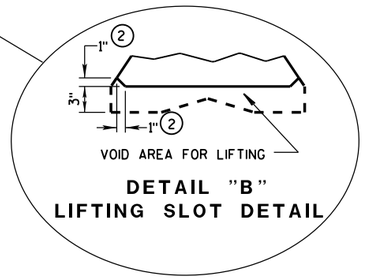
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

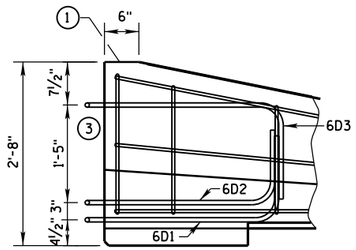
S.D.D. 14 B 7-14a



SIDE ELEVATION
(FOR CONNECTION TO LEFT END OF BARRIER)



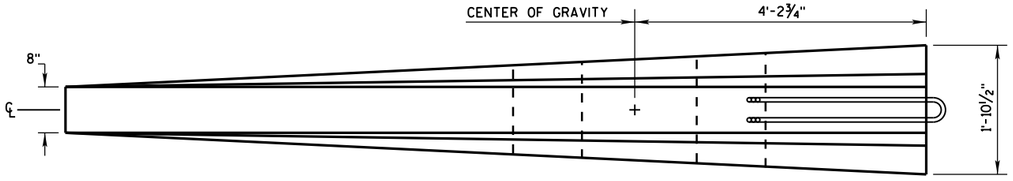
DETAIL "B"
LIFTING SLOT DETAIL



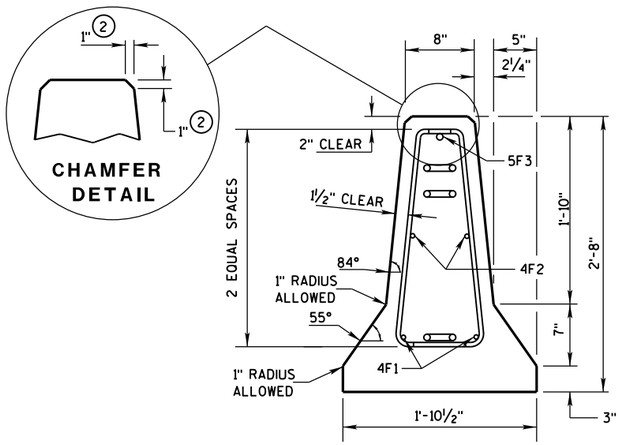
SIDE ELEVATION
LOOP BAR ASSEMBLY INVERTED
FOR OPPOSITE END.
(FOR CONNECTION TO RIGHT END OF BARRIER)

GENERAL NOTES

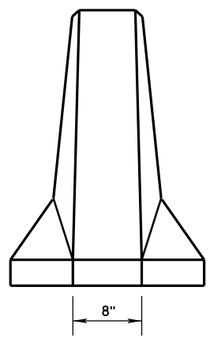
1. MARK ONE END OF EACH BARRIER PERMANENTLY BY FORMING INTO THE BARRIER THE FOLLOWING INFORMATION:
   a. TYPE WICBTP
   b. MANUFACTURER
   c. DATE MANUFACTURED (MONTH AND YEAR)
2. 1" CHAMFER TO PREVENT SPALLING.
3. NEVER USE LOOP BARS (6D1, 6D2 OR 6D3) TO LIFT, MOVE OR REPOSITION THE BARRIER.



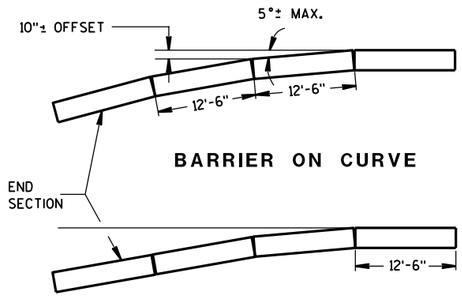
PLAN VIEW



END SECTION



FRONT ELEVATION



BARRIER ON CURVE

FLARE AT BARRIER END

POSTED SPEED, (MPH)	FLARE RATE
40 OR LESS	6:1
45 OR GREATER	8:1

DETAILS OF BARRIER TAPER SECTION

CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

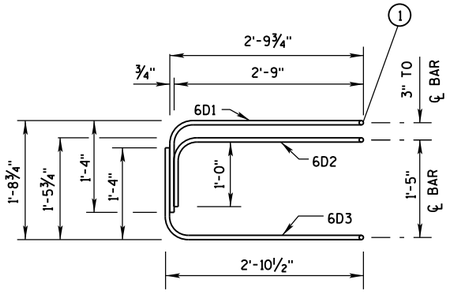
6

S.D.D. 14 B 7-14b

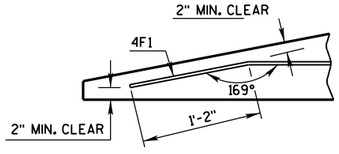
BARRIER TAPER SECTION BILL OF MATERIALS

(PER 12'-6" BARRIER TAPER SECTION)

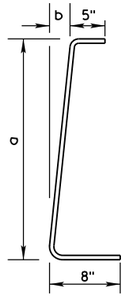
BAR	BAR SIZE	NO. OF BARS	LENGTH FT.
4V1	4	2	1'-11"
4V2	4	2	2'-2"
4V3	4	2	2'-6"
4V4	4	2	2'-9"
4V5	4	2	3'-2"
4V6	4	2	3'-4"
4F1	4	2	12'-0"
4F2	4	2	7'-6"
5F3	5	1	11'-9"
LOOP ASSEMBLY			
6D1	6	1	8'-5"
6D2	6	1	7'-7"
6D3	6	1	8'-6"



ELEVATION
LOOP BAR ASSEMBLY



DETAIL "C"
BENT BAR DETAIL



BAR	a	b
V1	10"	1"
V2	1'-1"	1¼"
V3	1'-5"	1⅝"
V4	1'-8"	1⅞"
V5	2'-0½"	2⅜"
V6	2'-3"	2¾"

4V BARS
2 AT EACH SIZE REQUIRED
FOR STIRRUP ASSEMBLY

TAPER BARRIER SECTION

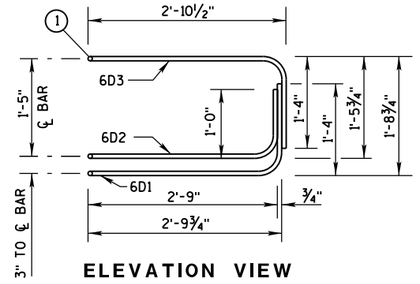
GENERAL NOTES

(1) NEVER USE LOOP BARS (6D1, 6D2 OR 6D3) TO LIFT, MOVE OR REPOSITION THE BARRIER.

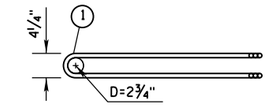
BARRIER SECTION BILL OF MATERIALS

(PER 12'-6" BARRIER SECTION)

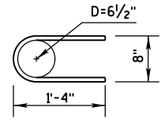
BAR	BAR SIZE	NO. OF BARS	LENGTH FT.
4A1	4	12	6'-0"
6A2	6	6	2'-11"
5B1	5	3	12'-2"
4C1	4	2	12'-2"
LOOP ASSEMBLY			
6D1	6	2	8'-5"
6D2	6	2	7'-7"
6D3	6	2	8'-6"



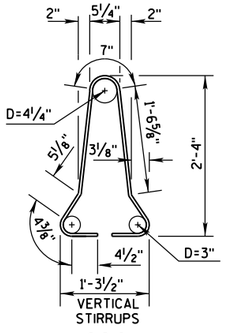
ELEVATION VIEW



PLAN VIEW
LOOP BAR ASSEMBLY
(MARKED END SHOWN, INVERT FOR OTHER END)



6A2



4A1

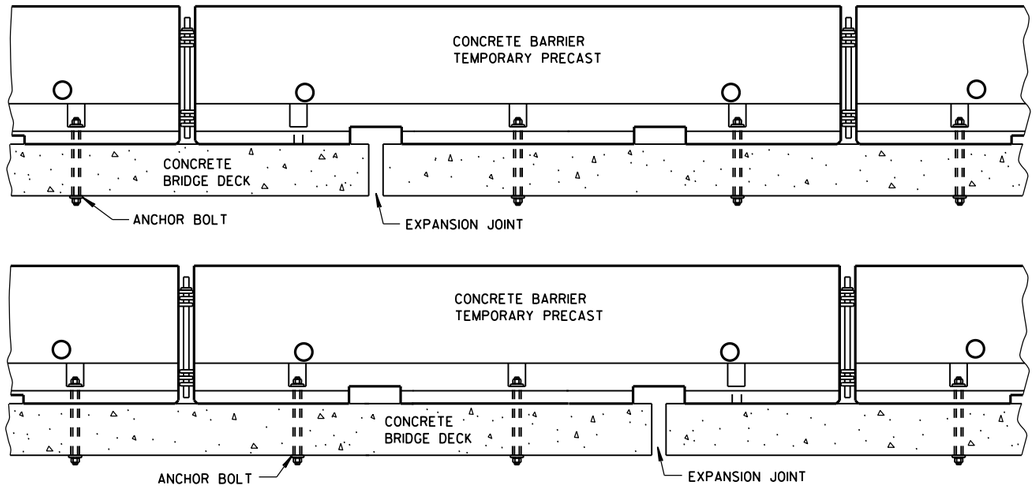
BARRIER SECTION

CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

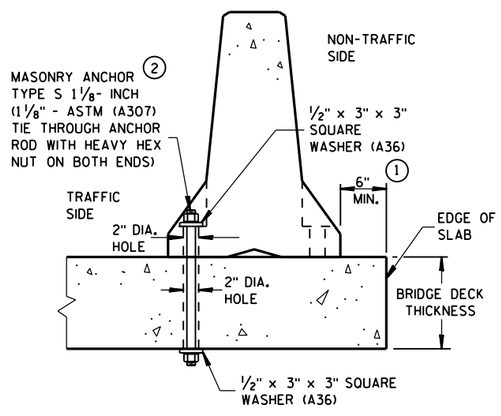
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S.D.D. 14 B 7-14c



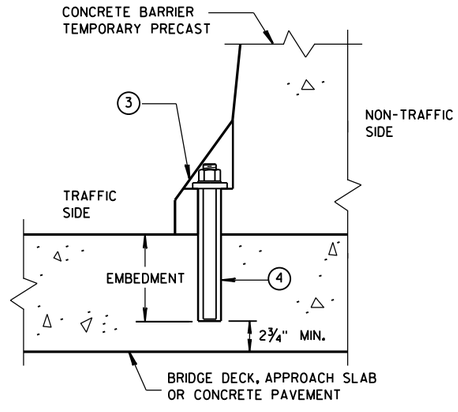
TREATMENT AT BRIDGE DECK EXPANSION JOINTS

(NO SINGLE CONCRETE BARRIER SECTION SHALL BE ANCHORED TO BOTH THE BRIDGE DECK AND THE APPROACH SLAB. ALL ANCHOR BOLT LOCATIONS SHALL BE ANCHORED TO THE DECK IN ACCORDANCE WITH THE DETAIL. NO MORE THAN ONE ANCHOR BOLT SHALL BE ELIMINATED FROM A BARRIER SECTION WHEN SPANNING AN EXPANSION JOINT.)



THROUGH BOLTED ANCHOR INSTALLATION ON BRIDGE DECK

(DO NOTUSE ON CONCRETE BRIDGE DECK WITH ASPHALT OVERLAY)



REMOVABLE ADHESIVE BONDED ANCHOR INSTALLATION ON CONCRETE BRIDGE DECK, CONCRETE APPROACH SLAB, OR CONCRETE PAVEMENT ②

(DO NOT USE ON CONCRETE WITH AN ASPHALTIC OVERLAY)

GENERAL NOTES

① CONCRETE BARRIER TEMPORARY PRECAST, 12'-6" SHALL BE ANCHORED IF:
THE DISTANCE TO A 2 FOOT OR GREATER DROPOFF THAT IS STEEPER THAN 3H : 1V, FOR EXAMPLE THE EDGE OF A BRIDGE DECK OR A DROPOFF AT THE EDGE OF PAVEMENT, IS LESS THAN 4 FEET FROM THE SIDE OF THE BARRIER CLOSEST TO THE DROPOFF AND THE POSTED SPEED IS 45 MPH OR GREATER, OR

THE DISTANCE TO A 2 FOOT OR GREATER DROPOFF THAT IS STEEPER THAN 3H : 1V, FOR EXAMPLE THE EDGE OF A BRIDGE DECK OR A DROPOFF AT THE EDGE OF PAVEMENT. IS LESS THAN 2 FEET FROM THE SIDE OF THE BARRIER CLOSEST TO THE DROPOFF AND THE POSTED SPEED IS 40 MPH OR LESS.

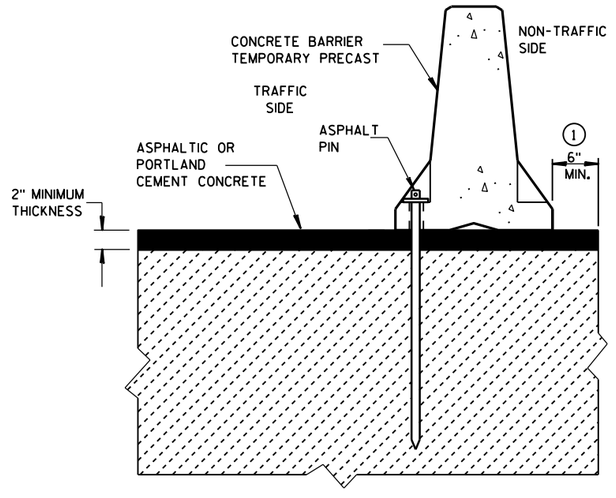
② ANCHORING IS INCIDENTAL TO CONCRETE BARRIER TEMPORARY PRECAST.

WITH THE APPROVAL OF THE ENGINEER, REMOVABLE ADHESIVE BONDED ANCHOR BOLT INSTALLATION MAY BE USED IN LIEU OF THROUGH BOLTED ANCHOR INSTALLATION. THE ADHESIVE BONDED ANCHOR BOLT MUST BE REMOVABLE. USE ASTM (A307) MASONRY ANCHORS TYPE S 1⅛-INCH, EMBEDDED TO A DEPTH SUFFICIENT TO DEVELOP THE ULTIMATE CAPACITY OF THE ANCHOR BOLT AND PROVIDE DOCUMENTATION TO CONFIRM THIS.

UPON REMOVAL OR RELOCATION OF THE BARRIER UNITS, REMOVE ALL ANCHOR BOLTS AND COMPLETELY FILL IN THE REMAINING HOLES IN CONCRETE BRIDGE DECKS, CONCRETE APPROACH SLABS AND CONCRETE PAVEMENTS THAT ARE TO REMAIN, WITH A NON-SHRINK COMMERICAL GROUT OR MATERIAL IDENTIFIED ON THE CURRENT WISDOT APPROVED PRODUCTS LIST.

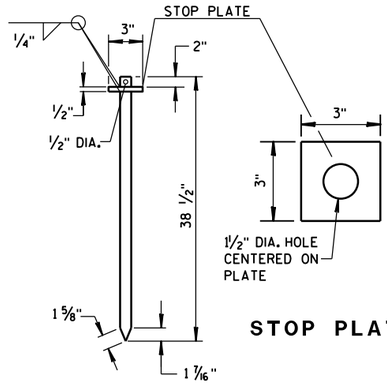
③ 1⅛" DIAMENTER A307 THREADED ROD, ½" X 3" X 3" SQUARE PLATE WASHER WITH ASTM A36 STEEL, ASTM A563A HEAVY HEX NUT.

④ ADHESIVE ANCHORS WITH A MINIMUM BOND STRENGTH OF 1,800 PSI AND 5¼" EMBEDMENT. SEE 603.2 AND 603.3.1.2 OF THE WISCONSIN STANDARD SPECIFICATIONS FOR MORE INFORMATION ON ADHESIVE ANCHORS.



STAKE DOWN INSTALLATION FOR ASPHALTIC OR PORTLAND CEMENT CONCRETE SURFACE

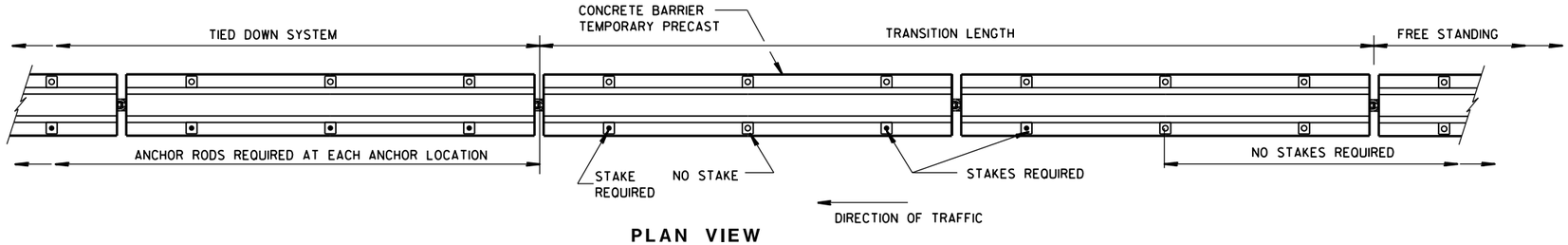
(STAKING IS INCIDENTAL TO CONCRETE BARRIER TEMPORARY PRECAST)



STOP PLATE

ASPHALT PIN

(ASTM A36 STEEL)



PLAN VIEW

FREE STANDING TRANSITION TO TIED-DOWN SYSTEM

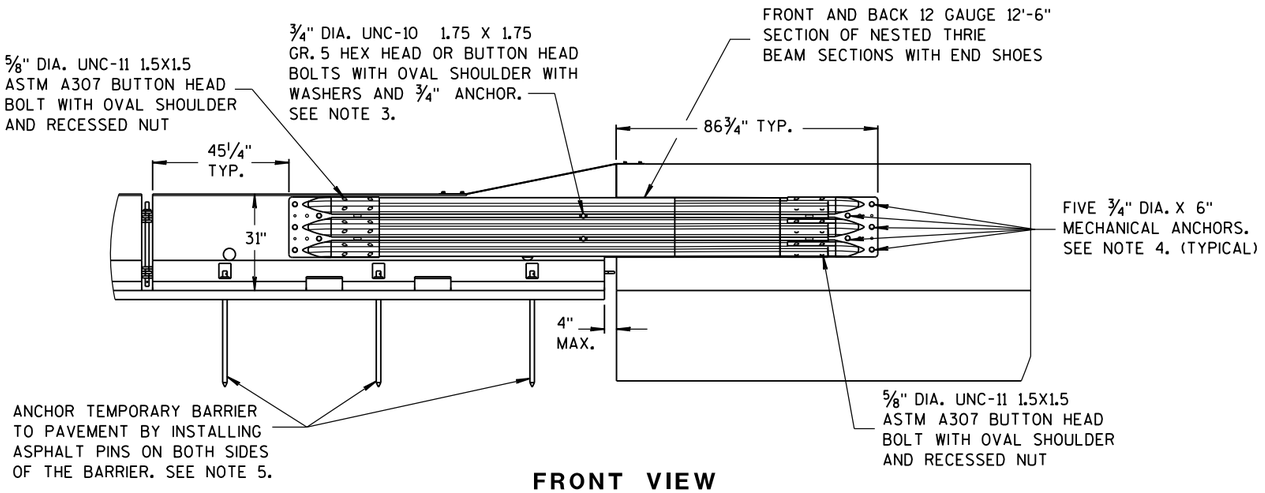
(PLACE TRANSITION IN A TANGENT SECTION OF BARRIER PARALLEL TO THE ROADWAY. IF TRANSITION OCCURS ON STRUCTURAL SLAB, ANCHOR AS SHOWN.)

CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

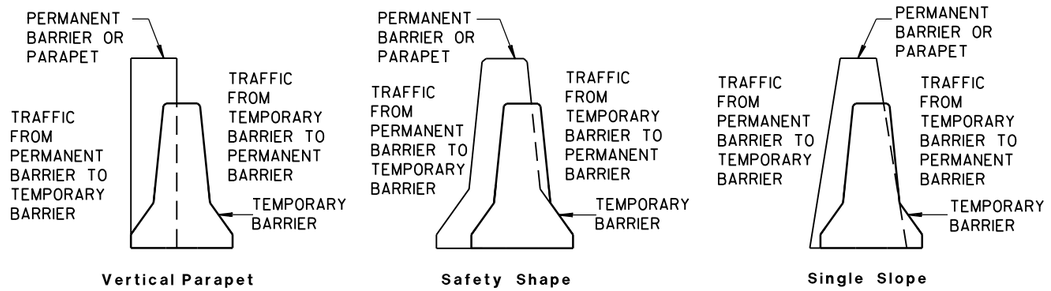
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6

S.D.D. 14 B 7-14d



FRONT VIEW

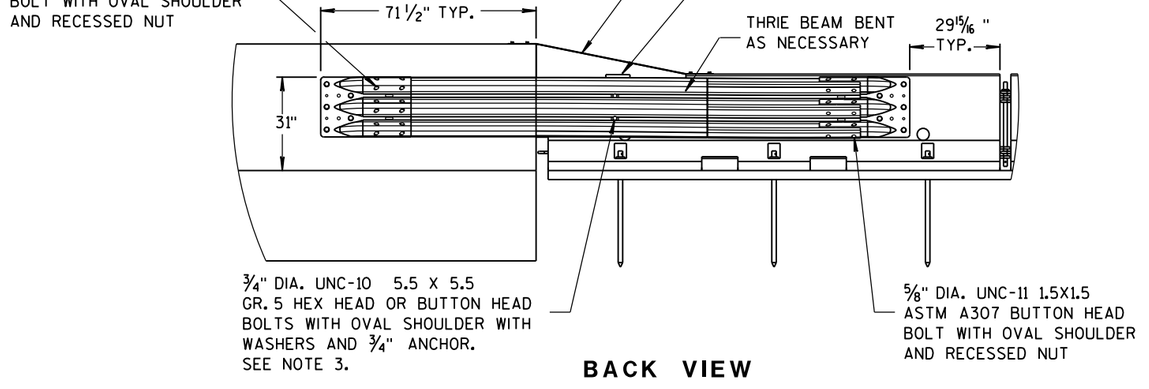


TEMPORARY BARRIER PLACEMENT FOR BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM

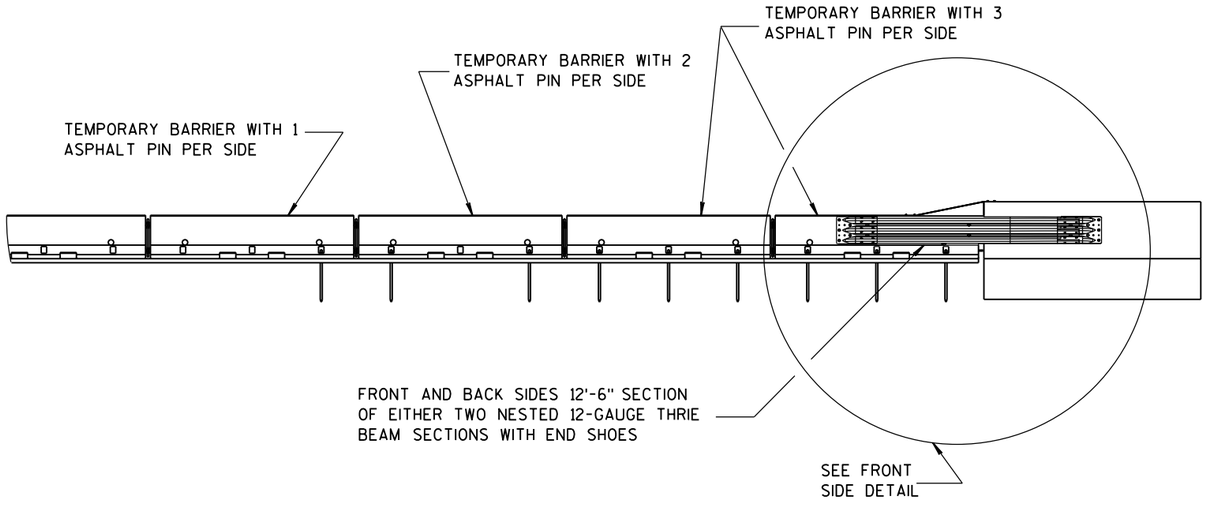
NOTES

NESTED THRIE BEAM IS REQUIRED ON BOTH SIDES OF THE TEMPORARY BARRIER FOR ALL INSTALLATIONS.

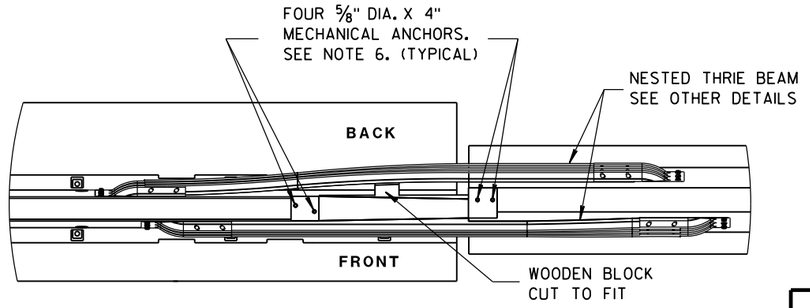
1. CAP END PLATE PLACED FLUSH WITH UPSTREAM END OF PERMANENT BARRIER OR PARAPET.
2. THRIE BEAM PIECES ARE OFFSET 15 1/4" TO PREVENT INTERFERENCE FROM THE ANCHORS ON OPPOSING SIDES.
3. MINIMUM MECHANICAL OR ADHESIVE ANCHOR STRENGTH REQUIREMENTS: ULTIMATE TENSILE LOAD 9.48 KIPS AND ULTIMATE SHEAR LOAD 10.48 KIPS.
4. MINIMUM MECHANICAL OR ADHESIVE ANCHOR STRENGTH REQUIREMENTS: ULTIMATE TENSILE LOAD 17.9 KIPS AND ULTIMATE SHEAR LOAD 21.96 KIPS.
5. MAY BE USED ON CONCRETE OR ASPHALT PAVEMENTS. ASPHALT OPTION SHOWN. FOR CONCRETE OPTION SEE OTHER DETAILS.
6. MINIMUM MECHANICAL OR ADHESIVE ANCHOR STRENGTH REQUIREMENTS: ULTIMATE TENSILE LOAD 12.14 KIPS AND ULTIMATE SHEAR LOAD 17.5 KIPS.



BACK VIEW



FRONT VIEW



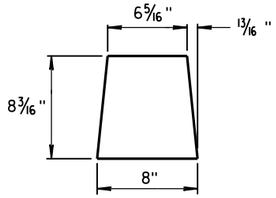
PLAN VIEW

BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM

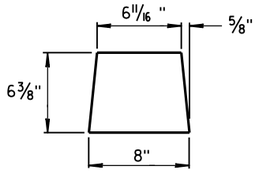
CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO

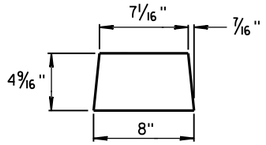
6
S.D.D. 14 B 7-14e



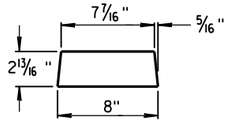
GUSSET 1



GUSSET 2

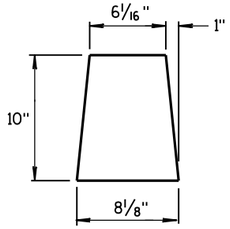


GUSSET 3

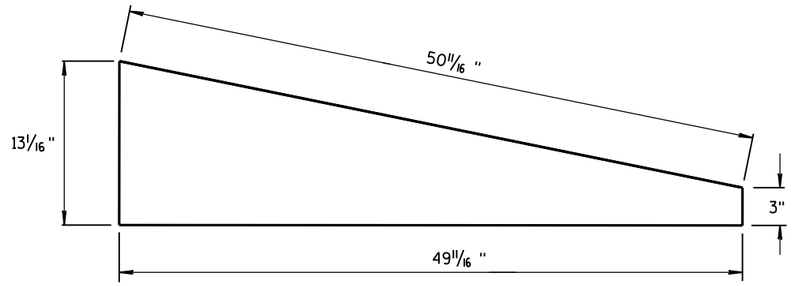


GUSSET 4

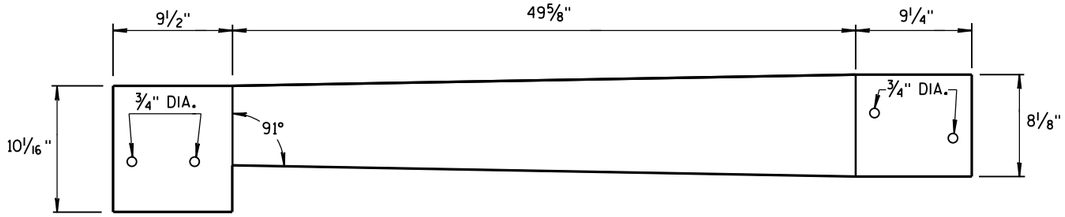
GUSSETS

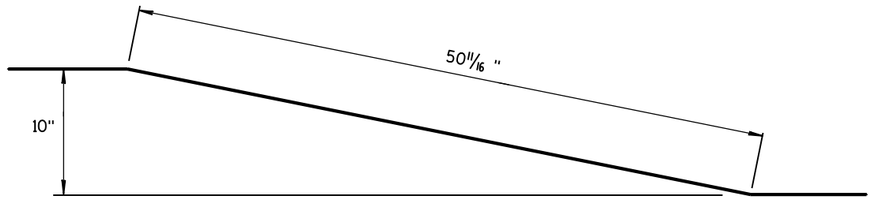


END PLATE



SIDE PLATE

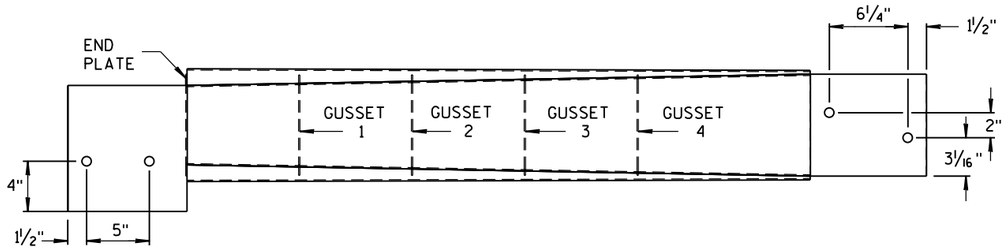


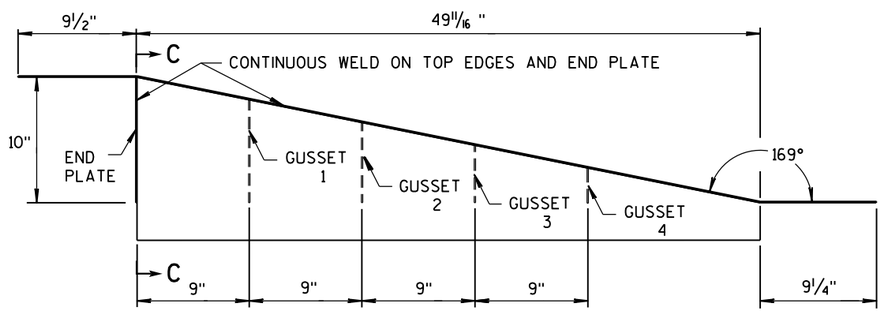


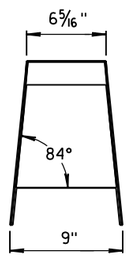
TOP PLATE

SIDE, TOP AND END PLATES FOR CAP FROM TEMPORARY CONCRETE BARRIER TO 42" PERMANENT CONCRETE BARRIER

SIDE PLATES, TOP PLATE, END PLATE AND GUSSETS ARE 12 GAUGE ASTM A36 GALVANIZED STEEL.







SECTION C-C

NOTES

1. FOUR GUSSETS AND END PLATE ARE STITCH WELDED ON THREE SIDES.
2. TWO TRIANGULAR SIDE PLATES ARE STITCH WELDED TO TOP PLATE, END PLATE, AND GUSSETS.

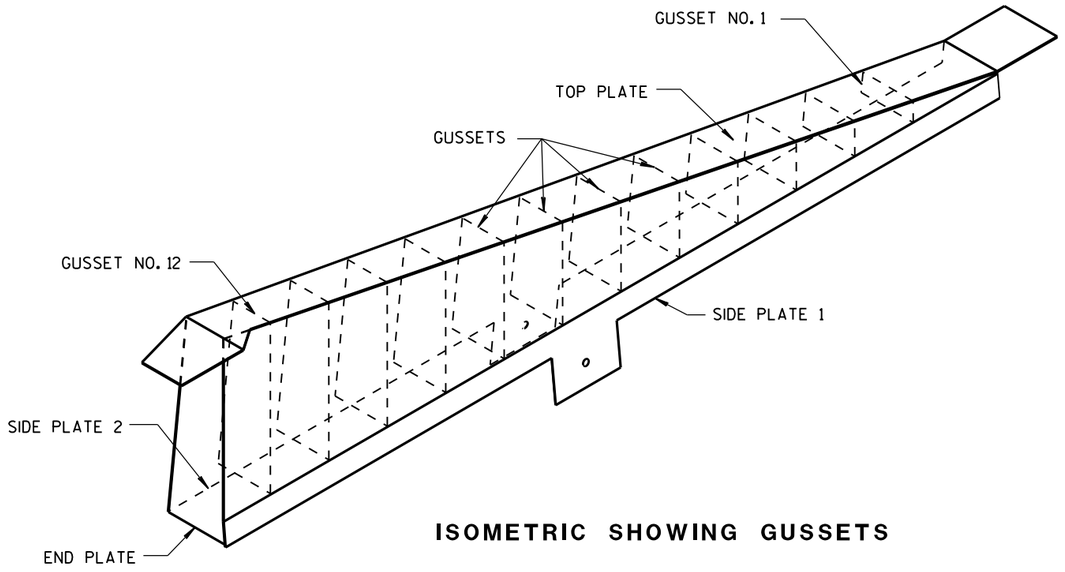
CAP DETAILS FOR TEMPORARY CONCRETE BARRIER TO 42" PERMANENT CONCRETE BARRIER

CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

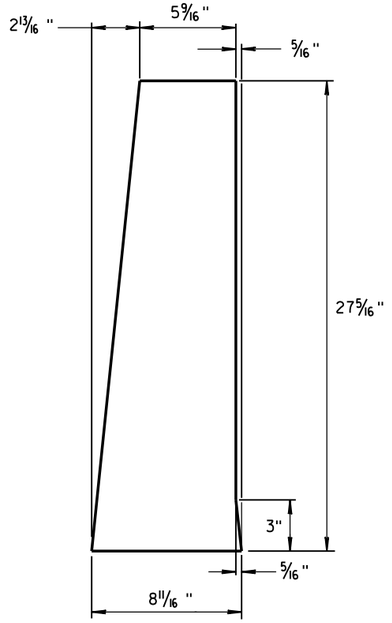
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6

S.D.D. 14 B 7-14f

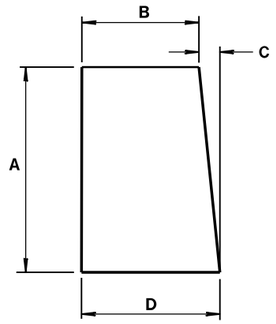


ISOMETRIC SHOWING GUSSETS



END PLATE

1/8" STEEL PLATE



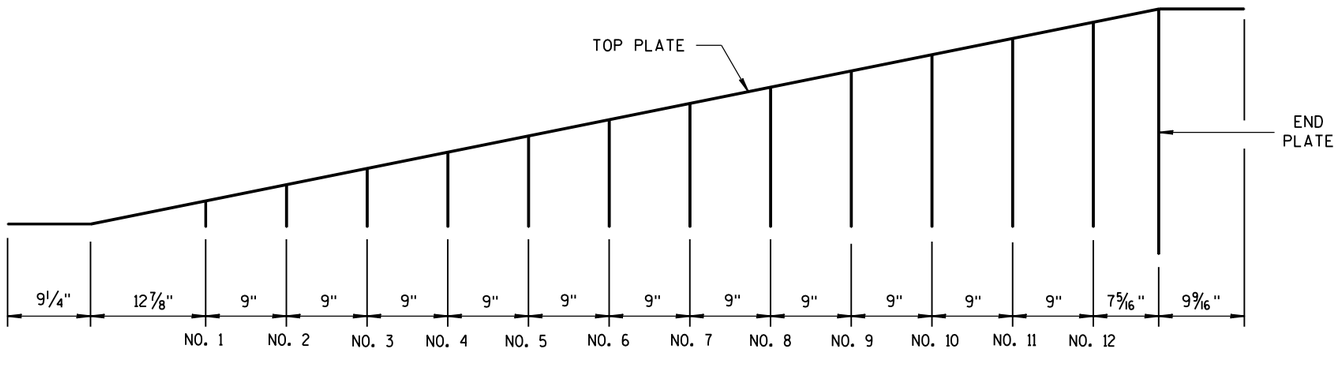
GUSSETS 1 - 12

ALL GUSSETS 1/8" STEEL PLATE

GUSSET DIMENSIONS				
GUSSET NO.	A	B	C	D
1	2 7/8"	7 3/4"	1/4"	8
2	4 11/16 "	7 9/16 "	1/2"	8
3	6 1/2"	7 3/8"	11/16 "	8 1/16 "
4	8 5/16 "	7 3/16 "	7/8"	8 1/16 "
5	10 1/8"	7"	1 1/16 "	8 1/16 "
6	11 15/16 "	6 13/16 "	1 1/4"	8 1/16 "
7	13 3/4"	6 5/8"	1 7/16 "	8 1/16 "
8	15 9/16 "	6 7/16 "	1 9/16 "	8 1/16 "
9	17 3/8"	6 1/4"	1 13/16 "	8 1/16 "
10	19 3/16 "	6 1/16 "	1 15/16 "	8 1/16 "
11	21"	5 7/8"	2 3/16 "	8 1/16 "
12	22 13/16 "	5 11/16 "	2 5/16 "	8 1/16 "

SIDE PLATES, TOP PLATE, END PLATE AND GUSSETS ARE 12 GAUGE ASTM A36 STEEL AND GALVANIZED.

GUSSETS AND END PLATE ARE STITCH WELDED ON 3 SIDES. TWO TRIANGULAR SIDE PLATES ARE STITCH WELDED TO TOP PLATE, END PLATE AND GUSSETS.



GUSSET LOCATION

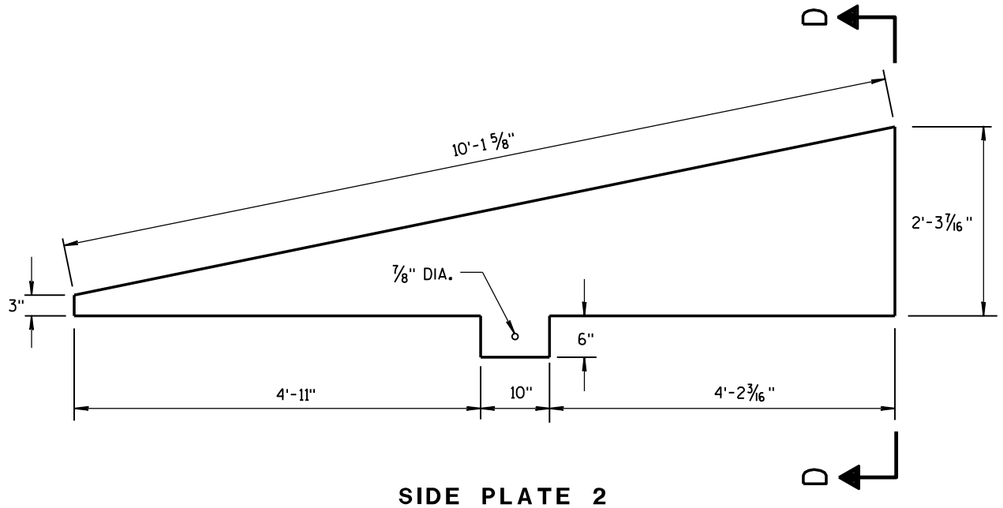
CAP DETAILS FOR TEMPORARY CONCRETE BARRIER TO 56" PERMANENT CONCRETE BARRIER

CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

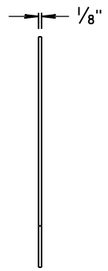
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

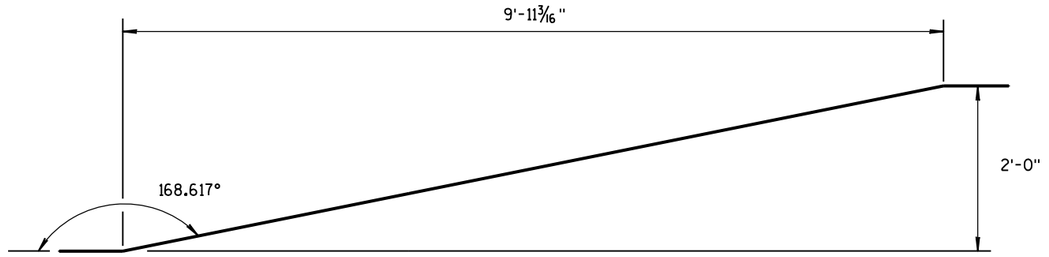
S.D.D. 14 B 7-14g



SIDE PLATE 2

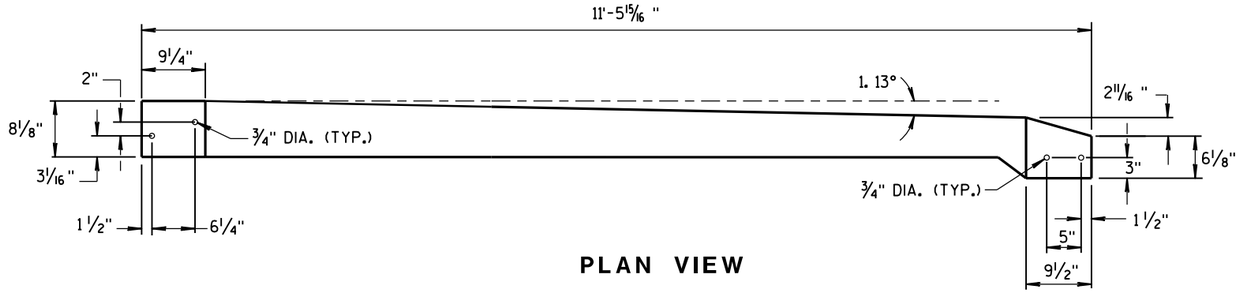


END VIEW



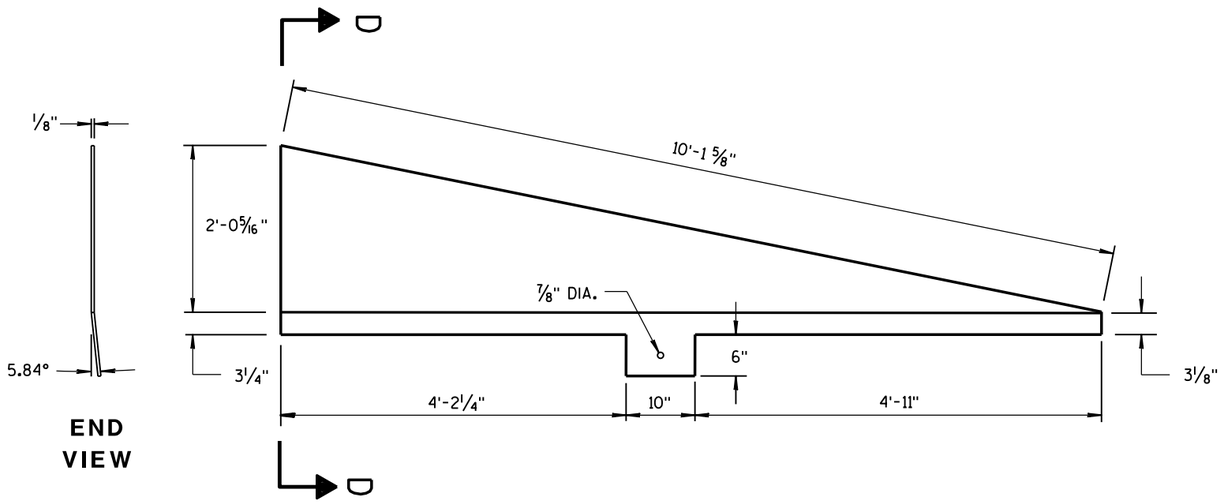
SIDE VIEW

TOP PLATE



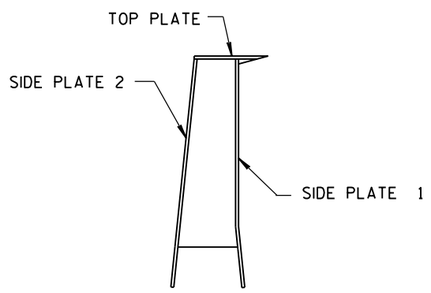
PLAN VIEW

TOP PLATE



END VIEW

SIDE PLATE 1



SECTION D-D

CAP DETAILS FOR TEMPORARY CONCRETE BARRIER TO 56" PERMANENT CONCRETE BARRIER

CONCRETE BARRIER
TEMPORARY PRECAST, 12'-6"

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

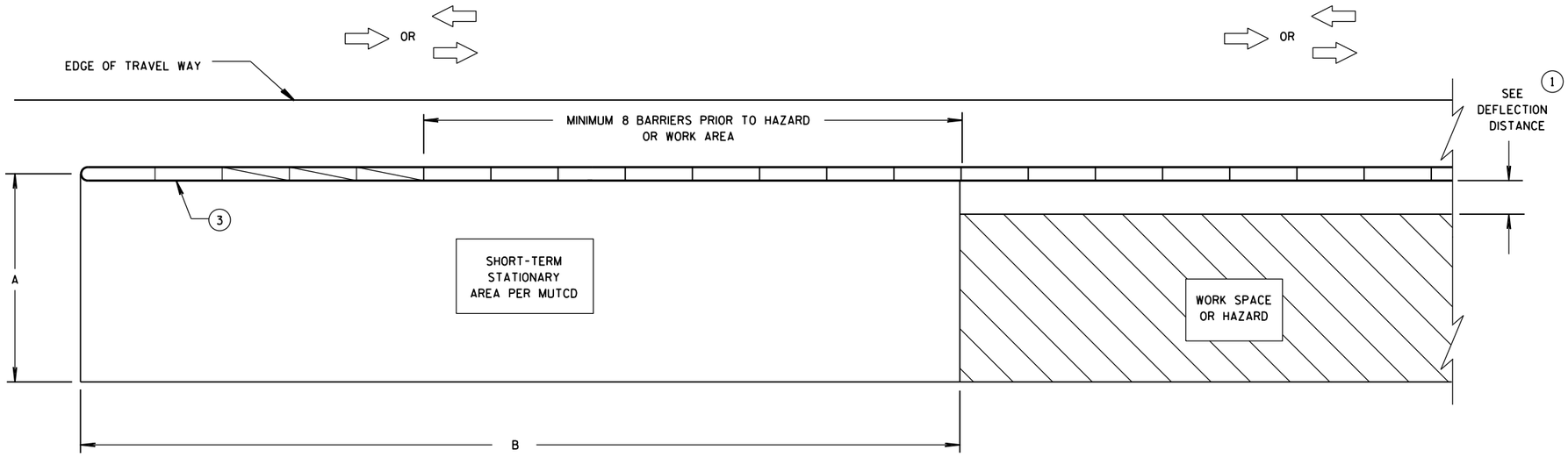
APPROVED
June 2014 — DATE
/S/ Jerry H. Zoda — ROADWAY STANDARD DEVELOPMENT ENGINEER
FHWA

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S.D.D. 14 B 7-14h



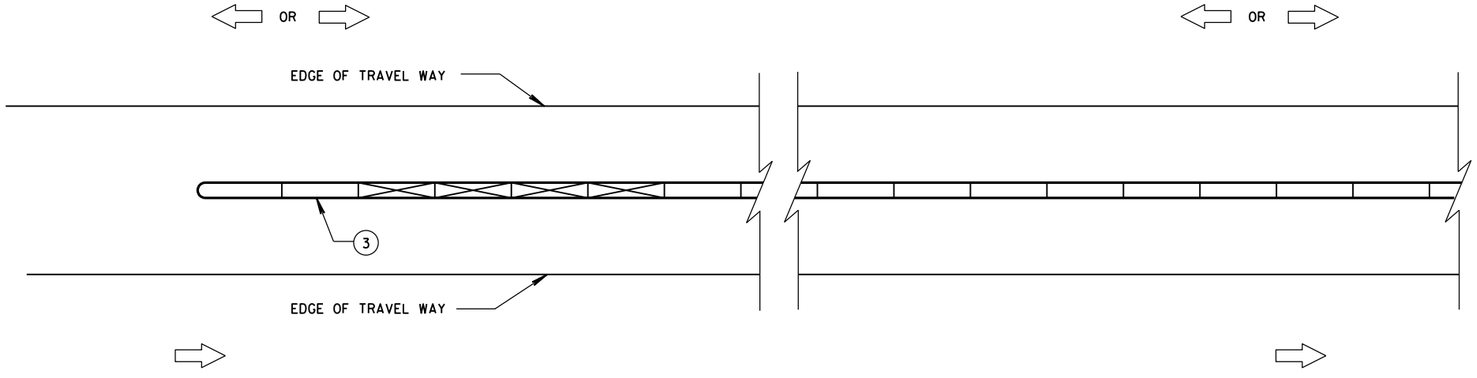
CRASH CUSHION/SAND BARREL ARRAY AND TEMPORARY BARRIER INSTALLATION FOR TRAFFIC ON ONE SIDE OF BARRIER

DIMENSION A TABLE (2)

FACILITY	POSTED SPEED MPH	DIMENSION A	
		MIN. FT	MAX. FT
FREEWAY/EXPRESSWAY	ALL	15	20
NON-FREEWAY/EXPRESSWAY	GREATER THAN OR EQUAL TO 45	10	15
NON-FREEWAY/EXPRESSWAY	LESS THAN 45	8	10
AADT LESS THAN 1,500	ALL	8	10

DIMENSION B TABLE (2)

POSTED SPEEDS MPH	DIMENSION B FT
20	115
25	155
30	200
35	250
40	305
45	360
50	425
55	495
60	570
65	645



CRASH CUSHION/SAND BARREL ARRAY AND TEMPORARY BARRIER INSTALLATION FOR TRAFFIC ON BOTH SIDES OF BARRIER

LEGEND

- DIRECTION OF TRAVEL
- CRASH CUSHION OR SAND BARREL ARRAY
- SEE FREE STANDING TRANSITION TO TIED-DOWN SYSTEM DETAILS
- SEE BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM DETAILS
- 3 PINS PLACED ON TRAFFIC SIDE OF BARRIER
- PERMANENT CONCRETE BARRIER OR CONCRETE PARAPET
- FREE STANDING TEMPORARY BARRIER

GENERAL NOTES

SEE STANDARD DETAIL DRAWING 14B7 FOR MORE INFORMATION.

DETAILS PROVIDE A GENERAL LAYOUT OF TEMPORARY CONCRETE BARRIER, CRASH CUSHIONS, SAND BARREL ARRAYS AND TIE DOWN TRANSITIONS. DETAILS PROVIDED MAY NOT FIT ALL POSSIBLE SITUATIONS OR SITE CONDITIONS. SEE OTHER SECTIONS OF THE CONTRACT OR PROJECT ENGINEER FOR MORE DETAILS.

ADDITIONAL TEMPORARY BARRIER MAY BE REQUIRED TO PROTECT TRAVELING PUBLIC FROM HAZARDS, CONTRACTOR'S OPERATIONS OR TO CONTROL TRAFFIC.

TEMPORARY BARRIER MAY BE REQUIRED TO BE ANCHORED TO PAVEMENT OR BRIDGE DECK.

FOR DETAILS ON CRASH CUSHION OR SAND BARREL ARRAYS SEE OTHER SECTIONS OF THE PLAN AND MANUFACTURE'S DETAILS.

SLOPES LEADING TO TEMPORARY BARRIER, CRASH CUSHION OR SAND BARREL ARRAY ARE 10:1 OR LESS.

(1) FOR DEFLECTION INFORMATION SEE STANDARD DETAIL DRAWING 14B7.

(2) VALUES PROVIDED MAY NOT FIT ALL POSSIBLE SITUATIONS OR SITE CONDITIONS. SEE OTHER SECTIONS OF THE CONTRACT OR PROJECT ENGINEER FOR MORE DETAILS.

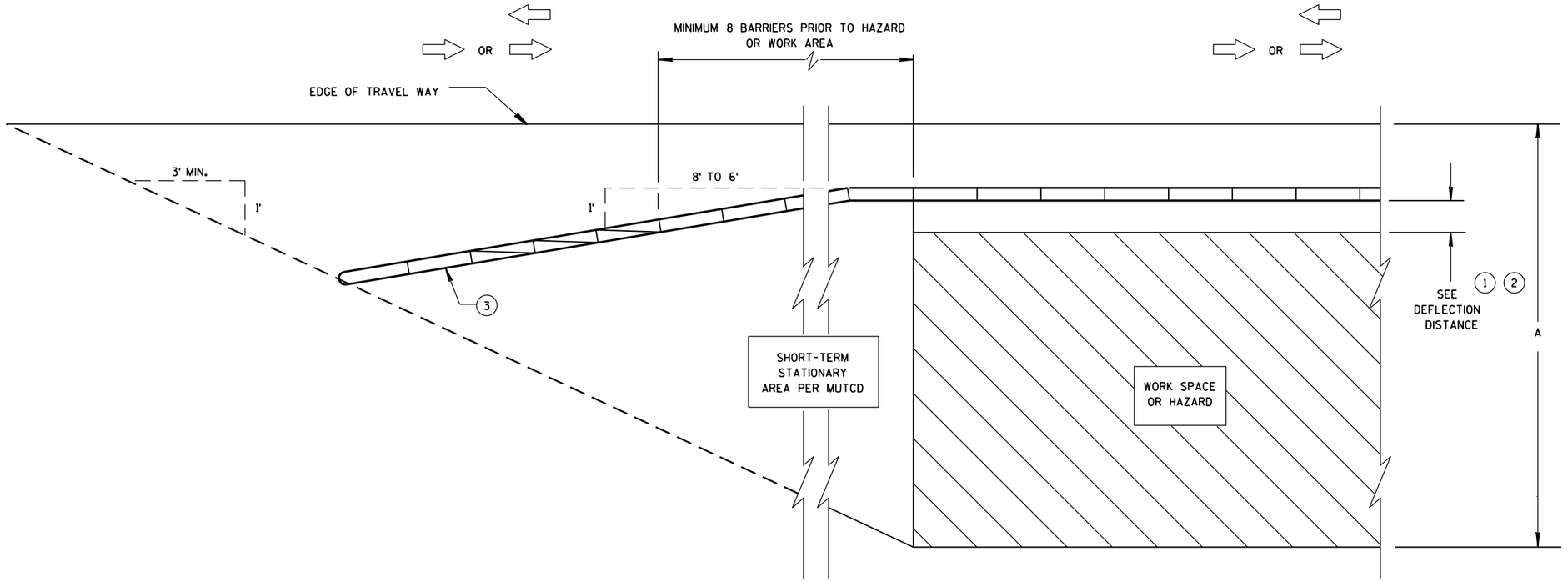
(3) ANCHOR TEMPORARY BARRIER ACCORDING TO CRASH CUSHION OR SAND BARREL MANUFACTURER'S RECOMMENDATIONS. IF MANUFACTURER'S RECOMMENDATIONS ARE NOT PROVIDED, ANCHOR 3 PINS ON TRAFFIC SIDE.

CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS

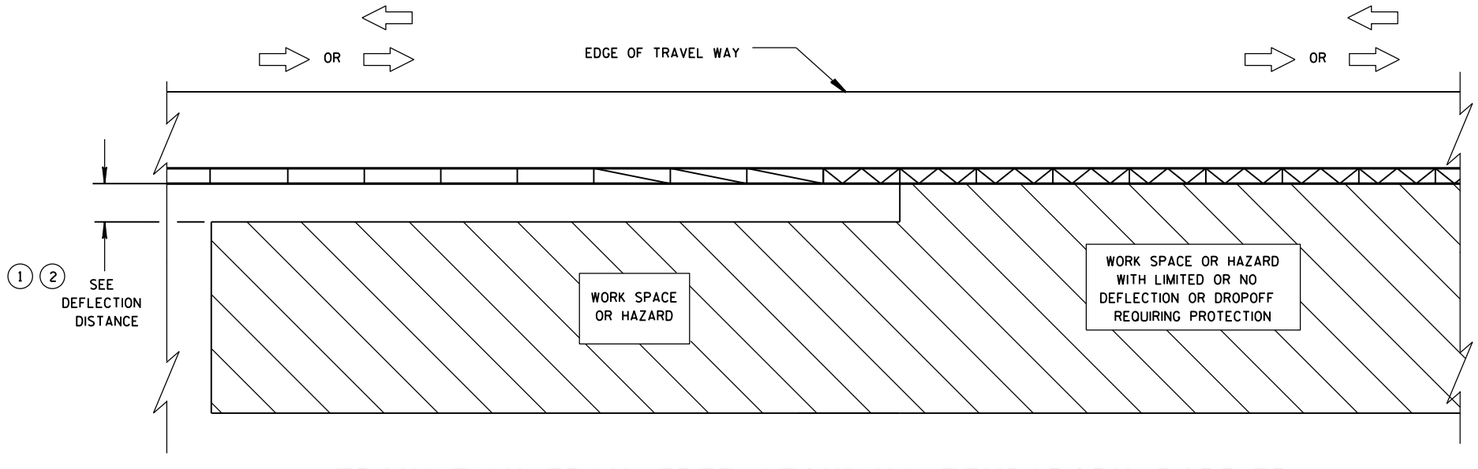
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

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S.D.D. 14 B 8-2a
S.D.D. 14 B 8-2a



CRASH CUSHION/SAND BARREL ARRAY AND TEMPORARY BARRIER INSTALLATION FOR TRAFFIC ON ONE SIDE - FLARED INSTALLATION



TRANSITION FROM FREE STANDING TEMPORARY BARRIER TO ANCHORED BARRIER

LEGEND

- DIRECTION OF TRAVEL
- CRASH CUSHION OR SAND BARREL ARRAY
- SEE FREE STANDING TRANSITION TO TIED-DOWN SYSTEM DETAILS
- SEE BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM DETAILS
- 3 PINS PLACED ON TRAFFIC SIDE OF BARRIER
- PERMANENT CONCRETE BARRIER OR CONCRETE PARAPET
- FREE STANDING TEMPORARY BARRIER

CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS

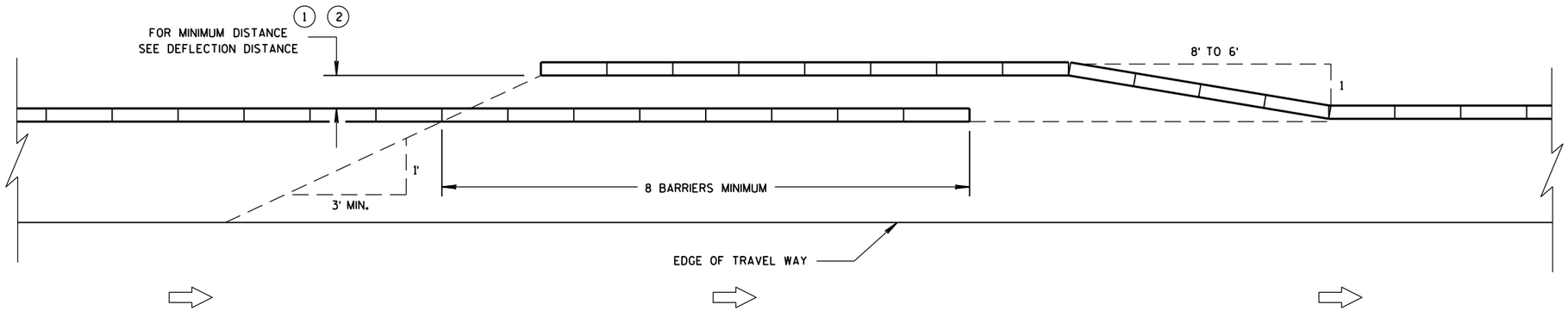
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

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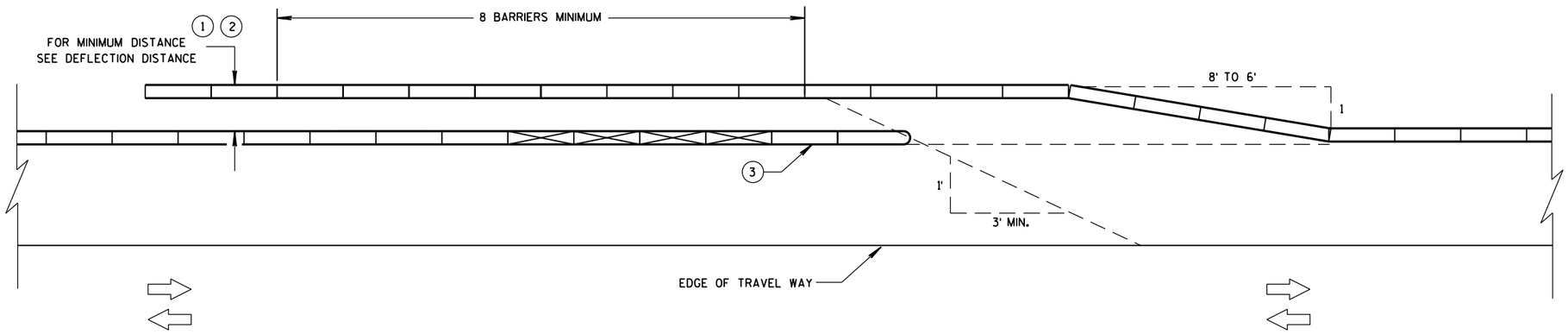
S.D.D. 14 B 8-2b

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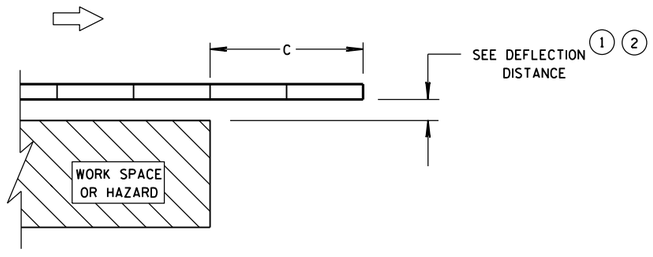
S.D.D. 14 B 8-2b



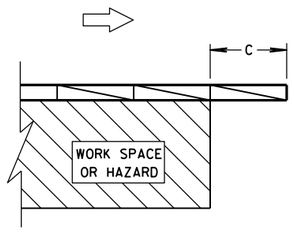
TEMPORARY BARRIER OVERLAP - ONE-WAY TRAFFIC



TEMPORARY BARRIER OVERLAP - TWO-WAY TRAFFIC



ENDING TEMPORARY BARRIER DOWNSTREAM - UNANCHORED



ENDING TEMPORARY BARRIER DOWNSTREAM - ANCHORED

LEGEND

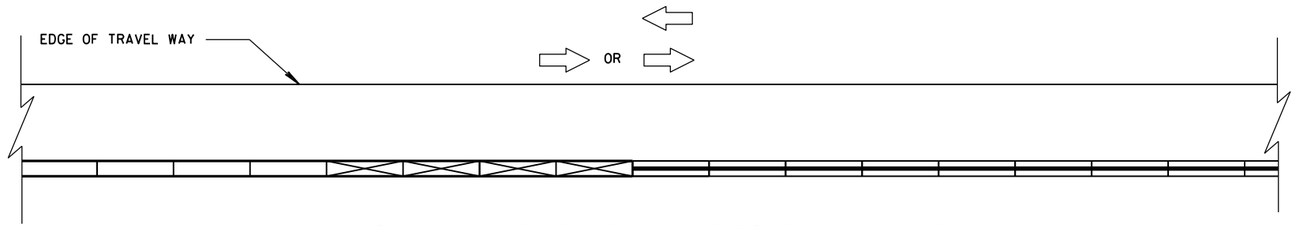
- DIRECTION OF TRAVEL
- CRASH CUSHION OR SAND BARREL ARRAY
- SEE FREE STANDING TRANSITION TO TIED-DOWN SYSTEM DETAILS
- SEE BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM DETAILS
- 3 PINS PLACED ON TRAFFIC SIDE OF BARRIER
- PERMANENT CONCRETE BARRIER OR CONCRETE PARAPET
- FREE STANDING TEMPORARY BARRIER

CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS

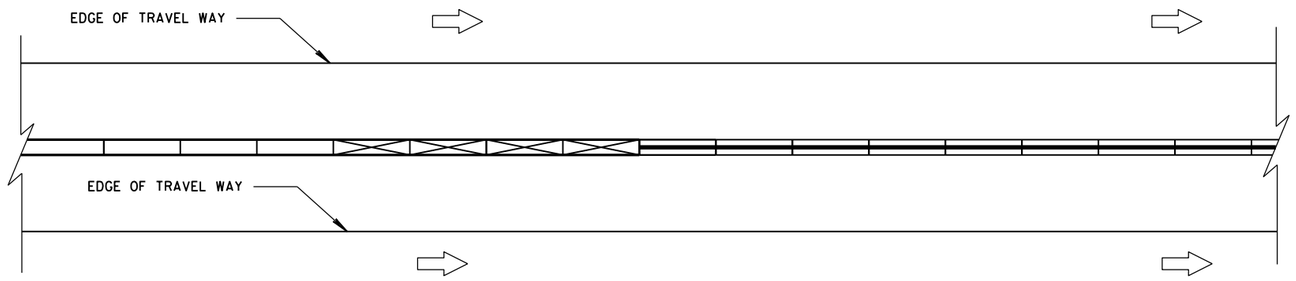
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

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S.D.D. 14 B 8-2c



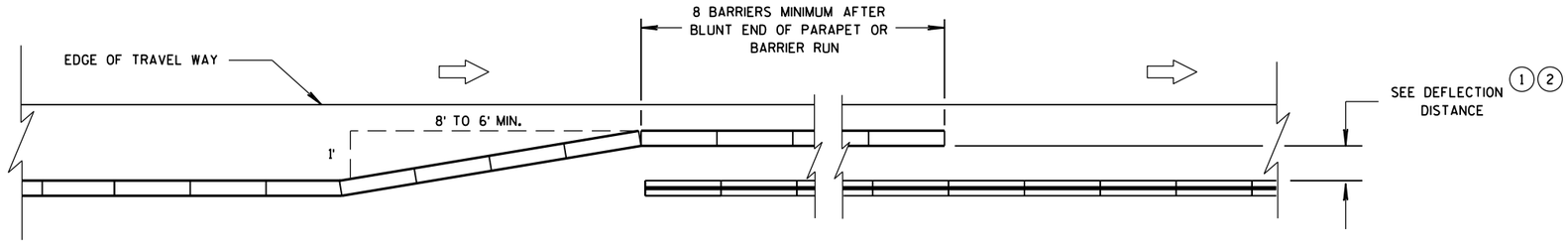
CONNECTING TEMPORARY BARRIER TO PERMANENT
CONCRETE BARRIER-TRAFFIC ON ONE SIDE



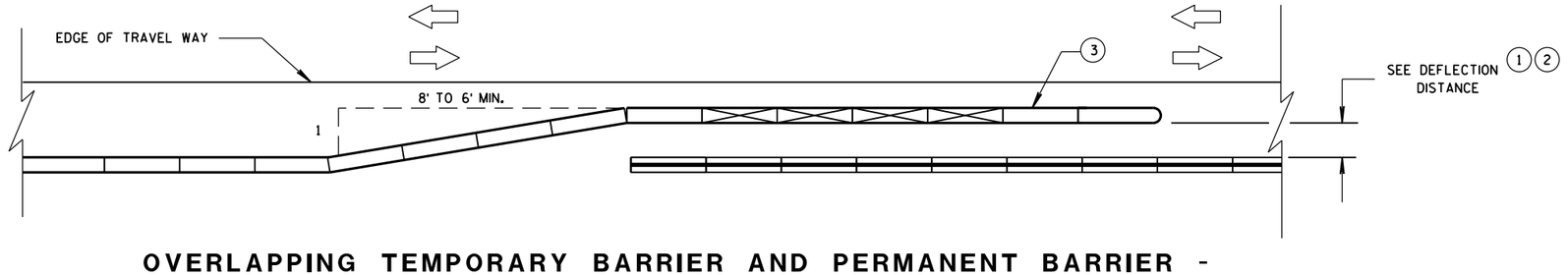
CONNECTING TEMPORARY BARRIER TO PERMANENT
CONCRETE BARRIER-TRAFFIC ON BOTH SIDES

LEGEND

- DIRECTION OF TRAVEL
- CRASH CUSHION OR SAND BARREL ARRAY
- SEE FREE STANDING TRANSITION TO TIED-DOWN SYSTEM DETAILS
- SEE BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM DETAILS
- 3 PINS PLACED ON TRAFFIC SIDE OF BARRIER
- PERMANENT CONCRETE BARRIER OR CONCRETE PARAPET
- FREE STANDING TEMPORARY BARRIER



OVERLAPPING TEMPORARY BARRIER AND PERMANENT BARRIER -
ONE WAY TRAFFIC



OVERLAPPING TEMPORARY BARRIER AND PERMANENT BARRIER -
TWO WAY TRAFFIC

CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

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S.D.D. 14 B 8-2d

LEGEND

DIRECTION OF TRAVEL

CRASH CUSHION OR SAND BARREL ARRAY

SEE FREE STANDING TRANSITION TO TIED-DOWN SYSTEM DETAILS

SEE BI-DIRECTIONAL TRANSITION TO TIED-DOWN SYSTEM DETAILS

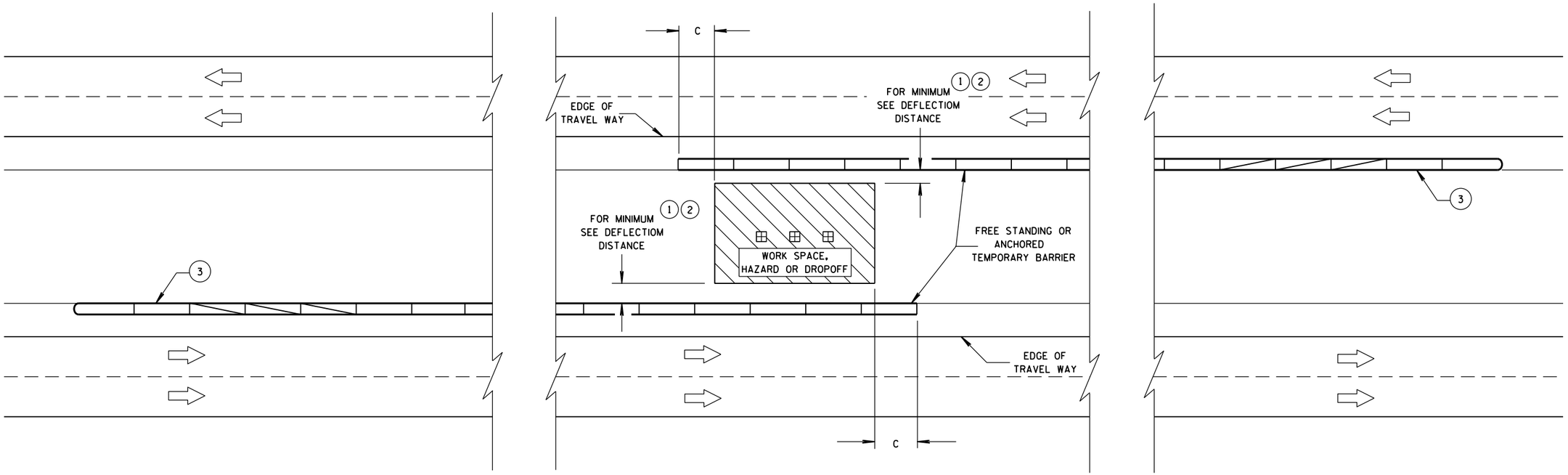
3 PINS PLACED ON TRAFFIC SIDE OF BARRIER

PERMANENT CONCRETE BARRIER OR CONCRETE PARAPET

FREE STANDING TEMPORARY BARRIER

DIMENSION C TABLE (2)

AVAILABLE DEFLECTION DISTANCE	MINIMUM LENGTH OF BARRIER BEYOND HAZARD FT
GREATER THAN 8'	12.5
LESS THAN OR EQUAL TO 8' BUT GREATER THAN 4'	50
LESS THAN OR EQUAL TO 4'	100



CRASH CUSHION/SAND BARREL ARRAY AND OTHER TEMPORARY BARRIER LAYOUT DETAILS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June, 2015
DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS ENGINNER
FHWA

6

S.D.D. 14 B 8-2e

GENERAL NOTES

(1) WOOD OR STEEL POSTS (w6X9 OR w6X8.5) MAY BE USED. DO NOT INTERMIX WOOD AND STEEL POSTS. INSTALL STEEL POSTS WITH HOLES ON APPROACHING TRAFFIC SIDE.

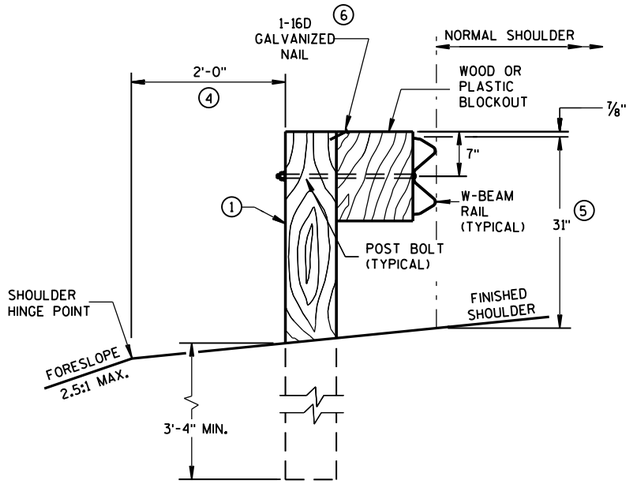
(2) USE WOOD OR APPROVED PLASTIC BLOCKOUTS. WOOD BLOCKOUTS MAY BE CONSTRUCTED OUT OF TWO OR MORE WOOD BLOCKOUTS. SEE ALTERNATE WOOD BLOCKOUT DETAIL. DIMENSIONS OF APPROVED PLASTIC BLOCKOUTS MAY VARY.

(3) IF ROCK IS ENCOUNTERED DURING EXCAVATION, PROVIDE A HOLE 12 INCHES IN DIAMETER EXTENDING 20 INCHES DEEP INTO THE ROCK. PLACE APPROXIMATELY 2½ INCHES OF GRANULAR MATERIAL IN THE BOTTOM OF THE HOLE. CUT THE POSTS THE TO LENGTH AMD INSTALL. BACKFILL WITH EXCAVATED MATERIAL AND COMPACT. BACKFILL IS TO BE FREE OF LARGE ROCKS.

(4) WHEN THE DISTANCE FROM BACK OF POST TO SHOULDER HINGE POINT IS LESS THAN 2 FEET INSTALL LONGER POST AT HALF POST SPACING (K).

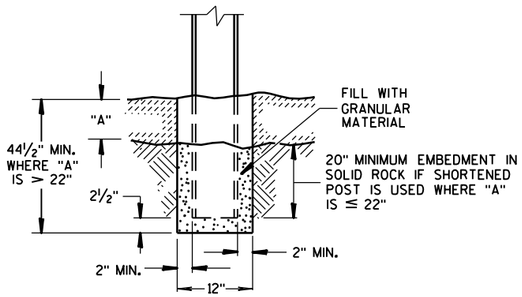
(5) FOR NEW MGS INSTALLATION TOP OF W-BEAM RAIL TOLERANCE IS ± 1". FOR EXISTING MGS INSTALLATION TOP OF W-BEAM IS BETWEEN 27¾" TO 32".

(6) WHEN USING STEEL POST AND WOOD BLOCKOUTS INSTALL FOUR 16D GALVANIZED NAILS. INSTALL NAILS AT THE BACK CORNERS OF THE BLOCK AND BEND THE NAILS OVER THE FLANGE OF THE STEEL POST.



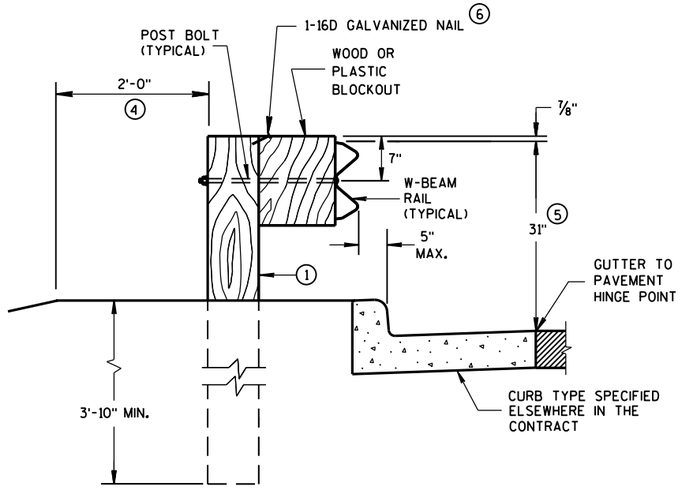
END VIEW

LOCATED ALONG A ROADWAY SHOULDER
STANDARD INSTALLATION



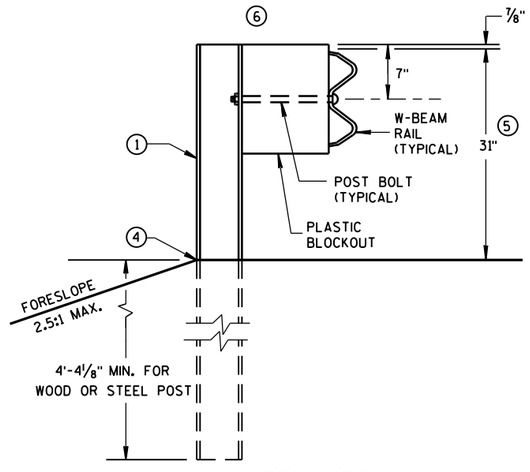
END VIEW

SETTING STEEL OR WOOD POST IN ROCK (3)



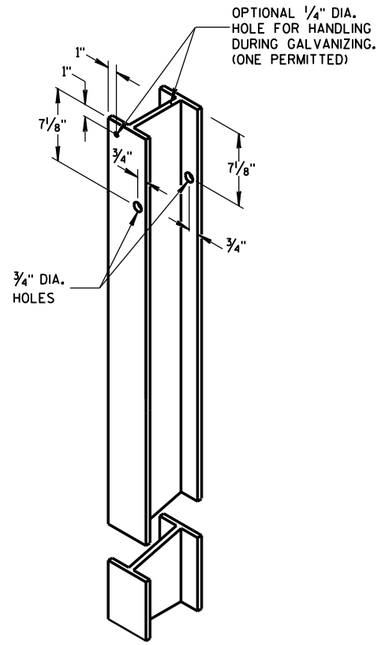
END VIEW

LOCATED ALONG A CURBED ROADWAY

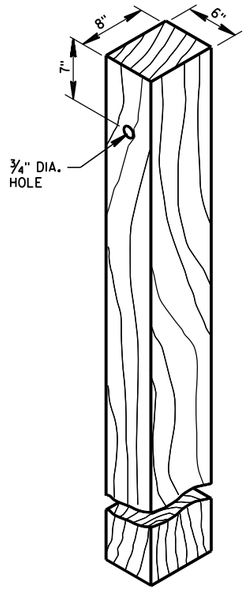


END VIEW

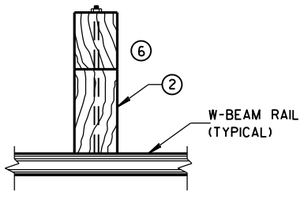
MGS LONGER POST AT HALFPOST SPACING W BEAM (K)



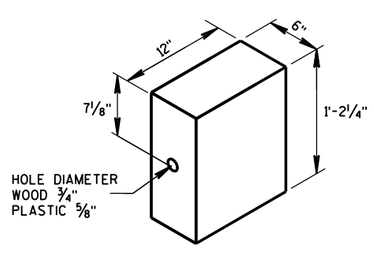
STEEL POST &
HOLE PUNCHING DETAIL
(w6X9) (1)



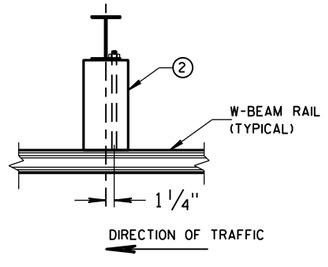
WOOD POST
(6" X 8") NOMINAL (1)



PLAN VIEW
WOOD POST,
BLOCKOUT & BEAM



WOOD OR
PLASTIC BLOCKOUT (2)

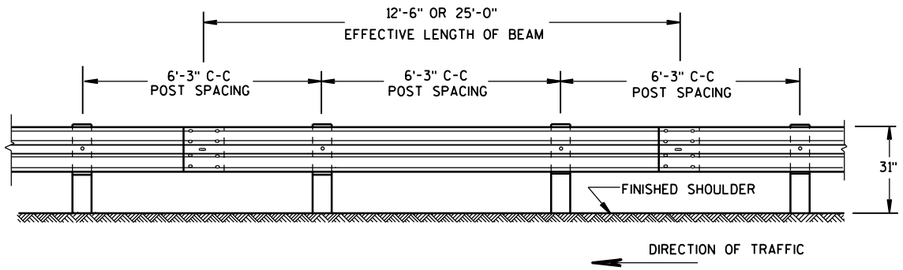


PLAN VIEW
STEEL POST,
PLASTIC BLOCKOUT & BEAM

MIDWEST GUARDRAIL SYSTEM
(MGS) GUARDRAIL

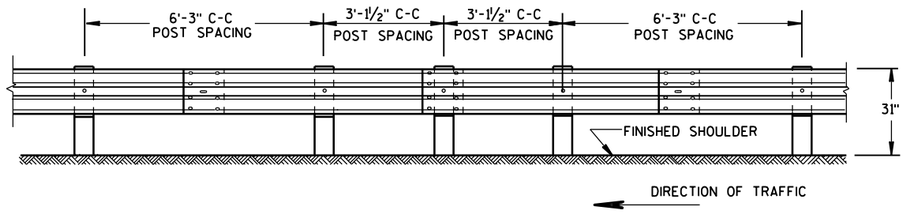
STATE OF WISCONSIN
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S.D.D. 14 B 42-3a



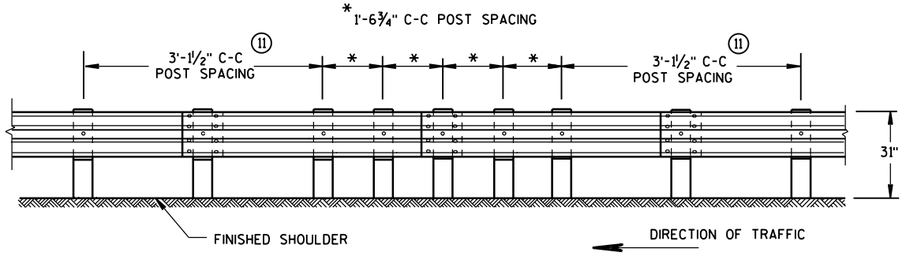
FRONT VIEW

POST SPACING STANDARD INSTALLATION



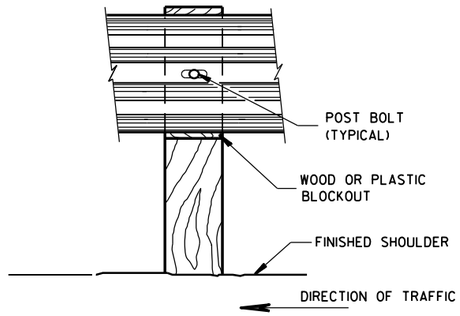
FRONT VIEW

HALF POST SPACING (HS) AND HALF POST SPACING WITH LONGER POSTS (K)

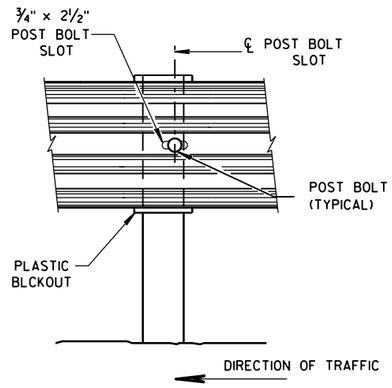


FRONT VIEW

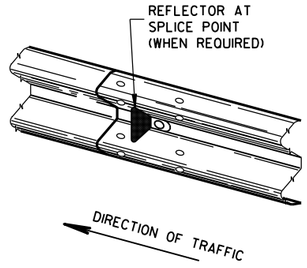
QUARTER POST SPACING (QS)

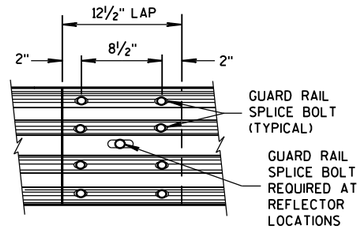


FRONT VIEW AT WOOD POST

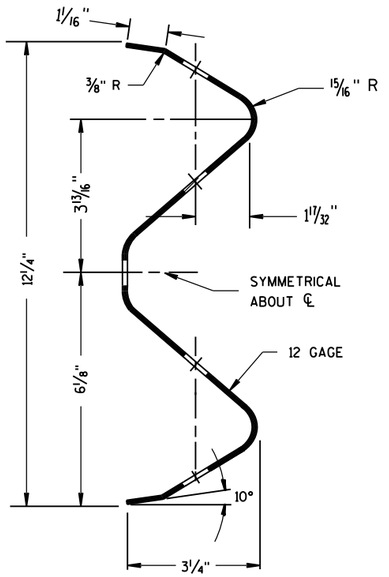


FRONT VIEW AT STEEL POST

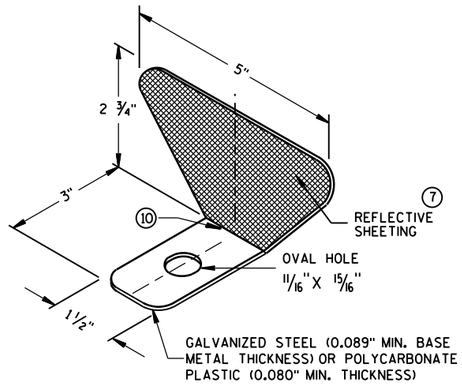




FRONT VIEW
MID-SPAN BEAM SPLICE



SECTION THRU W-BEAM RAIL



ONE SIDED REFLECTOR DETAIL AND TYPICAL INSTALLATION ⑦

GENERAL NOTES

⑦ PROVIDE SILVER REFLECTIVE SHEETING ON ALL REFLECTORS EXCEPT THOSE LOCATED ALONG THE LEFT EDGE OF ONE-WAY ROADWAYS, WHICH SHALL BE PROVIDED WITH YELLOW REFLECTIVE SHEETING. SHEETING IS TYPE H. SEE STANDARD SPECIFICATION 637.

⑧ DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL. RAIL SPLICE LOCATIONS ARE THE ONLY ACCEPTABLE LOCATIONS FOR REFLECTORS.

⑨ REVERSE EVERY OTHER REFLECTOR FOR 2-WAY VISIBILITY. THE CONTRACTOR MAY FURNISH TWO-SIDED REFLECTORS IN LIEU OF ONE-SIDED REFLECTORS.

⑩ PROVIDE AN ANGLE OF BEND OF 90° ± 1° FOR TWO-SIDED REFLECTORS.

⑪ 25 FEET OF HALF POST SPACING IS REQUIRED ON APPROACH AND DEPARTURE ENDS OF QUARTER POST SPACING.

POST BOLTS ARE A ⅝" DIAMETER ASTM A307 GUARDRAIL BOLT. A POST BOLT REQUIRES ⅝" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX NUT AND ⅝" DIAMETER F844 FLAT WASHER. POST BOLTS MAY BE LONGER IF MULTIPLE BLOCKOUTS ARE BEING USED.

GUARD RAIL SPLICE BOLTS ARE A ⅝" DIAMETER ASTM A307 GUARDRAIL HEAD BOLT. A GUARDRAIL SPLICE BOLT REQUIRES ⅝" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX NUT.

REFLECTOR SPACING ⑧

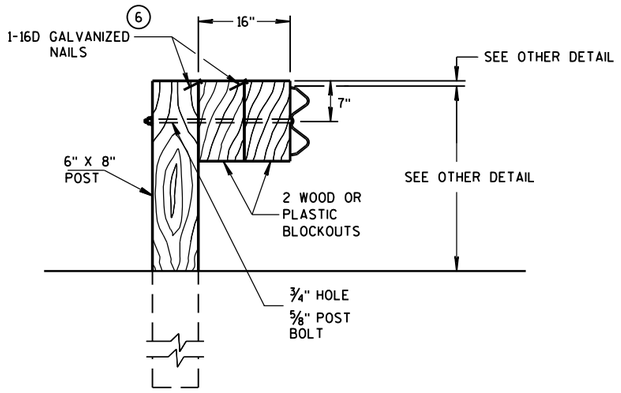
	BEAM GUARD LENGTH	REFLECTOR SPACING	NO. SURFACES REFLECTORIZED	MIN. NO. REFLECTORS
ONE WAY TRAFFIC	< 200' > 200'	50' C-C 100' C-C	1 1	3
TWO WAY TRAFFIC	< 200' > 200'	25' C-C 50' C-C	1 ⑨ 1	6
TWO WAY TRAFFIC	< 200' > 200'	50' C-C 100' C-C	2 2 ⑩	3

MIDWEST GUARDRAIL SYSTEM
(MGS) GUARDRAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO

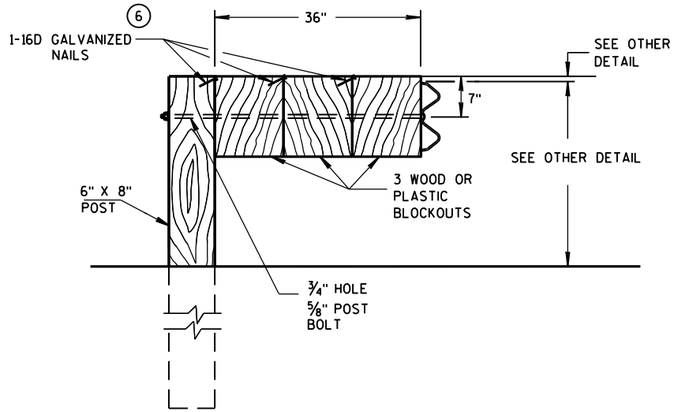
6

S.D.D. 14 B 42-3b



DETAIL FOR 16" BLOCKOUT DEPTH

IT IS ACCEPTABLE TO USE BLOCKOUTS UP TO 16" DEEP TO INCREASE THE POST OFFSET TO AVOID UNDERGROUND OBSTACLES. THERE IS NO LIMIT TO THE NUMBER OF POSTS THAT CAN HAVE ADDITIONAL BLOCKOUTS UP TO 16" DEEP.

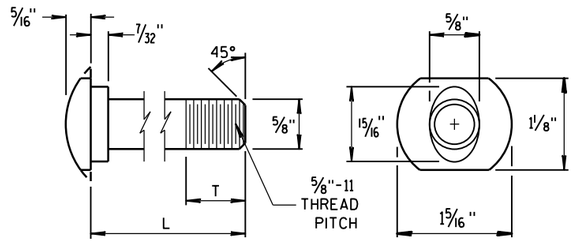


DETAIL FOR 36" BLOCKOUT DEPTH

NOTES: UNDER SPECIAL CIRCUMSTANCES, SUCH AS AVOIDING OBSTACLES THAT ARE NOT RELOCATED, IT IS ACCEPTABLE TO INSTALL ADDITIONAL BLOCKOUTS TO OBTAIN UP TO 36" DEPTH FOR ONE OR TWO POSTS IN A SECTION OF GUARDRAIL.

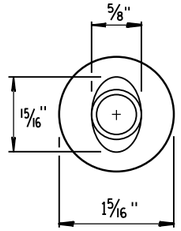
DO NOT USE 16" OR 36" BLOCKOUTS IF IT CAUSES THE POST TO BE DRIVEN BEYOND SHOULDER HINGE POINT OR CAUSES A FIXED OBJECT TO BE WITHIN THE DEFLECTION DISTANCE OF THE BARRIER.

NOTE: 1. ALL FILLETS SHALL HAVE A MINIMUM RADIUS OF 1/16".
2. IF THE BOLT EXTENDS MORE THAN 1/4" FROM THE NUT THE BOLT SHOULD BE TRIMMED BACK.

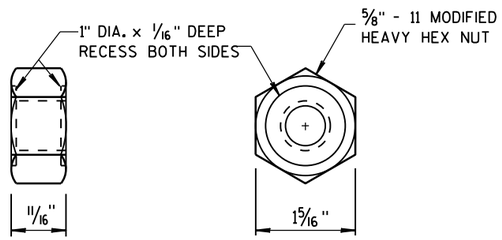


POST BOLT TABLE

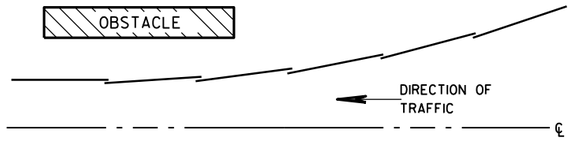
L	T (MIN.)
1 1/4"	1 1/8"
2"	1 3/4"
10"	4"
14"	4 1/16"
18"	4"
21"	4 1/16"
25"	4"



ALTERNATE BOLT HEAD

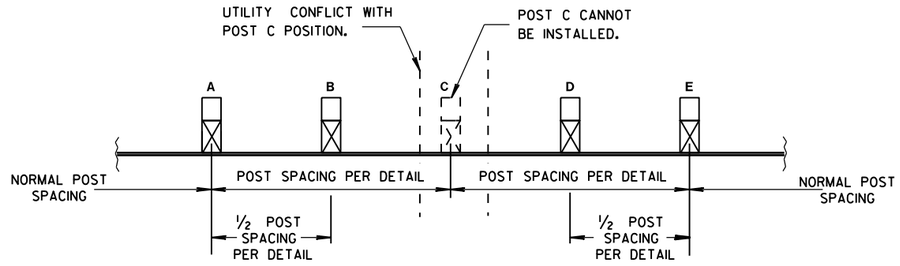


POST BOLT AND RECESS NUT

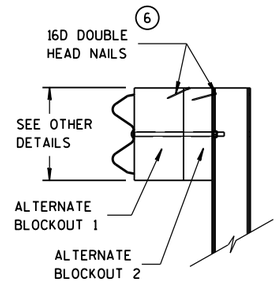


PLAN VIEW

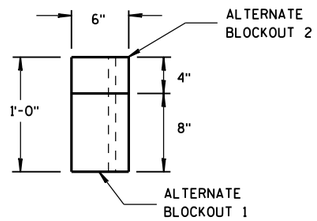
BEAM LAPPING DETAIL



POST DRIVING FOR CONTINUOUS UNDERGROUND OBSTRUCTION



SIDE VIEW



TOP VIEW

ALTERNATE WOOD BLOCKOUT DETAIL

MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June 2014
DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

6
S.D.D. 14 B 42-3c

GENERAL NOTES

(A) THE SLOPE IN THE AREA BOUNDED BY THE GRADELINE, THE HINGE POINT LINE (HPL), AND THE CLEAR ZONE LIMITS (CZL) SHALL BE 4:1 OR FLATTER.

(B) AFTER FINAL ASSEMBLY, RECHECK CABLE TO BE SURE IT IS TAUT AND HAS NOT RELAXED.

(C) DIFFERENT MANUFACTURES REQUIRE DIFFERENT PERFORATED W-BEAM RAIL END PANELS. SEE MANUFACTURES INFORMATION.

(D) THE TOP OF THE STEEL TUBE ON POST 1 AND POST 2 SHALL NOT BE MORE THAN 3" ABOVE THE FINISH GROUND ELEVATION.

(F) ATTACH ALUMINUM SHEET TO E.A.T. HEAD USING 4 STAINLESS STEEL SELF-TAPPING SCREWS. ONE SCREW PER CORNER.

(G) ½" DIAMETER X 3" LONG LAG BOLT AND WASHER.

(H) HARDWARE VARIES BETWEEN DIFFERENT MANUFACTURES. SEE MANUFACTURE'S DRAWING FOR INFORMATION.

(I) DIMENSIONS MAY VARY. SEE MANUFACTURE'S INFORMATION.

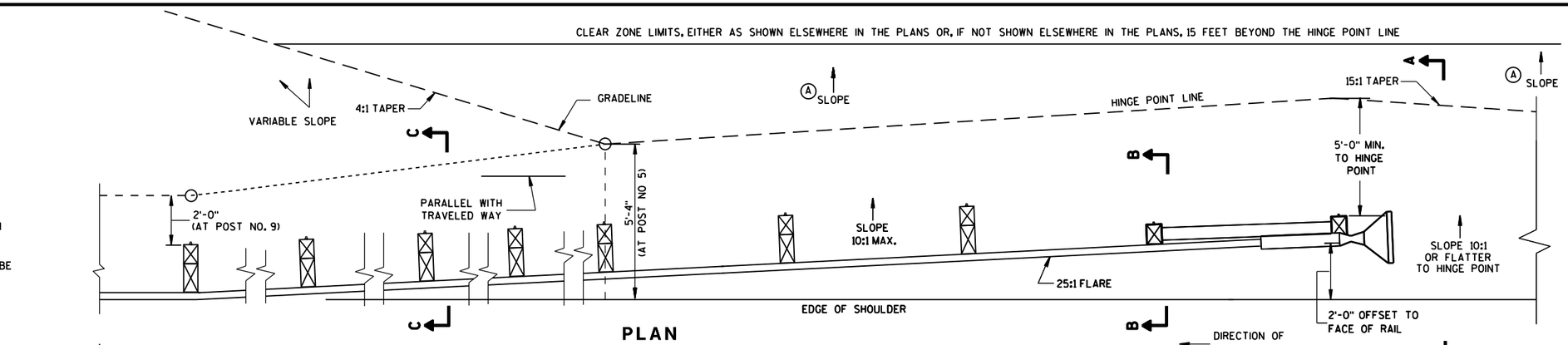
SEE SDD 14B42 FOR MORE INFORMATION.

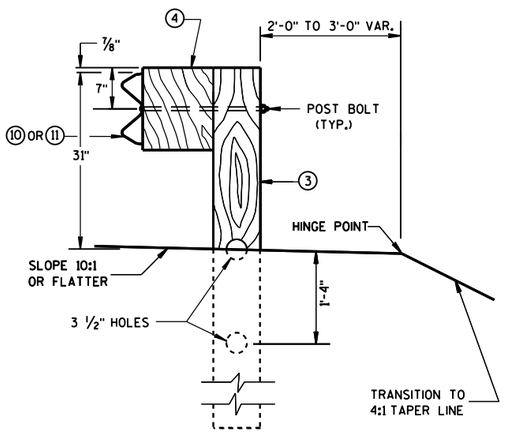
* DO NOT ATTACH BLOCKOUTS TO POSTS 1 AND 2.

DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL.

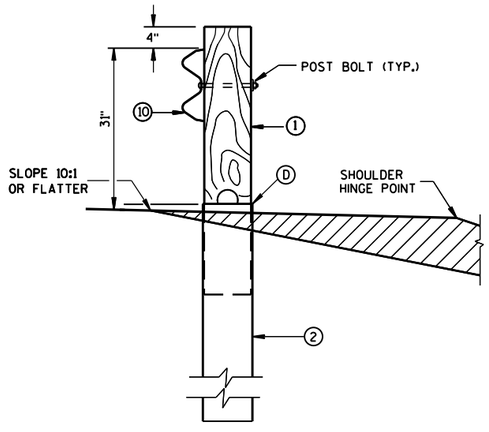
W-BEAM RAIL SPLICES ARE LOCATED AT POST NUMBER 3, AND BETWEEN POST 5 AND 6, BETWEEN POSTS 7 AND 8, AND MIDDLE OF THE SPAN AFTER POST 9.

THE CENTER OF THE UPPER 3½" DIAMETER HOLE ON POST NUMBER 3 THROUGH POST 9 IS TO BE FLUSH WITH THE GROUND LINE UP TO A MAXIMUM OF 2" ABOVE GROUND LINE.

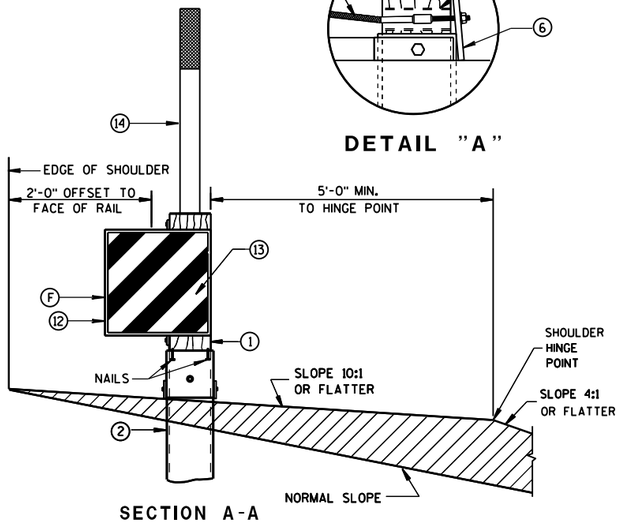




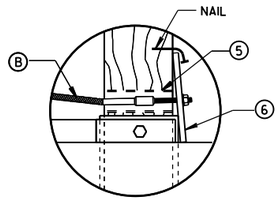
SECTION C-C
TYPICAL AT POST NOS. 3-9



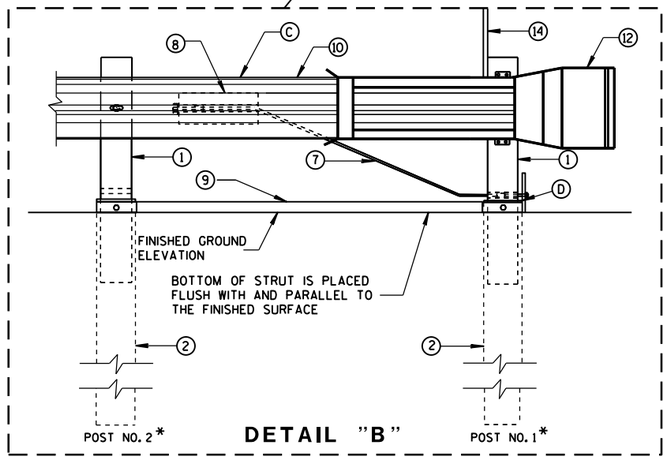
SECTION B-B
TYPICAL AT POST NO. 2*



SECTION A-A
TYPICAL AT POST NO. 1*



DETAIL "A"



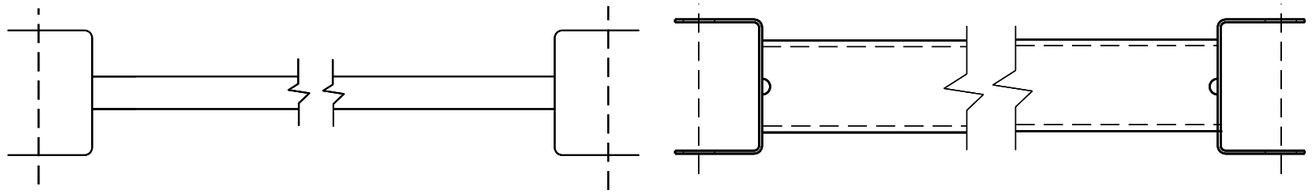
DETAIL "B"

MIDWEST GUARDRAIL SYSTEM
ENERGY ABSORBING TERMINAL
(MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

S.D.D. 14 B 44-2a

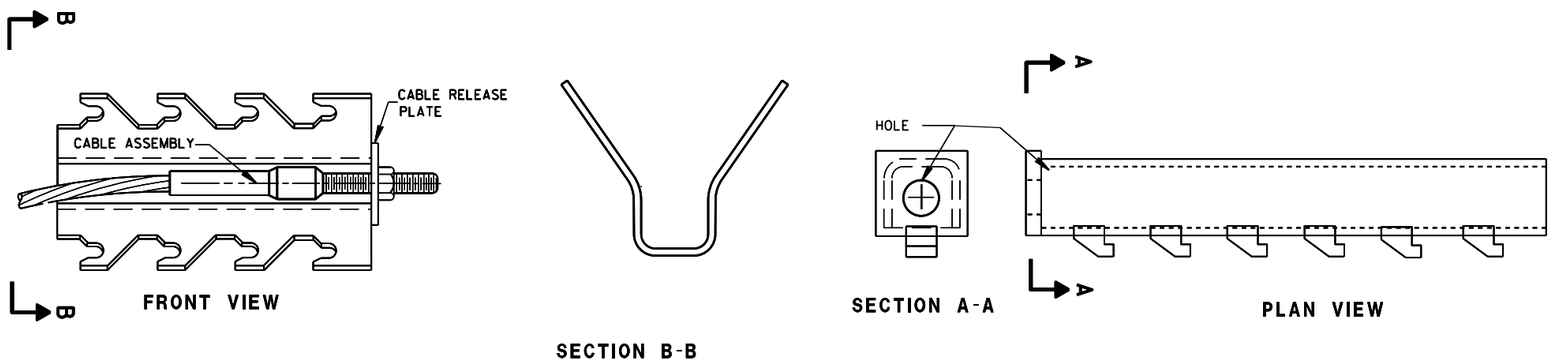
S.D.D. 14 B 44-2a



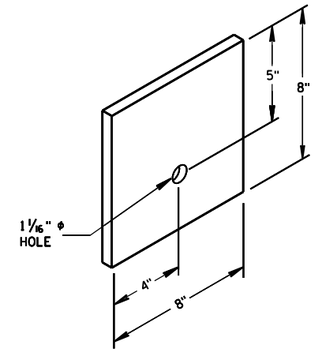
GENERIC GROUND STRUT (9) (H)

BILL OF MATERIALS

PART NO.	DESCRIPTION MATERIALS PROVIDED BY MGS EAT MANUFACTURER. SEE MANUFACTURER'S DETAILS FOR MORE INFORMATION.
(1)	WOOD BREAKAWAY POST
(2)	6" X 8" X 0.188", 6'-0" LONG FOUNDATION TUBE AT POSTS 1 AND 2
(3)	WOOD CRT
(4)	WOOD BLOCKOUT
(5)	PIPE SLEEVE
(6)	BEARING PLATE
(7)	BCT CABLE ASSEMBLY
(8)	ANCHOR CABLE BOX
(9)	GROUND STRUT
(10)	PERFORATED W-BEAM RAIL END PANEL, 12'-6" LONG.
(11)	STANDARD W-BEAM RAIL. MULTIPLE SECTIONS REQUIRED. SECTIONS VARY IN LENGTH.
(12)	END SECTION EAT
(13)	0.040" ALUMINUM SHEET WITH REFLECTIVE SHEETING TYPE F PER SECTION 637 OF THE STANDARD SPECIFICATIONS
(14)	EAT MARKER POST - YELLOW (SEE APPROVED PRODUCTS LIST)



GENERIC ANCHOR CABLE BOX (8) (H)

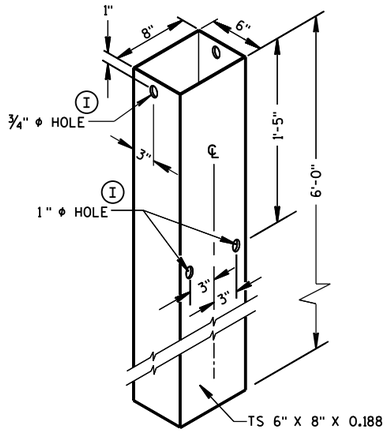


BEARING PLATE (6)

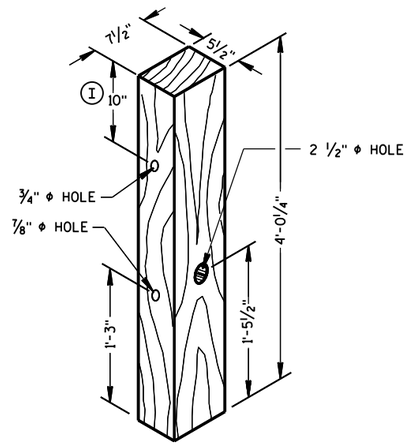
MIDWEST GUARDRAIL SYSTEM
ENERGY ABSORBING TERMINAL
(MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6
S.D.D. 14 B 44-2b

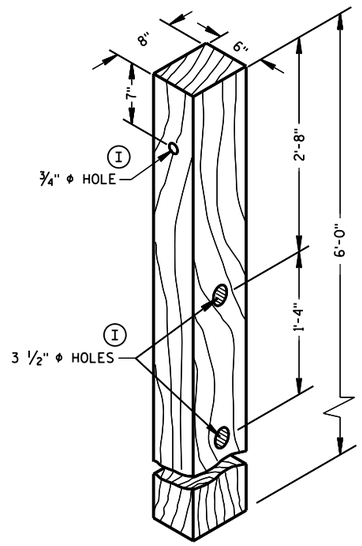


FOUNDATION TUBE (2)



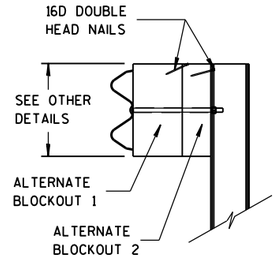
POSTS NUMBER 1 AND 2

WOOD BREAKAWAY POST (1)

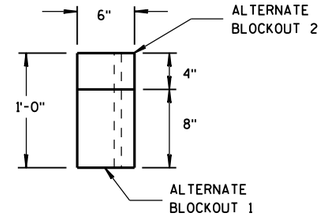


POSTS NUMBER 3-9

WOOD CRT POST (3)

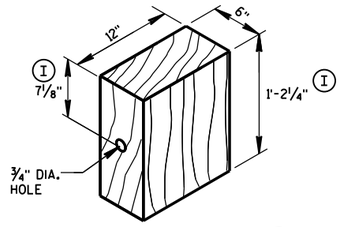


SIDE VIEW



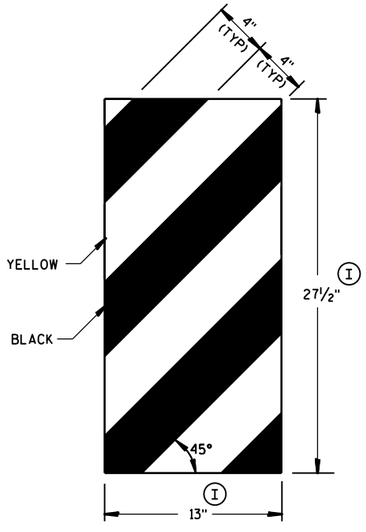
TOP VIEW

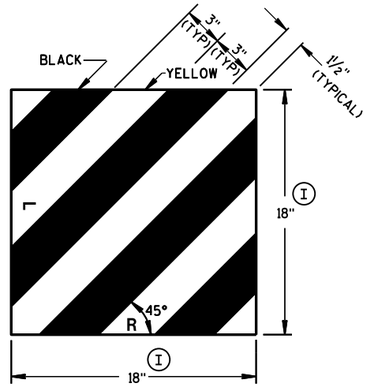
ALTERNATE WOOD BLOCKOUT DETAIL



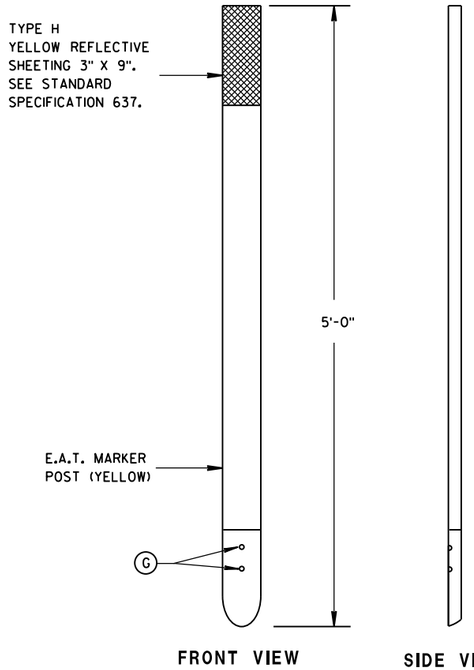
WOOD BLOCKOUT (4)

REQ'D. AT ALL POSTS EXCEPT POST NO'S 1 & 2





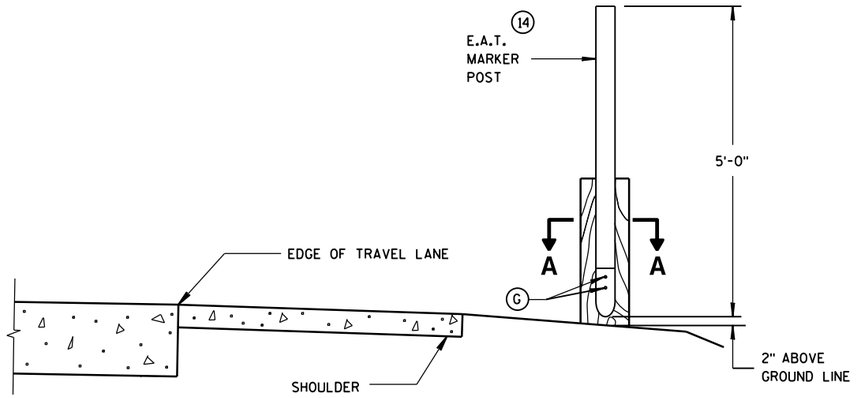
GENERIC REFLECTIVE SHEETING (13) (H)



FRONT VIEW

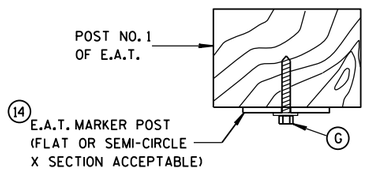
SIDE VIEW

E.A.T. MARKER POST (14)



TYPICAL INSTALLATION OF E.A.T. MARKER POST BACKSIDE OF POST NO. 1

(E.A.T. AND RAIL REMOVED FOR CLARITY)



SECTION A-A

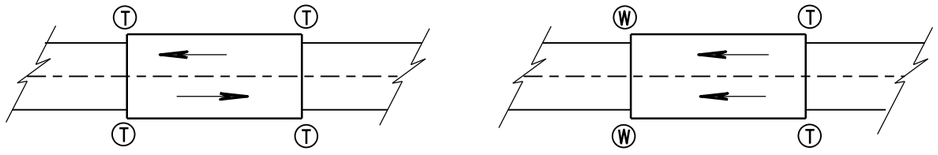
MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June 2014 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS ENGINEER
FHWA

6

S.D.D. 14 B 44-2c



TWO WAY TRAFFIC

ONE WAY TRAFFIC

Ⓣ THRIE BEAM CONNECTION

Ⓦ W-BEAM CONNECTION WHEN REQUIRED

TYPICAL LOCATIONS OF THRIE BEAM AND W-BEAM CONNECTIONS TO BRIDGE

GENERAL NOTES

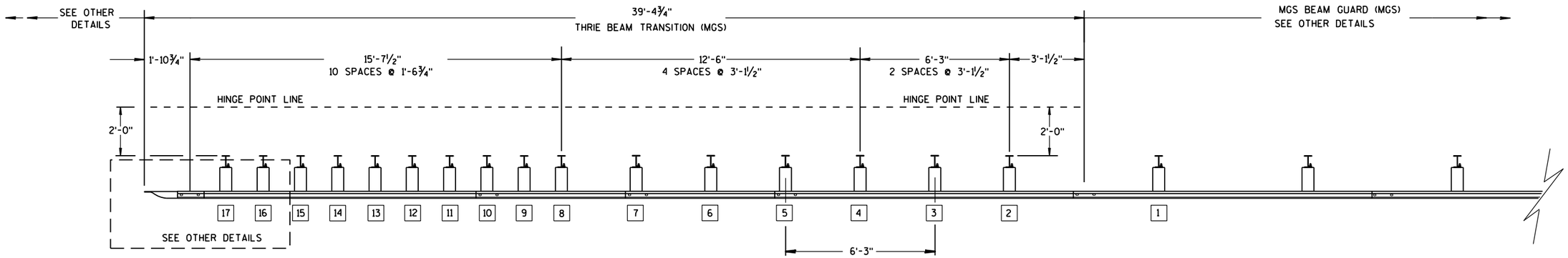
IF ROCK IS ENCOUNTERED, REMOVE ROCK TO FULL DEPTH OF POST PLUS 2½", AND 12" DIAMETER AROUND POST. SEE 14B42 FOR MORE DETAILS.

TRANSITION USES STEEL POSTS ONLY.

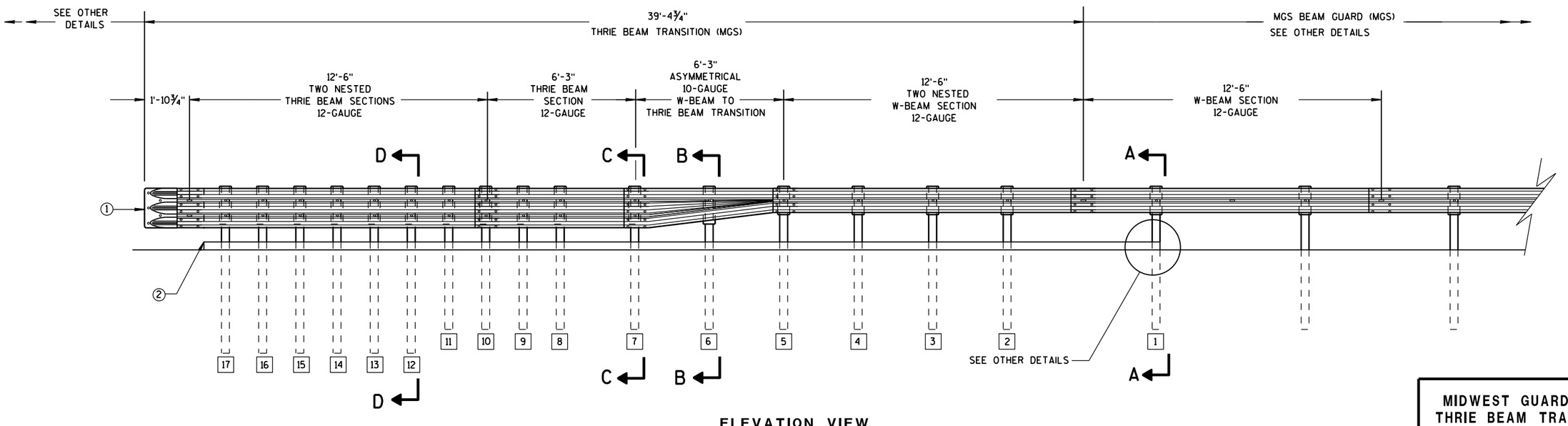
SEE STANDARD DETAIL DRAWING 14 B 42 FOR MORE INFORMATION.

① BRIDGE RAILING TYPE "W" DOES NOT REQUIRE A TERMINAL CONNECTOR.

② OPTIONAL CURB AND GUTTER OR DRAINAGE FEATURE SEE PLAN FOR INFORMATION.



PLAN VIEW



ELEVATION VIEW

MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

S.D.D. 14 B 45-4a

6

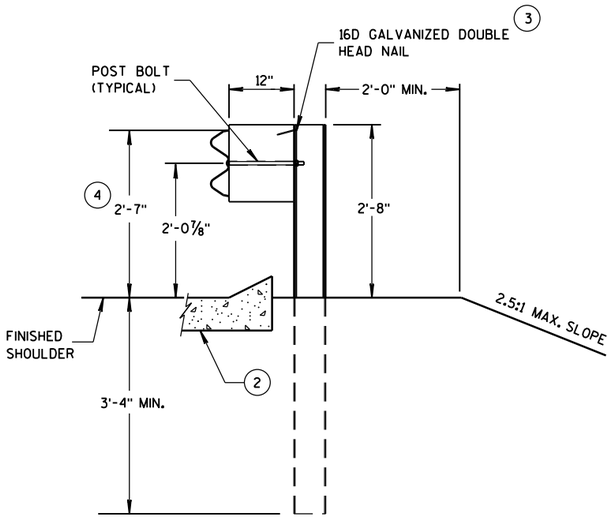
S.D.D. 14 B 45-4a

GENERAL NOTES

(2) OPTIONAL CURB AND GUTTER OR DRAINAGE_FEATURE SEE PLAN FOR INFORMATION.

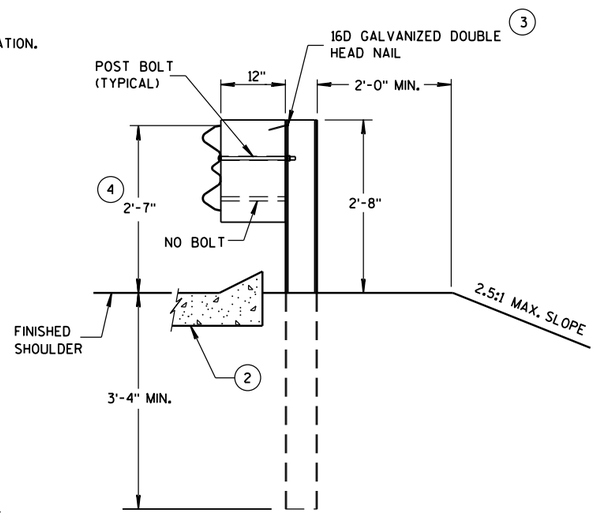
(3) WHEN USING STEEL POSTS AND WOOD BLOCKOUTS INSTALL FOUR 10D GALVANIZED NAILS. INSTALL NAILS AT THE BACK CORNERS OF THE BLOCK AND BEND THE NAILS OVER THE FLANGE OF THE STEEL POST.

(4) TOLERANCE FOR TOP OF W-BEAM RAIL IS ± 1".



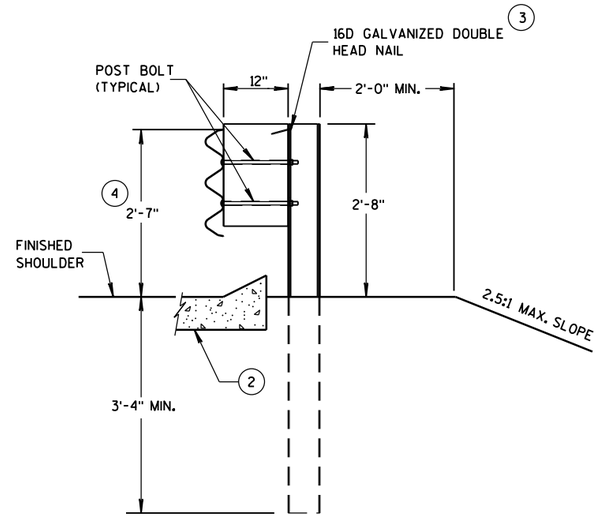
SECTION A-A

POSTS 1-5



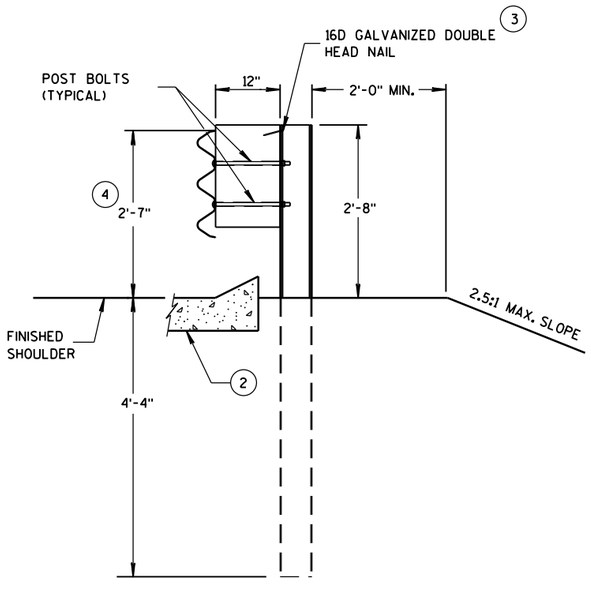
SECTION B-B

POST 6



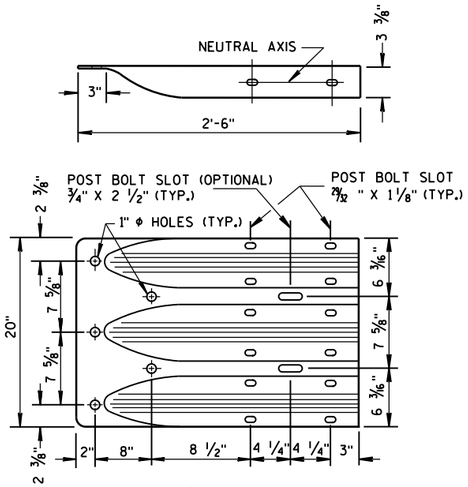
SECTION C-C

POSTS 7-11



SECTION D-D

POSTS 12-17



THRIE BEAM TERMINAL CONNECTOR

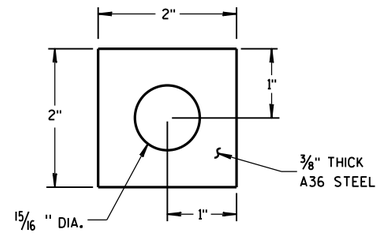
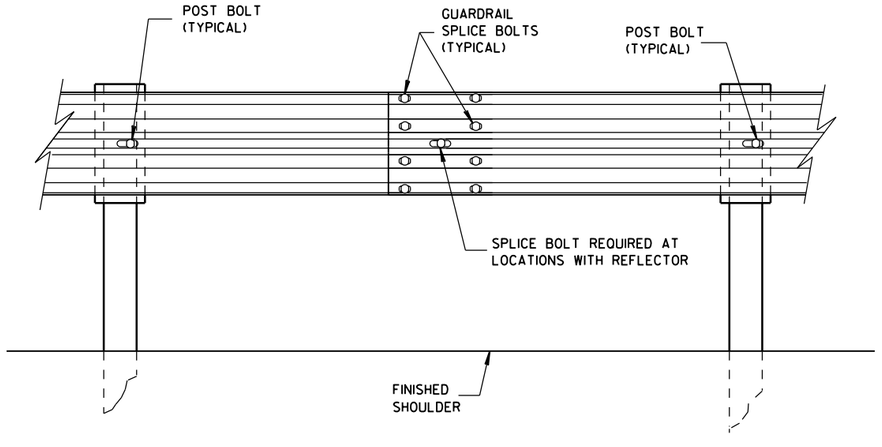
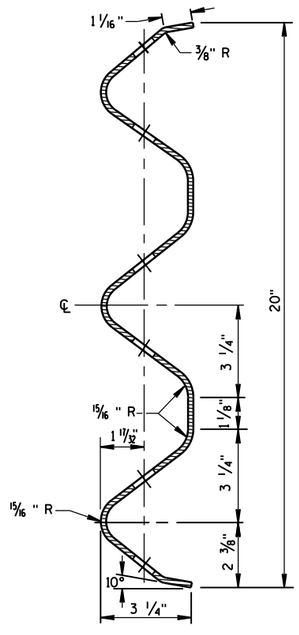


PLATE WASHER DETAIL



SPLICE DETAIL



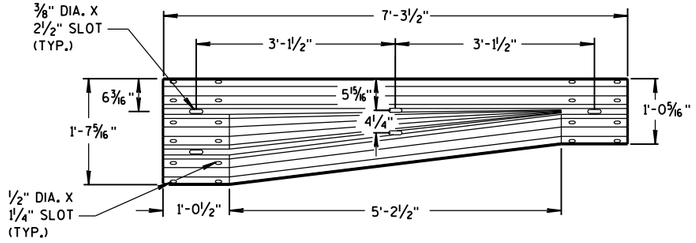
SECTION THRU THRIE BEAM RAIL ELEMENT

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

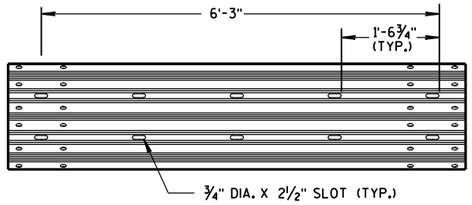
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

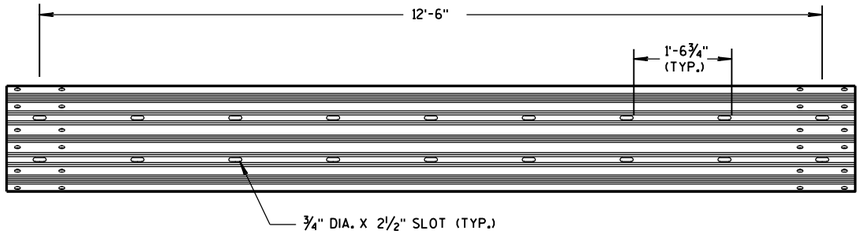
S.D.D. 14 B 45-4b



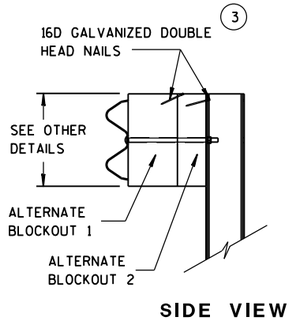
W-BEAM TO THRIE BEAM TRANSITION SECTION



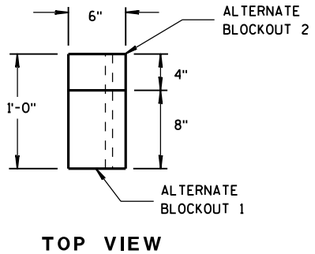
6'-3" THRIE BEAM SECTION



12'-6" THRIE BEAM SECTION

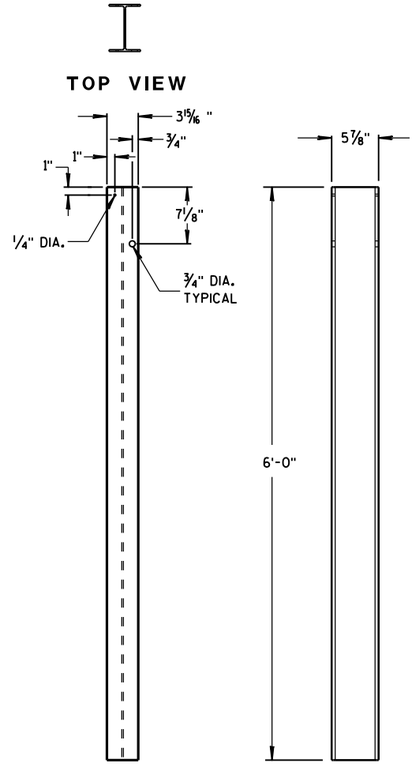


SIDE VIEW

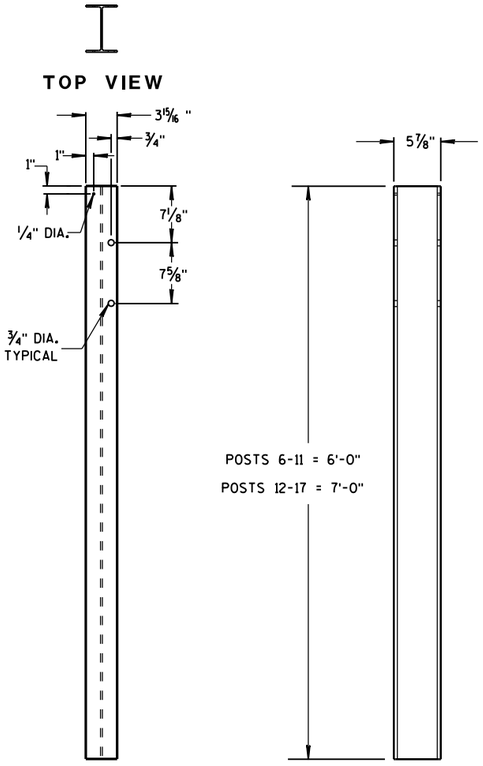


TOP VIEW

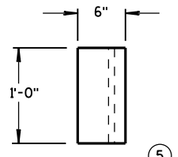
ALTERNATE WOOD BLOCKOUT DETAIL



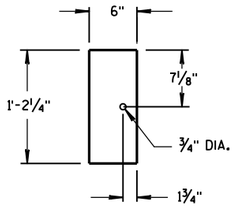
STEEL POSTS 1-5



STEEL POSTS 6-17

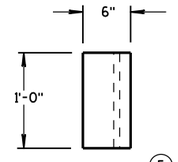


TOP VIEW

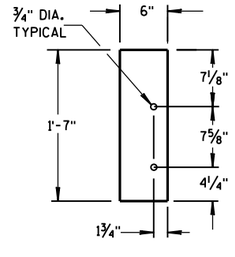


FRONT VIEW

BLOCKOUT POSTS 1-5



TOP VIEW



FRONT VIEW

BLOCKOUT POSTS 6-17

GENERAL NOTES

STEEL POSTS ARE W6X9 OR W6X8.5.

BOLT HOLES FOR POST ARE ON FRONT AND OF SIDE OF POST.

(3) WHEN USING STEEL POSTS AND WOOD BLOCKOUTS INSTALL FOUR 16D GALVANIZED NAILS. INSTALL NAILS AT THE BACK CORNERS OF THE BLOCK AND BEND THE NAILS OVER THE FLANGE OF THE STEEL POST.

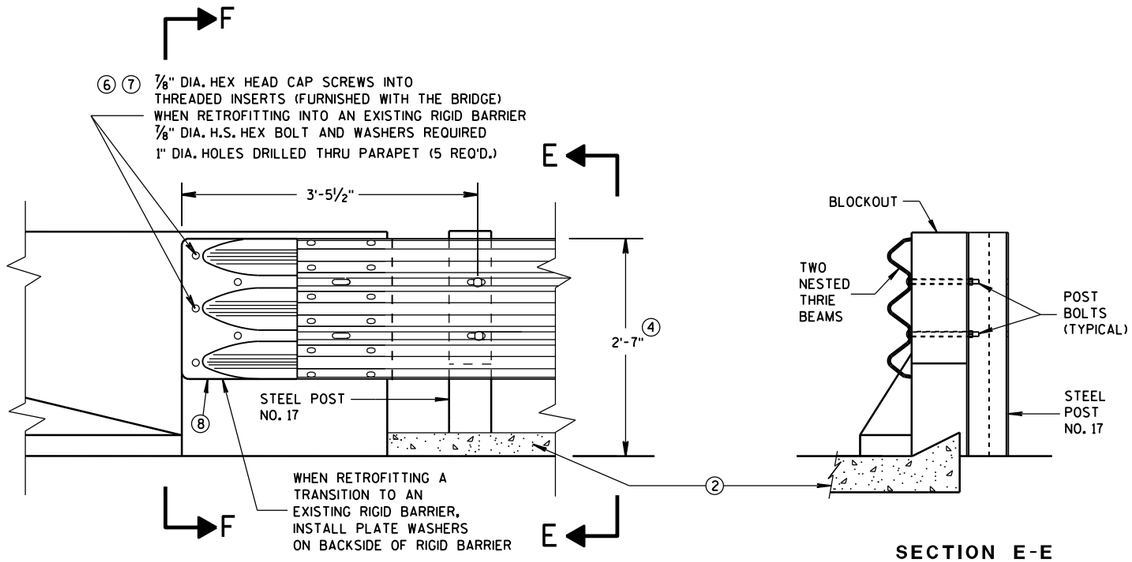
(5) WOOD BLOCKS MAY BE CONSTRUCTED OUT OF 2 WOOD BLOCKS. SEE ALTERNATE WOOD BLOCK DETAIL.

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

S.D.D. 14 B 45-4c



FRONT VIEW

SECTION E-E

THRIE BEAM CONNECTION TO BRIDGE PARAPET WITH SQUARE ENDS

GENERAL NOTES

THESE ARE TYPICAL CONNECTION DETAILS. ADJUST THE POSTION OF CONNECTIONS TO EXISTING BRIDGES TO FIT THE ACTUAL BRIDGE AND SITE DIMENSIONS.

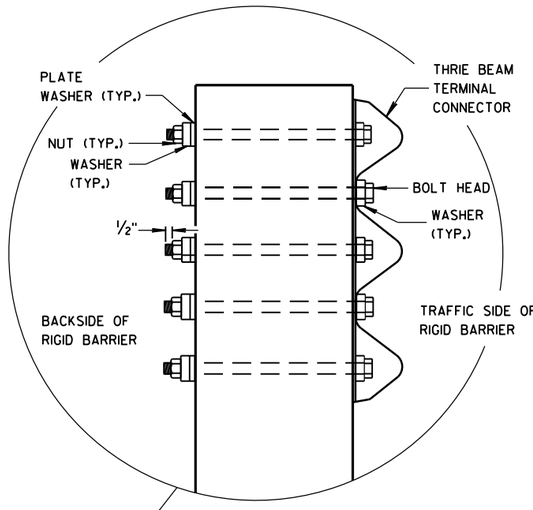
② OPTIONAL CURB AND GUTTER OR DRAINAGE FEATURE SEE PLAN FOR INFORMATION.

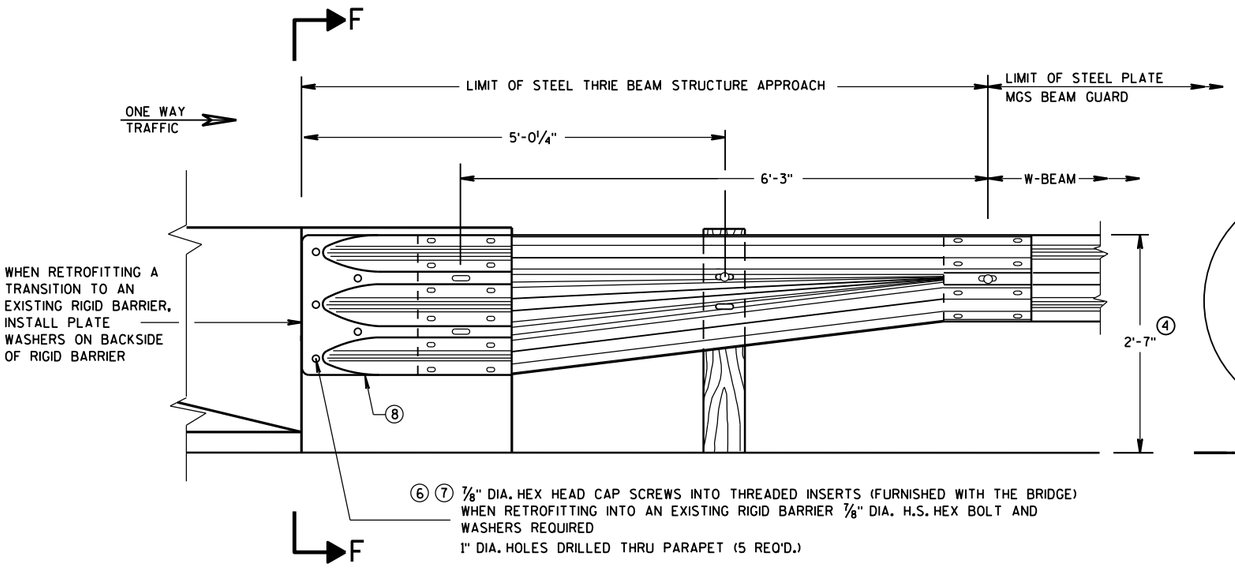
④ TOLERANCE FOR TOP OF BEAM IS ± 1".

⑥ DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

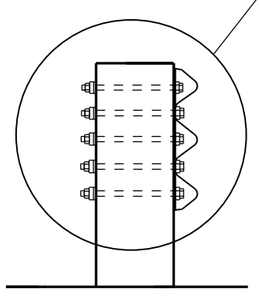
⑦ BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X 5/8" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.

⑧ THE RECESS FOR A W-BEAM CONNECTION, WHICH EXISTS ON SOME PARAPETS OF THIS TYPE, SHALL BE FILLED WITH A TREATED TIMBER BLOCKOUT. BLOCKOUT SIZE IS 1'-6" X 2'-0" X 3 1/2".

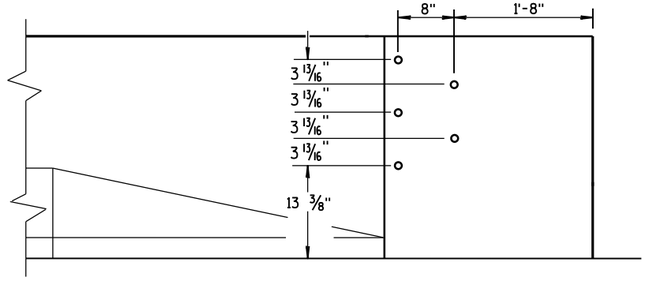




FRONT VIEW



SECTION F-F



DRILL HOLE LOCATION

W BEAM TRANSITION AND CONNECTION TO BRIDGE PARAPETS WITH SQUARE ENDS

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA
47
NT

6

S.D.D. 14 B 45-4d

6

S.D.D. 14 B 45-4d

GENERAL NOTES

THESE ARE TYPICAL CONNECTION DETAILS. ADJUST THE POSTION OF CONNECTIONS TO EXISTING BRIDGES TO FIT THE ACTUAL BRIDGE AND SITE DIMENSIONS.

(2) OPTIONAL CURB AND GUTTER OR DRAINAGE FEATURE SEE PLAN FOR INFORMATION.

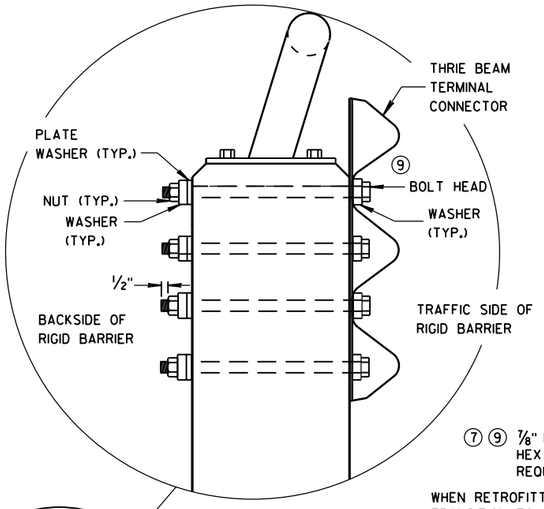
(4) TOLERANCE FOR TOP OF BEAM IS ± 1".

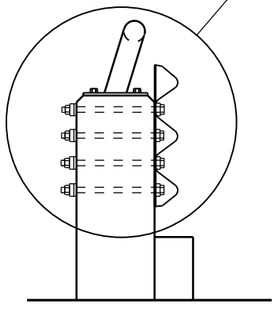
(6) DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

(7) BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X 5/8" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.

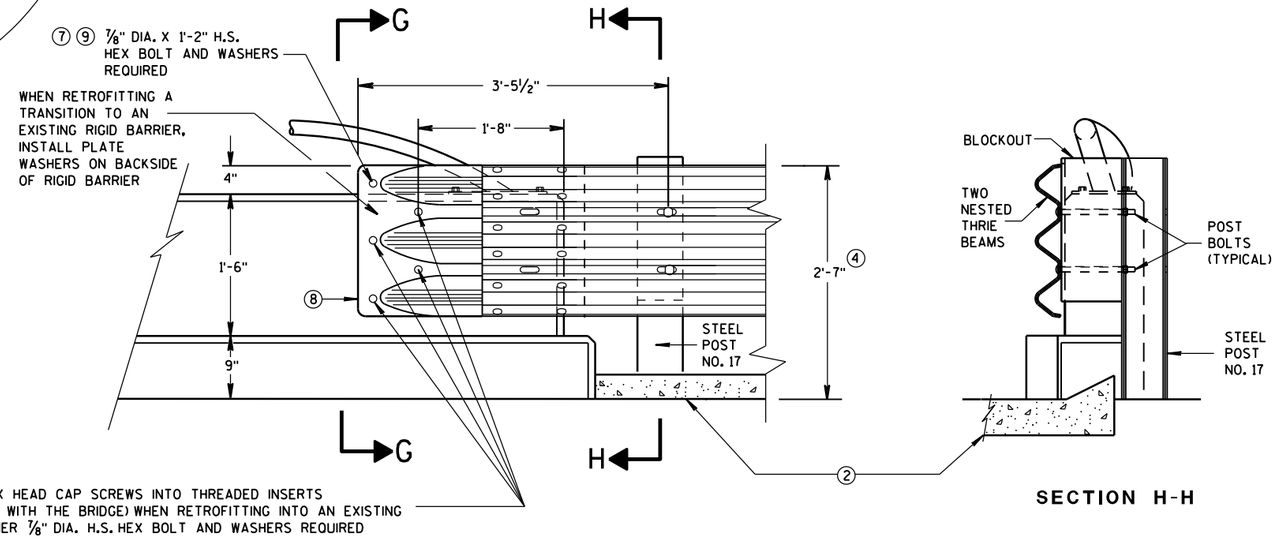
(8) THE RECESS FOR A W-BEAM CONNECTION, WHICH EXISTS ON SOME PARAPETS OF THIS TYPE, SHALL BE FILLED WITH A TREATED TIMBER BLOCKOUT. BLOCKOUT SIZE IS 1'-6" X 2'-0" X 3 1/2".

(9) BOLT, NUT AND WASHERS NOT REQUIRED FOR THIS LOCATION WHEN RETROFITTING AN EXISTING PAPAPET AND THE HOLE IS EITHER ABOVE PARAPET OR WITHIN 4 INCHES OF THE EDGE OF PARAPET.





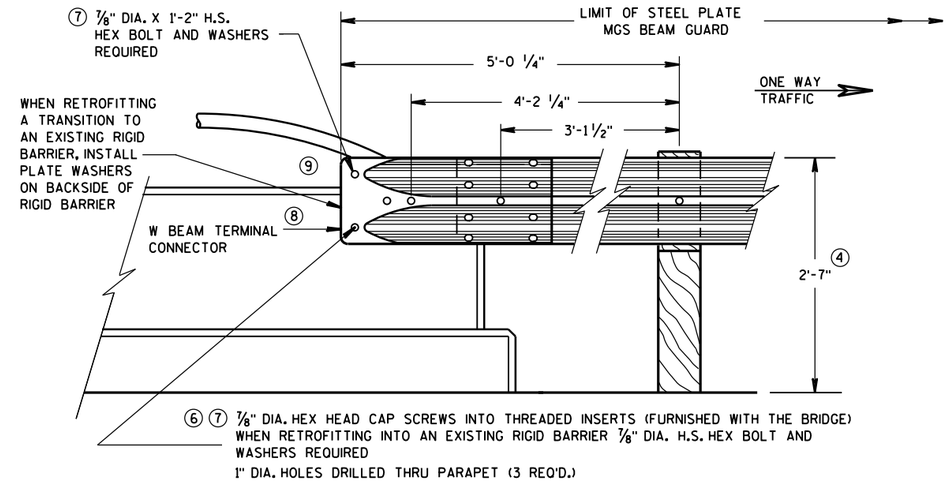
SECTION G-G



FRONT VIEW

SECTION H-H

THRIE BEAM CONNECTION TO VERTICAL FACED PARAPETS



FRONT VIEW

W BEAM CONNECTION TO VERTICAL FACE PARAPET

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

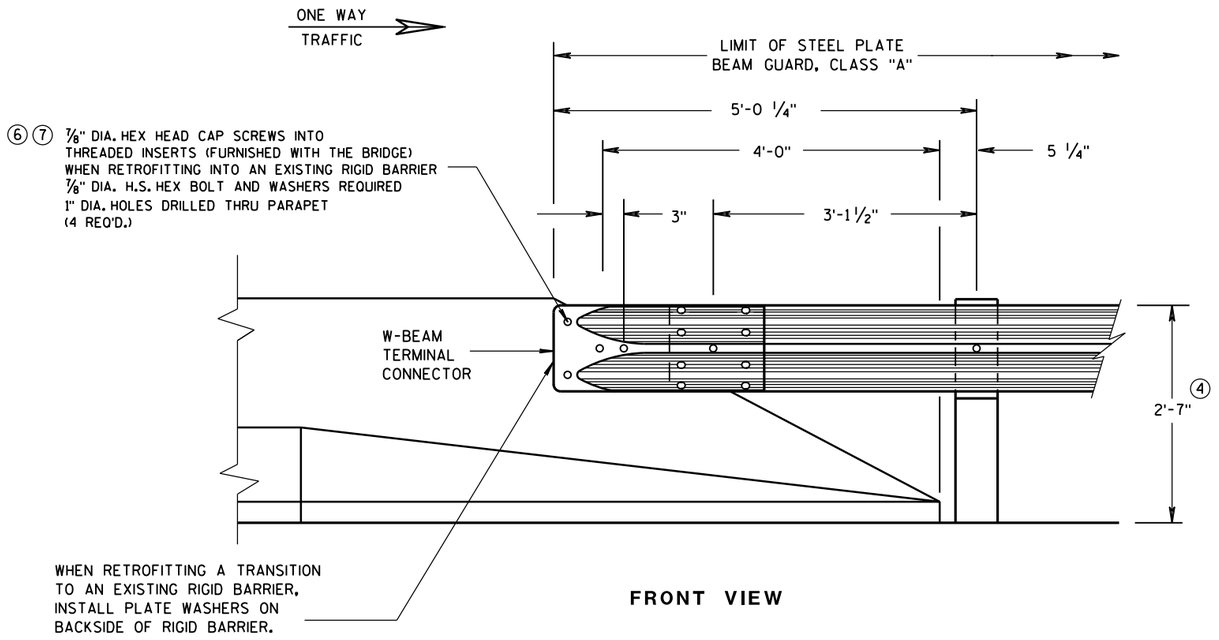
NT

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S.D.D. 14 B 45-4e

6

S.D.D. 14 B 45-4e



FRONT VIEW

W BEAM CONNECTION TO PARAPETS WITH SLOPED ENDS

(USE ONLY AT TRAFFIC EXIT END OF ONE WAY BRIDGE)

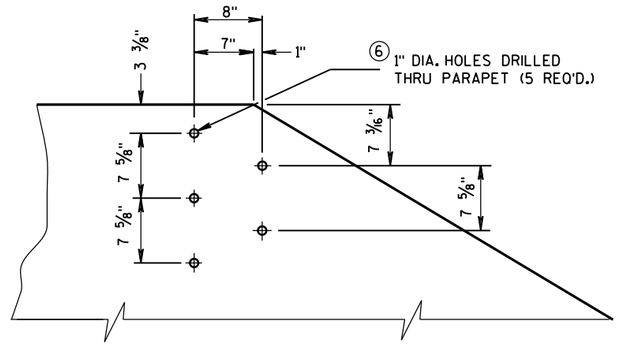
GENERAL NOTES

② OPTIONAL CURB AND GUTTER OR DRAINAGE FEATURE SEE PLAN FOR INFORMATION.

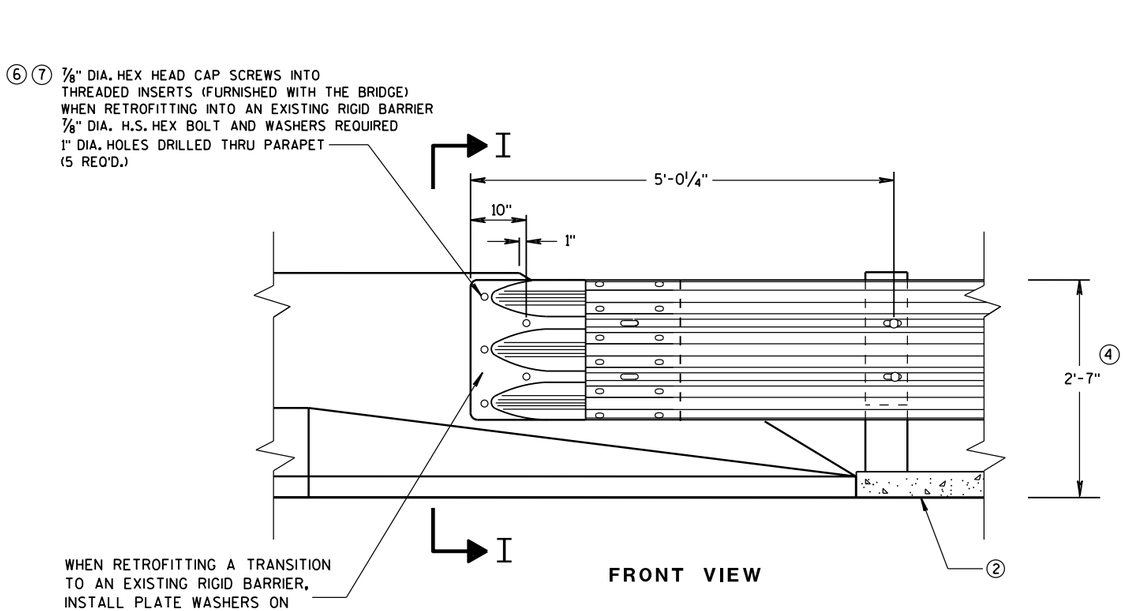
④ TOLERANCE FOR TOP OF BEAM IS ± 1".

⑥ DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

⑦ BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X 5/8" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.

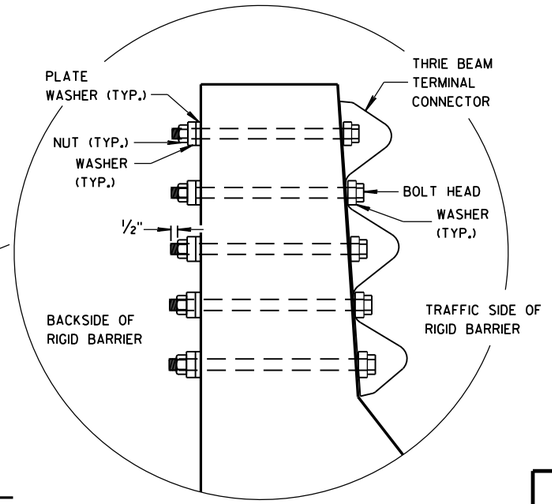


DRILL HOLE LOCATION AND PATTERN
FOR THRIE BEAM CONNECTION



FRONT VIEW

SECTION I-I



THRIE BEAM CONNECTION TO BRIDGE PARAPETS WITH SLOPED ENDS

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

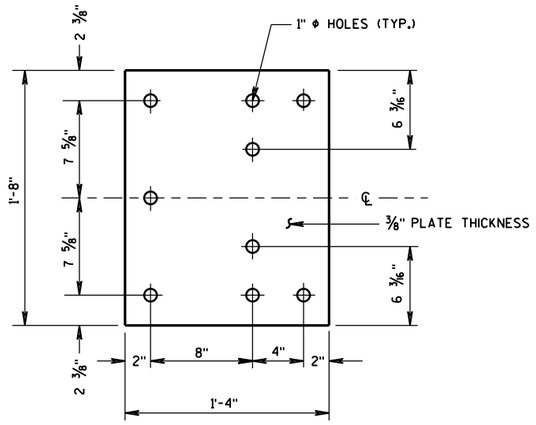
APPROVED
June, 2015 — DATE
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FHWA

6

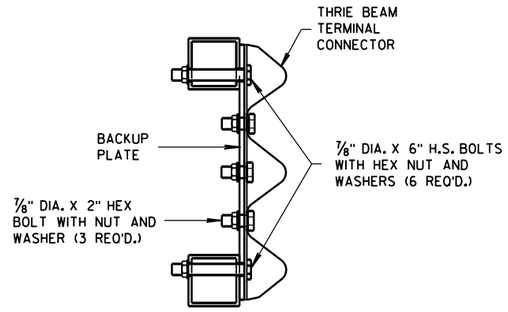
S.D.D. 14 B 45-4f

6

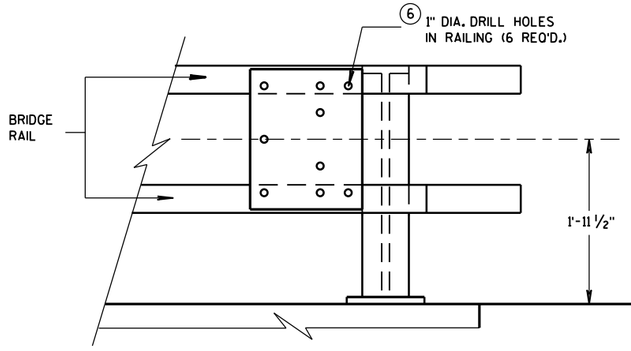
S.D.D. 14 B 45-4f



BACK-UP PLATE DETAIL



SECTION J-J

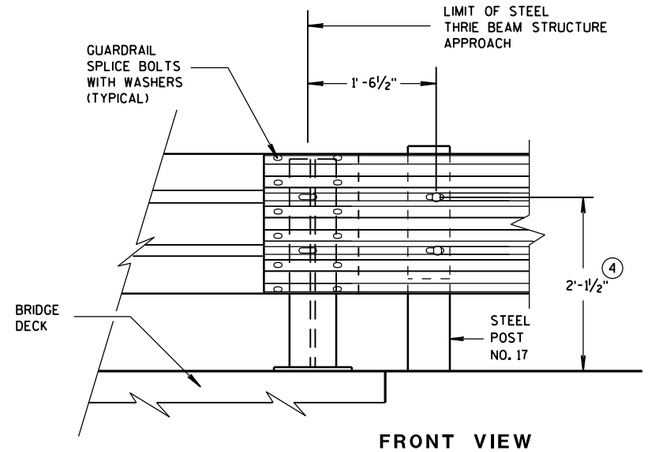


BACK-UP PLATE MOUNTING ONTO BRIDGE RAILING

GENERAL NOTES

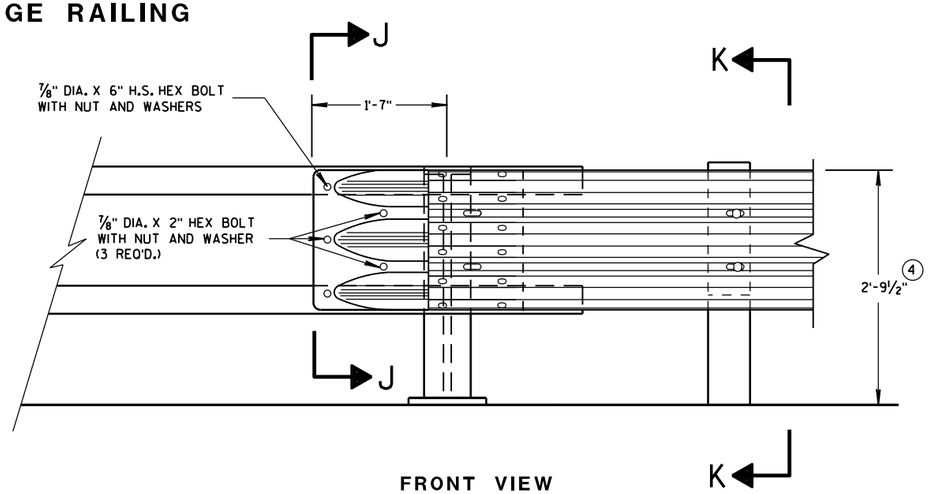
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⑥ DRILLING HOLES THROUGH THE PAPRPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

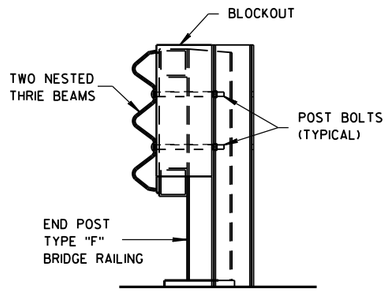


FRONT VIEW

THRIE BEAM CONNECTION TO STEEL RAILING TYPE "W"



FRONT VIEW



SECTION K-K

THRIE BEAM CONNECTION TO TUBULAR RAILING TYPE "F"

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

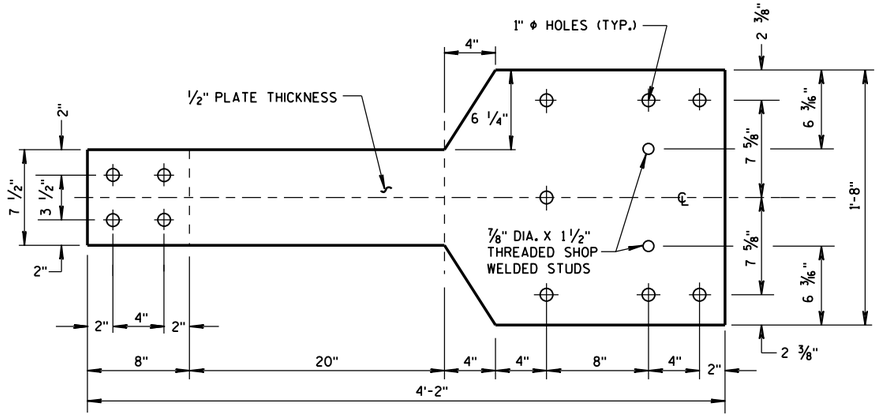
APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA
NT

S.D.D. 14 B 45-4g

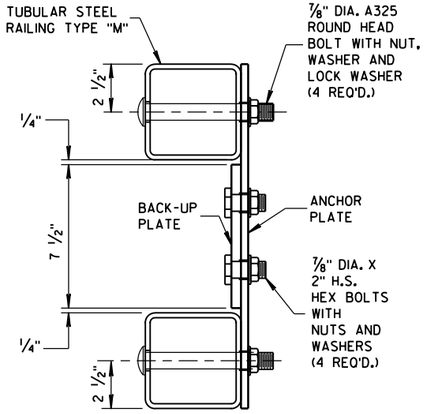
S.D.D. 14 B 45-4g

GENERAL NOTES

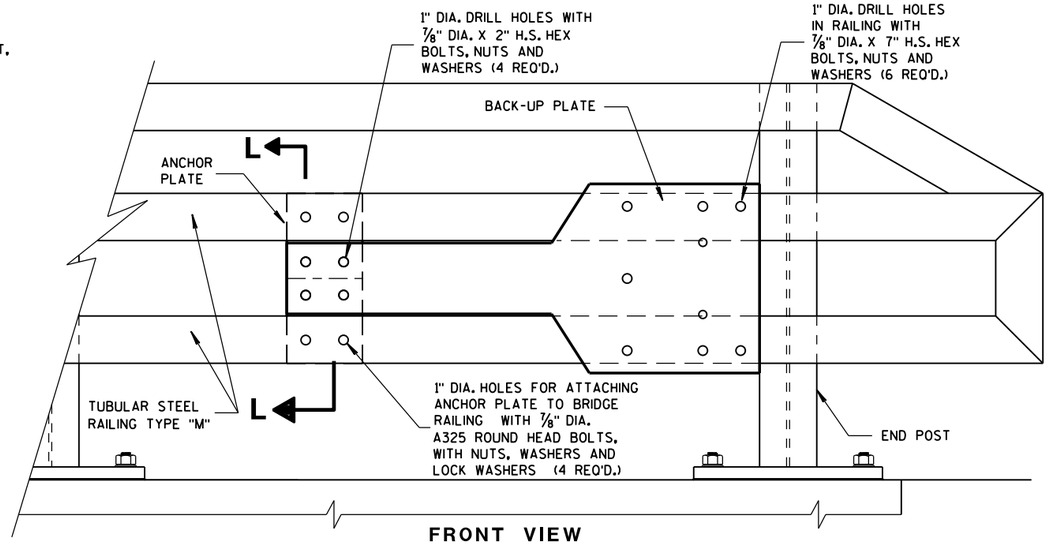
(4) TOLERANCE FOR TOP OF W-BEAM RAIL IS ± 1".



FRONT VIEW

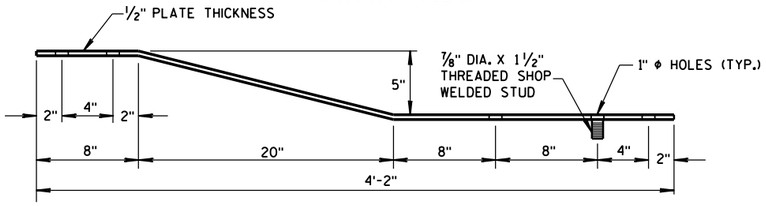


SECTION L-L



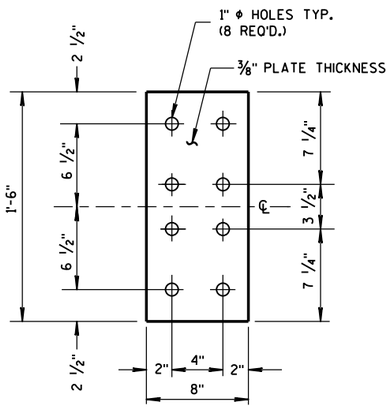
FRONT VIEW

ANCHOR AND BACK-UP PLATE MOUNTING TO BRIDGE RAILING, TYPE "M"



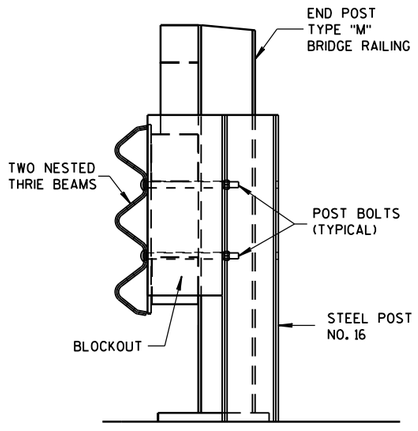
PLAN VIEW

BACK-UP PLATE DETAIL, TYPE "M"

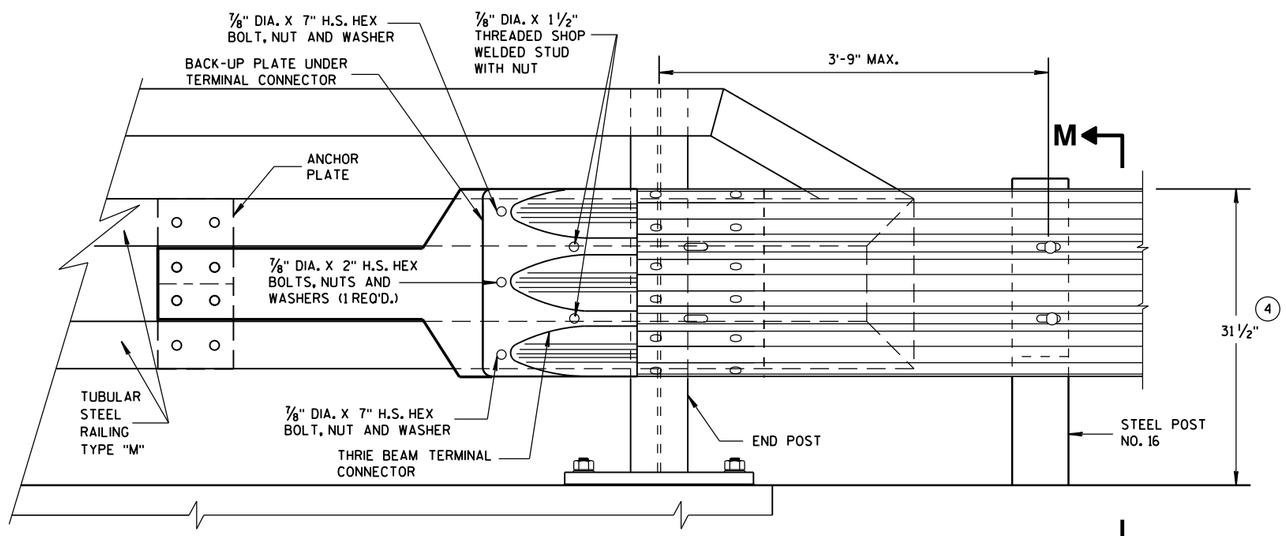


FRONT VIEW

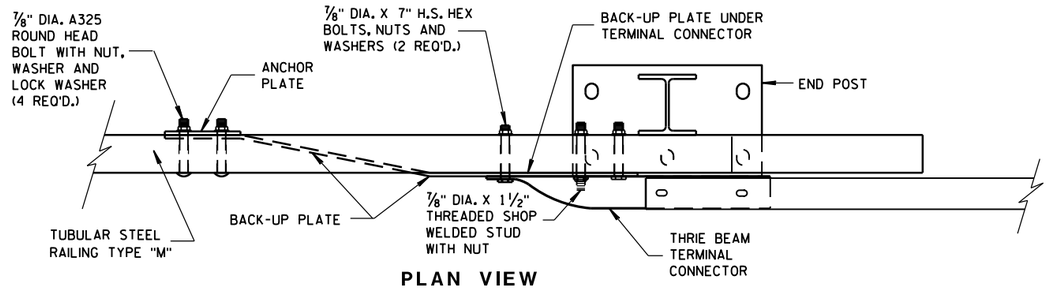
ANCHOR PLATE DETAIL, TYPE "M"



SECTION M-M



FRONT VIEW



PLAN VIEW

THRIE BEAM CONNECTION TO TUBULAR RAILING, TYPE "M"

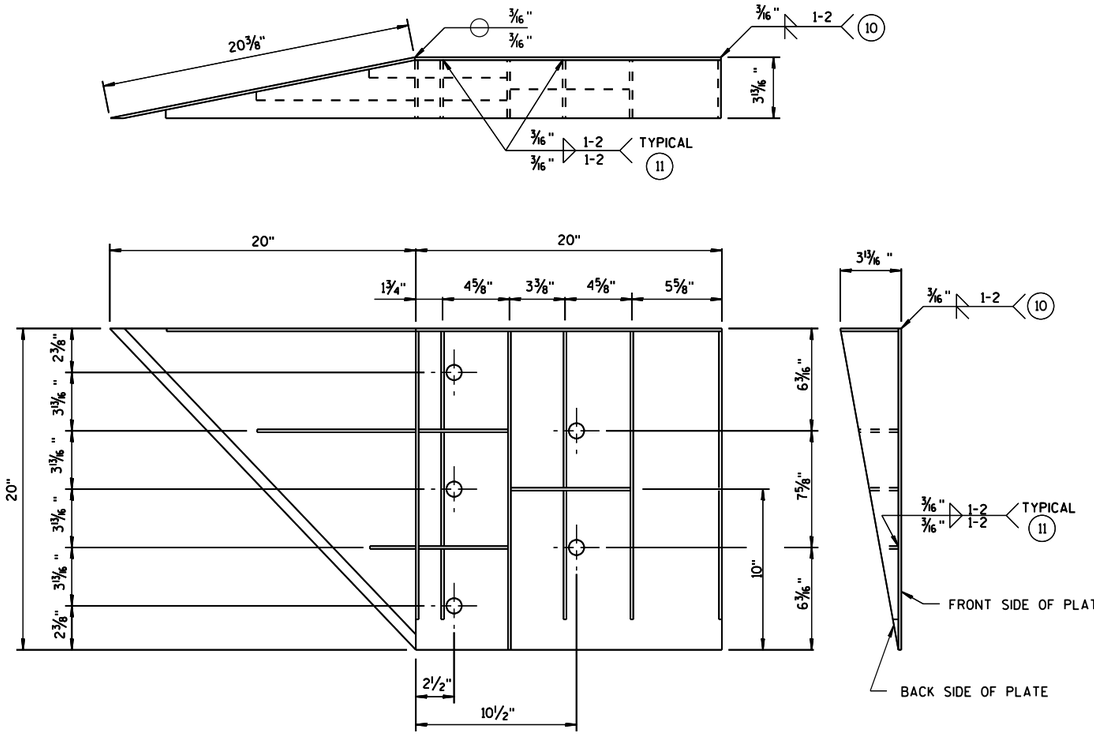
MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
June, 2015	/S/ Jerry H. Zogg
DATE	ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA	

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S.D.D. 14 B 45-4h

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WELDING INSTRUCTION

(VIEWED FROM BACK SIDE OF PLATE)

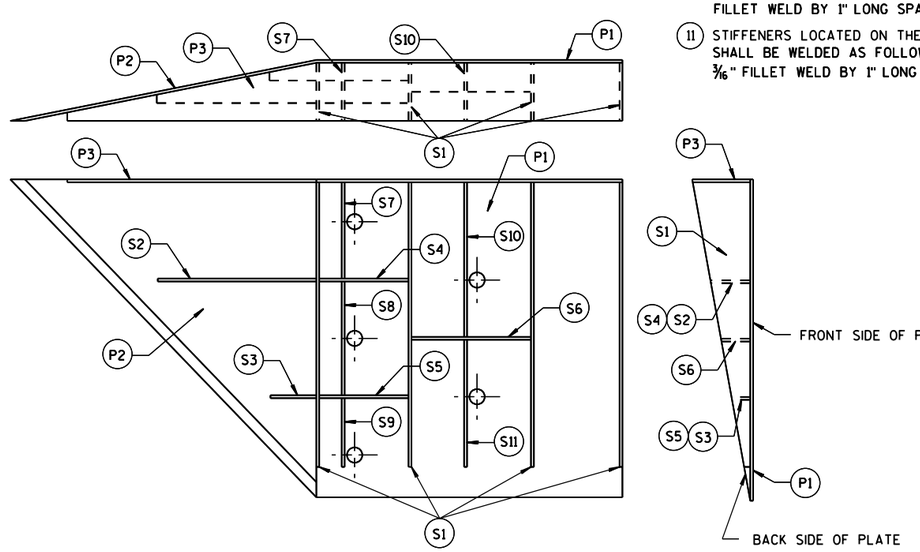


PLATE AND STIFFENER IDENTIFICATION

(VIEWED FROM BACK SIDE OF PLATE)

GENERAL NOTES

COVER PLATE PANELS ARE 3/16" THICK.

ALL STIFFENERS ARE 1/4" THICK.

CONNECTOR PLATE SHALL BE FABRICATED FROM ASTM GRADE A36 STEEL AND GALVANIZED.

FOR GALVANIZED REQUIREMENTS, SEE SECTION 614 OF THE STANDARD SPECIFICATIONS.

ALL HOLE DIAMETERS SHALL BE 1".

FOR OPPOSITE SIDE INSTALLATION MIRROR DRAWINGS.

(10) STIFFENERS LOCATED AT THE OUTSIDE EDGES OF THE COVER PLATES SHALL BE WELDED AS FOLLOWS:
SINGLE BEVEL GROOVE WELD ON EXTERNAL SIDES AND 3/16" FILLET WELD BY 1" LONG SPACED AT 2" ON INTERNAL SIDES.

(11) STIFFENERS LOCATED ON THE INSIDE OF THE COVER PLATE SHALL BE WELDED AS FOLLOWS:
3/16" FILLET WELD BY 1" LONG SPACED AT 2".

CONNECTOR PLATE DIMENSION (PER ASSEMBLY)

PLATE	QUANTITY	SHAPE	SIZE (A x B x C x D)	THICKNESS
P1	1		20" x 20"	3/16"
P2	1		20" x 20" x 28 9/16"	3/16"
P3	1		39" x 3 5/8" x 20" x 19 5/16"	3/16"
S1	4		18 7/16" x 3 3/8" x 18 3/4"	1/4"
S2	1		10 1/4" x 2 7/16" x 10 3/8" x 1/2"	1/4"
S3	1		3" x 1 1/16" x 3 1/8" x 1/2"	1/4"
S4	1		6 1/8" x 2 7/16"	1/4"
S5	1		6 1/8" x 1 1/16"	1/4"
S6	1		7 3/4" x 1 3/4"	1/4"
S7	1		2 9/16" x 6" x 3 5/8" x 5 7/8"	1/4"
S8	1		1 5/32" x 7 1/2" x 2 1/2" x 7 3/8"	1/4"
S9	1		6 1/16" x 6 3/16" x 1 1/32"	1/4"
S10	1		1 7/8" x 9 7/8" x 3 5/8" x 9 11/16"	1/4"
S11	1		8 1/2" x 8 3/4" x 1 13/16"	1/4"

SINGLE SLOPE CONNECTION PLATE

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

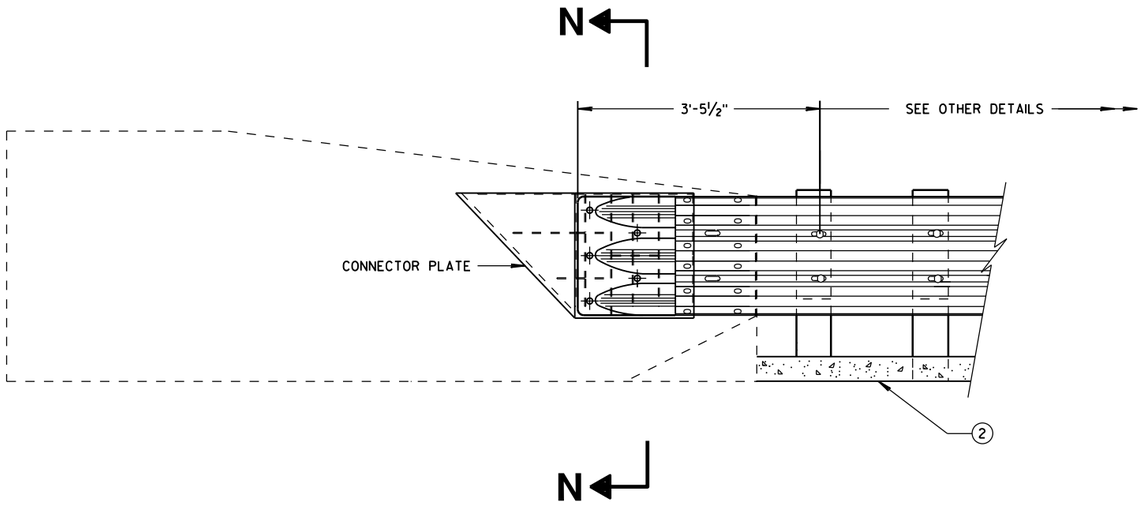
APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS ENGINEER
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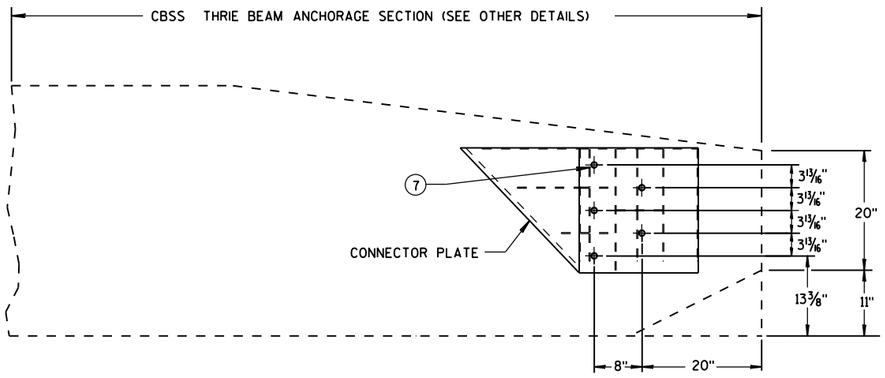
S.D.D. 14 B 45-4i

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S.D.D. 14 B 45-4i



THRIE BEAM CONNECTION TO SINGLE SLOPE BARRIER



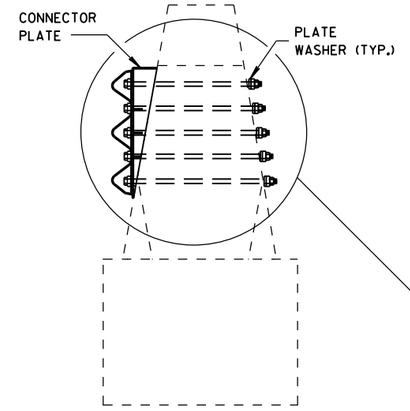
SINGLE SLOPE CONNECTION PLATE PLACEMENT

GENERAL NOTES

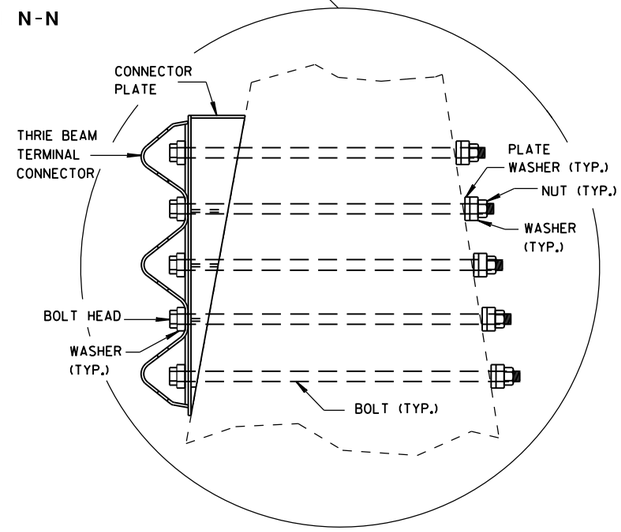
CONNECTOR PLATE, DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

(2) OPTIONAL CURB AND GUTTER OR DRAINAGE FEATURE SEE PLAN FOR INFORMATION.

(7) BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X 5/8" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.



SECTION N-N



MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

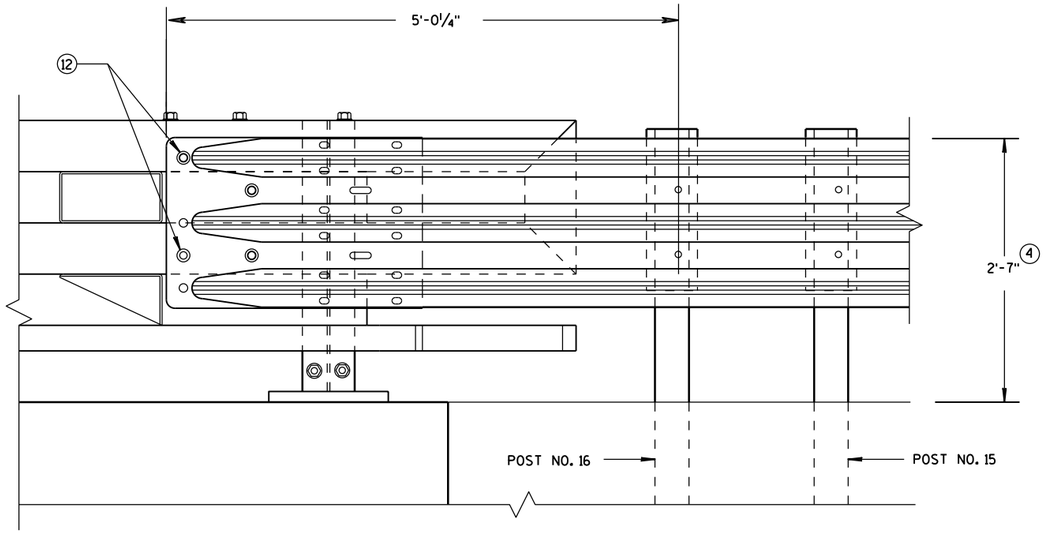
APPROVED
June, 2015 — DATE
/S/ Jerry H. Zoga — ROADWAY STANDARDS DEVELOPMENT ENGINEER
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S.D.D. 14 B 45-4j

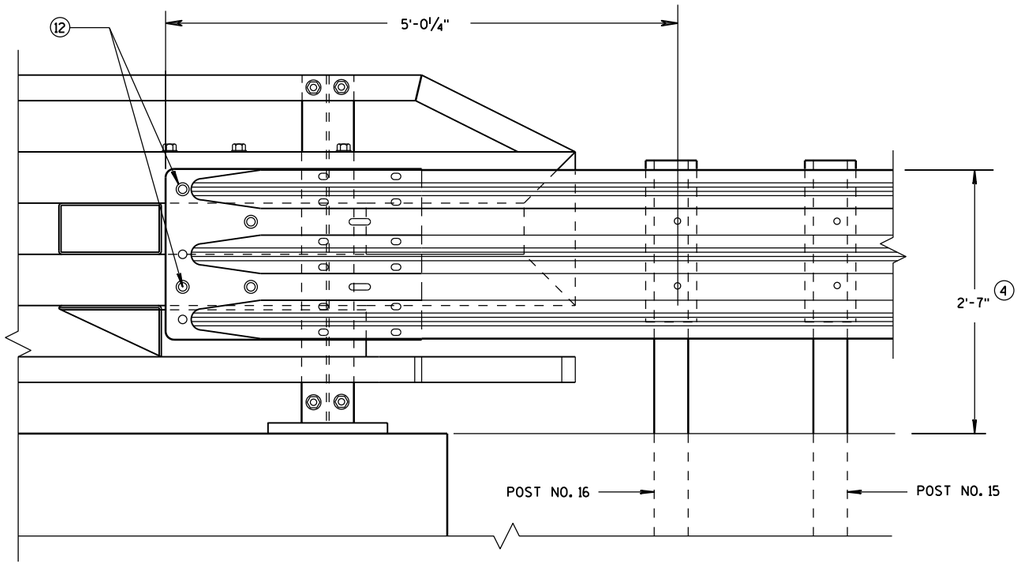
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S.D.D. 14 B 45-4j



ELEVATION OF DETAIL AT NY3 END POST

THRIE BEAM RAIL ATTACHMENT



ELEVATION OF DETAIL AT NY4 END POST

THRIE BEAM RAIL ATTACHMENT

GENERAL NOTES

(4) TOLERANCE FOR TOP OF BEAM IS ± 1".

(12) BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. ON BACKSIDE OF PARAPET ONE ROUND WASHER, AND NUT REQUIRED. BOLT THREAD IS TO EXTEND ½-INCH BEYOND NUT.

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June, 2015
DATE

/S/ Jerry H. Zogg
ROADWAY STANDARDS DEVELOPMENT ENGINEER

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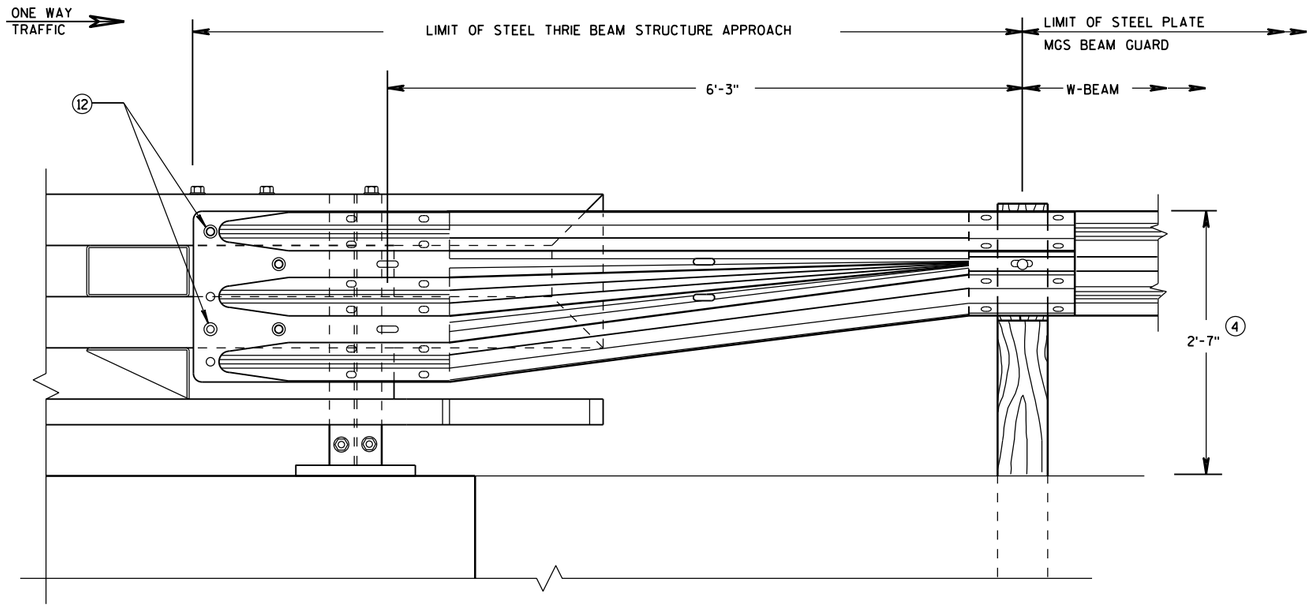
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S.D.D. 14 B 45-4k

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S.D.D. 14 B 45-4k



FRONT VIEW

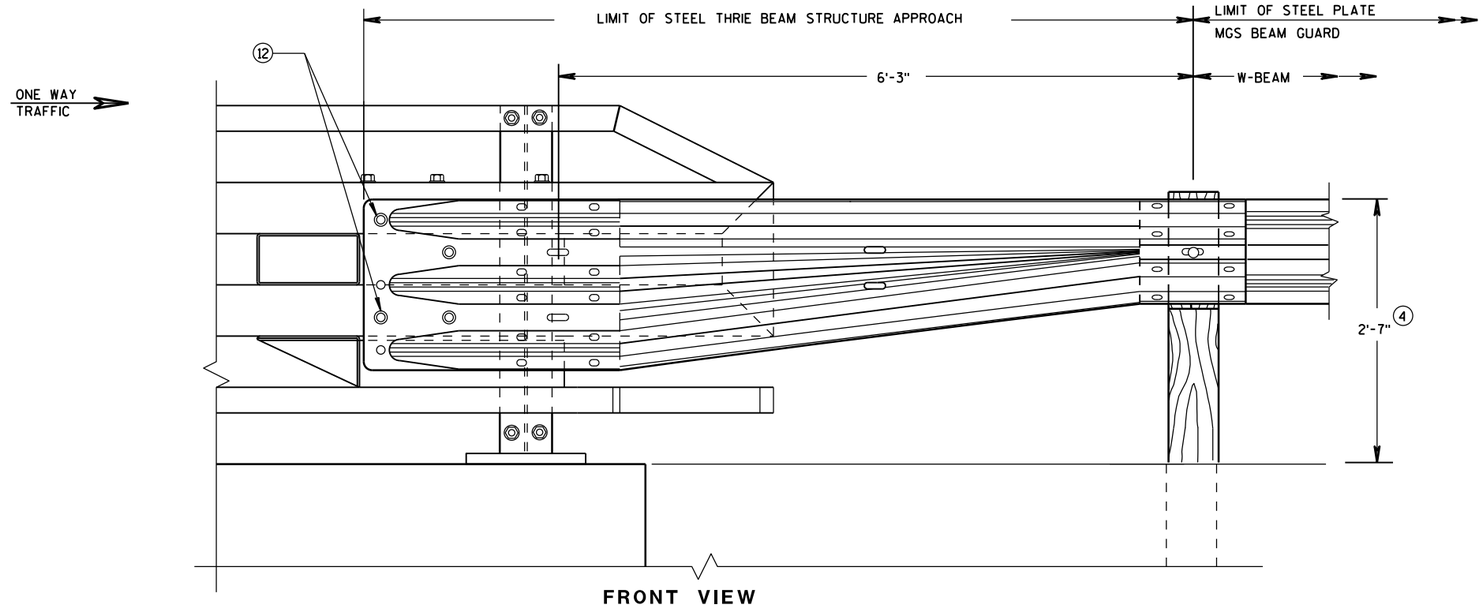
W BEAM TRANSITION AND CONNECTION TO BRIDGE RAILING TYPE "NY3"

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

GENERAL NOTES

(4) TOLERANCE FOR TOP OF BEAM IS ± 1".

(12) BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. ON BACKSIDE OF PARAPET ONE ROUND WASHER, AND NUT REQUIRED. BOLT THREAD IS TO EXTEND ½-INCH BEYOND NUT.



FRONT VIEW

W BEAM TRANSITION AND CONNECTION TO BRIDGE RAILING TYPE "NY4"

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

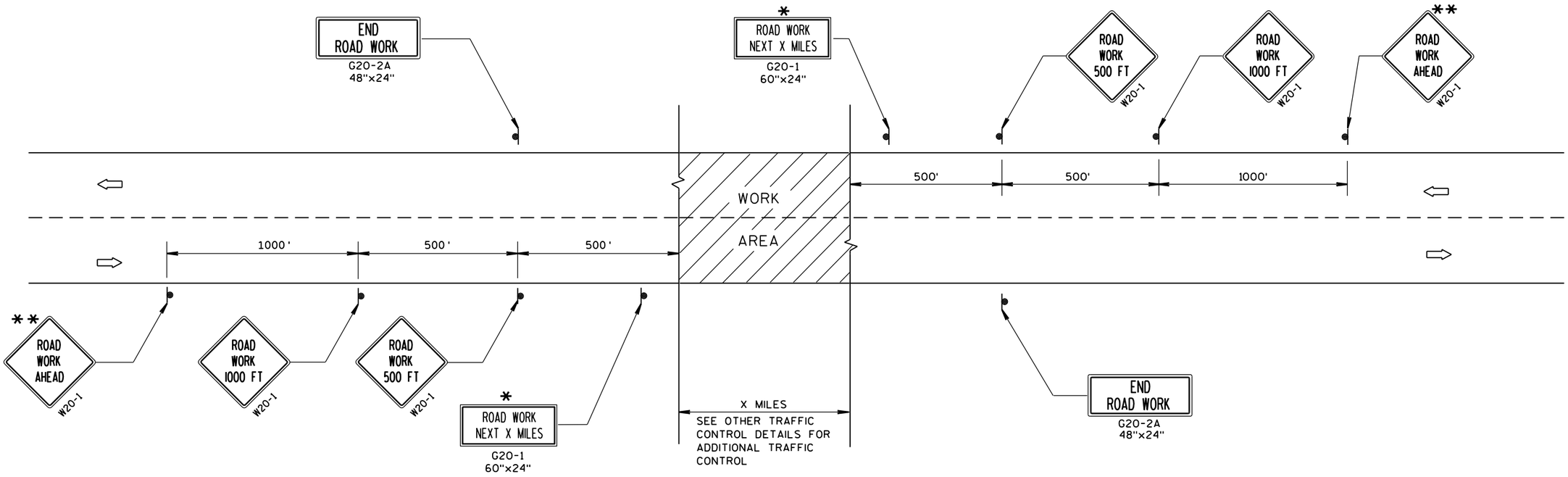
MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DIRECTOR
FHWA — ENGINEER

S.D.D. 14 B 45-4L

S.D.D. 14 B 45-4L



TYPICAL SIDEROAD APPROACH WARNING SIGN DETAIL

GENERAL NOTES

THE EXACT NUMBER, LOCATION, AND SPACING OF ALL SIGNS AND DEVICES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A MINIMUM OF 200 FEET (500 FEET DESIRABLE) CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

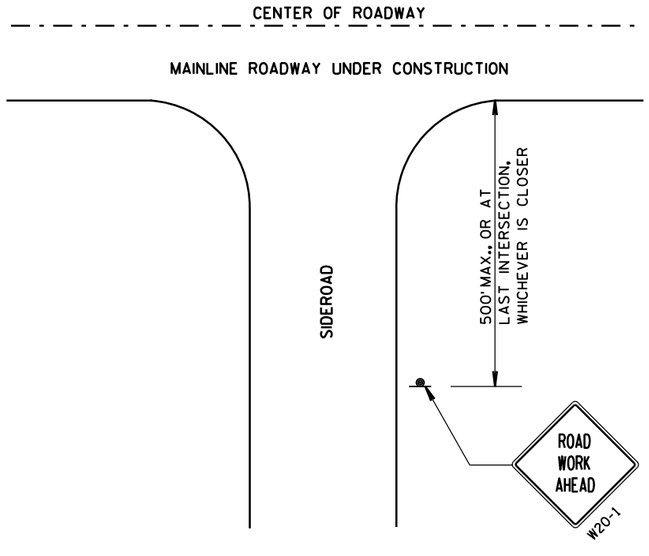
ALL SIGNS ARE 48"x48" UNLESS OTHERWISE NOTED.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

IF A "STOP" SIGN MUST BE REMOVED FOR A WORK OPERATION, A TEMPORARY "STOP" SIGN SHALL BE PLACED PRIOR TO THE SIGN REMOVAL, OR A FLAGGER SHALL BE PROVIDED UNTIL THE SIGN IS RE-ESTABLISHED.

* OMIT G20-1 SIGNS IF LENGTH OF WORK AREA IS 2 MILES OR LESS.

** PLACE ADDITIONAL W20-1 "ROAD WORK AHEAD" SIGN IF WORK AREA WITHIN THE PROJECT IS SEPARATED BY MORE THAN 2 MILES FROM PREVIOUS WORK AREA.



LEGEND

- SIGN ON PERMANENT SUPPORT
- DIRECTION OF TRAFFIC
- WORK AREA

TRAFFIC CONTROL, ADVANCE WARNING SIGNS 45 M.P.H. OR GREATER TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

8/2013 — DATE

/S/ Travis Feltes — STATE TRAFFIC ENGINEER

SIGN

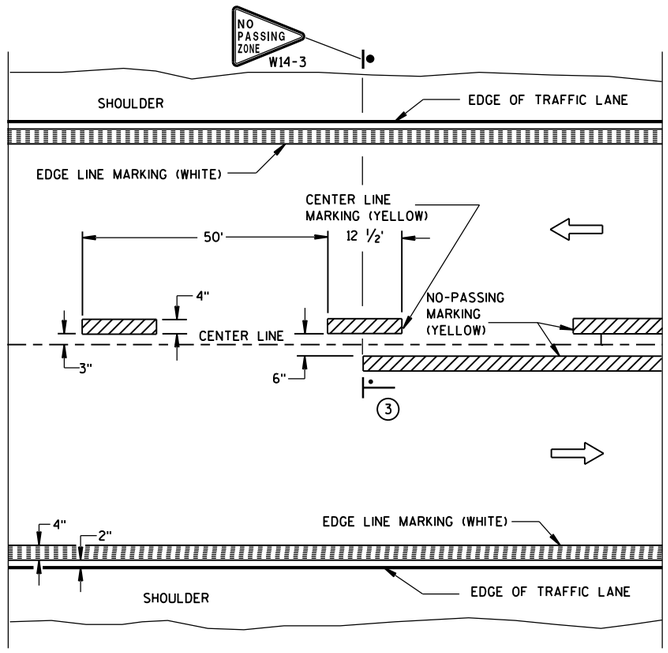
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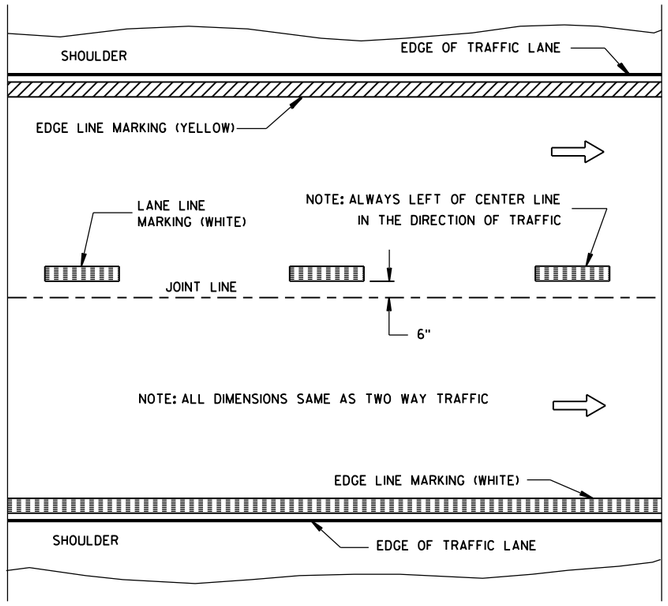
S.D.D. 15 C 4-2

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S.D.D. 15 C 4-2

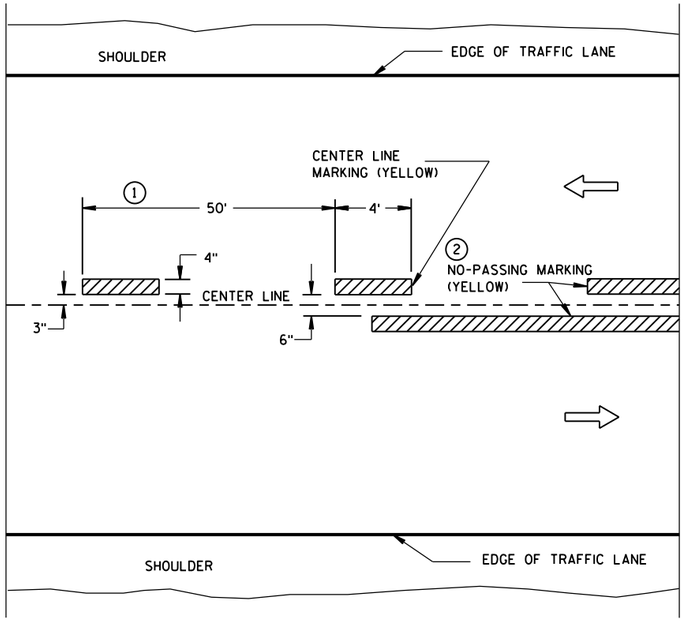


TWO WAY TRAFFIC

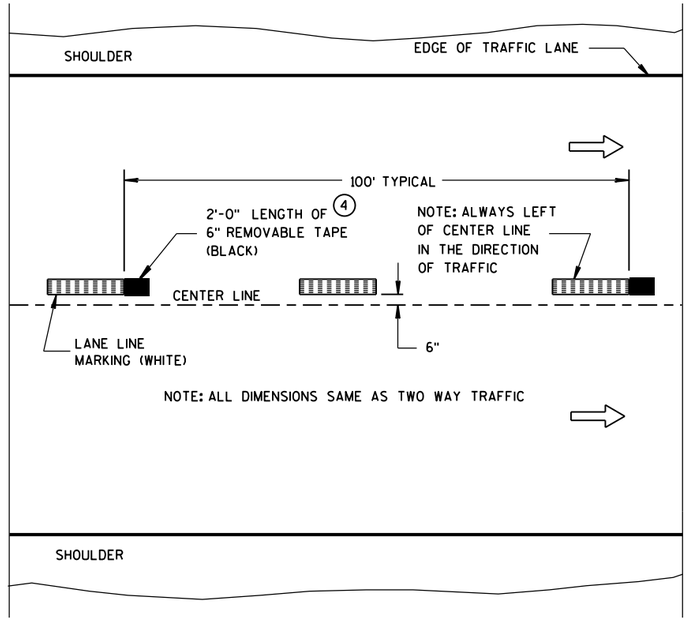


ONE WAY TRAFFIC

PERMANENT PAVEMENT MARKING



TWO WAY TRAFFIC



ONE WAY TRAFFIC

TEMPORARY (INTERMEDIATE) PAVEMENT MARKING

(SHOWS CYCLE FOR TEMPORARY CENTER LINE OR TEMPORARY LANE LINE MARKING)

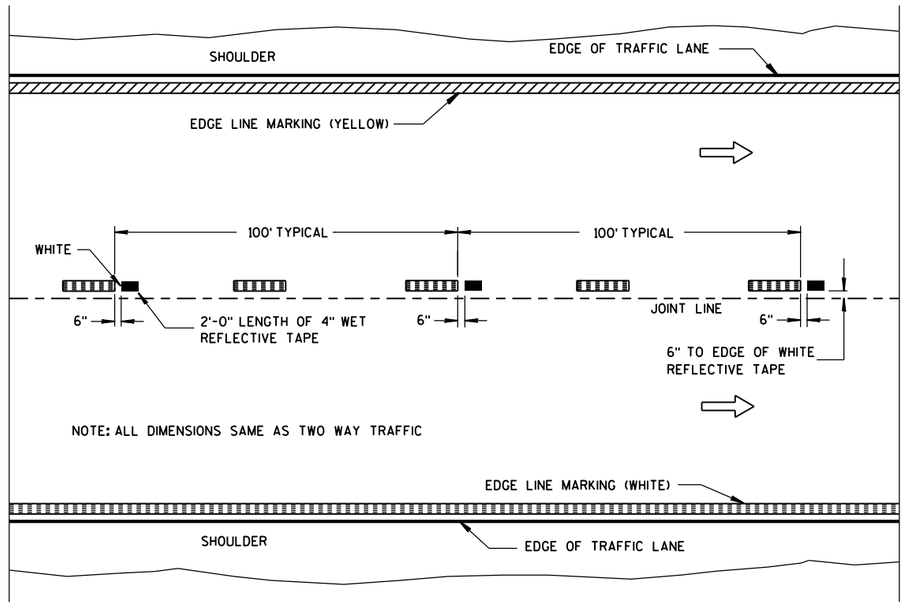
GENERAL NOTES

DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO STANDARD SPECIFICATIONS AND SPECIAL PROVISIONS.

1. HALF CYCLE LENGTHS (25'±) WITH 2' MINIMUM STRIPE LENGTHS SHALL BE PROVIDED ON ROADWAYS (INCLUDING TEMPORARY TRAVELED WAYS) WITH REVERSE CURVATURE, CURVATURE OF OVER 5 DEGREES OR WHEN DIRECTED BY THE ENGINEER TO MARK UNUSUAL ALIGNMENT OF THE TRAVELED WAY.
2. NO PASSING ZONE TEMPORARY PAVEMENT MARKING IS REQUIRED TO BE PLACED, WHERE APPROPRIATE, ALONG WITH CENTERLINE TEMPORARY PAVEMENT MARKING WHEN A SAME DAY PERMANENT PAVEMENT MARKING ITEM IS INCLUDED IN THE CONTRACT.
3. NO PASSING ZONE MARKINGS ARE PLACED ACCORDING TO "T" MARKINGS. IF EXISTING NO PASSING ZONE W14-3 SIGNS ARE BEYOND 50 FEET IN EITHER DIRECTION, THE SIGNS SHALL BE MOVED TO THE "T" MARKINGS.
4. CONCRETE ONLY.

NOTE

ARROW SYMBOL (⇨) SHOWS DIRECTION OF TRAVEL



WET REFLECTIVE TAPE SUPPLEMENT TO
SPRAYED OR NON WET REFLECTIVE TAPE LANE LINE

LEGEND

"T" MARKING

POST MOUNTED SIGN

PAVEMENT MARKING (MAINLINE)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

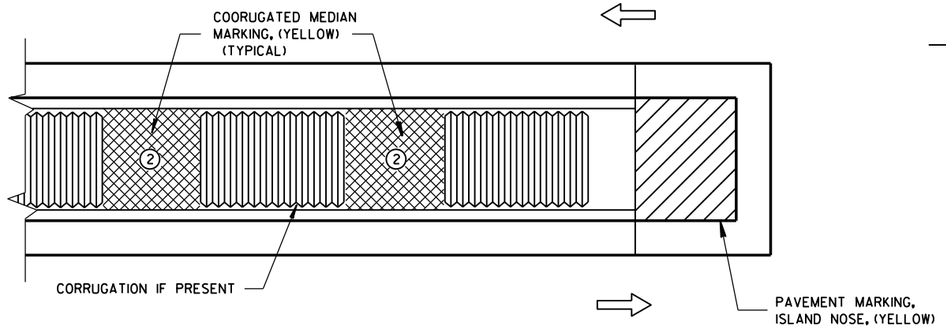
APPROVED
5-13-2013 DATE
/S/ Travis Feltes STATE TRAFFIC E
FHWA

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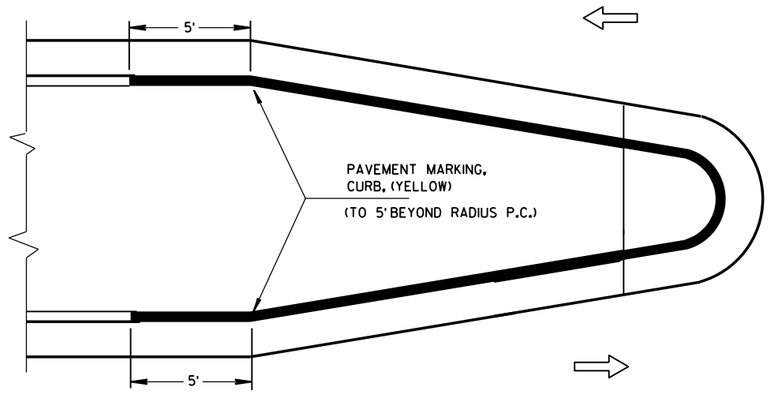
S.D.D. 15 C 8-16a

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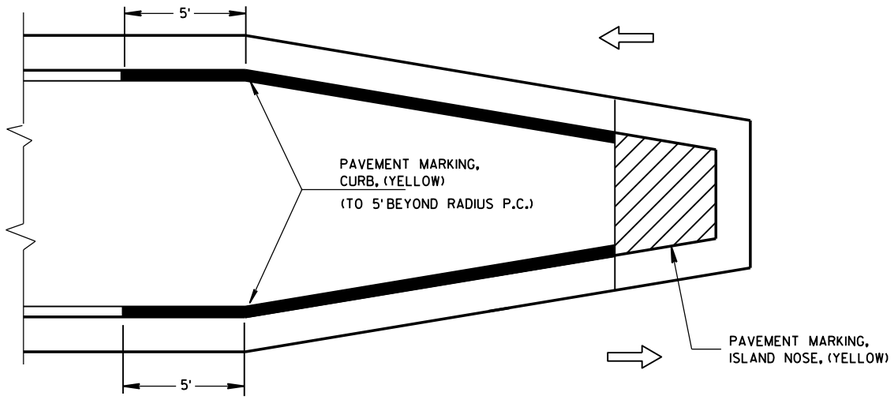
S.D.D. 15 C 8-16a



MEDIAN ISLAND WITH SQUARE BLUNT NOSE

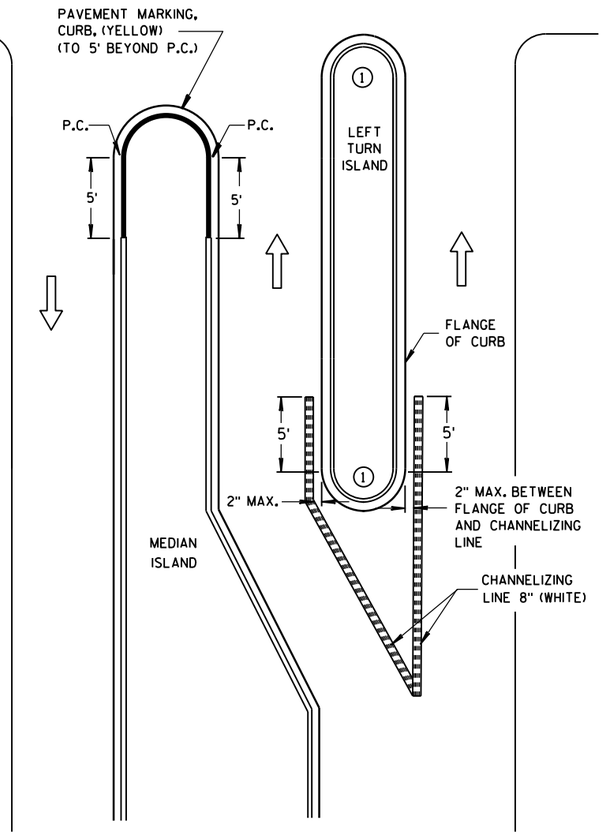


MEDIAN ISLAND WITH ROUND BLUNT NOSE



MEDIAN ISLAND WITH SLOPED NOSE

TYPICAL PLACEMENT OF PAVEMENT MARKING ON MEDIAN ISLANDS

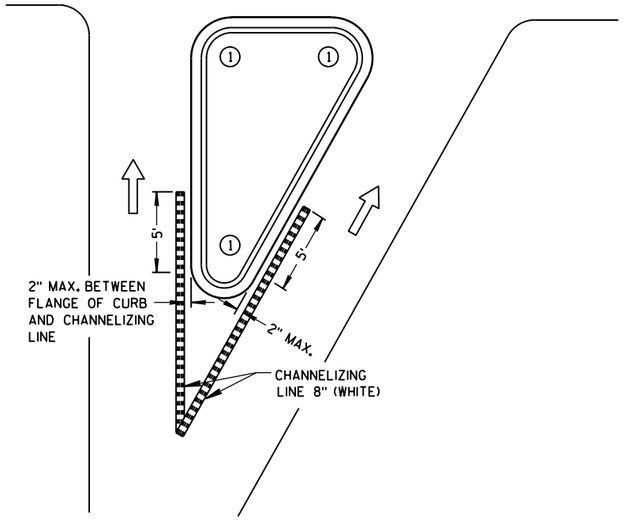


LEFT TURN & MEDIAN ISLAND

GENERAL NOTES

1. DO NOT MARK CURB NOSES THAT SEPARATE LANES OF TRAFFIC TRAVELING IN THE SAME DIRECTION.

2. WHEN CONCRETE CORRUGATED MEDIAN IS CONSTRUCTED TO SEPARATE TRAFFIC OPERATING IN THE OPPOSING DIRECTION YELLOW PAVEMENT MARKING SHALL BE APPLIED TO THE FLAT PORTION OF THE CONCRETE CORRUGATED MEDIAN. THE ITEM OF PAVEMENT MARKING, CONCRETE CORRUGATED MEDIAN, WILL BE MEASURED IN PLACE AND AND ACCEPTED IN ACCORDANCE WITH THE CONTRACT AND PAID FOR AT THE CONTRACT UNIT PRICE PER SQUARE FOOT.



RIGHT TURN ISLAND

LEGEND

- ISLAND NOSE MARKING
- CURB MARKING
- CORRUGATED MEDIAN MARKING
- DIRECTION OF TRAVEL

PAVEMENT MARKING
(ISLANDS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

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S.D.D. 15 C 8-16f

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S.D.D. 15 C 8-16f

LEGEND

SIGN ON PORTABLE OR PERMANENT SUPPORT

DIRECTION OF TRAFFIC

WORK AREA

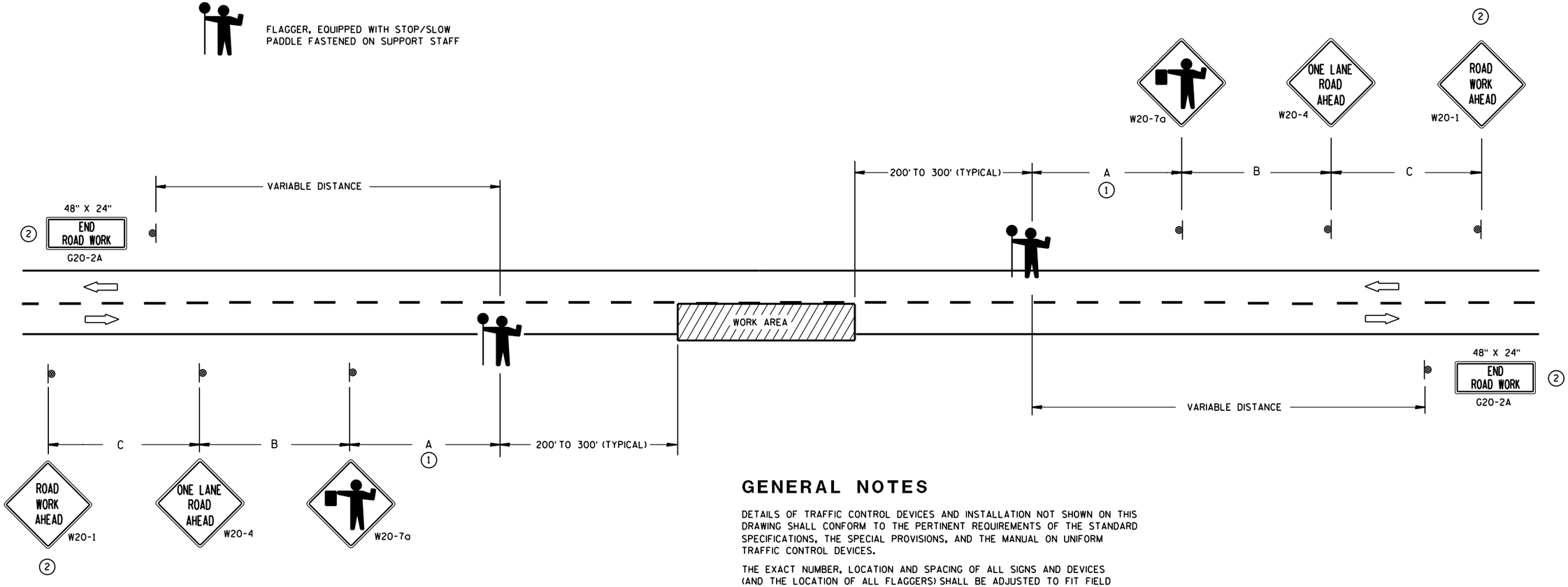
FLAGGER, EQUIPPED WITH STOP/SLOW PADDLE FASTENED ON SUPPORT STAFF

SIGN SPACING TABLE

SPEED LIMIT	SIGN SPACING A,B,C
25-35 MPH	200'
35-40 MPH	350'
45-55 MPH	500'

BE PREPARED TO STOP
W3-4

USE OF THE "BE PREPARED TO STOP" SIGN IS OPTIONAL. WHEN USED, THIS SIGN SHALL BE LOCATED BETWEEN THE W20-7a AND W20-4 SIGNS. A 500' TYPICAL SPACING SHALL BE PROVIDED BETWEEN THE SIGNS.



(1) FOR A MOVING WORK OPERATION,
SIGNING FOR BOTH DIRECTIONS SHALL BE REESTABLISHED (AS SIMULTANEOUSLY AS PRACTICAL) AT APPROXIMATELY 3500 FOOT INTERVALS IN THE MOVING WORK OPERATION OR AS APPROVED BY THE ENGINEER.

(2) SIGN NOT REQUIRED IF FLAGGING OPERATION OCCURS WITHIN A SIGNED ROAD WORK ZONE AREA.

GENERAL NOTES

DETAILS OF TRAFFIC CONTROL DEVICES AND INSTALLATION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS, THE SPECIAL PROVISIONS, AND THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES.

THE EXACT NUMBER, LOCATION AND SPACING OF ALL SIGNS AND DEVICES (AND THE LOCATION OF ALL FLAGGERS) SHALL BE ADJUSTED TO FIT FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

THE FIRST ADVANCE WARNING SIGN SHOULD TYPICALLY BE LOCATED IN ADVANCE OF THE ANTICIPATED TRAFFIC BACKUP OR QUEUE.

WHEN A SIDE ROAD OR RAMP INTERSECTS THE FACILITY ON WHICH THE WORK IS BEING PERFORMED, ADDITIONAL TRAFFIC CONTROLS SHALL BE PROVIDED AS SPECIFIED IN THE PLANS AND/OR THE SPECIAL PROVISIONS OR AS APPROVED BY THE ENGINEER.

FLAGGERS SHALL BE IN SIGHT OF EACH OTHER OR IN DIRECT COMMUNICATION AT ALL TIMES. THEY SHALL BE EQUIPPED WITH STOP/SLOW PADDLES FASTENED ON SUPPORT STAFFS. WHEN THE FLAGGING OPERATION IS NOT IN EFFECT, COVER OR REMOVE ALL TEMPORARY TRAFFIC CONTROL SIGNS.

ALL SIGNS ARE 48" X 48" UNLESS OTHERWISE NOTED.

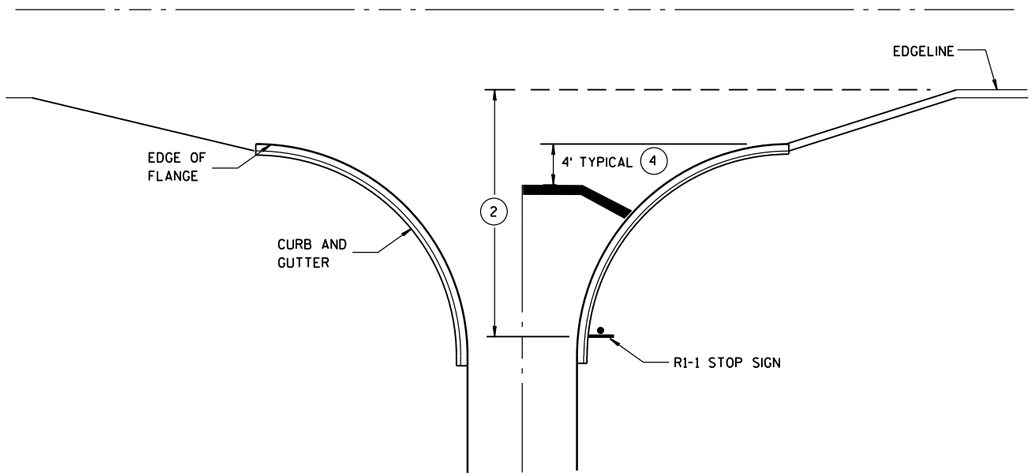
TRAFFIC CONTROL FOR LANE CLOSURE (SUITABLE FOR MOVING OPERATIONS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

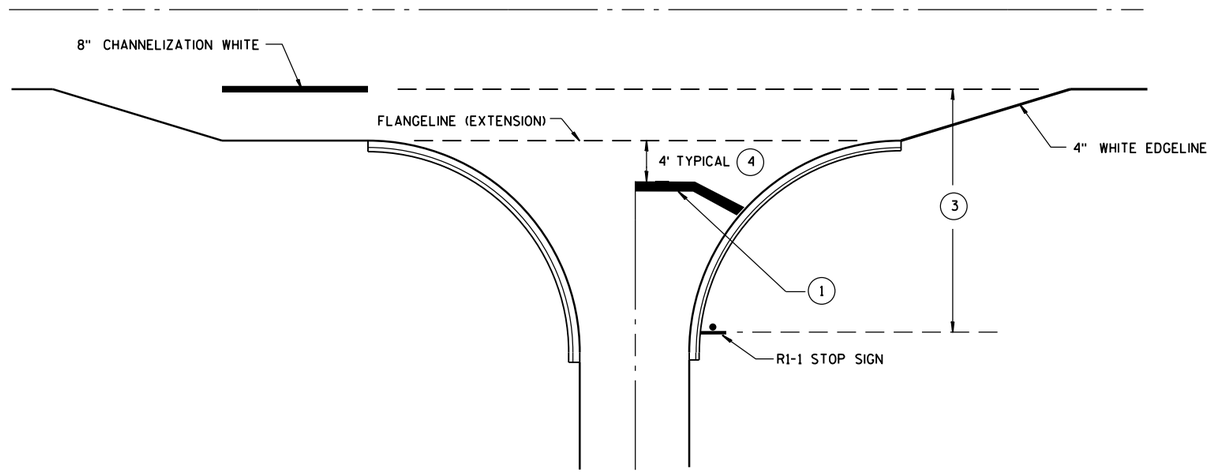
APPROVED
8/2013 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER
FHWA

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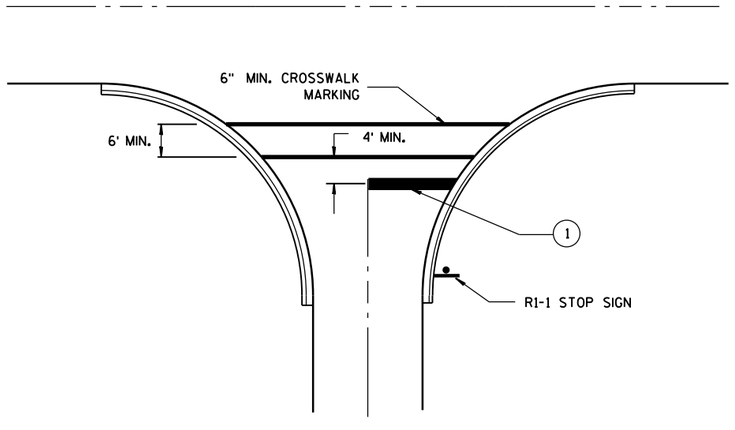
S.D.D. 15 C 12-4



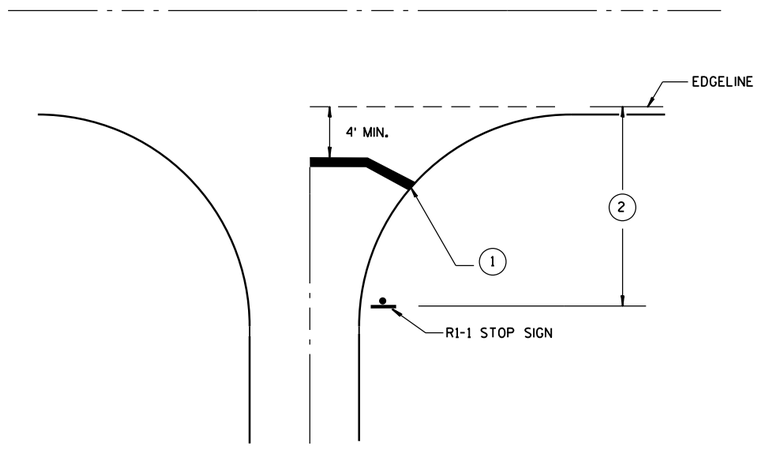
TYPICAL STOP LINE PAVEMENT MARKING WITH CURB AND GUTTER



TYPICAL STOP LINE PAVEMENT MARKING FOR SIDEROADS WITH RIGHT TURN LANE



TYPICAL STOP LINE PAVEMENT MARKING FOR SIDEROADS WITH CROSSWALK MARKING



TYPICAL STOP LINE PAVEMENT MARKING WITHOUT CURB AND GUTTER

GENERAL NOTES

1. 18-INCH STOP LINES MAY BE DELETED OR ADDED BY THE PROJECT ENGINEER BASED ON VISIBILITY AND SIGHT LINES.
2. IF STOP SIGN IS LESS THAN OR EQUAL TO 40 FEET FROM THE EDGELINE THAN NO STOP LINE IS REQUIRED.
3. IF STOP SIGN IS LESS THAN OR EQUAL TO 30 FEET FROM THE FLANGELINE EXTENSION THAN NO STOP LINE IS REQUIRED.
4. MOVE CLOSER TO EDGE OF TRAVEL LANE AS NEEDED FOR VISIBILITY AND SIGHT LINES.

STOP LINE AND CROSSWALK PAVEMENT MARKING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

4/30/2013
DATE

/S/ Travis Feltes
STATE TRAFFIC E

FHWA

6

S.D.D. 15 C 33-1

S.D.D. 15 C 33-1

GENERAL NOTES

THE EXACT NUMBER, LOCATION AND SPACING OF ALL SIGNS AND DEVICES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

ALL SIGNS ARE 48" X 48" UNLESS OTHERWISE NOTED. IF NECESSARY DUE TO SPACE CONSTRAINTS IN URBAN AREAS, 36" X 36" SIGNS MAY BE USED IF APPROVED BY DISTRICT TRAFFIC UNIT.

"WO" SIGNS ARE THE SAME AS "W" SIGNS EXCEPT THE BACKGROUND IS ORANGE.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" SHALL BE REMOVED OR COVERED AS NEEDED AND AS APPROVED BY THE ENGINEER.

W20-1A AND G20-2A SIGNS ARE NOT REQUIRED IF THE WORK AREA IS WITHIN A LARGER WORK ZONE WHERE THESE SIGNS ARE ALREADY PRESENT. G20-2A SIGNS MAY ALSO BE OMITTED IF DURATION OF WORK IS LESS THAN 7 CONTINUOUS DAYS AND NIGHTS.

CHANNELIZING DEVICES PLACED ADJACENT TO THE WORK AREA SHALL BE PULLED BACK FROM THE TRAVEL LANE WHEN WORK IS NOT IN PROGRESS.

TABLE A

S \ W	SHOULDER TAPER LENGTH (FEET) 4	6	8	10	BUFFER SPACE (FEET)
30	20	30	40	50	200
35	30	45	55	70	250
40	40	55	75	90	305
45	60	90	120	150	360
50	70	100	135	170	425
55	75	110	150	185	495

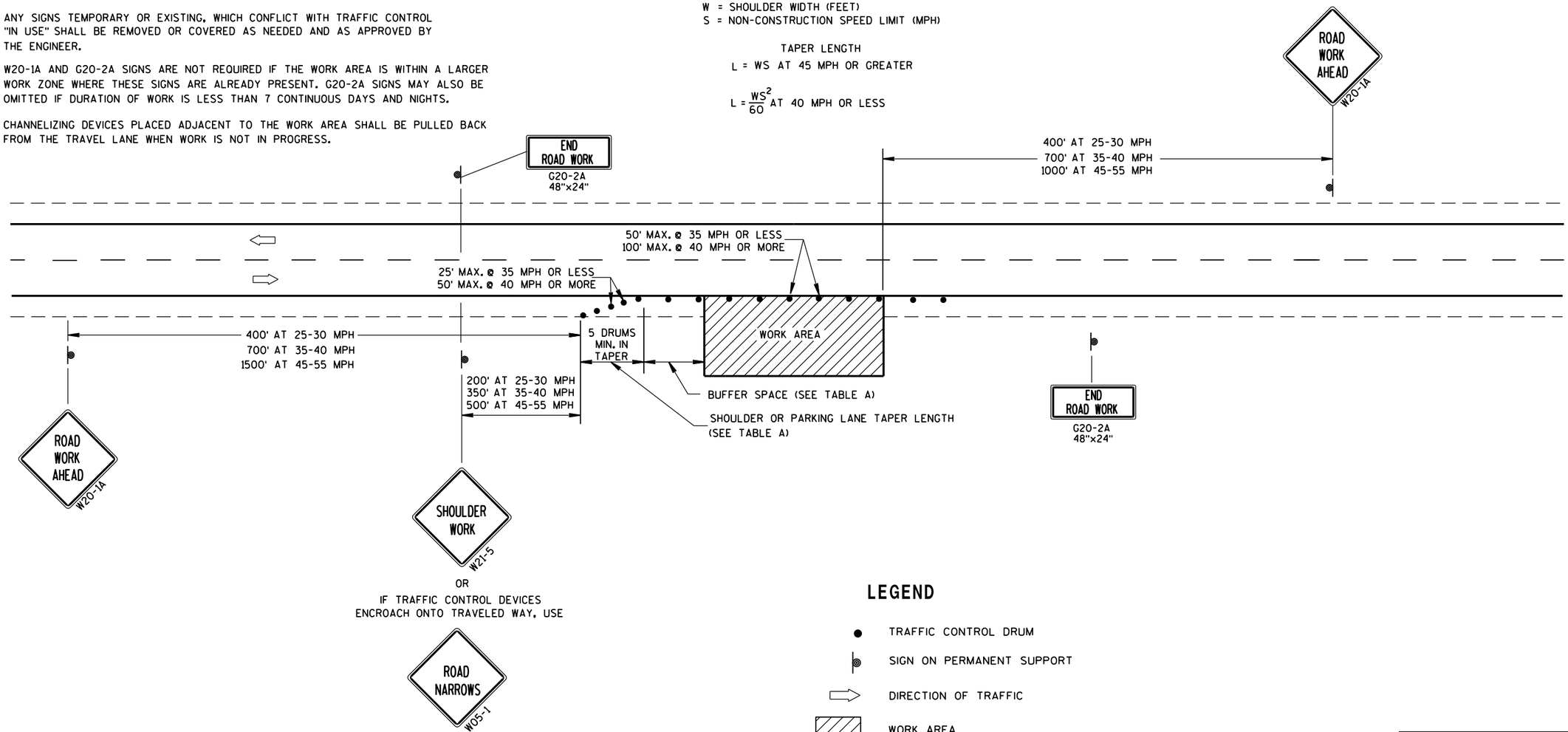
W = SHOULDER WIDTH (FEET)
S = NON-CONSTRUCTION SPEED LIMIT (MPH)

TAPER LENGTH

L = WS AT 45 MPH OR GREATER

$L = \frac{WS^2}{60}$ AT 40 MPH OR LESS

SHOULDER TAPER LENGTH = $\frac{1}{3}L$



LEGEND

- TRAFFIC CONTROL DRUM
- SIGN ON PERMANENT SUPPORT
- DIRECTION OF TRAFFIC
- WORK AREA

TRAFFIC CONTROL, WORK ON SHOULDER OR PARKING LANE, UNDIVIDED ROADWAY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

July 14, 2015 — DATE

/S/ Peter Amakobe Atepe — STATEWIDE WORK ZO[illegible] SAFETY ENGI[illegible] FIC

FHWA

6

S.D.D. 15 D 28-3

6

S.D.D. 15 D 28-3

LEGEND

- SIGN ON PERMANENT SUPPORT
- REMOVING PAVEMENT MARKING
- TYPE III BARRICADE WITH ATTACHED SIGN
- CONCRETE BARRIER TEMPORARY PRECAST
- FLAGS, 16" x 16" MIN., (ORANGE)
- TRAFFIC CONTROL DRUM
- TRAFFIC CONTROL DRUM WITH TYPE "C" STEADY BURN LIGHT
- ASPHALTIC PAVEMENT WIDENING
- DIRECTION OF TRAFFIC
- 4" X 6" WOOD POST
- TEMPORARY SIGNAL WITH BACKPLATE AND 12-INCH LENSES ON BREAKAWAY POLE



W057-52
36"x24"

INSTALL ON EACH APPROACH AT THE CLOSEST INTERSECTION WITH A STATE OR COUNTY TRUNK HIGHWAY, OR AS DIRECTED BY THE ENGINEER. WIDTH ON SIGN TO BE APPROX. 1-FOOT LESS THAN AVAILABLE WIDTH. (OMIT IF AVAILABLE WIDTH IS MORE THAN 16 FEET.)

GENERAL NOTES

THE EXACT NUMBER, LOCATION AND SPACING OF ALL SIGNS AND DEVICES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A MINIMUM OF 200 FEET (500 FEET DESIRABLE) CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

ALL SIGNS ARE 48"x48" UNLESS OTHERWISE NOTED.

"WO" IS THE SAME AS "W" EXCEPT THE BACKGROUND IS ORANGE.

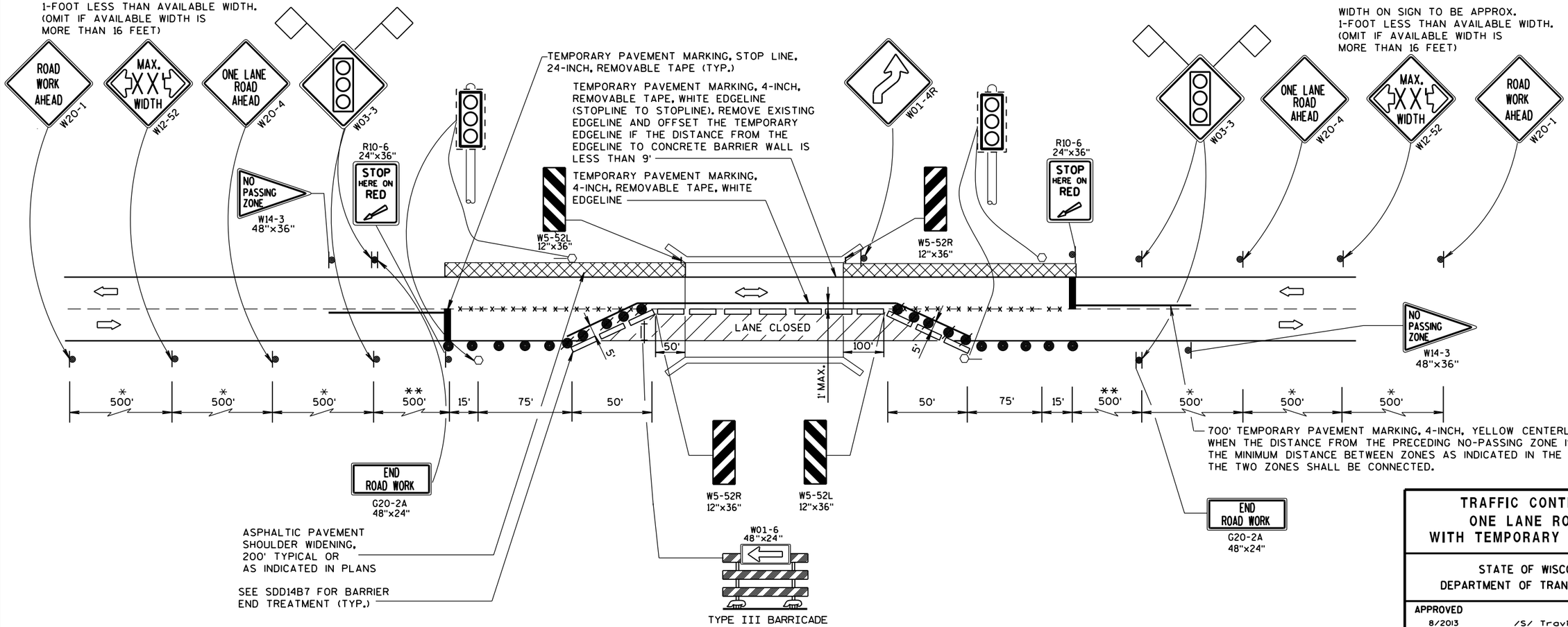
SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE FHWA'S MANUAL OF STANDARD HIGHWAY SIGNS OR THE WISCONSIN STANDARD SIGN PLATES.

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" SHALL BE REMOVED OR COVERED AS NEEDED AND AS APPROVED BY THE ENGINEER.

PLACE TEMPORARY PAVEMENT MARKING EDGELINE AND CENTERLINE, AND REMOVE EXISTING PAVEMENT MARKINGS IF LANE CLOSURE IS TO BE IN PLACE FOR 4 OR MORE CONTINUOUS DAYS AND NIGHTS OR AS NOTED ON DETAIL.

* 500-FOOT SPACING SHOWN IS FOR ROADWAYS WITH A PRE-CONSTRUCTION REGULATORY SPEED LIMIT OF 45 MPH OR MORE. FOR 35-40 MPH, USE 350-FOOT TYPICAL SPACING. FOR 25-30 MPH, USE 200-FOOT TYPICAL SPACING.

** USE 300' SPACING IF PRE-CONSTRUCTION REGULATORY SPEED LIMIT IS 35 MPH OR LESS.



TRAFFIC CONTROL, ONE LANE ROAD WITH TEMPORARY SIGNALS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

8/2013 — DATE

/S/ Travis Feltes — STATE TRAFFIC ENGINEER

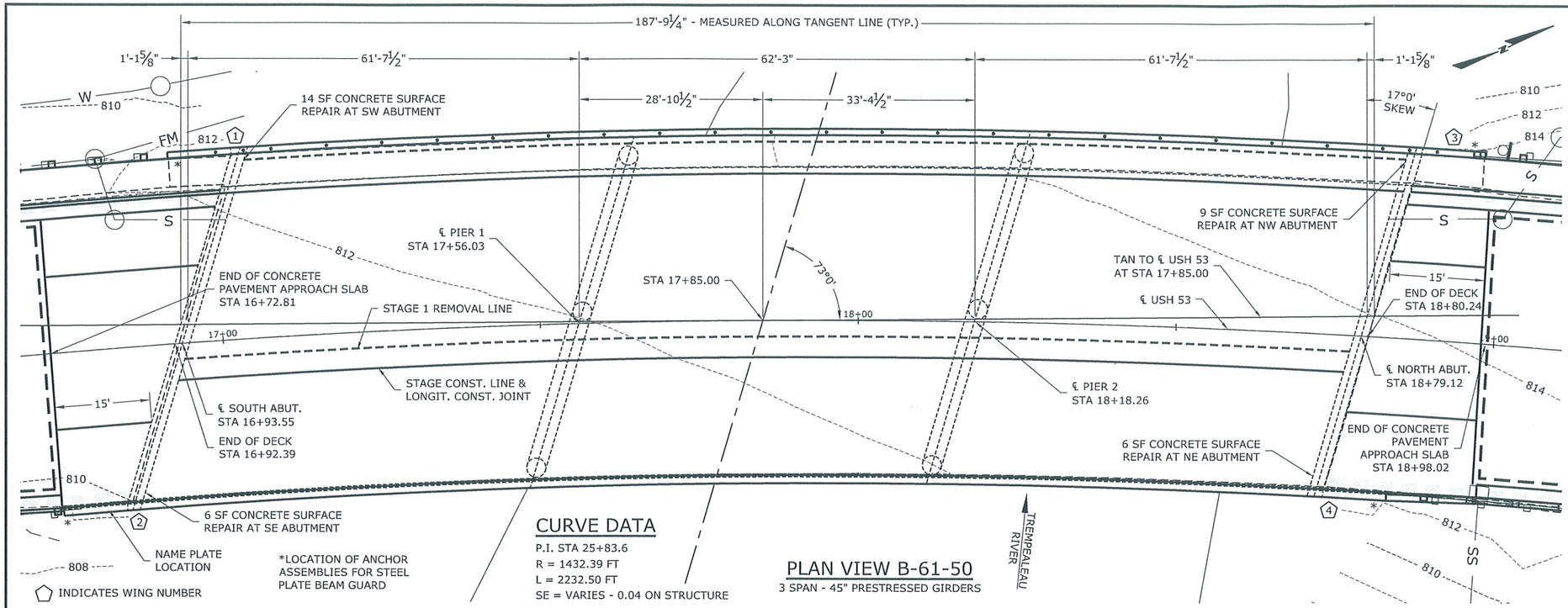
FHWA

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S.D.D. 15 D 33-3

STATE PROJECT NUMBER

1630-01-73

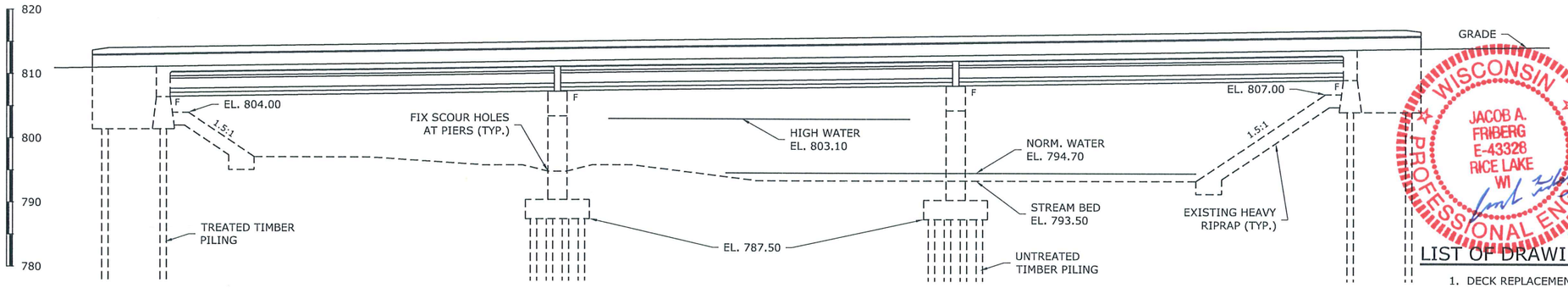


CURVE DATA

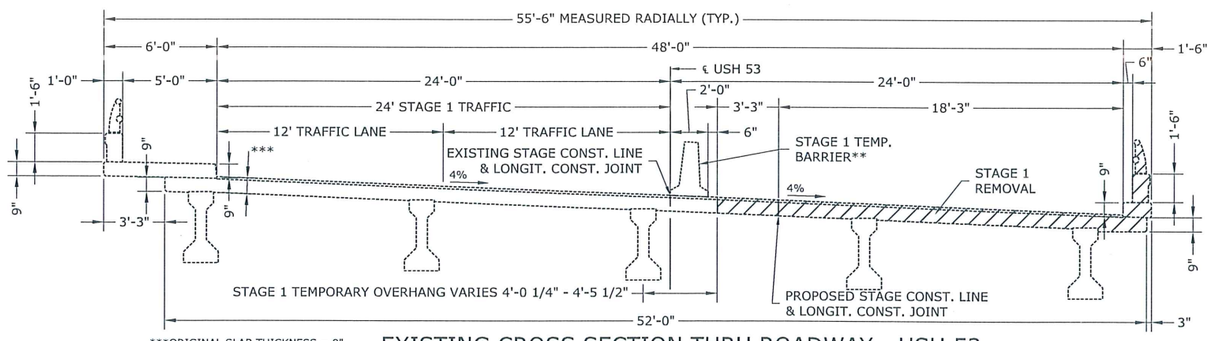
P.I. STA 25+83.6
R = 1432.39 FT
L = 2232.50 FT
SE = VARIES - 0.04 ON STRUCTURE

PLAN VIEW B-61-50

3 SPAN - 45" PRESTRESSED GIRDERS



ELEVATION VIEW B-61-50



***ORIGINAL SLAB THICKNESS = 9"
BRIDGE OVERLAYED IN 1989 = 1"
TOTAL SLAB THICKNESS = 10"

EXISTING CROSS SECTION THRU ROADWAY - USH 53

(LOOKING NORTH)

**TEMPORARY BARRIER TO BE ANCHORED TO THE DECK.

GENERAL NOTES

THE WORK INCLUDES REPLACING THE DECK & DIAPHRAGMS, NEW PARAPET & RAILING, AND WINGWALL MODIFICATIONS.

DIMENSIONS SHOWN ARE BASED ON ORIGINAL STRUCTURE PLANS.

DRAWINGS SHALL NOT BE SCALED. BAR STEEL REINFORCEMENT SHALL BE EMBEDDED 2" CLEAR UNLESS OTHERWISE SHOWN OR NOTED.

ALL FIELD CONNECTIONS SHALL BE MADE WITH ¾" DIAMETER FRICTION TYPE HIGH-TENSILE STRENGTH BOLTS UNLESS SHOWN OR NOTED OTHERWISE.

SLAB FALSEWORK SHALL BE SUPPORTED ON THE SUBSTRUCTURE UNLESS AN ALTERNATE METHOD IS APPROVED BY THE ENGINEER.

THE FIRST OR FIRST TWO DIGITS OF THE BAR MARK SIGNIFIES THE BAR SIZE.

PRESTRESSED GIRDER BRIDGES - THE HAUNCH CONCRETE QUANTITY IS BASED ON THE AVERAGE HAUNCH SHOWN ON THE PRESTRESSED GIRDER DETAILS SHEET.

ALL CONCRETE REMOVAL SHALL BE DEFINED BY A 1" DEEP SAW CUT.

UTILIZE EXISTING BAR STEEL REINFORCEMENT WHERE SHOWN AND EXTEND 24 BAR DIAMETERS INTO NEW WORK, UNLESS SPECIFIED OTHERWISE.

VARIATIONS TO THE NEW GRADE LINE OVER ¼" MUST BE SUBMITTED BY THE FIELD ENGINEER TO THE STRUCTURES DESIGN SECTION FOR REVIEW.

THE CONTRACTOR SHALL SUPPLY A NEW NAME PLATE IN ACCORDANCE WITH SECTION 502.3.11 OF THE STANDARD SPECIFICATIONS AND THE STANDARD DETAIL DRAWINGS. NAME PLATE TO SHOW ORIGINAL CONSTRUCTION YEAR.

ELEVATIONS ARE REFERENCE TO THE NGVD29 DATUM.

DESIGN DATA

LIVE LOAD:

DESIGN LOADING	HS20
INVENTORY RATING	HS15
OPERATING RATING	HS25
WISCONSIN STANDARD PERMIT VEHICLE (WIS-SPV)	190 KIPS

ULTIMATE DESIGN STRESSES:

CONCRETE MASONRY SLAB	f'c = 4000psi
ALL OTHER	f'c = 3500psi
BAR STEEL REINFORCEMENT HS BRIDGES	fy = 60,000psi

BENCH MARK

EXISTING BENCH MARK 0.4 MILES NORTH
BOX CULVERT AT INT. OF CTH D & USH 53
ELEVATION = 824.18

CONSULTANT CONTACT:
STEVE POETHKE, PE (715) 234-7008

WISDOT BRIDGE OFFICE CONTACT:
WILLIAM DREHER (608) 266-8489

WISCONSIN PROFESSIONAL ENGINEER
JACOB A. FRIBERG
E-43328
RICE LAKE
WI
7-30-15

LIST OF DRAWINGS

1. DECK REPLACEMENT
2. SUPERSTRUCTURE CROSS SECTION
3. SUPERSTRUCTURE PLAN
4. SUPERSTRUCTURE DETAILS
5. STEEL DIAPHRAGM
6. PARAPET FOOTING
7. SS36 ON FOOTING
8. SS36 ON WING
9. COMBINATION RAIL TYPE C1
10. COMBINATION RAIL DETAILS

TOTAL ESTIMATED QUANTITIES

BID ITEM NO.	BID ITEMS	UNIT	TOTAL
203.0600.S	REMOVING OLD STRUCTURE OVER WATERWAY WITH MINIMINAL DEBRIS (STA 17+85)	LS	1
206.1000	EXCAVATION FOR STRUCTURES BRIDGES (B-61-50)	LS	1
210.0100	BACKFILL STRUCTURE	CY	10
502.0100	CONCRETE MASONRY BRIDGES	CY	400
505.0600	BAR STEEL REINFORCEMENT HS COATED STRUCTURES	LB	98,560
506.4000	STEEL DIAPHRAGMS (B-61-50)	EACH	12
509.1500	CONCRETE SURFACE REPAIR	SF	35
513.7006	RAILING STEEL TYPE C1 (B-61-50)	LS	1
614.0150	ANCHOR ASSEMBLIES FOR STEEL PLATE BEAM GUARD	EACH	4
650.6500	CONSTRUCTION STAKING STRUCTURE LAYOUT (B-61-0050)	LS	1

NO.	DATE	REVISION	BY

COOPER ENGINEERING
2600 COLLEGE DRIVE, P.O. BOX 230
RICE LAKE, WISCONSIN 54868-0230
TELEPHONE (715) 234-7008
FAX (715) 234-1025

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

ACCEPTED William C. Dreher SDR 10/29/15
CHIEF STRUCTURES DESIGN ENGINEER — DATE

STRUCTURE B-61-0050

USH 53 BRIDGE OVER TREMPEALEAU RIVER

COUNTY	TOWN/CITY/VILLAGE
TREMPEALEAU	LINCOLN/WHITEHALL

DESIGN SPEC.
REHABILITATION N/A

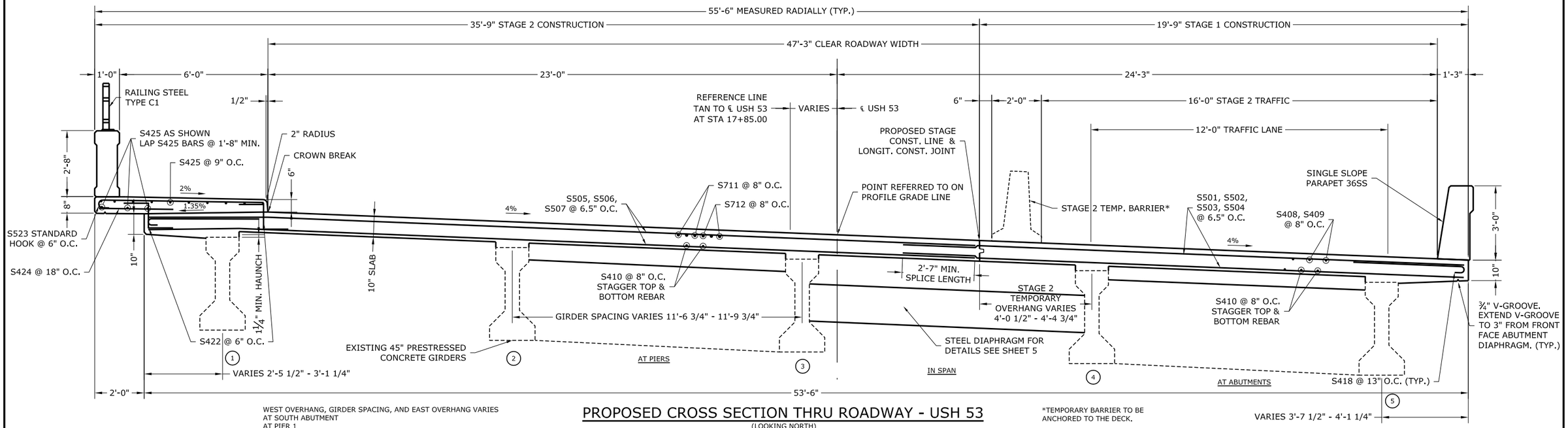
DESIGNED BY	DESIGN CK'D.	DRAWN BY	PLANS CK'D.
JAF	SKP	JAF	SKP

DECK REPLACEMENT

SHEET 1 OF 8

63

STATE PROJECT NUMBER
1630-01-73



WEST OVERHANG, GIRDER SPACING, AND EAST OVERHANG VARIES
AT SOUTH ABUTMENT
AT PIER 1
AT PIER 2
AT NORTH ABUTMENT

PROPOSED CROSS SECTION THRU ROADWAY - USH 53

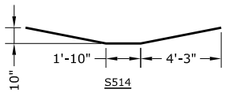
(LOOKING NORTH)

*TEMPORARY BARRIER TO BE ANCHORED TO THE DECK.

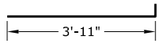
BILL OF BARS

MARK	STAGE 1 NO. REQ'D	STAGE 2 NO. REQ'D	LENGTH	BENT	LOCATION
S501	111	-	24 - 3		SLAB - TRANSVERSE (TOP & BOT.) - SOUTH SPAN 1
S502	111	-	24 - 0		SLAB - TRANSVERSE (TOP & BOT.) - NORTH SPAN 1
S503	220	-	23 - 9		SLAB - TRANSVERSE (TOP & BOT.) - SPAN 2
S504	222	-	23 - 6		SLAB - TRANSVERSE (TOP & BOT.) - SPAN 3
S505	-	222	35 - 3		SLAB - TRANSVERSE (TOP & BOT.) - SPAN 1
S506	-	220	34 - 9		SLAB - TRANSVERSE (TOP & BOT.) - SPAN 2
S507	-	222	34 - 6		SLAB - TRANSVERSE (TOP & BOT.) - SPAN 3
S408	60	102	35 - 0		SLAB - LONGITUDINAL - TOP - SPAN 1 & 3
S409	30	51	14 - 9		SLAB - LONGITUDINAL - TOP - SPAN 2
S410	120	204	48 - 2		SLAB - LONGITUDINAL - BOTTOM
S711	60	102	60 - 0		SLAB - LONGITUDINAL - TOP @ PIERS
S712	60	102	19 - 5		SLAB - LONGITUDINAL - TOP @ PIERS
S413	24	24	10 - 9		DIAPHRAGM @ PIERS
S514	32	56	10 - 6	X	DIAPHRAGM @ PIERS
S415	4	4	4 - 3	X	PILASTER
S416	4	4	3 - 4	X	PILASTER
S317	6	6	3 - 4	X	PILASTER
S418	166	166	5 - 0	X	SLAB - TRANSVERSE - OVERHANG STANDARD HOOK
S519	282	-	4 - 8	X	SLAB @ PARAPET VERTICAL
S520	282	-	5 - 9	X	PARAPET VERTICAL
S521	32	-	49 - 5		PARAPET HORIZONTAL
S422	-	750	3 - 0	X	SLAB @ SIDEWALK VERTICAL
S523	-	375	7 - 4	X	SIDEWALK - TRANSVERSE - TOP STANDARD HOOK
S424	-	125	3 - 0		SIDEWALK - TRANSVERSE - BOTTOM
S425	-	78	32 - 8		SIDEWALK - LONGITUDINAL (TOP & BOTTOM)

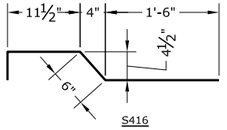
NOTES
THE FIRST DIGIT OF A BAR MARK SIGNIFIES THE BAR SIZE.
BAR DIMENSIONS ARE OUT TO OUT OF BAR.



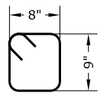
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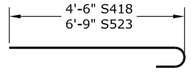
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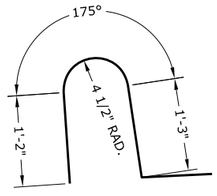
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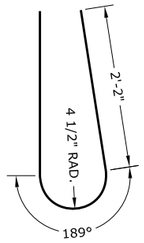
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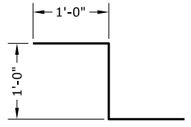
S418, S523



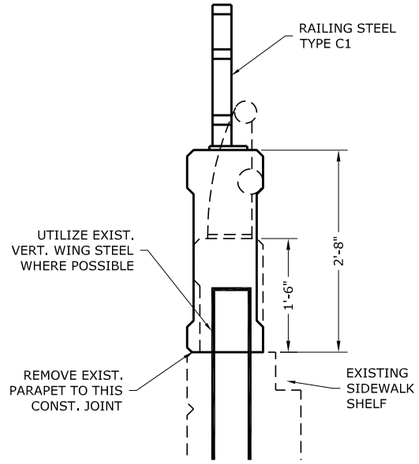
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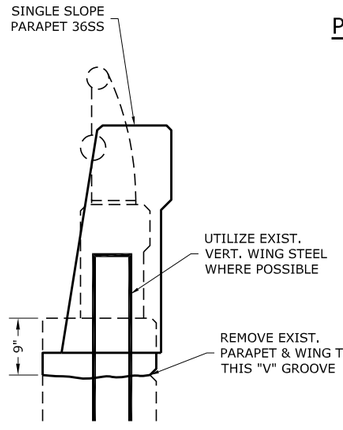
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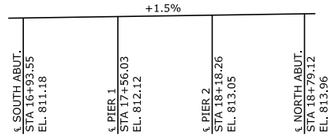
S422



SECTION THRU PARAPET AT WEST WINGS



SECTION THRU PARAPET AT EAST WINGS



PROFILE GRADE LINE USH 53

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

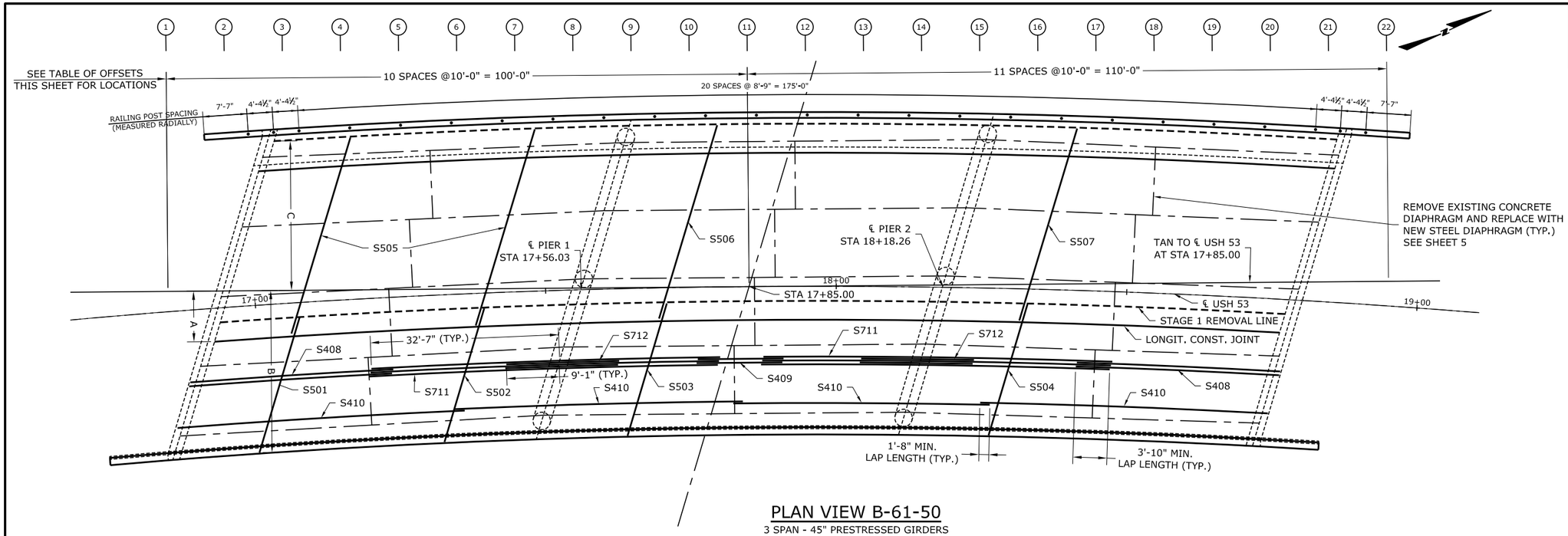
STRUCTURE B-61-50

CONST. SPEC.	2016	DRAWN BY	JAF	PLANS CK'D.	SKP

SUPERSTRUCTURE

SHEET 2 OF 8

STATE PROJECT NUMBER
1630-01-73



PLAN VIEW B-61-50

3 SPAN - 45" PRESTRESSED GIRDERS

TOP OF DECK GRADES

		SPAN 1										SPAN 2									
	CL S. ABUT.	1/10	2/10	3/10	4/10	5/10	6/10	7/10	8/10	9/10	CL PIER 1	1/10	2/10	3/10	4/10	5/10	6/10	7/10	8/10	9/10	CL PIER 2
WEST E.O.D.	812.19	812.28	812.37	812.46	812.55	812.65	812.74	812.83	812.92	813.01	813.10	813.20	813.29	813.38	813.47	813.56	813.65	813.74	813.84	813.93	814.02
GIRDER 1	812.21	812.30	812.40	812.49	812.58	812.67	812.77	812.86	812.95	813.04	813.13	813.22	813.32	813.41	813.50	813.59	813.68	813.77	813.86	813.95	814.04
GRADE BREAK PT.	812.22	812.31	812.40	812.49	812.59	812.68	812.77	812.86	812.95	813.05	813.14	813.23	813.32	813.41	813.51	813.60	813.69	813.78	813.87	813.97	814.06
GIRDER 2	811.80	811.89	811.98	812.07	812.16	812.25	812.34	812.43	812.53	812.63	812.72	812.81	812.90	812.99	813.08	813.18	813.27	813.37	813.46	813.56	813.66
GIRDER 3	811.27	811.36	811.44	811.54	811.63	811.72	811.81	811.91	812.00	812.10	812.20	812.29	812.38	812.47	812.56	812.65	812.75	812.84	812.94	813.04	813.14
CENTERLINE	811.18	811.27	811.37	811.46	811.55	811.65	811.74	811.84	811.93	812.02	812.12	812.21	812.30	812.40	812.49	812.58	812.68	812.77	812.86	812.96	813.05
LONG. CONST. JT.	810.92	811.01	811.11	811.20	811.29	811.39	811.48	811.58	811.67	811.76	811.86	811.95	812.05	812.14	812.23	812.33	812.42	812.52	812.61	812.70	812.80
GIRDER 4	810.73	810.82	810.91	811.00	811.10	811.19	811.29	811.38	811.48	811.58	811.68	811.77	811.86	811.95	812.04	812.13	812.23	812.32	812.42	812.52	812.62
GIRDER 5	810.20	810.29	810.38	810.47	810.57	810.66	810.76	810.86	810.95	811.05	811.15	811.24	811.33	811.42	811.52	811.61	811.71	811.80	811.90	812.00	812.09
EAST E.O.D.	810.01	810.11	810.20	810.30	810.40	810.49	810.59	810.68	810.78	810.87	810.97	811.06	811.16	811.25	811.35	811.45	811.54	811.64	811.73	811.83	811.92

TOP OF DECK GRADES CONT.

		SPAN 3									
	CL PIER 2	1/10	2/10	3/10	4/10	5/10	6/10	7/10	8/10	9/10	CL N. ABUT.
WEST E.O.D.	814.10	814.19	814.28	814.36	814.45	814.54	814.63	814.72	814.81	814.89	814.98
GIRDER 1	814.09	814.18	814.27	814.35	814.44	814.53	814.62	814.71	814.80	814.88	814.97
GRADE BREAK PT.	814.07	814.16	814.25	814.34	814.43	814.51	814.60	814.69	814.78	814.87	814.96
GIRDER 2	813.75	813.84	813.92	814.01	814.09	814.18	814.27	814.36	814.45	814.55	814.64
GIRDER 3	813.23	813.32	813.40	813.49	813.58	813.67	813.76	813.85	813.94	814.04	814.13
CENTERLINE	813.15	813.24	813.33	813.42	813.51	813.60	813.69	813.78	813.87	813.96	814.05
LONG. CONST. JT.	812.89	812.98	813.07	813.16	813.25	813.34	813.43	813.52	813.62	813.71	813.80
GIRDER 4	812.71	812.80	812.88	812.97	813.06	813.15	813.24	813.34	813.43	813.52	813.62
GIRDER 5	812.19	812.28	812.37	812.46	812.55	812.64	812.73	812.82	812.92	813.01	813.11
EAST E.O.D.	812.02	812.11	812.20	812.29	812.39	812.48	812.57	812.66	812.75	812.84	812.94

TABLE OF OFFSETS

POINT	DIM. A TAN. TO CONST. JT.	DIM. B TAN. TO EAST E.O.D.	DIM. C TAN. TO WEST E.O.D.	POINT	DIM. A TAN. TO CONST. JT.	DIM. B TAN. TO EAST E.O.D.	DIM. C TAN. TO WEST E.O.D.
1	9.27	29.07	24.57	12	5.79	25.54	27.97
2	8.60	28.39	25.22	13	5.89	25.64	27.86
3	8.00	27.78	25.80	14	6.07	25.82	27.69
4	7.47	27.25	26.32	15	6.31	26.07	27.45
5	7.01	26.78	26.76	16	6.63	26.39	27.14
6	6.63	26.39	27.14	17	7.01	26.78	26.76
7	6.31	26.07	27.45	18	7.47	27.25	26.32
8	6.07	25.82	27.69	19	8.00	27.78	25.80
9	5.89	25.64	27.86	20	8.60	28.39	25.22
10	5.79	25.54	27.97	21	9.27	29.07	24.57
11	5.75	25.50	28.00	22	10.01	29.82	23.84

POINT 11 = STA 17+85.00

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

STRUCTURE B-61-50

CONST. SPEC. 2016	DRAWN BY JAF	PLANS CK'D. SKP

SUPERSTRUCTURE

SHEET 3 OF 8

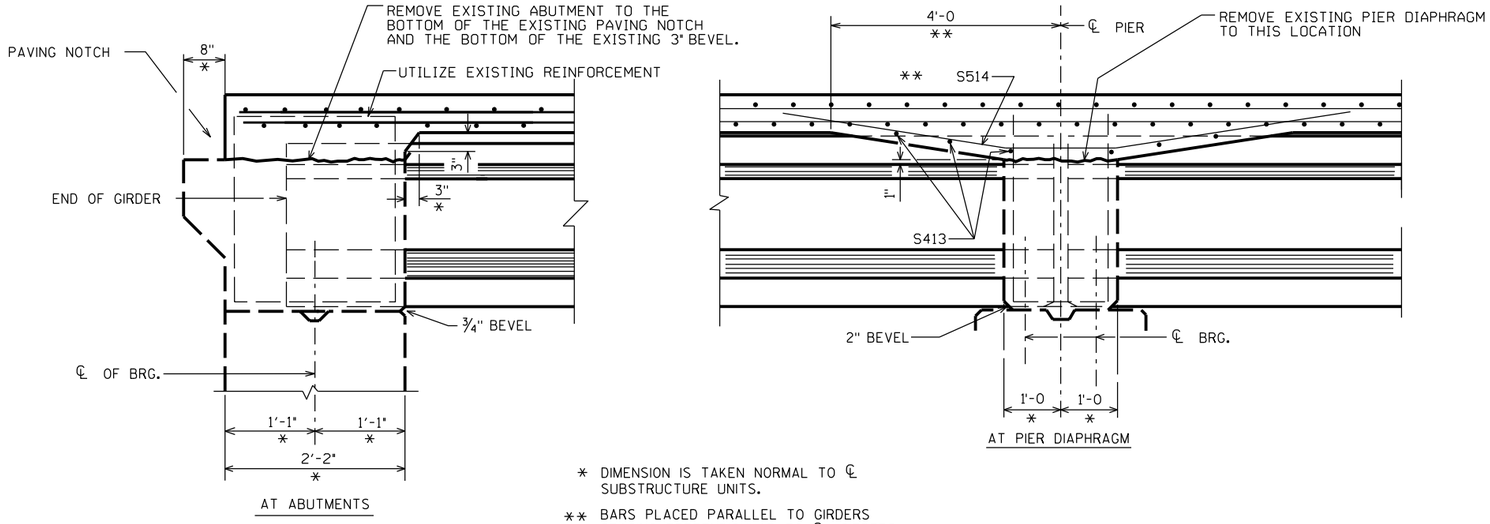
65

8

FILE NAME: G:\2012-proj\12445024\dwg\TREMPEAULEAU-RV-BASE.dwg PLOT DATE: Jul 29, 2015 - 11:02am PLOT BY:owner PLOT NAME: SUPER PLAN ORG. DATE: Jul 10, 2012

STATE PROJECT NUMBER

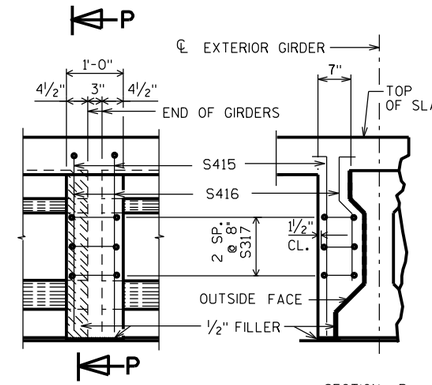
1630-01-73



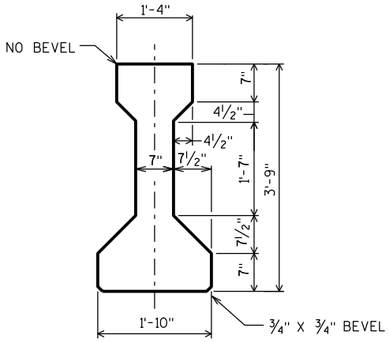
* DIMENSION IS TAKEN NORMAL TO ℄ SUBSTRUCTURE UNITS.

** BARS PLACED PARALLEL TO GIRDERS SPACING PERPENDICULAR TO ℄ GIRDERS

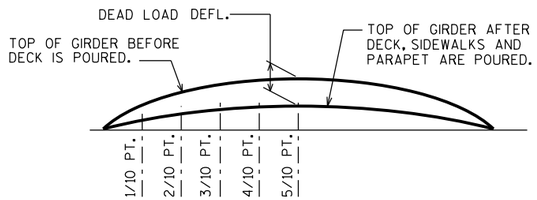
PART LONGIT. SECTION



PILASTER DETAILS AT PIERS



EXISTING 45" GIRDERS

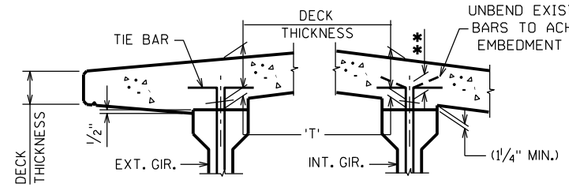


DEAD LOAD DEFLECTION DIAGRAM

DEAD LOAD DEFLECTION

	1/10	2/10	3/10	4/10	5/10
SPAN 1/3	1/4	1/2	5/8	3/4	13/16
SPAN 2	1/4	1/2	11/16	13/16	7/8

ALL VALUES IN INCHES.
VALUES ARE SYMMETRICAL.



DECK HAUNCH DETAIL

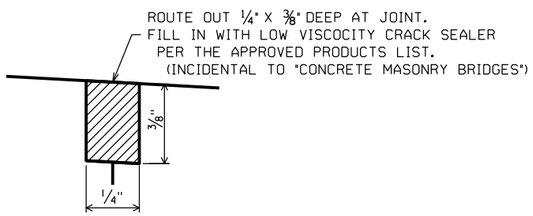
IF 1¼" MINIMUM HAUNCH HEIGHT AT EDGE OF GIRDER CANNOT BE MAINTAINED, THE GRADE LINE MAY BE REVISED BY THE ENGINEER AT THE OPTION OF THE CONTRACTOR. THE PLAN DECK THICKNESS SHALL BE HELD. NOTIFY THE STRUCTURES SECTION IF THE GRADE LINE IS RAISED FROM THE PLAN PROFILE BY MORE THAN ½" OR,

** IF 3" MINIMUM DECK EMBEDMENT OF TIE BAR CANNOT BE OBTAINED.

TO DETERMINE 'T', ELEV. OF TOP OF GIR'S. AT ℄ OF SUBSTRUCTURE UNITS & AT 1/10 POINTS OF EACH SPAN SHALL BE TAKEN. THEN FOLLOW THIS PROCESS:

TOP OF DECK ELEV. AT FINAL GRADE
\- TOP OF GIRDER ELEVATION
\+ DEAD LOAD DEFLECTION
\- DECK THICKNESS
= HAUNCH HEIGHT 'T'

NOTE: AN AVERAGE HAUNCH ('T') OF 2 1/2" WAS USED IN THE QUANTITY "CONCRETE MASONRY BRIDGES".



LONGITUDINAL CONSTRUCTION JOINT DETAIL

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
STRUCTURES DESIGN SECTION

STRUCTURE B-61-0050

CONST. SPEC	2016	DRAWN BY JAF	PLANS CK'D. SKP

SUPERSTRUCTURE DETAILS

SHEET 4 OF 8
66

G45DET
7-11

8 15 — 1 2 3 7 8

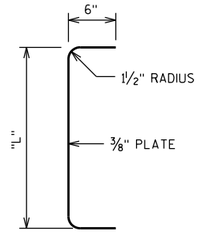
SCALE =

STATE PROJECT NUMBER

1630-01-73

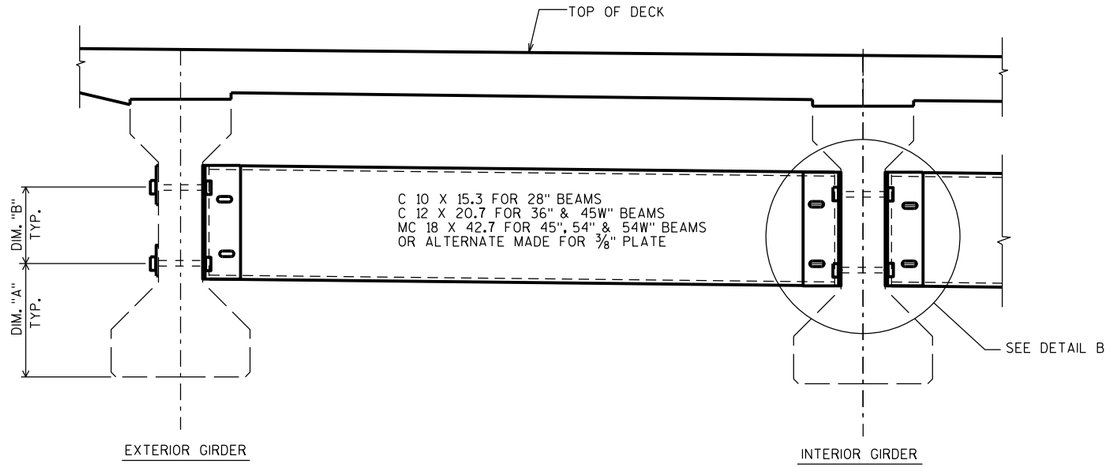
TABLE

GIRDER HEIGHT	DIM. "A"	DIM. "B"	DIM. "L"	* DIM. "X"
28"	1'-0 7/8"	5 7/8"	9 1/2"	2 1/4"
36"	1'-2 7/8"	9 7/8"	1'-1 1/2"	3 1/4"
45"	1'-5 3/8"	1'-1 7/8"	1'-5 1/2"	2 1/4"
45W"	1'-9 1/8"	8 1/8"	1'-0 1/2"	2 3/4"
54"	1'-7 7/8"	1'-5 7/8"	1'-9 1/2"	4 1/4"
54W"	1'-9 1/8"	1'-5 7/8"	1'-9 1/2"	4 1/4"



SECTION THRU ALTERNATE DIAPHRAGM

*DIM "X" = 2½" FOR ALTERNATE PLATE DIAPHRAGM



PART TRANSVERSE SECTION AT DIAPHRAGM

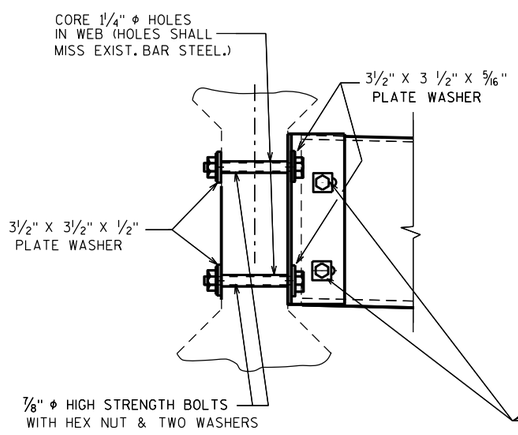
NOTES

ALL DIAPHRAGM MATERIAL AND CORED HOLES SHALL BE PAID FOR AT THE UNIT PRICE BID FOR "STEEL DIAPHRAGMS B-61-50", EACH.

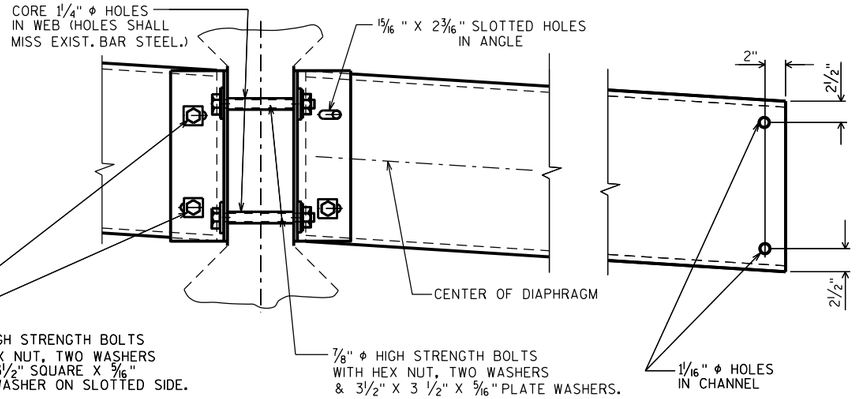
EACH DIAPHRAGM BETWEEN GIRDERS SHALL CONSTITUTE ONE UNIT.

ALL DIAPHRAGM STRUCTURAL STEEL SHALL BE ASTM A709 GRADE 36. ALL BOLTS, NUTS AND WASHERS SHALL BE ASTM A325 TYPE 1.

ALL DIAPHRAGM STRUCTURAL STEEL SHOWN SHALL BE HOT-DIPPED GALVANIZED. ALL BOLTS, NUTS AND WASHERS SHALL BE HOT-DIPPED GALVANIZED IN ACCORDANCE WITH ASTM A153 CLASS C. GALVANIZED NUTS SHALL BE TAPPED OVERSIZED IN ACCORDANCE WITH THE REQUIREMENTS OF ASTM A563 AND SHALL MEET THE REQUIREMENTS OF SUPPLEMENTARY REQUIREMENT S1 OF ASTM A563, LUBRICANT AND TEST FOR COATED NUTS.

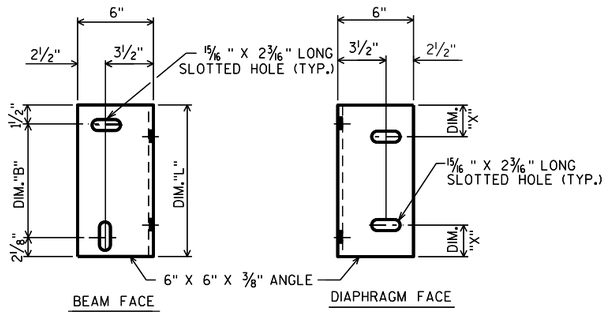


(FOR EXTERIOR GIRS. & STAGGERED DIAPHRAGMS)



(FOR CONTINUOUS LINE OF DIAPHRAGMS)

DETAIL B



DIAPHRAGM SUPPORT

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
STRUCTURES DESIGN SECTION

STRUCTURE B-61-50

CONST. SPEC **2016** | DRAWN BY J.A.F. | PLANS CK'D. **SKP**

STEEL DIAPHRAGM

SHEET 5 **OF 8**

67

GSTDIAMT
1-12

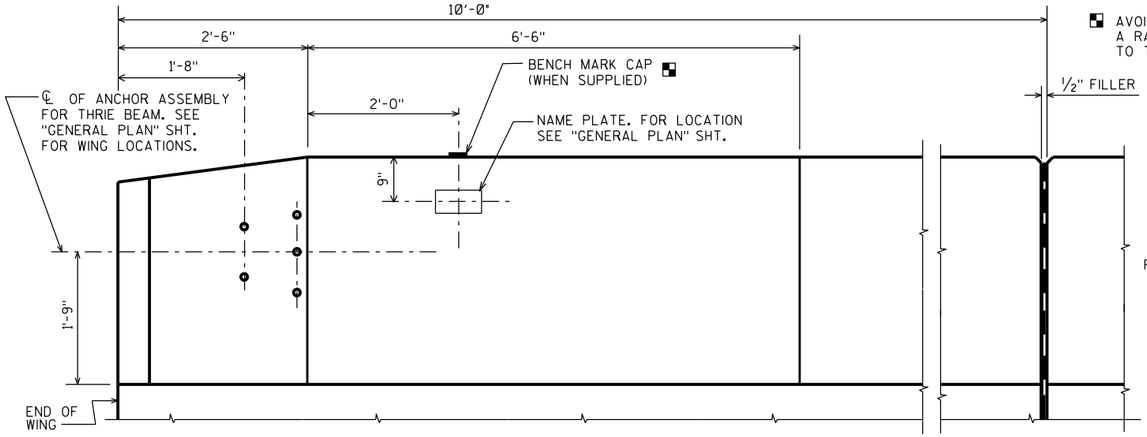
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8

STATE PROJECT NUMBER

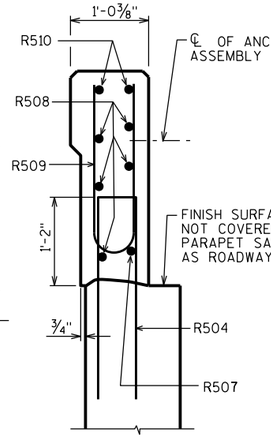
1630-01-73



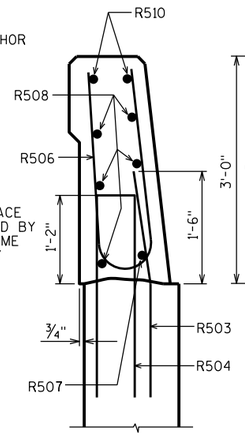
AVOID PLACING A BENCH MARK CAP BELOW A RAIL OR FENCE SYSTEM THAT IS ATTACHED TO THE TOP OF THE PARAPET.

½" FILLER

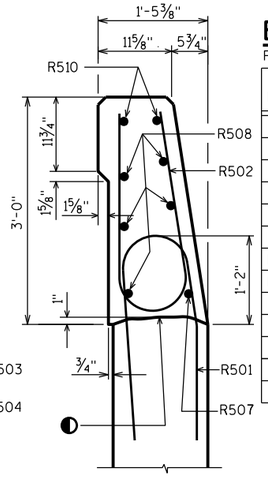
INSIDE ELEVATION



SECTION A



SECTION B

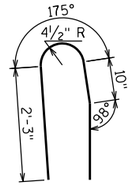


SECTION C

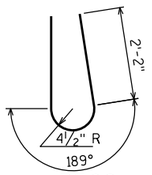
BILL OF BARS

FOR ABUTMENT PARAPETS

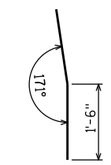
BAR MARK	COAT	SOUTH ABUT.	NORTH ABUT.	LENGTH	BENT	BAR SERIES	LOCATION
R501	X	2	2	5-10	X		PARAPET VERT.
R502	X	2	2	5-8	X		PARAPET VERT.
R503	X	12	12	3-0	X		PARAPET VERT.
R504	X	17	17	5-7	X		PARAPET VERT.
R505	X	6	6	5-5	X		PARAPET VERT.
R506	X	6	6	5-6	X		PARAPET VERT.
R507	X	1	1	9-7	X		PARAPET HORIZ.
R508	X	6	6	9-8			PARAPET HORIZ.
R509	X	5	5	4-9	X		PARAPET VERT.
R510	X	2	2	9-8	X		PARAPET HORIZ



R501



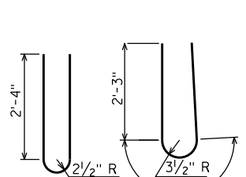
R502



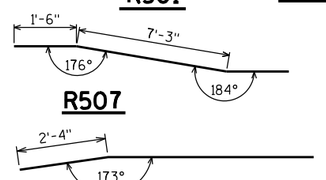
R503



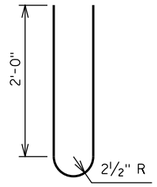
R504



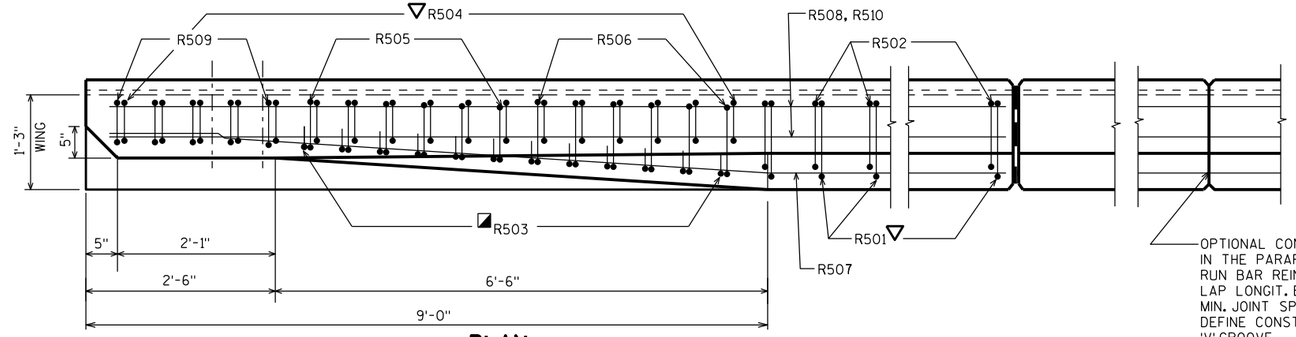
R505 R506



R507 R510

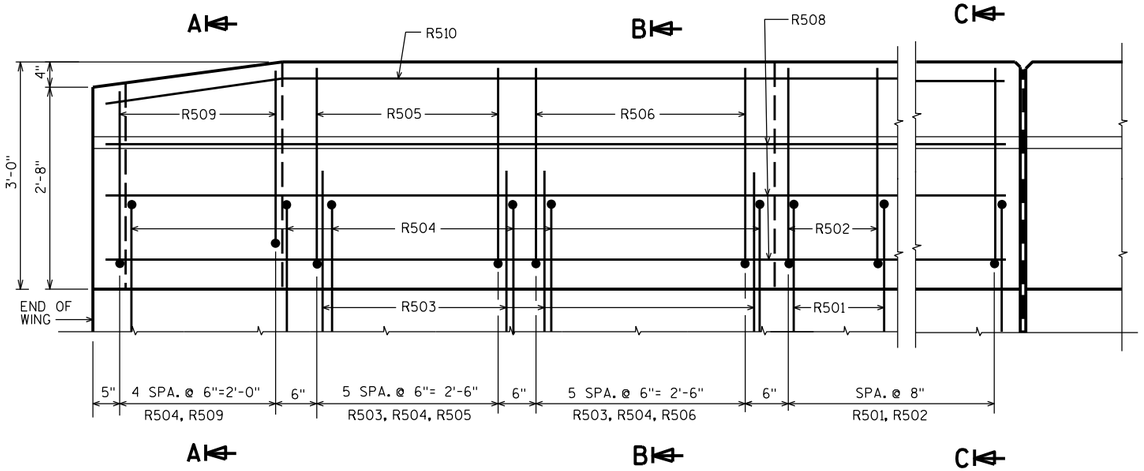


R509

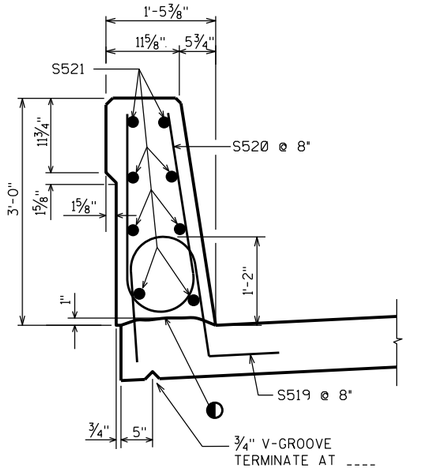


PLAN

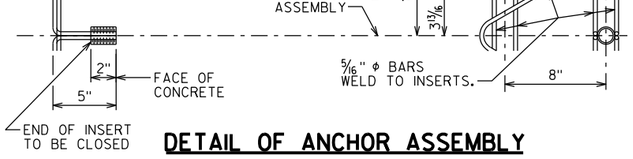
OPTIONAL CONSTRUCTION JOINTS IN THE PARAPETS MAY BE USED. RUN BAR REINF. THRU THE JOINT. LAP LONGIT. BARS A MIN. OF 1'-9". MIN. JOINT SPACING OF 80'-0". DEFINE CONST. JOINT WITH A ¾" - 'V' GROOVE.



OUTSIDE ELEVATION



SECTION THRU PARAPET ON BRIDGE



DETAIL OF ANCHOR ASSEMBLY

NOTE: HEX HEAD CAP SCREWS & WASHERS TO BE GALVANIZED IN ACCORDANCE WITH AASHTO M232 CLASS C.

ASSEMBLY SHALL BE BID ITEM "ANCHOR ASSEMBLIES FOR STEEL PLATE BEAM GUARD", EACH.

◐ CONST. JOINT - STRIKE OFF AS SHOWN.

◪ R503 BARS MAY BE PLACED AFTER CONCRETE IS POURED BUT BEFORE INITIAL SET HAS TAKEN PLACE. USE CARE TO PLACE R503 OR S503 BARS CORRECTLY ALONG TRANSITION OF PARAPET.

▽ R501 AND R504 BARS TO BE TIED TO WING STEEL BEFORE WING IS POURED.

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
STRUCTURES DESIGN SECTION

STRUCTURE B-61-50

CONST. SPEC 2016 | DRAWN BY J.A.F. | PLANS CK'D. SKP

36" SINGLE SLOPE PARAPET WING
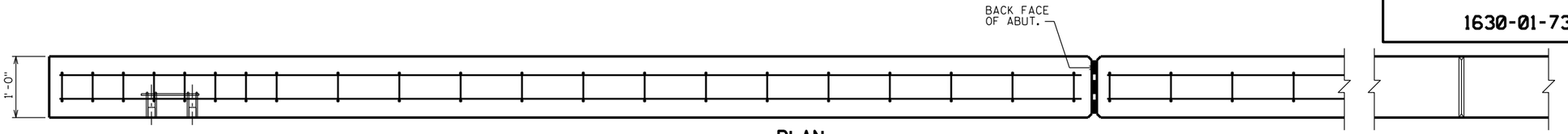
SHEET 6 OF 8
68

SCALE = 1

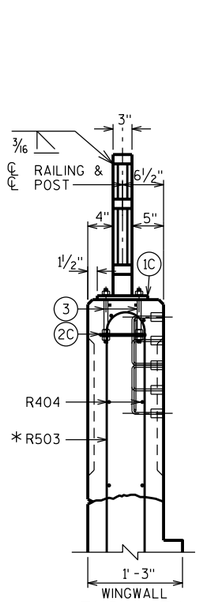
36SSWIN

STATE PROJECT NUMBER

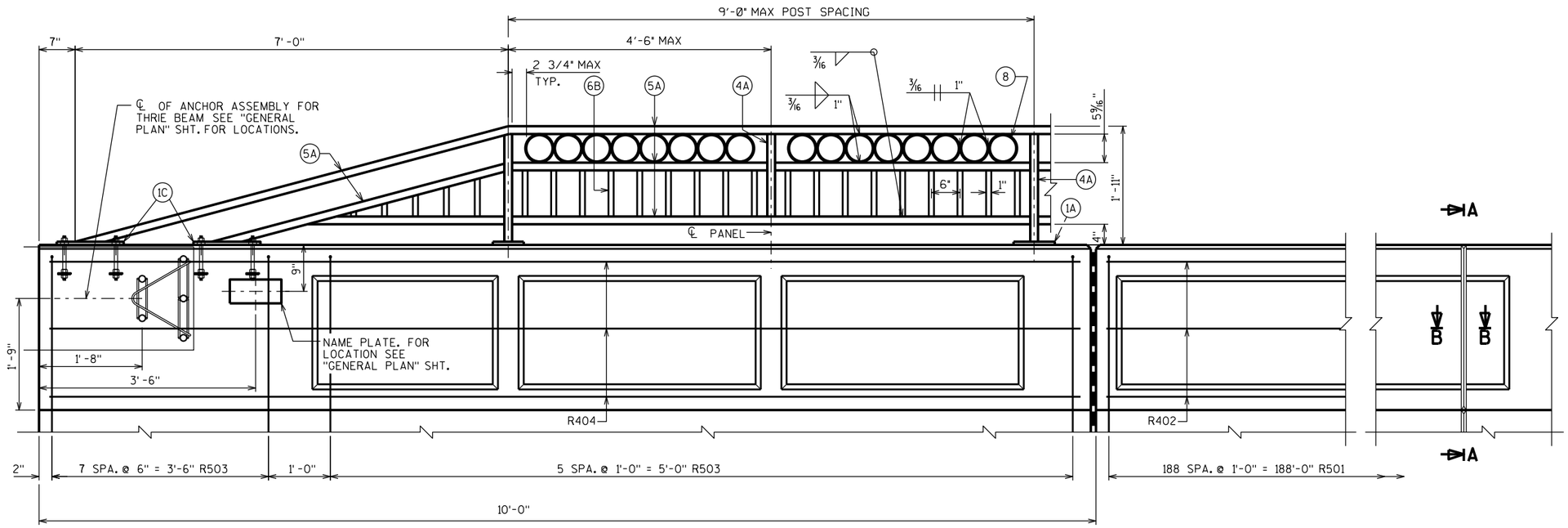
1630-01-73



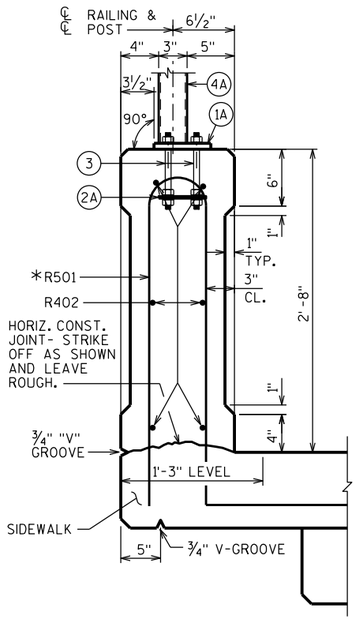
PLAN



END VIEW

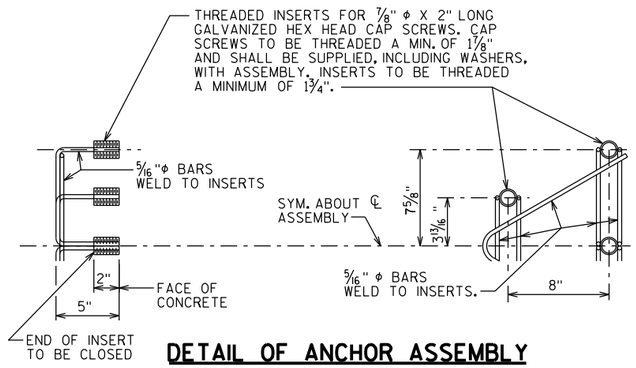


ELEVATION OF PARAPET



SECTION THRU PARAPET ON BRIDGE

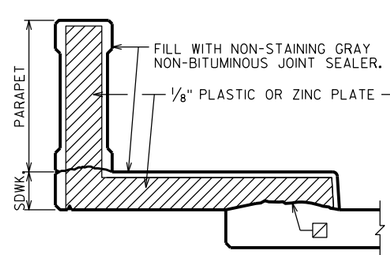
* ADJUST LOCATIONS OF BARS TO ALLOW PLACEMENT OF ANCHOR ASSEMBLY FOR RAILING AND BEAM GUARD.



DETAIL OF ANCHOR ASSEMBLY

NOTE: HEX HEAD CAP SCREWS & WASHERS TO BE GALVANIZED IN ACCORDANCE WITH AASHTO M232 CLASS C.

ASSEMBLY SHALL BE BID ITEM "ANCHOR ASSEMBLIES FOR STEEL PLATE BEAM GUARD", EACH.

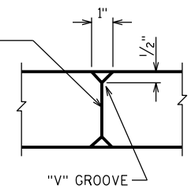


SECTION A-A

(SHOWING DEFLECTION JOINT IN PARAPET AND SIDEWALK.)

WHEN PARAPETS ARE POURED CONTINUOUSLY FROM END TO END, THEY SHALL BE SEPARATED AT THE DEFLECTION JOINTS BY A PIECE OF ⅛" ZINC OR PLASTIC PLATE CUT AS SHOWN IN SECTION A-A BY SHADED AREA. IF CONSTRUCTION JOINTS IN PARAPETS ARE USED AT THE DEFLECTION JOINTS, ONE SIDE OF JOINT SHALL BE COATED WITH AN APPROVED LIQUID BOND BREAKER AND PLATE SEPARATORS MAY BE OMITTED.

☒ HORIZ. CONST. JOINT - STRIKE OFF AS SHOWN AND LEAVE ROUGH.



SECTION B-B

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
STRUCTURES DESIGN SECTION

STRUCTURE B-61-50

CONST. SPEC	2016	DRAWN BY JAF	PLANS CK'D. SKP

COMBINATION RAIL TYPE "C1"

SHEET 7 OF 8
69

8

16 11 12 1 2 3 4 5

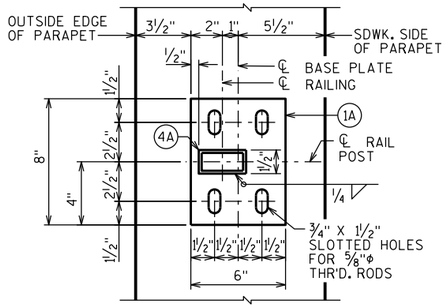
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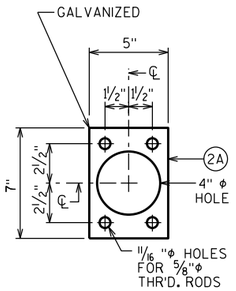
RAILCOMB
7-11

STATE PROJECT NUMBER

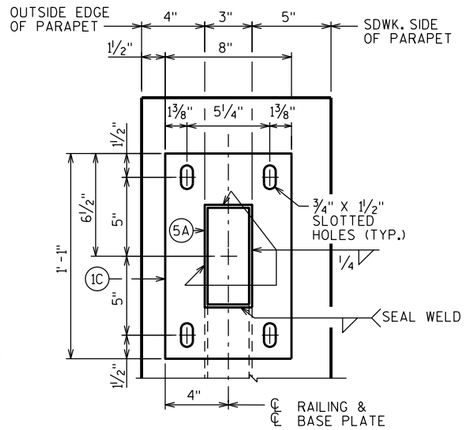
1630-01-73



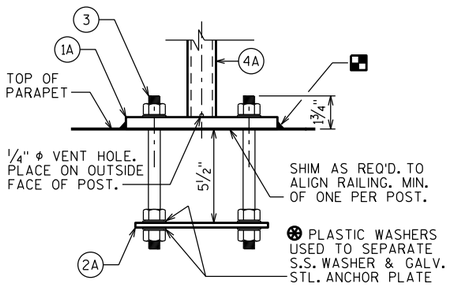
TYPICAL RAIL POST BASE PLATE



ANCHOR PLATE

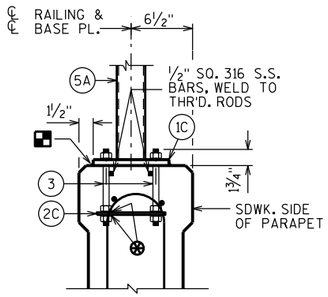


END RAIL BASE PLATE



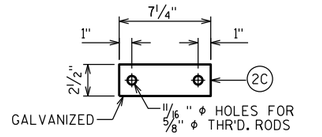
ANCHORAGE FOR RAIL POSTS

NOTE: ANCHOR PLATE NOT REQUIRED WHEN TYPE S ANCHORS ARE USED.



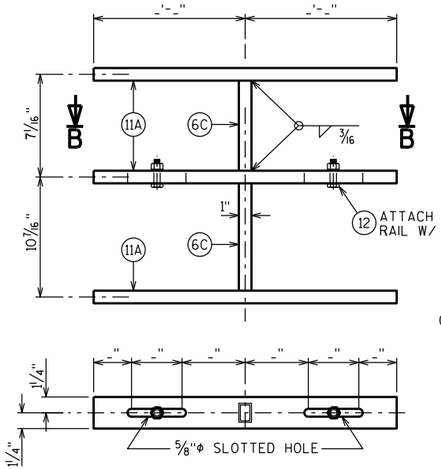
ANCHORAGE FOR END RAIL

NOTE: ANCHOR PLATES NOT REQ'D. WHEN TYPE "S" ANCHORS ARE USED.



END RAIL ANCHOR PLATE

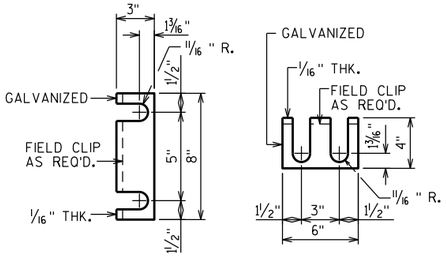
FOR END RAIL BASE PLATES
2 REQ'D. PER END RAIL BASE PLATE



SECTION B-B

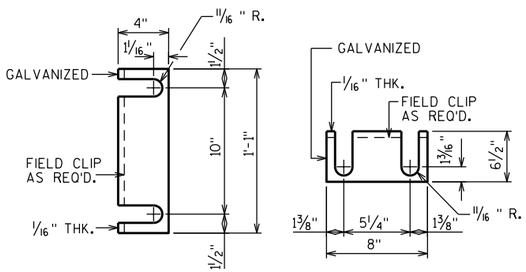
SLEEVE DETAIL

(AT MODULAR EXP. JT.)



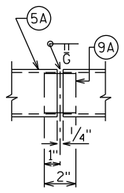
RAIL POST SHIM DETAIL

(2 SETS PER POST)



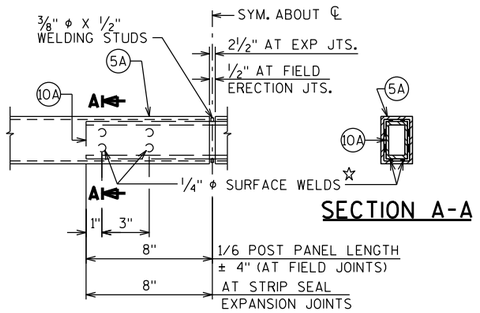
END RAIL SHIM DETAIL

(2 SETS PER POST)



SHOP RAIL SPLICE DETAIL

(LOCATION MUST BE SHOWN ON SHOP DRAWINGS)



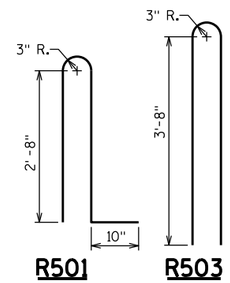
SECTION A-A

FIELD ERECTION JOINT DETAIL

☆ MIN. ⅝" FLAT SURFACE DIA. PUNCHINGS OR STUDS MAY BE USED AS AN ALTERNATE.

BILL OF BARS

BAR MARK	COAT	WEST ABUT.	EAST ABUT.	LENGTH	BENT	LOCATION
R501	X	189		6-10	X	PARAPET VERT.
R402	X	36		32-8		PARAPET HORIZ.
R503	X	14	14	8-2	X	PARAPET VERT. @ WINGS
R404	X	6	6	9-8		PARAPET HORIZ. @ WINGS



R501

R503

LEGEND

(1A) PLATE ⅝" X 6" X 8" WITH ¾" X 1½" SLOTTED HOLES.

(1C) PLATE ⅝" X 8" X 1'-1" WITH ¾" X 1½" SLOTTED HOLES.

(2A) ¼" X 5" X 7" ANCHOR PLATE WITH 11/16 " φ HOLES FOR THR'D. RODS NO. 3.

(2C) ¼" X 2½" X 7¼" ANCHOR PLATE WITH 11/16 " φ HOLES FOR THR'D. RODS NO. 3.

(3) ⅝" DIA. X 9" LONG, TYPE 316 STAINLESS STEEL THREADED RODS (MIN. TENSILE STRENGTH = 70 KSI) WITH NUT AND WASHERS OF SAME ALLOY GROUP. (ALTERNATE RAIL POST ANCHORAGE: 4 EQUIVALENT STAINLESS STEEL CONCRETE MASONRY ANCHORS TYPE S ⅝-INCH. EMBED 7" IN CONCRETE FOR RAIL POSTS. EMBED 5" IN CONCRETE FOR END RAILS.)

(4A) STRUCTURAL TUBING 3" X 1½" X 3/16". PLACE VERTICAL. WELD TO NO. 1 & 5.

(5A) STRUCTURAL TUBING 3" X 1½" X 3/16" RAILS. WELD TO NO. 1 & NO. 4. INSIDE OF TUBE TO BE PAINTED AT ALL FIELD ERECTION & EXPANSION JOINTS.

(6B) BAR 1" X 1½" PICKETS. WELD TO NO. 5. PLACE VERTICAL.

(6C) BAR 1" X 1½" PICKETS. WELD TO NO. 11. PLACE VERTICAL.

(8) STRUCTURAL TUBING 5" φ (STANDARD SIZE) (5.563" O.D.) 1½" LONG SLICES. WELD TO NO. 5A.

(9A) RECTANGULAR SLEEVE FABRICATED FROM 3/16" PLATES. PROVIDE "SLIDING FIT".

(10A) RECTANGULAR SLEEVE FABRICATED FROM 3/16" PLATES. (1'-4" @ FIELD ERECTION JTS.) (1'-4" @ STRIP SEAL EXP. JTS.)

(11A) BAR 2½" X 1" X '- ".

(12) ½" DIA. STAINLESS STEEL BOLT WITH NUT AND LOCKWASHER.

RAILING NOTES

BID ITEM SHALL BE "RAILING STEEL TYPE C1 GALVANIZED B-61-50", WHICH SHALL INCLUDE ALL STEEL ITEMS SHOWN.

POST BASE PLATES SHALL BE FLAT WITH ALL SURFACES SMOOTH AND FREE FROM WARP AND ALL EDGES SMOOTH, STRAIGHT AND VERTICAL. ALL PLATE CUTS SHALL BE MACHINE OR MACHINE FLAME CUTS.

ALL PLATES, BARS, AND RECTANGULAR SLEEVES SHALL CONFORM TO ASTM A709 GRADE 36. ALL STRUCTURAL TUBING SHALL CONFORM TO ASTM A500 GRADE B.

ANCHORAGES SHALL BE ACCURATELY PLACED TO PROVIDE CORRECT ALIGNMENT OF RAILING. SET NORMAL TO GRADE.

CUT BOTTOM OF POST TO MAKE POST VERTICAL IN BOTH TRANSVERSE AND LONGITUDINAL DIRECTION.

STEEL SHIMS SHALL BE PROVIDED & USED UNDER BASE PLATES WHERE REQUIRED FOR ALIGNMENT, AND SHALL BE GALVANIZED.

CAULK AROUND PERIMETER OF BASE PLATES, NO. 1, AND FILL BOLT SLOT OPENINGS IN SHIMS AND BASE PLATES WITH NON-STAINING GRAY NON-BITUMINOUS JOINT SEALER.

ALL JOINTS AND RECESSES IN CONCRETE PARAPET ARE TO BE VERTICAL.

ALL MATERIAL (EXCEPT NO. 3 & 12) SHALL BE GALVANIZED AFTER FABRICATION. PRIOR TO GALVANIZING, THE STEEL RAILING SHALL BE GIVEN A NO. 6 BLAST CLEANING PER SSPC SPECIFICATIONS. PAINT OVER GALVANIZING WITH AN APPROVED TIE COAT AND TOP COAT AS SPECIFIED IN THE "BRIDGE SPECIAL PROVISIONS". THE RAILING SHALL BE PAINTED FEDERAL COLOR NO. , .

VENT HOLES SHALL BE DRILLED IN POST AND RAIL MEMBERS AS REQUIRED TO FACILITATE GALVANIZING AND DRAINAGE.

RAILING SHALL BE FABRICATED IN LENGTHS THAT INCLUDE 3 OR 4 POSTS.

TOUCH-UP PAINTING TO BE DONE AT COMPLETION OF STEEL RAILING INSTALLATION TO THE SATISFACTION OF THE ENGINEER AT NO EXTRA COST.

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION
STRUCTURES DESIGN SECTION

STRUCTURE B-61-50

CONST. SPEC 2016 | DRAWN BY JAF | PLANS CK'D. SKP

COMBINATION RAIL DETAILS

SHEET 8 OF 8
70

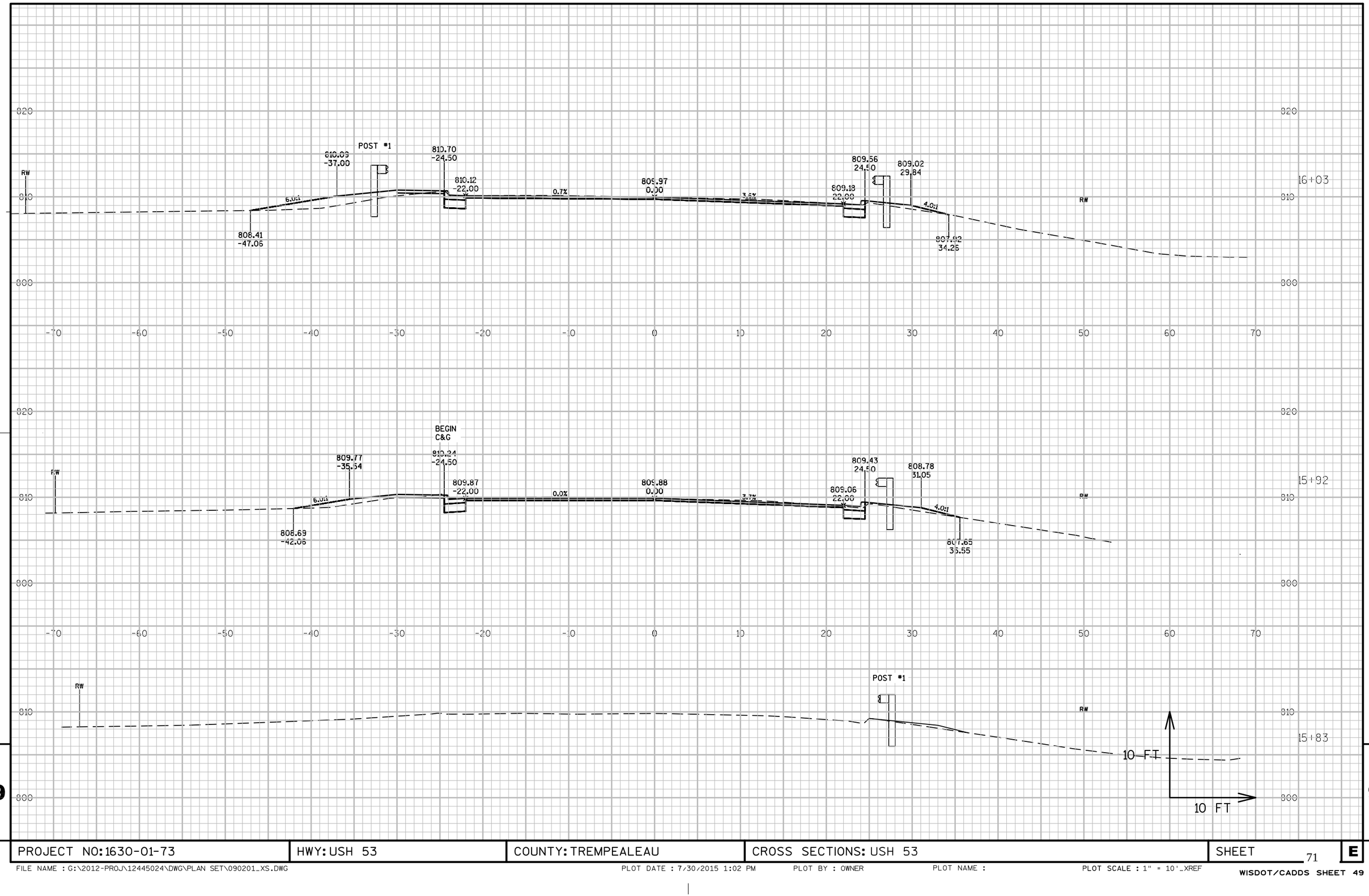
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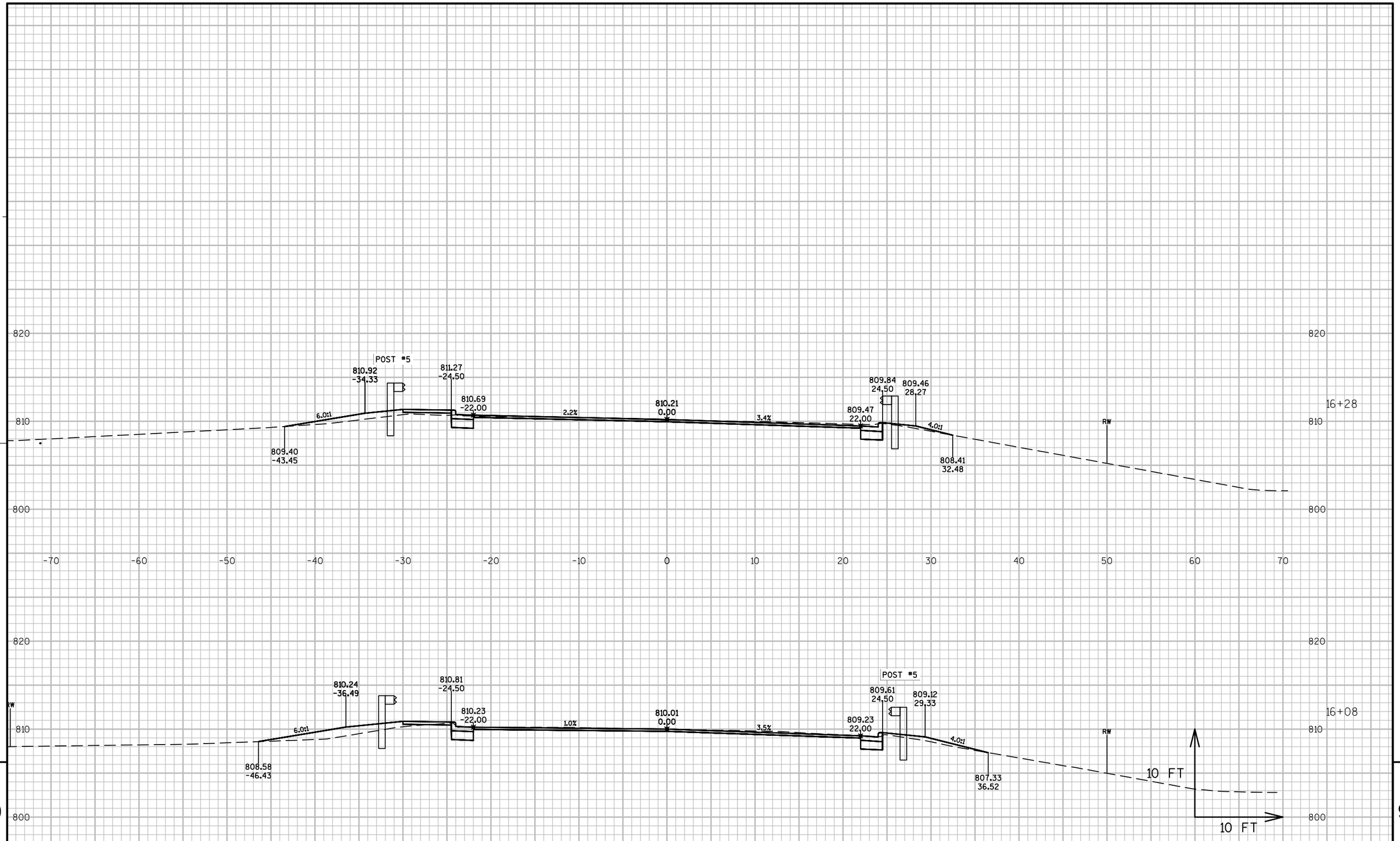
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8

12345 11



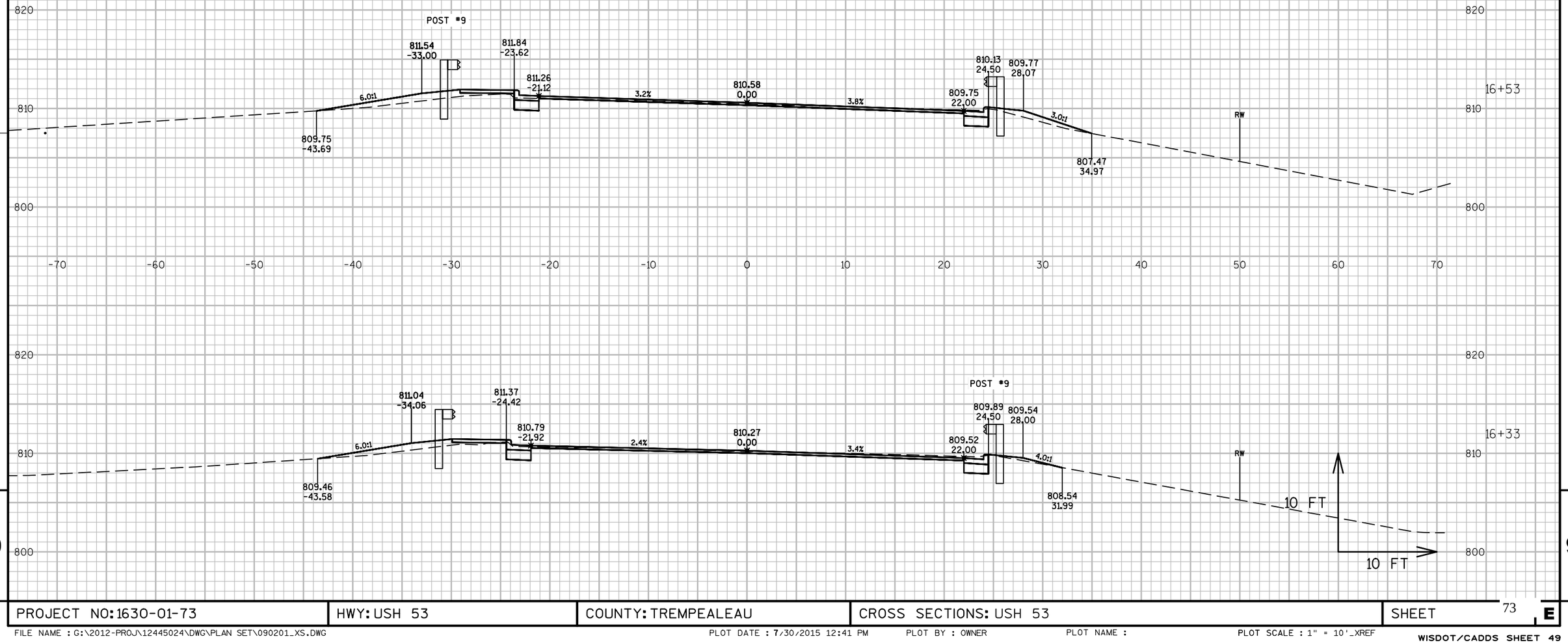
PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 71	E



PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 72 E

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WISDOT/CADDS SHEET 49



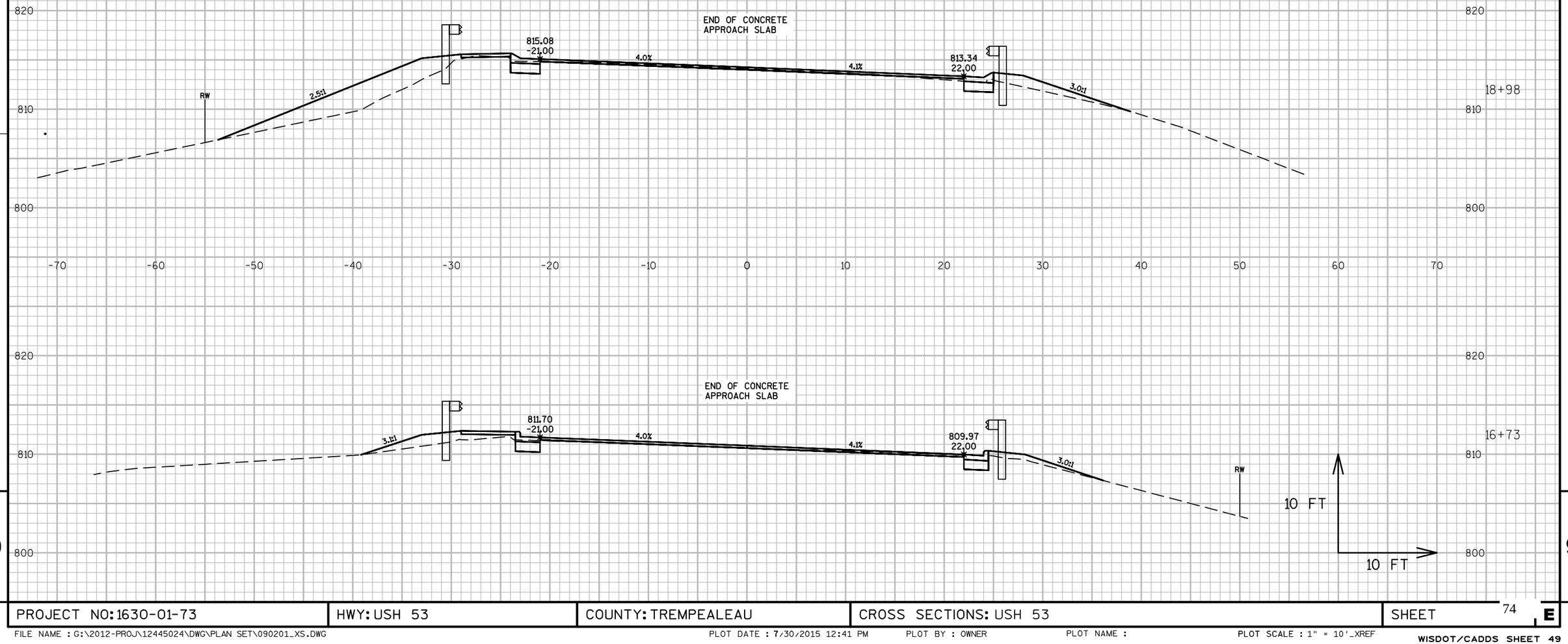
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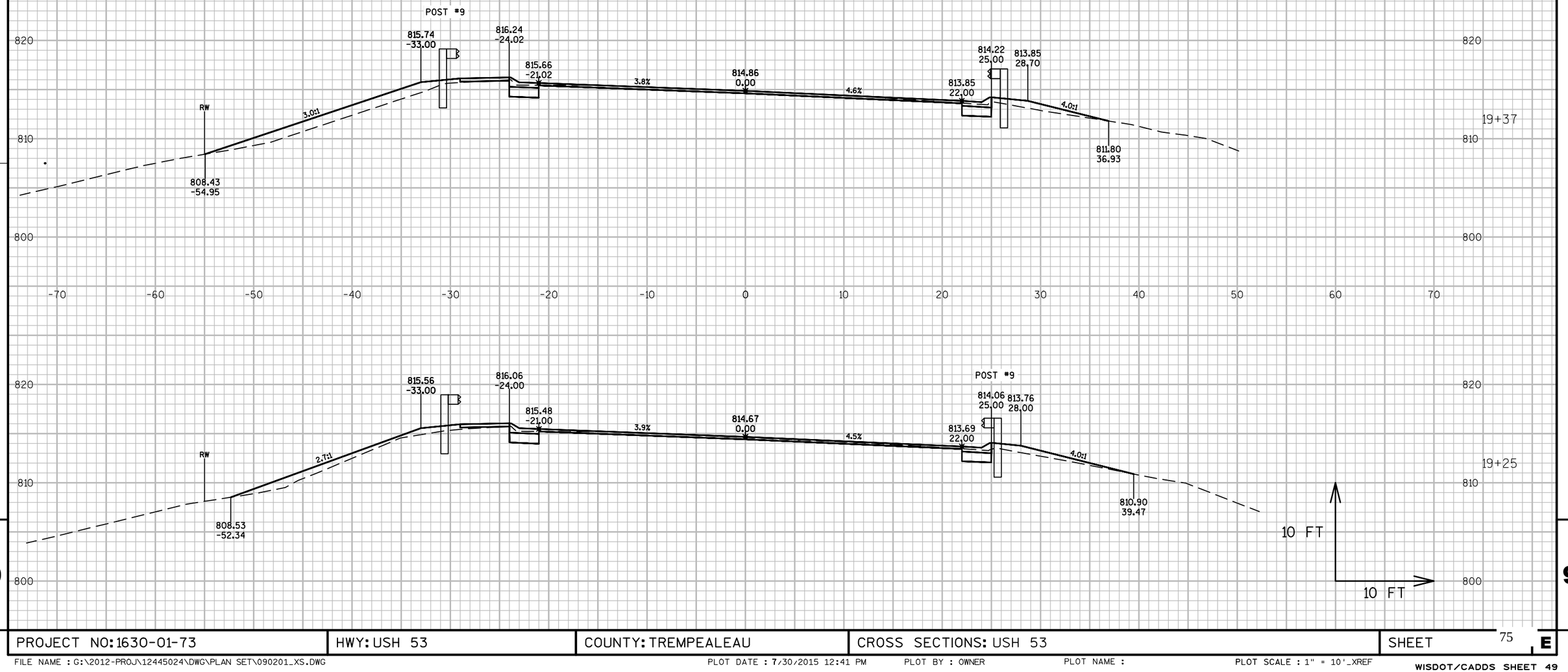
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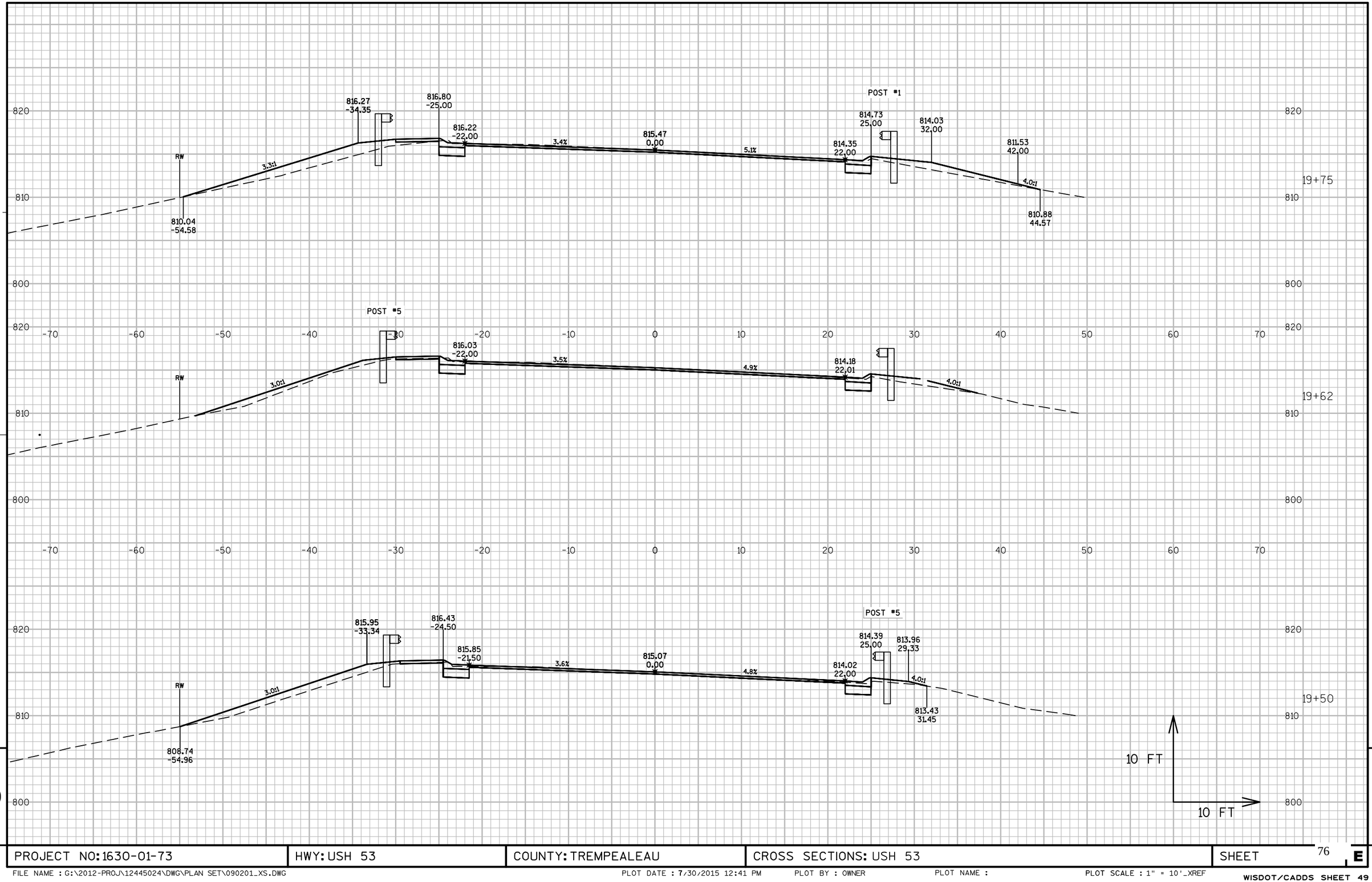
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WISDOT/CADDS SHEET 49

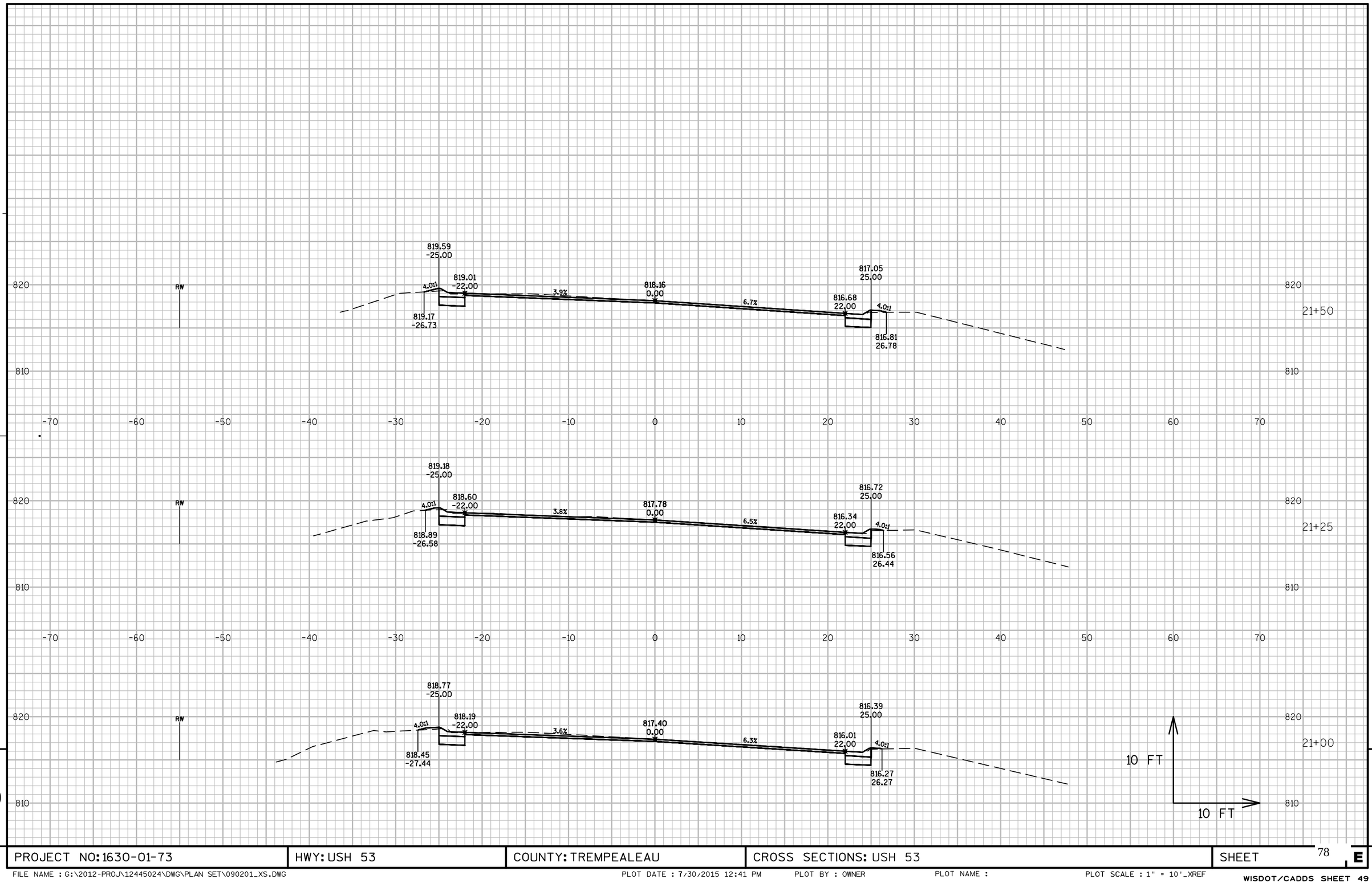


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PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 77 E

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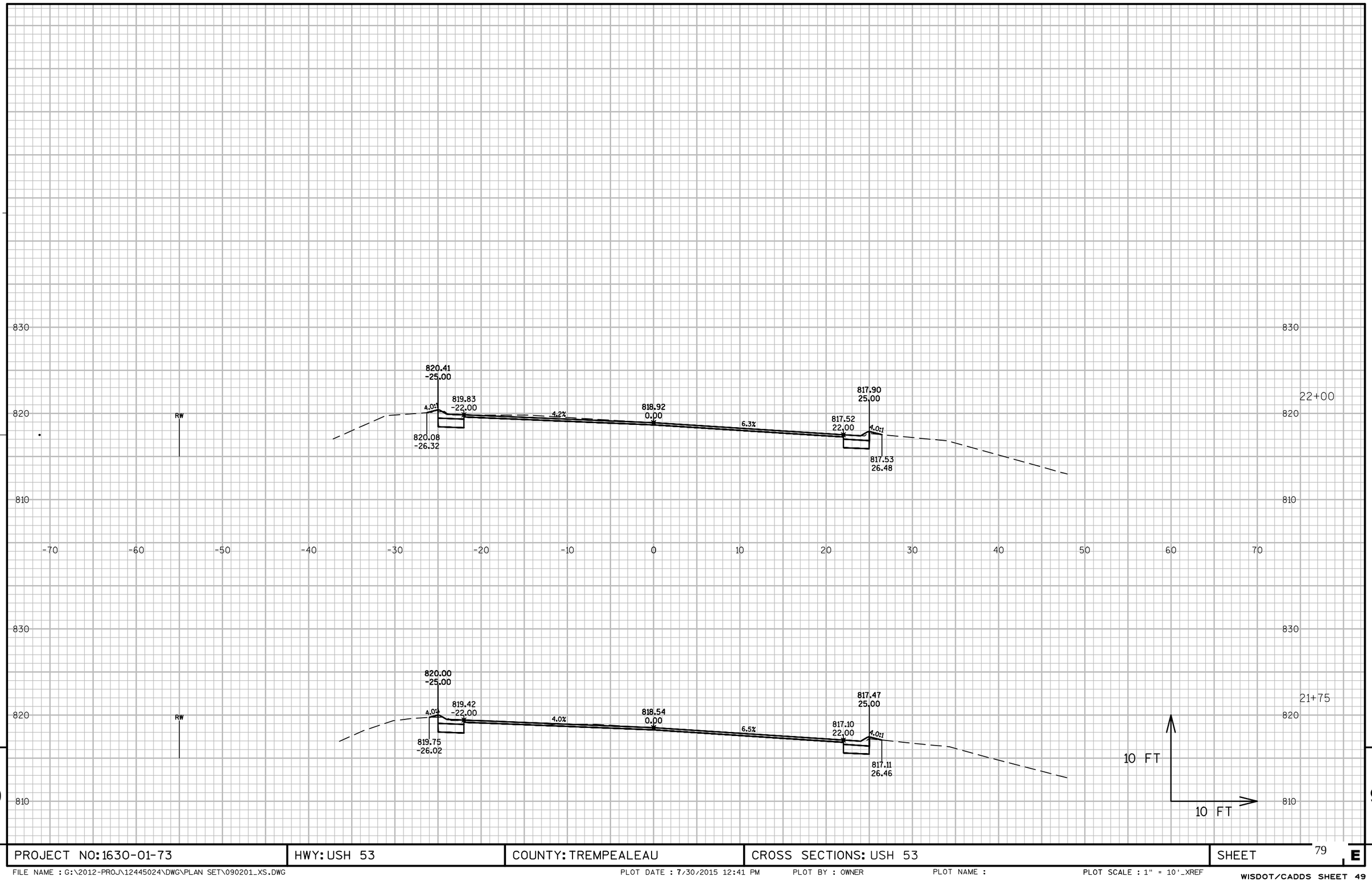
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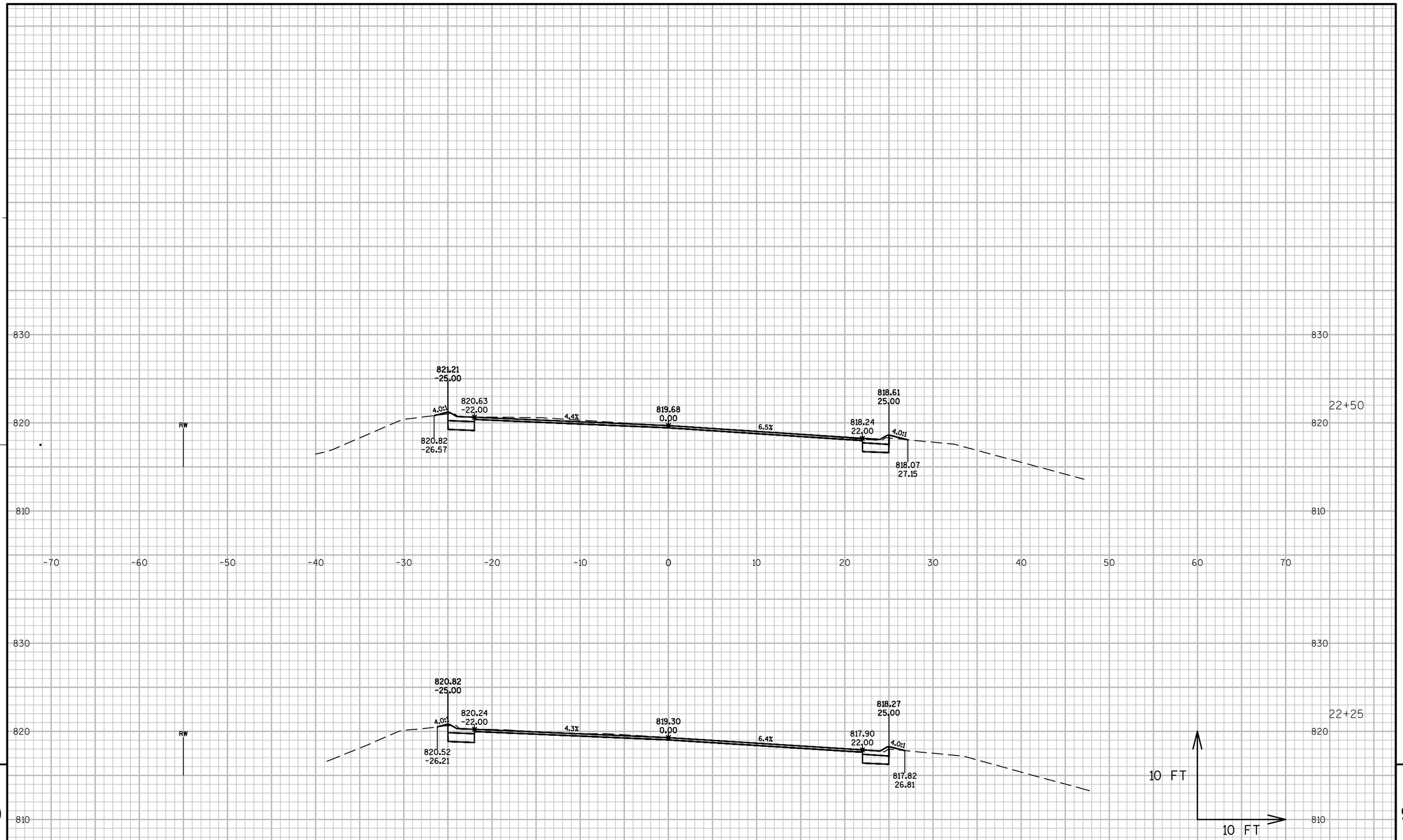
WISDOT/CADDS SHEET 49



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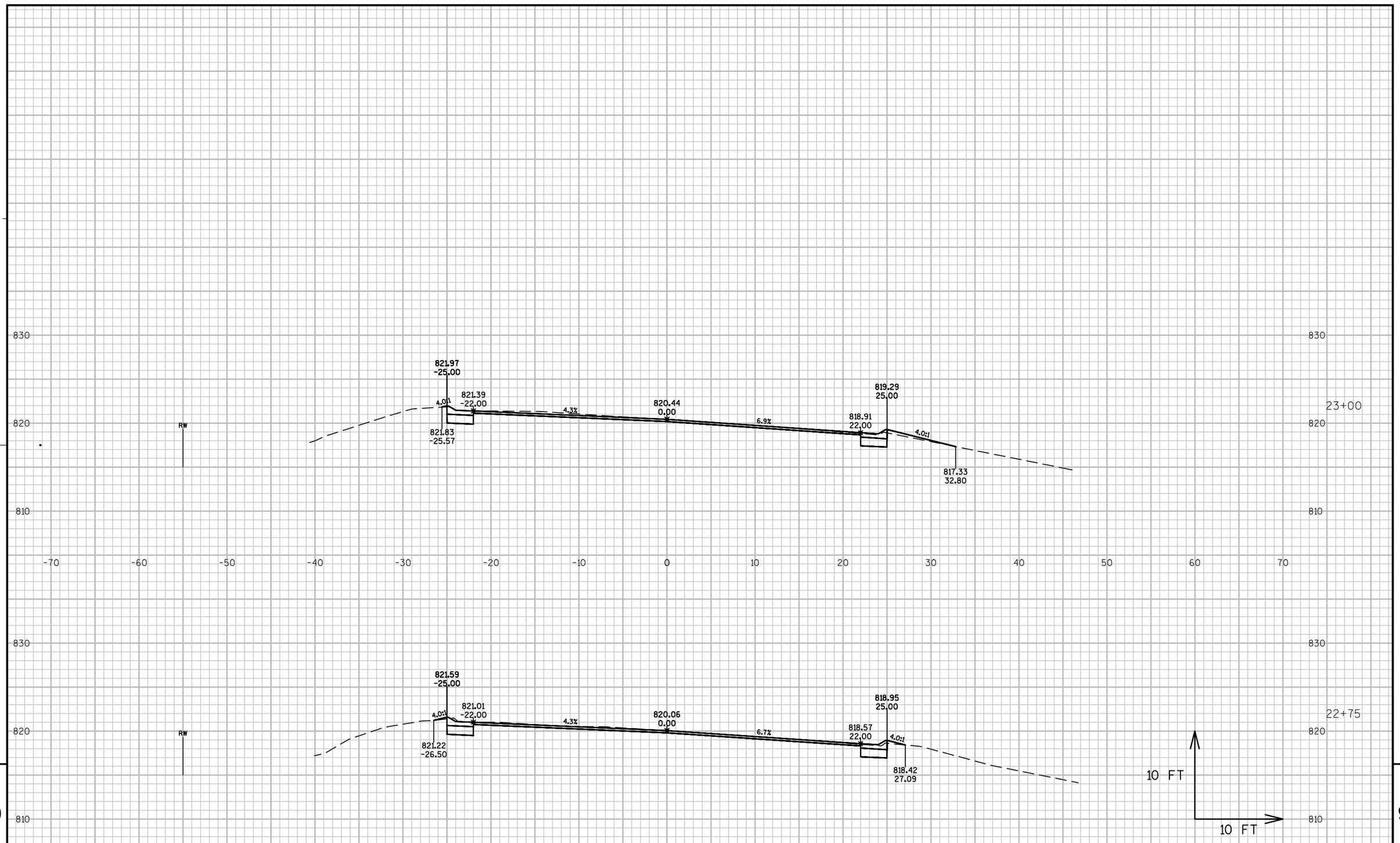
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PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 80 E

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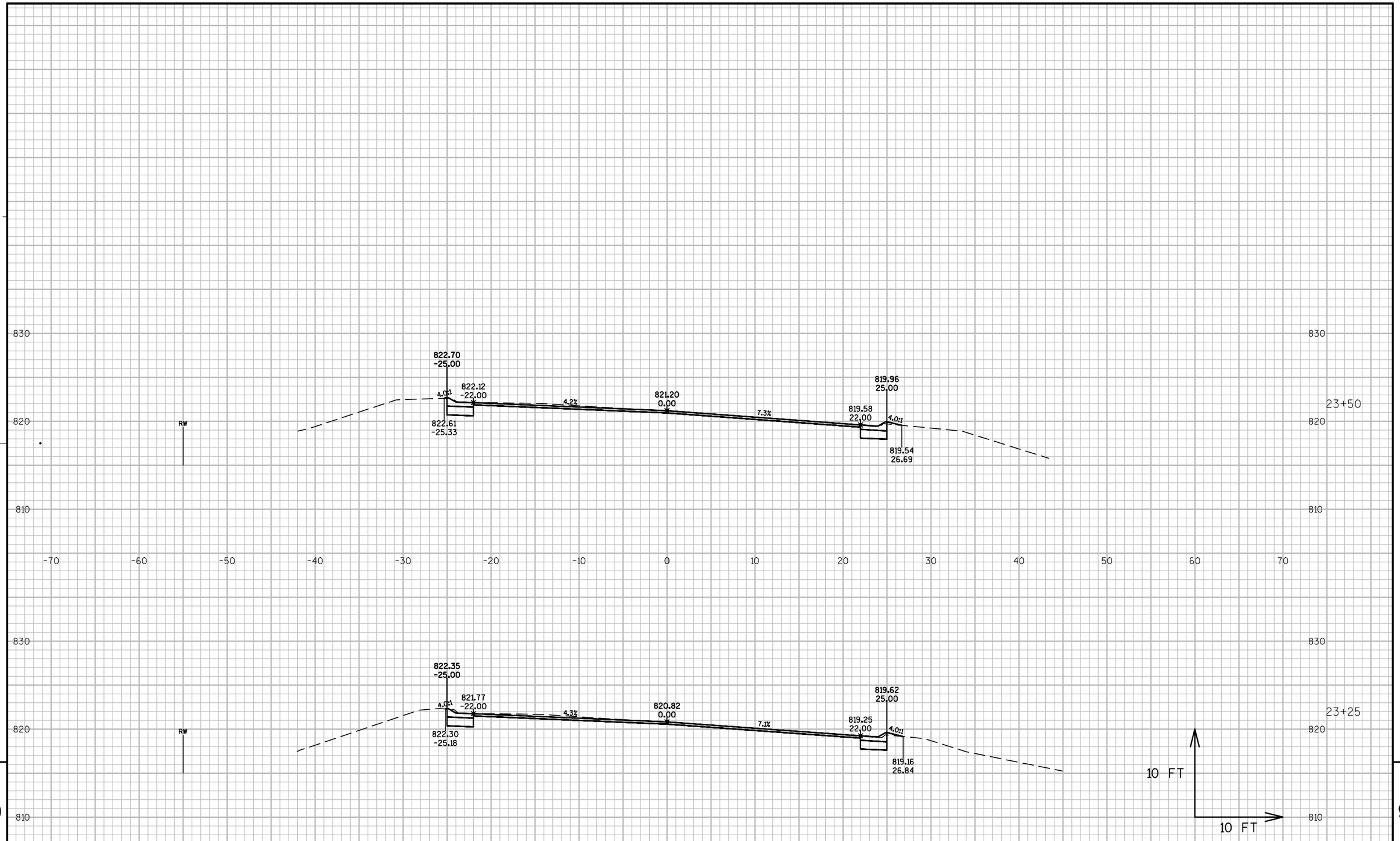
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WISDOT/CADDS SHEET 49

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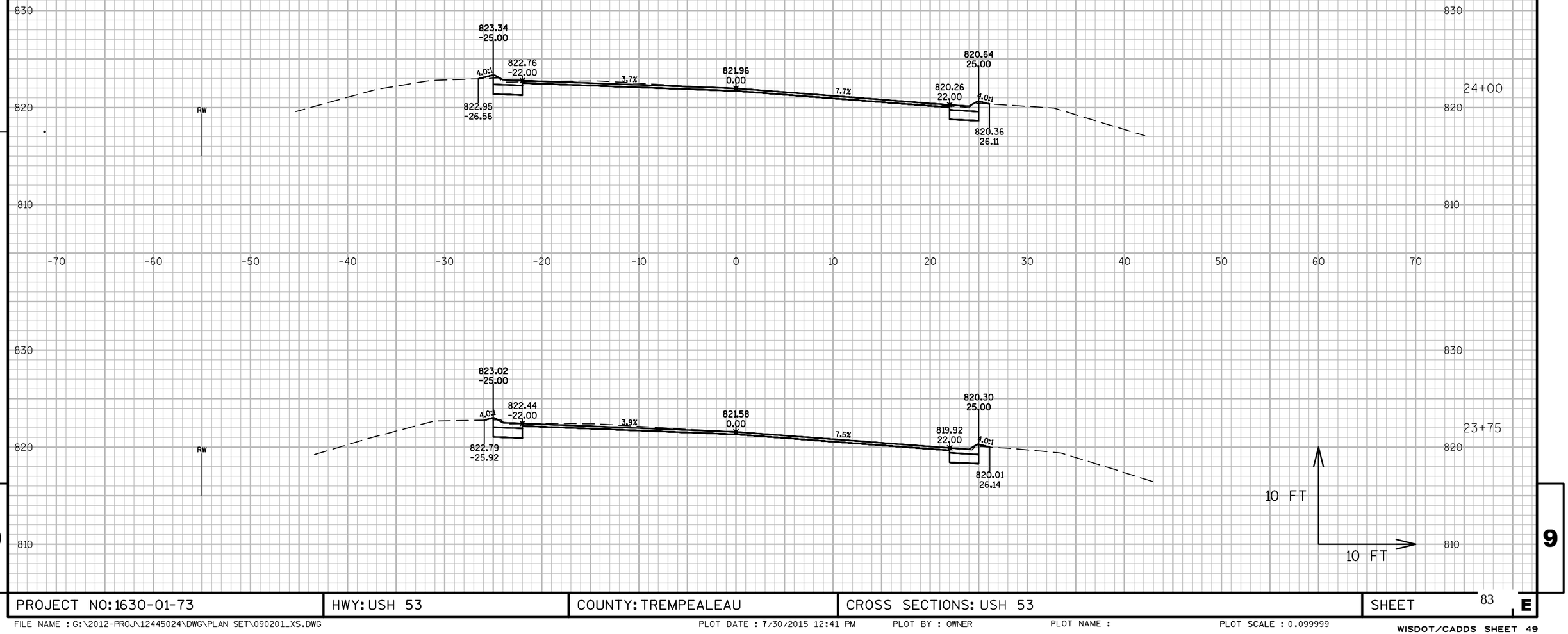
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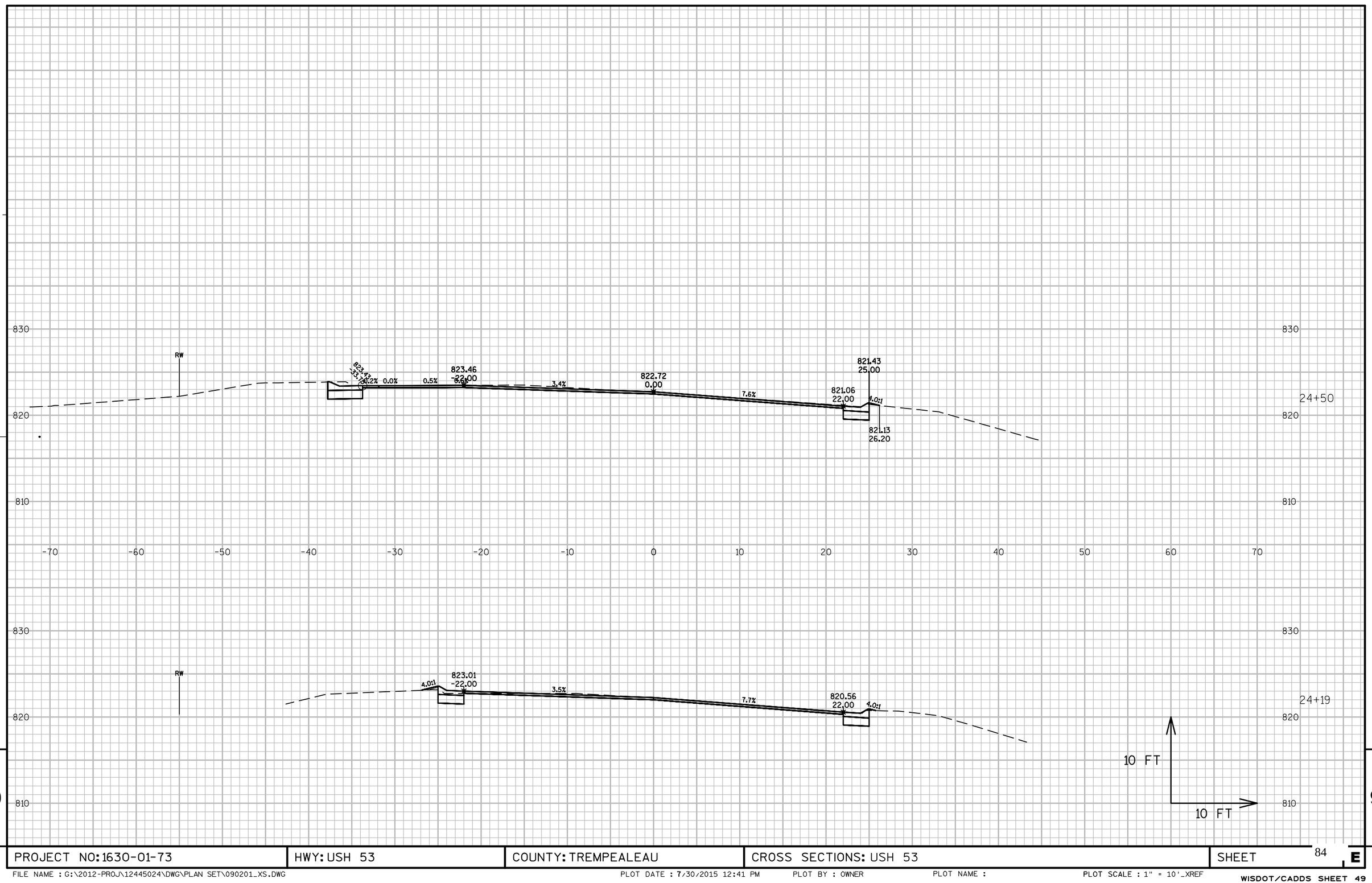
WISDOT/CADDS SHEET 49



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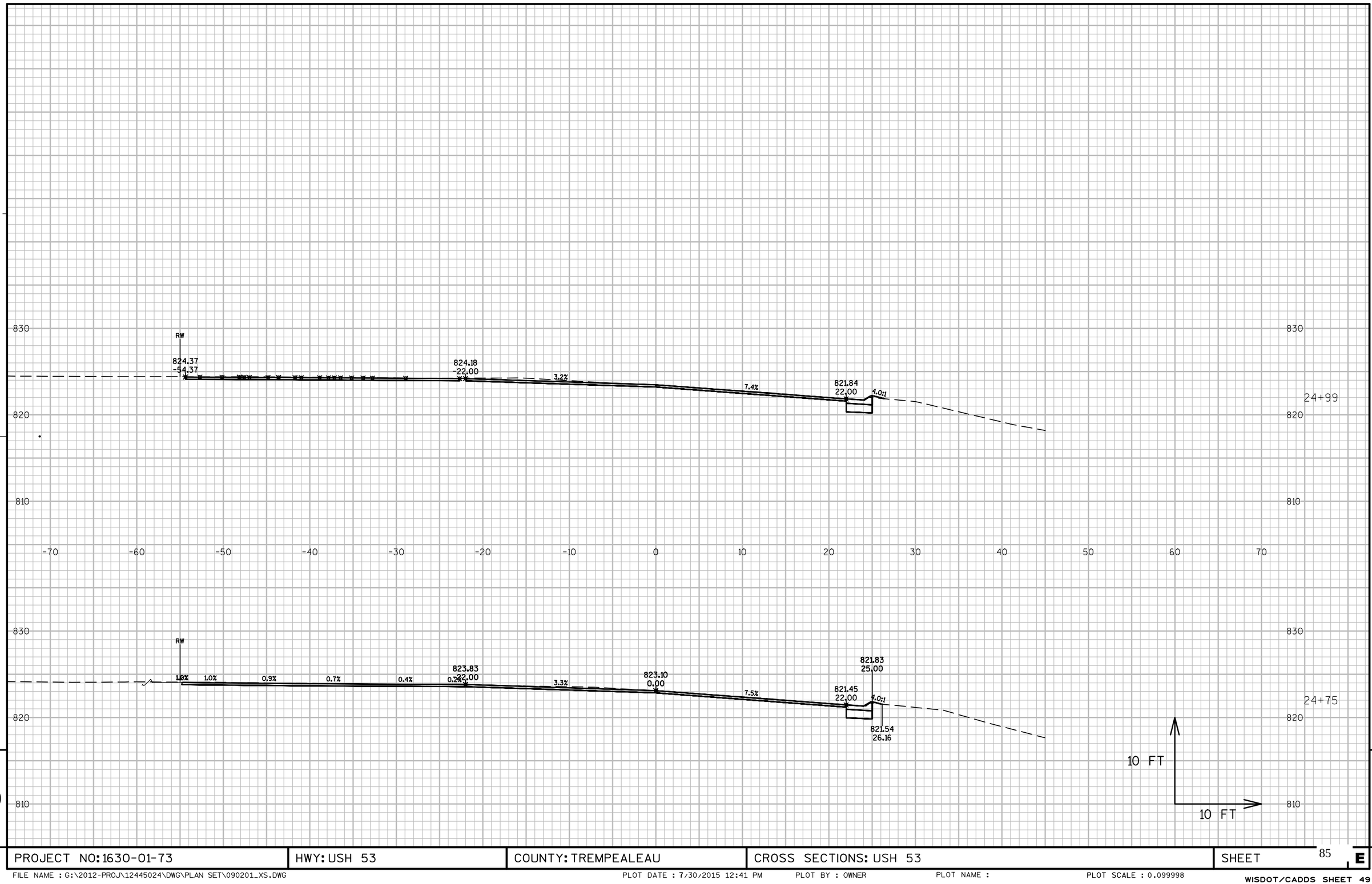
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PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 84 E

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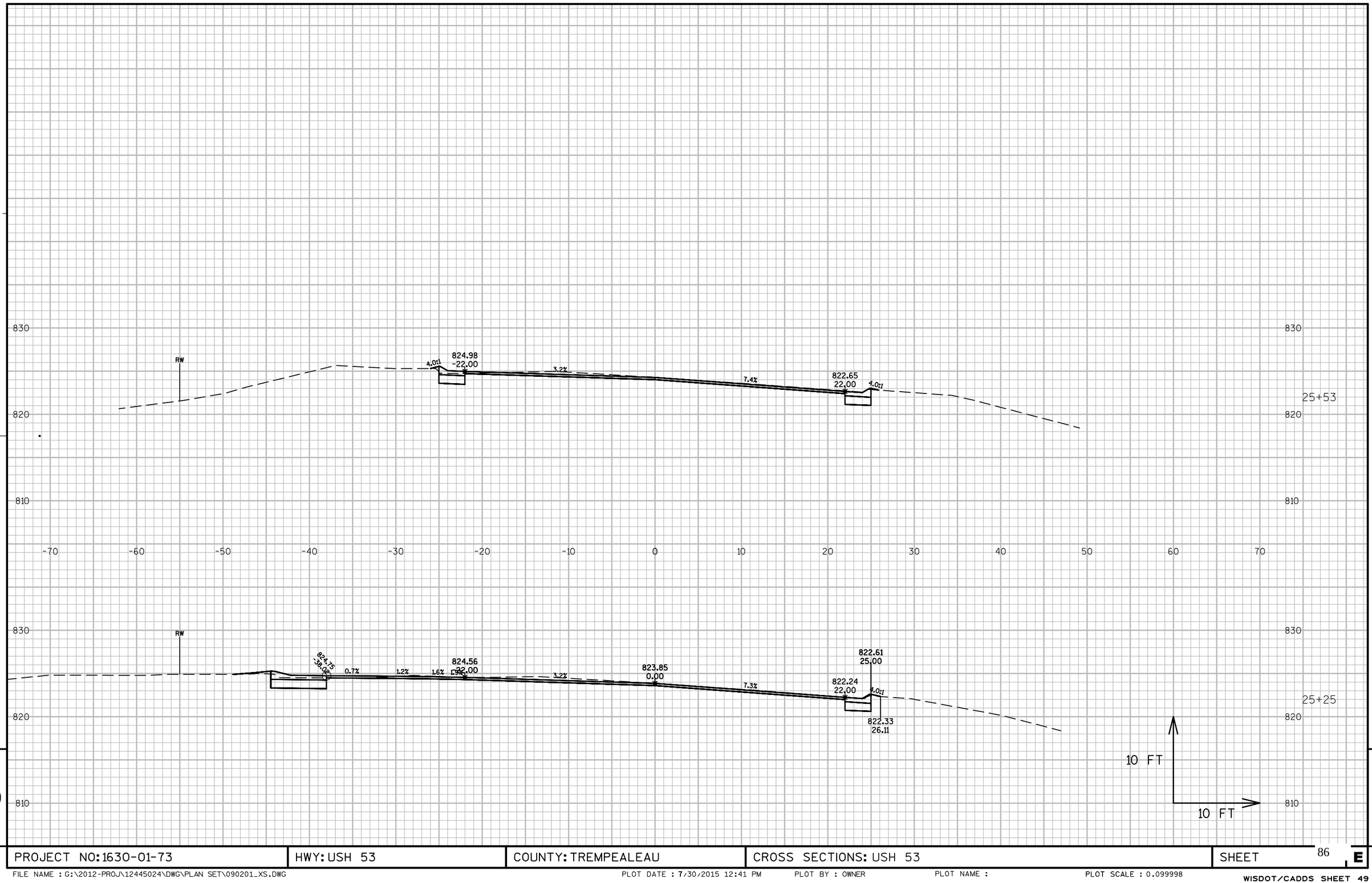
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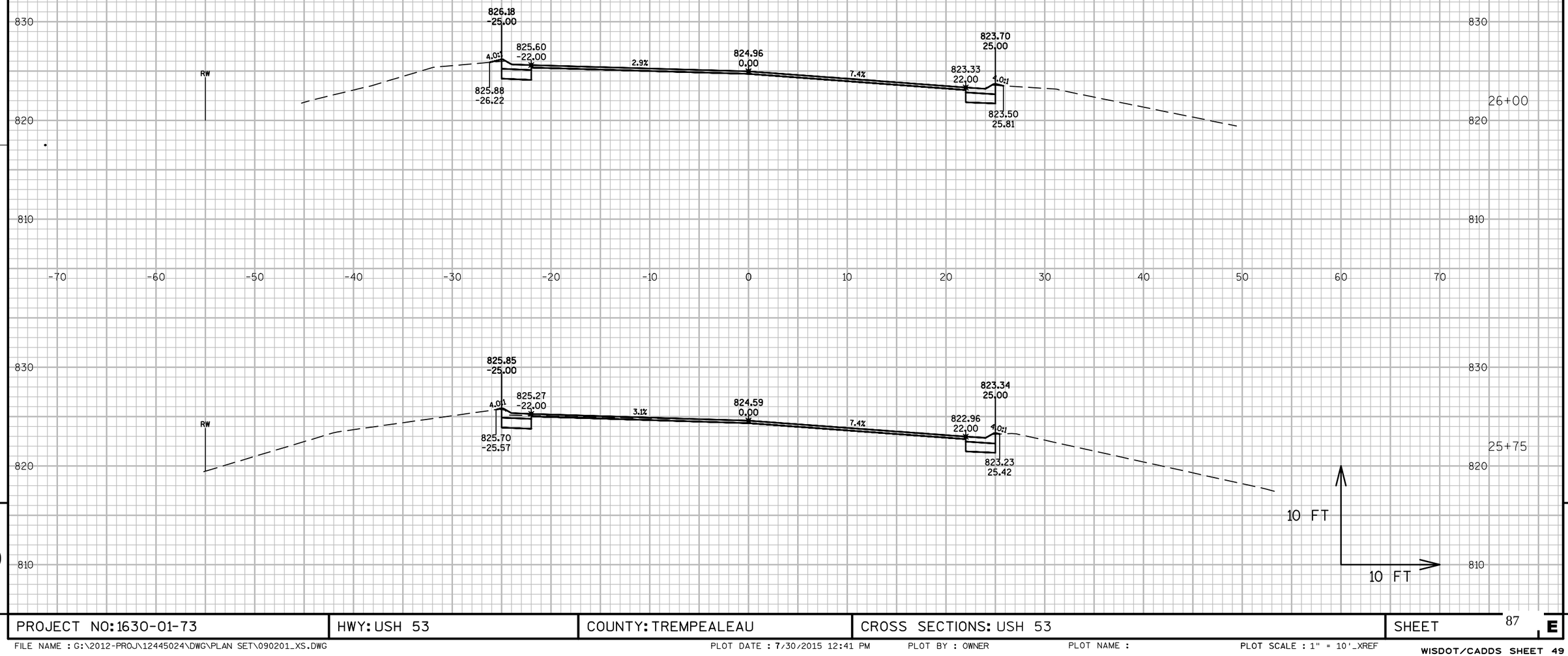
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PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 86 E

FILE NAME : G:\2012-PROJ\12445024\DWG\PLAN SET\090201_XS.DWG PLOT DATE : 7/30/2015 12:41 PM PLOT BY : OWNER PLOT NAME : PLOT SCALE : 0.099998

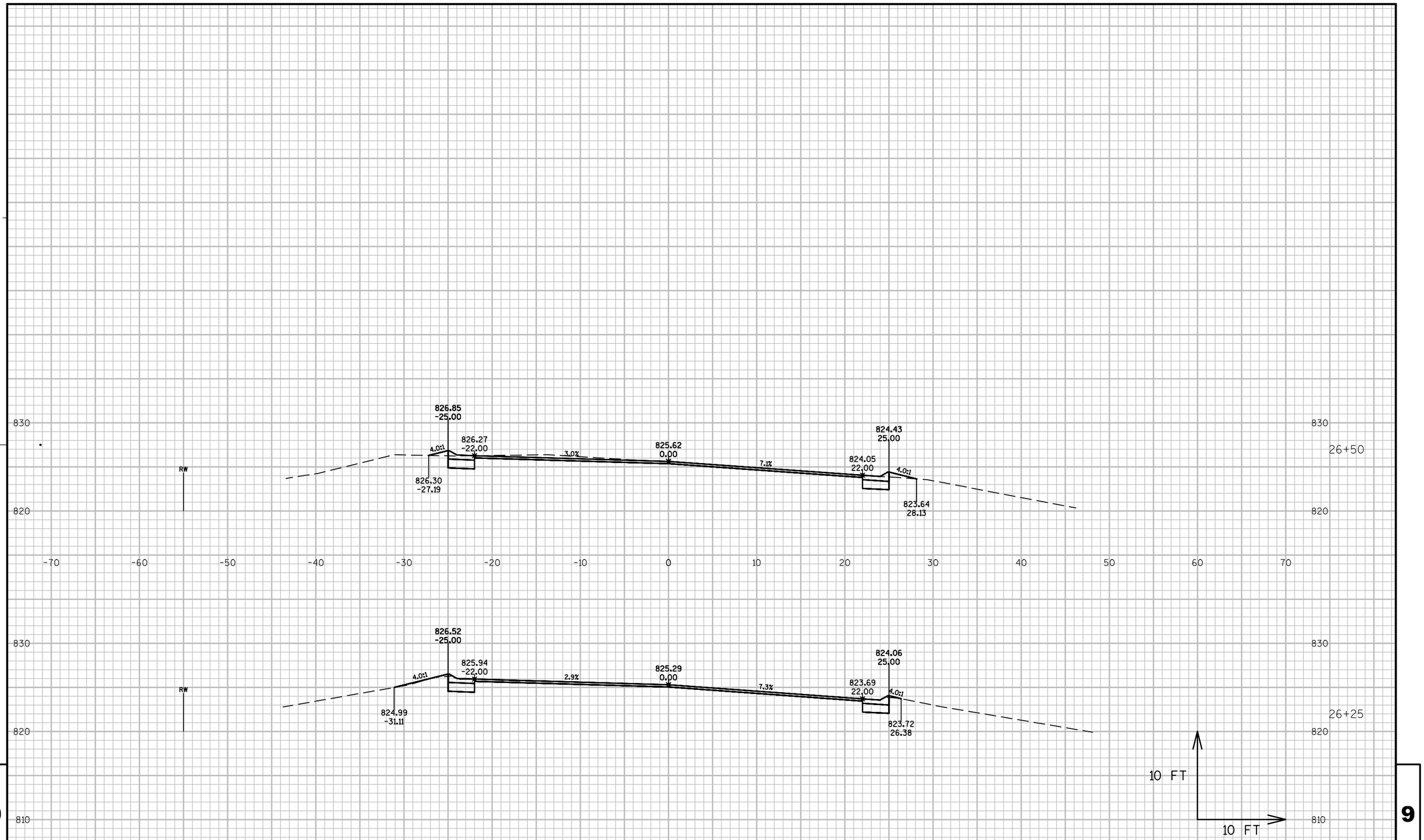
WISDOT/CADDS SHEET 49



PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 87 E

FILE NAME : G:\2012-PROJ\12445024\DWG\PLAN SET\090201_XS.DWG PLOT DATE : 7/30/2015 12:41 PM PLOT BY : OWNER PLOT NAME : PLOT SCALE : 1" = 10'_XREF

WISDOT/CADDS SHEET 49



9

PROJECT NO: 1630-01-73	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: USH 53	SHEET 88 E

9

FILE NAME : G:\2012-PROJ\12445024\DWG\PLAN SET\090201_XS.DWG PLOT DATE : 7/30/2015 12:41 PM PLOT BY : OWNER PLOT NAME : PLOT SCALE : 1" = 10'_XREF

WISDOT/CADDS SHEET 49

Notes

Wisconsin Department of Transportation

Dedicated people creating transportation solutions
through innovation and exceptional service.

http://www.dot.wisconsin.gov

EAU JANUARY 2016

PROJECT ID: 1630-02-71
WITH: 1630-01-73

COUNTY: TREMPEALEAU

13

ORDER OF SHEETS

Section No.	1	Title
Section No.	2	Typical Sections and Details
Section No.	3	Estimate of Quantities
Section No.	3	Miscellaneous Quantities
~~Section No.~~	~~4~~	~~Right of Way Plat~~
Section No.	5	Plan and Profile
Section No.	6	Standard Detail Drawings
Section No.	7	Sign Plates
~~Section No.~~	~~8~~	~~Structure Plans~~
~~Section No.~~	~~9~~	~~Computer Earthwork Data~~
Section No.	9	Cross Sections

TOTAL SHEETS = 282

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PLAN OF PROPOSED IMPROVEMENT

WHITEHALL - OSSEO

RICHTER ROAD TO 121 EAST BOUND

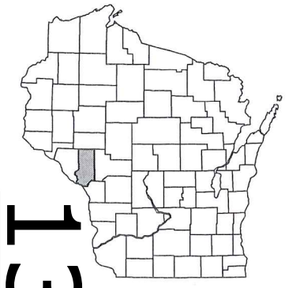
USH 53

TREMPEALEAU COUNTY

STATE PROJECT	FEDERAL PROJECT	
	PROJECT	CONTRACT
1630-02-71	WISC 2015196	1

AS-BUILT PLAN

PROJECT LEADER:
PRIME CONTRACTOR: Mathy Construction Co.
BEGIN CONSTRUCTION:
END CONSTRUCTION:
FINAL CONSTRUCTION COSTS: $
CONTRACT MOD #'S:
CONTRACT ID: 20160112013



N

DESIGN DESIGNATION			RICHTER RD - STH 121 WB	STH 121 WB - CTH D NB	CTH D NB - PIGEON CR BR
A.A.D.T.	2015	=	6900	8650	3900
A.A.D.T.	2035	=	7850	9850	5225
D.H.V.	2035	=	900 (K30)	1125 (K30)	640 (K30)
D.D.		=	60/40	60/40	60/40
T. %AADT		=	6.7%	6.7%	13.7%
DESIGN SPEED		=	45 MPH/35 MPH	35 MPH/50 MPH/60 MPH	60 MPH
ESALS		=	1,700,000	1,700,000	1,700,000

CONVENTIONAL SYMBOLS

PLAN
- CORPORATE LIMITS
- PROPERTY LINE
- LOT LINE
- LIMITED HIGHWAY EASEMENT
- EXISTING RIGHT OF WAY
- PROPOSED OR NEW R/W LINE
- SLOPE INTERCEPT
- REFERENCE LINE
- EXISTING CULVERT
- PROPOSED CULVERT (Box or Pipe)
- COMBUSTIBLE FLUIDS (CAUTION)
- MARSH AREA
- WOODED OR SHRUB AREA

PROFILE
- GRADE LINE
- ORIGINAL GROUND
- MARSH OR ROCK PROFILE (To be noted as such) (ROCK)
- SPECIAL DITCH (LABEL)
- GRADE ELEVATION (1049.00)
- CULVERT (Profile View)

UTILITIES
- ELECTRIC (E)
- FIBER OPTIC (FO)
- GAS (G)
- SANITARY SEWER (SAN)
- STORM SEWER (SS)
- TELEPHONE (T)
- WATER (W)
- UTILITY PEDESTAL
- POWER POLE
- TELEPHONE POLE

STATE PROJECT NUMBER
1630-02-71

EQU. STA. 39+98.10 BK = STA. 33+32.00 AH

EXCEPTION TO NET ℄ LENGTH
PROJECT 1630-01-73 (TIED)
TREMPEALEAU RIVER BRIDGE B-61-00050
(STA. 16+92.39 - STA. 18+80.24)

EXCEPTION TO NET ℄ LENGTH
STA. 116+42.22 - STA. 116+52.64
PROJECT 1630-02-51 (TIED)
WISC CENTRAL LTD RR XING 281794J
STA. 116+47.43'M'

MAIN STREET C WHITEHALL
STA. 101+00.55 - STA. 123+92.20 BK
STA. 9+35.02 AH - STA. 16+00

EQU. STA. 101+00.55 MAIN ST = STA. 2+00.00 ERVIN ST

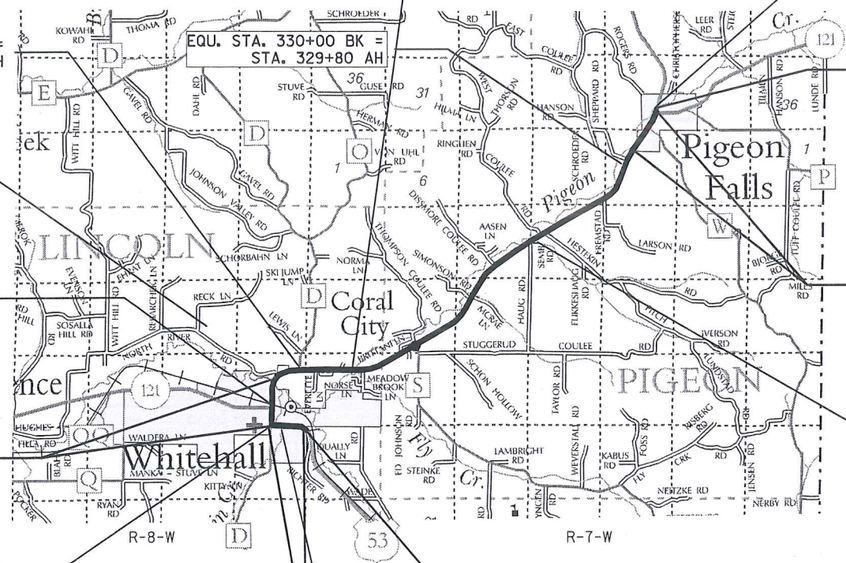
ERVIN STREET C WHITEHALL
*STA. 2+00.00 - STA. 28+78.00

*ERVIN STREET STATIONING DECREASES FROM BEGIN PROJECT

EXCEPTION TO NET ℄ LENGTH
STA. 7+42.50 - STA. 7+63.90
IRVIN CREEK BRIDGE B-61-0974

LAYOUT
SCALE 0 1 MI.

TOTAL NET LENGTH OF CENTERLINE = 7.773 MI.
C WHITEHALL = 1.0± MI.
V PIGEON FALLS = 0.7± MI.



EXCEPTION TO NET ℄ LENGTH
STA. 70+66.75 - STA. 72+48.25
PIGEON CREEK BRIDGE B-61-0124

STA. 373+50.00 - STA. 374+53.72 BK
STA. 1+54.00 AH - STA. 2+85.16 BK
STA. 200+00.00 AH - STA. 201+XX
PROJECT 1630-02-70
PIGEON CREEK BRIDGE B-61-0058
(STA. 1+54.84 - STA. 2+85.16)

END PROJECT 1630-02-71
STA. 373+50.00

EKERN STREET V PIGEON FALLS
STA. 337+00 - STA. 373+50.00

EXCEPTION TO NET ℄ LENGTH
STA. 239+30.62 - STA. 239+67.37
FITCH COULEE CREEK BRIDGE B-61-0950

BEGIN PROJECT 1630-02-71
*STA. 28+78.00
Y = 437,965.367
X = 858,624.510

HORIZONTAL POSITIONS SHOWN ARE WISCONSIN COUNTY COORDINATES, NAD83 (1991), IN U.S. SURVEY FEET. VALUES ARE GRID COORDINATES, GRID BEARINGS, AND GRID DISTANCES. GRID DISTANCES MAY BE USED AS GROUND DISTANCES.

COORDINATES ON THIS PLAN ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM (WCCS), TREMPEALEAU COUNTY.

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PREPARED BY

Surveyor	CONSULTANT
Designer	HEATH T BIELEFELDT
Project Manager	DAVID KOEPP
Regional Examiner	CHRISTINE KOSKI
Regional Supervisor	TIM MASON

APPROVED FOR THE DEPARTMENT
DATE: 7/30/2015 (Signature)

E

2

GENERAL NOTES

CROSS SLOPES AS SHOWN ON THE TYPICAL SECTION WILL VARY AT URBAN INTERSECTIONS.

ALL RADII ARE MEASURED TO THE EDGE OF PAVEMENT (FLAG OF CURB) UNLESS OTHERWISE NOTED.

REMOVE ASPHALTIC SURFACE TO THE NEAREST JOINT OR A SAWED EDGE AS DIRECTED BY THE ENGINEER.

WHEN THE QUANTITY OF THE ITEMS OF BASE AGGREGATE OR SUBBASE ARE MEASURED FOR PAYMENT BY THE TON OR CUBIC YARD, THE DEPTH OR THICKNESS OF THE LAYERS SHOWN ON THE PLAN IS APPROXIMATE AND THE ACTUAL THICKNESS WILL DEPEND ON THE DISTRIBUTION OF THE MATERIAL AS DIRECTED BY THE ENGINEER.

RESHAPE AND SEED ANY PREVIOUSLY GRASSED AREAS THAT ARE DISTURBED BY OPERATIONS OUTSIDE THE NORMAL CONSTRUCTION LIMITS.

THE QUANTITY OF THE ITEMS FOR EROSION PROTECTION INCLUDES AN UNDISTRIBUTED AMOUNT FOR PROTECTION, CONTROL AND ABATEMENT OF WATER POLLUTION RESULTING FROM SOIL EROSION. THE DISTRIBUTION AND LOCATION OF THESE MATERIALS ARE TO BE DETERMINED BY THE ENGINEER.

MULCH ALL SEED AND FERTILIZED AREAS, IN THE PERFORMANCE OF THE WORK UNDER THE ITEM MULCHING AS DIRECTED BY THE ENGINEER.

EXISTING FILL HEIGHTS LISTED AT CULVERT REPLACEMENT LOCATIONS ARE ESTIMATES.

REMOVAL OF ANY SURVEY MARKER REQUIRES APPROVAL OF THE ENGINEER.

*** UTILITIES ARE NOT SHOWN ON SPLIT PLAN SHEETS *** THE LOCATIONS OF EXISTING AND PROPOSED UTILITY INSTALLATIONS AS SHOWN ON OTHER PLAN SHEETS ARE APPROXIMATE. THERE MAY BE OTHER UTILITY INSTALLATIONS WITHIN THE PROJECT THAT ARE NOT SHOWN.

LOCATIONS OF PAVEMENT MARKINGS AND PERMANENT SIGNING IN THE FIELD ARE DETERMINED BY THE MUTCD & WISCONSIN SUPPLEMENT AND STANDARD DETAIL DRAWINGS. STATION AND OFFSETS PROVIDED IN THE MISCELLANEOUS QUANTITIES OR PLAN SHEETS ARE ONLY PROVIDED FOR APPROXIMATE LOCATING AND CONTRACT ADMINISTRATION.

INSTALL W14-3 SIGNS AFTER LOCATING NO-PASSING ZONES IS COMPLETE.

DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.

CITY OF WHITEHALL PARKING LANE COST PARTICIPATION LIMITED TO 8' WIDTH MEASURED FROM FACE OF CURB (OTHER THAN PARKING PAV'T MARKING WHICH IS ACTUAL QUANTITY PLACED). THE PARKING LANE PAV'T AREA WIDTH IN WHITEHALL IS 6'.

DURING MILLING AND PAVING OPERATIONS, THE PAVEMENTS MUST BE FLUSH TO THE SURFACE MILL BY THE END OF THE WORKING DAY ON FRIDAY.

THE CURB & GUTTER IN THE CITY OF WHITEHALL HAS INDEPENDENT PROFILES. PARKING LANE CROSS SLOPE SHOWN ON THE CROSS SECTION IS NOMINAL.

ENVIRONMENTAL CONTACTS

DEPT. OF NATURAL RESOURCES

WISCONSIN DNR WEST CENTRAL REGION
KAREN KALVELAGE
ENVIRONMENTAL IMPACT AND REVIEW SPECIALIST
3550 MORMON COULEE RD
LA CROSSE WI 54601
608-785-9115
24 HOUR SPILLS HOTLINE
800-943-0003

MUNICIPAL CONTACTS

VILLAGE OF PIGEON FALLS

GEORGE EVERSON
VILLAGE PRESIDENT
OFFICE 715-983-2214

CITY OF WHITEHALL

ASHLEY SLABY
CITY ADMINISTRATOR
OFFICE 715-538-4353
MOBILE 715-559-6644

UTILITY CONTACTS

CENTURYLINK - COMMUNICATION LINE
--EMERGENCY REPAIR CONTACT--
800-824-2877
CONSTRUCTION FIELD CONTACT:
DONNA SMOTHERS
835 RED IRON ROAD
BLACK RIVER FALLS, WI 54615
715-284-4375 (OFFICE)
715-797-4854 (MOBILE)

CITY OF WHITEHALL -
WHITEHALL MUNICIPAL WATER & SEWER UTILITY
LYNN JOHNSON
18620 HOBSON ST
P.O. BOX 155
WHITEHALL, WI 54773
715-538-4353

WHITEHALL MUNICIPAL ELECTRIC UTILITY
GARY FROMM
18620 HOBSON ST
P.O. BOX 155
WHITEHALL, WI 54773
715-538-4353

MIDWEST NATURAL GAS INCORPORATED - GAS/PETROLEUM
--24-HOUR EMERGENCY--
877-817-3119
ELIOT SOLRUD
23389 WHITEHALL ROAD
INDEPENDENCE, WI 54747
715-985-5500 (OFFICE)
608-780-9233 (MOBILE)
ESOLRUD@MYWAY.COM

RIVERLAND ENERGY COOPERATIVE - ELECTRICITY
TIM HOLTAN
N28988 STATE ROAD 93
P.O. BOX 277
ARCADIA, WI 54612-0277
608-323-3381 (OFFICE)
608-797-0102 (MOBILE)
THOLTAN@RIVERLANDENERGY.COM

DESIGN CONTACT

1630-02-01/71 ROADWAY DESIGN

WISCONSIN DEPT. OF TRANSPORTATION
NW REGION - EAU CLAIRE OFFICE
718 W CLAIREMONT AVE
EAU CLAIRE WI 54701
715-836-2729

DIGGERS HOTLINE
Dial 811 or (800)242-8511
www.DiggersHotline.com

CHARTER COMMUNICATIONS - COMMUNICATION LINE
JAMEY OLDEEN
2304 S MAIN ST
RICE LAKE, WI 54868
715-236-5005

NORTHERN NATURAL GAS COMPANY - GAS/PETROLEUM
JOHN DELASKE
4685 212TH ST WEST
FARMINGTON, MN 55021
402-530-3420 (OFFICE)
612-581-3386 (MOBILE)

VILLAGE OF PIGEON FALLS
PIGEON FALLS MUNICIPAL WATER UTILITY
P.O. BOX 335
PIGEON FALLS, WI 54760-0035
715-983-2214 (OFFICE)

LINCOLN SANITARY DISTRICT NO.1 - SEWER
LINCOLN TOWN SHOP
ALLEN SCHORBAHN
W20774 STATE RD 121
WHITEHALL, WI 54773
715-985-3038

WE ENERGIES GAS - GAS/PETROLEUM
--EMERGENCY CONTACT--
800-261-5325
SEND ALL CORRESPONDENCE TO:
DAN SANDE
333 W EVERETT ST RM A299
MILWAUKEE, WI 53203
414-221-4578
CONSTRUCTION FIELD CONTACT:
BILL GARSKI
1921 8TH ST SOUTH
WISCONSIN RAPIDS WI 54494
715-421-7259

RAILROAD CONTACT

WISCONSIN CENTRAL LTD (CN)

1625 DEPOT STREET
STEVENS POINT, WI 54481
ATTN: JACKIE MACEWICZ
715-345-2503 (PHONE)
715-345-2507 (FAX)
Jackie.macewicz@cn.ca

CALL BEFORE YOU DIG
WISCONSIN CENTRAL LTD
CHRISTINE GRZESIAK
715-345-2506

LIST OF STANDARD ABBREVIATIONS

ABUT	ABUTMENT
AC	ACRE
AGG	AGGREGATE
AH	AHEAD
ASPH	ASPHALTIC
AADT	ANNUAL AVERAGE DAILY TRAFFIC
BK.	BACK
BM	BENCH MARK
BR	BRANCH
CONC	CONCRETE
CACP	CORRUGATED ALUMINUM CULVERT PIPE
CSCP	CORRUGATED STEEL CULVERT PIPE
CTH	COUNTY TRUNK HIGHWAY
CR	CREEK
CR	CRUSHED
CY or CUYD	CUBIC YARD
D	DEGREE OF CURVE
DHV	DESIGN HOUR VOLUME
DD	DIRECTIONAL DISTRIBUTION
DL	DITCH LINE / TOE OF SLOPE
EB	EASTBOUND
EL or ELEV	ELEVATION
EMB	EMBANKMENT
ESALS	EQUIVALENT SINGLE AXLE LOADS
EXC	EXCAVATION
EBS	EXCAVATION BELOW SUBGRADE
EXIST	EXISTING
EXP	EXPANSION
FE	FIELD ENTRANCE
HES	HIGH EARLY STRENGTH
CWT	HUNDRED WEIGHT
LT	LEFT
LHF	LEFT HAND FORWARD
LF	LINEAR FOOT
LS	LUMP SUM
MH	MANHOLE
NC	NORMAL CROWN
PAVT	PAVEMENT
PLE	PERMANENT LIMITED EASEMENT
PT	POINT
PC	POINT OF CURVATURE
PI	POINT OF INTERSECTION
PT	POINT OF TANGENCY
POC	POINT ON CURVE
POT	POINT ON TANGENT
PE	PRIVATE ENTRANCE
PL	PROPERTY LINE
R	RADIUS
RP	RADIUS POINT
R	RANGE
REBAR	REINFORCEMENT BAR
REQD	REQUIRED
RT	RIGHT
RHF	RIGHT-HAND-FORWARD
R/W	RIGHT-OF-WAY
R	RIVER
RD	ROAD
SALV	SALVAGED
SEC	SECTION
SF	SQUARE FEET
SI	SLOPE INTERCEPT
SY	SQUARE YARD
SS	SLOPED SECTION
STH	STATE TRUNK HIGHWAY
STA	STATION
SE	SUPERELEVATION
T	TANGENT
TEL	TELEPHONE
TEMP	TEMPORARY
TC	TOP OF CURB
T or TN	TOWN
T	TRUCKS (PERCENT OF)
TYP	TYPICAL
UG	UNDERGROUND
USH	UNITED STATES HIGHWAY
VAR	VARIABLE
V	VELOCITY or DESIGN SPEED
VERT	VERTICAL
VC	VERTICAL CURVE
VPC	VERTICAL POINT OF CURVE
VPI	VERTICAL POINT OF INTERSECTION
VPT	VERTICAL POINT OF TANGENCY
VAR	VARIABLE
WB	WESTBOUND

EQUATION: STA. 2+85.16'P' BK =
STA. 200+00.00'N' AH

EQUATION: STA. 374+53.72'V' BK =
STA. 1+54.00'P' AH

END PROJECT
STA. 373+50.00'V'

EQUATION:
STA. 337+'A' BK =
STA. 337+'V' AH

EQUATION:
STA. 330+00'R' BK =
STA. 329+80'A' AH

EQUATION: STA. 39+98.10'T' BK =
STA. 33+32.00'R' AH

EQUATION: STA. 123+92.20'M' BK =
STA. 9+35.02'T' AH

RR CROSSING 281794J
STA. 116+47.43'M'

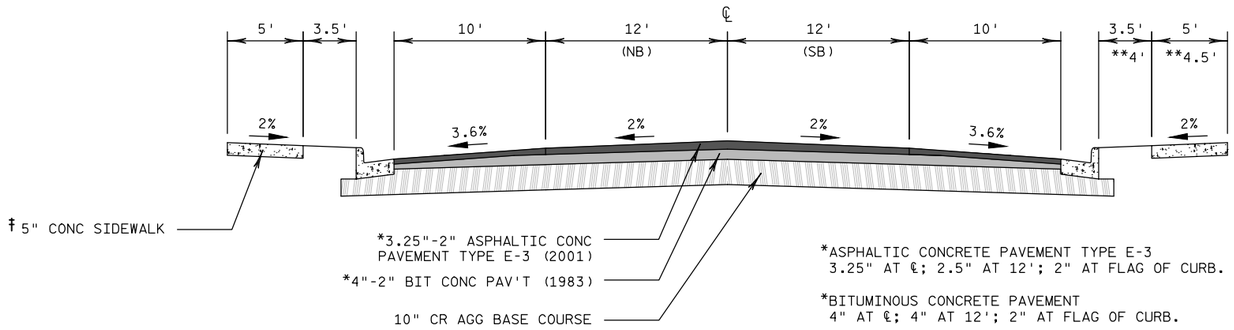
BEGIN PROJECT
STA. 28+78.00'E'

EQUATION: STA. 101+00.55'M' MAIN ST =
STA 2+00.00'E' ERVIN ST

PROJECT NO:1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PROJECT OVERVIEW	SHEET 3 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020201_PO.DWG PLOT DATE : 9/3/2008 9:36 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1"=4000'
WISDOT/CADDS SHEET 42

†CONC SIDEWALK
STA. 2+80.00'E' - STA. 5+10.00'E' LT
**STA. 5+25.00'E' - STA. 7+42.50'E' RT
STA. 7+63.90'E' - STA. 11+45.20'E' RT



*ASPHALTIC CONCRETE PAVEMENT TYPE E-3
3.25" AT ℄; 2.5" AT 12'; 2" AT FLAG OF CURB.

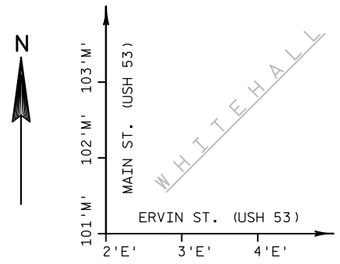
*BITUMINOUS CONCRETE PAVEMENT
4" AT ℄; 4" AT 12'; 2" AT FLAG OF CURB.

STA. 4+75'E' (STOP AHEAD - NB)
STA. 2+55'E' (STOP - NB)

TYPICAL EXISTING SECTION
USH 53 URBAN (ERVIN ST.)

STA. 1+10.00'E' - STA. 12+08.45'E' (POSTED 30 MPH)
(ERVIN ST STA. 2+00.00'E' = MAIN ST STA. 101+00.55'M')

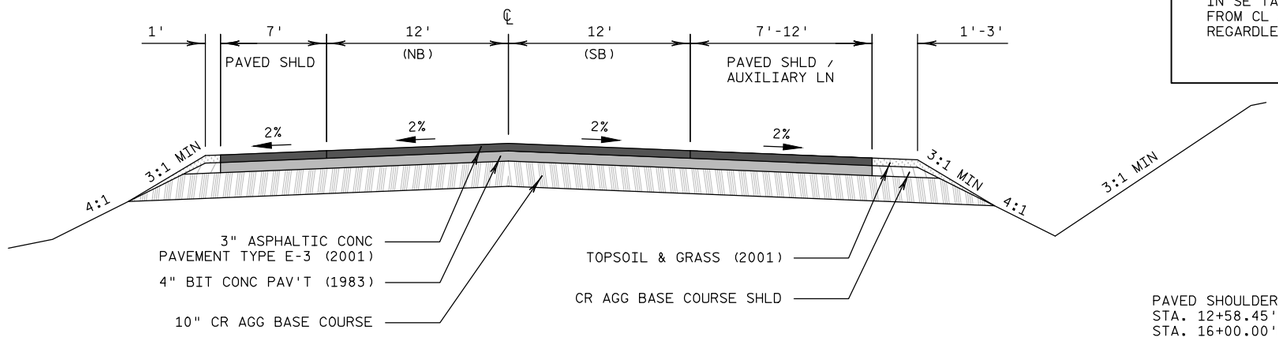
AADT(2035): 7850; T(%AADT): 6.7%



ERVIN ST. (AND BEYOND) RECORD DRAWINGS ALL HAVE WEST TO EAST STATIONING, WHICH FOR USH 53 IS NORTH TO SOUTH, CREATING A DISCONNECT IN STATIONING DIRECTIONALITY AT MAIN ST.

GENERAL NOTES

IN SE TABLES, NEGATIVE SE VALUES SLOPE DOWNWARD FROM CL AND POSTIVE SE VALUES SLOPE UPWARD FROM CL, REGARDLESS OF SIDE (LT OR RT).



150' SUPERELEVATION TRANSITION
(STA. 15+87.60'E' - STA. 17+37.60'E')
100' SUPERELEVATION RUNOFF
(STA. 16+37.60'E' - STA. 17+37.60'E')

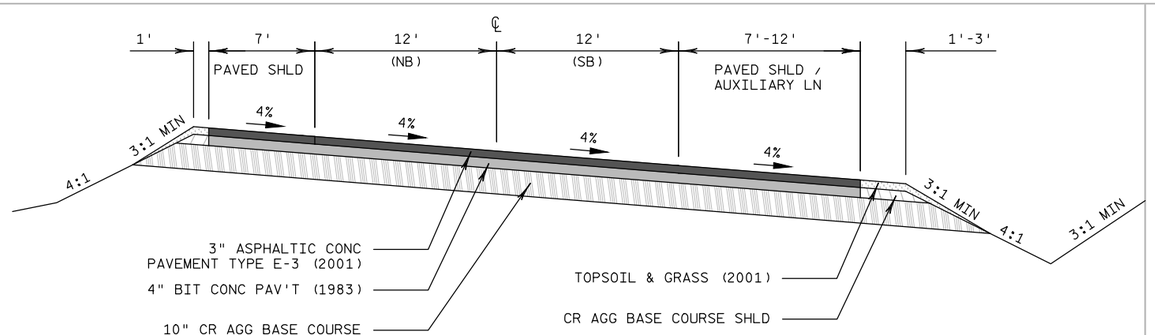
PAVED SHOULDER / AUXILIARY (PASSING) LANE / GRASS SHOULDER
STA. 12+58.45'E' - STA. 15+16.67'E': 7'PS; 1'GS
STA. 16+00.00'E' - STA. 18+50.00'E': 12'AUX; 3'GS
STA. 19+75.00'E': 7'PS; 3'GS
STA. 20+25.00'E' - STA. 27+25.00'E': 7'PS; 1'GS

STA. 27+25.00'E'+: TAPER TO RICHTER RD

TYPICAL EXISTING SECTION
USH 53 (ERVIN ST.)

STA. 12+08.45'E' - STA. 15+00'E' (POSTED 30 MPH)
STA. 15+00'E' - STA. 17+37.60'E' (POSTED 40 MPH)

AADT(2035): 7850; T(%AADT): 6.7%

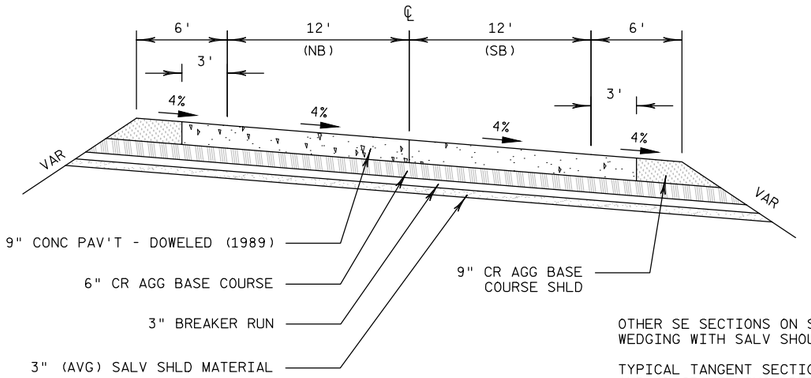


TYPICAL EXISTING SECTION
USH 53 (ERVIN ST.)

STA. 17+37.60'E' - STA. 28+78.00'E' (POSTED 40 MPH)

STA. 21+00'E' (CURVE AHEAD - SB)

AADT(2035): 7850; T(%AADT): 6.7%



OTHER SE SECTIONS ON SEGMENT REQ'D WEDGING WITH SALV SHOULDER MATERIAL.

TYPICAL TANGENT SECTION 2% PAV'T SLOPE AND 4% GRAVEL SHOULDER.

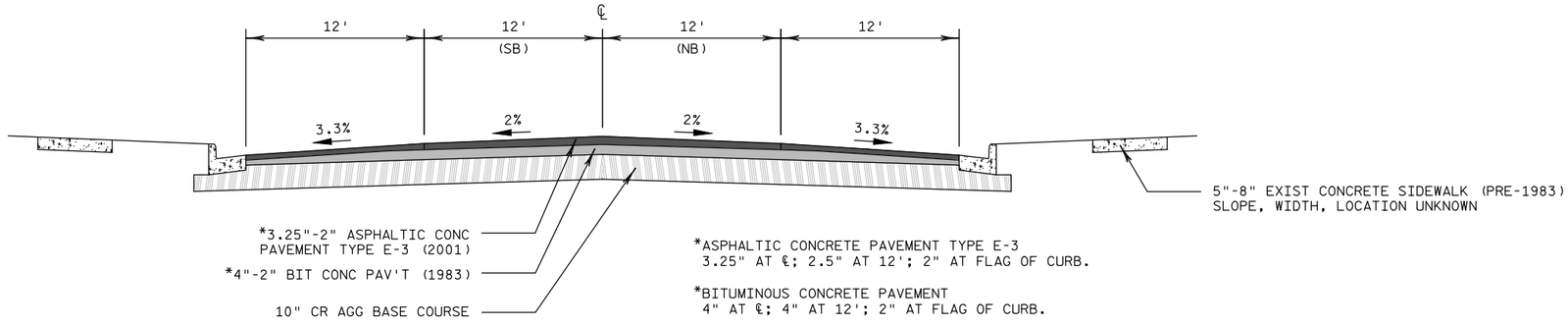
CLEAR ZONE NOT DEFINED IN RECORD DRAWINGS.

TYPICAL EXISTING SECTION
USH 53

STA. 28+78.00'E' BK = STA. 13+57.45'S' AH
STA. 13+57.45'S' - STA. 14+00'S' (POSTED 40 MPH)
STA. 14+00'S' - STA. 287+00.00'S' (POSTED 55 MPH)

STA. 23+25'E' (REDUCE SPEED AHEAD 40 - NB)

PROJECT NO:1630-02-71	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL EXISTING SECTIONS	SHEET 4	E

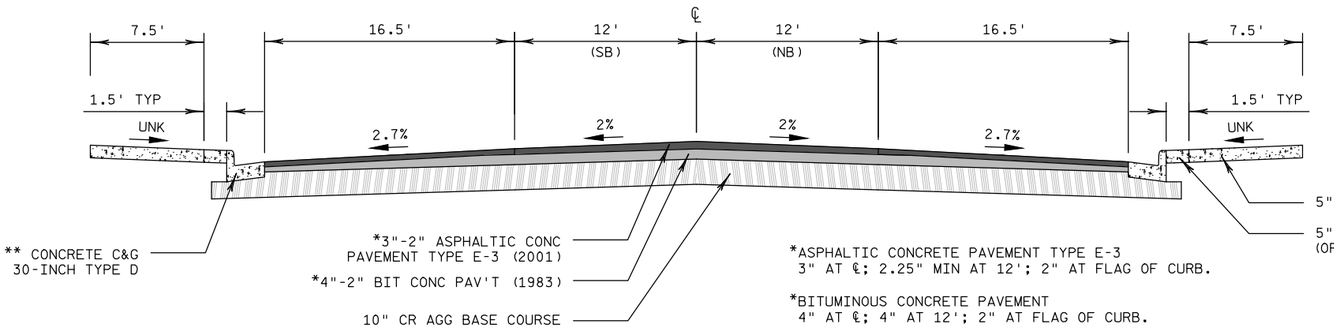


TYPICAL EXISTING SECTION
USH 53 URBAN (MAIN ST.)

STA. 101+00.55'M' - STA. 110+30.25'M' (POSTED 30 MPH)
(MAIN ST STA. 101+00.55'M' = ERVIN ST STA. 2+00.00'E')

AADT(2035): 7850; T(%AADT): 6.7%

PAVEMENT CROSS SLOPE VARIES
TO MATCH RAILROAD CROSSING.



***CROSS SLOPE IN CROWN TRANSITION**
STA. 115+75 - STA. 116+30.97'M'
STA. 116+63.89'M' - STA. 117+30

** STA. 116+64.2'M' - STA. 117+20.9'M' LT
STA. 116+47.4'M' - STA. 117+03.0'M' RT
CONCRETE C&G, 36-INCH TYPE D

SIDEWALK FULL WIDTH REPLACEMENT (1983)
STA. 110+70'M' - STA. 113+46'M' LT
STA. 110+70'M' - STA. 113+09'M' RT
STA. 115+77'M' - STA. 118+04'M' LT
STA. 115+75'M' - STA. 118+02'M' RT

BITUMINOUS CONCRETE PAV'T (1983)
SLOPE VARIES, 1.5% MINIMUM.

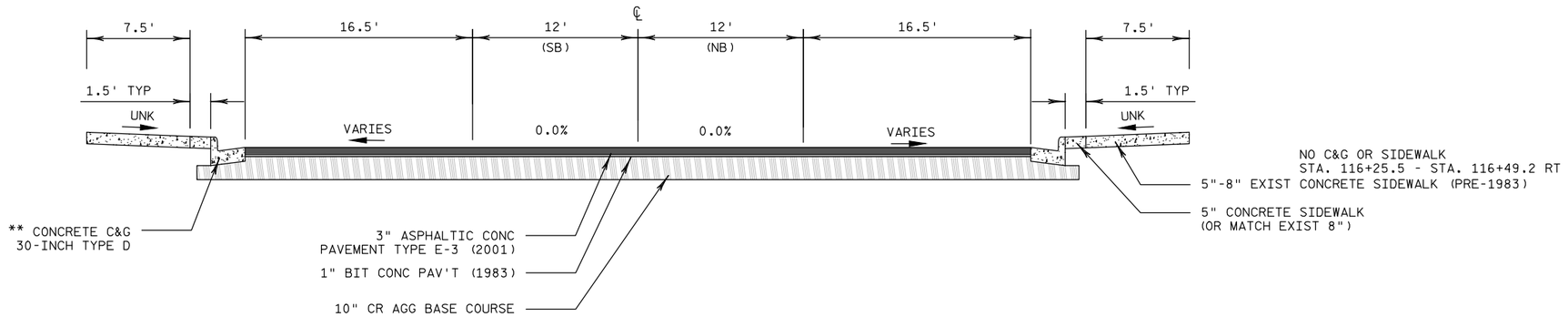
TYPICAL EXISTING SECTION
USH 53 URBAN (MAIN ST.)

STA. 110+30.25'M' - STA. 116+30.97'M' (POSTED 30 MPH)
STA. 116+63.89'M' - STA. 123+92.20'M' BK (POSTED 30 MPH)

-STA. 114+23 AADT(2035): 7850; T(%AADT): 6.7%
STA. 114+23+ AADT(2035): 9850; T(%AADT): 6.7%

PROJECT NO:1630-02-71	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL EXISTING SECTIONS	SHEET 5	E

PAVEMENT THICKNESS FROM RECORD DRAWINGS.
ACTUAL THICKNESS POSSIBLY MUCH MORE.

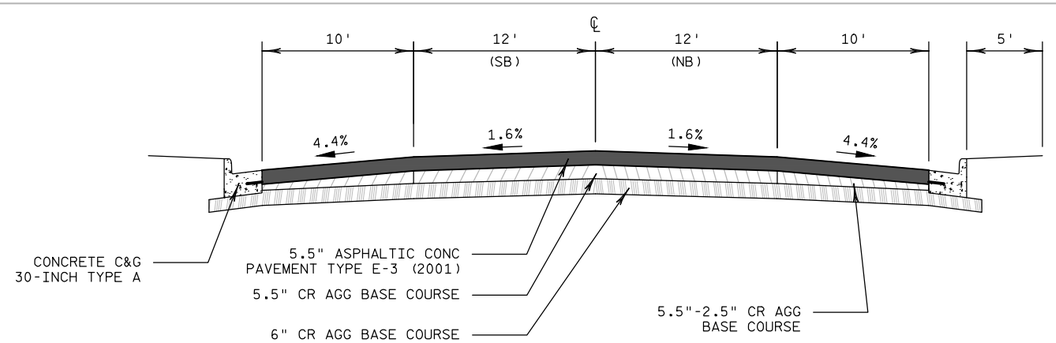


℄ TRACK AT USH 53 = STA. 116+47.43

** STA. 116+64.2'M' - STA. 117+20.9'M' LT
STA. 116+47.4'M' - STA. 117+03.0'M' RT
CONCRETE C&G, 36-INCH TYPE D

TYPICAL EXISTING SECTION
USH 53 URBAN (MAIN ST.)

STA. 116+30.97'M' - STA. 116+42.22'M' BK (POSTED 30 MPH)
STA. 116+52.64'M' - STA. 116+63.89'M' BK (POSTED 30 MPH)



OLD CONCRETE PAV'T POSSIBLY EXISTS
STA. 9+65 - STA. 10+00 LT.

CROSS SLOPES SHOWN ARE COMPUTED TYPICAL;
HOWEVER, THE RECORD DRAWING LIST THEM AS
"VARIABLE"- FIELD VERIFICATION NEEDED.

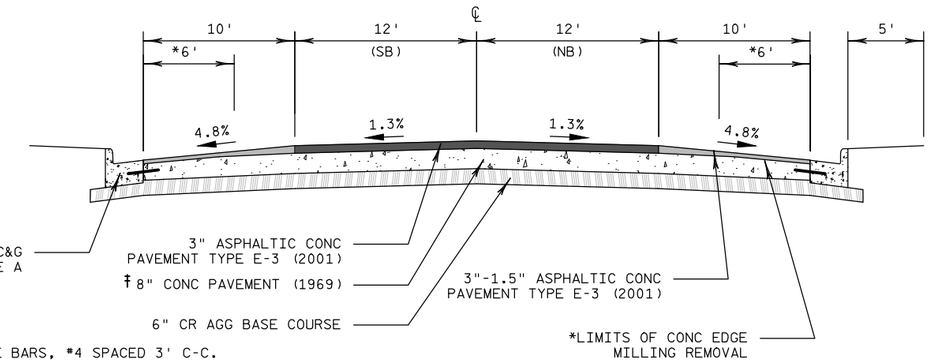
TIE BARS, #4 SPACED 3' C-C,
LIKELY REMAIN ONLY IN C&G.

TYPICAL EXISTING SECTION
USH 53 URBAN (MAIN ST.)

STA. 123+92.20'M' BK = STA. 9+35.02'T' AH
STA. 9+35.02'T' - STA. 11+82.82'T' (POSTED 30 MPH)

AADT(2035): 9850; T(%AADT): 6.7%

PROJECT NO:1630-02-71	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL EXISTING SECTIONS	SHEET 6	E



2' TIE BARS, #4 SPACED 3' C-C.

‡CONC. PAV'T HYPERBOLIC CROWN

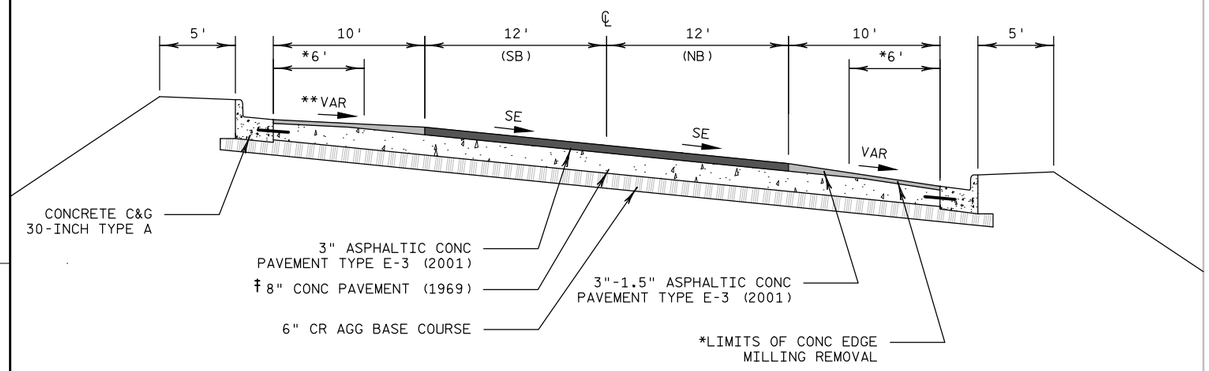
$Y = \sqrt{\frac{X^2}{10} + 9} - 3$

Y = CROWN (INCHES)
X = DISTANCE (FEET)

TYPICAL EXISTING SECTION
USH 53 URBAN (MAIN ST.)

STA. 11+82.82'T' - STA. 14+60.00'T' (POSTED 30 MPH)

AADT(2035): 9850; T(%AADT): 6.7%



2' TIE BARS, #4 SPACED 3' C-C.

**RECORD DRAWINGS DEPICT SLOPED BACK TOWARDS THE C&G; HOWEVER THIS IS UNLIKELY SINCE IT IS REJECT CURB AND THERE ARE NO INLETS.

TYPICAL EXISTING SECTION
USH 53 URBAN (MAIN ST.)

14+60.00'T' - STA. 16+65'T' (POSTED 30 MPH)
16+65'T' - STA. 16+92.39'T' BGN DECK (POSTED 45 MPH)

‡ CONCRETE PAVEMENT CROSS SLOPES

	10'	12'	12'	10'
STATION	LT	LT	RT	RT
*14+60	-2.3	-1.3	-1.3	-2.3
15+00	-0.9	-0.9	-1.3	-2.3
16+00	+1.8	+1.8	-1.8	-2.3
16+50	+3.2	+3.2	-3.2	-3.2
16+92	+4.0	+4.0	-4.0	-4.0

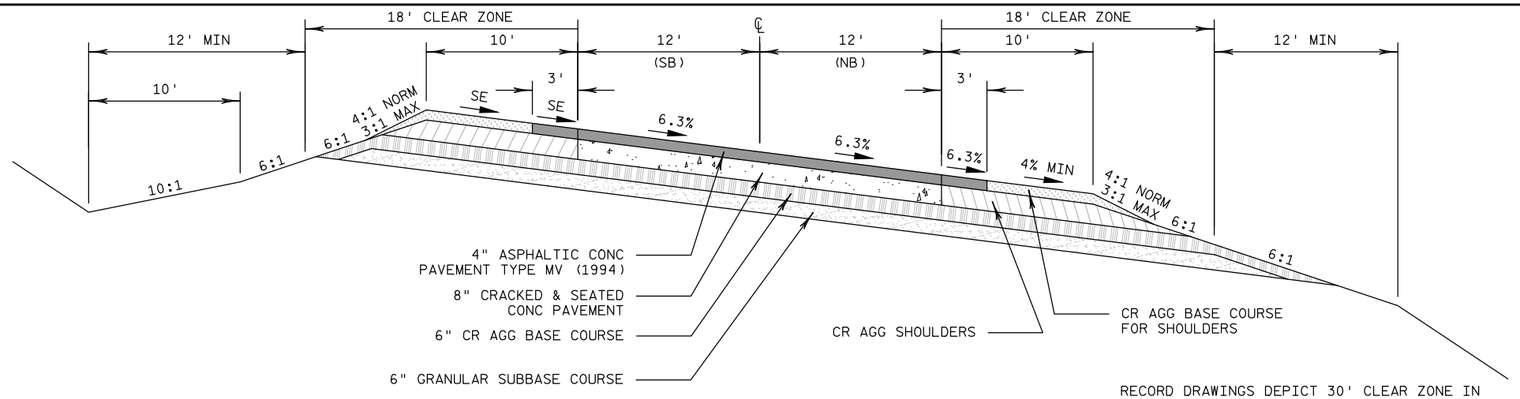
*APPROXIMATION OF HYPERBOLIC CROWN

AADT(2035): 9850; T(%AADT): 6.7%

GENERAL NOTES

THE EXISTING STRUCTURE IS ON A 4° CURVE. THE SUPERELEVATION TRANSITIONS FROM A HYPERBOLIC CROSS SECTION IN THE CITY OF WHITEHALL (30 MPH POSTED) WITH "NORMAL" CROWN, TO A 6% MAX TABLE AT 50 MPH FOR THE TRANSITIONAL SEGMENT (WITH 4% SE ACROSS THE STRUCTURE) AND THEN TRANSITIONS AGAIN TO 6.3% (50 MPH DESIGN SPEED ON 8% MAX TABLE) ON THE RURAL SEGMENT (POSTED 55 MPH). THE PROPOSED STRUCTURE DECK SHOULD BE EVALUATED FOR CONSTRUCTION TO 3.7% SE TO MATCH THE 50 MPH DESIGN SPEED FOR THE 4% MAX TABLE.

RECORD DRAWINGS DO NOT DEPICT CONC FLUMES OR CONC CURB & GUTTER ADJACENT TO THE 8" CRACKED AND SEATED CONC PAV'T; HOWEVER, THOSE LIKELY EXIST AT UNKNOWN LOCATIONS.



RECORD DRAWINGS DEPICT 30' CLEAR ZONE IN 1969 REDUCED TO 18' CLEAR ZONE IN 1994.

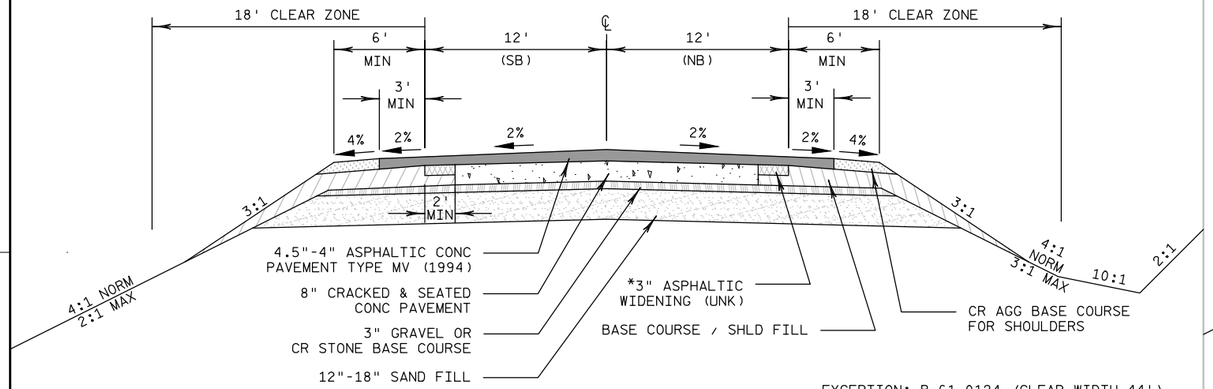
STA. 33+00'T' (REDUCE SPEED AHEAD 45 - SB)

TYPICAL EXISTING SECTION
USH 53

STA. 26+50.00'T' - STA. 27+50'T' (POSTED 45 MPH)
STA. 27+50'T' - STA. 35+00.00'T' (POSTED 55 MPH)

C WHITEHALL CORP BOUNDARY INTERSECTS USH 53 ℄ FROM STA. 27+70'T'± - STA. 28+35'T'±

AADT(2035): 5225; T(%AADT): 13.7%



EXCEPTION: B-61-0124 (CLEAR WIDTH 44')
STA. 70+66.75'R' - STA. 72+48.25'R'
(NO WORK)

TYPICAL EXISTING SECTION
USH 53

STA. 35+00.00'T' - STA. 39+98.10'T' BK (POSTED 55 MPH)
STA. 33+32.00'R' AH - STA. 330+00.00'R' BK (POSTED 55 MPH)
STA. 329+80.00'A' AH - STA. 337+00±'A' (POSTED 55 MPH)

EXACT DETAILS OF 'R'/'A' PI & STA EQU TBD.

FULL WIDTH PAVED SHOULDER (6')
STA. 102+00'R' - STA. 130+00'R' LT & RT

FULL WIDTH PAVED SHOULDER (10')
STA. 69+66'R' - STA. 70+66'R' LT & RT
STA. 72+49'R' - STA. 73+49'R' LT & RT

AADT(2035): 5225; T(%AADT): 13.7%

GENERAL NOTES

EXISTING 4" ASPHALTIC CONCRETE PAVEMENT TYPE MV CONSTRUCTED WITH A TWO LOWER LAYERS AND A SURFACE COURSE. LOWER LAYERS WERE 1.25" EACH.

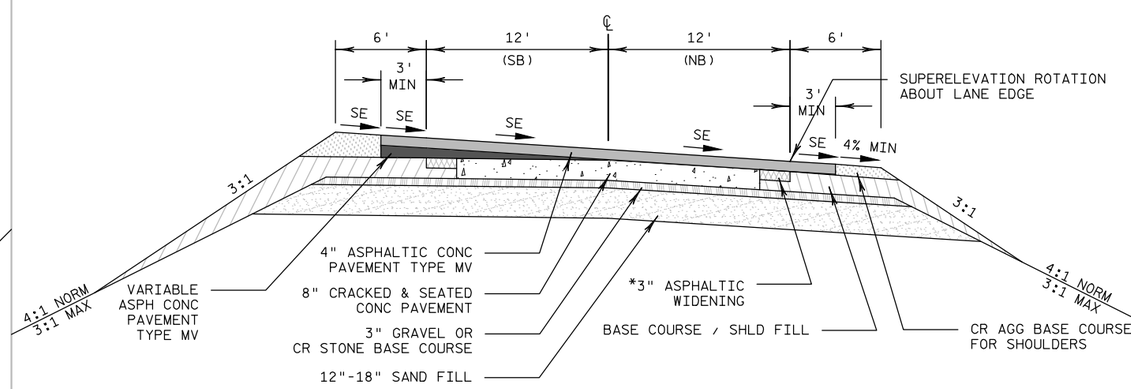
AT LOCATIONS WHERE EXCAVATION AT STRUCTURE ABUTMENTS WAS REQUIRED, THE PAVEMENT STRUCTURE IS 4" OF ASPH CONC PAV'T TYPE MV AND 12" CABC.

MOST INSLOPES ARE LIKELY 3:1 DUE TO THE REHABILITATION METHODS, EVEN THOUGH RECORD DRAWING TYPICALS STATE 4:1 NORM.

CONFLICTING INFORMATION ON EXISTING CONC PAV'T NORMAL CROWN SLOPE. NC IS LIKELY 1.25% - 1.5%.

*EXISTING ASPHALTIC WIDENING WIDTH: MINIMUM WIDTH 2'; MAX WIDTH 8' LT AND 12' RT (LOCATIONS UNKNOWN). CROSS SLOPE IS UNKNOWN BUT LIKELY MATCHES THE CONCRETE. DEPTH OF ASPHALT VARIES - 3" IS THE AVERAGE PER BORINGS.

RECORD DRAWINGS DO NOT DEPICT CONC FLUMES OR CONC CURB & GUTTER ADJACENT TO THE 8" CRACKED AND SEATED CONC PAV'T; HOWEVER, THOSE LIKELY EXIST AT UNKNOWN LOCATIONS.



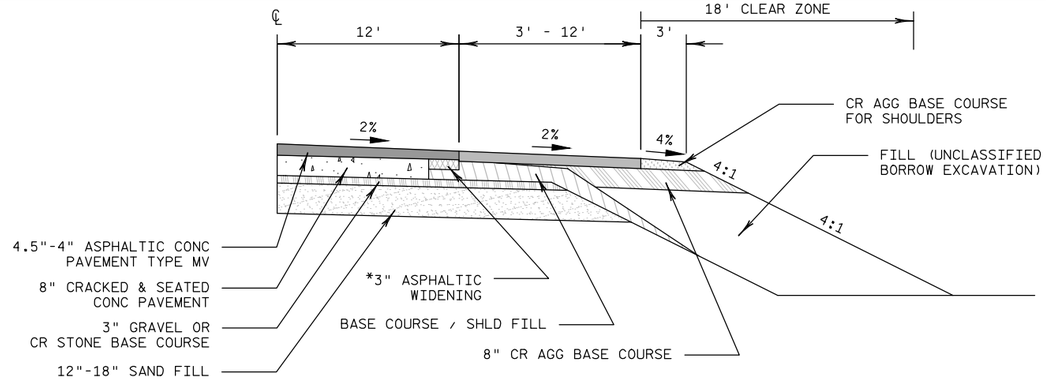
TYPICAL EXISTING SE SECTION
USH 53

SEE TABLE

			CONC SE		ASPH SE		DEGREE
STATION	-	STATION	LT	RT	LT	RT	OF CURVE
79+46.82	-	93+10.99	-2.7	-0.5	-4.0	+4.0	2°00'00"
149+76.15	-	163+76.16	-2.5	-0.5	-4.0	+4.0	2°00'00"
188+85.73	-	203+60.18	-0.6	-3.1	+3.2	-3.2	1°30'00"
222+41.91	-	226+58.58	-0.6	-3.1	+2.3	-2.3	1°00'00"
259+93.82	-	263+73.83	-0.6	-3.0	NC	NC	0°30'00"
297+19.84	-	312+56.51	-3.5	+3.6	-4.5	+4.5	2°30'00"
327+85.25	-	334+10.04	-0.7	-3.2	+3.6	-3.6	1°45'00"
343+84.99	-	345+94.99	UNK	UNK	+2.4	-2.4	1°00'00"

THE DIRECTION OF SE FOR THE CONCRETE PAV'T ON THE 0.5% - 0.7% SECTIONS IS A BEST GUESS FROM AVAILABLE INFORMTION AND MAY NOT BE CORRECT.

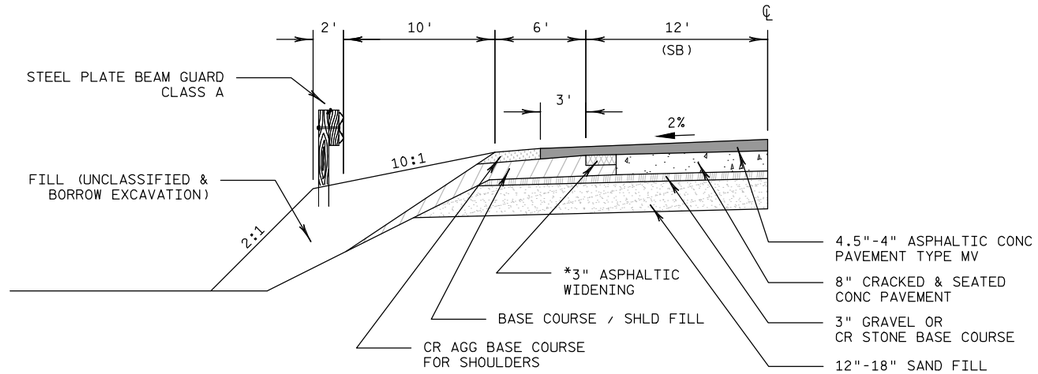
PROJECT NO:1630-02-71	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL EXISTING SECTIONS	SHEET 8	E



TYPICAL EXISTING 1/2 SECTION
USH 53 TEE INT. BYPASS LANE

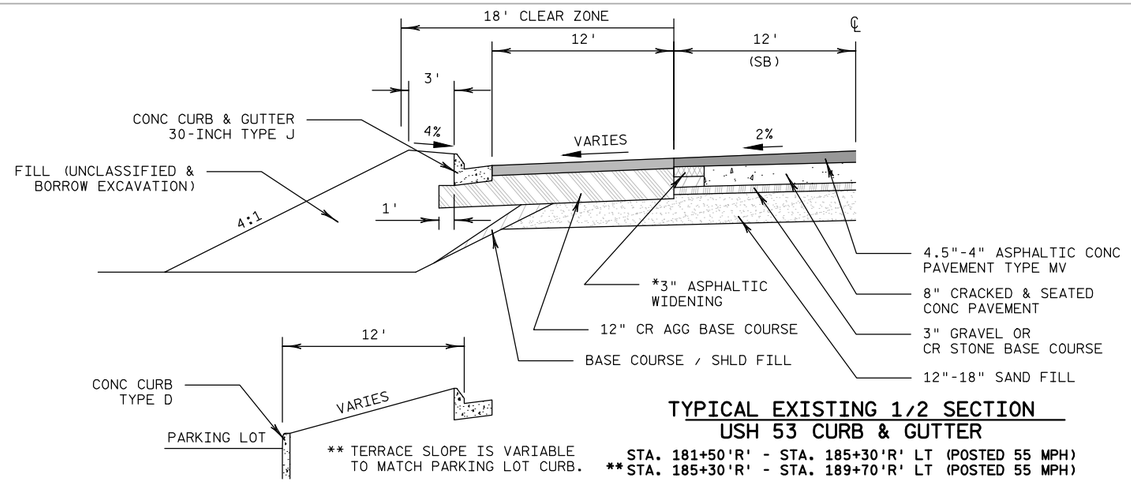
STA. 36+48.10'T' - STA. 39+98.10'T' BK RT (POSTED 55 MPH)
STA. 33+32.00'R' AH - STA. 37+32.00'R' RT (POSTED 55 MPH)
STA 74+66.00'R' - STA. 82+16.00'R' LT (POSTED 55 MPH)

RECORD DRAWINGS DEPICT THE SHOULDER MATERIAL NOT CUT-OUT FOR THE CONSTRUCTION OF NEW BASE UNDER THE PROPOSED BYPASS LANE; HOWEVER, THAT POSSIBLY DID OCCUR.



TYPICAL EXISTING 1/2 SECTION
USH 53 BEAMGUARD SPECIAL GRADING

STA. 34+80.50'R' - STA. 38+89.50'R' LT (POSTED 55 MPH)
OTHER BEAMGUARD LOCATIONS CONSTRUCTED WITHOUT THE SHOULDER WIDENING



** TERRACE SLOPE IS VARIABLE TO MATCH PARKING LOT CURB.

TYPICAL EXISTING 1/2 SECTION
USH 53 CURB & GUTTER

STA. 181+50'R' - STA. 185+30'R' LT (POSTED 55 MPH)
****STA. 185+30'R' - STA. 189+70'R' LT (POSTED 55 MPH)**

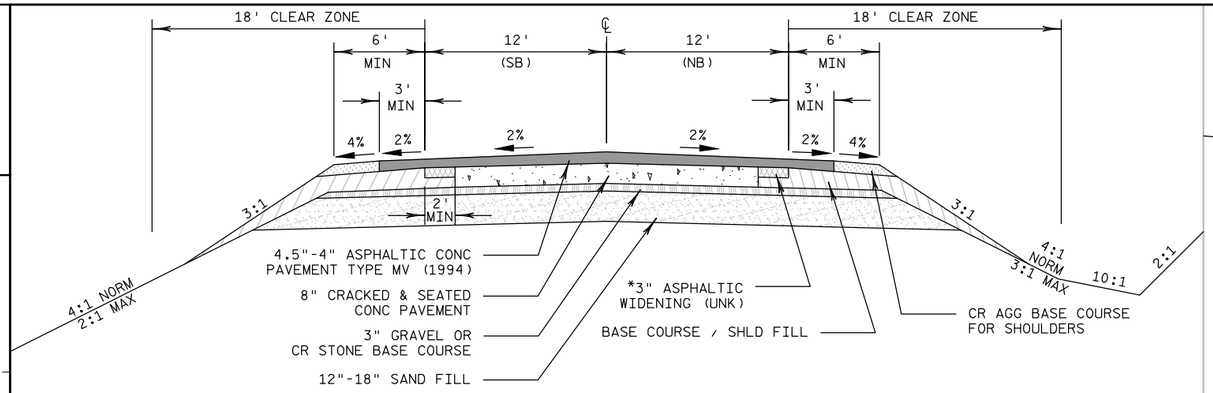
GENERAL NOTES

CONFLICTING INFORMATION ON EXISTING CONC PAV'T NORMAL CROWN SLOPE. NC IS LIKELY 1.25% - 1.5%.

*EXISTING ASPHALTIC WIDENING WIDTH: MINIMUM WIDTH 2'; MAX WIDTH 8' LT AND 12' RT (LOCATIONS UNKNOWN). CROSS SLOPE IS UNKNOWN BUT LIKELY MATCHES THE CONCRETE. DEPTH OF ASPHALT VARIES - 3" IS THE AVERAGE PER BORINGS.

RECORD DRAWINGS DO NOT DEPICT CONC FLUMES OR CONC CURB & GUTTER ADJACENT TO THE 8" CRACKED AND SEATED CONC PAV'T; HOWEVER, THOSE LIKELY EXIST AT UNKNOWN LOCATIONS.

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL EXISTING SECTIONS	SHEET 9	E



V PIGEON FALLS STA. 337+00±
NO CHANGE IN ACTUAL TYPICAL SECTION

TYPICAL EXISTING SECTION
USH 53 (EKERN ST.)

STA. 337+00±'A' BK = STA. 337+00±'V' AH
STA. 337+00±'V' - STA. 348+50.00'V' (POSTED 55 MPH)

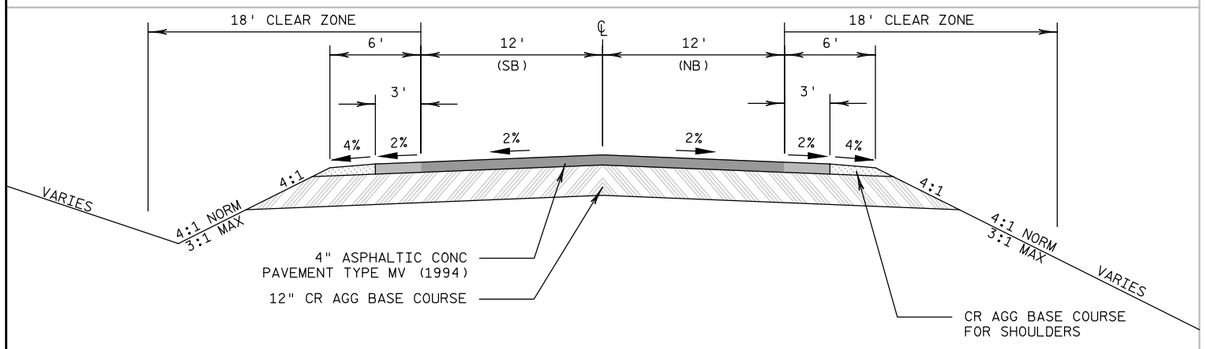
STA. 341+20'V' (REDUCE SPEED AHEAD 35 - NB)

			CONC SE		ASPH SE		DEGREE
STATION	-	STATION	LT	RT	LT	RT	OF CURVE
343+84.99	-	345+94.99	UNK	UNK	+2.4	-2.4	1°00'00"

SEE PREVIOUS TYPICAL EXISTING SE SECTION,
USH 53 FOR ROADWAY & PAVEMENT DETAILS.

V PIGEON FALLS CORP BOUNDARY
INTERSECTS USH 53 ℄ AT
STA. 337+00'A'/'V'±

AADT(2035): 5225; T(%AADT): 13.7%

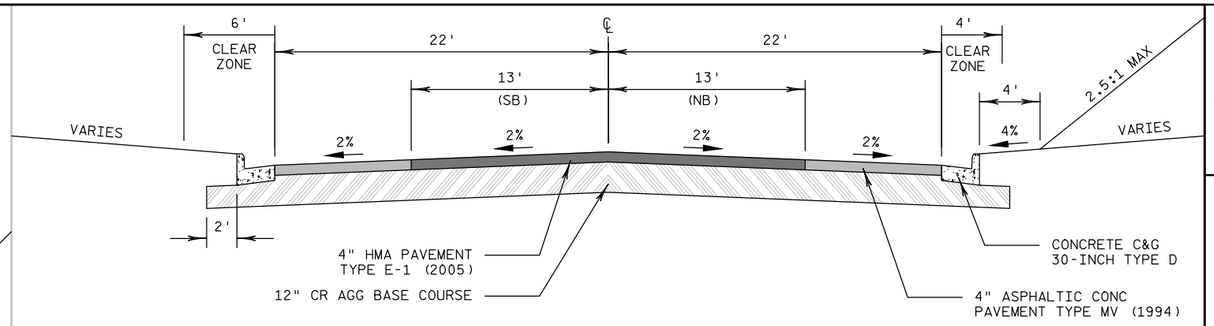


100'± TAPER INTO CURB & GUTTER SECTION

TYPICAL EXISTING SECTION
USH 53 (EKERN ST.)

STA. 348+50.00'V' - STA. 351+16.00'V' (POSTED 55 MPH)

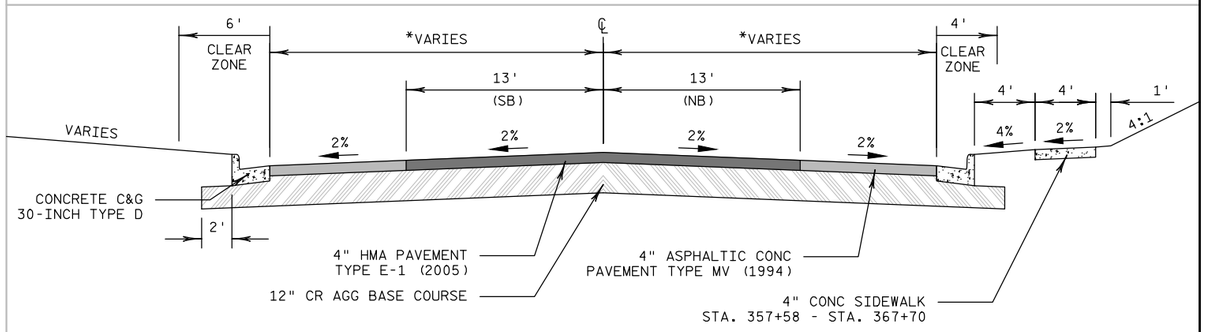
AADT(2035): 5225; T(%AADT): 13.7%



TYPICAL EXISTING SECTION
USH 53 URBAN (EKERN ST.)

STA. 351+16.00'V' - STA. 351+25'V' (POSTED 55 MPH)
STA. 351+25'V' - STA. 357+25.45'V' (POSTED 35 MPH)

AADT(2035): 5225; T(%AADT): 13.7%



SIDEWALK CROSS SLOPE WAS NOT LABELED
ON RECORD DRAWINGS - SHOULD BE 2%.

TYPICAL EXISTING SECTION
USH 53 URBAN (EKERN ST.)

STA. 357+25.45'V' - STA. 373+47.42'V' (POSTED 35 MPH)

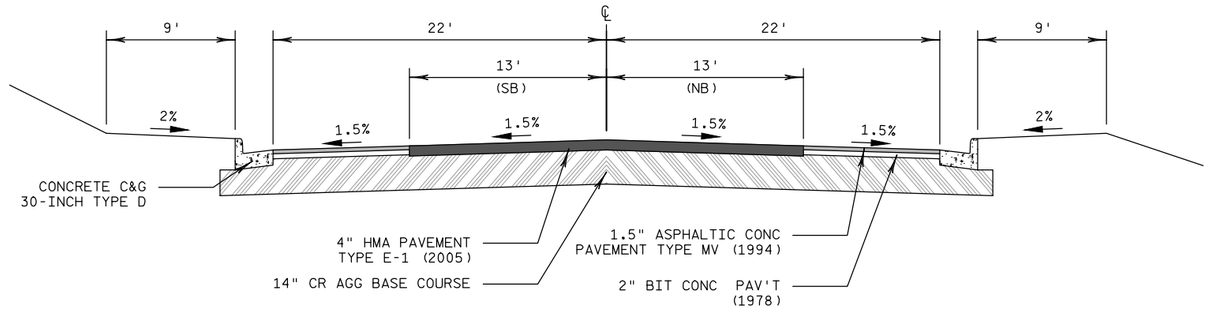
* 22': STA. 357+25.45'V' - STA. 368+97.42'V' LT
STA. 357+25.45'V' - STA. 367+70.00'V' RT

* 22'-26': STA. 368+97.42'V' - STA. 373+47.42'V' LT
* 24'-26': STA. 367+70.00'V' - STA. 373+47.42'V' RT

			ASPH SE		DEGREE
STATION	-	STATION	LT	RT	OF CURVE
365+46.32	-	368+68.81	NC	NC	8°00'00"

AADT(2035): 5225; T(%AADT): 13.7%

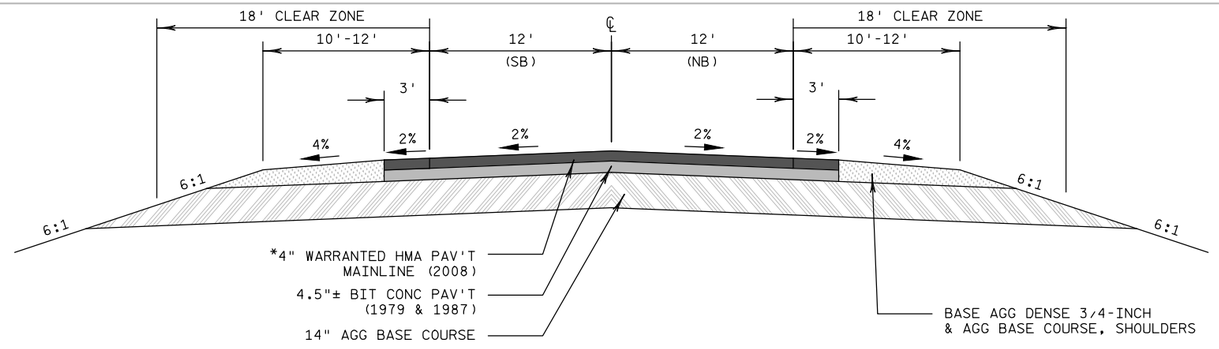
PROJECT NO:1630-02-71	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL EXISTING SECTIONS	SHEET 10	E



TYPICAL EXISTING SECTION
USH 53 URBAN (EKERN ST.)

STA. 373+47.42'V' - STA. 374+53.72'V' BK (POSTED 35 MPH)
STA. 1+54.00'P' AH - STA. 1+54.84'P' BGN DECK (POSTED 35 MPH)

AADT(2035): 5225; T(%AADT): 13.7%



*2" AT STRUCTURE

STA. 203+61.00'N' - STA. 204+75'N' (35 MPH)
STA. 204+75'N'+ (55 MPH)
STA. 210+60'N' (REDUCE SPEED AHEAD 35 - SB)

TYPICAL EXISTING SECTION
USH 53 (EKERN ST.)

STA. 2+85.16'P' BK = STA. 200+00.00'N' AH
STA. 200+00.00'N' END DECK - STA. 203+61.00'N' (POSTED 35 MPH)

SHOULDERS PAVED FULL WIDTH AND PAV'T CROSS SLOPE IS 1.5% AT STRUCTURE B-61-0058.

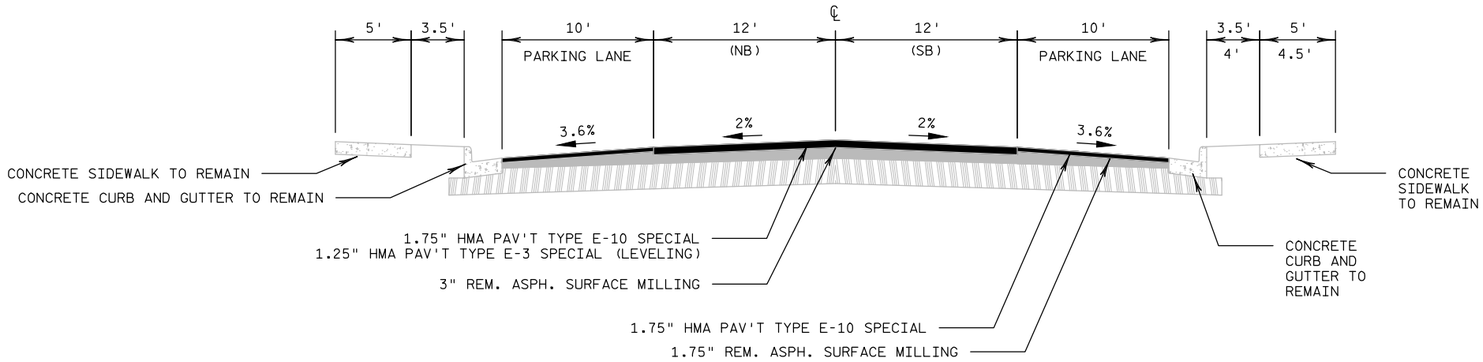
2008 PROJECT REVISED CLEAR ZONE FROM 30' IN 1978 TO CURRENT 18'.

AADT(2035): 5225; T(%AADT): 13.7%

PROJECT NO:1630-02-70	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL EXISTING SECTIONS - PIGEON CR BRIDGE	SHEET 11	E

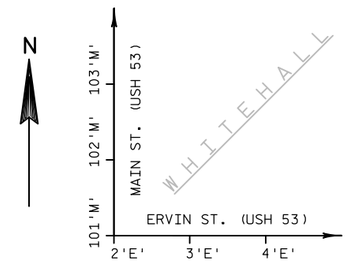
PAVEMENT CORES / BORINGS

CORE #	ODO	CALC STA.		OFFSET		PAV'T THICKNESS	BASE THICKNESS	COMMENTS	ASBUILT				
-	0.00	114+23	'M'	-		-	-	WEST JCT. STH 121	114+22.73	'M'			
29	0.03	115+81	'M'	6.0	LT	7	BASE						
-	0.20	10+04	'T'	-		-	-	BLAIR ST / LT & RT	10+04.36	'T'			
28	0.25	12+68	'T'	6.0	RT	2 3/4	PCC						
-	0.34	17+43	'T'	-		-	-	TREMPEALEAU RIVER BRIDGE					
-	0.48	24+82	'T'	-		-	-	NORTH RIVER RD / LT	25+00.00	'T'			
27	0.50	25+88	'T'	6.0	LT	5 1/4	PCC						
-	0.52	26+94	'T'	-		-	-	END C&G					
-	0.77	33+32	'R'	-		-	-	CTH D / LT	39+98.10	'T'	=	33+32.00	'R'
-	0.99	44+68	'R'	-		-	-	EVERETTE LANE / RT	44+63.00	'R'			
26	1.00	45+20	'R'	5.0	RT	5	PCC						
25	1.00	45+20	'R'	11.0	RT	6	10" BASE						
-	1.03	46+75	'R'	-		-	-	FAIRVIEW RD / LT					
24	1.55	73+60	'R'	8.0	LT	5	PCC						
23	1.55	73+60	'R'	11.0	LT	4 3/4	10" BASE						
-	1.65	78+76	'R'	-		-	-	SHANSBERG RD / RT	78+66.00	'R'			
22	2.00	96+84	'R'	6.0	RT	4 3/4	PCC						
21	2.00	96+84	'R'	11.0	RT	7 1/4	8 1/2" BASE						
-	2.46	120+59	'R'	-		-	-	THOMPSON COULEE RD /CTH S	120+91.00	'R'			
20	2.50	122+65	'R'	6.0	LT	4 1/4	PCC						
19	2.50	122+65	'R'	11.5	LT	6 1/4	6" BASE						
18	3.00	148+47	'R'	6.0	RT	8	PCC						
17	3.00	148+47	'R'	11.0	RT	12 1/4	9" BASE						
16	3.50	174+29	'R'	6.0	LT	4 1/2	PCC						
15	3.50	174+29	'R'	11.0	LT	6 1/2	10" BASE						
-	3.51	174+81	'R'	-		-	-	SIMONSON RD / LT	175+10.60	'R'			
14	4.00	200+11	'R'	6.0	RT	5 3/4	PCC						
13	4.00	200+11	'R'	11.0	RT	7 1/2	7" BASE						
-	4.06	203+21	'R'	-		-	-	DISSMORE COULEE RD / LT	203+66.00	'R'			
12	4.50	225+93	'R'	6.0	LT	7	PCC						
11	4.50	225+93	'R'	11.0	LT	10 3/4	3" BASE						
-	4.67	234+71	'R'	-		-	-	HAUG RD / RT	234+67.00	'R'			
-	4.91	247+10	'R'	-		-	-	FITCH COULEE RD / LT	246+64.30	'R'			
10	5.00	251+75	'R'	6.0	RT	5	PCC						
9	5.00	251+75	'R'	11.0	RT	7	11 1/2" BASE						
8	5.50	277+57	'R'	6.0	LT	4 1/2	PCC						
7	5.50	277+57	'R'	11.0	LT	7 1/4	4 3/4" BASE						
-	5.86	296+16	'R'	-		-	-	FREMSTAD RD / RT	296+26.00	'R'			
6	6.00	303+39	'R'	6.0	RT	10	PCC						
5	6.00	303+39	'R'	11.0	RT	13	6" BASE						
4	6.50	329+21	'R'	6.0	LT	7 1/2	PCC						
3	6.50	329+21	'R'	11.5	LT	12 1/4	10" BASE						
-	6.54	331+27	'A'	-		-	-	FULLER COULEE RD / LT	331+24.00	'A'			
-	6.68	338+50	'V'	-		-	-	PIGEON FALLS CORP LIMITS SIGN					
-	6.93	351+41	'V'	-		-	-	BEGIN C&G					
2	7.00	355+03	'V'	6.0	RT	4	BASE						
-	7.05	357+61	'V'	-		-	-	CTH W / RT	357+25.49	'V'			
1	7.22	366+39	'V'	6.0	LT	4 1/2	BASE						
-	7.26	368+45	'V'	-		-	-	S. EKERN AVE. / RT	367+70.12	'V'			
-	7.31	371+04	'V'	-		-	-	EAST JCT. STH 121 / RT	370+97.56	'V'			
X	-	200+15	'N'	8.0	RT	5 1/2	-	15' NORTH OF B-61-0058					

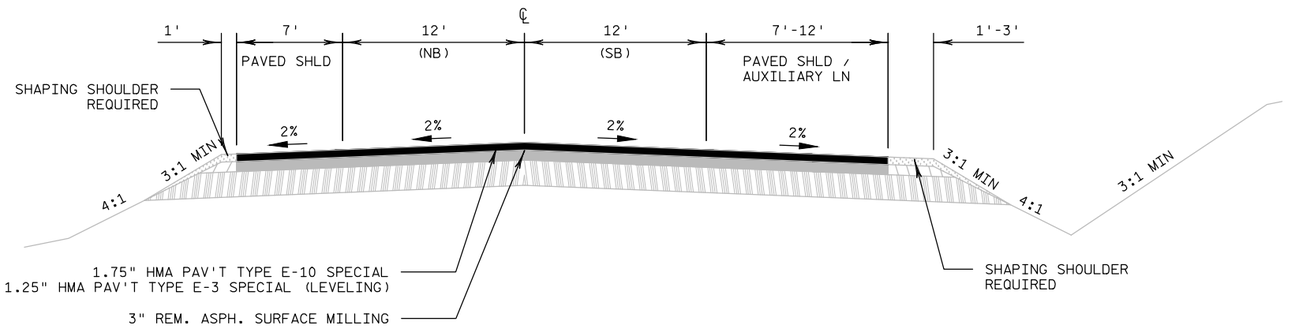


TYPICAL FINISHED SECTION
USH 53 URBAN (ERVIN ST.)

STA. 1+10.00'E' - STA. 12+08.45'E' (POSTED 30 MPH)
(ERVIN ST STA. 2+00.00'E' = MAIN ST STA. 101+00.55'M')



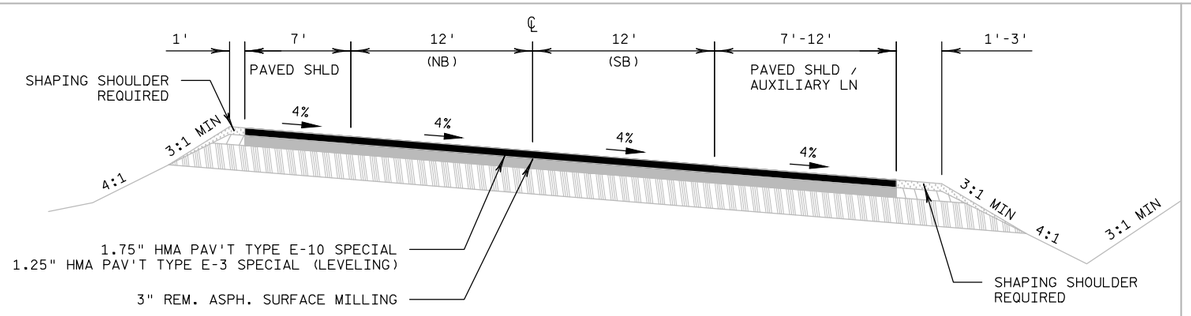
ERVIN ST. (AND BEYOND) RECORD DRAWINGS ALL HAVE WEST TO EAST STATIONING, WHICH FOR USH 53 IS NORTH TO SOUTH, CREATING A DISCONNECT IN STATIONING DIRECTIONALITY AT MAIN ST.



150' SUPERELEVATION TRANSITION
(STA. 15+87.60'E' - STA. 17+37.60'E')
100' SUPERELEVATION RUNOFF
(STA. 16+37.60'E' - STA. 17+37.60'E')

TYPICAL FINISHED SECTION
USH 53 (ERVIN ST.)

STA. 12+08.45'E' - STA. 15+00'E' (POSTED 30 MPH)
STA. 15+00'E' - STA. 17+37.60'E' (POSTED 40 MPH)



TYPICAL FINISHED SECTION
USH 53 (ERVIN ST.)

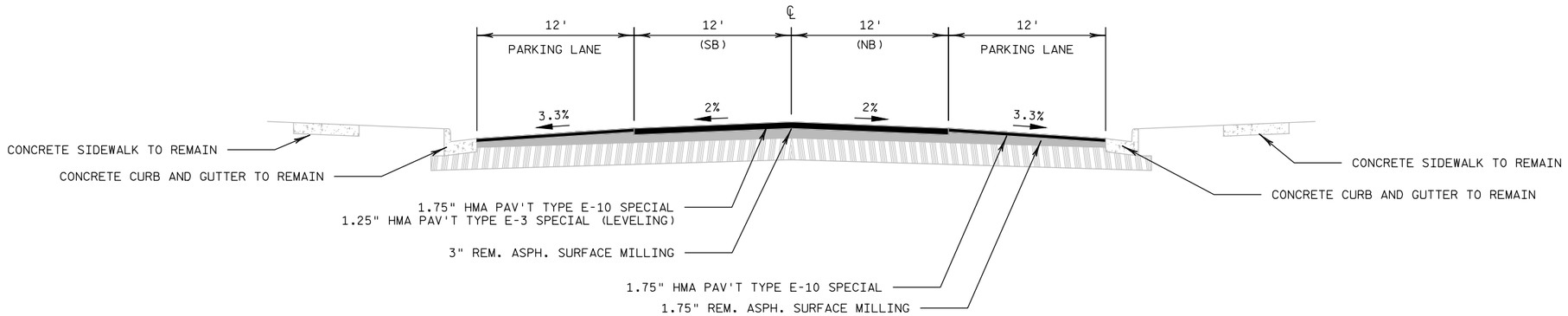
STA. 17+37.60'E' - STA. 28+78.00'E' (POSTED 40 MPH)

DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.

CITY OF WHITEHALL PARKING LANE COST PARTICIPATION LIMITED TO 8' WIDTH MEASURED FROM FACE OF CURB (OTHER THAN PARKING PAV'T MARKING WHICH IS ACTUAL QUANTITY PLACED). THE PARKING LANE PAV'T AREA WIDTH IN WHITEHALL IS 6'.

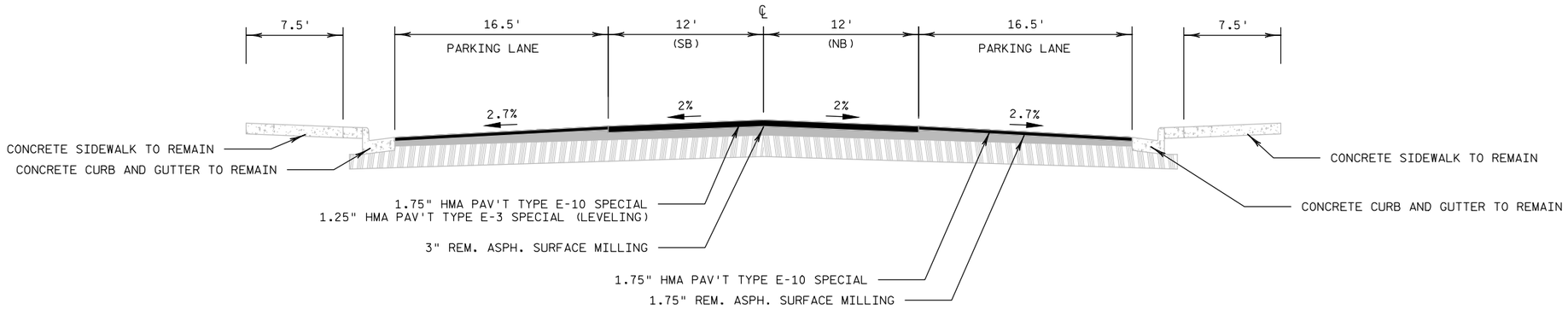
THE CURB & GUTTER IN THE CITY OF WHITEHALL HAS INDEPENDENT PROFILES. PARKING LANE CROSS SLOPE SHOWN ON THE CROSS SECTION IS NOMINAL.

PROJECT NO:1630-02-71	HWY:USH 53	COUNTY:TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 13	E



TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

STA. 101+00.55'M' - STA. 110+30.25'M' (POSTED 30 MPH)
(MAIN ST STA. 101+00.55'M' = ERVIN ST STA. 2+00.00'E')



TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

STA. 110+30.25'M' - STA. 115+59.07'M' BK (POSTED 30 MPH)
STA. 117+13.90'M' - STA. 123+92.20'M' BK (POSTED 30 MPH)

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 14	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020300_TS.DWG - 102 PLOT DATE : 030808111109 PLOT BY : DAVIS, TERESA L PLOT NAME : 101406 PLOT SCALE : 1 IN:10 FT

CONSTRUCT 5' CONCRETE MEDIAN SLOPED NOSE TYPE 1 AT BOTH ENDS OF BARRIER MEDIANS.

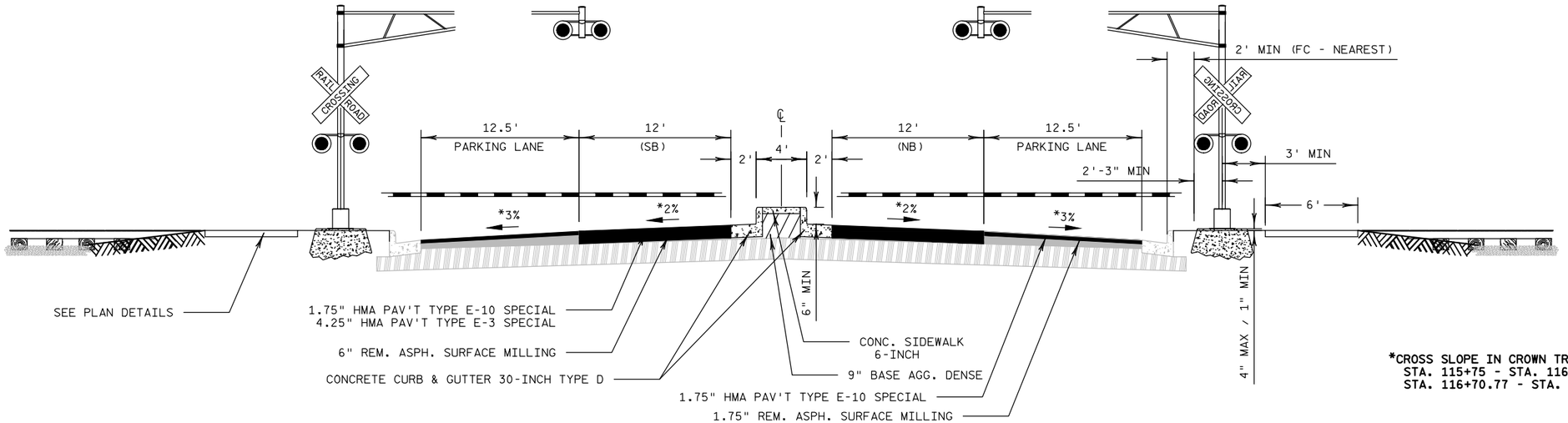
CROSS SLOPE VARIES TO MATCH RAILROAD CROSSING.

MEDIAN WIDTH OF 4' IS MINIMUM. FINAL DESIGN MAY REVISE TO 5', WITH PARKING LANE REDUCED TO 12' EACH SIDE.

DETAILS OF CROSSING HARDWARE (SIGNALS, GATES, ETC.) AND LENGTHS OF CANTILEVER ELEMENTS TO BE DETERMINED BY OTHERS.

SIGNAL/GATES ON APPROACH SIDE ONLY.

DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.

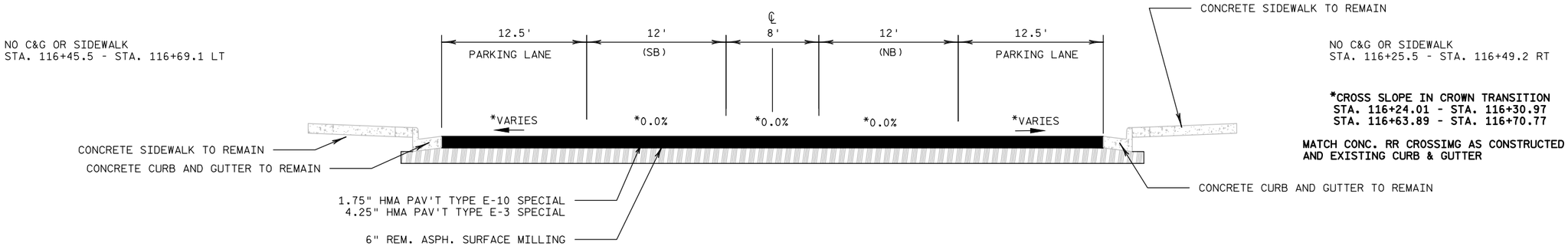


***CROSS SLOPE IN CROWN TRANSITION**
STA. 115+75 - STA. 116+24.01
STA. 116+70.77 - STA. 117+30

TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

STA. 115+59.07'M' - STA. 116+24.01'M' (POSTED 30 MPH) / 64.94' C&G (60' EFFECTIVE BARRIER)
STA. 116+70.77'M' - STA. 117+13.90'M' (POSTED 30 MPH) / 43.13' C&G (40' EFFECTIVE BARRIER)

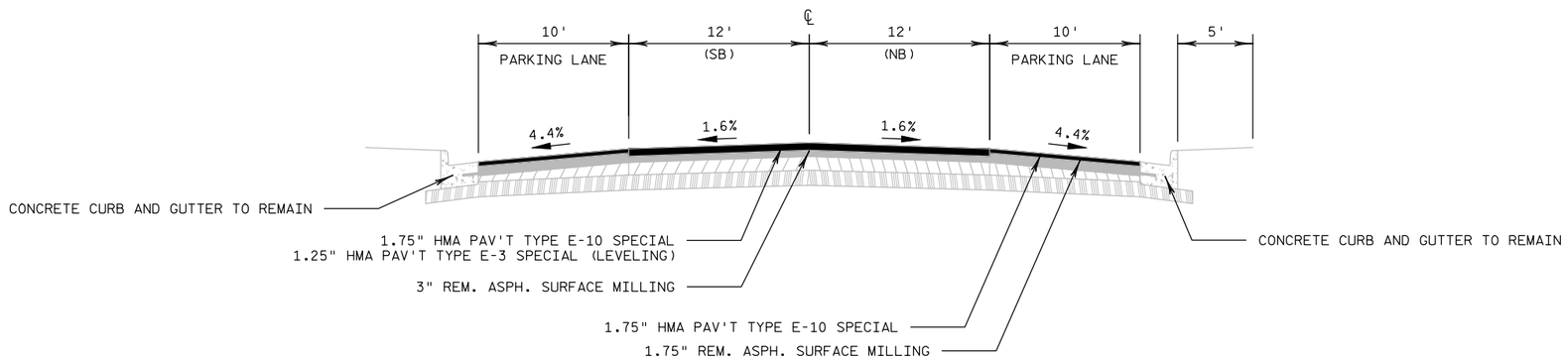
DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.



℄ TRACK AT USH 53 = STA. 116+47.43

TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

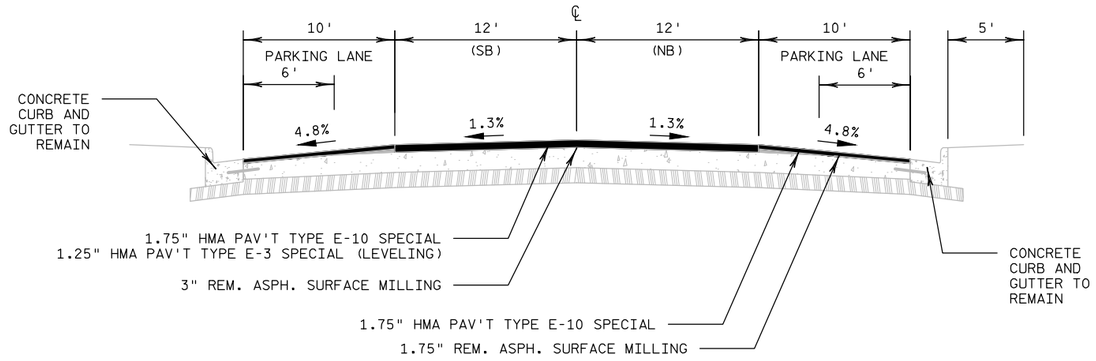
STA. 116+24.01'M' - STA. 116+42.22'M' BK (POSTED 30 MPH)
STA. 116+52.64'M' - STA. 116+70.77'M' BK (POSTED 30 MPH)



TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

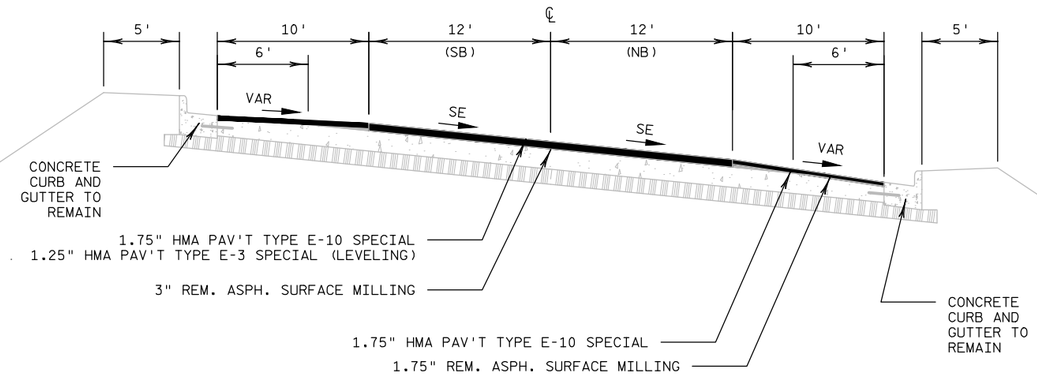
STA. 123+92.20'M' BK = STA. 9+35.02'T' AH
STA. 9+35.02'T' - STA. 11+82.82'T' (POSTED 30 MPH)

PROJECT NO:1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 16	E



TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

STA. 11+82.82'T' - STA. 14+60.00'T' (POSTED 30 MPH)



TYPICAL FINISHED SECTION
USH 53 URBAN (MAIN ST.)

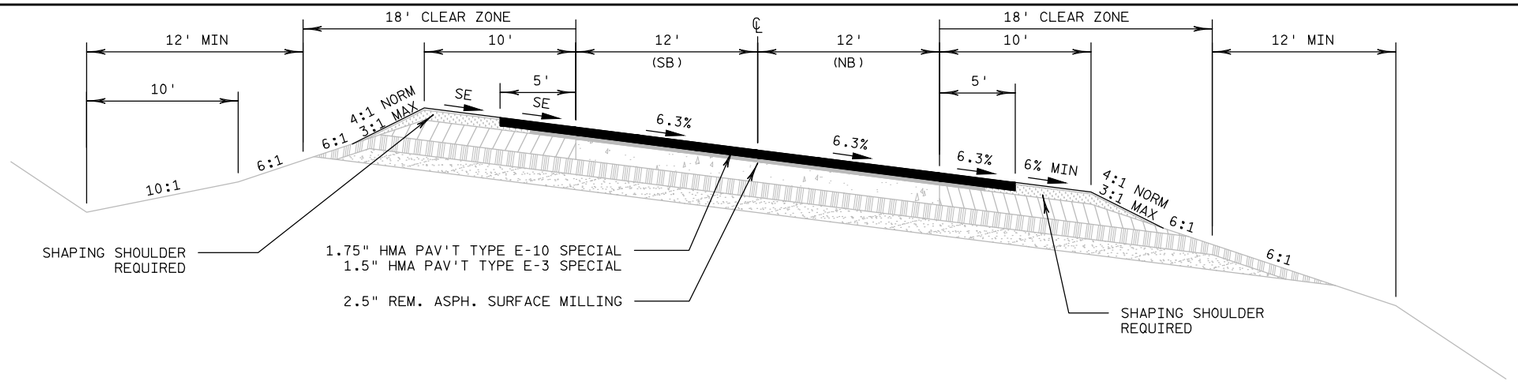
STA. 14+60.00'T' - STA. 15+87.66'T' (POSTED 30 MPH)

STA. 15+87.66'T' - STA. 16+65'T' (POSTED 30 MPH)
STA. 16+65'T' - STA. 16+92.39'T' BGN DECK (POSTED 45 MPH)

PROJECT 1630-01-73 (TIED)
TREMPEALEAU RIVER BRIDGE B-61-0050

2

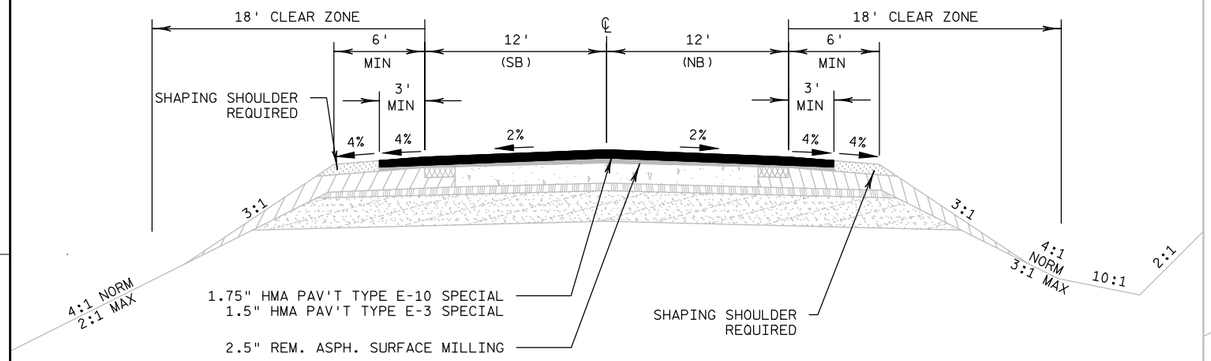
PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 17	E



TYPICAL FINISHED SECTION
USH 53

STA. 26+50.00'T' - STA. 26+75.00'T' (POSTED 45 MPH)
STA. 26+75.00'T' - STA. 27+50'T' (POSTED 45 MPH)
STA. 27+50'T' - STA. 35+00.00'T' (POSTED 55 MPH)

C WHITEHALL CORP BOUNDARY INTERSECTS USH 53 ℄ FROM STA. 27+70'T'± - STA. 28+35'T'±



TYPICAL FINISHED SECTION
USH 53

STA. 35+00.00'T' - STA. 39+98.10'T' BK (POSTED 55 MPH)
STA. 33+32.00'R' AH - STA. 330+00.00'R' BK (POSTED 55 MPH)
STA. 329+80.00'A' AH - STA. 337+00±'A' (POSTED 55 MPH)

EXCEPTION: B-61-0124 (CLEAR WIDTH 44')
STA. 70+66.75'R' - STA. 72+48.25'R'
(NO WORK)

SEE HMA LANE REPAIR DETAIL

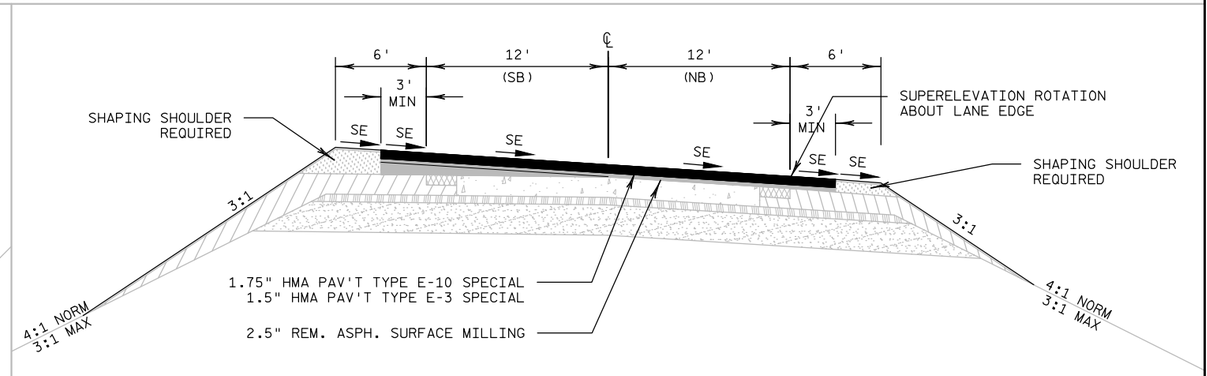
FULL WIDTH PAVED SHOULDER (6')
STA. 102+00'R' - STA. 130+00'R' LT & RT

FULL WIDTH PAVED SHOULDER (10')
STA. 69+66'R' - STA. 70+66'R' LT & RT
STA. 72+49'R' - STA. 73+49'R' LT & RT

GENERAL NOTES

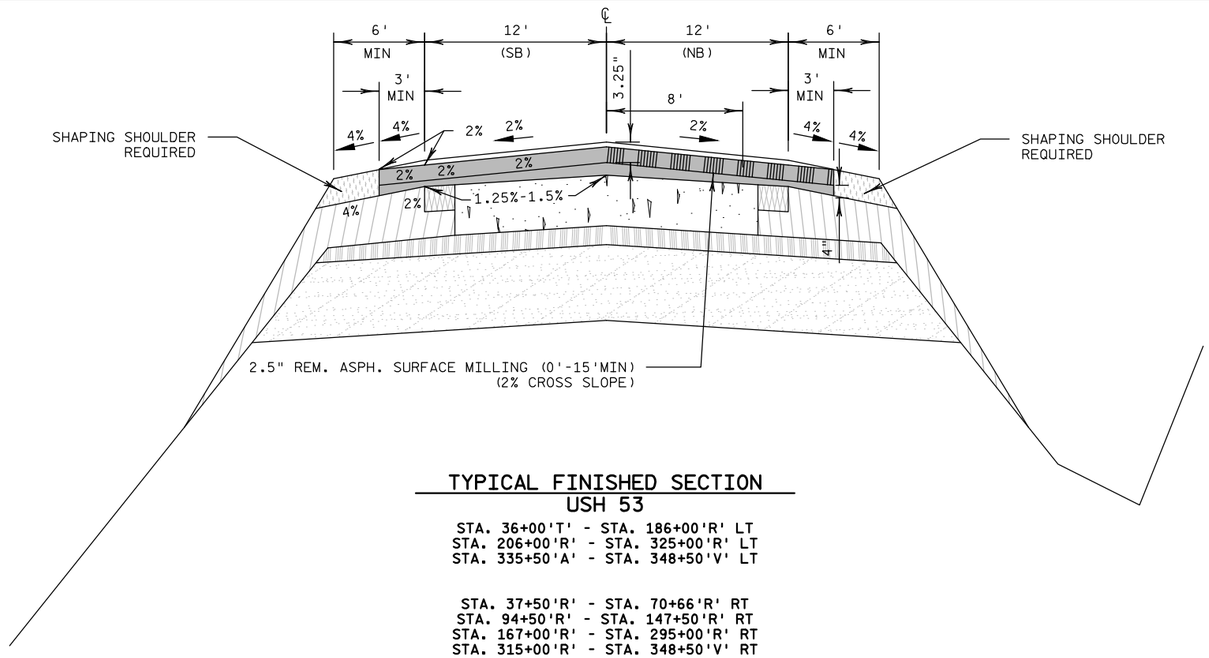
DO NOT INCREASE GRAVEL SHOULDER SLOPE OVER 6% TO MATCH EXISTING TOP SHOULDER POINT.

DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.



TYPICAL FINISHED SE SECTION
USH 53

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 18	E



TYPICAL FINISHED SECTION
USH 53

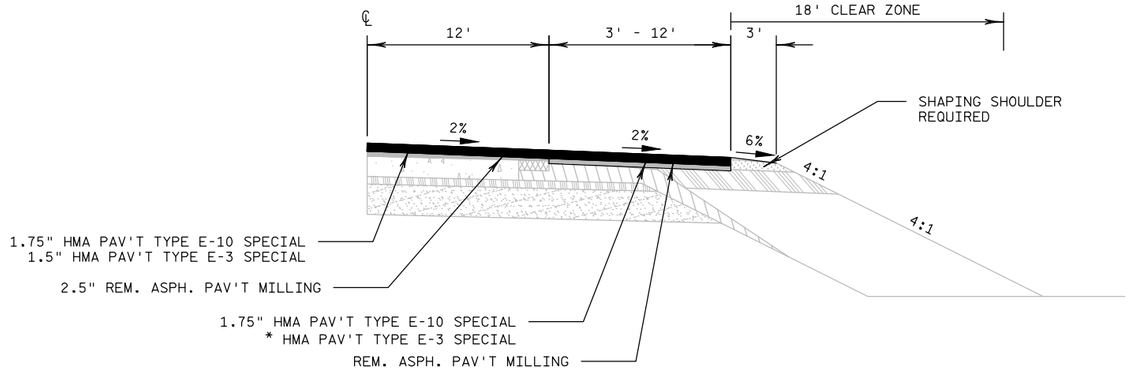
STA. 36+00'T' - STA. 186+00'R' LT
STA. 206+00'R' - STA. 325+00'R' LT
STA. 335+50'A' - STA. 348+50'V' LT

STA. 37+50'R' - STA. 70+66'R' RT
STA. 94+50'R' - STA. 147+50'R' RT
STA. 167+00'R' - STA. 295+00'R' RT
STA. 315+00'R' - STA. 348+50'V' RT

STA. 348+50'V' - STA. 351+00'V' LT (END AT END OF EXIST. CONC. PAV'T)

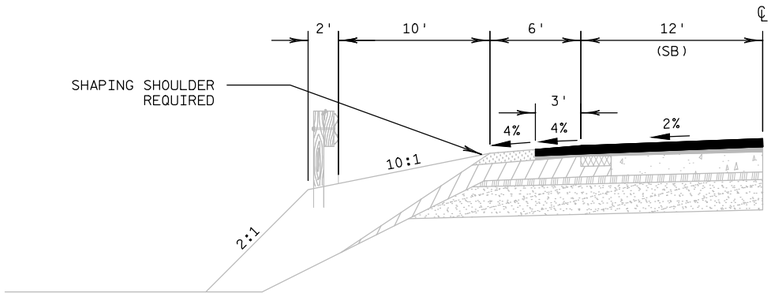
STA. 348+50'V' - STA. 351+00'V' RT (END AT END OF EXIST. CONC. PAV'T)

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 19	E



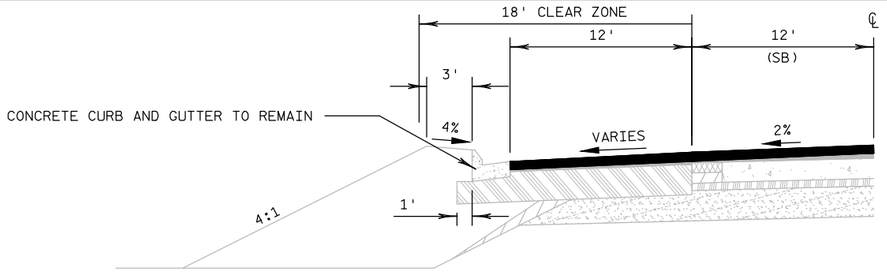
TYPICAL FINISHED 1/2 SECTION
USH 53 TEE INT. BYPASS LANE

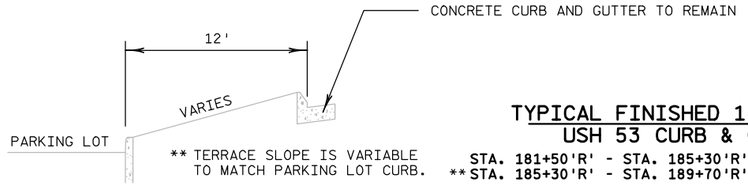
STA. 36+48.10'T' - STA. 39+98.10'T' BK RT (POSTED 55 MPH) *3.5" **4.5"
STA. 33+32.00'R' AH - STA. 37+32.00'R' RT (POSTED 55 MPH) *3.5" **4.5"
STA 74+66.00'R' - STA. 82+16.00'R' LT (POSTED 55 MPH) *1.5" **2.5"



TYPICAL FINISHED 1/2 SECTION
USH 53 BEAMGUARD SPECIAL GRADING

STA. 34+80.50'R' - STA. 38+89.50'R' LT (POSTED 55 MPH)
OTHER BEAMGUARD LOCATIONS CONSTRUCTED WITHOUT THE SHOULDER WIDENING





** TERRACE SLOPE IS VARIABLE TO MATCH PARKING LOT CURB.

TYPICAL FINISHED 1/2 SECTION
USH 53 CURB & GUTTER

STA. 181+50'R' - STA. 185+30'R' LT (POSTED 55 MPH)
****STA. 185+30'R' - STA. 189+70'R' LT (POSTED 55 MPH)**

GENERAL NOTES

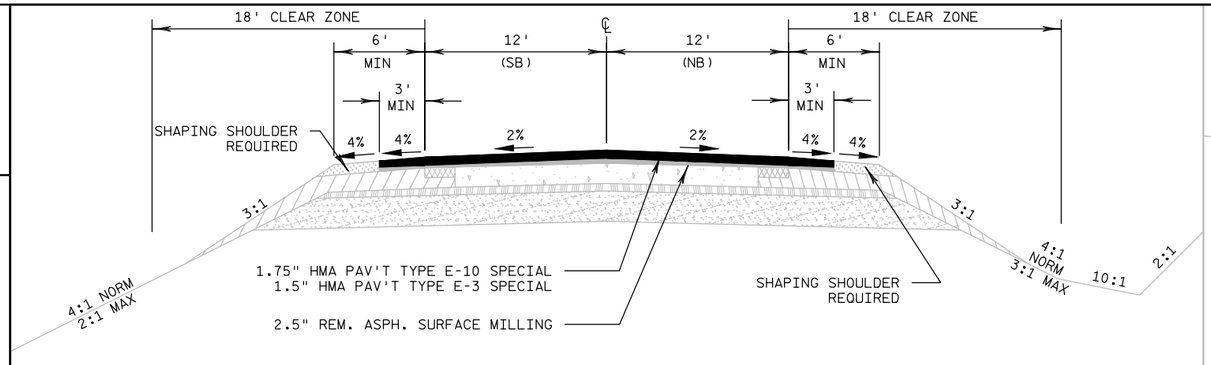
CONFLICTING INFORMATION ON EXISTING CONC PAV'T NORMAL CROWN SLOPE. NC IS LIKELY 1.25% - 1.5%.

*EXISTING ASPHALTIC WIDENING WIDTH: MINIMUM WIDTH 2'; MAX WIDTH 8' LT AND 12' RT (LOCATIONS UNKNOWN). CROSS SLOPE IS UNKNOWN BUT LIKELY MATCHES THE CONCRETE. DEPTH OF ASPHALT VARIES - 3" IS THE AVERAGE PER BORINGS.

RECORD DRAWINGS DO NOT DEPICT CONC FLUMES OR CONC CURB & GUTTER ADJACENT TO THE 8" CRACKED AND SEATED CONC PAV'T; HOWEVER, THOSE LIKELY EXIST AT UNKNOWN LOCATIONS.

DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 20	E



SEE HMA LANE REPAIR DETAIL

V PIGEON FALLS STA. 337+00±
NO CHANGE IN ACTUAL TYPICAL SECTION

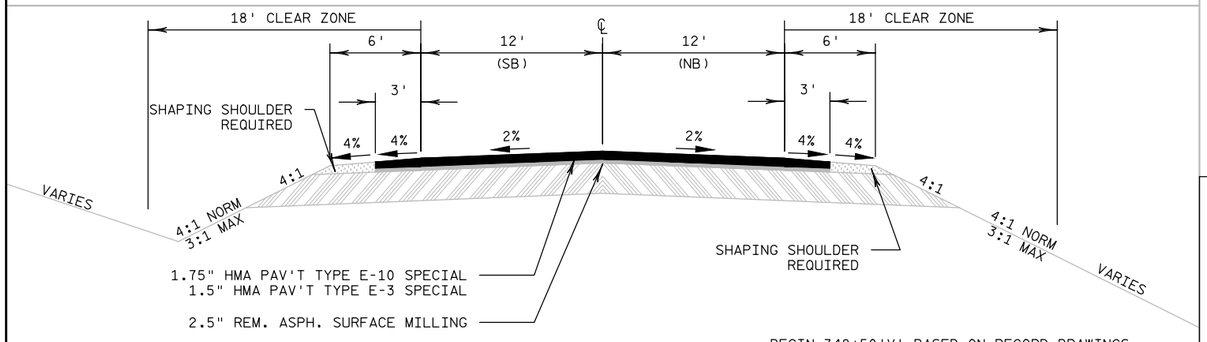
END 348+50'V' BASED ON RECORD DRAWINGS
FIELD CONDITIONS SUPPORT 350+75'V'

TYPICAL FINISHED SECTION
USH 53 (EKERN ST.)

STA. 337+00±'A' BK = STA. 337+00±'V' AH
STA. 337+00±'V' - STA. 348+50.00'V' (POSTED 55 MPH)

SEE PREVIOUS TYPICAL EXISTING SE SECTION,
USH 53 FOR ROADWAY & PAVEMENT DETAILS.

V PIGEON FALLS CORP BOUNDARY
INTERSECTS USH 53 ℄ AT
STA. 337+00'A'/'V'±



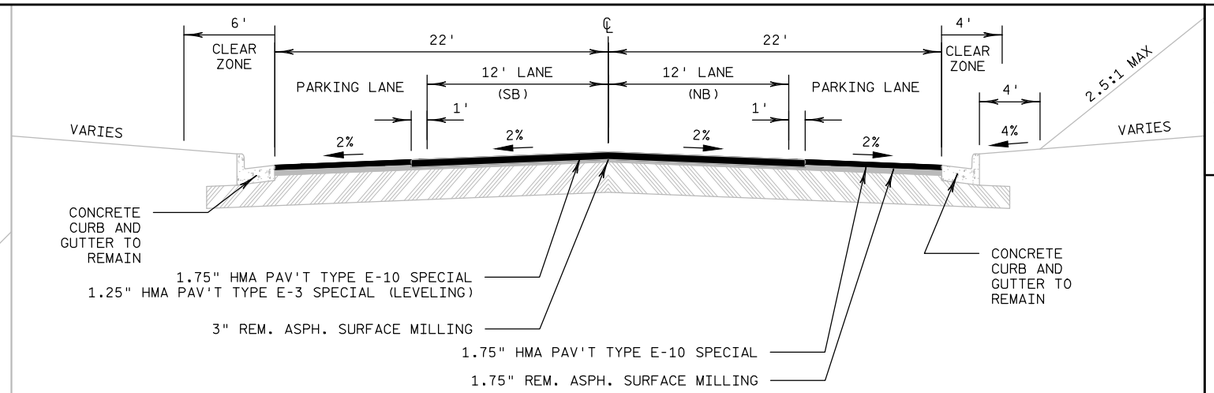
BEGIN 348+50'V' BASED ON RECORD DRAWINGS
FIELD CONDITIONS SUPPORT 350+75'V'

SEE HMA LANE REPAIR DETAIL

100'± TAPER INTO CURB & GUTTER SECTION

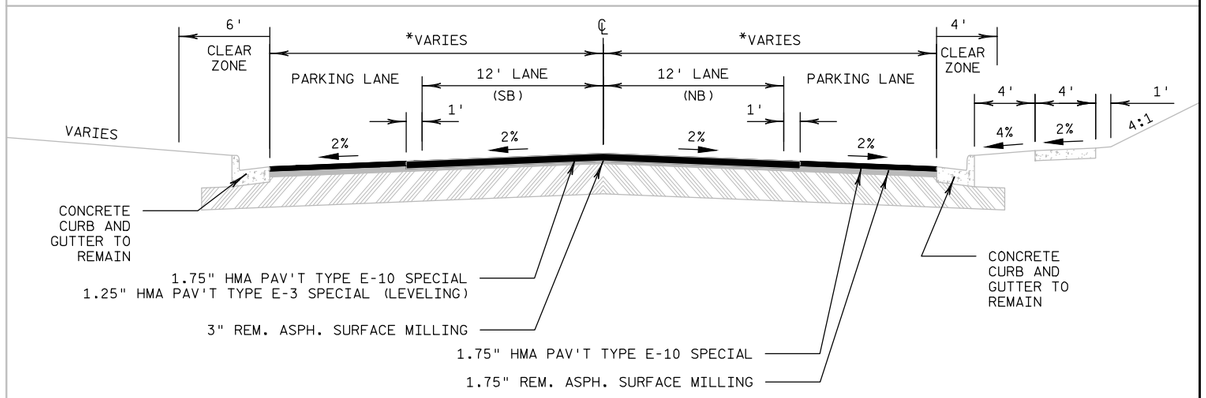
TYPICAL FINISHED SECTION
USH 53 (EKERN ST.)

STA. 348+50.00'V' - STA. 351+16.00'V' (POSTED 55 MPH)



TYPICAL FINISHED SECTION
USH 53 URBAN (EKERN ST.)

STA. 351+16.00'V' - STA. 351+25'V' (POSTED 55 MPH)
STA. 351+25'V' - STA. 357+25.45'V' (POSTED 35 MPH)



TYPICAL FINISHED SECTION
USH 53 URBAN (EKERN ST.)

STA. 357+25.45'V' - STA. 373+50.00'V' (POSTED 35 MPH)

* 22': STA. 357+25.45'V' - STA. 368+97.42'V' LT
STA. 357+25.45'V' - STA. 367+70.00'V' RT

* 22'-26': STA. 368+97.42'V' - STA. 373+47.42'V' LT
* 24'-26': STA. 367+70.00'V' - STA. 373+47.42'V' RT

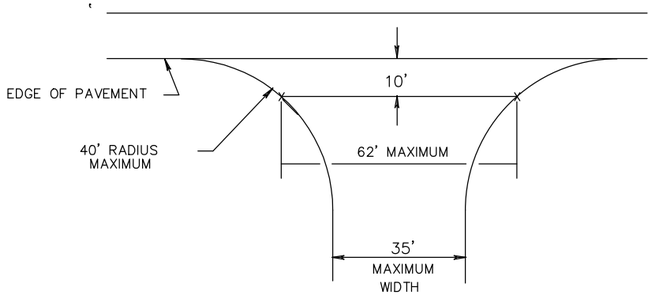
GENERAL NOTES

DO NOT CONSTRUCT CENTERLINE OR EDGELINE (SHOULDER) RUMBLE STRIPS.

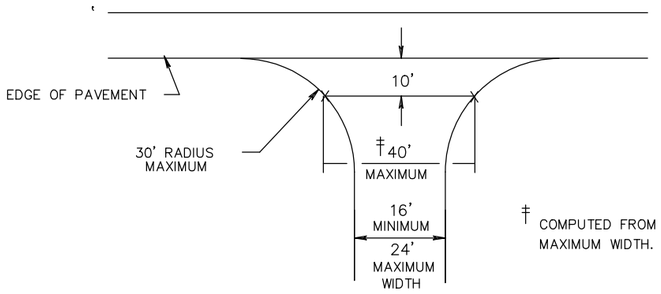
VILLAGE OF PIGEON FALLS PARKING LANE COST PARTICIPATION LIMITED TO 8' WIDTH MEASURED FROM FACE OF CURB (OTHER THAN PARKING PAV'T MARKING WHICH IS ACTUAL QUANTITY PLACED). THE PARKING LANE PAV'T AREA WIDTH IN PIGEON FALLS IS 6'.

LOCAL RESPONSIBILITY: BASE REPAIRS, MILLING, AND ASPHALT PAV'T ITEMS (INCLUDING TACK COAT, ASPHALTIC MATERIAL, ETC.), ALL LIMITED TO THE PARKING LANE PAV'T AREA. IN ADDITION, THE ENTIRE QUANTITY OF PAVEMENT MARKINGS ASSOCIATED WITH PARKING. THERE IS NO COST ASSOCIATED WITH MOBILIZATION, STAKING, ETC.

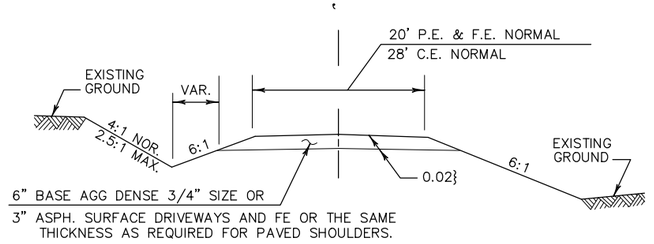
PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TYPICAL FINISHED SECTIONS	SHEET 21	E



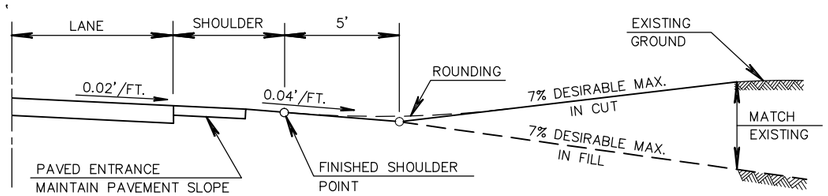
TYPICAL DRIVEWAY DETAIL
(COMMERCIAL RURAL)
TRANS 231.04



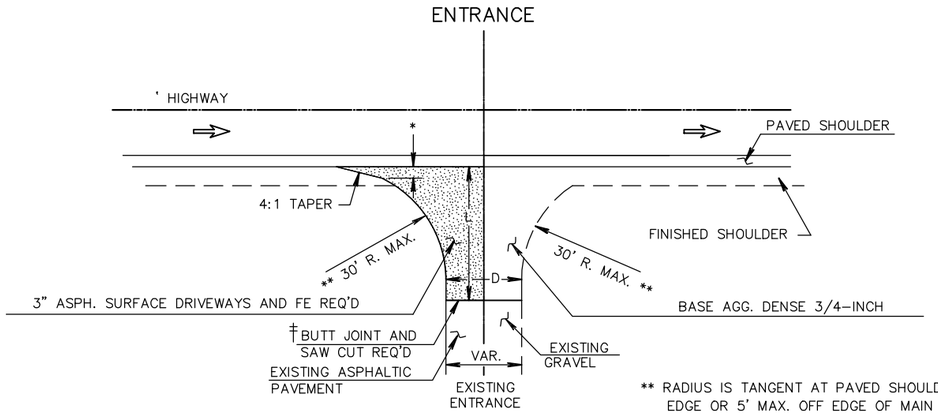
TYPICAL DRIVEWAY DETAIL
(NON–COMMERCIAL RURAL)
TRANS 231.05



TYPICAL CROSS SECTION



PROFILE VIEW



L=VARIABLE, EXACT LENGTH TO BE DETERMINED IN THE FIELD BY THE ENGINEER. BLEND BACK ON THE ENTRANCE FAR ENOUGH TO GET A SMOOTH PROFILE.

D=DRIVEWAY WIDTH
D=20'TYP.(PE's & FE's) (16'MIN.–24'MAX.)
D=28'TYP.(CE's & FARM ENT.) (35'MAX.)

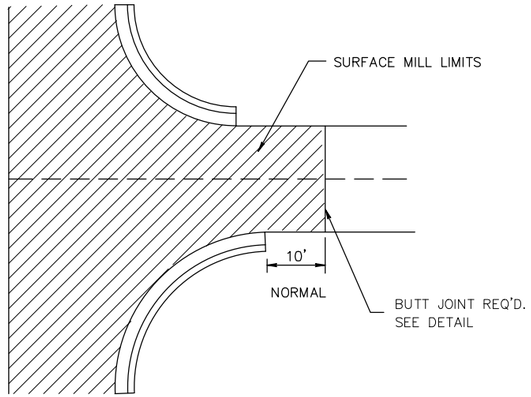
** RADIUS IS TANGENT AT PAVED SHOULDER EDGE OR 5' MAX. OFF EDGE OF MAIN LINE PAVEMENT WHICH EVER IS LESS. 40' MAX. FOR COMM. RURAL

* 3' MAX. OR TO FINISHED SHOULDER WHICH EVER IS LESS.

‡BUTT JOINT IS INCIDENTAL TO THE ITEM OF ASPH. SURFACE DRIVEWAYS AND FE.

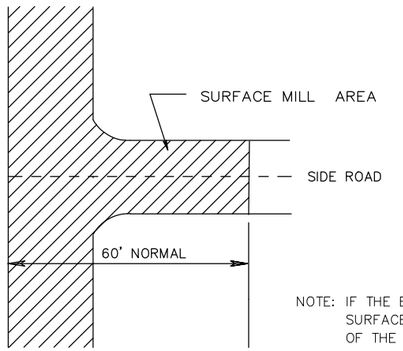
PLAN VIEW

RURAL DRIVEWAY INTERSECTION DETAIL
(PE's, FE's & CE'S)

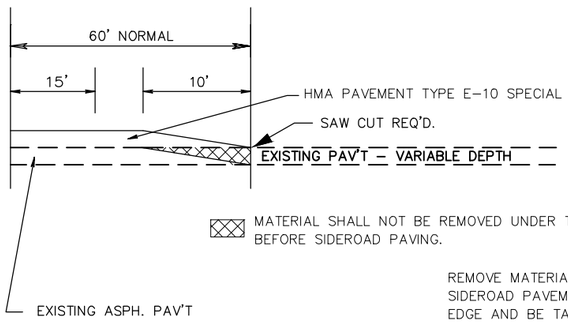


SIDEROAD DETAIL – CURB & GUTTER TO REMAIN

STH 53



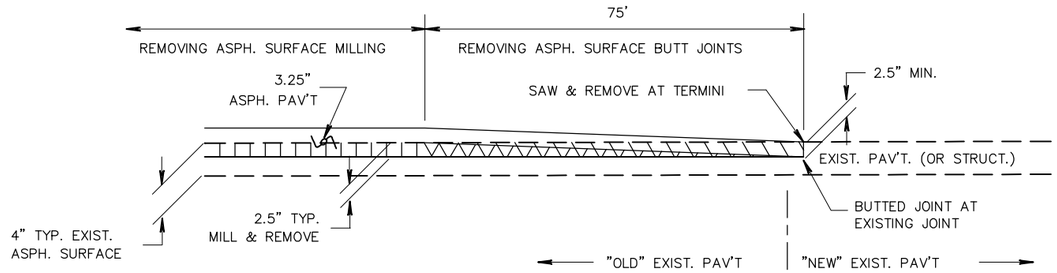
NOTE: IF THE EXISTING SIDEROAD CONSISTS OF A BASE COURSE SURFACE, THE NEW ASPHALT SHALL BE PLACED TO THE ENDS OF THE EXISTING SIDEROAD RADII.



MATERIAL SHALL NOT BE REMOVED UNDER THIS ITEM UNTIL 24 HOURS BEFORE SIDEROAD PAVING.

REMOVE MATERIAL UNDER ITEM 'REMOVING ASPHALT SURFACE BUTT JOINTS' SIDEROAD PAVEMENT DEPTH SHALL MATCH AT MAINLINE PAVEMENT EDGE AND BE TAPERED TO 2" MIN./3" DESIRED AT JOINT. IF SIDEROAD PAVEMENT DEPTH IS GREATER THAN 3", MATCH SIDEROAD DEPTH.

SIDE ROAD DETAIL – NO CURB & GUTTER



REMOVING ASPH. SURFACE BUTT JOINTS

WEDGING W/ HMA

BUTT JOINT DETAIL
MAINLINE

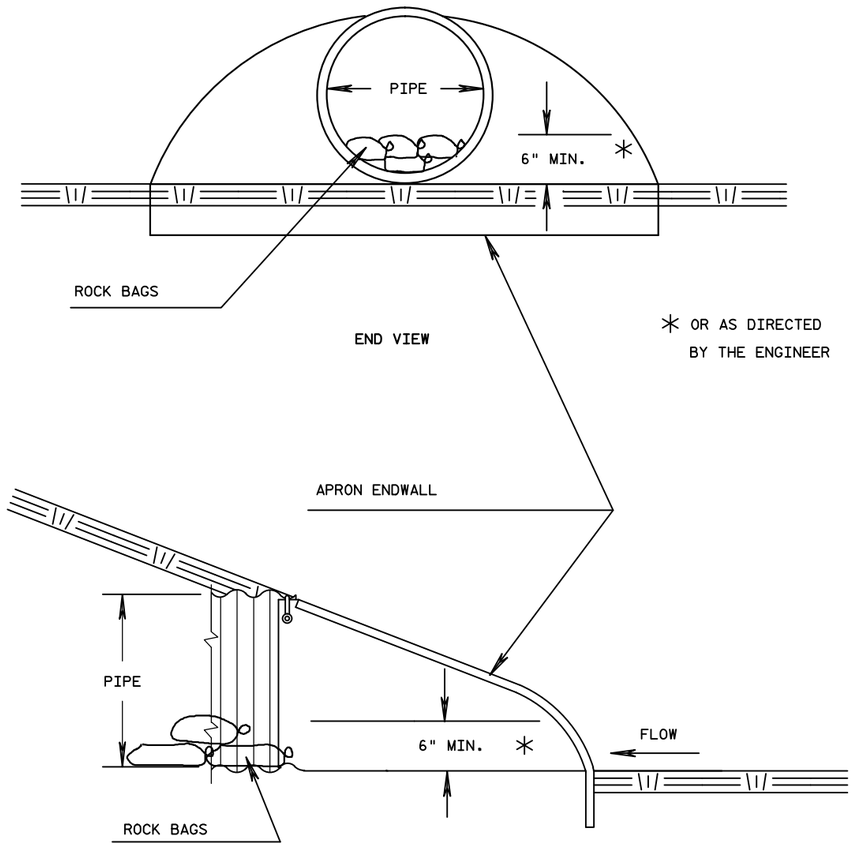
SAW CUTS (AS A SEPARATE PAY ITEM) WILL BE REQUIRED AT ALL BUTT JOINTS.

CONSTRUCTION AND REMOVAL OF ALL TEMPORARY RAMPING (PAPER JOINTS, ETC.) FOR MAINTAINING TRAFFIC IS INCIDENTAL TO THE COST OF THE BUTT JOINT.

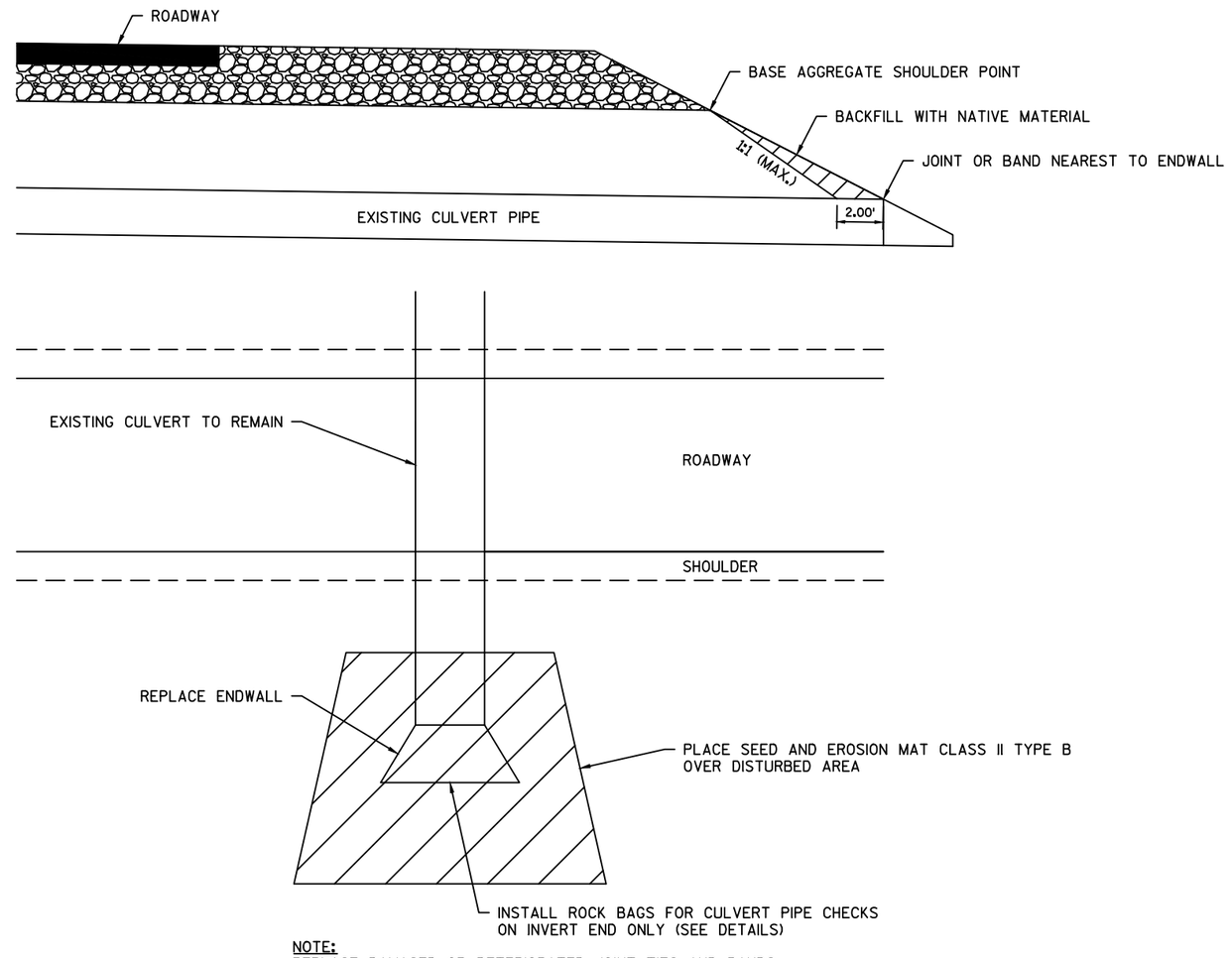
PAVEMENT REMOVED UNDER THE BUTT JOINT ITEM IS NOT ALSO PAID UNDER THE REMOVING ASPHALTIC SURFACE ITEM. IF BUTT JOINT PAVEMENT REMOVAL IS CONCURRENT TO REMOVING ASPHALTIC SURFACE MILLING WORK, IT IS ACCEPTABLE TO SUBTRACT THE BUTT JOINT TONNAGE FROM THE MILLING BY A NOMINAL CALCULATION RATHER THAN MEASURING THE MATERIAL SEPARATELY.

SEE TYPICAL SECTIONS FOR PAVEMENT TYPE.

35' MIN. LENGTH DETERMINED BY FDM 11-10-5.4 TABLE 5.8.



CULVERT PIPE CHECK



NOTE:
REPLACE DAMAGED OR DETERIORATED JOINT TIES AND BANDS,
ITEMS PAID FOR UNDER ASSOCIATED ENDWALL ITEM.

TYPICAL ENDWALL REPLACEMENT DETAIL

SEE PLAN SHEETS FOR LOCATIONS

2

GENERAL NOTES

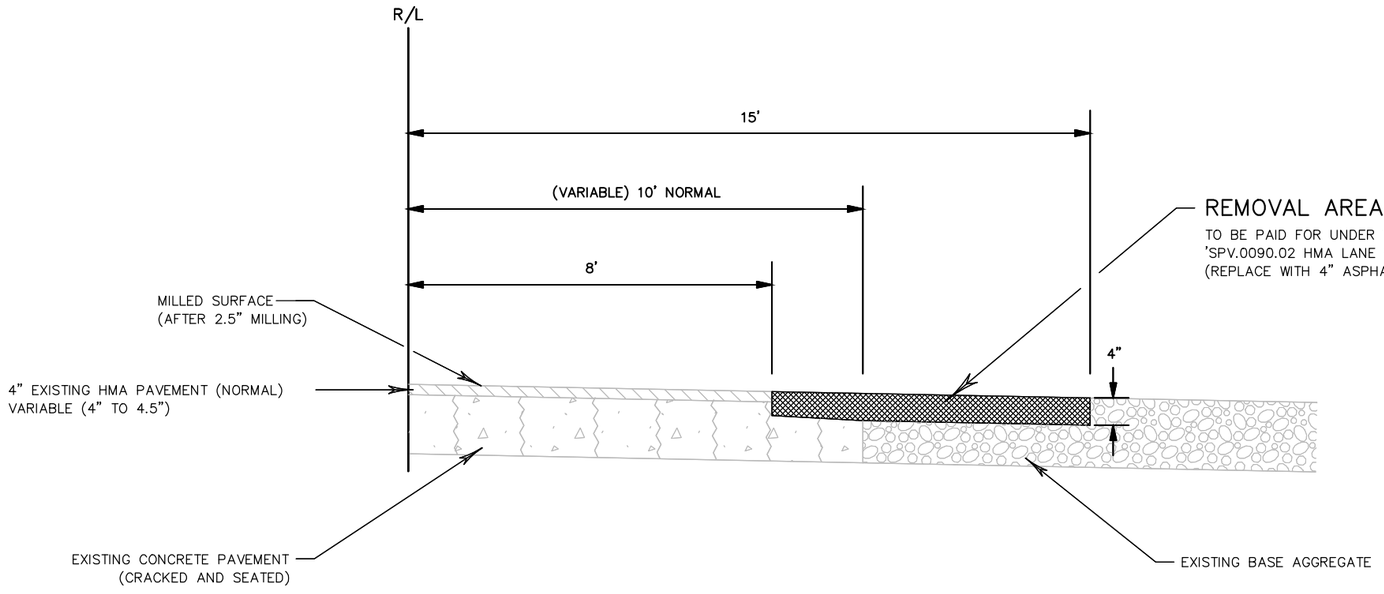
EXACT LOCATIONS OF HMA LANE REPAIR TO BE DETERMINED BY THE ENGINEER IN THE FIELD.

REMOVAL AREA MAY CONSIST OF ANY COMBINATION OF CONCRETE PAVEMENT, ASPHALTIC PAVEMENT, AND/OR BASE AGGREGATE.

DIMENSIONS SHOWN ON THIS DETAIL SHOW ANTICIPATED CONDITIONS. ACTUAL CONDITIONS ENCOUNTERED IN THE FIELD MAY VARY.

REMOVAL AREAS SHALL BE REPAVED IN THE SAME DAY AS BEING REMOVED/MILLED PRIOR TO SUSPENSION OF WORK FOR THAT DAY.

ASPHALTIC SURFACE FOR HMA REPAIR MAY BE PLACED IN ONE 4–INCH LIFT.



HMA LANE REPAIR DETAIL

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	LANE REPAIR DETAIL	SHEET 25	E

2

DEWEY STREET

GAS STATION ENTRANCE

STH 121 EB

STH 121 WB

GAS STATION ENTRANCE

APPROX. RR R/W

ACCESS/PARKING FOR NAT. REGISTER DEPOT (TO REMAIN)

BP: 8+00.00

8+00

WCL

APPROX. RR R/W

N

THE CONCRETE CURB AND GUTTER 6-INCH NON-MOUNTABLE 30-INCH TYPE D SPECIAL MUST BE FINISHED AS A 6-INCH OR GREATER VERTICAL FACE.

THE EFFECTIVE LENGTH OF THE CONCRETE CURB AND GUTTER 6-INCH NON-MOUNTABLE 30-INCH TYPE D SPECIAL (BEGIN 6-INCH VERTICAL CURB TO GATE CROSSING POINT) IS CRITICAL. THIS LENGTH DOES NOT INCLUDE THE CONCRETE MEDIAN SLOPED NOSE OR ANY BARRIER CURB BETWEEN THE GATE AND THE TRACK.

THE REQUIRED DISTANCE OF 61.00 LF HAS BEEN INCREASED TO 62.00 LF TO ACCOUNT FOR CONSTRUCTION TOLERANCES. UNDER NO CIRCUMSTANCES WILL A LENGTH OF LESS THAN 61.00 LF BE ACCEPTED.

CONC ASPH 10' MIN. (RAIL-CONC SW) 12.5' TYP. ASPH CONC

*14.5'

GATE

4'

USH 53 SB

5' TYP.

82'

114+00

115+00

116+00

117+00

118+00

MAIN STREET

119+00

62'

USH 53 NB

00+00

GATE

7'

CONC ASPH ASPH CONC

*14.5' IS FOR 12.5' MIN. RAIL TO FLAG OF CURB (NOT SHOWN)

ALLOW FOR VEHICLES TO ACCESS BANK DRIVE-THROUGH

SOUTH MEDIAN 82' LENGTH ALSO ACCOMODATES OSOW-MT VEHICLES FOR STH 121 TO USH 53.

PAVEMENT IN SAME PLANE AS RAILROAD TRACK, 7' OFF ℄ AT BACK-OF-CURB, NORMAL TO ROADWAY.

00+11

APPROX. RR R/W

APPROX. RR R/W

BANK DRIVE-THROUGH

BANK DRIVE-THROUGH

BANK DRIVE-THROUGH

DODGE STREET

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN: C WHITEHALL RR CROSSING (281794J)	SHEET 26	E

2

DEWEY STREET

STH 121 EB

STH 121 WB

APPROX. RR R/W

BP: 8+00.00

8+00

WCL

9+00

APPROX. RR R/W

N

THE CONCRETE CURB AND GUTTER 6-INCH NON-MOUNTABLE 30-INCH TYPE D SPECIAL MUST BE FINISHED AS A 6-INCH OR GREATER VERTICAL FACE.

THE EFFECTIVE LENGTH OF THE CONCRETE CURB AND GUTTER 6-INCH NON-MOUNTABLE 30-INCH TYPE D SPECIAL (BEGIN 6-INCH VERTICAL CURB TO GATE CROSSING POINT) IS CRITICAL. THIS LENGTH DOES NOT INCLUDE THE CONCRETE MEDIAN SLOPED NOSE OR ANY BARRIER CURB BETWEEN THE GATE AND THE TRACK.

THE REQUIRED DISTANCE OF 61.00 LF HAS BEEN INCREASED TO 62.00 LF TO ACCOUNT FOR CONSTRUCTION TOLERANCES. UNDER NO CIRCUMSTANCES WILL A LENGTH OF LESS THAN 61.00 LF BE ACCEPTED.

ACCESS/PARKING FOR NAT. REGISTER DEPOT (TO REMAIN)

10' MIN. (RAIL-CONC SW)

12.5' TYP.

ASPH

ASPH

INSTALL 3" CONCRETE SIDEWALK, 4' WIDE

INSTALL TYPE 1 CONCRETE MEDIAN NOSE

5' TYP.

82'

*14.5'

GATE

4'

USH 53 SB

INSTALL TYPE 1 CONCRETE MEDIAN NOSE

114+00

115+00

116+00

117+00

118+00

MAIN STREET

119+00

SAN

SAN

SAN

62'

USH 53 NB

INSTALL 6" CONCRETE SIDEWALK, 4' WIDE

INSTALL TYPE 2 CONCRETE MEDIAN NOSE

INSTALL TYPE 2 CONCRETE MEDIAN NOSE

GATE

ASPH

ASPH

PAVEMENT IN SAME PLANE AS RAILROAD TRACK, 7' OFF ℄ AT BACK-OF-CURB, NORMAL TO ROADWAY.

10+00

APPROX. RR R/W

APPROX. RR R/W

BANK DRIVE-THROUGH

BANK DRIVE-THROUGH

BANK DRIVE-THROUGH

DODGE STREET

*14.5' IS FOR 12.5' MIN. RAIL TO FLAG OF CURB (NOT SHOWN)

MEDIAN LENGTHS SHOWN ARE MINIMUM. PROPOSED LENGTHS WILL BE FINE-TUNED IN FINAL DESIGN.

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN: C WHITEHALL RR CROSSING (281794J)	SHEET 27	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\021001_CD-RAILROAD.DWG LAYOUT: 01 DATE: 10/28/2015 2:26 PM PLOT BY: DAVIS, TERESA L PLOT DATE : 10/28/2015 2:26 PM PLOT BY : DAVIS, TERESA L PLOT NAME : 16300271_pln PLOT SCALE : 1:40_XREF

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
	2+00.00'	Begin Alignment	-4.00%	-2.00%	-4.00%	-2.00%
1	15+55.73'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
1	15+55.73'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	16+06.96'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	16+58.19'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	17+09.42'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	17+52.96'	Begin Full Super	5.70%	5.70%	-5.70%	-5.70%
1	22+38.84'	End Full Super	5.70%	5.70%	-5.70%	-5.70%
1	22+82.38'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	23+33.61'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	23+84.84'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	24+36.07'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	24+36.07'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
	31+87.20'	End Alignment	-4.00%	-2.00%	-4.00%	-2.00%

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
	101+00.00'	Begin Alignment	-4.00%	-2.00%	-4.00%	-2.00%
1	10+08.49'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
1	10+08.49'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	10+61.83'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	11+15.16'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	11+68.49'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	12+21.83'	Begin Full Super	6.00%	6.00%	-6.00%	-6.00%
1	33+47.67'	End Full Super	6.00%	6.00%	-6.00%	-6.00%
1	34+01.01'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	34+54.34'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	35+07.67'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	35+61.01'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	35+61.01'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
2	76+60.53'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
2	76+60.53'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
2	77+13.86'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
2	77+67.19'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
2	78+20.53'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
2	78+33.86'	Begin Full Super	-4.50%	-4.50%	4.50%	4.50%
2	92+25.87'	End Full Super	-4.50%	-4.50%	4.50%	4.50%
2	92+39.21'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
2	92+92.54'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
2	93+45.87'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
2	93+99.21'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
2	93+99.21'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
3	147+72.84'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
3	147+72.84'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
3	148+26.17'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
3	148+79.51'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
3	149+32.84'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
3	149+46.17'	Begin Full Super	-4.50%	-4.50%	4.50%	4.50%
3	163+96.22'	End Full Super	-4.50%	-4.50%	4.50%	4.50%
3	164+09.55'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
3	164+62.89'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
3	165+16.22'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
3	165+69.55'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
3	165+69.55'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
4	187+38.27'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
4	187+38.27'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
4	187+91.42'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
4	188+44.58'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
4	188+92.42'	Begin Full Super	3.80%	3.80%	-4.00%	-3.80%
4	203+41.78'	End Full Super	3.80%	3.80%	-4.00%	-3.80%
4	203+89.62'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
4	204+42.78'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
4	204+95.94'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
4	204+95.94'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
5	220+87.15'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
5	220+87.15'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
5	221+40.48'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
5	221+93.82'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
5	222+12.48'	Begin Full Super	2.70%	2.70%	-4.00%	-2.70%
5	226+86.83'	End Full Super	2.70%	2.70%	-4.00%	-2.70%
5	227+05.50'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
5	227+58.83'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
5	228+12.17'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
5	228+12.17'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
6	295+07.90'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
6	295+07.90'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
6	295+61.23'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
6	296+14.56'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
6	296+67.90'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
6	296+97.23'	Begin Full Super	-5.10%	-5.10%	5.10%	5.10%
6	312+66.19'	End Full Super	-5.10%	-5.10%	5.10%	5.10%
6	312+95.53'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
6	313+48.86'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
6	314+02.19'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
6	314+55.53'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
6	314+55.53'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%

2

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
7	325+57.27'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
7	325+57.27'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
7	326+10.43'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
7	326+63.59'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
7	327+11.43'	Begin Full Super	3.80%	3.80%	-4.00%	-3.80%
7	334+66.03'	End Full Super	3.80%	3.80%	-4.00%	-3.80%
7	335+13.87'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
7	335+67.03'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
7	336+20.18'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
7	336+20.18'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
8	342+58.62'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
8	342+58.62'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
8	343+11.95'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
8	343+65.28'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
8	343+83.95'	Begin Full Super	2.70%	2.70%	-4.00%	-2.70%
8	345+57.29'	End Full Super	2.70%	2.70%	-4.00%	-2.70%
8	345+75.96'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
8	346+29.29'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
8	346+82.62'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
8	346+82.62'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
9	363+51.58'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
9	363+51.58'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
9	364+04.91'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
9	364+58.24'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
9	365+11.58'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
9	365+64.91'	Begin Full Super	-6.00%	-6.00%	6.00%	6.00%
9	367+84.81'	End Full Super	-6.00%	-6.00%	6.00%	6.00%
9	368+38.14'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
9	368+91.48'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
9	369+44.81'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
9	369+98.14'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
9	369+98.14'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
	2+54.77'	End Alignment	-4.00%	-2.00%	-4.00%	-2.00%

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
	2+00.00'	Begin Alignment	-4.00%	-2.00%	-4.00%	-2.00%
1	15+55.73'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
1	15+55.73'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	16+06.96'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	16+58.19'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	17+09.42'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	17+52.96'	Begin Full Super	5.70%	5.70%	-5.70%	-5.70%
1	22+38.84'	End Full Super	5.70%	5.70%	-5.70%	-5.70%
1	22+82.38'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	23+33.61'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	23+84.84'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	24+36.07'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	24+36.07'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
	31+87.20'	End Alignment	-4.00%	-2.00%	-4.00%	-2.00%

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
	101+00.00'	Begin Alignment	-4.00%	-2.00%	-4.00%	-2.00%
1	10+08.49'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
1	10+08.49'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	10+61.83'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	11+15.16'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	11+68.49'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	12+21.83'	Begin Full Super	6.00%	6.00%	-6.00%	-6.00%
1	33+47.67'	End Full Super	6.00%	6.00%	-6.00%	-6.00%
1	34+01.01'	Low Shoulder Match	4.00%	4.00%	-4.00%	-4.00%
1	34+54.34'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
1	35+07.67'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
1	35+61.01'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
1	35+61.01'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
2	76+60.53'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
2	76+60.53'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
2	77+13.86'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
2	77+67.19'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
2	78+20.53'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
2	78+33.86'	Begin Full Super	-4.50%	-4.50%	4.50%	4.50%
2	92+25.87'	End Full Super	-4.50%	-4.50%	4.50%	4.50%
2	92+39.21'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
2	92+92.54'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
2	93+45.87'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
2	93+99.21'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
2	93+99.21'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
3	147+72.84'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
3	147+72.84'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
3	148+26.17'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
3	148+79.51'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
3	149+32.84'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
3	149+46.17'	Begin Full Super	-4.50%	-4.50%	4.50%	4.50%
3	163+96.22'	End Full Super	-4.50%	-4.50%	4.50%	4.50%
3	164+09.55'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
3	164+62.89'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
3	165+16.22'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
3	165+69.55'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
3	165+69.55'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
4	187+38.27'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
4	187+38.27'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
4	187+91.42'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
4	188+44.58'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
4	188+92.42'	Begin Full Super	3.80%	3.80%	-4.00%	-3.80%
4	203+41.78'	End Full Super	3.80%	3.80%	-4.00%	-3.80%
4	203+89.62'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
4	204+42.78'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
4	204+95.94'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
4	204+95.94'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
5	220+87.15'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
5	220+87.15'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
5	221+40.48'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
5	221+93.82'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
5	222+12.48'	Begin Full Super	2.70%	2.70%	-4.00%	-2.70%
5	226+86.83'	End Full Super	2.70%	2.70%	-4.00%	-2.70%
5	227+05.50'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
5	227+58.83'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
5	228+12.17'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
5	228+12.17'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
6	295+07.90'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
6	295+07.90'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
6	295+61.23'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
6	296+14.56'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
6	296+67.90'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
6	296+97.23'	Begin Full Super	-5.10%	-5.10%	5.10%	5.10%
6	312+66.19'	End Full Super	-5.10%	-5.10%	5.10%	5.10%
6	312+95.53'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
6	313+48.86'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
6	314+02.19'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
6	314+55.53'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
6	314+55.53'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%

2

Superelevation Region	Station	Description	Left Outside Shoulder	Left Outside Lane	Right Outside Shoulder	Right Outside Lane
7	325+57.27'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
7	325+57.27'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
7	326+10.43'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
7	326+63.59'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
7	327+11.43'	Begin Full Super	3.80%	3.80%	-4.00%	-3.80%
7	334+66.03'	End Full Super	3.80%	3.80%	-4.00%	-3.80%
7	335+13.87'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
7	335+67.03'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
7	336+20.18'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
7	336+20.18'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
8	342+58.62'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
8	342+58.62'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
8	343+11.95'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
8	343+65.28'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
8	343+83.95'	Begin Full Super	2.70%	2.70%	-4.00%	-2.70%
8	345+57.29'	End Full Super	2.70%	2.70%	-4.00%	-2.70%
8	345+75.96'	Reverse Crown	2.00%	2.00%	-4.00%	-2.00%
8	346+29.29'	Level Crown	0.00%	0.00%	-4.00%	-2.00%
8	346+82.62'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
8	346+82.62'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
9	363+51.58'	End Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
9	363+51.58'	End Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
9	364+04.91'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
9	364+58.24'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
9	365+11.58'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
9	365+64.91'	Begin Full Super	-6.00%	-6.00%	6.00%	6.00%
9	367+84.81'	End Full Super	-6.00%	-6.00%	6.00%	6.00%
9	368+38.14'	Low Shoulder Match	-4.00%	-4.00%	4.00%	4.00%
9	368+91.48'	Reverse Crown	-4.00%	-2.00%	2.00%	2.00%
9	369+44.81'	Level Crown	-4.00%	-2.00%	0.00%	0.00%
9	369+98.14'	Begin Normal Crown	-4.00%	-2.00%	-4.00%	-2.00%
9	369+98.14'	Begin Normal Shoulder	-4.00%	-2.00%	-4.00%	-2.00%
	2+54.77'	End Alignment	-4.00%	-2.00%	-4.00%	-2.00%



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 34	E

2

LEGEND

INLET PROTECTION TYPE C

INLET PROTECTION TYPE A

LINCOLN STREET

HOBSON STREET

STH 121/DEWEY STREET

BP: 101+00.00

EQUATION

US 53/MAIN STREET

101

105

110

115

BP: 2+00.00

EP: 281+88.42

US 53/ERVIN STREET

KELLEY STREET

WCR RR

DODGE STREET

SCRANTON STREET

BLAIR STREET

PI: 9+35.02

120

NO°08'20.74"W

2292.20'

10

NO°08'20.74"W

233.48'

15

STA BACK = 123+92.20

STA AHEAD = 9+35.02

PC: 11+68.50

N

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 35	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:49 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

WISDOT/CADDS SHEET 44

2

2

TREMPEALEAU RIVER

EROSION CONTROL TIED WITH PROJECT 1630-01-73, TREMPEALEAU RIVER BRIDGE B-61-00050

NORTH RIVER ROAD

USH 53/STH 121

20

25

30

SEE DETAIL DRAWING FOR EROSION CONTROL

N

CTH D

SILT FENCE

PI: 33+32.00

35

N89°09'39.26"E

597.10'

PT: 34+01.00

STA BACK = 39+98.10

STA AHEAD = 33+32.00

EQUATION

35

N89°09'39.26"E

4461.86'

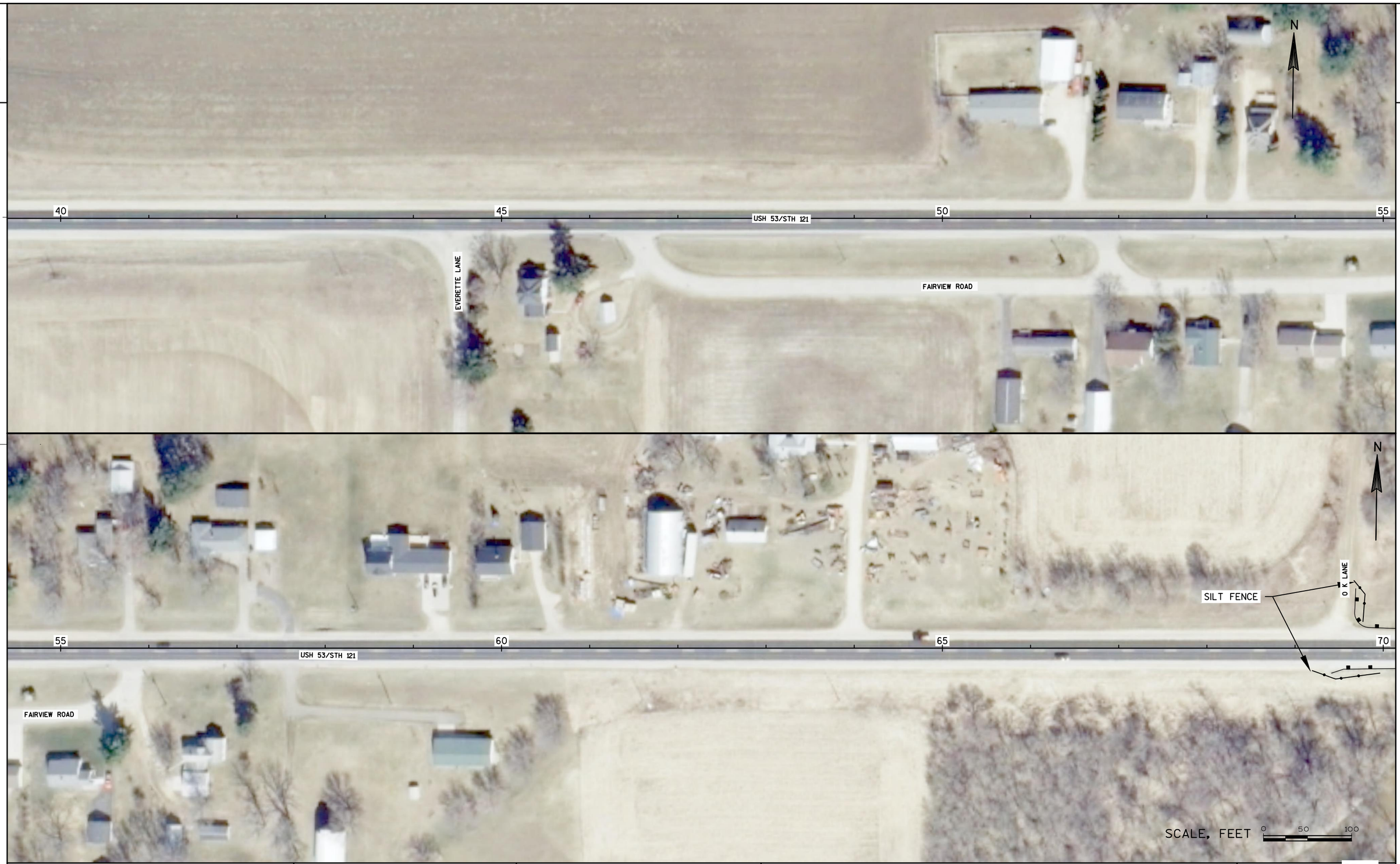
USH 53/STH 121

40

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 36	E

2



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 37 E



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 38 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:53 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

Xref ..±..±PSandE±BaseData±Other±ref-tre-cross-drains.dwg

2



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 39 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:53 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

2



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 40 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:54 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

2

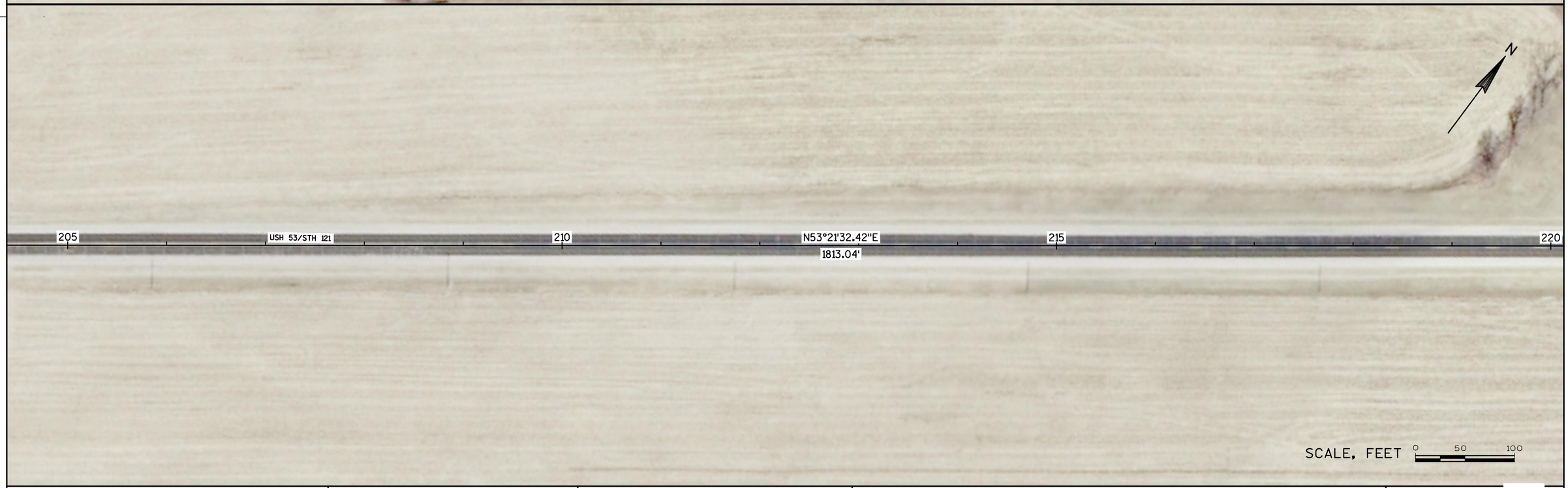


PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 41 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:54 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

2





PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 42 E

2



2

PROJECT NO:1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 43 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:55 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

WISDOT/CADDS SHEET 44

2



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 44 E

2



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 45 E

2

2

PT: 313+11.52

310

315

USH 53/STH 121

N19°5 320'1"E

1366.25'

325

N

FULLER COULEE ROAD

330

335

325

USH 53/STH 121

PC: 326+77.77

STA BACK = 330+00.00

STA AHEAD = 329+80.00

PT: 334+99.69

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 46 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:56 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

2

LEGEND
INLET PROTECTION TYPE C

N32°55'09.87"E
860.26'

340

USH 53/STH 121

345

PC: 343+59.95

PT: 345+81.29

DUDLEY LANE

HEGGE COULEE CREEK

N35°07'57.91"E
496.16'

350

PI: 350+77.45

ANDERSON STREET

355

N34°33'53.16"E
1434.13'

360

USH 53/STH 121

365

PC: 365+11.58

PT: 368+38.14

370

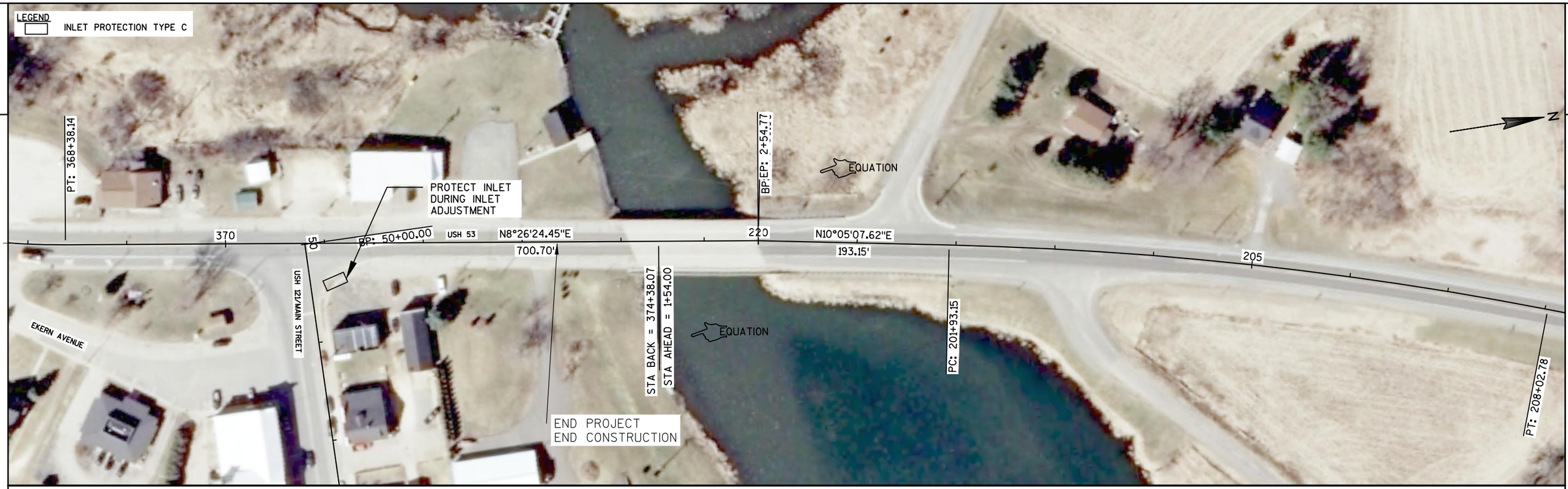
EKERN AVENUE

CTH W

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 47 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\022001_EC.DWG PLOT DATE : 11/2/2015 7:56 AM PLOT BY : DAVIS, TERESA L PLOT NAME : _____ PLOT SCALE : 1:100_XREF



SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL	SHEET 48 E

GENERAL NOTES

RESHAPE & SEED/FERTILIZE (WITHOUT EXCAVATING PAST 1.0 FOOT DEPTH) ANY PREVIOUSLY GRASSED AREAS THAT ARE DISTURBED BY OPERATIONS AND LOCATIONS SHOWN REQUIRING "TOPSOIL".

MULCH ALL SEED/FERTILIZED AREAS THAT DO NOT HAVE EROSION MAT INSTALLED.

REMOVAL OF ANY SURVEY MARKER REQUIRES APPROVAL OF THE ENGINEER.

EXISTING RIGHT-OF-WAY SHOWN IS FROM RECORD DRAWING AND IS APPROXIMATE.

PROPOSED WORK WILL REQUIRE HAND-WORK AROUND TREES.

UTILITIES ARE NOT SHOWN

**** NO MATERIAL IS TO LEAVE SITE ****

N

30

APRON ENDWALL TO BE CLEANED OFF & MATERIAL SPREAD ON SITE

EQUIPMENT ACCESS

PLACE 1.0' ADDITIONAL DEPTH OF TOPSOIL TO ENHANCE EXISTING BERM AND EXTEND TO STA. 26+00, 100' RT

TOPSOIL

TOPSOIL & EROSION MAT

R/W

CITY OF WHITEHALL

N RIVER RD

TEMPORARY DITCH CHECKS

EQUIPMENT ACCESS

TOPSOIL & EROSION MAT

SILT FENCE

TEMPORARY DITCH CHECKS

NO CLEARING OR GRUBBING UNLESS DIRECTED BY ENGINEER.

25

USH 53

TEMPORARY DITCH CHECKS

R/W

CONSTRUCTION PERMIT REQUIRED FOR ANY WORK OFF WISDOT ROW. ENGINEER'S RESPONSIBILITY TO OBTAIN. IF PROPERTY OWNER WILL NOT AGREE TO A CONSTRUCTION PERMIT, WORK AT SITE LIMITED TO BE WITHIN WISDOT ROW.

PROPERTY OWNERS
DAVID & LINDA SCHAEFER
18305 PARK RIDGE RD
WHITEHALL, WI 54773
(715) 538-4875

Imagery (c) 2012 GeoEye - (c) 2012 Google

PROJECT NO: 1630-02-01/71	HWY: USH 53	COUNTY: TREMPEALEAU	EROSION CONTROL PLAN - MAINTENANCE	SHEET 49	E

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

(1-100) SIGNS REFLECTIVE TYPE II

PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)

PROPOSED SIGNS ATTACHED TO TELEPHONE POLE

PROPOSED SIGNS ATTACHED TO STEEL POST

STA AHEAD = 13+57.45
STA BACK = 28+78.00

EQUATION

BEGIN CONSTRUCTION

PI = 14+76.88
PI Y = 438420.351
PI X = 858870.148
Δ = 84°09'00.00"
D = 4°00'00.00"
T = 1293.13
L = 2103.75

1-1 STOP SCHOOL BUS FLASHING RED LIGHTS R59-51 REPLACE

1-2 I55-56 REPLACE

1-3 Blair 7 Ettrick 16 Galesville 24 REPLACE

1-4 SOUTH 53 J4-1

1-5 STOP R1-1 REPLACE

LEE ST

REMOVE PRIVATE BUSINESS SIGN IF PRESENT

1-6 W1-2R REPLACE

PC: 17+04.30

OWEN ST

1-7 STOP R1-1 REPLACE

USH 53

ERVIN ST

1-8 SPEED LIMIT 40 R2-1

1-9 CITY SIGN. "NO TRUCKS USE OWEN STREET TO RIDGEVIEW". REMOVE AND RETURN TO CITY. SEE SPVS FOR CONTACT INFORMATION.

LEE ST

1-10 STOP R1-1 REPLACE

PC: 17+04.30

LOU BLVD

1-11 SPEED LIMIT 40 R2-1 REPLACE

1-12 STOP R1-1 REPLACE

ATV ROUTE AND DIRECTIONAL SIGNS, REMOVE AND RETURN TO CITY. REFER TO SPV FOR CONTACT INFORMATION.

1-13 STOP R1-1 REPLACE

ERVIN ST

USH 53

1-14 SPEED LIMIT 30 R2-1 REPLACE

1-15 NO PASSING ZONE W14-3 REPLACE

1504.30'

N89°53'59.26"E

R1-1: MOVING TYPE 2 SIGN FOR INTERSECTION RECONSTRUCTION

1-16 STOP R1-1 REPLACE

S ABRAMS ST

1-17 SOUTH 53 J4-1

1-18 SPEED LIMIT 30 R2-1 REPLACE

1-19 STOP R1-1 REPLACE

1-20 COUNTY D J12-1 53 J12-1 REPLACE

1-21 COUNTY D J12-1

1-34 STOP R1-1

1-33 RIGHT TURN NO STOP R1-51 REPLACE

1-22 SPEED LIMIT 30 R2-1 REPLACE

ROOSEVELT ST

1-23 STOP R1-1 REPLACE

1-24 SPEED LIMIT 30 R2-1 REPLACE

1-25 NO PASSING ZONE W14-3 REPLACE

SHERWOOD ST

1-26 STOP R1-1 REPLACE

1-27 JCT COUNTY D J1-1 REPLACE

1-28 W3-1 REPLACE

1-29 ONLY ONLY R3-8-D REPLACE

1-30 NORTH 53 J2-1

1-31 NO PARKING R7-51-L REPLACE

1-35 NORTH 53 J2-1

1-37 NO PARKING R7-51-L REPLACE

1-36 COUNTY D J13-1

1-32 NO PARKING R7-1-R REPLACE

MAIN ST

BP: 2+00.00

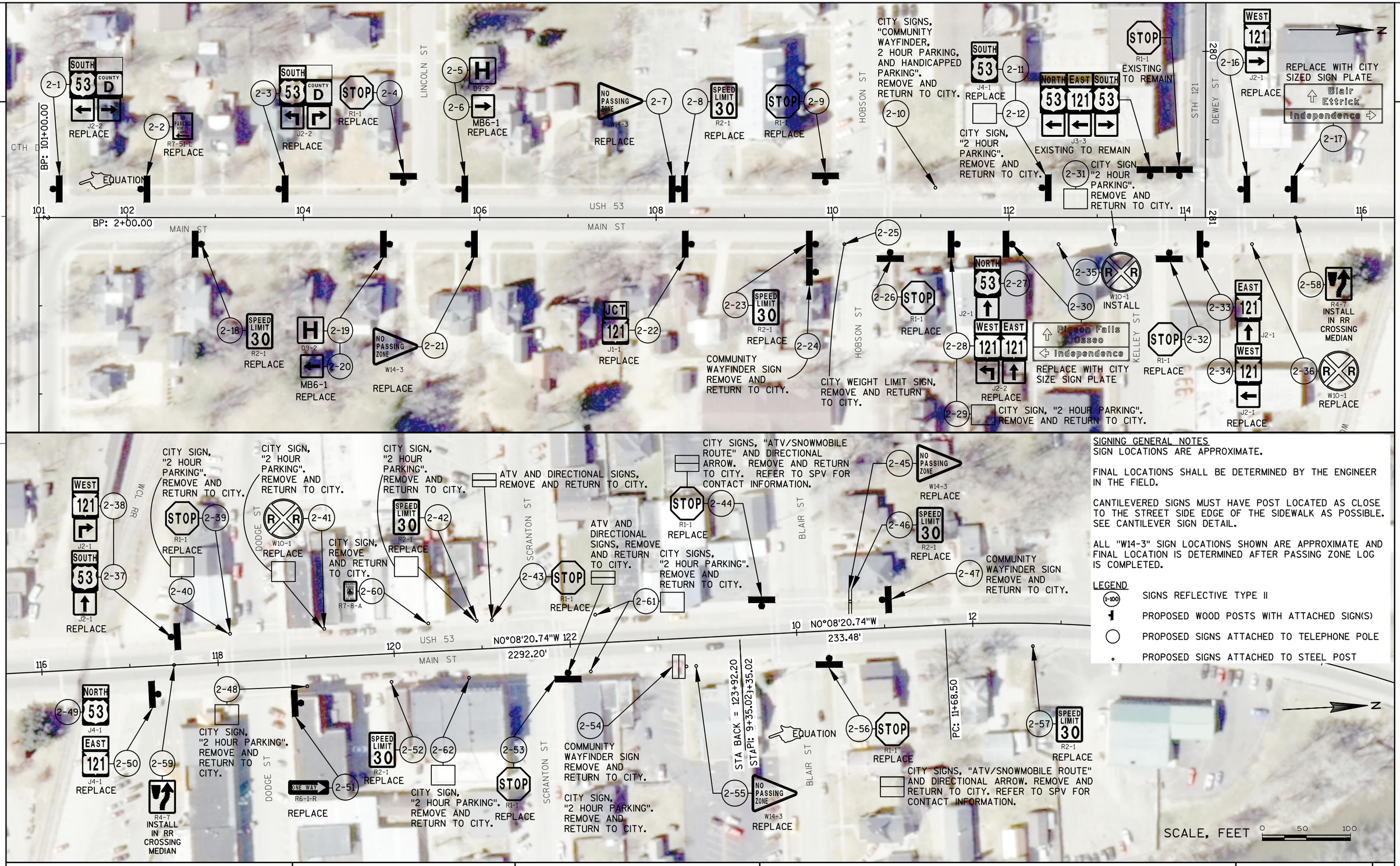
EQUATION

ORIENTATIONS OF ALL ASSEMBLIES SHALL BE COMPLETED AS SHOWN

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 50	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\023201_PS.DWG PLOT DATE : 11/2/2015 8:39 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : ********** WISDOT/CADDS SHEET 44



SIGNING GENERAL NOTES

SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\023201_PS.DWG PLOT DATE : 11/2/2015 8:26 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : ********** WISDOT/CADDS SHEET 44

CITY SIGNS, "ATV/STOP FOR PEDESTRIANS IN CROSSWALK". REMOVE AND RETURN TO CITY. REFER TO SPV FOR CONTACT INFORMATION.

3-1

TREMPEALEAU RIVER

SIGN TO BE RELOCATED TO STA 19+00 'R'

3-2 SPEED LIMIT 30 R2-1

3-3 Trempealeau River

REPLACE AND ADD SIGN TO SPEED LIMIT SIGN POST.

REMOVE STEEL POST

CITY SIGNS, "ATV/STOP FOR PEDESTRIANS IN CROSSWALK". REMOVE AND RETURN TO CITY. REFER TO SPV FOR CONTACT INFORMATION.

3-4

Whitehall POPULATION 1558

3-6 REPLACE

SPEED LIMIT 30 REMOVE

SPEED LIMIT 30 W3-5

3-5

DO NOT ENTER R5-1 REPLACE

3-7

3-8 STOP R1-1 REPLACE

N RIVER RD

3-9 W12-1D REPLACE

3-10 STOP R1-1 REPLACE

3-11 NO ENGINE BRAKING EXCEPT IN EMERGENCY R10-64 REPLACE

3-12 SPEED LIMIT 45 R2-1 REPLACE

SPEED REDUCTION AHEAD SIGN TO BE RELOCATED TO STA 23+50 'R'. DISTANCE FROM SPEED LIMIT SIGN TO THIS SIGN MUST BE GREATER THAN OR EQUAL TO 450 FEET. CONTRACTOR SHALL VERIFY THIS DISTANCE REQUIREMENT IS MET.

3-17 Pigeon Falls 7 Osseo 18 REPLACE

3-33 OFF-ROADWAY OPERATION OF MOTOR VEHICLES PROHIBITED EXCEPT IN EMERGENCY OR AS AUTHORIZED BY WIS. DOT R5-99 42"X24"

SPEED LIMIT 30 REMOVE

SPEED LIMIT 45 REMOVE

SPEED LIMIT 45 R2-1 3-13

SIGN TO BE RELOCATED TO STA 19+00 'R'

STOP SCHOOL BUS FLASHING RED LIGHTS R59-51 3-16 REPLACE

3-15 ADOPT A HIGHWAY SPONSOR BOY SCOUT TROOP 75 I55-56 SAVE SIGN AND REINSTALL

PI = 25+83.50
PI Y = 442356.127
PI X = 856063.152
Δ = 89°18'00.00"
D = 4°00'00.00"
T = 1415.00
L = 2232.50
R = 1432.394
PC = 11+68.50
PT = 34+01.00
SE = 6.3% (EXIST 6.3%)
RUNOFF (L) =

3-14 Trempealeau River REPLACE

SPEED LIMIT 55 R2-1 3-18 REPLACE

JCT COUNTY D J1-1 3-19 REPLACE

3-20 SPEED LIMIT 45 W3-5 REPLACE

3-21 SOUTH WEST 53 121 J4-2 REPLACE

3-22 53 121 COUNTY D J13-3 REPLACE

3-23 STOP R1-1 REPLACE

CTH D

PI: 33+32.00

3-24 COUNTY D J12-1 REPLACE

Strum 3-25 REPLACE

N89°09'39.26"E 597.10'

36 N89°09'39.. 4461.86

3-26 COUNTY D J12-1 REPLACE

PT: 34+01.00

3-27 W11-12 REPLACE

Strum 3-28 REPLACE

3-29 COUNTY D J13-1 REPLACE

STA BACK = 39+98.10
STA AHEAD = 33+32.00

EQUATION

3-30 W1-7 REPLACE

3-31 NORTH EAST 53 121 J4-2 REPLACE

3-32 NO PASSING ZONE W14-3 REPLACE

SIGNING GENERAL NOTES

SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST

N

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 52	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\023201_PS.DWG PLOT DATE : 11/2/2015 8:26 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1 in: 100 ft

WISDOT/CADDS SHEET 44

SIGNING GENERAL NOTES

SIGN LOCATIONS ARE APPROXIMATE.

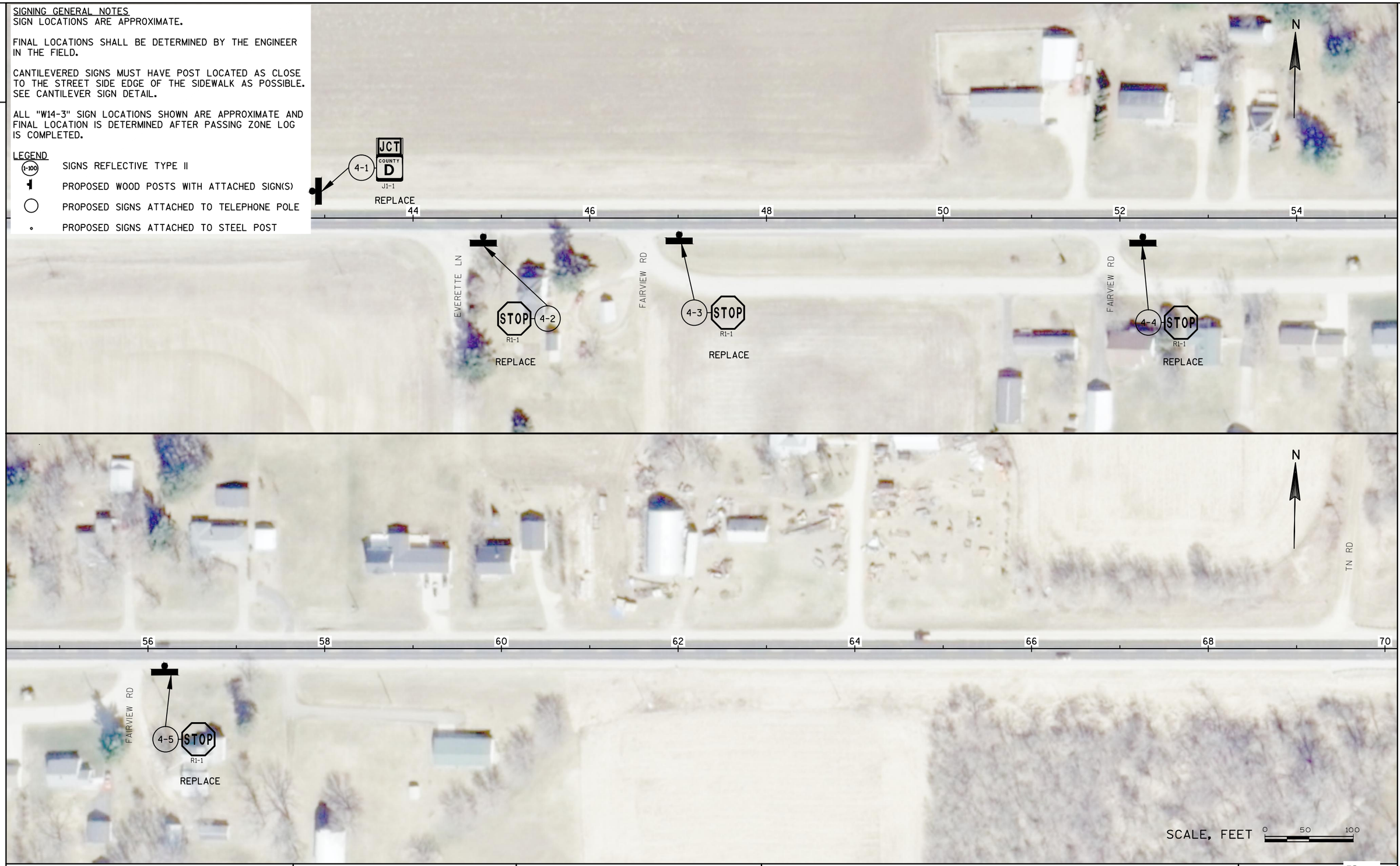
FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- (1-100) SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 53 E

2

2

PI = 85+46.50
PI Y = 442461.957
PI X = 863288.977
Δ = 29°26'24.30"
D = 2°00'00.00"
T = 752.63
L = 1472.00
R = 2864.789
PC = 77+93.86
PT = 92+65.87
SE = 4.0% (EXIST 4.0%)
RUNOFF (L) = 102'

N

TN RD

PIGEON CREEK

OK LN

SCHANGSBERG RD

PC: 77+93.86

PT: 92+65.87

5-1 STOP R1-1 REPLACE

5-2 NO PASSING ZONE W14-3 REPLACE

5-3 STOP R1-1 REPLACE

5-4 STOP R1-1 REPLACE

5-5 NO PASSING ZONE W14-3 REPLACE

5-6 Coral City UNINCORPORATED REPLACE

70 72 74 76 78 80 82 84 88 90 92 94 96 98 100

SCALE, FEET 0 50 100

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 54 E

2

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

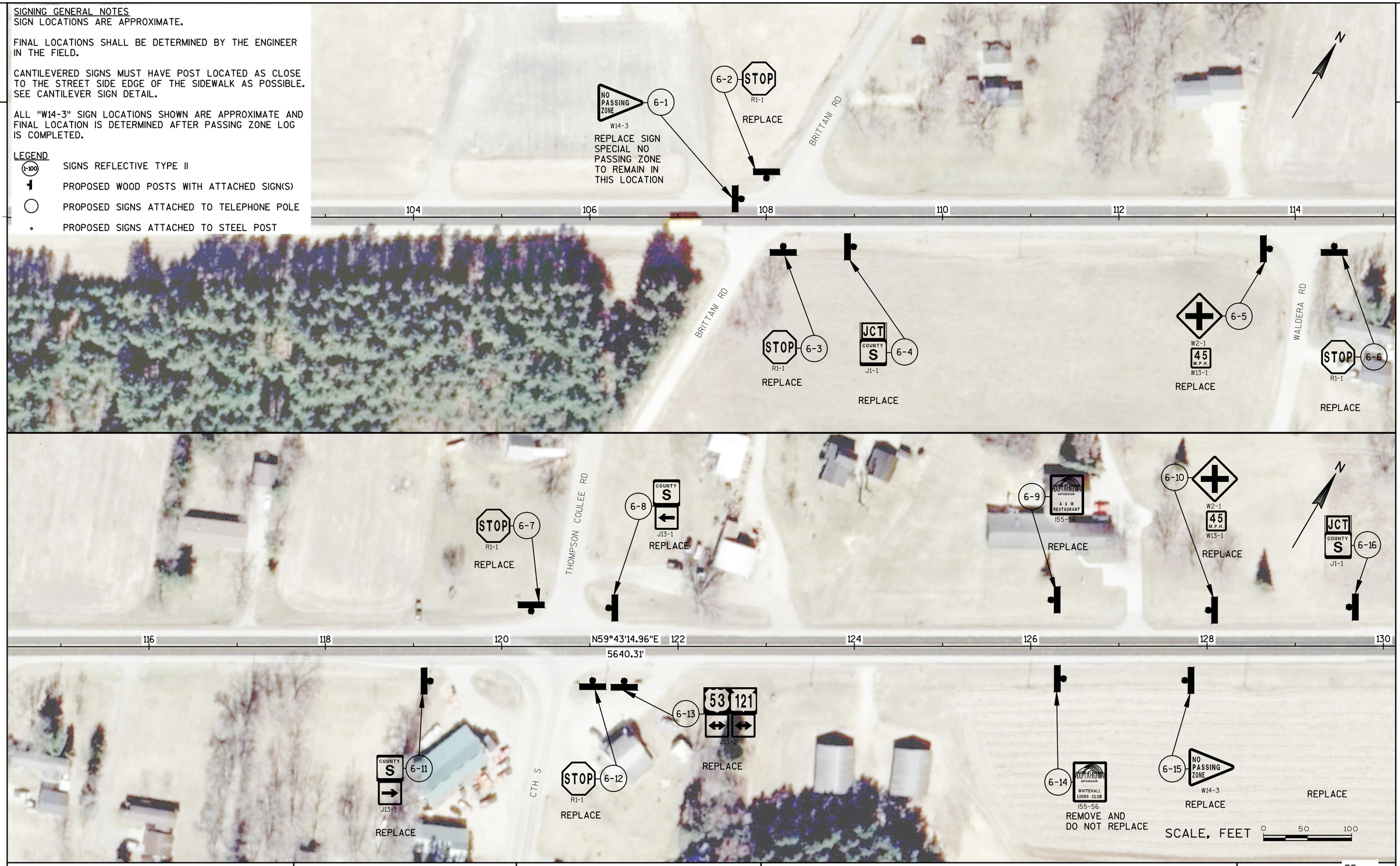
FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- (1-100) SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 55 E

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- (1-100) SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST

Coral City
UNINCORPORATED
7-1
REPLACE

7-2
NO PASSING ZONE
W14-3
REPLACE

134 136 138 140 142 144

NO PASSING ZONE
7-3
W14-3
REPLACE SIGN SPECIAL NO PASSING ZONE TO REMAIN IN THIS LOCATION

PC: 149+06.18

PI = 156+89.26
PI Y = 446080.209
PI X = 869486.041
Δ = 30°04'28.93"
D = 1°57'56.23"
T = 783.08
L = 1530.04
R = 2914.898
PC = 149+06.18
PT = 164+36.22
SE = 4.0% (EXIST 4.0%)
RUNOFF (L) = 102'

146 148 150 152 154 156 158 160

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 56 E

SIGNING GENERAL NOTES

SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

(1-100) SIGNS REFLECTIVE TYPE II

PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)

PROPOSED SIGNS ATTACHED TO TELEPHONE POLE

PROPOSED SIGNS ATTACHED TO STEEL POST

PT: 164+36.22

8-1 STOP R1-1 REPLACE

SIMONSON RD

164 166 168 170 172 174

8-2 SOUTH WEST 53 121 J4-2 REPLACE

8-3 NO PASSING ZONE W14-3 REPLACE

SIMONSON RD

176 178 180 182 184 186 188 190

N29°38'46.03"E 2422.55'

PC: 188+58.76

8-4 STOP R1-1 REPLACE

8-5 NO PASSING ZONE W14-3 REPLACE

8-6 NORTH EAST 53 121 J4-2 REPLACE

MC RAE LN

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 57 E

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

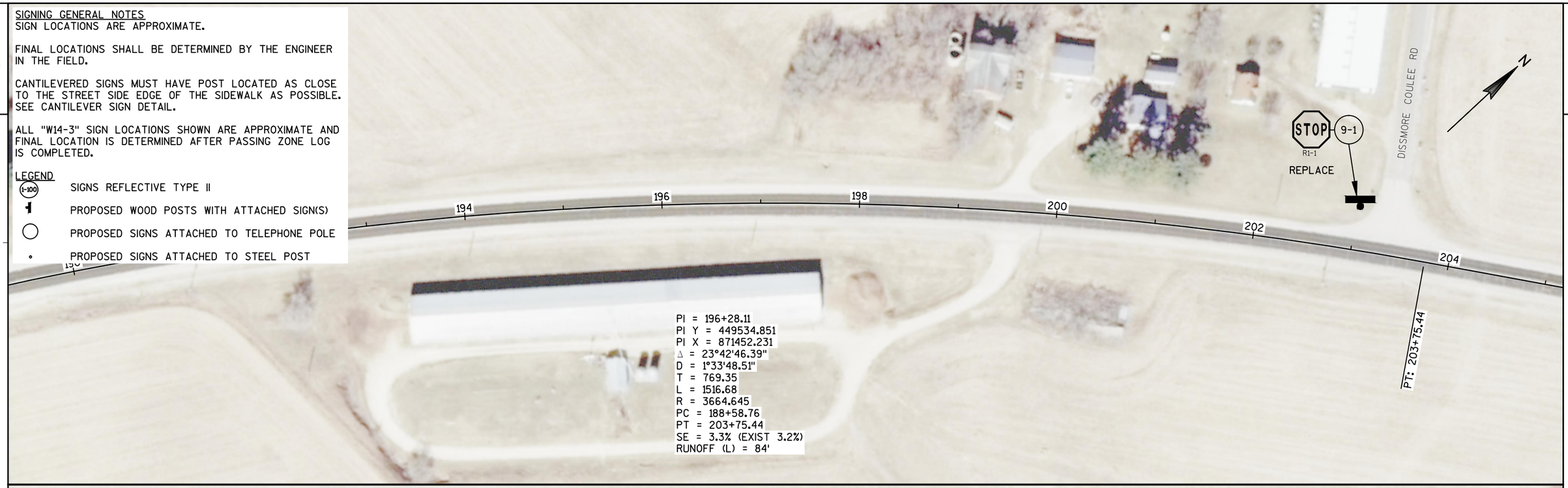
FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- (1-100) SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 58 E

2

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

(1-100) SIGNS REFLECTIVE TYPE II

PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)

PROPOSED SIGNS ATTACHED TO TELEPHONE POLE

PROPOSED SIGNS ATTACHED TO STEEL POST



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 59 E

2

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- (1-100) SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 60 E

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- (I-100) SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST

12-1 NO PASSING ZONE W14-3
REPLACE

284 286 288 290 292 294

REMOVE PRIVATE BUSINESS SIGNS IF PRESENT

PC: 296+51.90

PI = 305+19.44
PI Y = 455276.347
PI X = 880715.362
Δ = 41°12'39.21"
D = 2°28'59.35"
T = 867.54
L = 1659.62
R = 2307.380
PC = 296+51.90
PT = 313+11.52
SE = 4.6% (EXIST 4.5%)
RUNOFF (L) = 51'

296 298 300 302 304 306 308 310

FREMSTAD RD

STOP R1-1 12-2
REPLACE

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 61 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\023201_PS.DWG PLOT DATE : 11/2/2015 8:29 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : **********

WISDOT/CADDS SHEET 44

2

SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

(I-100) SIGNS REFLECTIVE TYPE II

PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)

PROPOSED SIGNS ATTACHED TO TELEPHONE POLE

PROPOSED SIGNS ATTACHED TO STEEL POST

PT: 313+11.52

314 316 318 322 324

N19°5 320i1"E
1366.25'

13-1 NO PASSING ZONE W14-3 REPLACE

13-2 NO PASSING ZONE W14-3 REPLACE

N

STOP R1-1 13-3 REPLACE

FULLER COULEE RD

13-4 SOUTH WEST 53 121 J4-2

13-5 Whitehall 7 Blair 15 REPLACE

326 328 330 332 334 336 338

USH 53
EKERN ST

N32°55'09.87"E
860.26'

PC: 326+77.77

STA BACK = 330+00.00
STA AHEAD = 329+80.00

PI = 330+80.56
PI Y = 457775.039
PI X = 881617.554
Δ = 13°03'59.36"
D = 1°33'07.15"
T = 422.79
L = 841.92
R = 3691.770
PC = 326+77.77
PT = 334+99.69
SE = 3.7% (EXIST 3.6%)
RUNOFF (L) = 94'

PT: 334+99.69

13-6 Pigeon Falls POPULATION 881 REPLACE

13-7 CITY SIGN, "VEHICLE NOISE LAWS ENFORCED". REMOVE AND RETURN TO CITY. REFER TO SPV FOR CONTACT INFORMATION.

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 62 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\023201_PS.DWG PLOT DATE : 11/2/2015 8:30 AM PLOT BY : DAVIS, TERESA L PLOT NAME : _____ PLOT SCALE : **********

WISDOT/CADDS SHEET 44

SIGNING GENERAL NOTES

SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

- SIGNS REFLECTIVE TYPE II
- PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
- PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
- PROPOSED SIGNS ATTACHED TO STEEL POST

14-1 W11-12 REPLACE

14-2 I55-56 REPLACE

14-3 SPEED LIMIT 55 R2-1 REPLACE

14-4 SPEED LIMIT 35 W3-5 REPLACE

14-5 NO PASSING ZONE W14-3 REPLACE

14-6 SPEED LIMIT 35 R2-1 REPLACE

14-7 JCT COUNTY W J1-1 REPLACE

14-8 STOP R1-1 REPLACE

14-9 COUNTY W J13-1 REPLACE

14-10 NO PASSING ZONE W14-3 REPLACE

14-11 SPEED LIMIT 35 R2-1 REPLACE

14-12 JCT COUNTY W J1-1 REPLACE

14-13

14-14 NO PARKING R7-1-R REPLACE

14-15 COUNTY W J13-1 REPLACE

14-16 STOP R1-1 REPLACE

14-17 53 J13-1 REPLACE

14-18 NORTH 53 J4-1 REPLACE

14-19 SPEED LIMIT 35 R2-1 REPLACE

14-20

14-21 EAST 121 NORTH 53 J2-1 REPLACE

14-22 NO PARKING R7-1-L

14-23 STOP R1-1 REPLACE

14-24 Osseo Northfield REPLACE

14-25 NO PARKING R7-1-D REPLACE

SOUTH WEST 53 121 J4-2

PC: 343+59.95

PI = 344+70.63
PI Y = 458944.92
PI X = 882374.94
Δ = 2°12'48.03"
D = 1°00'00.00"
T = 110.68
L = 221.33
R = 5729.578
PC = 343+59.95
PT = 345+81.29
SE = 2.4% (EXIST 2.4%)
RUNOFF (L) = 61'

PT: 345+81.29

DUDLEY LN

HEGGE COULEE CREEK

348°07'57.91"E
496.16'

PI: 350+77.45

ANDERSON ST

PI = 366+77.75
PI Y = 460759.105
PI X = 883632.125
Δ = 26°07'28.71"
D = 8°00'00.00"
T = 166.17
L = 326.56
R = 716.197
PC = 365+11.58
PT = 368+38.14
SE = N.C.% (EXIST N.C.%)

PC: 365+11.58

PT: 368+38.14

N34°33'58.16"E
1434.13'

USH 53

EKERN ST

EKERN AVE

CTH W

REMOVE AND MOVE NO PARKING SIGN TO ANOTHER POST

344 346 350 352 354 356 360 362 364 366 368 370

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 63 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\023201_PS.DWG PLOT DATE : 11/2/2015 8:30 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : **********

WISDOT/CADDS SHEET 44



SIGNING GENERAL NOTES
SIGN LOCATIONS ARE APPROXIMATE.

FINAL LOCATIONS SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

CANTILEVERED SIGNS MUST HAVE POST LOCATED AS CLOSE TO THE STREET SIDE EDGE OF THE SIDEWALK AS POSSIBLE. SEE CANTILEVER SIGN DETAIL.

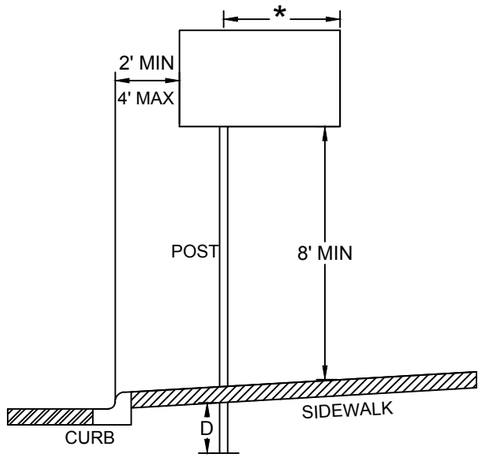
ALL "W14-3" SIGN LOCATIONS SHOWN ARE APPROXIMATE AND FINAL LOCATION IS DETERMINED AFTER PASSING ZONE LOG IS COMPLETED.

LEGEND

(1-100)	SIGNS REFLECTIVE TYPE II
1	PROPOSED WOOD POSTS WITH ATTACHED SIGN(S)
◯	PROPOSED SIGNS ATTACHED TO TELEPHONE POLE
∘	PROPOSED SIGNS ATTACHED TO STEEL POST

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	WHITEHALL - OSSEO PERMANENT SIGNING	SHEET 64 E



GENERAL NOTES

SIGNS WIDER THAN 4FEET OR LARGER THAN 20 SQ. FT SHALL BE MOUNTED ON MULTIPLE POSTS. REFER TO PLATE A4-4.

OFFSET DISTANCE SHALL BE CONSISTENT WITH EXISTING SIGNS OR CONSISTENT THROUGHOUT LENGTH OF PROJECT.

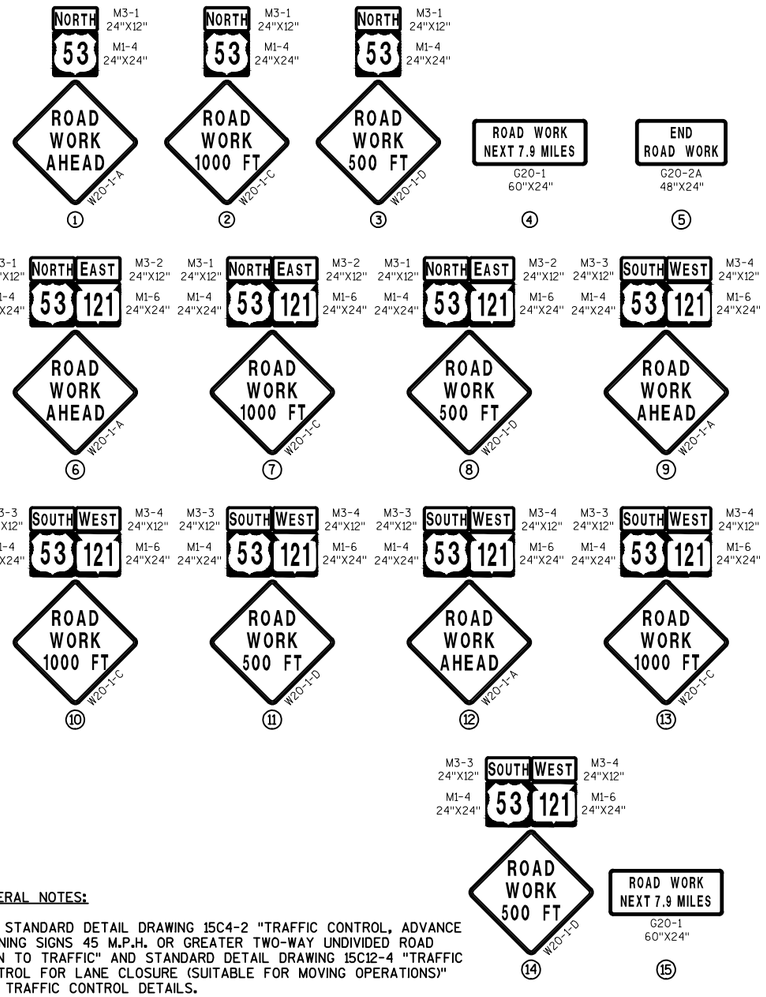
IF MULTIPLE POSTS ARE REQUIRED FOR SIGN OVER SIDEWALK, THE ENGINEER SHOULD DETERMINE POST SPACING.

* MAXIMUM CANTILEVER LENGTH TO BE DETERMINED BY ENGINEER FOR EACH SIGN WHERE CANTILEVER IS REQUIRED.

Area of Sign Installation (Sq. Ft.)	D (Min)
20 or Less	4'
Greater than 20	5'

2

SIGNING KEY



GENERAL NOTES:

SEE STANDARD DETAIL DRAWING 15C4-2 "TRAFFIC CONTROL, ADVANCE WARNING SIGNS 45 M.P.H. OR GREATER TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC" AND STANDARD DETAIL DRAWING 15C12-4 "TRAFFIC CONTROL FOR LANE CLOSURE (SUITABLE FOR MOVING OPERATIONS)" FOR TRAFFIC CONTROL DETAILS.

FOR SIDE ROAD APPROACH ADVANCE WARNING SIGN DETAIL SEE STANDARD DETAIL DRAWING 15C4-2 "TRAFFIC CONTROL, ADVANCE WARNING SIGNS 45 M.P.H. OR GREATER TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC."

THE EXACT NUMBER, LOCATION, AND SPACING OF ALL SIGNS AND DEVICES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A MINIMUM OF 200 FEET (500 FEET DESIRABLE) CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

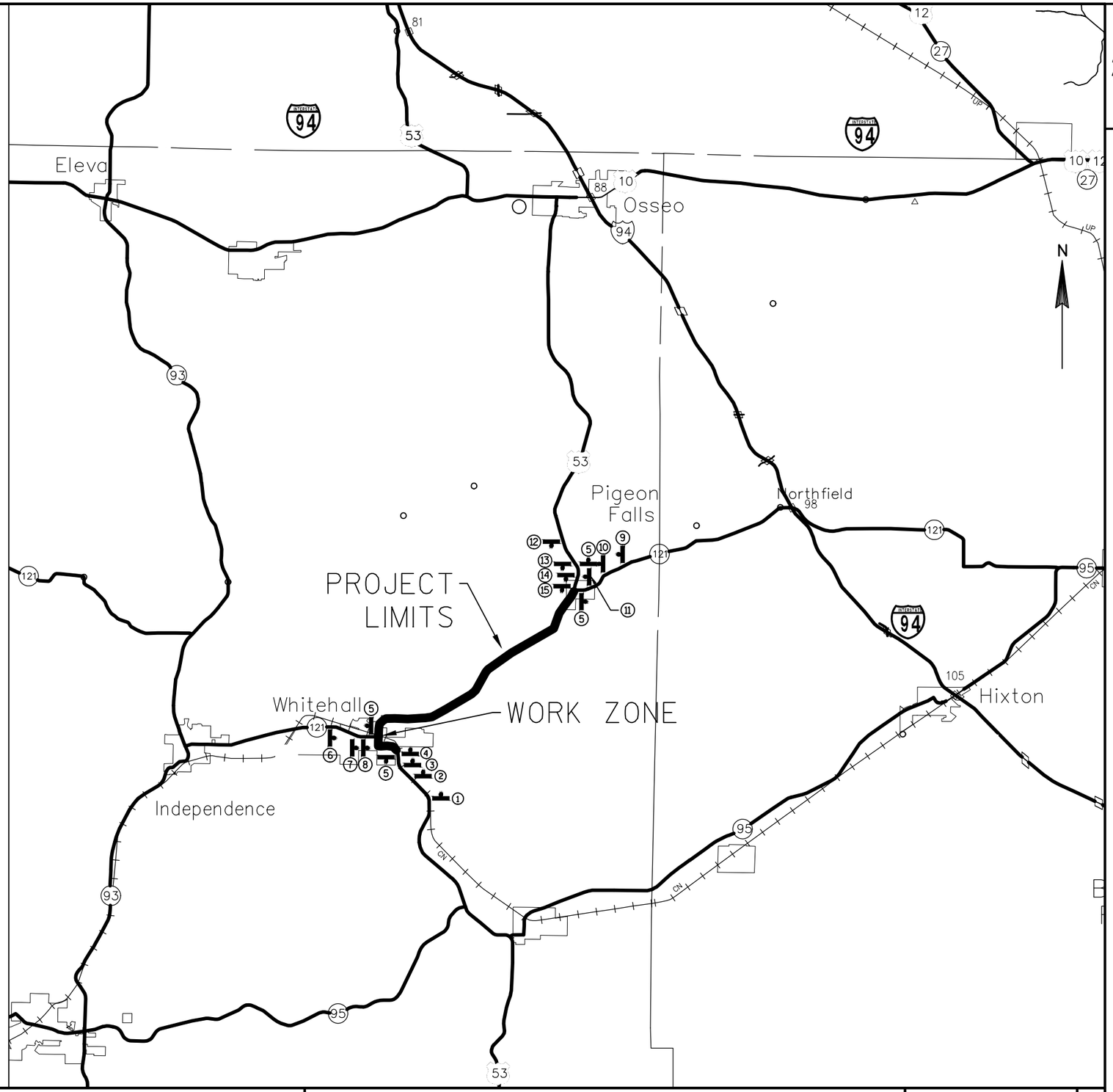
ALL SIGNS ARE 48"X48" UNLESS OTHERWISE NOTED.

"WO" IS THE SAME AS "W" EXCEPT THE BACKGROUND IS ORANGE.

SIGN LAYOUT SHALL BE IN ACCORDANCE WITH THE FHWA'S MANUAL OF STANDARD HIGHWAY SIGNS OR THE WISCONSIN STANDARD SIGN PLATES.

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" SHALL BE REMOVED OR COVERED AS NEEDED AND AS APPROVED BY THE ENGINEER.

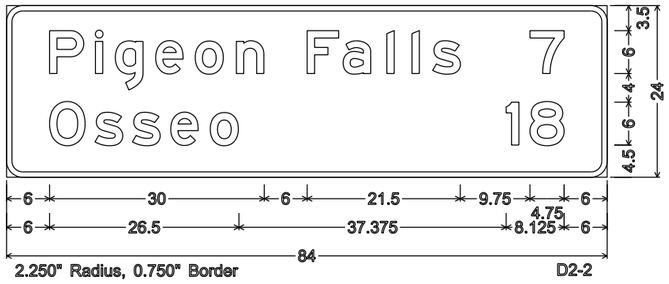
SIGN ON TEMPORARY POST

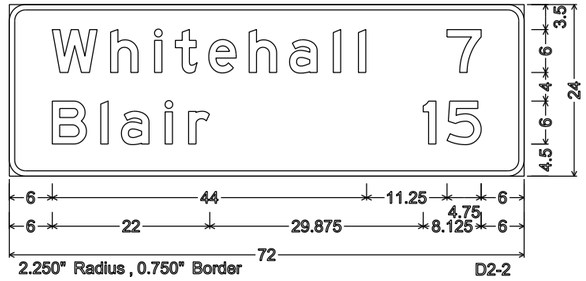


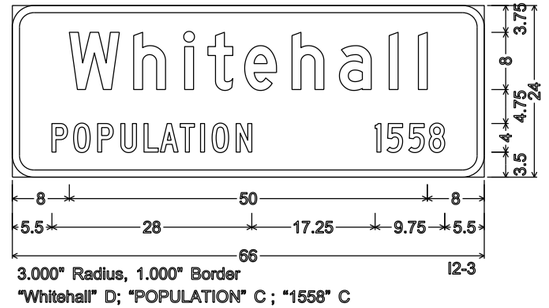
PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	TRAFFIC CONTROL OVERVIEW	SHEET 66	E

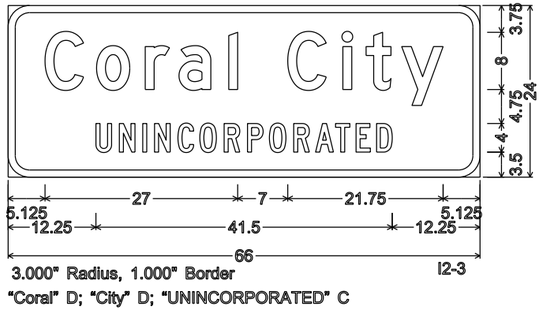
NOTES

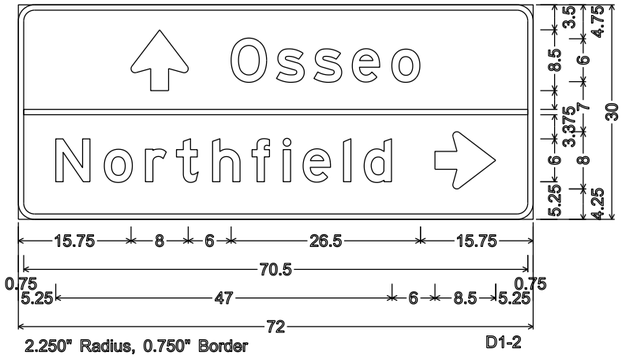
1. All Signs are Type II - Type H Reflective
2. Color:
   Background - Green
   Message - White
3. Message Series - E except as noted

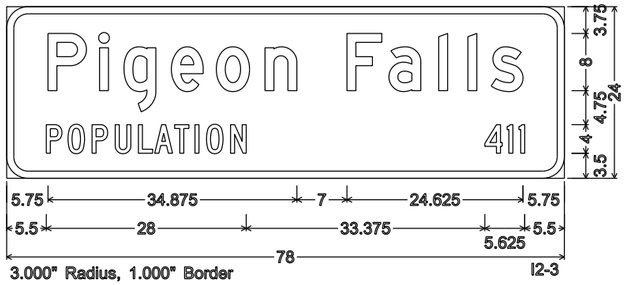


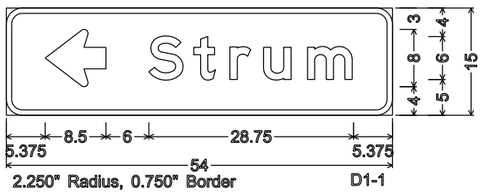


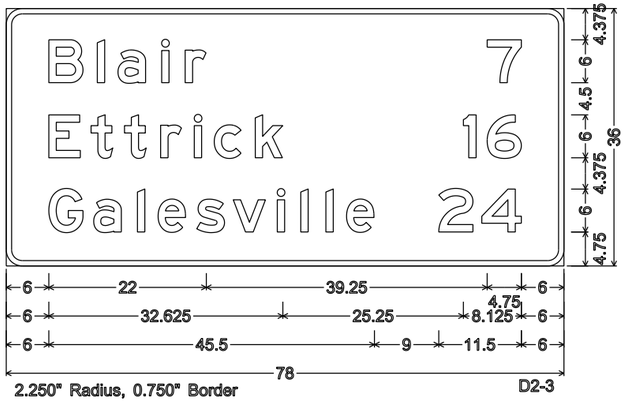


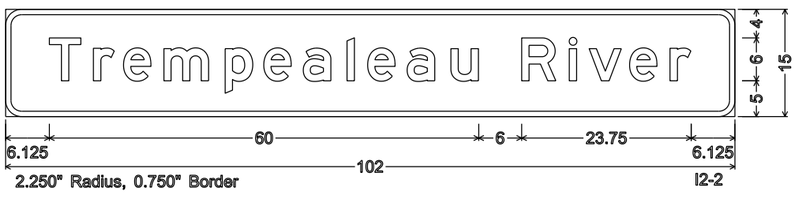


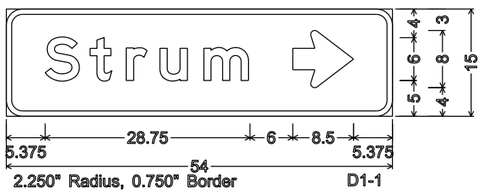


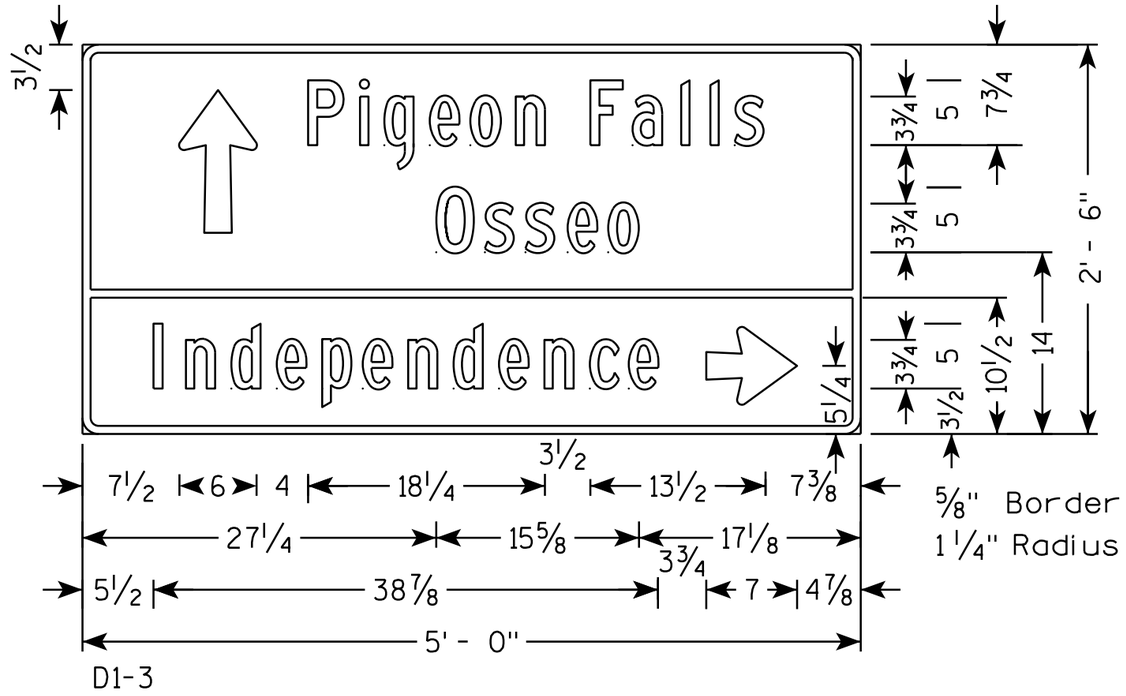






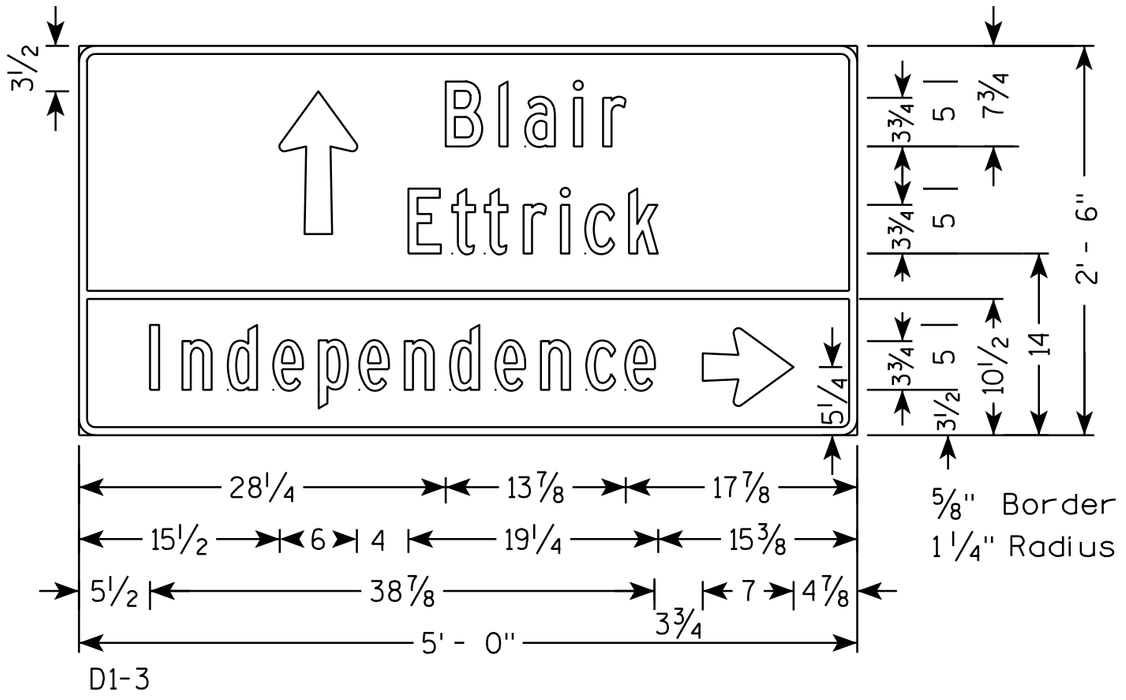






NOTES

1. All Signs Type II - Type H Reflective
2. Color:
   Background - GREEN
   Message - WHITE
3. Message Series - C



PROJECT NO: 1630-02-71	HWY: ush 53	COUNTY: TREMPEALEAU	PERMANENT SIGNING	SHEET NO:	E

FILE NAME : C:\CAEFiles\Projects\tr_d5\TrempCo.dgn PLOT DATE : 09-FEB-2015 13:39 PLOT BY : mscsja PLOT NAME : PLOT SCALE : 11.675051:1.000000 WISDOT/CADDS SHEET 42

USH 53 ALIGNMENT SEGMENTS
(MAINLINE ABBREVIATIONS ARE ONE CHARACTER)

'S' SOUTH OF PROJECT
'E' ERVIN STREET, C WHITEHALL
'M' MAIN STREET, C WHITEHALL
'T' TREMPEALEAU RIVER BRIDGE
'R' USH 53 RURAL
'A' USH 53 RURAL 2012 ADJUSTMENT
'V' EKERN ST, V PIGEON FALLS
'P' PIGEON CREEK BRIDGE, V PIGEON FALLS
'N' NORTH OF PROJECT, V PIGEON FALLS

COUNTY ROAD ALIGNMENTS
('C (COUNTY) X (NAME)')

'CD' COUNTY ROAD D
'CS' COUNTY ROAD S
'CW' COUNTY ROAD W

STH 121 ALIGNMENTS
(BETWEEN THESE, STH 121 IS CONCURRENT TO USH 53)

'WB' DEWEY ST, C WHITEHALL
'EB' E MAIN ST, V PIGEON FALLS

SIDEROADS

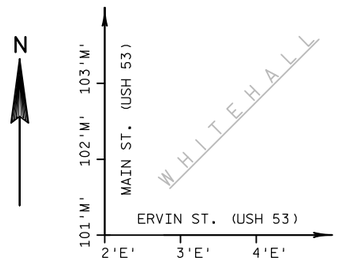
SIDEROAD NAMES HAVE BEEN TAKEN FROM WISDOT CVT PLAT MAPS AND DO NOT ALWAYS MATCH OTHER SOURCES (RECORD DRAWINGS, INTERNET MAPPING WEBSITES, ETC.)

SIDEROADS BEGINNING AT 50+00
STATIONING BASED ON RECORD DRAWINGS

SIDEROADS BEGINNING AT 10+00
NEW STATIONING FOR THIS PROJECT

THE PI & EQUATION AT STA. 330+00 WAS NECESSARY TO MATCH MAPPING AND AERIAL PHOTOGRAPHS. IT HAS BEEN ESTABLISHED FOR THE ROADWAY CONSTRUCTION PLANS ONLY AND HAS NOT BEEN ADDED AS A REVISION TO ANY EXISTING HIGHWAY PLAT.

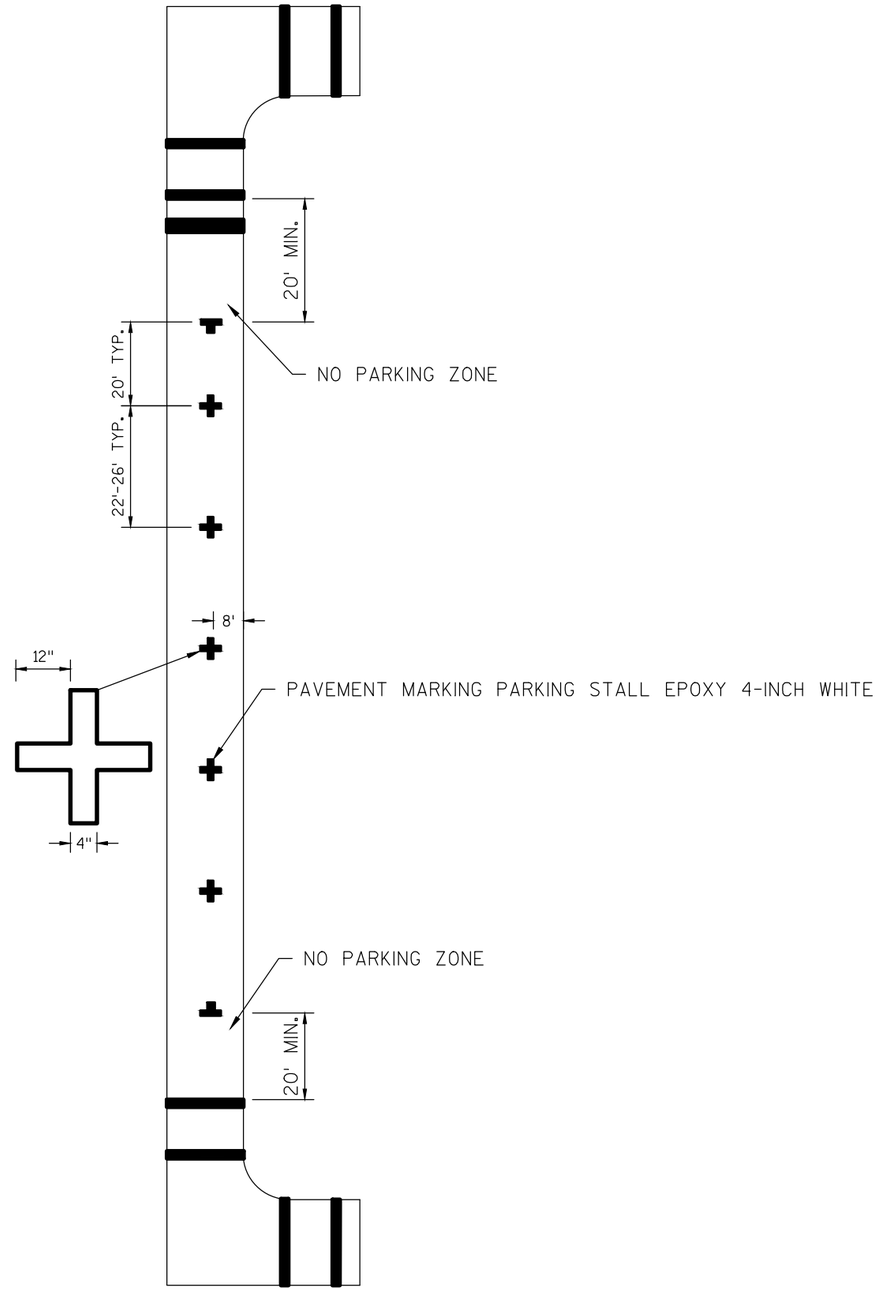
THE CHANGE IN USH 53 SEGMENT NAMING AT STA. 337+00 IS TO DELINEATE THE V PIGEON FALLS CORP LIMITS. THERE IS NO SUCH CHANGE FOR C WHITEHALL SINCE ITS CORP BOUNDARY IS COMPLEX AND INTERSECTS USH 53 MULTIPLE TIMES AT THE NORTH END OF THE CITY.



ERVIN ST. (AND BEYOND) RECORD DRAWINGS ALL HAVE WEST TO EAST STATIONING, WHICH FOR USH 53 IS NORTH TO SOUTH, CREATING A DISCONNECT IN STATIONING DIRECTIONALITY AT MAIN ST.

USH 53 STA.	SIDEROAD STA.	ROADWAY	AKA / MISC
73+55.00'S'	10+00'WD'	WADE RD	
13+57.45'S'+-	---		
28+78.00'E'	10+00'RC'	RICHTER RD	
22+33.50'E'	10+00'LN'	LEE ST (N)	
22+29.00'E'	10+00'LS'	LEE ST (S)	
17+47.50'E'	10+00'OO'	OWEN ST	
14+69.50'E'	10+00'LU'	LOU BLVD	
11+73.90'E'	10+00'RV'	ROOSEVELT ST (N)	CLAIRE ST (S)
8+11.90'E'	10+00'SH'	SHERWOOD ST	
4+30.50'E'	10+00'AB'	S ABRAMS ST	FORMERLY PRIVATE DR
2+00.00'E'	101+00.00'M'	MAIN ST	
101+00.00'M'	2+00.00'E'	ERVIN ST	
105+34.76'M'	10+00'LC'	LINCOLN ST	
110+26.83'M'	10+00'HE'	HOBSON ST (E)	
110+30.25'M'	10+00'HW'	HOBSON ST (W)	
113+41.65'M'	10+00'KL'	KELLEY ST	KELLY
114+22.73'M'	281+88.42'WB'	STH 121 WB	DEWEY ST
116+47.43'M'	---	CL RAILS	GB&W RR MAIN TRACK
117+19.93'M'	---	CL RAILS	GB&W RR SIDE TRACK
118+42.49'M'	10+00'DE'	DODGE ST (E)	
118+44.81'M'	10+00'DW'	DODGE ST (W)	
121+53.11'M'	10+00'SE'	SCRANTON ST (E)	
121+58.02'M'	10+00'SW'	SCRANTON ST (W)	
123+92.20'M'	---	---	END 1635-04-71
9+35.02'T'	---	---	
10+02.12'T'	10+00'BE'	BLAIR ST (E)	
10+06.60'T'	10+00'BW'	BLAIR ST (W)	
25+00.00'T'	50+00'NR'	N RIVER RD	NORTH RIVER RD
39+98.10'T'	50+00'CD'	CTH D (N)	COUNTY ROAD D
33+32.00'R'	"	"	"
44+63.00'R'	50+00'EV'	EVERETTE LN	GUSE LN
46+50+-'R'	10+00'FA'	FAIRVIEW RD	FREMASTAD DR
51+90+-'R'	10+00'FB'	FAIRVIEW RD	FREMASTAD DR
55+90+-'R'	10+00'FC'	FAIRVIEW RD	FREMASTAD DR
69+50+-'R'	10+00'TR'	TN RD	TN RD 23; OK LN
78+66.00'R'	50+00'SC'	SCHANGSBERG RD	SCHANSBERG
79+40+-'R'	10+00'OK'	OK LN	
108+28.50'R'	50+00'BR'	BRITTANI RD (N&S)	BRITTANI LN
114+20+-'R'	10+00'WA'	WALDERA RD	
120+91.00'R'	50+00'TC'	THOMPSON COULEE RD (N)	
120+91.00'R'	50+00'CS'	CTH S (S)	COUNTY ROAD S
175+10.60'R'	50+00'SM'	SIMONSON RD	
175+94.00'R'	50+00'MC'	MC RAE LN	THORSON; M THORSEN; M THORSON
203+66.00'R'	50+00'DC'	DISSMORE COULEE RD	
234+67.00'R'	50+00'HA'	HAUG RD	
243+11.00'R'	50+00'WD'	DAGGETT COULEE RD	DAGGOTT COULEE; W DAGGETT COULEE
246+64.30'R'	50+00'FH'	FITCH COULEE RD	
296+26.00'R'	50+00'FR'	FREMSTAD RD	
330+00.00'R'	---	---	NEW EQUATION
329+80.00'A'	---	---	EXACT LOCATION TBD
331+24.00'A'	50+00'FU'	FULLER COULEE RD	E DAGGETT COULEE RD
337+00.00'A'	---	---	NO EQUATION - ONLY USH 53 SEGMENT
337+00.00'V'	---	---	CHANGE DUE TO MUNICIPAL BOUNDARY
348+52+-'V'	---	OLD B-61-0116	HEGGE COULEE CR; CL S ABUT
347+40+-'V'	???	DUDLEY LN	COUNTRYSIDE CO-OP; WWTP ACCESS?
351+56.57'V'	50+00'AD'	ANDERSON ST	
357+25.49'V'	50+00'CW'	CTH W (S)	COUNTY ROAD W
367+70.12'V'	50+00'EK'	EKERN AVE	
370+97.56'V'	50+00'EB'	STH 121 EB	E MAIN ST
374+53.72'V'	---	---	
1+54.00'P'	---	---	
1+56.00'P'	---	B-61-0951	PIGEON CREEK; CL S ABUT
2+85.16'P'	---	B-61-0951	PIGEON CREEK; END N DECK
200+00.00'N'	---	"	"
227+13.66'N'	---	B-61-0169	TOWTER COULEE CREEK; CL S ABUT

2



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PARKING LANE PAVEMENT MARKING DETAIL	SHEET 70	E

2

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

N

PC: 17+04.30

PAVEMENT MARKING EPOXY 4-INCH DASHED WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

STA AHEAD = 13+57.45
STA BACK = 28+78.00

EQUATION

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

LEE ST

OWEN ST

BEGIN PROJECT
BEGIN CONSTRUCTION

USH 53
ERVIN ST

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PI = 14+76.88
PI Y = 438420.351
PI X = 858870.148
Δ = 84°09'00.00"
D = 4°00'00.00"
T = 1293.13
L = 2103.75

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

LOU BLVD

S ABRAMS ST

N

PC: 17+04.30

PAVEMENT MARKING EPOXY 4-INCH DASHED WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING CROSSWALK EPOXY 6-INCH

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

ERVIN ST

USH 53

1504.30'
N89°53'59.26"E

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING STOP LINE EPOXY 18-INCH

ROOSEVELT ST

SHERWOOD ST

EQUATION
BK: 102+00.00
AH: 101+71.70

MAIN ST

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 71	E

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING CROSSWALK EPOXY 6-INCH

PAVEMENT MARKING PARKING STALL EPOXY 4-INCH WHITE

PAVEMENT MARKING STOP LINE EPOXY 18-INCH

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING CROSSWALK EPOXY 6-INCH

PAVEMENT MARKING RAILROAD CROSSINGS EPOXY

PAVEMENT MARKING STOP LINE EPOXY 18-INCH

LINCOLN ST
HOBSON ST
STH 121
DEWEY ST
CTH D
BP: 101+00.00
EQUATION
101
102
BP: 2+00.00
MAIN ST
104
106
USH 53
MAIN ST
108
110
112
EP: 281+88.42
114
116
N

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

SEE 1630-01-73 PLAN FOR PAVEMENT MARKING DETAILS
STA. 15+88 - STA. 26+75

PAVEMENT MARKING RAILROAD CROSSINGS EPOXY

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING CROSSWALK EPOXY 6-INCH

PAVEMENT MARKING PARKING STALL EPOXY 4-INCH WHITE

RR
DODGE ST
SCRANTON ST
BLAIR ST
PI: 9+35.02
116
118
120
USH 53
MAIN ST
122
N0°08'20.74"W
2292.20'
10
N0°08'20.74"W
233.48'
12
14
15
STA BACK = 123+92.20
STA AHEAD = 9+35.02
EQUATION
PC: 11+68.50
N
SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 72	E

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

TREMPEALEAU RIVER

N RIVER RD

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

SEE 1630-01-73 PLAN FOR PAVEMENT MARKING DETAILS
STA. 15+88 - STA. 26+75

PROJECT 1630-01-73
STRUCTURE B-61-50

PI = 25+83.50
PI Y = 442356.127
PI X = 856063.152
Δ = 89°18'00.00"
D = 4°00'00.00"
T = 1415.00
L = 2232.50
R = 1432.394
PC = 11+68.50
PT = 34+01.00
SE = 6.3% (EXIST 6.3%)
RUNOFF (L) =

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

16 18 20 22 24 26 28 30 32

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

CTH D

PI: 33+32.00

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 8-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

32 34 36 N89°09'39.26"E 38 34 36 N89°09'39.26"E 38 40

597.10'

4461.86'

PT: 34+01.00

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH DASHED WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

STA BACK = 39+98.10
STA AHEAD = 33+32.00

EQUATION

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

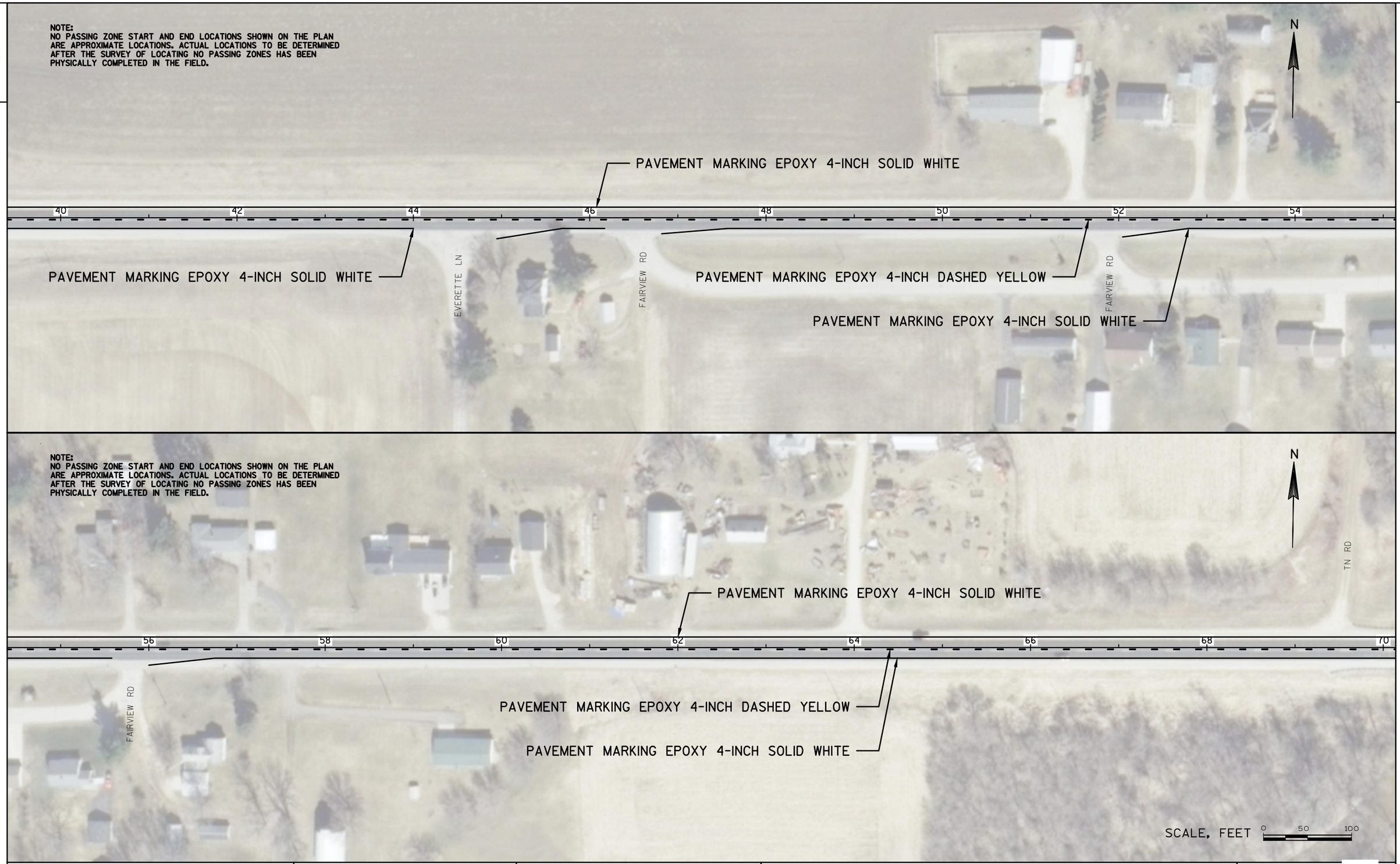
N

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 73	E

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



2

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 74 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:46 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : **********

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

TN RD

PIGEON CREEK

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PC: 77+93.86

OK LN

PI = 85+46.50
PI Y = 442461.957
PI X = 863288.977
Δ = 29°26'24.30"
D = 2°00'00.00"
T = 752.63
L = 1472.00
R = 2864.789
PC = 77+93.86
PT = 92+65.87
SE = 4.0% (EXIST 4.0%)
RUNOFF (L) = 102'

N

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

70 72 74 76 78 80 82 84

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 8-INCH SOLID WHITE

SCHANGSBERG RD

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

N

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PT: 92+65.87

86 88 90 92 94 96 98 100

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

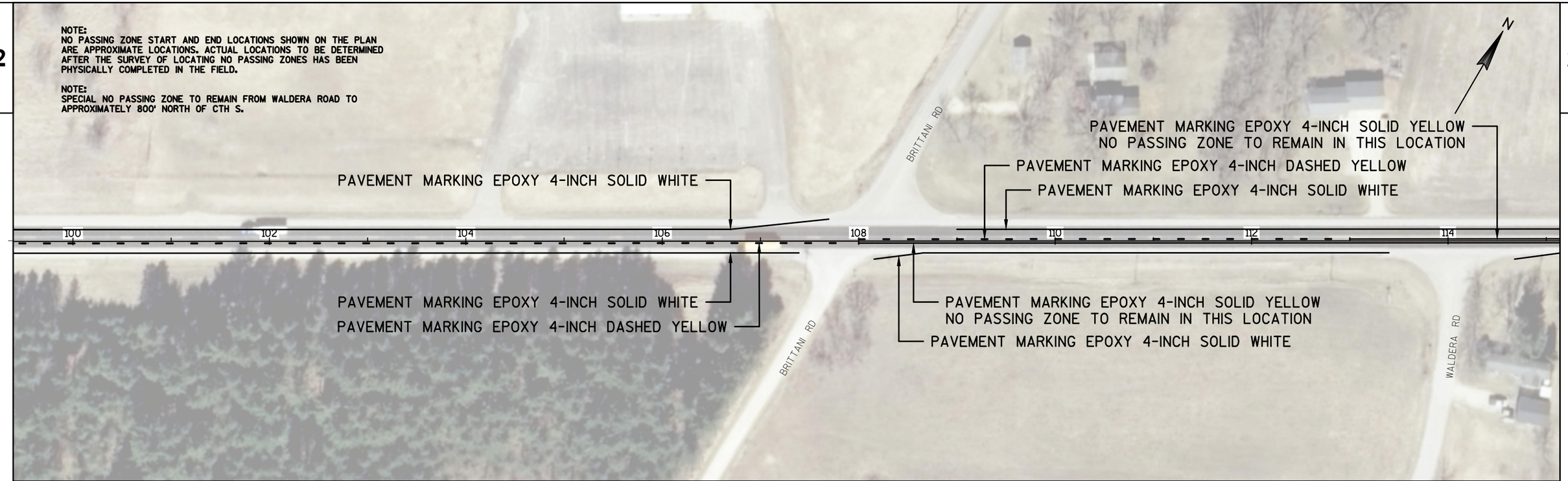
SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 75 E

2

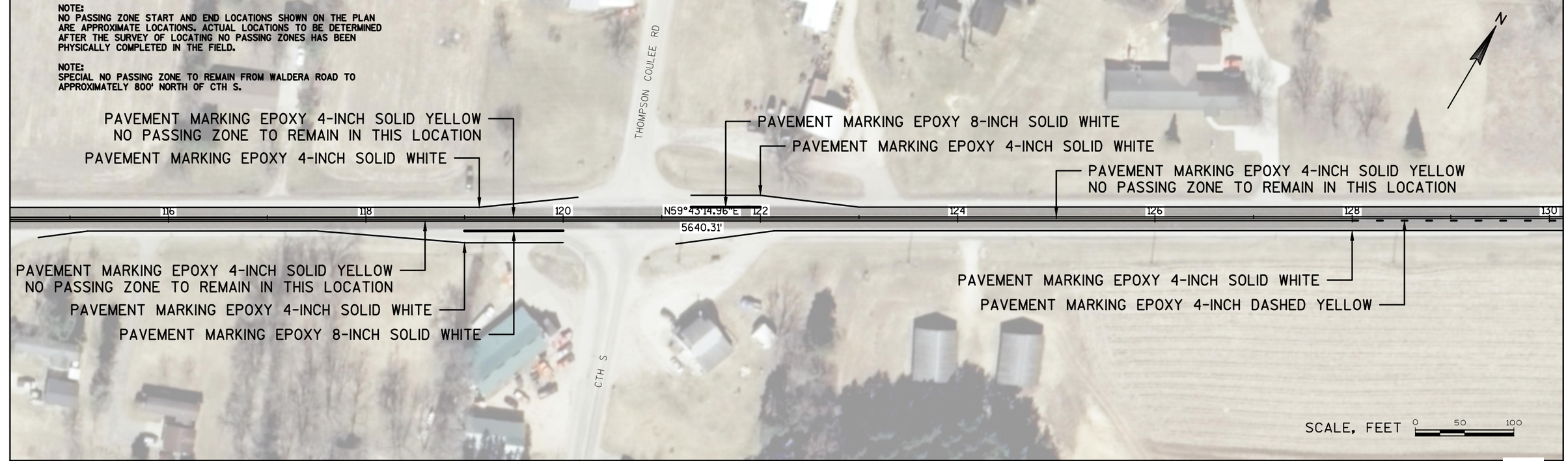
NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

NOTE:
SPECIAL NO PASSING ZONE TO REMAIN FROM WALDERA ROAD TO APPROXIMATELY 800' NORTH OF CTH S.



NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

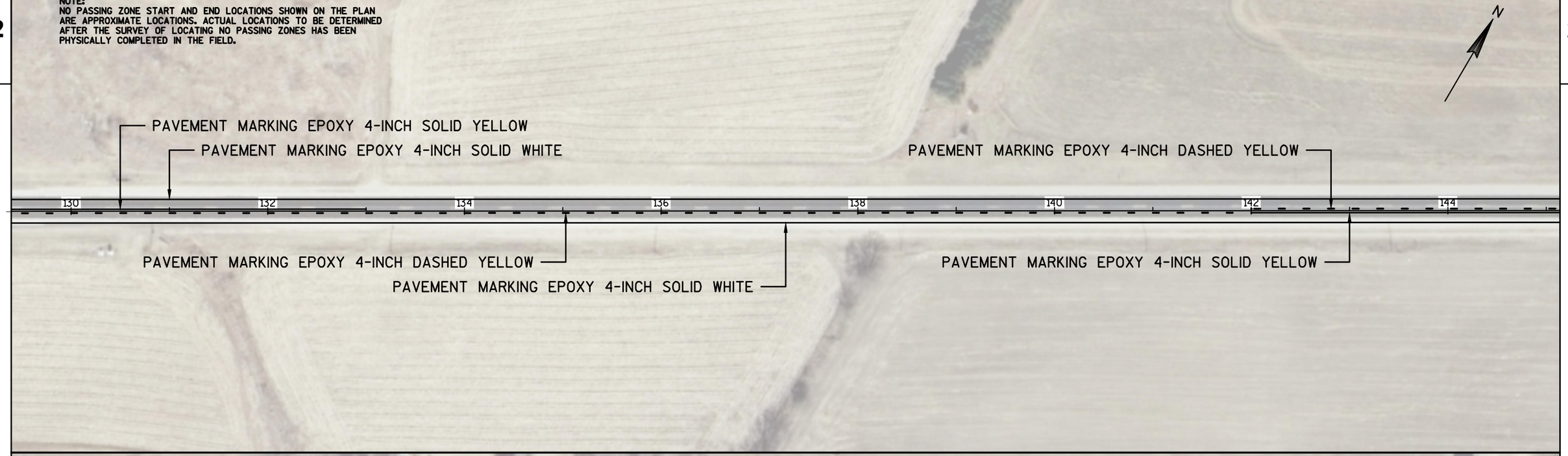
NOTE:
SPECIAL NO PASSING ZONE TO REMAIN FROM WALDERA ROAD TO APPROXIMATELY 800' NORTH OF CTH S.



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 76 E

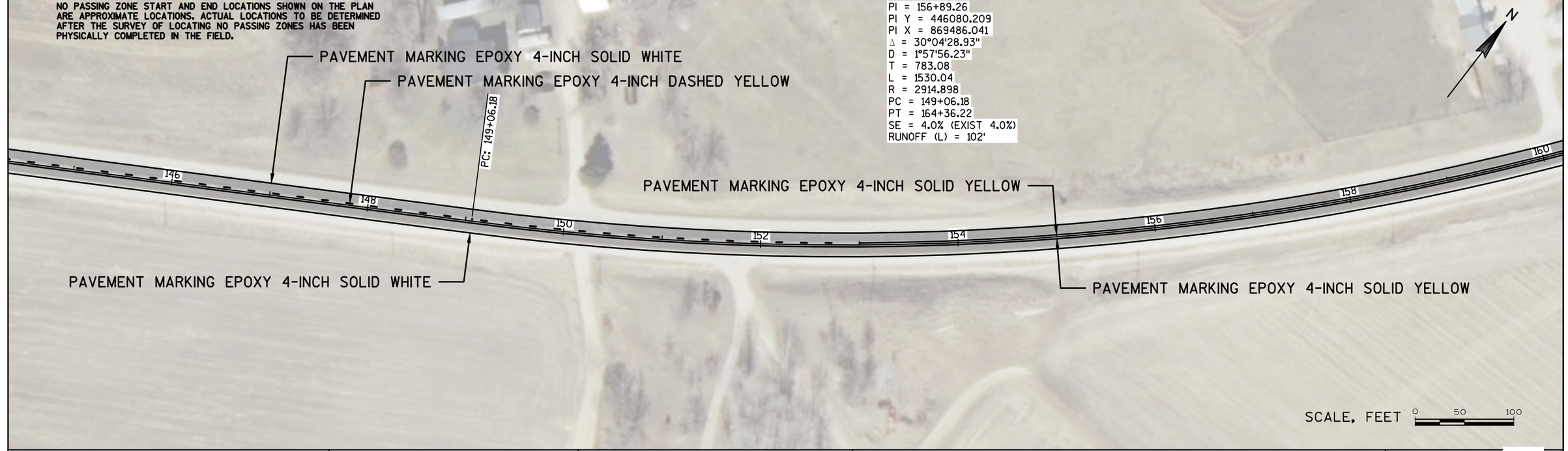
2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PI = 156+89.26
PI Y = 446080.209
PI X = 869486.041
Δ = 30°04'28.93"
D = 1°57'56.23"
T = 783.08
L = 1530.04
R = 2914.898
PC = 149+06.18
PT = 164+36.22
SE = 4.0% (EXIST 4.0%)
RUNOFF (L) = 102'



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 77 E

2

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

N

SIMONSON RD

PT: 164+36.22

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

160 162 164 166 168 170 172 174

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

N

SIMONSON RD

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

176 N29°38'46.03"E 178 180 182 184 186 188 190

2422.55'

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PC: 188+58.76

MC RAE LN

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 78 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:47 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : ********** WISDOT/CADDS SHEET 44

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PI = 196+28.11
PI Y = 449534.851
PI X = 871452.231
Δ = 23°42'46.39"
D = 1°33'48.51"
T = 769.35
L = 1516.68
R = 3664.645
PC = 188+58.76
PT = 203+75.44
SE = 3.3% (EXIST 3.2%)
RUNOFF (L) = 84'

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW
PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW
PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE
PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE
PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW
PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

190 192 194 196 198 200 202 204

PT: 203+75.44

DISSMORE COULEE RD

N

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

N

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW
PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

206 208 210 212 N53°21'32.42"E 214 216 218 220
1813.04'

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW
PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 79 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:47 AM PLOT BY : DAVIS, TERESA L PLOT NAME : _____ PLOT SCALE : **********

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

220 222 224 226 228 230 232 234

PC: 221+88.49

PT: 227+10.83

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PI = 224+49.84
PI Y = 451232.000
PI X = 873734.031
Δ = 5°13'24.41"
D = 1°00'00.00"
T = 261.35
L = 522.34
R = 5729.578
PC = 221+88.49
PT = 227+10.83
SE = N.C. (EXIST N.C.)
RUNOFF (L) = 61'

HAUG RD

SEMB RD

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

FITCH COULEE CREEK

DAGGETT COULEE RD

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

236 238 240 242 N58°34'56.83"E 244 246 248 250

3115.95'

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

SEMB RD

FITCH COULEE RD

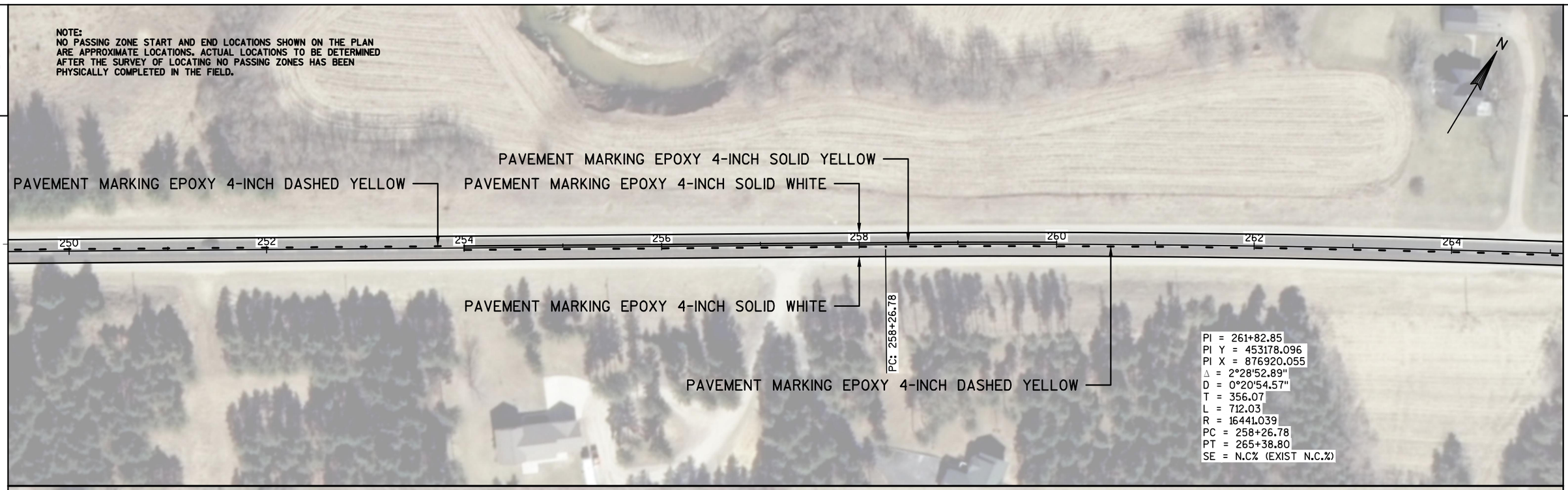
SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 80 E

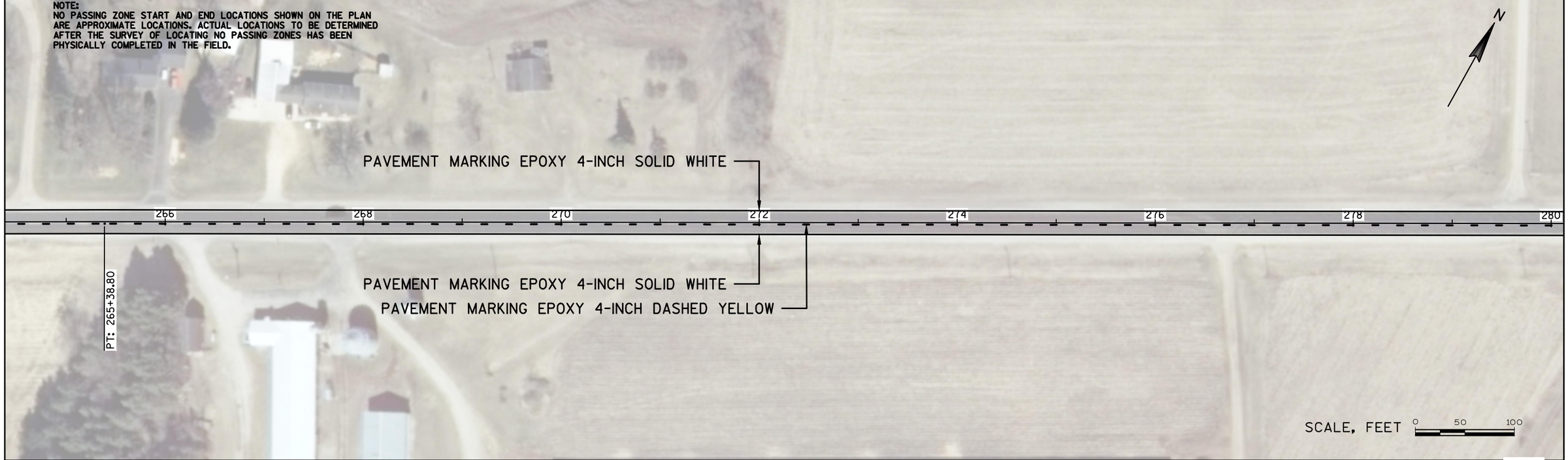
FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:50 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : **********

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 81 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:50 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : **********

WISDOT/CADDS SHEET 44

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

N

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

280 N61°03'49.72"E 282 284 286 288 290 292 294

3113.10'

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PI = 305+19.44
PI Y = 455276.347
PI X = 880715.362
Δ = 41°12'39.21"
D = 2°28'59.35"
T = 867.54
L = 1659.62
R = 2307.380
PC = 296+51.90
PT = 313+11.52
SE = 4.6% (EXIST 4.5%)
RUNOFF (L) = 51'

N

PC: 296+51.90

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

296 298 300 302 304 306 308 310

FREMSTAD RD

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

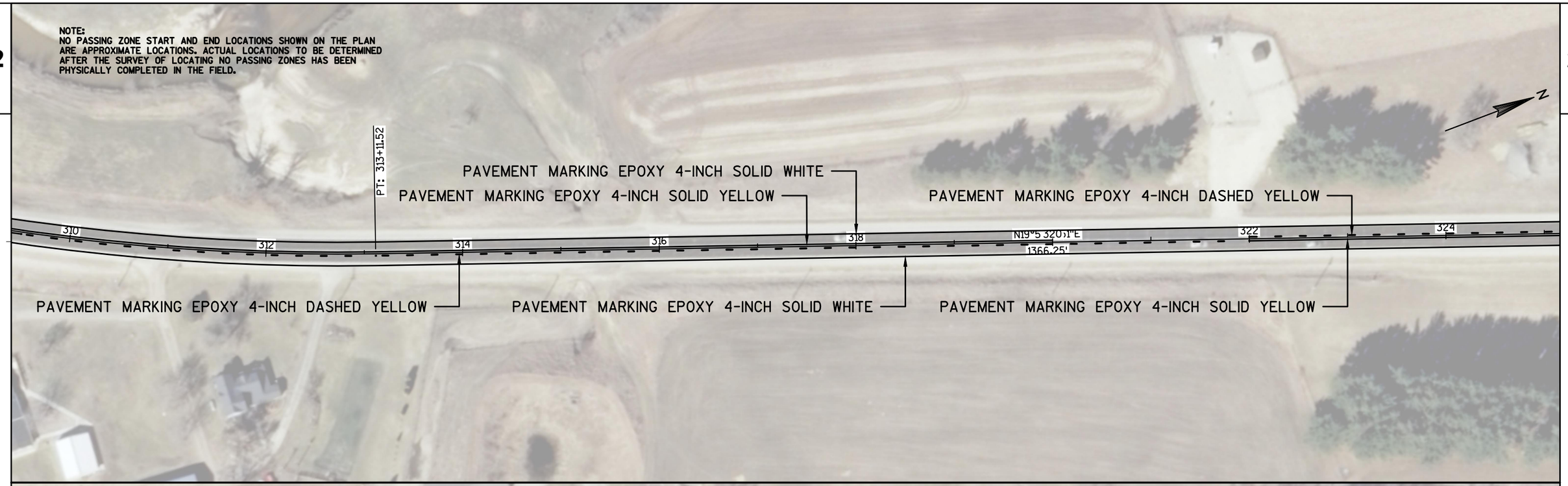
SCALE, FEET 0 50 100

PROJECT NO:1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 82 E

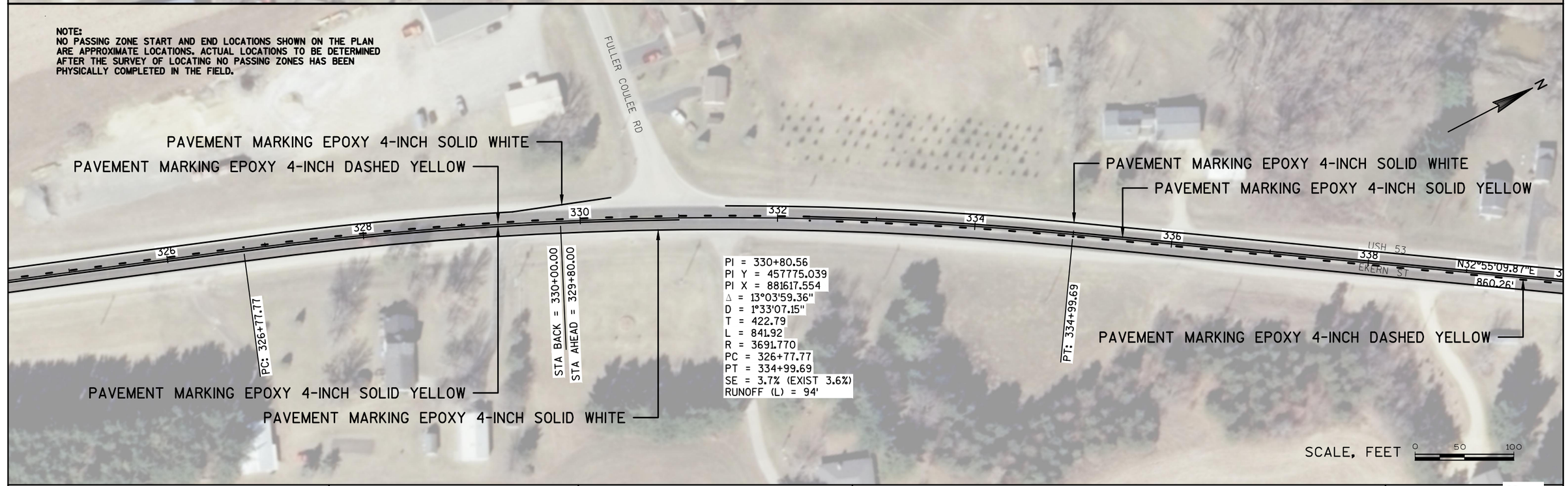
FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:50 AM PLOT BY : DAVIS, TERESA L PLOT NAME : _____ PLOT SCALE : **********

WISDOT/CADDS SHEET 44

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 83 E

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH SOLID WHITE

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PC: 343+59.95

PI: 350+77.45

PI = 344+70.63
PI Y = 458944.92
PI X = 882374.94
Δ = 2°12'48.03"
D = 1°00'00.00"
T = 110.68
L = 221.33
R = 5729.578
PC = 343+59.95
PT = 345+81.29
SE = 2.4% (EXIST 2.4%)
RUNOFF (L) = 61'

PT: 345+81.29

N5°09.87"E
496.16'
N48°07'57.91"E
1434.13'
N34°3[illegible]58.16"E
50.26'

340 342 344 346 348 350 352 354 356 358 360 362 364 366 368 370

USH 53
EKERN ST
DUDLEY LN
HEGGE COULEE CREEK
ANDERSON ST
CTH W
EKERN AVE

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH DASHED YELLOW

PAVEMENT MARKING EPOXY 4-INCH SOLID YELLOW

PAVEMENT MARKING EPOXY 8-INCH SOLID WHITE

PC: 365+11.58

PT: 368+38.14

PI = 366+77.75
PI Y = 460759.105
PI X = 883632.125
Δ = 26°07'28.71"
D = 8°00'00.00"
T = 166.17
L = 326.56
R = 716.197
PC = 365+11.58
PT = 368+38.14
SE = N.C.% (EXIST N.C.%)

SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 84 E

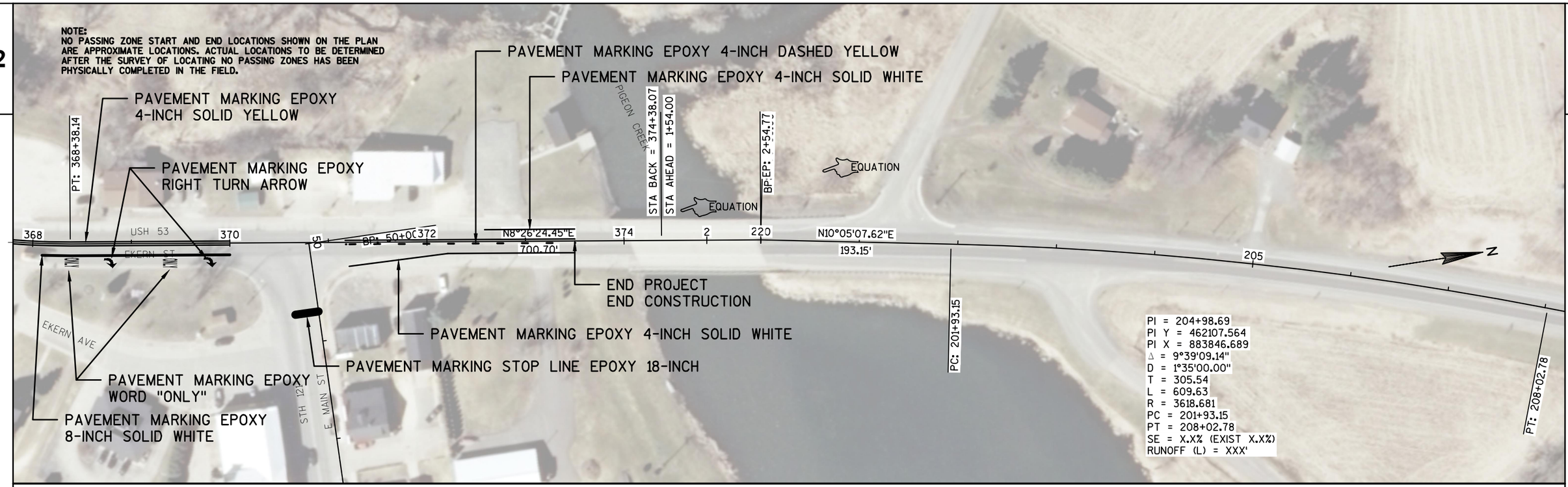
FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/2/2015 8:51 AM PLOT BY : DAVIS, TERESA L PLOT NAME : _____ PLOT SCALE : **********

WISDOT/CADDS SHEET 44

2

2

NOTE:
NO PASSING ZONE START AND END LOCATIONS SHOWN ON THE PLAN ARE APPROXIMATE LOCATIONS. ACTUAL LOCATIONS TO BE DETERMINED AFTER THE SURVEY OF LOCATING NO PASSING ZONES HAS BEEN PHYSICALLY COMPLETED IN THE FIELD.



SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PAVEMENT MARKING PLAN	SHEET 85	E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\024501_PM.DWG PLOT DATE : 11/10/2015 12:43 PM PLOT BY : DAVIS, TERESA L PLOT NAME : _____ PLOT SCALE : **********

WISDOT/CADDS SHEET 44

2

Alignment: USH 53

Description:								
Layer: P_ALI-Base								
Tangent	N	438415.458	E	856072.719	Z		Station	02+00(1)
	Distance	1504.300'	Bearing	N 89° 53' 59.26 E"				
Arc								
	PC N	438418.089	E	857577.017			Station	17+04.3(1)
	CC N	436985.697	E	857579.522				
	PI N	438420.351	E	858870.148			Station	14+76.88(2)
		TAN	1293.133'					
		DB	N 89° 53' 59.26 E"'					
		DA	S 5° 57' 0.74 E"'					
		LChord Distance	1919.703'	Bearing	S 48° 1' 30.74 E"			
		External Distance	497.359'					
		Middle Ordinate	369.173'					
		Radius	1432.394'					
		DEG	4° 0' 0"'					
		DELTA	84° 9' 0"'					
		LENGTH	2103.750'					
	PT N	437134.185	E	859004.199			Station	22+87.5(2)
Tangent	N	437134.185	E	859004.199	Z		Station	22+87.5(2)
	Distance	899.700'	Bearing	S 5° 57' 0.74 E"				
End	N	436239.332	E	859097.466	Z		Station	31+87.2(2)
Alignment Length = 4507.75'								

2

Alignment: USH 53

Description:								
Layer: P_ALI-Base								
Tangent	N	438415.458	E	856072.719	Z		Station	02+00(1)
	Distance	1504.300'	Bearing	N 89° 53' 59.26 E"				
Arc								
	PC N	438418.089	E	857577.017			Station	17+04.3(1)
	CC N	436985.697	E	857579.522				
	PI N	438420.351	E	858870.148			Station	14+76.88(2)
		TAN	1293.133'					
		DB	N 89° 53' 59.26 E"'					
		DA	S 5° 57' 0.74 E"'					
		LChord Distance	1919.703'	Bearing	S 48° 1' 30.74 E"			
		External Distance	497.359'					
		Middle Ordinate	369.173'					
		Radius	1432.394'					
		DEG	4° 0' 0"'					
		DELTA	84° 9' 0"'					
		LENGTH	2103.750'					
	PT N	437134.185	E	859004.199			Station	22+87.5(2)
Tangent	N	437134.185	E	859004.199	Z		Station	22+87.5(2)
	Distance	899.700'	Bearing	S 5° 57' 0.74 E"				
End	N	436239.332	E	859097.466	Z		Station	31+87.2(2)
Alignment Length = 4507.75'								

2

Alignment: USH 53

Description:								
Layer: P_ALI-Base								
Tangent	N	438415.458	E	856072.719	Z		Station	101+00(1)
	Distance	2292.200'	Bearing	N 0° 8' 20.74 W"				
Tangent	N	440707.652	E	856067.154	Z		Station	09+35.02(2)
***	Station	Equation	***	BACK STA	123+92.2	AHEAD STA	09+35.02	
	Distance	233.480'	Bearing	N 0° 8' 20.74 W"				
Arc								
	PC N	440941.131	E	856066.588			Station	11+68.5(2)
	CC N	440944.608	E	857498.978				
	PI N	442356.127	E	856063.152			Station	25+83.5(2)
		TAN	1415.001'					
		DB	N 0° 8' 20.74 W'"					
		DA	N 89° 9' 39.26 E'"					
		LChord Distance	2013.300'	Bearing	N 44° 30' 39.26 E"			
		External Distance	581.055'					
		Middle Ordinate	413.370'					
		Radius	1432.394'					
		DEG	4° 0' 0'"					
		DELTA	89° 18' 0'"					
		LENGTH	2232.500'					
	PT N	442376.849	E	857478.001			Station	34+01(2)
Tangent	N	442376.849	E	857478.001	Z		Station	34+01(2)
	Distance	597.100'	Bearing	N 89° 9' 39.26 E"				
Tangent	N	442385.593	E	858075.037	Z		Station	33+32(3)
***	Station	Equation	***	BACK STA	39+98.1	AHEAD STA	33+32	
	Distance	4461.864'	Bearing	N 89° 9' 39.26 E"				

2

Alignment: USH 53

Arc								
	PC N	442450.935	E	862536.423			Station	77+93.86(3)
	CC N	445315.417	E	862494.47				
	PI N	442461.957	E	863288.977			Station	85+46.5(3)
		TAN	752.634'					
		DB	N 89° 9' 39.26 E"'					
		DA	N 59° 43' 14.96 E"'					
		LChord Distance	1455.864'	Bearing	N 74° 26' 27.11 E"			
		External Distance	97.216'					
		Middle Ordinate	94.025'					
		Radius	2864.789'					
		DEG	2° 0' 0"'					
		DELTA	29° 26' 24.3"'					
		LENGTH	1472.004'					
	PT N	442841.446	E	863938.936			Station	92+65.87(3)
Tangent	N	442841.446	E	863938.936	Z		Station	92+65.87(3)
	Distance	5640.310'	Bearing	N 59° 43' 14.96 E"				
Arc								
	PC N	445685.368	E	868809.788			Station	149+06.18(3)
	CC N	448202.612	E	867340.056				
	PI N	446080.209	E	869486.041			Station	156+89.26(3)
		TAN	783.082'					
		DB	N 59° 43' 14.96 E"'					
		DA	N 29° 38' 46.03 E"'					
		LChord Distance	1512.533'	Bearing	N 44° 41' 0.5 E"			
		External Distance	103.354'					
		Middle Ordinate	99.815'					
		Radius	2914.898'					
		DEG	1° 57' 56.23"'					
		DELTA	30° 4' 28.93"'					
		LENGTH	1530.038'					
	PT N	446760.782	E	869873.386			Station	164+36.22(3)
Tangent	N	446760.782	E	869873.386	Z		Station	164+36.22(3)
	Distance	2422.545'	Bearing	N 29° 38' 46.03 E"				

2

Alignment: USH 53

Arc								
	PC N	448866.209	E	871071.678			Station	188+58.76(3)
	CC N	447053.523	E	874256.61				
	PI N	449534.851	E	871452.231			Station	196+28.11(3)
		TAN	769.353'					
		DB	N 29° 38' 46.03 E"'					
		DA	N 53° 21' 32.42 E"'					
		LChord Distance	1505.878'	Bearing	N 41° 30' 9.23 E"			
		External Distance	79.888'					
		Middle Ordinate	78.184'					
		Radius	3664.645'					
		DEG	1° 33' 48.51"'					
		DELTA	23° 42' 46.39"'					
		LENGTH	1516.679'					
	PT N	449994	E	872069.553			Station	203+75.44(3)
Tangent	N	449994	E	872069.553	Z		Station	203+75.44(3)
	Distance	1813.045'	Bearing	N 53° 21' 32.42 E"				
Arc								
	PC N	451076.024	E	873524.323			Station	221+88.49(3)
	CC N	446478.664	E	876943.73				
	PI N	451232	E	873734.031			Station	224+49.84(3)
		TAN	261.353'					
		DB	N 53° 21' 32.42 E"'					
		DA	N 58° 34' 56.83 E"'					
		LChord Distance	522.164'	Bearing	N 55° 58' 14.63 E"			
		External Distance	5.958'					
		Middle Ordinate	5.952'					
		Radius	5729.578'					
		DEG	1° 0' 0"'					
		DELTA	5° 13' 24.41"'					
		LENGTH	522.345'					
	PT N	451368.236	E	873957.067			Station	227+10.83(3)
Tangent	N	451368.236	E	873957.067	Z		Station	227+10.83(3)
	Distance	3115.946'	Bearing	N 58° 34' 56.83 E"				

2

Alignment: USH 53

Arc								
	PC N	452992.488	E	876616.189			Station	258+26.78(3)
	CC N	438961.85	E	885186.426				
	PI N	453178.096	E	876920.055			Station	261+82.85(3)
		TAN	356.069'					
		DB	N 58° 34' 56.83 E'"					
		DA	N 61° 3' 49.73 E'"					
		LChord Distance	711.971'	Bearing	N 59° 49' 23.28 E"			
		External Distance	3.855'					
		Middle Ordinate	3.854'					
		Radius	16441.039'					
		DEG	0° 20' 54.57'"					
		DELTA	2° 28' 52.89'"					
		LENGTH	712.026'					
	PT N	453350.375	E	877231.672			Station	265+38.8(3)
Tangent	N	453350.375	E	877231.672	Z		Station	265+38.8(3)
	Distance	3113.100'	Bearing	N 61° 3' 49.73 E"				
Arc								
	PC N	454856.602	E	879956.129			Station	296+51.9(3)
	CC N	456875.927	E	878839.738				
	PI N	455276.347	E	880715.362			Station	305+19.44(3)
		TAN	867.537'					
		DB	N 61° 3' 49.73 E'"					
		DA	N 19° 51' 10.51 E'"					
		LChord Distance	1624.075'	Bearing	N 40° 27' 30.12 E"			
		External Distance	157.701'					
		Middle Ordinate	147.612'					
		Radius	2307.380'					
		DEG	2° 28' 59.35'"					
		DELTA	41° 12' 39.21'"					
		LENGTH	1659.619'					
	PT N	456092.325	E	881009.984			Station	313+11.52(3)
Tangent	N	456092.325	E	881009.984	Z		Station	313+11.52(3)
	Distance	1366.247'	Bearing	N 19° 51' 10.51 E"				

2

Alignment: USH 53

Arc								
	PC N	457377.373	E	881473.971			Station	326+77.77(3)
	CC N	456123.622	E	884946.329				
	PI N	457775.039	E	881617.554			Station	330+80.56(4)
		TAN	422.794'					
		DB	N 19° 51' 10.51 E"'					
		DA	N 32° 55' 9.87 E"'					
		LChord Distance	840.097'	Bearing	N 26° 23' 10.19 E"			
		External Distance	24.131'					
		Middle Ordinate	23.974'					
		Radius	3691.770'					
		DEG	1° 33' 7.15"'					
		DELTA	13° 3' 59.36"'					
		LENGTH	841.920'					
	PT N	458129.947	E	881847.326			Station	334+99.69(4)
Tangent	N	458129.947	E	881847.326	Z		Station	334+99.69(4)
	Distance	860.263'	Bearing	N 32° 55' 9.87 E"				
Arc								
	PC N	458852.083	E	882314.843			Station	343+59.95(4)
	CC N	455738.293	E	887124.456				
	PI N	458944.992	E	882374.994			Station	344+70.63(4)
		TAN	110.681'					
		DB	N 32° 55' 9.87 E"'					
		DA	N 35° 7' 57.91 E"'					
		LChord Distance	221.320'	Bearing	N 34° 1' 33.89 E"			
		External Distance	1.069'					
		Middle Ordinate	1.069'					
		Radius	5729.578'					
		DEG	1° 0' 0"'					
		DELTA	2° 12' 48.03"'					
		LENGTH	221.334'					
	PT N	459035.509	E	882438.687			Station	345+81.29(4)
Tangent	N	459035.509	E	882438.687	Z		Station	345+81.29(4)
	Distance	496.164'	Bearing	N 35° 7' 57.91 E"				
Tangent	N	459441.283	E	882724.216	Z		Station	350+77.45(4)
	Distance	1434.130'	Bearing	N 34° 33' 53.16 E"				

2

Alignment: USH 53								
Arc								
	PC N	460622.268	E	883537.852			Station	365+11.58(4)
	CC N	461028.594	E	882948.074				
	PI N	460759.105	E	883632.125			Station	366+77.75(4)
		TAN	166.168'					
		DB	N 34° 33' 53.16 E"'					
		DA	N 8° 26' 24.45 E"'					
		LChord Distance	323.737'	Bearing	N 21° 30' 8.81 E"			
		External Distance	19.024'					
		Middle Ordinate	18.532'					
		Radius	716.197'					
		DEG	8° 0' 0"'					
		DELTA	26° 7' 28.71"'					
		LENGTH	326.558'					
	PT N	460923.473	E	883656.515			Station	368+38.14(4)
Tangent	N	460923.473	E	883656.515	Z		Station	368+38.14(4)
	Distance	700.696'	Bearing	N 8° 26' 24.45 E"				
End	N	461616.58	E	883759.36	Z		Station	02+54.77(5)
Alignment Length = 39582.11'								

DATE 16NOV15 E S T I M A T E O F Q U A N T I T I E S

LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1630-02-71 QUANTITY
0020	204.0110	Removing Asphaltic Surface	SY	160.000	160.000
0030	204.0115	Removing Asphaltic Surface Butt Joints	SY	5,875.000	5,875.000
0040	204.0120	Removing Asphaltic Surface Milling	SY	179,808.000	179,808.000
0050	204.0150	Removing Curb & Gutter	LF	1,098.000	1,098.000
0060	204.0155	Removing Concrete Sidewalk	SY	966.000	966.000
0080	204.0220	Removing Inlets	EACH	1.000	1.000
0110	205.0100	Excavation Common	CY	100.000	100.000
0120	205.9010.S	Grading and Shaping Intersection (location) 01. Ervin St and Main St	LS	1.000	1.000
0160	213.0100	Finishing Roadway (project) 02. 1630-02-71	EACH	1.000	1.000
0170	305.0110	Base Aggregate Dense 3/4-Inch	TON	3,462.000	3,462.000
0190	305.0500	Shaping Shoulders	STA	693.000	693.000
0220	440.4410	Incentive IRI Ride	DOL	31,600.000	31,600.000
0230	455.0605	Tack Coat	GAL	15,069.000	15,069.000
0240	460.2000	Incentive Density HMA Pavement	DOL	20,360.000	20,360.000
0250	460.4110.S	Reheating HMA Pavement Longitudinal Joints	LF	41,041.000	41,041.000
0260	465.0105	Asphaltic Surface	TON	509.000	509.000
0270	465.0110	Asphaltic Surface Patching	TON	100.000	100.000
0280	465.0120	Asphaltic Surface Driveways and Field Entrances	TON	185.000	185.000
0340	520.8700	Cleaning Culvert Pipes	EACH	5.000	5.000
0350	522.0330	Culvert Pipe Reinforced Concrete Class IV 30-Inch	LF	8.000	8.000
0360	522.1024	Apron Endwalls for Culvert Pipe Reinforced Concrete 24-Inch	EACH	22.000	22.000
0370	522.1030	Apron Endwalls for Culvert Pipe Reinforced Concrete 30-Inch	EACH	6.000	6.000
0380	601.0411	Concrete Curb & Gutter 30-Inch Type D	LF	1,386.000	1,386.000
0420	602.0415	Concrete Sidewalk 6-Inch	SF	9,201.000	9,201.000
0430	602.0515	Curb Ramp Detectable Warning Field Natural Patina	SF	350.000	350.000
0460	608.0412	Storm Sewer Pipe Reinforced Concrete Class IV 12-Inch	LF	10.000	10.000
0480	611.0624	Inlet Covers Type H	EACH	1.000	1.000
0490	611.3220	Inlets 2x2-FT	EACH	1.000	1.000
0500	611.8110	Adjusting Manhole Covers	EACH	1.000	1.000
0510	611.8115	Adjusting Inlet Covers	EACH	2.000	2.000
0520	614.0010	Barrier System Grading Shaping Finishing	EACH	16.000	16.000
0540	614.0200	Steel Thrie Beam Structure Approach	LF	62.000	62.000
0550	614.0305	Steel Plate Beam Guard Class A	LF	288.000	288.000
0560	614.0345	Steel Plate Beam Guard Short Radius	LF	50.000	50.000
0570	614.0390	Steel Plate Beam Guard Short Radius Terminal	EACH	3.000	3.000
0580	614.0920	Salvaged Rail	LF	2,750.000	2,750.000
0590	614.2300	MGS Guardrail 3	LF	1,625.000	1,625.000
0600	614.2500	MGS Thrie Beam Transition	LF	197.000	197.000
0610	614.2610	MGS Guardrail Terminal EAT	EACH	13.000	13.000
0620	618.0100	Maintenance And Repair of Haul Roads (project) 02. 1630-02-71	EACH	1.000	1.000
0630	619.1000	Mobilization	EACH	0.800	0.800
0640	620.0300	Concrete Median Sloped Nose	SF	80.000	80.000
0650	624.0100	Water	MGAL	35.000	35.000
0660	625.0100	Topsoil	SY	200.000	200.000
0670	625.0500	Salvaged Topsoil	SY	750.000	750.000

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DATE 16NOV15 E S T I M A T E O F Q U A N T I T I E S

LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1630-02-71 QUANTITY
0680	627.0200	Mulching	SY	100.000	100.000
0690	628.1504	Silt Fence	LF	1,605.000	1,605.000
0700	628.1520	Silt Fence Maintenance	LF	1,605.000	1,605.000
0710	628.1905	Mobilizations Erosion Control	EACH	4.000	4.000
0720	628.1910	Mobilizations Emergency Erosion Control	EACH	8.000	8.000
0730	628.2008	Erosion Mat Urban Class I Type B	SY	50.000	50.000
0740	628.2023	Erosion Mat Class II Type B	SY	1,200.000	1,200.000
0750	628.7005	Inlet Protection Type A	EACH	3.000	3.000
0760	628.7015	Inlet Protection Type C	EACH	39.000	39.000
0770	628.7504	Temporary Ditch Checks	LF	45.000	45.000
0780	628.7555	Culvert Pipe Checks	EACH	60.000	60.000
0790	629.0210	Fertilizer Type B	CWT	1.100	1.100
0800	630.0130	Seeding Mixture No. 30	LB	120.000	120.000
0810	630.0140	Seeding Mixture No. 40	LB	10.000	10.000
0820	630.0200	Seeding Temporary	LB	175.000	175.000
0830	633.5200	Markers Culvert End	EACH	58.000	58.000
0840	634.0614	Posts Wood 4x6-Inch X 14-FT	EACH	40.000	40.000
0850	634.0616	Posts Wood 4x6-Inch X 16-FT	EACH	131.000	131.000
0860	634.0618	Posts Wood 4x6-Inch X 18-FT	EACH	8.000	8.000
0870	634.0814	Posts Tubular Steel 2x2-Inch X 14-FT	EACH	3.000	3.000
0880	634.0816	Posts Tubular Steel 2x2-Inch X 16-FT	EACH	9.000	9.000
0890	637.2210	Signs Type II Reflective H	SF	1,258.880	1,258.880
0900	637.2230	Signs Type II Reflective F	SF	392.000	392.000
0910	638.2102	Moving Signs Type II	EACH	1.000	1.000
0920	638.2602	Removing Signs Type II	EACH	344.000	344.000
0930	638.3000	Removing Small Sign Supports	EACH	200.000	200.000
0950	642.5201	Field Office Type C	EACH	0.800	0.800
0970	643.0100	Traffic Control (project) 02. Project 1630-02-71	EACH	1.000	1.000
0980	643.0300	Traffic Control Drums	DAY	2,000.000	2,000.000
1020	643.0900	Traffic Control Signs	DAY	6,882.000	6,882.000
1030	646.0106	Pavement Marking Epoxy 4-Inch	LF	90,380.000	90,380.000
1040	646.0126	Pavement Marking Epoxy 8-Inch	LF	515.000	515.000
1050	646.0406	Pavement Marking Same Day Epoxy 4-Inch	LF	44,500.000	44,500.000
1070	647.0110	Pavement Marking Railroad Crossings Epoxy	EACH	2.000	2.000
1080	647.0166	Pavement Marking Arrows Epoxy Type 2	EACH	2.000	2.000
1090	647.0356	Pavement Marking Words Epoxy	EACH	2.000	2.000
1100	647.0456	Pavement Marking Curb Epoxy	LF	40.000	40.000
1110	647.0566	Pavement Marking Stop Line Epoxy 18-Inch	LF	74.000	74.000
1130	647.0606	Pavement Marking Island Nose Epoxy	EACH	4.000	4.000
1140	647.0656	Pavement Marking Parking Stall Epoxy	LF	344.000	344.000
1150	647.0766	Pavement Marking Crosswalk Epoxy 6-Inch	LF	2,324.000	2,324.000
1160	648.0100	Locating No-Passing Zones	MI	8.000	8.000
1170	649.0100	Temporary Pavement Marking 4-Inch	LF	66,000.000	66,000.000
1210	650.4000	Construction Staking Storm Sewer	EACH	1.000	1.000
1220	650.4500	Construction Staking Subgrade	LF	500.000	500.000
1230	650.5000	Construction Staking Base	LF	500.000	500.000
1240	650.5500	Construction Staking Curb Gutter and Curb & Gutter	LF	1,386.000	1,386.000
1270	650.8000	Construction Staking Resurfacing Reference	LF	41,041.000	41,041.000
1290	650.9910	Construction Staking Supplemental Control (project) 02. Project 1630-02-71	LS	1.000	1.000

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DATE 16NOV15 E S T I M A T E O F Q U A N T I T I E S

LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1630-02-71 QUANTITY
1300	650.9920	Construction Staking Slope Stakes	LF	217.000	217.000
1320	690.0150	Sawing Asphalt	LF	3,788.000	3,788.000
1330	690.0250	Sawing Concrete	LF	330.000	330.000
1350	SPV.0090	Special 01. Concrete Curb and Gutter Cure and Seal Treatment	LF	1,386.000	1,386.000
1360	SPV.0090	Special 02. HMA Lane Repair Special	LF	8,200.000	8,200.000
1370	SPV.0105	Special 01. Prepare Foundation For Asphaltic Paving Special	LS	1.000	1.000
1380	SPV.0105	Special 02. Material Transfer Vehicle	LS	1.000	1.000
1390	SPV.0105	Special 03. Milling and Removing Temporary Joint	LS	1.000	1.000
1400	SPV.0165	Special 01. Concrete Sidewalk Cure and Seal Treatment	SF	9,201.000	9,201.000
1410	SPV.0180	Special 01. Cleaning, Grading, and Shaping Existing Ditch	SY	618.000	618.000
1420	SPV.0195	Special 01. HMA Pavement Type E-3 Special	TON	29,209.000	29,209.000

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Removing Asphaltic Surface

204.0110

CATEGORY	STATION	TO	STATION		LOCATION	SY
0010	8+15 'E'	-	8+17 'E'	LT	ERWIN AND SHERWOOD STREETS	6
0010	4+50 'E'	-	102+06 'M'	LT	MAIN AND ERVIN STREETS	65
0010	101+28 'E'	-	101+32 'E'	LT	MAIN STREET AND CTH D	6
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	6
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	6
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	6
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	6
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	6
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	6
0010	114+50 'M'	-	114+50'M'	LT	MAIN AND DEWEY STREETS	6
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	6
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	6
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	6
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	6
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	6
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	6
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	6
0010	10+30 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	6
					TOTAL 0010	160

Removing Asphaltic Butt Joints

204.0115

CAT	LOCATION	SY	REMARKS
0010	BEGIN CONST	250	
0010	INTERSECTIONS	1500	70 SY EACH RURAL INT
0010	STRUCTURES	1200	600 SY EACH RURAL STRUCTURE
0010	DRIVEWAYS	2675	107 SY EACH DRIVEWAY
0010	END CONST	250	
	TOTAL 0010	5875	

Removing Asphaltic Surface Milling

204.0120

CAT	STATION	TO	STATION	LOCATION	SY	REMARKS
0010	1+10.00	-	12+08.45	LT & RT	2929	
0010	12+08.45	-	17+37.60	LT & RT	1411	
0010	17+37.60	-	28+78.00	LT & RT	3041	
0010	101+00.00	-	110+30.25	LT & RT	2481	
0010	110+30.25	-	123+92.20	LT & RT	3632	
0010	9+35.02	-	11+82.82	LT & RT	661	
0010	11+82.82	-	14+60.00	LT & RT	739	
0010	14+60.00	-	15+87.66	LT & RT	340	
0010	26+75.00	-	35+00.00	LT & RT	2750	
0010	35+00.00	-	39+98.10	LT & RT	1660	
0010	36+48.10	-	39+98.10	15'-24' RT	350	
0010	33+32.00	-	37+32.00	15'-24' RT	400	
0010	74+66.00	-	82+16.00	15'-24' LT	750	
0010	181+50.00	-	185+30.00	15'-24' LT	380	
0010	185+30.00	-	189+70.00	15'-24' LT	440	
0010	33+32.00	-	330+00.00	LT & RT	98893	
0010	69+66.00	-	70+66.00	15'-22' LT & RT	156	
0010	72+49.00	-	73+49.00	15'-22' LT & RT	156	
0010	102+00.00	-	130+00.00	15'-18' LT & RT	1867	
0010	329+80.00	-	337+00.00	LT & RT	2400	
0010	337+00.00	-	348+50.00	LT & RT	3833	
0010	348+50.00	-	351+16.00	LT & RT	887	
0010	351+16.00	-	357+25.45	LT & RT	1761	
0010	357+25.45	-	373+50.00	LT & RT	4693	
0010	25+00'T'	-	351+16'V'	INTERSECTIONS	11000	500 SY EACH RURAL
0010				SHLD AT GUARDRAIL	720	45 SY EACH EAT
0010				UNDISTRIBUTED	14833	
				TOTAL 0010	163163	
0020	351+16.00	-	357+25.45	13'-22' LT & RT	1216	'V' EKERN ST PIGEON FALLS PARKING LANES
0020	357+25.45	-	373+50.00	13'-24' AVG LT & RT	3972	'V' EKERN ST PIGEON FALLS PARKING LANES
				TOTAL 0020	5188	
0030	3+00.00	-	12+08.45	12'-22' LT & RT	2533	'E' ERVIN ST WHITEHALL PARKING LANES
0030	101+00.00	-	110+30.25	12'-24' LT & RT	2480	'M' MAIN ST WHITEHALL PARKING LANES
0030	110+30.25	-	123+92.20	12'-28.5' LT & RT	4994	'M' MAIN ST WHITEHALL PARKING LANES
0030	9+35.02	-	15+87.66	12'-22' LT & RT	1450	'T' MAIN ST WHITEHALL PARKING LANES
				TOTAL 0030	11457	
				PROJECT TOTAL	179808	

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Removing Curb & Gutter

CATEGORY	STATION	TO	STATION	LOCATION	204.0150 LF	REMARKS
0010	12+50 'E'	-	12+50 'E' RT	ERVIN AND CLAIRE STREETS	16	
0010	12+50 'E'	-	12+50 'E' LT	ERVIN AND ROOSEVELT STREETS	26	
0010	8+00 'E'	-	8+00 'E' RT	ERVIN AND SHERWOOD STREETS	15	
0010	8+15 'E'	-	8+17 'E' LT	ERVIN AND SHERWOOD STREETS	26	
0010	8+50 'E'	-	8+50 'E' LT	ERVIN AND SHERWOOD STREETS	24	
0010	4+25 'E'	-	4+25 'E' RT	ERVIN AND ABRAMS STREET	19	
0010	4+75 'E'	-	4+75 'E' RT	ERVIN AND ABRAMS STREET	25	
0010	2+44 'E'	-	2+44 'E' RT	INTERSECTION OF MAIN AND ERVIN STREETS	20	
0010	4+50 'E'	-	102+07 'M' LT	INTERSECTION OF MAIN AND ERVIN STREETS	279	
0010	101+28 'M'	-	101+32 'M' LT	ERVIN AND CTH D	30	
0010	105+10 'M'	-	105+10 'M' LT	MAIN AND LINCOLN STREETS	29	
0010	105+60 'M'	-	105+60 'M' LT	MAIN AND LINCOLN STREETS	22	
0010	110+00 'M'	-	110+00 'M' LT	MAIN AND HOBSON STREETS	29	
0010	110+00 'M'	-	110+00 'M' RT	MAIN AND HOBSON STREETS	29	
0010	110+75 'M'	-	110+75 'M' LT	MAIN AND HOBSON STREETS	28	
0010	110+75 'M'	-	110+75 'M' RT	MAIN AND HOBSON STREETS	22	
0010	113+00 'M'	-	113+00 'M' RT	MAIN AND KELLEY STREETS	31	
0010	113+60 'M'	-	113+60 'M' RT	MAIN AND KELLEY STREETS	26	
0010	113+90 'M'	-	113+90 'M' LT	MAIN AND DEWEY STREETS	28	
0010	114+50 'M'	-	114+50 'M' LT	MAIN AND DEWEY STREETS	32	
0010	114+50 'M'	-	114+50 'M' RT	MAIN AND DEWEY STREETS	21	
0010	118+10 'M'	-	118+10 'M' RT	MAIN AND DODGE STREETS	24	
0010	118+10 'M'	-	118+10 'M' LT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M' RT	MAIN AND DODGE STREETS	22	
0010	118+10 'M'	-	118+10 'M' LT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M' RT	MAIN AND DODGE STREETS	22	
0010	118+75 'M'	-	118+75 'M' LT	MAIN AND DODGE STREETS	28	
0010	121+00 'M'	-	121+00 'M' LT	MAIN AND SCRANTON STREETS	23	
0010	121+00 'M'	-	121+00 'M' RT	MAIN AND SCRANTON STREETS	27	
0010	121+75 'M'	-	121+75 'M' LT	MAIN AND SCRANTON STREETS	30	
0010	121+75 'M'	-	121+75 'M' RT	MAIN AND SCRANTON STREETS	20	
0010	9+72 'R'	-	9+72 'R' LT	MAIN AND BLAIR STREETS	23	
0010	9+72 'R'	-	9+72 'R' RT	MAIN AND BLAIR STREETS	21	
0010	10+30 'R'	-	10+30 'R' LT	MAIN AND BLAIR STREETS	24	
0010	10+30 'R'	-	10+30 'R' RT	MAIN AND BLAIR STREETS	25	
0010	50+50	-	50+50 LT	MAIN STREET AND STH 121	25	
				TOTAL 0010	1098	

Removing Concrete Sidewalk

CATEGORY	STATION	TO	STATION	LOCATION	204.0155 SY	REMARKS
0010	12+50 'E'	-	12+50 'E' RT	ERVIN AND CLAIRE STREETS	17	
0010	12+50 'E'	-	12+50 'E' LT	ERVIN AND ROOSEVELT STREETS	17	
0010	8+00 'E'	-	8+00 'E' RT	ERWIN AND SHERWOOD STREETS	11	
0010	8+15 'E'	-	8+17 'E' LT	ERWIN AND SHERWOOD STREETS	23	
0010	8+15 'E'	-	8+17 'E' LT	ERWIN AND SHERWOOD STREETS	23	
0010	4+25 'E'	-	4+25 'E' RT	ERVIN AND ABRAMS STREET	12	
0010	4+75 'E'	-	4+75 'E' RT	ERVIN AND ABRAMS STREET	17	
0010	2+34 'E'	-	3+19 'E' RT	MAIN AND ERVIN STREETS	53	
0010	4+50 'E'	-	102+06 'M' LT	MAIN AND ERVIN STREETS	169	
0010	101+28 'E'	-	101+32 'E' LT	MAIN STREET AND CTH D	20	
0010	105+10 'M'	-	105+10 'M' LT	MAIN AND LINCOLN STREETS	22	
0010	105+60 'M'	-	105+60 'M' LT	MAIN AND LINCOLN STREETS	19	
0010	110+00 'M'	-	110+00 'M' LT	MAIN AND HOBSON STREETS	22	
0010	110+00 'M'	-	110+00 'M' RT	MAIN AND HOBSON STREETS	20	
0010	110+75 'M'	-	110+75 'M' LT	MAIN AND HOBSON STREETS	27	
0010	110+75 'M'	-	110+75 'M' RT	MAIN AND HOBSON STREETS	25	
0010	113+00 'M'	-	113+00 'M' RT	MAIN AND KELLEY STREETS	19	
0010	113+60 'M'	-	113+60 'M' RT	MAIN AND KELLEY STREETS	25	
0010	113+90 'M'	-	113+90 'M' LT	MAIN AND DEWEY STREETS	27	
0010	114+50 'M'	-	114+50 'M' LT	MAIN AND DEWEY STREETS	27	
0010	114+50 'M'	-	114+50 'M' RT	MAIN AND DEWEY STREETS	24	
0010	118+10 'M'	-	118+10 'M' LT	MAIN AND DODGE STREETS	29	
0010	118+10 'M'	-	118+10 'M' RT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M' LT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M' RT	MAIN AND DODGE STREETS	29	
0010	121+00 'M'	-	121+00 'M' LT	MAIN AND SCRANTON STREETS	29	
0010	121+00 'M'	-	121+00 'M' RT	MAIN AND SCRANTON STREETS	27	
0010	121+75 'M'	-	121+75 'M' LT	MAIN AND SCRANTON STREETS	28	
0010	121+75 'M'	-	121+75 'M' RT	MAIN AND SCRANTON STREETS	29	
0010	9+72 'R'	-	9+72 'R' LT	MAIN AND BLAIR STREETS	28	
0010	9+72 'R'	-	9+72 'R' RT	MAIN AND BLAIR STREETS	29	
0010	10+30 'R'	-	10+30 'R' LT	MAIN AND BLAIR STREETS	18	
0010	10+30 'R'	-	10+30 'R' RT	MAIN AND BLAIR STREETS	24	
0010	50+50	-	50+50 LT	MAIN STREET AND STH 121	19	
				TOTAL 0010	966	

Removing Inlets

CATEGORY	STATION	LOCATION	204.0220 EACH	REMARKS
0010	204+33 'M' RT	INTERSECTION OF MAIN AND ERVIN STREETS	1	
		TOTAL 0010	1	

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Excavation Common

CATEGORY	STATION	TO	STATION	LOCATION	205.0100 CY	REMARKS
0010	25+00 'R'	-	28+60 'R'	SCHAEFER PROPERTY AREA	100	
				TOTAL 0010	100	

Grading & Shaping Intersection (Ervin St and Main St)

CATEGORY	LOCATION	205.9010.S LS	REMARKS
0010	INTERSECTION	1	
	TOTAL 0010	1	

EXCAVATION COMMON (CY)	BORROW (CY)	SALVAGED TOPSOIL (SY)		FERTILIZER TYPE B (CWT)	TEMPORARY SEEDING (LB)	SEEDING MIX #40 (LB)	MULCHING (SY)
191	46	233	2100.00	0.15	6.3	4.2	233.3

NOTE: ITEMS AND QUANTITIES ARE FOR INFORMATION ONLY.

Finishing Roadway (Project 1630-02-71)

CATEGORY	LOCATION	213.0100 EACH	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Base Aggregate Dense 3/4-Inch

CATEGORY	STATION	TO	STATION		LOCATION	305.0110 TON	REMARKS
0010	28+78 'E'	-	12+05 'E'	RT	ERVIN STREET	81	SHOULDERS
0010	28+78 'E'	-	12+05 'E'	LT	ERVIN STREET	81	SHOULDERS
0010	26+60 'R'	-	351+00 'V'	RT	WHITEHALL TO PIGEON FALLS	1600	SHOULDERS
0010	26+60 'R'	-	351+00 'V'	LT	WHITEHALL TO PIGEON FALLS	1600	SHOULDERS
0010					PROJECT	100	GRAVEL DRIVEWAYS AND FIELD ENTRANCES
					TOTAL 0010	3462	

Shaping Shoulders

CATEGORY	STATION	TO	STATION	LOCATION	305.0500 STA	REMARKS
0010	12+08	-	17+37	'E' RT	5	
0010	12+08	-	17+37	'E' LT	5	
0010	17+37	-	28+78	'E' RT	11	
0010	17+37	-	28+78	'E' LT	11	
0010	26+50	-	35+00	'T' RT	9	
0010	26+50	-	35+00	'T' LT	9	
0010	35+00	-	39+98	'T' RT	5	
0010	35+00	-	39+98	'T' LT	5	
0010	33+32	-	70+67	'R' RT	37	
0010	33+32	-	70+67	'R' LT	37	
0010	72+48	-	239+61	'R' RT	167	
0010	72+48	-	239+61	'R' LT	167	
0010	239+61	-	330+00	'R' RT	90	
0010	239+61	-	330+00	'R' LT	90	
0010	329+80	-	337+00	'A' RT	7	
0010	329+80	-	337+00	'A' LT	7	
0010	337+00	-	348+50	'V' RT	12	
0010	337+00	-	348+50	'V' LT	12	
0010	348+50	-	351+16	'V' RT	3	
0010	348+50	-	351+16	'V' LT	3	
				TOTAL 0010	693	

Tack Coat

CATEGORY	STATION	TO	STATION	LOCATION	455.0605 GAL	REMARKS
0010	1+10.00	-	12+08.45	LT & RT	278	APPLICATION RATE 0.07 GAL/SY ON MILLED
0010	12+08.45	-	17+37.60	LT & RT	134	SURFACE AND 0.025 GAL/SY ON BINDER
0010	17+37.60	-	28+78.00	LT & RT	289	
0010	101+00.00	-	110+30.25	LT & RT	236	
0010	110+30.25	-	123+92.20	LT & RT	345	
0010	9+35.02	-	11+82.82	LT & RT	63	
0010	11+82.82	-	14+60.00	LT & RT	70	
0010	14+60.00	-	15+87.66	LT & RT	32	
0010	26+75.00	-	35+00.00	LT & RT	261	
0010	35+00.00	-	39+98.10	LT & RT	158	
0010	36+48.10	-	39+98.10	15'-24' RT	33	
0010	33+32.00	-	37+32.00	15'-24' RT	38	
0010	74+66.00	-	82+16.00	15'-24' LT	71	
0010	181+50.00	-	185+30.00	15'-24' LT	36	
0010	185+30.00	-	189+70.00	15'-24' LT	42	
0010	33+32.00	-	330+00.00	LT & RT	9395	
0010	69+66.00	-	70+66.00	15'-22' LT & RT	15	
0010	72+49.00	-	73+49.00	15'-22' LT & RT	15	
0010	102+00.00	-	130+00.00	15'-18' LT & RT	177	
0010	329+80.00	-	337+00.00	LT & RT	228	
0010	337+00.00	-	348+50.00	LT & RT	364	
0010	348+50.00	-	351+16.00	LT & RT	84	
0010	351+16.00	-	357+25.45	LT & RT	283	
0010	357+25.45	-	373+50.00	LT & RT	446	
0010	25+00'T'	-	351+16'V'	INTERSECTIONS	770	500 SY EACH RURAL
0010		-		SHLD AT GUARDRAIL	50	45 SY EACH EAT
				TOTAL 0010	13914	
0020	351+16.00	-	357+25.45	13'-22' LT & RT	85	'V' EKERN ST PIGEON FALLS PARKING LANES
0020	357+25.45	-	373+50.00	13'-24' AVG LT & RT	303	'V' EKERN ST PIGEON FALLS PARKING LANES
				TOTAL 0020	389	
0030	3+00.00	-	12+08.45	12'-22' LT & RT	141	'E' ERVIN ST WHITEHALL PARKING LANES
0030	101+00.00	-	110+30.25	12'-24' LT & RT	174	'M' MAIN ST WHITEHALL PARKING LANES
0030	110+30.25	-	123+92.20	12'-28.5' LT & RT	350	'M' MAIN ST WHITEHALL PARKING LANES
0030	9+35.02	-	15+87.66	12'-22' LT & RT	102	'T' MAIN ST WHITEHALL PARKING LANES
				TOTAL 0030	766	
				PROJECT TOTAL	15069	

Reheating HMA Pavement Longitudinal Joints

CATEGORY	LOCATION	460.4110.S LF	REMARKS
0010	PROJECT	41041	
	TOTAL 0010	41041	

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Asphaltic Surface

CATEGORY	STATION	TO	STATION	LOCATION	465.0105 TON	REMARKS
0010	178+00 'R'	-	180+00 'R'	PROJECT	500	CULVERT PIPE REPAIR
0010	116+25 'M'	-	116+50 'M'	RR CROSSING	4.5	RR CROSSING SIDEWALK SOUTH SIDE
0010	116+55 'M'	-	116+80 'M'	RR CROSSING	4.5	RR CROSSING SIDEWALK NORTH SIDE
				TOTAL 0010	509	

Asphaltic Surface Patching

CATEGORY	LOCATION	465.0110 TON	REMARKS
0010	UNDISTRIBUTED	100	
	TOTAL 0010	100	

Asphaltic Surface Driveways and Field Entrances

CATEGORY	LOCATION	465.0120 TON	REMARKS
0010	3+39 'E'.RT.	185	37 DRIVEWAYS AT AN ESTIMATED 5 TONS EACH. SEE PLAN SHEETS.
	TOTAL 0010	185	

Cleaning Culvert Pipes

CATEGORY	STATION	TO	STATION	LOCATION	520.8700 EACH	REMARKS
0010	28+65 'M'	-	28+65 'M'	EAST OF NORTH RIVER ROAD	1	
0010	130+50 'M'	-	130+50 'M'	EAST OF THOMPSON COULEE ROAD	1	
0010	225+32 'M'	-	225+32 'M'	WEST OF HAUG ROAD	1	
0010	272+00 'M'	-	272+00 'M'	EAST OF FITCH COULEE ROAD	1	
0010	308+12 'M'	-	308+12 'M'	EAST OF FREMSTAD ROAD	1	
				TOTAL 0010	5	

Culvert Pipe Reinforced Concrete Class IV 30-Inch

CATEGORY	STATION		LOCATION	522.0330 LF	REMARKS
0010	180+70 'R'	LT	USH 53	8	UNDER HIGHWAY
			TOTAL 0010	8	

Apron Endwalls for Culvert Pipe Reinforced Concrete 24-Inch

CATEGORY	STATION	TO	STATION		LOCATION	522.1024 EACH	REMARKS
0010	58+00 'R'	-	58+00 'R'	LT	EAST OF FAIRVIEW ROAD	3	
0010	58+00 'R'	-	58+00 'R'	RT	EAST OF FAIRVIEW ROAD	3	
0010	60+20 'R'	-	60+20 'R'	LT	EAST OF FAIRVIEW ROAD	1	
0010	66+04 'R'	-	66+04 'R'	LT	EAST OF FAIRVIEW ROAD	1	
0010	94+77 'R'	-	94+77 'R'	LT	EAST OF SCHANSBERG ROAD	1	
0010	94+77 'R'	-	94+77 'R'	RT	EAST OF SCHANSBERG ROAD	1	
0010	112+76 'R'	-	112+76 'R'	RT	EAST OF BRITTANI ROAD	1	
0010	112+76 'R'	-	112+76 'R'	LT	EAST OF BRITTANI ROAD	1	
0010	116+74 'R'	-	116+74 'R'	LT	WEST OF THOMPSON COULEE ROAD	1	
0010	116+74 'R'	-	116+74 'R'	RT	WEST OF THOMPSON COULEE ROAD	1	
0010	124+75 'R'	-	124+75 'R'	LT	EAST OF THOMPSON COULEE ROAD	1	
0010	124+75 'R'	-	124+75 'R'	RT	EAST OF THOMPSON COULEE ROAD	1	
0010	203+89 'R'	-	203+89 'R'	RT	EAST OF DISSMORE COULEE ROAD	1	
0010	253+87 'R'	-	253+87 'R'	LT	EAST OF FITCH COULEE ROAD	1	
0010	253+87 'R'	-	253+87 'R'	RT	EAST OF FITCH COULEE ROAD	1	
0010	331+21 'A'	-	331+21 'A'	RT	WEST OF FULLER ROAD	1	
0010	335+00 'A'	-	335+00 'A'	RT	EAST OF FULLER ROAD	1	
0010	335+00 'A'	-	335+00 'A'	LT	EAST OF FULLER ROAD	1	
					TOTAL 0010	22	

Apron Endwalls for Culvert Pipe Reinforced Concrete 30-Inch

CATEGORY	STATION	TO	STATION		LOCATION	522.1030 EACH	REMARKS
0010	109+78 'R'	-	109+78 'R'	RT	EAST OF BRITTANI ROAD	2	
0010	109+78 'R'	-	109+78 'R'	LT	EAST OF BRITTANI ROAD	2	
0010	180+65 'R'	-	180+65 'R'	LT	EAST OF MCRAE LANE	1	
0010	180+65 'R'	-	180+65 'R'	RT	EAST OF MCRAE LANE	1	
					TOTAL 0010	6	

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Concrete Curb & Gutter 30-Inch Type D

CATEGORY	STATION	TO	STATION		LOCATION	601.0411 LF	REMARKS
0010	12+50 'E'	-	12+50 'E'	RT	ERVIN AND CLAIRE STREETS	16	
0010	12+50 'E'	-	12+50 'E'	LT	ERVIN AND ROOSEVELT STREETS	26	
0010	8+00 'E'	-	8+00 'E'	RT	ERVIN AND SHERWOOD STREETS	15	
0010	8+15 'E'	-	8+17 'E'	LT	ERVIN AND SHERWOOD STREETS	26	
0010	8+50 'E'	-	8+50 'E'	LT	ERVIN AND SHERWOOD STREETS	24	
0010	4+25 'E'	-	4+25 'E'	RT	ERVIN AND ABRAMS STREET	19	
0010	4+75 'E'	-	4+75 'E'	RT	ERVIN AND ABRAMS STREET	25	
0010	2+44 'E'	-	2+44 'E'	RT	INTERSECTION OF MAIN AND ERVIN STREETS	20	
0010	4+50 'E'	-	102+07 'M'	LT	INTERSECTION OF MAIN AND ERVIN STREETS	279	
0010	101+28 'M'	-	101+32 'M'	LT	ERVIN AND CTH D	30	
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	29	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	22	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	29	
0010	110+00 'M'	-	110+00 'M'	RT	MAIN AND HOBSON STREETS	29	
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	28	
0010	110+75 'M'	-	110+75 'M'	RT	MAIN AND HOBSON STREETS	22	
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	31	
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	26	
0010	113+90 'M'	-	113+90 'M'	LT	MAIN AND DEWEY STREETS	28	
0010	114+50 'M'	-	114+50 'M'	LT	MAIN AND DEWEY STREETS	32	
0010	114+50 'M'	-	114+50 'M'	RT	MAIN AND DEWEY STREETS	21	
0010	116+29 'M'	-	116+34 'M'	RT	RR CROSSING MEDIAN	82	
0010	116+44 'M'	-	116+50 'M'	RT	RR CROSSING MEDIAN	62	
0010	116+47 'M'	-	116+51 'M'	LT	RR CROSSING MEDIAN	82	
0010	116+62 'M'	-	116+70 'M'	LT	RR CROSSING MEDIAN	62	
0010	118+10 'M'	-	118+10 'M'	RT	MAIN AND DODGE STREETS	24	
0010	118+10 'M'	-	118+10 'M'	RT	MAIN AND DODGE STREETS	24	
0010	118+10 'M'	-	118+10 'M'	LT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M'	RT	MAIN AND DODGE STREETS	22	
0010	118+75 'M'	-	118+75 'M'	LT	MAIN AND DODGE STREETS	28	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	23	
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	27	
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	30	
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	20	
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	23	
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	21	
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	24	
0010	10+30 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	25	
0010	50+50	-	50+50	LT	MAIN AND STH 121	25	
					TOTAL 0010	1386	

Concrete Sidewalk 6-Inch

CATEGORY	STATION	TO	STATION		LOCATION	602.0415 SF	REMARKS
0010	12+50 'E'	-	12+50 'E'	RT	ERVIN AND CLAIRE STREETS	152	
0010	12+50 'E'	-	12+50 'E'	LT	ERVIN AND ROOSEVELT STREETS	155	
0010	8+00 'E'	-	8+00 'E'	RT	ERWIN AND SHERWOOD STREETS	95	
0010	8+15 'E'	-	8+17 'E'	LT	ERWIN AND SHERWOOD STREETS	202	
0010	8+15 'E'	-	8+17 'E'	LT	ERWIN AND SHERWOOD STREETS	202	
0010	4+25 'E'	-	4+25 'E'	RT	ERVIN AND ABRAMS STREET	105	
0010	4+75 'E'	-	4+75 'E'	RT	ERVIN AND ABRAMS STREET	155	
0010	2+34 'E'	-	3+19 'E'	RT	MAIN AND ERVIN STREETS	481	
0010	4+50 'E'	-	102+06 'M'	LT	MAIN AND ERVIN STREETS	1517	
0010	101+28 'E'	-	101+32 'E'	LT	MAIN STREET AND CTH D	180	
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	173	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	173	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	197	
0010	110+00 'M'	-	110+00 'M'	RT	MAIN AND HOBSON STREETS	180	
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	239	
0010	110+75 'M'	-	110+75 'M'	RT	MAIN AND HOBSON STREETS	222	
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	175	
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	222	
0010	113+90 'M'	-	113+90 'M'	LT	MAIN AND DEWEY STREETS	239	
0010	114+50 'M'	-	114+50 'M'	LT	MAIN AND DEWEY STREETS	239	
0010	114+50 'M'	-	114+50 'M'	RT	MAIN AND DEWEY STREETS	217	
0010	115+48 'M'	-	116+30 'M'	RT	RR CROSSING MEDIAN	328	
0010	116+78 'M'	-	117+40 'M'	RT	RR CROSSING MEDIAN	248	
0010	118+10 'M'	-	118+10 'M'	LT	MAIN AND DODGE STREETS	259	
0010	118+10 'M'	-	118+10 'M'	RT	MAIN AND DODGE STREETS	259	
0010	118+75 'M'	-	118+75 'M'	LT	MAIN AND DODGE STREETS	259	
0010	118+75 'M'	-	118+75 'M'	RT	MAIN AND DODGE STREETS	259	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	259	
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	239	
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	249	
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	259	
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	249	
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	259	
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	166	
0010	10+30 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	219	
0010	50+50	-	50+50	LT	MAIN STREET AND STH 121	170	
					TOTAL 0010	9201	

Curb Ramp Detectable Warning Field Natural Patina

602.0515

CATEGORY	STATION	TO	STATION		LOCATION	SF	REMARKS
0010	12+50 'E'	-	12+50 'E'	RT	ERWIN AND CLAIRE STREETS	20	TYPE 1
0010	8+00 'E'	-	8+50 'E'	LT	ERVIN AND SHERWOOD STREETS	30	TYPE 1
0010	4+25 'E'	-	4+75 'E'	RT	ERVIN AND ABRAMS STREET	20	TYPE 1
0010	4+50 'E'	-	102+06 'M'	LT	MAIN AND ERVIN STREETS	30	TYPE 1
0010	101+28 'E'	-	101+32 'E'	LT	MAIN STREET AND CTH D	10	TYPE 1
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	20	TYPE 2
0010	110+00 'M'	-	110+75 'M'	RT	MAIN AND HOBSON STREETS	20	TYPE 1
0010	110+00 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	20	TYPE 1
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	10	TYPE 1
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	10	TYPE 1
0010	114+00 'M'	-	114+50'M'	LT	MAIN AND DEWEY STREETS	30	TYPE 1
0010	118+10 'M'	-	118+75 'M'	RT	MAIN AND DODGE STREETS	20	TYPE 1
0010	118+10 'M'	-	118+75 'M'	LT	MAIN AND DODGE STREETS	20	TYPE 1
0010	121+00 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	20	TYPE 1
0010	121+00 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	20	TYPE 1
0010	9+72 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	20	TYPE 1
0010	9+72 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	20	TYPE 1
0010	50+50	-	50+50	LT	MAIN AND STH 121	10	TYPE 1
					TOTAL 0010	350	

Storm Sewer Pipe Reinforced Concrete Class IV 12-Inch

608.0412

CATEGORY	STATION	TO	STATION		LOCATION	LF	REMARKS
0010	4+10 'E'	-	4+10 'E'	LT	MAIN AND ERVIN INTERSECTION	10	FOR INTERSECTION RECONSTRUCTION
					TOTAL 0010	10	

Inlet Covers Type H

611.0624

CATEGORY	STATION		LOCATION	EACH	REMARKS
0010	204+33 'M'	RT	INTERSECTION OF MAIN AND ERVIN STREETS	1	
			TOTAL 0010	1	

Inlets 2x2-FT

611.3220

CATEGORY	STATION	TO	STATION		LOCATION	EACH	REMARKS
0010	4+10 'E'	-	4+10 'E'	LT	MAIN AND ERVIN INTERSECTION	1	FOR INTERSECTION RECONSTRUCTION
					TOTAL 0010	1	

Adjusting Manhole Covers

611.8110

CATEGORY	STATION		LOCATION	EACH	REMARKS
0010	204+33 'M'	RT	INTERSECTION OF MAIN AND ERVIN STREETS	1	
			TOTAL 0010	1	

3

3

Adjusting Inlet Covers

CATEGORY	STATION	TO	STATION	LOCATION	611.8115 EACH	REMARKS
0010	1+50	-	1+50	ERVIN STREET LT.	1	CITY OF WHITEHALL
0010	50+50	-	50+50	EAST MAIN STREET LT.	1	VILLAGE OF PIGEON FALLS
				TOTAL 0010	2	

Barrier System Grading Shaping Finishing

CATEGORY	STATION	LOCATION	614.0010 EACH	REMARKS
0010	33+97 'R'	LT	1	USH 53 AND CTH D
0010	38+34 'R'	LT	1	USH 53 AND CTH D
0010	68+70 'R'	RT	1	PIGEON CREEK BRIDGE
0010	69+68'R'	LT	1	PIGEON CREEK BRIDGE
0010	74+05 'R'	RT	1	PIGEON CREEK BRIDGE
0010	74+30 'R'	LT	1	PIGEON CREEK BRIDGE
0010	176+25 'R'	RT	1	USH 53 AND SIMONSON ROAD
0010	176+25 'R'	LT	1	USH 53 AND SIMONSON ROAD
0010	179+46 'R'	RT	1	USH 53 AND SIMONSON ROAD
0010	180+21 'R'	LT	1	USH 53 AND SIMONSON ROAD
0010	237+35 'R'	LT	1	FITCH COULEE CREEK BRIDGE
0010	237+35 'R'	RT	1	FITCH COULEE CREEK BRIDGE
0010	240+85 'R'	LT	1	FITCH COULEE CREEK BRIDGE
0010	240+95 'R'	RT	1	FITCH COULEE CREEK BRIDGE
0010	303+25 'R'	RT	1	USH 53 AND NORTH OF FREMSTAD ROAD
0010	307+50 'R'	RT	1	USH 53 AND NORTH OF FREMSTAD ROAD
		TOTAL 0010	16	

BARRIER SYSTEM GRADING SHAPING FINISHING

EAT STATION				BORROW	SALVAGED TOPSOIL	FERTILIZER TYPE B	TEMPORARY SEEDING	SEEDING MIX #30	MULCHING
				(CY)	(SY)	(CWT)	(LB)	(LB)	(SY)
33+97 'R'	-	34+47 'R'	LT	17.50	52.78	0.03	1.43	1.43	52.78
37+84 'R'	-	38+34 'R'	LT	17.50	52.78	0.03	1.43	1.43	52.78
68+70 'R'	-	69+20 'R'	RT	11.11	11.11	0.01	0.30	0.30	11.11
69+68 'R'	-	69+76 'R'	LT	11.11	11.11	0.01	0.30	0.30	11.11
73+55 'R'	-	74+05 'R'	RT	11.11	11.11	0.01	0.30	0.30	11.11
73+80 'R'	-	74+30 'R'	LT	11.11	11.11	0.01	0.30	0.30	11.11
176+25 'R'	-	176+75 'R'	RT	7.41	11.11	0.01	0.30	0.30	11.11
176+25 'R'	-	176+75 'R'	LT	7.41	11.11	0.01	0.30	0.30	11.11
178+96 'R'	-	179+46 'R'	RT	7.41	11.11	0.01	0.30	0.30	11.11
179+71 'R'	-	180+21 'R'	LT	7.41	11.11	0.01	0.30	0.30	11.11
237+35 'R'	-	237+85 'R'	LT	7.41	11.11	0.01	0.30	0.30	11.11
237+35 'R'	-	237+85 'R'	RT	7.41	11.11	0.01	0.30	0.30	11.11
237+35 'R'	-	237+85 'R'	RT	7.41	11.11	0.01	0.30	0.30	11.11
240+58 'R'	-	240+66 'R'	LT	7.41	11.11	0.01	0.30	0.30	11.11
240+95 'R'	-	241+03 'R'	RT	7.41	11.11	0.01	0.30	0.30	11.11
303+25 'R'	-	303+75 'R'	RT	11.11	11.11	0.01	0.30	0.30	11.11
307+00 'R'	-	307+50 'R'	RT	11.11	11.11	0.01	0.30	0.30	11.11

NOTE: ITEMS AND QUANTITIES ARE FOR INFORMATION ONLY.

Steel Thrie Beam Structure Approach

CATEGORY	STATION	TO	STATION	LOCATION	614.0200 LF	REMARKS
0010	70+51 'R'	-	70+72 'R'	LT	20.65	B-61-0124 PIGEON CREEK BRIDGE
0010	239+49 'R'	-	239+70 'R'	RT	20.65	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	239+49 'R'	-	239+70 'R'	LT	20.65	B-61-0950 FITCH COULEE CREEK BRIDGE
				TOTAL 0010	62	

Steel Plate Beam Guard Class A

CATEGORY	STATION	TO	STATION	LOCATION	614.0305 LF	REMARKS
0010	69+76 'R'	-	70+51 'R'	LT	75	B-61-0124 PIGEON CREEK BRIDGE
0010	239+70 'R'	-	240+58 'R'	LT	87.5	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	239+70 'R'	-	240+95 'R'	RT	125	B-61-0950 FITCH COULEE CREEK BRIDGE
				TOTAL 0010	288	

3

Steel Plate Beam Guard Short Radius

CATEGORY	STATION	TO	STATION	LOCATION	614.0345 LF	REMARKS
0010	69+68 'R'	-	69+76 'R'	LT	25	16' RADIUS B-61-0124 PIGEON CREEK BRIDGE
0010	240+58 'R'	-	240+66 'R'	LT	12.5	8' RADIUS B-61-0950 FITCH COULEE CREEK BRIDGE
0010	240+95 'R'	-	241+03 'R'	RT	12.5	8' RADIUS B-61-0950 FITCH COULEE CREEK BRIDGE
				TOTAL 0010	50	

Steel Plate Beam Guard Short Radius Terminal

CATEGORY	STATION	TO	STATION	LOCATION	614.0390 EACH	REMARKS
0010	69+68 'R'	-	69+76 'R'	LT	1	B-61-0124 PIGEON CREEK BRIDGE
0010	240+58 'R'	-	240+66 'R'	LT	1	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	240+95 'R'	-	241+03 'R'	RT	1	B-61-0950 FITCH COULEE CREEK BRIDGE
				TOTAL 0010	3	

Salvaged Rail

CATEGORY	STATION	TO	STATION	LOCATION	614.0920 LF	REMARKS
0010	33 + 40 'R'	-	38 + 10 'R'	LT	470	EAST OF CTH D
0010	68 + 70 'R'	-	70 + 60 'R'	RT	190	B-61-0124 PIGEON CREEK BRIDGE
0010	69 + 40 'R'	-	70 + 55 'R'	LT	115	B-61-0124 PIGEON CREEK BRIDGE
0010	72 + 35 'R'	-	74 + 25 'R'	LT	190	B-61-0124 PIGEON CREEK BRIDGE
0010	72 + 30 'R'	-	73 + 55 'R'	RT	125	B-61-0124 PIGEON CREEK BRIDGE
0010	176 + 50 'R'	-	180 + 10 'R'	LT	360	EAST OF SIMONSON ROAD
0010	176 + 20 'R'	-	179 + 45 'R'	RT	325	EAST OF SIMONSON ROAD
0010	237 + 90 'R'	-	239 + 15 'R'	LT	125	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	239 + 45 'R'	-	240 + 90 'R'	LT	145	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	237 + 30 'R'	-	239 + 15 'R'	RT	185	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	239 + 50 'R'	-	240 + 80 'R'	RT	130	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	303 + 00 'R'	-	306 + 90 'R'	RT	390	EAST OF FREMSTAD ROAD
				TOTAL 0010	2750	

3

MGS Guardrail 3

CATEGORY	STATION	TO	STATION	LOCATION	614.2300 LF	REMARKS
0010	34+47 'R'	-	37+84 'R'	LT	337.5	EAST OF CTH D
0010	69+20 'R'	-	70+07 'R'	RT	87.5	B-61-0124 PIGEON CREEK BRIDGE
0010	72+68 'R'	-	73+55 'R'	RT	87.5	B-61-0124 PIGEON CREEK BRIDGE
0010	72+93 'R'	-	73+80 'R'	LT	87.5	B-61-0124 PIGEON CREEK BRIDGE
0010	176+75 'R'	-	178+96 'R'	RT	225	EAST OF SIMONSON ROAD
0010	176+75 'R'	-	179+75 'R'	LT	300	EAST OF SIMONSON ROAD
0010	237+85 'R'	-	238+73 'R'	RT	87.5	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	237+85 'R'	-	238+73 'R'	LT	87.5	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	303+75 'R'	-	307+00 'R'	RT	325	EAST OF FREMSTAD ROAD
				TOTAL 0010	1625	

MGS Thrie Beam Transition

CATEGORY	STATION	TO	STATION	LOCATION	614.2500 LF	REMARKS
0010	70+07 'R'	-	70+47 'R'	RT	39.4	B-61-0124 PIGEON CREEK BRIDGE
0010	72+28 'R'	-	72+68 'R'	RT	39.4	B-61-0124 PIGEON CREEK BRIDGE
0010	72+53 'R'	-	72+93 'R'	LT	39.4	B-61-0124 PIGEON CREEK BRIDGE
0010	238+73 'R'	-	239+12 'R'	RT	39.4	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	238+73 'R'	-	239+12 'R'	LT	39.4	B-61-0950 FITCH COULEE CREEK BRIDGE
				TOTAL 0010	197	

MGS Guardrail Terminal EAT

CATEGORY	STATION	TO	STATION	LOCATION	614.2610 EACH	REMARKS
0010	33+97 'R'	-	34+47 'R'	LT	1	EAST OF CTH D
0010	37+84 'R'	-	38+34 'R'	LT	1	EAST OF CTH D
0010	68+70 'R'	-	69+20 'R'	RT	1	B-61-0124 PIGEON CREEK BRIDGE
0010	73+55 'R'	-	74+05 'R'	RT	1	B-61-0124 PIGEON CREEK BRIDGE
0010	73+80 'R'	-	74+30 'R'	LT	1	B-61-0124 PIGEON CREEK BRIDGE
0010	176+25 'R'	-	176+75 'R'	RT	1	EAST OF SIMONSON ROAD
0010	176+25 'R'	-	176+75 'R'	LT	1	EAST OF SIMONSON ROAD
0010	178+96 'R'	-	179+46 'R'	RT	1	EAST OF SIMONSON ROAD
0010	179+71 'R'	-	180+21 'R'	LT	1	EAST OF SIMONSON ROAD
0010	237+35 'R'	-	237+85 'R'	LT	1	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	237+35 'R'	-	237+85 'R'	RT	1	B-61-0950 FITCH COULEE CREEK BRIDGE
0010	303+25 'R'	-	303+75 'R'	RT	1	EAST OF FREMSTAD ROAD
0010	307+00 'R'	-	307+50 'R'	RT	1	EAST OF FREMSTAD ROAD
				TOTAL 0010	13	

Maintenance and Repair of Haul Roads (01. 1630-02-71)

CATEGORY	LOCATION	618.0100 EACH	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Mobilization

CATEGORY	LOCATION	619.1000 EACH	REMARKS
0010	PROJECT	0.8	
	TOTAL 0010	0.8	

Concrete Median Sloped Nose

CATEGORY	LOCATION	620.0300 SF	REMARKS
0010	RR CROSSING MEDIAN	80	
	TOTAL 0010	80	

Water

CATEGORY	LOCATION	624.0100 MGAL	REMARKS
0010	PROJECT	35	10 GAL/TON
	TOTAL 0010	35	

Topsoil

CATEGORY	LOCATION	625.0100 SY	REMARKS
0010	25+00 'R'	200	SCHAEFER PROPERTY REPAIR
	TOTAL 0010	200	

Mulching

627.0200

CATEGORY	LOCATION	SY	REMARKS
0010	UNDISTRIBUTED	100	SCHAEFER PROPERTY REPAIR
TOTAL 0010		100	

Silt Fence

628.1504

CATEGORY	STATION	TO	STATION		LOCATION	LF	REMARKS
0010	25+00 'R'	-	28+75 'R'	RT	SCHAEFER PROPERTY	601	
0010	33+60 'R'	-	33+60 'R'	LT	EAST OF CTH D	60	
0010	37+78 'R'	-	38+39 'R'	LT	EAST OF CTH D	67	
0010	68+40 'R'	-	69+29 'R'	RT	PIGEON CREEK BRIDGE	78	
0010	69+64 'R'	-	69+80 'R'	LT	PIGEON CREEK BRIDGE	50	
0010	72+90 'R'	-	73+87 'R'	RT	PIGEON CREEK BRIDGE	71	
0010	73+52 'R'	-	74+54 'R'	LT	PIGEON CREEK BRIDGE	69	
0010	176+05 'R;	-	177+00 'R'	RT	EAST OF SIMONSON ROAD	59	
0010	176+36 'R'	-	177+20 'R'	LT	EAST OF SIMONSON ROAD	67	
0010	178+78 'R'	-	179+60 'R'	RT	EAST OF SIMONSON ROAD	67	
0010	179+18 'R'	-	180+10 'R'	LT	EAST OF SIMONSON ROAD	70	
0010	237+16 'R'	-	237+92 'R'	RT	FITCH COULEE CREEK BRIDGE	59	
0010	237+54 'R'	-	238+35 'R'	LT	FITCH COULEE CREEK BRIDGE	55	
0010	240+00 'R'	-	240+92 'R'	RT	FITCH COULEE CREEK BRIDGE	55	
0010	240+22 'R'	-	240+84 'R'	LT	FITCH COULEE CREEK BRIDGE	46	
0010	302+82 'R'	-	304+00 'R'	RT	EAST OF FREMSTAD ROAD	61	
0010	306+18 'R'	-	307+00 'R'	RT	EAST OF FREMSTAD ROAD	70	
TOTAL 0010						1605	

Silt Fence Maintenance

628.1520

CATEGORY	STATION	TO	STATION		LOCATION	LF	REMARKS
0010	25+00 'R'	-	28+75 'R'	RT	SCHAEFER PROPERTY	601	
0010	33+60 'R'	-	33+60 'R'	LT	EAST OF CTH D	60	
0010	37+78 'R'	-	38+39 'R'	LT	EAST OF CTH D	67	
0010	68+40 'R'	-	69+29 'R'	RT	PIGEON CREEK BRIDGE	78	
0010	69+64 'R'	-	69+80 'R'	LT	PIGEON CREEK BRIDGE	50	
0010	72+90 'R'	-	73+87 'R'	RT	PIGEON CREEK BRIDGE	71	
0010	73+52 'R'	-	74+54 'R'	LT	PIGEON CREEK BRIDGE	69	
0010	176+05 'R	-	177+00 'R'	RT	EAST OF SIMONSON ROAD	59	
0010	176+36 'R	-	177+20 'R'	LT	EAST OF SIMONSON ROAD	67	
0010	178+78 'R	-	179+60 'R'	RT	EAST OF SIMONSON ROAD	67	
0010	179+18 'R	-	180+10 'R'	LT	EAST OF SIMONSON ROAD	70	
0010	237+16 'R	-	237+92 'R'	RT	FITCH COULEE CREEK BRIDGE	59	
0010	237+54 'R	-	238+35 'R'	LT	FITCH COULEE CREEK BRIDGE	55	
0010	240+00 'R	-	240+92 'R'	RT	FITCH COULEE CREEK BRIDGE	55	
0010	240+22 'R	-	240+84 'R'	LT	FITCH COULEE CREEK BRIDGE	46	
0010	302+82 'R	-	304+00 'R'	RT	EAST OF FREMSTAD ROAD	61	
0010	306+18 'R	-	307+00 'R'	RT	EAST OF FREMSTAD ROAD	70	
TOTAL 0010						1605	

Mobilizations Erosion Control

628.1905

CATEGORY	LOCATION	EACH	REMARKS
0010	PROJECT	4	
TOTAL 0010		4	

Mobilizations Emergency Erosion Control

628.1910

CATEGORY	LOCATION	EACH	REMARKS
0010	PROJECT	8	
TOTAL 0010		8	

Erosion Mat Urban Class I Type B

628.2008

CATEGORY	STATION		LOCATION	SY	REMARKS
0010	2+34 'E'	- 3+19 'E' LT	INTERSECTION OF MAIN AND ERVIN	50	
TOTAL 0010				50	

Erosion Mat Class II Type B

628.2023

CATEGORY	STATION		SY	REMARKS
0010	27+00 'R'	RT	500	SCHAEFER PROPERTY SITE REPAIRS
0010	58+00 'R'	RT/LT	150	3 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	60+20 'R'	LT	25	1 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	66+04 'R'	LT	25	1 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	94+77 'R'	RT/LT	50	1 - 24-INCH CPRC EAST OF SCHANSBERG ROAD
0010	109+78 'R'	RT/LT	100	2 - 30-INCH CPRC EAST OF BRITTANI ROAD
0010	112+76 'R'	RT/LT	50	1 - 24-INCH CPRC EAST OF BRITTANI ROAD
0010	116+74 'R'	RT/LT	50	1 - 24-INCH CPRC WEST OF THOMPSON COULEE ROAD
0010	124+75 'R'	RT/LT	50	1 - 24-INCH CPRC EAST OF THOMPSON COULEE ROAD
0010	180+65 'R'	RT/LT	50	1 - 30-INCH CPRC EAST OF MCRAE LANE
0010	202+77 'R'	RT	25	1 - 24-INCH CPRC WEST OF DISSMORE COULEE ROAD
0010	253+87 'R'	RT/LT	50	1 - 24-INCH CPRC EAST OF FITCH COULEE ROAD
0010	331+21 'A'	RT	25	1 - 24-INCH CPRC WEST OF FULLER ROAD
0010	335+00 'A'	RT/LT	50	1 - 24-INCH CPRC EAST OF FULLER ROAD
TOTAL 0010			1200	

Inlet Protection Type A

CATEGORY	STATION	TO	STATION	LOCATION	628.7005 EACH	REMARKS
0010	117+00	-	117+00 LT	STA 117+00 'M' LT	1	
0010	117+20	-	117+20 RT	STA 117+10 'M' RT	1	
0010	117+90	-	117+90 RT	STA 117+80 'M' LT	1	
			TOTAL 0010		3	

Temporary Ditch Checks

CATEGORY	LOCATION	628.7504 LF	REMARKS
0010	25+35 'R' RT	45	NORTH OF RIVER ROAD NEAR SCHAEFER PROPERTY
	TOTAL 0010	45	

Inlet Protection Type C

CATEGORY	STATION	TO	STATION	LOCATION	628.7015 EACH	REMARKS
0010	9+00 'E'	-	9+00 'E' LT	ROOSEVELT AND ERVIN STREETS	1	
0010	9+00 'E'	-	9+00 'E' RT	ROOSEVELT AND ERVIN STREETS	1	
0010	6+27 'E'	-	6+27 'E' LT	ON ERVIN STREET	1	
0010	7+27 'E'	-	7+27 'E' LT	SHERWOOD STREET	1	
0010	7+27 'E'	-	7+27 'E' RT	SHERWOOD STREET	1	
0010	4+21 'E'	-	4+21 'E' LT	ON ERVIN STREET BETWEEN ROOSEVELT AND SHERWOOD STREETS	1	
0010	4+49 'E'	-	4+49 'E' RT	ON ERVIN STREET BETWEEN ROOSEVELT AND SHERWOOD STREETS	1	
0010	4+21 'E'	-	4+21 'E' RT	ON ERVIN STREET	1	
0010	0+05 'E'	-	0+05 'E' RT	ON ERVIN STREET	1	
0010	104+58 'M'	-	104+58 'M' RT	ON MAIN STREET	1	
0010	105+30 'M'	-	105+30 'M' RT	ON LINCOLN STREET	1	
0010	105+30 'M'	-	105+30 'M' LT	ON LINCOLN STREET	1	
0010	104+87 'M'	-	104+87 'M' LT	ON MAIN STREET	1	
0010	109+83 'M'	-	109+83 'M' LT	ON MAIN STREET	1	
0010	109+83 'M'	-	109+83 'M' LT	ON MAIN STREET	1	
0010	109+83 'M'	-	109+83 'M' LT	ON MAIN STREET	1	
0010	110+45 'M'	-	110+45 'M' LT	ON MAIN STREET	1	
0010	110+45 'M'	-	110+45 'M' RT	ON MAIN STREET	1	
0010	113+53 'M'	-	113+53 'M' RT	ON MAIN STREET	1	
0010	113+58 'M'	-	113+58 'M' LT	ON MAIN STREET	1	
0010	116+87 'M'	-	116+87 'M' RT	ON MAIN STREET	1	
0010	117+97 'M'	-	117+97 'M' LT	ON MAIN STREET	1	
0010	121+04 'M'	-	121+04 'M' LT	ON MAIN STREET	1	
0010	121+04 'M'	-	121+04 'M' RT	ON MAIN STREET	1	
0010	124+17 'M'	-	124+17 'M' RT	ON MAIN STREET	1	
0010	9+40 'BE'	-	124+17 'M' RT	ON BLAIR STREET	1	
0010	9+84 'BE'	-	124+84 'M' LT	ON MAIN STREET	1	
0010	11+50 'BE'	-	126+50 'M' LT	ON MAIN STREET	1	
0010	11+50 'BE'	-	126+50 'M' RT	ON MAIN STREET	1	
0010	127+67 'M'	-	127+67 'M' RT	ON MAIN STREET	1	
0010	351+40 'M'	-	351+40 'M' RT	ON ANDERSON/COMMERCIAL STREET	1	
0010	354+15 'M'	-	354+15 'M' LT	ON EKERN STREET	1	
0010	354+15 'M'	-	354+15 'M' RT	ON EKERN STREET	1	
0010	356+50 'M'	-	356+50 'M' LT	ON EKERN STREET	1	
0010	356+50 'M'	-	356+50 'M' RT	ON EKERN STREET	1	
0010	357+20 'M'	-	357+20 'M' RT	ON EKERN STREET	1	
0010	367+20 'M'	-	367+20 'M' RT	ON EKERN STREET	1	
0010	367+15 'M'	-	367+15 'M' LT	ON EKERN STREET	1	
0010	367+15 'M'	-	367+15 'M' RT	ON EKERN STREET	1	
0010	369+60 'M'	-	369+60 'M' RT	ON EKERN STREET	1	
			TOTAL 0010		39	

Culvert Pipe Checks

CATEGORY	LOCATION	628.7555 EACH	REMARKS
0010	57+80 'R'	4	
0010	57+85 'R'	4	
0010	58+05 'R'	4	
0010	60+10 'R'	4	
0010	66+05 'R'	4	
0010	94+60 'R'	4	
0010	109+80 'R'	4	
0010	109+85 'R'	4	AT UPSTREAM CULVERT INLET
0010	112+85 'R'	4	
0010	116+80 'R'	4	
0010	124+75 'R'	4	
0010	180+60 'R'	4	
0010	202+80 'R'	4	
0010	253+80 'R'	4	
0010	331+21 'A'	4	
0010	335+00 'A'	4	
	TOTAL 0010	60	

3

Fertilizer Type B

CATEGORY	STATION		629.0210 CWT	REMARKS
0010	2+34 'E' - 3+19 'E'	LT	0.50	MAIN AND ERVIN INTERSECTION
0010	25+00 'R'	RT	0.16	SCHAEFER PROPERTY REPAIR
0010	58+00 'R'	RT/LT	0.09	3 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	60+20 'R'	LT	0.02	1 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	66+04 'R'	LT	0.02	1 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	94+77 'R'	RT/LT	0.03	1 - 24-INCH CPRC EAST OF SCHANSBERG ROAD
0010	109+78 'R'	RT/LT	0.06	2 - 30-INCH CPRC EAST OF BRITTANI ROAD
0010	112+76 'R'	RT/LT	0.03	1 - 24-INCH CPRC EAST OF BRITTANI ROAD
0010	116+74 'R'	RT/LT	0.03	1 - 24-INCH CPRC WEST OF THOMPSON COULEE ROAD
0010	124+75 'R'	RT/LT	0.03	1 - 24-INCH CPRC EAST OF THOMPSON COULEE ROAD
0010	180+65 'R'	RT/LT	0.03	1 - 30-INCH CPRC EAST OF MCRAE LANE
0010	202+77 'R'	RT	0.02	1 - 24-INCH CPRC WEST OF DISSMORE COULEE ROAD
0010	253+87 'R'	RT/LT	0.03	1 - 24-INCH CPRC EAST OF FITCH COULEE ROAD
0010	331+21 'A'	RT	0.02	1 - 24-INCH CPRC WEST OF FULLER ROAD
0010	335+00 'A'	RT/LT	0.03	1 - 24-INCH CPRC EAST OF FULLER ROAD
	TOTAL 0010		1.10	

Seeding Mixture No. 30

CATEGORY	STATION		630.0130 LB	REMARKS
0010	25+35 'R'	RT	100	SCHAEFER PROPERTY
0010	101+00 'M'		1.4	MAIN AND ERVIN INTERSECTION RECONSTRUCTION
0010	58+00 'R'	RT/LT	4.1	3 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	60+20 'R'	LT	0.7	1 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	66+04 'R'	LT	0.7	1 - 24-INCH CPRC EAST OF FAIRVIEW ROAD
0010	94+77 'R'	RT/LT	1.4	1 - 24-INCH CPRC EAST OF SCHANSBERG ROAD
0010	109+78 'R'	RT/LT	2.7	2 - 30-INCH CPRC EAST OF BRITTANI ROAD
0010	112+76 'R'	RT/LT	1.4	1 - 24-INCH CPRC EAST OF BRITTANI ROAD
0010	116+74 'R'	RT/LT	1.4	1 - 24-INCH CPRC WEST OF THOMPSON COULEE ROAD
0010	124+75 'R'	RT/LT	1.4	1 - 24-INCH CPRC EAST OF THOMPSON COULEE ROAD
0010	180+65 'R'	RT/LT	1.4	1 - 30-INCH CPRC EAST OF MCRAE LANE
0010	202+77 'R'	RT	0.7	1 - 24-INCH CPRC WEST OF DISSMORE COULEE ROAD
0010	253+87 'R'	RT/LT	1.4	1 - 24-INCH CPRC EAST OF FITCH COULEE ROAD
0010	331+21 'A'	RT	0.7	1 - 24-INCH CPRC WEST OF FULLER ROAD
0010	335+00 'A'	RT/LT	1.4	1 - 24-INCH CPRC EAST OF FULLER ROAD
	TOTAL 0010		120.0	

Seeding Mixture No. 40

CATEGORY	STATION		630.0140 LB	REMARKS
0010	'E' - 3+19	LT	10	MAIN AND ERVIN INTERSECTION
	TOTAL 0010		10	

Seeding Temporary

CATEGORY	LOCATION	630.0200 LB	REMARKS
0010	UNDISTRIBUTED	65	PROJECT
0010	MAIN AND ERVIN INTERSECTION	10	
0010	SCHAEFER PROPERTY	100	
	TOTAL 0010	175	

Markers Culvert End

CATEGORY	STATION	LOCATION	633.5200 EACH	REMARKS
0010	28+66	'T' RT/LT	2	
0010	36+62	'R' RT/LT	2	
0010	58+00	'R' RT/LT	2	
0010	60+20	'R' RT/LT	2	
0010	66+04	'R' RT/LT	2	
0010	94+77	'R' RT/LT	2	
0010	109+78	'R' RT/LT	2	
0010	112+76	'R' RT/LT	2	
0010	116+74	'R' RT/LT	2	
0010	124+75	'R' RT/LT	2	
0010	130+50	'R' RT/LT	2	
0010	155+33	'R' RT/LT	2	
0010	174+00	'R' RT/LT	2	
0010	178+00	'R' RT/LT	2	
0010	180+65	'R' RT/LT	2	
0010	190+66	'R' RT/LT	2	
0010	198+00	'R' RT/LT	2	
0010	203+89	'R' RT/LT	2	
0010	225+25	'R' RT/LT	2	
0010	253+87	'R' RT/LT	2	
0010	272+00	'R' RT/LT	2	
0010	286+75	'R' RT/LT	2	
0010	305+00	'R' RT/LT	2	
0010	308+10	'R' RT/LT	2	
0010	315+20	'R' RT/LT	2	
0010	331+21	'A' RT/LT	2	
0010	335+00	'A' RT/LT	2	
0010	343+08	'A' RT/LT	2	
0010	348+40	'A' RT/LT	2	
	TOTAL 0010		58	

3

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
1-1	RT	R59-51	36	36	1	1	9			1				STOP SCHOOL BUS FLASHING RED LIGHTS
1-2	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY ECOLOGY CLUB
1-3	RT	D2-3	78	36	1	2	19.5				2			BLAIR, ETTRICK, GALESVILLE: 7,16,24 MILES
1-4	RT	J4-1	24	36	2		6							USH 53 SOUTH
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
1-5	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
1-6	RT	W1-2R	30	30	1	1		6.25		1				RIGHT TURN ARROW
1-7	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
1-8	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 40 MPH
1-9	RT	N/A	SEE PLANS		1	1								CITY SIGN NO TRUCKS USE OWEN STREET TO RIDGEVIEW
1-10	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
1-11	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 40 MPH
1-12	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
1-13	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
	Crossroad	N/A	SEE PLANS		1									ATV SIGN (REMOVE)
	Crossroad	N/A	SEE PLANS		1									DIRECTIONAL SIGN (REMOVE)
1-14	RT	R2-1	24	30	1	1	5		1					SPEED LIMIT 30 MPH
1-15	LT	W14-3	48	36	1	0		12		0				NO PASSING ZONE
1-16	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
1-17	RT	J4-1	24	36	1		6							USH 53 SOUTH
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
1-18	RT	R2-1	24	30	1	1	5				1			SPEED LIMIT 30 MPH
1-19	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
1-20	RT	J12-1	24	45	1		7.5							USH 53 (AHEAD/LEFT)
		M1-4	24	24										US ROUTE MARKER
		M6-6	21	21										DIRECTIONAL ARROW LA/UA
1-21	RT	J12-1	24	45	1	1	7.5			1				CTH D (LEFT)
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										LEFT ARROW
1-22	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 30 MPH
1-23	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
	Crossroad	N/A	SEE PLANS		1									ATV SIGN (REMOVE)
	Crossroad	N/A	SEE PLANS		1									DIRECTIONAL SIGN (REMOVE)
1-24	RT	R2-1	24	30	1	1	5							SPEED LIMIT 30 MPH
1-25	LT	W14-3	48	36	1	1		12	1					NO PASSING ZONE
1-26	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
1-27	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH D
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
1-28	RT	W3-1	36	36	1	1		9		1				STOP AHEAD
1-29	RT	R3-8-D	36	30	1	1	7.5		1					LANE DIRECTIONALS (STRAIGHT/RIGHT)
1-30	RT	J2-1	24	57	3	1	9.5			1				NORTH USH 53 (RIGHT)
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
		M5-1-R	21	21										ADVANCE ARROW RIGHT TURN
SHEET SUBTOTAL					**38**	**27**	**172.75**	**39.25**	**11**	**11**	**3**	**0**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
1-31	RT	R7-51-L	18	24	1		3							NO PARKING ARROW LEFT
1-32	RT	R7-1-R	18	24	1	1	3		1					NO PARKING ANY TIME RIGHT
1-33	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
1-34	RT	R1-51	30	18	1	1	3.75							RIGHT TURN NO STOP
1-35	RT	J2-1	24	57	3	1	9.5			1				NORTH USH 53 (RIGHT)
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										RIGHT ARROW
1-36	RT	J13-1	24	45	2		7.5							CTH D (AHEAD/RIGHT)
		M1-5-A	24	24										COUNTY MARKER
		M6-6	21	21										DIRECTIONAL ARROW UA/RA
1-37	RT	R7-51-L	18	24	1		3							NO PARKING ARROW LEFT
2-1	RT	J2-2	48	57	5	1	19			1				SOUTH USH 53(LEFT) - CTH D (RIGHT)
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										LEFT ARROW
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										RIGHT ARROW
2-2	LT	R7-51-L	18	24	1	1	3		1					NO PARKING ARROW LEFT
2-3	RT	J2-2	48	57	5	1	19			1				SOUTH USH 53(LEFT) - CTH D (RIGHT)
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M5-1-L	21	21										ADVANCE ARROW LEFT TURN
		M1-5-A	24	24										COUNTY MARKER
		M5-1-R	21	21										ADVANCE ARROW RIGHT TURN
2-4	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
2-5	RT	D9-2	24	24	1	1	4							HOSPITAL SIGN
2-6	RT	MB6-1	21	21	1	1	3.0625			1				ARROW - RIGHT
2-7	LT	W14-3	48	36	1	1		12						NO PASSING ZONE
2-8	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 30 MPH
2-9	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
2-10	LT	N/A	SEE PLANS		1	1								COMMUNITY WAYFINDER SIGN
	LT	N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
	LT	N/A	SEE PLANS		1									CITY SIGN RESERVED PARKING, HANDICAPPED, THIS SPACE
2-11	RT	J4-1	24	36	2	1	6			1				(SOUTH) CARDINAL ROUTE MARKER, USH 53
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
2-12	RT	N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
SHEET SUBTOTAL					**33**	**15**	**107.56**	**12.00**	**3**	**8**	**0**	**0**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
2-16	RT	J2-1	24	57	3	1	9.5			1				WEST STH 121 (RIGHT)
		M3-4	24	24										WEST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										RIGHT ARROW
2-17	RT	D1-3	60	30	1	1	12.5		1					BLAIR/ETTRICK, INDEPENDENCE: STRAIGHT, RIGHT
2-18	RT	R2-1	24	30	1	1	5		1					SPEED LIMIT 30 MPH
2-19	RT	D9-2	24	24	1		4							HOSPITAL SIGN
2-20	RT	MB6-1	21	21	1	1	3.0625		1					ARROW - LEFT
2-21	LT	W14-3	48	36	1	1		12	1					NO PASSING ZONE
2-22	RT	J1-1	24	39	2	1	6.5			1				JUNCTION STH 121
		M2-1	21	15										JUNCTION MARKER
		M1-6	24	24										STATE ROUTE MARKER
2-23	RT	R2-1	24	30	1	1	5		1					SPEED LIMIT 30 MPH
2-24	RT	N/A	SEE PLANS		1	1								COMMUNITY WAYFINDER SIGN
2-25	RT	N/A	SEE PLANS		1	1								CITY WEIGHT LIMIT SIGN
2-26	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
2-27	RT	J2-1	24	57	3	1	9.5			1				NORTH USH 53 (AHEAD)
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										AHEAD ARROW
2-28	RT	J2-2	48	57	6	1	19			2				WEST STH 121 (LEFT) - EAST STH 121 (AHEAD)
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
		M5-1-L	21	21										ADVANCE ARROW LEFT TURN
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										AHEAD ARROW
2-29	RT	N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
2-30	RT	D1-3	60	30	1	1	12.5			1				PIGEON FALLS/OSSEO, INDEPENDENCE: STRAIGHT, LEFT
2-31	RT	N/A	SEE PLANS		1	1								CITY SIGN 2 HOUR PARKING
2-32	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
2-33	RT	J2-1	24	57	3		9.5							EAST STH 121 (AHEAD)
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										AHEAD ARROW
2-34	RT	J2-1	24	57	3	1	9.5			1				WEST STH 121 (LEFT)
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										LEFT ARROW
2-35	RT	W10-1	36	36				9				1		RAILROAD CROSSING AHEAD
2-36	RT	W10-1	36	36	1	1		9				1		RAILROAD CROSSING AHEAD
2-37	RT	J2-1	24	57	3		9.5			1				SOUTH USH 53 (AHEAD)
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										AHEAD ARROW
2-38	RT	J2-1	24	57	3	1	9.5							WEST STH 121 (RIGHT)
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
		M5-1-R	21	21										ADVANCE ARROW RIGHT TURN
SHEET SUBTOTAL					**40**	**18**	**137.06**	**30.00**	**7**	**8**	**0**	**2**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
2-39	Crossroad	R1-1	30	30	1	1	6.25						1	STOP
2-40	Crossroad	N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
2-41	LT	W10-1	36	36	1	1		9					1	RAILROAD CROSSING AHEAD
	LT	N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
2-42	LT	R2-1	24	30	1	1	5						1	SPEED LIMIT 30 MPH
	LT	N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
2-43	Crossroad	R1-1	30	30	1	1	6.25						1	STOP
	Crossroad	N/A	SEE PLANS		1									ATV/SNOWMOBILE SIGN (REMOVE)
	Crossroad	N/A	SEE PLANS		1									DIRECTIONAL SIGN (REMOVE)
2-44	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
	Crossroad	N/A	SEE PLANS		1									ATV/SNOWMOBILE SIGN (REMOVE)
	Crossroad	N/A	SEE PLANS		1									DIRECTIONAL SIGN (REMOVE)
2-45	LT	W14-3	48	36	1	1		12						NO PASSING ZONE
2-46	LT	R2-1	24	30	1	1	5						1	SPEED LIMIT 30 MPH
2-47	LT	N/A	SEE PLANS		1	1								COMMUNITY WAYFINDER SIGN
2-48	RT	N/A	SEE PLANS		1	1								CITY SIGN 2 HOUR PARKING
2-49	RT	J4-1	24	36	2	1	6			1				NORTH USH 53
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
2-50	RT	J4-1	24	36	2		6							EAST STH 121
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
2-51	RT	R6-1-R	36	12	1	1	3			1				ONE WAY (RIGHT)
2-52	RT	R2-1	24	30	1	1	5					1		SPEED LIMIT 30 MPH
2-53	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
	Crossroad	N/A	SEE PLANS		1									ATV/SNOWMOBILE SIGN (REMOVE)
	Crossroad	N/A	SEE PLANS		1									DIRECTIONAL SIGN (REMOVE)
2-54	RT	N/A	SEE PLANS		1	1								COMMUNITY WAYFINDER SIGN
		N/A	SEE PLANS		1									CITY SIGN 2 HOUR PARKING
2-55	LT	W14-3	48	36	1	1		12					1	NO PASSING ZONE
2-56	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
	Crossroad	N/A	SEE PLANS		1									ATV/SNOWMOBILE SIGN (REMOVE)
	Crossroad	N/A	SEE PLANS		1									DIRECTIONAL SIGN (REMOVE)
2-57	RT	R2-1	24	30	1	0	5			0				SPEED LIMIT 30 MPH
2-58	RT	R4-7	24	30			5						1	KEEP RIGHT
2-59	RT	R4-7	24	30			5						1	KEEP RIGHT
2-60	LT	R7-8-A	SEE PLANS		1	1								CITY SIGN RESERVED PARKING, HANDICAPPED, THIS SPACE
2-61	RT	N/A	SEE PLANS		1	1								CITY SIGN 2 HOUR PARKING
	LT	N/A	SEE PLANS		1	1								CITY SIGN 2 HOUR PARKING
2-62	RT	N/A	SEE PLANS		1	1								CITY SIGN 2 HOUR PARKING
3-1	RT	N/A	SEE PLANS		2	1								ATV/STOP FOR PEDS IN CROSSWALK
3-2	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 30 MPH
3-3	RT	I2-2	102	15	1	1	10.625						1	TREMPEALEAU RIVER
3-4	RT	N/A	SEE PLANS		2	1								ATV/STOP FOR PEDS IN CROSSWALK
3-5	RT	W3-5	36	36	1	1		9		1				SPEED LIMIT REDUCTION AHEAD
3-6	RT	I2-3	66	24	1	2	11			2				WHITEHALL (POPULATION 1558)
3-7	LT	R5-1	30	30	1	1	6.25			1				DO NOT ENTER
SHEET SUBTOTAL					**45**	**28**	**109.13**	**42.00**	**2**	**8**	**0**	**1**	**9**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
3-8	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
3-9	Crossroad	W12-1D	24	24	1	1		4		1				SPLIT LANE SIGNAL
3-10	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
3-11	RT	R10-64	30	36	1	1	7.5			1				NO ENGINE BRAKING EXCEPT IN EMERGENCY
3-12	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 45 MPH
3-13	RT	R2-1	24	30	1		5							SPEED LIMIT 45 MPH
3-14	RT	I2-2	102	15	1	1	10.625			1				TREMPEALEAU RIVER
3-15	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY A&W RESTAURANT
3-16	RT	R59-51	36	36	1	1	9			1				STOP SCHOOL BUS FLASHING RED LIGHTS
3-17	RT	D2-2	84	24	1	2	14			1	1			PIGEON FALLS, OSSEO: 7,18 MILES
3-18	RT	R2-1	24	30	1	1	5		1					SPEED LIMIT 55 MPH
3-19	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH D
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
3-20	RT	W3-5	36	36	1	1		9		1				SPEED LIMIT REDUCTION AHEAD
3-21	RT	J4-2	48	36	4	1	12			1				SOUTH USH 53 - WEST STH 121
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
3-22	Crossroad	J13-3	72	45	6	2	22.5			2				USH 53 (BOTH) - STH 121 (BOTH) - CTH D (RIGHT)
		M1-4	24	24										US ROUTE MARKER
		M6-4	21	21										DIRECTIONAL ARROWS LEFT - RIGHT
		M1-6	24	24										STATE ROUTE MARKER
		M6-4	21	21										DIRECTIONAL ARROWS LEFT - RIGHT
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										RIGHT ARROW
3-23	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
3-24	RT	J12-1	24	45	2	1	7.5			1				CTH D (AHEAD/RIGHT)
		M1-5-A	24	24										COUNTY MARKER
		M6-6	21	21										DIRECTIONAL ARROW UA/RA
3-25	RT	D1-1	54	15	1	1	5.625		1					STRUM: RIGHT
3-26	RT	J12-1	24	45	1	1	7.5			1				CTH D (LEFT)
		M1-5-A	24	24										COUNTY MARKER
		M5-1-L	21	21										ADVANCE ARROW LEFT TURN
3-27	RT	W11-12	36	36	1	1		9		1				AMISH TRAVEL AREA
3-28	RT	D1-1	54	15	1	1	5.625		1					STRUM: LEFT
3-29	RT	J13-1	24	45	2	1	7.5			1				CTH D (LEFT)
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										LEFT ARROW
3-30	RT	W1-7	48	24	1	1		8		1				NIGHT ARROW (DOUBLE)
3-31	RT	J4-2	48	36	4	1	12							NORTH USH 53 - EAST STH 121
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
3-32	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
3-33	RT	R5-99	42	24			7			1				OFF ROADWAY OPERATION OF MOTOR VEHICLES PROHIBITED
SHEET SUBTOTAL					**39**	**26**	**176.13**	**42.00**	**4**	**21**	**1**	**0**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
4-1	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH D
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
4-2	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
4-3	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
4-4	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
4-5	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
5-1	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
5-2	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
5-3	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
5-4	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
5-5	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
5-6	RT	I2-3	66	24	1	1	11			1				CORAL CITY (UNINCORPORATED)
6-1	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
6-2	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
6-3	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
6-4	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH S
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
6-5	RT	W2-1	30	30	1			6.25						INTERSECTION SPEED SIGNAL
	RT	W13-1	18	18	1	1		2.25		1				ADVISORY SPEED PLATE (YELLOW BACK)
6-6	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
6-7	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
6-8	RT	J13-1	24	45	2	1	7.5			1				CTH S (LEFT)
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										LEFT ARROW
6-9	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY A&W RESTAURANT
6-10	RT	W2-1	30	30	1			6.25						INTERSECTION SPEED SIGNAL
	RT	W13-1	18	18	1	1		2.25		1				ADVISORY SPEED PLATE (YELLOW BACK)
6-11	RT	J13-1	24	45	2	1	7.5			1				CTH S (RIGHT)
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										RIGHT ARROW
6-12	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
6-13	Crossroad	J13-2	48	45	4	1	15			1				USH 53 (BOTH) - STH 121 (BOTH)
		M1-4	24	24										US ROUTE MARKER
		M6-4	21	21										DIRECTIONAL ARROWS LEFT - RIGHT
		M1-6	24	24										STATE ROUTE MARKER
		M6-4	21	21										DIRECTIONAL ARROWS LEFT - RIGHT
6-14	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY WHITEHALL LIONS CLUB
6-15	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
6-16	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH S
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
7-1	RT	I2-3	66	24	1	1	11			1				CORAL CITY (UNINCORPORATED)
7-2	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
7-3	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
SHEET SUBTOTAL					**40**	**30**	**161.50**	**89.00**	**4**	**26**	**0**	**0**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
8-1	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
8-2	RT	J4-2	48	36	4	1	12			1				SOUTH USH 53 - WEST STH 121
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
8-3	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
8-4	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
8-5	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
8-6	RT	J4-2	48	36	4	1	12			1				NORTH USH 53 - EAST STH 121
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
9-1	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
9-2	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
10-1	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY WHITEHALL LIONS CLUB
10-2	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY PIGEON FALLS YOUTH GROUP
10-3	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
10-4	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
10-5	RT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
10-6	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
10-7	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
11-1	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
12-1	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
12-2	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
13-1	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
13-2	LT	W14-3	48	36	1	1		12		1				NO PASSING ZONE
13-3	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
13-4	RT	J4-2	48	36	4	2	12				2			SOUTH USH 53 - WEST STH 121
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
13-5	RT	D2-2	72	24	1		12							WHITEHALL, BLAIR: 7,15 MILES
13-6	RT	I2-3	78	24	1	2	13			2				PIGEON FALLS (POPULATION 411)
13-7	RT	N/A	SEE PLANS		1					1				CITY SIGN VEHICLE NOISE LAWS ENFORCED
14-1	RT	W11-12	36	36	1	1		9		1				AMISH TRAVEL AREA
14-2	RT	I55-56	30	36	1	1	7.5			1				ADOPT A HIGHWAY PIGEON FALLS YOUTH GROUP
14-3	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 55 MPH
14-4	RT	W3-5	36	36	1	1		9			1			SPEED LIMIT REDUCTION AHEAD
14-5	LT	W14-3	48	36	1	1		12			1			NO PASSING ZONE
14-6	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 35 MPH
14-7	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH W
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
14-8	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
SHEET SUBTOTAL					**43**	**33**	**162.50**	**126.00**	**7**	**23**	**4**	**0**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
14-9	RT	J13-1	24	45	2	1	7.5			1				CTH W (LEFT)
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										LEFT ARROW
14-10	LT	W14-3	48	36	1	1		12						NO PASSING ZONE
14-11	RT	R2-1	24	30	1	1	5		1					SPEED LIMIT 35 MPH
14-12	RT	J1-1	24	39	2	1	6.5			1				JUNCTION CTH W
		M2-1	21	15										JUNCTION MARKER
		M1-5-A	24	24										COUNTY MARKER
14-13	RT	J4-2	48	36	4	1	12			1				SOUTH USH 53 - WEST STH 121
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
14-14	RT	R7-1-R	18	24	1		3			1				NO PARKING ANY TIME RIGHT
14-15	RT	J13-1	24	45	2	1	7.5			1				CTH W (RIGHT)
		M1-5-A	24	24										COUNTY MARKER
		M6-1	21	21										RIGHT ARROW
14-16	Crossroad	R1-1	30	30	1	1	6.25		1					STOP
14-17	Crossroad	J13-1	24	45	2	1	7.5			1				STH 53 (BOTH)
		M1-4	24	24										US ROUTE MARKER
		M6-4	21	21										DIRECTIONAL ARROWS LEFT - RIGHT
14-18	RT	J4-1	24	36	2	1	6			1				NORTH USH 53
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
14-19	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 35 MPH
14-20	RT	J2-1	24	57	3	1	9.5			1				NORTH USH 53 (AHEAD)
		M3-1	24	12						1				NORTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										AHEAD ARROW
14-21	RT	J2-1	24	57	3		9.5							EAST STH 121 (RIGHT)
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
		M5-1-R	21	21										ADVANCE ARROW RIGHT TURN
14-22	RT	R7-1-L	18	24	1		3			1				NO PARKING ANY TIME LEFT
14-23	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
14-24	RT	D1-2	72	30	1	2	15			2				OSSEO, NORTHFIELD: STRAIGHT, RIGHT
14-25	RT	R7-1-D	18	24	1		3			1				NO PARKING ANY TIME DOUBLE
15-1	RT	R2-1	24	30	1		5			1				SPEED LIMIT 35 MPH
15-2	RT	R7-1-D	18	24	1	1	3			1				NO PARKING ANY TIME DOUBLE
15-3	RT	MB4-1	24	12	1		2			2				ALTERNATE - BLUE
15-4	RT	J2-1	24	57	3	2	9.5							WEST INTERSTATE 94 (RIGHT)
		MB3-4	24	12										WEST - BLUE
		M1-1	24	24										INTERSTATE SHIELD ROUTE MARKER
		MB6-1	21	21										RIGHT ARROW - BLUE
SHEET SUBTOTAL					**35**	**17**	**132.00**	**12.00**	**2**	**19**	**0**	**0**	**0**	

Signing

SIGN #	LOCATION	SIGN CODE	WIDTH (IN)	HEIGHT (IN)	638.2602 REMOVING SIGNS TYPE II (EACH)	638.3000 REMOVING SMALL SIGN SUPPORTS (EACH)	637.2210 SIGNS TYPE II REFLECTIVE H H (SF)	637.2230 SIGNS TYPE II REFLECTIVE F F (SF)	634.0614 WOOD POSTS 4x6-IN 14-FT (EACH)	634.0616 WOOD POSTS 4x6-IN 16-FT (EACH)	634.0618 WOOD POSTS 4x6-IN 18-FT (EACH)	634.0814 POSTS TUBULAR STEEL 2X2-IN 14-FT (EACH)	634.0816 POSTS TUBULAR STEEL 2X2-IN 16-FT (EACH)	REMARKS
15-5	RT	J3-3	72	57	9	1	28.5							SOUTH USH 53 (LA) - WEST STH 121 (LA) - NORTH USH 53 (RA)
		M3-3	24	12										SOUTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										LEFT ARROW
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										LEFT ARROW
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
		M6-1	21	21										RIGHT ARROW
15-6	RT	MB4-1	24	12	1		2			1				ALTERNATE - BLUE
15-7	RT	J2-1	24	57	3	1	9.5							EAST INTERSTATE 94 (LEFT)
		MB3-2	24	12										EAST - BLUE
		M1-1	24	24										INTERSTATE SHIELD ROUTE MARKER
		MB6-1	21	21										LEFT ARROW - BLUE
15-8	RT	J3-2	48	57	6		19							EAST STH 121 (LEFT) - WEST STH 121 (AHEAD)
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										LEFT ARROW
		M3-4	24	12										WEST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										AHEAD ARROW
15-9	RT	R7-1-D	18	24	1		3			1				NO PARKING ANY TIME DOUBLE
15-10	RT	J2-1	24	57	3	1	9.5			1				EAST STH 121 (RIGHT)
		M3-2	24	12										EAST
		M1-6	24	24										STATE ROUTE MARKER
		M6-1	21	21										RIGHT ARROW
15-11	RT	R7-1-R	18	24	1		3			1				NO PARKING ANY TIME RIGHT
15-12	Crossroad	R1-1	30	30	1	1	6.25			1				STOP
15-13	RT	MB4-1	24	12	1	1	2			1				ALTERNATE - BLUE
15-14	RT	J4-1	24	39	2		6.5							WEST INTERSTATE 94
		MB3-4	24	12										WEST - BLUE
		M1-1	24	24										INTERSTATE SHIELD ROUTE MARKER
15-15	RT	J4-1	24	36	2		6							NORTH USH 53
		M3-1	24	12										NORTH
		M1-4	24	24										US ROUTE MARKER
15-16	RT	R2-1	24	30	1	1	5			1				SPEED LIMIT 35 MPH
SHEET SUBTOTAL					**31**	**6**	**100.25**	**0.00**	**0**	**7**	**0**	**0**	**0**	
TOTAL 0010 =					**344**	**200**	**1258.88**	**392.25**	**40**	**131**	**8**	**3**	**9**	

Moving Signs Type II

CATEGORY	LOCATION	638.2102 EACH	REMARKS
0010	MAIN AND ERVIN INTERSECTION	1	STOP SIGN AT INTERSECTION FOR INTERSECTION RECONSTRUCTION
	TOTAL 0010	1	

Field Office Type C (Project 1630-02-71)

CATEGORY	LOCATION	642.5201 EACH	REMARKS
0010	PROJECT	0.80	
	TOTAL 0010	0.80	

Traffic Control (Project 1630-02-71)

CATEGORY	LOCATION	643.0100 EACH	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Traffic Control Drums

CATEGORY	LOCATION	643.0300 DAY	REMARKS
0010	UNDISTRIBUTED	500	AT RR CROSSING
0010	UNDISTRIBUTED	1500	BEAMGUARD
	TOTAL 0010	2000	

Traffic Control Signs

CATEGORY	SIGN #	LOCATION	SIGN CODE	WIDTH	HEIGHT	643.0900 TRAFFIC CONTROL SIGNS DAY	REMARKS
0010	1	SOUTH END OF PROJECT	M3-1	24	12	62	NORTH
0010	1	SOUTH END OF PROJECT	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	1	SOUTH END OF PROJECT	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	2	SOUTH END OF PROJECT	M3-1	24	12	62	NORTH
0010	2	SOUTH END OF PROJECT	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	2	SOUTH END OF PROJECT	W20-1-C	48	48	62	ROAD WORK 1000 FT
0010	3	SOUTH END OF PROJECT	M3-1	24	12	62	NORTH
0010	3	SOUTH END OF PROJECT	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	3	SOUTH END OF PROJECT	W20-1-D	48	48	62	ROAD WORK 500 FT
0010	4	SOUTH END OF PROJECT	G20-1	60	24	62	ROAD WORK NEXT 7.9 MILES
0010	5	SOUTH END OF PROJECT	G20-2A	48	24	62	END ROAD WORK
0010		RICHTER ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		OLD 53	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		LEE STREET NORTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		LEE STREET SOUTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		OWEN STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		LOU BOULEVARD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		ROOSEVELT STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		CLAIRE STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		SHERWOOD STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		SOUTH ABRAMS STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		ERVIN STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		CTH D/MAIN STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		LINCOLN STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		HOBSON STREET EAST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		HOBSON STREET WEST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		KELLEY STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	6	STH 121 WEST	M3-1	24	12	62	NORTH
0010	6	STH 121 WEST	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	6	STH 121 WEST	M3-2	24	12	62	EAST
0010	6	STH 121 WEST	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	6	STH 121 WEST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	7	STH 121 WEST	M3-1	24	12	62	NORTH
0010	7	STH 121 WEST	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	7	STH 121 WEST	M3-2	24	12	62	EAST
0010	7	STH 121 WEST	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	7	STH 121 WEST	W20-1-C	48	48	62	ROAD WORK 1000 FT
0010	8	STH 121 WEST	M3-1	24	12	62	NORTH
0010	8	STH 121 WEST	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	8	STH 121 WEST	M3-2	24	12	62	EAST
0010	8	STH 121 WEST	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	8	STH 121 WEST	W20-1-D	48	48	62	ROAD WORK 500 FT
0010	5	STH 121 WEST	G20-2A	48	24	62	END ROAD WORK
0010		DODGE STREET EAST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		DODGE STREET WEST	W20-1-A	48	48	62	ROAD WORK AHEAD
					SHEET SUBTOTAL	2790	

Traffic Control Signs

643.0900
TRAFFIC CONTROL
SIGNS

CATEGORY	SIGN #	LOCATION	SIGN CODE	WIDTH	HEIGHT	DAY	REMARKS
0010		SCRANTON STREET EAST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		SCRANTON STREET WEST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		BLAIR STREET EAST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		BLAIR STREET WEST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		NORTH RIVER ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		CTH D NORTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		EVERETTE LANE	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		FAIRVIEW ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		FREMSTAD ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		FAIRVIEW ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		OK LANE	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		SCHANGSBERG ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		OK LANE	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		BRITTANI ROAD SOUTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		BRITTANI ROAD NORTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		WALDERA ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		THOMPSON COULEE ROAD NORTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		CTH S SOUTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		SIMONSON ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		MCRAE LANE	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		DISSMORE COULEE ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		HAUG ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		SEMB ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		WEST DAGGETT COULEE ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		FITCH COULEE ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		FREMSTAD ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		FULLER COULEE ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		DUDLEY LANE	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		ANDERSON STREET	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		CTH W SOUTH	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		EKERN AVENUE	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	9	STH 121 EAST	M3-3	24	12	62	SOUTH
0010	9	STH 121 EAST	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	9	STH 121 EAST	M3-4	24	12	62	WEST
0010	9	STH 121 EAST	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	9	STH 121 EAST	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	10	STH 121 EAST	M3-3	24	12	62	SOUTH
0010	10	STH 121 EAST	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	10	STH 121 EAST	M3-4	24	12	62	WEST
0010	10	STH 121 EAST	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	10	STH 121 EAST	W20-1-C	48	48	62	ROAD WORK 1000 FT
0010	11	STH 121 EAST	M3-3	24	12	62	SOUTH
0010	11	STH 121 EAST	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	11	STH 121 EAST	M3-4	24	12	62	WEST
0010	11	STH 121 EAST	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	11	STH 121 EAST	W20-1-D	48	48	62	ROAD WORK 500 FT
0010	5	STH 121 EAST	G20-2A	48	24	62	END ROAD WORK
					SHEET SUBTOTAL	2914	

Traffic Control Signs

CATEGORY	SIGN #	LOCATION	SIGN CODE	WIDTH	HEIGHT	643.0900 TRAFFIC CONTROL SIGNS DAY	REMARKS
0010		EVENSON ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010		CHRISTOPHERSON ROAD	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	12	NORTH END OF PROJECT	M3-3	24	12	62	SOUTH
0010	12	NORTH END OF PROJECT	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	12	NORTH END OF PROJECT	M3-4	24	12	62	WEST
0010	12	NORTH END OF PROJECT	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	12	NORTH END OF PROJECT	W20-1-A	48	48	62	ROAD WORK AHEAD
0010	13	NORTH END OF PROJECT	M3-3	24	12	62	SOUTH
0010	13	NORTH END OF PROJECT	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	13	NORTH END OF PROJECT	M3-4	24	12	62	WEST
0010	13	NORTH END OF PROJECT	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	13	NORTH END OF PROJECT	W20-1-C	48	48	62	ROAD WORK 1000 FT
0010	14	NORTH END OF PROJECT	M3-3	24	12	62	SOUTH
0010	14	NORTH END OF PROJECT	M1-4	24	24	62	USH 53 ROUTE MARKER
0010	14	NORTH END OF PROJECT	M3-4	24	12	62	WEST
0010	14	NORTH END OF PROJECT	M1-6	24	24	62	STH 121 ROUTE MARKER
0010	14	NORTH END OF PROJECT	W20-1-D	48	48	62	ROAD WORK 500 FT
0010	15	NORTH END OF PROJECT	G20-1	60	24	62	ROAD WORK NEXT 7.9 MILES
0010	5	NORTH END OF PROJECT	G20-2A	48	24	62	END ROAD WORK
					TOTAL 0010	6882	

Pavement Marking Epoxy 4-Inch

CATEGORY	STATION	TO	STATION	LOCATION	646.0106 LF	REMARKS
0010	1+10.00	-	12+08.45	LT & RT	2197	'E' ERVIN ST
0010	12+08.45	-	17+37.60	LT & RT	1058	'E' ERVIN ST
0010	17+37.60	-	28+78.00	LT & RT	2281	'E' ERVIN ST
0010	101+00.00	-	110+30.25	LT & RT	1861	'M' MAIN ST
0010	110+30.25	-	123+92.20	LT & RT	2724	'M' MAIN ST
0010	9+35.02	-	11+82.82	LT & RT	496	'T' MAIN ST
0010	11+82.82	-	14+60.00	LT & RT	554	'T' MAIN ST
0010	14+60.00	-	15+87.66	LT & RT	255	'T' MAIN ST
0010	26+75.00	-	35+00.00	LT & RT	1650	'T' USH 53
0010	35+00.00	-	39+98.10	LT & RT	996	'T' USH 53
0010	36+48.10	-	39+98.10	15'-24' RT	88	'T' USH 53
0010	33+32.00	-	37+32.00	15'-24' RT	100	'R' USH 53
0010	74+66.00	-	82+16.00	15'-24' LT	750	'R' USH 53
0010	181+50.00	-	185+30.00	15'-24' LT	95	'R' USH 53
0010	185+30.00	-	189+70.00	15'-24' LT	110	'R' USH 53
0010	33+32.00	-	330+00.00	LT & RT	59336	'R' USH 53
0010	69+66.00	-	70+66.00	15'-22' LT & RT	25	'R' USH 53
0010	72+49.00	-	73+49.00	15'-22' LT & RT	25	'R' USH 53
0010	102+00.00	-	130+00.00	15'-18' LT & RT	700	'R' USH 53
0010	329+80.00	-	337+00.00	LT & RT	1440	'A' USH 53
0010	337+00.00	-	348+50.00	LT & RT	2300	'V' EKERN ST
0010	348+50.00	-	351+16.00	LT & RT	532	'V' EKERN ST
0010	351+16.00	-	357+25.45	LT & RT	1219	'V' EKERN ST
0010	357+25.45	-	373+50.00	LT & RT	3249	'V' EKERN ST
0010	25+00'T'	-	351+16'V'	INTERSECTIONS	4400	
0010				UNDISTRIBUTED	1939	
				TOTAL 0010	90380	

Pavement Marking Epoxy 8-Inch

CATEGORY	LOCATION	LF	LOCATION	646.0126 LF	REMARKS
0010	77+34'R'	-	77+89'R'	55	CHANNELIZING AT USH 53 AND SCHANSBERG ROAD
0010	118+85'R'	-	120+00'R'	115	CHANNELIZING AT USH 53 AND CTH S
0010	121+24'R'	-	121+86'R'	62	CHANNELIZING AT USH 53 AND THOMPSON COULEE ROAD
0010	368+21'V'	-	369+89'V'	168	CHANNELIZING AT USH 53 AND USH 121
0010	33+90'R'	-	34+40'R'	115	CHANNELIZING AT USH 53 AND CTH D
			TOTAL 0010	515	

Pavement Marking Same Day Epoxy 4-Inch

CATEGORY	STATION	TO	STATION	LOCATION	646.0406 LF	REMARKS
0010	28+78 'E'	-	373+50 'V'	CENTERLINE	44500	YELLOW
				TOTAL 0010	44500	

Pavement Marking Railroad Crossings Epoxy

CATEGORY	LOCATION	647.0110 EACH	REMARKS
0010	115+00 'M'	1	SOUTH SIDE OF RR CROSSING
0010	117+50 'M'	1	NORTH SIDE OF RR CROSSING
	TOTAL 0010	2	

Pavement Marking Curb Epoxy

CATEGORY	LOCATION	647.0456 LF	REMARKS
0010	RR CROSSING MEDIAN	40	4 CONCRETE MEDIAN SLOPED NOSE AT 10' EACH
	TOTAL 0010	40	

Pavement Marking Stop Line Epoxy 18-Inch

CATEGORY	STATION	TO	STATION	LOCATION	647.0566 LF	REMARKS
0010	2+55	-	2+55	'E' USH 53	22	NORTHBOUND ON USH 53 IN WHITEHALL
0010	113+95	-	114+23	'M' USH 53	28	EASTBOUND ON DEWEY/STH 121 IN WHITEHALL
0010	370+69	-	370+93	'V' USH 53	24	WESTBOUND ON STH 121 IN PIGEON FALLS
				TOTAL 0010	74	

Pavement Marking Island Nose Epoxy

CATEGORY	LOCATION	647.0606 EACH	REMARKS
0010	RR CROSSING MEDIAN	4	
	TOTAL 0010	4	

Pavement Marking Arrows Epoxy Type 2

CATEGORY	LOCATION	647.0166 EACH	REMARKS
0010	368+75	1	STH 121 RIGHT-HAND TURN LANE
0010	369+75	1	STH 121 RIGHT-HAND TURN LANE
	TOTAL 0010	2	

Pavement Marking Words Epoxy

CATEGORY	LOCATION	647.0356 EACH	REMARKS
0010	368+40	1	"ONLY" STH 121 RIGHT-HAND TURN LANE
0010	369+40	1	ONLY" STH 121 RIGHT-HAND TURN LANE
	TOTAL 0010	2	

Pavement Marking Parking Stall Epoxy

CATEGORY	STATION	TO	STATION	LOCATION	647.0656 LF	REMARKS
0030	101+00'M'	-	123+92.20'M'	USH 53	344	CITY OF WHITEHALL PARKING LANES 4-INCH WHITE
				TOTAL 0030	344	

3

Pavement Marking Crosswalk Epoxy 6-Inch

CATEGORY	LOCATION	647.0766 LF	REMARKS	POSITION
0010	11+47'E'	120	WEST SIDE OF ROOSEVELT	ACROSS USH 53
0010	105+36'M'	68	ACROSS LINCOLN ST.	ACROSS LINCOLN ST.
0010	109+96'M'	51	SOUTH SIDE OF HOBSON	ACROSS USH 53
0010	110+04'M'	51	SOUTH SIDE OF HOBSON	ACROSS USH 53
0010	110+06'M'	14	SOUTH SIDE OF HOBSON	DIAGONAL
0010	110+08'M'-110+55'M'	188	ACROSS HOBSON	ACROSS ROAD (4)
0010	110+57'M'	11.5	NORTH SIDE OF HOBSON	DIAGONAL
0010	110+57'M'	51	NORTH SIDE OF HOBSON	ACROSS USH 53
0010	110+65'M'	51	NORTH SIDE OF HOBSON	ACROSS USH 53
0010	113+20'M'-113+54'M'	68	ACROSS KELLEY	ACROSS ROAD (2)
0010	113+65'M'	10	NORTH SIDE OF KELLEY	DIAGONAL
0010	113+69'M'	55	SOUTH SIDE OF DEWEY	ACROSS USH 53
0010	113+77'M'	55	SOUTH SIDE OF DEWEY	ACROSS USH 53
0010	113+86'M'	20	SOUTH SIDE OF DEWEY	ACROSS USH 53
0010	113+95'M'-114+42'M'	94	ACROSS DEWEY	ACROSS ROAD (2)
0010	114+45	20	NORTH SIDE OF DEWEY	ACROSS USH 53
0010	114+58'M'	55	NORTH SIDE OF DEWEY	ACROSS USH 53
0010	114+66'M'	55	NORTH SIDE OF DEWEY	ACROSS USH 53
0010	118+08'M'	55	SOUTH SIDE OF DIDGE	ACROSS USH 53
0010	118+16'M'	55	SOUTH SIDE OF DODGE	ACROSS USH 53
0010	118+20'M'	13	SOUTH SIDE OF DODGE	DIAGONAL
0010	118+24'M'-118+69'M'	180	ACROSS DODGE	ACROSS ROAD (4)
0010	118+71	11	NORTH SIDE OF DODGE	DIAGONAL
0010	118+72'M'	55	NORTH SIDE OF DODGE	ACROSS USH 53
0010	118+80'M'	55	NORTH SIDE OF DODGE	ACROSS USH 53
0010	121+17'M'	56	SOUTH SIDE OF SCRANTON	ACROSS USH 53
0010	121+25'M'	56	SOUTH SIDE OF SCRANTON	ACROSS USH 53
0010	121+27'M'	12	SOUTH SIDE OF SCRANTON	DIAGONAL
0010	121+32'M'-121+78'M'	184	ACROSS SCRANTON	ACROSS ROAD (4)
0010	121+78'M'	10	NORTH SIDE OF SCRANTON	DIAGONAL
0010	121+81'M'	56	NORTH SIDE OF SCRANTON	ACROSS USH 53
0010	121+89'M'	56	NORTH SIDE OF SCRANTON	ACROSS USH 53
0010	9+71'T'	60	SOUTH SIDE OF BLAIR	ACROSS USH 53
0010	9+79'T'	60	SOUTH SIDE OF BLAIR	ACROSS USH 53
0010	9+80'T'	4	SOUTH SIDE OF BLAIR	DIAGONAL
0010	9+81'T'-10+29'T'	192	ACROSS BLAIR	ACROSS ROAD (4)
0010	10+32'T'	24	NORTH SIDE OF BLAIR	DIAGONAL
0010	10+35'T'	46	NORTH SIDE OF BLAIR	ACROSS USH 53
0010	10+43'T'	46	NORTH SIDE OF BLAIR	ACROSS USH 53
	TOTAL 0010	2324		

Locating No-Passing Zones

CATEGORY	LOCATION	648.0100 MI	REMARKS
0010	USH 53	8	
	TOTAL 0010	8	

Temporary Pavement Marking 4-Inch

CATEGORY	LOCATION	649.0100 LF	REMARKS
0010	PROJECT	66000	
	TOTAL 0010	66000	

Construction Staking Storm Sewer

CATEGORY	STATION	LOCATION	650.4000 EACH	REMARKS
0010	'E' - 3+1	MAIN AND ERVIN INTERSECTION	1	INLET RELOCATION
		TOTAL 0010	1	

Construction Staking Subgrade

CATEGORY	LOCATION	650.4500 LF	REMARKS
0010	INTERSECTION	500	
	TOTAL 0010	500	

Construction Staking Base

CATEGORY	LOCATION	650.5000 LF	REMARKS
0010	INTERSECTION	500	
	TOTAL 0010	500	

3

Construction Staking Curb Gutter and Curb & Gutter

CATEGORY	STATION	TO	STATION		LOCATION	650.5500 LF	REMARKS
0010	12+50 'E'	-	12+50 'E'	RT	ERVIN AND CLAIRE STREETS	16	
0010	12+50 'E'	-	12+50 'E'	LT	ERVIN AND ROOSEVELT STREETS	26	
0010	8+00 'E'	-	8+00 'E'	RT	ERVIN AND SHERWOOD STREETS	15	
0010	8+15 'E'	-	8+17 'E'	LT	ERVIN AND SHERWOOD STREETS	26	
0010	8+50 'E'	-	8+50 'E'	LT	ERVIN AND SHERWOOD STREETS	24	
0010	4+25 'E'	-	4+25 'E'	RT	ERVIN AND ABRAMS STREET	19	
0010	4+75 'E'	-	4+75 'E'	RT	ERVIN AND ABRAMS STREET	25	
0010	2+44 'E'	-	2+44 'E'	RT	INTERSECTION OF MAIN AND ERVIN STREETS	20	
0010	4+50 'E'	-	102+07 'M'	LT	INTERSECTION OF MAIN AND ERVIN STREETS	279	
0010	101+28 'M'	-	101+32 'M'	LT	ERVIN AND CTH D	30	
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	29	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	22	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	29	
0010	110+00 'M'	-	110+00 'M'	RT	MAIN AND HOBSON STREETS	29	
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	28	
0010	110+75 'M'	-	110+75 'M'	RT	MAIN AND HOBSON STREETS	22	
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	31	
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	26	
0010	113+90 'M'	-	113+90 'M'	LT	MAIN AND DEWEY STREETS	28	
0010	114+50 'M'	-	114+50 'M'	LT	MAIN AND DEWEY STREETS	32	
0010	114+50 'M'	-	114+50 'M'	RT	MAIN AND DEWEY STREETS	21	
0010	118+10 'M'	-	118+10 'M'	RT	MAIN AND DODGE STREETS	24	
0010	118+10 'M'	-	118+10 'M'	LT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M'	RT	MAIN AND DODGE STREETS	22	
0010	118+75 'M'	-	118+75 'M'	LT	MAIN AND DODGE STREETS	28	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	23	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	23	
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	27	
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	30	
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	20	
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	23	
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	21	
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	24	
0010	10+30 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	25	
0010	50+50	-	50+50	LT	MAIN AND STH 121	25	
0010	116+29 'M'	-	116+34 'M'	RT	RR CROSSING MEDIAN	82	
0010	116+44 'M'	-	116+50 'M'	RT	RR CROSSING MEDIAN	62	
0010	116+47 'M'	-	116+51 'M'	LT	RR CROSSING MEDIAN	82	
0010	116+62 'M'	-	116+70 'M'	LT	RR CROSSING MEDIAN	62	
					TOTAL 0010	1386	

Construction Staking Resurfacing Reference

CATEGORY	LOCATION	650.8000 LF	REMARKS
0010	PROJECT	41041	
	TOTAL 0010	41041	

Construction Staking Supplemental Control (Project 1630-02-71)

CATEGORY	LOCATION	650.9910 LS	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Cosntruction Staking Slope Stakes

CATEGORY	LOCATION	650.9920 LF	REMARKS
0010	INTERSECTION	217	
	TOTAL 0010	217	

Sawing Asphalt

CATEGORY	STATION	TO	STATION		LOCATION	690.0150 LF	REMARKS
0010	PROJECT				DRIVEWAYS	410	41 DRIVEWAYS AT APPROXIMATELY 10' PER DRIVEWAY
0010	PROJECT				SIDE ROADS	2640	44 INTERSECTIONS AT APPROXIMATELY 60' PER INTERSECTION
0010	PROJECT				CURB RAMPS	288	18 CURB RAMPS AT 16' EACH
0010	4+50 'E'	-	102+07 'M'	RT	INTERSECTION OF MAIN AND ERVIN STREETS	25	
0010	8+15 'E'	-	8+17 'E'	LT	ERWIN AND SHERWOOD STREETS	25	
0010	4+50 'E'	-	102+06 'M'	LT	MAIN AND ERWIN STREETS	25	
0010	101+28 'E'	-	101+32 'E'	LT	MAINS STREET AND CTH D	25	
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	25	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	25	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	25	
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	25	
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	25	
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	25	
0010	114+50 'M'	-	114+50'M'	LT	MAIN AND DEWEY STREETS	25	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	25	
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	25	
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	25	
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	25	
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	25	
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	25	
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	25	
					TOTAL 0010	3788	

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Sawing Concrete

CATEGORY	STATION	TO	STATION	LOCATION	690.0250 LF	REMARKS
0010	PROJECT			SIDEWALKS	216	36 SIDEWALKS AT 6' EACH
0010	PROJECT			CURB AND GUTTER	114	38 CURB AND GUTTER AT 3' EACH
				TOTAL 0010	330	

Special (01. Concrete Curb and Gutter Cure and Seal Treatment)

CATEGORY	STATION	TO	STATION		LOCATION	SPV.0090.01 LF	REMARKS
0010	12+50 'E'	-	12+50 'E'	RT	ERVIN AND CLAIRE STREETS	16	
0010	12+50 'E'	-	12+50 'E'	LT	ERVIN AND ROOSEVELT STREETS	26	
0010	8+00 'E'	-	8+00 'E'	RT	ERVIN AND SHERWOOD STREETS	15	
0010	8+15 'E'	-	8+17 'E'	LT	ERVIN AND SHERWOOD STREETS	26	
0010	8+50 'E'	-	8+50 'E'	LT	ERVIN AND SHERWOOD STREETS	24	
0010	4+25 'E'	-	4+25 'E'	RT	ERVIN AND ABRAMS STREET	19	
0010	4+75 'E'	-	4+75 'E'	RT	ERVIN AND ABRAMS STREET	25	
0010	2+44 'E'	-	2+44 'E'	RT	INTERSECTION OF MAIN AND ERVIN STREETS	20	
0010	4+50 'E'	-	102+07 'M'	LT	INTERSECTION OF MAIN AND ERVIN STREETS	279	
0010	101+28 'M'	-	101+32 'M'	LT	ERVIN AND CTH D	30	
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	29	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	22	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	29	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	22	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	29	
0010	110+00 'M'	-	110+00 'M'	RT	MAIN AND HOBSON STREETS	29	
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	28	
0010	110+75 'M'	-	110+75 'M'	RT	MAIN AND HOBSON STREETS	22	
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	31	
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	26	
0010	113+90 'M'	-	113+90 'M'	LT	MAIN AND DEWEY STREETS	28	
0010	114+50 'M'	-	114+50 'M'	LT	MAIN AND DEWEY STREETS	32	
0010	114+50 'M'	-	114+50 'M'	RT	MAIN AND DEWEY STREETS	21	
0010	118+10 'M'	-	118+10 'M'	RT	MAIN AND DODGE STREETS	24	
0010	118+10 'M'	-	118+10 'M'	LT	MAIN AND DODGE STREETS	29	
0010	118+75 'M'	-	118+75 'M'	RT	MAIN AND DODGE STREETS	22	
0010	118+75 'M'	-	118+75 'M'	LT	MAIN AND DODGE STREETS	28	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	23	
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	27	
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	30	
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	20	
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	23	
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	21	
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	24	
0010	10+30 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	25	
0010	50+50	-	50+50	LT	MAIN AND STH 121	25	
0010	116+29 'M'	-	116+34 'M'	RT	RR CROSSING MEDIAN	82	
0010	116+44 'M'	-	116+50 'M'	RT	RR CROSSING MEDIAN	62	
0010	116+47 'M'	-	116+51 'M'	LT	RR CROSSING MEDIAN	82	
0010	116+62 'M'	-	116+70 'M'	LT	RR CROSSING MEDIAN	62	
					TOTAL 0010	1386	

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Special (02. HMA Lane Repair Special)

CATEGORY	STATION TO STATION	LOCATION	SPV.0090.02 LF	REMARKS
0010	UNDISTRIBUTED	LT & RT	8200	HMA LANE REPAIR
		TOTAL 0010	8200	

Special (01. Prepare Foundation for Asphaltic Paving Special)

CATEGORY	LOCATION	SPV.0105.01 LS	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Special (02. Material Transfer Vehicle)

CATEGORY	LOCATION	SPV.0105.02 LS	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Special (03. Milling and Removing Temporary Joint)

CATEGORY	LOCATION	SPV.0105.03 LS	REMARKS
0010	PROJECT	1	
	TOTAL 0010	1	

Special (01. Concrete Sidewalk Cure and Seal Treatment)

CATEGORY	STATION	TO	STATION		LOCATION	SPV.0165.01 SF	REMARKS
0010	12+50 'E'	-	12+50 'E'	RT	ERVIN AND CLAIRE STREETS	152	
0010	12+50 'E'	-	12+50 'E'	LT	ERVIN AND ROOSEVELT STREETS	155	
0010	8+00 'E'	-	8+00 'E'	RT	ERWIN AND SHERWOOD STREETS	95	
0010	8+15 'E'	-	8+17 'E'	LT	ERWIN AND SHERWOOD STREETS	202	
0010	8+15 'E'	-	8+17 'E'	LT	ERWIN AND SHERWOOD STREETS	202	
0010	4+25 'E'	-	4+25 'E'	RT	ERVIN AND ABRAMS STREET	105	
0010	4+75 'E'	-	4+75 'E'	RT	ERVIN AND ABRAMS STREET	155	
0010	2+34 'E'	-	3+19 'E'	RT	MAIN AND ERVIN STREETS	481	
0010	4+50 'E'	-	102+06 'M'	LT	MAIN AND ERVIN STREETS	1517	
0010	101+28 'E'	-	101+32 'E'	LT	MAIN STREET AND CTH D	180	
0010	105+10 'M'	-	105+10 'M'	LT	MAIN AND LINCOLN STREETS	173	
0010	105+60 'M'	-	105+60 'M'	LT	MAIN AND LINCOLN STREETS	173	
0010	110+00 'M'	-	110+00 'M'	LT	MAIN AND HOBSON STREETS	197	
0010	110+00 'M'	-	110+00 'M'	RT	MAIN AND HOBSON STREETS	180	
0010	110+75 'M'	-	110+75 'M'	LT	MAIN AND HOBSON STREETS	239	
0010	110+75 'M'	-	110+75 'M'	RT	MAIN AND HOBSON STREETS	222	
0010	113+00 'M'	-	113+00 'M'	RT	MAIN AND KELLEY STREETS	175	
0010	113+60 'M'	-	113+60 'M'	RT	MAIN AND KELLEY STREETS	222	
0010	113+90 'M'	-	113+90 'M'	LT	MAIN AND DEWEY STREETS	239	
0010	114+50 'M'	-	114+50 'M'	LT	MAIN AND DEWEY STREETS	239	
0010	114+50 'M'	-	114+50 'M'	RT	MAIN AND DEWEY STREETS	217	
0010	115+48 'M'	-	116+30 'M'	RT	RR CROSSING MEDIAN	328	
0010	116+78 'M'	-	117+40 'M'	RT	RR CROSSING MEDIAN	248	
0010	118+10 'M'	-	118+10 'M'	LT	MAIN AND DODGE STREETS	259	
0010	118+10 'M'	-	118+10 'M'	RT	MAIN AND DODGE STREETS	259	
0010	118+75 'M'	-	118+75 'M'	LT	MAIN AND DODGE STREETS	259	
0010	118+75 'M'	-	118+75 'M'	RT	MAIN AND DODGE STREETS	259	
0010	121+00 'M'	-	121+00 'M'	LT	MAIN AND SCRANTON STREETS	259	
0010	121+00 'M'	-	121+00 'M'	RT	MAIN AND SCRANTON STREETS	239	
0010	121+75 'M'	-	121+75 'M'	LT	MAIN AND SCRANTON STREETS	249	
0010	121+75 'M'	-	121+75 'M'	RT	MAIN AND SCRANTON STREETS	259	
0010	9+72 'R'	-	9+72 'R'	LT	MAIN AND BLAIR STREETS	249	
0010	9+72 'R'	-	9+72 'R'	RT	MAIN AND BLAIR STREETS	259	
0010	10+30 'R'	-	10+30 'R'	LT	MAIN AND BLAIR STREETS	166	
0010	10+30 'R'	-	10+30 'R'	RT	MAIN AND BLAIR STREETS	219	
0010	50+50	-	50+50	LT	MAIN STREET AND STH 121	170	
					TOTAL 0010	9201	

Special (01. Cleaning, Grading and Shaping Existing Ditch)

CATEGORY	STATION TO STATION	LOCATION	SPV.0180.01 SY	REMARKS
0010	33+63 'M' - 68+58 'M'	STH 53 AND EAST OF CTH D	262	
0010	189+52 'M' - 191+52 'M	EAST OF SIMONSON ROAD	178	
0010	189+52 'M' - 191+52 'M	EAST OF SIMONSON ROAD	178	
		TOTAL 0010	618	

HMA PAVEMENT SPECIAL

CATEGORY	STATION	TO	STATION	LOCATION	HMA PAVEMENT TYPE E-3 SPECIAL	REMARKS
0010	116+25	-	116+50	RR CROSSING SOUTH SIDE	10	RR CROSSING SIDEWALK
0010	116+60	-	116+70	RR CROSSING NORTH SIDE	10	RR CROSSING SIDEWALK
0010	1+10.00	-	12+08.45	LT & RT	483	'E' ERVIN ST
0010	1+10.00	-	12+08.45	12'-22' LT & RT	154	'E' ERVIN ST
0010	12+08.45	-	17+37.60	LT & RT	233	'E' ERVIN ST
0010	12+08.45	-	17+37.60	12'-19' LT & RT	136	'E' ERVIN ST
0010	16+00.00	-	18+50.00	19'-24' RT	23	'E' ERVIN ST
0010	17+37.60	-	28+78.00	LT & RT	502	'E' ERVIN ST
0010	17+37.60	-	28+78.00	12'-19' LT & RT	293	'E' ERVIN ST
0010	101+00.00	-	110+30.25	LT & RT	410	'M' MAIN ST
0010	101+00.00	-	110+30.25	12'-24' LT & RT	142	'M' MAIN ST
0010	110+30.25	-	123+92.20	LT & RT	600	'M' MAIN ST
0010	110+30.25	-	123+92.20	12'-28.5' LT & RT	366	'M' MAIN ST
0010	9+35.02	-	11+82.82	LT & RT	109	'T' MAIN ST
0010	11+82.82	-	14+60.00	LT & RT	122	'T' MAIN ST
0010	14+60.00	-	16+00.00	LT & RT	62	'T' MAIN ST
0010	9+35.02	-	15+87.66	12'-22' LT & RT	75	'T' MAIN ST
0010	26+75.00	-	35+00.00	LT & RT	65	2' EXTRA SHLD
0010	26+75.00	-	35+00.00	LT & RT	0	'T' USH 53
0010	35+00.00	-	39+98.10	LT & RT	297	'T' USH 53
0010	36+48.10	-	39+98.10	15'-24' RT	63	'T' USH 53
0010	33+32.00	-	37+32.00	15'-24' RT	72	'R' USH 53
0010	74+66.00	-	82+16.00	15'-24' LT	134	'R' USH 53
0010	180+50.00	-	185+30.00	15'-24' LT	86	'R' USH 53
0010	185+30.00	-	189+70.00	15'-24' LT	78	'R' USH 53
0010	33+32.00	-	70+66.75	LT & RT	2225	'R' USH 53
0010	72+48.25	-	330+00.00	LT & RT	15344	'R' USH 53
0010	69+66.00	-	70+66.00	15'-22' LT & RT	28	'R' USH 53
0010	72+49.00	-	73+49.00	15'-22' LT & RT	28	'R' USH 53
0010	102+00.00	-	130+00.00	15'-18' LT & RT	334	'R' USH 53
0010	329+80.00	-	337+00.00	LT & RT	429	'A' USH 53
0010	337+00.00	-	348+50.00	LT & RT	685	'V' EKERN ST
0010	348+50.00	-	351+16.00	LT & RT	158	'V' EKERN ST
0010	351+16.00	-	357+25.45	LT & RT	314	'V' EKERN ST
0010	351+16.00	-	357+25.45	13'-22' LT & RT	90	'V' EKERN ST
0010	357+25.45	-	373+50.00	LT & RT	839	'V' EKERN ST
0010	357+25.45	-	373+50.00	13'-24' AVG LT & RT	168	'V' EKERN ST
0010	25+00'T'	-	351+16'V'	INTERSECTIONS	0+1980	90 TONS EACH RURAL
0010	33+97.00	-	39+24.00	15'-24' LT	94	'R' USH 53
0010	68+00.00	-	70+47.00	15'-22' RT	34	'R' USH 53
0010	68+43.00	-	70+72.00	15'-22' LT	32	'R' USH 53
				SHEET SUBTOTAL	**25327**	

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HMA Pavement Special

SPV.0195.01
HMA PAVEMENT
TYPE E-3 SPECIAL

CATEGORY	STATION	TO	STATION	LOCATION	TON	REMARKS
0010	72+28.00	-	74+75.00	15'-22' RT	34	'R' USH 53
0010	72+53.00	-	75+00.00	15'-22' LT	34	'R' USH 53
0010	176+25.00	-	179+76.00	15'-18' RT	21	'R' USH 53
0010	176+25.00	-	180+21.00	15'-18' LT	24	'R' USH 53
0010	236+65.00	-	239+12.00	15'-22' RT	34	'R' USH 53
0010	236+00.00	-	239+12.00	15'-22' LT	43	'R' USH 53
0010	239+49.00	-	242+00.00	15'-22' RT	35	'R' USH 53
0010	239+49.00	-	241+56.00	15'-22' LT	29	'R' USH 53
0010	302+95.00	-	307+80.00	15'-18' RT	29	'R' USH 53
0010	28+78.00	-	373+50.00	LEVELING & WEDGING	3000	UNDISTRIBUTED
				TOTAL 0010	**28610**	
0020	351+16.00	-	357+25.45	13'-22' LT & RT	27	'V' EKERN ST PIGEON FALLS PARKING LANES
0020	357+25.45	-	373+50.00	13'-24' AVG LT & RT	214	'V' EKERN ST PIGEON FALLS PARKING LANES
				TOTAL 0020	**241**	
0030	3+00.00	-	12+08.45	12'-22' LT & RT	81	'E' ERVIN ST WHITEHALL PARKING LANES
0030	101+00.00	-	110+30.25	12'-24' LT & RT	97	'M' MAIN ST WHITEHALL PARKING LANES
0030	110+30.25	-	123+92.20	12'-28.5' LT & RT	115	'M' MAIN ST WHITEHALL PARKING LANES
0030	9+35.02	-	15+87.66	12'-22' LT & RT	65	'T' MAIN ST WHITEHALL PARKING LANES
				TOTAL 0030	**358**	
				PROJECT TOTAL	**29209**	



DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
28+75 RT	C.E.	ASPHALT	NO
23+25 RT	C.E.	ASPHALT	NO
19+80 - 18+00 RT	P.E.	ASPHALT	NO
16+90 RT	P.E.	ASPHALT	NO
14+00 RT	P.E.	ASPHALT	NO

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 129	E

LEGEND
REPLACE CURB RAMP
REPLACE 10' OF SIDEWALK
REPLACE CURB AND GUTTER

BP: 101+00.00
EQUATION
LINCOLN STREET
HOBSON STREET
STH 121/DEWEY STREET
280
N
101
US 53/MAIN STREET
105
110
241
115
BP: 2+00.00
EP: 281+88.42
US 53/ERVIN STREET
RECONSTRUCT INTERSECTION
ADJUST INLET
HOBSON STREET
KELLEY STREET

SEE RAILROAD CONSTRUCTION DETAIL FOR 10' ASPHALT SIDEWALK CONSTRUCTION INFORMATION
WCR RR
RAILROAD CROSSING
DODGE STREET
SCRANTON STREET
PI: 9+35.02
BLAIR STREET
N
10
N0°08'20.74"W
233.48'
15
120
US 53/MAIN STREET
N0°08'20.74"W
2292.20'
STA BACK = 123+92.20
STA AHEAD = 9+35.02
EQUATION
PC: 11+68.50
DODGE STREET
SCRANTON STREET
BLAIR STREET
EXCEPTION TO CENTERLINE STA 15+87.66 TO STA 26+75.00 TIED PROJECT 1630-01-73
SEE RAILROAD CONSTRUCTION DETAIL FOR 10' ASPHALT SIDEWALK CONSTRUCTION INFORMATION
SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 130	E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
31+20 LT	P.E.	GRAVEL	NO
33+75 LT	P.E.	GRAVEL	NO
35+20 LT	P.E.	GRAVEL	NO
37+80 RT	F.E.	GRAVEL	NO



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 131	E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
51+50 LT	P.E.	GRAVEL	NO
52+80 LT	P.E.	GRAVEL	NO
53+20 LT	P.E.	GRAVEL	NO
55+75 LT	P.E.	ASPHALT	NO
57+10 LT	P.E.	ASPHALT	NO
57+50 LT	P.E.	ASPHALT	NO
57+50 LT	P.E.	GRAVEL	NO
59+50 LT	P.E.	GRAVEL	NO
60+60 LT	P.E.	ASPHALT	NO
62+00 LT	P.E.	GRAVEL	NO
64+00 LT	P.E.	GRAVEL	NO
69+50 LT	F.E.	GRAVEL	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 132 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020202_PO.DWG PLOT DATE : 11/2/2015 7:06 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : **********

WISDOT/CADDS SHEET 44

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
69+50 LT	F.E.	GRAVEL	NO
79+40 LT	P.E.	ASPHALT	NO
80+80 LT	P.E.	ASPHALT	NO
86+20 RT	P.E.	GRAVEL	NO
89+80 LT	P.E.	ASPHALT	NO
90+50 RT	P.E.	ASPHALT	NO
93+20 RT	P.E.	GRAVEL	NO
94+00 RT	P.E.	ASPHALT	NO
98+00 LT	P.E.	GRAVEL	NO



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 133 E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
104+00 LT	C.E.	ASPHALT	NO
107+00 LT	C.E.	ASPHALT	NO
113+50 LT	P.E.	GRAVEL	NO
115+75 RT	P.E.	ASPHALT	NO
117+00 LT	P.E.	GRAVEL	NO
119+50 RT	C.E.	ASPHALT	NO
121+80 RT	C.E.	ASPHALT	NO
123+10 LT	C.E.	ASPHALT	NO
124+00 RT	C.E.	GRAVEL	NO
127+10 LT	P.E.	ASPHALT	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 134 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020202_PO.DWG PLOT DATE : 11/2/2015 7:07 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

WISDOT/CADDS SHEET 44

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
133+10 LT	F.E.	GRAVEL	NO
150+10 LT	P.E.	GRAVEL	NO
150+10 RT	F.E.	GRAVEL	NO
150+60 RT	P.E.	GRAVEL	NO
160+10 LT	P.E.	GRAVEL	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 135 E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
160+10 LT	P.E.	GRAVEL	NO
160+75 RT	F.E.	GRAVEL	NO
162+40 LT	P.E.	GRAVEL	NO
179+75 RT	P.E.	GRAVEL	NO
184+75 LT	C.E.	ASPHALT	NO
186+50 RT	F.E.	ASPHALT	NO
186+80 LT	C.E.	ASPHALT	NO
188+80 LT	C.E.	ASPHALT	NO
189+80 LT	P.E.	ASPHALT	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 136 E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
189+80 LT	P.E.	ASPHALT	NO
199+60 LT	P.E.	GRAVEL	NO
199+60 RT	C.E.	GRAVEL	NO
204+00 RT	F.E.	GRAVEL	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 137 E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
223+20 LT	P.E.	GRAVEL	NO
234+20 LT	P.E.	ASPHALT	NO
236+80 LT	P.E.	ASPHALT	NO
240+80 LT	P.E.	ASPHALT	NO
241+00 RT	P.E.	GRAVEL	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 138 E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
251+20 RT	F.E.	GRAVEL	NO
257+00 RT	P.E.	GRAVEL	NO
264+75 LT	P.E.	GRAVEL	NO
265+90 LT	P.E.	ASPHALT	NO
266+00 RT	P.E.	GRAVEL	NO
267+00 LT	P.E.	GRAVEL	NO
267+80 LT	P.E.	ASPHALT	NO
270+00 LT	P.E.	GRAVEL	NO
276+80 RT	C.E.	GRAVEL	NO
279+80 LT	P.E.	GRAVEL	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 139 E

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
286+90 LT	F.E.	GRAVEL	NO
286+90 RT	F.E.	GRAVEL	NO
289+00 LT	P.E.	GRAVEL	NO
290+75 LT	P.E.	GRAVEL	NO
296+00 LT	P.E.	GRAVEL	NO
302+00 LT	F.E.	GRAVEL	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 140 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020202_PO.DWG PLOT DATE : 11/2/2015 7:10 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
310+90 RT	P.E.	GRAVEL	NO
312+75 RT	P.E.	ASPHALT	NO
315+30 RT	F.E.	GRAVEL	NO
316+00 LT	F.E.	GRAVEL	NO
321+50 LT	C.E.	GRAVEL	NO
325+40 RT	P.E.	GRAVEL	NO
329+30 RT	P.E.	ASPHALT	NO
331+20 RT	P.E.	ASPHALT	NO
336+00 LT	P.E.	GRAVEL	NO
338+50 RT	P.E.	GRAVEL	NO
339+60 LT	P.E.	ASPHALT	NO



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 141 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020202_PO.DWG PLOT DATE : 11/2/2015 7:10 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

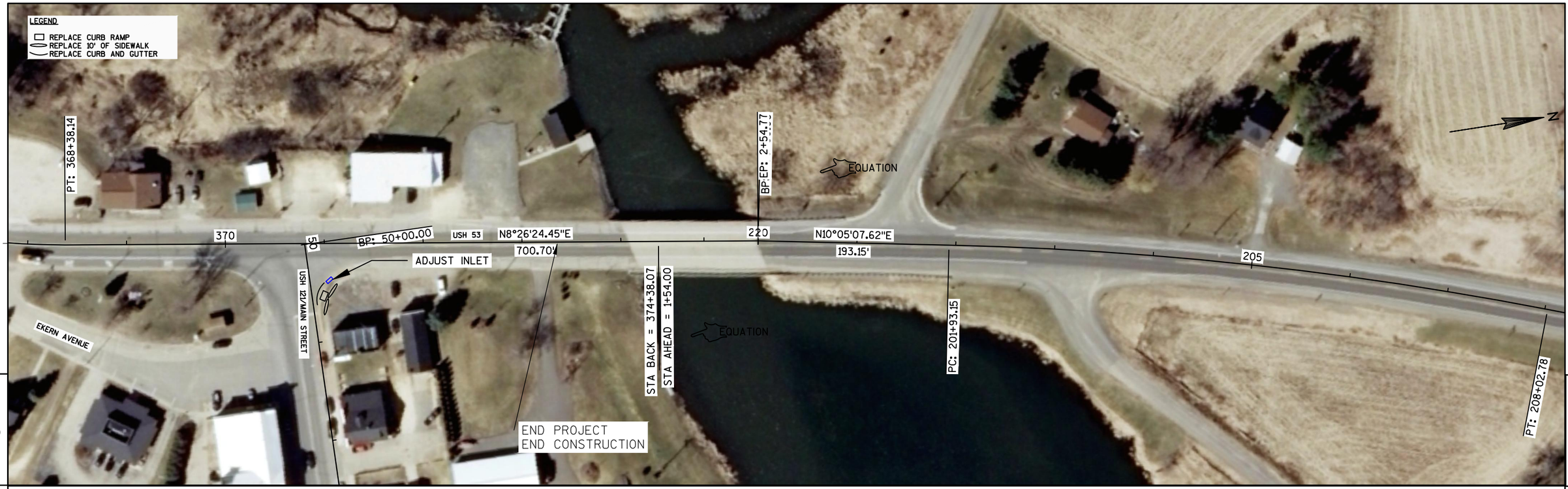
WISDOT/CADDS SHEET 44

DRIVEWAYS			
STA./LOC.	TYPE	MAT'L	C.P. REQ'D
339+60 LT	P.E.	ASPHALT	NO
340+80 RT	P.E.	GRAVEL	NO
345+20 RT	C.E.	ASPHALT	NO
346+20 RT	C.E.	ASPHALT	NO



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 142 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020202_PO.DWG PLOT DATE : 11/2/2015 7:11 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF



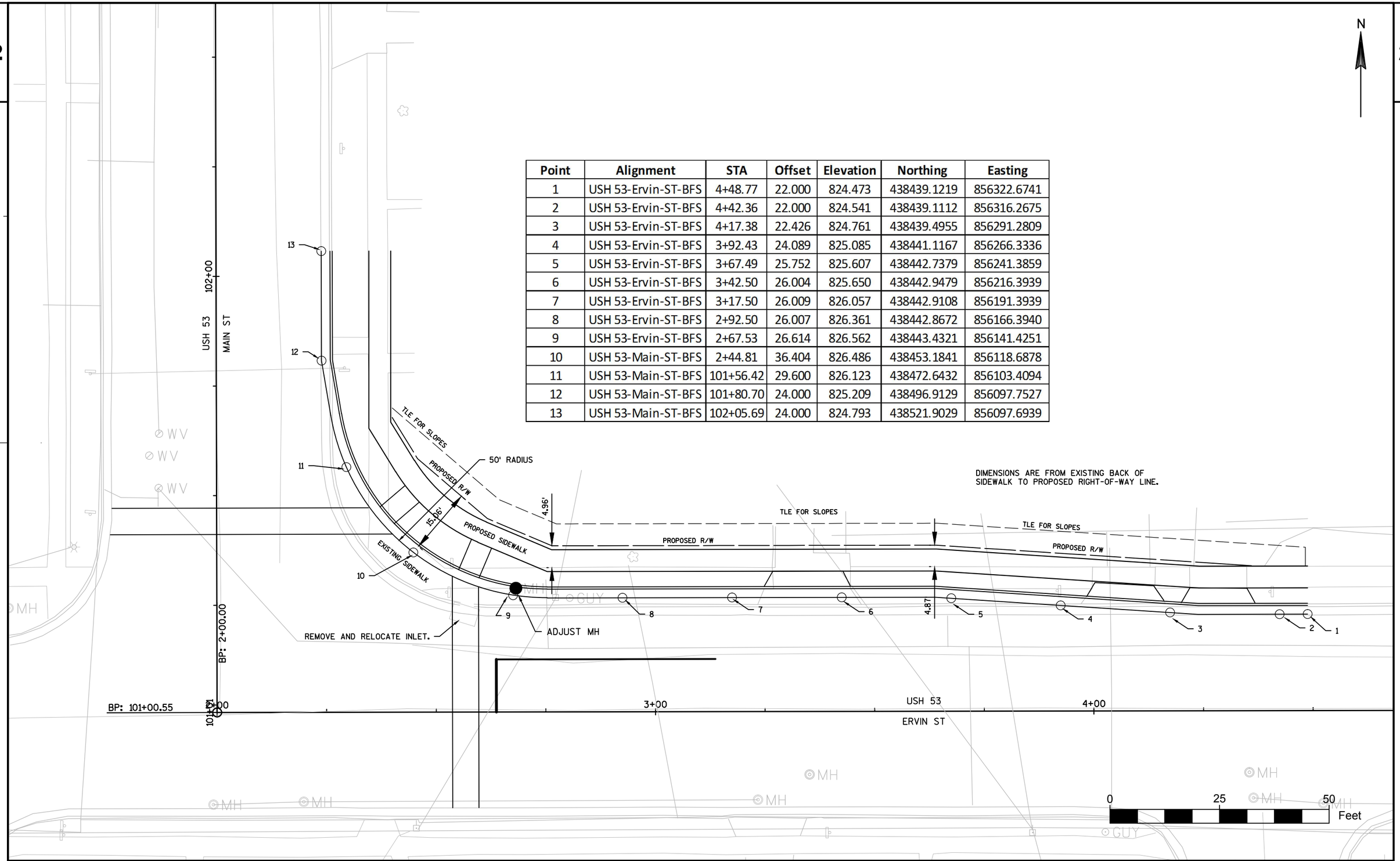
SCALE, FEET 0 50 100

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN	SHEET 143 E

FILE NAME : N:\PDS\C3D\16300201\SHEETSPLAN\020202_PO.DWG PLOT DATE : 11/2/2015 7:11 AM PLOT BY : DAVIS, TERESA L PLOT NAME : ---------- PLOT SCALE : 1:100_XREF

WISDOT/CADDS SHEET 44

Point	Alignment	STA	Offset	Elevation	Northing	Easting
1	USH 53-Ervin-ST-BFS	4+48.77	22.000	824.473	438439.1219	856322.6741
2	USH 53-Ervin-ST-BFS	4+42.36	22.000	824.541	438439.1112	856316.2675
3	USH 53-Ervin-ST-BFS	4+17.38	22.426	824.761	438439.4955	856291.2809
4	USH 53-Ervin-ST-BFS	3+92.43	24.089	825.085	438441.1167	856266.3336
5	USH 53-Ervin-ST-BFS	3+67.49	25.752	825.607	438442.7379	856241.3859
6	USH 53-Ervin-ST-BFS	3+42.50	26.004	825.650	438442.9479	856216.3939
7	USH 53-Ervin-ST-BFS	3+17.50	26.009	826.057	438442.9108	856191.3939
8	USH 53-Ervin-ST-BFS	2+92.50	26.007	826.361	438442.8672	856166.3940
9	USH 53-Ervin-ST-BFS	2+67.53	26.614	826.562	438443.4321	856141.4251
10	USH 53-Main-ST-BFS	2+44.81	36.404	826.486	438453.1841	856118.6878
11	USH 53-Main-ST-BFS	101+56.42	29.600	826.123	438472.6432	856103.4094
12	USH 53-Main-ST-BFS	101+80.70	24.000	825.209	438496.9129	856097.7527
13	USH 53-Main-ST-BFS	102+05.69	24.000	824.793	438521.9029	856097.6939

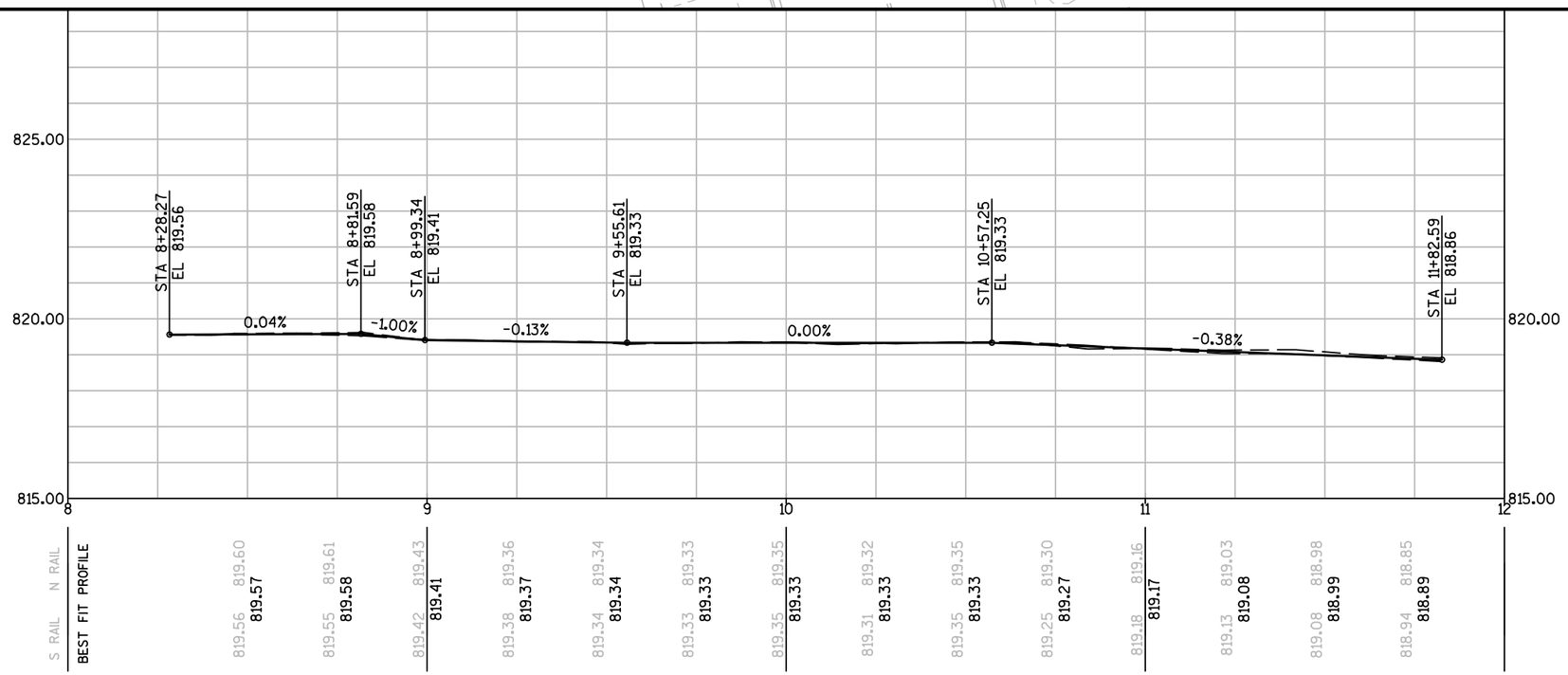


PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	ERVIN & MAIN STREET INTERSECTION	SHEET 144	E



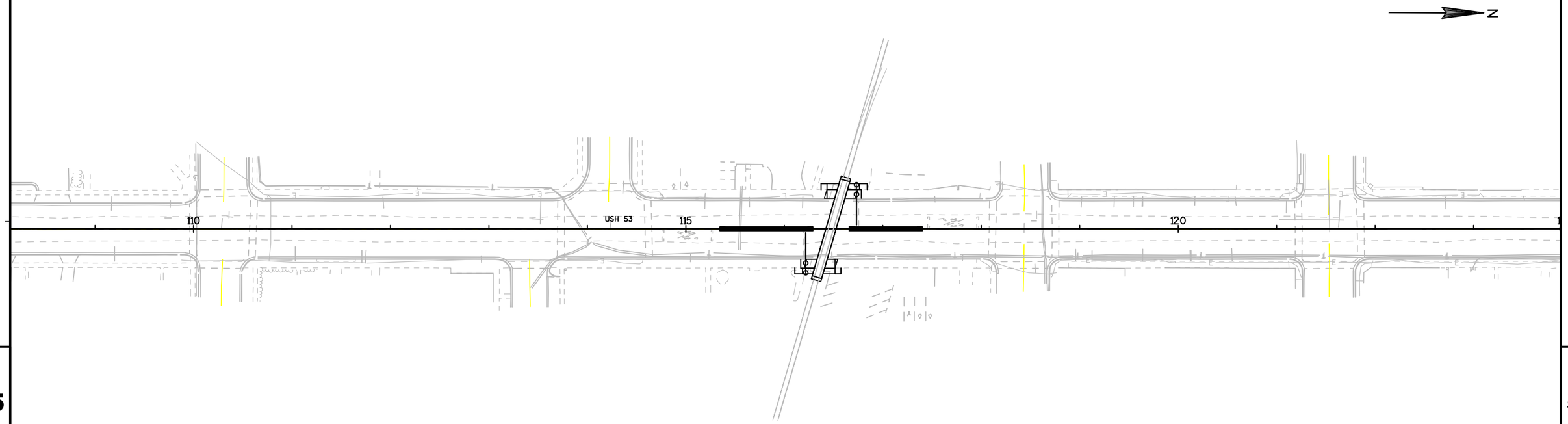
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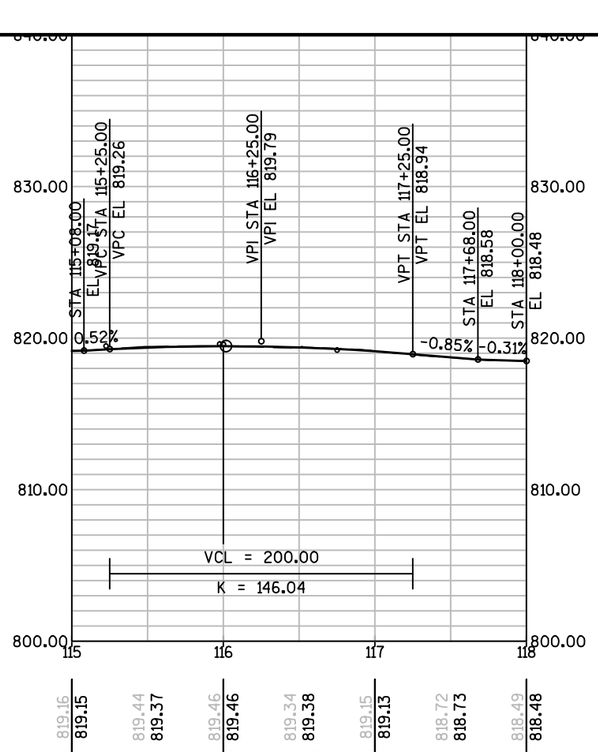
RAILS WERE NOT UNDER LOAD WHEN PROFILES WERE FIELD SURVEYED.

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN AND PROFILE: EXISTING RAIL PROFILES - BEST FIT	SHEET 145	E



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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	PLAN AND PROFILE: C WHITEHALL RR CROSSING (281794J)	SHEET 146	E

Standard Detail Drawing List

08A05-19A	INLET COVERS TYPE A, H, A-S, H-S & Z
08A05-19B	INLET COVERS TYPE B, B-A, C, MS, MS-A, & WM
08C07-01	INLETS 2X2-FT, 2X2.5-FT, 2X3-FT AND 2.5X3-FT
08D01-17	CONCRETE CURB, CONCRETE CURB AND GUTTER AND TIES
08D05-15A	CURB RAMPS TYPES 1 AND 1-A
08D05-15B	CURB RAMPS TYPES 2 AND 3
08D05-15C	CURB RAMPS TYPES 4A AND 4A1
08D05-15D	CURB RAMPS TYPE 4B AND 4B1
08D05-15E	CURB RAMPS TYPES 5, 6, 7A, 7B & 8
08E08-03	TYPICAL INSTALLATIONS OF EROSION BALES / TEMPORARY DITCH CHECKS
08E09-06	SILT FENCE
08E10-02	INLET PROTECTION TYPE A, B, C AND D
08F01-11	APRON ENDWALLS FOR CULVERT PIPE
08F04-07	JOINT TIES FOR CONCRETE PIPE AND CONCRETE COLLAR DETAIL
09A01-13A	AT-GRADE SIDE ROAD INTERSECTION, TYPES "B1", "B2", "C" AND D AND TEE INTERSECTION BYPASS LANE
09A01-13B	AT-GRADE SIDE ROAD INTERSECTION, TYPE "A1" & "A2"
11B02-02	CONCRETE MEDIAN NOSE
13B01-10	PAVEMENT DETAILS FOR RAILROAD APPROACH
14B15-08A	STEEL PLATE BEAM GUARD, CLASS "A" INSTALLATION & ELEMENTS
14B15-08B	STEEL PLATE BEAM GUARD, CLASS "A" INSTALLATION & ELEMENTS
14B15-08C	STEEL PLATE BEAM GUARD, CLASS "A", INSTALLATION & ELEMENTS
14B18-06A	STEEL PLATE BEAM GUARD, CLASS "A" (AT BRIDGES, OBSTACLES AND SIDEROADS/DRIVEWAYS)
14B20-11A	STEEL THRIE BEAM STRUCTURE APPROACH
14B20-11B	STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTION TO SQUARE END PARAPETS
14B20-11C	STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTION TO VERTICAL FACED PARAPETS
14B20-11E	STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTION TO BRIDGE RAILING TYPES "F" AND "W"
14B20-11G	STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTOR PLATE DETAIL
14B24-08A	STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL
14B24-08B	STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL
14B24-08C	STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL
14B27-01A	STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL
14B27-01B	STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL
14B27-01C	STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL
14B42-03A	MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL
14B42-03B	MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL
14B42-03C	MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL
14B44-02A	MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)
14B44-02B	MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)
14B44-02C	MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)
14B45-03A	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-03B	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-03C	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-03D	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-03G	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
14B45-03H	MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
15A03-02A	FLEXIBLE MARKER POST FOR CULVERT END
15A03-02B	FLEXIBLE MARKER POST FOR CULVERT END
15A07-01	OBJECT MARKER FOR HAZARDOUS CULVERT
15C02-05A	BARRICADES AND SIGNS FOR MAINLINE CLOSURES
15C02-05B	BARRICADES AND SIGNS FOR MAINLINE CLOSURES
15C02-05C	DETOUR SIGNING FOR MAINLINE CLOSURES
15C03-03	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES
15C04-03	TRAFFIC CONTROL, ADVANCE WARNING SIGNS 45 M.P.H. OR GREATER TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC
15C05-03	TRAFFIC CONTROL, ADVANCE WARNING SIGNS 40 M.P.H. OR LESS
15C06-07	SIGNING & MARKING FOR TWO LANE BRIDGES
15C07-12B	PAVEMENT MARKING WORDS
15C07-12C	PAVEMENT MARKING ARROWS
15C08-16A	PAVEMENT MARKING (MAINLINE)
15C08-16B	PAVEMENT MARKING (INTERSECTIONS)
15C08-16F	PAVEMENT MARKING (ISLANDS)
15C09-09A	SIGNING AND PAVEMENT MARKING DETAILS FOR RAILROAD-HIGHWAY GRADE CROSSINGS
15C12-04	TRAFFIC CONTROL FOR LANE CLOSURE (SUITABLE FOR MOVING OPERATIONS)
15C19-03A	MOVING PAVEMENT MARKING OPERATION TWO-LANE TWO-WAY ROADWAY
15C27-01	DOUBLE ARROW WARNING SIGN PLACEMENT
15C33-01	STOP LINE AND CROSSWALK PAVEMENT MARKING
15D30-02A	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-02B	TRAFFIC CONTROL, TEMPORARY ADA COMPLIANT PEDESTRIAN ACCOMMODATION

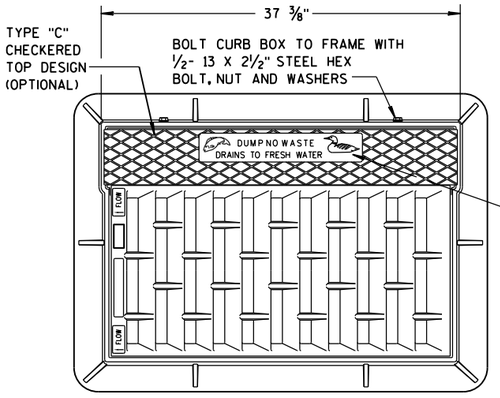
6

Standard Detail Drawing List

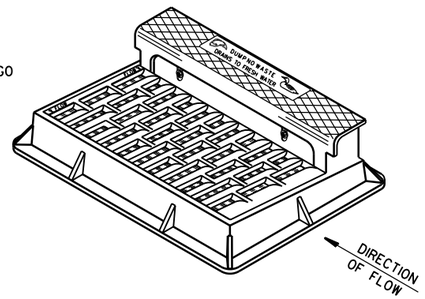
15D30-02C	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

6

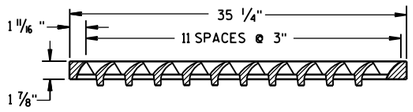
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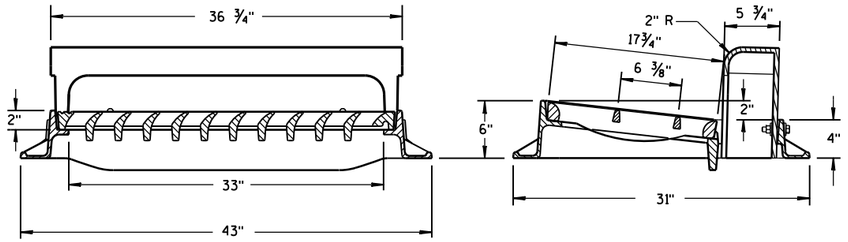


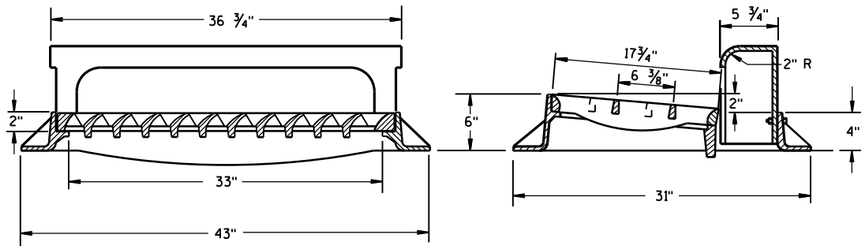
NOTE:
GRATE IS REVERSIBLE.



NOTE: CURB BOX HEIGHT ADJUSTABLE 6" TO 9"

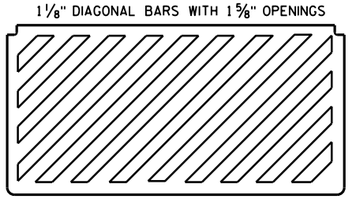






TYPE "H"

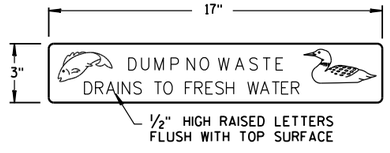
NOTE: EITHER CASTING IS ACCEPTABLE



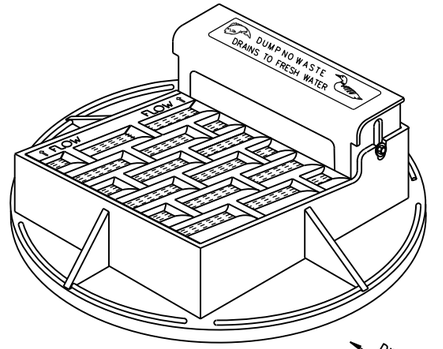
SPECIAL GRATE FOR TYPE "H" COVER

(MEASURES 35 1/4" X 17 3/4" X 2")

(NOTED AS TYPE H-S ON DRAINAGE TABLE)

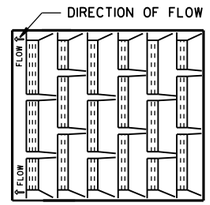


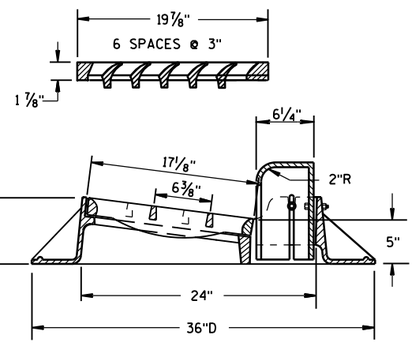
LOGO DETAIL



NOTE: CURB BOX ADJUSTABLE 4" TO 9"

NOTE:
GRATE IS REVERSIBLE.





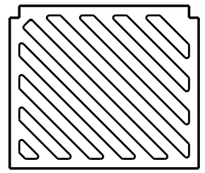
TYPE "A"

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

DETAIL DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR CATCH BASIN, MANHOLE AND INLET COVERS SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PROVIDING THAT SUCH ALTERNATE DESIGNS MAKE PROVISION FOR EQUIVALENT CAPACITY AND STRENGTH.

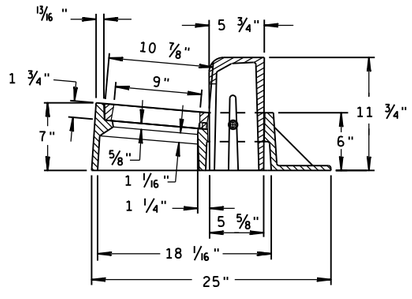
ROUND FRAMES AND COVERS SHALL HAVE CONTINUOUSLY MACHINED BEARING SURFACES TO PREVENT ROCKING AND RATTLING.

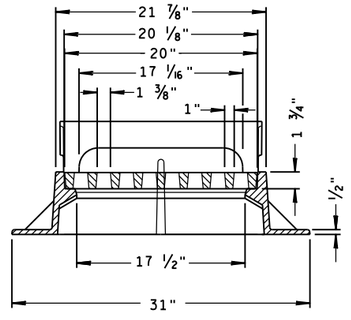


SPECIAL GRATE FOR TYPE "A" COVER

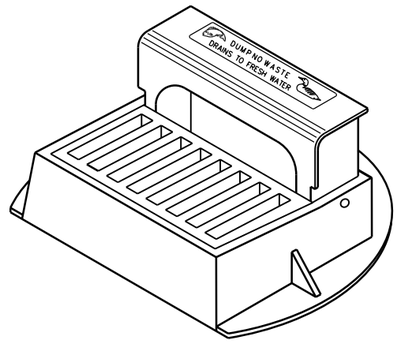
(MEASURES 19 3/4" X 17" X 1 7/8")

(NOTED AS TYPE A-S ON DRAINAGE TABLE)





TYPE "Z"



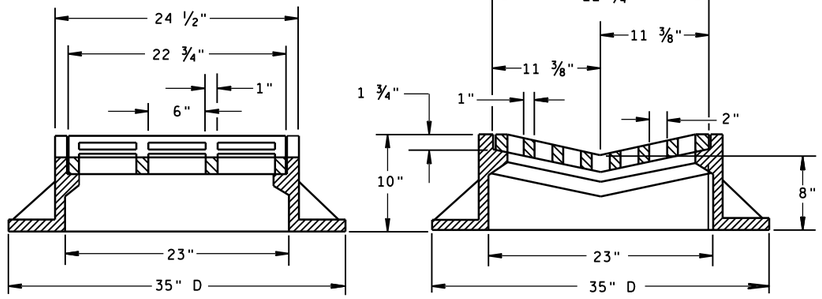
INLET COVERS TYPE A, H, A-S, H-S & Z

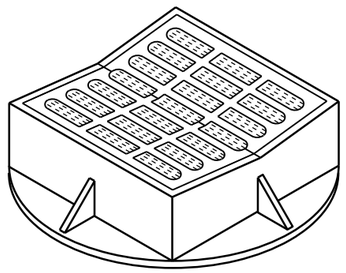
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
11-27-13 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS ENGINEER
FHWA

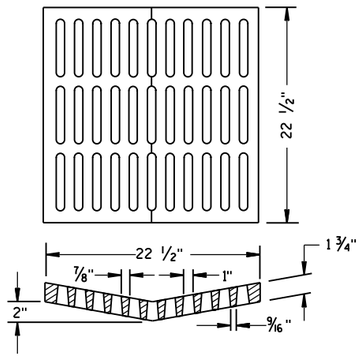
6

S.D.D. 8 A 5-19a



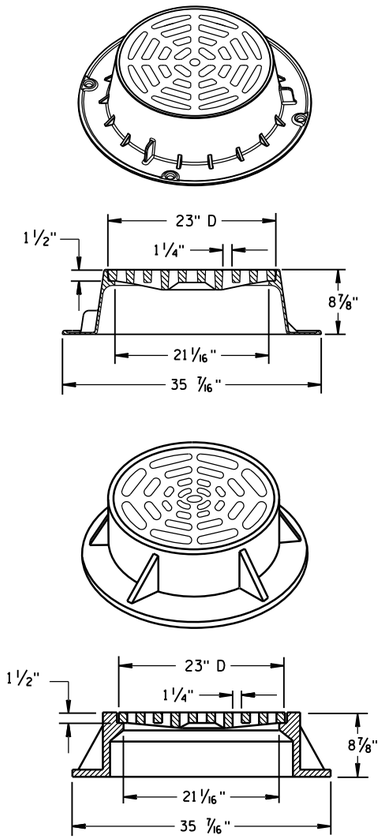


TYPE "B"



ALTERNATIVE GRATE FOR TYPE "B" COVER

USE WHERE PEDESTRIAN OR BICYCLE TRAFFIC IS POSSIBLE.
NOTED AS TYPE B-A ON THE DRAINAGE TABLE



TYPE "C"

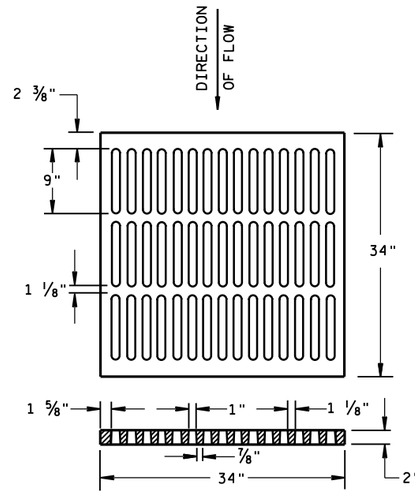
NOTE: EITHER CASTING IS ACCEPTABLE

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

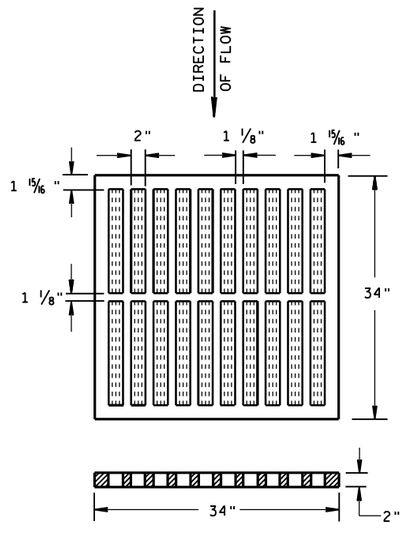
DETAIL DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR CATCH BASIN, MANHOLE AND INLET COVERS SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PROVIDING THAT SUCH ALTERNATE DESIGNS MAKE PROVISION FOR EQUIVALENT CAPACITY AND STRENGTH.

ROUND FRAMES AND COVERS SHALL HAVE CONTINUOUSLY MACHINED BEARING SURFACES TO PREVENT ROCKING AND RATTLING.



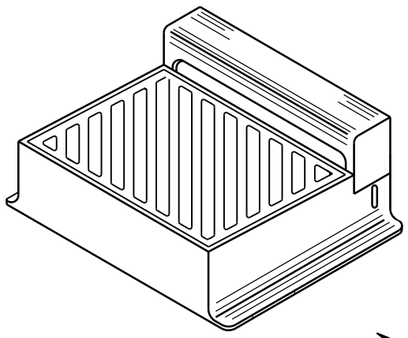
ALTERNATIVE TYPE "MS"

USE WHERE PEDESTRIAN OR BICYCLE TRAFFIC IS PERMITTED
NOTED AS TYPE MS-A ON THE DRAINAGE TABLE

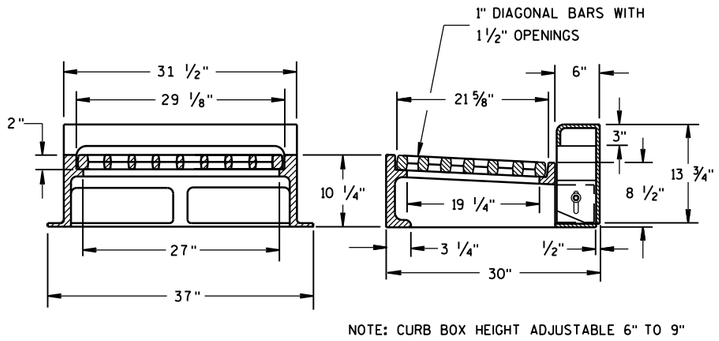


TYPE "MS"

USE ON FREEWAYS AND EXPRESSWAYS
NOTED AS TYPE MS ON DRAINAGE TABLE



DIAGONAL SLOTS, SHALL BE ORIENTED TO THE DIRECTION OF FLOW AS ILLUSTRATED. GRATES ARE MANUFACTURED TO BE REVERSIBLE.



NOTE: CURB BOX HEIGHT ADJUSTABLE 6" TO 9"

TYPE "WM"

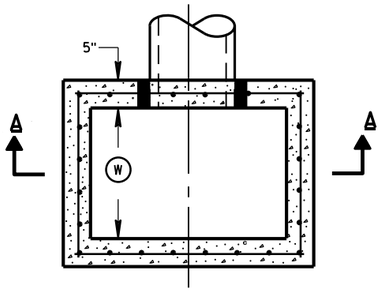
INLET COVERS
TYPE B, B-A, C,
MS, MS-A, & WM

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

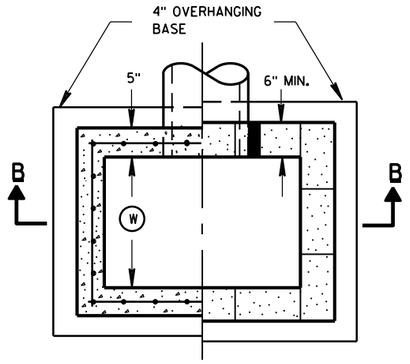
APPROVED
11/27/2013 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

6

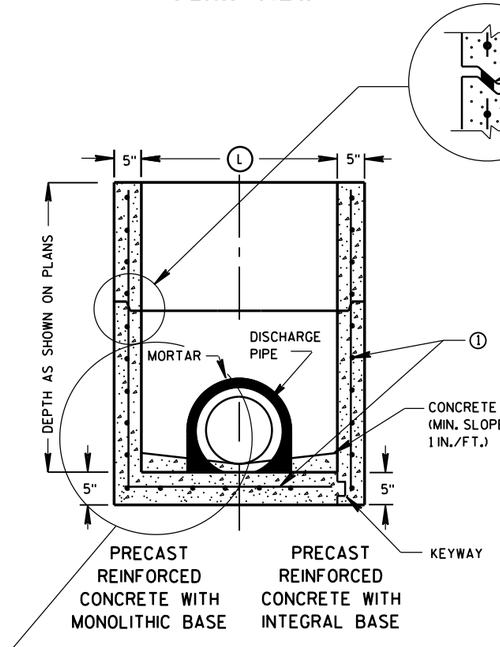
S.D.D. 8 A 5-19b



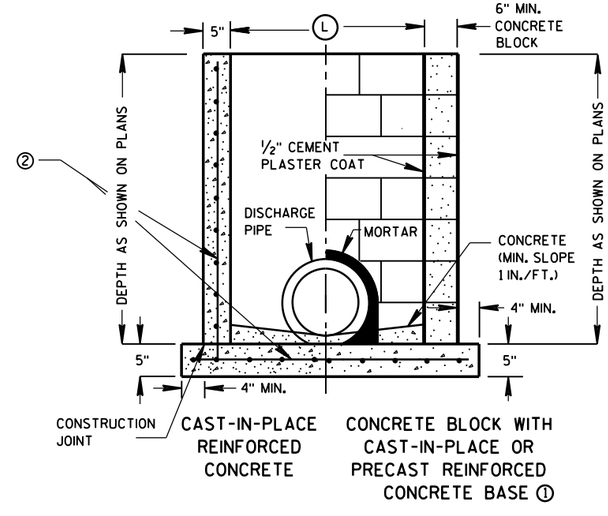
PLAN VIEW



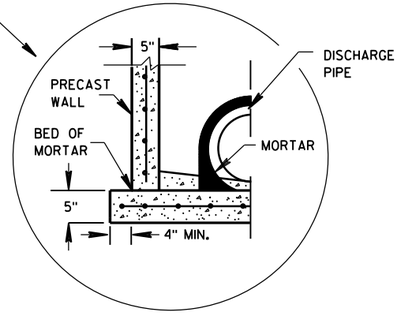
PLAN VIEW



SECTION A-A



SECTION B-B



SEPARATE PRECAST REINFORCED CONCRETE BASE OPTION

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

UNLESS OTHERWISE AUTHORIZED IN WRITING BY THE ENGINEER, THE CONTRACTOR SHALL NOT ORDER AND DELIVER PRECAST INLET UNITS REQUIRED FOR THE PROJECT UNTIL A LIST OF SIZES IS FURNISHED BY THE ENGINEER.

DETAILED DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR UNDERGROUND DRAINAGE STRUCTURES SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PROVIDING THAT SUCH ALTERNATE DESIGNS MAKE PROVISION FOR EQUIVALENT CAPACITY AND STRENGTH.

ALL PRECAST INLET UNITS SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF ASTM C 913.

ALL DRAINAGE STRUCTURES ARE DESIGNATED ON THE PLANS AS "MANHOLES 3X3-L", "CATCH BASINS 4-B", "INLETS 2X3-H", ETC. THE FIRST NUMBERS DESIGNATES THE SIZE OF THE STRUCTURE, AND THE FOLLOWING LETTER DESIGNATES THE TYPE OF COVER TO BE USED TO COMPRISE THE COMPLETE UNIT.

BASES SHALL BE PLACED ON A BED OF MATERIAL AT LEAST 6 INCHES IN DEPTH, WHICH MEETS THE REQUIREMENTS OF GRANULAR BACKFILL. THIS BEDDING SHALL BE COMPACTED AND PROVIDE UNIFORM SUPPORT FOR THE ENTIRE AREA OF THE BASE.

ALL BAR STEEL REINFORCEMENT SHALL BE EMBEDDED 2 INCHES CLEAR UNLESS OTHERWISE SHOWN OR NOTED.

PRECAST REINFORCED RISERS SHALL HAVE A TONGUE AND GROOVE JOINT WITH TONGUE UP OR DOWN.

4" OVERHANGING BASES ARE REQUIRED FOR CAST-IN-PLACE REINFORCED CONCRETE AND CONCRETE BLOCK INSTALLATIONS.
4" OVERHANG IS REQUIRED WHEN SEPARATE PRECAST BASE IS PROVIDED.
OVERHANG IS NOT REQUIRED ON PRECAST STRUCTURES WITH AN INTEGRAL OR MONOLITHIC BASE.

MAXIMUM INSIDE PIPE DIAMETER DETERMINED BY 3 INCH CLEARANCE ON EACH SIDE OF THE OUTSIDE WALL OF THE PIPE. SEE DETAIL "A". ASSUMES PIPE ENTERS PERPENDICULAR TO THE STRUCTURE.

① FOR PRECAST INLETS PROVIDE REINFORCING STEEL IN ACCORDANCE TO ASTM C 913.

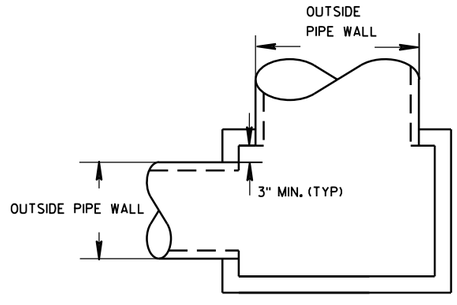
② CONTRACTOR TO PROVIDE DRAWING(S) STAMPED BY A PROFESSIONAL ENGINEER FOR STEEL REINFORCING DESIGN FOR CAST-IN-PLACE STRUCTURES.

INLET COVER MATRIX

INLET SIZE		INLET COVER TYPE	ALL A'S	ALL B'S	BW	F	ALL H'S	S	T	V	WM
	WIDTH (W) (FT)	LENGTH (L) (FT)									
2X2-FT	2	2	X	X				X		X	
2X2.5-FT	2	2.5			X			X	X	X	X
2X3-FT	2	3					X				
2.5X3-FT	2.5	3				X					

PIPE MATRIX

INLET SIZE	MAXIMUM INSIDE PIPE DIAMETER	
	WIDTH (IN)	LENGTH (IN)
2X2-FT	12	12
2X2.5-FT	12	18
2X3-FT	12	24
2.5X3-FT	18	24



DETAIL "A"

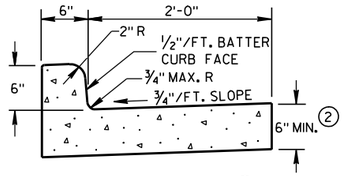
INLETS 2X2-FT, 2X2.5-FT, 2X3-FT AND 2.5X3-FT

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

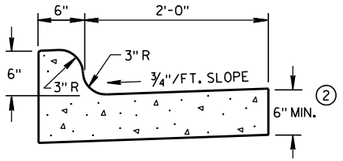
APPROVED
6/5/2012
DATE
FHWA

/S/ Jerry H. Zogg
ROADWAY STANDARDS DE ENGINEER

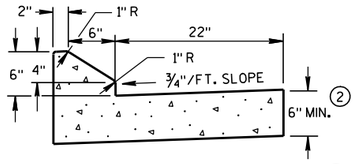
6
S.D.D. 8 C 7-1



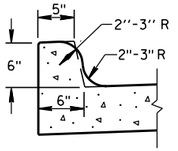
TYPES A & D (1)



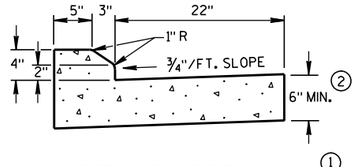
TYPES K & L (1)



6" SLOPED CURB TYPES G & J (1)

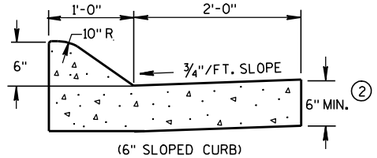


OPTIONAL CURB SHAPE FOR TYPES K & L (1)

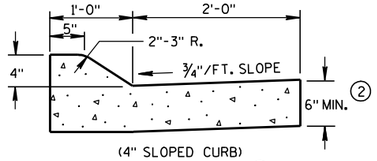


4" SLOPED CURB TYPES G & J (1)

CONCRETE CURB & GUTTER 30"

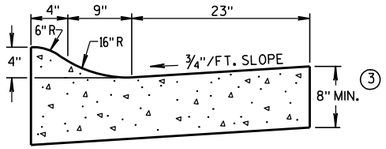


(6" SLOPED CURB)



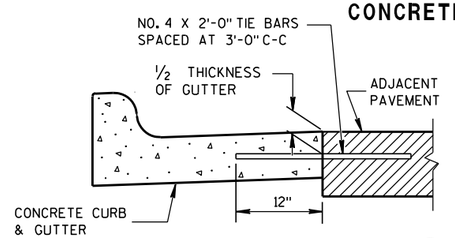
(4" SLOPED CURB)

TYPES A & D (1)



4" SLOPED CURB TYPES R & T (1) (4)

CONCRETE CURB & GUTTER 36"



TYPICAL TIE BAR LOCATION (1)

REVERSE SLOPE GUTTER (5)
(TYPICAL FOR ALL CURB & GUTTER TYPES)

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE CONTRACT.

PAVEMENT TIES AND TIE BARS SHALL BE EPOXY COATED IN CONFORMANCE WITH SUBSECTION 505.2.6.2 OF THE STANDARD SPECIFICATIONS.

INTEGRAL CURB & GUTTER SHALL CONFORM TO THE DETAILS SHOWN FOR CONCRETE CURB & GUTTER INCLUDING THE TRANSVERSE GUTTER SLOPE. A LONGITUDINAL CONSTRUCTION JOINT IS NOT REQUIRED WITH INTEGRAL CURB AND GUTTER.

WHERE THE TRANSVERSE JOINTS IN THE PAVEMENT ARE REQUIRED TO BE SEALED, THE JOINTS IN THE INTEGRAL CURB AND GUTTER SHALL BE SEALED TO THE FACE OF CURB WITH THE SAME TYPE OF SEALANT. THE COST OF FURNISHING AND INSTALLING THIS SEALANT SHALL BE INCIDENTAL TO THE ITEM CONCRETE CURB AND GUTTER.

UNLESS OTHERWISE SHOWN ON THE TYPICAL CROSS SECTIONS, THE BASE AGGREGATE AND COMMON EXCAVATION LIMITS ARE 2'-0" BEHIND THE BACK OF CURBS.

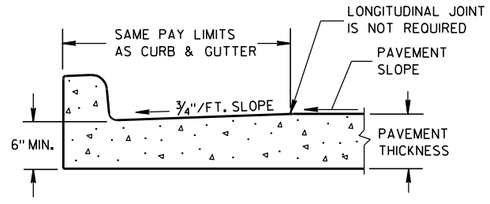
(1) TIE BARS ARE REQUIRED FOR CURB AND GUTTER TYPES A, G, K AND R.

(2) THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 6" MINIMUM GUTTER THICKNESS IS MAINTAINED.

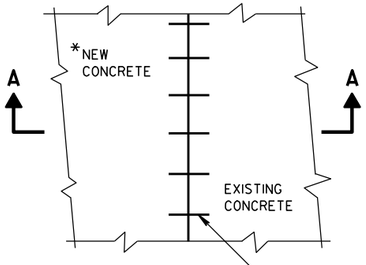
(3) THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 8" MINIMUM GUTTER THICKNESS IS MAINTAINED.

(4) THE FACE OF CURB IS 6" FROM THE BACK OF CURB.

(5) WHEN REVERSE SLOPE GUTTER IS REQUIRED, THE LOCATION(S) WILL BE SHOWN ELSEWHERE IN THE PLAN.

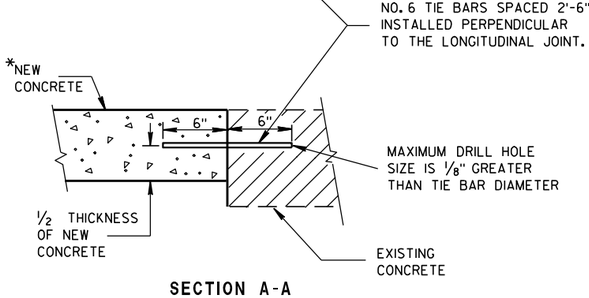


PARTIAL SECTION OF PAVEMENT WITH INTEGRAL CURB & GUTTER



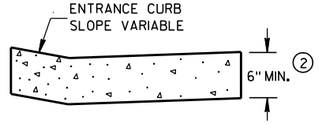
PLAN VIEW

*NEW CURB & GUTTER, SURFACE DRAINS, CONCRETE PAVEMENT OR OTHER NEW CONCRETE.

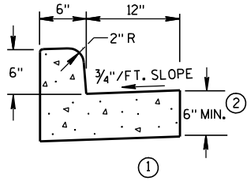


SECTION A-A

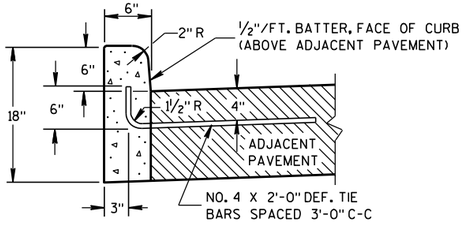
TIE BARS DRILLED INTO EXISTING PAVEMENT



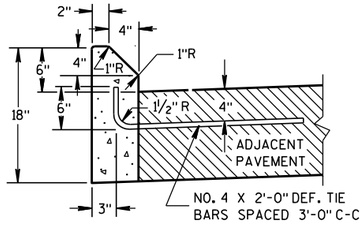
DRIVEWAY ENTRANCE CURB
(WHEN DIRECTED BY THE ENGINEER)



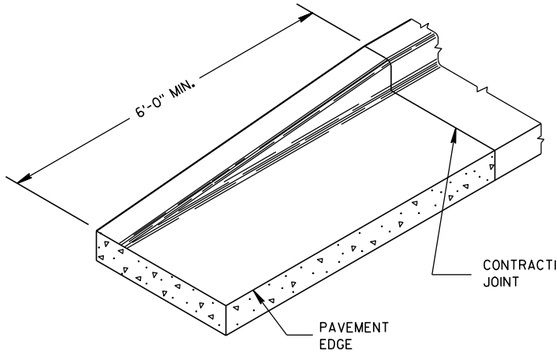
(1)
TYPES A & D
CONCRETE CURB & GUTTER 18"



(1)
TYPES A & D



(1)
TYPES G & J



END SECTION CURB & GUTTER

CONCRETE CURB

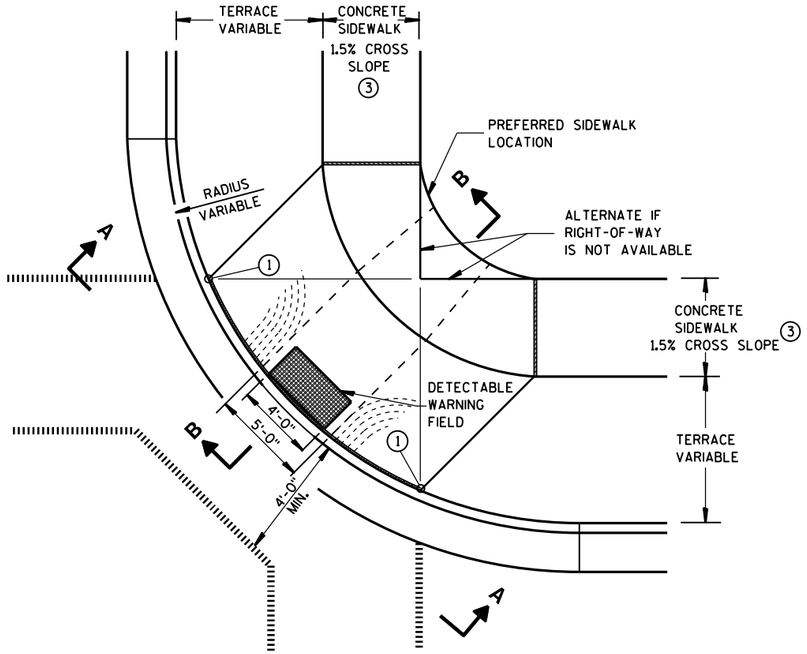
CONCRETE CURB, CONCRETE CURB & GUTTER AND TIES	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
9/4/08 DATE	/S/ Jerry H. [illegible] ROADWAY STANDARDS ENGINEER
FHWA	152 ENT

6

S.D.D. 8 D 1-17

6

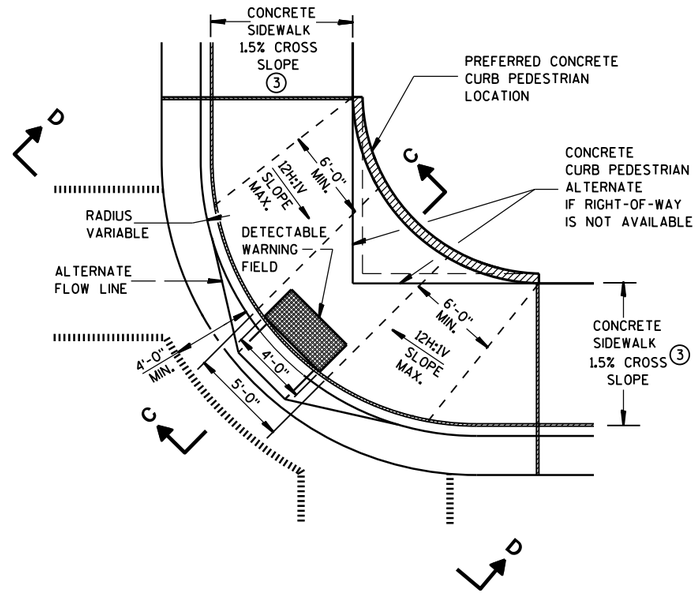
S.D.D. 8 D 1-17



PLAN VIEW

TYPE 1 RAMP

(CENTER OF CORNER RADIUS)



PLAN VIEW

TYPE 1-A RAMP

(NO TERRACE)

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

RAMPS SHALL BE BUILT AT 12H:1V OR FLATTER. WHEN NECESSARY, THE SIDEWALK ELEVATION MAY BE LOWERED TO MEET THE HIGH POINT ON THE RAMP.

TYPE 1 RAMPS SHALL HAVE A NORMAL SIDEWALK APRON AND CURB ON BOTH SIDES OF RAMP.

DETECTABLE WARNING FIELD SHALL BE MEASURED AND PAID BY THE SQUARE FOOT AS "CURB RAMP DETECTABLE WARNING FIELD". THE CONCRETE PEDESTRIAN CURB, IF NEEDED, SHALL BE MEASURED AND PAID BY THE LINEAL FOOT AS "CONCRETE CURB PEDESTRIAN". CONCRETE SIDEWALK IN THE CURB RAMP AREA SHALL BE MEASURED AND PAID BY THE SQUARE FOOT AS CONCRETE SIDEWALK, INCLUDING THE AREA UNDER THE DETECTABLE WARNING FIELD.

SELECT CURB RAMP DETECTABLE WARNING FIELD MATERIALS AND DEVICES FROM THE DEPARTMENT'S APPROVED MATERIALS LIST. THE COLOR OF THE DETECTABLE WARNING FIELD IS SPECIFIED ELSEWHERE AND IS INCIDENTAL TO THE BID ITEM OF "CURB RAMP DETECTABLE WARNING FIELD".

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

SURFACE TEXTURE OF THE RAMP SHALL BE OBTAINED BY COARSE BROOMING TRANSVERSE TO THE SLOPE OF THE RAMP.

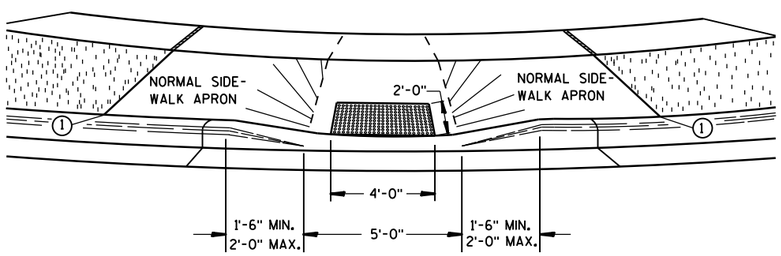
① THIS POINT IS AN EXTENSION OF OUTSIDE EDGE OF APPROACHING SIDEWALK WHERE IT MEETS THE BACK OF CONCRETE CURB.

② GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. PROVIDE DRAINAGE AWAY FROM CURB RAMP AT GUTTER FLAG INTERFACE.

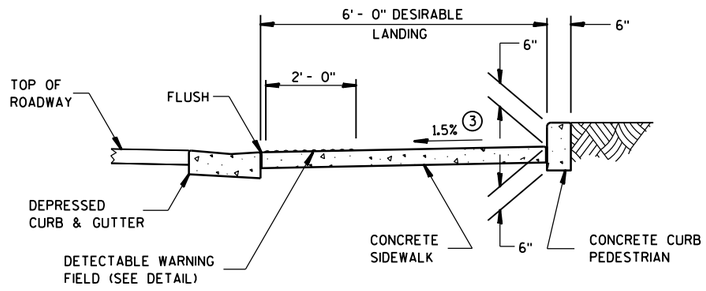
③ ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

LEGEND

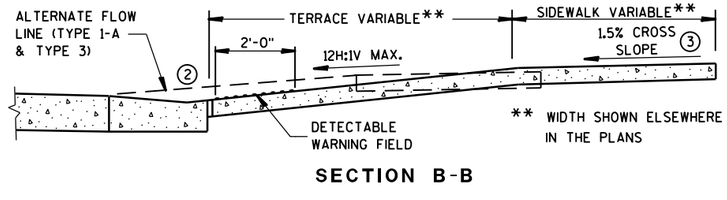
- ½" EXPANSION JOINT-SIDEWALK
- CONTRACTION JOINT FIELD LOCATED
- PAVEMENT MARKING CROSSWALK (WHITE)
- ALTERNATIVE LAYOUT



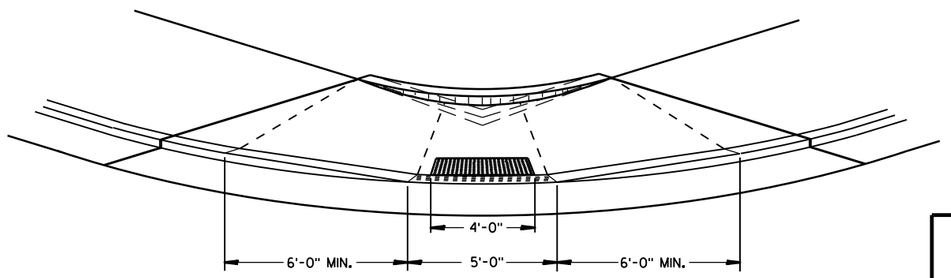
VIEW A-A



SECTION C-C



SECTION B-B



VIEW D-D

CURB RAMPS TYPES 1 AND 1-A

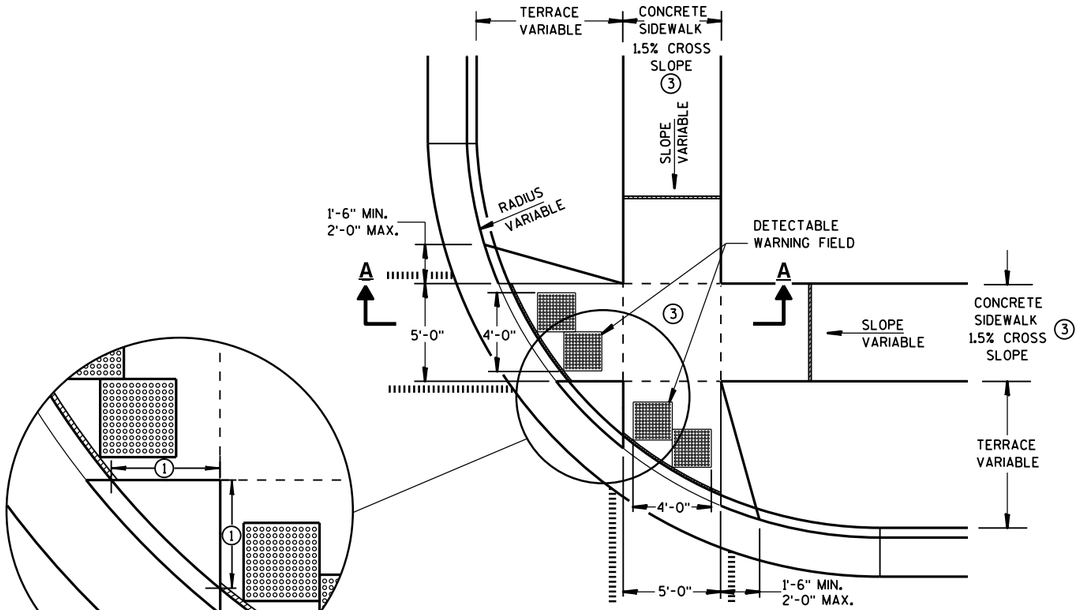
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

S.D.D. 8 D 5-15a

6

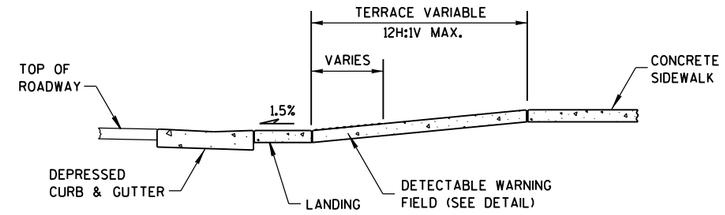
S.D.D. 8 D 5-15a



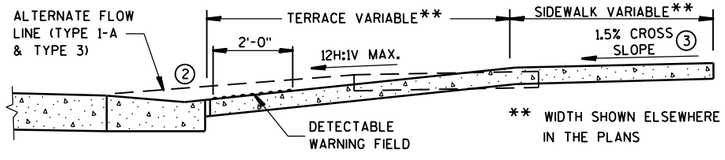
PLAN VIEW

TYPE 2 RAMP

(ON LINE WITH SIDEWALK)



SECTION A-A



SECTION B-B

GENERAL NOTES

USE THE TYPE 3 RAMP ONLY WHEN A TYPE 1 OR TYPE 2 CANNOT BE ACHIEVED BECAUSE OF FIELD CONDITIONS.

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

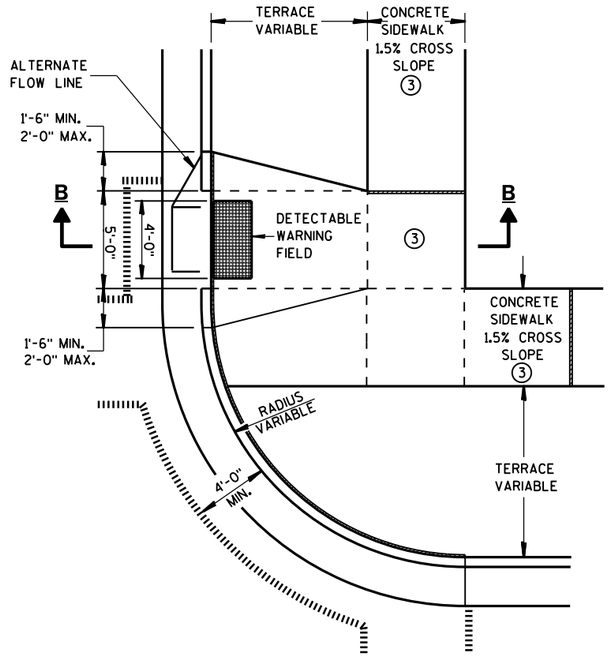
① WHEN THIS DISTANCE IS LESS THAN 6'-0" IT MAY BE DIFFICULT TO ACHIEVE A 12H:1V SLOPE, OR FLATTER, ON THE RAMP. REDUCE CURB HEIGHT IN TRIANGLE AREA TO ACHIEVE 12H:1V SLOPE, OR FLATTER, ON RAMP. 2" MINIMUM CURB HEIGHT.

② GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. PROVIDE DRAINAGE AWAY FROM CURB RAMP AT GUTTER FLAG INTERFACE.

③ ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

LEGEND

- ½" EXPANSION JOINT-SIDEWALK
- CONTRACTION JOINT FIELD LOCATED
- PAVEMENT MARKING CROSSWALK (WHITE)
- ALTERNATIVE LAYOUT



PLAN VIEW

TYPE 3 RAMP

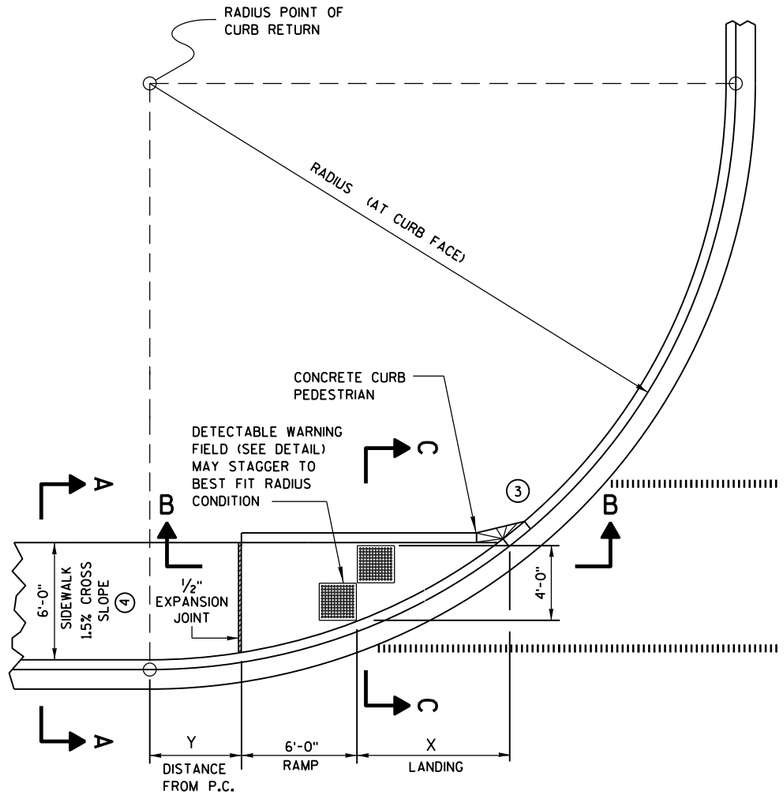
(OUTSIDE OF CROSSWALK AREA)

CURB RAMPS TYPES 2 AND 3

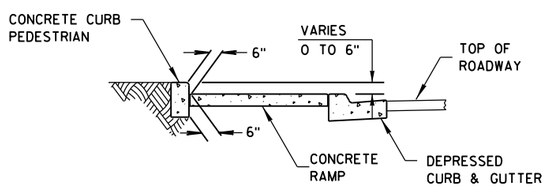
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6

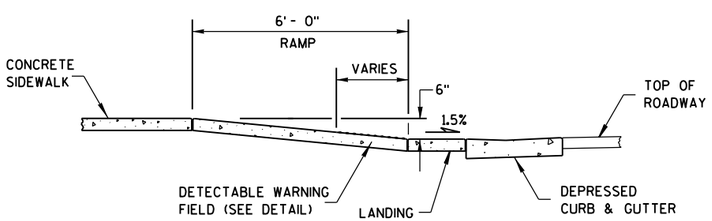
S.D.D. 8 D 5-15b



CURB RAMP TYPE 4A
PLAN VIEW



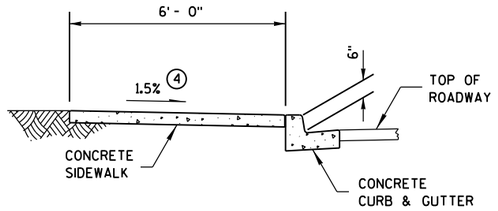
SECTION C-C FOR TYPE 4A



SECTION B-B FOR TYPE 4A

RADIUS (AT CURB FACE)	X	Y
20 FEET	6'-1¾"	2'-7¼"
30 FEET	7'-11¾"	4'-8¼"
40 FEET	9'-5¼"	6'-5"
50 FEET	10'-8¾"	7'-11¼"
60 FEET	11'-10¼"	9'-3½"

INTERMEDIATE RADII CAN BE INTERPOLATED



SECTION A-A FOR TYPE 4A

GENERAL NOTES

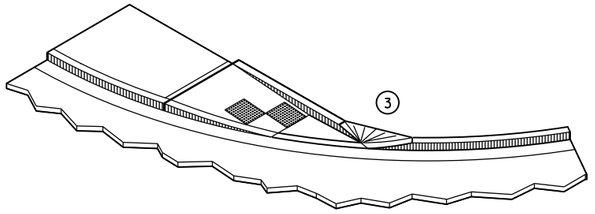
AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

RAMP SLOPES SHALL NOT BE STEEPER THAN 12:1.

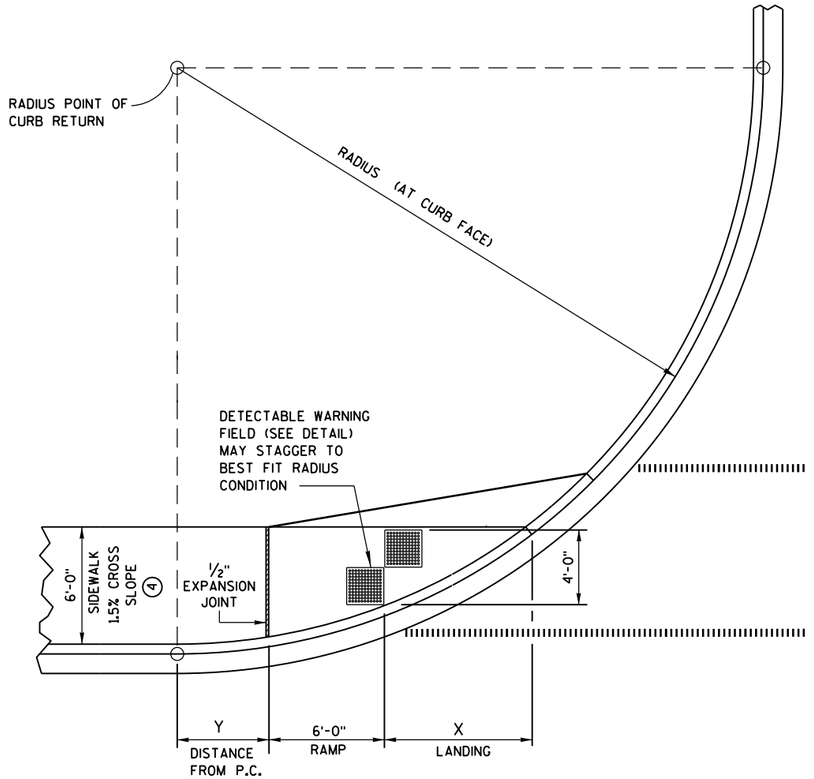
DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

(3) INSTALL TRANSITION NOSE. (INCIDENTAL TO OTHER PAY ITEMS.) DO NOT MARK TRANSITION NOSE.

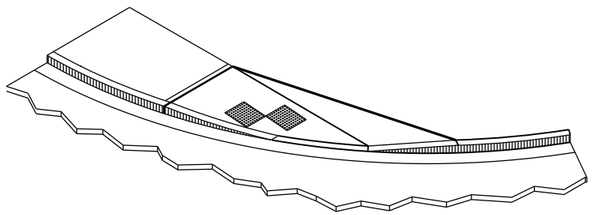
(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.



ISOMETRIC VIEW FOR TYPE 4A



CURB RAMP TYPE 4A1
PLAN VIEW



ISOMETRIC VIEW FOR TYPE 4A1

LEGEND

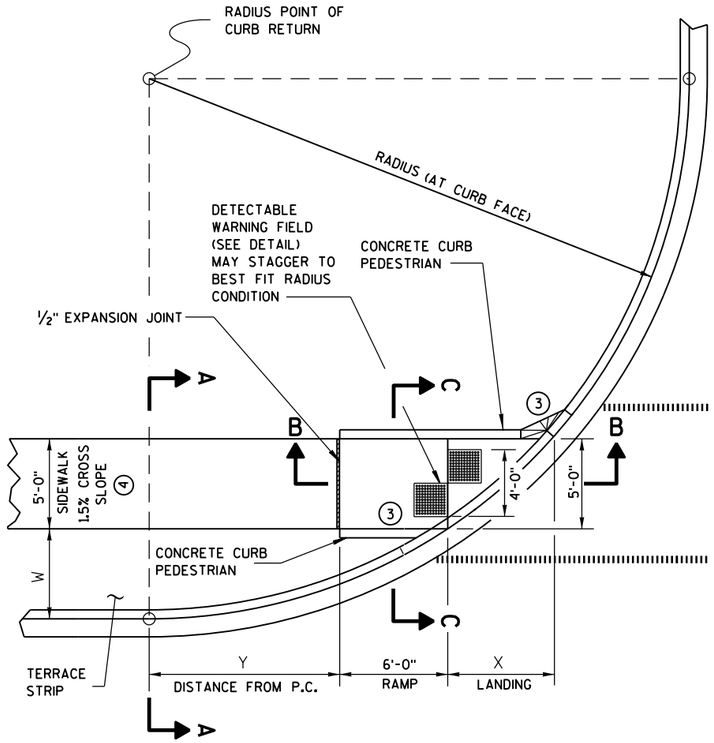
- 1/2" EXPANSION JOINT-SIDEWALK
- CONTRACTION JOINT FIELD LOCATED
- PAVEMENT MARKING CROSSWALK (WHITE)

CURB RAMPS
TYPES 4A AND 4A1

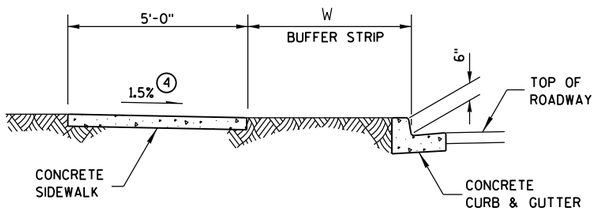
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

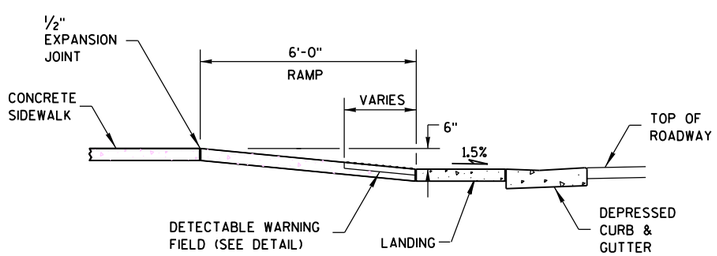
S.D.D. 8 D 5-15c



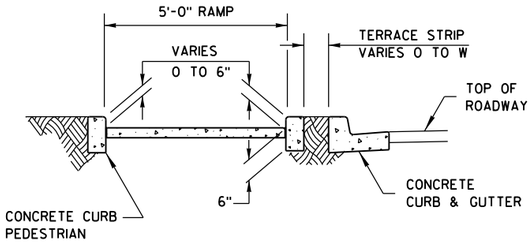
CURB RAMP TYPE 4B
PLAN VIEW



SECTION A-A FOR TYPE 4B



SECTION B-B FOR TYPE 4B



SECTION C-C FOR TYPE 4B

LEGEND

½" EXPANSION JOINT-SIDEWALK

CONTRACTION JOINT FIELD LOCATED

PAVEMENT MARKING CROSSWALK (WHITE)

RADIUS (AT CURB FACE)	W = 3'-0"		W = 4'-0"		W = 5'-0"		W = 6'-0"		W = 7'-0"	
	X	Y	X	Y	X	Y	X	Y	X	Y
20 FEET	5'-5½"	4'-6½"	4'-8½"	6'-0"	4'-1"	7'-2¾"	3'-7"	8'-3½"	3'-1½"	9'-2½"
30 FEET	7'-3¾"	7'-1"	6'-5½"	8'-11½"	5'-9¼"	10'-7"	5'-2½"	12'-0"	4'-8¾"	13'-3¼"
40 FEET	8'-9½"	9'-2½"	7'-10"	11'-5¼"	7'-1"	13'-4½"	6'-5¾"	15'-¾"	5'-11½"	16'-7¼"
50 FEET	10'-¾"	11'-¾"	9'-¼"	13'-7¼"	8'-2½"	15'-9½"	7'-6½"	17'-9"	6'-11¾"	19'-6¼"
60 FEET	11'-2½"	12'-8¾"	10'-¾"	15'-6½"	9'-2¼"	17'-11¾"	8'-5¾"	20'-1¾"	7'-10½"	22'-1½"

INTERMEDIATE RADII CAN BE INTERPOLATED

GENERAL NOTES

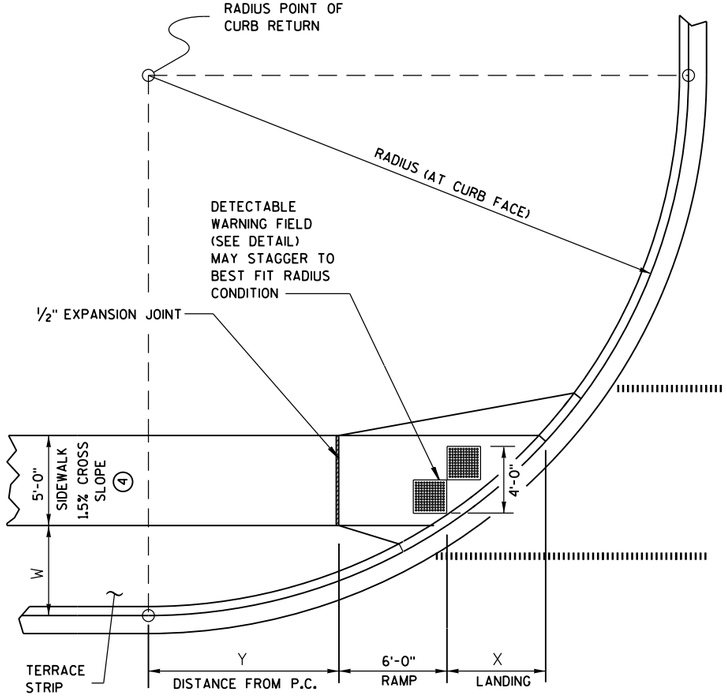
AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

RAMP SLOPES SHALL NOT BE STEEPER THAN 12:1.

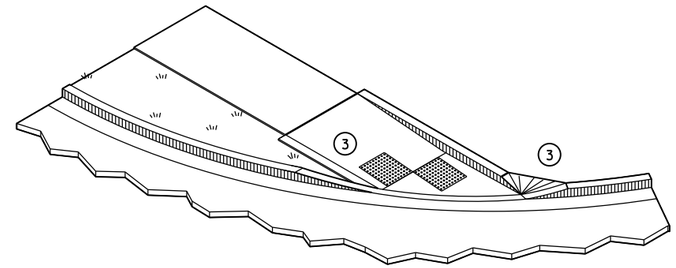
DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

(3) INSTALL TRANSITION NOSE. (INCIDENTAL TO OTHER PAY ITEMS.) DO NOT MARK TRANSITION NOSE.

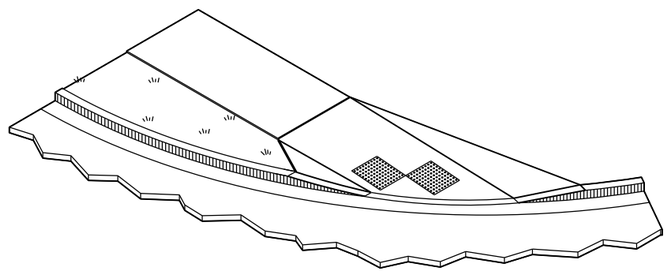
(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.



CURB RAMP TYPE 4B1
PLAN VIEW



ISOMETRIC VIEW FOR TYPE 4B



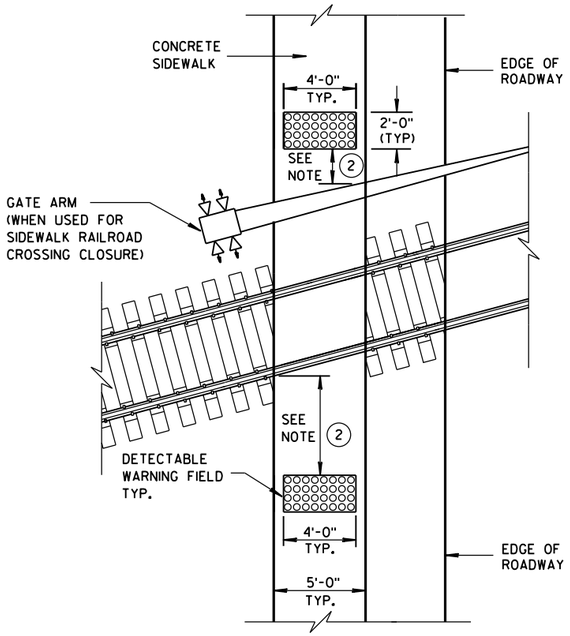
ISOMETRIC VIEW FOR TYPE 4B1

CURB RAMPS TYPE 4B AND 4B1

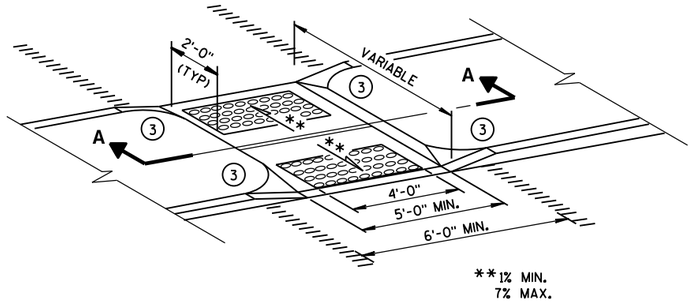
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

S.D.D. 8 D 5-15d



TYPE 8
DETECTABLE WARNINGS AT RAILROAD CROSSING



MEDIAN ISLAND
NON-ELEVATED CROSSING
TYPE 5

GENERAL NOTES

SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2%.

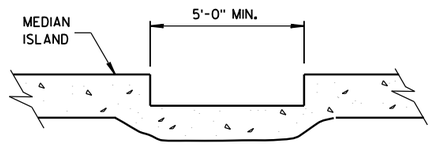
DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

(1) SLOPE SIDEWALK TOWARD LANDING AS SHOWN WHERE THERE IS NO TERRACE OR WHERE THE TERRACE WIDTH IS LESS THAN 6 FEET WIDE.

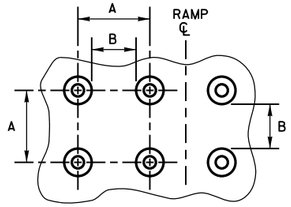
(2) THE EDGE OF THE DETECTABLE WARNING FIELD NEAREST TO A RAILROAD CROSSING SHALL BE 1.5 FEET ± 0.1' FROM THE FACE OF THE GATE ARM IF THE GATE ARM EXTENDS ACROSS THE SIDEWALK. WHERE THERE IS NO PEDESTRIAN GATE, THE EDGE OF THE DETECTABLE WARNING FIELD NEAREST TO THE RAILROAD CROSSING SHALL BE 15 FEET FROM THE NEAREST RAIL.

(3) INSTALL TRANSITION NOSE. (INCIDENTAL TO OTHER PAY ITEMS.) DO NOT MARK TRANSITION NOSE.

(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.



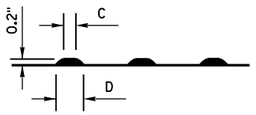
SECTION A-A



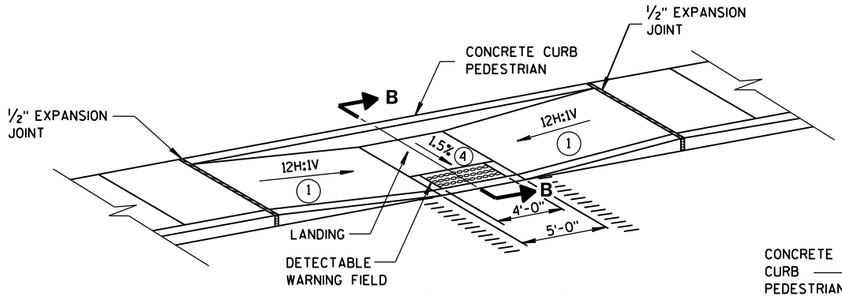
PLAN VIEW

	MIN.	MAX.
A	1.6"	2.4"
B	0.65"	1.5"
C	*	*
D	0.9"	1.4"

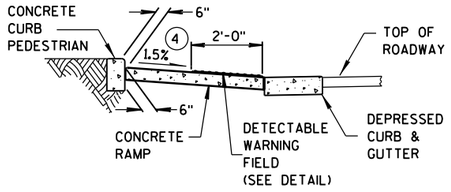
* THE C DIMENSION IS 50% TO 65% OF THE D DIMENSION.



ELEVATION VIEW

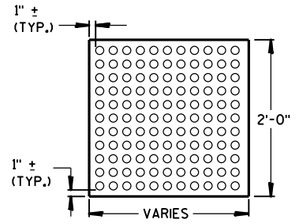


MID-BLOCK CROSSING
TYPE 7A



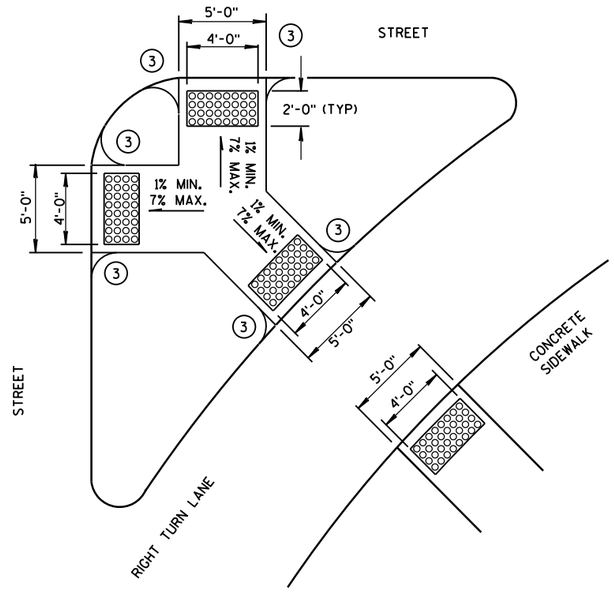
SECTION B-B

TRUNCATED DOMES
DETECTABLE WARNING PATTERN DETAIL

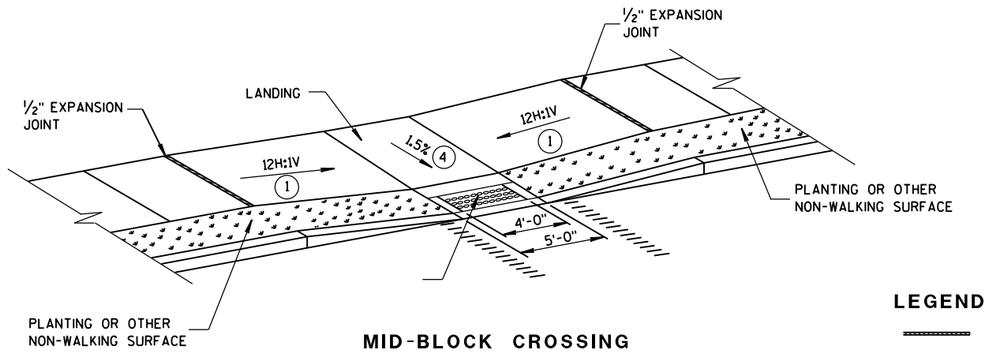


PLAN VIEW

DETECTABLE WARNING FIELD (TYPICAL)



TYPE 6
DETECTABLE WARNING AT ISLANDS



MID-BLOCK CROSSING
TYPE 7B

NOTE: THESE PARALLEL AND PARALLEL/PERPENDICULAR CURB RAMPS MAY BE USED AT INTERSECTIONS AND MID BLOCK LOCATIONS.

LEGEND

- ½" EXPANSION JOINT-SIDEWALK
- CONTRACTION JOINT FIELD LOCATED
- PAVEMENT MARKING CROSSWALK (WHITE)

CURB RAMPS
TYPES 5, 6, 7A, 7B & 8

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

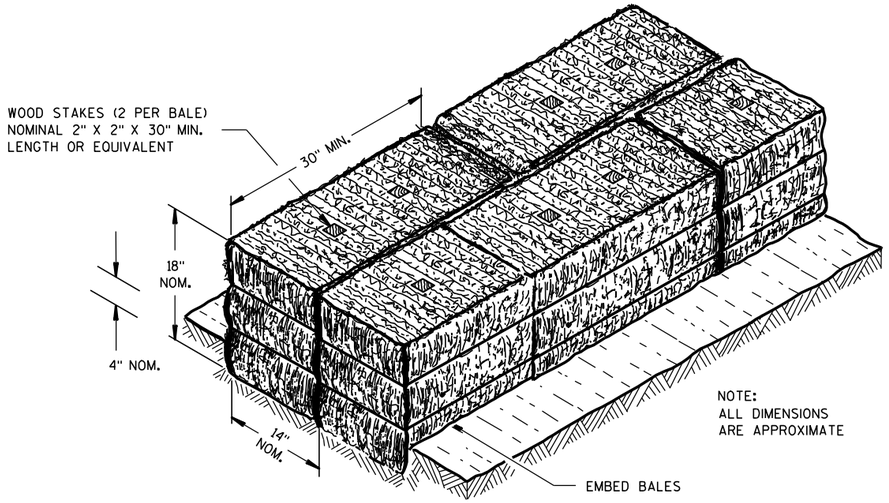
APPROVED
2-6-2013 DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS [illegible] ENGINEER
FHWA

6

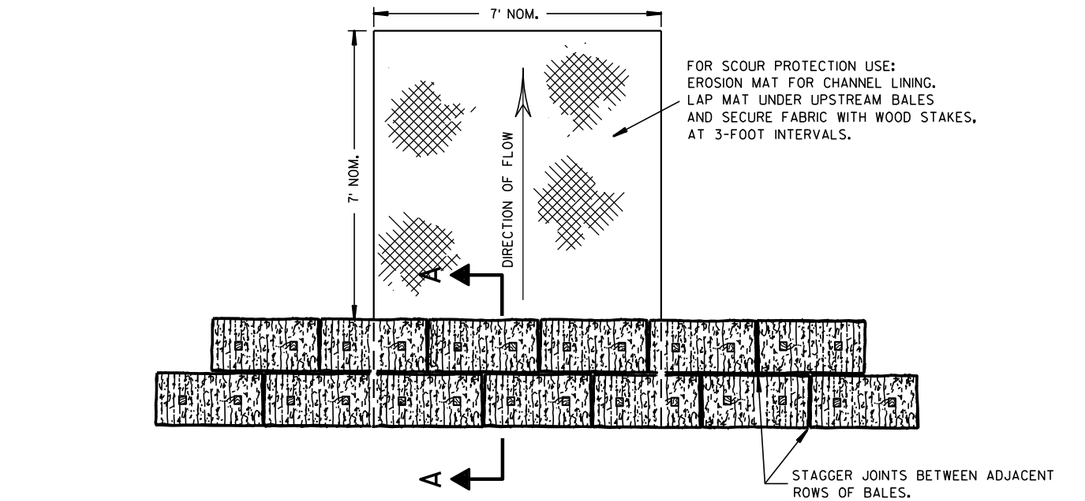
S.D.D. 8 D 5-15e

6

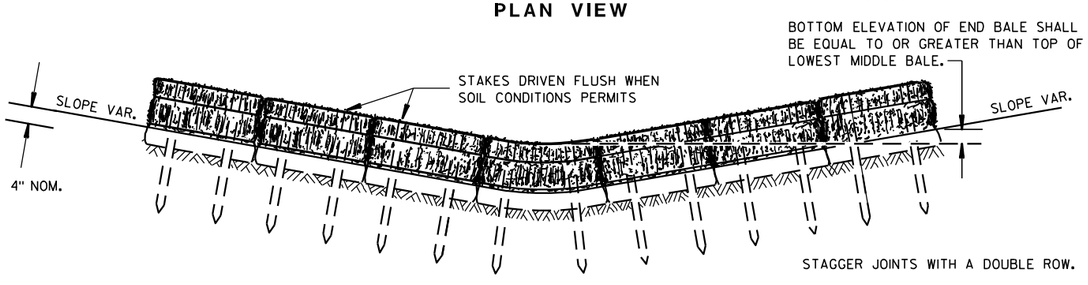
S.D.D. 8 D 5-15e



SECTION A-A



PLAN VIEW



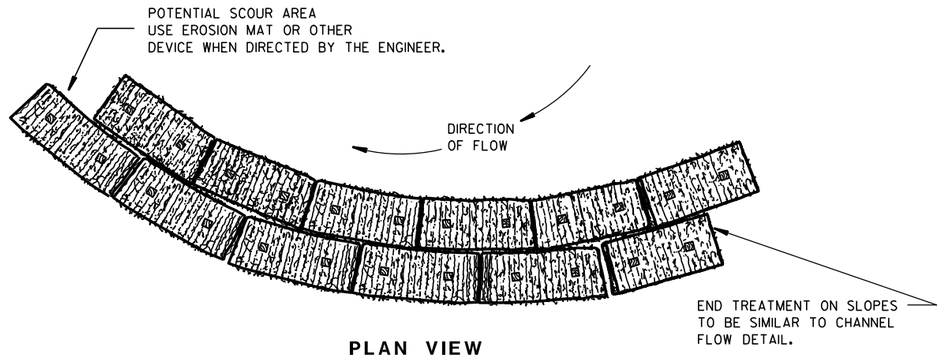
FRONT ELEVATION

TEMPORARY DITCH CHECK USING EROSION BALES (1)

GENERAL NOTES

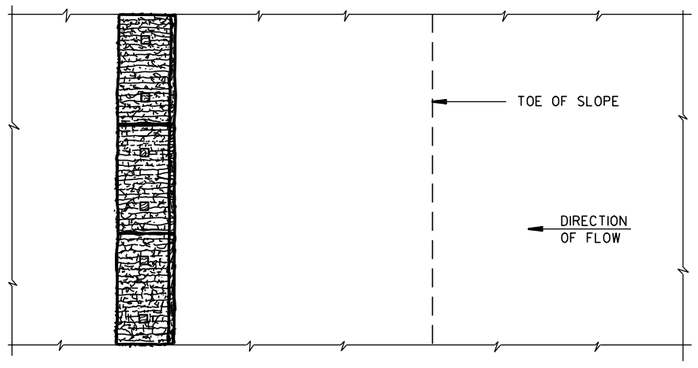
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

(1) TEMPORARY DITCH CHECKS EITHER EROSION BALES OR MANUFACTURED SHALL BE PAID FOR UNDER THE BID ITEM OF TEMPORARY DITCH CHECK. THE DEPARTMENT WILL NOT PAY FOR TEMPORARY DITCH CHECKS CONSTRUCTED OF A SINGLE ROW OF EROSION BALES.

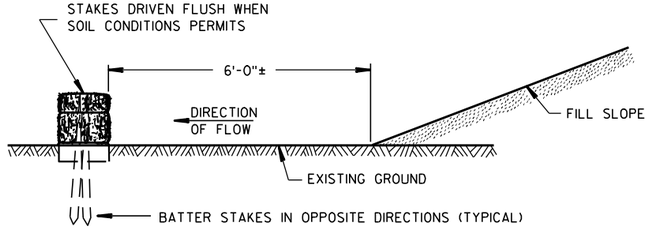


PLAN VIEW

WHEN ALTERING THE DIRECTION OF FLOW



PLAN VIEW



FRONT ELEVATION

WHEN EXISTING GROUND SLOPES AWAY FROM FILL SLOPE

EROSION BALES FOR SHEET FLOW

TYPICAL INSTALLATIONS OF EROSION BALES / TEMPORARY DITCH CHECKS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

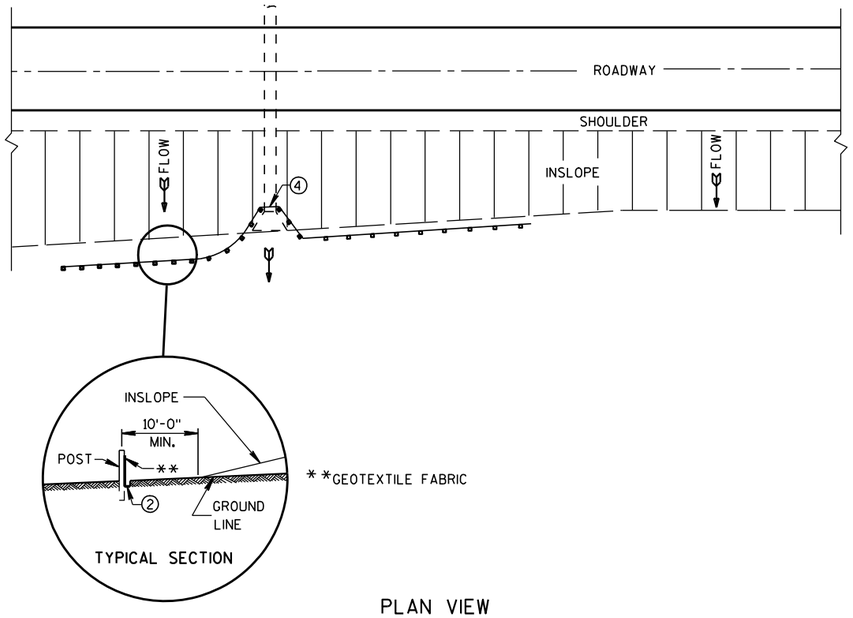
APPROVED
6/04/02 DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

6

S.D.D. 8 E 8-3

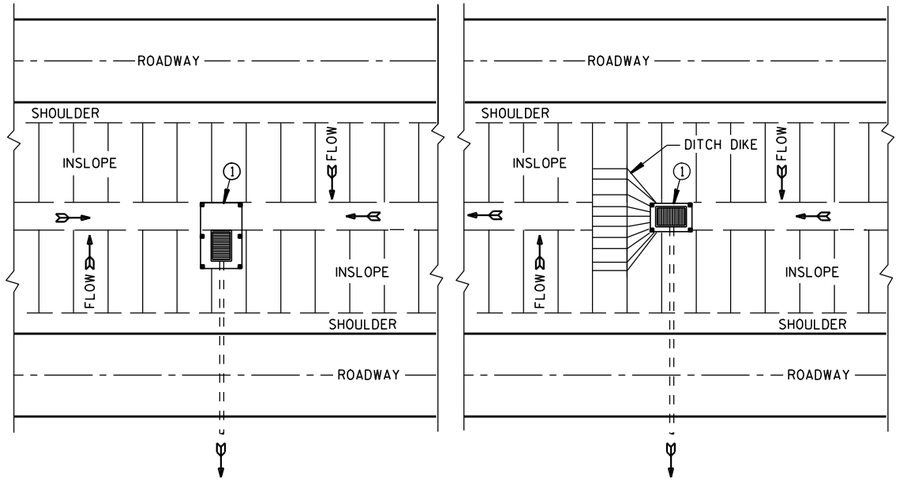
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S.D.D. 8 E 8-3



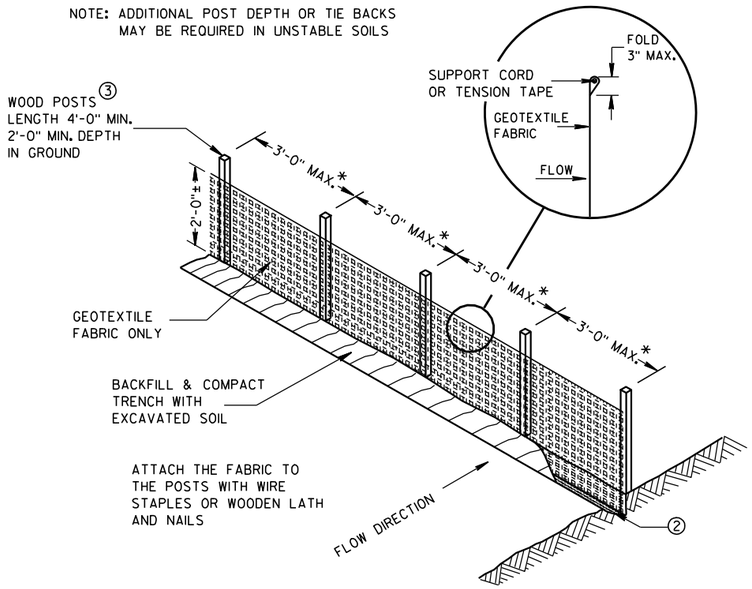
PLAN VIEW

TYPICAL APPLICATION OF SILT FENCE



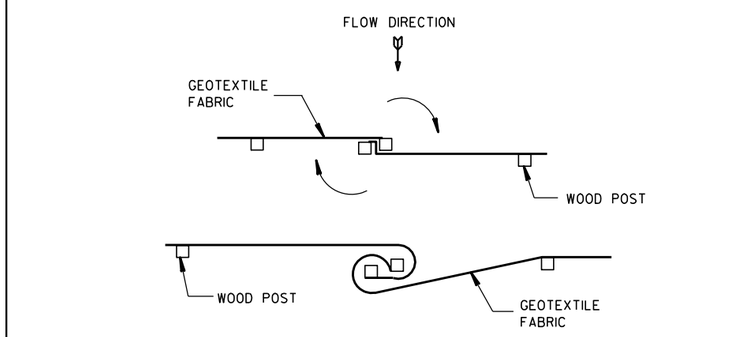
PLAN VIEW

SILT FENCE AT MEDIAN SURFACE DRAINS

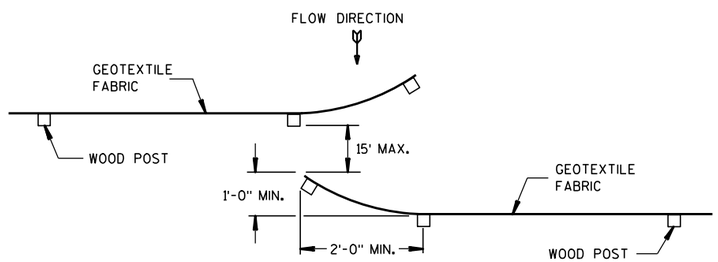


*NOTE: 8'-0" POST SPACING ALLOWED IF A WOVEN GEOTEXTILE FABRIC IS USED.

SILT FENCE



TWIST METHOD



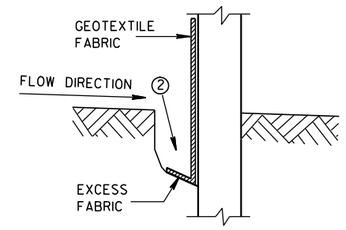
HOOK METHOD

JOINING TWO LENGTHS OF SILT FENCE 5

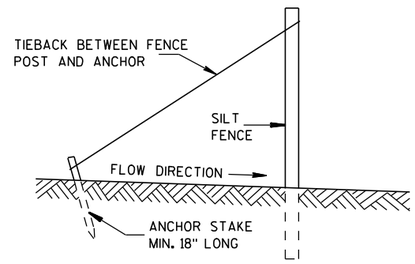
GENERAL NOTES

DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

1. HORIZONTAL BRACE REQUIRED WITH 2" X 4" WOODEN FRAME OR EQUIVALENT AT TOP OF POSTS.
2. FOR MANUAL INSTALLATIONS THE TRENCH SHALL BE A MINIMUM OF 4" WIDE & 6" DEEP TO BURY AND ANCHOR THE GEOTEXTILE FABRIC. FOLD MATERIAL TO FIT TRENCH AND BACKFILL & COMPACT TRENCH WITH EXCAVATED SOIL.
3. WOOD POSTS SHALL BE A MINIMUM SIZE OF 1⅛" X 1⅛" OF OAK OR HICKORY.
4. SILT FENCE TO EXTEND ACROSS THE TOP OF THE PIPE.
5. CONSTRUCT SILT FENCE FROM A CONTINUOUS ROLL IF POSSIBLE BY CUTTING LENGTHS TO AVOID JOINTS. IF A JOINT IS NECESSARY USE ONE OF THE FOLLOWING TWO METHODS; A) OVERLAP THE END POSTS AND TWIST, OR ROTATE, AT LEAST 180 DEGREES, B) HOOK THE END OF EACH SILT FENCE LENGTH.



TRENCH DETAIL



SILT FENCE TIE BACK

(WHEN REQUIRED BY THE ENGINEER)

SILT FENCE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

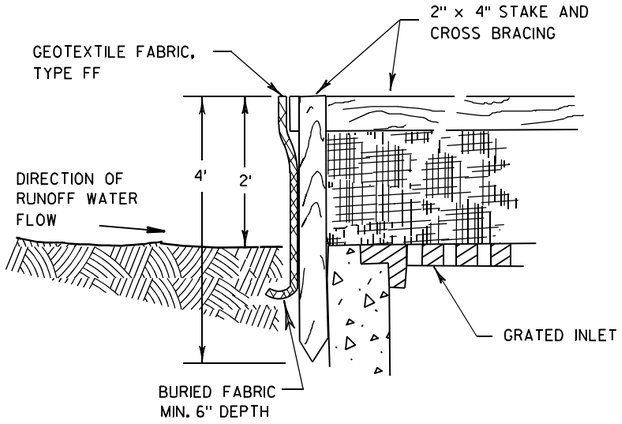
APPROVED
4-29-05 DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

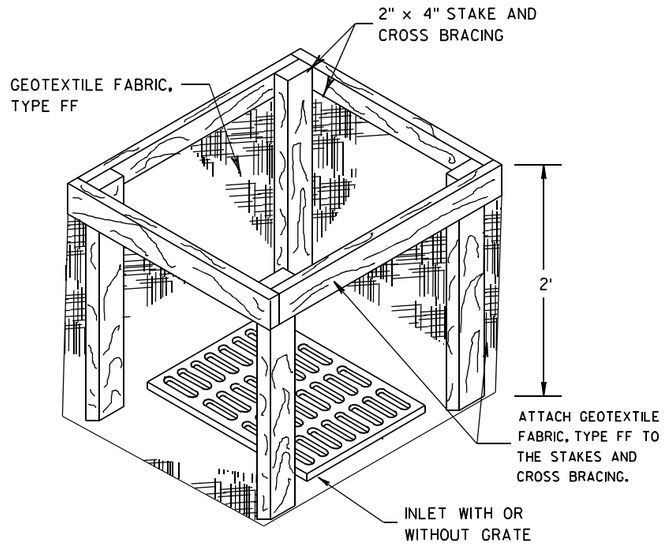
6

S.D.D. 8 E 9-6

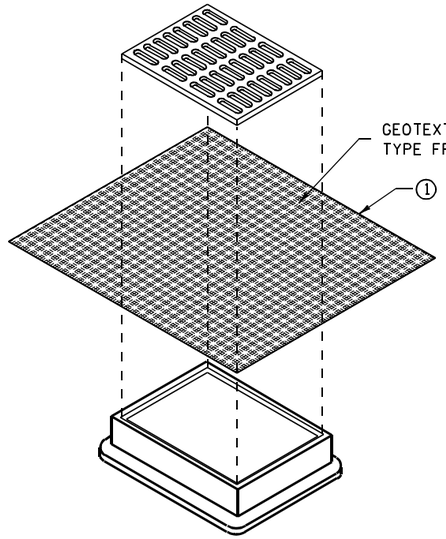
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S.D.D. 8 E 9-6



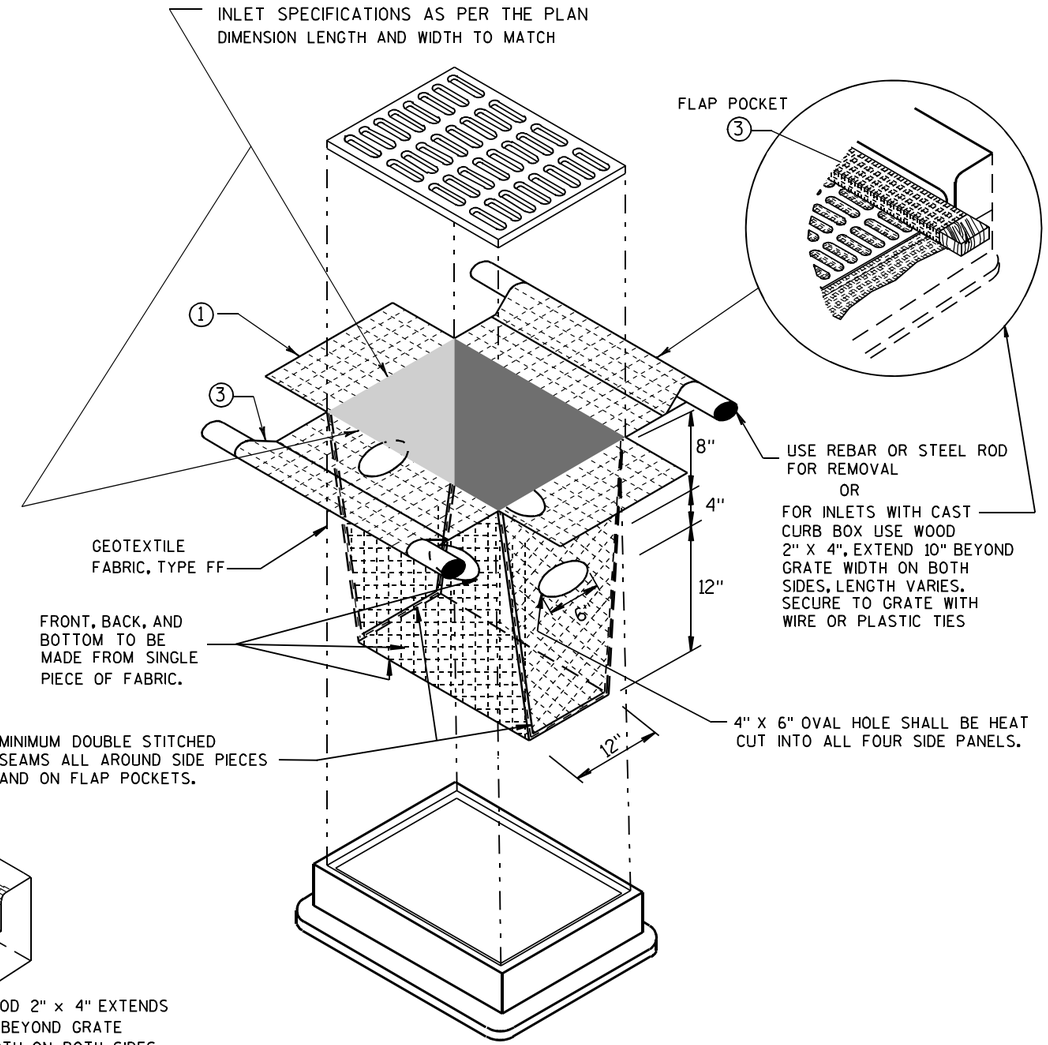


INLET PROTECTION, TYPE A



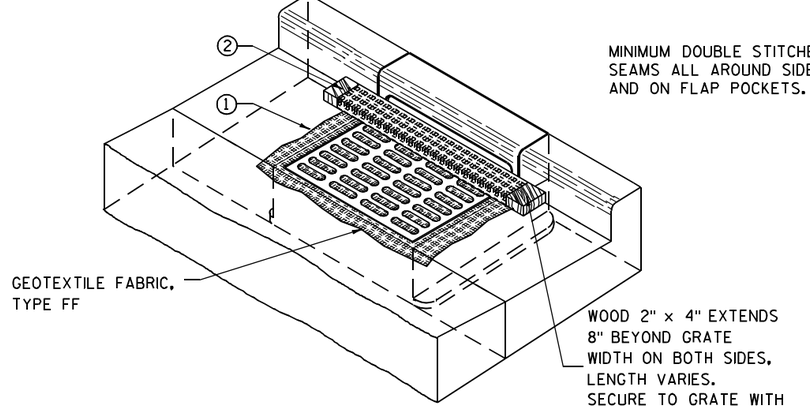
INLET PROTECTION, TYPE B
(WITHOUT CURB BOX)

(CAN BE INSTALLED IN ANY INLET WITHOUT A CURB BOX)



INLET PROTECTION, TYPE D

(CAN BE INSTALLED IN ANY INLET TYPE WITH
OR WITHOUT A CURB BOX AS PER NOTE ②)



INLET PROTECTION, TYPE C (WITH CURB BOX)

GENERAL NOTES

INLET PROTECTION DEVICES SHALL BE MAINTAINED OR REPLACED AT THE DIRECTION OF THE ENGINEER.

MANUFACTURED ALTERNATIVES APPROVED AND LISTED ON THE DEPARTMENT'S EROSION CONTROL PRODUCT ACCEPTABILITY LIST MAY BE SUBSTITUTED.

WHEN REMOVING OR MAINTAINING INLET PROTECTION, CARE SHALL BE TAKEN SO THAT THE SEDIMENT TRAPPED ON THE GEOTEXTILE FABRIC DOES NOT FALL INTO THE INLET. ANY MATERIAL FALLING INTO THE INLET SHALL BE REMOVED IMMEDIATELY.

① FINISHED SIZE, INCLUDING FLAP POCKETS WHERE REQUIRED, SHALL EXTEND A MINIMUM OF 10" AROUND THE PERIMETER TO FACILITATE MAINTENANCE OR REMOVAL.

② FOR INLET PROTECTION, TYPE C (WITH CURB BOX), AN ADDITIONAL 18" OF FABRIC IS WRAPPED AROUND THE WOOD AND SECURED WITH STAPLES. THE WOOD SHALL NOT BLOCK THE ENTIRE HEIGHT OF THE CURB BOX OPENING.

③ FLAP POCKETS SHALL BE LARGE ENOUGH TO ACCEPT WOOD 2X4.

INSTALLATION NOTES

TYPE B & C

TRIM EXCESS FABRIC IN THE FLOW LINE TO WITHIN 3" OF THE GRATE.

THE CONTRACTOR SHALL DEMONSTRATE A METHOD OF MAINTENANCE, USING A SEWN FLAP, HAND HOLDS OR OTHER METHOD TO PREVENT ACCUMULATED SEDIMENT FROM ENTERING THE INLET.

TYPE D

DO NOT INSTALL INLET PROTECTION TYPE D IN INLETS SHALLOWER THAN 30", MEASURED FROM THE BOTTOM OF THE INLET TO THE TOP OF THE GRATE.

TRIM EXCESS FABRIC IN THE FLOW LINE TO WITHIN 3" OF THE GRATE.

THE INSTALLED BAG SHALL HAVE A MINIMUM SIDE CLEARANCE, BETWEEN THE INLET WALLS AND THE BAG, MEASURED AT THE BOTTOM OF THE OVERFLOW HOLES, OF 3". WHERE NECESSARY THE CONTRACTOR SHALL CINCH THE BAG, USING PLASTIC ZIP TIES, TO ACHIEVE THE 3" CLEARANCE. THE TIES SHALL BE PLACED AT A MAXIMUM OF 4" FROM THE BOTTOM OF THE BAG.

INLET PROTECTION
TYPE A, B, C, AND D

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
10/16/02
DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

6
S.D.D. 8 E 10-2

METAL APRON ENDWALLS

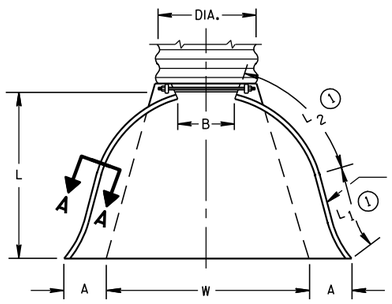
PIPE DIA. (IN.)	MIN. THICK. (Inches) STEEL	MIN. THICK. (Inches) ALUM.	DIMENSIONS (Inches) A (±1")	B (MAX.)	H (±1")	L (±1 1/2")	L1 ①	L2 ①	W (±2")	APPROX. SLOPE	BODY
12	.064	.060	6	6	6	21	12	17 1/2	24	2 1/2 to 1	1 Pc.
15	.064	.060	7	8	6	26	14	21 3/4	30	2 1/2 to 1	1 Pc.
18	.064	.060	8	10	6	31	15	28 1/4	36	2 1/2 to 1	1 Pc.
21	.064	.060	9	12	6	36	18	29 5/8	42	2 1/2 to 1	1 Pc.
24	.064	.075	10	13	6	41	18	37 1/4	48	2 1/2 to 1	1 Pc.
30	.079	.075	12	16	8	51	18	52 1/4	60	2 1/2 to 1	1 Pc.
36	.079	.105	14	19	9	60	24	59 3/4	72	2 1/2 to 1	2 Pc.
42	.109	.105	16	22	11	69	24	75 5/8	84	2 1/2 to 1	2 Pc.
48	.109	.105	18	27	12	78	24	81	90	2 1/4 to 1	3 Pc.
54	.109	.105	18	30	12	84	30	85 1/2	102	2 1/4 to 1	3 Pc.
60	.109×	.105×	18	33	12	87	—	—	114	2 to 1	3 Pc.
66	.109×	.105×	18	36	12	87	—	—	120	2 to 1	3 Pc.
72	.109×	.105×	18	39	12	87	—	—	126	2 to 1	3 Pc.
78	.109×	.105×	18	42	12	87	—	—	132	1 1/2 to 1	3 Pc.
84	.109×	.105×	18	45	12	87	—	—	138	1 1/2 to 1	3 Pc.
90	.109×	.105×	18	37	12	87	—	—	144	1 1/2 to 1	3 Pc.
96	.109×	.105×	18	35	12	87	—	—	150	1 1/2 to 1	3 Pc.

× EXCEPT CENTER PANEL SEE GENERAL NOTES

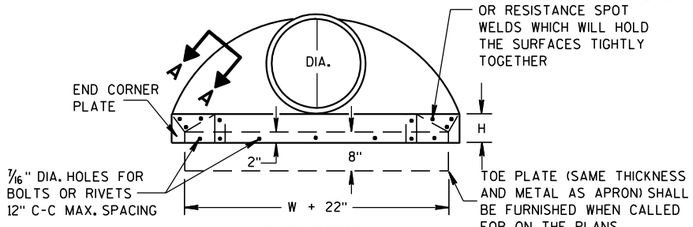
REINFORCED CONCRETE APRON ENDWALLS

PIPE DIA. (IN.)	DIMENSIONS (Inches) T	A	B	C	D	E	G	APPROX. SLOPE
12	2	4	24	48 7/8	72 1/8	24	2	3 to 1
15	2 1/4	6	27	46	73	30	2 1/4	3 to 1
18	2 1/2	9	27	46	73	36	2 1/2	3 to 1
21	2 3/4	9	36	37 1/2	73 1/2	42	2 3/4	3 to 1
24	3	9 1/2	43 1/2	30	73 1/2	48	3	3 to 1
27	3 1/4	10 1/2	49 1/2	24	73 1/2	54	3 1/4	3 to 1
30	3 1/2	12	54	19 3/4	73 1/2	60	3 1/2	3 to 1
36	4	15	63	34 3/4	97 3/4	72	4	3 to 1
42	4 1/2	21	63	35	98	78	4 1/2	3 to 1
48	5	24	72	26	98	84	5	3 to 1
54	5 1/2	27	65	* 33 1/4 - ** 35	* 98 1/4 - ** 100	90	5 1/2	2 2/5 to 1
60	6	* 30 - ** 35	60	39	99	96	5	2 to 1
66	6 1/2	* 24 - ** 30	* 72 - ** 78	* 21 - ** 27	99	102	5 1/2	2 to 1
72	7	* 24 - ** 36	78	21	99	108	6	2 to 1
78	7 1/2	* 24 - ** 36	78	21	99	114	6 1/2	2 to 1
84	8	36	90 1/2	21	111 1/2	120	6 1/2	1 1/2 to 1
90	8 1/2	41	87 1/2	24	111 1/2	132	6 1/2	1 1/2 to 1

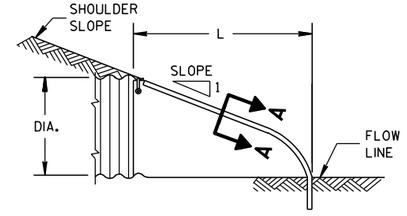
*MINIMUM
**MAXIMUM



PLAN VIEW

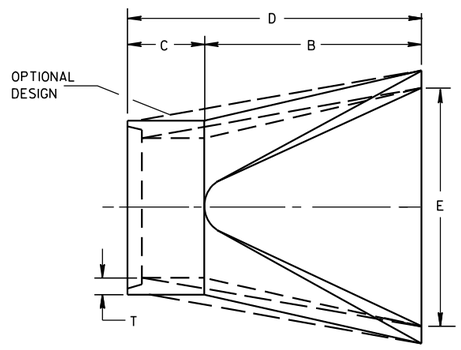


END VIEW

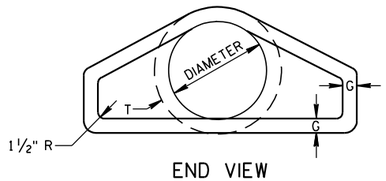


SIDE ELEVATION

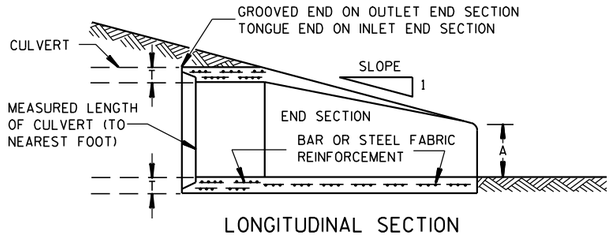
METAL ENDWALLS



PLAN

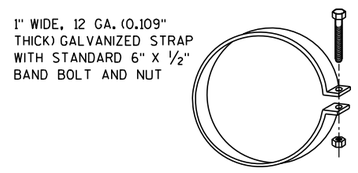


END VIEW



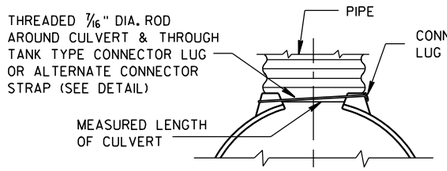
LONGITUDINAL SECTION

CONCRETE ENDWALLS

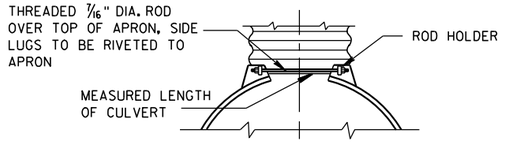


ALTERNATE FOR TYPE 1 CONNECTION

END SECTION CONNECTOR STRAP

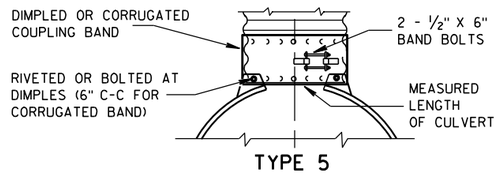


TYPE 1
FOR 12" THRU 24" CORR. PIPE



TYPE 2
FOR 30" THRU 96" CORR. PIPE

TYPE 3
FOR 42" THRU 96" CORR. PIPE



TYPE 5
ALTERNATE FOR:
ALL SIZES CORRUGATED CIRCULAR PIPE

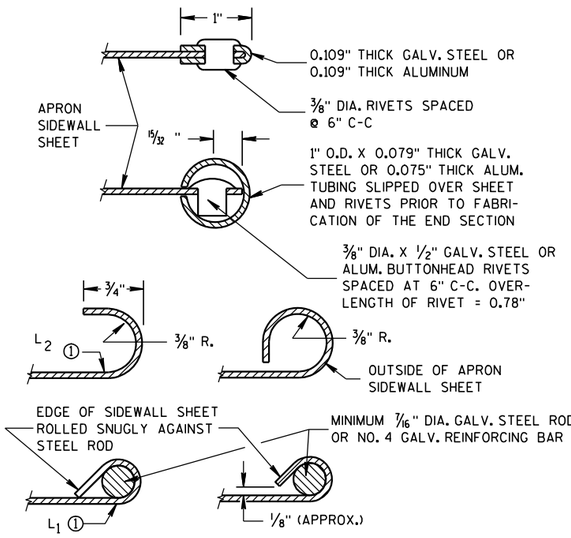
NOTE: DIMPLED BAND FITS OVER OUTSIDE OF ENDWALL. AND CORRUGATED BAND FITS INSIDE ENDWALL. DIMPLED BAND MAY BE USED WITH HELICALLY CORRUGATED PIPE.

FOR CIRCUMFERENTIALLY CORRUGATED PIPE USE ENDWALL CONNECTION DETAILS 1, 2, 3 OR 5 AS APPLICABLE.

FOR HELICALLY CORRUGATED PIPE USE ENDWALL CONNECTION DETAILS 1, 2 OR 5.

FOR HELICALLY CORRUGATED PIPES WITH TWO CIRCUMFERENTIAL CORRUGATIONS AT EACH END USE ENDWALL CONNECTION DETAILS 1, 2 OR 3.

CONNECTION DETAILS



SECTION A-A

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

CONCRETE CULVERT ENDWALLS MAY NOT BE USED WITH GALVANIZED STEEL OR ALUMINUM CULVERT PIPE OR VISE VERSA. GALVANIZED STEEL OR ALUMINUM ENDWALLS SHALL NORMALLY BE INSTALLED ON CULVERT PIPE OF THE SAME METAL.

ALL THREE PIECE STEEL APRON ENDWALLS FOR 60" DIAMETER PIPE AND LARGER SHALL HAVE 0.109" SIDES AND 0.138" CENTER PANELS. ALL THREE PIECE ALUMINUM APRON ENDWALLS FOR 60" DIAMETER PIPE AND LARGER SHALL HAVE 0.105" SIDES AND 0.134" CENTER PANELS. THE WIDTH OF CENTER PANELS SHALL BE GREATER THAN 20 PERCENT OF THE PIPE PERIMETER.

LAP SEAMS SHALL BE TIGHTLY JOINED BY GALVANIZED RIVETS OR BOLTS FOR STEEL UNITS AND ALUMINUM RIVETS AND BOLTS FOR ALUMINUM UNITS. FOR THE 60" THROUGH 96" DIAMETER APRON ENDWALL SIZES, THE REINFORCED EDGES AND CENTER PANEL SEAMS SHALL BE FURTHER REINFORCED WITH GALVANIZED STEEL OR ALUMINUM STIFFENER ANGLES. THE ANGLES SHALL BE ATTACHED BY GALVANIZED NUTS AND BOLTS FOR STEEL UNITS AND ALUMINUM NUTS AND BOLTS FOR ALUMINUM UNITS.

WHERE TWO OR MORE PIPES WITH APRON ENDWALLS ARE LAID ADJACENT TO EACH OTHER, THEY SHALL BE SEPARATED BY A DISTANCE SUFFICIENT TO PROVIDE A MINIMUM CLEARANCE OF 6 INCHES BETWEEN APRON ENDWALLS.

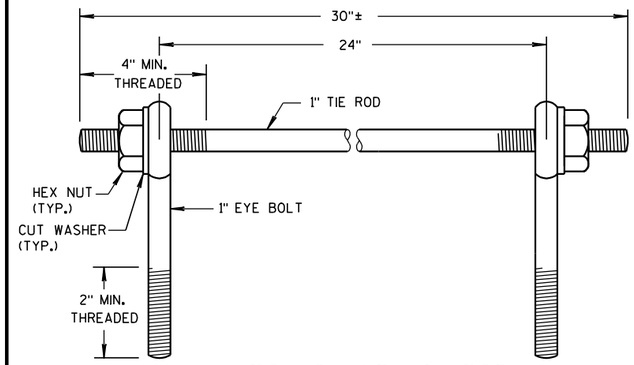
① FOR PIPE SIZES UP TO 60" DIAMETER, A 180° ROLLED EDGE MAY BE USED INSTEAD OF STEEL ROD REINFORCEMENT. SEE SECTION A-A.

APRON ENDWALLS FOR CULVERT PIPE

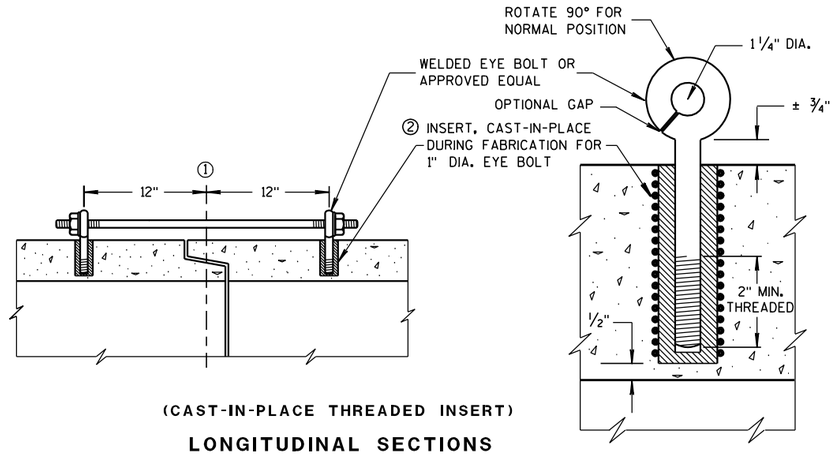
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
11/30/94 DATE
/S/ Rory L. Rhinesmith
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

6
S.D.D. 8 F 1-11



EYE BOLTS AND TIE ROD



(CAST-IN-PLACE THREADED INSERT)

LONGITUDINAL SECTIONS

EYE BOLT AND TIE ROD ASSEMBLY (ALTERNATE NO. 1)

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS, AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

CONCRETE CULVERT AND STORM SEWER PIPE SHALL BE TIED TOGETHER IN THE MANNER ILLUSTRATED BY THIS DETAIL AT LOCATIONS DESIGNATED IN THE STANDARD SPECIFICATIONS AND THE PLAN. THE CONTRACTOR MAY USE EITHER ALTERNATE 1, 2 OR 3 FOR DRAINAGE STRUCTURES. ONLY ALTERNATE 1 AND 3 MAY BE USED FOR CATTLE PASSES, UNLESS OTHERWISE STATED IN THE CONTRACT. THE MATERIALS, FABRICATION AND WORK NECESSARY TO TIE THE PIPE BY THIS DETAIL WILL BE CONSIDERED INCIDENTAL TO THE PIPE AND APRON ENDWALLS IF REQUIRED.

DETAILED DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR JOINT TIES SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL.

JOINT TIES TO BE HOT-DIP GALVANIZED PER ASTM A 153.

① ℄ OF TONGUE AND GROOVE OR BELL AND SPIGOT JOINTS.

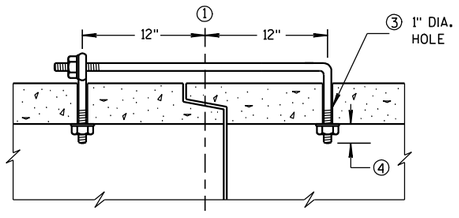
② THE INSIDE OF THE THREADED INSERTS SHALL BE CLEAN TO ALLOW THE INSERTION OF THREADED EYE BOLTS.

③ HOLES SHALL BE CAST-IN-PLACE OR DRILLED 12 INCHES FROM ℄ OF TONGUE AND GROOVE.

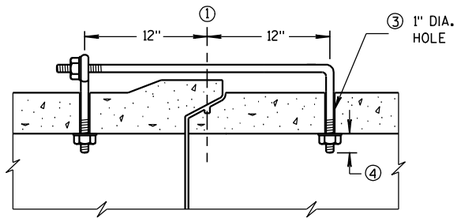
④ BOLT PROJECTION INSIDE OF PIPE SHALL NOT EXCEED 2 INCHES.

⑤ OPENING TO BE ROD DIAMETER PLUS 1 INCH.

⑥ LENGTH ADEQUATE TO EXTEND TO WITHIN 1/2 INCH OF THE INNER SURFACE OF THE PIPE.



(TONGUE & GROOVE PIPE)

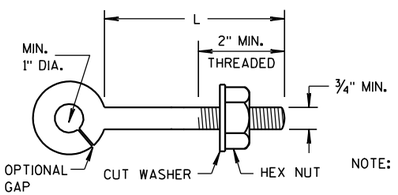


(MODIFIED BELL PIPE)

LONGITUDINAL SECTION

EYE BOLT DIMENSION TABLE

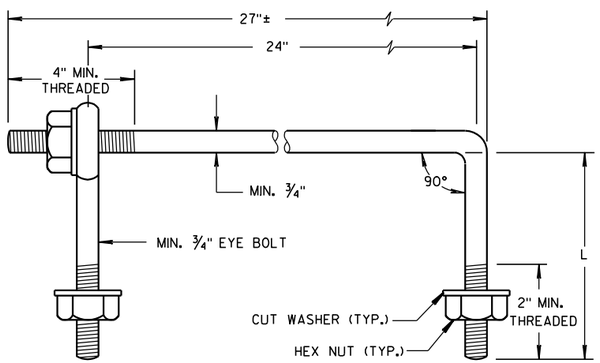
PIPE SIZE	L = LENGTH	
	TONGUE & GROOVE PIPE	MODIFIED BELL PIPE
18" TO 24"	4 1/2"	6 1/4"
30"	5"	7"
36"	5 1/2"	7"
42"	6"	
48"	6 1/2"	
60"	7 1/2"	
66"	8"	



NOTE:

EYE BOLT

NOTE: TWO EYE BOLTS MAY BE USED WITH A 30" LONG THREADED ROD IN LIEU OF THE 90° BENT TIE ROD.



EYE BOLT AND TIE ROD

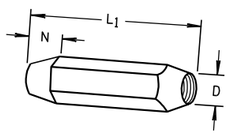
(JOINT TIES FOR 18" TO 66" DIA. CONCRETE PIPE)

EYE BOLT AND TIE ROD ASSEMBLY (ALTERNATE NO. 2)

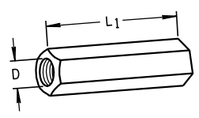
ADJUSTABLE TIE ROD TABLE

PIPE DIAMETER	TIE ROD DIAMETER	D	L_1	N
12-60	5/8	5/8	5	1/2
66-84	3/4	3/4	5	1/2
90-108	1	1	7	1 1/16

DIMENSIONS SHOWN ARE IN INCHES



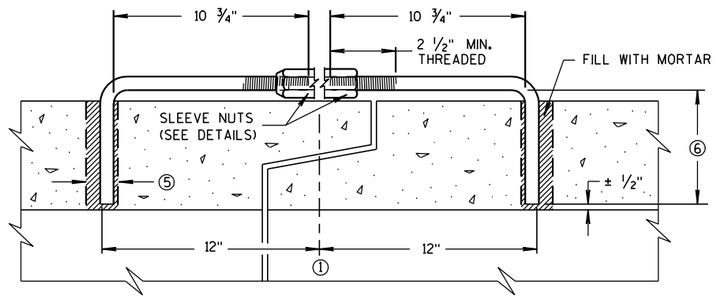
TAPERED



PLAIN

RIGHT AND LEFT THREADS

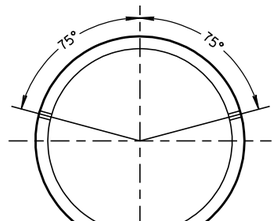
SLEEVE NUTS



LONGITUDINAL SECTION

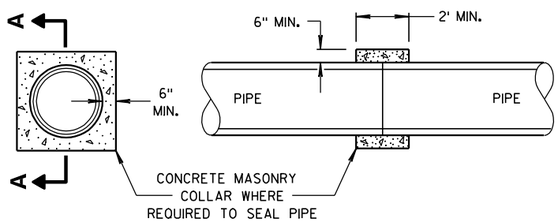
(JOINT TIES FOR 12" TO 108" DIA. CONCRETE PIPE)

ADJUSTABLE TIE ROD (ALTERNATE NO. 3)



PLACEMENT OF (2) CAST-IN-PLACE INSERTS OR HOLES DURING FABRICATION FOR PIPE SECTIONS REQUIRING TIE RODS

TRANSVERSE SECTION



SECTION A-A

CONCRETE COLLAR DETAIL

JOINT TIES FOR CONCRETE PIPE AND CONCRETE COLLAR DETAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

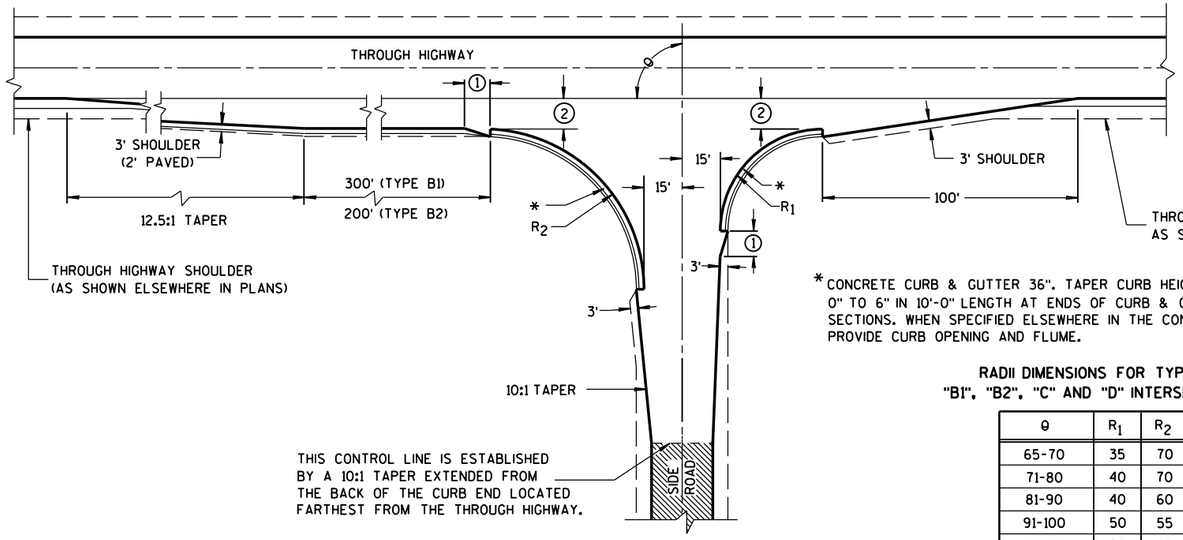
APPROVED
6/5/2012 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS ENGINEER
FHWA

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S.D.D. 8 F 4-7

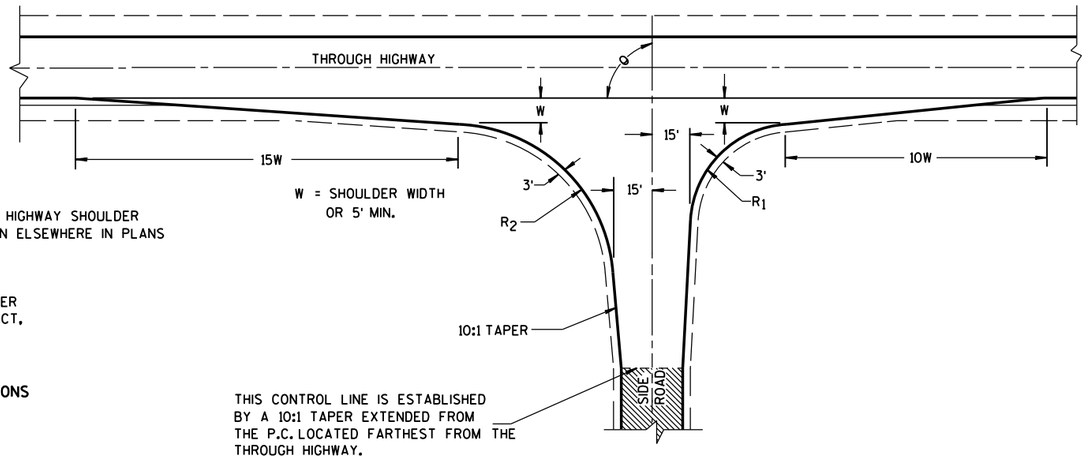


TYPE "B1" AND "B2"

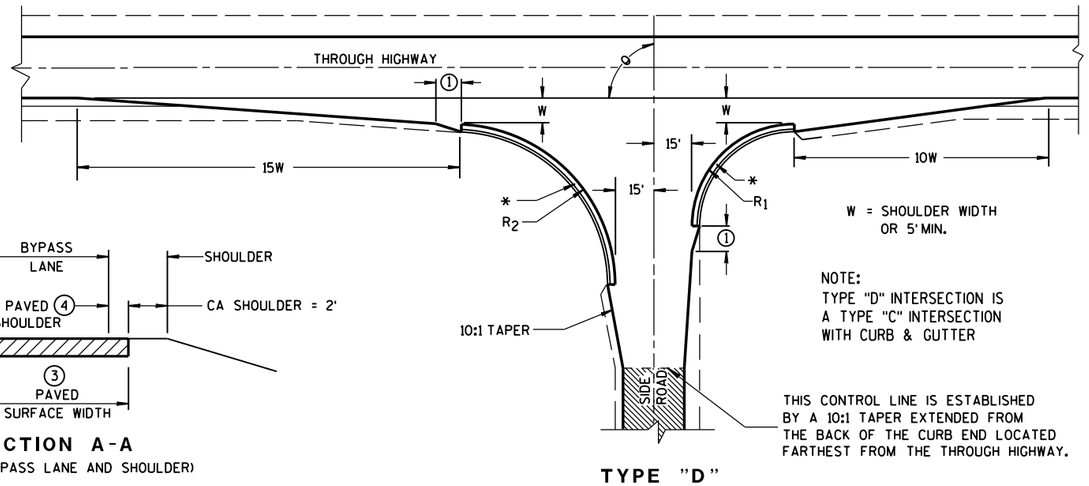
*CONCRETE CURB & GUTTER 36". TAPER CURB HEIGHT 0" TO 6" IN 10'-0" LENGTH AT ENDS OF CURB & GUTTER SECTIONS. WHEN SPECIFIED ELSEWHERE IN THE CONTRACT, PROVIDE CURB OPENING AND FLUME.

RADII DIMENSIONS FOR TYPES "B1", "B2", "C" AND "D" INTERSECTIONS

θ	R_1	R_2
65-70	35	70
71-80	40	70
81-90	40	60
91-100	50	55
101-110	60	45



TYPE "C"



TYPE "D"

GENERAL NOTES

DESIGNS MAY BE USED INTERCHANGEABLY IN COMBINATION OR SEPARATELY FOR ANY ONE COMPLETE INTERSECTION DEPENDING UPON INTERSECTION ANGLE AND SURFACING OF EACH APPROACH ROADWAY.

SIDE ROAD SURFACING NOTE

WHEN THE SIDE ROAD IS NOT PRESENTLY PAVED, PAVEMENT SHALL BE PLACED TO THE LIMITS SHOWN UNLESS OTHERWISE PROVIDED IN THE CONTRACT. WHERE THE CONSTRUCTION LIMITS ARE BEYOND THE PAVING LIMITS, CRUSHED AGGREGATE SURFACING SHALL BE PLACED BETWEEN THE PAVING LIMITS AND CONSTRUCTION LIMITS.

WHEN THE SIDE ROAD IS PRESENTLY PAVED, NEW PAVEMENT SHALL BE PLACED TO THE LIMITS OF DESIGN AS SHOWN AND BEYOND, IF NECESSARY, TO MEET EXISTING PAVEMENT.

WHEN THE SIDE ROAD IS THE CONSTRUCTION PROJECT, THE INTERSECTION SURFACING SHALL BE THE SAME AS FOR THE PROJECT.

EXISTING PAVED SURFACE

BYPASS LANE

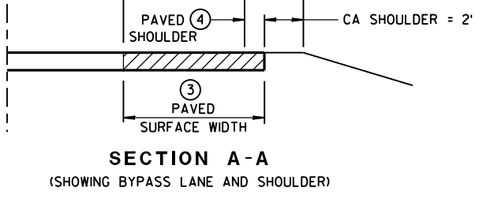
(1) 10-FT TYPICAL.

(2) 12-FT** PLUS ADDITIONAL WIDTH FOR BIKE LANE IF SHOWN ELSEWHERE IN THE PLAN.

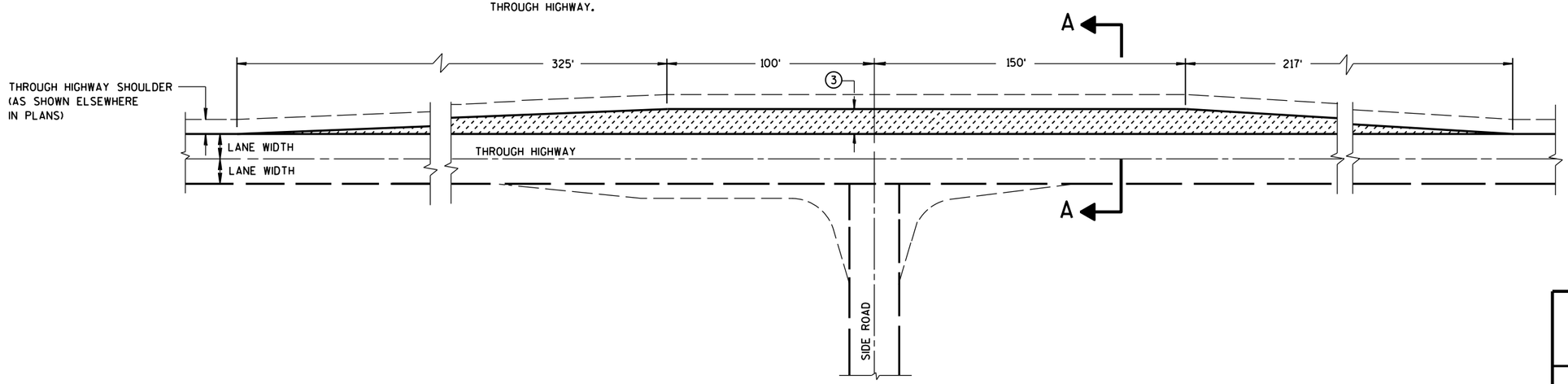
**10-FT MAY BE USED ON TYPE B2 ON RESURFACING PROJECTS IF SPECIFIED IN THE CONTRACT.

(3) BYPASS LANE PAVED SURFACE WIDTH OUTSIDE OF TRAVEL LANE
-ASPHALT = 12-FT PLUS PAVED SHOULDER WIDTH.
-PC CPNCRETE = 13-FT PLUS PAVED SHOULDER WIDTH.

(4) BYPASS LANE PAVED SHOULDER WIDTH = THE GREATER OF 1-FT OR THE PAVED SHOULDER WIDTH OF THE THROUGH HIGHWAY.



SECTION A-A
(SHOWING BYPASS LANE AND SHOULDER)



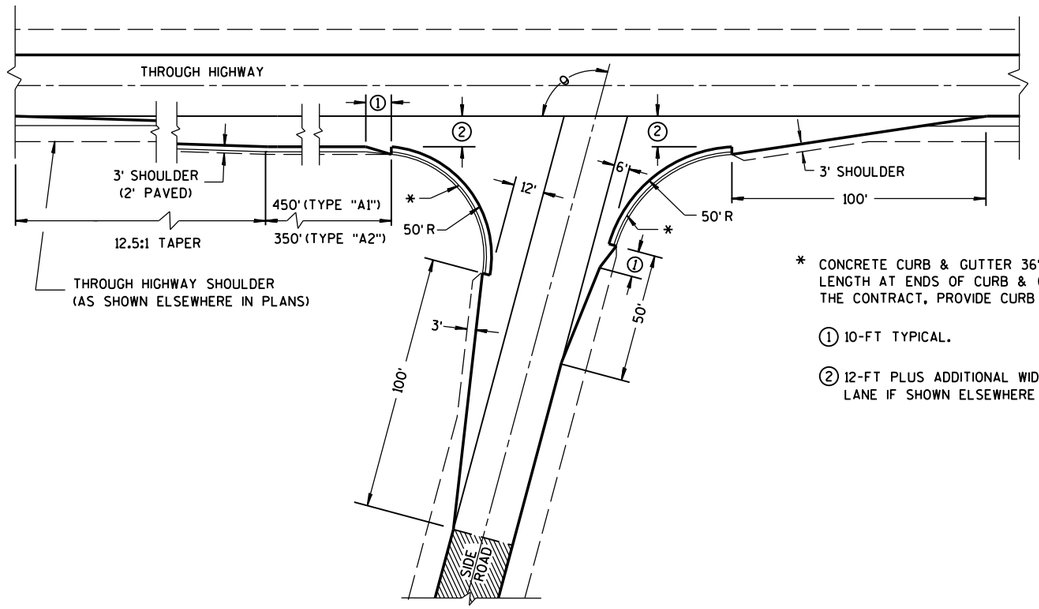
TEE INTERSECTION BYPASS LANE DETAIL

AT-GRADE SIDE ROAD INTERSECTION, TYPES "B1", "B2", "C" AND "D" AND TEE INTERSECTION BYPASS LANE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

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S.D.D. 9 A 1-13a



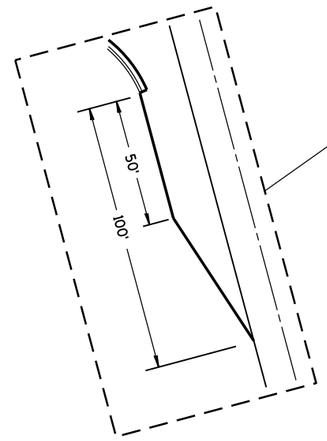
θ = MORE THAN 80°

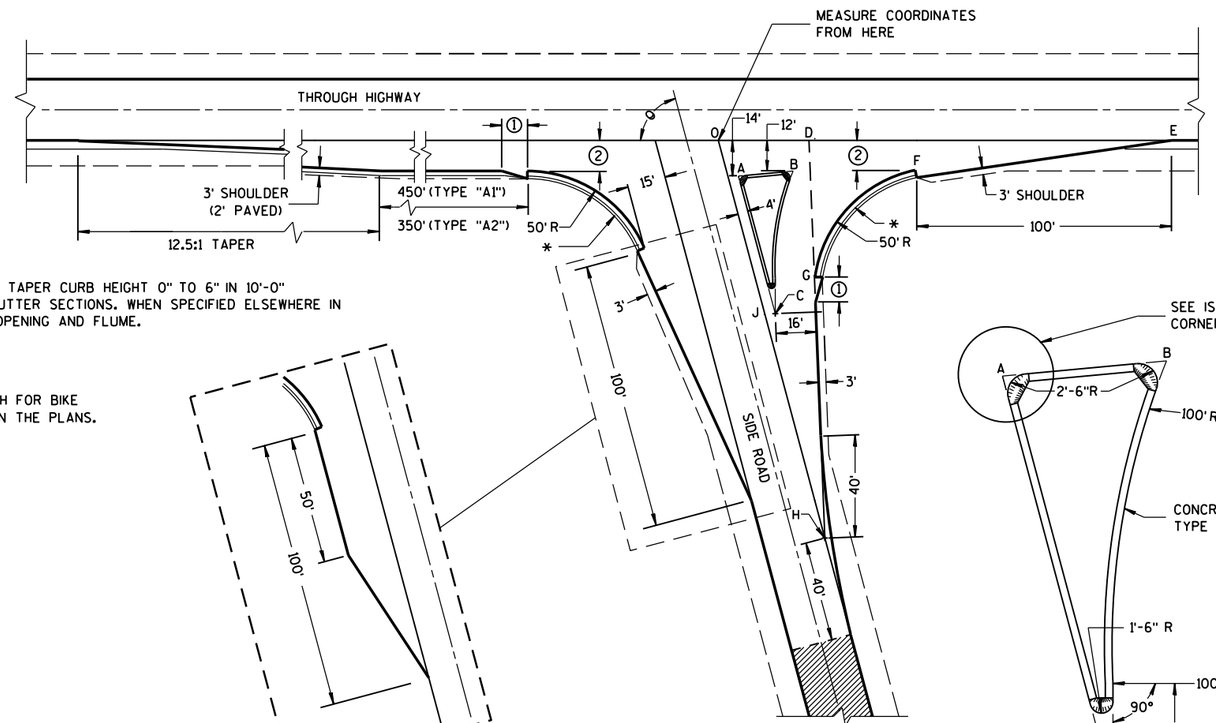
* CONCRETE CURB & GUTTER 36". TAPER CURB HEIGHT 0" TO 6" IN 10'-0" LENGTH AT ENDS OF CURB & GUTTER SECTIONS. WHEN SPECIFIED ELSEWHERE IN THE CONTRACT, PROVIDE CURB OPENING AND FLUME.

① 10-FT TYPICAL.

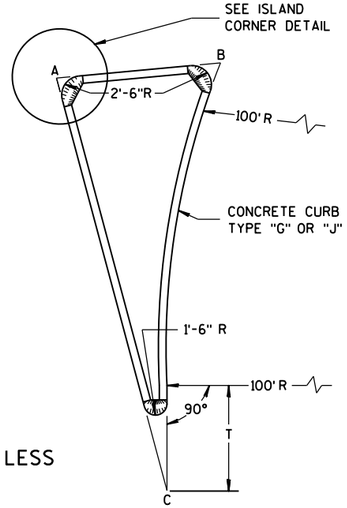
② 12-FT PLUS ADDITIONAL WIDTH FOR BIKE LANE IF SHOWN ELSEWHERE IN THE PLANS.

EXISTING PAVED SURFACE

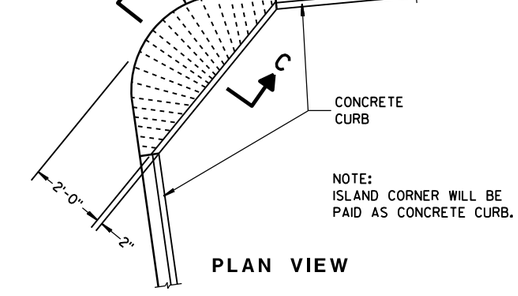




θ = ACUTE ANGLES 80° OR LESS

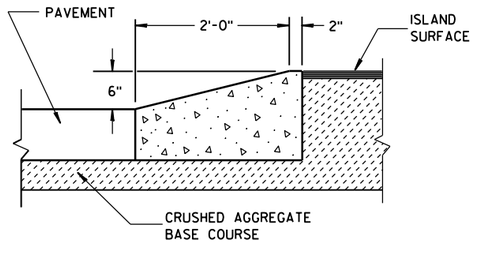


SIDE ROAD WIDENING AND TAPER REQUIRED WHERE THE THROUGH HIGHWAY CARRIES TWO-WAY TRAFFIC
θ = ACUTE ANGLES 70° OR LESS



NOTE:
ISLAND CORNER WILL BE PAID AS CONCRETE CURB.

PLAN VIEW



SECTION C-C

ISLAND CORNER DETAIL

(TO BE CONSTRUCTED AT ALL ISLAND CORNERS)

TABLE OF DIMENSIONS FOR
VARIABLE SIDE ROAD INTERSECTION ANGLES
(INTERPOLATE VALUES FOR ANGLES NOT SHOWN)

ANGLE θ DEGREES	COORDINATES IN FEET (MEASURED FROM POINT "O") X / Y								LENGTH IN FEET				
	A	B	C	D	E	F	G	H	AB	AC	T	OJ	OH
60	12.7 / -14.0	44.9 / -12.0	46.4 / -72.4	41.9 / 0.0	205.0 / 0.0	104.6 / -12.0	64.0 / -75.5	85.0 / -147.1	32.3	67.4	4.9	85.9	169.9
65	10.9 / -14.0	39.0 / -12.0	37.8 / -71.6	39.4 / 0.0	196.1 / 0.0	95.7 / -12.0	54.1 / -71.5	70.5 / -151.3	28.2	63.6	8.5	80.9	166.9
70	9.4 / -14.0	33.9 / -12.0	29.8 / -70.1	37.4 / 0.0	188.3 / 0.0	87.8 / -12.0	45.6 / -67.5	56.1 / -154.2	24.6	59.7	11.5	76.1	164.1
75	7.9 / -14.0	29.3 / -12.0	22.3 / -67.9	35.7 / 0.0	181.2 / 0.0	80.7 / -12.0	38.2 / -63.4	41.8 / -155.9	21.5	55.8	13.8	71.4	161.4
80	6.5 / -14.0	25.4 / -12.0	15.6 / -65.2	34.4 / 0.0	174.8 / 0.0	74.4 / -12.0	31.8 / -59.3	27.6 / -156.5	18.9	52.0	15.6	66.9	158.9

TYPE "A1" & "A2" SIDE ROAD INTERSECTION DETAILS

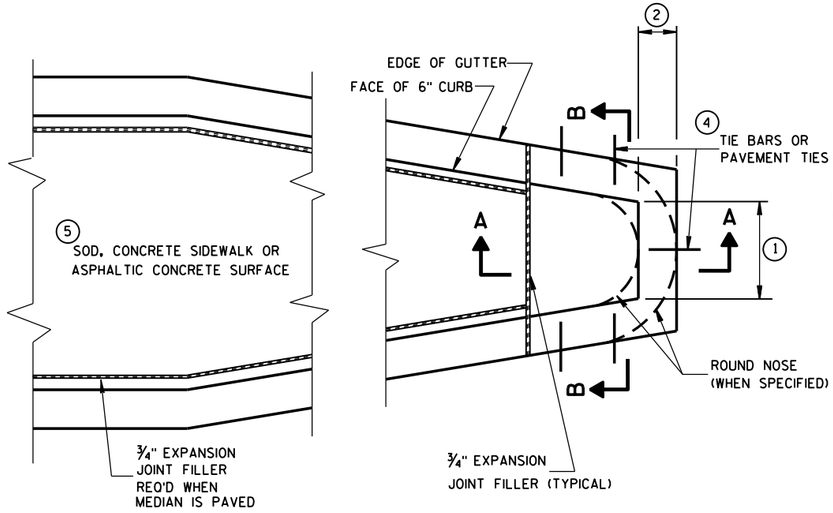
AT-GRADE SIDE ROAD INTERSECTION, TYPE "A1" & "A2"

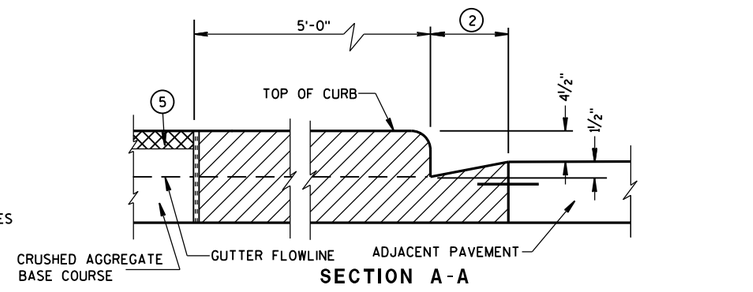
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

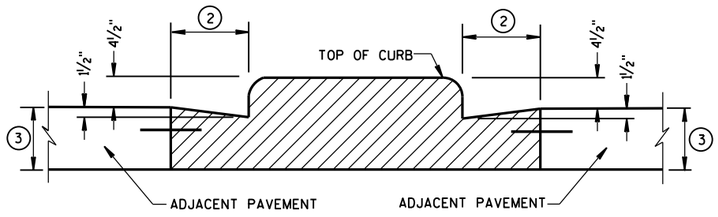
APPROVED
12/18/12 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

6

S.D.D. 9 A 1-13b







CONCRETE MEDIAN BLUNT NOSE DETAIL

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

(1) SEE PLAN FOR MEDIAN NOSE WIDTH AND RADIUS (FOR ROUND NOSE ALTERNATE).

(2) WIDTH OF GUTTER TO MATCH EXISTING ADJACENT GUTTER OR AS SPECIFIED ELSEWHERE IN THE PLAN.

(3) DEPTH EQUAL TO ADJACENT PAVEMENT. ADJACENT PAVEMENT STRUCTURE DETAILS ARE SHOWN ON THE PLAN. TYPICAL OPTIONS ARE:

(1) NEW OR EXISTING CONCRETE PAVEMENT.

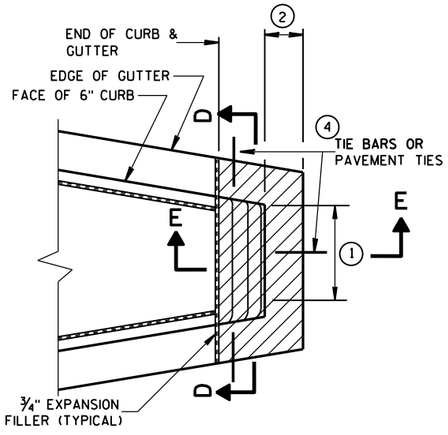
(2) ASPHALTIC CONCRETE PAVEMENT OVER NEW OR EXISTING CONCRETE BASE COURSE.

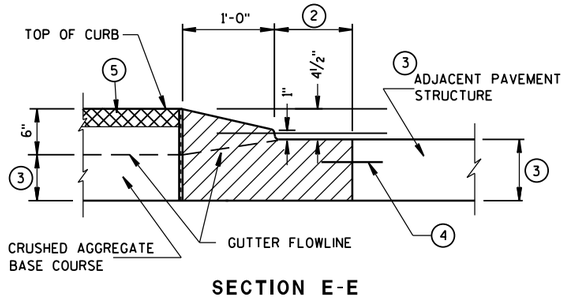
(3) ASPHALTIC CONCRETE PAVEMENT OVER CRUSHED AGGREGATE BASE COURSE.

(4) TIE BARS OR PAVEMENT TIES REQUIRED IN NEW CONCRETE PAVEMENT OR CONCRETE BASE COURSE. TIE BARS SHALL BE NO. 4 X 2'-0" SPACED AT 2'-0" C-C.

PAVEMENT TIES REQUIRED IN EXISTING CONCRETE BASE COURSE. PAVEMENT TIES SHALL BE NO. 6 X 1'-0" SPACED AT 3'-0" C-C INSTALLED ON A HORIZONTAL SKEW OF 6:1. THE DIRECTION OF SKEW SHALL ALTERNATE AFTER EVERY ONE OR TWO BARS.

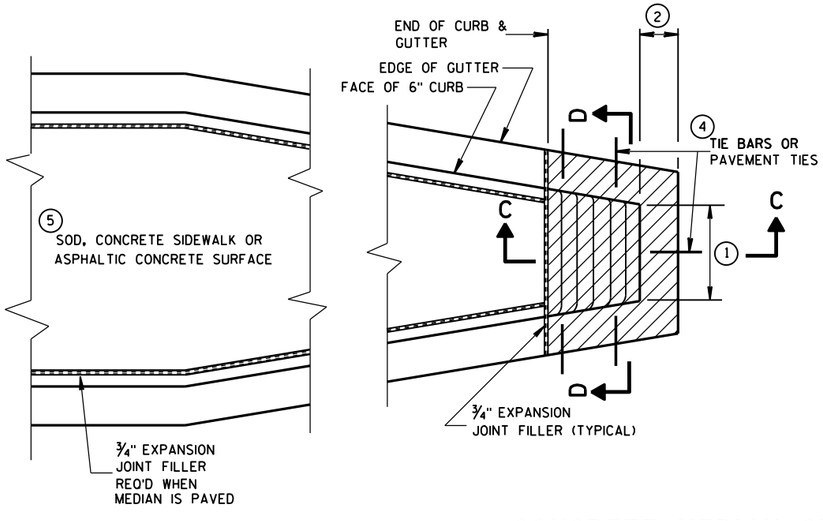
(5) SURFACE TYPE AND DETAILS ARE SHOWN ELSEWHERE IN THE PLAN.



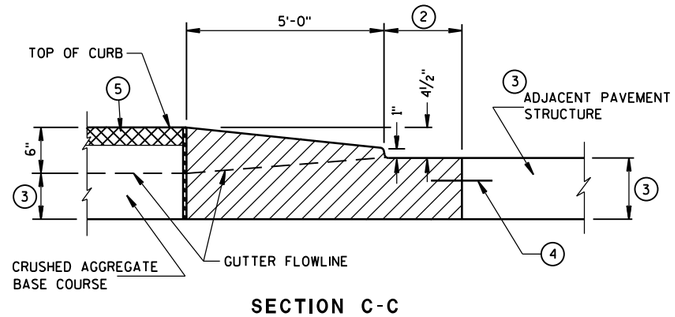


SECTION E-E

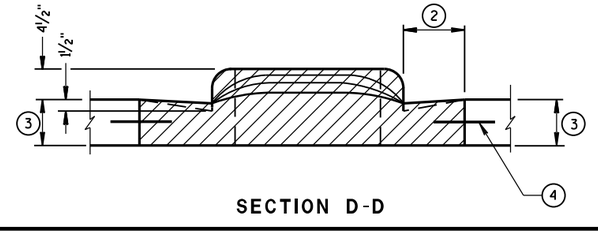
CONCRETE MEDIAN SLOPED NOSE TYPE 2



CONCRETE MEDIAN SLOPED NOSE TYPE 1



SECTION C-C



SECTION D-D

CONCRETE MEDIAN NOSE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

6/8/2006
DATE

/S/ Jerry H. Zoga
ROADWAY STANDARDS D ENGINEER

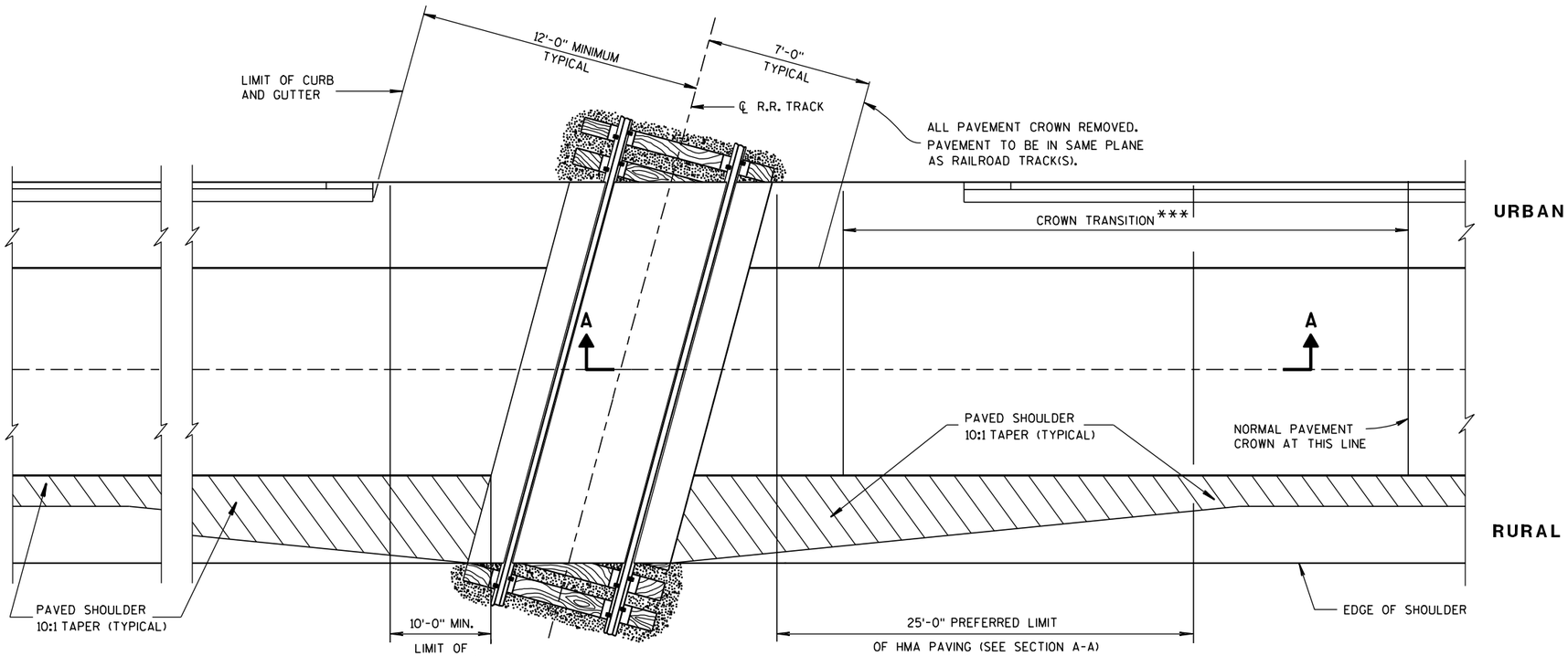
FHWA

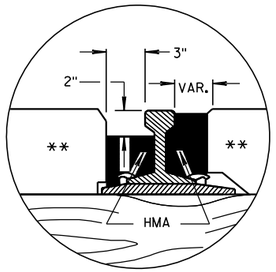
6

S.D.D. 11 B 2-2

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S.D.D. 11 B 2-2





DETAIL B

HMA FLANGEWAY AND FIELD FILLERS

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

TIMBER, CONCRETE OR RUBBER CROSSING SURFACE MATERIAL, RAILS, TIES, BALLAST, GEOTEXTILE FABRIC AND CROSSING DRAINAGE SYSTEM BY OTHERS UNLESS OTHERWISE PROVIDED.

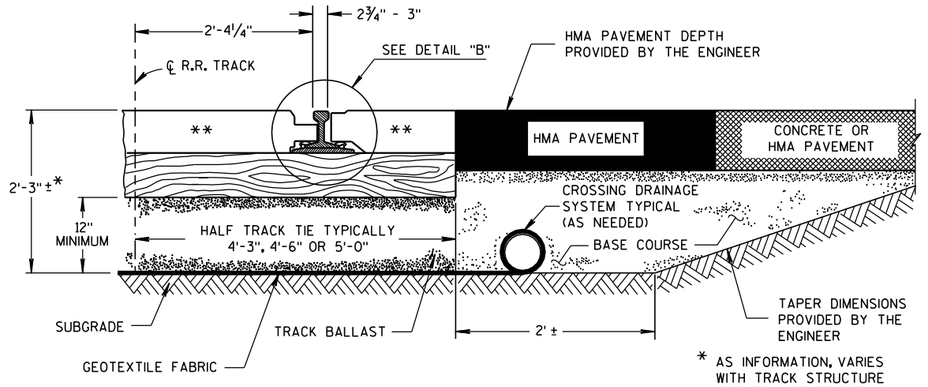
HMA PAVEMENT APPROACHES AND HMA PAVEMET CROSSING SURFACES TO BE PLACED BY CONTRACTOR UNLESS OTHERWISE PROVIDED.

HMA FLANGEWAY AND FIELD FILLERS TO BE PLACED AND THOROUGHLY HAND COMPACTED BY THE CONTRACTOR WHEN NOT PROVIDED BY OTHERS. SEE DETAIL B. HMA FILLERS NOT REQUIRED WHEN RUBBER FILLERS ARE PROVIDED.

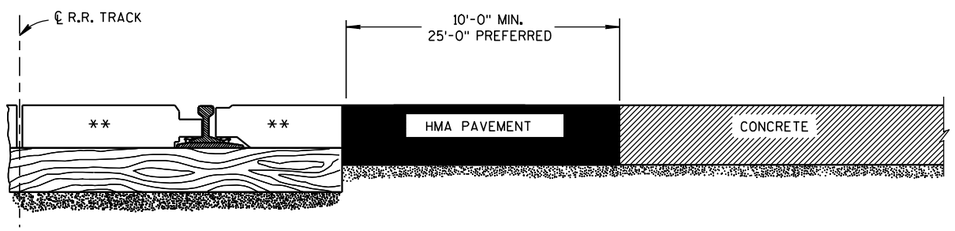
HMA PAVEMENT SHALL BE ROLLED PARALLEL TO THE TRACK.

** CROSSING SURFACE MAY BE TIMBER, RUBBER, CONCRETE, HMA PAVEMENT OR A COMBINATION OF SUCH MATERIALS.

*** CROWN TRANSITION LENGTH SHOWN ELSEWHERE IN THE PLAN.



TYPICAL HALF SECTION



SECTION A-A

CONCRETE PAVEMENT APPROACH



SECTION A-A

HMA PAVEMENT APPROACH

EXAMPLES OF PAVEMENT APPROACHES

PAVEMENT DETAILS FOR RAILROAD APPROACH

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
8-28-09 DATE
/S/ Ronald E. Adams
CHIEF, RAILROADS & HAI CTION
FHWA

6

S.D.D. 13 B 1-10

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS, AND THE APPLICABLE SPECIAL PROVISIONS.

(1) W6 X 9 OR W6 X 8.5 STEEL POSTS AND NOTCHED PLASTIC BLOCKOUTS ARE ACCEPTABLE ALTERNATIVES FOR 6" X 8" WOOD POSTS WITH WOOD OR PLASTIC BLOCKOUTS. USE APPROVED NOTCHED PLASTIC BLOCKOUTS WITH STEEL POSTS. APPROVED PLASTIC BLOCKOUT DESIGNS MAY VARY FROM THIS TYPICAL DETAIL WHEN USED IN CONJUNCTION WITH STEEL POSTS.

DO NOT MIX STEEL POSTS AND WOOD POSTS IN A SINGLE INSTALLATION.

(2) USE STRUCTURAL STEEL POSTS CONFORMING TO ASTM A 36. GALVANIZED POSTS ACCORDING TO AASHTO M 111. EITHER SET THE POSTS IN DRILLED HOLES OR DRIVE TO GRADE. REMOVE MUSHROOMING CAUSED BY DRIVING AND REPAIR DAMAGED SPELTER COATING ON GALVANIZED POSTS.

(3) INSTALL STEEL POSTS WITH HOLES ON APPROACHING TRAFFIC SIDE.

(4) USE EITHER WOOD OR APPROVED PLASTIC BLOCKOUTS ON WOOD POSTS.

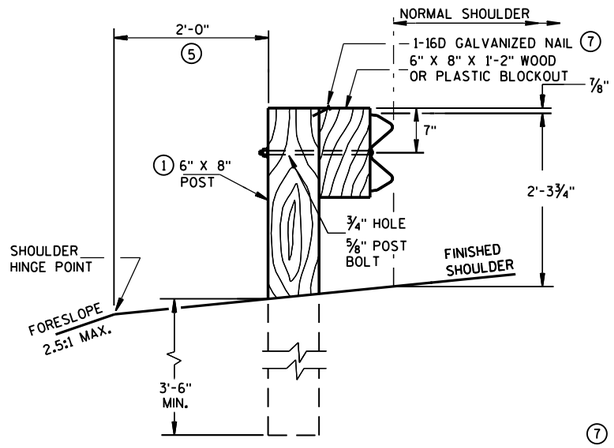
(5) IF THE DISTANCE FROM BACK OF POST TO SHOULDER HINGE POINT IS LESS THAN 2 FEET INSTALL LONGER POST AT HALF POST SPACING, W BEAM (LHW).

(6) IF ROCK IS ENCOUNTERED DURING EXCAVATION, THE ENGINEER MAY APPROVE USING A 12 INCH DIAMETER POST HOLE EXTENDING 20 INCHES DEEP INTO THE ROCK. PLACE GRANULAR MATERIAL IN THE BOTTOM OF THE HOLE APPROXIMATELY 2½ INCHES DEEP. CUT THE POSTS TO LENGTH AND PLACE IN YHE HOLE. BACKFILL WITH MATERIAL EXCAVATED FROM THE HOLE AND COMPACT ADEQUATEY.

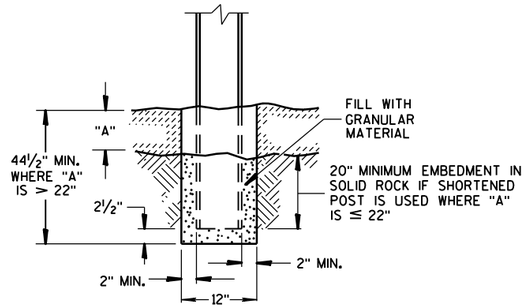
(7) WHEN USING STEEL POSTS AND WOOD BLOCKOUTS INSTALL FOUR 16D GALVANIZED NAILS. INSTALL NAILS AT THE BACK CORNERS OF THE BLOCK AND BEND THE NAILS OVER THE FLANGE OF THE STEEL POST.

INSTALL BEAM GUARD SECTIONS AND ALL NECESSARY HARDWARE ACCORDING TO THE APPLICABLE PLAN AND CURRENT STANDARD AND SUPPLEMENTAL SPECIFICATIONS.

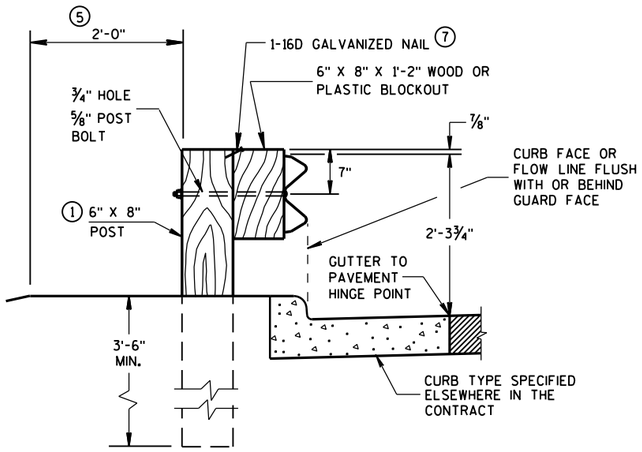
ALL DIMENSIONS ARE SUBJECT TO MANUFACTURER'S TOLERANCES EXCEPT WHERE ALLOWABLE TOLERANCES ARE SHOWN.



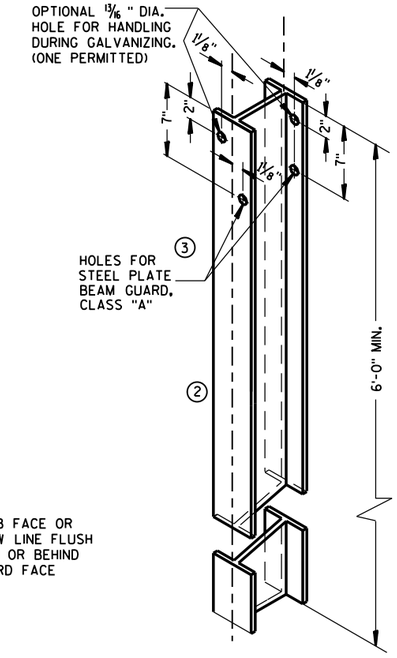
END VIEW
LOCATED ALONG A ROADWAY SHOULDER
STANDARD INSTALLATION



END VIEW
SETTING STEEL OR WOOD POST IN ROCK (6)

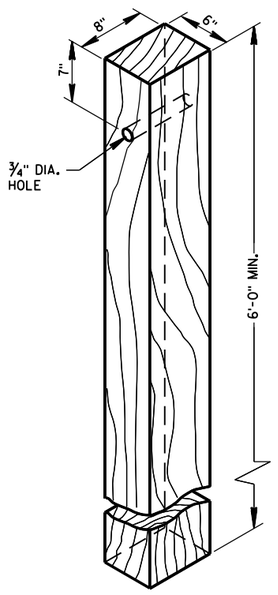


END VIEW
LOCATED ALONG A CURBED ROADWAY

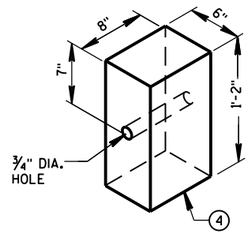


STEEL POST &
HOLE PUNCHING DETAIL
(W6 X 9) (1)

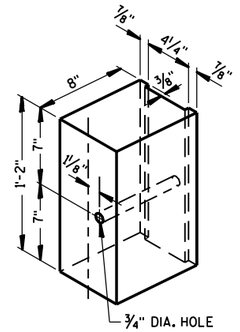
ALL HOLES 13/16" DIAMETER EXCEPT AS NOTED



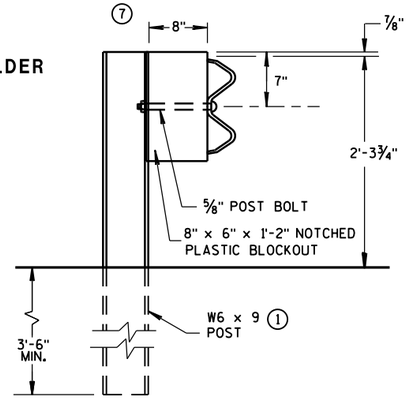
WOOD POST
(6"X8") NOMINAL



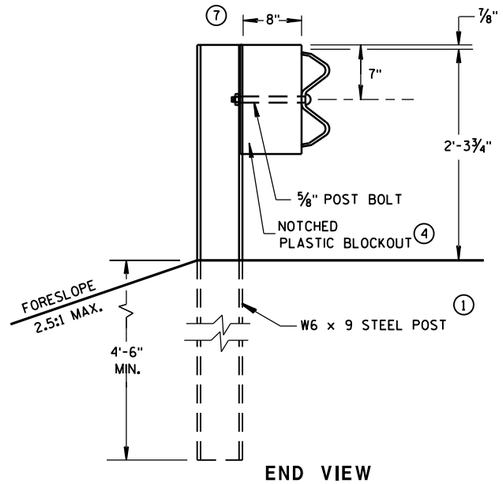
WOOD OR PLASTIC
BLOCKOUT FOR
WOOD POSTS



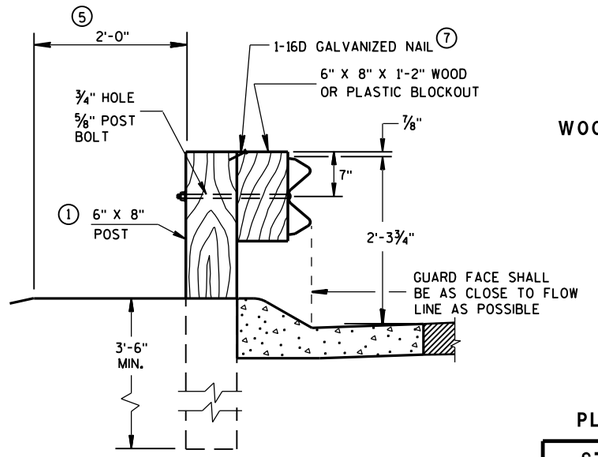
TYPICAL NOTCHED (1)
PLASTIC BLOCKOUT
FOR STEEL POSTS



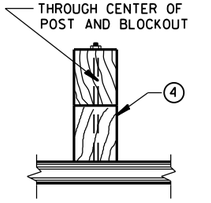
END VIEW
STEEL POST & NOTCHED
PLASTIC BLOCKOUT ALTERNATIVE
STANDARD INSTALLATION



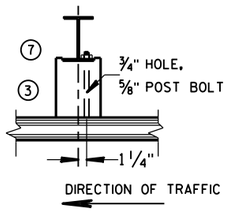
END VIEW
LONGER POST AT HALF
POST SPACING W BEAM
(LHW)



END VIEW
LOCATED ALONG A
MOUNTABLE CURBED ROADWAY



PLAN VIEW
WOOD POST, BLOCKOUT & BEAM



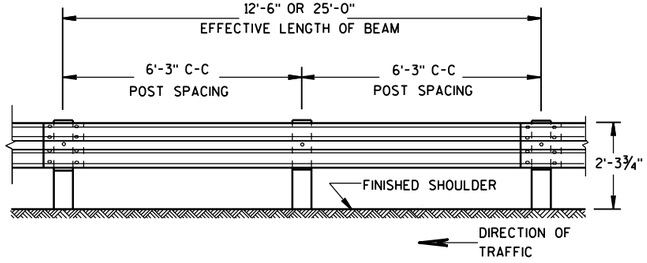
PLAN VIEW
STEEL POST, NOTCHED
PLASTIC BLOCKOUT & BEAM

TYPICAL INSTALLATION OF STEEL PLATE BEAM GUARD

STEEL PLATE BEAM GUARD,
CLASS "A"
INSTALLATION & ELEMENTS

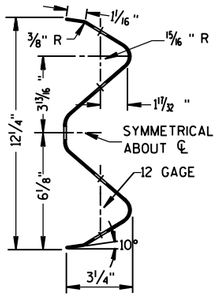
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

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S.D.D. 14 B 15-8a

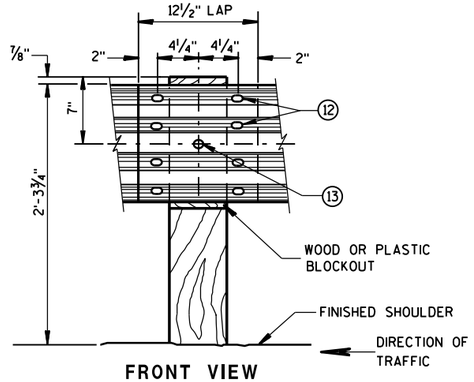


FRONT VIEW

POST SPACING STANDARD INSTALLATION



SECTION THRU W BEAM



FRONT VIEW

BEAM SPLICE AT WOOD POST AND POST MOUNTING DETAIL

GENERAL NOTES

(8) PROVIDE SILVER REFLECTIVE SHEETING ON ALL REFLECTORS EXCEPT THOSE LOCATED ALONG THE LEFT EDGE OF ONE-WAY ROADWAYS, WHICH SHALL BE PROVIDED WITH YELLOW REFLECTIVE SHEETING. SHEETING IS TYPE H. SEE STANDARD SPECIFICATION 637.

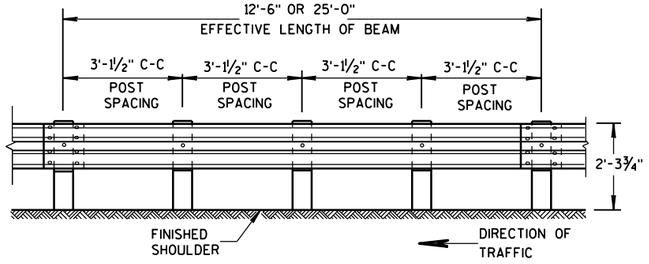
(9) DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL.

(10) REVERSE EVERY OTHER REFLECTOR FOR 2-WAY VISIBILITY. THE CONTRACTOR MAY FURNISH TWO-SIDED REFLECTORS IN LIEU OF ONE-SIDED REFLECTORS.

(11) PROVIDE AN ANGLE OF BEND OF 90° ± 1° FOR TWO-SIDED REFLECTORS.

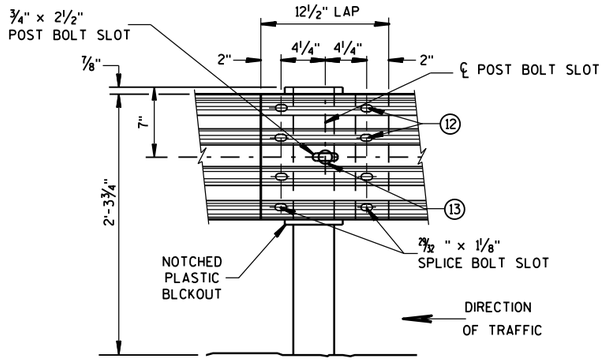
(12) 8 -⅝" ϕ X 2" BUTTON HEAD BOLTS WITH OVAL SHOULDERS & RECESS NUTS.

(13) ⅝" DIA. BUTTON HEAD BOLT AND RECESS NUT WITH ⅝" DIA. F844 FLAT WASHER UNDER NUT.



FRONT VIEW

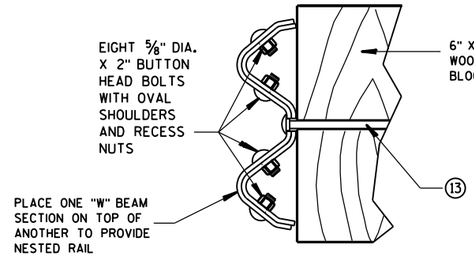
POST SPACING FOR LONGER POST AT HALF POST SPACING W BEAM (LHW)



FRONT VIEW

BEAM SPLICE AT STEEL POST

TYPICAL SPLICING DETAILS OF STEEL PLATE BEAM GUARD

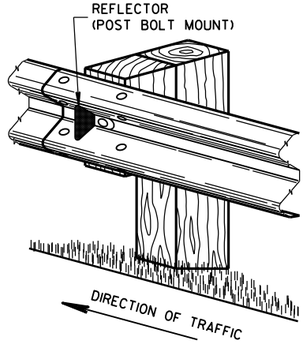


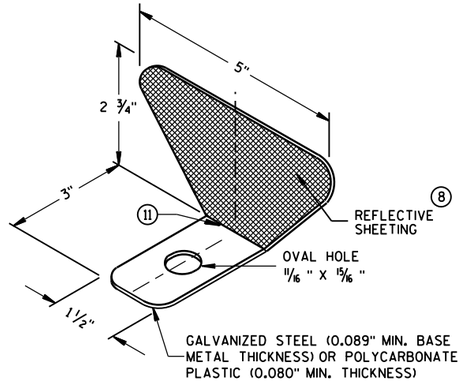
NESTED W BEAM (NW)

USE ALL OTHER STANDARD BEAM GUARD DETAILS FOR CONSTRUCTING NESTED W BEAM (NW)

REFLECTOR SPACING (9)

	BEAM GUARD LENGTH	REFLECTOR SPACING	NO. SURFACES REFLECTORIZED	MIN. NO. REFLECTORS
ONE WAY TRAFFIC	< 200'	50' C-C	1	3
	> 200'	100' C-C	1	
TWO WAY TRAFFIC	< 200'	25' C-C	1 (10)	6
	> 200'	50' C-C	1	
TWO WAY TRAFFIC	< 200'	50' C-C	2 (11)	3
	> 200'	100' C-C	2	



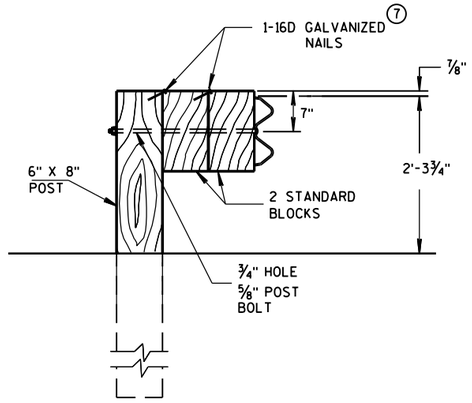


ONE SIDED REFLECTOR DETAIL AND TYPICAL INSTALLATION (8)

STEEL PLATE BEAM GUARD,
CLASS "A",
INSTALLATION & ELEMENTS

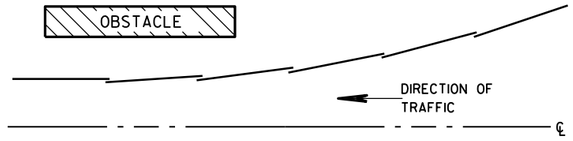
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6
S.D.D. 14 B 15-8b

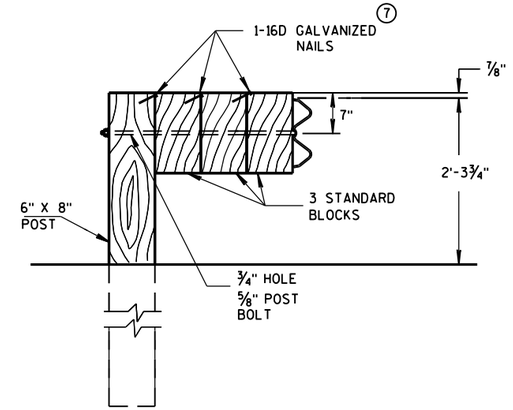


DETAIL FOR DOUBLE BLOCKS

THE NUMBER OF DOUBLE BLOCK POSTS WITHIN A BARRIER RUN IS UNLIMITED

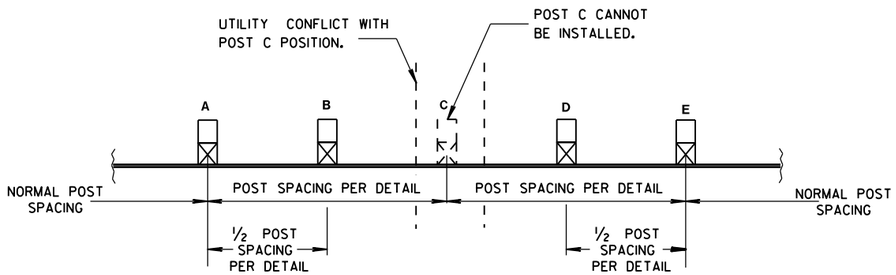


PLAN VIEW
BEAM LAPPING DETAIL



DETAIL FOR TRIPLE BLOCKS

TRIPLE BLOCK DETAIL IS LIMITED TO ONE LOCATION WITHIN A BEAM GUARD RUN.



POST DRIVING FOR CONTINUOUS UNDERGROUND OBSTRUCTION

NOTES: USE DOUBLE OR TRIPLE BLOCKS WHEN UNDERGROUND OBSTACLES PREVENT THE POST FROM BEING INSTALLED.

DO NOT USE EXTRA BLOCKOUTS IF IT CAUSES THE POST TO BE DRIVEN BEYOND SHOULDER HINGE POINT OR CAUSES A FIXED OBJECT TO BE WITHIN THE DEFLECTION DISTANCE OF THE BARRIER.

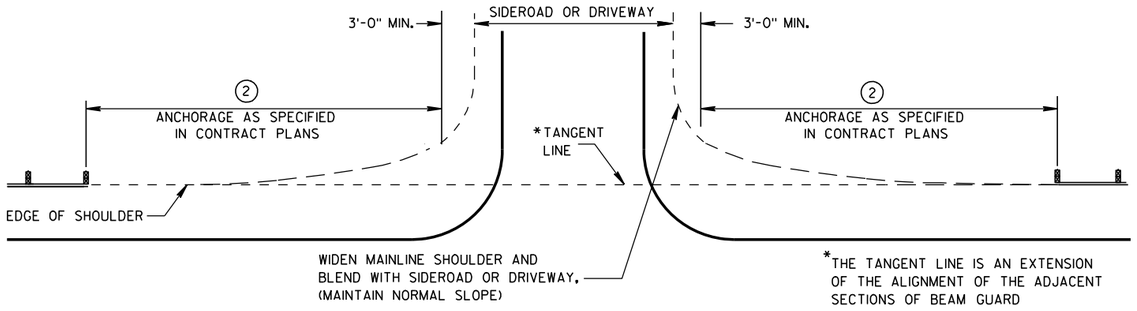
STEEL PLATE BEAM GUARD, CLASS "A", INSTALLATION & ELEMENTS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

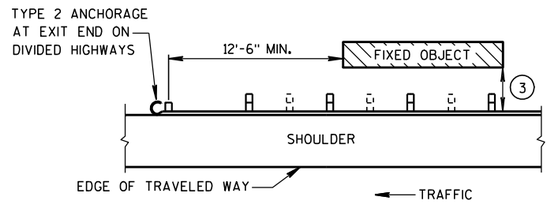
APPROVED
June 2014 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

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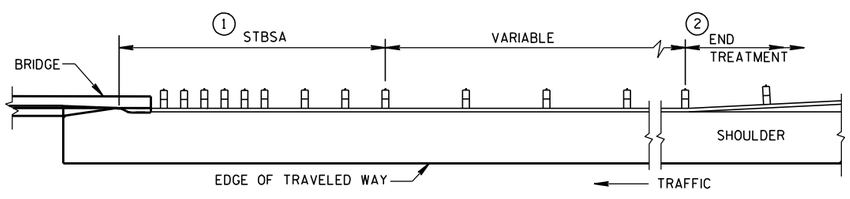
S.D.D. 14 B 15-8c



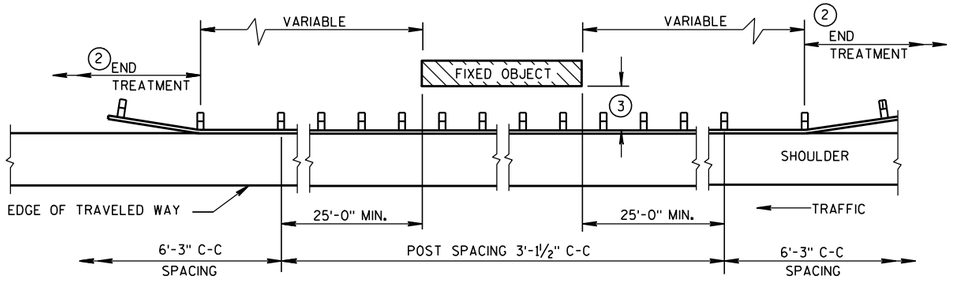
BEAM GUARD AT SIDEROADS OR DRIVEWAYS



BEAM GUARD AT OBSTACLES EXIT END - ONE WAY TRAFFIC

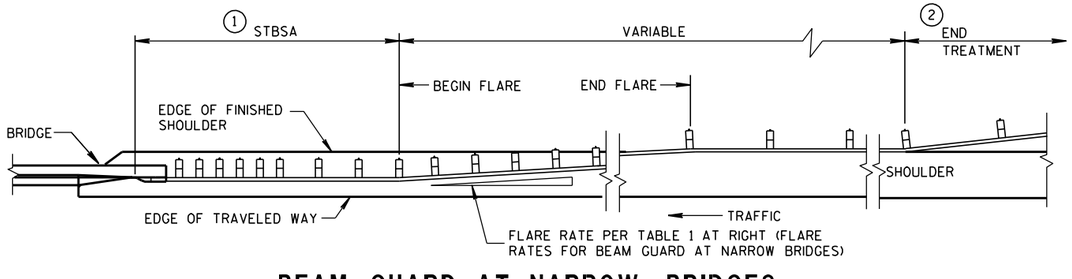


BEAM GUARD AT FULL WIDTH BRIDGES



BEAM GUARD AT OBSTACLES - TWO WAY TRAFFIC

(RAIL TO OBSTACLE CLEARANCE 3'-6" TO 4'-6")



BEAM GUARD AT NARROW BRIDGES

(FLARED TO SHOULDER EDGE, THEN PARALLEL TO ROADWAY)

TABLE 1
FLARE RATES FOR BEAM GUARD AT NARROW BRIDGES

POSTED SPEED (MPH)	FLARE RATE
25	13:1
30	15:1
35	16:1
40	18:1
45	21:1
50	24:1
55	26:1
65	30:1

GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP SHALL CONFORM TO THE PERTINENT STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

W6 X 9 OR W6 X 8.5 STEEL POSTS WITH NOTCHED PLASTIC BLOCKOUTS ARE ACCEPTABLE ALTERNATIVES FOR 6" X 8" WOOD POSTS WITH WOOD OR PLASTIC BLOCKOUTS. USE APPROVED NOTCHED PLASTIC BLOCKOUTS WITH STEEL POSTS.

THE LOCATIONS AND LENGTHS OF BEAM GUARD ARE SHOWN ELSEWHERE IN THE PLAN.

(1) STEEL THRIE BEAM STRUCTURAL APPROACH (STBSA) - SEE CURRENT SDD 14B20.

(2) USE AN APPROVED END TREATMENT FOR THE TRAFFIC APPROACH SIDE OF BRIDGE/OBSTACLES. USE TYPE 2 ANCHORAGE ONLY AT THE DOWNSTREAM ENDS OF BEAM GUARD LOCATED ALONG ROADWAYS WITH ONE WAY TRAFFIC.

(3)

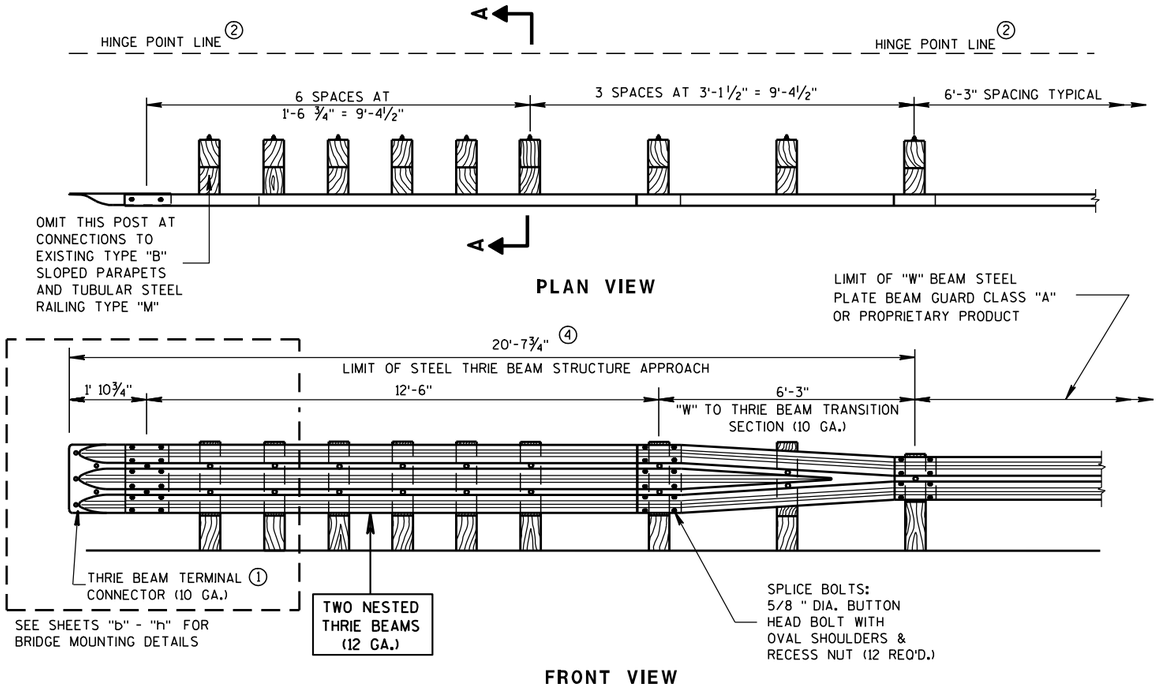
MINIMUM LATERAL DISTANCE FROM FACE OF BEAM GUARD TO FIXED OBJECT	POST SPACING
3'-6"	3' - 1½"
4'-6"	6' - 3"

STEEL PLATE BEAM GUARD CLASS "A" AT BRIDGES, OBSTACLES AND SIDEROADS/DRIVEWAYS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
8-21-07 DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

6
S.D.D. 14 B 18-6a



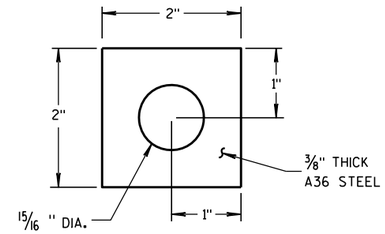


PLATE WASHER DETAIL

GENERAL NOTES

BOLT THE THRIE BEAM TO ALL POSTS AND BLOCKOUTS. DRILL OR PUNCH BOLT HOLES IN THE BEAM IF THE POST SPACING IS LESS THAN 6'-3".

DO NOT USE STEEL POSTS AND NOTCHED PLASTIC BLOCKOUTS IN THE STEEL THRIE BEAM STRUCTURAL APPROACH AND THE TRANSITION SECTION OF STEEL PLATE BEAM GUARD, CLASS "A" INSTALLATIONS.

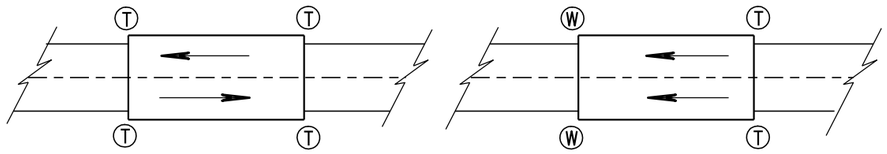
IF ROCK IS ENCOUNTERED, REMOVE ROCK TO FULL DEPTH OF POST PLUS 2 1/2" , AND 12" DIAMETER AROUND POST. SEE 14B15 FOR MORE DETAILS.

① BRIDGE RAILING TYPE "W" DOES NOT REQUIRE A TERMINAL CONNECTOR.

② MINIMUM EMBEDMENT SHALL BE 4'-0". WHERE EXISTING CONDITIONS DO NOT PERMIT THE APPROPRIATE EARTHWORK SHOWN ON THE PLAN TYPICAL SECTIONS OR DETAILS, THE ENGINEER MAY ALLOW THE REDUCTION OR ELIMINATION OF THE 2 FOOT DISTANCE TO THE HINGE POINT. OTHERWISE BUILD AS THE PLAN SHOWS OR AS THE ENGINEER DIRECTS. IF THE 2 FOOT DISTANCE TO THE HINGE POINT IS REDUCED OR ELIMINATED, INCREASE THE POST EMBEDMENT DEPTH TO 4'-6" OR MORE.

③ POST BOLTS ARE 5/8" DIAMETER ASTM A307 BUTTON HEAD BOLT. A POST BOLT REQUIRES A 5/8" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX AND A 5/8" DIAMETER F844 FLAT WASHER. LENGTH OF POST BOLT MAY VARY.

④ ALL WOOD POSTS MUST BE 6" X 8" AND AT LEAST 7'-0" LONG.



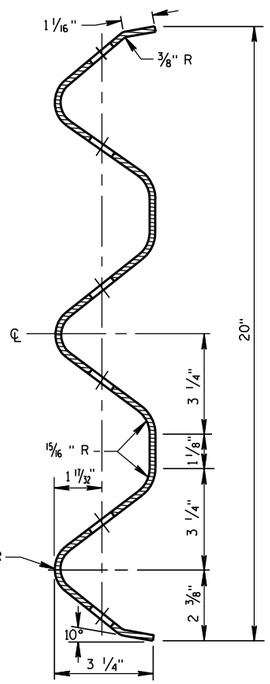
TWO WAY TRAFFIC

ONE WAY TRAFFIC

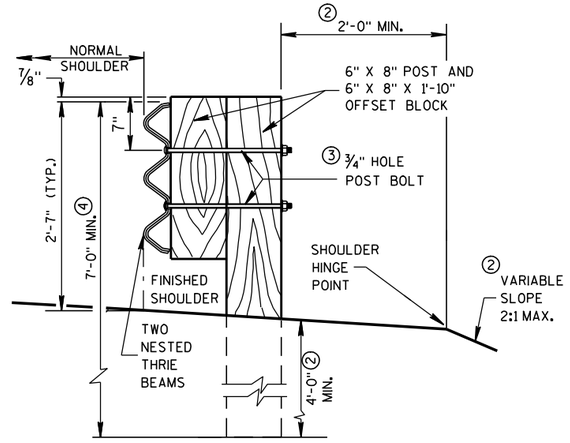
T THRIE BEAM CONNECTION

W W-BEAM CONNECTION WHEN REQUIRED

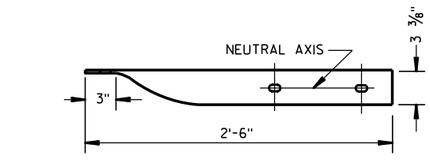
TYPICAL LOCATIONS OF THRIE BEAM AND W-BEAM CONNECTIONS TO BRIDGE

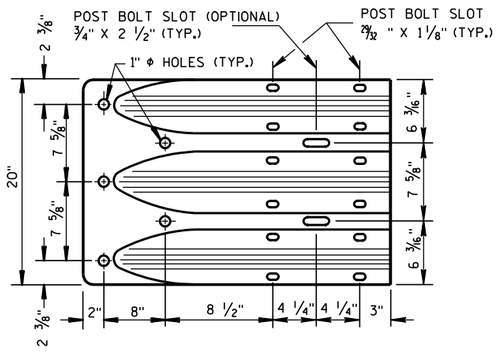


SECTION THRU THRIE BEAM RAIL ELEMENT

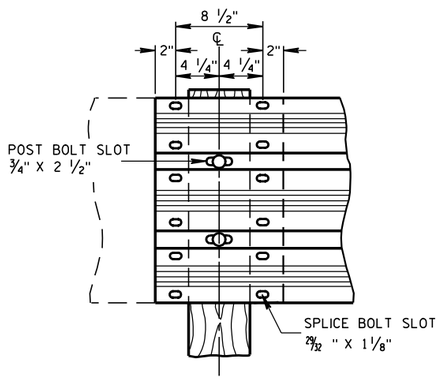


SECTION A-A





THRIE BEAM TERMINAL CONNECTOR



THRIE BEAM SPLICE

STEEL THRIE BEAM STRUCTURE APPROACH

STATE OF WISCONSIN
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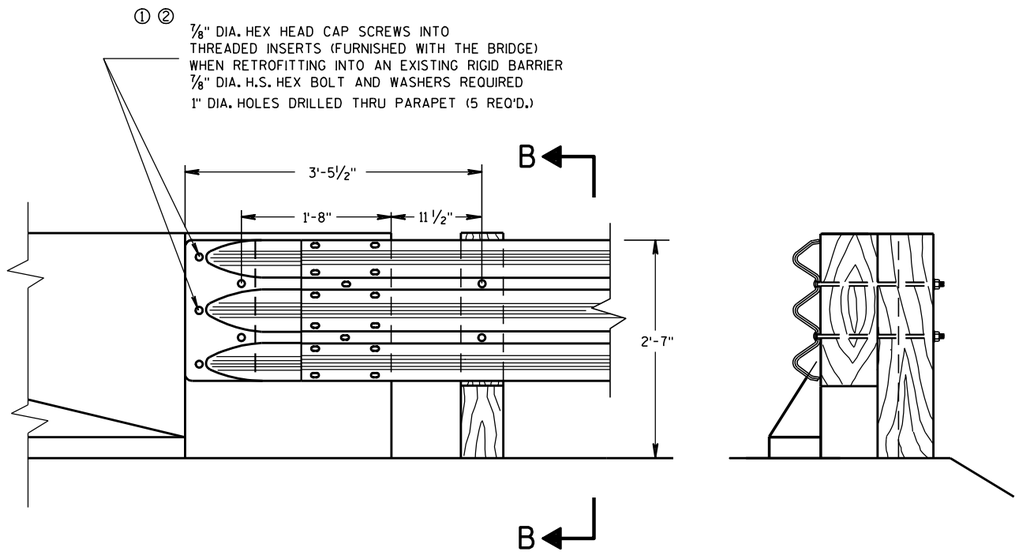
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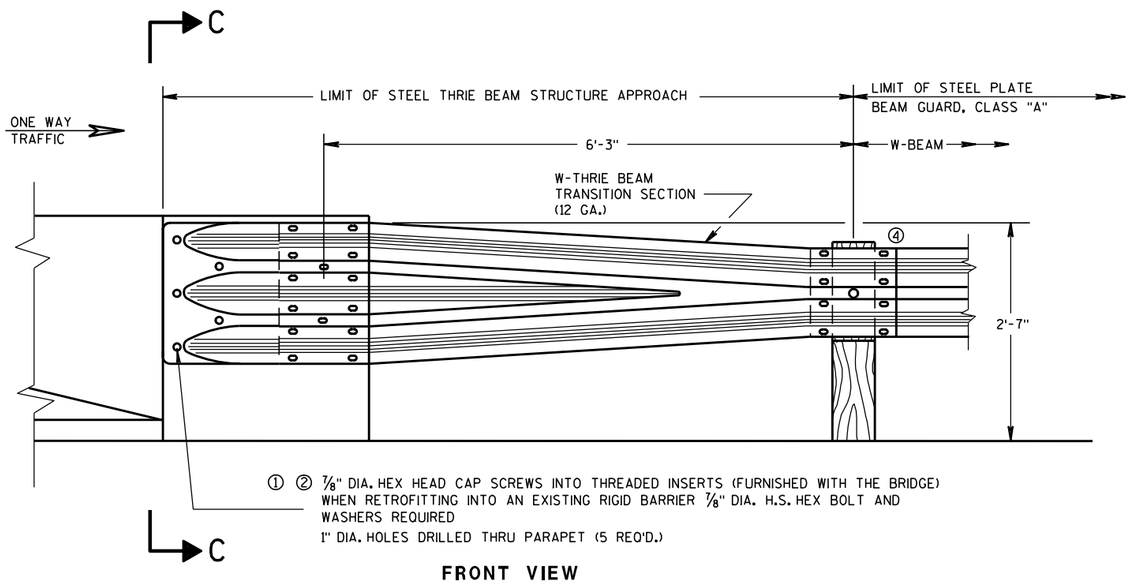
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S.D.D. 14 B 20-11a



FRONT VIEW

SECTION B-B

THRIE BEAM CONNECTION TO BRIDGE PARAPET WITH SQUARE ENDS



① ② ⅞" DIA. HEX HEAD CAP SCREWS INTO THREADED INSERTS (FURNISHED WITH THE BRIDGE) WHEN RETROFITTING INTO AN EXISTING RIGID BARRIER ⅞" DIA. H.S. HEX BOLT AND WASHERS REQUIRED
1" DIA. HOLES DRILLED THRU PARAPET (5 REQ'D.)

FRONT VIEW

W BEAM TRANSITION AND CONNECTION TO BRIDGE PARAPETS WITH SQUARE ENDS

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

GENERAL NOTES

THESE ARE TYPICAL CONNECTION DETAILS. ADJUST THE POSTION OF CONNECTIONS TO EXISTING BRIDGES TO FIT THE ACTUAL BRIDGE AND SITE DIMENSIONS.

BOLTS, NUTS AND WASHERS SHALL CONFORM TO ASTM A325, A449 AND GALVANIZED PER STANDARD SPECIFICATIONS 614.

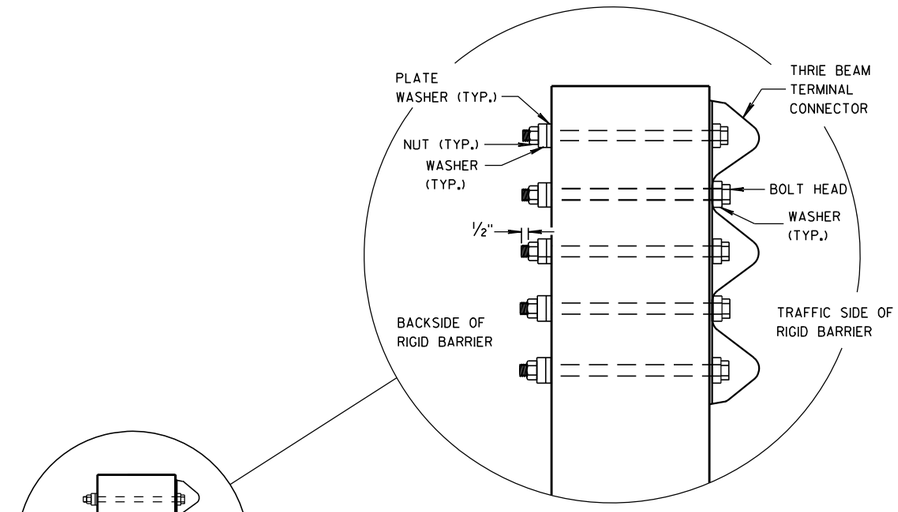
① DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

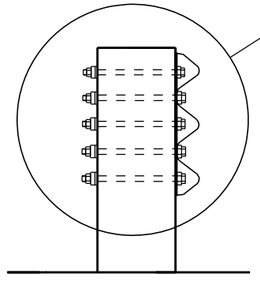
② BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM TERMINAL CONNECTOR. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X ⅝" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.

③ THE RECESS FOR A W-BEAM CONNECTION, WHICH EXISTS ON SOME PARAPETS OF THIS TYPE, SHALL BE FILLED WITH A TREATED TIMBER BLOCKOUT. BLOCKOUT SIZE IS 1'-6" X 2'-0" X 3 ½".

④ W6 X 9 OR W6 X 8.5 STEEL POSTS AND NOTCHED PLASTIC BLOCKOUTS ARE ACCEPTABLE ALTERNATIVES FOR 6" X 8" WOOD POST WITH WOOD OR PLASTIC BLOCKOUTS. USE APPROVED NOTCHED PLASTIC BLOCKOUTS WITH STEEL POSTS.

DO NOT USE STEEL POSTS AND NOTCHED PLASTIC BLOCKOUTS IN THE STEEL THRIE BEAM STRUCTURAL APPROACH AND THE TRANSITION SECTION OF STEEL PLATE BEAM GUARD, CLASS "A" INSTALLATIONS.





SECTION C-C

STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTION TO SQUARE END PARAPETS

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8/31/2012
DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

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GENERAL NOTES

THESE ARE TYPICAL CONNECTION DETAILS. ADJUST THE POSTION OF CONNECTIONS TO EXISTING BRIDGES TO FIT THE ACTUAL BRIDGE AND SITE DIMENSIONS.

BOLTS, NUTS AND WASHERS SHALL CONFORM TO ASTM A325, A449 AND GALVANIZED PER STANDARD SPECIFICATIONS 614.

① DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

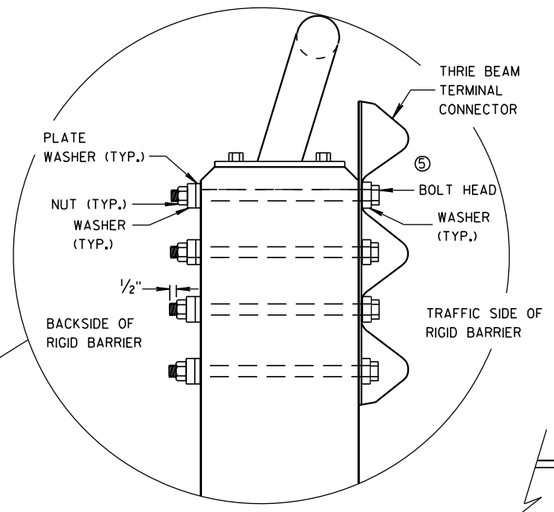
② BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM TERMINAL CONNECTOR. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X ⅝" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.

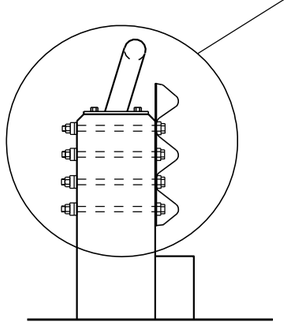
③ THE RECESS FOR A W-BEAM CONNECTION, WHICH EXISTS ON SOME PARAPETS OF THIS TYPE, SHALL BE FILLED WITH A TREATED TIMBER BLOCKOUT. BLOCKOUT SIZE IS 1'-6" X 2'-0" X 3 ½".

④ W6 X 9 OR W6 X 8.5 STEEL POSTS AND NOTCHED PLASTIC BLOCKOUTS ARE ACCEPTABLE ALTERNATIVES FOR 6" X 8" WOOD POST WITH WOOD OR PLASTIC BLOCKOUTS. USE APPROVED NOTCHED PLASTIC BLOCKOUTS WITH STEEL POSTS.

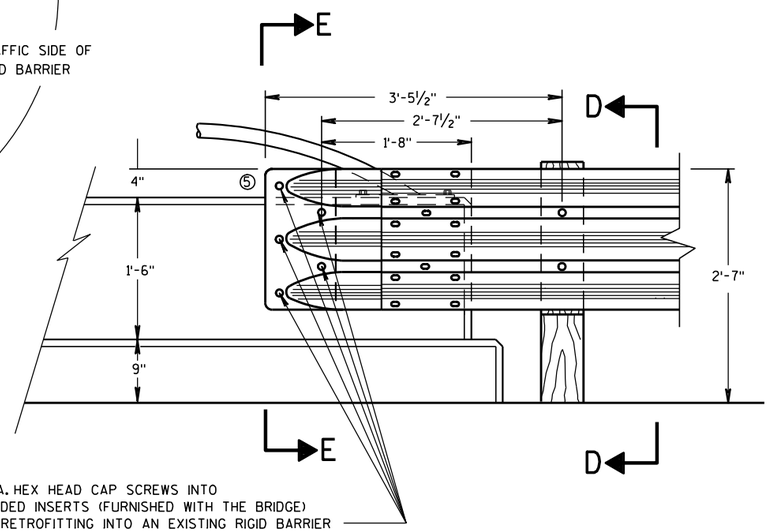
⑤ BOLT, NUT AND WASHERS NOT REQUIRED FOR THIS LOCATION WHEN RETROFITTING AN EXISTING PAPAPET AND THE HOLE IS EITHER ABOVE PARAPET OR WITHIN 4 INCHES OF THE EDGE OF PARAPET.

DO NOT USE STEEL POSTS AND NOTCHED PLASTIC BLOCKOUTS IN THE STEEL THRIE BEAM STRUCTURAL APPROACH AND THE TRANSITION SECTION OF STEEL PLATE BEAM GUARD, CLASS "A" INSTALLATIONS.





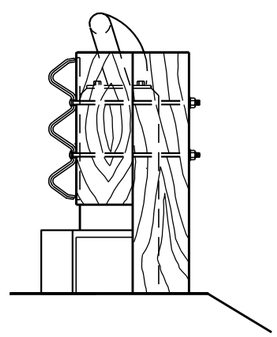
SECTION E-E



①② ⅞" DIA. HEX HEAD CAP SCREWS INTO THREADED INSERTS (FURNISHED WITH THE BRIDGE) WHEN RETROFITTING INTO AN EXISTING RIGID BARRIER ⅞" DIA. H.S. HEX BOLT AND WASHERS REQUIRED

1" DIA. HOLES DRILLED THRU PARAPET (4 REQ'D.)

FRONT VIEW

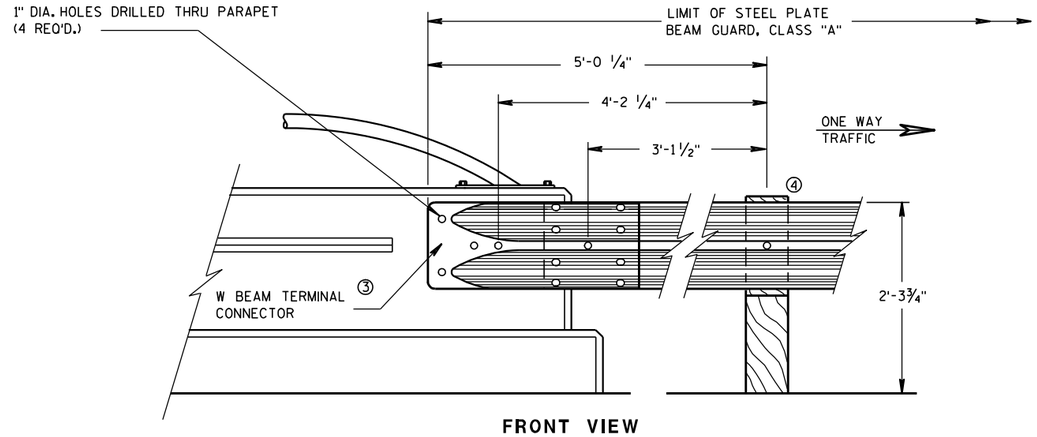


SECTION D-D

THRIE BEAM CONNECTION TO VERTICAL FACED PARAPETS

①② ⅞" DIA. HEX HEAD CAP SCREWS INTO THREADED INSERTS (FURNISHED WITH THE BRIDGE) WHEN RETROFITTING INTO AN EXISTING RIGID BARRIER ⅞" DIA. HEX HEAD CAP SCREWS INTO THREADED INSERTS (FURNISHED WITH THE BRIDGE) WHEN RETROFITTING INTO AN EXISTING RIGID BARRIER ⅞" DIA. H.S. HEX BOLT AND WASHERS REQUIRED

1" DIA. HOLES DRILLED THRU PARAPET (4 REQ'D.)



FRONT VIEW

W BEAM CONNECTION TO VERTICAL FACE PARAPET

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTION TO VERTICAL FACED PARAPETS

STATE OF WISCONSIN
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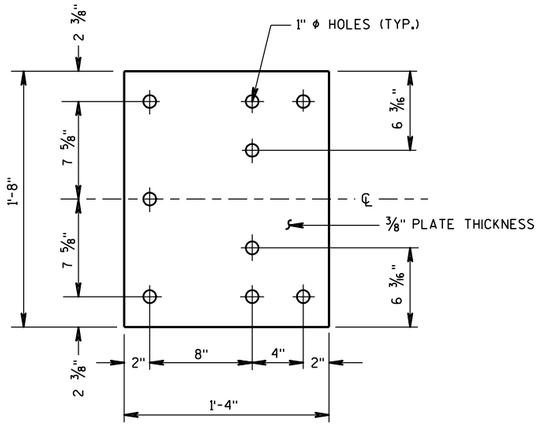
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FHWA

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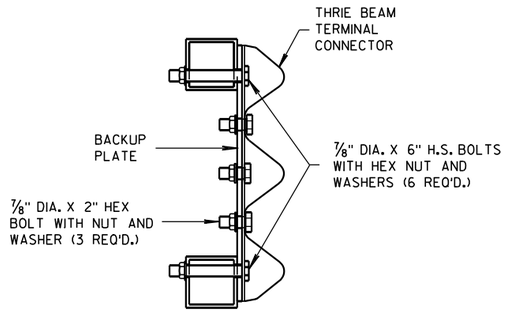
S.D.D. 14 B 20-11c

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S.D.D. 14 B 20-11c



BACK-UP PLATE DETAIL



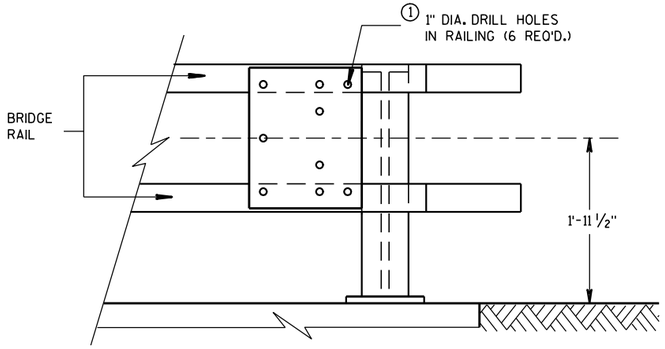
SECTION G-G

GENERAL NOTES

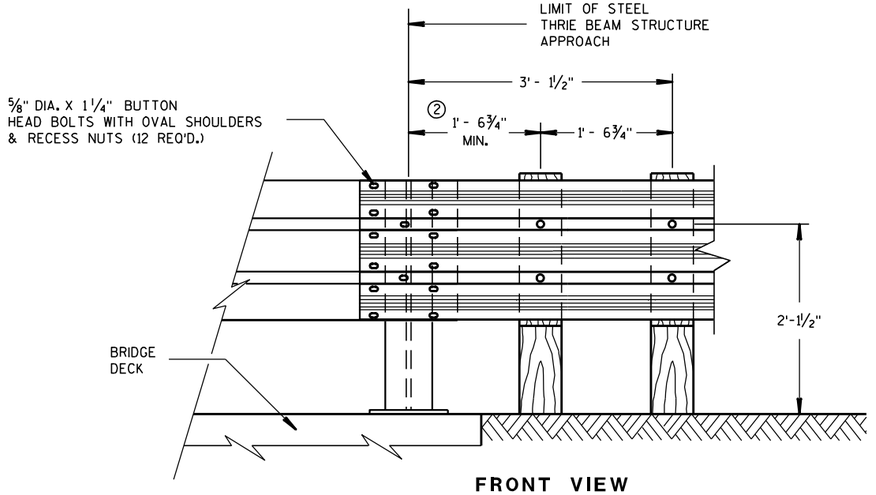
BOLTS, PLATES, NUTS AND WASHERS SHALL CONFORM TO THE REQUIREMENTS OF ASTM SPECIFICATION A 325 AND BE GALVANIZED IN ACCORDANCE WITH ASTM A 153.

① DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

② VARY THIS DIMENSION DEPENDING ON ABUTMENT TYPE, WINGWALL DETAILS, AND ANGLE OF SKEW. PLACE THE FIRST WOOD POST OFF THE BRIDGE SHALL AS CLOSE AS FEASIBLE TO THE STEEL END POST.

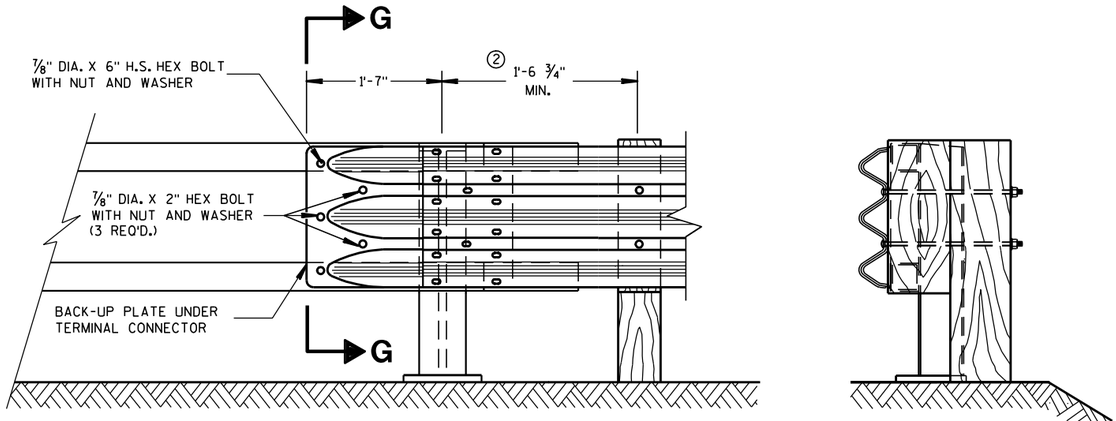


BACK-UP PLATE MOUNTING ONTO BRIDGE RAILING



FRONT VIEW

THRIE BEAM CONNECTION TO STEEL RAILING TYPE "W"



FRONT VIEW

END VIEW

THRIE BEAM CONNECTION TO TUBULAR RAILING TYPE "F"

STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTION TO BRIDGE RAILING TYPES "F" AND "W"

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GENERAL NOTES

COVER PLATE PANELS ARE 3/16" THICK.

ALL STIFFENERS ARE 1/4" THICK.

CONNECTOR PLATE SHALL BE FABRICATED FROM ASTM GRADE A36 STEEL AND GALVANIZED.

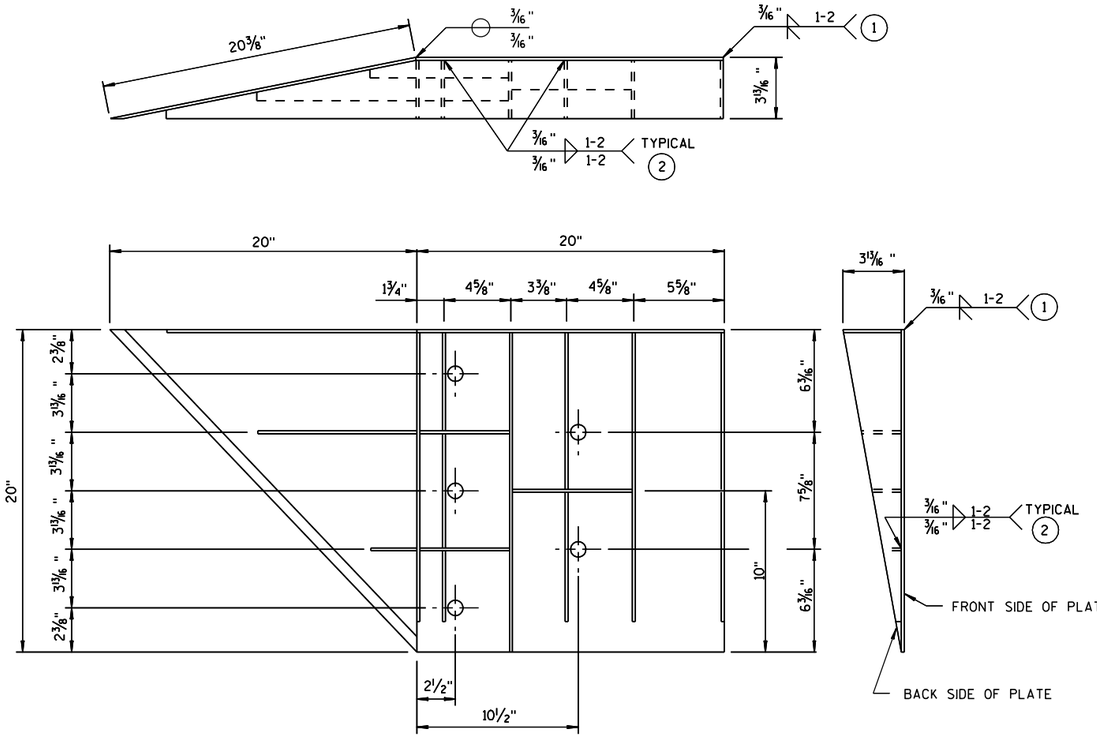
FOR GALVANIZED REQUIREMENTS, SEE SECTION 614 OF THE STANDARD SPECIFICATIONS.

ALL HOLE DIAMETERS SHALL BE 1".

FOR OPPOSITE SIDE INSTALLATION MIRROR DRAWINGS.

(1) STIFFENERS LOCATED AT THE OUTSIDE EDGES OF THE COVER PLATES SHALL BE WELDED AS FOLLOWS:
SINGLE BEVEL GROOVE WELD ON EXTERNAL SIDES AND 3/16" FILLET WELD BY 1" LONG SPACED AT 2" ON INTERNAL SIDES.

(2) STIFFENERS LOCATED ON THE INSIDE OF THE COVER PLATE SHALL BE WELDED AS FOLLOWS:
3/16" FILLET WELD BY 1" LONG SPACED AT 2".



WELDING INSTRUCTION

(VIEWED FROM BACK SIDE OF PLATE)

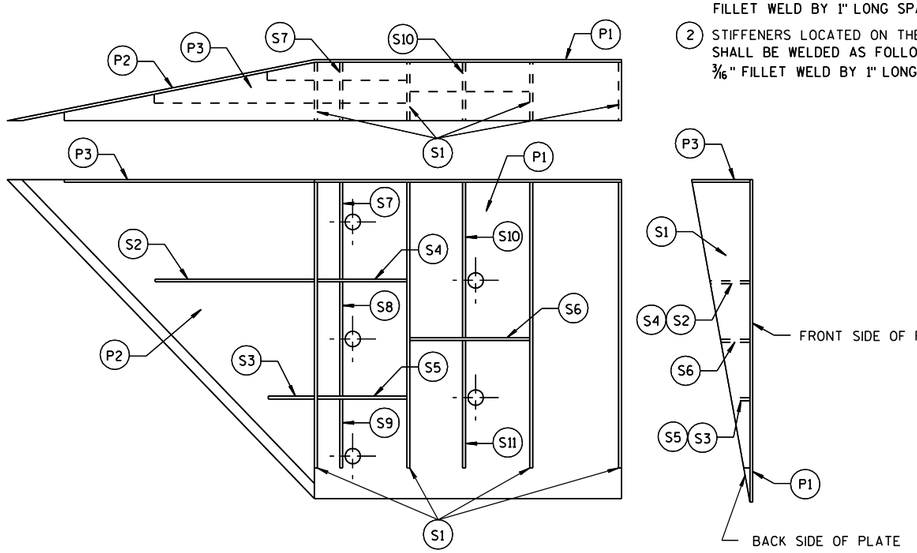


PLATE AND STIFFENER IDENTIFICATION

(VIEWED FROM BACK SIDE OF PLATE)

CONNECTOR PLATE DIMENSION (PER ASSEMBLY)

PLATE	QUANTITY	SHAPE	SIZE (A x B x C x D)	THICKNESS
P1	1		20" x 20"	3/16"
P2	1		20" x 20" x 28 9/16"	3/16"
P3	1		39" x 3 5/8" x 20" x 19 5/16"	3/16"
S1	4		18 7/16" x 3 5/8" x 18 3/4"	1/4"
S2	1		10 1/4" x 2 7/16" x 10 3/8" x 1/2"	1/4"
S3	1		3" x 1 1/16" x 3 1/8" x 1/2"	1/4"
S4	1		6 1/8" x 2 7/16"	1/4"
S5	1		6 1/8" x 1 1/16"	1/4"
S6	1		7 3/4" x 1 3/4"	1/4"
S7	1		2 9/16" x 6" x 3 5/8" x 5 7/8"	1/4"
S8	1		1 5/32" x 7 1/2" x 2 1/2" x 7 3/8"	1/4"
S9	1		6 1/16" x 6 3/16" x 1 3/32"	1/4"
S10	1		1 7/8" x 9 7/8" x 3 5/8" x 9 11/16"	1/4"
S11	1		8 1/2" x 8 3/4" x 1 13/16"	1/4"

STEEL THRIE BEAM STRUCTURE APPROACH

STEEL THRIE BEAM STRUCTURE APPROACH, CONNECTOR PLATE DETAIL

STATE OF WISCONSIN
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BILL OF MATERIALS

NOTE NO.	QTY.	DESCRIPTION
(1)	4	WOOD BREAKAWAY TERMINAL POST: 5½" X 7½" X 3'-9"
(2)	**	STEEL TUBE: OPTION 1 - QUANITY OF 4 TS 8" X 6" X 0.188", 4'-6" LONG OR OPTION 2 - QUANITY OF 2 TS 8" X 6" X 0.188", 6'-0" AND 2 TS 8" X 6" X 0.188", 4'-6" LONG
(3)	2	SOIL PLATE: 2'-0" X 1'-6" X ¼" **
(4)	4	WOOD BREAKAWAY CRT POST: 6" X 8" X 6'-0"
(5)	6	WOOD OFFSET BLOCKS: 6' X 8" X 1'-2"
(6)	1	PIPE SLEEVE: 2" X 5 ½" STANDARD PIPE
(7)	1	BEARING PLATE
(8)	1	BCT CABLE ASSEMBLY
(9)	1	CABLE ANCHOR BOX
(10)	1	STRUT & YOKE
(11)	1	STEEL PLATE BEAM, END PANEL 12 GA. 13'-6½" LONG FOR SKT-350, ET-2000 AND ET-2000 PLUS
(12)	3	STEEL PLATE BEAM: 12 GA. 13'-6½"
(13)	1	ET-2000/ET-2000 PLUS GUARDRAIL EXTRUDER OR SKT-350 IMPACT HEAD: AS FURNISHED BY MANUFACTURER
(14)	1	0.040" ALUMINUM SHEET WITH REFLECTIVE SHEETING TYPE F PER SECTION 637 OF THE STANDARD SPECIFICATIONS
(15)	1	E.A.T. MARKER POST

GENERAL NOTES

FOLLOW MANUFACTURE'S BOLTING RECOMMENDATIONS. IF NONE ARE AVAILABLE, INSTALL ⅝" ø X 1'-6" BUTTON HEAD BOLTS AT ALL POSTS EXCEPT FOR POST 1.

(A) THE SLOPE IN THE AREA BOUNDED BY THE GRADELINE, THE HINGE POINT LINE (HPL), AND THE CLEAR ZONE LIMITS (CZL) SHALL BE 4:1 OR FLATTER.

(B) AFTER FINAL ASSEMBLY, RECHECK CABLE TO BE SURE IT IS TAUT AND HAS NOT RELAXED.

(C) THE 13 SLOT FIRST RAIL PANEL MAY BE USED IN LIEU OF THE 3 SLOT RAIL PANEL ON SKT-350 ONLY.

(D) THE TOP OF THE STEEL TUBE ON POSTS 1 THROUGH 4 SHALL NOT BE MORE THAN 3" ABOVE THE FINISH GROUND ELEVATION.

(E) THE CENTER OF THE UPPER 3½" DIAMETER HOLE ON POST 5 THROUGH 8 SHALL BE ¾" ABOVE THE FINISHED GROUND LINE.

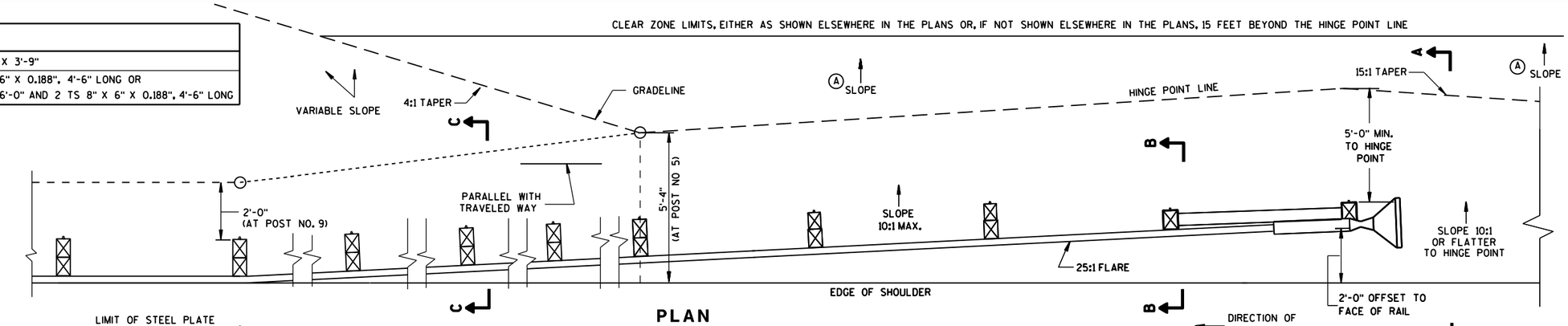
(F) ATTACH ALUMINUM SHEET TO E.A.T. HEAD USING 4 STAINLESS STEEL SELF-TAPPING SCREWS. ONE SCREW PER CORNER.

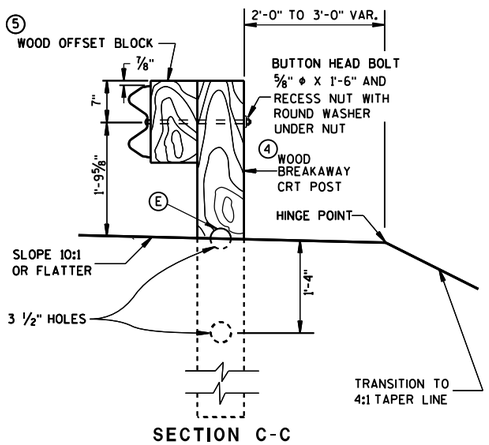
STEEL POSTS SHALL NOT BE ALLOWED FOR USE WITH ENERGY ABSORBING TERMINALS.

DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL.

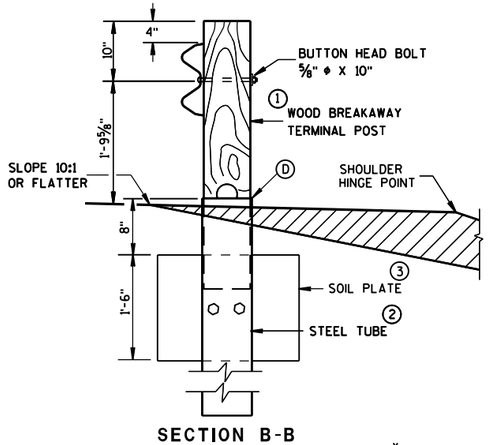
* DO NOT ATTACH BLOCKOUTS TO POSTS 1 AND 2.

** SDD SHOWS 4 - 54 INCH STEEL TUBES WITH SOIL PLATES INSTALLED ON POST 1 AND POST 2. POST 3 AND 4 DO NOT NEED SOIL PLATES. AN ALTERNATIVE INSTALLATION WOULD CONSIST OF 2 - 72 INCH STEEL TUBES ON POST 1 AND POST 2 AND 54 INCH SOIL TUBES ON POSTS 3 AND 4. THE ALTERNATIVE INSTALLATION DOES NOT REQUIRE SOIL PLATES.

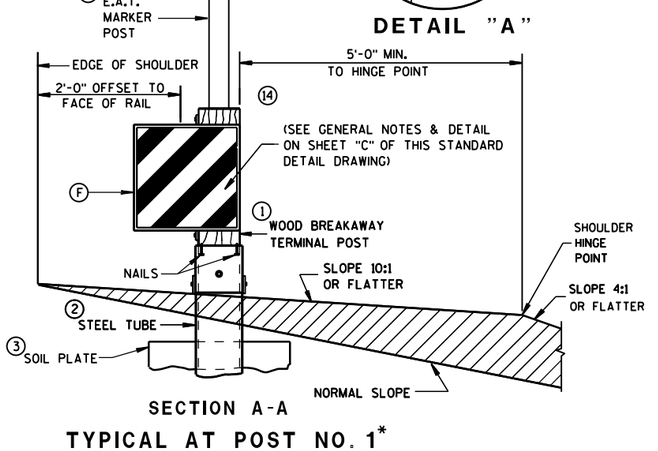




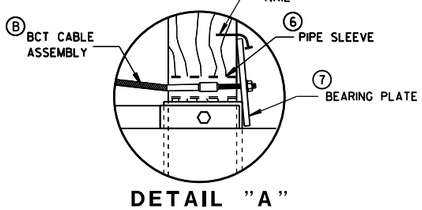
SECTION C-C
TYPICAL AT POST NOS. 6, 8



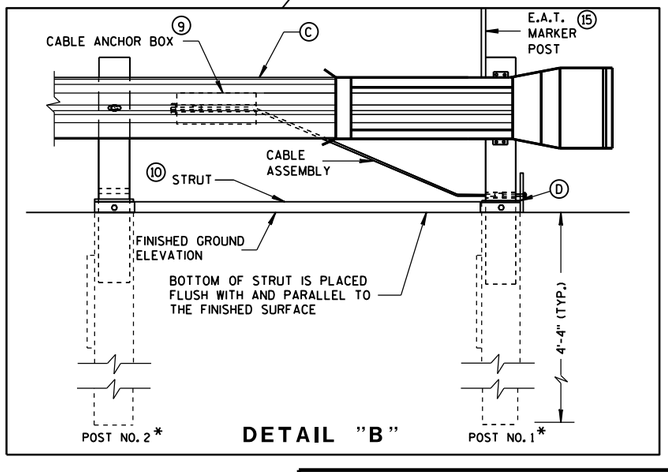
SECTION B-B
TYPICAL AT POST NO. 2*



SECTION A-A
TYPICAL AT POST NO. 1*



DETAIL "A"

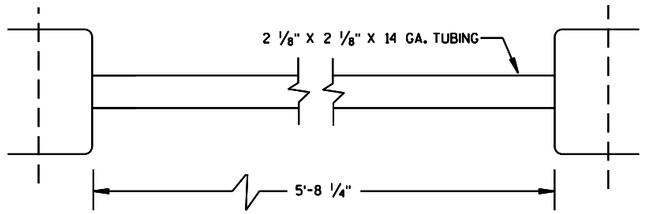


DETAIL "B"

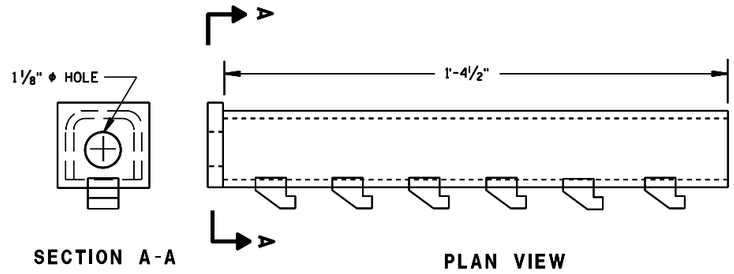
STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO

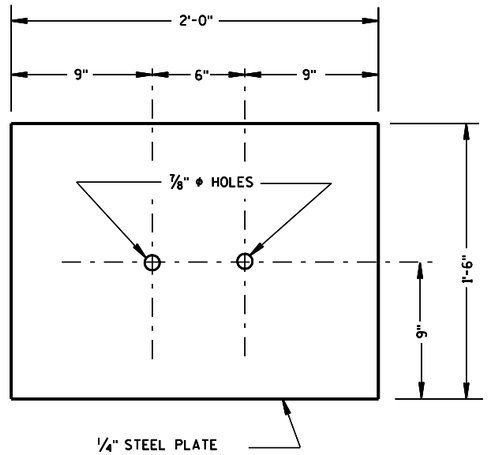
6
S.D.D. 14 B 24-8a



⑩ STRUT DETAIL (SKT-350)

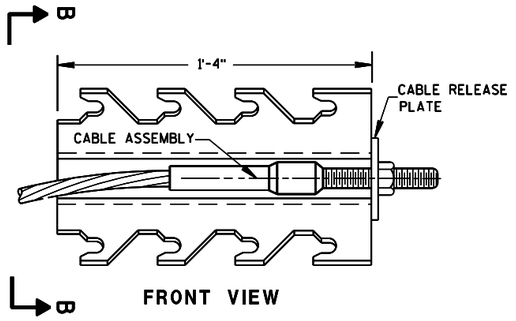


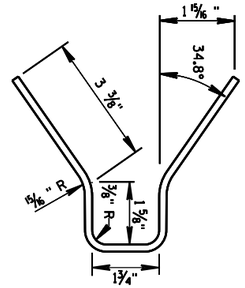
⑨ CABLE ANCHOR BOX (ET-2000/ET-2000 PLUS)



③ SOIL PLATE

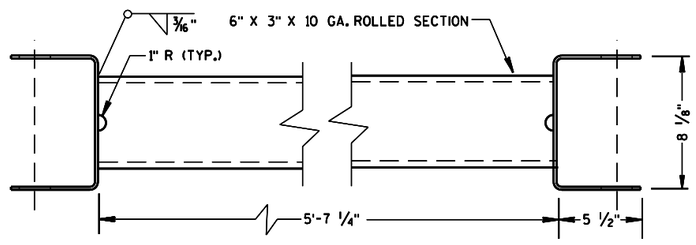
(SKT-350, ET-2000/ET-2000 PLUS)





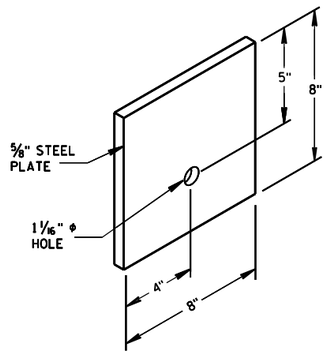
⑨ CABLE ANCHOR BOX (SKT-350)

(SKT-350)



⑩ STRUT DETAIL (ET-2000/ET-2000 PLUS)

(ET-2000/ET-2000 PLUS)



⑦ STEEL BEARING PLATE

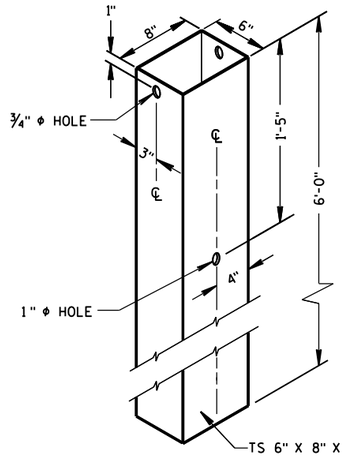
(SKT-350, ET-2000/ET-2000 PLUS)

STEEL PLATE BEAM GUARD
ENERGY ABSORBING TERMINAL

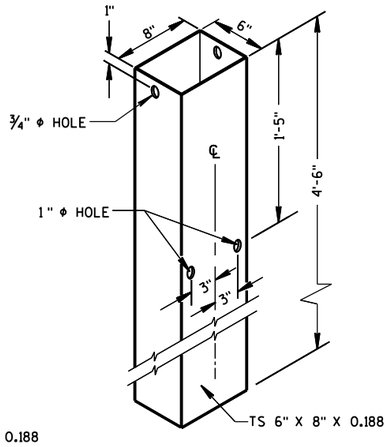
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6

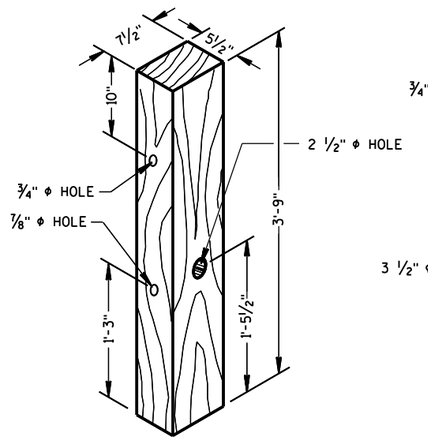
S.D.D. 14 B 24-8b



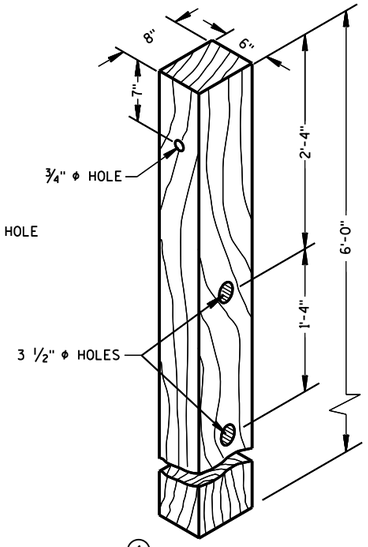
② 72" STEEL TUBE
(POSTS NO. 1-4



② 54" STEEL TUBE
(POSTS NO. 1-4



① TERMINAL POST
(POSTS NO. 1-4



④ CRT POST
(POSTS NO'S 5-8

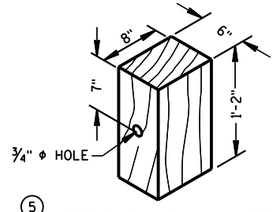
WOOD BREAKAWAY POSTS

GENERAL NOTES

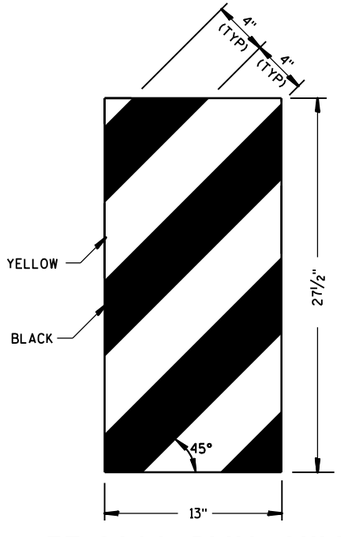
WHEN ROCK IS ENCOUNTERED DURING EXCAVATION, A 12 INCH DIA. POST HOLE EXTENDING 20 INCHES DEEP INTO THE ROCK MAY BE USED IF APPROVED BY THE ENGINEER. GRANULAR MATERIAL SHALL BE PLACED IN THE BOTTOM OF THE HOLE APPROXIMATELY 2 ½" INCHES DEEP TO PROVIDE DRAINAGE. THE SOIL TUBES SHALL BE FIELD CUT TO LENGTH, PLACED IN THE HOLE AND BACKFILLED WITH ADEQUATELY COMPACTED MATERIAL EXCAVATED FROM THE HOLE.

SEE APPROVED PRODUCTS LIST FOR ACCEPTABLE E. A. T. MARKER POST.

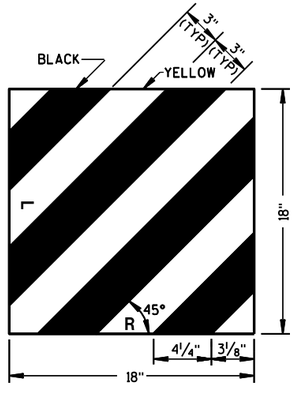
(G) ½" DIA. X 3" LAG BOLT WITH WASHER.



⑤ WOOD OFFSET BLOCK
REQ'D. AT ALL POSTS EXCEPT POST NO'S 1 & 2

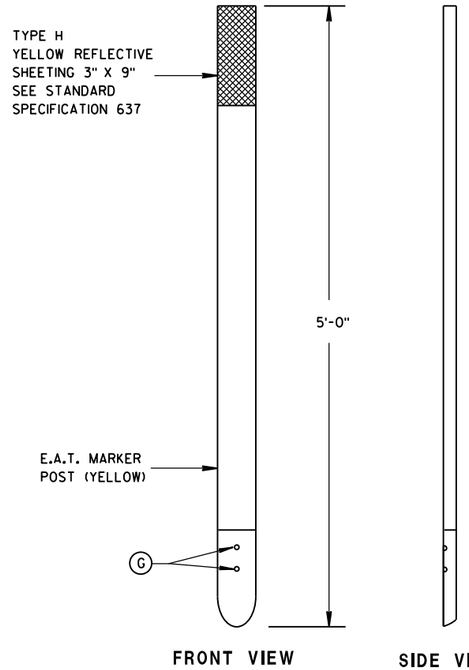


ET-2000 PLUS ONLY



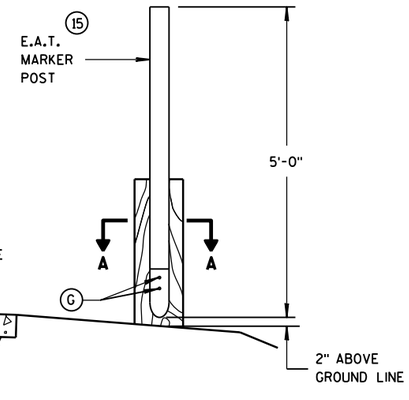
ET-2000 AND SKT-350

⑭ REFLECTIVE SHEETING DETAILS

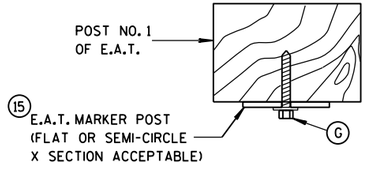


FRONT VIEW SIDE VIEW

⑮ E.A.T. MARKER POST



TYPICAL INSTALLATION OF E.A.T.
MARKER POST BACKSIDE OF POST NO. 1
(E.A.T. AND RAIL REMOVED FOR CLARITY)



SECTION A-A

STEEL PLATE BEAM GUARD
ENERGY ABSORBING TERMINAL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

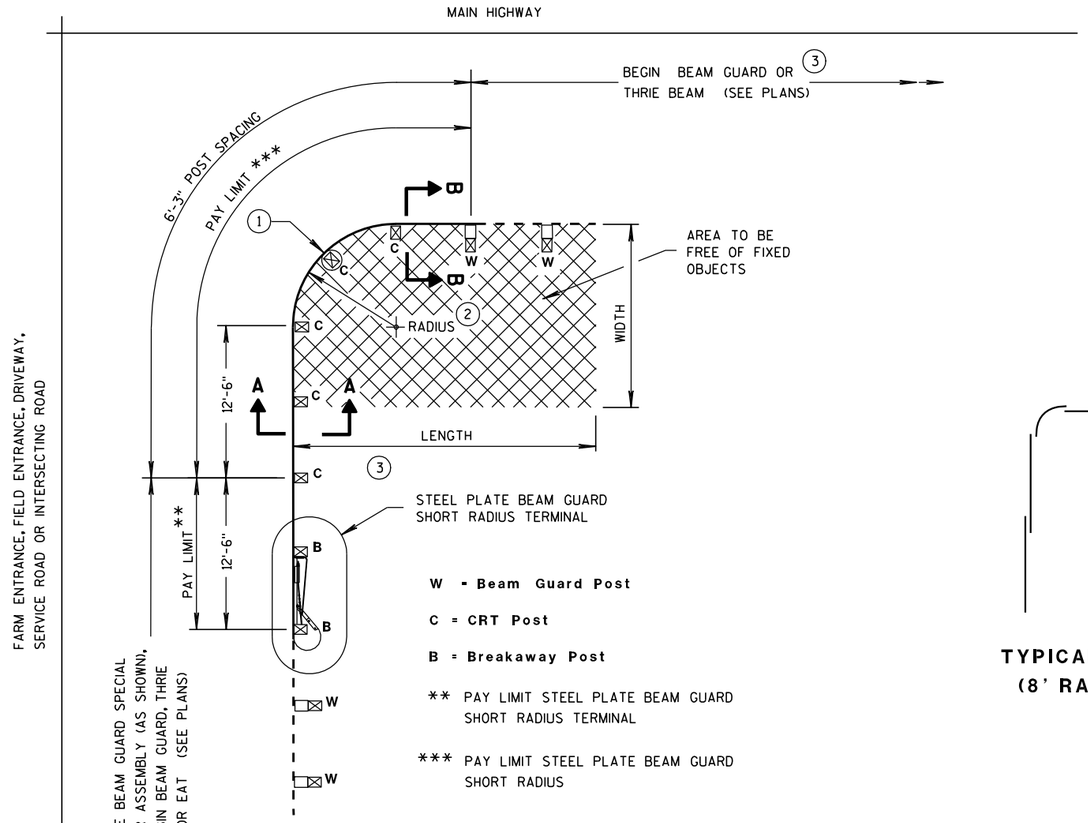
APPROVED
June 2014 — DATE
/S/ Jerry H. Zoda — ROADWAY STANDARDS ENGINEER
FHWA

6

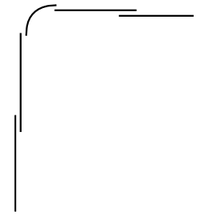
S.D.D. 14 B 24-8c

6

S.D.D. 14 B 24-8c



TYPICAL LAYOUT
(8' RADIUS SHOWN)



TYPICAL LAP SPLICES
(8' RADIUS SHOWN)

GENERAL NOTES

ALL ANGLES, CHANNELS, AND PLATES SHALL CONFORM TO THE REQUIREMENTS OF ASTM A36 AND THE STRUCTURAL TUBING SHALL CONFORM TO ASTM A 500. WELDING SHALL MEET THE CURRENT REQUIREMENTS OF THE AMERICAN WELDING SOCIETY STRUCTURAL WELDING CODE ANSI/AWS D1.1. ALL STRUCTURAL STEEL SHALL BE GALVANIZED IN ACCORDANCE WITH ASTM A 123. PUNCHING, DRILLING, CUTTING, OR WELDING WILL NOT BE PERMITTED AFTER GALVANIZING. FURNISH AND INSTALL HARDWARE PER STANDARD SPECIFICATION 614.2. UNLESS NOTED OTHERWISE.

SHOP BEND CURVED RAIL SECTIONS.

SEE STANDARD DETAIL DRAWING 14 B 15 FOR OTHER DETAIL.

(1) ON THE 8 FOOT RADIUS INSTALLATION, DO NOT INSTALL BUTTON HEAD BOLT AT CENTER CRT POST.

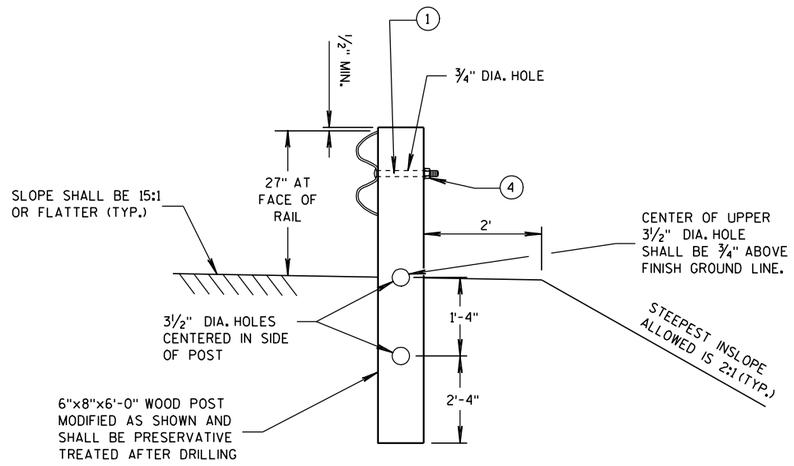
(2) RADIUS FROM 8' - 36'. SEE PLAN.

(3) HEIGHT TRANSITION MAY BE REQUIRED. SEE PLAN OR PROJECT ENGINEER.

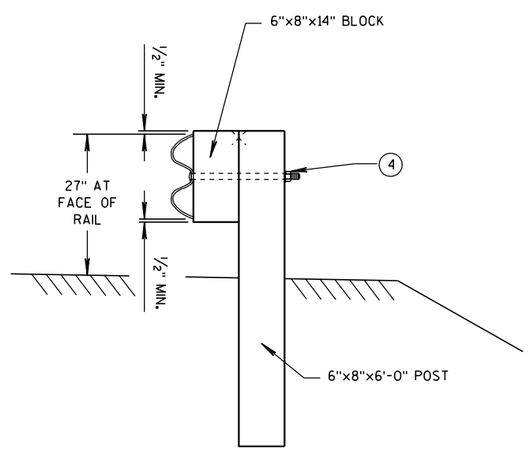
(4) 5/8" ø X 1'-6" BUTTON HEAD BOLT AND RECESS NUT WITH ROUND WASHER UNDER NUT.

RADIUS	NUMBER OF CRT POSTS	*NUMBER AND LENGTH OF CURVED RAILS	REQUIRED AREA FREE OF FIXED OBJECTS (LENGTH x WIDTH)
8'	5	1 at 12.5'	25' x 15'
16'	7	1 at 25'	30' x 15'
24'	9	1 at 25' and 1 at 12.5'	40' x 20'
32'	11	2 at 25'	50' x 20'

* THE NUMBER OF RAILS IS BASED ON A 90° INTERSECTION. SEE PLAN FOR NON 90° INSTALLATIONS.



SECTION A-A
(CRT POST)



SECTION B-B
(BEAM GUARD POST)

STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL

STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL

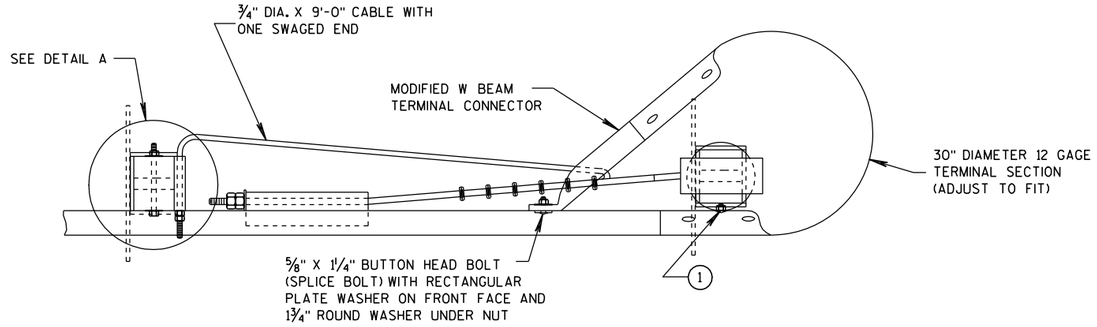
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

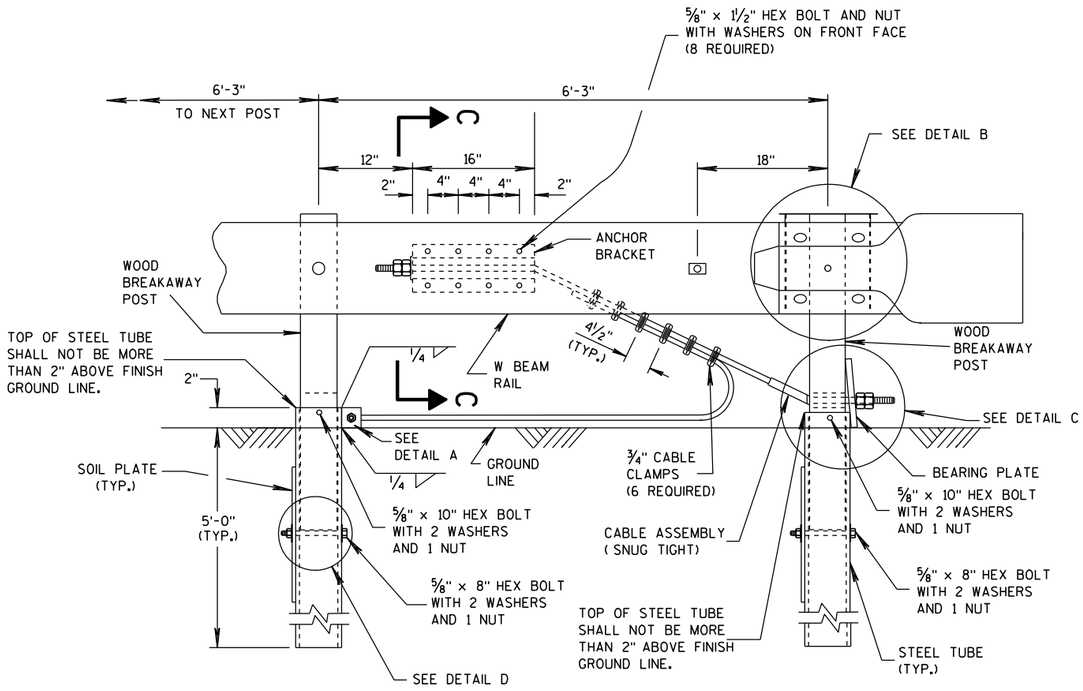
S.D.D. 14 B 27-1a

6

S.D.D. 14 B 27-1a



PLAN VIEW



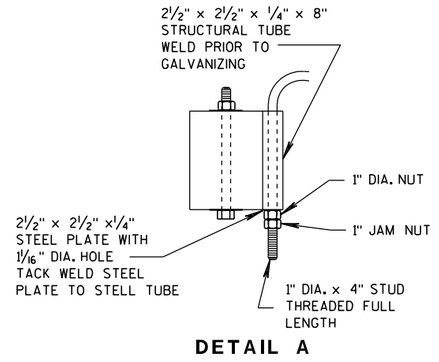
ELEVATION VIEW

STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL

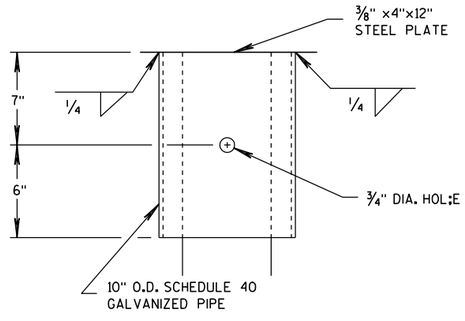
GENERAL NOTES

(1) ATTACH W BEAM RAIL TO THE STEEL PIPE WITH A ⅝" X 2" BUTTON HEAD BOLT WITH NO WASHER. CONNECTION TO THE POST IS NOT REQUIRED.

INSTALL GALVANIZED ¾" (6X19) PREFORMED WIRE OR INDEPENDENT WIRE ROPE CORE CONFORMING TO AASHTO M 30. MANUFACTURE WIRE ROPE OUT OF IMPROVED PLOW STEEL WITH A MINIMUM BREAKING STRENGTH OF 42,800 PSI.



DETAIL A



DETAIL B

(BEAM GUARD AND TERMINAL SECTION NOT SHOWN)

STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL

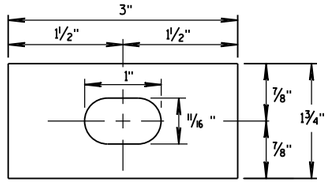
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

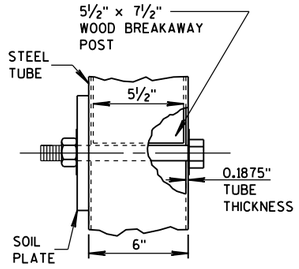
S.D.D. 14 B 27-1b

6

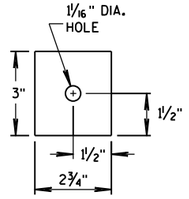
S.D.D. 14 B 27-1b



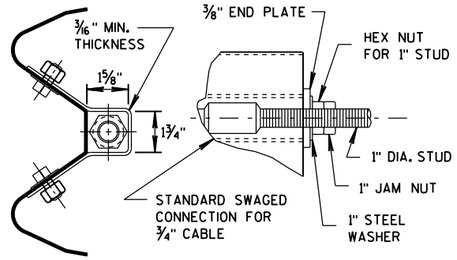
RECTANGULAR PLATE WASHER



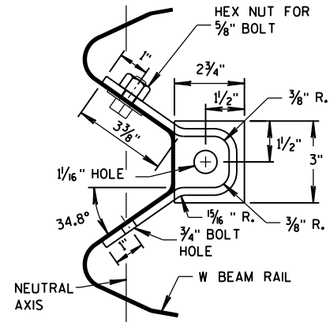
DETAIL D



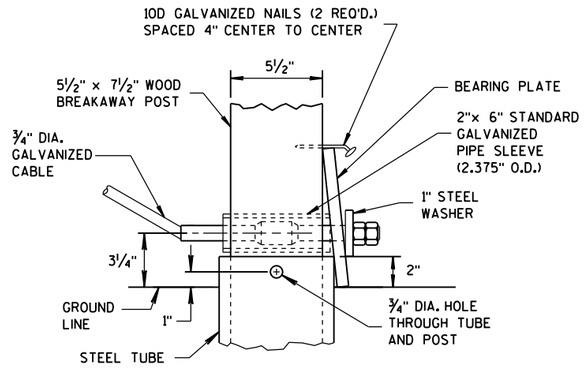
END PLATE



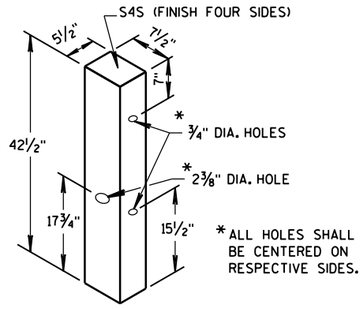
SECTION C-C
(END PLATE REMOVED)



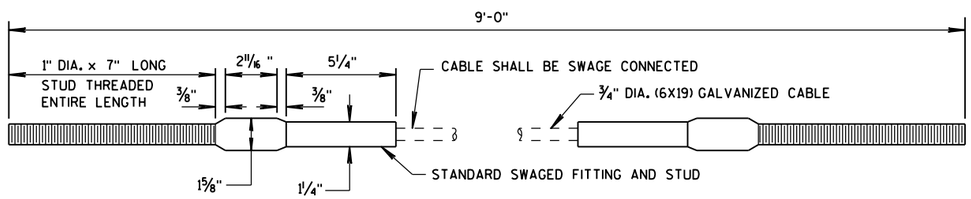
ANCHOR BRACKET



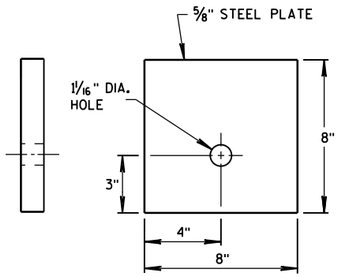
DETAIL C



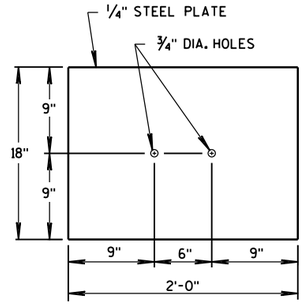
WOOD BREAKAWAY POST



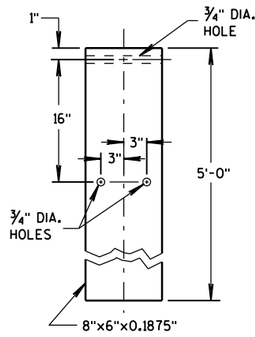
CABLE ASSEMBLY



BEARING PLATE



SOIL PLATE



STEEL TUBE

STEEL PLATE BEAM GUARD SHORT RADIUS TERMINAL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
12/18/08 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

6

S.D.D. 14 B 27-1c

6

S.D.D. 14 B 27-1c

GENERAL NOTES

1. WOOD OR STEEL POSTS (w6X9 OR w6X8.5) MAY BE USED. DO NOT INTERMIX WOOD AND STEEL POSTS. INSTALL STEEL POSTS WITH HOLES ON APPROACHING TRAFFIC SIDE.

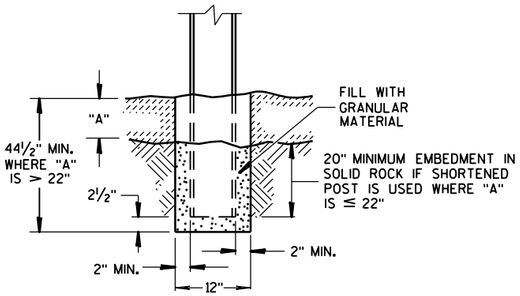
2. USE WOOD OR APPROVED PLASTIC BLOCKOUTS. WOOD BLOCKOUTS MAY BE CONSTRUCTED OUT OF TWO OR MORE WOOD BLOCKOUTS. SEE ALTERNATE WOOD BLOCKOUT DETAIL. DIMENSIONS OF APPROVED PLASTIC BLOCKOUTS MAY VARY.

3. IF ROCK IS ENCOUNTERED DURING EXCAVATION, PROVIDE A HOLE 12 INCHES IN DIAMETER EXTENDING 20 INCHES DEEP INTO THE ROCK. PLACE APPROXIMATELY 2½ INCHES OF GRANULAR MATERIAL IN THE BOTTOM OF THE HOLE. CUT THE POSTS THE TO LENGTH AMD INSTALL. BACKFILL WITH EXCAVATED MATERIAL AND COMPACT. BACKFILL IS TO BE FREE OF LARGE ROCKS.

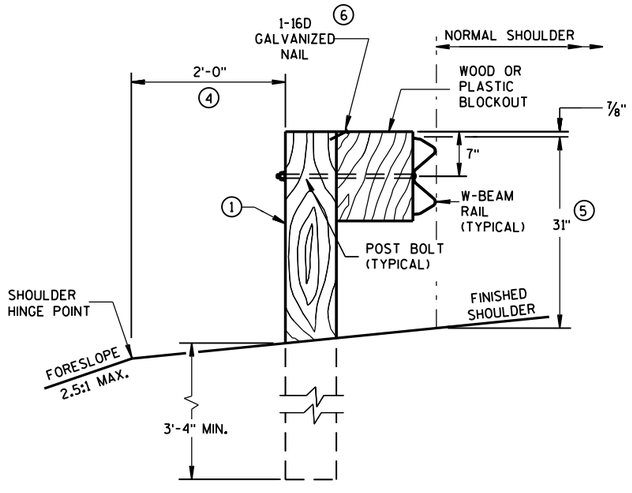
4. WHEN THE DISTANCE FROM BACK OF POST TO SHOULDER HINGE POINT IS LESS THAN 2 FEET INSTALL LONGER POST AT HALF POST SPACING (K).

5. FOR NEW MGS INSTALLATION TOP OF W-BEAM RAIL TOLERANCE IS ± 1". FOR EXISTING MGS INSTALLATION TOP OF W-BEAM IS BETWEEN 27¾" TO 32".

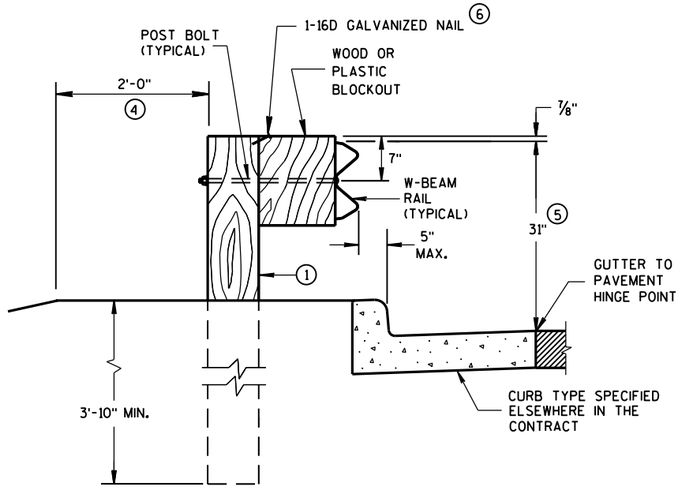
6. WHEN USING STEEL POST AND WOOD BLOCKOUTS INSTALL FOUR 16D GALVANIZED NAILS. INSTALL NAILS AT THE BACK CORNERS OF THE BLOCK AND BEND THE NAILS OVER THE FLANGE OF THE STEEL POST.



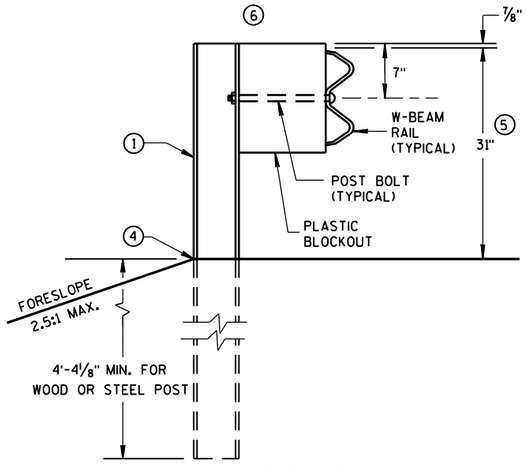
END VIEW
SETTING STEEL OR WOOD POST IN ROCK (3)



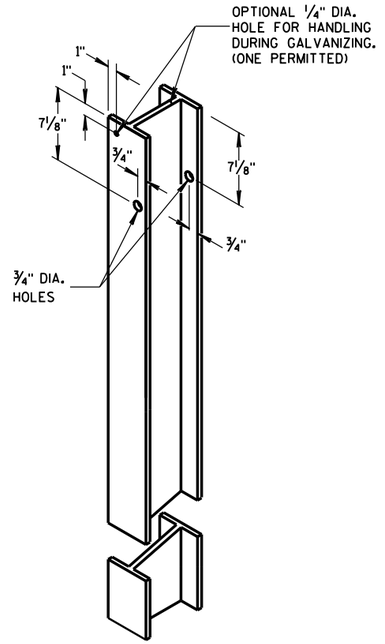
END VIEW
LOCATED ALONG A ROADWAY SHOULDER
STANDARD INSTALLATION



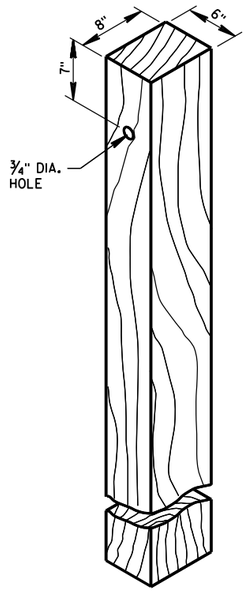
END VIEW
LOCATED ALONG A CURBED ROADWAY



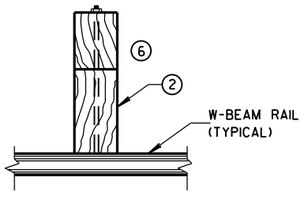
END VIEW
MGS LONGER POST AT HALFPOST SPACING W BEAM (K)



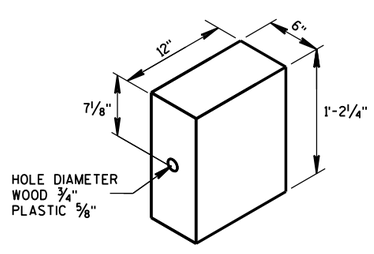
STEEL POST &
HOLE PUNCHING DETAIL
(w6X9) (1)



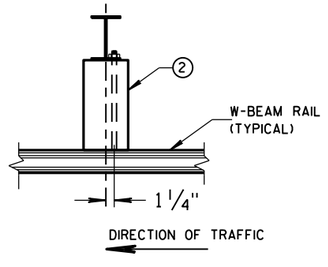
WOOD POST
(6" X 8") NOMINAL (1)



PLAN VIEW
WOOD POST,
BLOCKOUT & BEAM



WOOD OR
PLASTIC BLOCKOUT (2)

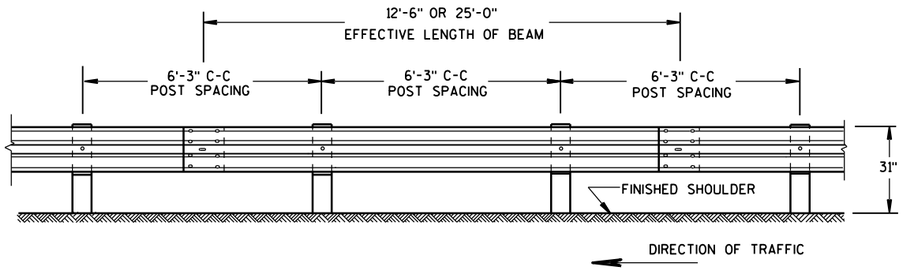


PLAN VIEW
STEEL POST,
PLASTIC BLOCKOUT & BEAM

MIDWEST GUARDRAIL SYSTEM
(MGS) GUARDRAIL

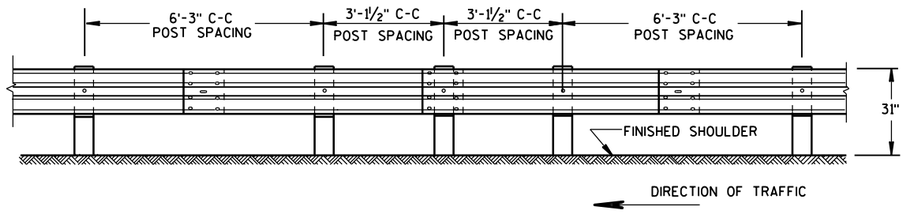
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6
S.D.D. 14 B 42-3a



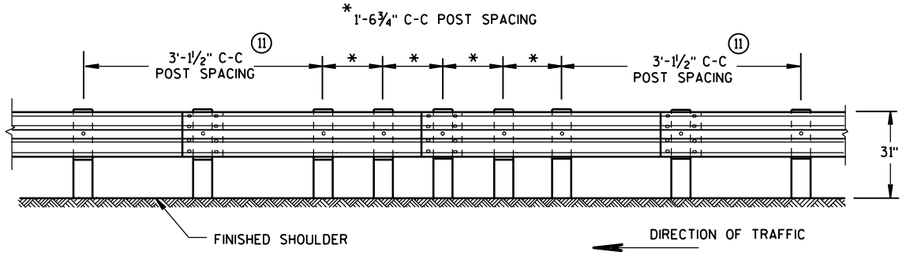
FRONT VIEW

POST SPACING STANDARD INSTALLATION



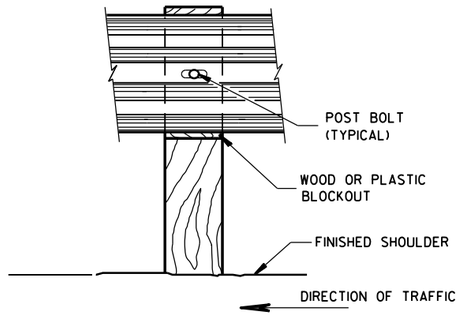
FRONT VIEW

HALF POST SPACING (HS) AND HALF POST SPACING WITH LONGER POSTS (K)

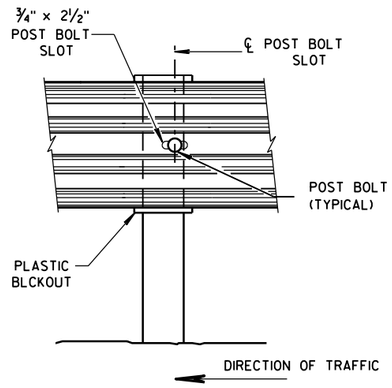


FRONT VIEW

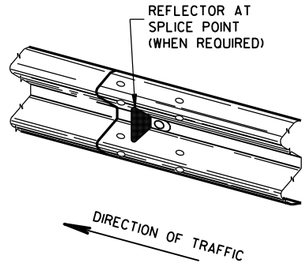
QUARTER POST SPACING (QS)

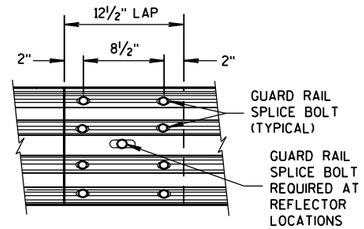


FRONT VIEW AT WOOD POST



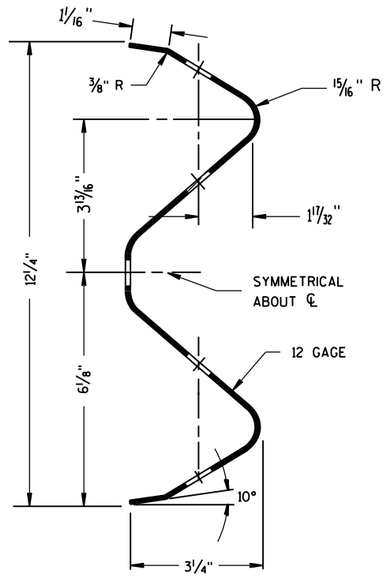
FRONT VIEW AT STEEL POST



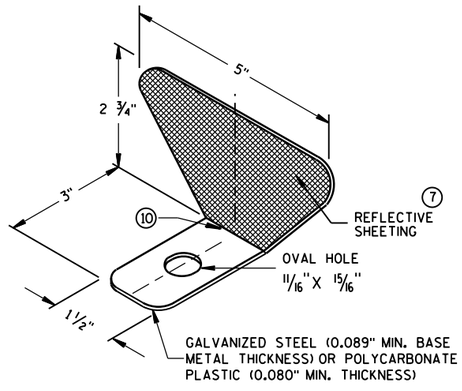


FRONT VIEW

MID-SPAN BEAM SPLICE



SECTION THRU W-BEAM RAIL



ONE SIDED REFLECTOR DETAIL AND TYPICAL INSTALLATION ⑦

GENERAL NOTES

⑦ PROVIDE SILVER REFLECTIVE SHEETING ON ALL REFLECTORS EXCEPT THOSE LOCATED ALONG THE LEFT EDGE OF ONE-WAY ROADWAYS, WHICH SHALL BE PROVIDED WITH YELLOW REFLECTIVE SHEETING. SHEETING IS TYPE H. SEE STANDARD SPECIFICATION 637.

⑧ DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL. RAIL SPLICE LOCATIONS ARE THE ONLY ACCEPTABLE LOCATIONS FOR REFLECTORS.

⑨ REVERSE EVERY OTHER REFLECTOR FOR 2-WAY VISIBILITY. THE CONTRACTOR MAY FURNISH TWO-SIDED REFLECTORS IN LIEU OF ONE-SIDED REFLECTORS.

⑩ PROVIDE AN ANGLE OF BEND OF 90° ± 1° FOR TWO-SIDED REFLECTORS.

⑪ 25 FEET OF HALF POST SPACING IS REQUIRED ON APPROACH AND DEPARTURE ENDS OF QUARTER POST SPACING.

POST BOLTS ARE A ⅝" DIAMETER ASTM A307 GUARDRAIL BOLT. A POST BOLT REQUIRES ⅝" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX NUT AND ⅝" DIAMETER F844 FLAT WASHER. POST BOLTS MAY BE LONGER IF MULTIPLE BLOCKOUTS ARE BEING USED.

GUARD RAIL SPLICE BOLTS ARE A ⅝" DIAMETER ASTM A307 GUARDRAIL HEAD BOLT. A GUARDRAIL SPLICE BOLT REQUIRES ⅝" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX NUT.

REFLECTOR SPACING ⑧

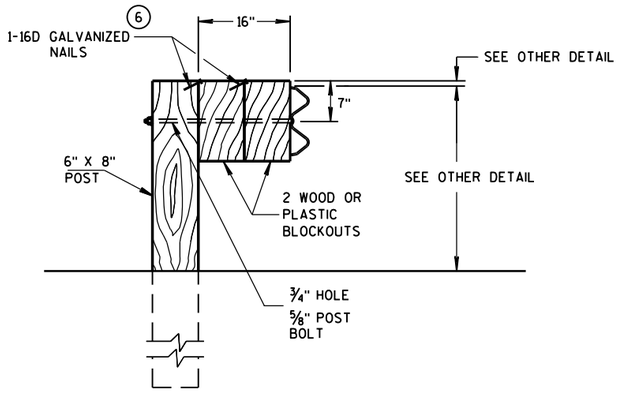
	BEAM GUARD LENGTH	REFLECTOR SPACING	NO. SURFACES REFLECTORIZED	MIN. NO. REFLECTORS
ONE WAY TRAFFIC	< 200' > 200'	50' C-C 100' C-C	1 1	3
TWO WAY TRAFFIC	< 200' > 200'	25' C-C 50' C-C	1 ⑨ 1	6
TWO WAY TRAFFIC	< 200' > 200'	50' C-C 100' C-C	2 2 ⑩	3

MIDWEST GUARDRAIL SYSTEM
(MGS) GUARDRAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO

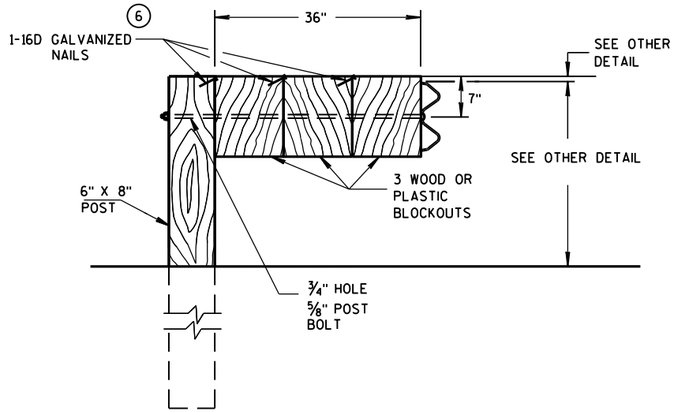
6

S.D.D. 14 B 42-3b



DETAIL FOR 16" BLOCKOUT DEPTH

IT IS ACCEPTABLE TO USE BLOCKOUTS UP TO 16" DEEP TO INCREASE THE POST OFFSET TO AVOID UNDERGROUND OBSTACLES. THERE IS NO LIMIT TO THE NUMBER OF POSTS THAT CAN HAVE ADDITIONAL BLOCKOUTS UP TO 16" DEEP.

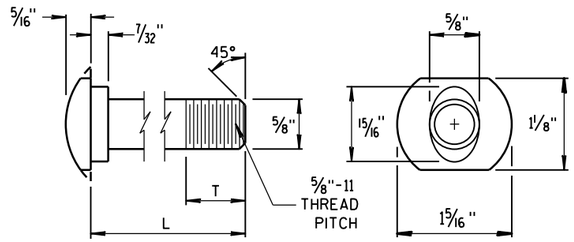


DETAIL FOR 36" BLOCKOUT DEPTH

NOTES: UNDER SPECIAL CIRCUMSTANCES, SUCH AS AVOIDING OBSTACLES THAT ARE NOT RELOCATED, IT IS ACCEPTABLE TO INSTALL ADDITIONAL BLOCKOUTS TO OBTAIN UP TO 36" DEPTH FOR ONE OR TWO POSTS IN A SECTION OF GUARDRAIL.

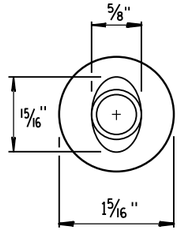
DO NOT USE 16" OR 36" BLOCKOUTS IF IT CAUSES THE POST TO BE DRIVEN BEYOND SHOULDER HINGE POINT OR CAUSES A FIXED OBJECT TO BE WITHIN THE DEFLECTION DISTANCE OF THE BARRIER.

NOTE: 1. ALL FILLETS SHALL HAVE A MINIMUM RADIUS OF 1/16".
2. IF THE BOLT EXTENDS MORE THAN 1/4" FROM THE NUT THE BOLT SHOULD BE TRIMMED BACK.

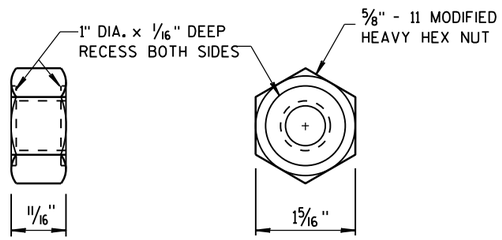


POST BOLT TABLE

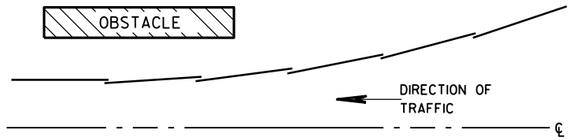
L	T (MIN.)
1 1/4"	1 1/8"
2"	1 3/4"
10"	4"
14"	4 1/16"
18"	4"
21"	4 1/16"
25"	4"



ALTERNATE BOLT HEAD

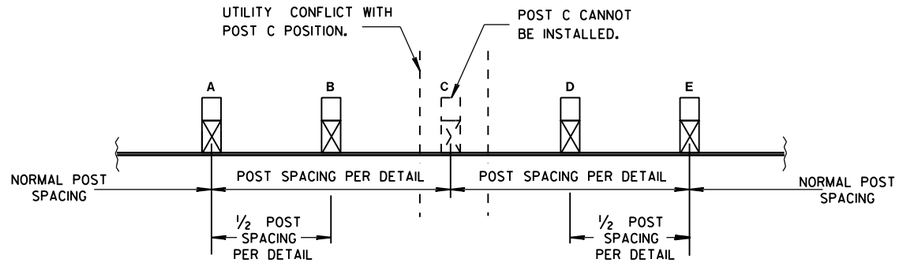


POST BOLT AND RECESS NUT

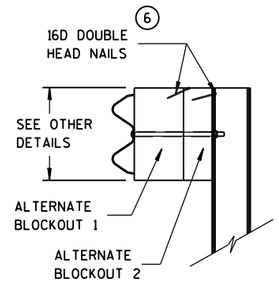


PLAN VIEW

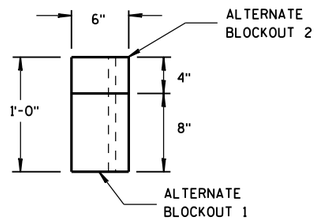
BEAM LAPPING DETAIL



POST DRIVING FOR CONTINUOUS UNDERGROUND OBSTRUCTION



SIDE VIEW



TOP VIEW

ALTERNATE WOOD BLOCKOUT DETAIL

MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June 2014 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

6
S.D.D. 14 B 42-3c

GENERAL NOTES

(A) THE SLOPE IN THE AREA BOUNDED BY THE GRADELINE, THE HINGE POINT LINE (HPL), AND THE CLEAR ZONE LIMITS (CZL) SHALL BE 4:1 OR FLATTER.

(B) AFTER FINAL ASSEMBLY, RECHECK CABLE TO BE SURE IT IS TAUT AND HAS NOT RELAXED.

(C) DIFFERENT MANUFACTURES REQUIRE DIFFERENT PERFORATED W-BEAM RAIL END PANELS. SEE MANUFACTURES INFORMATION.

(D) THE TOP OF THE STEEL TUBE ON POST 1 AND POST 2 SHALL NOT BE MORE THAN 3" ABOVE THE FINISH GROUND ELEVATION.

(F) ATTACH ALUMINUM SHEET TO E.A.T. HEAD USING 4 STAINLESS STEEL SELF-TAPPING SCREWS. ONE SCREW PER CORNER.

(G) ½" DIAMETER X 3" LONG LAG BOLT AND WASHER.

(H) HARDWARE VARIES BETWEEN DIFFERENT MANUFACTURES. SEE MANUFACTURE'S DRAWING FOR INFORMATION.

(I) DIMENSIONS MAY VARY. SEE MANUFACTURE'S INFORMATION.

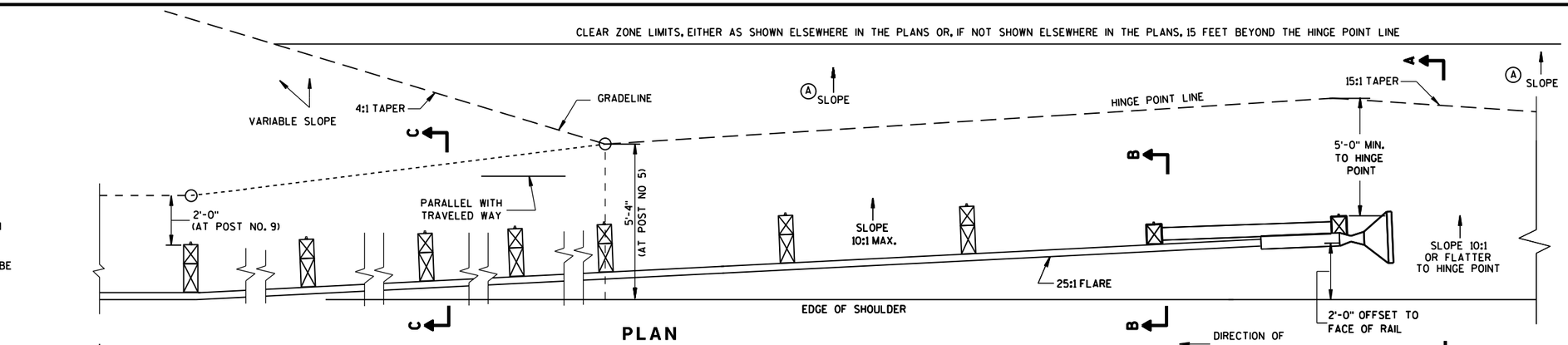
SEE SDD 14B42 FOR MORE INFORMATION.

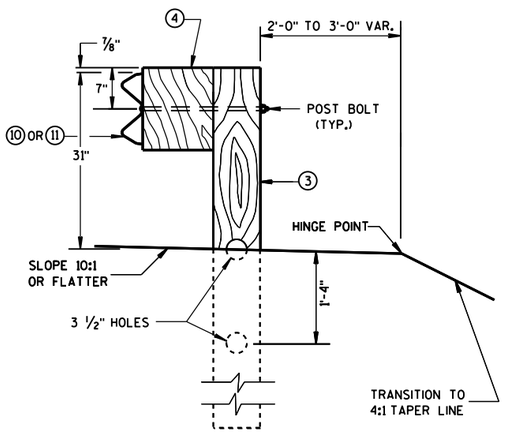
* DO NOT ATTACH BLOCKOUTS TO POSTS 1 AND 2.

DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL.

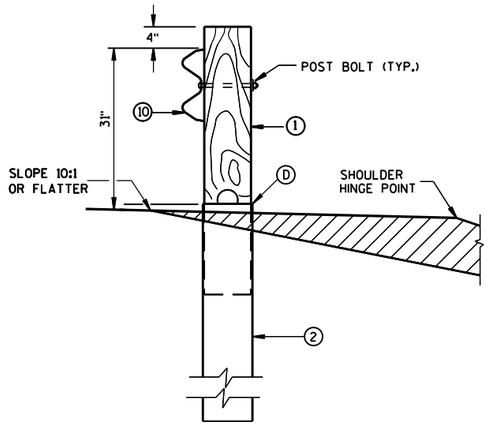
W-BEAM RAIL SPLICES ARE LOCATED AT POST NUMBER 3, AND BETWEEN POST 5 AND 6, BETWEEN POSTS 7 AND 8, AND MIDDLE OF THE SPAN AFTER POST 9.

THE CENTER OF THE UPPER 3½" DIAMETER HOLE ON POST NUMBER 3 THROUGH POST 9 IS TO BE FLUSH WITH THE GROUND LINE UP TO A MAXIMUM OF 2" ABOVE GROUND LINE.

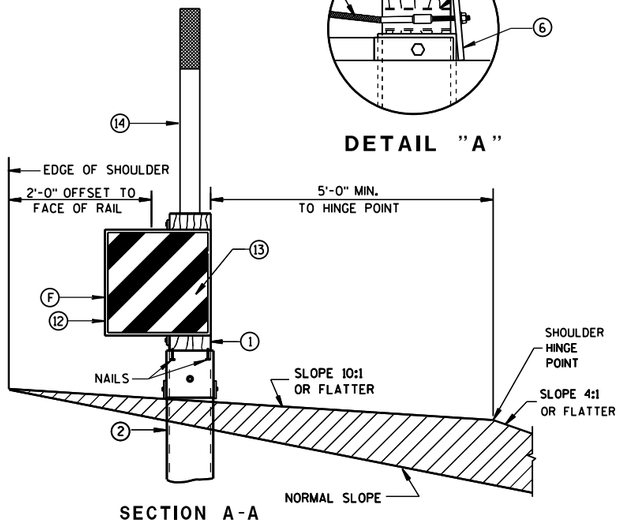




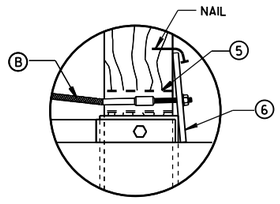
SECTION C-C
TYPICAL AT POST NOS. 3-9



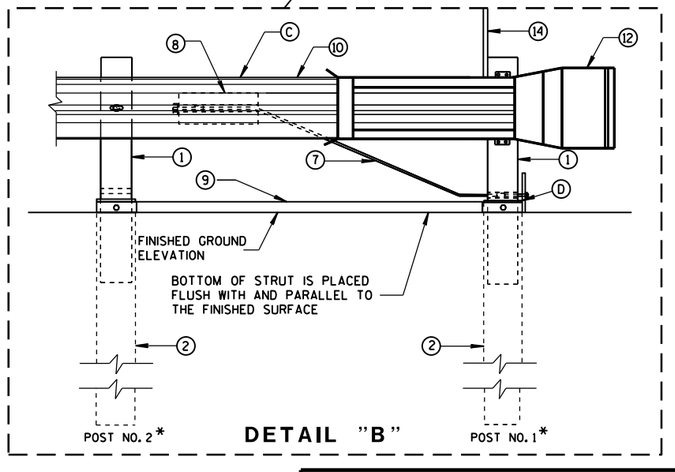
SECTION B-B
TYPICAL AT POST NO. 2*



SECTION A-A
TYPICAL AT POST NO. 1*



DETAIL "A"



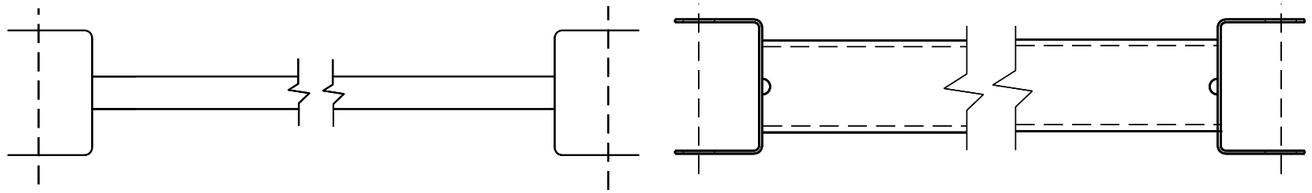
DETAIL "B"

MIDWEST GUARDRAIL SYSTEM
ENERGY ABSORBING TERMINAL (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO

S.D.D. 14 B 44-2a

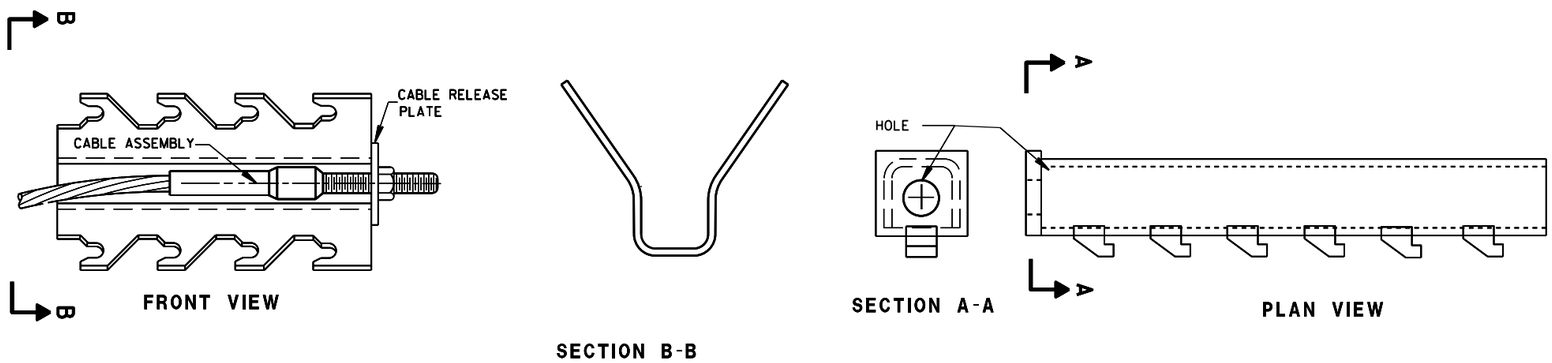
S.D.D. 14 B 44-2a



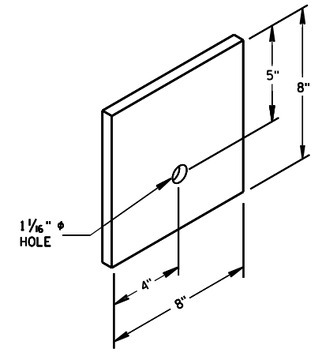
GENERIC GROUND STRUT (9) (H)

BILL OF MATERIALS

PART NO.	DESCRIPTION MATERIALS PROVIDED BY MGS EAT MANUFACTURER. SEE MANUFACTURER'S DETAILS FOR MORE INFORMATION.
(1)	WOOD BREAKAWAY POST
(2)	6" X 8" X 0.188", 6'-0" LONG FOUNDATION TUBE AT POSTS 1 AND 2
(3)	WOOD CRT
(4)	WOOD BLOCKOUT
(5)	PIPE SLEEVE
(6)	BEARING PLATE
(7)	BCT CABLE ASSEMBLY
(8)	ANCHOR CABLE BOX
(9)	GROUND STRUT
(10)	PERFORATED W-BEAM RAIL END PANEL, 12'-6" LONG.
(11)	STANDARD W-BEAM RAIL. MULTIPLE SECTIONS REQUIRED. SECTIONS VARY IN LENGTH.
(12)	END SECTION EAT
(13)	0.040" ALUMINUM SHEET WITH REFLECTIVE SHEETING TYPE F PER SECTION 637 OF THE STANDARD SPECIFICATIONS
(14)	EAT MARKER POST - YELLOW (SEE APPROVED PRODUCTS LIST)



GENERIC ANCHOR CABLE BOX (8) (H)

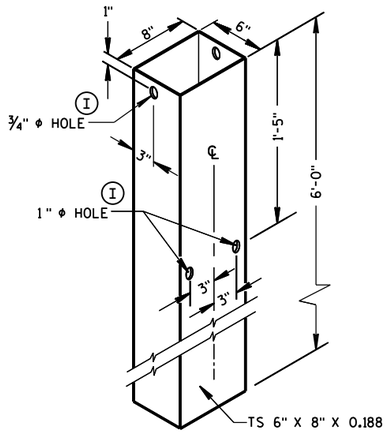


BEARING PLATE (6)

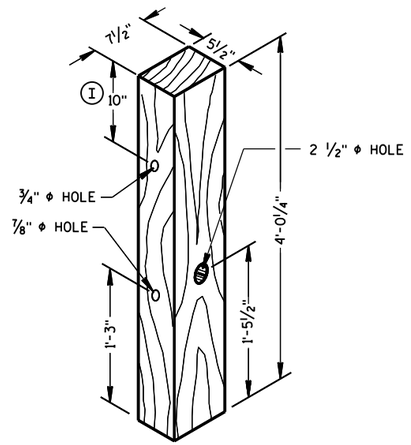
MIDWEST GUARDRAIL SYSTEM
ENERGY ABSORBING TERMINAL
(MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

6
S.D.D. 14 B 44-2b

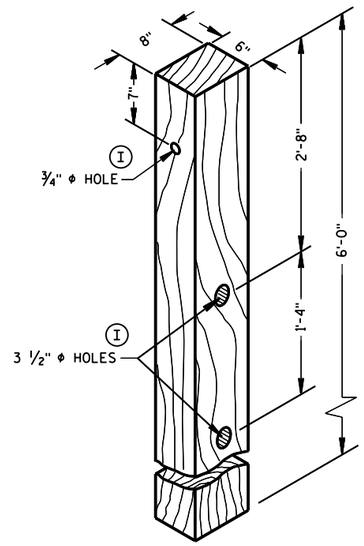


FOUNDATION TUBE (2)



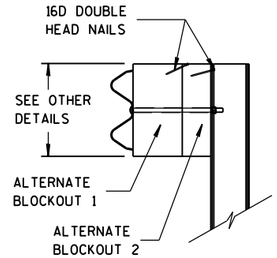
POSTS NUMBER 1 AND 2

WOOD BREAKAWAY POST (1)

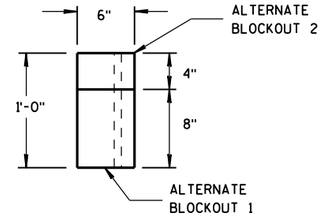


POSTS NUMBER 3-9

WOOD CRT POST (3)

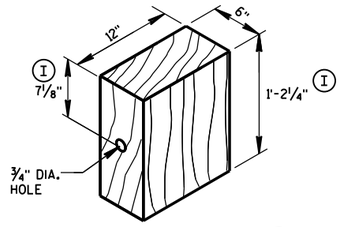


SIDE VIEW



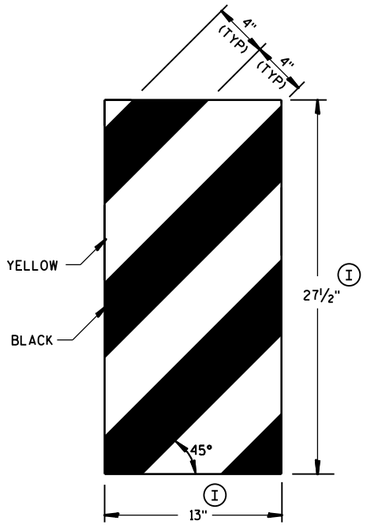
TOP VIEW

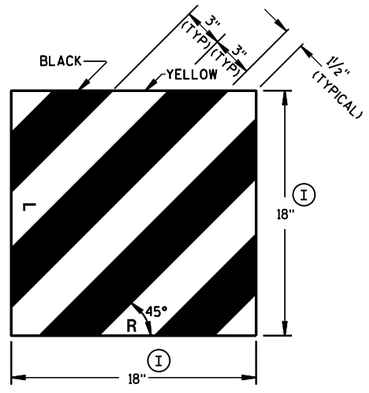
ALTERNATE WOOD BLOCKOUT DETAIL



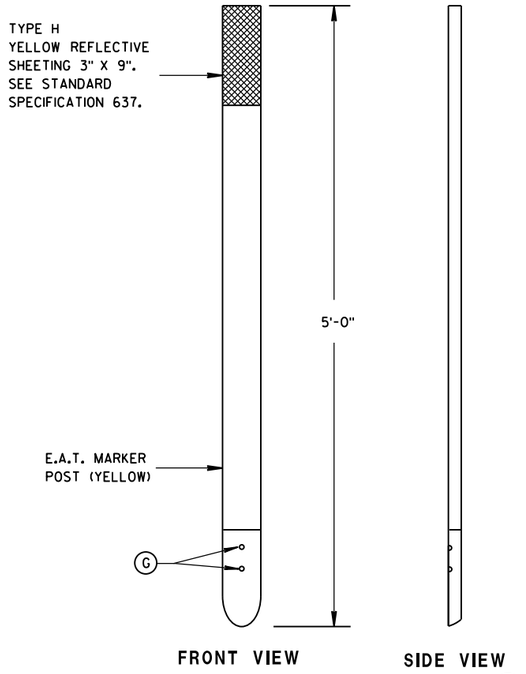
WOOD BLOCKOUT (4)

REQ'D. AT ALL POSTS EXCEPT POST NO'S 1 & 2





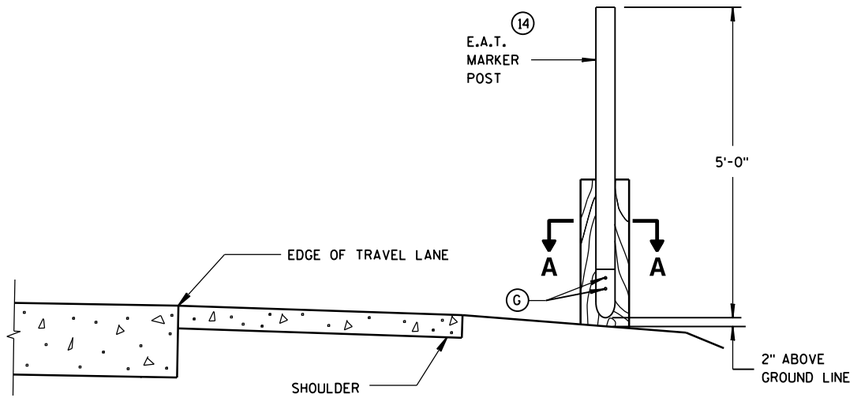
GENERIC REFLECTIVE SHEETING (13) (H)



FRONT VIEW

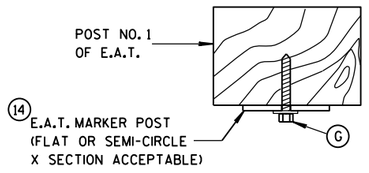
SIDE VIEW

E.A.T. MARKER POST (14)



TYPICAL INSTALLATION OF E.A.T. MARKER POST BACKSIDE OF POST NO. 1

(E.A.T. AND RAIL REMOVED FOR CLARITY)



SECTION A-A

MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)

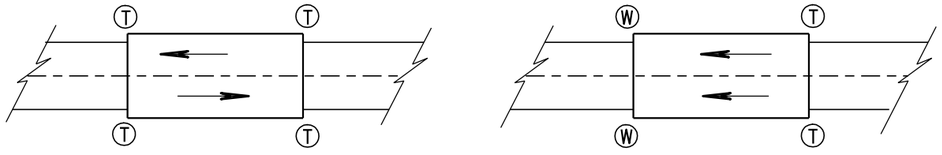
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
June 2014
DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS ENGINEER

FHWA

6

S.D.D. 14 B 44-2c



TWO WAY TRAFFIC

ONE WAY TRAFFIC

Ⓣ THRIE BEAM CONNECTION

Ⓦ W-BEAM CONNECTION WHEN REQUIRED

TYPICAL LOCATIONS OF THRIE BEAM AND W-BEAM CONNECTIONS TO BRIDGE

GENERAL NOTES

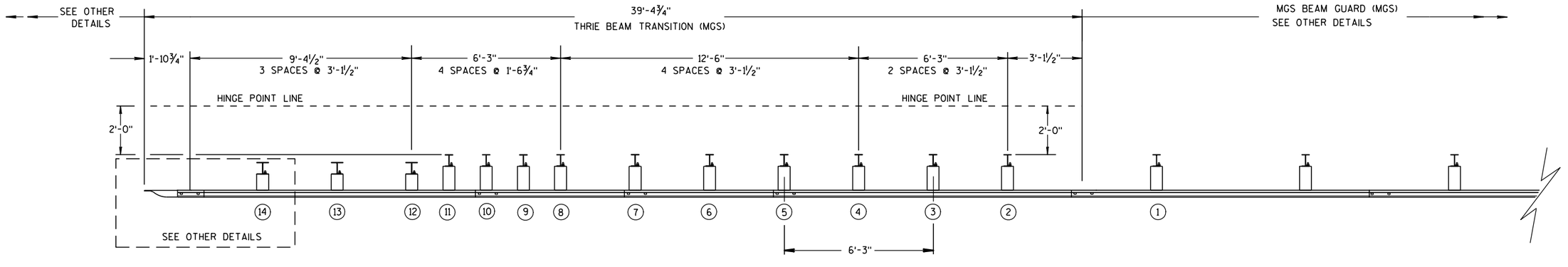
BOLT THE THRIE BEAM TO ALL POSTS AND BLOCKOUTS. DRILL OR PUNCH BOLT HOLES IN THE BEAM IF THE POST SPACING IS LESS THAN 6'-3.

IF ROCK IS ENCOUNTERED, REMOVE ROCK TO FULL DEPTH OF POST PLUS 2½", AND 12" DIAMETER AROUND POST. SEE 14B42 FOR MORE DETAILS.

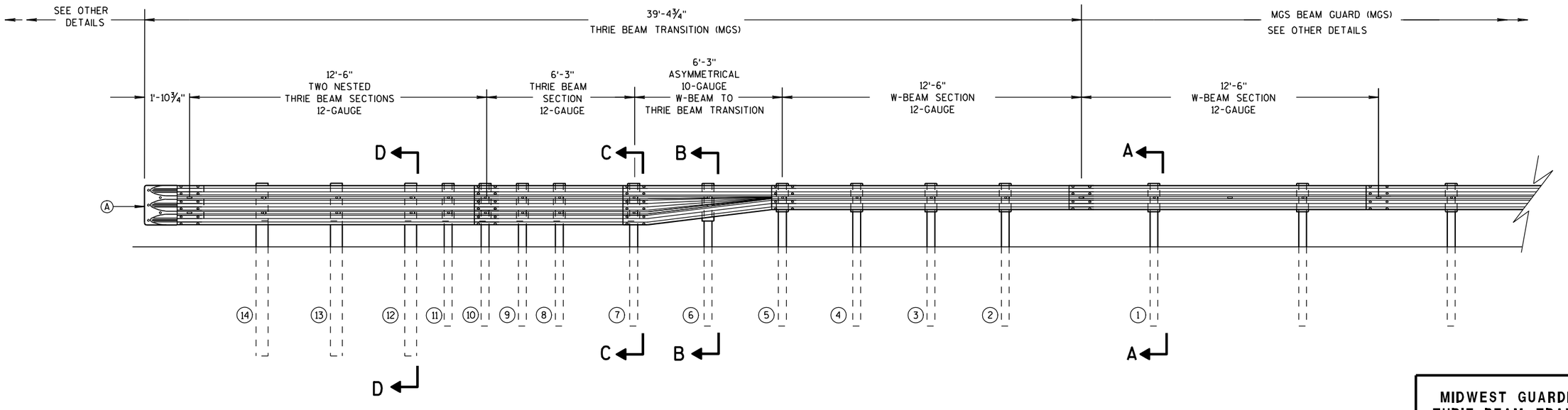
TRANSITION USES STEEL POSTS ONLY.

SEE STANDARD DETAIL DRAWING 14 B 42 FOR MORE INFORMATION.

Ⓐ BRIDGE RAILING TYPE "W" DOES NOT REQUIRE A TERMINAL CONNECTOR.



PLAN VIEW



ELEVATION VIEW

MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION

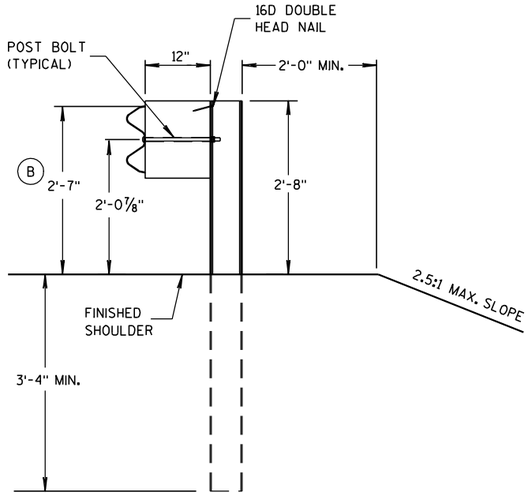
MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6
S.D.D. 14 B 45-3a

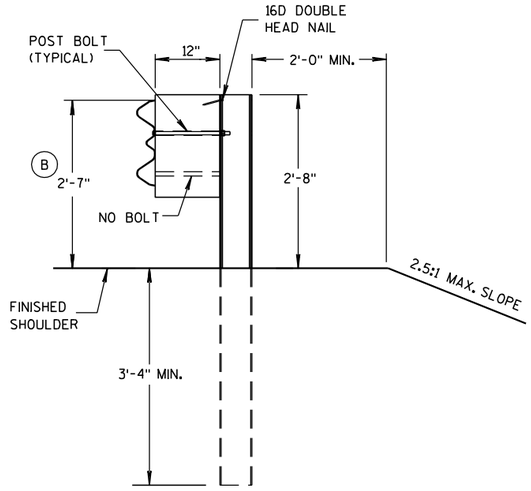
GENERAL NOTES

(B) TOLERANCE FOR TOP OF W-BEAM RAIL IS ± 1".



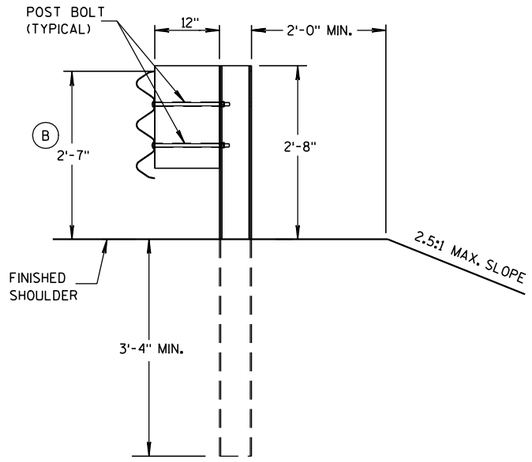
SECTION A-A

POSTS 1-5



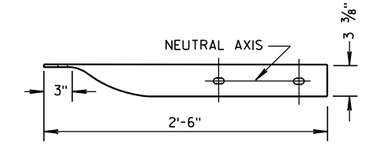
SECTION B-B

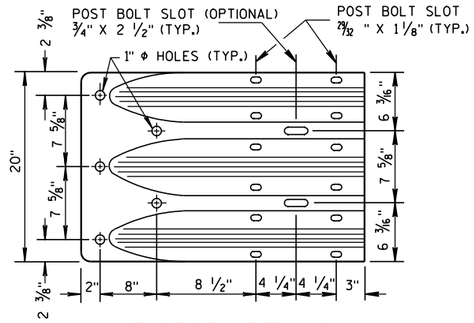
POST 6



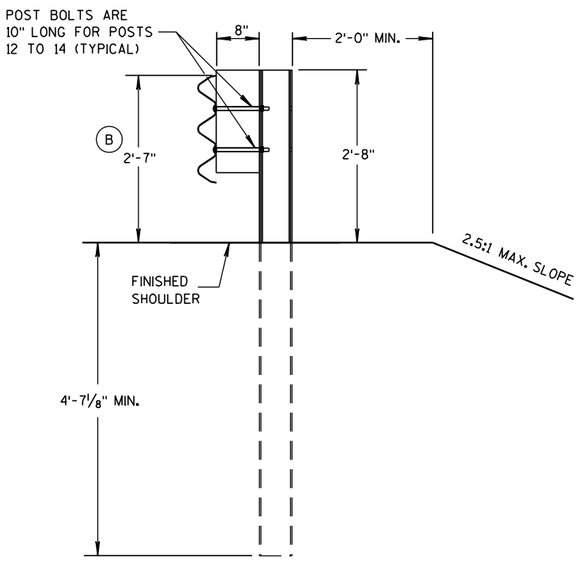
SECTION C-C

POSTS 7-11





THRIE BEAM TERMINAL CONNECTOR



SECTION D-D

POSTS 12-14

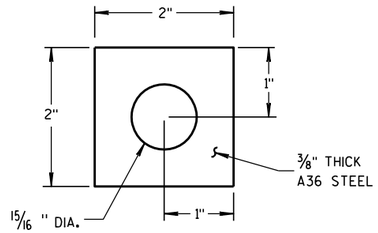
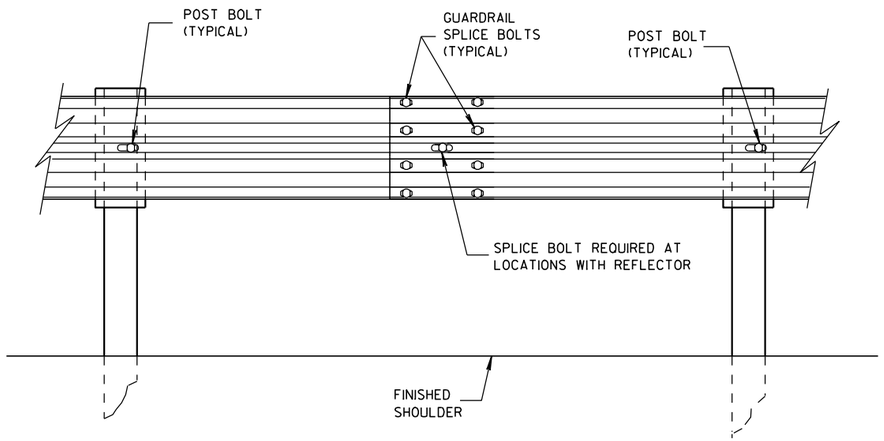
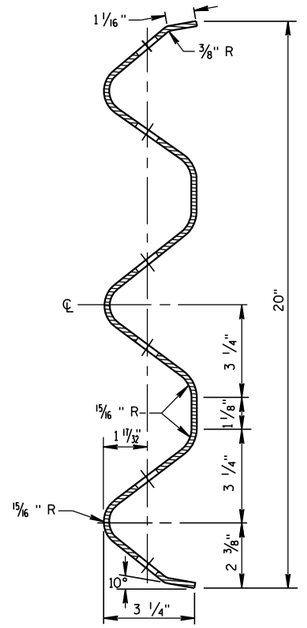


PLATE WASHER DETAIL



SPLICE DETAIL



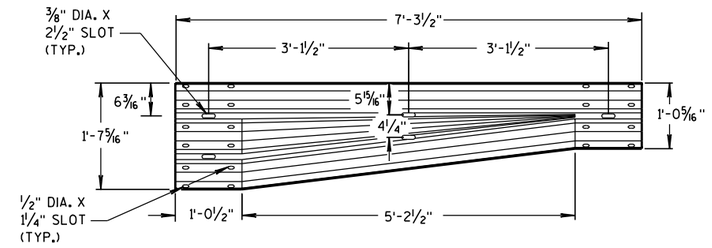
SECTION THRU THRIE BEAM RAIL ELEMENT

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

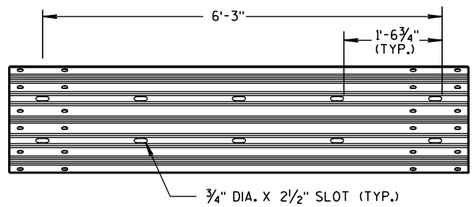
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

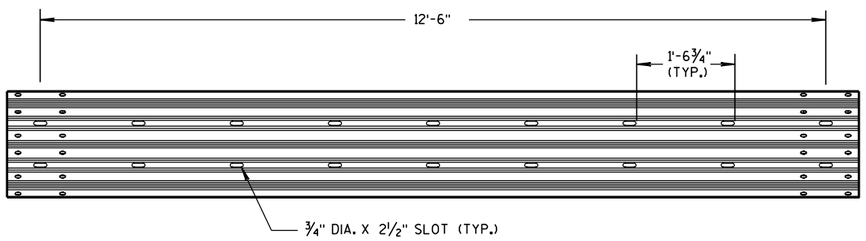
S.D.D. 14 B 45-3b



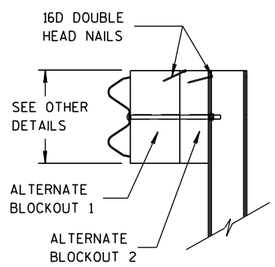
W-BEAM TO THRIE BEAM TRANSITION SECTION



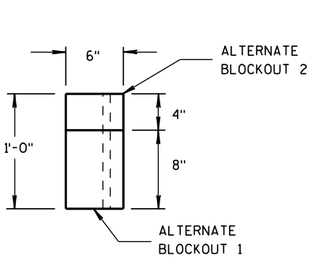
6'-3" THRIE BEAM SECTION



12'-6" THRIE BEAM SECTION

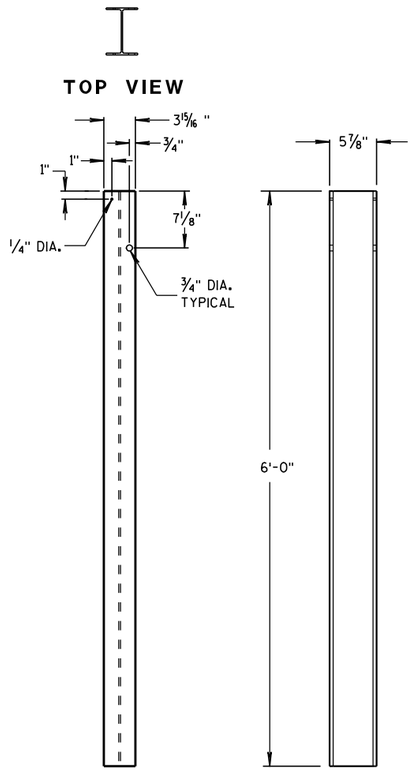


SIDE VIEW



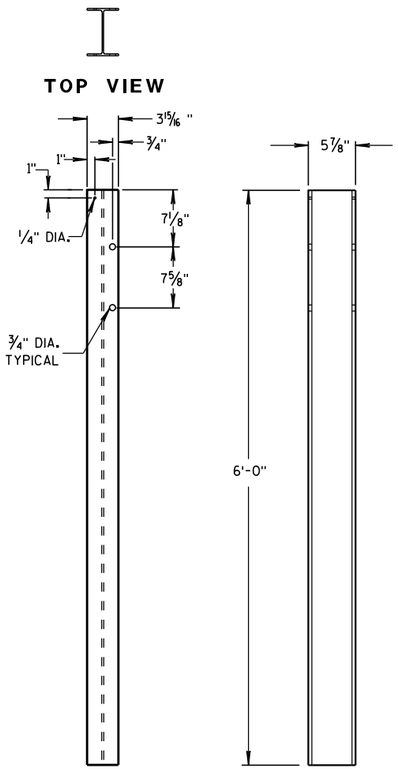
TOP VIEW

ALTERNATE WOOD BLOCKOUT DETAIL



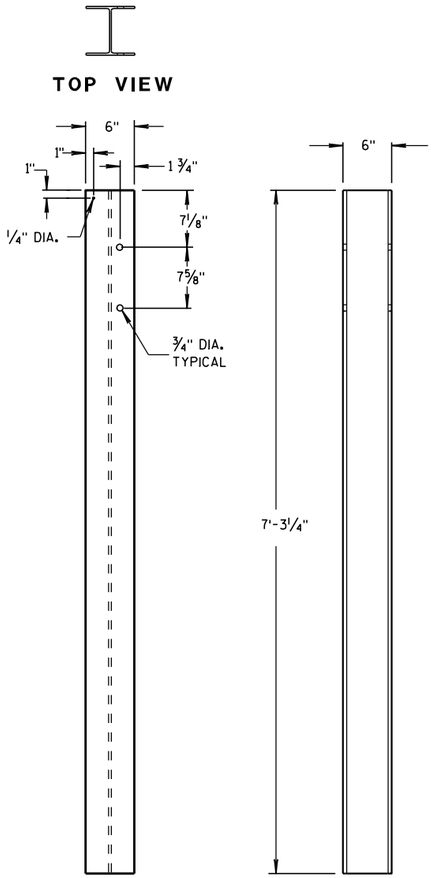
FRONT VIEW SIDE VIEW

STEEL POSTS 1-5



FRONT VIEW SIDE VIEW

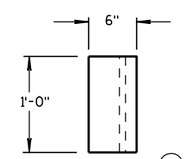
STEEL POSTS 6-11



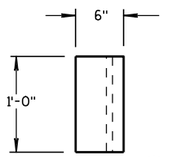
FRONT VIEW SIDE VIEW

STEEL POSTS 12-14

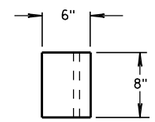
(1) WOOD BLOCKS MAY BE CONSTRUCTED OUT OF 2 WOOD BLOCKS. SEE ALTERNATE WOOD BLOCK DETAIL.



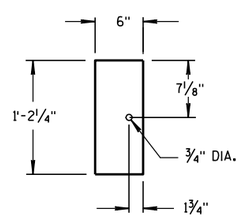
TOP VIEW (1)



TOP VIEW (1)

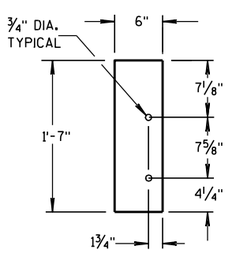


TOP VIEW



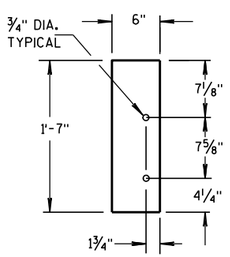
FRONT VIEW

BLOCKOUT POSTS 1-5



FRONT VIEW

BLOCKOUT POSTS 6-11



FRONT VIEW

BLOCKOUT POSTS 12-14

STEEL POST SIZES

POST NUMBER	SECTION TYPE	LENGTH
1	W6x9	72"
2	W6x9	72"
3	W6x9	72"
4	W6x9	72"
5	W6x9	72"
6	W6x9	72"
7	W6x9	72"
8	W6x9	72"
9	W6x9	72"
10	W6x9	72"
11	W6x9	72"
12	W6x15	87 1/8"
13	W6x15	87 1/8"
14	W6x15	87 1/8"

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

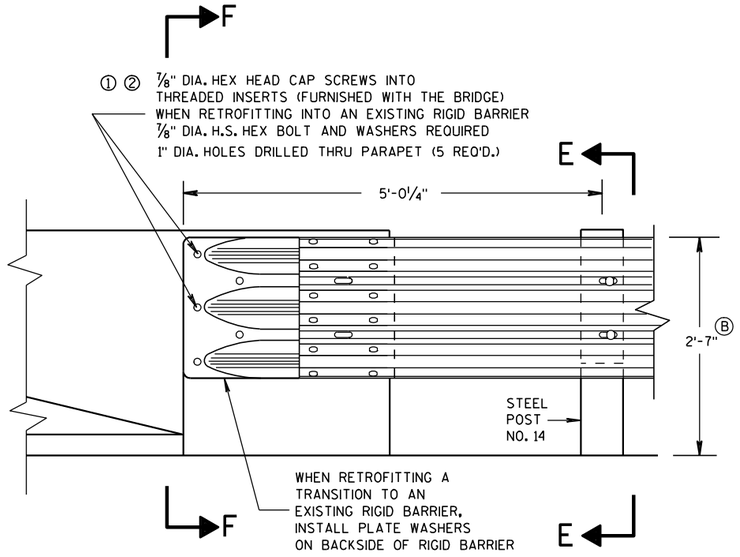
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

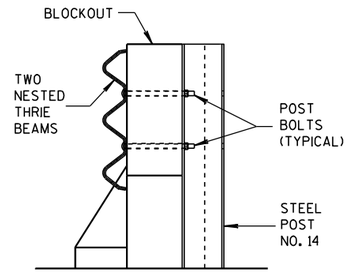
S.D.D. 14 B 45-3c

6

S.D.D. 14 B 45-3c



FRONT VIEW



SECTION E-E

GENERAL NOTES

THESE ARE TYPICAL CONNECTION DETAILS. ADJUST THE POSTION OF CONNECTIONS TO EXISTING BRIDGES TO FIT THE ACTUAL BRIDGE AND SITE DIMENSIONS.

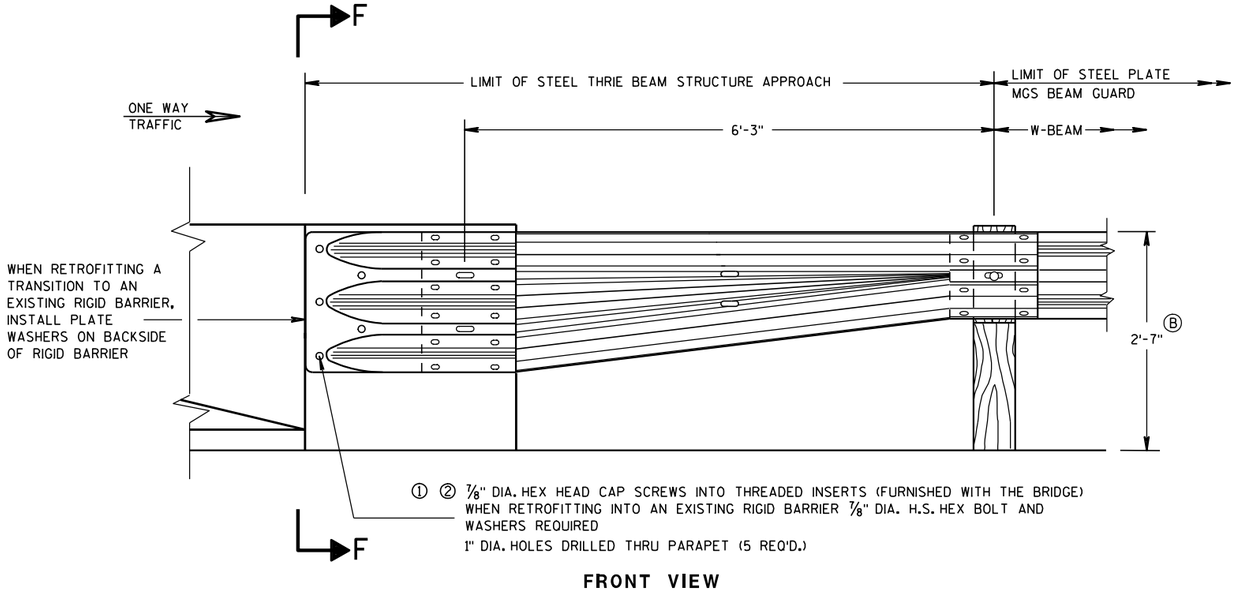
① DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

② BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. BOLTS THAT EXTEND THROUGH THE PARAPET AND OUT THE BACK FACE REQUIRE A HARDENED ROUND STEEL WASHER THAT IS 2" O.D. X 5/8" THICK AND ONE PLATE WASHER. REPAIR ANY DAMAGED CONCRETE FROM BOLT INSTALLATION.

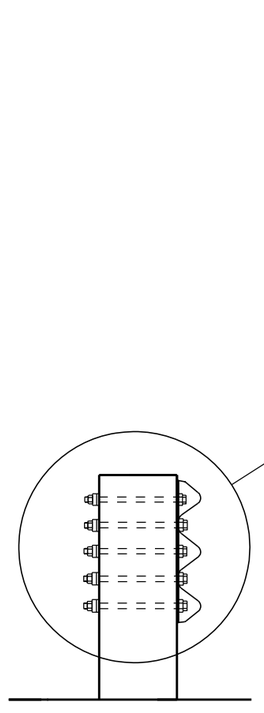
③ THE RECESS FOR A W-BEAM CONNECTION, WHICH EXISTS ON SOME PARAPETS OF THIS TYPE, SHALL BE FILLED WITH A TREATED TIMBER BLOCKOUT. BLOCKOUT SIZE IS 1'-6" X 2'-0" X 3 1/2".

Ⓑ TOLERANCE FOR TOP OF BEAM IS ± 1".

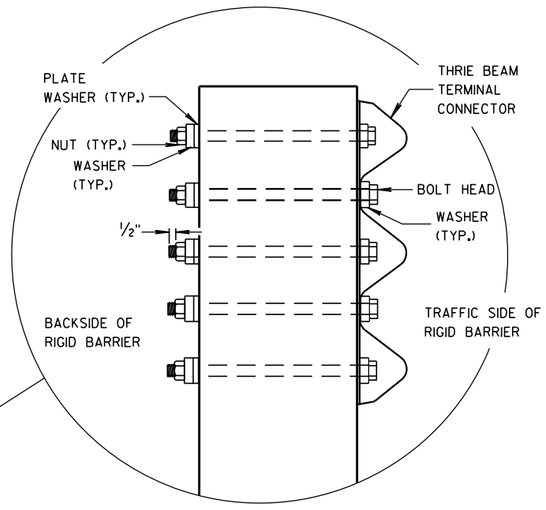
THRIE BEAM CONNECTION TO BRIDGE PARAPET WITH SQUARE ENDS



FRONT VIEW



SECTION F-F



W BEAM TRANSITION AND CONNECTION TO BRIDGE PARAPETS WITH SQUARE ENDS

(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

8/31/2012
DATE

/S/ Jerry H. [illegible]
ROADWAY STANDARDS [illegible]
ENGINEER

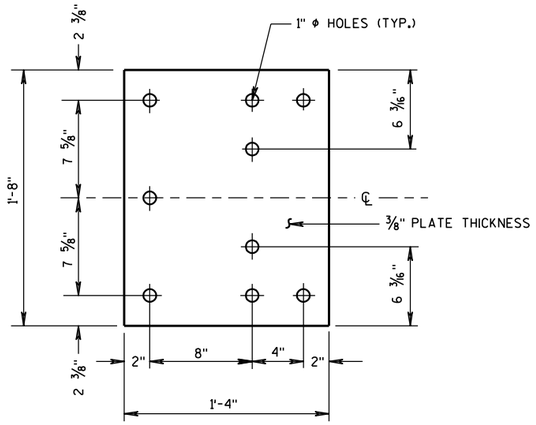
FHWA

6

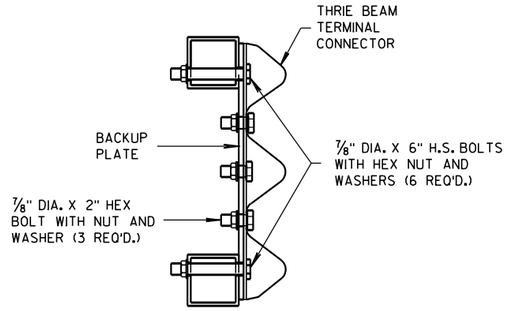
S.D.D. 14 B 45-3d

6

S.D.D. 14 B 45-3d



BACK-UP PLATE DETAIL

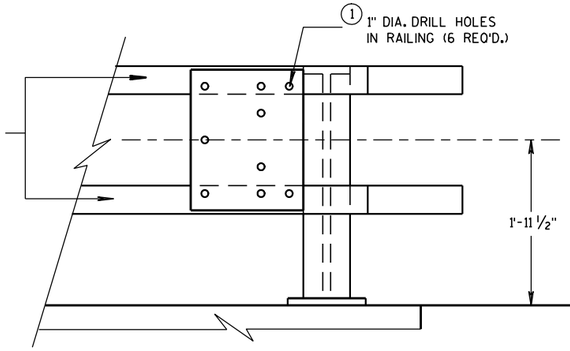


SECTION J-J

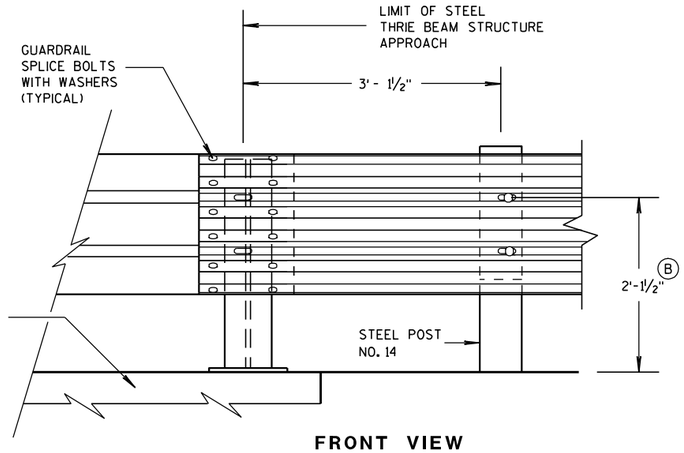
GENERAL NOTES

(1) DRILLING HOLES THROUGH THE PAPRPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

(B) TOLERANCE FOR TOP OF BEAM IS ± 1".

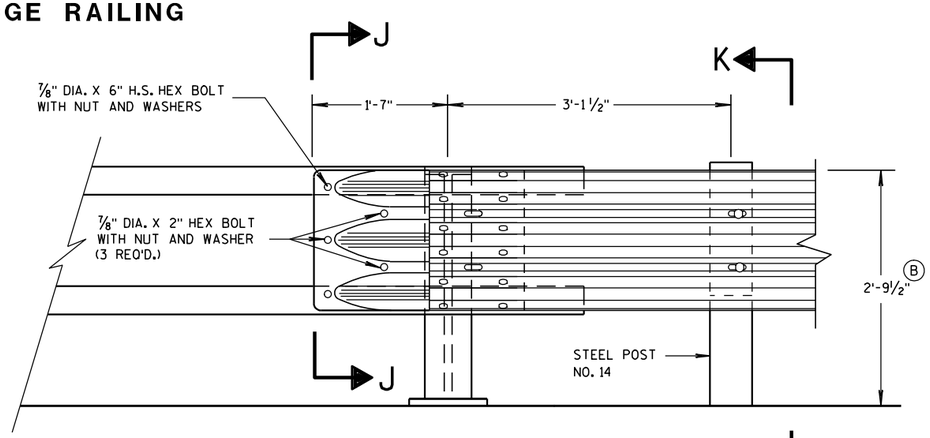


BACK-UP PLATE MOUNTING ONTO BRIDGE RAILING

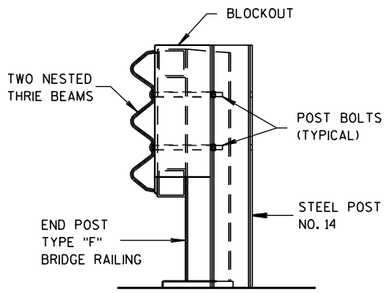


FRONT VIEW

THRIE BEAM CONNECTION TO STEEL RAILING TYPE "W"



FRONT VIEW



SECTION K-K

THRIE BEAM CONNECTION TO TUBULAR RAILING TYPE "F"

MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION
APPROVED 8/31/2012 DATE /S/ Jerry H. Zogg ROADWAY STANDARDS DEVELOPMENT ENGINEER FHWA

6

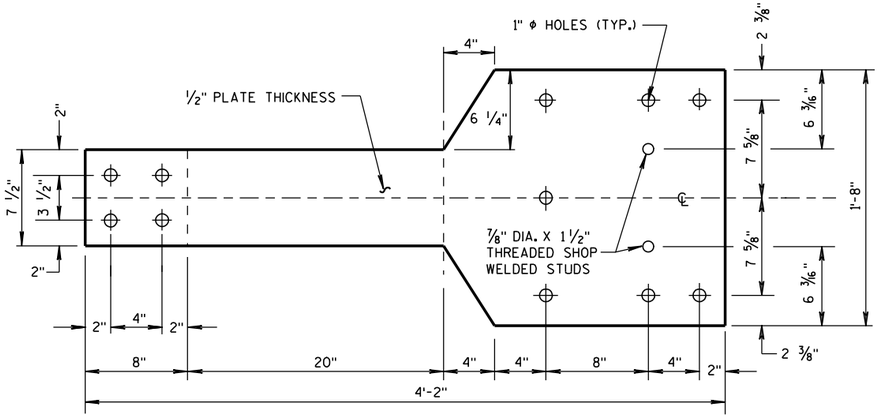
S.D.D. 14 B 45-3g

6

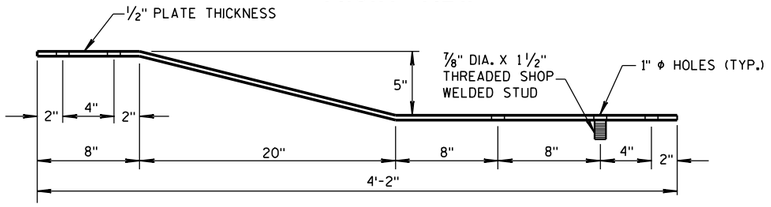
S.D.D. 14 B 45-3g

GENERAL NOTES

(B) TOLERANCE FOR TOP OF W-BEAM RAIL IS ± 1".

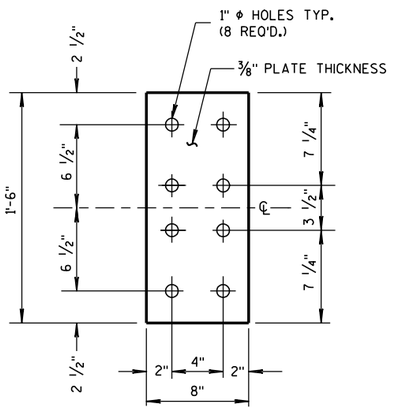


FRONT VIEW



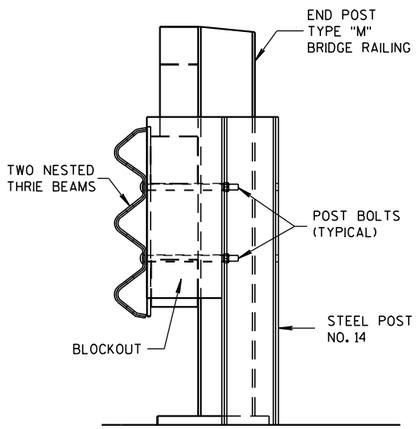
PLAN VIEW

BACK-UP PLATE DETAIL, TYPE "M"

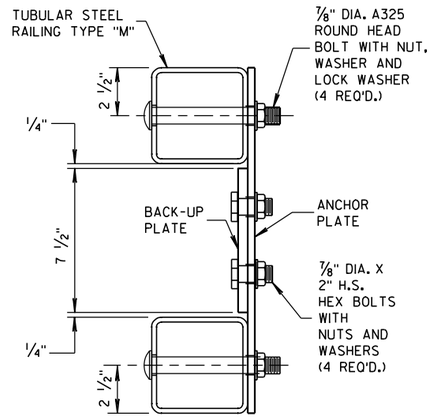


FRONT VIEW

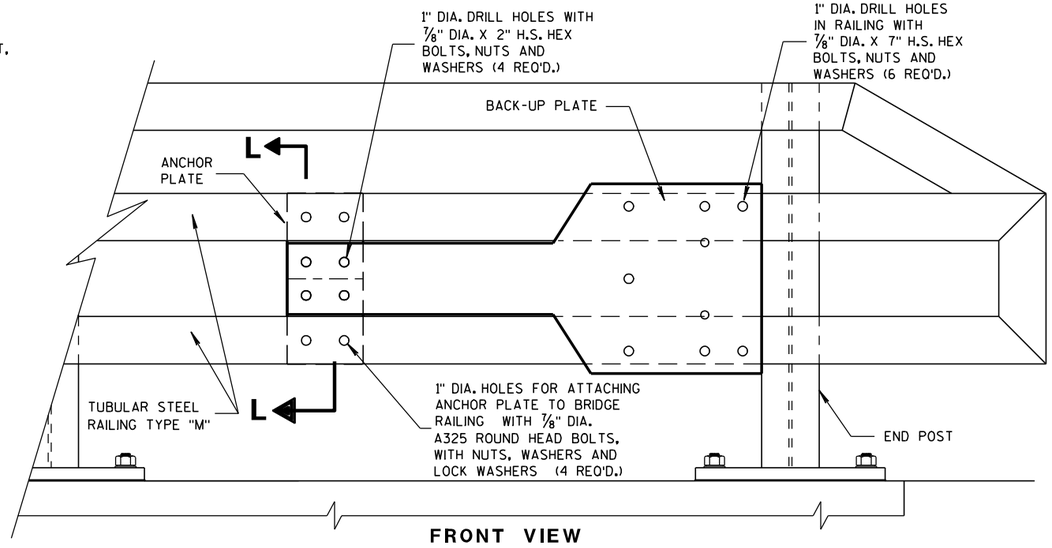
ANCHOR PLATE DETAIL, TYPE "M"



SECTION M-M

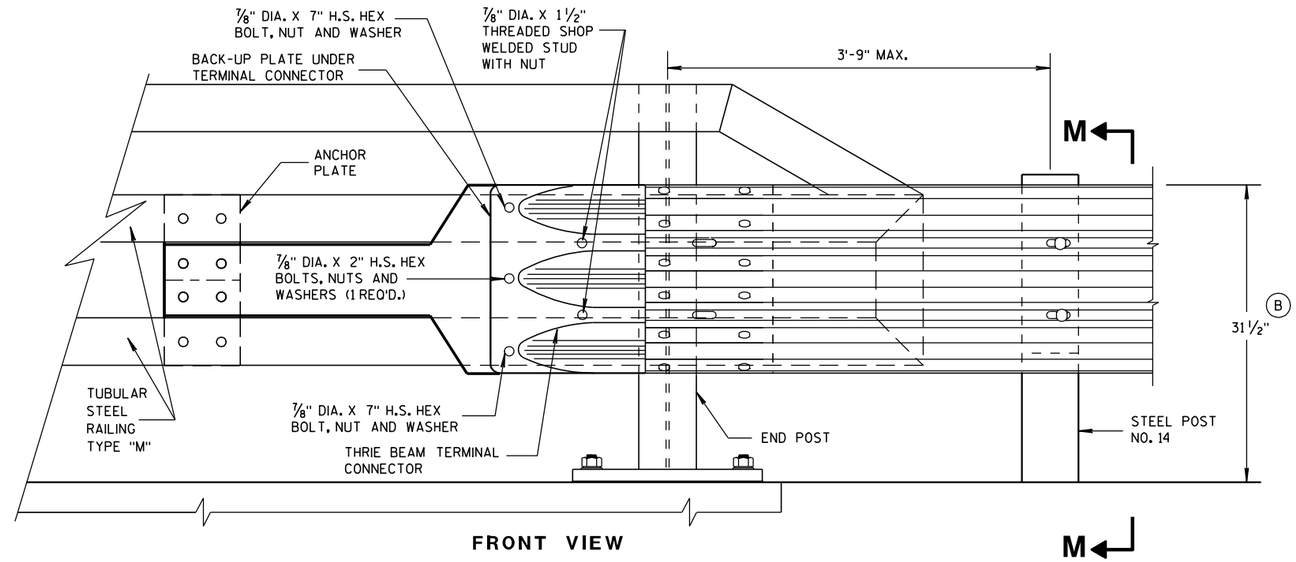


SECTION L-L

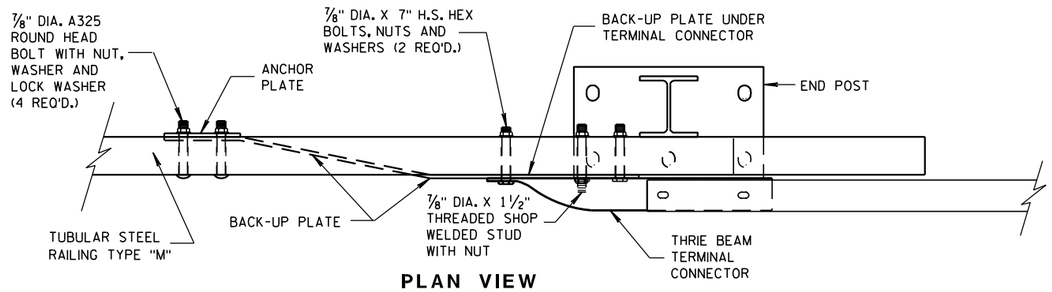


FRONT VIEW

ANCHOR AND BACK-UP PLATE MOUNTING TO BRIDGE RAILING, TYPE "M"



FRONT VIEW



PLAN VIEW

THRIE BEAM CONNECTION TO TUBULAR RAILING, TYPE "M"

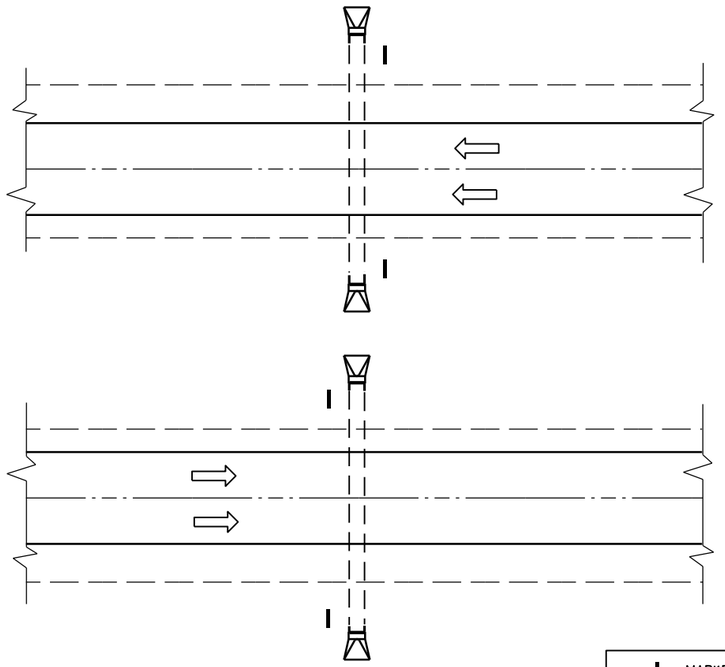
MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
8-31-2012 DATE	/S/ Jerry H. Zogg ROADWAY STANDARDS ENGINEER
FHWA	193 ENT

6

S.D. 14 B 45-3h

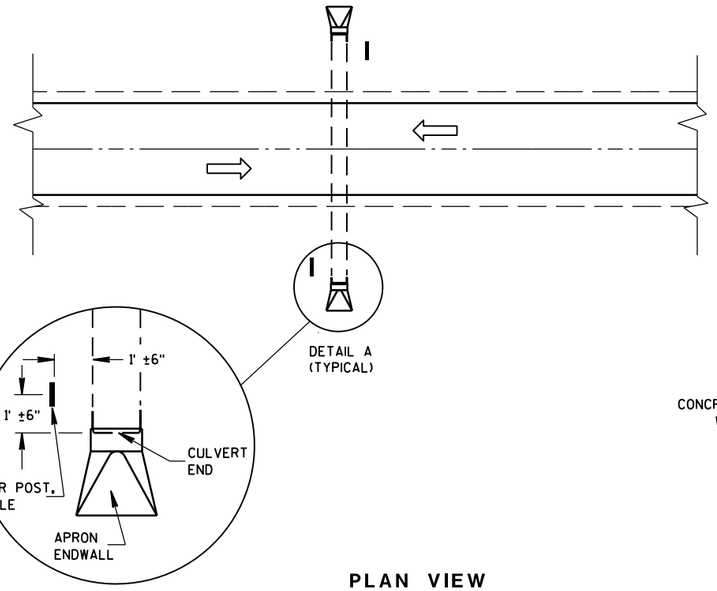
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S.D. 14 B 45-3h



PLAN VIEW

DIVIDED HIGHWAY



DETAIL A
(TYPICAL)

PLAN VIEW

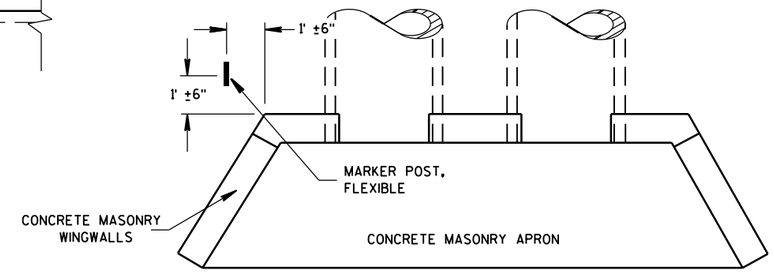
UNDIVIDED HIGHWAY

MARKER POST, FLEXIBLE

DIRECTION OF TRAFFIC FLOW

GENERAL NOTES

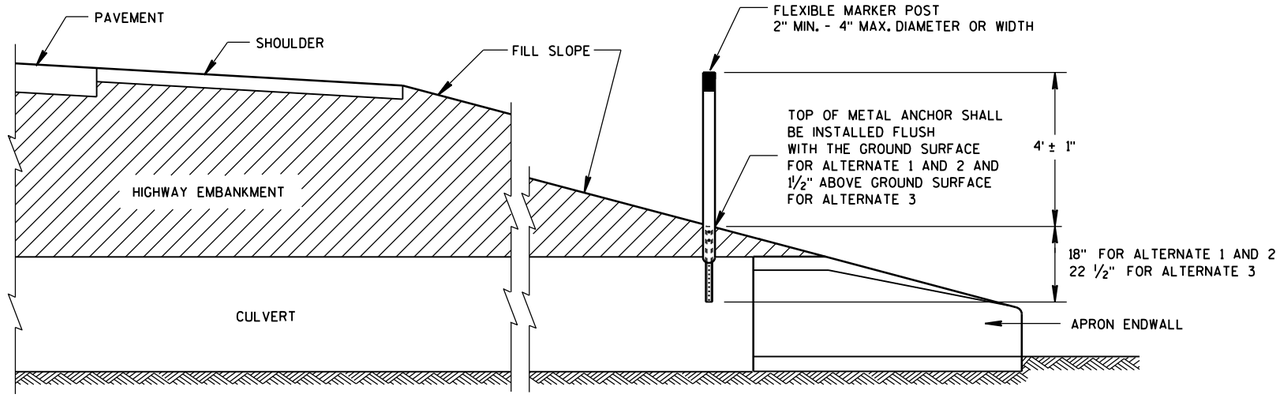
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.



PLAN VIEW

CONCRETE MASONRY ENDWALLS FOR CULVERT PIPE AND PIPE ARCH

FLEXIBLE MARKER POST LOCATION



CROSS SECTION

FLEXIBLE MARKER POST

FLEXIBLE MARKER POST FOR CULVERT END

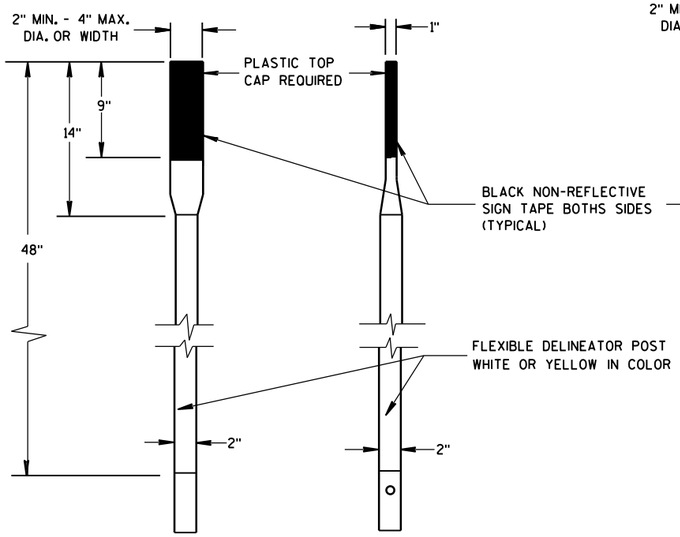
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

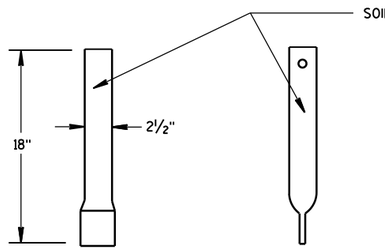
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S.D.D. 15 A 3-2a

6

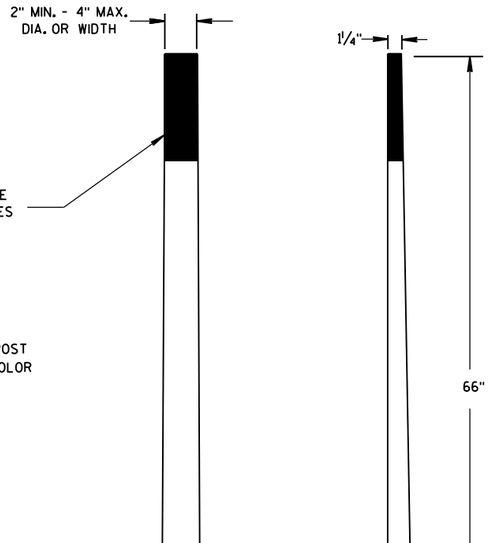
S.D.D. 15 A 3-2a





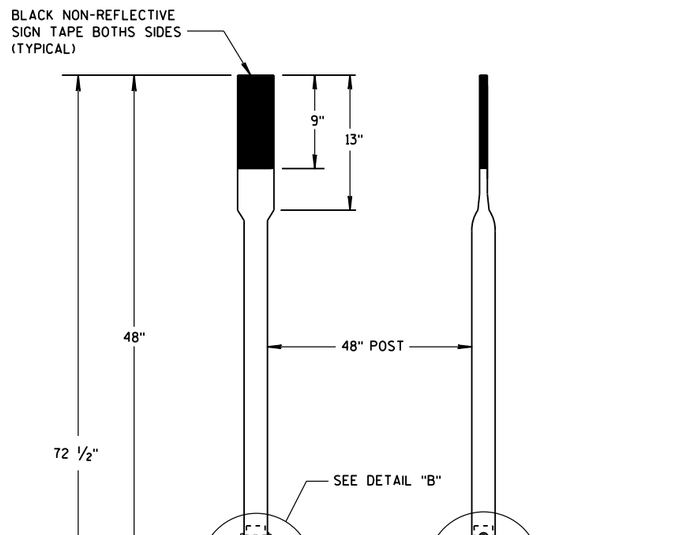
FRONT VIEW SIDE VIEW

ALTERNATE 1



FRONT VIEW SIDE VIEW

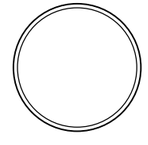
ALTERNATE 2



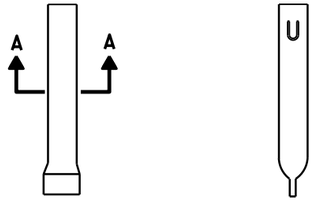
FRONT VIEW SIDE VIEW

ALTERNATE 3

FLEXIBLE MARKER POSTS

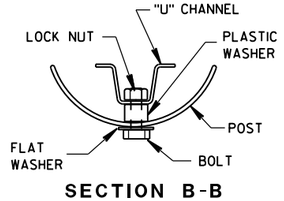


SECTION A-A

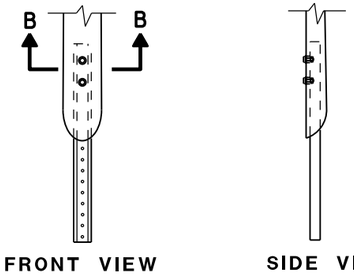


FRONT VIEW SIDE VIEW

ALTERNATE 1

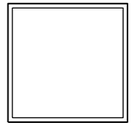


SECTION B-B

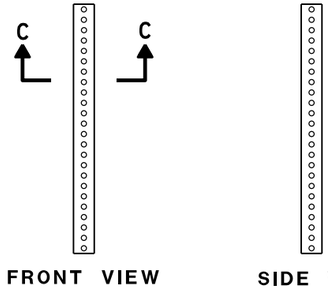


FRONT VIEW SIDE VIEW

ALTERNATE 2



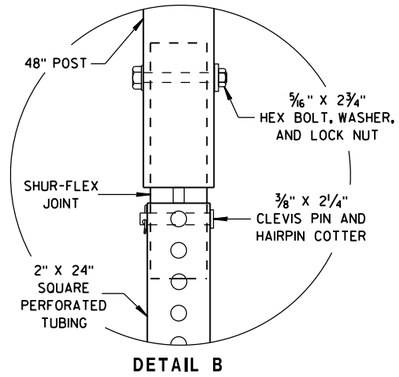
SECTION C-C



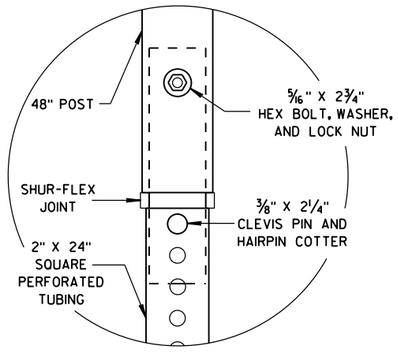
FRONT VIEW SIDE VIEW

ALTERNATE 3

FLEXIBLE MARKER POST ANCHORS



DETAIL B



DETAIL C

FLEXIBLE MARKER POST
FOR CULVERT END

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

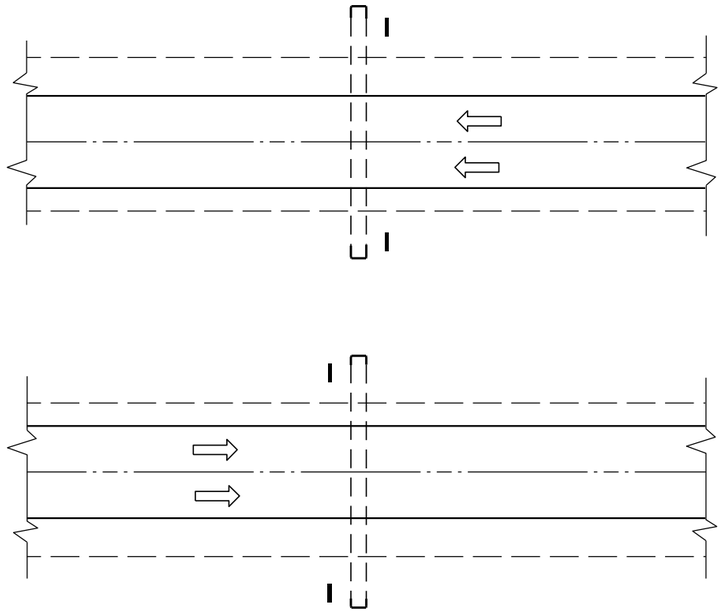
APPROVED
10/1/2012
DATE
/S/ Travis Feltes
STATE TRAFFIC ENGINEER
FHWA

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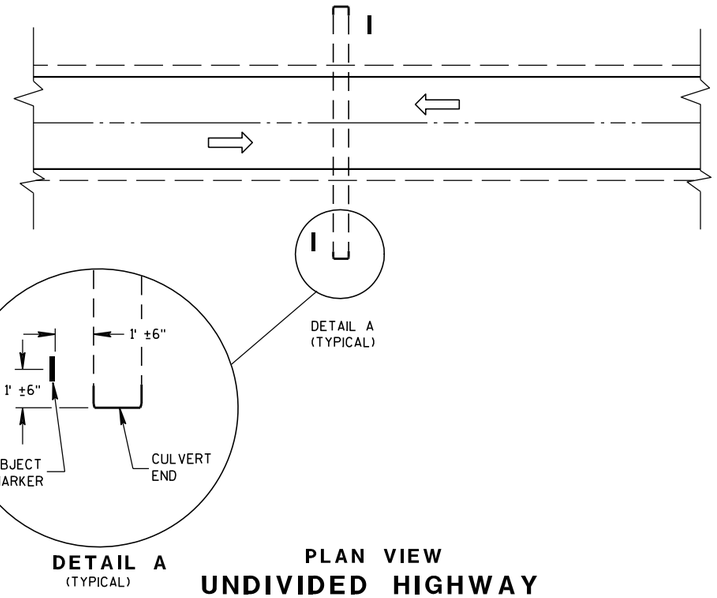
S.D.D. 15 A 3-2b

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S.D.D. 15 A 3-2b

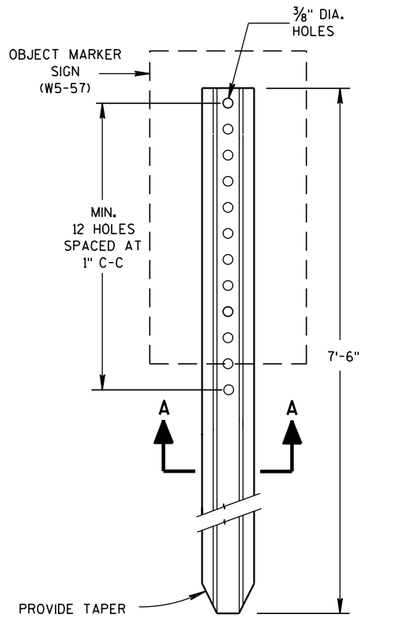


PLAN VIEW
DIVIDED HIGHWAY

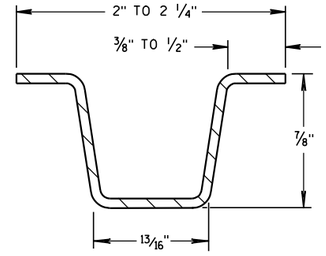


PLAN VIEW
UNDIVIDED HIGHWAY

OBJECT MARKER
DIRECTION OF TRAFFIC FLOW



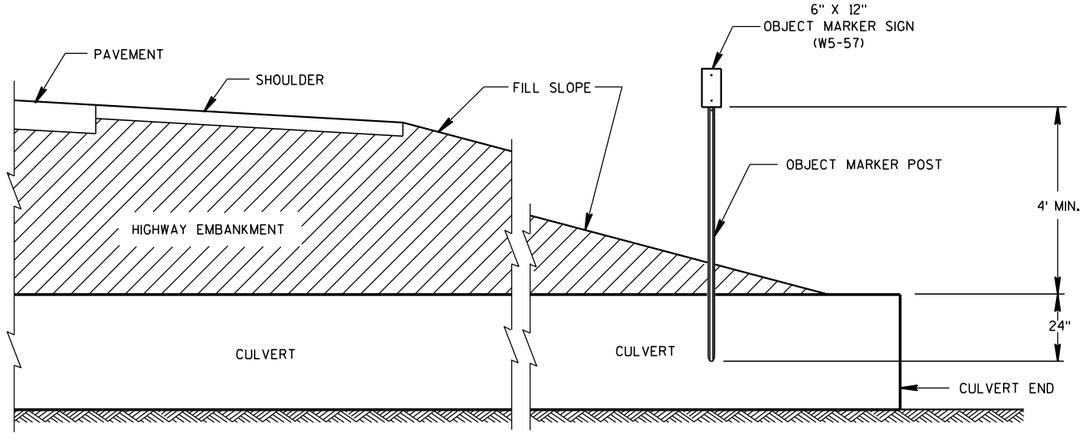
OBJECT MARKER POST



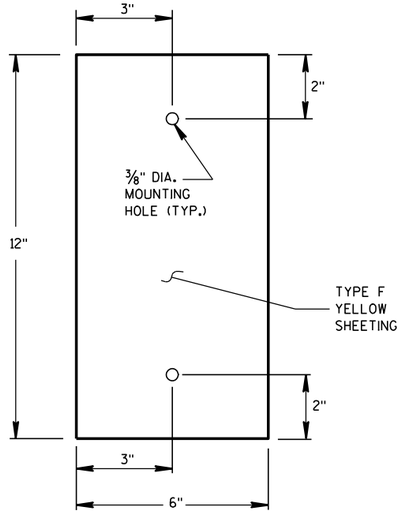
SECTION A-A

WEIGHT 1.12 LBS PER FT. ± 0.1 LB.

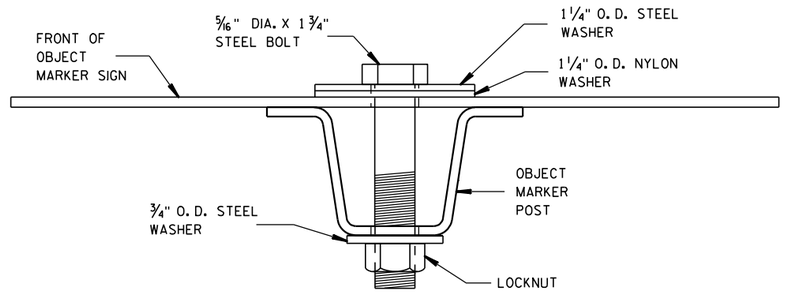
OBJECT MARKER LOCATION



CROSS SECTION
OBJECT MARKER PLACEMENT



OBJECT MARKER SIGN DESIGN
(W5-57 SIGN)



MOUNTING DETAIL FOR OBJECT MARKER SIGN

OBJECT MARKER FOR HAZARDOUS CULVERT

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

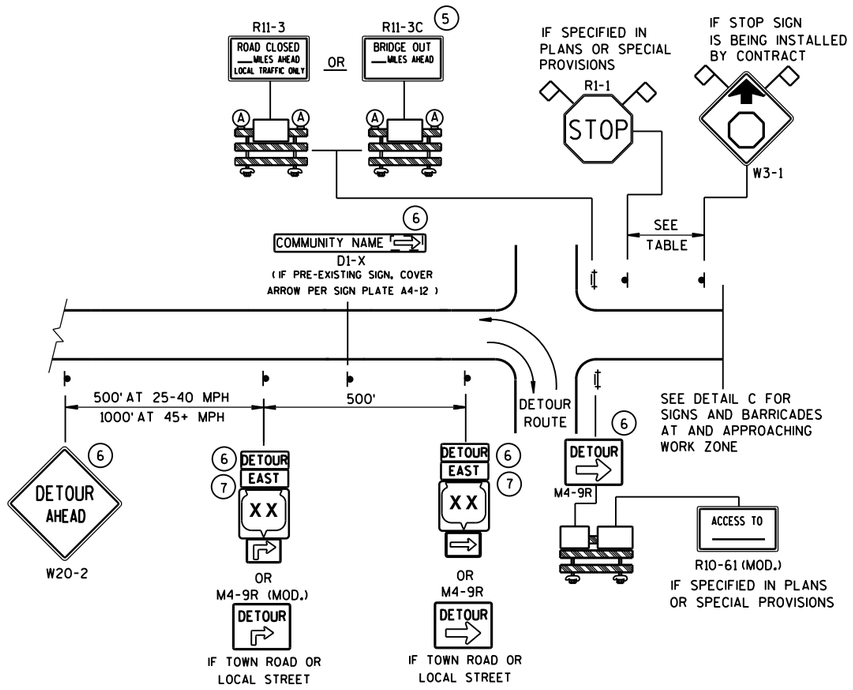
APPROVED
9/10/2012 DATE
/S/ Rebecca Szymkowski
STATE TRAFFIC ENGINEER
FHWA

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S.D.D. 15 A 7-1

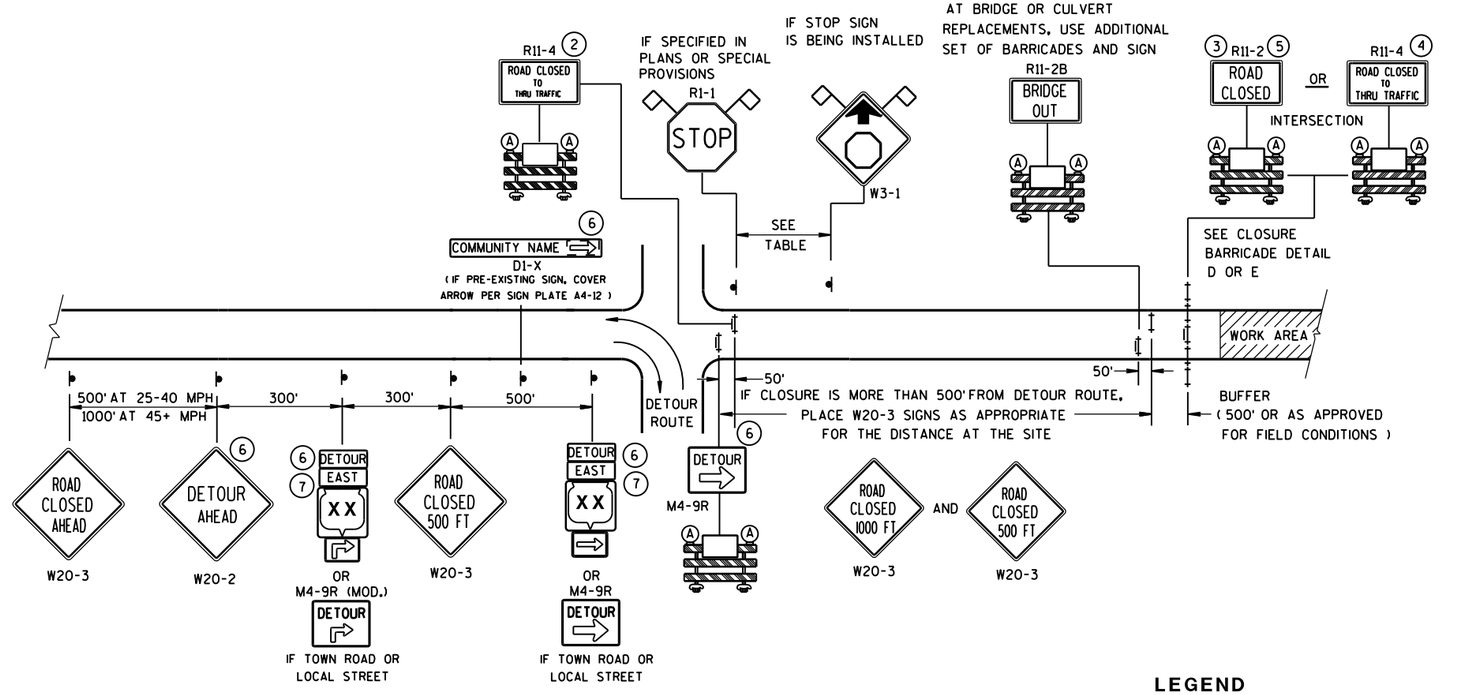
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S.D.D. 15 A 7-1



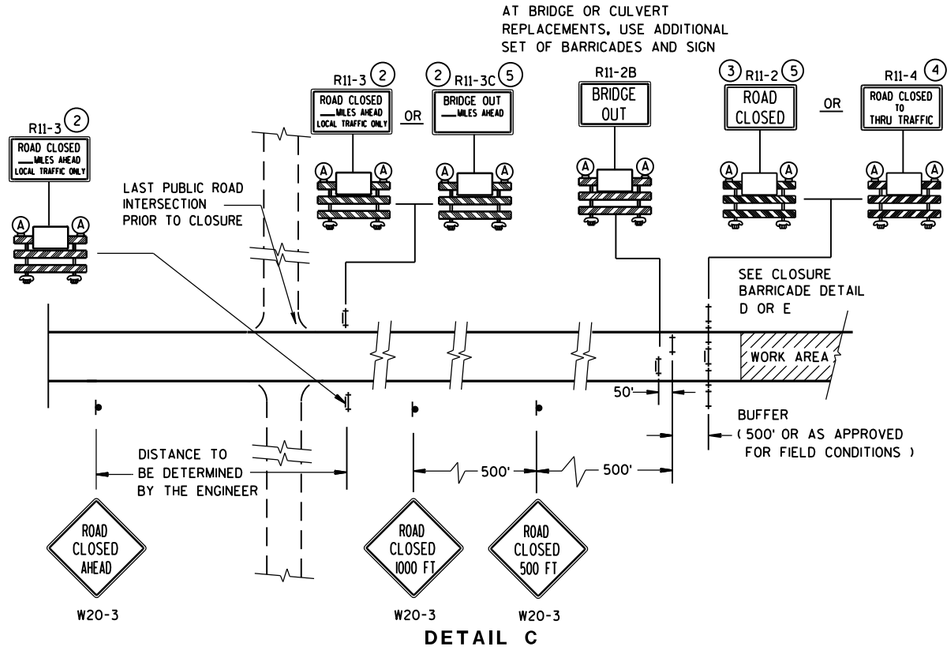
DETAIL A
MAINLINE CLOSURE WITH POSTED DETOUR

WORK ZONE GREATER THAN ½ MILE FROM DETOUR ROUTE (1000 FEET IF URBAN)



DETAIL B
MAINLINE CLOSURE WITH POSTED DETOUR

WORK ZONE LESS THAN ½ MILE FROM DETOUR ROUTE (1000 FEET IF URBAN)



DETAIL C
MAINLINE CLOSURE, NO POSTED DETOUR

SPEED LIMIT (MPH)	"STOP AHEAD" ADVANCE WARNING DISTANCE (FT)
25	200
30	200
35	350
40	350
45	500
50	550
55	750

SEE SDD 15C2-SHEET "**b**" FOR GENERAL NOTES AND FOOTNOTES (1) THROUGH (7)

LEGEND

- SIGN ON PERMANENT SUPPORT
- TYPE III BARRICADE
- TYPE III BARRICADE WITH ATTACHED SIGN
- (A) TYPE "A" WARNING LIGHT (FLASHING)
- WORK AREA
- DETOUR / EAST — M4-8 / M3-X
- XX — M1-4; COUNTY XX — M1-5A; XX — M1-6
- M05-1 OR M06-1
- FLAGS, 16" X 16" MIN., (ORANGE)

BARRICADES AND SIGNS FOR MAINLINE CLOSURES

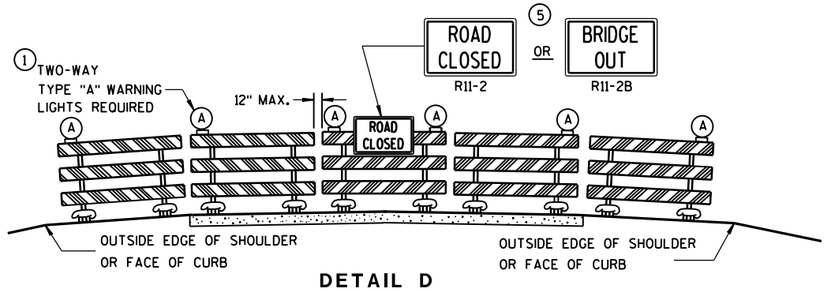
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

8/2013 DATE — /S/ Travis Feltes STATE TRAFFIC ENGINEER — DESIGN

FHWA

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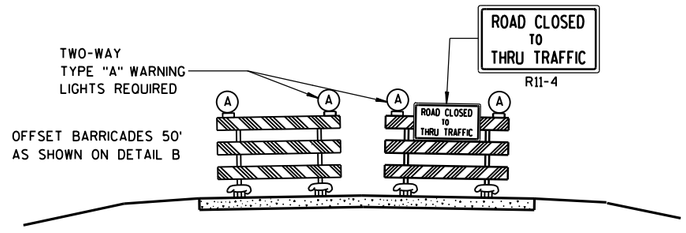
S.D.D. 15 C 2-5a



DETAIL D

ROAD CLOSURE BARRICADE DETAIL

APPROACH VIEW



DETAIL E

LANE CLOSURE BARRICADE DETAIL

APPROACH VIEW

SEE SDD 15C2-SHEET "**a**" FOR LEGEND

GENERAL NOTES

THE EXACT NUMBER, LOCATION, AND SPACING OF ALL SIGNS AND BARRICADES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" SHALL BE REMOVED OR COVERED AS NEEDED AND AS APPROVED BY THE ENGINEER.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A DESIRABLE MINIMUM OF 200 FEET CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

BARRICADES THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY RE-ESTABLISHED UPON COMPLETION OF THE OPERATION OR, FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

ALL TYPE III BARRICADES SHALL HAVE RAILS REFLECTORIZED ON BOTH FACES. STRIPES SHALL BE PROPERLY SLOPED DOWN TOWARD THE TRAFFIC SIDE OR AS SHOWN IN THE ROAD CLOSURE BARRICADE DETAIL D FOR FULL ROAD CLOSURES.

TYPE "A" LOW-INTENSITY FLASHING WARNING LIGHTS SHALL BE VISIBLE ON BOTH SIDES OF THE BARRICADE.

THE R11-2, R11-3, M4-9, R11-4 AND R10-61 SIGNS PLACED ON BARRICADES SHALL COVER NO MORE THAN THE TOP RAIL. THE SIGNS SHALL NOT COVER ANY PORTION OF THE MIDDLE OR BOTTOM RAILS.

"WO AND "MO" SIGNS ARE THE SAME AS "W" AND "M" SIGNS EXCEPT THE BACKGROUND IS ORANGE.

ALL SIGNS SHALL BE 48" X 48" UNLESS OTHERWISE NOTED BELOW:
- R11-2 SHALL BE 48" X 30".
- R11-3, R11-4 AND R10-61 SHALL BE 60" X 30".
- M4-9 SHALL BE 30" X 24".
- M3-X SHALL BE 24" X 12". (36" X 18" IF NEEDED TO MATCH EXISTING SIGNS.)
- M4-8 SHALL BE 24" X 12". (30" X 15" IF NEEDED TO MATCH EXISTING SIGNS.)
- M1-4, M1-5A, AND M1-6 SHALL BE 24" X 24". (36" X 36" IF NEEDED TO MATCH EXISTING SIGNS.)
- M05-1 AND M06-1 SHALL BE 21" X 21". (30" X 30" IF NEEDED TO MATCH EXISTING SIGNS.)
- D1-X SHALL BE AS SHOWN ON SPECIFIC PROJECT SIGNING DETAIL SHEETS.
- R1-1 SHALL BE 36" X 36".

(1) TWO WARNING LIGHTS SHALL BE PROVIDED ON THE CENTER BARRICADE AND A MINIMUM OF ONE WARNING LIGHT SHALL BE PROVIDED ON EACH OF THE OTHER BARRICADES WITHIN THE ROADWAY LIMITS. SPACING OF THE WARNING LIGHTS SHALL BE UNIFORM TO THE EDGE OF ROADWAY AS SHOWN (APPROX. 8-FOOT LIGHT SPACING).

(2) THESE SIGNS AND BARRICADES ARE NOT REQUIRED IF ROAD CLOSURE BEGINS AT INTERSECTION.

(3) FOR ROAD CLOSURE WITHOUT LOCAL ACCESS TO PROJECT, SEE ROAD CLOSURE BARRICADE DETAIL D.

(4) FOR ROAD CLOSURE WITH LOCAL ACCESS TO PROJECT, SEE LANE CLOSURE BARRICADE DETAIL E.

(5) FOR BRIDGE OR CULVERT REPLACEMENTS, SUBSTITUTE "BRIDGE OUT" INSTEAD OF "ROAD CLOSED" ON R11-2 AND R11-3 SIGNS.

(6) INSTALL DETOUR AND COMMUNITY GUIDE SIGNS AND ARROWS ONLY IF SPECIFIED IN THE CONTRACT. IF THERE ARE EXISTING ROUTE MARKER ASSEMBLIES THAT WILL REMAIN IN PLACE, ADJUST THE LOCATION OF THE DETOUR ROUTE SIGNS TO CORRESPOND WITH THE EXISTING ASSEMBLIES. MODIFY EXISTING SIGNS WHERE POSSIBLE. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS. IF DETOUR SIGNS ARE BEING INSTALLED BY OTHERS, PLACE THE CONTRACTED TRAFFIC CONTROL SIGNS TO ALLOW FOR PLACEMENT OF ALL WARNING, DETOUR AND GUIDE SIGNS AS SHOWN.

(7) "EAST" CARDINAL DIRECTION MARKERS AND RIGHT TURN ARROWS ARE SHOWN. USE OTHER CARDINAL DIRECTIONS AND ARROWS AS APPROPRIATE.

BARRICADES AND SIGNS FOR MAINLINE CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

8/2013 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER
FHWA

6

S.D.D. 15 C 2-5b

THIS DRAWING PROVIDES GENERAL GUIDANCE ON TYPICAL DETOUR SIGN LAYOUT AND SPACING. SEE PROJECT DETOUR SIGNING SHEETS FOR SPECIFIC DETAILS FOR EACH PROJECT.

GENERAL NOTES

THE EXACT NUMBER, LOCATION AND SPACING OF ALL SIGNS SHALL BE ADJUSTED TO FIT FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

IF THERE ARE EXISTING ROUTE MARKER ASSEMBLIES THAT WILL REMAIN IN PLACE, ADJUST THE LOCATION OF THE DETOUR ROUTE SIGNS TO CORRESPOND WITH THE EXISTING ASSEMBLIES. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS. MODIFY EXISTING SIGNS WHERE POSSIBLE.

THE SPACING BETWEEN TRAFFIC CONTROL AND DETOUR SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND TO PROVIDE A DESIRABLE MINIMUM OF 200 FEET CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE", SHALL BE REMOVED OR COVERED AS NEEDED AND AS APPROVED BY THE ENGINEER.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

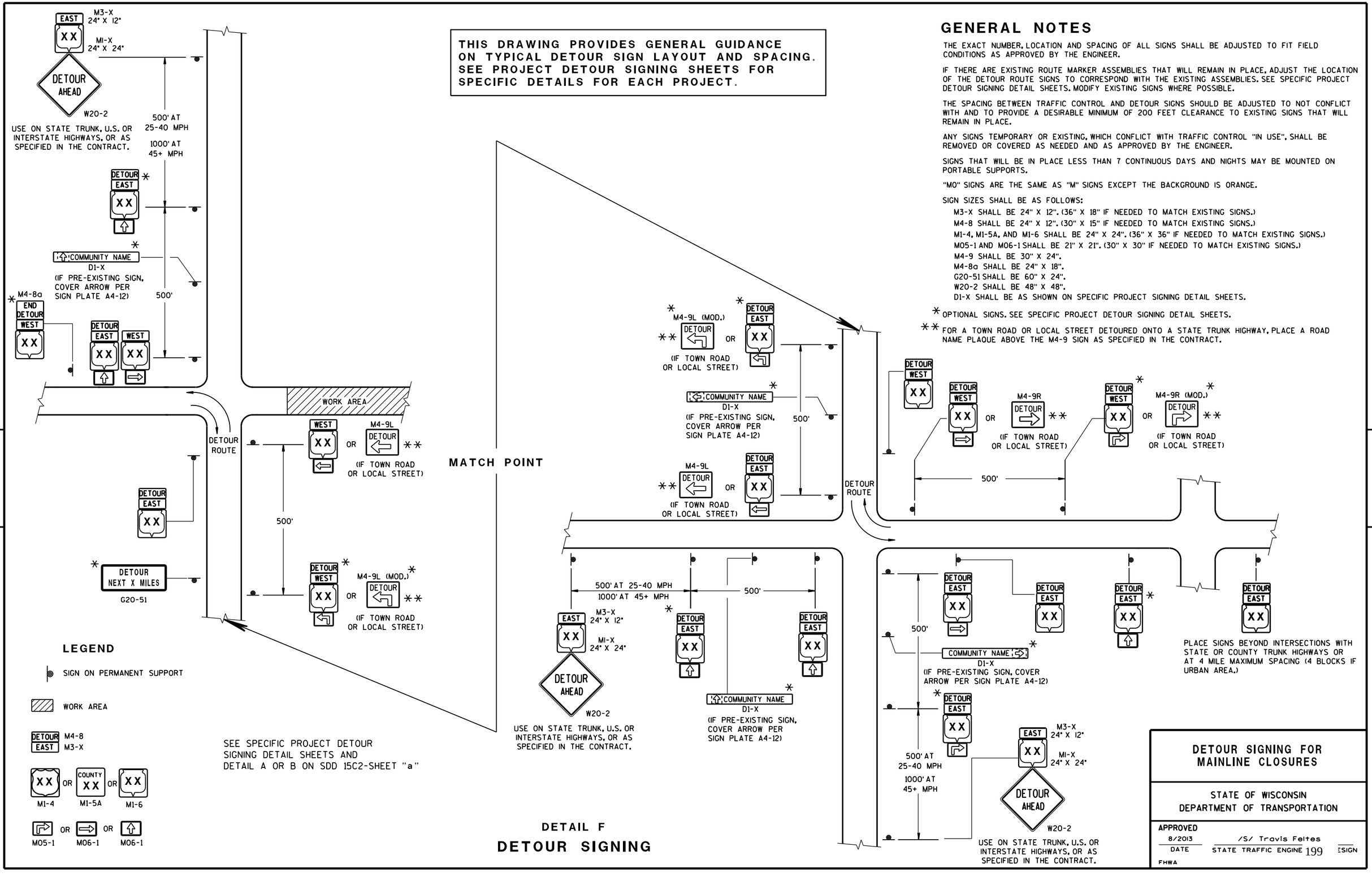
"MO" SIGNS ARE THE SAME AS "M" SIGNS EXCEPT THE BACKGROUND IS ORANGE.

SIGN SIZES SHALL BE AS FOLLOWS:

- M3-X SHALL BE 24" X 12". (36" X 18" IF NEEDED TO MATCH EXISTING SIGNS.)
- M4-8 SHALL BE 24" X 12". (30" X 15" IF NEEDED TO MATCH EXISTING SIGNS.)
- M1-4, M1-5A, AND M1-6 SHALL BE 24" X 24". (36" X 36" IF NEEDED TO MATCH EXISTING SIGNS.)
- M05-1 AND M06-1 SHALL BE 21" X 21". (30" X 30" IF NEEDED TO MATCH EXISTING SIGNS.)
- M4-9 SHALL BE 30" X 24".
- M4-8a SHALL BE 24" X 18".
- G20-51 SHALL BE 60" X 24".
- W20-2 SHALL BE 48" X 48".
- D1-X SHALL BE AS SHOWN ON SPECIFIC PROJECT SIGNING DETAIL SHEETS.

* OPTIONAL SIGNS. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS.

** FOR A TOWN ROAD OR LOCAL STREET DETOURED ONTO A STATE TRUNK HIGHWAY, PLACE A ROAD NAME PLAQUE ABOVE THE M4-9 SIGN AS SPECIFIED IN THE CONTRACT.



DETAIL F

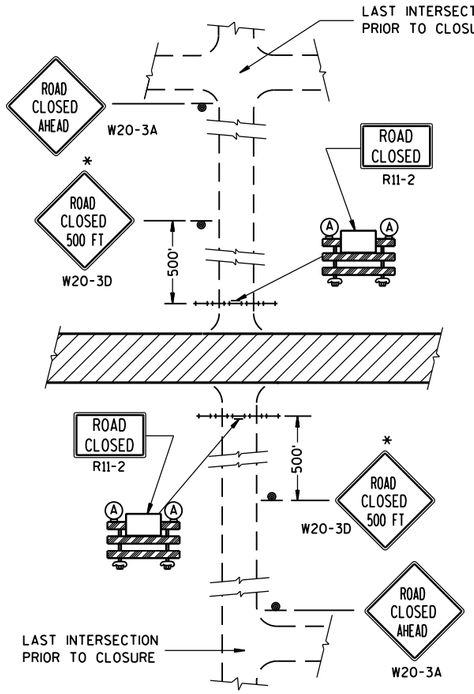
DETOUR SIGNING

DETOUR SIGNING FOR MAINLINE CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

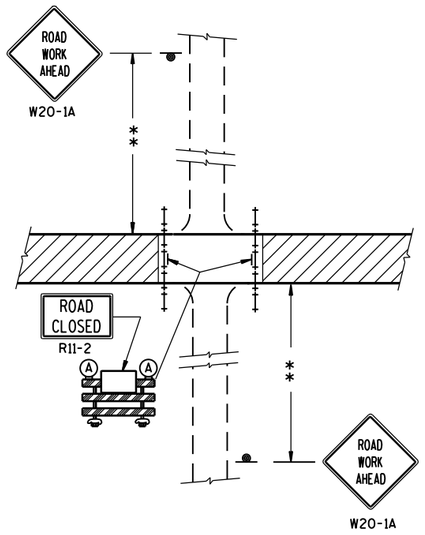
APPROVED
8/2013 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER
FHWA

6
S.D.D. 15 C 2-5c



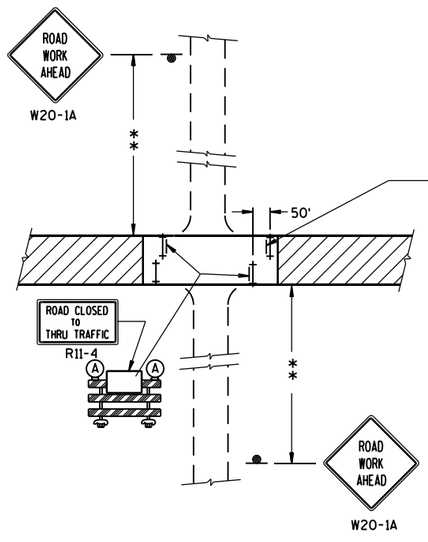
DETAIL 1

(NO ACCESS TO PROJECT)



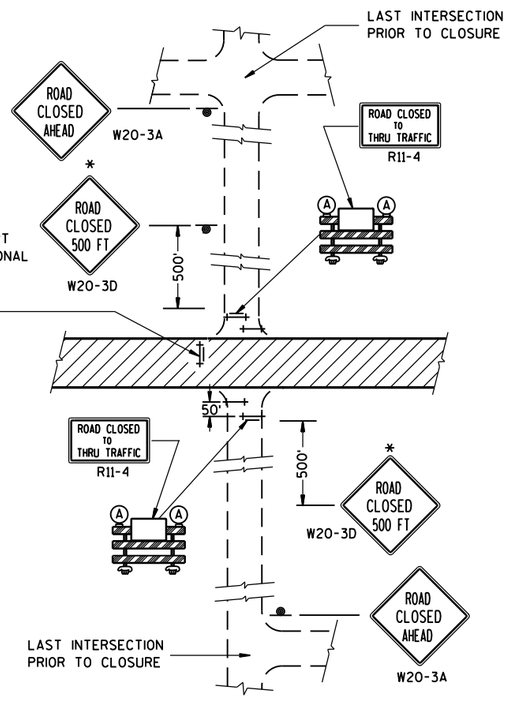
DETAIL 2

(PUBLIC CROSS-TRAFFIC MAINTAINED. NO ACCESS TO PROJECT).



DETAIL 3

(PUBLIC CROSS-TRAFFIC MAINTAINED. CONTRACTOR, LOCAL BUSINESS AND RESIDENT ACCESS).



DETAIL 4

(CONTRACTOR, LOCAL BUSINESS AND RESIDENT ACCESS TO PROJECT)

GENERAL NOTES

THE EXACT NUMBER, LOCATION, AND SPACING OF ALL SIGNS AND BARRICADES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" SHALL BE REMOVED OR COVERED AS NEEDED AND AS APPROVED BY THE ENGINEER.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A DESIRABLE MINIMUM OF 200 FEET CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

IF A "STOP" SIGN MUST BE REMOVED FOR A WORK OPERATION, A TEMPORARY "STOP" SIGN SHALL BE PLACED PRIOR TO THE SIGN REMOVAL, OR A FLAGGER SHALL BE PROVIDED UNTIL THE SIGN IS RE-ESTABLISHED.

BARRICADES THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY RE-ESTABLISHED UPON COMPLETION OF THE OPERATION OR, FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

ALL TYPE III BARRICADES SHALL HAVE RAILS REFLECTORIZED ON BOTH FACES. STRIPES SHALL BE PROPERLY SLOPED DOWN TOWARD THE TRAFFIC SIDE OR AS SHOWN IN THE ROAD CLOSURE BARRICADE DETAIL D FOR FULL ROAD CLOSURES.

TYPE "A" LOW-INTENSITY FLASHING WARNING LIGHTS SHALL BE VISIBLE ON BOTH SIDES OF THE BARRICADE.

THE R11-2, R11-3 AND R11-4 SIGNS PLACED ON BARRICADES SHALL COVER NO MORE THAN THE TOP RAIL. THE SIGNS SHALL NOT COVER ANY PORTION OF THE MIDDLE OR BOTTOM RAILS.

ALL SIGNS SHALL BE 48" X 48" UNLESS OTHERWISE NOTED BELOW:
R11-2 SHALL BE 48" X 30".
R11-4 AND R11-3 SHALL BE 60" X 30".

*OMIT THE "ROAD CLOSED 500 FT." SIGN IF THE LAST INTERSECTION IS 500 FT. OR LESS FROM THE WORK ZONE.

**500' MAX. OR AT LAST INTERSECTION WHICHEVER IS CLOSER.

LEGEND

- SIGN ON PERMANENT SUPPORT
- TYPE III BARRICADE
- TYPE III BARRICADE WITH ATTACHED SIGN
- (A) TYPE "A" WARNING LIGHT (FLASHING)
- WORK AREA

BARRICADES AND SIGNS FOR SIDEROAD CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

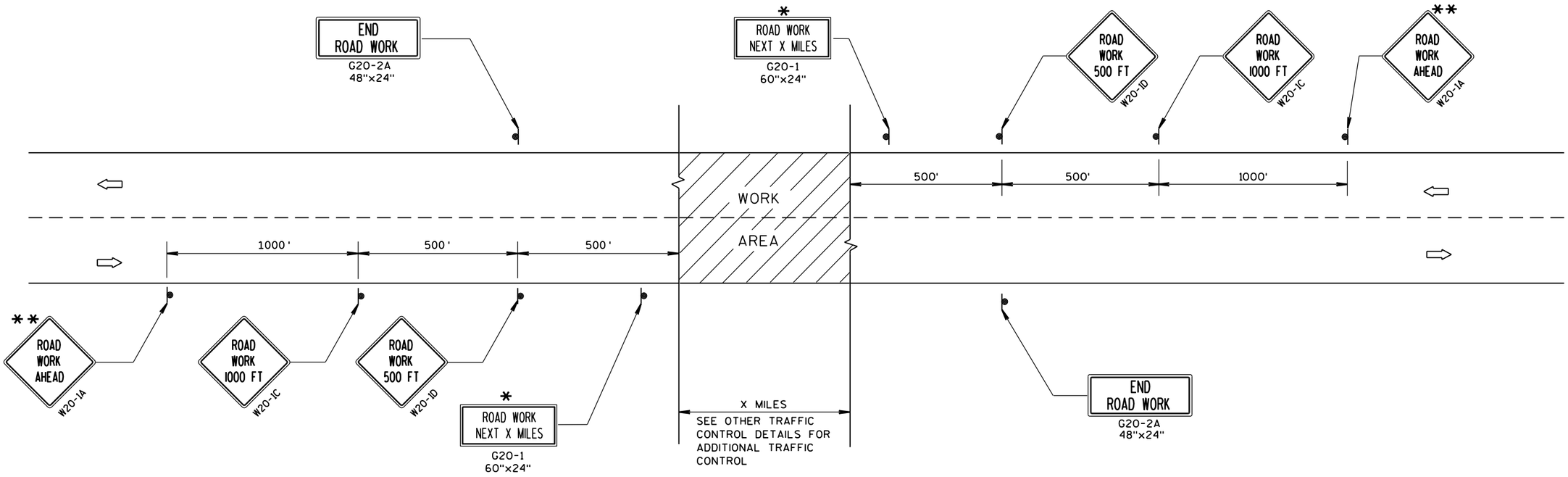
APPROVED
Sept. 2015 — DATE
/S/ Peter Amakobe Atepe
STATEWIDE WORK ZO... SAFETY ENGI... — FHWA

6

S.D.D. 15 C 3-3

6

S.D.D. 15 C 3-3



TYPICAL SIDEROAD APPROACH WARNING SIGN DETAIL

GENERAL NOTES

THE EXACT NUMBER, LOCATION, AND SPACING OF ALL SIGNS AND DEVICES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A MINIMUM OF 200 FEET (500 FEET DESIRABLE) CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

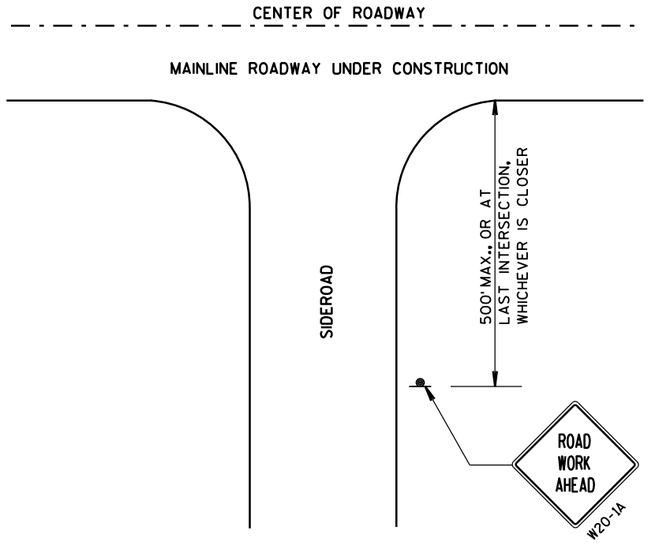
ALL SIGNS ARE 48"x48" UNLESS OTHERWISE NOTED.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

IF A "STOP" SIGN MUST BE REMOVED FOR A WORK OPERATION, A TEMPORARY "STOP" SIGN SHALL BE PLACED PRIOR TO THE SIGN REMOVAL, OR A FLAGGER SHALL BE PROVIDED UNTIL THE SIGN IS RE-ESTABLISHED.

* OMIT G20-1 SIGNS IF LENGTH OF WORK AREA IS 2 MILES OR LESS.

** PLACE ADDITIONAL W20-1A "ROAD WORK AHEAD" SIGN IF WORK AREA WITHIN THE PROJECT IS SEPARATED BY MORE THAN 2 MILES FROM PREVIOUS WORK AREA.



LEGEND

- SIGN ON PERMANENT SUPPORT
- DIRECTION OF TRAFFIC
- WORK AREA

TRAFFIC CONTROL, ADVANCE WARNING SIGNS 45 M.P.H. OR GREATER TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

Sept. 2015 — DATE

/S/ Peter Amakobe Atepe — STATEWIDE WORK ZONE SAFETY ENGINEER

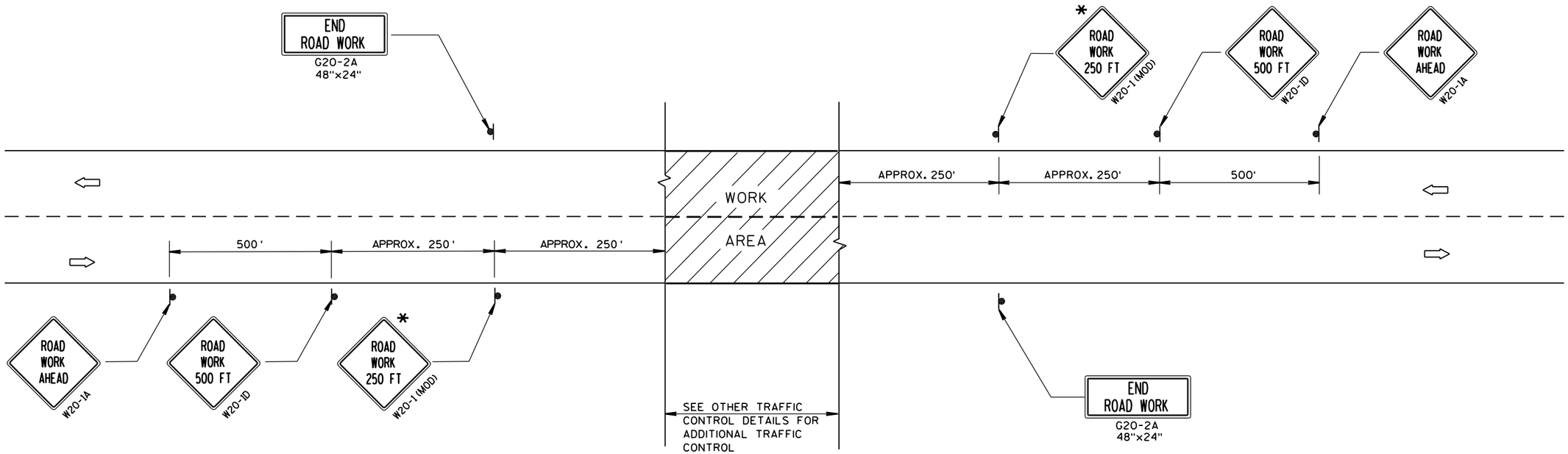
FHWA

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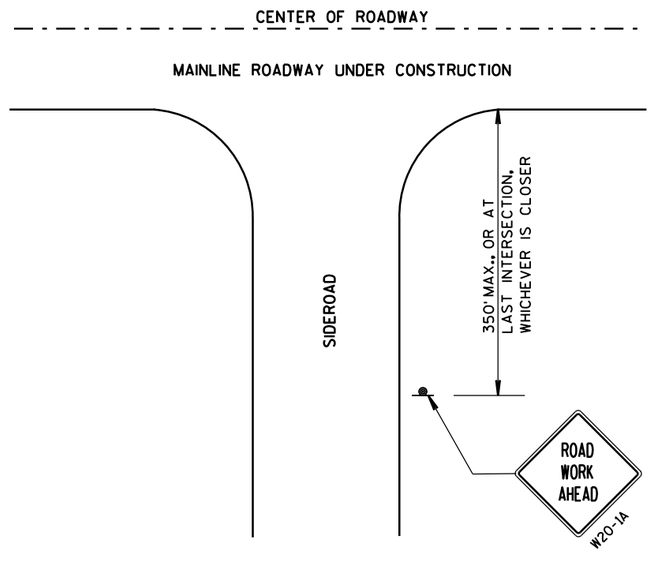
S.D.D. 15 C 4-3

6

S.D.D. 15 C 4-3



TYPICAL SIDEROAD APPROACH WARNING SIGN DETAIL



GENERAL NOTES

THE EXACT NUMBER, LOCATION, AND SPACING OF ALL SIGNS AND DEVICES SHALL BE ADJUSTED TO FIT FIELD CONDITIONS.

THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A DESIRABLE MINIMUM OF 200 FEET CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

ALL SIGNS ARE 48"x48" UNLESS OTHERWISE NOTED. IF NECESSARY DUE TO SPACE CONSTRAINTS, 36"x36" SIGNS MAY BE USED INSTEAD OF 48"x48" SIGNS.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

IF A "STOP" SIGN MUST BE REMOVED FOR A WORK OPERATION, A TEMPORARY "STOP" SIGN SHALL BE PLACED PRIOR TO THE SIGN REMOVAL, OR A FLAGGER SHALL BE PROVIDED UNTIL THE SIGN IS RE-ESTABLISHED.

* THE THIRD W20-1 SIGN IS REQUIRED ONLY IF THERE IS AN INTERSECTION BETWEEN THE "ROAD WORK 500 FT" SIGN AND THE WORK ZONE. ADJUST THE PLACEMENT OF THIS SIGN BASED ON INTERSECTION LOCATION AND OTHER FIELD CONDITIONS.

LEGEND

- SIGN ON PERMANENT SUPPORT
- DIRECTION OF TRAFFIC
- WORK AREA

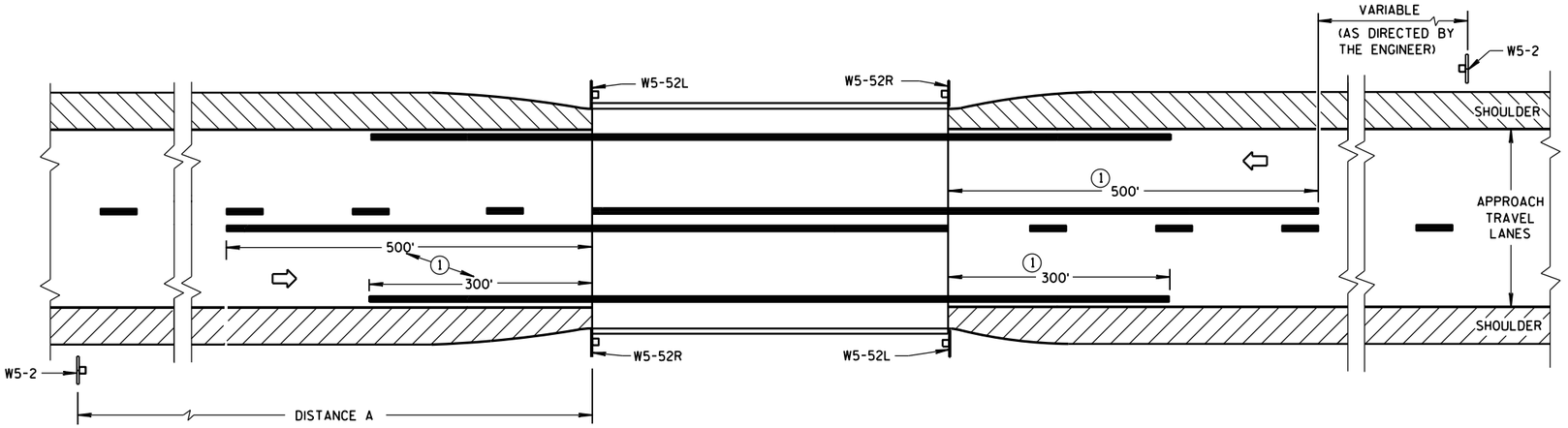
TRAFFIC CONTROL, ADVANCE WARNING SIGNS 40 M.P.H. OR LESS TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
Sept. 2015 — DATE
/S/ Peter Amakobe Atepe
STATEWIDE WORK ZONE SAFETY ENGINEER
FHWA

6

S.D.D. 15 C 5-3



GENERAL NOTES

DETAILS OF TRAFFIC CONTROL DEVICES AND INSTALLATION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS, THE SPECIAL PROVISIONS, AND THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES.

PAVEMENT MARKING SHOWN ON THIS DRAWING IS NOT REQUIRED UNLESS OTHERWISE SPECIFIED IN THE CONTRACT. WHEN SPECIFIED, PAVEMENT MARKING SHALL CONFORM TO THIS DRAWING AND OTHER CONTRACT REQUIREMENTS.

(1) MINIMUM DISTANCE UNLESS OTHERWISE SHOWN ON THE PLAN.

(2) FACE OF OBJECT MARKERS W5-52R, AND W5-52L SHALL BE COVERED WITH TYPE F REFLECTIVE SHEETING.

(3) LOCATE OBJECT MARKER POST(S) BEHIND GUARDRAIL WHEN PRESENT.

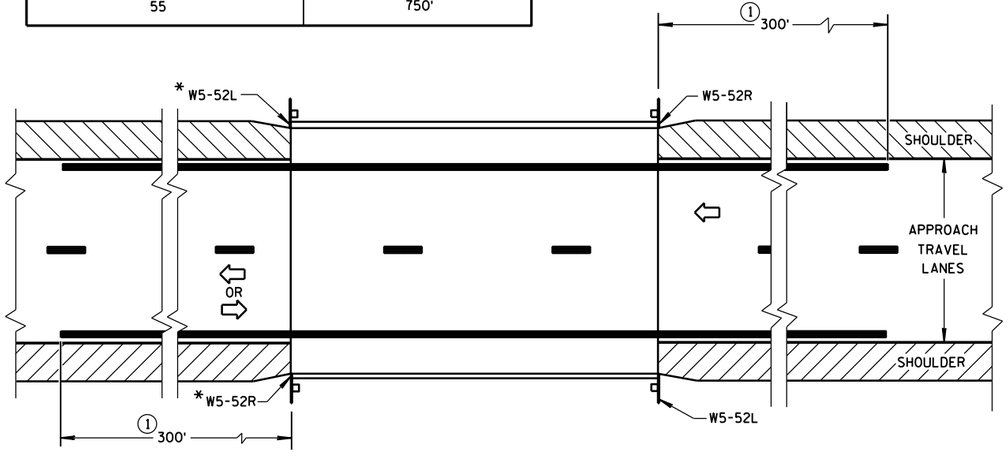
DISTANCE TABLE

POSTED OR 85th PERCENTILE SPEED	DISTANCE "A"
25	150'
30	200'
35	250'
40	300'
45	400'
50	550'
55	750'

SITUATION 1

WARRANTING CRITERIA:

BRIDGE WIDTH IS AT LEAST 16 FEET BUT LESS THAN 24 FEET

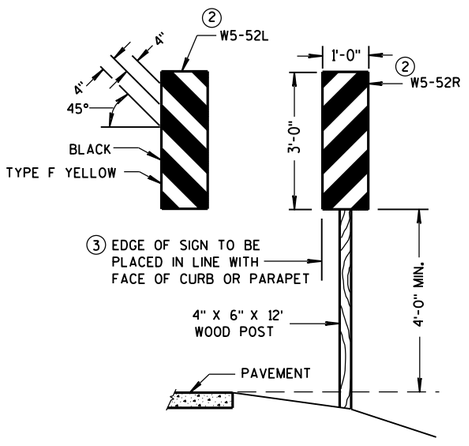


*OMIT ON ONE-WAY TRAVELLED WAYS

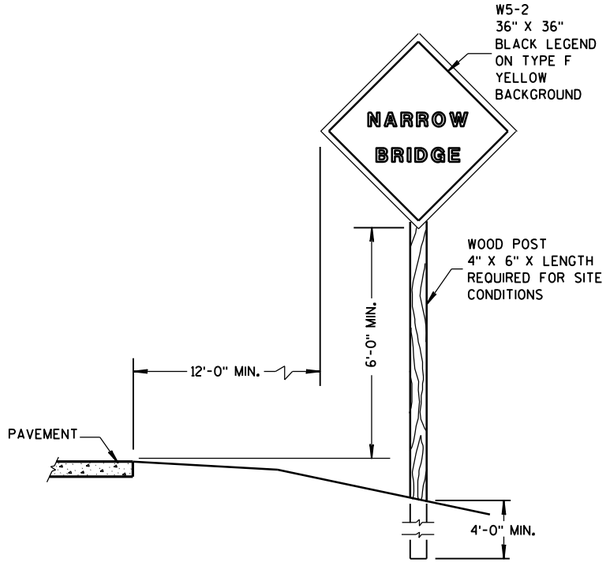
SITUATION 2

WARRANTING CRITERIA:

1. BRIDGE WIDTH IS AT LEAST 24 FEET AND
2. BRIDGE IS LESS THAN 6 FEET WIDER (ON EACH SIDE) THAN APPROACH TRAVEL LANES.



OBJECT MARKER PLACEMENT



SIGN PLACEMENT

SIGNING & MARKING
FOR TWO LANE BRIDGES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

3-2014 DATE

/S/ Travis Feltes
STATE TRAFFIC ENGINEER

FHWA

6

S.D.D. 15 C 6-7

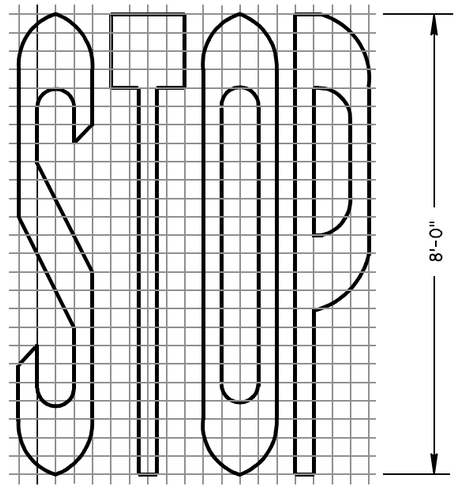
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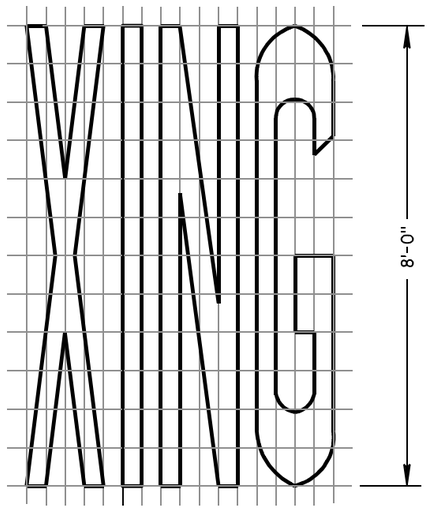
S.D.D. 15 C 6-7

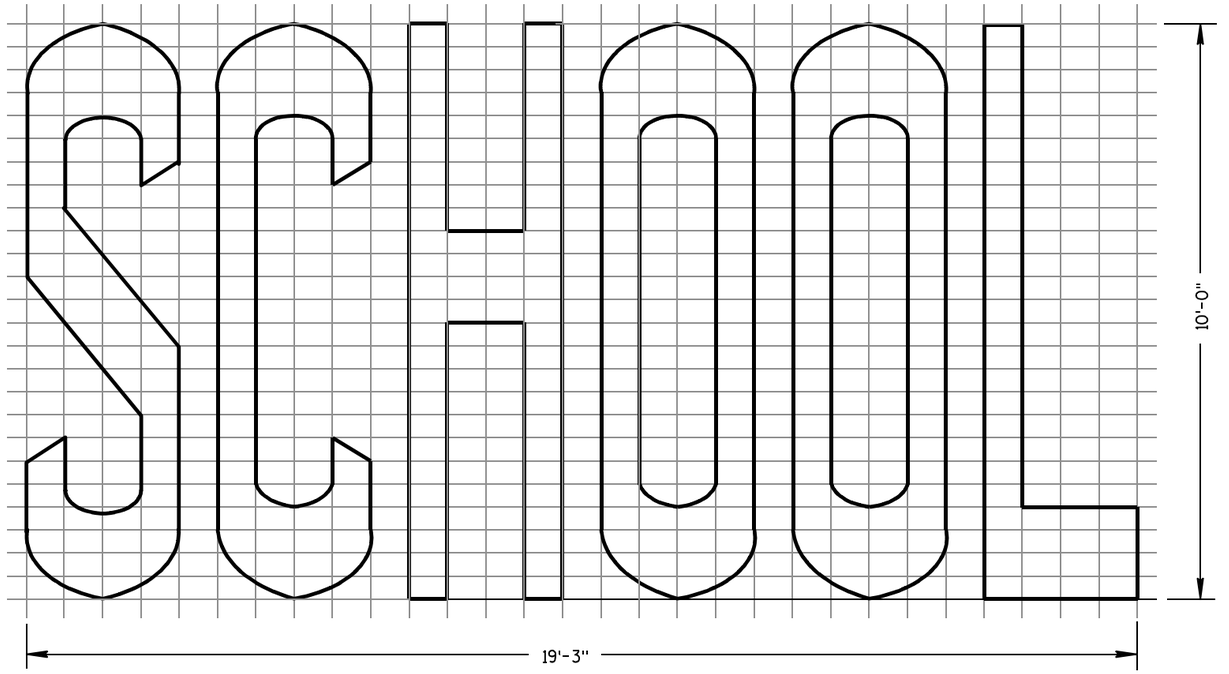
GENERAL NOTES

DETAILS OF INSTALLATION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

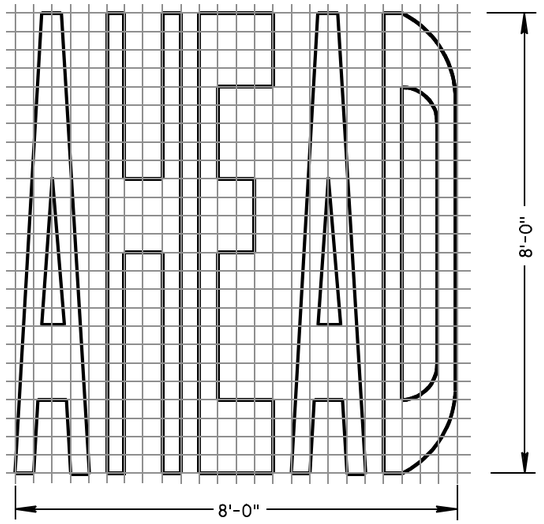
ALL LETTERS, ARROWS AND SYMBOLS SHALL BE IN CONFORMANCE WITH REQUIREMENTS INCLUDED IN "STANDARD ALPHABETS FOR HIGHWAY SIGNS AND PAVEMENT MARKING" BOOK BY THE FEDERAL HIGHWAY ADMINISTRATION. ALL LETTERS, ARROWS AND SYMBOLS SHALL BE WHITE AND REFLECTORIZED. SMALL DIFFERENCES IN DIMENSIONS WITHIN THE TOLERANCES OF THAT BOOK ARE ACCEPTABLE.

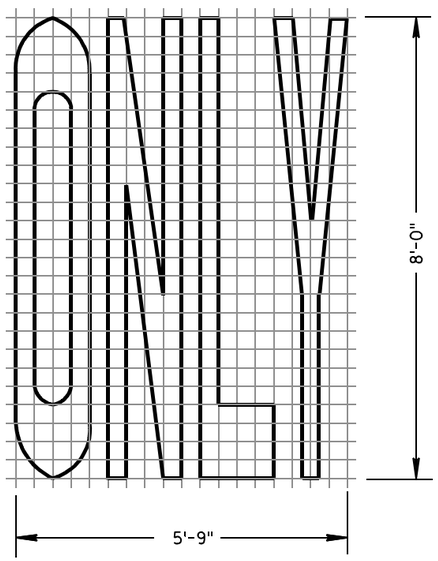


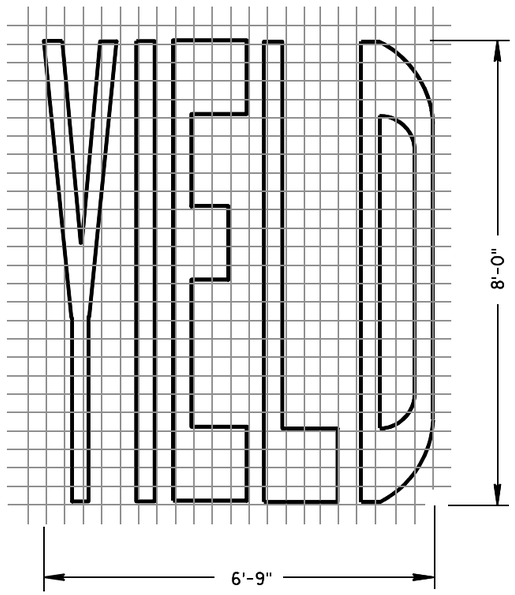


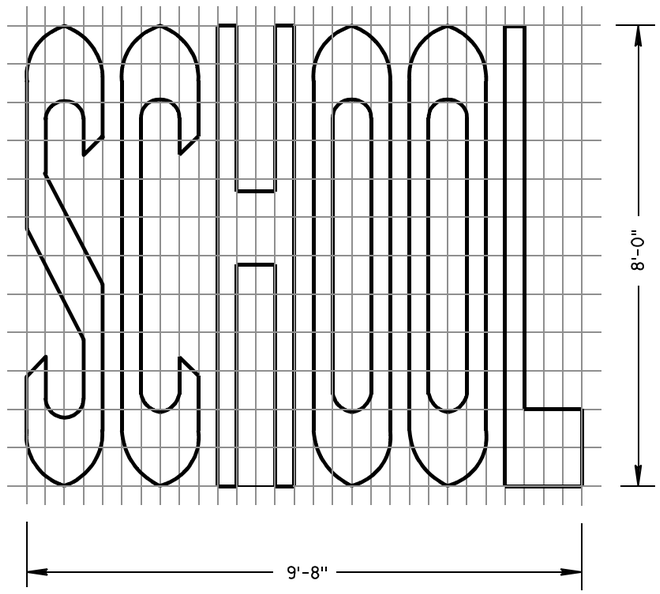


TWO-LANE









SINGLE-LANE

PAVEMENT MARKING WORDS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

7-1-11 DATE — /S/ Thomas N. Nothohm STATE TRAFFIC ENGINEER

FHWA

IGN

6

S.D.D. 15 C 7-12b

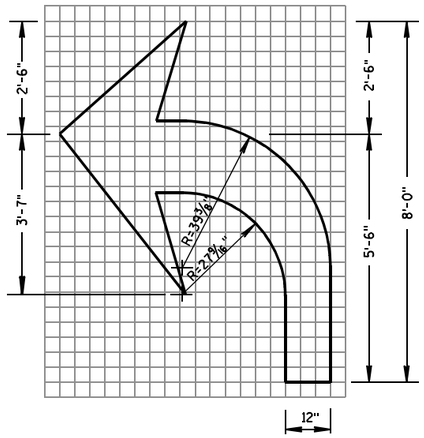
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S.D.D. 15 C 7-12b

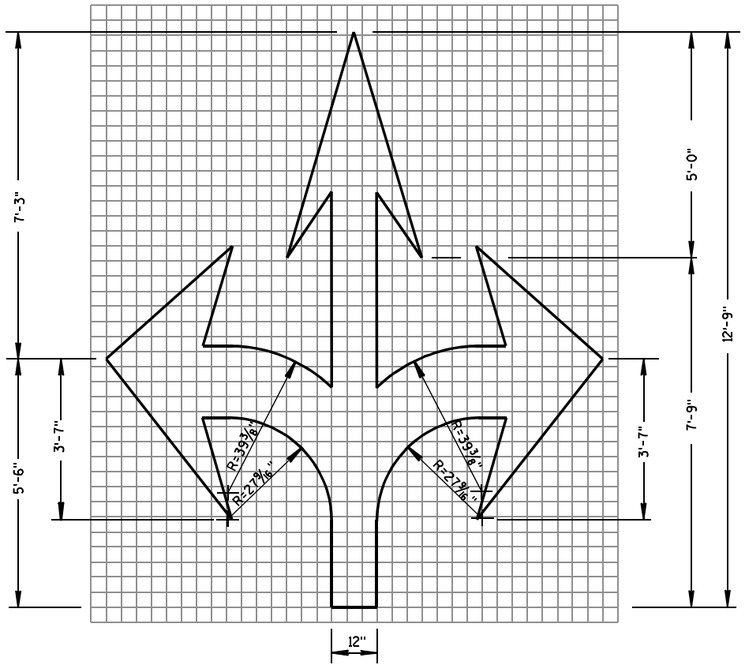
GENERAL NOTES

DETAILS OF INSTALLATION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

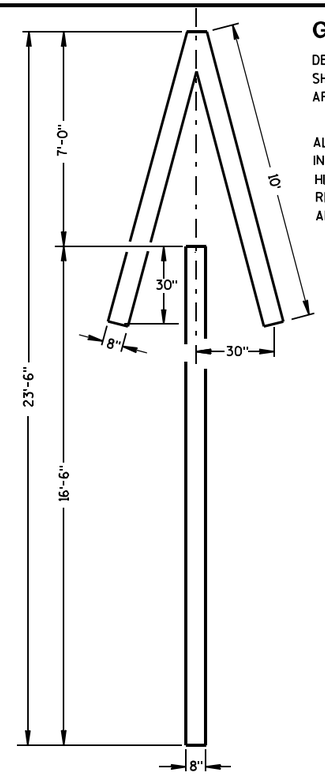
ALL LETTERS, ARROWS AND SYMBOLS SHALL BE IN CONFORMANCE WITH REQUIREMENTS INCLUDED IN "STANDARD ALPHABETS FOR HIGHWAY SIGNS AND PAVEMENT MARKING" BOOK BY THE FEDERAL HIGHWAY ADMINISTRATION. ALL LETTERS, ARROWS AND SYMBOLS SHALL BE WHITE AND REFLECTORIZED. SMALL DIFFERENCES IN DIMENSIONS WITHIN THE TOLERANCES OF THAT BOOK ARE ACCEPTABLE.



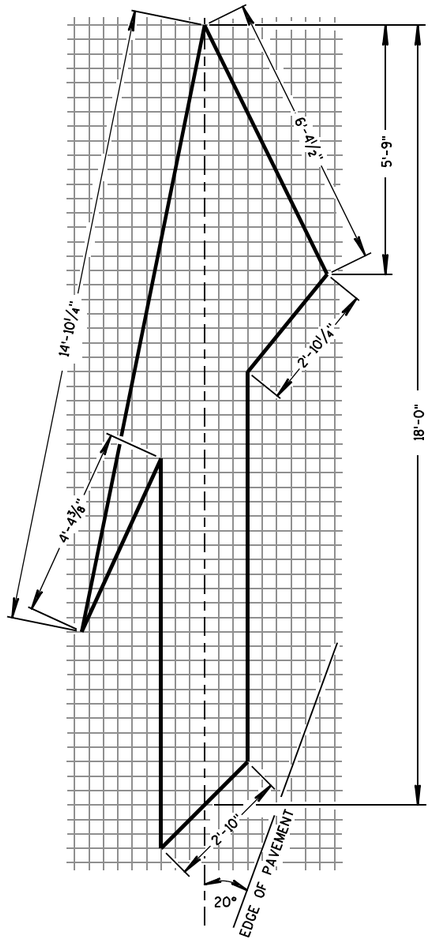
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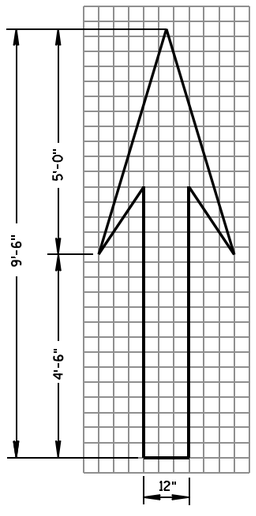
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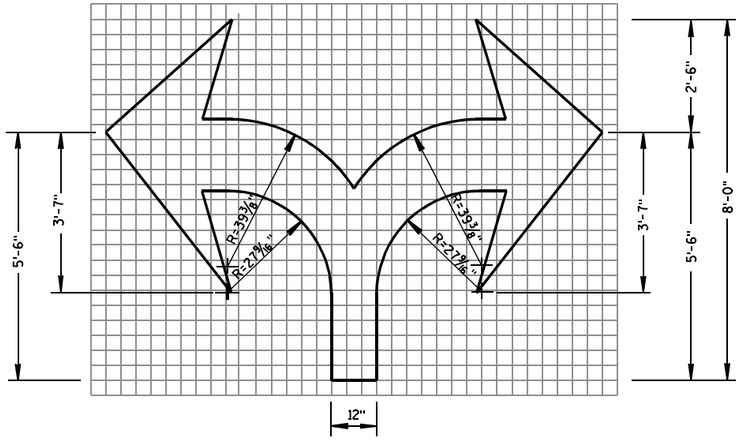
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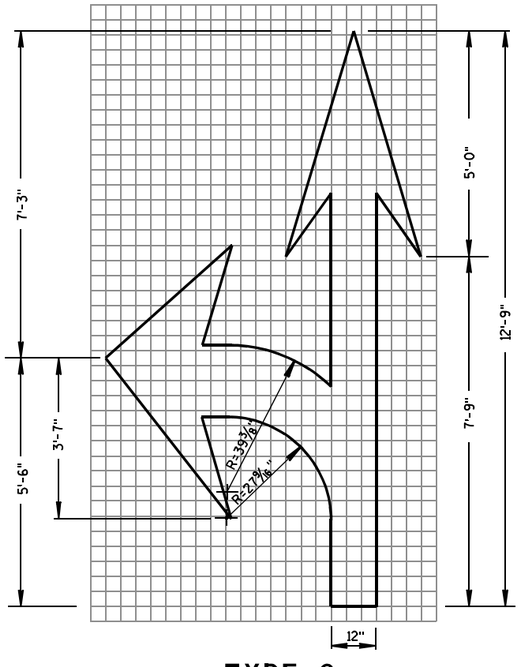
TYPE 5 LANE DROP ARROW



TYPE 1



TYPE 7



TYPE 3

PAVEMENT MARKING ARROWS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

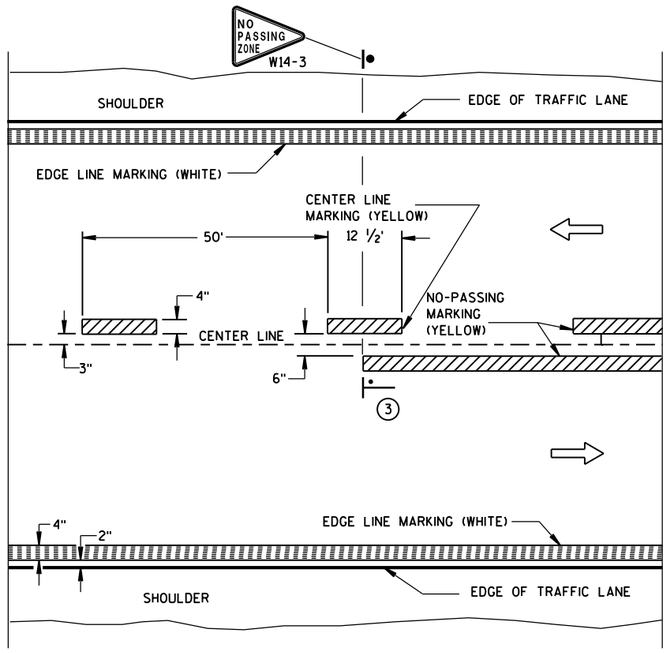
7/1/11 — DATE

/S/ Thomas N. Nathaam — STATE TRAFFIC ENGINEER

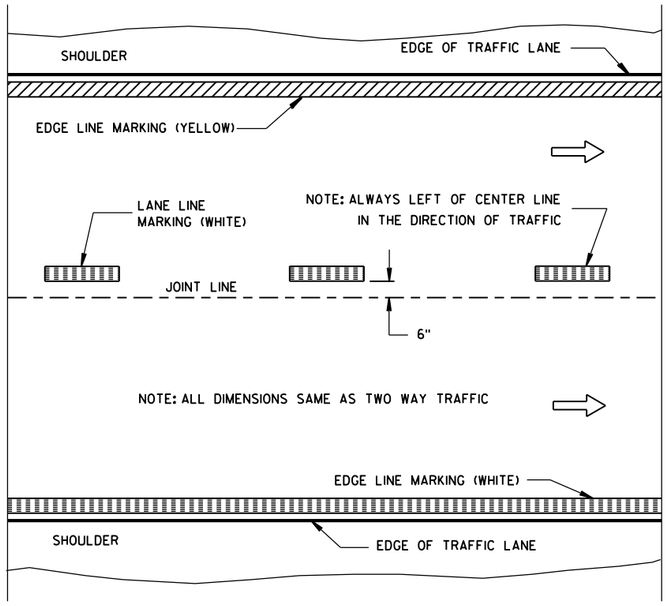
FHWA

6

S.D.D. 15 C 7-12c

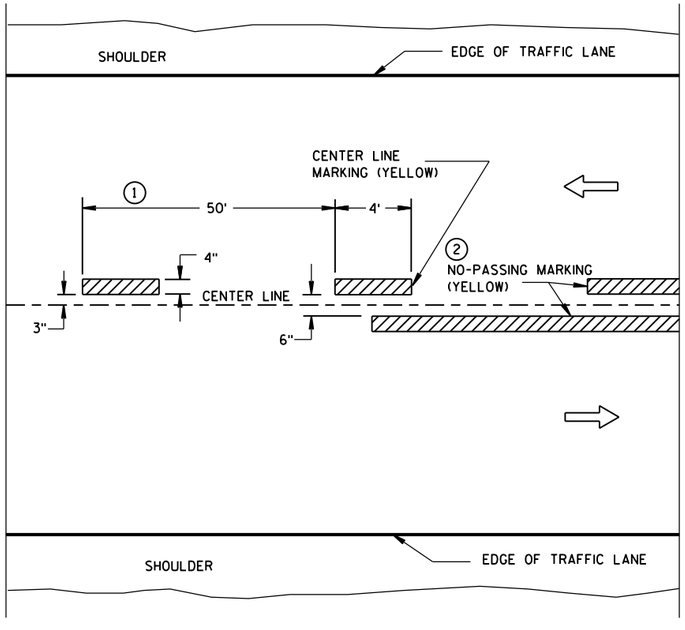


TWO WAY TRAFFIC

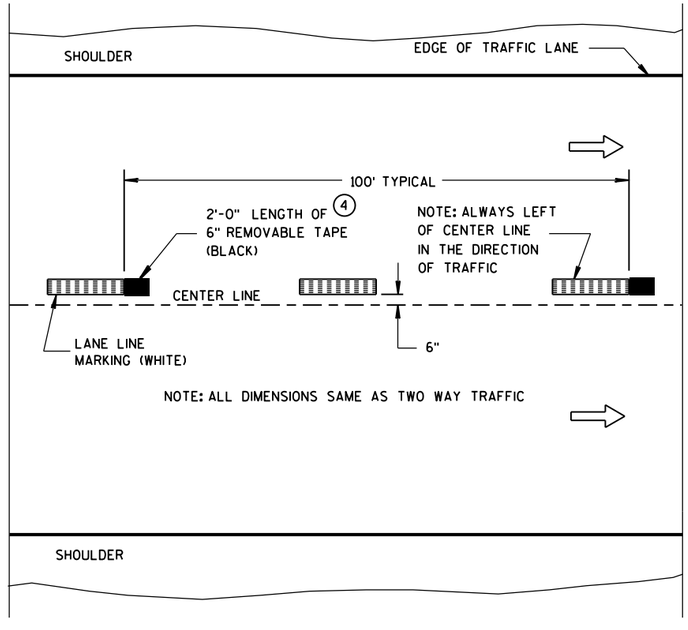


ONE WAY TRAFFIC

PERMANENT PAVEMENT MARKING



TWO WAY TRAFFIC



ONE WAY TRAFFIC

TEMPORARY (INTERMEDIATE) PAVEMENT MARKING

(SHOWS CYCLE FOR TEMPORARY CENTER LINE OR TEMPORARY LANE LINE MARKING)

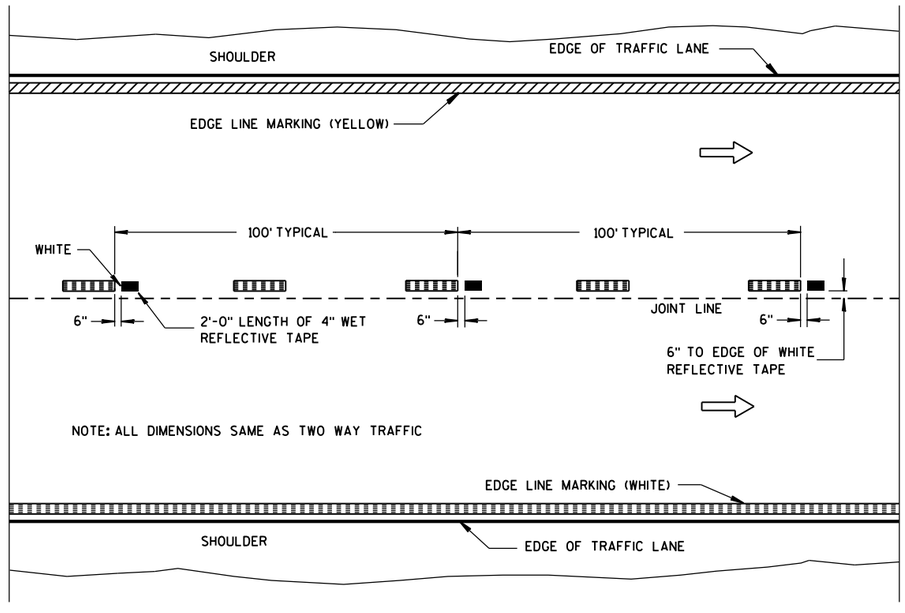
GENERAL NOTES

DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO STANDARD SPECIFICATIONS AND SPECIAL PROVISIONS.

1. HALF CYCLE LENGTHS (25'±) WITH 2' MINIMUM STRIPE LENGTHS SHALL BE PROVIDED ON ROADWAYS (INCLUDING TEMPORARY TRAVELED WAYS) WITH REVERSE CURVATURE, CURVATURE OF OVER 5 DEGREES OR WHEN DIRECTED BY THE ENGINEER TO MARK UNUSUAL ALIGNMENT OF THE TRAVELED WAY.
2. NO PASSING ZONE TEMPORARY PAVEMENT MARKING IS REQUIRED TO BE PLACED, WHERE APPROPRIATE, ALONG WITH CENTERLINE TEMPORARY PAVEMENT MARKING WHEN A SAME DAY PERMANENT PAVEMENT MARKING ITEM IS INCLUDED IN THE CONTRACT.
3. NO PASSING ZONE MARKINGS ARE PLACED ACCORDING TO "T" MARKINGS. IF EXISTING NO PASSING ZONE W14-3 SIGNS ARE BEYOND 50 FEET IN EITHER DIRECTION, THE SIGNS SHALL BE MOVED TO THE "T" MARKINGS.
4. CONCRETE ONLY.

NOTE

ARROW SYMBOL (⇨) SHOWS DIRECTION OF TRAVEL



WET REFLECTIVE TAPE SUPPLEMENT TO
SPRAYED OR NON WET REFLECTIVE TAPE LANE LINE

LEGEND

"T" MARKING

POST MOUNTED SIGN

PAVEMENT MARKING (MAINLINE)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

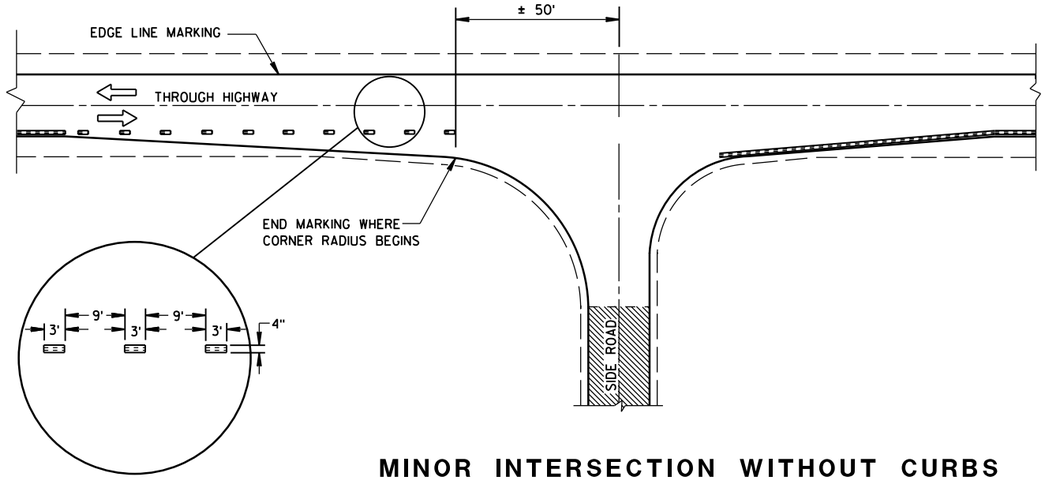
APPROVED
5-13-2013 DATE
/S/ Travis Feltes STATE TRAFFIC E
FHWA

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S.D.D. 15 C 8-16a

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S.D.D. 15 C 8-16a



MINOR INTERSECTION WITHOUT CURBS

GENERAL NOTES

EDGE LINES SHALL BE OMITTED THROUGH INTERSECTIONS. EDGE LINES SHALL BE CONTINUED THROUGH DRIVEWAYS.

(1) WHEN DISTANCE "A" IS LESS THAN 250 FEET, OMIT LANE LINE.

(2) WHEN DISTANCE "B" IS LESS THAN 100 FEET, OMIT CHANNELIZING LANE LINE.

(3) ALTERNATIVE MARKING SHALL BE PROVIDED WHEN SPECIFIED IN THE CONTRACT. TYPICAL SITUATIONS WHERE THIS MARKING MAY BE REQUIRED ARE WHERE THE INTERSECTION IS ON A SHARP HORIZONTAL CURVE OR CREST VERTICAL CURVE IN AN UNLIGHTED AREA SUCH THAT THE EDGE LINE MAY BE MISLEADING TO THE MOTORIST OR DISAPPEAR FROM SIGHT.

(4) THE EDGE LINE IN THE TAPER AREAS OF THE BYPASS LANE AND THE BYPASS LANE SHALL BE LOCATED 1-FOOT FROM EDGE OF PAVEMENT TO THE OUTSIDE EDGE OF EDGE LINE.

(5) BARRIER LINE ENDS AT SIDE ROAD PAVEMENT/SURFACE EDGE EXTENSION.

(6) BARRIER LINE STARTS 500 FEET PRIOR TO THE BYPASS TAPER.

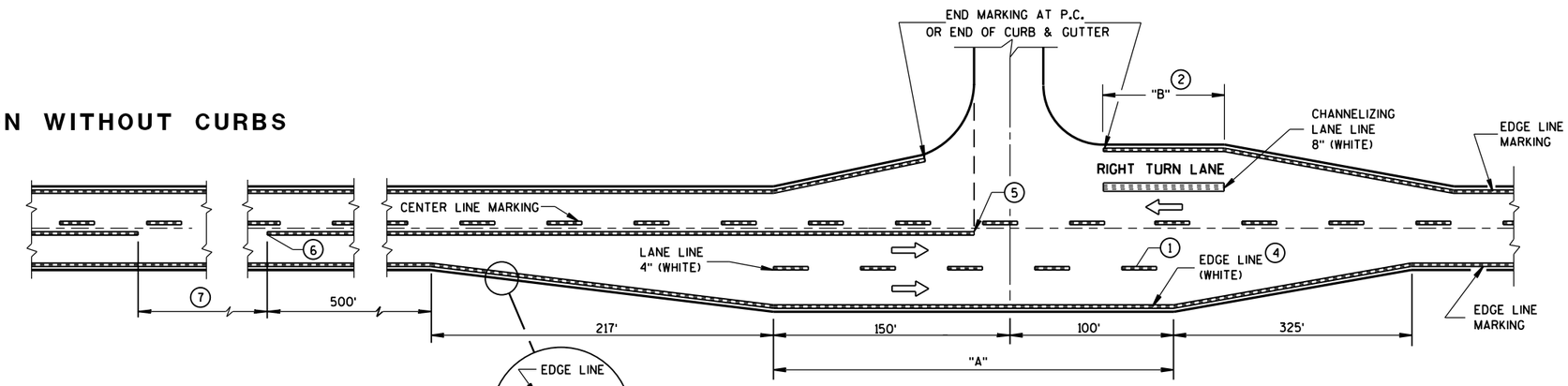
(7) IF THE DISTANCE BETWEEN 2 SUCCESSIVE NO-PASSING ZONES IS LESS THAN THE MINIMUM DISTANCE BETWEEN ZONES, CONNECT THE 2 ZONES.

(8) 3' LINE 9' GAP, EXCEPT RETRACE THE EXISTING LINE - GAP PATTERN WHERE EXISTING MARKINGS ARE IN PLACE.

ARROW SYMBOL (⇨) SHOWS DIRECTION OF TRAVEL

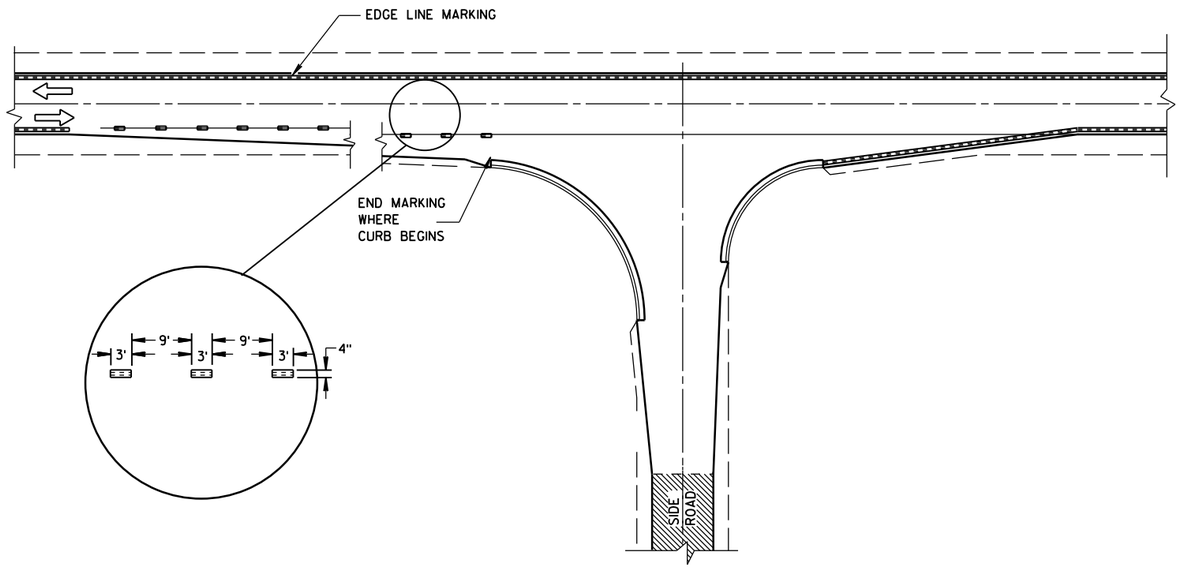
(7)

POSTED SPEED (MPH)	MINIMUM DISTANCE BETWEEN ZONES (FEET)
25 - 30	528
35 - 40	528
45 - 50	686
55	792



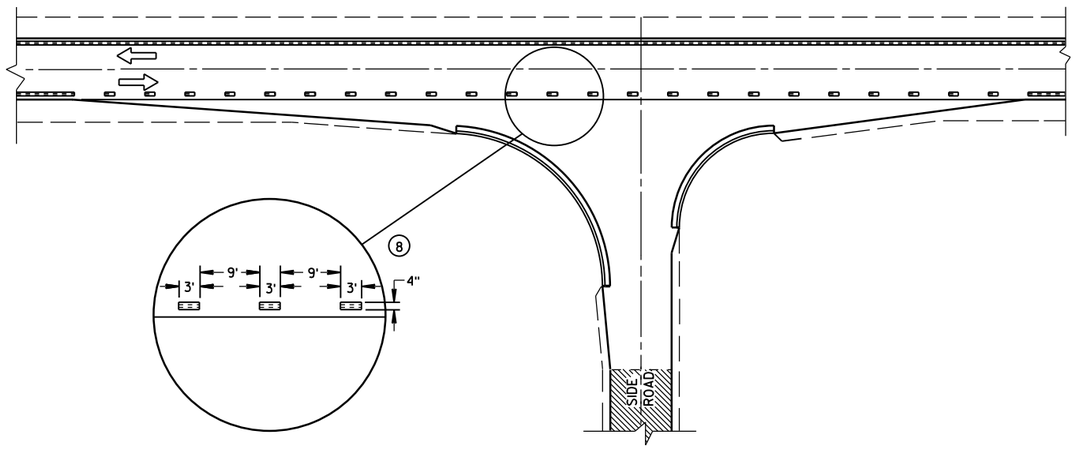
MAJOR INTERSECTIONS

(INTERSECTION WITH FULL RIGHT TURN LANE OR BYPASS LANES)



MINOR INTERSECTION WITH CURBS

(TYPICAL MARKING)



MINOR INTERSECTION WITH CURBS

(3) (FOR SPECIAL CONDITIONS AS SPECIFIED)

PAVEMENT MARKING
(INTERSECTIONS)

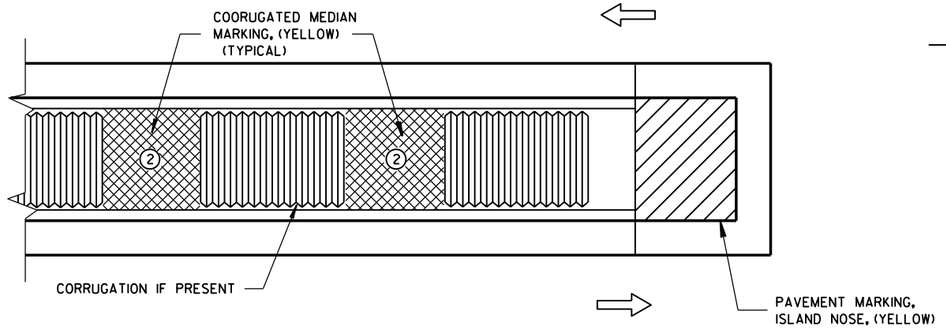
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR 207

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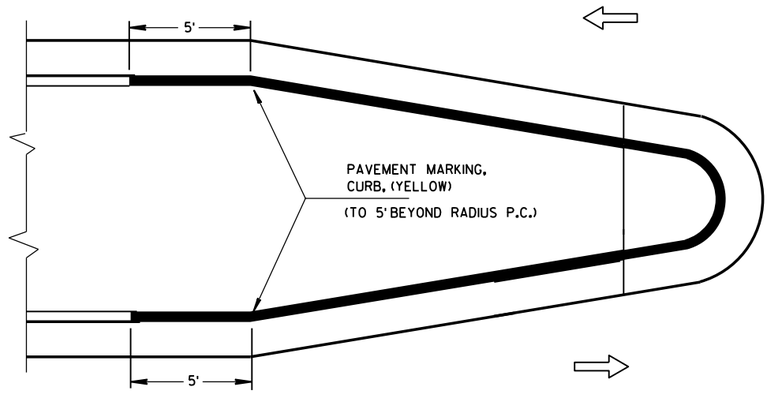
S.D.D. 15 C 8-16b

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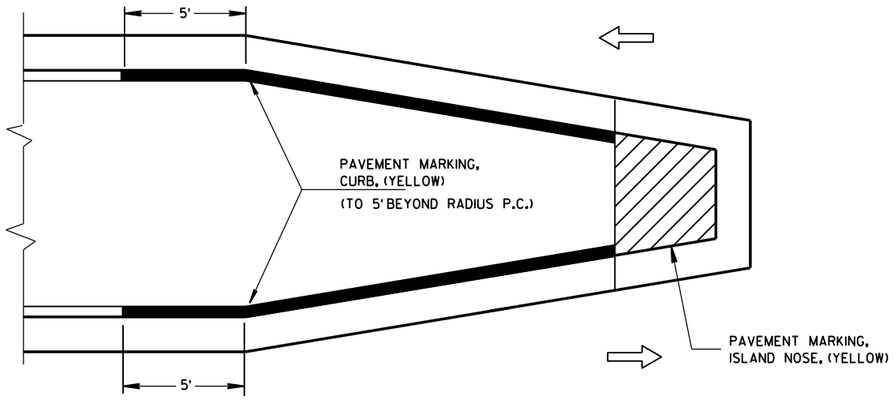
S.D.D. 15 C 8-16b



MEDIAN ISLAND WITH SQUARE BLUNT NOSE

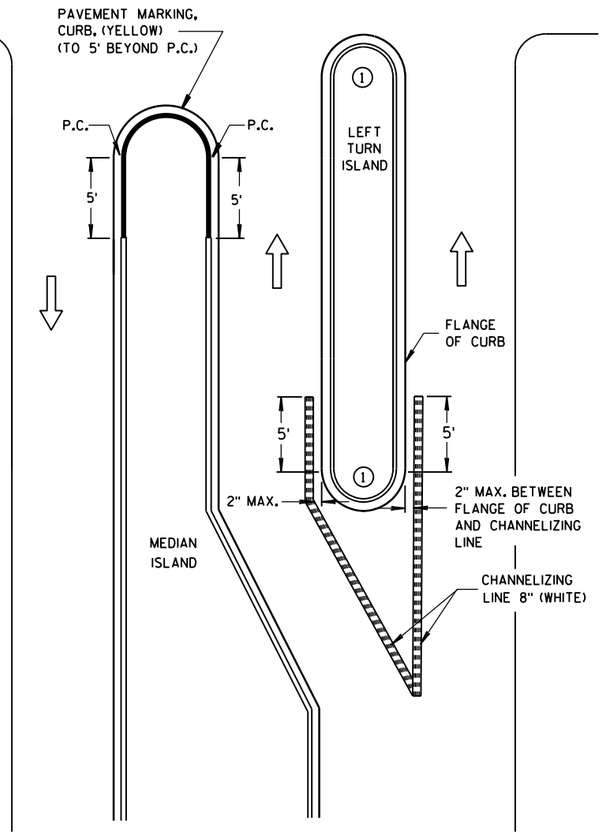


MEDIAN ISLAND WITH ROUND BLUNT NOSE



MEDIAN ISLAND WITH SLOPED NOSE

TYPICAL PLACEMENT OF PAVEMENT MARKING ON MEDIAN ISLANDS

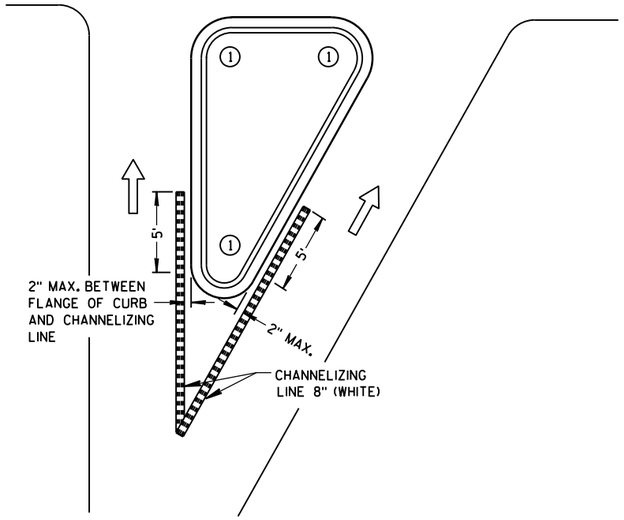


LEFT TURN & MEDIAN ISLAND

GENERAL NOTES

1. DO NOT MARK CURB NOSES THAT SEPARATE LANES OF TRAFFIC TRAVELING IN THE SAME DIRECTION.

2. WHEN CONCRETE CORRUGATED MEDIAN IS CONSTRUCTED TO SEPARATE TRAFFIC OPERATING IN THE OPPOSING DIRECTION YELLOW PAVEMENT MARKING SHALL BE APPLIED TO THE FLAT PORTION OF THE CONCRETE CORRUGATED MEDIAN. THE ITEM OF PAVEMENT MARKING, CONCRETE CORRUGATED MEDIAN, WILL BE MEASURED IN PLACE AND AND ACCEPTED IN ACCORDANCE WITH THE CONTRACT AND PAID FOR AT THE CONTRACT UNIT PRICE PER SQUARE FOOT.



RIGHT TURN ISLAND

LEGEND

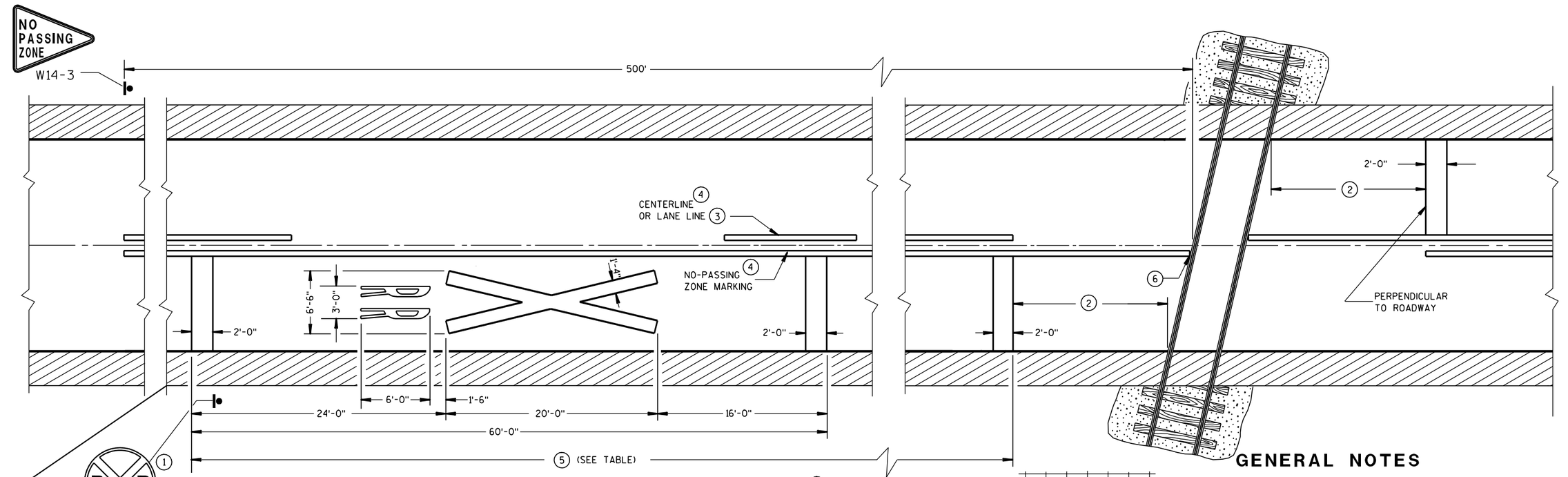
- ISLAND NOSE MARKING
- CURB MARKING
- CORRUGATED MEDIAN MARKING
- DIRECTION OF TRAVEL

PAVEMENT MARKING
(ISLANDS)

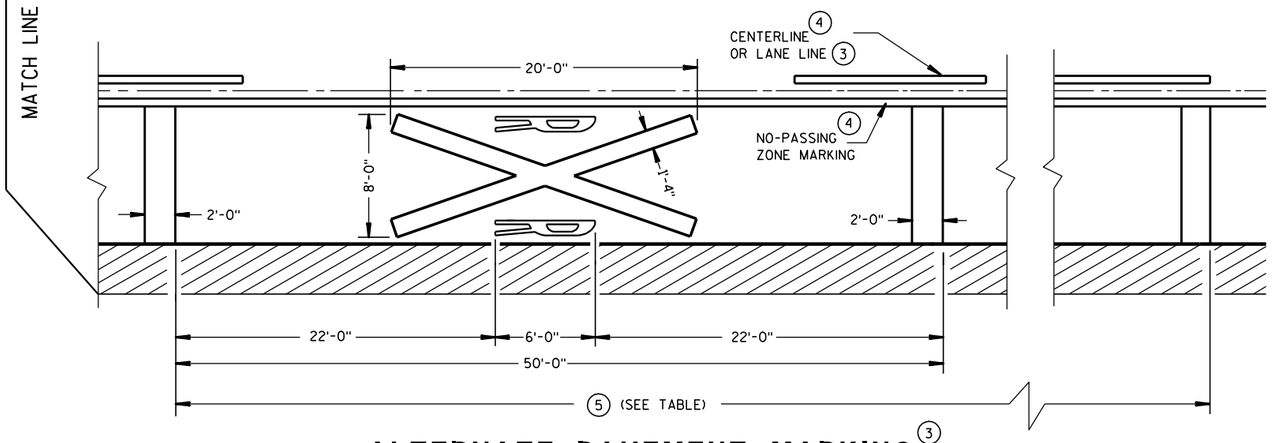
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOI

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S.D.D. 15 C 8-16f



PREFERRED PAVEMENT MARKING (3)

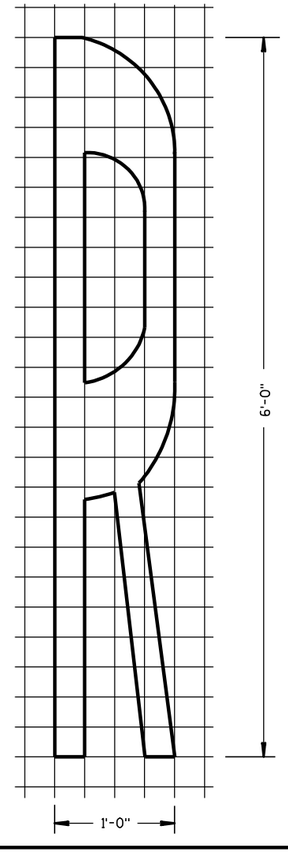


ALTERNATE PAVEMENT MARKING (3)

(5)

Posted Speed (M.P.H.)	Dimension Range (Feet)
25	150*- 250
30	200*- 300
35	250*- 450
40	300*- 500
45	400*- 650
50	550*- 800
55	750*- 1000
60	1000*- 1250
65	1000*- 1250

* THE MINIMUM DISTANCES IN THE TABLE ARE DESIRABLE AND SHOULD BE USED. THE DISTANCES MAY BE INCREASED UP TO THE MAXIMUM TO ALLOW FOR FIELD CONDITIONS SUCH AS THE CLOSE PROXIMITY OF DRIVEWAYS, BRIDGES, SIDEROADS OR OTHER FEATURES THAT WOULD PROHIBIT THE MINIMUM DISTANCES FROM BEING USED.



GENERAL NOTES

DETAILS OF CONSTRUCTION, MATERIALS, AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

A THREE-LANE ROADWAY SHOULD BE MARKED WITH A CENTERLINE FOR TWO-LANE APPROACH OPERATION ON THE APPROACH TO A CROSSING.

ON MULTI-LANE ROADS THE TRANSVERSE BANDS SHOULD EXTEND ACROSS ALL APPROACH LANES, AND INDIVIDUAL R X R SYMBOLS SHOULD BE USED IN EACH APPROACH LANE. ALL LETTERS AND SYMBOLS SHALL BE IN CONFORMANCE WITH THE "STANDARD ALPHABETS FOR HIGHWAY SIGNS AND PAVEMENT MARKINGS" (ADOPTED BY THE FEDERAL HIGHWAY ADMINISTRATION).

CENTER OR LANE LINES AND NO-PASSING ZONE MARKINGS SHOWN ON THIS DRAWING ARE REQUIRED AND PAID FOR UNDER OTHER ITEMS IN THE CONTRACT.

(1) A PORTION OF THE PAVEMENT MARKING SYMBOL SHOULD BE DIRECTLY OPPOSITE THE ADVANCE WARNING SIGN (W10-1).

(2) MINIMUM 8' FROM ANY RAILROAD WARNING DEVICES (SIGNALS, GATES, ETC.) OR 25' FROM THE NEAREST RAIL, WHICHEVER DISTANCE IS GREATER.

(3) REFLECTIVE WHITE.

(4) REFLECTIVE YELLOW 500' MINIMUM. MARKING LIMITS MAY BE EXTENDED AS DIRECTED BY THE ENGINEER TO MEET ADJACENT NO-PASSING ZONE MARKINGS.

(5) TABLE BASED UPON 2C-4 WISCONSIN SUPPLEMENT OF MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES.

(6) FOR MULTIPLE TRACK CROSSINGS, THE BARRIER LINE SHALL EXTEND TO THE NEAR RAIL OF THE FURTHEST TRACK IN THE DIRECTION OF HIGHWAY TRAVEL.

SIGNING AND PAVEMENT MARKING DETAILS FOR RAILROAD-HIGHWAY GRADE CROSSINGS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

1-9-2012
DATE

/S/ Thomas N. [illegible]
STATE TRAFFIC ENGINEER

FHWA

S.D.D. 15 C 9-9a

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LEGEND

SIGN ON PORTABLE OR PERMANENT SUPPORT

DIRECTION OF TRAFFIC

WORK AREA

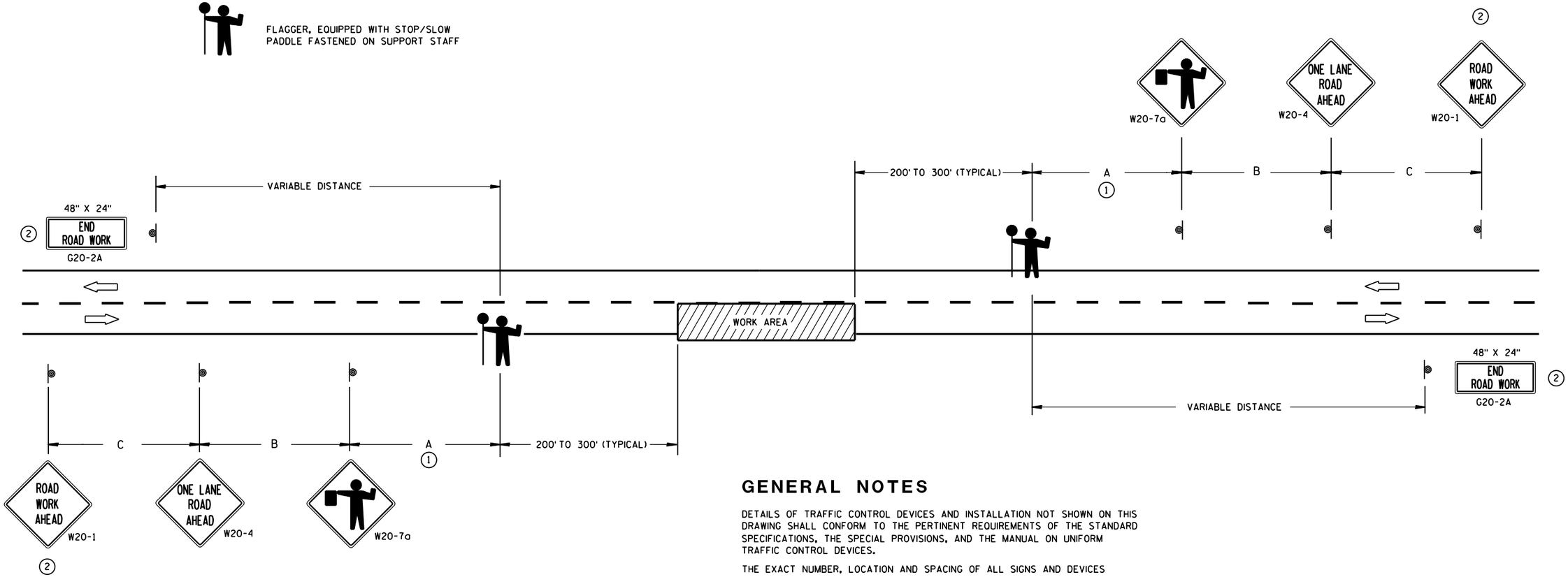
FLAGGER, EQUIPPED WITH STOP/SLOW PADDLE FASTENED ON SUPPORT STAFF

SIGN SPACING TABLE

SPEED LIMIT	SIGN SPACING A,B,C
25-35 MPH	200'
35-40 MPH	350'
45-55 MPH	500'

BE PREPARED TO STOP
W3-4

USE OF THE "BE PREPARED TO STOP" SIGN IS OPTIONAL. WHEN USED, THIS SIGN SHALL BE LOCATED BETWEEN THE W20-7a AND W20-4 SIGNS. A 500' TYPICAL SPACING SHALL BE PROVIDED BETWEEN THE SIGNS.



(1) FOR A MOVING WORK OPERATION,
SIGNING FOR BOTH DIRECTIONS SHALL BE REESTABLISHED (AS SIMULTANEOUSLY AS PRACTICAL) AT APPROXIMATELY 3500 FOOT INTERVALS IN THE MOVING WORK OPERATION OR AS APPROVED BY THE ENGINEER.

(2) SIGN NOT REQUIRED IF FLAGGING OPERATION OCCURS WITHIN A SIGNED ROAD WORK ZONE AREA.

GENERAL NOTES

DETAILS OF TRAFFIC CONTROL DEVICES AND INSTALLATION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS, THE SPECIAL PROVISIONS, AND THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES.

THE EXACT NUMBER, LOCATION AND SPACING OF ALL SIGNS AND DEVICES (AND THE LOCATION OF ALL FLAGGERS) SHALL BE ADJUSTED TO FIT FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

THE FIRST ADVANCE WARNING SIGN SHOULD TYPICALLY BE LOCATED IN ADVANCE OF THE ANTICIPATED TRAFFIC BACKUP OR QUEUE.

WHEN A SIDE ROAD OR RAMP INTERSECTS THE FACILITY ON WHICH THE WORK IS BEING PERFORMED, ADDITIONAL TRAFFIC CONTROLS SHALL BE PROVIDED AS SPECIFIED IN THE PLANS AND/OR THE SPECIAL PROVISIONS OR AS APPROVED BY THE ENGINEER.

FLAGGERS SHALL BE IN SIGHT OF EACH OTHER OR IN DIRECT COMMUNICATION AT ALL TIMES. THEY SHALL BE EQUIPPED WITH STOP/SLOW PADDLES FASTENED ON SUPPORT STAFFS. WHEN THE FLAGGING OPERATION IS NOT IN EFFECT, COVER OR REMOVE ALL TEMPORARY TRAFFIC CONTROL SIGNS.

ALL SIGNS ARE 48" X 48" UNLESS OTHERWISE NOTED.

TRAFFIC CONTROL FOR LANE CLOSURE (SUITABLE FOR MOVING OPERATIONS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

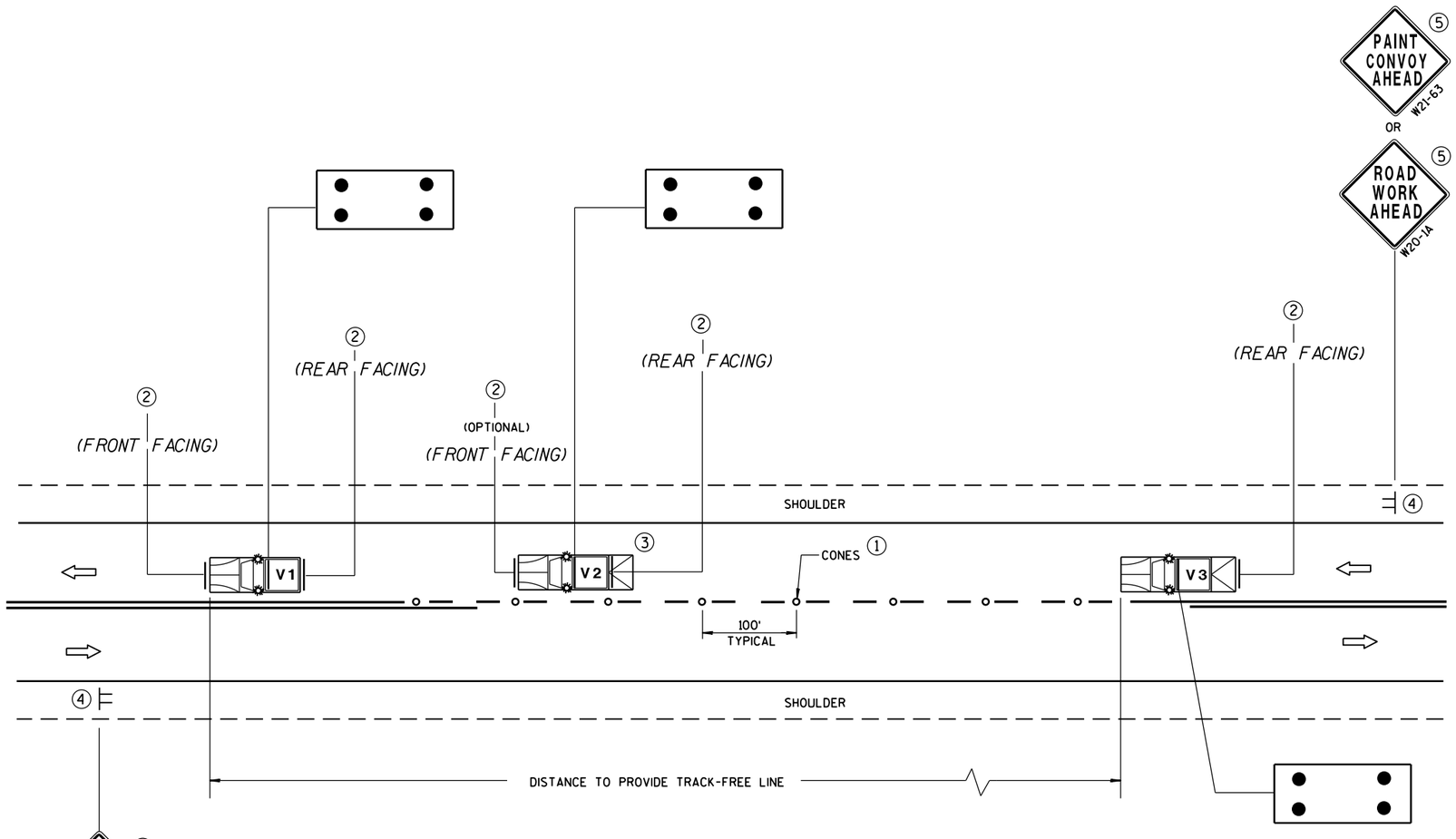
APPROVED
8/2013 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER
FHWA

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S.D.D. 15 C 12-4

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S.D.D. 15 C 12-4



MOVING PAVEMENT MARKING OPERATIONS
TWO-LANE TWO-WAY ROADWAY

GENERAL NOTES

ALL VEHICLES SHALL BE EQUIPPED WITH TWO 360 DEGREE HIGH INTENSITY YELLOW FLASHING LIGHTS OR STROBE LIGHTS AND OPERATED WITH HEADLIGHTS TURNED ON.

VEHICLES SHALL BE EQUIPPED WITH REAR FACING TYPE B OR C FLASHING ARROW PANEL OPERATING IN CAUTION MODE. SIGNS PLACED ON VEHICLES MUST NOT OBSCURE THE ARROW PANEL.

ALL SIGNS ARE 48" X 48" UNLESS OTHERWISE SPECIFIED.

IF SPEED LIMIT IS 40 MPH OR LESS STATIONARY SIGNS MAY BE OMITTED IF CONES ARE USED.

ALTERNATE SIGN MESSAGES, SUCH AS "PAINT CREW AHEAD" OR "ROAD PAINTING AHEAD" MAY BE USED.

DISTANCE BETWEEN VEHICLES MAY VARY ACCORDING TO TERRAIN, SIGHT DISTANCE, PAINT DRYING TIME, AND OTHER FACTORS. WHENEVER ADEQUATE STOPPING SIGHT DISTANCE EXISTS TO THE REAR, SHADOW VEHICLES SHOULD MAINTAIN THE MINIMUM DISTANCE FROM THE WORK VEHICLE AND PROCEED AT THE SAME SPEED AS THE WORK VEHICLE. SHADOW VEHICLES SHOULD SLOW DOWN IN ADVANCE OF VERTICAL OR HORIZONTAL CURVES THAT RESTRICT SIGHT DISTANCE.

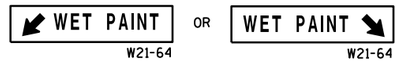
THE WORK AND SHADOW VEHICLES SHOULD PULL OVER PERIODICALLY TO ALLOW TRAFFIC TO PASS.

THIS DRAWING SHALL BE USED FOR CENTERLINE OR EDGELINE MARKING.

WHEN NO WORK ACTIVITY IS TAKING PLACE, REMOVE OR TURN THE STATIONARY WARNING SIGNS AWAY FROM TRAFFIC.

(1) CONES MAY BE OMITTED ON PAINTED LINE IF APPROVED BY THE ENGINEER. CONSIDER PAVEMENT MARKING DRY OR CURE TIMES AND TRAFFIC VOLUME.

(2) USE STANDARD SIGN W21-64 WITH APPROPRIATE ARROW.



(3) OPTIONAL TRUCK-MOUNTED ATTENUATOR.

(4) SIGNS SHALL BE REPEATED APPROXIMATELY EVERY THREE MILES.

(5) IF CONSTRUCTION WORK ZONE SIGNS ARE IN PLACE, W20-1 OR W21-63 ARE NOT REQUIRED.

LEGEND

V1	LEAD VEHICLE
V2	SHADOW VEHICLE
V3	TRAIL VEHICLE WITH TMA
TMA	TRUCK-MOUNTED ATTENUATOR
⊢	SIGN ON TEMPORARY SUPPORT
⇨	DIRECTION OF TRAFFIC
o	CONES
⁘	FLASHING ARROW PANEL (CAUTION)

MOVING PAVEMENT MARKING OPERATION
TWO-LANE TWO-WAY ROADWAY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

DATE

/S/ Peter Amakobe Atepe
STATEWIDE WORK ZOI SAFETY ENGIN

211

C

FHWA

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S.D.D. 15 C 19-3a

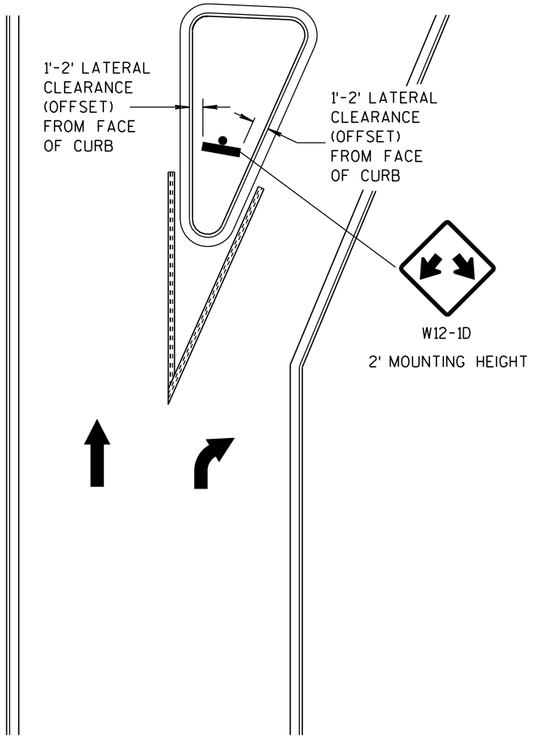
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S.D.D. 15 C 19-3a

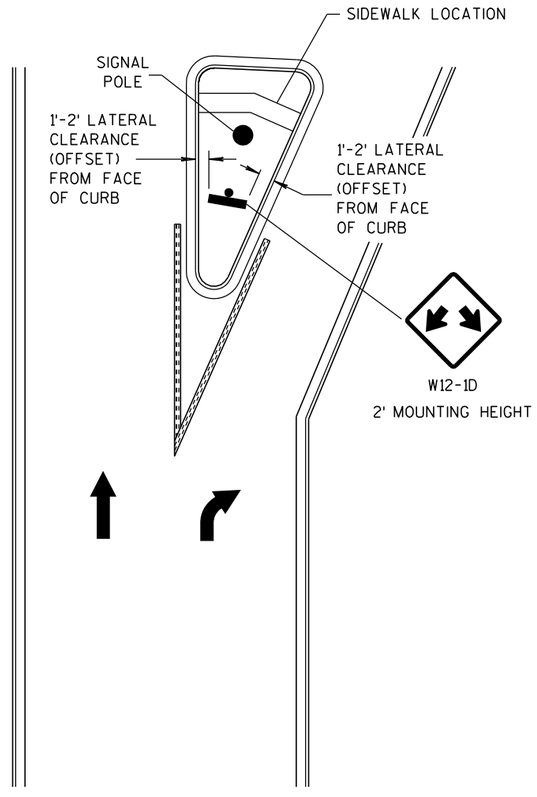
GENERAL NOTE

APPLIES TO ISLANDS AT LEFT TURNS AT ONE WAY ROADWAYS AS WELL.

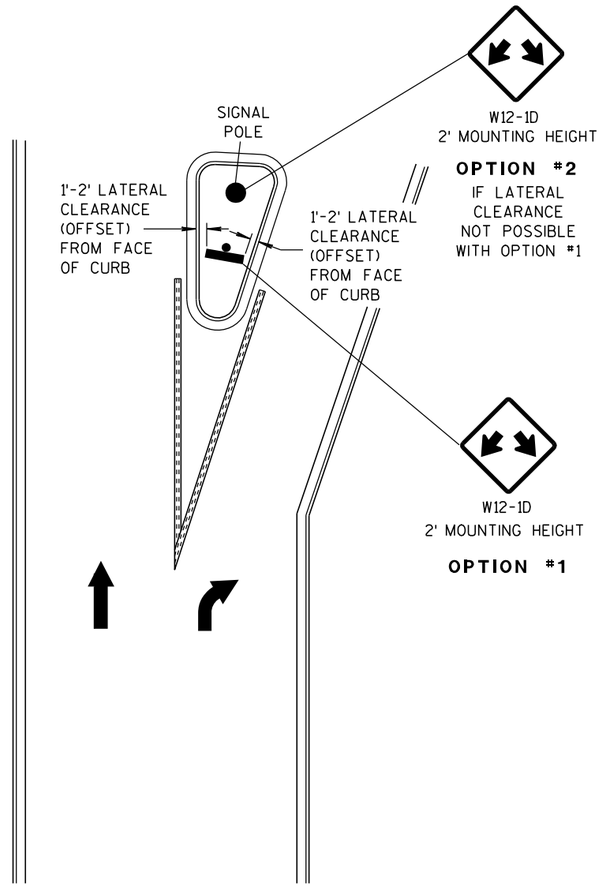
SEE MISCELLANEOUS QUANTITIES FOR SIGN SIZE.



LARGE RIGHT TURN ISLAND



LARGE RIGHT TURN ISLAND
WITH SIGNAL POLE



SMALL RIGHT TURN ISLAND

DOUBLE ARROW WARNING SIGN PLACEMENT

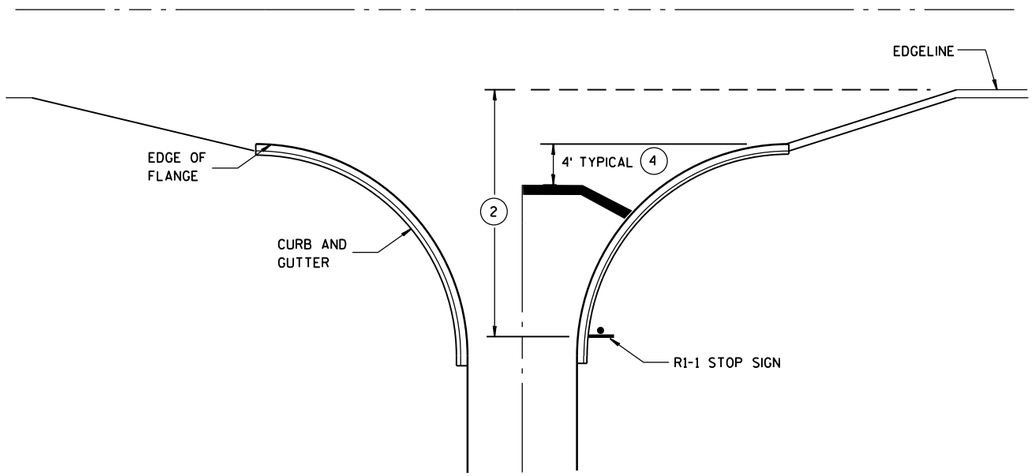
DOUBLE ARROW WARNING SIGN PLACEMENT	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
10-22-08 DATE	/S/ Thomas N. Nothdurft STATE TRAFFIC ENGINEER
FHWA	

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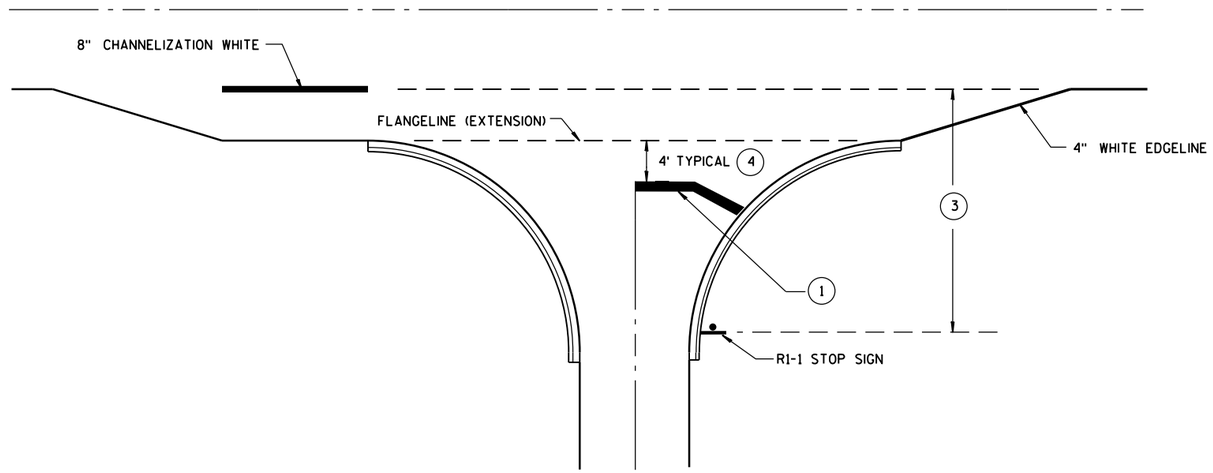
S.D.D. 15 C 27-1

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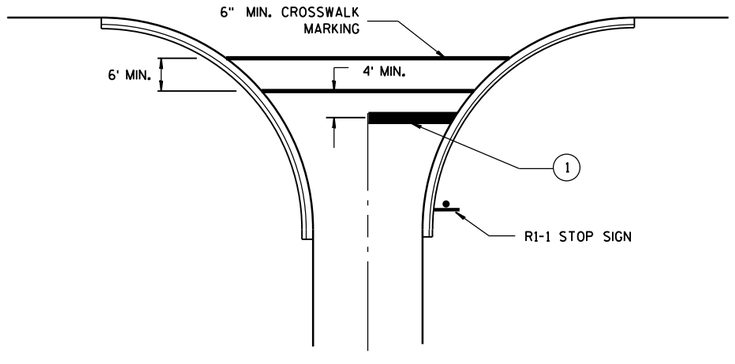
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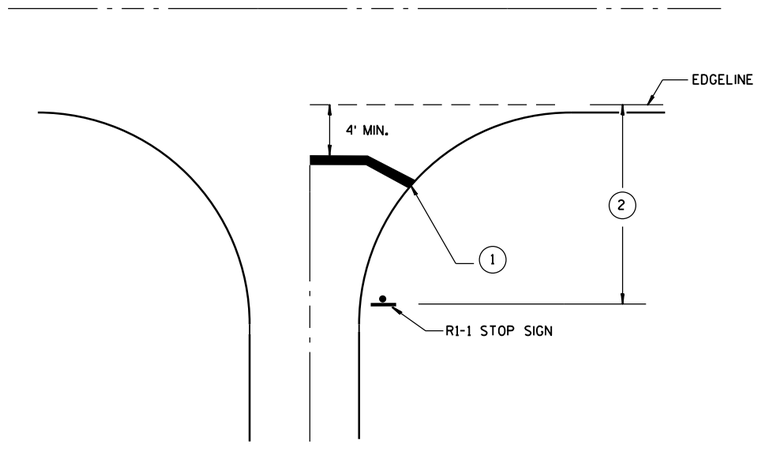
TYPICAL STOP LINE PAVEMENT MARKING WITH CURB AND GUTTER



TYPICAL STOP LINE PAVEMENT MARKING FOR SIDEROADS WITH RIGHT TURN LANE



TYPICAL STOP LINE PAVEMENT MARKING FOR SIDEROADS WITH CROSSWALK MARKING



TYPICAL STOP LINE PAVEMENT MARKING WITHOUT CURB AND GUTTER

GENERAL NOTES

1. 18-INCH STOP LINES MAY BE DELETED OR ADDED BY THE PROJECT ENGINEER BASED ON VISIBILITY AND SIGHT LINES.
2. IF STOP SIGN IS LESS THAN OR EQUAL TO 40 FEET FROM THE EDGELINE THAN NO STOP LINE IS REQUIRED.
3. IF STOP SIGN IS LESS THAN OR EQUAL TO 30 FEET FROM THE FLANGELINE EXTENSION THAN NO STOP LINE IS REQUIRED.
4. MOVE CLOSER TO EDGE OF TRAVEL LANE AS NEEDED FOR VISIBILITY AND SIGHT LINES.

STOP LINE AND CROSSWALK PAVEMENT MARKING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

4/30/2013
DATE

/S/ Travis Feltes
STATE TRAFFIC E

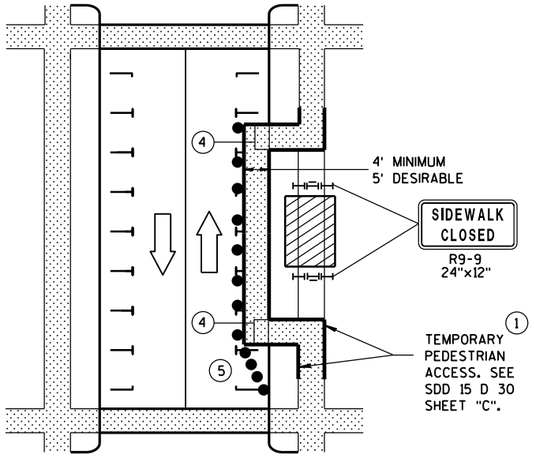
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S.D.D. 15 C 33-1

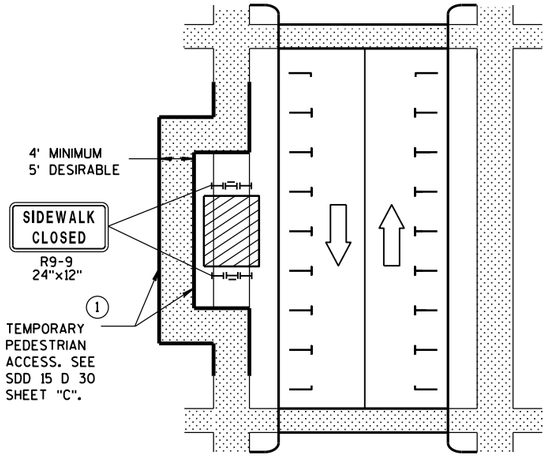
S.D.D. 15 C 33-1

NOTE: MAY BE USED ON ROADWAY WITH POSTED SPEED OF LESS THAN 40 MPH.

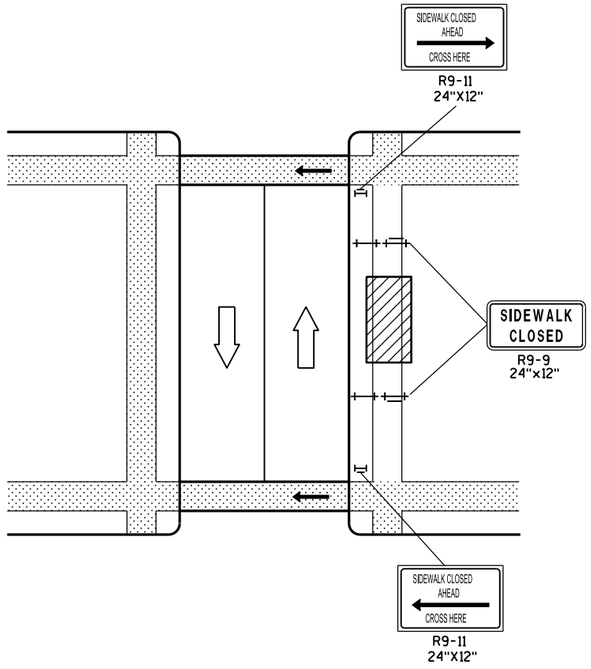


MID-BLOCK SIDEWALK CLOSURE IN PARKING LANE

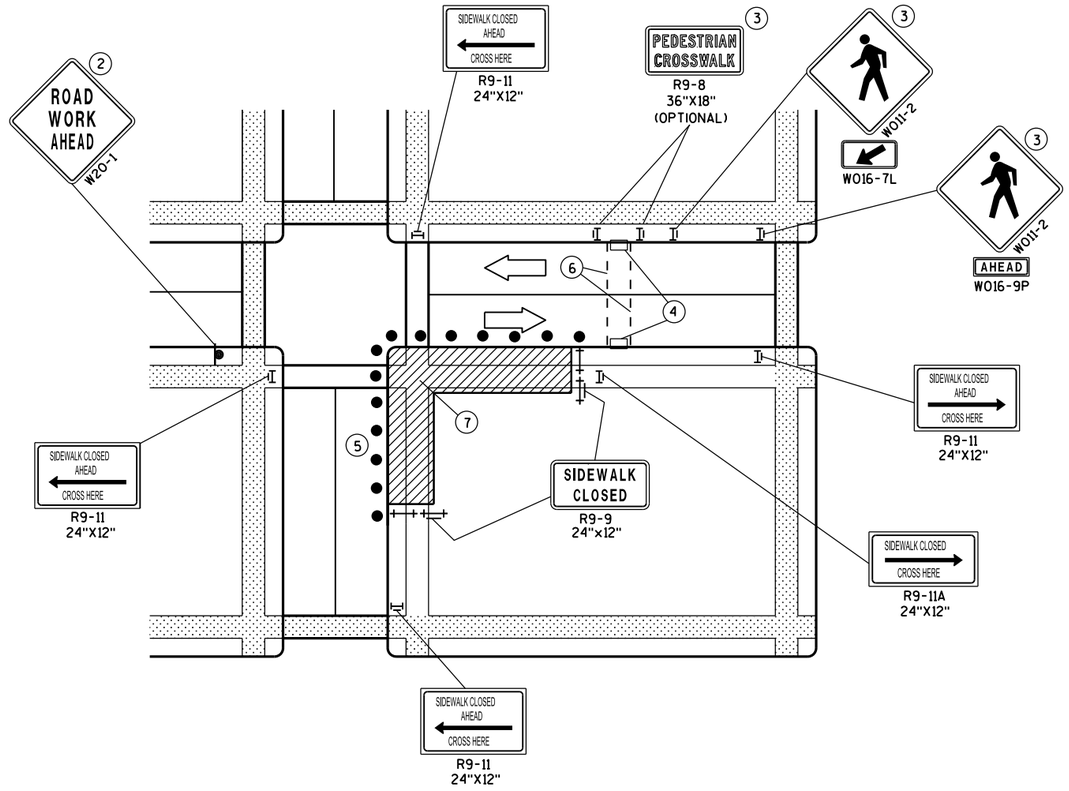
NOTE: LAYOUT SAME AS ABOVE.



SIDEWALK DIVERSION



MID-BLOCK SIDEWALK CLOSURE



CORNER SIDEWALK CLOSURE WITH TEMPORARY CROSSWALK

GENERAL NOTES

WHEN CLOSING OR RELOCATING CROSSWALKS OR SIDEWALKS, PROVIDE DETECABLE TEMPORARY FACILITIES AND INCLUDE ACCESSIBILITY FEATURES CONSISTENT WITH EXISTING PEDESTRIAN FACILITIES.

TEMPORARY TRAFFIC CONTROL DEVICES FOR PEDESTRIANS ARE SHOWN. OTHER DEVICES MAY BE NECESSARY TO CONTROL VEHICULAR TRAFFIC. STAGE WORK, AS NECESSARY, TO PROVIDE A TEMPORARY PEDESTRIAN ACCESS ROUTE AT ALL TIMES. FOR ROADWAYS WITH NO AVAILABLE DETOURS, MAINTAIN ONE OPEN SIDEWALK AT ALL TIMES.

"WO" SIGN IS THE SAME AS "W" SIGN EXCEPT THE BACKGROUND IS ORANGE.

FOR NIGHTTIME CLOSURE USE TYPE "A" FLASHING WARNING LIGHTS ON BARRICADES, SUPPORTING SIGNS AND CLOSING SIDEWALK. USE TYPE "C" STEADY BURN LIGHTS ON CHANNELIZING DEVICES SEPARATING THE WORK AREA FROM VEHICULAR TRAFFIC.

PEDESTRIAN TRAFFIC SIGNAL DISPLAY CONTROLLING CLOSED CROSSWALK SHALL BE COVERED OR DEACTIVATED.

POST MOUNTED SIGNS LOCATED ADJACENT TO A SIDEWALK SHALL HAVE A 7 FOOT MINIMUM CLEARANCE FROM THE BOTTOM OF THE SIGN TO THE SIDEWALK SURFACE.

ALTERNATE SIDEWALK WORK BETWEEN LEFT AND RIGHT SIDE OF ROADWAY TO MAINTAIN PEDESTRIAN ACCESS.

(1) IF SIDEWALK CLOSURE AFFECTS AN ACCESSIBLE AND DETECTABLE FACILITY, MAINTAIN ACCESSIBILITY AND DETECTABILITY ALONG THE ALTERNATE PEDESTRIAN ROUTE.

(2) "ROAD WORK AHEAD" SIGNS ARE NOT REQUIRED IF THE SIDEWALK CLOSURE OCCURS WITHIN A LARGER WORK ZONE WHERE ADVANCE WARNING SIGNS ARE ALREADY PRESENT, OR IF THE WORK AREA AND EQUIPMENT ARE MORE THAN 2 FEET BEHIND THE CURB.

(3) IF TEMPORARY PEDESTRIAN CROSSWALK IS NOT PROVIDED, OMIT R9-8 AND W011-2 SIGN ASSEMBLIES. IF PROVIDED INCLUDE ON BOTH SIDES OF THE CROSSWALK.

(4) TEMPORARY CURB RAMPS. SEE SDD 15 D 30 SHEET "B".

(5) DRUMS OR BARRICADES AT 25 FOOT SPACING. STREET PARKING SHALL BE PROHIBITED FOR AT LEAST 50 FEET IN ADVANCE OF THE MID-BLOCK CROSSWALK.

(6) TEMPORARY PAVEMENT MARKING FOR CROSSWALK LINES.

(7) LIMIT WORK TO ONE QUADRANT AT A TIME TO MINIMIZE PEDESTRIAN DISRUPTION.

LEGEND

- SIGN ON PERMANENT SUPPORT
- UNDER PEDESTRIAN TRAFFIC
- WORK AREA
- PEDESTRIAN CHANNELIZATION DEVICE
- TYPE II BARRICADE WITH/WITHOUT SIGN (ALL WITH ONE WARNING LIGHT, TYPE A, LOW-INTENSITY FLASHING)
- TYPE III BARRICADE WITH/WITHOUT SIGN (ALL WITH ONE WARNING LIGHT, TYPE A, LOW-INTENSITY FLASHING)
- DIRECTION OF TRAFFIC
- TRAFFIC CONTOL DRUM

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

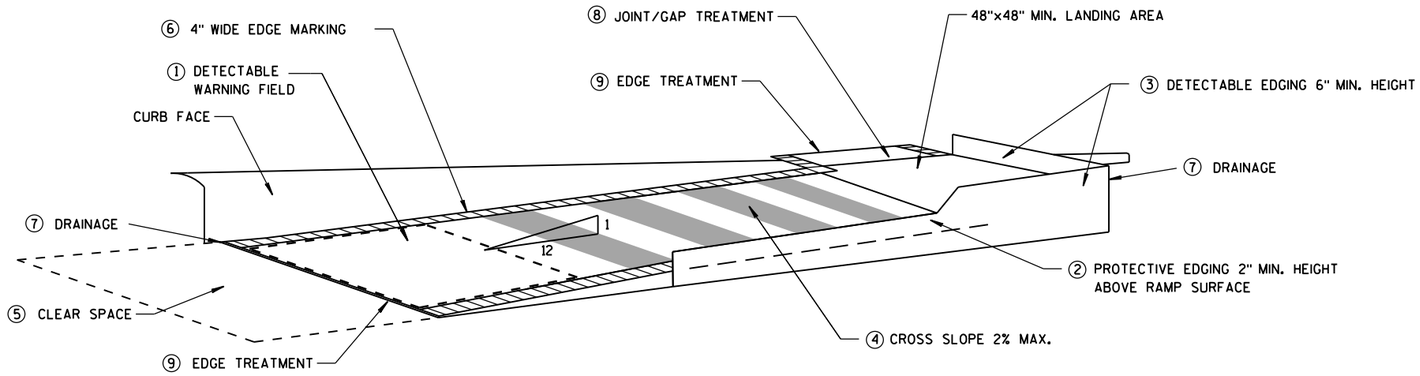
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

6

S.D.D. 15 D 30-2a

6

S.D.D. 15 D 30-2a



TEMPORARY CURB RAMP PARALLEL TO CURB

GENERAL NOTES

NOTIFY THE BUS COMPANY 7 DAYS IN ADVANCE OF THE BUS STOP RELOCATION.

ALTERNATE SIDEWALK WORK BETWEEN LEFT AND RIGHT SIDE OF ROADWAY TO MAINTAIN PEDESTRIAN ACCESS.

① CURB RAMPS SHALL BE 48" MIN. WIDTH WITH A FIRM, STABLE AND SLIP RESISTANT SURFACE. INSTALL CONTRASTING DETECTABLE WARNING FIELD AT PEDESTRIAN STREET CROSSINGS. REFER TO SDD 8D5 SHEET "E".

② PROTECTIVE EDGING WITH A 2" MIN. HEIGHT SHALL BE INSTALLED WHEN A CURB RAMP OR LANDING PLATFORM HAS A VERTICAL DROP OF 6" OR GREATER OR HAS A SIDE APRON SLOPE STEEPER THAN 1:3 (33%). PROTECTIVE EDGING SHOULD BE CONSIDERED WHEN CURB RAMPS OR LANDING PLATFORMS HAVE A VERTICAL DROP OF 3" OR MORE.

③ DETECTABLE EDGING WITH 6" MIN. HEIGHT AND CONTRASTING COLOR SHALL BE INSTALLED ON ALL CURB RAMP LANDINGS WHERE THE WALKWAY CHANGES DIRECTION (TURNS).

④ CURB RAMPS AND LANDINGS SHALL HAVE A 1:50 (2%) MAX. CROSS-SLOPE.

⑤ CLEAR SPACE OF 48"X48" MIN. SHALL BE PROVIDED ABOVE AND BELOW THE CURB RAMP.

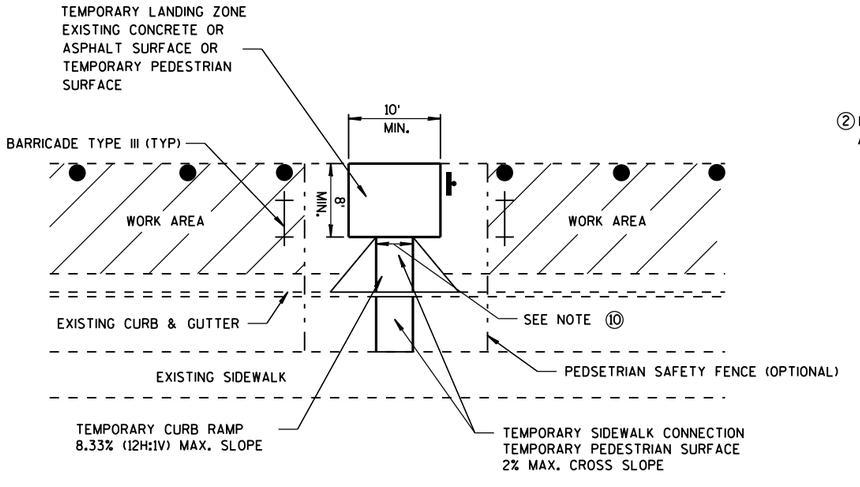
⑥ THE CURB RAMP WALKWAY EDGE SHALL BE MARKED WITH A YELLOW COLOR, 4" WIDE MARKING, UNLESS A CONTRASTING DETECTABLE WARNING FIELD IS PROVIDED.

⑦ DO NOT RESTRICT WATER FLOW IN THE GUTTER SYSTEM.

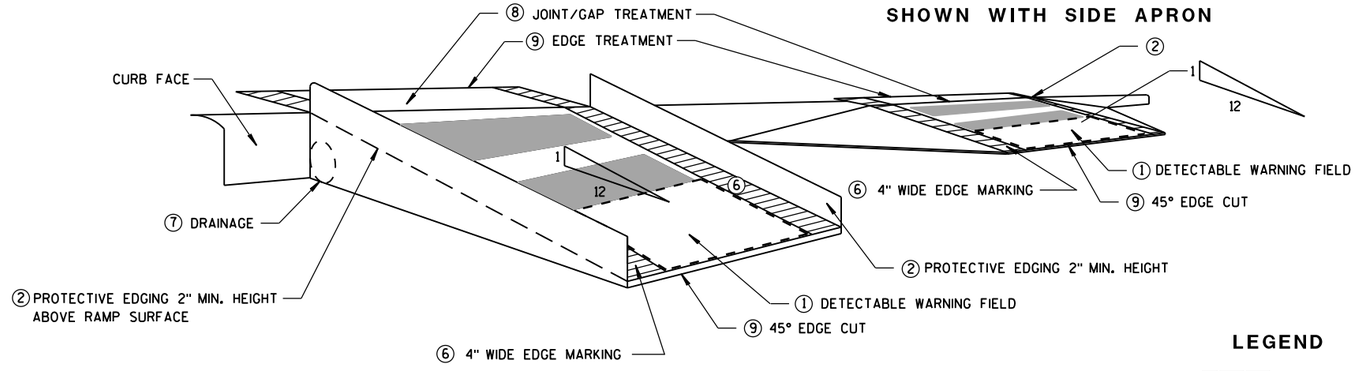
⑧ LATERAL JOINTS OR GAPS BETWEEN SURFACES SHALL BE LESS THAN 1/2" WIDTH.

⑨ CHANGES BETWEEN SURFACE HEIGHTS SHALL NOT EXCEED 1/2". LATERAL EDGES SHALL BE VERTICAL UP TO 1/4" HIGH, AND BEVELED AT 1:2 BETWEEN 1/4" AND 1/2".

⑩ 5' WIDE MIN. WITH PEDSETRIAN SAFETY FENCE, 10' WIDE MIN. WITHOUT PEDESTRIAN SAFETY FENCE.



TEMPORARY BUS STOP PAD



SHOWN WITH PROTECTIVE EDGE

TEMPORARY CURB RAMP PERPENDICULAR TO CURB

LEGEND

WORK AREA

TYPE III BARRICADE

TRAFFIC CONTOL DRUM

TRAFFIC CONTROL, TEMPORARY ADA COMPLIANT PEDESTRIAN ACCOMMODATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

March 2015 — DATE

/S/ Travis Feltes — STATE TRAFFIC ENGINEER — SIGN

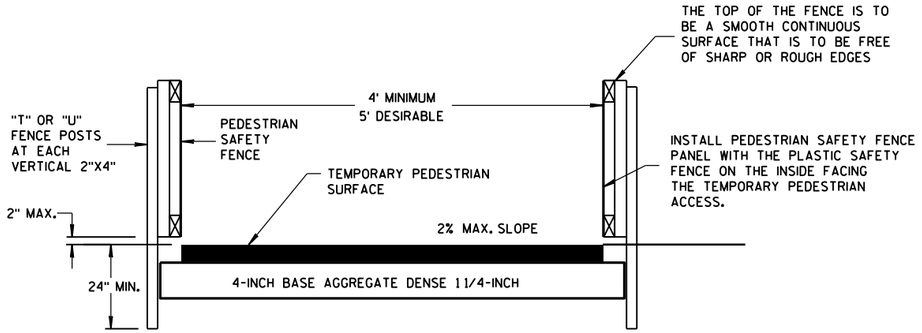
FHWA

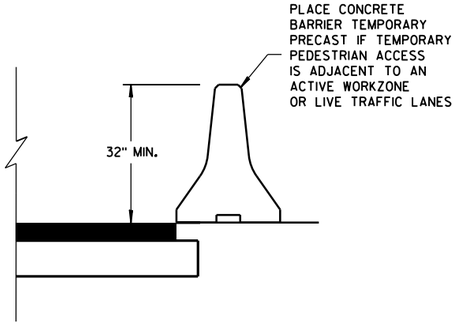
6

S.D.D. 15 D 30-2b

6

S.D.D. 15 D 30-2b

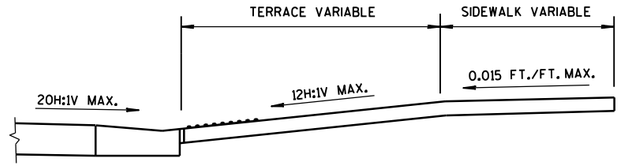




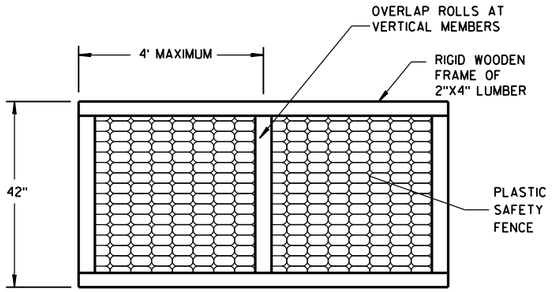
TEMPORARY PEDESTRIAN ACCESS

GENERAL NOTES

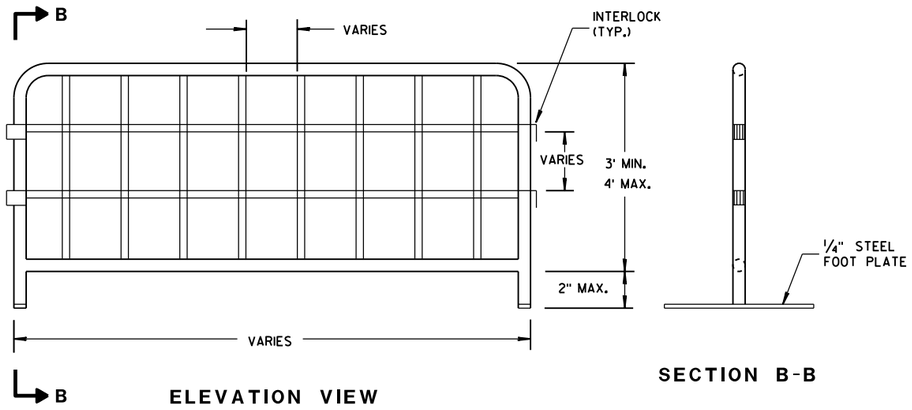
(1) INTERCHANGEABLE WITH THE PEDESTRIAN SAFETY FENCE.



SECTION A-A



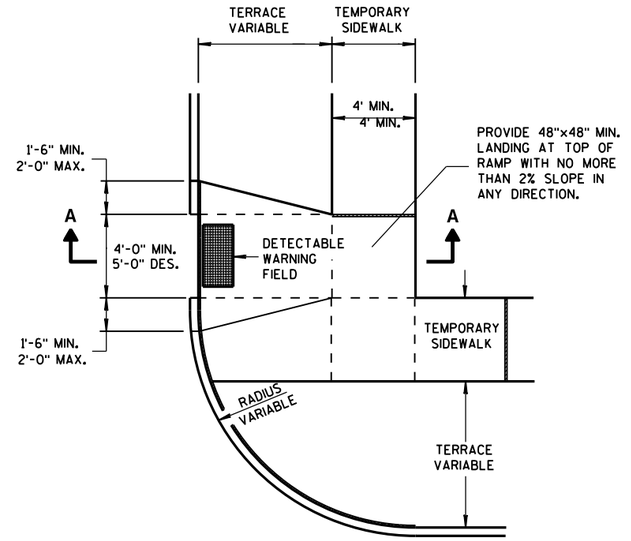
PEDESTRIAN SAFETY FENCE



ELEVATION VIEW

SECTION B-B

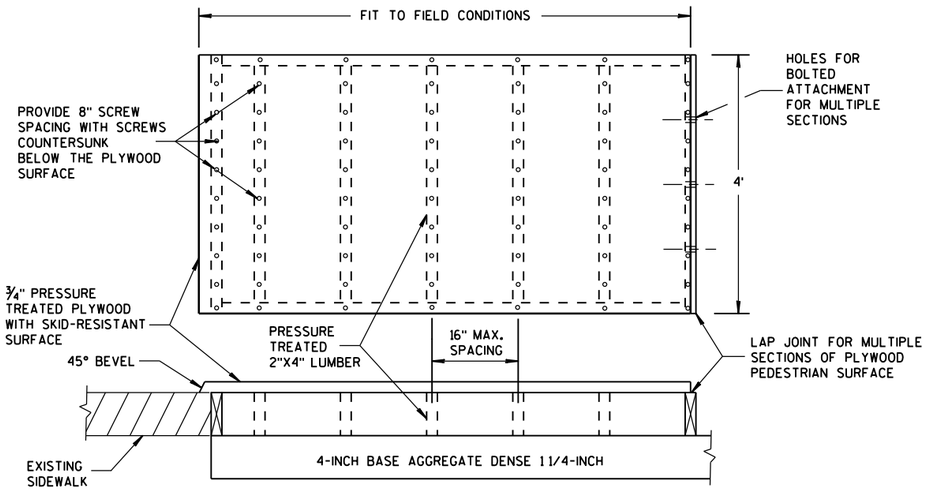
TEMPORARY PEDESTRIAN STEEL BARRICADE (1)



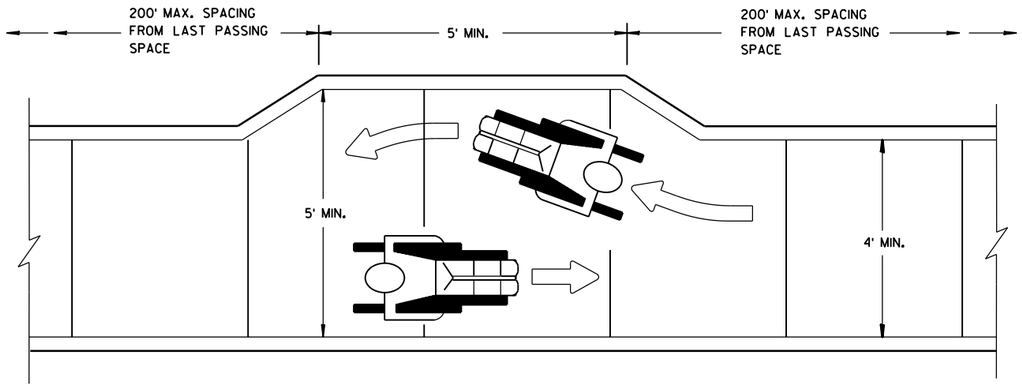
PLAN VIEW

TEMPORARY TYPE 3 RAMP

(OUTSIDE OF CROSSWALK AREA)



TEMPORARY PEDESTRIAN SURFACE PLYWOOD



NARROW SIDEWALK PASSING DETAIL

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
March 2015 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER — SIGN
FHWA

6

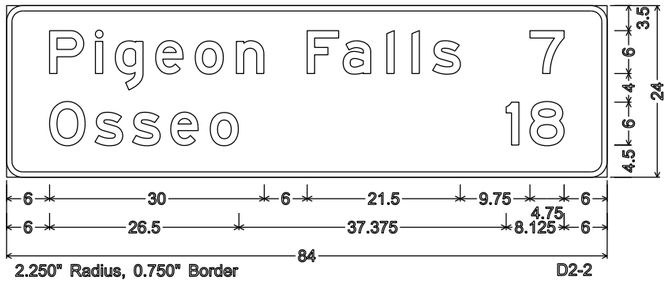
S.D.D. 15 D 30-2c

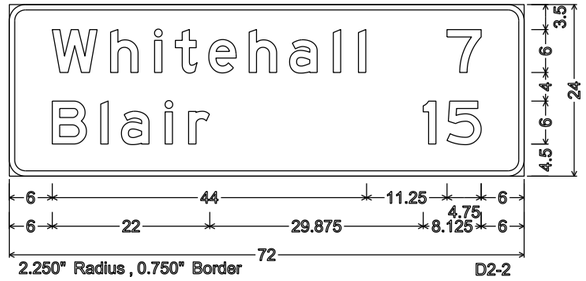
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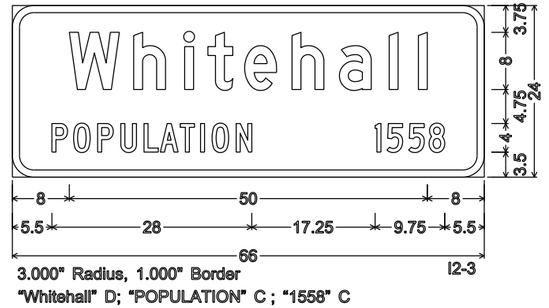
S.D.D. 15 D 30-2c

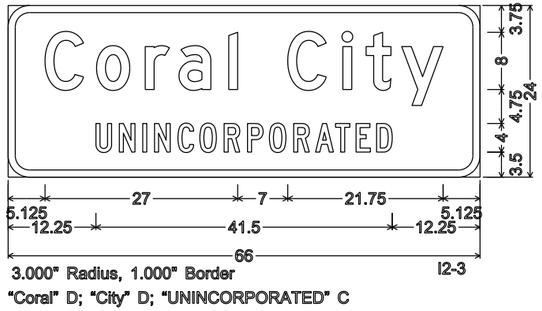
NOTES

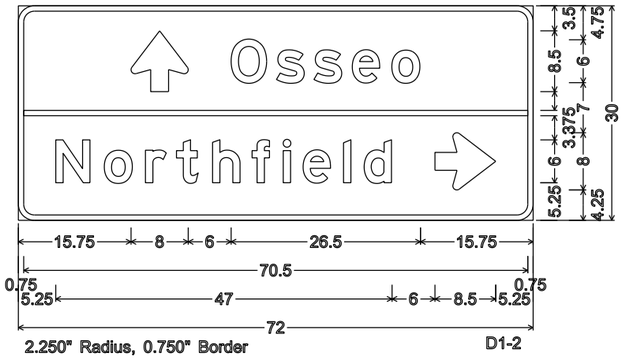
1. All Signs are Type II - Type H Reflective
2. Color:
   Background - Green
   Message - White
3. Message Series - E except as noted

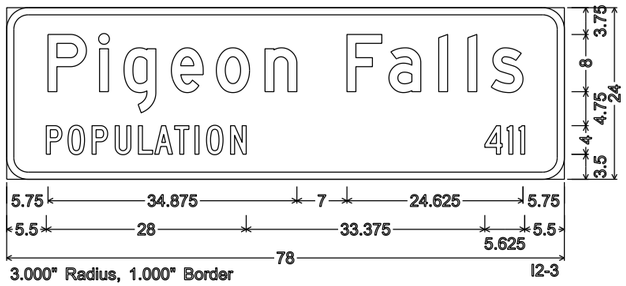


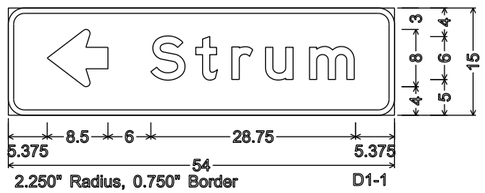


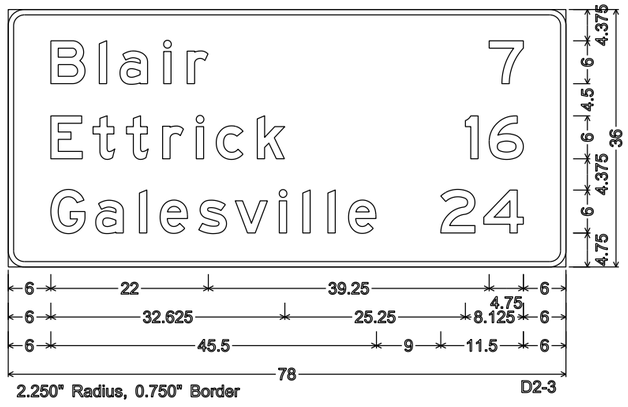


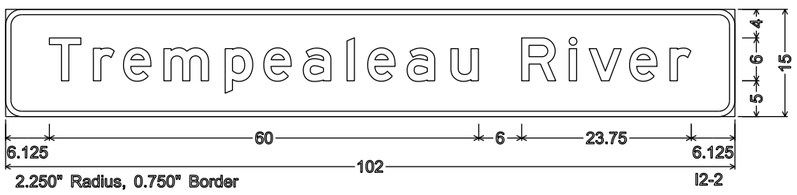


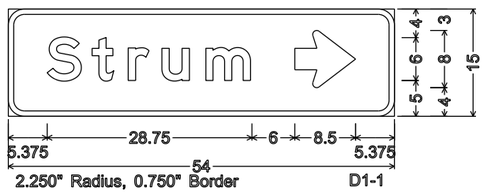






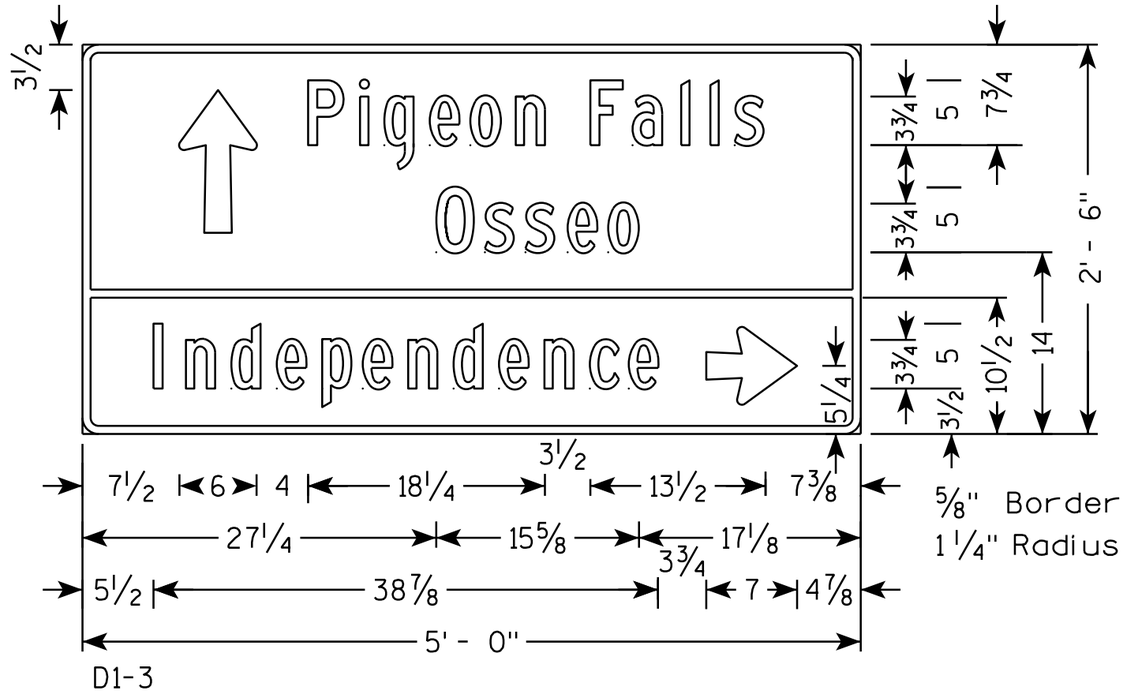






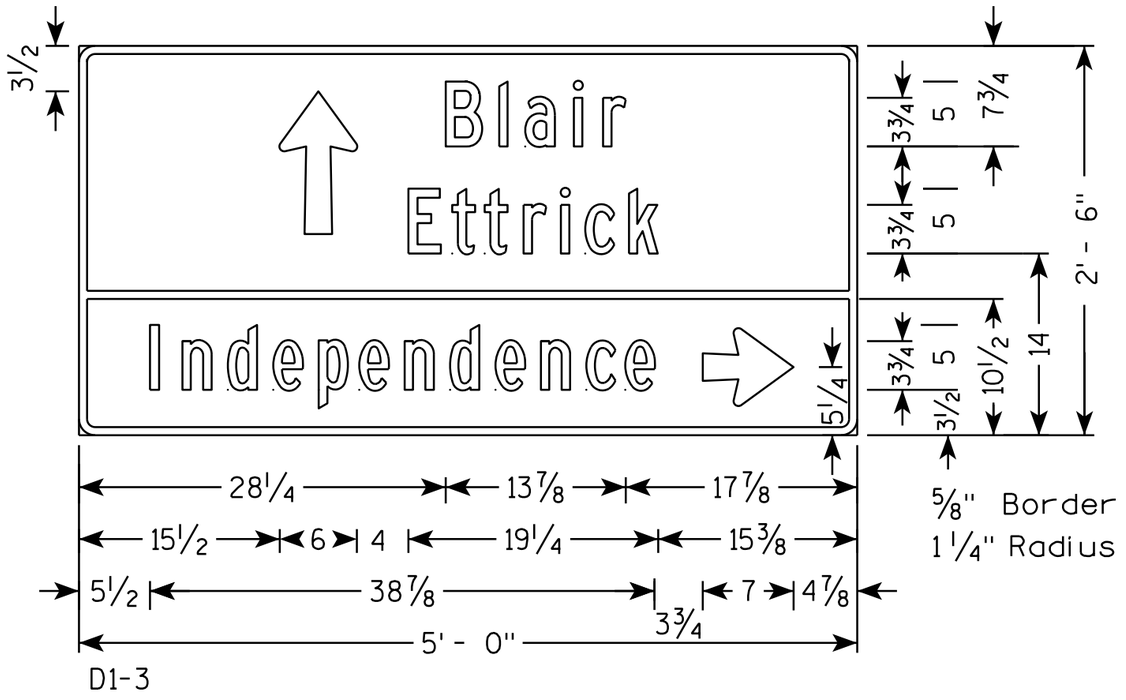
PROJECT NO: 1630-02-71	HWY: USH 53/STH 121	COUNTY: TREMPEALEAU	PERMANENT SIGNING	SHEET NO:	E

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NOTES

1. All Signs Type II - Type H Reflective
2. Color:
   Background - GREEN
   Message - WHITE
3. Message Series - C



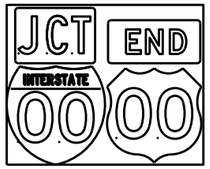
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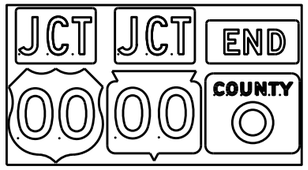
TYPICAL ASSEMBLIES



J1-1



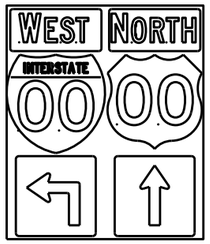
J1-2



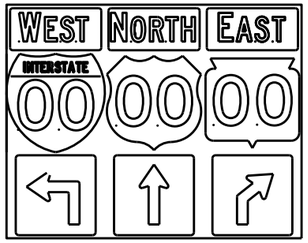
J1-3



J2-1



J2-2

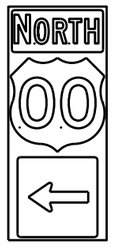


J2-3

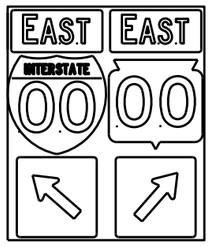


JV

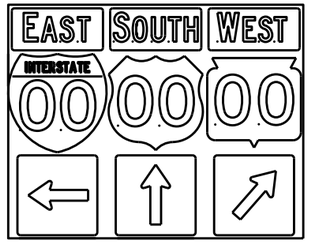
(Typical Vertical J-Assembly
See Note 10 and 11)



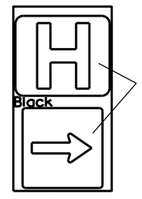
J3-1



J3-2



J3-3

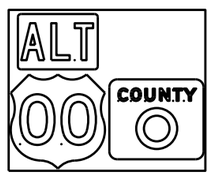


Blue Background

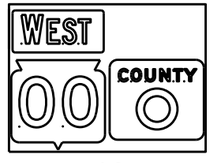
JH-1



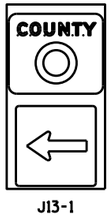
J4-1



J4-2



J4-2



J13-1



J12-1



J32-1



J33-1

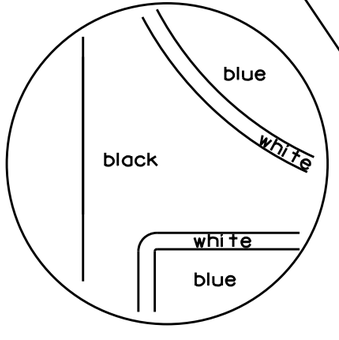


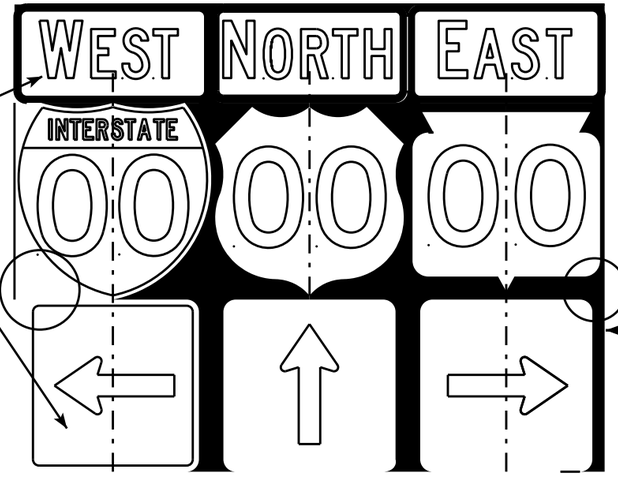
J23-1

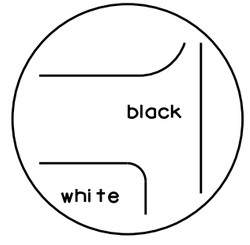


J22-1

[blue background with interstate]







[black background]

NOTES

1. Signs are Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Black Non-reflective
   Message - see Note 5
3. Message Series - See Note 5
4. Corners shall be square or rounded if base material is plywood. If base material is metal the corners shall be rounded.
5. The colors and message spacing on each marker shall be according to the applicable route marker panel specifications.
6. Certain marker heads require the component pieces to be the same color. As an example, all the components used with an M1-1 Interstate marker shall be blue.
7. Single panel j-assemblies shall only be used with route marker shields that are same size. If the route marker shields are different size use multiple piece component.
8. Route assemblies that have 24 inch route shields and have dimensions greater than 48 inches (both vertical and horizontal) shall have one horizontal splice between the arrows and route shields. Vertical splices shall not be used on route assemblies with a horizontal dimension of 144 inches or less. The contractor shall not use more than one vertical joint per sign and the joint shall be between route shields.
9. Route assemblies that have 36 inch shields and have dimensions greater than 48 inchs (both vertical and horizontal) shall have two horizontal splices. One horizontal splice shall be between the cardinal direction and route shields and the other horizontal splice shall be between the arrows and route shields. Vertical splices shall not be used on route assemblies with a horizontal dimension of 144 or less. The contractor shall not use more than one vertical joint per sign and the joint shall be between route shields.
10. All Vertical J Assemblies are given a Sign Code of JV
11. For JV Assemblies that have a mixture of Interstate and non Interstate shields, arrows and cardinals shall be white on blue.

ROUTE MARKERS & COMPONENTS
IN TYPICAL ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

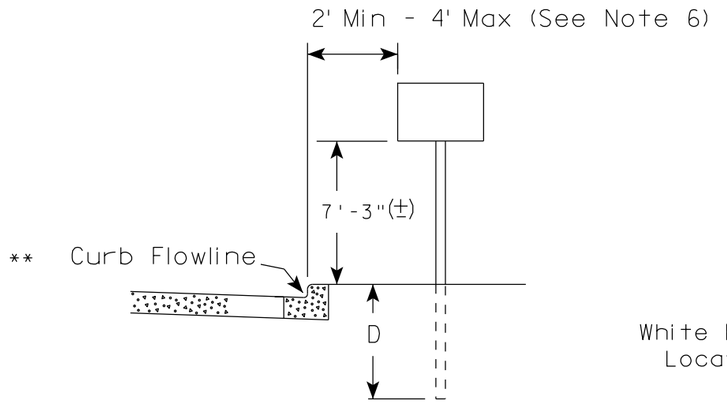
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 2/06/14 PL... A2-1S.8

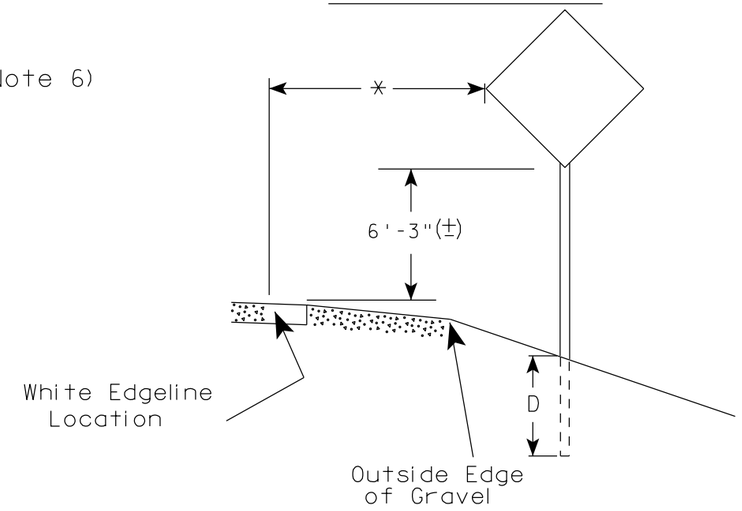
PROJECT NO: SHEET NO: E

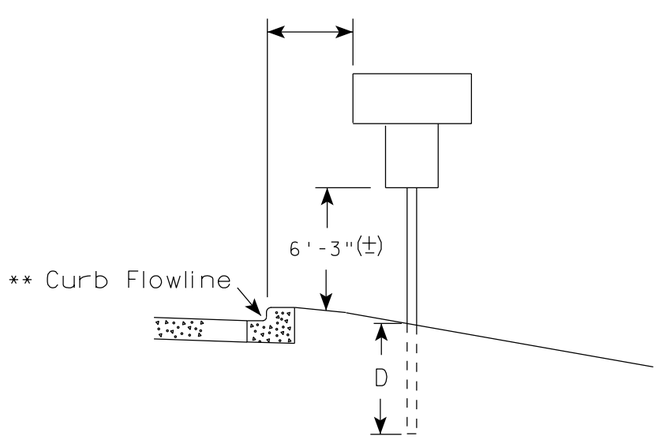
FILE NAME : C:\CAEFiles\Projects\tr_stdplate\A21S.DGN PLOT DATE : 06-FEB-2014 14:10 PLOT BY : mscsja PLOT NAME :
WISDOT/CADDS SHEET 42

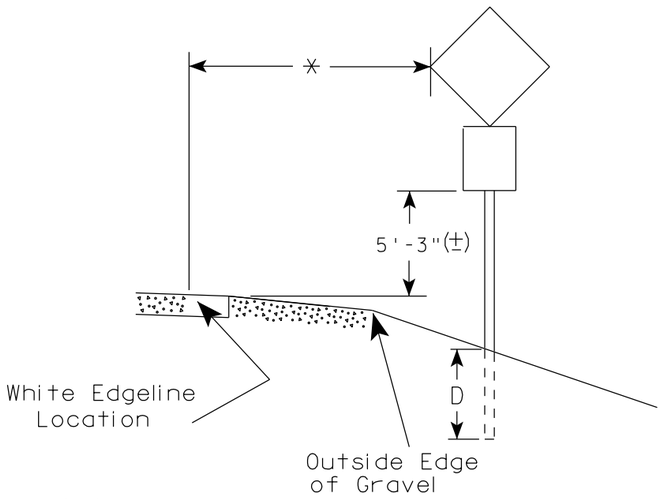
URBAN AREA



RURAL AREA (See Note 2)







GENERAL NOTES

1. Signs wider than 4 feet or 20 sq.ft or larger, shall be mounted on multiple posts. Refer to plate A4-4.
2. If signs are mounted on barrier wall, see A4-10 sign plate.
3. For expressways and freeways, mounting height is 7'- 3" (±) or 6'-3" (±) depending upon existence of a sub-sign.
4. Minimum mounting height for J assemblies (A2-1S) is 7'-3" (±) or 6'-3" (±) per urban or rural detail respectively.
5. Minimum mounting height for signs mounted on traffic signal poles is 5'- 3" (±).
6. Offset distance shall be consistent with existing signs or consistent throughout length of project.
7. The (±) tolerance for mounting height is 3 inches.
8. Folding signs shall be mounted at a height of 5'-3" (±) or as directd by the Engineer.
9. The Double Arrow sign (W12-1) shall be mounted at a height of 2'-3" (±). The Chevron sign (W1-8), Roundabout Chevron panel (R6-4B), Enhanced Reference Markers, Clearance Markers (W5-52), Mile Markers (D10 series), In Road Object Markers (W5-54) & End of Road Markers (W5-56) shall be mounted at a height of 4'-3" (±).

POST EMBEDMENT DEPTH

Area of Sign Installation (Sq.Ft.)	D (Min)
20 or Less	4'
Greater than 20	5'

** The existence of curb and gutter does not in itself mandate the vertical clearance illustrated. That height is typically measured where there is sidewalk adjacent to the roadway or parking is permitted. In the absence of sidewalk vertical clearance is measured from the top of the curb. Offset of signs is measured from the flow line.

* 6 feet from edge of a paved shoulder or 12 feet from the edge of pavement (edge line location) or 2 feet from outside edge of gravel, whichever is greater unless directed by project engineer.

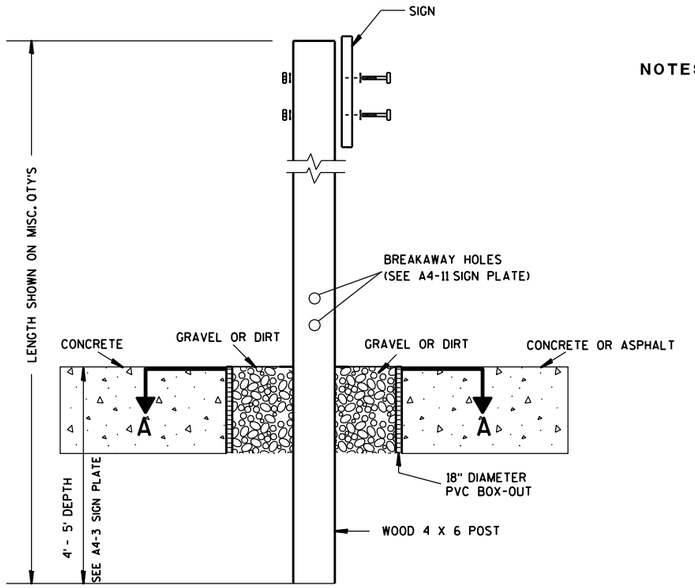
TYPICAL INSTALLATION OF PERMANENT TYPE II SIGNS ON SINGLE POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 7/23/15 PLATE NO. A4-3.20

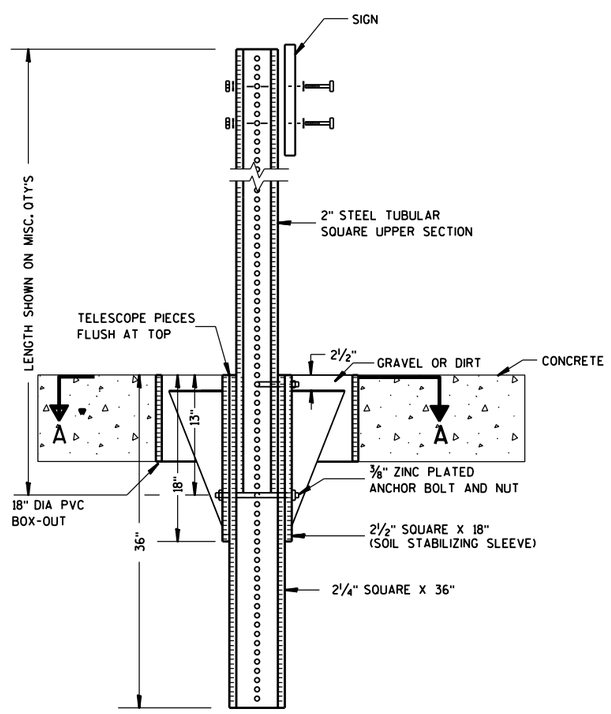
PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E



ELEVATION VIEW

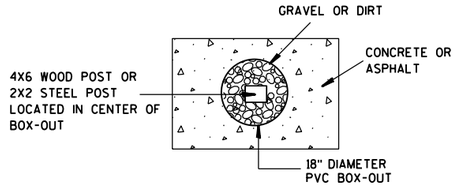
DETAIL OF WOOD 4 X 6 SIGN POST IN BOX-OUT

NOTES:
1. ALL MATERIAL TO BE APPROVED BY ENGINEER PRIOR TO INSTALLATION
2. SEE SIGN PLATE A4-8 FOR SIGN HARDWARE REQUIREMENTS
3. 18 INCH X 18 INCH SQUARE BOX-OUTS MAY BE USED FOR INSTALLATIONS IN EXISTING CONCRETE OR ASPHALT LOCATIONS.



ELEVATION VIEW

DETAIL OF STEEL 2 X 2 SIGN POST IN BOX-OUT



PLAN VIEW

FOR NEW CONCRETE/ASPHALT INSTALLATIONS

SIGN POST BOX-OUTS A4-3B

WISCONSIN DEPT OF TRANSPORTATION

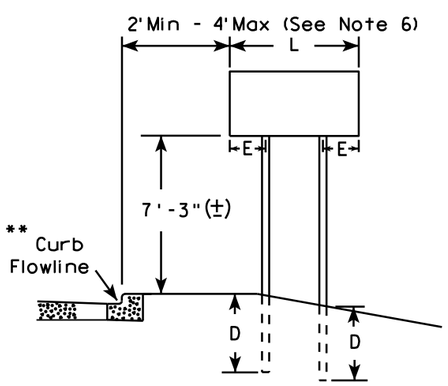
APPROVED Matthew R Rauch
for State Traffic Engineer

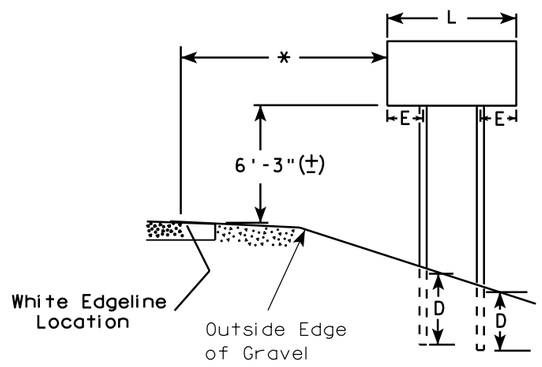
DATE 1/27/14 PLATE NO. A4-3B.1

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E

FILE NAME : C:\CAEFiles\Projects\tr_stdplate\A43B.DGN PLOT DATE : 27-JAN-2014 09:48 PLOT BY : mscsja PLOT NAME : PLOT SCALE : 13.659812:1.000000 WISDOT/CADDS SHEET 42

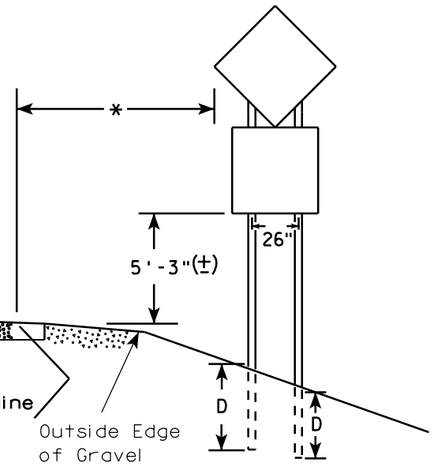
URBAN AREA



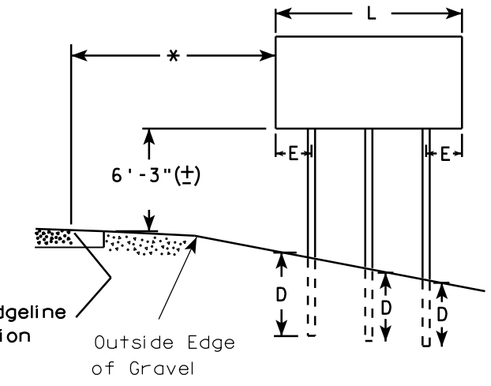


48" DIAMOND WARNING SIGN

RURAL AREA (See Note 3)



48" DIAMOND WARNING SIGN



GENERAL NOTES

1. For 3 or 4 post installations, individual post spacing shall be greater than 3'-6".
2. See tables below for required number of posts.
3. For expressways and freeways, mounting height is 7'-3" (±) or 6'-3" (±) depending upon existence of sub-sign.
4. The (±) tolerance for mounting height is 3 inches.
5. Minimum mounting height for J assemblies (A2-1S) is 7'-3" (±) or 6'-3" (±) per urban or rural detail respectively.
6. Offset distance shall be consistent with existing signs or consistent throughout length of project.
7. Folding signs shall be mounted at a height of 5'-3" (±) or as directed by the engineer.
8. The Double Arrow sign (W12-1) shall be mounted at a height of 2'-3" (±). The Chevron sign (W1-8), Roundabout Chevron panel (R6-4B), Clearance Markers (W5-52), Mile Markers (D10 series), In Road Object Markers (W5-54) & End of Road Markers (W5-56) shall be mounted at a height of 4"-3" (±).

* 6 feet from edge of a paved shoulder or 12 feet from the edge of pavement (edge line location) or 2 feet from outside edge of gravel, whichever is greater unless directed by project engineer.

** The existence of curb and gutter does not in itself mandate the vertical clearance illustrated. That height is typically measured where there is sidewalk adjacent to the roadway or parking is permitted. In the absence of sidewalk vertical clearance is measured from the top of the curb. Offset of signs is measured from the flow line.

*** See A4-3 sign plate for signs 4' or less in width and less than 20 S.F. in area.

SIGN SHAPE OTHER THAN DIAMOND (TWO POSTS REQUIRED)	
L	E
Greater than 48" Less than 60"	12"
60" to 120"	L/5

***

SIGN SHAPE OTHER THAN DIAMOND (THREE POSTS REQUIRED)	
L	E
Greater than 120" less than 168"	12"

SIGN SHAPE OTHER THAN DIAMOND (FOUR POSTS REQUIRED)	
L	E
168" and greater	12"

POST EMBEDMENT DEPTH

Area of Sign Installation (Sq. Ft.)	D (Min)
20 or Less	4'
Greater than 20	5'

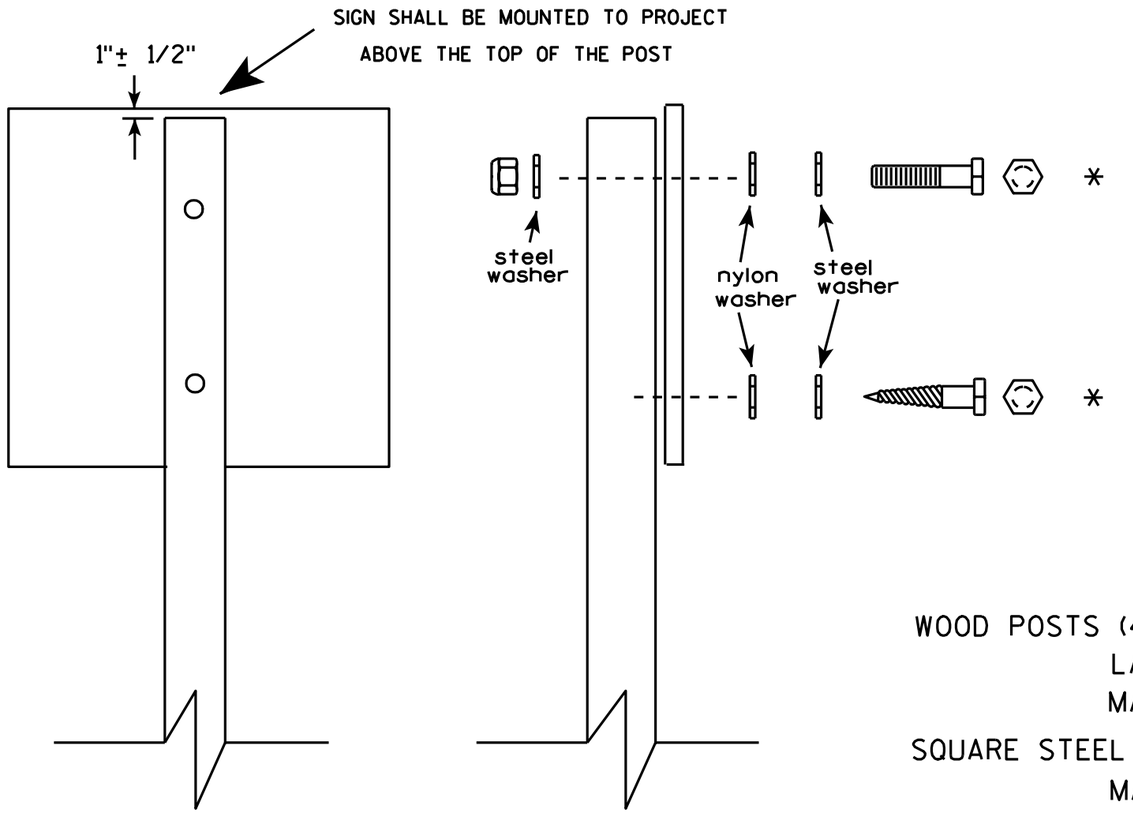
TYPICAL INSTALLATION OF TYPE II SIGNS ON MULTIPLE POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 7/23/15 PLATE NO. A4-4-222 14

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E



Nuts, bolts and lags used for mounting signs shall have hexagonal heads and shall be either :

a. Hot dip galvanized in accordance with ASTM Designation: A 153, Class D, or SC 3

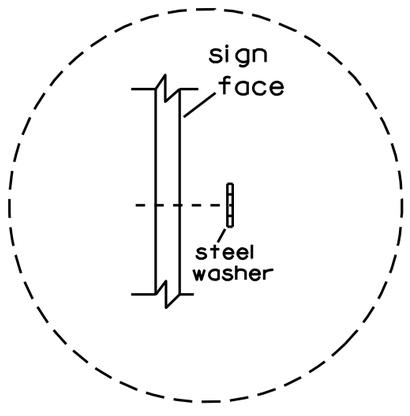
b. Electro-galvanized in accordance with ASTM Designation : B 633, TYPE III, SC 3.

Threads on bolts and nuts shall be manufactured with sufficient allowance for the cadmium plate or galvanized coating to permit the nuts to run freely on the bolts.

WOOD POSTS (4" x 4" or 4" x 6")
LAG SCREWS - 3/8" X 3"
MACHINE BOLTS - 5/16" X 6-1/2" or 7" Length w/ nuts

SQUARE STEEL POSTS (2" x 2")
MACHINE BOLTS - 3/8" X 3-1/4" Length w/ nuts
RIVETS - 9/32 " (6605-9-6) BULB-TITE, TRI-FOLD, ALUMINUM BODY/MANDREL
O.D. FLANGE .720-.765 INCH, GRIP RANGE .042-.375 INCH

WASHERS (ALL POSTS) -
1-1/4" O.D. X 3/8" I.D. X 1/16" STEEL
1-1/4" O.D. X 3/8" I.D. X .080 NYLON for all Type H signs.



Washer Placement when Sign Has Other Than Type H or Type F Face

* Two different fastening systems are shown for illustration purposes. On any individual sign, either one or the other system shall be used. Actual number of fasteners per sign varies with the sign area, but normally there are two. For a single post installation, all signs greater than 9 sq. ft. require the use of 3 fasteners.

ATTACHMENT OF SIGNS TO POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/23/10 PLATE NO. A4-8.7

7

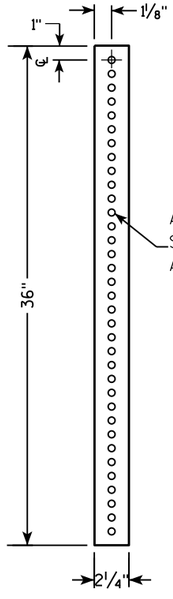
7

PROJECT NO:

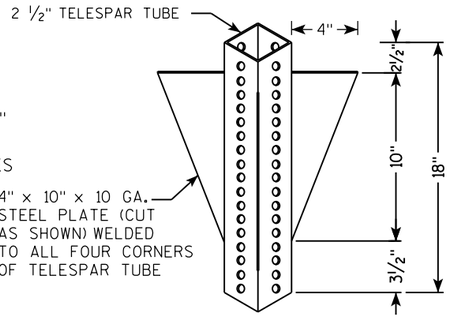
SHEET NO: 223 E

TELESCOPIC TUBING ANCHORS
TWO PIECE SYSTEM

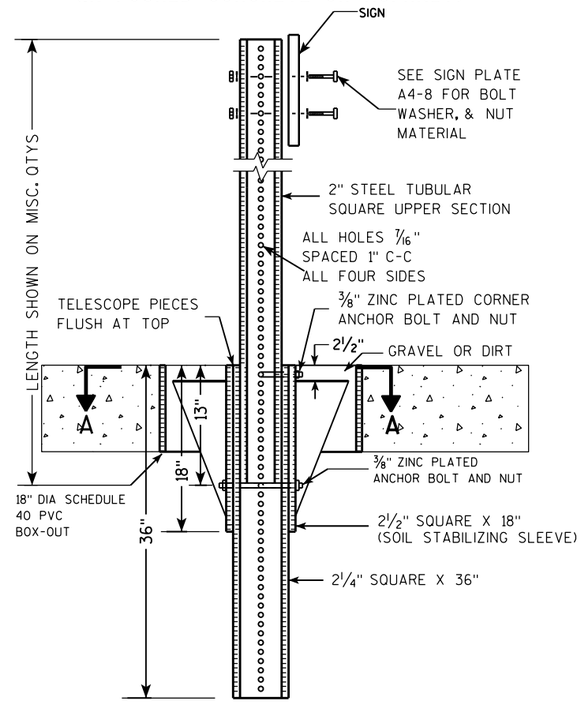
2 1/4 " SQUARE
12 GAUGE
PERFORATED
GALVANIZED FINISH



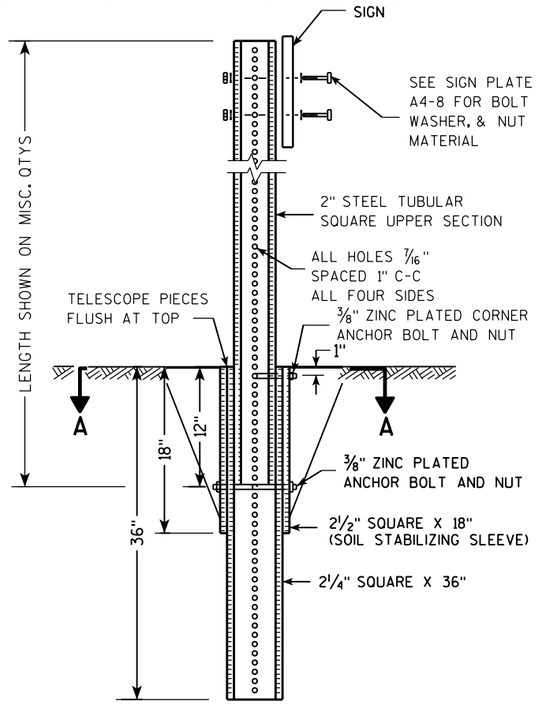
2 1/2 " SQUARE
12 GAUGE
OMNI-DIRECTIONAL
PERFORATED
SOIL STABILIZING SLEEVE
GALVANIZED FINISH

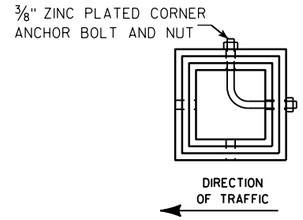


DETAIL OF TUBULAR STEEL SIGN POST
(IN POURED CONCRETE OR ASPHALT)



DETAIL OF TUBULAR STEEL SIGN POST
(IN LOCATIONS OTHER THAN POURED CONCRETE OR ASPHALT)





SECTION A-A

Area of Sign Installation (Sq. Ft.)	Number of Required Posts
9 or less	1
Greater than 9 less than or equal to 18	2
Greater than 18 less than or equal to 27	3

Signs wider than 3 feet or larger than 9 sq. ft shall be mounted on multiple posts (see above table).

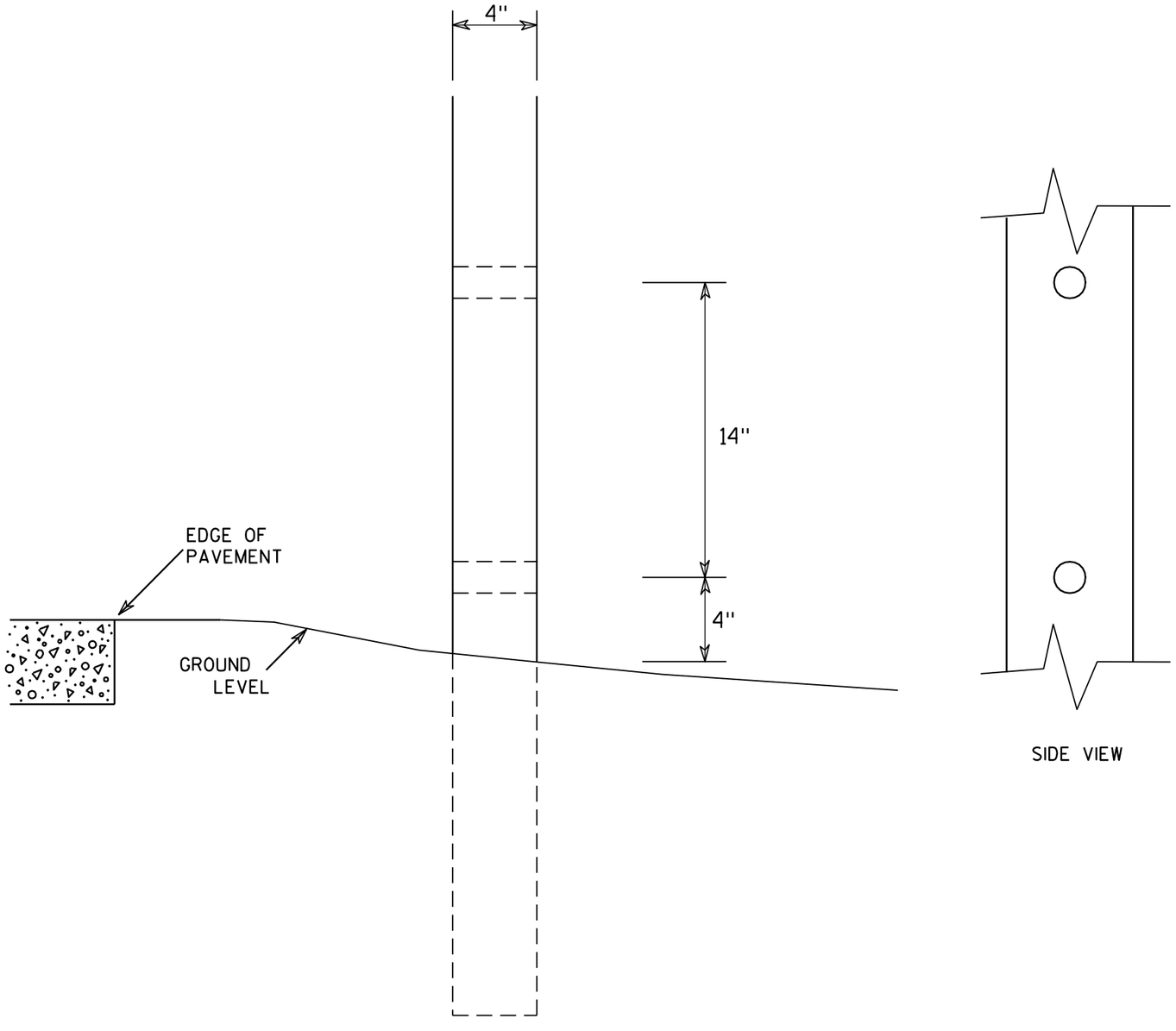
TUBULAR STEEL
SIGN POST
A4-9

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 2/05/15 PLATE 224 A4-9.9

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E



SIDE VIEW

GENERAL NOTES

1. All 4 x 6 Wood Posts shall be modified by having two 1½" diameter holes drilled perpendicular to the roadway centerline.

7

7

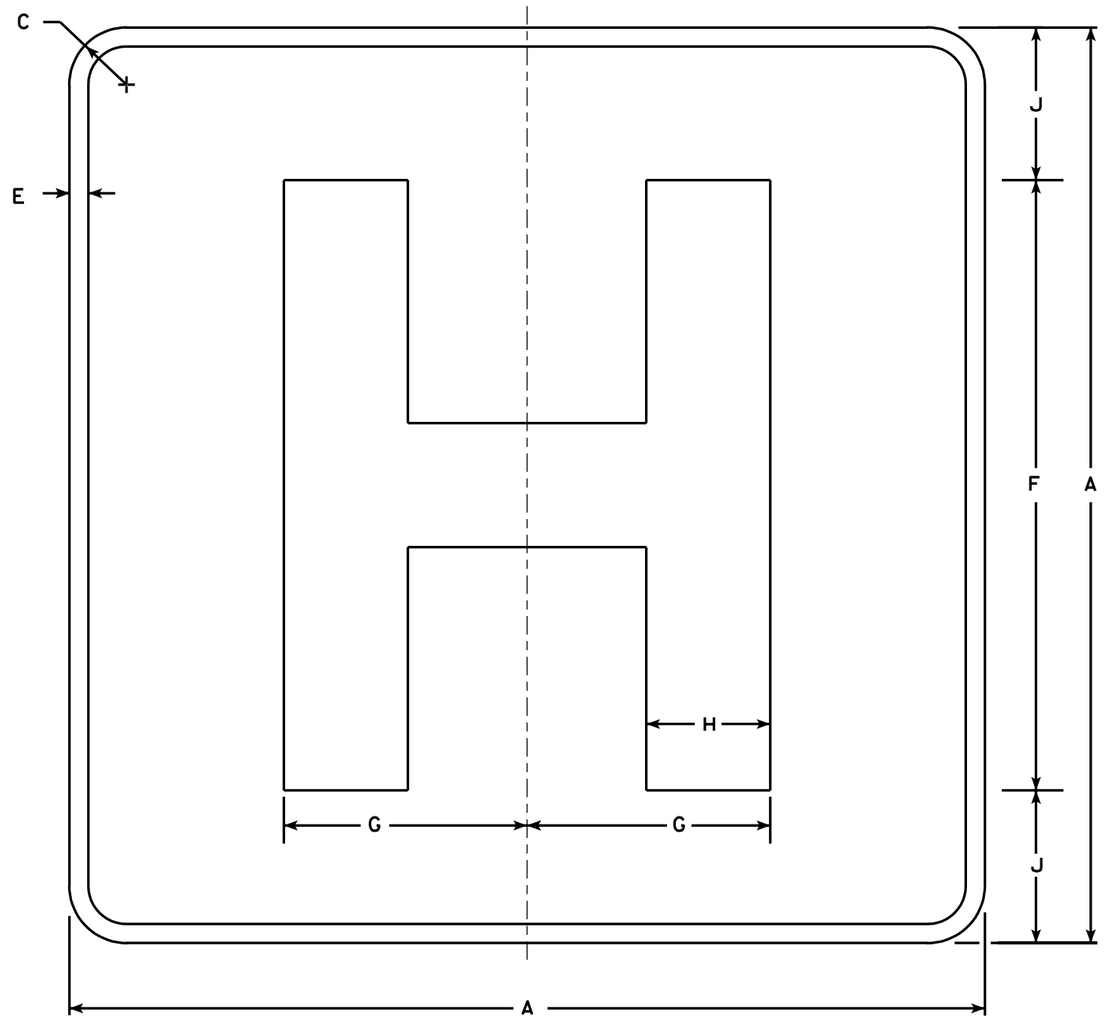
4 X 6 WOOD POST MODIFICATIONS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Chester J Spang
for State Traffic Engineer

DATE 3/27/97 PLATE NO. A4-11.2

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 225	E



D9-2

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Blue
   Message - White - Type H Reflective
3. Message Series - E Modified
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

Metric equivalent for this sign is:

SIZE	
1	450 mmX 450 mm
2	600 mmX 600 mm
3	900 mmX 900 mm
4	X
5	X

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	18		1 1/8		1/2	12	4 3/4	2 3/8		3																	4.0
2	24		1 1/2		1/2	16	6 3/8	3 1/4		4																	4.0
3	36		2 1/4		3/4	24	9 1/2	4 7/8		6																	9.0
4																											
5																											

STANDARD SIGN
D9-2

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Chester J Spong
for State Traffic Engineer

DATE 1/15/02 PLATE NO. D9-2.4

PROJECT NO:

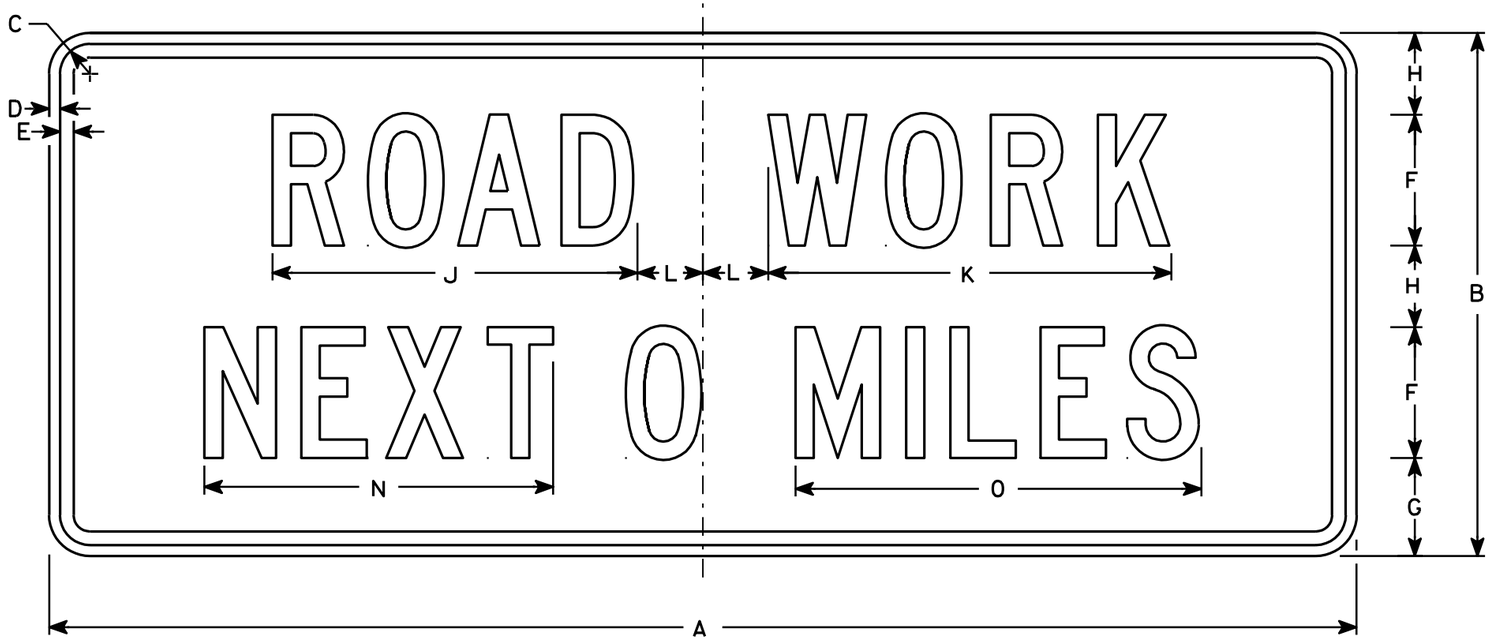
SHEET NO: 226 E

FILE NAME : C:\Users\Projects\tr_stdplate\D92.DGN PLOT DATE : 21-OCT-2005 10:28 PLOT BY : DOTSJA

WISDOT/CADDS SHEET 42

7

7



G20-1

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and optically adjust spacing to achieve proper balance

Metric equivalent for this sign is:

SIZE	
1	
2	1500 mm X 600 mm
3	
4	1500 mm X 600 mm
5	

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.	Area m2
1																												
2	60	24	1 3/8	1/2	5/8	6	4 1/2	3 3/4		16 3/4	18 1/2	3		16	18 5/8												10	.90
3																												
4	60	24	1 3/8	1/2	5/8	6	4 1/2	3 3/4		16 3/4	18 1/2	3		16	18 5/8												10	.90
5																												

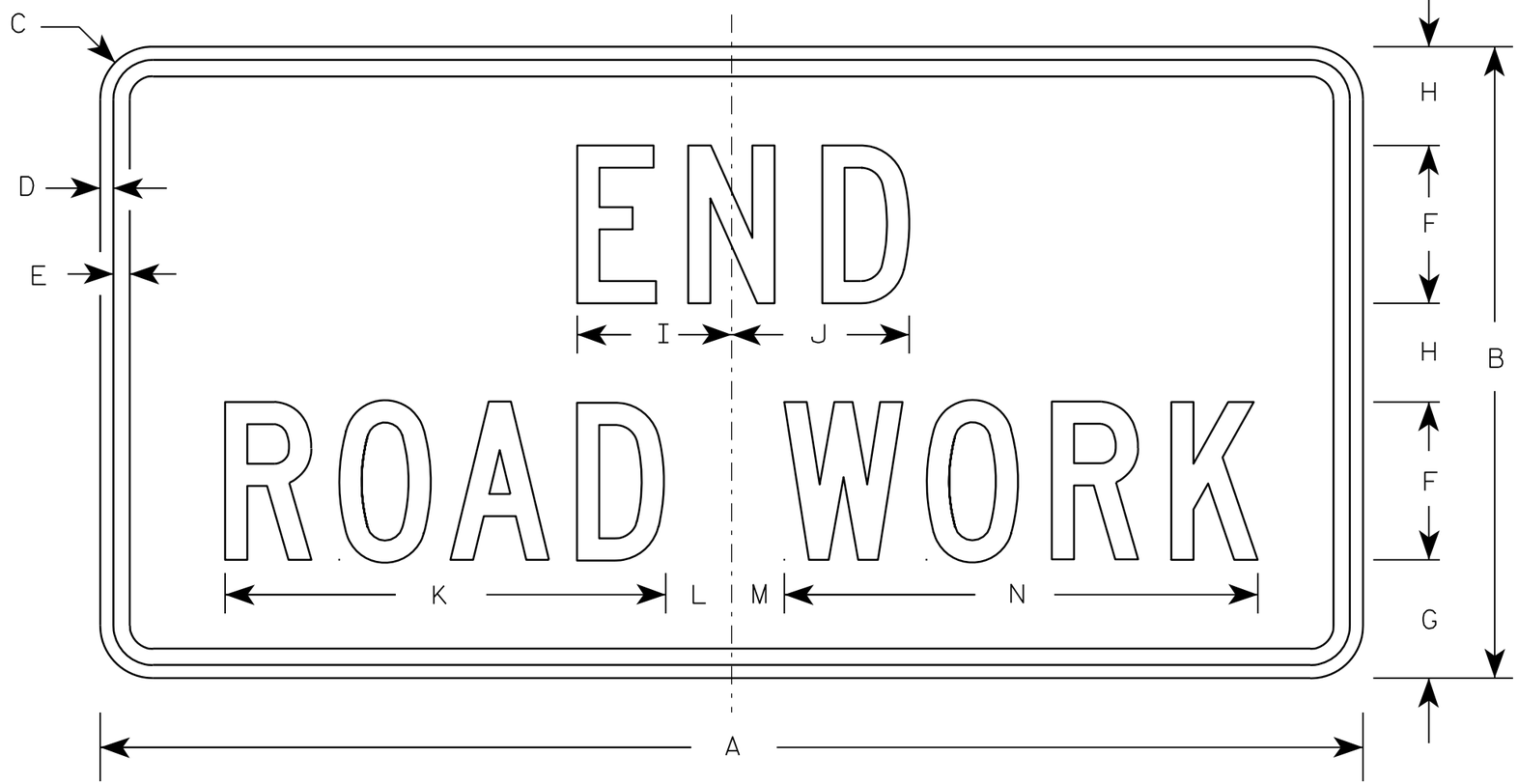
STANDARD SIGN
G20-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Chester J Spray for State Traffic Engineer

DATE 4/8/97 PLATE NO. G20-1.7

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 227	E



G20-2A

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

Metric equivalent for this sign is:

SIZE	
1	900 mm X 450 mm
2	1200 mm X 600 mm
3	1200 mm X 600 mm
4	1200 mm X 600 mm
5	1200 mm X 600 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.	Area m2
1	36	18	1 1/8	3/8	1/2	4	3 3/4	2 1/2	4 1/8	4 1/8	11 1/8	2	1	12 1/8													4.5	0.41
2	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72
3	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72
4	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72
5	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72

STANDARD SIGN
G20-2A

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 9/30/09 PLATE NO. G20-2A.8

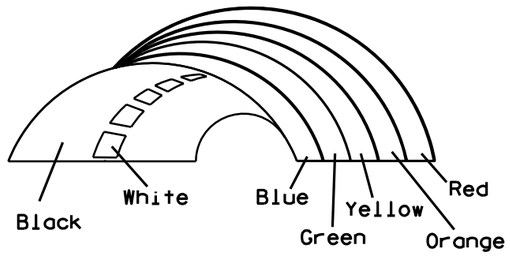
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 228	E



NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - (See Note 5)
3. Message Series - (See Note 6)
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Border - Blue
   Line 1 - Red
   Line 2 - Black
   Line 3-5 - Blue
6. Line 1 - Dutch 8011L
   Line 2 - Series E
   Line 3-5 - Series C
7. Contractor shall provide and install a new post bracket in accordance with the I55-56B sign detail.

Background Colors of Symbol*



*1/4" Black Border between each color of rainbow and border of rainbow

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	30	36	1 1/2	1/2	5/8	3	2	3 1/2	2 7/8	1	8	2 1/8	11 1/4	11 1/8	9 3/8	1 1/4		3/4	12 5/8	7 1/2							7.5
3																											
4																											
5																											

STANDARD SIGN
I55-56

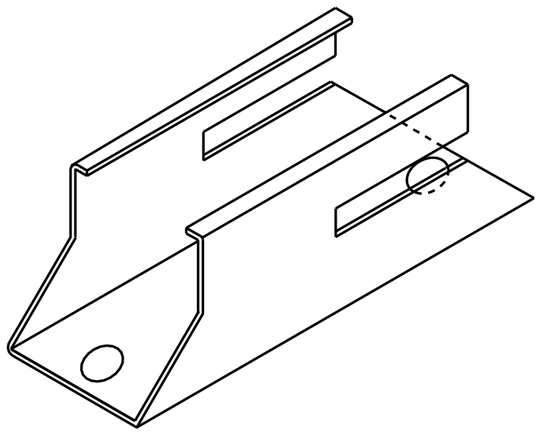
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

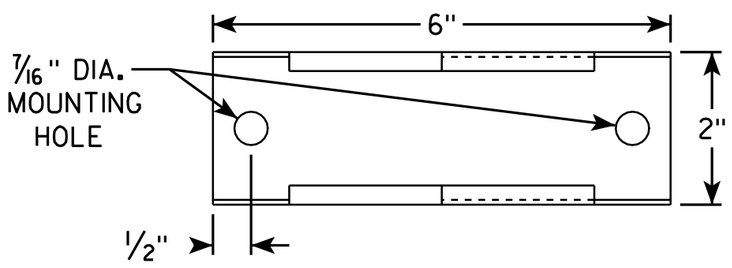
DATE 4/27/11 PLATE NO. 155-56.3

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 229

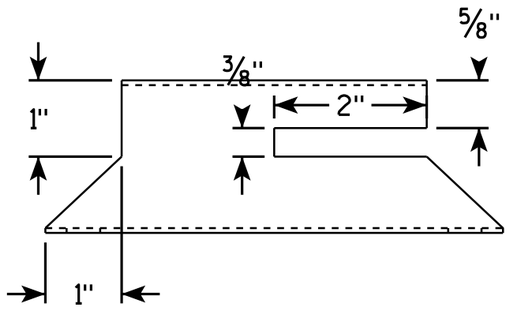
ISOMETRIC VIEW



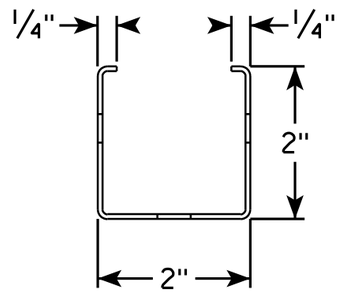
TOP VIEW



SIDE VIEW



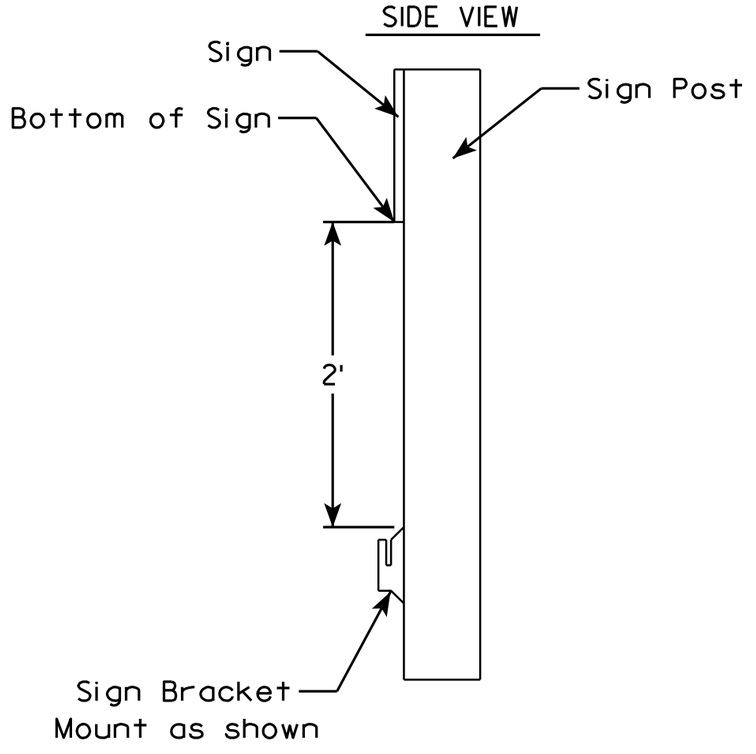
END VIEW



NOTES

1. Must be capable of permanent attachment to a wood or steel channel sign post utilizing the fastening hardware specified on the A4-8 sign plate.
2. Shall be entirely primed and painted with two coats of a black powder coated enamel paint.
3. Shall be made with 12 gauge steel, and incorporate no welds, no hinged components, no threaded lock-type components, and no parts which are loose or can be separated from the main body.
4. Shall have rounded edges with at least 1/8" radii.
5. Shall not have unrounded and uncoated metal edges which can contact the back surface of the roll-up sign.
6. Top of bracket shall be mounted 2' below the bottom of the I55-56 sign.
7. Cost of bracket and fastening hardware shall be incidental to the I55-56 sign.

SIDE VIEW



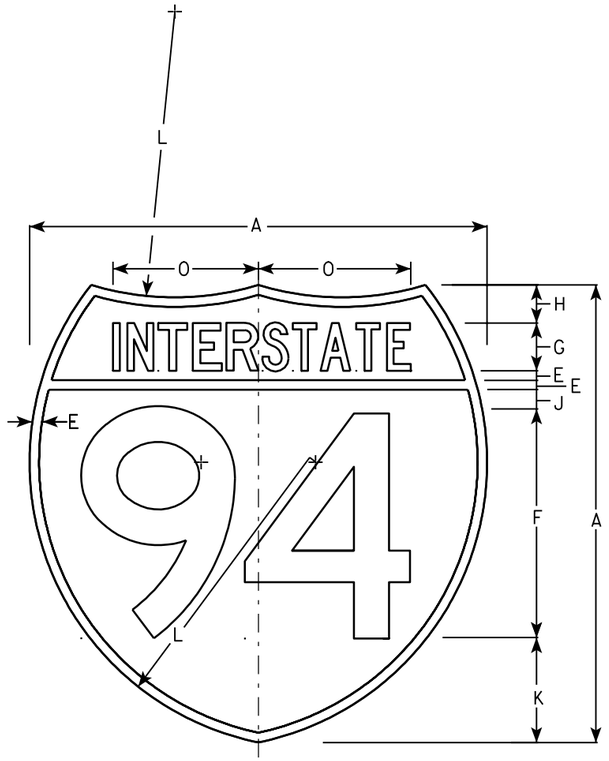
ROLLUP SIGN BRACKET
I55-56B

WISCONSIN DEPT OF TRANSPORTATION

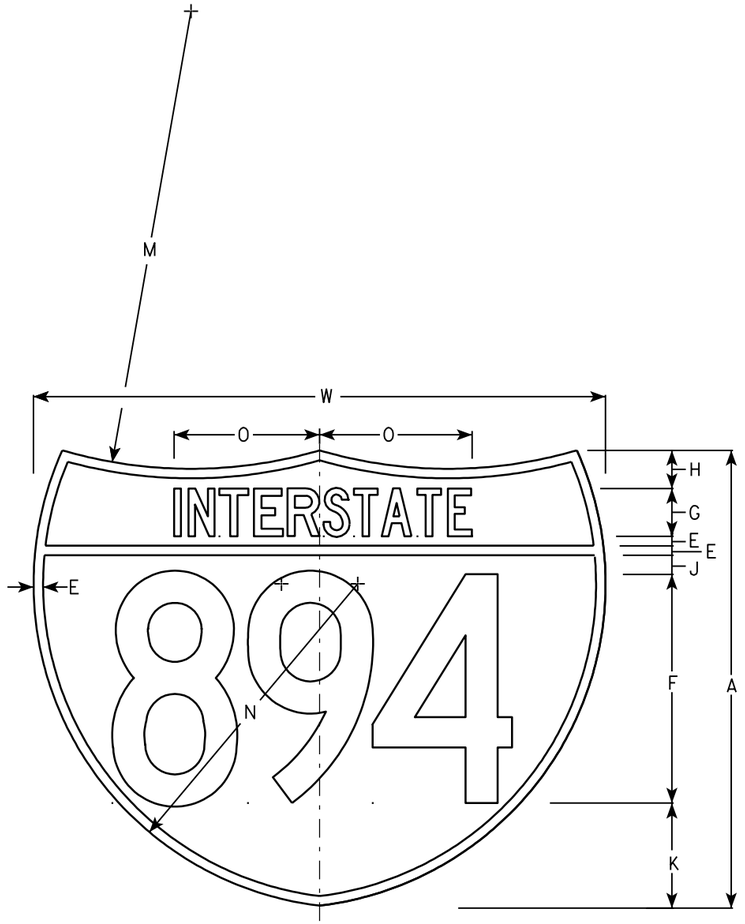
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 2/5/10 PLATE NO. I55-56B.1

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 230	E



M1-1



M1-1A

NOTES

1. Sign is Type II - See Note 6 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Top Red - Bottom Blue (See Note 6)
   Message - White - See Note 6
3. Message Series - See note 5
4. Substitute appropriate numerals & ajust spacing as per plate A10-1.
5. M1-1 - Numerals - D
   Interstate - C
   M1-1A - All copy - C
6. Permanent Signs
   Message - Type H Reflective
   Detour or other temporary signs
   Background - Reflective
   Message - Reflective

Metric equivalent for these signs are:

SIZE	M1-1	SIZE	M1-1A
1			
2	600 mm X 600 mm	2	600 mm X 750 mm
3	900 mm X 900 mm	3	900 mm X 1125 mm
4	900 mm X 900 mm	4	900 mm X 1125 mm
5	900 mm X 900 mm	5	900 mm X 1125 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	M1-1 Area sq. ft.	M1-1A Area sq. ft.	M1-1 Area m2	M1-1A Area m2
1																													
2	24				1/2	12	2 1/2	2		1	5 1/2	15	24	17	7 7/8								30			3.13	3.91	.36	.46
3	36				3/4	18	3 3/4	3		1 1/2	8 1/4	22 1/2	36	25 1/2	11 3/4								45			7.03	8.79	.81	1.05
4	36				3/4	18	3 3/4	3		1 1/2	8 1/4	22 1/2	36	25 1/2	11 3/4								45			7.03	8.79	.81	1.05
5	36				3/4	18	3 3/4	3		1 1/2	8 1/4	22 1/2	36	25 1/2	11 3/4								45			7.03	8.79	.81	1.05

INTERSTATE ROUTE MARKER
M1-1 FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

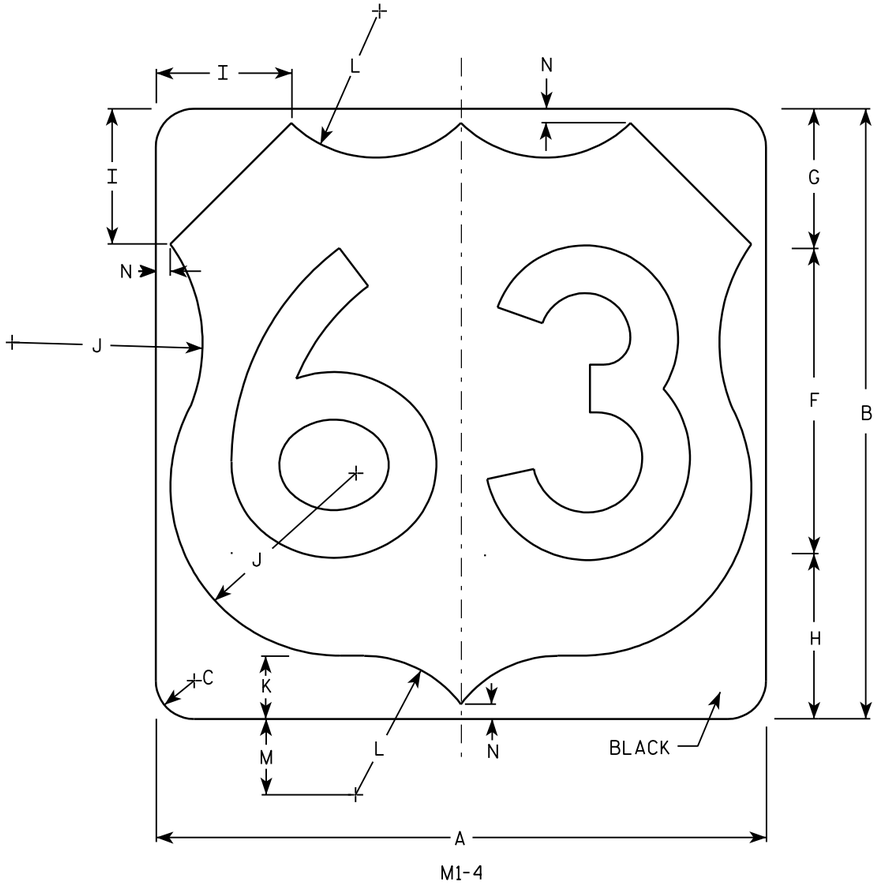
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 08/23/05 PLATE NO. M1-1.8

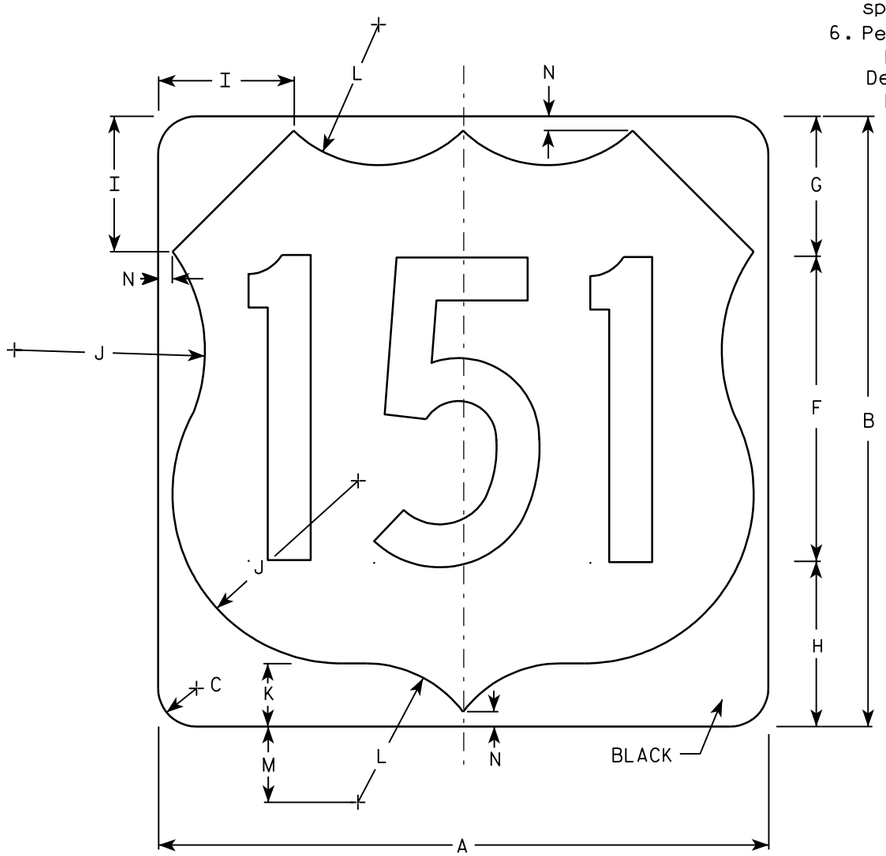
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 231	E

NOTES

1. Sign is Type II - See Note 6 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White & Black - See Note 6
   Message - Black
3. Message Series - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and adjust spacing as per Plate A10-1.
6. Permanent Signs
   Background - Type H Reflective
   Detour or other temporary signs
   Background - Reflective



M1-4



M1-4

Metric equivalent for this sign is:

SIZE	
1	
2	600 mm X 600 mm
3	900 mm X 900 mm
4	900 mm X 900 mm
5	900 mm X 900 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Areq sq. ft.	Area m2
1																												
2	24	24	1 1/2			12	5 1/2	6 1/2	5	7 1/2	2 1/2	5 1/2	3	1/2													4.0	.36
3	36	36	2 1/4			18	8 1/4	9 1/4	7 1/4	11 1/4	3 3/4	8 1/4	4 1/2	3/4													9.0	.81
4	36	36	2 1/4			18	8 1/4	9 1/4	7 1/4	11 1/4	3 3/4	8 1/4	4 1/2	3/4													9.0	.81
5	36	36	2 1/4			18	8 1/4	9 1/4	7 1/4	11 1/4	3 3/4	8 1/4	4 1/2	3/4													9.0	.81

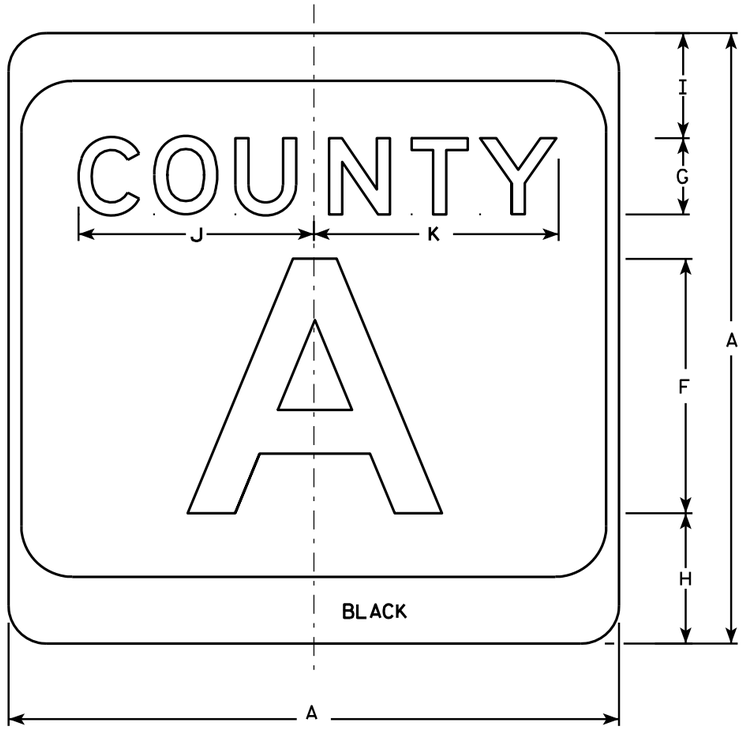
USH MARKER
M1-4 FOR ASSEMBLIES

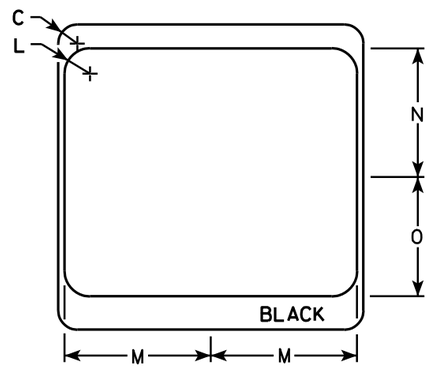
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 08/25/05 PLATE NO. M1-4.9

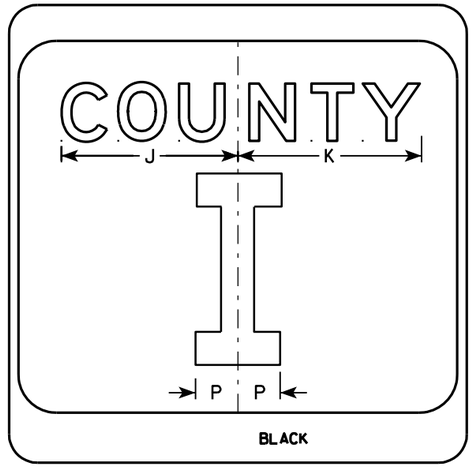
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 232 | E

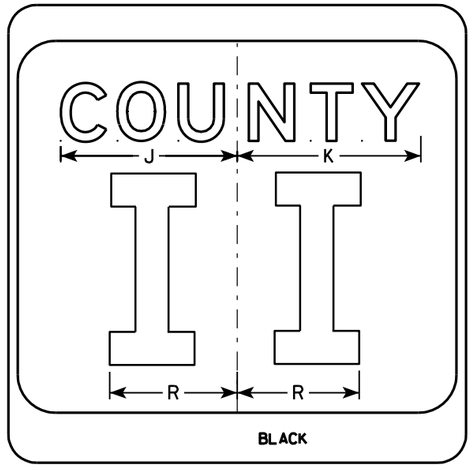




NOTES

1. Sign is Type II - see Note 7 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White & Black - See Note 7
   Message - Black
3. Message Series - see Note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Message Series E for 1 letter.
   Message Series D for 2 letters unless message is too big then Series C.
   Message Series C for 3 letters unless message is too big then Series B.
6. Substitute appropriate letters & optically center to achieve proper balance.
7. Permanent Signs
   Background - Type H Reflective
   Detour or temporary Signs
   Background - Reflective





SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24		1 1/2			10	3	5 1/8	4 1/8	9 1/4	9 5/8	2	11 1/2	10 1/8	9 3/8	2 1/4		6 5/8									4.0
3	36		2 1/4			16	4	7 5/8	5 5/8	12 1/4	12 7/8	3	17 1/8	15 1/4	14	3 3/8		10									9.0
4	36		2 1/4			16	4	7 5/8	5 5/8	12 1/4	12 7/8	3	17 1/8	15 1/4	14	3 3/8		10									9.0
5	36		2 1/4			16	4	7 5/8	5 5/8	12 1/4	12 7/8	3	17 1/8	15 1/4	14	3 3/8		10									9.0

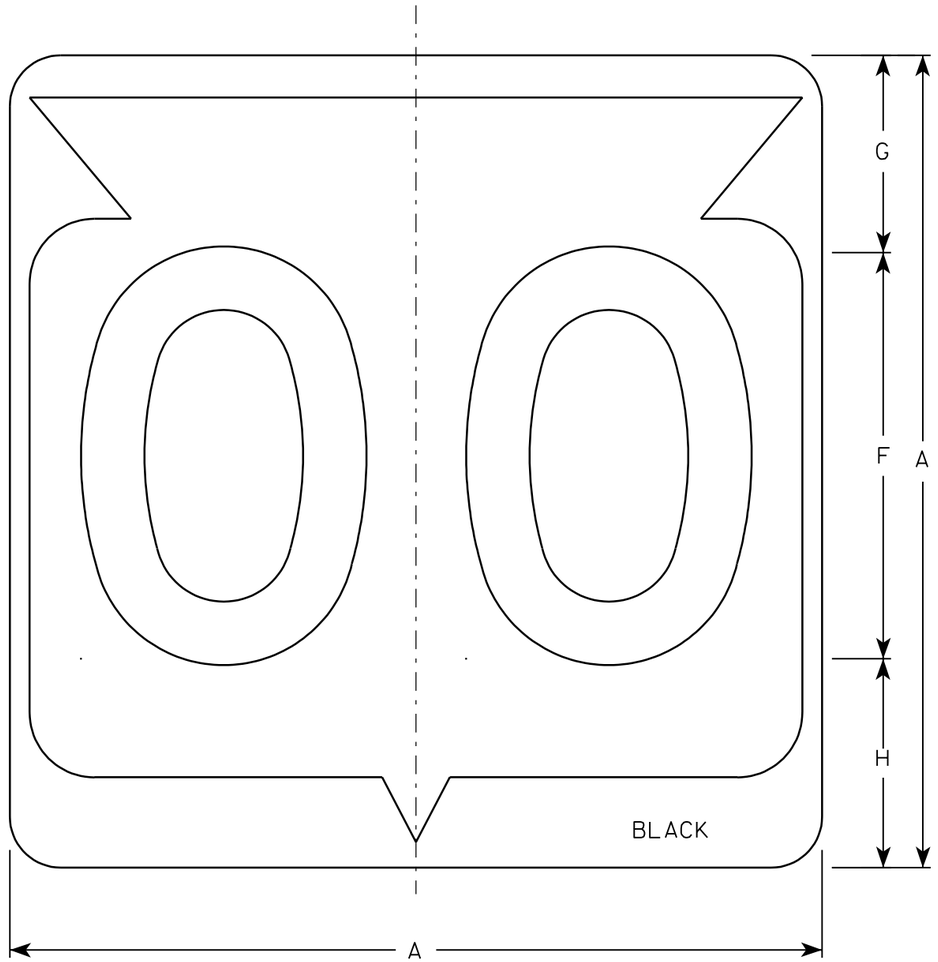
CTH MARKER
M1-5A FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 9/27/11 PLATE NO. M1-5A.8

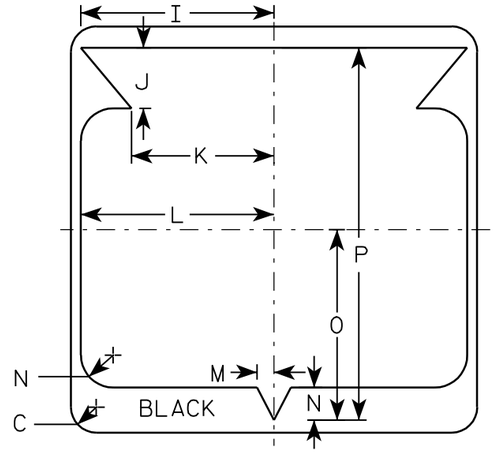
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 233	E



M1-6

NOTES

1. Sign is Type II - See Note 6 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White & Black - See Note 6
   Message - Black
3. Message Series - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate Series numerals and adjust spacing as per plate A10-1.
6. Permanent Signs
   Background - Type H Reflective
   Detour or temporary Signs
   Background - Reflective



Metric equivalent for this sign is:

SIZE	
1	
2	600 mm X 600 mm
3	900 mm X 900 mm
4	900 mm X 900 mm
5	900 mm X 900 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.	Area m2
1																												
2	24		1 1/2			12	5 1/2	6 1/2	10 1/4	2 1/2	8 7/8	11 1/2	1	1 7/8	11 1/4	21 7/8											4.0	.36
3	36		2 1/4			18	8 3/4	9 1/4	15 3/8	5 3/8	12 5/8	17 1/8	1 1/2	2 7/8	16 7/8	33											9.0	.81
4	36		2 1/4			18	8 3/4	9 1/4	15 3/8	5 3/8	12 5/8	17 1/8	1 1/2	2 7/8	16 7/8	33											9.0	.81
5	36		2 1/4			18	8 3/4	9 1/4	15 3/8	5 3/8	12 5/8	17 1/8	1 1/2	2 7/8	16 7/8	33											9.0	.81

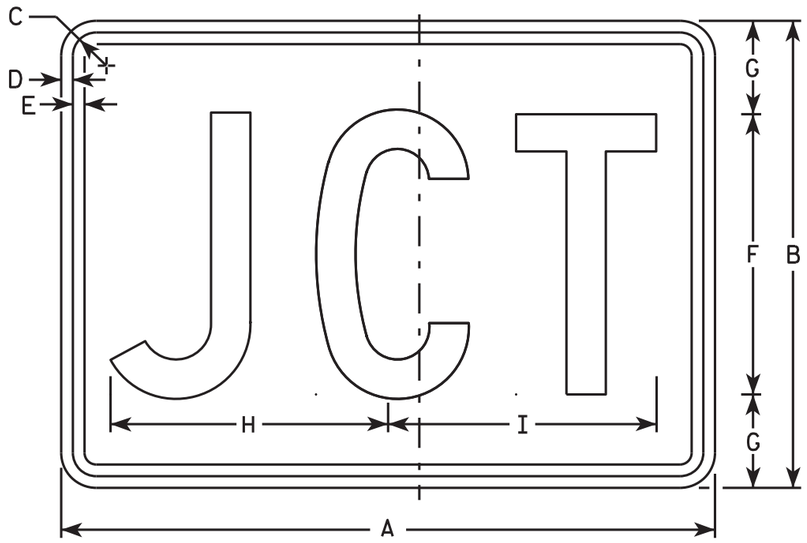
STATE ROUTE MARKER M1-6 FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

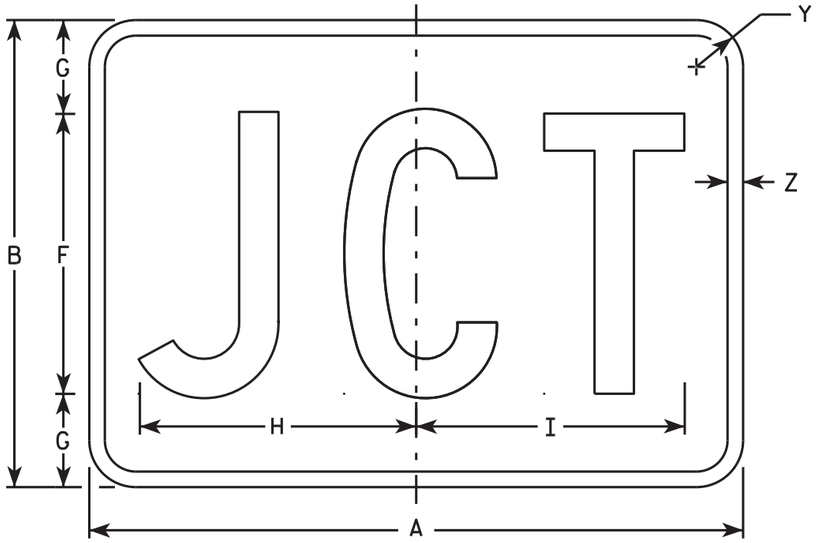
APPROVED Chester J Spang for State Traffic Engineer

DATE 3/20/02 PLATE NO. M1-6.9

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 234	E



M2-1
MM2-1
MP2-1



MB2-1
MK2-1
MN2-1
MR2-1

NOTES

1. Sign is Type II - Type H
2. Color:
   Background - See note 5
   Message - See note 5
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. M2-1 Background - White
   Message - Black
   MB2-1 Background - Blue
   Message - White
   MK2-1 Background - Green
   Message - White
   MM2-1 Background - White
   Message - Green
   MN2-1 Background - Brown
   Message - White
   MP2-1 Background - White
   Message - Blue
   MR2-1 Background - Brown
   Message - Yellow

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	21	15	1 1/8	3/8	3/8	9	3	8 7/8	8 5/8																1 1/2	1/2	2.20
3	30	21	1 1/8	3/8	3/8	13	4	12 7/8	12 3/8																1 1/2	1/2	4.40
4	30	21	1 1/8	3/8	3/8	13	4	12 7/8	12 3/8																1 1/2	1/2	4.40
5	30	21	1 1/8	3/8	3/8	13	4	12 7/8	12 3/8																1 1/2	1/2	4.40

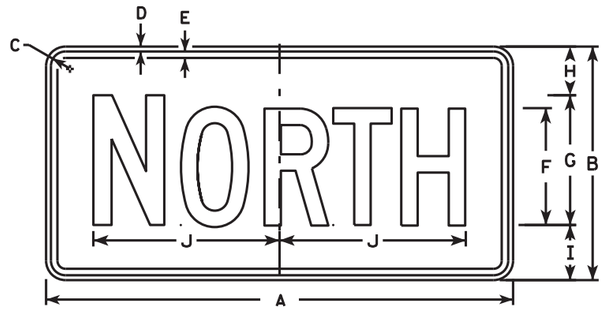
STANDARD SIGN
M2-1

WISCONSIN DEPT OF TRANSPORTATION

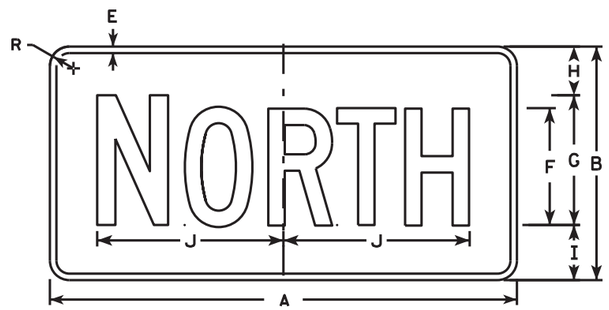
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE NO. M2-1.12

PROJECT NO: | HWY: | COUNTY: | SHEET NO: E



M3-1
MM3-1
MP3-1



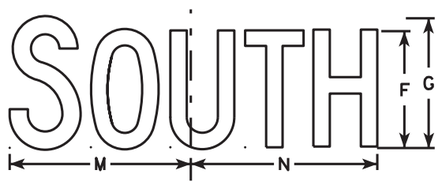
MB3-1
MK3-1
MN3-1



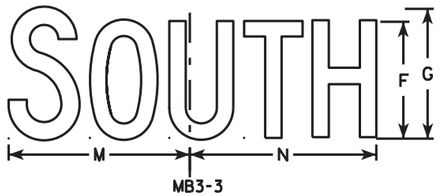
M3-2
MM3-2
MP3-2



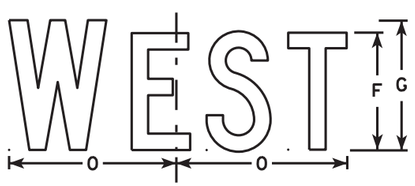
MB3-2
MK3-2
MN3-2



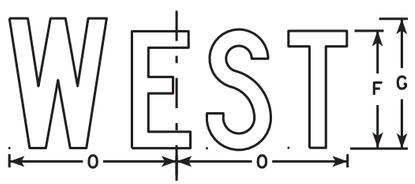
M3-3
MM3-3
MP3-3



MB3-3
MK3-3
MN3-3



M3-4
MM3-4
MP3-4



MB3-4
MK3-4
MN3-4

NOTES

1. All Signs Type II - Type H
2. Color:
   Background - See note 5
   Message - See note 5
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. M3-1 thru M3-4 Background - White
   Message - Black
   MB3-1 thru MB3-4 Background - Blue
   Message - White
   MK3-1 thru MK3-4 Background - Green
   Message - White
   MM3-1 thru MM3-4 Background - White
   Message - Green
   MN3-1 thru MN3-4 Background - Brown
   Message - White
   MP3-1 thru MP3-4 Background - White
   Message - Blue
6. Note the first letter of each direction is larger than the remainder of the message.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24	12	1 1/8	3/8	3/8	6	7	2 1/4	2 3/4	10 1/4	7 7/8	8 3/8	10 1/4	9 3/4	8 3/4			1 1/2									2.00
3	36	18	1 1/8	3/8	1/2	9	10	3 3/4	4 1/4	14 3/8	12	12 1/8	14	14 1/8	13			1 1/2									4.5
4	36	18	1 1/8	3/8	1/2	9	10	3 3/4	4 1/4	14 3/8	12	12 1/8	14	14 1/8	13			1 1/2									4.5
5	36	18	1 1/8	3/8	1/2	9	10	3 3/4	4 1/4	14 3/8	12	12 1/8	14	14 1/8	13			1 1/2									4.5

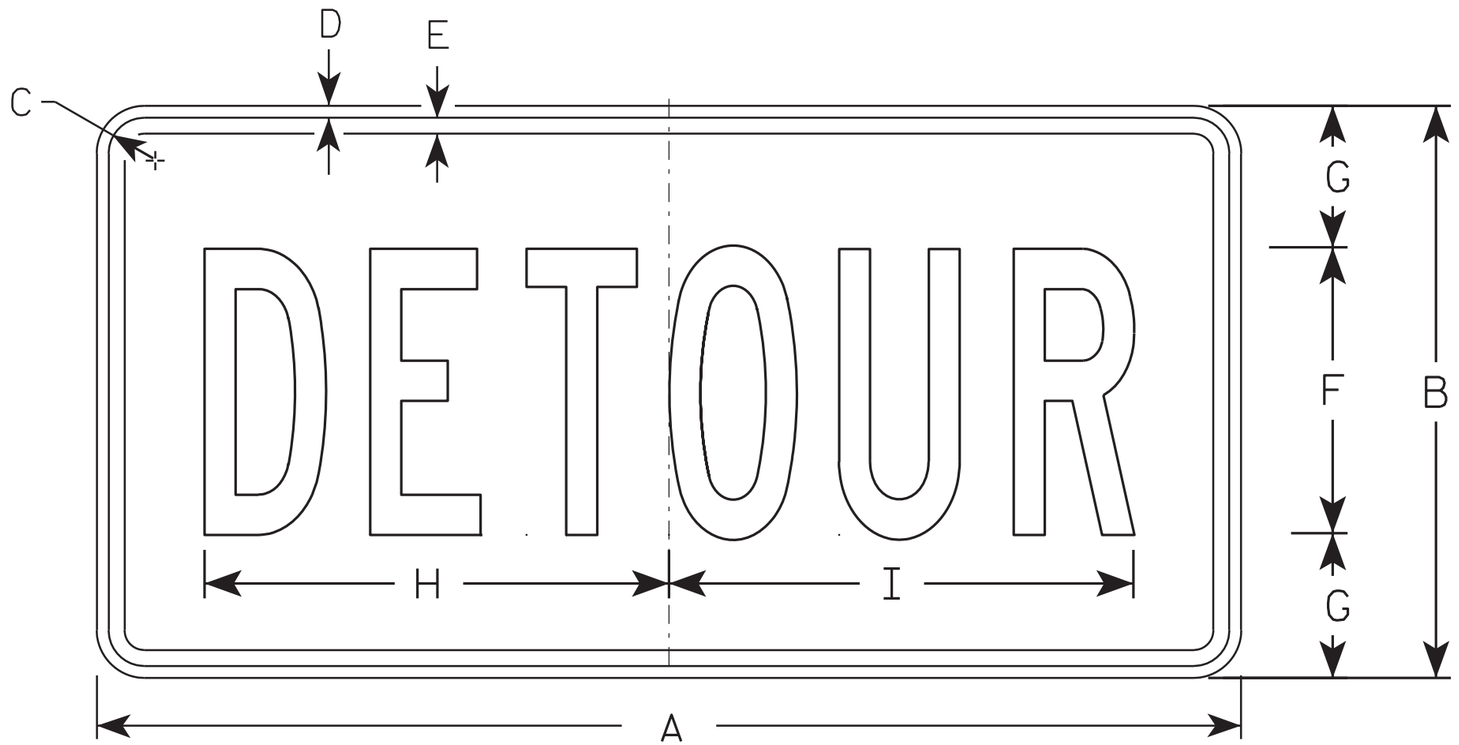
STANDARD SIGNS
M3-1 thur M3-4
SERIES

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

DATE 10/15/15 PLATE NO. M3-1.14

PROJECT NO: | HWY: | COUNTY: | SHEET NO: E



M4-8

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - B
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24	12	1 1/8	3/8	3/8	6	3	10	10 1/4																		2.0
3	36	18	1 1/8	3/8	1/2	9	4 1/2	14 5/8	14 1/2																		4.5
4																											
5																											

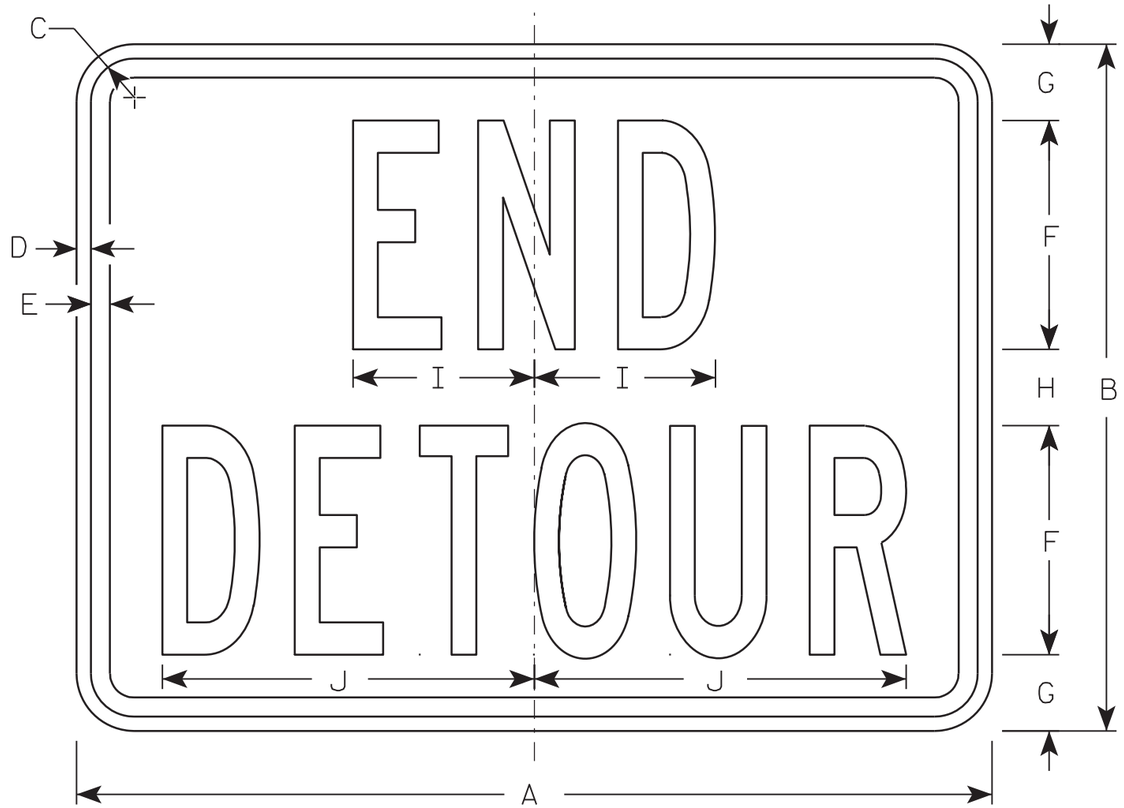
STANDARD SIGN
M4-8

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/10/10 PLATE NO. M4-8.2

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 237	E



M4-8A

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - B
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24	18	1 1/8	3/8	1/2	6	2	2	4 3/4	9 3/4																	3.0
3	30	24	1 1/8	3/8	1/2	8	2 1/2	3	6 3/4	13																	5.0
4																											
5																											

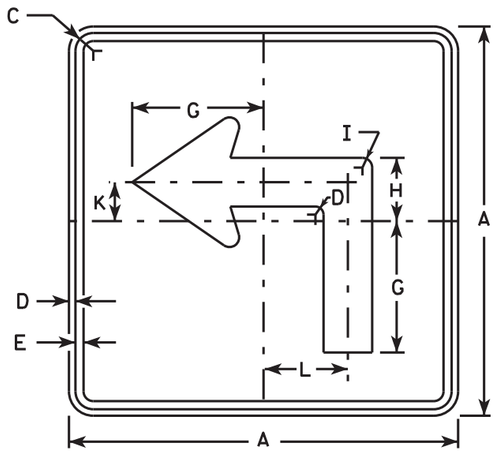
STANDARD SIGN
M4-8A

WISCONSIN DEPT OF TRANSPORTATION

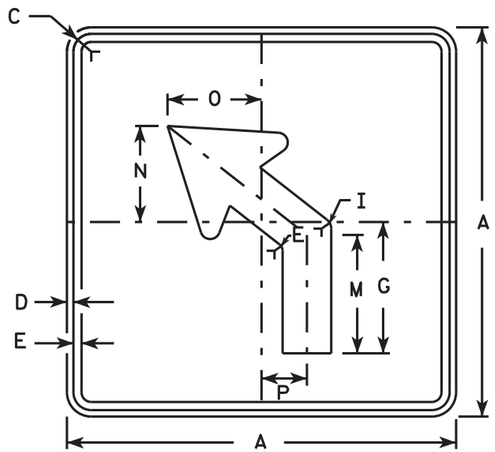
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/9/11 PLATE NO. M4-8A.2

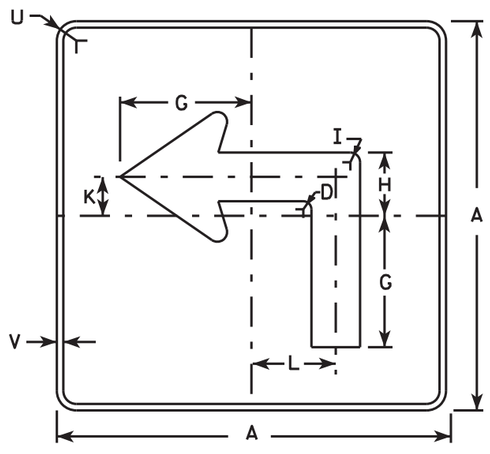
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 238	E



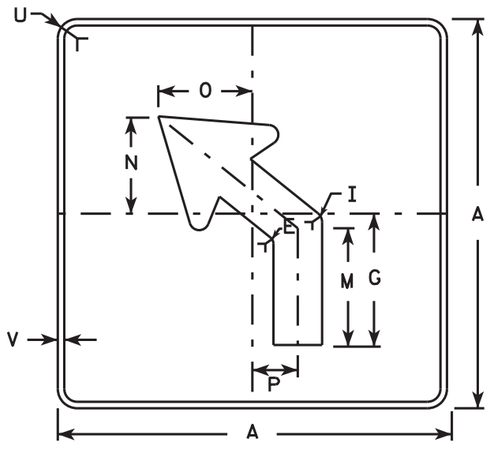
M5-1L
MM5-1L
MO5-1L
MP5-1L



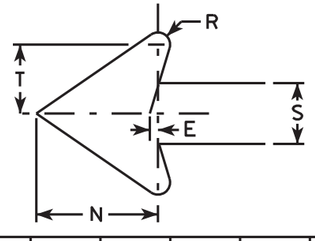
M5-2L
MM5-2L
MO5-2L
MP5-2L



MB5-1L
MK5-1L
MN5-1L
MR5-1L



MB5-2L
MK5-2L
MN5-2L
MR5-2L



NOTES

1. Signs are Type II - Type H reflective except as shown
2. Color:
   Background - See note 4
   Message - See note 4
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. M5-1 and M5-2 Background - White
   Message - Black
   MB5-1 and MB5-2 Background - Blue
   Message - White
   MK5-1 and MK5-2 Background - Green
   Message - White
   MM5-1 and MM5-2 Background - White
   Message - Green
   MN5-1 and MN5-2 Background - Brown
   Message - White
   MO5-1 and MO5-2 Background - Orange - Type F Reflective
   Message - Black
   MP5-1 and MP5-2 Background - White - Type H Reflective
   Message - Blue
   MR5-1 and MR5-2 Background - Brown
   Message - Yellow
5. M5-1R same as M5-1L except arrow points right.
6. M5-2R same as M5-2L except arrow tilts right.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	21		1 1/8	3/8	3/8		7	3 3/8	5/8		2 1/8	4 1/2	6 3/8	5 1/4	5	2 1/2		1/2	2 5/8	3	1 1/2	1/2					3.06
3	30		1 3/8	1/2	5/8		10 1/8	4 7/8	7/8		3	6 1/2	9 1/8	7 1/2	7 1/4	3 1/2		3/4	3 3/4	4 1/4	1 7/8	1/2					6.25
4	30		1 3/8	1/2	5/8		10 1/8	4 7/8	7/8		3	6 1/2	9 1/8	7 1/2	7 1/4	3 1/2		3/4	3 3/4	4 1/4	1 7/8	1/2					6.25
5	30		1 3/8	1/2	5/8		10 1/8	4 7/8	7/8		3	6 1/2	9 1/8	7 1/2	7 1/4	3 1/2		3/4	3 3/4	4 1/4	1 7/8	1/2					6.25

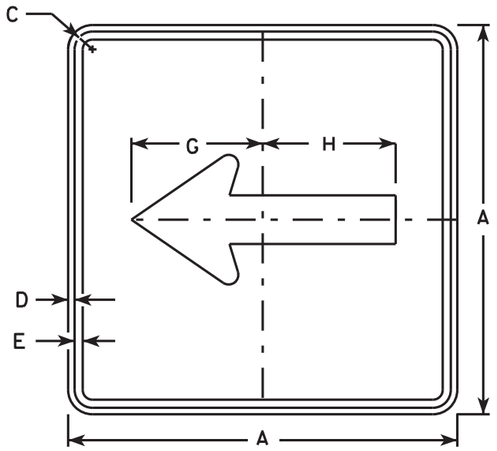
STANDARD SIGN
M5-1 & M5-2

WISCONSIN DEPT OF TRANSPORTATION

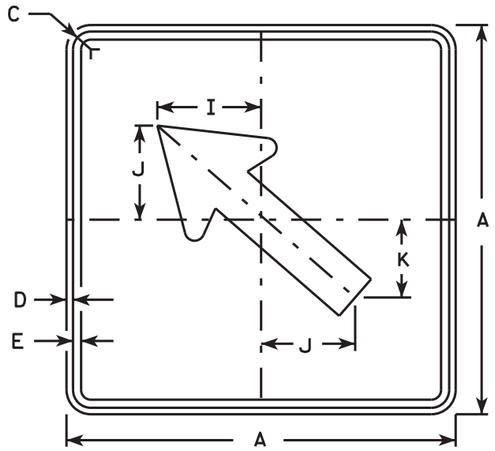
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE NO. M5-1.13

PROJECT NO: | HWY: | COUNTY: | SHEET NO: E



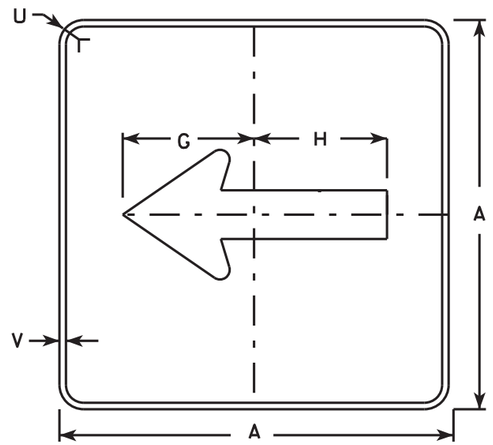
M6-1
MM6-1
MO6-1
MP6-1



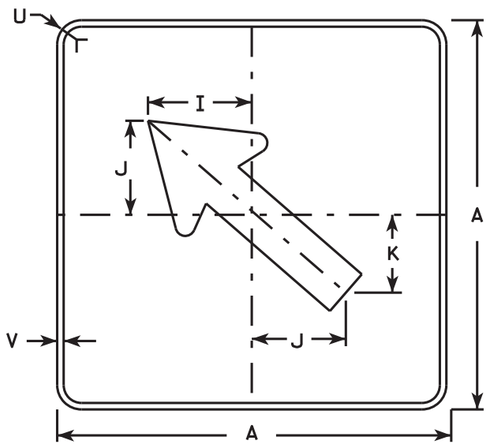
M6-2
MM6-2
MO6-2
MP6-2

NOTES

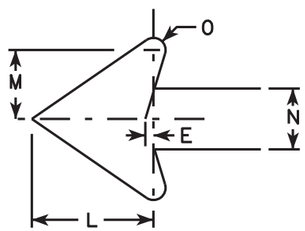
1. Signs are Type II - Type H except as Shown
2. Color:
   Background - See note 4
   Message - See note 4
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. M6-1 and M6-2 Background - White
   Message - Black
   MB6-1 and MB6-2 Background - Blue
   Message - White
   MK6-1 and MK6-2 Background - Green
   Message - White
   MM6-1 and MM6-2 Background - White
   Message - Green
   MN6-1 and MN6-2 Background - Brown
   Message - White
   MO6-1 and MO6-2 Background - Orange - Type F Reflective
   Message - Black
   MP6-1 and MP6-2 Background - White
   Message - Blue
   MR6-1 and MR6-2 Background - Brown
   Message - Yellow



MB6-1
MK6-1
MN6-1
MR6-1



MB6-2
MK6-2
MN6-2
MR6-2



SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	21		1 1/8	3/8	3/8		7 1/2	7 1/8	5 5/8	5	4 1/4	5 1/4	3	2 5/8	1/2						1 1/2	1/2						3.06
3	30		1 3/8	1/2	5/8		10 3/4	10 1/4	8	7 1/4	6	7 1/2	4 1/4	3 3/4	3/4						1 7/8	1/2						6.25
4	30		1 3/8	1/2	5/8		10 3/4	10 1/4	8	7 1/4	6	7 1/2	4 1/4	3 3/4	3/4						1 7/8	1/2						6.25
5	30		1 3/8	1/2	5/8		10 3/4	10 1/4	8	7 1/4	6	7 1/2	4 1/4	3 3/4	3/4						1 7/8	1/2						6.25

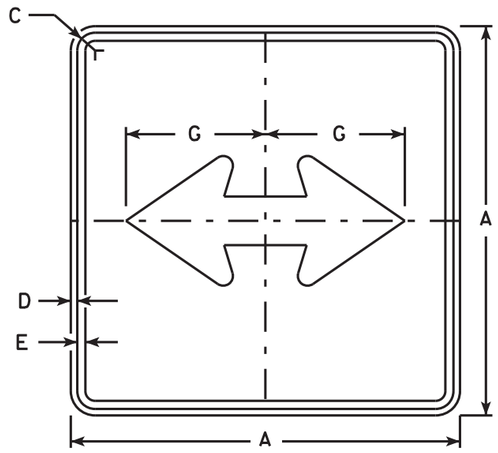
STANDARD SIGN
M6-1 & M6-2
SERIES

WISCONSIN DEPT OF TRANSPORTATION

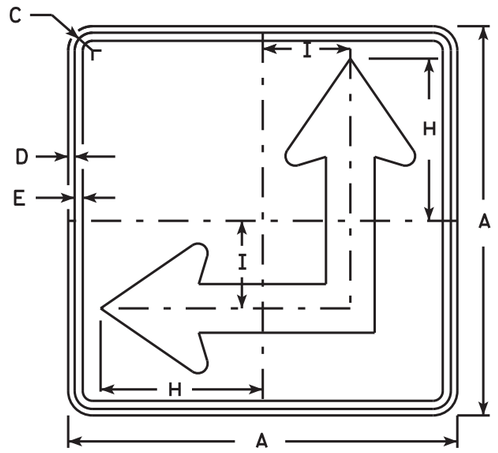
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE NO. M6-1.15

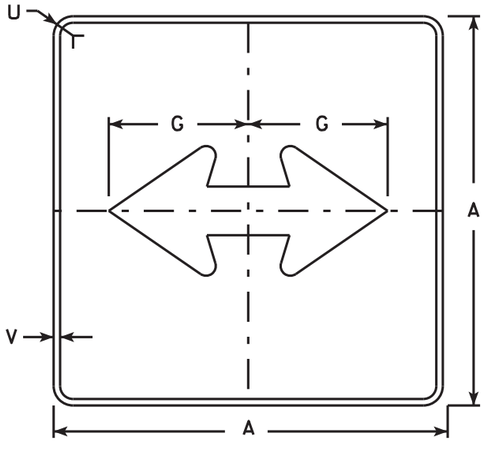
PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E



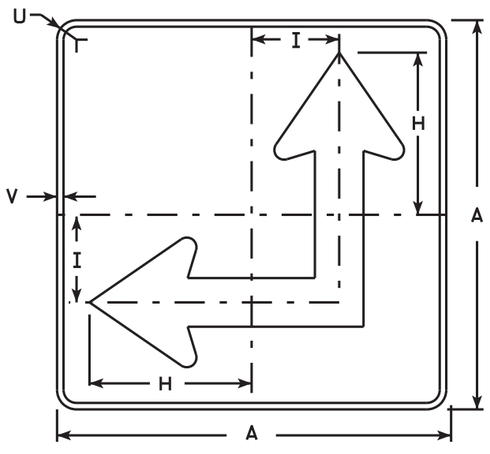
M6-4
MM6-4
MO6-4
MP6-4



M6-6
MM6-6
MO6-6
MP6-6



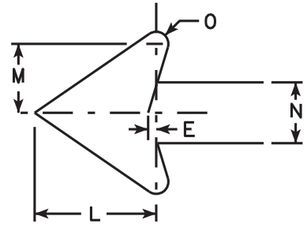
MB6-4
MK6-4
MN6-4
MR6-4



MB6-6
MK6-6
MN6-6
MR6-6

NOTES

1. Signs are Type II - Type H except as Shown
2. Color:
   Background - See Note 4
   Message - See Note 4
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. M6-4 and M6-6 Background - White
   Message - Black
   MB6-4 and MB6-6 Background - Blue
   Message - White
   MK6-4 and MK6-6 Background - Green
   Message - White
   MM6-4 and MM6-6 Background - White
   Message - Green
   MN6-4 and MN6-6 Background - Brown
   Message - White
   MO6-4 and MO6-6 Background - Orange - Type F Reflective
   Message - Black
   MP6-4 and MP6-6 Background - White
   Message - Blue
   MR6-4 and MR6-6 Background - Brown
   Message - Yellow
5. M6-6R same as M6-6L except arrow points ahead and right.



SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	21		1 1/8	3/8	3/8		7 1/2	8 3/4	4 1/4			5 1/4	3	2 5/8	1/2						1 1/2	1/2					3.06
3	30		1 3/8	1/2	5/8		10 3/4	12 1/2	6 3/4			7 1/2	4 1/4	3 3/4	3/4						1 7/8	1/2					6.25
4	30		1 3/8	1/2	5/8		10 3/4	12 1/2	6 3/4			7 1/2	4 1/4	3 3/4	3/4						1 7/8	1/2					6.25
5	30		1 3/8	1/2	5/8		10 3/4	12 1/2	6 3/4			7 1/2	4 1/4	3 3/4	3/4						1 7/8	1/2					6.25

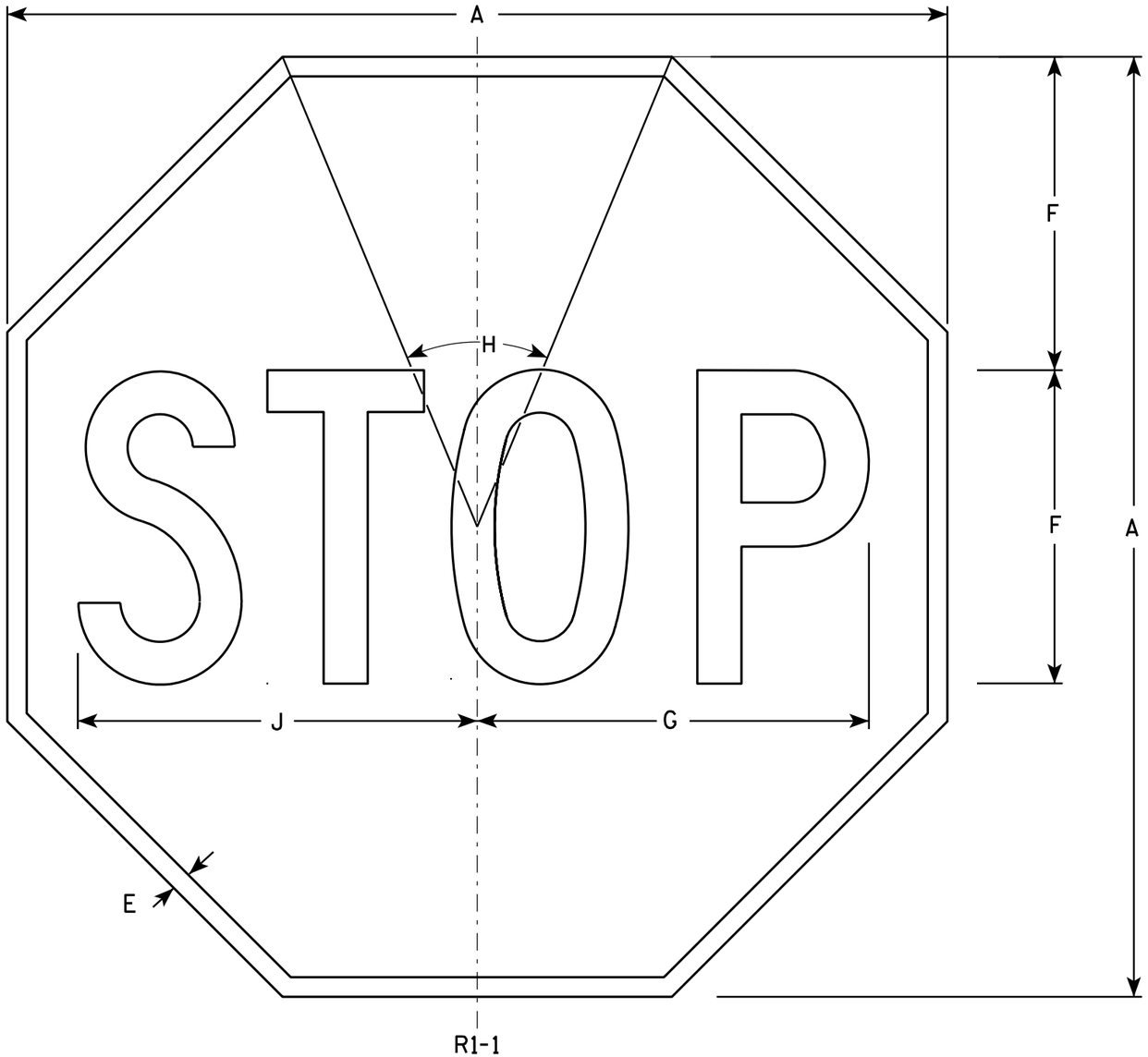
STANDARD SIGN
M6-4 & M6-6
SERIES

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

DATE 10/15/15 PLATE NO. M6-4.10

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E



NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Red
   Message - White
3. Message Series - C

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	24				3/8	8	10	45°		10 1/4																	3.31
2S	30				5/8	10	12 1/2	45°		12 3/4																	5.18
2M	36				3/4	12	15	45°		15 3/8																	7.46
3	36				3/4	12	15	45°		15 3/8																	7.46
4	48				1	16	20	45°		20 1/2																	13.25
5	48				1	16	20	45°		20 1/2																	13.25
6	18				3/8	6	7 3/4	45°		7 3/4																	1.86
7	12				1/4	4	5	45°		5 1/8																	0.78

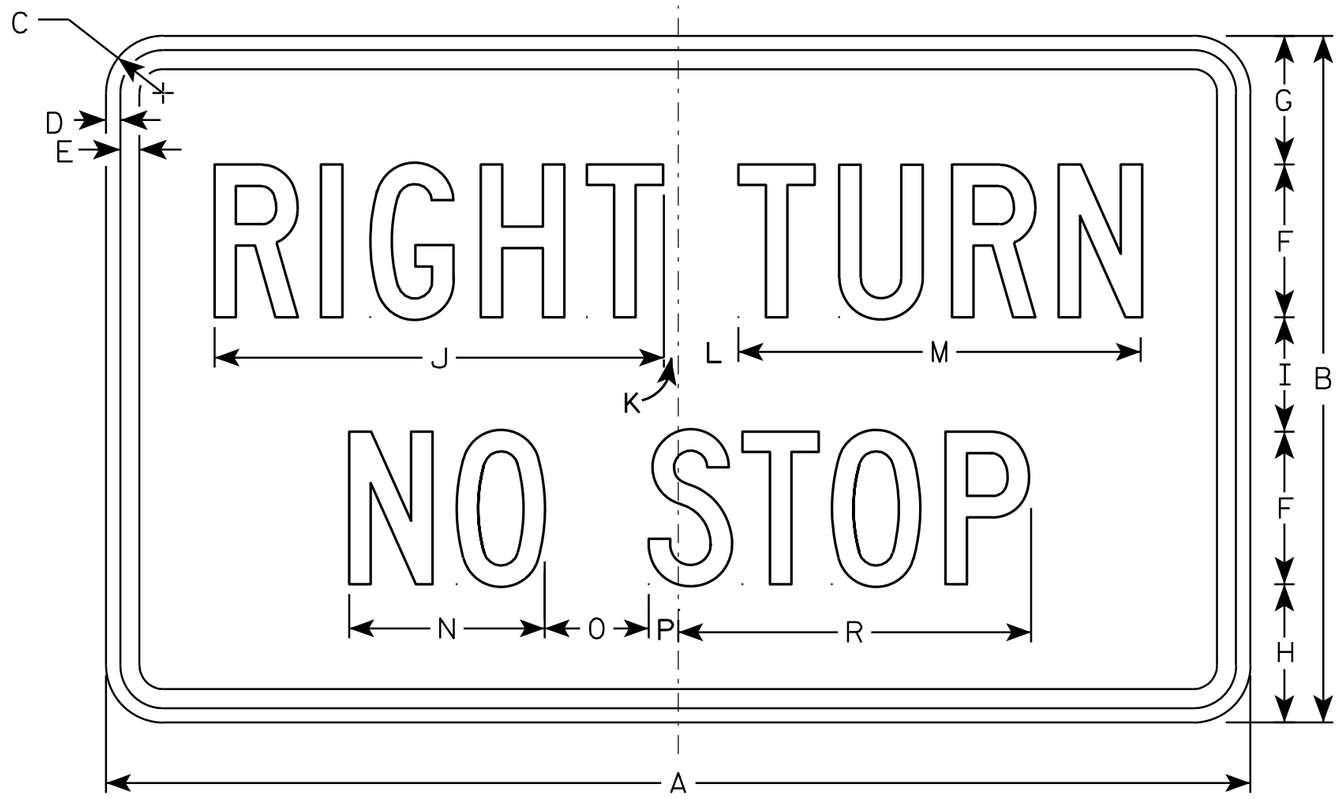
STANDARD SIGN
R1-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/03/10 PLATE NO. R1-1.12

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 242	E



R1-51

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 1/8	3/8	1/2	4	3 3/8	3 5/8	3	11 3/4	3/8	1 5/8	10 1/2	5 1/8	2 3/4	3/4		9 1/4									3.75
2M	48	24	1 3/8	1/2	5/8	6	4	4	4	18 3/4	1	3	16 3/4	8	5	5/8		14 5/8									8.00
3																											
4																											
5																											

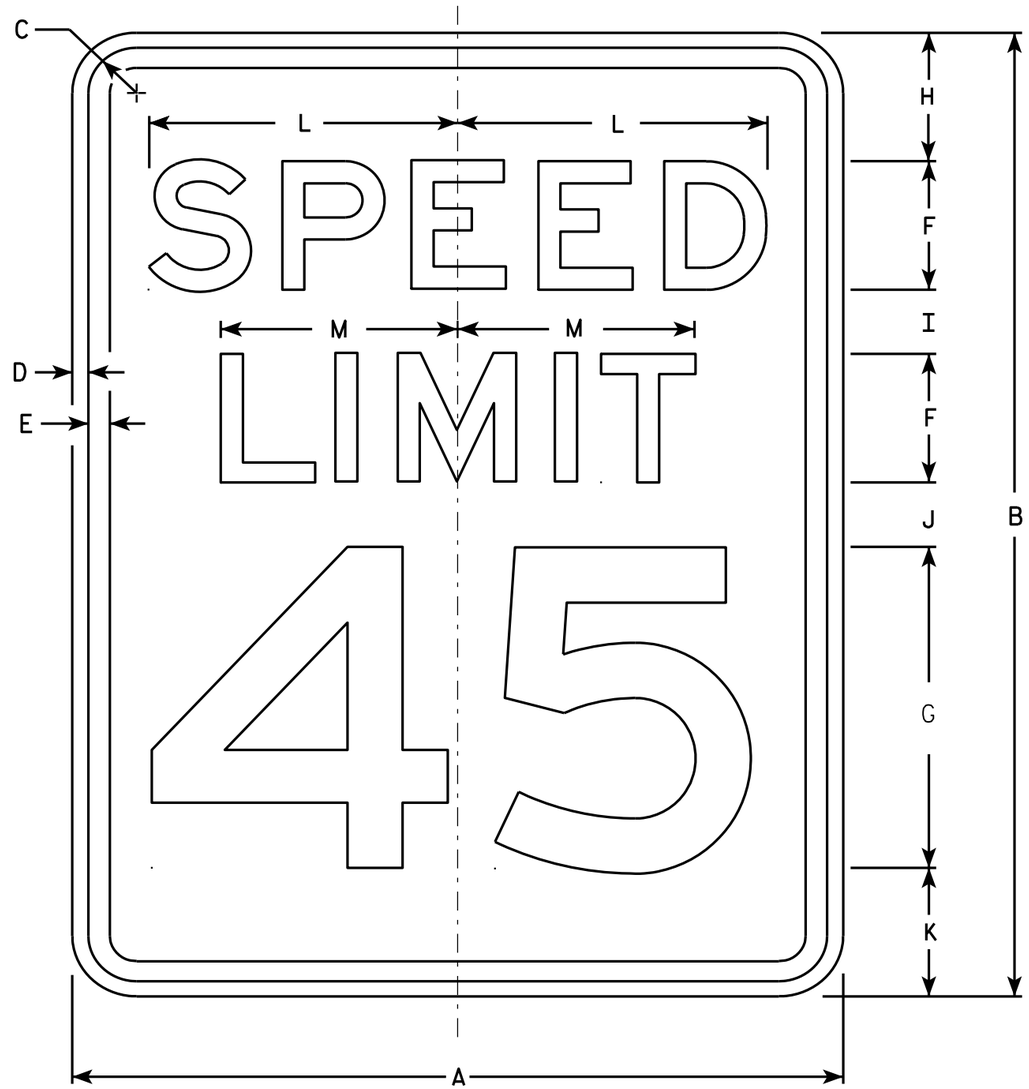
STANDARD SIGN
R1-51

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/13/11 PLATE NO. R1-51.8

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 243	E



R2-1

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - E
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and optically adjust spacing to achieve proper balance.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	18	24	1 1/8	3/8	1/2	3	8	3	2	2	3	7 1/4	5 1/2														3.0
2S	24	30	1 1/8	3/8	1/2	4	10	3	2 1/4	3 3/8	3 3/8	9 5/8	7 3/8														5.0
2M	30	36	1 3/8	1/2	5/8	5	12	5	2 1/2	2 1/2	4	12	9 1/4														7.5
3	36	48	1 3/8	1/2	5/8	6	14	6	5	5	6	14 3/8	11														12.0
4	36	48	1 3/8	1/2	5/8	6	14	6	5	5	6	14 3/8	11														12.0
5	48	60	2 1/4	3/4	1	8	20	6	4 1/2	6 3/4	6 3/4	19 1/4	14 5/8														20.0

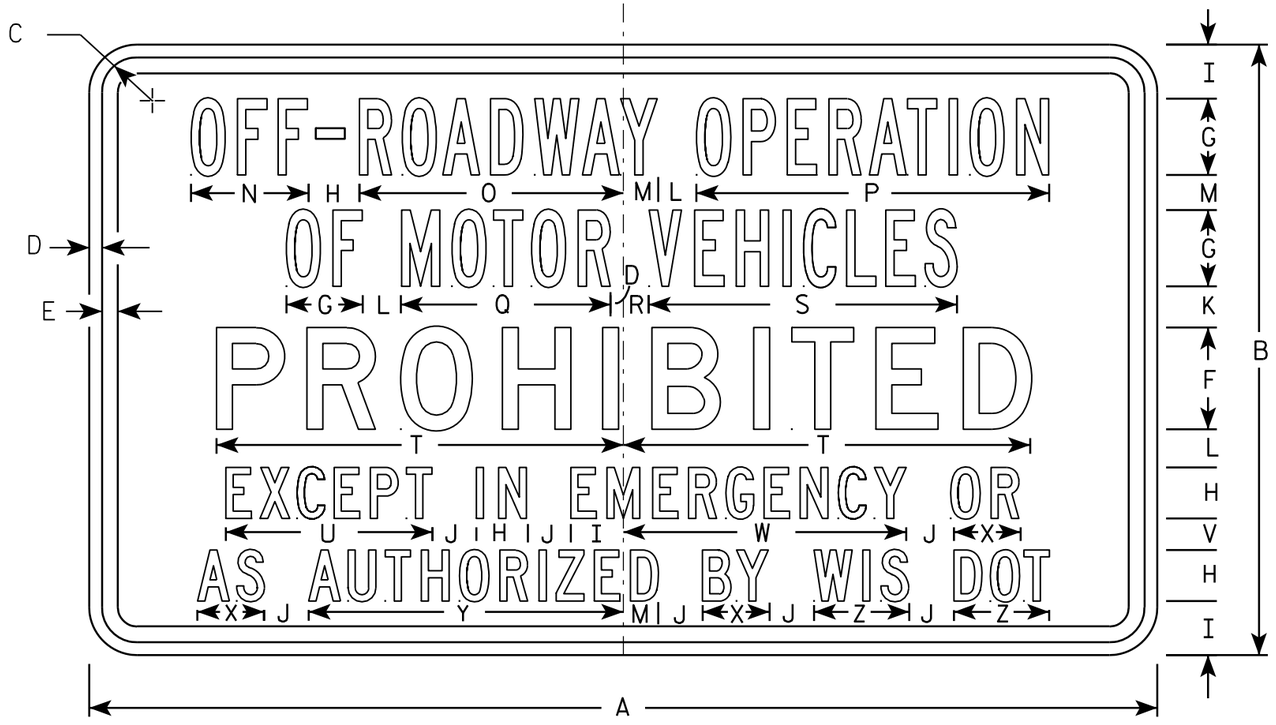
STANDARD SIGN
R2-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/26/10 PLATE NO. R2-1.13

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 244	E



R5-99

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Lines 1 and 2 are Series B.
   Line 3 is Series D.
   Lines 4 and 5 are Series C.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	42	24	1 3/8	1/2	5/8	4	3	2	2 1/8	1 3/4	1 5/8	1 1/2	1 3/8	4 5/8	10 3/8	13 7/8	8 1/4	1	12 1/8	16	8 1/8	1 1/4	11 1/8	2 5/8	12 3/8	3 3/4	7.00
2M	42	24	1 3/8	1/2	5/8	4	3	2	2 1/8	1 3/4	1 5/8	1 1/2	1 3/8	4 5/8	10 3/8	13 7/8	8 1/4	1	12 1/8	16	8 1/8	1 1/4	11 1/8	2 5/8	12 3/8	3 3/4	7.00
3																											
4																											
5																											

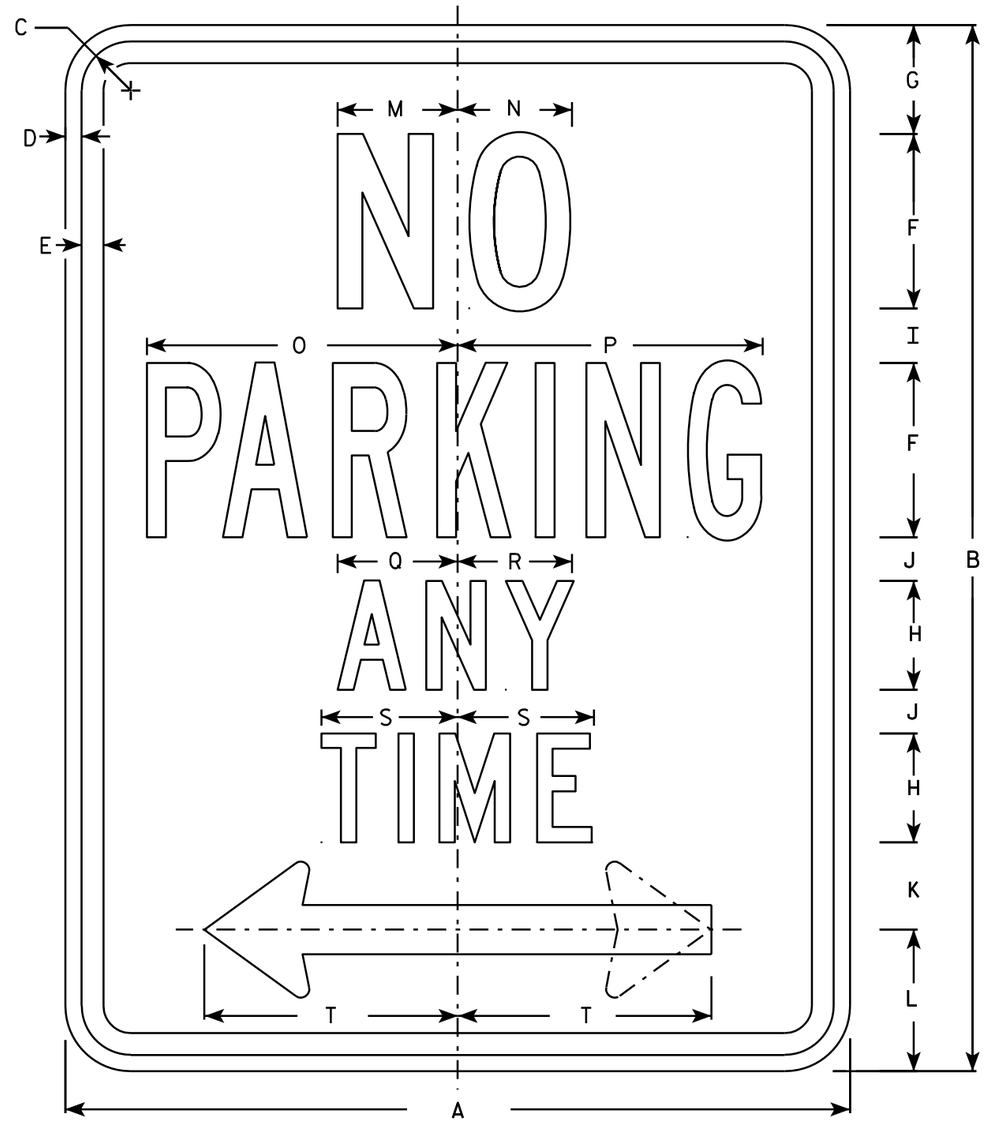
STANDARD SIGN
R5-99

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/29/2011 PLATE NO. R5-99.6

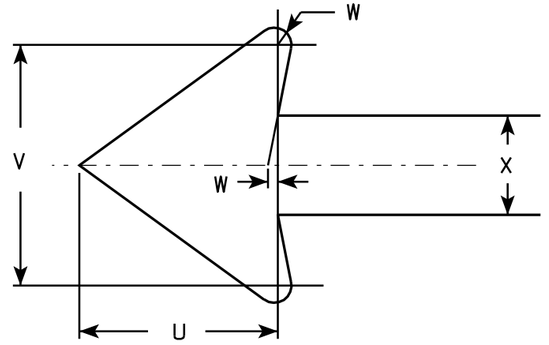
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 245	E



R7-1

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Red
3. Message Series - See Note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Lines 1, 3 and 4 are series C, line 2 is series B.
6. R7-1D (double arrow)
   R7-1L (left arrow)
   R7-1R (right arrow)



SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	12	18	1 1/8	3/8	3/8	3	1 7/8	2	7/8	5/8	1 1/2	2 1/2	2	2	4 7/8	4 7/8	2 1/4	2 1/8	2 1/2	3 7/8	1 1/2	1 3/4	1/8	3/4			1.5
2S	18	24	1 1/8	3/8	1/2	4	2 1/2	2 1/2	1 1/4	1	2	3 1/4	2 3/4	2 5/8	7 1/8	7	2 3/4	2 5/8	3 1/8	5 7/8	2 1/4	2 5/8	1/4	1 1/8			3.0
2M	24	30	1 1/8	3/8	1/2	5	3	3	2	1 1/4	2 1/2	4	3 1/4	3 3/8	9 1/4	9 1/4	3 1/4	3 1/4	3 3/4	7 3/4	3	3 1/2	1/4	1 1/2			5.0
3	24	30	1 1/8	3/8	1/2	5	3	3	2	1 1/4	2 1/2	4	3 1/4	3 3/8	9 1/4	9 1/4	3 1/4	3 1/4	3 3/4	7 3/4	3	3 1/2	1/4	1 1/2			5.0
4																											
5																											

STANDARD SIGN
R7-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/31/2011 PLATE NO. R7-1.9

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 246	E

FILE NAME : C:\Users\PROJECTS\tr_stdplate\R71.DGN PLOT DATE : 31-MAR-2011 09:20 PLOT BY : mscsja PLOT NAME : PLOT SCALE : 3.476110:1.000000

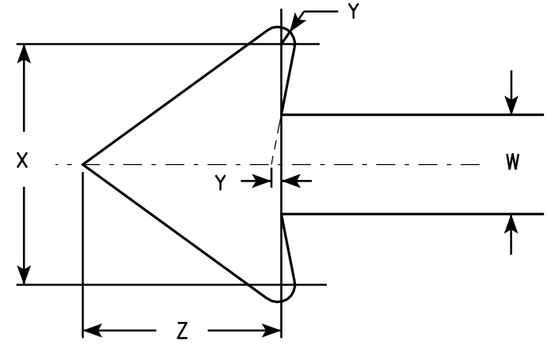
WISDOT/CADDS SHEET 42



R7-51

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Red
3. Message Series - See Note 6
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. R7-51D (double arrow)
   R7-51R (right arrow)
   R7-51L (left arrow)
6. Lines 1, 3 and 4 are Series C.
   Line 2 is Series B.



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	12	18	1 1/8	3/8	3/8	3	1 7/8	2	7/8	5/8	1 1/2	2 1/2	2	2	4 7/8	4 7/8	4 7/8	5/8	1 3/4	2 1/2	4 3/8	3 7/8	3/4	1 3/4	1/8	1 1/2	1.5
2S	18	24	1 1/8	3/8	1/2	4	2 1/2	2 1/2	1 1/4	1	2	3 1/4	2 3/4	2 5/8	7 1/8	7	5 3/4	1 1/8	1 1/2	3 1/8	5 1/2	5 7/8	1 1/8	2 5/8	1/4	2 1/4	3.0
2M	24	30	1 1/8	3/8	1/2	5	3	3	2	1 1/4	2 1/2	4	3 1/4	3 3/8	9 1/4	9 1/4	7 1/8	1 1/4	2	3 3/4	6 1/2	7 3/4	1 1/2	3 1/2	1/4	3	5.0
3	24	30	1 1/8	3/8	1/2	5	3	3	2	1 1/4	2 1/2	4	3 1/4	3 3/8	9 1/4	9 1/4	7 1/8	1 1/4	2	3 3/4	6 1/2	7 3/4	1 1/2	3 1/2	1/4	3	5.0
4																											
5																											

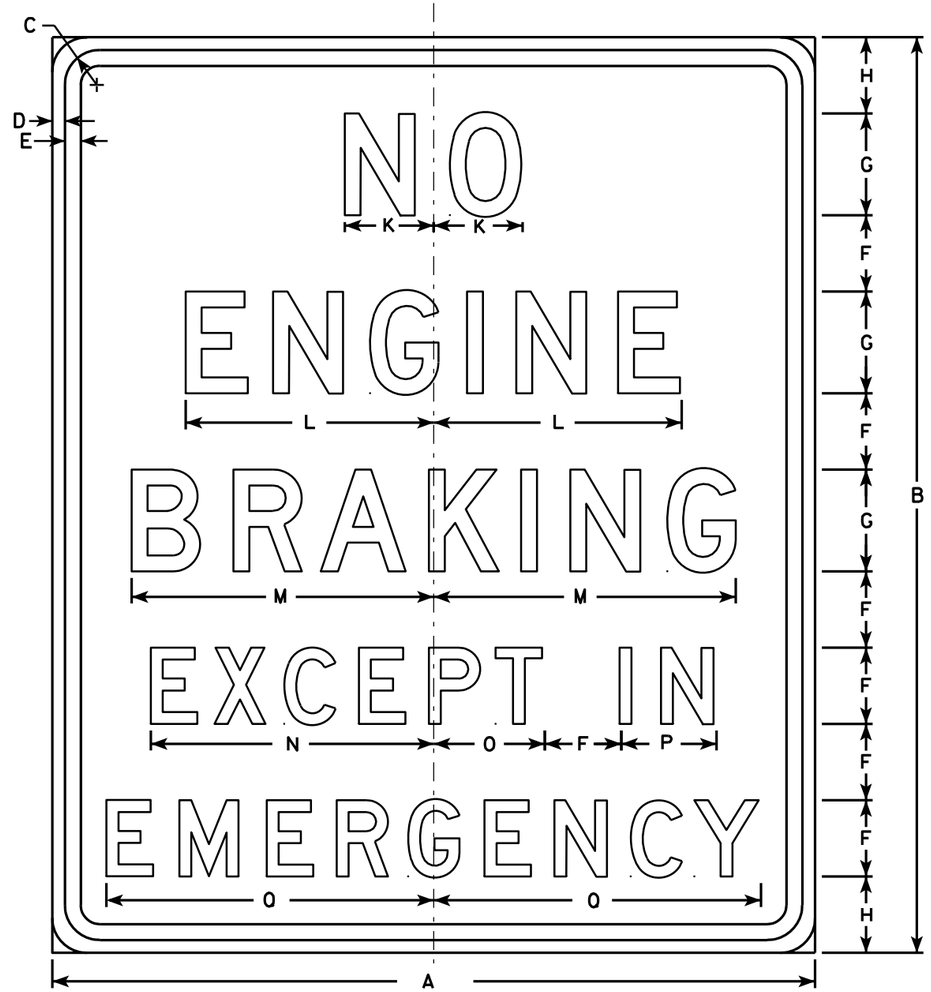
STANDARD SIGN
R7-51

WISCONSIN DEPT OF TRANSPORTATION

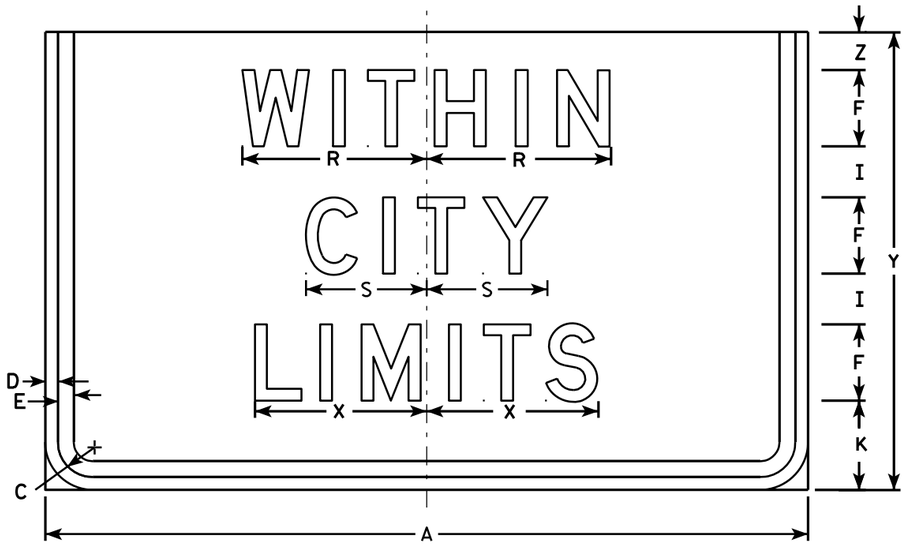
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/31/2011 PLATE NO. R7-51.6

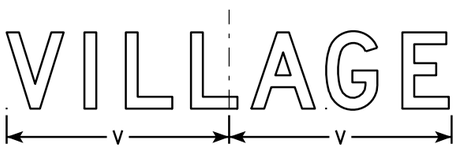
PROJECT NO:	HWY:	COUNTY:			SHEET NO: 247	E



R10-64



R10-64F



Area sq. ft.
3.75
7.0



NOTES

1. Signs are Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - D See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Line 2 of R10-64F is Series C for "TOWNSHIP" Only

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30	36	1 3/8	1/2	5/8	3	4	3	2		3 1/2	9 3/4	11 7/8	11 1/8	4 3/8	3 3/4	12 7/8	7 1/4	4 3/4		8 1/4	8 3/4	5/8	6 3/4	18	1 1/2	7.5
2S	30	36	1 3/8	1/2	5/8	3	4	3	2		3 1/2	9 3/4	11 7/8	11 1/8	4 3/8	3 3/4	12 7/8	7 1/4	4 3/4		8 1/4	8 3/4	5/8	6 3/4	18	1 1/2	7.5
2M	30	36	1 3/8	1/2	5/8	3	4	3	2		3 1/2	9 3/4	11 7/8	11 1/8	4 3/8	3 3/4	12 7/8	7 1/4	4 3/4		8 1/4	8 3/4	5/8	6 3/4	18	1 1/2	7.5
3	42	48	1 3/8	1/2	5/8	4	5	4 1/2	3		4	12 1/4	14 7/8	14 1/8	5 1/4	4 3/4	16 1/4	9	6		11	11 1/4	1 1/2	8 1/2	24	2	14.0
4																											
5																											

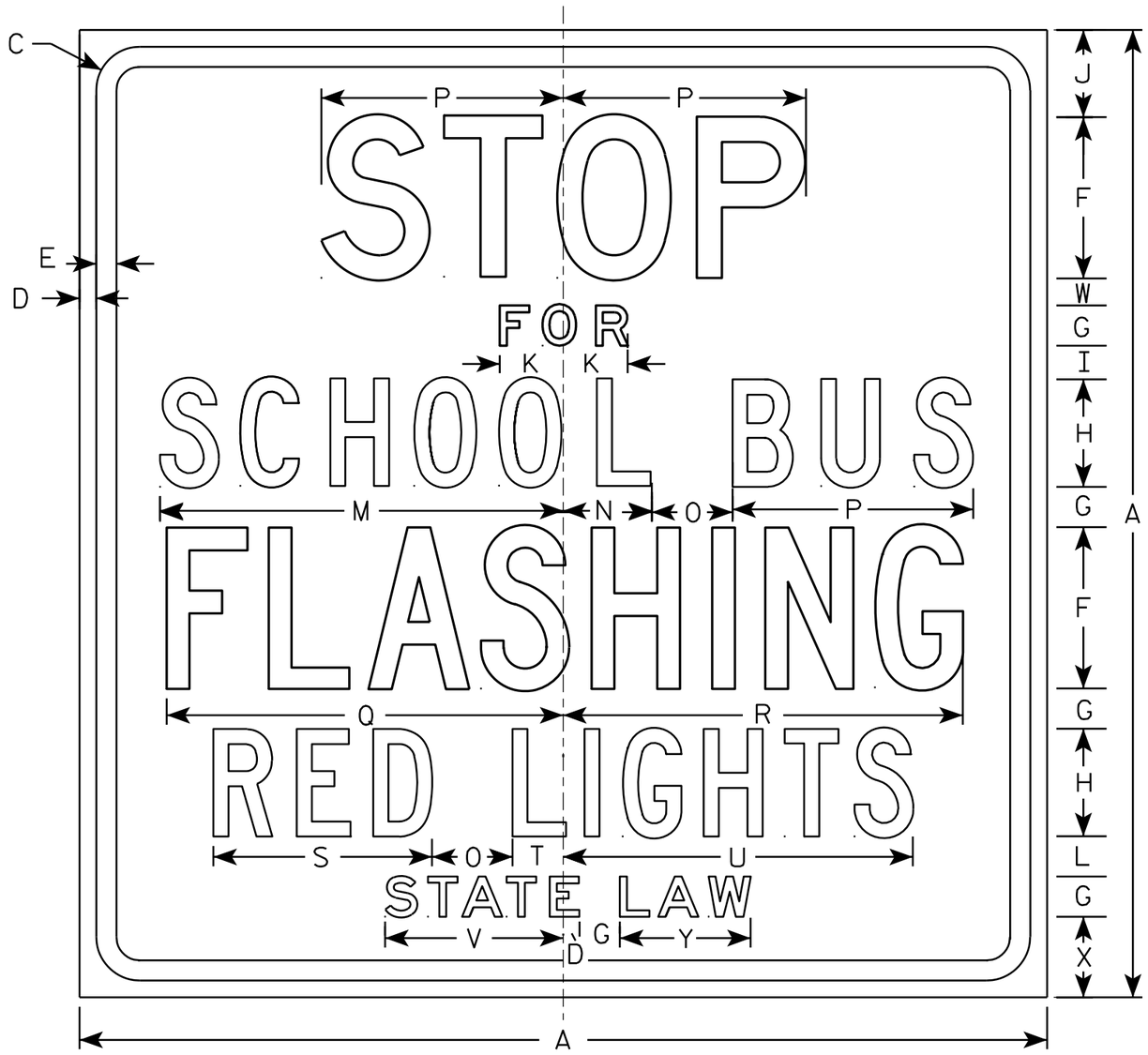
STANDARD SIGN
R10-64 & R10-64F

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 4/4/11 PLATE NO. R10-64.7

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 248	E



R59-51

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Line 1 is Series D
   Lines 2 & 6 are Series E
   Line 3, 4 & 5 are Series C

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	O	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	36		1 5/8	5/8	3/4	6	1 1/2	4	1 1/4	3 1/4	2 3/8	1 1/2	15	3 1/4	3	9	14 3/4	14 7/8	8 1/8	1 7/8	13	6 5/8	1	3	4 7/8		9.0
2M	36		1 5/8	5/8	3/4	6	1 1/2	4	1 1/4	3 1/4	2 3/8	1 1/2	15	3 1/4	3	9	14 3/4	14 7/8	8 1/8	1 7/8	13	6 5/8	1	3	4 7/8		9.0
3	48		2 1/4	3/4	1	8	2	6	1 1/4	4 3/4	3 1/4	1 1/2	20 1/4	5	3 5/8	12	19 1/2	20	11 5/8	3 3/4	19	9 1/2	1	3 1/2	6 3/4		16.0
4	48		2 1/4	3/4	1	8	2	6	1 1/4	4 3/4	3 1/4	1 1/2	20 1/4	5	3 5/8	12	19 1/2	20	11 5/8	3 3/4	19	9 1/2	1	3 1/2	6 3/4		16.0
5																											

STANDARD SIGN
R59-51

WISCONSIN DEPT OF TRANSPORTATION

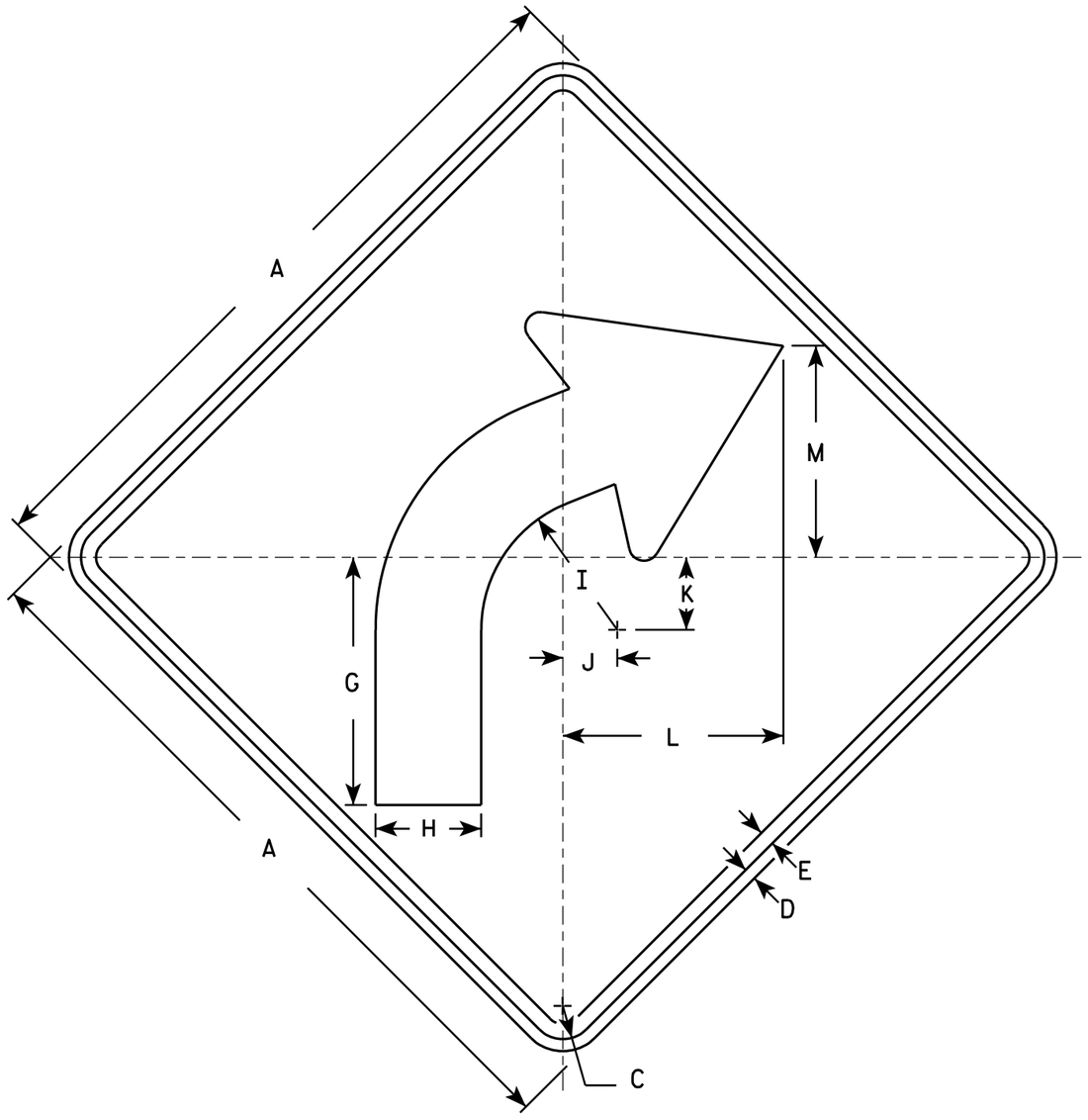
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/30/11 PLATE NO. R59-51.10

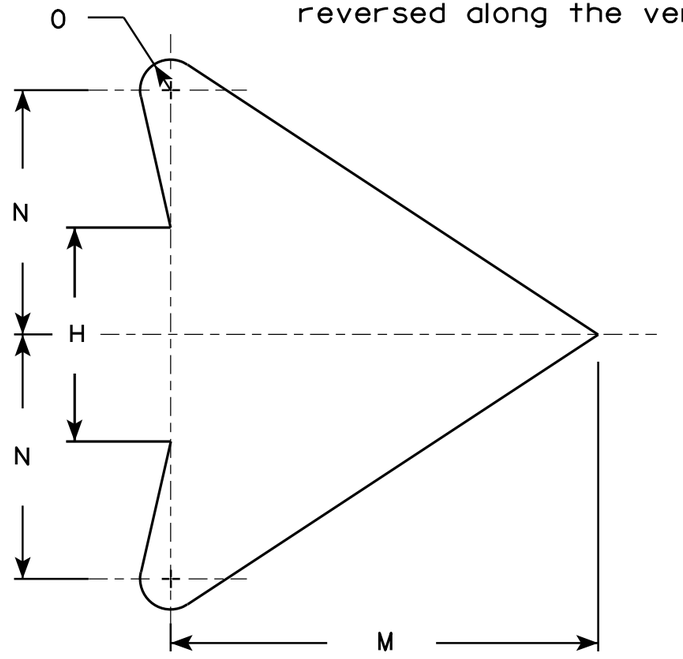
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 249 | E

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. W1-2L is the same as W1-2R except the arrow is reversed along the vertical centerline.



W1-2R



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	24		1 1/8	3/8	1/2		8 1/4	3 1/2	4 1/2	1 3/4	2 3/8	7 1/4	7	4	1/2												4.0
2S	30		1 3/8	1/2	5/8		10 1/4	4 3/8	5 5/8	2 1/4	3	9 1/8	8 3/4	5	5/8												6.25
2M	36		1 5/8	5/8	3/4		12 3/8	5 1/4	6 3/4	2 5/8	3 1/2	10 7/8	10 1/2	6	3/4												9.0
3	36		1 5/8	5/8	3/4		12 3/8	5 1/4	6 3/4	2 5/8	3 1/2	10 7/8	10 1/2	6	3/4												9.0
4	36		1 5/8	5/8	3/4		12 3/8	5 1/4	6 3/4	2 5/8	3 1/2	10 7/8	10 1/2	6	3/4												9.0
5	48		2 1/4	3/4	1		16 1/2	7	9	3 1/2	4 5/8	14 1/2	14	8	1												16.0

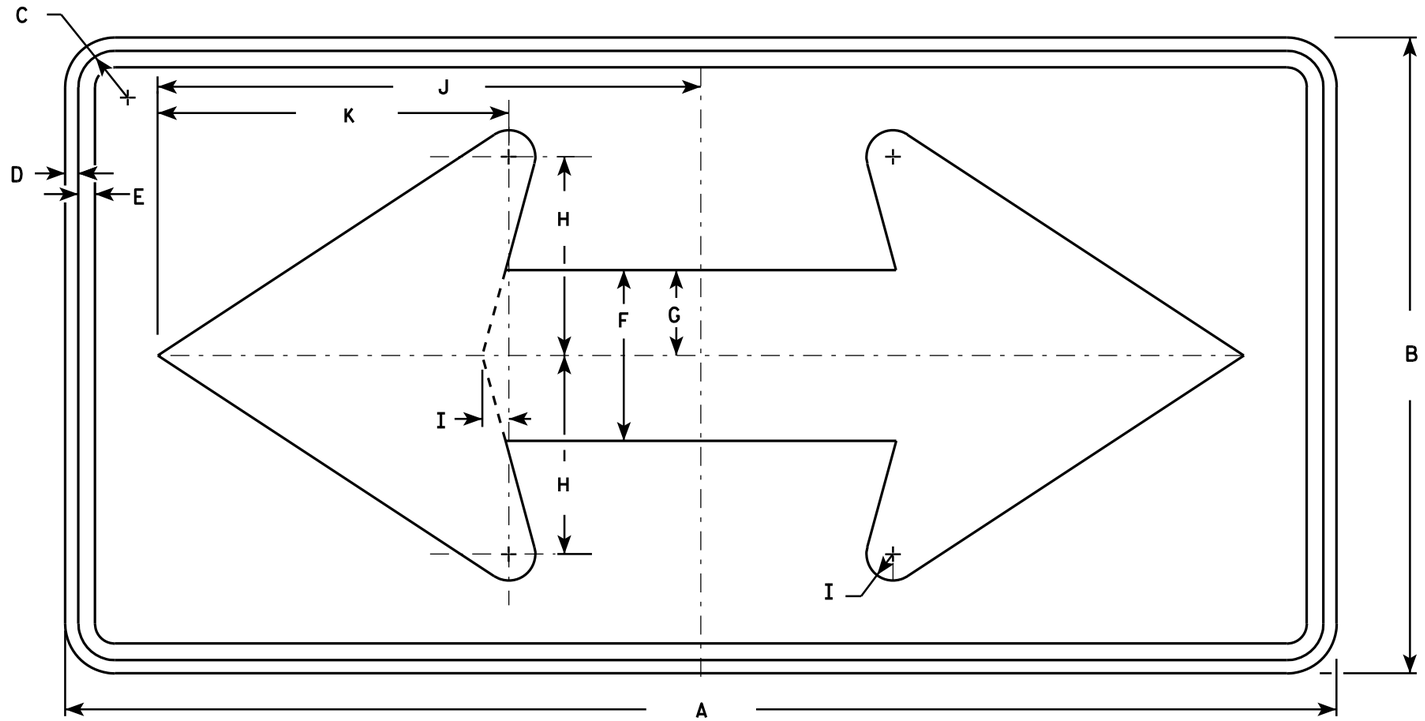
STANDARD SIGN
W1-2

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/15/12 PLATE NO. W1-2.10

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 250	E



W1-7

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36	18	1 1/8	3/8	1/2	5	2 1/2	5 3/4	3/4	15 5/8	10 1/8																4.5
2S	48	24	1 3/8	1/2	5/8	6 1/2	3 1/4	7 1/2	1	20 1/2	13 1/4																8.0
2M	48	24	1 3/8	1/2	5/8	6 1/2	3 1/4	7 1/2	1	20 1/2	13 1/4																8.0
3	60	30	1 3/8	1/2	5/8	8	4	9 1/4	1 1/4	25 3/8	16 1/4																12.5
4	60	30	1 3/8	1/2	5/8	8	4	9 1/4	1 1/4	25 3/8	16 1/4																12.5
5	96	48	2 1/4	3/4	1	13	6 1/2	15	2	41	26 1/2																32.0

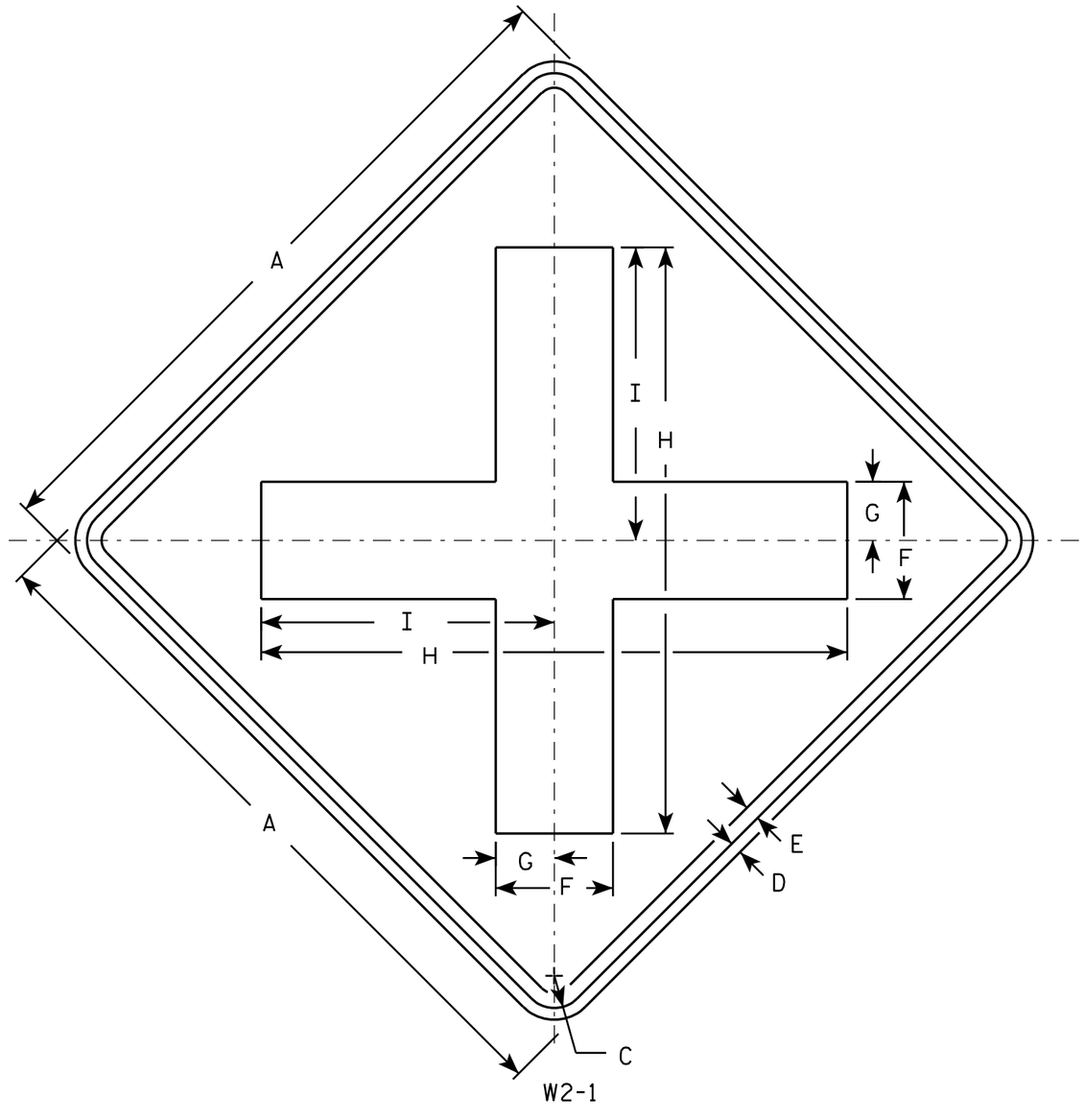
STANDARD SIGN
W1-7

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 6/7/10 PLATE NO. W1-7.7

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 251 | E



NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	24		1 1/8	3/8	1/2	4	2	20	10																		4.0
2S	30		1 3/8	1/2	5/8	5	2 1/2	25	12 1/2																		6.25
2M	30		1 3/8	1/2	5/8	5	2 1/2	25	12 1/2																		6.25
3	36		1 5/8	5/8	3/4	6	3	30	15																		9.0
4	48		2 1/4	3/4	1	8	4	40	20																		16.0
5																											

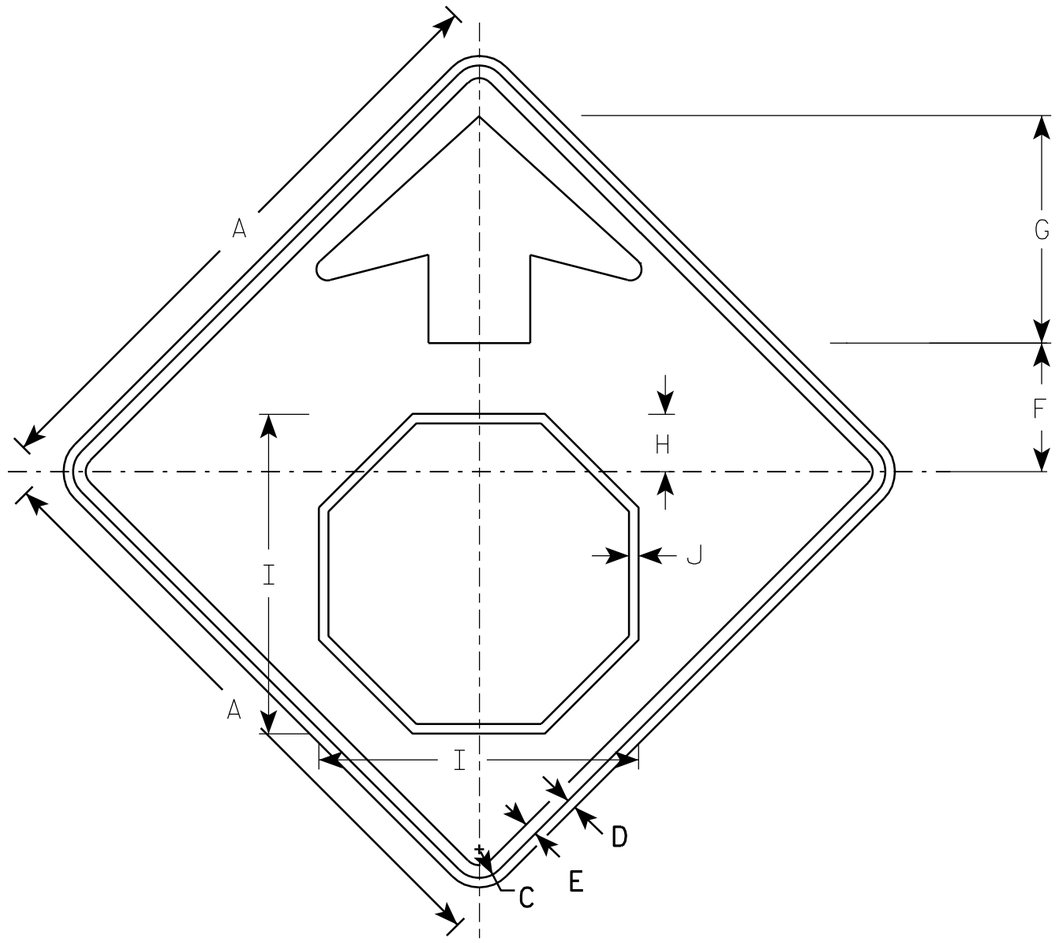
STANDARD SIGN
W2-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/29/12 PLATE NO. W2-1.9

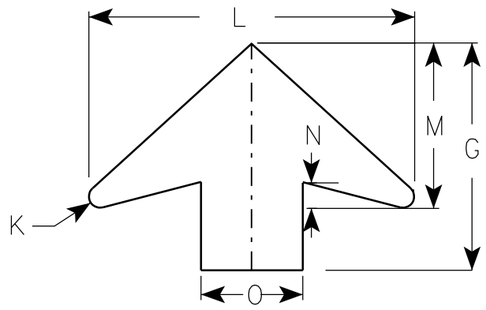
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 252	E



W3-1

NOTES

1. All Signs Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - YELLOW
   Arrow & Border - BLACK
   Stop Symbol - WHITE BORDER ON RED BACKGROUND



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8	6 1/4	11 1/4	2 7/8	15 3/4	1/2	1/2	16	8	1 1/4	5												6.25
2S	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 1/2	19	5/8	5/8	19 1/4	9 3/4	1 5/8	6												9.0
2M	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 1/2	19	5/8	5/8	19 1/4	9 3/4	1 5/8	6												9.0
3	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 1/2	19	5/8	5/8	19 1/4	9 3/4	1 5/8	6												9.0
4	48		2 1/4	3/4	1	10	17 7/8	4 1/2	25 1/8	3/4	7/8	25 5/8	13	2	8												16.0
5	48		2 1/4	3/4	1	10	17 7/8	4 1/2	25 1/8	3/4	7/8	25 5/8	13	2	8												16.0

STANDARD SIGN
W3-1

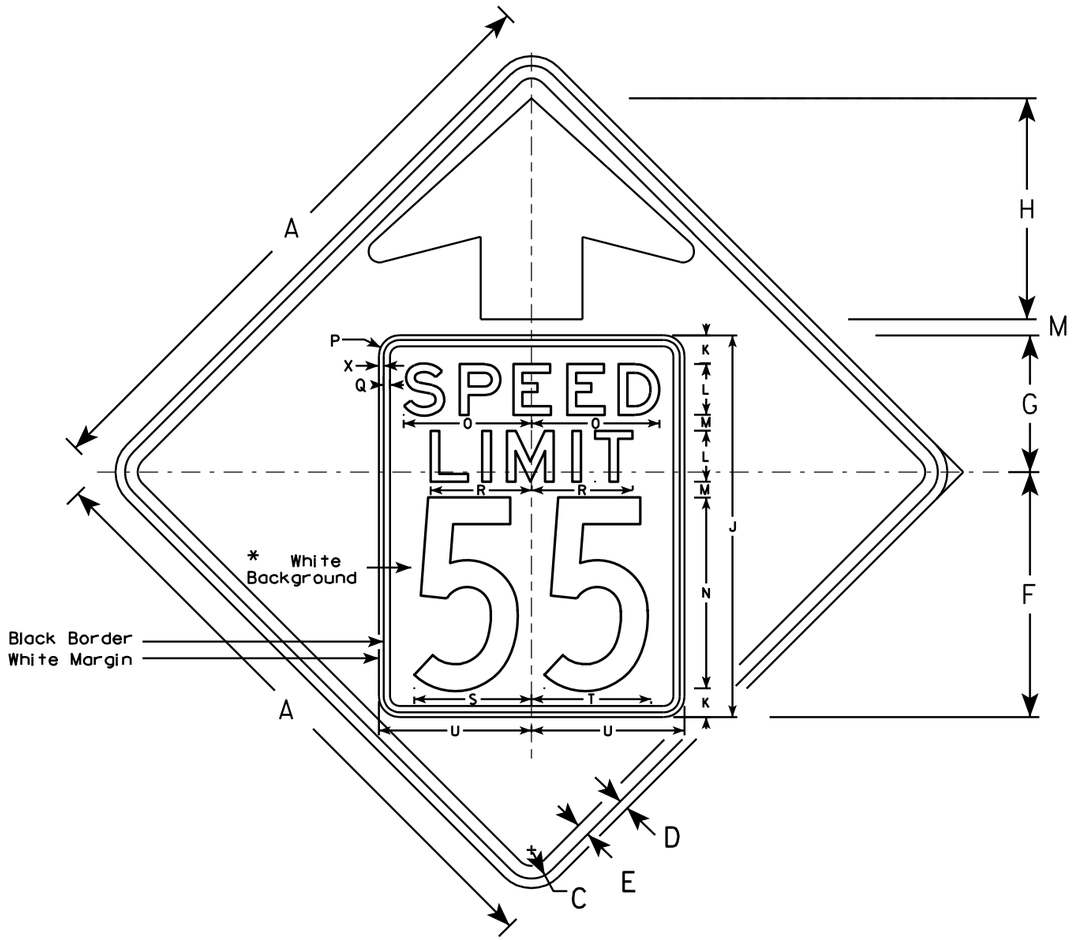
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 6/7/10 PLATE NO. W3-1.12

PROJECT NO:

SHEET NO: 253 E

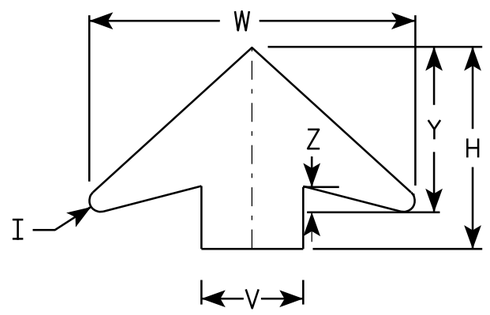


W3-5

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color: *
   Background - YELLOW*
   Message - BLACK
3. Message Series - C for numbers Series E for wording
4. Substitute appropriate numerals and optically adjust spacing to achieve proper balance

*Speed Limit Sign shall have a White Background



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	36		1 5/8	5/8	3/4	14 1/2	9 1/2	11 1/2	5/8	24	2	3	1	12	7 1/8	1 1/2	3/8	5 3/4	7 1/4	7 1/8	9	6	19 1/4	3/8	9 3/4	1 5/8	9.0
2M	36		1 5/8	5/8	3/4	14 1/2	9 1/2	11 1/2	5/8	24	2	3	1	12	7 1/8	1 1/2	3/8	5 3/4	7 1/4	7 1/8	9	6	19 1/4	3/8	9 3/4	1 5/8	9.0
3	36		1 5/8	5/8	3/4	14 1/2	9 1/2	11 1/2	5/8	24	2	3	1	12	7 1/8	1 1/2	3/8	5 3/4	7 1/4	7 1/8	9	6	19 1/4	3/8	9 3/4	1 5/8	9.0
4	48		2 1/4	3/4	1	19 1/4	10 3/4	17 3/8	7/8	30	2 1/4	4	1 1/4	15	10	1 5/8	1/2	8	9 1/4	9 3/8	12	8	25 5/8	3/8	13	2	16.0
5	48		2 1/4	3/4	1	19 1/4	10 3/4	17 3/8	7/8	30	2 1/4	4	1 1/4	15	10	1 5/8	1/2	8	9 1/4	9 3/8	12	8	25 5/8	3/8	13	2	16.0

STANDARD SIGN
W3-5

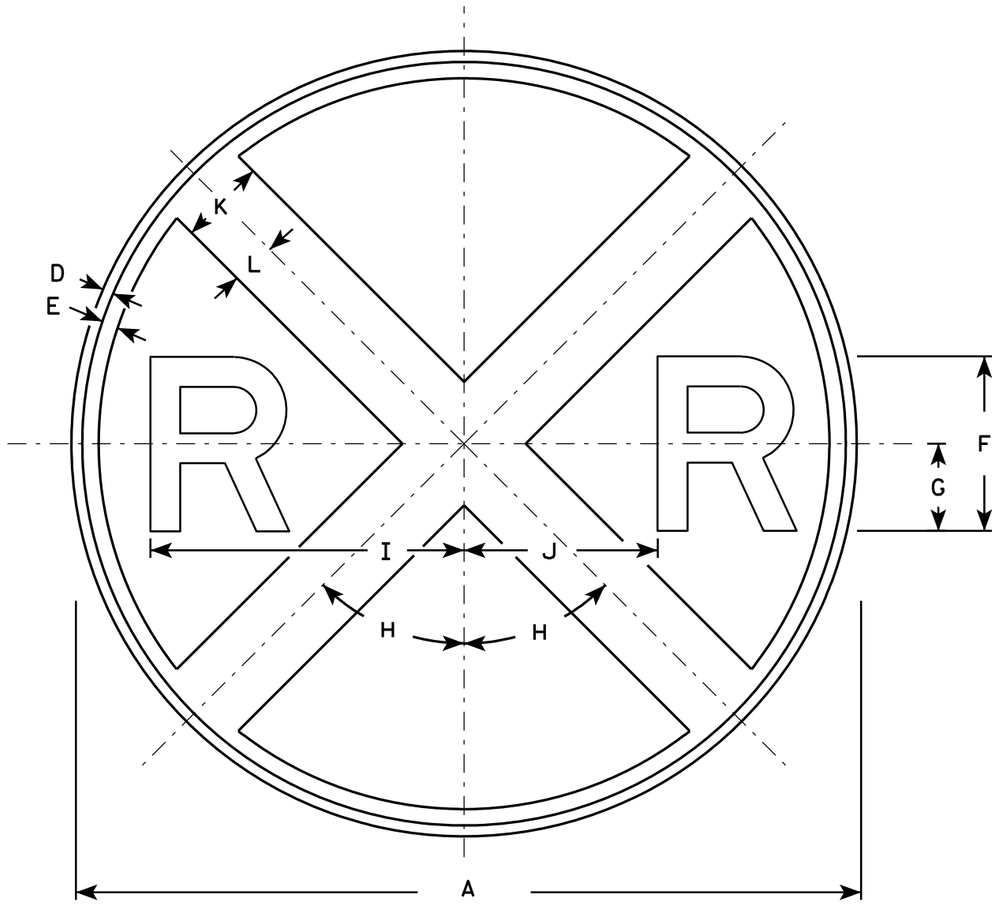
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/29/12 PLATE NO. W3-5.5

PROJECT NO:

SHEET NO: 254 E



W10-1

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Message Series - E

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30			3/8	5/8	7	3 1/2	45°	12 3/8	7 1/8	3	1 1/2															4.91
2S	36			5/8	3/4	8	4	45°	14 3/8	8 5/8	4	2															7.07
2M	36			5/8	3/4	8	4	45°	14 3/8	8 5/8	4	2															7.07
3																											
4	48			3/4	1 1/4	10	5	45°	18 3/8	11 5/8	5	2 1/2															12.57
5																											

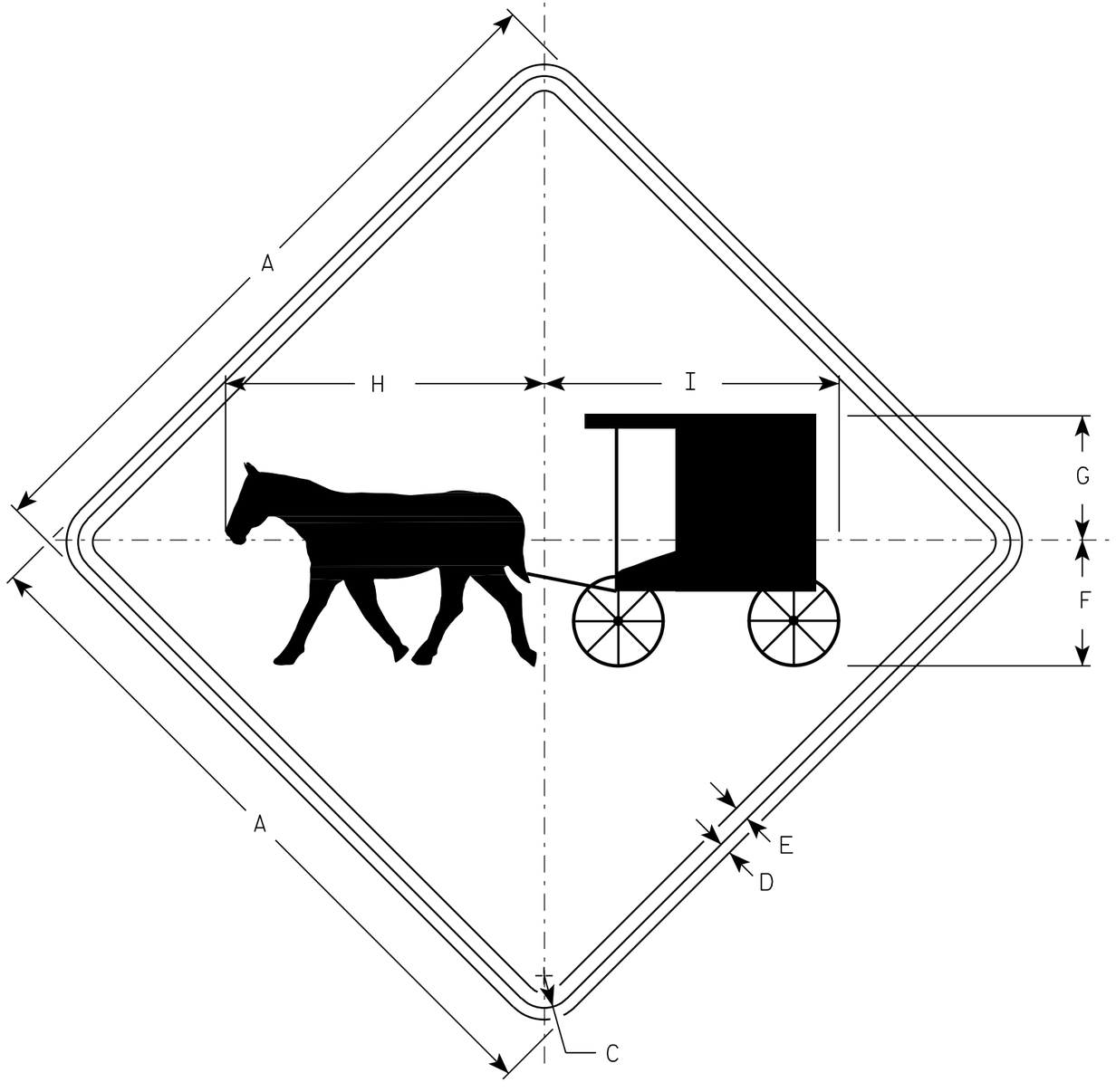
STANDARD SIGN
W10-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

DATE 3/13/13 PLATE NO. W10-1.8

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 255	E



W11-12

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

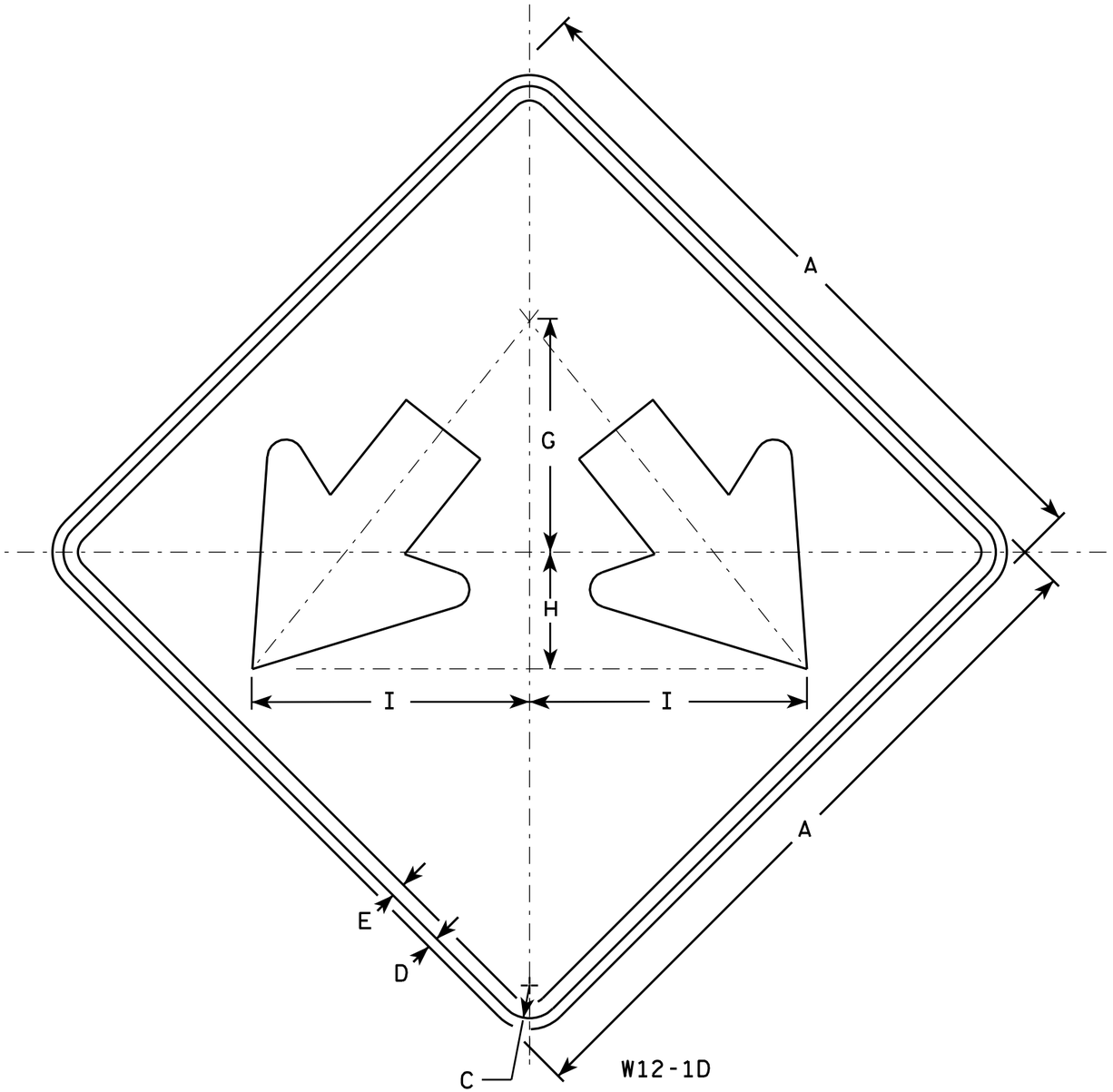
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8	5 3/8	5 1/4	13 5/8	12 5/8																		6.25
2S	36		1 5/8	5/8	3/4	6 1/2	6 3/8	16 3/8	15 1/8																		9.0
2M	36		1 5/8	5/8	3/4	6 1/2	6 3/8	16 3/8	15 1/8																		9.0
3	48		2 1/4	3/4	1	8 5/8	8 1/2	21 7/8	20 1/8																		16.0
4																											
5																											

STANDARD SIGN
W11-12

WISCONSIN DEPT OF TRANSPORTATION

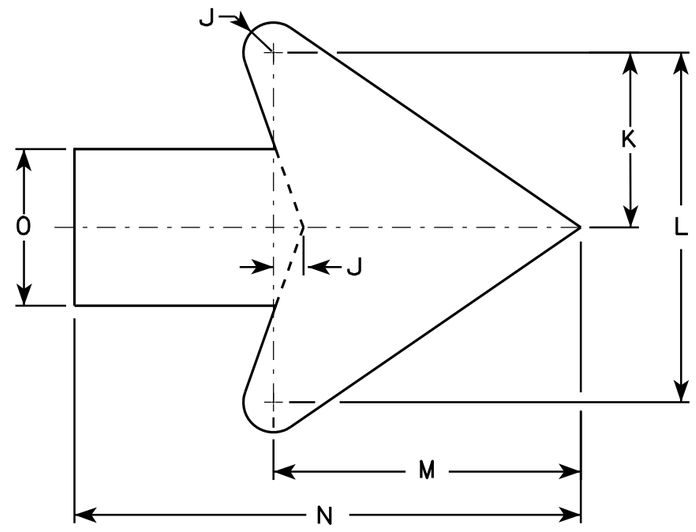
APPROVED Matthew R Rauch
for State Traffic Engineer
DATE 3/13/13 PLATE NO. W11-12.4

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 256	E



NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.



Arrow Detail

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	24		1 1/8	1/2	3/8		8	4	9 1/2	3/8	3 3/8	7 1/4	6 3/8	10 3/8	3 1/4												4.0
2M	24		1 1/8	1/2	3/8		8	4	9 1/2	3/8	3 3/8	7 1/4	6 3/8	10 3/8	3 1/4												4.0
3	30		1 3/8	1/2	5/8		10	5	11 7/8	3/4	4 1/2	9	7 7/8	13	4												6.25
4	36		1 3/8	1/2	5/8		12	6	14 1/4	1	5 1/2	10 7/8	9 5/8	15 3/4	4 3/4												9.0
5	48		2 1/4	3/4	1		16	8	19	1 1/4	7 1/4	14 1/2	12 3/4	21	6 1/4												16.0

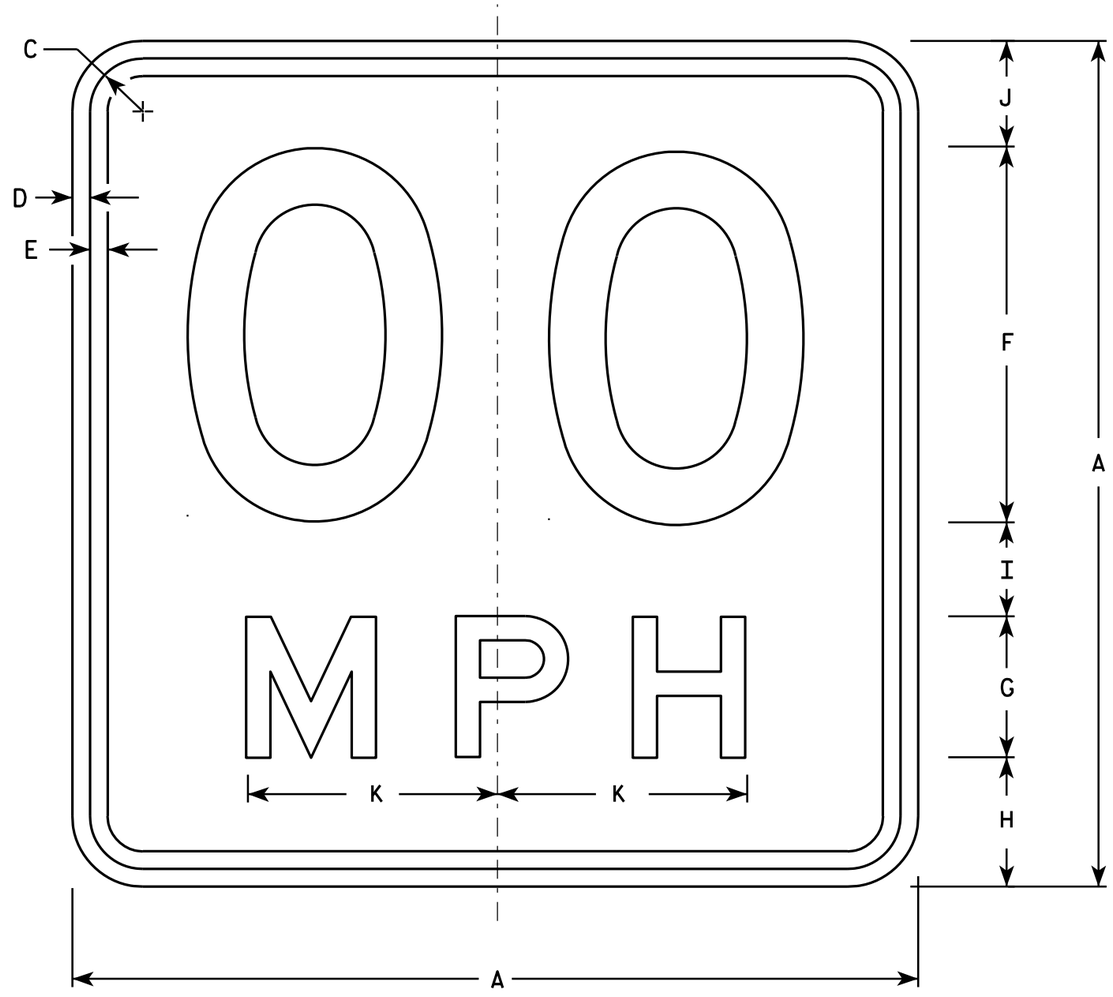
STANDARD SIGN
W12-1D

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/13/13 PLATE NO. W12-1D.15

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 257	E



W13-1

* For 30" x 30" Warning Signs, use 18" x 18" W13-1 signs.
For 36" x 36" Warning Signs, use 24" x 24" W13-1 signs.

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Message Series - See Note 6
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and optically space about centerline to achieve proper balance.
6. Line 1 is Series D
   Line 2 is Series E

	SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
	1	18		1 1/8	3/8	3/8	8	3	2 3/4	2	2 1/4	5 3/8																2.25
*	2S	18		1 1/8	3/8	3/8	8	3	2 3/4	2	2 1/4	5 3/8																2.25
*	2M	18		1 1/8	3/8	3/8	8	3	2 3/4	2	2 1/4	5 3/8																2.25
	3	24		1 1/8	3/8	1/2	10	4	4	2 3/4	3 1/4	6 5/8																4.00
	4	36		1 5/8	5/8	3/4	16	6	5 1/2	4	4 1/2	10 5/8																9.00
	5	36		1 5/8	5/8	3/4	16	6	5 1/2	4	4 1/2	10 5/8																9.00

STANDARD SIGN
W13-1

WISCONSIN DEPT OF TRANSPORTATION

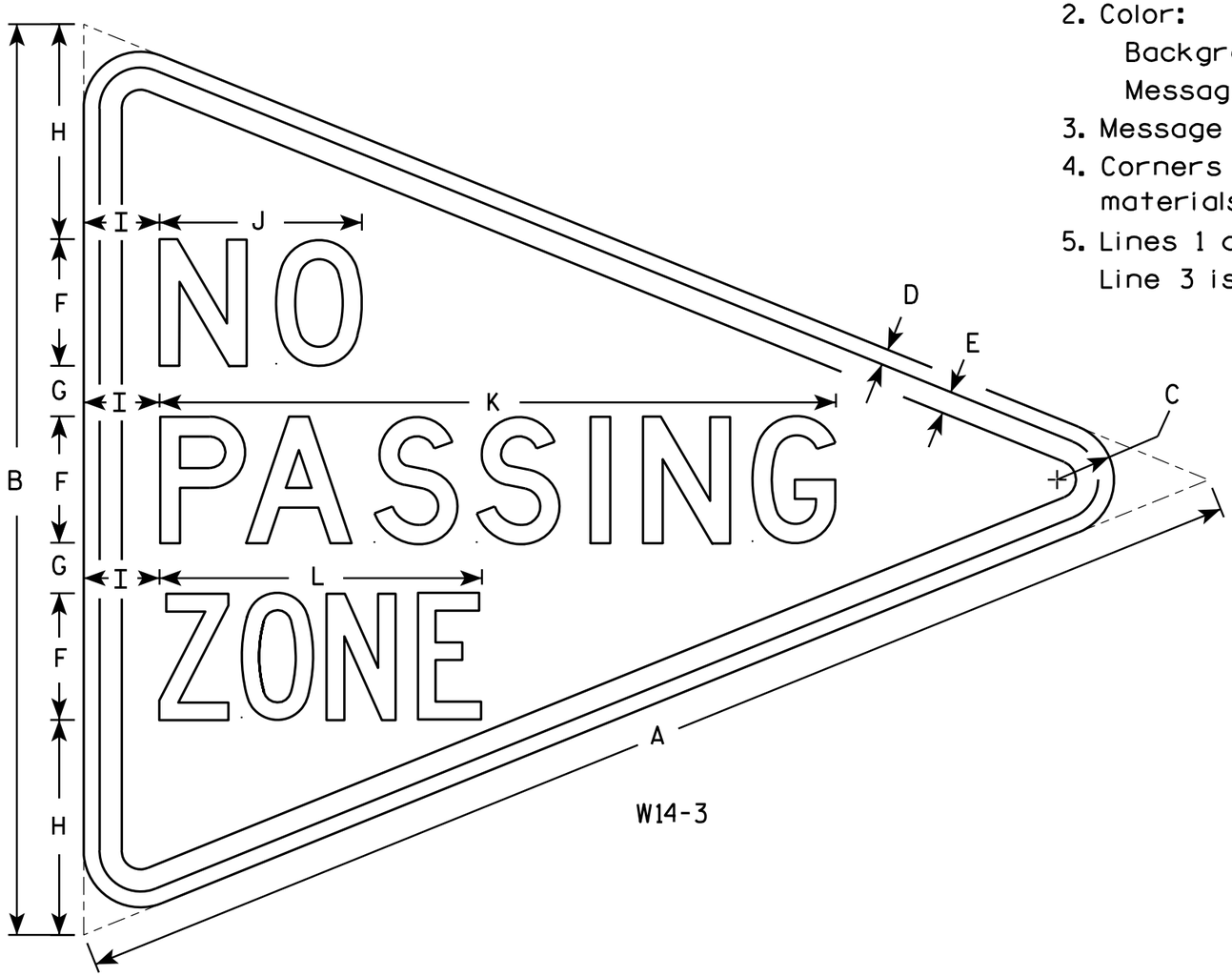
APPROVED Matthew R Rauch
For State Traffic Engineer

DATE 5/31/12 PLATE NO. W13-1.16

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 258 | E

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Message Series - See note 5
4. Corners and borders shall be rounded on all base materials for this sign.
5. Lines 1 and 2 are Series D.
   Line 3 is series C.



W14-3

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	48	36	2 1/4	5/8	7/8	5	2	8 1/2	3	8	26 3/4	12 3/4															6.0
2M	48	36	2 1/4	5/8	7/8	5	2	8 1/2	3	8	26 3/4	12 3/4															6.0
3	64	48	3	3/4	1 1/4	6	3	12	4	10 3/4	33 5/8	16 1/2															10.7
4																											
5																											

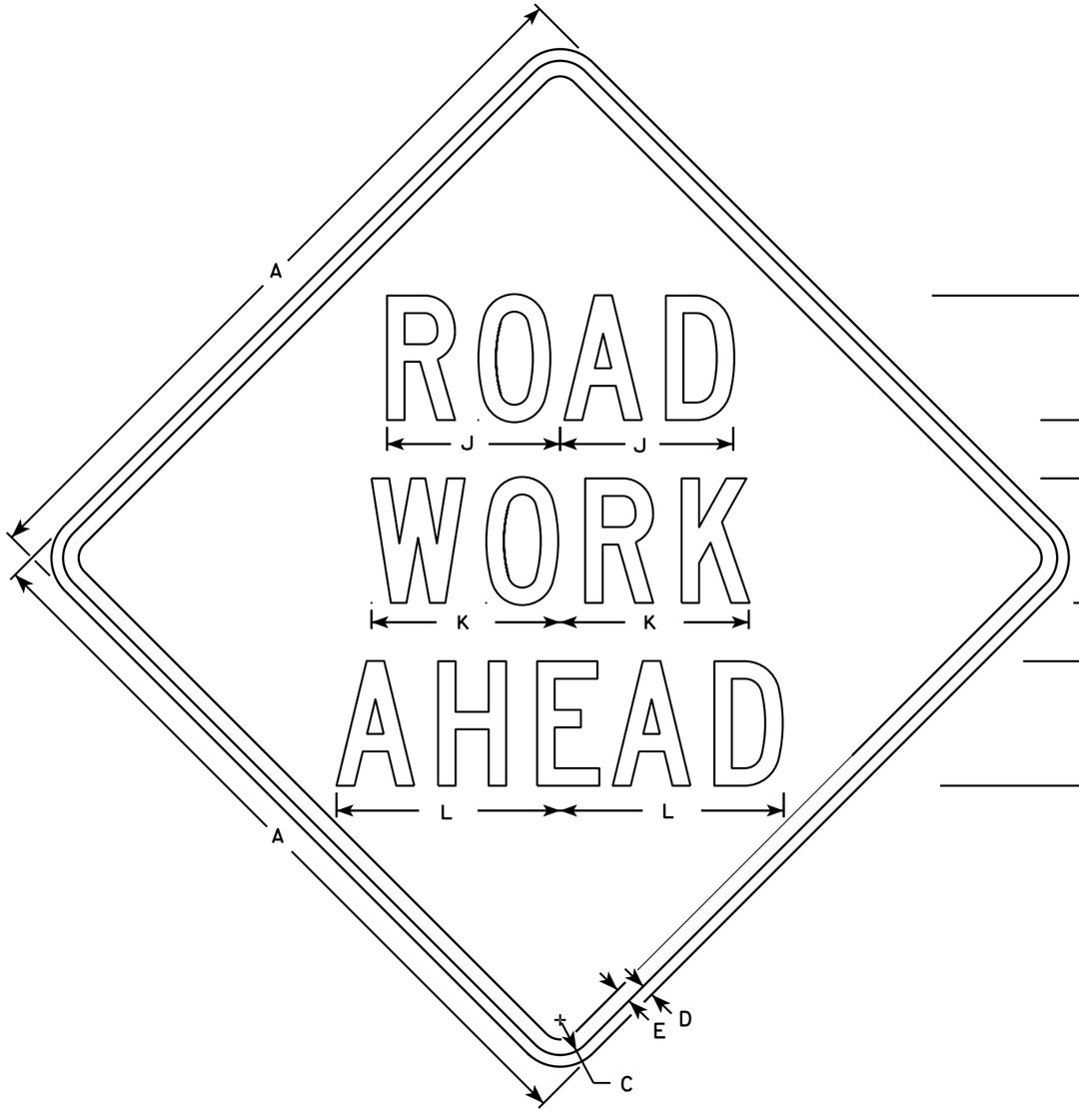
STANDARD SIGN
W14-3

WISCONSIN DEPT OF TRANSPORTATION

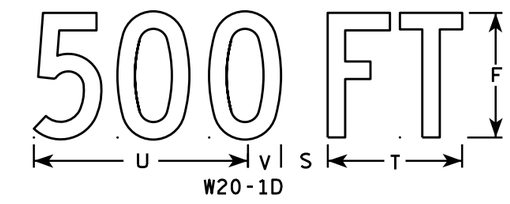
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 6/7/10 PLATE NO. W14-3.9

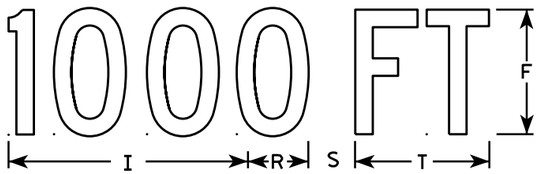
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 259	E



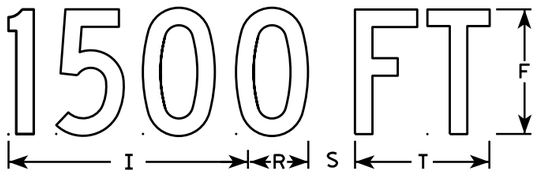
W20-1A



W20-1D



W20-1C



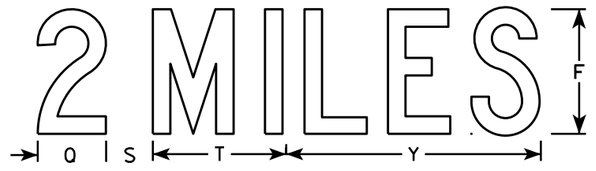
W20-1B



W20-1G



W20-1F



W20-1E

NOTES

1. Sign is Type II - Type F Reflective
2. Color:
   Background - Orange
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36		1 3/8	1/2	5/8	5	2 5/8	3 1/4	10 1/8	7	7 5/8	8 7/8	1 1/8	4 1/2	3 1/2	9		2 1/2	2 1/4	5 5/8	9	1 3/8	8	1 3/4	10 3/4	6	9.0
2S	48		2 1/4	3/4	1	8	3 3/4	5 1/8	15 3/8	11 1/8	12 1/8	14 3/8	1 5/8	6 7/8	5 3/8	13 7/8	4 3/8	3 7/8	3	8 5/8	13 3/4	2 1/8	11 7/8	2 3/4	16 3/8	9	16.0
2M	48		2 1/4	3/4	1	8	3 3/4	5 1/8	15 3/8	11 1/8	12 1/8	14 3/8	1 5/8	6 7/8	5 3/8	13 7/8	4 3/8	3 7/8	3	8 5/8	13 3/4	2 1/8	11 7/8	2 3/4	16 3/8	9	16.0
3	48		2 1/4	3/4	1	8	3 3/4	5 1/8	15 3/8	11 1/8	12 1/8	14 3/8	1 5/8	6 7/8	5 3/8	13 7/8	4 3/8	3 7/8	3	8 5/8	13 3/4	2 1/8	11 7/8	2 3/4	16 3/8	9	16.0
4	48		2 1/4	3/4	1	8	3 3/4	5 1/8	15 3/8	11 1/8	12 1/8	14 3/8	1 5/8	6 7/8	5 3/8	13 7/8	4 3/8	3 7/8	3	8 5/8	13 3/4	2 1/8	11 7/8	2 3/4	16 3/8	9	16.0
5	48		2 1/4	3/4	1	8	3 3/4	5 1/8	15 3/8	11 1/8	12 1/8	14 3/8	1 5/8	6 7/8	5 3/8	13 7/8	4 3/8	3 7/8	3	8 5/8	13 3/4	2 1/8	11 7/8	2 3/4	16 3/8	9	16.0

STANDARD SIGN
W20-1A, B, C, D, F & G

WISCONSIN DEPT OF TRANSPORTATION

APPROVED

State Traffic Engineer

DATE 5/07/15 PLATE NO. W20-1.10

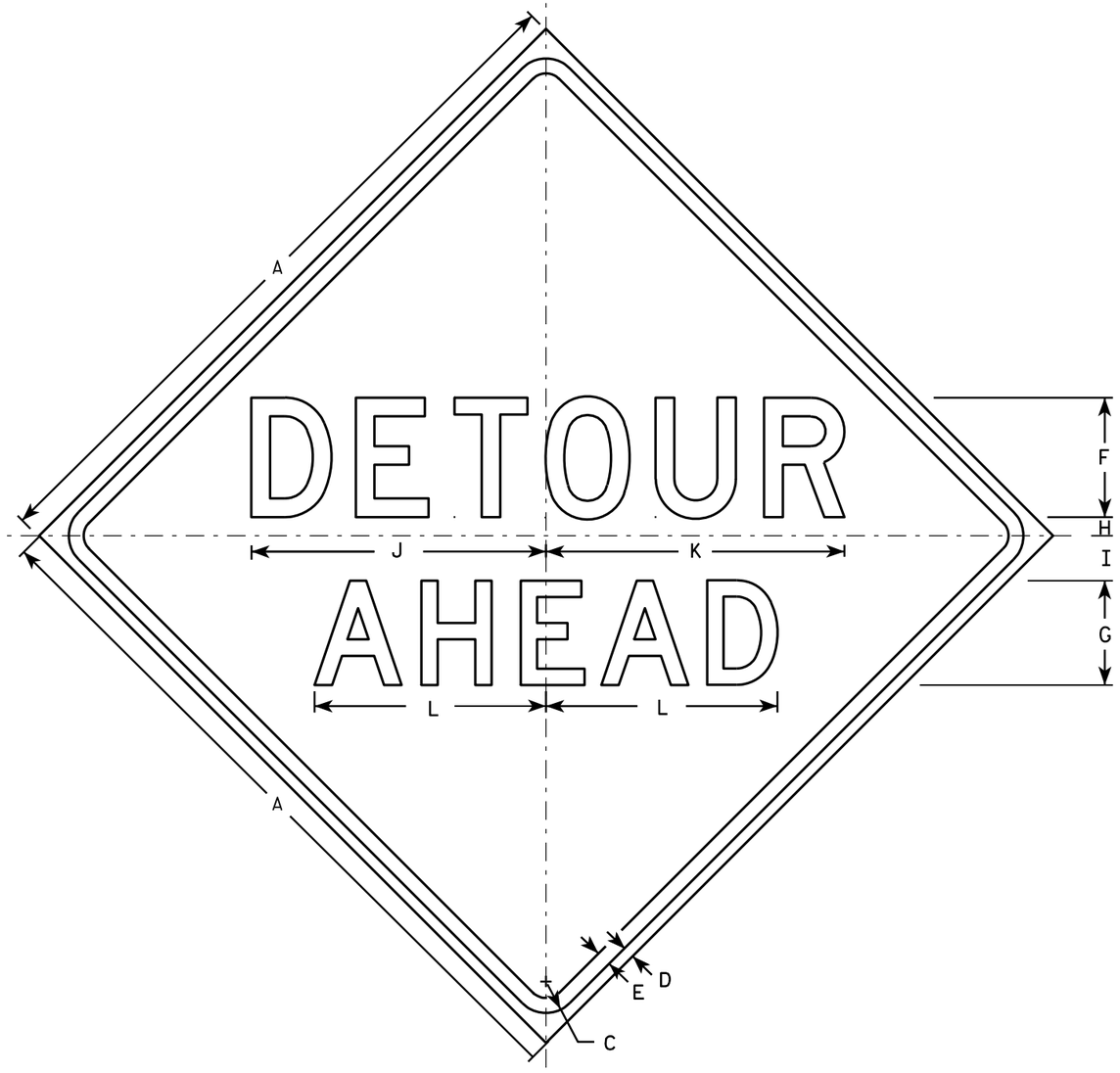
PROJECT NO:

SHEET NO: E

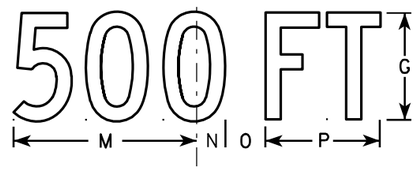
7

FILE NAME : C:\CAEFiles\Projects\tr_stdplate\W201.dgn PLOT DATE : 27-MAY-2015 15:58 PLOT BY : mscsja

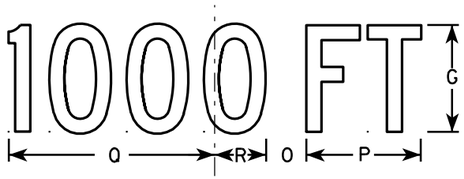
WISDOT/CADDS SHEET 42



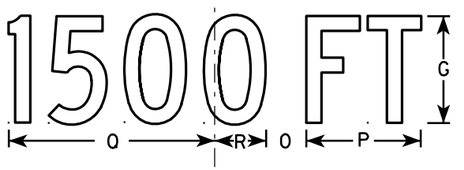
W20-2A



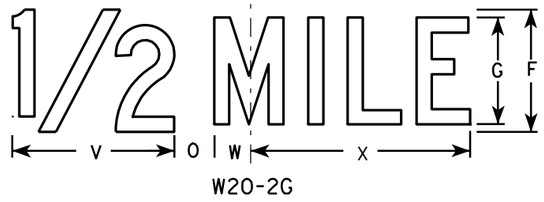
W20-2D



W20-2C



W20-2B



W20-2G



W20-2F

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Line 1 is Series D.
   Line 2 is Series D for AHEAD and Series C for all other distances.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	O	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36		1 5/8	5/8	3/4	6	5	1	2 1/4	14 3/4	15	11 5/8	9	1 3/8	1 7/8	5 5/8	10 1/8	2 1/2	1 1/8	4 1/2	3 1/2	8	1 3/4	10 3/4			9.0
2S	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
2M	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
3	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
4	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
5	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0

STANDARD SIGN
W20-2A,B,C,D,F & G

WISCONSIN DEPT OF TRANSPORTATION

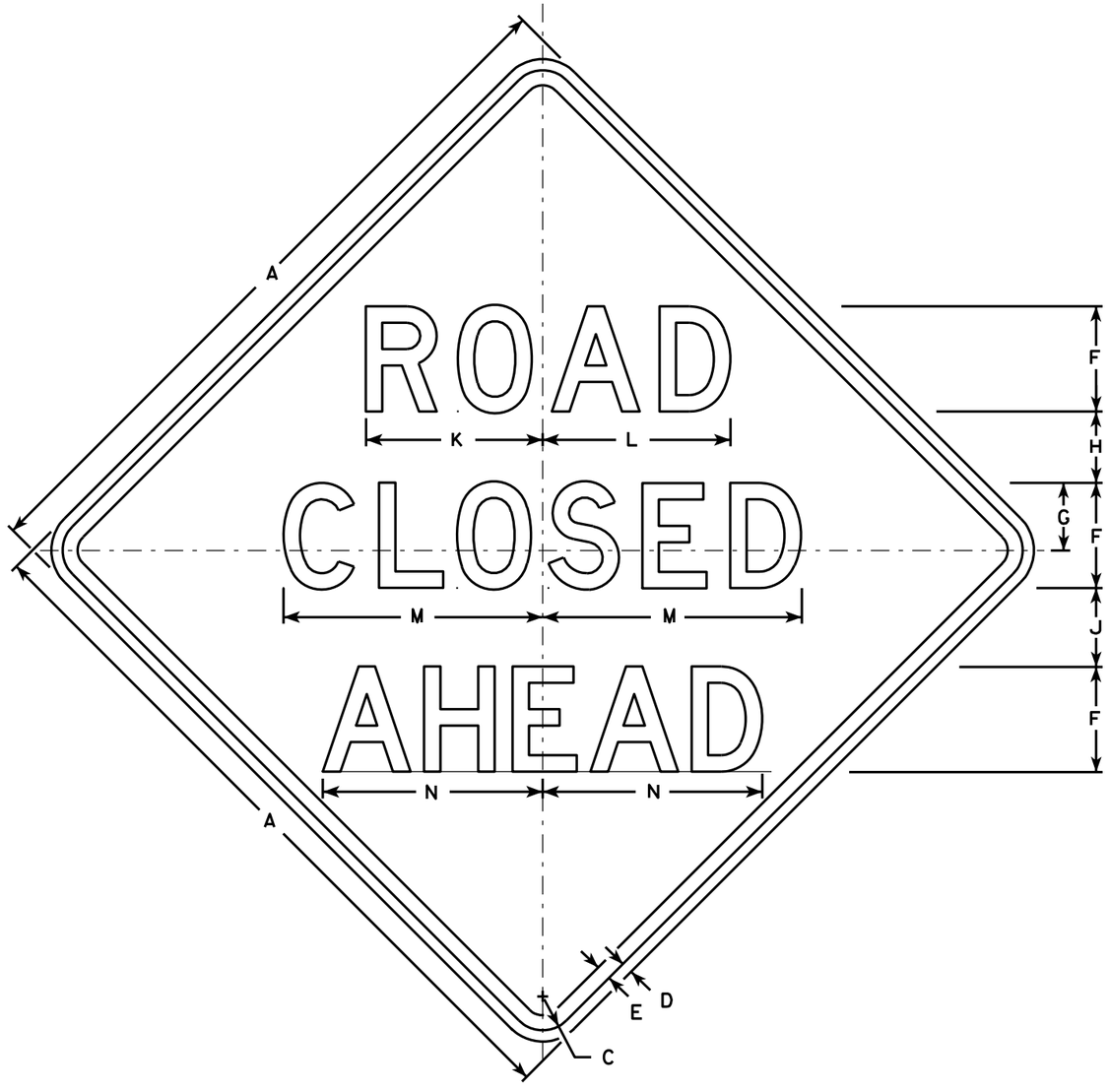
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/18/11 PLATE NO. W20-2.6

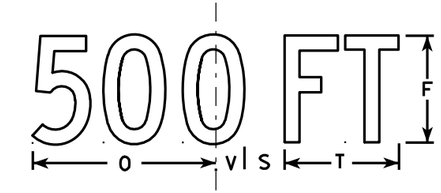
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 261 | E

7

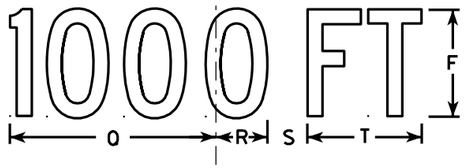
FILE NAME : C:\Users\PROJECTS\tr_stdplate\W202.DGN PLOT DATE : 18-MAR-2011 10:00 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : 9.931739:1.000000
WISDOT/CADDS SHEET 42



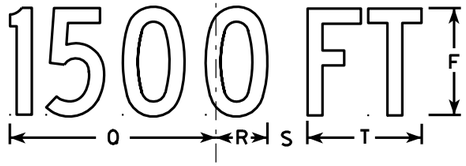
W20-3A



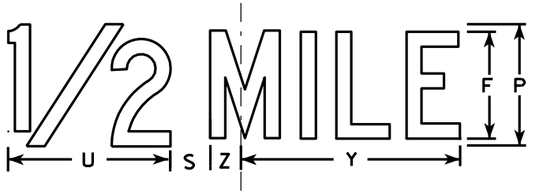
W20-3D



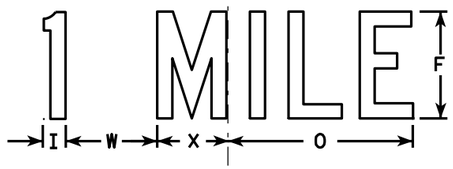
W20-3C



W20-3B



W20-3G



W20-3F

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - see note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Lines 1 and 2 are Series D.
   Line 3 is Series D for AHEAD and Series C for all other distances.

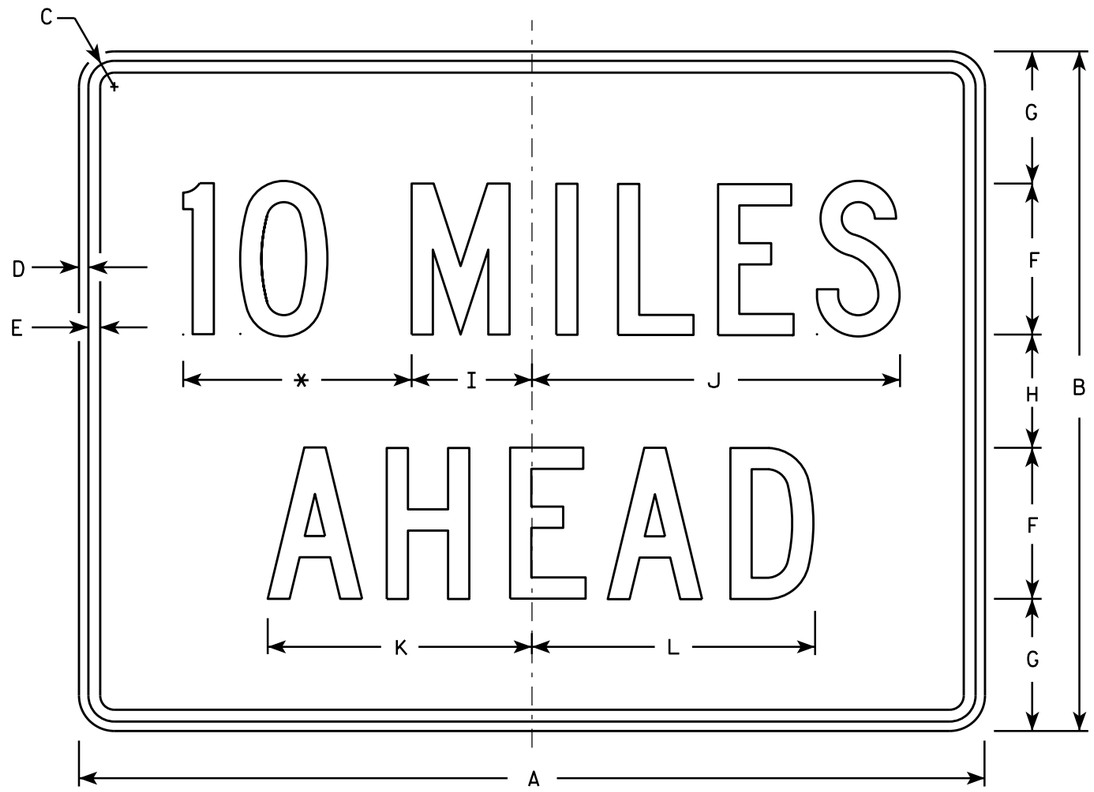
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36		1 5/8	5/8	3/4	5	3 3/8	3 1/2	1 1/8	4	8 3/8	8 7/8	12 1/2	11	9	6	10 1/8	2 1/2	1 7/8	5 5/8	8	1 3/8	4 1/2	3 1/2	10 3/4	1 3/4	9.0
2S	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
2M	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
3	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
4	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
5	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0

STANDARD SIGN
W20-3A, B, C, D, F & G

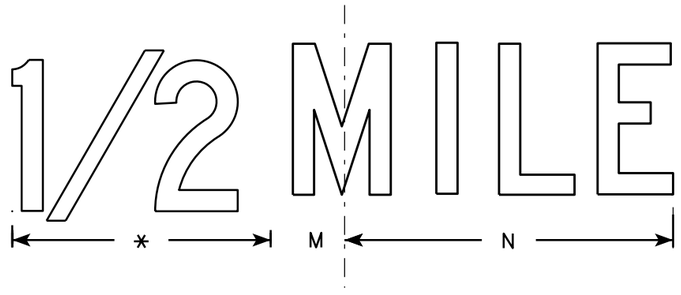
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer
DATE 3/18/11 PLATE NO. W20-3.7

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 262 | E



W057-52



NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and optically adjust spacing to achieve proper balance.

* See note 5

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36	24	1 1/8	3/8	1/2	6	4 1/2	3	4 3/4	14 5/8	10 5/8	11 3/8	2	13													6.0
2S	48	36	1 3/8	1/2	5/8	8	7	6	6 3/8	19 1/2	14	15	2 3/4	17 3/8													12.0
2M	48	36	1 3/8	1/2	5/8	8	7	6	6 3/8	19 1/2	14	15	2 3/4	17 3/8													12.0
3	48	36	1 3/8	1/2	5/8	8	7	6	6 3/8	19 1/2	14	15	2 3/4	17 3/8													12.0
4	48	36	1 3/8	1/2	5/8	8	7	6	6 3/8	19 1/2	14	15	2 3/4	17 3/8													12.0
5	48	36	1 3/8	1/2	5/8	8	7	6	6 3/8	19 1/2	14	15	2 3/4	17 3/8													12.0

STANDARD SIGN
W057-52

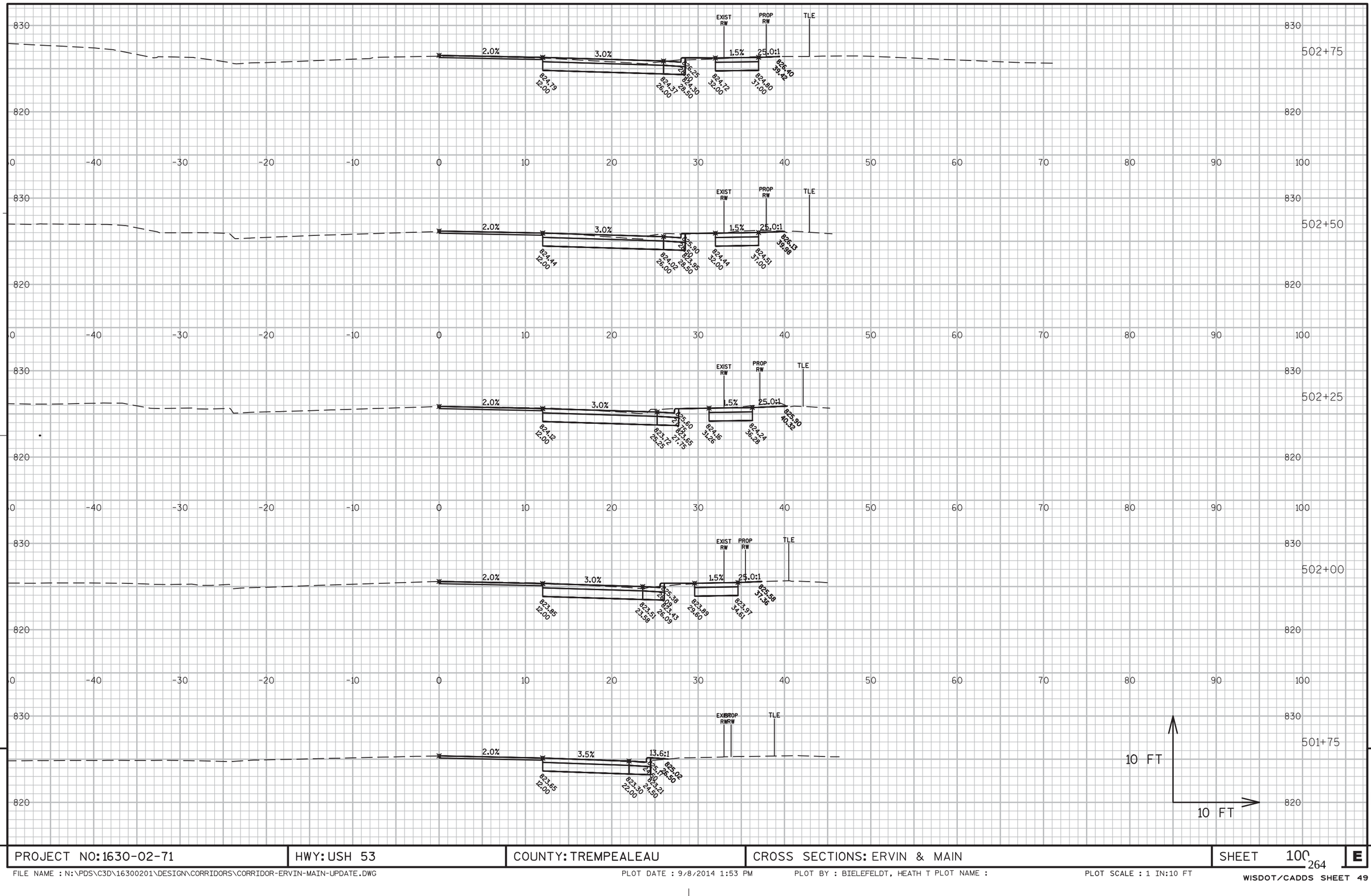
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/20/13 PLATE W057-52.1

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E

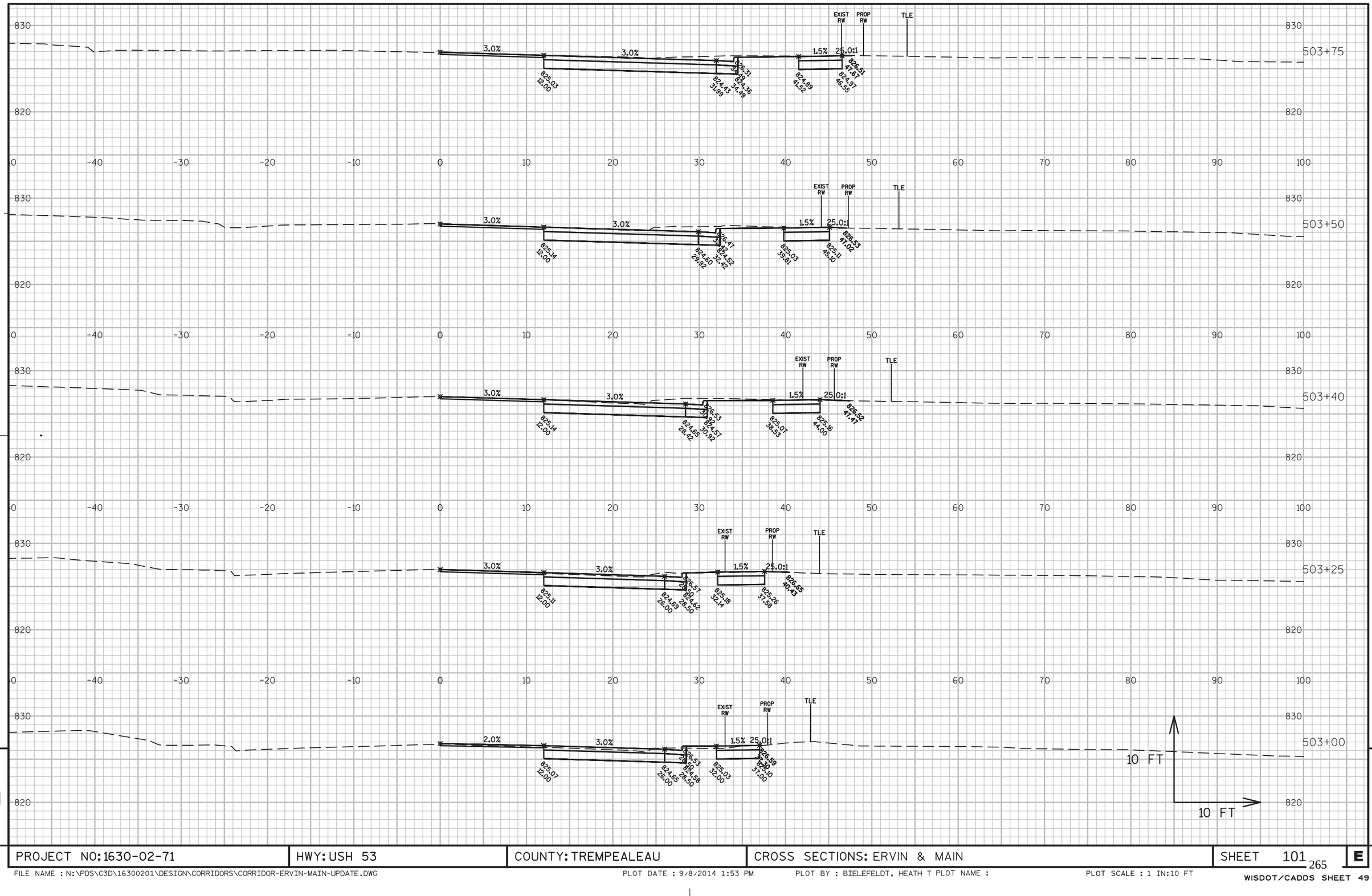
FILE NAME : C:\CAEfiles\Projects\tr_stdplate\W05752.DGN PLOT DATE : 28-FEB-2014 11:42 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : 8.026599:1.000000 WISDOT/CADDS SHEET 42



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: ERVIN & MAIN	SHEET 100	E

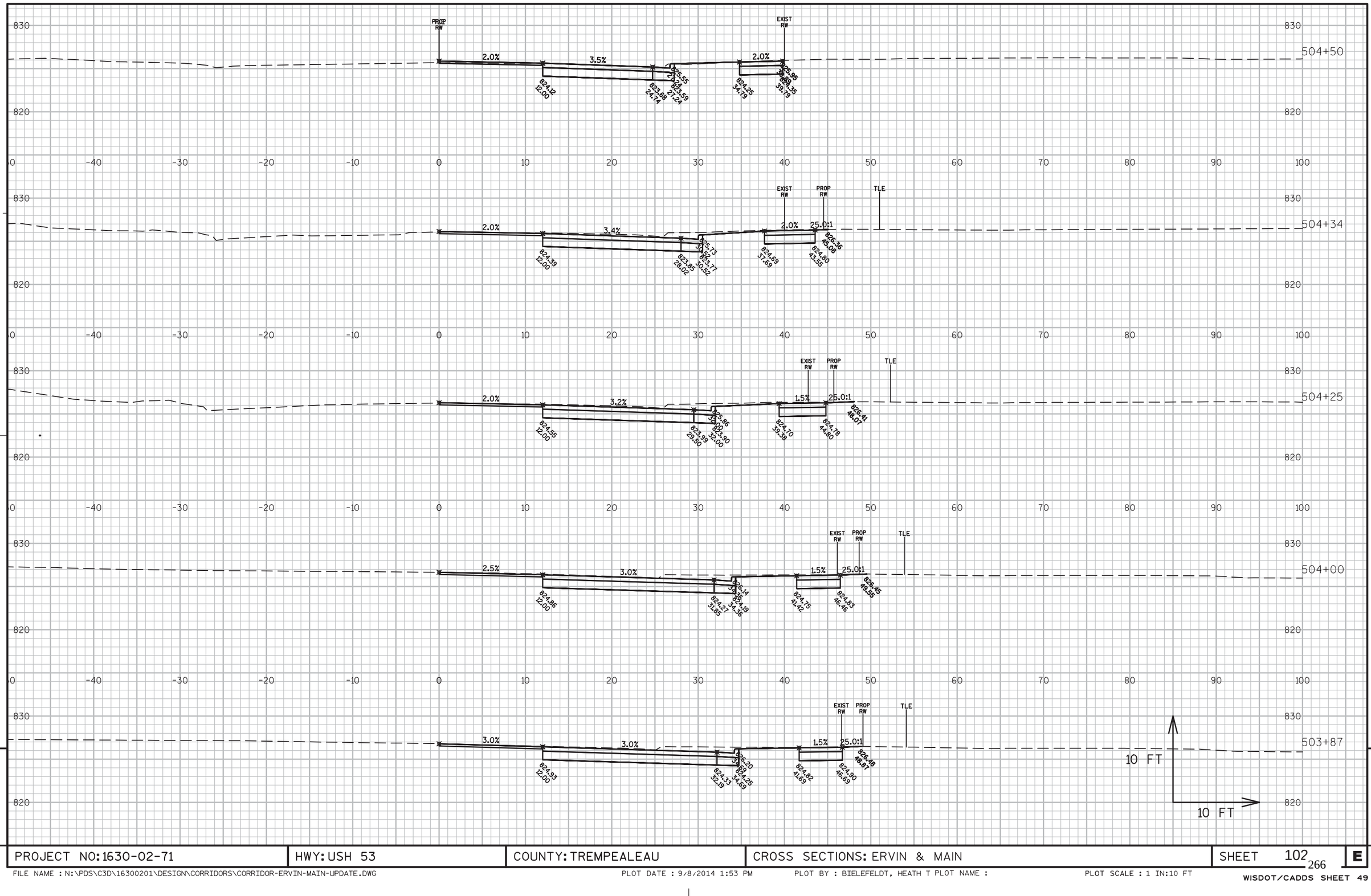
FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-ERVIN-MAIN-UPDATE.DWG PLOT DATE : 9/8/2014 1:53 PM PLOT BY : BIELEFELDT, HEATH T PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: ERVIN & MAIN	SHEET 101	E

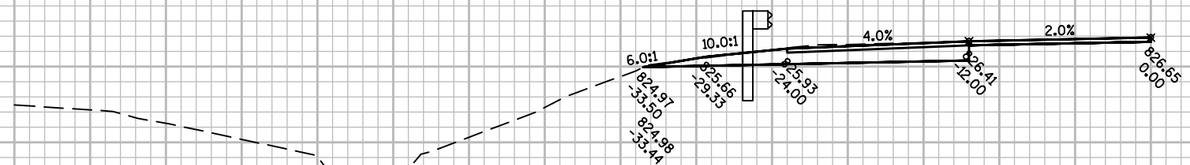
FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-ERVIN-MAIN-UPDATE.DWG PLOT DATE : 9/8/2014 1:53 PM PLOT BY : BIELEFELDT, HEATH T PLOT NAME : PLOT SCALE : 1 IN:10 FT



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: ERVIN & MAIN	SHEET 102	E

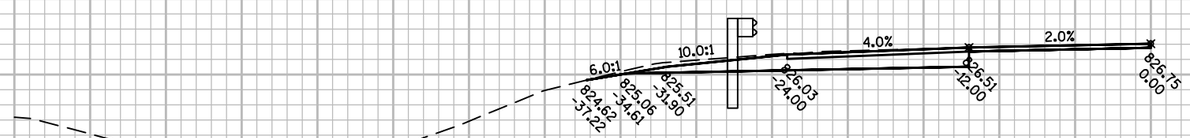
FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-ERVIN-MAIN-UPDATE.DWG PLOT DATE : 9/8/2014 1:53 PM PLOT BY : BIELEFELDT, HEATH T PLOT NAME : PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49

POST #5



34+22

POST #1



33+97

10 FT

10 FT

9

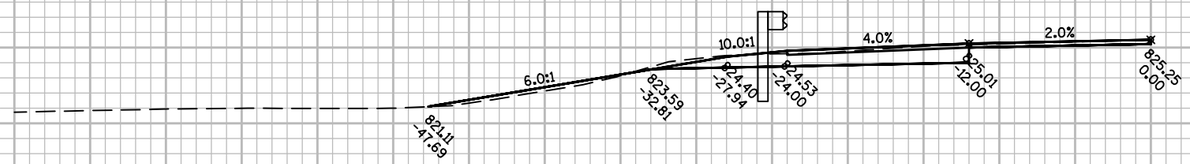
9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 267	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090201_XS

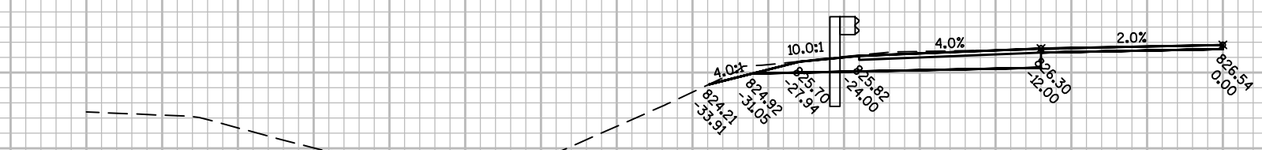
PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

POST #9



37+84

POST #9



34+47

10 FT

10 FT

9

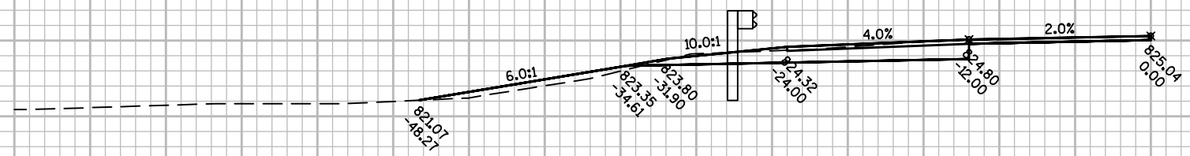
9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 268	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090202_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

POST #1



38+34

POST #5



38+09

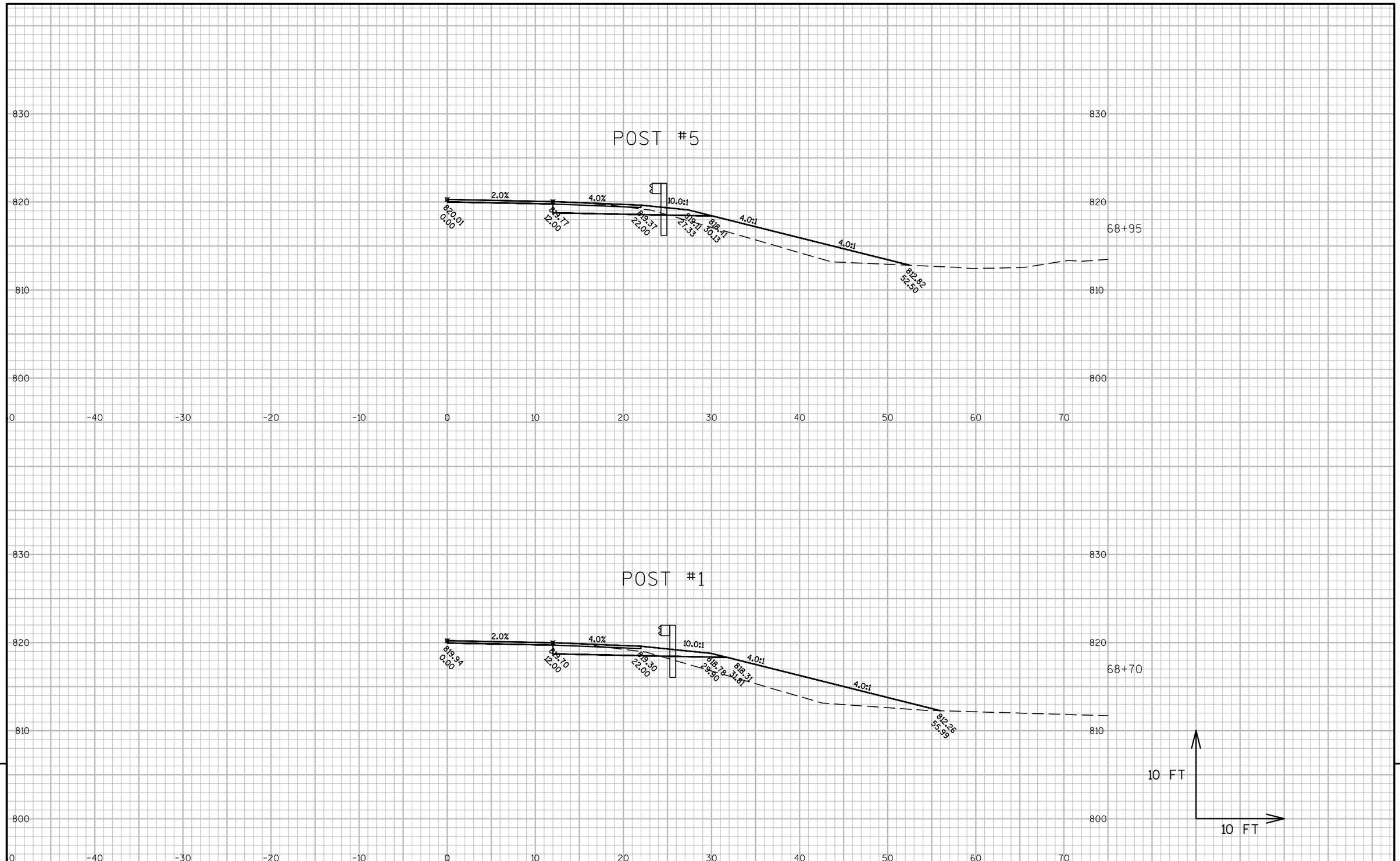
10 FT

10 FT

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 269	E

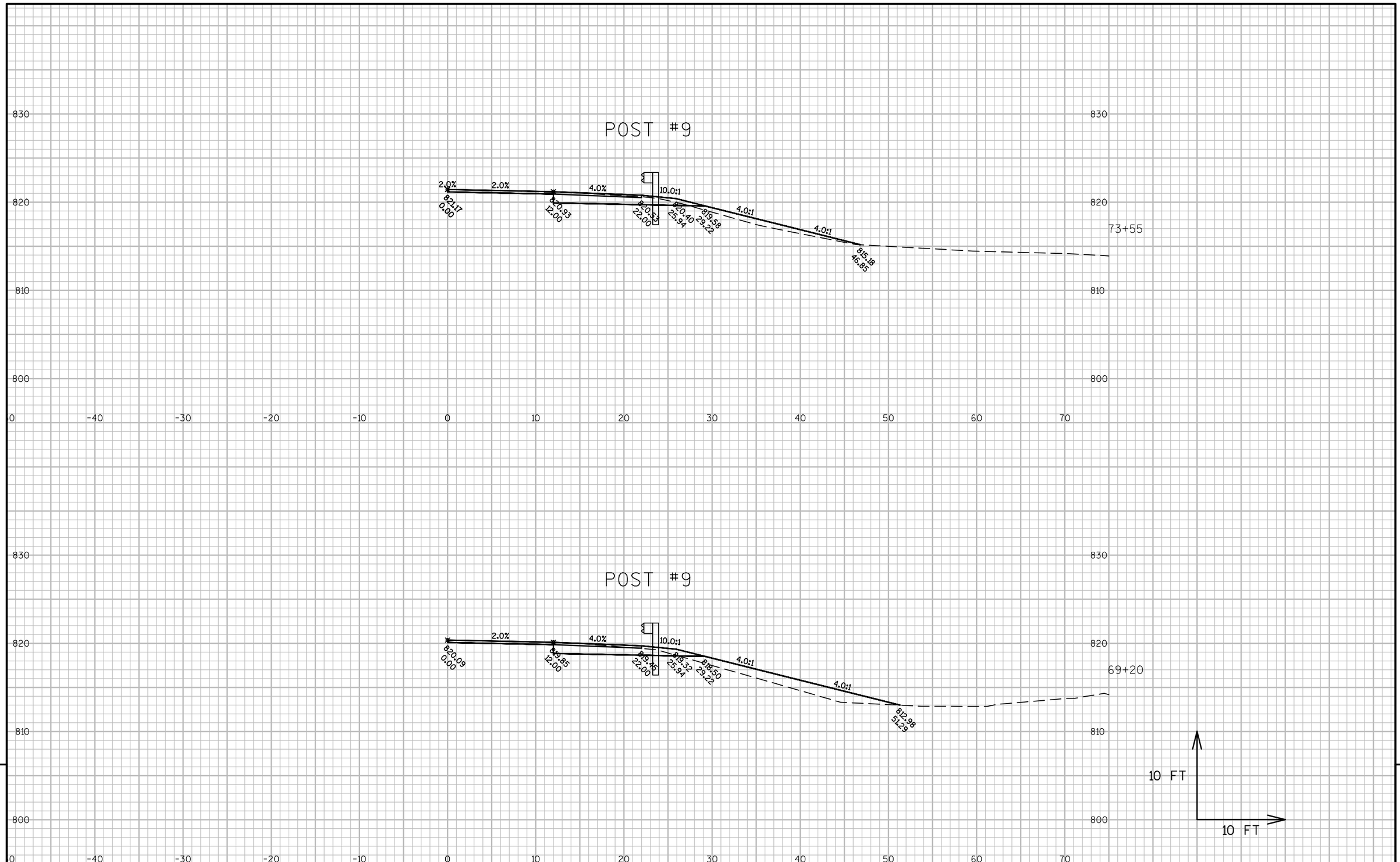
FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090203_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT



PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 270	E

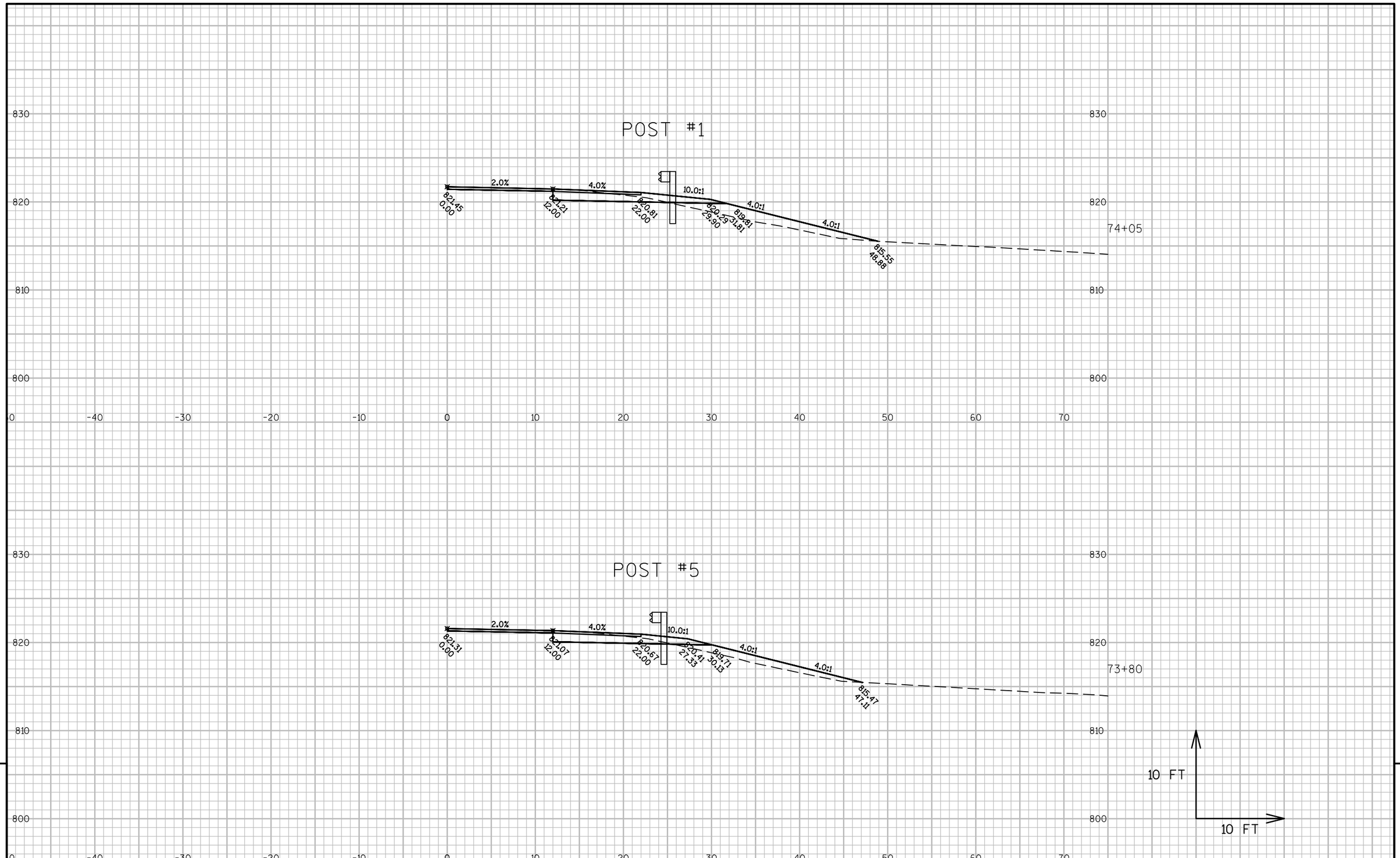
FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090204_XS
PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



9

9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 271	E



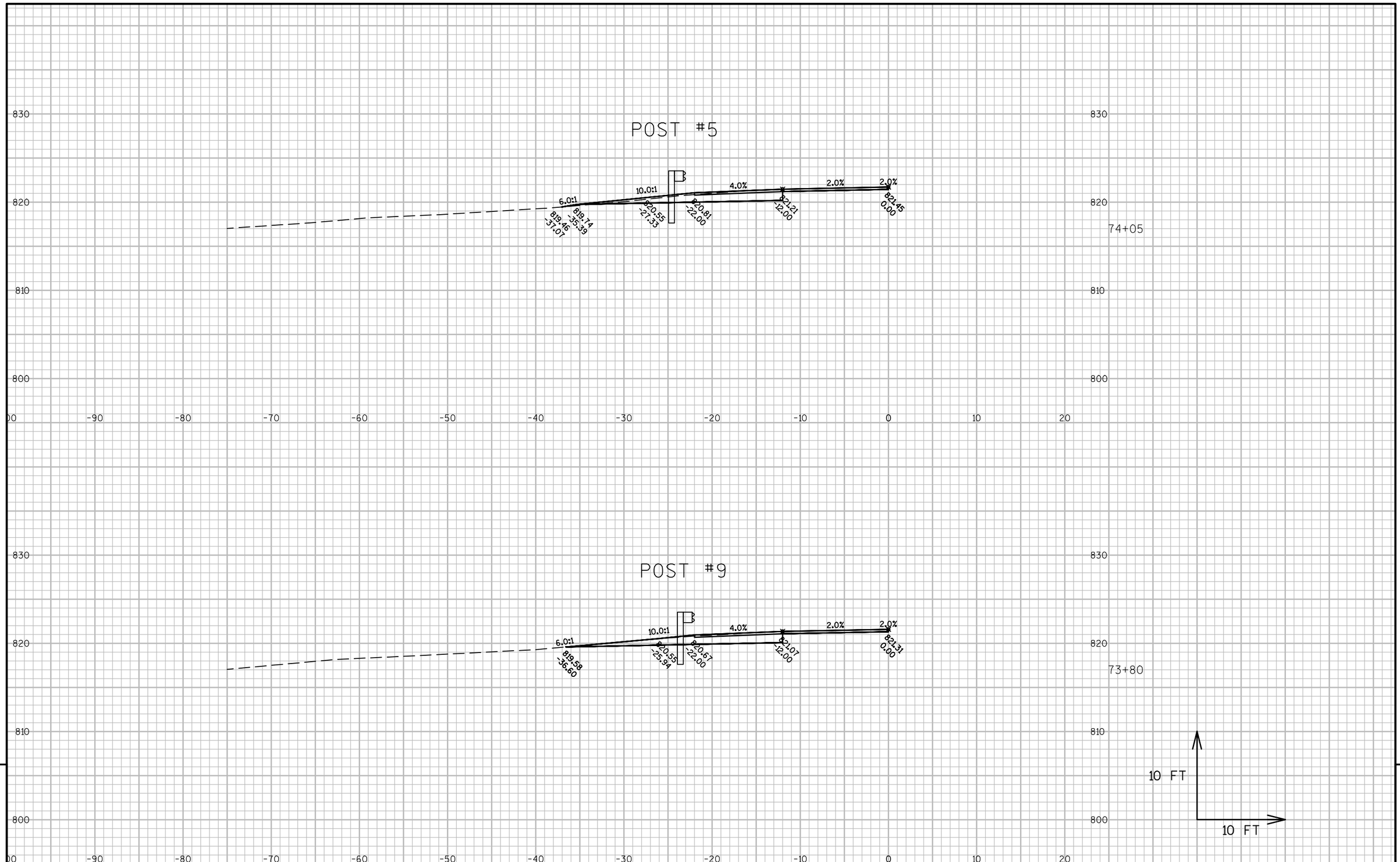
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9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 272	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090206_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT



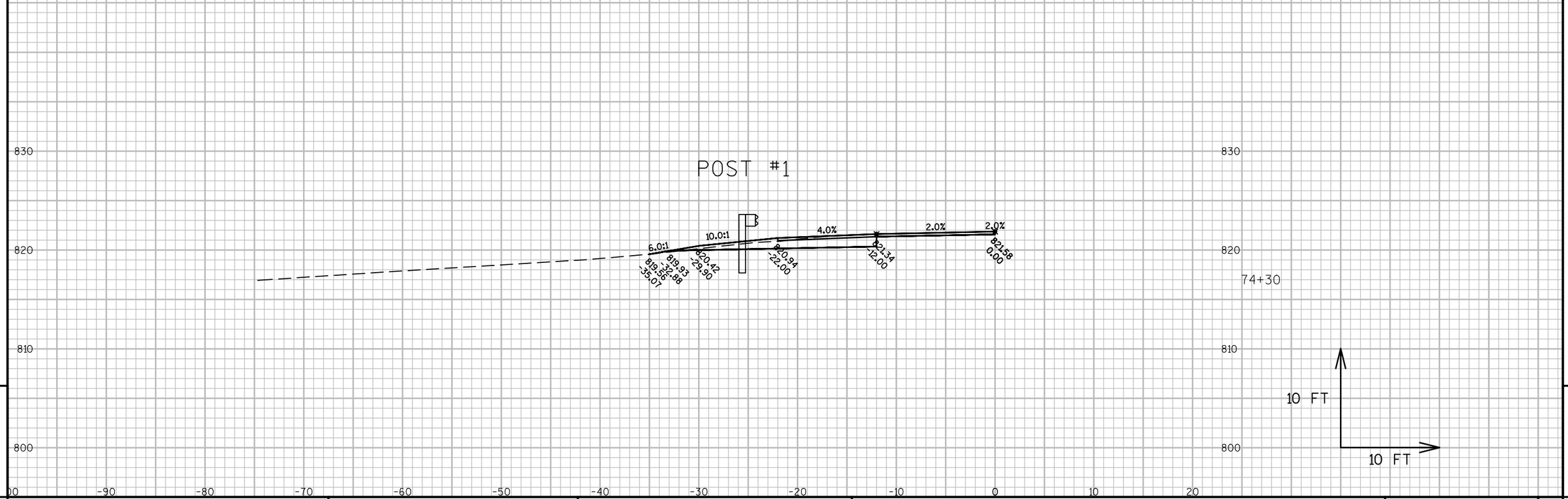
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9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 273	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090207_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

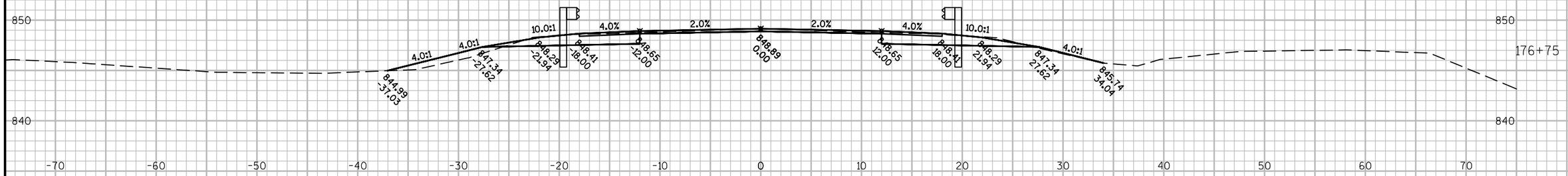


PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 274 E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090208_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

POST #9



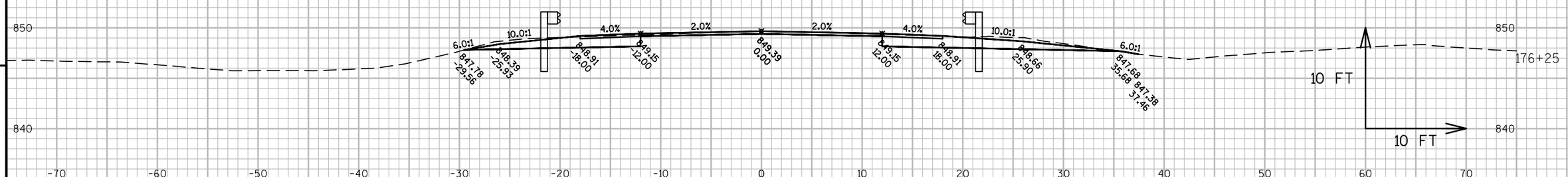
POST #9

POST #5



POST #5

POST #1



POST #1

9

9

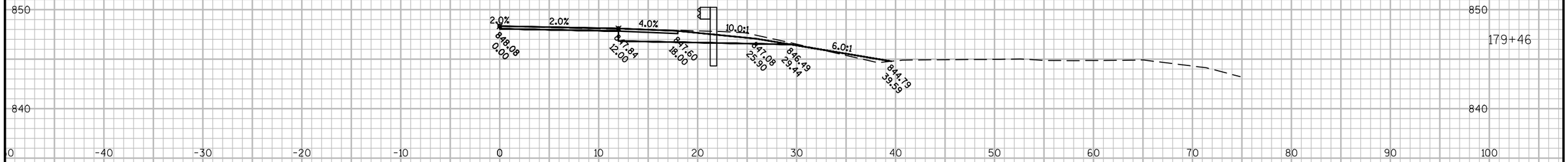
PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 275	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090209_XS

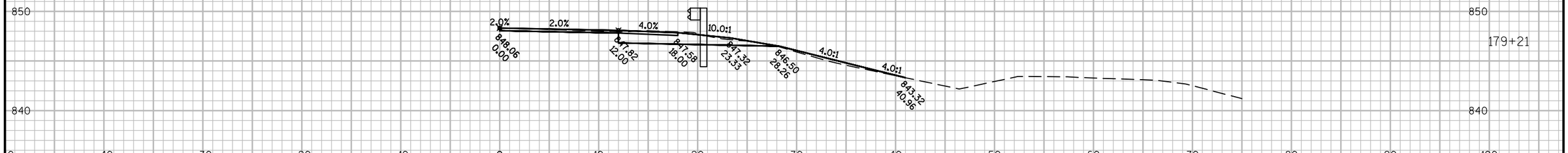
PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49

POST #1



POST #5



POST #9

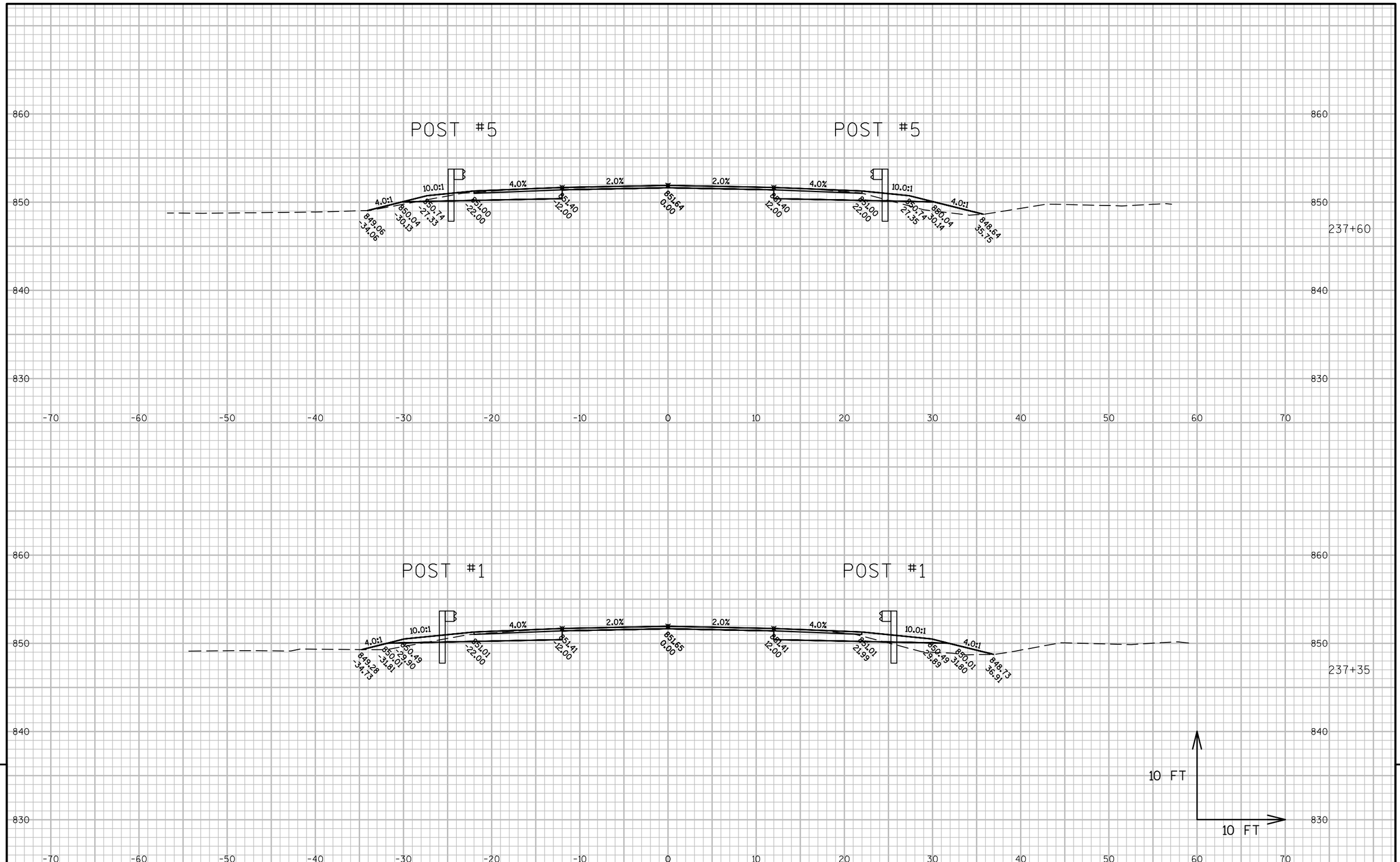
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9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 276	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090210_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT



9

9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 277	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090211_XS

PLOT DATE : 10/29/2015 9:52 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49

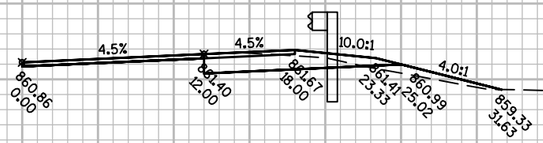


9

9

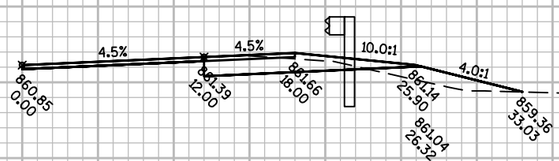
PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 278	E

POST #5



303+50

POST #1



303+25

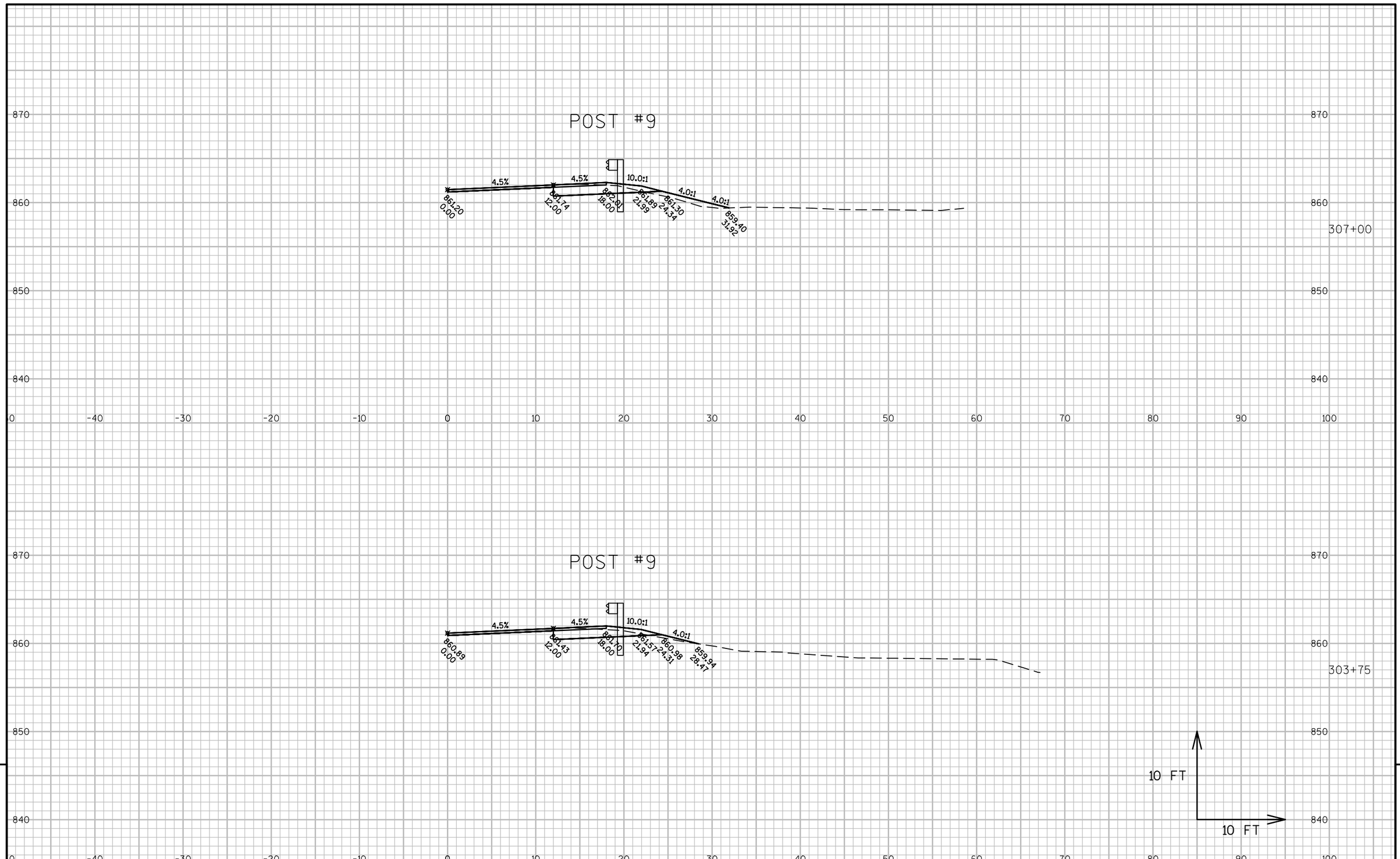
10 FT
10 FT

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 279	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090213_XS

PLOT DATE : 10/29/2015 9:53 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



9

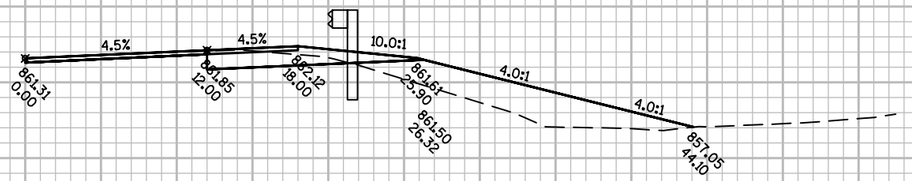
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PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 280	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090214_XS

PLOT DATE : 10/29/2015 9:53 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

POST #1



307+50

POST #5



307+25

10 FT
10 FT

9

9

PROJECT NO: 1630-02-71	HWY: USH 53	COUNTY: TREMPEALEAU	CROSS SECTIONS: BEAM GUARD	SHEET 281	E

FILE NAME : N:\PDS\C3D\16300201\DESIGN\CORRIDORS\CORRIDOR-USH53-GUARDRAIL.DWG
LAYOUT NAME - 090215_XS

PLOT DATE : 10/29/2015 9:53 AM PLOT BY : HETRICK, ADAM M PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49

Wisconsin Department of Transportation

Dedicated people creating transportation solutions
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