EAU

PROJECT ID: 1023-02-76

WITH:

43

COUNTY: JACKSON

MAY 2016

ORDER OF SHEETS

TOTAL SHEETS = 242

STATE PROJECT	FEDERAL PROJECT	
	PROJECT	CONTRACT
1023-02-76	WISC 2016184	1

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PLAN OF PROPOSED IMPROVEMENT

OSEO - BLACK RIVER FALLS

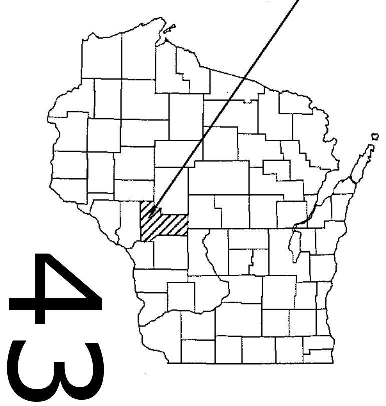
WEST COUNTY LINE TO STH 95 (EB & WB)

IH 94

JACKSON COUNTY

STATE PROJECT NUMBER
1023-02-76

PROJECT LOCATION



N

R-6-W | R-5-W

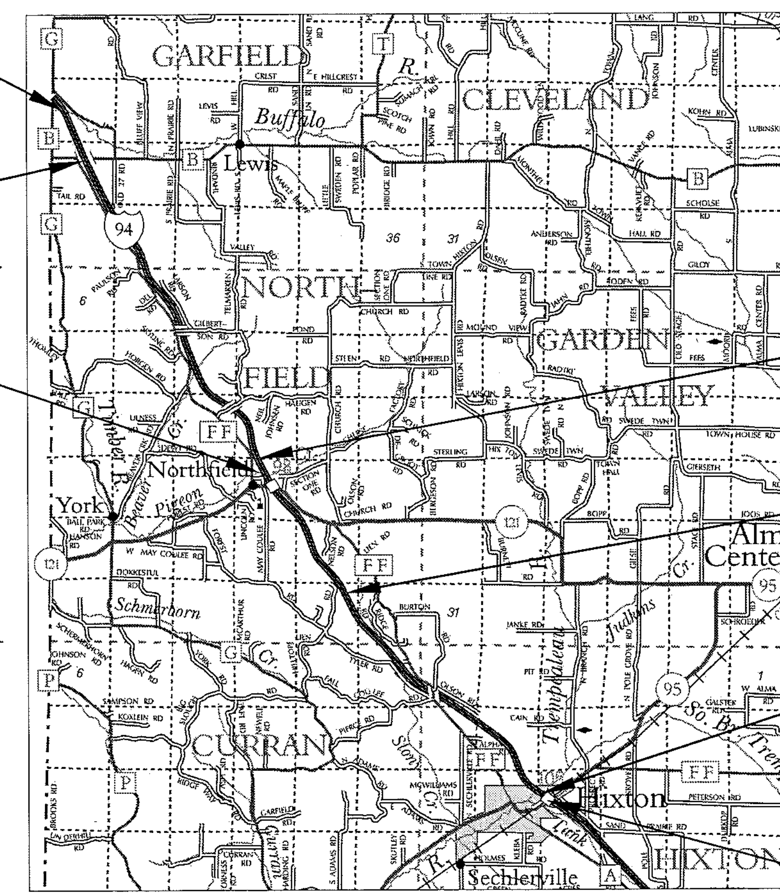
BEGIN PROJECT
STA 239'EB'+04.20 (X: 5510.68, Y: 189035.35)
STA 241'WB'+28.28 (X:5851.22, Y: 189006.93)

NET EXCEPTION TO ℄ LENGTH
STA 283'EB'+92.38 TO 285'EB'+05.94 (STRUCTURE B-27-37)
STA 284'WB'+38.12 TO 285'WB'+51.80 (STRUCTURE B-27-38

T-24-N
T-23-N

NET EXCEPTION TO ℄ LENGTH
STA 598'EB'+54.56 TO 599'EB'+59.08 (STRUCTURE B-27-148)
STA 598'WB'+78.38 TO 599'WB'+83.03 (STRUCTURE B-27-149)

T-23-N
T-22-N



T-24-N
T-23-N

EQUATION
STA 591'WB'+26.80 BK. = STA 590'WB'+00.27

EQUATION
STA 720'WB'+19.17 BK. = STA 721'WB'+31.37

T-23-N
T-22-N

NET EXCEPTION TO ℄ LENGTH
STA 962'EB'+69.18 TO 964'EB'+05.91
STRUCTURE B-27-21
STA 962'WB'+99.39 TO 964'WB'+37.04
STRUCTURE B-27-22

END OF PROJECT
STA 973'EB'+90.00
STA 974'WB'23.55

R-6-W | R-5-W

LAYOUT

SCALE 0 — 3 MILES

TOTAL NET LENGTH OF CENTERLINE = EB: 13.845 MILES
WB: 13.826 MILES

HORIZONTAL POSITIONS SHOWN ON THIS PLAN ARE WISCONSIN COUNTY COORDINATES, JACKSON COUNTY, NAD83 (2014), IN U.S. SURVEY FEET. VALUES ARE GRID COORDINATES, GRID BEARINGS, AND GRID DISTANCES. GRID DISTANCES MAY BE USED AS GROUND DISTANCES.

DESIGN DESIGNATION

A.A.D.T.	2017	=	27100
A.A.D.T.	2037	=	33500
D.H.V.		=	4560
D.D.		=	58/42
T.		=	34%
DESIGN SPEED		=	70
ESALS		=	26,000,000

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 — 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

PREPARED BY

Surveyor	NW REGION - EAU CLAIRE
Designer	M. BECKLIN
Project Manager	S. LAMBELE
Regional Examiner	C. KOSKI
Regional Supervisor	R. SHERMO

APPROVED FOR THE DEPARTMENT

DATE: 1/20/16 (Signature)

E

LIST OF STANDARD ABBREVIATIONS

ABUT.	ABUTMENT
AGG.	AGGREGATE
AH.	AHEAD
APPROX.	APPROXIMATE
A.E.W.	APRON ENDWALL
ASPH.	ASPHALTIC
A.D.T.	AVERAGE DAILY TRAFFIC
AZ.	AZIMUTH
BK.	BACK
BEG.	BEGIN
B.M.	BENCH MARK
C/L	CENTER LINE
CONC.	CONCRETE
CONST.	CONSTRUCTION
CO.	COUNTY
C.T.H.	COUNTY TRUNK HIGHWAY
X-SEC.	CROSS SECTION
CR.	CRUSHED
CFS	CUBIC FEET/SECOND
C.Y., CU. YD.	CUBIC YARD
CULV.	CULVERT
C.P.	CULVERT PIPE
D.O.T.	DEPARTMENT OF TRANSPORTATION
D.H.V.	DESIGN HOUR VOLUME
DIA.	DIAMETER
D.	DIRECTIONAL DISTRIBUTION
DISCH. OR DIS.	DISCHARGE
EA.	EACH
ELECT.	ELECTRIC
EL. OR ELEV.	ELEVATION
EMB.	EMBANKMENT
E.B.S.	EXCAVATION BELOW SUBGRADE
EXIST.	EXISTING
FERT.	FERTILIZE
F.E.	FIELD ENTRANCE
FIN.	FINISHED
FT.	FOOT
F.L.	FLOW LINE
GA.	GAUGE
HORIZ.	HORIZONTAL
CWT.	HUNDREDWEIGHT
INL.	INLET
LT.	LEFT
L.H.F.	LEFT-HAND FORWARD
LIN.	LINEAR
LIN. FT.	LINEAR FOOT
L.S.	LUMP SUM
MAX.	MAXIMUM
MI.	MILE
MISC.	MISCELLANEOUS
N.E.	NORTH EAST
N.W.	NORTH WEST
PAV'T	PAVEMENT
P.C.	POINT OF CURVATURE
P.I.	POINT OF INTERSECTION
P.T.	POINT OF TANGENCY
P.O.T.	POINT ON TANGENT
LB.	POUND
P.E.	PRIVATE ENTRANCE
PROJ.	PROJECT
R.	RANGE
REQ'D	REQUIRED
RT.	RIGHT
R.H.F.	RIGHT-HAND FORWARD
R/W	RIGHT OF WAY
RD.	ROAD
SHR.	SHRINKAGE
SL.	SLOPE
STD.	STANDARD
S.D.D.	STANDARD DETAIL DRAWINGS
S.T.H.	STATE TRUNK HIGHWAY
STA.	STATION
S.P.P.A.	STRUCTURAL PLATE PIPE ARCH
STRUCT.	STRUCTURE
SURF.	SURFACE
TEL.	TELEPHONE
TN.	TOWN
T.	TRUCKS (PERCENT OF)
UNCL.	UNCLASSIFIED
U.G.	UNDERGROUND
V.	VELOCITY OR DESIGN SPEED
V.C.	VERTICAL CURVE

UTILTIES

COMMUNICATION LINE
AT&T LEGACY
BRAD KEMPH - FIELD CONTACT
715-254-5238
WILLIAM KOENIG - DESIGN CONTACT
JMC ENGINEERS
128 W SUNSET AVENUE
APPLETON, WI 54911
608-628-0575 (MOBILE/OFFICE)
WEKOENIG@ATT.NET

COMMUNICATION LINE
TRI-COUNTY COMMUNICATIONS COOPERATIVE
BRIAN A MELSNESS
417 5TH AVENUE NORTH
STRUM, WI 54770
715-695-2691 (OFFICE)
715-530-0081 (MOBILE)
bmelsness@tccpro.net

ELECTRICITY DISTRIBUTION
EAU CLAIRE ENERGY COOPERATIVE
RANDY BAIER
8214 USH 12
PO BOX 368
FALL CREEK, WI 54742
715-836-6479 (OFFICE)
rbaier@ecec.com

ELECTRICITY - TRANSMISSION
XCEL ENERGY
CHARLIE DIENGER
3505 MELBY RD
EAU CLAIRE, WI 54703
651-955-1089 (MOBILE)
charles.g.dienger@xcelenergy.com
COPY ALL XCEL CORRESPONDENCE TO:
DAWN SCHULTZ
XCEL ENERGY
1414 WEST HAMILTON AVENUE
PO BOX 0008
EAU CLAIRE, WI 54702-0008
715-737-2482 (OFFICE)
dawn.schultz@xcelenergy.com

COMMUNICATION LINE
CENTURYLINK
DONNA SMOTHERS
835 RED IRON ROAD
BLACK RIVER FALLS, WI 54615
715-284-4375 (OFFICE)
715-797-4854 (MOBILE)
donna.smothers@centurylink.com

COMMUNICATION LINE
WISCONSIN DEPARTMENT OF TRANSPORATION
JEFF MADSON
433 W. ST PAUL AVE, STE. 300
MILWAUKEE, WI 53203-3007
414-225-3723
Jeffrey.Madson@dot.wi.gov

ELECTRICITY DISTRIBUTION
JACKSON ELECTRIC COOPERATIVE
STEVE BUCHOLZ
N6868 CTH F
BLACK RIVER FALLS, WI 54615
715-670-0805
sbucholz@jackelec.com

SEWER AND WATER
VILLAGE OF HIXTON
STEVE KIRSCHNER
PO BOX 127
HIXTON, WI 54635-0127
715-963-3732
hixtonpublicworks@centurytel.net

GAS/PETROLEUM
WE ENERGIES
TRAVIS KAHL
1921 8TH STREET SOUTH
WISCONSIN RAPIDS, WI 54494
715-421-7256 (OFFICE)
715-498-6180 (MOBILE)
travis.kahl@we-energies.com

RAILROAD

WISCONSIN CENTRAL LTD. (CN)
ATTN: JACKIE MACEWICZ
1625 DEPOT STREET
STEVENS POINT, WI 54481
JACKIE.MACEWICZ@CN.CA
715-345-2503

WCL (CN) CALL BEFORE YOU DIG
MARY ELLEN CARMODY
734-783-4533

(RAILROADS ARE NOT PART OF DIGGERS HOTLINE)

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

WISCONSIN DNR - LIASON

DEPARTMENT OF NATURAL RESOURCES
DNR SERVICE CENTER
3550 MORMON COULEE ROAD
LA CROSSE, WI 54601
ATTN.: KAREN KALVELAGE
(608) 785-9115
KAREN.KALVELAGE@WISCONSIN.GOV

JACKSON COUNTY HIGHWAY DEPARTMENT

RANDY ANDERSON, HIGHWAY COMMISSIONER
JACKSON COUNTY HIGHWAY DEPARTMENT
119 HARRISON ST
BLACK RIVER FALLS, WI 54615
(715) 284-0233

GENERAL NOTES

HORIZONTAL CONTROL POINTS AND ANY OTHER SURVEY INFORMATION WILL BE PROVIDED BY NORTHWEST REGIONAL TECHNICAL SERVICES UPON REQUEST.

A VERTICAL SAWCUT SHALL BE MADE THROUGH EXISTING PAVEMENTS AT REMOVAL LIMITS.

NO TREES OR SHRUBS ARE TO BE REMOVED WITHOUT THE APPROVAL OF THE ENGINEER.

DISTURBED AREAS WITHIN THE RIGHT OF WAY, EXCEPT THE AREAS WITHIN THE FINISHED SHOULDER POINTS, SHALL BE SALVAGED TOPSOIL, FERTILIZED, SEEDED AND MULCHED AS DIRECTED BY THE ENGINEER.

PRIOR TO CONSTRUCTION THE CONTRACTOR SHALL CONTACT THE COUNTY SURVEYOR REGARDING MONUMENT AND PROPERTY CORNER PRESERVATION.

THE LOCATIONS OF EXISTING AND PROPOSED UTILITY INSTALLATIONS AS SHOWN ON THE PLANS ARE APPROXIMATE. THERE MAY BE OTHER UTILITY INSTALLATIONS WITHIN THE PROJECT AREA THAT ARE NOT SHOWN.

IT IS THE CONTRACTORS RESPONSIBILITY TO CALL DIGGERS HOTLINE PRIOR TO BEGINNING WORK OPERATIONS AND TO CONFIRM ALL UTILITY LOCATIONS.

EROSION CONTROL FEATURES AS SHOWN ON THE PLANS ARE SUGGESTED LOCATIONS. EXACT LOCATIONS WILL BE DETERMINED BY THE ENGINEER IN THE FIELD.

THE EXACT LOCATIONS AND QUANTITIES OF BUTT JOINTS AND CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL SHALL BE DETERMINED IN THE FIELD BY THE ENGINEER.

WHEN THE QUANTITY OF ITEMS OF BASE AGGREGATE OR HMA PAVEMENT IS MEASURED FOR PAYMENT BY THE TON, THE DEPTH OR THICKNESS OF THE LAYER SHOWN ON THE PLANS IS APPROXIMATE AND THE ACTUAL THICKNESS WILL DEPEND ON THE DISTRIBUTION OF MATERIAL AS DIRECTED BY THE ENGINEER.

MAINTENANCE AND REPAIR OF TEMPORARY WEDGE JOINT WILL BE INCIDENTAL TO THE APPROPRIATE HMA PAVEMENT BID ITEM.

LOCATIONS FOR PERMANENT SIGNS SHOWN ON THE PLAN ARE APPROXIMATE. ACTUAL LOCATIONS OF PERMANENT SIGNS ARE TO BE COORDINATED IN THE FIELD BY THE ENGINEER.

TEMPORARY PAVEMENT MARKING PAINT FOR LANE LINES ARE INTENDED TO BE INTERIM LANE LINE MARKINGS UNTIL GROOVES CAN BE CUT IN THE NEW ASPHALT SURFACE FOR WET REFLECTIVE EPOXY APPLICATION. CUT THE GROOVES FOR WET REFLECTIVE EPOXY APPLICATION AT THE SAME LOCATION WHERE THE PAVEMENT MARKING PAINT WAS APPLIED AS LANE LINES.

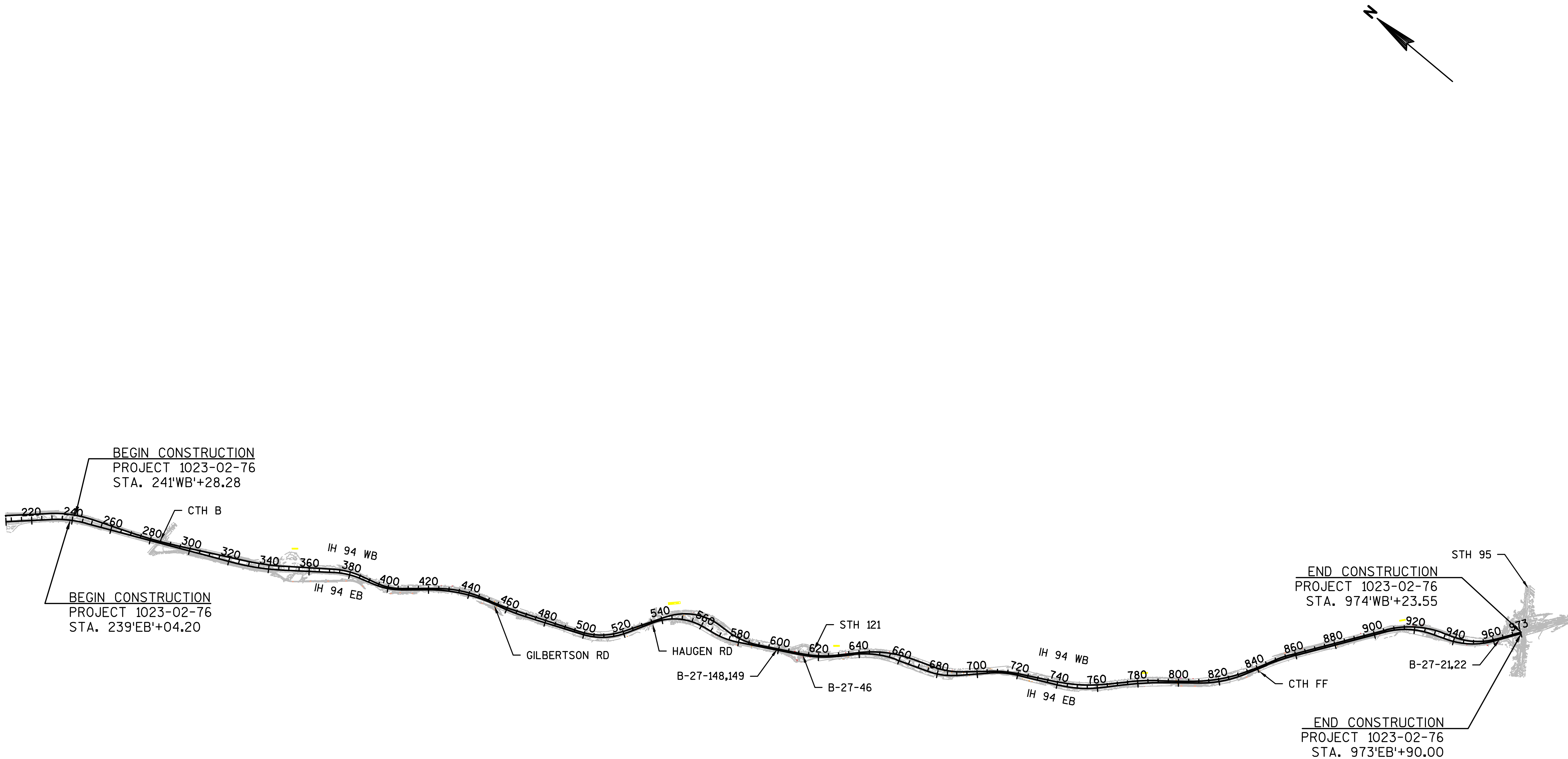
TRAFFIC CONTROL NEEDED DURING MAINTENANCE AND REPAIRS OF TEMPORARY WEDGE JOINT WILL BE INCIDENTAL TO THE TRAFFIC CONTROL SURVEILLANCE AND MAINTENANCE BID ITEM.

TYPICAL FINISHED SECTIONS SHOW THE GENERAL ROADWAY FEATURES THROUGHOUT THE PROJECT. SLOPES AND DISTANCES MAY VARY WITHIN THE STATION LIMITS.

PLACE HMA PAVEMENT WITH THE FOLLOWING THICKNESSES AND NOMINAL SIZE AGGREGATE:
3.0-INCH DRIVING LANE, PASSING LANE AND PASSING LANE SHOULDER
UPPER LAYER THICKNESS = 1.75-INCH SMA SPECIAL
LOWER LAYER THICKNESS = 1.25-INCH 5HT5834H

1.75-INCH DRIVING LANE SHOULDER
UPPER LAYER THICKNESS = 1.75-INCH 4LT5834S

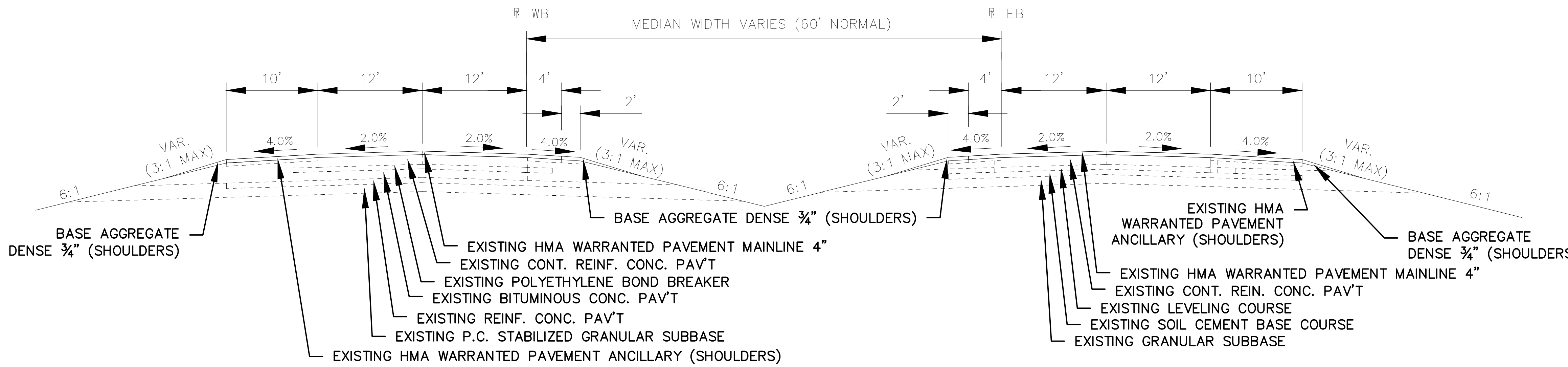
2



2

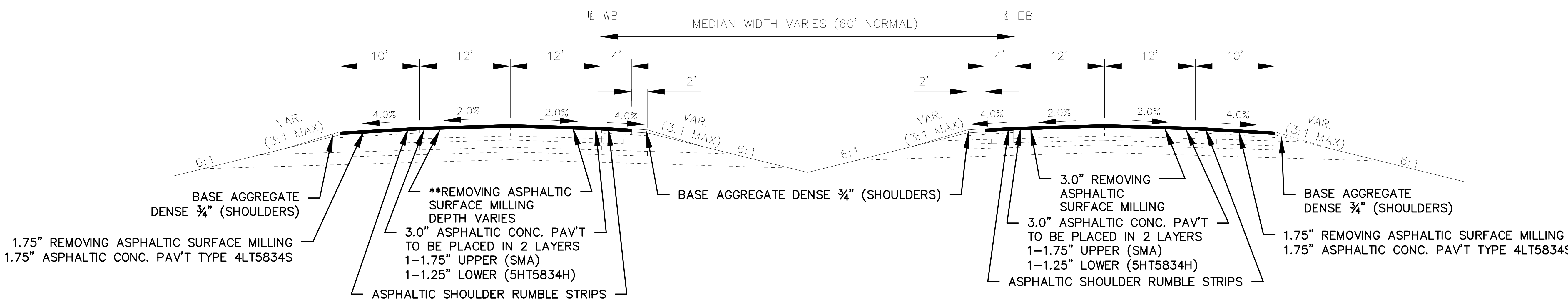
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	PROJECT OVERVIEW	SHEET 3	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\020201_PO.DWG
LAYOUT NAME - ####
PLOT DATE : 1/25/2016 1:10 PM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1" = 5000'
WISDOT/CADDS SHEET 42



IH 94 TANGENT TYPICAL EXISTING SECTION
STA. 241'WB'+28.28 - 375'WB'+00.00
STA. 613'WB'+50.00 - 623'WB'+00.00
STA. 660'WB'+00.00 - 974'WB'+23.55

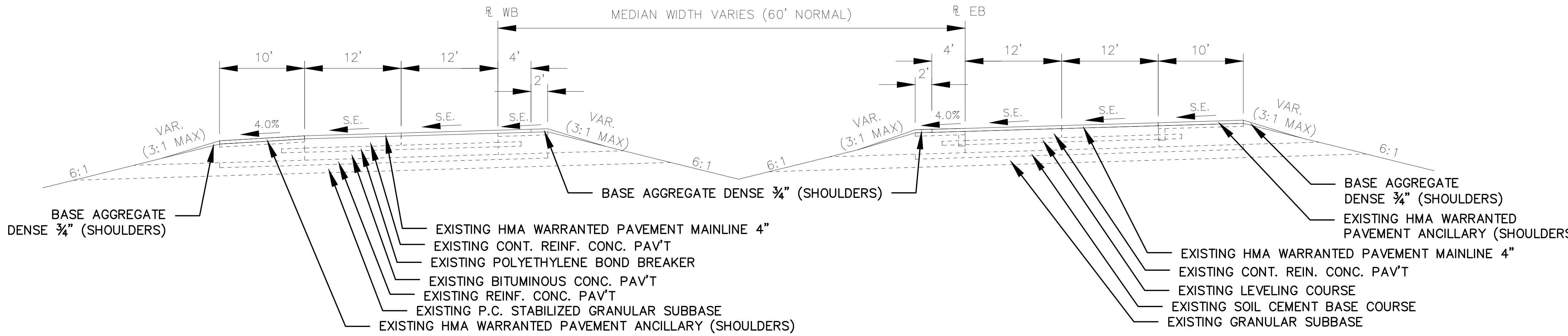
IH 94 TANGENT TYPICAL EXISTING SECTION
STA. 239'EB'+04.20 - 973'EB'+90.00



IH 94 TANGENT TYPICAL FINISHED SECTION
STA. 241'WB'+28.28 - 375'WB'+00.00
STA. 613'WB'+50.00 - 623'WB'+00.00
STA. 660'WB'+00.00 - 974'WB'+23.55

IH 94 TANGENT TYPICAL FINISHED SECTION
STA. 239'EB'+04.20 - 973'EB'+90.00

** MILLING DEPTH:
3.0" (241'WB'+28 – 375'WB'+00)
(615'WB'+78 – 623'WB'+00)
(660'WB'+00 – 974'WB'+24)
1.5–2" (613'WB'+50 – 615'WB'+78)

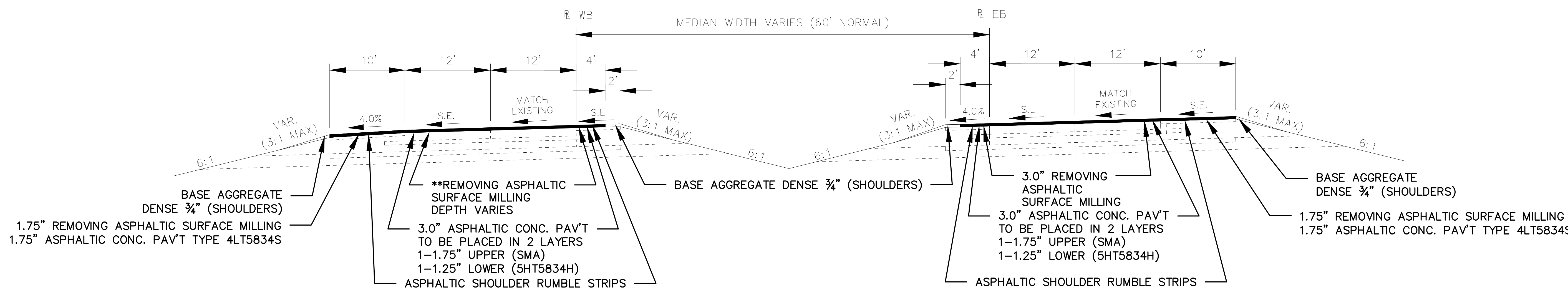


IH 94 SUPERELEVATED TYPICAL EXISTING SECTION

STA. 241'WB'+28.28 - 375'WB'+00.00
STA. 613'WB'+50.00 - 623'WB'+00.00
STA. 660'WB'+00.00 - 974'WB'+23.55

IH 94 SUPERELEVATED TYPICAL EXISTING SECTION

STA. 239'EB'+04.20 - 973'EB'+90.00



IH 94 SUPERELEVATED TYPICAL FINISHED SECTION

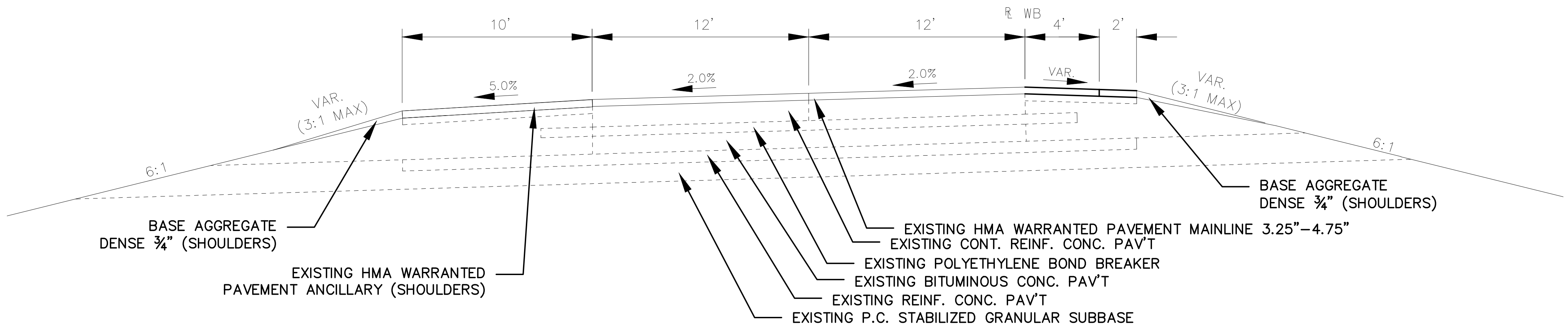
STA. 241'WB'+28.28 - 375'WB'+00.00
STA. 613'WB'+50.00 - 623'WB'+00.00
STA. 660'WB'+00.00 - 974'WB'+23.55

IH 94 SUPERELEVATED TYPICAL FINISHED SECTION

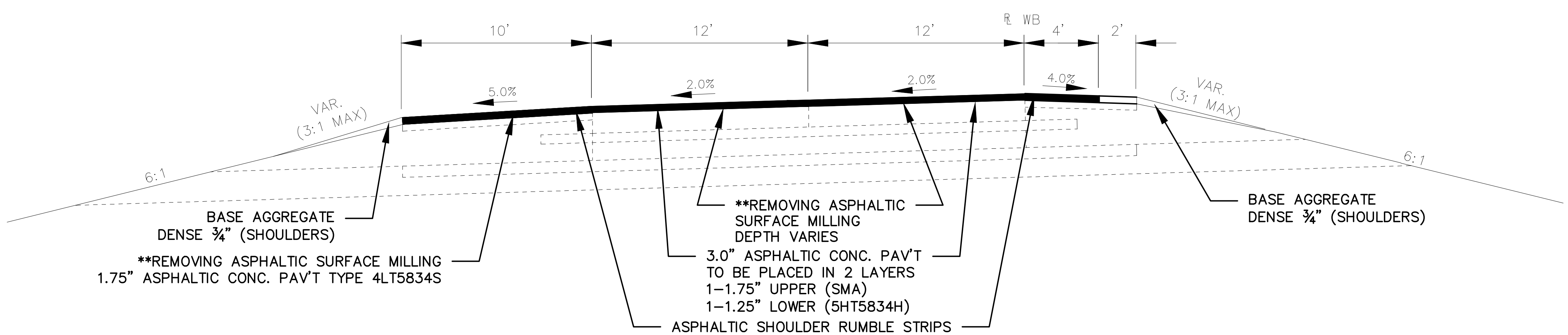
STA. 239'EB'+04.20 - 973'EB'+90.00

** MILLING DEPTH:
3.0" (241'WB'+28 – 375'WB'+00)
(615'WB'+78 – 623'WB'+00)
(660'WB'+00 – 974'WB'+24)
1.5–2" (613'WB'+50 – 615'WB'+78)

2



IH 94 TANGENT TYPICAL EXISTING SECTION
STA. 375'WB'+00.00 - 613'WB'+50.00
STA. 623'WB'+00.00 - 660'WB'+00.00

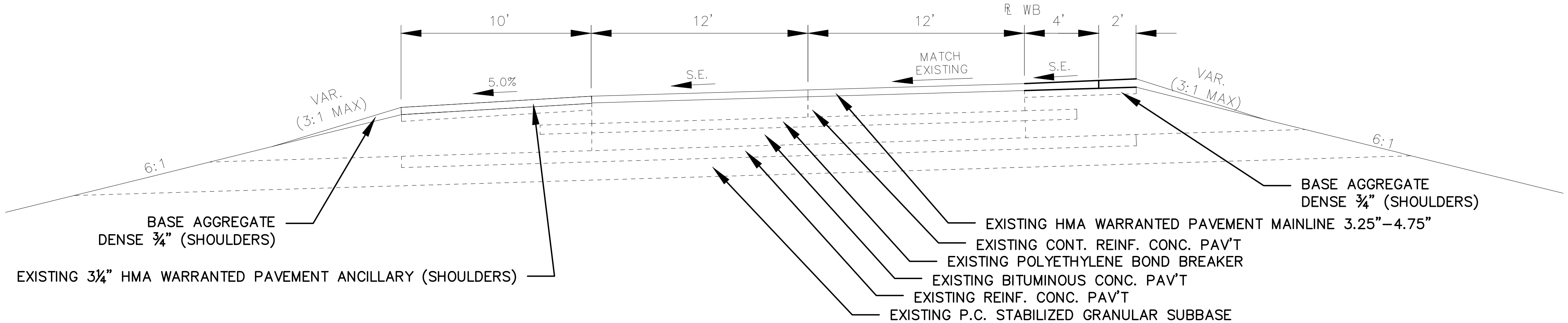


IH 94 TANGENT TYPICAL FINISHED SECTION
STA. 375'WB'+00.00 - 613'WB'+50.00
STA. 623'WB'+00.00 - 660'WB'+00.00

** MILLING DEPTH:
3.0" (375'WB'+00 – 377'WB'+30)
(623'WB'+00 – 627'WB'+32)
1.5–2" (377'WB'+30 – 613'WB'+50)
(627'WB'+32 – 660'WB'+00)

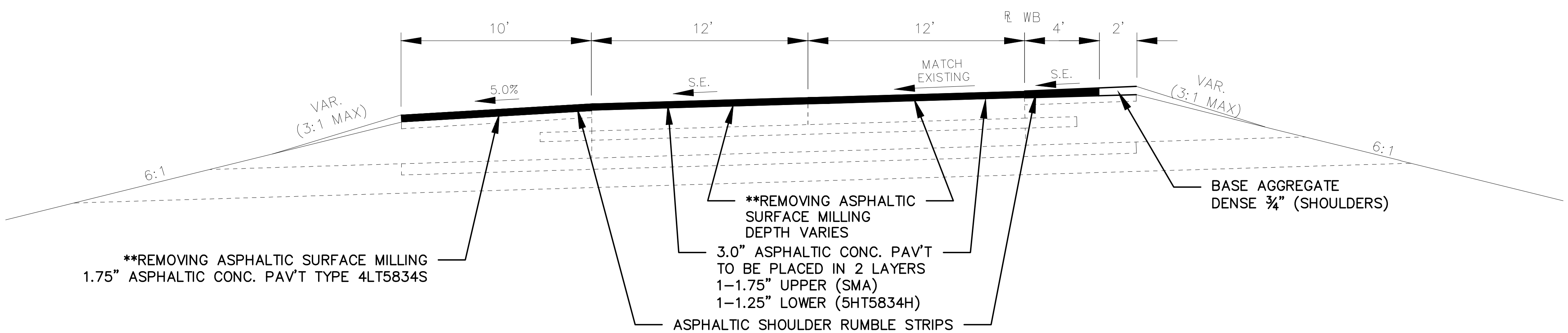
PROJECT NO:1023–02–76	HWY:IH 94	COUNTY:JACKSON	TYPICAL SECTIONS	SHEET 6	E

2



IH 94 SUPERELEVATED TYPICAL EXISTING SECTION

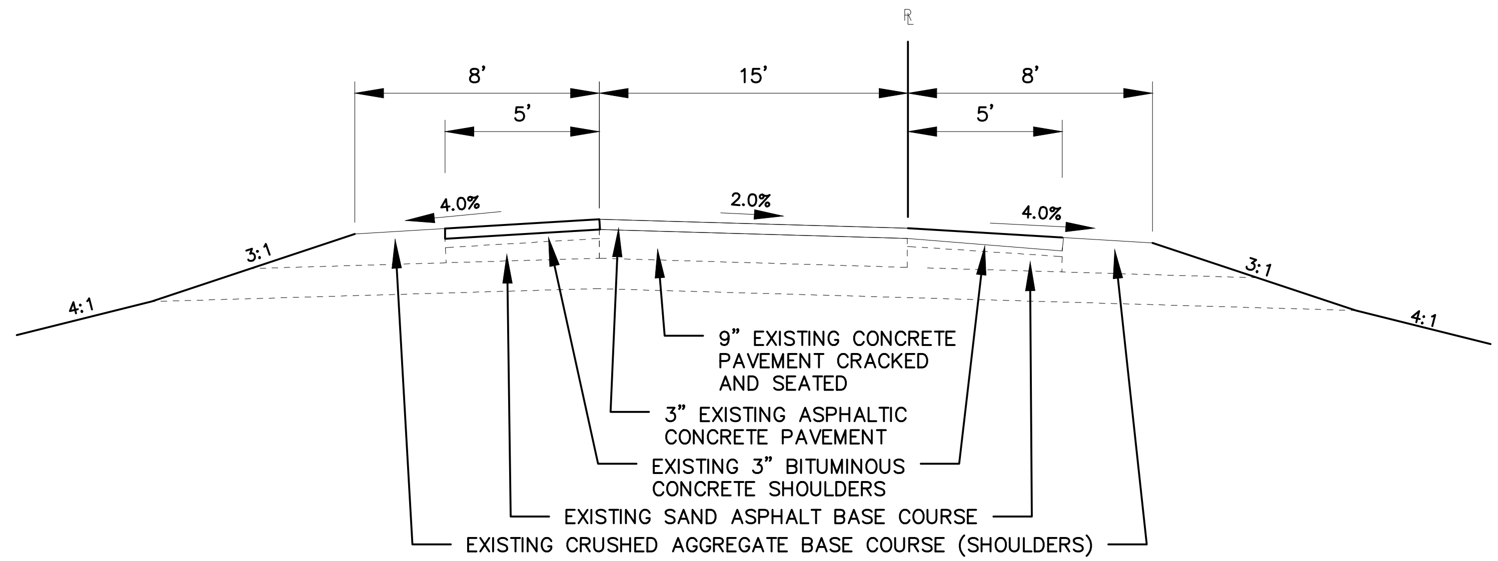
STA. 375'WB'+00.00 - 613'WB'+50.00
STA. 623'WB'+00.00 - 660'WB'+00.00



IH 94 SUPERELEVATED TYPICAL FINISHED SECTION

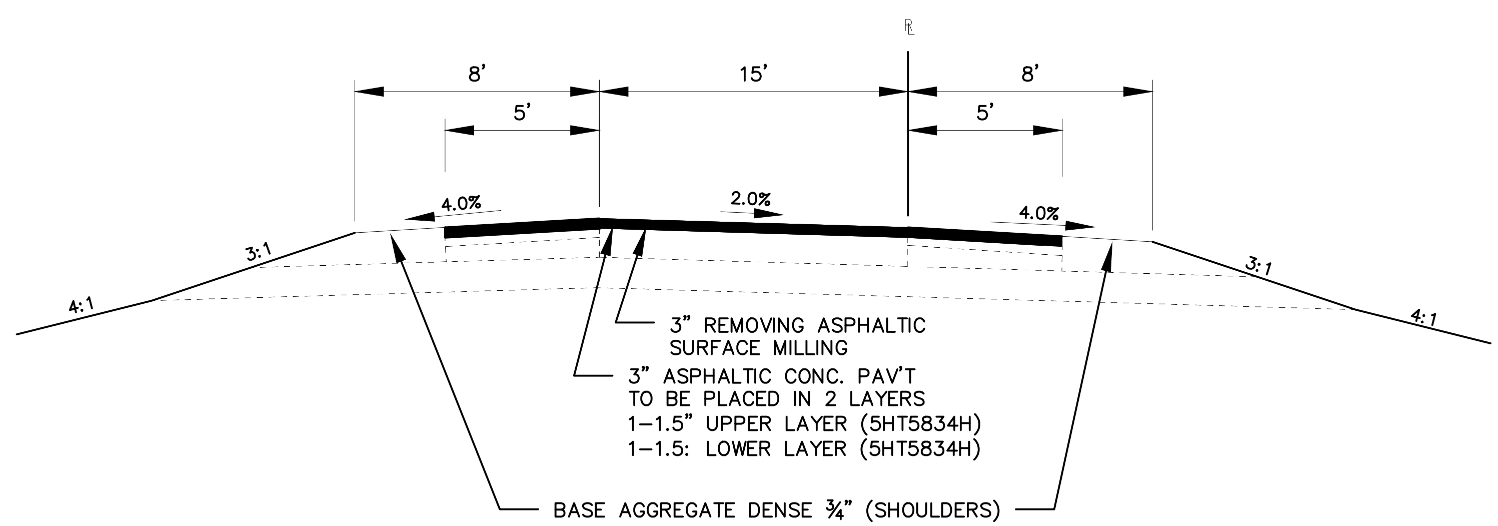
STA. 375'WB'+00.00 - 613'WB'+50.00
STA. 623'WB'+00.00 - 660'WB'+00.00

** MILLING DEPTH:
3.0" (375'WB'+00 – 377'WB'+30)
(623'WB'+00 – 627'WB'+32)
1.5–2" (377'WB'+30 – 613'WB'+50)
(627'WB'+32 – 660'WB'+00)



IH 94/STH 121 RAMPS

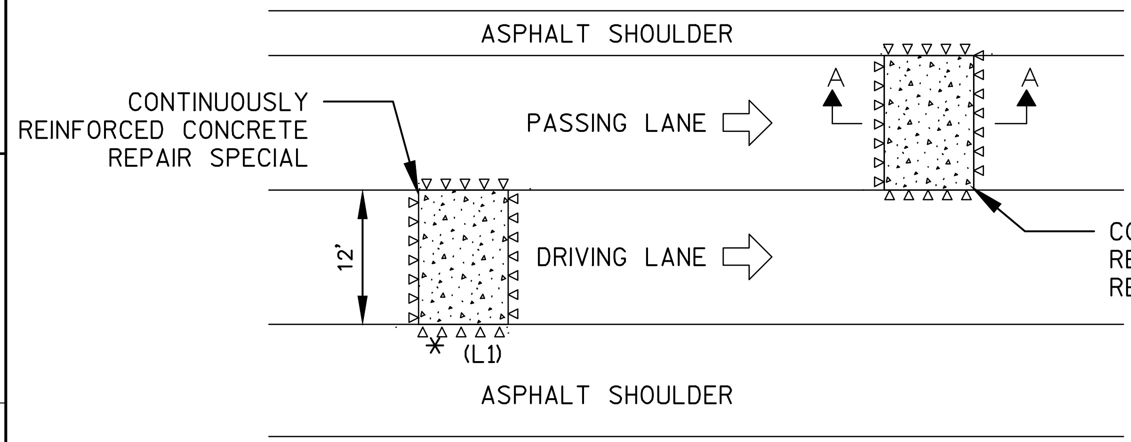
TYPICAL EXISTING SECTION



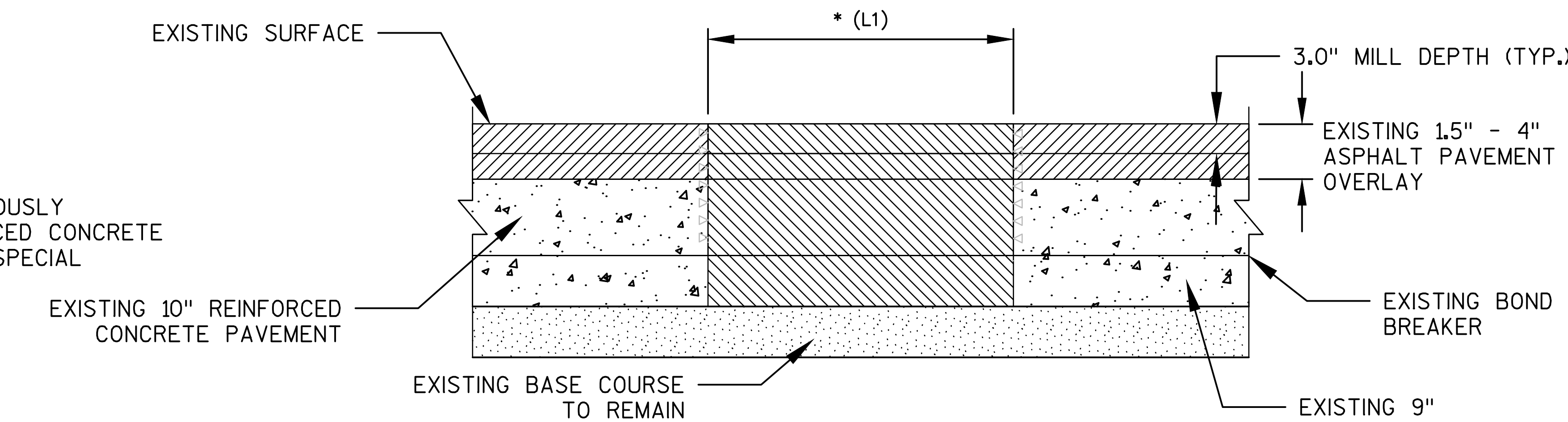
IH 94/STH 121 RAMPS

TYPICAL FINISHED SECTION

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	TYPICAL SECTIONS	SHEET 8	E



PLAN VIEW



SECTION A-A

* (L1) = 4' - 8' TYP. OR AS DIRECTED BY THE ENGINEER.

REMOVING ASPHALTIC SURFACE MILLING

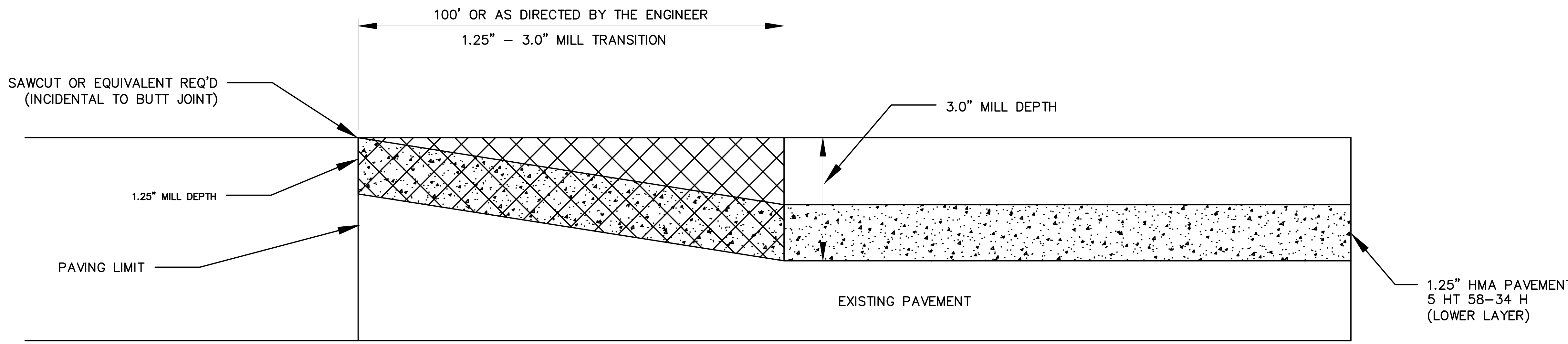
CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL

SAWING CONCRETE

NOTES:
CONSTRUCTION CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL PRIOR TO HMA MILL & OVERLAY.
THICKNESS OF CONCRETE REPAIR MAY VARY. 20" AVERAGE THICKNESS IS EXPECTED.
DAMAGE TO EITHER EXISTING PAVEMENTS OR EXISTING SHOULDER SHALL BE REPAIRED AS DIRECTED BY THE ENGINEER AND WILL BE INCIDENTAL TO THE ITEMS OF "CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL."
SAWING THROUGH EXISTING ASPHALT PAVEMENT OVERLAY WILL BE INCIDENTAL TO THE ITEM OF "SAWING CONCRETE."

CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL DETAIL

LOCATIONS DETERMINED IN THE FIELD BY THE ENGINEER.

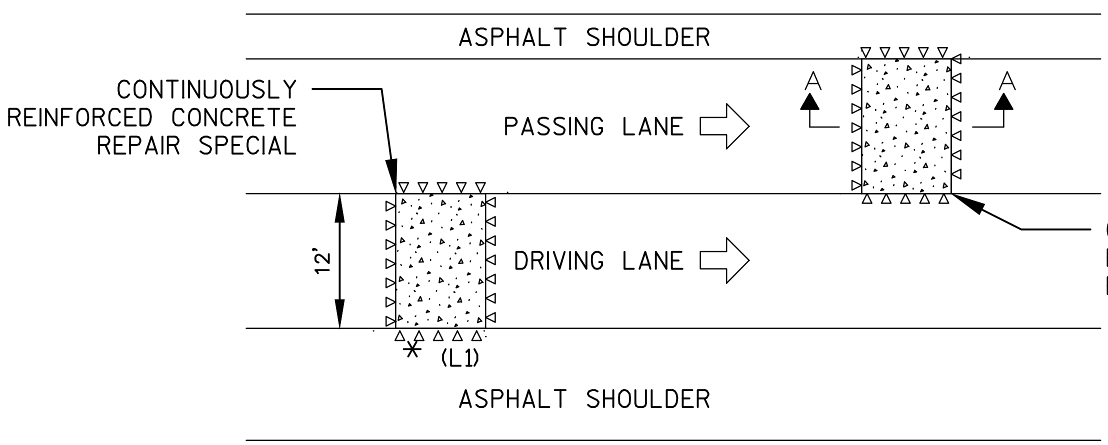


PAID FOR AS "REMOVING ASPHALTIC SURFACE BUTT JOINTS"

MILL AND REMOVE 3.0" OF EXISITING SURFACE, EXCEPT IN TRANSITION AREA.
MILL AND REMOVE 1.25" TO 3.0" OF EXISTING SURFACE IN TRANSITION AREA.
OVERLAY 1.25" HMA PAVEMENT 5 HT 58–34 H (LOWER LAYER)
(NOTE: WIDTH OF JOINT EXTENDS ACROSS MAINLINE AND INSIDE SHOULDERS.)

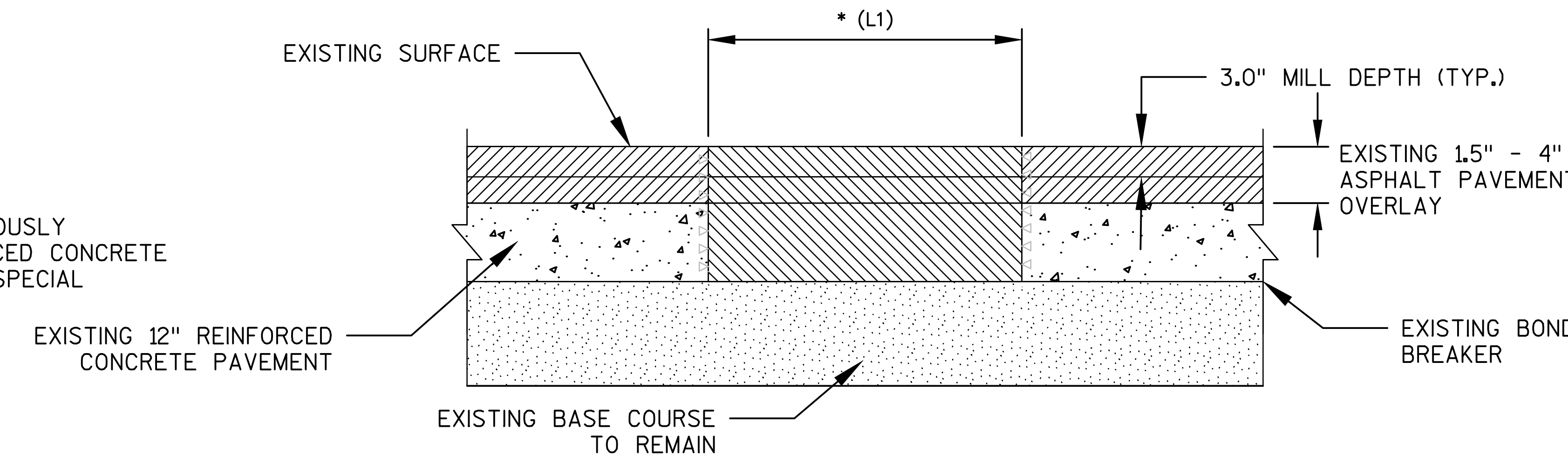
REMOVING ASPHALTIC SURFACE BUTT JOINT DETAIL

REQUIRED AT BEGIN AND END CONSTRUCTION LIMITS, BRIDGES AND RAMPS PRIOR TO OPENING TO TRAFFIC. EXACT LOCATIONS AND DIMENSIONS TO BE VERIFIED BY THE ENGINEER IN THE FIELD.



PLAN VIEW

* (L1) = 4' - 8' TYP. OR AS DIRECTED BY THE ENGINEER.



SECTION A–A

REMOVING ASPHALTIC SURFACE MILLING

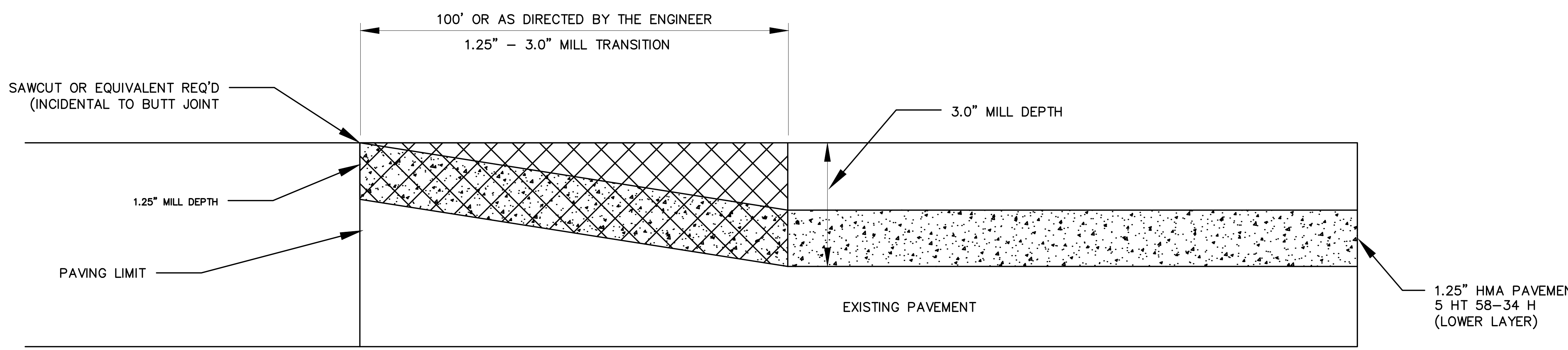
CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL

SAWING CONCRETE

NOTES:
CONSTRUCTION CONTINUOUSLY REINFORCED CONCRETE REPAIR PRIOR TO HMA MILL & OVERLAY.
THICKNESS OF CONCRETE REPAIR MAY VARY. 16" AVERAGE THICKNESS IS EXPECTED.
DAMAGE TO EITHER EXISTING PAVEMENTS OR EXISTING SHOULDER SHALL BE REPAIRED AS DIRECTED BY THE ENGINEER AND WILL BE INCIDENTAL TO THE ITEMS OF "CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL."
SAWING THROUGH EXISTING ASPHALT PAVEMENT OVERLAY WILL BE INCIDENTAL TO THE ITEM OF "SAWING CONCRETE."

CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL DETAIL

LOCATIONS DETERMINED IN THE FIELD BY THE ENGINEER.



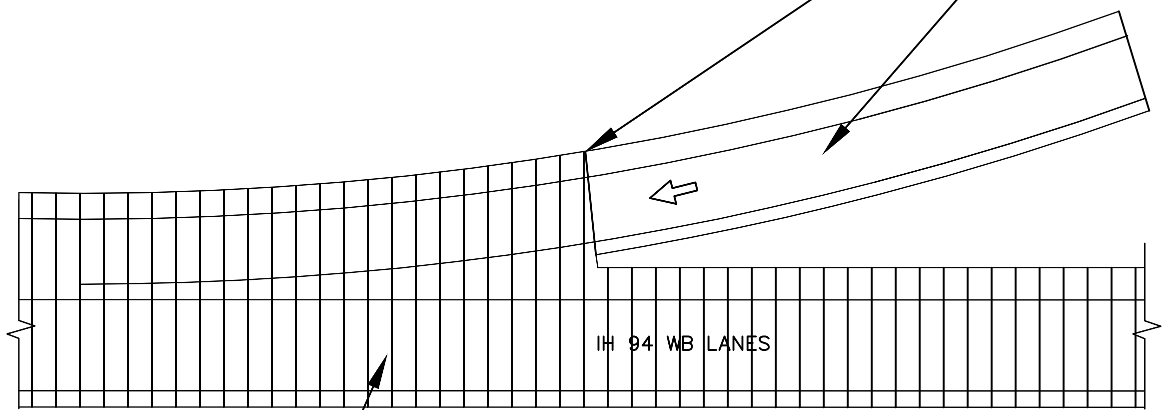
PAID FOR AS "REMOVING ASPHALTIC SURFACE BUTT JOINTS"

MILL AND REMOVE 3.0" OF EXISITING SURFACE, EXCEPT IN TRANSITION AREA.
MILL AND REMOVE 1.25" TO 3.0" OF EXISTING SURFACE IN TRANSITION AREA.
OVERLAY 1.25" HMA PAVEMENT 5 HT 58–34 H (LOWER LAYER)
(NOTE: WIDTH OF JOINT EXTENDS ACROSS MAINLINE AND INSIDE SHOULDERS.)

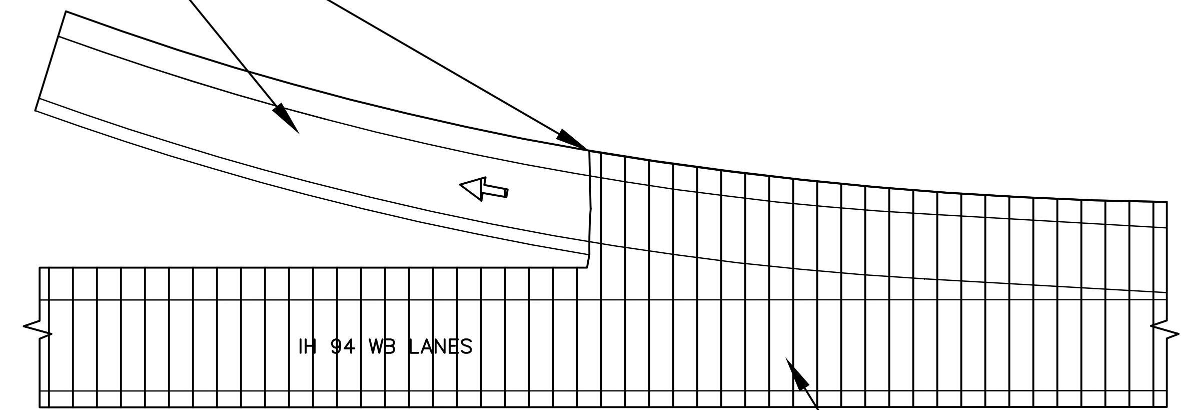
REMOVING ASPHALTIC SURFACE BUTT JOINT DETAIL

REQUIRED AT BEGIN AND END CONSTRUCTION LIMITS, BRIDGES AND RAMPS PRIOR TO OPENING TO TRAFFIC. EXACT LOCATIONS AND DIMENSIONS TO BE VERIFIED BY THE ENGINEER IN THE FIELD.

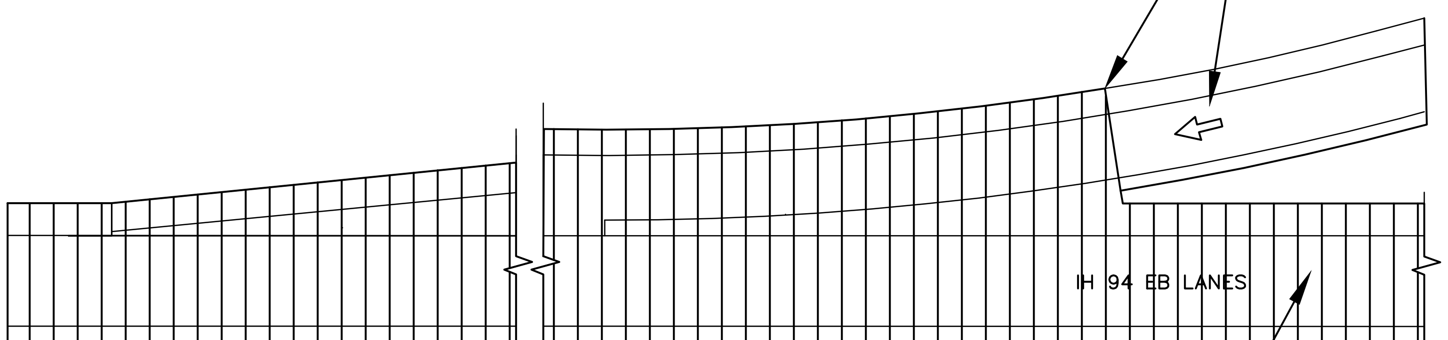
2



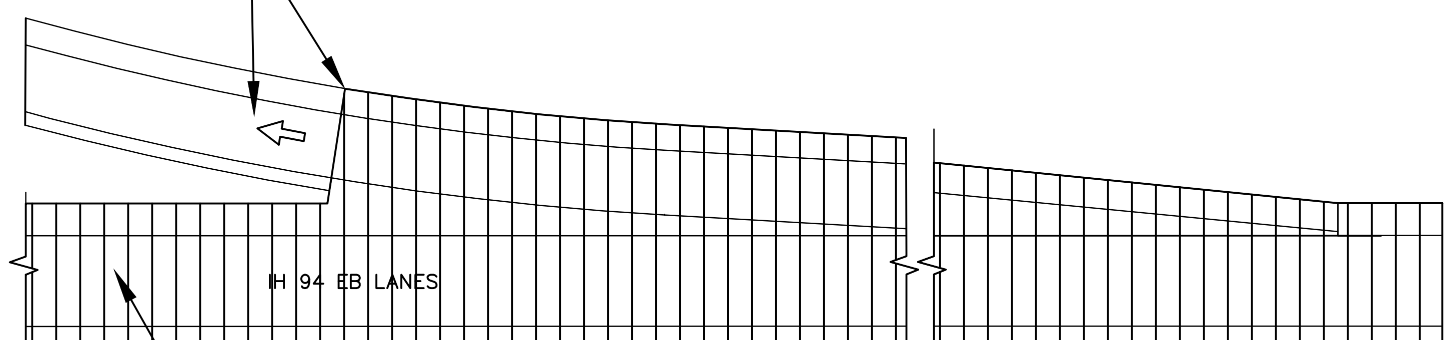
ENTRANCE RAMP DETAIL
STH 95 WB INTERCHANGE



EXIT RAMP DETAIL
STH 95 WB INTERCHANGE



ENTRANCE RAMP DETAIL
STH 95 EB INTERCHANGE

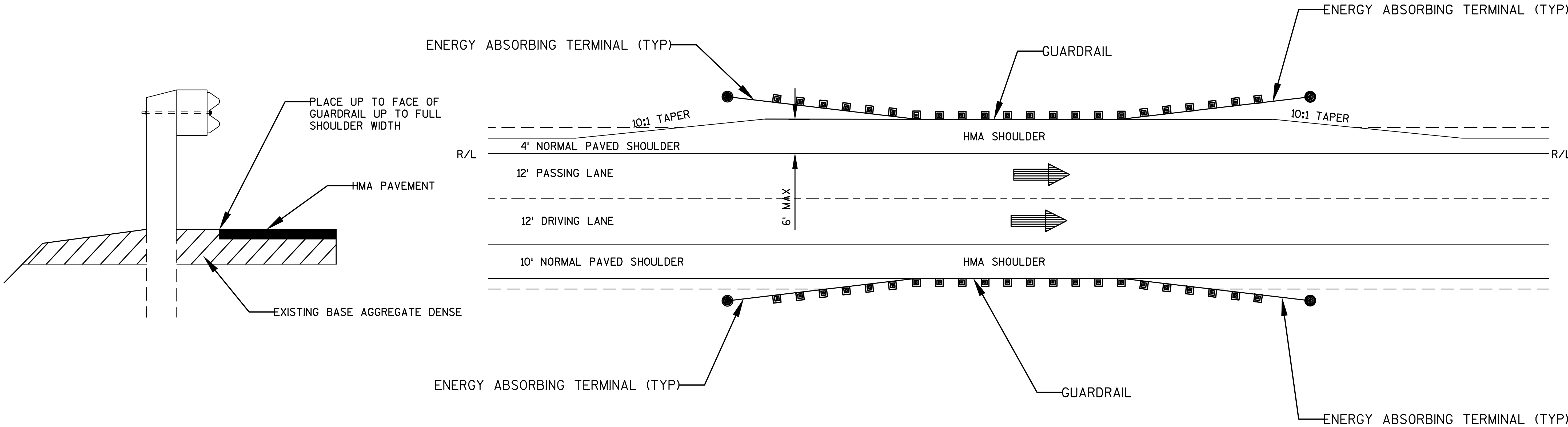


EXIT RAMP DETAIL
STH 95 EB INTERCHANGE

AREAS TO BE MILLED AND OVERLAID

PAVING LIMITS AT RAMPS DETAILS
STH 95 INTERCHANGE

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CONSTRUCTION DETAILS	SHEET 11	E

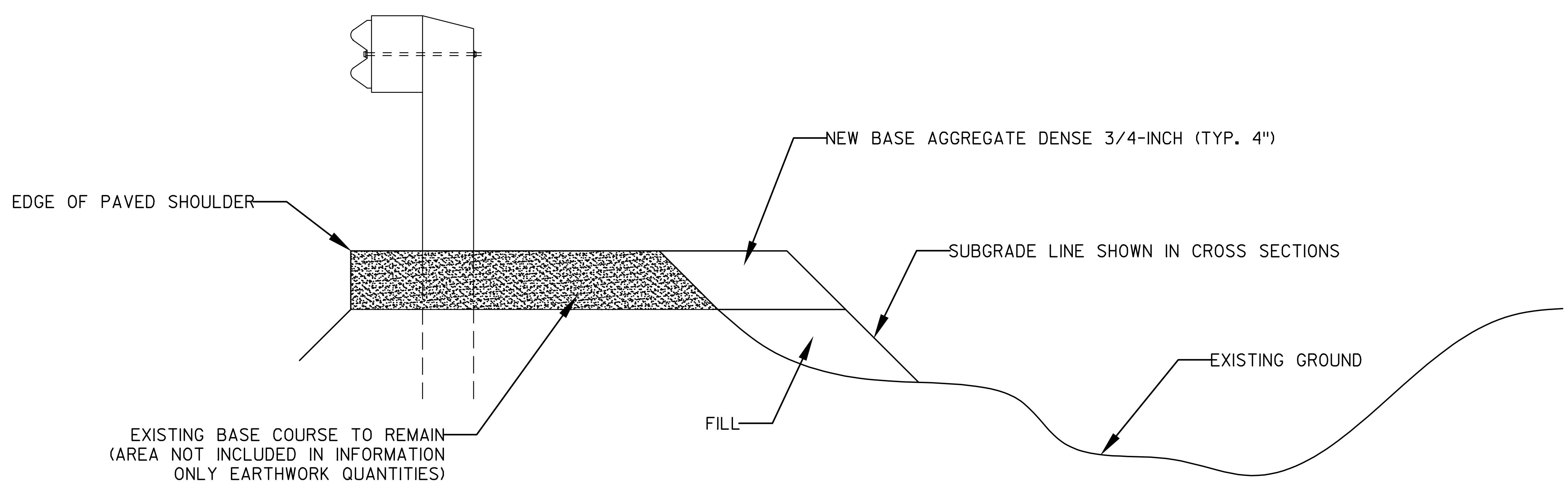


PAVED SHOULDER AT GUARDRAIL DETAIL

NOTES:

GUARDRAIL INSTALLATION LOCATION TO BE MEASURED FROM EXISTING EDGE OF PAVEMENT.

ANY CUT AND FILL REQUIRED IS INCIDENTAL TO THE BARRIER SYSTEM GRADING SHAPING FINISHING ITEM.

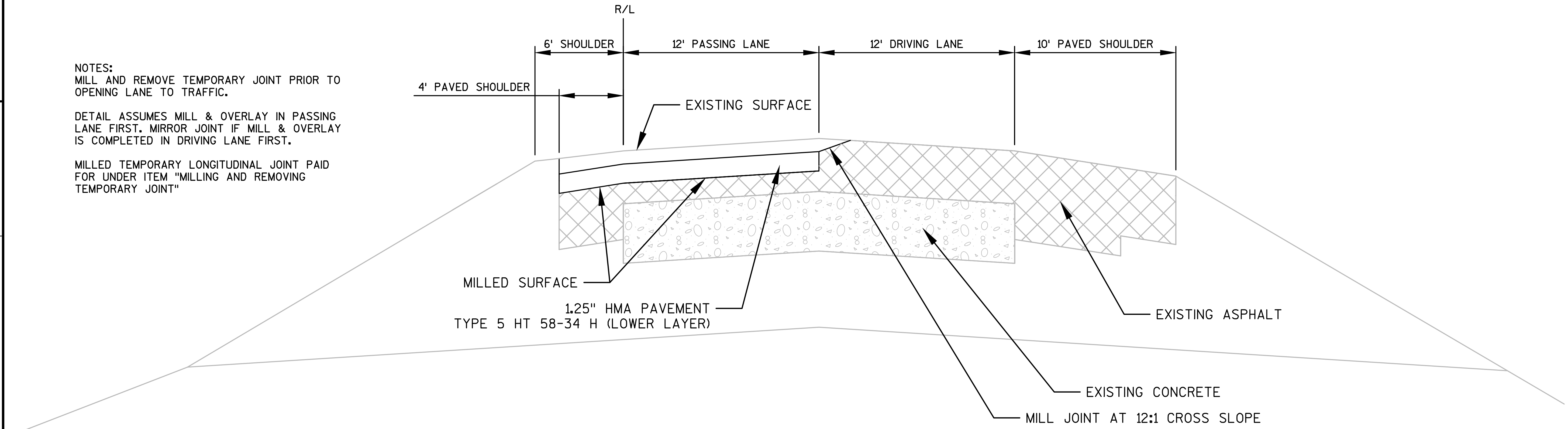


SHOULDER WIDENING EARTHWORK & BASE AGGREGATE FOR GUARDRAIL DETAIL

NOTES:
MILL AND REMOVE TEMPORARY JOINT PRIOR TO OPENING LANE TO TRAFFIC.

DETAIL ASSUMES MILL & OVERLAY IN PASSING LANE FIRST. MIRROR JOINT IF MILL & OVERLAY IS COMPLETED IN DRIVING LANE FIRST.

MILLED TEMPORARY LONGITUDINAL JOINT PAID FOR UNDER ITEM "MILLING AND REMOVING TEMPORARY JOINT"



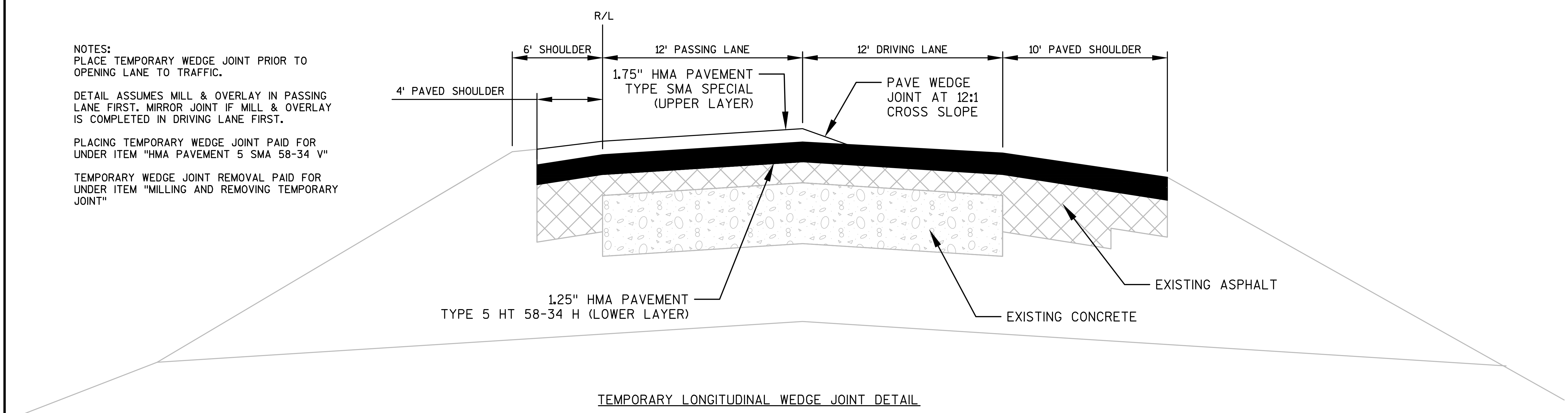
MILLED TEMPORARY LONGITUDINAL JOINT DETAIL

NOTES:
PLACE TEMPORARY WEDGE JOINT PRIOR TO OPENING LANE TO TRAFFIC.

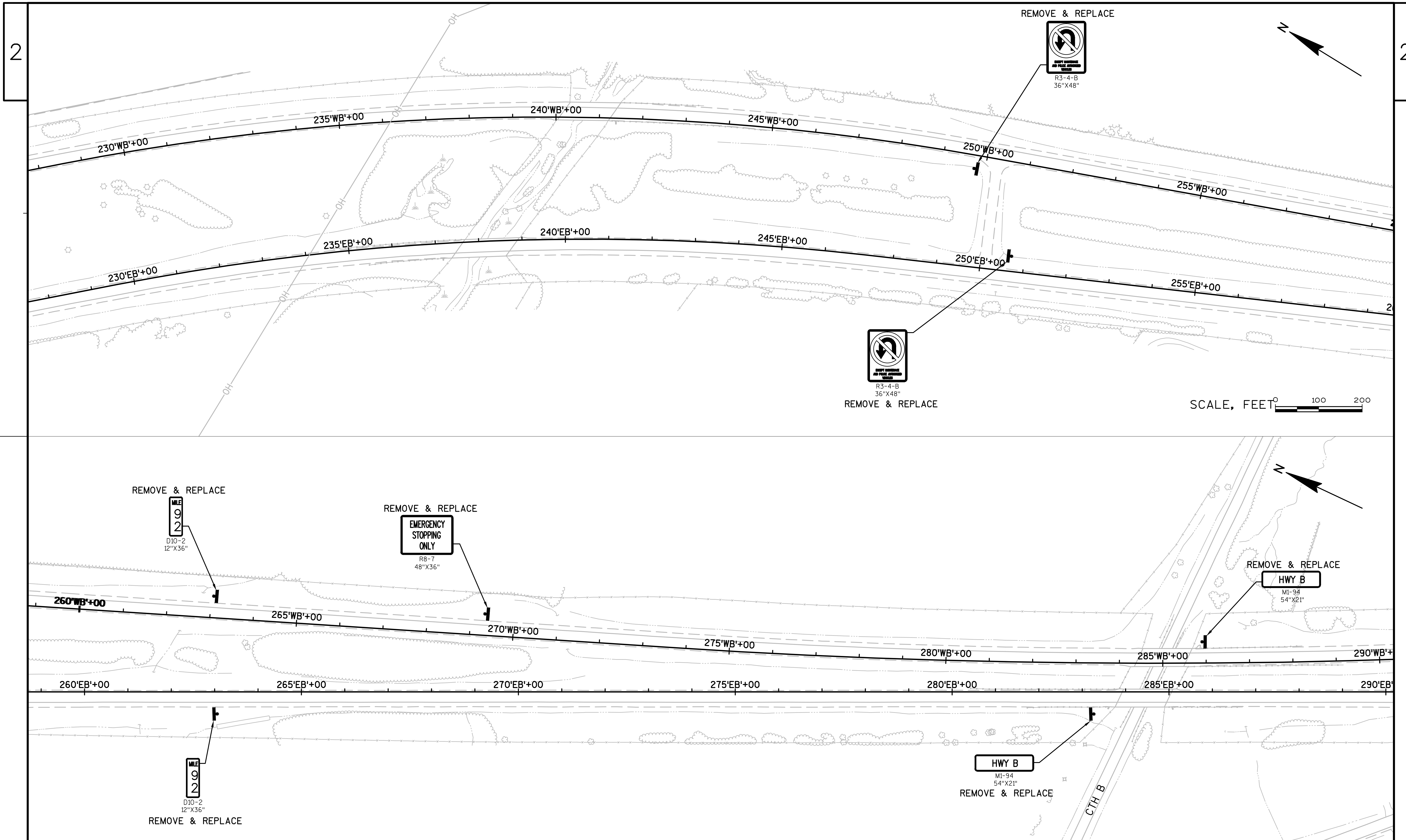
DETAIL ASSUMES MILL & OVERLAY IN PASSING LANE FIRST. MIRROR JOINT IF MILL & OVERLAY IS COMPLETED IN DRIVING LANE FIRST.

PLACING TEMPORARY WEDGE JOINT PAID FOR UNDER ITEM "HMA PAVEMENT 5 SMA 58-34 V"

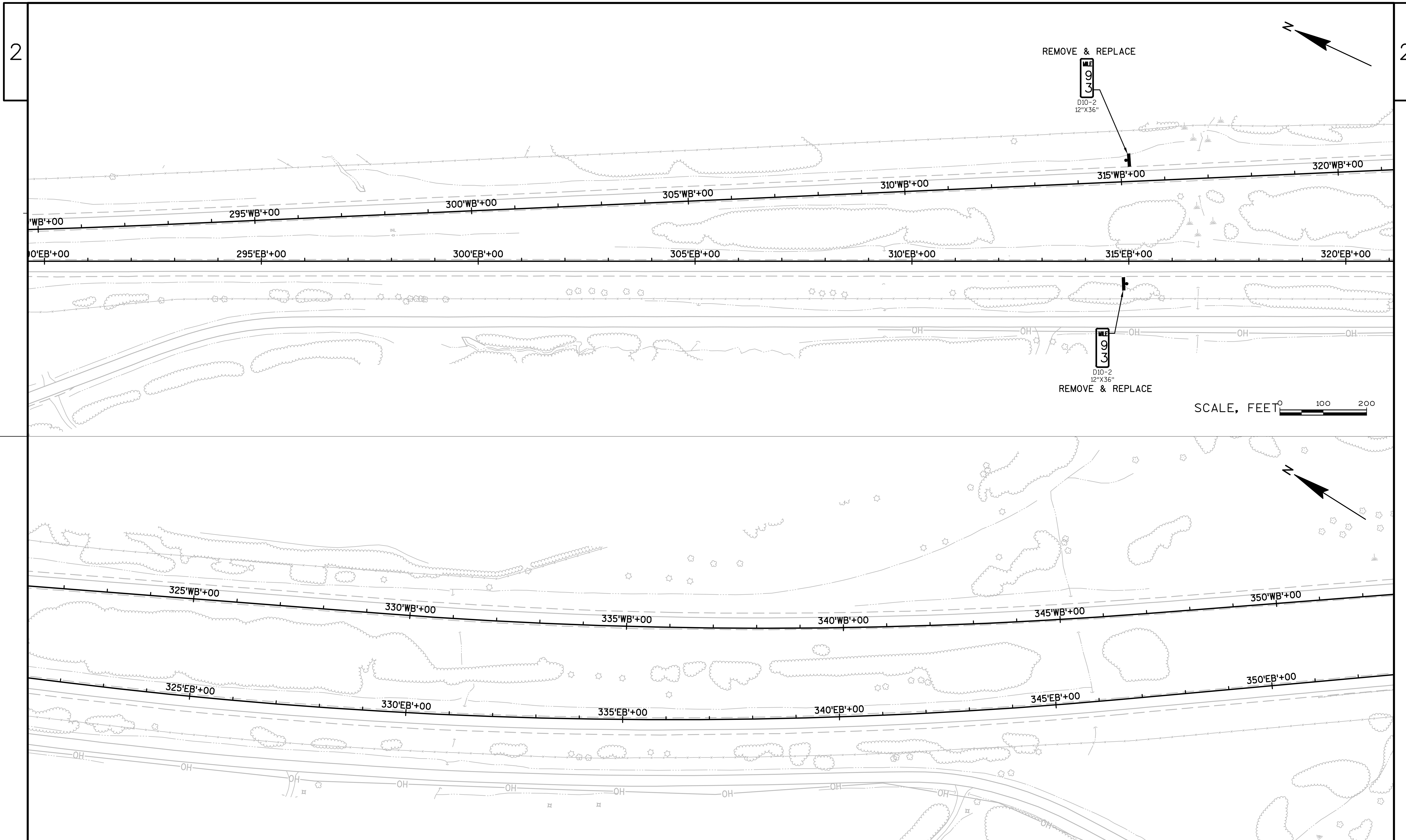
TEMPORARY WEDGE JOINT REMOVAL PAID FOR UNDER ITEM "MILLING AND REMOVING TEMPORARY JOINT"



TEMPORARY LONGITUDINAL WEDGE JOINT DETAIL

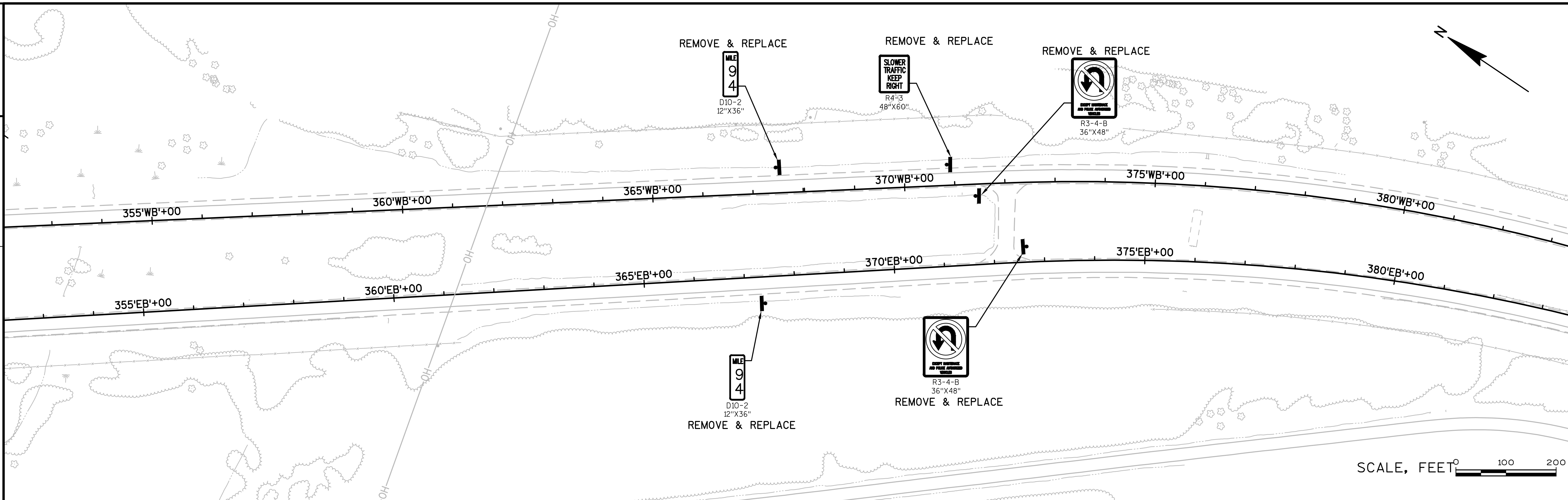


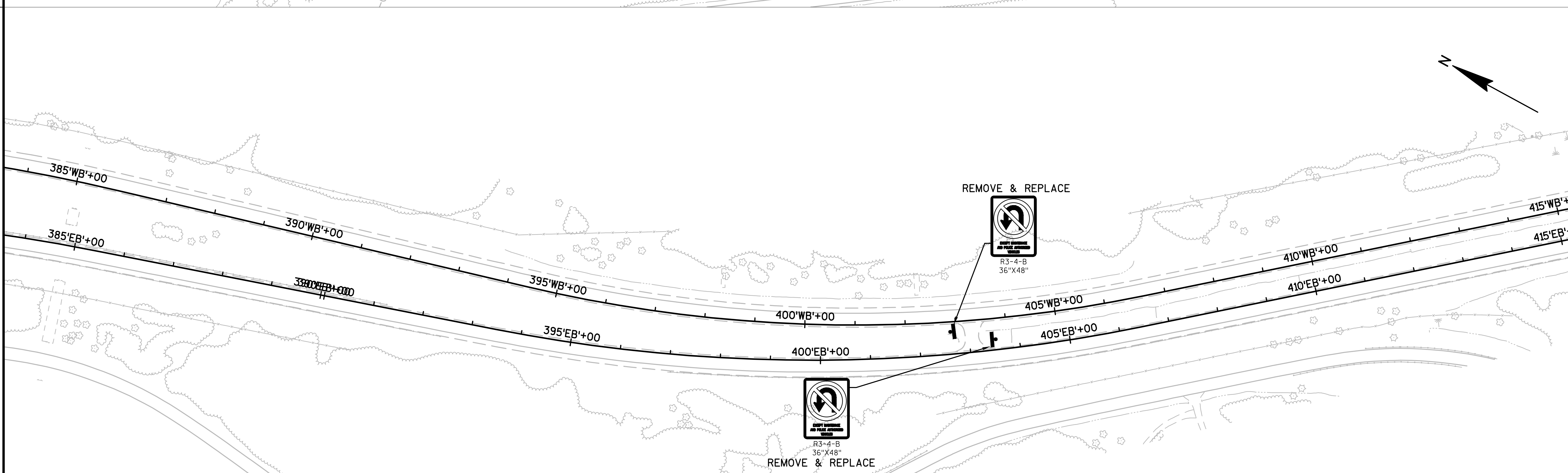
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 14	E



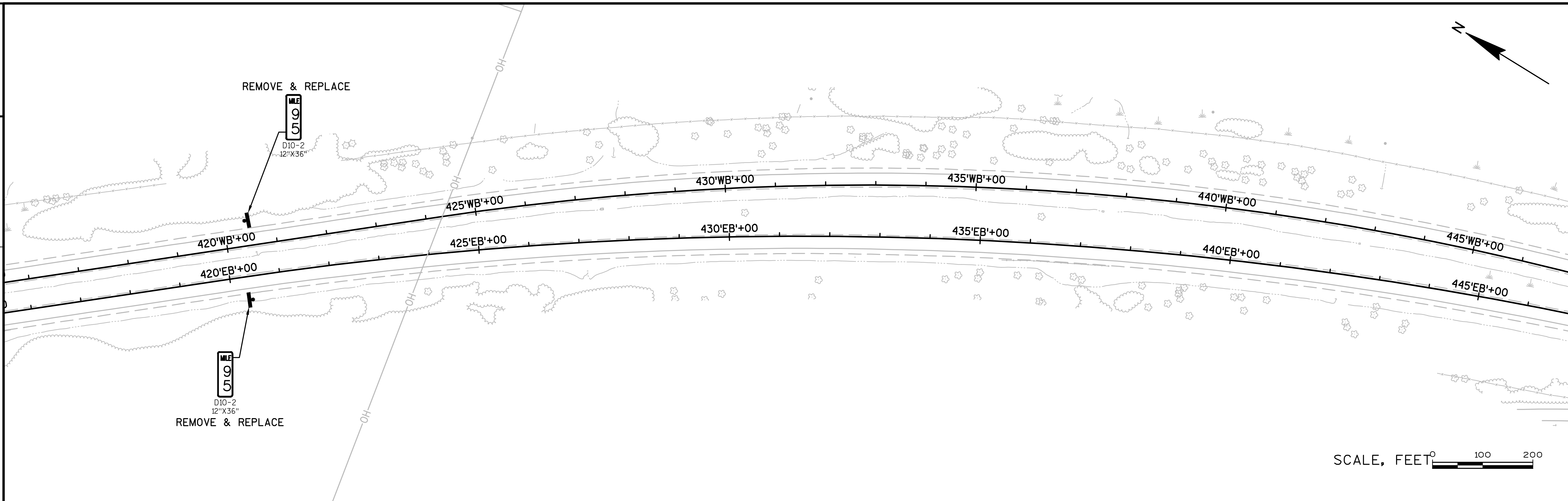
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	PERMANENT SIGNING	SHEET 15	E

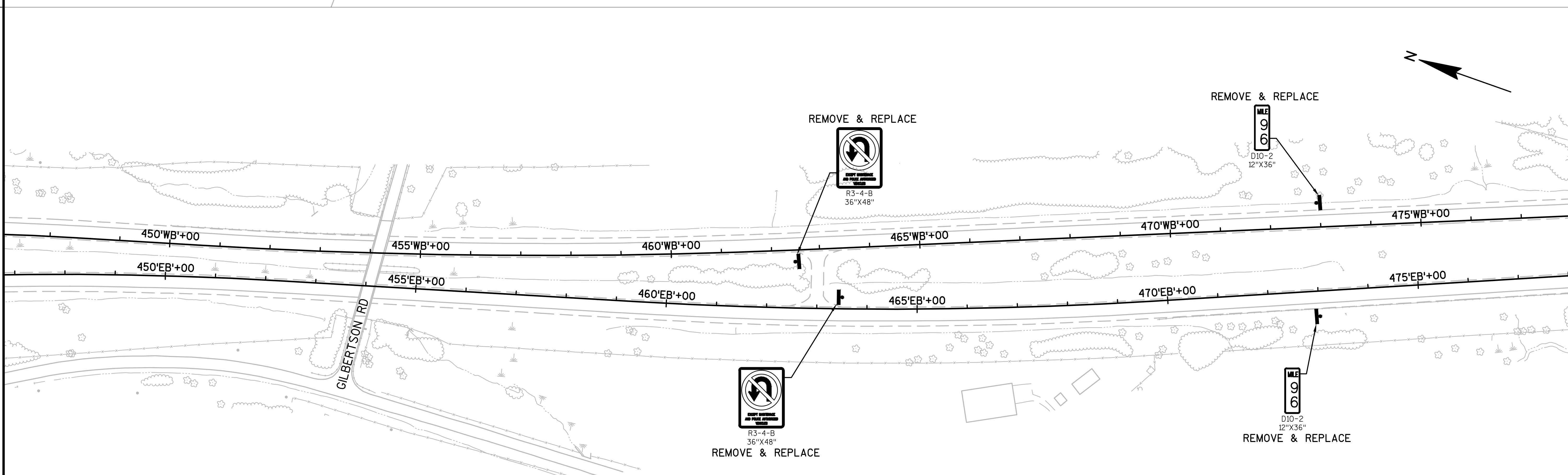
FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME - 050202
PLOT DATE : 3/11/2016 10:31 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : ===========
WISDOT/CADDS SHEET 42





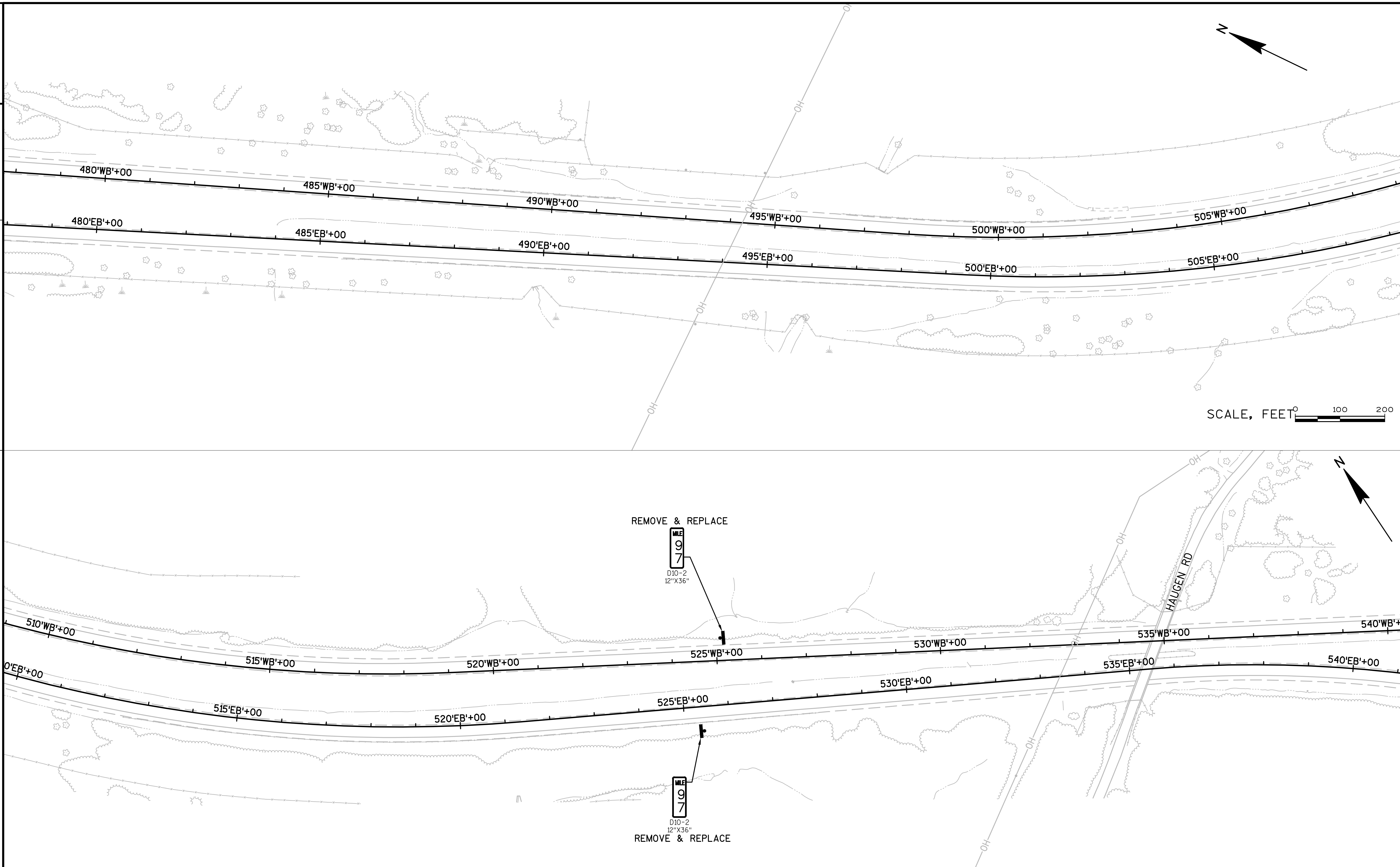
PROJECT NO:1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 16	E





PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	PERMANENT SIGNING	SHEET 17	E

2



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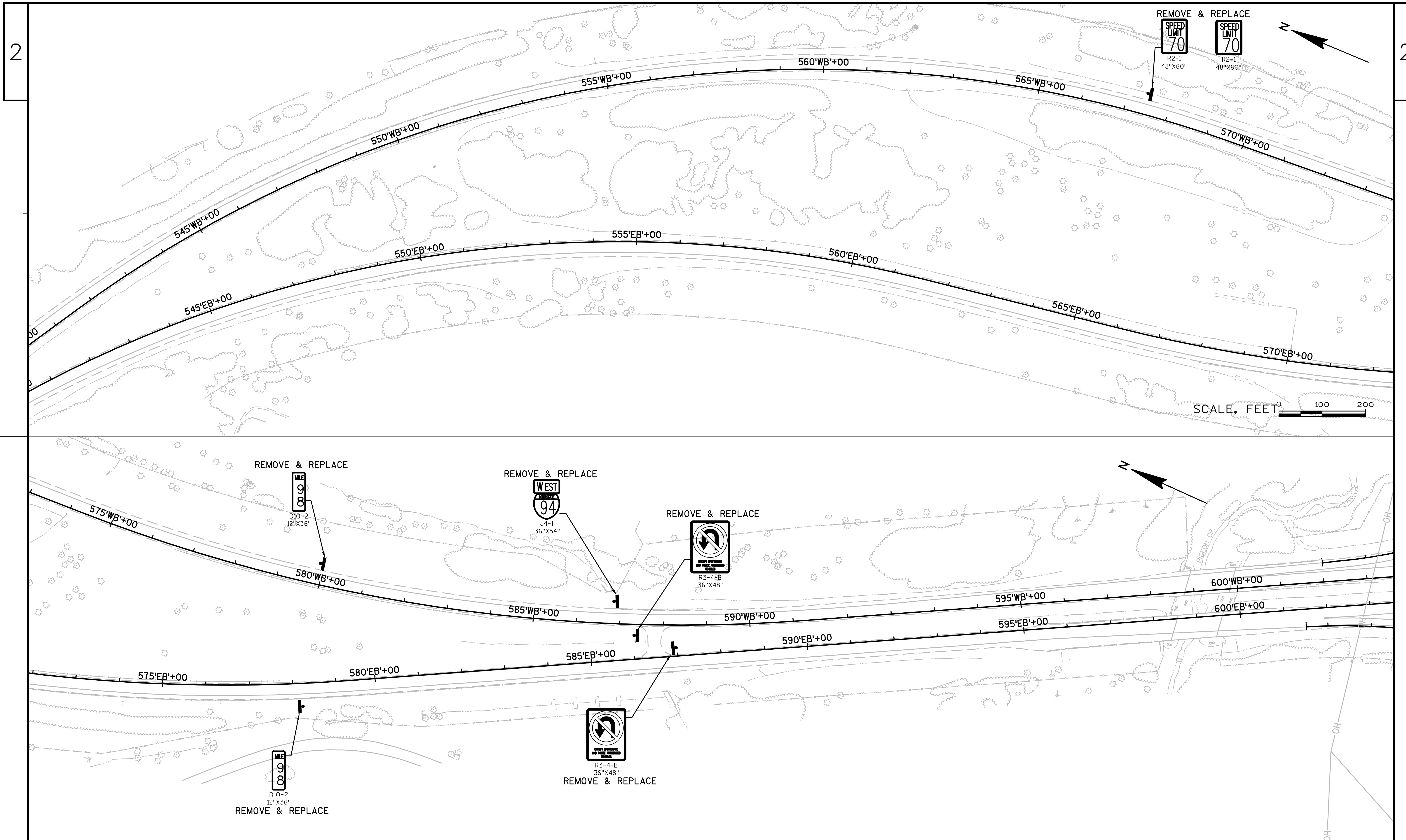
PROJECT NO:1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME - 050205
PLOT DATE : 3/11/2016 10:31 AM
PLOT BY : BECKLIN, MATTHEW R PLOT NAME :
PLOT SCALE : ===========
WISDOT/CADDS SHEET 42



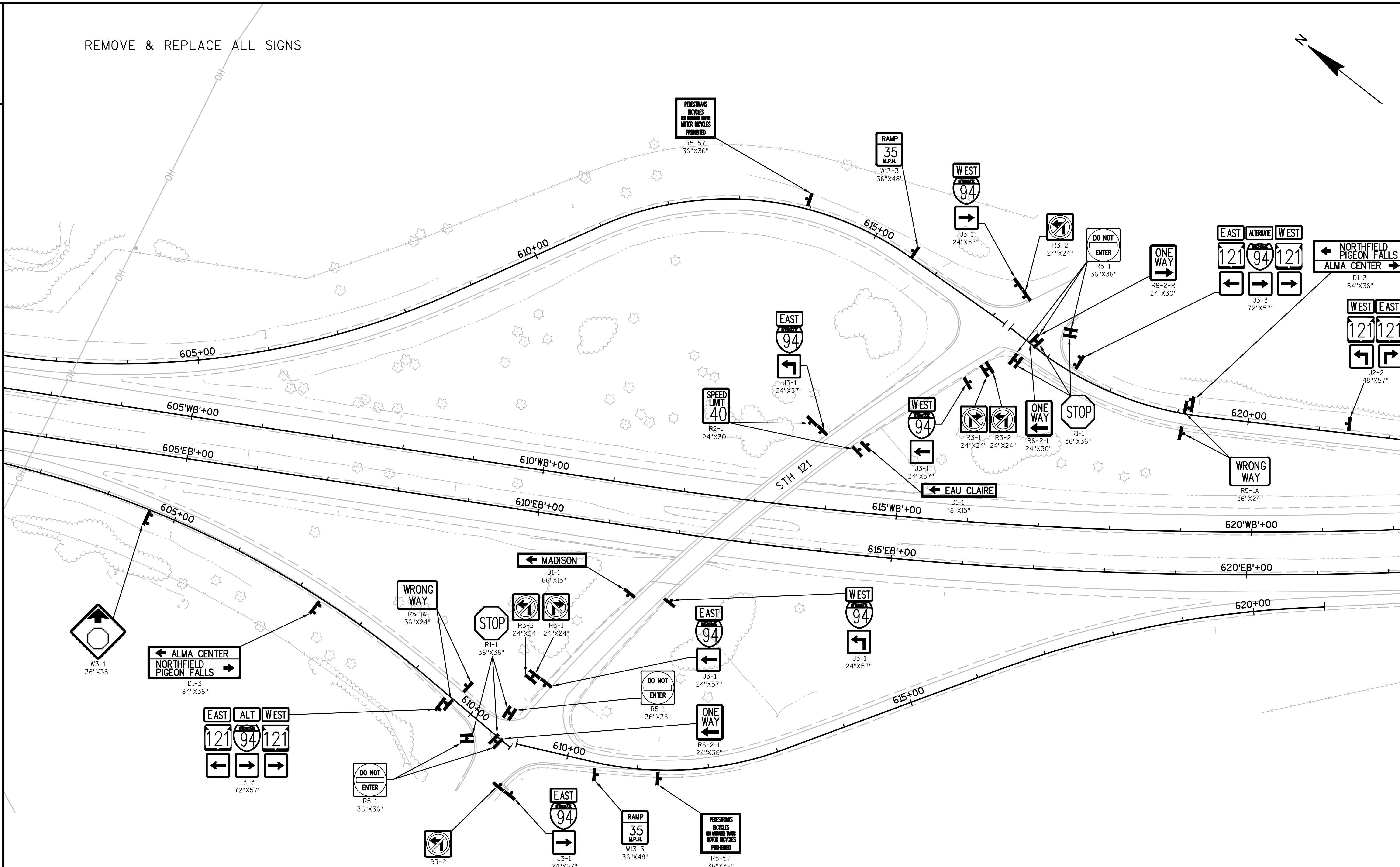
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 19	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME – 050206

PLOT DATE : 3/11/2016 10:32 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : ===========

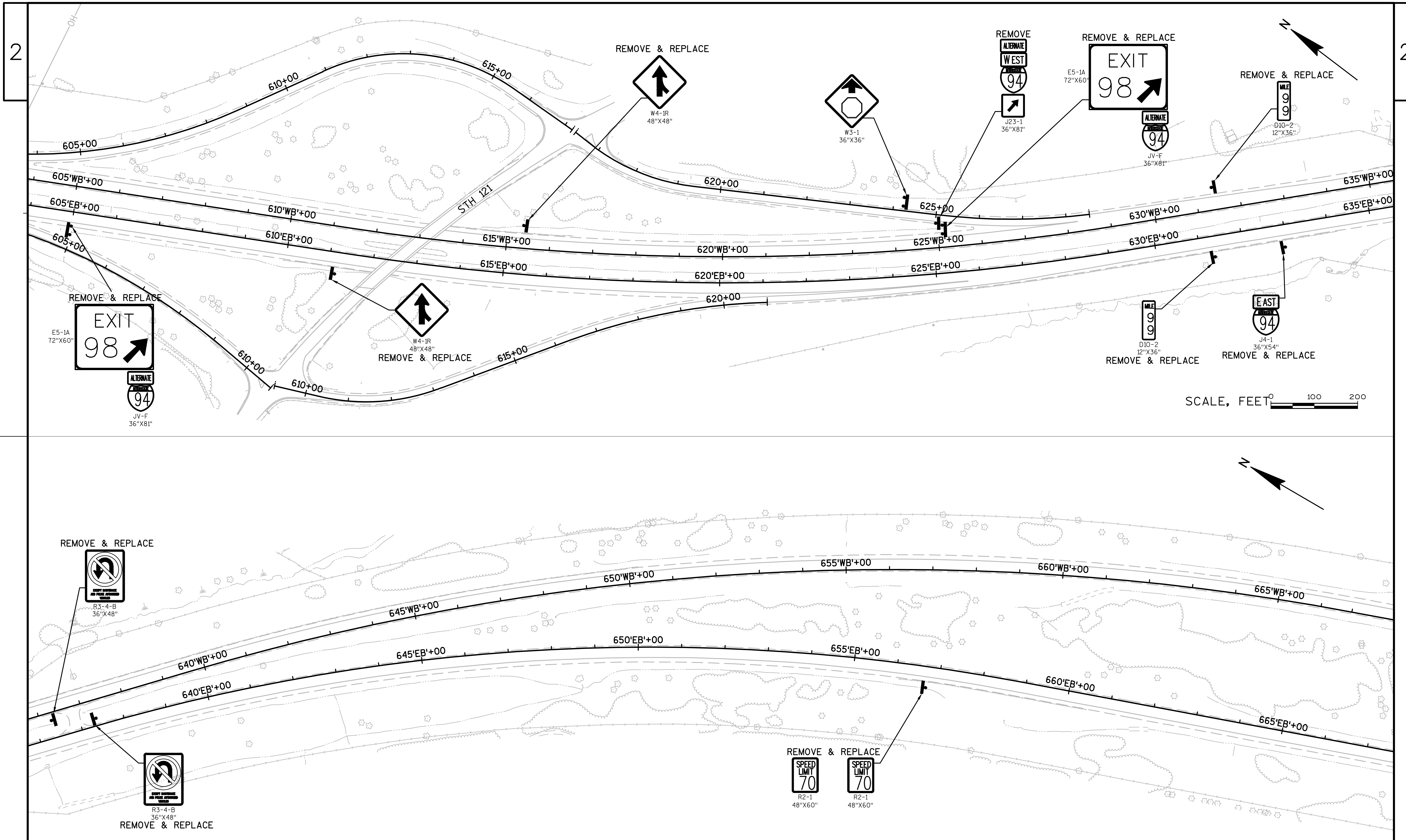
WISDOT/CADDS SHEET 42

REMOVE & REPLACE ALL SIGNS



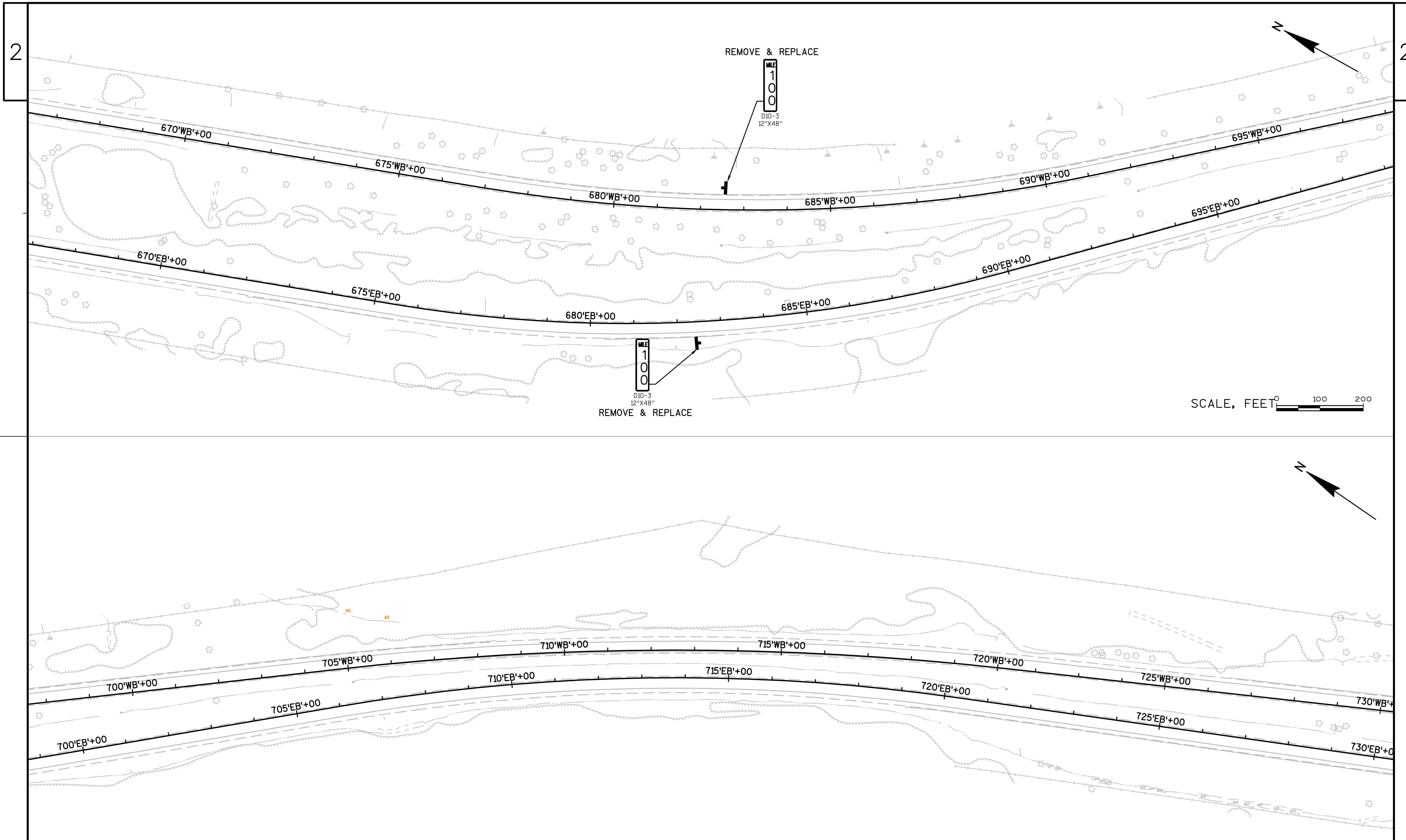
PROJECT NO:1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 20	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME - 050207
PLOT DATE : 3/11/2016 10:32 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : ==========
WISDOT/CADDS SHEET 42



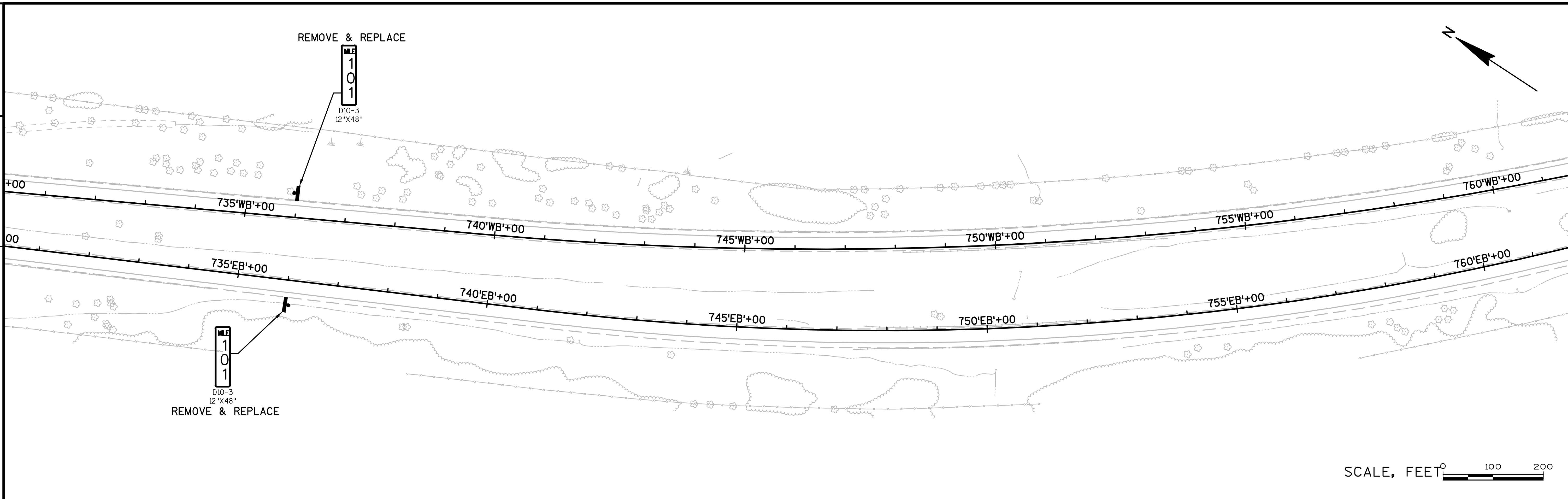
PROJECT NO:1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 21	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME - 050207
PLOT DATE : 3/11/2016 10:32 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : ==========
WISDOT/CADDS SHEET 42



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 22	E

2



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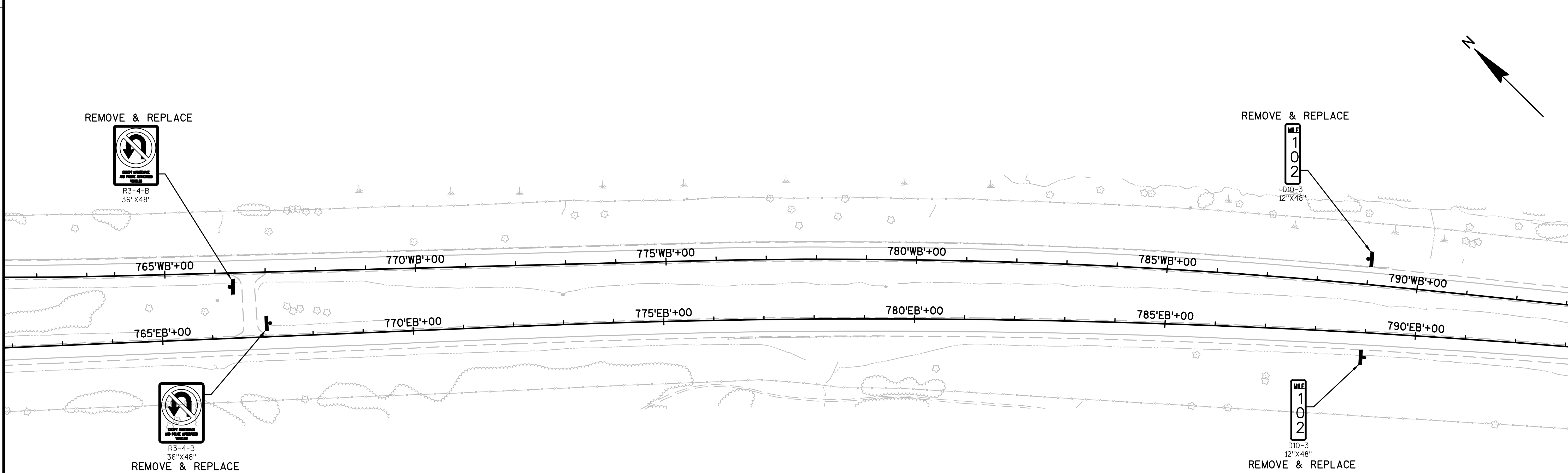
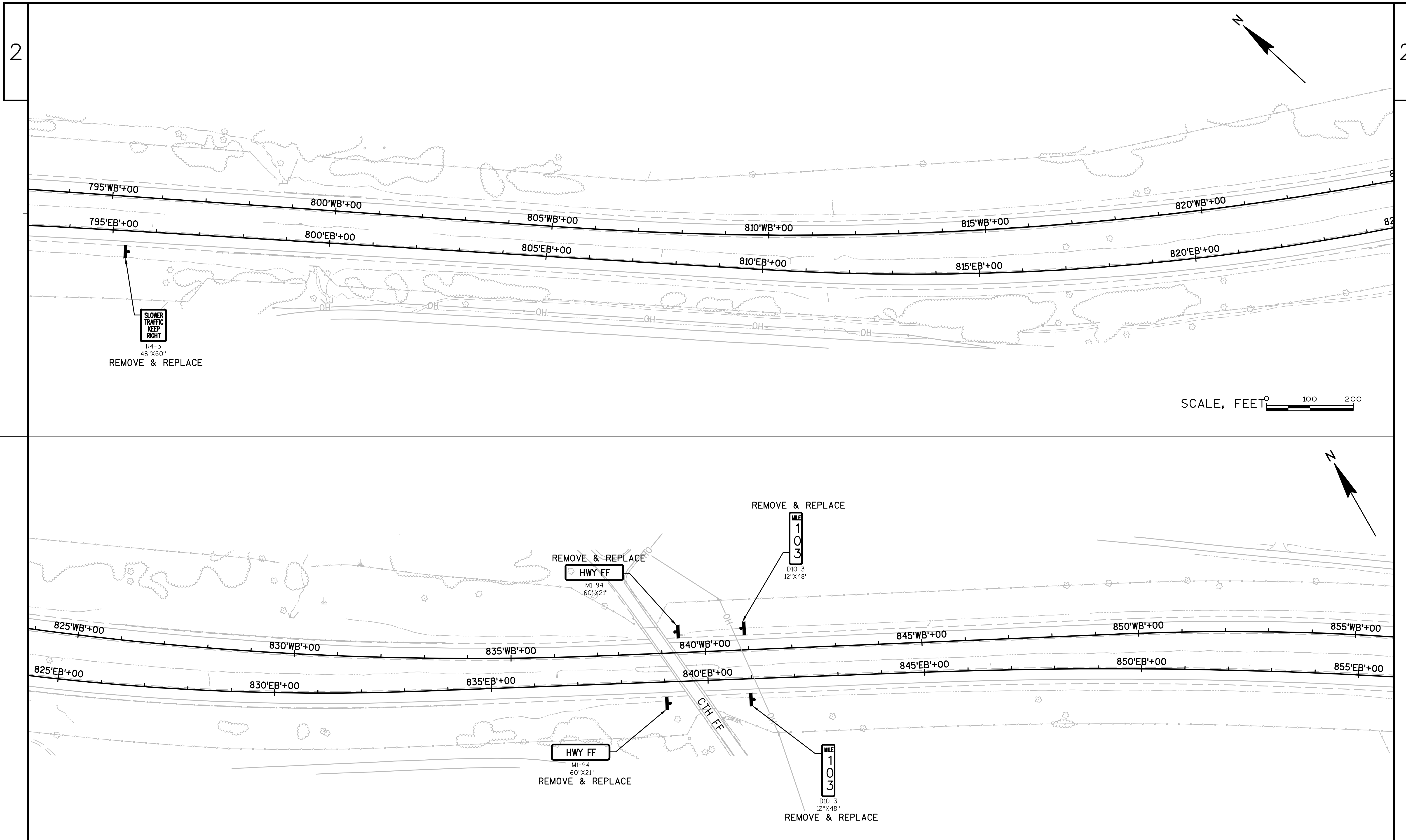


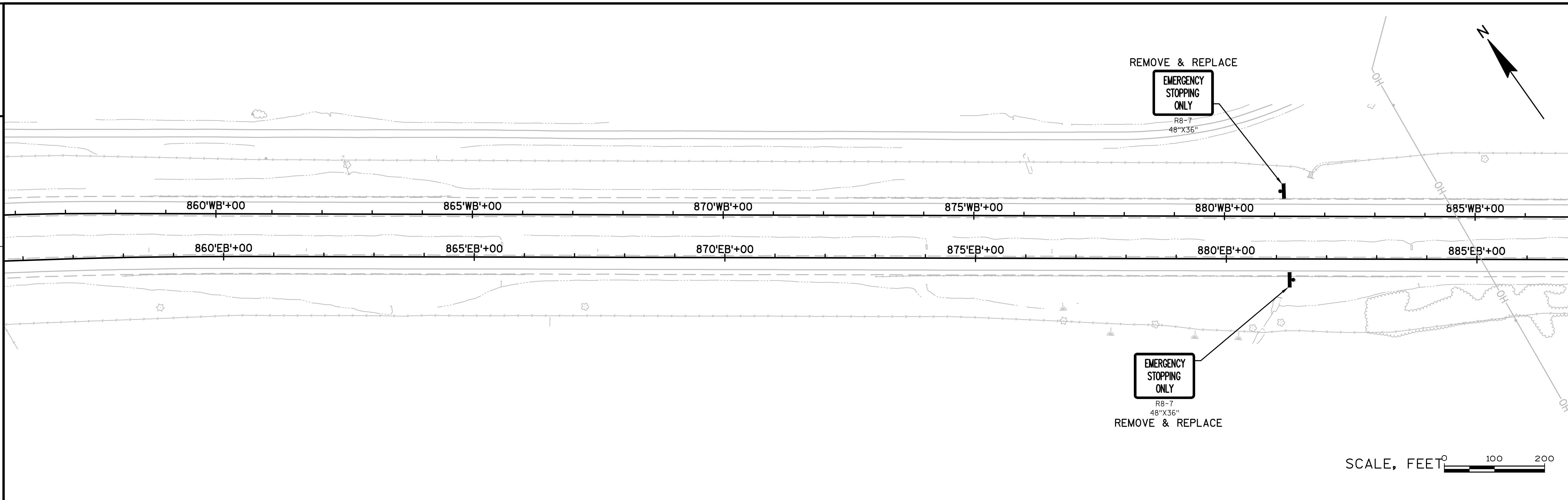
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	PERMANENT SIGNING	SHEET 23	E

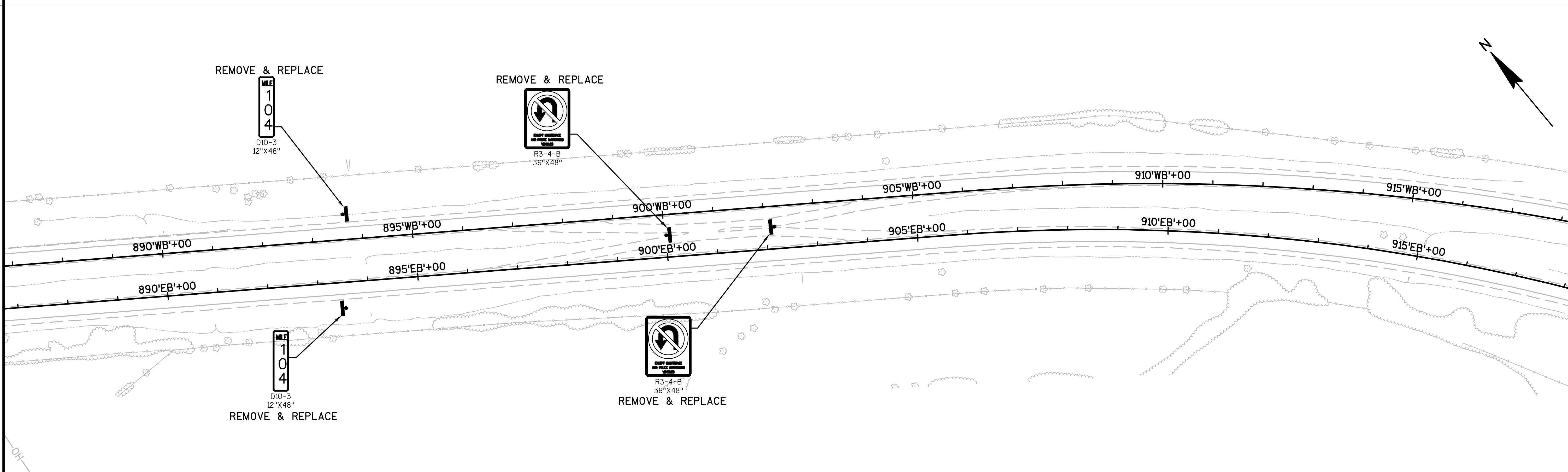
FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME - 050209
PLOT DATE : 3/11/2016 10:32 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : ===========
WISDOT/CADDS SHEET 42



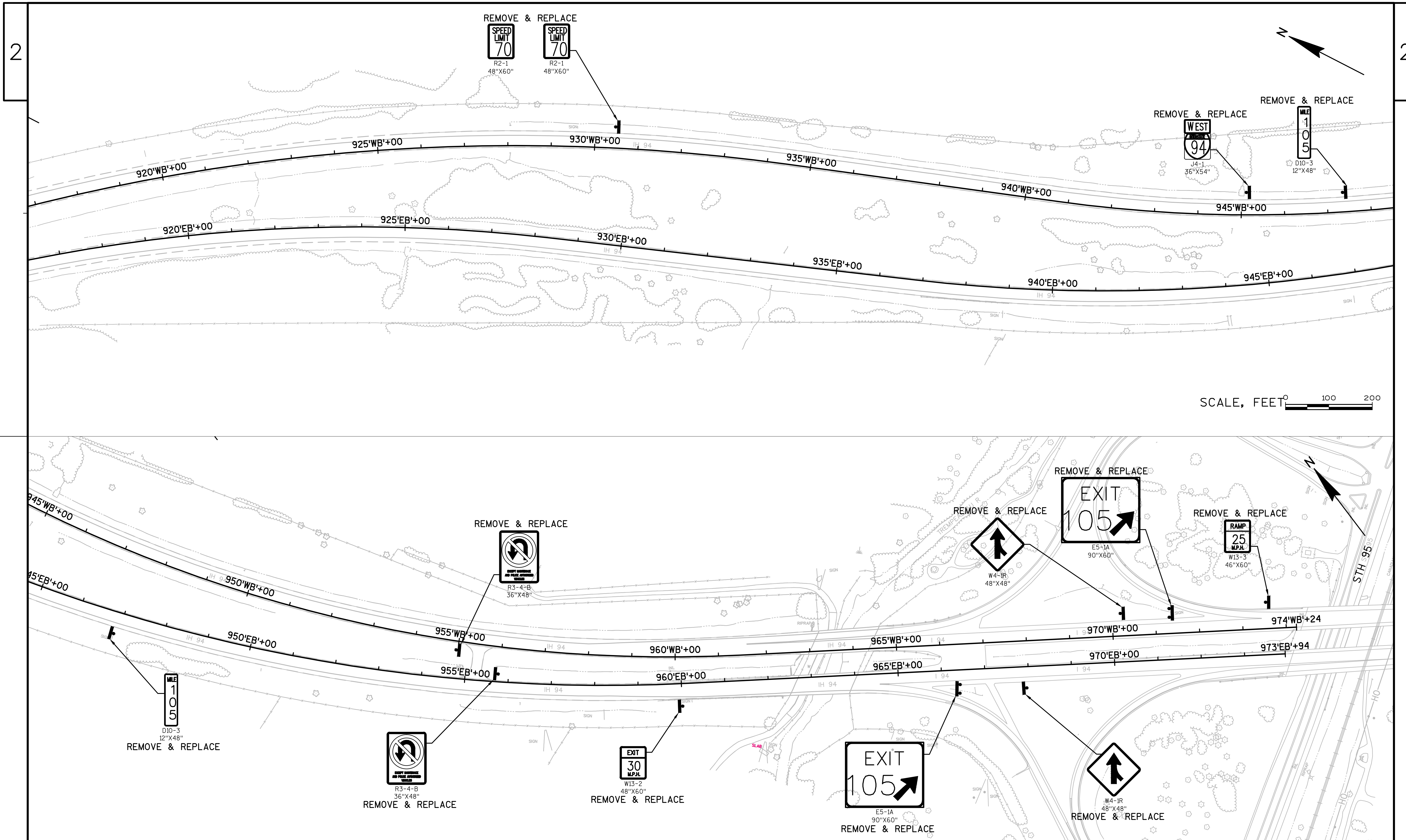
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 24	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME – 050210
PLOT DATE : 3/11/2016 10:32 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : ===========
WISDOT/CADDS SHEET 42





PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 25	E



PROJECT NO:1023-02-76	HWY: IH 94	COUNTY: JACKSON	PERMANENT SIGNING	SHEET 26	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\023201_PS.DWG
LAYOUT NAME - 050212
PLOT DATE : 3/11/2016 10:33 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : ===========
WISDOT/CADDS SHEET 42

LEGEND

- POST WITH ATTACHED SIGN
- DIRECTION OF TRAFFIC
- WORK ZONE
- MB PORTABLE CHANGEABLE MESSAGE SIGN REMOTE CONTROL SEE ALT. ROUTE DETAIL FOR LOCATION
- * A SPEED LIMIT SIGN SHALL BE LOCATED 1500 FEET BEYOND THE END OF THE ACCELERATION LANE OF EACH ENTRANCE RAMP. THERE SHALL BE A SPEED LIMIT SIGN INCORPORATED A MINIMUM OF EVERY 2 TO 3 MILES WITHIN THE LANE CLOSURE.
- ** SEE SDD 15D12-5B FOR TRAFFIC CONTROL LOCATED WITHIN THE TRANSITION AREA, BUFFER SPACE AND WORK SPACE (WORK AREA)

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

THE SPACING BETWEEN SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND TO PROVIDE A MINIMUM OF 200 FEET (500 FEET DESIREABLE) DISTANCE TO EXISTING SIGNS.

TRAFFIC CONTROL SHOWN IS FOR LANE CLOSURES IN ONE DIRECTION AT ANY GIVEN TIME. IMPLEMENT TRAFFIC CONTROL IN BOTH DIRECTIONS IF LANE CLOSURES ARE IMPLEMENTED FOR BOTH DIRECTIONS.

COORDINATE LOCATIONS OF LANE CLOSURES/SPEED REDUCTION ADVANCED SIGNING WITH DETAILS SHOWN ON ALTERNATE ROUTE DETAIL.

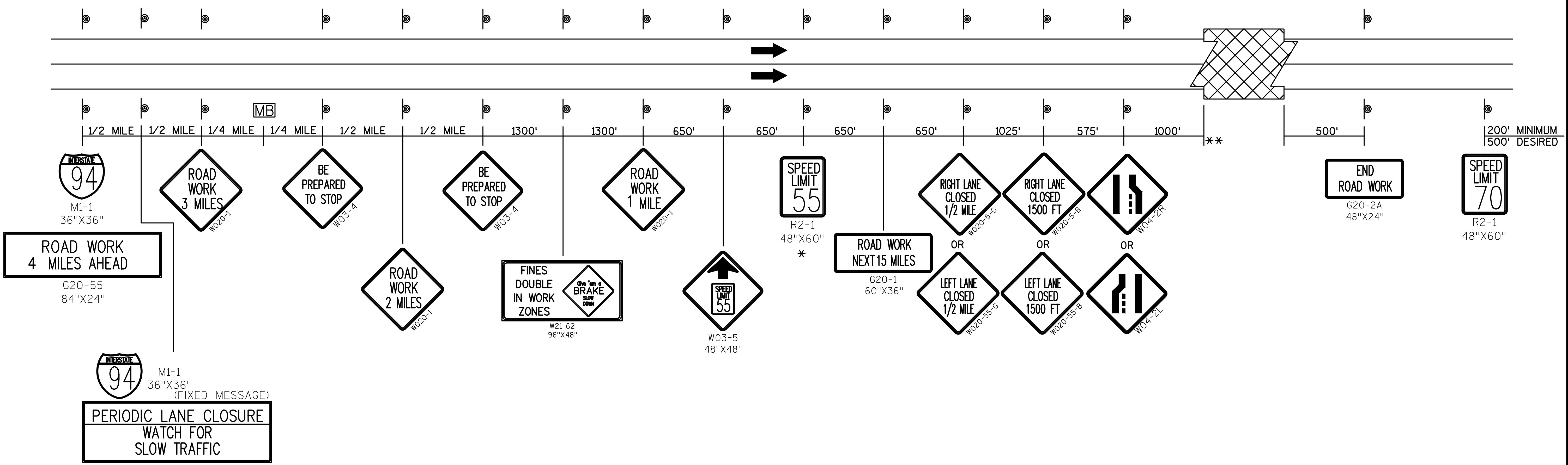
RETURN SPEED LIMIT TO 70 MPH AND COVER SIGNS DURING NON-WORKING HOURS.

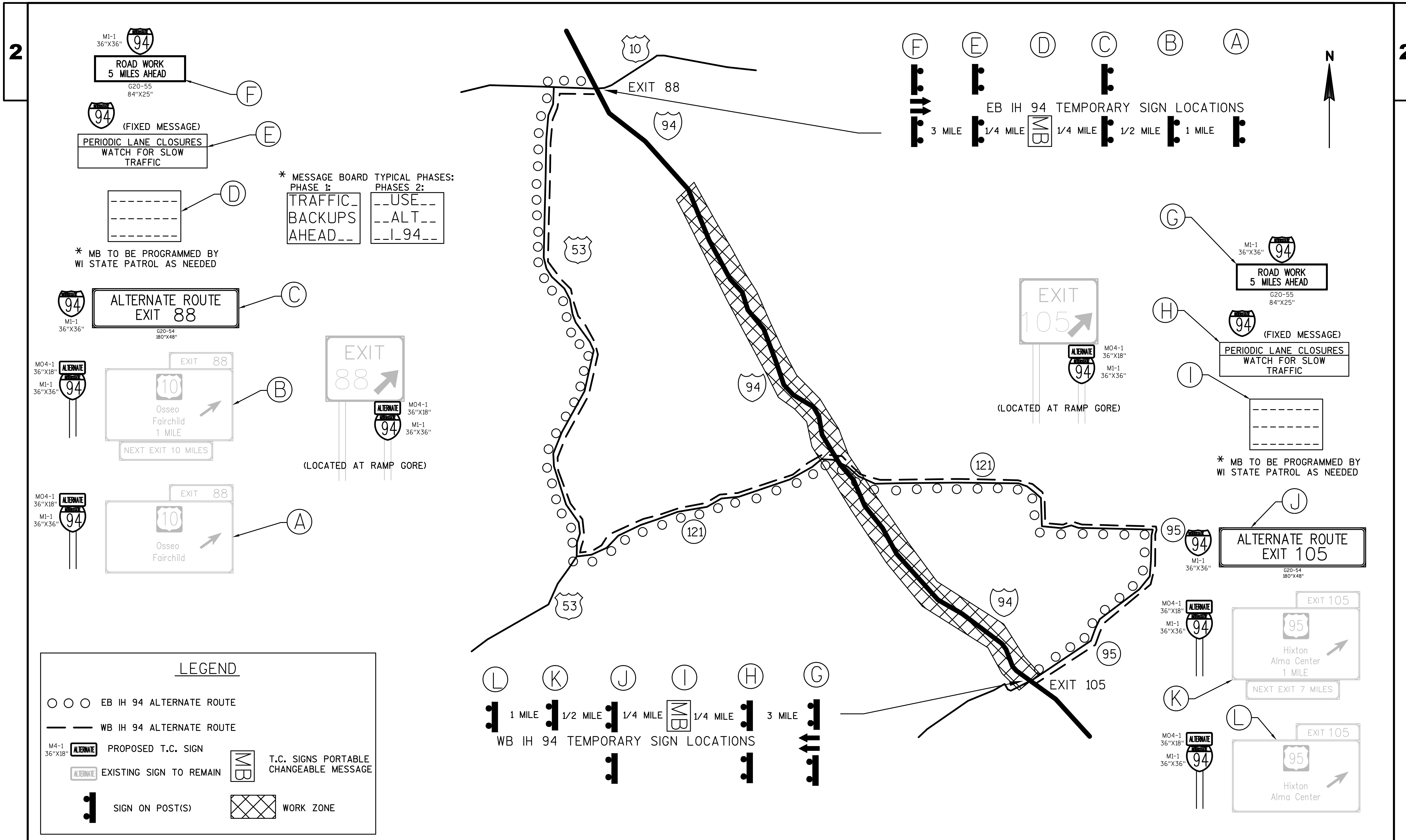
ALL SIGNS ARE 48"X48" UNLESS OTHERWISE NOTED.

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

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, NO WARNING LIGHTS SHALL BE WORKING ON "COVERED" OR "DOWNED" SIGNS.

FOR A LANE CLOSURE THAT IS IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS, THE ADVANCED WARNING SIGNS MAY BE MOUNTED ON PORTABLE SUPPORTS.





PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	TRAFFIC CONTROL ALTERNATE ROUTE	SHEET	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\025001_ALTROUTE.DWG
LAYOUT NAME - ####
PLOT DATE : 2/1/2016 9:15 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : Custom

DATE 11MAR16 E S T I M A T E O F Q U A N T I T I E S

3

LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1023-02-76 QUANTITY
0010	204.0115	Removing Asphaltic Surface Butt Joints	SY	8,808.000	8,808.000
0020	204.0120	Removing Asphaltic Surface Milling	SY	629,919.000	629,919.000
0030	204.0180	Removing Delineators and Markers	EACH	515.000	515.000
0040	208.0100	Borrow	CY	10.000	10.000
0050	213.0100	Finishing Roadway (project) 01. 1023-02-76	EACH	1.000	1.000
0060	305.0110	Base Aggregate Dense 3/4-Inch	TON	6,000.000	6,000.000
0070	305.0500	Shaping Shoulders	STA	3,024.000	3,024.000
0080	440.4410	Incentive IRI Ride	DOL	113,639.000	113,639.000
0090	455.0605	Tack Coat	GAL	75,913.000	75,913.000
0100	460.2000	Incentive Density HMA Pavement	DOL	35,900.000	35,900.000
0110	460.4000	HMA Cold Weather Paving	TON	20,000.000	20,000.000
0120	460.4110.S	Reheating HMA Pavement Longitudinal Joints	LF	146,107.000	146,107.000
0130	460.5244	HMA Pavement 4 LT 58-34 S	TON	17,141.000	17,141.000
0140	460.7445	HMA Pavement 5 HT 58-34 H	TON	41,979.000	41,979.000
0150	465.0110	Asphaltic Surface Patching	TON	200.000	200.000
0160	465.0125	Asphaltic Surface Temporary	TON	2,220.000	2,220.000
0170	465.0400	Asphaltic Shoulder Rumble Strips	LF	292,214.000	292,214.000
0180	502.3200	Protective Surface Treatment	SY	695.000	695.000
0190	502.3210	Pigmented Surface Sealer	SY	230.000	230.000
0200	509.0301	Preparation Decks Type 1	SY	100.000	100.000
0210	509.0302	Preparation Decks Type 2	SY	40.000	40.000
0220	509.0500	Cleaning Decks	SY	695.000	695.000
0230	509.1500	Concrete Surface Repair	SF	316.000	316.000
0240	509.2000	Full-Depth Deck Repair	SY	2.000	2.000
0250	509.2500	Concrete Masonry Overlay Decks	CY	43.000	43.000
0260	509.5100.S	Polymer Overlay	SY	3,190.000	3,190.000
0270	520.8700	Cleaning Culvert Pipes	EACH	20.000	20.000
0280	521.1015	Apron Endwalls for Culvert Pipe Steel 15-Inch	EACH	1.000	1.000
0290	521.1018	Apron Endwalls for Culvert Pipe Steel 18-Inch	EACH	1.000	1.000
0300	521.1024	Apron Endwalls for Culvert Pipe Steel 24-Inch	EACH	4.000	4.000
0310	521.1030	Apron Endwalls for Culvert Pipe Steel 30-Inch	EACH	1.000	1.000
0320	522.1018	Apron Endwalls for Culvert Pipe Reinforced Concrete 18-Inch	EACH	1.000	1.000
0330	524.0130	Culvert Pipe Salvaged 30-Inch	LF	32.000	32.000
0340	524.0136	Culvert Pipe Salvaged 36-Inch	LF	16.000	16.000
0350	524.0148	Culvert Pipe Salvaged 48-Inch	LF	32.000	32.000
0360	524.0624	Apron Endwalls for Culvert Pipe Salvaged 24-Inch	EACH	5.000	5.000
0370	524.0627	Apron Endwalls for Culvert Pipe Salvaged 27-Inch	EACH	2.000	2.000
0380	524.0630	Apron Endwalls for Culvert Pipe Salvaged 30-Inch	EACH	8.000	8.000
0390	524.0636	Apron Endwalls for Culvert Pipe Salvaged 36-Inch	EACH	7.000	7.000
0400	524.0642	Apron Endwalls for Culvert Pipe Salvaged 42-Inch	EACH	6.000	6.000
0410	524.0648	Apron Endwalls for Culvert Pipe Salvaged 48-Inch	EACH	8.000	8.000
0420	614.0010	Barrier System Grading Shaping Finishing	EACH	13.000	13.000

3

3

DATE 11MAR16 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	1023-02-76 QUANTITY
0430	614.0370	Steel Plate Beam Guard Energy Absorbing Terminal	EACH	1.000	1.000
0440	614.0920	Salvaged Rail	LF	7,917.000	7,917.000
0450	614.0950	Replacing Guardrail Posts and Blocks	EACH	10.000	10.000
0460	614.0951	Replacing Guardrail Rail and Hardware	LF	1,250.000	1,250.000
0470	614.2300	MGS Guardrail 3	LF	350.000	350.000
0480	614.2330	MGS Guardrail 3 K	LF	7,941.000	7,941.000
0490	614.2500	MGS Thrie Beam Transition	LF	80.000	80.000
0500	614.2610	MGS Guardrail Terminal EAT	EACH	12.000	12.000
0510	614.2620	MGS Guardrail Terminal Type 2	EACH	10.000	10.000
0520	618.0100	Maintenance And Repair of Haul Roads (project) 01. 1023-02-76	EACH	1.000	1.000
0530	619.1000	Mobilization	EACH	1.000	1.000
0540	625.0500	Salvaged Topsoil	SY	300.000	300.000
0550	627.0200	Mulching	SY	200.000	200.000
0560	628.1504	Silt Fence	LF	5,268.000	5,268.000
0570	628.1520	Silt Fence Maintenance	LF	5,268.000	5,268.000
0580	628.1905	Mobilizations Erosion Control	EACH	3.000	3.000
0590	628.1910	Mobilizations Emergency Erosion Control	EACH	2.000	2.000
0600	628.2004	Erosion Mat Class I Type B	SY	100.000	100.000
0610	629.0210	Fertilizer Type B	CWT	1.000	1.000
0620	630.0120	Seeding Mixture No. 20	LB	20.000	20.000
0630	633.0100	Delineator Posts Steel	EACH	415.000	415.000
0640	633.0500	Delineator Reflectors	EACH	415.000	415.000
0650	633.5200	Markers Culvert End	EACH	100.000	100.000
0660	634.0614	Posts Wood 4x6-Inch X 14-FT	EACH	26.000	26.000
0670	634.0616	Posts Wood 4x6-Inch X 16-FT	EACH	86.000	86.000
0680	634.0618	Posts Wood 4x6-Inch X 18-FT	EACH	14.000	14.000
0690	637.2210	Signs Type II Reflective H	SF	1,082.000	1,082.000
0700	637.2215	Signs Type II Reflective H Folding	SF	40.000	40.000
0710	637.2230	Signs Type II Reflective F	SF	104.000	104.000
0720	638.2602	Removing Signs Type II	EACH	118.000	118.000
0730	638.3000	Removing Small Sign Supports	EACH	103.000	103.000
0740	642.5201	Field Office Type C	EACH	1.000	1.000
0750	643.0200	Traffic Control Surveillance and Maintenance (project) 01. 1023-02-76	DAY	170.000	170.000
0760	643.0300	Traffic Control Drums	DAY	67,938.000	67,938.000
0770	643.0420	Traffic Control Barricades Type III	DAY	4,732.000	4,732.000
0780	643.0705	Traffic Control Warning Lights Type A	DAY	9,464.000	9,464.000
0790	643.0715	Traffic Control Warning Lights Type C	DAY	11,154.000	11,154.000
0800	643.0800	Traffic Control Arrow Boards	DAY	676.000	676.000
0810	643.0900	Traffic Control Signs	DAY	15,210.000	15,210.000
0820	643.0920	Traffic Control Covering Signs Type II	EACH	5.000	5.000
0830	643.1000	Traffic Control Signs Fixed Message	SF	224.000	224.000
0840	643.1050	Traffic Control Signs PCMS	DAY	338.000	338.000
0850	646.0106	Pavement Marking Epoxy 4-Inch	LF	1,357.000	1,357.000
0860	646.2304.S	Pavement Marking Grooved Wet Reflective Epoxy 4-Inch	LF	354,862.000	354,862.000
0870	646.2308.S	Pavement Marking Grooved Wet Reflective Epoxy 8-Inch	LF	5,824.000	5,824.000
0880	647.0566	Pavement Marking Stop Line Epoxy 18-Inch	LF	110.000	110.000
0890	649.0402	Temporary Pavement Marking Paint 4-Inch	LF	700,052.000	700,052.000
0900	650.8000	Construction Staking Resurfacing Reference	LF	150,941.000	150,941.000

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LINE NUMBER	ITEM	ITEM DESCRIPTION	UNIT	TOTAL	1023-02-76 QUANTITY
0910	650.9910	Construction Staking Supplemental Control (project) 01. 1023-02-76	LS	1.000	1.000
0920	690.0150	Sawing Asphalt	LF	520.000	520.000
0930	690.0250	Sawing Concrete	LF	2,176.000	2,176.000
0940	ASP.1T0A	On-the-Job Training Apprentice at $5. 00/HR	HRS	2,100.000	2,100.000
0950	ASP.1T0G	On-the-Job Training Graduate at $5.00/HR	HRS	2,400.000	2,400.000
0960	SPV.0035	Special 01. Continuously Reinforced Concrete Repair Special	CY	204.000	204.000
0970	SPV.0035	Special 02. Concrete Masonry Deck Patching	CY	4.000	4.000
0980	SPV.0045	Special 01. Portable Changeable Message Sign (PMCS) Cellular Communications	DAY	338.000	338.000
0990	SPV.0060	Special 01. Cleaning Ditch	EACH	4.000	4.000
1000	SPV.0090	Special 01. Sawing Pavement Deck Preparation Areas	LF	85.000	85.000
1010	SPV.0105	Special 01. Milling And Removing Temporary Joint 1023-02-76	LS	1.000	1.000
1020	SPV.0105	Special 02. Material Transfer Vechicle 1023-02-76	LS	1.000	1.000
1030	SPV.0105	Special 03. Preparation Of Foundation For Asphaltic Paving Special 1023-02-76	LS	1.000	1.000
1040	SPV.0165	Special 01. Fiber Wrap Pier Reinforcing	SF	1,860.000	1,860.000
1050	SPV.0195	Special 01. HMA Pavement Type SMA-Special	TON	50,910.000	50,910.000
1060	SPV.0195	Special 02. SMA Pavement Compaction Acceptance	TON	50,910.000	50,910.000

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REMOVING ASPHALTIC SURFACE BUTT JOINTS

CATEGORY	STATION TO STATION	LOCATION	204.0115 SY	REMARKS
0010	239'EB'+04 - 239'EB'+84	IH 94	338	START, B-27-0035
0010	283'EB'+11 - 283'EB'+91	IH 94	338	B-27-0037
0010	285'EB'+05 - 285'EB'+85	IH 94	338	B-27-0037
0010	597'EB'+74 - 598'EB'+54	IH 94	533	B-27-0148
0010	599'EB'+59 - 600'EB'+39	IH 94	533	B-27-0148
0010	961'EB'+89 - 962'EB'+69	IH 94	453	B-27-0021
0010	964'EB'+05 - 964'EB'+85	IH 94	480	B-27-0021
0010	973'EB'+23 - 973'EB'+93	IH 94	560	B-27-0024
0010	241'WB'+28 - 242'WB'+08	IH 94	338	B-27-0036
0010	283'WB'+57 - 284'WB'+37	IH 94	338	B-27-0038
0010	285'WB'+51 - 286'WB'+31	IH 94	338	B-27-0038
0010	597'WB'+98 - 598'WB'+78	IH 94	533	B-27-0149
0010	599'WB'+83 - 600'WB'+63	IH 94	533	B-27-0149
0010	962'WB'+19 - 962'WB'+99	IH 94	524	B-27-0022
0010	964'WB'+37 - 965'WB'+17	IH 94	551	B-27-0022
0010	973'WB'+43 - 974'WB'+23	IH 94	498	B-27-0025
0010	609+58 - 610+38	EB STH 121 OFF RAMP	356	
0010	609+68 - 610+48	EB STH 121 ON RAMP	462	
0010	616+09 - 616+89	WB STH 121 ON RAMP	373	
0010	616+65 - 617+45	WB STH 121 OFF RAMP	391	
		TOTAL 0010	8808	

REMOVING ASPHALTIC SURFACE MILLING

CATEGORY	STATION TO STATION	LOCATION	204.0120 SY	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	308650	
0010	241'WB'+28 - 973'WB'+23	IH 94	308246	
0010	601+50 - 610+72	EB STH 121 OFF RAMP	1561	
0010	609+27 - 621+00	EB STH 121 ON RAMP	2857	
0010	616+34 - 628+54	WB STH 121 OFF RAMP	2132	
0010	602+00 - 617+19	WB STH 121 ON RAMP	3024	
0010		MAINTENANCE X-OVER	3449	
		TOTAL 0010	629919	

REMOVING DELINEATORS AND MARKERS

CATEGORY	STATION TO STATION	LOCATION	204.0180 EACH	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	184	DELINEATOR
0010	241'WB'+28 - 974'WB'+23	IH 94	183	DELINEATOR
0010	601+50 - 610+72	EB STH 121 OFF RAMP	9	DELINEATOR
0010	609+27 - 621+00	EB STH 121 ON RAMP	12	DELINEATOR
0010	616+34 - 628+54	WB STH 121 OFF RAMP	12	DELINEATOR
0010	602+00 - 617+19	WB STH 121 ON RAMP	15	DELINEATOR
0010	239+04 - 974+23	IH 94	100	CULVERT MARKERS
		TOTAL 0010	515	

BORROW

CATEGORY	STATION	LOCATION	208.0100 CY	REMARKS
0010	427'WB'+76	IH 94	5	LEFT
0010	766'WB'+11	IH 94	5	LEFT
		TOTAL 0010	10	

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BASE AGGREGATE DENSE 3/4-INCH

CATEGORY	STATION TO STATION	LOCATION	305.0110 TON	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	3000	UNDISTRIBUTED SHOULDERS
0010	241'WB'+28 - 974'WB'+23	IH 94	3000	UNDISTRIBUTED SHOULDERS
		TOTAL 0010	6000	

HMA COLD WEATHER PAVING

CATEGORY	STATION TO STATION	LOCATION	460.4000 TON	REMARKS
0010	239+04 - 974+23	IH 94	20000	UNDISTRIBUTED
		TOTAL 0010	20000	

REHEATING HMA PAVEMENT LONGITUDINAL JOINTS

CATEGORY	STATION TO STATION	LOCATION	460.4110.S LF	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94 EASTBOUND	73101	
0010	241'WB'+28 - 974'WB'+23	IH 94 WESTBOUND	73006	
		TOTAL 0010	146107	

SHAPING SHOULDERS

CATEGORY	STATION TO STATION	LOCATION	305.0500 STA	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	731	PASSING LANE SHOULDER
0010	239'EB'+04 - 973'EB'+90	IH 94	731	DRIVING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	730	PASSING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	730	DRIVING LANE SHOULDER
0010	601+50 - 610+72	EB STH 121 OFF RAMP	10	INSIDE SHOULDER
0010	609+27 - 621+00	EB STH 121 ON RAMP	12	INSIDE SHOULDER
0010	616+34 - 628+54	WB STH 121 OFF RAMP	13	INSIDE SHOULDER
0010	602+00 - 617+19	WB STH 121 ON RAMP	16	INSIDE SHOULDER
0010	601+50 - 610+72	EB STH 121 OFF RAMP	10	OUTSIDE SHOULDER
0010	609+27 - 621+00	EB STH 121 ON RAMP	12	OUTSIDE SHOULDER
0010	609+27 - 621+00	WB STH 121 OFF RAMP	13	OUTSIDE SHOULDER
0010	602+00 - 617+19	WB STH 121 ON RAMP	16	OUTSIDE SHOULDER
		TOTAL 0010	3024	

TACK COAT

CATEGORY	STATION TO STATION	LOCATION	455.0605 GAL	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	15920	LOWER LAYER
0010	241'WB'+28 - 974'WB'+23	IH 94	15899	LOWER LAYER
0010	239'EB'+04 - 973'EB'+90	IH 94	15920	SMA LAYER
0010	241'WB'+28 - 974'WB'+23	IH 94	15899	SMA LAYER
0010	239'EB'+04 - 973'EB'+90	IH 94	5686	DRIVING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	5678	DRIVING LANE SHOULDER
0010	601+50 - 610+72	EB STH 121 OFF RAMP	109	
0010	609+27 - 621+00	EB STH 121 ON RAMP	200	
0010	616+34 - 628+54	WB STH 121 OFF RAMP	149	
0010	602+00 - 617+19	WB STH 121 ON RAMP	212	
0010		MAINTENANCE X-OVER	241	
		TOTAL 0010	75913	

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HMA PAVEMENT 4 LT 58-34 S

CATEGORY	STATION TO STATION	LOCATION	460.5244 TON	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94 EASTBOUND	8398	DRIVING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94 WESTBOUND	8386	DRIVING LANE SHOULDER
0010		MAINTENANCE X-OVER	357	
		TOTAL 0010	17141	

HMA PAVEMENT 5 HT 58-34 H

CATEGORY	STATION TO STATION	LOCATION	460.7445 TON	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94 EASTBOUND	20155	
0010	241'WB'+28 - 974'WB'+23	IH 94 WESTBOUND	20128	
0010	601+50 - 610+72	EB STH 121 OFF RAMP	276	
0010	609+27 - 621+00	EB STH 121 ON RAMP	506	
0010	616+34 - 628+54	WB STH 121 OFF RAMP	378	
0010	602+00 - 617+19	WB STH 121 ON RAMP	536	
		TOTAL 0010	41979	

ASPHALTIC SURFACE PATCHING

CATEGORY	STATION TO STATION	LOCATION	465.0110 TON	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	100	UNDISTRIBUTED
0010	241'WB'+28 - 974'WB'+23	IH 94	100	UNDISTRIBUTED
		TOTAL 0010	200	

ASPHALTIC SURFACE TEMPORARY

CATEGORY	STATION TO STATION	LOCATION	465.0125 TON	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	555	PASSING LANE SHOULDER
0010	239'EB'+04 - 973'EB'+90	IH 94	555	DRIVING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	555	PASSING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	555	DRIVING LANE SHOULDER
		TOTAL 0010	2220	

ASPHALTIC SHOULDER RUMBLE STRIP

CATEGORY	STATION TO STATION	LOCATION	465.0400 LF	REMARKS
0010	239'EB'+04 - 973'EB'+90	IH 94	73101	PASSING LANE SHOULDER
0010	239'EB'+04 - 973'EB'+90	IH 94	73101	DRIVING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	73006	PASSING LANE SHOULDER
0010	241'WB'+28 - 974'WB'+23	IH 94	73006	DRIVING LANE SHOULDER
		TOTAL 0010	292214	

CULVERTS

CATEGORY	STATION	LOCATION	CLEANING CULVERT PIPES 520.8700 EACH	APRON ENDWALLS FOR CULVERT PIPE STEEL 15-INCH 521.1015 EACH	APRON ENDWALLS FOR CULVERT PIPE STEEL 18-INCH 521.1018 EACH	APRON ENDWALLS FOR CULVERT PIPE STEEL 24-INCH 521.1024 EACH	APRON ENDWALLS FOR CULVERT PIPE STEEL 30-INCH 521.1030 EACH	APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 18-INCH 522.1018 EACH	CULVERT PIPE SALVAGED 30-INCH 524.0130 LF	CULVERT PIPE SALVAGED 36-INCH 524.0136 LF	CULVERT PIPE SALVAGED 48-INCH 524.0148 LF	APRON ENDWALLS FOR CULVERT PIPE SALVAGED 24-INCH 524.0624 EACH	APRON ENDWALLS FOR CULVERT PIPE SALVAGED 27-INCH 524.0627 EACH	APRON ENDWALLS FOR CULVERT PIPE SALVAGED 30-INCH 524.0630 EACH	APRON ENDWALLS FOR CULVERT PIPE SALVAGED 36-INCH 524.0636 EACH	APRON ENDWALLS FOR CULVERT PIPE SALVAGED 42-INCH 524.0642 EACH	APRON ENDWALLS FOR CULVERT PIPE SALVAGED 48-INCH 524.0648 EACH	REMARKS
0010	250'EB'+35	IH 94	1															
0010	286'EB'+70	IH 94															1	LEFT, ADD JOINT TIES
0010	286'EB'+70	IH 94															1	RIGHT, ADD JOINT TIES
0010	309'EB'+30	IH 94	1															
0010	316'EB'+52	IH 94													1			RIGHT, ADD JOINT TIES
0010	353'EB'+25	IH 94	1															
0010	361'EB'+30	IH 94	1															
0010	403'EB'+00	IH 94	1															LEFT
0010	427'EB'+20	IH 94												1				LEFT, ADD JOINT TIES
0010	437'EB'+20	IH 94					1											LEFT
0010	437'EB'+20	IH 94													1			RIGHT ADD JOINT TIES
0010	442'EB'+30	IH 94				2												LEFT AND RIGHT
0010	473'EB'+50	IH 94		1														RIGHT
0010	484'EB'+00	IH 94										2						LEFT AND RIGHT, ADD JOINT TIES
0010	507'EB'+00	IH 94						1										RIGHT, ADD JOINT TIES
0010	605'EB'+00	IH 94	1															
0010	615'EB'+00	IH 94	1															
0010	627'EB'+00	IH 94														1		RIGHT, ADD JOINT TIES
0010	648'EB'+25	IH 94								16					1			LEFT, ADD JOINT TIES
0010	648'EB'+25	IH 94													1			RIGHT, ADD JOINT TIES
0010	658'EB'+55	IH 94									16						1	LEFT, ADD JOINT TIES
0010	670'EB'+80	IH 94											1					RIGHT, STEEL
0010	674'EB'+45	IH 94														1		LEFT, ADD JOINT TIES
0010	682'EB'+40	IH 94												1				LEFT, ADD JOINT TIES
0010	686'EB'+00	IH 94											1					LEFT, ADD JOINT TIES
0010	701'EB'+00	IH 94												1				LEFT, ADD JOINT TIES
0010	706'EB'+50	IH 94							16					1				LEFT, ADD JOINT TIES
0010	721'EB'+50	IH 94												1				RIGHT, ADD JOINT TIES
0010	732'EB'+00	IH 94															1	LEFT, ADD JOINT TIES
0010	742'EB'+00	IH 94												1				LEFT, ADD JOINT TIES
0010	760'EB'+62	IH 94													1			LEFT, ADD JOINT TIES
0010	760'EB'+62	IH 94													1			RIGHT, ADD JOINT TIES
0010	766'EB'+15	IH 94												1				LEFT, ADD JOINT TIES
0010	779'EB'+00	IH 94															1	LEFT, ADD JOINT TIES
0010	779'EB'+00	IH 94															1	RIGHT, ADD JOINT TIES
0010	811'EB'+50	IH 94	1															
0010	836'EB'+50	IH 94	1															
0010	863'EB'+00	IH 94														1		RIGHT, ADD JOINT TIES
0010	865'EB'+50	IH 94	1															
0010	874'EB'+00	IH 94	1															
0010	876'EB'+70	IH 94														1		RIGHT, ADD JOINT TIES
0010	890'EB'+20	IH 94													1			LEFT, ADD JOINT TIES
0010	894'EB'+00	IH 94										1						RIGHT, ADD JOINT TIES
0010	933'EB'+70	IH 94										1						LEFT, ADD JOINT TIES
0010	955'EB'+00	IH 94										1						RIGHT, ADD JOINT TIES
0010	262'WB'+50	IH 94	1															
0010	271'WB'+20	IH 94	1															
0010	285'WB'+85	IH 94	1															
0010	331'WB'+10	IH 94	1															
0010	345'WB'+35	IH 94	1															
0010	412'WB'+00	IH 94	1															
0010	420'WB'+60	IH 94			1													LEFT
0010	545'WB'+50	IH 94				2												LEFT AND RIGHT
0010	670'WB'+80	IH 94							16					1				RIGHT, ADD JOINT TIES
0010	750'WB'+35	IH 94									16						2	LEFT AND RIGHT, ADD JOINT TIES
0010	773'WB'+00	IH 94	1															
0010	790'WB'+21	IH 94	1															
0010	922'WB'+00	IH 94														1		LEFT, ADD JOINT TIES
0010	928'WB'+00	IH 94														1		RIGHT, ADD JOINT TIES
0010	944'WB'+52	IH 94	1															
		TOTAL 0010	20	1	1	4	1	1	32	16	32	5	2	8	7	6	8	

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BARRIER SYSTEM GRADING SHAPING FINISHING

CATEGORY	STATION TO	STATION	LOCATION	614.0010 EACH	* FILL CY	* SALVAGED TOPSOIL SY	* FERTILIZER TYPE B CWT	* SEEDING NO. 20 LB	* MULCHING SY	REMARKS
0010	656'EB'+05	660'EB'+47	IH 94	1	16	69	0.05	2	69	RIGHT
0010	719'EB'+14	734'EB'+55	IH 94	1	43	93	0.06	3	93	RIGHT
0010	776'EB'+25	779'EB'+42	IH 94	1	5	121	0.08	4	121	RIGHT
0010	797'EB'+40	799'EB'+81	IH 94	1	4	173	0.11	5	173	RIGHT
0010	486'WB'+93 -	504'WB'+53	IH 94	1	122	1384	0.87	38	1384	LEFT
0010	544'WB'+63 -	555'WB'+04	IH 94	1	13	893	0.57	25	893	LEFT
0010	548'WB'+86 -	552'WB'+53	IH 94	1	8	386	0.25	11	385	RIGHT
0010	576'WB'+47 -	585'WB'+00	IH 94	1	6	503	0.32	14	502	RIGHT
0010	584'WB'+97 -	588'WB'+92	IH 94	1	6	527	0.34	15	527	LEFT
0010	599'WB'+95 -	603'WB'+37	IH 94	1	9	461	0.29	13	460	RIGHT
0010	600'WB'+16 -	602'WB'+08	IH 94	1	10	255	0.17	7	255	LEFT
0010	635'WB'+14 -	650'WB'+24	IH 94	1	101	1005	0.64	28	1005	LEFT
0010	620+80 -	621+30	WB STH 121 OFF RAMP	1	5	255	0.17	7	315	RIGHT
			TOTAL 0010	13						

* ITEMS AND QUANTITIES FOR INFORMATION ONLY

STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL

CATEGORY	STATION TO	STATION	LOCATION	614.0370 EACH	REMARKS
0010	620+80 -	621+30	WB STH 121 OFF RAMP	1	RIGHT
			TOTAL 0010	1	

REPLACING GUARDRAIL POSTS AND BLOCKS

CATEGORY	STATION TO	STATION	LOCATION	614.0950 EACH	REMARKS
0010	239+04 -	974+23	IH 94	10	UNDISTRIBUTED
			TOTAL 0010	10	

REPLACING GUARDRAIL RAIL AND HARDWARE

CATEGORY	STATION TO	STATION	LOCATION	614.0951 LF	REMARKS
0010	239+04 -	974+23	IH 94	1250	UNDISTRIBUTED
			TOTAL 0010	1250	

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BEAM GUARD

CATEGORY	STATION	TO	STATION	LOCATION	SALVAGED RAIL 614.0920 LF	MGS GUARDRAIL 3 614.2300 LF	MGS GUARDRAIL 3 K 614.2330 LF	MGS THRIE BEAM TRANSITION 614.2500 LF	MGS GUARDRAIL TERMINAL EAT 614.2610 EACH	MGS GUARDRAIL TERMINAL TYPE 2 614.2620 EACH	REMARKS
0010	656'EB'+05		660'EB'+47	IH 94	440		388		1	1	RIGHT
0010	719'EB'+14		734'EB'+55	IH 94	1536		1488		1	1	RIGHT
0010	776'EB'+25		779'EB'+42	IH 94	304		263		1	1	RIGHT
0010	797'EB'+40		799'EB'+81	IH 94	241		188		1	1	RIGHT
0010	486'WB'+93	-	504'WB'+53	IH 94	960		1700		1	1	LEFT
0010	544'WB'+63	-	555'WB'+04	IH 94	1039		1000		1	1	LEFT
0010	548'WB'+86	-	552'WB'+53	IH 94	367		313		1	1	RIGHT
0010	576'WB'+47	-	585'WB'+00	IH 94	751		800		1	1	RIGHT
0010	584'WB'+97	-	588'WB'+92	IH 94	204		338		1	1	LEFT
0011	599'WB'+95	-	603'WB'+37	IH 94	333	250		40	1		RIGHT
0010	600'WB'+16	-	602'WB'+08	IH 94	183	100		40	1		LEFT
0010	635'WB'+14	-	650'WB'+24	IH 94	1509		1463		1	1	LEFT
0010	620+80	-	621+30	WB STH 121 OFF RAMP	50						RIGHT
				TOTAL 0010	7917	350	7941	80	12	10	

SALVAGED TOPSOIL

CATEGORY	STATION	TO	STATION	LOCATION	625.0500 SY	REMARKS
0010	239+04	-	974+23	IH 94	300	PIPE WORK
				TOTAL 0010	300	

MULCHING

CATEGORY	STATION	TO	STATION	LOCATION	627.0200 SY	REMARKS
0010	239+04	-	974+23	IH 94	200	PIPE WORK
				TOTAL 0010	200	

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MOBILIZATIONS EROSION CONTROL

CATEGORY	STATION TO	STATION	LOCATION	628.1905 EACH	REMARKS
0010	239+04 -	974+23	IH 94	3	
			TOTAL 0010	3	

MOBILIZATIONS EMERGENCY EROSION CONTROL

CATEGORY	STATION TO	STATION	LOCATION	628.1910 EACH	REMARKS
0010	239+04 -	974+23	IH 94	2	
			TOTAL 0010	2	

EROSION MAT CLASS I TYPE B

CATEGORY	STATION TO	STATION	LOCATION	628.2004 SY	REMARKS
0010	239+04 -	974+23	IH 94	100	PIPE WORK
			TOTAL 0010	100	

FERTILIZER TYPE B

CATEGORY	STATION TO	STATION	LOCATION	629.0210 CWT	REMARKS
0010	239+04 -	974+23	IH 94	1	PIPE WORK
			TOTAL 0010	1	

SEEDING MIXTURE NO. 20

CATEGORY	STATION TO	STATION	LOCATION	630.0120 LB	REMARKS
0010	239+04 -	974+23	IH 94	20	PIPE WORK
			TOTAL 0010	20	

SILT FENCE

CATEGORY	STATION TO	STATION	LOCATION	SILT FENCE 628.1504 LF	SILT FENCE MAINTENANCE 628.1520 LF	REMARKS
0010	655'EB'+09 -	656'EB'+91	IH 94	184	184	RIGHT
0010	717'EB'+90 -	719'EB'+98	IH 94	212	212	RIGHT
0010	774'EB'+98 -	777'EB'+04	IH 94	208	208	RIGHT
0010	796'EB'+17 -	799'EB'+97	IH 94	392	392	RIGHT
0010	488'WB'+34 -	489'WB'+62	IH 94	137	137	LEFT
0010	489'WB'+96 -	491'WB'+39	IH 94	154	154	LEFT
0010	495'WB'+24 -	498'WB'+00	IH 94	290	290	LEFT
0010	501'WB'+05 -	506'WB'+09	IH 94	502	502	LEFT
0010	548'WB'+70 -	553'WB'+77	IH 94	512	512	RIGHT
0010	552'WB'+45 -	556'WB'+33	IH 94	413	413	LEFT
0010	583'WB'+83 -	586'WB'+22	IH 94	258	258	RIGHT
0010	587'WB'+81 -	590'WB'+31	IH 94	253	253	LEFT
0010	599'WB'+92 -	604'WB'+63	IH 94	485	485	RIGHT
0010	600'WB'+13 -	603'WB'+38	IH 94	336	336	LEFT
0010	634'WB'+98 -	640'WB'+32	IH 94	545	545	LEFT
0010	649'WB'+68 -	651'WB'+51	IH 94	187	187	LEFT
0010	239+04 -	974+23	IH 94	200	200	PIPE WORK
			TOTAL 0010	5268	5268	

DELINEATORS

CATEGORY	STATION TO	STATION	LOCATION	DELINEATOR POSTS STEEL 633.0100 EACH	DELINEATOR REFLECTORS 633.0500 EACH	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94 EASTBOUND	184	184	
0010	241'WB'+28 -	974'WB'+23	IH 94 WESTBOUND	183	183	
0010	601+50 -	610+72	EB STH 121 OFF RAMP	9	9	
0010	609+27 -	621+00	EB STH 121 ON RAMP	12	12	
0010	616+34 -	628+54	WB STH 121 OFF RAMP	12	12	
0010	602+00 -	617+19	WB STH 121 ON RAMP	15	15	
			TOTAL 0010	415	415	

MARKERS CULVERT END

CATEGORY	STATION TO	STATION	LOCATION	633.5200 EACH	REMARKS
0010	239+04 -	974+23	IH 94	100	
			TOTAL 0010	100	

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SIGNING TYPE II

CATEGORY	SIDE CODE	STATION	SIZE	SIGN CODE DESCRIPTION	POSTS WOOD 4X6-INCH X 14-FT 634.0614 EACH	POSTS WOOD 4X6-INCH X 16-FT 634.0616 EACH	POSTS WOOD 4X6-INCH X 18-FT 634.0618 EACH	SIGNS TYPE II REFLECTIVE H 637.2210 SF	SIGNS TYPE II REFLECTIVE H FOLDING 637.2215 SF	SIGNS TYPE II REFLECTIVE F 637.2230 SF	REMOVING SIGNS TYPE II 638.2602 EACH	REMOVING SMALL SIGN SUPPORTS 638.3000 EACH	REMARKS
0010	R3-4B	250'EB'+65	36X48	NO U TURN		1		12			1	1	
0010	D10-2	262'EB'+68	12X36	MILE 92	1			3			1	1	
0010	M1-94	283'EB'+00	54X21	HWY B	1			8			1	1	
0010	D10-2	314'EB'+95	12X36	MILE 93	1			3			1	1	
0010	D10-2	367'EB'+22	12X36	MILE 94	1			3			1	1	
0010	R3-4B	372'EB'+70	36X48	NO U TURN		1		12			1	1	
0010	R3-4B	403'EB'+45	36X48	NO U TURN		1		12			1	1	
0010	D10-2	420'EB'+07	12X36	MILE 95	1			3			1	1	
0010	R3-4B	463'EB'+35	36X48	NO U TURN		1		12			1	1	
0010	D10-2	472'EB'+34	12X36	MILE 96	1			3			1	1	
0010	D10-2	525'EB'+20	12X36	MILE 97		1		3			1	1	
0010	D10-2	578'EB'+00	12X36	MILE 98	1			3			1	1	
0010	R3-4B	586'EB'+95	36X48	NO U TURN		1		12			1	1	
0010	E5-1A	604'EB'+95	72X60	EXIT 98		2		30			1	1	
0010	JV-F	604'EB'+95	36X81	ALTERNATE 94					20		1		
0010	W3-1	604'EB'+57	36X36	STOP AHEAD		2		9			1	1	STH 121 INTERCHANGE
0010	D1-3	607'EB'+12	84X36	TRIPLE DESTINATION		2		21			1	1	STH 121 INTERCHANGE
0010	J3-3	609'EB'+06	72X57	DIRECTIONAL ASSEMBLY		2		29			1	1	STH 121 INTERCHANGE
0010	R5-1A	609'EB'+13	36X24	WRONG WAY				6			1		STH 121 INTERCHANGE
0010	R5-1A	609'EB'+13	36X24	WRONG WAY		1		6			1	1	STH 121 INTERCHANGE
0010	R1-1	609'EB'+49	36X36	STOP		1		9			1	1	STH 121 INTERCHANGE
0010	R5-1	609'EB'+49	36X36	DO NOT ENTER				9			1		STH 121 INTERCHANGE
0010	R1-1	609'EB'+90	36X36	STOP		1		9			1	1	STH 121 INTERCHANGE
0010	R5-1	609'EB'+90	36X36	DO NOT ENTER				9			1		STH 121 INTERCHANGE
0010	R6-2-L	609'EB'+90	24X30	ONE WAY LEFT				5			1		STH 121 INTERCHANGE
0010	R1-1	610'EB'+02	36X36	STOP		1		9			1	1	STH 121 INTERCHANGE
0010	R5-1	610'EB'+02	36X36	DO NOT ENTER				9			1		STH 121 INTERCHANGE
0010	R3-2	610'EB'+04	24X24	NO LEFT TURN		1		4			1	1	STH 121 INTERCHANGE
0010	J3-1	610'EB'+22	24X57	DIRECTIONAL ASSEMBLY		1		10			1	1	STH 121 INTERCHANGE
0010	R3-2	610'EB'+26	24X24	NO LEFT TURN		1		4			1	1	STH 121 INTERCHANGE
0010	R3-1	610'EB'+26	24X24	NO RIGHT TURN				4			1		STH 121 INTERCHANGE
0010	J3-1	610'EB'+45	24X57	DIRECTIONAL ASSEMBLY		1		10			1	1	STH 121 INTERCHANGE
0010	W4-1	611'EB'+05	48X48	MERGING		2				16	1	1	
0010	W13-3	611'EB'+38	36X48	35 MPH RAMP SPEED		1		12			1	1	STH 121 INTERCHANGE
0010	D1-1	611'EB'+40	66X15	SINGLE DESTINATION		1		7			1	1	STH 121 INTERCHANGE
0010	J3-1	612'EB'+01	24X57	DIRECTIONAL ASSEMBLY		1		10			1	1	STH 121 INTERCHANGE
0010	R5-57	612'EB'+22	36X36	PEDESTRIANS ETC, PROHIBITED		1		9			1	1	STH 121 INTERCHANGE
0010	D10-2	630'EB'+27	12X36	MILE 99		1		3			1	1	
0010	J4-1	632'EB'+90	36X54	EAST 94		1		14			1		
0010	R3-4B	637'EB'+25	36X48	NO U TURN		1		12			1	1	
				SHEET TOTAL 0010	7	31	0	346	20	16	40	32	

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CATEGORY	SIDE CODE	STATION	SIZE	SIGN CODE DESCRIPTION	SIGNING TYPE II POSTS WOOD 4X6-INCH X 14-FT 634.0614 EACH	POSTS WOOD 4X6-INCH X 16-FT 634.0616 EACH	POSTS WOOD 4X6-INCH X 18-FT 634.0618 EACH	SIGNS TYPE II REFLECTIVE H 637.2210 SF	SIGNS TYPE II REFLECTIVE H FOLDING 637.2215 SF	SIGNS TYPE II REFLECTIVE F 637.2230 SF	REMOVING SIGNS TYPE II 638.2602 EACH	REMOVING SMALL SIGN SUPPORTS 638.3000 EACH	REMARKS
0010	R2-1	656'EB'+72	48X60	SPEED LIMIT 70		2		20			1	1	
0010	D10-3	681'EB'+01	12X48	MILE 100		1		4			1	1	
0010	D10-3	735'EB'+39	12X48	MILE 101		1		4			1	1	
0010	R3-4B	767'EB'+02	36X48	NO U TURN		1		12			1	1	
0010	D10-3	788'EB'+19	12X48	MILE 102	1			4			1	1	
0010	R4-3	795'EB'+11	48X60	SLOWER TRAFFIC KEEP RIGHT			2	20			1	1	
0010	M1-94	838'EB'+93	60X21	HWY FF		2		9			1	1	
0010	D10-3	840'EB'+52	12X48	MILE 103		1		4			1	1	
0010	R8-7	881'EB'+17	48X36	EMERGENCY STOPPING ONLY		2		12			1	1	
0010	D10-3	893'EB'+32	12X48	MILE 104	1			4			1	1	
0010	R3-4B	902'EB'+05	36X48	NO U TURN		1		12			1	1	
0010	D10-3	946'EB'+90	12X48	MILE 105		1		4			1	1	
0010	R3-4B	955'EB'+70	36X48	NO U TURN		1		12			1	1	
0010	W13-2	959'EB'+90	48X60	EXIT 30 MPH		2				20	1	1	
0010	E5-1A	966'EB'+35	90X60	EXIT 105			2	38			1	1	
0010	W4-1	967'EB'+90	48X48	MERGING		2				16	1	1	
0010	R3-4B	249'WB'+90	36X48	NO U TURN		1		12			1	1	
0010	D10-2	263'WB'+10	12X36	MILE 92	1			4			1	1	
0010	R8-7	269'WB'+43	48X36	EMERGENCY STOPPING ONLY		1		12			1	1	
0010	M1-94	285'WB'+95	54X21	HWY B	1			8			1	1	
0010	D10-2	315'WB'+37	12X36	MILE 93	1			4			1	1	
0010	D10-2	367'WB'+69	12X36	MILE 94	1			4			1	1	
0010	R4-3	370'WB'+97	48X60	SLOWER TRAFFIC KEEP RIGHT			2	20			1	1	
0010	R3-4B	371'WB'+50	36X48	NO U TURN		1		12			1	1	
0010	R3-4B	402'WB'+95	36X48	NO U TURN		1		12			1	1	
0010	D10-2	420'WB'+49	12X36	MILE 95	1			4			1	1	
0010	R3-4B	462'WB'+50	36X48	NO U TURN		1		12			1	1	
0010	D10-2	473'WB'+00	12X36	MILE 96	1			4			1	1	
0010	D10-2	525'WB'+09	12X36	MILE 97	1			4			1	1	
0010	R2-1	567'WB'+33	48X60	SPEED LIMIT 70			2	20			1	1	
0010	D10-2	580'WB'+00	12X36	MILE 98	1			4			1	1	
0010	J4-1	586'WB'+95	36X54	WEST 94			1	7			1	1	
0010	R3-4B	585'WB'+05	36X48	NO U TURN		1		12			1	1	
0010	R5-57	613'WB'+21	36X36	PEDESTRIANS ETC, PROHIBITED		1		9			1	1	STH 121 INTERCHANGE
0010	R2-1	613'WB'+64	24X30	SPEED LIMIT 40		1		5			1	1	STH 121 INTERCHANGE
0010	J3-1	613'WB'+83	24X57	DIRECTIONAL ASSEMBLY		1		10			1	1	STH 121 INTERCHANGE
0010	R2-1	614'WB'+40	24X30	SPEED LIMIT 40		1		5			1	1	STH 121 INTERCHANGE
0010	D1-1	614'WB'+49	78X15	SINGLE DESTINATION		1		8			1	1	STH 121 INTERCHANGE
0010	W13-3	614'WB'+93	36X48	35 MPH RAMP SPEED		1		12			1	1	STH 121 INTERCHANGE
0010	W4-1	615'WB'+40	48X48	MERGING		2				16	1	1	
				SHEET TOTAL 0010	10	31	9	362	0	52	40	40	

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SIGNING TYPE II

CATEGORY	SIDE CODE	STATION	SIZE	SIGN CODE DESCRIPTION	POSTS WOOD 4X6-INCH X 14-FT 634.0614 EACH	POSTS WOOD 4X6-INCH X 16-FT 634.0616 EACH	POSTS WOOD 4X6-INCH X 18-FT 634.0618 EACH	SIGNS TYPE II REFLECTIVE H 637.2210 SF	SIGNS TYPE II REFLECTIVE H FOLDING 637.2215 SF	SIGNS TYPE II REFLECTIVE F 637.2230 SF	REMOVING SIGNS TYPE II 638.2602 EACH	REMOVING SMALL SIGN SUPPORTS 638.3000 EACH	REMARKS
0010	J3-1	615'WB'+93	24X57	DIRECTIONAL ASSEMBLY		1		10			1	1	STH 121 INTERCHANGE
0010	R3-1	616'WB'+15	24X24	NO LEFT TURN		1		4			1	1	STH 121 INTERCHANGE
0010	R3-2	616'WB'+15	24x24	NO RIGHT TURN				4			1		STH 121 INTERCHANGE
0010	J3-1	616'WB'+50	24x57	DIRECTIONAL ASSEMBLY		1		10			1	1	STH 121 INTERCHANGE
0010	R5-1	616'WB'+56	36x36	DO NOT ENTER		1		9			1	1	STH 121 INTERCHANGE
0010	R1-1	616'WB'+56	36x36	STOP				9			1		STH 121 INTERCHANGE
0010	R3-2	616'WB'+62	24x24	NO LEFT TURN		1		4			1	1	STH 121 INTERCHANGE
0010	R5-1	616'WB'+85	36x36	DO NOT ENTER		1		9			1	1	STH 121 INTERCHANGE
0010	R1-1	616'WB'+85	36x36	STOP				9			1		STH 121 INTERCHANGE
0010	R6-2-L	616'WB'+85	24x30	ONE WAY LEFT				5			1		STH 121 INTERCHANGE
0010	R6-2-R	616'WB'+85	24x30	ONE WAY RIGHT				5			1		STH 121 INTERCHANGE
0010	R5-1	617'WB'+37	36x36	DO NOT ENTER		1		9			1	1	STH 121 INTERCHANGE
0010	R1-1	617'WB'+37	36x36	STOP				9			1		STH 121 INTERCHANGE
0010	J3-3	617'WB'+53	72x57	DIRECTIONAL ASSEMBLY		2		29			1	1	STH 121 INTERCHANGE
0010	R5-1A	619'WB'+07	36x24	WRONG WAY		1		6			1	1	STH 121 INTERCHANGE
0010	R5-1A	619'WB'+15	36x24	WRONG WAY				6			1		STH 121 INTERCHANGE
0010	D1-3	619'WB'+15	84X36	TRIPLE DESTINATION		2		21			1	1	STH 121 INTERCHANGE
0010	J2-2	621'WB'+45	48X57	ROUTE TURN ASSEMBLY		1		19			1	1	STH 121 INTERCHANGE
0010	E5-1A	626'WB'+10	72X60	EXIT 98		2		30			1	1	
0010	JV-F	626'WB'+10	36X81	ALTERNATE 94					20		1	1	
0010	D10-2	631'WB'+50	12X36	MILE 99	1			4			1	1	
0010	R3-4B	636'WB'+30	36X48	NO U TURN		1		12			1	1	
0010	D10-3	682'WB'+50	12X48	MILE 100	1			4			1	1	
0010	D10-3	736'WB'+00	12X48	MILE 101	1			4			1	1	
0010	R3-4B	766'WB'+25	36X48	NO U TURN		1		12			1	1	
0010	D10-3	789'WB'+00	12X48	MILE 102	1			4			1	1	
0010	M1-94	839'WB'+30	60X21	HWY FF	2			9			1	1	
0010	D10-3	840'WB'+99	12X48	MILE 103	1			4			1	1	
0010	R8-7	880'WB'+10	48X36	EMERGENCY STOPPING ONLY		1		12			1	1	
0010	D10-3	893'WB'+79	12X48	MILE 104	1			4			1	1	
0010	R3-4B	900'WB'+00	36X48	NO U TURN		1		12			1	1	
0010	R2-1	930'WB'+50	48X60	SPEED LIMIT 70			2	20			1	1	
0010	J4-1	945'WB'+06	36X51	WEST 94			1	14			1	1	
0010	D10-3	947'WB'+17	12X48	MILE 105	1			4			1	1	
0010	R3-4B	955'WB'+05	36X48	NO U TURN		1		12			1	1	
0010	W4-1	970'WB'+40	48X48	MERGING		2				16	1	1	
0010	E5-1A	971'WB'+39	90X60	EXIT 105			2	38			1	1	
0010	W13-3	973'WB'+57	48X60	RAMP 25 MPH		2				20	1	1	
				SHEET TOTAL 0010	9	24	5	374	20	36	38	31	
				PROJECT TOTAL 0010	26	86	14	1082	40	104	118	103	

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FIELD OFFICE TYPE C

CATEGORY	STATION TO	STATION	LOCATION	642.5201 EACH	REMARKS
0010	239+04 -	974+23	IH 94	1	
			TOTAL 0010	1	

TRAFFIC CONTROL SURVEILLANCE AND MAINTENANCE (1023-02-76)

CATEGORY	STATION TO	STATION	LOCATION	643.0200 DAY	REMARKS
0010	239+04 -	974+24	IH 94	170	
			TOTAL 0010	170	

TRAFFIC CONTROL DRUMS

CATEGORY	STATION TO	STATION	LOCATION	643.0300 DAY	REMARKS
0010	239+04 -	974+24	IH 94	67938	
			TOTAL 0010	67938	

TRAFFIC CONTROL BARRICADES TYPE III

CATEGORY	STATION TO	STATION	LOCATION	643.0420 DAY	REMARKS
0010	239+04 -	974+24	IH 94	4732	
			TOTAL 0010	4732	

TRAFFIC CONTROL WARNING LIGHTS TYPE A

CATEGORY	STATION TO	STATION	LOCATION	643.0705 DAY	REMARKS
0010	239+04 -	974+24	IH 94	9464	
			TOTAL 0010	9464	

TRAFFIC CONTROL WARNING LIGHTS TYPE C

CATEGORY	STATION TO	STATION	LOCATION	643.0715 DAY	REMARKS
0010	239+04 -	974+24	IH 94	11154	
			TOTAL 0010	11154	

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TRAFFIC CONTROL ARROW BOARDS

CATEGORY	STATION TO	STATION	LOCATION	643.0800 DAY	REMARKS
0010	239+04 -	974+24	IH 94	676	
			TOTAL 0010	676	

TRAFFIC CONTROL SIGNS

CATEGORY	STATION TO	STATION	LOCATION	643.0900 DAY	REMARKS
0010	239+04 -	974+24	IH 94	15210	
			TOTAL 0010	15210	

TRAFFIC CONTROL COVERING SIGNS TYPE II

CATEGORY	STATION TO	STATION	LOCATION	643.0920 EACH	REMARKS
0010	239+04 -	974+24	IH 94	5	
			TOTAL 0010	5	

TRAFFIC CONTROL SIGNS PCMS

CATEGORY	STATION TO	STATION	LOCATION	643.1050 DAY	REMARKS
0010	239+04 -	974+24	IH 94	338	
			TOTAL 0010	338	

TRAFFIC CONTROL SIGNS FIXED MESSAGE

CATEGORY	STATION TO	STATION	LOCATION	643.1000 SF	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94	56	PERIODIC LANE CLOSURES, WATCH FOR SLOW TRAFFIC
0010	239'EB'+04 -	973'EB'+90	IH 94	56	PERIODIC LANE CLOSURES, WATCH FOR SLOW TRAFFIC
0010	241'WB'+28 -	974'WB'+23	IH 94	56	PERIODIC LANE CLOSURES, WATCH FOR SLOW TRAFFIC
0010	241'WB'+28 -	974'WB'+23	IH 94	56	PERIODIC LANE CLOSURES, WATCH FOR SLOW TRAFFIC
			TOTAL 0010	224	

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PAVEMENT MARKING EPOXY 4-INCH

CATEGORY	STATION TO		STATION	LOCATION	646.0106 LF	REMARKS
0010	598'EB'+54	-	599'EB'+59	IH 94, B-27-0148	132	WHITE
0010	598'EB'+54	-	599'EB'+59	IH 94, B-27-0148	105	YELLOW
0010	611'EB'+70	-	614'EB'+24	IH 94, B-27-0046	318	WHITE
0010	611'EB'+70	-	614'EB'+24	IH 94, B-27-0046	254	YELLOW
0010	598'WB'+76	-	599'WB'+81	IH 94, B-27-0149	132	WHITE
0010	598'WB'+76	-	599'WB'+81	IH 94, B-27-0149	105	YELLOW
0010	962'WB'+99	-	964'WB'+37	IH 94, B-27-0022	173	WHITE
0010	962'WB'+99	-	964'WB'+37	IH 94, B-27-0022	138	YELLOW
				TOTAL 0010	1357	

PAVEMENT MARKING GROOVED WET REFLECTIVE EPOXY 8-INCH

CATEGORY	STATION TO		STATION	LOCATION	646.2308.S LF	REMARKS
0010	601+50	-	603+97	EB STH 121 OFF RAMP	495	
0010	614+24	-	621+00	EB STH 121 ON RAMP	1352	
0010	625+61	-	628+54	WB STH 121 OFF RAMP	585	
0010	602+00	-	606+56	WB STH 121 ON RAMP	912	
0010	964'EB'+57	-	966'EB'+28	EB STH 95 OFF RAMP	341	
0010	970'EB'+96	-	973'EB'+93	EB STH 95 ON RAMP	594	
0010	971'WB'+61	-	973'WB'+43	WB STH 95 OFF RAMP	371	
0010	961'WB'+56	-	967'WB'+43	WB STH 95 ON RAMP	1174	
				TOTAL 0010	5824	

PAVEMENT MARKING STOP LINE EPOXY 18-INCH

CATEGORY	STATION	LOCATION	647.0566 LF	REMARKS
0010	610+43	EB STH 121 OFF RAMP	27	
0010	610+51	EB STH 121 OFF RAMP	25	
0010	616+62	WB STH 121 OFF RAMP	24	
0010	616+67	WB STH 121 OFF RAMP	34	
		TOTAL 0010	110	

PAVEMENT MARKING GROOVED WET REFLECTIVE EPOXY 4-INCH

CATEGORY	STATION TO		STATION	LOCATION	646.2304.S LF	REMARKS
0010	239'EB'+04	-	973'EB'+90	IH 94	76625	YELLOW
0010	239'EB'+04	-	973'EB'+90	IH 94	76625	WHITE
0010	241'WB'+28	-	974'WB'+23	IH 94	76794	YELLOW
0010	241'WB'+28	-	974'WB'+23	IH 94	76794	WHITE
0010	239'EB'+04	-	973'EB'+90	IH 94	19157	LANE LINE (WHITE)
0010	241'WB'+28	-	974'WB'+23	IH 94	19199	LANE LINE (WHITE)
0010	601+50	-	610+72	EB STH 121 OFF RAMP	922	YELLOW
0010	601+50	-	610+72	EB STH 121 OFF RAMP	922	WHITE
0010	609+27	-	621+00	EB STH 121 ON RAMP	1173	YELLOW
0010	609+27	-	621+00	EB STH 121 ON RAMP	1173	WHITE
0010	616+34	-	628+54	WB STH 121 OFF RAMP	1220	YELLOW
0010	616+34	-	628+54	WB STH 121 OFF RAMP	1220	WHITE
0010	602+00	-	617+19	WB STH 121 ON RAMP	1519	YELLOW
0010	602+00	-	617+19	WB STH 121 ON RAMP	1519	WHITE
				TOTAL 0010	354862	

TEMPORARY PAVEMENT MARKING PAINT 4-INCH

CATEGORY	STATION TO		STATION	LOCATION	649.0402 LF	REMARKS
0010	239'EB'+04	-	973'EB'+90	IH 94	76625	LOWER LAYER - EDGE LINE (YELLOW)
0010	239'EB'+04	-	973'EB'+90	IH 94	76625	LOWER LAYER - EDGE LINE (WHITE)
0010	239'EB'+04	-	973'EB'+90	IH 94	76625	UPPER LAYER - EDGE LINE (YELLOW)
0010	239'EB'+04	-	973'EB'+90	IH 94	76625	UPPER LAYER - EDGE LINE (WHITE)
0010	239'EB'+04	-	973'EB'+90	IH 94	19156	LOWER LAYER - LANE LINE (WHITE)
0010	239'EB'+04	-	973'EB'+90	IH 94	19156	UPPER LAYER - LANE LINE (WHITE)
0010	241'WB'+28	-	974'WB'+23	IH 94	76794	LOWER LAYER - EDGE LINE (YELLOW)
0010	241'WB'+28	-	974'WB'+23	IH 94	76794	LOWER LAYER - EDGE LINE (WHITE)
0010	241'WB'+28	-	974'WB'+23	IH 94	76794	UPPER LAYER - EDGE LINE (YELLOW)
0010	241'WB'+28	-	974'WB'+23	IH 94	76794	UPPER LAYER - EDGE LINE (WHITE)
0010	241'WB'+28	-	974'WB'+23	IH 94	19198	LOWER LAYER - LANE LINE (WHITE)
0010	241'WB'+28	-	974'WB'+23	IH 94	19198	UPPER LAYER - LANE LINE (WHITE)
0010	601+50	-	610+72	EB STH 121 OFF RAMP	1844	EDGE LINE (YELLOW) AND LANE LINE (WHITE)
0010	609+27	-	621+00	EB STH 121 ON RAMP	2346	EDGE LINE (YELLOW) AND LANE LINE (WHITE)
0010	616+34	-	628+54	WB STH 121 OFF RAMP	2440	EDGE LINE (YELLOW) AND LANE LINE (WHITE)
0010	602+00	-	617+19	WB STH 121 ON RAMP	3038	EDGE LINE (YELLOW) AND LANE LINE (WHITE)
				TOTAL 0010	700052	

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CONSTRUCTION STAKING RESURFACING REFERENCE

CATEGORY	STATION TO	STATION	LOCATION	650.8000 LF	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94 EASTBOUND	73101	
0010	241'WB'+28 -	974'WB'+23	IH 94 WESTBOUND	73006	
0010	601+50 -	610+72	EB STH 121 OFF RAMP	922	
0010	609+27 -	621+00	EB STH 121 ON RAMP	1173	
0010	616+34 -	628+54	WB STH 121 OFF RAMP	1220	
0010	602+00 -	617+19	WB STH 121 ON RAMP	1519	
			TOTAL 0010	150941	

CONSTRUCTION STAKING SUPPLEMENTAL CONTROL (1023-02-76)

CATEGORY	STATION TO	STATION	LOCATION	650.9910 LS	REMARKS
0010	239+04 -	974+24	IH 94	1	
			TOTAL 0010	1	

SAWING ASPHALT

CATEGORY	STATION TO	STATION	LOCATION	690.0150 LF	REMARKS
0010	239+04 -	974+23	IH 94	520	STH 121 INTERCHANGE
			TOTAL 0010	520	

SAWING CONCRETE

CATEGORY	STATION TO	STATION	LOCATION	690.0250 LF	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94	1360	
0010	241'WB'+28 -	974'WB'+23	IH 94	816	
			TOTAL 0010	2176	

SPECIAL 01. CONTINUOUSLY REINFORCED CONCRETE REPAIR SPECIAL

CATEGORY	STATION TO	STATION	LOCATION	SPV.0035.01 CY	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94	104	38 4' PATCHES, 4 6' PATCHES
0010	241'WB'+28 -	974'WB'+23	IH 94	100	21 4' PATCHES, 4 6' PATCHES
			TOTAL 0010	204	

SPECIAL 01. PORTABLE CHANGEABLE MESSAGE SIGN (PCMS) CELLULAR COMMUNICATIONS

CATEGORY	STATION TO	STATION	LOCATION	SPV.0045.01 DAY	REMARKS
0010	239+04 -	974+24	IH 94	338	
			TOTAL 0010	338	

SPECIAL 01. CLEANING DITCH

CATEGORY	STATION	LOCATION	SPV.0060.01 EACH	REMARKS
0010	721'EB'+89	IH 94	1	RIGHT
0010	836'EB'+54	IH 94	1	RIGHT
0010	316'WB'+54	IH 94	1	LEFT
0010	733'WB'+44	IH 94	1	LEFT
		TOTAL 0010	4	

SPECIAL 01. MILLING AND REMOVING TEMPORARY JOINT 1023-02-06

CATEGORY	STATION TO	STATION	LOCATION	SPV.0105.01 LS	REMARKS
0010	239+04 -	974+24	IH 94	1	
			TOTAL 0010	1	

SPECIAL 02. MATERIAL TRANSFER VEHICLE 1023-02-76

CATEGORY	STATION TO	STATION	LOCATION	SPV.0105.02 LS	REMARKS
0010	239+04 -	974+24	IH 94	1	
			TOTAL 0010	1	

SPECIAL 03. PREPARATION OF FOUNDATION FOR ASPHALTIC PAVING SPECIAL 1023-02-76

CATEGORY	STATION TO	STATION	LOCATION	SPV.0105.03 LS	REMARKS
0010	239+04 -	974+24	IH 94	1	
			TOTAL 0010	1	

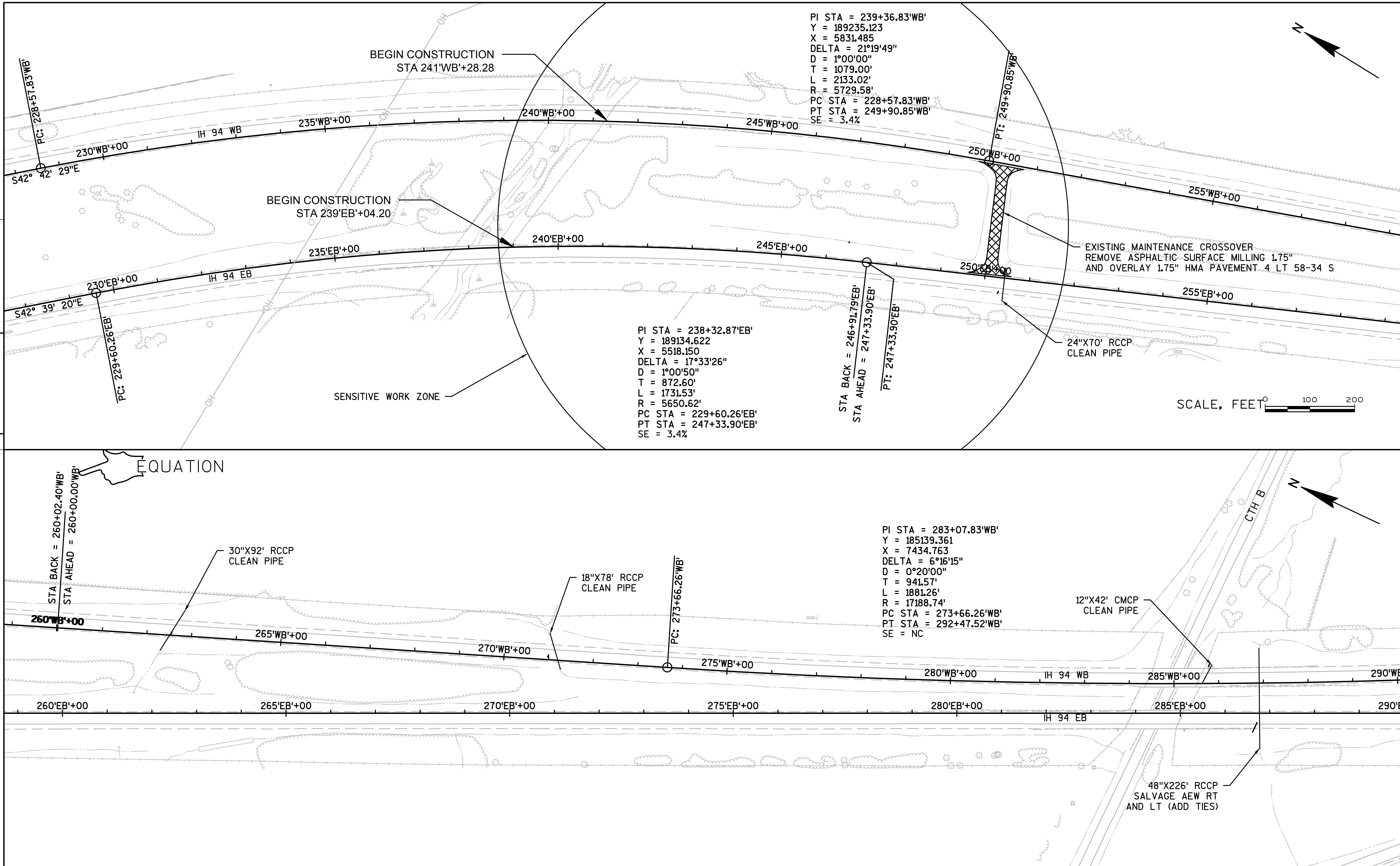
SPECIAL 01. HMA PAVEMENT TYPE SMA-SPECIAL

CATEGORY	STATION TO	STATION	LOCATION	SPV.0195.01 TON	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94	25472	
0010	241'WB'+28 -	974'WB'+23	IH 94	25438	
			TOTAL 0010	50910	

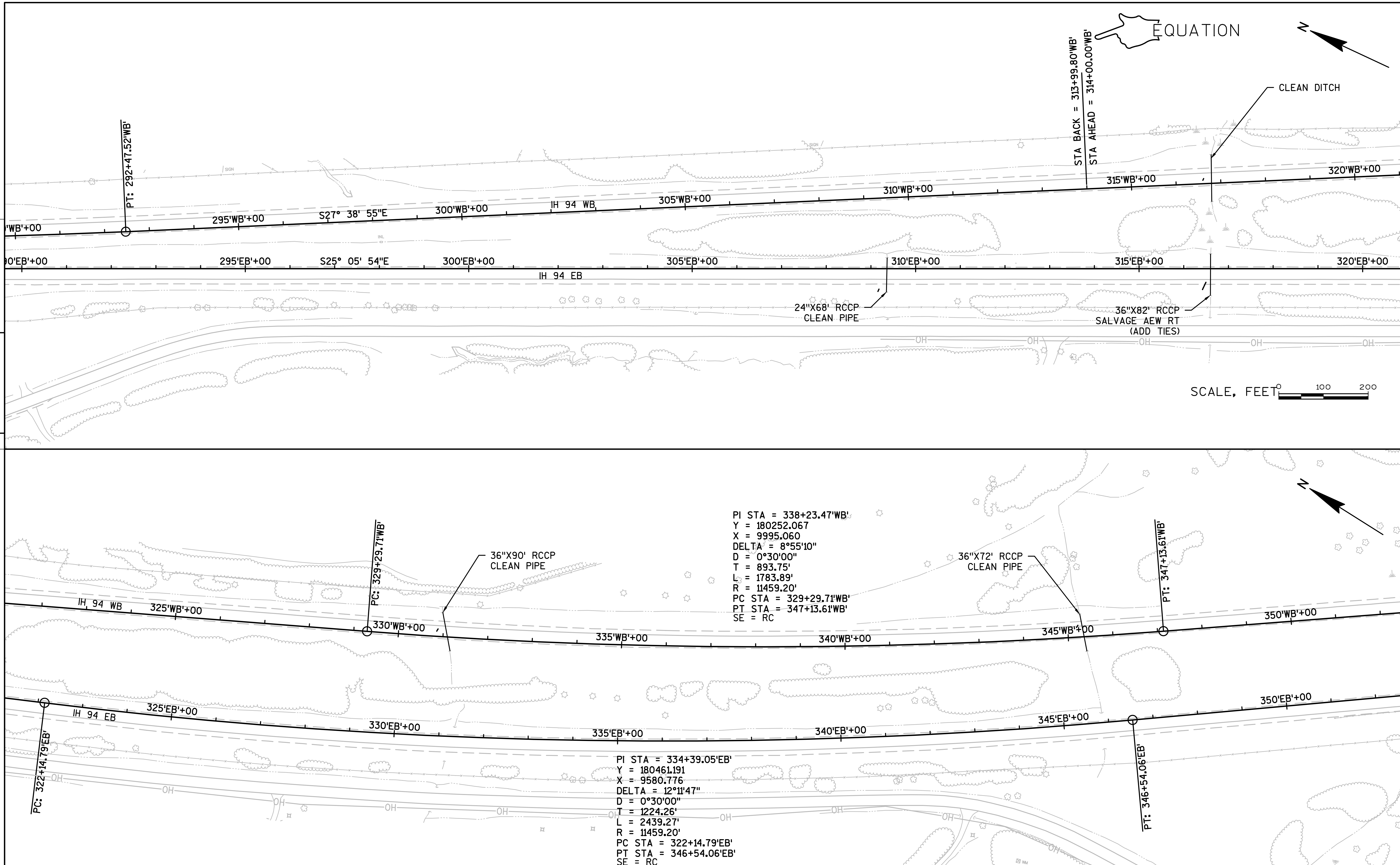
SPECIAL 02. SMA PAVEMENT COMPACTION ACCEPTANCE

CATEGORY	STATION TO	STATION	LOCATION	SPV.0195.02 TON	REMARKS
0010	239'EB'+04 -	973'EB'+90	IH 94	25472	
0010	241'WB'+28 -	974'WB'+23	IH 94	25438	
			TOTAL 0010	50910	

3



PROJECT NO:1023-02-76	HWY: IH 94	COUNTY: JACKSON	PLAN: IH 94 EB & WB	SHEET 47	E



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LAYOUT NAME - 050202
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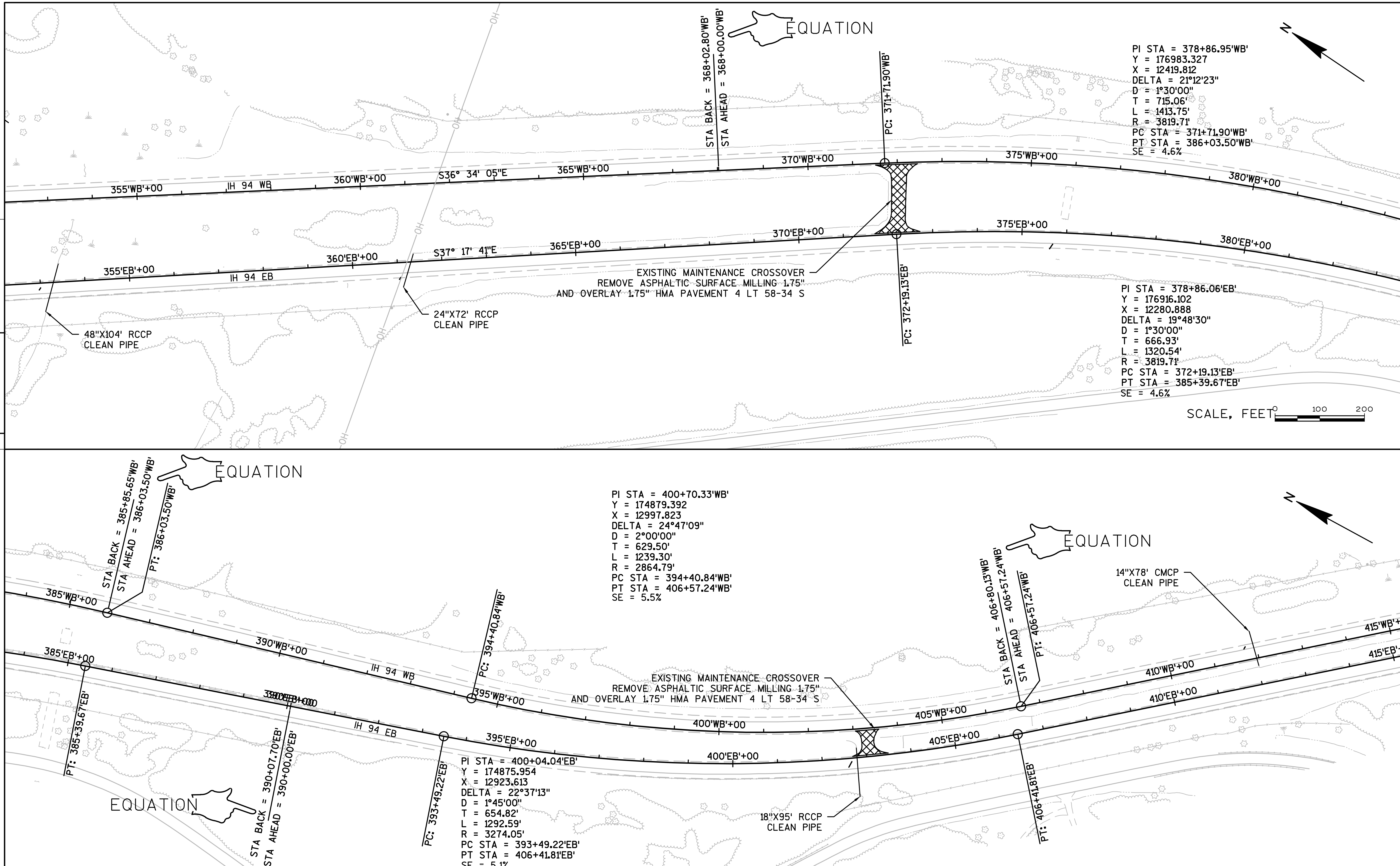
PLOT BY : BECKLIN, MATTHEW R PLOT NAME : ____________________ PLOT SCALE : ***********
WISDOT/CADDS SHEET 44



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PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
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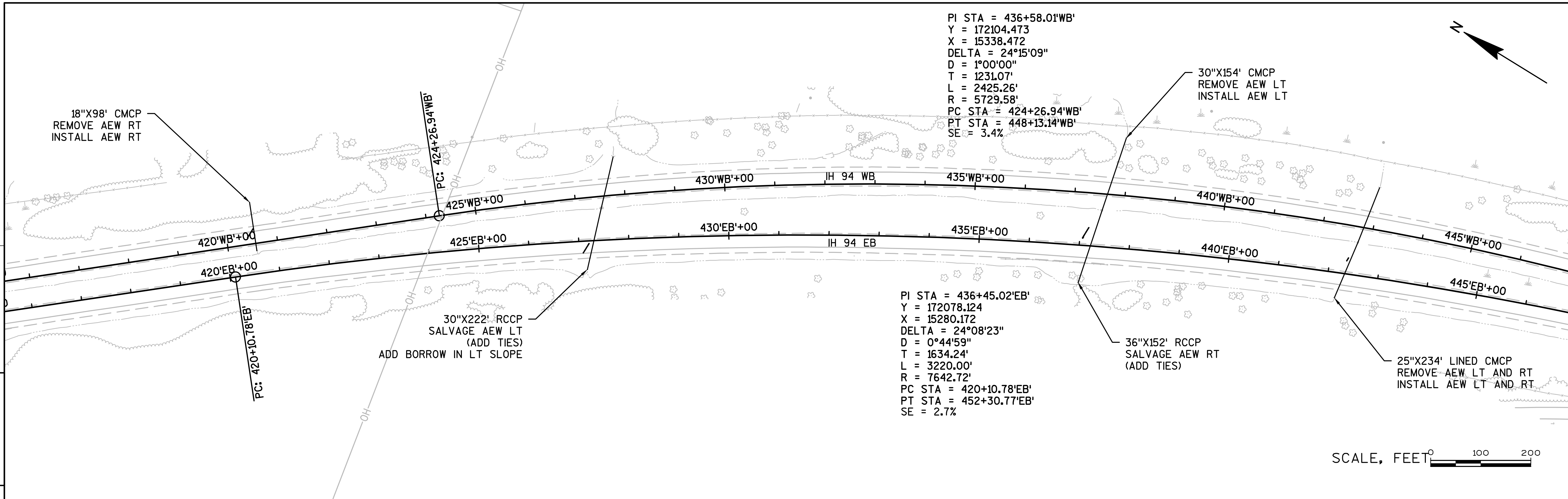
WISDOT/CADDS SHEET 44



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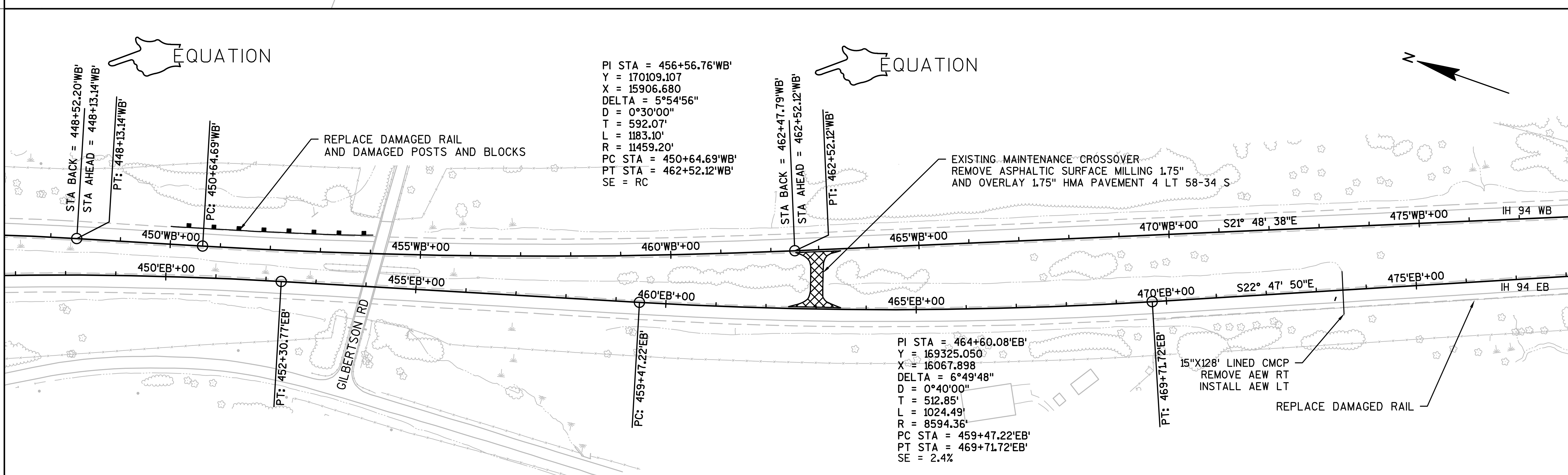

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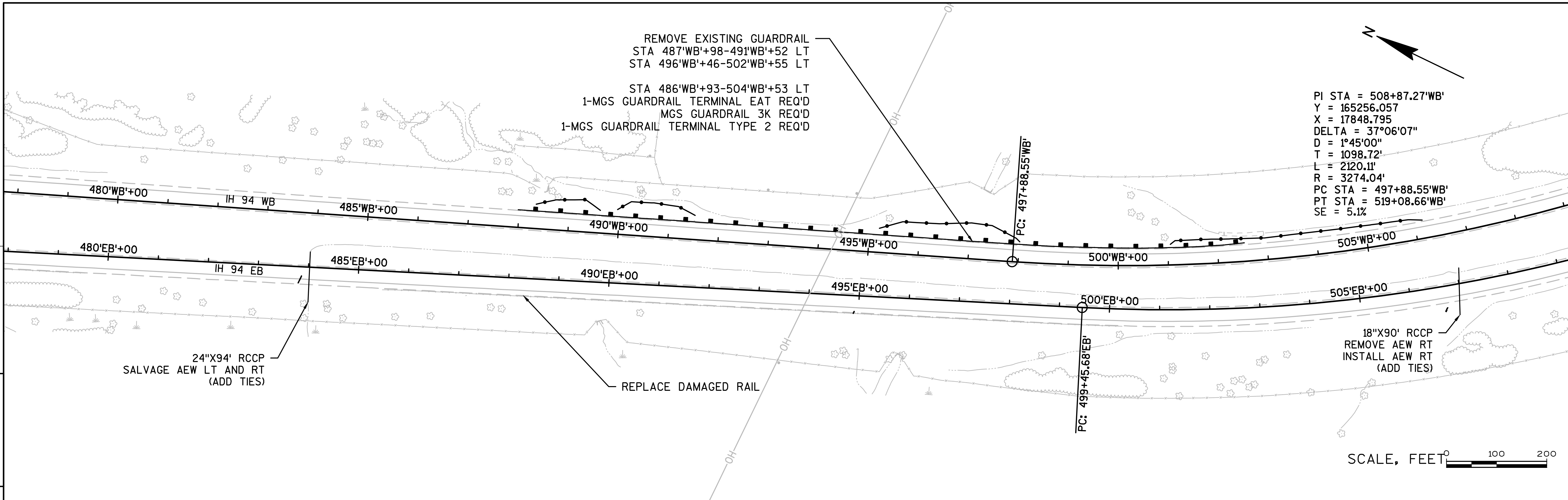

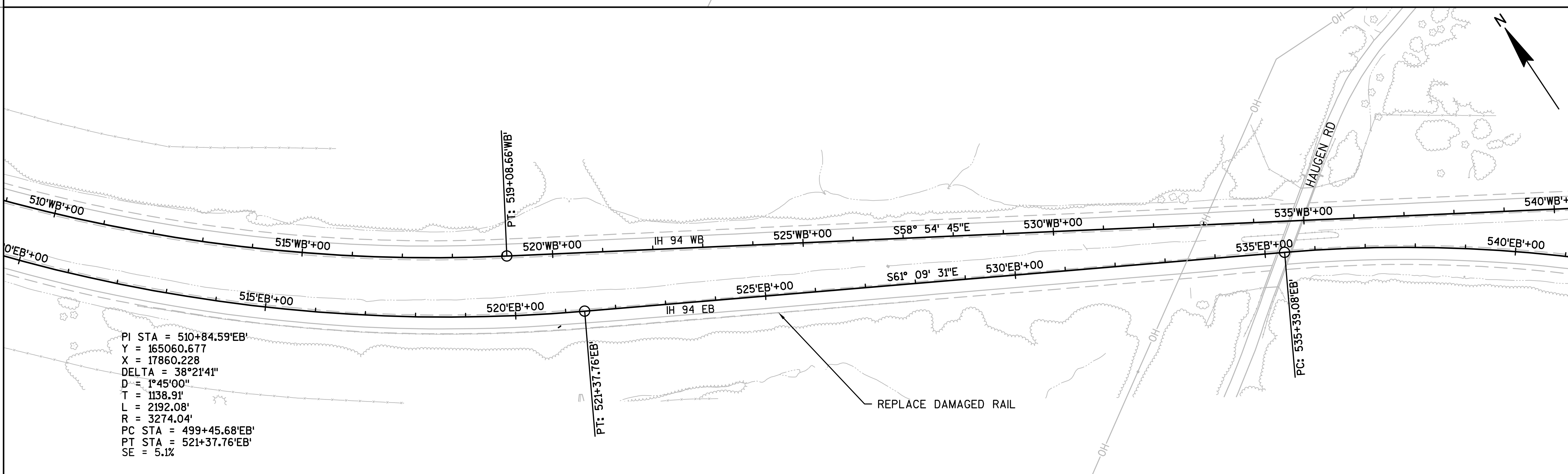

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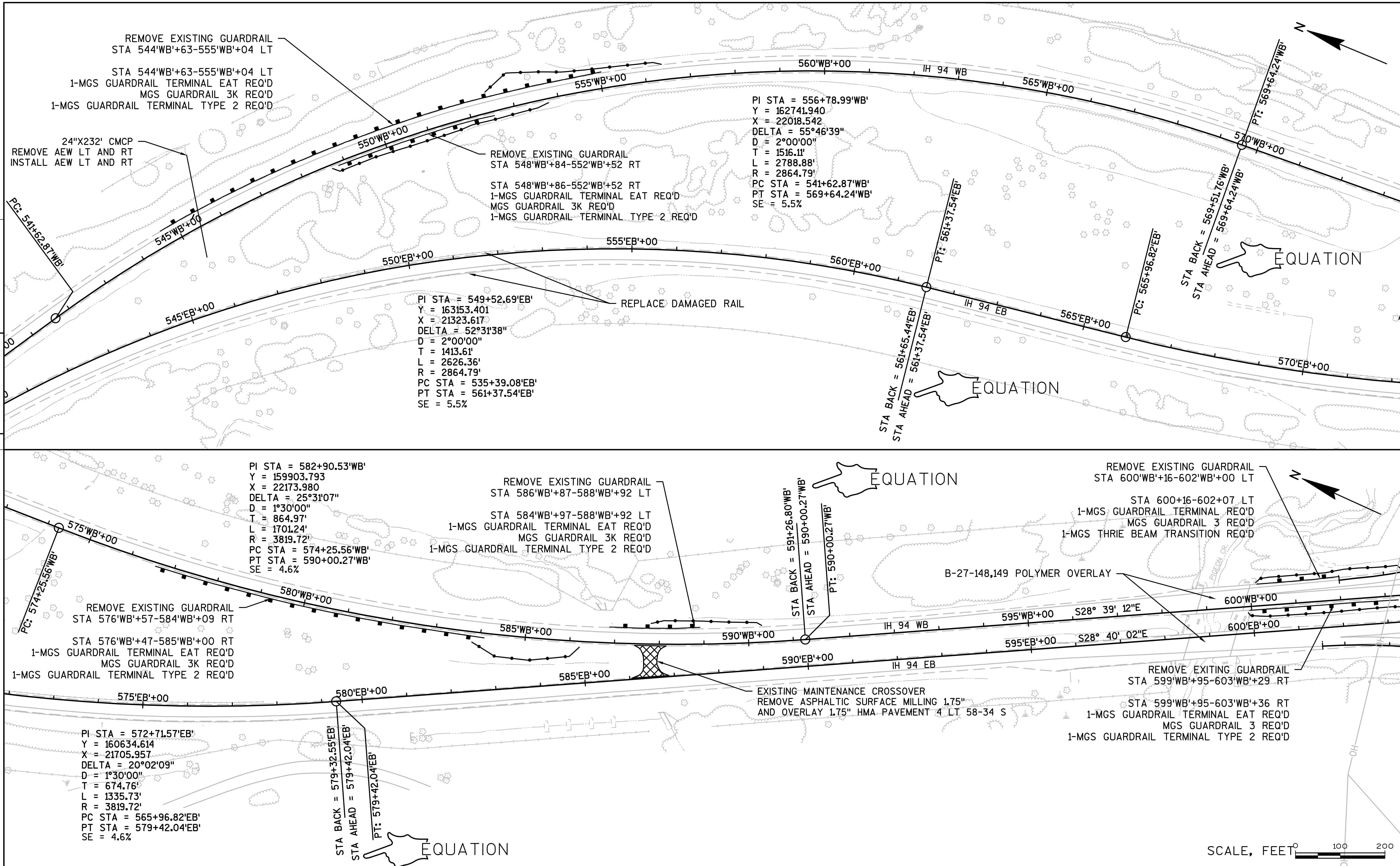

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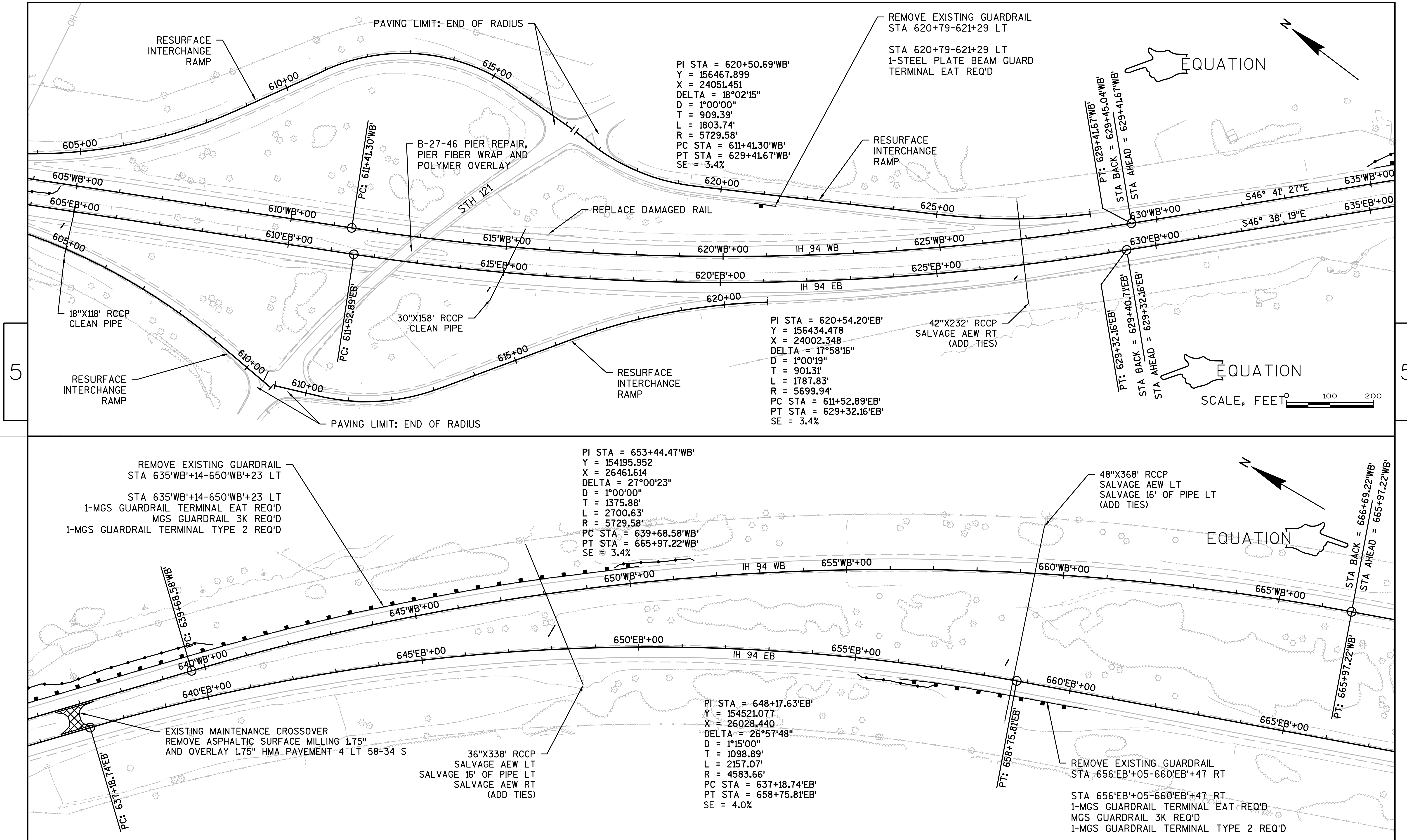

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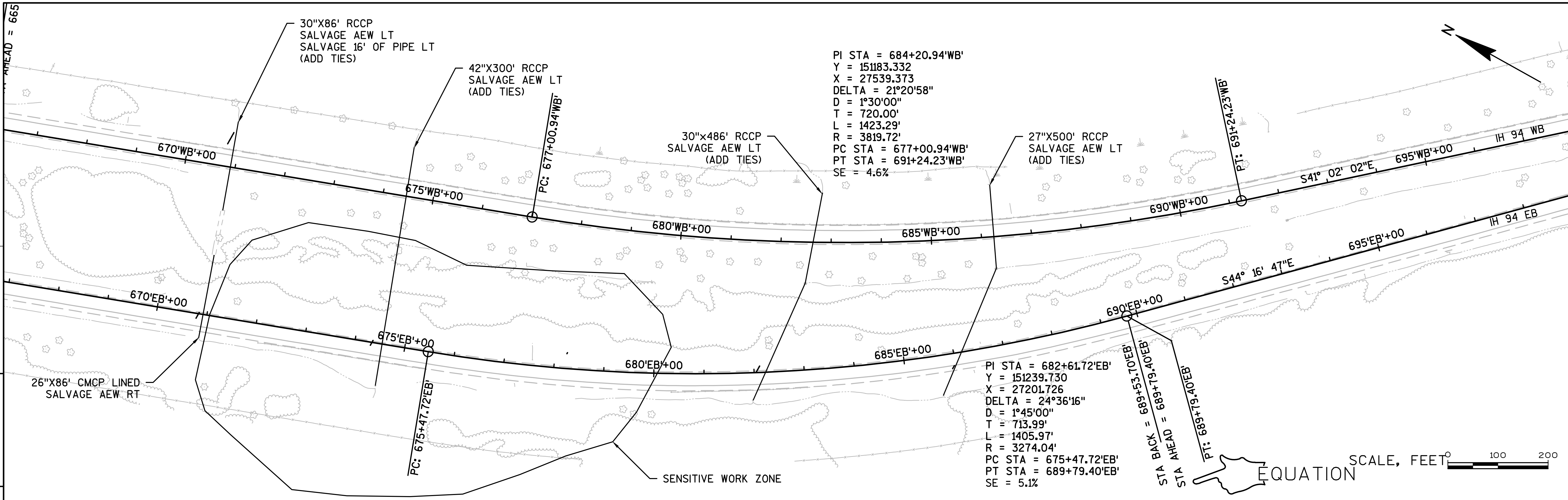

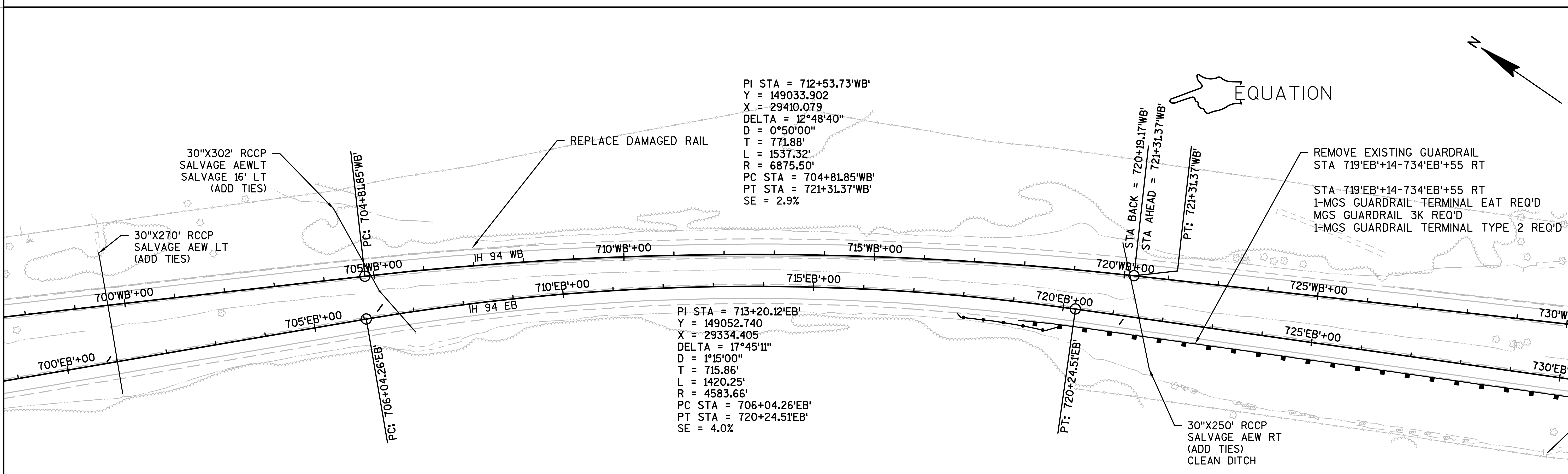

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PLOT BY : BECKLIN, MATTHEW R
PLOT NAME : ____________________
PLOT SCALE : ===========
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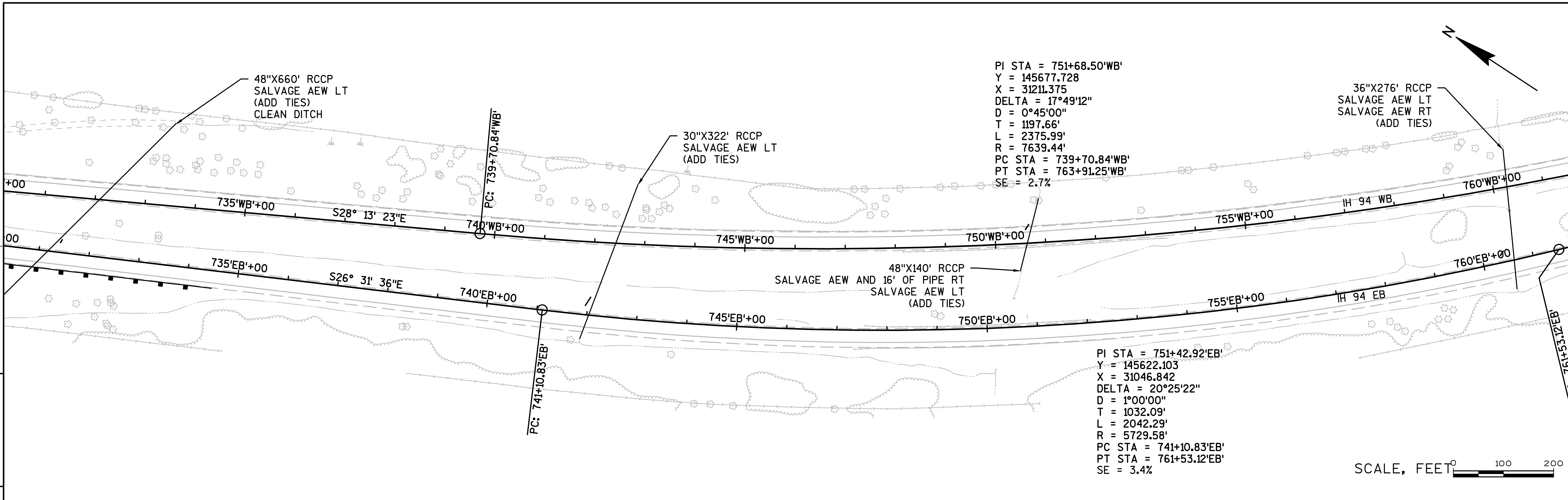

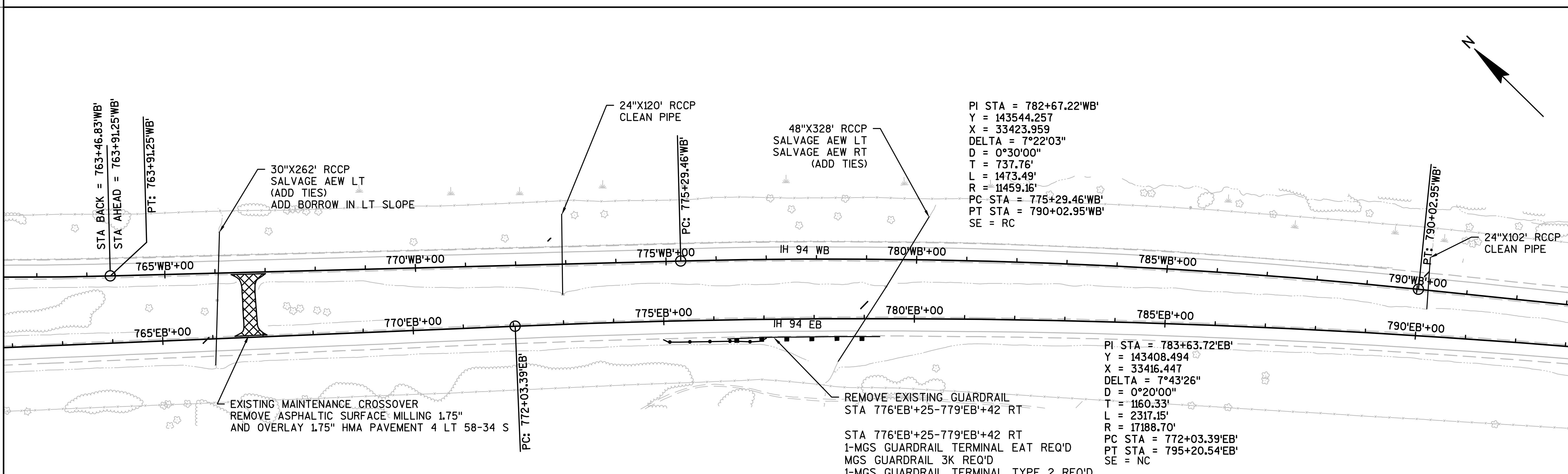

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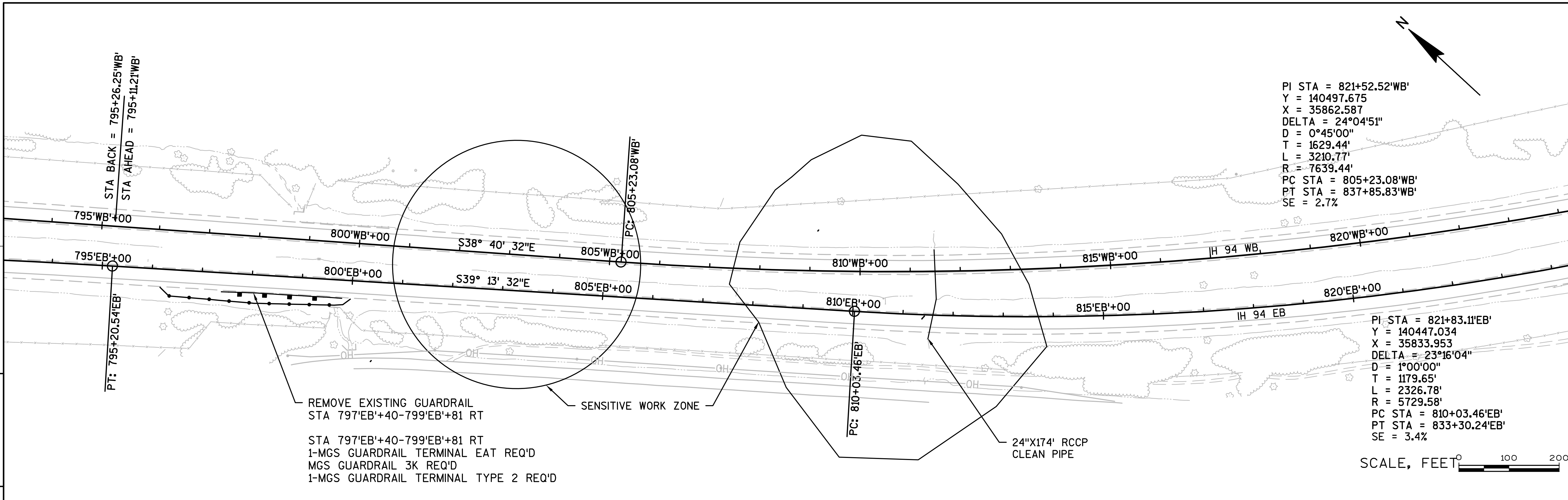

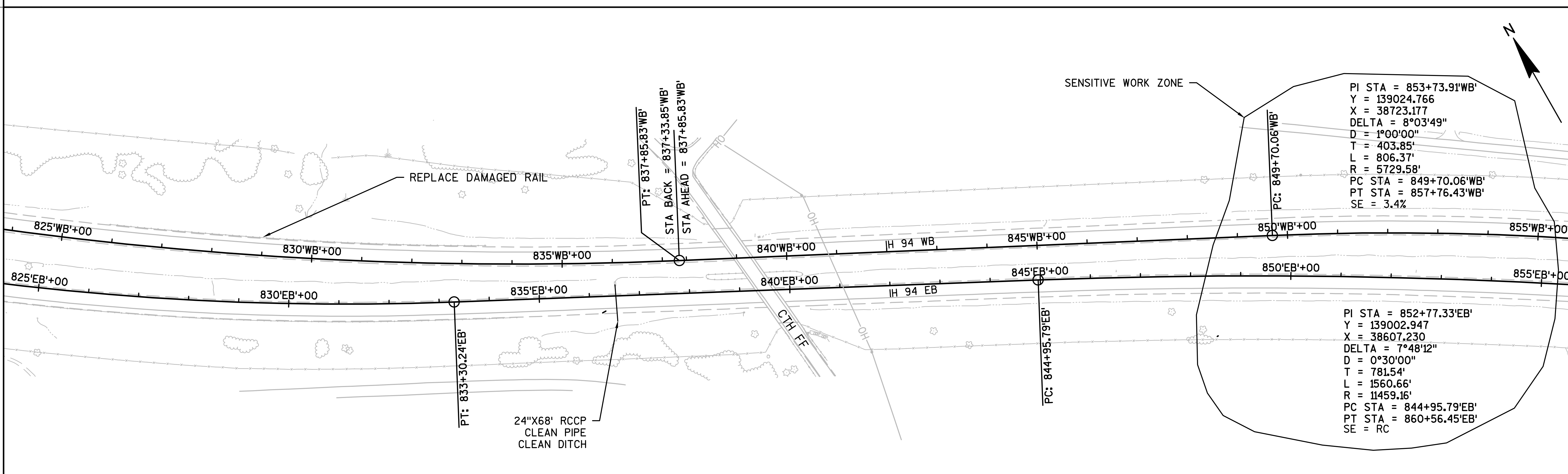

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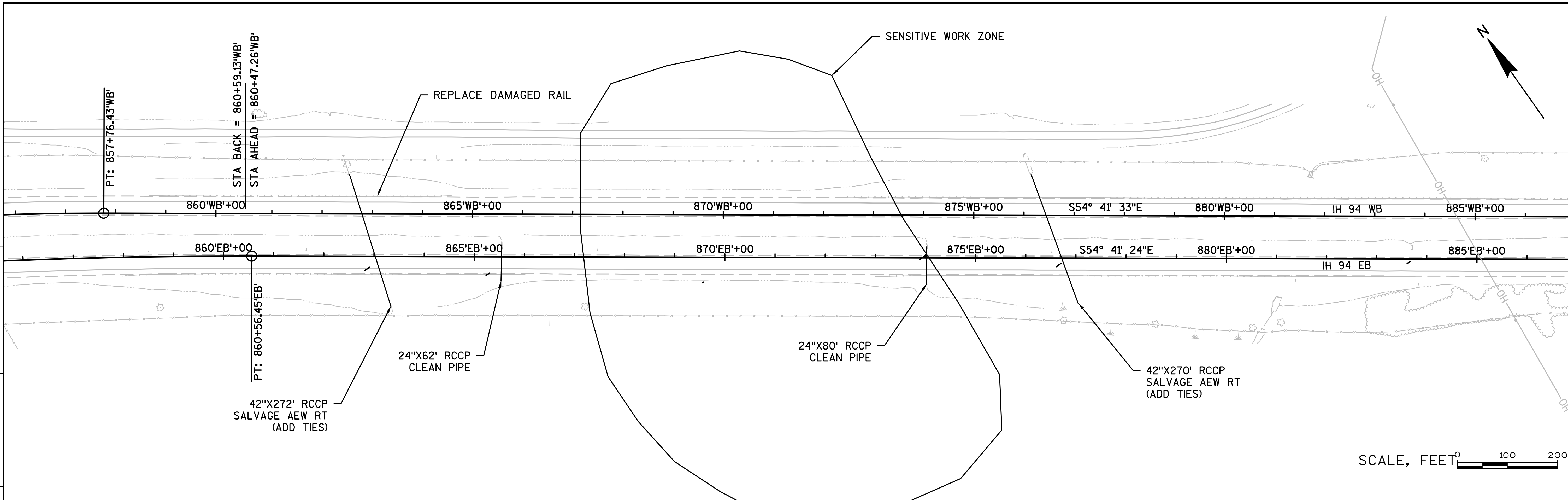

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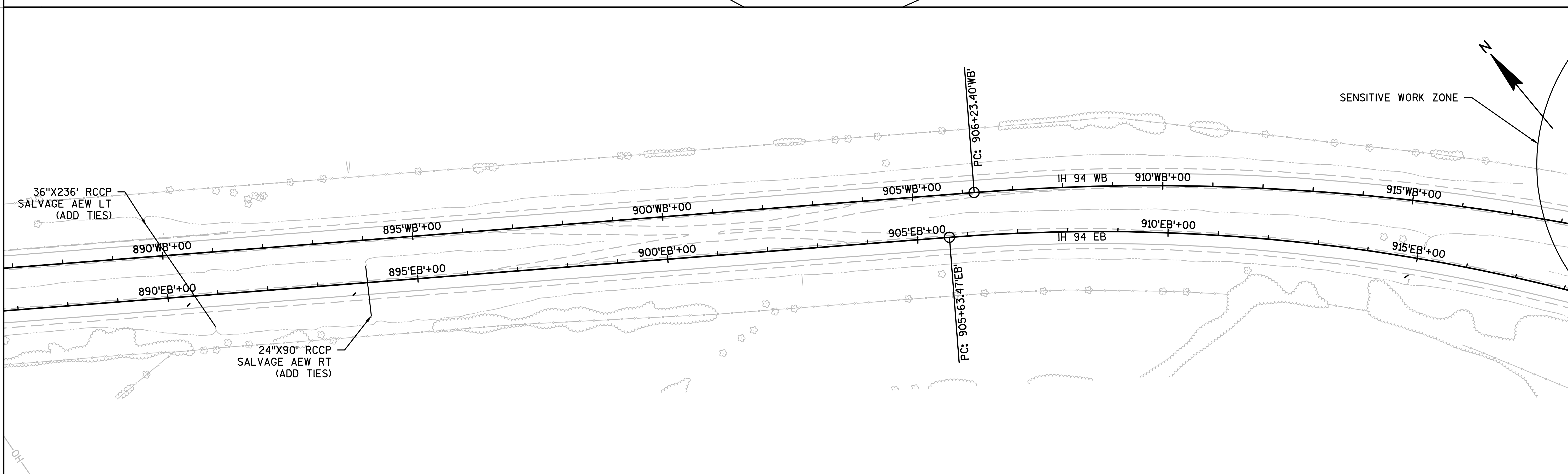

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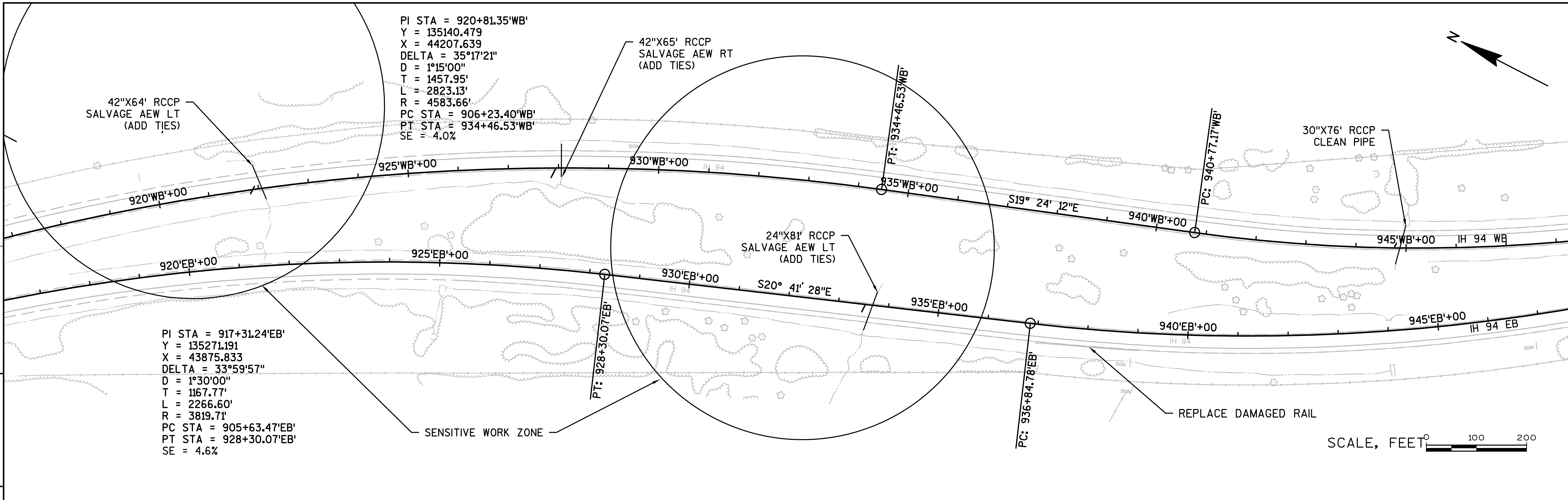

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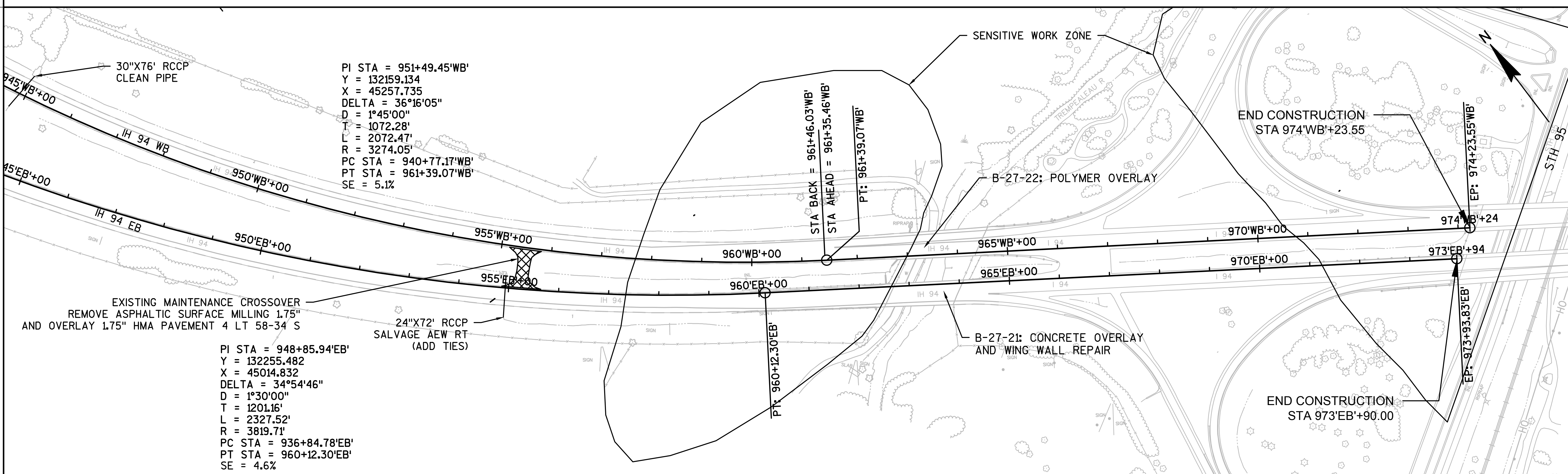

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	PLAN: IH 94 EB & WB	SHEET 58	E

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LAYOUT NAME - 050212

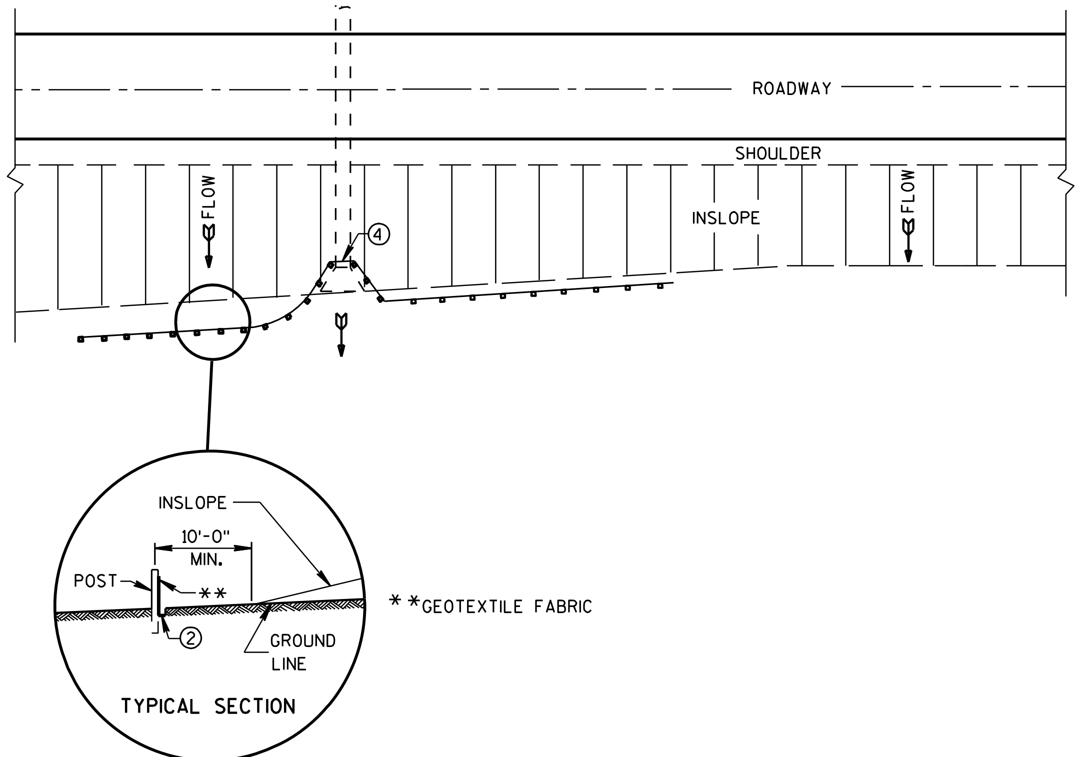
PLOT DATE : 3/7/2016 3:44 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : ===========

WISDOT/CADDS SHEET 44

Standard Detail Drawing List

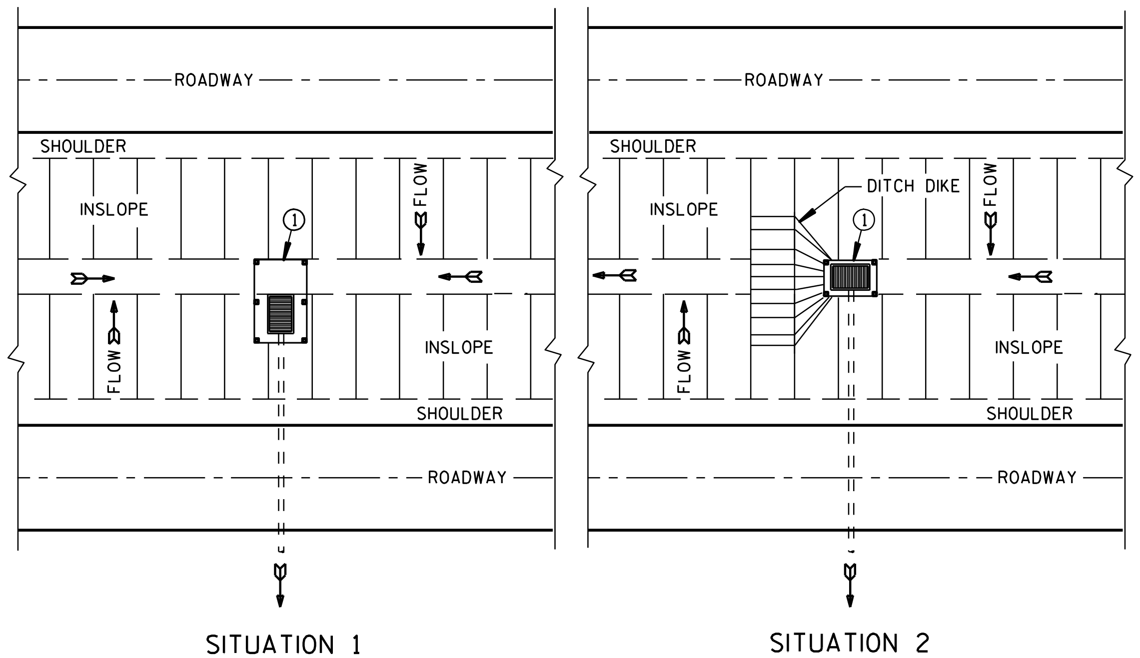
08E09-06	SILT FENCE
08F01-11	APRON ENDWALLS FOR CULVERT PIPE
08F04-07	JOINT TIES FOR CONCRETE PIPE AND CONCRETE COLLAR DETAIL
11A01-05	MAINTENANCE CROSSOVER FOR FREEWAYS
13A05-05A	SHOULDER RUMBLE STRIP, MILLING
13A05-05B	SHOULDER RUMBLE STRIP, MILLING
13A07-02	CONTINUOUSLY REINFORCED CONCRETE PAVEMENT REPAIR AND REPLACEMENT
13C09-13A	CONCRETE PAVEMENT REPAIR AND REPLACEMENT
13C09-13B	CONCRETE PAVEMENT REPAIR AND REPLACEMENT
13C09-13C	CONCRETE PAVEMENT REPAIR AND REPLACEMENT
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
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)
14B47-02A	MIDWEST GUARDRAIL SYSTEM (MGS) TYPE 2 TERMINAL
14B47-02B	MIDWEST GUARDRAIL SYSTEM (MGS) TYPE 2 TERMINAL
14B47-02C	MIDWEST GUARDRAIL SYSTEM (MGS) TYPE 2 TERMINAL
15A02-08	DELINEATOR POST, DELINEATOR, AND DELINEATOR BRACKET WITH REFLECTIVE SHEETING
15A03-02A	FLEXIBLE MARKER POST FOR CULVERT END
15A03-02B	FLEXIBLE MARKER POST FOR CULVERT END
15A06-02	DELINEATOR LAYOUT
15C08-16A	PAVEMENT MARKING (MAINLINE)
15C19-03C	MOVING PAVEMENT MARKING OPERATION MULTI-LANE DIVIDED ROADWAY
15C31-01A	PAVEMENT MARKING (RAMPS AND GORES)
15C31-01D	PAVEMENT MARKING FOR PARALLEL ON-RAMP AND PARALLEL OFF-RAMP
15D04-01	TRAFFIC CONTROL, RAMP CONSTRUCTION STAGING
15D12-05B	TRAFFIC CONTROL, LANE CLOSURE, SPEED REDUCTION
15D15-02	TRAFFIC CONTROL, EXIT AND ENTRANCE RAMP WITHIN LANE CLOSURE
15D27-02	TRAFFIC CONTROL, SHOULDER CLOSURE ON DIVIDED ROADWAY, SPEEDS GREATER THAN 40 MPH

6



PLAN VIEW

TYPICAL APPLICATION OF SILT FENCE



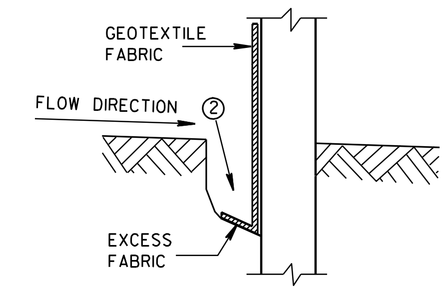
PLAN VIEW

SILT FENCE AT MEDIAN SURFACE DRAINS

GENERAL NOTES

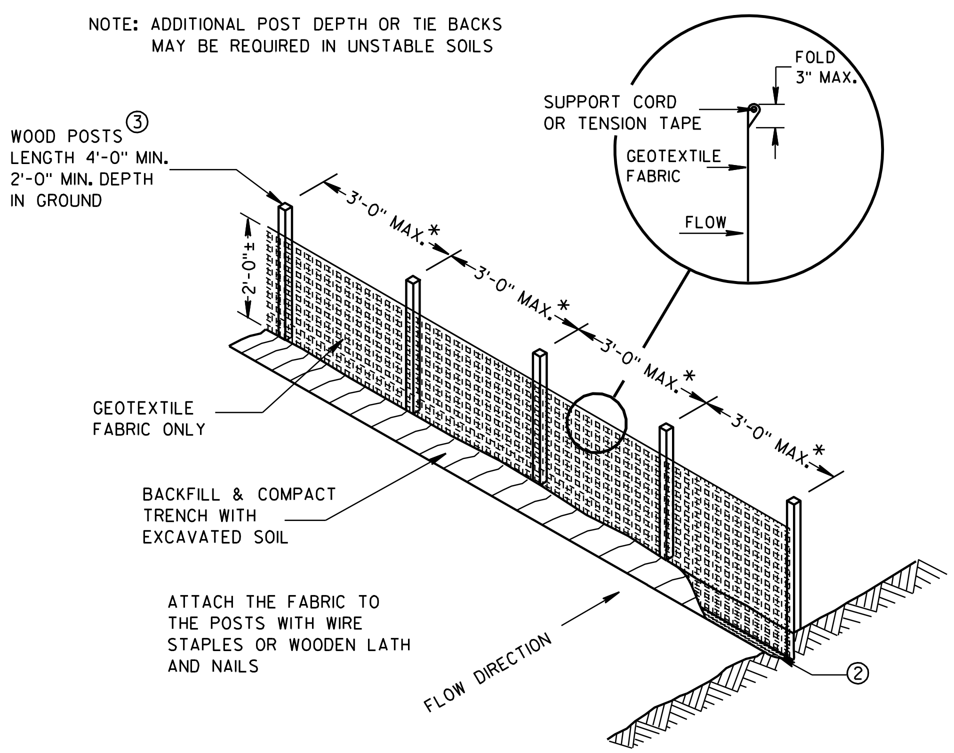
DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

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.



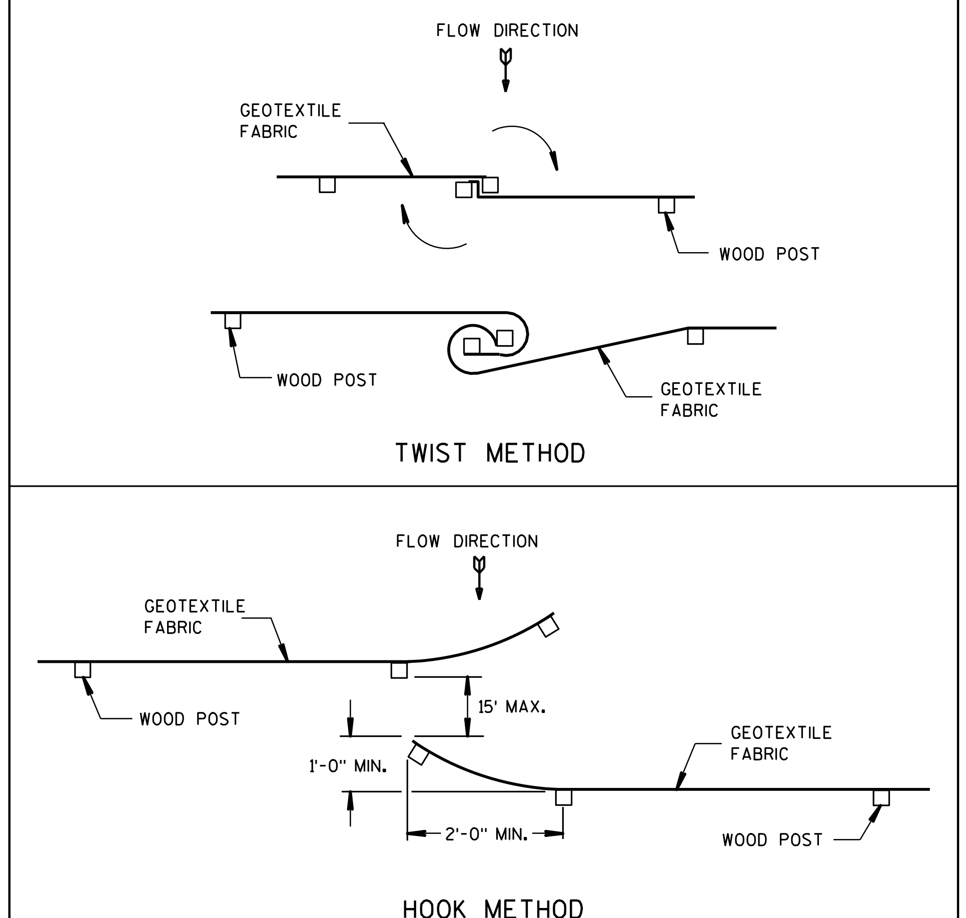
TRENCH DETAIL

NOTE: ADDITIONAL POST DEPTH OR TIE BACKS MAY BE REQUIRED IN UNSTABLE SOILS

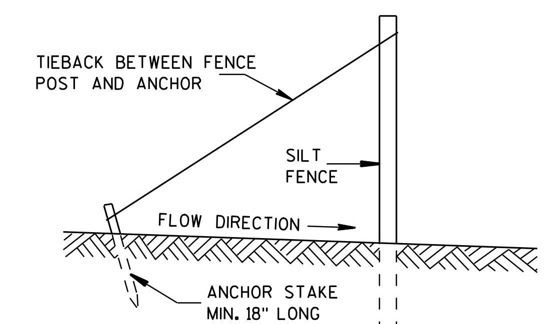


*NOTE: 8'-0" POST SPACING ALLOWED IF A WOVEN GEOTEXTILE FABRIC IS USED.

SILT FENCE



JOINING TWO LENGTHS OF SILT FENCE 5



SILT FENCE TIE BACK

(WHEN REQUIRED BY THE ENGINEER)

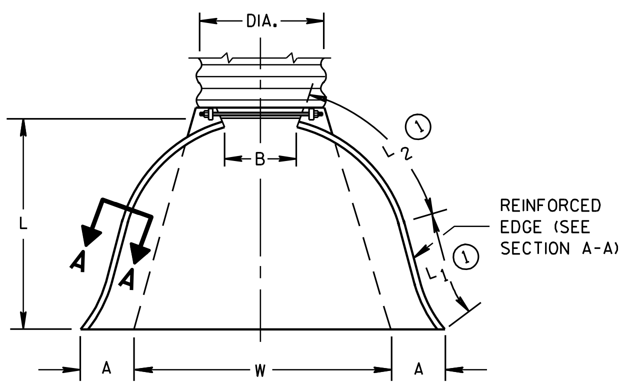
SILT FENCE
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION
APPROVED 4-29-05 DATE /S/ Beth Cann[illegible] CHIEF ROADWAY DEVELOPMENT ENGINEER FHWA

METAL APRON ENDWALLS											
PIPE DIA. (IN.)	MIN. THICK. (Inches)		DIMENSIONS (Inches)							APPROX. SLOPE	BODY
	STEEL	ALUM.	A (±1")	B (MAX.)	H (±1")	L (±1 1/2")	L1 ①	L2 ①	W (±2")		
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.

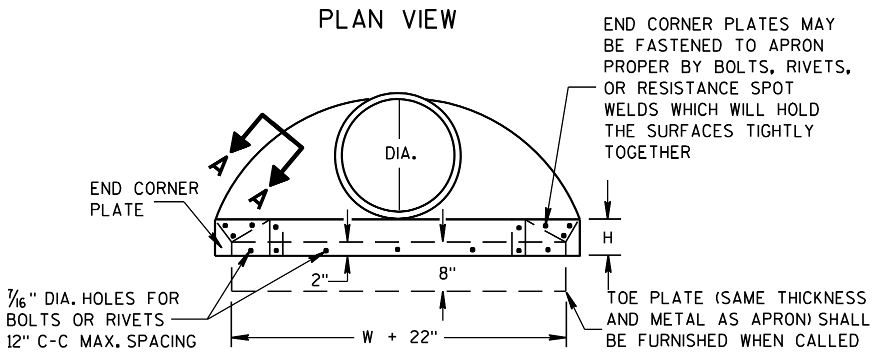
× EXCEPT CENTER PANEL
SEE GENERAL NOTES

REINFORCED CONCRETE APRON ENDWALLS								
PIPE DIA. (IN.)	DIMENSIONS (Inches)							APPROX. SLOPE
	T	A	B	C	D	E	G	
12	2	4	24	48 7/8	72 7/8	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

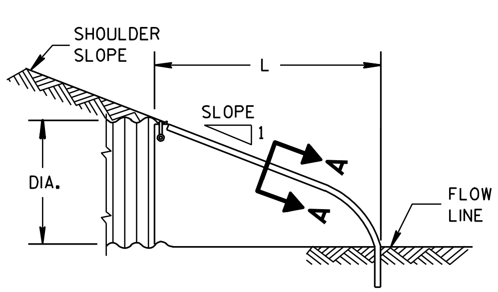
*MINIMUM
**MAXIMUM



PLAN VIEW

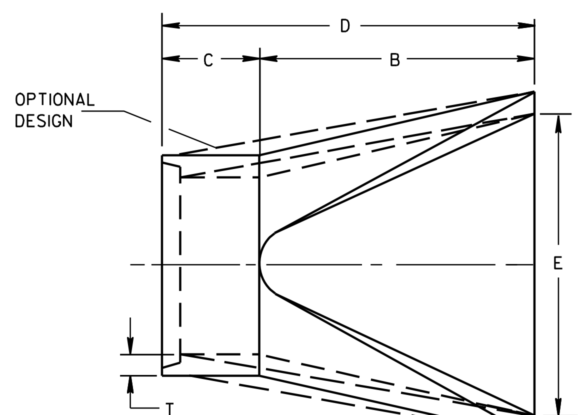


END VIEW

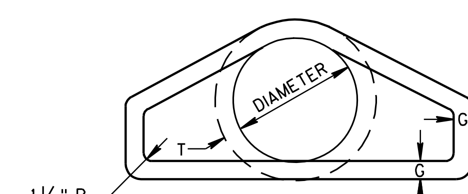


SIDE ELEVATION

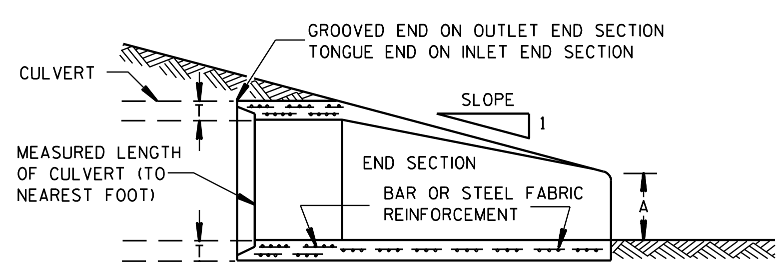
METAL ENDWALLS



PLAN

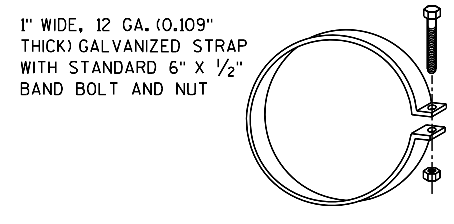


END VIEW



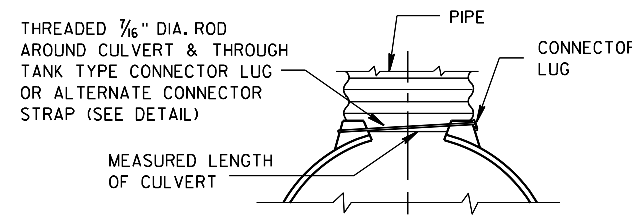
LONGITUDINAL SECTION

CONCRETE ENDWALLS

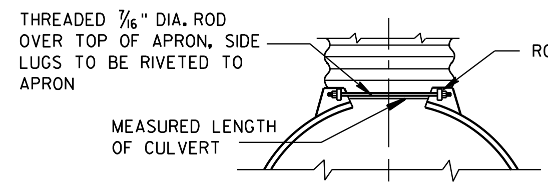


ALTERNATE FOR TYPE 1 CONNECTION

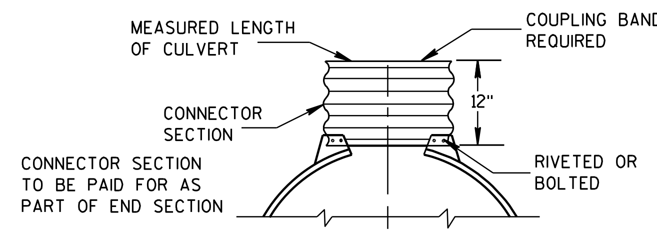
END SECTION CONNECTOR STRAP



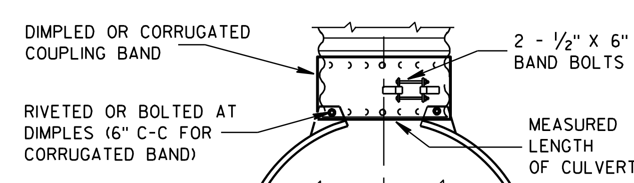
TYPE 1
FOR 12" THRU 24" CORR. PIPE



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

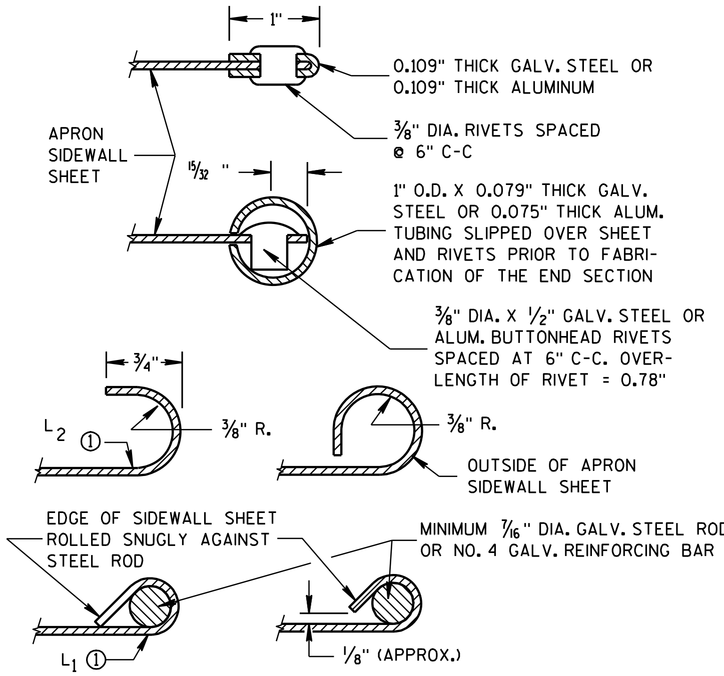
NOTE: DIMPLED BAND FITS OVER OUTSIDE OF ENDWALL, AND CORRUGATED BAND FITS INSIDE ENDWALL. DIMPLED BAND MAY BE USED WITH HELICALLY CORRUGATED PIPE.

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" 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.

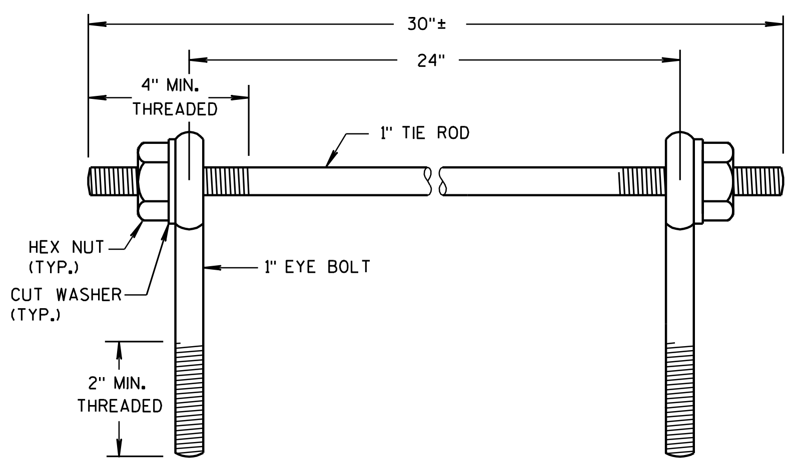
APRON ENDWALLS FOR CULVERT PIPE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

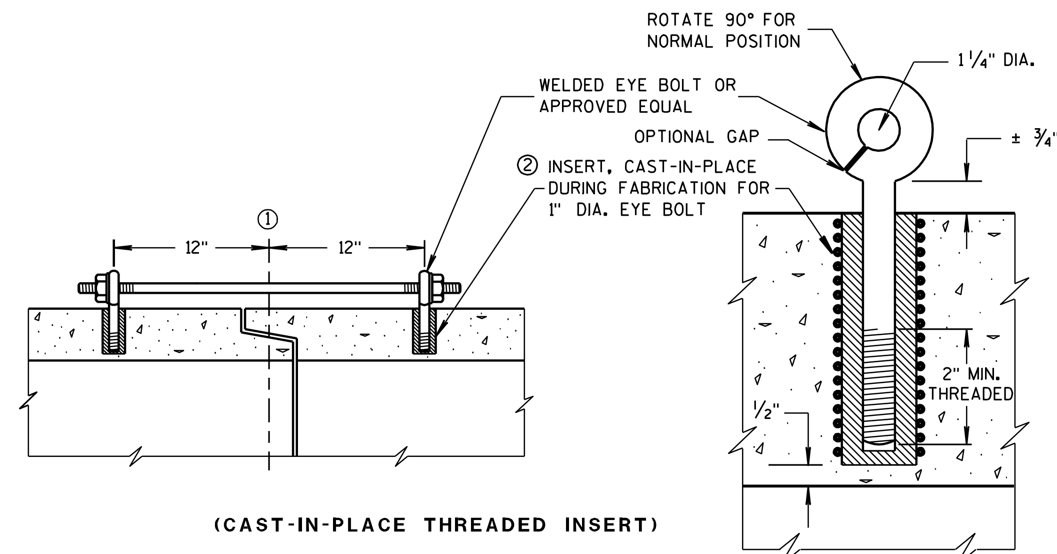
APPROVED
11/30/94 — DATE
/S/ Rory L. Rhi — CHIEF ROADWAY DEVELOP 61 NEER
FHWA

S.D.D. 8 F 1-11
6

EYE BOLT AND TIE ROD ASSEMBLY (ALTERNATE NO. 1)



EYE BOLTS AND TIE ROD



(CAST-IN-PLACE THREADED INSERT)

LONGITUDINAL SECTIONS

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.

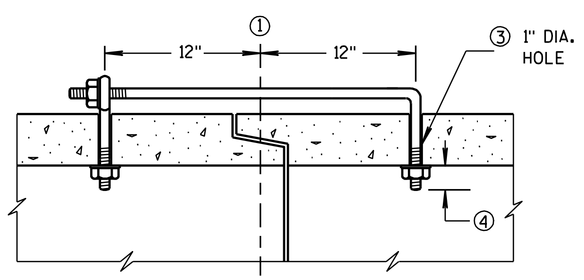
② THE INSIDE OF THE THREADED INSERTS SHALL BE CLEAN TO ALLOW THE INSERTION OF THREADED EYE BOLTS.

③ HOLES SHALL BE CAST-IN-PLACE OR DRILLED 12 INCHES FROM ℄ OF TONGUE AND GROOVE.

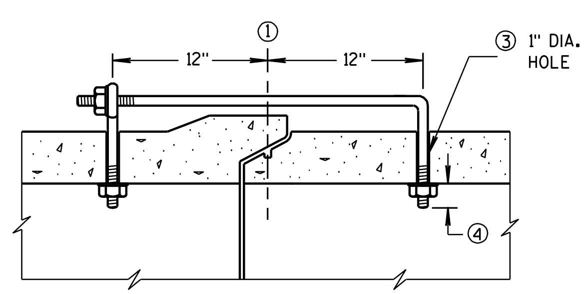
④ BOLT PROJECTION INSIDE OF PIPE SHALL NOT EXCEED 2 INCHES.

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)

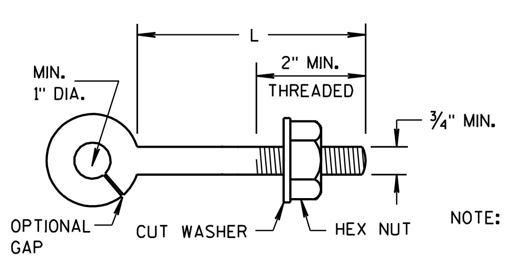


(MODIFIED BELL PIPE)

LONGITUDINAL SECTION

EYE BOLT DIMENSION TABLE

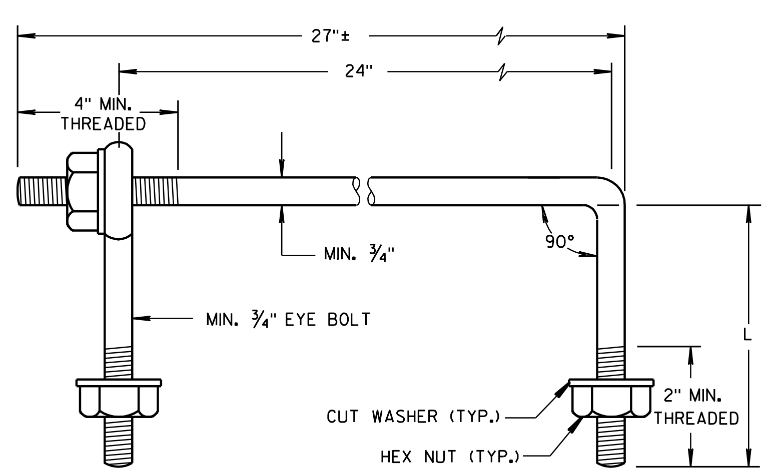
PIPE SIZE	L = LENGTH	
	TONGUE & GROOVE PIPE	MODIFIED BELL PIPE
18" TO 24"	4 1/2"	6 1/4"
30"	5"	7"
36"	5 1/2"	7"
42"	6"	
48"	6 1/2"	
60"	7 1/2"	
66"	8"	



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

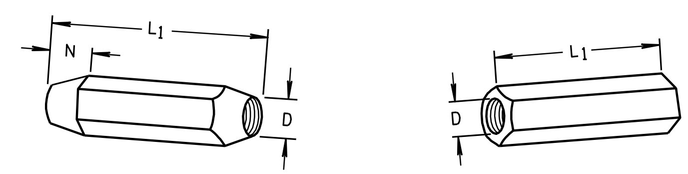
(JOINT TIES FOR 18" TO 66" DIA. CONCRETE PIPE)

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 7/16

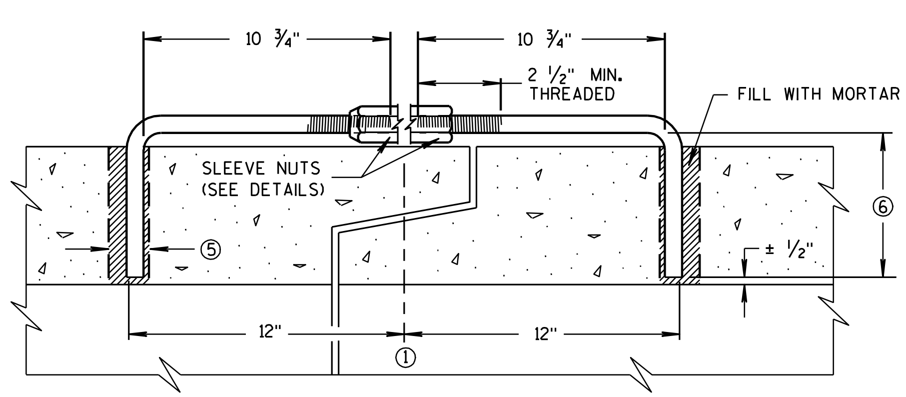
DIMENSIONS SHOWN ARE IN INCHES



TAPERED PLAIN

RIGHT AND LEFT THREADS

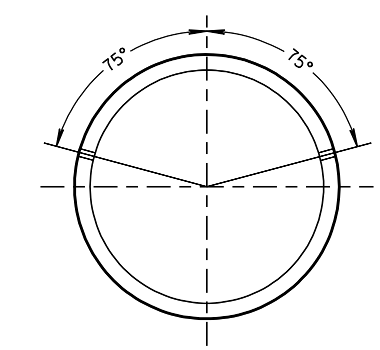
SLEEVE NUTS



LONGITUDINAL SECTION

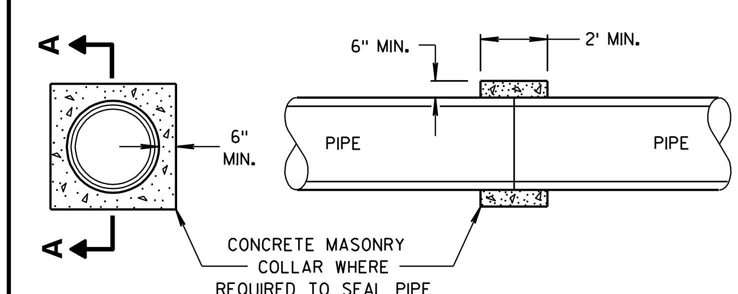
(JOINT TIES FOR 12" TO 108" DIA. CONCRETE PIPE)

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

6

6

JOINT TIES FOR CONCRETE PIPE AND CONCRETE COLLAR DETAIL

STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION

APPROVED

6/5/2012	/S/ Jerry H. Zogg
DATE	ROADWAY STANDARDS DEVELOPMENT ENGINEER

FHWA

S.D.D. 8 F 4-7

S.D.D. 8 F 4-7

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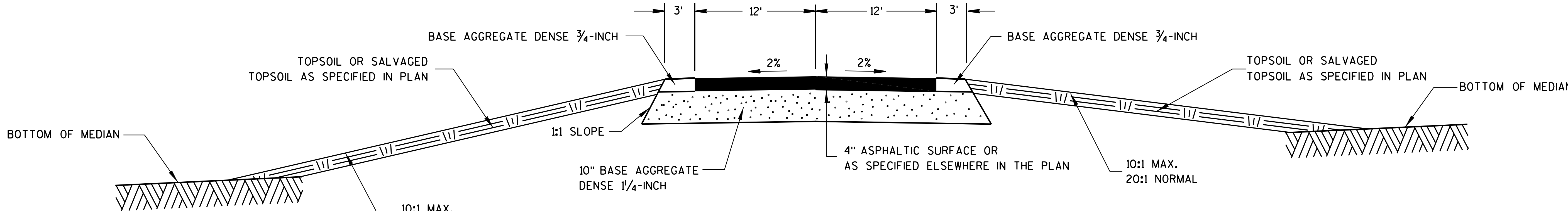
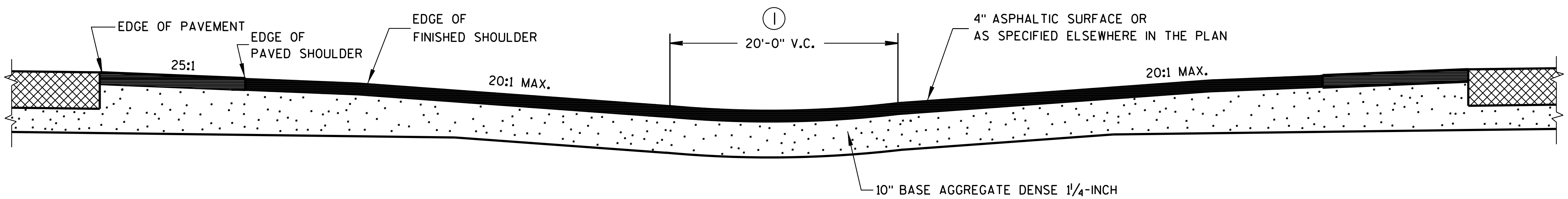
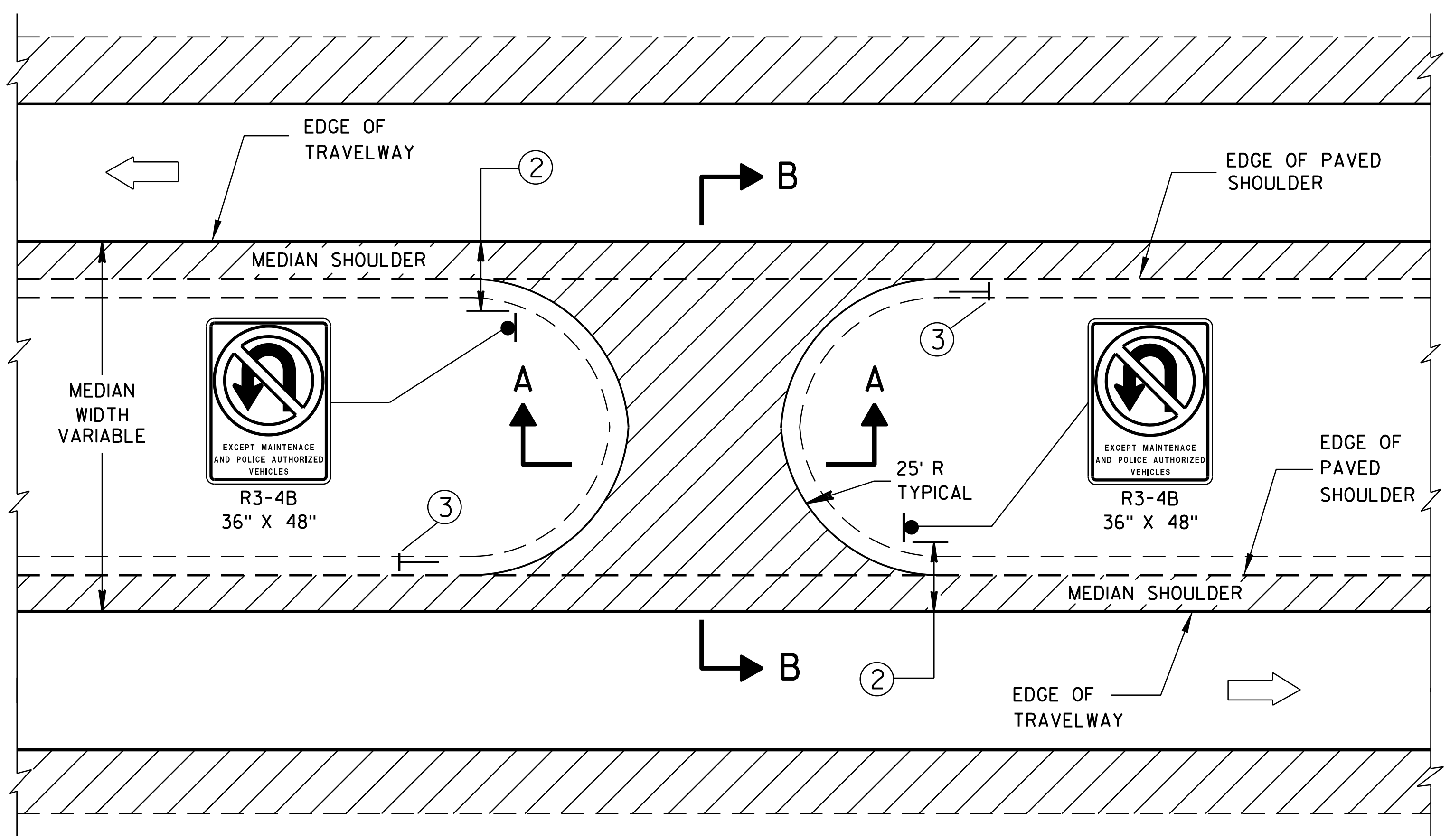


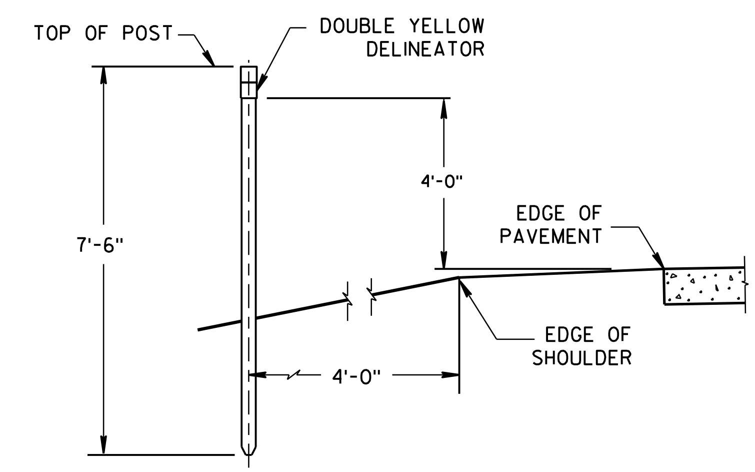
SECTION A-A



SECTION B-B



PLAN VIEW



DOUBLE YELLOW DELINEATOR INSTALLATION

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. ADJUST VERTICAL CURVE LOCATION LATERALLY TO MAINTAIN 20:1 MAX.

2. SIGNING DETAILS AND SPECIFICATIONS ARE PROVIDED ELSEWHERE IN THE CONTRACT.

3. INSTALL DOUBLE YELLOW DELINEATOR. SEE STANDARD DETAIL DRAWING 15A2.

MAINTENANCE CROSSOVER FOR FREEWAYS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

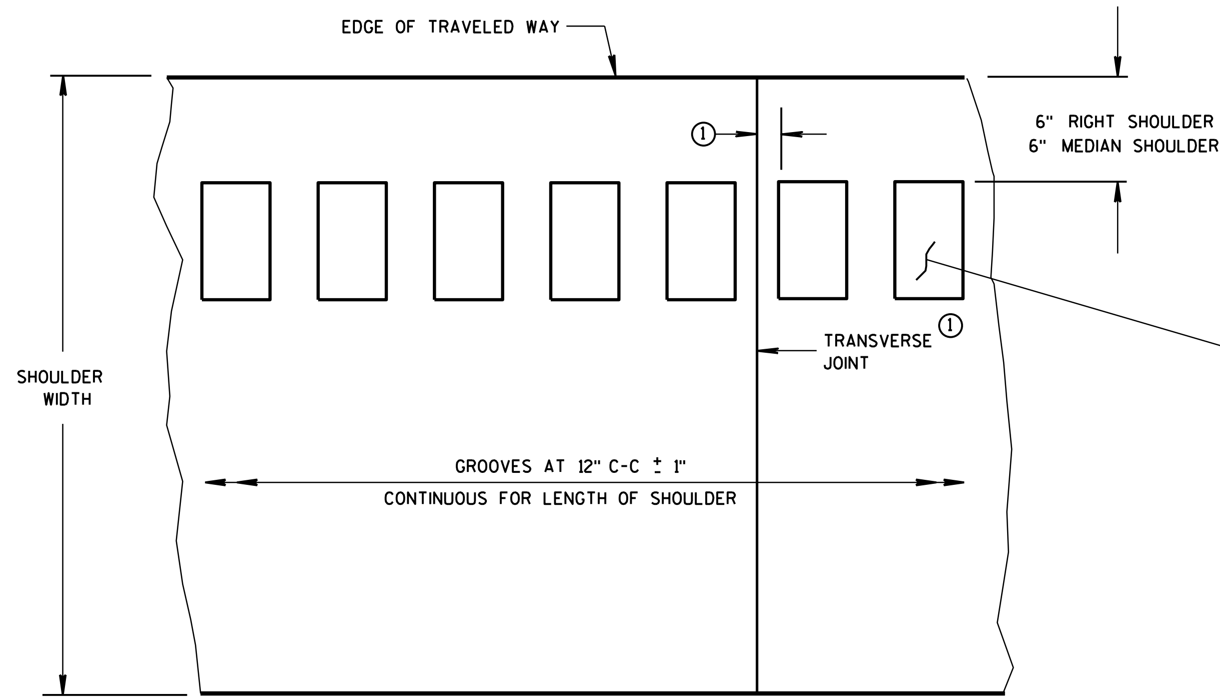
8/2013	/S/ Jerry H. Zogg	
DATE	ROADWAY STANDARDS DEVELOPMENT ENGINEER	

FHWA

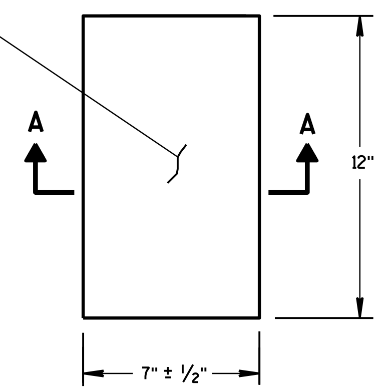
6

S.D.D. 11 A 1-5

S.D.D. 11 A 1-5



PLAN VIEW
SHOULDER WITH GROOVES



PLAN VIEW
(SINGLE GROOVE)

PLACEMENT DETAIL FOR MILLED RUMBLE STRIP

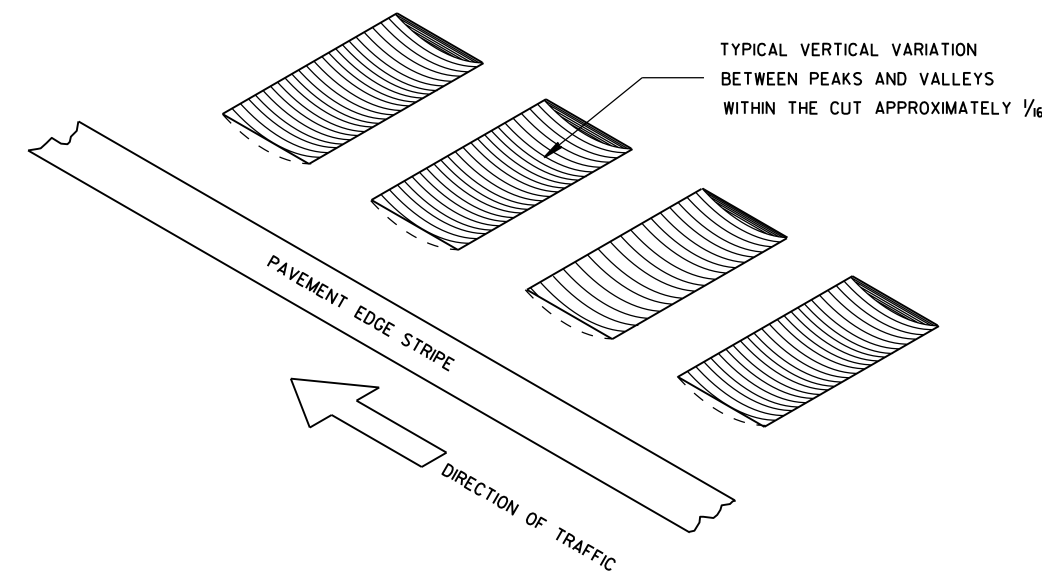
GENERAL NOTES

DETAILS OF CONSTRUCTION SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.

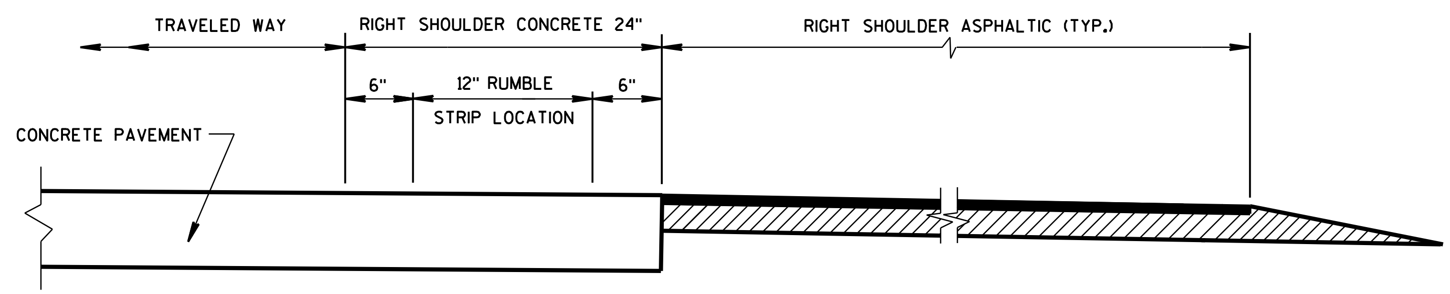
RUMBLE STRIPS ON EXPRESSWAYS

DO NOT INSTALL RUMBLE STRIPS ACROSS SIDE ROAD INTERSECTIONS, COMMERCIAL DRIVEWAYS, PRIVATE DRIVEWAYS OR ADJACENT TO RIGHT TURN LANES, LEFT TURN LANES, TURN LANE TAPERS, BRIDGE DECKS, BRIDGE APPROACHES, OR 100 FEET IN ADVANCE OF RAILROAD CROSSING. THE ATTACHED STANDARD DETAIL DRAWING SHOWS THE LOCATION OF THE RUMBLE STRIPS AT INTERCHANGE AREAS.

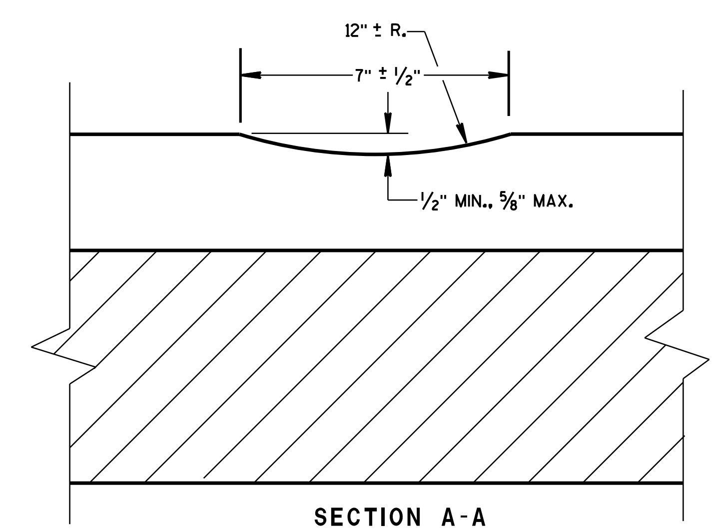
(1) CONCRETE PAVEMENT - RUMBLE STRIPS SHALL BE A MINIMUM OF 6" AWAY FROM TRANSVERSE JOINTS.



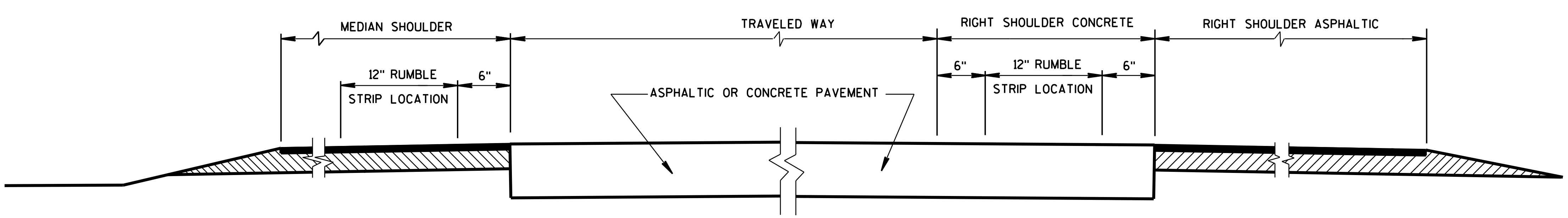
ISOMETRIC



SECTION VIEW
CONCRETE PAVEMENT EXTENDS INTO RIGHT SHOULDER)



SECTION A-A



SECTION VIEW

TYPICAL LOCATIONS OF SHOULDER RUMBLE STRIPS
IN RURAL DIVIDED HIGHWAYS
(ONE ROADWAY IS SHOWN)

6

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S.D.D. 13 A 5-5a

S.D.D. 13 A 5-5a

SHOULDER RUMBLE STRIP, MILLING

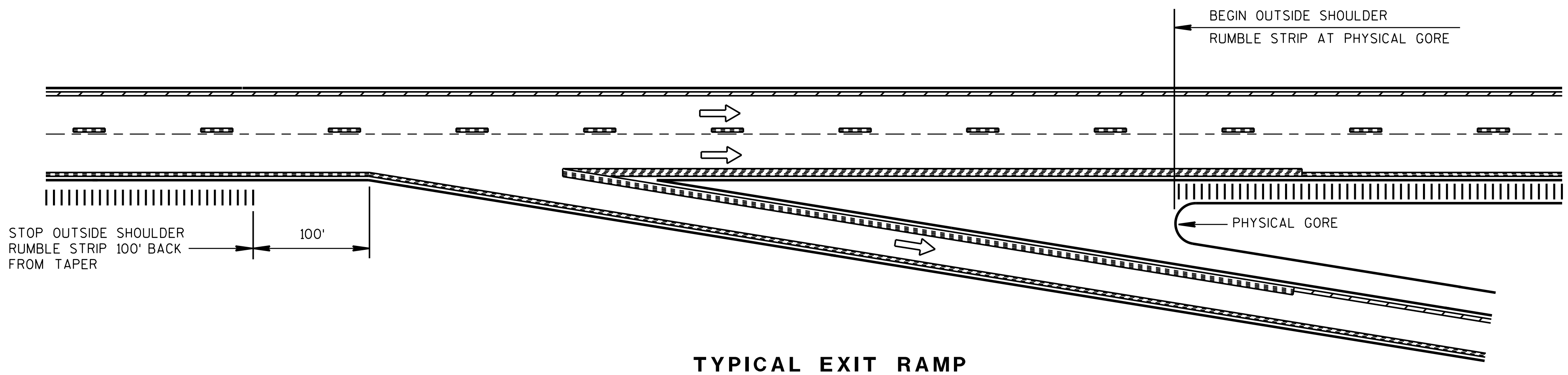
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

NOTES:

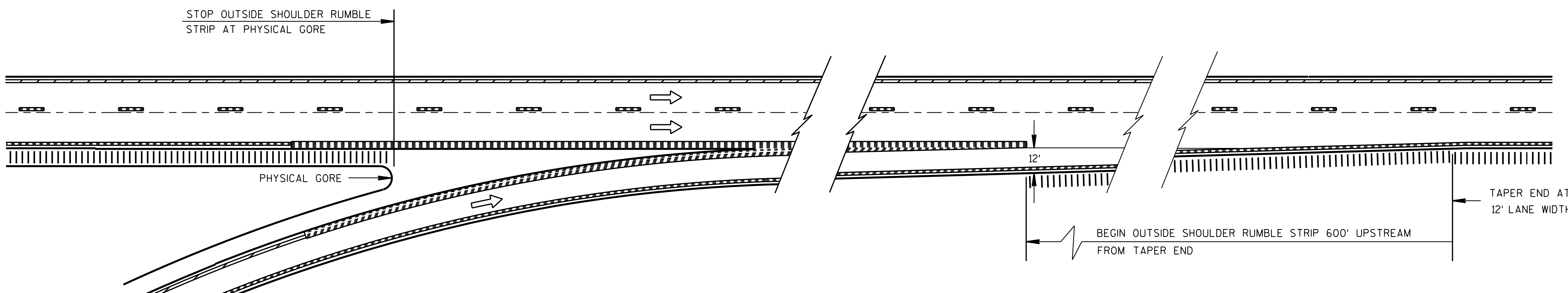
NO RUMBLE STRIP ON EXIT, DIRECTIONAL, OR ENTRANCE RAMPS, EXCEPT NEAR THE ENTRANCE TAPER END AND ALONG THE PARALLEL RAMP AREA AS SHOWN.

PAVEMENT MARKING DETAILS AND SPECIFICATIONS ARE PROVIDED ELSEWHERE IN THE CONTRACT.

NOTE:
ARROW SYMBOL (⇨)
SHOWS DIRECTION OF TRAVEL

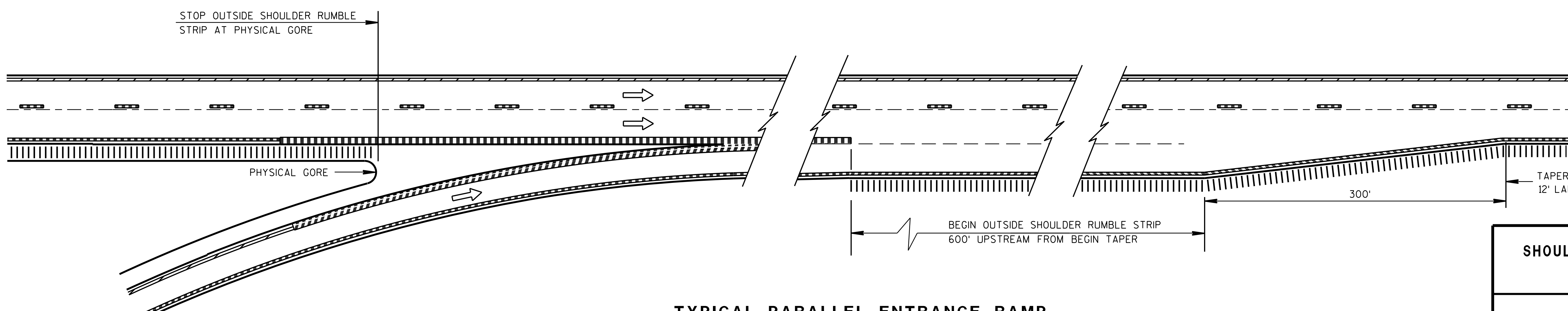


TYPICAL EXIT RAMP



TYPICAL TAPERED ENTRANCE RAMP

RAMP AND GORE RUMBLE STRIP LOCATIONS



TYPICAL PARALLEL ENTRANCE RAMP

RAMP AND GORE RUMBLE STRIP LOCATIONS

6

6

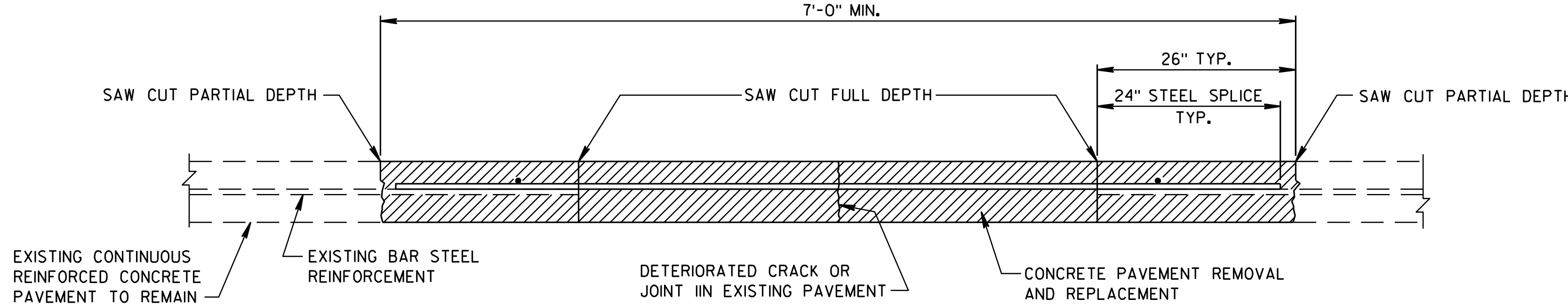
SHOULDER RUMBLE STRIP, MILLING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

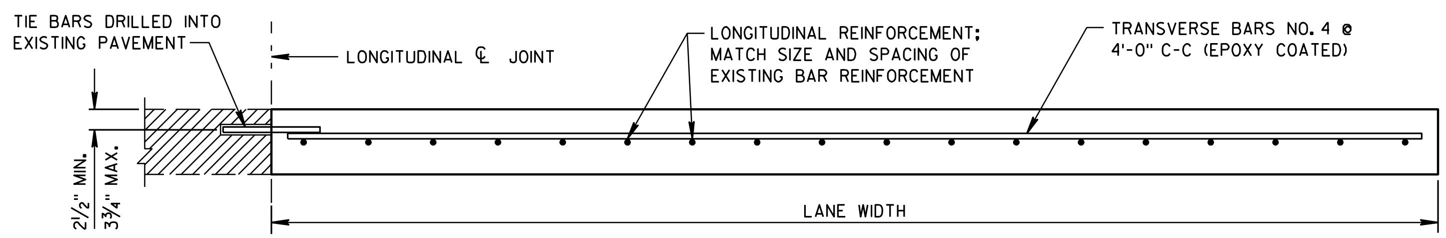
APPROVED
12/17/2012 DATE
/S/ Jerry H. Zogg
ROADWAY STANDARDS ENGINEER
FHWA

S.D.D. 13 A 5-5b

S.D.D. 13 A 5-5b



SECTION A-A



SECTION B-B

GENERAL NOTES

PLACE ALL BAR STEEL REINFORCEMENT AT MID PAVEMENT DEPTH UNLESS OTHERWISE NOTED.

PAY FOR THE TRANSVERSE AND LONGITUDINAL JOINT SAW CUT AS LINEAR FEET OF "SAWING CONCRETE".

WHEN THE PASSING AND TRAVELING LANES ARE TO BE REPLACED, REPLACE THE PASSING LANE FIRST.

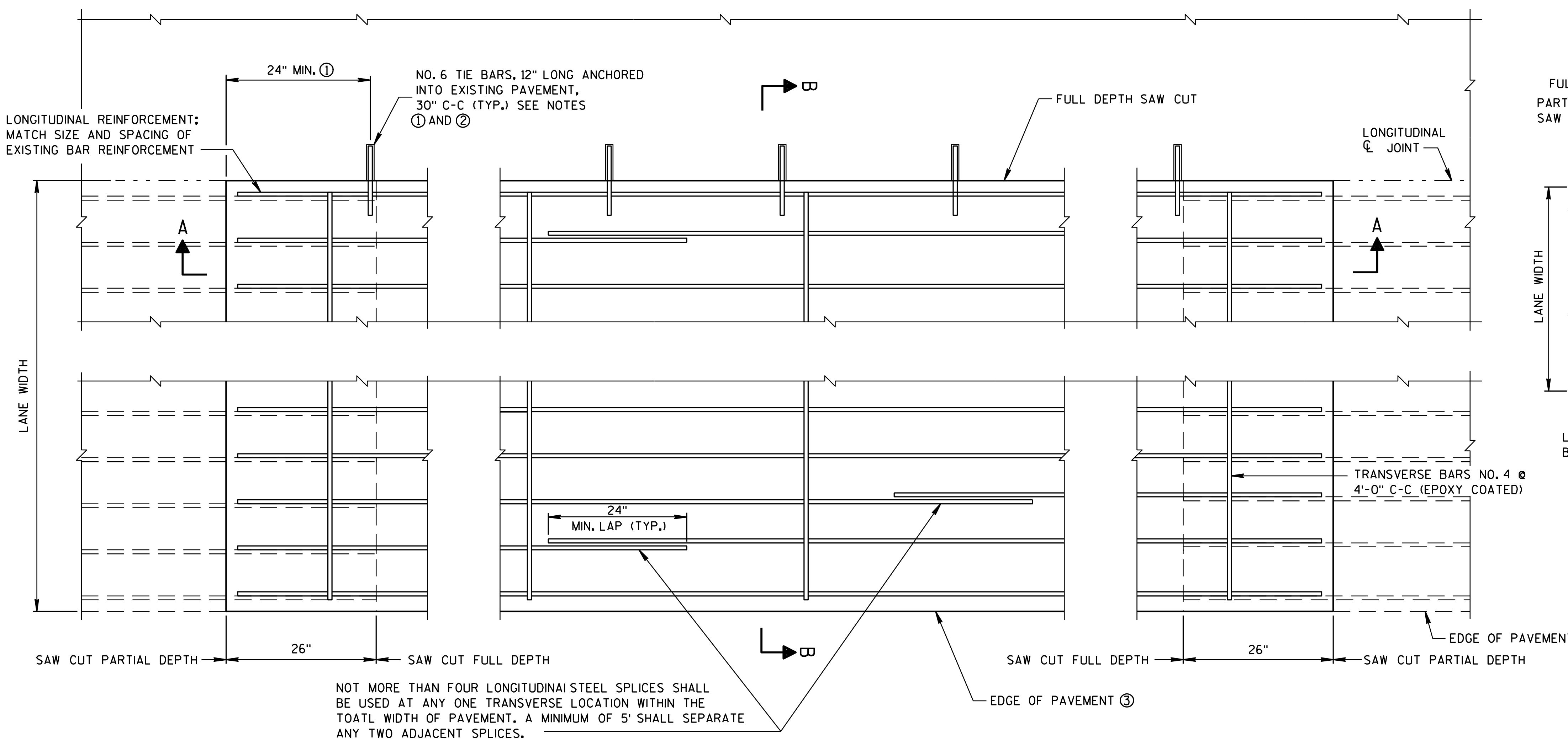
ADD TRANSVERSE STEEL BARS TO REPAIRS GREATER THAN 6' IN LENGTH. USE NO. 4 BARS PLACED TRANSVERSELY AND SPACED 4' C-C. PAYMENT SHALL BE INCIDENTAL TO "CONCRETE PAVEMENT CONTINUOUS REINFORCEMENT".

TIE ALL CONCRETE PAVEMENT REPAIRS WHICH ARE GREATER THAN 15' IN LENGTH, AND ARE ADJACENT TO EXISING CONCRETE PAVEMENT, TO THE EXISTING PAVEMENT USING TIE BARS. DETAILS FOR TIE BAR CONSTRUCTION SHALL CONFORM TO THE STANDARD SPECIFICATIONS AND STANDARD DETAIL DRAWINGS.

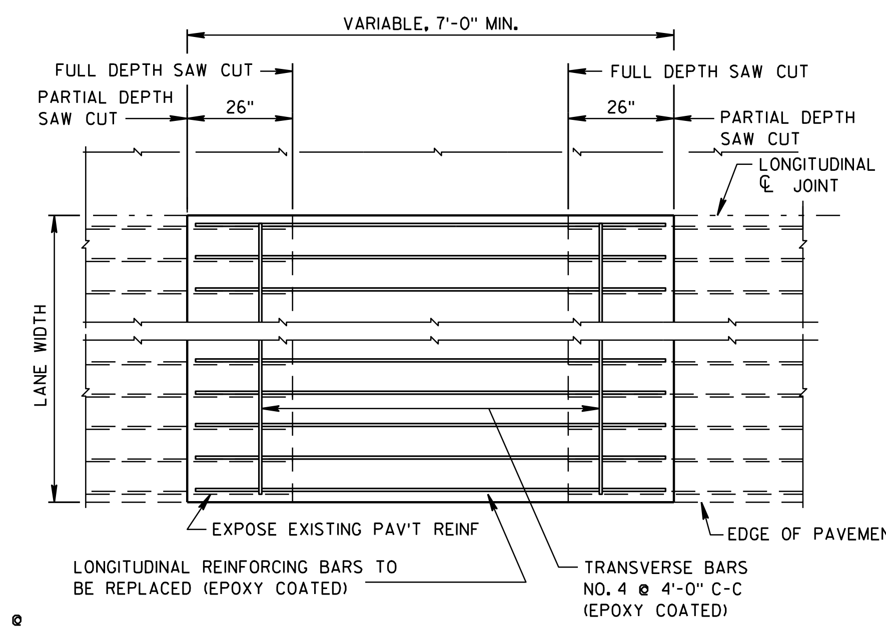
① PROVIDE A MINIMUM DISTANCE OF 24 INCHES FROM AN EXISTING TRANSVERSE JOINT OR THE EDGE OF REPLACEMENT TO THE CENTER OF THE TIE BAR NEAREST THAT JOINT OR EDGE.

② ANCHOR TIE BARS INTO DRILLED HOLES WITH AN EPOXY.

③ SAW CUT THE LONGITUDINAL EDGE JOINT IF THE ADJACENT SHOULDER IS CONCRETE.



REINFORCEMENT STEEL PLACEMENT IN CONTINUOUSLY REINFORCED CONCRETE PAVEMENT REPLACEMENT



LONGITUDINAL STEEL PLACEMENT IN CRCP REPAIRS

PLAN VIEW

CONTINUOUSLY REINFORCED CONCRETE PAVEMENT REPAIR AND REPLACEMENT

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
11/1/2011 /S/ Deb Bischoff
DATE PAVEMENT POLICY & DE 66 NEER
FHWA

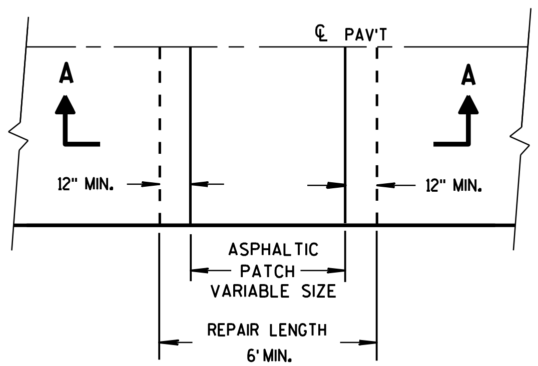
GENERAL NOTES

SAW CUT, DRILL, AND LIFT OUT EXISTING CONCRETE PAVEMENT WITHIN THE BOUNDARIES OF CONCRETE REPAIR AREAS. THE CONTRACTOR MAY MAKE ADDITIONAL SAW CUTS INSIDE THE REPAIR LIMITS TO REDUCE WEIGHT AND SIZE OF CONCRETE PIECES.

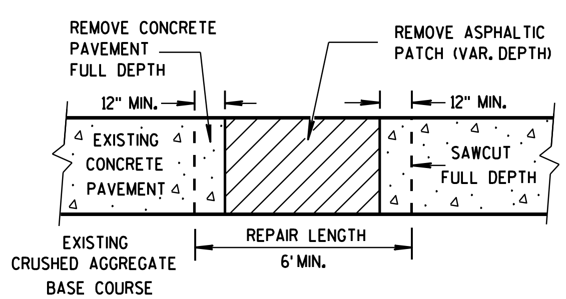
PROVIDE A 6-FOOT MINIMUM DISTANCE FROM BOUNDARIES OF CONCRETE REPAIR AREAS TO ADJACENT TRANSVERSE JOINT OR CRACK IN THE SAME LANE.

THE LENGTH OF THE REPAIRS MAY VARY FROM THE DIMENSIONS SHOWN IF THE EXISTING CONCRETE PAVEMENT IS NONDOWELED AND THE PAVEMENT IS TO BE OVERLAID AFTER REPAIRING.

(1) DOWEL BARS MIGHT NOT EXIST.

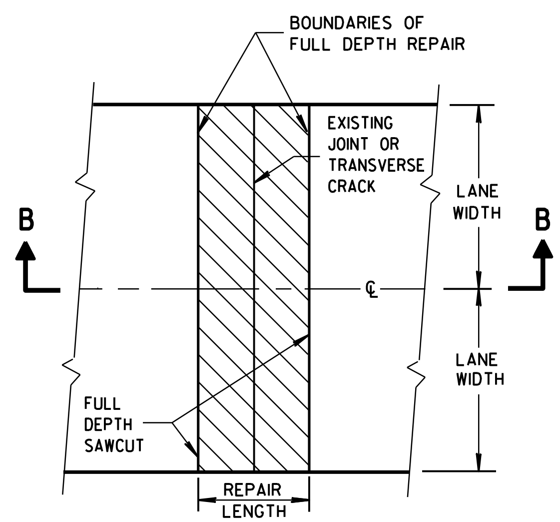


PLAN VIEW

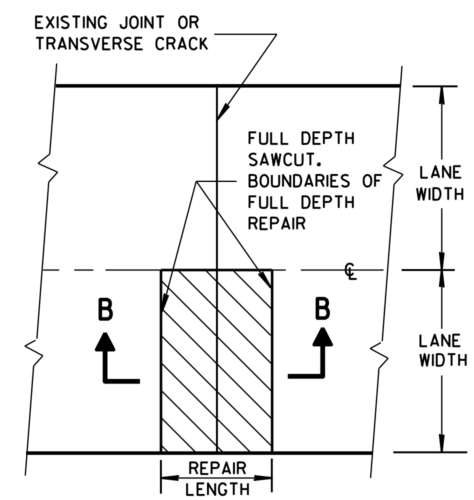


SECTION A-A

HMA PATCH REMOVAL

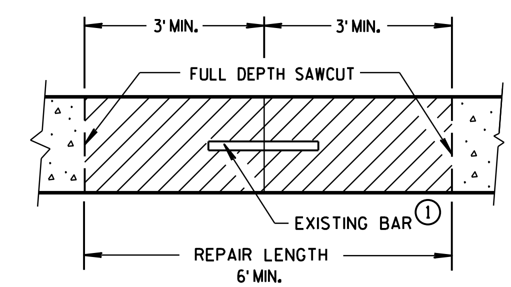


PLAN VIEW
(DOUBLE LANE REPAIR)



PLAN VIEW
(SINGLE LANE REPAIR)

FULL DEPTH CONCRETE PAVEMENT REMOVAL



SECTION B-B

CONCRETE REMOVAL

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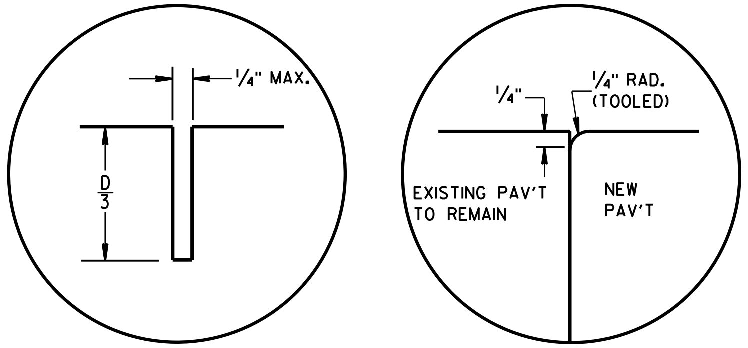
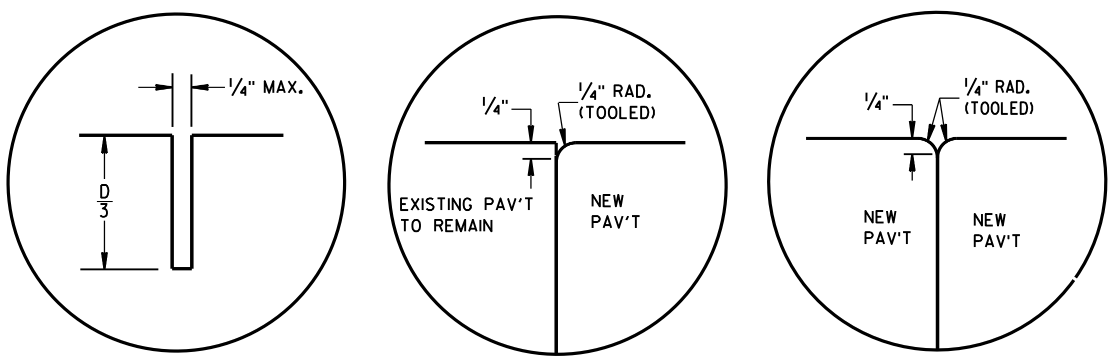
CONCRETE PAVEMENT REPAIR AND REPLACEMENT

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO



TRANSVERSE JOINTS



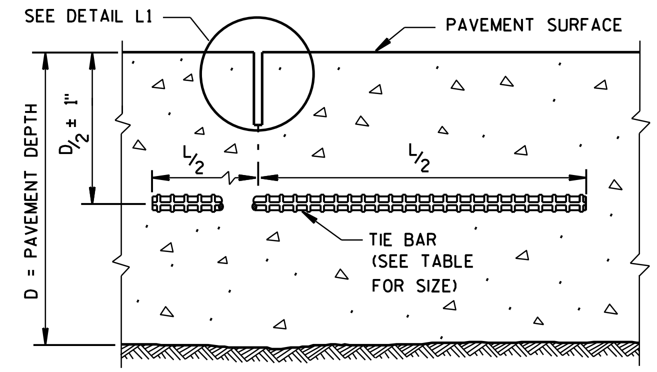
LONGITUDINAL JOINTS

TIE BAR TABLE

PAVEMENT DEPTH (D)	TIE BAR SIZE	TIE BAR LENGTH (L)	MAX. TIE BAR SPACING
< 10 1/2"	NO. 4	30"	36"
≥ 10 1/2"	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.



SECTION C-C

SAWED LONGITUDINAL JOINT

GENERAL NOTES

INSTALL DOWEL BARS PARALLEL TO THE PAVEMENT CENTERLINE AND PAVEMENT SURFACE.

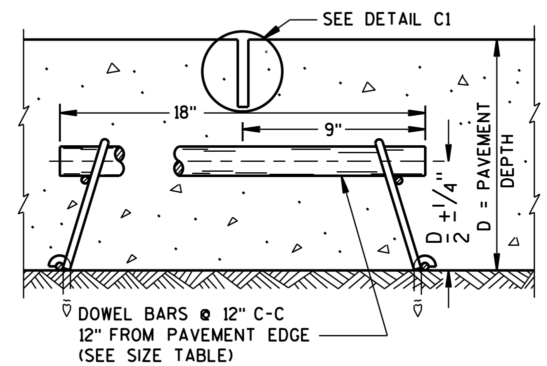
CONCRETE PAVEMENT REPAIRS OF EXISTING NONDOWELED CONCRETE PAVEMENTS DO NOT NEED TO BE DOWELED.

DO NOT SEAL OR FILL JOINTS.

ANCHOR DOWEL BARS AND TIE BARS INTO DRILLED HOLES WITH AN EPOXY.

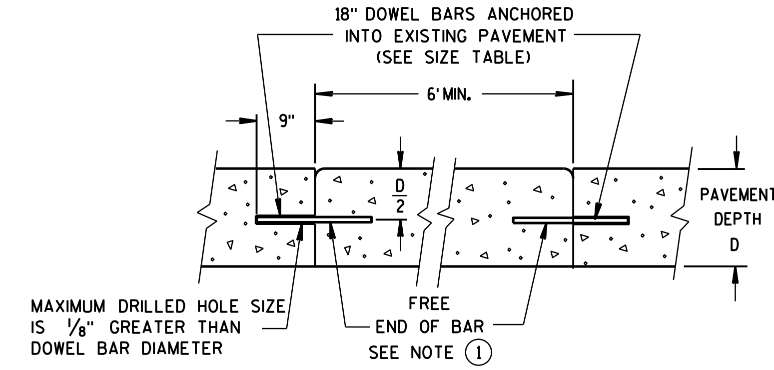
FOR MULTI-LANE CONCRETE PAVEMENT REPLACEMENTS, PROVIDE A MINIMUM DISTANCE OF 15 INCHES FROM ALL TRANSVERSE JOINTS OR EDGES OF REPLACEMENT TO THE CENTER OF THE TIE BAR NEAREST THAT JOINT OR EDGE.

(1) APPLY A THIN UNIFORM COATING OF SURFACE TREATMENT TO THE FREE END OF DOWEL BARS TO PREVENT BONDING.

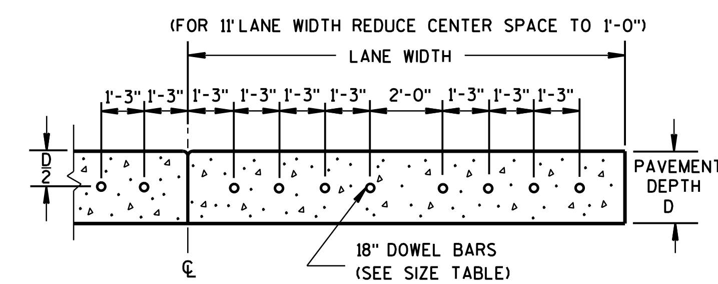


SECTION F-F

CONTRACTION JOINT



SECTION D-D

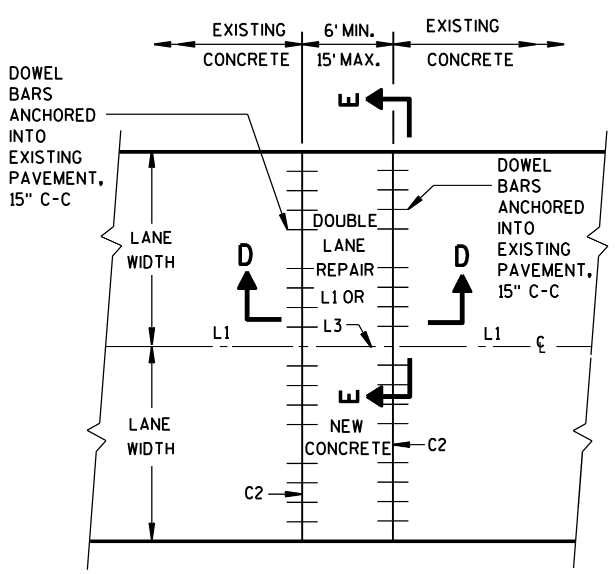


SECTION E-E

DRILLED DOWEL BAR CONSTRUCTION JOINT

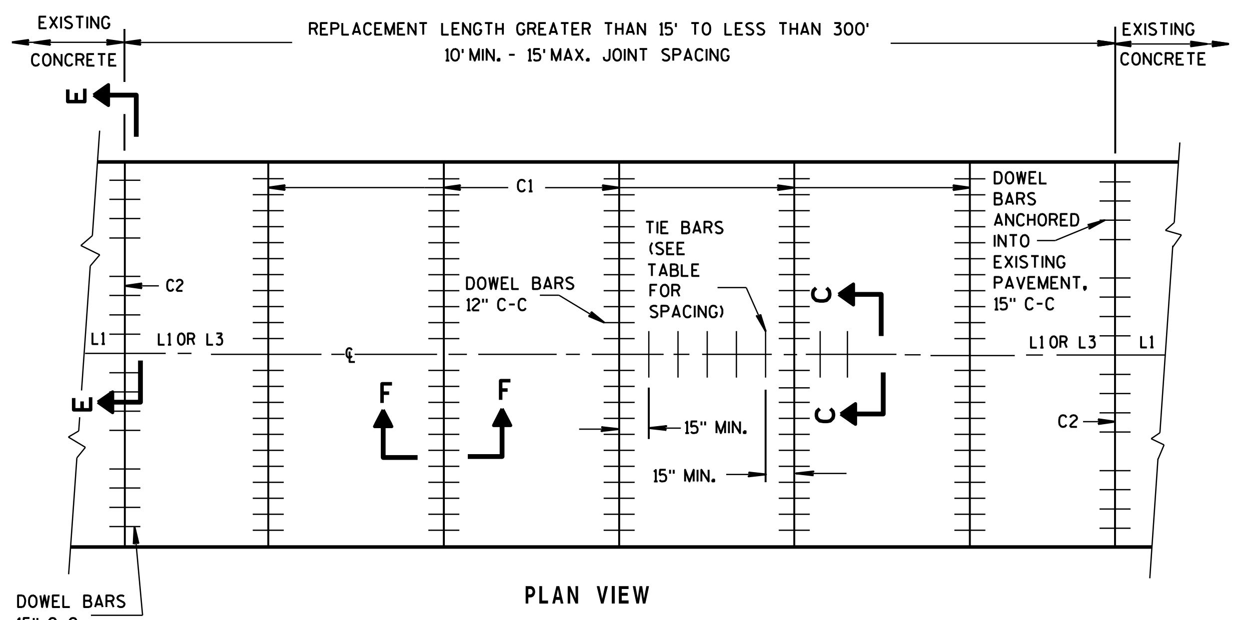
PAVEMENT DEPTH, DOWEL BAR SIZE AND JOINT SPACING TABLE

PAVEMENT DEPTH (D)	DOWEL BAR DIAMETER	CONTRACTION JOINT SPACING
5 1/2", 6", 6 1/2"	NONE	12'
7", 7 1/2"	1"	14'
8", 8 1/2"	1 1/4"	15'
9", 9 1/2"	1 1/4"	15'
10" & ABOVE	1 1/2"	15'



PLAN VIEW

MULTI-LANE CONCRETE PAVEMENT REPAIR



PLAN VIEW

MULTI-LANE CONCRETE PAVEMENT REPLACEMENT

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S.D.D. 13 C 9-13b

CONCRETE PAVEMENT REPAIR AND REPLACEMENT

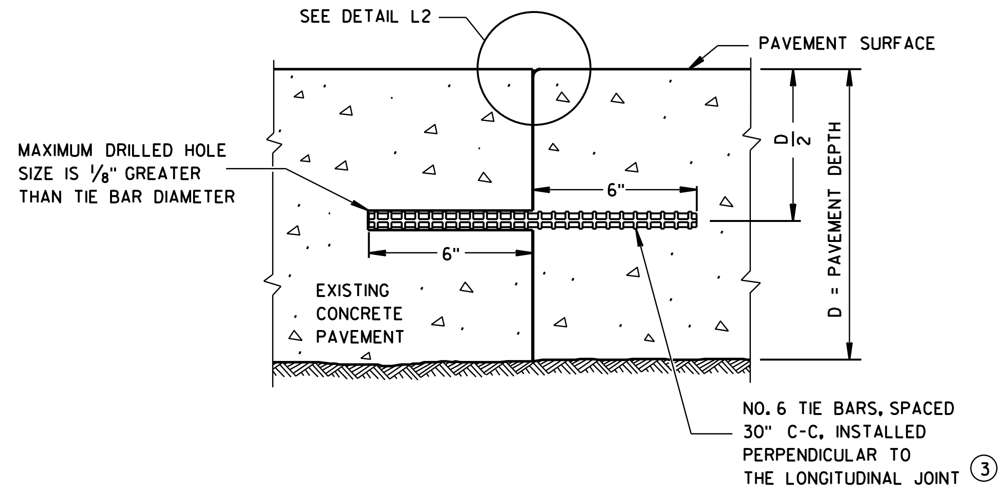
STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

GENERAL NOTES

1. WITH THE APPROVAL OF THE ENGINEER, FOR SINGLE LANE PAVEMENT REPLACEMENTS LESS THAN 30 FEET IN LENGTH, THE CONTRACTOR MAY INSTALL DRILLED TIE BARS ON 6:1 SKEW HORIZONTALLY, DIRECTION OF SKEW ALTERNATING WITH EACH SUCCESSIVE BAR. DRIVE SKEWED TIE BARS TO A DEPTH OF 6 INCHES IN A HOLE OF SUCH A DIAMETER AS TO PROVIDE A TIGHT DRIVEN FIT.

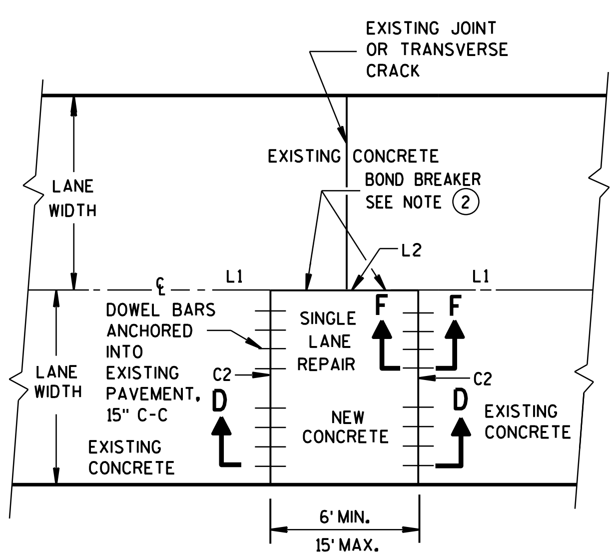
2. USE AN ENGINEER-APPROVED BOND BREAKER (E.G. RELEASE AGENT, CURING COMPOUND) FOR SINGLE LANE REPAIRS UP TO 15 FEET IN LENGTH.

3. ANCHOR TIE BARS INTO DRILLED HOLES WITH AN EPOXY.



SECTION G-G

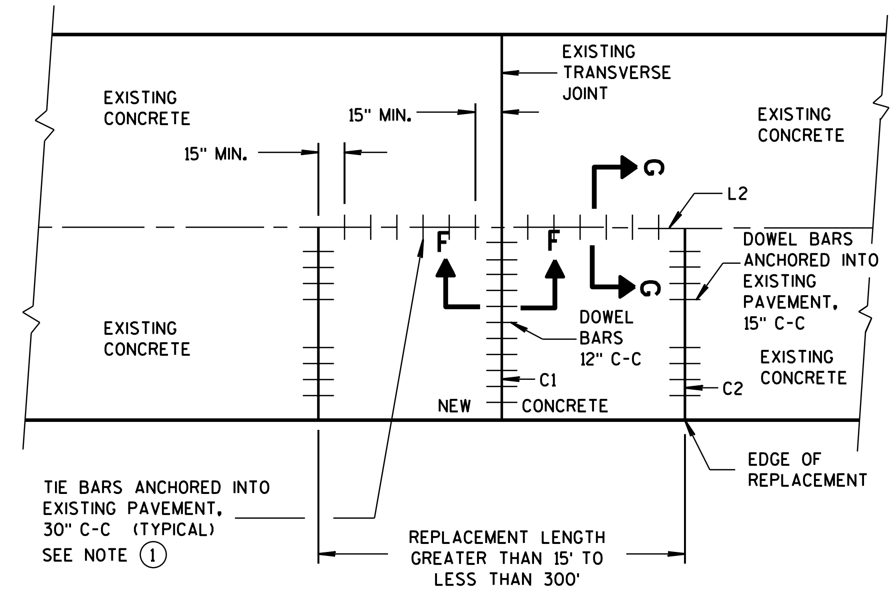
TIE BARS ANCHORED INTO EXISTING PAVEMENT



PLAN VIEW

SINGLE LANE

CONCRETE PAVEMENT REPAIR



PLAN VIEW

SINGLE LANE

CONCRETE PAVEMENT REPLACEMENT

CONCRETE PAVEMENT REPAIR AND REPLACEMENT
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION
APPROVED Sept., 2015 DATE /S/ Peter Kemp, P.E. PAVEMENT SUPER FHWA

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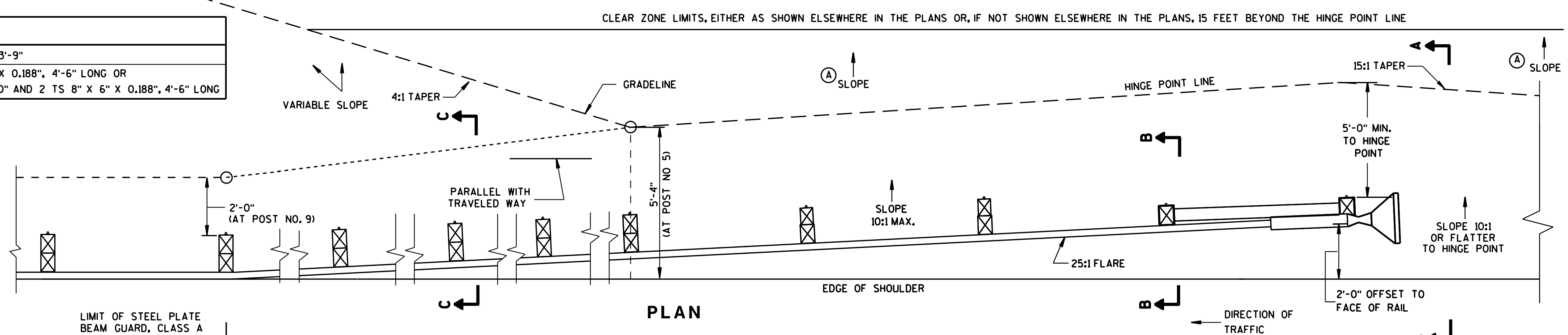
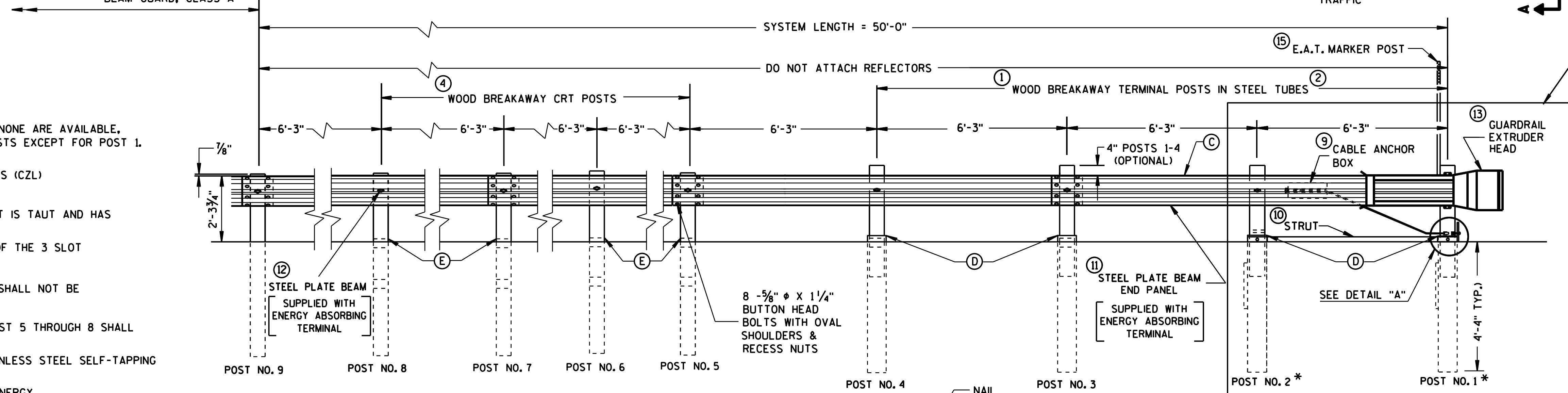
S.D.D. 13 C 9-13c

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" ϕ X 1'-6" BUTTON HEAD BOLTS AT ALL POSTS EXCEPT FOR POST 1.

Ⓐ 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.

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

Ⓒ THE 13 SLOT FIRST RAIL PANEL MAY BE USED IN LIEU OF THE 3 SLOT RAIL PANEL ON SKT-350 ONLY.

Ⓓ THE TOP OF THE STEEL TUBE ON POSTS 1 THROUGH 4 SHALL NOT BE MORE THAN 3" ABOVE THE FINISH GROUND ELEVATION.

Ⓔ THE CENTER OF THE UPPER 3½" DIAMETER HOLE ON POST 5 THROUGH 8 SHALL BE ¾" ABOVE THE FINISHED GROUND LINE.

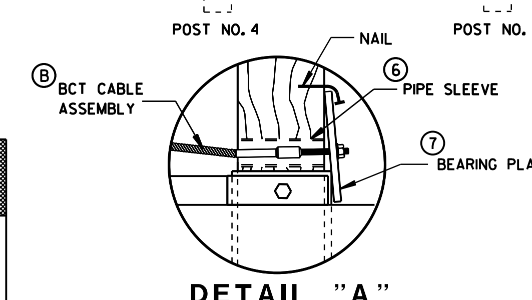
Ⓕ ATTACH ALUMINUM SHEET TO E.A.T. HEAD USING 4 STAINLESS STEEL SELF-TAPPING SCREWS. ONE SCREW PER CORNER.

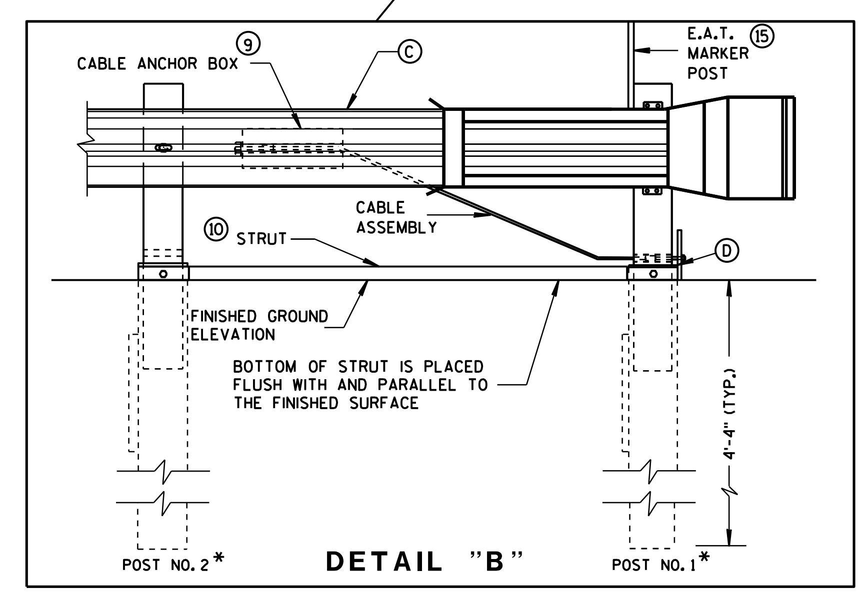
STEEL POSTS SHALL NOT BE ALLOWED FOR USE WITH ENERGY ABSORBING TERMINALS.

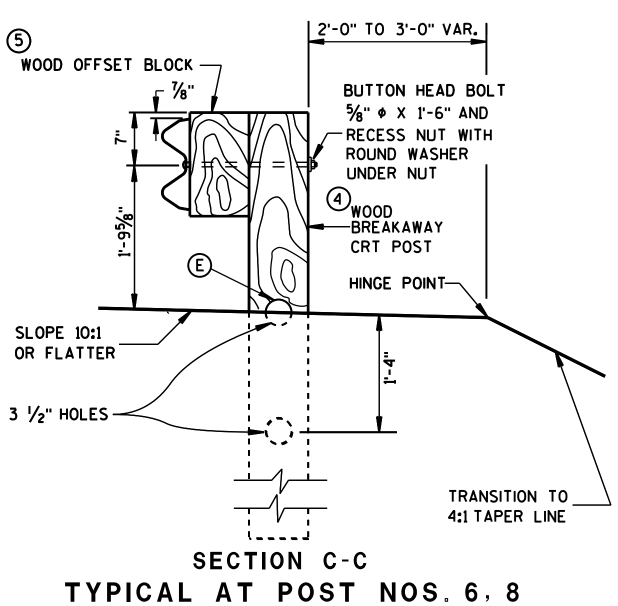
DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL.

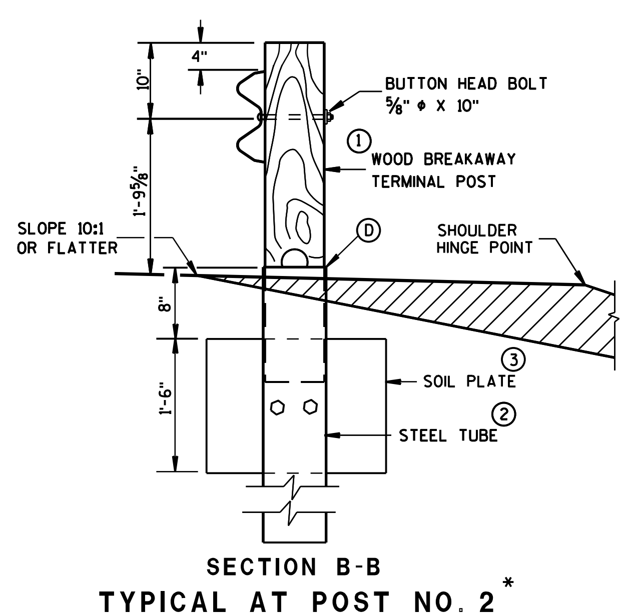
* DO NOT ATTACH BLOCKOUTS TO POSTS 1 AND 2.

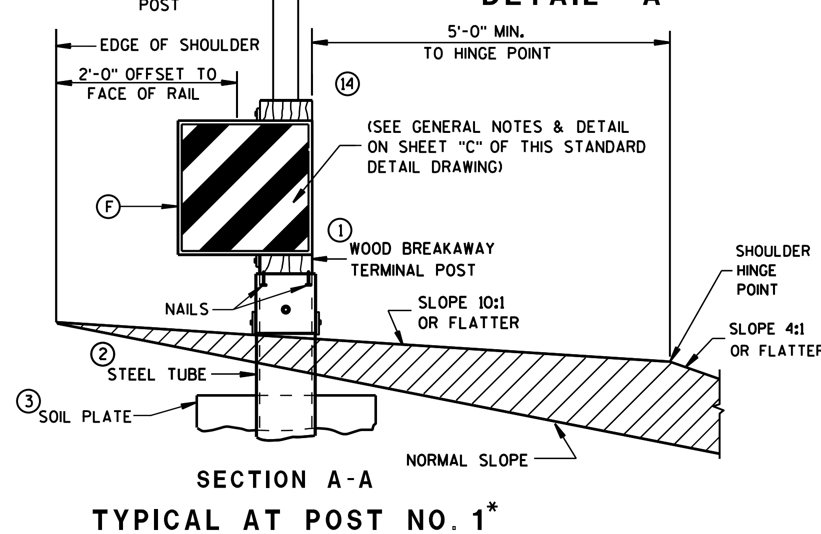
** SDD SHOWS 4 - 54 INCH STEEL TUBES WITH SOIL PLATES INSTALLED ON POST 1 AND POST 2. POST 3 AND 4 DO NOT NEED SOIL PLATES. AN ALTERNATIVE INSTALLATION WOULD CONSIST OF 2 - 72 INCH STEEL TUBES ON POST 1 AND POST 2 AND 54 INCH SOIL TUBES ON POSTS 3 AND 4. THE ALTERNATIVE INSTALLATION DOES NOT REQUIRE SOIL PLATES.











STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

S.D.D. 14 B 24-8a

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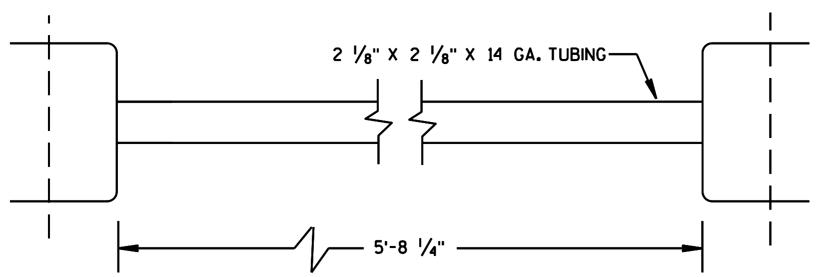
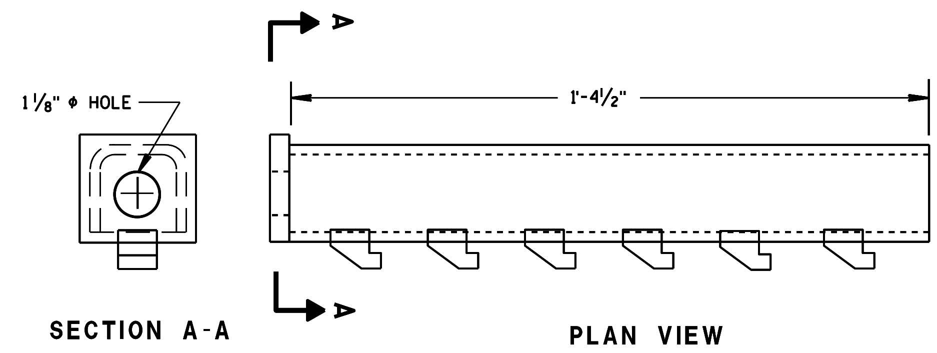
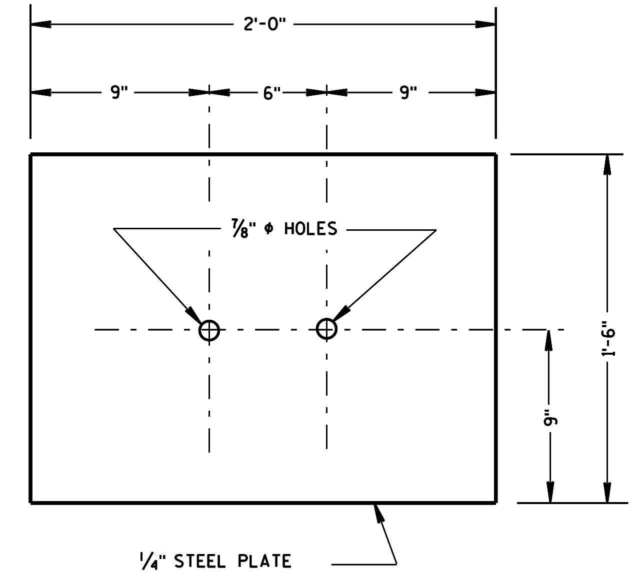


(10) STRUT DETAIL (SKT-350)

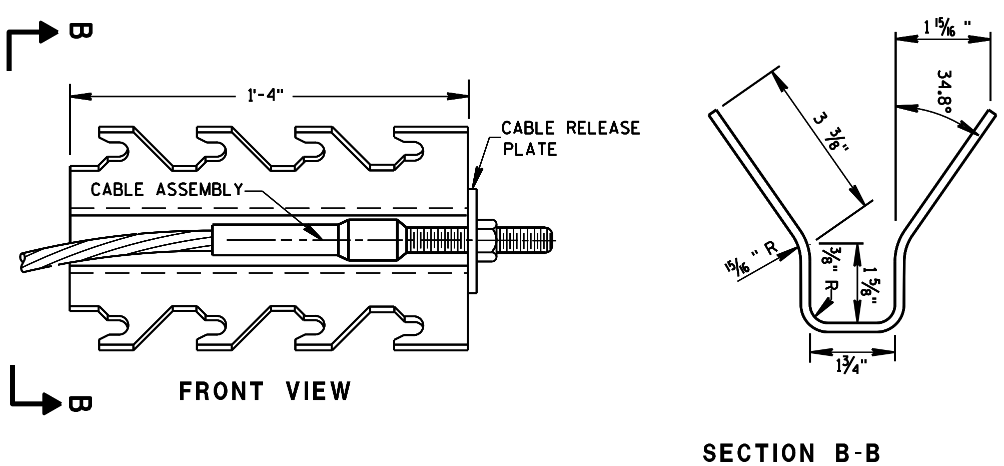


(9) CABLE ANCHOR BOX (ET-2000/ET-2000 PLUS)



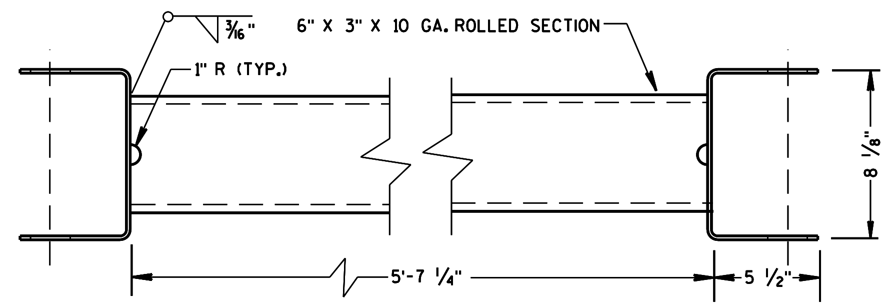
(3) SOIL PLATE

(SKT-350, ET-2000/ET-2000 PLUS)



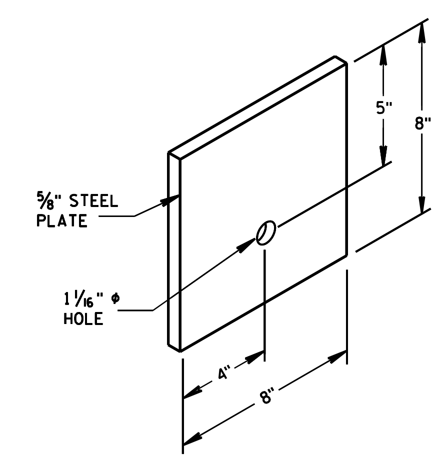
(9) CABLE ANCHOR BOX (SKT-350)

(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)

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STEEL PLATE BEAM GUARD
ENERGY ABSORBING TERMINAL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

S.D.D. 14 B 24-8b

S.D.D. 14 B 24-8b

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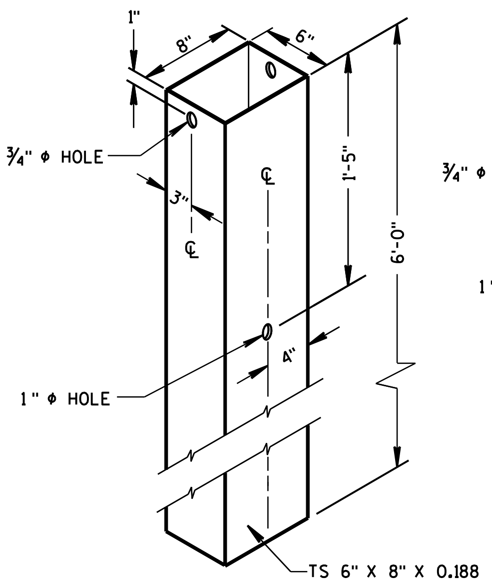
GENERAL NOTES

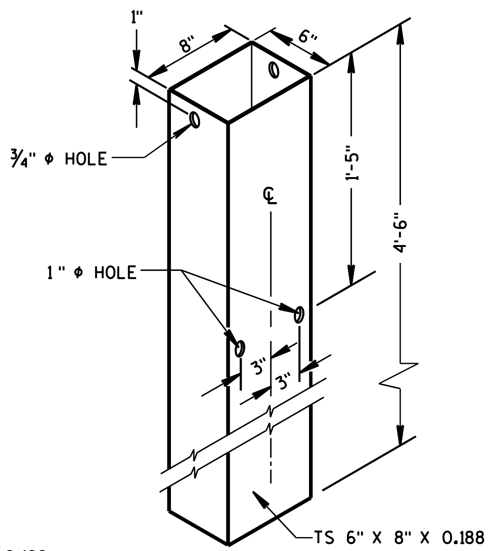
WHEN ROCK IS ENCOUNTERED DURING EXCAVATION, A 12 INCH DIA. POST HOLE EXTENDING 20 INCHES DEEP INTO THE ROCK MAY BE USED IF APPROVED BY THE ENGINEER. GRANULAR MATERIAL SHALL BE PLACED IN THE BOTTOM OF THE HOLE APPROXIMATELY 2 1/2" INCHES DEEP TO PROVIDE DRAINAGE. THE SOIL TUBES SHALL BE FIELD CUT TO LENGTH, 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.

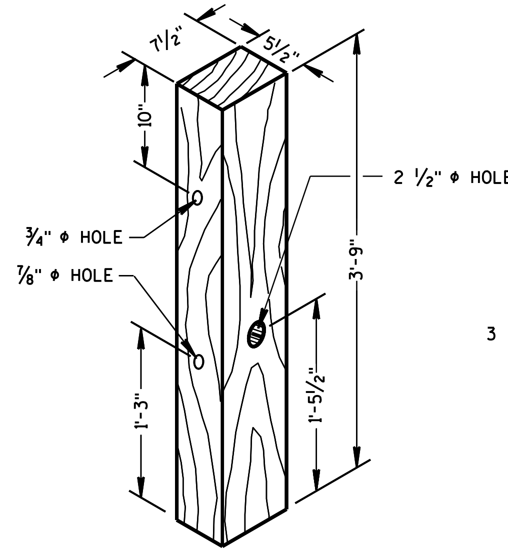
(G) 1/2" DIA. X 3" LAG BOLT WITH WASHER.



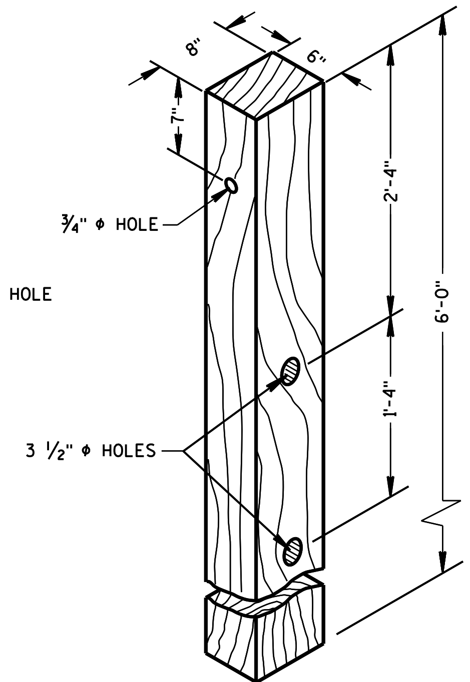
(2) 72" STEEL TUBE
(POSTS NO. 1-4



(2) 54" STEEL TUBE
(POSTS NO. 1-4

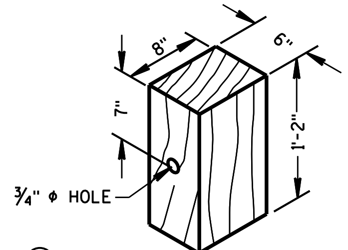


(1) TERMINAL POST
(POSTS NO. 1-4

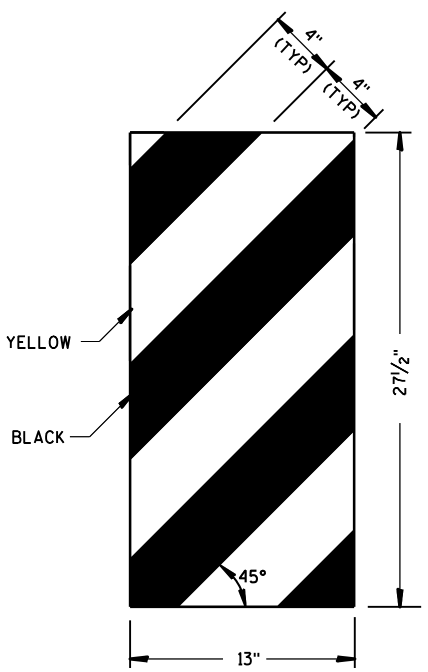


(4) CRT POST
(POSTS NO'S 5-8

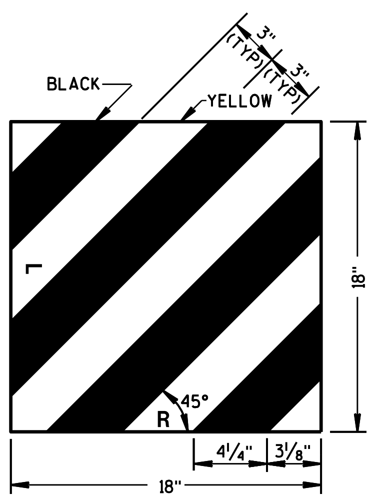
WOOD BREAKAWAY POSTS



(5) WOOD OFFSET BLOCK
REQ'D. AT ALL POSTS EXCEPT POST NO'S 1 & 2

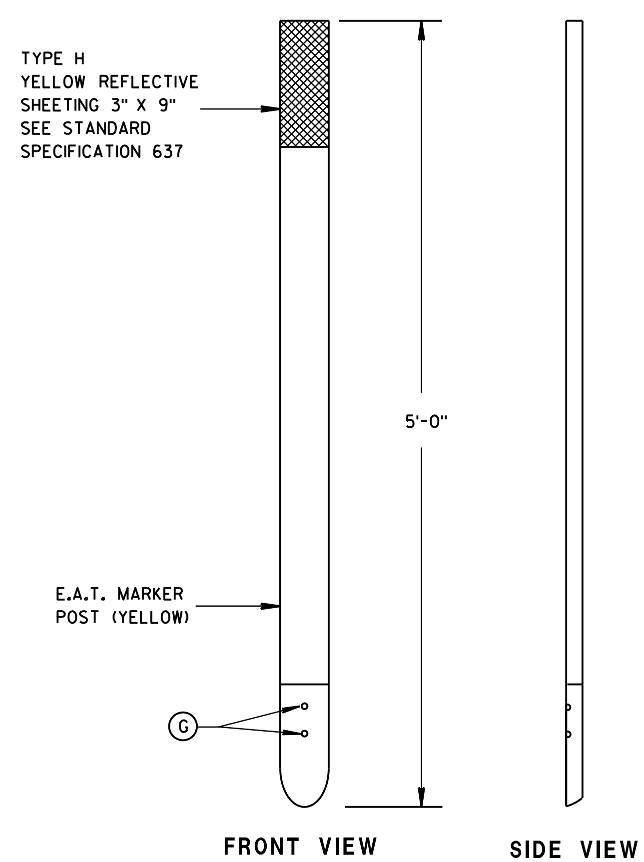


ET-2000 PLUS ONLY

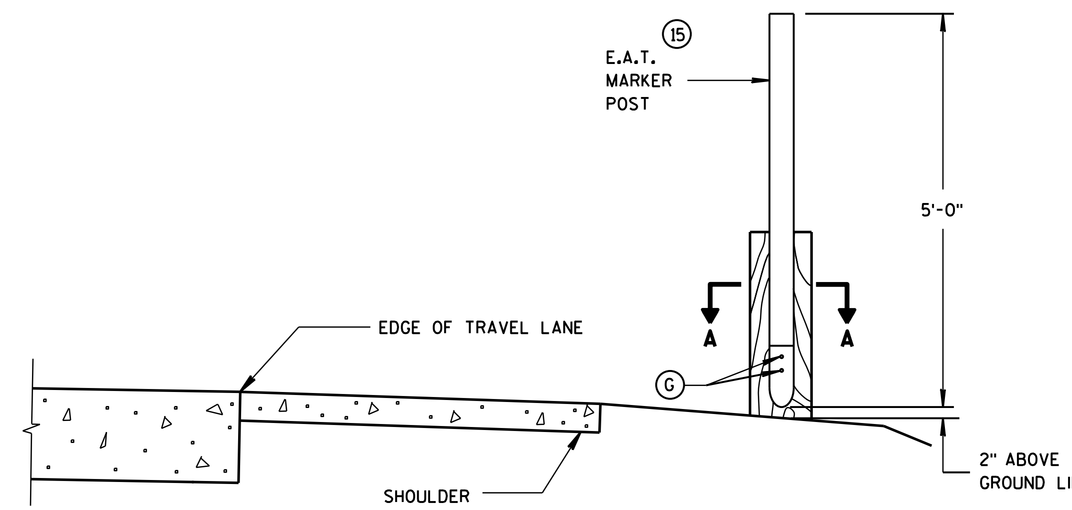


ET-2000 AND SKT-350

(14) REFLECTIVE SHEETING DETAILS

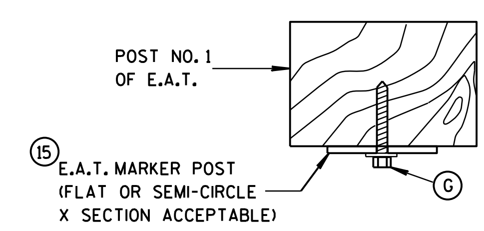


(15) E.A.T. MARKER POST



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

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



SECTION A-A

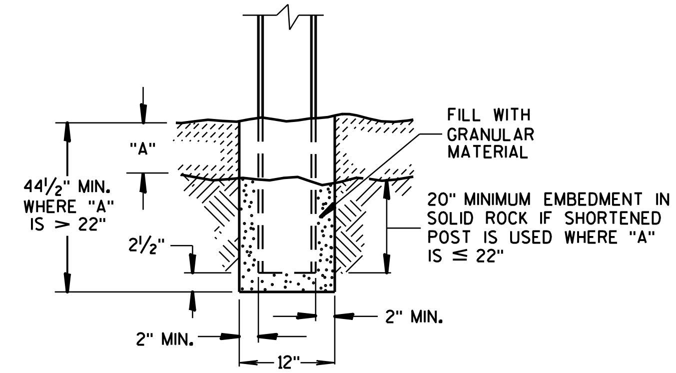
STEEL PLATE BEAM GUARD ENERGY ABSORBING TERMINAL
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION
APPROVED June 2014 — /S/ Jerry H. Zogg DATE — ROADWAY STANDARDS DEVELOPMENT ENGINEER FHWA

6

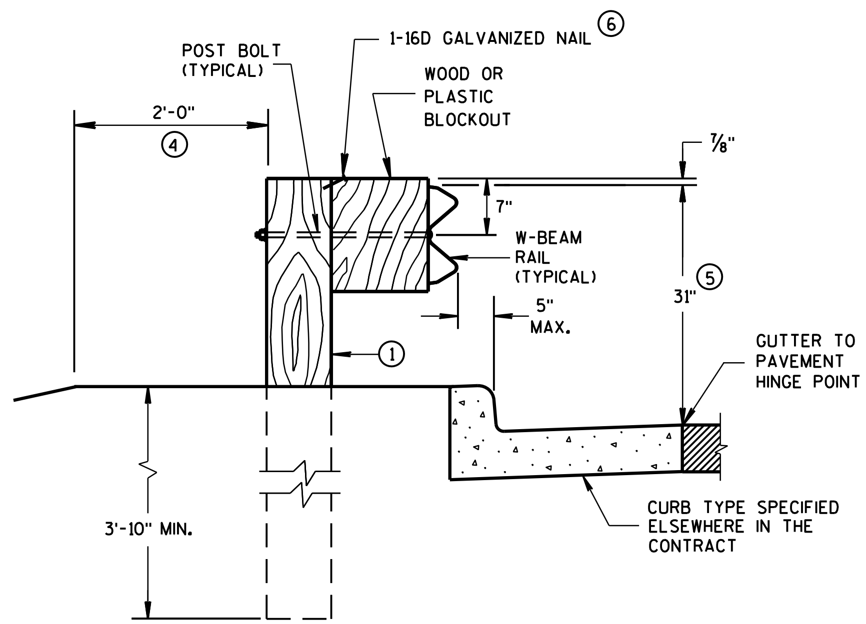
S.D.D. 14 B 24-8c

GENERAL NOTES

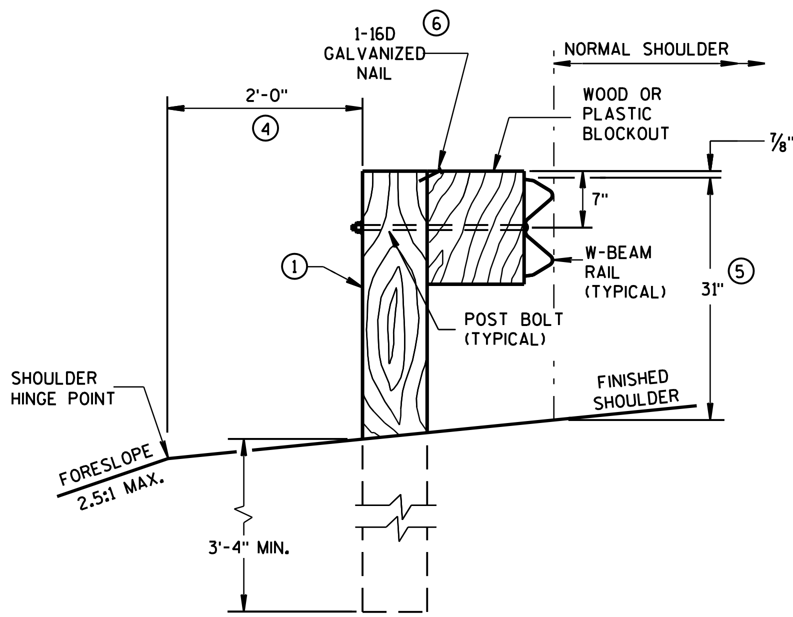
1. WOOD OR STEEL POSTS (w6X9 OR w6X8.5) MAY BE USED. DO NOT INTERMIX WOOD AND STEEL POSTS. INSTALL STEEL POSTS WITH HOLES ON APPROACHING TRAFFIC SIDE.
2. USE WOOD OR APPROVED PLASTIC BLOCKOUTS. WOOD BLOCKOUTS MAY BE CONSTRUCTED OUT OF TWO OR MORE WOOD BLOCKOUTS. SEE ALTERNATE WOOD BLOCKOUT DETAIL. DIMENSIONS 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.



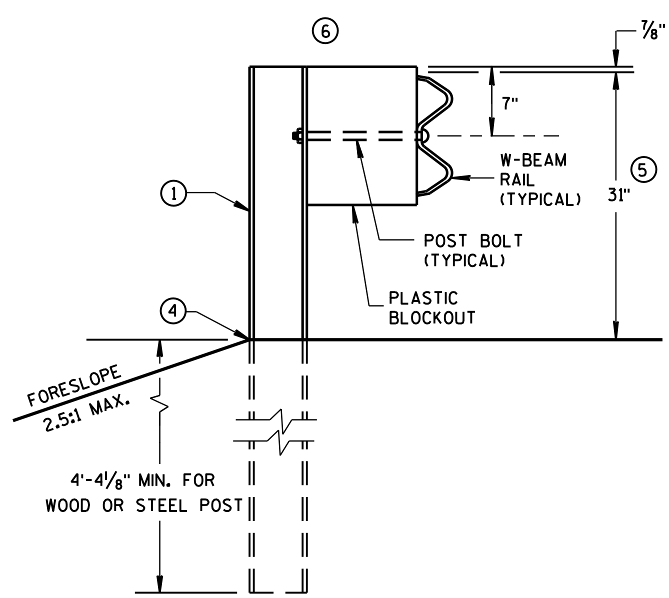
END VIEW
SETTING STEEL OR WOOD POST IN ROCK ③



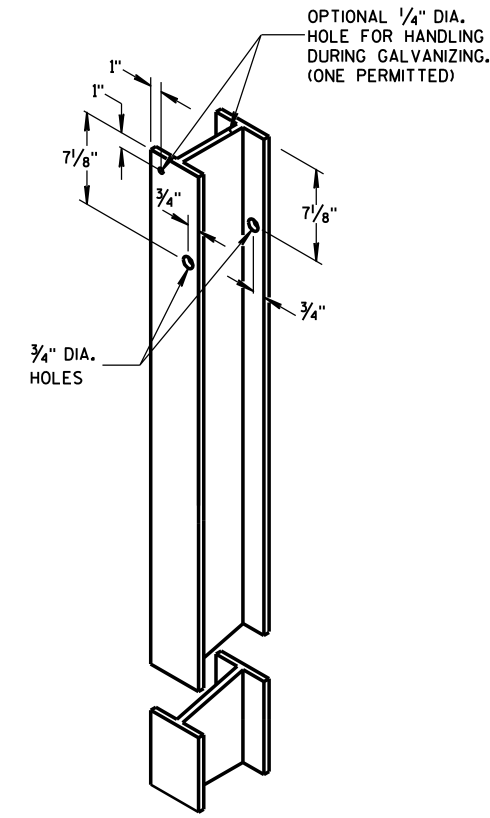
END VIEW
LOCATED ALONG A CURBED ROADWAY



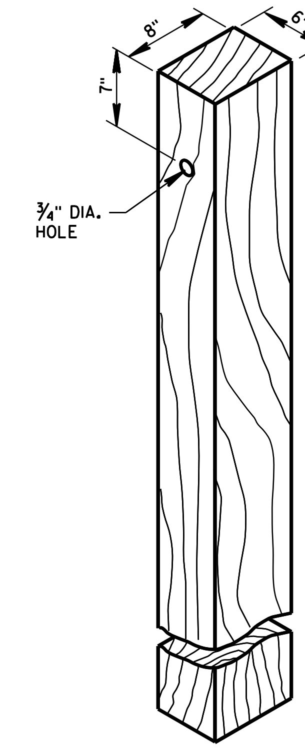
END VIEW
LOCATED ALONG A ROADWAY SHOULDER STANDARD INSTALLATION



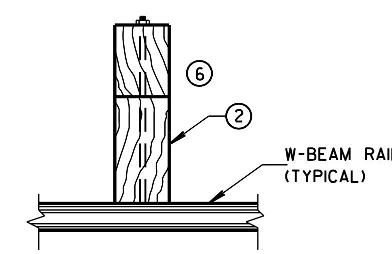
END VIEW
MGS LONGER POST AT HALFPOST SPACING W BEAM (K)



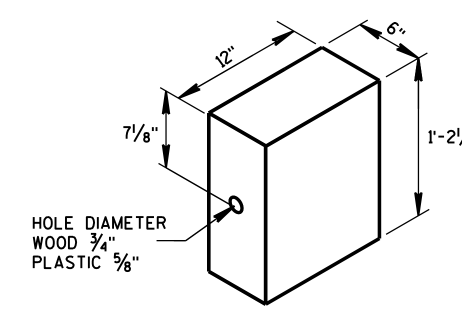
STEEL POST & HOLE PUNCHING DETAIL (w6X9) ①



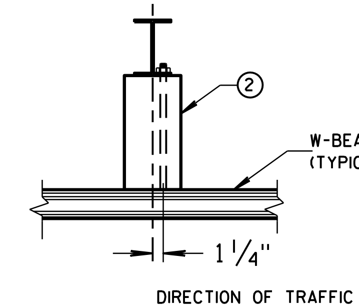
WOOD POST (6" X 8") NOMINAL ①



PLAN VIEW
WOOD POST, BLOCKOUT & BEAM



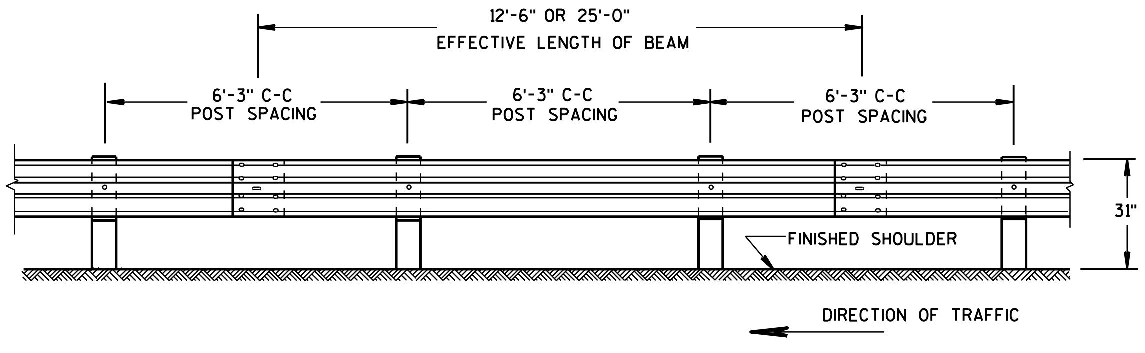
WOOD OR PLASTIC BLOCKOUT ②



PLAN VIEW
STEEL POST, PLASTIC BLOCKOUT & BEAM

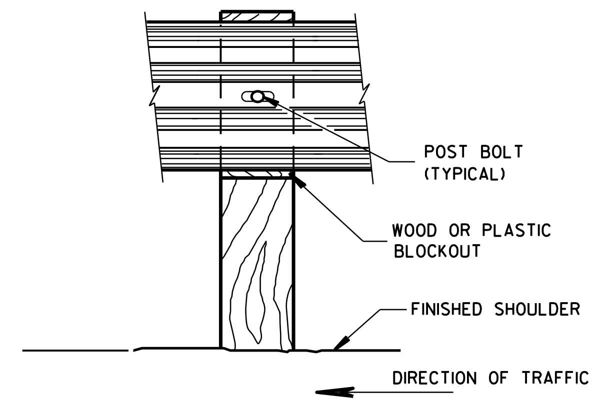
MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION



FRONT VIEW

POST SPACING STANDARD INSTALLATION



FRONT VIEW AT WOOD POST

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.

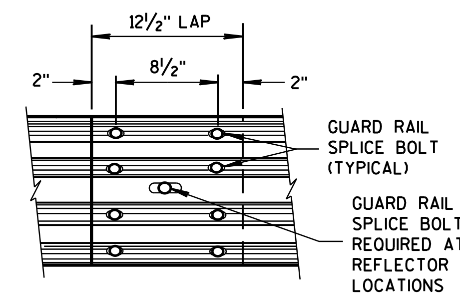
⑨ REVERSE EVERY OTHER REFLECTOR FOR 2-WAY VISIBILITY. THE CONTRACTOR MAY FURNISH TWO-SIDED REFLECTORS IN LIEU OF ONE-SIDED REFLECTORS.

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.

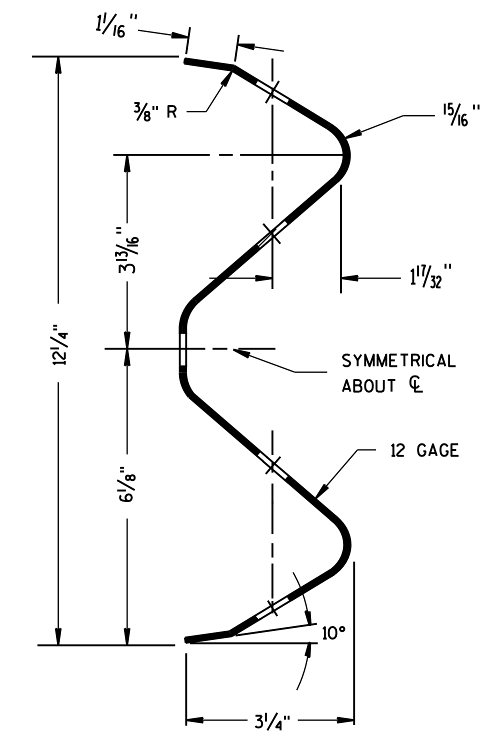
POST BOLTS ARE A 5/8" DIAMETER ASTM A307 GUARDRAIL BOLT. A POST BOLT REQUIRES 5/8" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX NUT AND 5/8" DIAMETER F844 FLAT WASHER. POST BOLTS MAY BE LONGER IF MULTIPLE BLOCKOUTS ARE BEING USED.

GUARD RAIL SPLICE BOLTS ARE A 5/8" DIAMETER ASTM A307 GUARDRAIL HEAD BOLT. A GUARDRAIL SPLICE BOLT REQUIRES 5/8" DIAMETER A563A DOUBLE RECESSED (DR) HEAVY HEX NUT.

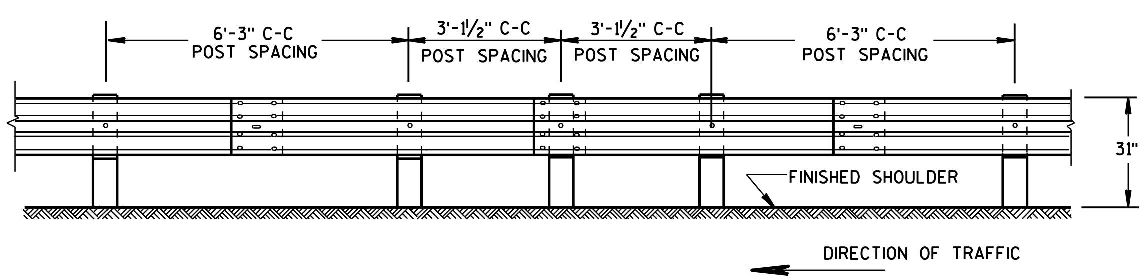


FRONT VIEW

MID-SPAN BEAM SPLICE

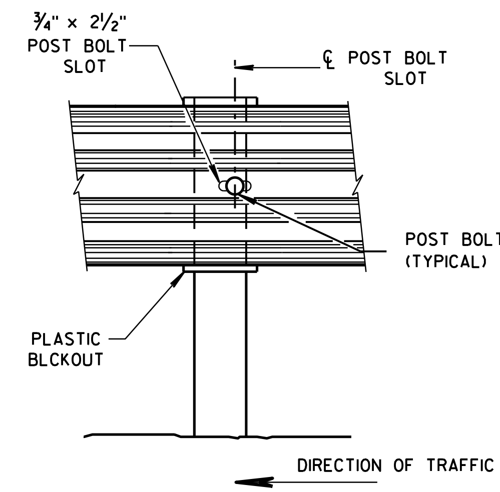


SECTION THRU W-BEAM RAIL

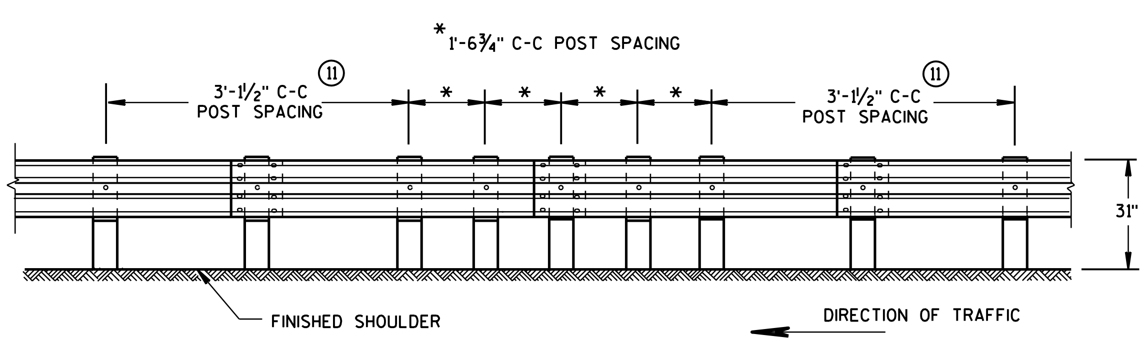


FRONT VIEW

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

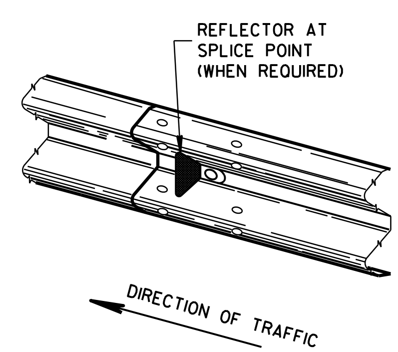


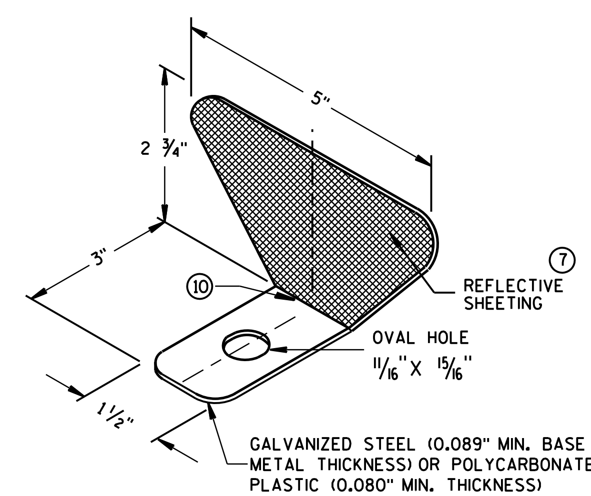
FRONT VIEW AT STEEL POST



FRONT VIEW

QUARTER POST SPACING (QS)





ONE SIDED REFLECTOR DETAIL AND TYPICAL INSTALLATION ⑦

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 ⑩ 2	3

MIDWEST GUARDRAIL SYSTEM (MGS) GUARDRAIL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPOR

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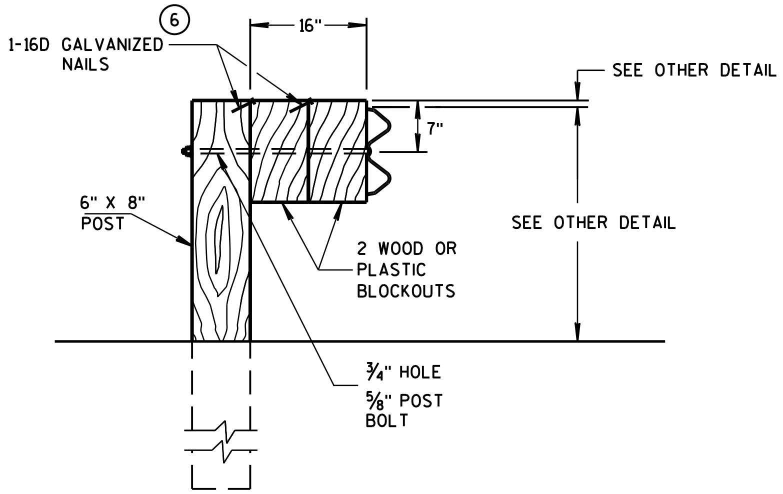
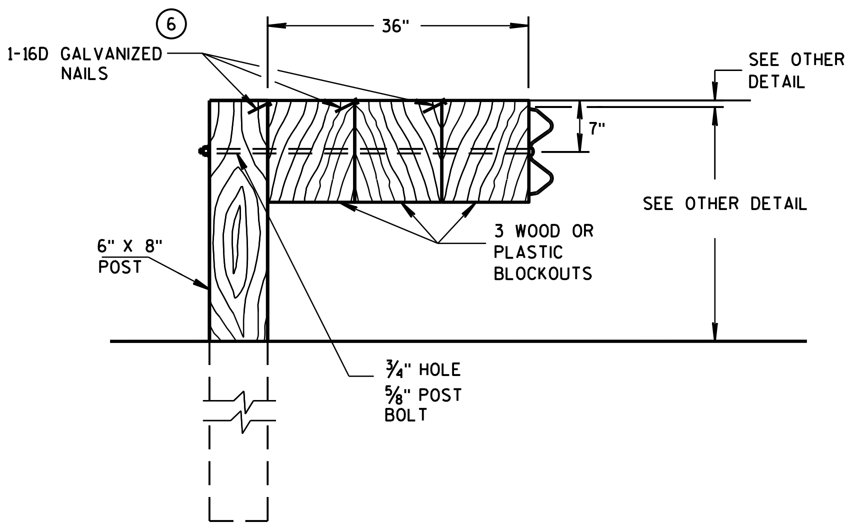


DETAIL FOR 16" BLOCKOUT DEPTH

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.

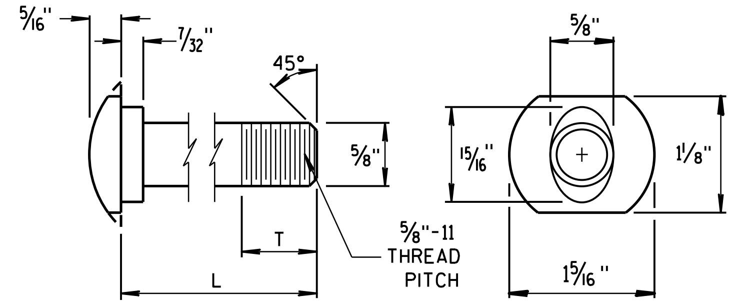


DETAIL FOR 36" BLOCKOUT DEPTH

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.

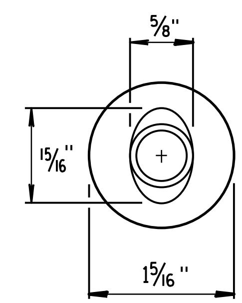
DO NOT USE 16" OR 36" BLOCKOUTS IF IT CAUSES THE POST TO BE DRIVEN BEYOND SHOULDER HINGE POINT OR CAUSES A FIXED OBJECT TO BE WITHIN THE DEFLECTION DISTANCE OF THE BARRIER.

NOTE: 1. ALL FILLETS SHALL HAVE A MINIMUM RADIUS OF $\frac{1}{16}$".
2. IF THE BOLT EXTENDS MORE THAN ¼" FROM THE NUT THE BOLT SHOULD BE TRIMMED BACK.

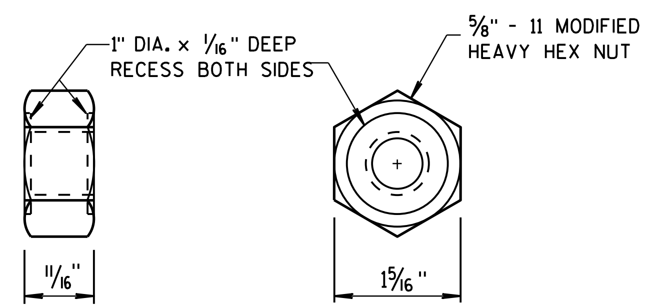


POST BOLT TABLE

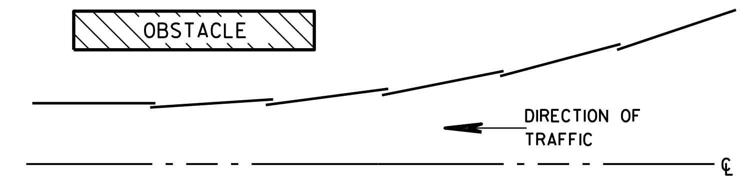
L	T (MIN.)
1¼"	1⅛"
2"	1¾"
10"	4"
14"	4$\frac{1}{16}$"
18"	4"
21"	4$\frac{1}{16}$"
25"	4"



ALTERNATE BOLT HEAD

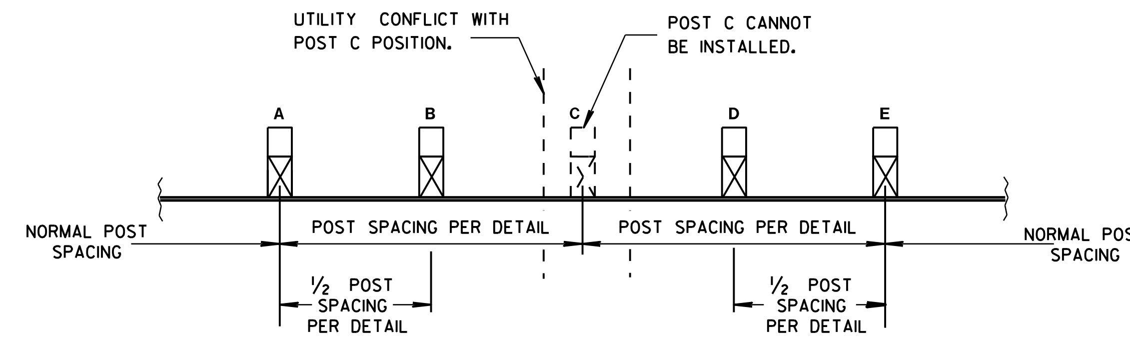


POST BOLT AND RECESS NUT

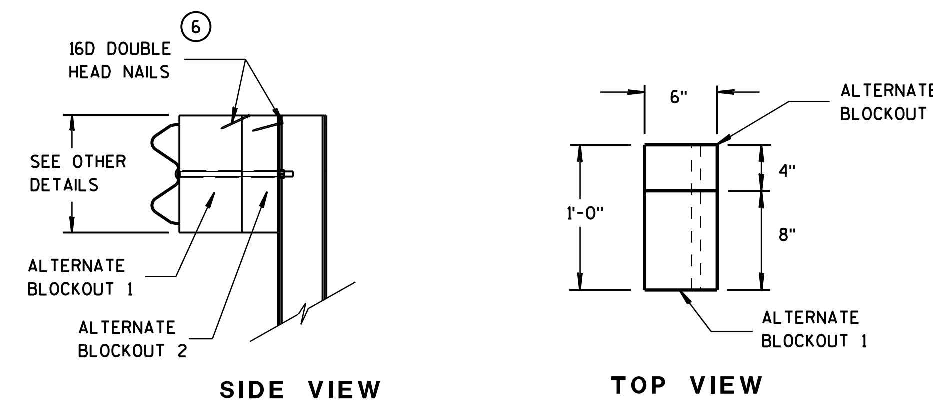


PLAN VIEW

BEAM LAPPING DETAIL



POST DRIVING FOR CONTINUOUS UNDERGROUND OBSTRUCTION



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

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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) 1/2" 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.

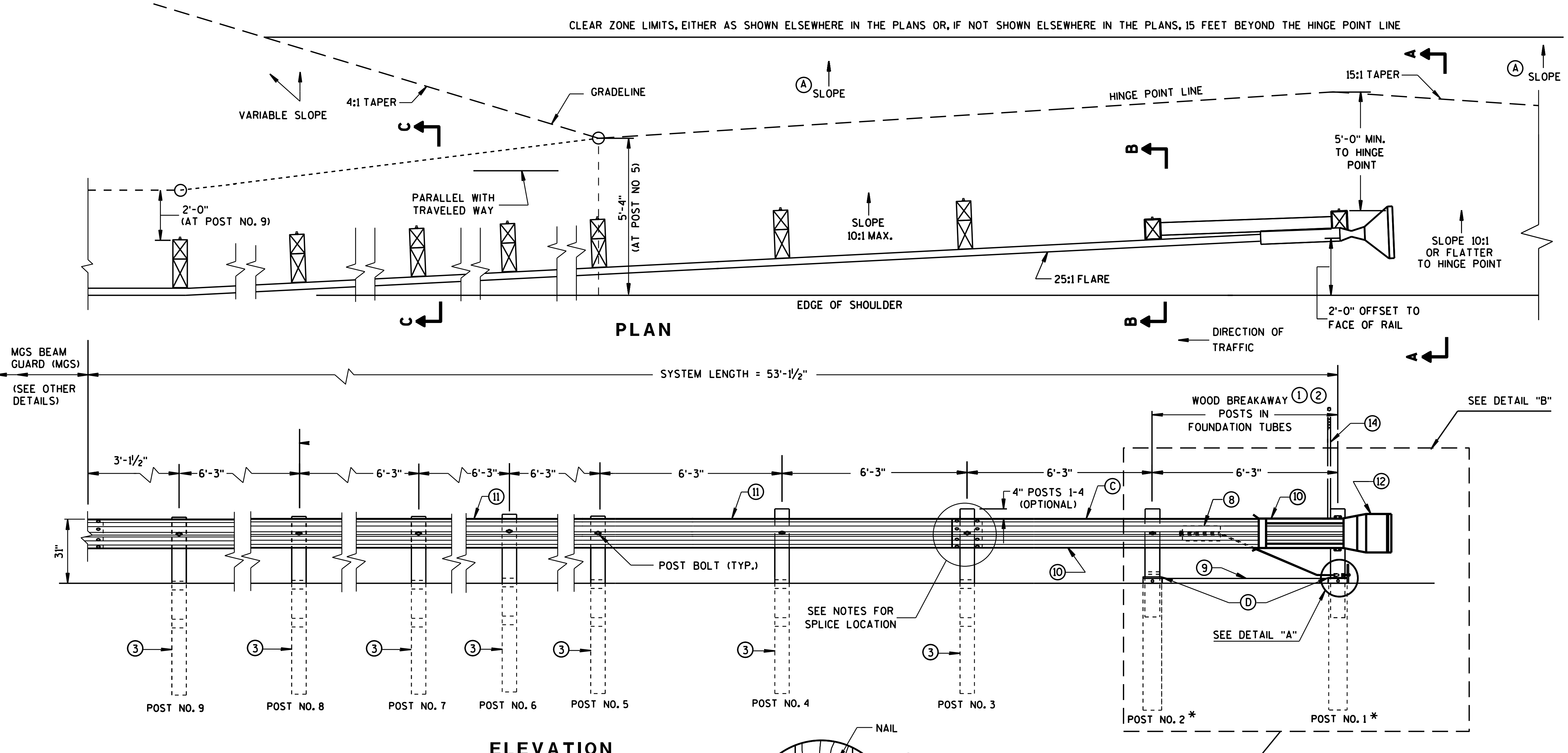
SEE SDD 14B42 FOR MORE INFORMATION.

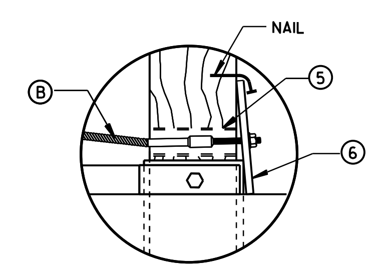
* DO NOT ATTACH BLOCKOUTS TO POSTS 1 AND 2.

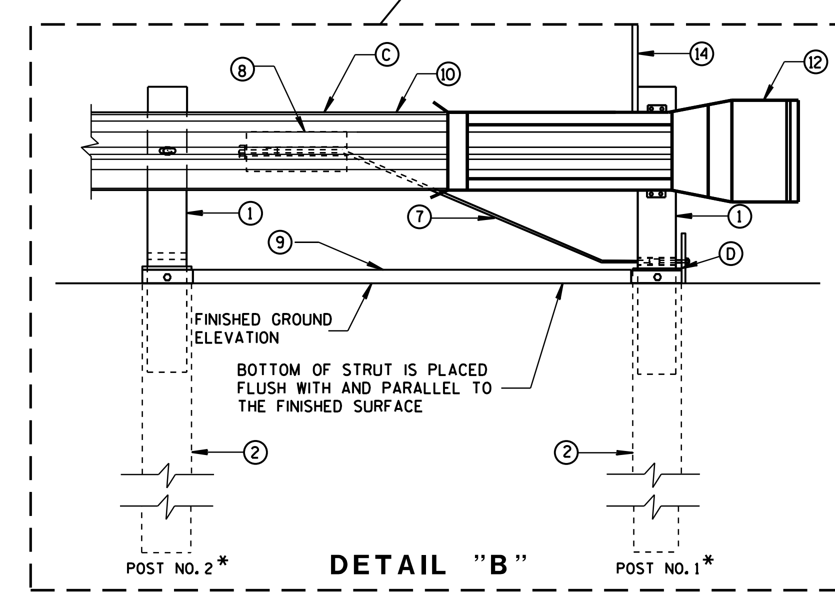
DO NOT INSTALL REFLECTORS ON THE FIRST 50 FEET OF THE APPROACH END OF THE ENERGY ABSORBING TERMINAL.

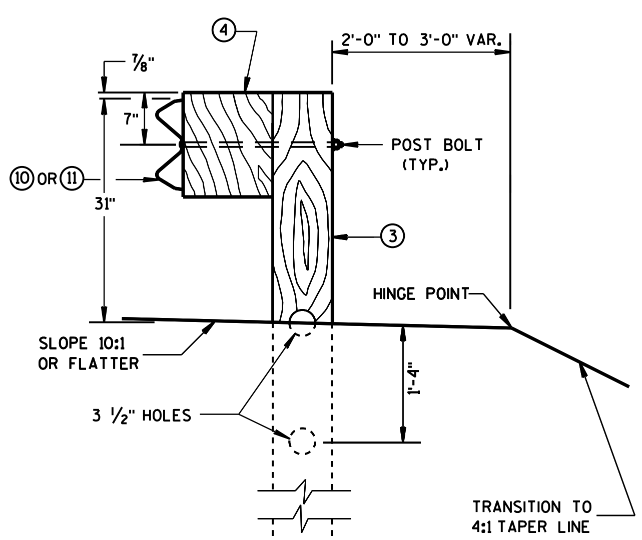
W-BEAM RAIL SPLICES ARE LOCATED AT POST NUMBER 3, AND BETWEEN POST 5 AND 6, BETWEEN POSTS 7 AND 8, AND MIDDLE OF THE SPAN AFTER POST 9.

THE CENTER OF THE UPPER 3 1/2" 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.

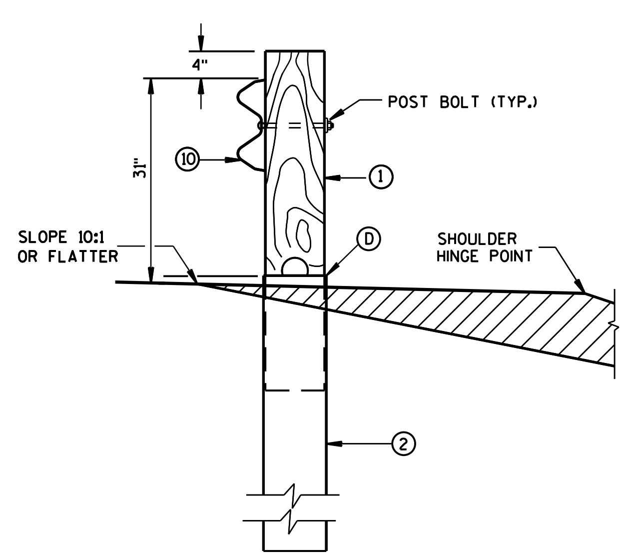




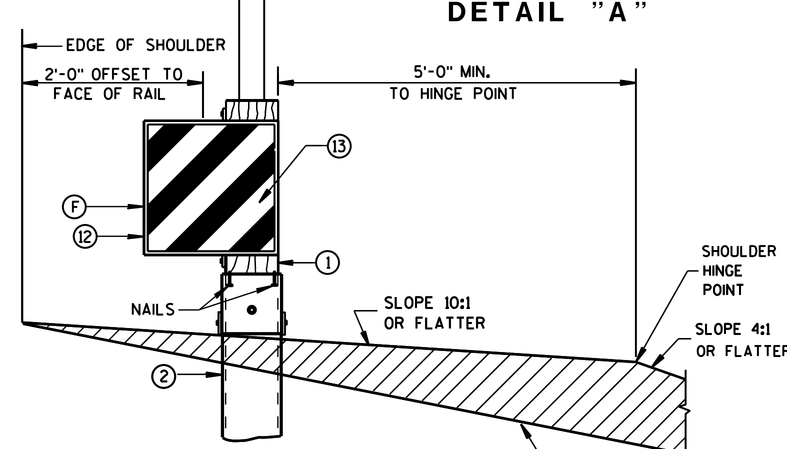




SECTION C-C
TYPICAL AT POST NOS. 3-9



SECTION B-B
TYPICAL AT POST NO. 2*



SECTION A-A
TYPICAL AT POST NO. 1*

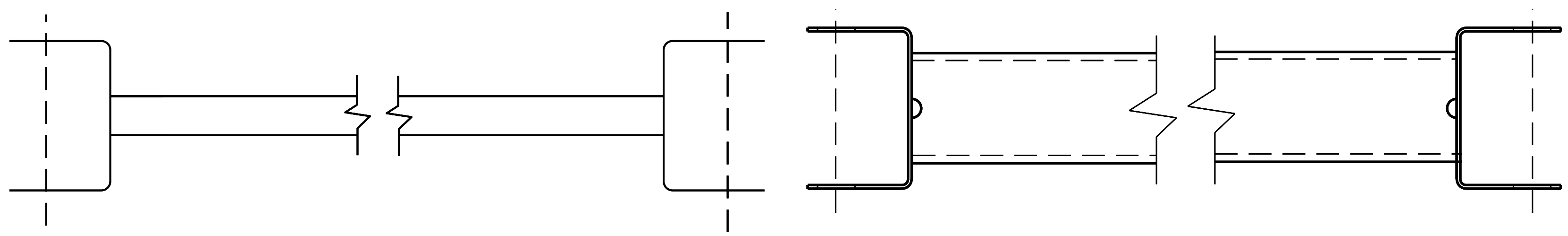
MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

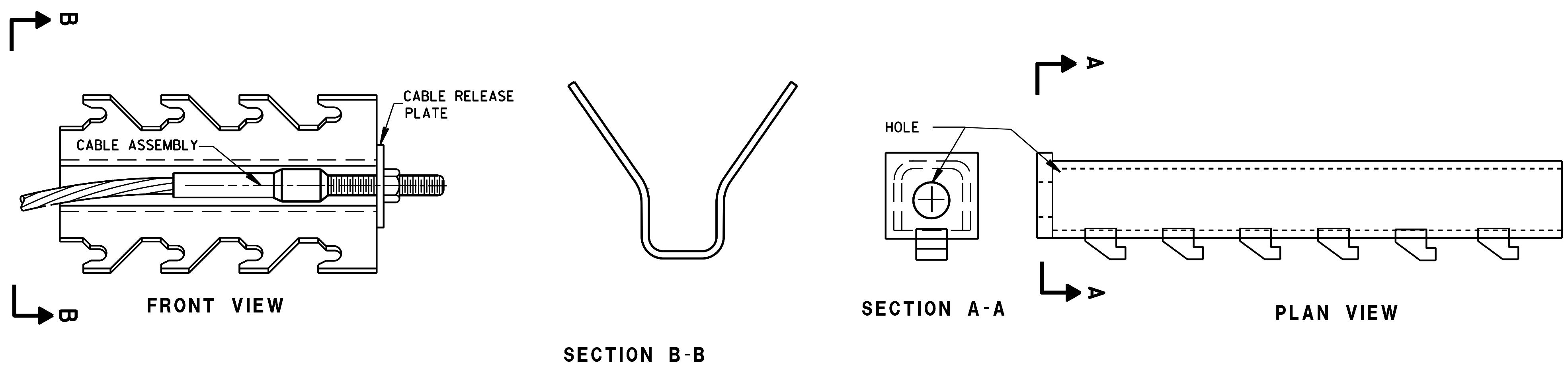
S.D.D. 14 B 44-2a

BILL OF MATERIALS

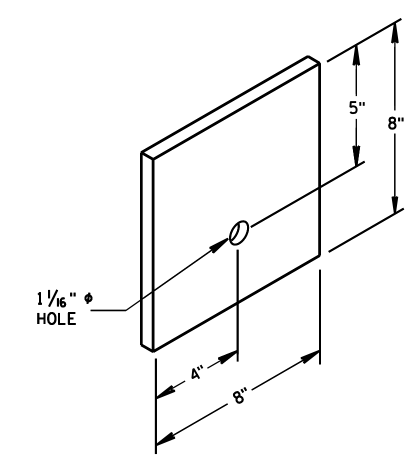
PART NO.	DESCRIPTION MATERIALS PROVIDED BY MGS EAT MANUFACTURER. SEE MANUFACTURER'S DETAILS FOR MORE INFORMATION.
1	WOOD BREAKAWAY POST
2	6" X 8" X 0.188", 6'-0" LONG FOUNDATION TUBE AT POSTS 1 AND 2
3	WOOD CRT
4	WOOD BLOCKOUT
5	PIPE SLEEVE
6	BEARING PLATE
7	BCT CABLE ASSEMBLY
8	ANCHOR CABLE BOX
9	GROUND 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 GROUND STRUT 9 H



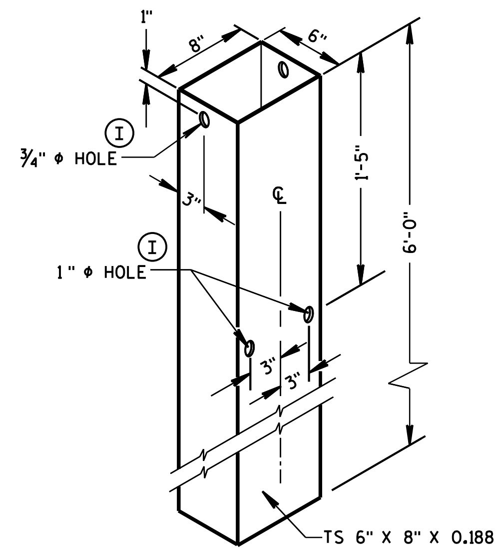
GENERIC ANCHOR CABLE BOX 8 H



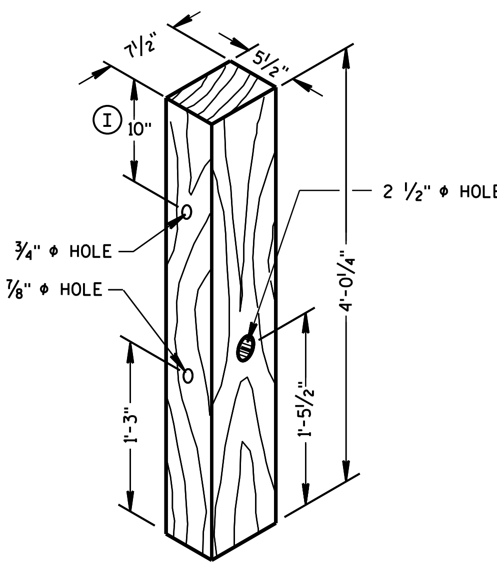
BEARING PLATE 6

MIDWEST GUARDRAIL SYSTEM ENERGY ABSORBING TERMINAL (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO[R]TATION

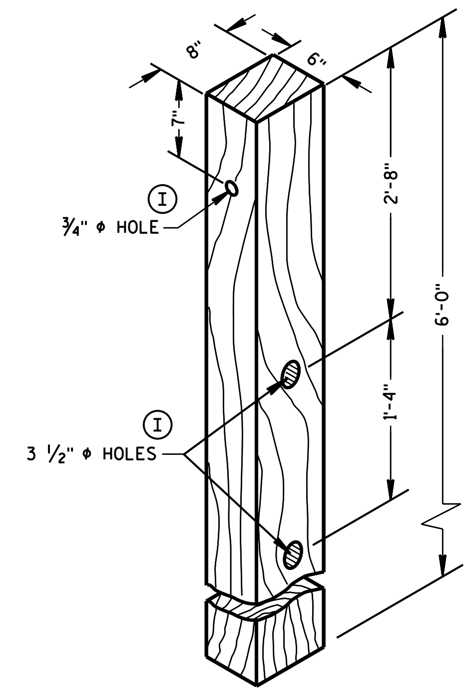


FOUNDATION TUBE (2)



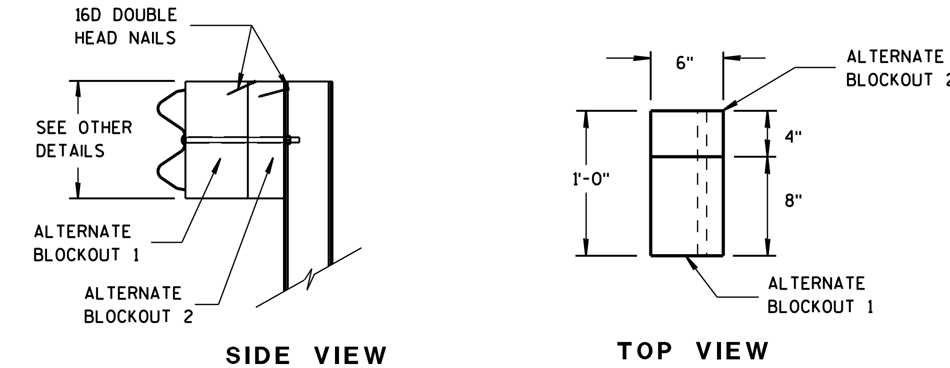
POSTS NUMBER 1 AND 2

WOOD BREAKAWAY POST (1)

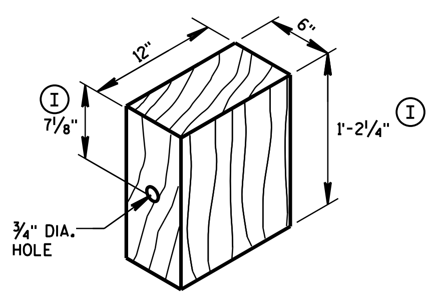


POSTS NUMBER 3-9

WOOD CRT POST (3)

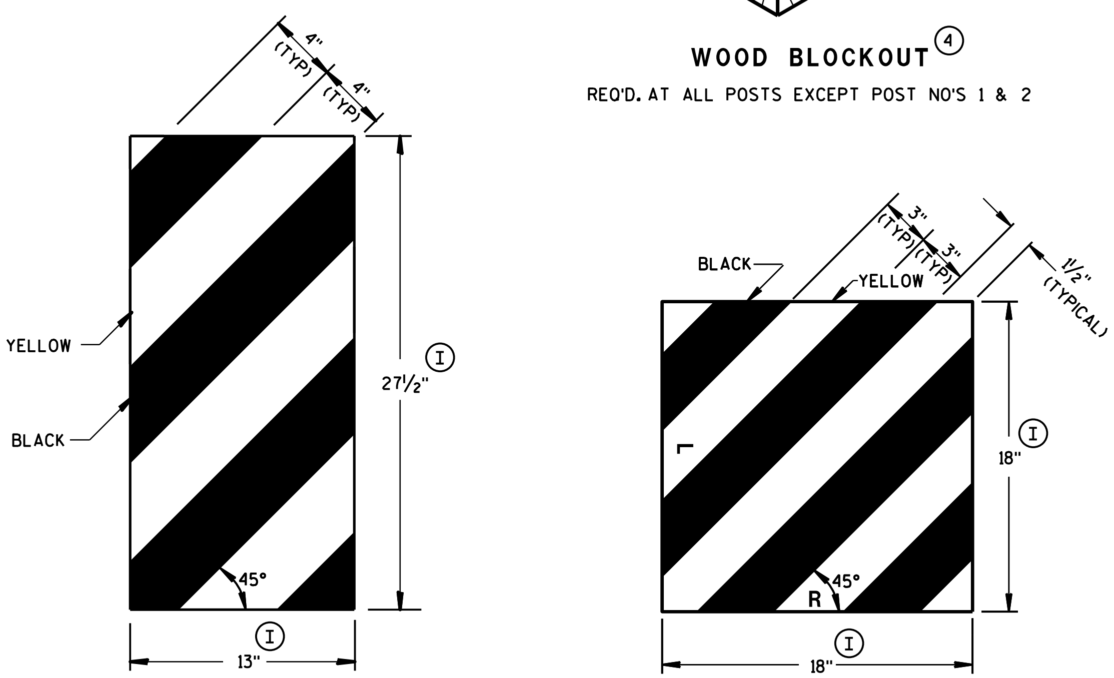


ALTERNATE WOOD BLOCKOUT DETAIL

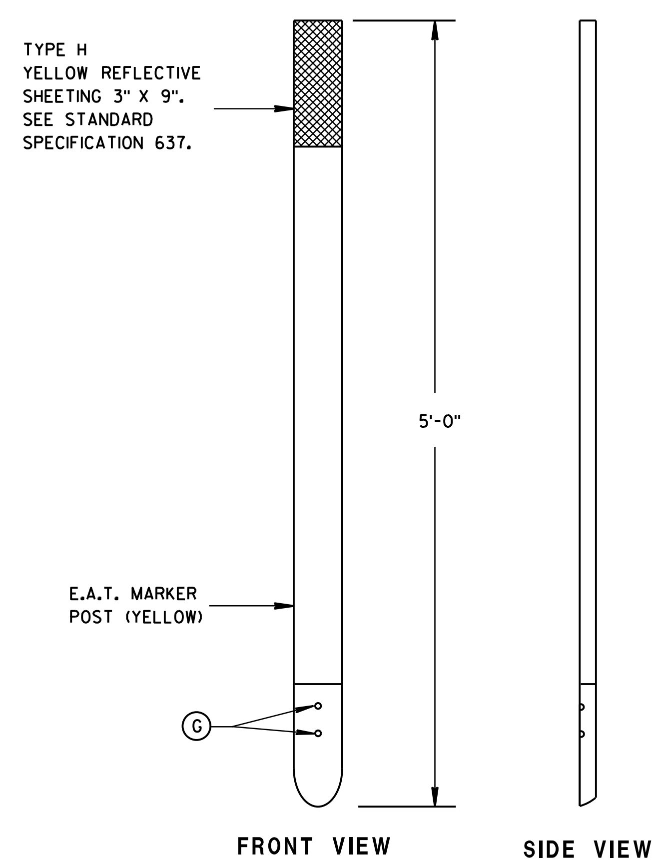


WOOD BLOCKOUT (4)

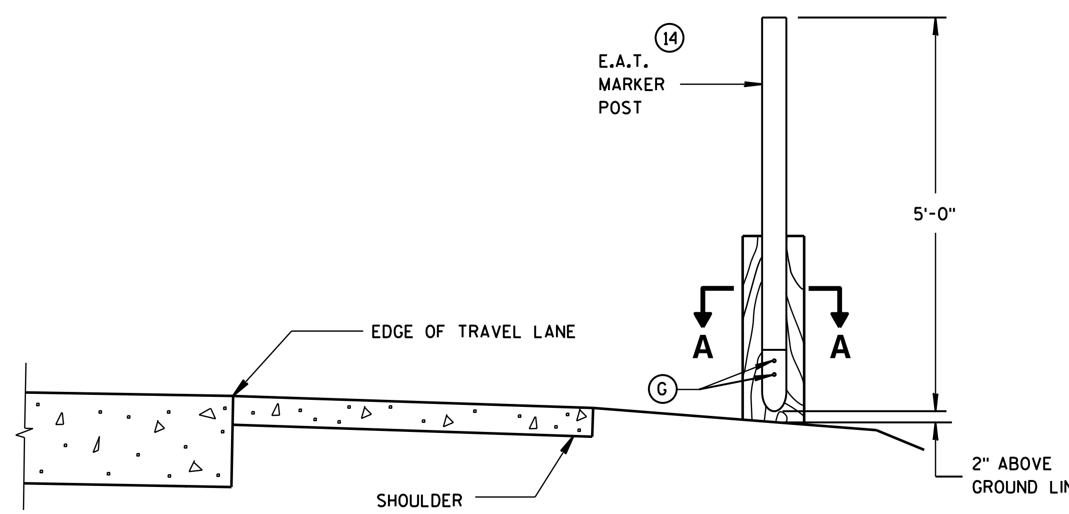
REQ'D. AT ALL POSTS EXCEPT POST NO'S 1 & 2



GENERIC REFLECTIVE SHEETING (13) (H)

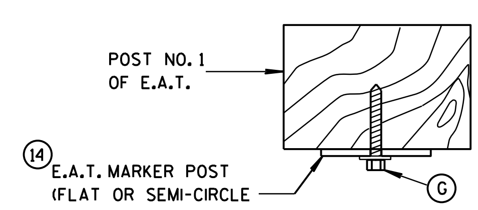


E.A.T. MARKER POST (14)



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

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

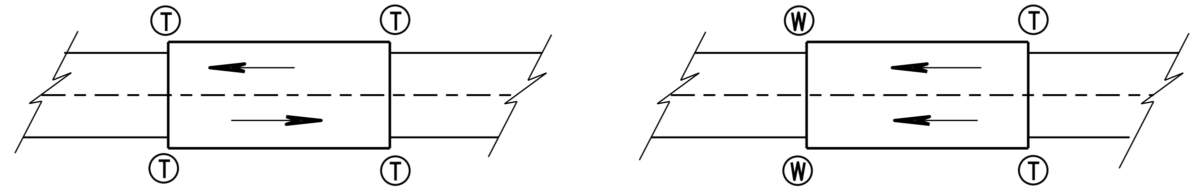


SECTION A-A

MIDWEST GUARDRAIL SYSTEM
ENERGY ABSORBING TERMINAL
(MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

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



(T) THRIE BEAM CONNECTION

(W) W-BEAM CONNECTION WHEN REQUIRED

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

GENERAL NOTES

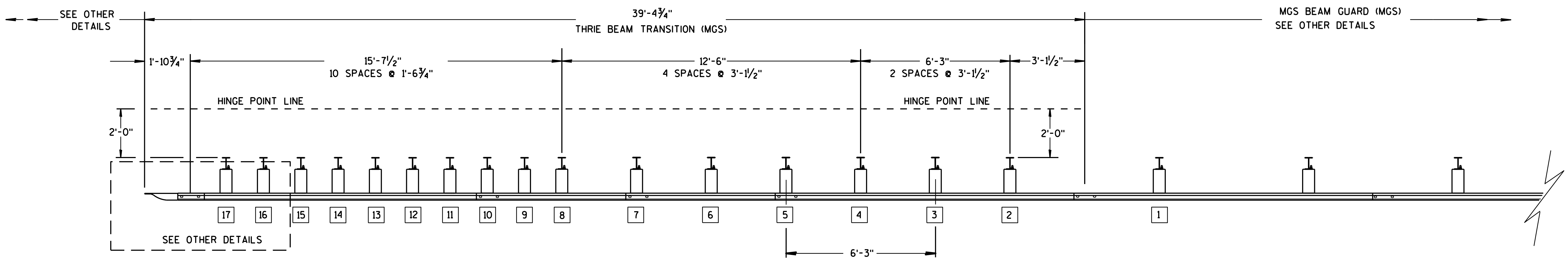
IF ROCK IS ENCOUNTERED, REMOVE ROCK TO FULL DEPTH OF POST PLUS 2½", AND 12" DIAMETER AROUND POST. SEE 14B42 FOR MORE DETAILS.

TRANSITION USES STEEL POSTS ONLY.

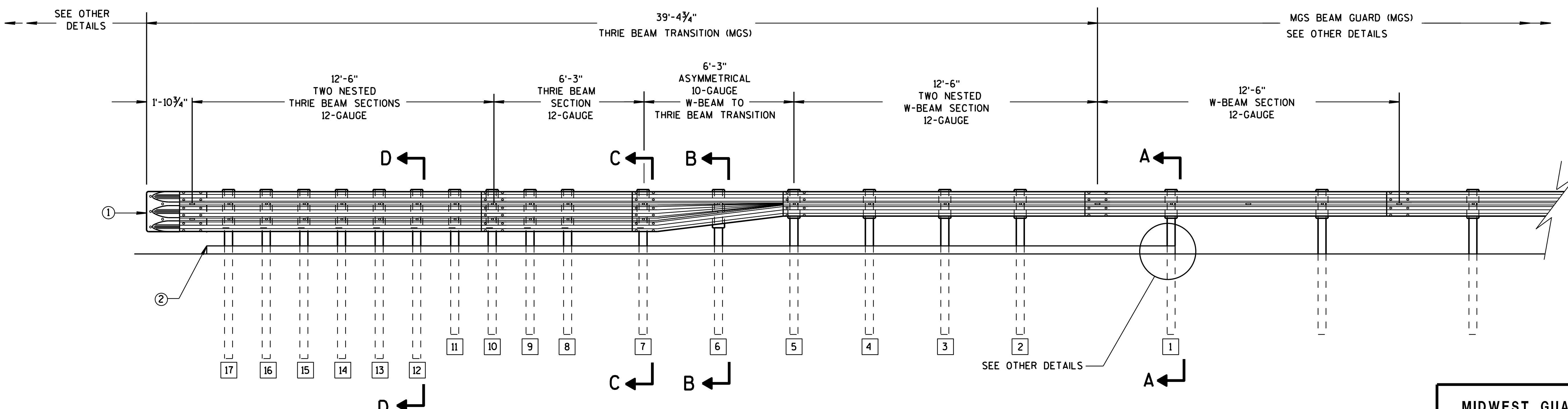
SEE STANDARD DETAIL DRAWING 14 B 42 FOR MORE INFORMATION.

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

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

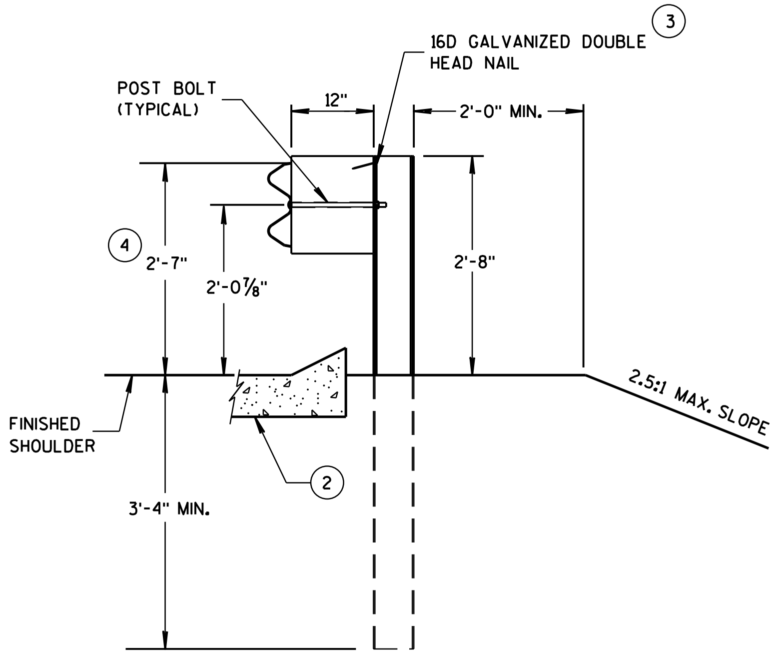
S.D.D. 14 B 45-4a

GENERAL NOTES

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

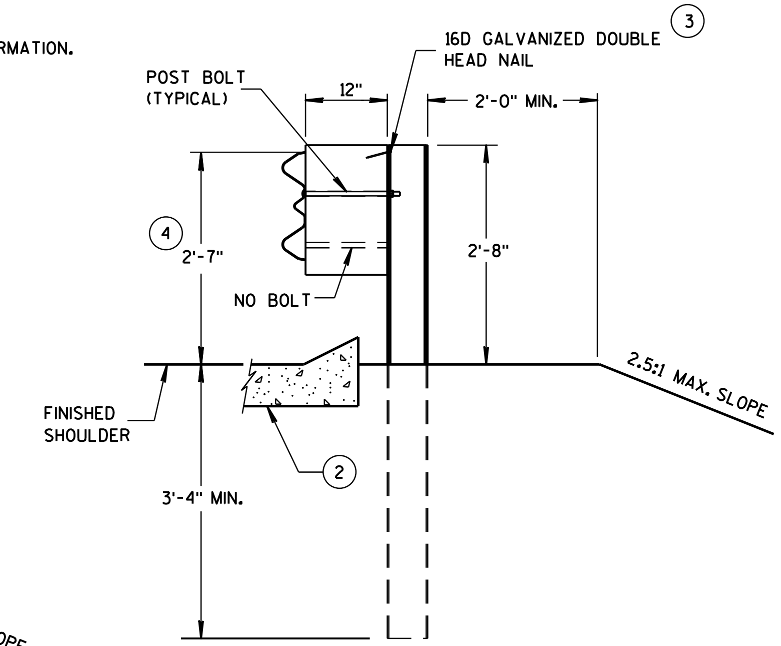
(3) WHEN USING STEEL POSTS AND WOOD BLOCKOUTS INSTALL FOUR 10D GALVANIZED NAILS. INSTALL NAILS AT THE BACK CORNERS OF THE BLOCK AND BEND THE NAILS OVER THE FLANGE OF THE STEEL POST.

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



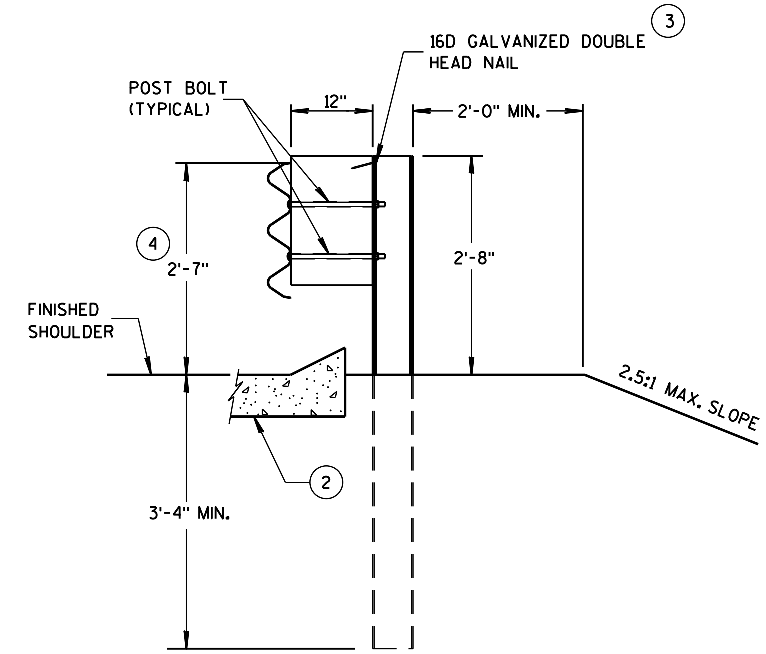
SECTION A-A

POSTS 1-5



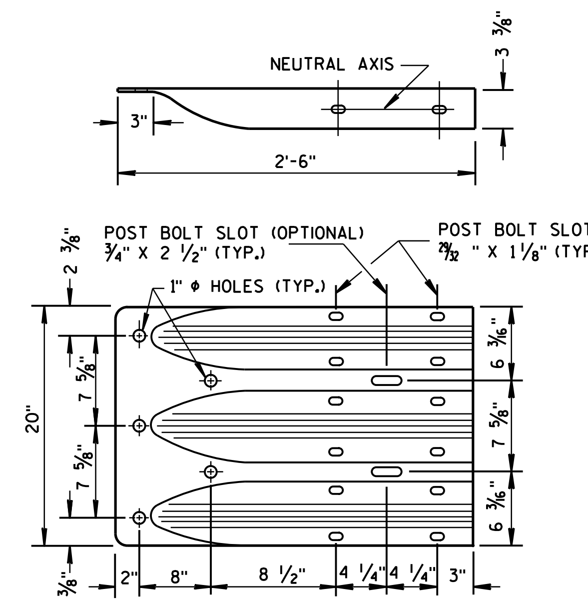
SECTION B-B

POST 6



SECTION C-C

POSTS 7-11



THRIE BEAM TERMINAL CONNECTOR

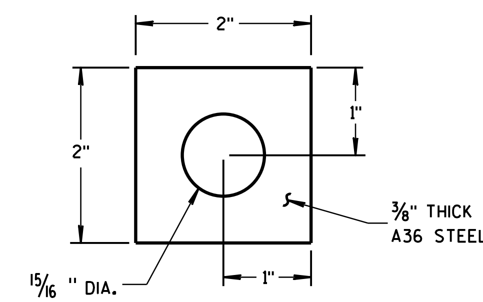
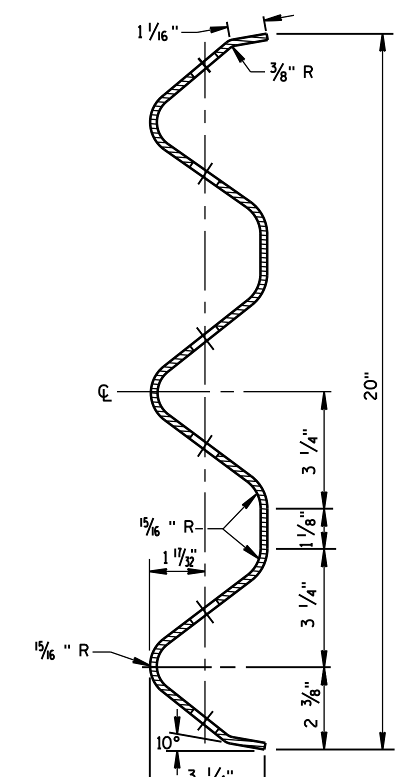
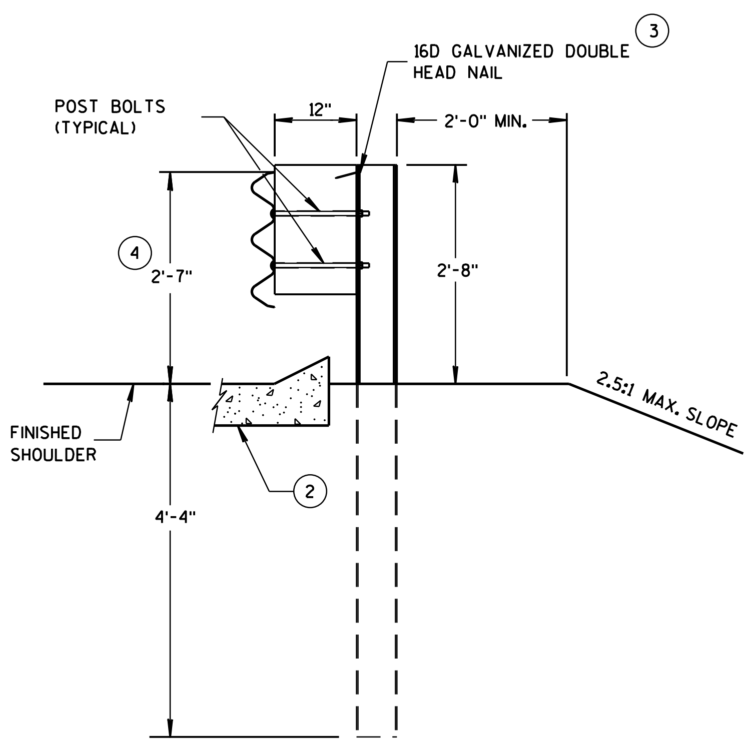


PLATE WASHER DETAIL

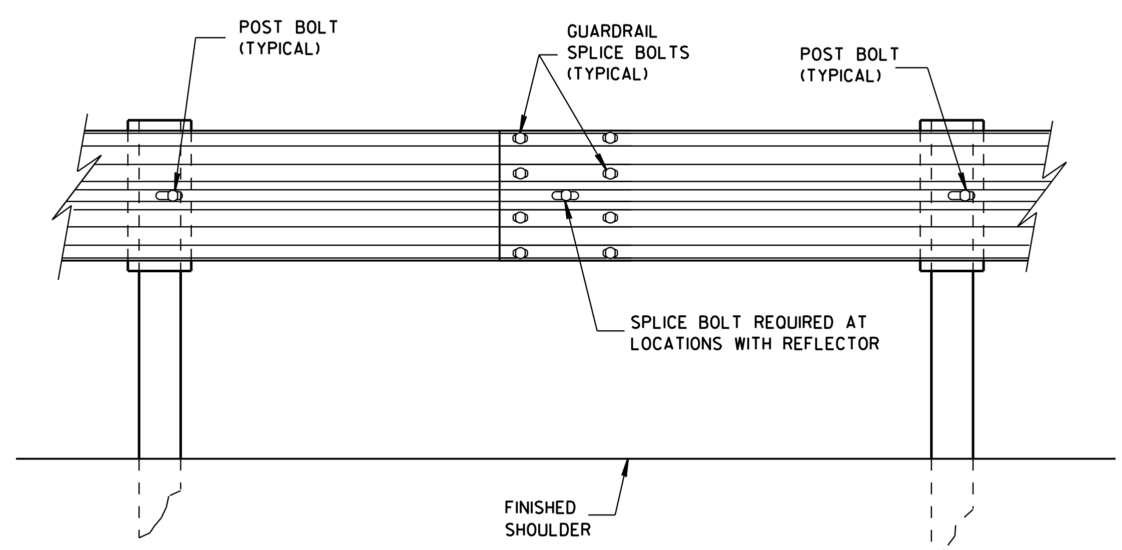


SECTION THRU THRIE BEAM RAIL ELEMENT



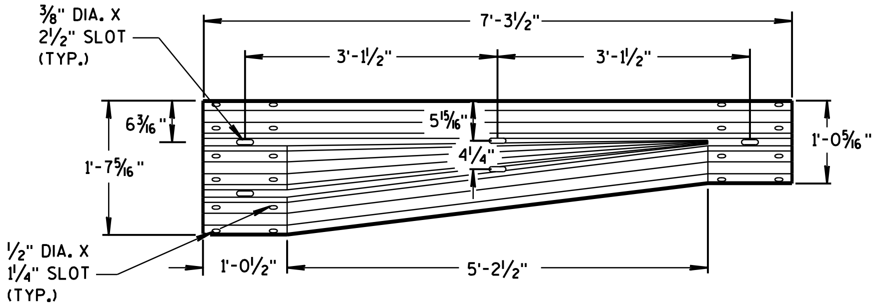
SECTION D-D

POSTS 12-17

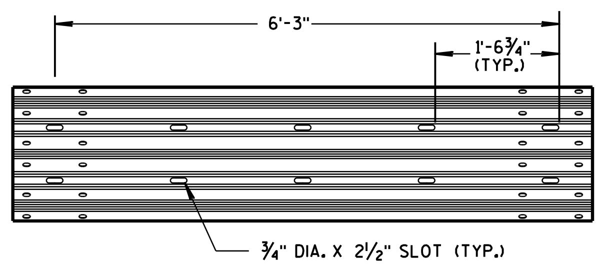


SPLICE DETAIL

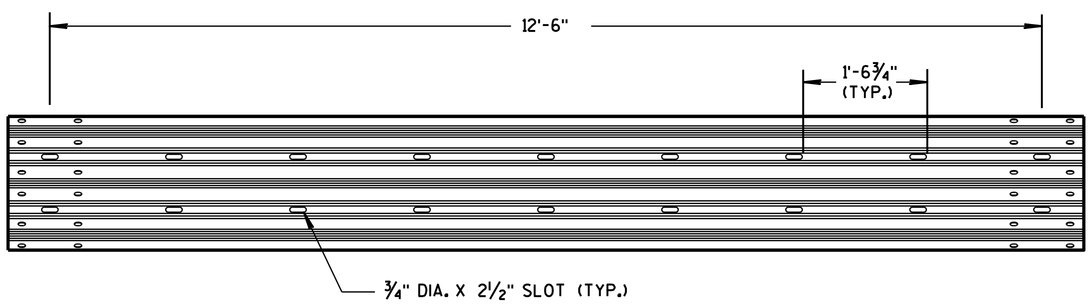
MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)
STATE OF WISCONSIN DEPARTMENT OF TRANSPO[RTATION]



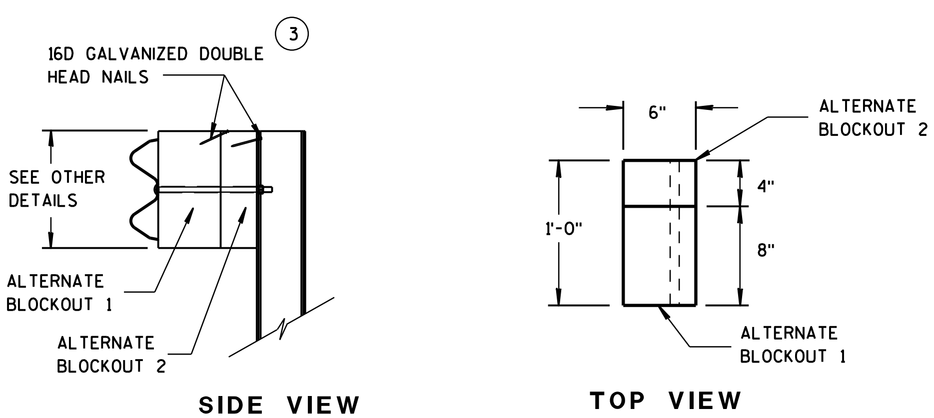
W-BEAM TO THRIE BEAM TRANSITION SECTION



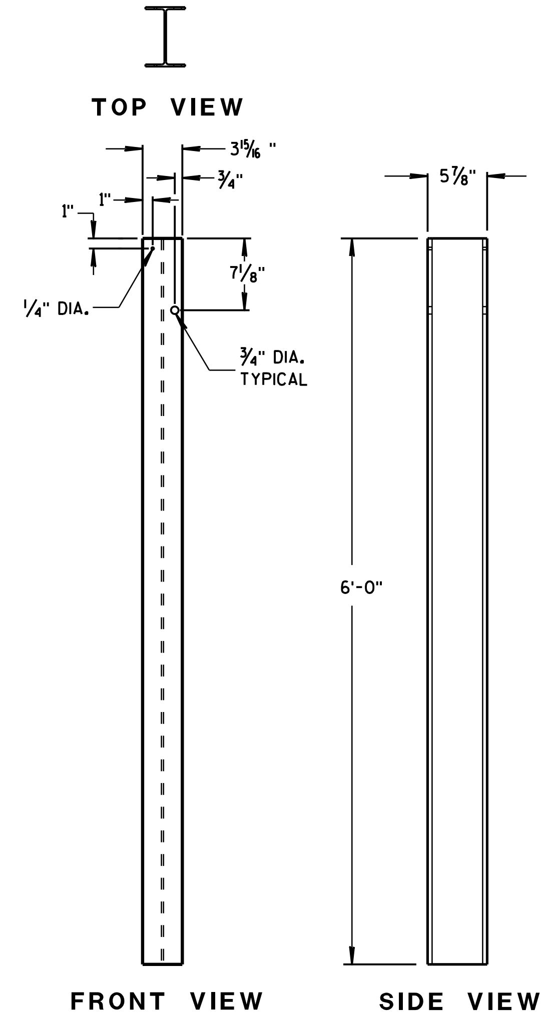
6'-3" THRIE BEAM SECTION



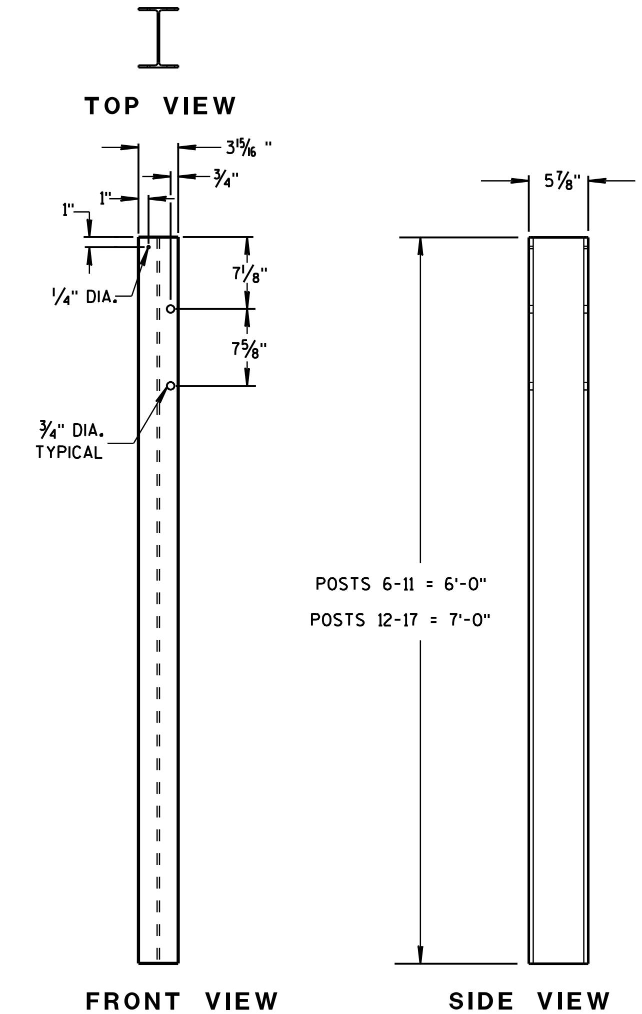
12'-6" THRIE BEAM SECTION



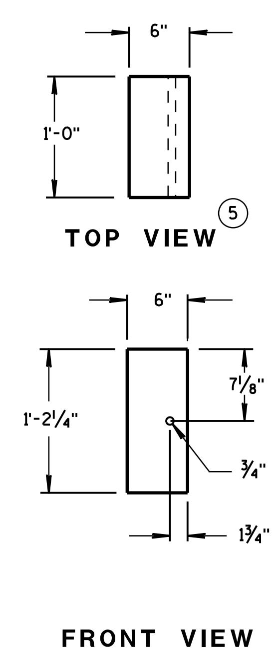
ALTERNATE WOOD BLOCKOUT DETAIL



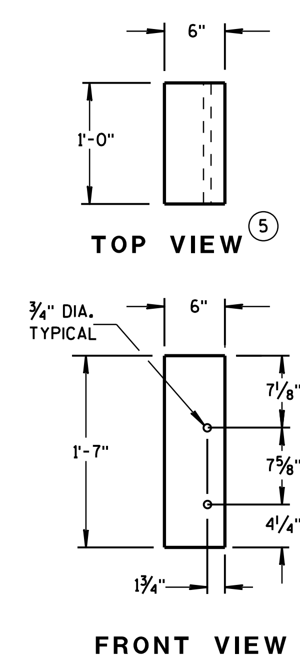
STEEL POSTS 1-5



STEEL POSTS 6-17



BLOCKOUT POSTS 1-5



BLOCKOUT POSTS 6-17

GENERAL NOTES

STEEL POSTS ARE W6X9 OR W6X8.5.

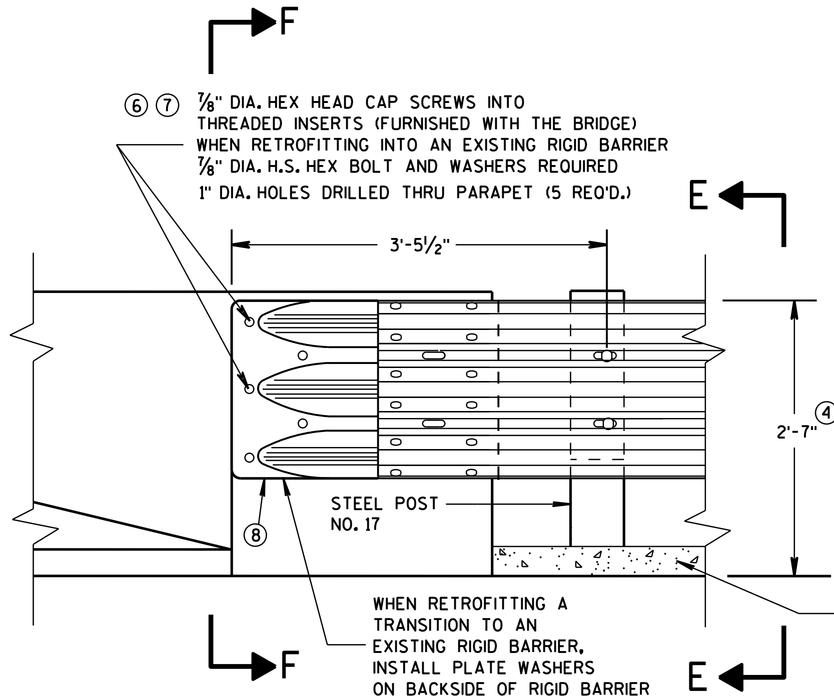
BOLT HOLES FOR POST ARE ON FRONT AND OF SIDE OF POST.

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.

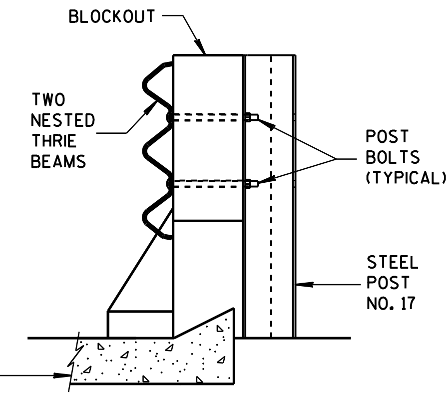
5 WOOD BLOCKS MAY BE CONSTRUCTED OUT OF 2 WOOD BLOCKS. SEE ALTERNATE WOOD BLOCK DETAIL.

MIDWEST GUARDRAIL SYSTEM
THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION



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.

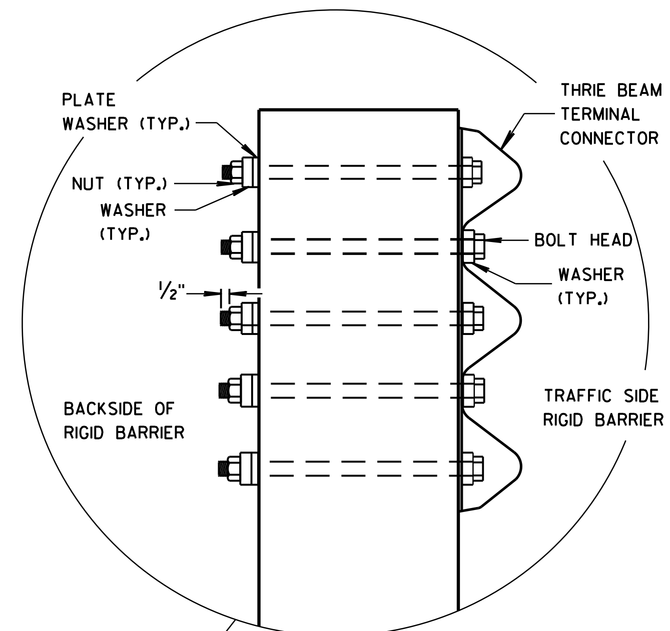
② OPTIONAL CURB AND GUTTER OR DRAINAGE FEATURE SEE PLAN FOR INFORMATION.

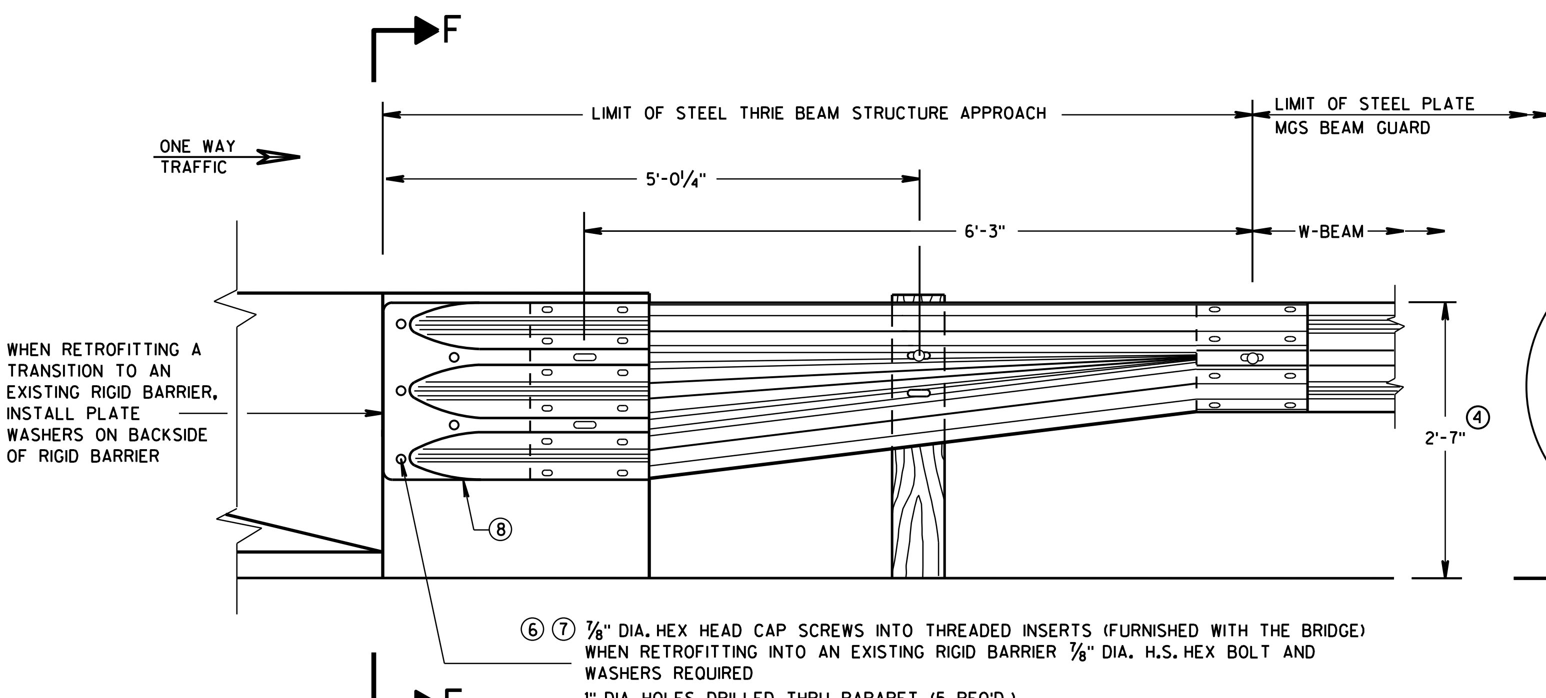
④ TOLERANCE FOR TOP OF BEAM IS ± 1".

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

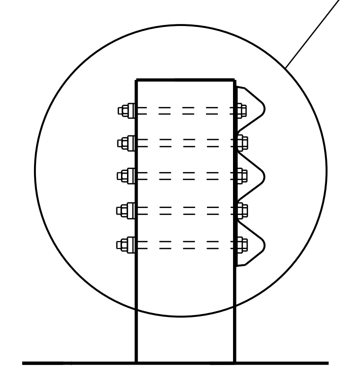
⑦ BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. 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 ½".

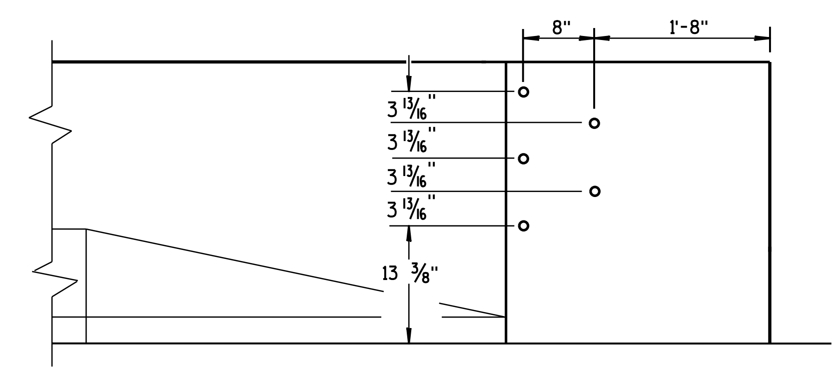




FRONT VIEW



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
NT

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.

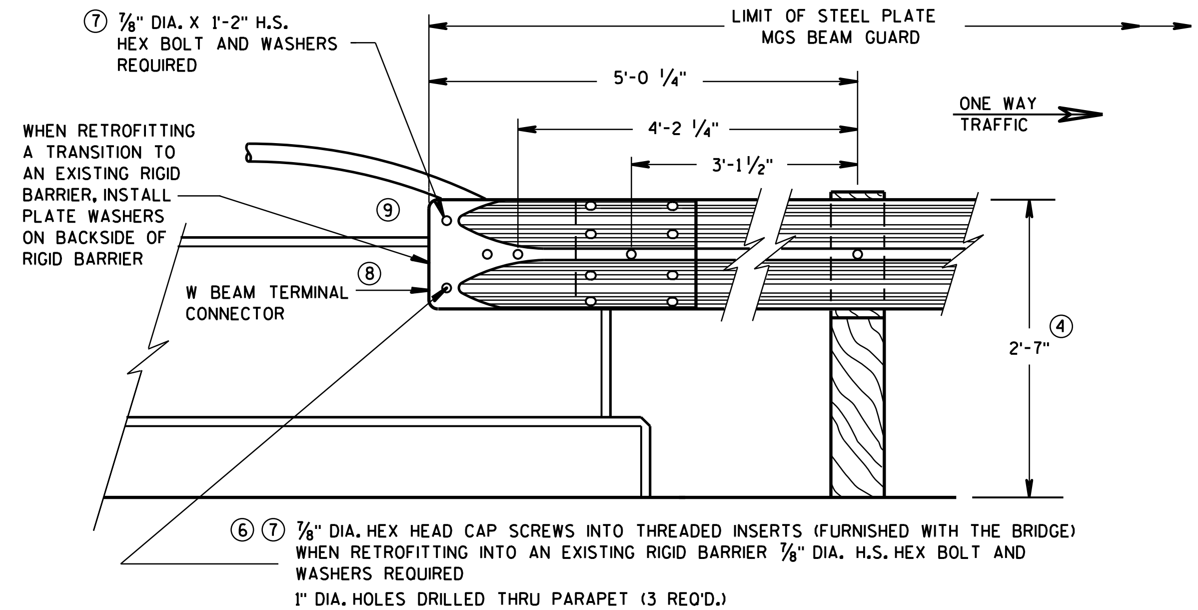
(4) TOLERANCE FOR TOP OF BEAM IS ± 1".

(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".

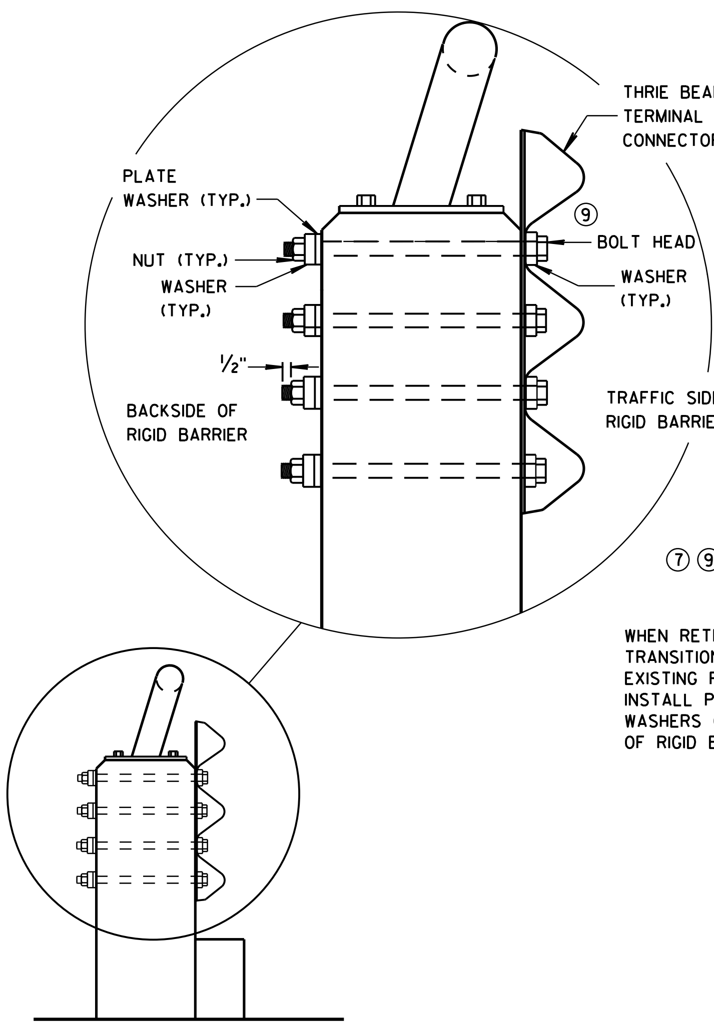
(9) BOLT, NUT AND WASHERS NOT REQUIRED FOR THIS LOCATION WHEN RETROFITTING AN EXISTING PAPAPET AND THE HOLE IS EITHER ABOVE PARAPET OR WITHIN 4 INCHES OF THE EDGE OF PARAPET.



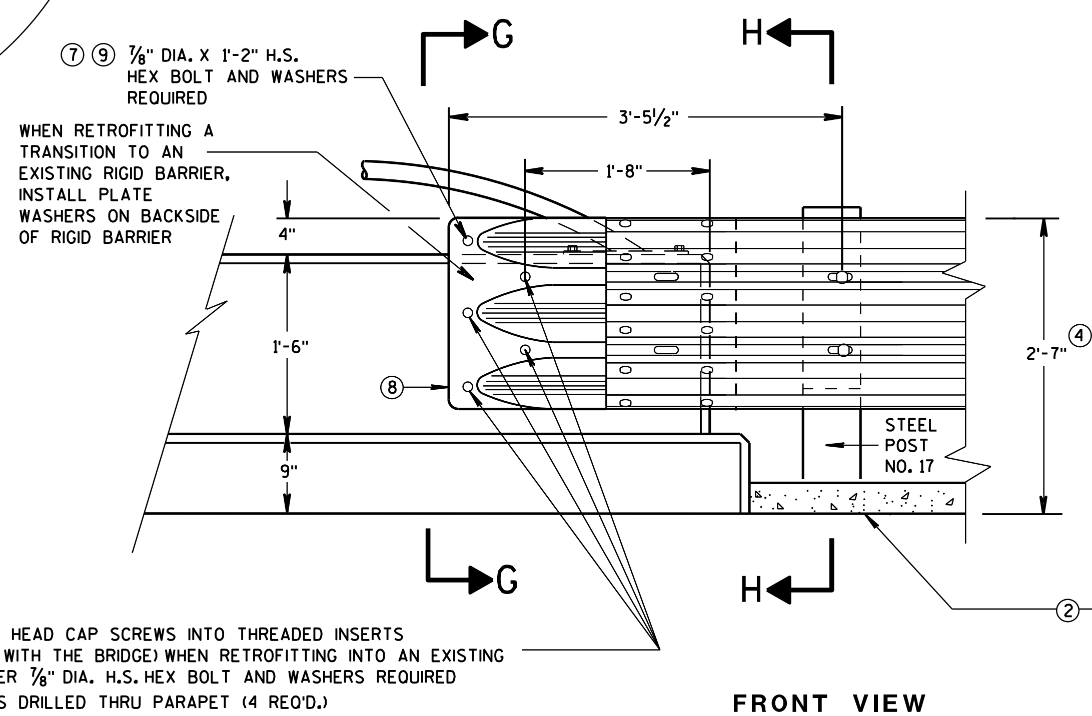
FRONT VIEW

W BEAM CONNECTION TO VERTICAL FACE PARAPET

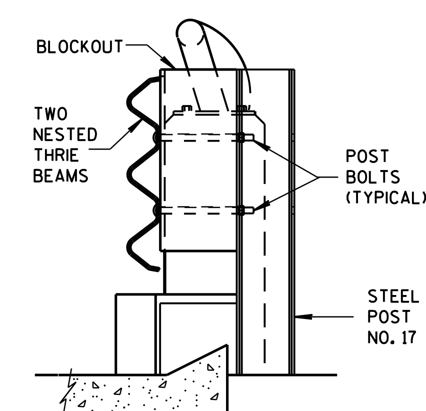
(USE ONLY ON THE TRAFFIC EXIT END OF ONE WAY BRIDGES)



SECTION G-G



FRONT VIEW



SECTION H-H

THRIE BEAM CONNECTION TO VERTICAL FACED PARAPETS

6

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

GENERAL NOTES

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

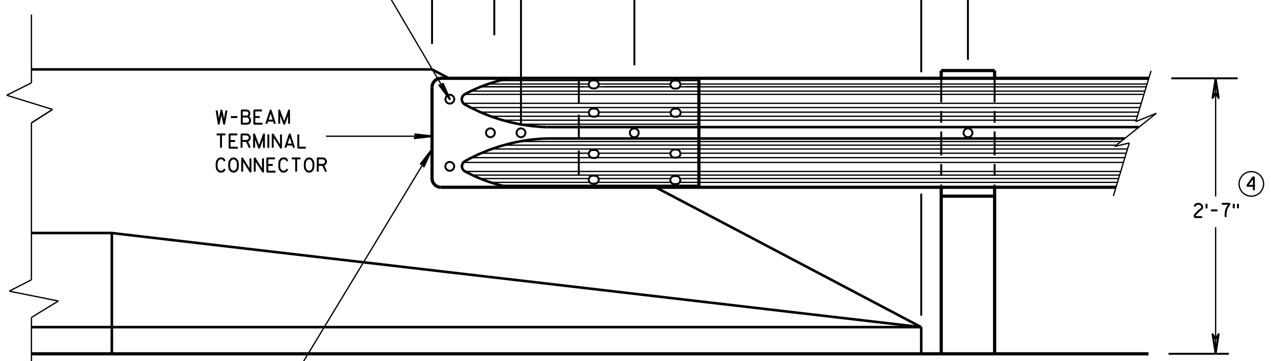
(4) TOLERANCE FOR TOP OF BEAM IS ± 1".

(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.

ONE WAY TRAFFIC

(6)(7) 7/8" DIA. HEX HEAD CAP SCREWS INTO THREADED INSERTS (FURNISHED WITH THE BRIDGE) WHEN RETROFITTING INTO AN EXISTING RIGID BARRIER 7/8" DIA. H.S. HEX BOLT AND WASHERS REQUIRED 1" DIA. HOLES DRILLED THRU PARAPET (4 REQ'D.)

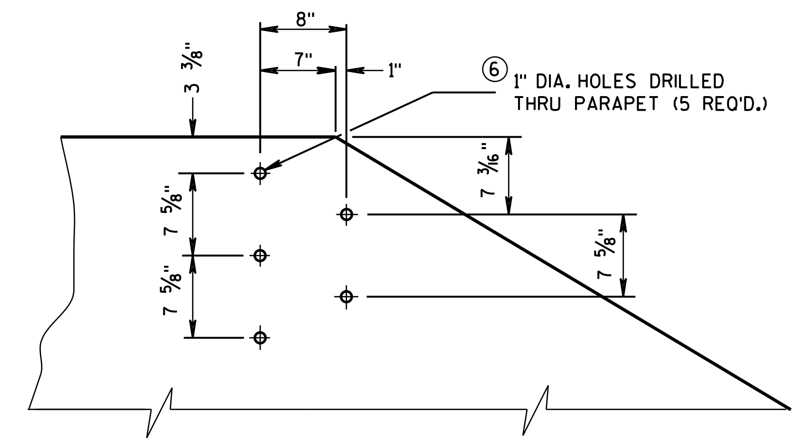


WHEN RETROFITTING A TRANSITION TO AN EXISTING RIGID BARRIER, INSTALL PLATE WASHERS ON BACKSIDE OF RIGID BARRIER.

FRONT VIEW

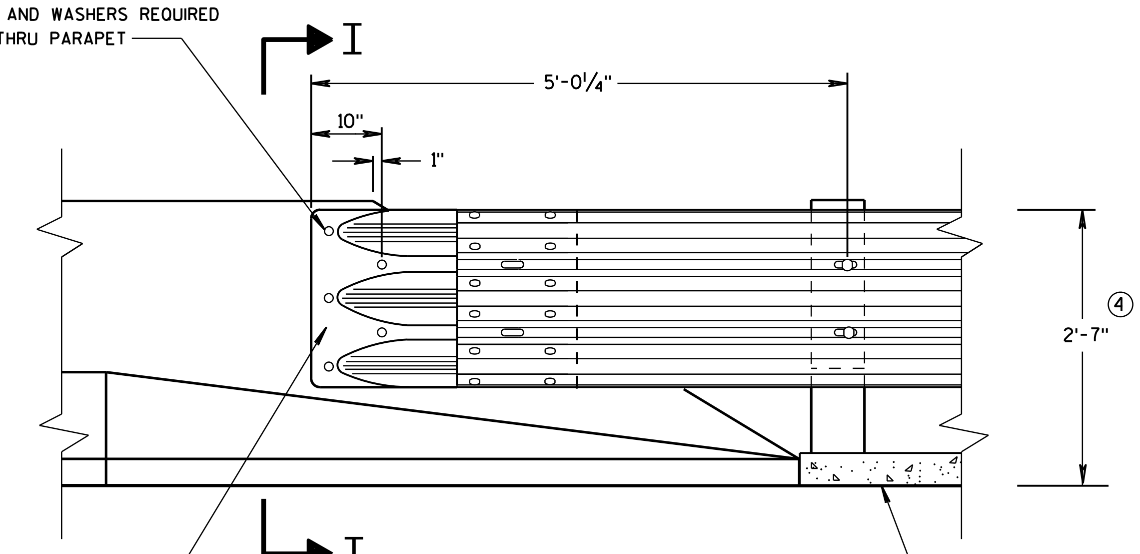
W BEAM CONNECTION TO PARAPETS WITH SLOPED ENDS

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



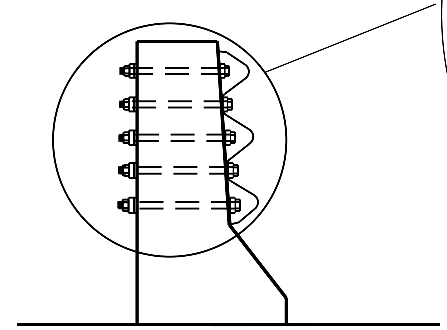
DRILL HOLE LOCATION AND PATTERN FOR THRIE BEAM CONNECTION

(6)(7) 7/8" DIA. HEX HEAD CAP SCREWS INTO THREADED INSERTS (FURNISHED WITH THE BRIDGE) WHEN RETROFITTING INTO AN EXISTING RIGID BARRIER 7/8" DIA. H.S. HEX BOLT AND WASHERS REQUIRED 1" DIA. HOLES DRILLED THRU PARAPET (5 REQ'D.)

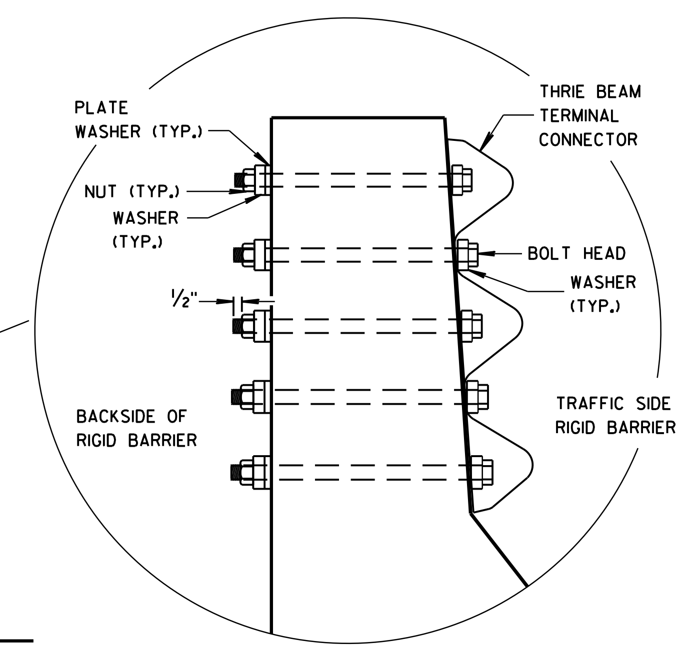


WHEN RETROFITTING A TRANSITION TO AN EXISTING RIGID BARRIER, INSTALL PLATE WASHERS ON BACKSIDE OF RIGID BARRIER.

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

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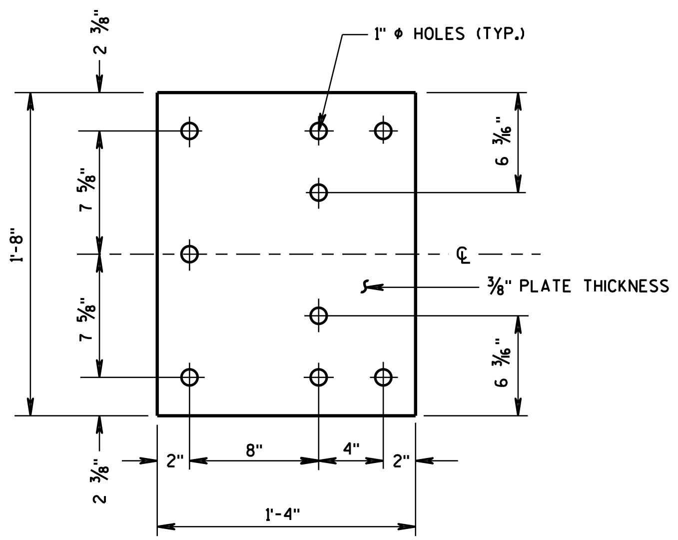
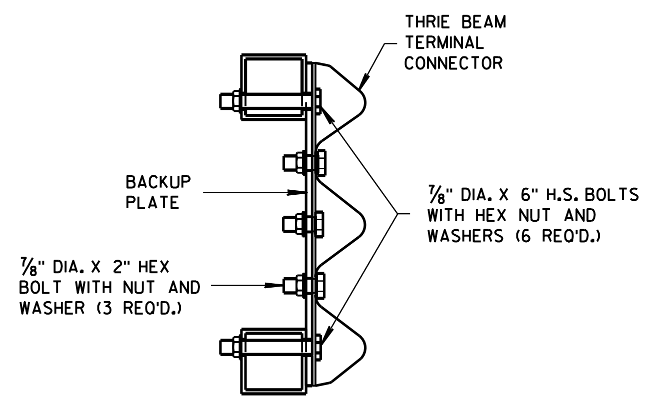
S.D.D. 14 B 45-4f



BACK-UP PLATE DETAIL

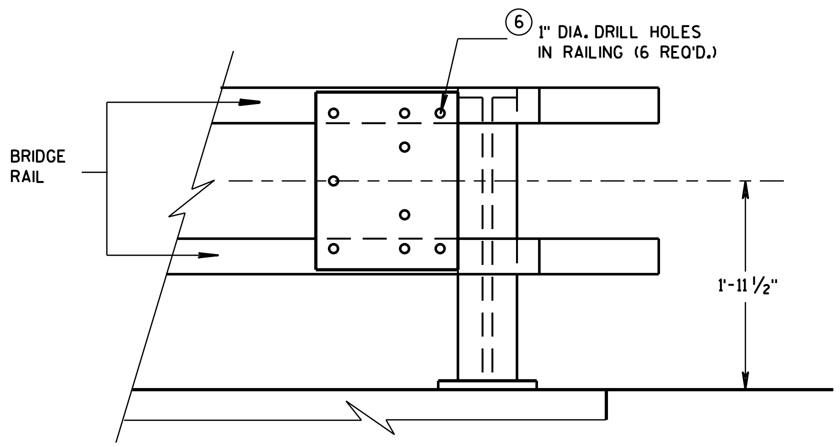


SECTION J-J

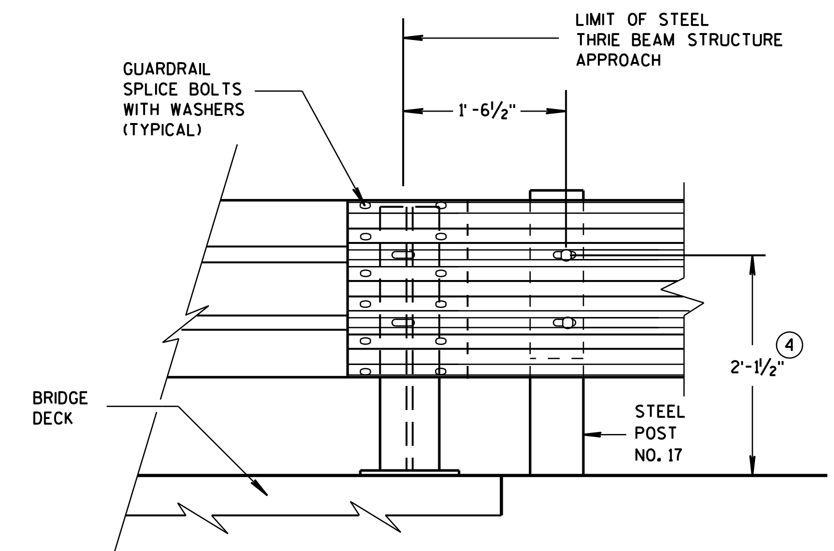
GENERAL NOTES

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

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

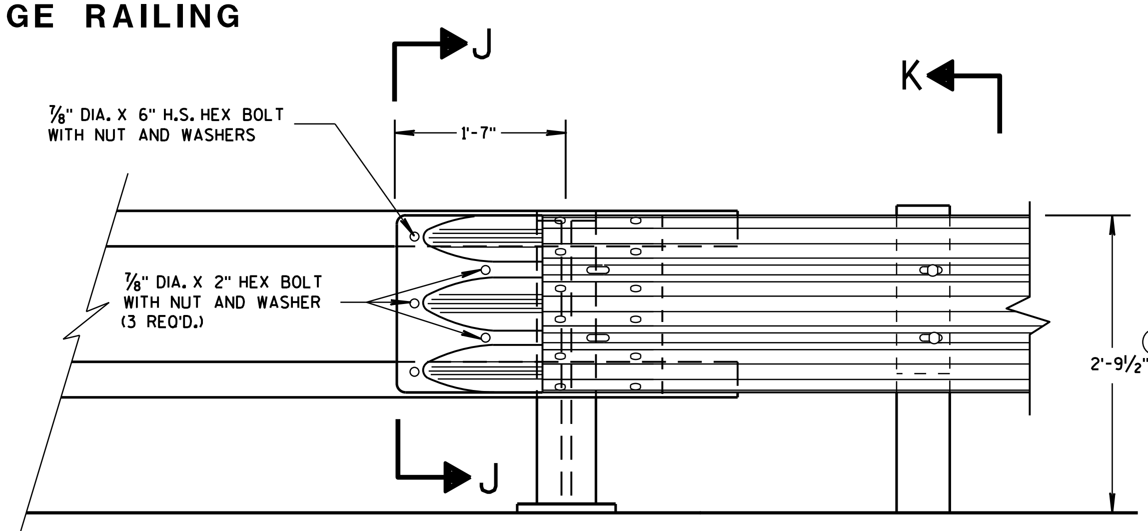


BACK-UP PLATE MOUNTING ONTO BRIDGE RAILING

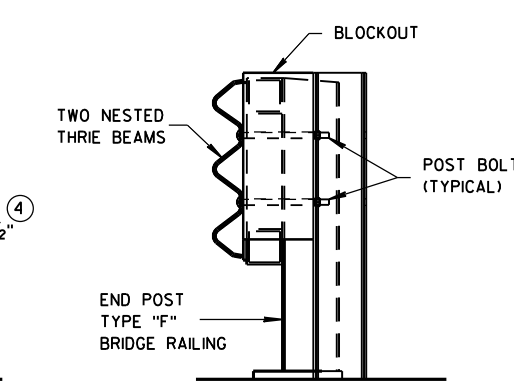


FRONT VIEW

THRIE BEAM CONNECTION TO STEEL RAILING TYPE "W"



FRONT VIEW



SECTION K-K

THRIE BEAM CONNECTION TO TUBULAR RAILING TYPE "F"

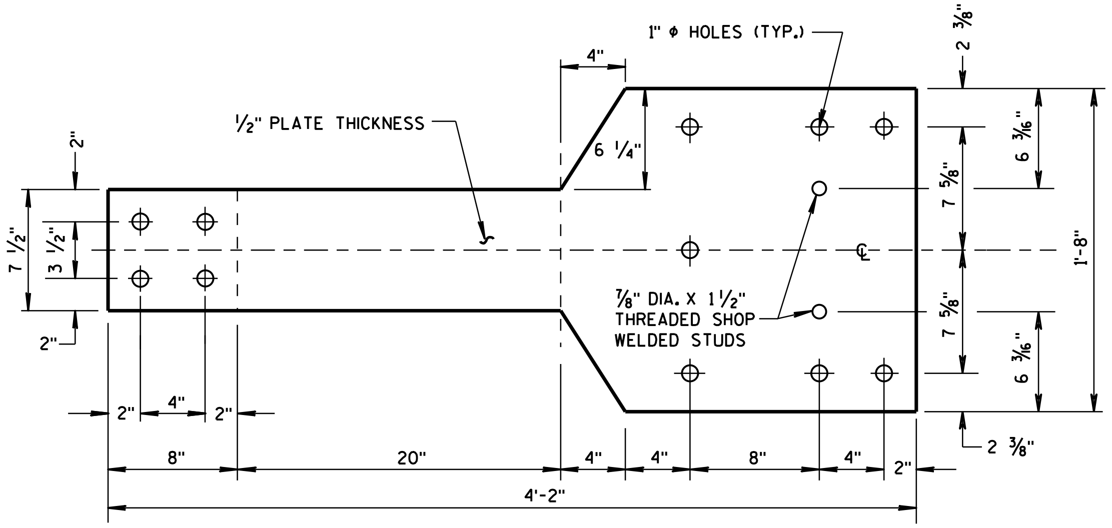
MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION

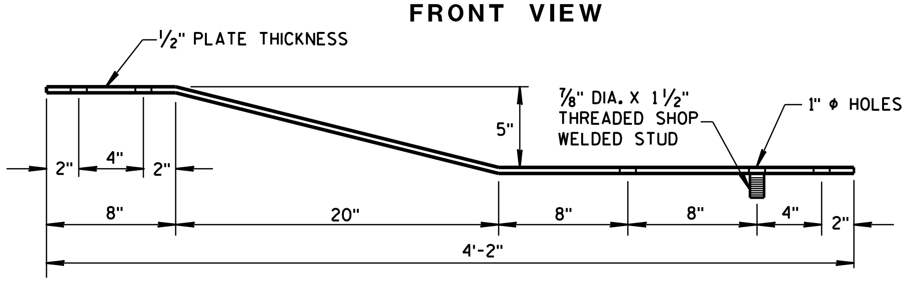
APPROVED June, 2015 DATE /S/ Jerry H. Zogg ROADWAY STANDARDS DEVELOPMENT ENGINEER NT FHWA

GENERAL NOTES

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

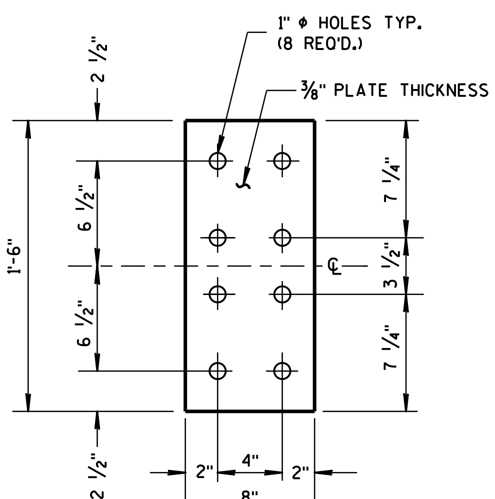


FRONT VIEW



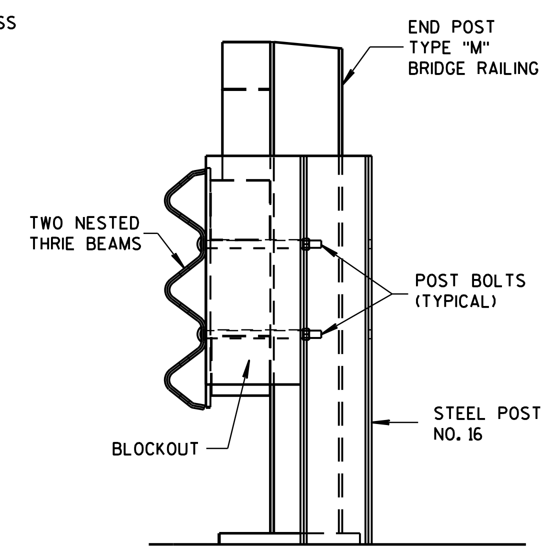
PLAN VIEW

BACK-UP PLATE DETAIL, TYPE "M"

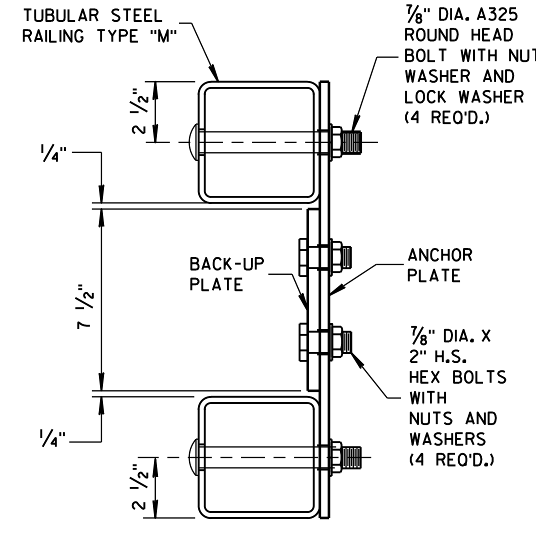


FRONT VIEW

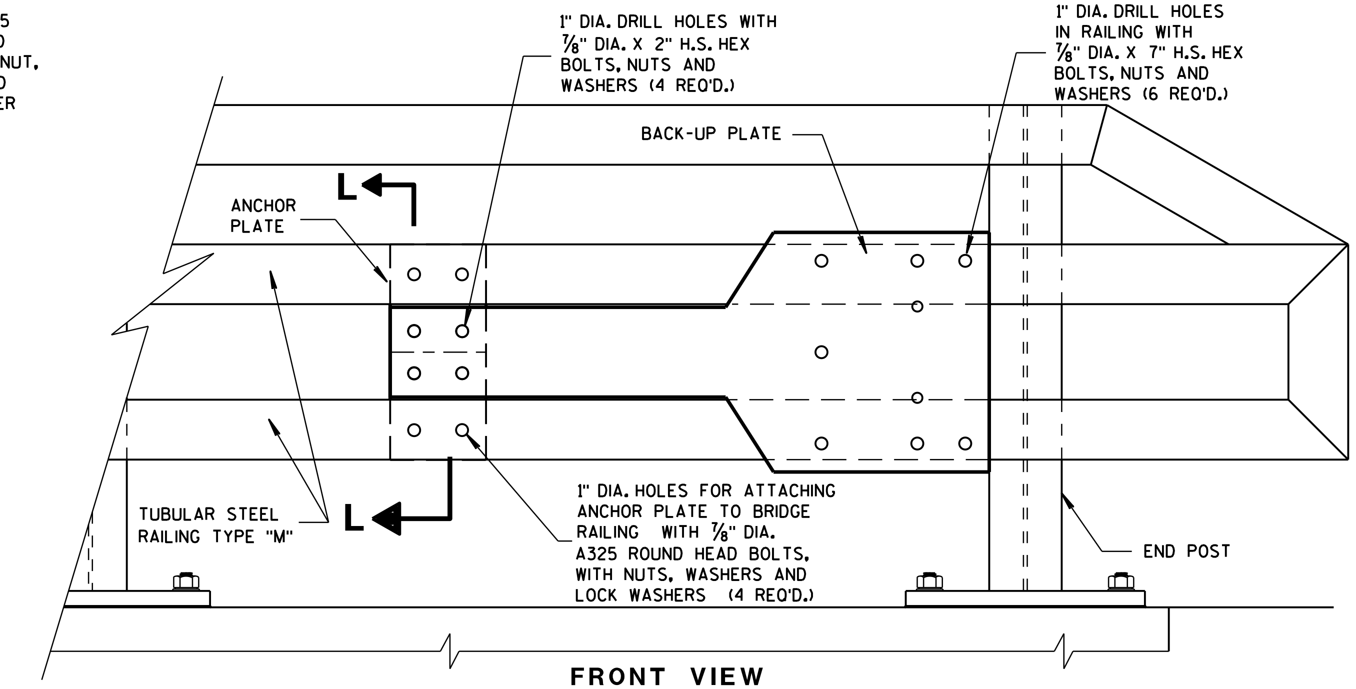
ANCHOR PLATE DETAIL, TYPE "M"



SECTION M-M

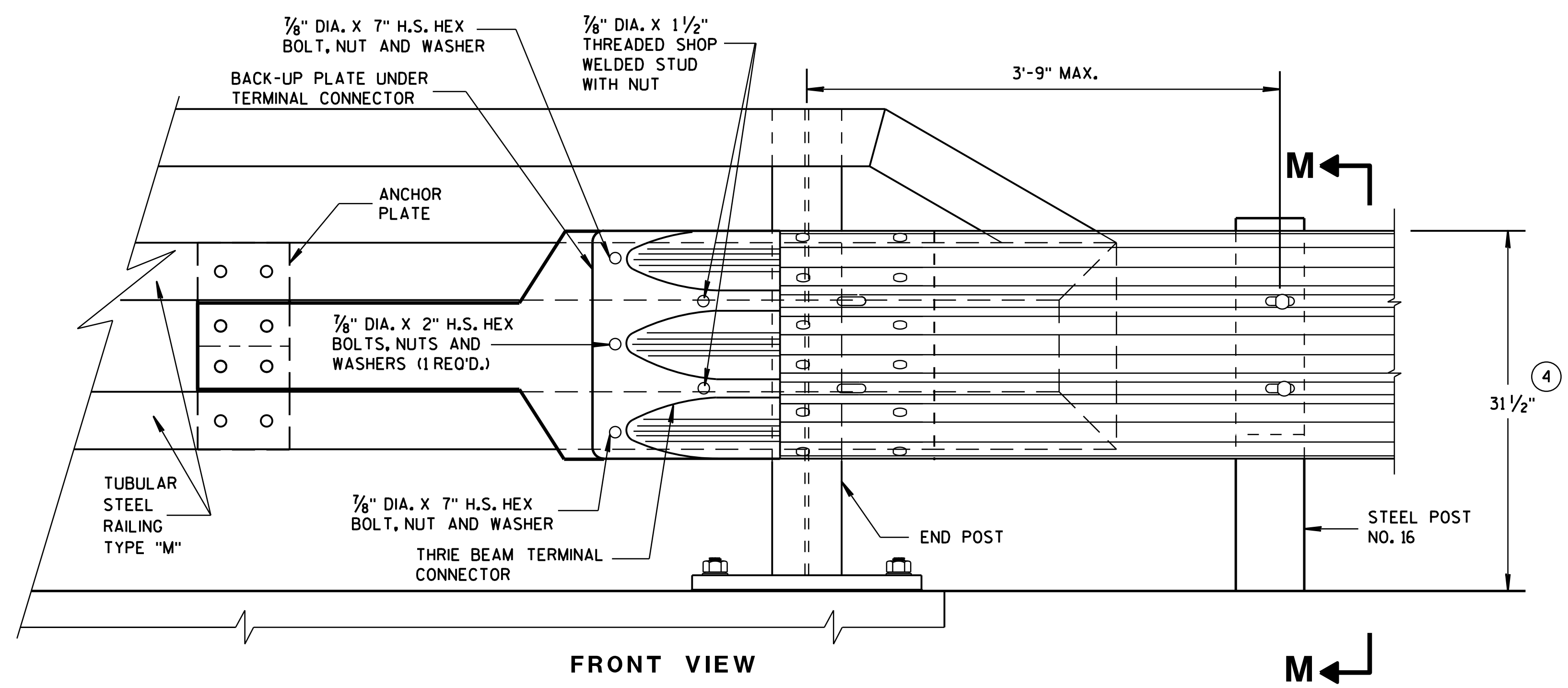


SECTION L-L

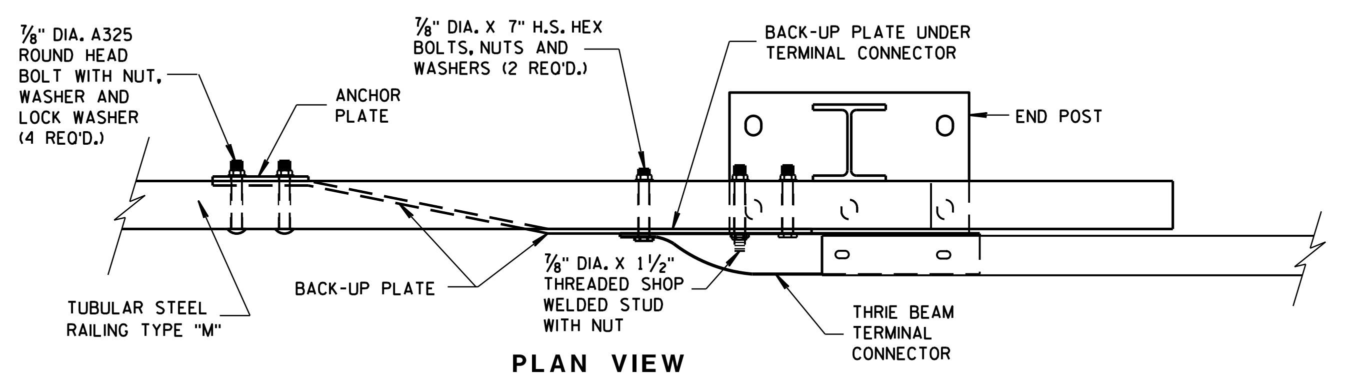


FRONT VIEW

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

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

FHWA

6

6

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

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

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.

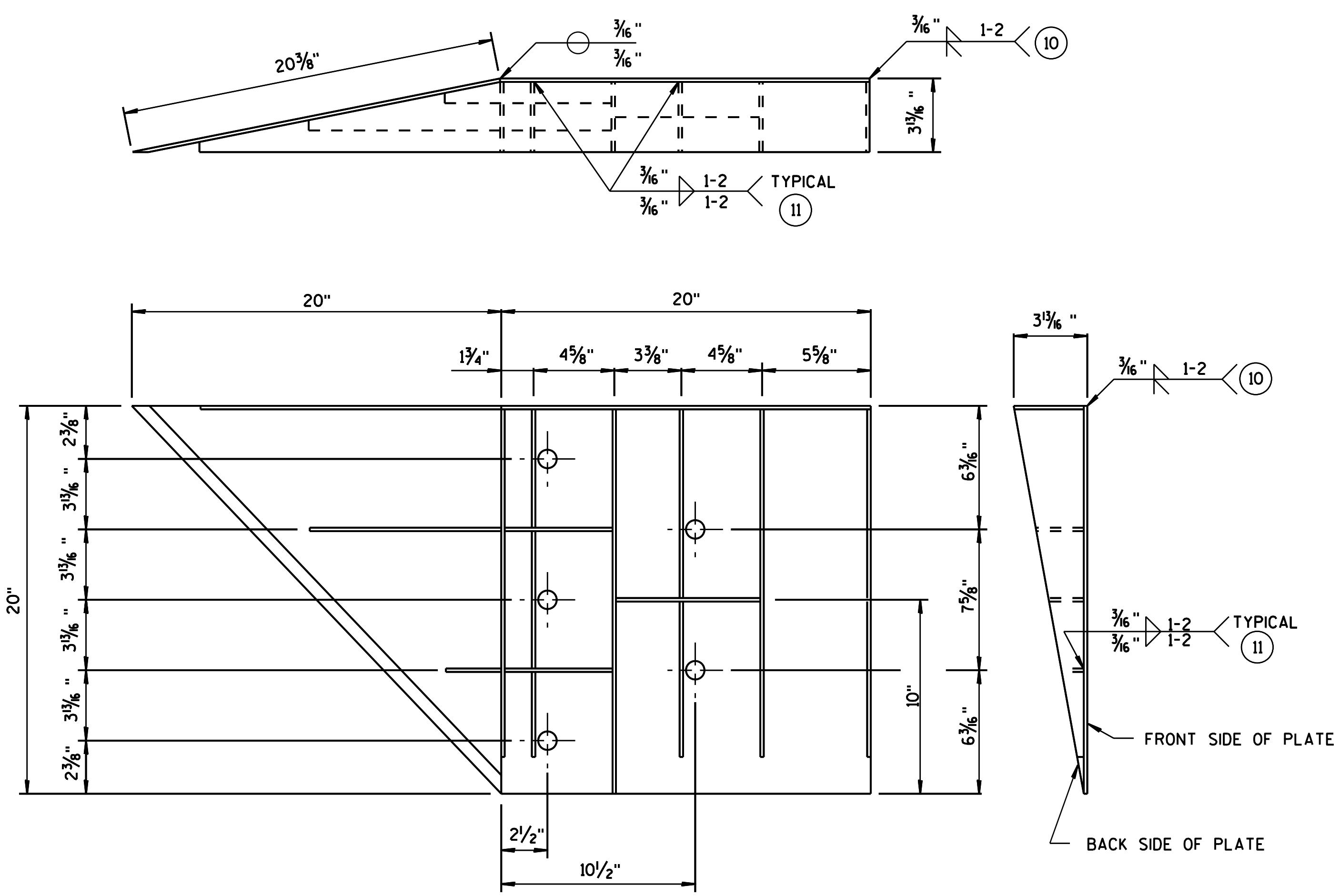
FOR GALVANIZED REQUIREMENTS, SEE SECTION 614 OF THE STANDARD SPECIFICATIONS.

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".



WELDING INSTRUCTION

(VIEWED FROM BACK SIDE OF PLATE)

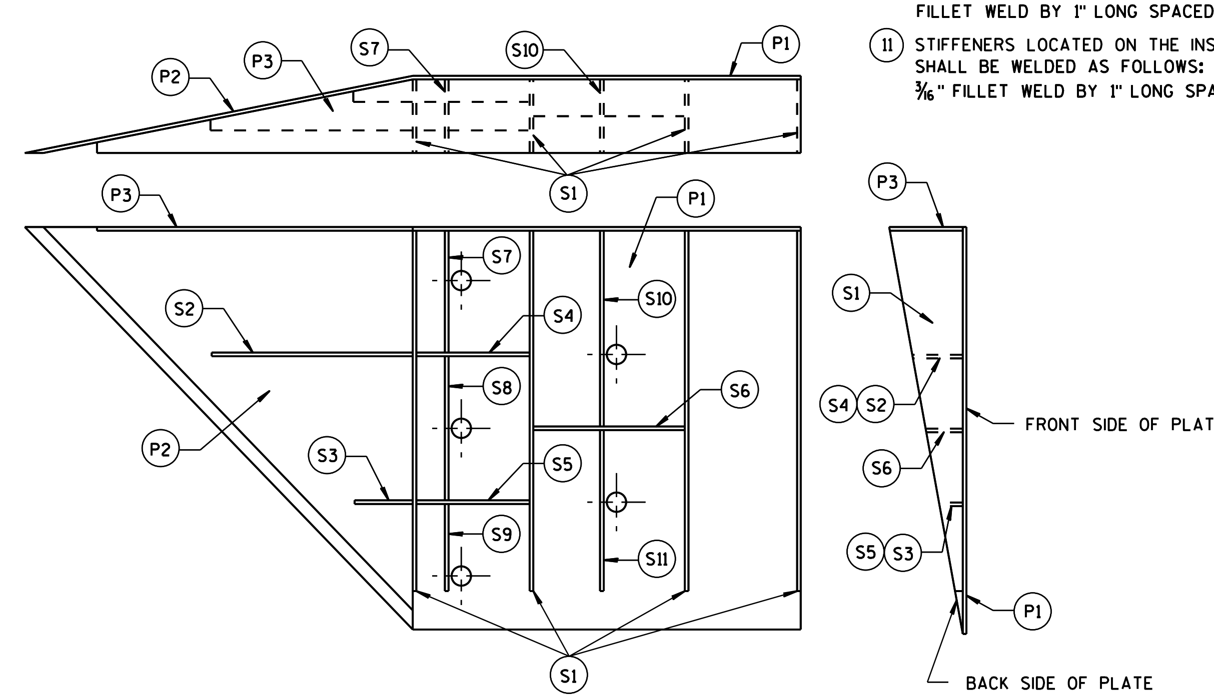


PLATE AND STIFFENER IDENTIFICATION

(VIEWED FROM BACK SIDE OF PLATE)

CONNECTOR PLATE DIMENSION (PER ASSEMBLY)

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

SINGLE SLOPE CONNECTION PLATE

MIDWEST GUARDRAIL SYSTEM THRIE BEAM TRANSITION (MGS)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

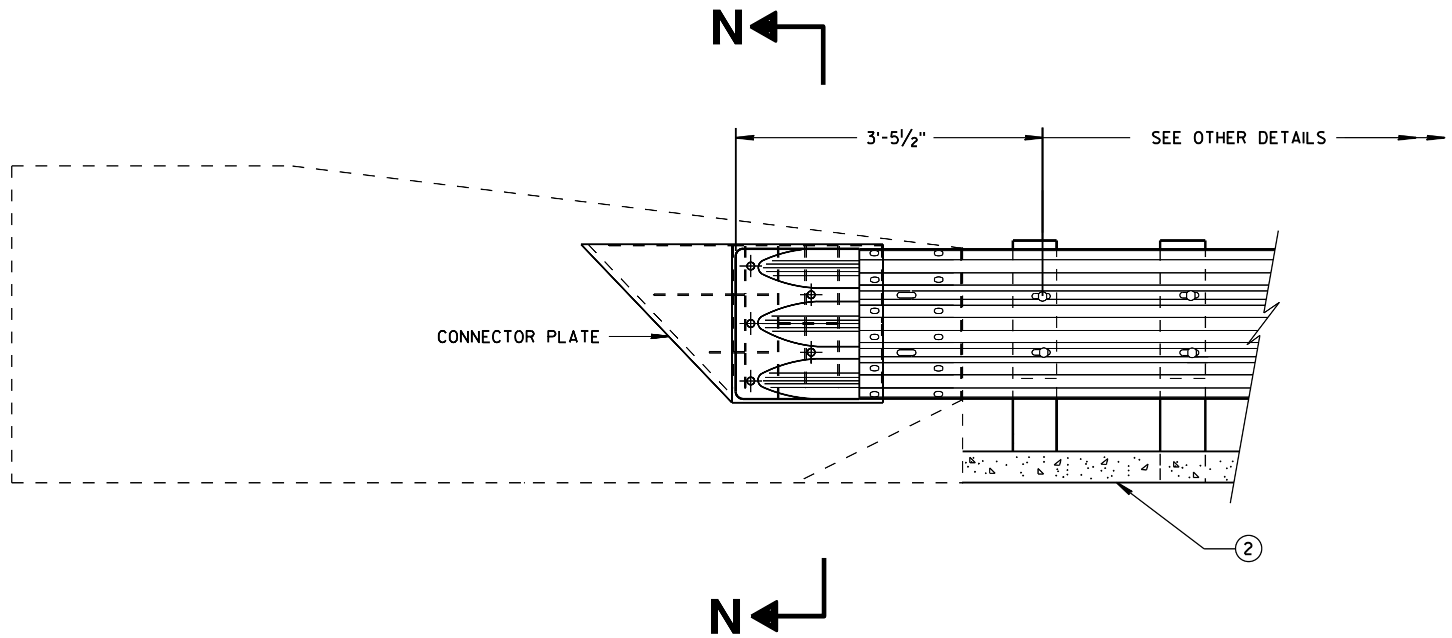
APPROVED
June, 2015 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS ENGINEER
FHWA

GENERAL NOTES

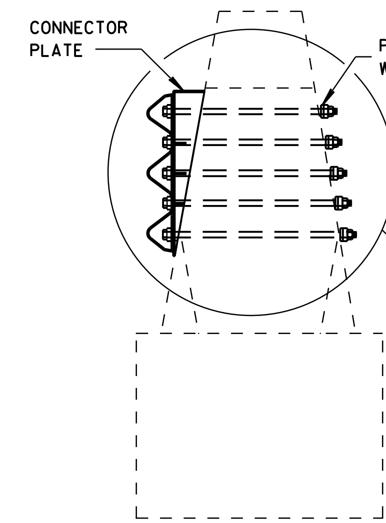
CONNECTOR PLATE, DRILLING BOLT HOLES THROUGH THE PARAPET, BOLTS, NUTS, WASHERS AND REPAIRING DAMAGED CONCRETE ARE INCIDENTAL TO THE CONTRACT.

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

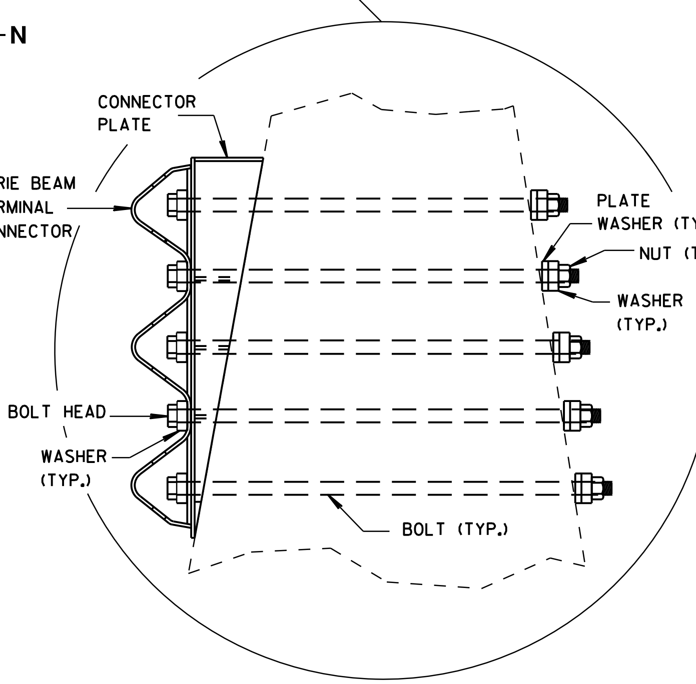
(7) BOLTS MAY BE A325 BOLTS OR A449 BOLTS. BOLT LENGTH AND THREADING LENGTH ARE TO ALLOW FOR A TIGHT CONNECTION BETWEEN RIGID BARRIER AND THRIE BEAM CONNECTION PLATE. CONTRACTOR IS TO FIELD VERIFY BOLT LENGTH AND THREAD LENGTH. ONE ROUND WASHER REQUIRED BETWEEN BOLT HEAD AND THRIE BEAM CONNECTOR PLATE. 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.

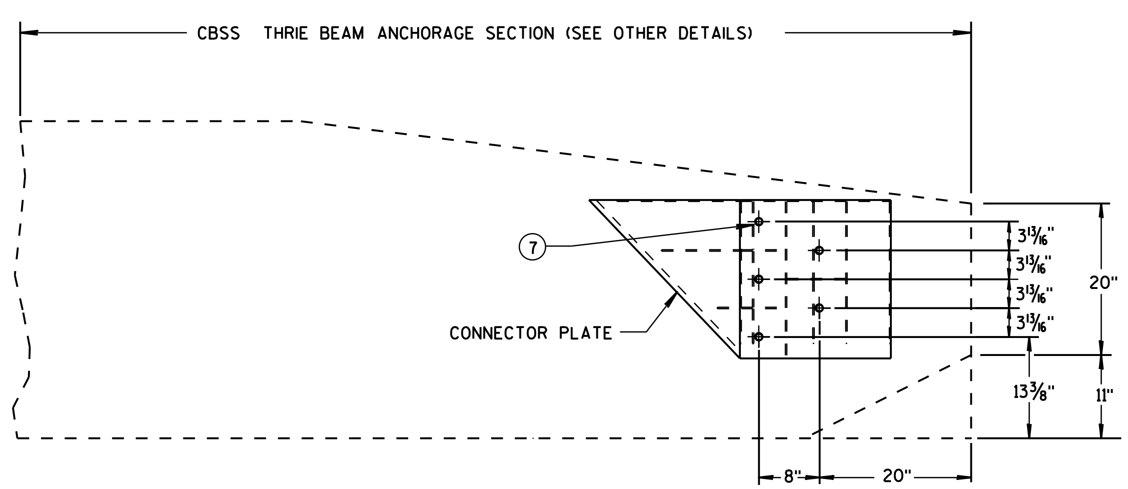


THRIE BEAM CONNECTION TO SINGLE SLOPE BARRIER



SECTION N-N



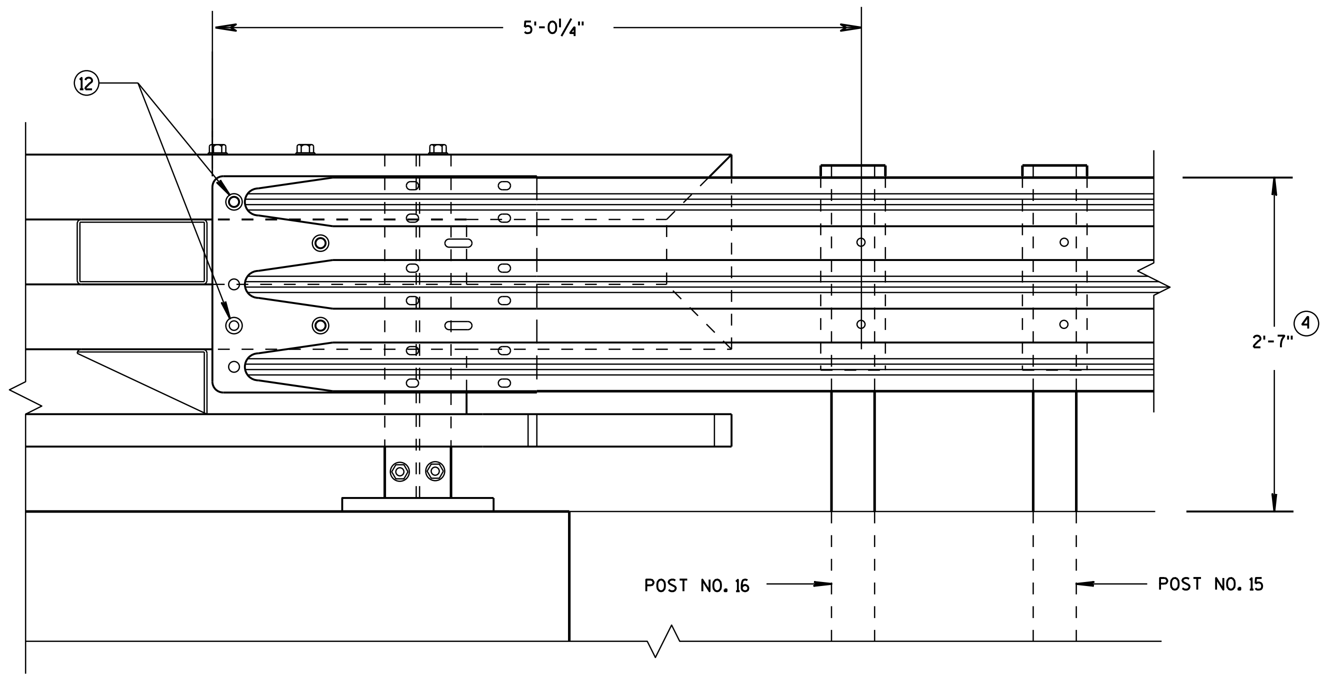


SINGLE SLOPE CONNECTION PLATE PLACEMENT

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

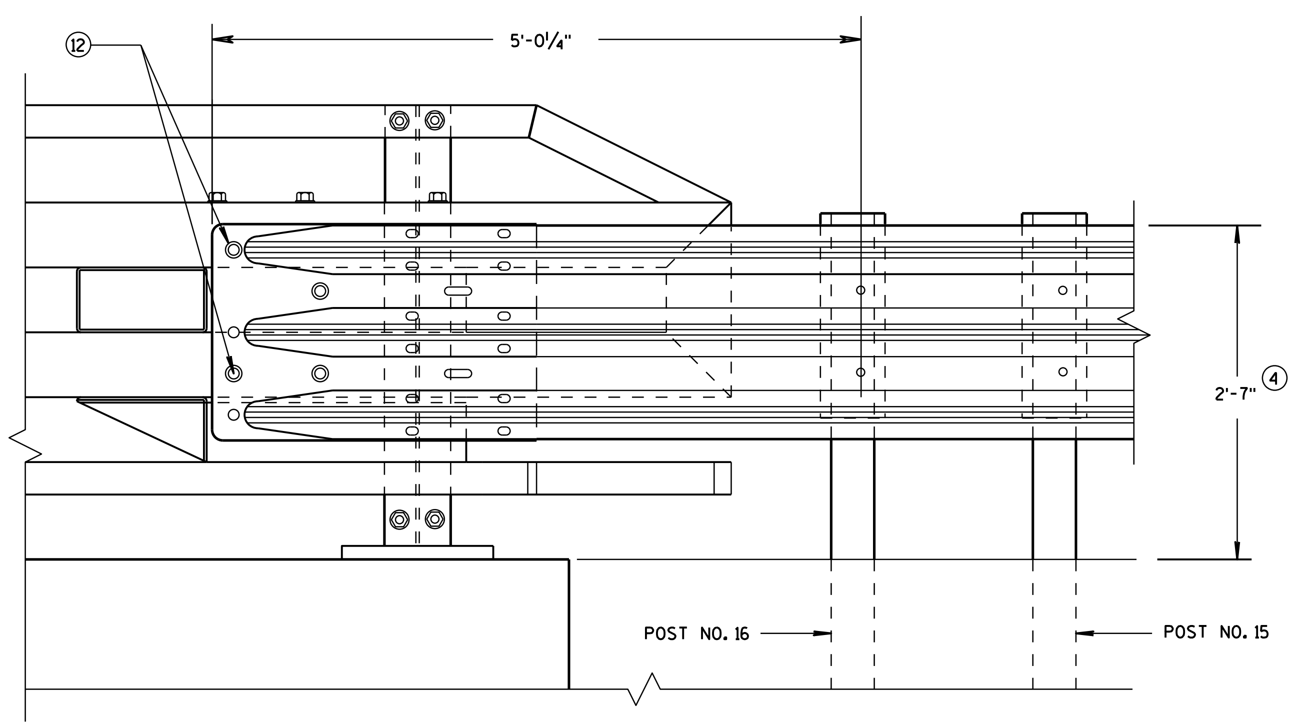
6

6



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.

6

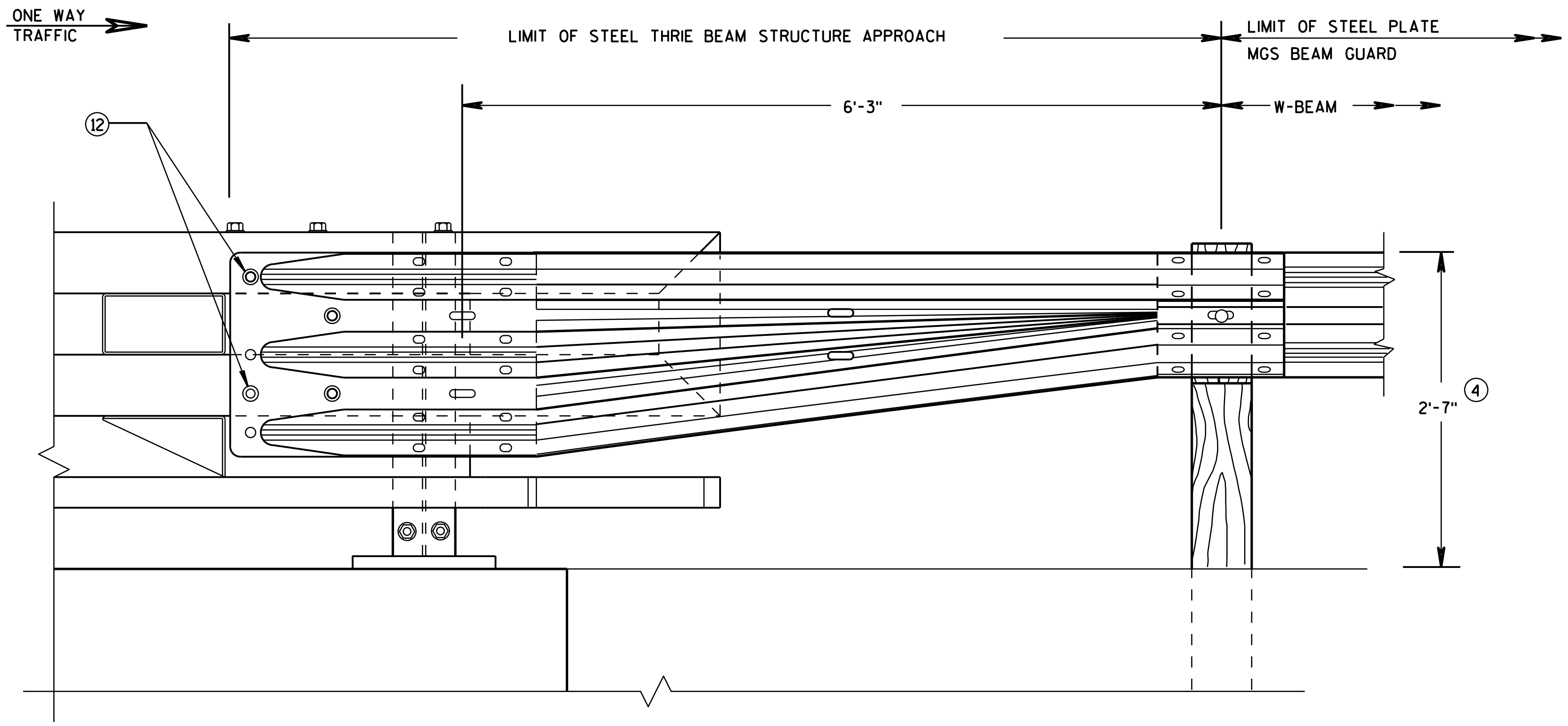
6

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	

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



FRONT VIEW

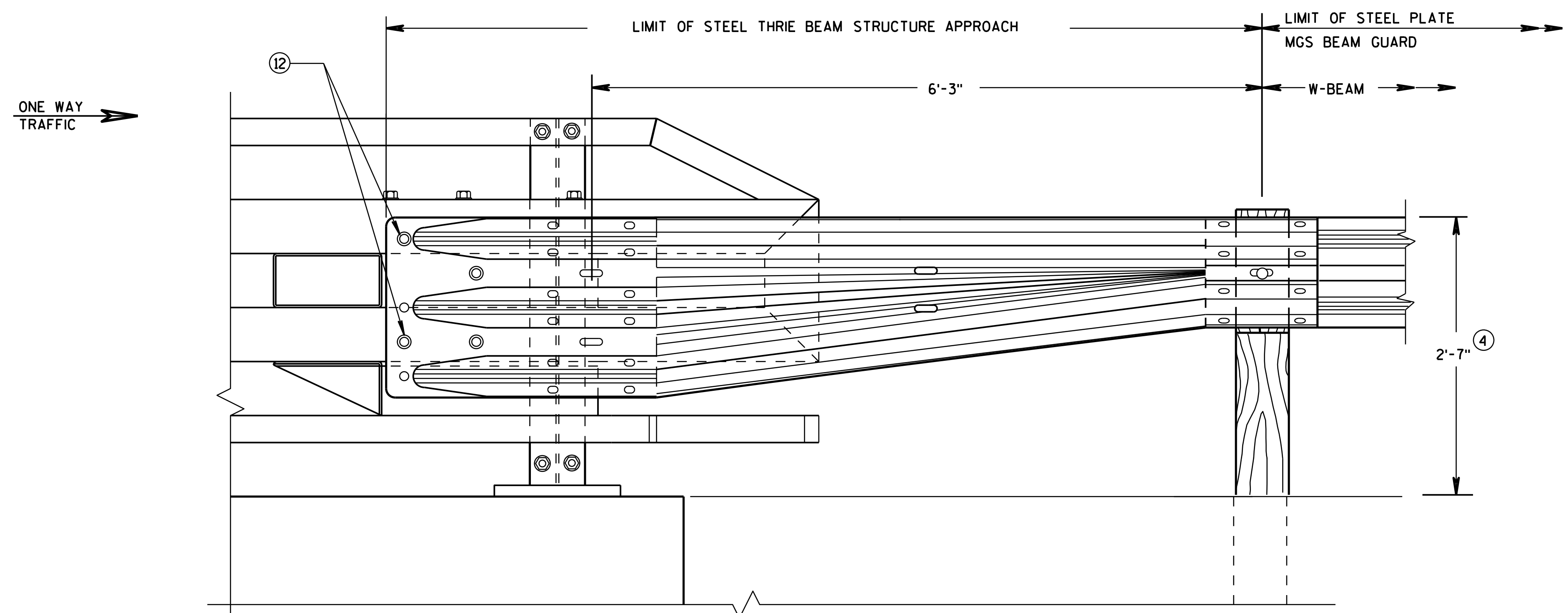
W BEAM TRANSITION AND CONNECTION TO BRIDGE RAILING TYPE "NY3"

(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 1/2-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 /S/ Jerry H. Zogg
DATE ROADWAY STANDARDS D 90 NT
ENGINEER
FHWA

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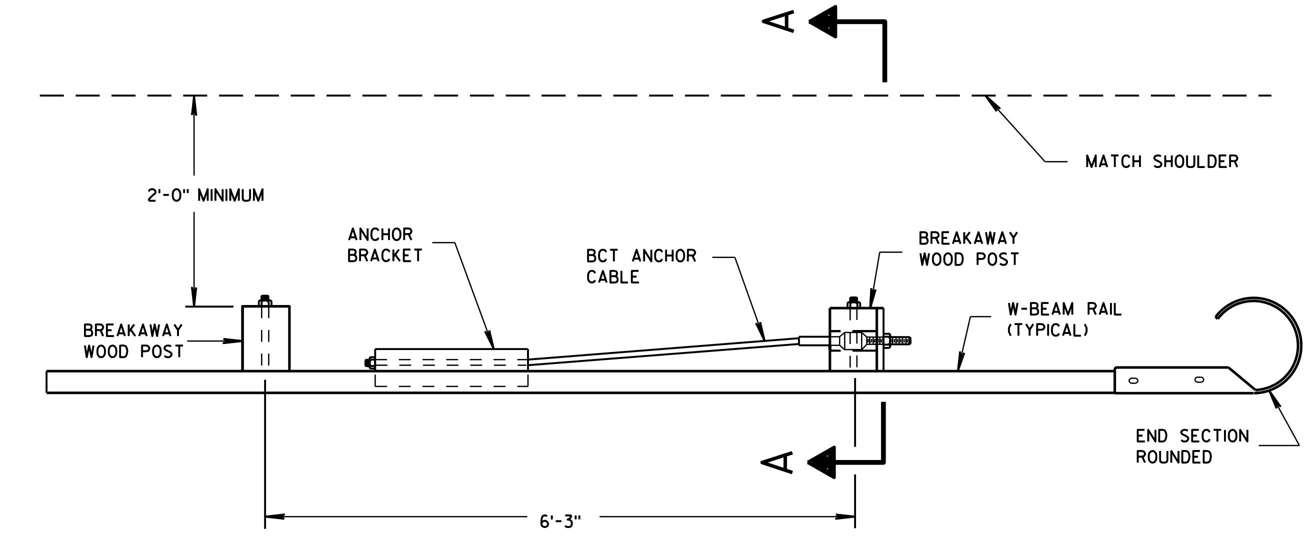
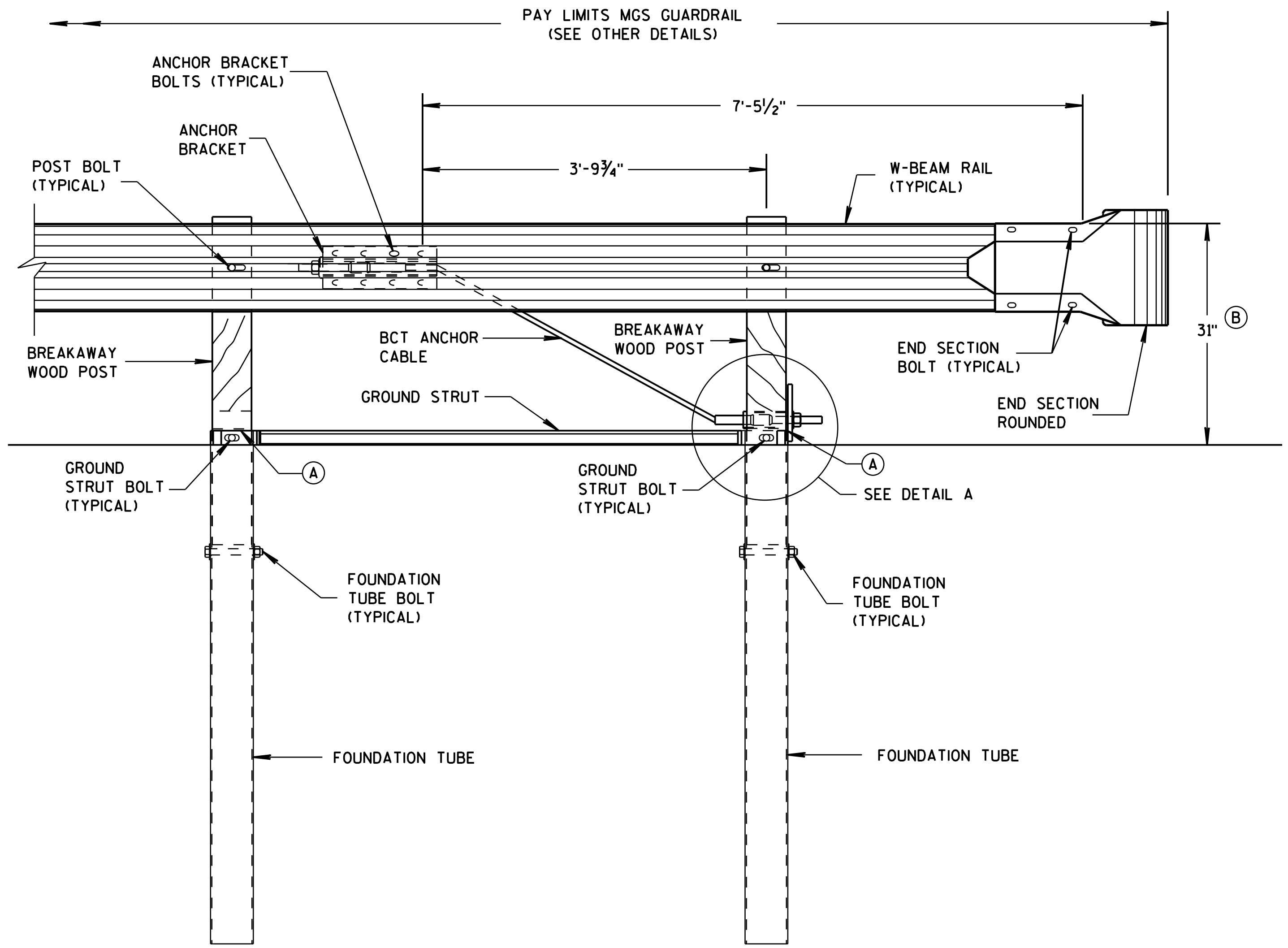
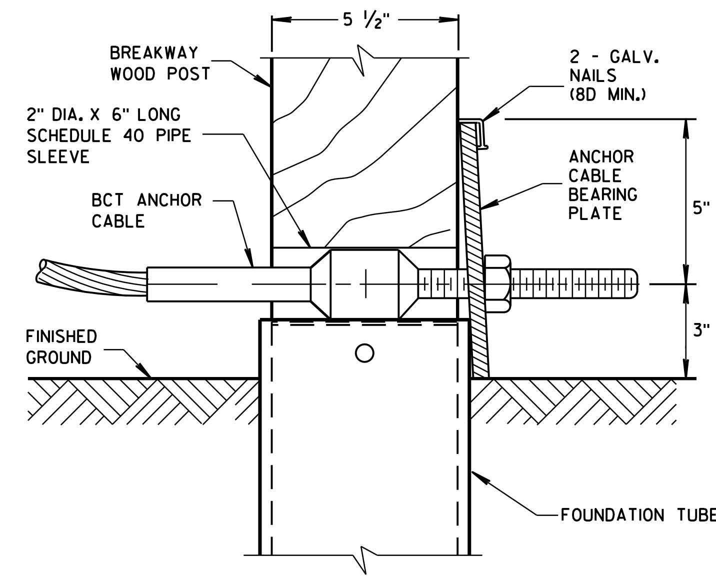


PLAN VIEW



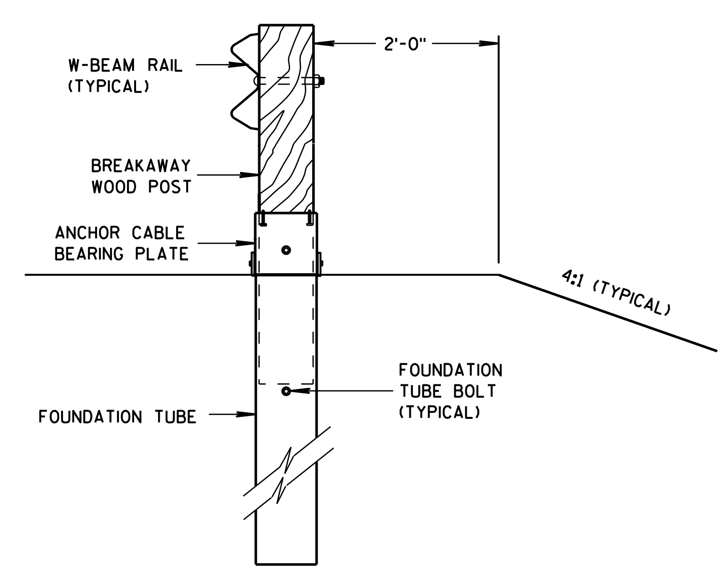
FRONT VIEW

END RAIL DETAIL



DETAIL A

POST NO. 1
GROUNG STRUT NOT SHOWN FOR CLARITY.



SECTION A-A

GENERAL NOTES

SEE SDD 14 B 42 FOR MORE INFORMATION.

END SECTION BOLTS AND NUTS HAVE THE SAME MATERIAL REQUIREMENTS AS SPLICE BOLTS.

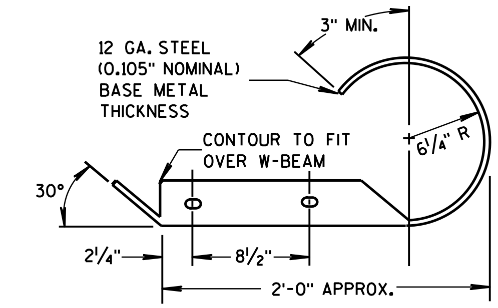
FOUNDATION TUBE BOLTS ARE ⅞" DIAMETER ASTM A307 HEX HEAD BOLT. FOUNDATION TUBE BOLTS REQUIRE ASTM A563 A NUT AND TWO ASTM F844 ⅞" DIAMETER FLAT WASHERS. INSTALL ONE WASHER UNDER BOLT HEAD AND ONE WASHER UNDER NUT.

ANCHOR BRACKET AND GROUND STRUT BOLTS ARE A ⅝" DIAMETER ASTM A307 HEX HEAD BOLT. ANCHOR BRACKET BOLTS REQUIRE ASTM A563 A NUT AND TWO ASTM F844 ⅝" DIAMETER FLAT WASHERS. INSTALL ONE WASHER UNDER BOLT HEAD AND ONE WASHER UNDER NUT.

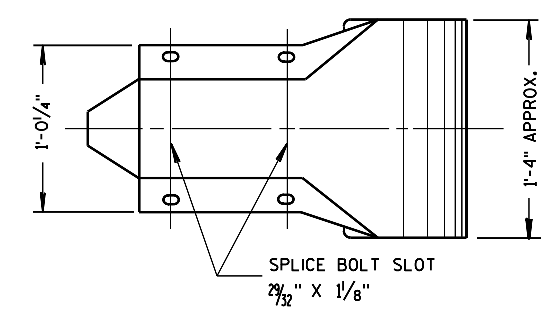
W-BEAM END SECTION ROUNDED HAS THE SAME MATERIAL PROPERTIES AS STANDARD STEEL RAIL.

Ⓐ TOP OF FOUNDATION TUBE SHALL BE NO MORE THAN 3" ABOVE FINISHED GROUND.

Ⓑ FOR NEW CONSTRUCTION TOP OF RAIL IS 31" ± 1".
FOR EXISTING INSTALLATIONS TOP OF RAIL IS BETWEEN 27¾" TO 32" ± 1".



PLAN VIEW



FRONT VIEW

W BEAM END SECTION ROUNDED

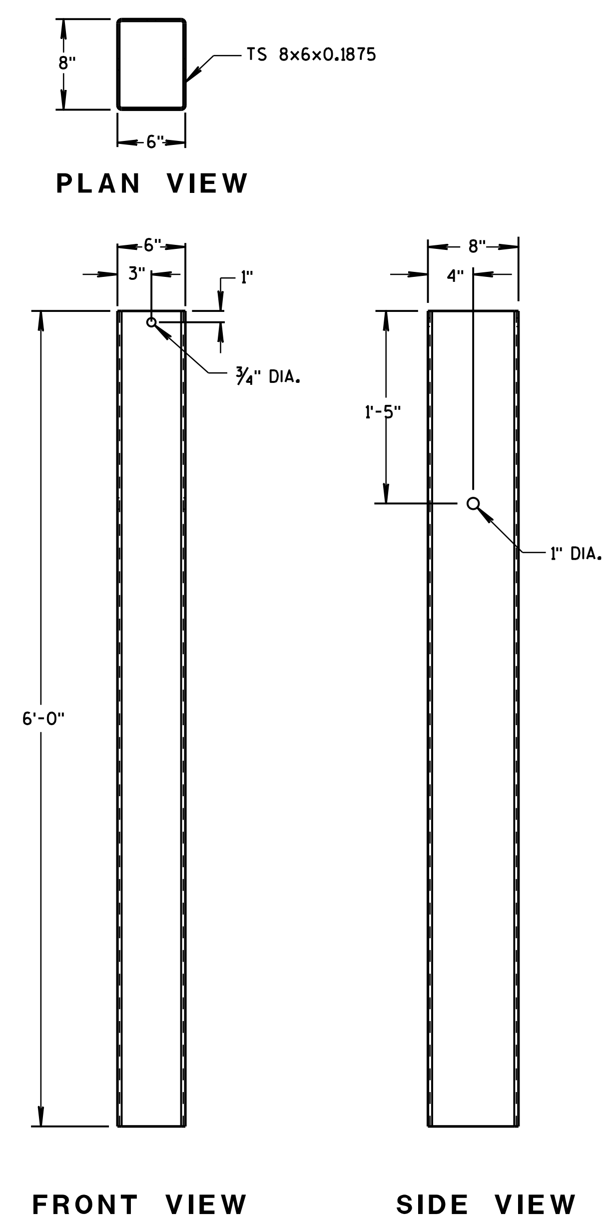
MIDWEST GUARDRAIL SYSTEM (MGS) TYPE 2 TERMINAL
STATE OF WISCONSIN DEPARTMENT OF TRANSPOI

6

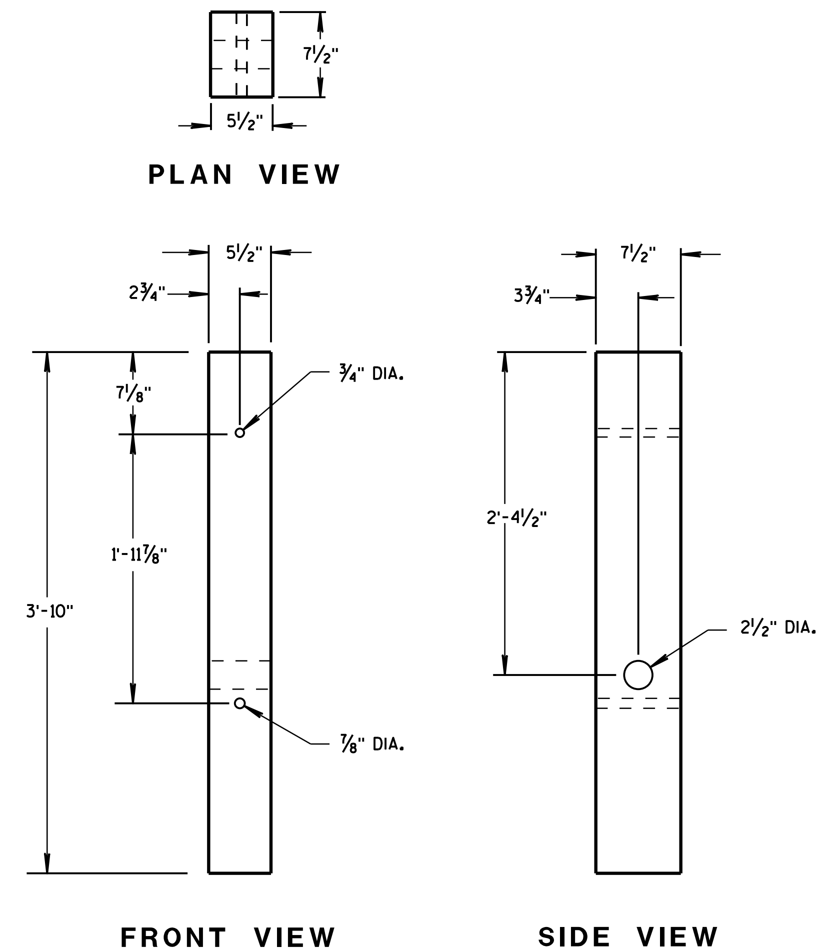
S.D.D. 14 B 47-2a

GENERAL NOTES

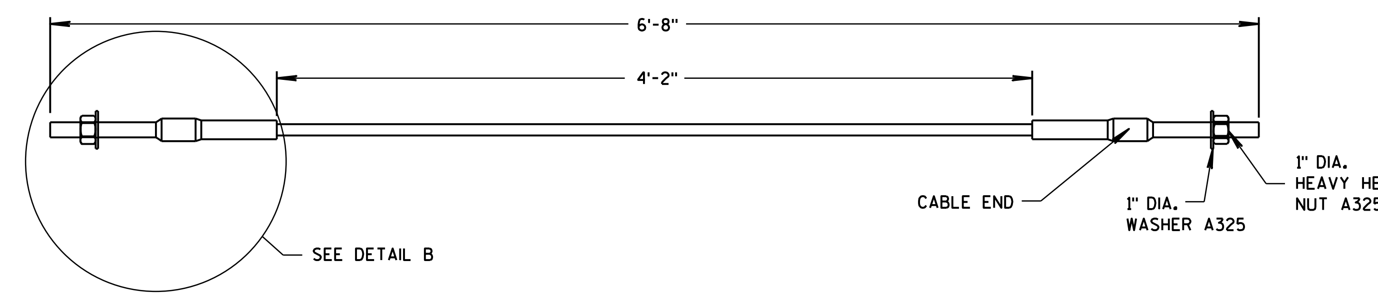
BCT ANCHOR CABLE IS A ¾" DIAMETER 6X19 IWRC IPS GALVANIZED WIRE ROPE. THE SWAGED FITTINGS AND STUD ARE REQUIRED. END FITTING SHALL BE MACHINED FROM HOT-ROLLED CARBON STEEL CONFORMING TO ASTM A576 GRADE 1035 AND GALVANIZED ACCORDING TO ASTM A123. TREADED STUD SHALL CONFORM TO ASTM A325 OR SAE GRADE 5. MINIMUM BREAKING STRENGTH OF WIRE ROPE IS 43,000 LB. WIRE ROPE IS TO BE TAUT.



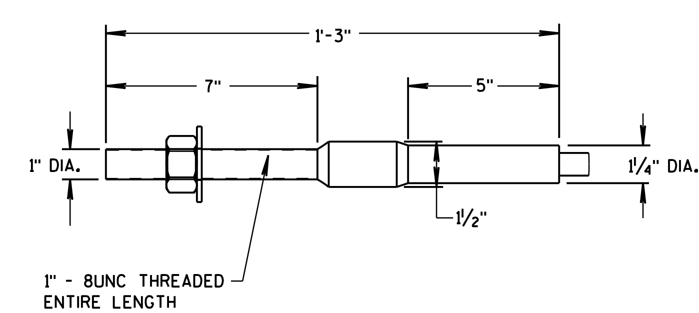
FOUNDATION TUBE



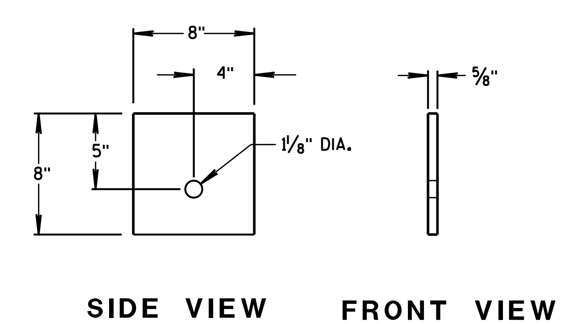
BREAKAWAY WOOD POST



BCT ANCHOR CABLE



DETAIL B



ANCHOR CABLE
BEARING PLATE

MIDWEST GUARDRAIL
SYSTEM (MGS) TYPE 2 TERMINAL

STATE OF WISCONSIN
DEPARTMENT OF TRANSPO

S.D.D. 14 B 47-2b

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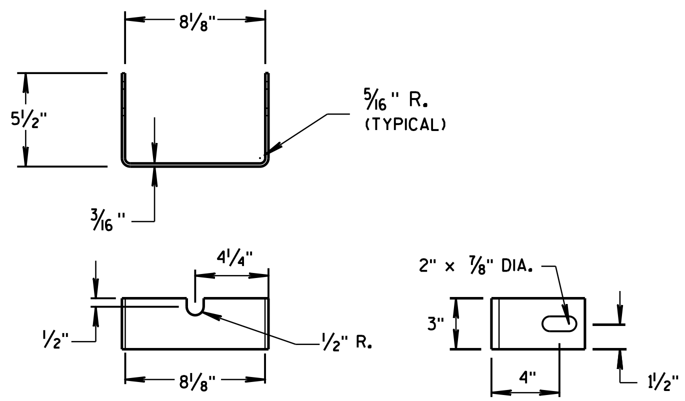
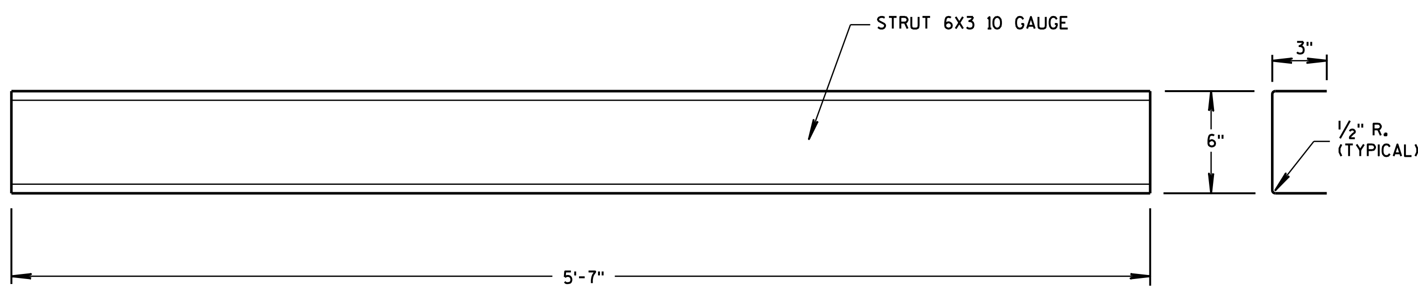
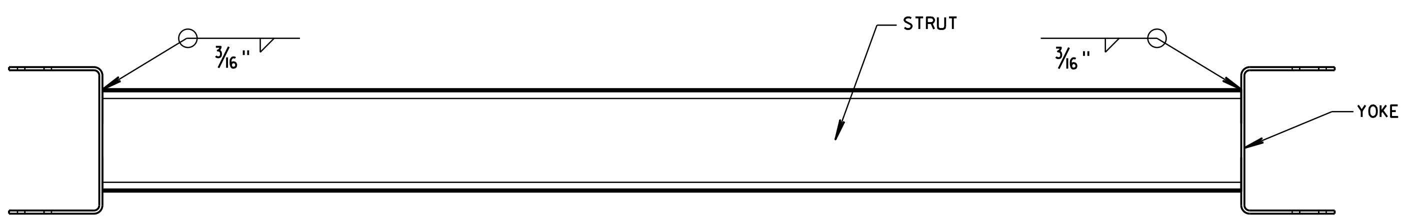


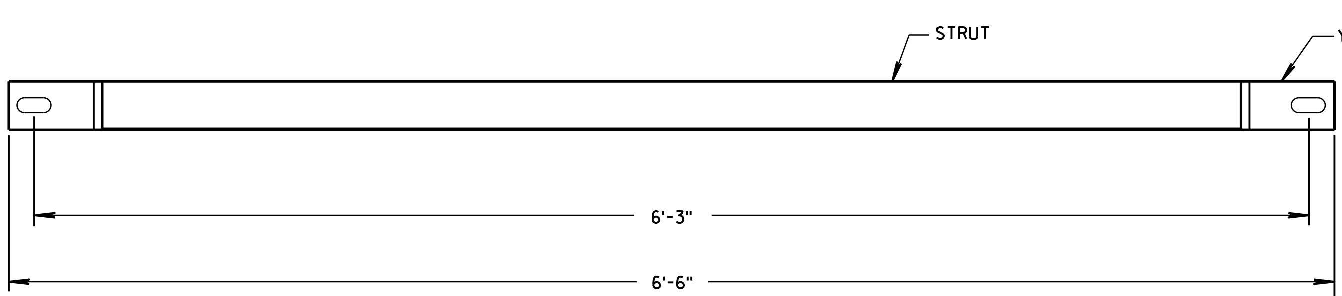
YOKE DETAIL



STRUT DETAIL

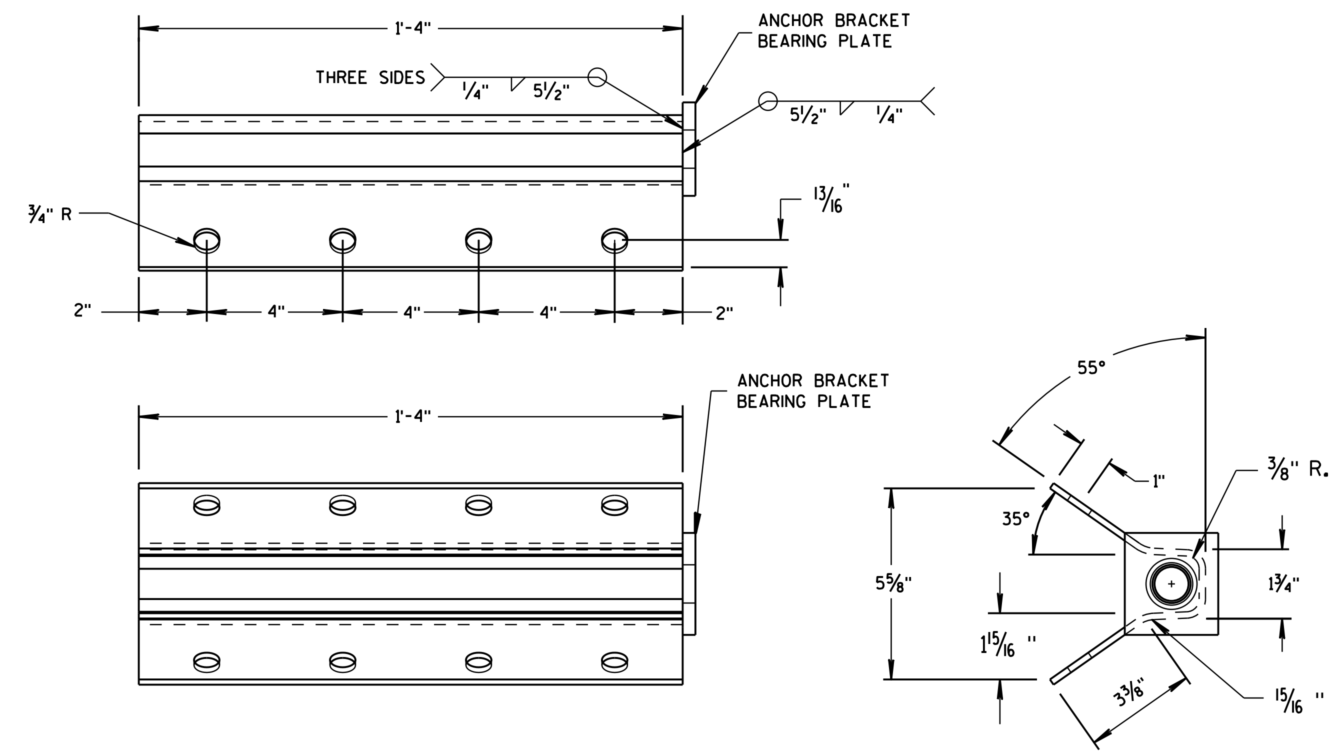


PLAN VIEW

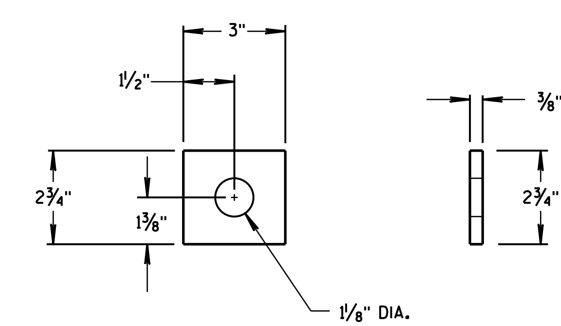


FRONT VIEW

GROUND STRUT DETAIL



ANCHOR BRACKET



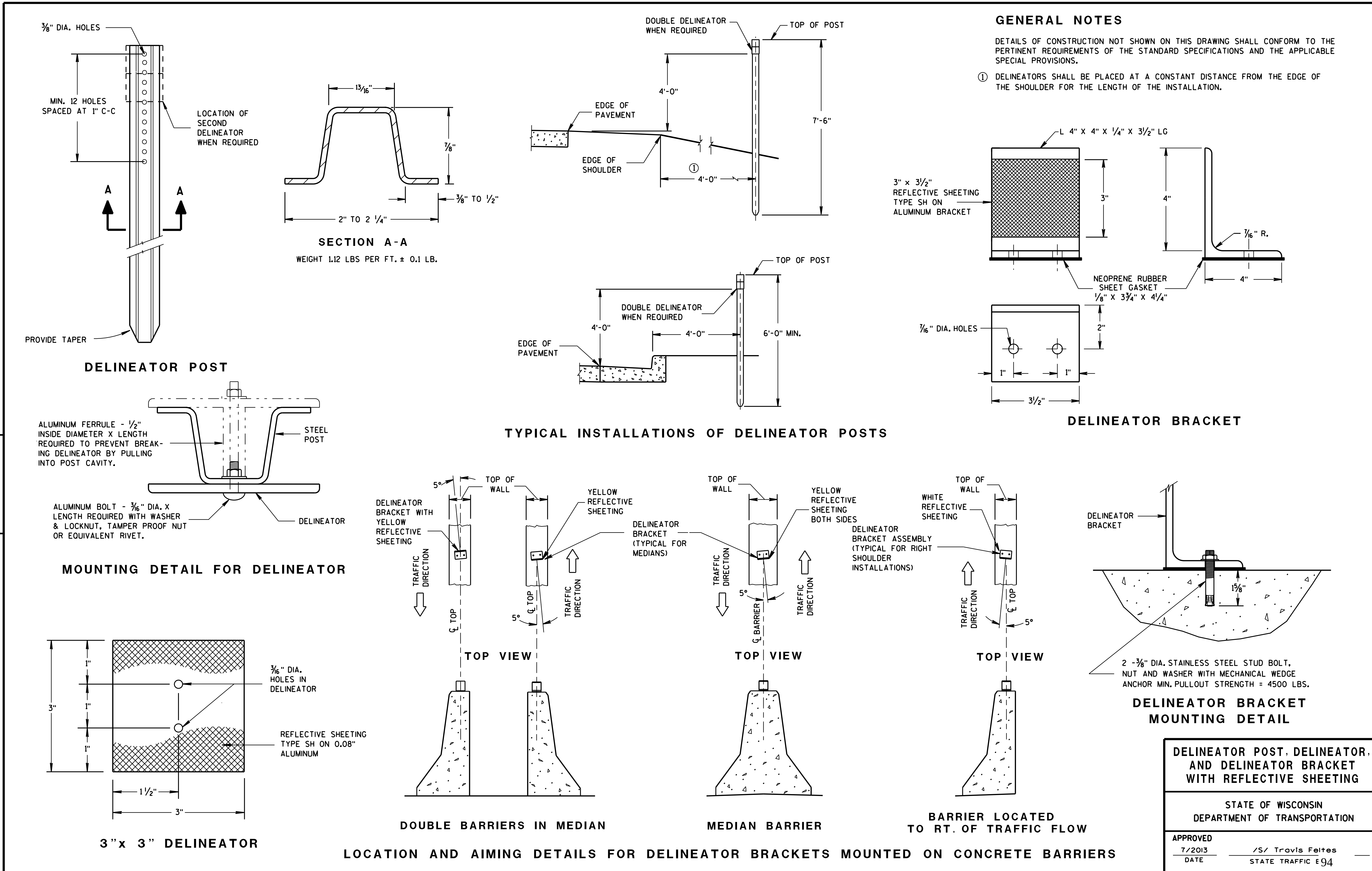
ANCHOR BRACKET BEARING PLATE

MIDWEST GUARDRAIL SYSTEM (MGS) TYPE 2 TERMINAL
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION
APPROVED June 2014 DATE — /S/ Jerry H. Zogg ROADWAY STANDARDS ENGINEER — FHWA

S.D.D. 14 B 47-2c

6

S.D.D. 14 B 47-2c



GENERAL NOTES

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

① DELINEATORS SHALL BE PLACED AT A CONSTANT DISTANCE FROM THE EDGE OF THE SHOULDER FOR THE LENGTH OF THE INSTALLATION.

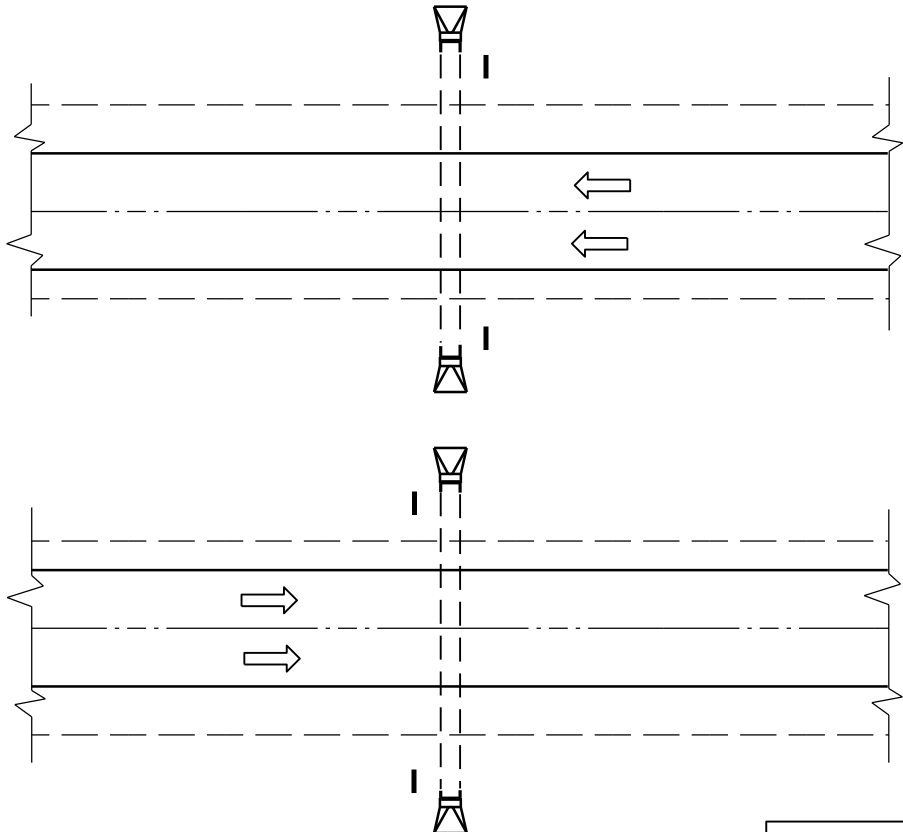
DELINEATOR POST, DELINEATOR, AND DELINEATOR BRACKET WITH REFLECTIVE SHEETING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
7/2013 /S/ Travis Feltes
DATE STATE TRAFFIC E
FHWA

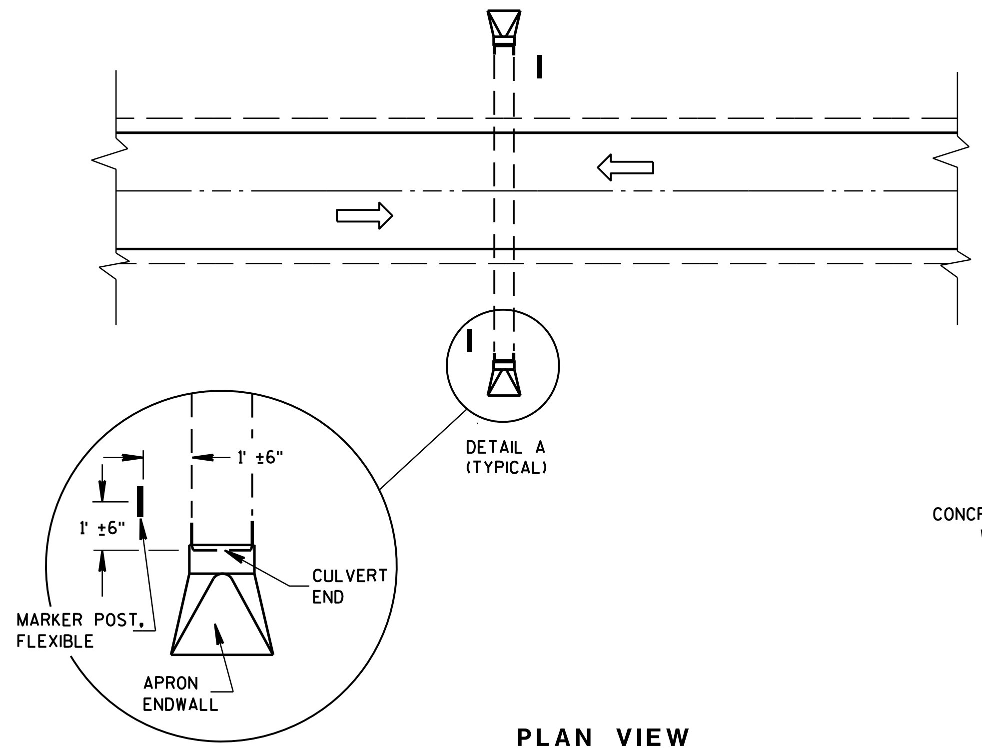
GENERAL NOTES

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

DIVIDED HIGHWAY

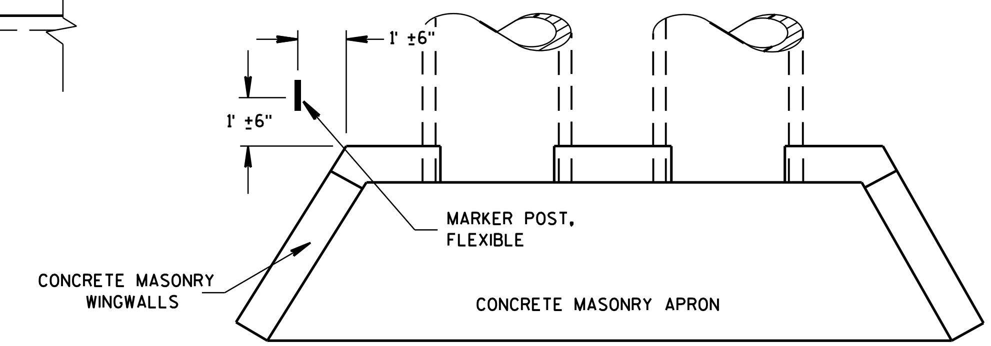


DETAIL A (TYPICAL)

PLAN VIEW

UNDIVIDED HIGHWAY

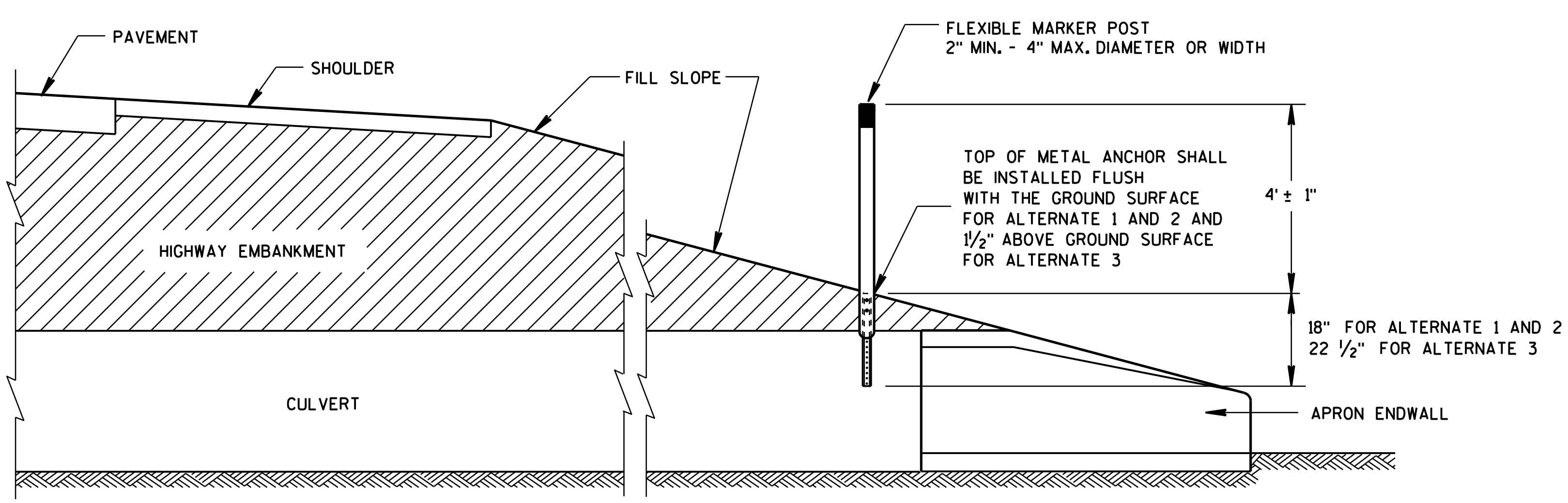
I	MARKER POST, FLEXIBLE
⇨	DIRECTION OF TRAFFIC FLOW



PLAN VIEW

CONCRETE MASONRY ENDWALLS FOR CULVERT PIPE AND PIPE ARCH

FLEXIBLE MARKER POST LOCATION



CROSS SECTION

FLEXIBLE MARKER POST

6

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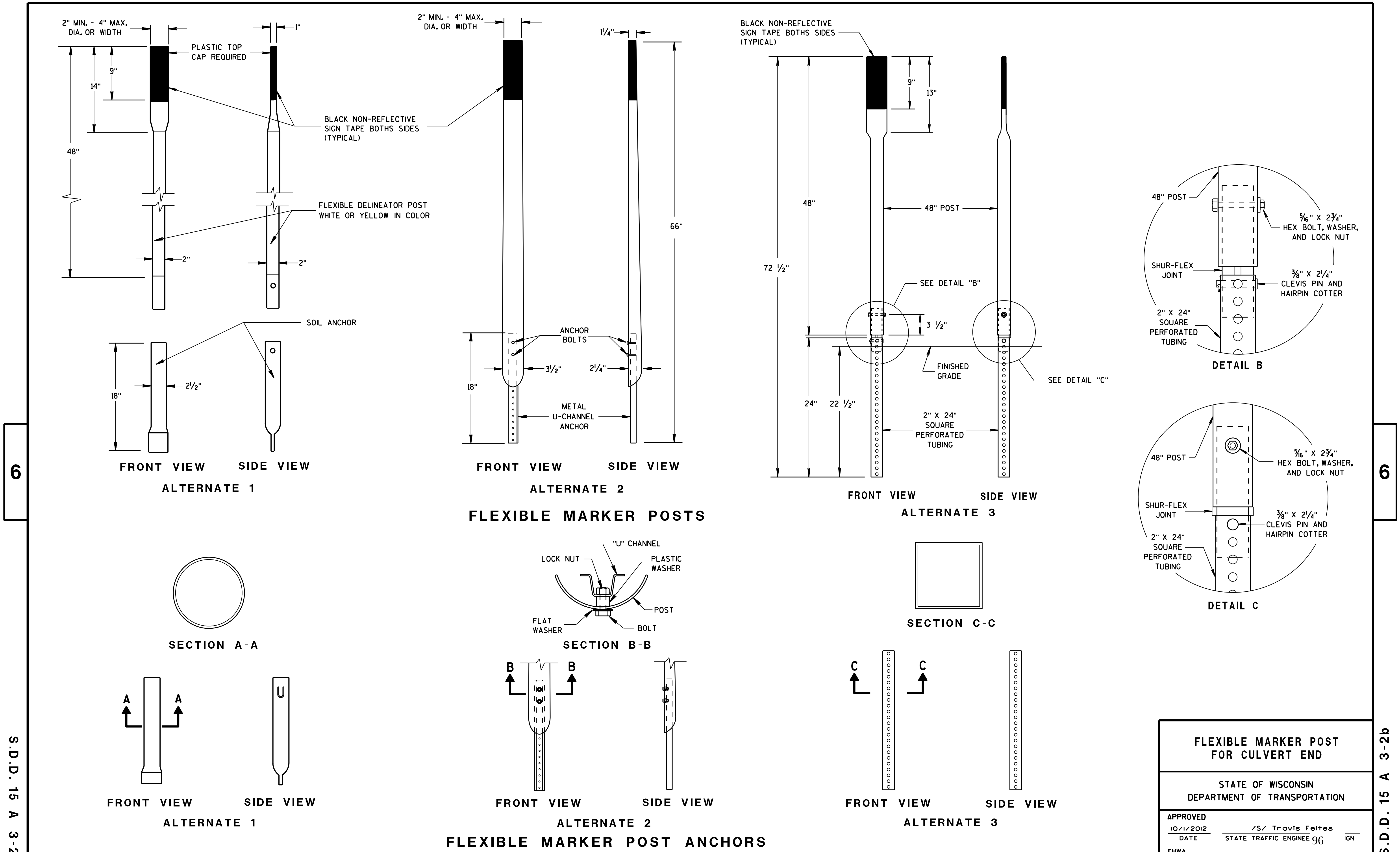
S.D.D. 15 A 3-2a

FLEXIBLE MARKER POST FOR CULVERT END

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

S.D.D. 15 A 3-2a



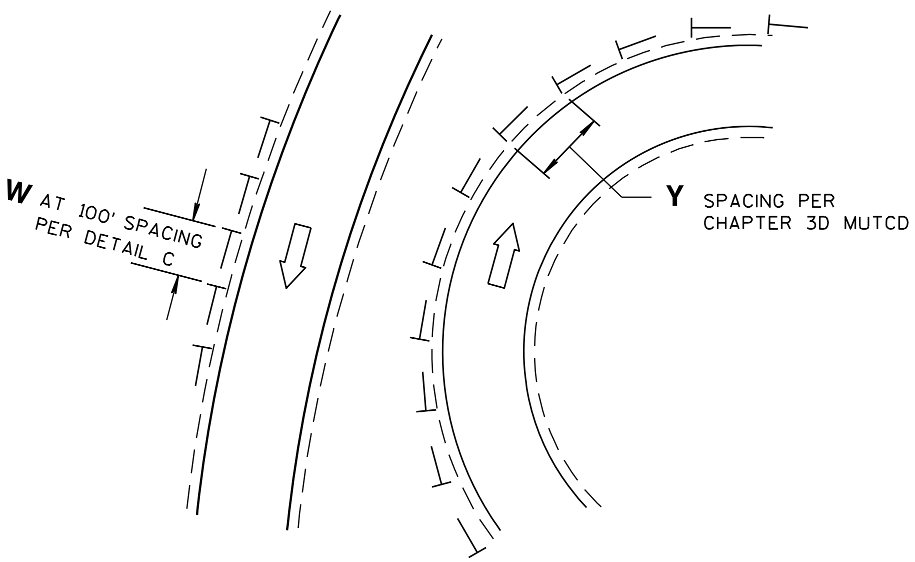
FLEXIBLE MARKER POST FOR CULVERT END

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

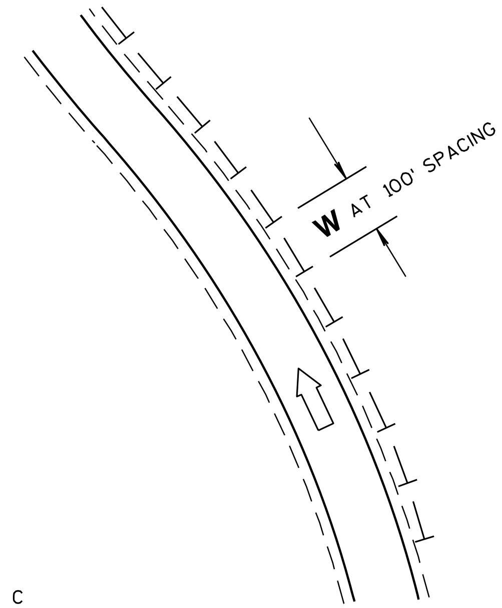
APPROVED
10/1/2012 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER
FHWA

GENERAL NOTES

* USE DOUBLE DELINEATOR ALONG ACCELERATION-DECELERATION LANES AND TAPERS. USE SINGLE DELINEATOR WHEN RAMP PAVEMENT IS FULL WIDTH.



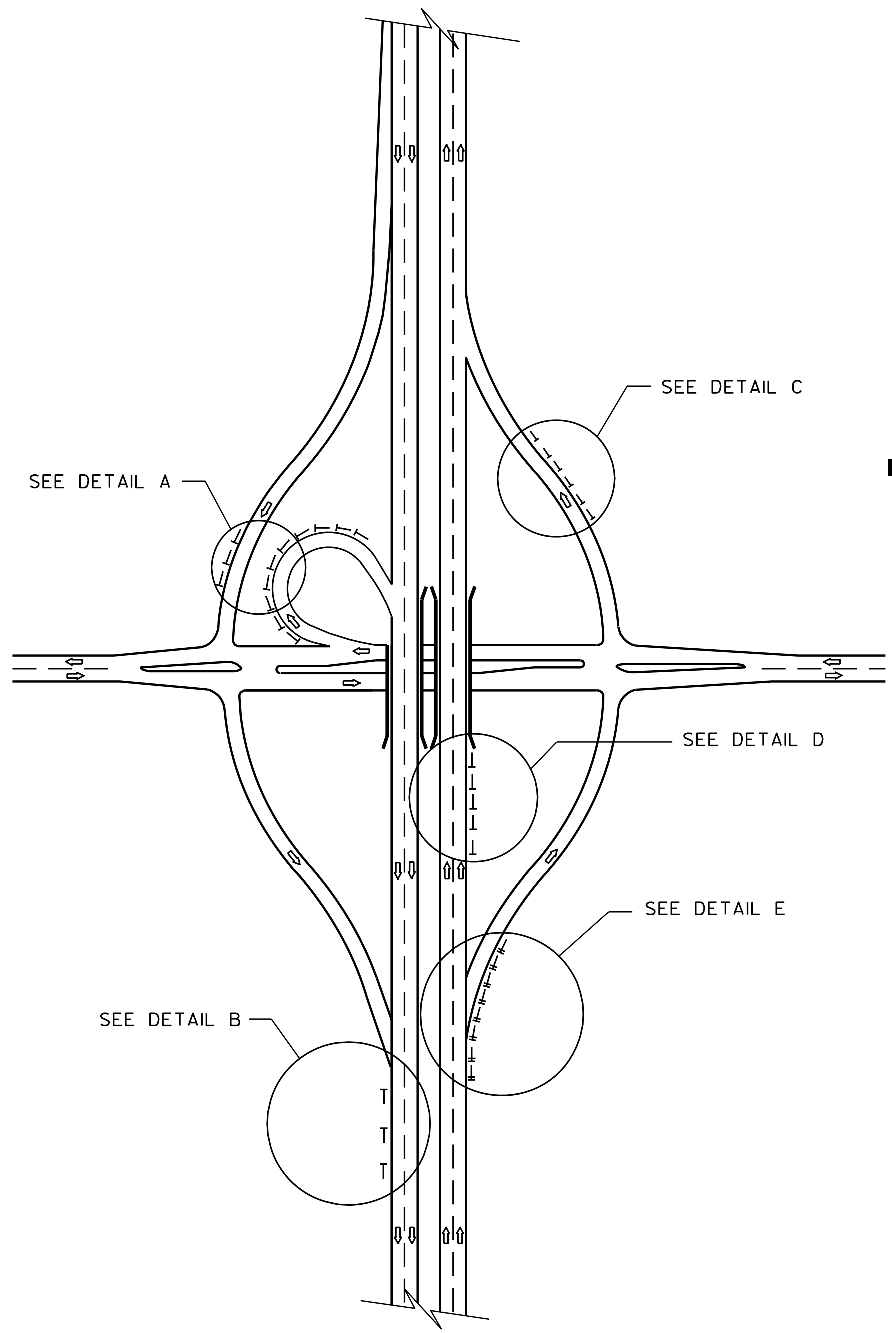
DETAIL A
DELINEATOR LAYOUT AT CURVED RAMP



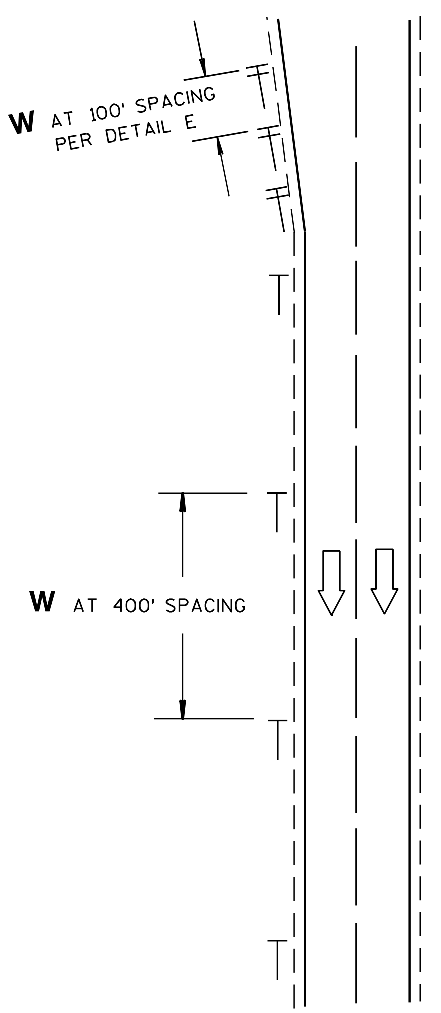
DETAIL C
DELINEATOR LAYOUT ALONG RAMP

LEGEND

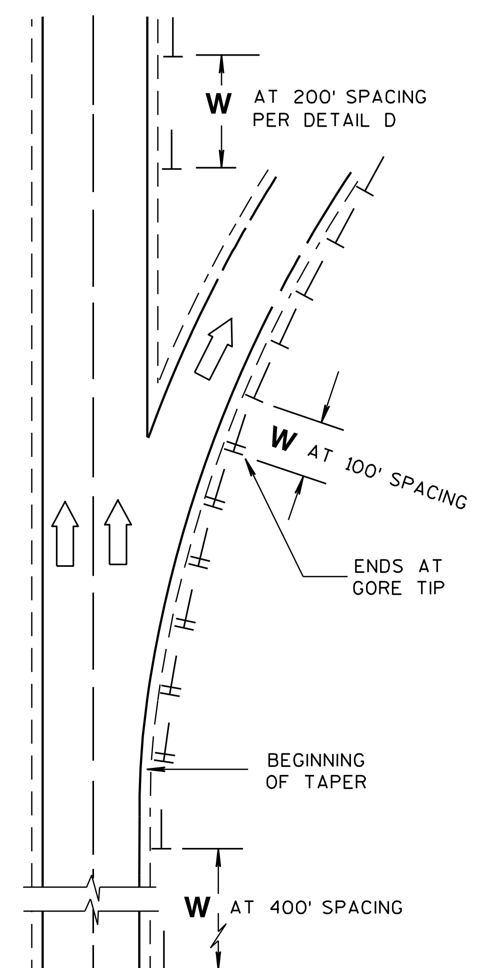
- DIRECTION OF TRAFFIC FLOW
- SINGLE DELINEATOR
- DOUBLE DELINEATOR
- W — WHITE
- Y — YELLOW



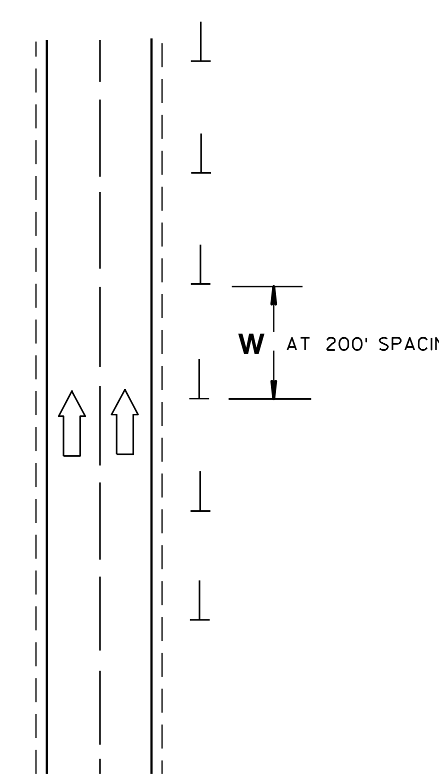
DELINEATOR LAYOUT



DETAIL B
DELINEATOR LAYOUT ALONG MAINLINE



DETAIL E
DELINEATOR LAYOUT FOR ACCELERATION - DECELERATION LANES AND TAPERS AT RAMPS

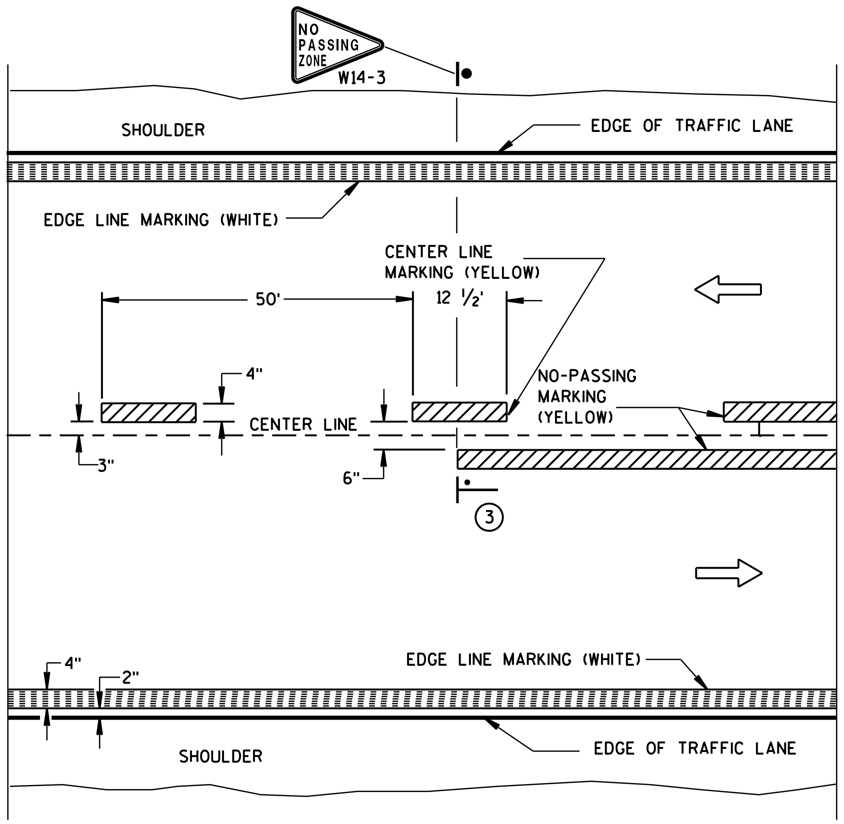


DETAIL D
DELINEATOR LAYOUT BETWEEN INTERCHANGE RAMPS

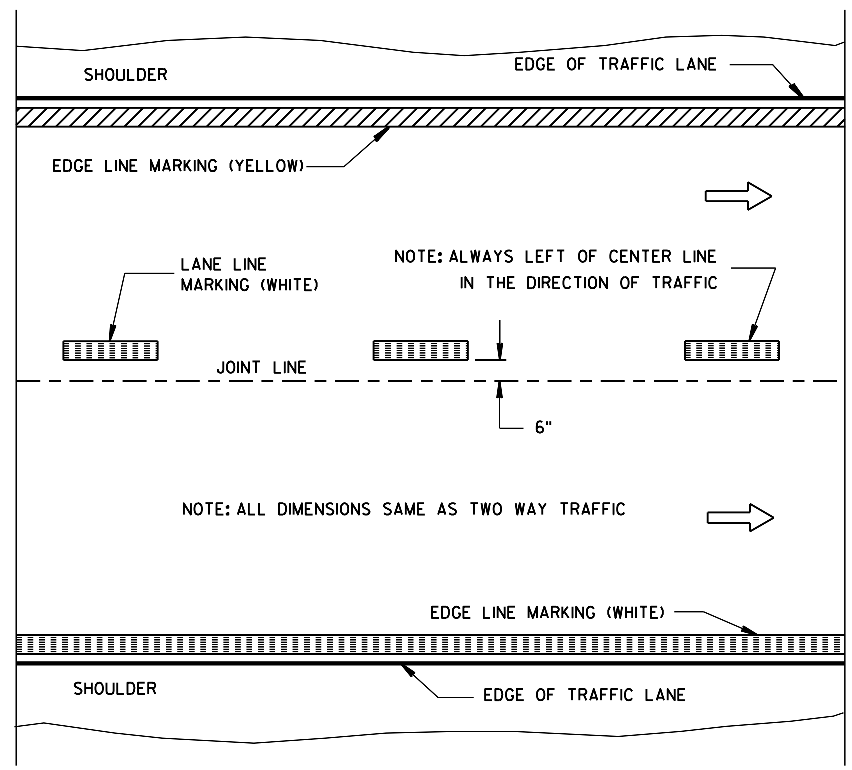
DELINEATOR LAYOUT

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
2/5/09 — DATE
/S/ Thomas N. Notbohm — STATE TRAFFIC ENGINEER OF DESIGN
FHWA

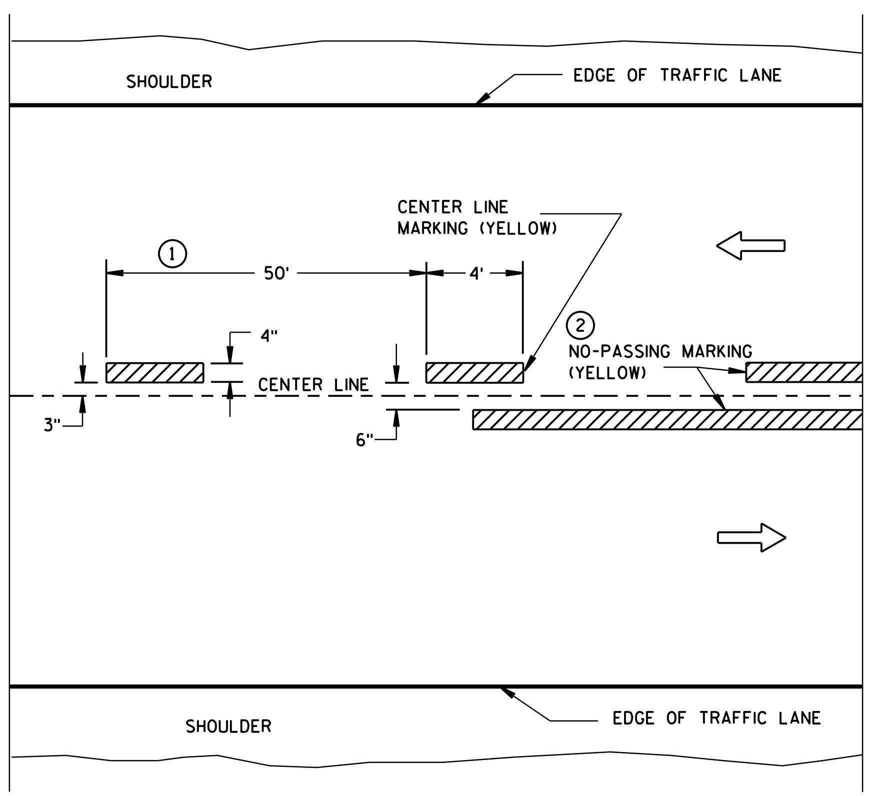


TWO WAY TRAFFIC

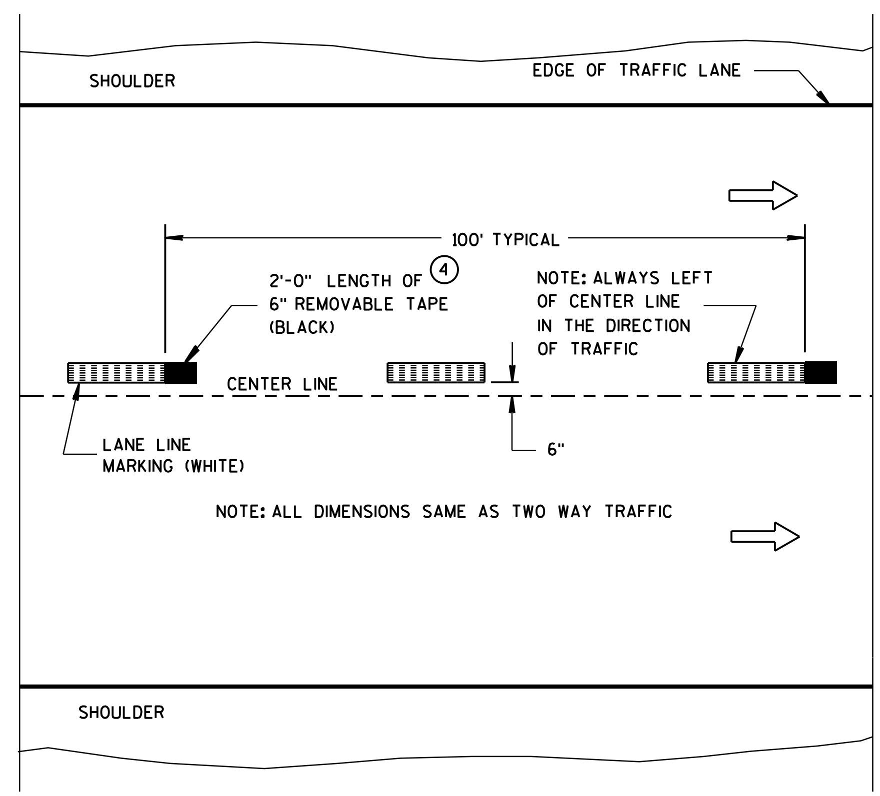


ONE WAY TRAFFIC

PERMANENT PAVEMENT MARKING



TWO WAY TRAFFIC



ONE WAY TRAFFIC

TEMPORARY (INTERMEDIATE) PAVEMENT MARKING

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

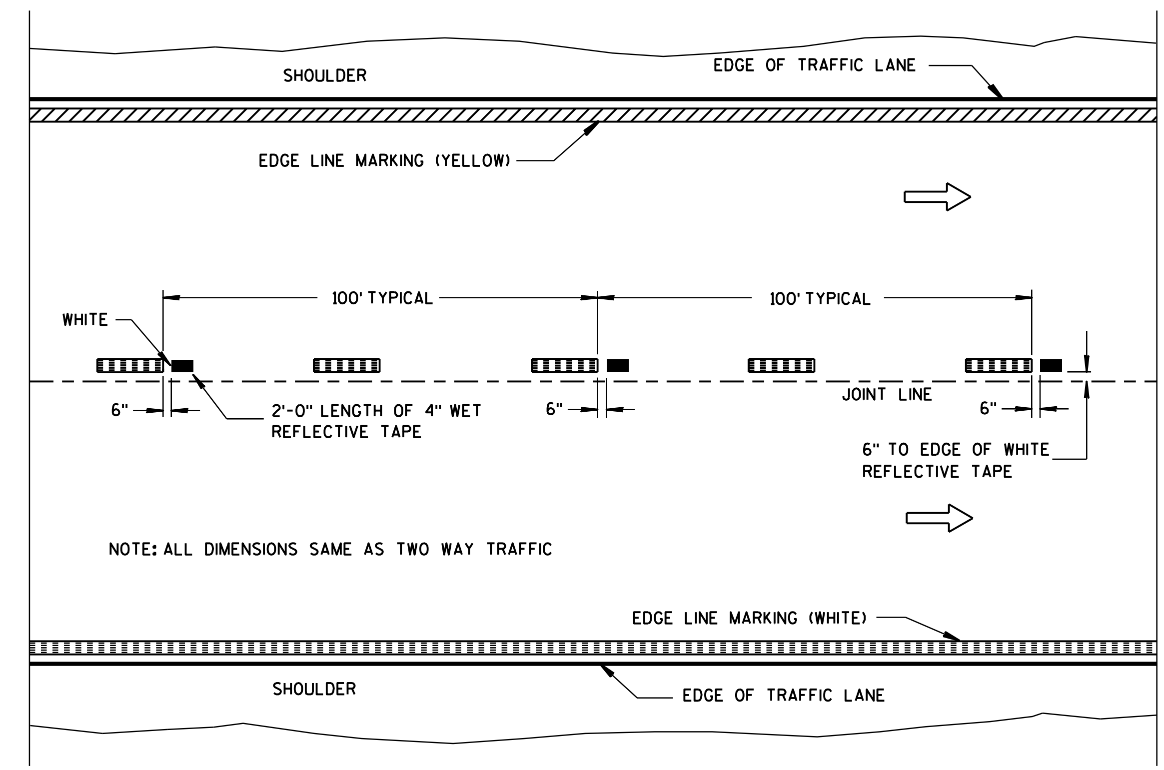
GENERAL NOTES

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



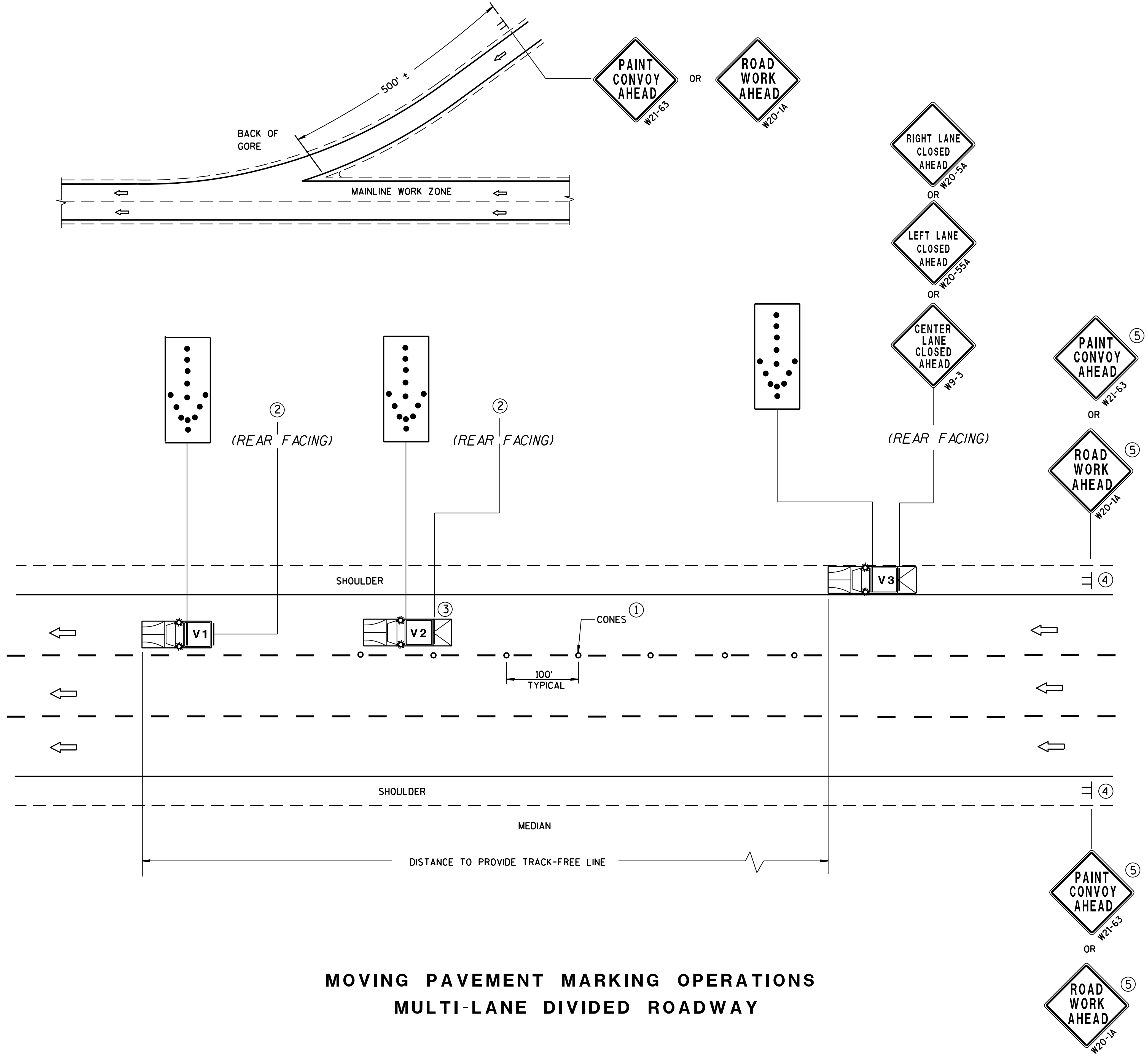
WET REFLECTIVE TAPE SUPPLEMENT TO SPRAYED OR NON WET REFLECTIVE TAPE LANE LINE

LEGEND

"T" MARKING

POST MOUNTED SIGN

PAVEMENT MARKING (MAINLINE)	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
5-13-2013	/S/ Travis Feltes
DATE	STATE TRAFFIC E
FHWA	



MOVING PAVEMENT MARKING OPERATIONS
MULTI-LANE DIVIDED 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.

ALL VEHICLES SHALL BE EQUIPPED WITH REAR FACING TYPE B OR C FLASHING ARROW PANEL. 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.

WHEN WORK ACTIVITY BLOCKS THE LEFT LANE, REVERSE TRAFFIC CONTROL.

WHEN A RAMP INTERSECTS THE FACILITY ON WHICH THE WORK IS BEING PERFORMED, PROVIDE ADDITIONAL TRAFFIC CONTROLS AS SPECIFIED IN THE CONTRACT OR AS APPROVED BY THE ENGINEER.

USE AN ATTENUATOR ON THE REARMOST VEHICLE THAT BLOCKS ALL OR PART OF THE TRAFFIC LANE.

FOR EDGELINE MARKING OR IF CONES ARE NOT USED, POSITION THE REARMOST SHADOW VEHICLE ON THE SHOULDER AS SHOWN IN THE MUTCD IF THE SHOULDER HAS ADEQUATE WIDTH. USE DOUBLE ARROWS WHEN CONVOY IS IN CENTER LANE ONLY.

WHEN NO WORK ACTIVITY IS TAKING PLACE, REMOVE OR TURN THE STATIONARY WARNING SIGNS AWAY FROM TRAFFIC.

THIS DRAWING SHALL BE USED FOR EDGELINE OR LANELINE MARKING FOR MULTILANE DIVIDED ROADWAYS.

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.

WET PAINT (W21-64) OR WET PAINT (W21-64)

③ OPTIONAL TRUCK-MOUNTED ATTENUATOR.

④ SIGNS SHALL BE REPEATED AFTER EVERY ON RAMP OR 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
	CONES
	FLASHING ARROW PANEL (MERGE)

MOVING PAVEMENT MARKING OPERATION
MULTI-LANE DIVIDED ROADWAY

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 19-3c

NOTES:

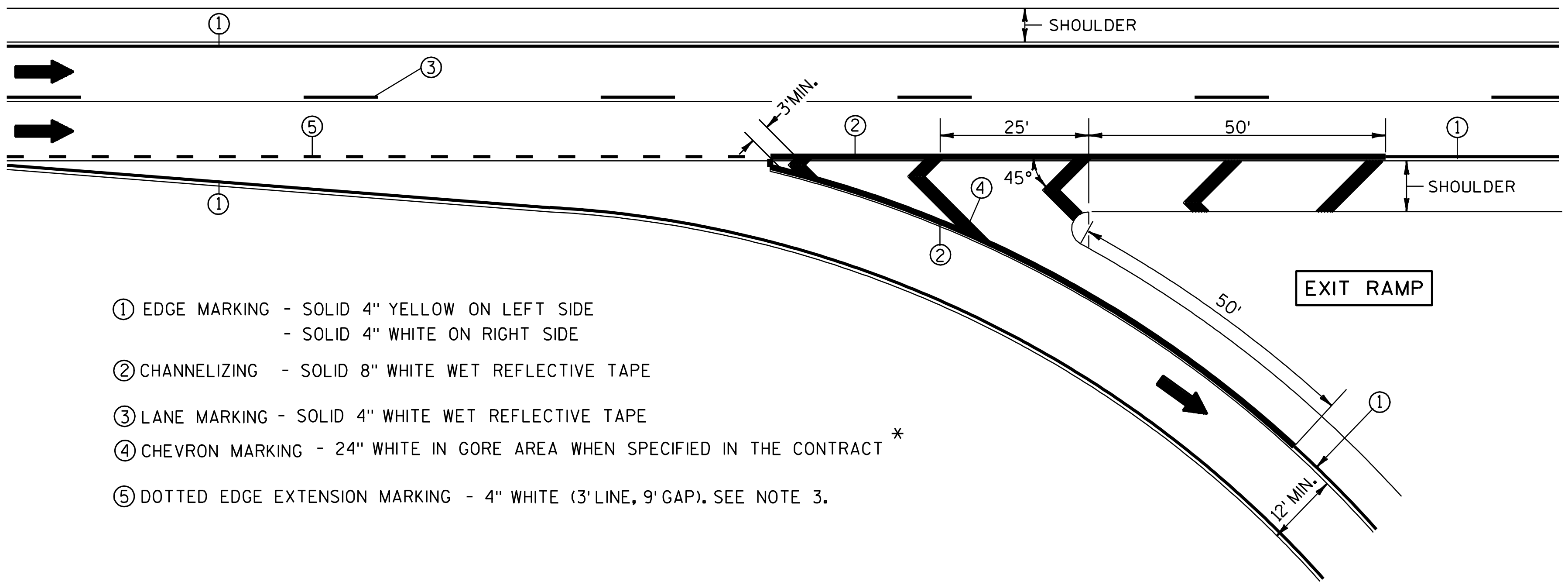
1. ARROWS SHOWN ON THIS MARKING PLAN DESIGNATE TRAFFIC FLOW, AND SHALL NOT BE TAKEN AS PROPOSED PAVEMENT MARKINGS.

2. PLACE WHITE EDGE OF TAPE 6" LEFT FROM JOINT.

3. 3' LINE 9' GAP, EXCEPT RETRACE THE EXISTING LINE-GAP PATTERN WHERE EXISTING MARKINGS ARE IN PLACE.

4. RETRACE EXISTING DIAGONAL MARKINGS.

* REFER TO DESIGN NOTES.



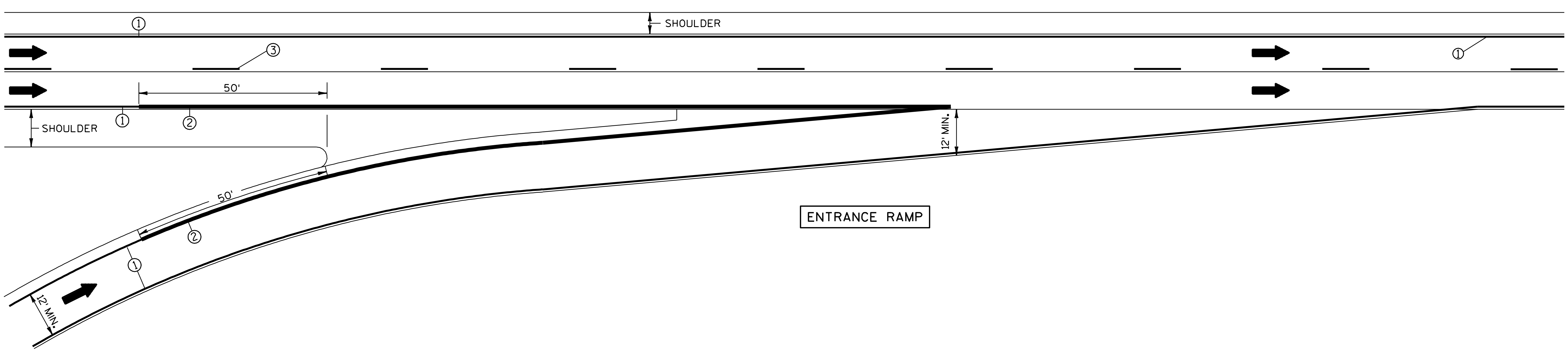
① EDGE MARKING - SOLID 4" YELLOW ON LEFT SIDE
- SOLID 4" WHITE ON RIGHT SIDE

② CHANNELIZING - SOLID 8" WHITE WET REFLECTIVE TAPE

③ LANE MARKING - SOLID 4" WHITE WET REFLECTIVE TAPE

④ CHEVRON MARKING - 24" WHITE IN GORE AREA WHEN SPECIFIED IN THE CONTRACT *

⑤ DOTTED EDGE EXTENSION MARKING - 4" WHITE (3' LINE, 9' GAP). SEE NOTE 3.



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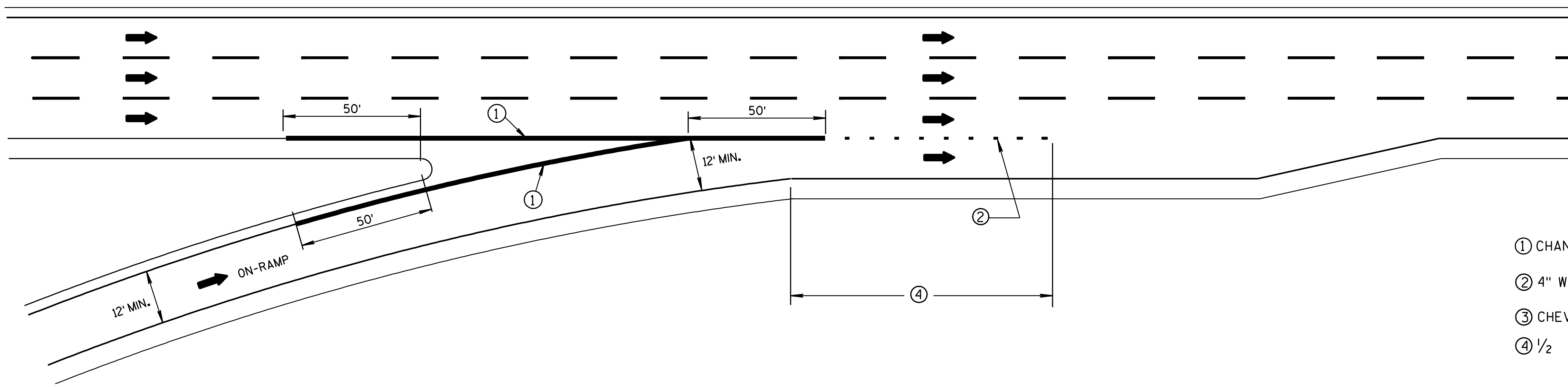
S.D.D. 15 C 31-1a

S.D.D. 15 C 31-1a

PAVEMENT MARKING (RAMPS AND GORES)

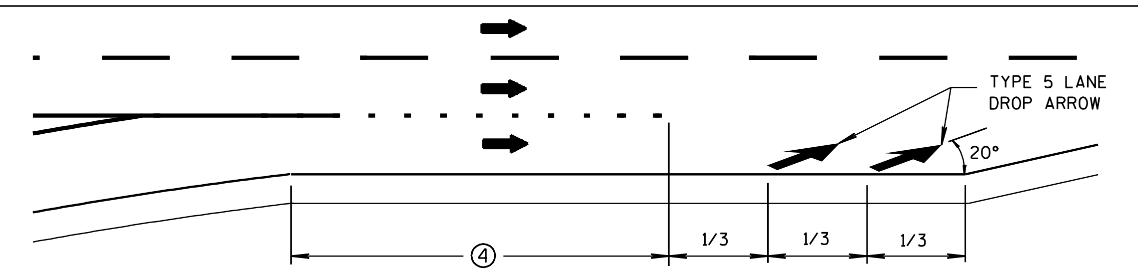
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

NOTES:
1. AHEAD ARROWS SHOWN ON THIS MARKING PLAN DESIGNATE TRAFFIC FLOW, AND SHALL NOT BE TAKEN AS PROPOSED PAVEMENT MARKINGS.
2. PLACE WHITE EDGE OF TAPE 6" LEFT FROM JOINT.
3. RETRACE EXISTING DIAGONAL MARKINGS.

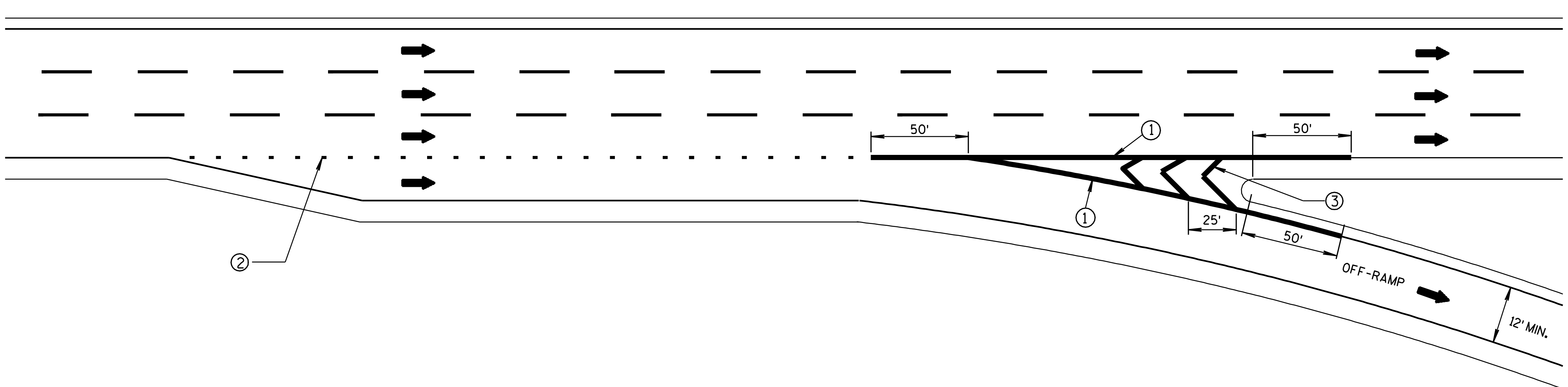


① CHANNELIZING - SOLID 8" WHITE WET REFLECTIVE TAPE IN GORE AREA.
② 4" WHITE (3' LINE, 9' GAP).
③ CHEVRON MARKING - 24" WHITE WHEN SPECIFIED IN THE CONTRACT.
④ ½ LENGTH OF FULL WIDTH ACCELERATION LANE.

SERVICE INTERCHANGE PAVEMENT MARKING FOR PARALLEL ENTRANCE-RAMP



ARROWS AT 1/3 POINTS
WHEN SPECIFIED IN THE CONTRACT



SERVICE INTERCHANGE PAVEMENT MARKING FOR PARALLEL EXIT-RAMP

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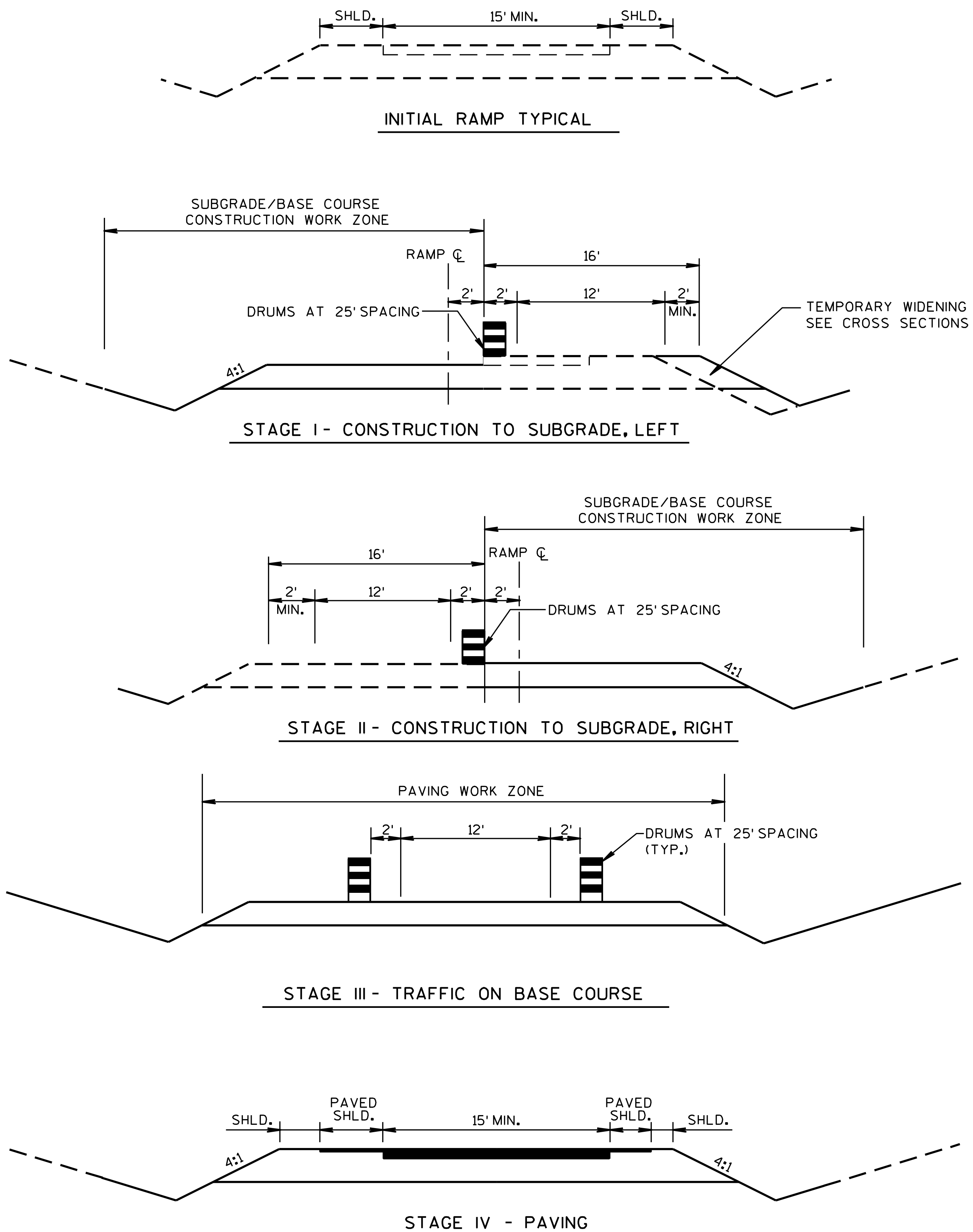
PAVEMENT MARKING FOR PARALLEL ON-RAMP AND PARALLEL OFF-RAMP
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION
APPROVED 6/23/2011 DATE — /S/ Thomas N. Notbohm STATE TRAFFIC ENGINE — SIGN — FHWA

S.D.D. 15 C 31-1d



GENERAL NOTES :

WORK SHALL BE SCHEDULED FOR ALL STAGES TO MINIMIZE INCONVENIENCE TO THE TRAFFIC USING THE RAMP WHILE IT IS ONLY BASE COURSE.

IN STAGE III, A MINIMUM 12' LANE WIDTH SHALL BE DELINEATED WITH DRUMS ALONG BOTH EDGES AT ALL TIMES UNTIL PAVED AND PAVEMENT MARKINGS ARE PLACED.

TRAFFIC CONTROL, RAMP CONSTRUCTION STAGING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
7-14-94
DATE
/S/ Chester J. ...
DIRECTOR, OFFICE ... IC
FHWA

LEGEND

- TYPE III BARRICADE WITH ATTACHED SIGN
- SIGN ON PERMENENT SUPPORT
- TRAFFIC CONTROL DRUM WITH TYPE "C" STEADY BURN LIGHT
- TRAFFIC CONTROL DRUM
- FLASHING ARROW BOARD
- (A) TYPE "A" WARNING LIGHT (FLASHING)
- x-x-x REMOVING PAVEMENT MARKING
- DIRECTION OF TRAFFIC
- WORK AREA

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.

THE SPACING BETWEEN SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND TO PROVIDE A MINIMUM OF 200 FEET, (500 FEET DESIREABLE) DISTANCE TO EXISTING SIGNS.

THIS LANE CLOSURE IS TYPICAL FOR CLOSING RIGHT LANE - REVERSE FOR CLOSING LEFT LANE.

ALL SIGNS ARE 48"x48" UNLESS OTHERWISE NOTED.

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

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. NO WARNING LIGHTS SHALL BE WORKING ON "COVERED" OR "DOWNED" SIGNS.

CONSIDER GEOMETRICS WHEN LOCATING SIGNS AND ARROW BOARD SO THE DRIVER HAS A CLEAR VIEW OF THE ARROW BOARD AND LANE CLOSURE DRUMS FOR A MINIMUM 1500 FEET IN FRONT OF DRUMS.

FOR A LANE CLOSURE THAT IS IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS, THE ADVANCED WARNING SIGNS MAY BE MOUNTED ON PORTABLE SUPPORTS.

REMOVE PAVEMENT MARKINGS IF LANE CLOSURE IS TO BE IN PLACE FOR LONGER THAN 4 OR MORE DAYS AND NIGHTS.

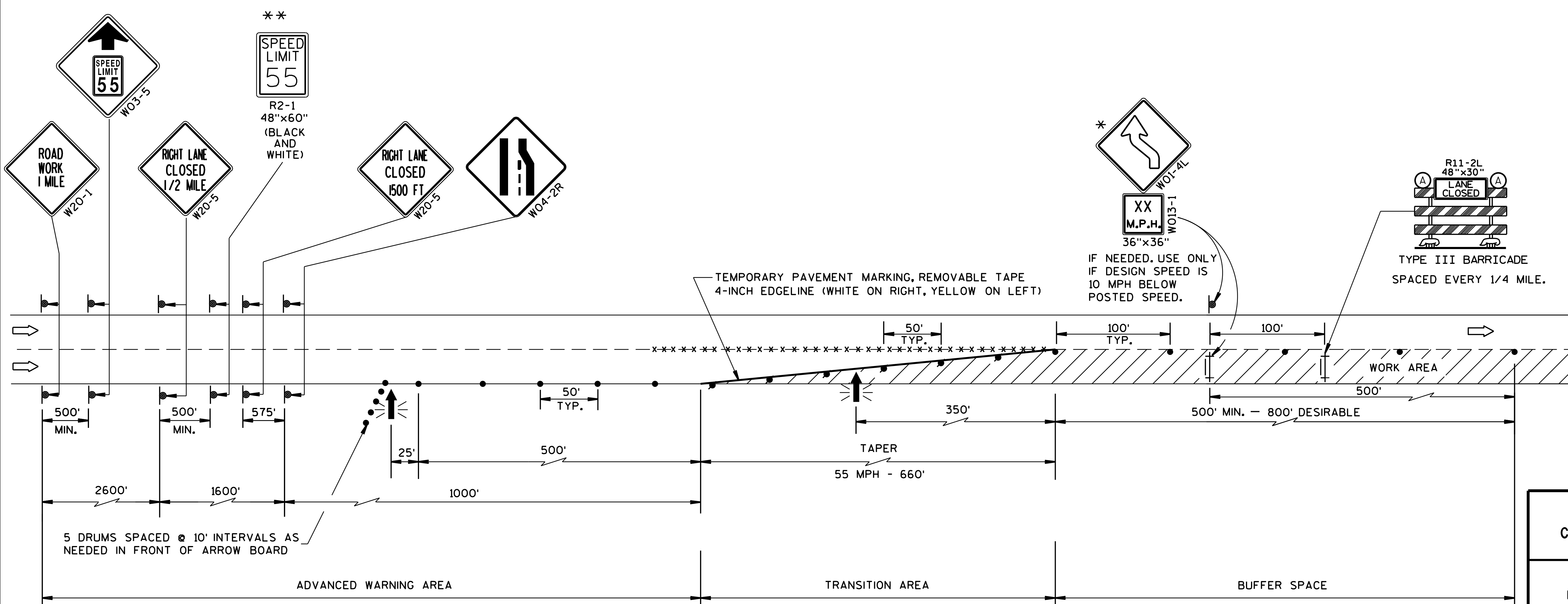
WARNING LIGHTS ARE NOT REQUIRED IF THE LANE CLOSURE IS A DAYTIME ONLY OPERATION.

IF THE HORIZONTAL ALIGNMENT IS SUCH THAT A CURVE MAY REQUIRE ADDITIONAL DELINEATION, THE DEVICE SPACING MAY BE DECREASED TO 50 FEET.

ADJUSTMENTS IN BUFFER SPACE NEED TO BE INCORPORATED WHEN THE LANE CLOSURE OCCURS NEAR AN INTERCHANGE EXIT OR ENTRANCE RAMP. THE LANE CLOSURE MUST MUST TAKE PLACE FAR ENOUGH IN ADVANCE OF AN EXIT OR ENTRANCE RAMP TO STILL ALLOW FOR ADEQUATE BUFFER SPACE. THE MINIMUM LENGTH OF THE BUFFER SPACE BEFORE AN EXIT RAMP SHOULD BE 1/2 THE LENGTH OF THE TRANSITION AREA. THE ENTRANCE RAMP SHOULD BE FOLLOWED BY THE ORIGINAL BUFFER SPACE LENGTH OF 800 FEET DESIRABLE PRIOR TO ANOTHER TRAFFIC CONTROL CHANGE SUCH AS A CROSSOVER MANEUVER.

* THE LEFT REVERSE CURVE SIGN (WO1-4L) IS ONLY REQUIRED WHEN THIS DETAIL IS USED IN COMBINATION WITH "SINGLE LANE CROSSOVER" DETAIL.

** A SPEED LIMIT SIGN SHALL BE LOCATED 1500 FEET BEYOND THE END OF THE ACCELERATION LANE OF EACH ENTRANCE RAMP. THERE SHOULD BE A SPEED LIMIT SIGN INCORPORATED A MINIMUM OF EVERY 2 OR 3 MILES. INCLUDE A 65 MPH RESUME SPEED LIMIT SIGN 200 FEET MINIMUM (500 FEET DESIREABLE) BEYOND THE "END OF ROADWORK" SIGN.



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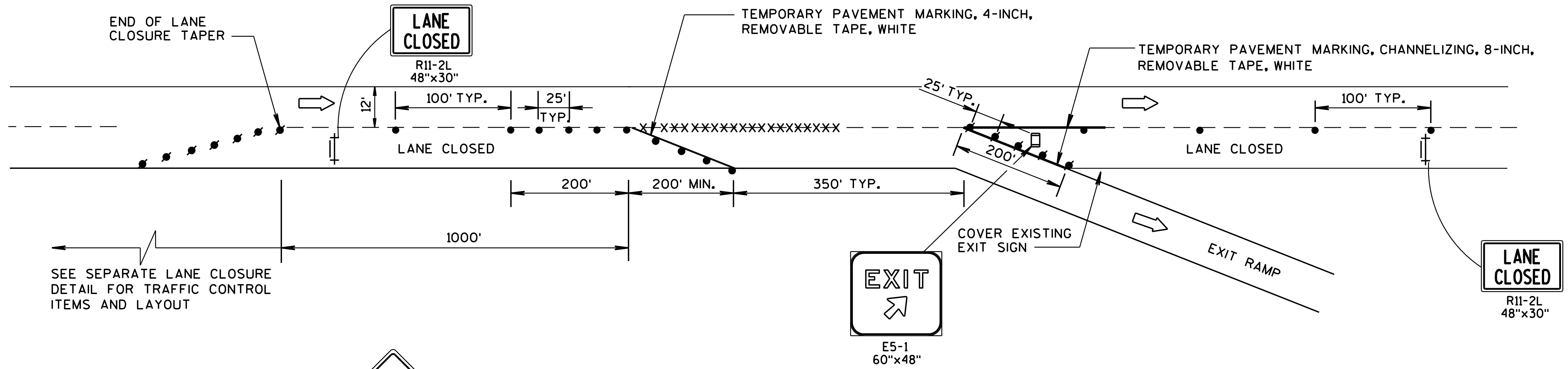
S.D.D. 15 D 12-5b

TRAFFIC CONTROL, LANE CLOSURE, SPEED REDUCTION

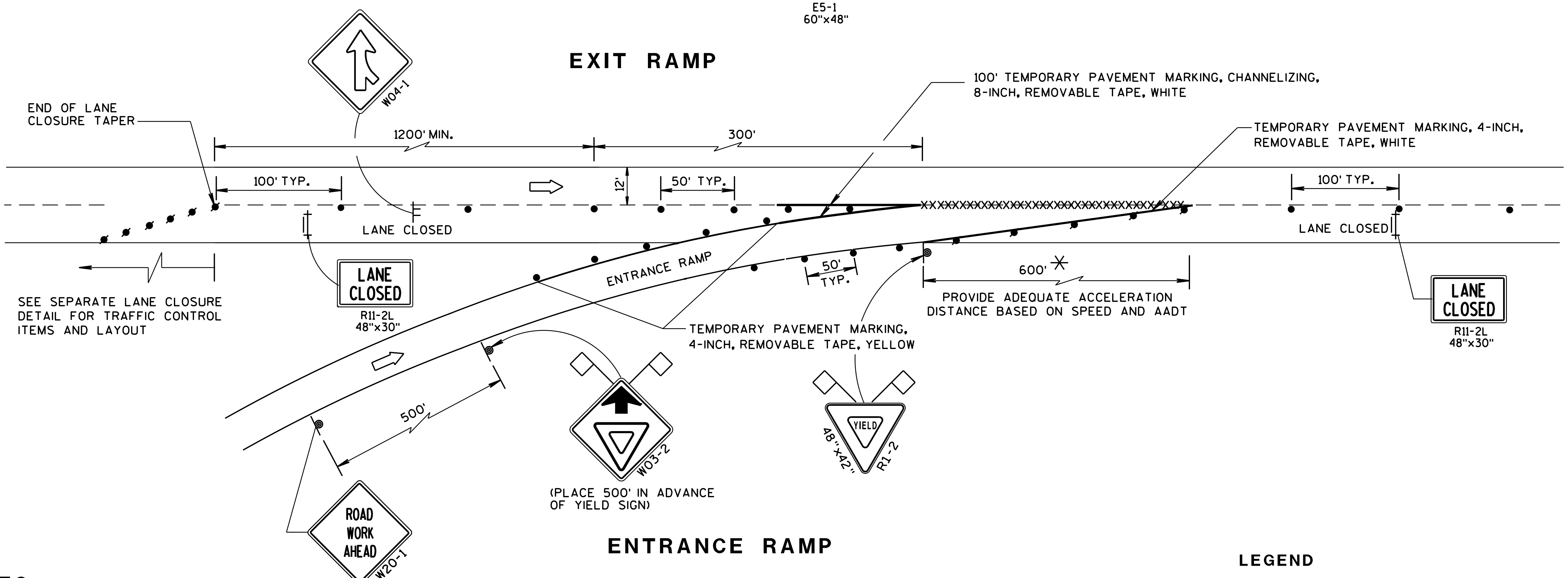
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
Feb. 2015 — DATE
/S/ Travis Feltes — STATE TRAFFIC ENGINEER ... SIGN
FHWA

S.D.D. 15 D 12-5b



EXIT RAMP



ENTRANCE RAMP

GENERAL NOTES

THE INSTALLATIONS SHOWN ON THIS SHEET ARE TYPICAL EXAMPLES AND ARE NOT INTENDED TO REPRESENT ANY PARTICULAR RAMP. AT SPECIFIC FIELD LOCATIONS, SIMILAR INSTALLATIONS SHALL BE USED AND ADJUSTED TO THE GEOMETRICS OF THE RAMP AS COORDINATED WITH THE ENGINEER.

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

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.

SEE SEPARATE LANE CLOSURE DETAIL FOR TYPICAL SPACING OF TYPE III BARRICADES AND R11-2L "LANE CLOSED" SIGNS.

YIELD SIGN AND WARNING SIGNS ON ENTRANCE RAMP ARE ALSO APPROPRIATE FOR CLOSURE OF THE MAINLINE LEFT LANE. OMIT THE YIELD SIGN IF MORE THAN ONE LANE REMAINS OPEN ON THE MAINLINE AND THE RAMP TAPER IS AT LEAST AS LONG AS THE NORMAL ENTRANCE RAMP TAPER AT THE SITE.

SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS, OR THAT WILL BE PLACED IN A CLOSED LANE, MAY BE MOUNTED ON PORTABLE SUPPORTS.

IF INDICATED IN MISCELLANEOUS QUANTITIES, SUBSTITUTE FLEXIBLE TUBULAR MARKERS FOR DRUMS IN THE GORE BETWEEN THE ENTRANCE RAMP AND MAINLINE TRAFFIC.

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.

REMOVE PAVEMENT MARKINGS AND PLACE TEMPORARY PAVEMENT MARKING, REMOVABLE TAPE IF LANE CLOSURE IS TO BE IN PLACE FOR 7 OR MORE CONTINUOUS DAYS AND NIGHTS.

WARNING LIGHTS ARE NOT REQUIRED IF THE LANE CLOSURE IS A DAYTIME ONLY OPERATION.

✳ LENGTH OF OPENING MAY BE REDUCED TO 150 FEET DURING STAGING OF WORK IN IMMEDIATE AREA OF RAMP TAPER.

LEGEND

- SIGN ON PERMANENT SUPPORT
- SIGN ON TEMPORARY SUPPORT
- TRAFFIC CONTROL DRUM
- TRAFFIC CONTROL DRUM WITH TYPE "C" STEADY BURN LIGHT
- xxxxxx REMOVING PAVEMENT MARKING (SEE GENERAL NOTES)
- TYPE III BARRICADE WITH ATTACHED SIGN
- FLAGS, 16" x 16" MIN., (ORANGE)
- DIRECTION OF TRAFFIC

TRAFFIC CONTROL, EXIT AND ENTRANCE RAMP WITHIN LANE CLOSURE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED		
Sept. 2015	/S/ Peter Amakobe Atepe	
DATE	STATEWIDE WORK ZONE SAFETY ENGINEER	C
FHWA		

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S.D.D. 15 D 15-2

S.D.D. 15 D 15-2

LEGEND

TRAFFIC CONTROL DRUM

SIGN ON PERMANENT SUPPORT

DIRECTION OF TRAFFIC

FLASHING ARROW BOARD

WORK AREA

GENERAL NOTES

THIS DETAIL IS TYPICAL FOR CLOSING THE RIGHT SHOULDER. FOR CLOSING THE LEFT SHOULDER, REVERSE THE TRAFFIC CONTROL.

THIS DETAIL MAY BE USED FOR DIVIDED ROADWAYS WITH ANY NUMBER OF TRAVEL LANES.

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.

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

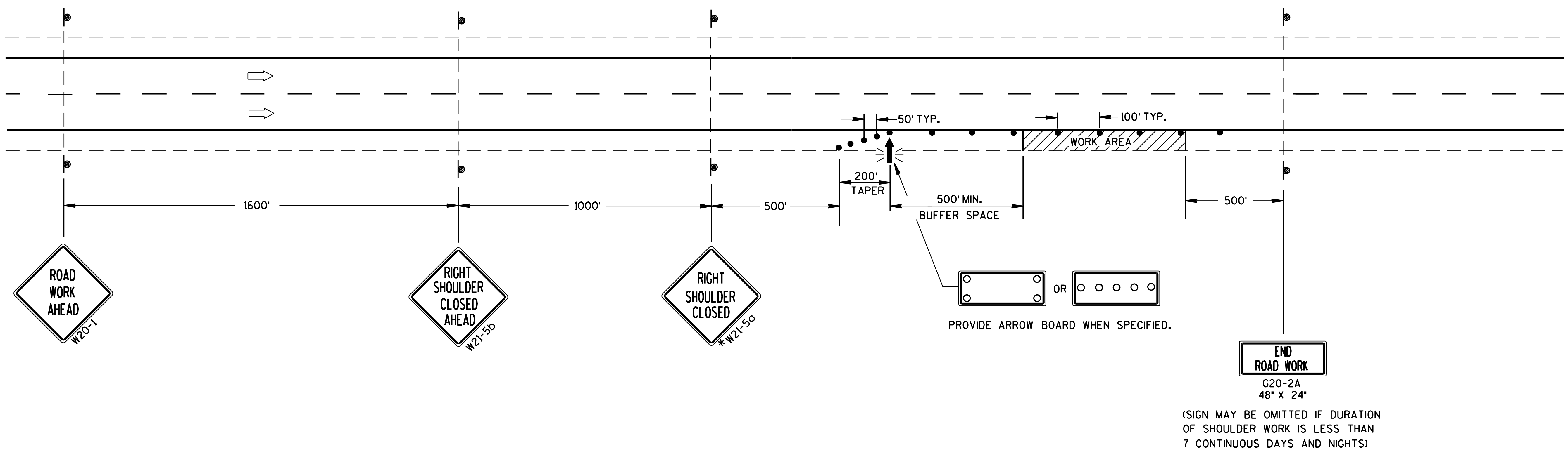
SIGNS THAT WILL BE IN PLACE LESS THAN 7 CONTINUOUS DAYS AND NIGHTS MAY BE MOUNTED ON PORTABLE SUPPORTS.

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.

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

WHEN A 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.

*FOR SHORT DURATION SHOULDER WORK OF LESS THAN ONE HOUR, THE W21-5a SIGN MAY BE OMITTED.



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TRAFFIC CONTROL SHOULDER CLOSURE ON DIVIDED ROADWAY, SPEEDS GREATER THAN 40 MPH

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

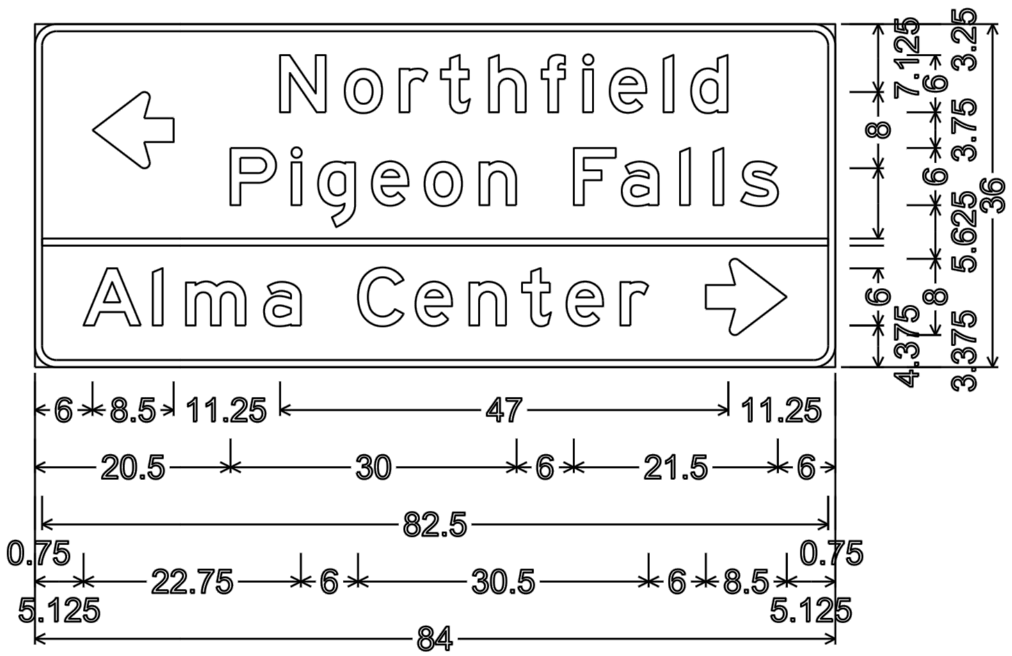
APPROVED

8/2013 /S/ Travis Feltes
DATE STATE TRAFFIC ENGINE[ER] ...SIGN

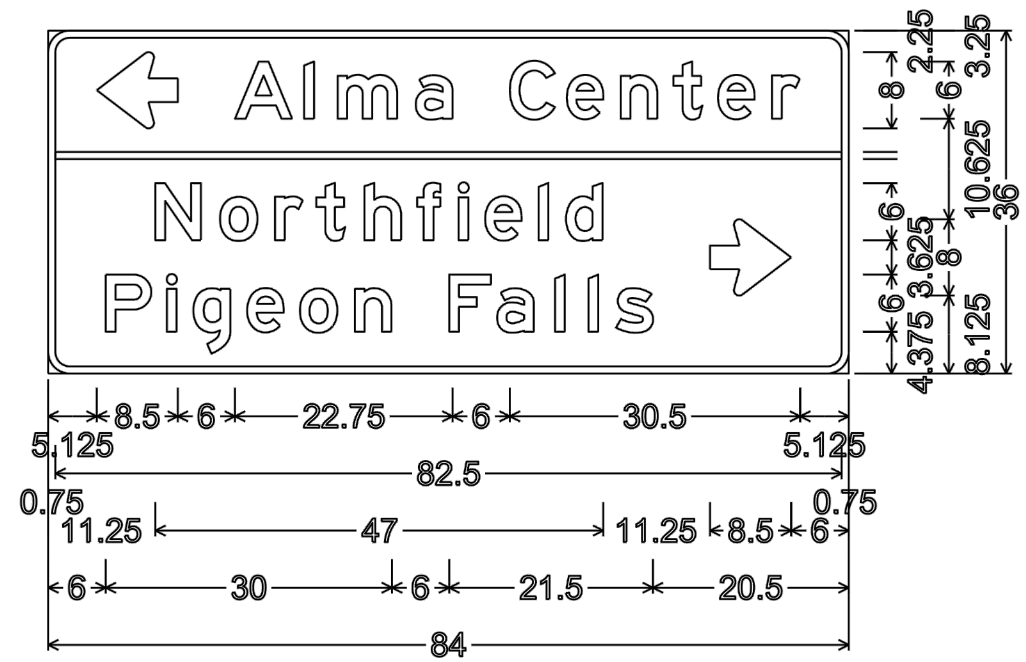
FHWA

S.D.D. 15 D 27-2

S.D.D. 15 D 27-2



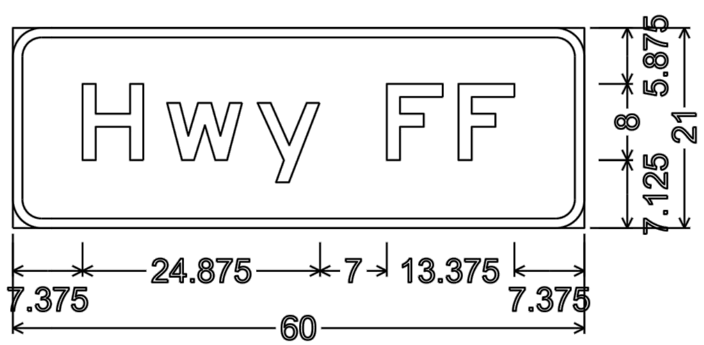
D1-3;
2.250" Radius, 0.750" Border



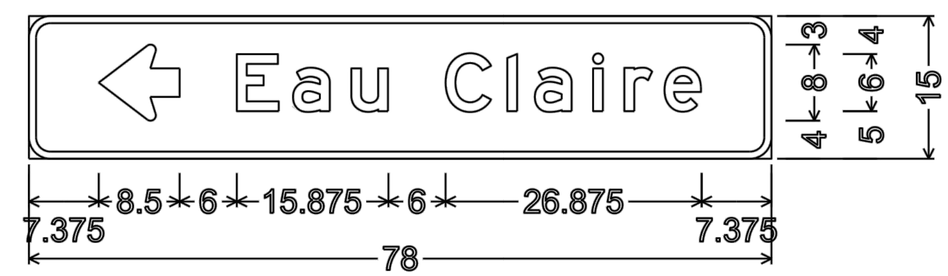
D1-3;
2.250" Radius, 0.750" Border

NOTES

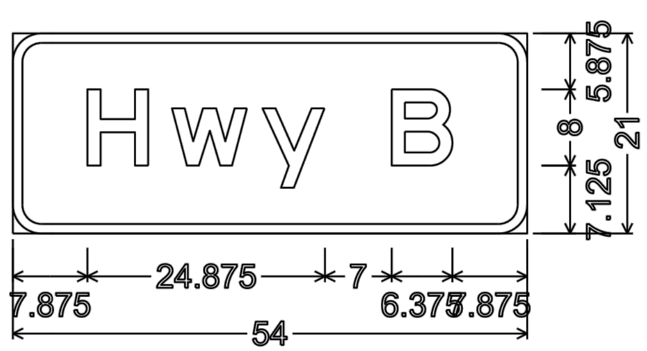
1. Signs are Type II- Type H Reflective
2. Color:
   Background - Green
   Message - White
3. Message Series - E



M1-94;
3.000" Radius, 1.000" Border



D1-1;
2.250" Radius, 0.750" Border



M1-94;
3.000" Radius, 1.000" Border

D1-1;
2.250" Radius, 0.750" Border

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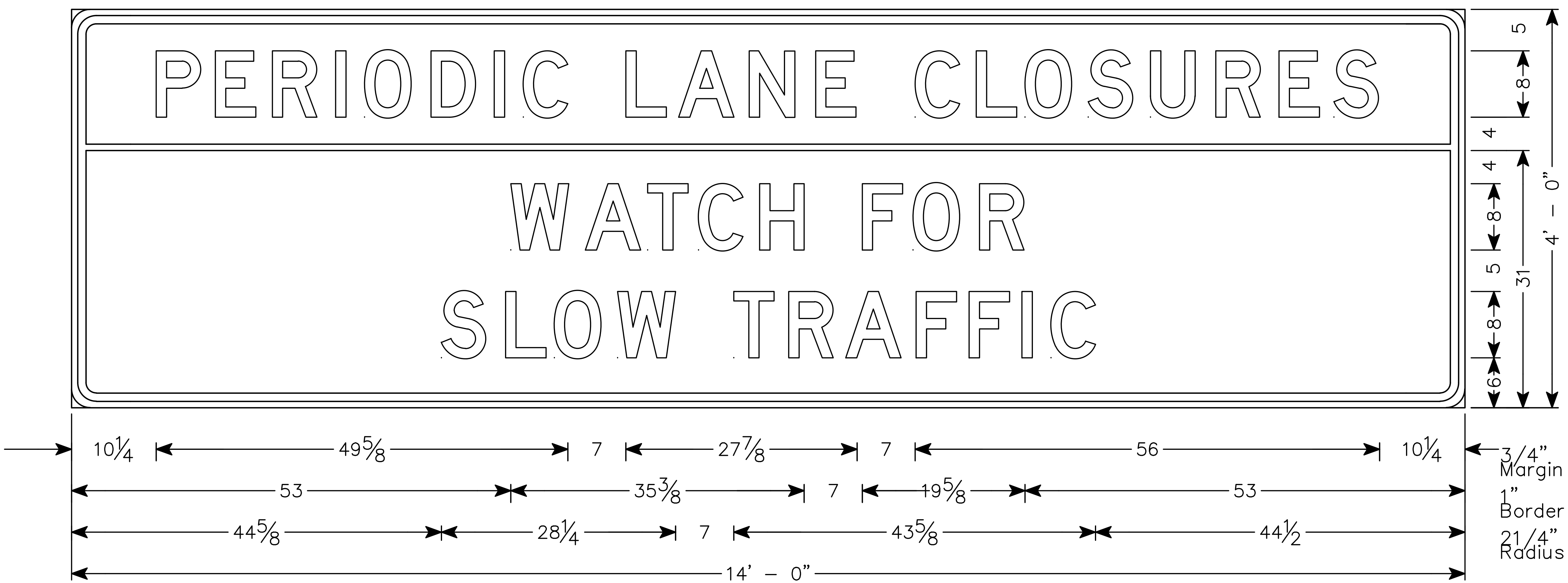
NOTES

1. All Signs Type II — Reflective — reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background — Orange except as noted
   Message — Black
3. Message Series — D



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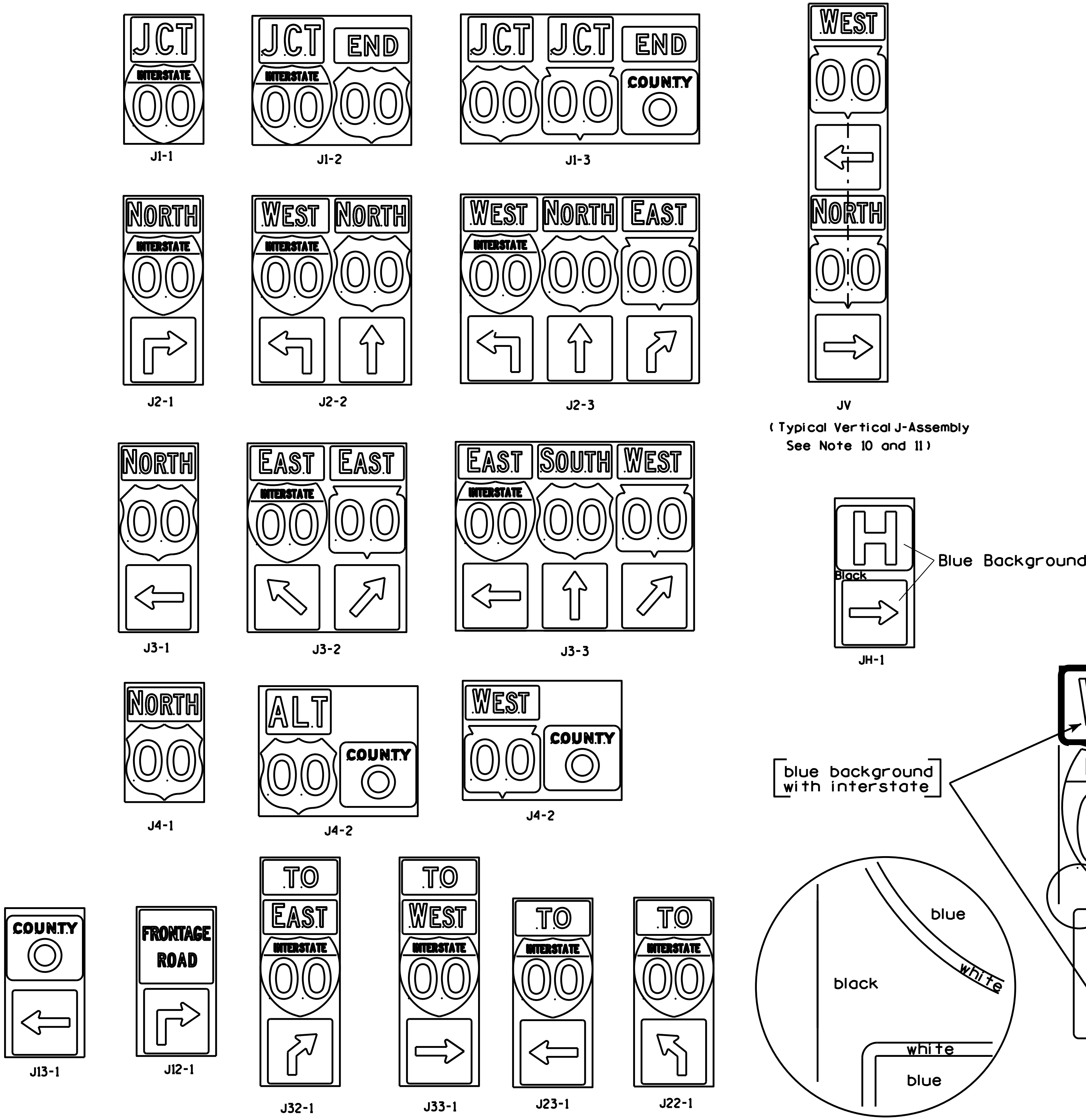
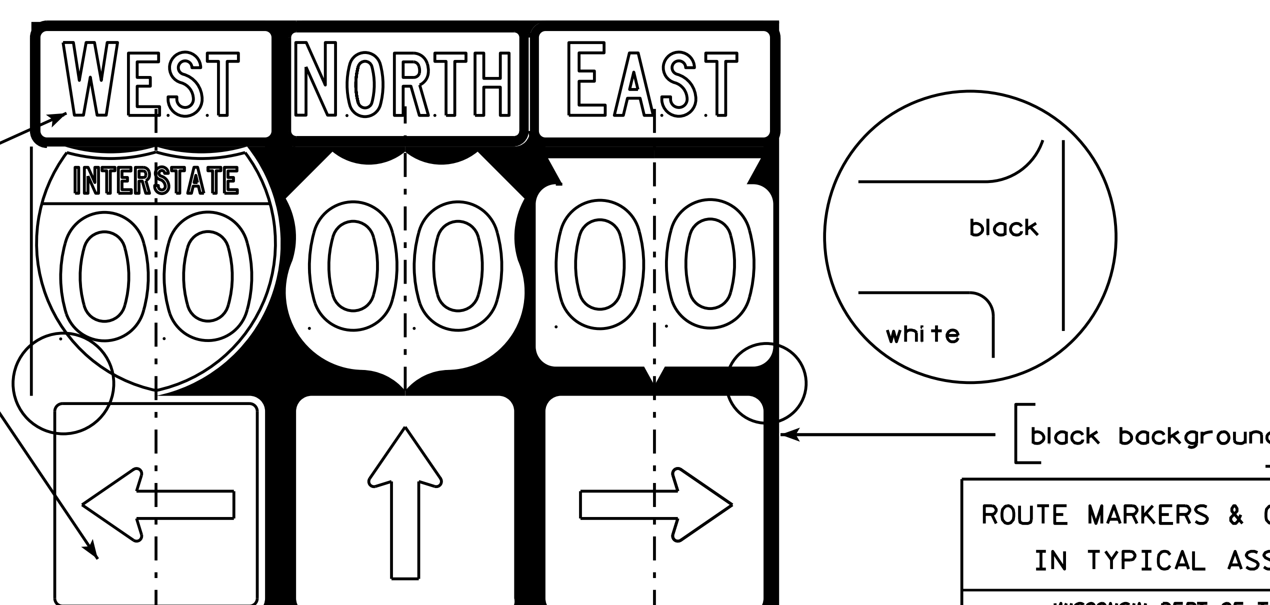
TYPICAL ASSEMBLIES



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.



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ROUTE MARKERS & COMPONENTS IN TYPICAL ASSEMBLIES

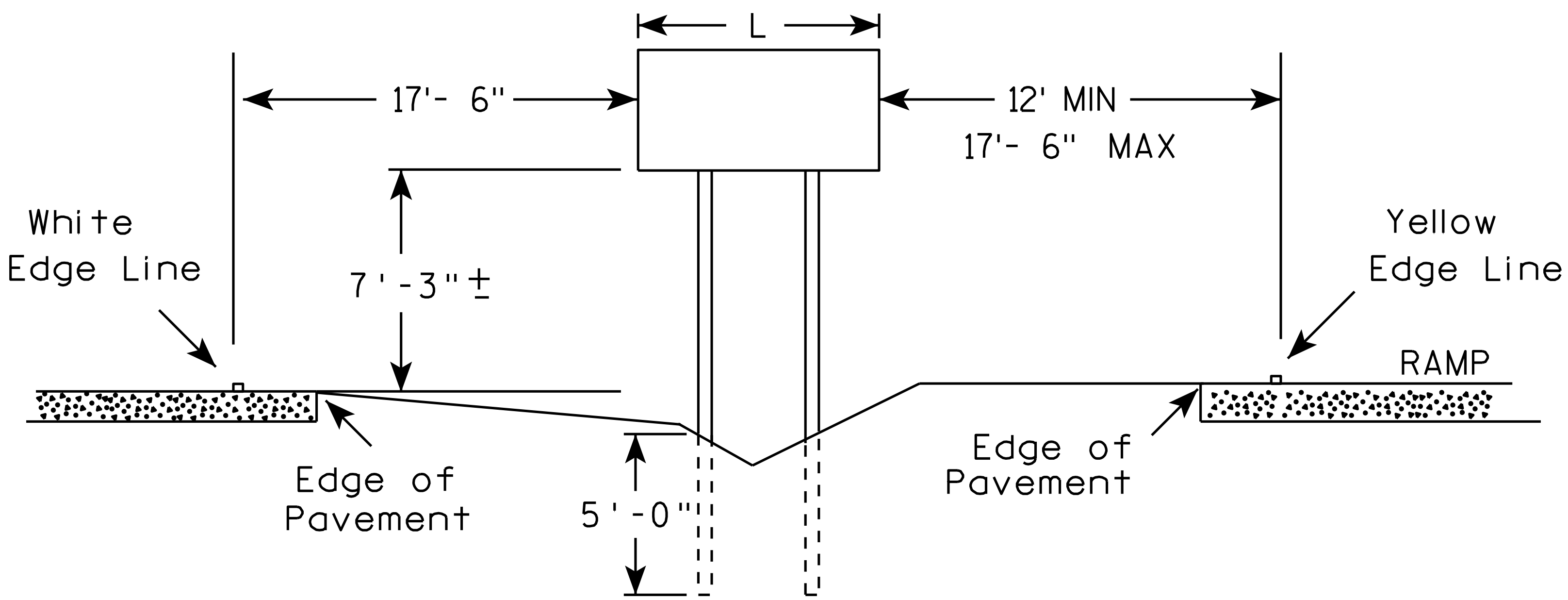
WISCONSIN DEPT OF TRANSPORTATION

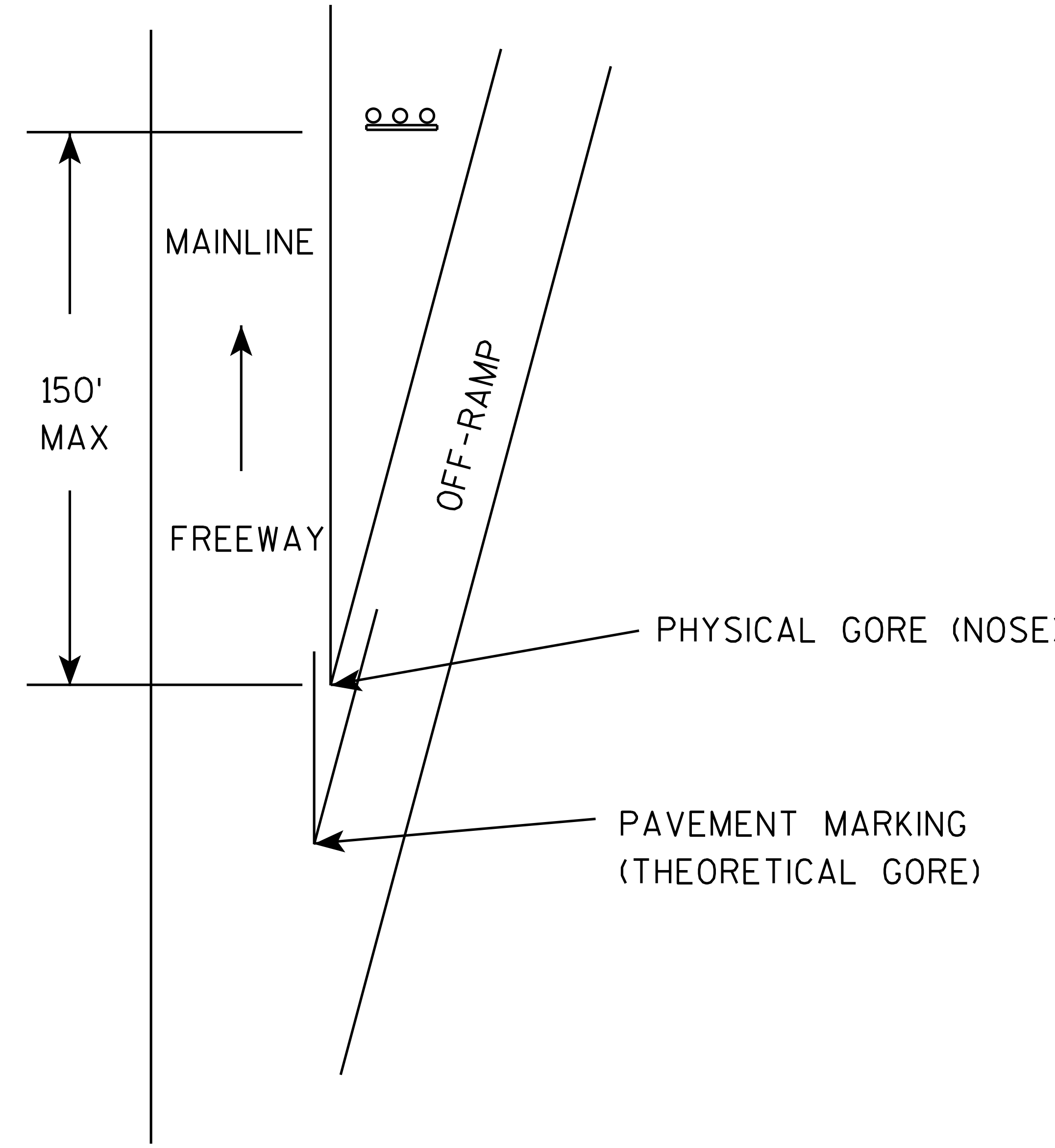
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 2/06/14 PLATE NO. 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 :





GENERAL NOTES

1. The 150 foot distance from the physical gore (where pavement ends) will normally provide the offsets as shown.
2. If roadway geometrics permit, the sign may be closer than the 150 foot distance as long as the offsets are maintained.
3. At no time shall the location be greater than 150 feet. If the normal offsets cannot be maintained, they can be reduced to 6 feet from the edge of the paved shoulder (both freeway and ramp).
4. The offset from edge of sign to the yellow edge line on the ramp is shown as a minimum of 12 feet and a maximum of 17 feet, 6 inches. Preference is adhering to the maximum rather than the minimum dimension.
5. When L is equal to or exceeds 10 feet, use 3 posts as per A4-4.
6. The (∓) tolerance for the mounting height is 3 inches.

7

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TYPICAL INSTALLATION
OF TYPE II SIGNS ON
WOOD POSTS IN GORE

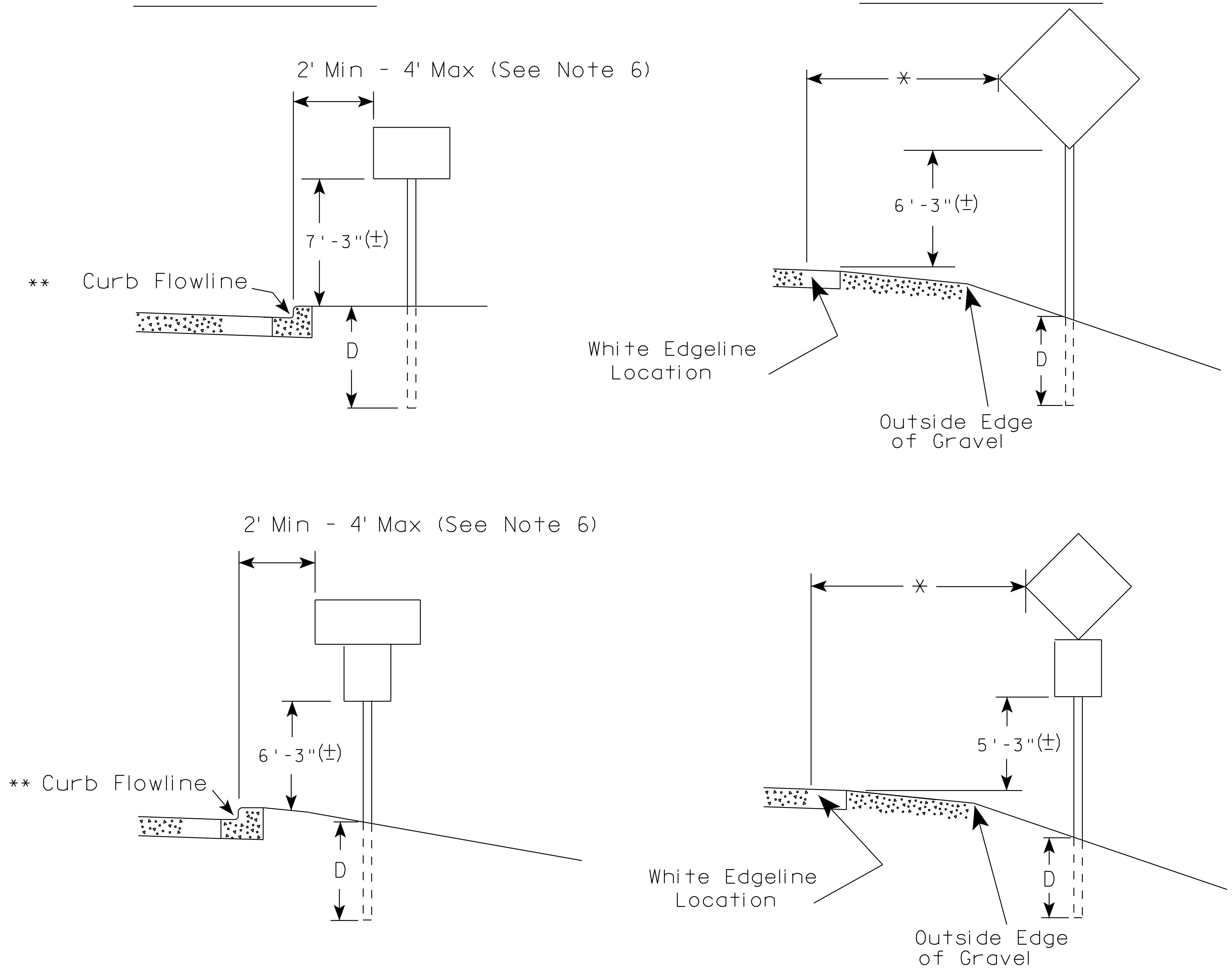
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 2/06/14 PLATE A4-2.3

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

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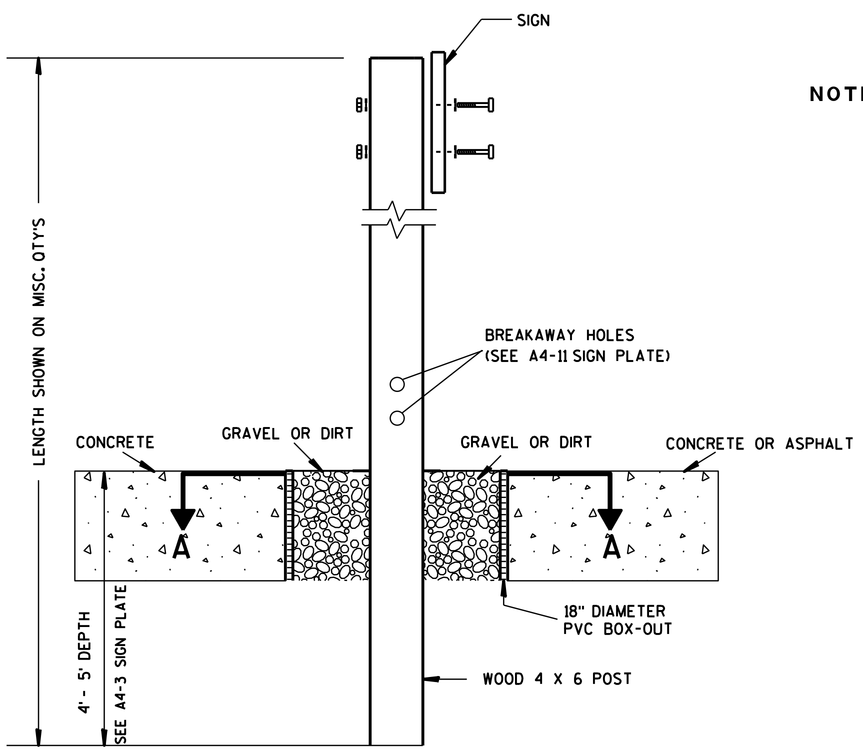
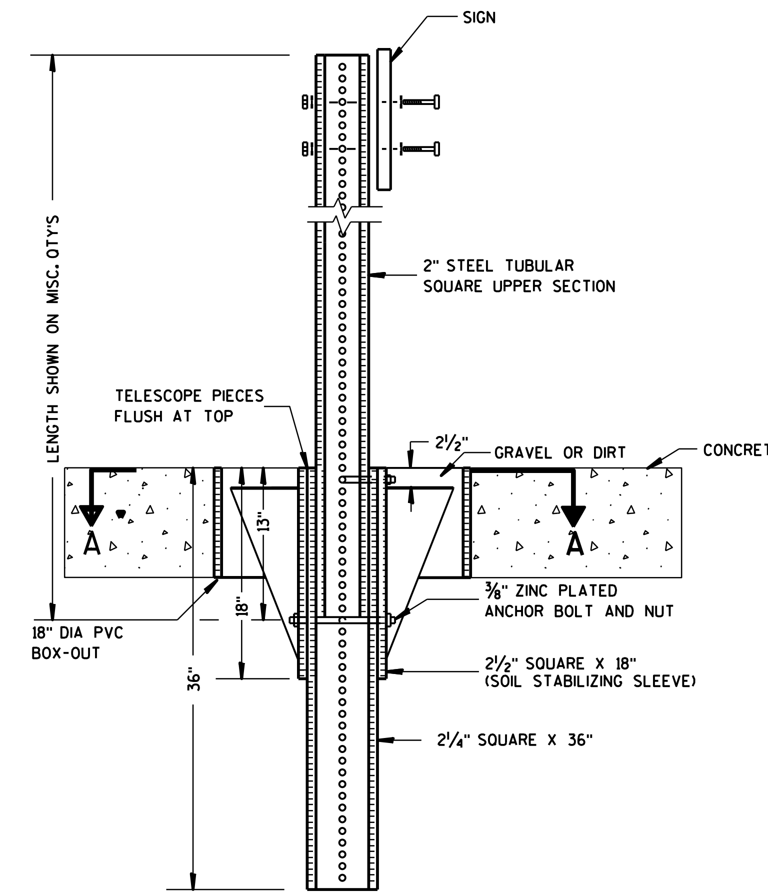


ELEVATION VIEW

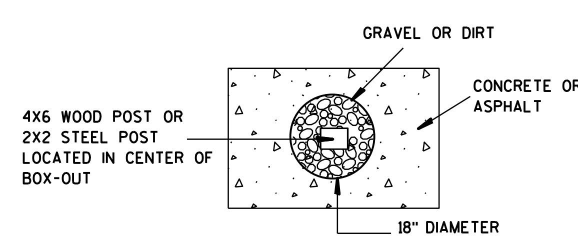
DETAIL OF WOOD 4 X 6 SIGN POST IN BOX-OUT

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

7

7

SIGN POST
BOX-OUTS
A4-3B

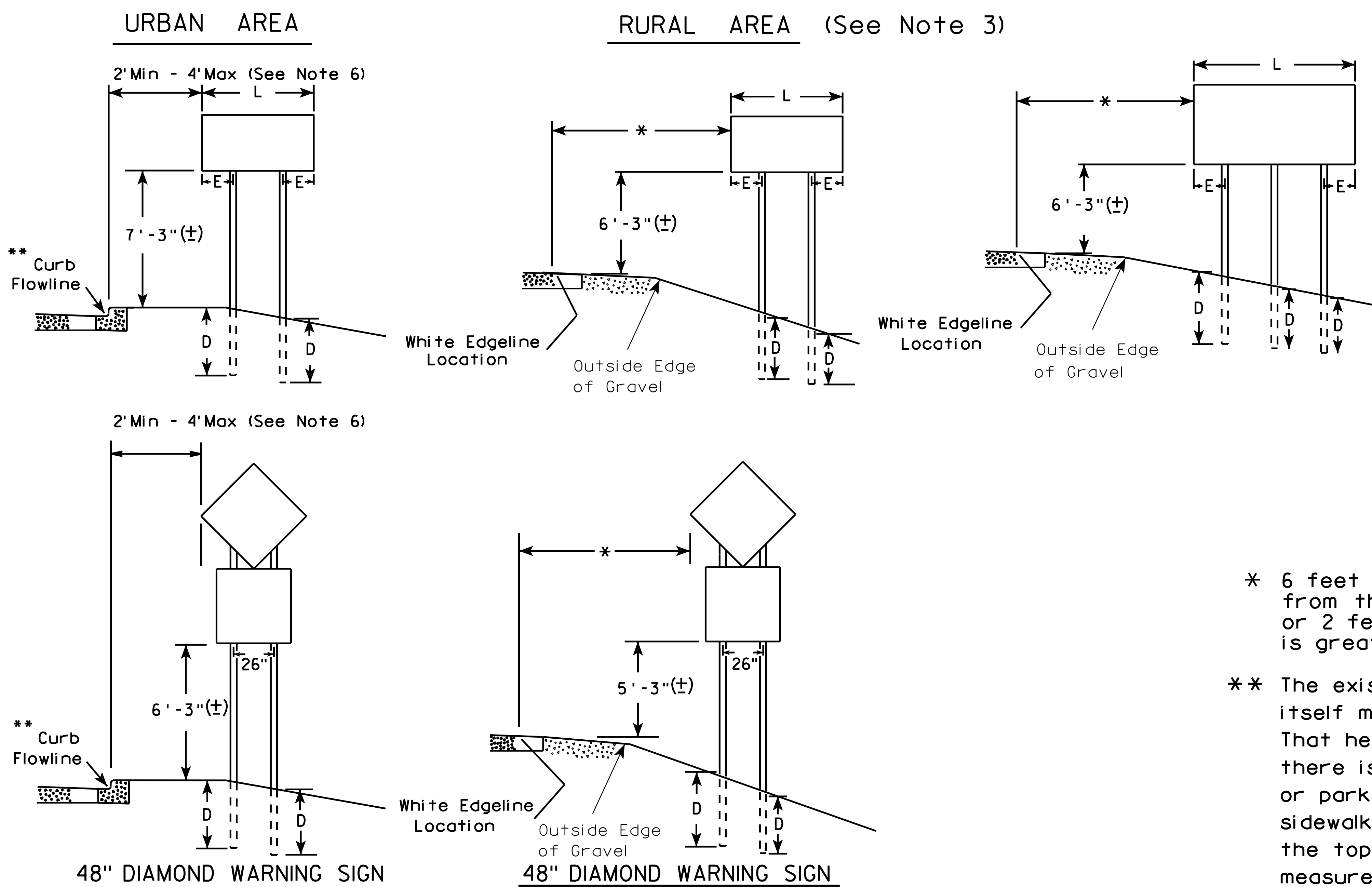
WISCONSIN DEPT OF TRANSPORTATION

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



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

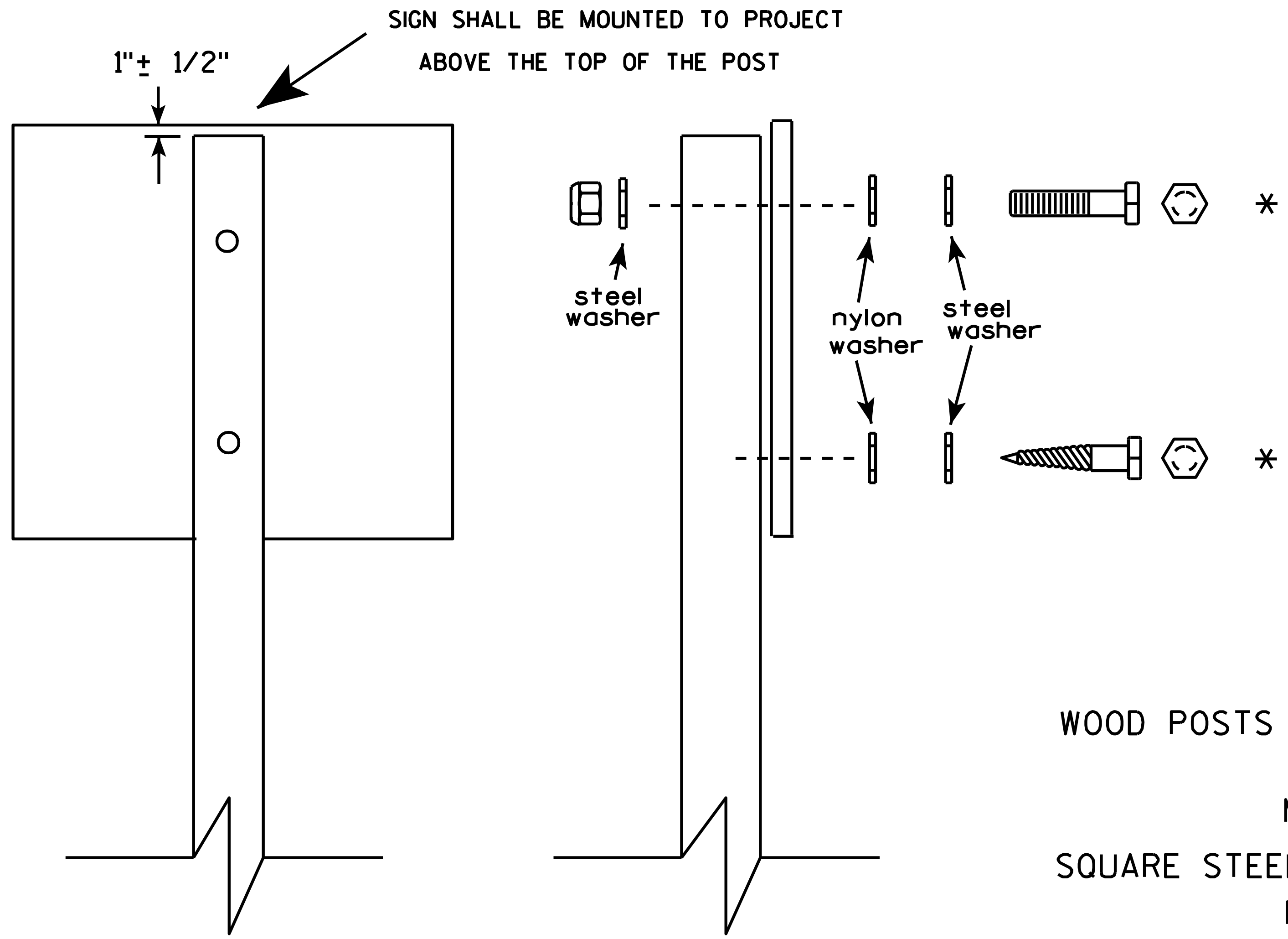
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 7/23/15 PLATE NO. A4-4 14

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\A44.DGN PLOT DATE : 23-JUL-2015 15:23 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : 107.021305:1.000000 WISDOT/CADDS SHEET 42



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

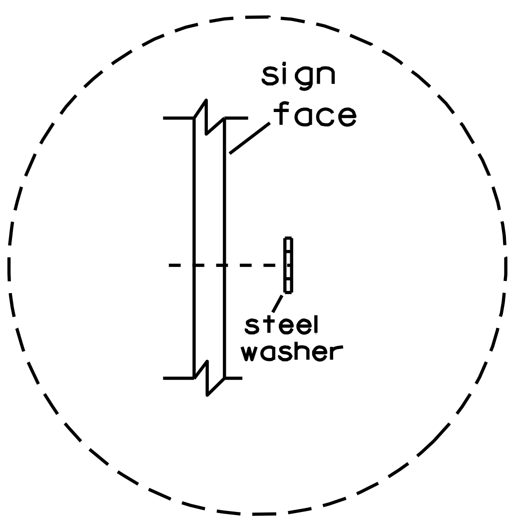
b. Electro-galvanized in accordance with ASTM Designation : B 633, TYPE III, SC 3.

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.

7

7

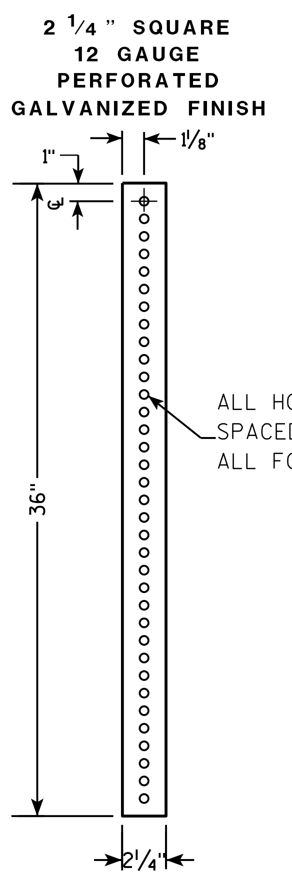
ATTACHMENT OF SIGNS TO POSTS

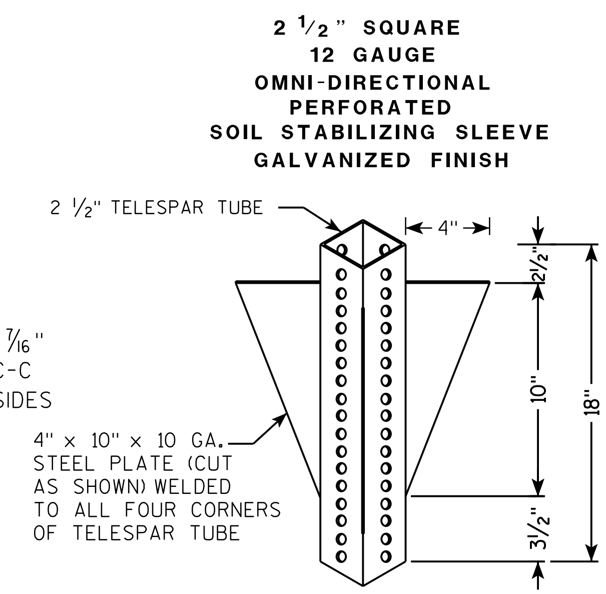
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/23/10 PLATE NO. A4-8.7

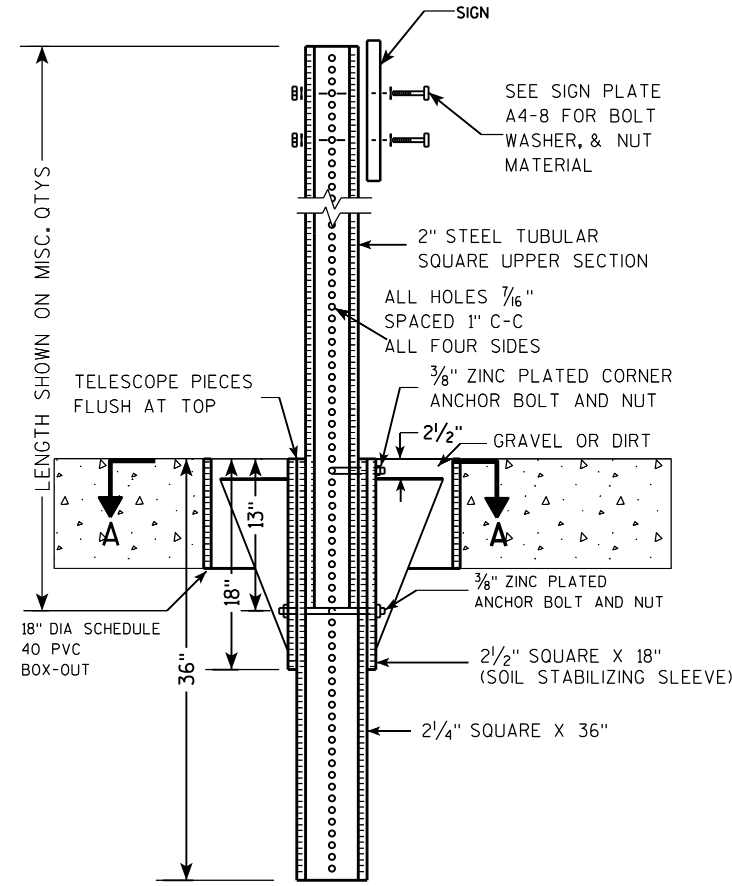
TELESCOPIC TUBING ANCHORS TWO PIECE SYSTEM





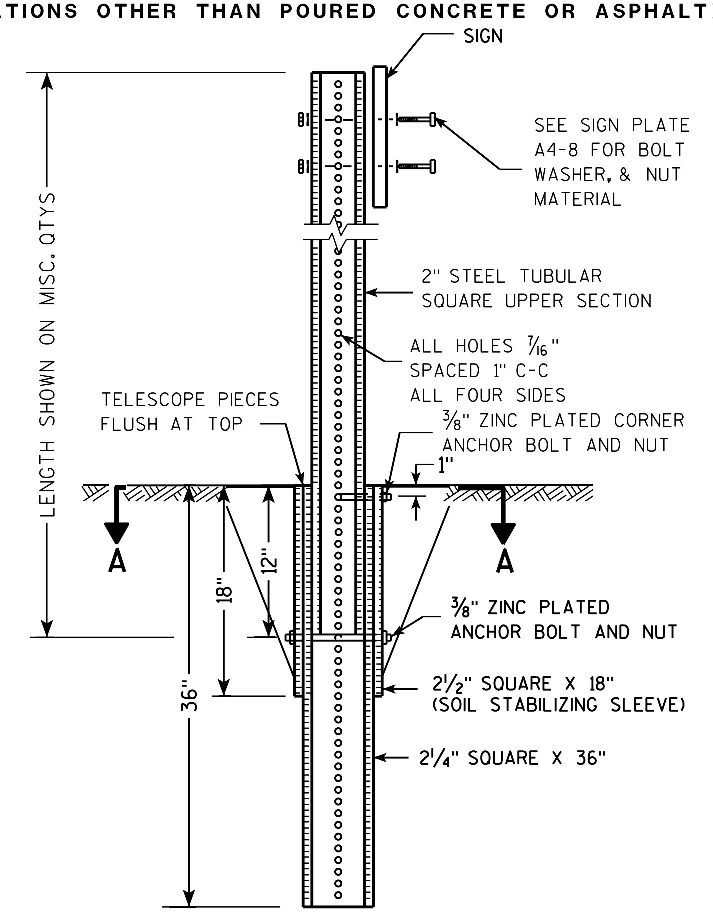
DETAIL OF TUBULAR STEEL SIGN POST

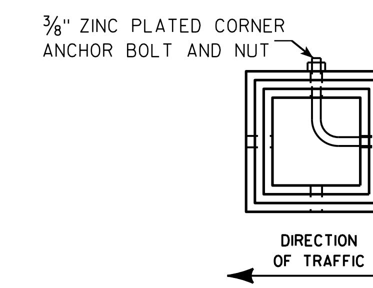
(IN POURED CONCRETE OR ASPHALT)



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 A4-9.9

PROJECT NO: | HWY: | COUNTY: | SHEET NO: | E

7

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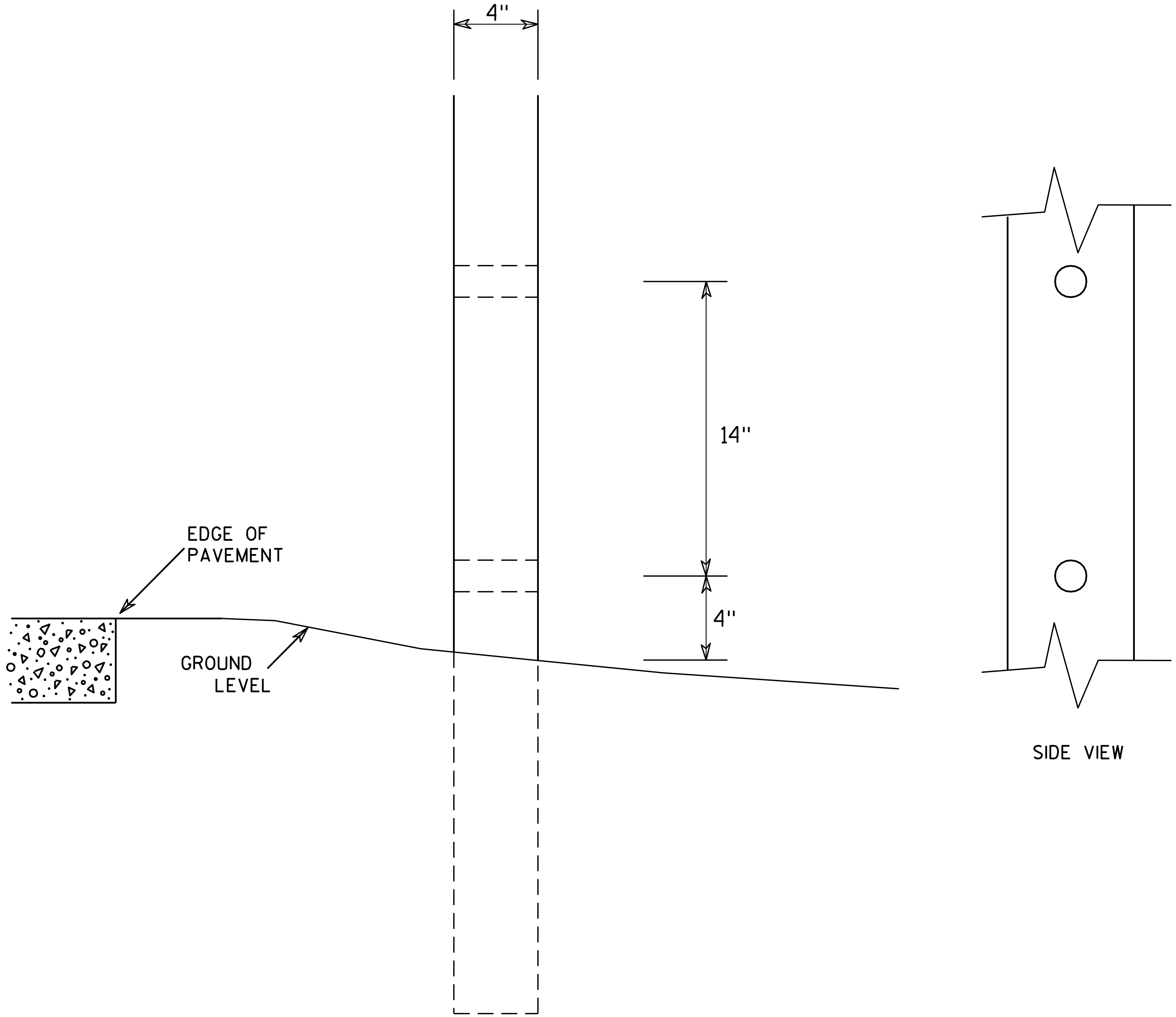


GENERAL NOTES

1. All 4 x 6 Wood Posts shall be modified by having two 1½" diameter holes drilled perpendicular to the roadway centerline.

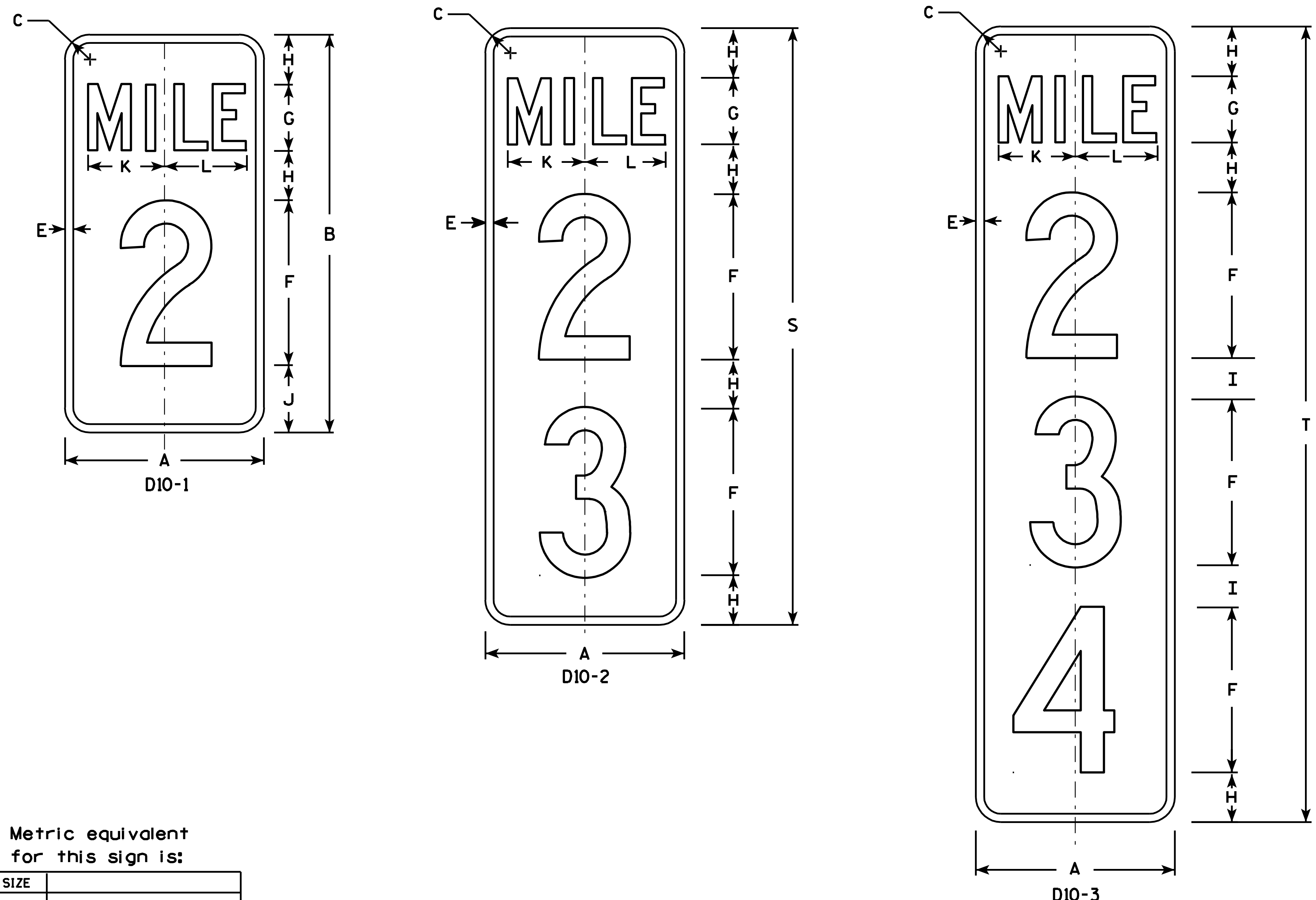
4 X 6 WOOD POST MODIFICATIONS

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: 115 | 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 - Green
   Message - White - Type H Reflective
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. Optically adjust numerals about the centerline of the sign to achieve proper balance.

Metric equivalent for this sign is:

PHY. SIZE	
12 X 24	300 mm X 600 mm
12 X 36	300 mm X 900 mm
12 X 48	300 mm X 1200 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
1																										
2																										
3																										
4	12	24	1 ½		½	10	4	3	2 ½	4	4 ⅝	4 ⅞							36	48						
5	12	24	1 ½		½	10	4	3	2 ½	4	4 ⅝	4 ⅞							36	48						

D10-1	D10-2	D10-3
Area sq. ft.	Area sq. ft.	Area sq. ft.
2.0	3.0	4.0
Area m2	Area m2	Area m2
.19	.28	.38

STANDARD SIGN
D10-1 , D10-2 & D10-3

WISCONSIN DEPT OF TRANSPORTATION

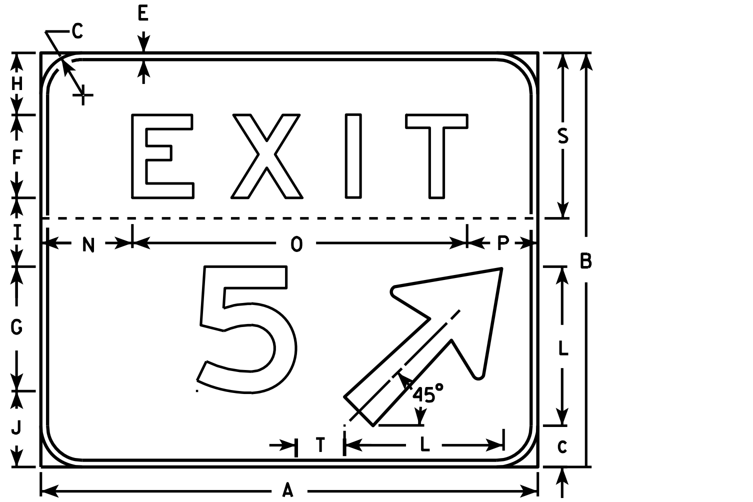
APPROVED Chester J Spang
for Director, Office of Traffic

DATE 1/16/02 PLATE NO. D10-3.2

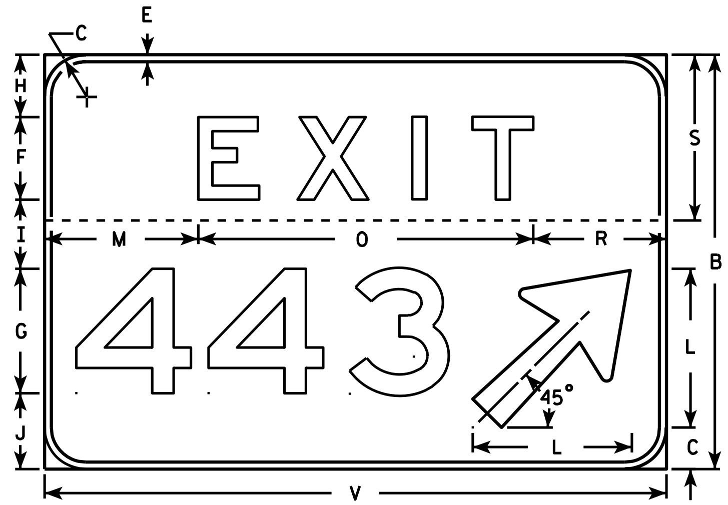
7

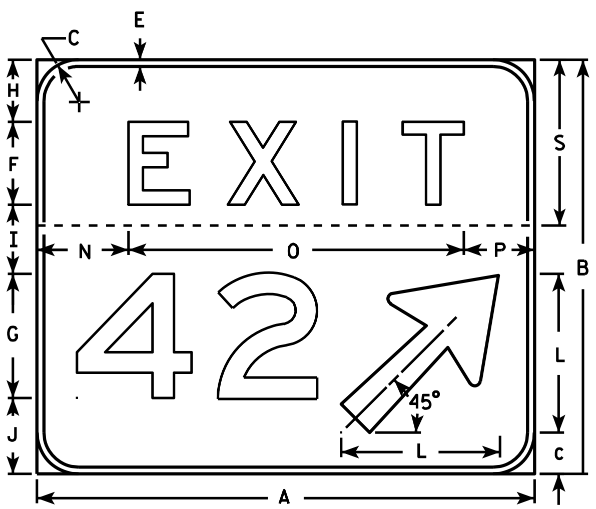
PROJECT NO:

FILE NAME : C:\Users\Projects\tr_stdplate\D103.DGN PLOT DATE : 28-SEP-2005 08:20 PLOT BY : DOTDZK



NOTE: T diminision shall be measured from the back of the number to the front of the arrow





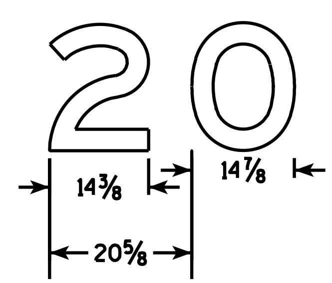
NOTES

1. Sign is Type II - Type H reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Green
   Message - White (Type H reflective)
3. Message Series - E
4. Corners may be square or rounded but the border shall be rounded as shown.
5. Base material for this sign shall be plywood and shall be split into two seperate pieces as shown on each detail by the dashed line (-----------).
6. Arrow is Type "A" from sign plate A1-1.
7. Substitute appropriate message, space per the table and adjust placement on sign to achieve proper balance.
8. As per the Standard Spec's, these signs shall not have a vertical joint.

SPACING CHART FOR 18" NUMERALS

NUMBERS	WIDTH	0	1	2	3	4	5	6	7	8	9	A	B	C
0	14 7/8	21 5/8	21 5/8	21 1/4	20 3/8	21 1/4	21 1/4	21 5/8	19 7/8	22 1/8	21 5/8			
1	5 7/8	14	14	14	13 1/8	12 1/8	14	14	12 1/4	14	14			
2	14 3/8	20 5/8	21 1/8	20 5/8	19 3/4	20 1/4	20 5/8	20 5/8	18 7/8	21 1/8	20 5/8			
3	14 3/8	20 3/4	21 1/8	20 3/4	20 1/4	19 3/4	20 3/4	20 3/4	19 3/8	21 1/8	20 3/4			
4	16 5/8	22 7/8	22	22 1/2	21 5/8	21 5/8	22 7/8	22 7/8	20 5/8	23 3/8	22 7/8			
5	14 1/4	20 5/8	20 5/8	20 1/8	18 3/4	18 3/4	20 5/8	20 5/8	18 3/8	20 5/8	20 5/8			
6	14 1/2	21 1/4	20 3/4	20 3/4	19 7/8	19 1/2	20 3/8	20 3/4	19	20 3/4	20 3/8			
7	14 3/8	19 3/4	19 3/4	20 1/4	19 3/4	17	19 3/4	20 5/8	18 7/8	20 5/8	19 3/4			
8	14 1/4	21 1/2	21 1/2	20 5/8	19 1/4	19 3/4	20 5/8	21 1/2	19 5/8	21 1/2	20 5/8			
9	14 1/2	21 1/4	21 1/4	20 7/8	20	20 7/8	20 7/8	21 1/4	19 1/2	21 3/4	21 1/4			
A	18	19 3/4	19 3/4	20 1/4	19 3/4	17	19 3/4	20 5/8	18 7/8	20 5/8	19 3/4	21 5/8	23 7/8	23
B	14 1/4	21 1/2	21 1/2	20 5/8	19 1/4	19 3/4	20 5/8	21 1/2	19 5/8	21 1/2	20 5/8	19 1/2	22 3/8	21 1/2
C	14 1/4	21 1/4	21 1/4	20 7/8	20	20 7/8	20 7/8	21 1/4	19 1/2	21 3/4	21 1/4	18 3/8	21	19 3/4

EXAMPLE FOR USING SPACING CHART



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
2																										
3																										
4																										
5	72	60	6		1	12	18	9	10	11	8 7/8	23	22 1/4	13 1/4	48 1/2	10 1/4		19 1/4	24	7		90		96	7 1/2	

1-2 Digit Bld Area	3 Digit Bld Area
Sq. Ft.	
30	37.5

STANDARD SIGN
E5-1A

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

DATE 5/11/10 PLATE NO. E5-1A.12

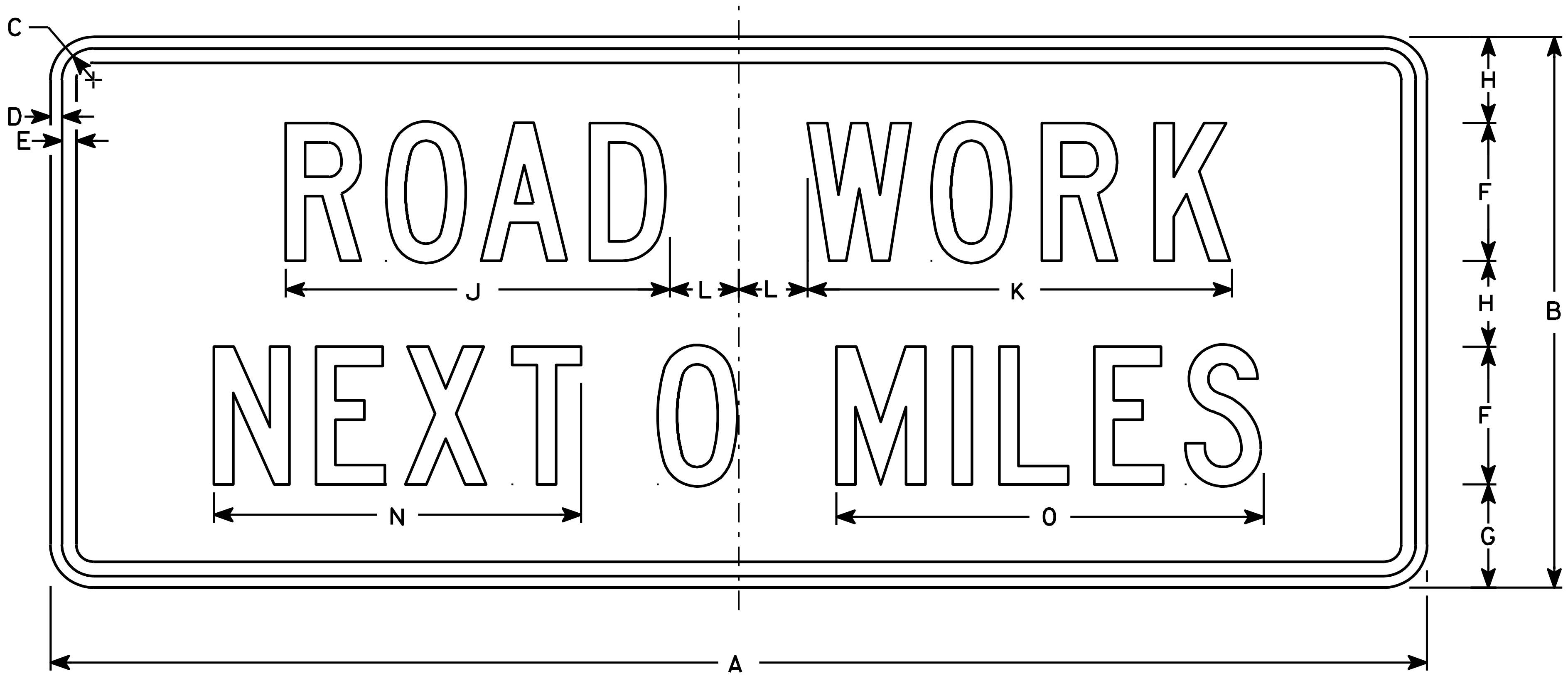
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 117 | E

7

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 - 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



G20-1

7

7

Metric equivalent for this sign is:

SIZE	
1	
2	1500 mm X 600 mm
3	
4	1500 mm X 600 mm
5	

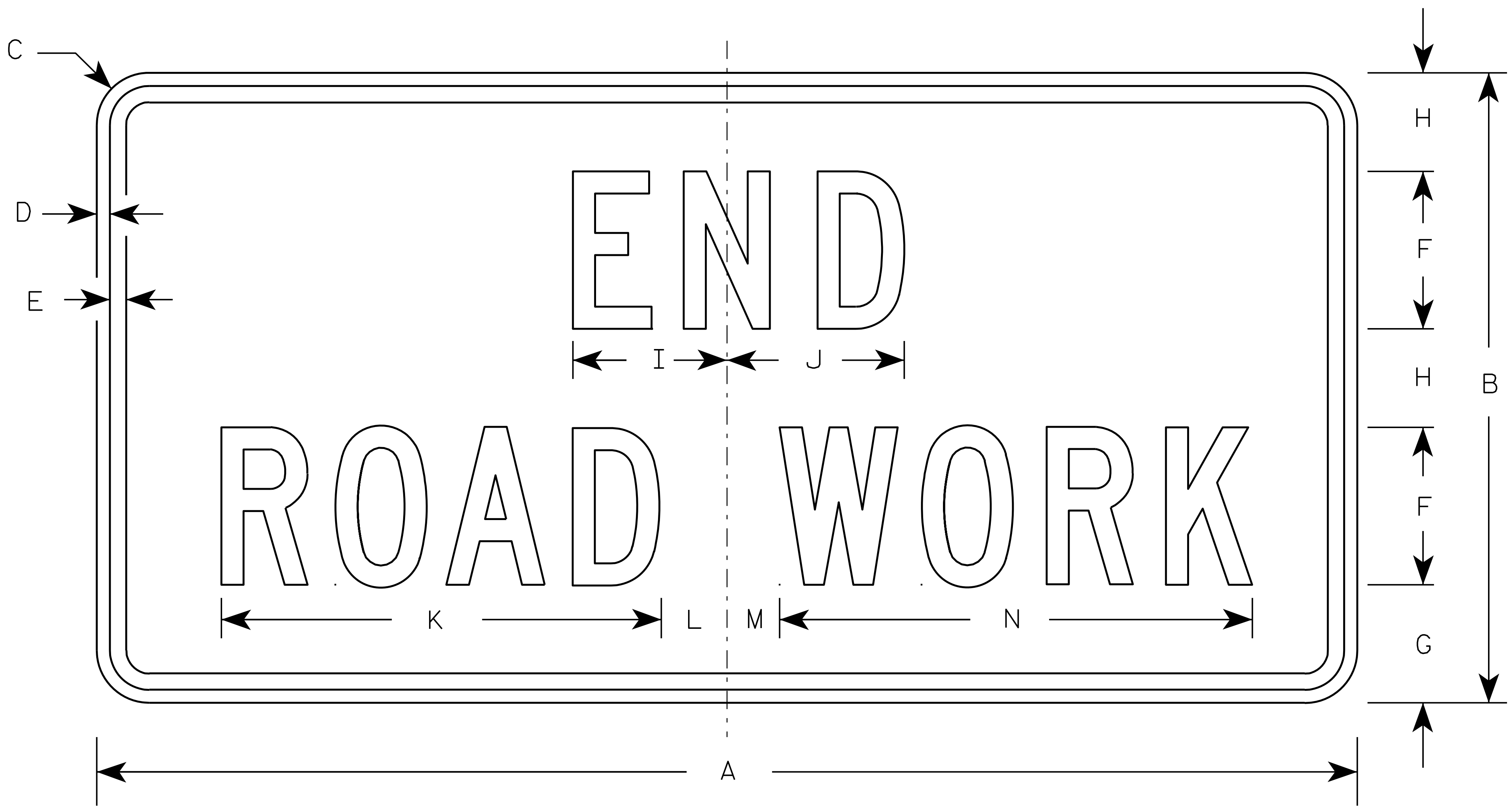
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.	Area m2
1																												
2	60	24	1 3/8	1/2	5/8	6	4 1/2	3 3/4		16 3/4	18 1/2	3		16	18 5/8												10	.90
3																												
4	60	24	1 3/8	1/2	5/8	6	4 1/2	3 3/4		16 3/4	18 1/2	3		16	18 5/8												10	.90
5																												

STANDARD SIGN
G20-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED [signature] for State Traffic Engineer

DATE 4/8/97 PLATE NO. G20-1.7



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.

7

7

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

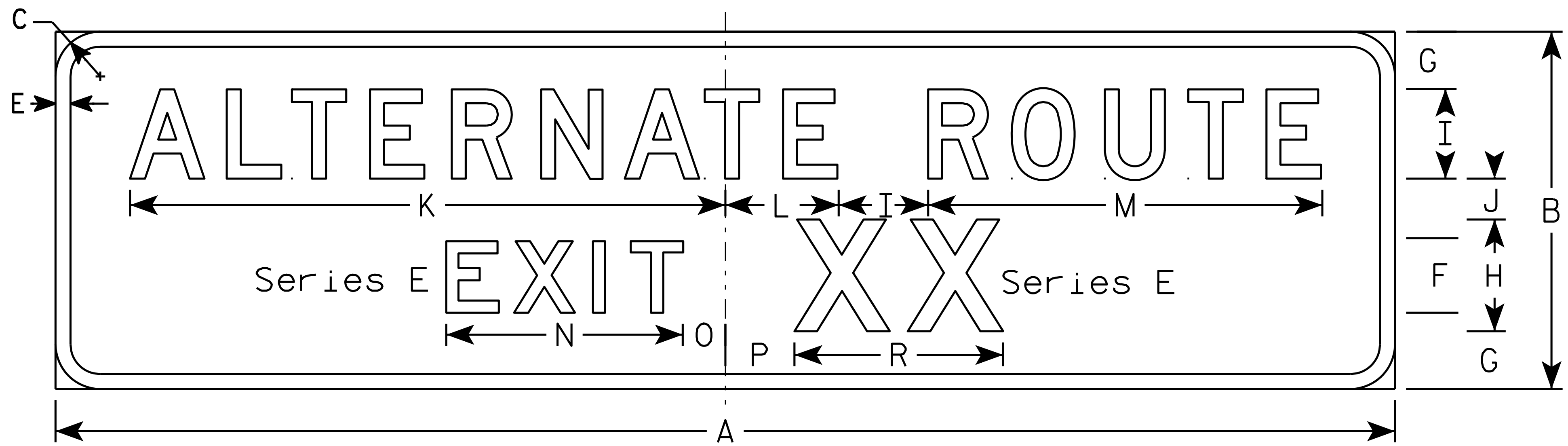
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 9/30/09 PLATE NO. G20-2A.8

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 119 | 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 - Orange
   Message - Black
3. Message Series - D except as noted
4. Substitute appropriate numeral and adjust spacing to achieve proper balance.



G20-54

Metric equivalent for this sign is:

SIZE	
1	
2	
3	
4	4500 mm X 1200 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																												
3																												
4	180	48	6		2	10	7 3/4	15	12	5 1/2	80	15 1/4	53	31 3/4	5 3/4	9 1/4		28									60.0	5.4
5																												

STANDARD SIGN
G20-54

WISCONSIN DEPT OF TRANSPORTATION

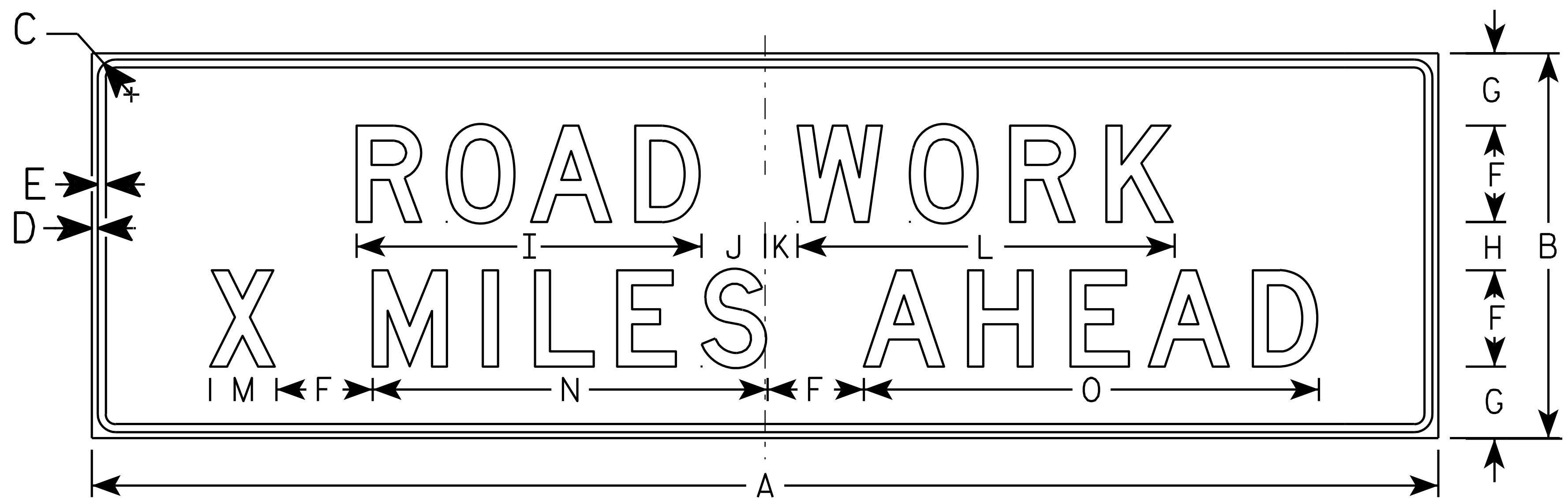
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 9/30/09 PLATE NO. G20-54.2

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 120 | 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 - Orange
   Message - Black
3. Message Series - D
4. Substitute appropriate numeral and adjust spacing to achieve proper balance.



G20-55

Metric equivalent for this sign is:

SIZE	
1	
2	
3	
4	2550 mm X 900 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																												
3																												
4	84	24	1 1/8	3/8	1/2	6	4 1/2	3	21 1/2	4	2	23 1/2	4 1/8	24 5/8	28 3/8												25.5	2.30
5																												

STANDARD SIGN
G20-55

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

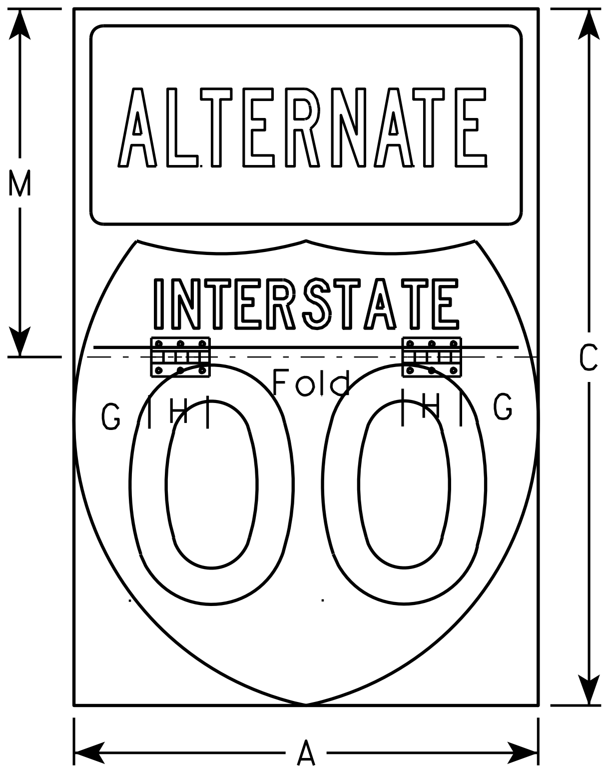
DATE 9/30/09 PLATE NO. G20-55.2

7

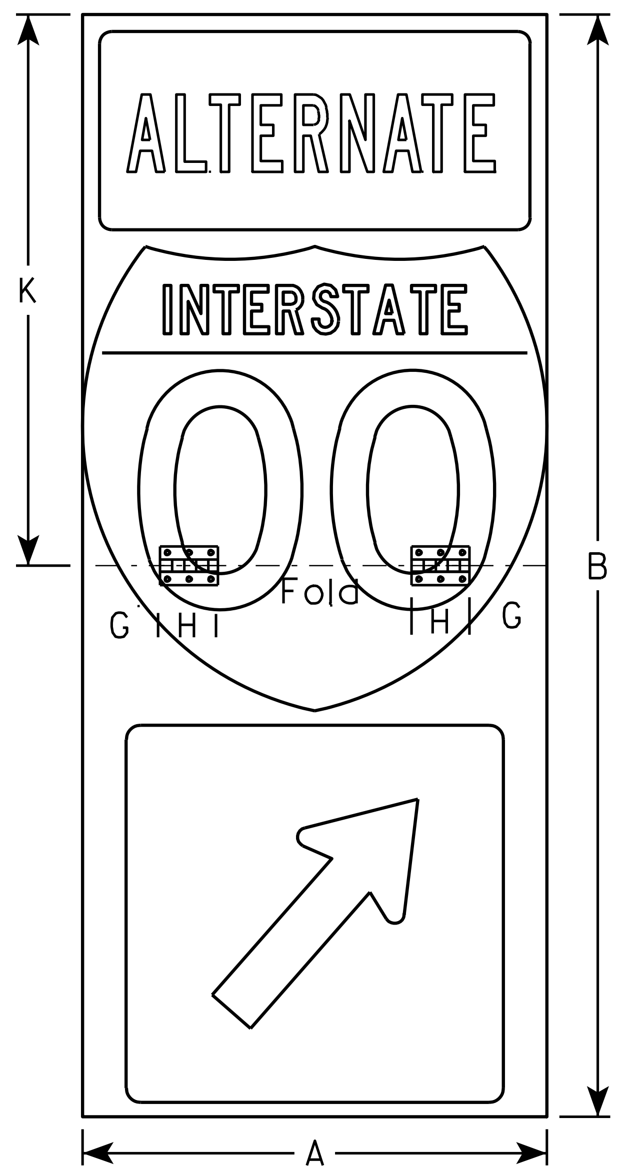
7

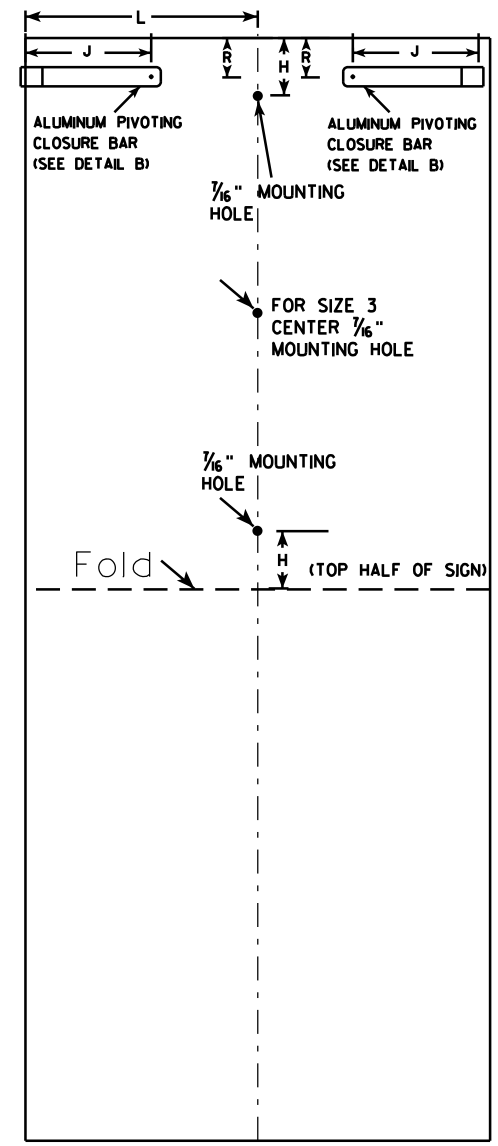
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 121 | E

FILE NAME : C:\Users\PROJECTS\tr_stdplate\G2055.DGN PLOT DATE : 30-SEP-2009 09:40 PLOT BY : ditjph PLOT NAME : PLOT SCALE : 10.558678:1.000000 WISDOT/CADDS SHEET 42



SIZE	Area sq. ft.
1	
2	6.0
3	13.5



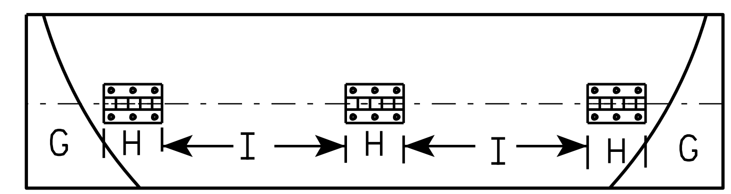


(BACK VIEW)

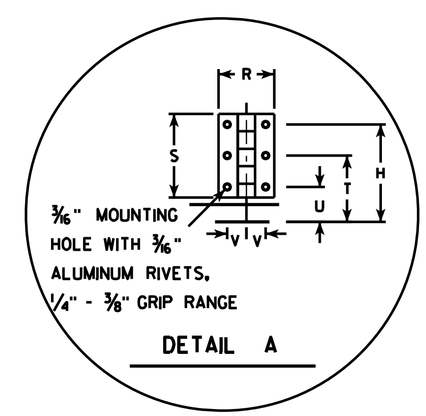
NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - *
   Message - *
3. Message Series - C
4. Sign Base Material shall be aluminum and borders shall be rounded.
5. All hardware used on the folding sign installation shall conform to 637.2.4 of the WIS DOT Standard Specification.
6. Size 3 shall have 3 hinges see detail below

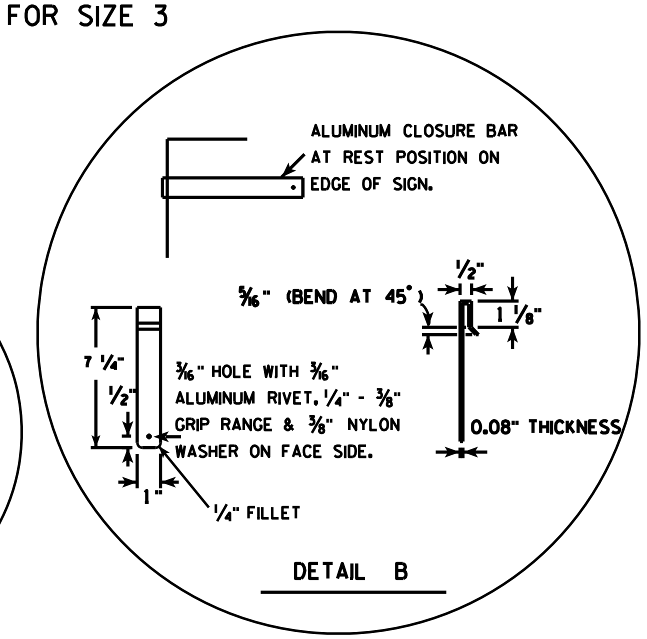
* See Appropriate Route Shield, Cardinals, Arrow, and A2-1S Sign Plates.



HINGE PLACEMENT FOR SIZE 3



DETAIL A



DETAIL B

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																											
2	24	57	36				4	3		6 1/2	28 1/2	12	18					2	3	2 5/8	1 1/4	11/16					9.5
3	36	81	54				4	3	9 1/2	6 1/2	40 1/2	18	27					2	3	2 5/8	1 1/4	11/16					20.25
4																											
5																											

STANDARD SIGN
JV-F

WISCONSIN DEPT OF TRANSPORTATION

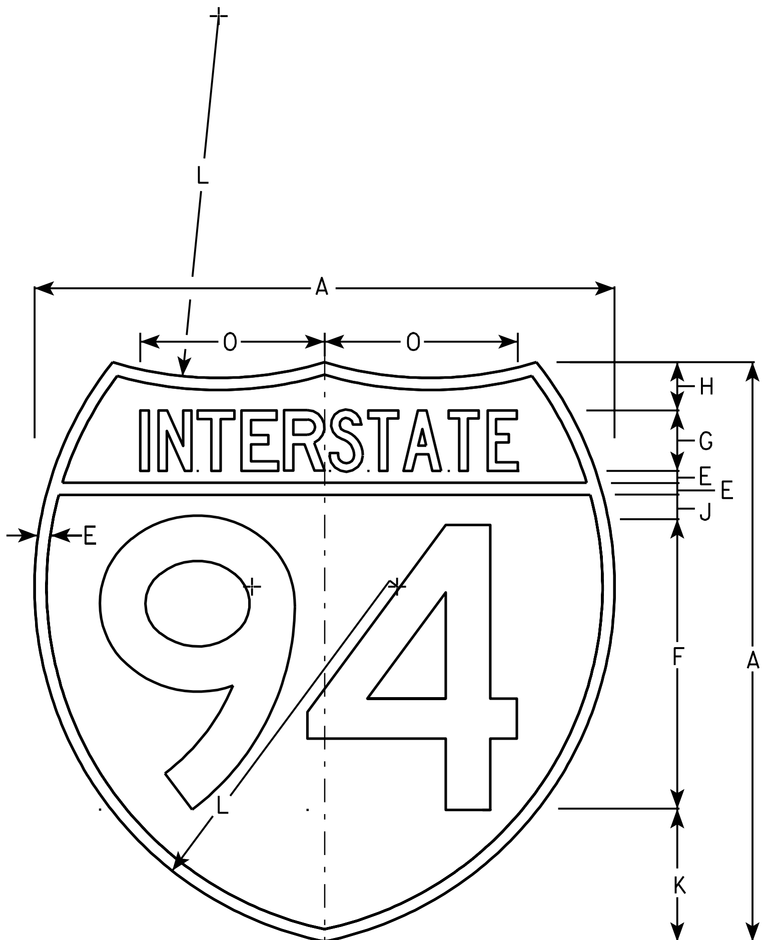
APPROVED Matthew R Rauch for State Traffic Engineer

DATE 8/17/12 PLATE NO. JV-F.2

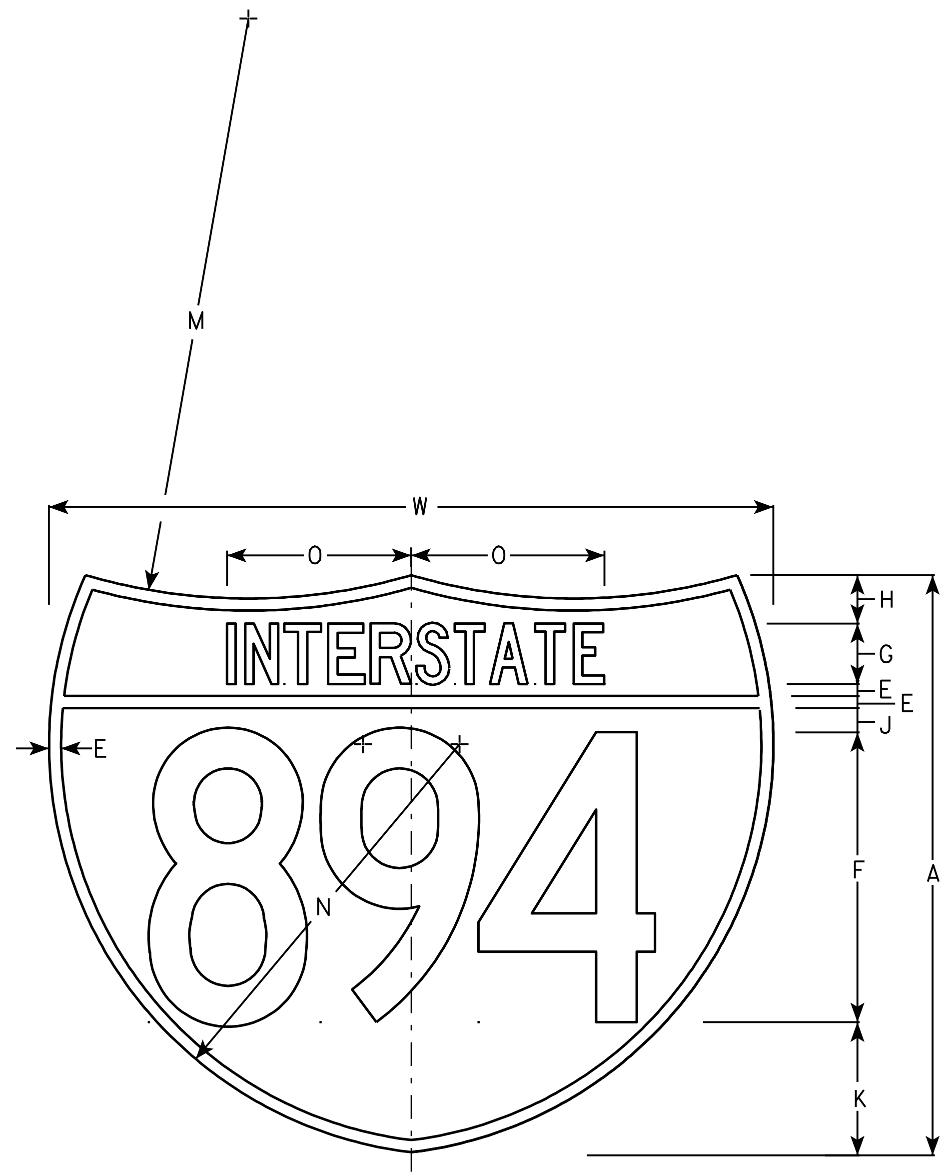
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 122 | E

7

7



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

7

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

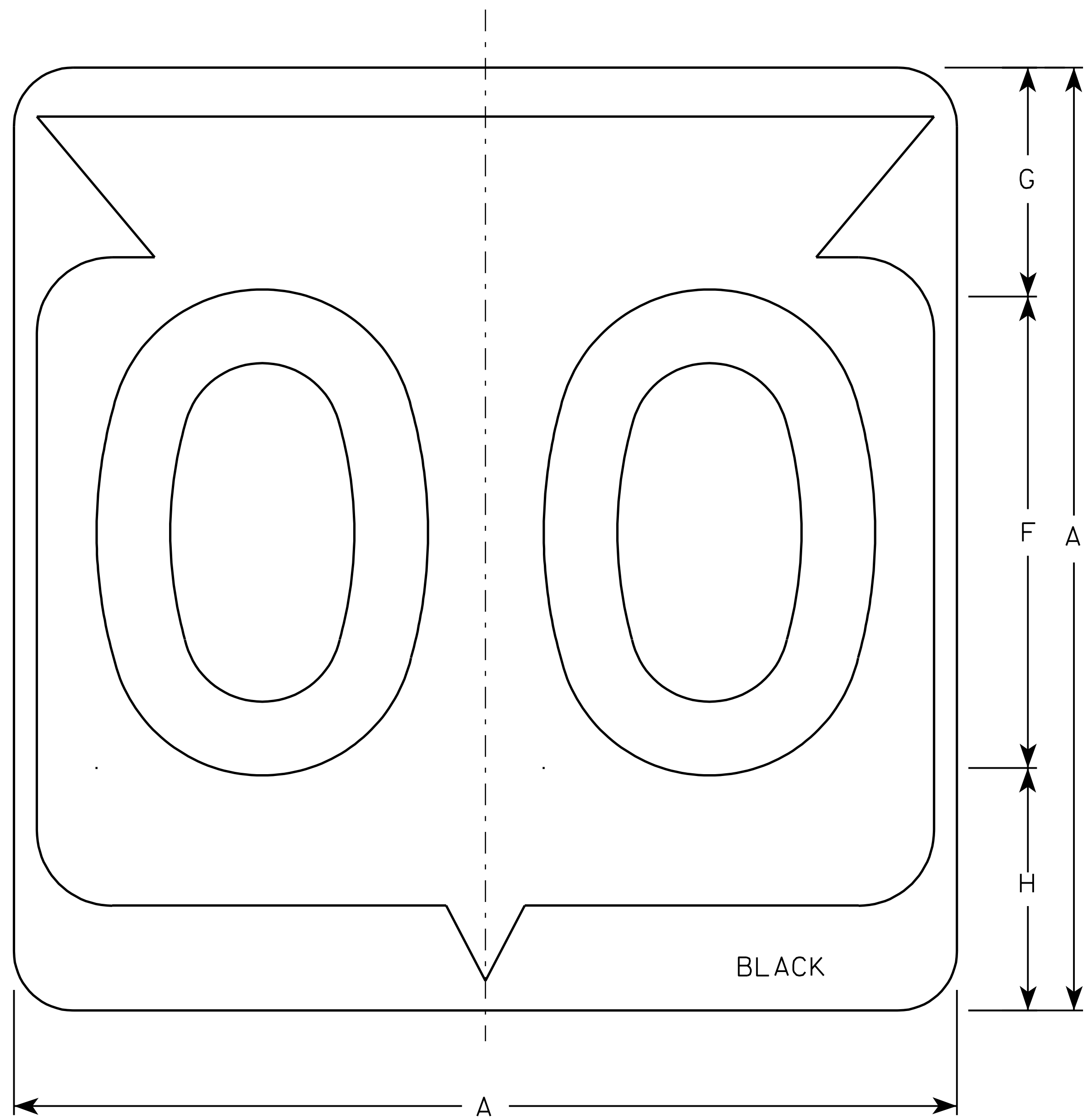
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 08/23/05 PLATE NO. M1-1.8

7

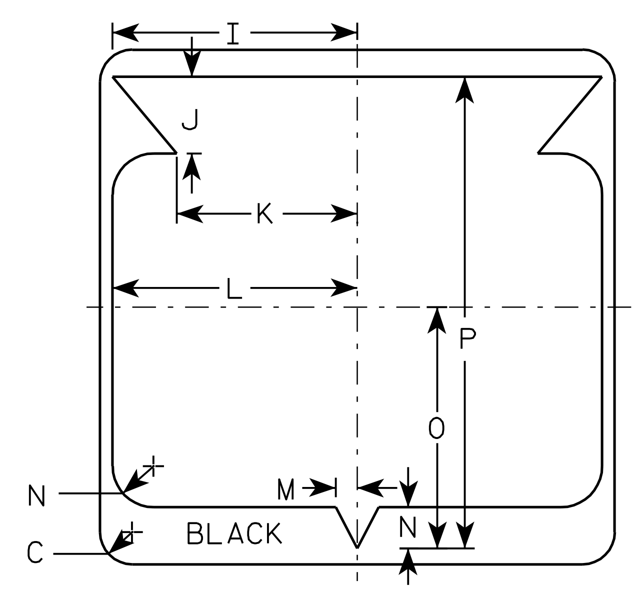
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 123 | E



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

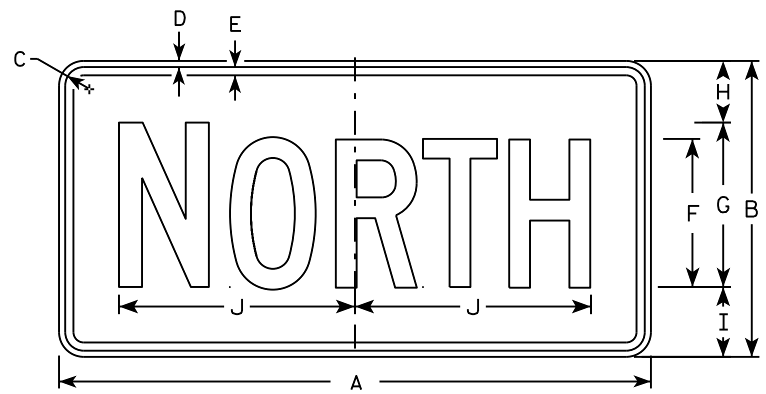
STATE ROUTE MARKER
M1-6 FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

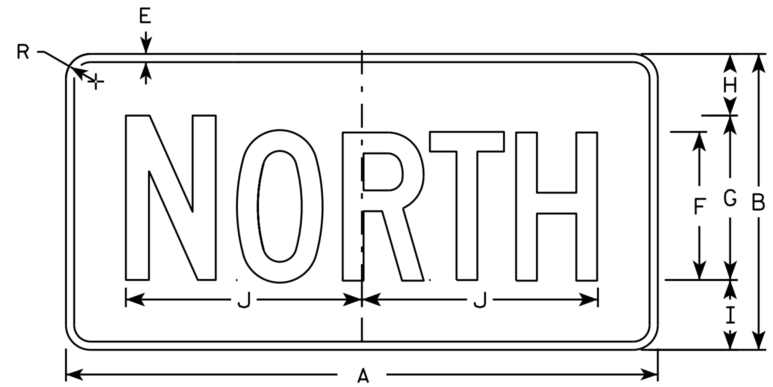
APPROVED Chester J Spang
for State Traffic Engineer

DATE 3/20/02 PLATE NO. M1-6.9

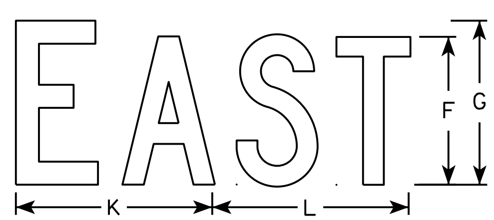
7 7



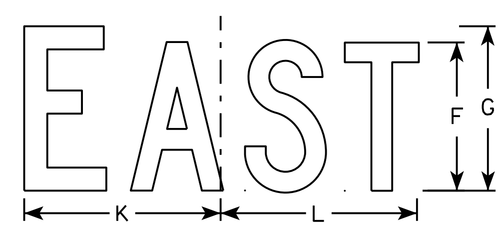
M3-1
MM3-1
MP3-1



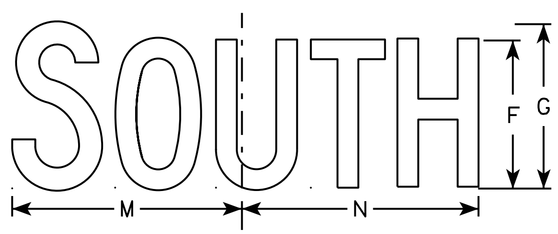
MB3-1
MK3-1
MN3-1



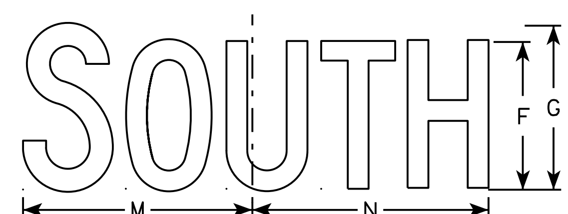
M3-2
MM3-2
MP3-2



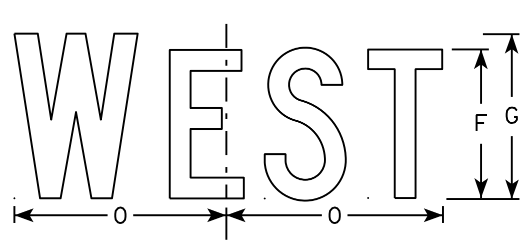
MB3-2
MK3-2
MN3-2



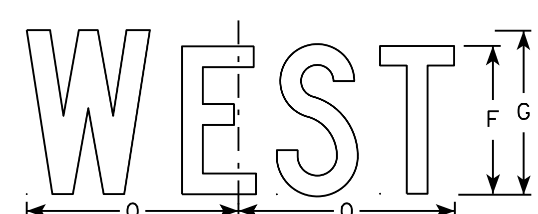
M3-3
MM3-3
MP3-3



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

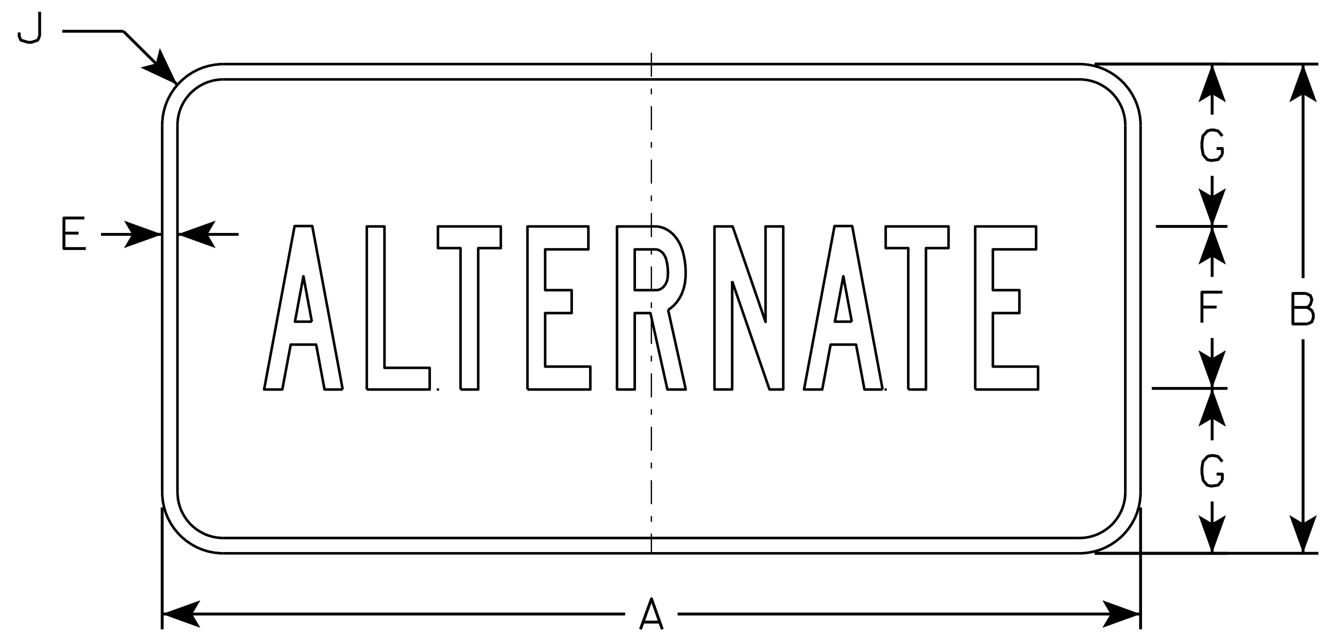
STANDARD SIGNS
M3-1 thur M3-4
SERIES

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE NO. M3-1.14

M4 - 1
MO4 - 1



MB4 - 1

NOTES

1. Sign is Type II - Type H except as Shown
2. Color:
   Background - See Note 5
   Message - See note 5
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.
5. M4-1 Background - White
   Message - Black

   MB4-1 Background - Blue
   Message - White

   MO4-1 Background - Orange - Type F
   Message - Black

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	4	4	9 3/4	9 1/2	1 1/2																	2.00
3	36	18	1 1/8	3/8	1/2	7	5 1/2	16 3/8	16 1/2	1 1/2																	4.5
4	36	18	1 1/8	3/8	1/2	7	5 1/2	16 3/8	16 1/2	1 1/2																	4.5
5	36	18	1 1/8	3/8	1/2	7	5 1/2	16 3/8	16 1/2	1 1/2																	4.5

STANDARD SIGN
M4 - 1

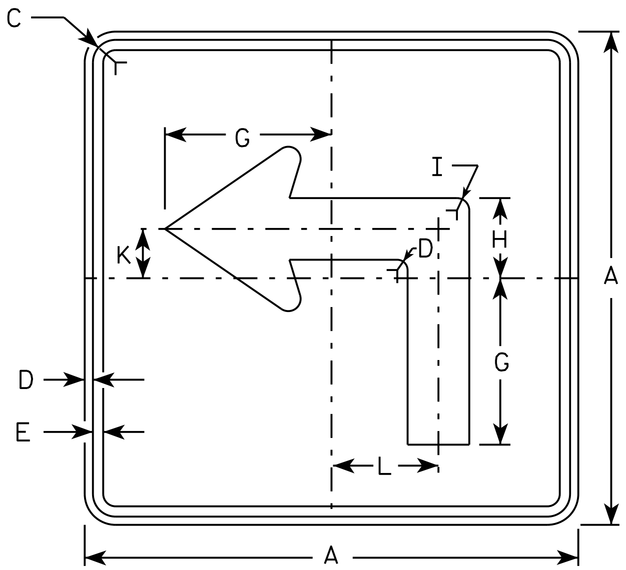
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

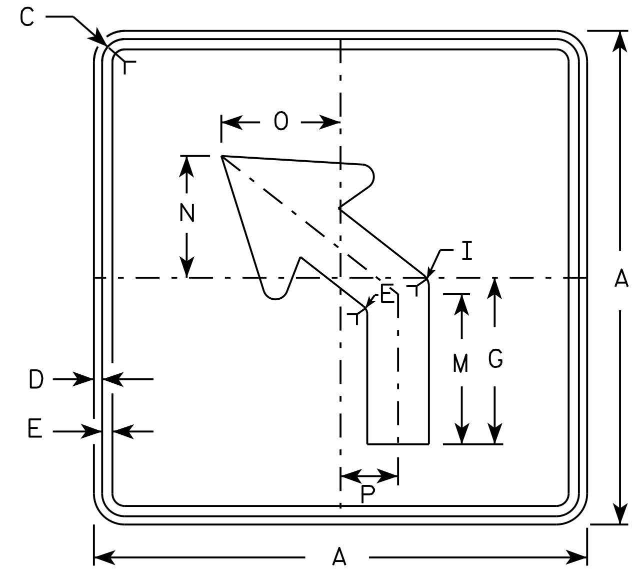
DATE 6/30/14 PLATE M4-1.8

PROJECT NO: | HWY: | COUNTY: | SHEET NO: | E

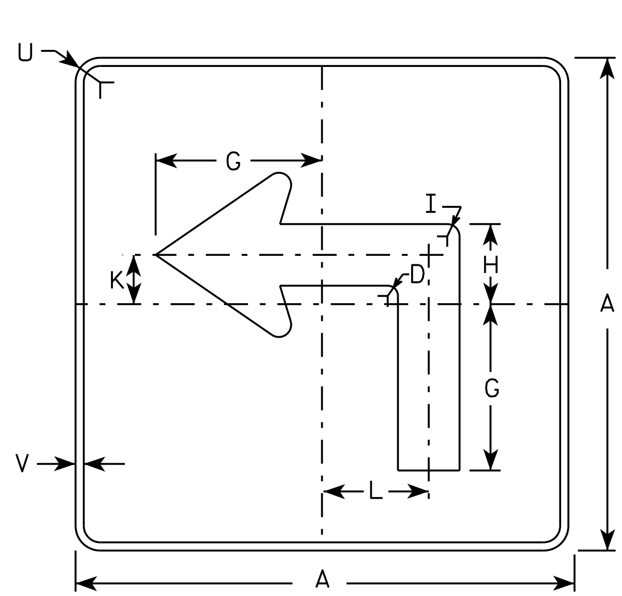
7 7



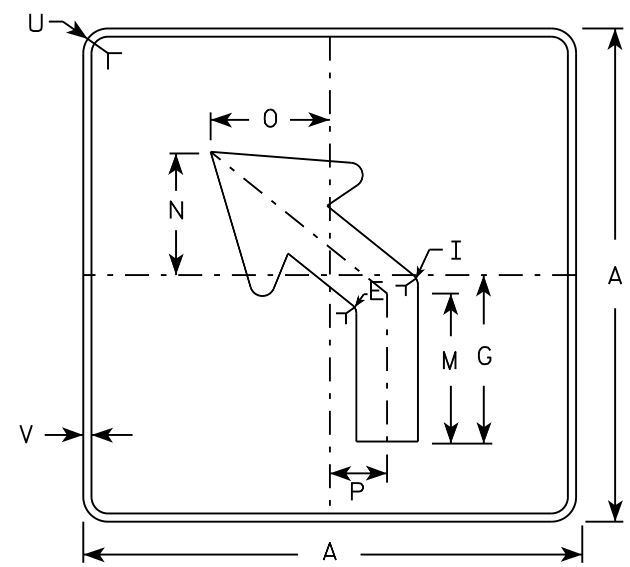
M5-1L
MM5-1L
MO5-1L
MP5-1L



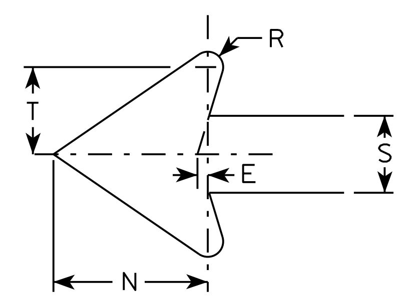
M5-2L
MM5-2L
MO5-2L
MP5-2L



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

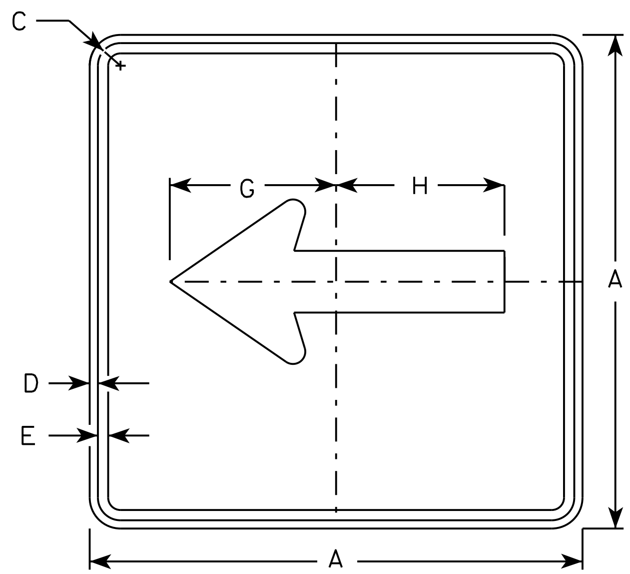
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE NO. M5-1.13

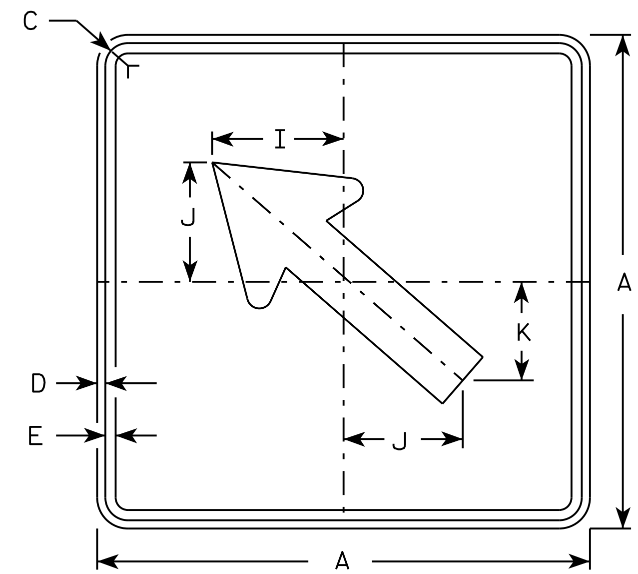
7

PROJECT NO: HWY: COUNTY: SHEET NO: E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\M51.DGN PLOT DATE : 01-DEC-2015 18:07 PLOT BY : $$ plotuser $$ PLOT NAME : PLOT SCALE : 11.675051:1.000000



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

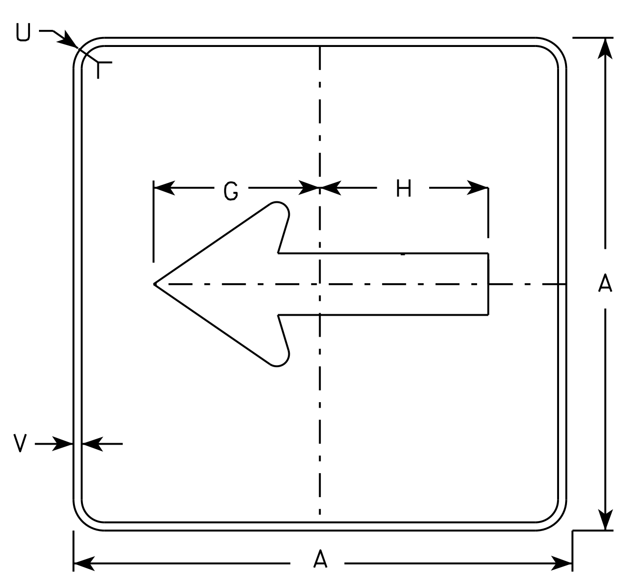
   MM6-1 and MM6-2 Background - White
   Message - Green

   MN6-1 and MN6-2 Background - Brown
   Message - White

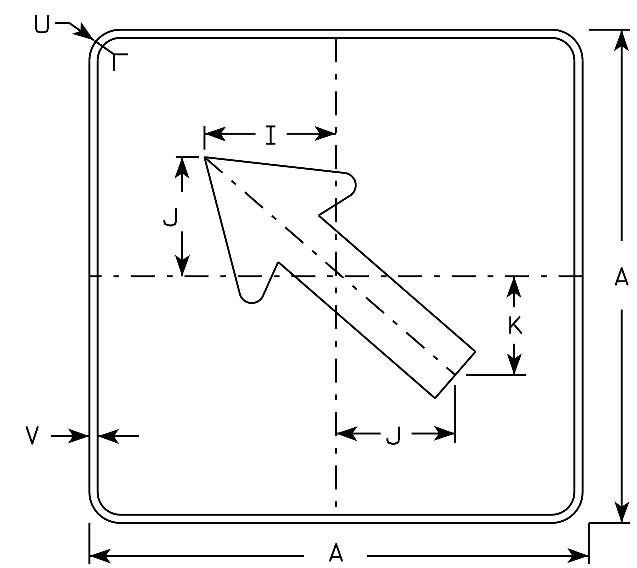
   MO6-1 and MO6-2 Background - Orange - Type F Reflective
   Message - Black

   MP6-1 and MP6-2 Background - White
   Message - Blue

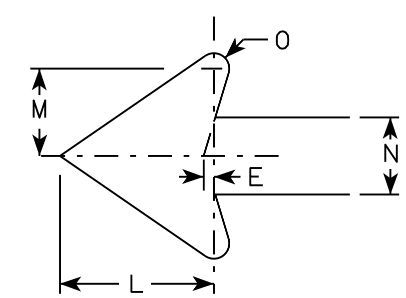
   MR6-1 and MR6-2 Background - Brown
   Message - Yellow



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

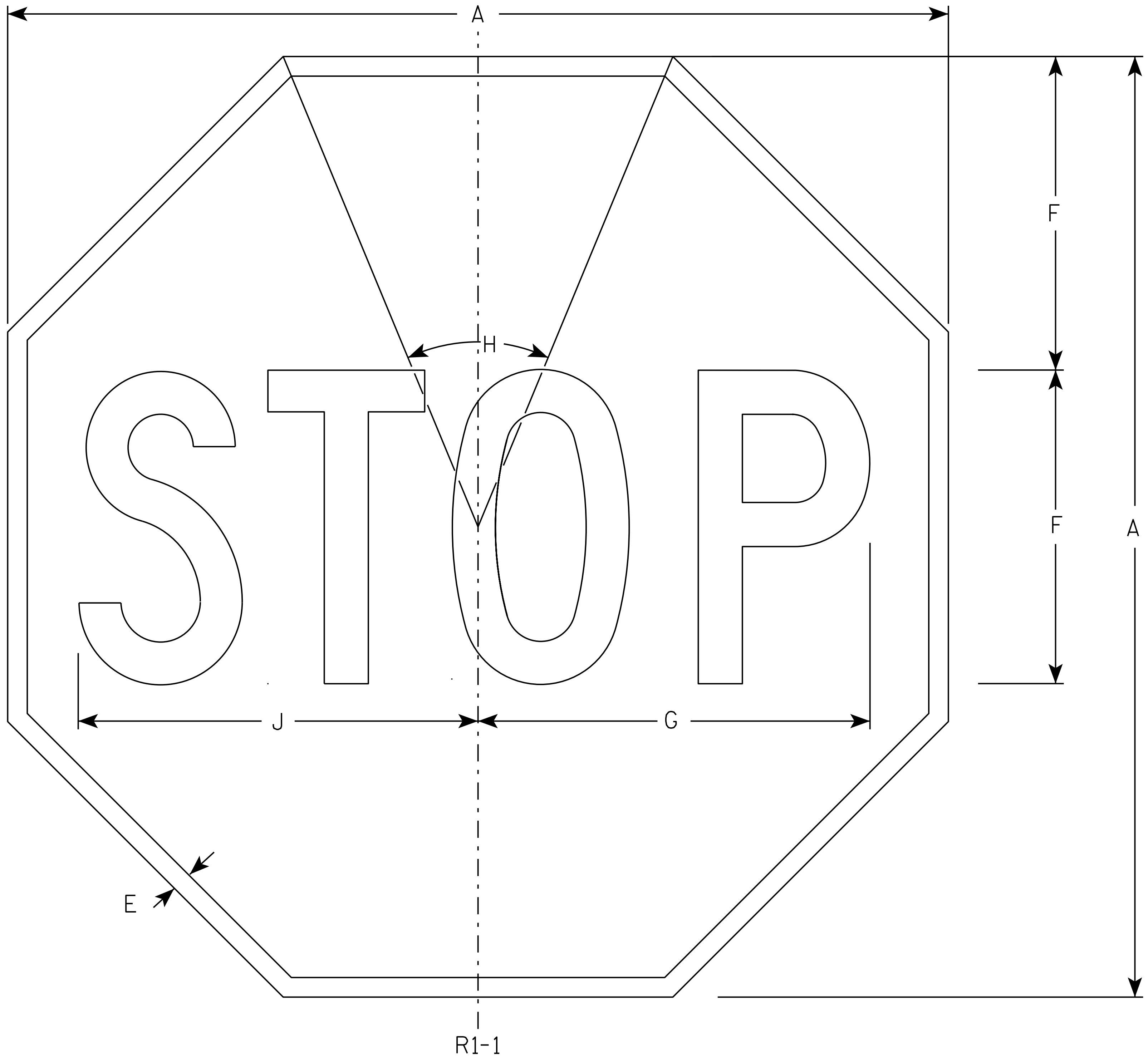
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE M6-1.15

PROJECT NO: HWY: COUNTY: SHEET NO: E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\M61.DGN PLOT DATE : 01-DEC-2015 17:57 PLOT BY : $$ plotuser $$ PLOT NAME : PLOT SCALE : 11.675051:1.000000



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	30				5/8	10	12 1/2	45°		12 3/4																	5.18
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

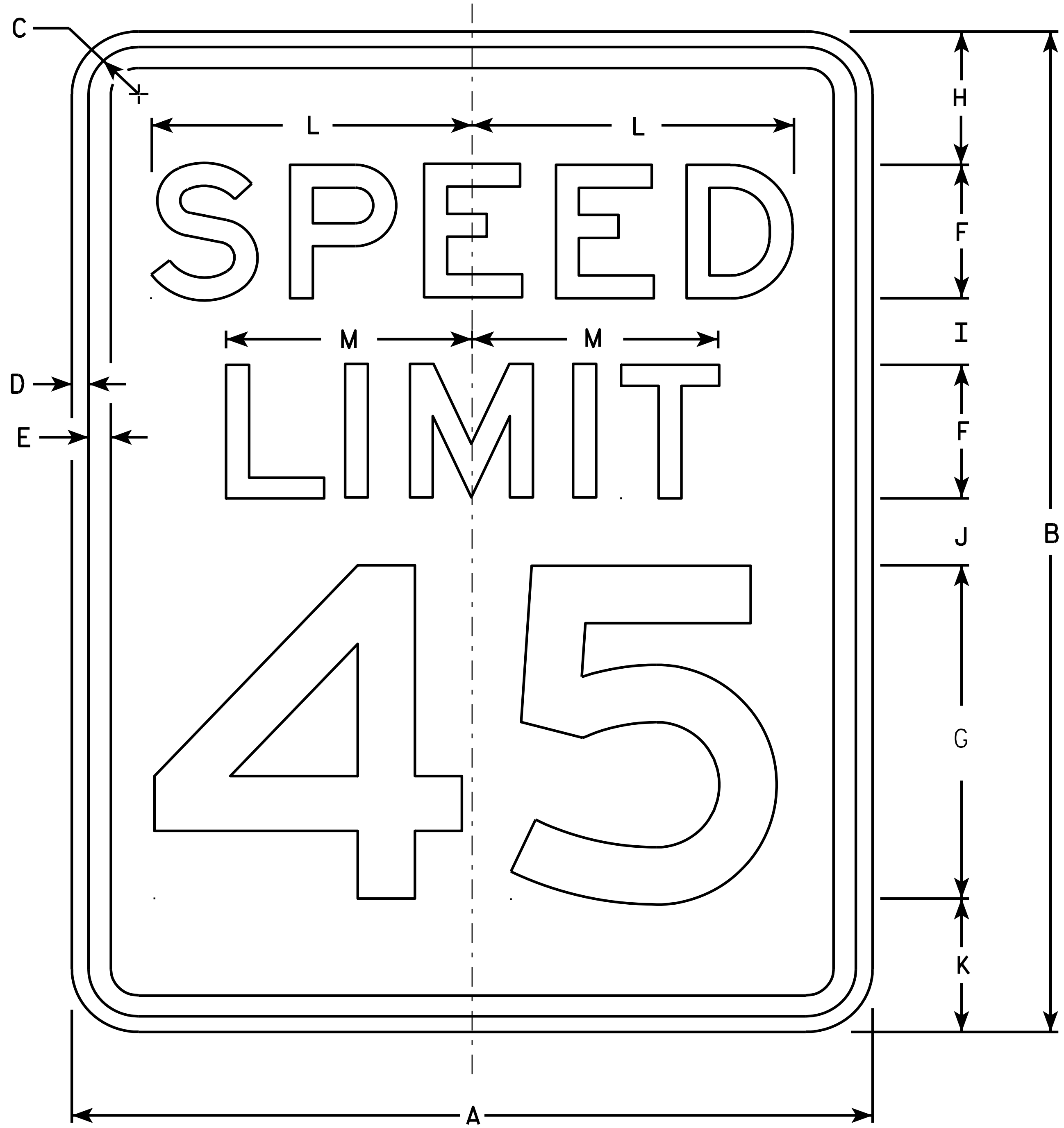
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/12/15 PLATE NO. R1-1.13

PROJECT NO: HWY: COUNTY: SHEET NO: E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\R11.DGN PLOT DATE : 01-DEC-2015 18:07 PLOT BY : $$ plotuser $$ PLOT NAME : PLOT SCALE : 4.378143:1.000000



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

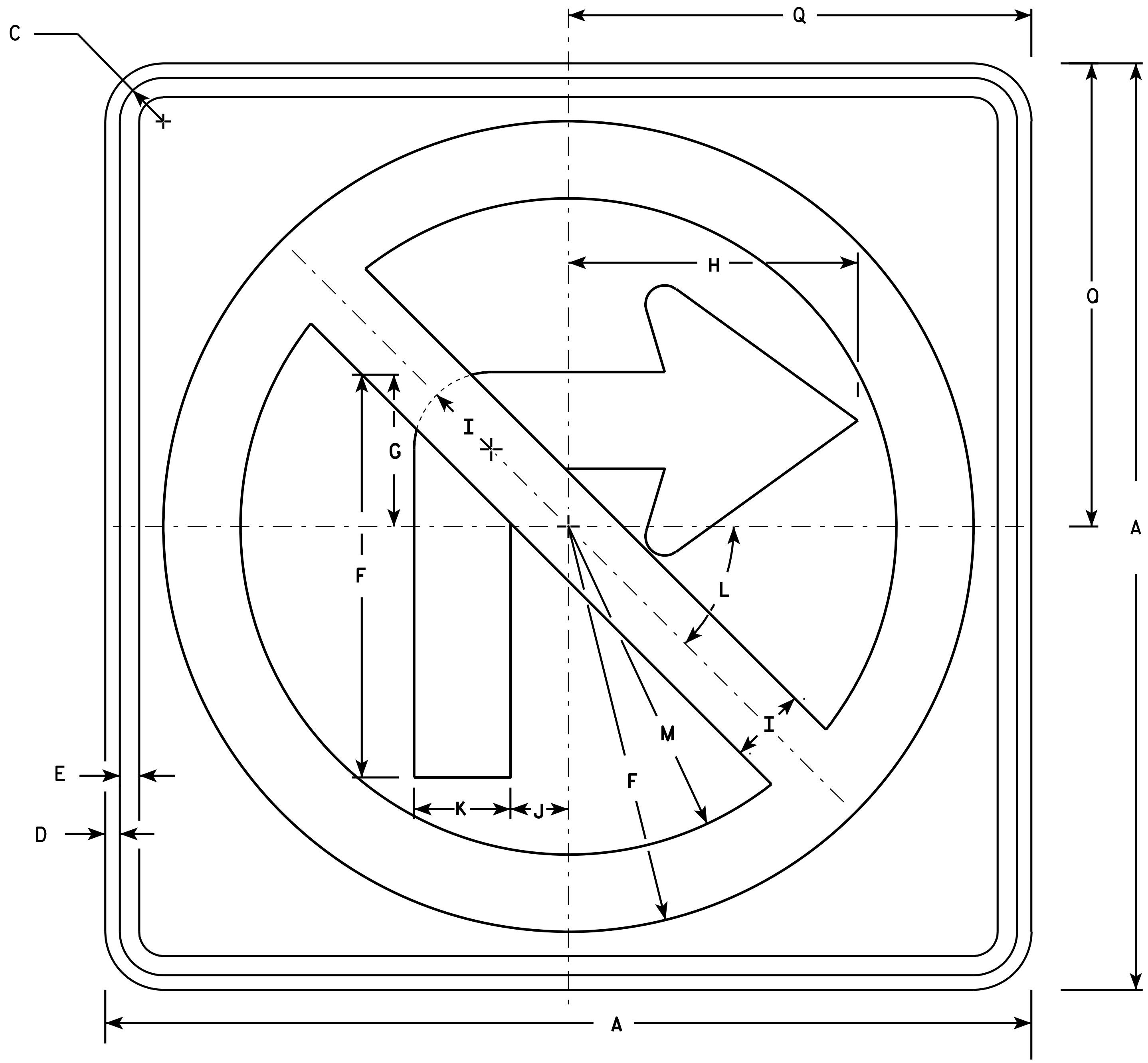
STANDARD SIGN
R2-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
For State Traffic Engineer

DATE 5/26/10 PLATE NO. R2-1.13

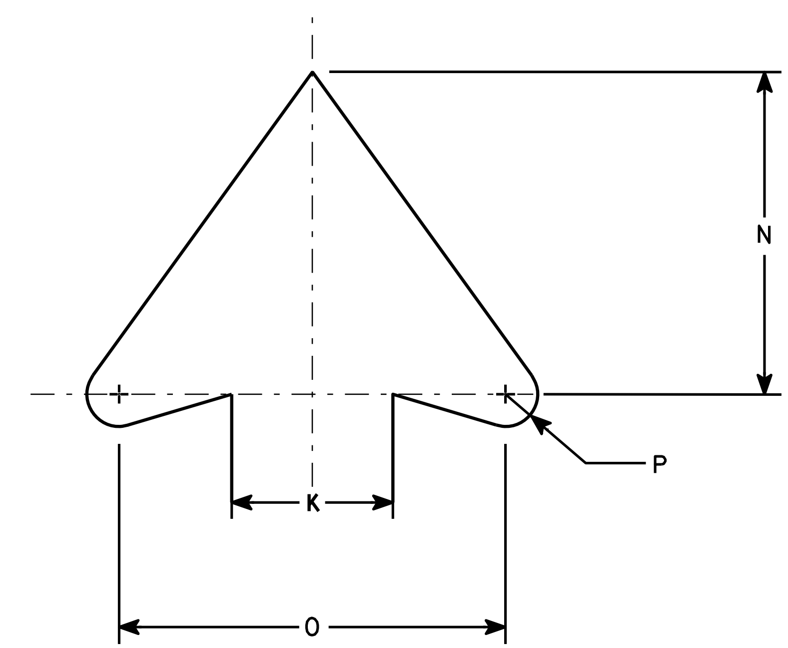
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 130 | E



R3-1

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 - 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. Border & Arrow are non reflective black, the circle with diagonal bar is reflective red.



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	10 1/2	4	7 1/2	2	1 1/2	2 1/2	45	8 1/2	5	6	1/2	12										4.0
2S	24		1 1/8	3/8	1/2	10 1/2	4	7 1/2	2	1 1/2	2 1/2	45°	8 1/2	5	6	1/2	12										4.0
2M	36		1 5/8	5/8	3/4	15 3/4	6	11 1/4	3	2 1/4	3 3/4	45	12 3/4	7 1/2	9	3/4	18										9.0
3	36		1 5/8	5/8	3/4	15 3/4	6	11 1/4	3	2 1/4	3 3/4	45	12 3/4	7 1/2	9	3/4	18										9.0
4	36		1 5/8	5/8	3/4	15 3/4	6	11 1/4	3	2 1/4	3 3/4	45°	12 3/4	7 1/2	9	3/4	18										9.0
5	48		2 1/4	3/4	1	21	8	15	4	3	5	45°	17	10	12	1	24										16.0

STANDARD SIGN
R3-1

WISCONSIN DEPT OF TRANSPORTATION

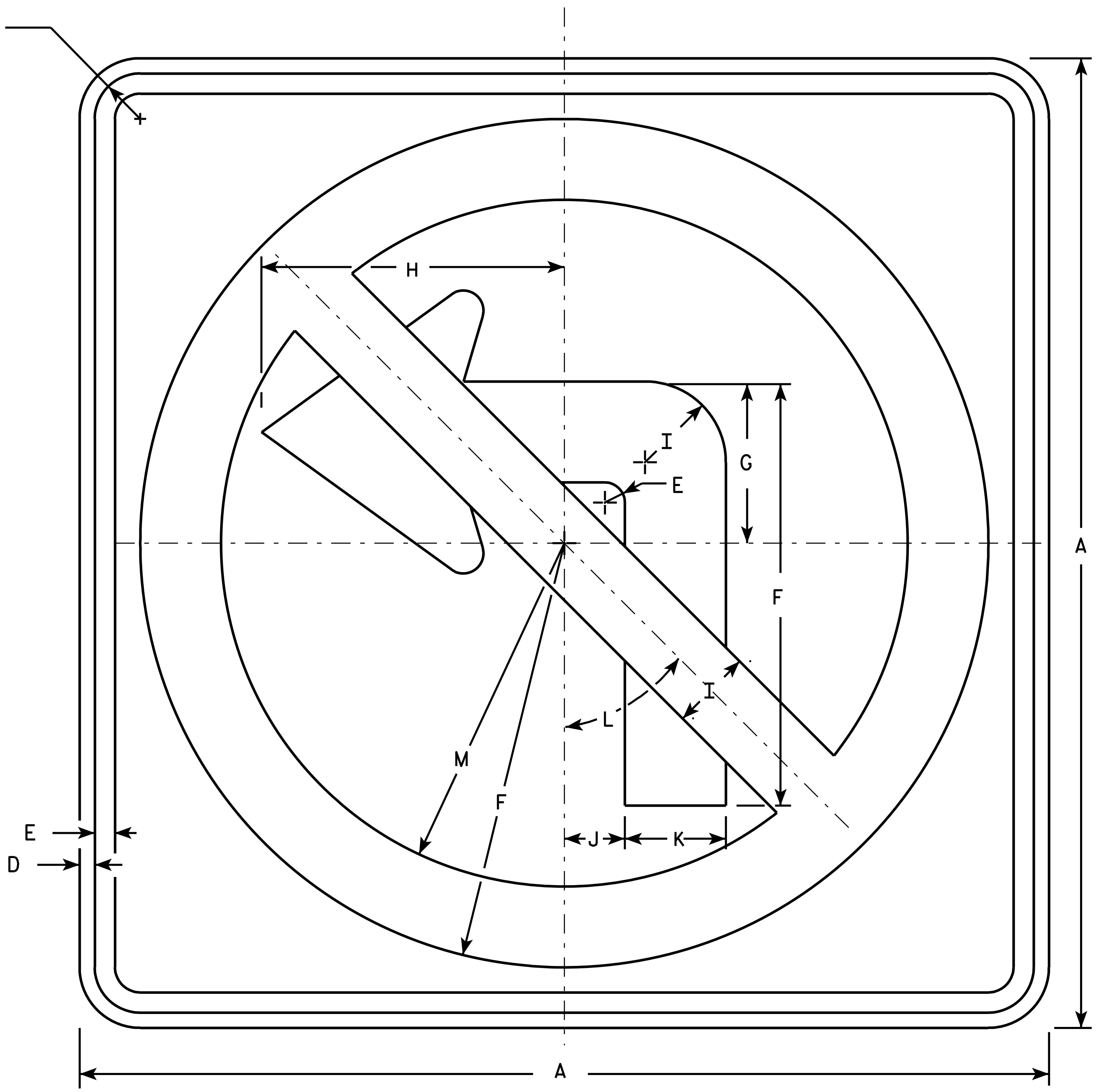
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/08/10 PLATE NO. R3-1.5

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 131 | E

7 7

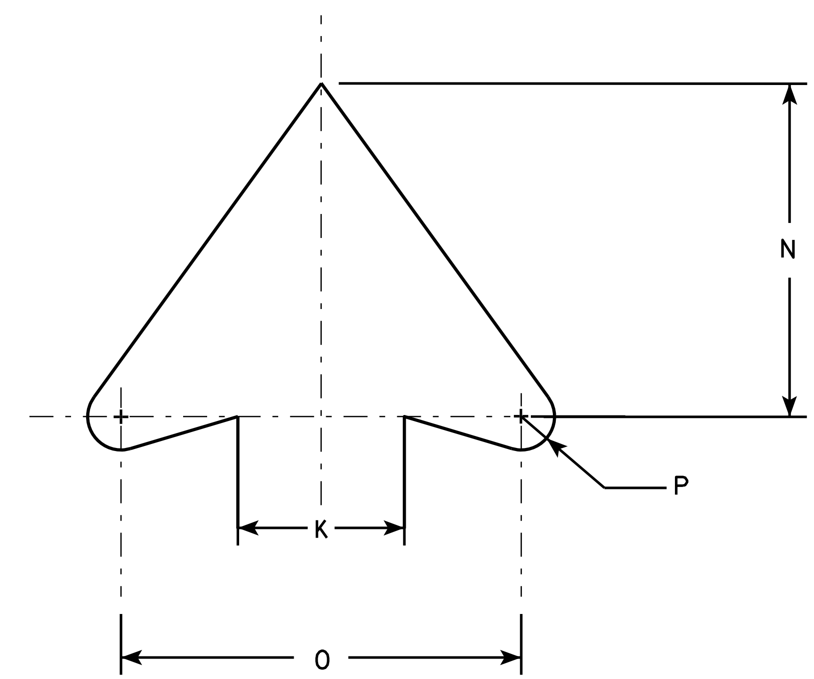
FILE NAME : C:\Users\PROJECTS\tr_stdplate\R31.DGN PLOT DATE : 08-DEC-2010 13:23 PLOT BY : dotsja PLOT NAME : PLOT SCALE : 5.959043:1.000000



R3-2

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   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. Border & Arrow are non reflective black, the circle with diagonal bar is reflective red.



ARROW DETAIL

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	24		1 1/8	3/8	1/2	10 1/2	4	7 1/2	2	1 1/2	2 1/2	45°	8 1/2	5	6	1/2											4.0
2S	24		1 1/8	3/8	1/2	10 1/2	4	7 1/2	2	1 1/2	2 1/2	45°	8 1/2	5	6	1/2											4.0
2M	36		1 5/8	5/8	3/4	15 3/4	6	11 1/4	3	2 1/4	3 3/4	45°	12 3/4	7 1/2	9	3/4											9.0
3	36		1 5/8	5/8	3/4	15 3/4	6	11 1/4	3	2 1/4	3 3/4	45°	12 3/4	7 1/2	9	3/4											9.0
4	36		1 5/8	5/8	3/4	15 3/4	6	11 1/4	3	2 1/4	3 3/4	45°	12 3/4	7 1/2	9	3/4											9.0
5	48		2 1/4	3/4	1	21	8	15	4	3	5	45°	17	10	12	1											16.0

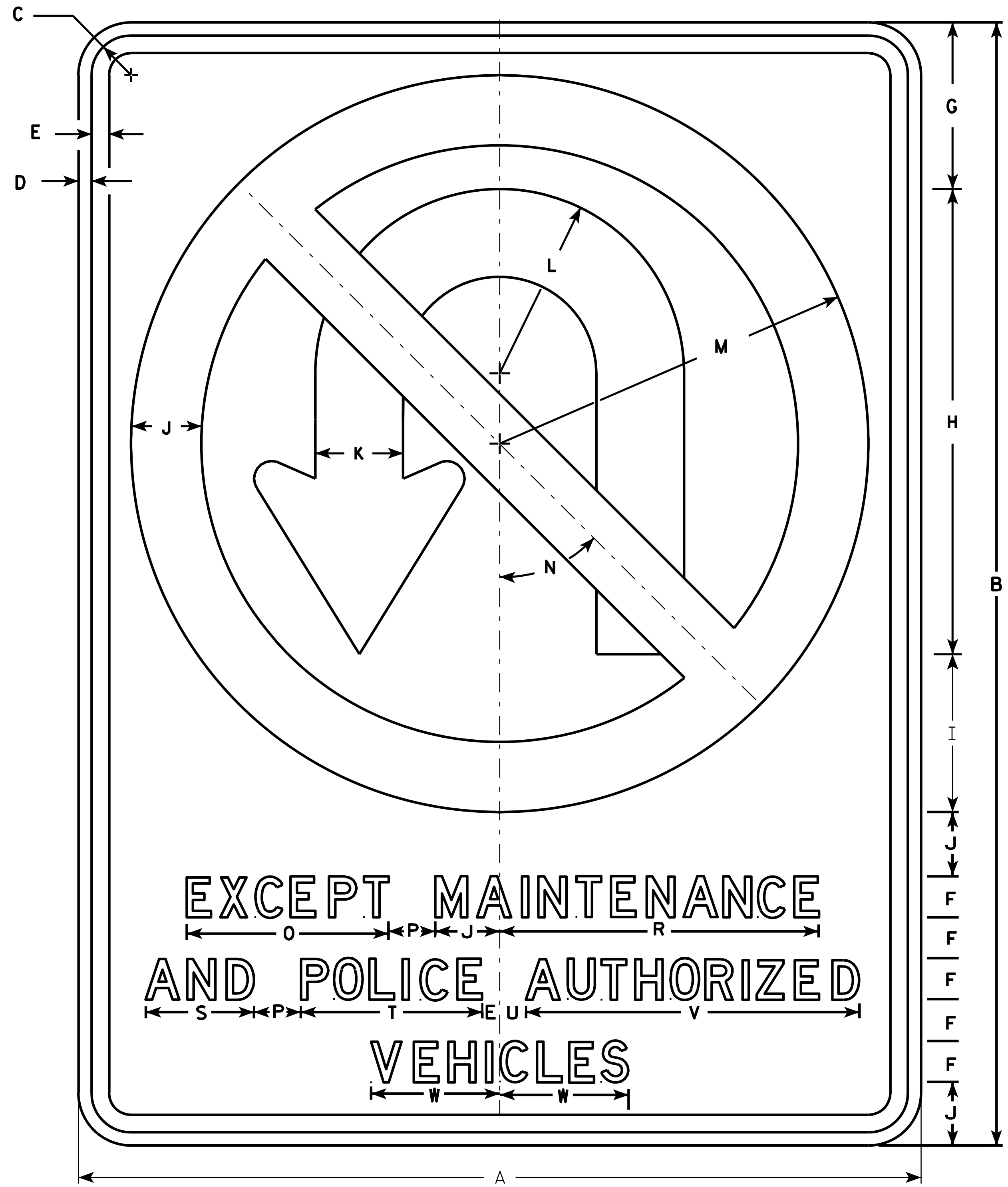
STANDARD SIGN
R3-2

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/08/10 PLATE NO. R3-2.10

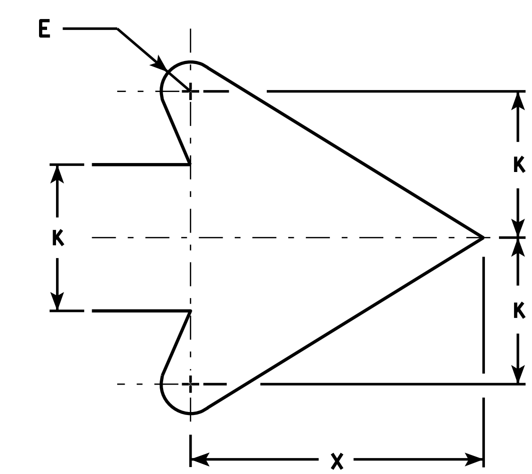
PROJECT NO: HWY: COUNTY: SHEET NO: 132 E



R3-4B

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 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. Border & Arrow are non reflective black, the circle with diagonal bar is reflective red.



ARROW DETAIL

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																											
2M																											
3																											
4	36	48	1 5/8	5/8	3/4	1 3/4	7 1/8	19 7/8	6 3/4	2 3/4	3 3/4	7 7/8	15 3/4	45°	8 5/8	2		13 5/8	4 5/8	7 3/4	1 1/8	14 1/4	5 1/2	7 5/8			12.0
5	36	48	1 5/8	5/8	3/4	1 3/4	7 1/8	19 7/8	6 3/4	2 3/4	3 3/4	7 7/8	15 3/4	45°	8 5/8	2		13 5/8	4 5/8	7 3/4	1 1/8	14 1/4	5 1/2	7 5/8			12.0

STANDARD SIGN
R3-4B

WISCONSIN DEPT OF TRANSPORTATION

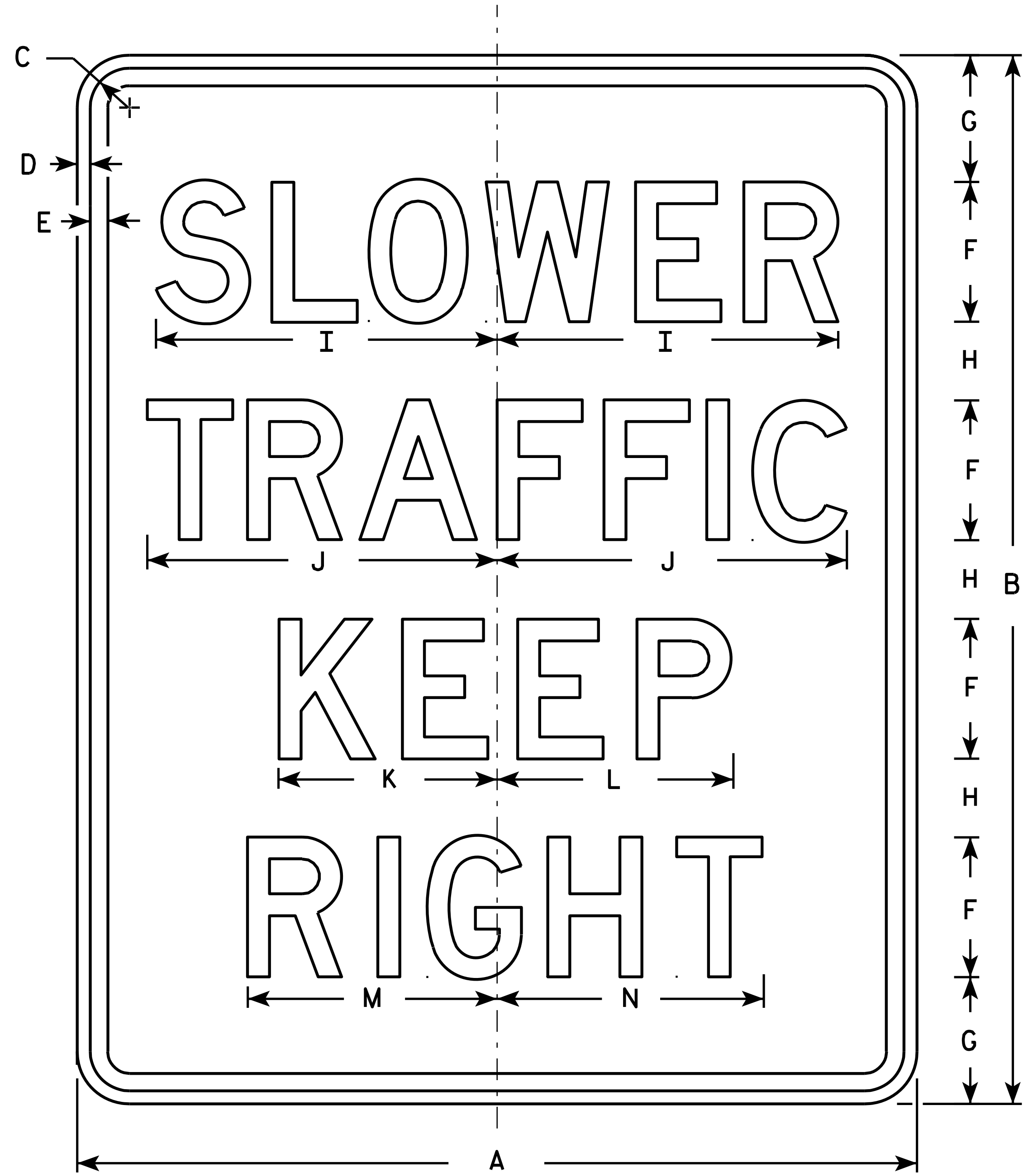
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/17/2011 PLATE NO. R3-4B.2

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 133 | E

7

7



R4-3

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 - D
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	24	30	1 1/8	3/8	1/2	4	3 5/8	2 1/4	9 3/4	10	6 1/4	6 3/4	7 1/8	7 5/8													5.0
2M	24	30	1 1/8	3/8	1/2	4	3 5/8	2 1/4	9 3/4	10	6 1/4	6 3/4	7 1/8	7 5/8													5.0
3	36	48	1 5/8	5/8	3/4	6	6	4	14 5/8	15	9 3/8	10	10 3/4	11 3/8													12.0
4	36	48	1 5/8	5/8	3/4	6	6	4	14 5/8	15	9 3/8	10	10 3/4	11 3/8													12.0
5	48	60	2 1/4	3/4	1	8	7 1/4	4 1/2	19 1/2	20	12 1/2	13 1/2	14 1/4	15 1/4													20.0

STANDARD SIGN
R4-3

WISCONSIN DEPT OF TRANSPORTATION

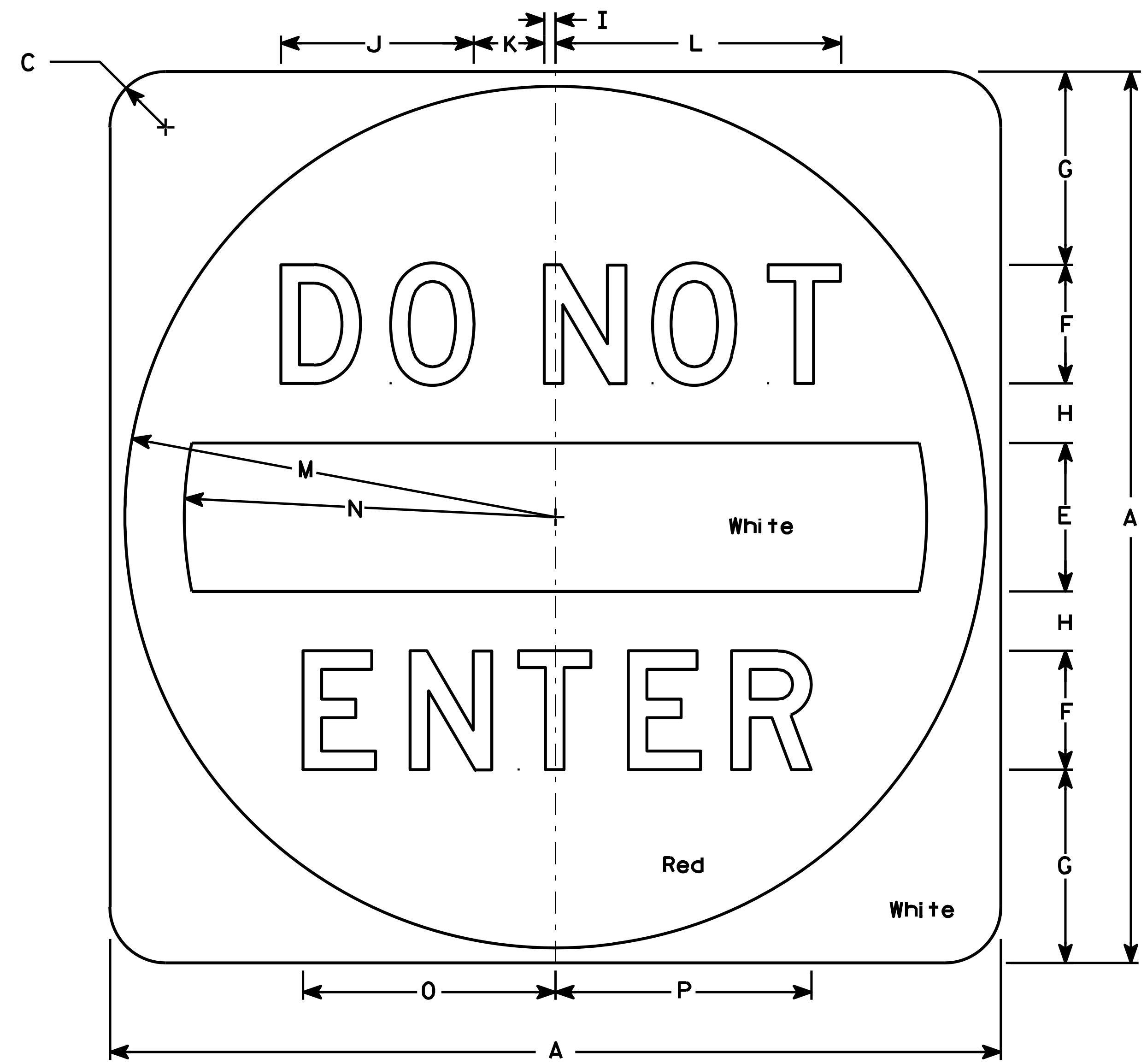
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/25/2011 PLATE NO. R4-3.8

PROJECT NO: | SHEET NO: 134 | 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 - See detail
   Message - White - Type H Reflective
3. Message Series - D
4. Corners may be square or rounded when base material is plywood but when base material is metal, the cornors shall be rounded.



R5-1

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		1 7/8		5	4	6 1/2	2	3/8	6 1/2	2 3/8	9 5/8	14 1/2	12 1/2	8 1/2	8 5/8											6.26
2M	36		2 1/4		6	5	7 1/2	2 1/2	1/2	8 1/8	3	12 1/8	17 1/2	15	10 5/8	10 3/4											9.0
3	36		2 1/4		6	5	7 1/2	2 1/2	1/2	8 1/8	3	12 1/8	17 1/2	15	10 5/8	10 3/4											9.0
4	36		2 1/4		6	5	7 1/2	2 1/2	1/2	8 1/8	3	12 1/8	17 1/2	15	10 5/8	10 3/4											9.0
5	48		3		8	6	11	3	5/8	9 3/4	3 5/8	14 1/2	23 1/2	20	12 3/4	12 7/8											16.0

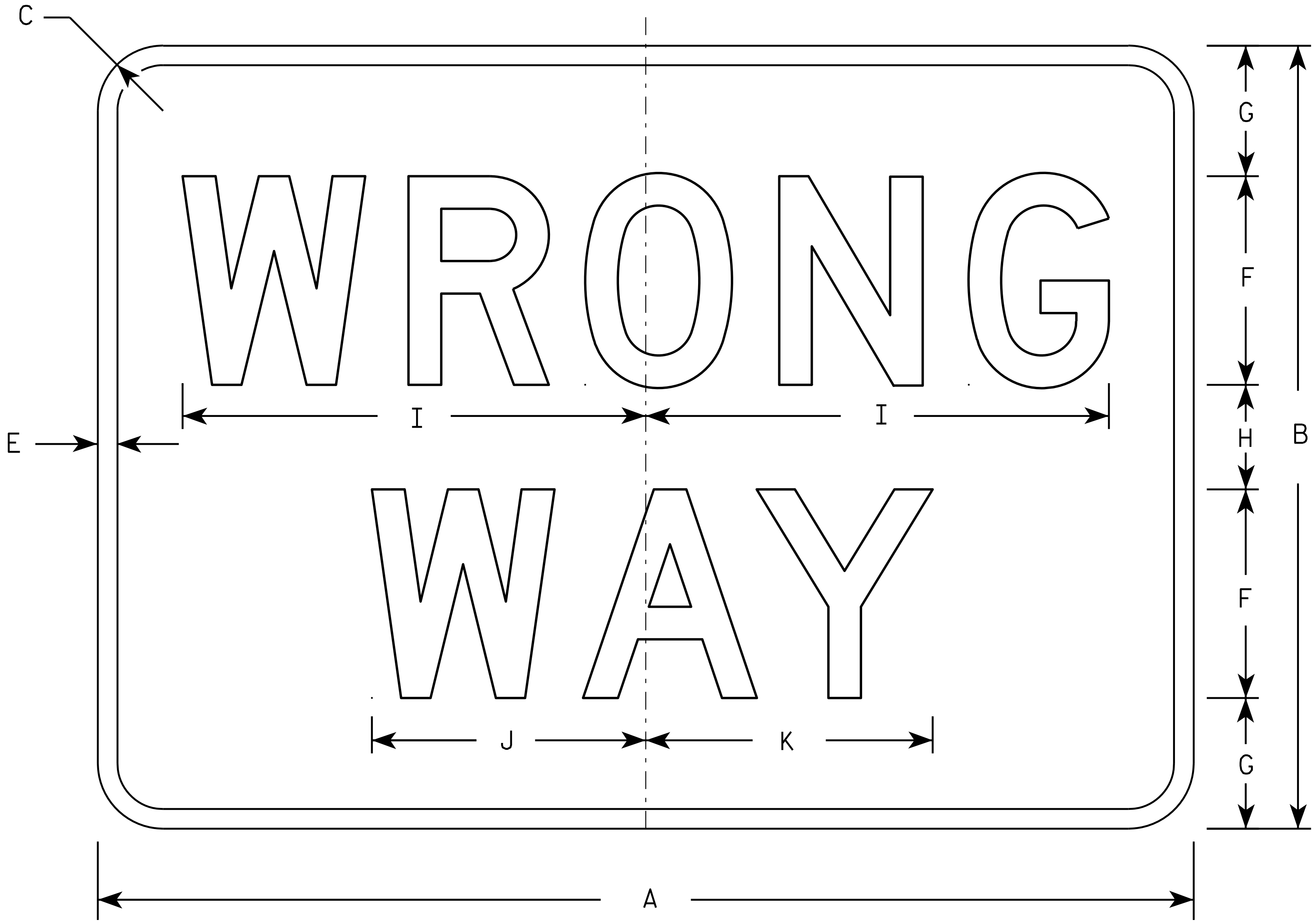
STANDARD SIGN
R5-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/17/10 PLATE NO. R5-1.15

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 135 | E



R5-1A

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 - D
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.

7

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	18	1 1/2		1/2	5	3	2	11	6 1/2	6 7/8																3.75
2S	36	24	2		5/8	6	4 1/2	3	13 1/4	7 7/8	8 1/4																6.00
2M	42	30	2 1/2		3/4	8	5	4	17 3/4	10 1/2	11																8.75
3	42	30	2 1/2		3/4	8	5	4	17 3/4	10 1/2	11																8.75
4	42	30	2 1/2		3/4	8	5	4	17 3/4	10 1/2	11																8.75
5	42	30	2 1/2		3/4	8	5	4	17 3/4	10 1/2	11																8.75

STANDARD SIGN
R5-1A

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/17/10 PLATE NO. R5-1A.2

R5-57

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 - Lines 1, 2, and 5 are Series C.
   Lines 3 and 4 are 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																											
2S																											
2M																											
3																											
4	36		1 5/8	5/8	3/4	4	3	2	3 1/2	14 1/4	14 7/8	11	11 1/2	4 3/4	1 3/4	9		1 3/8	10	11	2 1/2	1 3/4	15 1/2	13	13 5/8		9.0
5	36		1 5/8	5/8	3/4	4	3	2	3 1/2	14 1/4	14 7/8	11	11 1/2	4 3/4	1 3/4	9		1 3/8	10	11	2 1/2	1 3/4	15 1/2	13	13 5/8		9.0

STANDARD SIGN
R5-57

WISCONSIN DEPT OF TRANSPORTATION

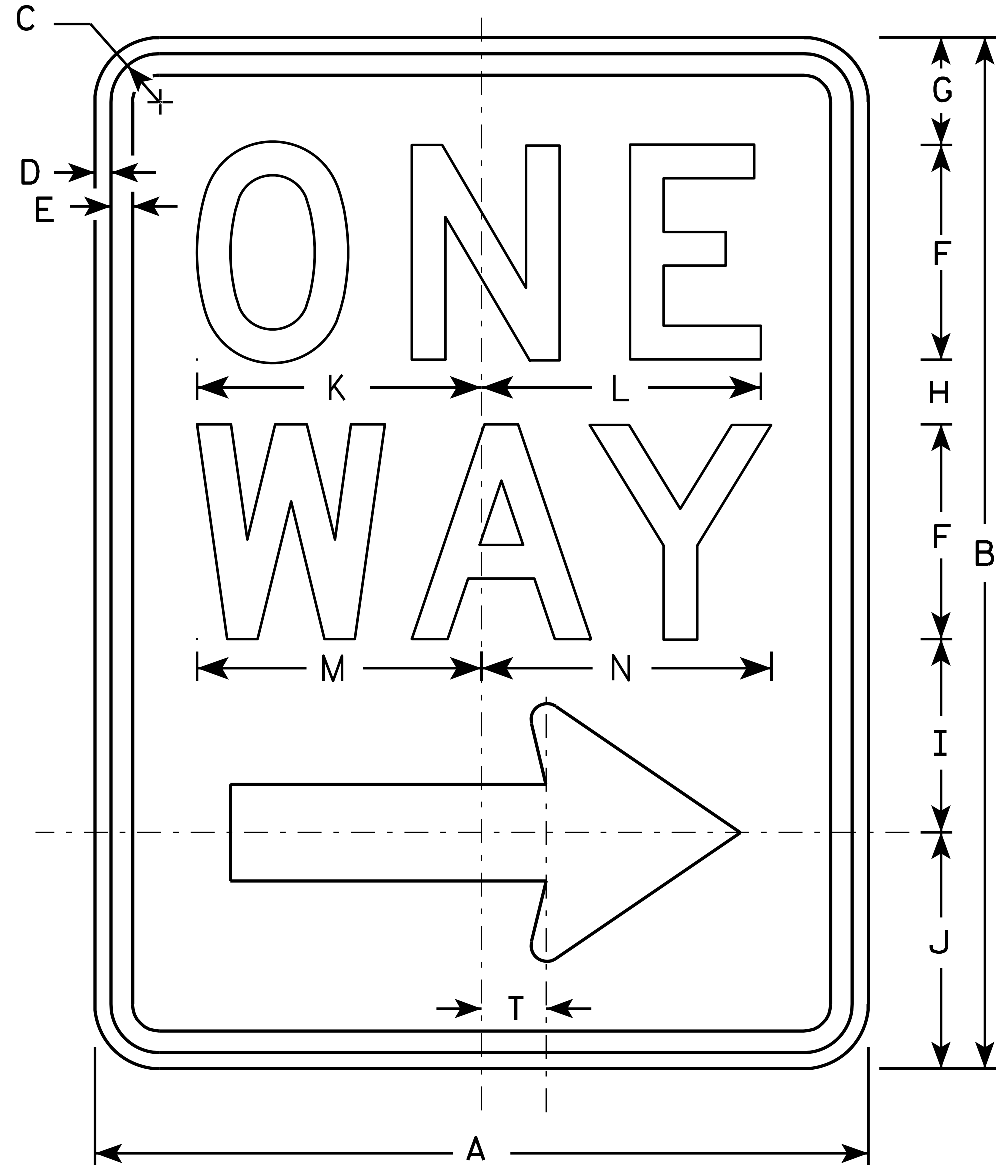
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/29/2011 PLATE NO. R5-57.10

7

7

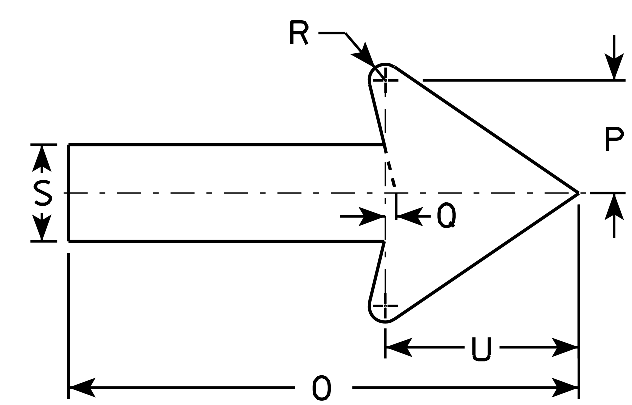
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 137 | E



R6-2R

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 - D
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. R6-2L same as R6-2R except arrow points to the left.



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
1	18	24	1 1/8	3/8	1/2	5	2 1/2	1 1/2	4 1/2	5 1/2	6 5/8	6 1/2	6 5/8	6 3/4	11 7/8	2 5/8	1/4	3/8	2 1/4	1 1/2	4 1/2					
2S	24	30	1 1/8	3/8	1/2	6	3	2 1/2	5 1/2	7	8 1/8	8 1/8	8 1/2	8 5/8	16	3 1/2	3/8	1/2	3	2	6					
2M	30	36	1 3/8	1/2	5/8	8	2 1/2	2 5/8	6 7/8	8	10 1/2	10 1/2	11 1/4	11 1/4	20	4 3/8	1/2	5/8	3 3/4	2 1/2	7 1/2					
3	36	48	1 7/8	1/2	5/8	10	5 1/4	3 1/4	9	10 1/2	12 3/4	12 3/4	13 1/4	13 1/2	24	5 5/8	1/2	3/4	4 3/4	3	9					
4	36	48	1 7/8	1/2	5/8	10	5 1/4	3 1/4	9	10 1/2	12 3/4	12 3/4	13 1/4	13 1/2	24	5 5/8	1/2	3/4	4 3/4	3	9					
5																										

STANDARD SIGN
R6-2 R&L

WISCONSIN DEPT OF TRANSPORTATION

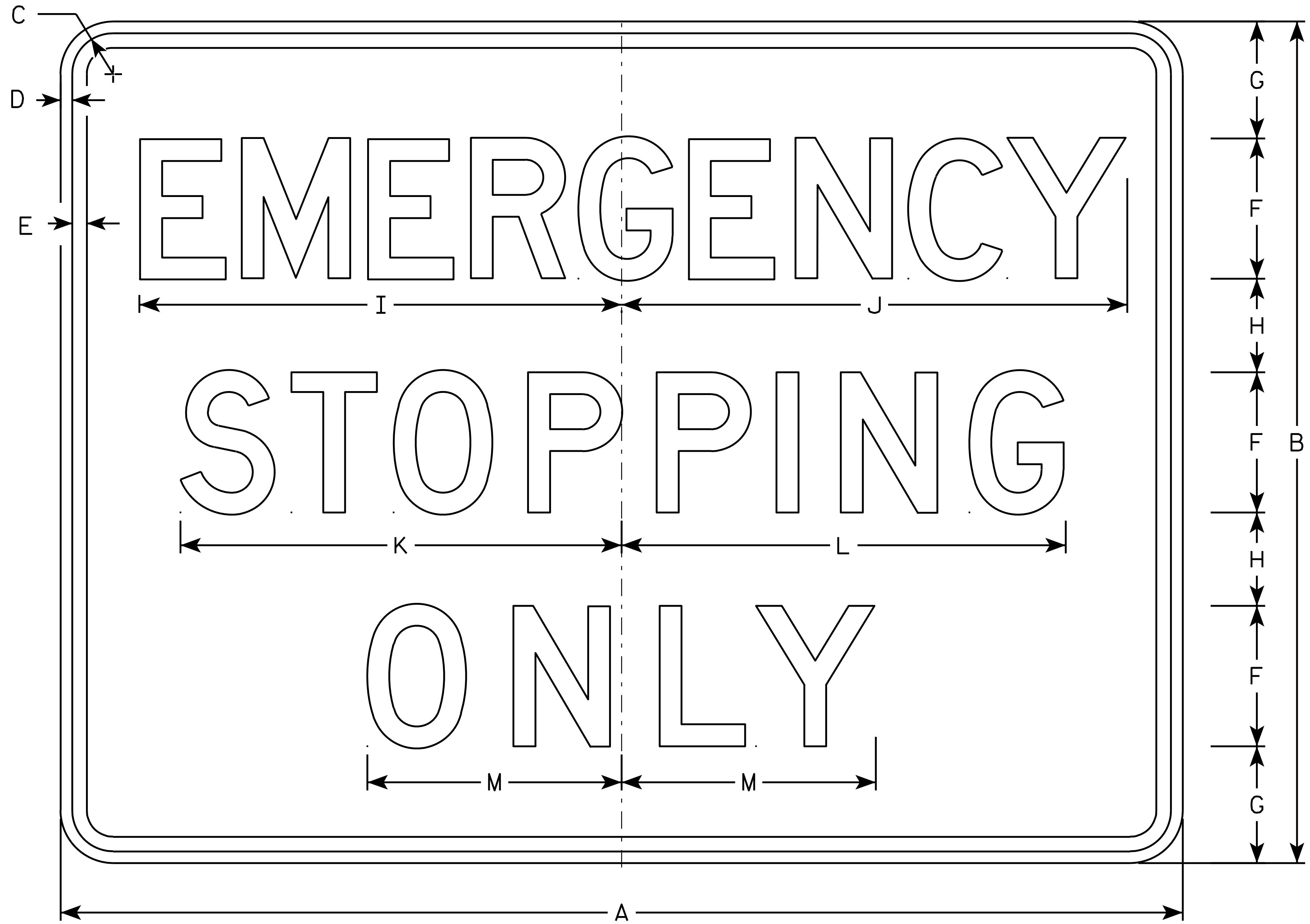
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/2/10 PLATE NO. R6-2.8

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 138 | E

7

7



R8 - 7

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 - D
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																											
2M																											
3																											
4	48	36	1 3/4	1/2	5/8	6	5	4	20 5/8	21 5/8	18 7/8	19	10 7/8														12.0
5	48	36	1 3/4	1/2	5/8	6	5	4	20 5/8	21 5/8	18 7/8	19	10 7/8														12.0

STANDARD SIGN
R8 - 7

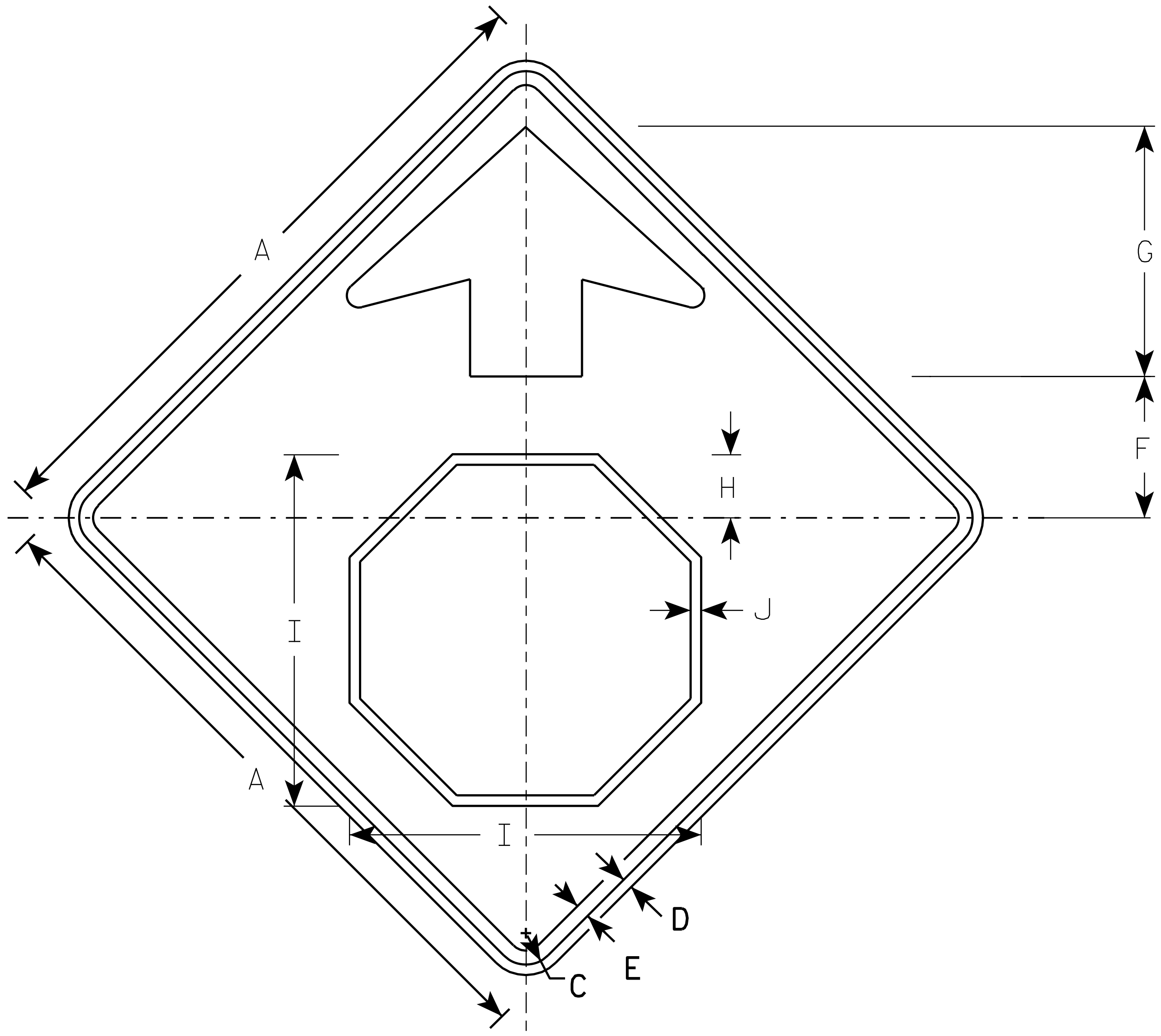
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/31/2011 PLATE NO. R8-7.6

PROJECT NO: HWY: COUNTY: SHEET NO: 139 E

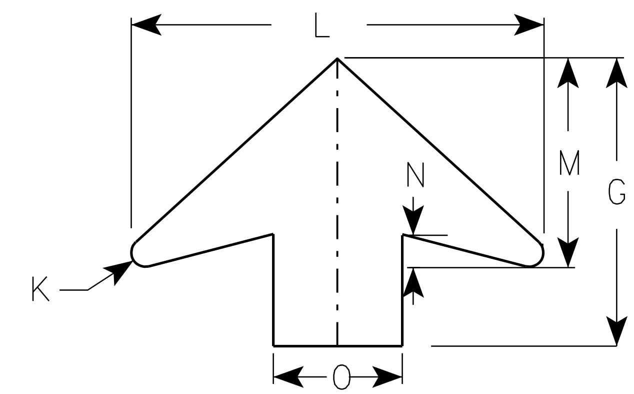
7 7



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	O	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

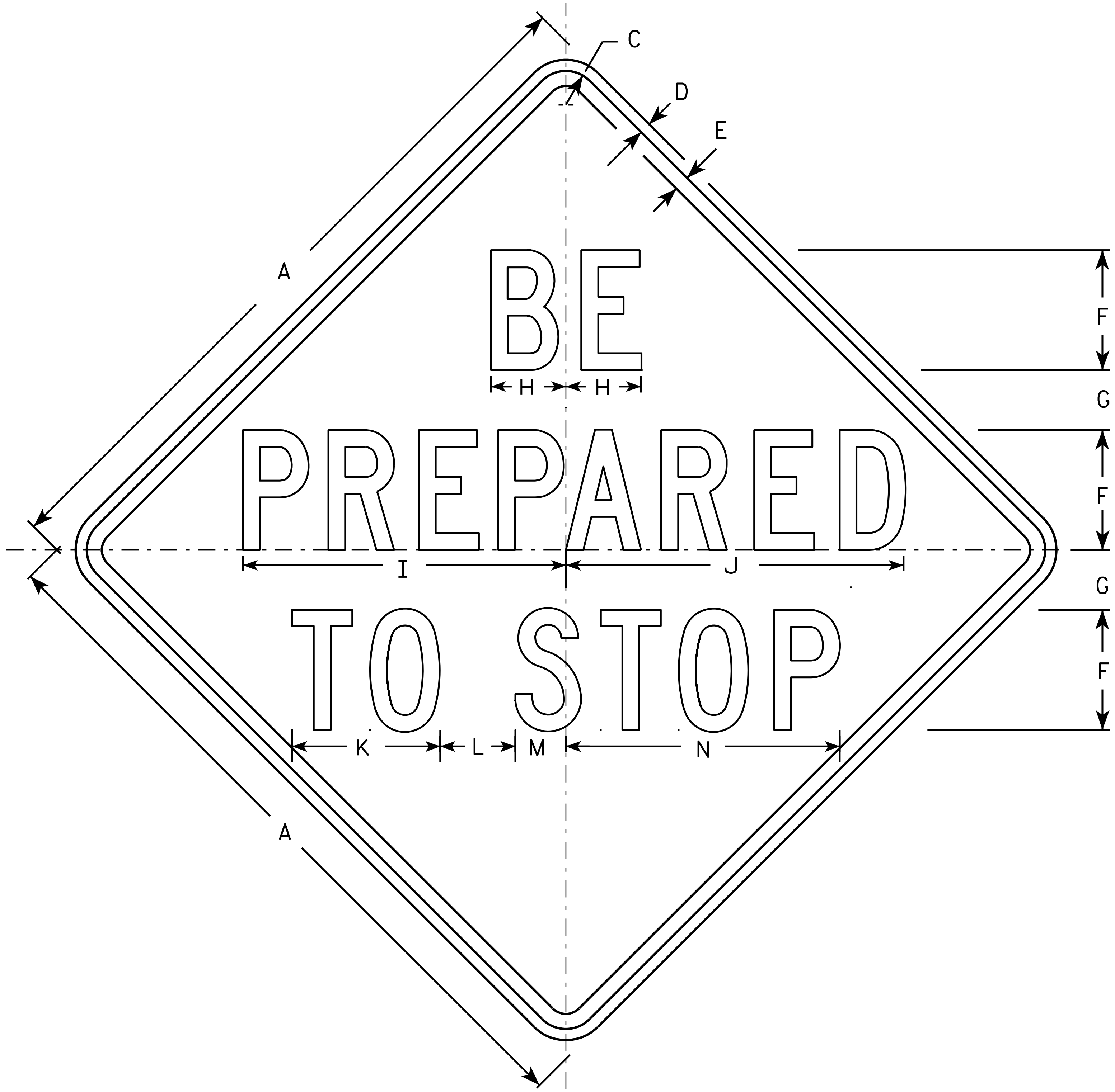
DATE 6/7/10 PLATE NO. W3-1.12

PROJECT NO:

SHEET NO: 140 E

FILE NAME : C:\Users\PROJECTS\tr_stdplate\W31.DGN PLOT DATE : 07-JUN-2010 12:59 PLOT BY : ditjph

7 7



W3-4

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
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	O	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 1/8	3/8	1/2	5	2 1/8	3 1/8	13 1/4	14 1/8	6 1/8	3 3/8	2	11 1/2													6.25
2S	36		1 3/8	1/2	5/8	6	2 1/2	3 3/4	15 7/8	16 7/8	7 3/8	4	2 3/8	13 3/4													9.0
2M	36		1 3/8	1/2	5/8	6	2 1/2	3 3/4	15 7/8	16 7/8	7 3/8	4	2 3/8	13 3/4													9.0
3	36		1 3/8	1/2	5/8	6	2 1/2	3 3/4	15 7/8	16 7/8	7 3/8	4	2 3/8	13 3/4													9.0
4	48		2 1/4	3/4	1	8	4	5	21 1/2	22 1/2	9 7/8	5	3 3/8	18 1/4													16.0
5	48		2 1/4	3/4	1	8	4	5	21 1/2	22 1/2	9 7/8	5	3 3/8	18 1/4													16.0

STANDARD SIGN
W3-4

WISCONSIN DEPT OF TRANSPORTATION

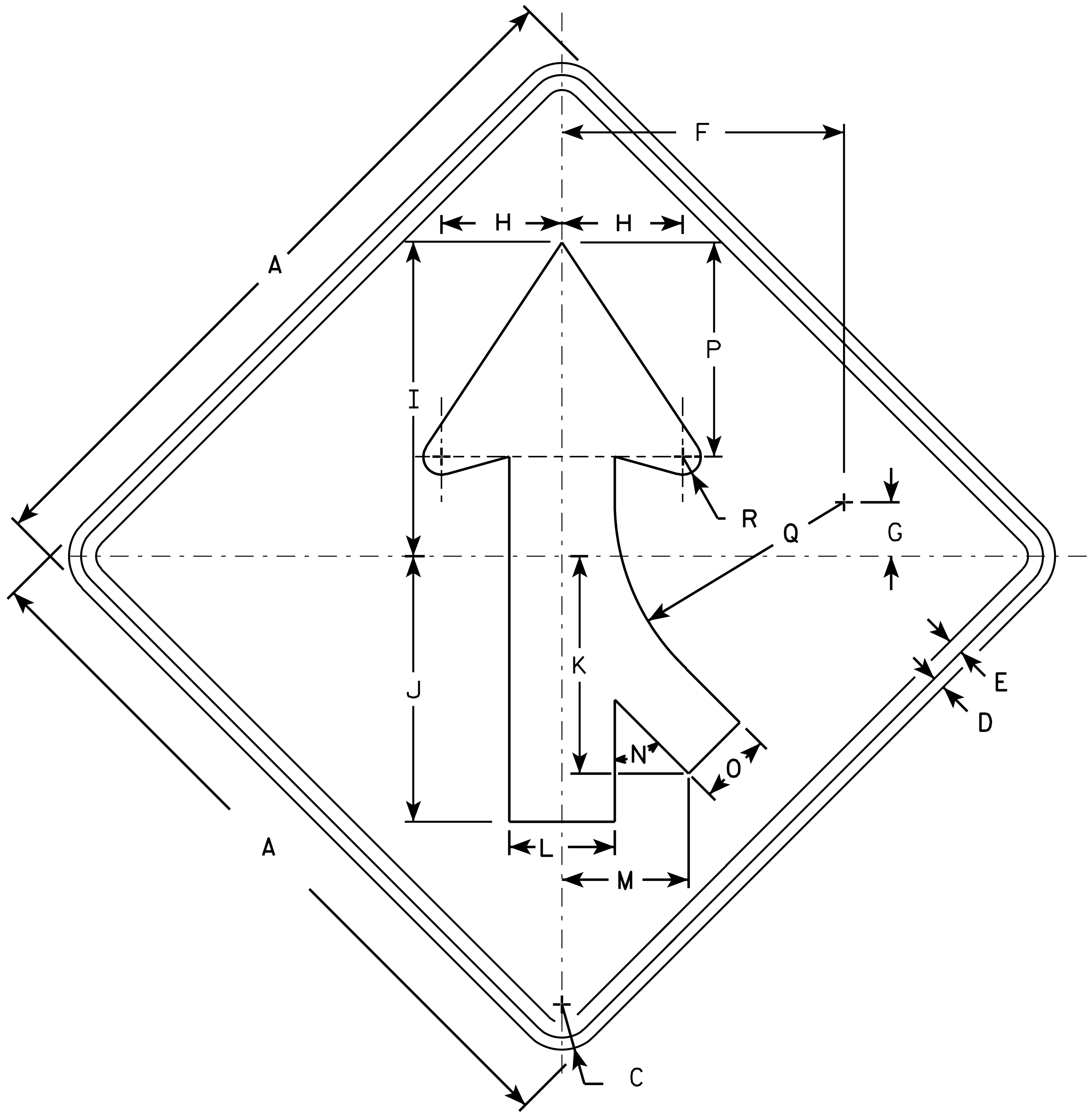
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/21/11 PLATE NO. W3-4.4

7

7

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 141 | E



W4-1R

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. W4-1L is the same as W4-1R except the arrow is reversed along the vertical centerline.

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	30		1 3/8	1/2	5/8	11 5/8	2 1/2	5	13	11	9	4 3/8	5 1/4	45°	3	8 7/8	9 1/2	3/4									6.25
2S	36		1 5/8	5/8	3/4	14	2 3/4	6	15 3/4	13 1/4	10 1/4	5 1/4	6 3/8	45°	3 5/8	10 5/8	11 3/8	7/8									9.0
2M	36		1 5/8	5/8	3/4	14	2 3/4	6	15 3/4	13 1/4	10 1/4	5 1/4	6 3/8	45°	3 5/8	10 5/8	11 3/8	7/8									9.0
3	36		1 5/8	5/8	3/4	14	2 3/4	6	15 3/4	13 1/4	10 1/4	5 1/4	6 3/8	45°	3 5/8	10 5/8	11 3/8	7/8									9.0
4	48		2 1/4	3/4	1	18 3/4	3 5/8	8	20 1/2	17 1/2	14 3/8	7	8 3/8	45°	4 3/4	14 1/4	15 1/4	1 1/4									16.0
5	48		2 1/4	3/4	1	18 3/4	3 5/8	8	20 1/2	17 1/2	14 3/8	7	8 3/8	45°	4 3/4	14 1/4	15 1/4	1 1/4									16.0

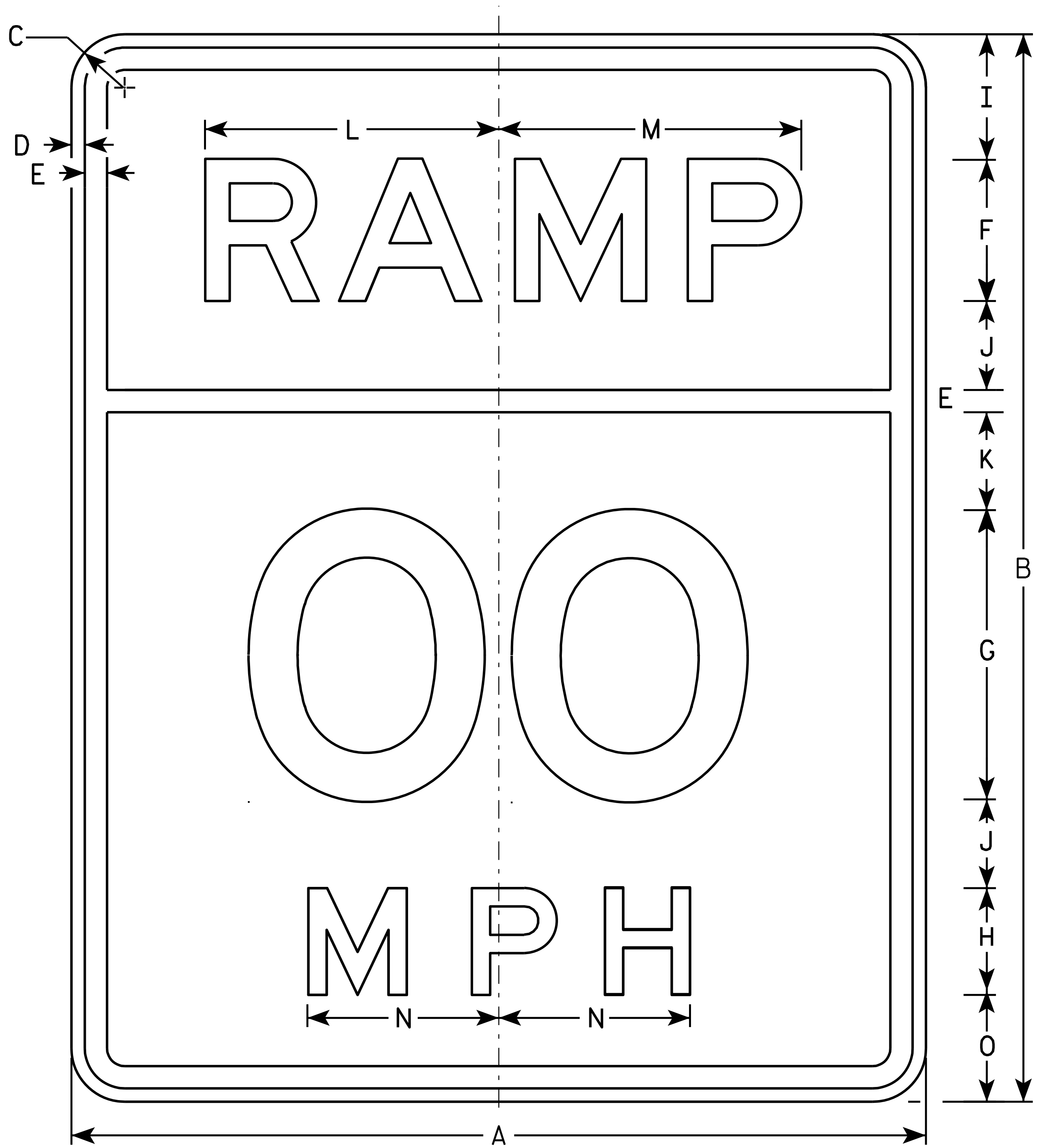
STANDARD SIGN
W4-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 03/12/13 PLATE NO. W4-1.14

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 142 | E



W13-3

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
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.

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	24	30	1 1/8	3/8	5/8	4	8	3	3 1/2	2 1/2	2 7/8	8 1/4	8 1/2	5 3/8	3												5.0
2S	24	30	1 1/8	3/8	5/8	4	8	3	3 1/2	2 1/2	2 7/8	8 1/4	8 1/2	5 3/8	3												5.0
2M	24	30	1 1/8	3/8	5/8	4	8	3	3 1/2	2 1/2	2 7/8	8 1/4	8 1/2	5 3/8	3												5.0
3																											
4	36	48	1 5/8	5/8	7/8	6	12	4	6	4 1/8	5 1/8	13 1/2	13 5/8	7 1/8	6												12.0
5	48	60	2 1/4	3/4	1 1/4	8	16	6	7	5	5 3/4	16 1/2	17	10 5/8	6												20.0

STANDARD SIGN
W13-3

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 6/13/13 PLATE NO. W13-3.9

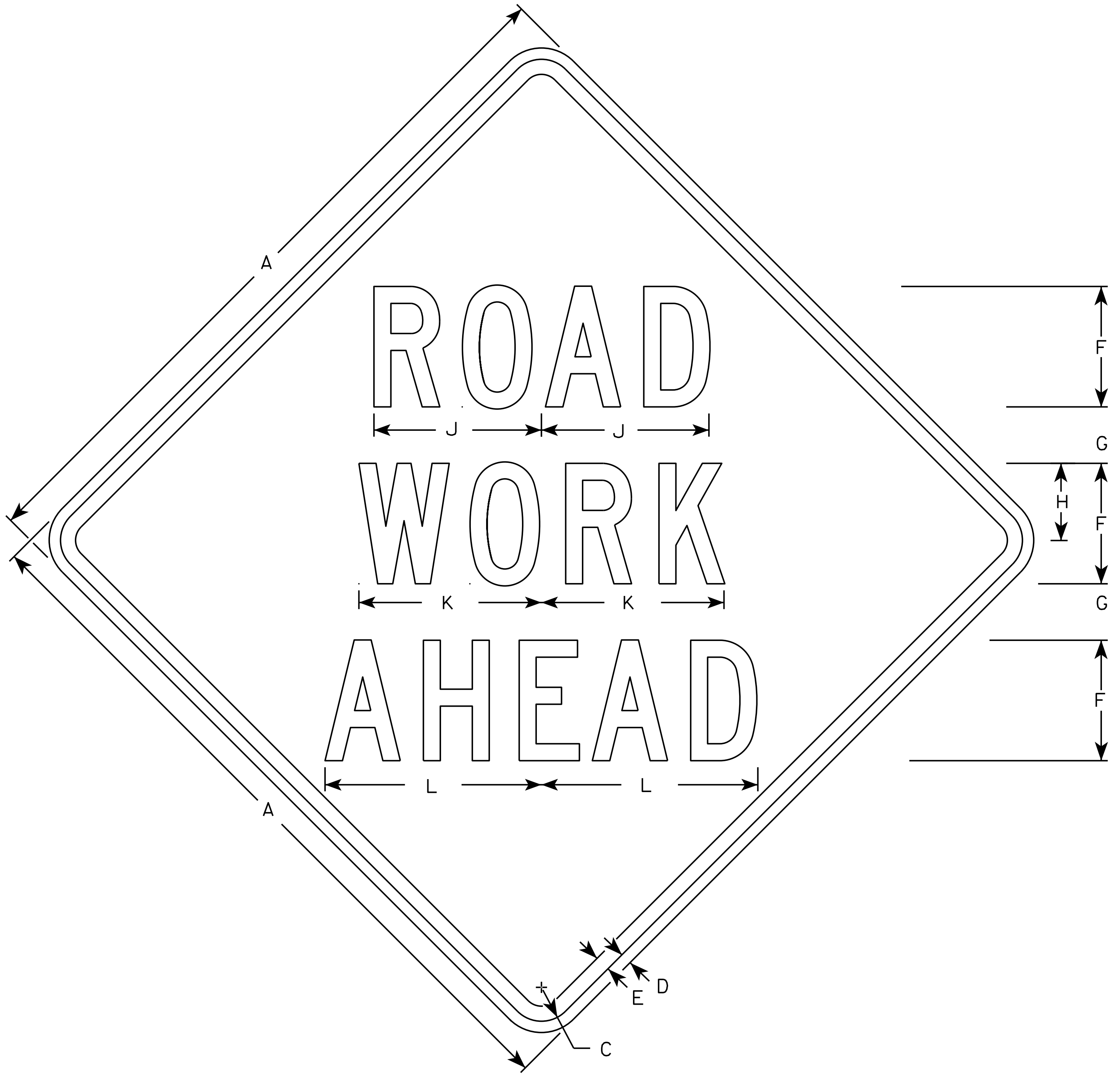
7

7

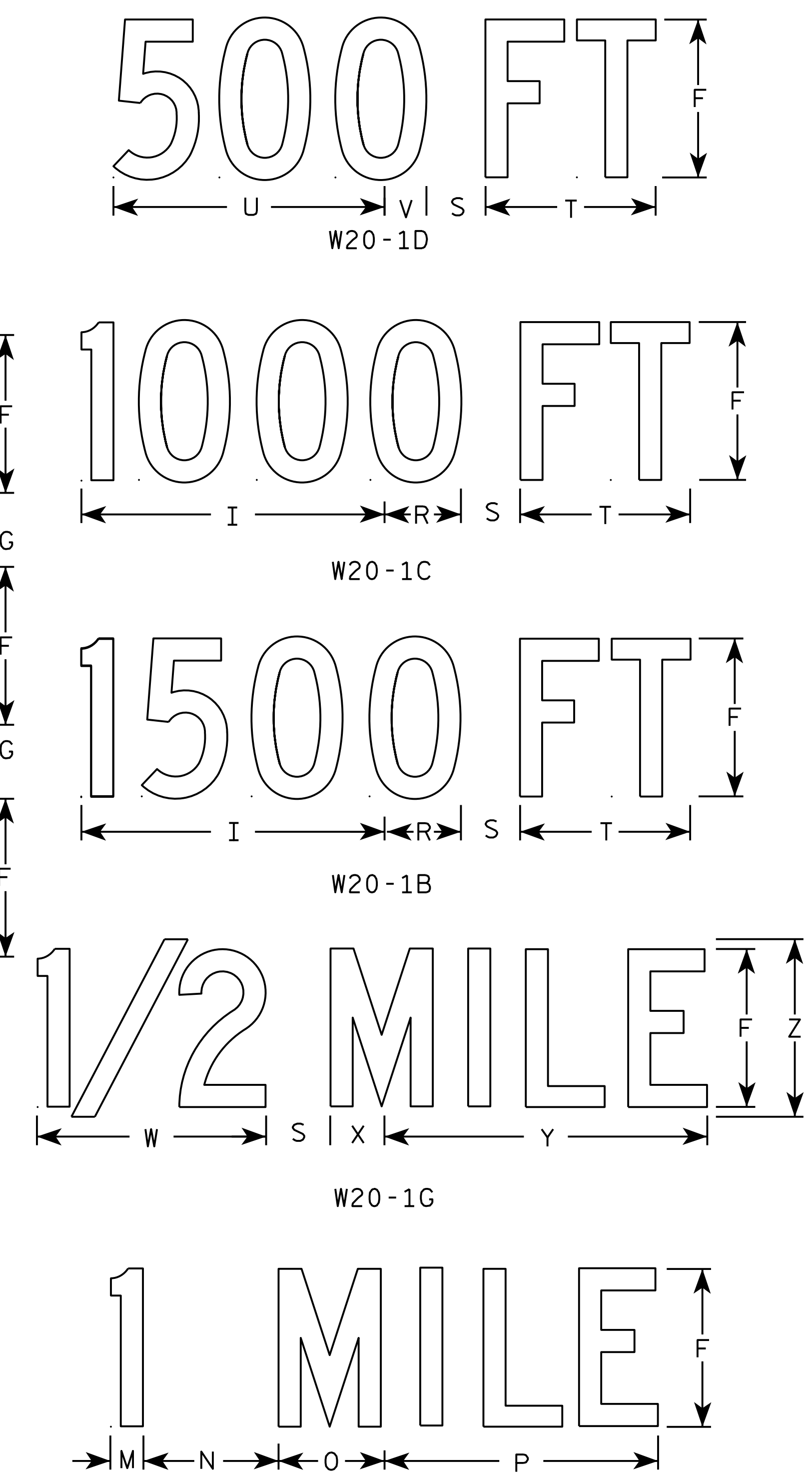
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 143 | E

FILE NAME : C:\CAEFiles\Projects\tr_stdplate\W133.DGN PLOT DATE : 13-JUN-2013 14:55 PLOT BY : mscsja PLOT NAME : PLOT SCALE : 4.167994:1.000000 WISDOT/CADDS SHEET 42

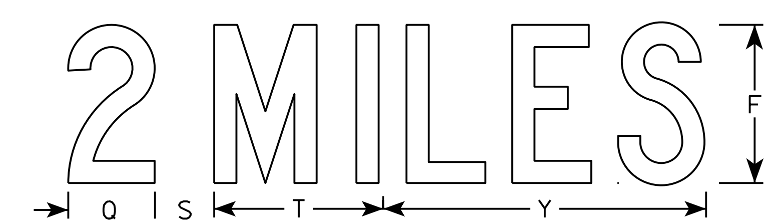
7



W20-1A



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 Matthew R Rauch
for State Traffic Engineer

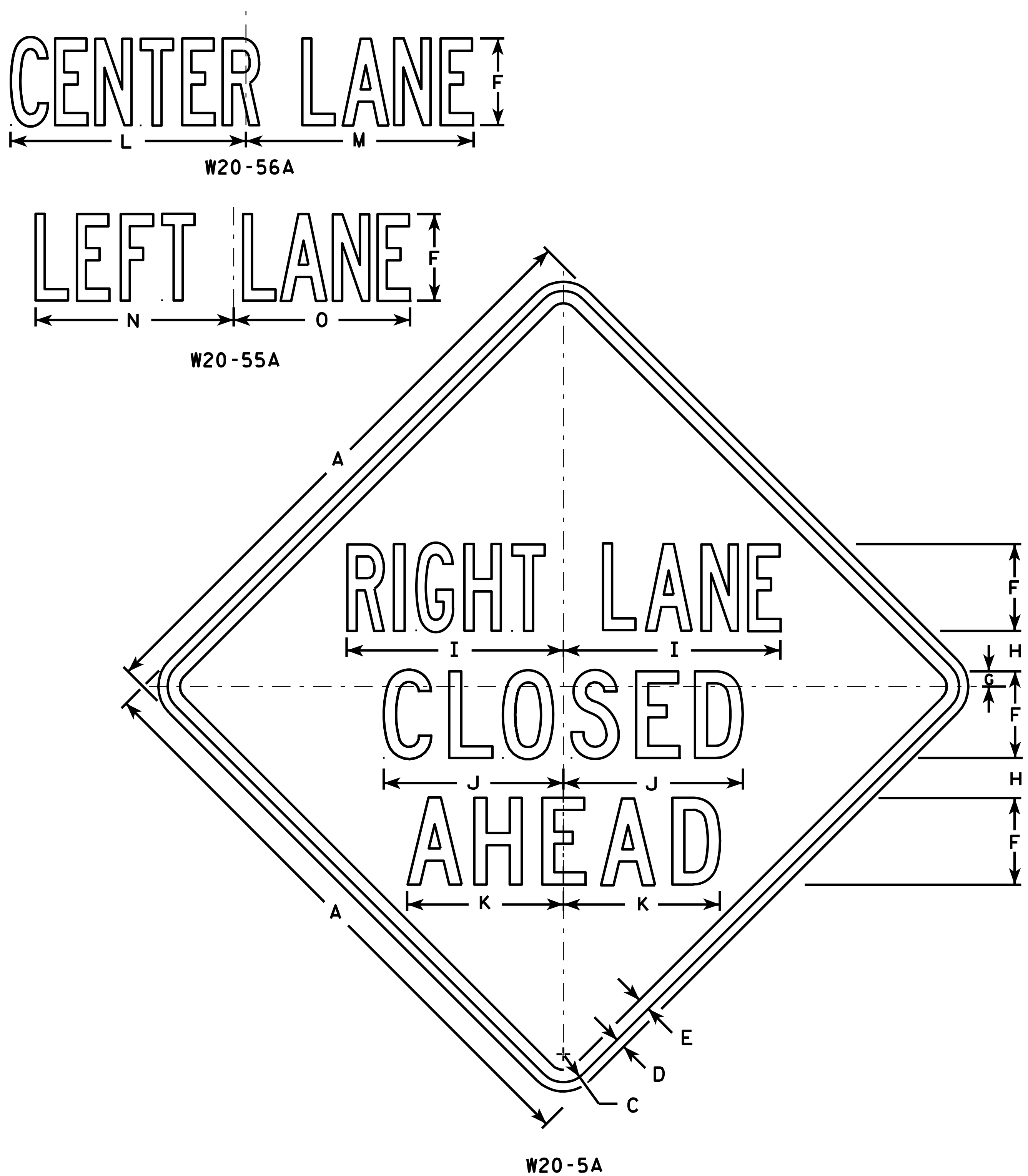
DATE 5/07/15 PLATE NO. W20-1.10

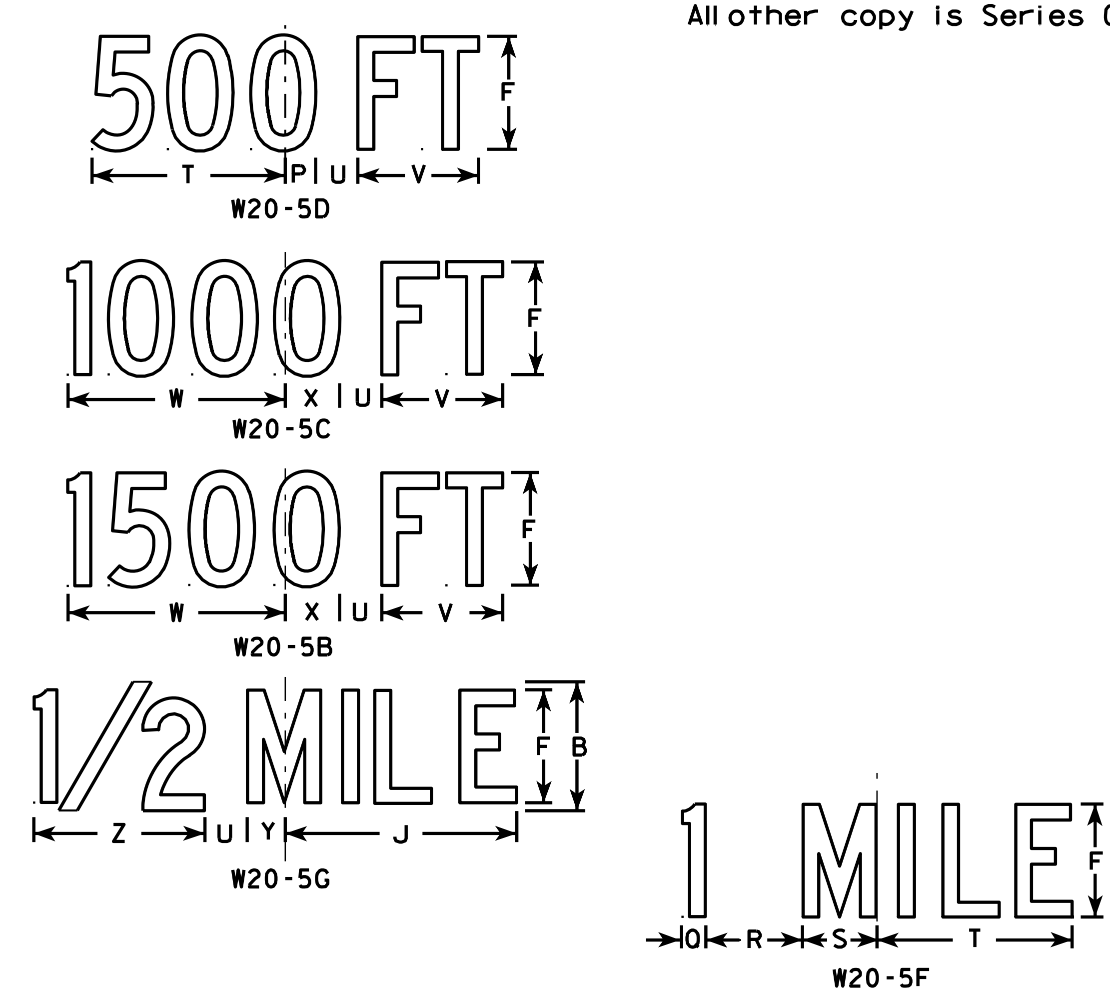
PROJECT NO: | SHEET NO: | E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\W201.DGN PLOT DATE : 01-DEC-2015 18:24 PLOT BY : $$ plotuser $$

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. " _______ LANE" is Series B.
   All other copy is 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	36	6	1 5/8	5/8	3/4	5	7/8	2 1/2	13 1/8	10 3/4	9 1/2	14 1/4	13 5/8	12	12	1 3/8	1 1/8	4 1/2	3 1/2	9	1 7/8	5 5/8	10 1/8	2 1/2	1 3/4	8	9.0
2S	48	8	2 1/4	3/4	1	7	1 1/4	3 1/4	17 1/2	14 3/8	12 5/8	19	18 3/8	16	14 1/4	1 7/8	1 1/2	6	4 5/8	12	2 5/8	7 1/2	13 1/2	3 3/8	2 3/8	10 5/8	16.0
2M	48	8	2 1/4	3/4	1	7	1 1/4	3 1/4	17 1/2	14 3/8	12 5/8	19	18 3/8	16	14 1/4	1 7/8	1 1/2	6	4 5/8	12	2 5/8	7 1/2	13 1/2	3 3/8	2 3/8	10 5/8	16.0
3	48	8	2 1/4	3/4	1	7	1 1/4	3 1/4	17 1/2	14 3/8	12 5/8	19	18 3/8	16	14 1/4	1 7/8	1 1/2	6	4 5/8	12	2 5/8	7 1/2	13 1/2	3 3/8	2 3/8	10 5/8	16.0
4	48	8	2 1/4	3/4	1	7	1 1/4	3 1/4	17 1/2	14 3/8	12 5/8	19	18 3/8	16	14 1/4	1 7/8	1 1/2	6	4 5/8	12	2 5/8	7 1/2	13 1/2	3 3/8	2 3/8	10 5/8	16.0
5	48	8	2 1/4	3/4	1	7	1 1/4	3 1/4	17 1/2	14 3/8	12 5/8	19	18 3/8	16	14 1/4	1 7/8	1 1/2	6	4 5/8	12	2 5/8	7 1/2	13 1/2	3 3/8	2 3/8	10 5/8	16.0

STANDARD SIGN
W20-5A, B, C, D, F & G

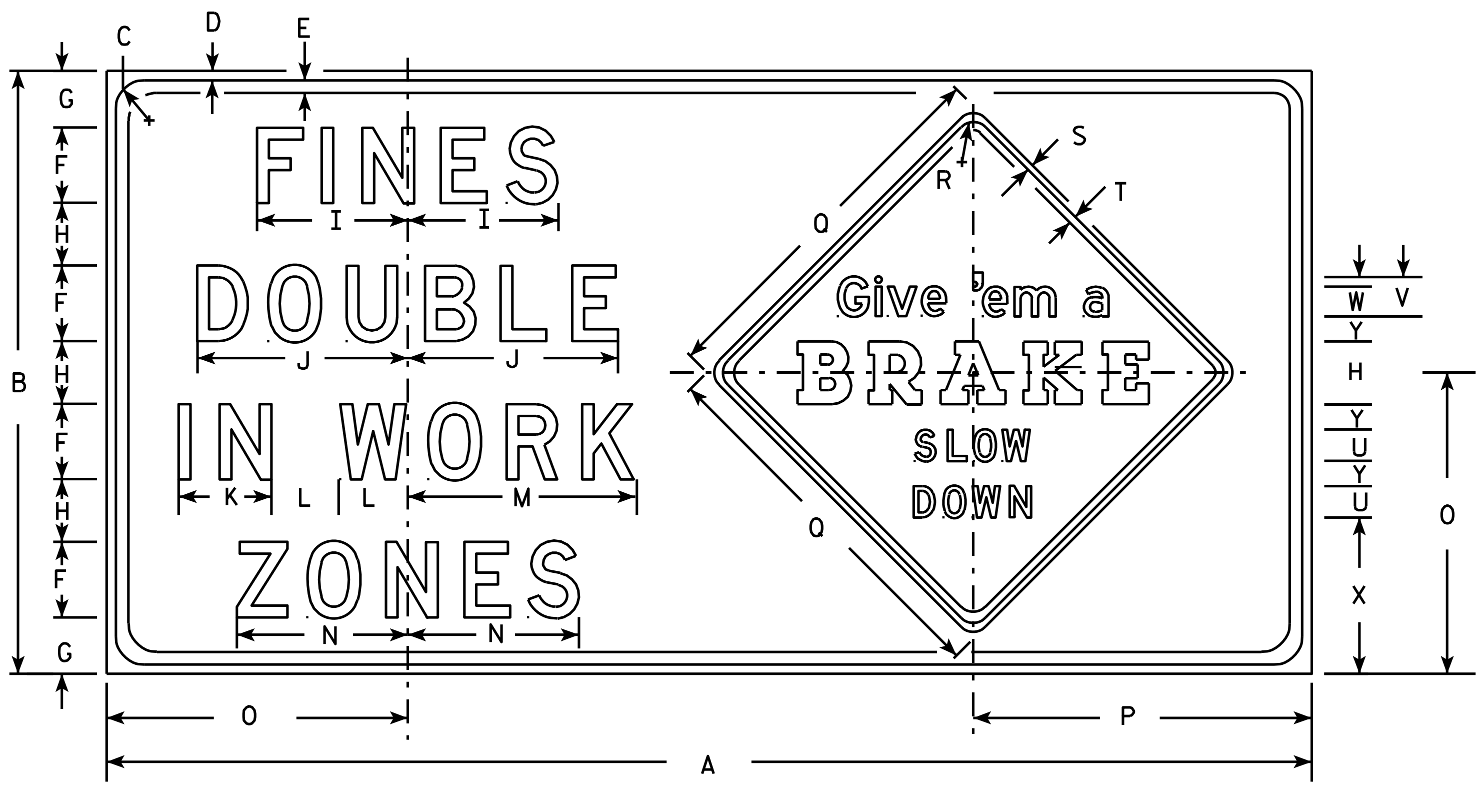
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
For State Traffic Engineer

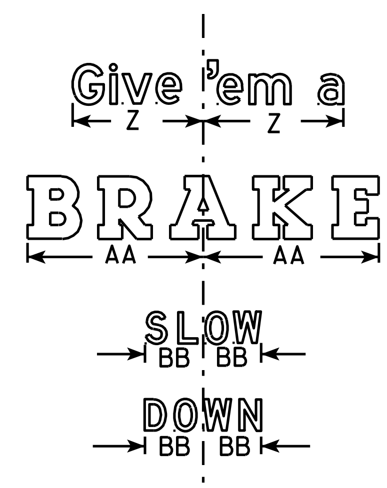
DATE 3/18/11 PLATE NO. W20-5.11

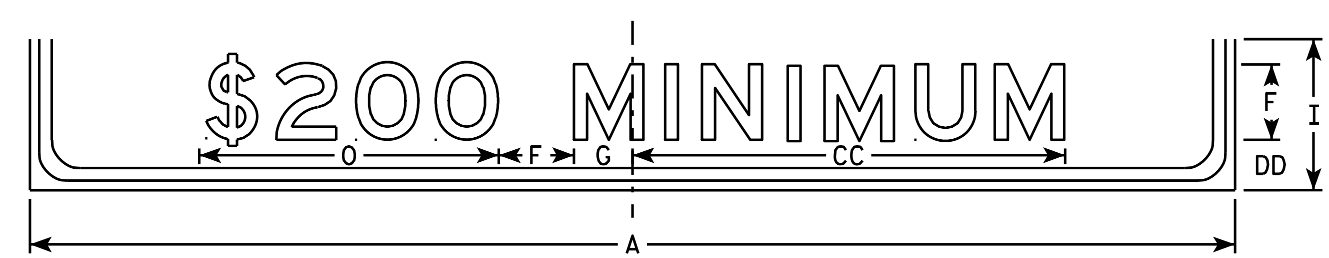
7 7

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 145 | E



W21-62





W21-62P

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 - (See Note 5)
   Message - Black
3. Message Series -
   Fines Double Message - All lines are Series D
   Give 'em a Brake -
   Line one is Series E, line two is a Special Graphic Series and lines three and four are Series D.
4. The base material shall be plywood. Corners may be square or rounded, but borders shall be rounded as shown. The base material for Give 'em a Brake sign can be a seperate sheet of aluminum with the corners and borders rounded as shown. This seperate panel shall then be attached to the plywood with aluminum or stainless steel sheet metal screws.
5. Background for the Give 'em a Brake sign shall be Type F reflective orange.

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	AA	BB	CC	DD	Area sq. ft.
1																															
2S																															
2M																															
3	96	48	2 1/4	3/4	1	6	4 1/2	5	12	16 3/4	7 3/8	5 1/2	18 1/4	13 5/8	24	27	30	1 3/8	1/2	5/8	2 1/2	3 1/8	2 3/8	12 1/2	2	10 3/4	14	4 5/8	34 1/2	4	32.0
4																															
5																															

STANDARD SIGN
W21-62

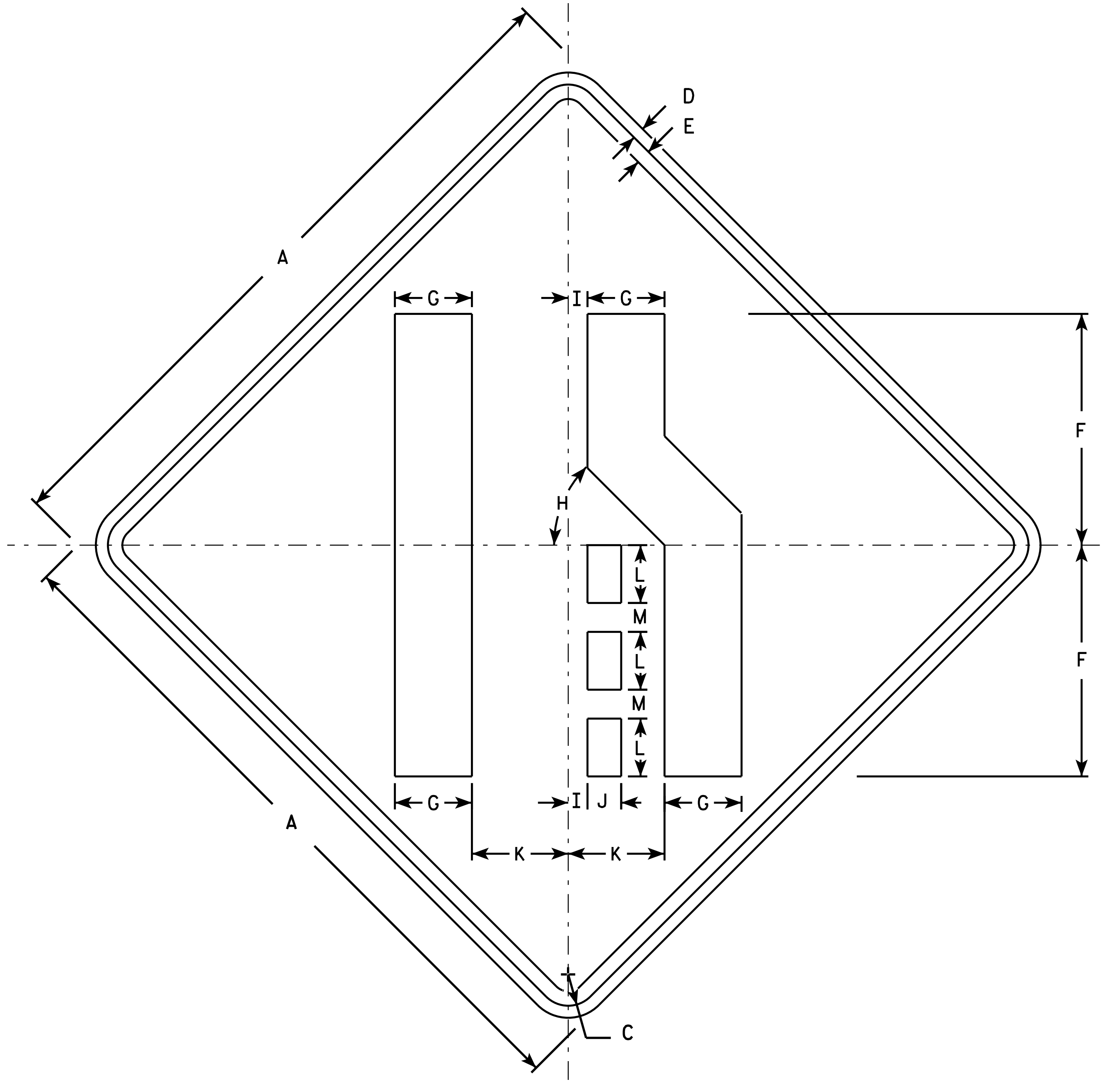
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
For State Traffic Engineer

DATE 3/21/11 PLATE NO. W21-62.5

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 146 | E

FILE NAME : C:\Users\PROJECTS\tr_stdplate\W2162.DGN PLOT DATE : 21-MAR-2011 10:25 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : 15.294877:1.000000 WISDOT/CADDS SHEET 42



W04-2R

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. 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. W04-2L is the same as W04-2R except the symbolis reversed along the vertical centerline.

7

7

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	12	4	45°	1	1 3/4	5	3	1 1/2														9.0
2S	48		2 1/4	3/4	1	16	5 3/8	45°	1 1/4	2 3/8	6 3/4	4	2														16.0
2M	48		2 1/4	3/4	1	16	5 3/8	45°	1 1/4	2 3/8	6 3/4	4	2														16.0
3	48		2 1/4	3/4	1	16	5 3/8	45°	1 1/4	2 3/8	6 3/4	4	2														16.0
4	48		2 1/4	3/4	1	16	5 3/8	45°	1 1/4	2 3/8	6 3/4	4	2														16.0
5	48		2 1/4	3/4	1	16	5 3/8	45°	1 1/4	2 3/8	6 3/4	4	2														16.0

STANDARD SIGN
W04-2

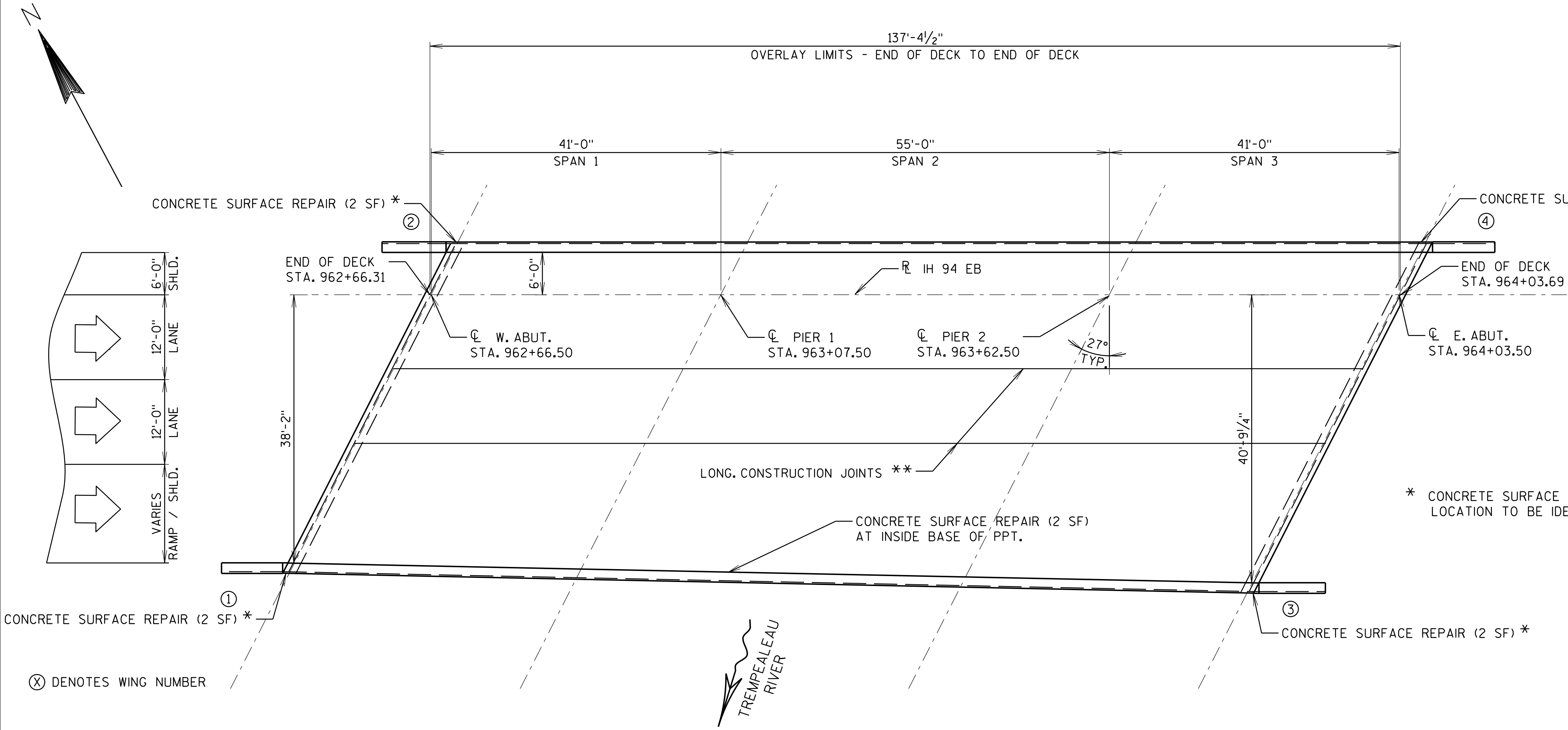
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/20/13 PLATE W04-2.1

PROJECT NO: SHEET NO: E

STATE PROJECT NUMBER
1023-02-76



PLAN

THREE-SPAN HAUNCHED CONCRETE SLAB

DESIGN DATA

LIVE LOAD:

INVENTORY RATING: HS-24
OPERATING RATING: HS-40
WISCONSIN STANDARD PERMIT VEHICLE LOAD (Wis-SPV) = 250 KIPS

ULTIMATE DESIGN STRESSES:

CONCRETE MASONRY OVERLAY DECKS ------------ f'c = 4000 P.S.I.
ALL OTHER CONCRETE MASONRY ---------------- f'c = 3500 P.S.I.

TRAFFIC DATA

IH 94
A.D.T. (2036) = 19200
R.D.S. = 70 MPH

* CONCRETE SURFACE REPAIR AT ABUTMENT WING WALLS. LOCATION TO BE IDENTIFIED IN FIELD BY ENGINEER.

LIST OF DRAWINGS

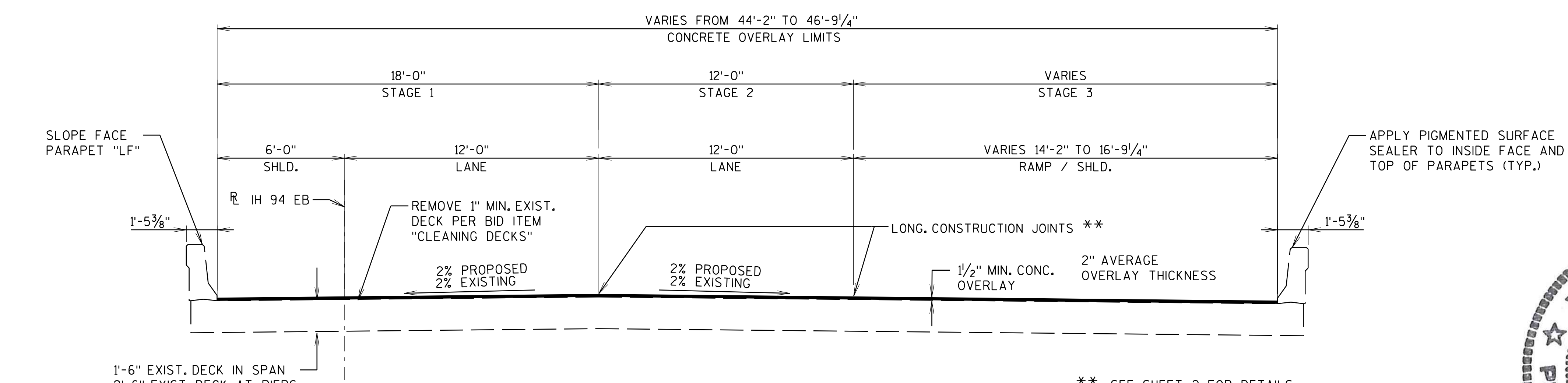
1. GENERAL PLAN
2. GENERAL NOTES & QUANTITIES

BENCHMARKS (NAVD 88)		
NO.	DESCRIPTION	ELEV.
BM200	3/4" REBAR NEAR MEDIAN GUARDRAIL, N. OF BRIDGE	931.09
BM201	3/4" REBAR NEAR MEDIAN GUARDRAIL, S. OF BRIDGE	932.52

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

CONSULTANT CONTACT:
MATT GUNDRY (715) 832-8400

ORIGINAL PLANS PREPARED BY:
FLEMING, ANDRE AND ASSOC., INC.
3615 N. HASTINGS WAY, EAU CLAIRE, WI 54703
715-832-8400 FAX: 715-832-1367



** SEE SHEET 2 FOR DETAILS

CROSS SECTION THRU BRIDGE

LOOKING EAST

WISCONSIN PROFESSIONAL ENGINEER
MATTHEW J. GUNDRY
36517
EAU CLAIRE
WI
2-9-16

NO.	DATE	REVISION	BY

FAA CONSULTING ENGINEERS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

ACCEPTED William C. Dreher SDR 02/10/16
CHIEF STRUCTURES DESIGN ENGINEER DATE

STRUCTURE B-27-21

IH 94 EB OVER TREMPEALEAU RIVER

COUNTY JACKSON ~~TOWN/CITY/~~VILLAGE HIXTON

DESIGN SPEC. REHABILITATION N/A

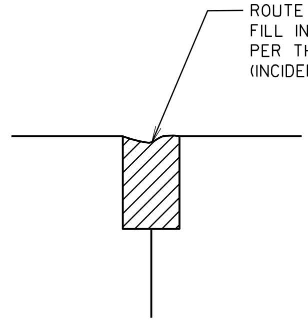
DESIGNED BY RMJ | DESIGN CK'D. MJG | DRAWN BY RMJ | PLANS CK'D. MJG

GENERAL PLAN

SHEET 1 OF 2

8

8



LONGITUDINAL CONSTRUCTION JOINT DETAIL

GENERAL NOTES

DRAWINGS SHALL NOT BE SCALED.

DIMENSIONS AND STATIONING SHOWN ARE BASED ON ORIGINAL STRUCTURE PLANS.

PROTECTIVE SURFACE TREATMENT TO BE APPLIED TO ENTIRE TOP SURFACE OF THE NEW CONCRETE OVERLAY.

PIGMENTED SURFACE SEALER SHALL BE APPLIED TO THE FRONT FACES AND TOPS OF PARAPETS.

A MINIMUM OF 1-INCH OF CONCRETE SHALL BE REMOVED FROM THE ENTIRE BRIDGE DECK UNDER THE BID ITEM "CLEANING DECKS".

ALL CONCRETE REMOVAL NOT COVERED WITH A CONCRETE OVERLAY SHALL BE DEFINED BY A 1-INCH DEEP SAW CUT.

PROFILE GRADE LINE SHALL BE DETERMINED IN THE FIELD BASED ON A MINIMUM OVERLAY THICKNESS OF 1$\frac{1}{2}$" PLACED ABOVE THE DECK SURFACE AFTER SURFACE PREPARATION. EXPECTED AVERAGE OVERLAY THICKNESS IS 2". IF EXPECTED AVERAGE OVERLAY THICKNESS IS EXCEEDED BY MORE THAN $\frac{1}{2}$", CONTACT THE STRUCTURES DESIGN SECTION.

PREPARATION DECKS TYPE 1 & 2, AND FULL-DEPTH DECK REPAIR AREAS SHALL BE DETERMINED BY THE FIELD ENGINEER. DECK PREPARATION AND FULL-DEPTH DECK REPAIRS SHALL BE FILLED WITH "CONCRETE MASONRY OVERLAY DECKS".

ANY EXCAVATION REQUIRED TO COMPLETE THE OVERLAY AT THE ABUTMENTS TO BE CONSIDERED INCIDENTAL TO THE BID ITEM "CONCRETE MASONRY OVERLAY DECKS".

SEE ROAD PLANS FOR STAGING DETAILS.

TOTAL ESTIMATED QUANTITIES

ITEM NUMBER	BID ITEMS	UNIT	SUPER.	WEST ABUT.	EAST ABUT.	TOTALS
502.3200	PROTECTIVE SURFACE TREATMENT	SY	695	-	-	695
502.3210	PIGMENTED SURFACE SEALER	SY	230	-	-	230
509.0301	PREPARATION DECKS TYPE 1	SY	50	-	-	50
509.0302	PREPARATION DECKS TYPE 2	SY	20	-	-	20
509.0500	CLEANING DECKS	SY	695	-	-	695
509.1500	CONCRETE SURFACE REPAIR	SF	2	4	4	10
509.2000	FULL-DEPTH DECK REPAIR	SY	1	-	-	1
509.2500	CONCRETE MASONRY OVERLAY DECKS	CY	43	-	-	43
	NON-BID ITEMS					
	FILLER	SIZE	-	-	-	$\frac{1}{2}$" & $\frac{3}{4}$"

ORIGINAL PLANS PREPARED BY:
FLEMING, ANDRE AND ASSOC., INC.
3615 N. HASTINGS WAY, EAU CLAIRE, WI 54703
715-832-8400 FAX: 715-832-1367

NO.	DATE	REVISION	BY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-27-21

DRAWN BY RMJ PLANS CK'D. MJG

GENERAL NOTES & QUANTITIES

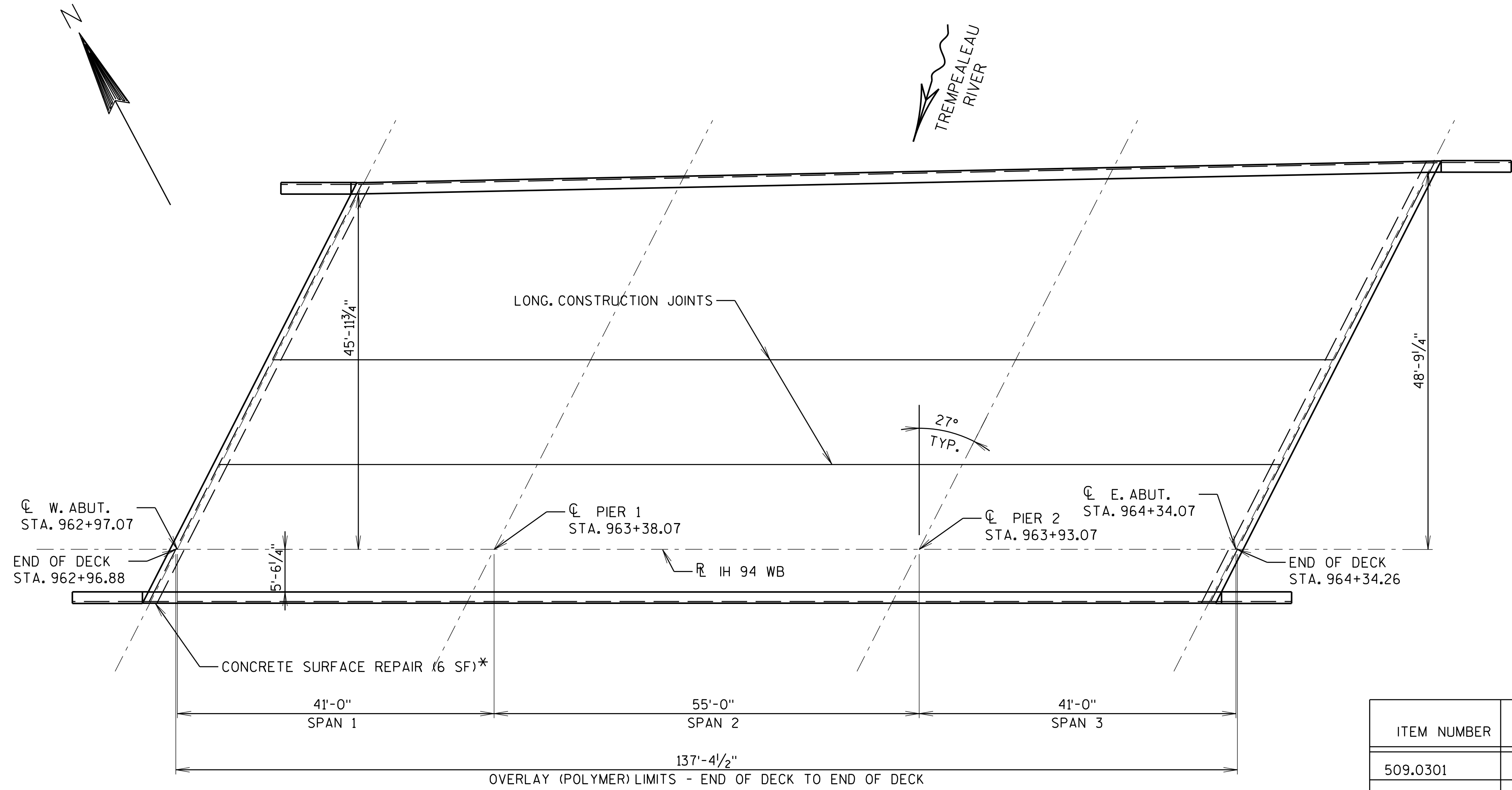
SHEET 2 OF 2

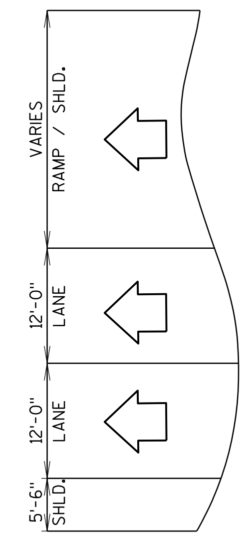
8

8

STATE PROJECT NUMBER

1023-02-76



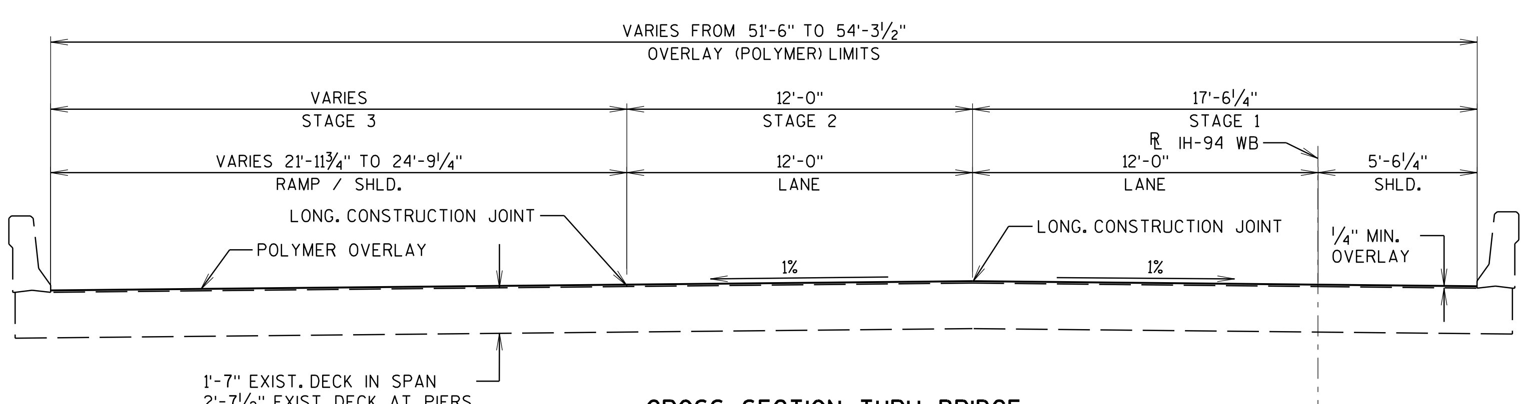


* CONCRETE SURFACE REPAIR AT ABUTMENT WING WALL. LOCATION TO BE IDENTIFIED IN FIELD BY ENGINEER.

PLAN

THREE-SPAN HAUNCHED CONCRETE SLAB

BENCHMARKS (NAVD 88)		
NO.	DESCRIPTION	ELEV.
BM200	3/4" REBAR NEAR MEDIAN GUARDRAIL, N. OF BRIDGE	931.09
BM201	3/4" REBAR NEAR MEDIAN GUARDRAIL, S. OF BRIDGE	932.52



CROSS SECTION THRU BRIDGE

LOOKING EAST

DESIGN DATA

LIVE LOAD:

INVENTORY RATING: HS-27
OPERATING RATING: HS-45
WISCONSIN STANDARD PERMIT VEHICLE LOAD (Wis-SPV) = 250 KIPS

NOTE:
RATINGS ACCOUNT FOR A SUPERIMPOSED DEADLOAD OF 5 LBS/SF FOR THE POLYMER OVERLAY

MATERIAL PROPERTIES

CONCRETE MASONRY - DECK PATCHING f'c = 4,000 P.S.I.

TRAFFIC DATA

A.D.T. (2036) = 16600
R.D.S. = 70 MPH

LIST OF DRAWINGS

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

CONSULTANT CONTACT:
MATT GUNDRY (715) 832-8400

TOTAL ESTIMATED QUANTITIES

ITEM NUMBER	BID ITEMS	UNIT	SUPER.	WEST ABUT.	EAST ABUT.	TOTALS
509.0301	PREPARATION DECKS TYPE 1	SY	50	-	-	50
509.0302	PREPARATION DECKS TYPE 2	SY	20	-	-	20
509.1500	CONCRETE SURFACE REPAIR	SF	-	6	-	6
509.2000	FULL-DEPTH DECK REPAIR	SY	1	-	-	1
509.5100.S	POLYMER OVERLAY	SY	810	-	-	810
SPV.0035.02	CONCRETE MASONRY DECK PATCHING	CY	4	-	-	4
SPV.0090.01	SAWING PAVEMENT DECK PREPARATION AREAS	LF	85	-	-	85

WISCONSIN MATTHEW J. GUNDRY 36517 EAU CLAIRE WI PROFESSIONAL ENGINEER 2-1-16

GENERAL NOTES

DRAWINGS SHALL NOT BE SCALED

DIMENSIONS AND STATIONING SHOWN ARE BASED ON ORIGINAL STRUCTURE PLANS

DECK SURFACE PREPARATION IS INCLUDED IN THE BID ITEM "POLYMER OVERLAY"

AREAS OF "PREPARATION DECKS TYPE 1" SHALL BE DEFINED BY A SAW CUT

PREPARATION DECKS TYPE 1, PREPARATION DECKS TYPE 2, AND FULL-DEPTH REPAIR AREAS ARE BASED ON THE PLANS AND AS DETERMINED BY THE ENGINEER. DECK PREPARATION AND FULL DEPTH DECK REPAIRS SHALL BE FILLED WITH "CONCRETE MASONRY DECK PATCHING".

ORIGINAL PLANS PREPARED BY:
FLEMING, ANDRE AND ASSOC., INC.
3615 N. HASTINGS WAY, EAU CLAIRE, WI 54703
715-832-8400 FAX: 715-832-1367

NO.	DATE	REVISION	BY

FAA CONSULTING ENGINEERS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

ACCEPTED William C. Dreher SDR 02/08/16
CHIEF STRUCTURES DESIGN ENGINEER DATE

STRUCTURE B-27-22

IH 94 WB OVER TREMPEALEAU RIVER

COUNTY JACKSON ~~TOWN/CITY/~~VILLAGE HIXTON

DESIGN SPEC. REHABILITATION N/A

DESIGNED BY RMJ | DESIGN CK'D. MJG | DRAWN BY RMJ | PLANS CK'D. MJG

GENERAL PLAN

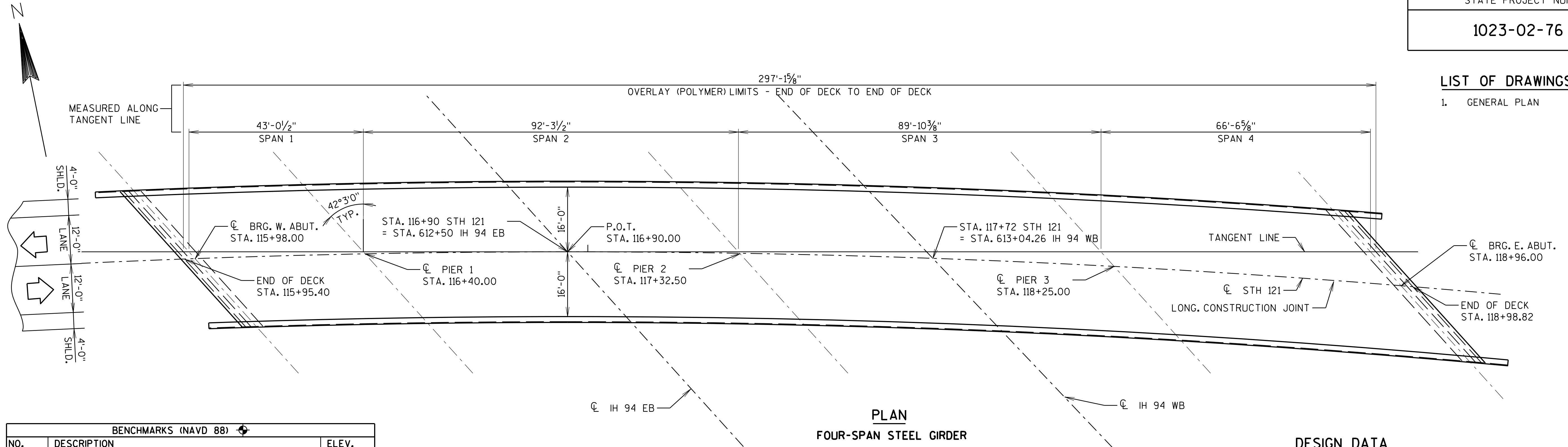
SHEET 1 OF 1

8

8

STATE PROJECT NUMBER
1023-02-76

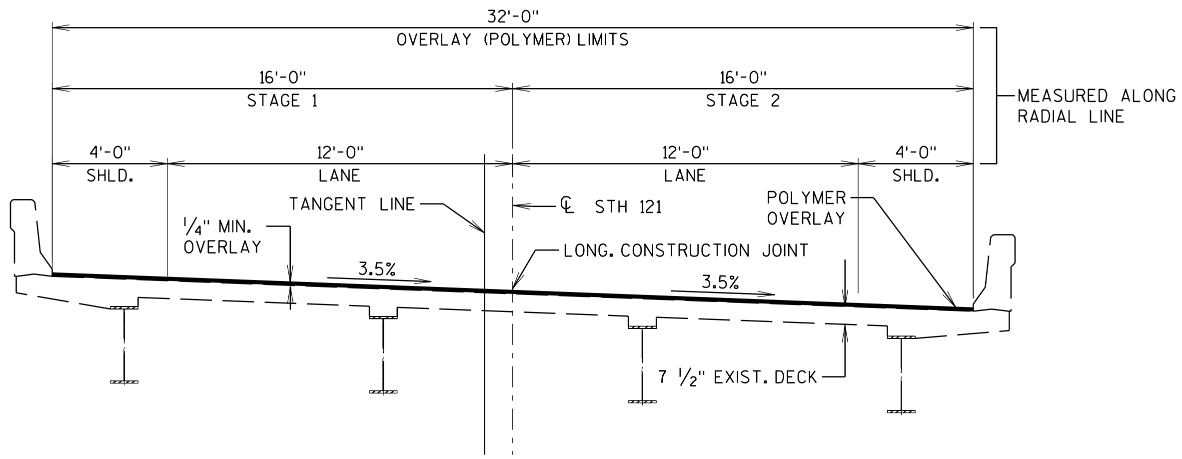
LIST OF DRAWINGS



PLAN

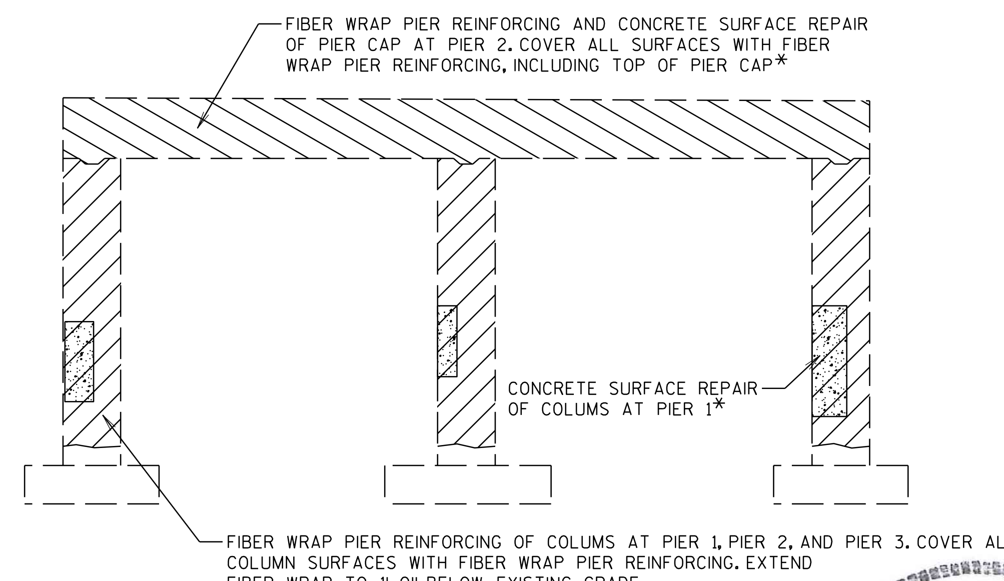
FOUR-SPAN STEEL GIRDER

BENCHMARKS (NAVD 88)		
NO.	DESCRIPTION	ELEV.
BM300	3/4" REBAR BEHIND NORTHEAST GUARD RAIL	990.80
BM301	3/4" REBAR BEHIND NORTHWEST GUARD RAIL	976.28



CROSS SECTION THRU BRIDGE

(LOOKING EAST)



* CONCRETE SURFACE REPAIR LOCATIONS ON PIER CAP AND COLUMNS TO BE IDENTIFIED IN FIELD BY ENGINEER

ELEVATION AT PIER

DESIGN DATA

LIVE LOAD:

INVENTORY RATING: HS17
OPERATING RATING: HS29
WISCONSIN STANDARD PERMIT VEHICLE LOAD (Wis-SPV) = 223 KIPS

NOTE:
RATINGS ACCOUNT FOR A SUPERIMPOSED DEADLOAD OF 5 LBS/SF FOR THE POLYMER OVERLAY

TRAFFIC DATA

A.D.T. (2036) = 1500
R.D.S. = 45 MPH

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

CONSULTANT CONTACT:
MATT GUNDRY (715) 832-8400

ORIGINAL PLANS PREPARED BY:
FLEMING, ANDRE AND ASSOC., INC.
3615 N. HASTINGS WAY, EAU CLAIRE, WI 54703
715-832-8400 FAX: 715-832-1367

TOTAL ESTIMATED QUANTITIES

ITEM NUMBER	BID ITEMS	UNIT	SUPER.	PIER 1	PIER 2	PIER 3	TOTALS
509.1500	CONCRETE SURFACE REPAIR	SF	-	50	250	-	300
509.5100.S	POLYMER OVERLAY	SY	1080	-	-	-	1080
SPV.0165.01	FIBER WRAP PIER REINFORCING	SF	-	370	970	520	1860

GENERAL NOTES

DRAWINGS SHALL NOT BE SCALED.

DIMENSIONS AND STATIONING SHOWN ARE BASED ON ORIGINAL STRUCTURE PLANS.

DECK SURFACE PREPARATION IS INCLUDED IN THE BID ITEM "POLYMER OVERLAY".

WISCONSIN MATTHEW J. GUNDRY 36517 EAU CLAIRE WI PROFESSIONAL ENGINEER
1-22-16

NO.	DATE	REVISION	BY

FAA CONSULTING ENGINEERS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

ACCEPTED William C. Dreher SOR 02/23/16
CHIEF STRUCTURES DESIGN ENGINEER DATE

STRUCTURE B-27-46

STH 121 OVER IH 94

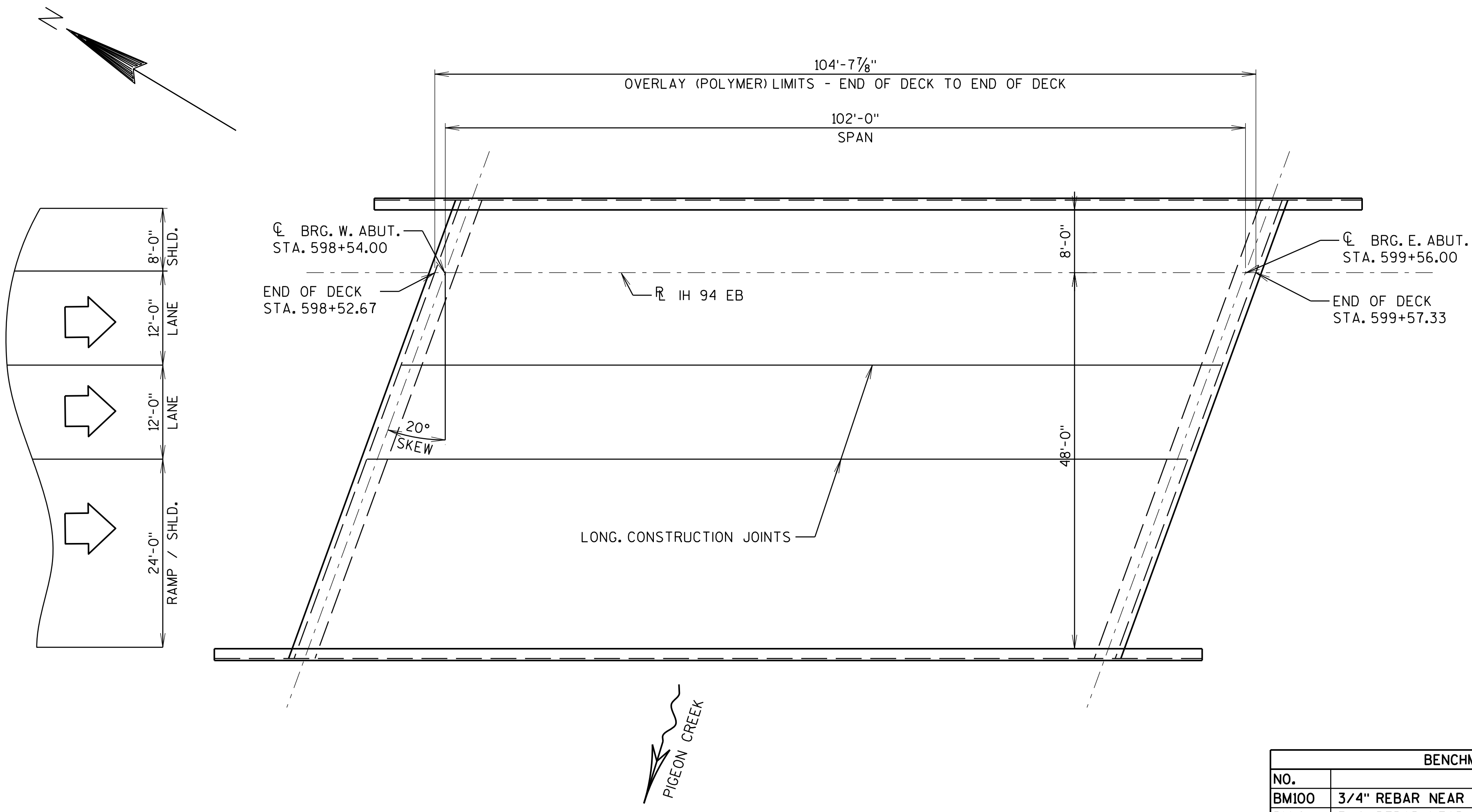
COUNTY JACKSON		TOWN/~~CITY/VILLAGE~~ NORTHFIELD	
DESIGN SPEC. REHABILITATION N/A			
DESIGNED BY RMJ	DESIGN CK'D. MJG	DRAWN BY RMJ	PLANS CK'D. MJG

GENERAL PLAN

SHEET 1 OF 1

STATE PROJECT NUMBER

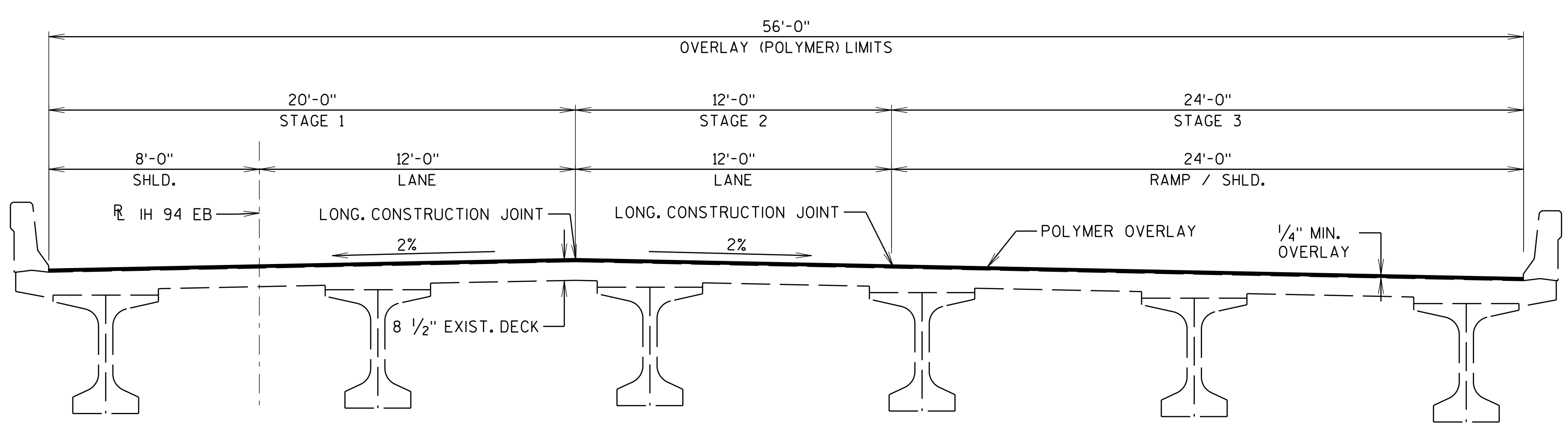
1023-02-76



PLAN

SINGLE-SPAN PRESTRESSED GIRDER BRIDGE

BENCHMARKS (NAVD 88)		
NO.	DESCRIPTION	ELEV.
BM100	3/4" REBAR NEAR MEDIAN GUARDRAIL, S. OF BRIDGE	941.38
BM101	3/4" REBAR NEAR MEDIAN GUARDRAIL, N. OF BRIDGE	940.43



CROSS SECTION THRU BRIDGE

(LOOKING EAST)

DESIGN DATA

LIVE LOAD:

INVENTORY RATING: HS-22
OPERATING RATING: HS-49
WISCONSIN STANDARD PERMIT VEHICLE LOAD (Wis-SPV) = 250 KIPS

NOTE:
RATINGS ACCOUNT FOR A SUPERIMPOSED DEADLOAD OF 5 LBS/SF FOR THE POLYMER OVERLAY

GENERAL NOTES

DRAWINGS SHALL NOT BE SCALED

DIMENSIONS AND STATIONING SHOWN ARE BASED ON ORIGINAL STRUCTURE PLANS

DECK SURFACE PREPARATION IS INCLUDED IN THE BID ITEM "POLYMER OVERLAY"

TRAFFIC DATA

A.D.T. (2036) = 14200
R.D.S. = 70 MPH

LIST OF DRAWINGS

1. GENERAL PLAN

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

CONSULTANT CONTACT:
MATT GUNDRY (715) 832-8400

ORIGINAL PLANS PREPARED BY:
FLEMING, ANDRE AND ASSOC., INC.
3615 N. HASTINGS WAY, EAU CLAIRE, WI 54703
715-832-8400 FAX: 715-832-1367

WISCONSIN
MATTHEW J. GUNDRY
36517
EAU CLAIRE
WI
2-1-16
PROFESSIONAL ENGINEER

TOTAL ESTIMATED QUANTITIES

509.5100.S POLYMER OVERLAY ---------- 650 SY

NO.	DATE	REVISION	BY

FAA CONSULTING ENGINEERS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

ACCEPTED William C. Dreher SDR 02/08/16
CHIEF STRUCTURES DESIGN ENGINEER DATE

STRUCTURE B-27-148

IH 94 EB OVER PIGEON CREEK

COUNTY JACKSON TOWN/~~CITY/VILLAGE~~ NORTHFIELD

DESIGN SPEC. REHABILITATION N/A

DESIGNED BY RMJ | DESIGN CK'D. MJG | DRAWN BY RMJ | PLANS CK'D. MJG

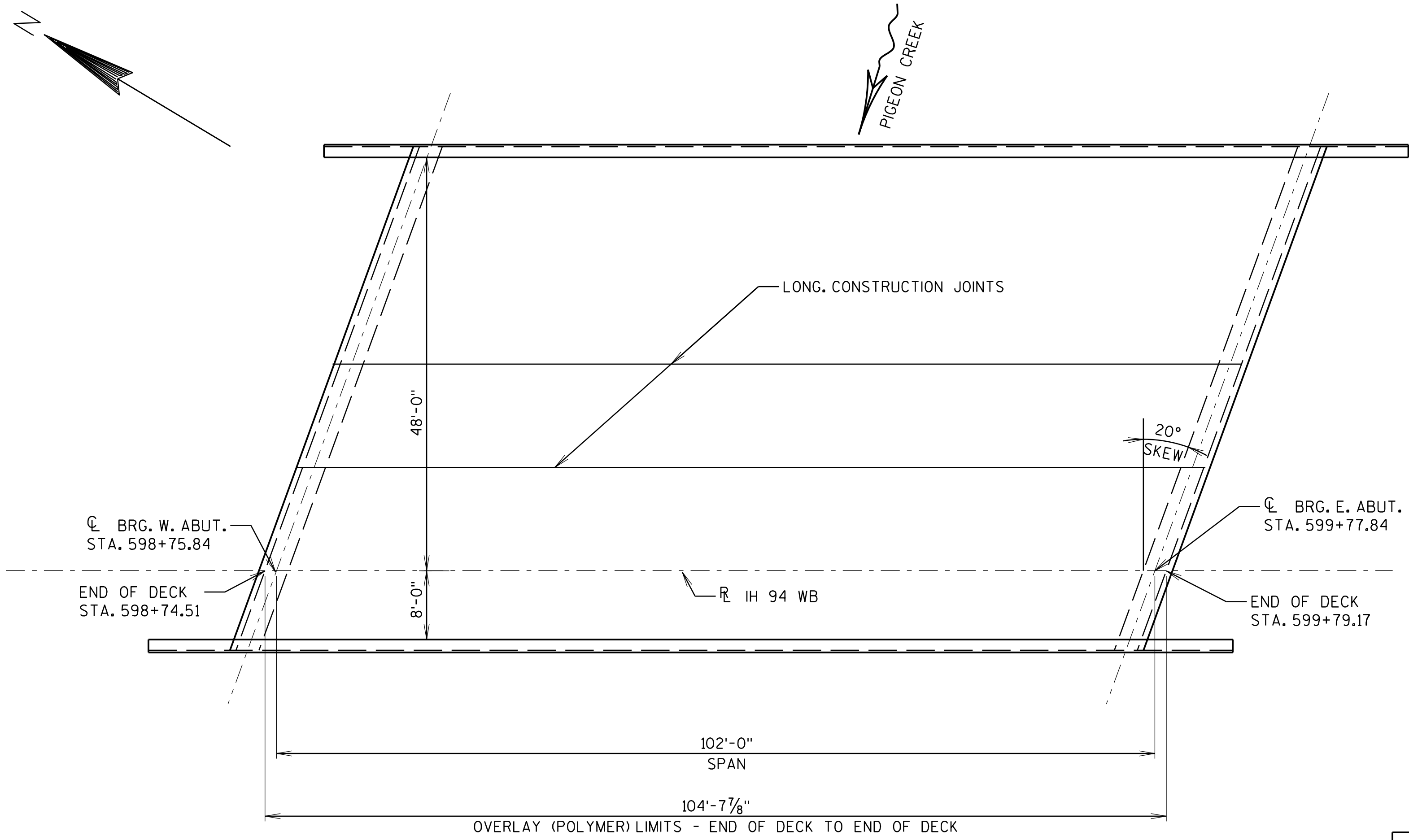
GENERAL PLAN

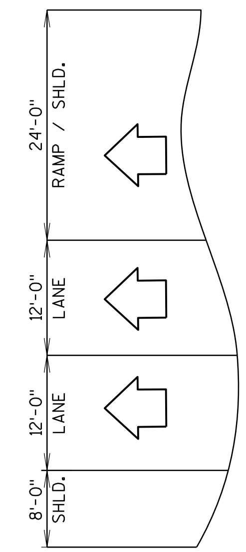
SHEET 1 OF 1

 8

STATE PROJECT NUMBER

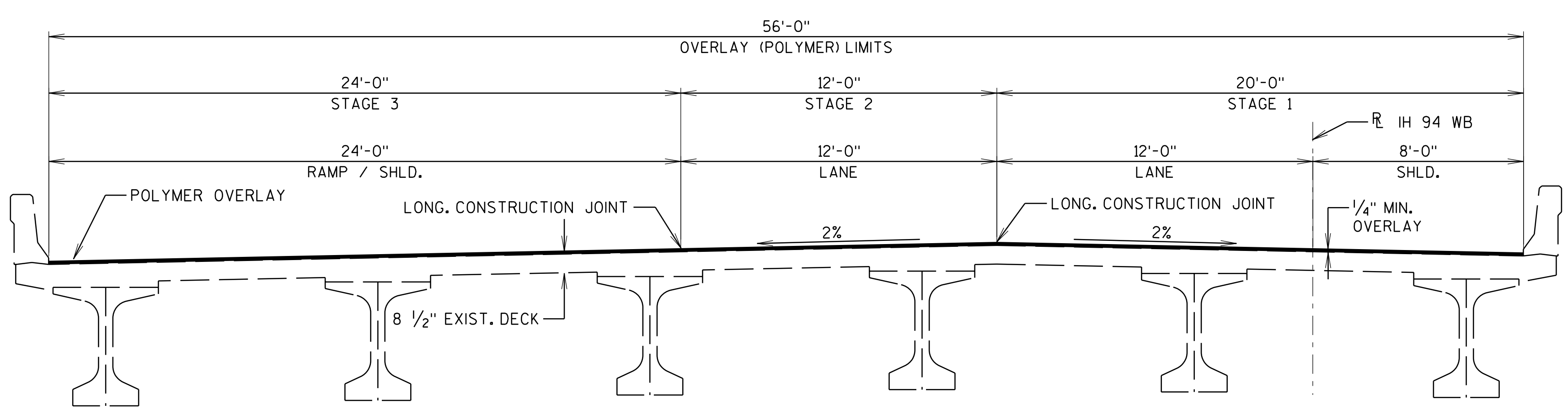
1023-02-76





PLAN

SINGLE-SPAN PRESTRESSED GIRDER BRIDGE



CROSS SECTION THRU BRIDGE

(LOOKING EAST)

DESIGN DATA

LIVE LOAD:

INVENTORY RATING: HS-22
OPERATING RATING: HS-49
WISCONSIN STANDARD PERMIT VEHICLE LOAD (Wis-SPV) = 250 KIPS

NOTE:
RATINGS ACCOUNT FOR A SUPERIMPOSED DEADLOAD OF 5 LBS/SF FOR THE POLYMER OVERLAY

GENERAL NOTES

DRAWINGS SHALL NOT BE SCALED

DIMENSIONS AND STATIONING SHOWN ARE BASED ON ORIGINAL STRUCTURE PLANS

DECK SURFACE PREPARATION IS INCLUDED IN THE BID ITEM "POLYMER OVERLAY"

TRAFFIC DATA

A.D.T. (2036) = 18500
R.D.S. = 70 MPH

LIST OF DRAWINGS

BENCHMARKS (NAVD 88)		
NO.	DESCRIPTION	ELEV.
BM100	3/4" REBAR NEAR MEDIAN GUARDRAIL, S. OF BRIDGE	941.38
BM101	3/4" REBAR NEAR MEDIAN GUARDRAIL, N. OF BRIDGE	940.43

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

CONSULTANT CONTACT:
MATT GUNDRY (715) 832-8400

ORIGINAL PLANS PREPARED BY:
FLEMING, ANDRE AND ASSOC., INC.
3615 N. HASTINGS WAY, EAU CLAIRE, WI 54703
715-832-8400 FAX: 715-832-1367

WISCONSIN PROFESSIONAL ENGINEER
MATTHEW J. GUNDRY
36517
EAU CLAIRE
WI
2-9-16

TOTAL ESTIMATED QUANTITIES

509.5100.S POLYMER OVERLAY ---------- 650 SY

NO.	DATE	REVISION	BY

FAA CONSULTING ENGINEERS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

ACCEPTED William C. Dreher SDR 02/10/16
CHIEF STRUCTURES DESIGN ENGINEER DATE

STRUCTURE B-27-149

IH 94 WB OVER PIGEON CREEK

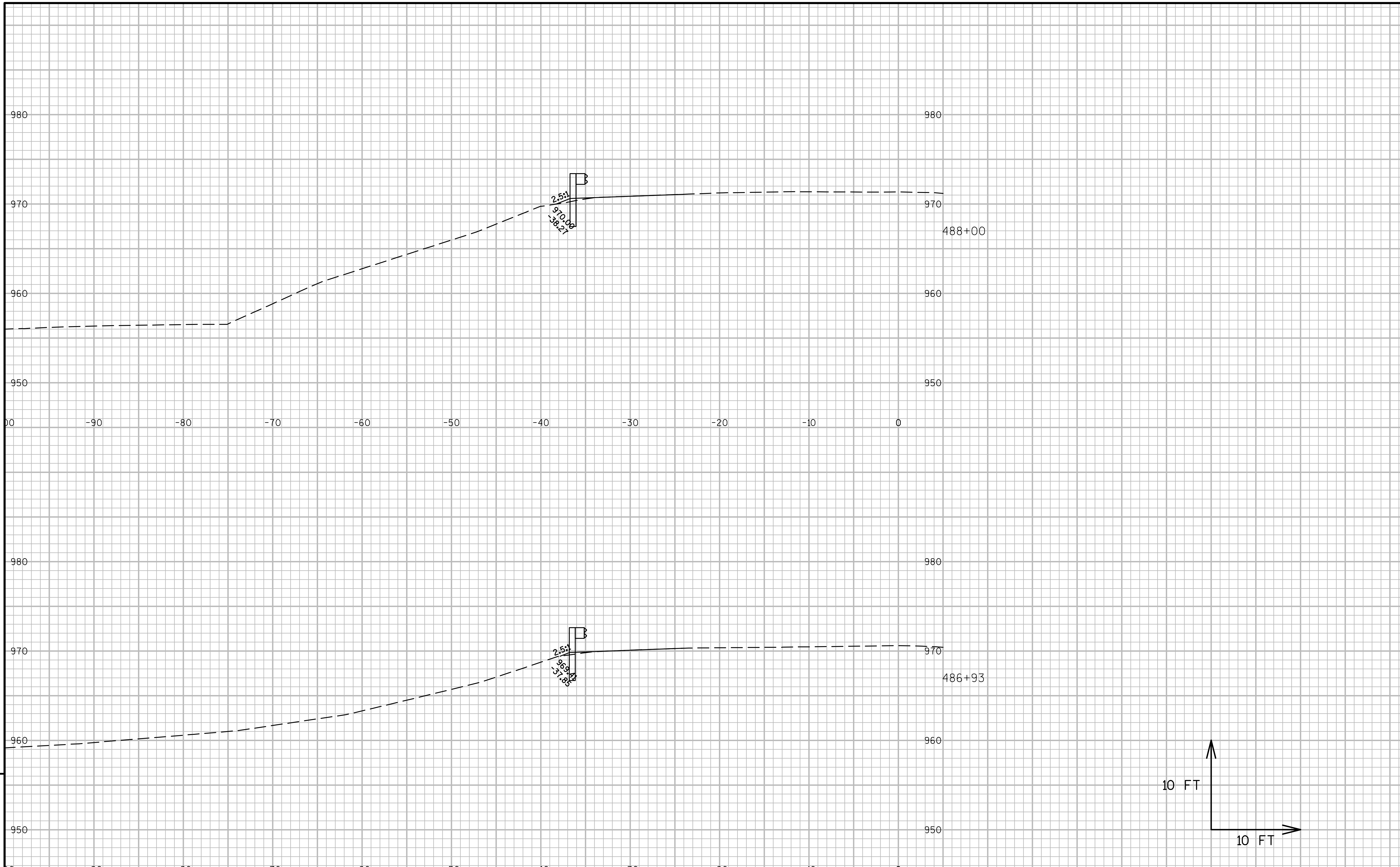
COUNTY JACKSON | TOWN/~~CITY/VILLAGE~~ NORTHFIELD

DESIGN SPEC.
REHABILITATION N/A

DESIGNED BY RMJ | DESIGN CK'D. MJG | DRAWN BY RMJ | PLANS CK'D. MJG

GENERAL PLAN

SHEET 1 OF 1



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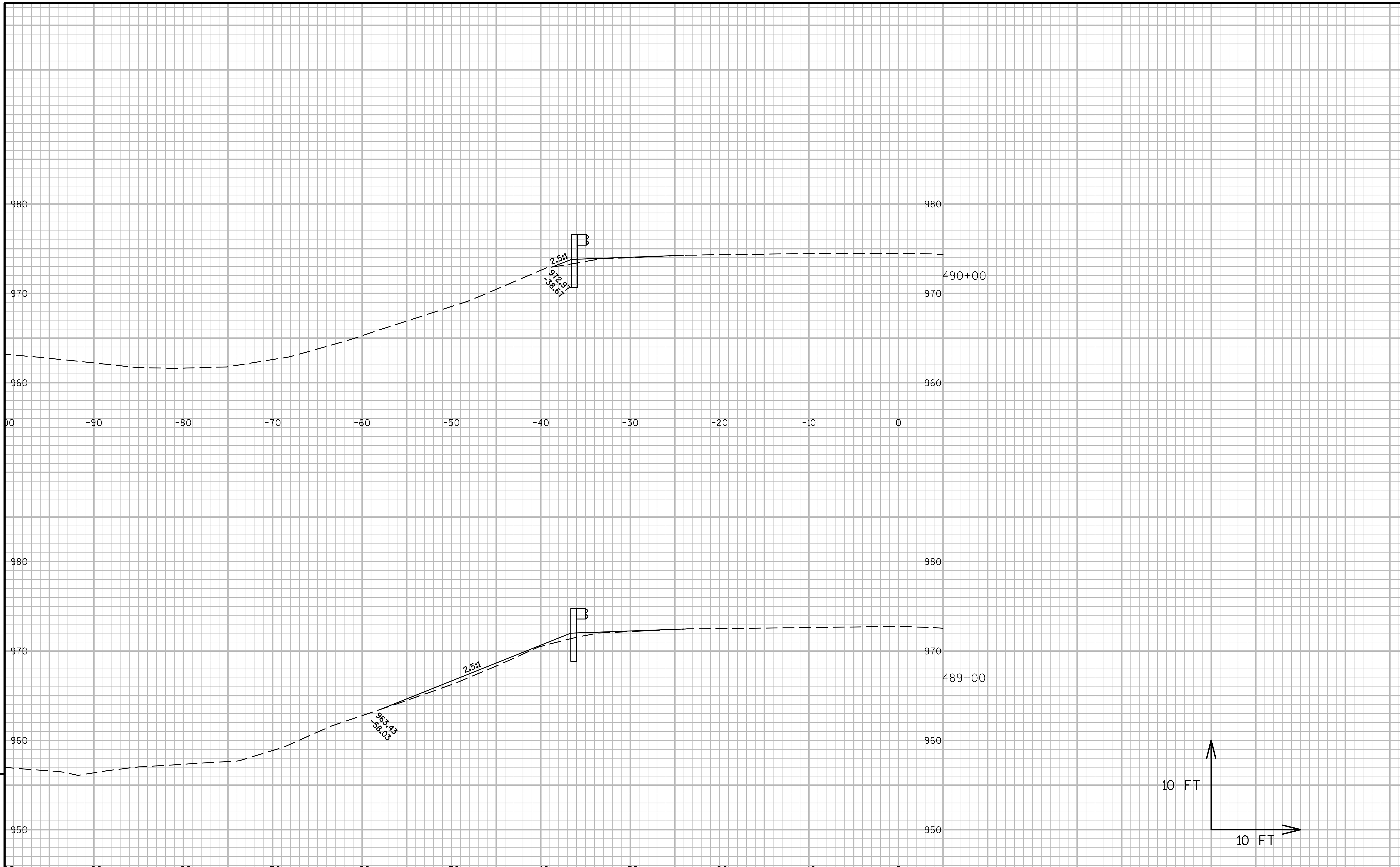
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 154	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090201

PLOT DATE : 2/1/2016 8:37 AM   PLOT BY : BECKLIN, MATTHEW R   PLOT NAME :   PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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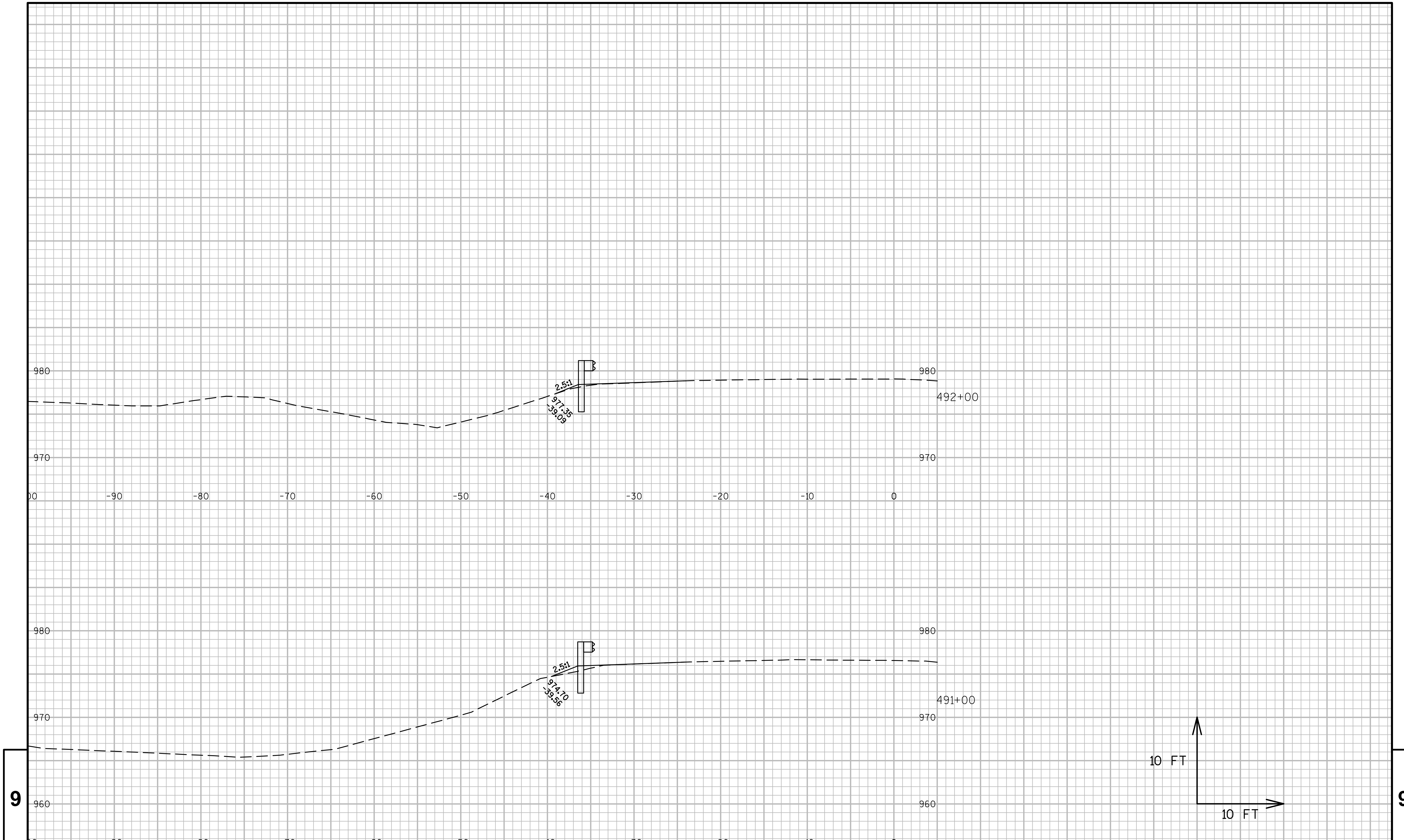
9

PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 155	E

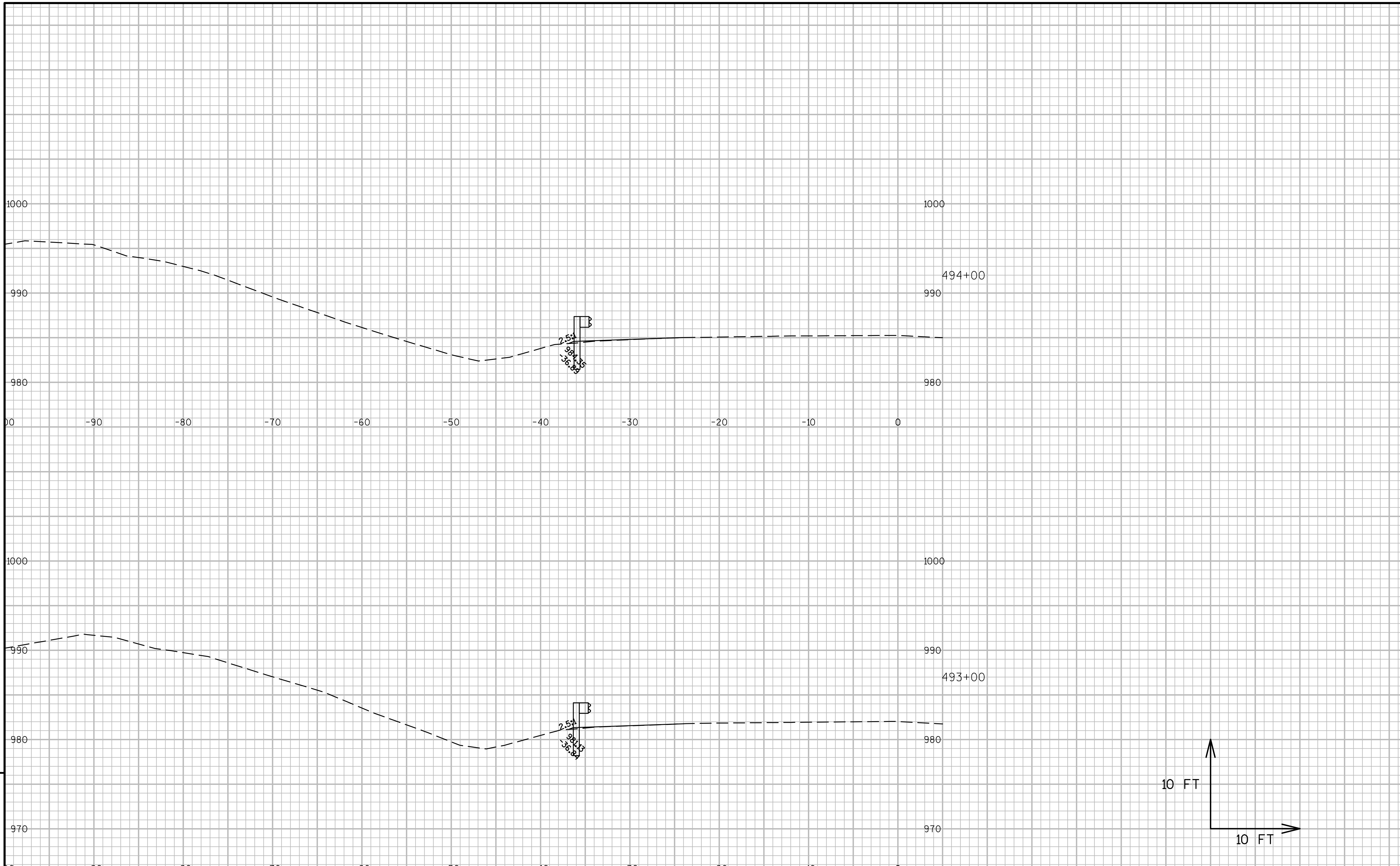
FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090202

PLOT DATE : 2/1/2016 8:37 AM   PLOT BY : BECKLIN, MATTHEW R   PLOT NAME :   PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO:1023-02-76 | HWY:IH 94 | COUNTY:JACKSON | CROSS SECTIONS: WB BEAM GUARD GRADING | SHEET 156 | E



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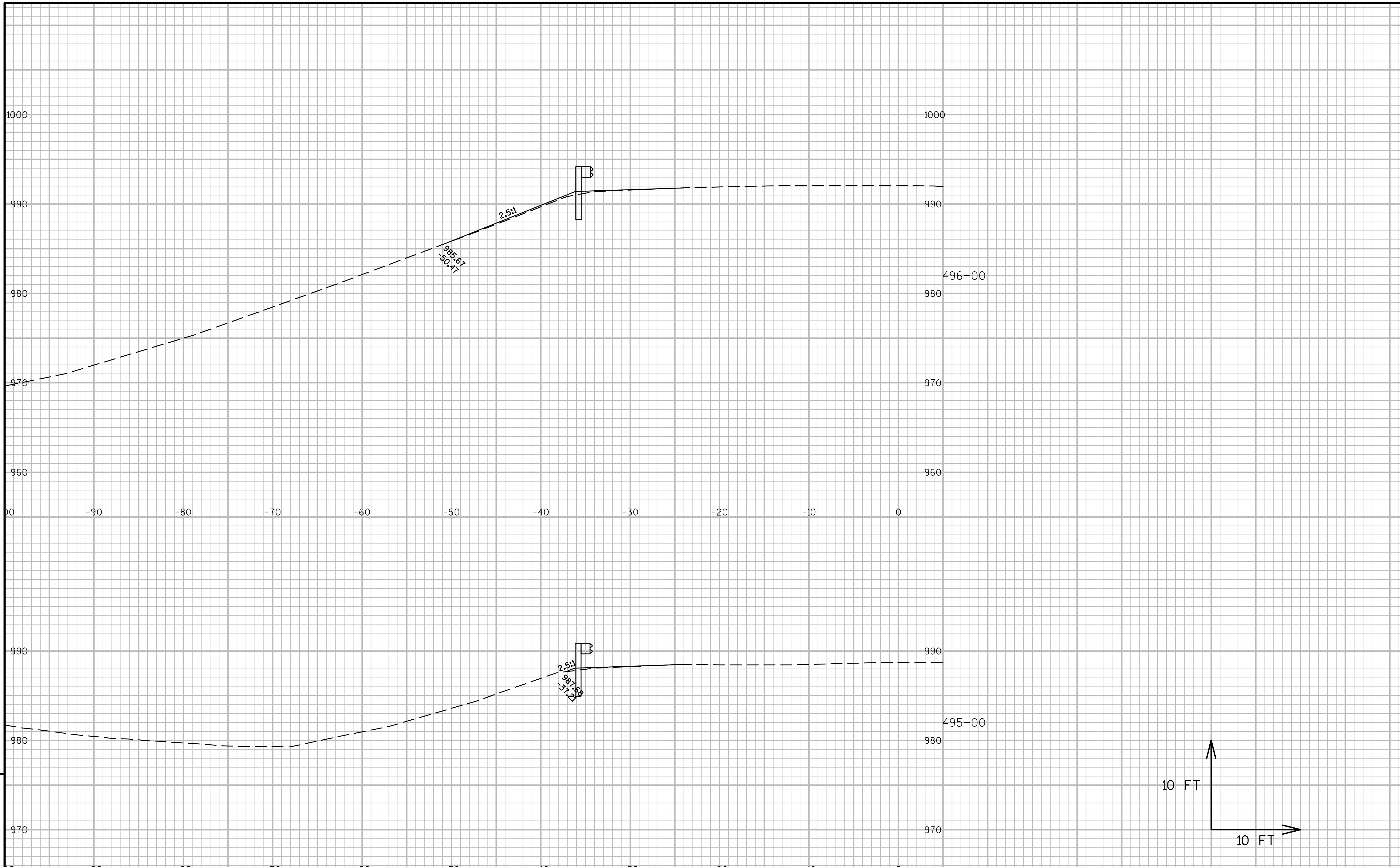
9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 157	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090204

PLOT DATE : 2/1/2016 8:37 AM   PLOT BY : BECKLIN, MATTHEW R   PLOT NAME :   PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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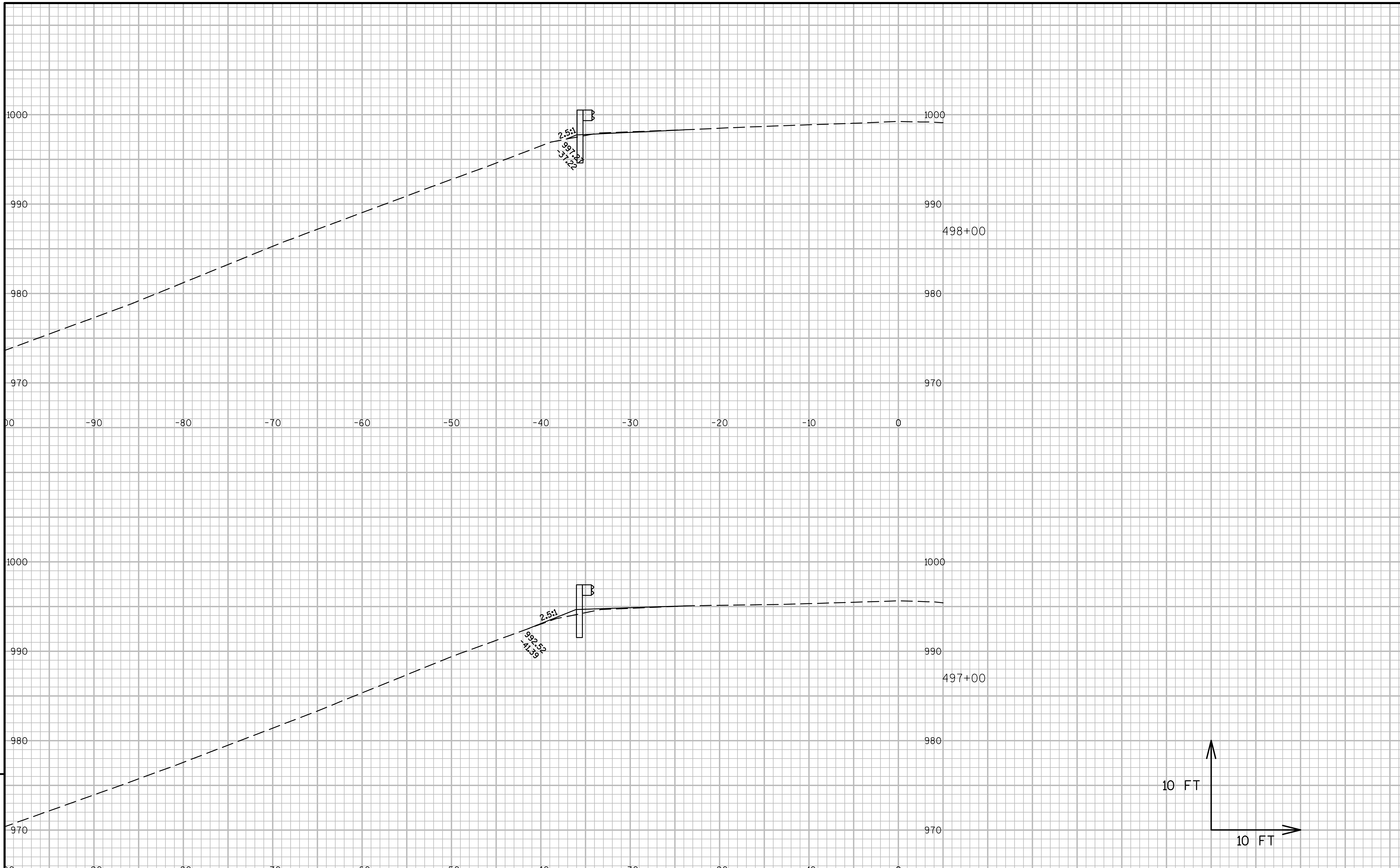
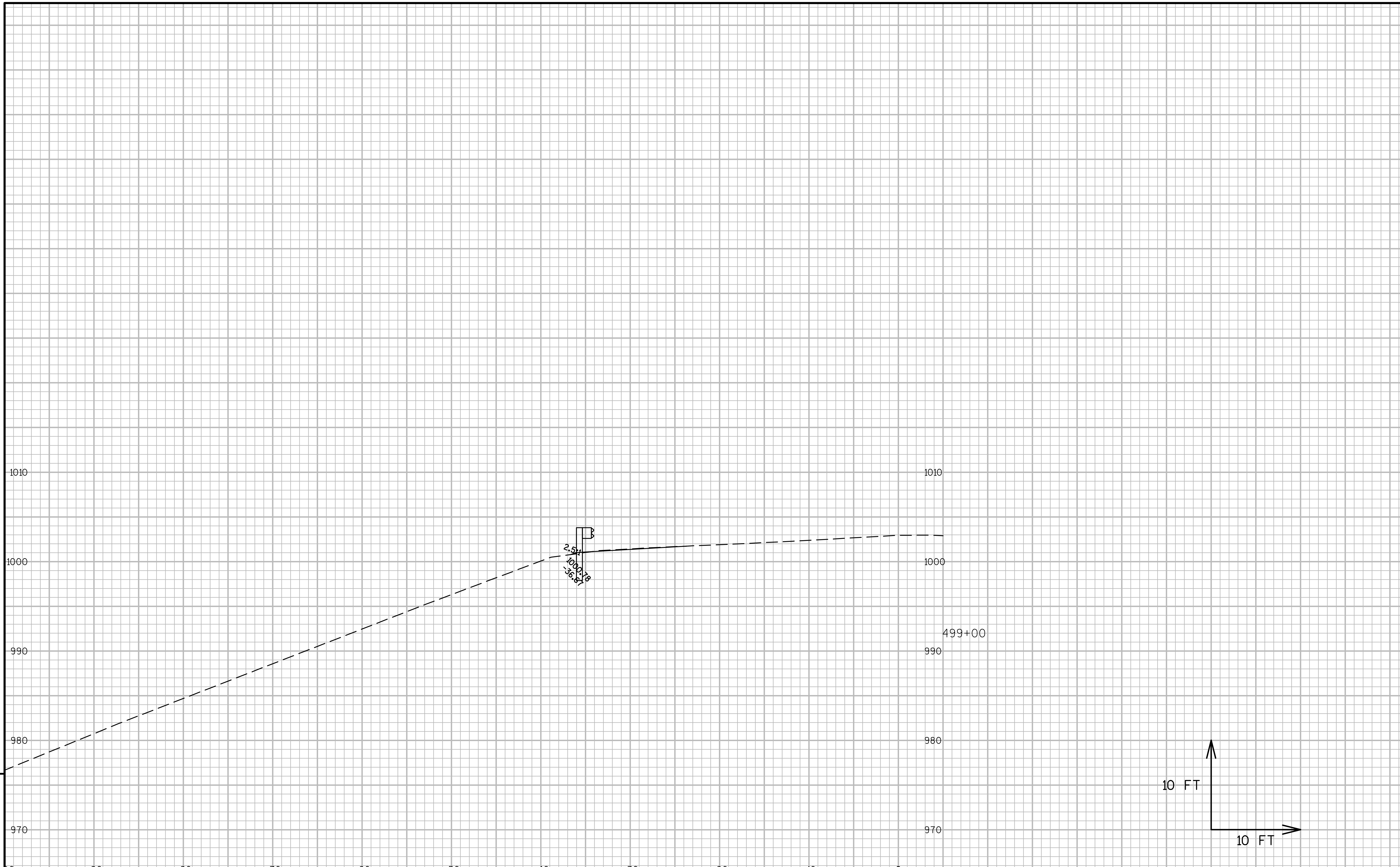
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 158	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090205
PLOT DATE : 2/1/2016 8:37 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1 IN:10 FT



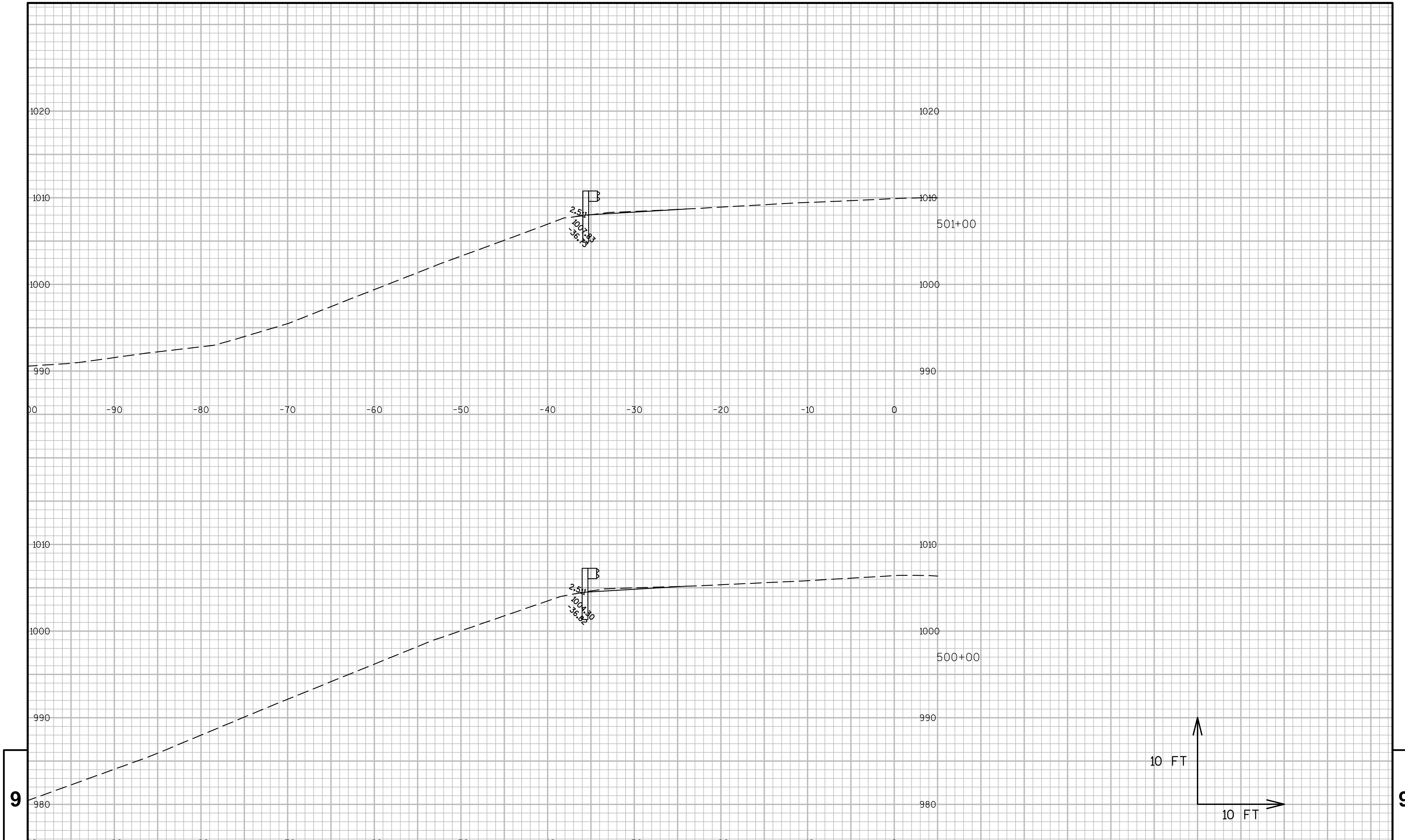
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090206
PLOT DATE : 2/1/2016 8:38 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



9 | 9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 160	E



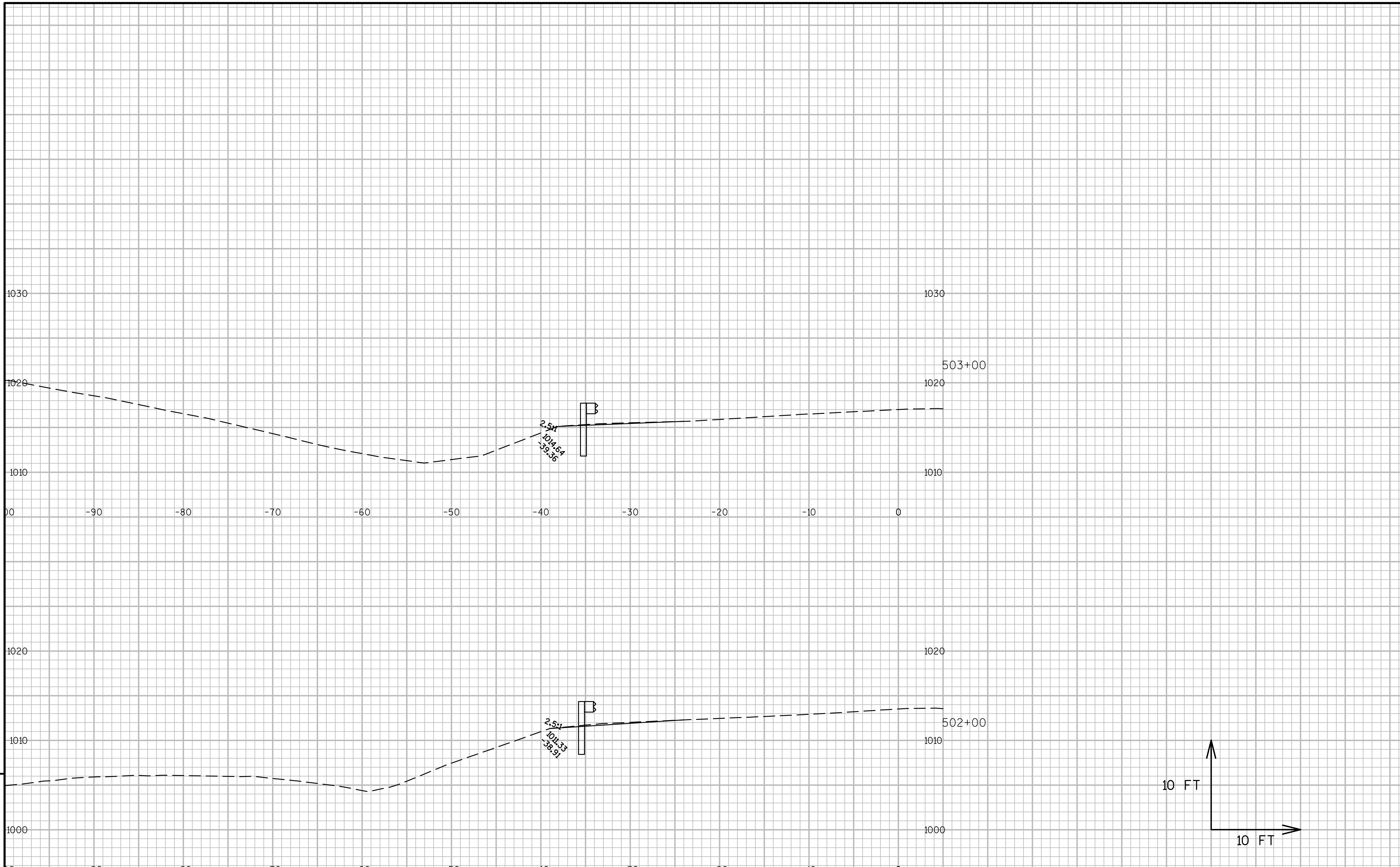
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 161	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090208

PLOT DATE : 2/1/2016 8:38 AM   PLOT BY : BECKLIN, MATTHEW R   PLOT NAME :   PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49

9



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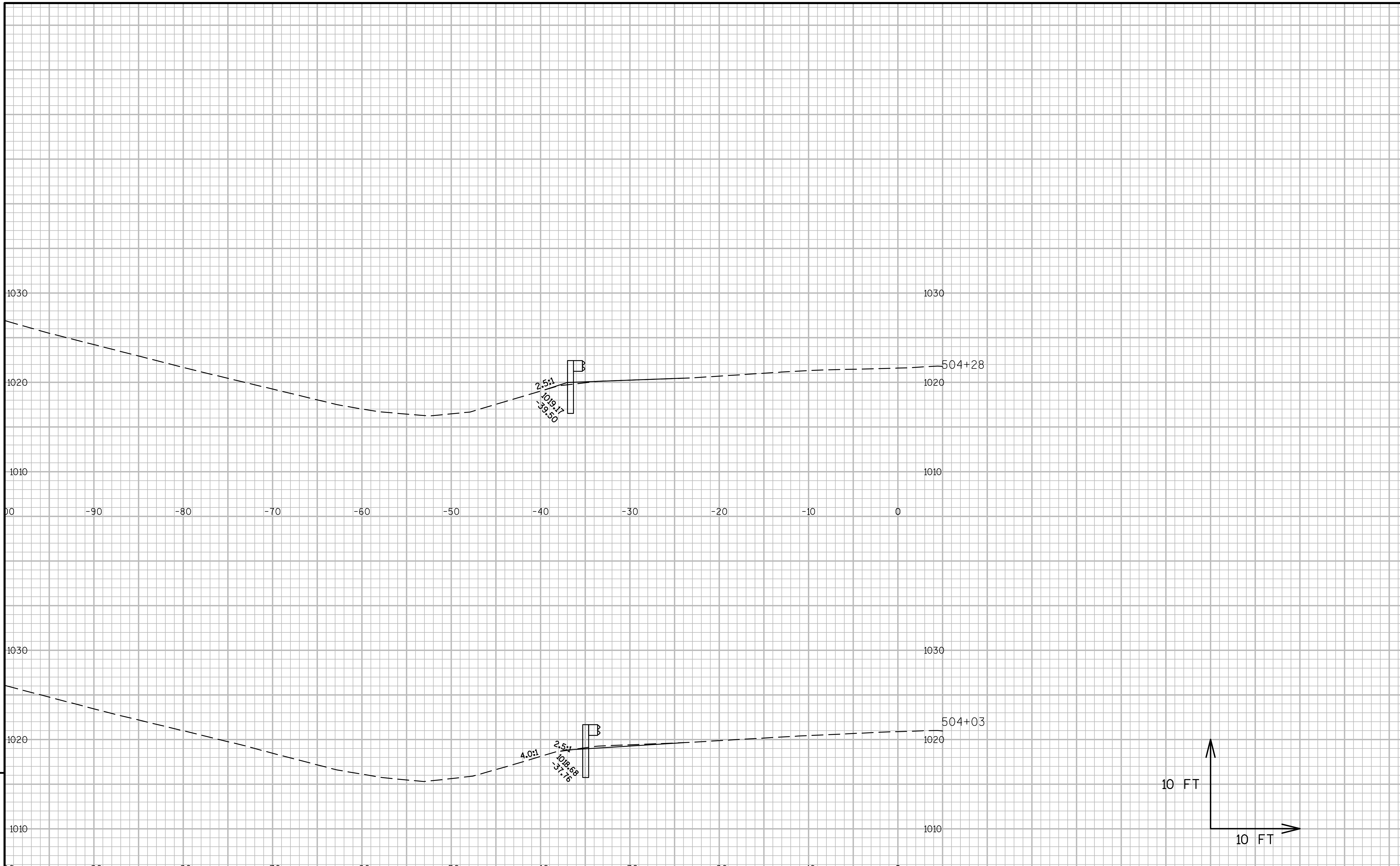
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 162	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090209

PLOT DATE : 2/1/2016 8:38 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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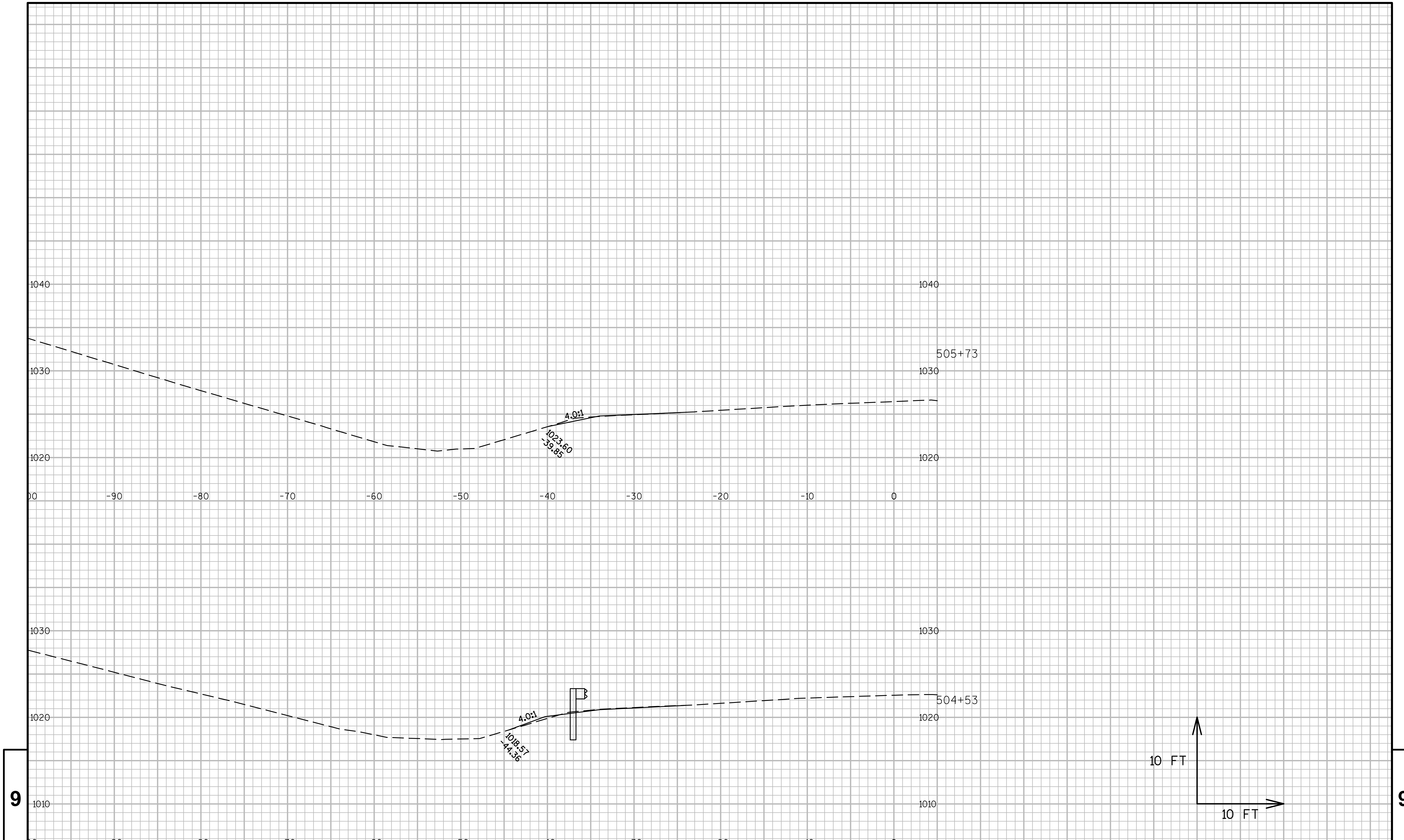
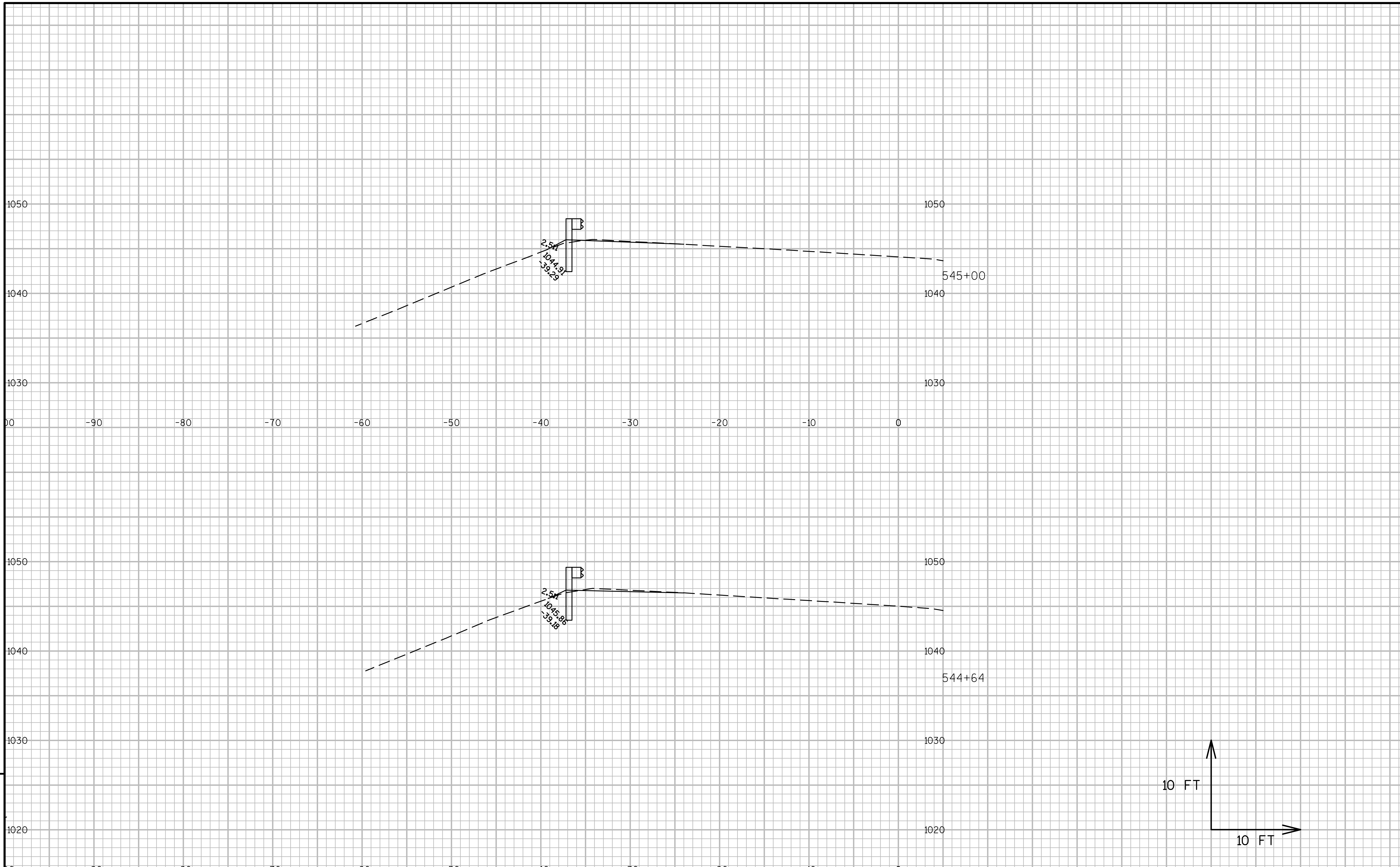
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS:WB BEAM GUARD GRADING	SHEET 163	E



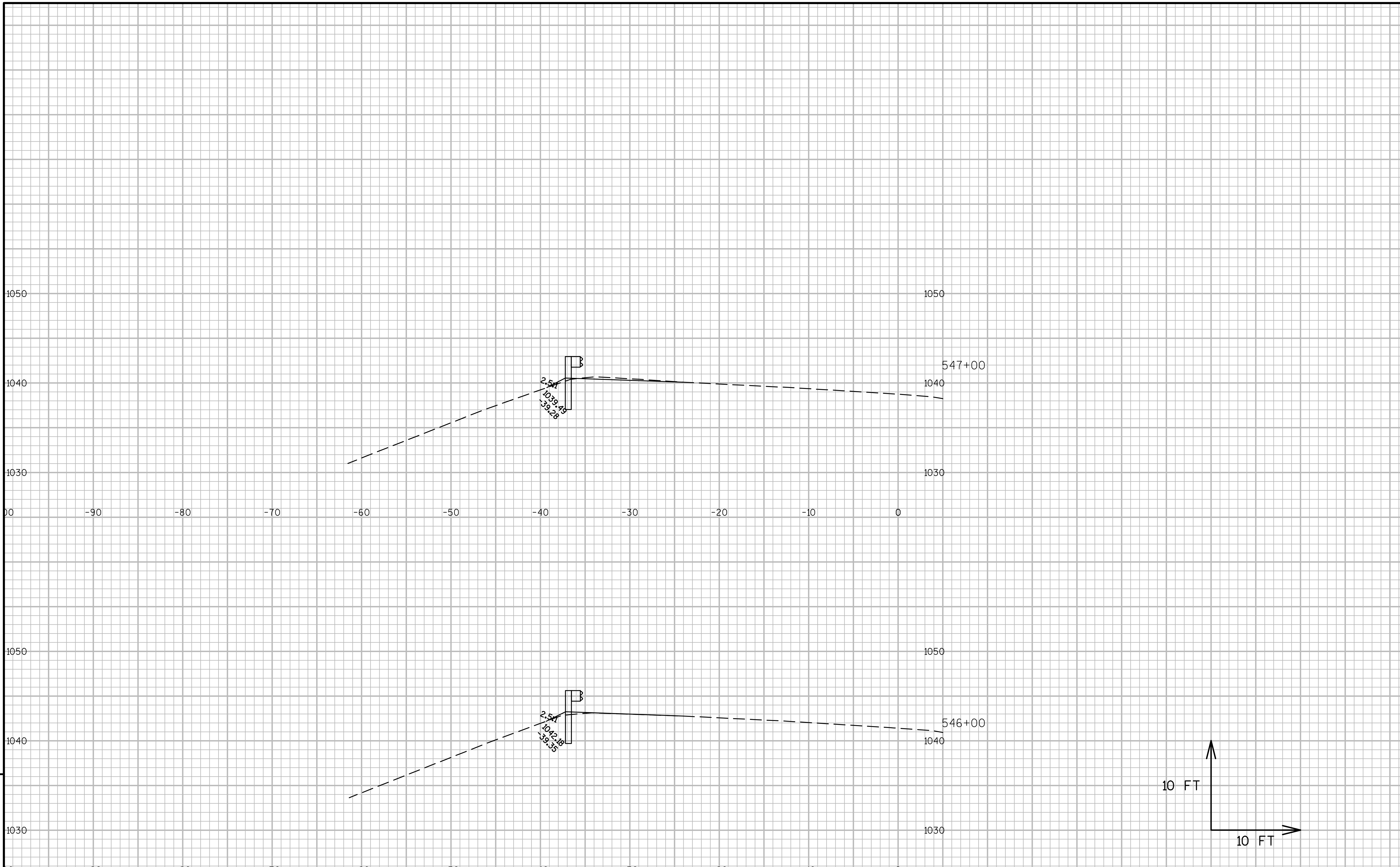
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 164	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090211
PLOT DATE : 2/1/2016 8:38 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

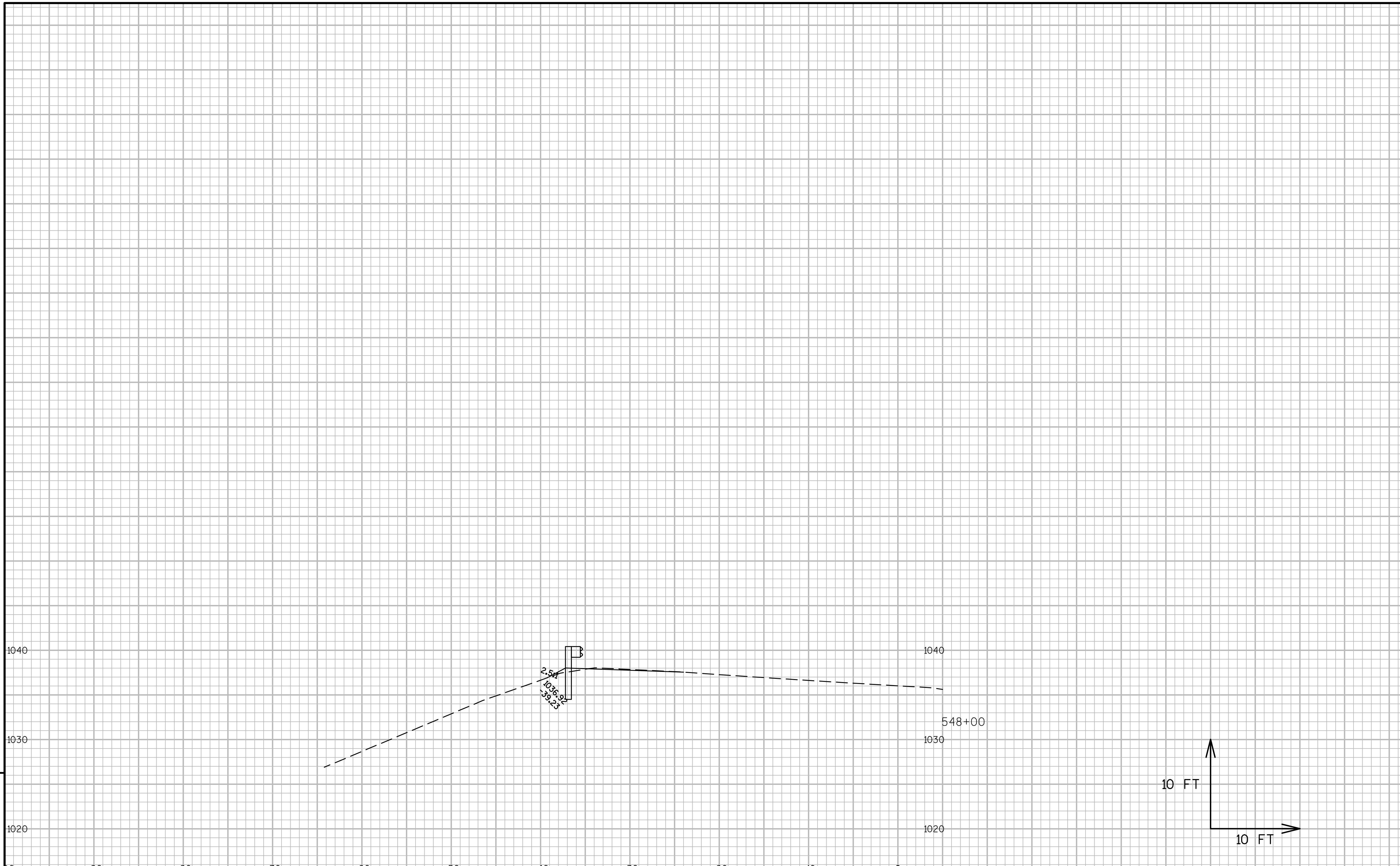


PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 165	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090212
PLOT DATE : 2/1/2016 8:38 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 166	E



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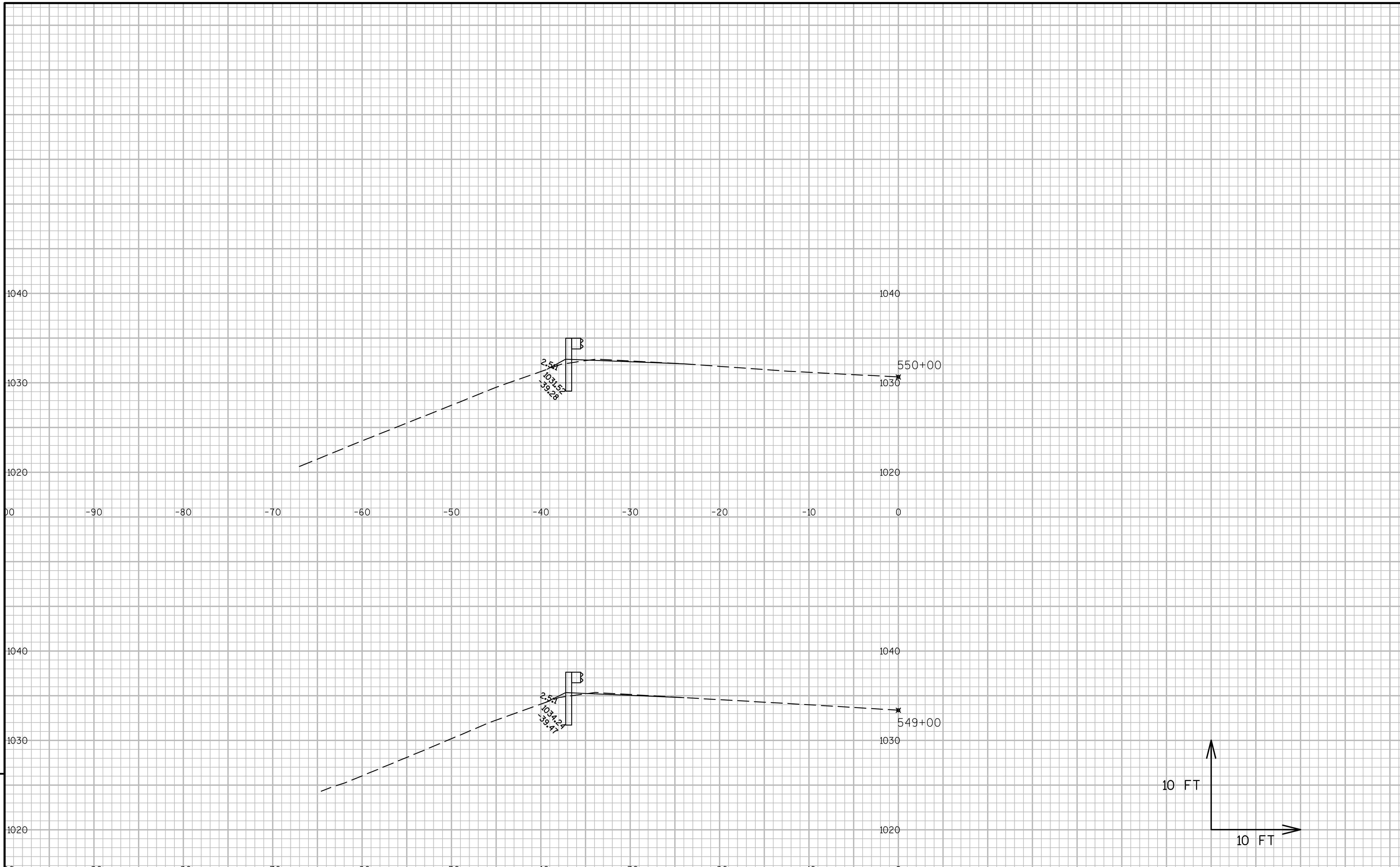
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 167	E



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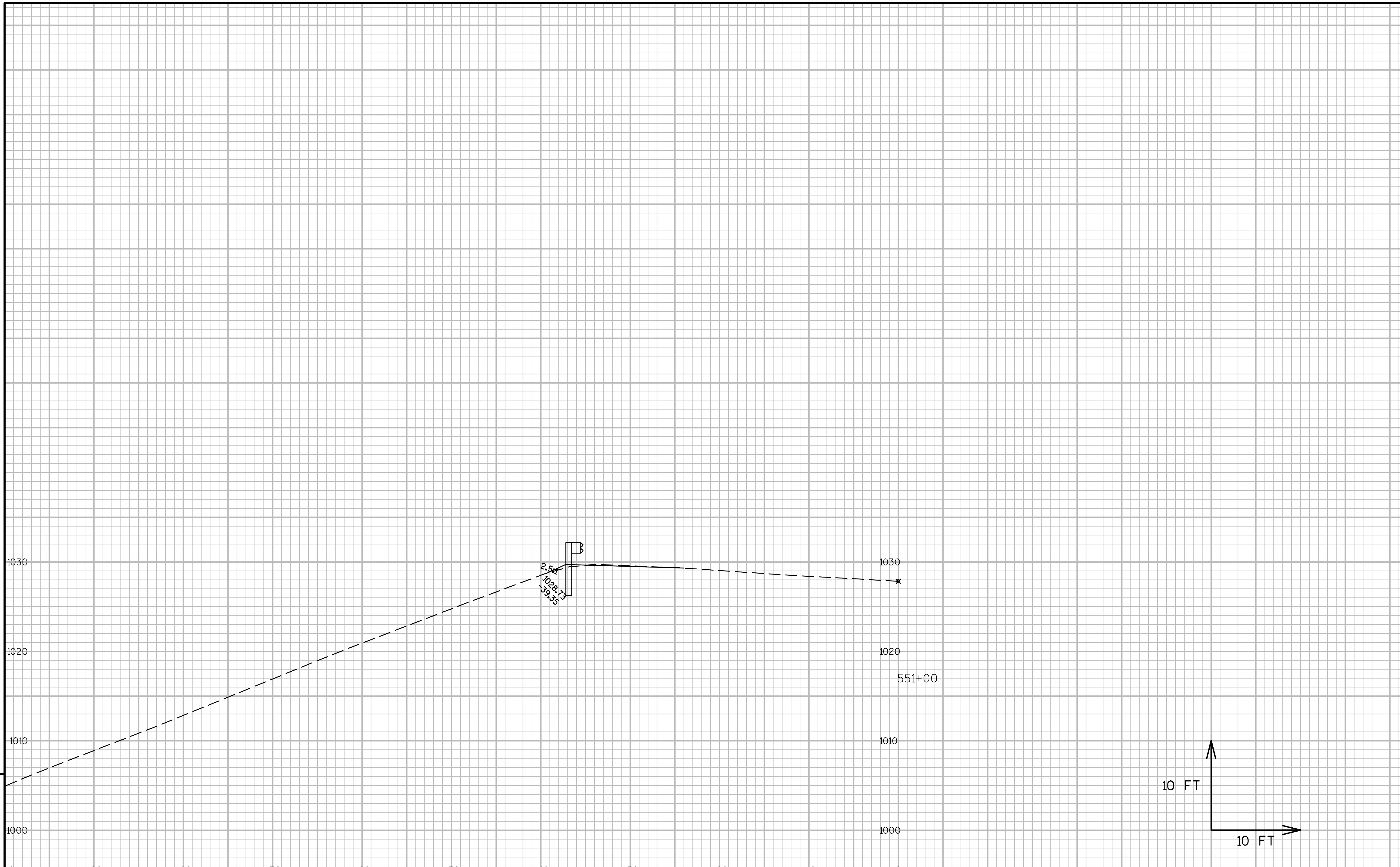
PROJECT NO:1023-02-76 | HWY:IH 94 | COUNTY:JACKSON | CROSS SECTIONS: WB BEAM GUARD GRADING | SHEET 168 | E



9

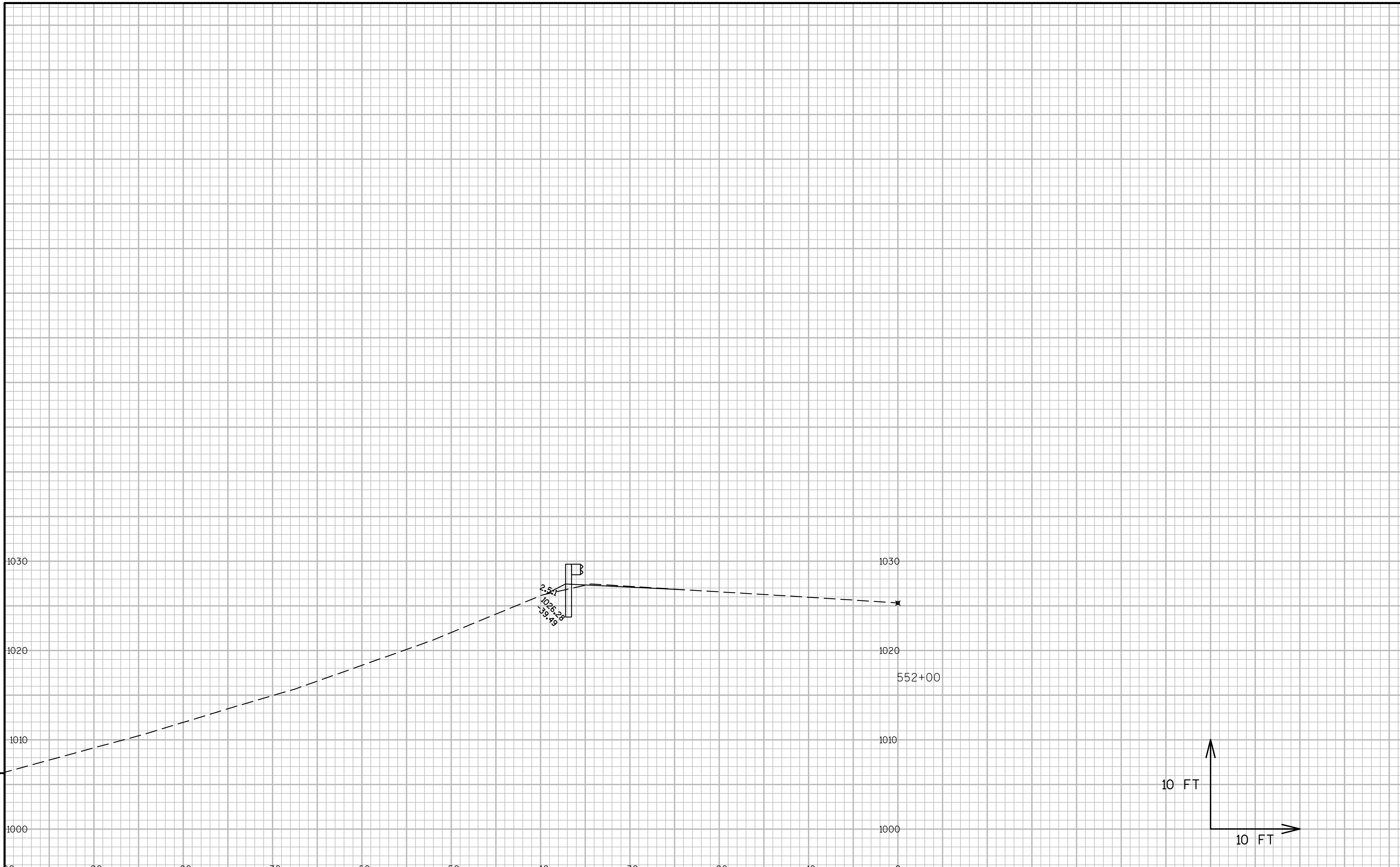
9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 169	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090216

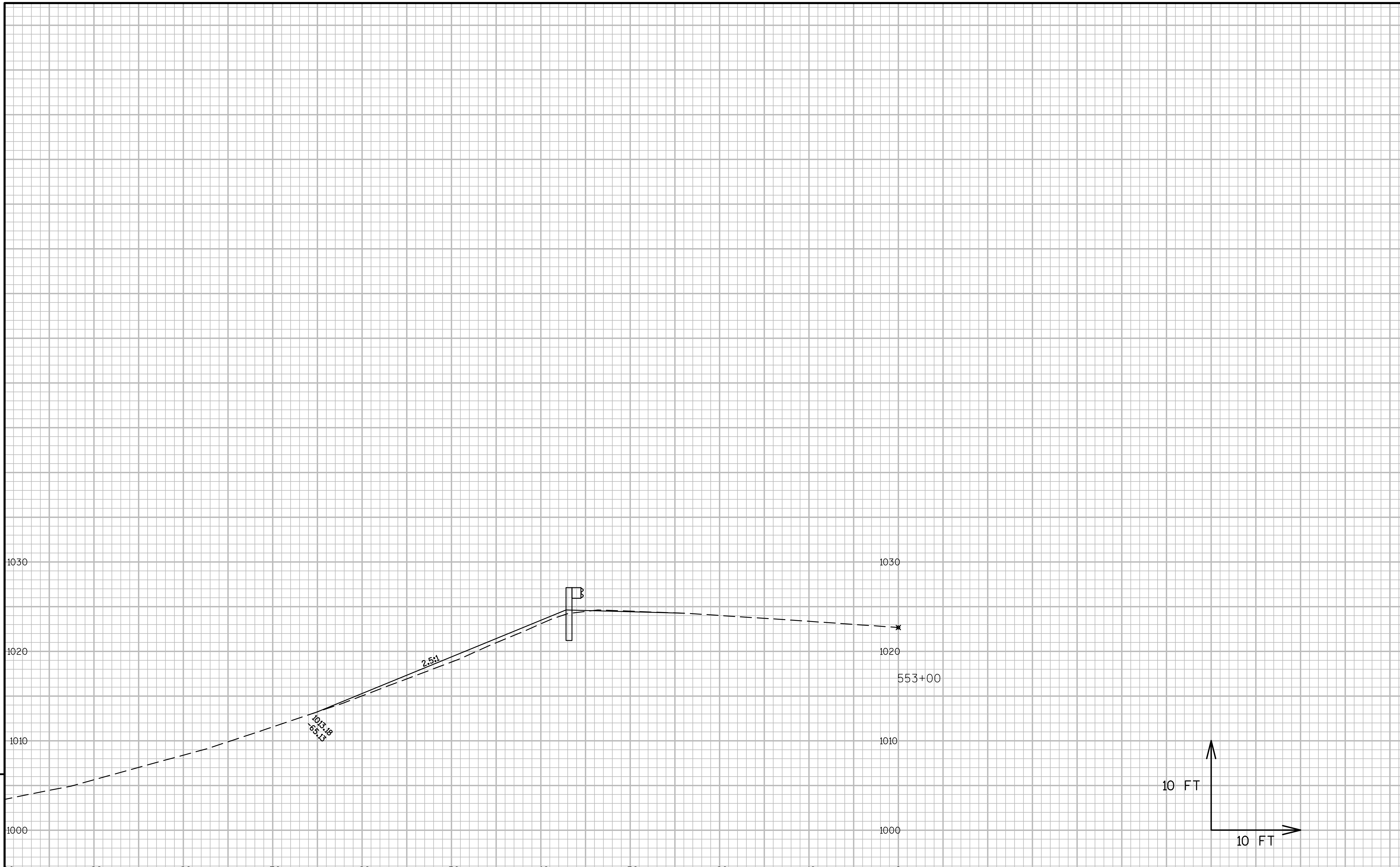
PLOT DATE : 2/1/2016 8:38 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 170	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090217
PLOT DATE : 2/1/2016 8:38 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



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PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 171	E

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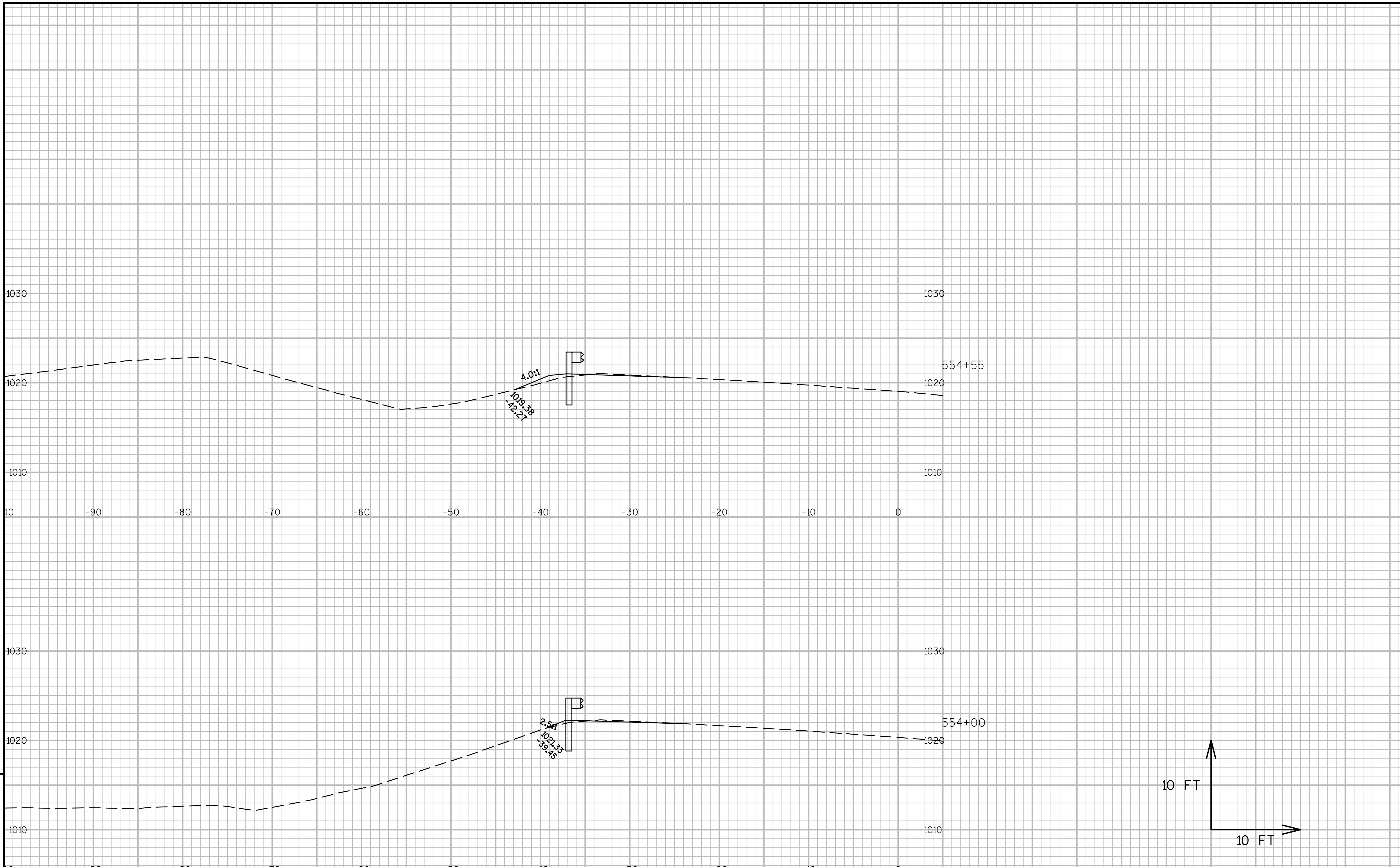

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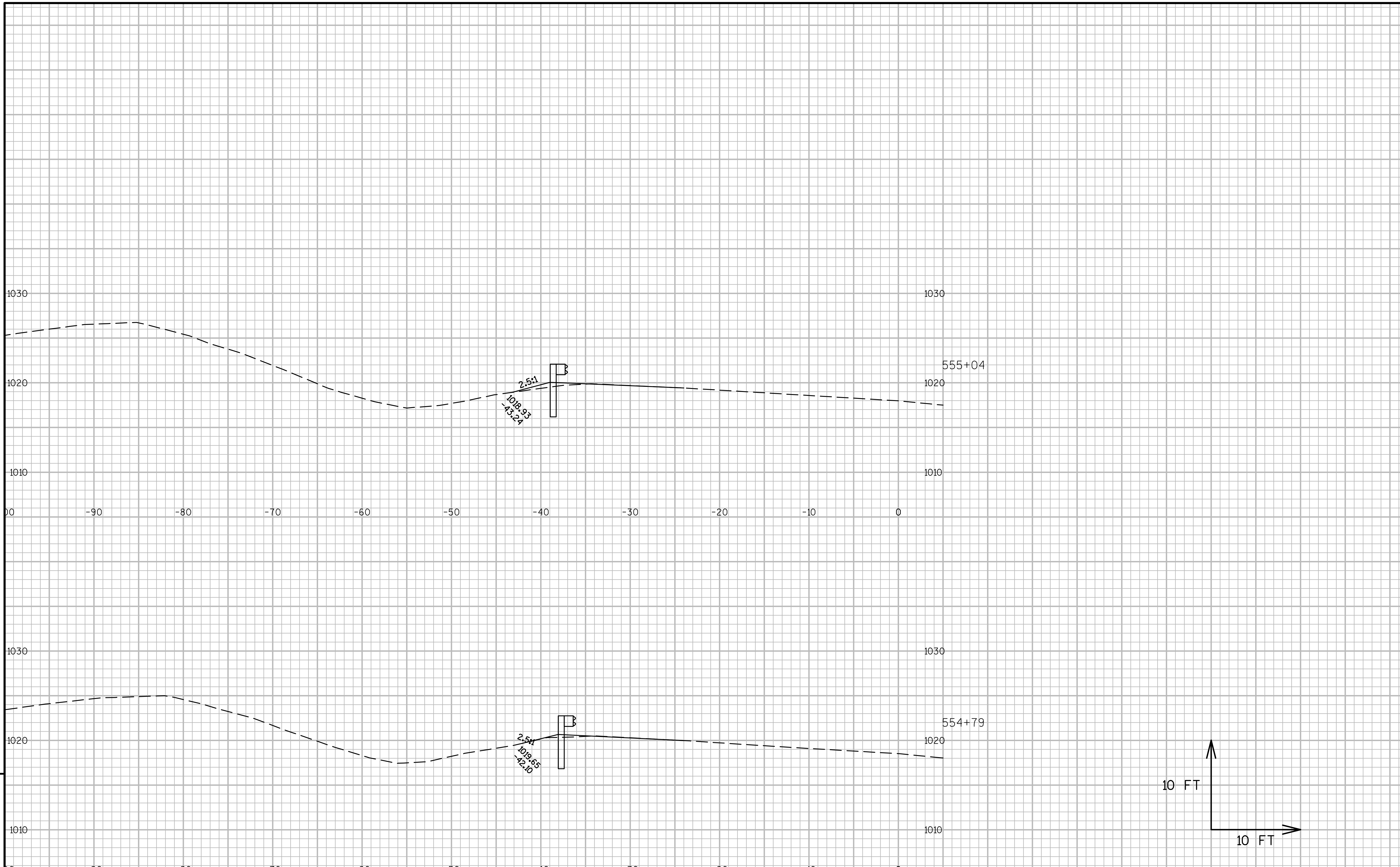
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 172	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090219

PLOT DATE : 2/1/2016 8:39 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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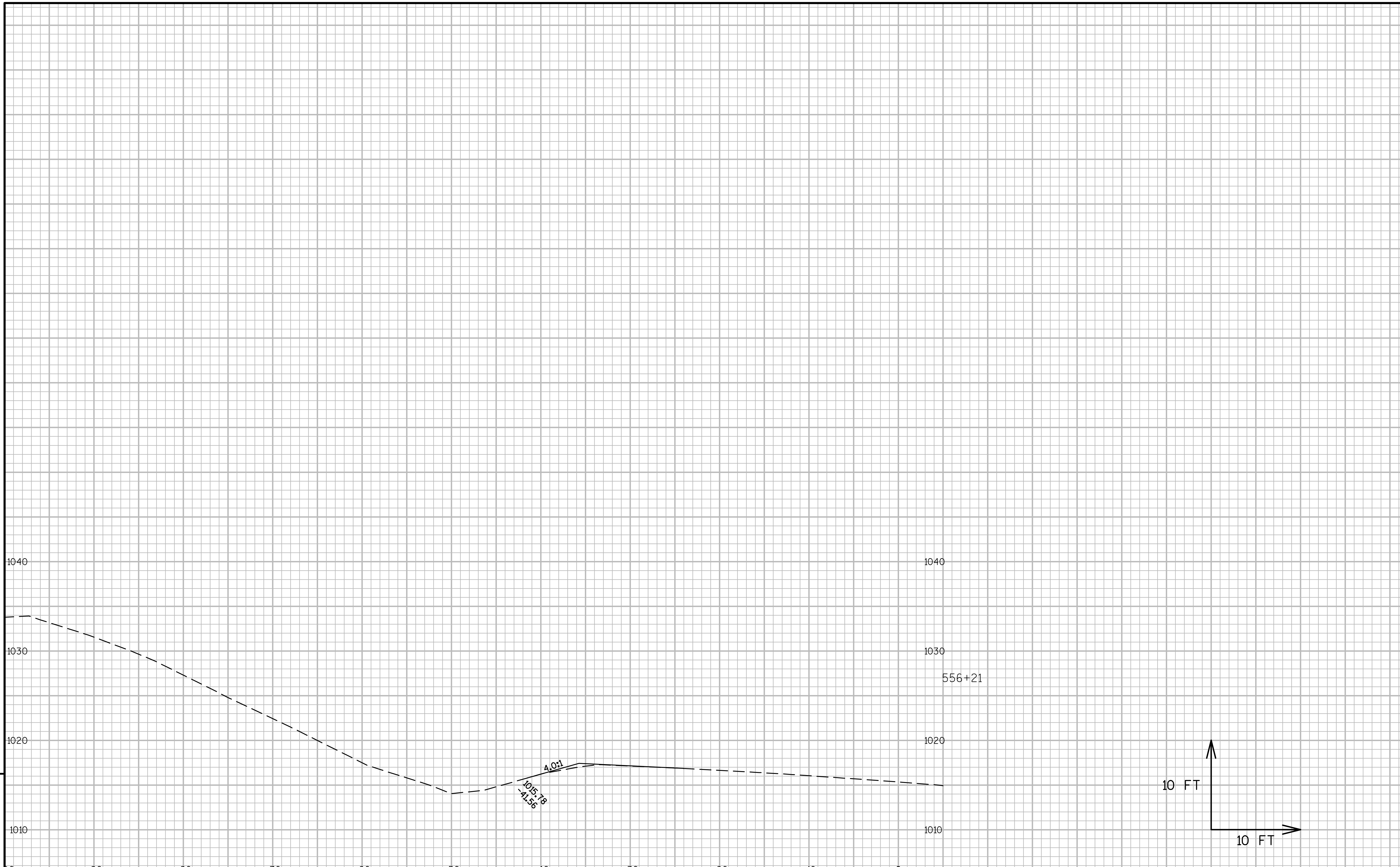
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 173	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090220
PLOT DATE : 2/1/2016 8:39 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



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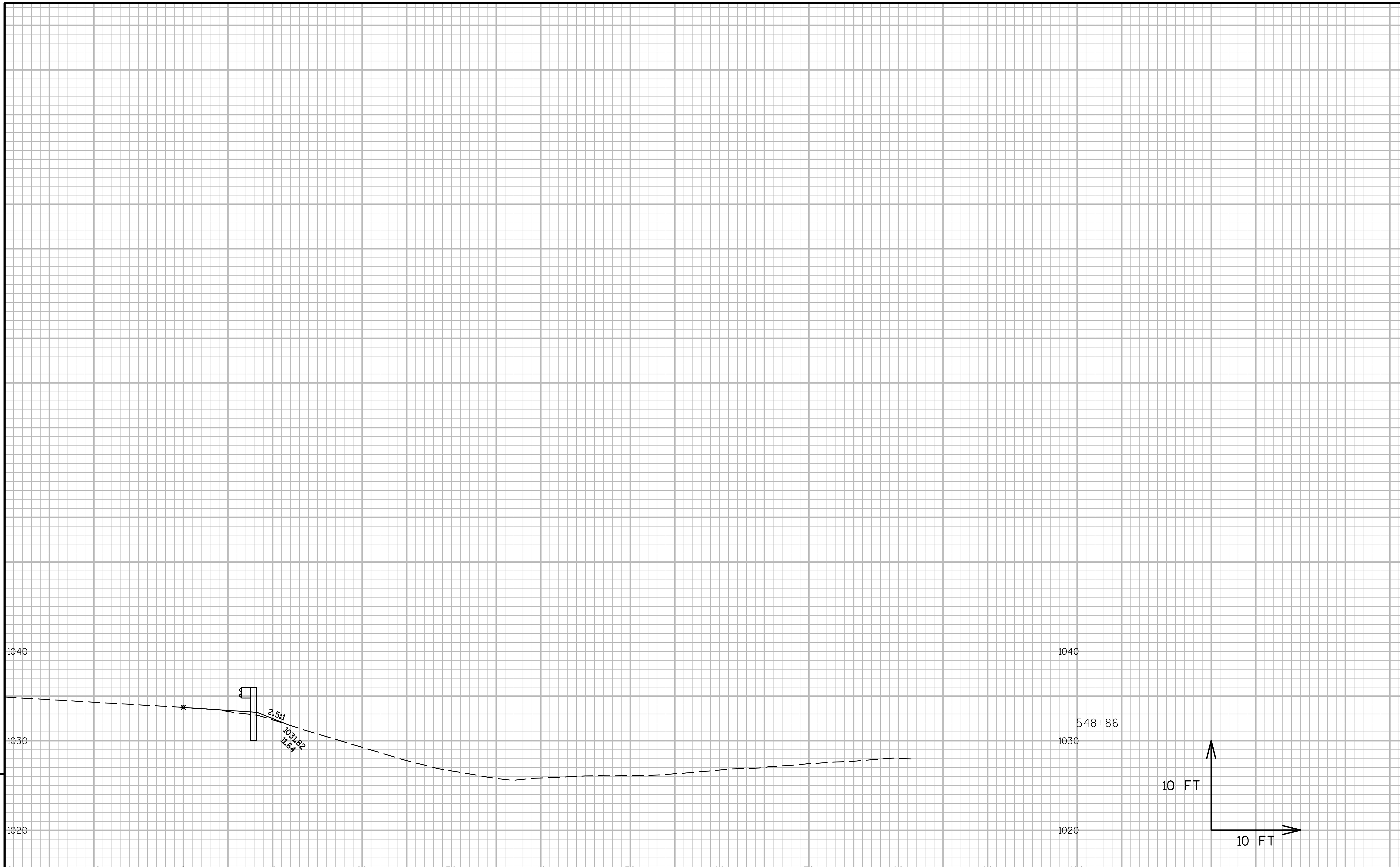
PROJECT NO: 1023-02-76 | HWY: IH 94 | COUNTY: JACKSON | CROSS SECTIONS: WB BEAM GUARD GRADING | SHEET 174 | E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090221

PLOT DATE : 2/1/2016 8:39 AM   PLOT BY : BECKLIN, MATTHEW R   PLOT NAME :   PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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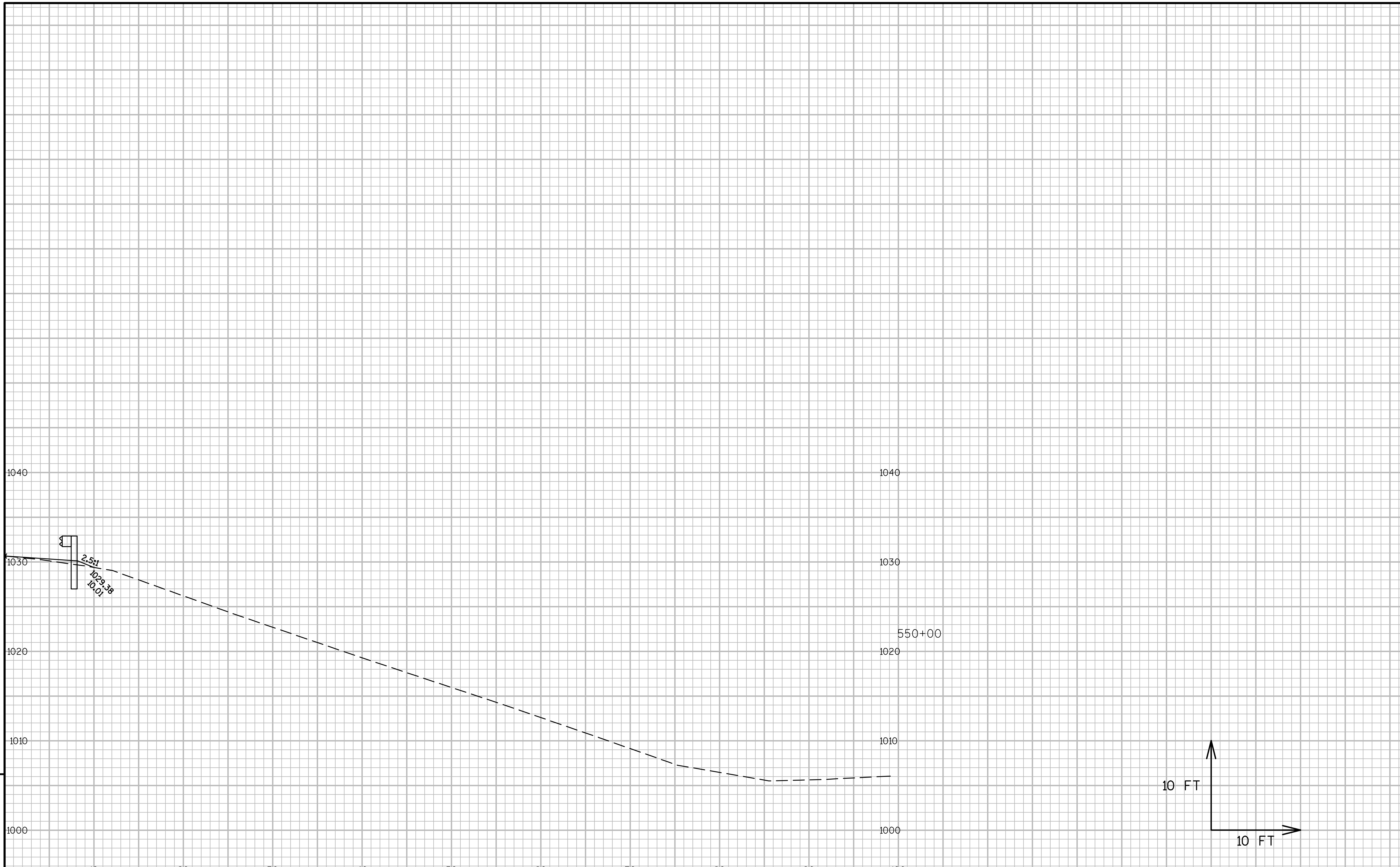
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 175	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090222

PLOT DATE : 2/1/2016 8:39 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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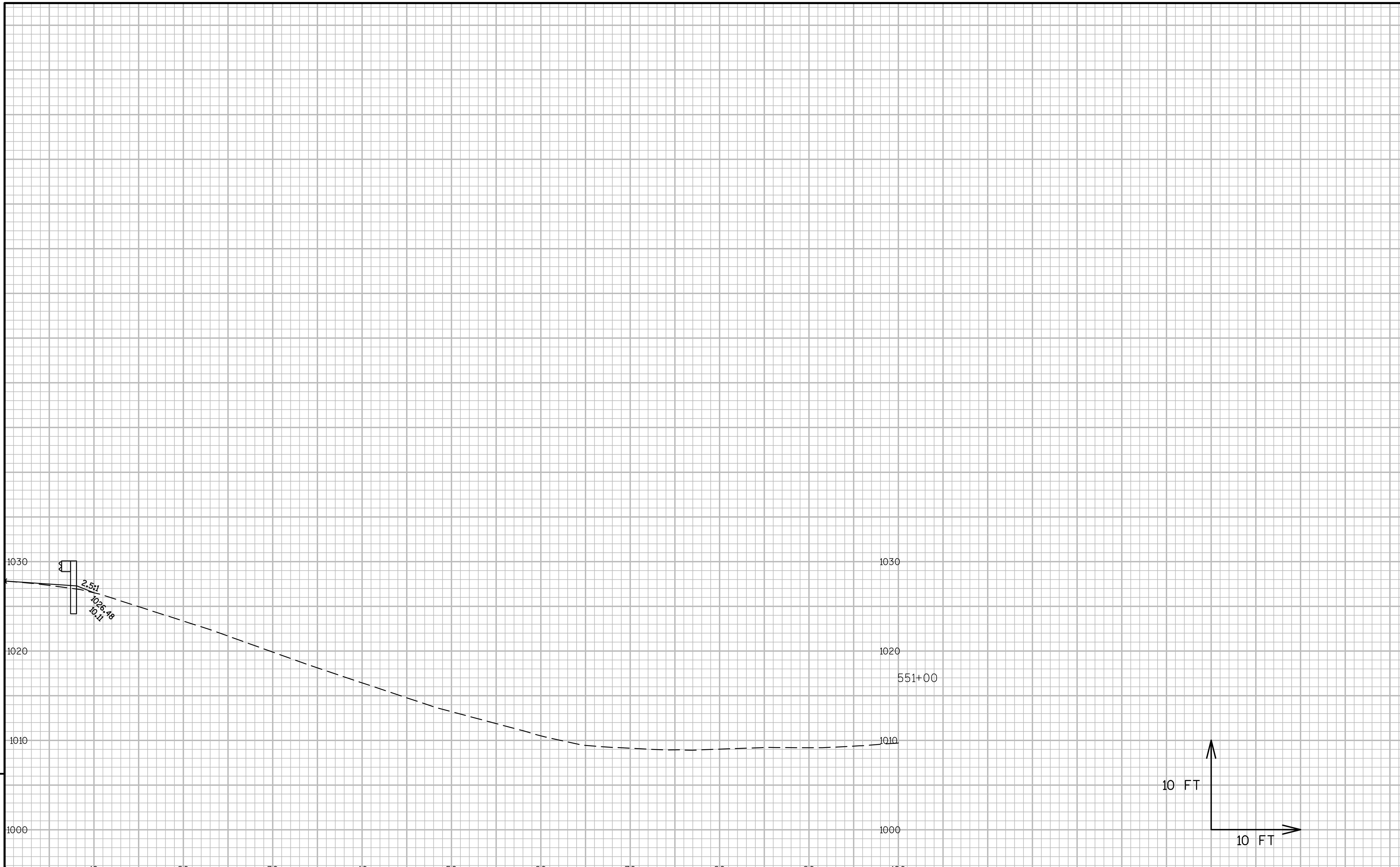
PROJECT NO: 1023-02-76 | HWY: IH 94 | COUNTY: JACKSON | CROSS SECTIONS: WB BEAM GUARD GRADING | SHEET 176 | E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090223

PLOT DATE : 2/1/2016 8:39 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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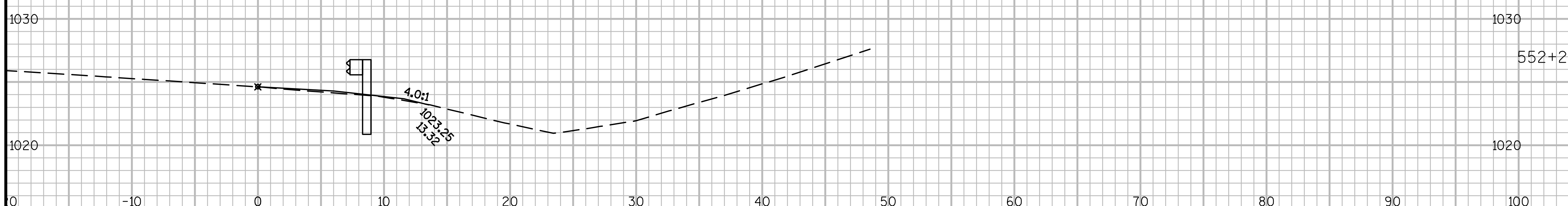
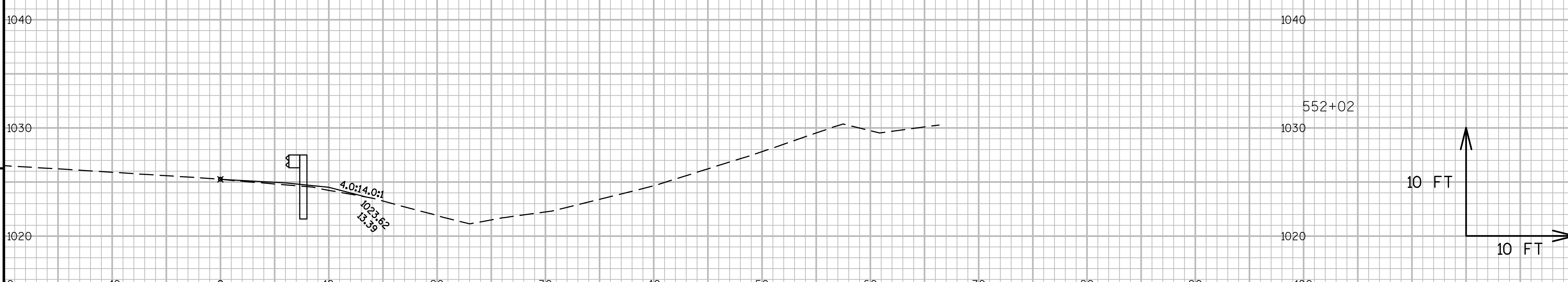
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 177	E





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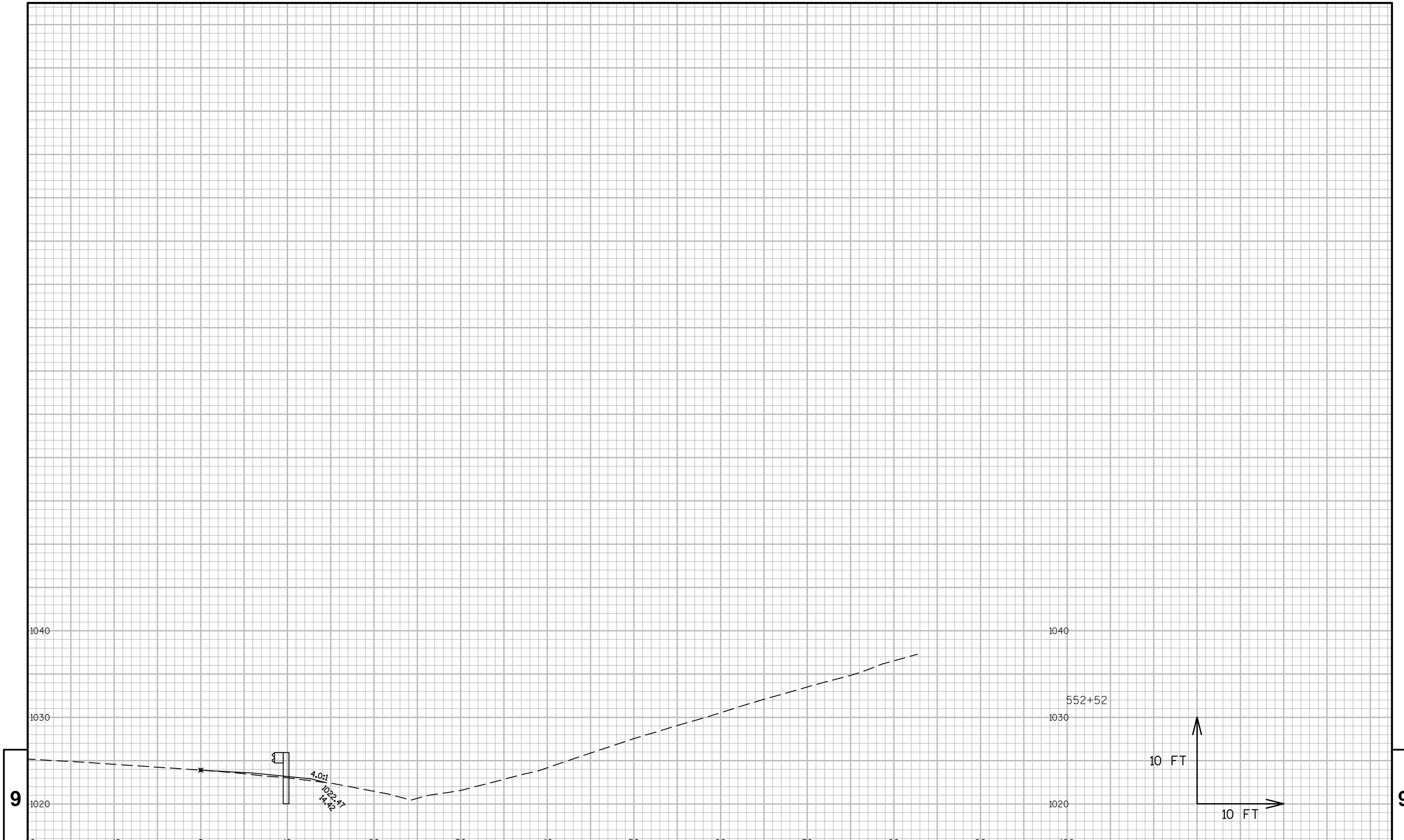
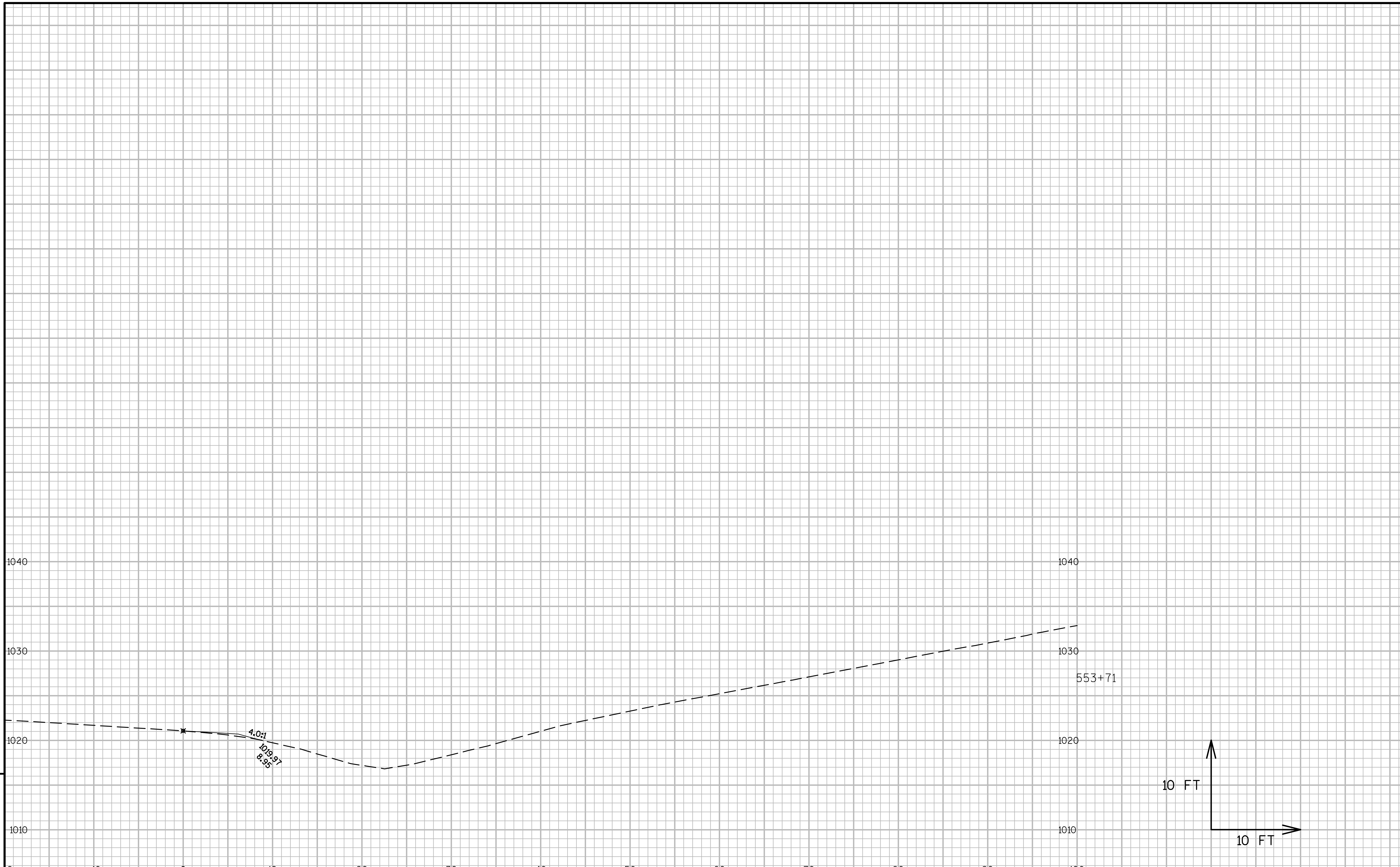
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 178	E



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 179	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090226
PLOT DATE : 2/1/2016 8:39 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1 IN:10 FT



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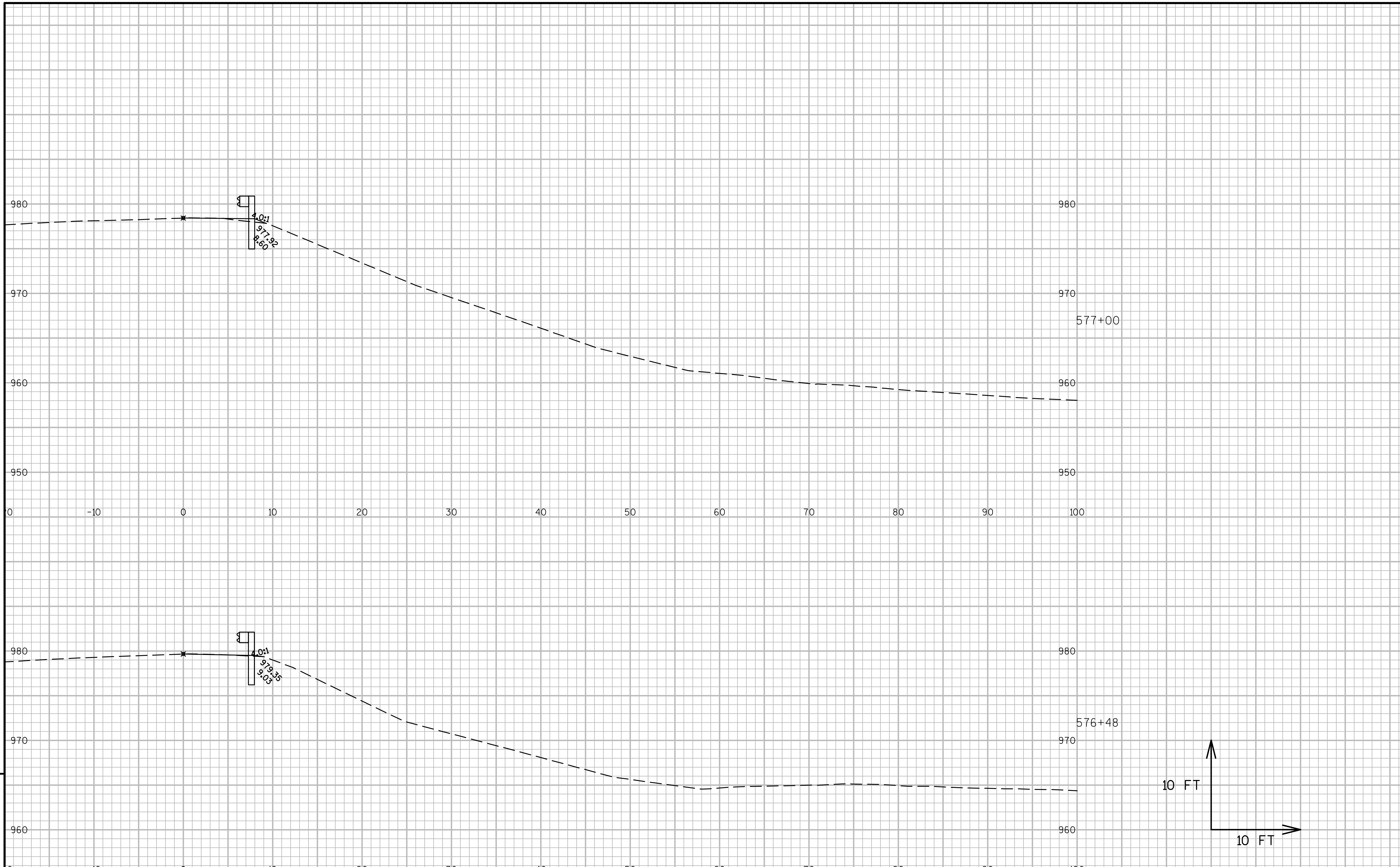
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 180	E



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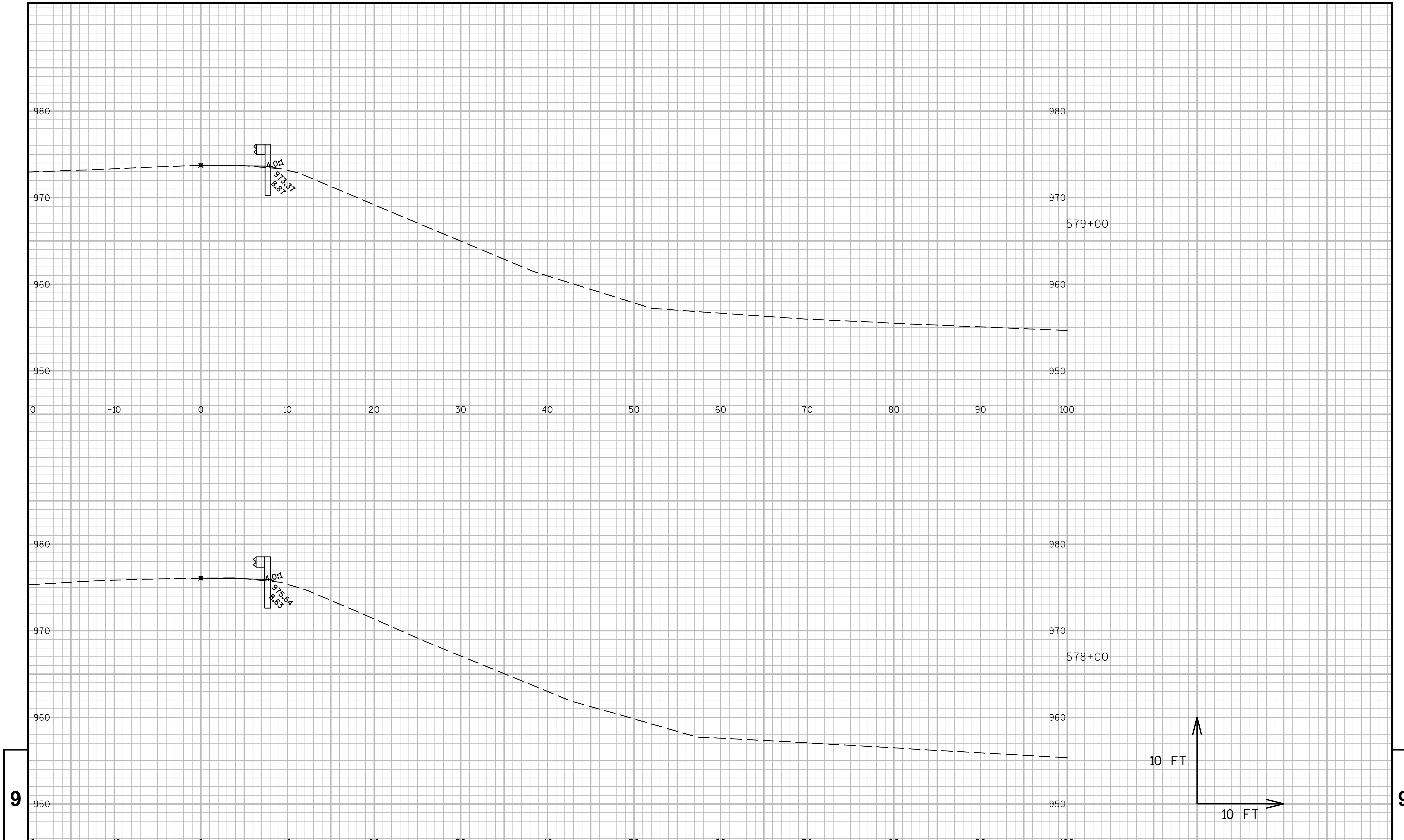
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 181	E

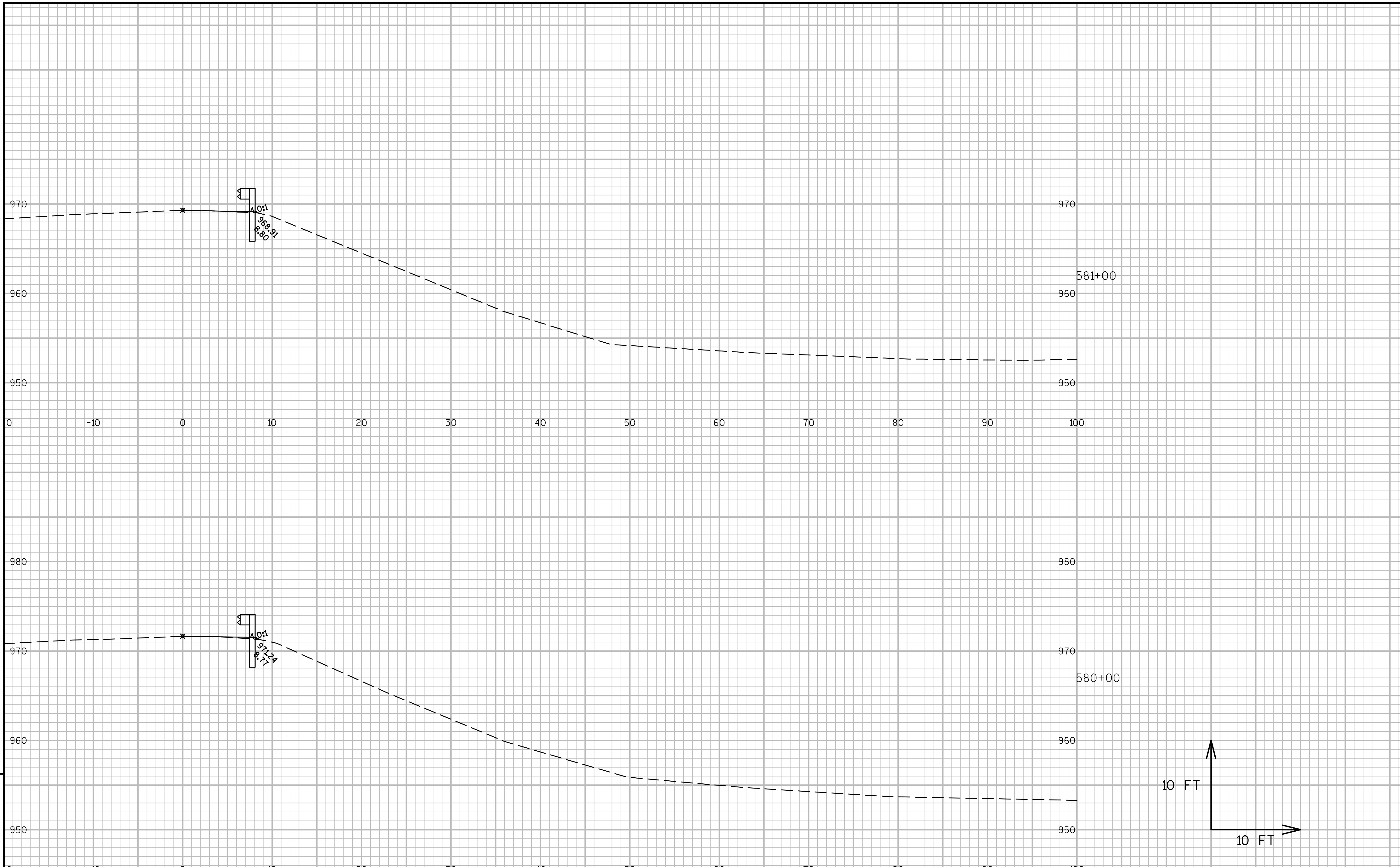


PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 182	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090228

PLOT DATE : 2/1/2016 8:39 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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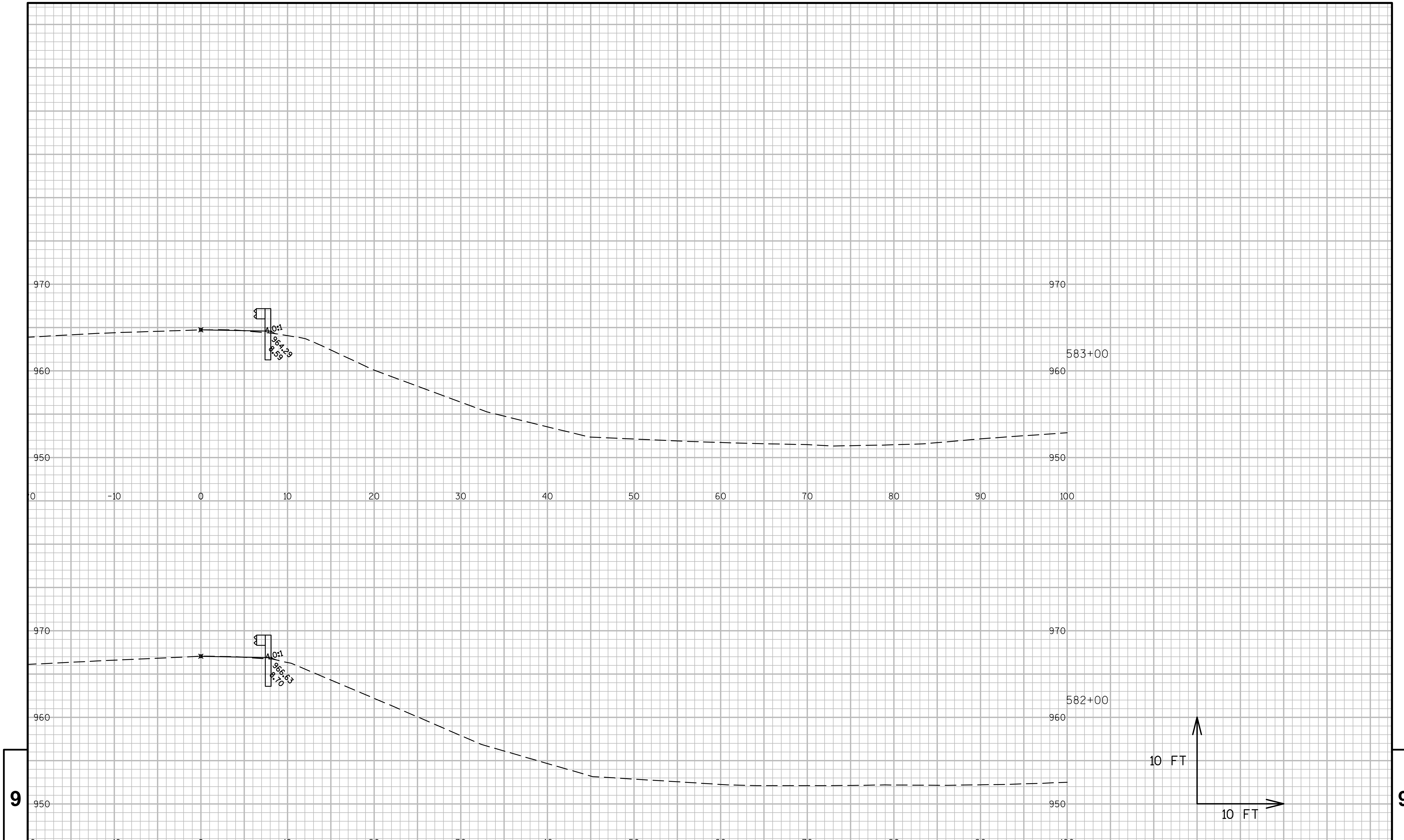
PROJECT NO: 1023-02-76 | HWY: IH 94 | COUNTY: JACKSON | CROSS SECTIONS: WB BEAM GUARD GRADING | SHEET 183 | E

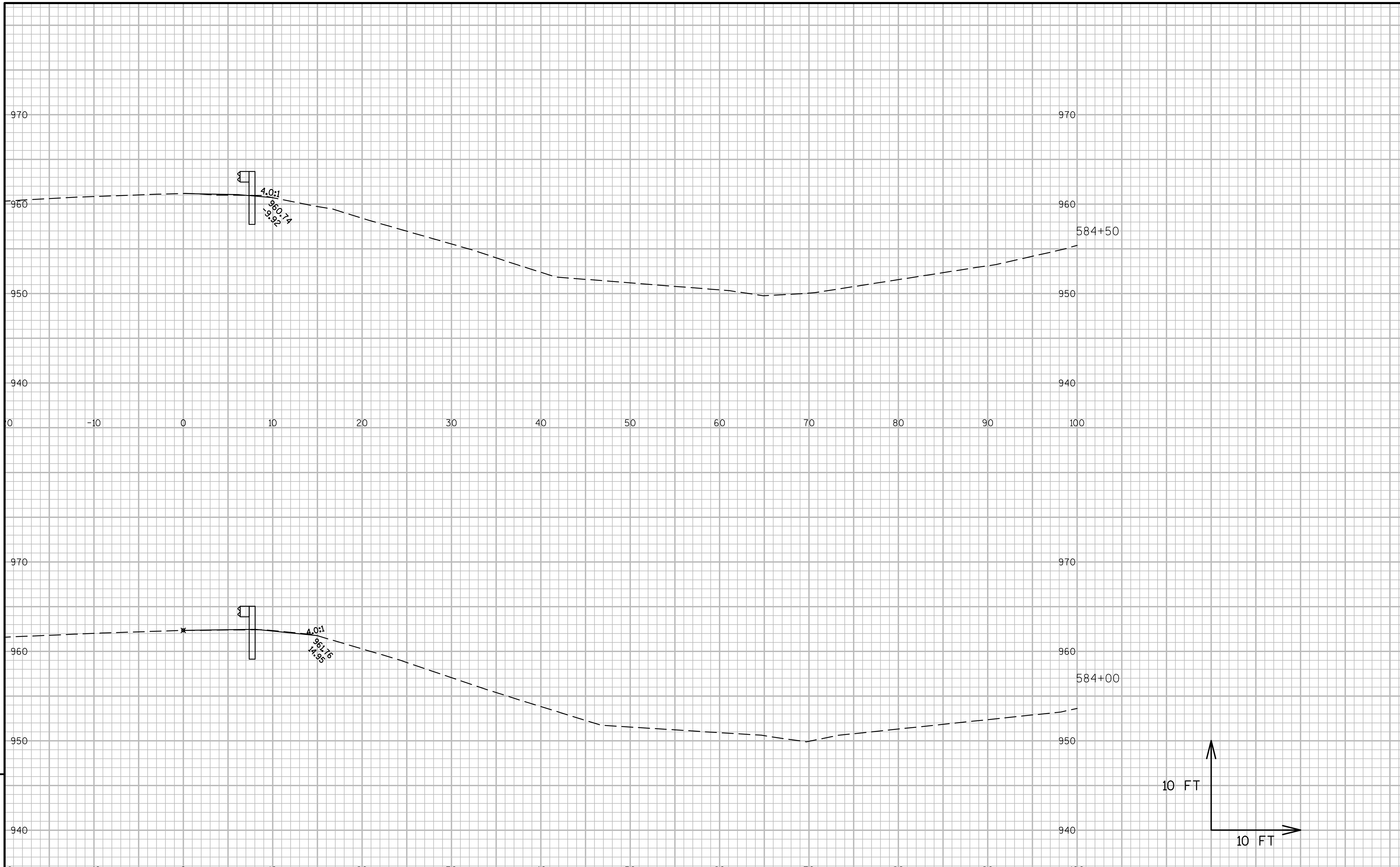
FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090229

PLOT DATE : 2/1/2016 8:39 AM   PLOT BY : BECKLIN, MATTHEW R   PLOT NAME :   PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 184	E



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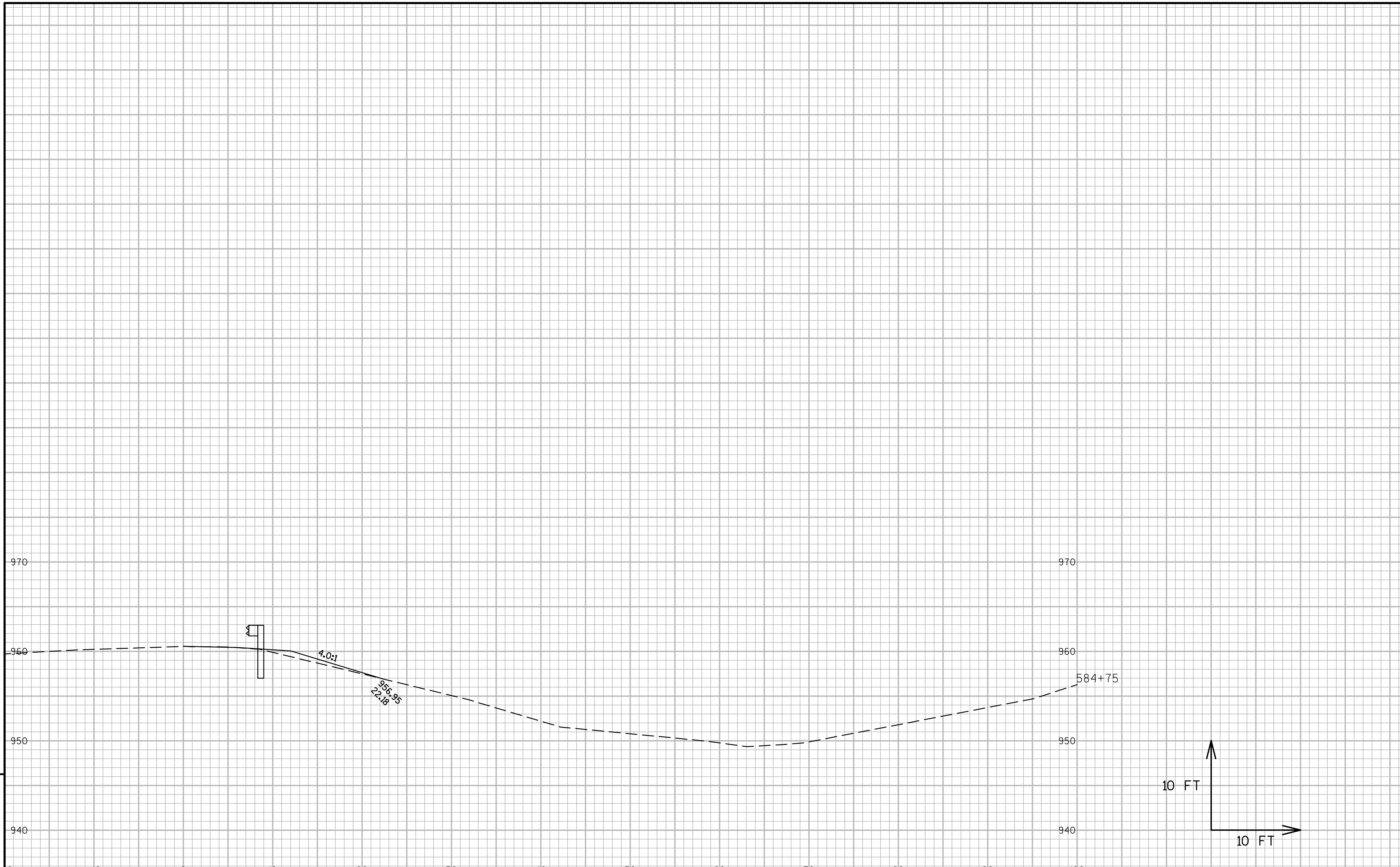
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 185 E



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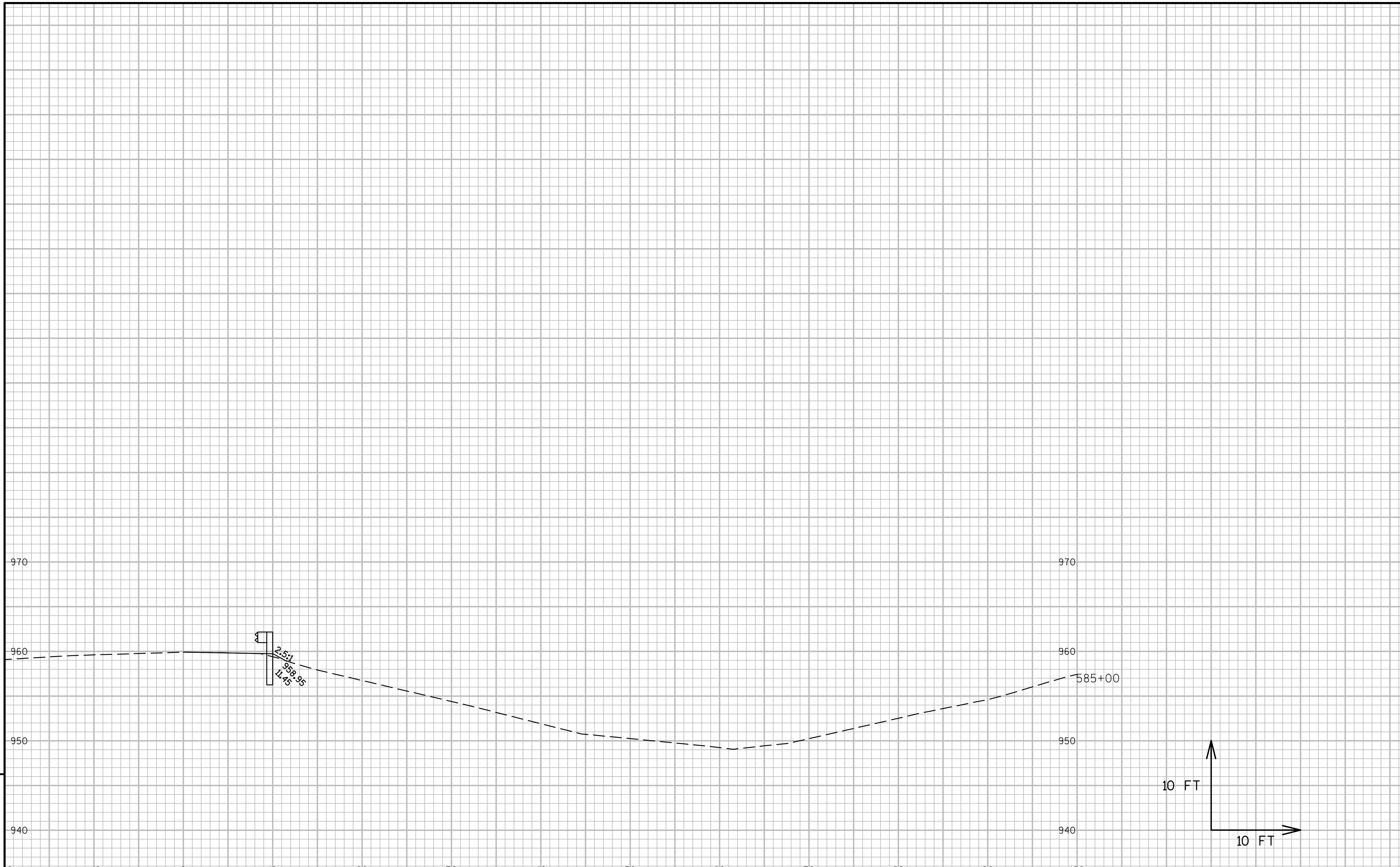
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 186	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090232

PLOT DATE : 2/1/2016 8:40 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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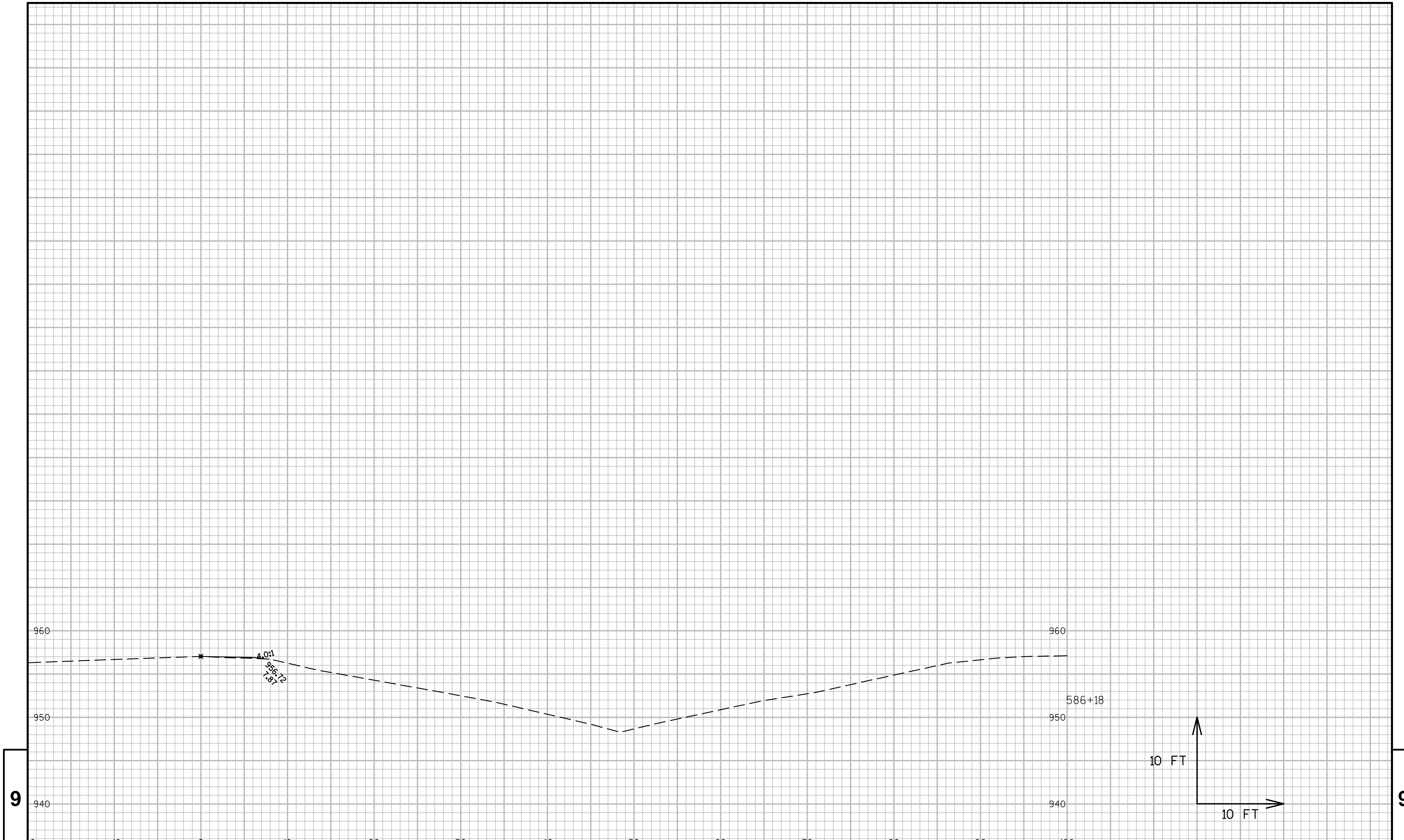
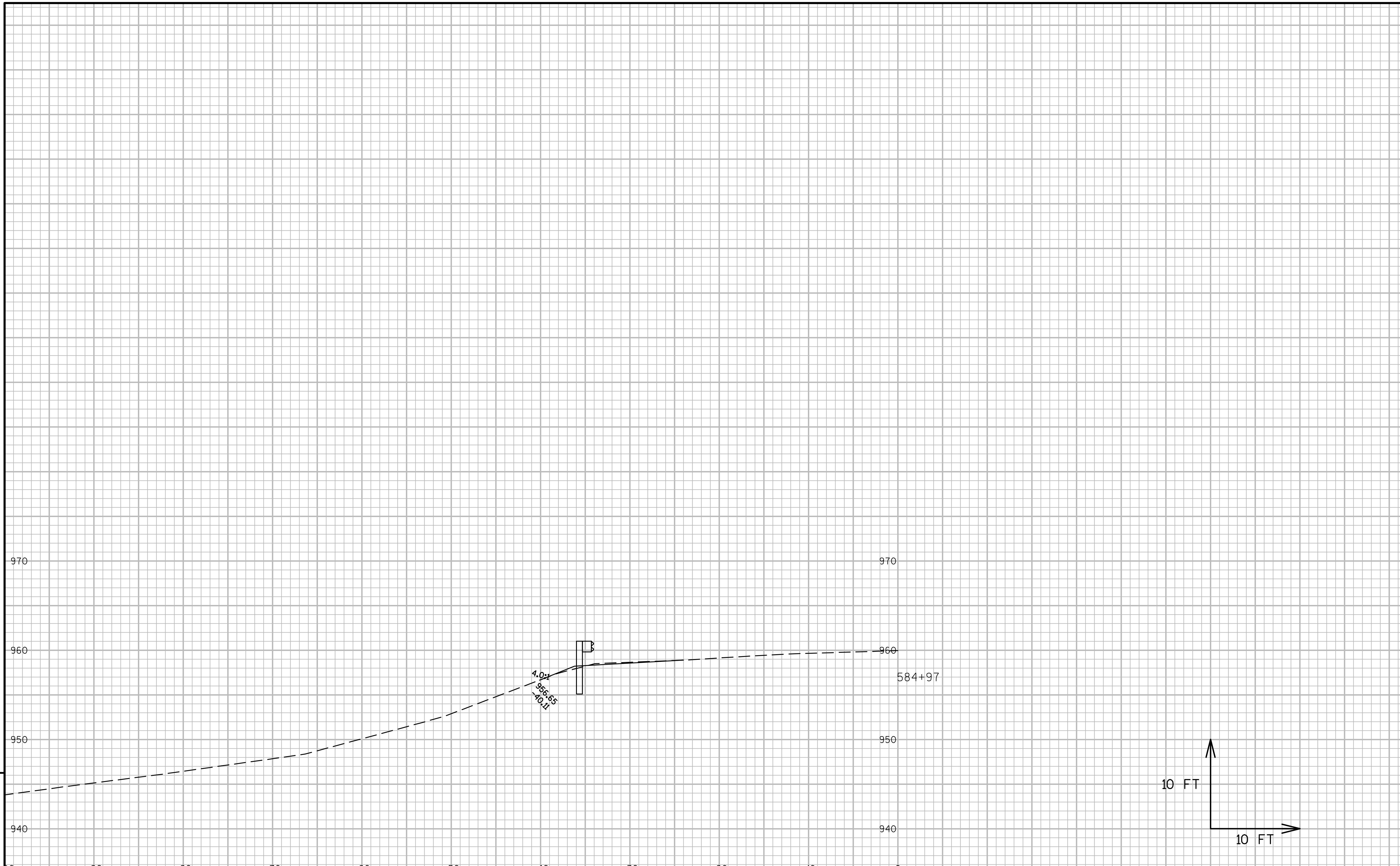
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 187	E



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 188	E



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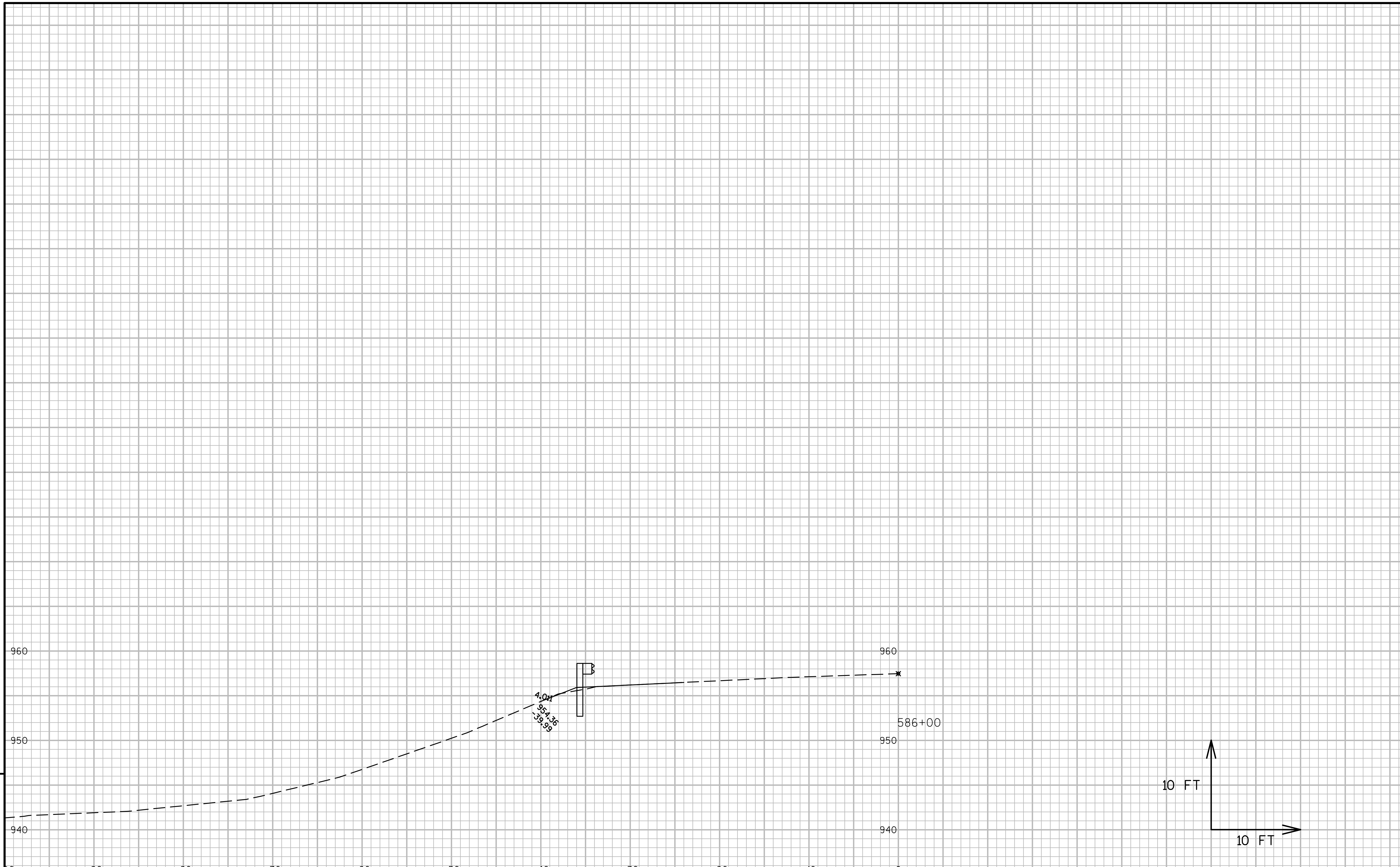
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 189	E



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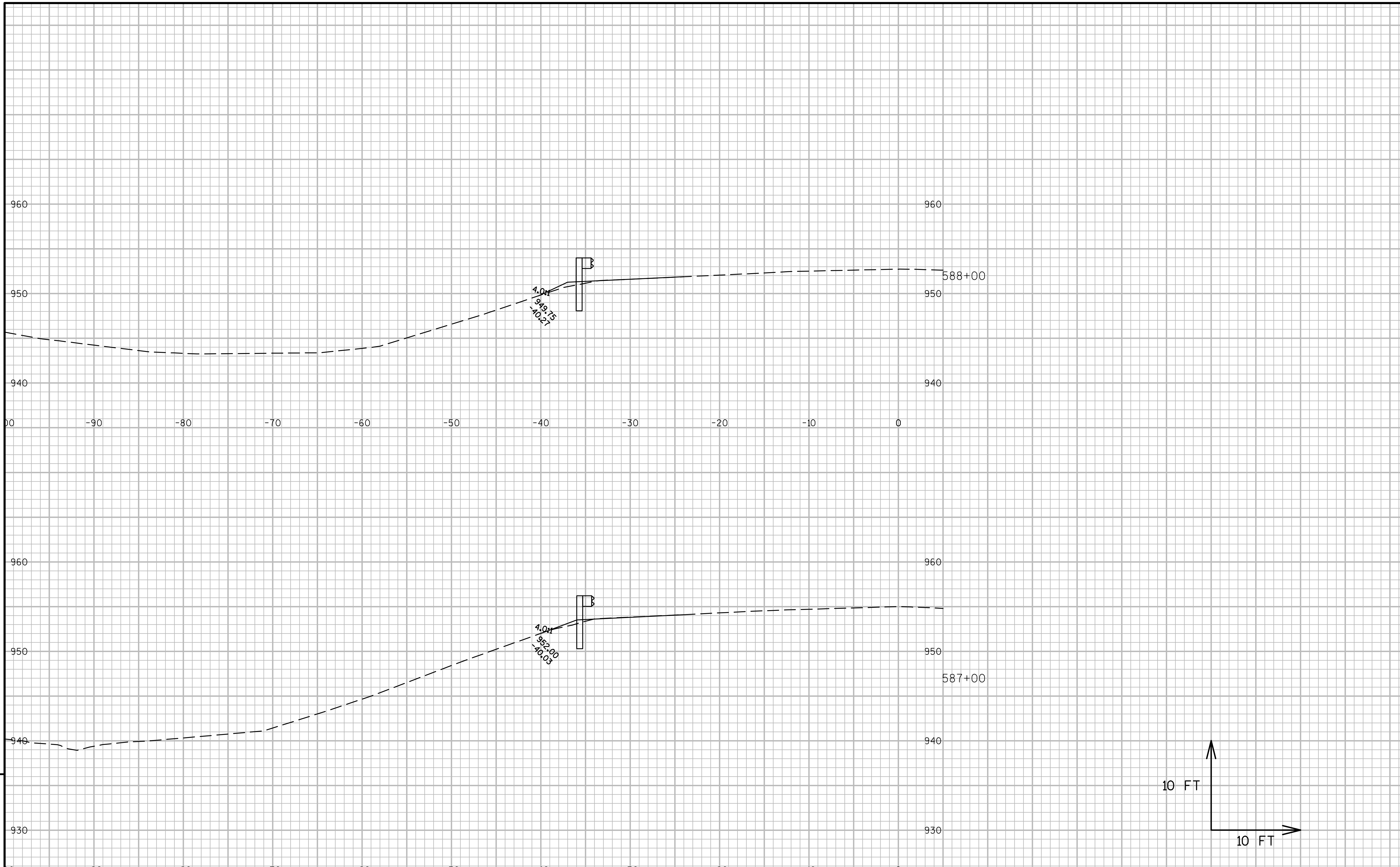
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 190	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090236

PLOT DATE : 2/1/2016 8:40 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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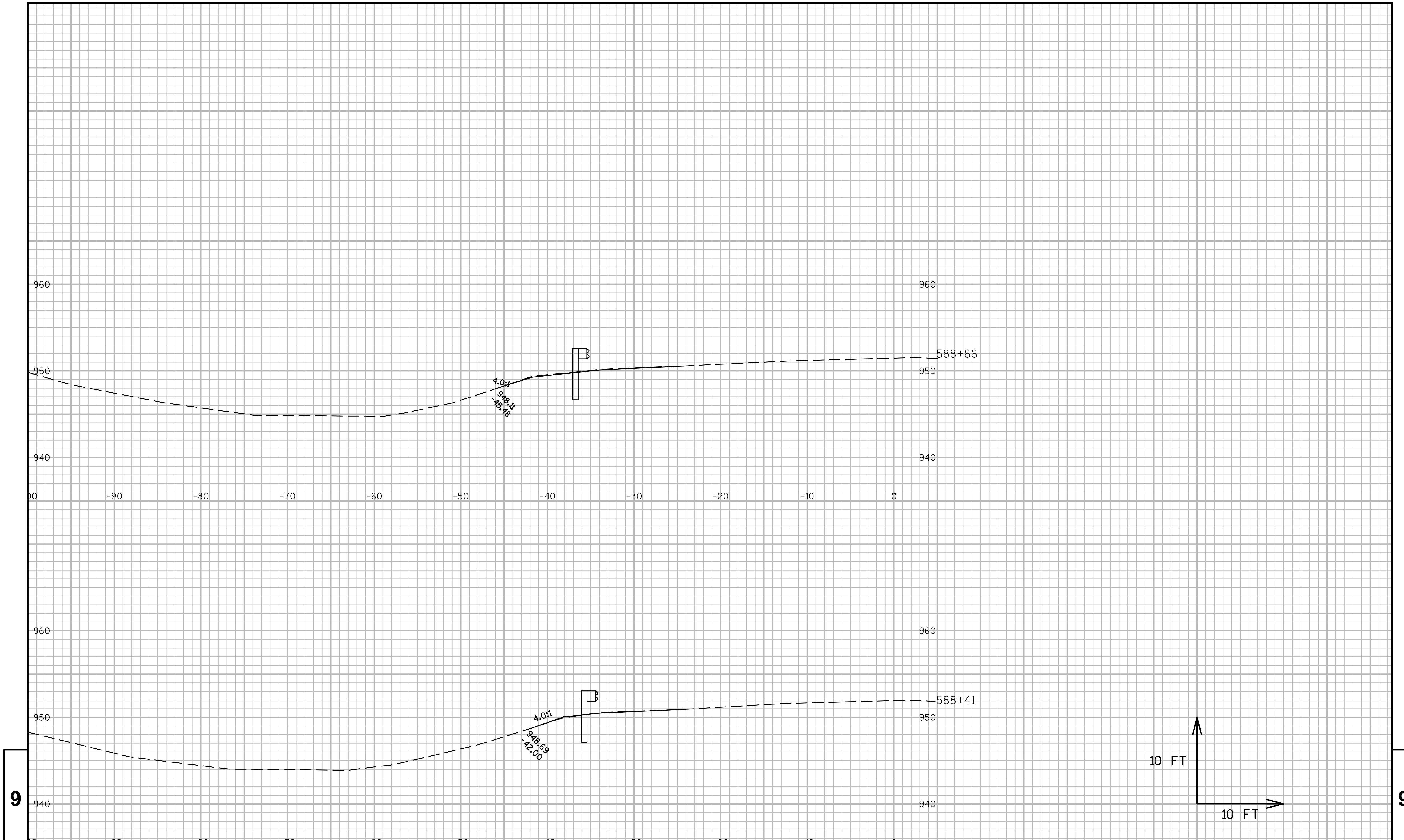
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 191 E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090237
PLOT DATE : 2/1/2016 8:40 AM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49

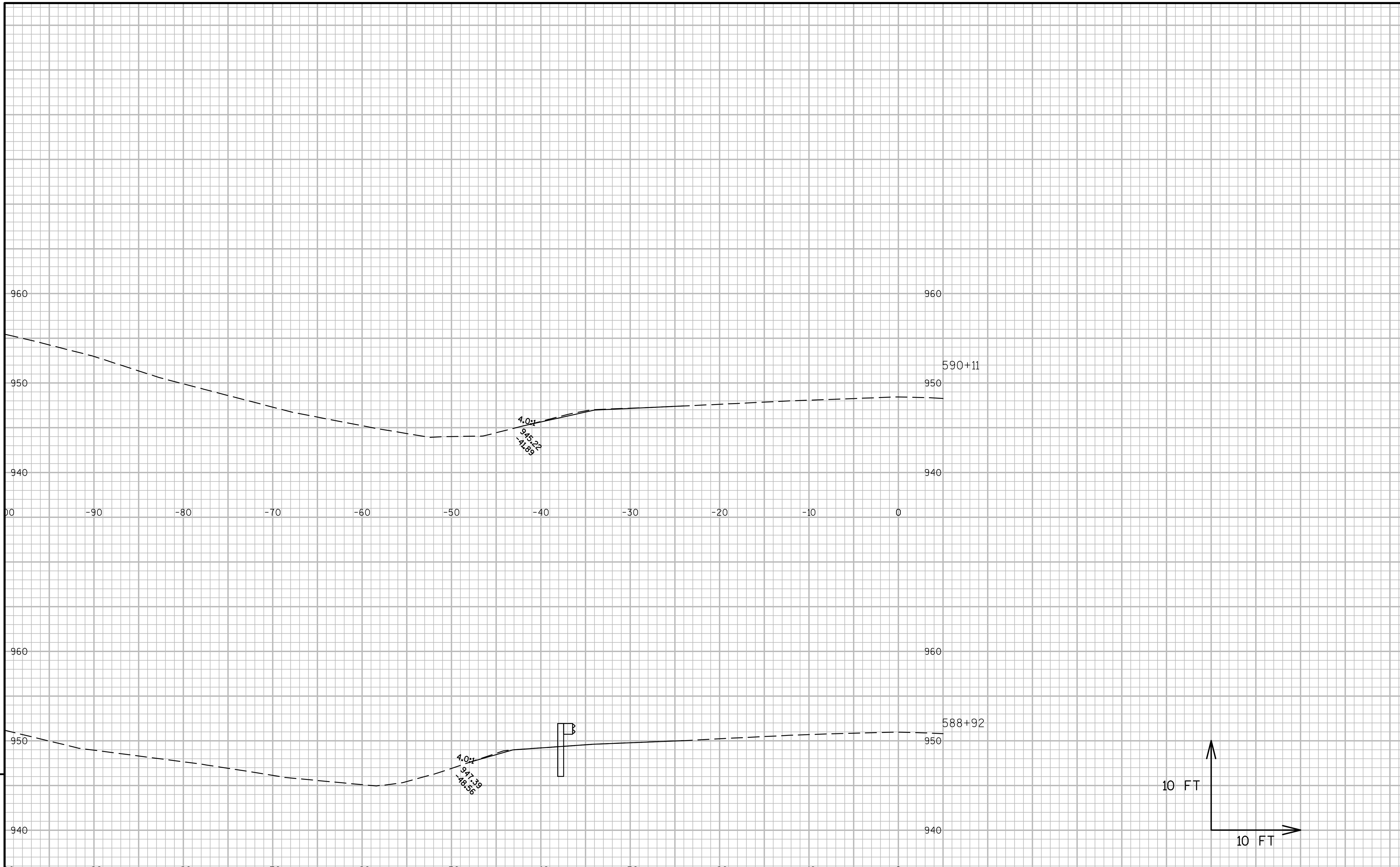


PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 192	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090238

PLOT DATE : 2/1/2016 8:40 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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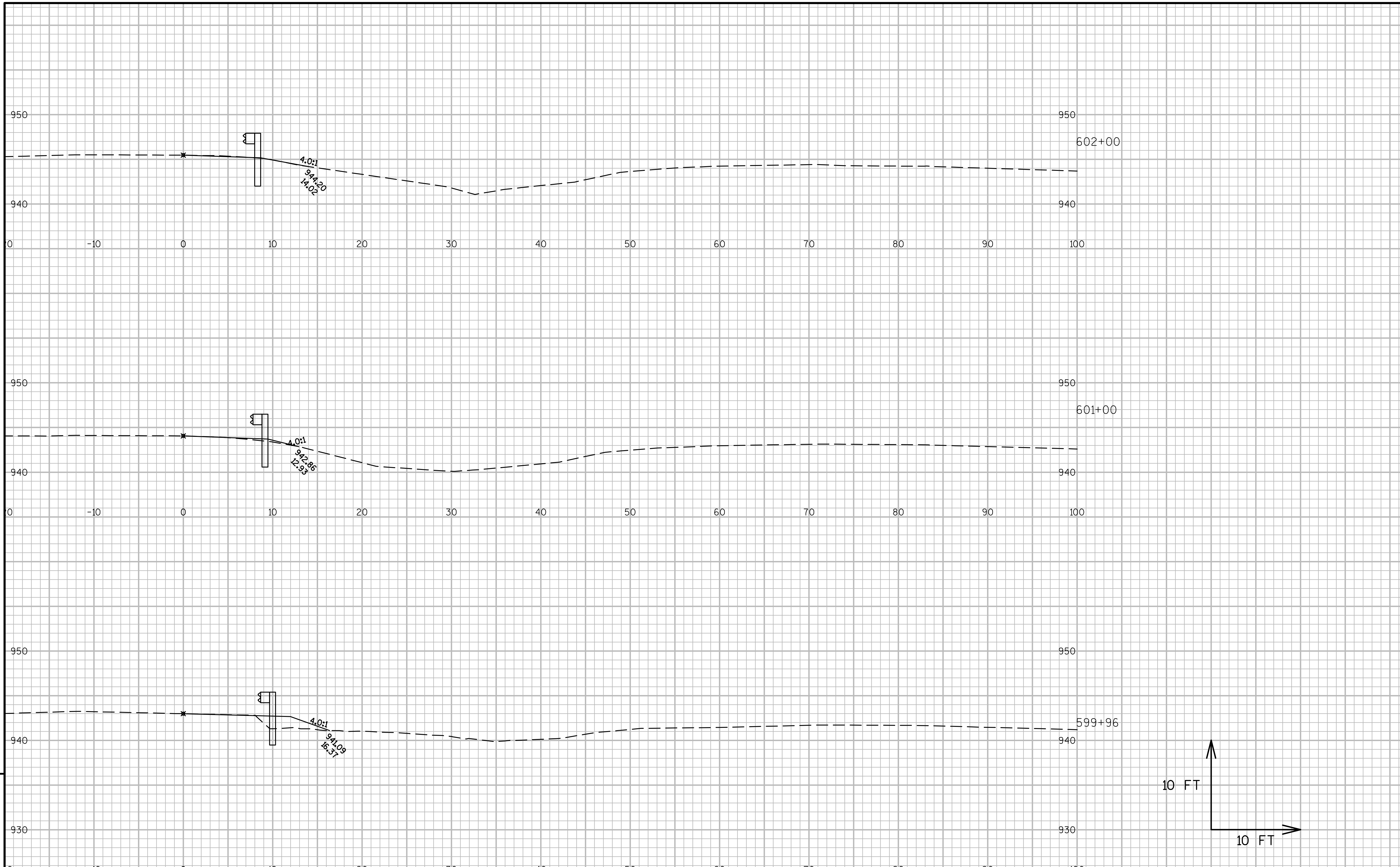
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 193	E



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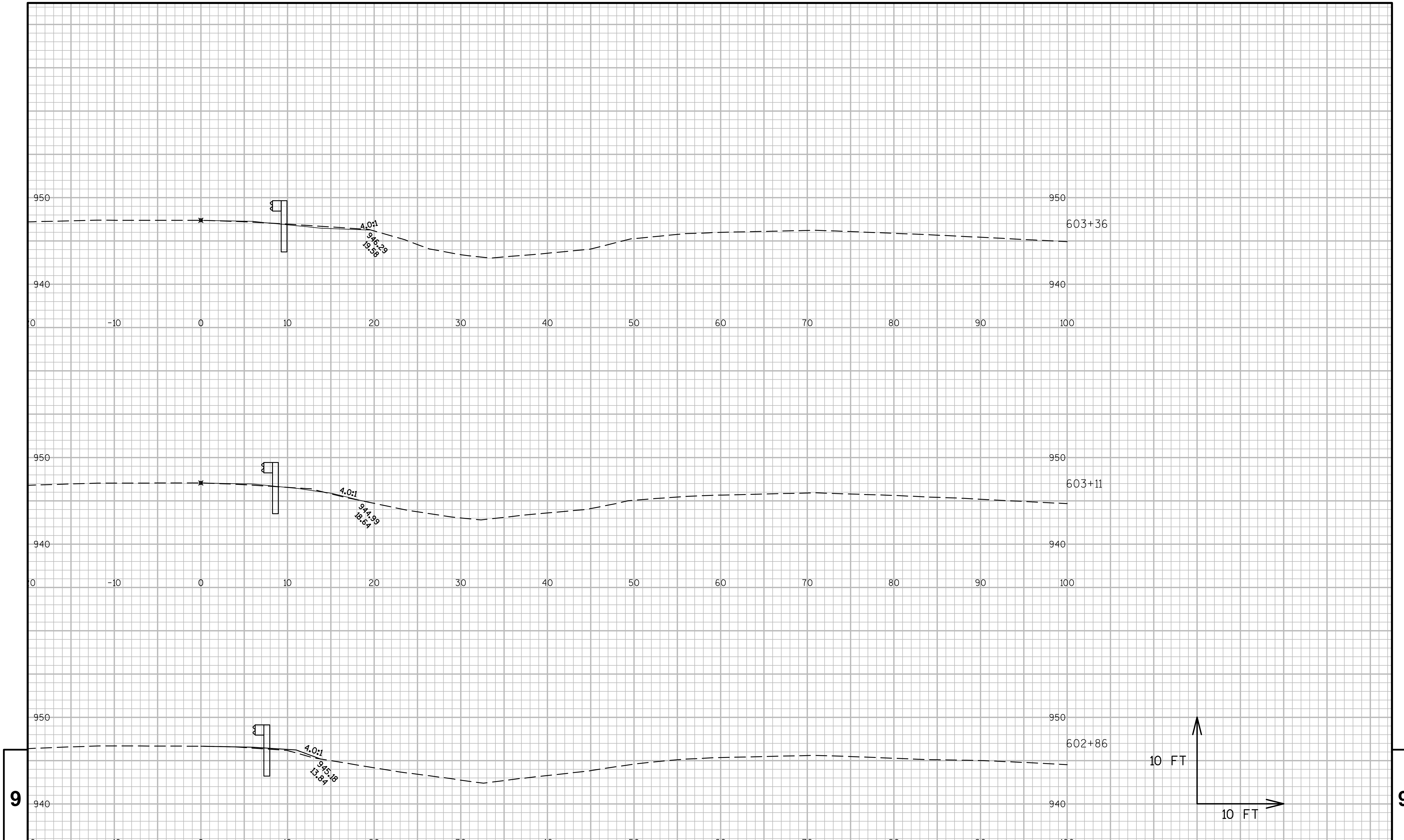
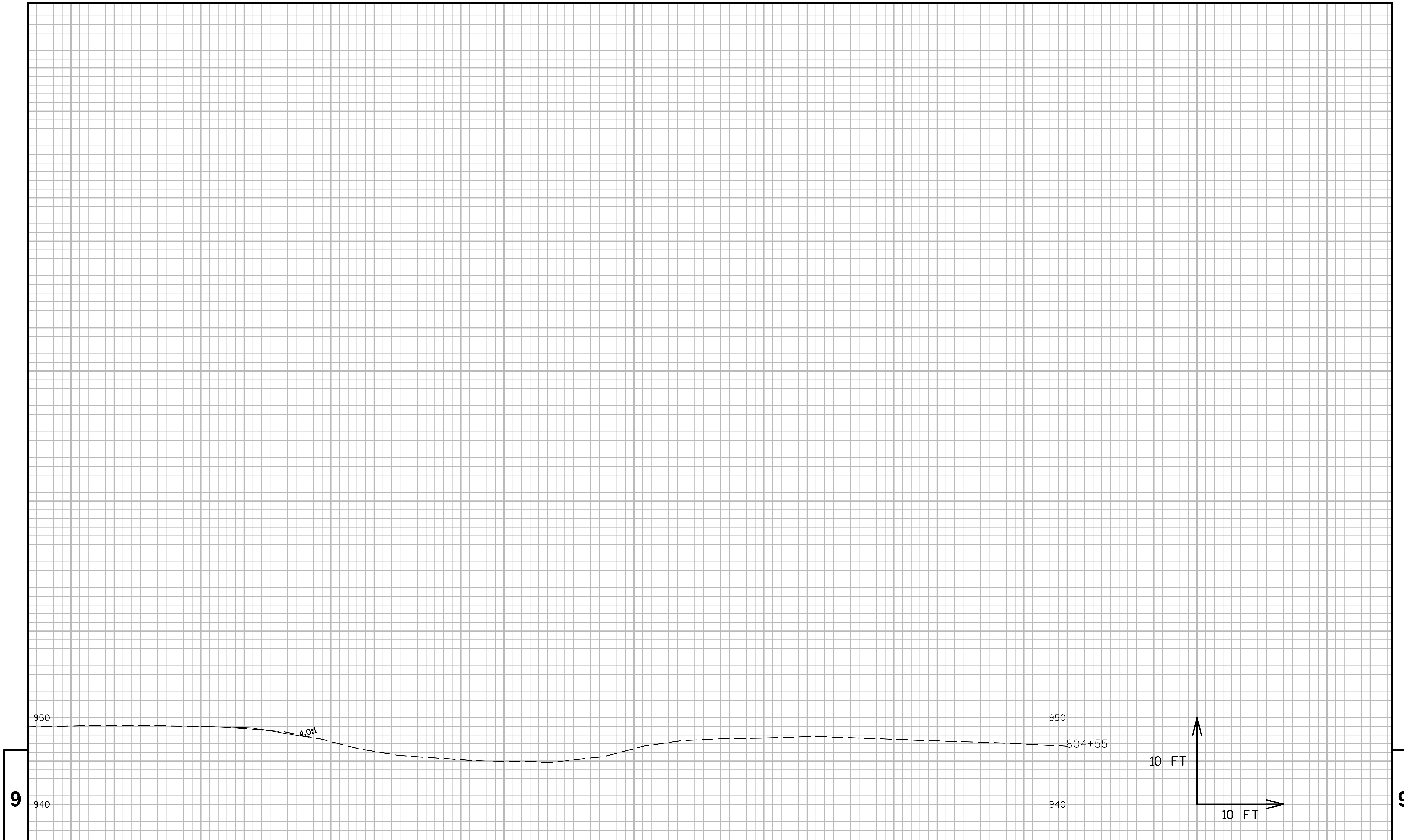
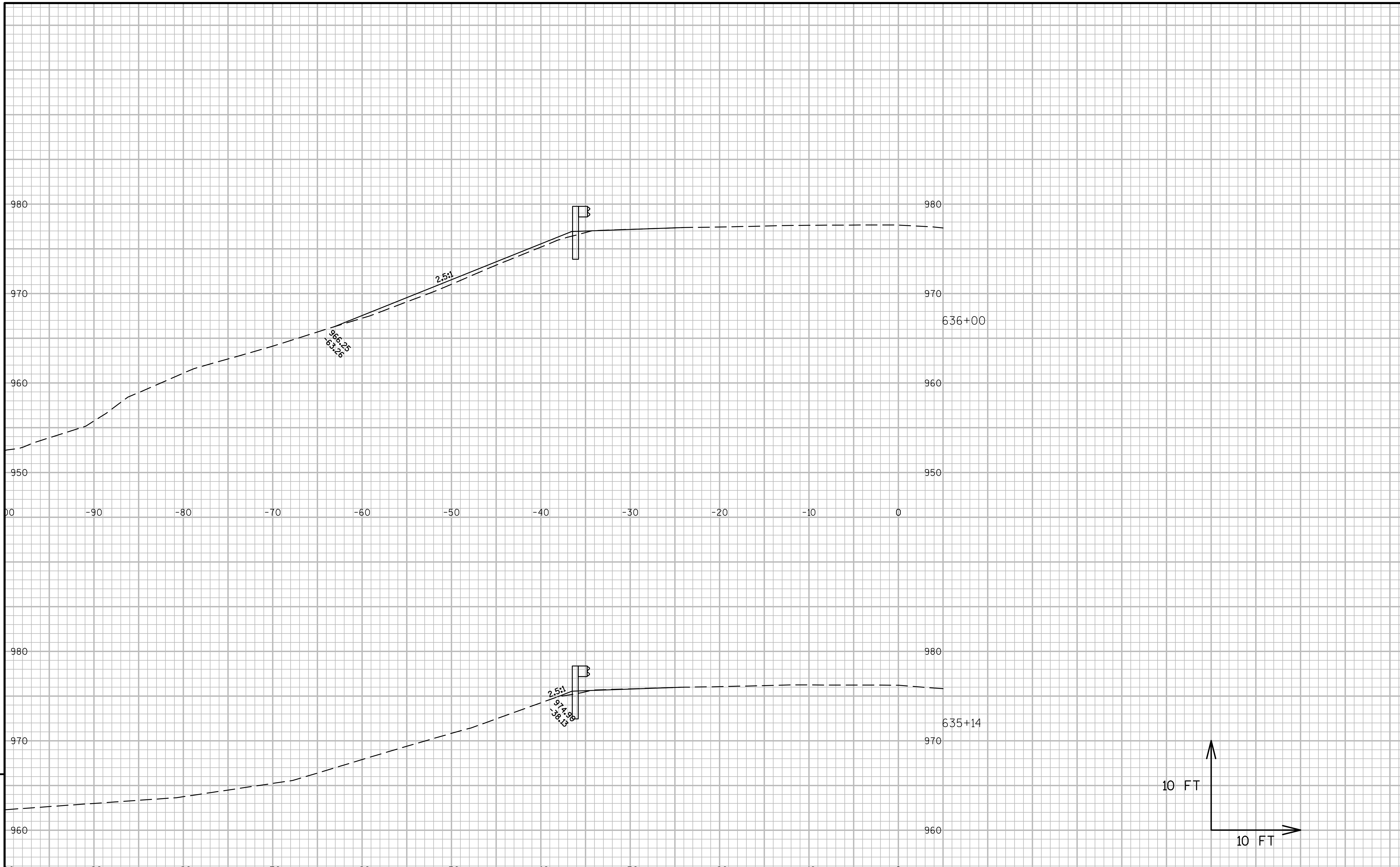
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 194	E



PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 195	E

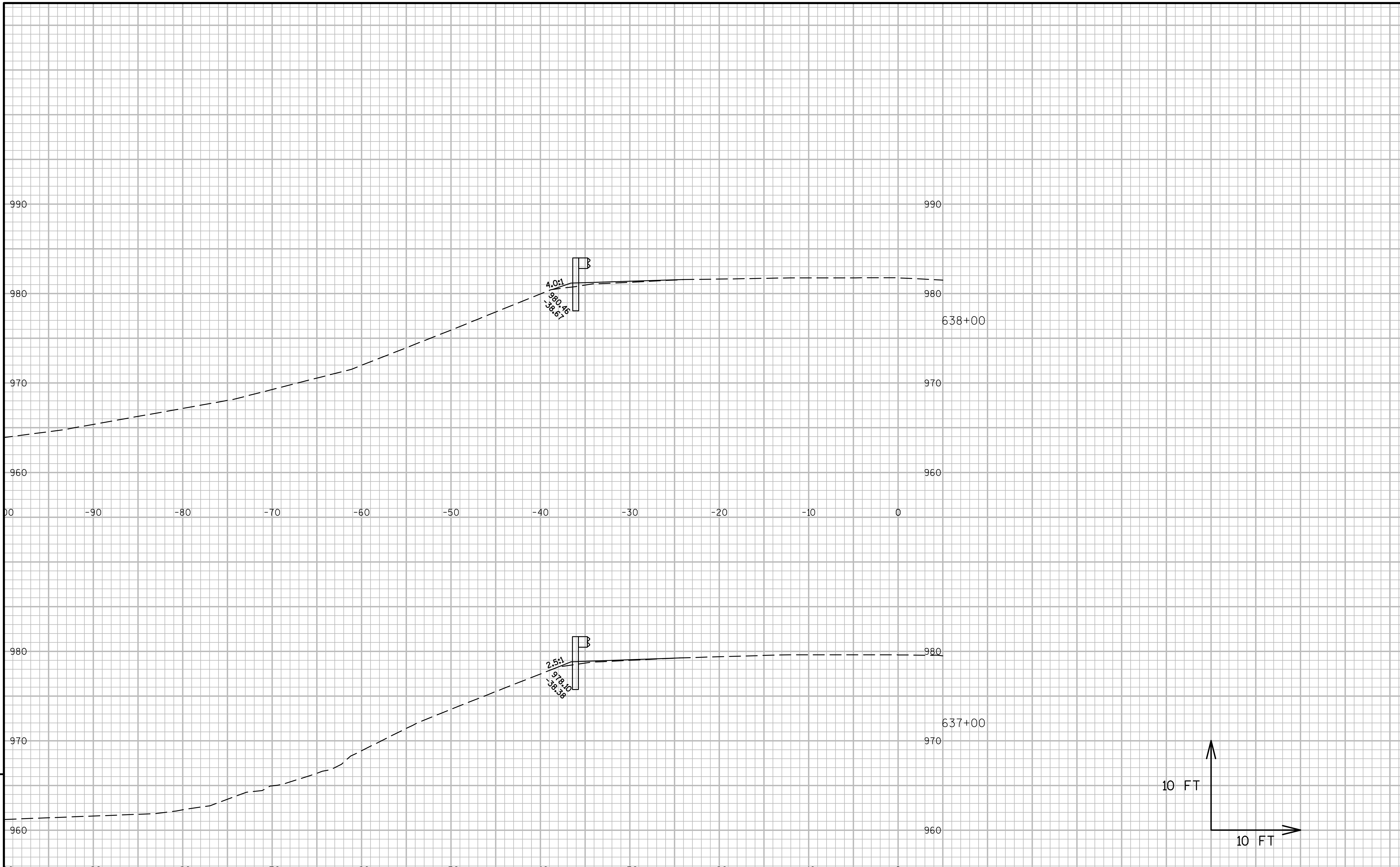


PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 196	E



PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 197 E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090243
PLOT DATE : 2/1/2016 8:40 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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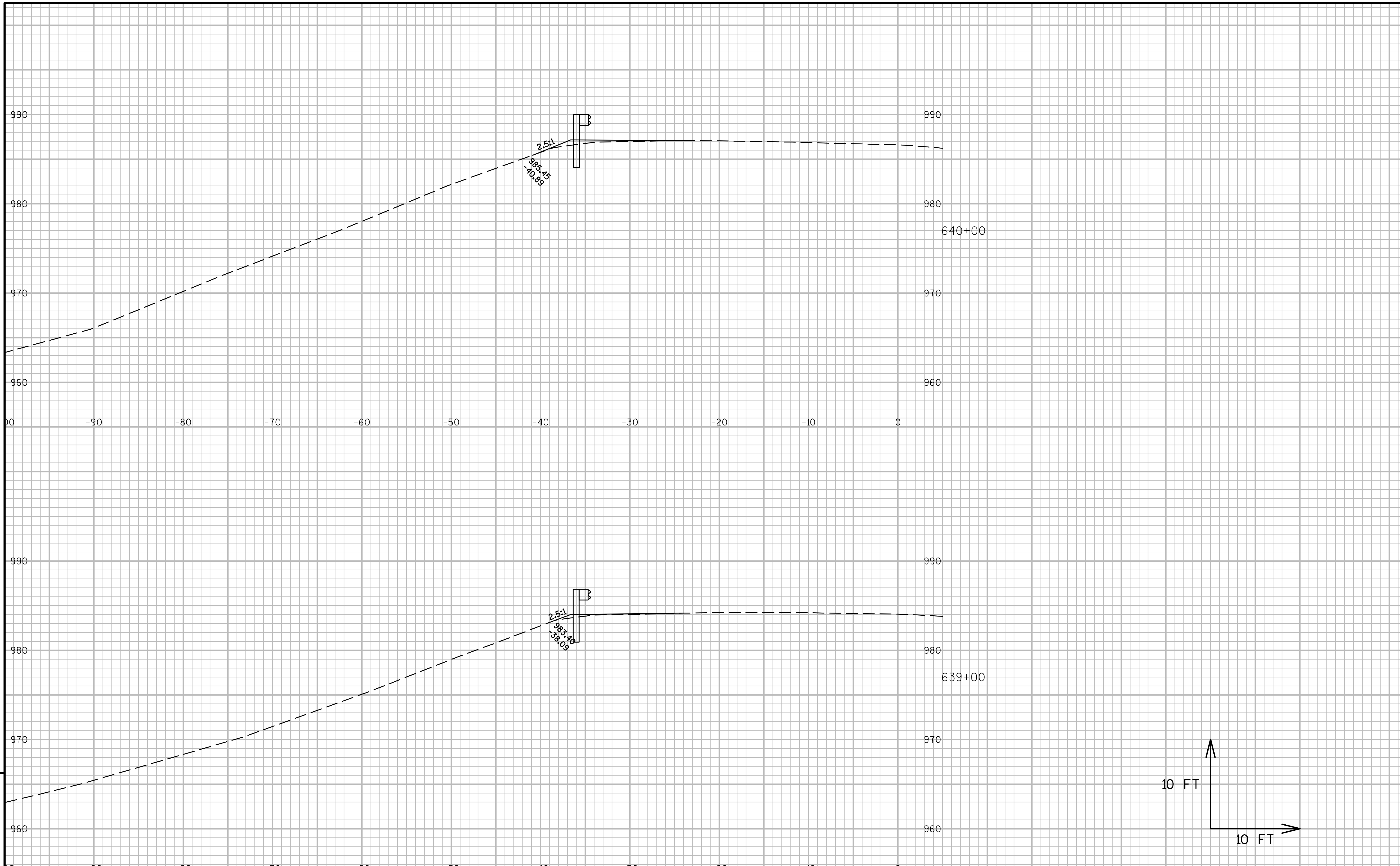
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 198	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090244
PLOT DATE : 2/1/2016 8:40 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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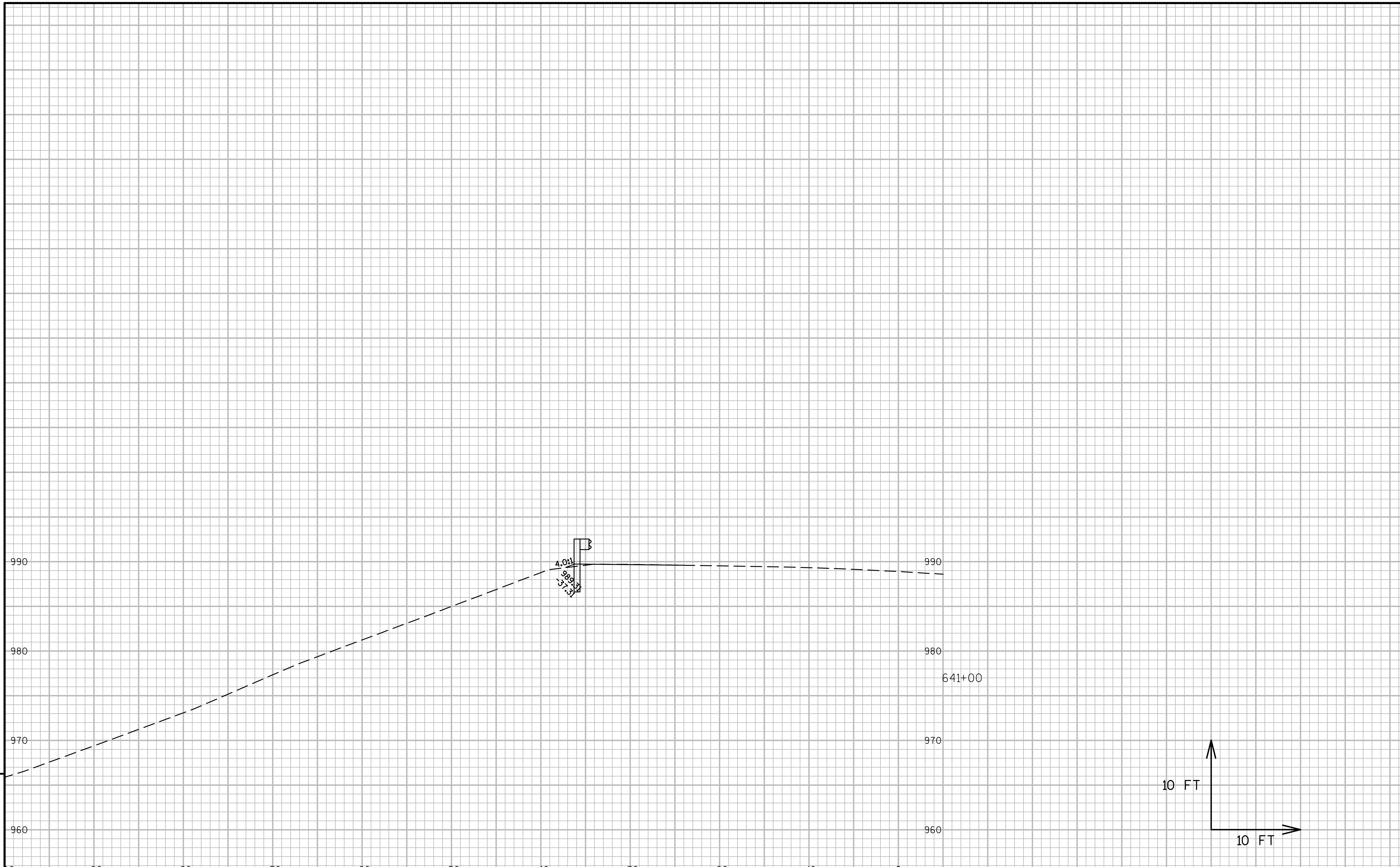
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 199	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090245
PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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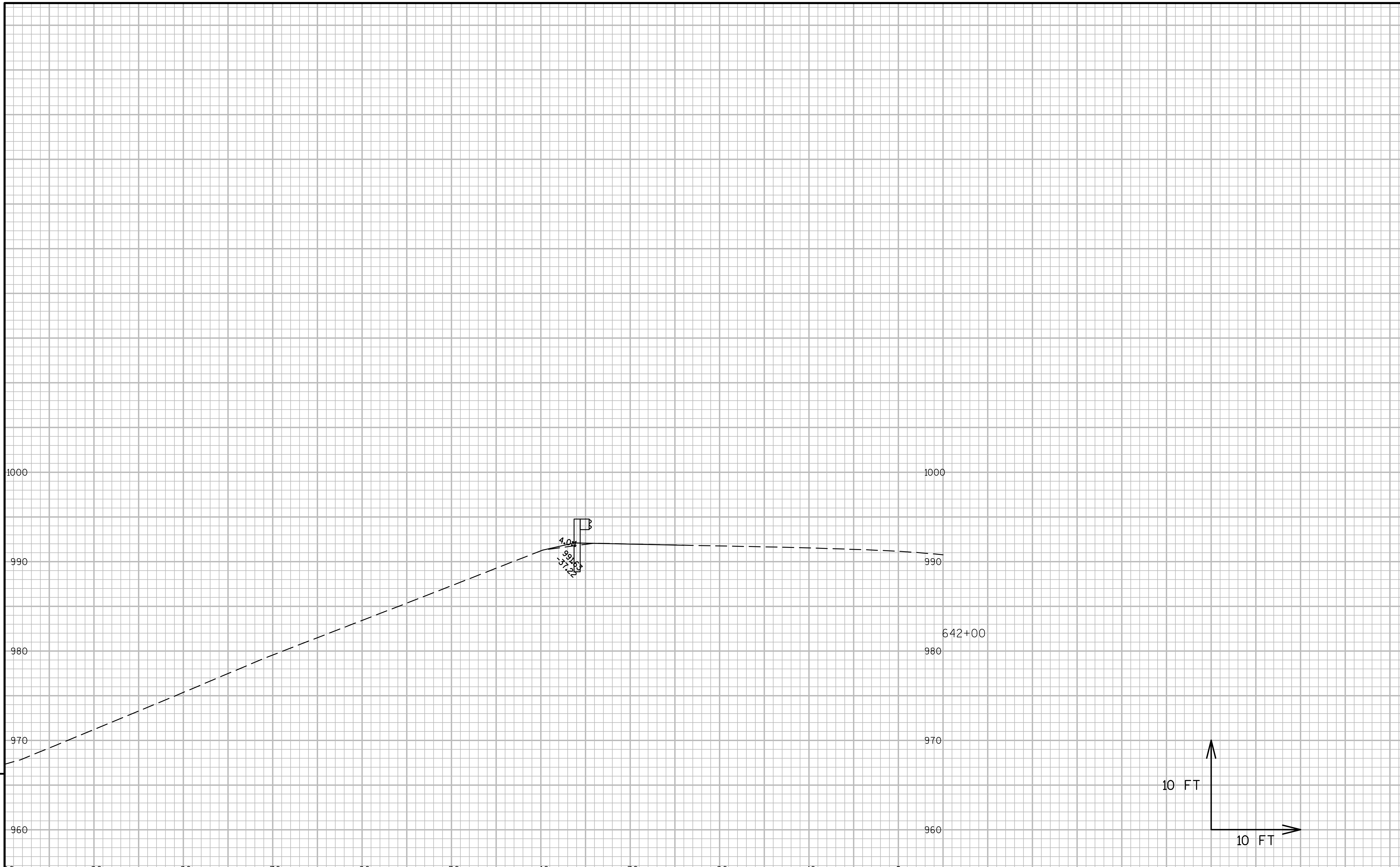
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 200	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090246

PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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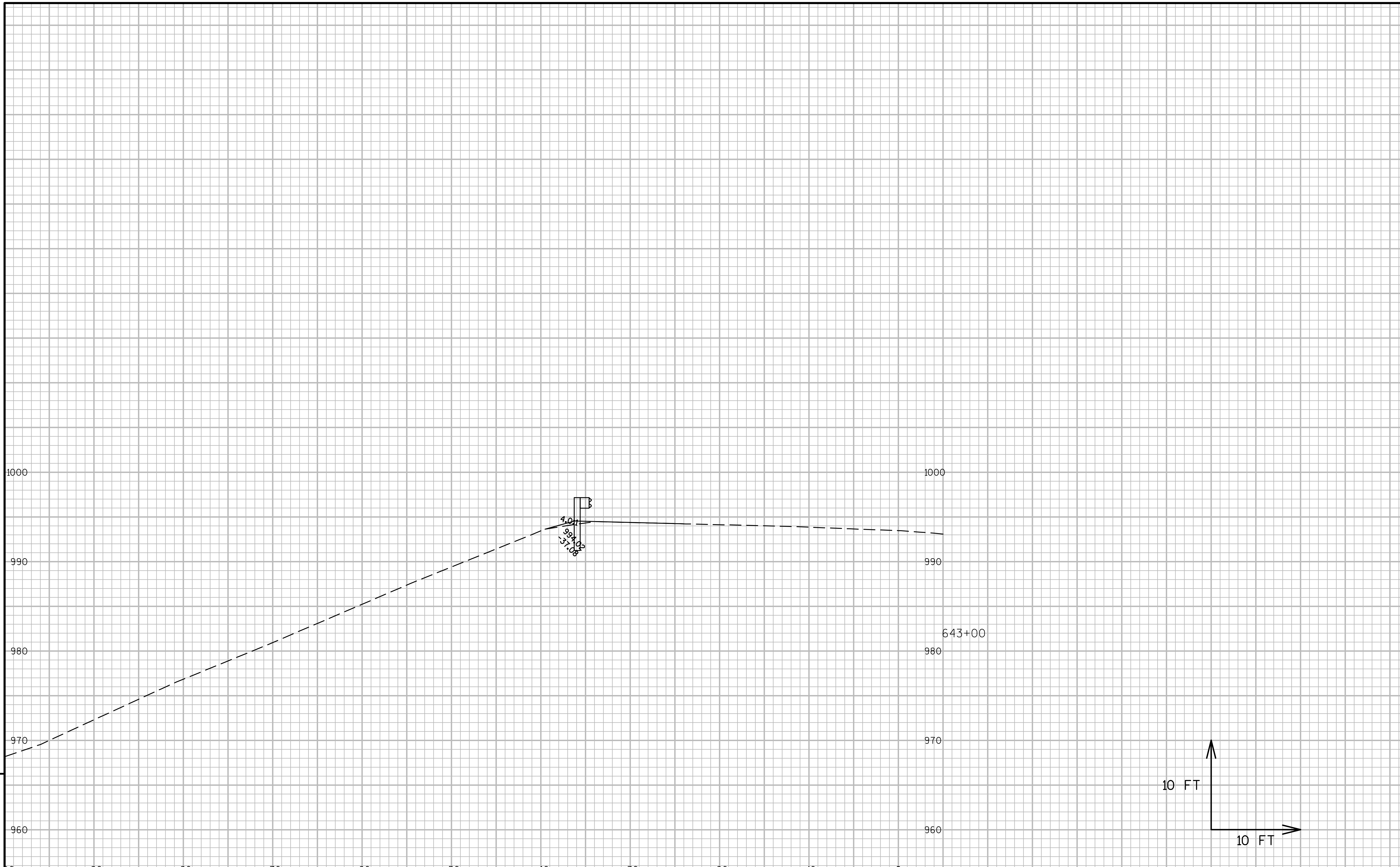
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 201	E



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PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 202	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090248

PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49

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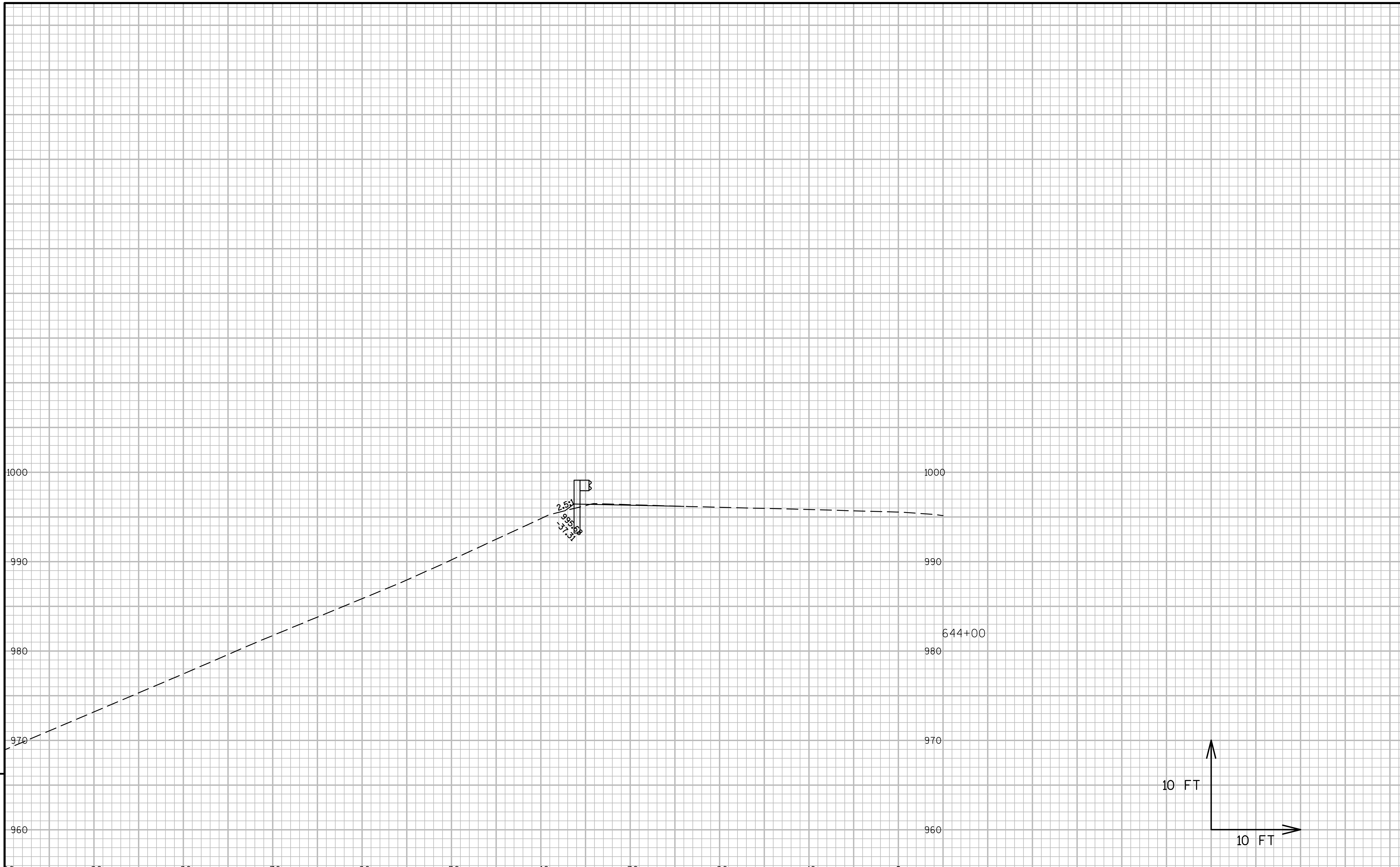

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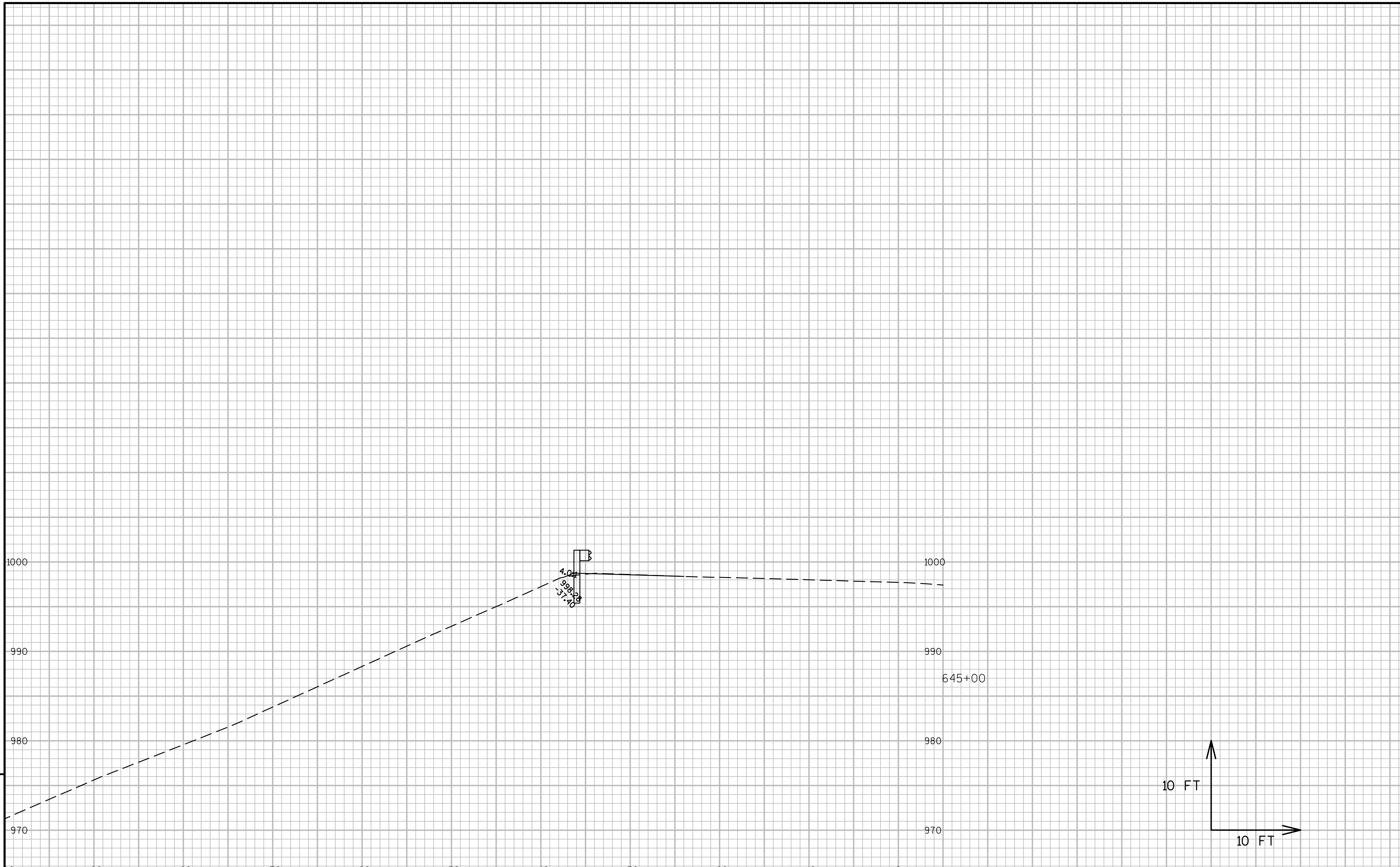
PROJECT NO:1023-02-76 | HWY:IH 94 | COUNTY:JACKSON | CROSS SECTIONS: WB BEAM GUARD GRADING | SHEET 203 | E



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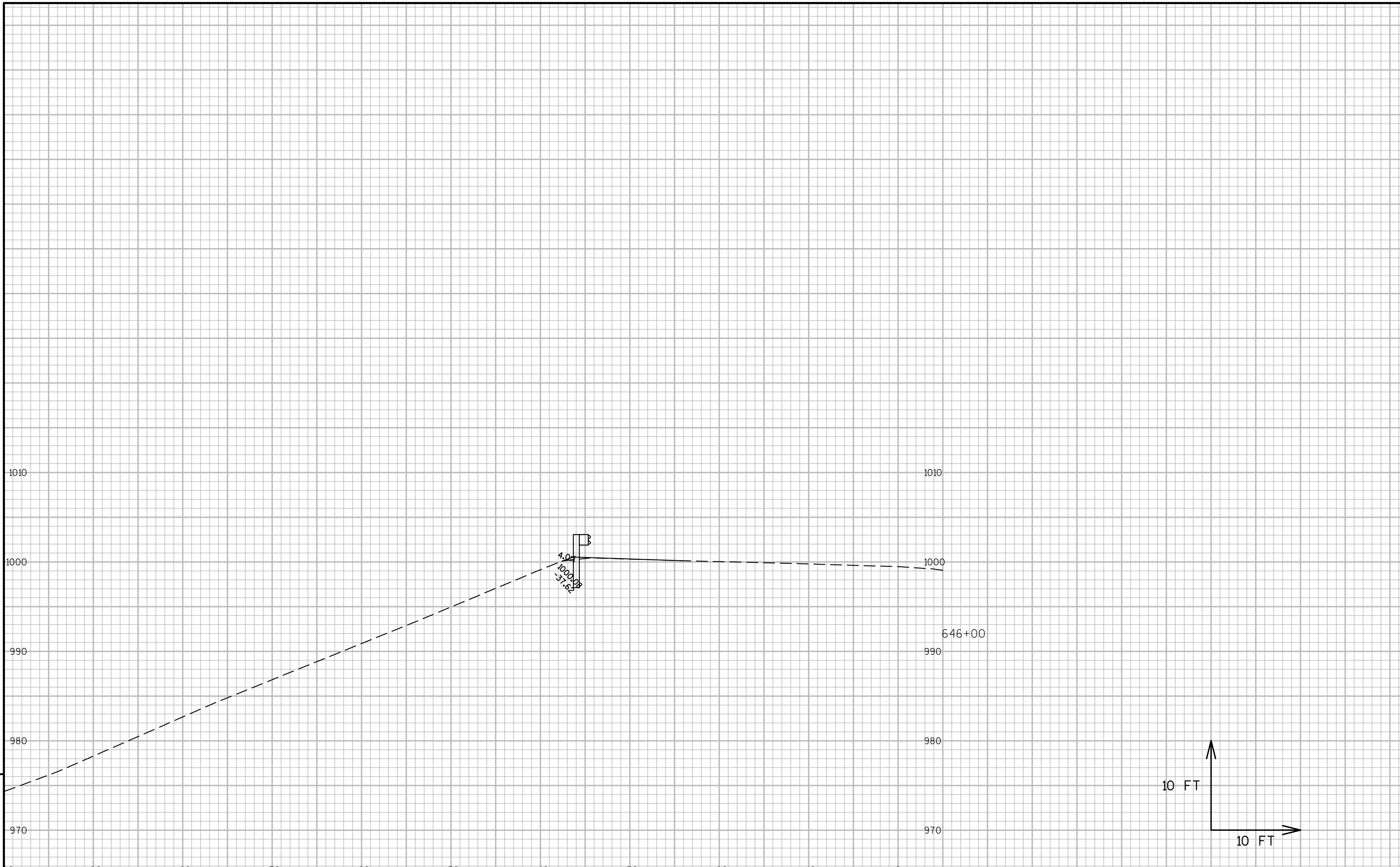
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 204	E



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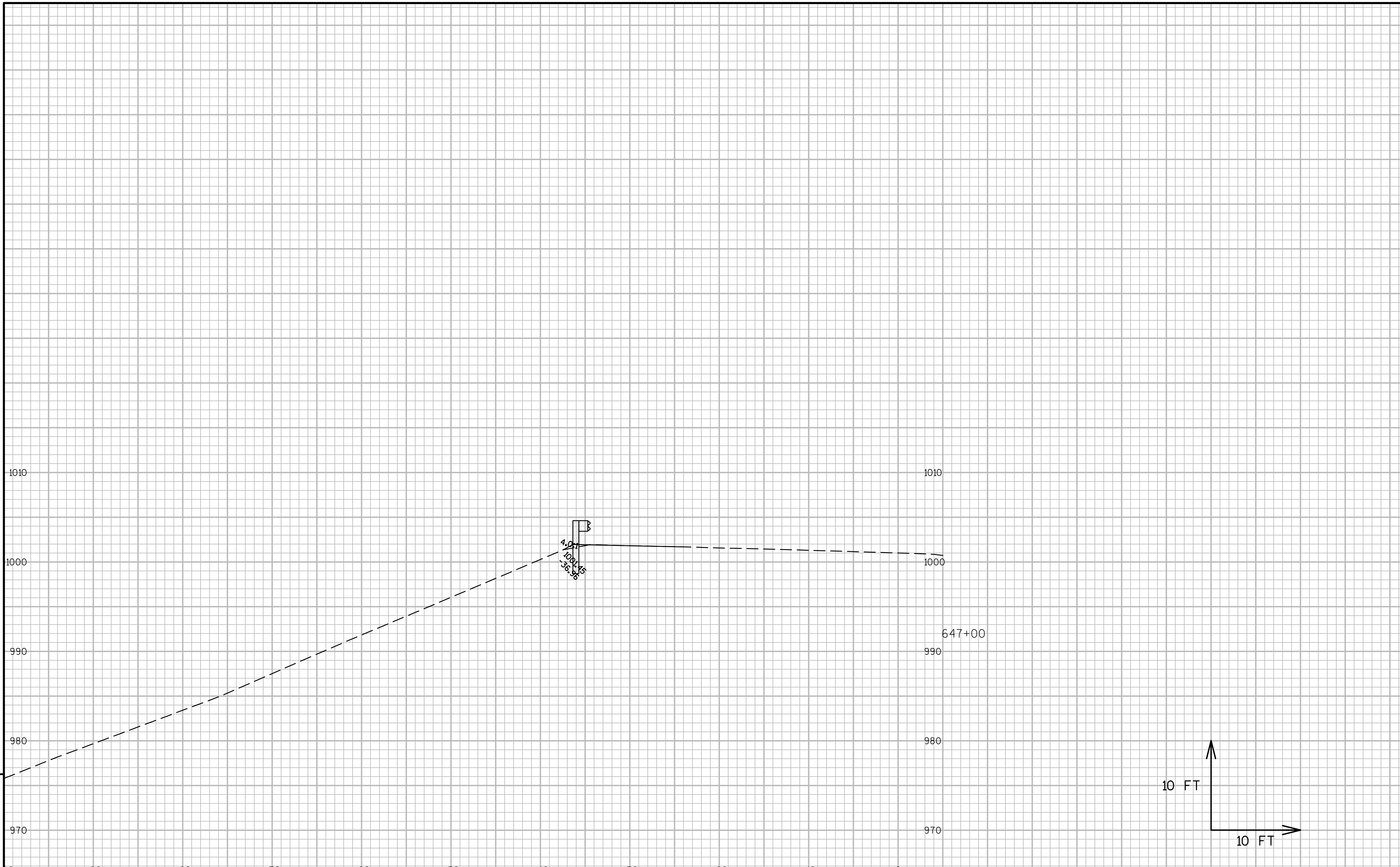
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 205	E

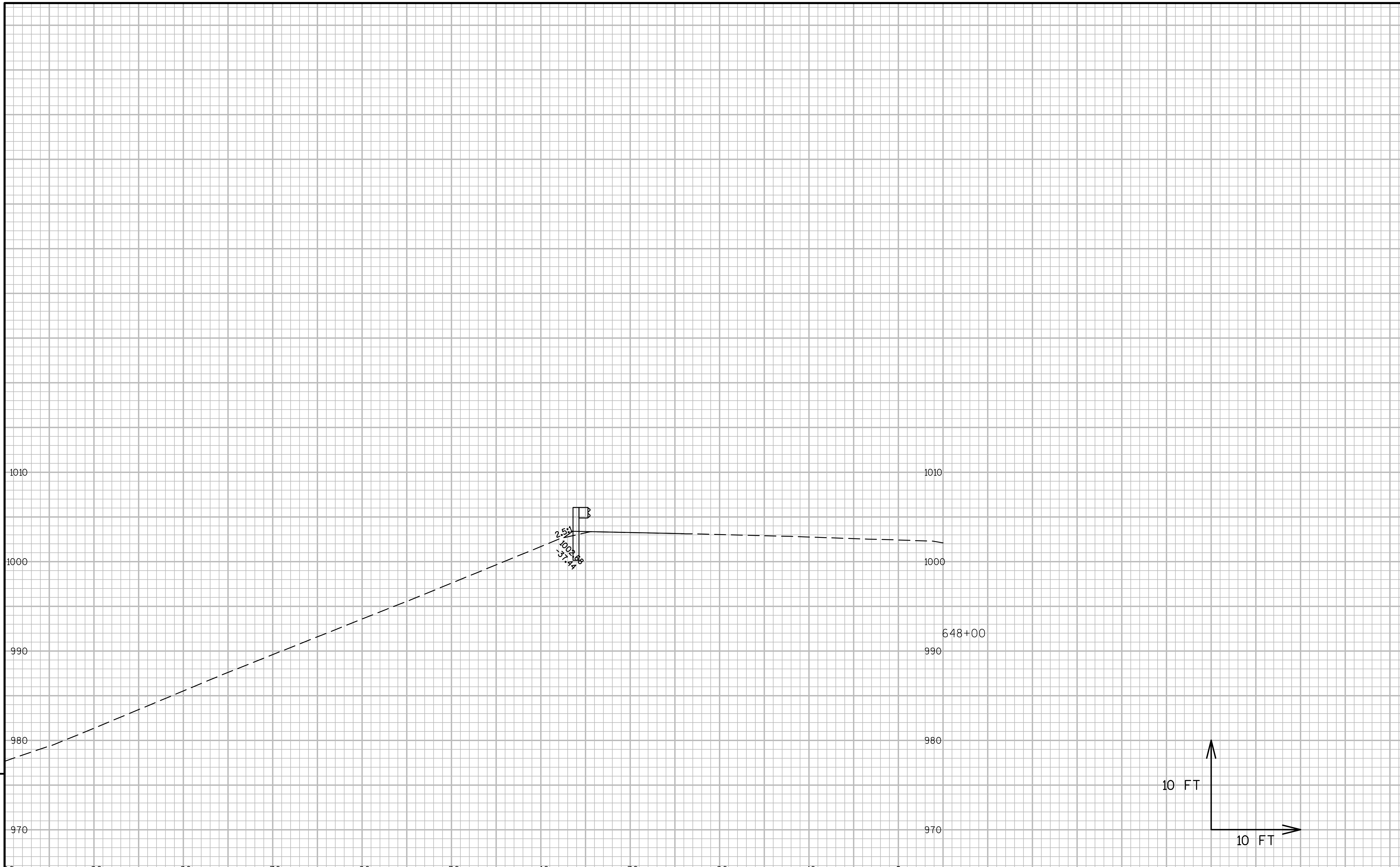
FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090251

PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 206	E



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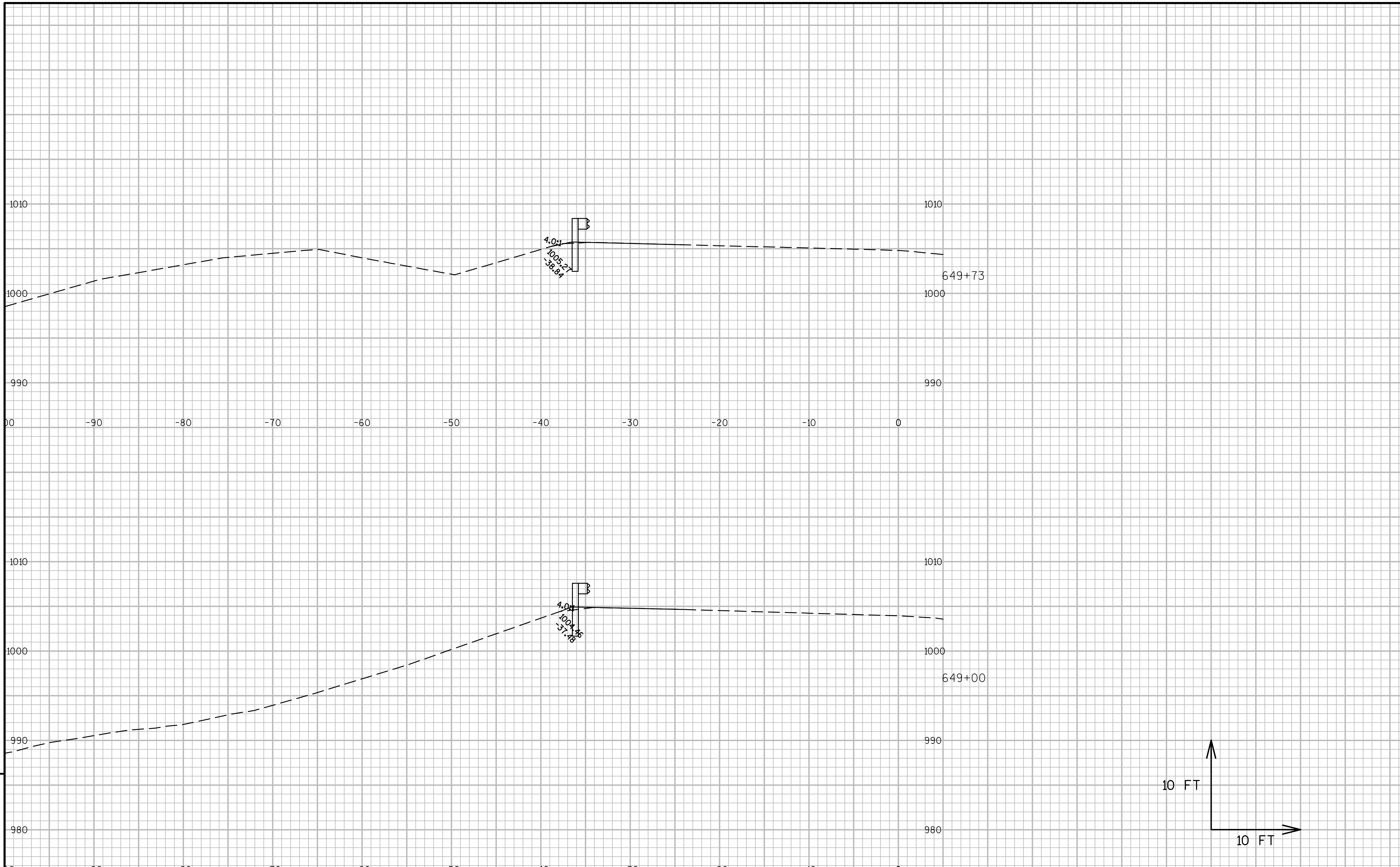
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 207	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090253

PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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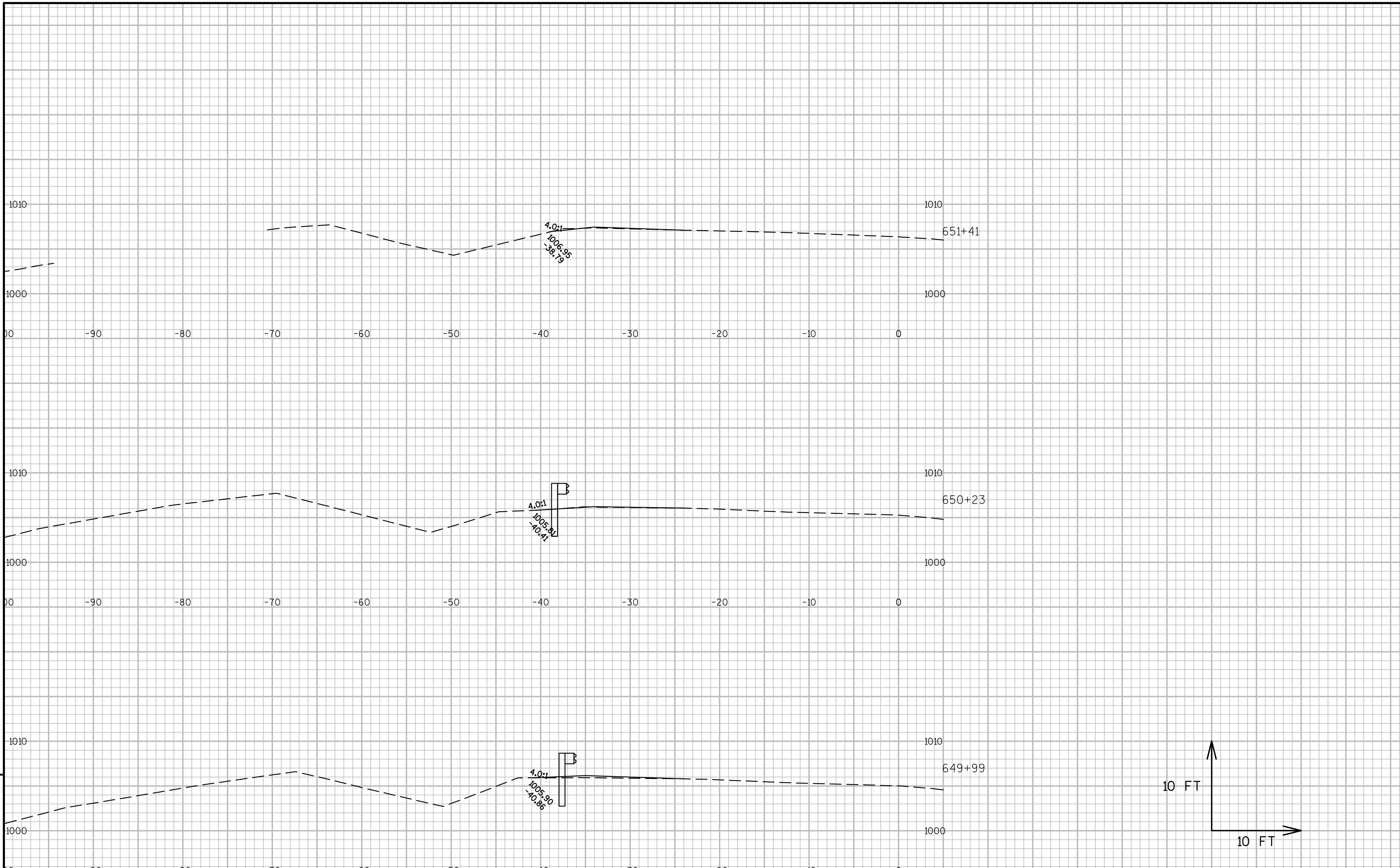
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 208	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090254

PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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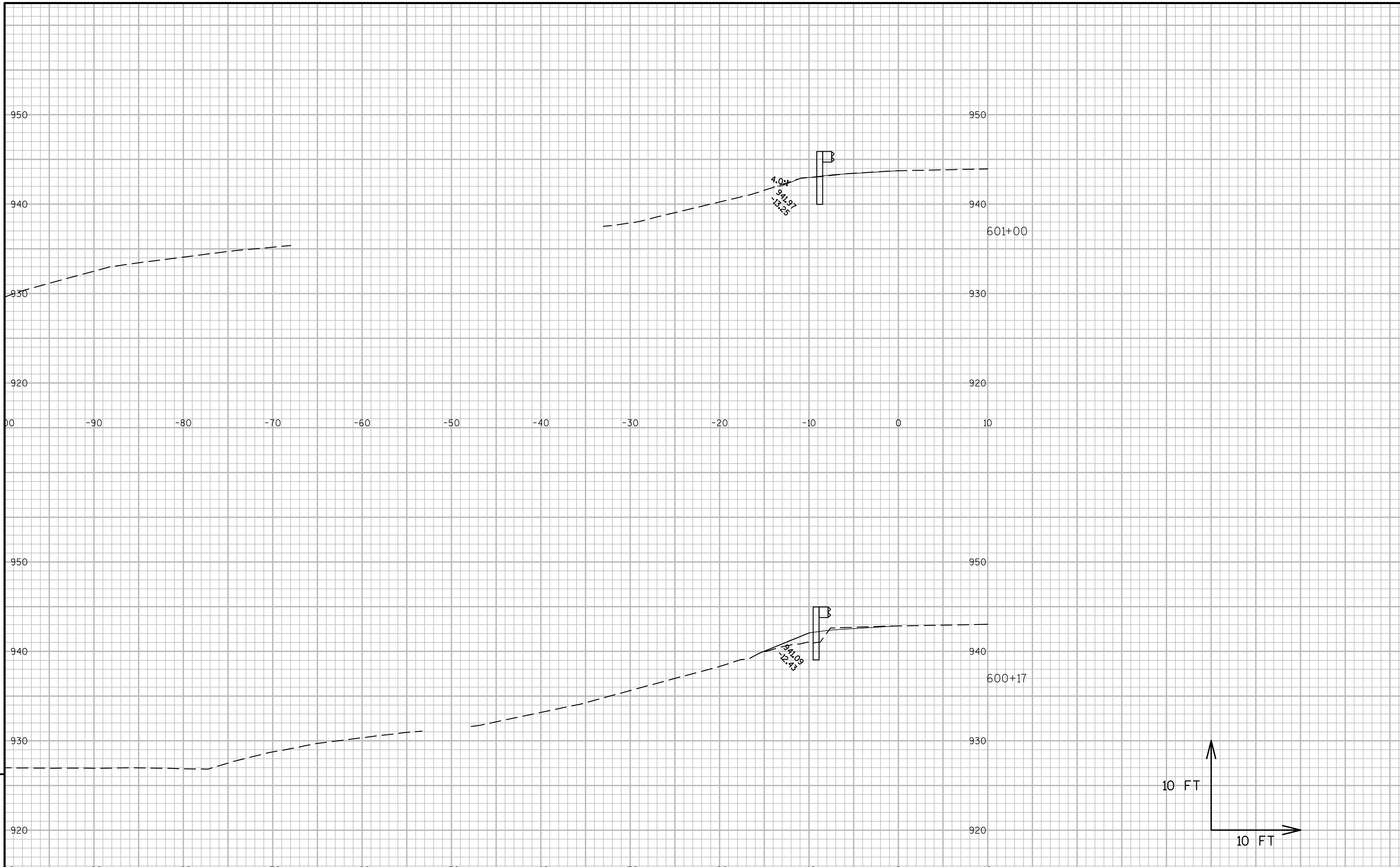
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: WB BEAM GUARD GRADING	SHEET 209	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090201_XS CHANGED.DWG
LAYOUT NAME - 090255

PLOT DATE : 2/1/2016 8:41 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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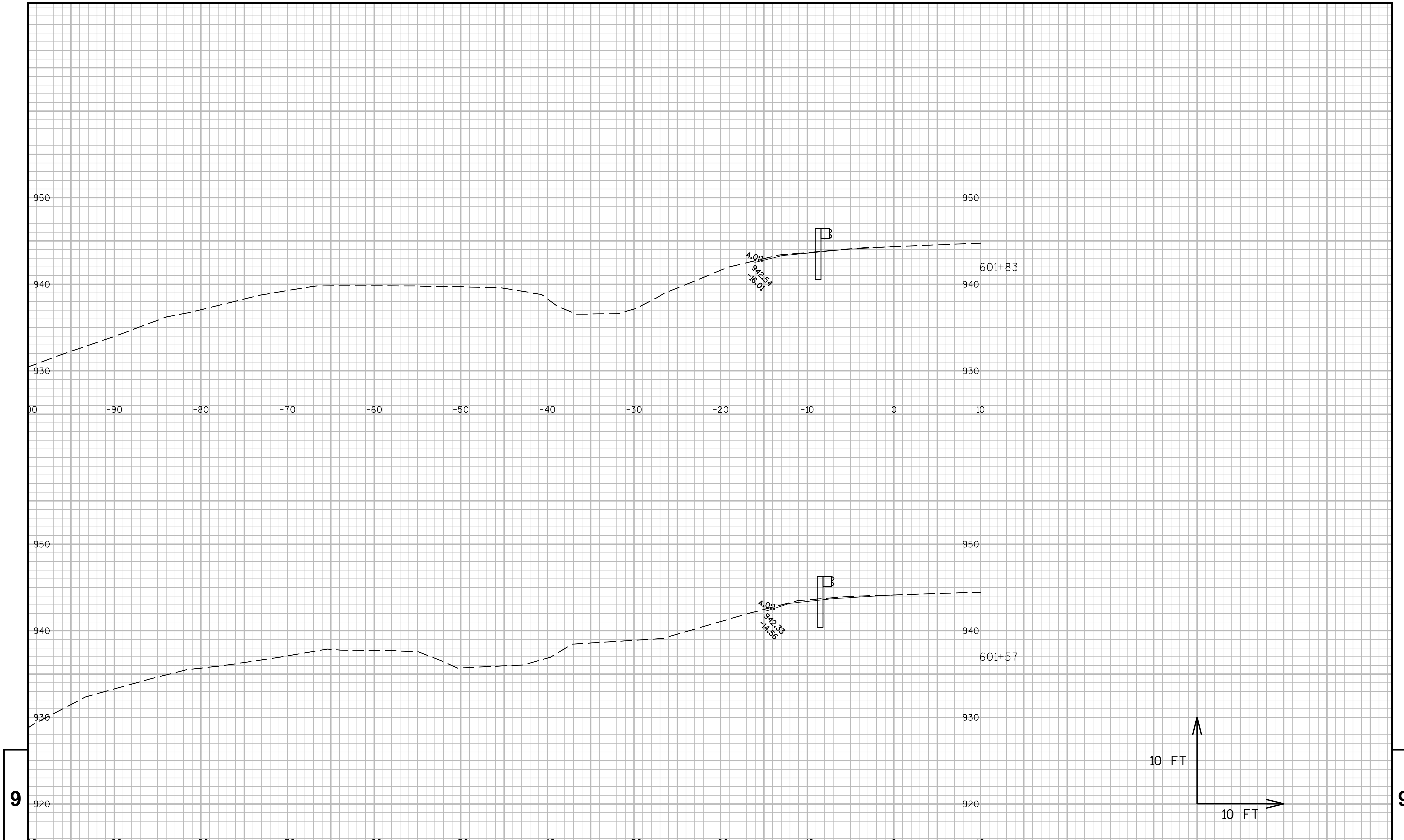
PROJECT NO:1023-02-06	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB ON RAMP BEAM GUARD GRADING	SHEET 210	E

9

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090256_XS.DWG
LAYOUT NAME - SECTION SHEET - (114)

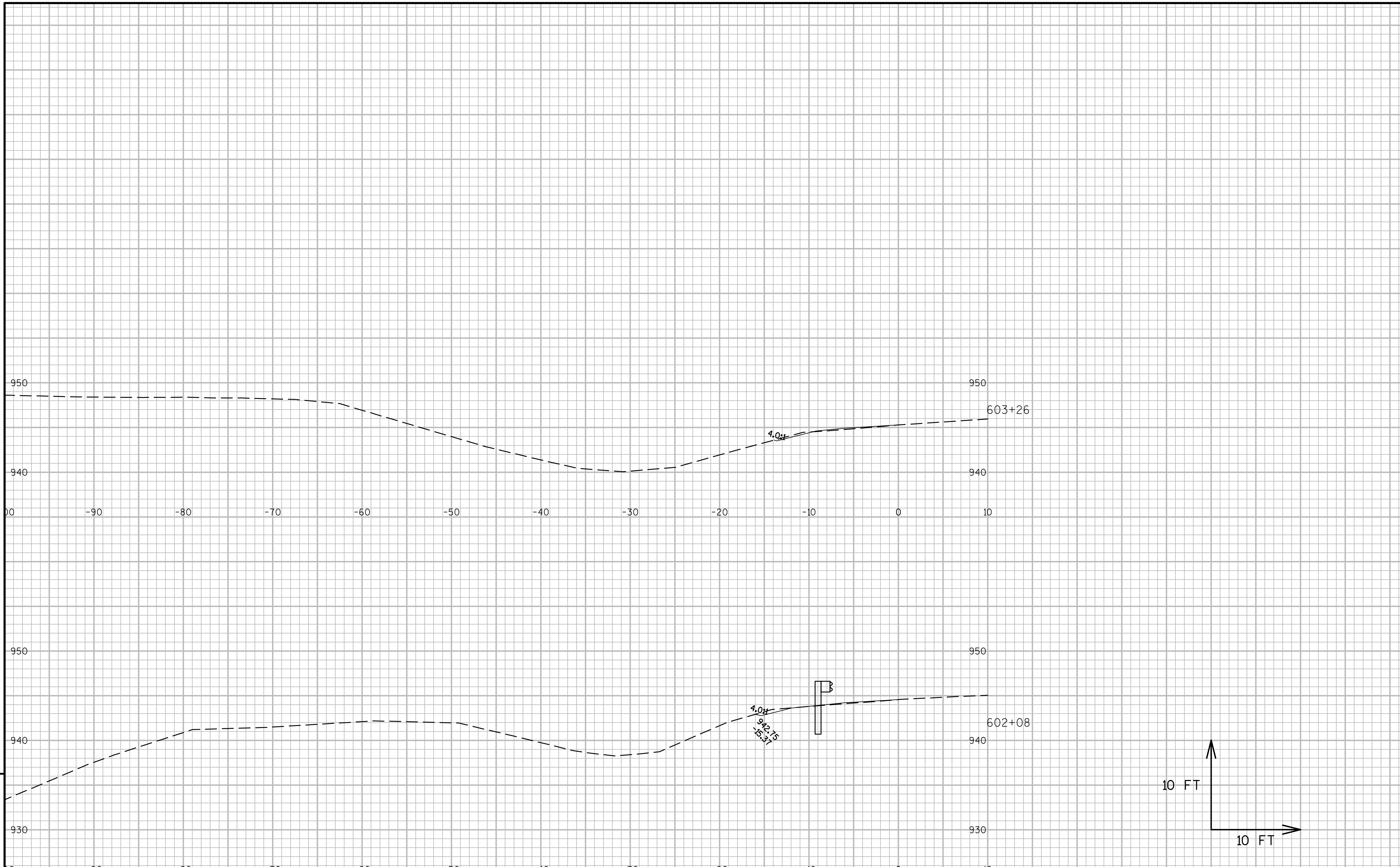
PLOT DATE : 1/27/2016 4:29 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB ON RAMP BEAM GUARD GRADING	SHEET 211	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090256_XS.DWG
LAYOUT NAME - SECTION SHEET - (115)
PLOT DATE : 1/27/2016 4:30 PM
PLOT BY : BECKLIN, MATTHEW R
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



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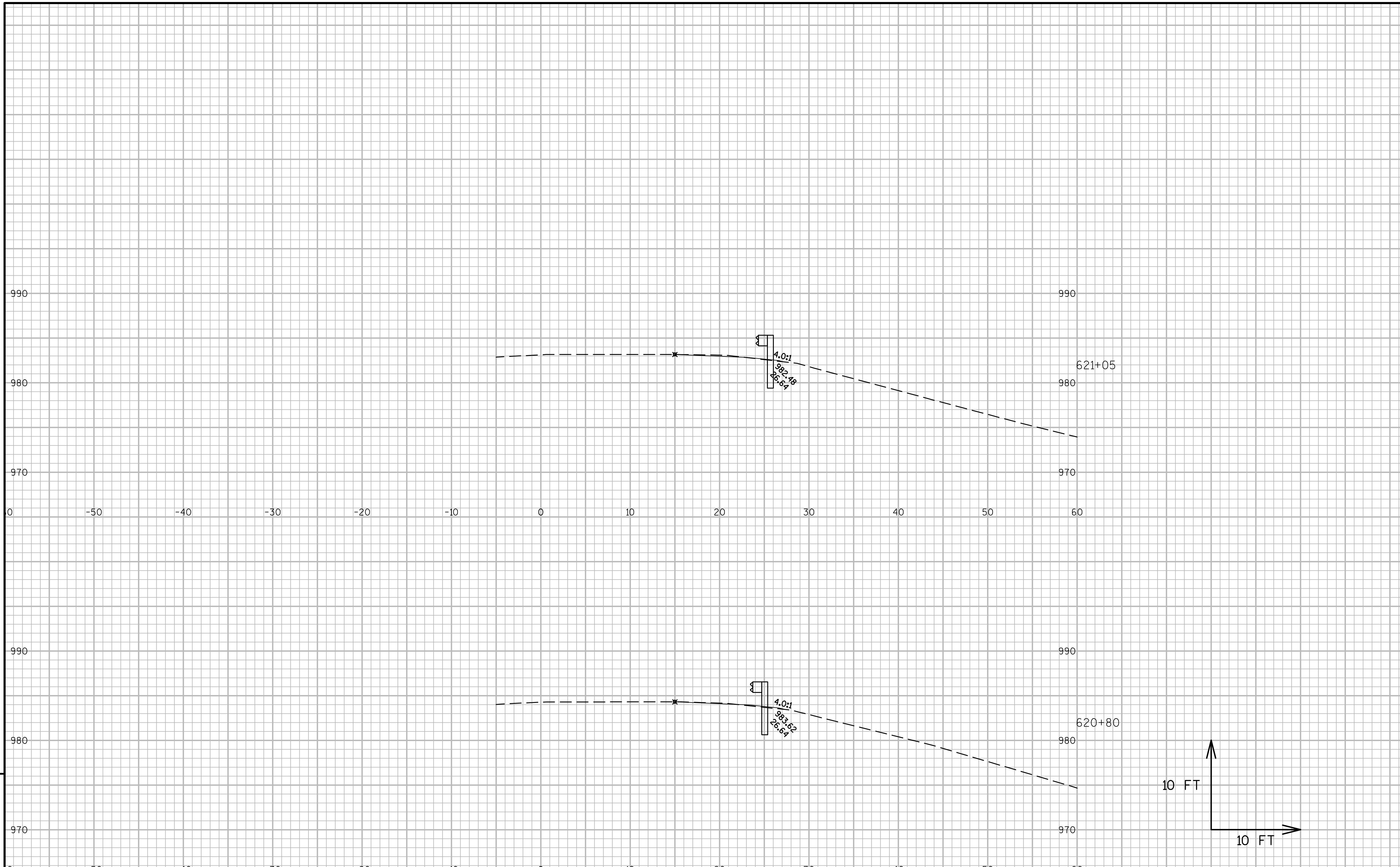
PROJECT NO: 1023-02-76 | HWY: IH 94 | COUNTY: JACKSON | CROSS SECTIONS: WB ON RAMP BEAM GUARD GRADING | SHEET 212 | E



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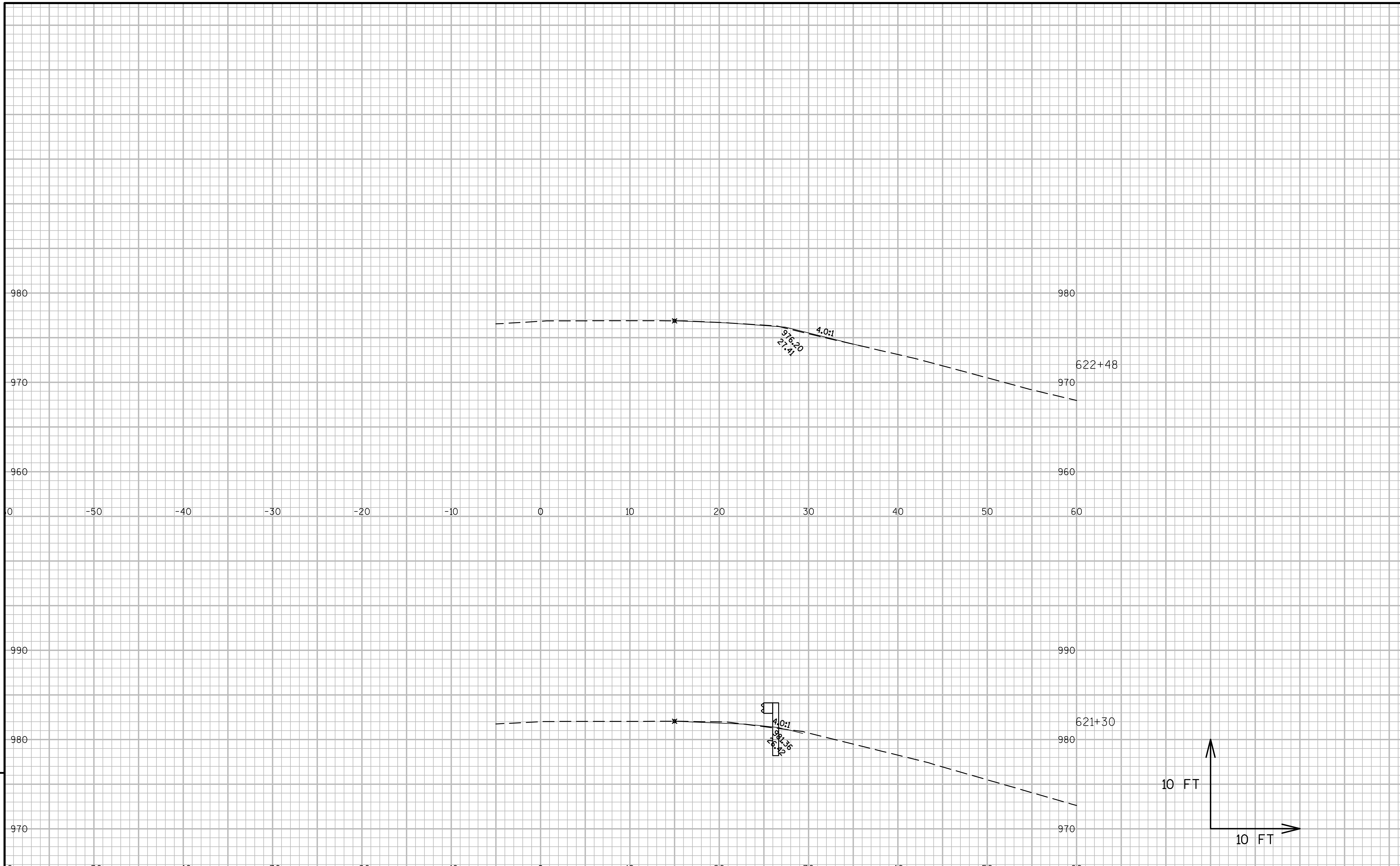
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB OFF RAMP	SHEET 213	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090259_XS.DWG
LAYOUT NAME - SECTION SHEET - (114)
PLOT DATE : 11/17/2015 9:22 AM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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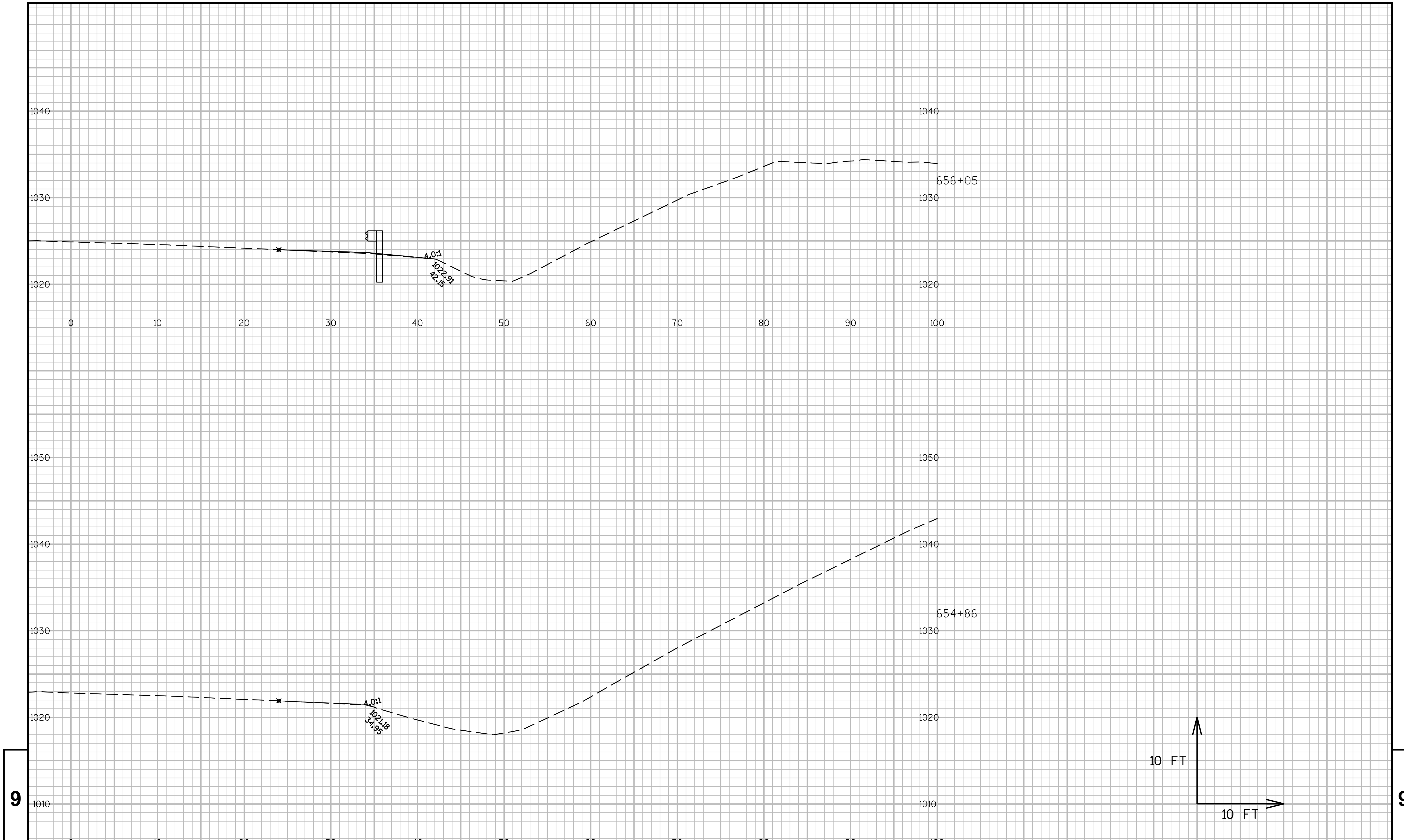
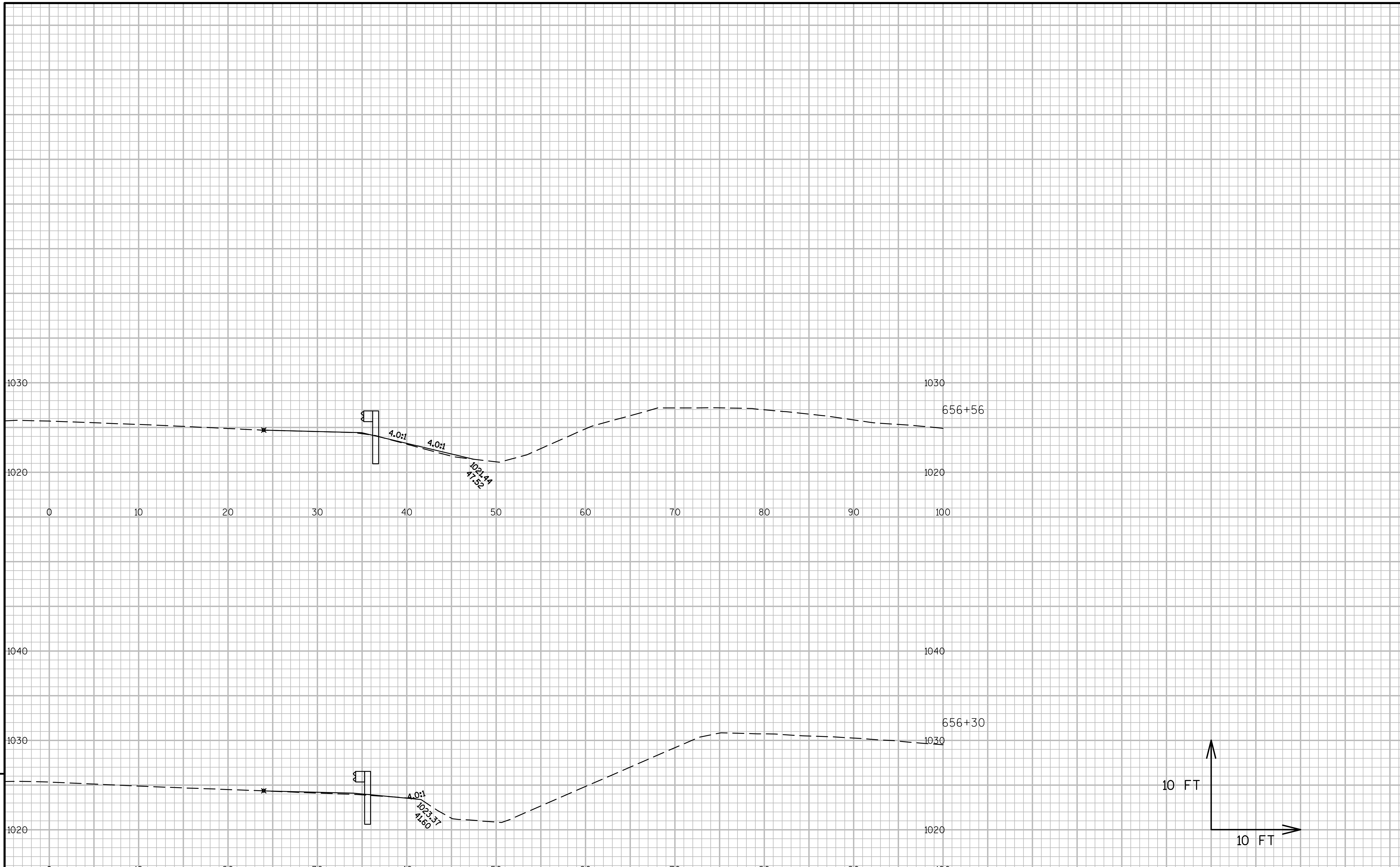
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: WB OFF RAMP	SHEET 214	E



PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 215	E



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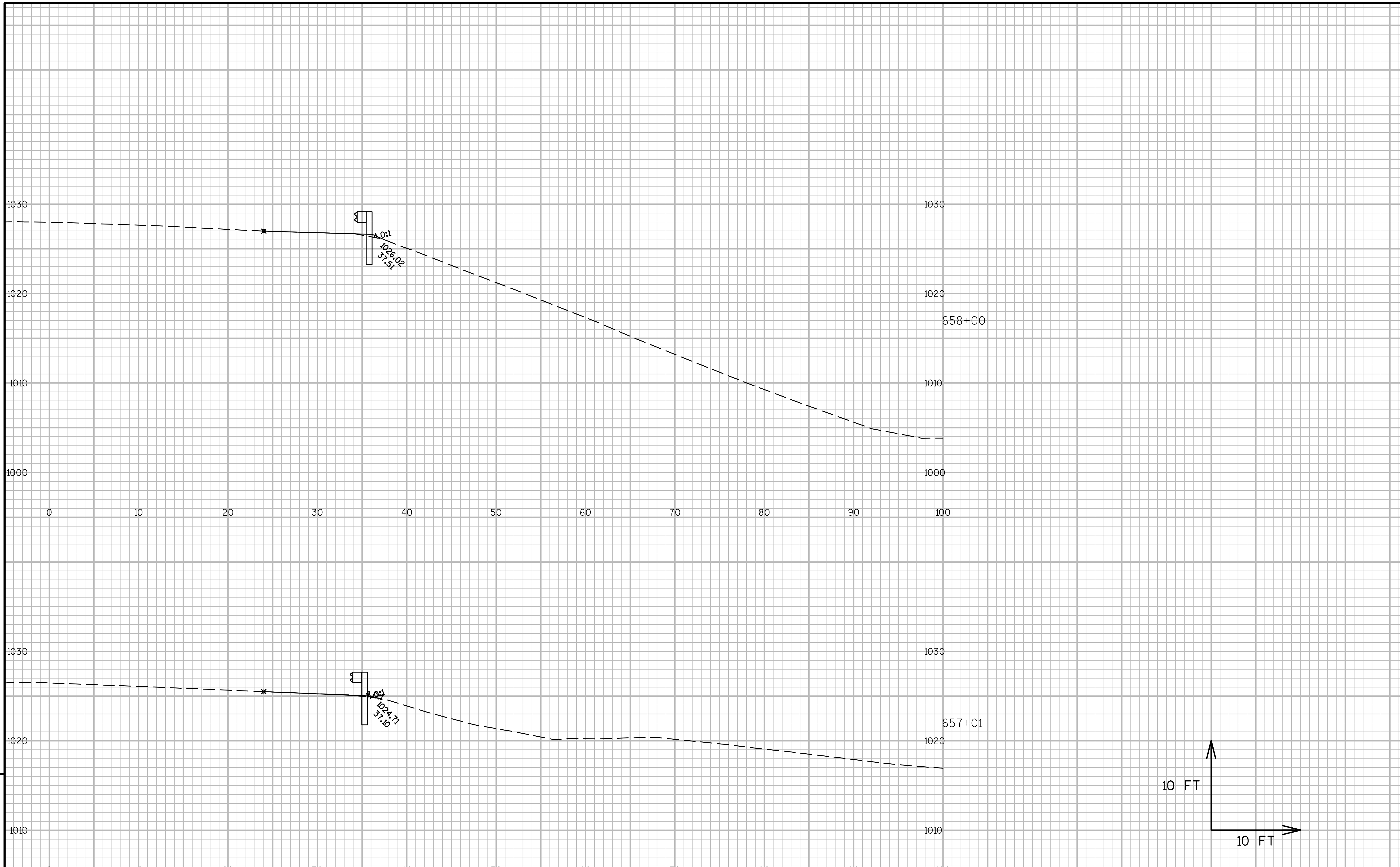
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 216	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (2)

PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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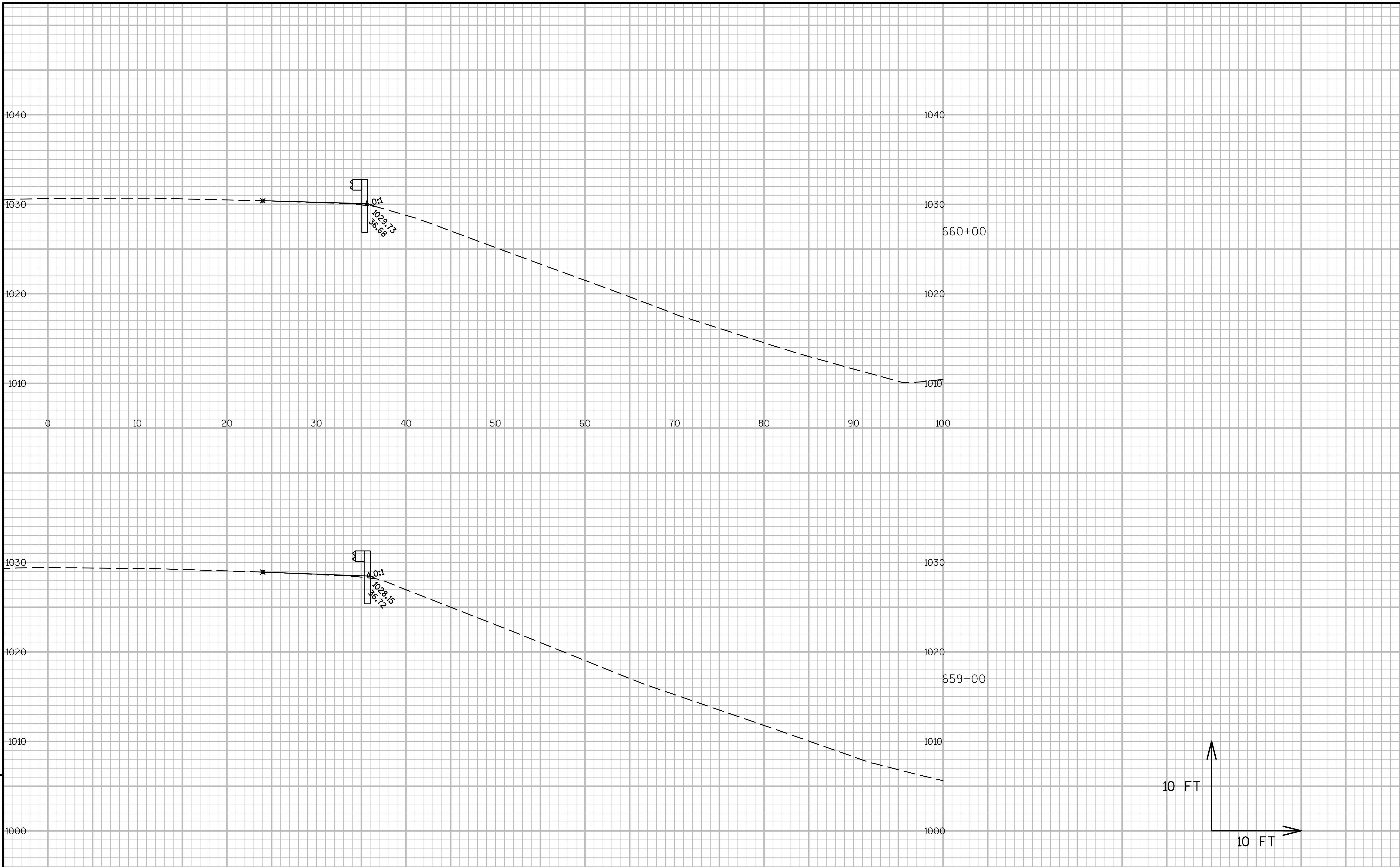
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 217	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (3)
PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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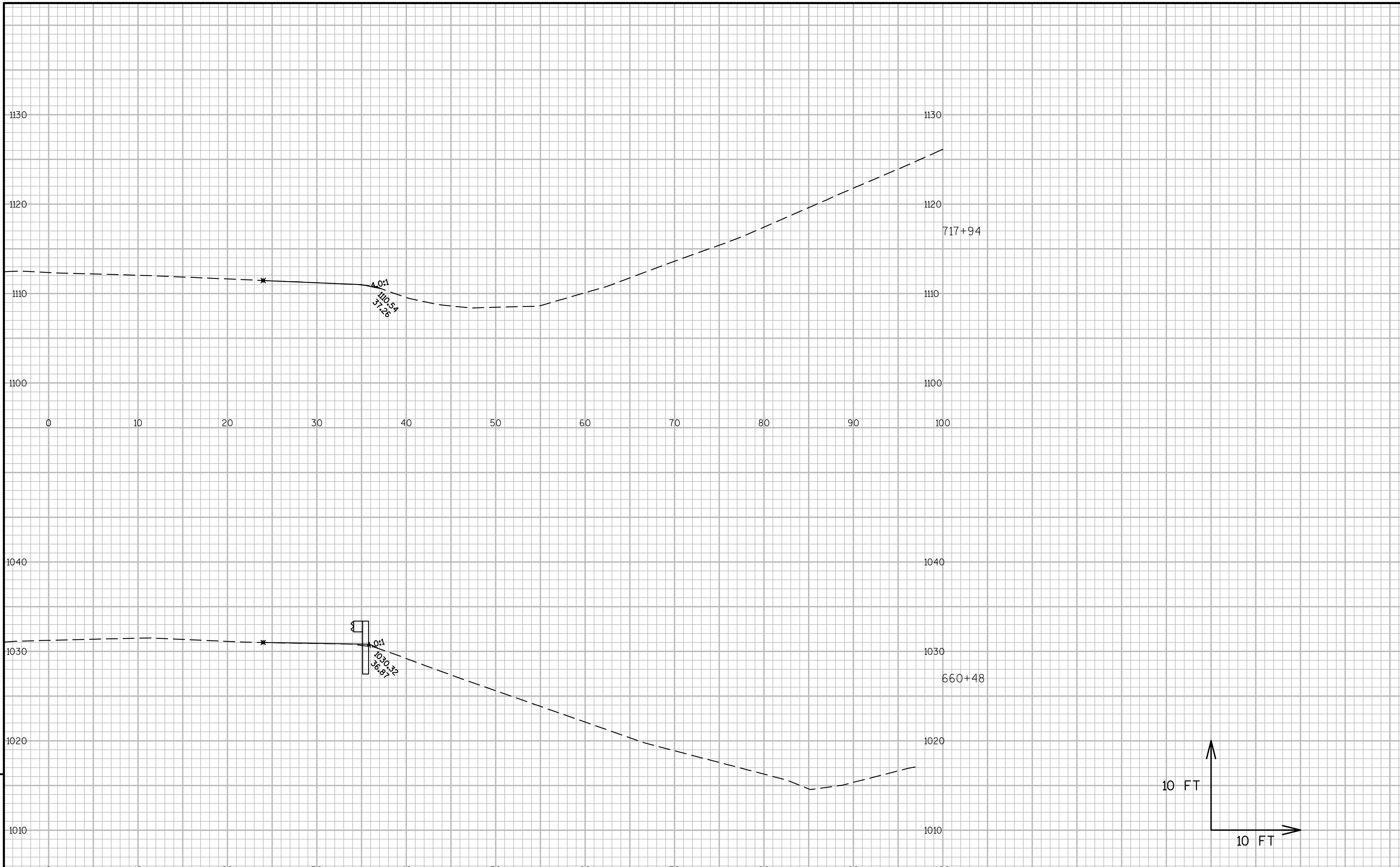
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 218	E



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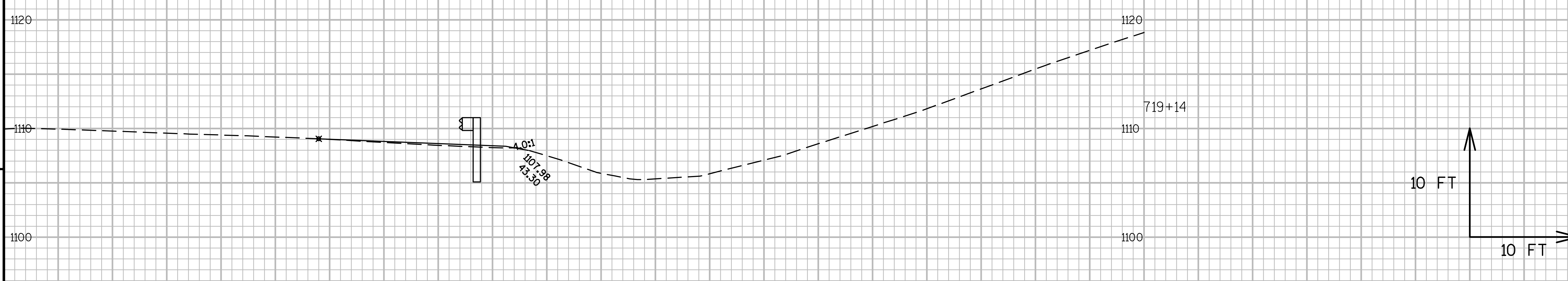
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 219	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (5)
PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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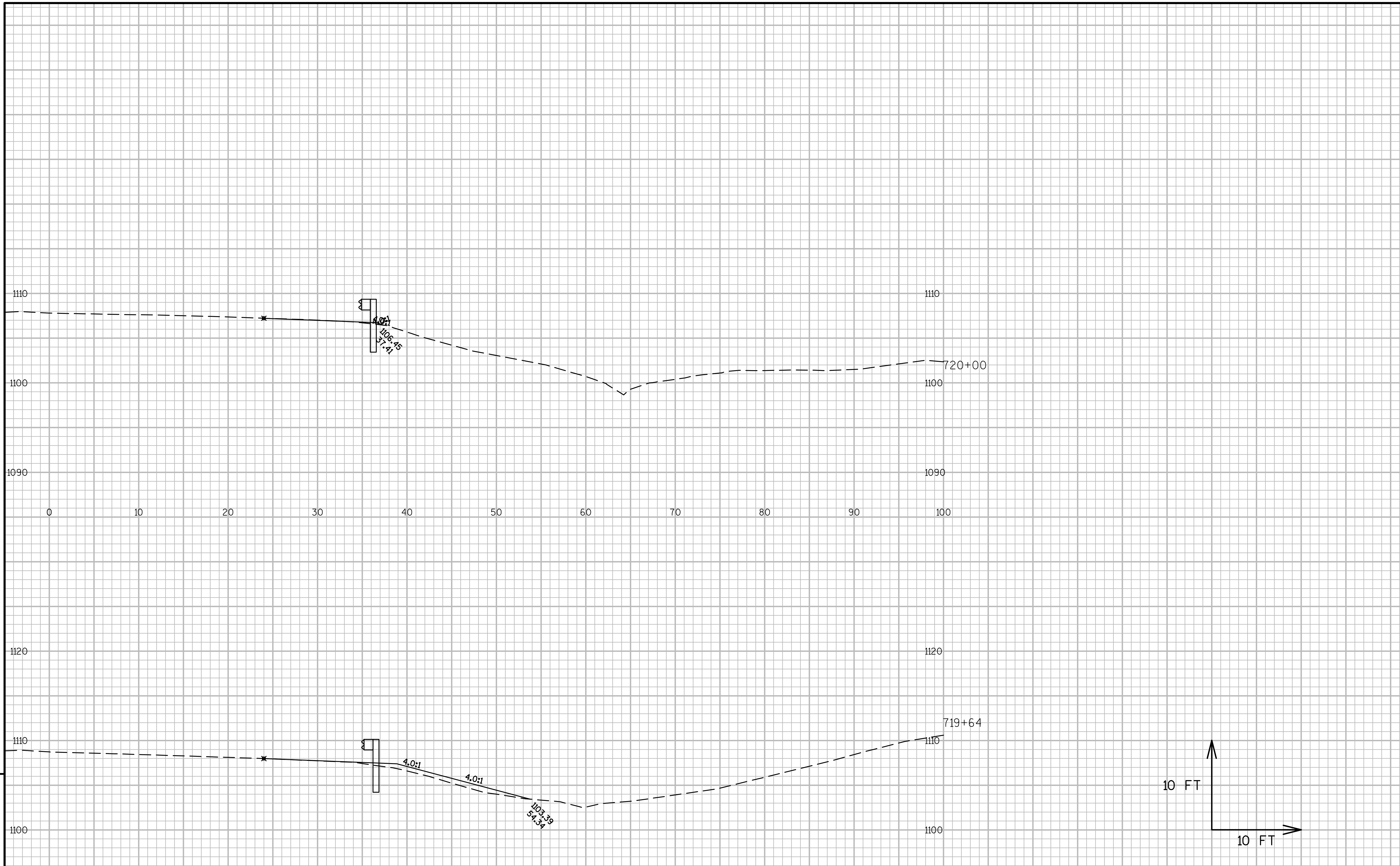
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 220	E



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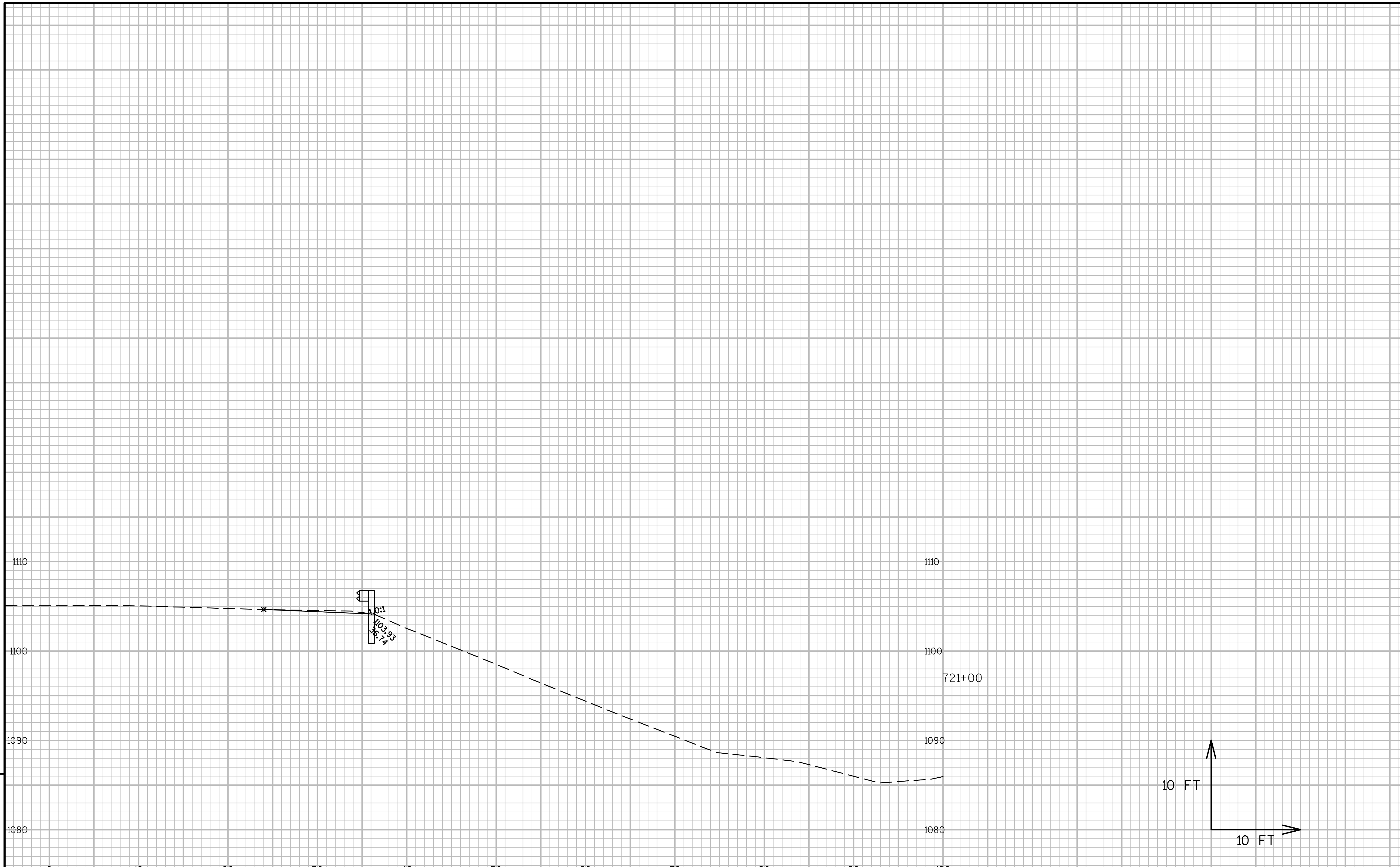
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 221	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (7)

PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



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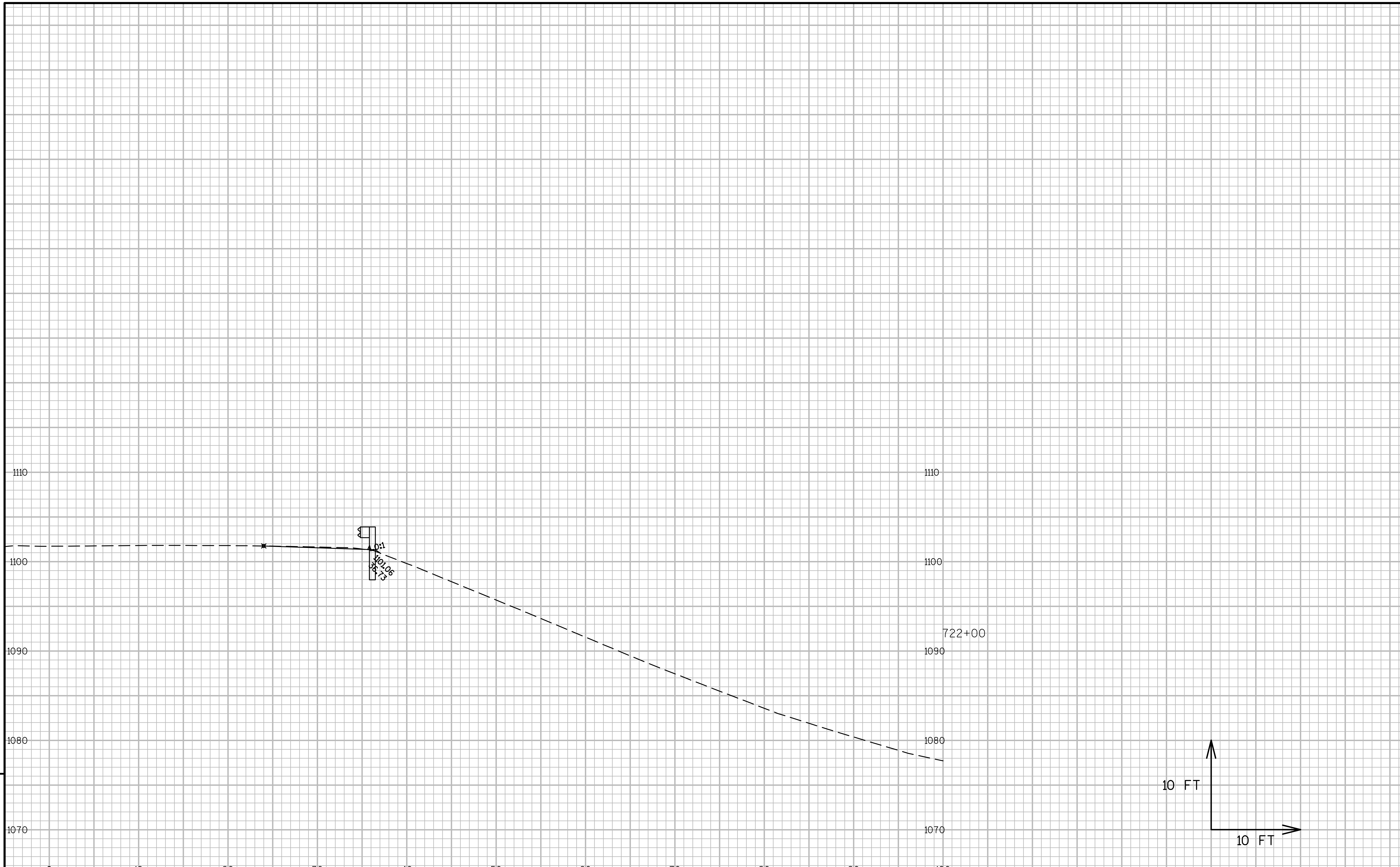
9

PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 222	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (8)

PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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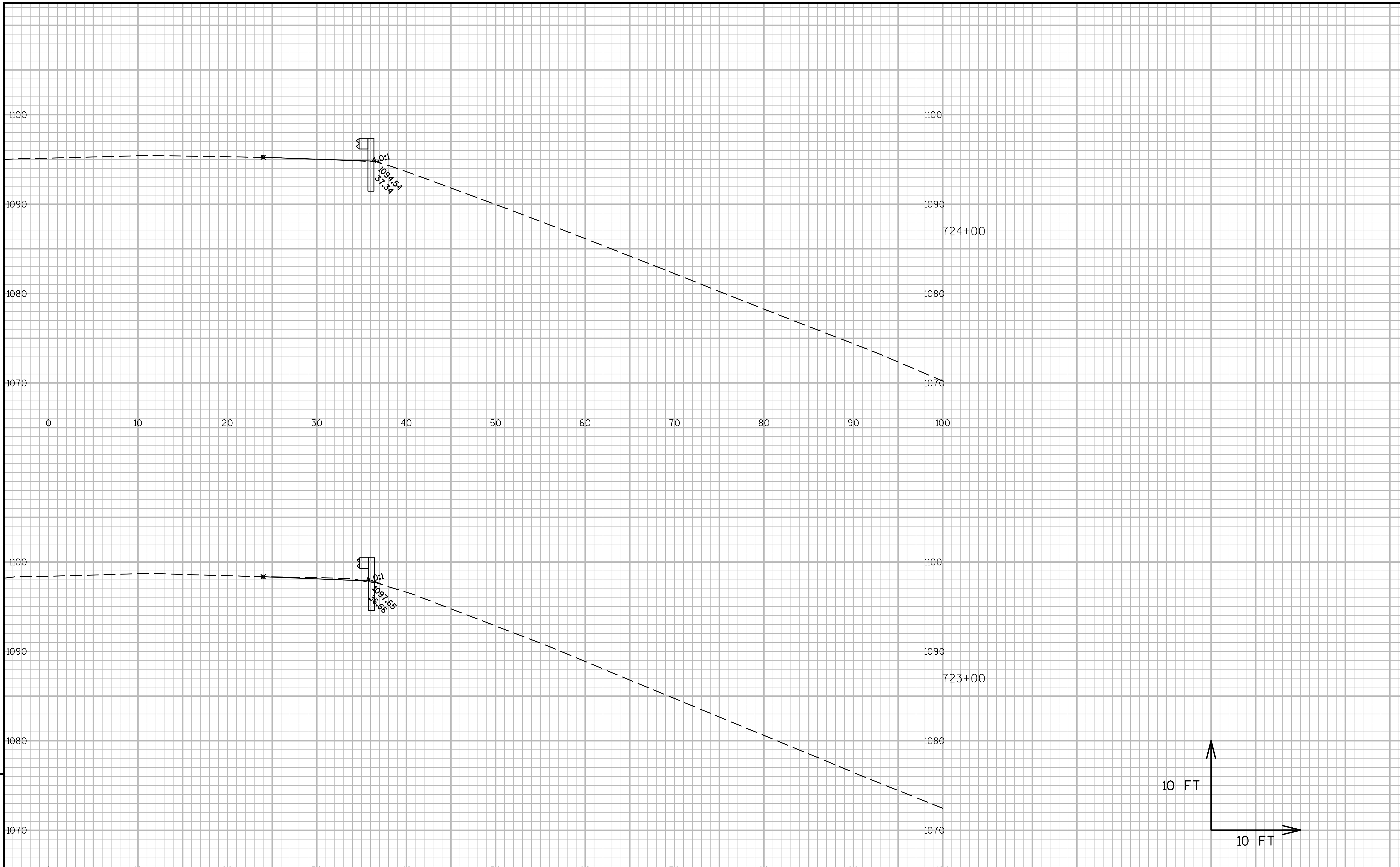
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 223	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (9)

PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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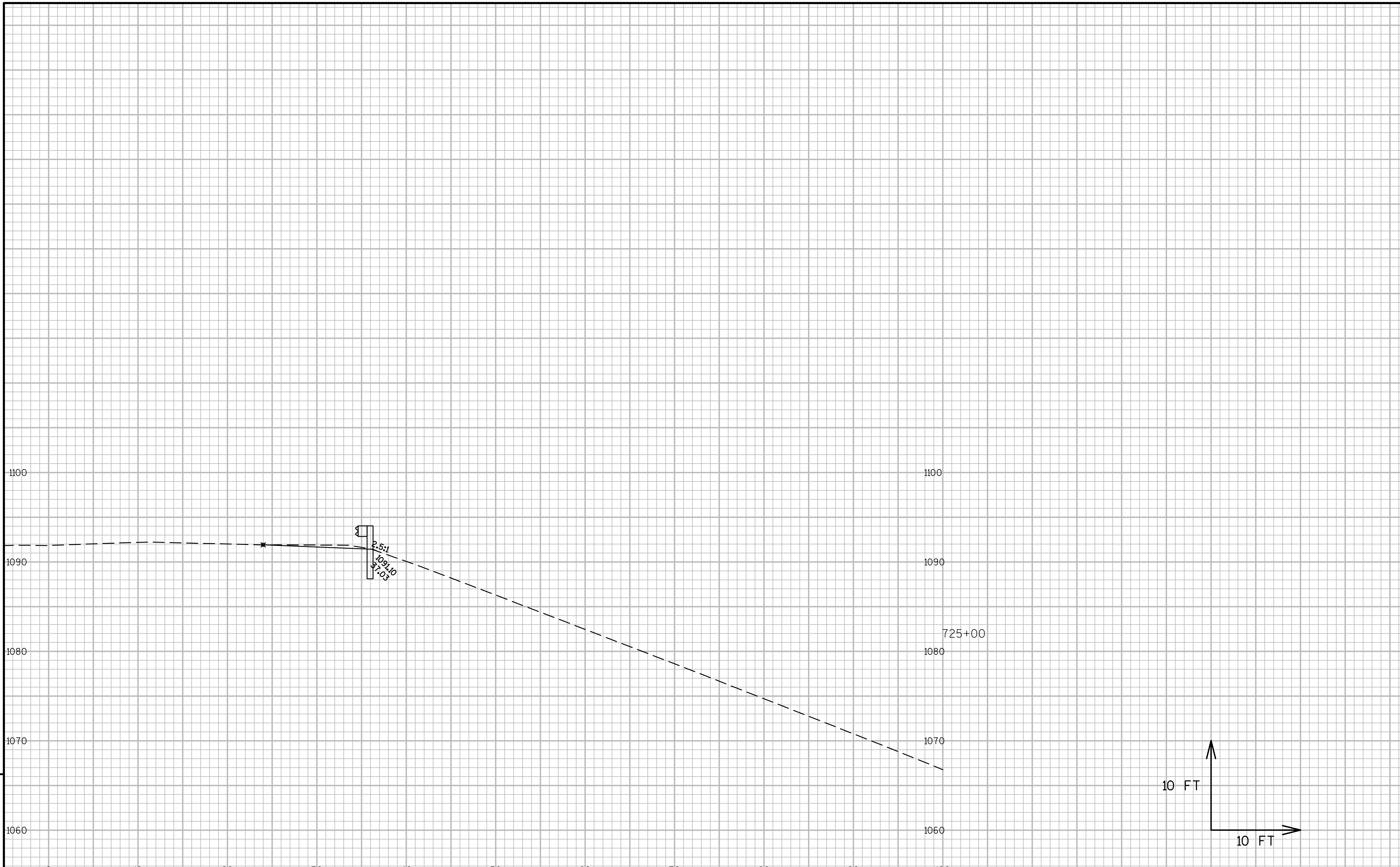
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 224	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (10)

PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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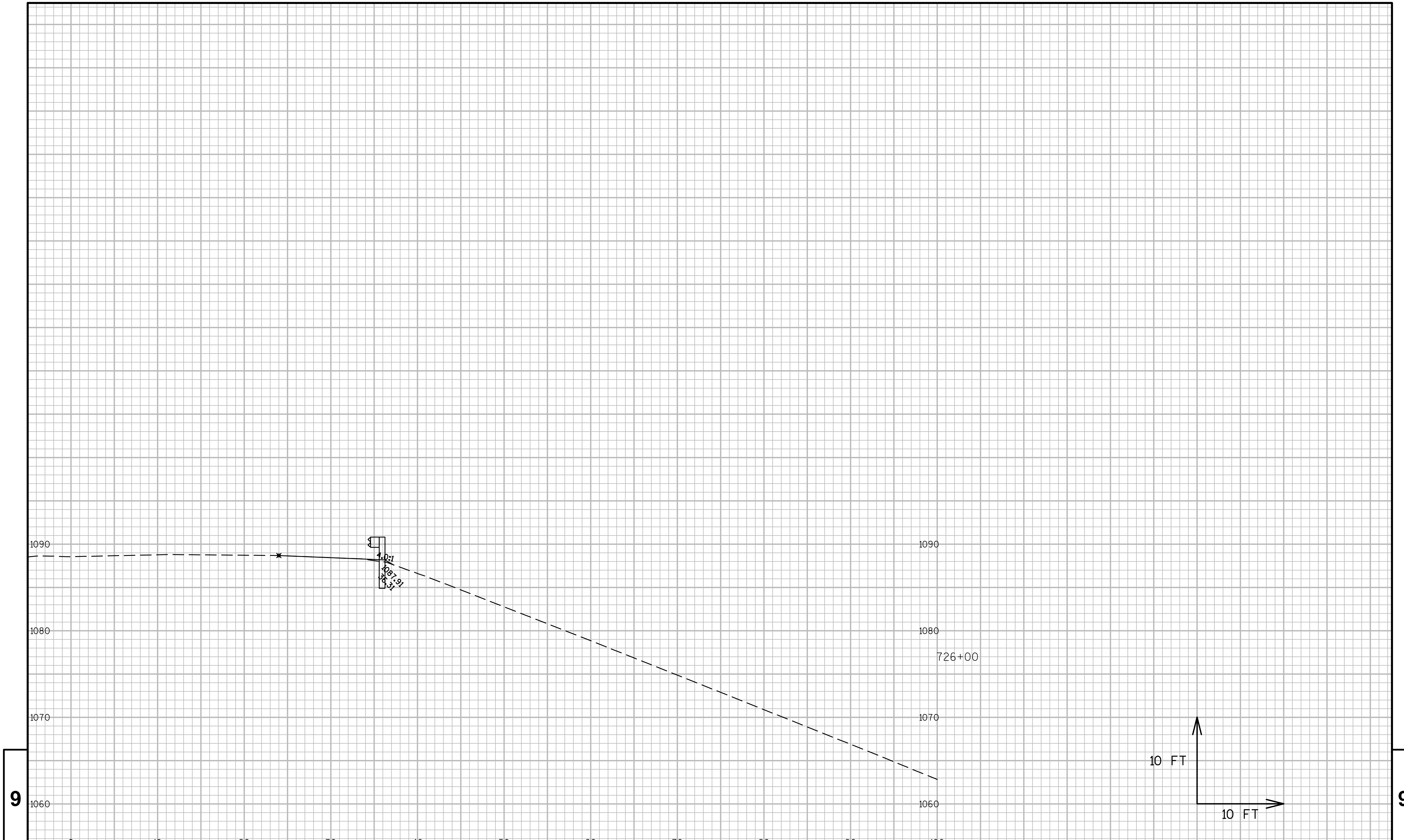
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 225	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (11)

PLOT DATE : 1/28/2016 12:25 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49

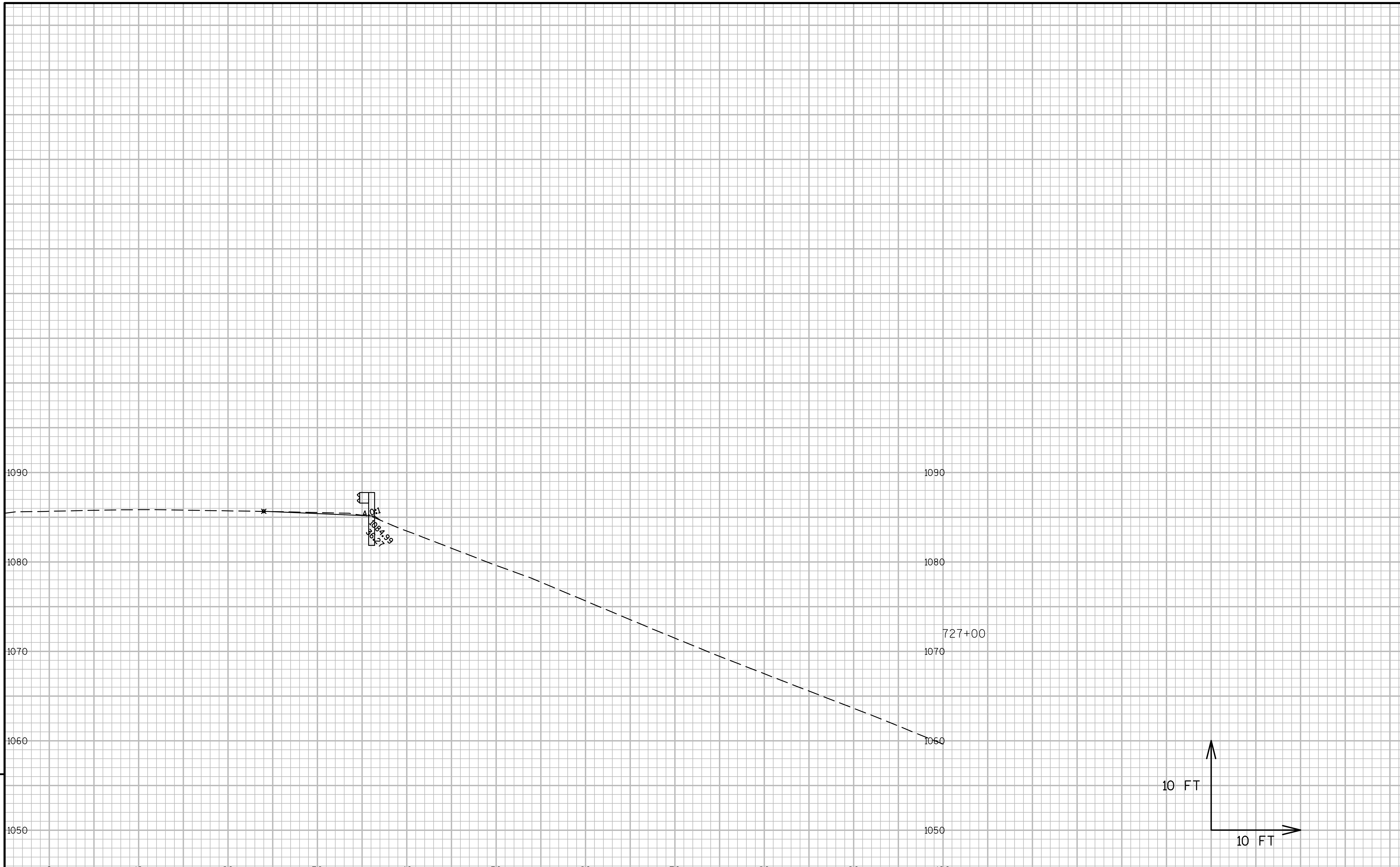


PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 226	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (12)

PLOT DATE : 1/28/2016 12:26 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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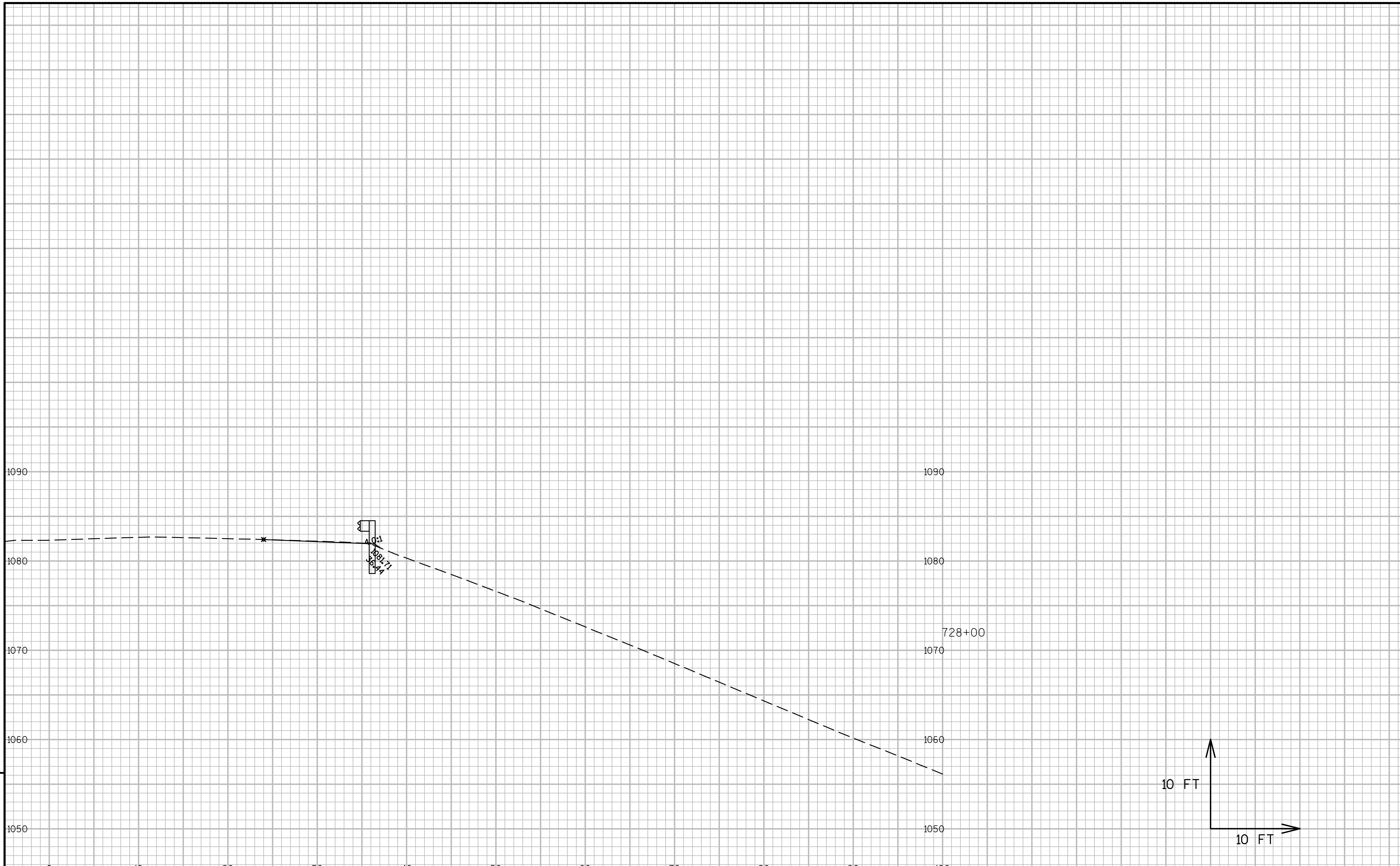
9

PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 227	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (13)

PLOT DATE : 1/28/2016 12:26 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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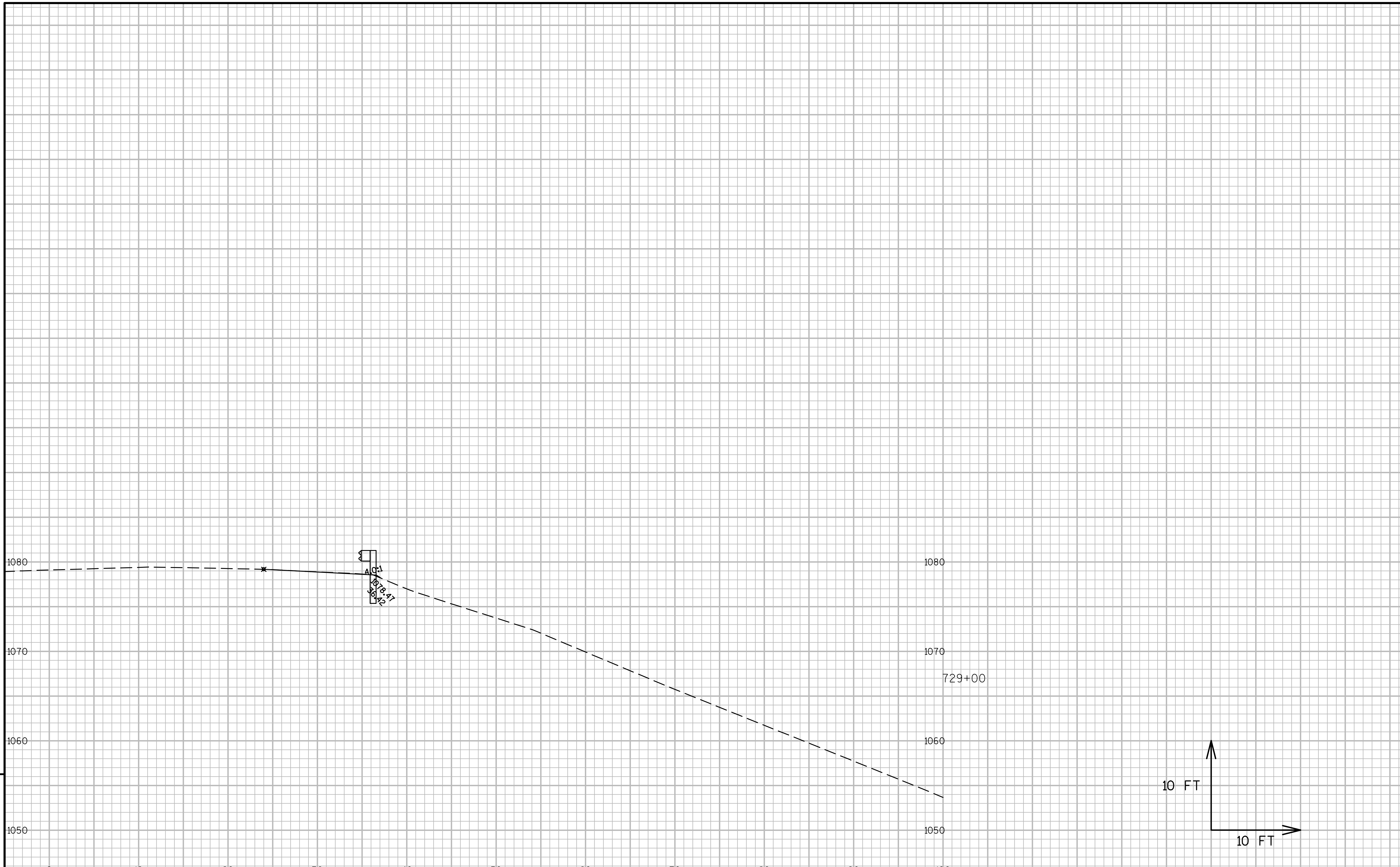
9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 228	E

9



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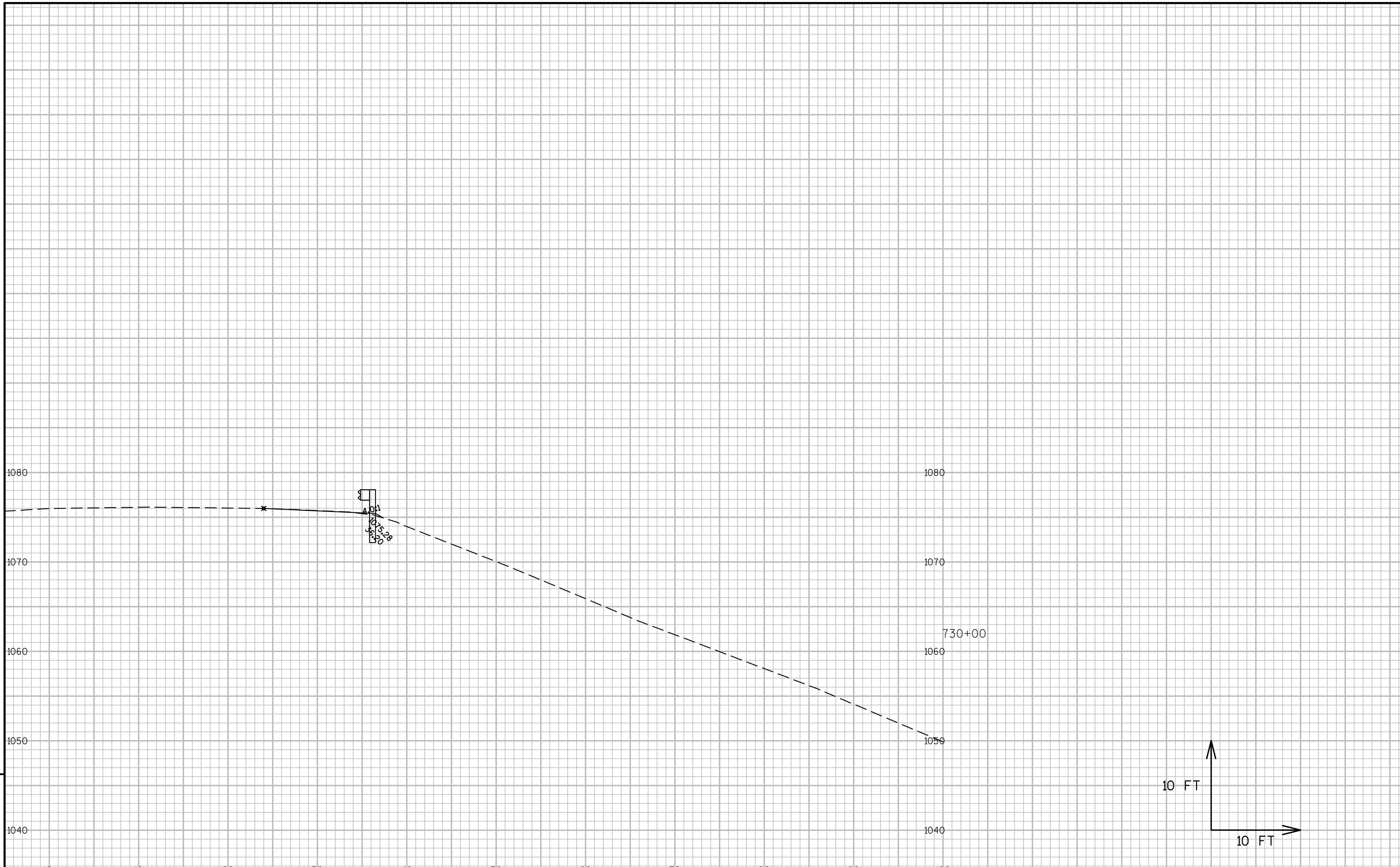
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 229	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (15)
PLOT DATE : 1/28/2016 12:26 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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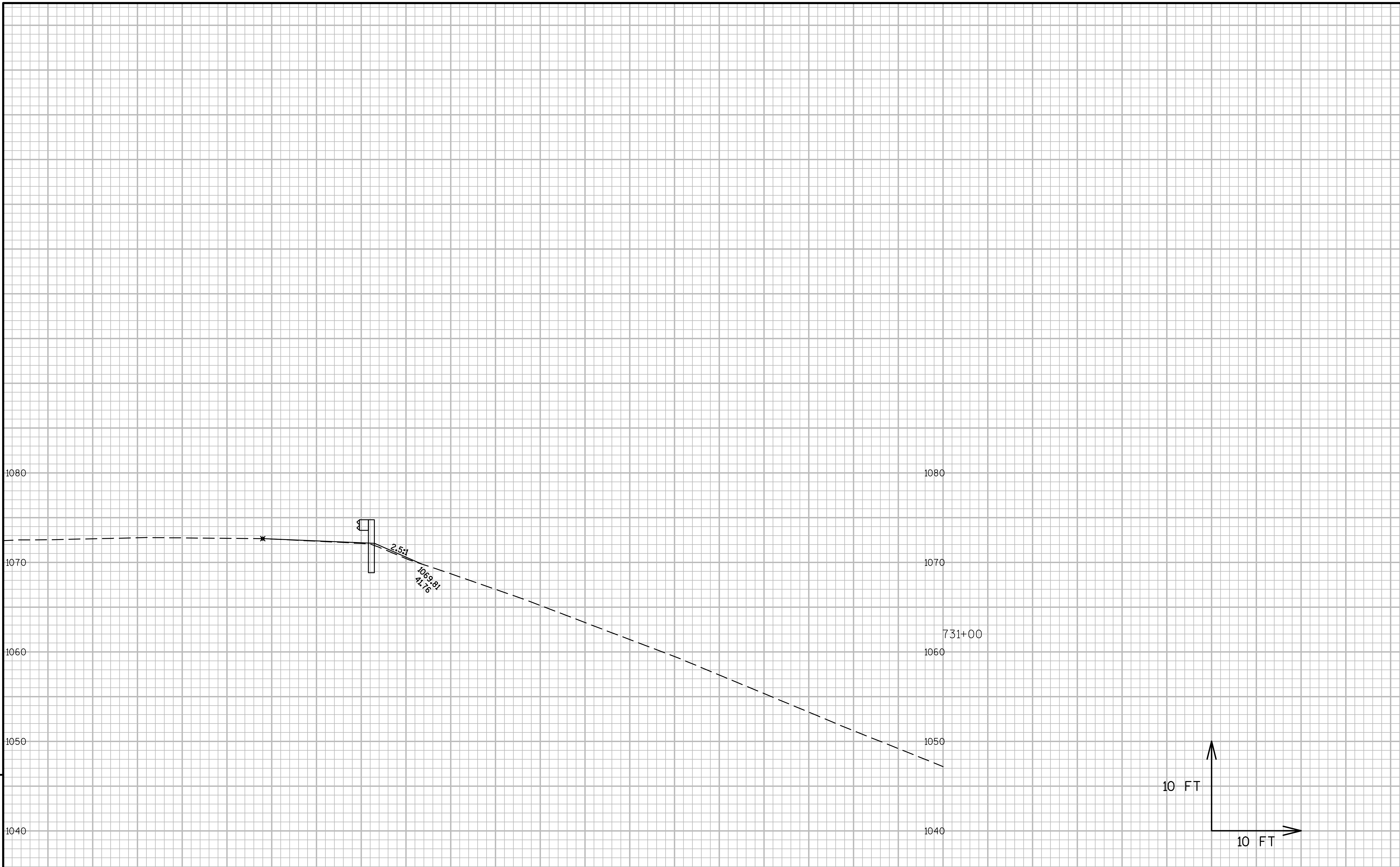
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 230	E



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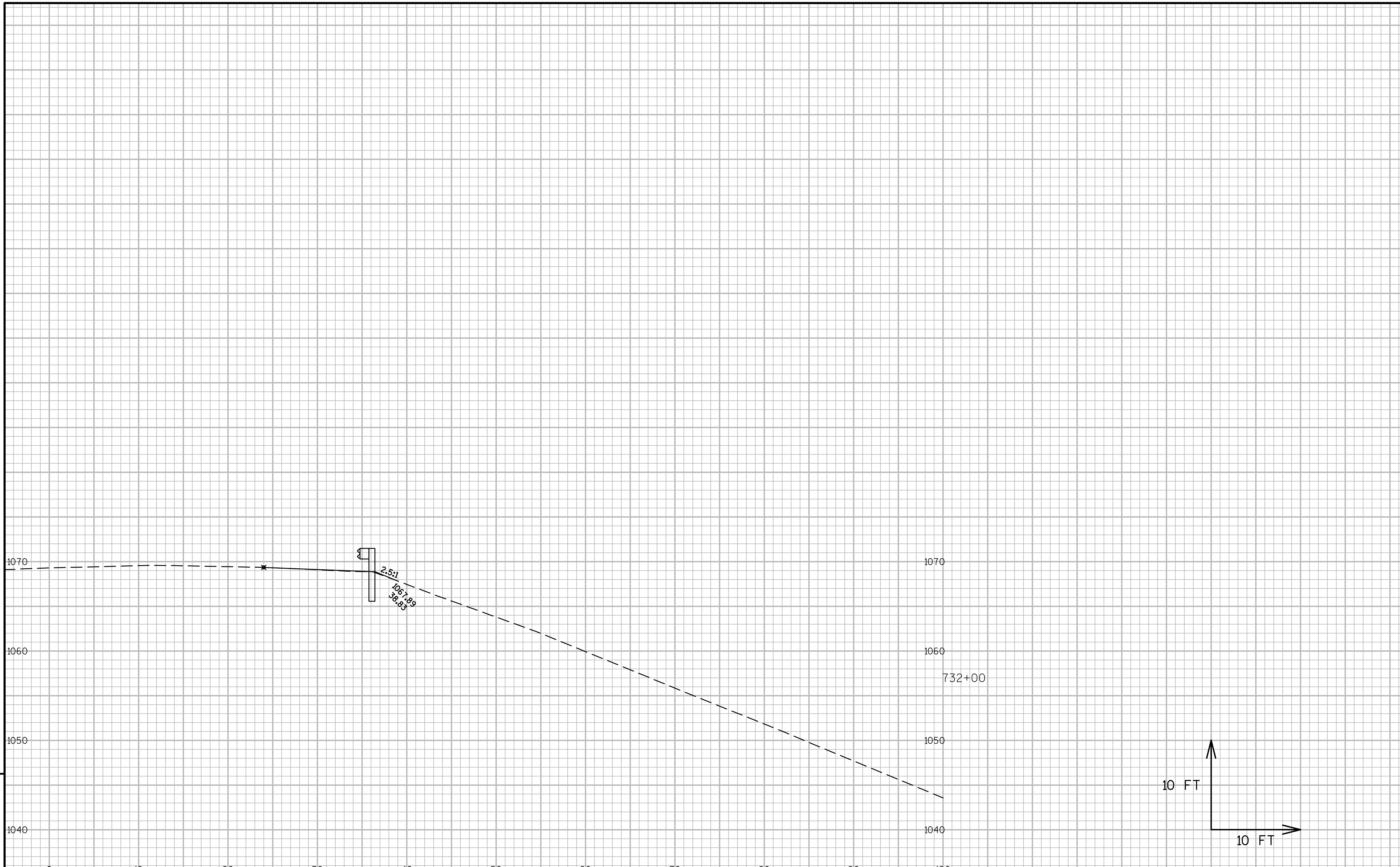
9

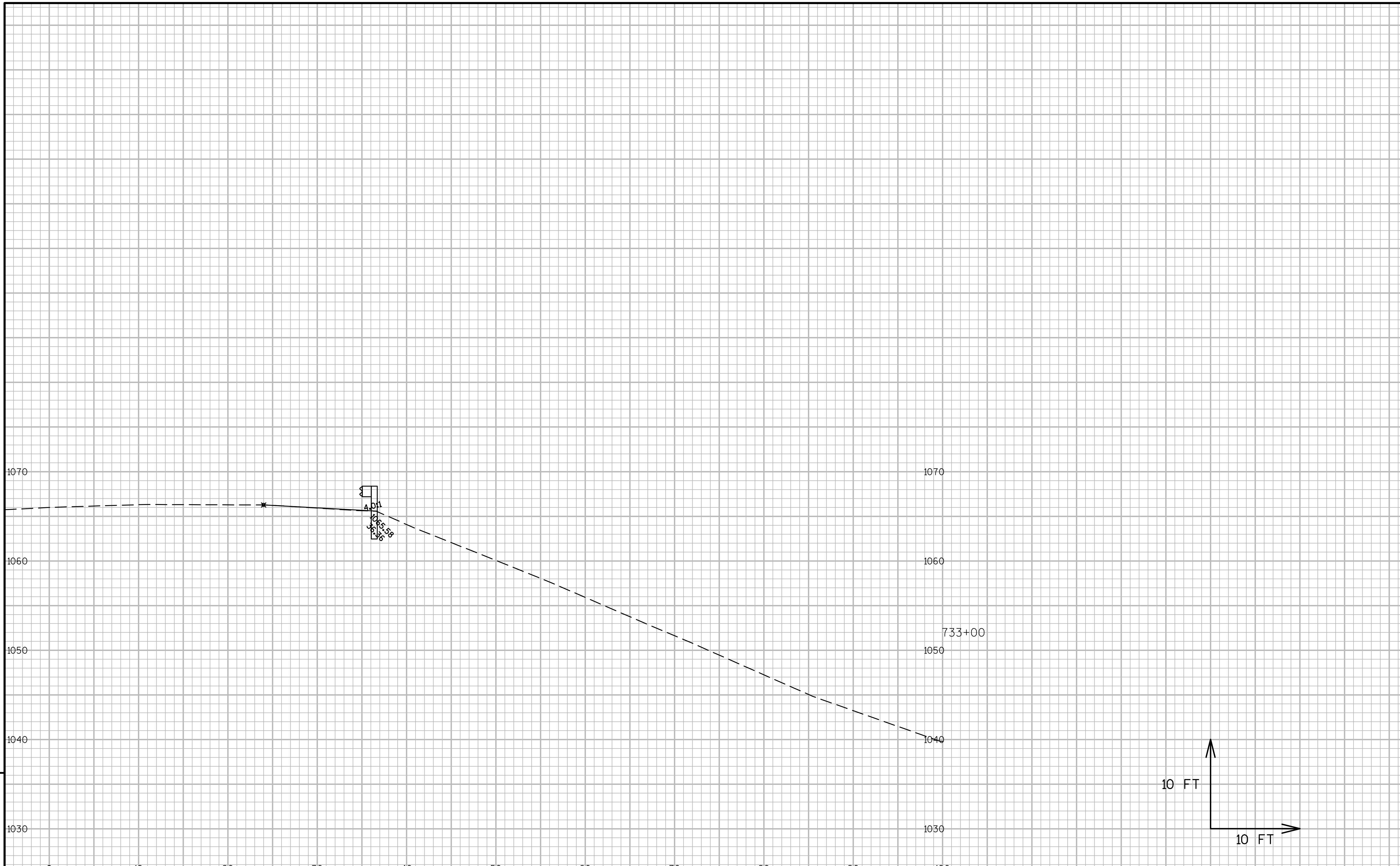
PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 231	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (17)
PLOT DATE : 1/28/2016 12:26 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 49



9 | 9

PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 232	E



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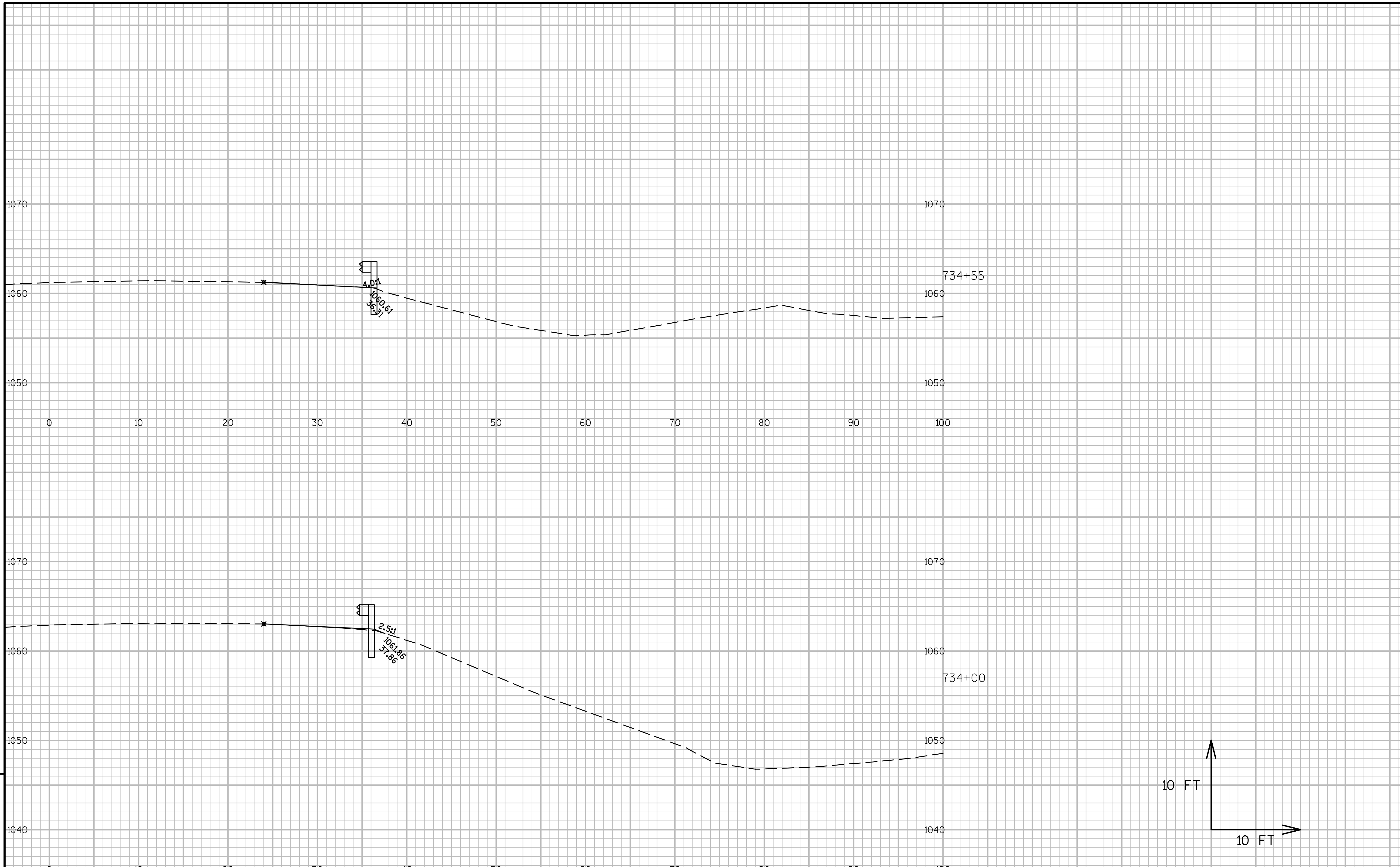
9

PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 233	E



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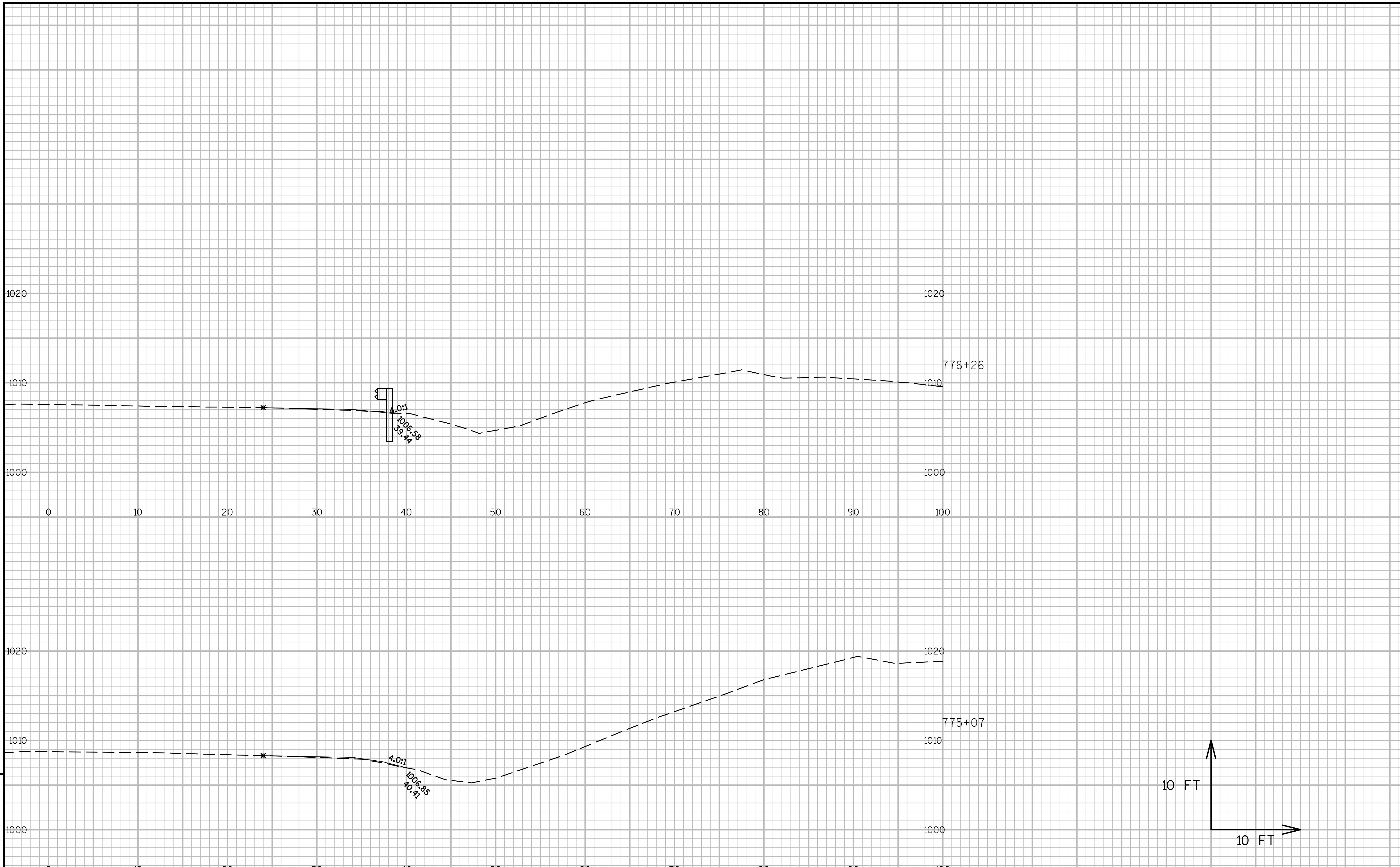
9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 234	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (20)

PLOT DATE : 1/28/2016 12:26 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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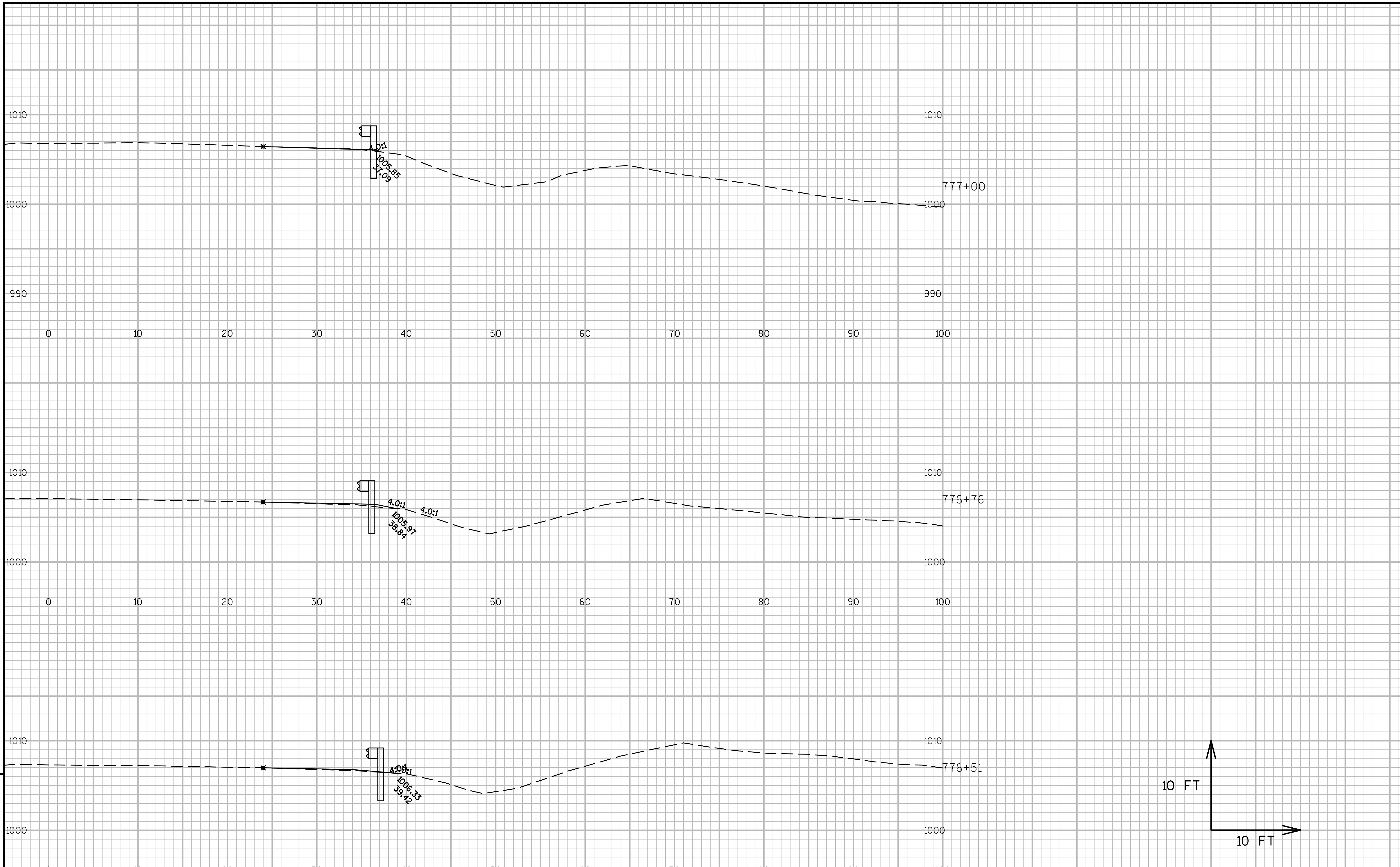
9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 235	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (21)

PLOT DATE : 1/28/2016 12:26 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



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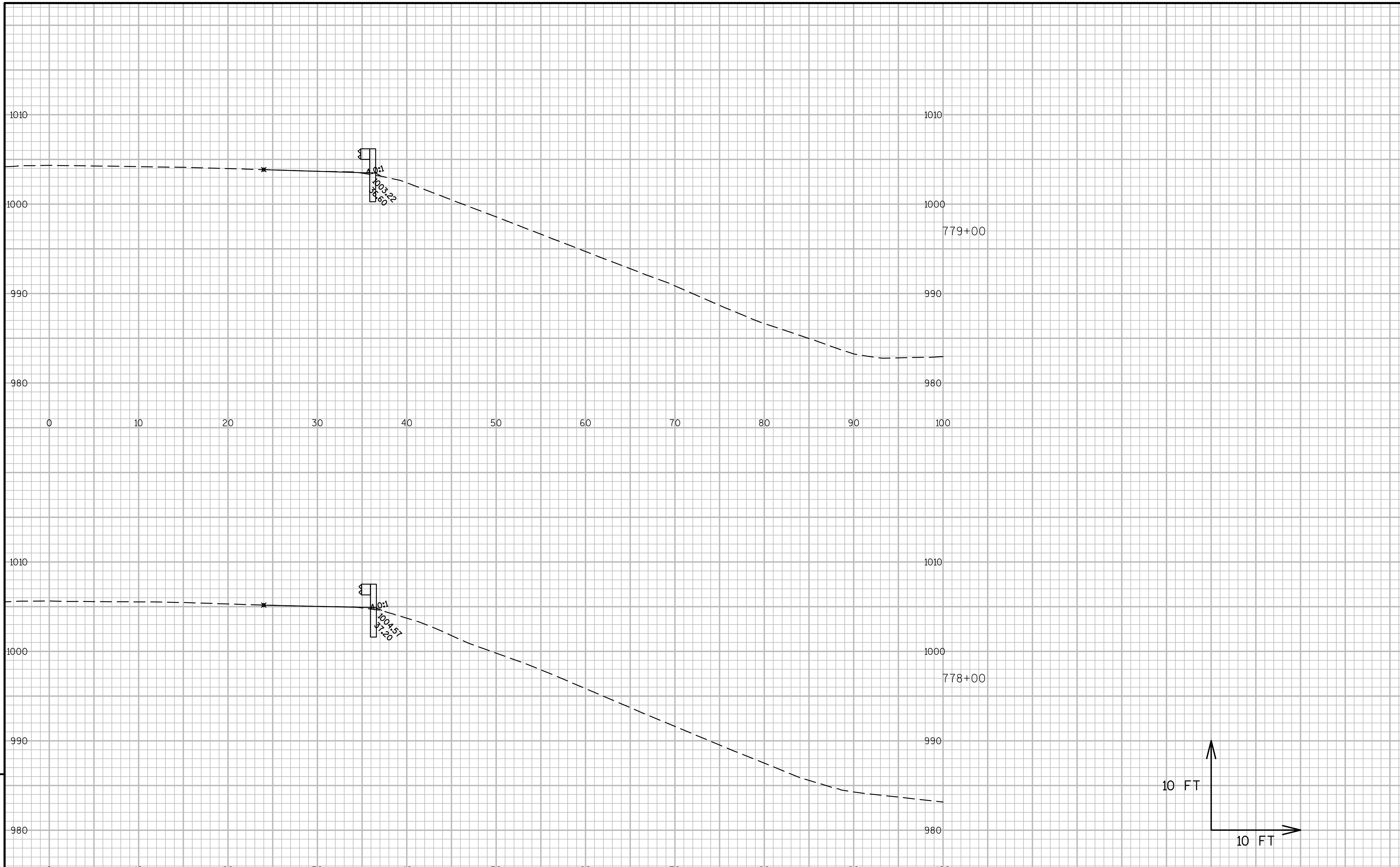
9

PROJECT NO:1023-02-76	HWY:IH 94	COUNTY:JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 236	E



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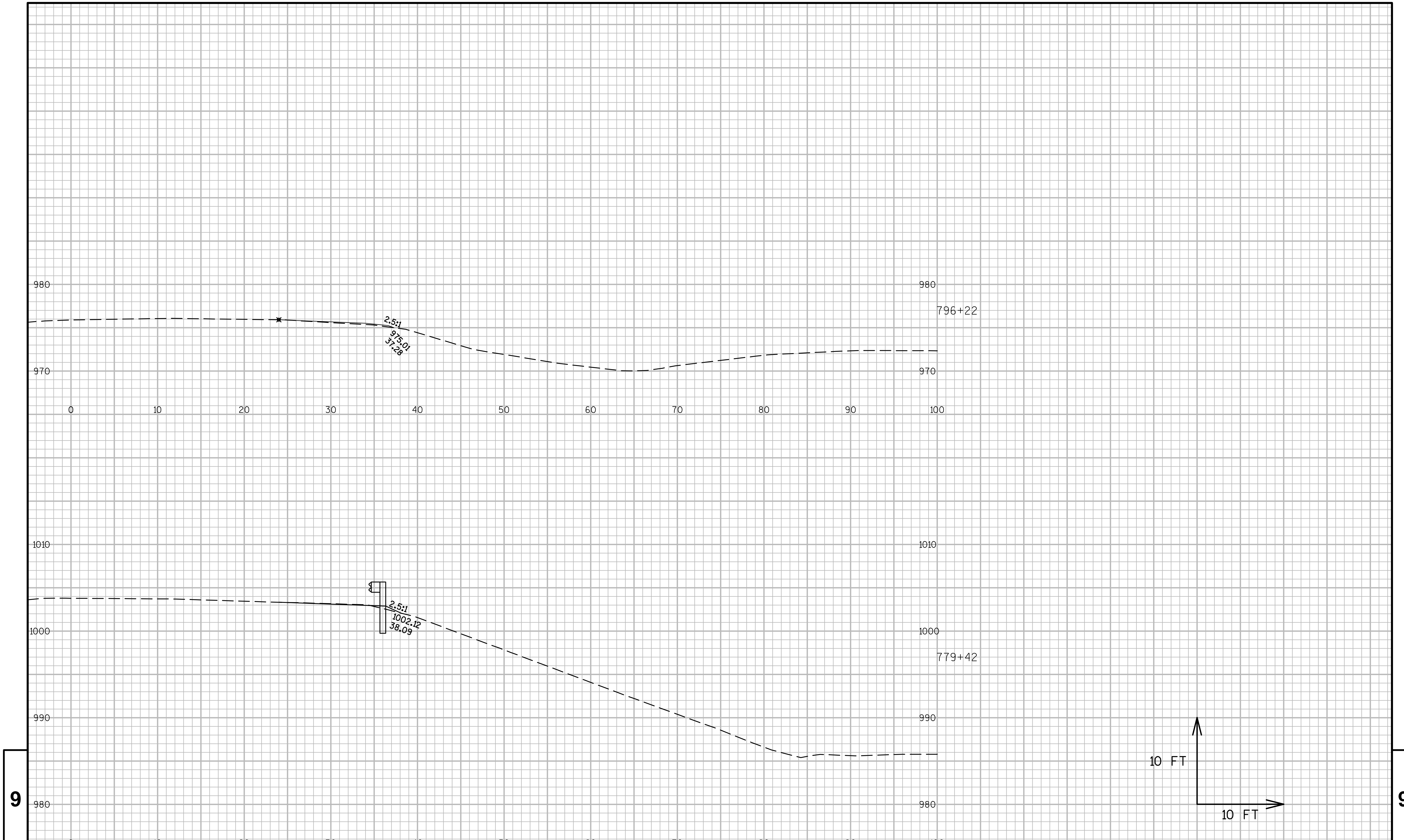
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 237	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (23)

PLOT DATE : 1/28/2016 12:27 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 49



PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 238	E

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (24)
PLOT DATE : 1/28/2016 12:27 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT

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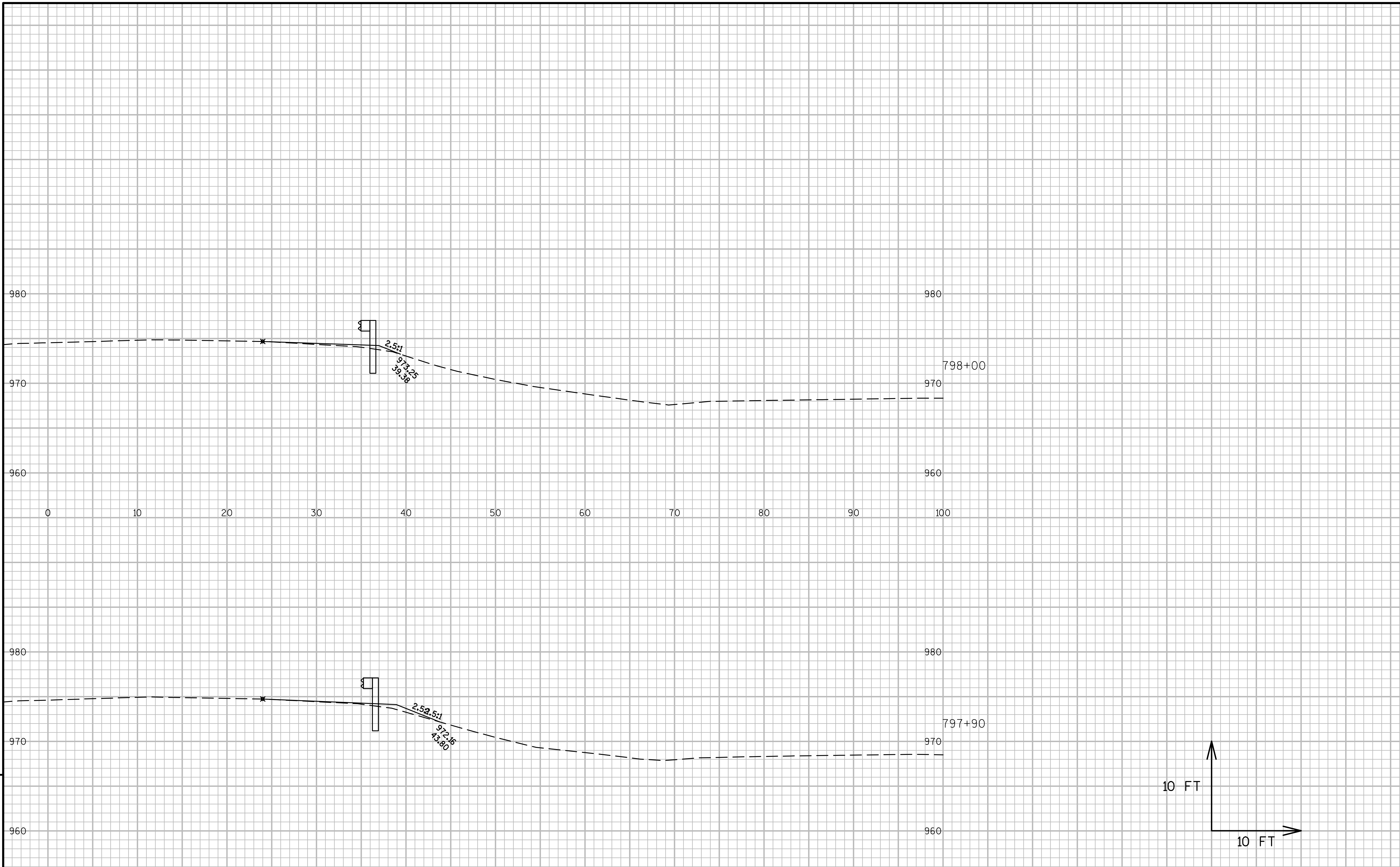
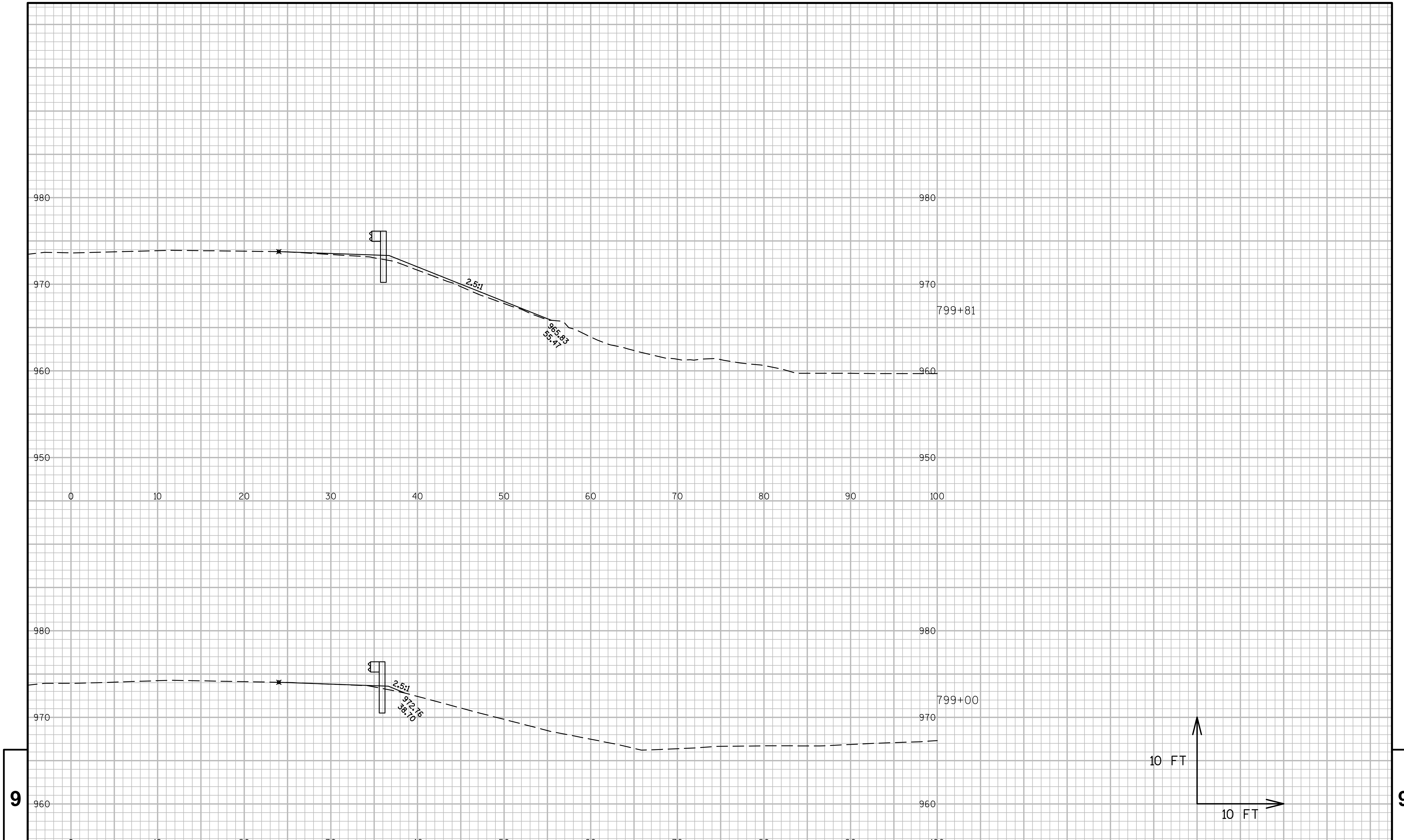
PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 239	E



9	PROJECT NO: 1023-02-76	HWY: IH 94	COUNTY: JACKSON	CROSS SECTIONS: EB BEAM GUARD GRADING	SHEET 240 E	9

FILE NAME : C:\WISDOT\DESIGN\10230206\SHEETSPLAN\090261_XS.DWG
LAYOUT NAME - SECTION SHEET - (26)

PLOT DATE : 1/28/2016 12:27 PM PLOT BY : BECKLIN, MATTHEW R PLOT NAME : PLOT SCALE : 1 IN:10 FT



PROJECT NO:1023-02-76 | HWY:IH 94 | COUNTY:JACKSON | CROSS SECTIONS: EB BEAM GUARD GRADING | SHEET 241 | E

Wisconsin Department of Transportation

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