WKE MARCH 2024

PROJECT ID: 2505-03-71

COUNTY: MILWAUKEE

ORDER OF SHEETS

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

TOTAL SHEETS = 292



12

N

DESIGN DESIGNATION

A.A.D.T.	2020	=	9,000
A.A.D.T.	2044	=	10,150
D.H.V.		=	454
D.D.		=	55/45
T.		=	3.9%
DESIGN SPEED		=	45 MPH
ESALS		=	1,800,000

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 (300'ER')
- EXISTING CULVERT
- PROPOSED CULVERT (Box or Pipe)
- COMBUSTIBLE FLUIDS (CAUTION)
- MARSH AREA
- WOODED OR SHRUB AREA

PROFILE

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

UTILITIES

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

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PLAN OF PROPOSED IMPROVEMENT

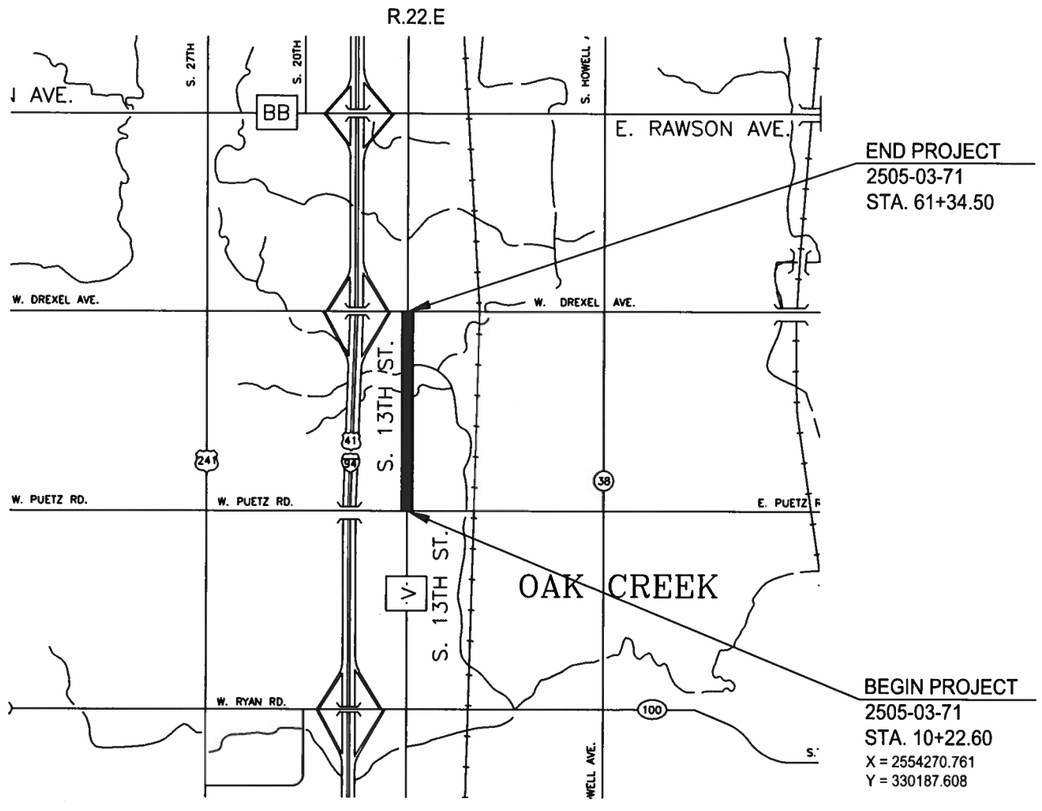
C OAK CREEK S 13TH STREET

W PUETZ ROAD TO W DREXEL AVENUE

CTH V
MILWAUKEE

STATE PROJECT	FEDERAL PROJECT	
	PROJECT	CONTRACT
2505-03-71	WISC 2024280	1

STATE PROJECT NUMBER
2505-03-71



LAYOUT

SCALE 0 1 MI

TOTAL NET LENGTH OF CENTERLINE = 0.93

HORIZONTAL POSITIONS SHOWN ON THIS PLAN ARE WISCONSIN STATE PLANE COORDINATES, SOUTH ZONE, NAD27, IN U.S. SURVEY FEET. VALUES ARE GRID COORDINATES, GRID BEARINGS, AND GRID DISTANCES.

ELEVATIONS SHOWN ON THIS PLAN ARE REFERENCED TO NGVD29.

ORIGINAL PLANS PREPARED BY:

MILWAUKEE COUNTY
DEPARTMENT OF TRANSPORTATION

WISCONSIN
MARC E. HILLIARD
E-37872
MILWAUKEE, WIS.
PROFESSIONAL ENGINEER

PROJECT DESIGNER:
DATE: 10-27-23

RECOMMENDED FOR APPROVAL:
DATE: 10/17/2023
Director of Transportation Engineering

APPROVED:
DATE: 10/18/2023
Director of Milwaukee County Department of Transportation

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PREPARED BY

Surveyor	MCDOT
Designer	MCDOT
Project Manager	MICHAEL BAIRD
Regional Examiner	REGIONAL EXAMINER
Regional Supervisor	REGIONAL SUPERVISOR

APPROVED FOR THE DEPARTMENT
DATE: 10/27/2023
(Signature)

E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST - PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\2505O371_TI.DWG PLOT DATE : 10/17/2023 11:48 AM PLOT BY : HILLIARD, MARC PLOT NAME :

2

GENERAL NOTES

REMOVALS
- DO NOT REMOVE TREES OR SHRUBS WITHOUT THE CONSENT OF THE ENGINEER.
- FILL ALL HOLES OR OPENINGS BELOW SUBGRADE RESULTING FROM ABANDONMENT OR REMOVAL OF EXISTING STRUCTURES WITH GRANULAR BACKFILL. GRANULAR BACKFILL IS INCIDENTAL TO THE PERTINENT REMOVAL ITEM.

EXCAVATION/GRADING
- EBS IS NOT USED TO BALANCE EARTHWORK AND IS NOT SHOWN ON THE CROSS SECTIONS. EBS IS MEASURED AND PAID FOR AS EXCAVATION COMMON. NEED, LOCATION, DEPTH AND BACKFILL MATERIAL FOR EBS WILL BE DETERMINED AND APPROVED BY THE ENGINEER.

UTILITIES
- 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 RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE LOCATION OF EXISTING UTILITIES AND TO NOTIFY DIGGERS HOTLINE AND AFFECTED UTILITIES.

EROSION CONTROL
- EROSION CONTROL ITEMS SHOWN ARE AT SUGGESTED LOCATIONS AND THE EXACT LOCATIONS/DIMENSIONS WILL BE DETERMINED BY THE ENGINEER. MAINTAIN ALL EROSION CONTROL MEASURES UNTIL SUCH TIME THE ENGINEER DETERMINES THE MEASURE IS NO LONGER NECESSARY.
- TOPSOIL, SEED, FERTILIZE AND WATER OR SOD AND WATER DISTURBED AREAS WITHIN THE RIGHT OF WAY, EXCEPT THE AREAS WITHIN THE FINISHED SHOULDER POINTS AS DIRECTED BY THE ENGINEER.
- TOPSOIL SHOULD BE FREE OF DEBRIS SUCH AS LARGE ROOTS, STICKS, WEEDS, BRUSH, STONES, LITTER AND WASTE PRODUCTS IN ACCORDANCE WITH THE STANDARD SPECIFICATION. REMOVE ANY DEBRIS AND BREAKDOWN ALL CLODS AND LUMPS THAT WILL HINDER PLANT GROWTH OR ROOT ESTABLISHMENT. ENGINEER HAS THE AUTHORITY TO REJECT TOPSOIL NOT CONFORMING TO THE STANDARD SPECIFICATION.
- DO NOT APPLY FERTILIZER TO SATURATED SOILS, WETLANDS, SURFACE WATERS, FROZEN GROUND, OR IMPERVIOUS SURFACES.
- DO NOT APPLY FERTILIZER WITHIN 20 FEET OF A WATER BODY OR WETLAND OR WHEN A RUNOFF EVENT IS EXPECTED WITHIN 24 HOURS.

STORM SEWER/DRAINAGE
- COST OF CONNECTING STORM SEWER, DRAINTILE, UNDERDRAIN OR CULVERT PIPE TO EXISTING STRUCTURES OR EXISTING PIPES IS INCIDENTAL TO THE COST OF THE PIPE.
- EXISTING ELEVATIONS OF STORM SEWER CONNECTIONS SHOWN ON THE PLANS ARE APPROXIMATE. FIELD ADJUSTMENTS MAY BE NECESSARY.
- UNCOVER AND CHECK ELEVATIONS OF EXISTING UTILITIES WHERE THEY CROSS PROPOSED STORM SEWER/CULVERT PIPES. ADJUSTMENT OF UTILITY OR REVISION OF SEWER/CULVERT ELEVATION MAY BE REQUIRED TO RESOLVE CONFLICT. THE COST OF UNCOVERING AND CHECKING UTILITIES IS NOT INCIDENTAL TO THE COST OF THE PIPE AND WILL BE PAID FOR UNDER THE “UTILITY LINE OPENING (ULO)” BID ITEM.

SIGNING/MARKING
- DO NOT REMOVE SIGNS WITHOUT THE CONSENT OF THE ENGINEER.
- SALVAGE ALL REMOVED SIGNS AND PLACE AT A SITE SPECIFIED BY THE ENGINEER TO BE PICKED UP BY MILWAUKEE COUNTY.
- ALL NEW PERMANENT SIGNS SHALL BE MADE OF ALUMINUM MATERIAL UNLESS OTHERWISE DIRECTED BY THE ENGINEER.

MISCELLANEOUS
- ADJUST TRAFFIC CONTROL DEVICES TO FIT FIELD CONDITIONS AS DIRECTED BY THE ENGINEER.
- CURB AND GUTTER JOINT SPACING SHALL BE 20 FEET UNLESS AUTHORIZED BY THE ENGINEER.
- CONSTRUCT TRANSVERSE JOINTS IN THE CONCRETE SIDEWALK AT INTERVALS EQUAL TO THE WIDTH OF THE SIDEWALK UNLESS OTHERWISE DIRECTED BY THE ENGINEER.
- MAINTAIN ACCESS TO ALL ADJACENT PROPERTIES WITHIN THE PROJECT LIMITS AT ALL TIMES.
- ALL RADII SHOWN ON THE PLAN, WHERE CURB & GUTTER IS SHOWN, ARE MEASURED TO THE FLANGE UNLESS OTHERWISE NOTED.
- STAMP ALL ENDS OF MONOLITHIC CONCRETE SURFACES WITH A STAMP BEARING CONTRACTOR’S NAME AND YEAR OF CONSTRUCTION. ALL LETTERING SHALL BE 2-INCH. THE COST OF THIS WORK IS INCIDENTAL TO THE ASSOCIATED CONCRETE ITEM.
- PLACE ½-INCH THICK EXPANSION FILLER IN THE CURB & GUTTER AT BOTH ENDS OF EACH REMOVAL & REPLACEMENT SECTION. COST IS INCIDENTAL TO THE CURB & GUTTER ITEM.
- DETAILS OF CONSTRUCTION NOT SHOWN IN THE PLANS SHALL CONFORM TO THE PERTINENT STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.
- RESTORE EXISTING DRIVEWAYS IN-KIND BEHIND THE CONCRETE SIDEWALK. EXACT LOCATION AND WIDTH WILL BE DETERMINED BY THE ENGINEER DURING CONSTRUCTION.
- CONTACT THE ENGINEER AND THE SOUTHEASTERN REGIONAL PLANNING COMMISSION (SEWRPC) AT LEAST TWO WEEKS PRIOR TO WORK NEAR ANY PUBLIC SURVEY MONUMENT.

LIST OF STANDARD ABBREVIATIONS

ABUT	ABUTMENT
AEW	APRON ENDWALL
AGG	AGGREGATE
AH	AHEAD
ASPH	ASPHALT OR ASPHALTIC
BAD	BASE AGGREGATE DENSE
BK	BACK
BM	BENCHMARK
CABC	CRUSHED AGGREGATE BASE COURSE
CB	CATCH BASIN
C.E.	COMMERCIAL ENTRANCE
CL or C/L	CENTER LINE
CONC	CONCRETE
CTH	COUNTY TRUNK HIGHWAY
C&G	CURB AND GUTTER
DWY	DRIVEWAY
EL or ELEV	ELEVATION
EBS	EXCAVATION BELOW SUBGRADE
HMA	HOT MIX ASPHALT
INL	INLET
INV	INVERT
LT	LEFT
MH	MANHOLE
MIS	METROPOLITAN INTERCEPTOR SEWER
PAVT	PAVEMENT
P.E.	PRIVATE ENTRANCE
PLE	PERMANENT LIMITED EASEMENT
PT	POINT OF TANGENT
PCC	POINT OF COMPOUND CURVATURE
RL or R/L	REFERENCE LINE
R	RADIUS
REQD	REQUIRED
RT	RIGHT
R/W	RIGHT-OF-WAY
SE	SUPERELEVATION
SEC	SECTION
SDD	STANDARD DETAIL DRAWING
STH	STATE TRUNK HIGHWAY
STA	STATION
SSPRC	STORM SEWER PIPE REINFORCED CONCRETE
S/W	SIDEWALK
TLE	TEMPORARY LIMITED EASEMENT
VERT	VERTICAL
VC	VERTICAL CURVE
VCL	VERTICAL CURVE LENGTH
VPC	VERTICAL POINT OF CURVATURE
VPI	VERTICAL POINT OF INTERSECTION
VPT	VERTICAL POINT OF TANGENCY

2

UTILITIES

AT&T
2005 Pewaukee Road
Waukesha, WI 53188
ATTN: Mr. Nate Gibert
Phone: (262) 720-8235

Charter Communications
1320 N. Martin Luther King Dr.
Milwaukee, WI 53212
ATTN: Mr. Beau Abuya
Phone: (414) 758-9241

CITY OF OAK CREEK
Water & Sewer Utility
170 W. Drexel Avenue
Oak Creek, WI 53154
ATTN: Brian Johnston
Phone: (414) 570-8200, ext. 24

We Energies Gas and Electric
333 W. Everett St. A-299
Milwaukee, WI 53203
ATTN: Mr. Dan Sande
Phone: (414) 221-4578

Everstream
324 E. Wisconsin Ave, Suite 730
Milwaukee, WI 53202
ATTN: Shad Garcia
Phone: (414) 409-1708

AGENCIES

CITY OF OAK CREEK
City Engineer
8040 S. 6th Street
Oak Creek, WI 53154
ATTN: Mr. Matt Sullivan
Phone: (414) 766-7000

Southeastern Regional Planning
Commission (SEWRPC)
W239 N1812 Rockwood Dr.
P.O. Box 1607
Waukesha, WI 53187-1607
ATTN: Mr. Andy Traeger
Phone: (262) 953-4296
ATTN: Mr. Rob Merry
Phone: (262) 953-4289

STATE AGENCIES

Wisconsin Department of Natural
Resources (WDNR)
1027 W. St. Paul Ave
Milwaukee, WI 53233
ATTN: Ryan Pappas
(715) 492-0200

MILWAUKEE COUNTY

Milwaukee County Transit System (MCTS)
Transportation Coordinator (Detours)
1942 N. 17th St.
Milwaukee, WI 53205
ATTN: Mr. Armond Sensabaugh
Phone: (414) 343-1728

Milwaukee County Transit System (MCTS)
Transportation Manager (Bus Stops)
1942 N. 17th St.
Milwaukee, WI 53205
ATTN: Mr. David Locher
Phone: (414) 343-1727

Milwaukee County DOT
Highway Maintenance Division
10190 W. Watertown Plank Rd.
Wauwatosa, WI 53226
ATTN: Mr. Eduardo Santiago
Phone: (414) 257-6569

Milwaukee County DOT
Transportation Services Division
10930 W. Lapham Street
West Allis, WI 53214
ATTN: Ms. Andrea Weddle-Henning
Phone: (414) 257-5934

Milwaukee County DOT
Transportation Services Division
10930 W. Lapham Street
West Allis, WI 53214
ATTN: Mr. Marc Hilliard
Phone: (414) 257-5919

Milwaukee County DOT
Traffic Engineering
10930 W. Lapham Street
West Allis, WI 53214
ATTN: Mr. Daniel Murphy
Phone: (414) 257-5942

SHEET INDEX

GENERAL NOTES
PROJECT OVERVIEW
TYPICAL SECTIONS
CONSTRUCTION DETAILS
PLAN DETAILS
PAVING GRADES
EROSION CONTROL
STORM SEWER
SIGNING & PAVEMENT MARKING
TRAFFIC SIGNALS
TRAFFIC CONTROL
ALIGNMENT DIAGRAM
MISCELLANEOUS QUANTITIES
PLAT
PLAN & PROFILES
STANDARD DETAILS
SIGN PLATES
EARTHWORK DATA
CROSS SECTIONS

2

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

2

W. PUETZ ROAD

BP: 5+00.00

PI: 10+00.00

FAITH BAPTIST CHURCH

WEST MIDDLE SCHOOL

OAK CREEK
COMMUNITY CHURCH

WORK BY OTHERS
(HAWK SIGNAL PROJECT
I.D. 2987-09-70)

S. 13TH STREET (CTH V)

BEGIN PROJECT
2505-03-71
STA. 10+22.60

S. 13TH STREET (CTH V)

PILGRIM PKWY

MATCH LINE 35+00

2

W. PUETZ ROAD

CITY OF OAK CREEK

MATCH LINE 35+00

S. WYNONA DR

PI: 36+63.83

S. WILLOW DR

CITY OF OAK CREEK

END PROJECT
2505-03-71
STA. 61+34.50

W. DREXEL AVENUE

EP: 63+28.87

S. 13TH STREET (CTH V)

S. 13TH STREET (CTH V)

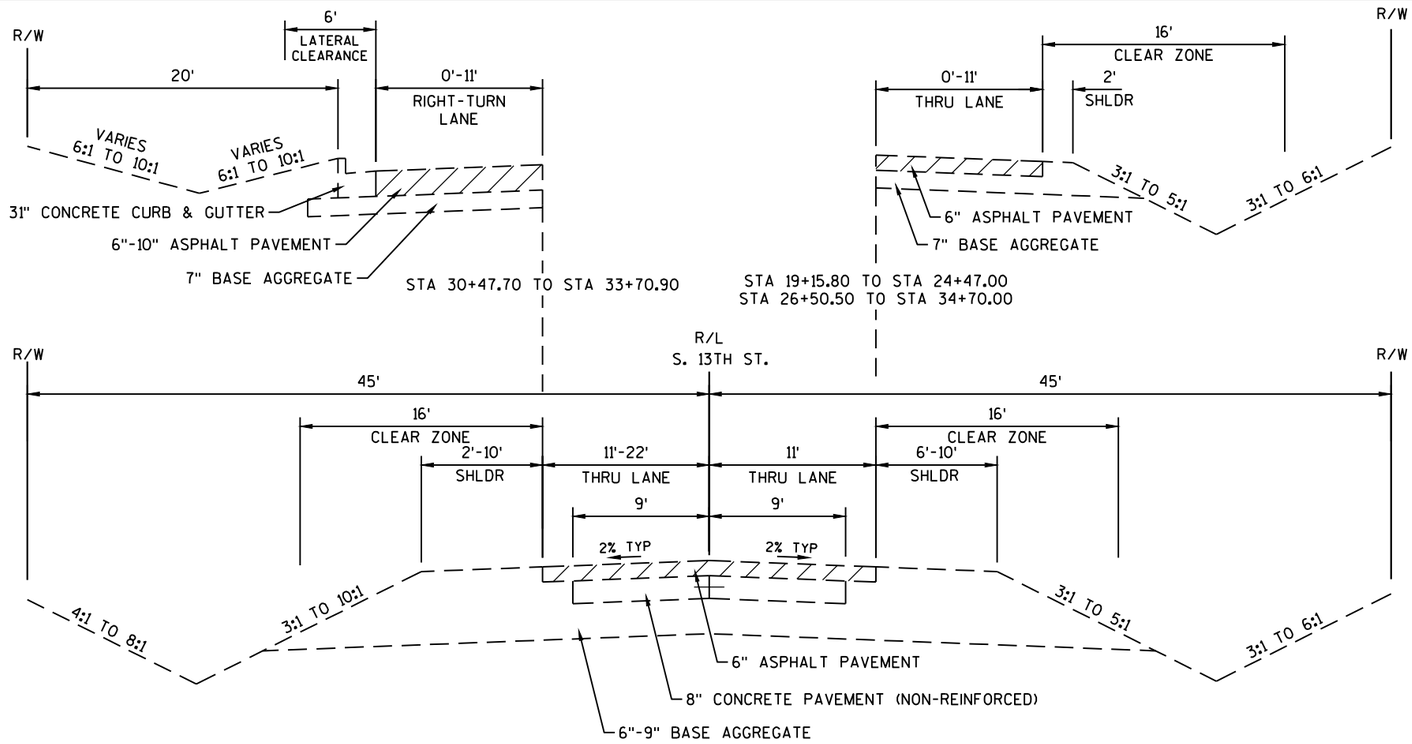
W. WILDING DR

W. WILLOW DR

W. DREXEL AVENUE

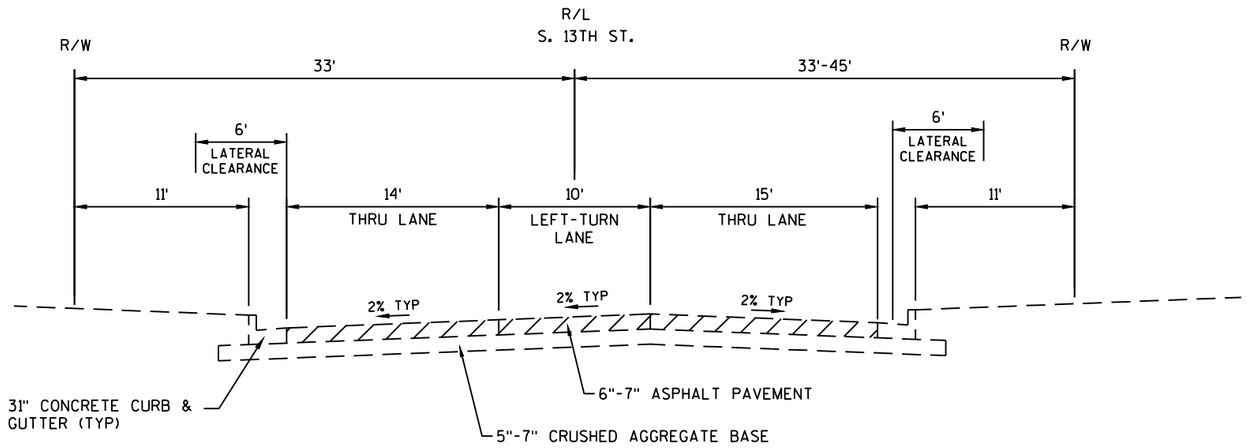
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PROJECT OVERVIEW- S. 13TH STREET	SHEET 4	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PO.DWG
LAYOUT NAME - po
PLOT DATE : 1/9/2024 12:16 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : ##########
WISDOT/CADDS SHEET 42



TYPICAL EXISTING SECTION

STA 12+84.20 TO STA 55+47.00

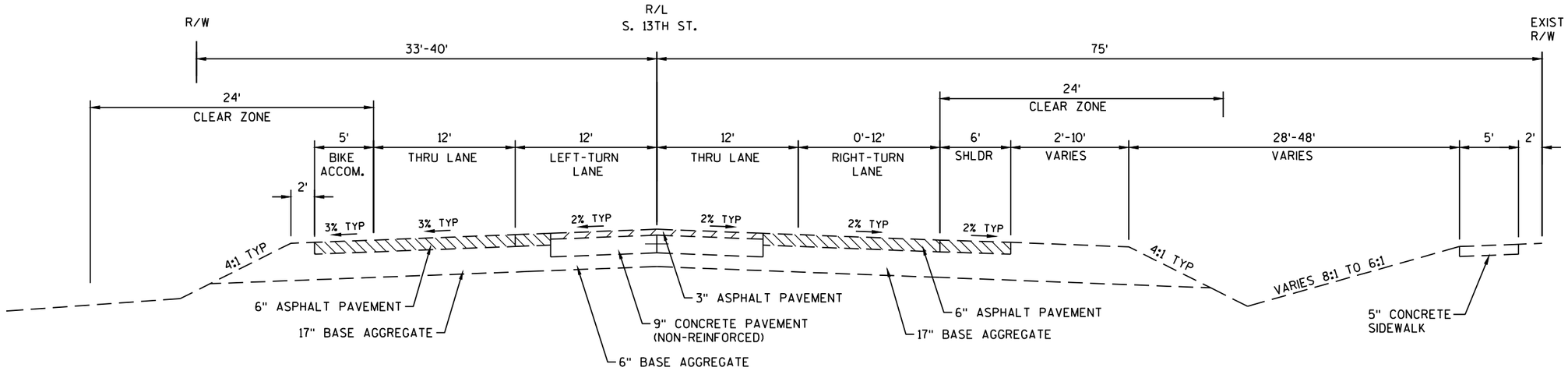


TYPICAL EXISTING SECTION

STA 10+22.60 TO STA 12+84.20

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TYPICAL SECTIONS- S. 13TH STREET	SHEET 5	E

2

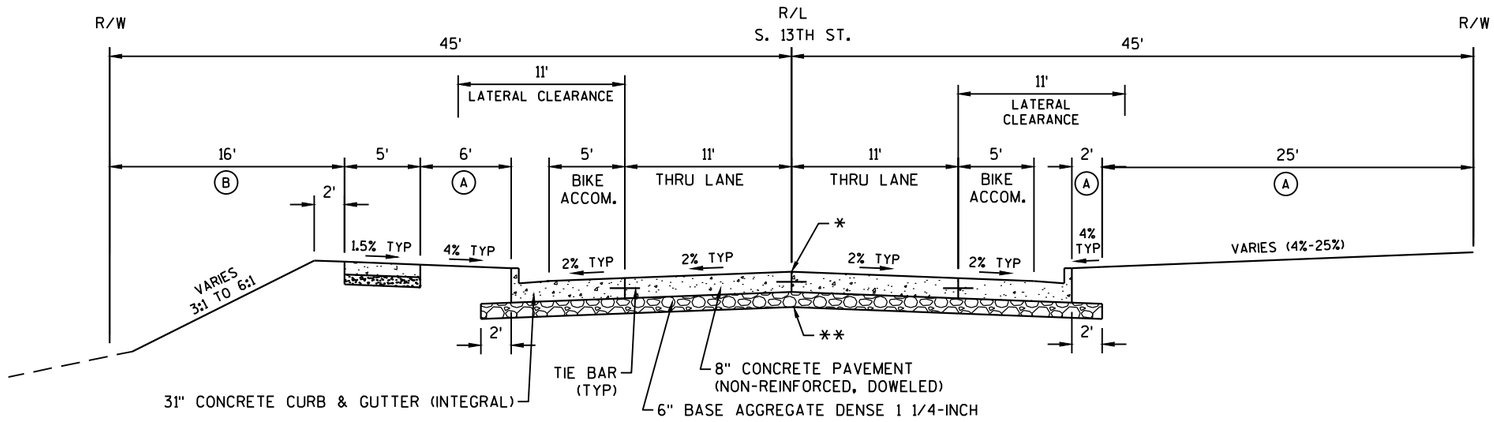


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STA 55+47.00 TO STA 61+34.50

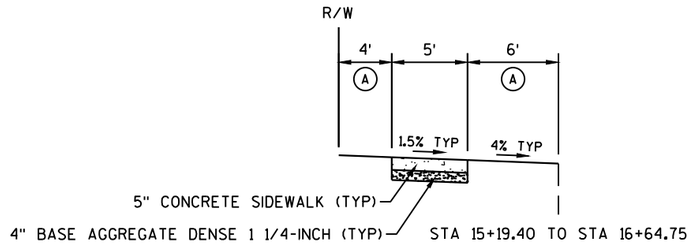
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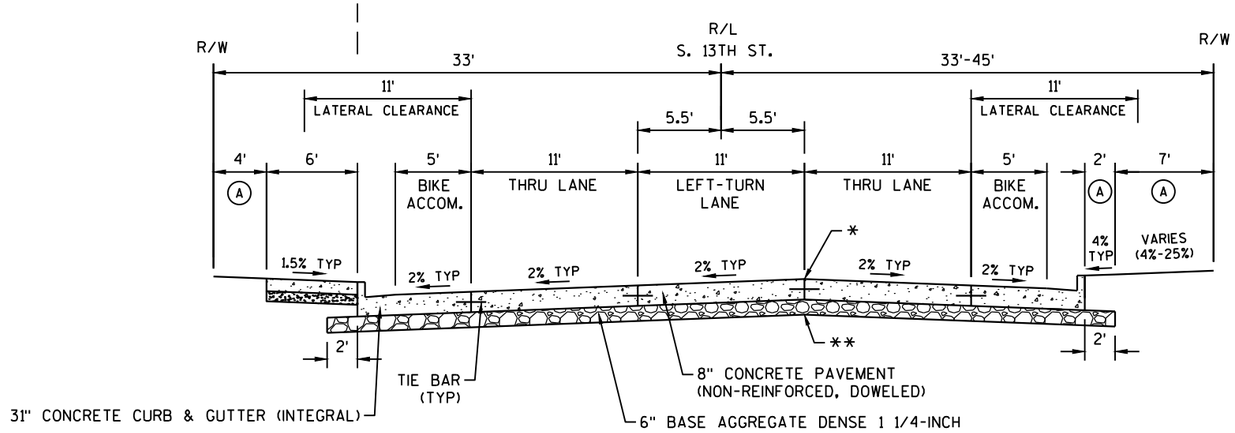
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LAYOUT NAME - 02
PLOT DATE : 9/22/2023 8:11 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:10 FT



TYPICAL FINISHED SECTION

STA 16+64.75 TO STA 17+11.50





TYPICAL FINISHED SECTION

STA 10+22.60 TO STA 16+64.75

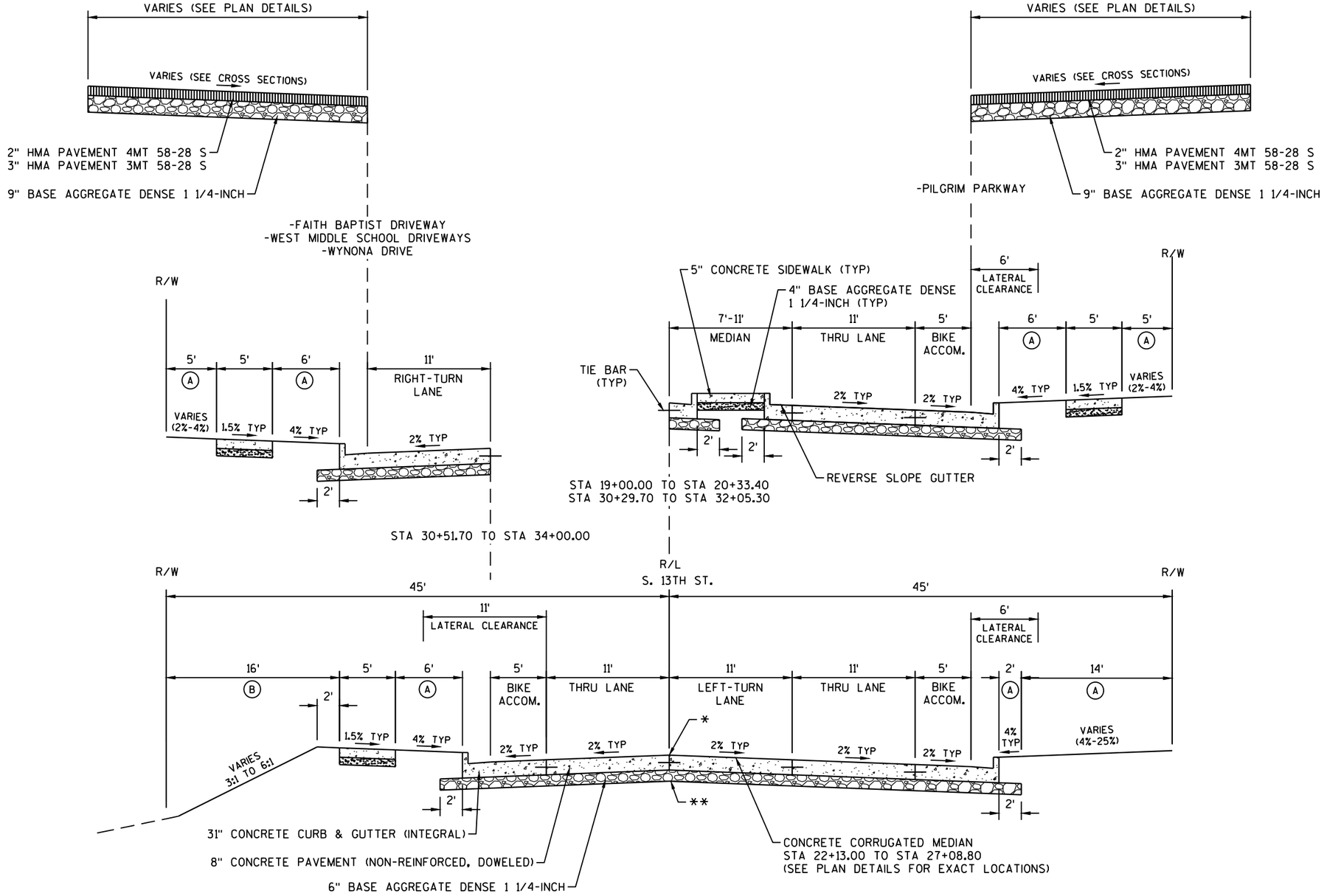
(A) 6" TOPSOIL, SOD

(B) 6" TOPSOIL, SEED, FERTILIZER, EROSION MAT

* POINT REFERRED TO ON PROFILE

** POINT REFERRED TO ON CROSS SECTIONS

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TYPICAL SECTIONS- S. 13TH STREET	SHEET 7	E



TYPICAL FINISHED SECTION

STA 17+11.50 TO STA 36+75.00

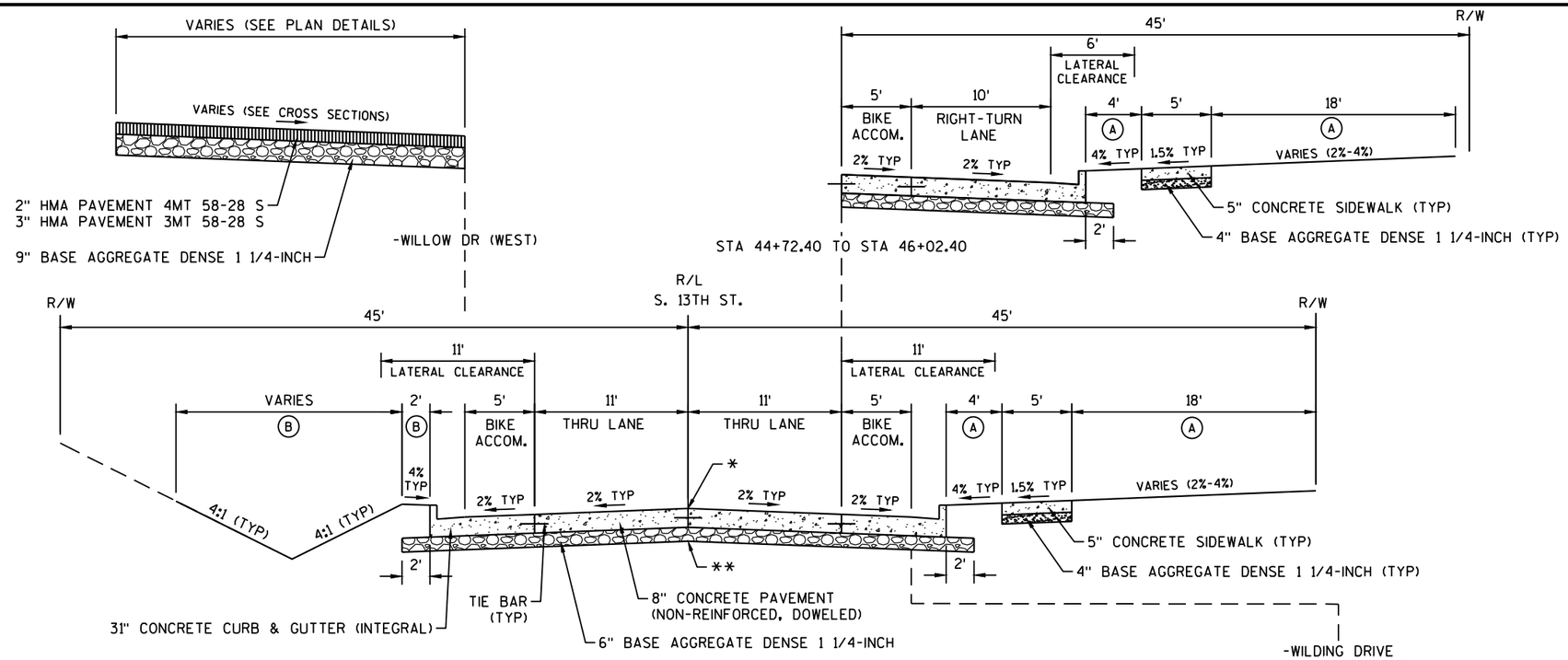
(A) 6" TOPSOIL, SOD

(B) 6" TOPSOIL, SEED, FERTILIZER, EROSION MAT

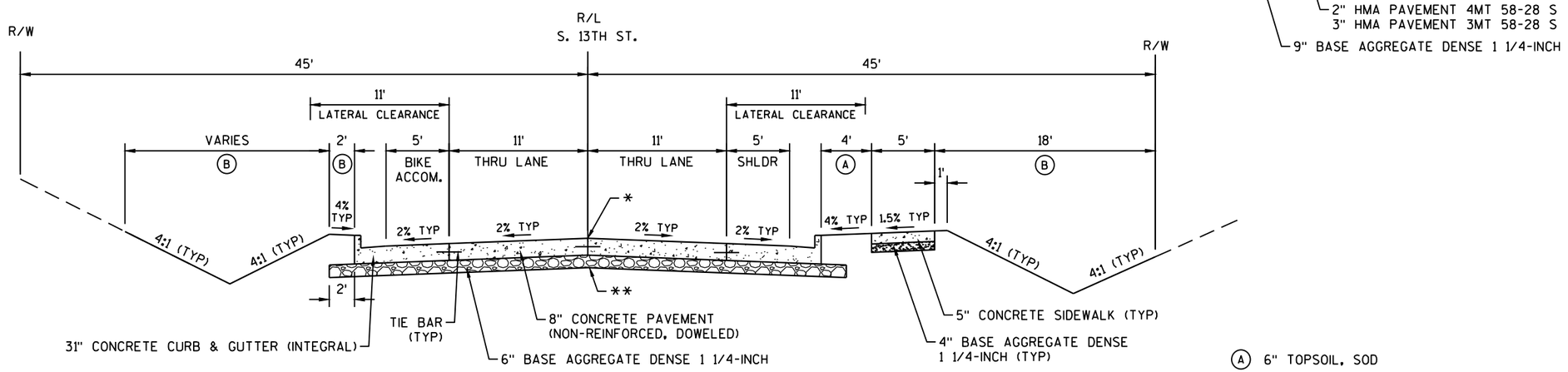
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** POINT REFERRED TO ON CROSS SECTIONS

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TYPICAL SECTIONS- S. 13TH STREET	SHEET 8	E



TYPICAL FINISHED SECTION
STA 44+72.40 TO STA 52+20.60



TYPICAL FINISHED SECTION
STA 36+75.00 TO STA 44+72.40

(A) 6" TOPSOIL, SOD

(B) 6" TOPSOIL, SEED, FERTILIZER, EROSION MAT

* POINT REFERRED TO ON PROFILE

** POINT REFERRED TO ON CROSS SECTIONS

(A) 6" TOPSOIL, SOD

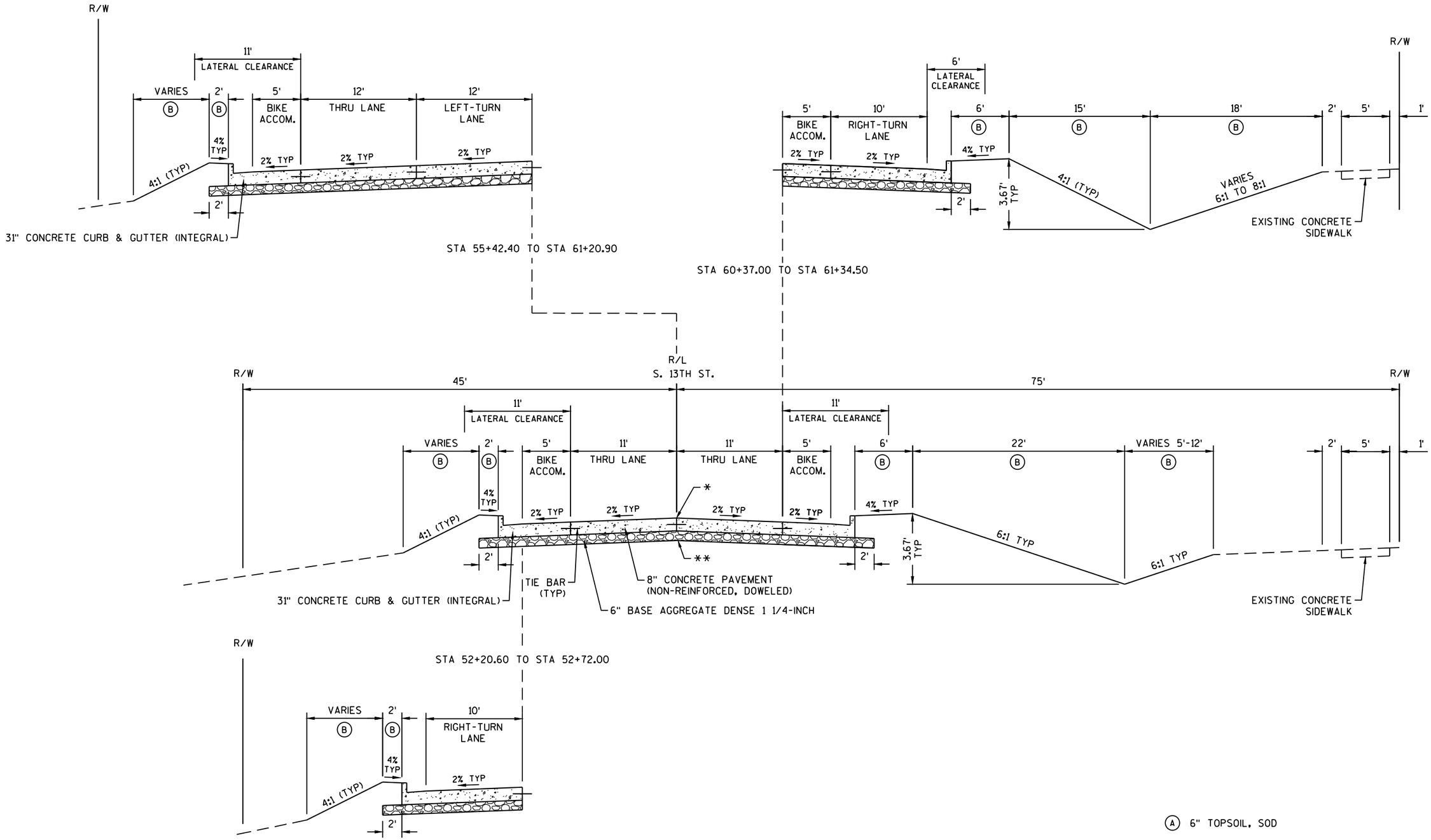
(B) 6" TOPSOIL, SEED, FERTILIZER, EROSION MAT

* POINT REFERRED TO ON PROFILE

** POINT REFERRED TO ON CROSS SECTIONS

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TYPICAL SECTIONS- S. 13TH STREET	SHEET 9	E

2



TYPICAL FINISHED SECTION

STA 52+20.60 TO STA 61+34.50

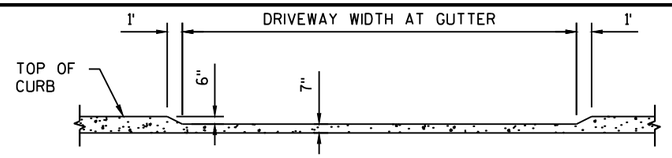
(A) 6" TOPSOIL, SOD

(B) 6" TOPSOIL, SEED, FERTILIZER, EROSION MAT

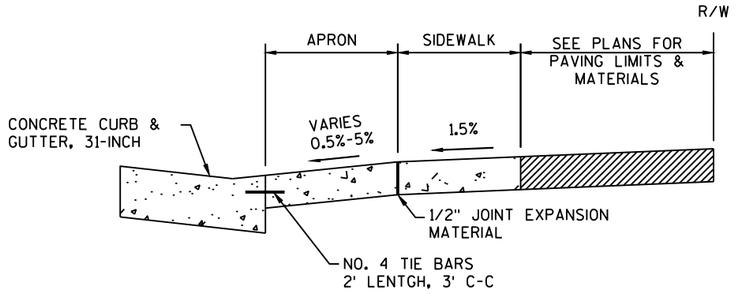
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** POINT REFERRED TO ON CROSS SECTIONS

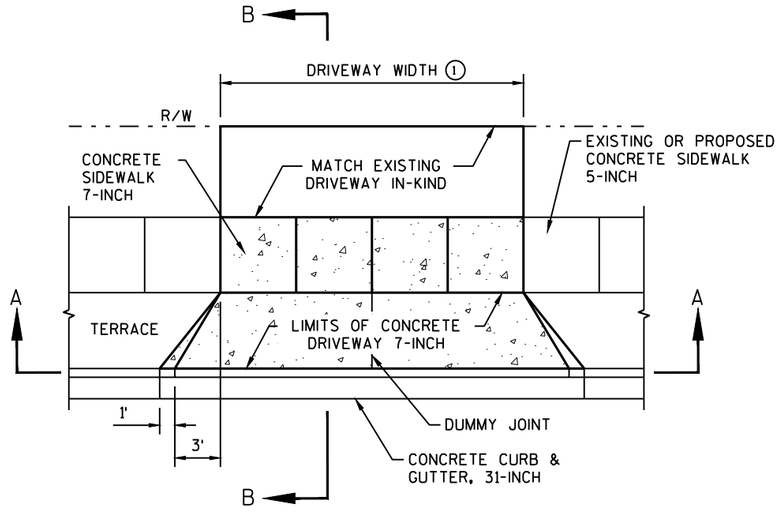
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SECTION A-A

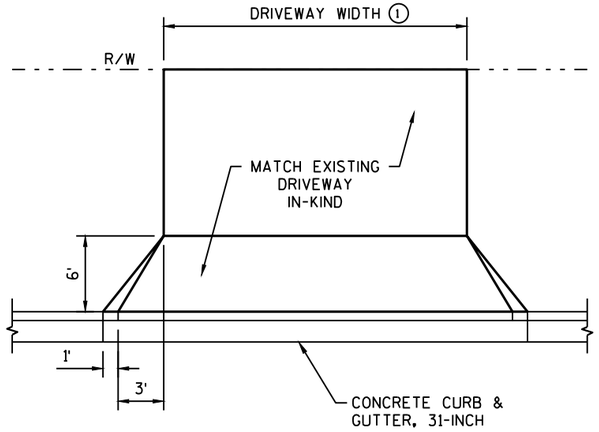


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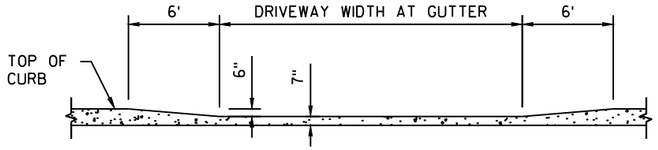


PLAN VIEW

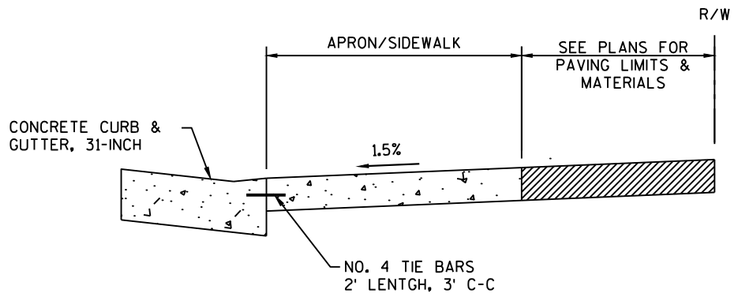
DRIVEWAY WITH SIDEWALK/TERRACE



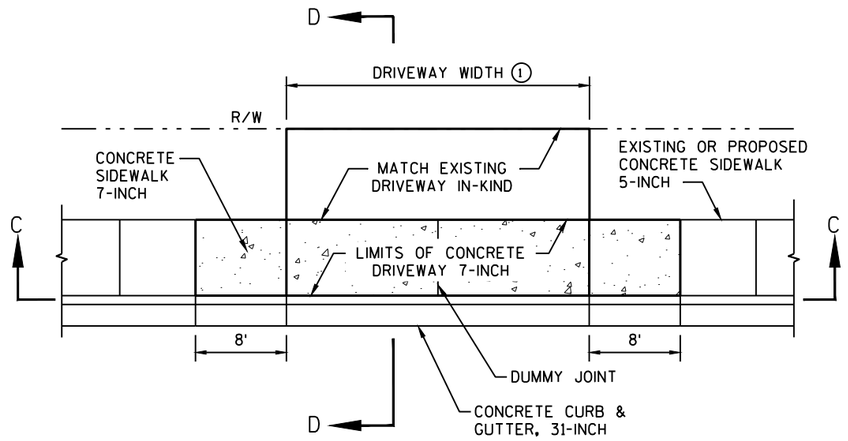
DRIVEWAY (NO SIDEWALK)



SECTION C-C



SECTION D-D



PLAN VIEW

DRIVEWAY WITHOUT TERRACE

DRIVEWAY NOTES:

(1) RESIDENTIAL WIDTH: 10' MIN. / 24' MAX.

COMMERCIAL WIDTH: 12' MIN / 35' MAX.

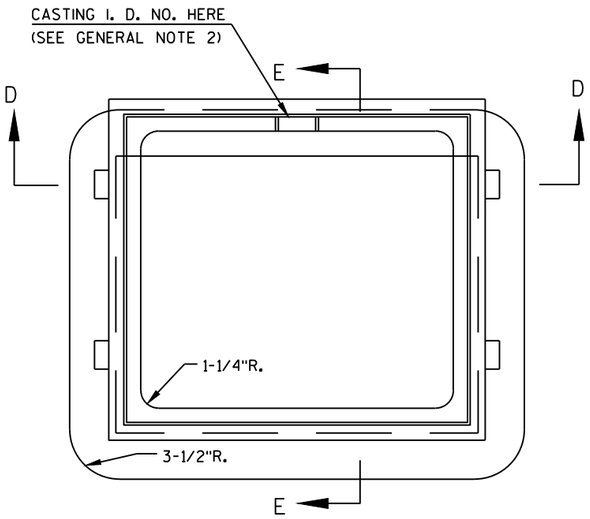
CONCRETE DRIVEWAYS:
CONCRETE DRIVEWAY 7-INCH ON 4" BASE AGGREGATE DENSE 1-¼"

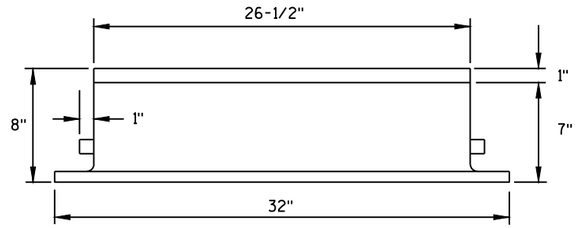
ASPHALT DRIVEWAYS:
4" ASPHALTIC SURFACE DRIVEWAYS

	NOMINAL SIZE	MSCR	THICKNESS
UPPER LAYER	9.5mm	58-28S	2.0 in
LOWER LAYER	9.5mm	58-28S	2.0 in
BASE AGG. DENSE	1-¼"	N/A	4.0 in

GRAVEL DRIVEWAYS:
6" BASE AGGREGATE DENSE 3/4"

ALL DRIVEWAY APRONS ARE CONCRETE UNLESS NOTED OTHERWISE IN THE PLANS. PLACE DUMMY JOINT AT CENTER OF DRIVEWAY APRON 14' WIDE OR GREATER OR AT ALL JOINTS IN THE CURB & GUTTER.





FRAME

GENERAL NOTES

ALL EDGES ARE TO BE GROUND

ALL CASTINGS SHALL BEAR THE FOLLOWING IDENTIFICATION MARKS IN THE FORM OF LEGIBLE LETTERS OR NUMERALS RAISED 1/8"

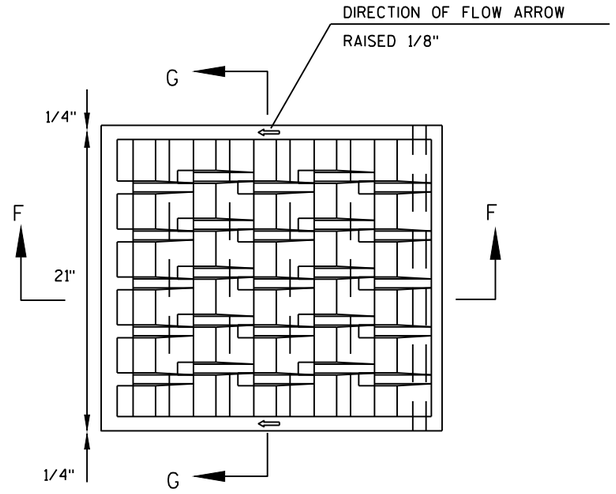
ON THE FRAME

1. ON THE UPPER FACE OF THE FLANGE IN 1 INCH HIGH LETTERS THE INITIALS OR MONOGRAM OF THE FOUNDRY, THE YEAR MADE AND THE SERIAL NUMBER OF THE INDIVIDUAL CASTING.

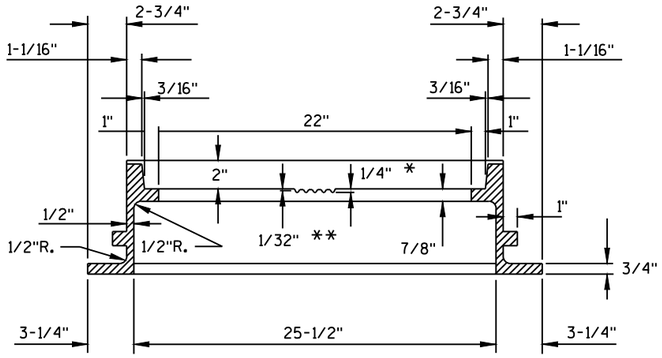
2. ON THE SEAT OF THE FRAME IN 1 INCH HIGH LETTERS, THE CASTING IDENTIFICATION NUMBER (M.S.51).

ON THE GRATE

1. ON THE UPPER SIDE OF THE GRATE IN 1 INCH HIGH LETTERS, THE INITIALS OR MONOGRAM OF THE FOUNDRY, THE YEAR MADE, THE CASTING IDENTIFICATION NUMBER (M.S.57) AND THE SERIAL NUMBER OF THE INDIVIDUAL CASTING.



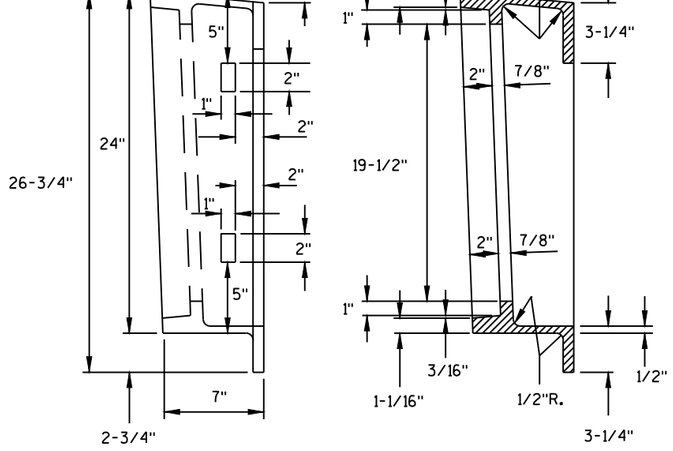
GRATE



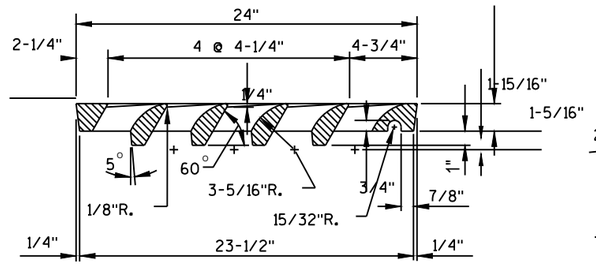
SECTION D-D

*DEPRESSION FOR LETTERS

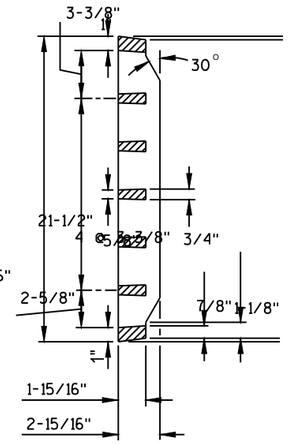
**CLEARANCE FROM TOP OF LETTERS TO FACE OF SEAT



SECTION E-E



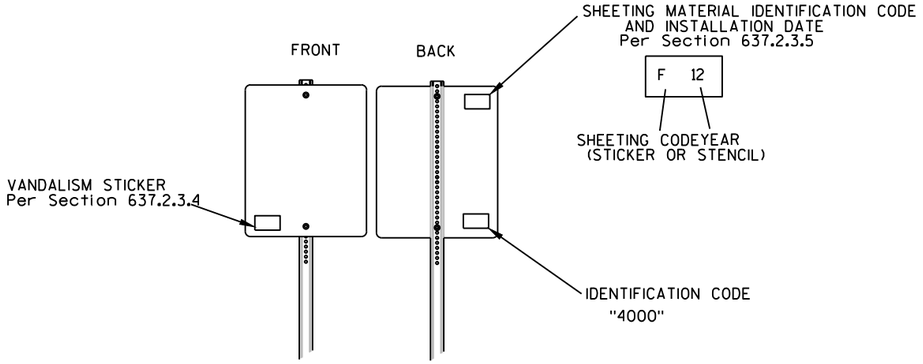
SECTION F-F



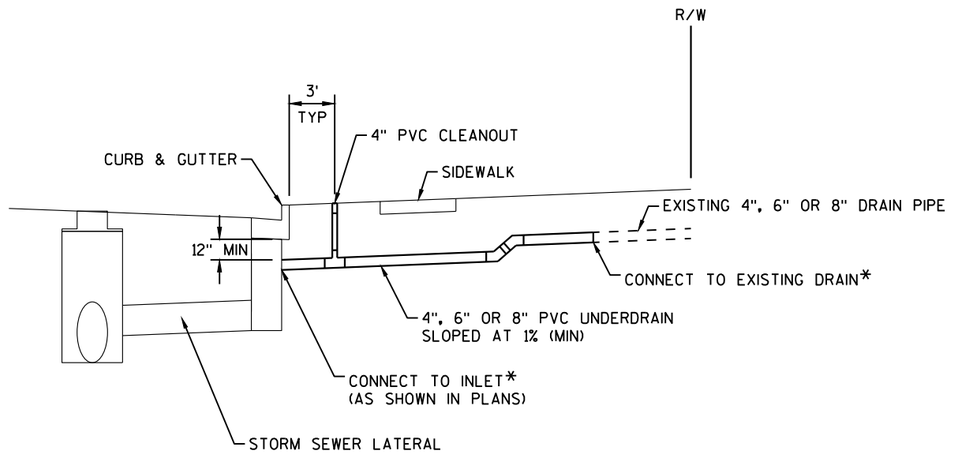
SECTION G-G

INLET COVER - TYPE 57

LID-145 LBS., FRAME-204 LBS.



SIGN IDENTIFICATION DETAIL



*CONNECTION IS INCIDENTAL TO UNDERDRAIN

UNDERDRAIN CONNECTION DETAIL

A. DESCRIPTION

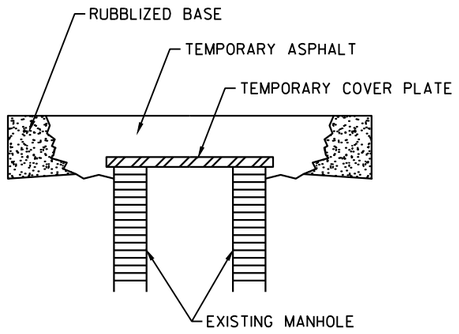
THIS WORK CONSISTS OF FURNISHING, INSTALLING AND REMOVING A STEEL PLATE TO COVER AND SUPPORT BACKFILL AND TRAFFIC LOADING AT MANHOLES DURING MILL & PAVING OPERATIONS.

B. MATERIALS

MATERIAL FURNISHED AND USED IN THE WORK SHALL BE 1/4-INCH MINIMUM THICKNESS STEEL PLATE THAT EXTENDS AT LEAST TO THE OUTSIDE EDGE OF EXISTING MANHOLE MASONRY.

C. METHOD OF MEASUREMENT/BASIS OF PAYMENT

TEMPORARY COVER PLATES WILL BE MEASURED SEPARATELY AS UNITS AND WILL BE PAID FOR AT CONTRACT PRICE FOR EACH, WHICH PRICE SHALL BE FULL COMPENSATION FOR FURNISHING, INSTALLING AND REMOVING THE COVER PLATES AND FOR ALL LABOR, TOOLS, EQUIPMENT AND INCIDENTALS NECESSARY TO COMPLETE THE WORK. THE STEEL PLATES SHALL BECOME THE PROPERTY OF THE CONTRACTOR WHEN NO LONGER NEEDED FOR THE CONTRACT WORK.



TEMPORARY COVER PLATE

STEP 1 (PRIOR TO HMA OVERLAY)

A. REMOVE BY SAWING AROUND MANHOLE AND STORE MANHOLE COVER
B. FURNISH AND INSTALL TEMPORARY COVER PLATE*
C. BACKFILL USING HMA PAVEMENT*

*TO BE PAID FOR UNDER CONTRACT ITEMS

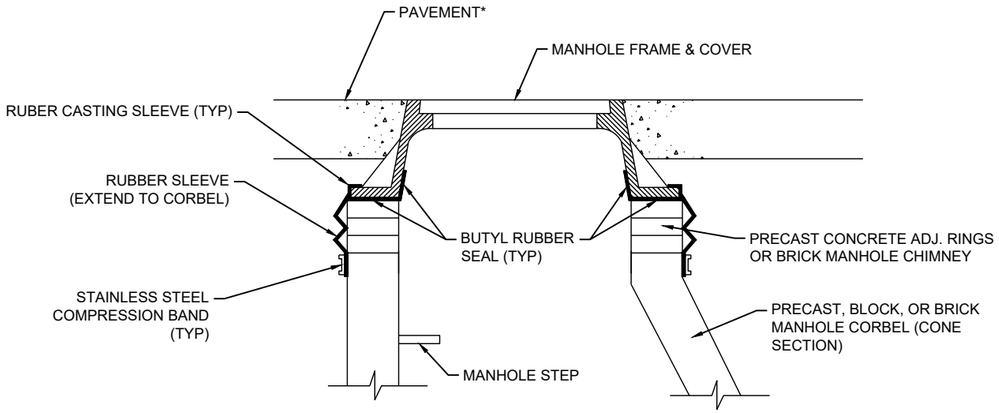
STEP 2 (AFTER PAVING LOWER COURSES)

A. EXCAVATE AND REMOVE TEMPORARY COVER PLATE
B. ADJUST MANHOLE AND REINSTALL MANHOLE COVER TO FINISH GRADE

(BACKFILL AND OTHER WORK TO BE DONE IN ACCORDANCE WITH ADJUSTING OR RECONSTRUCTING INLETS, CATCH BASINS OR MANHOLES)

UTILITY COMPANY MANHOLES
STEP 1A- COMPLETED BY UTILITY COMPANY
STEP 1B- COMPLETED BY CONTRACTOR IN COORDINATION WITH WORK BY UTILITY COMPANY
STEP 1C- COMPLETED BY CONTRACTOR IN COORDINATION WITH WORK BY UTILITY COMPANY

(TO BE PAID FOR UNDER CONTRACT ITEMS)



SANITARY MANHOLE INTERNAL/EXTERNAL SEAL

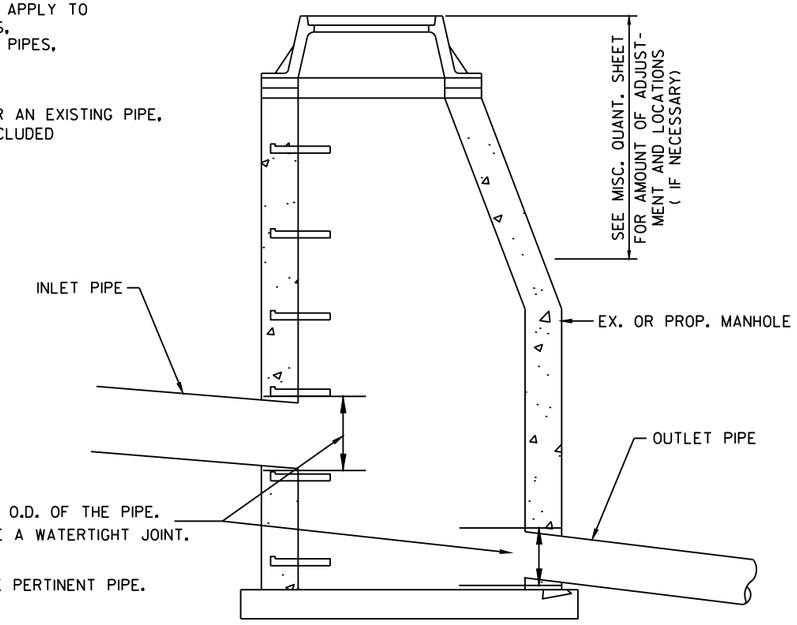
(ADAPTOR INC.)

*BOX-OUT IF MANHOLE IS IN CONCRETE PAVEMENT

CONSTRUCTION NOTES

1. CONSTRUCTION METHODS ARE "TYPICAL" AND APPLY TO NEW PIPE CONNECTING TO EXISTING MANHOLES, NEW MANHOLES CONSTRUCTED OVER EXISTING PIPES, AND NEW CONSTRUCTION

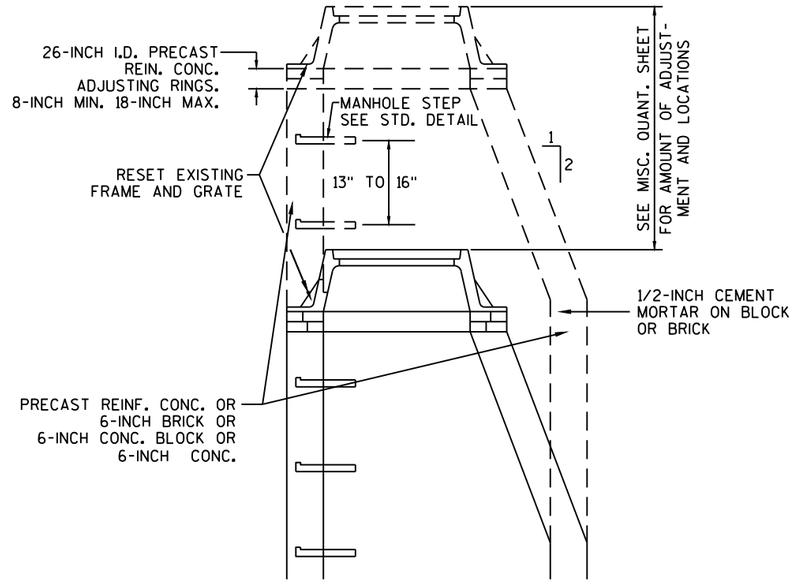
2. WHEN A NEW MANHOLE IS CONSTRUCTED OVER AN EXISTING PIPE, THE COST OF THE CONNECTION SHALL BE INCLUDED IN THE UNIT BID PRICE OF THE MANHOLE.



CUT IN CONNECTION 1-INCH LARGER THAN THE O.D. OF THE PIPE. ANNULAR SPACE TO BE MORTARED TO ENSURE A WATERTIGHT JOINT.

COST OF THIS CONNECTION IS TO BE INCLUDED IN THE UNIT PRICE PER LINEAL FOOT OF THE PERTINENT PIPE.

DETAIL FOR CONNECTION TO MANHOLES



DETAIL FOR RECONSTRUCTING MANHOLES

NOTES FOR RECONSTRUCTING MANHOLES

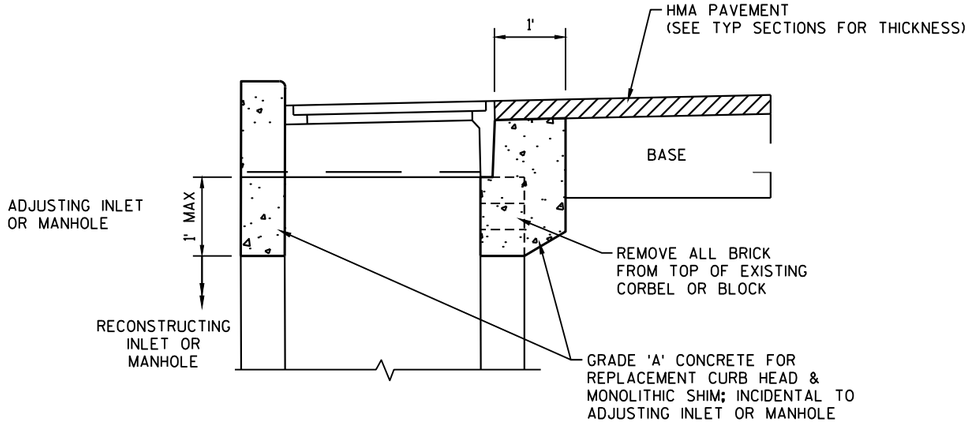
1. SEE MISCELLANEOUS QUANTITY SHEET FOR ADJUSTMENT DEPTH.

2. CONSTRUCTION METHODS ARE "TYPICAL" AND MAY APPLY TO EITHER RECONSTRUCTING OR ADJUSTING MANHOLES.

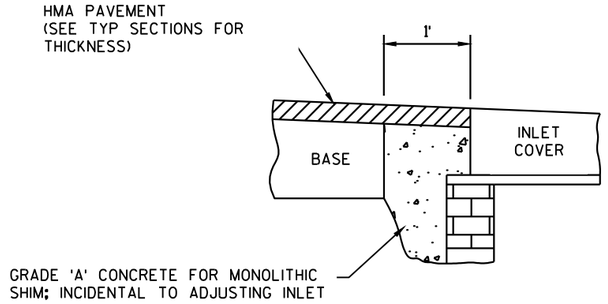
3. ADJUST FRAME TO GRATE WITH PRECAST CONCRETE RINGS OF VARIABLE THICKNESS. MAXIMUM RING HEIGHT IS 18-INCHES . MINIMUM RING HEIGHT IS 8-INCHES. CONCRETE RINGS SHALL BE REINFORCED WITH ONE LINE OF STEEL CENTERED WITHIN THE RING. WHERE NECESSARY, RINGS SHALL BE GROOVED TO RECEIVE STEP.

   CONCRETE AND STEEL REINFORCEMENT SHALL CONFORM TO DESIGNATION C-478 REQUIREMENTS OF ASTM SPECIFICATIONS. JOINTS SHALL BE WATERTIGHT AND SHALL BE MADE USING RUBBER GASKETS FOR SANITARY MANHOLES.

4. WHEN RESETTING EXISTING COVERS, REPAIRING BRICKWORK UP TO 12-INCH DEPTH IS PAID AS ADJUSTING COVERS, UNLESS THERE IS A RECONSTRUCT. WHERE NEW COVERS ARE PLACED, THE FIRST 6-INCHES OF ADJUSTMENT OR REPAIR IS PART OF THE NEW COVER. ADJUSTING OR REPAIRING GREATER THAN 6-INCH AND UP TO 12-INCHES SHALL BE PAID AS ADJUSTING COVERS. WHEN THE DEPTH OF THE WORK IS GREATER THAN 12-INCHES, ALL WORK SHALL BE PAID AS RECONSTRUCT.



(MONOLITHIC SHIM ALTERNATIVE)



SECTION A-A

DRAINAGE STRUCTURE NOTES

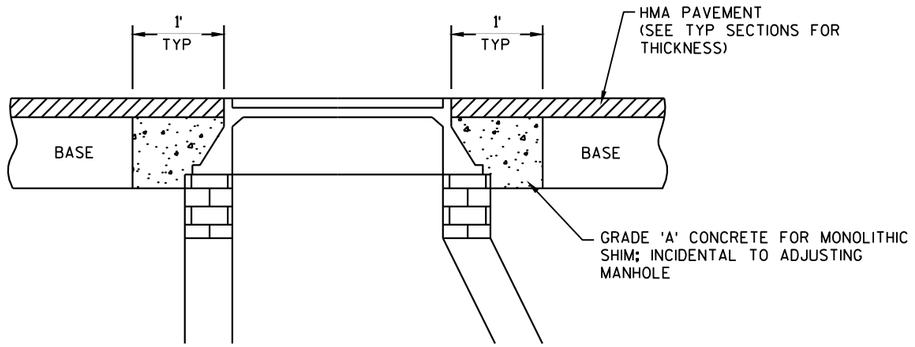
CURB BOXES ON MONOLITHIC ADJUSTED INLETS TO BE REMOVED AND THE NEW CURB HEAD CONSTRUCTED OF GRADE 'A' CONCRETE.

LIMITS FOR "RECONSTRUCTING MANHOLE" OR "RECONSTRUCTING INLET" IS FROM THE TOP OF CORBEL OR BLOCK SECTION TO THE TOP OF FOOTING.

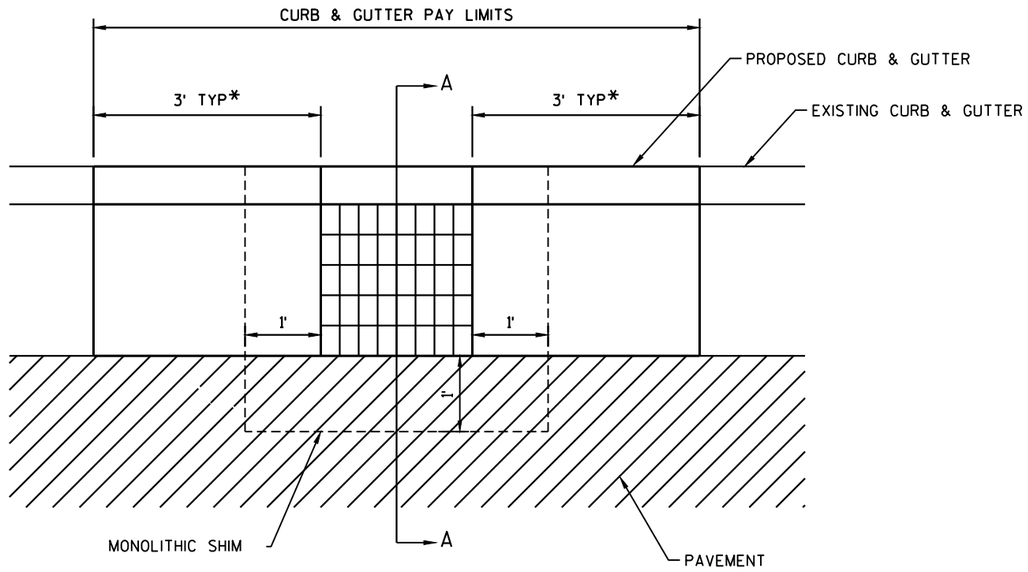
REHABILITATED SEWER STRUCTURES SHALL NOT BE BACKFILLED UNTIL 12 HOURS HAVE ELAPSED FROM COMPLETION OF THE UNIT.

WHEN NEW FRAMES/COVERS ARE PLACED, THE FIRST 6" OF ADJUSTMENT OR REPAIRING IS INCIDENTAL TO THE NEW COVER. ANY ADJUSTMENT OR REPAIR OF BRICKWORK BETWEEN 6" AND 12" WILL BE PAID AS ADJUSTING COVERS. WHEN THE DEPTH OF WORK IS GREATER THAN 12", WORK WILL BE PAID AS RECONSTRUCTING MANHOLES TO INLETS.

MANHOLE ADJUSTMENTS IN HMA PAVEMENT WILL BE MADE AFTER THE LOWER COURSE IS PLACED.



* OR TO NEAREST JOINT (6' MAX) OR AS DIRECTED BY THE ENGINEER

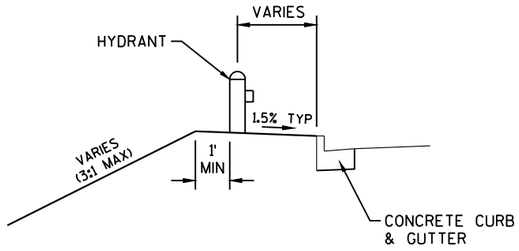


RECONSTRUCTING MANHOLES/INLETS
ADJUSTING MANHOLES/INLETS

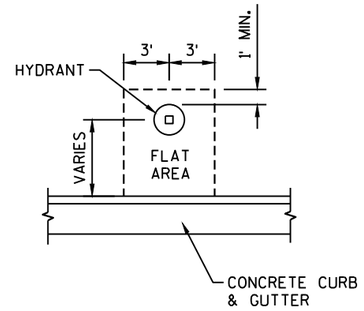
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 15	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - 05
PLOT DATE : 10/2/2023 5:02 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 42

2

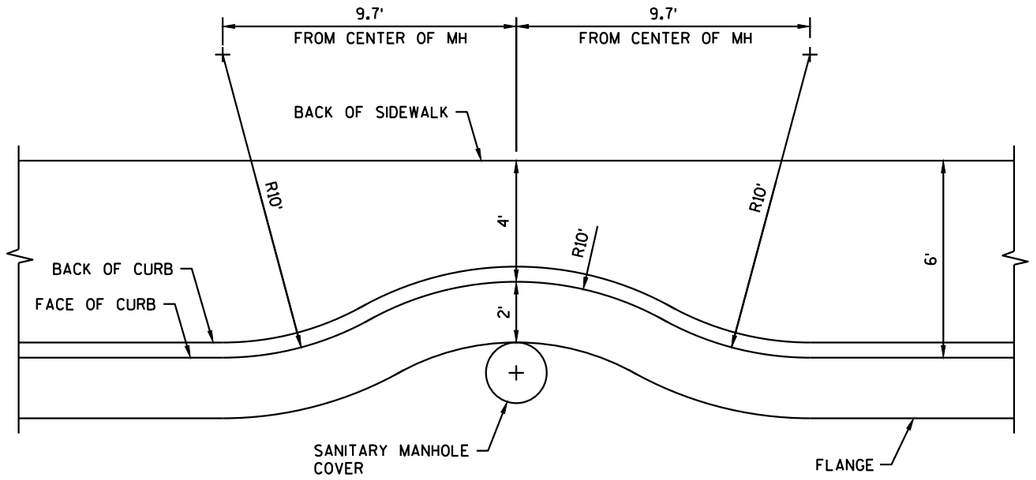


SECTION VIEW



PLAN VIEW

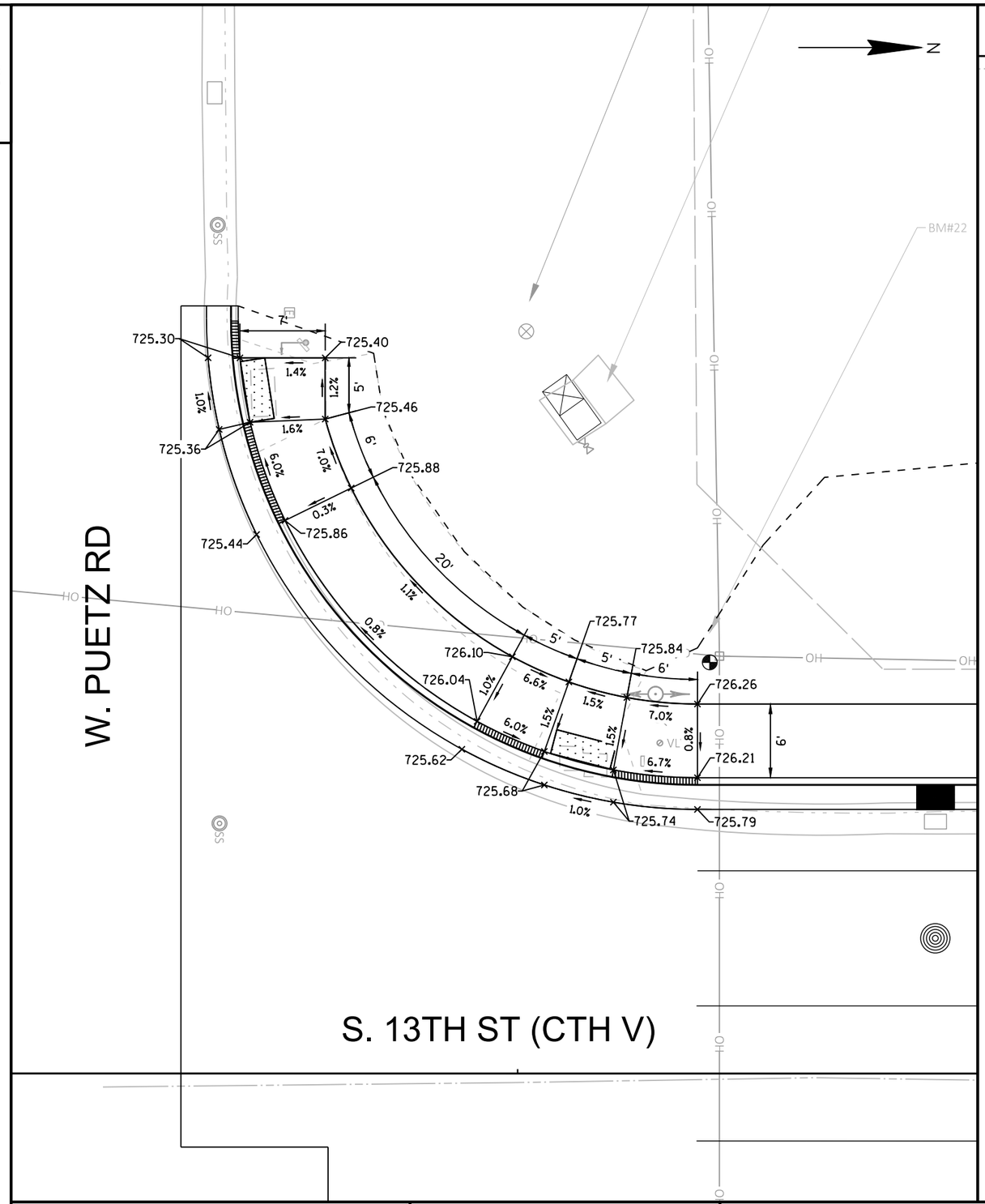
GRADING AROUND HYDRANT DETAIL

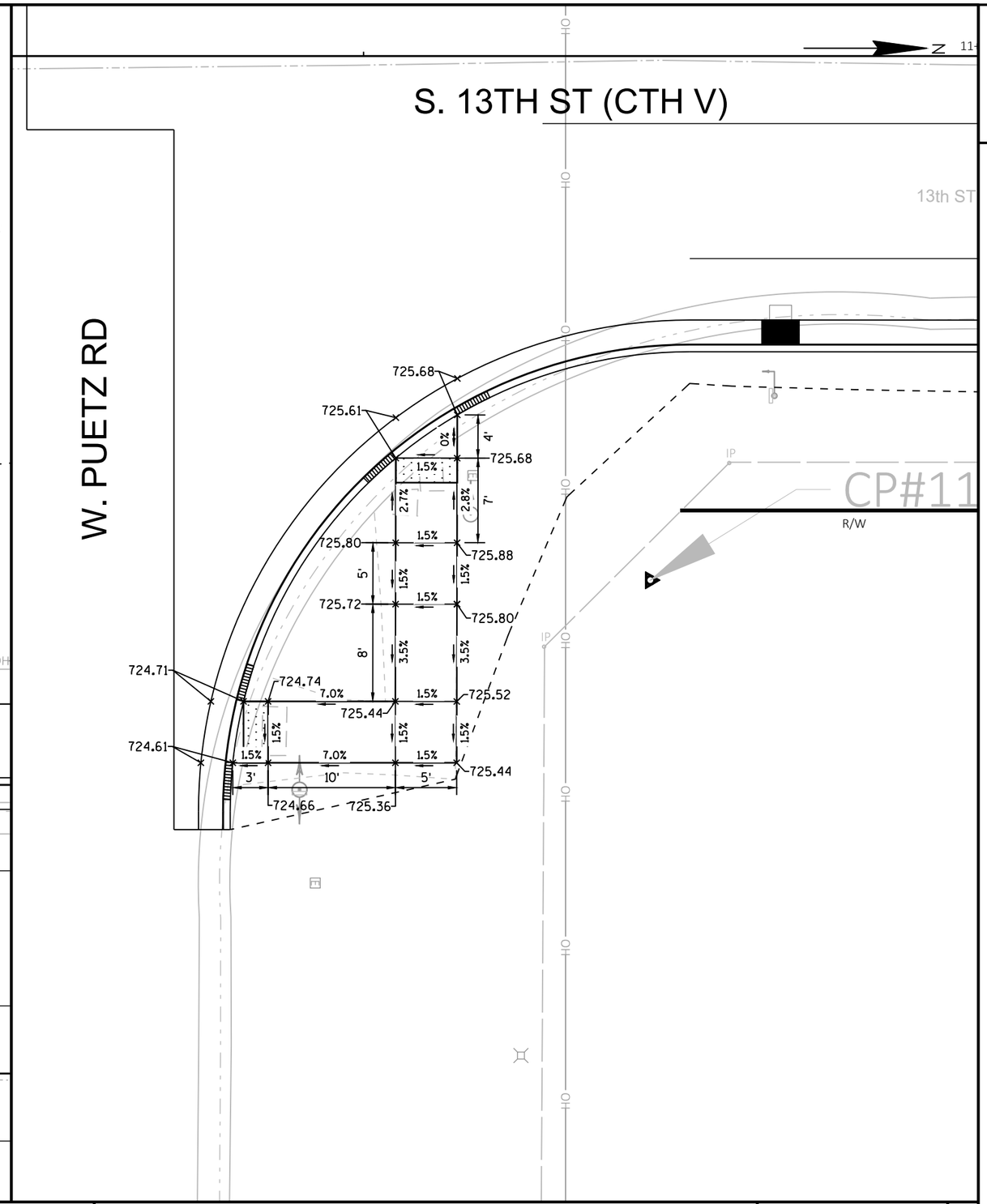


OFFSET CURB & GUTTER AT MANHOLES

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 16	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - 06
PLOT DATE : 10/2/2023 5:02 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 42





PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 17	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - CR-01
PLOT DATE : 10/2/2023 5:03 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 42

2

2

N

ASPH

CLEANOUT
6" PVC

R/W

R/W

BM#20

FAITH
BAPTIST
CHURCH

32'

16'

3'

15'

6'

6'

727.77

727.62

727.60

727.69

727.54

728.01

727.94

726.34

726.07

726.36

726.22

726.13

726.27

725.98

0.9%

0.7%

0.8%

0.9%

0.8%

1.8%

4.8%

2.3%

4.8%

2.3%

2.0%

1.2%

1.5%

1.5%

1.5%

1.5%

1.5%

6'

GV

OH

WV

CP#9

ASPH

21+00

22+00

S. 13TH ST (CTH V)

SAN

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 18	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - CR-02

PLOT DATE : 10/2/2023 5:03 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 42

2

N

WEST
MIDDLE
SCHOOL
(SOUTH)

R/W

R/W

GRASS

⊙ MP

BM#19

CP#8

S. 13TH ST (CTH V)

27+00

GRVL

⊙ POST

ASPH

OH

⌀ VLV

5'

7'

5'

722.13

722.09

722.04

722.01

722.05

722.01

721.96

0.70%

1.5%

1.0%

721.40

721.43

721.47

721.50

721.36

721.40

721.43

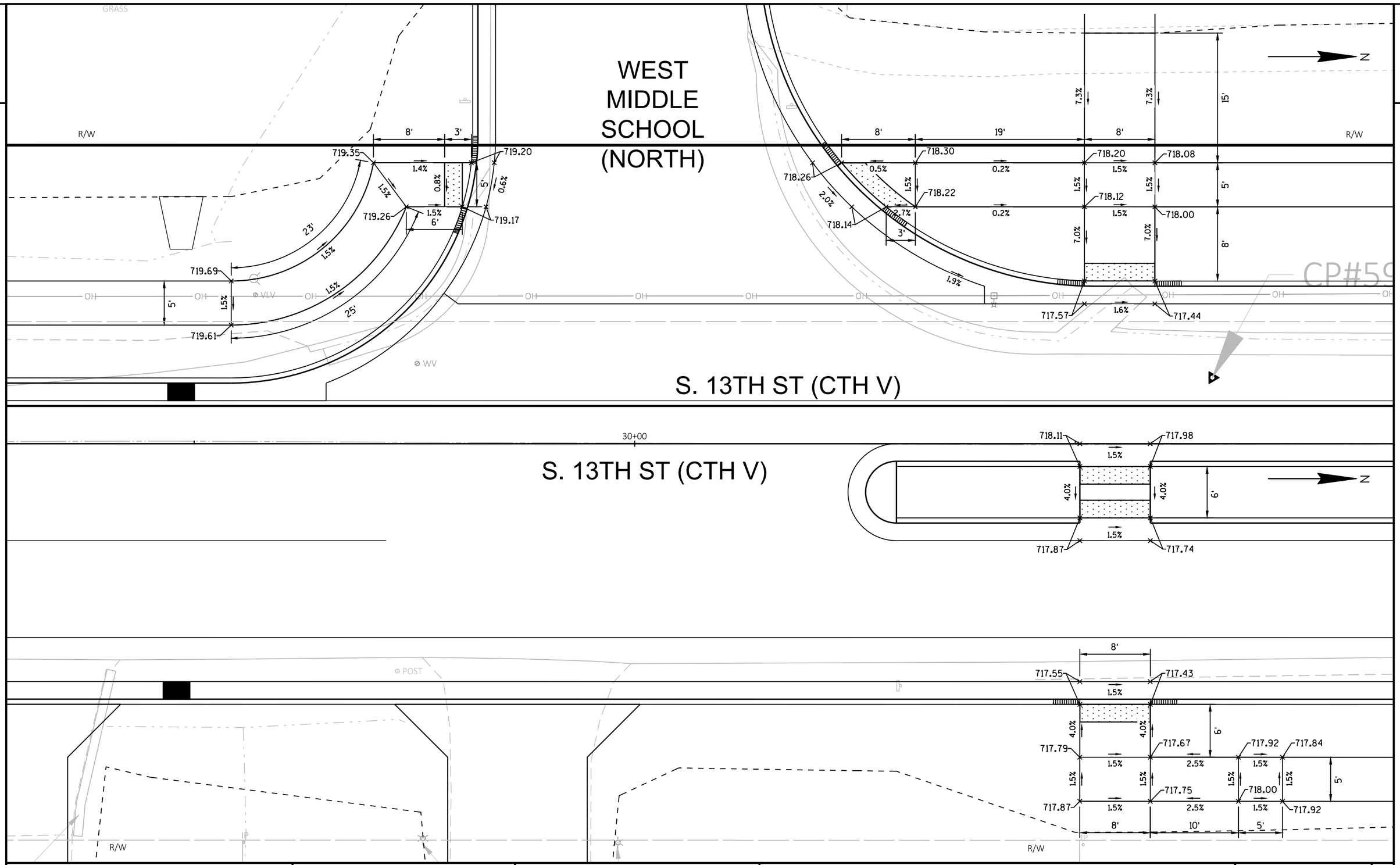
0.6%

0.8%

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 19	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - CR-03

PLOT DATE : 10/2/2023 5:03 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:10 FT



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 20	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\2505037l_CD.DWG
LAYOUT NAME - CR-04

PLOT DATE : 10/2/2023 5:03 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:10 FT

2

WYNONA DR

S. 13TH ST (CTH V)

PILGRIM PKWY

N

12" CONC WALL

BM#17

OH

SAN

WV

GRVL

R/W

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 21 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - CR-05
PLOT DATE : 10/2/2023 5:03 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:10 FT
WISDOT/CADDS SHEET 42

13th STREET

N

46+00

47+00

S. 13TH ST (CTH V)

ASPH

W. WILDING DR

713.09 0.6% 713.06 5.6% 712.78 5.6% 712.50 5.6% 712.22 1.5% 712.14 2.0% 712.10 2.1% 711.89
713.17 0.6% 713.14 6.7% 712.80 6.7% 712.46 6.7% 712.14 1.5% 712.06
5' 15' 8'
5' 1.5% 1.5% 0.4% 0.8% 1.5% 1.5%
7' 2.6% 5' 3.6%
1.5% 8' 3.6%
711.96 711.88 711.60
3.5% 8' 1.5%
711.68
9' 4.4% 3.6% 11'
711.28 1.5% 711.20
1.5% 1.5% 1.5% 1.5%
711.20 1.5% 711.12

R/W

711.64 7.0% 712.06 1.5% 712.14 4.6% 14' 7' 712.78 0.4% 712.75
711.54 7.0% 711.99 1.5% 712.10 0.7% 5.4% 1.5% 1.5% 5'
1.5% 711.57 1.5% 712.07 712.85 0.6% 712.82
2' 6' 2' 5'
4.2% 4.2% 22'
5'
711.07 1.5% 711.15
1.5% 1.5% 1.5% 1.5%
711.00 1.5% 711.08

GAS PIPELINE SIGN "1-800-236-9874"

R/W

GRASS

FLAG

CONC

CONC

CONC

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CONSTRUCTION DETAILS- S. 13TH STREET	SHEET 22	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_CD.DWG
LAYOUT NAME - CR-06

PLOT DATE : 10/2/2023 5:04 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:10 FT

WISDOT/CADDS SHEET 42

51+00

52+00

N

S. 13TH ST (CTH V)

W. WILLOW DR

GRVL

ASPH

POST

GRASS

CONC

HEDGE

BM#14

SAN

WV

712.80 — 10' — 712.44 — 712.20

712.52 — 712.20 — 712.13

712.88 — 712.52 — 712.60

712.60

712.68

712.37

712.45

712.40 — 712.40

713.16 — 713.34 — 5' — 713.42

713.06 — 713.42 — 713.50

713.09

712.87 — 712.95

2

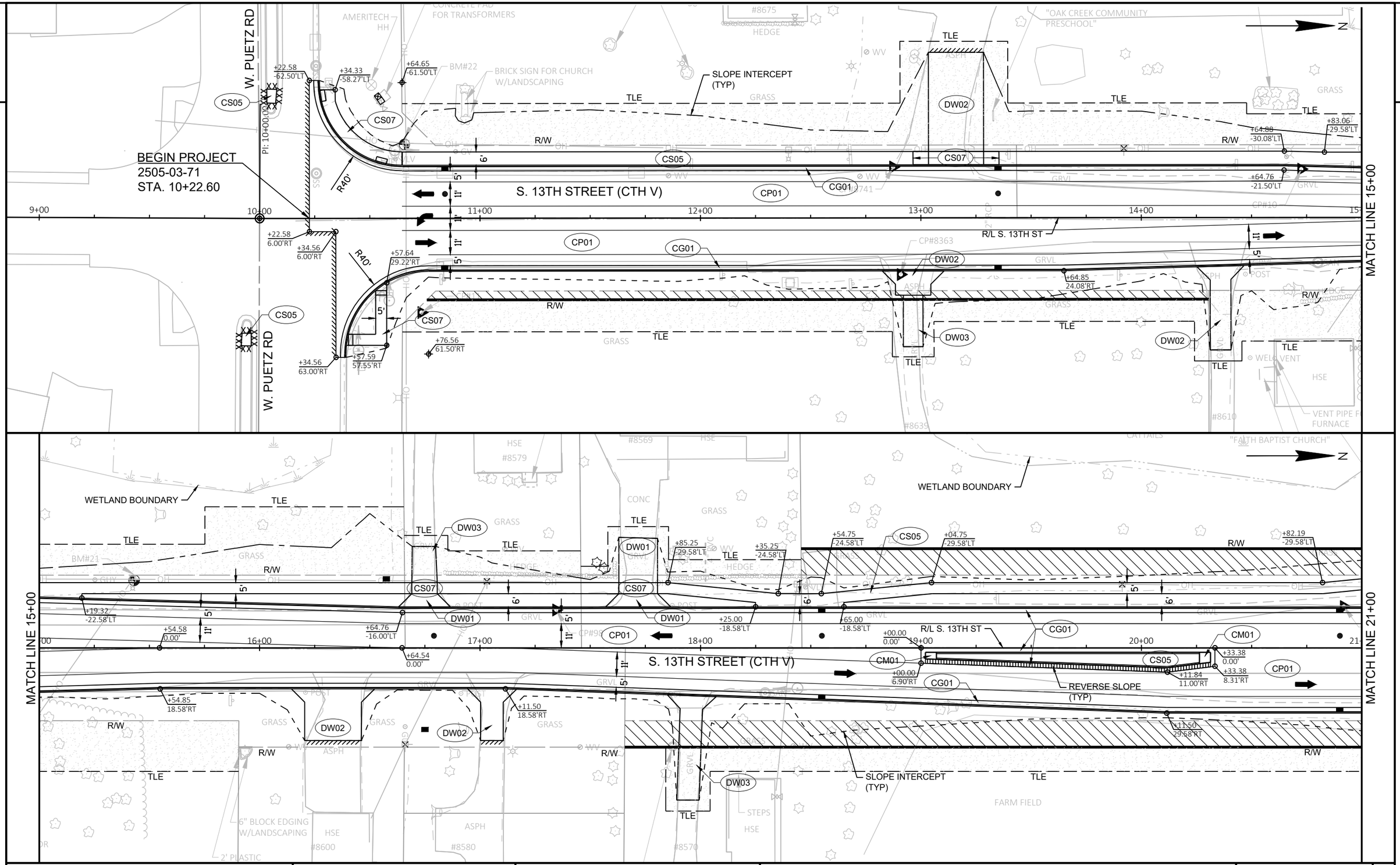
LEGEND

CP01	CONCRETE PAVEMENT, 8-INCH	CS05	CONCRETE SIDEWALK, 5-INCH
CG01	CONCRETE CURB & GUTTER, 31-INCH	CS07	CONCRETE SIDEWALK, 7-INCH
CM01	CONCRETE MEDIAN SLOPED NOSE TYPE 1	AP01	2" HMA PAVEMENT 4 MT 58-28 S 3" HMA PAVEMENT 3 MT 58-28 S
DW01	CONCRETE DRIVEWAY, 7-INCH	PED	PEDESTRIAN CURB
DW02	ASPHALTIC SURFACE DRIVEWAY, 4-INCH	////////	SAWING ASPHALT
DW03	GRAVEL DRIVEWAY, 6-INCH	XXXX	SAWING CONCRETE

PROPOSED TLE

PROPOSED FEE

2



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN DETAILS	SHEET 25	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PD1.DWG
LAYOUT NAME - 01

PLOT DATE : 9/22/2023 11:08 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

2

MATCH LINE 21+00

MATCH LINE 27+00

S. 13TH STREET (CTH V)

REVERSE SLOPE (TYP)

R/L S. 13TH ST

SLOPE INTERCEPT (TYP)

CONCRETE CORUGGATED MEDAIN (TYP)

FUTURE SIDEWALK (BY OTHERS)

MATCH LINE 27+00

MATCH LINE 33+00

S. 13TH STREET (CTH V)

REVERSE SLOPE (TYP)

R/L S. 13TH ST

SLOPE INTERCEPT (TYP)

PILGRIM PKWY

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN DETAILS	SHEET 26	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PD1.DWG
LAYOUT NAME - 02
PLOT DATE : 9/22/2023 11:13 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44

2

MATCH LINE 33+00

MATCH LINE 39+00

WETLAND BOUNDARY

W. WYNONA DR

FENCE CHAIN LINK 6-FT

S. 13TH STREET (CTH V)

R/L S. 13TH ST

CONCRETE CORUGGATED MEDAIN (TYP)

SLOPE INTERCEPT (TYP)

FENCE CHAIN LINK 6-FT

PI: 36+63.83

MATCH LINE 39+00

MATCH LINE 45+00

S. 13TH STREET (CTH V)

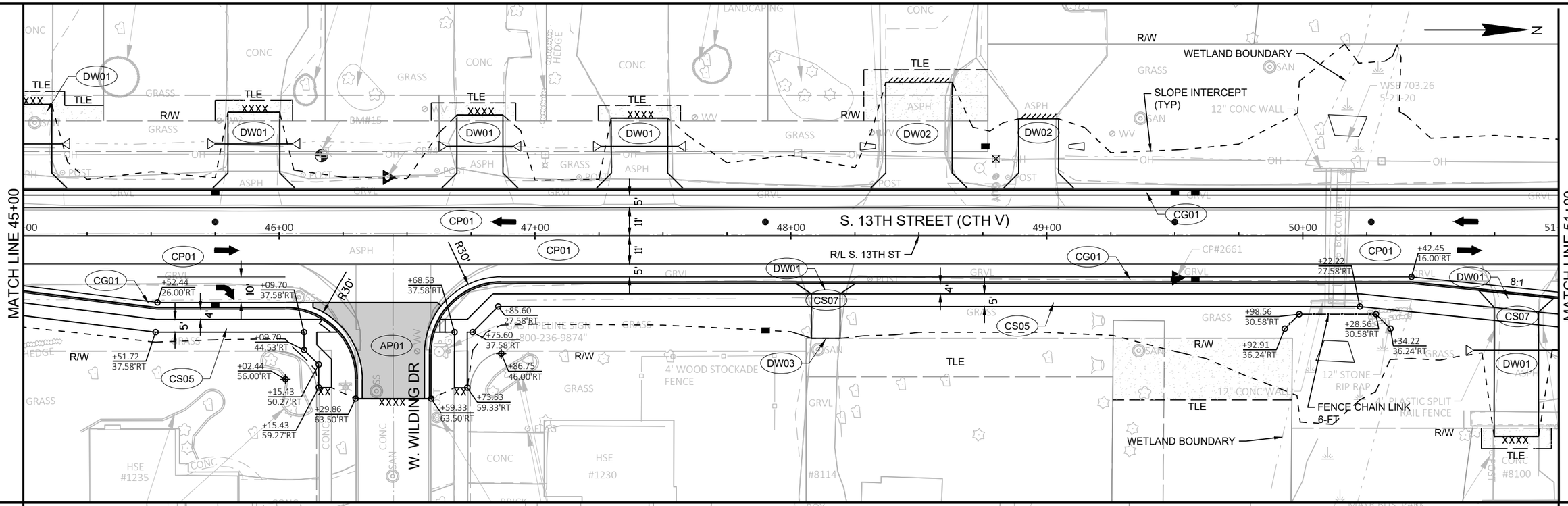
R/L S. 13TH ST

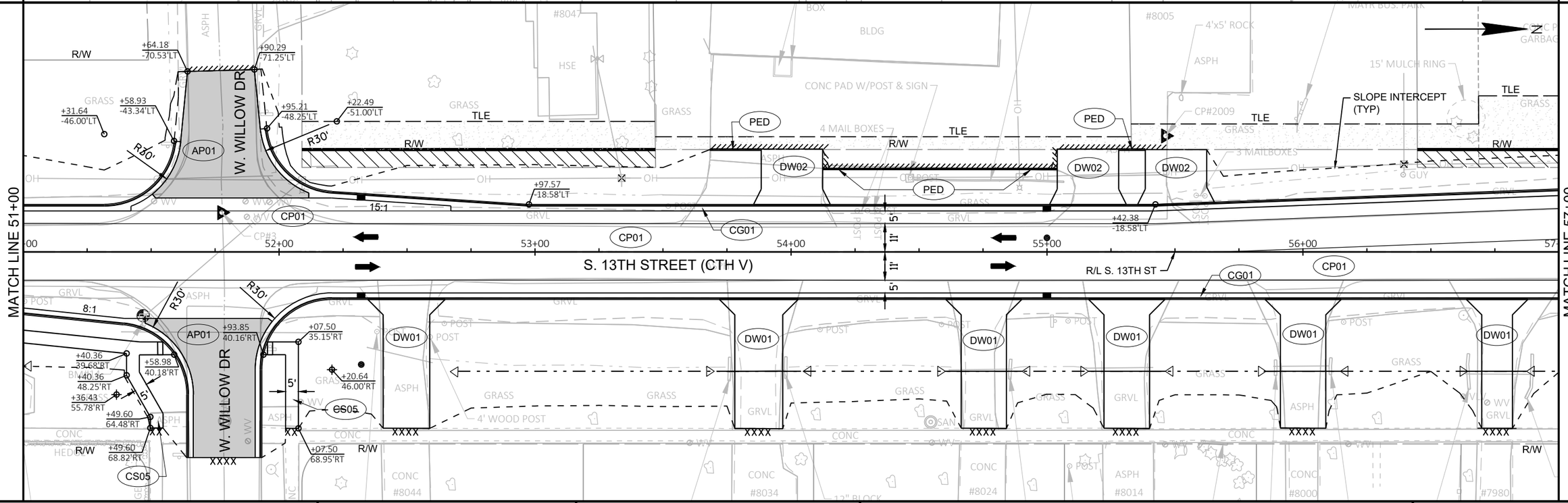
SLOPE INTERCEPT (TYP)

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN DETAILS	SHEET 27	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PD1.DWG
LAYOUT NAME - 03

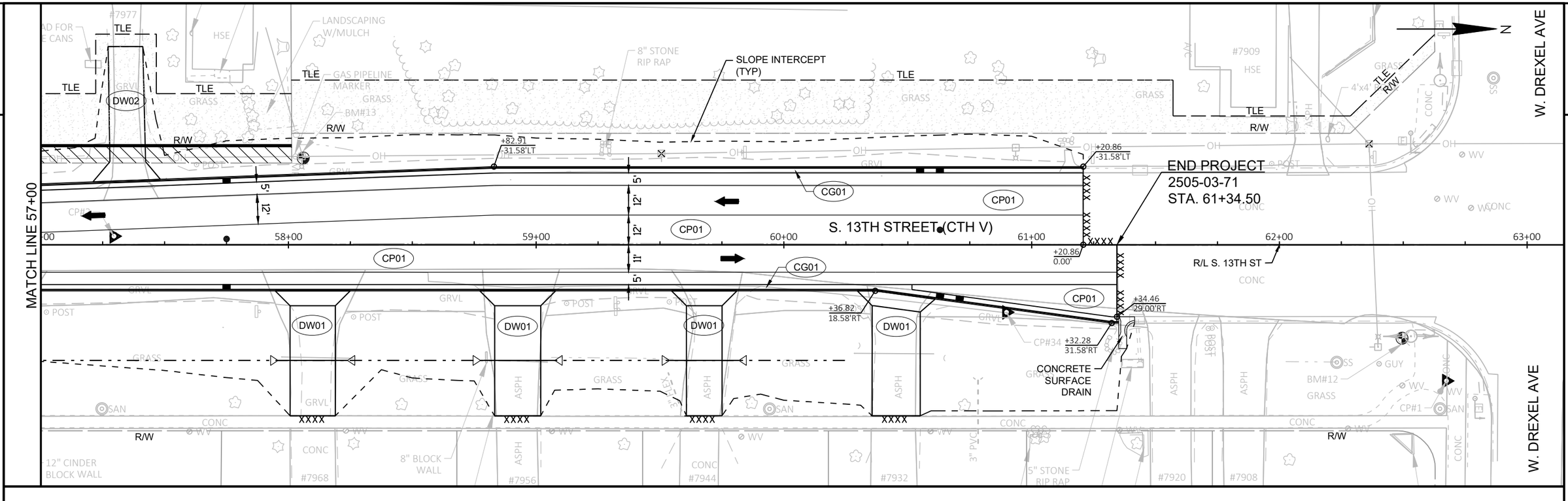
PLOT DATE : 9/22/2023 11:19 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT





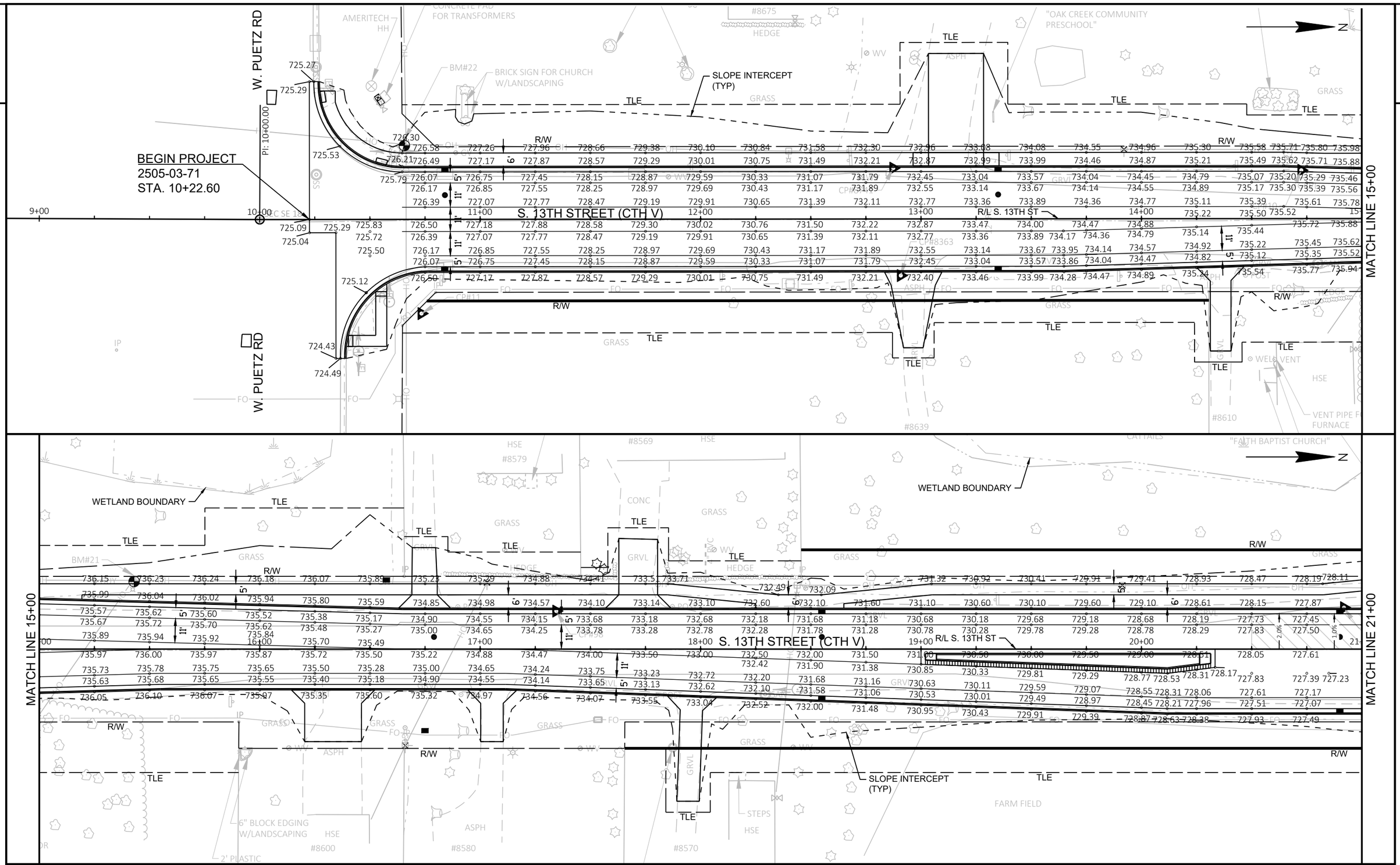
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN DETAILS	SHEET 28	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PD1.DWG
LAYOUT NAME - 04
PLOT DATE : 1/4/2024 6:13 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT



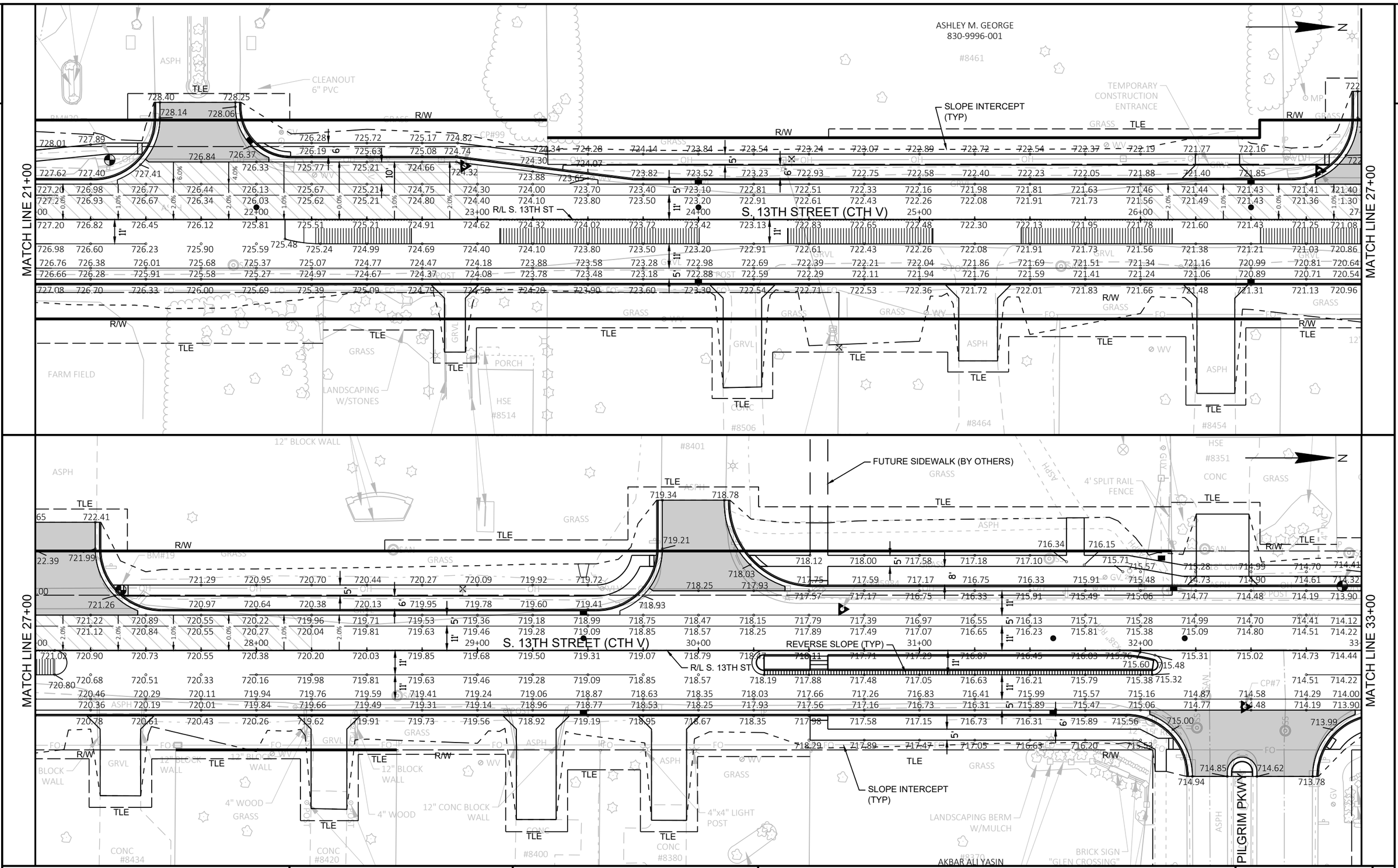
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN DETAILS	SHEET 29	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PD1.DWG
LAYOUT NAME - 05
PLOT DATE : 9/22/2023 11:28 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVING GRADES	SHEET 30 E

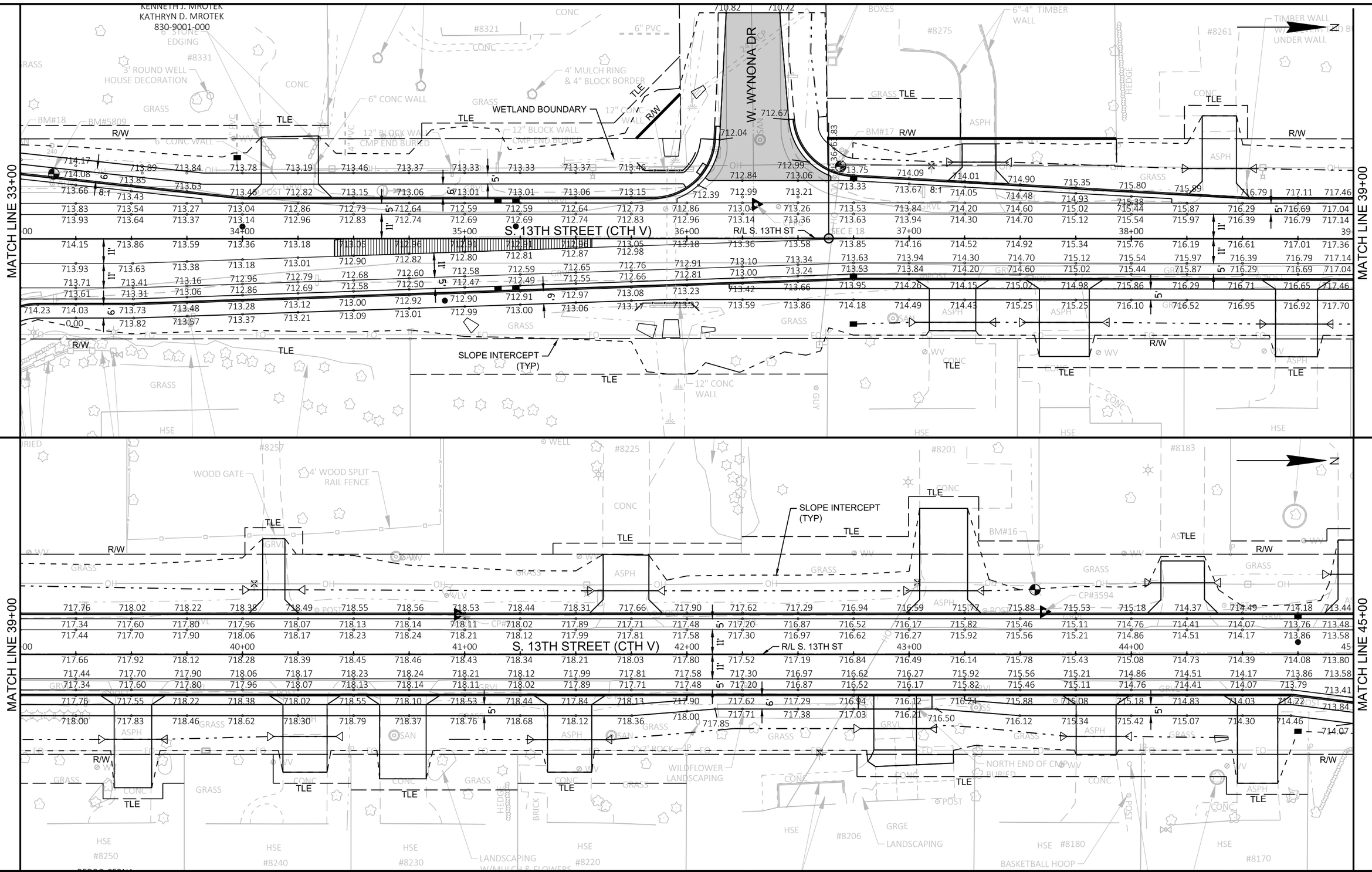
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LAYOUT NAME - 01
PLOT DATE : 10/25/2023 10:43 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVING GRADES	SHEET 31	E

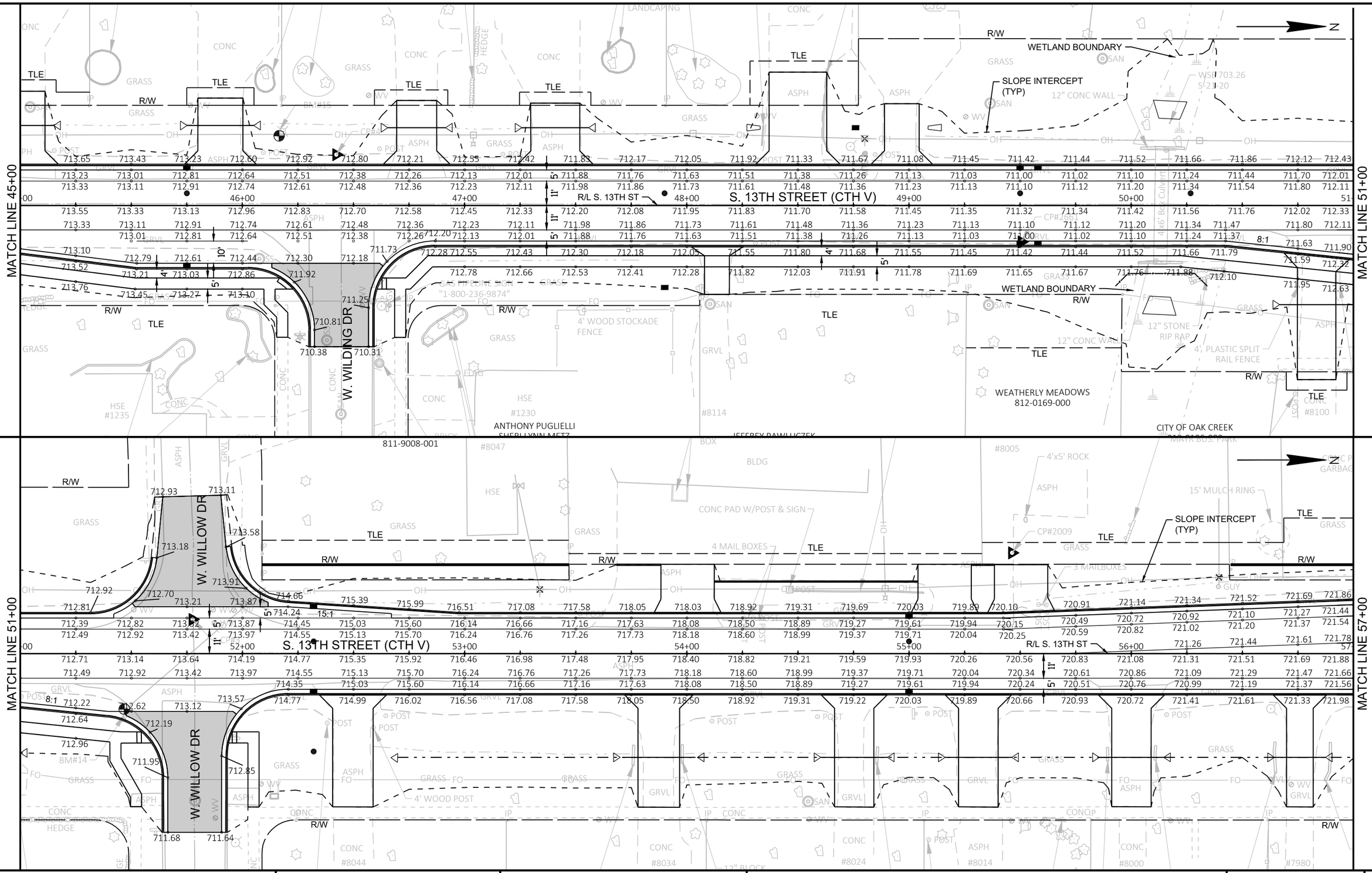
FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PG.DWG
LAYOUT NAME - 02

PLOT DATE : 10/25/2023 10:43 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT



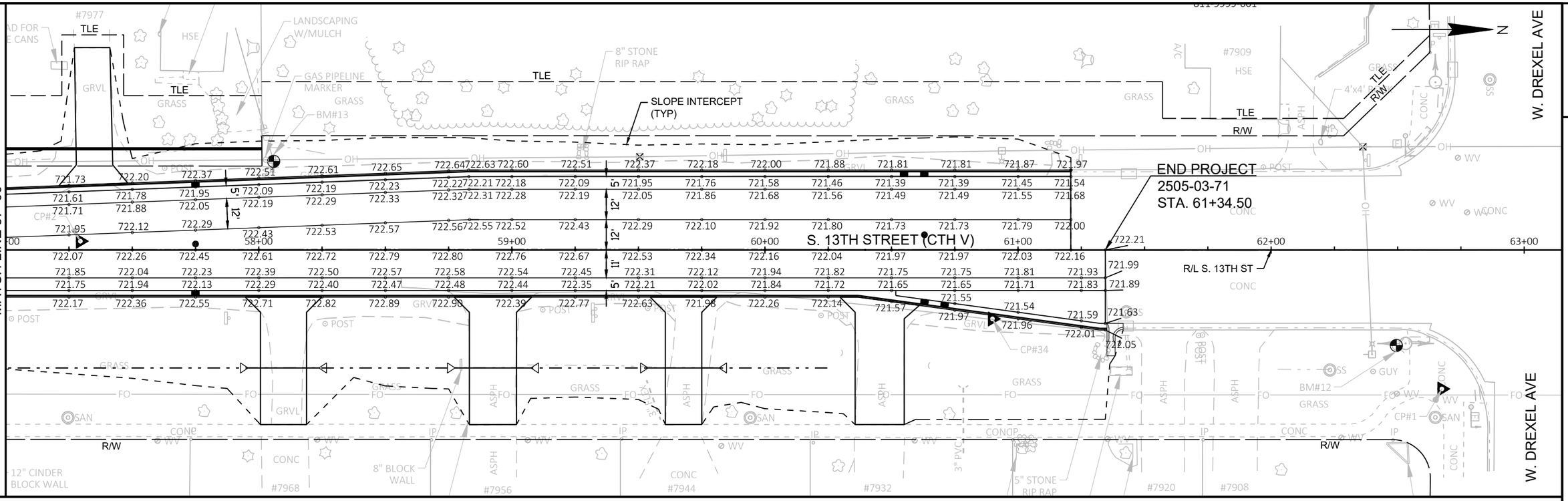
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVING GRADES	SHEET 32 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PG.DWG
LAYOUT NAME - 03
PLOT DATE : 10/25/2023 10:43 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVING GRADES	SHEET 33 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PG.DWG
LAYOUT NAME - 04
PLOT DATE : 1/4/2024 6:39 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVING GRADES	SHEET 34	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PG.DWG
LAYOUT NAME - 05
PLOT DATE : 10/25/2023 10:44 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT

2

LEGEND

- SURFACE WATER FLOW
- SILT FENCE
- TEMPORARY DITCH CHECK
- CULVERT PIPE CHECK
- ROCK BAG SILT FENCE RELIEF
- INLET PROTECTION TYPE (X)
- TOP SOIL, SEED MIXTURE NO. 10, EROSION MAT URBAN CLASS I, TYPE B
- TOP SOIL, SEED MIXTURE NO. 70, EROSION MAT URBAN CLASS I, TYPE B
- TOP SOIL, SOD LAWN
- RIPRAP MEDIUM

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	EROSION CONTROL	SHEET 35	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_EC.DWG
LAYOUT NAME - 00
PLOT DATE : 10/25/2023 10:56 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 42

2

W. PUETZ RD

PUETZ ROAD

W. PUETZ RD

BEGIN PROJECT
2505-03-71
STA. 10+22.60

MATCH LINE 15+00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

SLOPE INTERCEPT (TYP)

TLE

R/W

GRASS

ASPH

"OAK CREEK COMMUNITY PRESCHOOL"

"FAITH BAPTIST CHURCH"

WETLAND BOUNDARY

FARM FIELD

MATCH LINE 21+00

MATCH LINE 15+00

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	EROSION CONTROL	SHEET 36	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_EC.DWG
LAYOUT NAME - 01
PLOT DATE : 10/25/2023 10:57 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44

2

MATCH LINE 21+00

MATCH LINE 27+00

ASHLEY M. GEORGE
830-9996-001

S. 13TH STREET (CTH V)

R/L S. 13TH ST

SLOPE INTERCEPT (TYP)

FUTURE SIDEWALK (BY OTHERS)

MATCH LINE 27+00

MATCH LINE 33+00

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	EROSION CONTROL	SHEET 37	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_EC.DWG
LAYOUT NAME - 02

PLOT DATE : 10/25/2023 10:57 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

KENNETH J. MROTEK
KATHRYN D. MROTEK
830-9001-000

MATCH LINE 33+00

MATCH LINE 39+00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

W. WYNONA DR

WETLAND BOUNDARY

SLOPE INTERCEPT (TYP)

TLE

R/W

MATCH LINE 39+00

MATCH LINE 45+00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

SLOPE INTERCEPT (TYP)

WETLAND BOUNDARY

TLE

R/W

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	EROSION CONTROL	SHEET 38	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_EC.DWG
LAYOUT NAME - 03

PLOT DATE : 10/25/2023 10:57 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44

2

MATCH LINE 45+00

MATCH LINE 51+00

MATCH LINE 51+00

MATCH LINE 57+00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

W. WILDING DR

W. WILLOW DR

W WILLOW DR

WETLAND BOUNDARY

WEATHERLY MEADOWS
812-0169-000

CITY OF OAK CREEK

ANTHONY PUGLIELLI
SHERI LYNN METZ

811-9008-001

SLOPE INTERCEPT
(TYP)

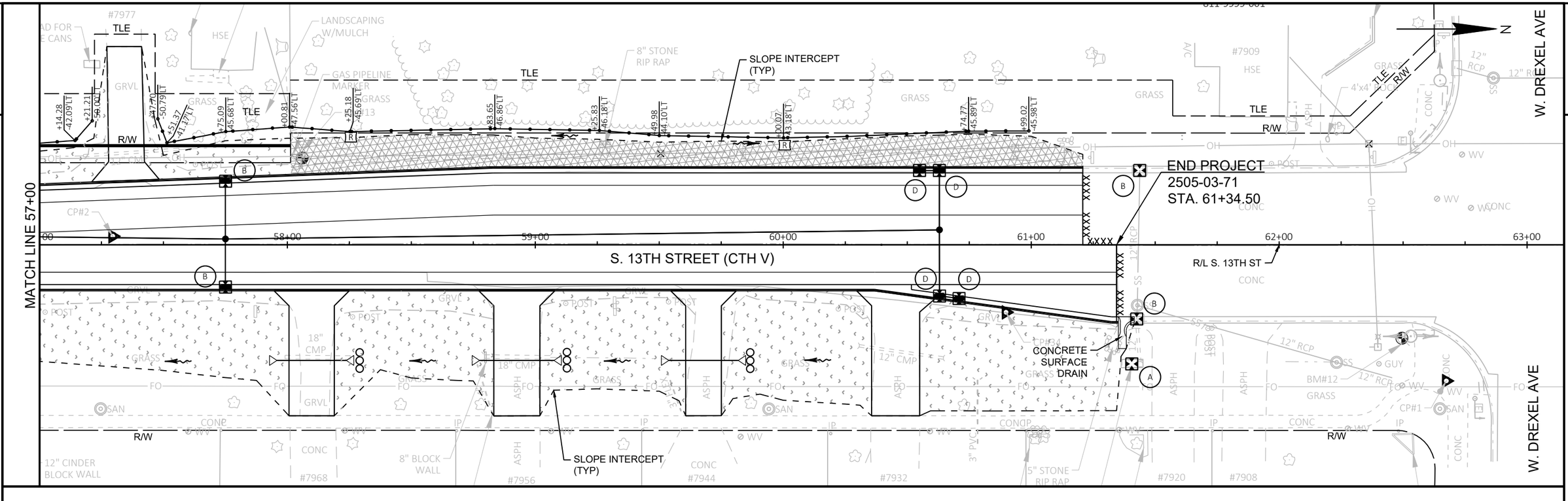
TLE

R/W

DW01

8:1

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	EROSION CONTROL	SHEET 39	E



LEGEND

- SURFACE WATER FLOW
- SILT FENCE
- TEMPORARY DITCH CHECK
- CULVERT PIPE CHECK
- ROCK BAG SILT FENCE RELIEF
- INLET PROTECTION TYPE (X)
- TOP SOIL, SEED MIXTURE NO. 10, EROSION MAT URBAN CLASS I, TYPE B
- TOP SOIL, SEED MIXTURE NO. 70, EROSION MAT URBAN CLASS I, TYPE B
- TOP SOIL, SOD LAWN
- RIPRAP MEDIUM

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	EROSION CONTROL	SHEET 40	E

2

OAK CREEK COMMUNITY
UNITED METHODIST CHURCH

W. PUETZ RD

S. 13TH STREET (CTH V)

R/L S. 13TH ST

BEGIN PROJECT
2505-03-71
STA. 10+22.60

PI: 10+00.00

1.1 STA 10+84, 22.5' LT
CATCH BASINS 4-FT DIA-57

1.0 STA 10+84, 11.0' LT
MANHOLE 4-FT DIA- Q

1.2 STA 10+84, 22.5' RT
INLETS 2x2.5-57

2.1 STA 13+35, 22.5' LT
INLETS 2x2.5-57

2.0 STA 13+35, 11.0' LT
MANHOLE 4-FT DIA- Q

2.2 STA 13+35, 22.5' RT
CATCH BASINS 4-FT DIA-57

ADJUST MANHOLE

CAUTION

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

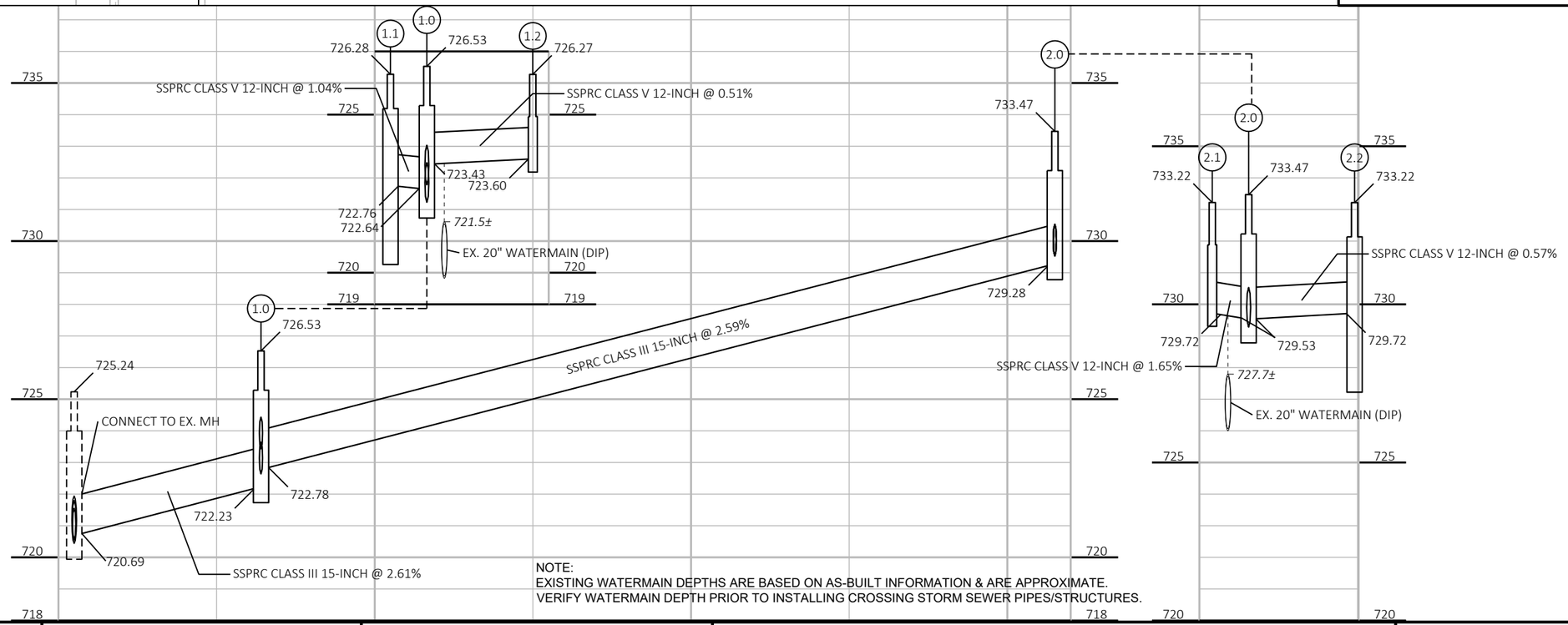
N

9+00 10+00 11+00 12+00 13+00 14+00 15+00

LEGEND

REMOVE MANHOLE OR INLET

REMOVE STORM SEWER OR CULVERT



NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED ON AS-BUILT INFORMATION & ARE APPROXIMATE.
VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 41	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 01
PLOT DATE : 10/25/2023 11:01 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

N

3.1 STA 16+57, 31.3' LT INLETS 2x2.5-57

3.0 STA 16+79, 5.5' LT MANHOLE 4-FT DIA-Q

3.2 STA 16+75, 37.0' RT INLETS 2x2.5-57

4" PVC UNDERDRAIN*

4.1 STA 18+55, 17.0' LT INLETS 2x2.5-57

4.0 STA 18+55, 5.5' LT MANHOLE 4-FT DIA- Q

4.2 STA 18+55, 22.3' RT CATCH BASINS 4-FT DIA-57

5.1 STA 20+90, 17.0' LT INLETS 2x2.5-57

5.0 STA 20+90, 5.5' LT MANHOLE 4-FT DIA- Q

5.2 STA 20+90, 28.0' RT CATCH BASINS 4-FT DIA-57

CAUTION

CAUTION

S. 13TH STREET (CTH V)

RECONSTRUCT MANHOLE

R/L S. 13TH ST

15+00 16+00 17+00 18+00 19+00 20+00 21+00

R/W

TLE

12" CMP

6" BLOCK EDGING W/LANDSCAPING

2' PLASTIC

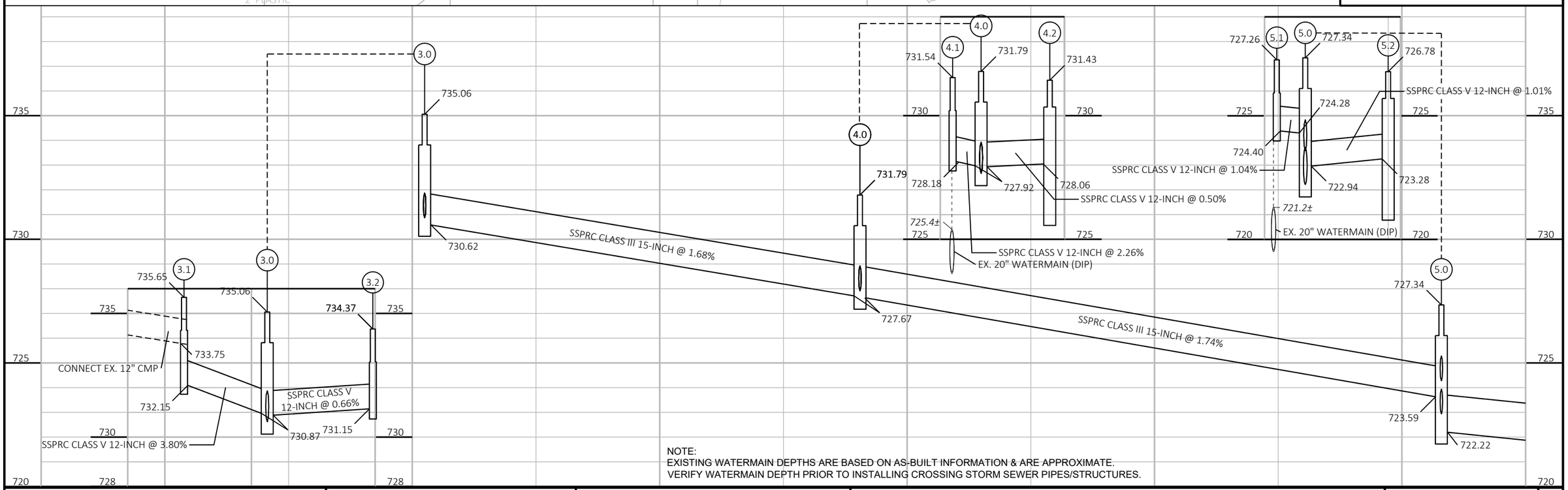
FARM FIELD

"FAITH BAPTIST CHURCH"

LEGEND

REMOVE MANHOLE OR INLET

REMOVE STORM SEWER OR CULVERT



NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED ON AS-BUILT INFORMATION & ARE APPROXIMATE.
VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 42	E

FAITH BAPTIST CHURCH

ASHLEY M. GEORGE
830-9996-001

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

N

6.1 STA 21+97, 35.7' LT
CATCH BASINS 4-FT DIA-57

CONNECT TO EX. 12" CPP WITH 90° ELBOW

7.1 STA 24+00, 17.0' LT
INLETS 2x2.5-57

STA 26+50, 17.0' LT 8.1
INLETS 2x2.5-57

STA 22+00, 5.5' LT
MANHOLE 4-FT DIA-Q 6.0

STA 24+00, 5.5' LT
MANHOLE 4-FT DIA- Q 7.0

STA 26+50, 5.5' LT
MANHOLE 4-FT DIA- Q 8.0

21+00 22+00 23+00 24+00 25+00 26+00 27+00

R/L S. 13TH ST

S. 13TH STREET (CTH V)

RECONSTRUCT MANHOLE

RECONSTRUCT MANHOLE

STA 24+00, 28.0' RT
CATCH BASINS 4-FT DIA-57 7.2

STA 26+50, 28.0' RT
CATCH BASINS 4-FT DIA-57 8.2

4" PVC UNDERDRAIN*

8" PVC UNDERDRAIN*

CAUTION

CAUTION

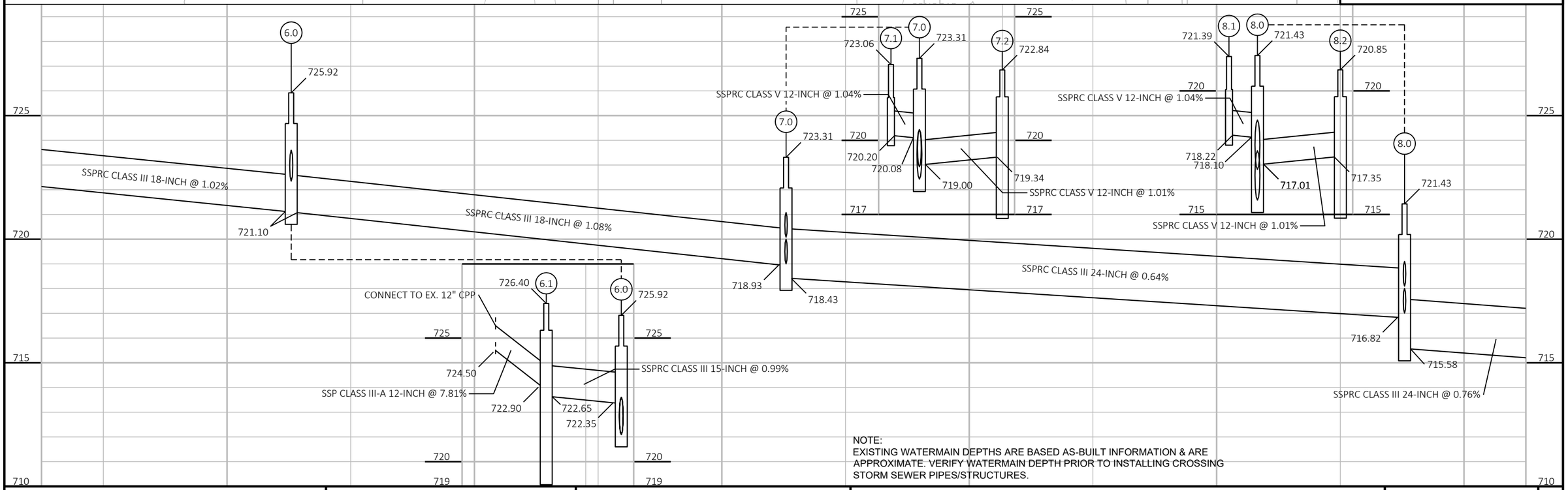
TEMPORARY CONSTRUCTION ENTRANCE

R/W TLE GRASS ASPH FARM FIELD LANDSCAPING W/STONES PORCH HSE #8514 #8506 #8464 #8461 12" BLOCK WALL

LEGEND

REMOVE MANHOLE OR INLET

REMOVE STORM SEWER OR CULVERT



NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 43	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 03
PLOT DATE : 10/25/2023 11:02 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

OAK CREEK WEST MIDDLE SCHOOL

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

** VERIFY EXISTING 24x38-INCH PIPE SIZE & DEPTH PRIOR TO REMOVAL; REMOVE SECTION OF EXISTING 24x38-INCH & INSTALL PROPOSED 36-INCH SSPRC; OFFSET PIPE JOINTS WHERE PROPOSED 24x38-INCH & 36-INCH PIPES CROSS.

N

STA 29+48 , 33.2' LT — APRON ENDWALLS FOR CPRC 15-INCH (INSTALL IN STAGE 2) — 9.3

STA 29+39 , 27.9' LT — APRON ENDWALLS FOR 15-INCH (INSTALL IN STAGE 1) — 910

STA 29+48, 5.5' LT — MANHOLES 5-FT DIA-Q — 9.0

STA 29+48, 17.0' LT — INLETS 2x2.5-57 — 9.1

STA 29+48, 28.0' RT — CATCH BASINS 4-FT DIA-57 — 9.2

STA 29+02 , 31.9' RT — APRON ENDWALLS FOR 15-INCH (INSTALL IN STAGE 1) — 920

STA 31+60, 5.5' LT — MANHOLES 5-FT DIA-Q — 10.0

STA 31+60, 28.0' RT — CATCH BASINS 4-FT DIA-57 — 10.1

STA 32+09, 41.8' LT — INLETS 2x2.5-57 — 10C

STA 32+15, 28.0' LT — CATCH BASINS 4-FT DIA-57 — 10B

STA 32+20, 5.5' LT — MANHOLES 5-FT DIA-Q — 10A

STA 32+65, 36.3' RT — ADJUST MANHOLE — EX 129

27+00 28+00 29+00 30+00 31+00 32+00 33+00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

ADJUST MANHOLE

CONCRETE COLLARS (2)

8'- 24x38-INCH HESSPRC**

CONNECT 4" PVC UNDERDRAIN

4" PVC UNDERDRAIN*

ADJUST INLET

PILGRIM PKWY

LEGEND

- REMOVE MANHOLE OR INLET
- #### REMOVE STORM SEWER OR CULVERT

CULVERT PIPE TEMPORARY 15-INCH @ 10.00% (INSTALL IN STAGE 1)

CULVERT PIPE TEMPORARY 15-INCH @ 4.29% (INSTALL IN STAGE 1)

SSPRC CLASS III 24-INCH @ 0.77%

SSPRC CLASS III 15-INCH @ 13.03% (INSTALL IN STAGE 2)

SSPRC CLASS III 15-INCH @ 1.04%

SSPRC CLASS III 15-INCH @ 1.01%

EX. 20" WATERMAIN (DIP)

SSPRC CLASS III 24-INCH @ 1.49%

SSPRC CLASS V 12-INCH @ 1.01%

SSP CLASS III-A 12-INCH @ 11.10%

SSPRC CLASS V 12-INCH @ 1.00%

24x38-INCH HESSPRC INV=711.90**

SSPRC CLASS III 30-INCH @ 0.69%

SSPRC CLASS III 36-INCH @ 0.26%

NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 44	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 04
PLOT DATE : 10/25/2023 11:02 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

2

830-9001-000

CONCRETE COLLAR (24")

STA 36+08, 68.0' LT
APRON ENDWALLS FOR CPRC 24-INCH (14.1)

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

W. WYNONA DR

ADJUST MANHOLE

4" PVC UNDERDRAIN*

STA 33+98, 36.5' LT
INLETS 2x2.5-57 (11.1)

CONNECT 4" PVC UNDERDRAIN

STA 35+15, 17.0' LT
INLETS 2x2.5-57 (12.2)

STA 35+23, 17.0' LT
INLETS 2x2.5-57 (12.1)

CPRCHE CLASS III 48x76-INCH

STA 34+00, 5.5' LT
MANHOLES 5-FT DIA-Q (11.0)

STA 35+23, 5.5' LT
MANHOLES 6-FT DIA-Q (12.0)

CAUTION

S. 13TH STREET (CTH V)

R/L S. 13TH ST

REMOVE EXISTING 4X4 BOX CULVERT

STA 36+75, 26.9' LT
CATCH BASINS 4-FT DIA-57 (15.2)

STA 36+75, 17.0' RT
CATCH BASINS 4-FT DIA-57 (15.1)

STA 35+11, 22.6' RT
CATCH BASINS 6-FT DIA-57 (12.4)

STA 35+23, 22.2' RT
CATCH BASINS 6-FT DIA-57 (12.3)

ADJUST MANHOLE

STA 34+91, 27.9' RT
MANHOLES 6-FT DIA-Q (13.0)

STA 35+00, 36.5' RT
APRON ENDWALLS FOR CPRC 30-INCH (13.1)

ADJUST EXISTING DRAIN PIPE TO MATCH NEW DITCH (TYP)

STA 35+78, 39.6' RT
APRON ENDWALLS FOR CPRC 36-INCH (12.5)

STA 36+13, 40.9' RT
APRON ENDWALLS FOR CPRC 18-INCH (15.3)

STA 36+75, 38.5' RT
CATCH BASINS 4-FT DIA-57 (15.0)

LEGEND

- REMOVE MANHOLE OR INLET
- REMOVE STORM SEWER OR CULVERT

712.32
713.25
SSPRC CLASS V 12-INCH @ 1.03%
709.55
709.23
706.9±
EX. 20" WATERMAIN (DIP)

SSPRC CLASS III 15-INCH @ 0.50%
712.55
712.80
SSPRC CLASS III 15-INCH @ 1.04%
709.69
709.65
709.53
705.7±
EX. 20" WATERMAIN (DIP)

712.45
712.44
SSPRC CLASS III 15-INCH @ 0.67%
708.63
708.71

CONNECT TO EX. 24" RCP W/CONCRETE COLLAR
706.87
706.98
SSPRC CLASS III 24-INCH @ 1.37%

713.29
713.49
711.94
SSPRC CLASS III 15-INCH @ 0.74%
SSPRC CLASS V 12-INCH @ 1.00%
709.79
709.35
709.10
708.94
SSPRC CLASS III 18-INCH @ 0.51%
708.69
708.37
705.4±
EX. 20" WATERMAIN (DIP)

713.25
707.19
SSPRC CLASS III 36-INCH @ 0.24%
SSPRC CLASS III 36-INCH @ 0.25%

712.80
706.90
SSPRC CLASS III 36-INCH @ 0.25%
706.83
SSPRC CLASS III 36-INCH @ 0.26%
706.68

EX 129
714.32
CONNECT TO EX. MH
48x76-INCH CPRCHE CLASS III
710.64

712.95
SSPRC CLASS III 30-INCH @ 0.71%
SSPRC CLASS III 30-INCH @ 0.71%
709.03
708.94

NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 45	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 05
PLOT DATE : 1/3/2024 4:15 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

2

ADJUST EXISTING DRAIN PIPE TO MATCH NEW DITCH (TYP)

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

CAUTION

STA 44+75, 17.0' LT
INLETS 2x2.5-57
17.1

STA 44+75, 5.5' LT
MANHOLE 4-FT DIA- Q
17.0

STA 44+44, 37.5' RT
APRON ENDWALLS FOR CPRC 15-INCH
17.3

CAUTION

STA 44+75, 34.6' RT
INLETS 2x2.5-57
17.2

ADJUST MANHOLE

RECONSTRUCT MANHOLE

S. 13TH STREET (CTH V)

R/L S. 13TH ST

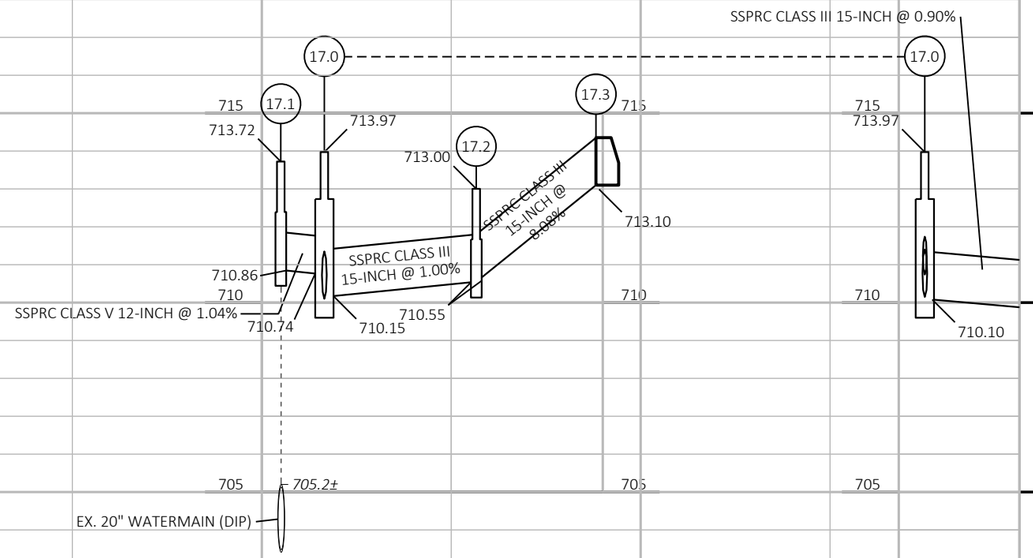
39+00 40+00 41+00 42+00 43+00 44+00 45+00

R/W

TLE

LEGEND

- REMOVE MANHOLE OR INLET
- REMOVE STORM SEWER OR CULVERT



NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 46	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 06
PLOT DATE : 10/25/2023 11:02 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

2

N

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

ADJUST MANHOLE

STA 45+75, 17.0' LT
INLETS 2x2.5-57 (18.1)

CAUTION

STA 48+33, 35.0' LT
APRON ENDWALLS FOR CPRC 12-INCH (19A)

STA 48+76, 35.0' LT
INLETS 2x2.5-57 (19B)

STA 49+09, 35.0' LT
APRON ENDWALLS FOR CPRC 12-INCH (19C)

CPRCHE CLASS III
72x113-INCH

STA 49+58, 17.0' LT
INLETS 2x2.5-57 (20.2)

STA 47+90, 5.5' LT
MANHOLES 4-FT DIA-Q (19.0)

STA 49+50, 17.0' LT
INLETS 2x2.5-57 (20.1)

STA 49+50, 5.5' LT
MANHOLE 4-FT DIA- Q (20.0)

STA 50+27, 5.5' LT
MANHOLES 5-FT DIA- Q (24.0)

STA 45+75, 5.5' LT
MANHOLE 4-FT DIA- Q (18.0)

R/L S. 13TH ST

S. 13TH STREET (CTH V)

CONNECT TO 72x113-INCH CPRCHE WITH CONCRETE COLLARS (MATCH SPRINGLINES)

STA 49+50, 17.0' RT
CATCH BASINS 4-FT DIA-57 (20.3)

STA 49+58, 17.0' RT
CATCH BASINS 4-FT DIA-57 (20.4)

REMOVE EXISTING 4X6 BOX CULVERT

STA 45+75, 27.0' RT
CATCH BASINS 4-FT DIA-57 (18.2)

ADJUST MANHOLE

W. WILDING DR

STA 47+90, 36.8' RT
INLETS 2x2.5-57 (19.1)

WEATHERLY MEADOWS
812-0169-000

LEGEND

- REMOVE MANHOLE OR INLET
- REMOVE STORM SEWER OR CULVERT

712.77 | 18.1 | 18.0 713.02 | 18.2 712.57
SSPRC CLASS V 12-INCH @ 1.04%
709.91
709.79
SSPRC CLASS V 12-INCH @ 0.49%
708.91
709.07

713.02 | 18.0
709.20
SSPRC CLASS III 15-INCH @ 0.90%
708.11

711.89 | 19.0
710.40 | 19.1
SSPRC CLASS V 12-INCH @ 0.52%
707.27
707.49

711.89 | 19.0
707.03
SSPRC CLASS III 15-INCH @ 1.00%
SSPRC CLASS III 24-INCH @ 0.50%

711.01 | 20.1
710.96 | 20.2
711.21 | 20.0
20.4 | 20.3 710.96
711.01
SSPRC CLASS III 15-INCH @ 1.27%
SSPRC CLASS III 15-INCH @ 1.00%
707.93
707.85
707.73
706.76
706.48
706.84
SSPRC CLASS III 15-INCH @ 1.04%
SSPRC CLASS III 24-INCH @ 0.40%

20.0 | 711.21
706.39
705.35
SSPRC CLASS III 24-INCH @ 2.00%

24.0 | 711.46
706.58
704.23
704.14
704.14
SSPRC CLASS III 24-INCH @ 1.36%
702.14
72x113-INCH CPRCHE CLASS III
SSPRC CLASS III 24-INCH @ 1.48%

19B | 710.75
19A
19C
SSPRC CLASS V 12-INCH @ 0.75%
709.06
708.74
SSPRC CLASS V 12-INCH @ 0.77%
708.49

NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 47	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 07
PLOT DATE : 1/5/2024 4:00 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

811-9008-001

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

W. WILLOW DR

S. 13TH STREET (CTH V)

R/L S. 13TH ST

CAUTION

TLE

R/W

STA 52+32, 21.3' LT
CATCH BASINS 4-FT DIA-57 (25.1)

STA 52+32, 5.5' LT
MANHOLES 5-FT DIA-Q (25.0)

STA 52+32, 17.0' RT
CATCH BASINS 4-FT DIA-57 (25.2)

STA 52+32, 44.0' RT
CATCH BASINS 4-FT DIA-57 (25.3)

STA 52+67, 46.7' RT
APRON ENDWALLS FOR CPRC 18-INCH (25.4)

STA 55+00, 17.0' LT
INLETS 2x2.5-57 (26.1)

STA 55+00, 5.5' LT
MANHOLE 4-FT DIA- Q (26.0)

STA 55+00, 17.0' RT
CATCH BASINS 4-FT DIA-57 (26.2)

ADJUST MANHOLE

ADJUST EXISTING DRAIN TO MATCH NEW DITCH (TYP)

LEGEND

REMOVE MANHOLE OR INLET

REMOVE STORM SEWER OR CULVERT

SSPRC CLASS V 12-INCH @ 1.39%

SSPRC CLASS III 18-INCH @ 0.59%

SSPRC CLASS III 18-INCH @ 4.29%

SSPRC CLASS III 18-INCH @ 1.02%

SSPRC CLASS III 15-INCH @ 1.31%

SSPRC CLASS III 15-INCH @ 0.50%

SSPRC CLASS III 24-INCH @ 1.48%

SSPRC CLASS V 12-INCH @ 1.02%

SSPRC CLASS V 12-INCH @ 1.04%

EX. 20" WATERMAIN (DIP)

NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 48	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 08
PLOT DATE : 10/25/2023 11:03 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

2

* CONNECT PRIVATE DRAIN PIPES WITH UNDERDRAIN PIPE & CLEANOUTS (SEE DETAIL)

N

W. DREXEL AVE

W. DREXEL AVE

END PROJECT
2505-03-71
STA. 61+34.50

R/L S. 13TH ST

S. 13TH STREET (CTH V)

27.1 STA 57+75, 25.9' LT INLETS 2x2.5-57

27.0 STA 57+75, 2.4' LT MANHOLES 4-FT DIA- Q

27.2 STA 57+75, 17.0' RT INLETS 2x2.5-57

28.2 STA 60+55, 30.0' LT CATCH BASINS 4-FT DIA-57

28.1 STA 60+63, 30.0' LT CATCH BASINS 4-FT DIA-57

28.0 STA 60+63, 6.0' LT MANHOLE 4-FT DIA- Q

28.3 STA 60+63, 20.6' RT CATCH BASINS 4-FT DIA-57

28.4 STA 60+71, 21.6' RT CATCH BASINS 4-FT DIA-57

ADJUST EXISTING DRAIN PIPE TO MATCH NEW DITCH (TYP)

12" CINDER BLOCK WALL

8" BLOCK WALL

5" STONE RIP RAP

8" STONE RIP RAP

LEGEND

REMOVE MANHOLE OR INLET

REMOVE STORM SEWER OR CULVERT

725 720 715 710

27.0 722.40

27.1 721.91

27.2 722.09

SSPRC CLASS V 12-INCH @ 1.02%

SSPRC CLASS V 12-INCH @ 2.17%

718.41 718.17 718.59

715.96

SSPRC CLASS III 15-INCH @ 0.50%

28.0 721.85

717.41

28.2 721.35 28.1 721.35 28.0 721.85 28.3 721.53 28.4 721.52

SSPRC CLASS III 15-INCH @ 0.50%

SSPRC CLASS III 15-INCH @ 1.00%

SSPRC CLASS III 15-INCH @ 0.50%

717.94 717.90 717.78 717.42 717.77 717.69

SSPRC CLASS III 15-INCH @ 1.02%

714.2±

EX. 20" WATERMAIN (DIP)

NOTE:
EXISTING WATERMAIN DEPTHS ARE BASED AS-BUILT INFORMATION & ARE APPROXIMATE. VERIFY WATERMAIN DEPTH PRIOR TO INSTALLING CROSSING STORM SEWER PIPES/STRUCTURES.

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	STORM SEWER	SHEET 49	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SS1.DWG
LAYOUT NAME - 09
PLOT DATE : 10/25/2023 11:03 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 41

2

PAVEMENT MARKING LEGEND

- WS4 — MARKING LINE EPOXY 4-INCH (SKIPS) WHITE, 12.5FT LINE, 37.5 FT GAP
- W8 — MARKING LINE EPOXY 8-INCH WHITE
- WD4 — MARKING LINE EPOXY 4-INCH (DASHES) WHITE, 3FT LINE, 9 FT GAP
- WD8 — MARKING LINE EPOXY 8-INCH (DASHES) WHITE, 3FT LINE, 9 FT GAP
- 2Y4 — MARKING LINE EPOXY 4-INCH DOUBLE YELLOW
- C6 — MARKING LINE EPOXY 6-INCH WHITE, CROSSWALK
- W4 — MARKING LINE EPOXY 4-INCH WHITE
- Y4 — MARKING LINE EPOXY 4-INCH YELLOW
- W12 — MARKING LINE EPOXY 12-INCH WHITE
- Y12 — MARKING LINE EPOXY 12-INCH YELLOW
- S18 — MARKING LINE EPOXY 18-INCH WHITE, STOP BAR
- MARKING ARROW EPOXY
- ONLY — MARKING WORD EPOXY

SIGN LEGEND

- EXISTING SIGN MOUNTED ON POST(S)
- EXISTING SIGN MOUNTED ON SIGNAL OR STRUCTURE
- PROPOSED SIGN MOUNTED ON POST(S)
- PROPOSED SIGN MOUNTED ON SIGNAL OR STRUCTURE
- XXX — DENOTES SIGN NUMBER
- (X) INDICATES SIGN SIZE

NOTES
-EXISTING STREET NAME SIGNS NOT LOCATED ON SIGNAL POLES ARE MUNICIPAL OWNED AND ARE TO BE REMOVED AND RE-INSTALLED BY OTHERS.
-ANY SIGNS NOT CALLED OUT FOR REMOVAL SHALL REMAIN UNLESS OTHERWISE INSTRUCTED BY THE ENGINEER.

2

2

MATCH LINE 15+00

MATCH LINE 21+00

S. 13TH STREET (CTH V)

W. PUETZ RD

MATCH EXISTING

INSTALL ON SIGNAL POLE

R1-1F 30"X30"

REMOVE

FROM SIGNAL POLE

Puetz Rd

R2-1 24"X30"

INSTALL PERMANENT FLAGS FOLLOW SDD A4-15

M3-1 24"X12"

M1-5A 24"X24"

W6-1 36"X36"

R3-8LF 36"X30"

W3-3 36"X36"

R7-1R 18"X24"

R5-1 30"X30"

S5-2 24"X30"

R7-1D 18"X24"

R7-1L 18"X24"

S1-1 36"X36"

S16-9P 30"X18"

R2-6P 24"X18"

S4-51 24"X48"

R4-7 24"X30"

INSTALL ON FLASHER POLE

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVEMENT MARKING AND SIGNING	SHEET 51	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PM.DWG
LAYOUT NAME - 01

PLOT DATE : 9/27/2023 10:27 AM PLOT BY : VIRK, PARWINDER PLOT NAME : PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44

2

MATCH LINE 21+00

MATCH LINE 27+00

MATCH LINE 27+00

MATCH LINE 33+00

S. 13TH STREET (CTH V)

S. 13TH STREET (CTH V)

S. 13TH STREET (CTH V)

S. 13TH STREET (CTH V)

MARKING ISLAND NOSE EPOXY

YELLOW MARKING ON FLAT SURFACE (SEE SDD 15C18-05B FOR CONCRETE CORRUGATED MEDIAN)

MARKING ISLAND NOSE EPOXY

BY OTHERS - CITY OF OAK CREEK (ON SIGNAL ARM)

PILGRIM PKWY

MOVE EXISTING

MOVE EXISTING

EXISTING SIGN TO REMAIN

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVEMENT MARKING AND SIGNING	SHEET 52 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PM.DWG
LAYOUT NAME - 02
PLOT DATE : 9/27/2023 10:27 AM
PLOT BY : VIRK, PARWINDER
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44

MATCH LINE 33+00

INSTALL ON FLASHER POLE

3.01 NO PARKING ANY TIME R7-1D 18"X24"

3.02 SCHOOL SPEED LIMIT 15 WHEN CHILDREN ARE PRESENT S4-51 24"X48"

3.03 FINES HIGHER REMOVE

STOP REMOVE

3.04 STOP R1-1 30"X30"

3.05 WEIGHT LIMIT 3 TONS R12-1 24"X30"

WEIGHT LIMIT 3 TONS REMOVE

3.06 REMOVE

3.07 AHEAD REMOVE

3.08 NO PARKING ANY TIME R7-1L 18"X24"

3.09 S1-1 36"X36"

3.10 AHEAD S16-9P 30"X18"

3.11 FINES HIGHER R2-6P 24"X18"

3.12 W6-2 36"X36"

3.13 NO PARKING ANY TIME R7-1D 18"X24"

3.14 REMOVE

3.15 SPEED LIMIT 35 R2-1 24"X30"

3.16 END SCHOOL ZONE S5-2 24"X30"

3.17 NO PARKING ANY TIME R7-1R 18"X24"

S. WYNONA DR

S. 13TH STREET (CTH V)

MARKING ISLAND NOSE EPOXY

YELLOW MARKING ON FLAT SURFACE (SEE SDD 15C18-05B FOR CONCRETE CORRUGATED MEDIAN)

MARKING ISLAND NOSE EPOXY

MATCH LINE 39+00

3.18 SPEED LIMIT 40 REMOVE

SPEED LIMIT 35 R2-1 24"X30"

3.19 SPEED LIMIT 35 R2-1 24"X30"

SPEED LIMIT 40 REMOVE

3.20 END SCHOOL ZONE REMOVE

S. 13TH STREET (CTH V)

MATCH LINE 45+00

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVEMENT MARKING AND SIGNING	SHEET 53	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PM.DWG
LAYOUT NAME - 03
PLOT DATE : 9/27/2023 10:27 AM
PLOT BY : VIRK, PARWINDER
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44

2

MATCH LINE 45+00

MATCH LINE 51+00

S. 13TH STREET (CTH V)

S. 13TH STREET (CTH V)

W WILDING DR

EXISTING SIGN TO REMAIN

MATCH LINE 51+00

MATCH LINE 57+00

S. 13TH STREET (CTH V)

S. 13TH STREET (CTH V)

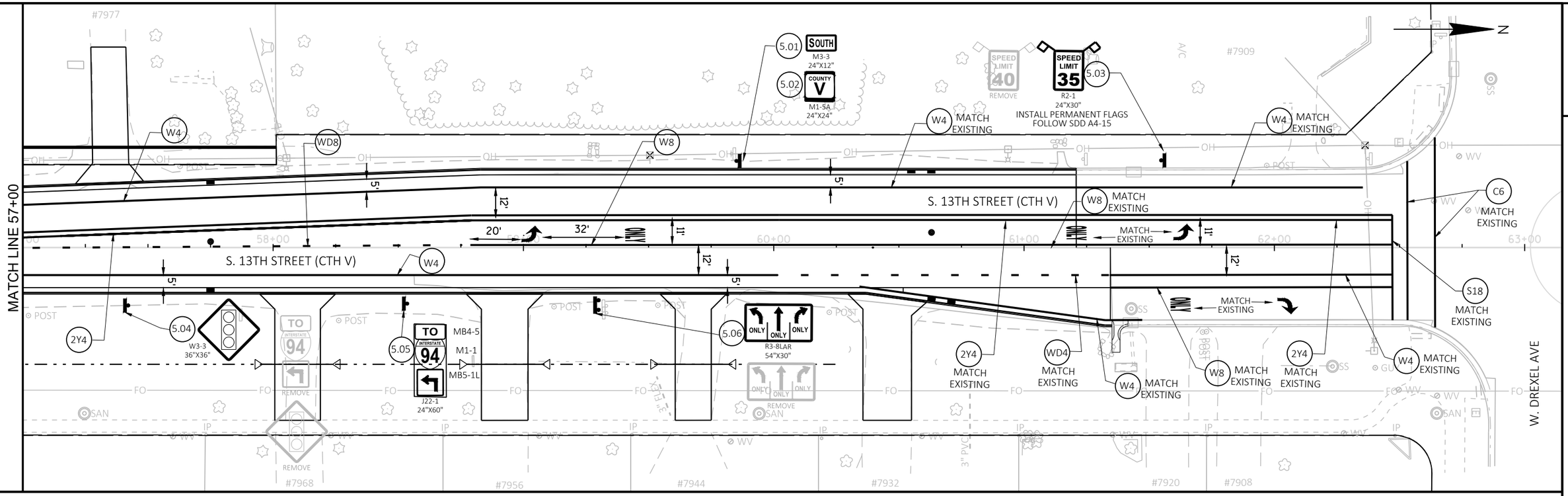
W WILLOW DR

W WILLOW DR

EXISTING SIGN TO REMAIN

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVEMENT MARKING AND SIGNING	SHEET 54 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PM.DWG
LAYOUT NAME - 04
PLOT DATE : 9/27/2023 10:27 AM
PLOT BY : VIRK, PARWINDER
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44



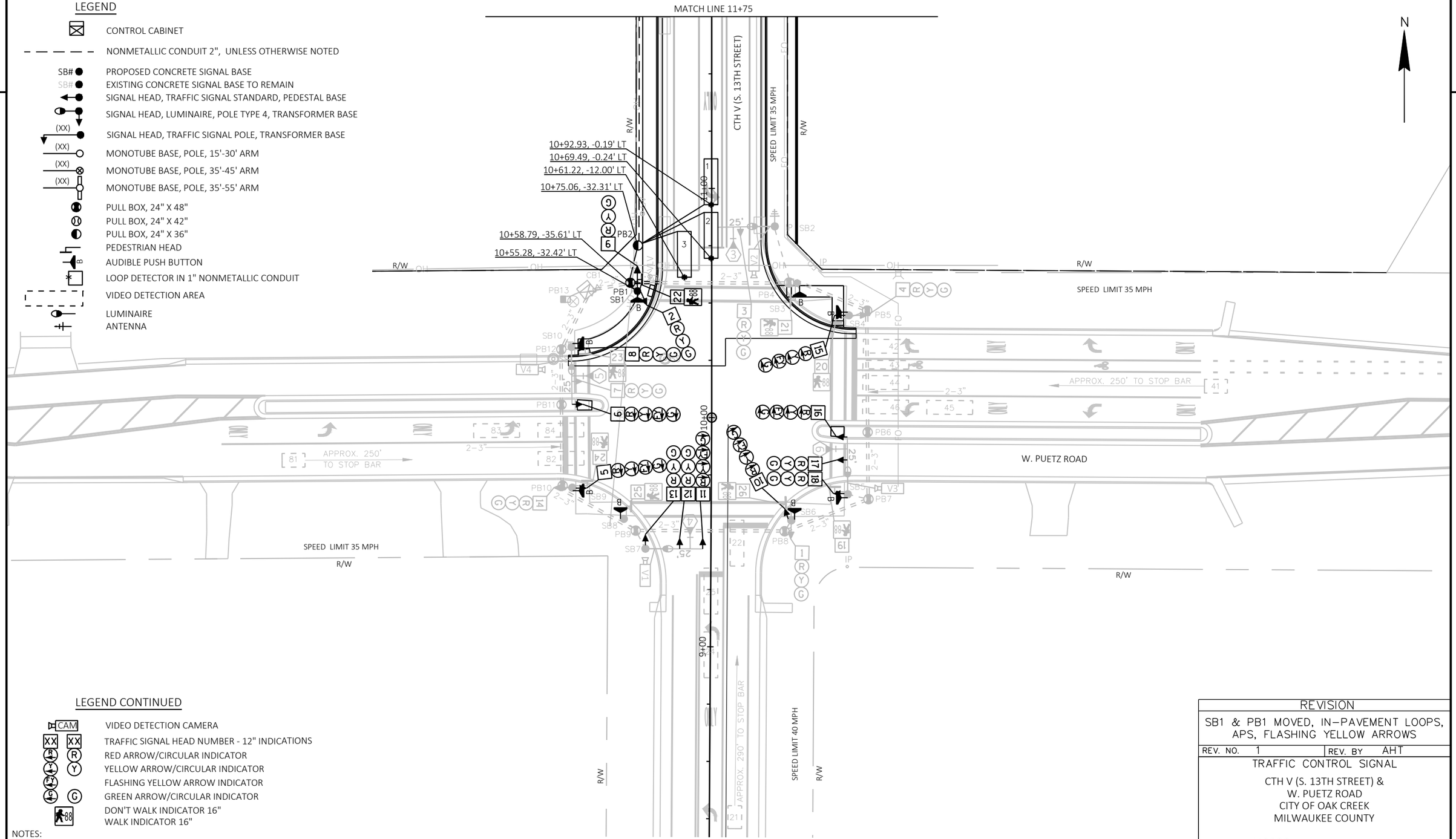
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PAVEMENT MARKING AND SIGNING	SHEET 55	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PM.DWG
LAYOUT NAME - 05
PLOT DATE : 9/27/2023 10:28 AM PLOT BY : VIRK, PARWINDER PLOT NAME : PLOT SCALE : 1 IN:40 FT

2

LEGEND

- CONTROL CABINET
- NONMETALLIC CONDUIT 2", UNLESS OTHERWISE NOTED
- SB# ● PROPOSED CONCRETE SIGNAL BASE
- SB# ● EXISTING CONCRETE SIGNAL BASE TO REMAIN
- SIGNAL HEAD, TRAFFIC SIGNAL STANDARD, PEDESTAL BASE
- SIGNAL HEAD, LUMINAIRE, POLE TYPE 4, TRANSFORMER BASE
- (XX) SIGNAL HEAD, TRAFFIC SIGNAL POLE, TRANSFORMER BASE
- (XX) MONOTUBE BASE, POLE, 15'-30' ARM
- (XX) MONOTUBE BASE, POLE, 35'-45' ARM
- (XX) MONOTUBE BASE, POLE, 35'-55' ARM
- PULL BOX, 24" X 48"
- PULL BOX, 24" X 42"
- PULL BOX, 24" X 36"
- PEDESTRIAN HEAD
- AUDIBLE PUSH BUTTON
- LOOP DETECTOR IN 1" NONMETALLIC CONDUIT
- VIDEO DETECTION AREA
- LUMINAIRE
- ANTENNA



LEGEND CONTINUED

- CAM VIDEO DETECTION CAMERA
- XX XX TRAFFIC SIGNAL HEAD NUMBER - 12" INDICATIONS
- R RED ARROW/CIRCULAR INDICATOR
- Y YELLOW ARROW/CIRCULAR INDICATOR
- FY FLASHING YELLOW ARROW INDICATOR
- G GREEN ARROW/CIRCULAR INDICATOR
- DON'T WALK INDICATOR 16"
- WALK INDICATOR 16"

NOTES:

- GRAYSHADE REPRESENTS EXISTING
- INTERCEPT EXISTING CONDUITS FOR PROPOSED PB1
- REMOVE AND RELOCATE EXISTING SB1 SIGNAL POLE WITH ATTACHMENTS TO PROPOSED SB1
- NOTIFY THE MCDOT TRAFFIC ENGINEER, DANIEL MURPHY AT 414-257-5942 FIVE WORKING DAYS PRIOR TO INSTALLING SIGNAL HEADS FOR CONTROLLER PROGRAMMING AND CABINET MODIFICATION.

REVISION
SB1 & PB1 MOVED, IN-PAVEMENT LOOPS, APS, FLASHING YELLOW ARROWS
REV. NO. 1 — REV. BY AHT

TRAFFIC CONTROL SIGNAL

CTH V (S. 13TH STREET) &
W. PUETZ ROAD
CITY OF OAK CREEK
MILWAUKEE COUNTY

SIGNAL NO. MC092

MILWAUKEE COUNTY DOT

PAGE 1 OF 4

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC SIGNAL PLAN	SHEET 56	E

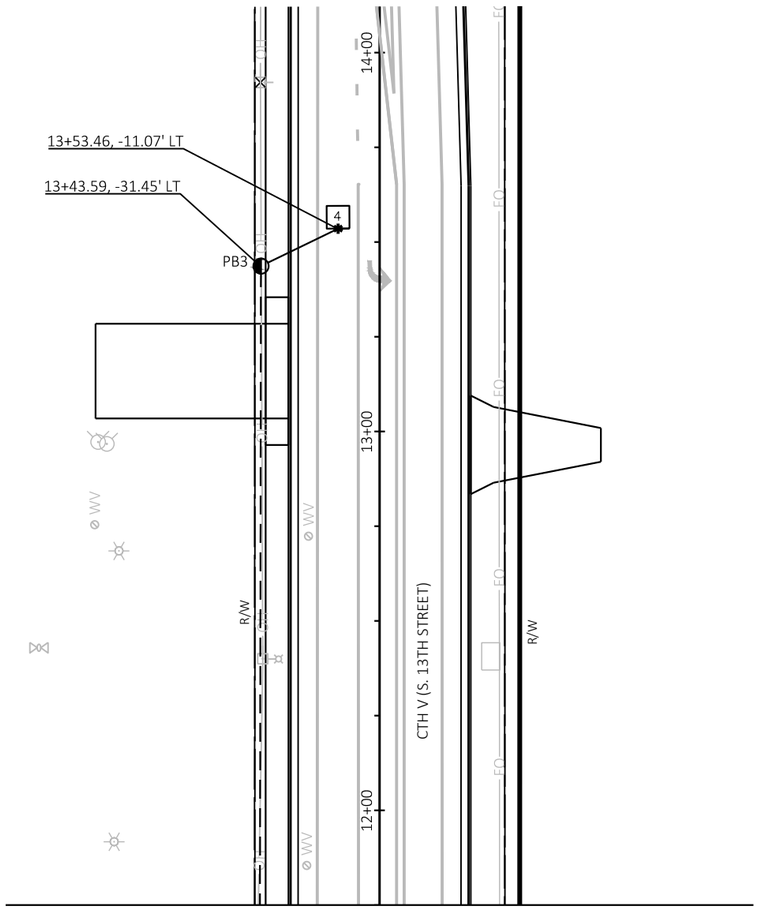
FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SIG.DWG
LAYOUT NAME - 01
PLOT DATE : 9/27/2023 9:49 AM
PLOT BY : MURPHY, DANIEL
PLOT NAME :
PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 42

2

LEGEND

- CONTROL CABINET
- NONMETALLIC CONDUIT 2", UNLESS OTHERWISE NOTED
- SB# ● PROPOSED CONCRETE SIGNAL BASE
- SB# ● EXISTING CONCRETE SIGNAL BASE TO REMAIN
- SIGNAL HEAD, TRAFFIC SIGNAL STANDARD, PEDESTAL BASE
- SIGNAL HEAD, LUMINAIRE, POLE TYPE 4, TRANSFORMER BASE
- (XX) SIGNAL HEAD, TRAFFIC SIGNAL POLE, TRANSFORMER BASE
- (XX) MONOTUBE BASE, POLE, 15'-30' ARM
- (XX) MONOTUBE BASE, POLE, 35'-45' ARM
- (XX) MONOTUBE BASE, POLE, 35'-55' ARM
- PULL BOX, 24" X 48"
- PULL BOX, 24" X 42"
- PULL BOX, 24" X 36"
- PEDESTRIAN HEAD
- B PUSH BUTTON
- LOOP DETECTOR IN 1" NONMETALLIC CONDUIT
- VIDEO DETECTION AREA
- LUMINAIRE
- ANTENNA



N

2

LEGEND CONTINUED

- CAM VIDEO DETECTION CAMERA
- XX XX TRAFFIC SIGNAL HEAD NUMBER - 12" INDICATIONS
- R RED ARROW/CIRCULAR INDICATOR
- Y YELLOW ARROW/CIRCULAR INDICATOR
- FY FLASHING YELLOW ARROW INDICATOR
- G GREEN ARROW/CIRCULAR INDICATOR
- DON'T WALK INDICATOR 16"
- WALK INDICATOR 16"

NOTES:

- GRAYSHADE REPRESENTS EXISTING
- INTERCEPT EXISTING CONDUITS FOR PROPOSED PB1
- REMOVE AND RELOCATE EXISTING SB1 SIGNAL POLE WITH ATTACHMENTS TO PROPOSED SB1
- NOTIFY THE MCDOT TRAFFIC ENGINEER, DANIEL MURPHY AT 414-257-5942 FIVE WORKING DAYS PRIOR TO INSTALLING SIGNAL HEADS FOR CONTROLLER PROGRAMMING AND CABINET MODIFICATION.

REVISION

SB1 & PB1 MOVED, IN-PAVEMENT LOOPS, APS, FLASHING YELLOW ARROWS

REV. NO. 1 | REV. BY AHT

TRAFFIC CONTROL SIGNAL

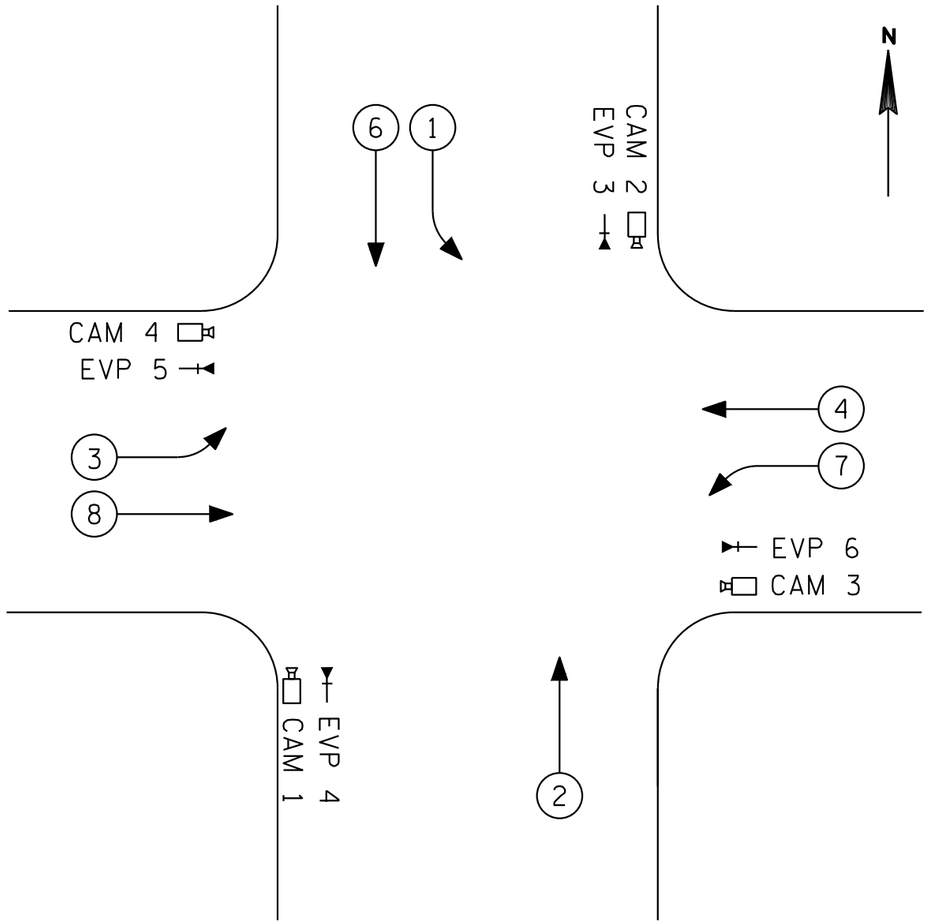
CTH V (S. 13TH STREET) &
W. PUETZ ROAD
CITY OF OAK CREEK
MILWAUKEE COUNTY

SIGNAL NO. MC092

MILWAUKEE COUNTY DOT

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC SIGNAL PLAN	SHEET 57	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SIG.DWG
LAYOUT NAME - 02
PLOT DATE : 9/27/2023 9:49 AM PLOT BY : MURPHY, DANIEL PLOT NAME : PLOT SCALE : 1 IN:40 FT



PHASES				OVERLAPS		
PHASE	VEHICLE	LEFT TURN TYPE	PED	OVLP	INCLUDES	OUTPUT
1	X	FYA		A		
2	X		X	B		
3	X	FYA		C		
4	X		X	D		
5				E	1 FY	9 Y
6	X		X	F	3 FY	10 Y
7	X	FYA		G		
8	X		X	H	7 FY	12 Y

COMMUNICATION	
ETHERNET SWITCH	X
SM FIBER	
MM FIBER	
5.8 GHZ RADIO	X
900 MHZ ETHERNET RADIO	
900 MHZ SERIAL RADIO	
ETHERNET OVER COPPER	

PRE-EMPTION	
EMERGENCY VEHICLE	X
CONFIRMATION BEACONS	
RAILROAD	

AUXILARY EQUIPMENT	
LIGHTING FROM CABINET	X
BATTERY BACKUP	
PTZ CAMERA	
AUDIBLE PEDESTRIAN HEADS	
AUDIBLE PEDESTRIAN BUTTONS	X
-APS USING SDLC	

REVISION

SB1 & PB1 MOVED, IN-PAVEMENT LOOPS, APS, FLASHING YELLOW ARROWS

REV. NO. 1 REV. BY AHT

TRAFFIC CONTROL SIGNAL

CTH V (S. 13TH STREET) &
W. PUETZ ROAD
CITY OF OAK CREEK
MILWAUKEE COUNTY

SIGNAL NO. MC092

MILWAUKEE COUNTY DOT

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC SIGNAL PLAN	SHEET 58	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SIG.DWG
LAYOUT NAME - 03
PLOT DATE : 9/27/2023 9:49 AM PLOT BY : MURPHY, DANIEL PLOT NAME : PLOT SCALE : ##########
WISDOT/CADDS SHEET 42

PROJECT ID:	2505-03-71
INTERSECTION:	CTH V (S. 13TH STREET) & W. PUETZ ROAD

SIGNAL WIRE COLOR CODING	BLK-BLACK	RED-RED	GRN-GREEN
	WHT-WHITE	BLU-BLUE	ORG-ORANGE

				SIGNAL INDICATION WIRE COLOR									PED BUTTONS	
CB1 TO	# OF COND.	HEAD NO.	PHASE	RED	YELLOW	GREEN	<RED>	<YELLOW>	<FL YLW>	<GREEN>	D/WALK	WALK		
SB1	*12	2	2	RED	ORG	GRN								
		9	6	RED/BLK	ORG/BLK	GRN/BLK								
		22	4P								BLK	BLU		
		B	4P										WHT/BLK	BLK/WHT
SB2	*12	3	2	RED	ORG	GRN								
SB3	*12	21	4P								BLK	BLU		
		B	4P										WHT/BLK	BLK/WHT
SB4	*12	4	4	RED	ORG	GRN								
		15	3				RED/BLK	ORG/BLK	BLU/BLK	GRN/BLK				
		20	2P								BLK	BLU		
		B	2P										WHT/BLK	BLK/WHT
SB5	*12	17	8	RED	ORG	GRN								
		18	8	RED	ORG	GRN								
		16	3				RED/BLK	ORG/BLK	BLU/BLK	GRN/BLK				
		19	2P								BLK	BLU		
		B	2P										WHT/BLK	BLK/WHT
SB6	*12	1	2	RED	ORG	GRN								
		10	1				RED/BLK	ORG/BLK	BLU/BLK	GRN/BLK				
		26	8P								BLK	BLU		
		B	8P										WHT/BLK	BLK/WHT
SB7	*12	12	6	RED	ORG	GRN								
		13	6	RED	ORG	GRN								
		11	1				RED/BLK	ORG/BLK	BLU/BLK	GRN/BLK				
SB8	*12	25	8P								BLK	BLU		
		B	8P										WHT/BLK	BLK/WHT
SB9	*12	14	8	RED	ORG	GRN								
		5	7				RED/BLK	ORG/BLK	BLU/BLK	GRN/BLK				
		24	6P								BLK	BLU		
		B	6P										WHT/BLK	BLK/WHT
SB10	*12	7	4	RED	ORG	GRN								
		8	4	RED	ORG	GRN								
		6	7				RED/BLK	ORG/BLK	BLU/BLK	GRN/BLK				
		23	6P								BLK	BLU		
		B	6P										WHT/BLK	BLK/WHT

NOTES:
1. DO NOT USE THE WHITE CONDUCTOR IN THE SIGNAL CABLE AS THE GROUNDED CONDUCTOR FOR SIGNAL INDICATIONS.
2. ENSURE THE GROUNDED CONDUCTOR IN THE FEEDER CABLE AND THE POLE CABLES ARE BOTH 18" LONGER THAN THE UNGROUNDED CONDUCTORS.
* EXISTING SIGNAL WIRING TO REMAIN.

REVISION
SB1 & PB1 MOVED, IN-PAVEMENT LOOPS, APS, FLASHING YELLOW ARROWS
REV. NO. 1 REV. BY AHT

TRAFFIC CONTROL SIGNAL
CTH V (S. 13TH STREET) &
W. PUETZ ROAD
CITY OF OAK CREEK
MILWAUKEE COUNTY

SIGNAL NO. MC092

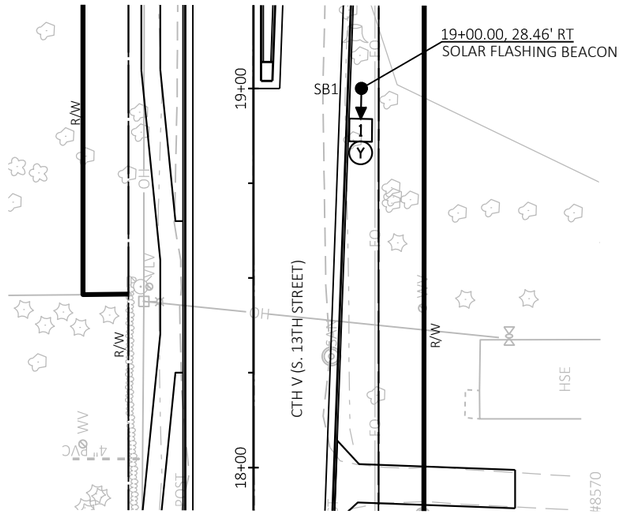
MILWAUKEE COUNTY DOT

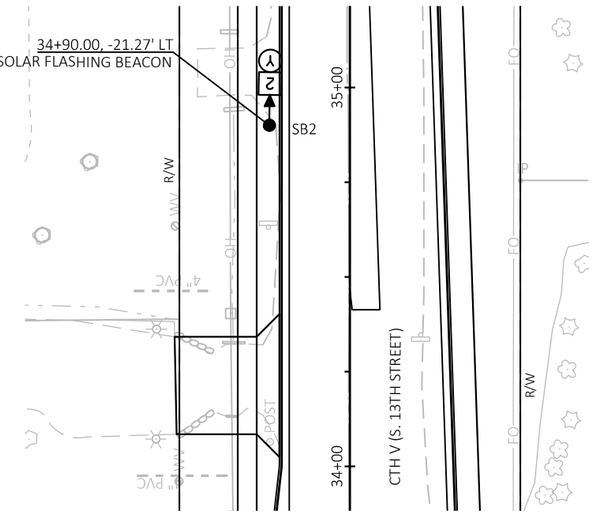
PAGE 4 OF 4

2

LEGEND

- CONTROL CABINET
- NONMETALLIC CONDUIT 2", UNLESS OTHERWISE NOTED
- SB# ● PROPOSED CONCRETE SIGNAL BASE
- SB# ● EXISTING CONCRETE SIGNAL BASE TO REMAIN
- SIGNAL HEAD, TRAFFIC SIGNAL STANDARD, PEDESTAL BASE
- SIGNAL HEAD, LUMINAIRE, POLE TYPE 4, TRANSFORMER BASE
- (XX) SIGNAL HEAD, TRAFFIC SIGNAL POLE, TRANSFORMER BASE
- (XX) MONOTUBE BASE, POLE, 15'-30' ARM
- (XX) MONOTUBE BASE, POLE, 35'-45' ARM
- (XX) MONOTUBE BASE, POLE, 35'-55' ARM
- PULL BOX, 24" X 42"
- PULL BOX, 24" X 36"
- PEDESTRIAN HEAD
- PUSH BUTTON
- LOOP DETECTOR IN 1" NONMETALLIC CONDUIT
- VIDEO DETECTION AREA
- LUMINAIRE
- ANTENNA





N

2

LEGEND CONTINUED

- CAM VIDEO DETECTION CAMERA
- XX XX TRAFFIC SIGNAL HEAD NUMBER - 12" INDICATIONS
- R RED ARROW/CIRCULAR INDICATOR
- Y YELLOW ARROW/CIRCULAR INDICATOR
- FY FLASHING YELLOW ARROW INDICATOR
- G GREEN ARROW/CIRCULAR INDICATOR
- DON'T WALK INDICATOR 16"
- WALK INDICATOR 16"

NOTES:

- GRAYSHADE REPRESENTS EXISTING
- NOTIFY THE MCDOT TRAFFIC ENGINEER, DANIEL MURPHY AT 414-257-5942 FIVE WORKING DAYS PRIOR TO FINAL INSTALLATION FOR TIMING INPUT

FLASHING BEACON PLAN

CTH V (S. 13TH STREET) &
STA 19+00, STA 34+90
CITY OF OAK CREEK
MILWAUKEE COUNTY

SIGNAL NO. MCF7

MILWAUKEE COUNTY DOT

PAGE 1 OF 1

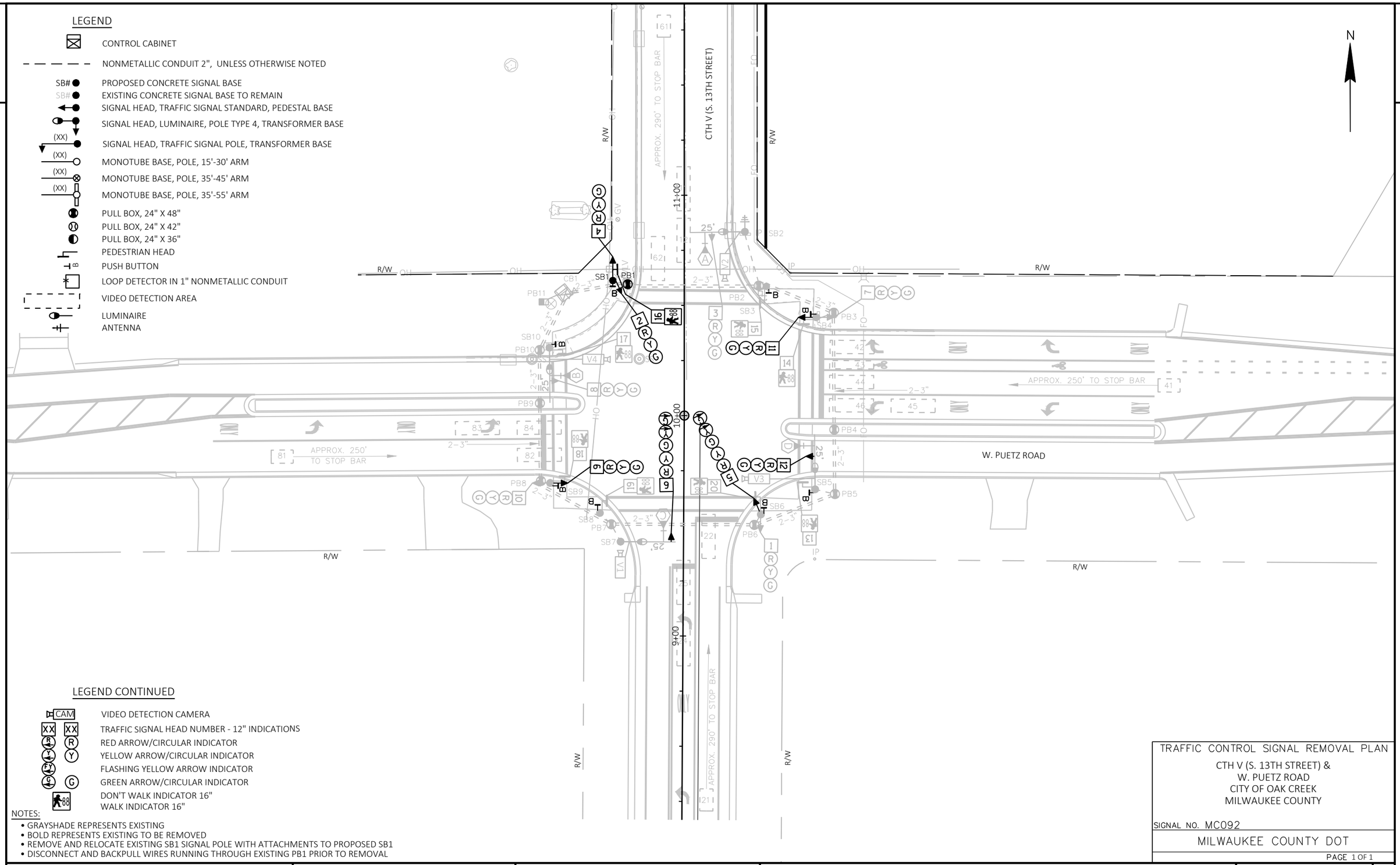
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	FLASHING BEACON PLAN	SHEET 60	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SIG2.DWG
LAYOUT NAME - 01
PLOT DATE : 7/21/2023 1:49 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : 1 IN:40 FT

2

LEGEND

- CONTROL CABINET
- NONMETALLIC CONDUIT 2", UNLESS OTHERWISE NOTED
- SB# ● PROPOSED CONCRETE SIGNAL BASE
- SB# ● EXISTING CONCRETE SIGNAL BASE TO REMAIN
- SIGNAL HEAD, TRAFFIC SIGNAL STANDARD, PEDESTAL BASE
- SIGNAL HEAD, LUMINAIRE, POLE TYPE 4, TRANSFORMER BASE
- (XX) SIGNAL HEAD, TRAFFIC SIGNAL POLE, TRANSFORMER BASE
- (XX) MONOTUBE BASE, POLE, 15'-30' ARM
- (XX) MONOTUBE BASE, POLE, 35'-45' ARM
- (XX) MONOTUBE BASE, POLE, 35'-55' ARM
- PULL BOX, 24" X 48"
- PULL BOX, 24" X 42"
- PULL BOX, 24" X 36"
- PEDESTRIAN HEAD
- B PUSH BUTTON
- LOOP DETECTOR IN 1" NONMETALLIC CONDUIT
- VIDEO DETECTION AREA
- LUMINAIRE
- ANTENNA



LEGEND CONTINUED

- CAM VIDEO DETECTION CAMERA
- XX XX TRAFFIC SIGNAL HEAD NUMBER - 12" INDICATIONS
- R RED ARROW/CIRCULAR INDICATOR
- Y YELLOW ARROW/CIRCULAR INDICATOR
- FY FLASHING YELLOW ARROW INDICATOR
- G GREEN ARROW/CIRCULAR INDICATOR
- DON'T WALK INDICATOR 16"
- WALK INDICATOR 16"

NOTES:

- GRAYSHADE REPRESENTS EXISTING
- BOLD REPRESENTS EXISTING TO BE REMOVED
- REMOVE AND RELOCATE EXISTING SB1 SIGNAL POLE WITH ATTACHMENTS TO PROPOSED SB1
- DISCONNECT AND BACKPULL WIRES RUNNING THROUGH EXISTING PB1 PRIOR TO REMOVAL

TRAFFIC CONTROL SIGNAL REMOVAL PLAN

CTH V (S. 13TH STREET) &
W. PUETZ ROAD
CITY OF OAK CREEK
MILWAUKEE COUNTY

SIGNAL NO. MC092

MILWAUKEE COUNTY DOT

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC SIGNAL REMOVAL PLAN	SHEET 61	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_SIG_REM.DWG
LAYOUT NAME - 01
PLOT DATE : 9/26/2023 1:40 PM
PLOT BY : THORNBURG, ALEX
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 42

2

GENERAL NOTES:

DETOUR WILL BE IN PLACE DURING THE DURATION OF THE PROJECT. TRAFFIC ON S. 13TH ST (CTH V) FROM DREXEL TO PUETZ WILL BE CLOSED TO THRU TRAFFIC FOR THE DURATION OF THE PROJECT. LOCAL ROAD CROSSINGS WITHIN THE PROJECT LIMITS WILL BE STAGED NON-CONCURRENTLY TO MIMIMIZE IMPACTS TO LOCAL CROSS-STREET TRAFFIC. ACCESS TO RESIDENCES AND BUSINESSES MUST BE MAINTAINED AT ALL TIMES.

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

IF THERE ARE EXISTING ROUTE MARKERS ASSEMBLIES THAT WILL REMAIN IN PLACE, ADJUST THE LOCATION OF THE DETOUR ROUTE SIGNS TO CORRESPOND WITH THE EXISTING ASSEMBLIES.

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

TRAFFIC CONTROL AND DETOUR SIGNS CANNOT BE PLACED WITHIN 50 FEET OF RAILROAD RIGHT-OF-WAY.

REMOVE OR COVER ANY SIGNS TEMPORARY OR EXISTING WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" AS NEEDED AND APPROVED BY THE ENGINEER.

"MO" SIGNS ARE THE SAME AS "M" SIGN EXCEPT THE BACKGROUND IS ORANGE.

FIXED MESSAGE SIGNS (FMS): SEE TEMPORARY SIGNING SHEET

LEGEND:

- PROJECT I.D. 2505-03-71 WORK ZONE
- DETOUR ROUTE
- SIGN ON FIXED SUPPORT(S)
- (#) SIGN NUMBER
- TRAFFIC FLOW ARROW

① DETOUR M4-8 24"x12" / NORTH M3-1 24"x12" / COUNTY M1-5A 24"x24" / S 13TH ST FMS 5 42"X12"

② DETOUR M4-8 36"X18" / NORTH M3-1 36"X18" / COUNTY M1-5A 36"X36" / S 13TH ST FMS 6 54"X15"

③ DETOUR M4-8 24"x12" / SOUTH M3-3 24"x12" / COUNTY M1-5A 24"x24" / S 13TH ST FMS 5 42"X12"

④ DETOUR M4-8 36"X18" / SOUTH M3-3 36"X18" / COUNTY M1-5A 36"X36" / S 13TH ST FMS 6 54"X15"

⑤ NORTH M3-1 24"x12" / COUNTY M1-5A 24"x24" / S 13TH ST FMS 5 42"X12" / DETOUR AHEAD W20-2-A 36"X36"

⑥ SOUTH M3-3 24"x12" / COUNTY M1-5A 24"x24" / S 13TH ST FMS 5 42"X12" / DETOUR AHEAD W20-2-A 36"X36"

⑦ END DETOUR M4-8A 24"X18" / NORTH M3-1 24"x12" / COUNTY M1-5A 24"x24" / FMS 5 / S 13TH ST / 42"X12"

⑧ END DETOUR M4-8A 24"X18" / SOUTH M3-3 24"x12" / COUNTY M1-5A 24"x24" / FMS 6 / S 13TH ST / 54"X15"

Ⓐ M06-1 21"x21"

Ⓑ M05-1L 21"x21"

Ⓒ M06-1 21"x21"

Ⓓ M05-1R 21"x21"

Ⓔ M06-1 21"x21"

Ⓕ M06-1 30"X30"

Ⓖ M5-2R 30"X30"

Ⓗ M06-2 30"X30"

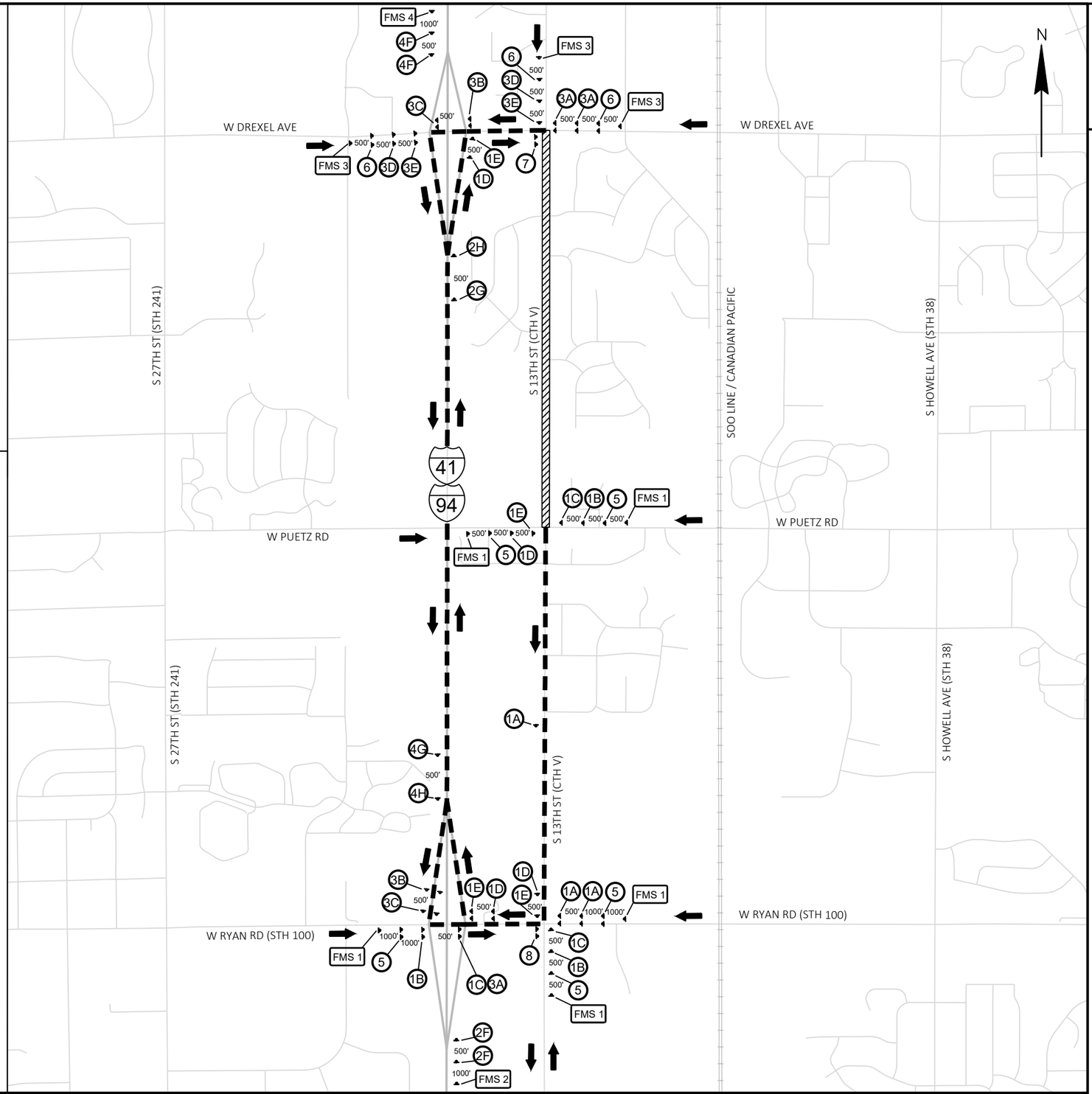
FMS 1
HWY V-S 13TH ST CLOSED AT PUETZ RD FOLLOW DETOUR
84"X48"

FMS 2
HWY V-S 13TH ST CLOSED AT PUETZ RD FOLLOW DETOUR
138"X72"

FMS 3
HWY V-S 13TH ST CLOSED AT DREXEL AVE FOLLOW DETOUR
84"X48"

FMS 4
HWY V-S 13TH ST CLOSED AT DREXEL AVE FOLLOW DETOUR
138"X72"

COORDINATE SIGN PLACEMENT WITH ADJACENT WISDOT PROJECTS:
-1000-50-60, DREXEL AVE OVER IH 41 DECK SEALING - MARTIN VILLACA, 262-548-6456, MARTIN.VILLACA@DOT.WI.GOV



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL: DETOUR PLAN - STAGES 1 AND 2	SHEET 62	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_DT.DWG
LAYOUT NAME - 01
PLOT DATE : 9/18/2023 1:34 PM
PLOT BY : THORNBURG, ALEX
PLOT NAME :
PLOT SCALE : 1 IN:1500 FT

2

GENERAL NOTES:
TRAFFIC ON S. 13TH ST (CTH V) FROM W. DREXEL AVE TO W. PUETZ RD WILL BE CLOSED TO THRU TRAFFIC DURING DURATION OF THE PROJECT. THE S. 13TH ST (CTH V) CROSSINGS AT W. WILLOW DR AND W. WYNONA CT WILL BE STAGED NON-CONCURRENTLY TO MAINTAIN LOCAL CROSS-STREET TRAFFIC. ACCESS TO RESIDENCES AND BUSINESSES MUST BE MAINTAINED AT ALL TIMES.

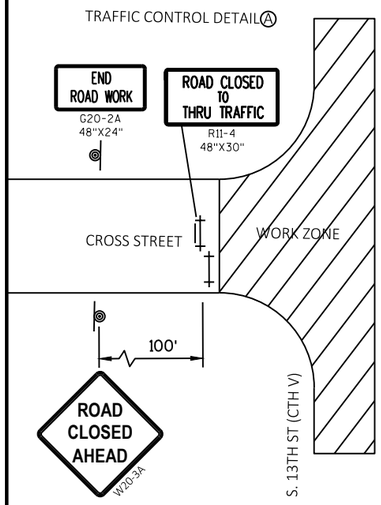
FOR WORK ZONE TRAFFIC CONTROL, REFER TO THE TRAFFIC CONTROL PLANS FOR DEVICE PLACEMENT AND LAYOUTS.

PRE-STAGE 1
INSTALL 4-SECTION FLASHING YELLOW TURN ARROWS AT S. 13TH ST (CTH V) AND W. PUETZ RD PER THE SIGNAL PLAN.

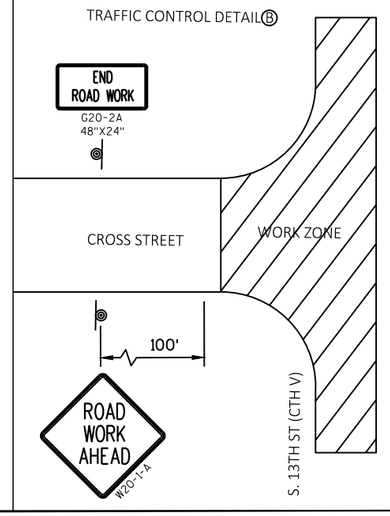
STAGE 1
CONSTRUCTION:
-S. 13TH ST (CTH V) FROM OAK CREEK WEST MIDDLE SCHOOL NORTH DRIVEWAY TO W. DREXEL AVE.
-CROSSINGS AT W. WILLOW DR AND W. WYNONA CT WILL BE STAGED NON-CONCURRENTLY.
TRAFFIC:
-S. 13TH ST (CTH V) FROM OAK CREEK WEST MIDDLE SCHOOL NORTH DRIVEWAY TO W. DREXEL AVE CLOSED TO THRU TRAFFIC.
-OAK CREEK WEST MIDDLE SCHOOL NORTH DRIVEWAY CLOSED.
-OAK CREEK WEST MIDDLE SCHOOL SOUTH DRIVEWAY OPEN TO TWO-WAY TRAFFIC.
-NO EASTBOUND RIGHT TURNS OR WESTBOUND LEFT TURNS AT W. DREXEL AVE.
PEDESTRIANS:
-TEMPORARY PEDESTRIAN PLAN - STAGE 1A OR STAGE 1B IN-PLACE TO MAINTAIN SCHOOL CROSSING AT PILGRIM PKWY SCHOOL CROSSING.

STAGE 2
CONSTRUCTION:
-S. 13TH ST (CTH V) FROM OAK CREEK WEST MIDDLE SCHOOL SOUTH DRIVEWAY TO W. PUETZ RD
TRAFFIC:
-S. 13TH ST (CTH V) FROM OAK CREEK WEST MIDDLE SCHOOL SOUTH DRIVEWAY TO W. PUETZ RD CLOSED TO THRU TRAFFIC.
-OAK CREEK WEST MIDDLE SCHOOL SOUTH DRIVEWAY CLOSED.
-OAK CREEK WEST MIDDLE SCHOOL NORTH DRIVEWAY OPEN TO TWO-WAY TRAFFIC.
-NO EASTBOUND RIGHT TURNS OR WESTBOUND LEFT TURNS AT W. PUETZ RD.
PEDESTRIANS:
-TEMPORARY PEDESTRIAN PLAN - STAGE 2 IN-PLACE TO MAINTAIN SCHOOL CROSSING AT PILGRIM PKWY SCHOOL CROSSING.

TRAFFIC CONTROL DETAIL (A)



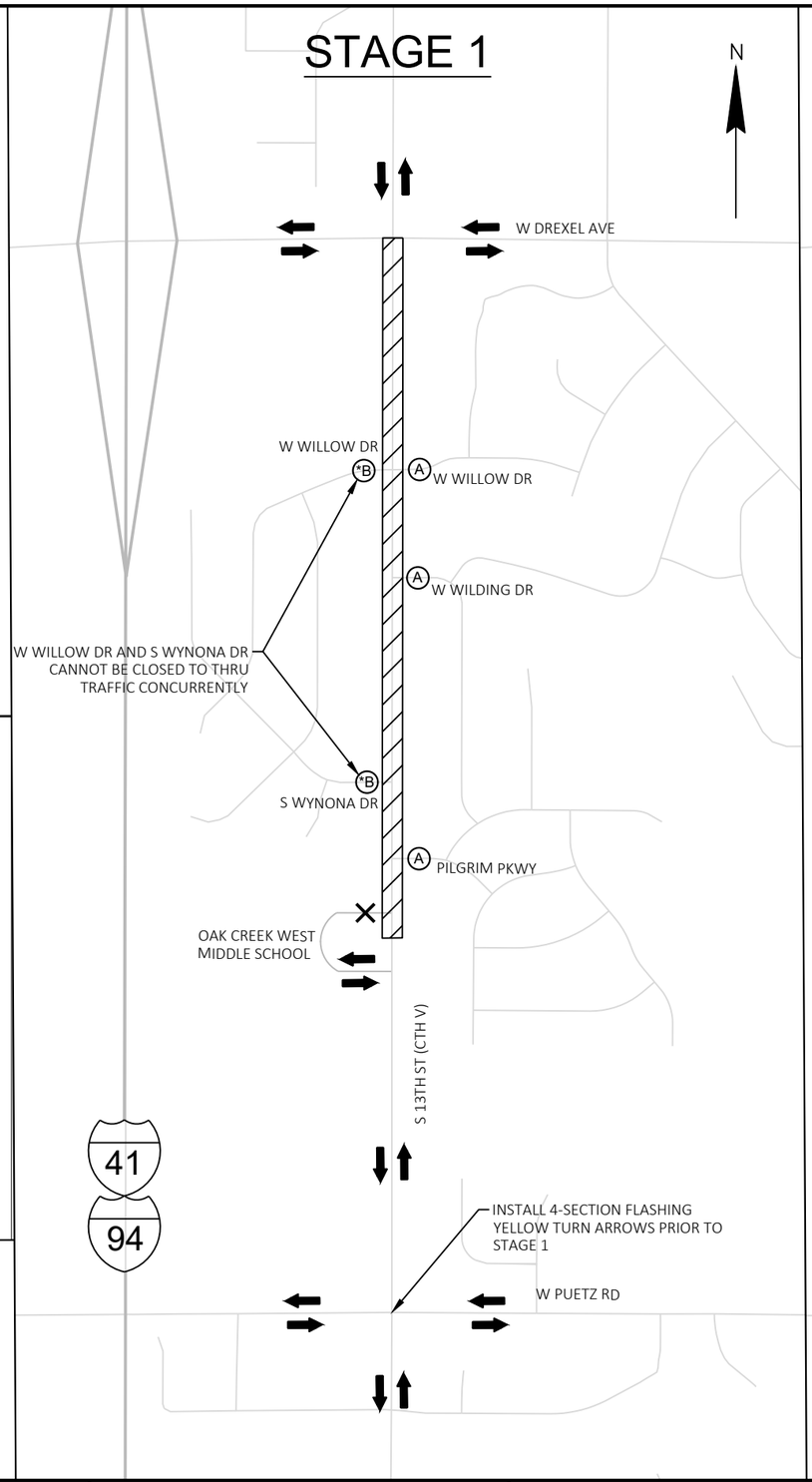
TRAFFIC CONTROL DETAIL (B)



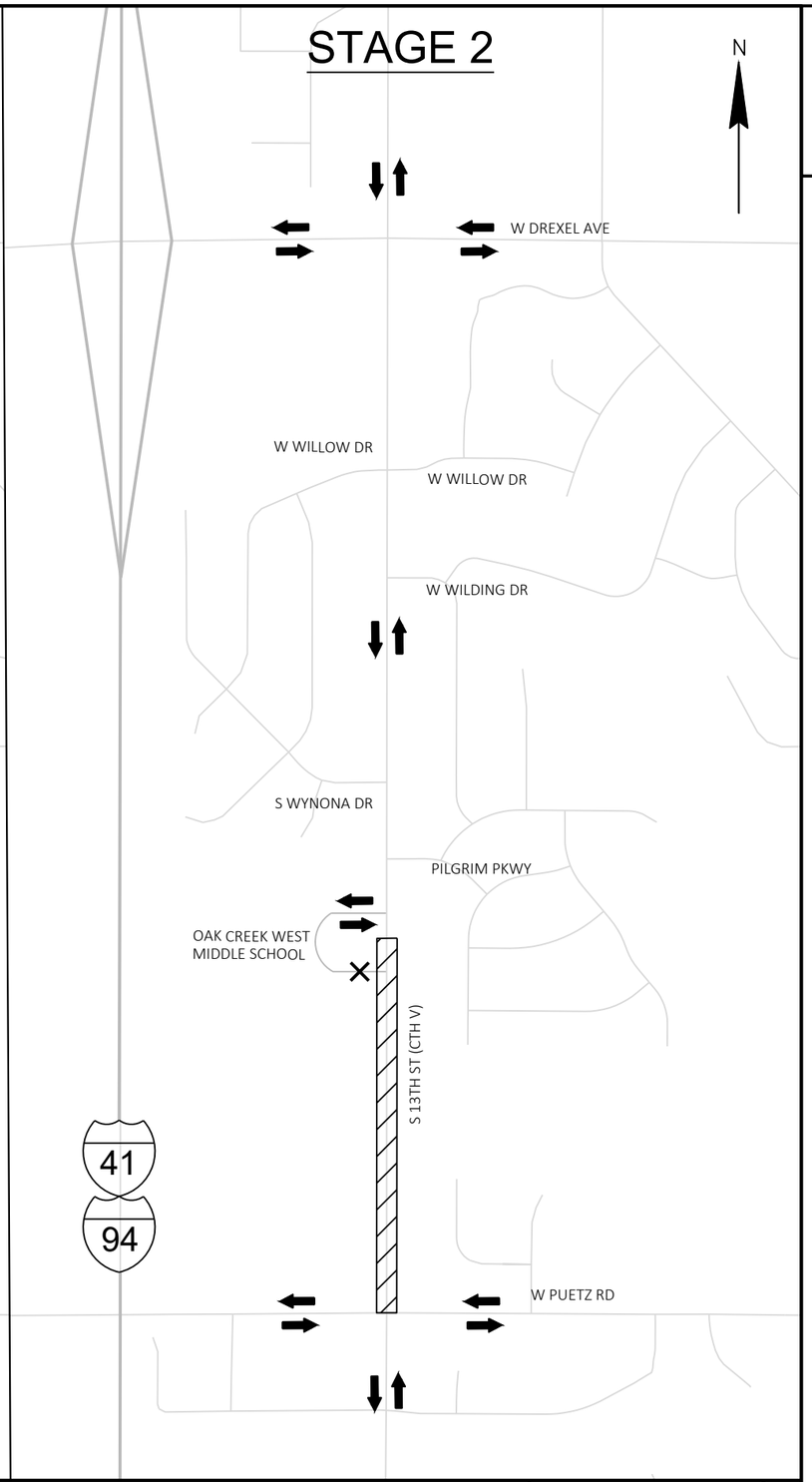
LEGEND:

- PROJECT I.D. 2505-03-71 WORK ZONE
- TRAFFIC FLOW ARROW
- (A) CROSS STREET ROAD CLOSED TO THRU TRAFFIC SEE TRAFFIC CONTROL DETAIL (A) FOR ADVANCED WARNING SIGN AND ROAD CLOSURE BARRICADE PLACEMENT
- (B) CROSS STREET ROAD WORK AHEAD SEE TRAFFIC CONTROL DETAIL (B) FOR ADVANCED WARNING SIGN PLACEMENT
- * INSTALL TRAFFIC CONTROL DEVICES PER DETAIL (A) WHEN PERFORMING WORK IN INTERSECTION
- OAK CREEK WEST MIDDLE SCHOOL DRIVEWAY CLOSURE

STAGE 1



STAGE 2



2

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL OVERVIEW - STAGES 1 AND 2	SHEET 63	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC OVERVIEW.DWG PLOT DATE : 9/25/2023 12:11 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : 1 IN:750 FT
LAYOUT NAME - 01
WISDOT/CADDS SHEET 42

2

LEGEND

- TYPE III BARRICADE WITH TWO TYPE A LIGHTS (FLASHING)
- TYPE III BARRICADE WITH ATTACHED SIGN AND TWO TYPE A WARNING LIGHT (FLASHING)
- TRAFFIC CONTROL DRUM
- TRAFFIC CONTROL CONES 42-INCH
- SIGN ON PERMANENT SUPPORT
- SIGN ON TEMPORARY SUPPORT
- WORK ZONE, LONG-TERM (SEE NOTE 1 BELOW)
- WORK ZONE, SHORT-TERM (SEE NOTE 2 BELOW)
- DIRECTION OF TRAFFIC
- (2YT) TEMPORARY MARKING LINE REMOVABLE TAPE 4-INCH (DOUBLE YELLOW)
- (WT8) TEMPORARY MARKING LINE REMOVABLE TAPE 8-INCH
- (WT18) TEMPORARY MARKING STOP LINE REMOVABLE TAPE 18-INCH
- TEMPORARY CURB RAMP WITH TEMPORARY PEDESTRIAN DETECTABLE WARNING FIELD, 5FT WIDE
- TEMPORARY PEDESTRIAN SURFACE MATTING, 5FT WIDE
- TEMPORARY PEDESTRIAN BARRICADE
- FLAGS 16" X 16" MIN. (ORANGE)

NOTES:

1. FOR LONG-TERM WORK ZONE TRAFFIC CONTROL, REFER TO THE TRAFFIC CONTROL PLANS FOR DEVICE PLACEMENT AND LAYOUTS.
2. FOR SHORT-TERM WORK ZONE TRAFFIC CONTROL, REFER TO SDD TRAFFIC CONTROL, INTERSECTION WITHIN SINGLE LANE CLOSURE FOR DEVICE PLACEMENT AND LAYOUTS. SHORT-TERM WORK ZONE LANE CLOSURES CAN BE COMPLETE BETWEEN THE HOURS OF 9AM-3PM.
3. REMOVE ANY CONFLICTING EXISTING PAVEMENT MARKING WHEN PLACING PAVEMENT MARKING TEMPORARY TAPE. RESTORE PAVEMENT MARKING TO EXISTING CONDITIONS ONCE TEMPORARY TRAFFIC CONTROL IS REMOVED.
4. ALL TEMPORARY PAVEMENT MARKING ARROWS OR WORDS SHOWN IN THE TRAFFIC CONTROL PLANS ARE TO BE REMOVABLE TAPE.
5. REMOVE OR COVER ANY SIGNS TEMPORARY OR EXISTING WHICH CONFLICT WITH TRAFFIC CONTROL "IN USE" AS NEEDED AND APPROVED BY THE ENGINEER.
6. FOR ALL WORK NEXT TO SIDEWALKS:
   -ALL WORK OPERATIONS MUST BE PROTECTED NEXT TO SIDEWALKS.
   -ALL DROP-OFFS MUST BE PROTECTED FROM SIDEWALKS.
   -ALL EQUIPMENT USED FOR PROTECTION MUST BE MUTCD, MASH, AND/OR NCHRP 350 COMPLIANT.
7. ALL SIGNS ARE 48"x48" UNLESS OTHERWISE NOTED.

2

N

W. PUETZ RD

PI: 10+00.00

AMERITECH HH

BM#22

ROAD CLOSED
1/2 MILE AHEAD
LOCAL TRAFFIC ONLY
R11-3
60"X30"

BEGIN PROJECT
2505-03-71
STA. 10+22.60

S. 13TH STREET (CTH V)

R/W

#8675

CP#8741

CP#8363

R/L S. 13TH ST

9+00 10+00 11+00 12+00 13+00 14+00

500'

ROAD CLOSED AHEAD
W20-3A

CP#11

ROAD CLOSED
1/2 MILE AHEAD
LOCAL TRAFFIC ONLY
R11-3
60"X30"

PRIOR TO STAGE 1, INSTALL 4-SECTION FLASHING YELLOW TURN ARROWS PER THE SIGNAL PLAN. REFER TO SDD TRAFFIC CONTROL, INTERSECTION WITHIN SINGLE LANE CLOSURE FOR DEVICE PLACEMENT AND LAYOUTS.

#8639

#8610

POST

WELL

VENT

HSE

BREAK LINE A-A

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 1	SHEET 65	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_STAGE 1.DWG
LAYOUT NAME - 01
PLOT DATE : 9/25/2023 12:11 PM
PLOT BY : THORNBURG, ALEX
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 44

2

ASHLEY M. GEORGE
830-9996-001

N

STOP
R1-1
30"X30"

END
ROAD WORK
G20-2A
48"X24"

R/W

BREAK LINE A-A

R/L S. 13TH ST

S. 13TH STREET (CTH V)

22+00 23+00 24+00 25+00 26+00

WT18

500' 500'

ROAD
CLOSED
1000 FT
W20-3C

ROAD
CLOSED
500 FT
W20-3D

STOP
R1-1
36"X36"

W3-1
36"X36"

MATCH LINE 27+00

2

OAK CREEK
WEST MIDDLE
SCHOOL
SOUTH
DRIVEWAY

2YT
25FT

W16-3

STOP
R1-1
36"X36"

ROAD
CLOSED
R11-2
48"X30"

OAK CREEK
WEST MIDDLE
SCHOOL
NORTH
DRIVEWAY

SEE TRAFFIC CONTROL PLANS - TEMPORARY
PEDESTRIAN PLAN - STAGE 1 FOR TEMPORARY
PEDESTRIAN ACCOMODATIONS THIS SHEET

N

MATCH LINE 27+00

WT18

ROAD CLOSED
TO
THRU TRAFFIC
R11-4
48"X30"

28+00 29+00 30+00 31+00 32+00

R/L S. 13TH ST

S. 13TH STREET (CTH V)

EXISTING UTILITY POLE REMAINS DURING STAGE 1;
GAP PAVEMENT ACCORDINGLY

WORK BY OTHERS (HAWK SIGNAL
I.D. 2987-09-70)

ROAD CLOSED
TO
THRU TRAFFIC
R11-4
48"X30"

PILGRIM PKWY

BREAK LINE B-B

AKBAR ALI YASIN

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 1	SHEET 66	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_STAGE 1.DWG
LAYOUT NAME - 02
PLOT DATE : 1/9/2024 11:59 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

SEE TRAFFIC CONTROL PLANS - STAGE 1 - W DREXEL AVE FOR TRAFFIC CONTROL DEVICES, BARRICADES, AND SIGN PLACEMENT ALONG W. DREXEL AVE

BREAK LINE B-B

MATCH LINE 63+00

W. DREXEL AVE

END PROJECT
2505-03-71
STA. 61+34.50

R/L S. 13TH ST

ROAD CLOSED TO THRU TRAFFIC
R11-4
48"X30"

ROAD CLOSED TO THRU TRAFFIC
R11-4
48"X30"

S. 13TH STREET (CTH V)

58+00 59+00 60+00 61+00 62+00

R/W

#7977 #7968 #7956 #7944 #7932 #7920 #7908

PLACE 350-FT PRIOR TO LANE CLOSURE

ROAD WORK AHEAD
W20-2A

LANE CLOSED
R11-2L
48"X30"

RIGHT LANE MUST TURN RIGHT
R3-7R
30"X30"

TEMPORARY MARKING ARROW REMOVABLE TAPE

TEMPORARY MARKING WORD REMOVABLE TAPE

LANE CLOSED
R11-2L
48"X30"

ONLY ONLY
R3-8LR
36"X30"

TEMPORARY MARKING ARROW REMOVABLE TAPE

LANE CLOSED
R11-2L
48"X30"

20' 32' 17' 25' 20'

300'

END ROAD WORK
G20-2A
48"X24"

EP: 63+28.87

R/L S. 13TH ST

SEC NE 18

MATCH LINE 63+00

W. DREXEL AVE

S. 13TH STREET (CTH V)

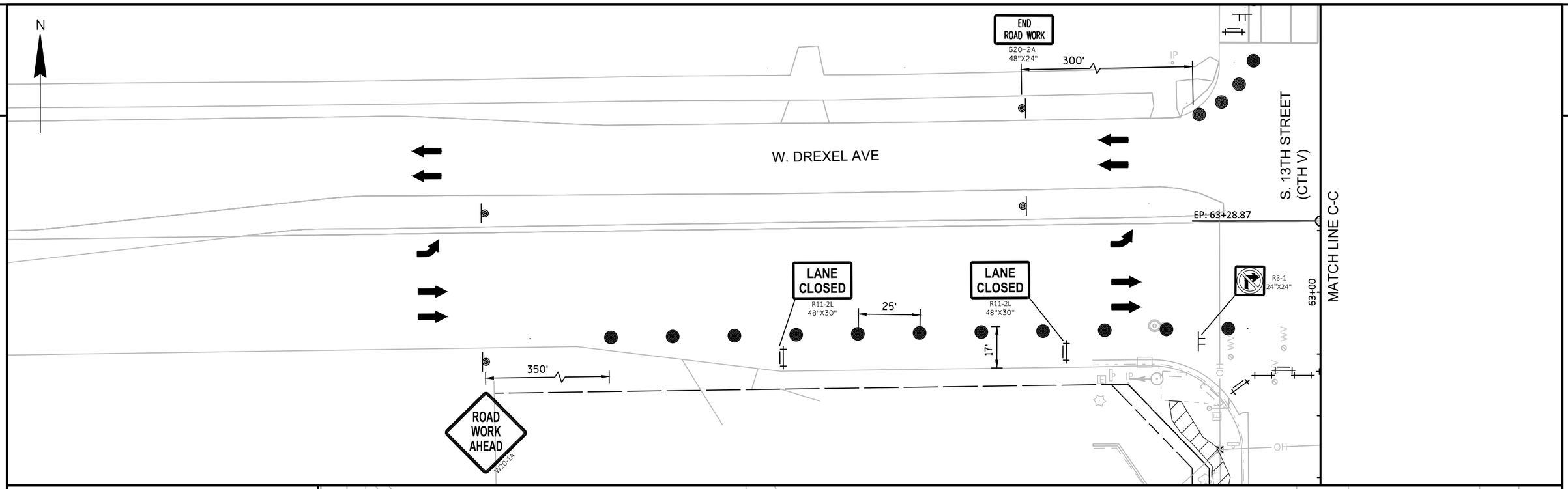
SEE TRAFFIC CONTROL PLANS - STAGE 1 - W DREXEL AVE FOR TRAFFIC CONTROL DEVICES, BARRICADES, AND SIGN PLACEMENT ALONG W. DREXEL AVE

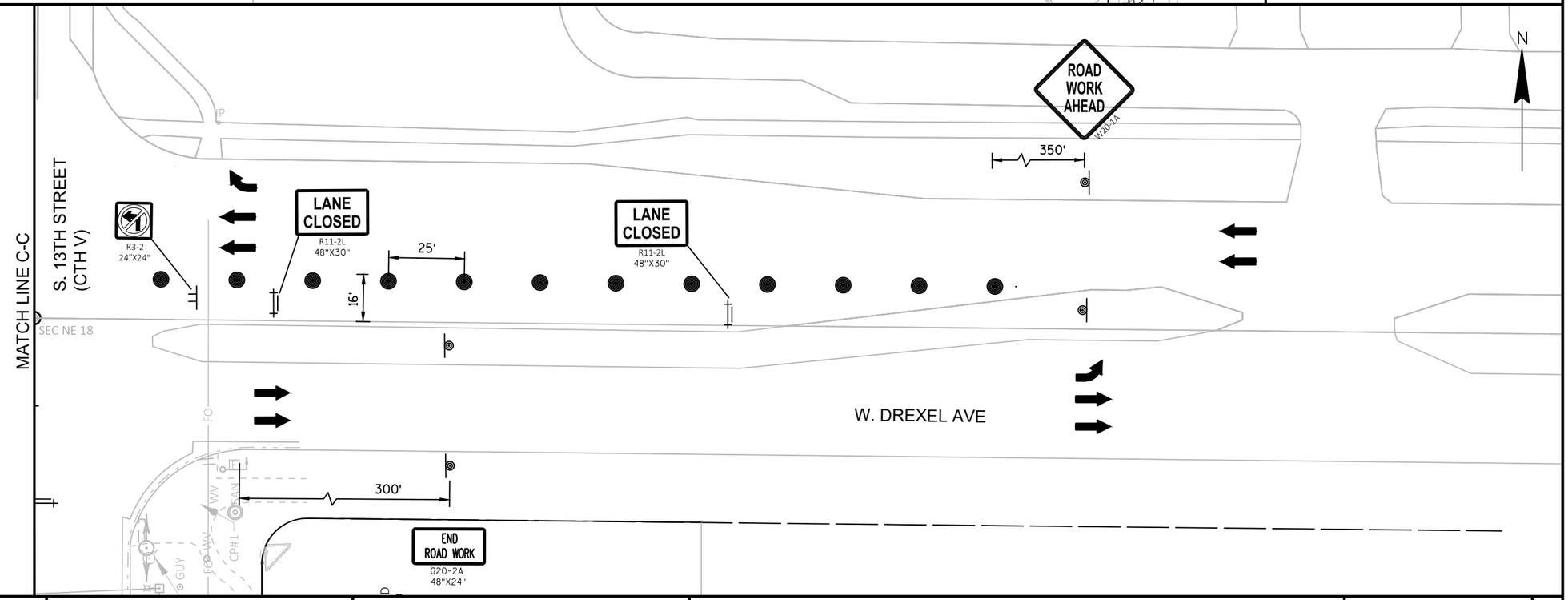
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 1	SHEET 67	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_STAGE 1.DWG
LAYOUT NAME - 03

PLOT DATE : 9/25/2023 12:11 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44





PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 1 - W DREXEL AVE	SHEET 68	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_STAGE 1.DWG
LAYOUT NAME - 04
PLOT DATE : 9/25/2023 12:12 PM
PLOT BY : THORNBURG, ALEX
PLOT NAME :
PLOT SCALE : 1 IN:40 FT

NOTES:
1. FOR ALL WORK NEXT TO SIDEWALKS:
   -ALL WORK OPERATIONS MUST BE PROTECTED NEXT TO SIDEWALKS.
   -ALL DROP-OFFS MUST BE PROTECTED FROM SIDEWALKS AS WELL.
   -ALL EQUIPMENT USED FOR PROTECTION MUST BE MUTCD, MASH,
    AND/OR NCHRP 350 COMPLIANT AS WELL.

N

OAK CREEK WEST
MIDDLE SCHOOL
NORTH DRIVEWAY

ROAD CLOSED
R11-2
48"X30"

ROAD CLOSED
TO
THRU TRAFFIC
R11-4
48"X30"

W11-2
30"X30"
W16-7R
24"X12"

W11-2
30"X30"
W16-7L
24"X12"

R/L S. 13TH ST

29+00 30+00 31+00 32+00 33+00 34+00

S. 13TH STREET (CTH V)

6FT WIDE
CROSSWALK
WT8

W11-2
30"X30"
W16-7L
24"X12"

W11-2
30"X30"
W16-7R
24"X12"

PILGRIM PKWY

STOP
R1-1
30"X30"

ROAD
CLOSED
TO
THRU TRAFFIC
R11-4
48"X30"

100'

ROAD
CLOSED
AHEAD
W20.3A

END
ROAD WORK
G20-2A
48"X24"

W11-2
30"X30"
AHEAD
W16-9P
24"X8"

PLACE PEDESTRIAN CROSSING AHEAD SIGNS 300FT
NORTH AND SOUTH OF PEDESTRIAN CROSSING

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - TEMPORARY PEDESTRIAN PLAN - STAGE 1A	SHEET 69	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_PED_STAGE 1A.DWG PLOT DATE : 9/25/2023 12:12 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : ##########
LAYOUT NAME - 01
WISDOT/CADDS SHEET 42

NOTES:
1. FOR ALL WORK NEXT TO SIDEWALKS:
   -ALL WORK OPERATIONS MUST BE PROTECTED NEXT TO SIDEWALKS.
   -ALL DROP-OFFS MUST BE PROTECTED FROM SIDEWALKS AS WELL.
   -ALL EQUIPMENT USED FOR PROTECTION MUST BE MUTCD, MASH, AND/OR NCHRP 350 COMPLIANT AS WELL.

N

OAK CREEK WEST MIDDLE SCHOOL NORTH DRIVEWAY

6FT WIDE CROSSWALK WT8

W11-2 30"X30"
W16-7L 24"X12"

W11-2 30"X30"
W16-7R 24"X12"

R/L S. 13TH ST

ROAD CLOSED
R11-2 48"X30"

M4-60R 30"X24"

R/W

S. 13TH STREET (CTH V)

29+00 30+00 31+00 32+00 33+00 34+00

6FT WIDE CROSSWALK WT8

ROAD CLOSED TO THRU TRAFFIC
R11-4 48"X30"

W11-2 30"X30"
W16-7L 24"X12"

W11-2 30"X30"
W16-7R 24"X12"

M4-60L 30"X24"

PILGRIM PKWY

STOP
R1-1 30"X30"

ROAD CLOSED TO THRU TRAFFIC
R11-4 48"X30"

100'

ROAD CLOSED AHEAD
W20-3A

END ROAD WORK
G20-2A 48"X24"

W11-2 30"X30"
AHEAD
W16-9P 24"X8"

PLACE PEDESTRIAN CROSSING AHEAD SIGNS 300FT NORTH AND SOUTH OF PEDESTRIAN CROSSING

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - TEMPORARY PEDESTRIAN PLAN - STAGE 1B	SHEET 70	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_PED_STAGE 1B.DWG PLOT DATE : 9/25/2023 12:14 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : ##########
LAYOUT NAME - 01

WISDOT/CADDS SHEET 42

2

2

COVER EXISTING "SIGNAL AHEAD" SIGNS WITH "STOP AHEAD" SIGN ON ALL APPROACHES

W3-1

W. PUETZ RD

PI: 10+00.00

12'

STOP
R1-1
36"X36"

BEGIN PROJECT
2505-03-71
STA. 10+22.60

9+00

10+00

11+00

12+00

13+00

14+00

15

R/W

R/L S. 13TH ST

STOP
R1-1
36"X36"

ROAD CLOSED TO THRU TRAFFIC
R11-4
48"X30"

500'

500'

ROAD CLOSED 1000 FT
W20-3C

ROAD CLOSED 500 FT
W20-3D

S. 13TH STREET (CTH V)

SEE TRAFFIC CONTROL PLANS - STAGE 2 - W PUETZ RD FOR TRAFFIC CONTROL DEVICES, BARRICADES, AND SIGN PLACEMENT ALONG W. PUETZ RD

BREAK LINE D-D

N

AMERITECH HH

#8675

#8639

#8610

HSE

WELL VENT

OAK CREEK WEST MIDDLE SCHOOL SOUTH DRIVEWAY

ROAD CLOSED
R11-2
48"X30"

STOP
R1-1
30"X30"

OAK CREEK WEST MIDDLE SCHOOL NORTH DRIVEWAY

2YT
25FT

W06-3

ROAD CLOSED 500 FT
W20-3D

ROAD CLOSED 1000 FT
W20-3C

500'

500'

PLACE 350-FT PRIOR TO STOP LINE

W3-1
36"X36"

R/W

WT18

STOP
R1-1
36"X36"

R/L S. 13TH ST

28+00

29+00

30+00

31+00

32+00

33

ROAD CLOSED TO THRU TRAFFIC
R11-4
48"X30"

S. 13TH STREET (CTH V)

SEE TRAFFIC CONTROL PLANS - TEMPORARY PEDESTRIAN PLAN - STAGE 2 FOR TEMPORARY PEDESTRIAN ACCOMODATIONS THIS SHEET

PLACE 300-FT AFTER WORK ZONE

END ROAD WORK
G20-2A
48"X24"

PILGRIM PKWY

BREAK LINE E-E

#8434

#8420

#8400

#8380

#8370

AKBAR ALI YASIN

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 2	SHEET 71	E

2

BREAK LINE E-E

N

#7977

HSE

BM#13

R/W

CP#2

58+00

59+00

60+00

S. 13TH STREET (CTH V)

61+00

62+00

R/L S. 13TH ST

#7909

HSE

A/C

R/W

END PROJECT
2505-03-71
STA. 61+34.50

ROAD CLOSED
3/4 MILE AHEAD
LOCAL TRAFFIC ONLY
R11-3
60"X30"

W. DREXEL AVE

MATCH LINE 63+00

CP#34

BM#12

GUY

CP#1

3" PVC

R/W

#7968

#7956

#7944

#7932

#7920

#7908

2

MATCH LINE 63+00

W. DREXEL AVE

EP: 63+28.87

R/L S. 13TH ST

00

SEC NE 18

S. 13TH STREET (CTH V)

N

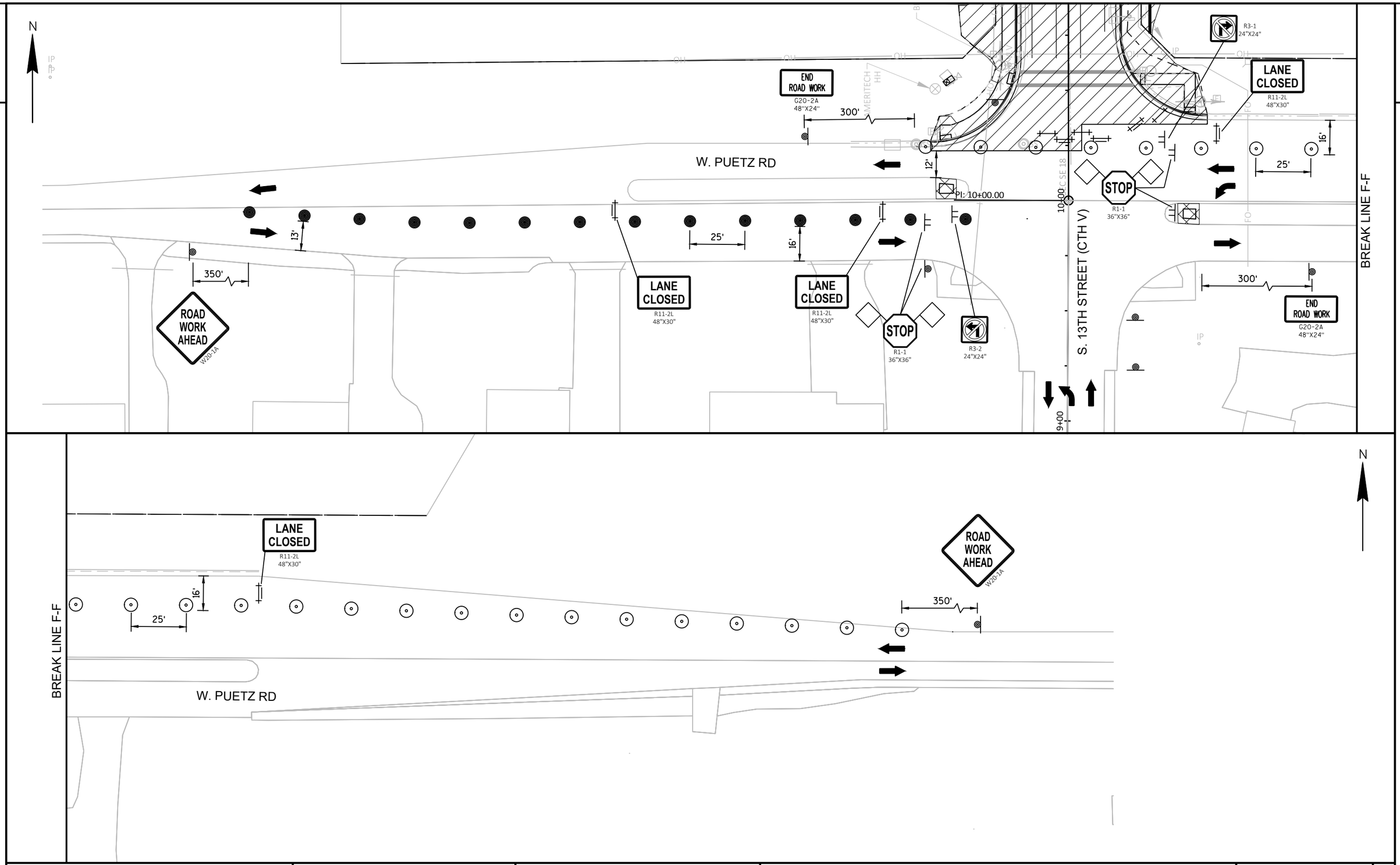
W. DREXEL AVE

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 2	SHEET 72	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_STAGE 2.DWG
LAYOUT NAME - 02

PLOT DATE : 9/25/2023 12:14 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL PLANS - STAGE 2 - W PUETZ RD	SHEET 73	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_STAGE 2.DWG
LAYOUT NAME - 03
PLOT DATE : 9/25/2023 12:14 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : 1 IN:40 FT

NOTES:
1. FOR ALL WORK NEXT TO SIDEWALKS:
   -ALL WORK OPERATIONS MUST BE PROTECTED NEXT TO SIDEWALKS.
   -ALL DROP-OFFS MUST BE PROTECTED FROM SIDEWALKS AS WELL.
   -ALL EQUIPMENT USED FOR PROTECTION MUST BE MUTCD, MASH,
    AND/OR NCHRP 350 COMPLIANT AS WELL.

N

FUTURE SIDEWALK (BY OTHERS)

STOP R1-1 30"X30"

2YT 25FT

W06-3

SIDEWALK CLOSED R9-9 24"X12"

M4-60L 30"X24"

W11-2 30"X30" W16-7R 24"X12"

W11-2 30"X30" W16-7L 24"X12"

R/W

WT18

STOP R1-1 36"X36"

R/L S. 13TH ST

6FT WIDE CROSSWAY

29+00 30+00 31+00 32+00 33+00 34+00

ROAD CLOSED TO THRU TRAFFIC R11-4 48"X30"

S. 13TH STREET (CTH V)

M4-60R 30"X24"

SIDEWALK CLOSED R9-9 24"X12"

PILGRIM PKWY

STOP R1-1 30"X30"

W11-2 30"X30" W16-7L 24"X12"

W11-2 30"X30" W16-7R 24"X12"

PLACE PEDESTRIAN CROSSING AHEAD SIGNS 300FT
NORTH AND SOUTH OF PEDESTRIAN CROSSING

W11-2 30"X30" AHEAD W16-9P 24"X8"

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	TRAFFIC CONTROL - TEMPORARY PEDESTRIAN PLAN - STAGE 2	SHEET 74	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_TC_PED_STAGE 2.DWG PLOT DATE : 9/25/2023 12:15 PM PLOT BY : THORNBURG, ALEX PLOT NAME : PLOT SCALE : ##########
LAYOUT NAME - 01
WISDOT/CADDS SHEET 42

2

2

MATCH LINE 35+00

MATCH LINE 35+00

W. PUETZ ROAD

FAITH BAPTIST CHURCH

WEST MIDDLE SCHOOL

OAK CREEK
COMMUNITY CHURCH

BP: 5+00.00

PI: 10+00.00

N0°20'06"E
500.00'

S. 13TH STREET (CTH V)

N0°00'13"E
2663.83'

BEGIN PROJECT
2505-03-71
STA. 10+22.60

S. 13TH STREET (CTH V)

PILGRIM PKWY

CITY OF OAK CREEK

W. PUETZ ROAD

S. WILLOW DR

S. WYNONA DR

PI: 36+63.83

CITY OF OAK CREEK

END PROJECT
2505-03-71
STA. 61+34.50

W. DREXEL AVENUE

EP: 63+28.87

S. 13TH STREET (CTH V)

N0°06'34"E
2665.04'

S. 13TH STREET (CTH V)

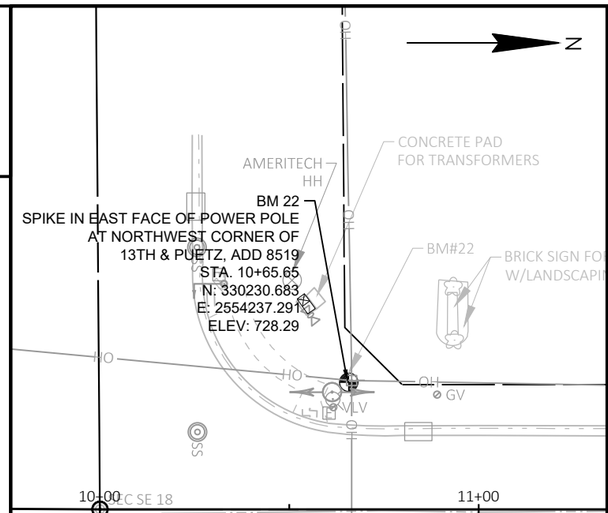
W. WILDING DR

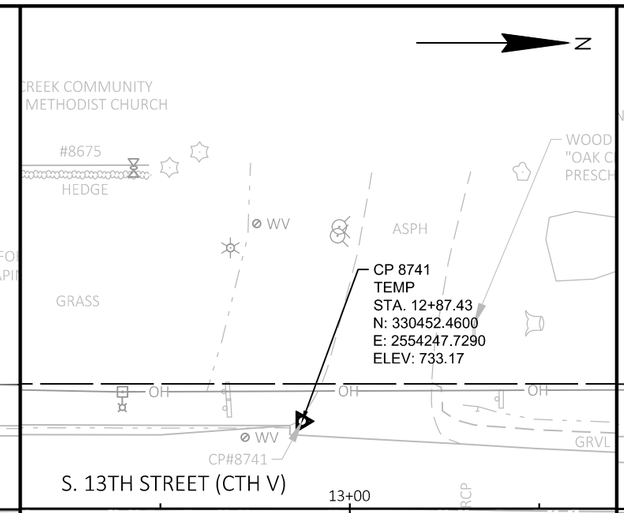
W. WILLOW DR

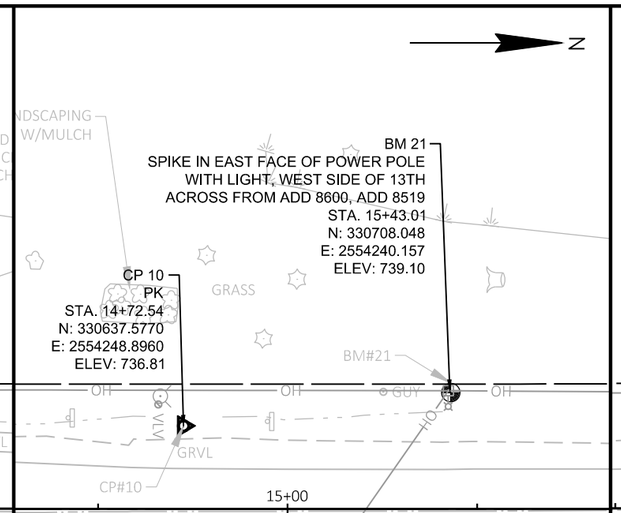
W. DREXEL AVENUE

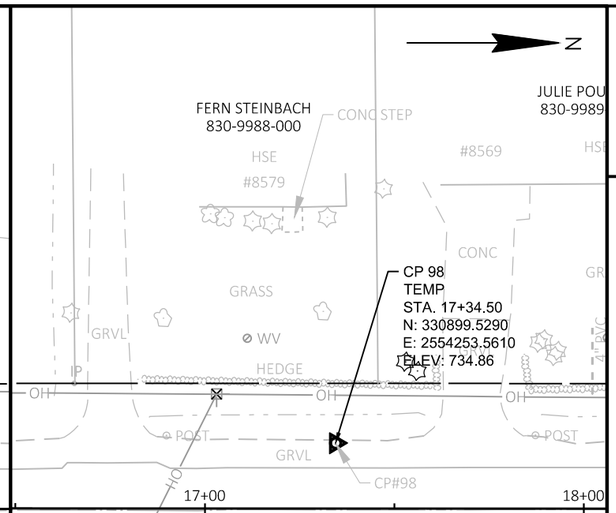
PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	ALIGNMENT DIAGRAM- S. 13TH STREET	SHEET 75	E

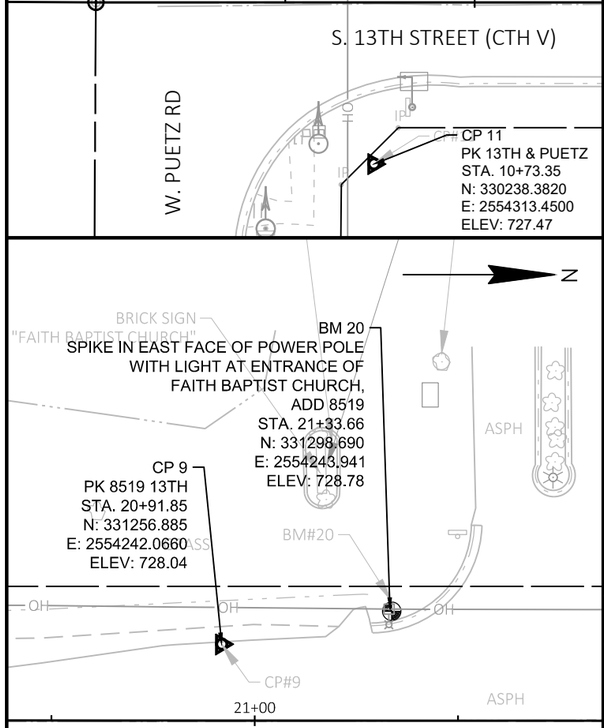
FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_AD.DWG
LAYOUT NAME - ad
PLOT DATE : 4/3/2023 6:49 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : ##########
WISDOT/CADDS SHEET 42

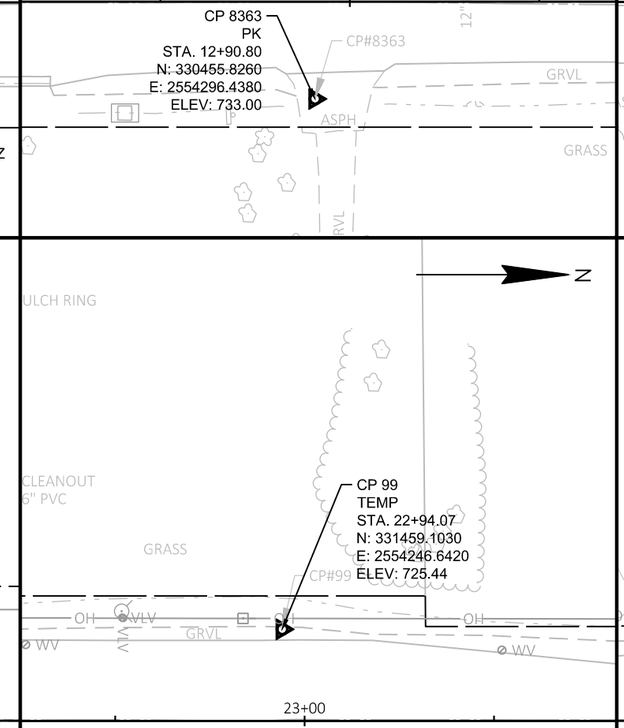


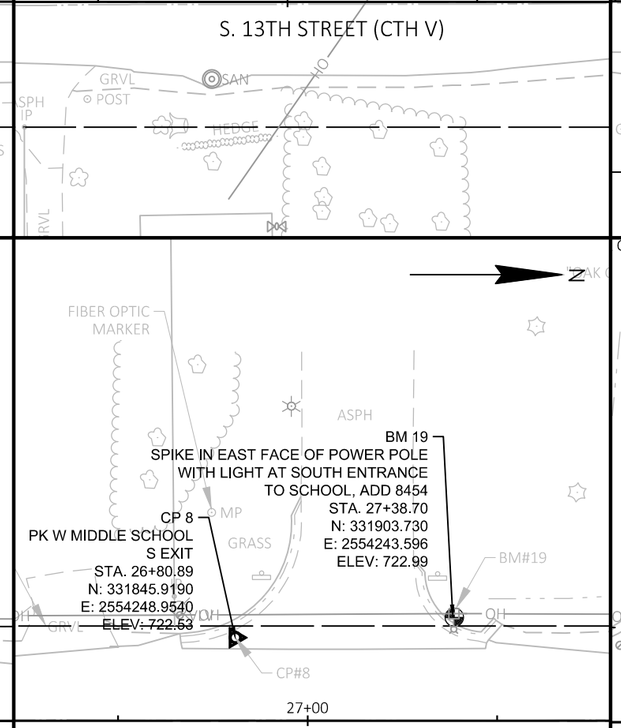


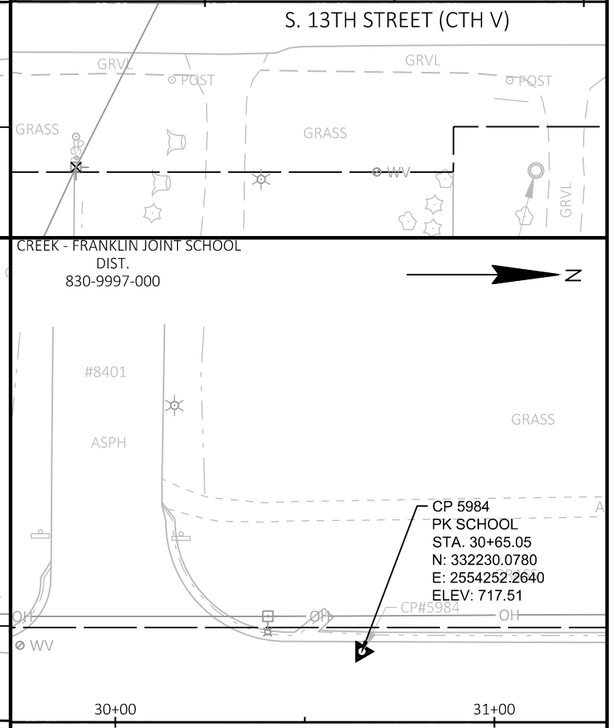












PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	ALIGNMENT LAYOUT SURVEY CONTROL	SHEET 76	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_ALSC.DWG
LAYOUT NAME - 01
PLOT DATE : 9/22/2023 3:48 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT
WISDOT/CADDS SHEET 42

2

BM 18
BOLT AT TOP OF HYDRANT AT WEST SIDE 13TH & PILGRAM PKWY
STA. 32+91.24
N: 332456.277
E: 2554241.851
ELEV: 717.09

S. 13TH STREET (CTH V)

CP 7
PK 13TH+PILGRIM
STA. 32+47.17
N: 332412.2000
E: 2554296.4330
ELEV: 714.95

PILGRIM PKWY

WYNONA DR

BM 17
SPIKE IN EAST FACE OF POWER POLE AT NORTHWEST CORNER OF 13TH & WYNONA
STA. 36+69.17
N: 332834.262
E: 2554238.550
ELEV: 712.44

CP 6
PK 13TH+WYNONA
STA. 36+31.04
N: 332796.0700
E: 2554255.5540
ELEV: 712.97

CP 5
PK 8225 13TH
STA. 40+96.98
N: 333262.0400
E: 2554253.7410
ELEV: 718.40

ALEKSANDER GJEGJI
FROSTINA GJEGJI
811-0035-000

BM 16
CENTER BOLT AT TOP OF HYDRANT WEST SIDE OF 13TH, ADD 8183
STA. 43+56.65
N: 333521.735
E: 2554243.208
ELEV: 717.65

CP 3594
TEMP
STA. 43+60.66
N: 333525.7240
E: 2554253.1060
ELEV: 716.08

MARY ALEXANDER
811-0046-000

BM 15
SPIKE IN EAST FACE OF POWER POLE AT SOUTHWEST CORNER OF 13TH & WILDING
STA. 46+16.53
N: 333781.617
E: 2554241.407
ELEV: 712.07

CP 4
PK 13TH+WILDING
STA. 46+42.25
N: 333807.3220
E: 2554249.9050
ELEV: 712.39

WILDING DR

811-9025-000

CP 2661
TEMP
STA. 49+50.61
N: 334115.6090
E: 2554289.7310
ELEV: 711.13

WEATHERLY MEADOWS
812-0169-000

811-9002-002

CP 3
PK 13TH+WILLOW
STA. 51+77.54
N: 334342.5980
E: 2554258.4180
ELEV: 713.66

WILLOW DR

BM 14
SPIKE IN WEST FACE OF POWER POLE WITH LIGHT AT SOUTHEAST CORNER OF 13TH & WILLOW
STA. 51+46.82
N: 334311.803
E: 2554298.734
ELEV: 713.30

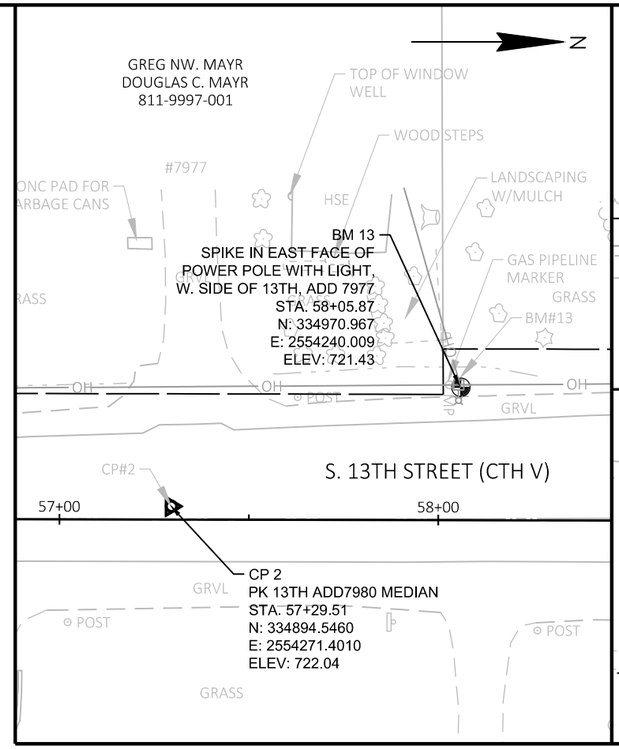
RETAINING WALL FROM POWER POLES POOR CONDITION

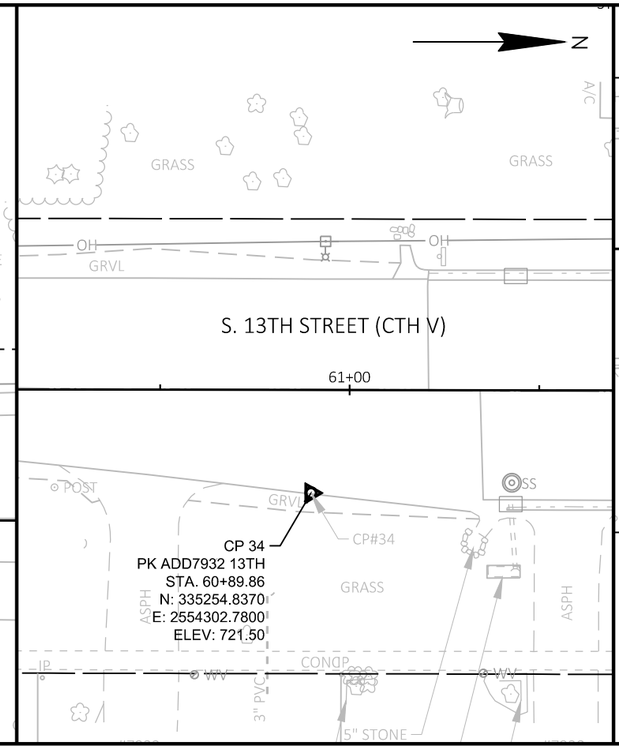
DOUGLAS C. MAYR
GREG W. MAYR
811-9006-000

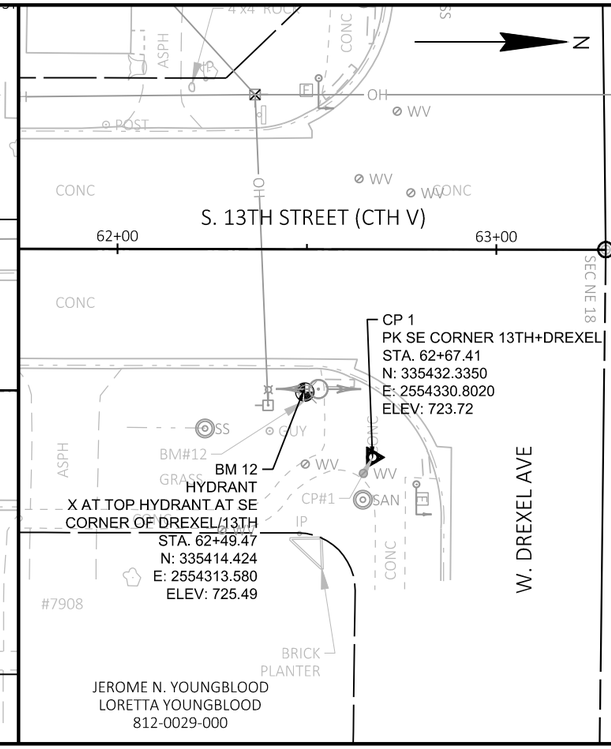
CP 2009
TEMP
STA. 55+46.35
N: 334711.4650
E: 2554229.1870
ELEV: 720.21

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	ALIGNMENT LAYOUT SURVEY CONTROL	SHEET 77	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_ALSC.DWG
LAYOUT NAME - 02
PLOT DATE : 9/22/2023 3:48 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : ##########







2

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	ALIGNMENT LAYOUT SURVEY CONTROL	SHEET 78	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_ALSC.DWG
LAYOUT NAME - 03
PLOT DATE : 9/22/2023 3:48 PM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : ##########
WISDOT/CADDS SHEET 42

Estimate Of Quantities

2505-03-71

Line	Item	Item Description	Unit	Total	Qty
0002	201.0205	Grubbing	STA	3.200	3.200
0004	201.0220	Grubbing	ID	600.000	600.000
0006	203.0220	Removing Structure (structure) 01. 4x4 Box Culverts and Endwalls	EACH	1.000	1.000
0008	203.0220	Removing Structure (structure) 02. 4x6 Box Culverts and Endwalls	EACH	1.000	1.000
0010	204.0100	Removing Concrete Pavement	SY	10,000.000	10,000.000
0012	204.0150	Removing Curb & Gutter	LF	1,250.000	1,250.000
0014	204.0155	Removing Concrete Sidewalk	SY	160.000	160.000
0016	204.0165	Removing Guardrail	LF	30.000	30.000
0018	204.0195	Removing Concrete Bases	EACH	3.000	3.000
0020	204.0210	Removing Manholes	EACH	2.000	2.000
0022	204.0220	Removing Inlets	EACH	4.000	4.000
0024	204.0245	Removing Storm Sewer (size) 01. 12-Inch	LF	720.000	720.000
0026	204.0245	Removing Storm Sewer (size) 02. 30-Inch	LF	110.000	110.000
0028	204.0245	Removing Storm Sewer (size) 03. 24x38-Inch	LF	8.000	8.000
0030	204.9060.S	Removing (item description) 01. Flashing Beacons	EACH	4.000	4.000
0032	204.9060.S	Removing (item description) 02. Traffic Signal Equipment at Intersection	EACH	1.000	1.000
0034	204.9060.S	Removing (item description) 03. Business Sign	EACH	1.000	1.000
0036	205.0100	Excavation Common	CY	27,000.000	27,000.000
0038	206.2001	Excavation for Structures Culverts (structure) 01. 48x76-Inch	EACH	1.000	1.000
0040	206.2001	Excavation for Structures Culverts (structure) 02. 72X113-Inch	EACH	1.000	1.000
0042	213.0100	Finishing Roadway (project) 01. 2505-03-71	EACH	1.000	1.000
0044	305.0110	Base Aggregate Dense 3/4-Inch	TON	50.000	50.000
0046	305.0120	Base Aggregate Dense 1 1/4-Inch	TON	13,000.000	13,000.000
0048	305.0130	Base Aggregate Dense 3-Inch	TON	7,500.000	7,500.000
0050	310.0110	Base Aggregate Open-Graded	TON	10.000	10.000
0052	415.0080	Concrete Pavement 8-Inch	SY	22,000.000	22,000.000
0054	415.0210	Concrete Pavement Gaps	EACH	6.000	6.000
0056	416.0610	Drilled Tie Bars	EACH	60.000	60.000
0058	416.0620	Drilled Dowel Bars	EACH	170.000	170.000
0060	455.0605	Tack Coat	GAL	140.000	140.000
0062	460.2000	Incentive Density HMA Pavement	DOL	500.000	500.000
0064	460.6223	HMA Pavement 3 MT 58-28 S	TON	300.000	300.000
0066	460.6224	HMA Pavement 4 MT 58-28 S	TON	200.000	200.000
0068	465.0120	Asphaltic Surface Driveways and Field Entrances	TON	340.000	340.000
0070	465.0125	Asphaltic Surface Temporary	TON	10.000	10.000
0072	511.1200	Temporary Shoring (structure) 01. 48X76-Inch	SF	240.000	240.000
0074	511.1200	Temporary Shoring (structure) 02. 72X113-Inch	SF	360.000	360.000
0076	520.1015	Apron Endwalls for Culvert Pipe 15-Inch	EACH	2.000	2.000
0078	520.2015	Culvert Pipe Temporary 15-Inch	LF	63.000	63.000
0080	520.8000	Concrete Collars for Pipe	EACH	4.000	4.000
0082	521.1012	Apron Endwalls for Culvert Pipe Steel 12-Inch	EACH	54.000	54.000
0084	521.3112	Culvert Pipe Corrugated Steel 12-Inch	LF	750.000	750.000
0086	522.1012	Apron Endwalls for Culvert Pipe Reinforced Concrete 12-Inch	EACH	2.000	2.000
0088	522.1015	Apron Endwalls for Culvert Pipe Reinforced Concrete 15-Inch	EACH	2.000	2.000
0090	522.1018	Apron Endwalls for Culvert Pipe Reinforced Concrete 18-Inch	EACH	2.000	2.000
0092	522.1030	Apron Endwalls for Culvert Pipe Reinforced Concrete 30-Inch	EACH	1.000	1.000
0094	522.1036	Apron Endwalls for Culvert Pipe Reinforced Concrete 36-Inch	EACH	1.000	1.000
0096	522.2348	Culvert Pipe Reinforced Concrete Horizontal Elliptical Class HE-III 48x76-Inch	LF	74.000	74.000
0098	522.2648	Apron Endwalls for Culvert Pipe Reinforced Concrete Horizontal Elliptical 48x76-Inch	EACH	2.000	2.000
0100	601.0331	Concrete Curb & Gutter 31-Inch	LF	11,000.000	11,000.000

Estimate Of Quantities

2505-03-71

Line	Item	Item Description	Unit	Total	Qty
0102	601.0600	Concrete Curb Pedestrian	LF	130.000	130.000
0104	602.0410	Concrete Sidewalk 5-Inch	SF	24,000.000	24,000.000
0106	602.0420	Concrete Sidewalk 7-Inch	SF	3,100.000	3,100.000
0108	602.0515	Curb Ramp Detectable Warning Field Natural Patina	SF	210.000	210.000
0110	602.0615	Curb Ramp Detectable Warning Field Radial Natural Patina	SF	100.000	100.000
0112	602.0815	Concrete Driveway 7-Inch	SY	3,000.000	3,000.000
0114	602.0865	Concrete Driveway HES 7-Inch	SY	100.000	100.000
0116	602.3010	Concrete Surface Drains	CY	1.000	1.000
0118	606.0200	Riprap Medium	CY	75.000	75.000
0120	608.0315	Storm Sewer Pipe Reinforced Concrete Class III 15-Inch	LF	2,000.000	2,000.000
0122	608.0318	Storm Sewer Pipe Reinforced Concrete Class III 18-Inch	LF	475.000	475.000
0124	608.0324	Storm Sewer Pipe Reinforced Concrete Class III 24-Inch	LF	1,250.000	1,250.000
0126	608.0330	Storm Sewer Pipe Reinforced Concrete Class III 30-Inch	LF	550.000	550.000
0128	608.0336	Storm Sewer Pipe Reinforced Concrete Class III 36-Inch	LF	425.000	425.000
0130	608.0512	Storm Sewer Pipe Reinforced Concrete Class V 12-Inch	LF	800.000	800.000
0132	608.2324	Storm Sewer Pipe Reinforced Concrete Horizontal Elliptical Class HE-III 24x38-Inch	LF	10.000	10.000
0134	608.3012	Storm Sewer Pipe Class III-A 12-Inch	LF	40.000	40.000
0136	608.3015	Storm Sewer Pipe Class III-A 15-Inch	LF	65.000	65.000
0138	611.0420	Reconstructing Manholes	EACH	4.000	4.000
0140	611.0555	Manhole Covers Type Q	EACH	23.000	23.000
0142	611.1004	Catch Basins 4-FT Diameter	EACH	24.000	24.000
0144	611.1006	Catch Basins 6-FT Diameter	EACH	2.000	2.000
0146	611.2004	Manholes 4-FT Diameter	EACH	15.000	15.000
0148	611.2005	Manholes 5-FT Diameter	EACH	6.000	6.000
0150	611.2006	Manholes 6-FT Diameter	EACH	2.000	2.000
0152	611.3225	Inlets 2x2.5-FT	EACH	23.000	23.000
0154	611.8110	Adjusting Manhole Covers	EACH	16.000	16.000
0156	611.8115	Adjusting Inlet Covers	EACH	2.000	2.000
0158	611.8120.S	Cover Plates Temporary	EACH	10.000	10.000
0160	612.0204	Pipe Underdrain Unperforated 4-Inch	LF	800.000	800.000
0162	612.0206	Pipe Underdrain Unperforated 6-Inch	LF	100.000	100.000
0164	612.0208	Pipe Underdrain Unperforated 8-Inch	LF	100.000	100.000
0166	612.0700	Drain Tile Exploration	LF	250.000	250.000
0168	616.0206	Fence Chain Link 6-FT	LF	120.000	120.000
0170	619.1000	Mobilization	EACH	1.000	1.000
0172	620.0100	Concrete Corrugated Median	SF	5,500.000	5,500.000
0174	620.0300	Concrete Median Sloped Nose	SF	150.000	150.000
0176	624.0100	Water	MGAL	20.000	20.000
0178	625.0100	Topsoil	SY	16,000.000	16,000.000
0180	627.0200	Mulching	SY	600.000	600.000
0182	628.1504	Silt Fence	LF	2,000.000	2,000.000
0184	628.1520	Silt Fence Maintenance	LF	2,000.000	2,000.000
0186	628.1905	Mobilizations Erosion Control	EACH	4.000	4.000
0188	628.1910	Mobilizations Emergency Erosion Control	EACH	4.000	4.000
0190	628.2008	Erosion Mat Urban Class I Type B	SY	2,500.000	2,500.000
0192	628.6510	Soil Stabilizer Type B	ACRE	0.200	0.200
0194	628.7005	Inlet Protection Type A	EACH	10.000	10.000
0196	628.7010	Inlet Protection Type B	EACH	40.000	40.000
0198	628.7015	Inlet Protection Type C	EACH	4.000	4.000
0200	628.7020	Inlet Protection Type D	EACH	15.000	15.000

Estimate Of Quantities

2505-03-71

Line	Item	Item Description	Unit	Total	Qty
0202	628.7504	Temporary Ditch Checks	LF	40.000	40.000
0204	628.7555	Culvert Pipe Checks	EACH	40.000	40.000
0206	628.7570	Rock Bags	EACH	50.000	50.000
0208	629.0210	Fertilizer Type B	CWT	0.150	0.150
0210	630.0110	Seeding Mixture No. 10	LB	5.000	5.000
0212	630.0170	Seeding Mixture No. 70	LB	12.000	12.000
0214	630.0200	Seeding Temporary	LB	10.000	10.000
0216	630.0500	Seed Water	MGAL	5.000	5.000
0218	631.0300	Sod Water	MGAL	350.000	350.000
0220	631.1000	Sod Lawn	SY	13,500.000	13,500.000
0222	634.0811	Posts Tubular Steel 2x2-Inch X 11-FT	EACH	20.000	20.000
0224	634.0812	Posts Tubular Steel 2x2-Inch X 12-FT	EACH	24.000	24.000
0226	634.0814	Posts Tubular Steel 2x2-Inch X 14-FT	EACH	8.000	8.000
0228	637.0620	Sign Flags Permanent Type II	EACH	4.000	4.000
0230	637.2210	Signs Type II Reflective H	SF	230.300	230.300
0232	637.2215	Signs Type II Reflective H Folding	SF	5.180	5.180
0234	637.2230	Signs Type II Reflective F	SF	83.500	83.500
0236	638.2102	Moving Signs Type II	EACH	5.000	5.000
0238	638.2602	Removing Signs Type II	EACH	57.000	57.000
0240	638.3000	Removing Small Sign Supports	EACH	39.000	39.000
0242	643.0300	Traffic Control Drums	DAY	8,000.000	8,000.000
0244	643.0420	Traffic Control Barricades Type III	DAY	5,750.000	5,750.000
0246	643.0705	Traffic Control Warning Lights Type A	DAY	11,500.000	11,500.000
0248	643.0900	Traffic Control Signs	DAY	64,000.000	64,000.000
0250	643.0920	Traffic Control Covering Signs Type II	EACH	10.000	10.000
0252	643.1000	Traffic Control Signs Fixed Message	SF	649.500	649.500
0254	643.1050	Traffic Control Signs PCMS	DAY	500.000	500.000
0256	643.1070	Traffic Control Cones 42-Inch	DAY	2,800.000	2,800.000
0258	643.3150	Temporary Marking Line Removable Tape 4-Inch	LF	50.000	50.000
0260	643.3250	Temporary Marking Line Removable Tape 8-Inch	LF	400.000	400.000
0262	643.3550	Temporary Marking Arrow Removable Tape	EACH	2.000	2.000
0264	643.3650	Temporary Marking Word Removable Tape	EACH	1.000	1.000
0266	643.3850	Temporary Marking Stop Line Removable Tape 18-Inch	LF	100.000	100.000
0268	643.5000	Traffic Control	EACH	1.000	1.000
0270	644.1440	Temporary Pedestrian Surface Matting	SF	3,600.000	3,600.000
0272	644.1601	Temporary Pedestrian Curb Ramp	DAY	700.000	700.000
0274	644.1605	Temporary Pedestrian Detectable Warning Field	SF	100.000	100.000
0276	644.1810	Temporary Pedestrian Barricade	LF	700.000	700.000
0278	645.0105	Geotextile Type C	SY	360.000	360.000
0280	645.0111	Geotextile Type DF Schedule A	SY	20.000	20.000
0282	645.0130	Geotextile Type R	SY	120.000	120.000
0284	645.0220	Geogrid Type SR	SY	6,200.000	6,200.000
0286	646.1020	Marking Line Epoxy 4-Inch	LF	21,000.000	21,000.000
0288	646.3020	Marking Line Epoxy 8-Inch	LF	1,800.000	1,800.000
0290	646.5020	Marking Arrow Epoxy	EACH	15.000	15.000
0292	646.5120	Marking Word Epoxy	EACH	6.000	6.000
0294	646.6120	Marking Stop Line Epoxy 18-Inch	LF	450.000	450.000
0296	646.7120	Marking Diagonal Epoxy 12-Inch	LF	80.000	80.000
0298	646.7420	Marking Crosswalk Epoxy Transverse Line 6-Inch	LF	1,400.000	1,400.000
0300	646.8020	Marking Corrugated Median Epoxy	SF	2,500.000	2,500.000

2505-03-71

Line	Item	Item Description	Unit	Total	Qty
0302	646.8220	Marking Island Nose Epoxy	EACH	4.000	4.000
0304	650.4000	Construction Staking Storm Sewer	EACH	80.000	80.000
0306	650.4500	Construction Staking Subgrade	LF	6,200.000	6,200.000
0308	650.5000	Construction Staking Base	LF	350.000	350.000
0310	650.5500	Construction Staking Curb Gutter and Curb & Gutter	LF	200.000	200.000
0312	650.6000	Construction Staking Pipe Culverts	EACH	60.000	60.000
0314	650.7000	Construction Staking Concrete Pavement	LF	5,900.000	5,900.000
0316	650.8501	Construction Staking Electrical Installations (project) 01. 2505-03-71	EACH	1.000	1.000
0318	650.9000	Construction Staking Curb Ramps	EACH	25.000	25.000
0320	650.9500	Construction Staking Sidewalk (project) 01. 2505-03-71	EACH	2.000	2.000
0322	650.9911	Construction Staking Supplemental Control (project) 01. 2505-03-71	EACH	2.000	2.000
0324	650.9920	Construction Staking Slope Stakes	LF	6,200.000	6,200.000
0326	652.0225	Conduit Rigid Nonmetallic Schedule 40 2-Inch	LF	400.000	400.000
0328	652.0235	Conduit Rigid Nonmetallic Schedule 40 3-Inch	LF	50.000	50.000
0330	652.0800	Conduit Loop Detector	LF	350.000	350.000
0332	653.0135	Pull Boxes Steel 24x36-Inch	EACH	2.000	2.000
0334	653.0145	Pull Boxes Steel 24x48-Inch	EACH	1.000	1.000
0336	653.0905	Removing Pull Boxes	EACH	1.000	1.000
0338	654.0101	Concrete Bases Type 1	EACH	1.000	1.000
0340	655.0230	Cable Traffic Signal 5-14 AWG	LF	200.000	200.000
0342	655.0240	Cable Traffic Signal 7-14 AWG	LF	300.000	300.000
0344	655.0700	Loop Detector Lead In Cable	LF	500.000	500.000
0346	655.0800	Loop Detector Wire	LF	1,400.000	1,400.000
0348	658.0173	Traffic Signal Face 3S 12-Inch	EACH	5.000	5.000
0350	658.0174	Traffic Signal Face 4S 12-Inch	EACH	6.000	6.000
0352	658.5070	Signal Mounting Hardware (location) 01.CTH V & W PUETZ RD	EACH	1.000	1.000
0354	690.0150	Sawing Asphalt	LF	800.000	800.000
0356	690.0250	Sawing Concrete	LF	800.000	800.000
0358	715.0720	Incentive Compressive Strength Concrete Pavement	DOL	1,000.000	1,000.000
0360	ASP.1T0A	On-the-Job Training Apprentice at $5.00/HR	HRS	3,000.000	3,000.000
0362	ASP.1T0G	On-the-Job Training Graduate at $5.00/HR	HRS	6,400.000	6,400.000
0364	SPV.0035	Special 01. Backfill Slurry	CY	250.000	250.000
0366	SPV.0060	Special 01. Inlet Covers Type 57	EACH	49.000	49.000
0368	SPV.0060	Special 02. Adjusting Water Valve Boxes	EACH	16.000	16.000
0370	SPV.0060	Special 03. Watermain Protection	EACH	11.000	11.000
0372	SPV.0060	Special 04. Cleaning Drainage Structures and Pipes	EACH	7.000	7.000
0374	SPV.0060	Special 05. Utility Line Opening (ULO)	EACH	8.000	8.000
0376	SPV.0060	Special 06. Field Facilities Office Space	EACH	1.000	1.000
0378	SPV.0060	Special 07. Remove and Reinstall Mailboxes	EACH	70.000	70.000
0380	SPV.0060	Special 08. Temporary Mailboxes	EACH	70.000	70.000
0382	SPV.0060	Special 09. Replacement Mailbox Posts & Hardware	EACH	25.000	25.000
0384	SPV.0060	Special 10. Section Corner Monuments	EACH	1.000	1.000
0386	SPV.0060	Special 11. Internal/External Sanitary Manhole Seal	EACH	13.000	13.000
0388	SPV.0060	Special 12. Cored Holes 6-Inch	EACH	40.000	40.000
0390	SPV.0060	Special 13. Apron Endwalls For Culv Pipe Rnfrcd Conc Horiz Ellip Class HE-III72x113-Inch	EACH	2.000	2.000
0392	SPV.0060	Special 14. Construction Dewatering	EACH	2.000	2.000
0394	SPV.0060	Special 20. Remove and Reinstall Traffic Signal Standard	EACH	1.000	1.000
0396	SPV.0060	Special 21. Solar Powered Flashing Beacon – 12” LED	EACH	1.000	1.000
0398	SPV.0060	Special 22. Disconnect and Reconnect Existing Signal Cable and Ground Wiring	EACH	2.000	2.000

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Line	Item	Item Description	Unit	Total	Qty
0400	SPV.0060	Special 23. Accessible Pedestrian Push Button System, 8 Buttons	EACH	1.000	1.000
0402	SPV.0090	Special 01. Culvert Pipe Reinforced Concrete Horiz Elliptical Class HE-III 72x113-Inch	LF	80.000	80.000
0404	SPV.0170	Special 01. Test Rolling	STA	55.000	55.000

CLEARING & GRUBBING

LOCATION	STATION / OFFSET	I.D.	STATION	-	STATION	OFFSET	201.0205 GRUBBING STA	201.0220 GRUBBING ID	REMARKS
STAGE 1									
	39+02 / 46'RT	4+2	--		--	--	--	6	SPLIT TREE
	--	--	39+03	-	39+29	28'RT	0.3	--	SHRUB LINE
	42+53 / 35'RT	24	--		--	--	--	24	--
	42+73 / 36'RT	27	--		--	--	--	27	--
	43+07 / 36'RT	17	--		--	--	--	17	--
	48+06 / 38'RT	17	--		--	--	--	17	--
	48+24 / 32'RT	20+20	--		--	--	--	40	SPLIT TREE
	49+20 / 33'RT	13	--		--	--	--	13	STUMP
	50+07 / 42'LT	2+2	--		--	--	--	4	SPLIT TREE
	50+07 / 36'LT	3+3	--		--	--	--	6	SPLIT TREE
	50+21 / 29'LT	2	--		--	--	--	2	--
	55+89 / 63'RT	18	--		--	--	--	18	--
	56+12 / 59'RT	15+15	--		--	--	--	30	SPLIT TREE
	60+73 / 65'RT	26	--		--	--	--	26	--
SUBTOTAL STAGE 1							0.3	230	
STAGE 2									
	13+49 / 49'LT	10	--		--	--	--	10	STUMP
	14+10 / 48'LT	12	--		--	--	--	12	STUMP
	--	--	14+73		14+93	RT	0.2	--	--
	--	--	16+84		18+46	LT	2.0	--	HEDGES
	17+53 / 39'LT	16	--		--	--	--	16	--
	17+56/36'LT	12	--		--	--	--	12	
	18+59 / 38'RT	12	--		--	--	--	12	--
	18+70 / 36'RT	6X2	--		--	--	--	12	SIX 2" TREES
	18+71 / 36'RT	12	--		--	--	--	12	--
	18+70 / 41'RT	12+4	--		--	--	--	16	SPLIT 12" & 4" TREE
	18+74 / 36'RT	3x12, 8	--		--	--	--	44	THREE 12" TREES AND 8" TREE
	18+77 / 33'LT	15,12	--		--	--	--	27	15" AND 12" TREES
	18+86 / 26'RT	5	--		--	--	--	5	--
	18+88 / 30'LT	5, 2x3	--		--	--	--	11	5" AND TWO 3" TREES
	18+94 / 30'LT	5x1	--		--	--	--	5	FIVE 1" TREES
	18+97 / 36'RT	2x7, 4,2	--		--	--	--	20	TWO 7", ONE 4" . ONE 2" TREES
	19+09 / 28'RT	4x1	--		--	--	--	4	FOUR " TREES
	19+15 / 27'RT	12	--		--	--	--	12	STUMP
	19+21 / 25'RT	2x4	--		--	--	--	8	TWO 4" TREES
	21+79 / 40'RT	13	--		--	--	--	13	STUMP
	21+93 / 42'RT	15	--		--	--	--	15	--
	22+16 / 40'RT	2x4	--		--	--	--	8	TWO 4" STUMPS
	22+68 / 37'RT	12	--		--	--	--	12	STUMP
	23+12/37'RT	18	--		--	--	--	18	--
	23+27/39'RT	20	--		--	--	--	20	--
SUBTOTAL STAGE 2							2.2	324	
UNDISTRIBUTED							0.7	46	
TOTAL							**3.2**	**600**	

CATEGORY 0010

REMOVING STRUCTURE

LOCATION	STATION	DESCRIPTION	203.0220.01 REMOVING STRUCTURE EACH	203.0220.02 REMOVING STRUCTURE EACH
STAGE 1				
S. 13TH ST	35+93	4x4 BOX CULVERT AND ENDWALLS	1	-
	50+13	4x6 BOX CULVERT AND ENDWALLS	-	1
TOTAL			**1**	**1**

CATEGORY 0010

REMOVING PAVEMENT

LOCATION	STATION	-	STATION	204.0100 REMOVING CONCRETE PAVEMENT SY CATEGORY 0010
STAGE 1				
S. 13TH ST	29+50	-	33+00	700
	33+00	-	39+00	1,200
	39+00	-	45+00	1,200
	45+00	-	51+00	1,200
	51+00	-	57+00	1,200
	57+00	-	63+00	856
UNDISTRIBUTED				144
SUBTOTAL STAGE 1				6,500
STAGE 2				
S. 13TH ST	10+23	-	15+00	430
	15+00	-	21+00	1,200
	21+00	-	27+00	1,200
	27+00	-	29+50	500
UNDISTRIBUTED				170
SUBTOTAL STAGE 2				3,500
TOTAL				**10,000**

REMOVING CURB & GUTTER

LOCATION	STATION		STATION	204.0150 REMOVING CURB & GUTTER LF CATEGORY 0010
STAGE 1				
S. 13TH ST	29+50	-	33+00	431
	33+00	-	39+00	80
	39+00	-	45+00	--
	45+00	-	51+00	--
	51+00	-	57+00	--
	57+00	-	63+00	--
UNDISTRIBUTED				39
SUBTOTAL STAGE 1				550
STAGE 2				
S. 13TH ST	10+23	-	15+00	493
	15+00	-	21+00	--
	21+00	-	27+00	140
	27+00	-	29+50	33
UNDISTRIBUTED				34
SUBTOTAL STAGE 2				700
TOTAL				**1,250**

REMOVING CONCRETE SIDEWALK

LOCATION	STATION		STATION	204.0155 REMOVING CONCRETE SIDEWALK SY CATEGORY 0010
STAGE 1				
S. 13TH ST	29+50	-	33+00	10
	33+00	-	39+00	-
	39+00	-	45+00	-
	45+00	-	51+00	16
	51+00	-	57+00	57
	57+00	-	63+00	-
UNDISTRIBUTED				7
SUBTOTAL STAGE 1				90
STAGE 2				
S. 13TH ST	10+23	-	15+00	55
	15+00	-	21+00	-
	21+00	-	27+00	-
	27+00	-	29+50	-
W. PUETZ RD	WEST MEDIAN			3
	EAST MEDIAN			3
UNDISTRIBUTED				9
SUBTOTAL STAGE 2				70
TOTAL				160

REMOVING GUARDRAIL

LOCATION	STATION		STATION	204.0165 REMOVING GUARDRAIL LF CATEGORY 0010
STAGE 2				
S. 13TH ST	29+50	-	33+00	--
	33+00	-	39+00	--
	39+00	-	45+00	--
	45+00	-	51+00	26
	51+00	-	57+00	--
	57+00	-	63+00	--
UNDISTRIBUTED				4
SUBTOTAL STAGE 2				30
TOTAL				**30**

REMOVING BUSINESS SIGN

LOCATION	STATION	OFFSET	204.9060.S.03 REMOVING BUSINESS SIGN EACH CATEGORY 0010
STAGE 1			
S. 13TH ST	54+46	28' LT	1

STORM SEWER STRUCTURE REMOVALS

LOCATION	STATION	OFFSET	204.0210 REMOVING MANHOLES EACH CATEGORY 0010	204.0220 REMOVING INLETS EACH CATEGORY 0010
STAGE 1				
S. 13TH ST	43+30	24' RT	1	-
	46+08	24' RT	1	-
SUBTOTAL STAGE 1			2	-
STAGE 2				
S. 13TH ST	10+84	23' LT	-	1
	10+84	23' RT	-	1
	11+71	21' LT	-	1
	12+41	30' RT	-	1
SUBTOTAL STAGE 2			0	4
TOTAL			**2**	**4**

STORM SEWER PIPE REMOVALS

LOCATION	STATION		STATION	204.0245.01 REMOVING STORM SEWER 12-INCH LF CATEGORY 0010	204.0245.02 REMOVING STORM SEWER 30-INCH LF CATEGORY 0010	204.0245.03 REMOVING STORM SEWER 24X38-INCH LF CATEGORY 0010
STAGE 1						
S. 13TH ST	29+50	-	33+00	33	-	8
	33+00	-	39+00	-	104	-
	39+00	-	45+00	277	-	-
	45+00	-	51+00	48	-	-
	51+00	-	57+00	-	-	-
	57+00	-	63+00	-	-	-
UNDISTRIBUTED				12	6	-
SUBTOTAL STAGE 1				370	110	8
STAGE 2						
S. 13TH ST	10+23	-	15+00	324	-	-
	15+00	-	21+00	-	-	-
	21+00	-	27+00	12	-	-
	27+00	-	29+50	-	-	-
UNDISTRIBUTED				14	-	-
SUBTOTAL STAGE 2				350	0	0
TOTAL				**720**	**110**	**8**

DIVISION	FROM/TO STATION	LOCATION	205.0100 COMMON EXCAVATION (1) CUT (2)	205.0100 COMMON EXCAVATION (1) EBS EXCAVATION (3)	SALVAGED/UNUSABLE PAVEMENT MATERIAL (4)	AVAILABLE MATERIAL (5)	205.0500 MARSH EXCAVATION (6)	205.0200 ROCK EXCAVATION (7)	REDUCED MARSH IN FILL (8) FACTOR 1.00	REDUCED EBS IN FILL (9) FACTOR 1.00	EXPANDED MARSH BACKFILL (10) FACTOR 1.00	EXPANDED EBS BACKFILL (11) FACTOR 1.00	EXPANDED ROCK (12) FACTOR 1.00	UNEXPANDED FILL	EXPANDED FILL (13) FACTOR 1.00	MASS ORDINATE +/- (14)	WASTE	208.0100 BORROW
DIVISION 1																		
S. 13th ST	10+22.6/61+34.5		17,099	3,247	5,343	11,756	0	0	0	3,247	0	3,247	0	3,274	27	11,729	11,729	0
UNDISTRIBUTED			3,901	2,433	5,343	11,756	0	0	0	3,247	0	3,247	0	3,274	27	11,729	11,729	0
DIVISION 1 SUBTOTAL			21,000	5,680														
DIVISION 2																		
S. 13th ST (SIDEWALK)	10+22.6/61+34.5		211	56	0	211	0	0	0	1,389	0	1,389	0	1,389	0	211	211	0
UNDISTRIBUTED			39	14	0	211	0	0	0	1,389	0	1,389	0	1,389	0	211	211	0
DIVISION 2 SUBTOTAL			250	70														
GRAND TOTAL			21,250	5,750	5,343	11,756	0	0	0	3,247	0	3,247	0	3,274	27	11,729	11,729	0
TOTAL COMMON EXC			27,000															

3

3

		39	14	0	211	0	0	0
		250	70					
		21,250	5,750	5,343	11,756	0	0	0
TOTAL COMMON EXC		27,000						

NOTES:

(1) COMMON EXCAVATION IS THE SUM OF THE CUT AND EBS EXCAVATION COLUMNS. ITEM NUMBER 205.0100

(2) SALVAGED/UNSUABLE PAVEMENT MATERIAL IS INCLUDED IN CUT.

(3) EBS EXCAVATION TO BE BACKFILLED WITH 3" BASE AGGREGATE DENSE. NOTE: THIS IS DESIGNERS CHOICE, CAN BE BACKFILLED WITH BORROW, OR CUT AS WELL.

(4) SALVAGED/UNUSABLE PAVEMENT MATERIAL

5) AVAILABLE MATERIAL = CUT - SALVAGED/UNUSUABLE PAVEMENT MATERIAL

(6) MARSH EXCAVATION - TO BE BACKFILLED WITH 3" BASE AGGREGATE DENSE. NOTE: THIS IS DESIGNERS CHOICE, CAN BE BACKFILLED WITH BORROW, OR CUT AS WELL. ITEM NUMBER 205.0500

(7) ROCK EXCAVATION ITEM NUMBER 205.0200

(8) REDUCED MARSH IN FILL - EXCAVATED MARSH MATERIAL IS USUABLE IN FILLS OUTSIDE THE 1:1 SLOPE. MARSH IN FILL REDUCTION FACTOR = X.1X

(9) REDUCED EBS IN FILL - EXCAVATED EBS MATERIAL IS USUABLE IN FILLS OUTSIDE THE 1:1 SLOPE. EBS IN FILL REDUCTION FACTOR = X.2X

(10) EXPANDED MARSH BACKFILL - THIS IS TO BE FILLED WITH 3" BASE AGGREGATE DENSE. MARSH BACKFILL FACTOR = X.3X. ITEM NUMBER 208.1100

(11) EXPANDED EBS BACKFILL - THIS IS TO BE FILLED WITH 3" BASE AGGREGATE DENSE. EBS BACKFILL FACTOR = X.4X. ITEM NUMBER 208.1100

(12) EXPANDED ROCK FACTOR = X.5X

(13) EXPANDED FILL FACTOR = X.6X

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FINISHING ROADWAY

LOCATION	213.0100.01 FINISHING ROADWAY EACH CATEGORY 0010
PROJECT I.D. 2505-03-71	1
TOTAL	**1**

AGGREGATE ITEMS

LOCATION	STATION	-	STATION	305.0120* BASE AGGREGATE DENSE 1 1/4 -INCH TON CATEGORY 0010	305.0130 BASE AGGREGATE DENSE 3-INCH TON CATEGORY 0010	645.0220 GEOGRID TYPE SR SY CATEGORY 0010
STAGE 1						
S. 13TH ST	29+50	-	33+00	988	860	645
	33+00	-	39+00	1,211	2,578	1,934
	39+00	-	45+00	917	-	-
	45+00	-	51+00	1,048	2,578	1,934
	51+00	-	57+00	1,182	-	645
	57+00	-	63+00	863	-	-
SUBTOTAL STAGE 1				6,209	6,016	5,158
STAGE 2						
S. 13TH ST	10+23	-	15+00	937	-	-
	15+00	-	21+00	1,023	-	-
	21+00	-	27+00	1,095	-	-
	27+00	-	29+50	566	-	-
SUBTOTAL STAGE 2				3,621	-	-
UNDISTRIBUTED				2,370	1,484	1,042
TOTAL				**12,200**	**7,500**	**6,200**

*ADDITIONAL QUANTITIES SHOWN ELSEWHERE

CONCRETE PAVEMENT ITEMS

LOCATION	STATION	-	STATION	415.0080 CONCRETE PAVEMENT 8-INCH SY CATEGORY 0010	415.0210 CONCRETE PAVEMENT GAPS EACH CATEGORY 0010	416.0610 DRILLED TIE BARS EACH CATEGORY 0010	416.0620 DRILLED DOWEL BARS EACH CATEGORY 0010	602.3010 CONCRETE SURFACE DRAINS CY CATEGORY 0010
STAGE 1								
S. 13TH ST	29+50	-	33+00	1,854	1	28	70	-
	33+00	-	39+00	2,627	1	-	-	-
	39+00	-	45+00	2,139	-	-	-	-
	45+00	-	51+00	2,328	1	-	-	-
	51+00	-	57+00	2,356	2	-	-	-
	57+00	-	63+00	2,153	-	-	40	1
SUBTOTAL STAGE 1				13,457	5	28	110	1
STAGE 2								
S. 13TH ST	10+23	-	15+00	2,312	-	20	40	-
	15+00	-	21+00	2,336	-	-	-	-
	21+00	-	27+00	2,479	1	-	-	-
	27+00	-	29+50	1,179	-	10	10	-
SUBTOTAL STAGE 2				8,306	1	30	50	-
UNDISTRIBUTED				237	-	2	10	-
ITEM TOTAL				22,000	6	60	170	1

DRIVEWAYS

LOCATION	STATION	OFFSET	305.0110 BASE AGGREGATE DENSE 3/4-INCH TON CATEGORY 0010	305.0120* BASE AGGREGATE DENSE 1 1/4-INCH TON CATEGORY 0010	602.0815 CONCRETE DRIVEWAY 7-INCH SY CATEGORY 0010	602.0865 CONCRETE DRIVEWAY HES 7-INCH SY CATEGORY 0010	465.0120 ASPHALTIC SURFACE DRIVEWAYS AND FIELD ENTRANCES TON CATEGORY 0010
STAGE 1							
S. 13TH ST	29+86	RT	-	20	88	-	-
	32+38	LT	-	17	74	-	-
	34+21	LT	-	16	68	-	-
	37+20	RT	-	13	58	-	-
	37+32	LT	-	8	-	-	8
	37+70	RT	-	17	77	-	-
	38+40	LT	-	15	66	-	-
	38+75	RT	-	15	12	-	13
	39+51	RT	-	16	72	-	-
	40+14	LT	11	3	-	-	3
	40+28	RT	-	16	68	-	-
	40+74	RT	-	18	79	-	-
	41+47	RT	-	16	68	-	-
	41+73	LT	-	15	64	-	-
	42+94	RT	-	13	56	-	-
	43+16	LT	-	26	117	-	-
	43+84	RT	-	11	47	-	-
	44+23	LT	-	13	-	-	14
	44+57	RT	-	16	11	-	15
	45+02	LT	-	16	71	-	-
	45+90	LT	-	16	72	-	-
	46+78	LT	-	14	62	-	-
	47+41	LT	-	16	72	-	-
	48+14	RT	6	2	8	-	-
	48+51	LT	-	28	-	-	30
	48+97	LT	-	12	-	-	13
	50+84	RT	-	23	102	-	-
	52+50	RT	-	24	106	-	-
	53+88	RT	-	25	109	-	-
	54+01	LT	-	14	-	-	15
	54+77	RT	-	23	103	-	-
	55+16	LT	-	14	-	-	15
	55+31	RT	-	24	104	-	-
	55+50	LT	-	13	-	-	14
	56+00	RT	-	23	104	-	-
	56+76	RT	-	16	72	-	-
	57+35	LT	-	21	-	-	22
	58+10	RT	-	24	106	-	-
	58+93	RT	-	25	109	-	-
	59+68	RT	-	19	85	-	-
	60+49	RT	-	25	111	-	-
UNDISTIBUTED			3	99	79	50	28
SUBTOTAL			20	800	2,500	50	190

DRIVEWAYS (CONT'D)

LOCATION	STATION	OFFSET	305.0110 BASE AGGREGATE DENSE 3/4-INCH TON CATEGORY 0010	305.0120* BASE AGGREGATE DENSE 1 1/4-INCH TON CATEGORY 0010	602.0815 CONCRETE DRIVEWAY 7-INCH SY CATEGORY 0010	602.0865 CONCRETE DRIVEWAY HES 7-INCH SY CATEGORY 0010	465.0120 ASPHALTIC SURFACE DRIVEWAYS AND FIELD ENTRANCES TON CATEGORY 0010
STAGE 2							
S. 13TH ST	12+96	RT	-	14	-	-	15
	13+16	LT	-	28	-	-	30
	14+35	LT	-	10	-	-	11
	16+34	RT	-	16	-	-	18
	16+76	LT	7	3	12	-	-
	17+05	RT	-	7	-	-	8
	17+71	LT	-	13	56	-	-
	17+96	RT	16	3	-	-	3
	22+90	RT	-	8	36	-	-
	24+20	RT	-	21	94	-	-
	25+27	RT	-	16	-	-	18
	26+34	RT	-	22	-	-	24
	26+35	LT	-	4	18	-	-
	27+39	RT	-	18	78	-	-
	28+33	RT	-	18	80	-	-
	29+27	RT	-	22	98	-	-
UNDISTRIBUTED			7	77	28	50	23
STAGE 2 SUBTOTAL			30	300	500	50	150
TOTAL			**50**	**1100**	**3,000**	**100**	**340**

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	MISCELLANEOUS QUANTITIES	SHEET 88	E

FILE NAME : PLOT DATE : 1/5/2024 PLOT BY : DMM PLOT SCALE : 1:1

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ASPHALT PAVEMENT ITEMS

LOCATION	STATION	-	STATION	455.0605 TACK COAT GAL CATEGORY 0010	460.6223 HMA PAVEMENT 3 MT 58-28 S TON CATEGORY 0010	460.6224 HMA PAVEMENT 4 MT 58-28 S TON CATEGORY 0010	465.0125 ASPHALTIC SURFACE TEMPORARY TON CATEGORY 0010
STAGE 1							
S. 13TH ST	29+50	-	33+00	20	69	46	2
	33+00	-	39+00	14	48	32	-
	39+00	-	45+00	-	-	-	-
	45+00	-	51+00	7	23	16	-
	51+00	-	57+00	19	67	45	-
	57+00	-	63+00	-	-	-	2
SUBTOTAL STAGE 1				60	207	139	4
STAGE 2							
S. 13TH ST	10+23	-	15+00	58	-	-	2
	15+00	-	21+00	-	-	-	-
	21+00	-	27+00	-	22	15	-
	27+00	-	29+50	9	32	22	-
SUBTOTAL STAGE 2				67	54	37	2
UNDISTRIBUTED				13	39	24	4
ITEM TOTAL				140	300	200	10

DRIVEWAY CULVERTS

LOCATION	STATION	OFFSET	521.3112 CULVERT PIPE CORRUGATED STEEL 12-INCH LF CATEGORY 0010	521.1012 APRON ENDWALLS FOR CULVERT PIPE STEEL 12-INCH EACH CATEGORY 0010	650.6000* CONSTRUCTION STAKING PIPE CULVERTS EACH CATEGORY 0010
S. 13TH ST	37+20	39'RT	30	2	2
	37+31	35'LT	22	2	2
	37+70	39'RT	32	2	2
	38+40	32'LT	25	2	2
	38+74	39'RT	27	2	2
	39+51	39'RT	25	2	2
	40+14	29'LT	19	2	2
	41+47	37'RT	30	2	2
	41+73	29'LT	29	2	2
	42+94	37'RT	29	2	2
	43+15	29'LT	30	2	2
	43+85	37'RT	25	2	2
	44+23	29'LT	28	2	2
	45+00	29'LT	26	2	2
	45+90	36'LT	35	2	2
	46+78	29'LT	25	2	2
	47+42	40'LT	30	2	2
	50+83	45'RT	27	2	2
	53+87	47'RT	30	2	2
	54+76	47'RT	30	2	2
	55+31	47'RT	28	2	2
	56+01	47'RT	28	2	2
	56+76	47'RT	22	2	2
	58+10	47'RT	27	2	2
	58+93	47'RT	29	2	2
	59+68	47RT	26	2	2
SUBTOTAL			714	52	52
UNDISTRIBUTED			36	2	2
TOTAL			**750**	**54**	**54**

* ADDITIONAL QUANTITIES SHOWN ELSEWHERE

CULVERT PIPES

STATION	OFFSET**	NOTES	206.2001.01 EXCAVATION FOR STRUCTURES CULVERTS (01. 48x76-INCH) EACH CATEGORY 0010	206.2001.02 EXCAVATION FOR STRUCTURES CULVERTS (02. 72x113-INCH) EACH CATEGORY 0010	511.1200.01 TEMPORARY SHORING (01. 48x76-INCH) SF CATEGORY 0010	511.1200.02 TEMPORARY SHORING (02. 72x113-INCH) SF CATEGORY 0010	520.1015 APRON ENDWALLS FOR CULVERT PIPE 15-INCH EACH CATEGORY 0010	520.2015 CULVERT PIPE TEMPORARY 15-INCH LF CATEGORY 0010	522.2348 CULVERT PIPE REINFORCED CONCRETE HORIZONTAL ELLIPTICAL CLASS HE-III 48x76-INCH LF CATEGORY 0010	522.2648 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE HORIZONTAL ELLIPTICAL CLASS HE-III 48x76-INCH EACH CATEGORY 0010	SPV.0090.01 CULVERT PIPE REINFORCED CONCRETE HORIZONTAL ELLIPTICAL CLASS HE-III 72x113-INCH LF CATEGORY 0010	SPV.0060.13 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE HORIZONTAL ELLIPTICAL CLASS HE-III 72x113-INCH EACH CATEGORY 0010	645.0105 GEOTEXTILE TYPE C SY CATEGORY 0010	650.6000* CONSTRUCTION STAKING PIPE CULVERTS EACH CATEGORY 0010
29+02	32' RT	CONNECT TO 9.2	-	-	-	-	1	47	-	-	-	-	-	1
29+39	28' LT	CONNECT TO 9.1	-	-	-	-	1	16	-	-	-	-	-	1
35+93	R/L	0^0 LHF	1	-	240	-	-	-	74	2	-	-	160	2
50+13	R/L	3^0 LHF	-	1	-	360	-	-	-	-	80	2	200	2
			1	**1**	**240**	**360**	**2**	**63**	**74**	**2**	**80**	**2**	**360**	**6**

* ADDITIONAL QUANTITIES SHOWN ELSEWHERE

** STATIONS AND OFFSETS ARE TO PIPE END OF ENDWALL

3

CONCRETE CURB & GUTTER

LOCATION	STATION	-	STATION	601.0331 CONCRETE CURB & GUTTER 31-INCH LF CATEGORY 0010	601.0600 CONCRETE CURB PEDESTRIAN LF CATEGORY 0010
STAGE 1					
S. 13TH ST	29+50	-	33+00	1,054	-
	33+00	-	39+00	1194	-
	39+00	-	45+00	1,200	-
	45+00	-	51+00	1,229	-
	51+00	-	57+00	1,256	122
	57+00	-	63+00	857	-
UNDISTRIBUTED				30	8
SUBTOTAL STAGE 1				6,820	130
STAGE 2					
S. 13TH ST	10+23	-	15+00	981	-
	15+00	-	21+00	1,439	-
	21+00	-	27+00	1,224	-
	27+00	-	29+50	499	-
UNDISTRIBUTED				37	-
SUBTOTAL STAGE 2				4,180	-
TOTAL				**11,000**	**130**

CONCRETE SIDEWALK ITEMS

LOCATION	STATION	-	STATION	602.0410 CONCRETE SIDEWALK 5-INCH SF CATEGORY 0010	602.0420 CONCRETE SIDEWALK 7-INCH SF CATEGORY 0010	602.0515 CURB RAMP DETECTABLE WARNING FIELD NATURAL PATINA SF CATEGORY 0010	602.0615 CURB RAMP DETECTABLE WARNING FIELD RADIAL NATURAL PATINA SF CATEGORY 0010	620.0100 CONCRETE CORRUGATED MEDIAN SF CATEGORY 0010	620.0300 CONCRETE MEDIAN SLOPED NOSE SF CATEGORY 0010	305.0120* BASE AGGREGATE DENSE 1-1/4 INCH TON CATEGORY 0010
STAGE 1										
S. 13TH ST	29+50	-	33+00	3,615	311	94	14	-	28	96
	33+00	-	39+00	4,408	576	10	17	-	-	122
	39+00	-	45+00	2,374	773	-	-	-	-	77
	45+00	-	51+00	2,827	207	10	14	-	-	75
	51+00	-	57+00	553	97	20	19	-	-	16
	57+00	-	63+00	-	-	-	-	-	-	-
SUBTOTAL STAGE 1				13,777	1,964	134	64	-	28	386
STAGE 2										
S. 13TH ST	10+23	-	15+00	2,381	738	40	-	-	-	77
	15+00	-	21+00	3,570	146	-	-	-	111	91
	21+00	-	27+00	2,702	106	20	33	5,346	-	69
	27+00	-	29+50	1,041	23	10	-	144	-	27
				-						
W. PUETZ RD	WEST MEDIAN			27	-	-	-	-	-	1
	EAST MEDIAN			25	-	-	-	-	-	1
SUBTOTAL STAGE 2				9,746	1,013	70	33	5,490	111	266
UNDISTRIBUTED				477	123	6	3	10	11	148
				24,000	3,100	210	100			800
ITEM TOTAL				**24,000**	**3,100**	**210**	**100**	**5,500**	**150**	**800**

STORM SEWER PIPE

	BEGIN STR NO.	END STR NO.	520.8000 CONCRETE COLLARS FOR PIPE EACH CATEGORY 0010	608.0315 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 15-INCH LF CATEGORY 0010	608.0318 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 18-INCH LF CATEGORY 0010	608.0324 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 24-INCH LF CATEGORY 0010	608.0330 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 30-INCH LF CATEGORY 0010	608.0336 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 36-INCH LF CATEGORY 0010	608.0512 STORM SEWER PIPE REINFORCED CONCRETE CLASS V 12-INCH LF CATEGORY 0010	608.2324 STORM SEWER PIPE REINFORCED CONCRETE HORIZONTAL ELLIPTICAL CLASS HE-III 24X38-INCH LF CATEGORY 0010	608.3012 STORM SEWER PIPE CLASS III-A 12-INCH LF CATEGORY 0010	608.3015 STORM SEWER PIPE CLASS III-A 15-INCH LF CATEGORY 0010
STAGE 1												
S. 13TH ST	9.0	10.0	-	-	-	-	213	-	-	-	-	-
	9.1	9.0	-	12	-	-	-	-	-	-	-	-
	9.2	9.0	-	34	-	-	-	-	-	-	-	-
	910	9.1	-	-	-	-	-	-	-	-	-	14
	920	9.2	-	-	-	-	-	-	-	-	-	47
	10.0	10A	-	-	-	-	60	-	-	-	-	-
	10.1	10.0	-	-	-	-	-	-	34	-	-	-
	10A	11.0	-	-	-	-	-	180		-	-	-
	10B	10A	-	-	-	-	-	-	23	-	-	-
	10C	10B	-	-	-	-	-	-	-	-	16	-
	EX. HE	EX. HE	2	-	-	-	-	-	-	8	-	-
	11.0	12.0	-	-	-	-	-	123	-	-	-	-
	11.1	11.0	-	-	-	-	-	-	31	-	-	-
	12.2	12.1	-	8	-	-	-	-	-	-	-	-
	12.1	12.0	-	12	-	-	-	-	-	-	-	-
	12.0	12.3	-	-	-	-	-	28	-	-	-	-
	12.4	12.3	-	12	-	-	-	-	-	-	-	-
	12.3	12.5	-	-	-	-	-	58	-	-	-	-
	13.0	13.1	-	-	-	-	13	-	-	-	-	-
	EX. 129	13.0	-	-	-	-	226	-	-	-	-	-
	15.2	15.1	-	-	-	-	-	-	44	-	-	-
	15.1	15.0	-	22	-	-	-	-	-	-	-	-
	15.0	15.3	-	-	64	-	-	-	-	-	-	-
	17.1	17.0	-	-	-	-	-	-	12	-	-	-
	17.2	17.0	-	40	-	-	-	-	-	-	-	-
	17.3	17.2	-	32	-	-	-	-	-	-	-	-
	17.0	18.0	-	100	-	-	-	-	-	-	-	-
	18.1	18.0	-	-	-	-	-	-	12	-	-	-
	18.2	18.0	-	-	-	-	-	-	33	-	-	-
	18.0	19.0	-	-	-	215	-	-	-	-	-	-
	19.1	19.0	-	-	-	-	-	-	42	-	-	-
	19.0	20.0	-	-	-	160	-	-	-	-	-	-
	19A	19B	-	-	-	-	-	-	43	-	-	-
	19B	19C	-	-	-	-	-	-	33	-	-	-
	20.2	20.1	-	8	-	-	-	-	-	-	-	-
	20.1	20.0	-	12	-	-	-	-	-	-	-	-
	20.4	20.3	-	8	-	-	-	-	-	-	-	-
	20.3	20.0	-	22	-	-	-	-	-	-	-	-
	20.0	72x113	1	-	-	61	-	-	-	-	-	-
	24.0	72x113	1	-	-	7	-	-	-	-	-	-

STORM SEWER PIPE (CONT'D)

	BEGIN STR NO.	END STR NO.	520.8000 CONCRETE COLLARS FOR PIPE EACH CATEGORY 0010	608.0315 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 15-INCH LF CATEGORY 0010	608.0318 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 18-INCH LF CATEGORY 0010	608.0324 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 24-INCH LF CATEGORY 0010	608.0330 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 30-INCH LF CATEGORY 0010	608.0336 STORM SEWER PIPE REINFORCED CONCRETE CLASS III 36-INCH LF CATEGORY 0010	608.0512 STORM SEWER PIPE REINFORCED CONCRETE CLASS V 12-INCH LF CATEGORY 0010	608.2324 STORM SEWER PIPE REINFORCED CONCRETE HORIZONTAL ELLIPTICAL CLASS HE-III 24X38-INCH LF CATEGORY 0010	608.3012 STORM SEWER PIPE CLASS III-A 12-INCH LF CATEGORY 0010	608.3015 STORM SEWER PIPE CLASS III-A 15-INCH LF CATEGORY 0010
	25.0	24.0	-	-	-	205	-	-	-	-	-	-
	25.1	25.0	-	-	-	-	-	-	16	-	-	-
	25.4	25.3	-	-	35	-	-	-	-	-	-	-
	25.3	25.2	-	-	27	-	-	-	-	-	-	-
	25.2	25.0	-	-	23	-	-	-	-	-	-	-
	26.0	25.0	-	268	-	-	-	-	-	-	-	-
	26.1	26.0	-	-	-	-	-	-	12	-	-	-
	26.2	26.0	-	-	-	-	-	-	23	-	-	-
	27.0	26.0	-	275	-	-	-	-	-	-	-	-
	28.0	27.0	-	288	-	-	-	-	-	-	-	-
	27.1	27.0	-	-	-	-	-	-	24	-	-	-
	27.2	27.0	-	-	-	-	-	-	20	-	-	-
	28.2	28.1	-	8	-	-	-	-	-	-	-	-
	28.1	28.0	-	24	-	-	-	-	-	-	-	-
	28.4	28.3	-	8	-	-	-	-	-	-	-	-
	28.3	28.0	-	27	-	-	-	-	-	-	-	-
SUBTOTAL STAGE 1			4	1,220	149	648	512	389	402	8	16	61
STAGE 2												
S. 13TH ST	1.0	EXISTING	-	59	-	-	-	-	-	-	-	-
	1.1	1.0	-	-	-	-	-	-	12	-	-	-
	1.2	1.0	-	-	-	-	-	-	34	-	-	-
	2.0	1.0	-	251	-	-	-	-	-	-	-	-
	2.1	2.0	-	-	-	-	-	-	12	-	-	-
	2.2	2.0	-	-	-	-	-	-	34	-	-	-
	3.0	4.0	-	176	-	-	-	-	-	-	-	-
	3.1	3.0	-	-	-	-	-	-	33	-	-	-
	3.2	3.0	-	-	-	-	-	-	43	-	-	-
	4.0	5.0	-	235	-	-	-	-	-	-	-	-
	4.1	4.0	-	-	-	-	-	-	12	-	-	-
	4.2	4.0	-	-	-	-	-	-	28	-	-	-
	5.0	6.0	-	-	110	-	-	-	-	-	-	-
	5.1	5.0	-	-	-	-	-	-	12	-	-	-
	5.2	5.0	-	-	-	-	-	-	34	-	-	-
	6.0	7.0	-	-	200	-	-	-	-	-	-	-
	EX. CPP	6.1	-	-	-	-	-	-	-	-	20	-
	6.1	6.0	-	30	-	-	-	-	-	-	-	-
	7.0	8.0	-	-	-	250	-	-	-	-	-	-
	7.1	7.0	-	-	-	-	-	-	12	-	-	-
	7.2	7.0	-	-	-	-	-	-	34	-	-	-
	8.1	8.0	-	-	-	-	-	-	12	-	-	-
	8.2	8.0	-	-	-	-	-	-	34	-	-	-
	8.0	9.0	-	-	-	298	-	-	-	-	-	-
	9.3	9.1	-	16	-	-	-	-	-	-	-	-
SUBTOTAL STAGE 2			-	751	310	548	-	-	346	-	20	-
UNDISTRIBUTED			-	29	16	54	38	36	52	2	4	4
ITEM TOTAL			**4**	**2,000**	**475**	**1,250**	**550**	**425**	**800**	**10**	**40**	**65**

STORM SEWER STRUCTURES

LOCATION	STR NO.	STATION	OFFSET**	522.1012 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 12-INCH EACH 0010	522.1015 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 15-INCH EACH 0010	522.1018 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 18-INCH EACH 0010	522.1030 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 30-INCH EACH 0010	522.1036 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 36-INCH EACH 0010	611.0555 MANHOLE COVERS TYPE Q EACH 0010	611.1004 CATCH BASINS 4-FT DIAMETER EACH 0010	611.1006 CATCH BASINS 6-FT DIAMETER EACH 0010	611.2004 MANHOLES 4-FT DIAMETER EACH 0010	611.2005 MANHOLES 5-FT DIAMETER EACH 0010	611.2006 MANHOLES 6-FT DIAMETER EACH 0010	611.3225 INLETS 2X2.5-FT EACH 0010	611.8110* ADJUSTING MANHOLE COVERS EACH 0010	611.8115 ADJUSTING INLET COVERS EACH 0010	650.4000 CONSTRUCTION STAKING STORM SEWER EACH 0010	SPV.0060.01 INLET COVERS TYPE 57 EACH 0010	SPV.0060.04 CLEANING DRAINAGE STRUCTURES AND PIPES EACH 0010	RIM ELEV EXISTING	RIM ELEV FINSHED	RIM ELEV DIFF (FT)
STAGE 1																							
S. 13TH ST	9.0	29+48	5.5' LT	-	-	-	-	-	1	-	-	-	1	-	-	-	-	1	-	-			
	9.1	29+48	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	9.2	29+48	28' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	10.0	31+60	5.5' LT	-	-	-	-	-	1	-	-	-	1	-	-	-	-	1	-	-			
	10.1	31+60	28.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	10A	32+20	5.5' LT	-	-	-	-	-	1	-	-	-	1	-	-	-	-	1	-	-			
	10B	32+15	28' LT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	10C	32+09	41.8' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	EX. MH	31+59	41.8' LT	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	1	716.50	716.58	0.08
	EX. INL	32+23	56.3' RT	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	714.85	714.81	-0.04
	EX.MH	32+27	36.6' RT	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	1	715.18	714.82	-0.36
	EX 129	32+65	36.3' RT	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	1	714.46	714.32	-0.14
	EX. INL	32+78	60.1' RT	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	713.76	713.68	-0.08
	11.0	34+00	5.5' LT	-	-	-	-	-	1	-	-	-	1	-	-	-	-	1	-	-			
	11.1	33+98	36.5' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	12.0	35+23	5.5' LT	-	-	-	-	-	1	-	-	-	-	1	-	-	-	1	-	-			
	12.1	35+23	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	12.2	35+15	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	12.3	35+23	22.2' RT	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1	1	-			
	12.4	35+11	22.6' RT	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1	1	-			
	12.5	35+78	39.6' RT	-	-	-	-	1	-	-	-	-	-	-	-	-	-	1	-	-			
	13.0	34+91	27.9' RT	-	-	-	-	-	1	-	-	-	-	-	1	-	-	1	-	-			
	13.1	35+00	36.5' RT	-	-	-	1	-	-	-	-	-	-	-	-	-	-	1	-	-			
	15.0	36+75	38.5' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	15.1	36+75	17.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	15.2	36+75	26.9' LT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	15.3	36+13	40.9' RT	-	-	1	-	-	-	-	-	-	-	-	-	-	-	1	-	-			
	17.0	44+75	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	17.1	44+75	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	17.2	44+75	34.6' RT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	17.3	44+44	37.5' RT	-	1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-			
	18.0	45+75	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	18.1	45+75	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	18.2	45+75	27.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	EX. MH	46+37	62.0' RT	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	1	710.50	710.58	0.08
	19.0	47+90	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	19.1	47+90	36.8' RT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	19A	48+33	35.0' LT	1	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-			
	19B	48+76	35.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	19C	49+09	35.0' LT	1	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-			
	20.0	49+50	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	20.1	49+50	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	20.2	49+58	17.0' LT	-	-	-	-	-	-	-	-		-	-	1	-	-	1	1	-			
	20.3	49+50	17.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	20.4	49+58	17.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	24.0	50+27	5.5' LT	-	-	-	-	-	1	-	-	-	1	-	-	-	-	1	-	-			
	25.0	52+32	5.5' LT	-	-	-	-	-	1	-	-	-	1	-	-	-	-	1	-	-			
	25.1	52+32	21.3' LT	-	-	-	-	-	-	1	-		-	-	-	-	-	1	1	-			
	25.2	52+32	17.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	25.3	52+32	44.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	25.4	52+67	46.7' RT	-	-	1	-	-	-	-	-	-	-	-	-	-	-	1	-	-			
	26.0	55+00	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	26.1	55+00	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	26.2	55+00	17.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	27.0	57+75	2.4' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	27.1	57+75	25.9' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	27.2	57+75	17.0' RT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	28.0	60+63	6.0' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	28.1	60+63	30.0' LT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	28.2	60+55	30.0' LT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	28.3	60+63	20.6' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	28.4	60+71	21.6' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
SUBTOTAL STAGE 1				2	1	2	1	1	15	17	2	7	6	2	15	4	2	56	34	6			

STORM SEWER STRUCTURES (CONT'D)

LOCATION	STR NO.	STATION	OFFSET**	522.1012 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 12-INCH EACH 0010	522.1015 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 15-INCH EACH 0010	522.1018 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 18-INCH EACH 0010	522.1030 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 30-INCH EACH 0010	522.1036 APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 36-INCH EACH 0010	611.0555 MANHOLE COVERS TYPE Q EACH 0010	611.1004 CATCH BASINS 4-FT DIAMETER EACH 0010	611.1005 CATCH BASINS 5-FT DIAMETER EACH 0010	611.2004 MANHOLES 4-FT DIAMETER EACH 0010	611.2005 MANHOLES 5-FT DIAMETER EACH 0010	611.2006 MANHOLES 6-FT DIAMETER EACH 0010	611.3225 INLETS 2X2.5-FT EACH 0010	611.8110* ADJUSTING MANHOLE COVERS EACH 0010	611.8115 ADJUSTING INLET COVERS EACH 0010	650.4000 CONSTRUCTION STAKING STORM SEWER EACH 0010	SPV.0060.01 INLET COVERS TYPE 57 EACH 0010	SPV.0060.04 CLEANING DRAINAGE STRUCTURES AND PIPES EACH 0010	RIM ELEV EXISTING	RIM ELEV FINSHED	DIFF (FT)
STAGE 2																							
S. 13TH ST	EX. MH	10+26	20.6' LT	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	1	725.23	725.22	-0.01
	1.0	10+84	11.0' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	1.1	10+84	22.5' LT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	1.2	10+84	22.5' RT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	2.0	13+35	11.0' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	2.1	13+35	22.5' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	2.2	13+35	22.5' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	3.0	16+79	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	3.1	16+57	31.3' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	3.2	16+75	37.0' RT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	4.0	18+55	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	4.1	18+55	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	4.2	18+55	22.3' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	5.0	20+90	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	5.1	20+90	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	5.2	20+90	28.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	6.0	22+00	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	6.1	21+97	35.7' LT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	7.0	24+00	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	7.1	24+00	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	7.2	24+00	28.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	8.0	26+50	5.5' LT	-	-	-	-	-	1	-	-	1	-	-	-	-	-	1	-	-			
	8.1	26+50	17.0' LT	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	1	-			
	8.2	26+50	28.0' RT	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	-			
	9.3	29+48	33.2' LT	-	1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-			
SUBTOTAL STAGE 2				-	1	-	-	-	8	7	-	8	-	-	8	1	-	24	15	1			
ITEM TOTAL				**2**	**2**	**2**	**1**	**1**	**23**	**24**	**2**	**15**	**6**	**2**	**23**	**5**	**2**	**80**	**49**	**7**			

* ADDITIONAL QUANTITIES SHOWN ELSEWHERE
** STATIONS AND OFFSETS ARE TO CENTER OF STRUCTURE
*** DEPTH = RIM ELEV - INVERT ELEVATION

SANITARY MANHOLES

LOCATION	STATION	OFFSET	611.0420 RECONSTRUCTING MANHOLES EACH CATEGORY 0020	611.8110* ADJUSTING MANHOLE COVERS EACH CATEGORY 0020	SPV.0060.11 INTERNAL/EXTERNAL SANITARY MANHOLE SEAL EACH CATEGORY 0020	RIM ELEV EXISTING	RIM ELEV FINSHED	DIFF (FT)
S 13TH ST								
STAGE 1	32+29	46' LT	-	1	1	715.89	715.53	-0.36
	32+30	21' RT	-	1	1	715.41	714.85	-0.56
	32+94	44' LT	-	1	1	714.34	714.26	-0.08
	36+33	44' LT	-	1	1	712.09	712.46	0.37
	36+93	36' RT	-	1	1	713.15	712.54	-0.61
	40+68	36' RT	-	1	1	717.22	718.08	0.86
	41+66	36' RT	1	1	-	717.82	715.96	-1.86
	45+04	44' LT	-	1	1	714.13	714.34	0.21
	51+78	66' RT	-	1	1	712.12	711.98	-0.14
				-	-			
SUBTOTAL STAGE 1			1	9	8			
S 13TH ST								
STAGE 2	14+80	20' RT	-	1	1	736.37	735.81	-0.56
	18+29	20' RT	1	-	1	733.40	732.00	-1.40
	21+90	21' RT	1	-	1	726.46	725.52	-0.94
	25+64	21' RT	1	-	1	723.12	721.61	-1.51
	28+64	21' RT	-	1	1	720.41	719.52	-0.89
SUBTOTAL STAGE 2			3	2	5			
TOTAL			**4**	**11**	**13**			

*ADDITIONAL QUANTITIES SHOWN ELSEWHERE

FENCE CHIAN LINK

LOCATION	STATION	-	STATION	OFFSET	616.0206 FENCE CHAIN LINK 6-FT LF CATEGORY 0010
STAGE 1					
S. 13TH ST	35+76	-	36+06	33' RT	32
	35+78	-	36+04	34' LT	33
	49+93	-	50+34	36' RT	46
UNDISTRIBUTED					9
					120

MOBILIZATION

CATEGORY	PROJECT	619.1000 MOBILIZATION EACH
0010	2505-03-71	1
TOTAL		**1**

PIPE UNDERDRAIN

LOCATION	STATION	-	STATION	310.0110 BASE AGGREGATE OPEN-GRADED TON CATEGORY 0010	612.0204 PIPE UNDERDRAIN UNPERFORATED 4-INCH LF CATEGORY 0010	612.0206 PIPE UNDERDRAIN UNPERFORATED 6-INCH LF CATEGORY 0010	613.0208 PIPE UNDERDRAIN UNPERFORATED 8-INCH LF CATEGORY 0010	612.0700 DRAIN TILE EXPLORATION LF CATEGORY 0010	645.0111 GEOTEXTILE TYPE DF SCHEDULE A SY CATEGORY 0010
STAGE 1									
S. 13TH ST	29+50	-	33+00	-	171	-	-	-	-
	33+00	-	39+00	-	49	-	-	-	-
	39+00	-	45+00	-	-	-	-	-	-
	45+00	-	51+00	-	-	-	-	-	-
	51+00	-	57+00	-	-	-	-	-	-
	57+00	-	63+00	-	-	-	-	-	-
SUBTOTAL STAGE 1				-	220	-	-	-	-
STAGE 2									
S. 13TH ST	10+23	-	15+00	-	-	-	-	-	-
	15+00	-	21+00	-	122	-	-	-	-
	21+00	-	27+00	-	168	-	85	-	-
	27+00	-	29+50	-	207	-	-	-	-
SUBTOTAL STAGE 2				-	497	-	85	-	-
UNDISTRIBUTED				10	83	100	15	250	20
TOTAL				**10**	**800**	**100**	**100**	**250**	**20**

3

RESTORATION ITEMS

LOCATION	STATION - STATION	625.0100 TOPSOIL SY CATEGORY 0010	628.2008 EROSION MAT URBAN CLASS I TYPE B SY CATEGORY 0010	629.0210 FERTILIZER TYPE B CWT CATEGORY 0010	630.0110 SEEDING MIXTURE NO. 10 LB CATEGORY 0010	630.0170 SEEDING MIXTURE NO. 70 LB CATEGORY 0010	630.0500 SEED WATER MGAL CATEGORY 0010	631.0300 SOD WATER MGAL CATEGORY 0010	631.1000 SOD LAWN SY CATEGORY 0010
STAGE 1									
S. 13TH ST	29+50 - 33+00	774	-	-	-	-	-	19	774
	33+00 - 39+00	2,069	413	-	-	2	-	40	1,656
	39+00 - 45+00	2,025	-	-	-	-	-	49	2,025
	45+00 - 51+00	1,822	702	-	-	3	-	27	1,121
	51+00 - 57+00	2,643	109	-	-	1	-	61	2,534
	57+00 - 63+00	2,121	420	-	-	2	-	41	1,702
SUBTOTAL STAGE 1		11,454	1,644	-	-	8	-	237	9,812
STAGE 2									
S. 13TH ST	10+23 - 15+00	1,112	161	0.11	3	-	4	23	951
	15+00 - 21+00	1,086	229	-	-	1	-	21	857
	21+00 - 27+00	1,105	126	-	-	1	-	24	979
	27+00 - 29+50	638	-	-	-	-	-	16	638
SUBTOTAL STAGE 2		3,941	516	0.11	3	2	4	84	3,425
UNDISTRIBUTED		605	340	0.04	2	2	1	29	263
TOTAL		**16,000**	**2,500**	**0.15**	**5**	**12**	**5**	**350**	**13,500**

3

EROSION CONTROL ITEMS

LOCATION	STATION - STATION	606.0200 RIPRAP MEDIUM CY CATEGORY 0010	624.0100 WATER MGAL CATEGORY 0010	627.0200 MULCHING SY CATEGORY 0010	628.1504 SILT FENCE LF CATEGORY 0010	628.1520 SILT FENCE MAINTENANCE LF CATEGORY 0010	628.1905 MOBILIZATIONS EROSION CONTROL EACH CATEGORY 0010	628.1910 MOBILIZATIONS EMERGENCY EROSION CONTROL EACH CATEGORY 0010	628.6510 SOIL STABILIZER TYPE B ACRE CATEGORY 0010	628.7005 INLET PROTECTION TYPE A EACH CATEGORY 0010	628.7010 INLET PROTECTION TYPE B EACH CATEGORY 0010	628.7015 INLET PROTECTION TYPE C EACH CATEGORY 0010	628.7020 INLET PROTECTION TYPE D EACH CATEGORY 0010	628.7504 TEMPORARY DITCH CHECKS LF CATEGORY 0010	628.7555 CULVERT PIPE CHECKS EACH CATEGORY 0010	628.7570 ROCK BAGS EACH CATEGORY 0010	630.0200 SEEDING TEMPORARY LB CATEGORY 0010	645.0130 GEOTEXTILE TYPE R SY CATEGORY 0010
STAGE 1																		
S. 13TH ST	29+50 - 33+00	-	--	--	--	--	--	--	--	--	7	--	--	--	3	--	--	-
	33+00 - 39+00	10	--	--	172	172	--	--	--	1	3	--	4	27	5	--	--	15
	39+00 - 45+00	-	--	--	48	48	--	--	--	1	1	--	--	--	11	--	--	-
	45+00 - 51+00	58	--	--	643	643	--	--	--	2	2	--	4	--	5	20	--	86
	51+00 - 57+00	-	--	--	80	80	--	--	--	1	4	--	--	--	6	--	--	-
	57+00 - 63+00	-	--	--	360	360	--	--	--	1	4	--	4	--	3	10	--	-
SUBTOTAL STAGE 1		68	--	--	1,303	1,303	2	2	--	6	21	--	12	27	33	30	--	101
STAGE 2																		
S. 13TH ST	10+23 - 15+00	-	-	161	88	88	-	-	-	-	6	-	-	-	-	-	-	-
	15+00 - 21+00	-	-	229	235	235	-	-	-	1	5	-	-	-	-	-	-	-
	21+00 - 27+00	-	-	126	150	150	-	-	-	-	5	-	-	-	-	1	-	-
	27+00 - 29+50	-	-	-	--	--	-	-	-	-	-	-	-	9	2	-	-	-
SUBTOTAL STAGE 2		--	--	516	473	473	2	2	0.1	1	16	--	--	9	2	1	--	--
UNDISTRIBUTED		7	20	84	224	224	--	--	0.1	3	3	4	3	4	5	19	10	19
TOTAL		**75**	**20**	**600**	**2,000**	**2,000**	**4**	**4**	**0.2**	**10**	**40**	**4**	**15**	**40**	**40**	**50**	**10**	**120**

3

TRAFFIC CONTROL

CATEGORY	STAGE	DAYS	EACH*	643.0300 TRAFFIC CONTROL DRUMS DAY	EACH*	643.0420 TRAFFIC CONTROL BARRICADES TYPE III DAY	EACH*	643.0705 TRAFFIC CONTROL WARNING LIGHTS TYPE A DAY	EACH*	643.0900 TRAFFIC CONTROL SIGNS DAY	643.0920 TRAFFIC CONTROL COVERING SIGNS TYPE II EACH**	EACH*	643.1050 TRAFFIC CONTROL SIGNS PCMS DAY	EACH*	643.1070 TRAFFIC CONTROL CONES 42-INCH DAY	643.3150 TEMPORARY MARKING LINE REMOVABLE TAPE 4-INCH LF	643.3250 TEMPORARY MARKING LINE REMOVABLE TAPE 8-INCH LF	643.3550 TEMPORARY MARKING ARROW REMOVABLE TAPE EACH	643.3650 TEMPORARY MARKING WORD REMOVABLE TAPE EACH	643.3850 TEMPORARY MARKING STOP LINE REMOVABLE TAPE 18-INCH LF	643.5000 TRAFFIC CONTROL EACH	644.1440 TEMPORARY PEDESTRIAN SURFACE MATTING SF	EACH*	644.1601 TEMPORARY PEDESTRIAN CURB RAMP DAY	644.1605 TEMPORARY PEDESTRIAN DETECTABLE WARNING FIELD SF	644.1810 TEMPORARY PEDESTRIAN BARRICADE LF
0010	DETOUR - STAGES 1 & 2	215	--	--	--	--	--	--	240	51600	--	2	430	--	--	--	--	--	--	--	--	--	--		--	--	--
SUBTOTAL				--		--		--		51600	--		430		--	--	--	--	--	--	--	--	--		--	--	--
0010	PRE STAGE 1 - S. 13TH ST & W. PUETZ RD	5	30	150	4	20	8	40	6	30	--	--	--	--	--	--	--	--	--	--	--	--		--	--	--
0010	STAGE 1 - S. 13TH ST	110	27	2970	26	2860	52	5720	32	3520	--	--	--	--	--	--	--	2	1	50	--	--		--	--	--
0010	STAGE 1 - W. DREXEL AVE	110	27	2970	3	330	6	660	12	1320	--	--	--	--	--	--	--	--	--	--	--	--		--	--	--
0010	STAGE 1A - TEMP PEDESTRIAN CROSSING	60	--	--	3	180	6	360	12	720	--	--	--	--	--	--	123	--	--	--	--	595	2	120	20	--
0010	STAGE 1B - TEMP PEDESTRIAN CROSSING	50	--	--	3	150	6	300	14	700	--	--	--	--	--	--	141	--	--	--	--	2,890	4	200	40	535
SUBTOTAL				6090		3540		7080		6290	--		--		--	--	264	2	1	50	--	3485		320	60	535
0010	STAGE 2 - S. 13TH ST	115	--	--	10	1150	20	2300	16	1840	--	--	--	7	805	50	--	--	--	35	--	--		--	--	--
0010	STAGE 2 - W. PUETZ RD	115	14	1610	4	460	8	920	12	1380	4	--	--	17	1955	--	--	--	--	--	--	--		--	--	--
0010	STAGE 2 - TEMP PEDESTRIAN CROSSING	115	--	--	3	345	6	690	18	2070	--	--	--	--	--	--	112	--	--	--	--	30	2	230	20	45
SUBTOTAL				1610		1955		3910		5290	4		--		2760	50	112	--	--	35	--	30		230	20	45
0010	UNDISTRIBUTED			300		255		510		820	6		70		40	--	24	--	--	15	1	85		150	20	120
	*** FOR INFORMATIONAL USE ONLY**	**TOTAL 0010**		**8,000**		**5,750**		**11,500**		**64,000**	**10**		**500**		**2,800**	**50**	**400**	**2**	**1**	**100**	**1**	**3,600**		**700**	**100**	**700**

**** ONE CYCLE PER STAGE**

CONSTRUCTION STAKING ITEMS

LOCATION	STATION		TO STATION	650.4500 CONSTRUCTION STAKING SUBGRADE LF CATEGORY 0010	650.5000 CONSTRUCTION STAKING BASE LF CATEGORY 0010	650.5500 CONSTRUCTION STAKING CURB GUTTER AND CURB & GUTTER LF CATEGORY 0010	650.7000 CONSTRUCTION STAKING CONCRETE PAVEMENT LF CATEGORY 0010	650.9000 CONSTRUCTION STAKING CURB RAMPS EACH CATEGORY 0010	650.9000 CONSTRUCTION STAKING CURB RAMPS EACH CATEGORY 0020	650.9500.01 CONSTRUCTION STAKING CONCRETE SIDEWALK PROJECT 2505-03-71 EACH CATEGORY 0010	650.9500.01 CONSTRUCTION STAKING CONCRETE SIDEWALK PROJECT 2505-03-71 EACH CATEGORY 0020	650.9911.01 CONSTRUCTION STAKING SUPPLEMENTAL CONTROL PROJECT 2505-03-71 EACH CATEGORY 0010	650.9920 CONSTRUCTION STAKING SLOPE STAKES LF CATEGORY 0010
STAGE 1													
S. 13TH ST	29+50	-	33+00	390	40	40	350	5	2	--	--	--	390
	33+00	-	39+00	675	75	--	600	1	--	--	--	--	675
	39+00	-	45+00	600	--	--	600	--	--	--	--	--	600
	45+00	-	51+00	640	40	20	600	2	--	--	--	--	640
	51+00	-	57+00	699	99	30	600	2	--	--	--	--	699
	57+00	-	63+00	435	--	--	435		--	--	--	--	435
SUBTOTAL STAGE 1				3,439	254	90	3,185	10	2	0.8	0.2	1	3,439
STAGE 2													
S. 13TH ST	10+23	-	15+00	477	--	--	477	5	1	--	--	--	477
	15+00	-	21+00	600	--	--	600	--	--	--	--	--	600
	21+00	-	27+00	371	30	30	341	3	1	--	--	--	371
	27+00	-	29+50	640	40	40	600	1	1	--	--	--	640
SUBTOTAL STAGE 2				2,088	70	70	2,018	9	3	0.8	0.2	1	2,088
UNDISTRIBUTED				673	26	40	697	1	--	--	--	--	673
								20	**5**	**1.6**	**0.4**		
TOTAL				**6,200**	**350**	**200**	**5,900**	**25**		**2.0**		**2**	**6,200**

SAW CUTTING

LOCATION	STATION		STATION	690.0150 SAWING ASPHALT LF CATEGORY 0010	690.0250 SAWING CONCRETE LF CATEGORY 0010
STAGE 1					
S. 13TH ST	29+50	-	33+00	130	73
	33+00	-	39+00	73	70
	39+00	-	45+00	58	179
	45+00	-	51+00	58	93
	51+00	-	57+00	111	102
	57+00	-	63+00	-	147
SUBTOTAL STAGE 1				430	664
STAGE 2					
S. 13TH ST	10+23	-	15+00	167	-
	15+00	-	21+00	35	-
	21+00	-	27+00	73	38
	27+00	-	29+50	30	52
SUBTOTAL STAGE 2				305	90
UNDISTRIBUTED				65	46
TOTAL				**800**	**800**

WATER VALVE ADJUSTMENTS

LOCATION	STATION	OFFSET	SPV.0060.02 ADJUSTING WATER VALVE BOXES EACH CATEGORY 0020
STAGE 1			
S. 13TH ST			
	29+75	20' LT	1
	32+72	15' LT	1
	35+90	13' LT	1
	36+41	14' LT	1
	46+54	45' RT	1
	51+51	20' LT	1
	51+87	14' LT	1
	51+87	20' LT	1
	51+87	74' RT	1
	51+96	20' LT	1
	52+08	59' RT	1
	56+72	59' RT	1
STAGE 1 SUBTOTAL			12
STAGE 2			
S. 13TH ST			
	11+86	19' LT	1
	12+72	19' LT	1
	22+26	20' LT	1
	23+52	19' LT	1
STAGE 2 SUBTOTAL			4
TOTAL			**16**

WATER MAIN PROTECTION

LOCATION	STATION	OFFSET	SPV.0060.03 WATERMAIN PROTECTION EACH CATEGORY 0020
STAGE 1			
S. 13TH ST			
	26+50	17' LT	1
	35+15	17' LT	1
	35+23	17' LT	1
	44+75	17' LT	1
	49+13	17' LT	1
	49+21	17' LT	1
	55+00	17' LT	1
STAGE 1 SUBTOTAL			7
STAGE 2			
S. 13TH ST			
	18+55	17' LT	1
	20+90	17' LT	1
	24+00	17' LT	1
	26+50	17' LT	1
STAGE 2 SUBTOTAL			4
TOTAL			**11**

TEST ROLLING

LOCATION	STATION		STATION	SPV.0170.01 TEST ROLLING STA CATEGORY 0010
STAGE 1				
S. 13TH ST	29+50	-	33+00	4
	33+00	-	39+00	6
	39+00	-	45+00	6
	45+00	-	51+00	6
	51+00	-	57+00	6
	57+00	-	63+00	5
SUBTOTAL STAGE 1				33
STAGE 2				
S. 13TH ST	10+23	-	15+00	5
	15+00	-	21+00	6
	21+00	-	27+00	6
	27+00	-	29+50	3
SUBTOTAL STAGE 2				20
UNDISTRIBUTED				2
TOTAL				**55**

MISC. ITEMS

LOCATION	SPV.0035.01 BACKFILL SLURRY CY	SPV.0060.05 UTILITY LINE OPENING (ULO) EACH	SPV.0060.06 FIELD FACILITIES OFFICE SPACE EACH	SPV.0060.07 REMOVE AND REINSTALL MAILBOXES EACH	SPV.0060.08 TEMPORARY MAILBOXES EACH	SPV.0060.09 REPLACEMENT MAILBOX POSTS & HARDWARE EACH	SPV.0060.10 SECTION CORNER MONUMENTS EACH	SPV.0060.12 CORED HOLES 6-INCH EACH	SPV.0060.14 CONSTRUCTION DEWATERING EACH	611.8120.S COVER PLATES TEMPORARY EACH
S. 13TH ST										
UNDISTRIBUTED	250	8	1	70	70	25	1	40	2	10
TOTAL	**250**	**8**	**1**	**70**	**70**	**25**	**1**	**40**	**2**	**10**

CATEGORY 0010

SIGNING

CATEGORY	SIGN NO.	SIGN CODE	DESCRIPTION	INCHES	SIZE X	INCHES	* 634.0811 POSTS TUBULAR STEEL 2X2-INCH X 11-FT EACH	* 634.0812 POSTS TUBULAR STEEL 2X2-INCH X 12-FT EACH	* 634.0814 POSTS TUBULAR STEEL 2X2-INCH X 14-FT EACH	* 637.2210 SIGNS TYPE II REFLECTIVE H SF	* 637.2215 SIGNS TYPE II REFLECTIVE H FOLDING SF	* 637.2230 SIGNS TYPE II REFLECTIVE F SF	* 638.2102 MOVING SIGNS TYPE II EACH	* 638.2602 REMOVING SIGNS TYPE II EACH	* 638.3000 REMOVING SMALL SIGN SUPPORTS EACH	* 637.0620 SIGN FLAGS PERMANENT TYPE II EACH	REMARKS
0010	1.01	R1-1F	STOP (FOLDING)	30	X	30					5.18			1			ON SIGNAL POLE
0010	1.02		NO PARKING ANY TIME <-->											1	1		
0010	1.03		PUETZ RD											1	1		
0010	1.04		LEFT ONLY, THRU AND RIGHT											1	1		
0010	1.05		NO PARKING ANY TIME <-->											1	1		
0010	1.06		SIGNAL AHEAD											1	1		
0010	1.07		NO PARKING ANY TIME <--											1			FROM SIGNAL POLE
0010	1.08	R2-1	SPEED LIMIT 35	24	X	30	1			5.00				1	1	2	INSTALL SIGN FLAGS, FOLLOW SDD A4-15
0010	1.09	M3-1	NORTH	24	X	12		1		2.00				1	1		
0010	1.10	M1-5A	COUNTY V	24	X	24				4.00				1			SAME POST AS 1.09
0010	1.11		NO PARKING ANY TIME <-->											1	1		
0010	1.12	W6-1	DIVIDED HIGHWAY BEGIN	36	X	36		1				9.00					
0010	1.13	R3-8LF	LEFT ONLY, THRU AND RIGHT	36	X	30		1		7.50							
0010	1.14	W3-3	SIGNAL AHEAD	36	X	36		1				9.00					
0010	1.15	R7-1R	NO PARKING ANY TIME ->	18	X	24		1		3.00							
0010	1.16	R5-1	DO NOT ENTER	30	X	30				6.25							SAME POST AS 1.18
0010	1.17	S5-2	END SCHOOL ZONE	24	X	30		1		5.00				1			SAME POST AS 1.18
0010	1.18	R2-1	SPEED LIMIT 35	24	X	30			1	5.00				1	1		
0010	1.19	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	1.20	S1-1	SCHOOL ZONE	36	X	36			1			6.75		1	1		
0010	1.21	S16-9P	AHEAD	30	X	18						3.75		1			SAME POST AS 1.20
0010	1.22	R2-6P	FINES HIGHER	24	X	18				3.00							SAME POST AS 1.20
0010	1.23	R7-1L	NO PARKING ANY TIME <-	18	X	24	1			3.00							
0010	1.24	S4-51	SCHOOL SPEED LIMIT 15	24	X	48						8.00		1			INSTALL ON FLASHER POLE
0010	1.25		FINES HIGHER											1			
0010	1.26	R4-7	KEEP RIGHT	24	X	30		1		5.00							
0010	1.27	R4-7	KEEP RIGHT	24	X	30		1		5.00							
0010	1.28	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.01	R1-1	STOP	30	X	30		1		5.18				1	1		
0010	2.02	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.03	R5-1C	DO NOT ENTER (CLIPPED CORNERS)	30	X	30				5.18				1			SAME POST AS 2.04
0010	2.04	R1-1	STOP	30	X	30			1	5.18				1	1		
0010	2.05		WE NEED YOU BUCKLE UP										1				SAME POST AS 2.04
0010	2.06	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.07	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.08	R1-1	STOP	30	X	30			1	5.18				1	1		
0010	2.09		WE NEED YOU BUCKLE UP										1				SAME POST AS 2.08
0010	2.10	R5-1C	DO NOT ENTER (CLIPPED CORNERS)	30	X	30				5.18				1			SAME POST AS 2.08
0010	2.11	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.12		ENTER ONLY				2						2		2		
0010	2.13	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.14		RIGHT ONLY											1	1		
0010	2.15	R3-8AR	AHEAD,RIGHT ONLY	36	X	30		1		7.50							
0010	2.16	R4-7	KEEP RIGHT	24	X	30		1		5.00							
0010	2.17		SCHOOL ZONE											2	1		
0010	2.18		DOWN ARROW (LEFT/RIGHT)											2			
						SUBTOTAL 0010	11	11	4	113.15	5.18	36.50	4	27	17	2	

(CONTINUED FROM PREVIOUS PAGE)

SIGNING (CONT'D)

CATEGORY	SIGN NO.	SIGN CODE	DESCRIPTION	INCHES	SIZE X	INCHES	634.0811 POSTS TUBULAR STEEL 2X2-INCH X 11-FT EACH	634.0812 POSTS TUBULAR STEEL 2X2-INCH X 12-FT EACH	634.0814 POSTS TUBULAR STEEL 2X2-INCH X 14-FT EACH	637.2210 SIGNS TYPE II REFLECTIVE H SF	637.2215 SIGNS TYPE II REFLECTIVE H FOLDING SF	637.2230 SIGNS TYPE II REFLECTIVE F SF	638.2102 MOVING SIGNS TYPE II EACH	638.2602 REMOVING SIGNS TYPE II EACH	638.3000 REMOVING SMALL SIGN SUPPORTS EACH	637.0620 SIGN FLAGS PERMANENT TYPE II EACH	REMARKS
0010	2.19	S1-1	SCHOOL ZONE	36	X	36			1			6.75					
0010	2.20	S16-9P	AHEAD	30	X	18						3.75					SAME POST AS 2.19
0010	2.21	R2-6P	FINES HIGHER	24	X	18				3.00							SAME POST AS 2.19
0010	2.22	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.23	R4-7	KEEP RIGHT	24	X	30				5.00							INSTALL BELOW - SCHOOL ZONE SIGN BY OTHERS
0010	2.24		ROAD CURVE AHEAD											1	1		
0010	2.25	R7-1D	NO PARKING ANY TIME <-->	18	X	24	1			3.00							
0010	2.26		SCHOOL ZONE											2	1		
0010	2.27		DOWN ARROW (LEFT/RIGHT)											2			
0010	2.28		NO PARKING ANY TIME <-->				1						1		1		
0010	2.29	R1-1	STOP	30	X	30		1		5.18				1	1		
0010	3.01	R7-1D	NO PARKING ANY TIME <->	18	X	24	1			3.00							
0010	3.02	S4-51	SCHOOL SPEED LIMIT 15	24	X	48						8.00		1			INSTALL ON FLASHER POLE
0010	3.03		FINES HIGHER											1			
0010	3.04	R1-1	STOP	30	X	30		1		5.18				1	1		
0010	3.05	R12-1	WEIGHT LIMIT 3 TONS	24	X	30	1			5.00				1	1		
0010	3.06		SCHOOL ZONE											1	1		
0010	3.07		AHEAD											1			
0010	3.08	R7-1L	NO PARKING ANY TIME <-	18	X	24	1			3.00							
0010	3.09	S1-1	SCHOOL ZONE	36	X	36			1			6.75					
0010	3.10	S16-9P	AHEAD	30	X	18						3.75					SAME POST AS 3.09
0010	3.11	R2-6P	FINES HIGHER	24	X	18				3.00							SAME POST AS 3.09
0010	3.12	W6-2	DIVIDED HIGHWAY ENDS	36	X	36		1				9.00					
0010	3.13	R7-1D	NO PARKING ANY TIME <->	18	X	24	1			3.00							
0010	3.14		DOWN ARROW (LEFT)											3	3		
0010	3.15	R2-1	SPEED LIMIT 35	24	X	30			1	5.00							
0010	3.16	S5-2	END SCHOOL ZONE	24	X	30				5.00							SAME POST AS 3.15
0010	3.17	R7-1R	NO PARKING ANY TIME ->	18	X	24	1			3.00							
0010	3.18	R2-1	SPEED LIMIT 35	24	X	30		1		5.00				1	1		
0010	3.19	R2-1	SPEED LIMIT 35	24	X	30		1		5.00				1	1		
0010	3.20		END SCHOOL ZONE											1			
0010	4.01	R1-1	STOP	30	X	30		1		5.18				1	1		
0010	4.02	R1-1	STOP	30	X	30		1		5.18				1	1		
0010	4.03	R12-1	WEIGHT LIMIT 3 TONS	24	X	30	1			5.00				1	1		
0010	4.04	R1-1	STOP	30	X	30		1		5.18				1	1		
0010	4.05		DO NOT PASS											1	1		
0010	4.06		KEEP RIGHT											1			
0010	5.01	M3-3	SOUTH	24	X	12		1		2.00				1	1		
0010	5.02	M1-5A	COUNTY V	24	X	24				4.00				1			SAME POST AS 5.01
0010	5.03	R2-1	SPEED LIMIT 35	24	X	30		1		5.00				1	1	2	INSTALL SIGN FLAGS, FOLLOW SDD A4-15
0010	5.04	W3-3	SIGNAL AHEAD	36	X	36		1				9.00		1			
0010	5.05	J22-1	TO I-94 ADV LEFT ASSEMBLY	24	X	60			1	10.00				1	1		
0010	5.06	R3-8LAR	LEFT,AHEAD AND RIGHT	54	X	30		2		11.25				1	2		
						SUBTOTAL 0010	9	13	4	117.15	0.00	47.00	1	30	22	2	
						TOTAL 0010	**20**	**24**	**8**	**230.30**	**5.18**	**83.50**	**5**	**57**	**39**	**4**	

TRAFFIC CONTROL SIGNS FIXED MESSAGE

CATEGORY	STAGE	SIGN NO.	NO. REQ'D	SIGN SIZE W (FT)		H (FT)	SIZE SF	643.1000 TRAFFIC CONTROL SIGNS FIXED MESSAGE SF	REMARKS
	1 & 2 DETOUR								
0010		FMS 1	5	7	X	4.0	28.00	140.0	HWY V S 13TH ST CLOSED AT PUETZ RD FOLLOW DETOUR
0010		FMS 2	1	11.5	X	6.0	69.00	69.0	HWY V S 13TH ST CLOSED AT PUETZ RD FOLLOW DETOUR
0010		FMS 3	3	7	X	4.0	28.00	84.0	HWY V S 13TH ST CLOSED AT DREXEL AVE FOLLOW DETOUR
0010		FMS 4	1	11.5	X	6.0	69.00	69.0	HWY V S 13TH ST CLOSED AT DREXEL AVE FOLLOW DETOUR
0010		FMS 5	53	3.5	X	1.0	3.50	185.5	S 13TH ST
0010		FMS 6	8	4.5	X	1.25	5.63	45.0	S 13TH ST
0010	UNDISTRIBUTED							57.0	
							TOTAL 0010	**649.5**	

PAVEMENT MARKING

CATEGORY	STATION	TO STATION	646.1020 MARKING LINE EPOXY 4-INCH (WHITE)* (3' DASH 9' SKIP)* LF	646.1020 MARKING LINE EPOXY 4-INCH (WHITE)* LF	646.1020 MARKING LINE EPOXY 4-INCH (YELLOW)* LF	646.3020 MARKING LINE EPOXY 8-INCH (WHITE)* (3' DASH 9' SKIP)* LF	646.3020 MARKING LINE EPOXY 8-INCH (WHITE)* LF	646.5020 MARKING ARROW EPOXY (TYPE 2)* EACH	646.5120 MARKING WORD EPOXY (ONLY)* EACH	646.6120 MARKING STOP LINE EPOXY 18-INCH (WHITE)* LF	646.7120 MARKING DIAGONAL EPOXY 12-INCH (YELLOW)* LF	646.7420 MARKING CROSSWALK EPOXY TRANSVERSE LINE 6-INCH (WHITE)* LF	646.8020 MARKING CORRUGATED MEDIAN EPOXY (YELLOW)* SF	646.8220 MARKING ISLAND NOSE EPOXY EACH
0010	9+00	15+00	--	860	1,065	18	315	2	1	120	20	415	--	--
0010	15+00	21+00	--	1,200	1,560	--		--	--	--	10	--	--	--
0010	21+00	27+00	33	1,135	1,065	--	130	2	--	20	--	95	2,120	1
0010	27+00	33+00	--	1,190	740	--	450	6	2	110	15	375	--	1
0010	33+00	39+00	120	1,090	1,215	21	55	1	--	20	10	--	260	2
0010	39+00	45+00	12	1,170	1,200	--	--	--	--	--	--	--	--	--
0010	45+00	51+00	39	1,135	1,200	--	50	1	--	15	--	70	--	--
0010	51+00	57+00	57	970	1,025	18	30	--	--	40	--	65	--	--
0010	57+00	63+00	33	1,070	1,100	42	485	3	3	45	--	140	--	--
0010	SUBTOTAL		294	9,820	10,170	99	1,515	15	6	370	55	1,160	2,380	4
0010	UNDISTRIBUTED		--	716	--	0	186	--	--	80	25	240	120	--
		TOTAL 0010		**21,000**			**1,800**	**15**	**6**	**450**	**80**	**1,400**	**2,500**	**4**

* FOR INFORMATIONAL USE ONLY

3

3

CONDUIT

CATEGORY	LOCATION	FROM	TO	652.0225 CONDUIT RIGID NONMETALLIC SCHEDULE 40 2-INCH LF	652.0235 CONDUIT RIGID NONMETALLIC SCHEDULE 40 3-INCH LF	REMARKS
	W. PUETZ RD. & CTH V (S. 13TH ST.)					
0010		CB1	PB1	--	10	2 RUNS, INTERCEPT EXISTING CONDUIT
0010		PB1	PB4	--	20	2 RUNS, INTERCEPT EXISTING CONDUIT
0010		PB1	SB1	10	--	
0010		PB1	PB2	15	--	
0010		PB2	PB3	270	--	
0010	UNDISTRIBUTED			105	20	
			TOTAL 0010	**400**	**50**	

REMOVING CONCRETE BASES

CATEGORY	LOCATION	204.0195 REMOVING CONCRETE BASES EACH
	13TH & PUETZ	
0010	NW CORNER - SB1	1
	FLASHING BEACONS	
0010	STA 18+44 - SB1	1
0010	STA 34+63 - SB4	1
	TOTAL 0010	**3**

CONCRETE BASES

CATEGORY	LOCATION	NO.	654.0101 CONCRETE BASES TYPE 1 EACH
0010	W. PUETZ RD. & CTH V (S. 13TH ST.)	SB1	1
		TOTAL 0010	**1**

PULLBOXES

CATEGORY	LOCATION		653.0145 PULL BOXES STEEL 24X48-INCH EACH	653.0135 PULL BOXES STEEL 24X36-INCH EACH	653.0905 REMOVING PULL BOXES EACH
0010	W. PUETZ RD. & CTH V (S. 13TH ST.)	PB1	1		1
0010		PB2		1	
0010		PB3		1	
		TOTAL 0010	**1**	**2**	**1**

LOOPS

CATEGORY	LOCATION	SDD	652.0800 CONDUIT LOOP DETECTOR LF	655.0700 LOOP DETECTOR LEAD IN CABLE LF	655.0800 LOOP DETECTOR WIRE LF	REMARKS
0010	W. PUETZ RD. & CTH V (S. 13TH ST.)					
0010	LOOP 1	9F15-4B	90	45	350	6'x20', 4 TURNS
0010	LOOP 2	9F15-4B	90	45	350	6'x20', 4 TURNS
0010	LOOP 3	9F15-4B	75	35	290	6'x20', 4 TURNS
0010	LOOP 4	9F15-4B	50	300	245	6'x6', 5 TURNS
0010	UNDISTRIBUTED		45	75	165	
		TOTAL 0010	**350**	**500**	**1,400**	

3

TRAFFIC SIGNAL CABLE AND ELECTRICAL WIRING

LOCATION FROM	THROUGH	TO	655.0230 CABLE TRAFFIC SIGNAL 5-14 AWG LF	655.0240 CABLE TRAFFIC SIGNAL 7-14 AWG LF
CTH V (S 13th St) & W Puetz Rd				
	BASE TO SIGNAL HEAD			
SB1	EXISTING WIRE	HEAD 2	--	--
SB9		HEAD 5	--	20
SB10		HEAD 6	--	50
SB10	EXISTING WIRE	HEAD 7	--	--
SB10		HEAD 8	20	--
SB1	EXISTING WIRE	HEAD 9	--	--
SB6		HEAD 10	--	20
SB7		HEAD 11	--	50
SB7		HEAD 12	45	--
SB7		HEAD 13	20	--
SB4		HEAD 15	--	20
SB5		HEAD 16	--	50
SB5		HEAD 17	45	--
SB5		HEAD 18	20	--
	UNDISTRIBUTED		50	90
		TOTAL:	**200**	**300**
		CATEGORY	**0010**	**0010**

TRAFFIC SIGNAL HEADS

CATEGORY	LOCATION	658.0173 TRAFFIC SIGNAL FACE 3S 12-INCH EACH	658.0174 TRAFFIC SIGNAL FACE 4S 12-INCH EACH	PEDESTRIAN PUSH BUTTONS LOCATION, FOR INFORMATION ONLY
	CTH V (S. 13TH STREET) & W. PUETZ RD.			
0010	SB1	--	--	1
0010	SB2	--	--	--
0010	SB3	--	--	1
0010	SB4	--	1	1
0010	SB5	2	1	1
0010	SB6	--	1	1
0010	SB7	2	1	--
0010	SB8	--	--	1
0010	SB9	--	1	1
0010	SB10	1	1	1
	TOTAL 0010	**5**	**6**	**8**

MISCELLANEOUS ITEMS

CATEGORY	LOCATION	204.9060.S.01 REMOVING (ITEM DESCRIPTION) (01. FLASHING BEACONS) EACH	204.9060.S.02 REMOVING (ITEM DESCRIPTION) (02. TRAFFIC SIGNAL EQUIPMENT AT INTERSECTION) EACH	650.8501.01 CONSTRUCTION STAKING ELECTRICAL INSTALLATIONS (PROJECT) (2505-03-71) EACH	658.5070.01 SIGNAL MOUNTING HARDWARE (LOCATION) (.01 CTH V & W PUETZ RD EACH	SPV.0060.20 REMOVE AND REINSTALL TRAFFIC SIGNAL STANDARD EACH	SPV.0060.21 SOLAR POWERED FLASHING BEACON - 12" LED EACH	SPV.0060.22 DISCONNECT AND RECONNECT EXISTING SIGNAL CABLE AND GROUND WIRING EACH
0010	W. PUETZ RD. & CTH V (S. 13TH ST.)	--	1	--	1	1	--	1
	STA 18+44	1	--	--	--	--	--	--
	STA 32+09	2	--	--	--	--	--	--
	STA 34+63	1	--	--	--	--	--	--
	STA 19+00	--	--	--	--	--	1	--
	STA 34+90	--	--	--	--	--	1	--
0010	UNDISTRIBUTED	--	--	1	--	--	--	--
	TOTAL 0010	**4**	**1**	**1**	**1**	**1**	**2**	**1**

R/W PROJECT NUMBER	SHEET NUMBER	TOTAL SHEETS
2505-03-21		
CONSTRUCTION PROJECT NUMBER 2505-03-71	4.01	8

PLAT OF RIGHT OF WAY REQUIRED FOR

S 13TH STREET
W PUETZ ROAD TO W DREXEL AVENUE

CTH V	MILWAUKEE COUNTY

CONVENTIONAL SYMBOLS

SECTION LINE
QUARTER LINE
SIXTEENTH LINE
NEW REFERENCE LINE
NEW R/W LINE
EXISTING R/W OR HE LINE
PROPERTY LINE (P.L.)
LOT, TIE & OTHER MINOR LINES
SLOPE INTERCEPT
CORPORATE LIMITS
UNDERGROUND FACILITY (COMMUNICATIONS, ELECTRIC, ETC) — W (TYPE)
NEW R/W (FEE OR HE) (HATCHING VARIES BY OWNER)
TEMPORARY LIMITED EASEMENT AREA
EASEMENT AREA (PERMANENT LIMITED OR RESTRICTED DEVELOPMENT)
TRANSMISSION STRUCTURES
BUILDING — TO BE REMOVED
BRIDGE — CULVERT

SECTION CORNER SYMBOL (18, 23, 24, 26, 25, 6, 9)
SECTION CORNER MONUMENT
GEODETIC SURVEY MONUMENT
SIXTEENTH CORNER MONUMENT
SIGN — SIGN
OFF-PREMISE SIGN (#1-25) — SIGN

R/W MONUMENT (TO BE SET)
NON-MONUMENTED R/W POINT
FOUND IRON PIN (1-INCH UNLESS NOTED) IP

	COMPENSABLE	NON-COMPENSABLE
ELECTRIC POLE	■	□
TELEPHONE POLE	●	⌀
PEDESTAL (LABEL TYPE) (TV, TEL, ELEC, ETC.)	✱	✱

ACCESS RESTRICTED BY ACQUISITION
NO ACCESS (BY STATUTORY AUTHORITY)
ACCESS RESTRICTED (BY PREVIOUS PROJECT OR CONTROL)
NO ACCESS (NEW HIGHWAY)

PARCEL NUMBER 25 — UTILITY NUMBER 40
PARALLEL OFFSETS

CONVENTIONAL UTILITY SYMBOLS

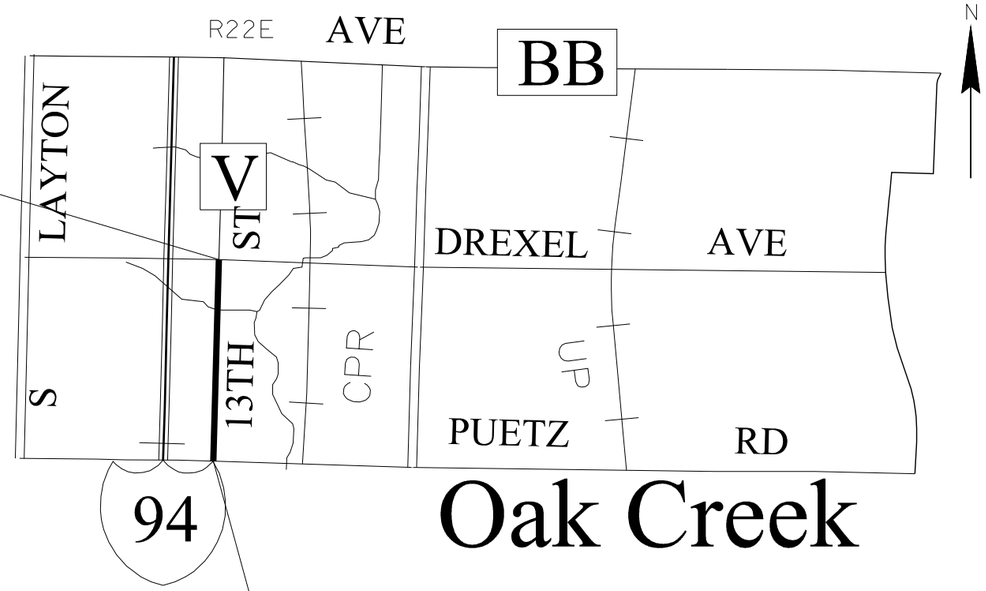
WATER	W
GAS	G
TELEPHONE	T
OVERHEAD TRANSMISSION LINES	OH
ELECTRIC	E
CABLE TELEVISION	TV
FIBER OPTIC	FO
SANITARY SEWER	SAN
STORM SEWER	SS
ELECTRIC TOWER	☒

CONVENTIONAL ABBREVIATIONS

ACCESS RIGHTS	AR	POINT OF COMPOUND CURVE	PCC
ACRES	AC	POINT OF INTERSECTION	PI
AHEAD	AH	PROPERTY LINE	PL
ALUMINUM	ALUM	RECORDED AS	(100')
AND OTHERS	ET AL	REEL / IMAGE	R/I
BACK	BK	REFERENCE LINE	R/L
BLOCK	BLK	REMAINING	REM
CENTERLINE	C/L	RESTRICTIVE DEVELOPMENT EASEMENT	RDE
CERTIFIED SURVEY MAP	CSM	RIGHT	RT
CONCRETE	CONC	RIGHT OF WAY	R/W
COUNTY	CO	SECTION	SEC
COUNTY TRUNK HIGHWAY	CTH	SEPTIC VENT	SEPV
DISTANCE	DIST	SQUARE FEET	SF
CORNER	COR	STATE TRUNK HIGHWAY	STH
DOCUMENT NUMBER	DOC	STATION	STA
EASEMENT	EASE	TELEPHONE PEDESTAL	TP
EXISTING	EX	TEMPORARY LIMITED EASEMENT	TLE
GAS VALVE	GV	TRANSPORTATION PROJECT PLAT	TPP
GRID NORTH	GN	UNITED STATES HIGHWAY	USH
HIGHWAY EASEMENT	HE	VOLUME	V
IDENTIFICATION	ID		
LAND CONTRACT	LC		
LEFT	LT		
MONUMENT	MON		
NATIONAL GEODETIC SURVEY	NGS		
NUMBER	NO		
OUTLOT	OL		
PAGE	P		
POINT OF TANGENCY	PT		
PERMANENT LIMITED EASEMENT	PLE		
POINT OF BEGINNING	POB		
POINT OF CURVATURE	PC		

CURVE DATA ABBREVIATIONS

LONG CHORD	LCH
LONG CHORD BEARING	LCB
RADIUS	R
DEGREE OF CURVE	D
CENTRAL ANGLE	Δ /DELTA
LENGTH OF CURVE	L
TANGENT	T
DIRECTION AHEAD	DA
DIRECTION BACK	DB



END RELOCATION ORDER
STA 63+28.87
N=335,493.90
E=2,554,276.02
NE COR OF THE NE 1/4 SEC. 18, T5N, R22E

T5N

BEGIN RELOCATION ORDER
STA 10+00.00
N=330,165.03
E=2,554,270.76
SE COR OF THE SE 1/4 SEC. 18, T5N, R22E

LAYOUT
SCALE 0 — 4,001

TOTAL NET LENGTH OF CENTERLINE = 5,309

NOTES:

COORDINATES ON THIS PLAN ARE REFERENCED TO THE WISCONSIN STATE PLANE COORDINATE SYSTEM (WSPCS), NAD 27 (91) SOUTH ZONE.

RIGHT OF WAY BOUNDARIES ARE DEFINED WITH COURSES OF PERIMETER OF THE HIGHWAY LANDS REFERENCED TO THE U.S. PUBLIC LAND SURVEY SYSTEM OR OTHER SURVEYS OF PUBLIC RECORD.

FOR THE LATEST ACCESS/DRIVEWAY INFORMATION CONTACT THE PLANNING DEPARTMENT OF MILWAUKEE COUNTY.

A TEMPORARY LIMITED EASEMENT (TLE) IS A RIGHT FOR CONSTRUCTION PURPOSES, AS DEFINED HEREIN, INCLUDING THE RIGHT TO OPERATE NECESSARY EQUIPMENT THEREON, THE RIGHT OF INGRESS AND EGRESS, AS LONG AS REQUIRED FOR SUCH PUBLIC PURPOSE, INCLUDING THE RIGHT TO PRESERVE, PROTECT, REMOVE, OR PLANT THEREON ANY VEGETATION THAT THE HIGHWAY AUTHORITIES MAY DEEM DESIRABLE. ALL (TLEs) ON THE PLAT EXPIRE AT THE COMPLETION OF THE CONSTRUCTION PROJECT FOR WHICH THIS INSTRUMENT IS GIVEN.

RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND ARE PLACED PRIOR TO OR AT THE TIME OF LAND TITLE TRANSFER.

THIS PLAT IS A GRAPHIC REPRESENTATION AND IS FOR REFERENCE PURPOSES ONLY. DEEDS MUST BE CHECKED TO DETERMINE PROPERTY BOUNDARIES AND ACCESS RIGHTS.

ORIGINAL PLAT PREPARED BY

raSmith
CREATIVITY BEYOND ENGINEERING
16745 W. Bluemound Road, Brookfield WI 53005
262-781-1000 Fax 262-781-8466
www.rasmithnational.com

WISCONSIN
MICHAEL J. RATZBURG
S-2236
WAUKESHA
WI
LAND SURVEYOR

DATE: 8/12/2022 — LAND SURVEYOR

REVISION DATE
10/28/2022 (1)
01/24/2023 (2)
09/06/2023 (3)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED FOR THE DEPARTMENT
DATE: 8-18-22 (Signatur)

FILE NAME : S:\5168662\DWG\2505-03-20\PLAT\TPP100.DWG
PLOT DATE : 9/6/2023 2:44 PM
PLOT BY : RATZBURG, MICHAEL
PLOT NAME :

SCHEDULE OF LANDS & INTERESTS REQUIRED

OWNERS' NAMES ARE SHOWN FOR REFERENCE PURPOSES ONLY AND ARE SUBJECT TO CHANGE PRIOR TO THE TRANSFER OF LAND INTERESTS TO MILWAUKEE COUNTY.

AREAS SHOWN IN THE TOTAL ACRES COLUMN MAY BE APPROXIMATE AND ARE DERIVED FROM TAX ROLLS OR OTHER AVAILABLE SOURCES AND MAY NOT INCLUDE LANDS OF THE OWNER WHICH ARE NOT CONTIGUOUS TO THE AREA TO BE ACQUIRED.

PARCEL NUMBER	SHEET NUMBER	OWNER(S)	INTEREST REQUIRED	TOTAL ACRES	R/W REQUIRED ACRES			TOTAL REMAINING ACRES	T.L.E. TEMP. ACRES	P.L.E. PERM. ACRES	PARCEL NUMBER
					NEW	EXISTING	TOTAL				
1(3)	4.05	OAK CREEK COMMUNITY UNITED METHODIST CHURCH	TLE	4.779	-	-	-	4.779	0.301	-	1(3)
2(3)	4.05	FERN STEINBACH	TLE	0.50	-	-	-	0.50	0.023	-	2(3)
3(3)	4.05	JULIE POULTER REVOC TRUST	TLE	0.625	-	-	-	0.625	0.025	-	3(3)
4(1)	4.05	FAITH BAPTIST CHURCH, MILWAUKEE, WI INC	FEE,TLE	16.545	0.134	0.391	0.525	16.020	0.020	-	4(1)
5	4.06	ASHLEY M. GEORGE	FEE,TLE	1.872	0.094	0.285	0.379	1.493	0.018	-	5
6	4.06	OAK CREEK-FRANKLIN JOINT SCHOOL DIST NO. 1	FEE,TLE	14.589	0.252	0.568	0.820	13.769	0.163	-	6
7	4.06	CURTIS & VICKIE L. KLEBBA	TLE	0.274	-	-	-	0.274	0.023	-	7
8(2)	4.06	KENNETH J. & KATHRYN D. MROTEK	TLE	0.551	-	-	-	0.551	0.021	-	8(2)
9(2)	4.06	JAMES R. LEE	FEE,TLE	0.582	0.005	-	0.005	0.577	0.023	-	9(2)
10(2)	4.07	CAMILLE LANKFORD	FEE,TLE	0.746	0.036	0.098	0.134	0.612	0.025	-	10(2)
11	4.07	DEANNA L. SAUVE	TLE	0.591	-	-	-	0.591	0.010	-	11
12	4.07	GERALDINE M. MITCHELL	TLE	0.540	-	-	-	0.540	0.007	-	12
13	4.07	ALEJANDRO & ALICIA SANCHEZ	TLE	0.507	-	-	-	0.507	0.010	-	13
14	4.07	ALEJANDRO C. & ALICIA SANCHEZ	TLE	0.507	-	-	-	0.507	0.036	-	14
15(3)	4.07	ELIMINATED	-	0.320	-	-	-	0.320	-	-	15(3)
16	4.07	JAMES M. & BONNIE R. SIKORA	TLE	0.320	-	-	-	0.320	0.015	-	16
17	4.07	KENT REINECK & MARY ALEXANDER	TLE	0.320	-	-	-	0.320	0.006	-	17
18	4.07	STEPHANIE & ALEXSANDRO CASTANEDA	TLE	0.320	-	-	-	0.320	0.005	-	18
19	4.07	SCOTT A. & DIANE L. BEAUDRY	TLE	0.320	-	-	-	0.320	0.004	-	19
20(2)	4.07	DALE R. TRZEBIATOWSKI	TLE	0.328	-	-	-	0.328	0.022	-	20(2)
23(2)	4.08	GORDON L LANGELAND	FEE,TLE	0.345	0.022	-	0.022	0.323	0.035	-	23(2)
24	4.08	DOUGLAS C. MAYR & GREG W. MAYR	TLE	1.037	-	-	-	1.037	0.021	-	24
25	4.08	DOUGLAS C. MAYR & GREG W. MAYR	TLE	0.591	-	-	-	0.591	0.026	-	25
27	4.08	GREG MAYR & DOUG MAYR	FEE,TLE	1.567	0.025	-	0.025	1.542	0.083	-	27
28	4.08	STEPHEN J. SPIDELL	TLE	3.010	-	-	-	3.010	0.193	-	28
29	4.05	GARY A. & ARLENE L. FAKLER	FEE,TLE	2.777	0.032	-	0.032	2.745	0.115	-	29
30	4.05	ZACHERY & JULIE NAVE	TLE	0.529	-	-	-	0.529	0.088	-	30
33(1)	4.05	VIOLET BRICKLER	FEE,TLE	22.044	0.128	0.352	0.480	21.564	0.121	-	33(1)
34	4.05	JAMES J. & PATRICIA L. SCHAEFER	FEE,TLE	0.500	0.028	0.077	0.105	0.395	0.018	-	34
35	4.06	JOSEPH A. & KELLY J. GREEN	FEE,TLE	0.901	0.036	0.137	0.173	0.728	0.040	-	35
36(2)	4.06	JERRY J. & DENISE S. KUZMIUK	FEE,TLE	0.459	0.027	-	0.027	0.432	0.036	-	36(2)
37(2)	4.06	DENNIS C. DELLMANN	FEE,TLE	0.459	0.027	-	0.027	0.432	0.036	-	37(2)
38(2)	4.06	GLEN E. & TAMARA A. JOHNSTON	TLE	0.432	-	-	-	0.432	0.023	-	38(2)
39(2)	4.06	DAVID T. & CAROLE A. STACHOWIAK	FEE,TLE	0.459	0.027	-	0.027	0.432	0.025	-	39(2)
40	4.06	JOHN M. & KATHLEEN J. HOUSTON	TLE	0.397	-	-	-	0.397	0.029	-	40
41	4.06	JAMES E. STENCIL & KATHLEEN A. MORGENSON-STENCIL	TLE	0.409	-	-	-	0.409	0.029	-	41
42(3)	4.06	ELIMINATED	-	0.630	-	-	-	0.630	-	-	42(3)
43(3)	4.06	ELIMINATED	-	0.516	-	-	-	0.516	-	-	43(3)
44	4.06	TIGE A. & MIRIA L. LOFY	TLE	1.138	-	-	-	1.138	0.069	-	44
46(3)	4.07	ELIMINATED	-	0.266	-	-	-	0.266	-	-	46(3)
47	4.07	STEVEN C. VOTSIS	TLE	0.233	-	-	-	0.233	0.022	-	47
48	4.07	CRYSTAL J. WOLF	TLE	0.233	-	-	-	0.233	0.022	-	48
49	4.07	PEDRO & EVELYN CERNA	TLE	0.233	-	-	-	0.233	0.027	-	49
50(3)	4.07	DAKOTAH JONDAHL & HALEY ROBINSON	TLE	0.232	-	-	-	0.232	0.010	-	50(3)
51	4.07	MARY KAY STOJSAVLJEVIC CRUZ	TLE	0.232	-	-	-	0.232	0.028	-	51
52	4.07	GEORGE GRUDICH & ELLEN K GRISSOM	TLE	0.235	-	-	-	0.235	0.023	-	52
53(3)	4.07	SHAAN REAL ESTATE, INC.	TLE	0.551	-	-	-	0.551	0.012	-	53(3)
54	4.07	STEVEN J. & JENNIFER HEIGES	TLE	0.233	-	-	-	0.233	0.017	-	54
55	4.07	DAVID A. & ROSEMARIE SEMRAD	TLE	0.234	-	-	-	0.234	0.024	-	55
56(3)	4.07	ELIMINATED	-	0.266	-	-	-	0.266	-	-	56(3)
58(3)	4.07	ELIMINATED	-	0.486	-	-	-	0.486	-	-	58(3)
59	4.07	CITY OF OAK CREEK	TLE	2.441	-	-	-	2.441	0.039	-	59
61	4.08	JORDAN MOELLER	TLE	0.333	-	-	-	0.333	0.005	-	61

4

4

REVISION DATE
10/28/2022
01/24/2023
09/06/2023

DATE 8/12/2022

GRID FACTOR 0.99993896

SCALE, FEET
0

HWY: S 13TH STREET (CTH V)

COUNTY: MILWAUKEE

STATE R/W PROJECT NUMBER 2505-03-21

CONSTRUCTION PROJECT NUMBER 2505-03-71

PLAT SHEET 4.02

PS&E SHEET — 107

E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.02

PLOT DATE : 9/6/2023 2:45 PM

PLOT BY : RATZBURG, MICHAEL

PLOT NAME :

PLOT SCALE :

WISDOT/CADDS SHEET 75

SCHEDULE OF LANDS & INTERESTS REQUIRED

OWNERS' NAMES ARE SHOWN FOR REFERENCE PURPOSES ONLY AND ARE SUBJECT TO CHANGE PRIOR TO THE TRANSFER OF LAND INTERESTS TO MILWAUKEE COUNTY.

AREAS SHOWN IN THE TOTAL ACRES COLUMN MAY BE APPROXIMATE AND ARE DERIVED FROM TAX ROLLS OR OTHER AVAILABLE SOURCES AND MAY NOT INCLUDE LANDS OF THE OWNER WHICH ARE NOT CONTIGUOUS TO THE AREA TO BE ACQUIRED.

PARCEL NUMBER	SHEET NUMBER	OWNER(S)	INTEREST REQUIRED	TOTAL ACRES	R/W REQUIRED ACRES			TOTAL REMAINING ACRES	T.L.E. TEMP. ACRES	P.L.E. PERM. ACRES	PARCEL NUMBER
					NEW	EXISTING	TOTAL				
UTILITY NUMBER	SHEET	NAME	INTEREST								
100	4.05,4.06,4.07,408	WE ENERGIES - ELECTRIC	RELEASE OF RIGHTS								
101	4.05,4.06,	CHARTER COMMUNICATIONS	RELEASE OF RIGHTS								
102	4.07	CITY OF OAK CREEK	RELEASE OF RIGHTS								
103(3)	4.06	ELIMINATED	-								
104(3)	4.05,4.06,4.07,4.08	AT&T WISCONSIN	RELEASE OF RIGHTS								
105	4.05,4.06	CITY OF OAK CREEK - WATERMAIN	RELEASE OF RIGHTS								
106	4.06,4.07	CITY OF OAK CREEK - SANITARY	RELEASE OF RIGHTS								

4

4

REVISION DATE
10/28/22 - NC
01/24/23 - NC
09/06/23

DATE 8/12/2022

GRID FACTOR 0.99993896

SCALE, FEET
0

HWY: S 13TH STREET (CTH V)

COUNTY: MILWAUKEE

STATE R/W PROJECT NUMBER 2505-03-21

CONSTRUCTION PROJECT NUMBER 2505-03-71

PLAT SHEET 4.03

PS&E SHEET

E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.03

PLOT DATE : 9/6/2023 3:08 PM

PLOT BY : RATZBURG, MICHAEL

PLOT NAME :

PLOT SCALE :

4

4

CONCRETE MONUMENT WITH BRASS CAP
N=330,165.03
E=2,554,270.76
T 5 N
R 22 E
18 17
19 20

CONCRETE MONUMENT WITH BRASS CAP
N=335,493.90
E=2,554,276.02
T 5 N
R 22 E
7 8
18 17

CONCRETE MONUMENT WITH BRASS CAP
N=332,828.86
E=2,554,270.93
T 5 N
R 22 E
18 17
18 17

CITY OF OAK CREEK

WEST PUETZ RD

WYNONA DR

S 13TH ST

W PILGRIM PKWY

W WILDING DR

W WILLOW DR

W DREXEL AVE

SE-SE | NE-SE | SE-NE | NE-NE

SW-SW | NW-SW | SW-NW | NW-NW

BEGIN RELOCATION ORDER
STA 10+00.00
N=330,165.03
E=2,554,270.76

END RELOCATION ORDER
STA 63+28.87
N=335,493.90
E=2,554,276.02

REVISION DATE	DATE 8/12/2022	SCALE, FEET	HWY: S 13TH ST (CTH V)	STATE R/W PROJECT NUMBER 2505-03-21	PLAT SHEET 4.04	
10/28/22 - NC 01/24/23 - NC 09/06/23 - NC	GRID FACTOR 0.99993896	0	COUNTY: MILWAUKEE	CONSTRUCTION PROJECT NUMBER 2505-03-71	PS&E SHEET 109	E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.04

PLOT DATE : 9/6/2023 2:47 PM PLOT BY : RATZBURG, MICHAEL PLOT NAME : PLOT SCALE :

WISDOT/CADDS SHEET 75

(100) WE ENERGIES-ELEC
NON DESCRIPT EASEMENT DOC.4304214 PARCEL 29&30
NON DESCRIPT EASEMENT DOC.1338277 PARCEL 4
NON DESCRIPT EASEMENT DOC.3321067 PARCEL 4
NON DESCRIPT EASEMENT DOC.4067741 PARCEL 4
12' EASEMENT DOC. 10812843 PARCEL 4

(101) CHARTER COMMUNICATIONS
12' EASEMENT DOC.10812843 PARCEL 4

(104) AT&T WISCONSIN
NON DESCRIPT EASEMENT DOC.1338277 PARCEL 4

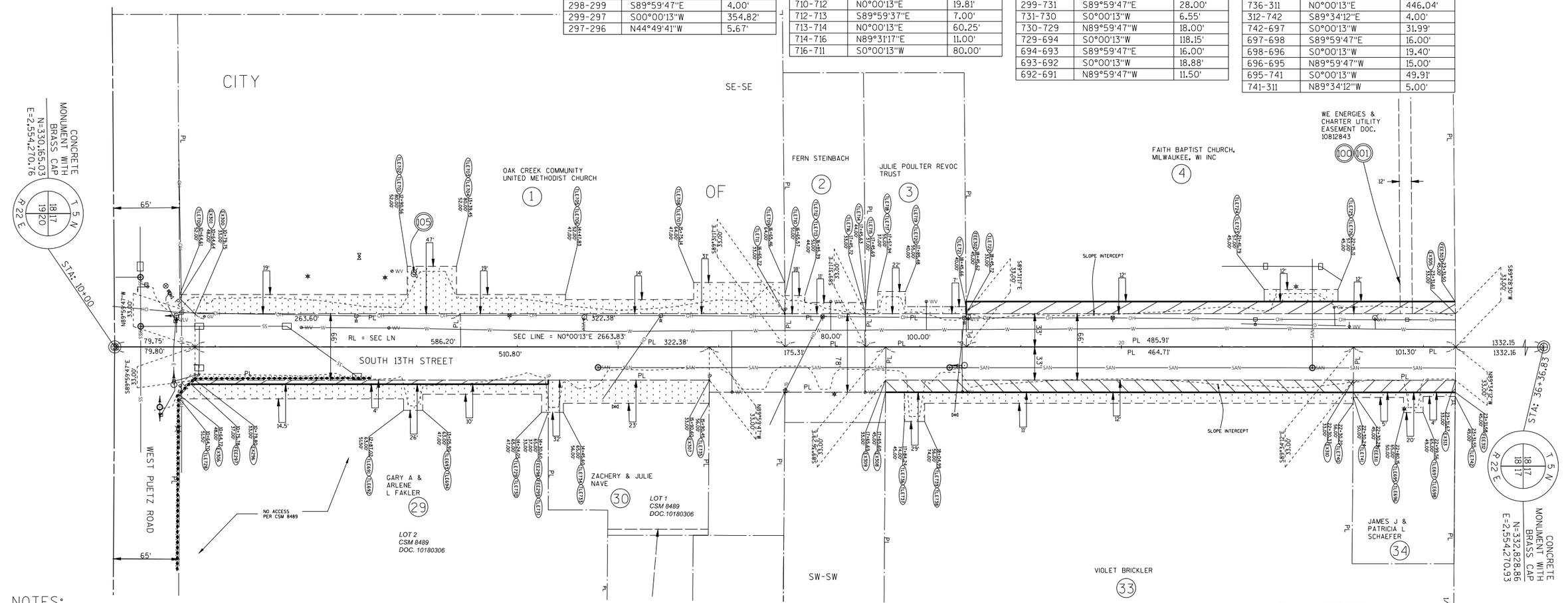
(105) CITY OF OAK CREEK - WATERMAIN
NO RECORD OF EASEMENT PARCEL 1

R/W COURSE TABLE		
722-302	N89°31'17"W	12.00'
302-723	N00°00'13"E	296.17'
723-726	N00°00'13"E	73.32'
726-303	N00°00'13"E	116.39'
303-305	N89°28'30"E	12.00'
305-722	S00°00'13"W	485.89'
308-309	N89°36'25"W	12.00'
309-310	N00°00'13"E	464.68'
310-311	S89°34'12"E	12.00'
308-311	S00°00'13"W	464.68'
310-313	N00°00'13"E	101.30'
313-312	S89°34'12"E	12.00'
312-311	S00°00'13"W	101.30'
296-298	N00°00'13"E	350.80'
298-299	S89°59'47"E	4.00'
299-297	S00°00'13"W	354.82'
297-296	N44°49'41"W	5.67'

TLE COURSE TABLE		
300-301	S44°47'12"W	21.29'
301-700	S89°34'08"W	4.00'
700-701	N0°00'13"E	225.95'
701-702	N89°59'37"W	28.00'
702-703	N0°00'13"E	48.89'
703-704	S89°59'37"E	28.00'
704-705	N0°00'13"E	108.39'
705-706	S89°59'37"E	5.00'
706-707	N0°00'13"E	127.31'
707-708	N89°59'37"W	17.00'
708-709	N0°00'13"E	90.32'
709-711	N89°31'17"E	31.00'
711-300	S0°00'13"W	585.98'
711-710	S89°31'17"W	18.00'
710-712	N0°00'13"E	19.81'
712-713	S89°59'37"E	7.00'
713-714	N0°00'13"E	60.25'
714-716	N89°31'17"E	11.00'
716-711	S0°00'13"W	80.00'

TLE COURSE TABLE		
716-715	N89°31'17"W	4.00'
715-717	N0°00'13"E	12.25'
717-718	N89°59'37"W	18.00'
718-719	N0°00'13"E	27.54'
719-720	S89°59'37"E	15.00'
720-721	N0°00'13"E	60.19'
721-722	N89°31'17"W	7.00'
722-715	S0°00'13"W	100.00'
723-724	N89°59'37"W	12.00'
724-725	N0°00'13"E	73.32'
725-726	S89°59'37"E	12.00'
304-303	S0°00'13"W	249.77'
303-302	S89°59'47"E	4.00'
302-722	S0°00'13"W	236.08'
299-731	S89°59'47"E	28.00'
731-730	S0°00'13"W	6.55'
730-729	N89°59'47"W	18.00'
729-694	S0°00'13"W	118.15'
694-693	S89°59'47"E	16.00'
693-692	S0°00'13"W	18.88'
692-691	N89°59'47"W	11.50'

TLE COURSE TABLE		
691-728	S0°00'13"W	222.32'
728-306	N89°39'36"W	3.50
306-297	N44°49'41"W	15.60
298-307	N0°00'13"E	160.00'
307-735	S89°36'53"E	23.00'
735-734	S0°00'13"W	144.88'
734-733	S89°59'47"E	9.00'
733-731	S0°00'13"W	15.00'
731-298	N89°59'47"W	32.00'
311-740	S89°34'12"E	11.00'
740-739	S0°00'13"W	425.80'
739-738	S89°59'47"E	18.00'
738-737	S0°00'13"W	20.16'
737-736	N89°59'47"W	29.00'
736-311	N0°00'13"E	446.04'
312-742	S89°34'12"E	4.00'
742-697	S0°00'13"W	31.99'
697-698	S89°59'47"E	16.00'
698-696	S0°00'13"W	19.40'
696-695	N89°59'47"W	15.00'
695-741	S0°00'13"W	49.91'
741-311	N89°34'12"W	5.00'



NOTES:

COORDINATES ON THIS PLAN ARE REFERENCED TO THE WISCONSIN STATE PLANE COORDINATE SYSTEM (WSPCS), NAD 27 (91) SOUTH ZONE.

RIGHT OF WAY BOUNDARIES ARE DEFINED WITH COURSES OF PERIMETER OF THE HIGHWAY LANDS REFERENCED TO THE U.S. PUBLIC LAND SURVEY SYSTEM OR OTHER SURVEYS OF PUBLIC RECORD.

FOR THE LATEST ACCESS/DRIVEWAY INFORMATION CONTACT THE PLANNING DEPARTMENT OF THE CITY OF OAK CREEK.

RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND ARE PLACED PRIOR TO OR AT THE TIME OF LAND TITLE TRANSFER.

TLE IS FOR GRADING SLOPES AND DRIVEWAYS

HWY	BASIS OF EXISTING R/W	R/W WIDTH	YEAR
S. 13TH ST.	CSM 8489	66'	2012
S. 13TH ST.	CSM 5542	78'	1991
S. 13TH ST.	CSM 5	78'	1962

REVISION DATE
10/28/2022
01/24/23 - NC
09/06/2023

DATE 8/12/2022
GRID FACTOR 0.99993896
SCALE, FEET 0 50 100
HWY: S 13TH STREET (CTH V)
COUNTY: MILWAUKEE
STATE R/W PROJECT NUMBER 2505-03-21
CONSTRUCTION PROJECT NUMBER 2505-03-71
PLAT SHEET 4.05
PS&E SHEET 110
E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.05
PLOT DATE : 9/6/2023 2:48 PM
PLOT BY : RATZBURG, MICHAEL
PLOT NAME :
PLOT SCALE :

NOTES:

COORDINATES ON THIS PLAN ARE REFERENCED TO THE WISCONSIN STATE PLANE COORDINATE SYSTEM (WSPCS), NAD 27 (91) SOUTH ZONE.

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TLE IS FOR GRADING SLOPES AND DRIVEWAYS

TLE COURSE TABLE		
315-817	S0°00'13"W	195.00
817-818	N89°59'47"W	4.00'
818-743	N00°00'13"E	195.00'
743-315	S89°59'47"E	4.00'
347-744	N00°00'13"E	19.08'
744-745	N89°59'47"W	19.00'
745-746	N00°00'13"E	58.05'
746-747	S89°59'47"E	19.00'
747-744	S0°00'13"W	58.05'
317-815	S0°00'13"W	356.03'
815-816	N89°59'47"W	5.00'
816-748	N0°00'13"E	110.00'
748-749	N89°59'47"W	24.00'
749-750	N0°00'13"E	59.12'
750-751	S89°59'47"E	9.00'
751-752	N0°00'13"E	186.69'
752-317	N89°23'16"E	20.00'
317-753	S89°23'16"W	22.00'
753-754	N0°00'13"E	40.13'
754-755	S89°59'47"E	19.00'
755-756	N0°00'13"E	34.81'
756-757	N89°25'29"E	3.00'
757-317	S0°00'13"W	74.73'
757-758	S89°25'29"W	6.00'
758-760	N0°00'13"E	150.12'
760-761	N89°22'43"E	6.00'
761-757	S0°00'13"W	150.13'
319-762	S0°00'13"W	96.55'
762-763	N89°59'47"W	7.00'

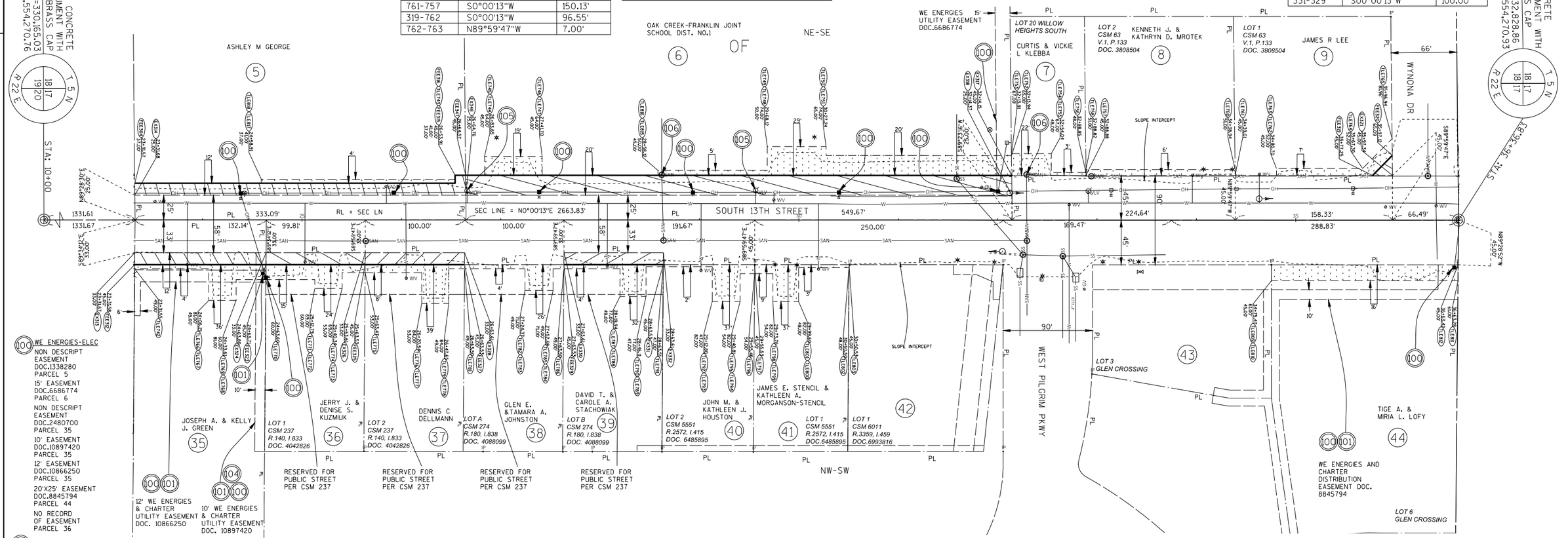
TLE COURSE TABLE		
763-764	N00°00'13"E	86.60'
764-765	N45°18'22"W	42.15'
765-320	S89°22'43"W	16.88'
323-770	S89°34'12"E	15.00'
770-769	S00°00'13"W	29.99
769-768	S89°59'47"E	21.00'
768-767	S0°00'13"W	27.40'
767-766	N89°59'47"W	32.00'
766-742	S0°00'13"W	74.66'
742-312	N89°34'12"W	4.00'
325-775	S89°34'17"E	8.00'
775-774	S0°00'13"W	23.12'
773-774	S89°59'47"E	16.00'
773-772	S00°00'13"W	27.55'
772-771	N89°59'47"W	9.00'
771-770	S00°00'13"W	49.19'
327-781	S89°34'17"E	4.00'
781-779	S00°00'13"W	15.84'
779-778	S89°59'47"E	35.00'
778-777	S00°00'13"W	27.12'
777-776	N89°59'47"W	31.00'
776-775	S00°00'13"W	57.07'
329-786	S89°34'17"E	4.00'
786-785	S00°00'13"W	10.81'
785-784	S89°59'47"E	22.00'
784-783	S00°00'13"W	28.32'

TLE COURSE TABLE		
783-782	N89°59'47"W	22.00'
782-781	S00°00'13"W	60.87'
331-791	S89°34'17"E	2.00'
791-790	S0°00'13"W	17.40'
790-789	S89°59'47"E	30.00'
789-788	S00°00'13"W	26.17'
788-787	N89°59'47"W	28.00'
787-786	S00°00'13"W	56.44'
331-797	N00°00'13"E	92.00'
797-796	S89°34'17"E	9.00'
796-795	S00°00'13"W	14.65'
795-794	S89°59'47"E	28.00'
794-793	S00°00'13"W	28.01'
793-792	N89°59'47"W	35.00'
792-791	S00°00'13"W	49.29'
797-803	N00°00'13"E	95.00'
803-802	S89°34'17"E	3.00'
802-801	S00°00'13"W	50.90'
801-800	S89°59'47"E	34.00'
800-799	S00°00'13"W	25.84'
799-798	N89°59'47"W	28.00'
798-796	S00°00'13"W	18.30'

TLE COURSE TABLE		
809-812	N00°00'13"E	187.95'
812-811	S89°28'52"E	16.00'
811-810	S00°00'13"W	187.81'
810-809	N89°59'47"W	16.00'

R/W COURSE TABLE		
314-304	S89°28'30"W	12.00'
304-315	N00°00'13"E	322.34'
315-316	N89°59'47"W	8.00'
316-347	N00°00'13"E	10.65'
347-348	N89°26'50"E	20.00'
348-314	S00°00'13"W	333.08'
347-317	N00°00'13"E	549.58'
317-318	N89°23'16"E	20.00'
318-348	S00°00'13"W	549.60'
321-319	S00°00'13"W	20.09'
319-320	N45°18'22"W	28.25'
320-321	N89°22'43"E	20.09'
313-324	N00°00'13"E	132.14'
324-323	S89°34'12"E	12.00'
323-312	S00°00'13"W	132.14'
313-312	N89°34'12"W	12.00'
324-326	N00°00'13"E	99.81'
326-325	S89°34'17"E	12.00'
325-323	S00°00'13"W	99.81'
326-328	N00°00'13"E	100.00'
328-327	S89°34'17"E	12.00'
327-325	S00°00'13"W	100.00'
328-330	N00°00'13"E	100.00'
330-329	S89°34'17"E	12.00'
329-327	S00°00'13"W	100.00'
330-332	N00°00'13"E	100.00'
332-331	S89°34'17"E	12.00'
331-329	S00°00'13"W	100.00'

CITY



100 WE ENERGIES-ELEC
NON DESCRIPT EASEMENT DOC.1338280 PARCEL 5
15' EASEMENT DOC.6686774 PARCEL 6
NON DESCRIPT EASEMENT DOC.2480700 PARCEL 35
10' EASEMENT DOC.10897420 PARCEL 35
12' EASEMENT DOC.10866250 PARCEL 35
20'X25' EASEMENT DOC.8845794 PARCEL 44
NO RECORD OF EASEMENT PARCEL 36

101 CHARTER COMMUNICATIONS
12' EASEMENT DOC.10866250 PARCEL 35
10' EASEMENT DOC.10897420 PARCEL 35
20'X25' EASEMENT DOC.8845794 PARCEL 44

HWY	BASIS OF EXISTING R/W	R/W WIDTH	YEAR
S. 13TH ST.	CSM 237	70'	1963
S. 13TH ST.	CSM 274	70'	1964
S. 13TH ST.	CSM 5551	70'	1993
S. 13TH ST.	CSM 6011	70'	1994
S. 13TH ST.	CSM 63	90'	1960
S. 13TH ST.	GLEN CROSSING	90'	2004

104 AT&T WISCONSIN
NON DESCRIPT EASEMENT DOC.1338280 PARCEL 5
10' EASEMENT DOC.10897420 PARCEL 35

105 CITY OF OAK CREEK - WATERMAIN
NO RECORD OF EASEMENT PARCEL 6

106 CITY OF OAK CREEK - SANITARY
NO RECORD OF EASEMENT PARCELS 6 & 7

REVISION DATE
10/28/22
01/24/23
09/06/23

DATE 8/12/2022
GRID FACTOR 0.99993896
SCALE, FEET 0 50 100
HWY: S 13TH STREET (CTH V)
COUNTY: MILWAUKEE
STATE R/W PROJECT NUMBER 2505-03-21
CONSTRUCTION PROJECT NUMBER 2505-03-71
PLAT SHEET 4.06
PS&E SHEET 111
E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.06
PLOT DATE : 9/6/2023 2:51 PM
PLOT BY : RATZBURG, MICHAEL
PLOT NAME :
PLOT SCALE :
WISDOT/CADDS SHEET 75

NOTES:

COORDINATES ON THIS PLAN ARE REFERENCED TO THE WISCONSIN STATE PLANE COORDINATE SYSTEM (WSPCS), NAD 27 (91) SOUTH ZONE.

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TLE IS FOR GRADING SLOPES AND DRIVEWAYS.

TLE COURSE TABLE		
334-813	S89°22'51"W	18.00'
813-814	N00°06'34"E	59.97'
814-815	S89°53'26"E	18.00'
815-334	S00°06'34"W	59.74'
816-817	N89°53'26"W	15.00'
817-818	N00°06'34"E	28.38'
818-819	S89°53'26"E	15.00'
819-816	S00°06'34"W	28.38'
820-821	N89°53'26"W	12.00'
821-822	N00°06'34"E	26.00'
822-823	S89°53'26"E	12.00'
823-820	S00°06'34"W	26.00'
824-825	N89°53'26"W	5.00'
825-826	N00°06'34"E	85.00'
826-827	S89°52'35"E	5.00'
827-824	S00°06'34"W	85.00'
826-690	N89°54'52"W	8.00'
690-828	N00°06'34"E	75.04'
828-829	N89°53'26"W	18.00'
829-830	N00°06'34"E	31.54'
830-831	S89°53'26"E	20.00'
831-832	N00°06'34"E	27.41'
832-833	S89°52'35"E	6.00'
833-827	S00°06'34"W	134.00'
835-836	S89°52'28"E	6.00'

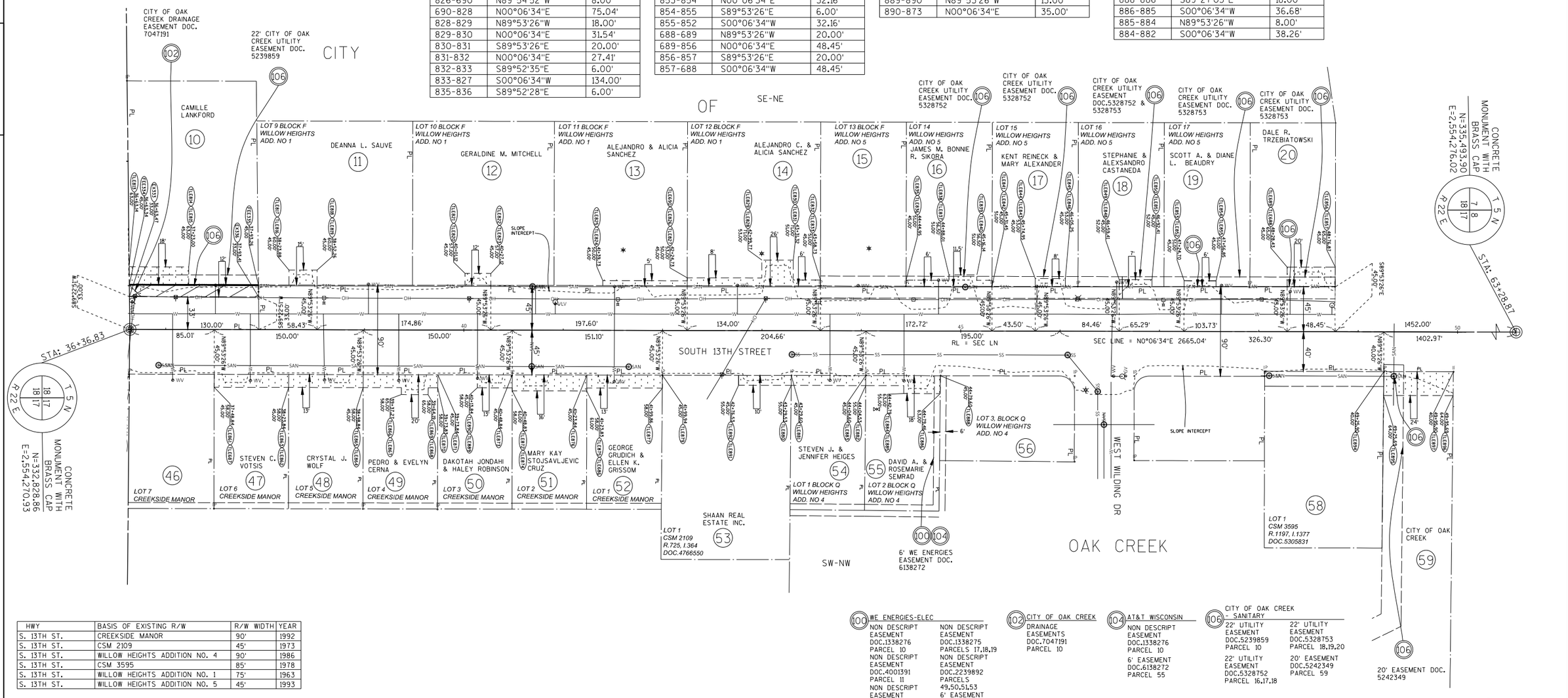
TLE COURSE TABLE		
835-837	N00°06'34"E	43.06'
837-838	N89°53'26"W	5.50'
838-839	N00°06'34"E	28.13'
839-840	S89°53'26"E	5.50'
840-841	N00°06'34"E	15.31'
841-842	S89°53'26"E	6.00'
842-836	S00°06'34"W	86.50'
843-844	N89°53'26"W	8.00'
844-845	N00°06'34"E	30.30'
845-846	S89°53'26"E	8.00'
846-843	S00°06'34"W	30.30'
848-849	N89°53'26"W	7.00'
849-850	N00°06'34"E	33.00'
850-851	S89°53'26"E	7.00'
851-848	S00°06'34"W	33.00'
852-853	N89°53'26"W	6.00'
853-854	N00°06'34"E	32.16'
854-855	S89°53'26"E	6.00'
855-852	S00°06'34"W	32.16'
688-689	N89°53'26"W	20.00'
689-856	N00°06'34"E	48.45'
856-857	S89°53'26"E	20.00'
857-688	S00°06'34"W	48.45'

TLE COURSE TABLE		
861-863	N00°06'34"E	75.00'
863-862	S89°52'20"E	13.00'
862-687	S00°06'34"W	75.00'
687-861	N89°52'20"W	13.00'
863-865	N00°06'34"E	75.00'
865-864	S89°52'20"E	13.00'
864-862	S00°06'34"W	75.00'
865-871	N00°06'34"E	75.00'
871-870	S89°52'20"E	13.00'
870-869	S00°06'34"W	9.64'
869-868	S89°53'26"E	7.00'
868-867	S00°06'34"W	26.92'
867-866	N89°53'26"W	7.00'
866-864	S00°06'34"W	38.44'
873-872	S89°52'20"E	13.00'
872-889	S00°06'34"W	35.00'
889-890	N89°53'26"W	13.00'
890-873	N00°06'34"E	35.00'

TLE COURSE TABLE		
873-876	N00°06'34"E	75.00'
876-686	S89°52'20"E	16.00'
686-874	S00°06'34"W	75.00'
874-873	N89°52'20"W	16.00'
876-879	N00°06'34"E	76.10'
879-877	S89°32'06"E	13.00'
877-875	S00°06'34"W	76.02'
875-876	N89°52'20"W	13.00'
892-881	N00°06'34"E	53.08'
881-880	S89°26'56"E	10.00'
880-891	S00°06'34"W	53.00'
891-892	N89°53'26"W	10.00'
881-883	N00°06'34"E	75.00'
883-882	S89°26'59"E	10.00'
882-880	S00°06'34"W	75.00'
883-888	N00°06'34"E	75.00'
888-886	S89°27'03"E	18.00'
886-885	S00°06'34"W	36.68'
885-884	N89°53'26"W	8.00'
884-882	S00°06'34"W	38.26'

TLE COURSE TABLE		
894-897	N00°06'34"E	70.00'
897-896	S89°23'16"E	24.00'
896-895	S00°06'34"W	70.00'
895-894	N89°23'16"W	24.00'

R/W COURSE TABLE		
333-334	S89°22'51"W	12.00'
334-335	N00°06'34"E	130.00'
335-336	N89°22'51"E	12.00'
336-333	S00°06'34"W	130.00'



HWY	BASIS OF EXISTING R/W	R/W WIDTH	YEAR
S. 13TH ST.	CREEKSIDE MANOR	90'	1992
S. 13TH ST.	CSM 2109	45'	1973
S. 13TH ST.	WILLOW HEIGHTS ADDITION NO. 4	90'	1986
S. 13TH ST.	CSM 3595	85'	1978
S. 13TH ST.	WILLOW HEIGHTS ADDITION NO. 1	75'	1963
S. 13TH ST.	WILLOW HEIGHTS ADDITION NO. 5	45'	1993

(100) WE ENERGIES-ELEC
- NON DESCRIPT EASEMENT DOC.1338276 PARCEL 10
- NON DESCRIPT EASEMENT DOC.4001391 PARCEL 11
- NON DESCRIPT EASEMENT DOC.3872694 PARCEL 13,14,16
- NON DESCRIPT EASEMENT DOC.1338275 PARCELS 17,18,19
- NON DESCRIPT EASEMENT DOC.2239892 PARCELS 49,50,51,53
- 6' EASEMENT DOC.6138272 PARCEL 55

(102) CITY OF OAK CREEK
- DRAINAGE EASEMENTS DOC.7047191 PARCEL 10

(104) AT&T WISCONSIN
- NON DESCRIPT EASEMENT DOC.1338276 PARCEL 10
- 6' EASEMENT DOC.6138272 PARCEL 55

(106) CITY OF OAK CREEK - SANITARY
- 22' UTILITY EASEMENT DOC.5239859 PARCEL 10
- 22' UTILITY EASEMENT DOC.5328752 PARCEL 16.17.18
- 22' UTILITY EASEMENT DOC.5328753 PARCEL 18.19.20
- 20' EASEMENT DOC.5242349 PARCEL 59

REVISION DATE 10/28/22 - NC 01/24/23 09/06/23	DATE 8/12/2022 GRID FACTOR 0.99993896	SCALE, FEET 0 50 100	HWY: S 13TH STREET (CTH V) COUNTY: MILWAUKEE	STATE R/W PROJECT NUMBER 2505-03-21 CONSTRUCTION PROJECT NUMBER 2505-03-71	PLAT SHEET 4.07 PS&E SHEET 112	E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.07
PLOT DATE : 9/6/2023 2:52 PM
PLOT BY : RATZBURG, MICHAEL
PLOT NAME :
PLOT SCALE :

NOTES:

COORDINATES ON THIS PLAN ARE REFERENCED TO THE WISCONSIN STATE PLANE COORDINATE SYSTEM (WSPCS), NAD 27 (91) SOUTH ZONE.

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TLE IS FOR GRADING SLOPES AND DRIVEWAYS.

TLE COURSE TABLE		
338-898	N89°53'26"W	11.00'
898-900	N00°06'34"E	137.97'
900-339	N89°18'18"E	11.00'
339-899	S89°18'18"W	5.00'
899-903	N00°06'34"E	186.00'
903-904	N89°18'18"E	5.00'
904-339	S00°06'34"W	186.00'
904-905	S89°18'18"W	10.00'
905-906	N00°06'34"E	111.81'
906-342	N89°52'21"E	10.00'
342-904	S00°06'34"W	111.71'
906-907	N00°06'34"E	24.00'
907-908	S89°52'21"W	11.00'
908-909	N00°06'34"E	53.54'
909-910	N89°53'26"W	24.00'
910-911	N00°06'34"E	24.48'
911-912	S89°53'26"E	24.00'
912-913	N00°06'34"E	54.52'
913-343	N89°45'27"E	21.00'
914-923	S89°45'28"W	21.50'
923-915	N00°06'34"E	355.97'
915-916	S89°53'26"E	14.50'

TLE COURSE TABLE		
916-917	N00°06'34"E	70.35'
917-918	N43°55'54"W	47.26'
918-345	N89°18'02"E	6.86'
345-346	S43°55'54"E	47.46'
346-914	S00°06'34"W	427.39'
919-922	N00°06'34"E	27.30'
922-921	S89°53'26"E	8.00'
921-920	S00°06'34"W	27.30'
920-919	N89°53'26"W	8.00'

R/W COURSE TABLE		
337-338	N89°53'26"W	7.00'
338-339	N00°06'34"E	138.13'
339-340	N89°18'18"E	7.00'
340-337	S00°06'34"W	138.23'
341-342	S89°52'21"W	7.00'
342-343	N00°06'34"E	156.58'
343-344	N89°45'31"E	7.00'
344-341	S00°06'34"W	156.59'

GN

CITY

100 WE ENERGIES-ELEC
NON DESCRIPT
EASEMENT
DOC.3777844
PARCEL 23
NON DESCRIPT
EASEMENT
DOC.3872694
PARCEL 23
NON DESCRIPT
EASEMENT
DOC.1338273
PARCEL 28

104 AT&T WISCONSIN
NON DESCRIPT
EASEMENT
DOC.3777844
PARCEL 23
NON DESCRIPT
EASEMENT
DOC.3872694
PARCEL 23
NON DESCRIPT
EASEMENT
DOC.1338273
PARCEL 28

LOT 1 CSM 4176 R.1473, I.1914 DOC. 5533885
LOT 2 CSM 3119 R.1035, I.1391 DOC. 5125186
LOT 1 CSM 3119 R.1035, I.1391 DOC. 5125186
NE-NE
OF
DOUGLAS C. MAYR & GREG W. MAYR
DOUGLAS C. MAYR & GREG W. MAYR
GREG MAYR & DOUG MAYR
STEPHEN J. SPIDELL
GORDON L. LANGELAND
JORDAN MOELLER
LOT 9 BLOCK 1 WILLOW HEIGHTS ADD. NO. 3
SOUTH WILLOW DR
WEST WILLOW DR
WEST DREXEL AVE
OAK CREEK
NW-NW
SLOPE INTERCEPT
SLOPE INTERCEPT
RL = SEC LN
SEC LINE = N0°06'34"E 2665.04'
1545.04'
1405.96'
138.23'
297.64'
583.91'
100.23'
STA: 36+36.83
STA: 63+28.87
CONCRETE MONUMENT WITH BRASS CAP
N=335,493.90
E=2,554,276.02
CONCRETE MONUMENT WITH BRASS CAP
N=332,828.86
E=2,554,270.93
T 5 N
R 22 E

HWY	BASIS OF EXISTING R/W	R/W WIDTH	YEAR
S. 13TH ST.	CSM 4176	33'	1982
S. 13TH ST.	CSM 3119	45'	1977
S. 13TH ST.	WILLOW HEIGHTS ADD. NO. 3	75'	1965

REVISION DATE
10/28/22-NC
01/24/23
09/06/23

DATE 8/12/2022
GRID FACTOR 0.99993896

SCALE, FEET
0 50 100

HWY: S 13TH STREET (CTH V)
COUNTY: MILWAUKEE

STATE R/W PROJECT NUMBER 2505-03-21
CONSTRUCTION PROJECT NUMBER 2505-03-71

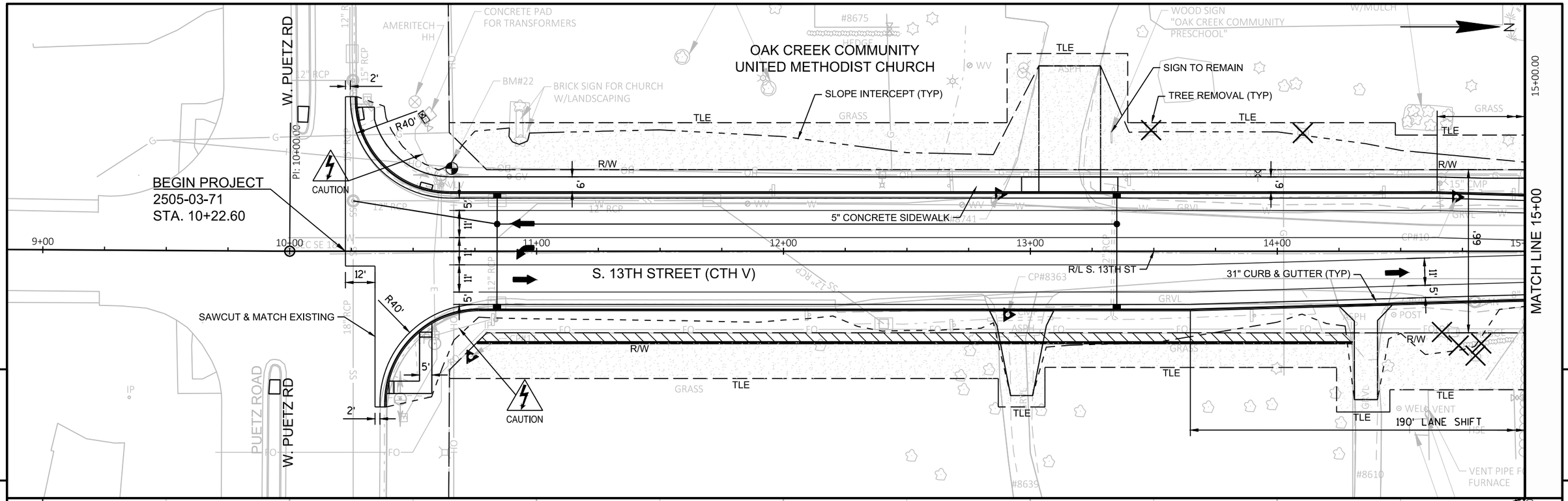
PLAT SHEET 4.08
PS&E SHEET 113

E

FILE NAME : TPP100.DWG
LAYOUT NAME - SHEET 4.08

PLOT DATE : 9/6/2023 2:54 PM
PLOT BY : RATZBURG, MICHAEL
PLOT NAME :
PLOT SCALE :

WISDOT/CADDS SHEET 75

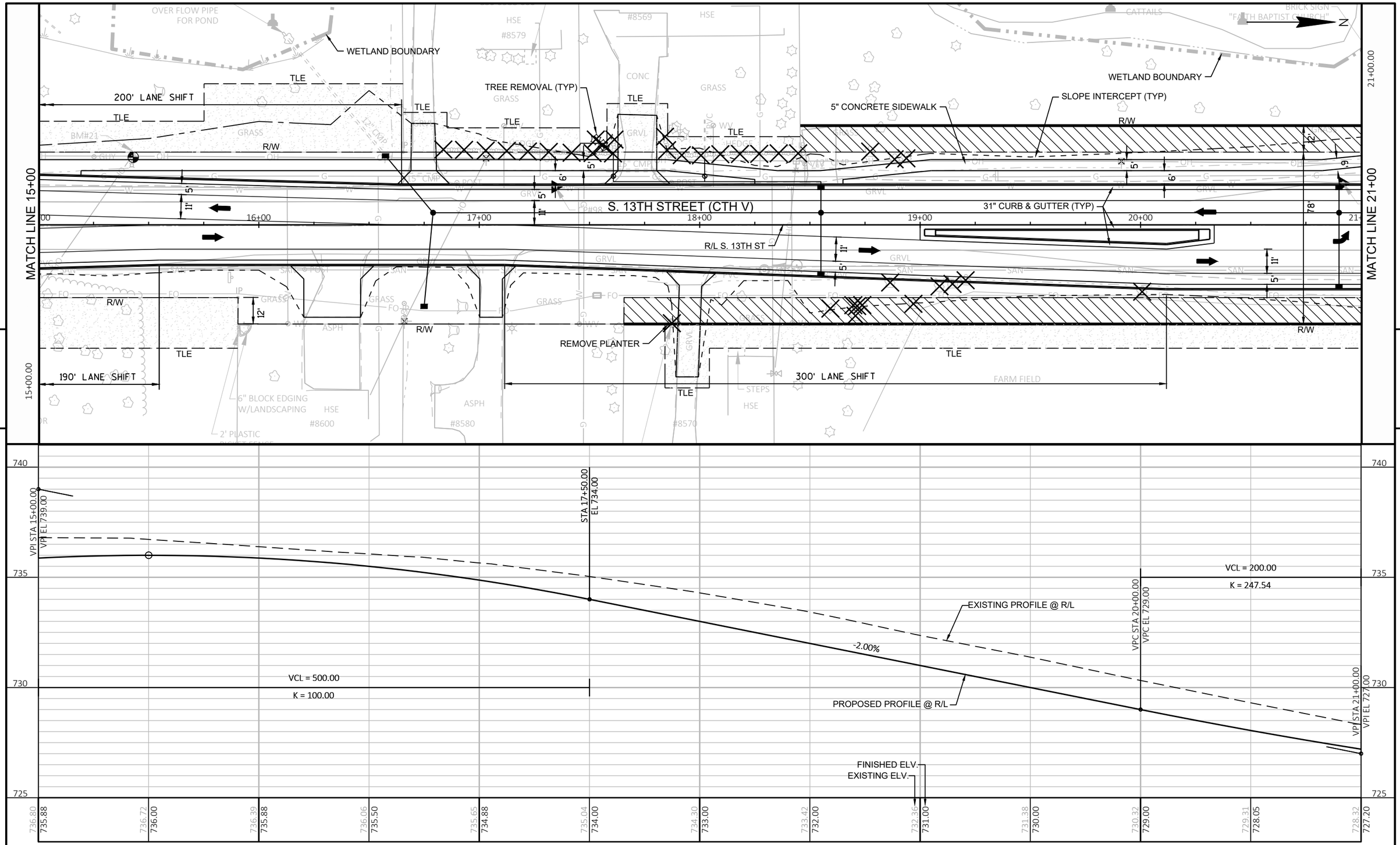


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 114	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 01

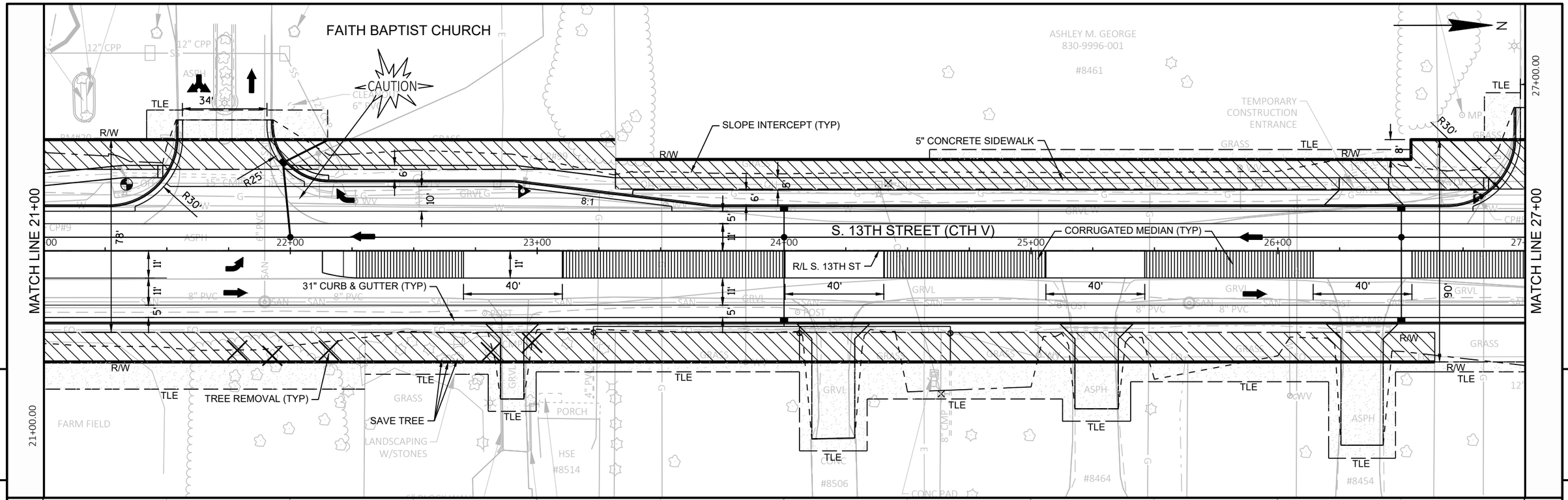
PLOT DATE : 1/5/2024 11:19 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 115	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 02
PLOT DATE : 1/5/2024 11:22 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 116	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 03
PLOT DATE : 1/5/2024 11:25 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44

OAK CREEK WEST MIDDLE SCHOOL

"WEST MIDDLE SCHOOL"

LANDSCAPING & 12" BLOCK WALL

#8401

#8351

#8434

#8420

#8400

#8380

#8370

AKBAR ALI YASIN

MATCH LINE 27+00

MATCH LINE 33+00

27+00.00

33+00.00

29'

TLE

28'

SLOPE INTERCEPT (TYP)

5" CONCRETE SIDEWALK

R30'

R40'

R/W

S. 13TH STREET (CTH V)

28+00

29+00

30+00

31+00

32+00

175'

R/L S. 13TH ST

REMOVE EXISTING ASPHALT PATH

CAUTION

REMOVE AND REPLACE GRAVEL & PAVERS ADJACENT TO DRIVEWAY

31" CURB & GUTTER (TYP)

70'

90'

REMOVE LIGHT POLES

SAWCUT & MATCH EXISTING

PILGRIM PKWY

N

VPC STA 29+25.00
VPC EL 719.50

VPI STA 30+00.00
VPI EL 718.98

VPT STA 30+75.00
VPT EL 717.71

STA 32+00.00
EL 715.60

EXISTING PROFILE @ R/L

PROPOSED PROFILE @ R/L

-1.69%

-1.16%

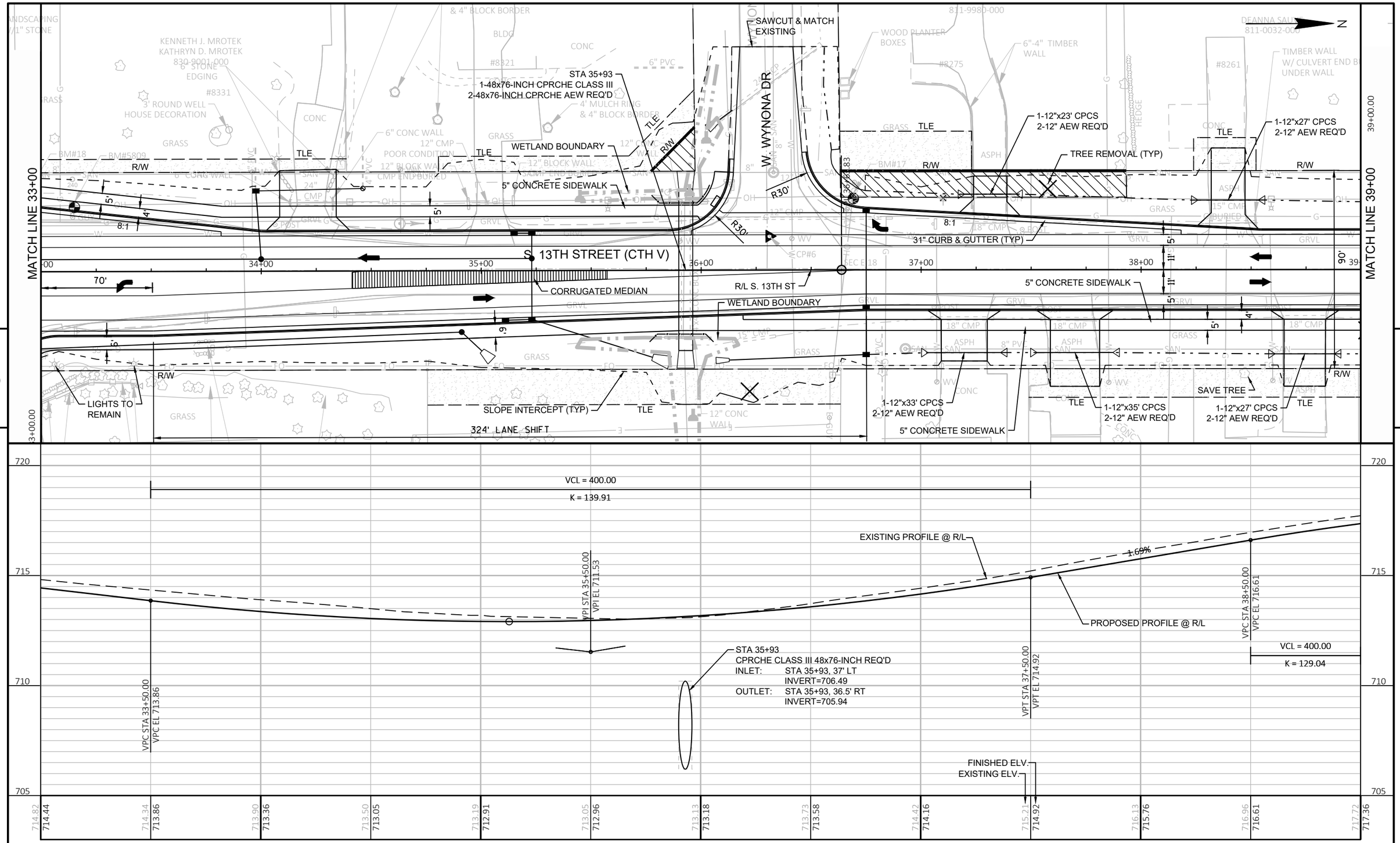
VCL = 150.00

K = 151.96

FINISHED ELV.

EXISTING ELV.

| | | |



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 118	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 05
PLOT DATE : 1/5/2024 11:31 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

MATCH LINE 39+00

MATCH LINE 45+00

39+00.00

45+00.00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

40+00 41+00 42+00 43+00 44+00 45

R/W

TLE

1-12"x22' CPCS
2-12" AEW REQ'D

SLOPE INTERCEPT (TYP)

1-12"x29' CPCS
2-12" AEW REQ'D

1-12"x30' CPCS
2-12" AEW REQ'D

1-12"x28' CPCS
2-12" AEW REQ'D

1-12"x26' CPCS
2-12" AEW REQ'D

31" CURB & GUTTER (TYP)

5" CONCRETE SIDEWALK

TREE REMOVAL (TYP)

1-12"x25' CPCS
2-12" AEW REQ'D

1-12"x28' CPCS
2-12" AEW REQ'D

1-12"x32' CPCS
2-12" AEW REQ'D

SAVE TREE

1-12"x32' CPCS
2-12" AEW REQ'D

1-12"x26' CPCS
2-12" AEW REQ'D

SAVE TREE

5' 11' 11' 5' 5' 4' 5' 4' 5' 90' 8:1

WILDFLOWER LANDSCAPING

LANDSCAPING W/MULCH & FLOWERS

NORTH END OF CMP BURIED

BASKETBALL HOOP

6" BLOCK EDGING

TIMBER WALL

#8250 #8240 #8230 #8220 #8206 #8180 #8170

PEDRO CERNA KASHMALMULTANI

VPI STA 40+50.00
VPI EL 720.00

VPT STA 42+50.00
VPT EL 717.19

VCL = 200.00
K = 220.93

EXISTING PROFILE @ R/L

-1.41%

PROPOSED PROFILE @ R/L

VCL = 400.00
K = 129.04

FINISHED ELV.
EXISTING ELV.

VPC STA 44+25.00
VPC EL 714.73

725 720 715 710

717.72 717.36 718.31 717.92 718.69 718.28 718.84 718.45 718.72 718.43 718.42 718.21 718.00 717.80 717.42 717.19 716.86 716.49 716.21 715.78 715.47 715.08 714.69 714.39 713.92 713.80

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 119	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 06

PLOT DATE : 1/5/2024 11:34 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44

MATCH LINE 45+00

MATCH LINE 51+00

45+00.00

51+00.00

5

5

1-12"x30' CPCS
2-12" AEW REQ'D

1-12"x22' CPCS
2-12" AEW REQ'D

1-12"x29' CPCS
2-12" AEW REQ'D

SLOPE INTERCEPT (TYP)

STA 50+15
1-72x113-INCH CPRCHE CLASS III
2-72x113-INCH CPRCHE AEW REQ'D

WETLAND BOUNDARY

TLE

R/W

30'

115'

31" CURB & GUTTER (TYP)

46+00

47+00

48+00

49+00

50+00

S. 13TH STREET (CTH V)

R/L S. 13TH ST

5" CONCRETE SIDEWALK

8:1

10'

4'

5'

R30'

W. WILDING DR

GAS PIPELINE SIGN
"1-800-236-9874"

4' WOOD STOCKADE FENCE

TREE REMOVAL (TYP)

SAWCUT & MATCH EXISTING

11'

6'

35'

1-12"x33' CPCS
2-12" AEW REQ'D

4' PLASTIC SPLIT RAIL FENCE

REMOVE EXISTING SIDEWALK

WEATHERLY MEADOWS
812-0169-000

811-9025-000

715

710

705

702

VCL = 200.00

K = 220.93

VCL = 300.00

K = 106.19

-0.50%

EXISTING PROFILE @ R/L

PROPOSED PROFILE @ R/L

VPI STA 45+25.00
VPI EL 713.32

VPT STA 46+25.00
VPT EL 712.82

VPC STA 49+00.00
VPC EL 711.45

VPI STA 50+50.00
VPI EL 710.70

STA 50+15
CPRCHE CLASS III 72x113-INCH REQ'D
INLET: STA 50+17, 45' LT
INVERT=702.40
OUTLET: STA 50+13, 50' RT
INVERT=701.80

FINISHED ELV.
EXISTING ELV.

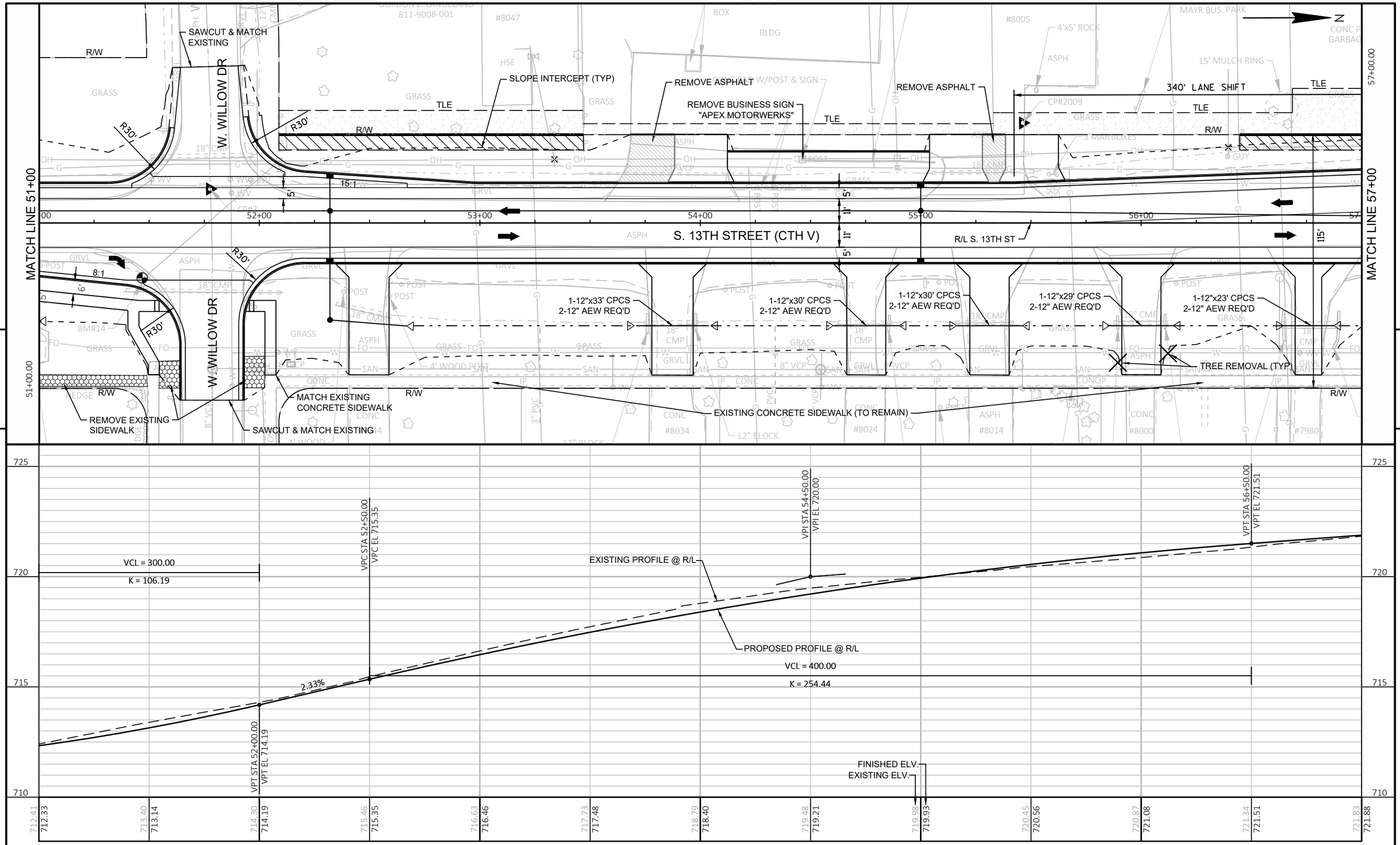
713.92	713.80
713.40	713.33
712.96	712.96
712.72	712.70
712.66	712.45
712.41	712.20
712.04	711.95
711.76	711.70
711.63	711.45
711.47	711.32
711.42	711.42
711.69	711.76
712.41	712.33

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 120 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 07

PLOT DATE : 1/5/2024 11:37 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:40 FT

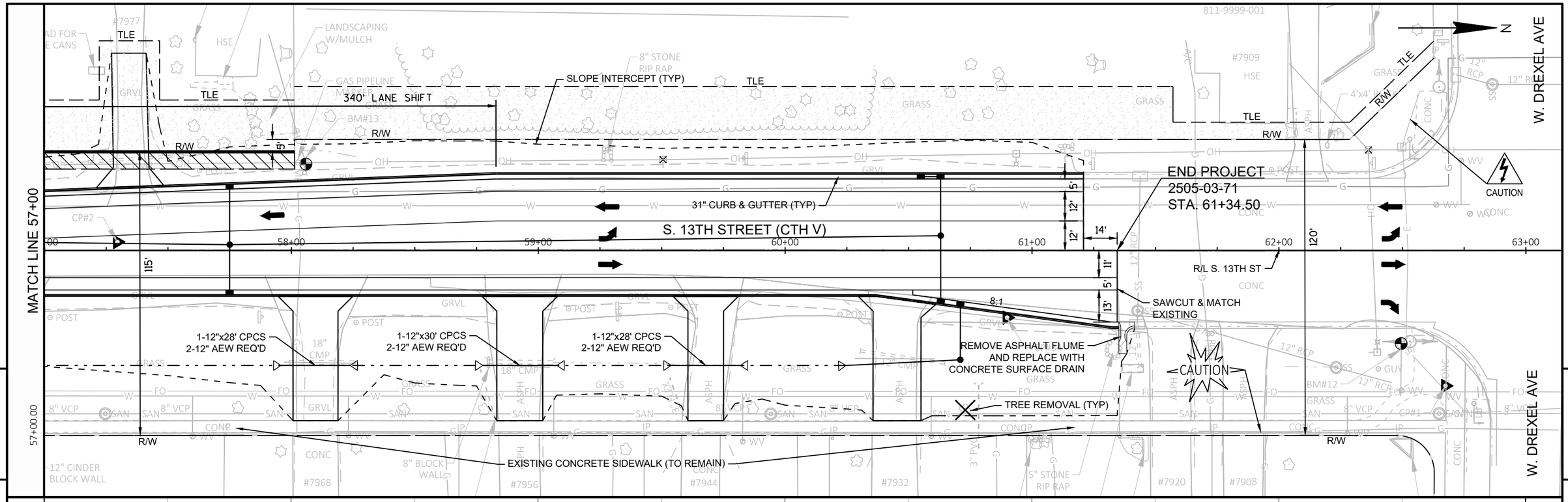
WISDOT/CADDS SHEET 44

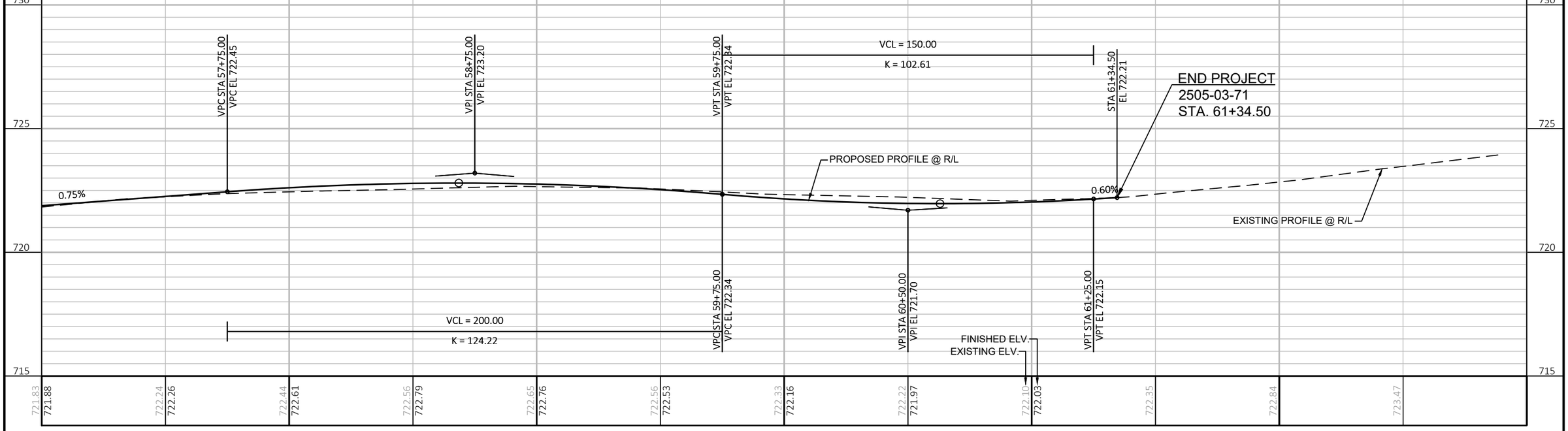


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 121	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 08
PLOT DATE : 1/5/2024 11:40 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT

WISDOT/CADDS SHEET 44





PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	PLAN AND PROFILE: S. 13TH STREET	SHEET 122	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_PP1.DWG
LAYOUT NAME - 09
PLOT DATE : 1/5/2024 11:43 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:40 FT

Standard Detail Drawing List

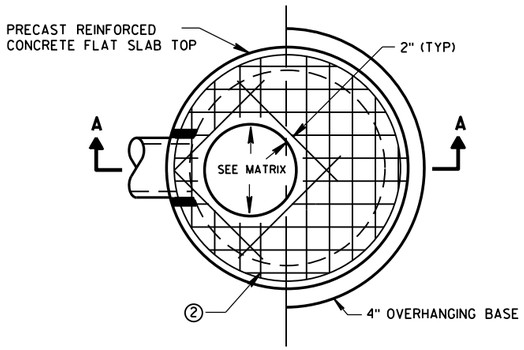
08A08-02	CATCH BASINS 3-FT, 4-FT, 5-FT AND 6-FT DIAMETER
08B09-03	MANHOLES 3-FT, 4-FT, 5-FT, 6-FT, 7-FT, 8-FT, 9-FT, 10-FT DIAMETER
08C07-02	INLETS 2X2-FT, 2X2.5-FT, 2X3-FT AND 2.5X3-FT
08D01-23A	CONCRETE CURB & GUTTER
08D01-23B	CONCRETE CURB, TIES AND CURB AND GUTTER APPLICATIONS
08D02-08A	CONCRETE SURFACE DRAINS FLUME TYPE AT STRUCTURES
08D02-08B	CONCRETE SURFACE DRAINS FLUME TYPE AT STRUCTURES
08D05-21A	CURB RAMPS TYPES 1 AND 1-A
08D05-21B	CURB RAMPS TYPES 2 AND 3
08D05-21C	CURB RAMPS TYPES 4A AND 4A1
08D05-21D	CURB RAMPS TYPE 4B AND 4B1
08D05-21E	CURB RAMPS TYPES 5, 6, 7A, 7B & 8
08D05-21F	CURB RAMPS RADIAL DETECTABLE WARNING FIELD APPLICATIONS
08D05-21G	CURB RAMPS RECTANGULAR AND RADIAL DETECTABLE WARNING PLATES
08D16-11	CONCRETE GUTTER, CURB AND GUTTER AND PAVEMENT TIES
08D17-06	MANHOLES, MANHOLE & INLET COVERS
08D18-04	DRIVEWAY AND SIDEWALK RAMPS TYPES X & Y
08D19-04	DRIVEWAY AND SIDEWALK RAMPS TYPE Z
08E08-03	TYPICAL INSTALLATIONS OF EROSION BALES / TEMPORARY DITCH CHECKS
08E09-06	SILT FENCE
08E10-02	INLET PROTECTION TYPE A, B, C AND D
08E14-01	TRACKING PAD
08E15-01	CULVERT PIPE CHECK
08F04-08	JOINT TIES FOR CONCRETE PIPE AND CONCRETE COLLAR DETAIL
09B02-10	CONDUIT
09B04-12	PULL BOX
09C02-09	CONCRETE BASES, TYPES 1, 2, 5, & 6
09C03-04	TRANSFORMER/PEDESTAL BASES
09E01-15G	HARDWARE DETAILS FOR POLE MOUNTINGS
09E06-05	TRAFFIC SIGNAL STANDARD POLY BRACKET MOUNTINGS (TYPICAL) 13 FT. OR 15 FT.
09E07-06	TRAFFIC SIGNAL STANDARD PEDESTRIAN AND FLASHER TYPICAL MOUNTING DETAILS
09F15-04B	LOOP DETECTOR INSTALLED IN BASE COURSE WITH PULL (SPLICE) BOX OFF ROADWAY (OPTION 2)
11B01-05	CONCRETE CORRUGATED MEDIAN
11B02-02	CONCRETE MEDIAN NOSE
13C01-19	CONCRETE PAVEMENT LONGITUDINAL JOINTS AND TIES
13C13-11	URBAN DOWELED CONCRETE PAVEMENT
13C18-08A	CONCRETE PAVEMENT JOINTING
15C02-09A	BARRICADES AND SIGNS FOR MAINLINE CLOSURES
15C02-09B	BARRICADES AND SIGNS FOR VARIOUS CLOSURES
15C02-09C	DETOUR SIGNING FOR MAINLINE CLOSURES
15C03-05	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES
15C05-05	TRAFFIC CONTROL, ADVANCE WARNING SIGNS 40 M.P.H. OR LESS
15C07-15B	PAVEMENT MARKING WORDS
15C07-15C	PAVEMENT MARKING ARROWS
15C08-23A	PERMANENT LONGITUDINAL PAVEMENT MARKINGS
15C08-23C	PAVEMENT MARKING (TURN LANES)
15C08-23D	PAVEMENT MARKING (TURN LANES)
15C11-10B	CHANNELIZING DEVICES DRUMS, CONES, BARRICADES AND VERTICAL PANELS
15C18-08A	MEDIAN ISLAND MARKING PAVEMENT MARKINGS
15C18-08B	MEDIAN ISLAND MARKING MEDIAN ISLAND NOSE
15C29-08A	BICYCLE LANE MARKING
15C33-04	STOP LINE AND CROSSWALK PAVEMENT MARKING
15C35-06A	PAVEMENT MARKING (INTERSECTIONS)
15D20-07B	TRAFFIC CONTROL, SINGLE RIGHT LANE CLOSURE, UNDIVIDED NON-FREEWAY/EXPRESSWAY
15D20-07C	TRAFFIC CONTROL, SINGLE LEFT LANE CLOSURE, UNDIVIDED NON-FREEWAY/EXPRESSWAY
15D21-07A	TRAFFIC CONTROL, INTERSECTION WITHIN SINGLE LANE CLOSURE
15D21-07B	TRAFFIC CONTROL, INTERSECTION WITHIN SINGLE LANE CLOSURE
15D30-09A	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09B	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09C	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09D	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09E	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09F	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09G	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09H	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09I	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09J	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

6

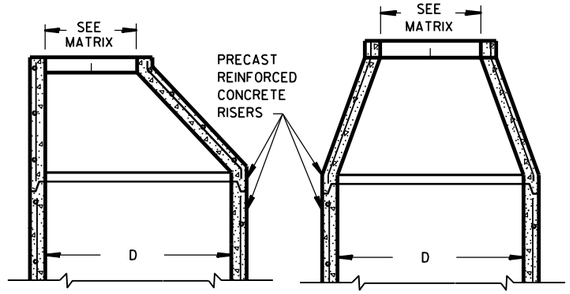
Standard Detail Drawing List

15D30-09K	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION
15D30-09L	TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

6

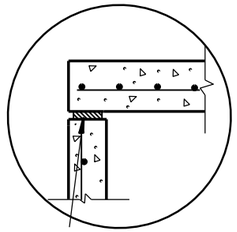


PLAN VIEW CIRCULAR OPENING

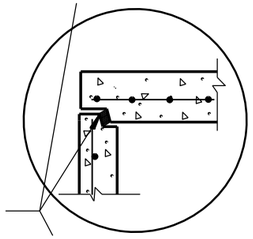


OPTIONAL PRECAST REINFORCED CONCRETE ECCENTRIC TOP

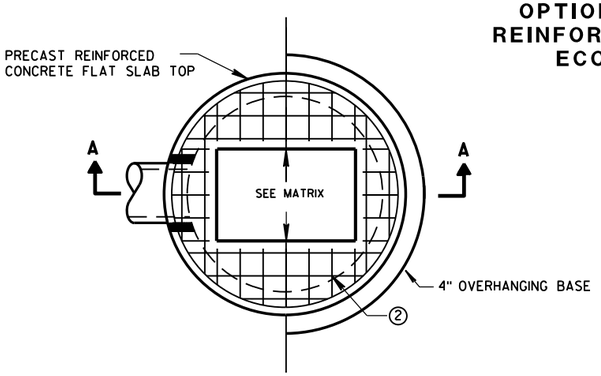
OPTIONAL PRECAST REINFORCED CONCRETE CONCENTRIC TOP



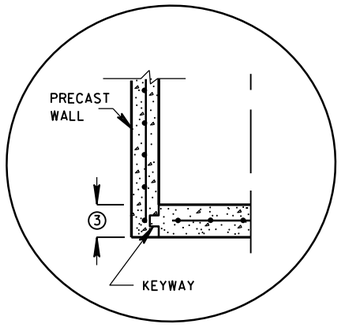
TOP WITH PLAIN END JOINT



TOP WITH TONGUE AND GROOVE JOINT

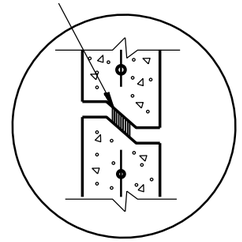


PLAN VIEW RECTANGULAR OPENING



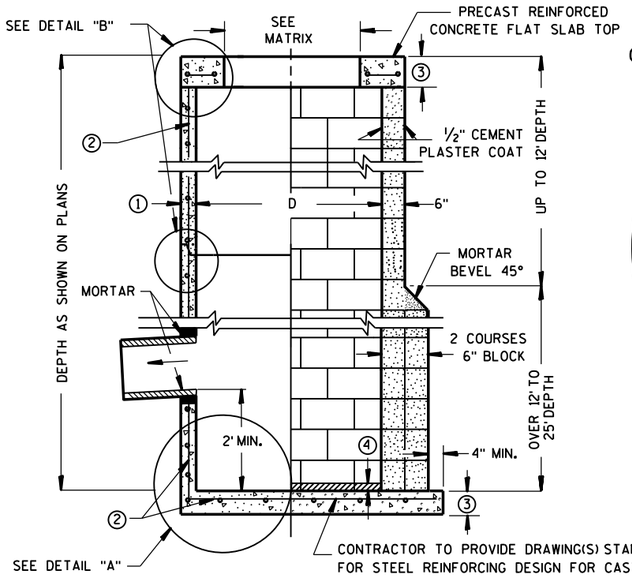
PRECAST REINFORCED CONCRETE WITH INTEGRAL BASE OPTION

JOINTS TO BE SEALED WITH A BUTYL RUBBER SEAL PER SEALANT MANUFACTURERS RECOMMENDATIONS CONFORMING TO ASTM C 990 (TYP)



RISER WITH TONGUE AND GROOVE JOINT

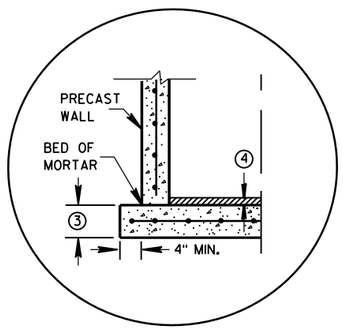
DETAIL "B"



SECTION A-A

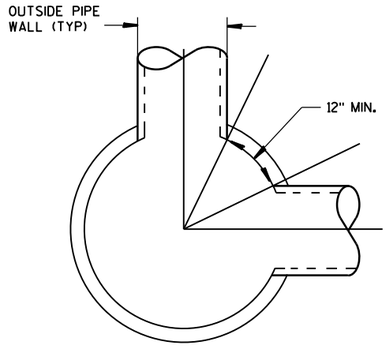
PRECAST REINFORCED CONCRETE WITH MONOLITHIC BASE

CONCRETE BLOCK WITH CAST-IN-PLACE OR PRECAST REINFORCED CONCRETE BASE ②



SEPARATE PRECAST REINFORCED CONCRETE BASE OPTION

DETAIL "A"



DETAIL "C"

GENERAL NOTES

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

UNLESS OTHERWISE AUTHORIZED IN WRITING BY THE ENGINEER, THE CONTRACTOR SHALL NOT ORDER AND DELIVER PRECAST CATCH BASIN UNITS REQUIRED FOR THE PROJECT UNTIL A LIST OF SIZES IS FURNISHED BY THE ENGINEER.

DETAILED DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR UNDERGROUND DRAINAGE STRUCTURES SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PROVIDING THAT SUCH ALTERNATE DESIGNS MAKE PROVISION FOR EQUIVALENT CAPACITY AND STRENGTH.

ALL DRAINAGE STRUCTURES ARE DESIGNATED ON THE PLANS AS "MANHOLES 3X3-L", "CATCH BASINS 4-B", "INLETS 2X3-H", ETC. THE FIRST NUMBERS DESIGNATE THE SIZE OF THE STRUCTURE, AND THE FOLLOWING LETTER DESIGNATES THE TYPE OF COVER TO BE USED TO COMPRISE THE COMPLETE UNIT.

BASES SHALL BE PLACED ON A BED OF MATERIAL AT LEAST 6 INCHES IN DEPTH, WHICH MEETS THE REQUIREMENTS OF FOUNDATION BACKFILL. THIS BEDDING SHALL BE COMPACTED AND PROVIDE UNIFORM SUPPORT FOR THE ENTIRE AREA OF THE BASE.

PRECAST REINFORCED CONCRETE CONE TOPS (ECCENTRIC OR CONCENTRIC) OR PRECAST REINFORCED CONCRETE FLAT SLAB TOPS MAY BE USED ON CONCRETE BLOCK STRUCTURES.

ECCENTRIC CONE TOPS MAY BE USED ON ALL STRUCTURES, AND CONCENTRIC CONE TOPS SHALL BE USED ONLY ON STRUCTURES 5 FEET OR LESS IN DEPTH, UNLESS OTHERWISE DIRECTED BY THE ENGINEER.

STEPS MEETING AASHTO M199 AND THE FOLLOWING REQUIREMENTS SHALL BE INSTALLED IN ALL STRUCTURES OVER 5 FEET IN DEPTH: 16 INCH C-C MAXIMUM SPACING; PROJECT A MINIMUM CLEAR DISTANCE OF 4 INCHES FROM THE WALL AT THE POINT OF EMBEDMENT; MINIMUM LENGTH OF 10 INCHES; MINIMUM WALL EMBEDMENT OF 3 INCHES. FERROUS METAL STEPS NOT PAINTED OR TREATED TO RESIST CORROSION SHALL HAVE A MINIMUM CROSS SECTIONAL DIMENSION OF 1 INCH.

STEPS OF APPROVED POLYPROPYLENE PLASTIC COATED REINFORCEMENT BAR ARE ACCEPTABLE. REINFORCING BAR MUST BE A MINIMUM OF ½ INCH AND MEET THE REQUIREMENTS OF ASTM A615.

CERTIFICATION SHALL BE PROVIDED THAT INSTALLED STEPS WHEN TESTED IN ACCORDANCE WITH SECTION 10 OF AASHTO T280 CAN WITHSTAND A VERTICAL LOAD OF 800 LBS. AND A HORIZONTAL LOAD OF 400 LBS.

ALL BAR STEEL REINFORCEMENT SHALL BE EMBEDDED 2 INCHES CLEAR UNLESS OTHERWISE SHOWN OR NOTED.

ALL PRECAST INLET UNITS SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF AASHTO DESIGNATION M199.

PRECAST REINFORCED RISERS SHALL HAVE A TONGUE AND GROOVE JOINT WITH TONGUE UP OR DOWN.

CONCRETE BLOCK WILL NOT BE PERMITED FOR STRUCTURES GREATER THAN 4 FEET IN DIAMETER.

4" OVERHANGING BASES ARE REQUIRED FOR ALL CONCRETE BLOCK INSTALLATIONS. 4" OVERHANG IS REQUIRED WHEN SEPARATE PRECAST BASE IS PROVIDED. OVERHANG IS NOT REQUIRED ON PRECAST STRUCTURES WITH AN INTEGRAL OR MONOLITHIC BASE.

FOR ADDITIONAL CONFIGURATIONS, MAINTAIN A MINIMUM OF 12 INCHES AS MEASURED FROM THE INSIDE OF THE STRUCTURE WALL BETWEEN THE OUTSIDE PIPE WALLS OF ADJACENT PIPES. SEE DETAIL "C".

① MINIMUM WALL THICKNESS SHALL BE 4 INCHES FOR 3-FT, 5 INCHES FOR 4-FT, 6 INCHES FOR 5-FT AND 7 INCHES FOR 6-FT DIAMETER PRECAST CATCH BASINS.

② FOR PRECAST CATCH BASINS PROVIDE REINFORCING STEEL IN ACCORDANCE TO AASHTO M199.

③ PRECAST FLAT SLAB TOPS AND BASES WITH A DIAMETER OF 48" AND LESS SHALL HAVE A MINIMUM THICKNESS OF 6". PRECAST FLAT SLAB TOPS AND BASES WITH A DIAMETER LARGER THAN 48" SHALL HAVE A MINIMUM THICKNESS OF 8".

④ 1" CONCRETE KEY POURED AFTER INSTALLATION. 2' SUMP MEASURED FROM TOP OF KEY.

CATCH BASIN COVER OPENING MATRIX

CATCH BASIN SIZE	INLET COVER TYPE	ALL A'S	ALL B'S	BW	C	F	ALL H'S	S	T	V	WM	Z
	OPENING SIZE (FT)											
3-FT	2X2	X	X					X		X		
	2 DIA.				X							X
4-FT-6-FT	2X2	X	X					X		X		
	2X2.5			X				X	X	X	X	
	2 DIA.				X							X
	2X3						X					
	2.5X3					X						

PIPE MATRIX

CATCH BASIN SIZE	MAXIMUM INSIDE PIPE DIAMETER FOR TWO PIPES	
	180° SEPARATION (IN)	90° SEPARATION (IN)
3-FT	15	12
4-FT	24	18
5-FT	36	24
6-FT	42	30

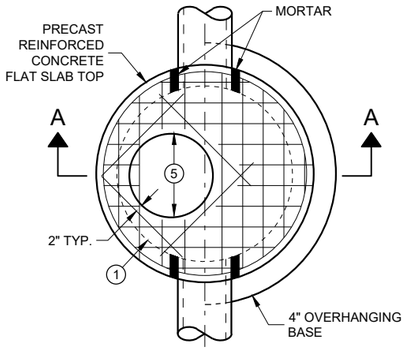
CATCH BASINS 3-FT, 4-FT, 5-FT AND 6-FT DIAMETER

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

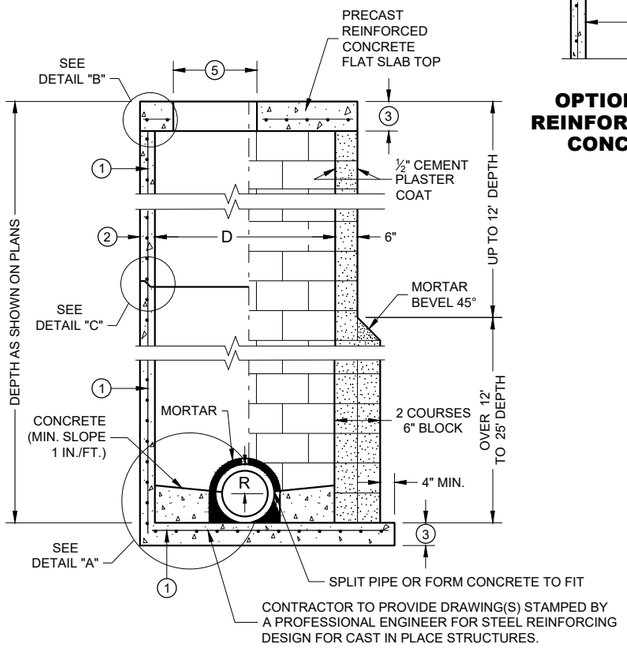
APPROVED
Sept., 2016 — DATE
/S/ Rodney Taylor — ROADWAY STANDARDS UNIT SUPERVISOR
FHWA

S.D.D. 8 A 8-2

S.D.D. 8 A 8-2



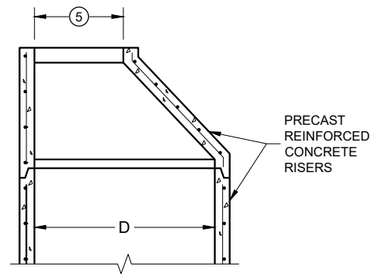
PLAN VIEW
CIRCULAR OPENING



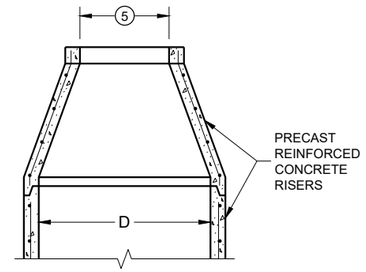
SECTION A - A

PRECAST REINFORCED CONCRETE WITH MONOLITHIC BASE

CONCRETE BLOCK WITH CAST IN PLACE OR PRECAST REINFORCED CONCRETE BASE (1)



OPTIONAL PRECAST REINFORCED CONCRETE ECCENTRIC TOP



OPTIONAL PRECAST REINFORCED CONCRETE CONCENTRIC TOP

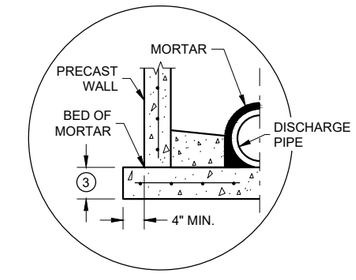
MANHOLE COVER OPENING MATRIX

OPENING SIZE (FT.) \ MANHOLE COVER TYPE	C	ALL J'S	K	L	M
2 DIA.	X	X		X	
3 DIA.			X		X

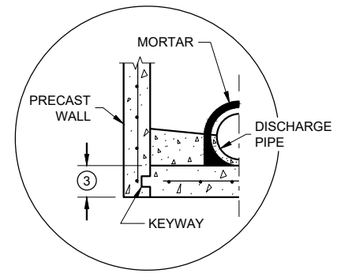
PIPE MATRIX

MANHOLE SIZE (DIA.)	MAXIMUM INSIDE PIPE DIAMETER FOR TWO PIPES		MINIMUM WALL THICKNESS (IN)	MINIMUM PRECAST FLAT SLAB TOP AND BASE THICKNESS
	180° SEPARATION (IN)	90° SEPARATION (IN)		
3-FT	15	12	4	6
4-FT	24	18	4	6
5-FT	36	24	5	8
6-FT	42	36	6	8
7-FT	48	36/42*	7	8
8-FT	60	42	8	8
9-FT	66	54	9	10
10-FT	72	60	10	10

*A 36" PIPE AND A 42" PIPE CAN BE PLACED WITHIN 90 DEGREES. SEE MINIMUM HORIZONTAL PIPE SEPARATION DETAIL.

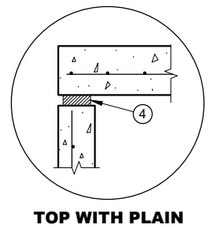


SEPARATE PRECAST REINFORCED CONCRETE BASE OPTION

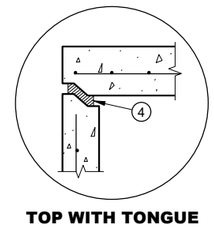


PRECAST REINFORCED CONCRETE WITH INTEGRAL BASE OPTION

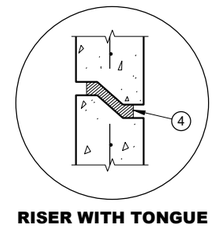
DETAIL "A"



TOP WITH PLAIN END JOINT

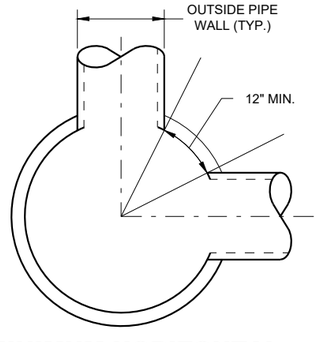


TOP WITH TONGUE AND GROOVE JOINT



RISER WITH TONGUE AND GROOVE JOINT

DETAIL "B" **DETAIL "C"**



MINIMUM HORIZONTAL PIPE SEPARATION

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FOR ADDITIONAL CONFIGURATIONS, MAINTAIN A MINIMUM OF 12 INCHES AS MEASURED FROM THE INSIDE OF THE STRUCTURE WALL BETWEEN THE OUTSIDE PIPE WALLS OF ADJACENT PIPES. SEE DETAIL "D".

(1) FOR PRECAST MANHOLES PROVIDE REINFORCING STEEL IN ACCORDANCE TO AASHTO M199.

(2) SEE PIPE MATRIX TABLE FOR MINIMUM WALL THICKNESS FOR PRECAST MANHOLES

(3) SEE PIPE MATRIX TABLE FOR MINIMUM THICKNESS OF PRECAST FLAT SLAB TOPS AND BASES.

(4) JOINTS TO BE SEALED WITH A BUTYL RUBBER SEAL PER SEALANT MANUFACTURERS RECOMMENDATIONS CONFORMING TO ASTM C 990 (TYP.).

(5) SEE MANHOLE COVER OPENING MATRIX.

MANHOLES 3-FT, 4-FT, 5-FT, 6-FT, 7-FT, 8-FT, 9-FT AND 10-FT DIAMETER

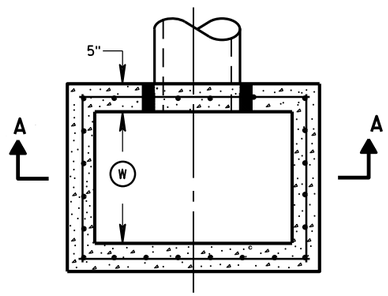
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
November 2021 — DATE
/S/ Rodney Taylor — ROADWAY STANDARDS DEVE ENGINEER

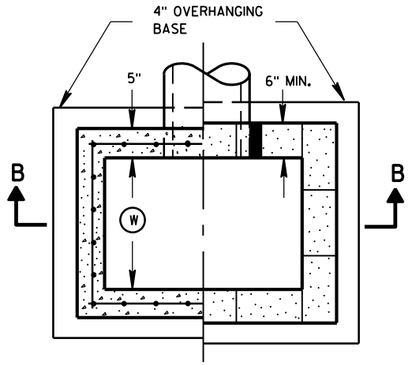
FHWA

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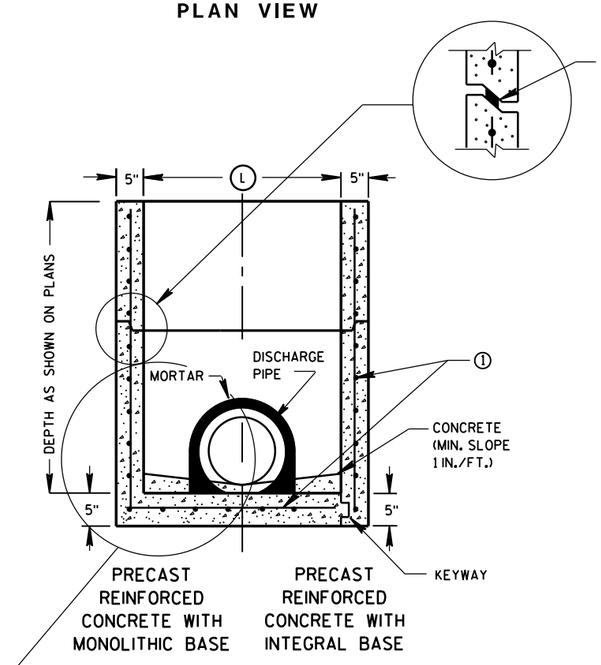
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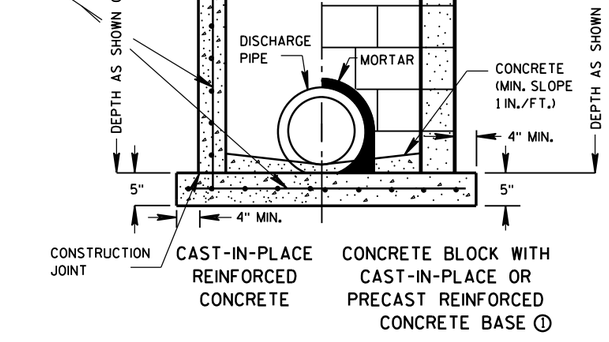
PLAN VIEW



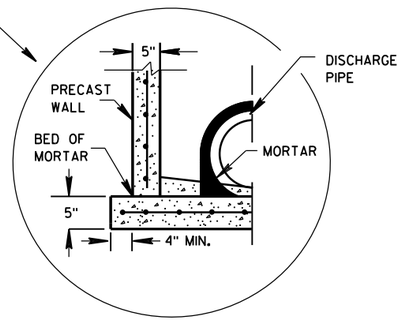
PLAN VIEW



SECTION A-A



SECTION B-B



SEPARATE PRECAST REINFORCED CONCRETE BASE OPTION

GENERAL NOTES

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ALL DRAINAGE STRUCTURES ARE DESIGNATED ON THE PLANS AS "MANHOLES 3X3-L", "CATCH BASINS 4-B", "INLETS 2X3-H", ETC. THE FIRST NUMBERS DESIGNATES THE SIZE OF THE STRUCTURE, AND THE FOLLOWING LETTER DESIGNATES THE TYPE OF COVER TO BE USED TO COMPRISE THE COMPLETE UNIT.

BASES SHALL BE PLACED ON A BED OF MATERIAL AT LEAST 6 INCHES IN DEPTH, WHICH MEETS THE REQUIREMENTS OF FOUNDATION BACKFILL. THIS BEDDING SHALL BE COMPACTED AND PROVIDE UNIFORM SUPPORT FOR THE ENTIRE AREA OF THE BASE.

ALL BAR STEEL REINFORCEMENT SHALL BE EMBEDDED 2 INCHES CLEAR UNLESS OTHERWISE SHOWN OR NOTED.

PRECAST REINFORCED RISERS SHALL HAVE A TONGUE AND GROOVE JOINT WITH TONGUE UP OR DOWN.

4" OVERHANGING BASES ARE REQUIRED FOR CAST-IN-PLACE REINFORCED CONCRETE AND CONCRETE BLOCK INSTALLATIONS.
4" OVERHANG IS REQUIRED WHEN SEPARATE PRECAST BASE IS PROVIDED.
OVERHANG IS NOT REQUIRED ON PRECAST STRUCTURES WITH AN INTEGRAL OR MONOLITHIC BASE.

MAXIMUM INSIDE PIPE DIAMETER DETERMINED BY 3 INCH CLEARANCE ON EACH SIDE OF THE OUTSIDE WALL OF THE PIPE. SEE DETAIL "A". ASSUMES PIPE ENTERS PERPENDICULAR TO THE STRUCTURE.

① FOR PRECAST INLETS PROVIDE REINFORCING STEEL IN ACCORDANCE TO ASTM C 913.

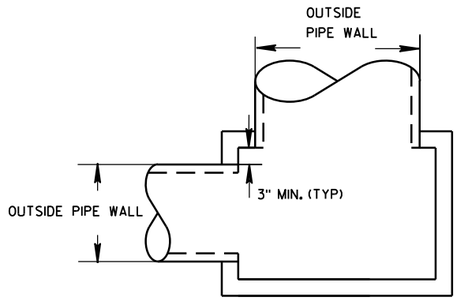
② CONTRACTOR TO PROVIDE DRAWING(S) STAMPED BY A PROFESSIONAL ENGINEER FOR STEEL REINFORCING DESIGN FOR CAST-IN-PLACE STRUCTURES.

INLET COVER MATRIX

INLET SIZE		INLET COVER TYPE	ALL A'S	ALL B'S	BW	F	ALL H'S	S	T	V	WM
	WIDTH (W) (FT)	LENGTH (L) (FT)									
2X2-FT	2	2	X	X				X		X	
2X2.5-FT	2	2.5			X			X	X	X	X
2X3-FT	2	3					X				
2.5X3-FT	2.5	3				X					

PIPE MATRIX

INLET SIZE	MAXIMUM INSIDE PIPE DIAMETER	
	WIDTH (IN)	LENGTH (IN)
2X2-FT	12	12
2X2.5-FT	12	18
2X3-FT	12	24
2.5X3-FT	18	24



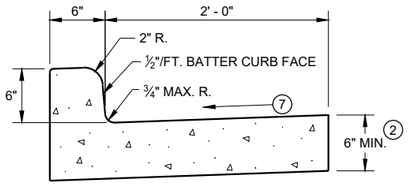
DETAIL "A"

INLETS 2X2-FT, 2X2.5-FT, 2X3-FT AND 2.5X3-FT

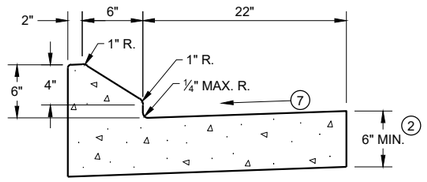
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
Sept., 2016
DATE
/S/ Rodney Taylor
ROADWAY STANDARDS D IT UNIT SUPERVIS
FHWA

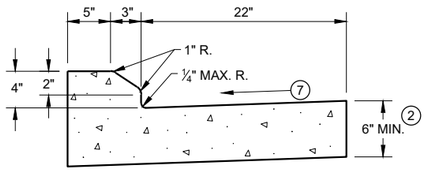
INLETS 2X2-FT, 2X2.5-FT, 2X3-FT AND 2.5X3-FT



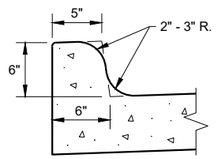
TYPES A (1) & D



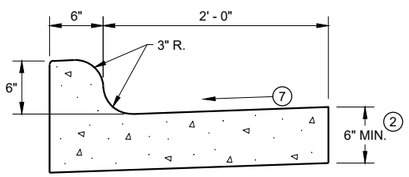
6" SLOPED CURB TYPES G (1) & J



4" SLOPED CURB TYPES G (1) & J

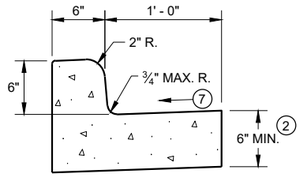


TYPES K (1) & L
(OPTIONAL CURB SHAPE)



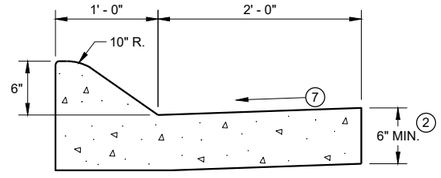
TYPES K (1) & L

CONCRETE CURB AND GUTTER 30"

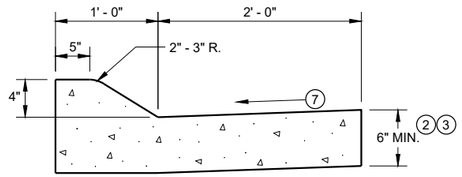


TYPES A (1) & D

CONCRETE CURB AND GUTTER 18"

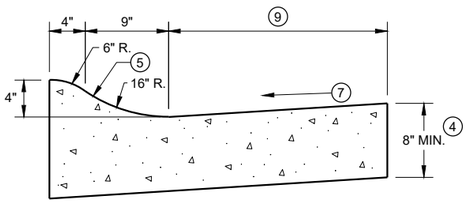


6" SLOPED CURB TYPES A (1) & D



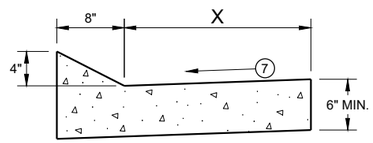
4" SLOPED CURB TYPES A (1) & D

CONCRETE CURB AND GUTTER 36"



4" SLOPED CURB TYPES R (1) & T

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

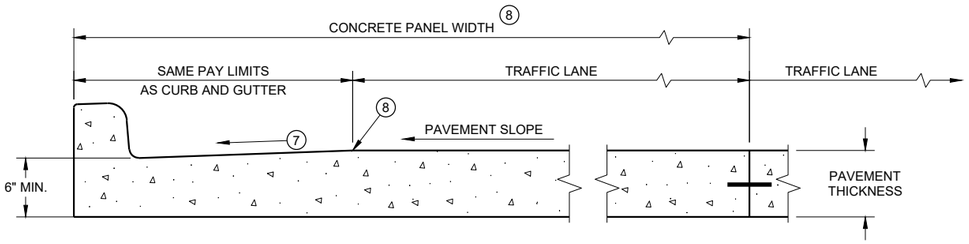


TYPES TBT & TBTT (1)

CONCRETE CURB AND GUTTER

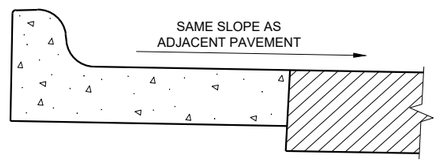
PAVEMENT THICKNESS AND MAXIMUM CONCRETE PANEL WIDTH TABLE

PAVEMENT THICKNESS	MAXIMUM PANEL WIDTH
LESS THAN 10"	12'
10" & ABOVE	15'



PARTIAL SECTION OF PAVEMENT * WITH INTEGRAL CURB AND GUTTER

* BIKE LANE IS NOT SHOWN



REVERSE SLOPE GUTTER (6)
(TYPICAL FOR ALL CURB & GUTTER TYPES)

GENERAL NOTES

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

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

INTEGRAL CURB AND GUTTER SHALL CONFORM TO THE DETAILS SHOWN FOR CONCRETE CURB AND GUTTER INCLUDING THE TRANSVERSE GUTTER SLOPE.

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

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

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

(3) USE 8" MINIMUM GUTTER THICKNESS WHEN USED WITH AN ADJACENT CONCRETE TRUCK APRON PLACED BEHIND BACK OF CURB.

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

(5) UNLESS OTHERWISE NOTED, FOR STAKING PURPOSES THE FACE OF CURB IS 6" FROM THE BACK OF CURB.

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

(7) USE 4% GUTTER CROSS SLOPE UNLESS OTHERWISE NOTED IN THE PLANS.

(8) INCLUDE LONGITUDINAL JOINT AND TIE BARS ALONG LANE EDGE WHEN CONCRETE PANEL WIDTH EXCEEDS THE MAXIMUM WIDTH PER TABLE BELOW. LONGITUDINAL JOINT(S) ARE NOT ALLOWED WITHIN TRAFFIC LANES AND BIKE LANES. LONGITUDINAL JOINT MAY BE SAWED.

(9) CONCRETE CURB AND GUTTER 4-INCH SLOPED 30-INCH TYPE "R" AND "T" = 17 INCHES
CONCRETE CURB AND GUTTER 4-INCH SLOPED 36-INCH TYPE "R" AND "T" = 23 INCHES

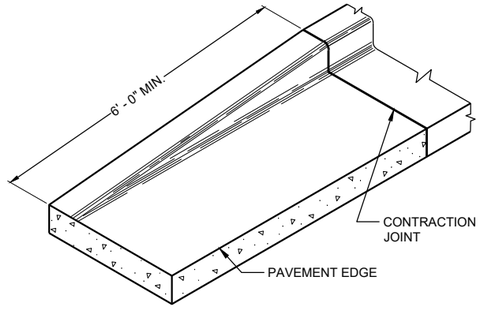
CONCRETE CURB AND GUTTER

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

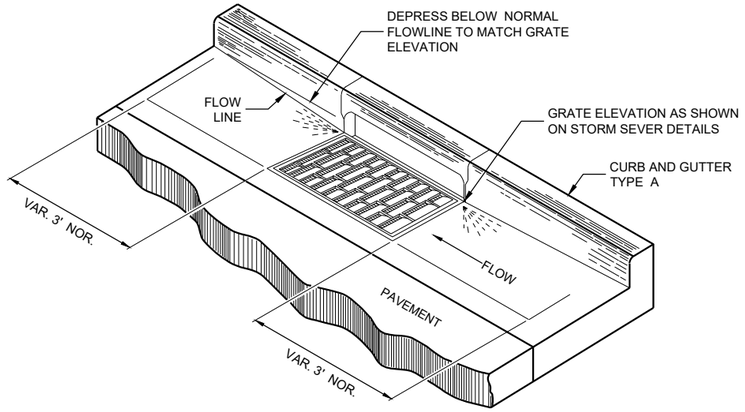
6

SDD 08D01 - 23a

SDD 08D01 - 23a



END SECTIONCURB AND GUTTER



DETAIL OF CURB AND GUTTER AT INLETS

(TYPICAL H INLET COVER SHOWN)

GENERAL NOTES

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

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

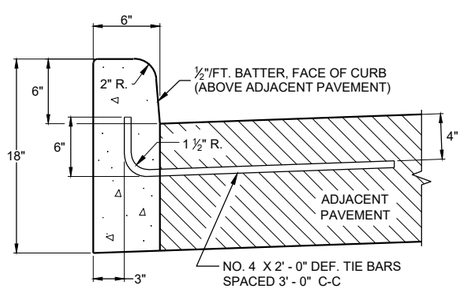
UNLESS OTHERWISE SHOWN ON THE TYPICAL CROSS SECTIONS, THE BASE AGGREGATE AND COMMON EXCAVATION LIMITS ARE 2' - 0" BEHIND THE BACK OF CURBS.

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

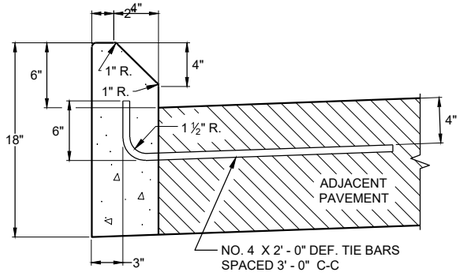
(2) THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 6" MINIMUM GUTTER THICKNESS IS MAINTAINED.

(10) REFER TO SDD 08D18 AND 08D19 FOR ADDITIONAL DRIVEWAY ENTRANCE CURB DETAILS.

(11) PLACE 1" THICK EXPANSION JOINT MATERIAL BETWEEN VERTICAL FACE CURB TYPES EXTENDING FROM THE TOP OF CURB TO 1 INCH BELOW THE ADJOINING CONCRETE SURFACE. RIGID CONCRETE STRUCTURES INCLUDE RAISED CONCRETE MEDIANS, CONCRETE SAFETY ISLANDS, SPLITTER ISLANDS, OR LOCATIONS IDENTIFIED ON THE PLANS.

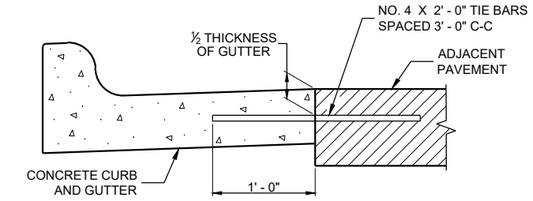


TYPES A(1) & D

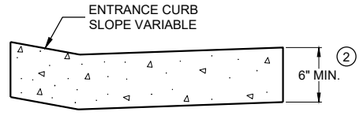


TYPES G(1) & J

CONCRETE CURB

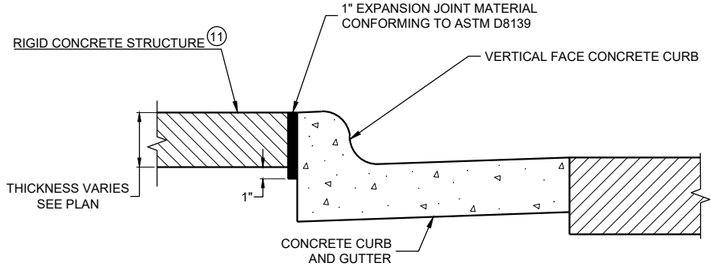


TYPICAL TIE BAR LOCATION (1)

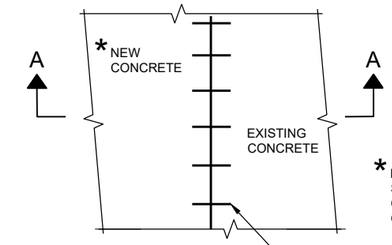


DRIVEWAY ENTRANCE CURB (10)

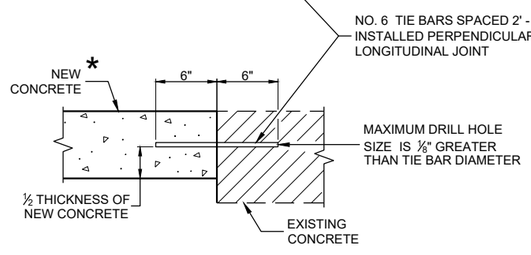
(WHEN DIRECTED BY THE ENGINEER)



EXPANSION JOINT DETAIL FOR VERTICAL CURB ABUTTING A RIGID STRUCTURE (11)



PLAN VIEW



SECTION A - A

TIE BARS DRILLED INTO EXISTING PAVEMENT

CONCRETE CURB, TIES AND CURB AND GUTTER APPLICATIONS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2023 — DATE
/S/ Rodnery Taylor — ROADWAY STANDARDS DEVE ENGINEER

FHWA

6

SDD08D01 - 23b

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.

ALL STEEL REINFORCEMENT SHALL BE EMBEDDED 2 INCHES CLEAR UNLESS OTHERWISE SHOWN OR NOTED.

(1) USE A JOINT SEALANT CONFORMING TO STANDARD SPECIFICATION 415.2.6.

(2) NO. 4 X 2' - 0" TIE BARS SPACED AT 12" C-C TO BE PLACED BY BRIDGE CONTRACTOR OR DRILLED TIE BARS PLACED AS DIRECTED BY THE ENGINEER.

(3) PAVED CONCRETE SHOULDER (SDD 13A03) OR CONCRETE DRAINAGE SLAB.

(4) CONCRETE PAVEMENT APPROACH SLAB (SHOWN) OR STRUCTURE APPROACH SLAB AND CONCRETE PAVEMENT APPROACH SLAB. SEE SDD 13B02.

(5) PAVED CONCRETE SHOULDER (SDD 13A03) OR ASPHALT SHOULDER.

(6) CONCRETE CURB AND GUTTER 4-INCH SLOPED 36-INCH TYPE TBT OR TBTT. USE TYPE TBTT CURB WITH NO. 4 X 2' -0" TIE BARS SPACED AT 3' - 0" C-C ONLY WHEN ADJACENT TO CONCRETE PAVEMENTS.

(7) PLACE FLUME BEFORE MSG THRIE BEAM TRANSITION POST 1 (SEE SDD 14B45)

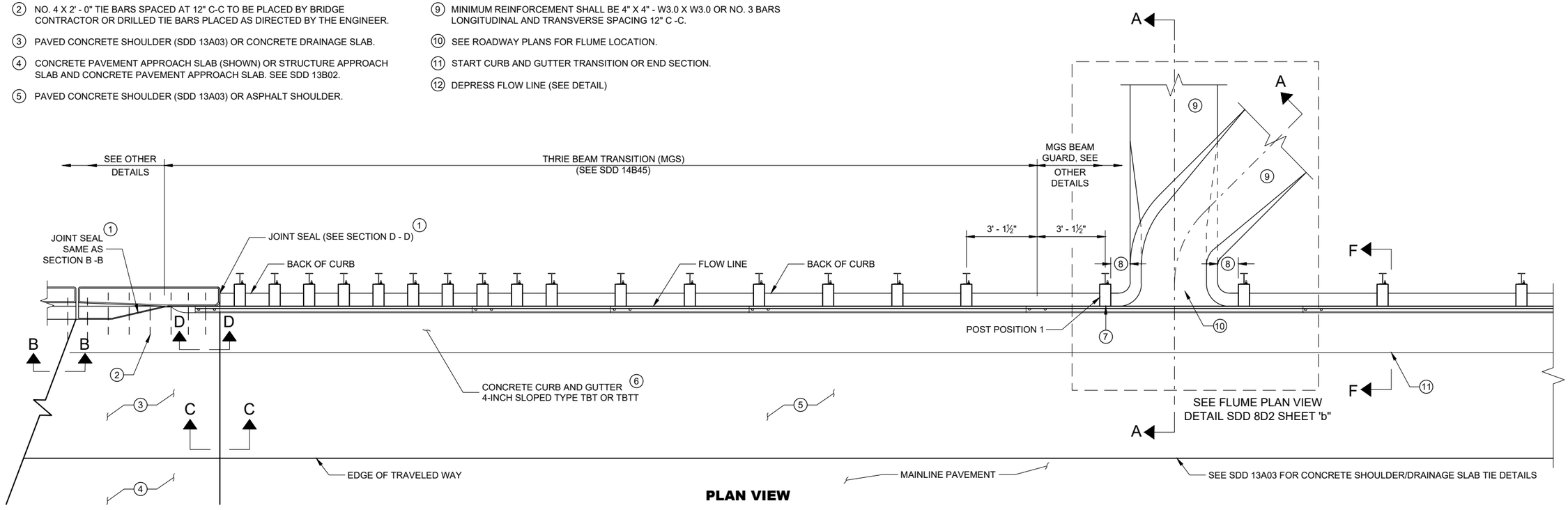
(8) CENTER FLUME BETWEEN POSTS. 6-INCH MINIMUM SEPARATION FROM OUTSIDE EDGE OF FLUME TO POSTS.

(9) MINIMUM REINFORCEMENT SHALL BE 4" X 4" - W3.0 X W3.0 OR NO. 3 BARS LONGITUDINAL AND TRANSVERSE SPACING 12" C -C.

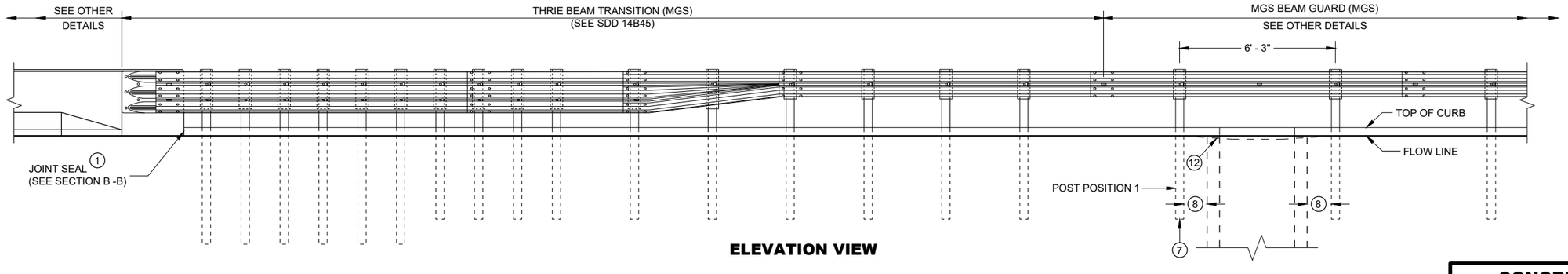
(10) SEE ROADWAY PLANS FOR FLUME LOCATION.

(11) START CURB AND GUTTER TRANSITION OR END SECTION.

(12) DEPRESS FLOW LINE (SEE DETAIL)



PLAN VIEW



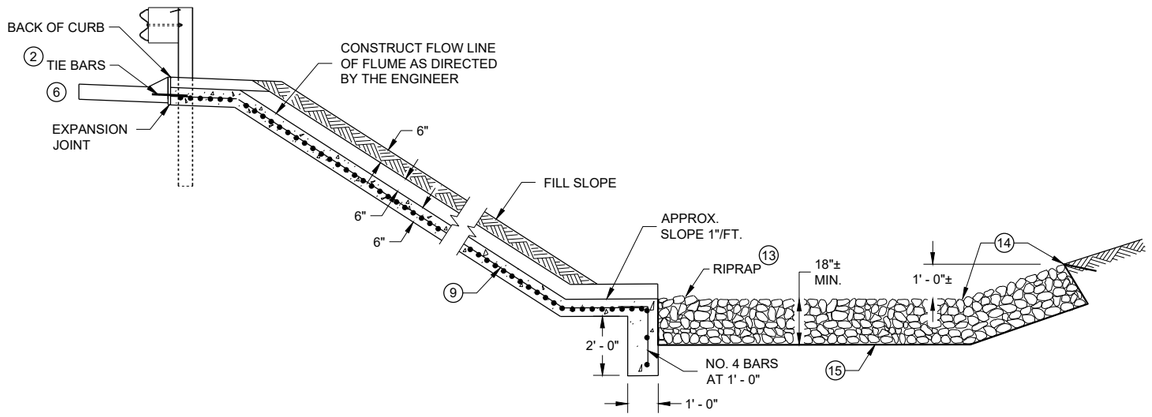
ELEVATION VIEW

CONCRETE SURFACE DRAINS FLUME TYPE AT STRUCTURES

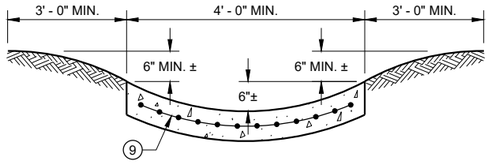
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

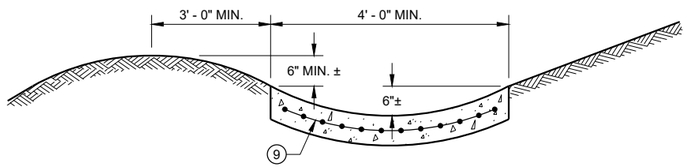
SDD 08D02 - 08a



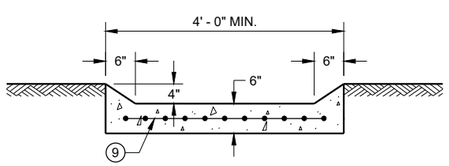
SECTION A - A



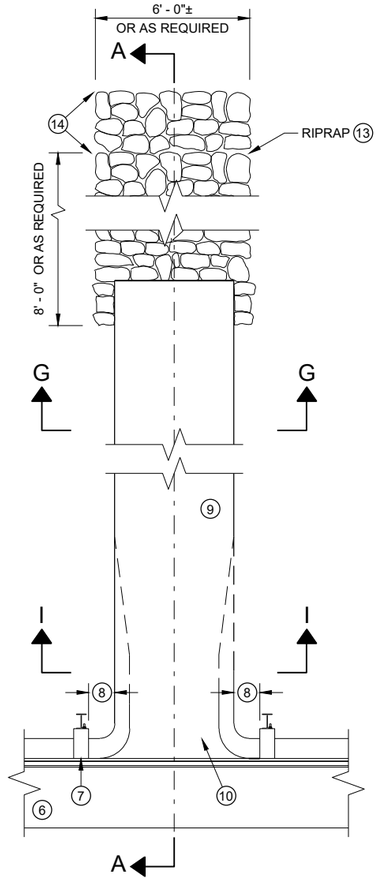
SECTION G - G



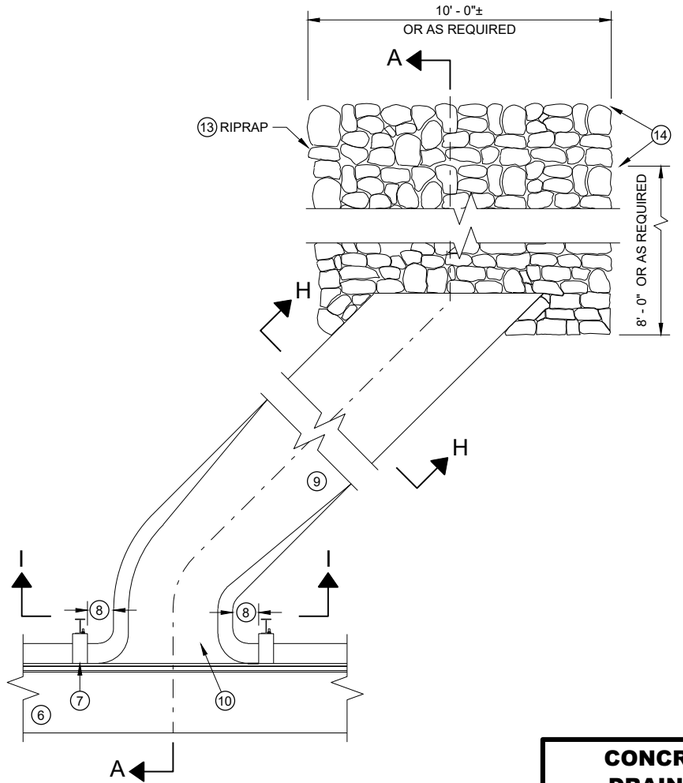
SECTION H - H



SECTION I - I



PLAN VIEW PERPENDICULAR FLUME



PLAN VIEW SKEWED FLUME

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.

ALL STEEL REINFORCEMENT SHALL BE EMBEDDED 2 INCHES CLEAR UNLESS OTHERWISE SHOWN OR NOTED.

(1) USE A JOINT SEALANT CONFORMING TO STANDARD SPECIFICATION 415.2.6.

(2) NO. 4 X 2' - 0" TIE BARS SPACED AT 12" C-C TO BE PLACED BY BRIDGE CONTRACTOR OR DRILLED TIE BARS PLACED AS DIRECTED BY THE ENGINEER.

(3) PAVED CONCRETE SHOULDER (SDD 13A03) OR CONCRETE DRAINAGE SLAB.

(4) CONCRETE PAVEMENT APPROACH SLAB (SHOWN) OR STRUCTURE APPROACH SLAB AND CONCRETE PAVEMENT APPROACH SLAB. SEE SDD 13B02 AND STRUCTURE PLANS.

(5) PAVED CONCRETE SHOULDER (SDD 13A03) OR ASPHALT SHOULDER.

(6) CONCRETE CURB AND GUTTER 4-INCH SLOPED 36-INCH TYPE TBT OR TBTT. USE TYPE TBTT CURB WITH NO. 4 X 2' -0" TIE BARS SPACED AT 3' - 0" C-C ONLY WHEN ADJACENT TO CONCRETE PAVEMENTS.

(7) PLACE FLUME BEFORE MSG THRIE BEAM TRANSITION POST 1 (SEE SDD 14B45)

(8) CENTER FLUME BETWEEN POSTS. 6-INCH MINIMUM SEPARATION FROM OUTSIDE EDGE OF FLUME TO POSTS.

(9) MINIMUM REINFORCEMENT SHALL BE 4" X 4" - W3.0 X W3.0 OR NO. 3 BARS LONGITUDINAL AND TRANSVERSE SPACING 12" C -C.

(10) SEE ROADWAY PLANS FOR FLUME LOCATION.

(11) START CURB AND GUTTER TRANSITION OR END SECTION.

(12) DEPRESS FLOW LINE (SEE DETAIL)

(13) MEDIUM RIPRAP UNLESS OTHERWISE SPECIFIED.

(14) LIMITS OF ADDITIONAL RIPRAP WHEN SPECIAL DITCH AS REQUIRED.

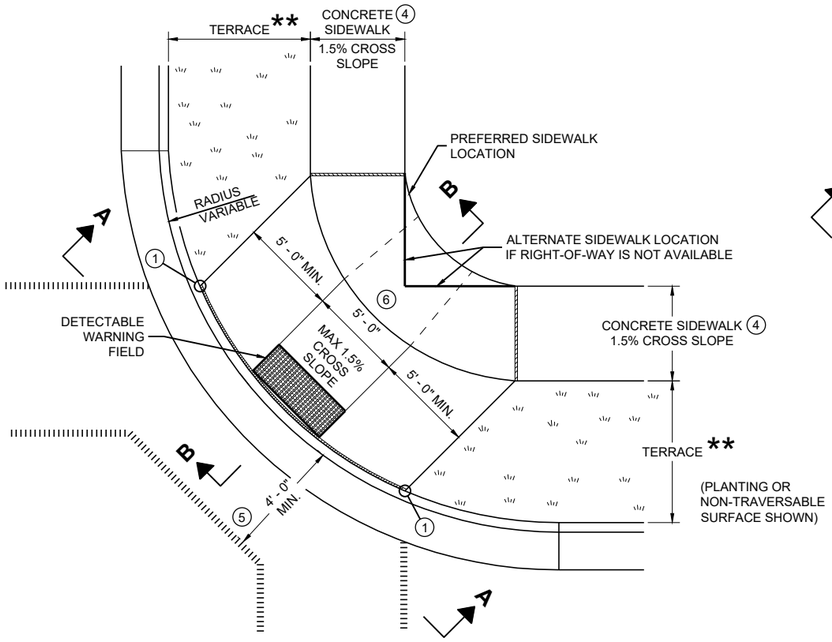
(15) GEOTEXTILE TYPE HR.

6

CONCRETE SURFACE DRAINS FLUME TYPE AT STRUCTURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

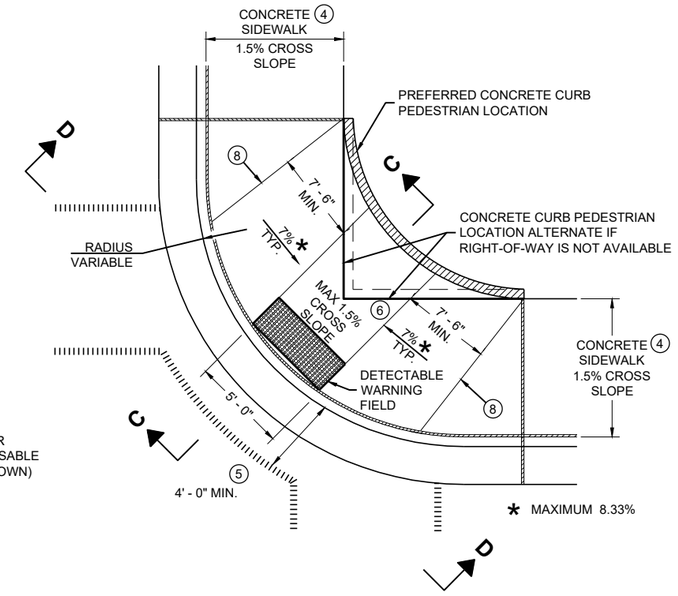
SDD 08D02 - 08b



PLAN VIEW

CURB RAMP TYPE 1

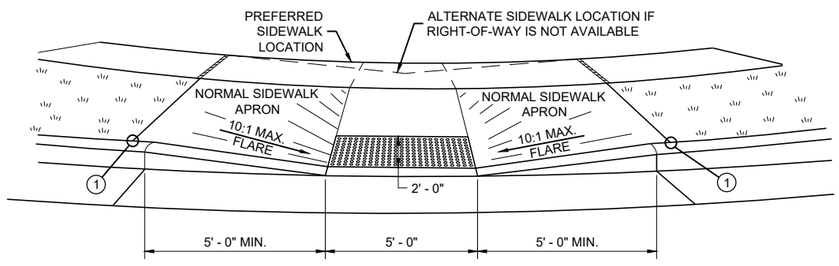
(CENTER OF CORNER RADIUS)



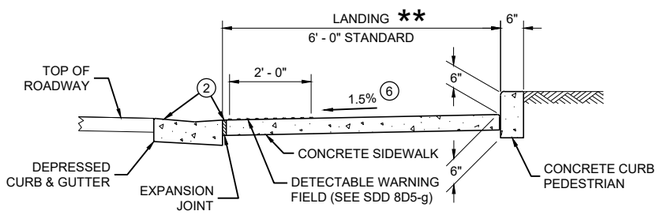
PLAN VIEW

CURB RAMP TYPE 1 - A

(NO TERRACE)

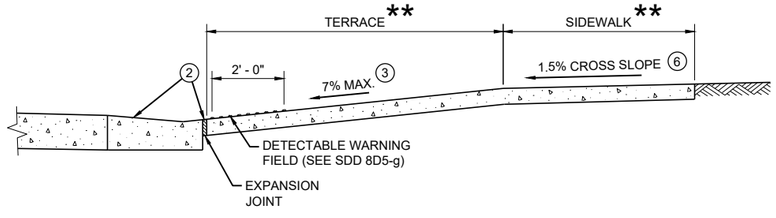


VIEW A - A FOR TYPE 1

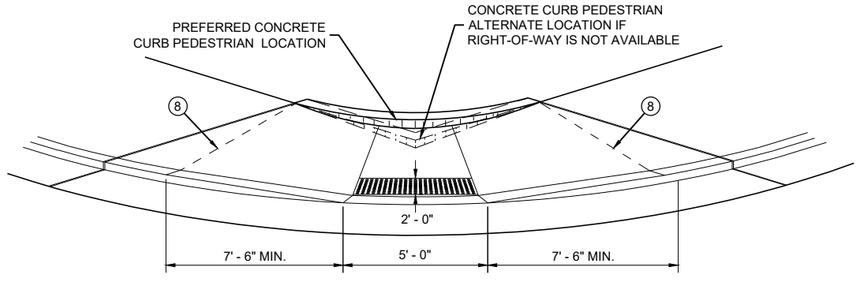


SECTION C - C FOR TYPE 1 - A

** WIDTH SHOWN ELSEWHERE IN THE PLANS



SECTION B - B FOR TYPE 1



VIEW D - D FOR TYPE 1 - A

GENERAL NOTES

AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

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.

WHEN NECESSARY, THE SIDEWALK ELEVATION MAY BE LOWERED TO MEET THE HIGH POINT ON THE RAMP.

TYPE 1 CURB RAMPS SHALL HAVE A NORMAL SIDEWALK APRON AND CURB ON BOTH SIDES OF RAMP.

DETECTABLE WARNING FILED SHALL BE MEASURED AND PAID BY THE SQUARE FOOT AS "CURB RAMP DETECTABLE WARNING FIELD". THE CONCRETE PEDESTRIAN CURB, IF NEEDED, SHALL BE MEASURED AND PAID BY THE LINEAR FOOT AS "CONCRETE CURB PEDESTRIAN". CONCRETE SIDEWALK IN THE CURB RAMP AREA SHALL BE MEASURED AND PAID BY THE SQUARE FOOT AS CONCRETE SIDEWALK, INCLUDING THE AREA UNDER THE DETECTABLE WARNING FIELD.

SELECT CURB RAMP DETECTABLE WARNING FIELD MATERIALS AND DEVICES FROM THE DEPARTMENT'S APPROVED MATERIALS LIST. THE COLOR OF THE DETECTABLE WARNING FIELD IS SPECIFIED ELSEWHERE AND IS INCIDENTAL TO THE BID ITEM OF "CURB RAMP DETECTABLE WARNING FIELD"

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

SURFACE TEXTURE OF THE RAMP SHALL BE OBTAINED BY COARSE BROOMING TRANSVERSE TO THE SLOPE OF THE RAMP.

(1) THIS POINT IS AN EXTENSION OF OUTSIDE EDGE OF APPROACHING SIDEWALK WHERE IT MEETS THE BACK OF CONCRETE CURB. POINT LOCATION MAY BE ADJUSTED TO ALIGN WITH BEGINNING OF FULL-HEIGHT CURB IF THIS DISTANCE IS SHORT.

(2) GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. MAXIMUM GUTTER FLAG SLOPE IS 4%. PROVIDE LONGITUDINAL DRAINAGE AROUND CURB AND AWAY FROM CURB RAMP. NO VERTICAL LIPS OR DISCONTINUITIES GREATER THAN ¼ - INCH ARE ALLOWED. SLOPE OF CURB HEAD OPENING SHALL MATCH THE RAMP SLOPE, MINIMALLY 1.5% AND NOT TO EXCEED 7%. WHEN ADJACENT TO 1.5% LANDING, CONSTRUCT CURB HEAD OPENING AT 1.5% IN THE DIRECTION OF PEDESTRIAN TRAVEL.

(3) MAXIMUM 8.33% CURB RAMP SLOPE IS ALLOWABLE WITH FLATTENED GUTTER FLAG SLOPE AND NOT TO EXCEED 11% GRADE CHANGE.

(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

(5) PROVIDE A LEVEL LANDING IN THE STREET AND GUTTER AREA (2% MAXIMUM SLOPE IN ANY DIRECTION). WHEN THE GUTTER SLOPE EXCEEDS 2%, CONSTRUCT THE LEVEL LANDING IN THE STREET AREA. 4 FOOT WIDTH IS MEASURED FROM THE FLANGE LINE

(6) PROVIDE A LEVEL LANDING (MAXIMUM 2% SLOPE) IN ANY DIRECTION OF PEDESTRIAN TRAVEL. STANDARD LEVEL LANDING SIZE IS 5 FEET BY 5 FEET.

(8) PROVIDE GRADE BREAK PERPENDICULAR TO DIRECTION OF WHEELCHAIR TRAVEL.

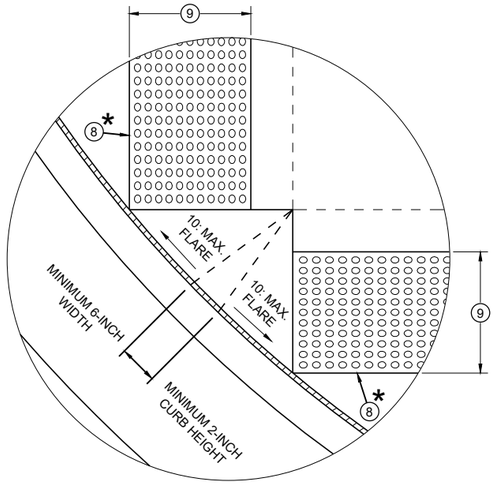
LEGEND

- ½" EXPANSION JOINT SIDEWALK
- CONTRACTION JOINT FIELD LOCATED
- PAVEMENT MARKING CROSSWALK (WHITE)

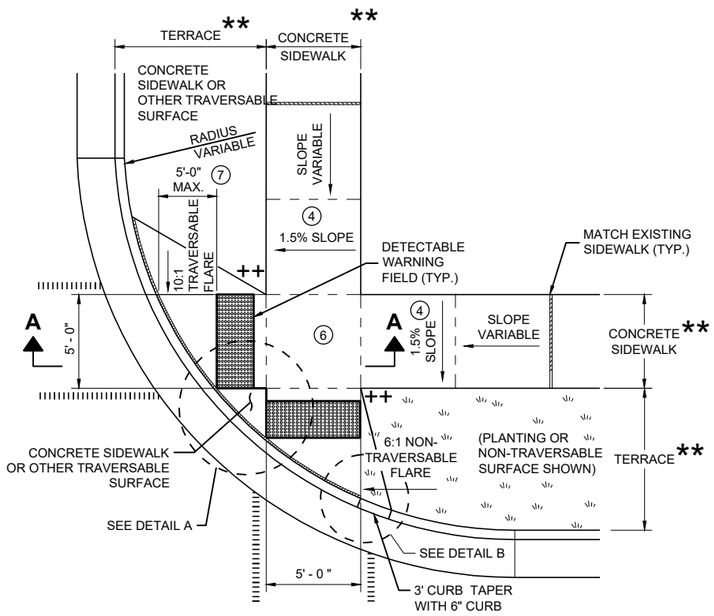
CURB RAMPS TYPE 1 AND 1-A

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6
SDD 08D05-21a



DETAIL A



PLAN VIEW
CURB RAMP TYPE 2
(CENTER OF CORNER RADIUS)

GENERAL NOTES

AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

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.

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE SHALL BE FROM THE SAME MANUFACTURER.

(2) GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. MAXIMUM GUTTER FLAG SLOPE IS 4%. PROVIDE LONGITUDINAL DRAINAGE AROUND CURB AND AWAY FROM CURB RAMP. NO VERTICAL LIPS OR DISCONTINUITIES GREATER THAN ¼ - INCH ARE ALLOWED. SLOPE OF CURB HEAD OPENING SHALL MATCH THE RAMP SLOPE, MINIMALLY 1.5% AND NOT TO EXCEED 7%. WHEN ADJACENT TO 1.5% LANDING, CONSTRUCT CURB HEAD OPENING AT 1.5% IN THE DIRECTION OF PEDESTRIAN TRAVEL.

(3) AN 8.33% CURB RAMP SLOPE IS ALLOWABLE WITH FLATTENED GUTTER FLAG SLOPE (2.67% OR LESS) AND NOT TO EXCEED 11% GRADE CHANGE.

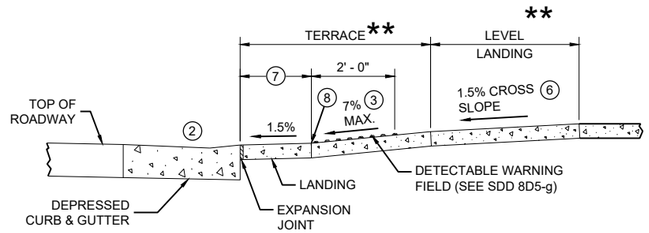
(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

(6) PROVIDE A LEVEL LANDING (MAXIMUM 2% SLOPE) IN ANY DIRECTION OF PEDESTRIAN TRAVEL. STANDARD LEVEL LANDING SIZE IS 5 FEET X 5 FEET.

(7) WHEN GRADE BREAK DISTANCE EXCEEDS 5 FEET, USE RADIAL DETECTABLE WARNING FIELD PER SDD 8D5-f.

(8) PROVIDE GRADE BREAK PERPENDICULAR TO DIRECTION OF WHEELCHAIR TRAVEL.

(9) WHEN DISTANCE IS LESS THAN 6' - 0", IT MAY BE DIFFICULT TO ACHIEVE A 7% SLOPE OR FLATTER ALONG THE RAMP. REDUCE CURB HEIGHT IN TRIANGLE AREA TO ACHIEVE 7% SLOPE OR FLATTER ON RAMP. CONSTRUCT 2-INCH MINIMUM CURB HEIGHT BETWEEN 10:1 FLARES.

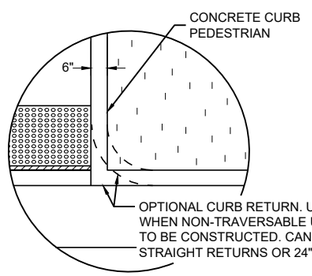


SECTION A - A FOR TYPE 2

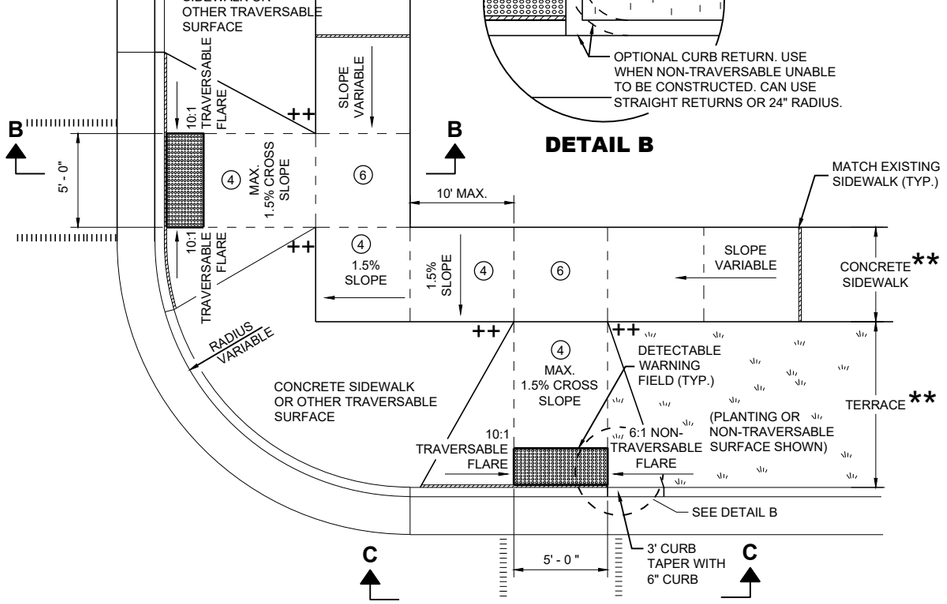
* MAXIMUM 2.0% SLOPE IN ALL DIRECTIONS IN FRONT OF GRADE BREAK

** WIDTH SHOWN ELSEWHERE IN THE PLANS

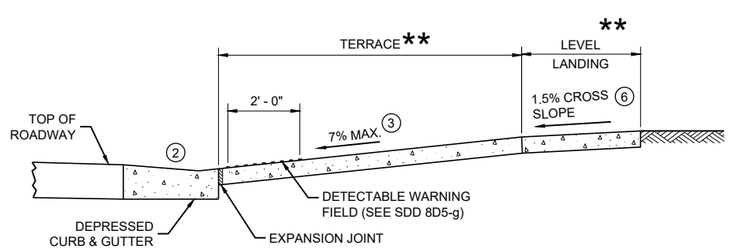
++ CONSTRUCT 6" WEDGE TO AVOID CONCRETE BREAKAGE



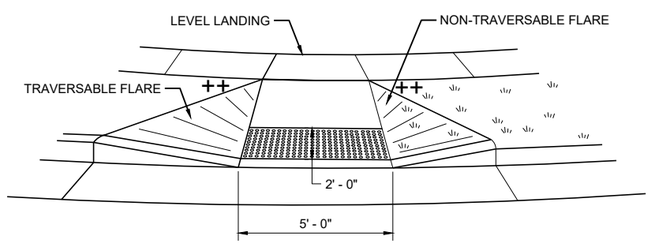
DETAIL B



PLAN VIEW
CURB RAMP TYPE 3
(OUTSIDE OF CROSSWALK AREA)



SECTION B - B FOR TYPE 3



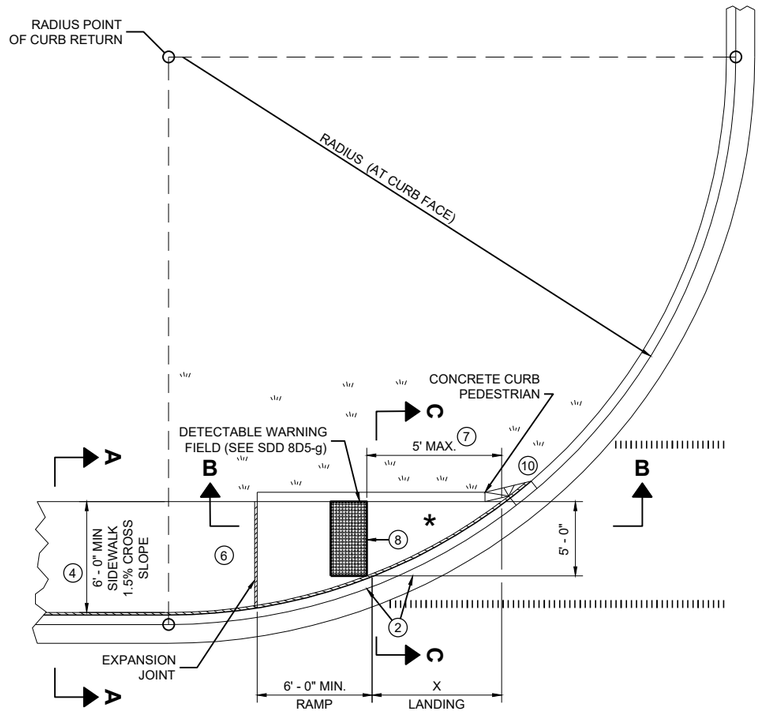
VIEW C - C FOR TYPE 3

LEGEND

- ½" EXPANSION JOINT SIDEWALK
- CONTRACTION JOINT SIDEWALK
- PAVEMENT MARKING CROSSWALK (WHITE)

CURB RAMPS TYPE 2 AND 3

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

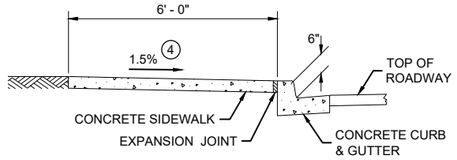


PLAN VIEW

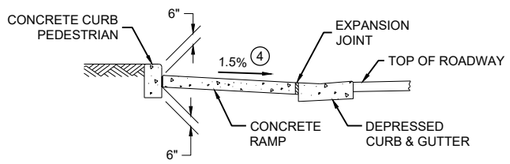
CURB RAMP TYPE 4A

RADIUS (AT CURB FACE)	X
10 FEET	4' - 7"

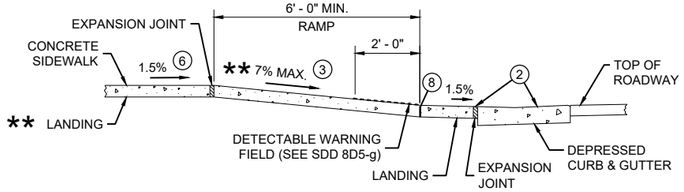
INTERMEDIATE RADII CAN BE INTERPOLATED



SECTION A - A FOR TYPE 4A

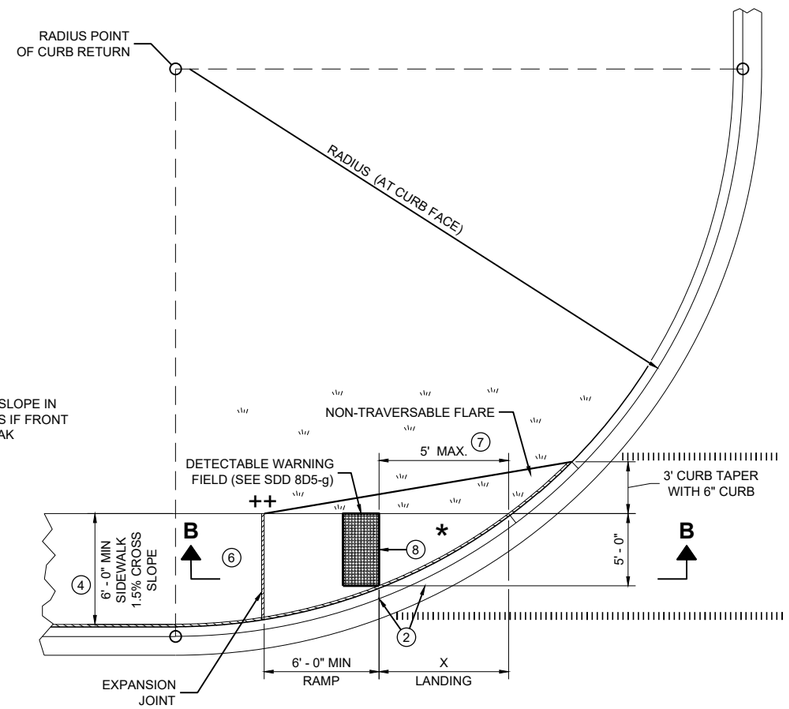


SECTION C - C FOR TYPE 4A



SECTION B - B FOR TYPE 4A AND TYPE 4A1

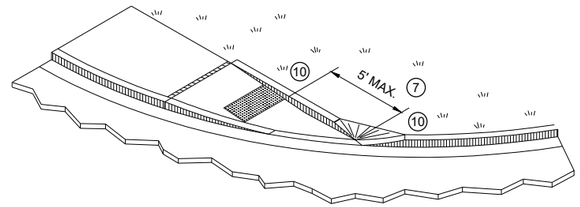
** IF RAMP SLOPE IS LESS THAN 5.0%, THEN NO ADJACENT UPHILL LANDING IS REQUIRED



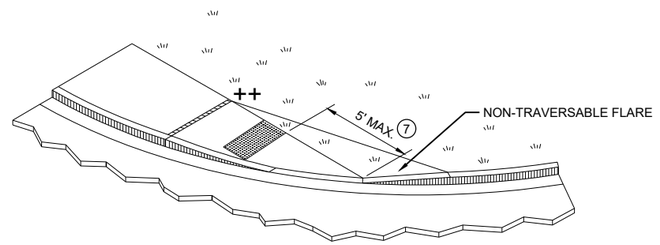
PLAN VIEW

CURB RAMP TYPE 4A1

++ CONSTRUCT 6" WEDGE TO AVOID CONCRETE BREAKAGE



ISOMETRIC VIEW FOR TYPE 4A



ISOMETRIC VIEW FOR TYPE 4A1

GENERAL NOTES

AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

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.

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

(2) GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. MAXIMUM GUTTER FLAG SLOPE IS 4%. PROVIDE LONGITUDINAL DRAINAGE AROUND CURB AND AWAY FROM CURB RAMP. NO VERTICAL LIPS OR DISCONTINUITIES GREATER THAN ¼ - INCH ARE ALLOWED. SLOPE OF CURB HEAD OPENING SHALL MATCH THE RAMP SLOPE, MINIMALLY 1.5% AND NOT TO EXCEED 7%. WHEN ADJACENT TO 1.5% LANDING, CONSTRUCT CURB HEAD OPENING AT 1.5% IN THE DIRECTION OF PEDESTRIAN TRAVEL.

(3) AN 8.33% CURB RAMP SLOPE IS ALLOWABLE WITH FLATTENED GUTTER FLAG SLOPE AND NOT TO EXCEED 11% GRADE CHANGE.

(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

(6) PROVIDE A LEVEL LANDING (MAXIMUM 2% SLOPE) IN ANY DIRECTION OF PEDESTRIAN TRAVEL. STANDARD LEVEL LANDING SIZE IS 5 FEET BY 5 FEET.

(7) WHEN THIS GRADE BREAK DISTANCE EXCEEDS 5 FEET, USE RADIAL DETECTABLE WARNING FIELD PER SDD 8D5-f.

(8) PROVIDE GRADE BREAK PERPENDICULAR TO DIRECTION OF WHEELCHAIR TRAVEL.

(10) INSTALL TRANSITION NOSE (INCIDENTAL TO OTHER PAY ITEMS). DO NOT MARK TRANSITION NOSE.

LEGEND

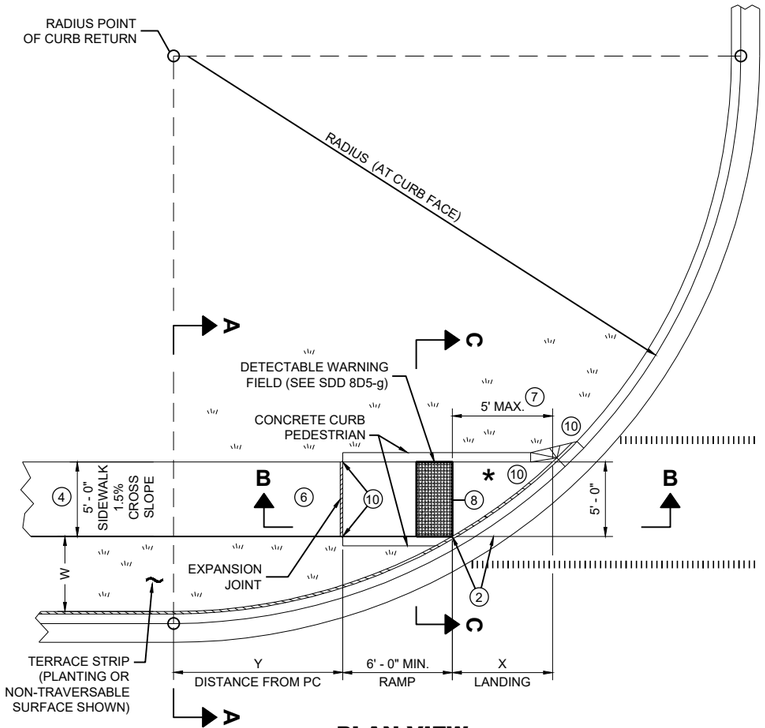
½" EXPANSION JOINT SIDEWALK

CONTRACTION JOINT SIDEWALK

PAVEMENT MARKING CROSSWALK (WHITE)

CURB RAMPS
TYPE 4A AND 4A1

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION



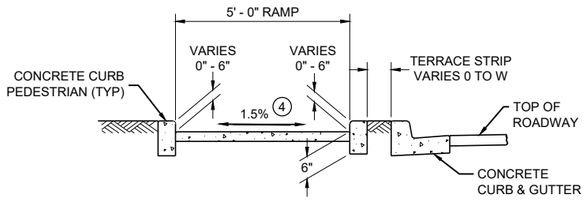
PLAN VIEW
CURB RAMP TYPE 4B

RADIUS (AT CURB FACE)	W = 3' - 0"		W = 4' - 0"		W = 5' - 0"		W = 6' - 0"		W = 7' - 0"		W = 8' - 0"		W = 9' - 0"		W = 10' - 0"	
	X	Y	X	Y	X	Y	X	Y	X	Y	X	Y	X	Y	X	Y
10 FEET	2' - 10 1/4"	0' - 5"	2' - 1"	1' - 4 1/2"	1' - 5"	2' - 1"	0' - 10"	2' - 7 1/2"	0' - 3 1/4"	3' - 0 1/4"						
15 FEET	4' - 6 3/4"	2' - 1 3/4"	3' - 9"	3' - 5 3/4"	3' - 1 1/4"	4' - 6"	2' - 6 3/4"	5' - 4 1/2"	2' - 1"	6' - 1"	1' - 8"	6' - 8 1/2"	1' - 3 1/4"	7' - 2 1/2"	0' - 10 3/4"	7' - 7 1/4"
20 FEET			4' - 11 1/2"	5' - 1 3/4"	4' - 3 1/4"	6' - 5 1/2"	3' - 8 3/4"	7' - 7"	3' - 3"	8' - 6 1/2"	2' - 10"	9' - 4 1/2"	2' - 5 1/2"	10' - 1 1/4"	2' - 1 1/4"	10' - 9"
30 FEET									4' - 10 3/4"	12' - 5 3/4"	4' - 5 1/2"	13' - 7 3/4"	4' - 0 3/4"	14' - 8 1/2"	3' - 8 1/2"	15' - 8 1/4"
40 FEET															4' - 10 3/4"	19' - 8 1/4"

INTERMEDIATE RADII CAN BE INTERPOLATED
DIMENSION "Y" IS CALCULATED BASED ON 6'-0" RAMP LENGTH
DIMENSION "X" IS CALCULATED BASED ON 5'-0" SIDEWALK WIDTH

LEGEND

- ½" EXPANSION JOINT SIDEWALK
- CONTRACTION JOINT SIDEWALK
- PAVEMENT MARKING CROSSWALK (WHITE)



SECTION C - C FOR TYPE 4B

GENERAL NOTES

AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

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.

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

(2) GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. MAXIMUM GUTTER FLAG SLOPE IS 4%. PROVIDE LONGITUDINAL DRAINAGE AROUND CURB AND AWAY FROM CURB RAMP. NO VERTICAL LIPS OR DISCONTINUITIES GREATER THAN ¼ - INCH ARE ALLOWED. SLOPE OF CURB HEAD OPENING SHALL MATCH THE RAMP SLOPE, MINIMALLY 1.5% AND NOT TO EXCEED 7%. WHEN ADJACENT TO 1.5% LANDING, CONSTRUCT CURB HEAD OPENING AT 1.5% IN THE DIRECTION OF PEDESTRIAN TRAVEL.

(3) AN 8.33% CURB RAMP SLOPE IS ALLOWABLE WITH FLATTENED GUTTER FLAG SLOPE AND NOT TO EXCEED 11% GRADE CHANGE.

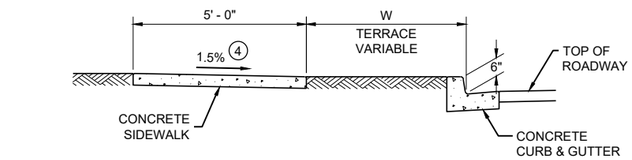
(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

(6) PROVIDE A LEVEL LANDING (MAXIMUM 2% SLOPE) IN ANY DIRECTION OF PEDESTRIAN TRAVEL. STANDARD LEVEL LANDING SIZE IS 5 FEET BY 5 FEET.

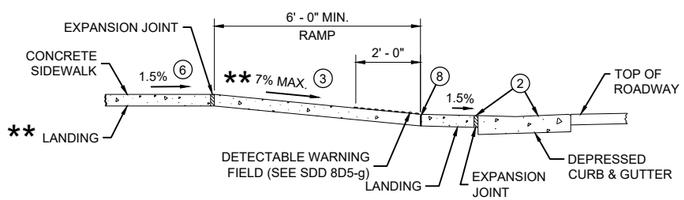
(7) WHEN THIS GRADE BREAK DISTANCE EXCEEDS 5 FEET, USE RADIAL DETECTABLE WARNING FIELD PER SDD 8D5-f.

(8) PROVIDE GRADE BREAK PERPENDICULAR TO DIRECTION OF WHEELCHAIR TRAVEL.

(10) INSTALL TRANSITION NOSE (INCIDENTAL TO OTHER PAY ITEMS). DO NOT MARK TRANSITION NOSE.

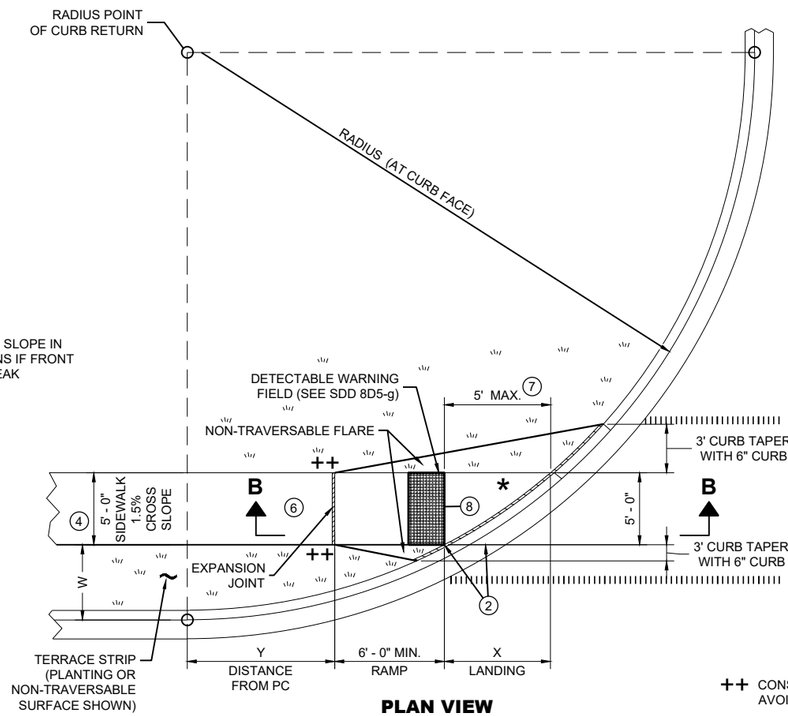


SECTION A - A FOR TYPE 4B



SECTION B - B FOR TYPE 4B AND TYPE 4B1

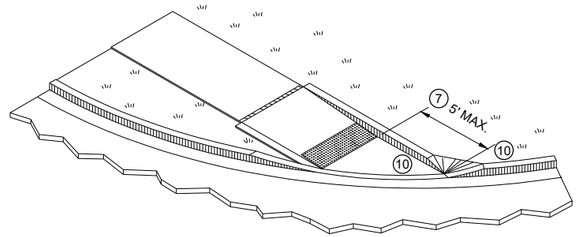
** IF RAMP SLOPE IS LESS THAN 5.0%, THEN NO ADJACENT UPHILL LANDING IS REQUIRED



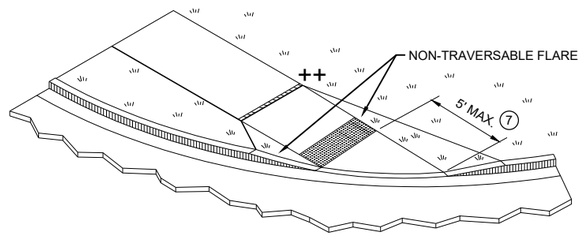
PLAN VIEW
CURB RAMP TYPE 4B1

* MAXIMUM 2.0% SLOPE IN ALL DIRECTIONS IF FRONT OF GRADE BREAK

++ CONSTRUCT 6" WEDGE TO AVOID CONCRETE BREAKAGE



ISOMETRIC VIEW FOR TYPE 4B



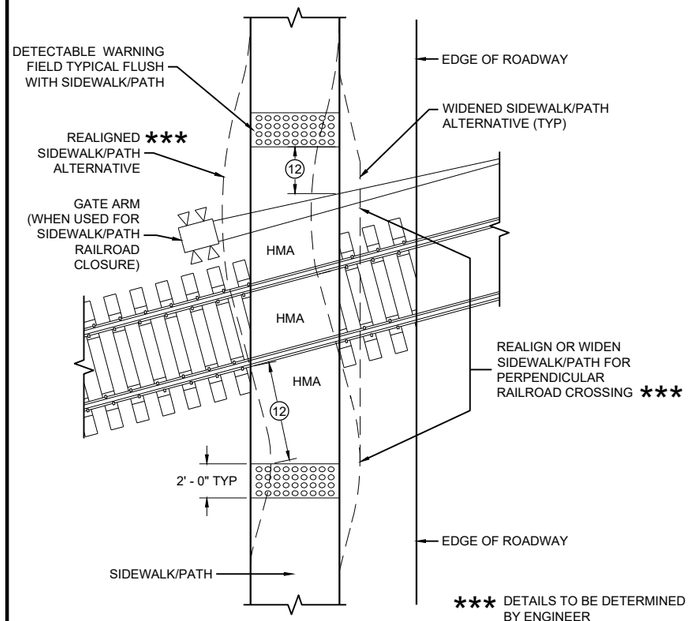
ISOMETRIC VIEW FOR TYPE 4B1

CURB RAMPS
TYPE 4B AND 4B1

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

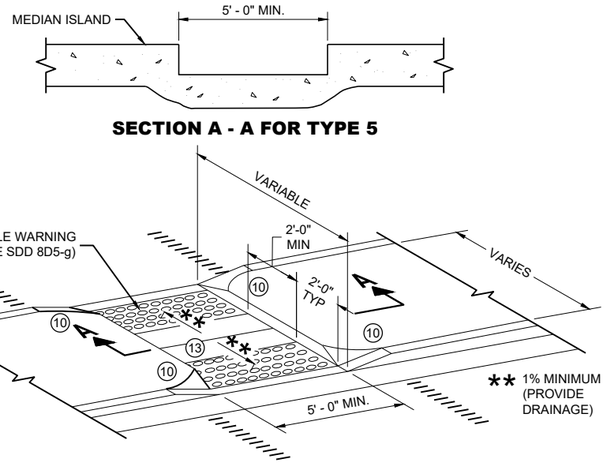
6

SDD 08D05-21d



CURB RAMP TYPE 8

DETECTABLE WARNINGS FOR SIDEWALKS OR SHARED USE PATHS AT RAILROAD CROSSINGS



SECTION A - A FOR TYPE 5

CURB RAMP TYPE 5

MEDIAN ISLAND NON-ELEVATED PEDESTRIAN CROSSING

GENERAL NOTES

AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

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.

SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2%.

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

(2) GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. MAXIMUM GUTTER FLAG SLOPE IS 4%. PROVIDE LONGITUDINAL DRAINAGE AROUND CURB AND AWAY FROM CURB RAMP. NO VERTICAL LIPS OR DISCONTINUITIES GREATER THAN ¼ - INCH ARE ALLOWED. SLOPE OF CURB HEAD OPENING SHALL MATCH THE RAMP SLOPE, MINIMALLY 1.5% AND NOT TO EXCEED 7%. WHEN ADJACENT TO 1.5% LANDING, CONSTRUCT CURB HEAD OPENING AT 1.5% IN THE DIRECTION OF PEDESTRIAN TRAVEL.

(3) AN 8.33% CURB RAMP SLOPE IS ALLOWABLE WITH FLATTENED GUTTER FLAG SLOPE AND NOT TO EXCEED 11% GRADE CHANGE.

(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

(6) PROVIDE A LEVEL LANDING (MAXIMUM 2% SLOPE) IN ANY DIRECTION OF PEDESTRIAN TRAVEL. STANDARD LEVEL LANDING SIZE IS 5 FEET BY 5 FEET.

(10) INSTALL TRANSITION NOSE (INCIDENTAL TO OTHER PAY ITEMS). DO NOT MARK TRANSITION NOSE.

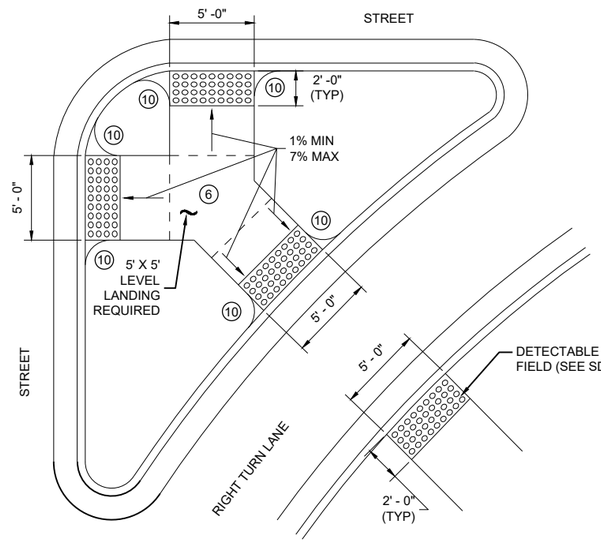
(11) SLOPE SIDEWALK TOWARD LANDING AS SHOWN WHERE THERE IS NO TERRACE OR WHERE THE TERRACE WIDTH IS LESS THAN 6 FEET WIDE.

(12) THE EDGE OF THE DETECTABLE WARNING FIELD NEAREST TO A RAILROAD CROSSING SHALL BE 1.5 FEET ±0.1' FROM THE FACE OF THE GATE ARM IF THE GATE ARM EXTENDS ACROSS THE SIDEWALK/PATH. WHERE THERE IS NO PEDESTRIAN GATE, THE EDGE OF THE DETECTABLE WARNING FIELD NEAREST TO THE RAILROAD TRACK IS 15 FEET MAXIMUM AND 12 FEET MINIMUM, 15 FEET TYPICAL FROM THE NEAREST RAIL.

(13) DO NOT INSTALL DETECTABLE WARNING FIELDS AT THE EDGES OF STEET-LEVEL PEDESTRIAN REFUGE ISLANDS IF A MINIMUM 2 FOOT CONCRETE SURFACE WITHOUT DETECTABLE WARNINGS (MEASURED IN THE DIRECTION OF PEDESTRIAN TRAVEL) CANNOT BE ACHIEVED.

LEGEND

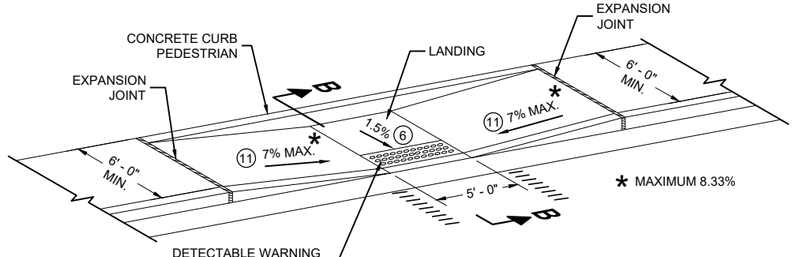
- ½" EXPANSION JOINT SIDEWALK
- CONTRACTION JOINT FIELD LOCATED
- PAVEMENT MARKING CROSSWALK (WHITE)



CURB RAMP TYPE 6

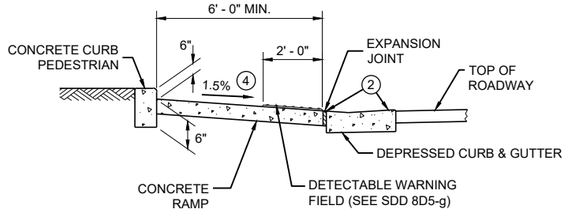
DETECTABLE WARNING AT ISLANDS

REFER TO GENERAL NOTES (2) AND (3) FOR ALL ISLAND CURB RAMPS

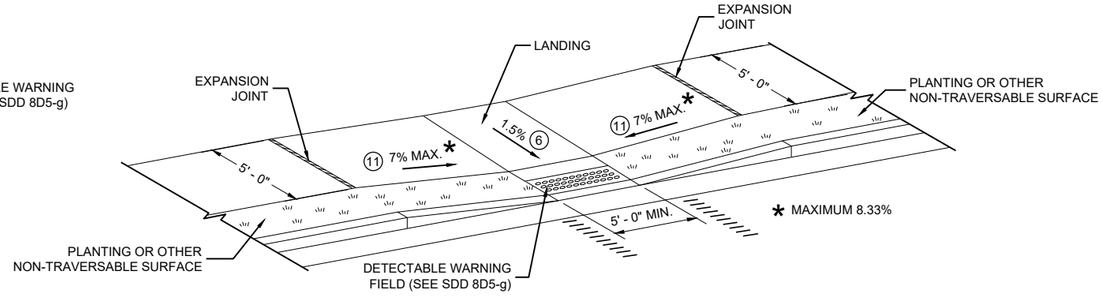


CURB RAMP TYPE 7A

FOR INTERSECTIONS AND MID BLOCK CROSSINGS



SECTION B - B FOR TYPE 7A



CURB RAMP TYPE 7B

FOR INTERSECTIONS AND MID BLOCK CROSSINGS

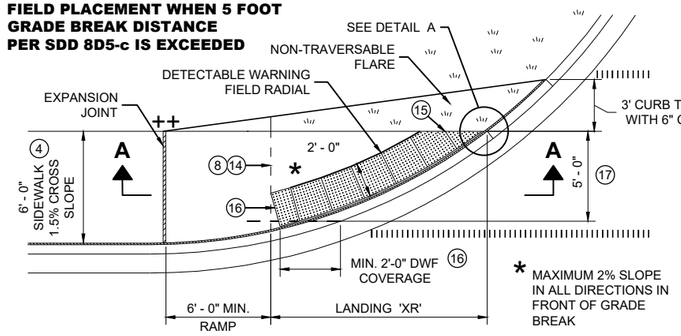
CURB RAMPS TYPE 5, 6, 7A, 7B & 8

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

SDD 08D05-21e

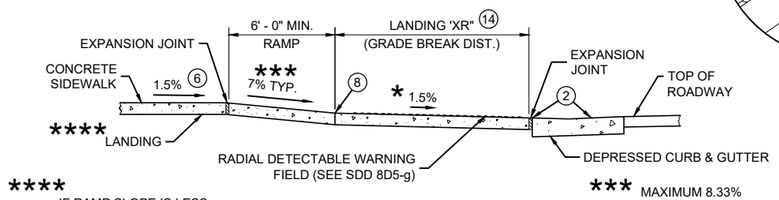
6

RADIAL DETECTABLE WARNING FIELD PLACEMENT WHEN 5 FOOT GRADE BREAK DISTANCE PER SDD 8D5-c IS EXCEEDED



PLAN VIEW

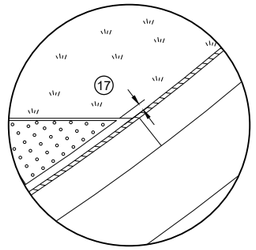
CURB RAMP TYPE 4A1
(GRADE BREAK DISTANCE GREATER THAN 5 FEET)



**** IF RAMP SLOPE IS LESS THAN 5.0%, THEN NO ADJACENT UPHILL LANDING IS REQUIRED

*** MAXIMUM 8.33%

SECTION A - A FOR TYPE 4A1



DETAIL A

LEGEND

- ½" EXPANSION JOINT SIDEWALK
- CONTRACTION JOINT SIDEWALK
- PAVEMENT MARKING CROSSWALK (WHITE)

GENERAL NOTES

AVOID PLACING DRAINAGE STRUCTURES, JUNCTION BOXES OR OTHER OBSTRUCTIONS IN FRONT OF RAMP ACCESS AREAS.

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.

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AS A GROUP OR SIDE BY SIDE, SHALL BE FROM THE SAME MANUFACTURER.

APPLY RADIAL DETECTABLE WARNING PLACEMENT SIMILARLY FOR TYPE 4A AND 4A1 CURB RAMPS AND SIMILARLY FOR TYPE 4B AND 4B1 CURB RAMPS. TYPE 4A AND 4B CURB RAMPS ARE NOT SHOWN.

REFER TO SDD 8D5-g FOR ADDITIONAL RADIAL PLATE REQUIREMENTS.

FIELD CUTS AT INTERMEDIATE JOINTS WITHIN THE RADIAL DETECTABLE WARNING FILED ARE PROHIBITED.

DETERMINE FINAL RADIAL WARNING FIELD CONFIGURATION AD ITS INDIVIDUAL PLATE LOCATIONS. PERFORM PRE-LAYOUT PRIOR TO PLACEMENT IN PLASTIC CONCRETE. FOLLOW MANUFACTURER'S PRODUCT LIST AND INSTALLATION RECOMMENDATIONS.

(2) GRADE CHANGE BETWEEN GUTTER FLAG SLOPE AND THE CURB RAMP SLOPE SHALL NOT EXCEED 11%. MAXIMUM GUTTER FLAG SLOPE IS 4%. PROVIDE LONGITUDINAL DRAINAGE AROUND CURB AND AWAY FROM CURB RAMP. NO VERTICAL LIPS OR DISCONTINUITIES GREATER THAN ¼ - INCH ARE ALLOWED. SLOPE OF CURB HEAD OPENING SHALL MATCH THE RAMP SLOPE, MINIMALLY 1.5% AND NOT TO EXCEED 7%. WHEN ADJACENT TO 1.5% LANDING, CONSTRUCT CURB HEAD OPENING AT 1.5% IN THE DIRECTION OF PEDESTRIAN TRAVEL.

(3) AN 8.33% CURB RAMP SLOPE IS ALLOWABLE WITH FLATTENED GUTTER FLAG SLOPE AND NOT TO EXCEED 11% GRADE CHANGE.

(4) ±0.5% CONSTRUCTION TOLERANCE IN SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2% WITHOUT PRIOR APPROVAL FROM THE ENGINEER.

(6) PROVIDE A LEVEL LANDING (MAXIMUM 2% SLOPE) IN ANY DIRECTION OF PEDESTRIAN TRAVEL. STANDARD LANDING SIZE IS 5 FEET BY 5 FEET.

(8) PROVIDE GRADE BREAK PERPENDICULAR TO DIRECTION OF WHEELCHAIR TRAVEL.

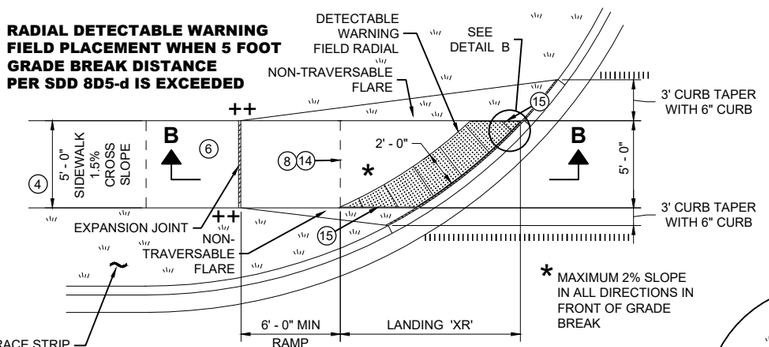
(14) CONSULT ENGINEER IF GRADE BREAK LOCATION (END OF LANDING DIMENSION "XR") REQUIRES FIELD ADJUSTMENT WHEN ESTABLISHING FINAL RADIAL DETECTABLE WARNING FIELD LOCATION.

(15) FIELD SAW CUTS ALONG RADIAL DETECTABLE WARNING PLATES WILL BE NECESSARY TO MATCH EACH CURB RAMP EDGE. AVOID CUTTING THROUGH DOMES WHENEVER POSSIBLE. MAKE FIELD CUTS TRUE TO LINE AND WITHIN ⅛" DEVIATION. SMOOTH EDGES OF FIELD CUT PLATES.

(16) USE 1' X 2" RECTANGULAR END PLATE AT END OF TYPE 4A1 RAMP AND PROVIDE MINIMUM 2' - 0" DETECTABLE WARNING FIELD COVERAGE (IN DIRECTION OF PEDESTRIAN TRAVEL) ALONG THE ENTIRE CURB RAMP WIDTH.

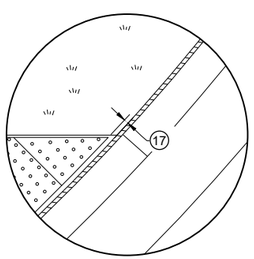
(17) A MAXIMUM 3 INCH CONCRETE BORDER WIDTH IS ALLOWABLE IN FRONT OF RADIAL DETECTABLE WARNING FIELD FOR CONSTRUCTABILITY PURPOSES. CONCRETE BORDER WIDTH MAY VARY UP TO 1 INCH.

RADIAL DETECTABLE WARNING FIELD PLACEMENT WHEN 5 FOOT GRADE BREAK DISTANCE PER SDD 8D5-d IS EXCEEDED

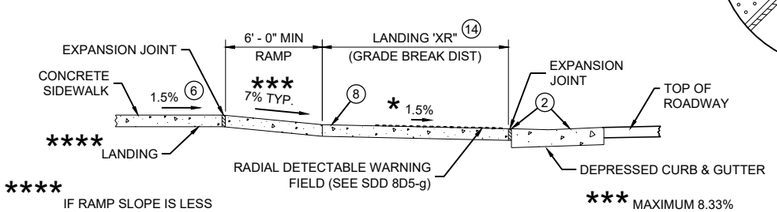


PLAN VIEW

CURB RAMP TYPE 4B1
(GRADE BREAK DISTANCE GREATER THAN 5 FEET)



DETAIL B

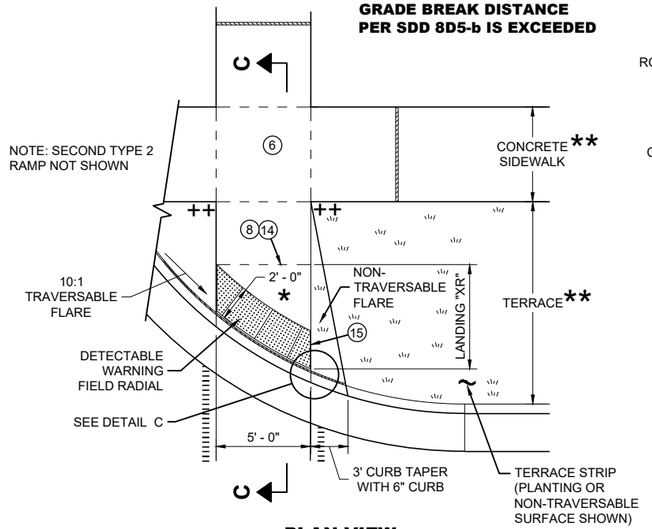


**** IF RAMP SLOPE IS LESS THAN 5.0%, THEN NO ADJACENT UPHILL LANDING IS REQUIRED

*** MAXIMUM 8.33%

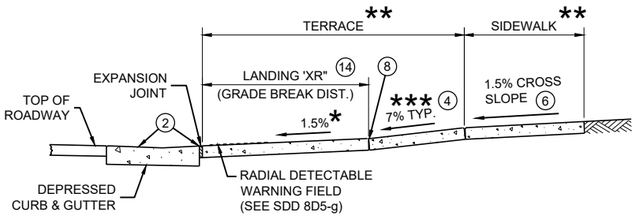
SECTION B - B FOR TYPE 4B1

RADIAL DETECTABLE WARNING FIELD PLACEMENT WHEN 5 FOOT GRADE BREAK DISTANCE PER SDD 8D5-b IS EXCEEDED

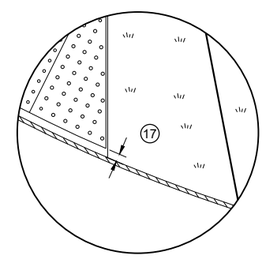


PLAN VIEW

CURB RAMP TYPE 2
(GRADE BREAK DISTANCE GREATER THAN 5 FEET)
(ON LINE WITH SIDEWALK)



SECTION C - C FOR TYPE 2



DETAIL C

* MAXIMUM 2% SLOPE IN ALL DIRECTIONS IN FRONT OF GRADE BREAK

** WIDTH SHOWN ELSEWHERE IN THE PLANS

*** MAXIMUM 8.33%

++ CONSTRUCT 6" WEDGE TO AVOID CONCRETE BREAKAGE

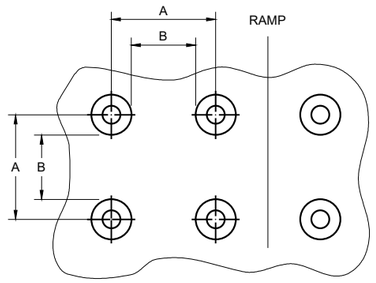
CURB RAMPS
RADIAL DETECTABLE WARNING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

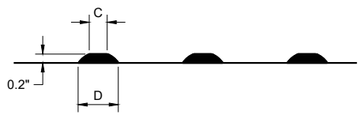
SDD 08D05-21f

	MIN.	MAX.
A	1.6"	2.4"
B	0.65"	1.5"
C	*	*
D	0.9"	1.4"

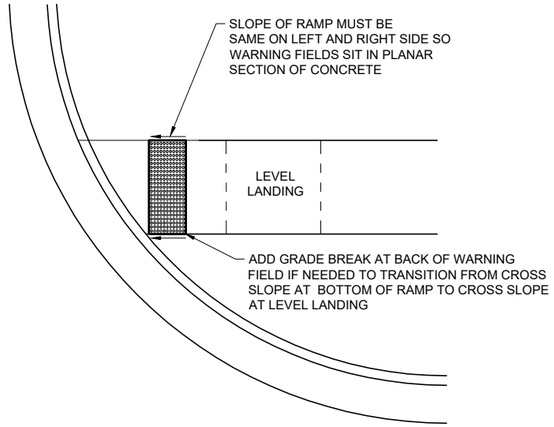
* THE C DIMENSION IS 50% TO 65% OF THE D DIMENSION.



PLAN VIEW



ELEVATION VIEW



DETECTABLE WARNING FIELD
PLANAR INSTALLATION

GENERAL NOTES

DETECTABLE WARNING FIELDS THAT ARE INSTALLED AT A CURB RAMP SHALL BE FROM THE SAME MANUFACTURER.

PLACE ALL DETECTABLE WARNING FIELD SYSTEMS IN ACCORDANCE TO THE MANUFACTURER'S RECOMMENDATION.

FIELD CUTS AT INTERMEDIATE JOINTS WITHIN THE RADIAL DETECTABLE WARNING FILED ARE PROHIBITED.

DETERMINE FINAL RADIAL WARNING FIELD CONFIGURATION AND ITS INDIVIDUAL PLATE LOCATIONS. PERFORM PRE-LAYOUT PRIOR TO PLACEMENT IN PLASTIC CONCRETE. FOLLOW MANUFACTURER'S PRODUCT LIST AND INSTALLATION RECOMMENDATIONS.

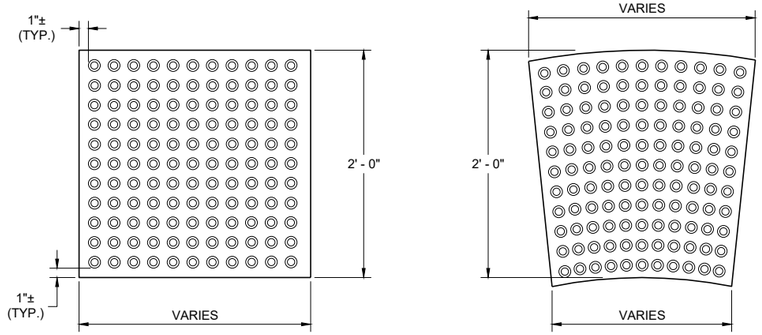
FOR RADIAL DETECTABLE WARNING FIELD APPLICATIONS WHERE STANDARD RADIAL PLATES ARE NOT AVAILABLE AT AN INTERSECTION CURB RADIUS, A COMBINATION OF SQUARE OR RECTANGULAR PLATES AND RADIAL PLATES MAY BE USED TO FORM RADIAL CONFIGURATION. RADIAL WEDGE PLATES IN COMBINATION WITH SQUARE PLATES ARE ALSO ACCEPTABLE. FOLLOW MANUFACTURER'S RECOMMENDATIONS.

REFER TO CONTRACT AND STANDARD SPECIFICATIONS FOR FIELD CUTTING REQUIREMENTS.

DO NOT EMBED IN CONCRETE ANY FIELD-CUT PLATES WITH CUT EDGES SHORTER THAN 6 INCHES. CONSULT WITH MANUFACTURER FOR RE-DRILLING AND ANCHORING REQUIREMENTS OF FIELD-CUT PLATES.

(15) FIELD SAW CUTS ALONG RADIAL DETECTABLE WARNING PLATES WILL BE NECESSARY TO MATCH EACH CURB RAMP EDGE. AVOID CUTTING THROUGH DOMES WHENEVER POSSIBLE. MAKE FIELD CUTS TRUE TO LINE AND WITHIN ⅛" DEVIATION. SMOOTH EDGES OF FIELD CUT PLATES.

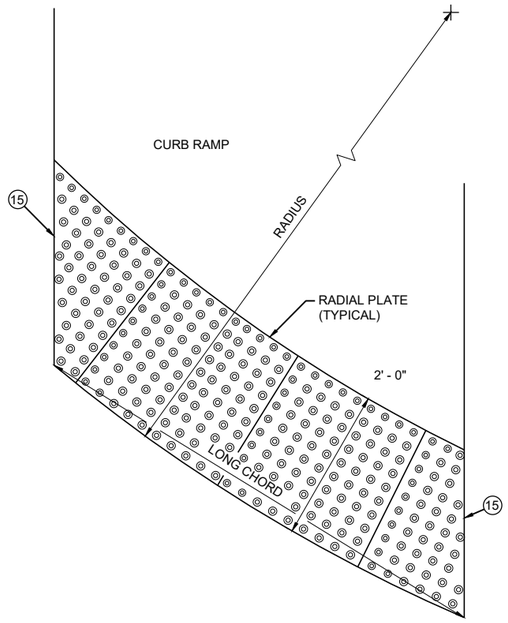
TRUNCATED DOMES
DETECTABLE WARNING PATTERN DETAIL



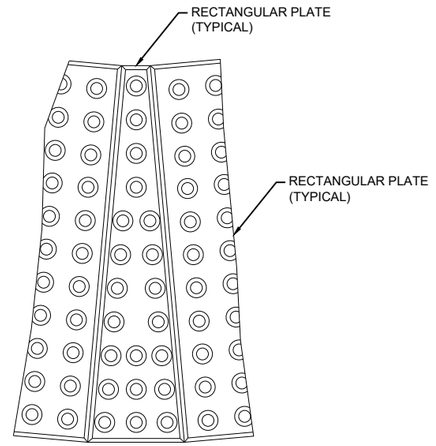
RECTANGULAR PLATES

RADIAL PLATES

PLAN VIEW
DETECTABLE WARNING FIELDS (TYPICAL)



PLAN VIEW
RADIAL DETECTABLE WARNING FIELD ATTRIBUTES



PLAN VIEW
RADIAL WEDGE PLATE CONNECTION DETAIL

CURB RAMPS
RECTANGULAR AND RADIAL DETECTABLE WARNING PLATES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

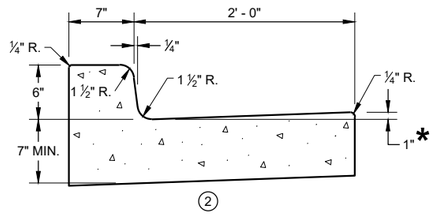
July 2023 — DATE

/S/ Rodney Taylor — ROADWAY STANDARDS DEVELOPMENT UNIT SUPERVISOR

FHWA

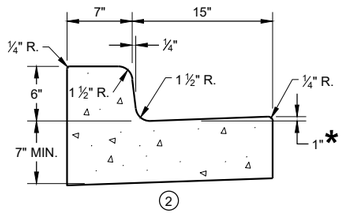
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SDD 08D05-21g

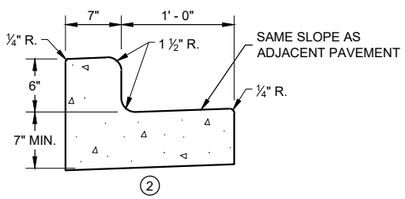


CONCRETE CURB AND GUTTER 31" ①

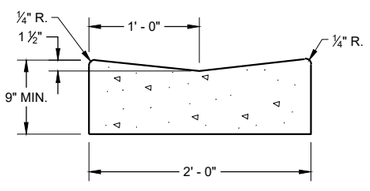
*TO BE MEASURED TO A MAXIMUM OF 3" WHERE DRAINAGE PROBLEMS EXIST.



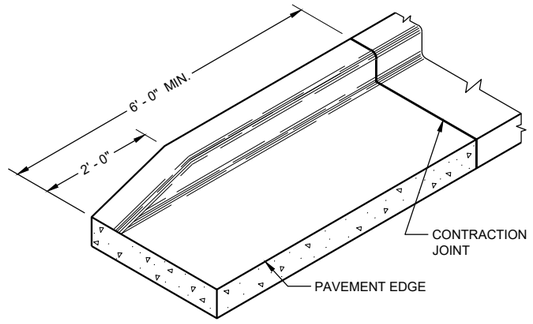
CONCRETE CURB AND GUTTER 22" ①



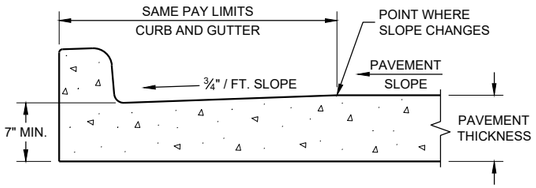
CONCRETE CURB AND GUTTER 19" ①



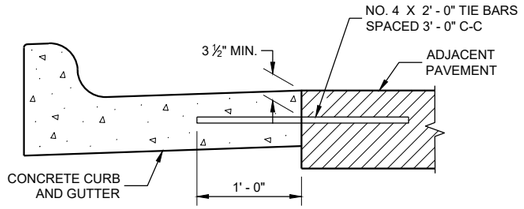
CONCRETE GUTTER 24" ①



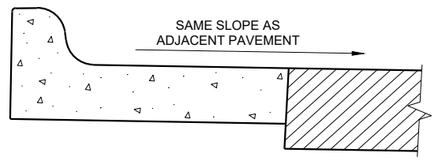
END SECTIONCURB AND GUTTER



PARTIAL SECTION OF PAVEMENT WITH INTEGRAL CURB AND GUTTER



TYPICAL TIE BAR LOCATION ①



HIGH SIDE SECTION ③

(TYPICAL FOR ALL CURB & GUTTER TYPES)

GENERAL NOTES

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

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

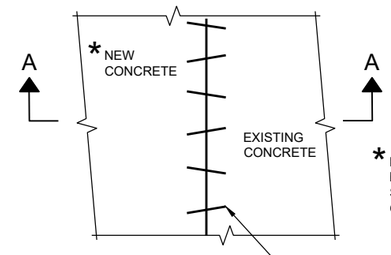
INTEGRAL CURB AND GUTTER SHALL CONFORM TO THE DETAILS SHOWN FOR CONCRETE CURB AND GUTTER INCLUDING THE TRANSVERSE GUTTER SLOPE. A LONGITUDINAL CONSTRUCTION JOINT IS NOT REQUIRED WITH INTEGRAL CURB AND GUTTER.

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

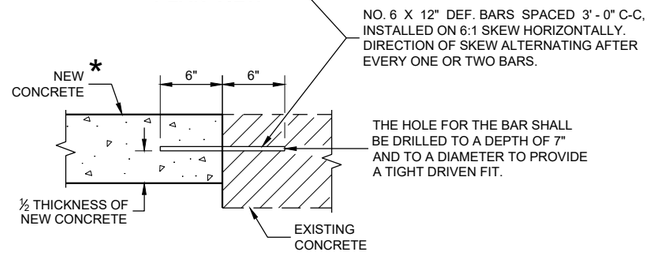
① WHEN PLACED ADJACENT TO NEW CONCRETE, TIE BARS ARE REQUITED FOR CURB AND GUTTER 31", 22", 19" AND CONCRETE GUTTER 24".

② THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE COURSE PROVIDED A 7" MINIMUM GUTTER THICKNESS IS MAINTAINED.

③ WHEN HIGH SIDE CURB SECTION IS REQUIRED, THE LOCATION(S) WILL BE NOTED ON THE PLANS



PLAN VIEW



SECTION A - A

PAVEMENT TIES

*EXISTING AND NEW CONCRETE MAY BE CURB AND GUTTER, SURFACE DRAINS, PAVEMENT OR OTHER CONCRETE STRUCTURE.

CONCRETE GUTTER, CURB AND GUTTER AND PAVEMENT TIES

(For Optional use in Milwaukee Co. Only)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
February 2020
DATE

/S/ Rodney Taylor
ROADWAY STANDARDS DEVE ENGINEER

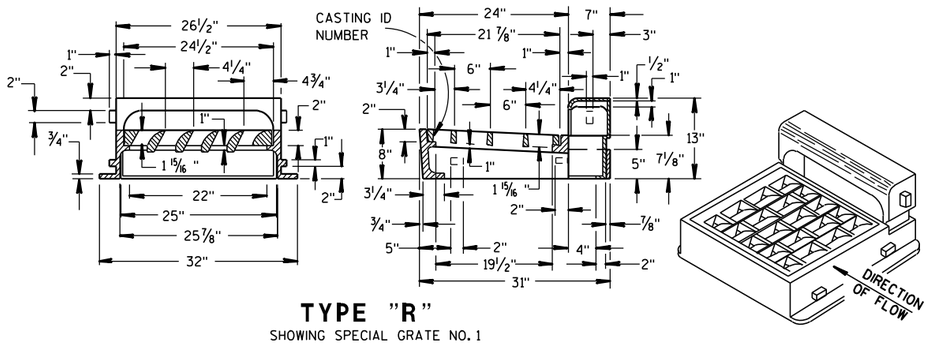
FHWA

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SDD 08D16 - 11

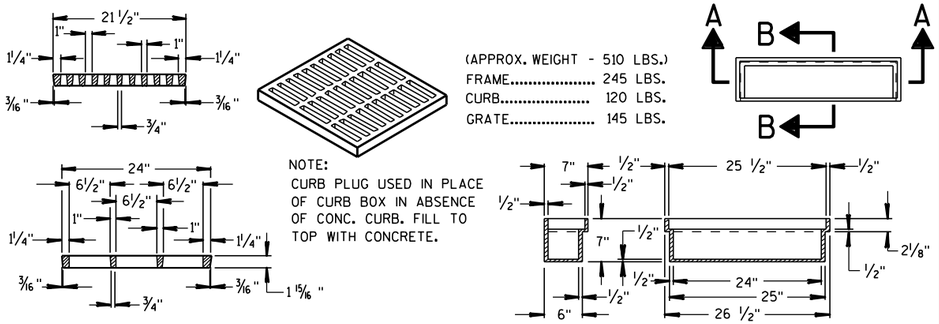
SDD 08D16 - 11

INLET COVERS



TYPE "R"

SHOWING SPECIAL GRATE NO. 1
(TO BE NOTED AS R-1 IN DRAINAGE TABLE)



(APPROX. WEIGHT - 510 LBS.)
FRAME..... 245 LBS.
CURB..... 120 LBS.
GRATE..... 145 LBS.

NOTE:
CURB PLUG USED IN PLACE OF CURB BOX IN ABSENCE OF CONC. CURB. FILL TO TOP WITH CONCRETE.

SECTION B-B SECTION A-A

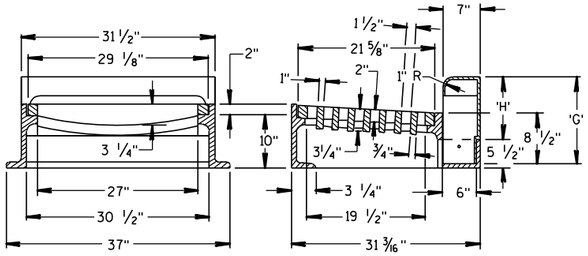
GRATE FOR TYPE "R" INLET COVER

(GRATE..... 150 LBS.)
(TO BE USED UNLESS OTHERWISE NOTED IN DRAINAGE TABLE)

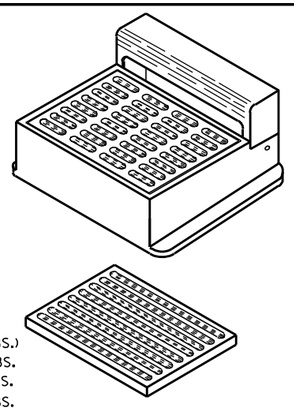
SPECIAL CURB PLUG "P"

(CURB PLUG..... 85 LBS.)
(TO BE NOTED AS R-P IN DRAINAGE TABLE)

'H' = 9" FOR 6" CURB
'H' = 11" FOR 8" CURB
'G' = 13 3/4" FOR 6" CURB
'G' = 15 3/4" FOR 8" CURB



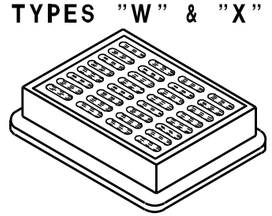
TYPE "W"

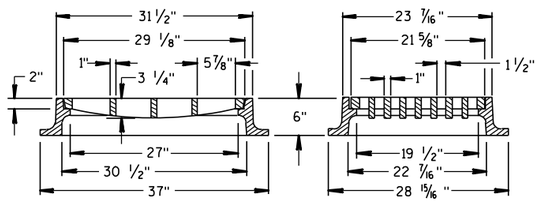


(APPROX. WEIGHT - 670 LBS.)
FRAME..... 350 LBS.
CURB BOX..... 135 LBS.
GRATE..... 185 LBS.

ALTERNATE GRATE
(FOR EXPRESSWAY RAMPS)

TYPES "W" & "X"

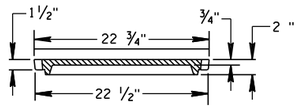




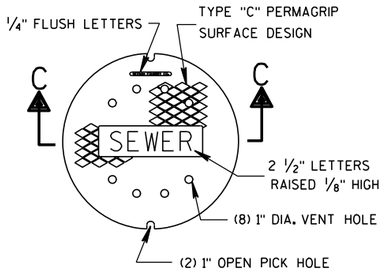
TYPE "X"

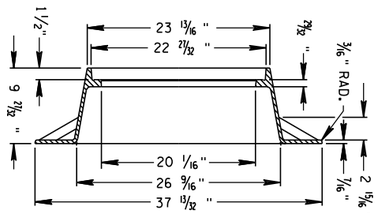
(APPROX. WEIGHT - 470 LBS.)

MANHOLE COVER



SECTION C-C

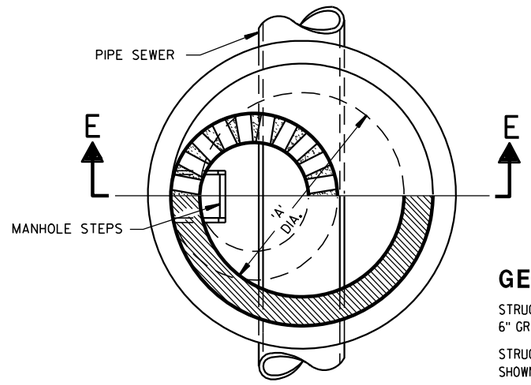




TYPE "Q"

(APPROX. WEIGHT - 290 LBS.)

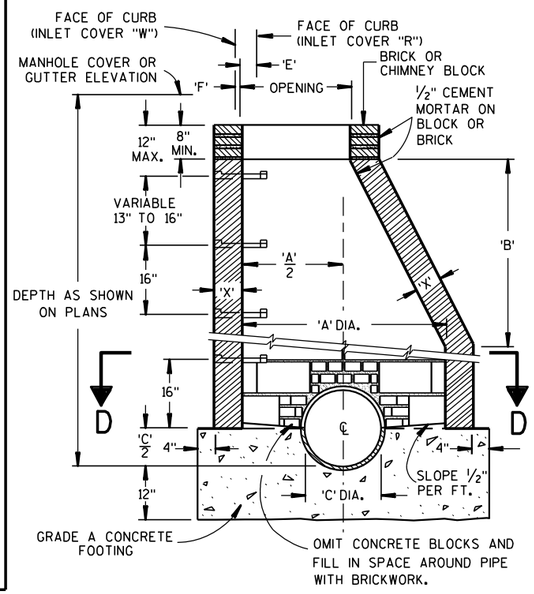
MANHOLE



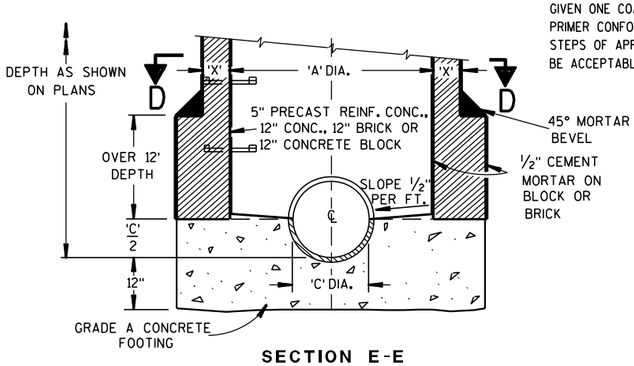
HALF SECTION D-D

TABLE OF OPENING DIMENSIONS

TYPE	COVER DESCRIPTION	OPENING	'E'	'F'
"O"	ROUND	2'-2" DIA.	—	—
"W"	CURB BOX	1'-8" X 2'-6"	—	1"
"X"	INLET	1'-10" X 2'-6"	—	—
"R"	CURB BOX	2'-0" X 2'-1"	4"	—



SECTION E-E



SECTION E-E

TYPES 11, 12, 13 & 14

TABLE OF DIMENSIONS

TYPE	'A'	'B'	'C'
11	3'-6"	2'-8"	12" - 36"*
12	4'-0"	3'-8"	12" - 42"**
13	5'-0"	5'-8"	42" - 48"
14	6'-0"	7'-8"	54" - 60"

* 12" - 21" FOR PRECAST MANHOLES
** 12" - 24" FOR PRECAST MANHOLES

THE FIRST STEP SHALL BE PLACED 16" ABOVE THE BENCH.

GENERAL NOTES

STRUCTURE WALL THICKNESS 'X' TO BE 8" BRICK, 6" CONCRETE BLOCK, 6" GRADE A CONCRETE OR 5" PRECAST REINFORCED CONCRETE.

STRUCTURE FOOTINGS ARE TO BE GRADE A CONCRETE OF THE THICKNESS SHOWN IN THE DETAIL OR 5" PRECAST REINFORCED CONCRETE.

REINFORCEMENT FOR 5" PRECAST REINFORCED CONCRETE SHALL BE 6" X 6" W16 X W16 WELDED SREEL WIRE FABRIC AND SHALL BE EMBEDDED 2" CLEAR.

PRECAST INLET UNITS AND BASES SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF AASHTO DESIGNATION M 199.

PRECAST CONCRETE FLAT SLAB TOPS MAY BE USED ON THE STRUCTURES. THE TOPS SHALL BE INSTALLED ON A BED OF MORTAR.

PRECAST REINFORCED BASES SHALL BE PLACED ON A BED OF MATERIAL AT LEAST 6" IN DEPTH, WHICH MEETS THE REQUIREMENTS FOR GRANULAR BACK-FILL. THIS BEDDING SHALL BE COMPACTED AND PROVIDE UNIFORM SUPPORT FOR THE ENTIRE AREA OF THE BASE.

SET FRAME ELEVATION 0.03 FT. LOWER THAN ELEVATION INDICATED ON THE PLANS.

THE CONTRACTOR MAY FORM AND POUR MONOLITHIC CONCRETE INVERT PROVIDED THE PIPE ENDS ARE EXTENDED INTO THE M.H. AND NOT TERMINATED WITHIN THE M.H. WALLS.

MANHOLE STEPS

STEPS MEETING THE FOLLOWING REQUIREMENTS SHALL BE INSTALLED IN ALL STRUCTURES OVER 5 FEET IN DEPTH; 16 INCH C-C MAX. SPACING; PROJECT A MINIMUM CLEAR DISTANCE OF 4 INCHES FROM THE WALL AT THE POINT OF EMBEDMENT; MINIMUM WALL EMBEDMENT OF 3 INCHES IN PRECAST MANHOLE AND 6 INCHES IN 8 INCH BRICK OR 6 INCH BLOCK MANHOLE; TREAD OF STEP SHALL HAVE A NON-SKID SURFACE AND BE FLANKED BY CLEATS, WITH A MINIMUM OF 10 INCHES CLEAR BETWEEN CLEATS, TO PREVENT FOOT SLIPPING OFF THE EDGE CLEATS SHALL BE A MINIMUM OF 3/4 INCH HIGH BY 3/4 INCH WIDE HAVING A MINIMUM THICKNESS OF 5/8 INCH. STEPS SHALL BE CAPABLE OF SUPPORTING A CONCENTRATED LOAD OF 300 LBS. FERROUS METAL STEPS NOT PAINTED OR TREATED TO RESIST CORROSION SHALL HAVE A MINIMUM CROSS SECTIONAL DIMENSION OF 1 INCH.

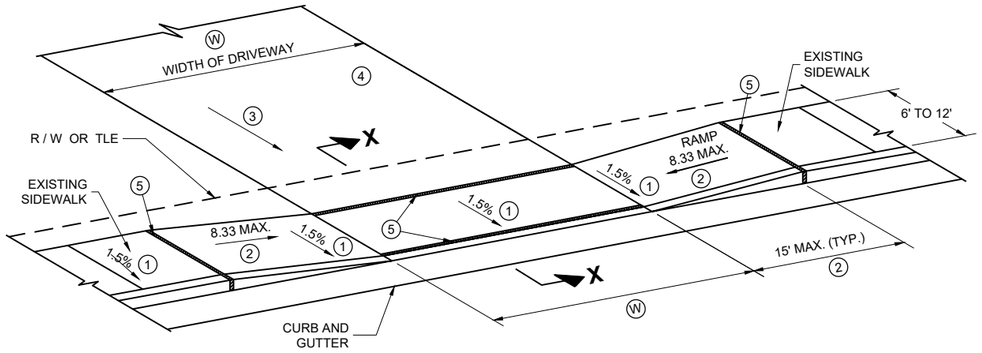
SOLID ALUMINUM STEPS SHALL HAVE A MINIMUM CROSS SECTIONAL DIMENSION OF 0.75 INCH. ALUMINUM SURFACES TO BE EMBEDDED IN CONCRETE SHALL BE GIVEN ONE COAT OF SUITABLE QUALITY PAINT, SUCH AS ZINC CHROMATE PRIMER CONFORMING TO FEDERAL SPECIFICATION TT-P-645 OR EQUIVALENT. STEPS OF APPROVED POLYPROPYLENE PLASTIC COATED REINFORCING BAR WILL BE ACCEPTABLE.

MANHOLES, MANHOLE & INLET COVERS

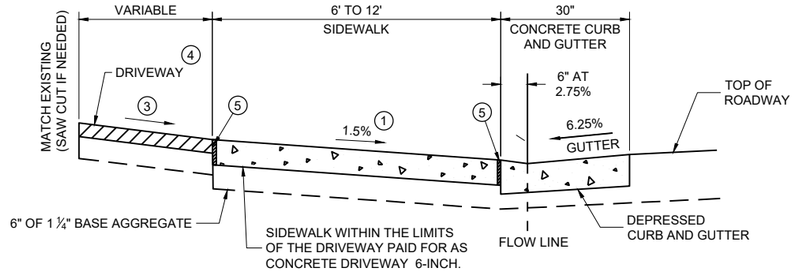
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4/12/2011 — DATE
/S/ Jerry H. Zogg — ROADSIDE STANDARDS ENGINEER
FHWA

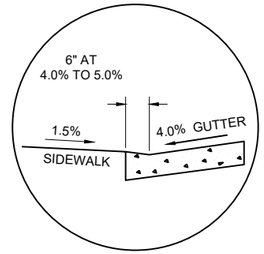
6
S.D.D. 8 D 17-6



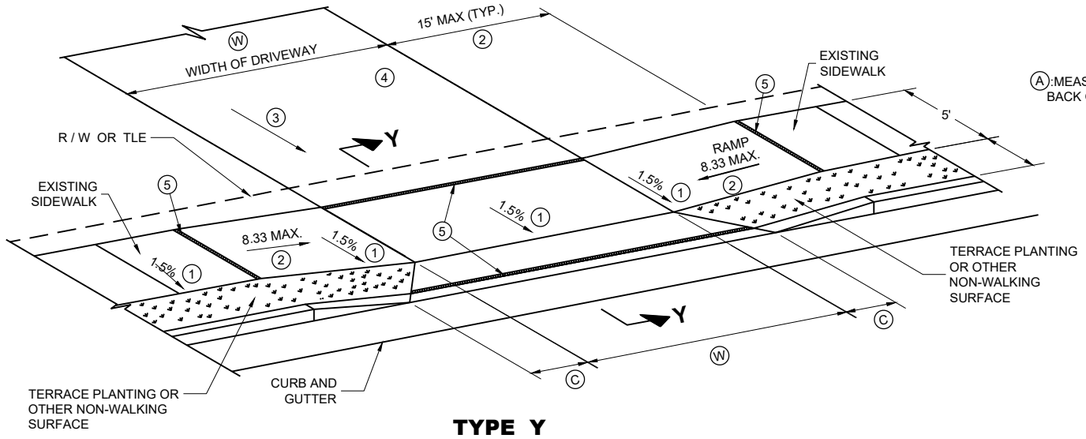
TYPE X
SIDEWALK ABUTS CURB AND GUTTER
TERRACE VARIES 0 TO 3 FEET



SECTION X - X



SECTION X - X
4% GUTTER SLOPE



TYPE Y
SIDEWALK WITH NARROWER TERRACE
TERRACE VARIES 4 TO 6 FEET

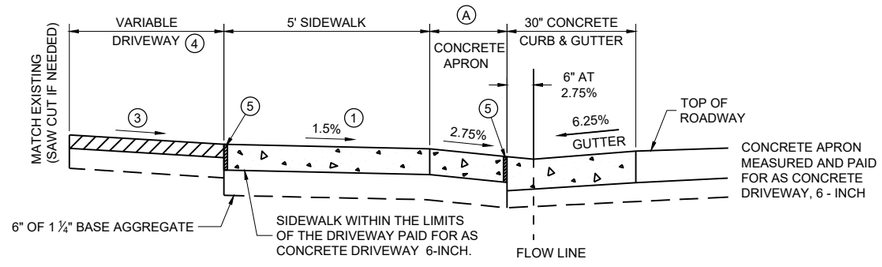
Ⓦ: 12' MIN. - 24' MAX. RESIDENTIAL AND NON-COMMERCIAL (PE & FE)

16' MIN. - 35' MAX. COMMERCIAL (CE)

Ⓐ:MEASURE FROM BACK OF CURB

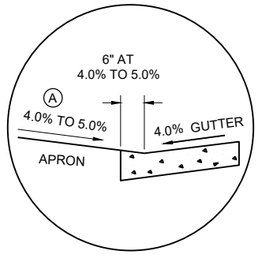
TABLE Y

Ⓐ FEET	Ⓒ FEET
3.5'	2.0'
4.5'	3.0'
5.5'	3.5'



NOTE: SIDEWALK MY BE DEPRESSED IN DRIVEWAY AREAS

SECTION Y - Y



SECTION Y - Y
4% GUTTER SLOPE

DRIVEWAY DETAIL WITH CONCRETE CURB AND GUTTER
(URBAN AND SUBURBAN)

GENERAL NOTES

PROVIDE CONSTRUCTION JOINTS ALONG THE CENTER OF THE CONCRETE FOR DRIVEWAYS UNDER 20 FEET IN WIDTH AND AT THE THIRD POINTS OVER 20 FEET IN WIDTH.

Ⓦ IS SHOWN ON PLAN AND PROFILE SHEETS.

OFFSETS, ELEVATIONS, AND PERCENT GRADE ARE SHOWN ON THE CROSS SECTIONS.

① CONSTRUCTION TOLERANCE OF 0.5%± FOR SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2%.

② THE SIDEWALK RAMP MAXIMUM RUNNING SLOPE SHALL NOT REQUIRE THE RAMP LENGTH TO EXCEED 15 FEET TO AVOID CHASING THE SLOPE INDEFINITELY WHEN CONNECTING TO STEEP GRADES. WHEN APPLYING THE 15 FOOT MAXIMUM LENGTH, THE RUNNING SLOPE OF THE SIDEWALK SHALL BE AS FLAT AS FEASIBLE AND NOT EXCEED THE LONGITUDINAL GRADE OF THE ROADWAY. SLOPE SIDEWALK RAMP TOWARD APRON AS SHOWN WHERE THERE IS NO TERRACE OR WHERE THE TERRACE WIDTH IS LESS THAN 6 FEET WIDE.

③ DRIVEWAY SLOPES: DESIRABLE MAXIMUM
- 10.5% UP AWAY FROM SIDEWALK (SAG)
- 8.5% DOWN AWAY FROM SIDEWALK (CREST)
- ABSOLUTE MAXIMUM 15% FOR BOTH CREST AND SAG

④ DRIVEWAY TYPES
- 6-INCH CONCRETE DRIVEWAY PAVEMENT OVER 6-INCH BASE AGGREGATE
- 2-INCH TO 3-INCH ASPHALTIC SURFACE OVER 6-INCH BASE AGGREGATE
- 6-INCH BASE AGGREGATE (MAY BE INCREASED FOR CLAY SUBGRADES.)

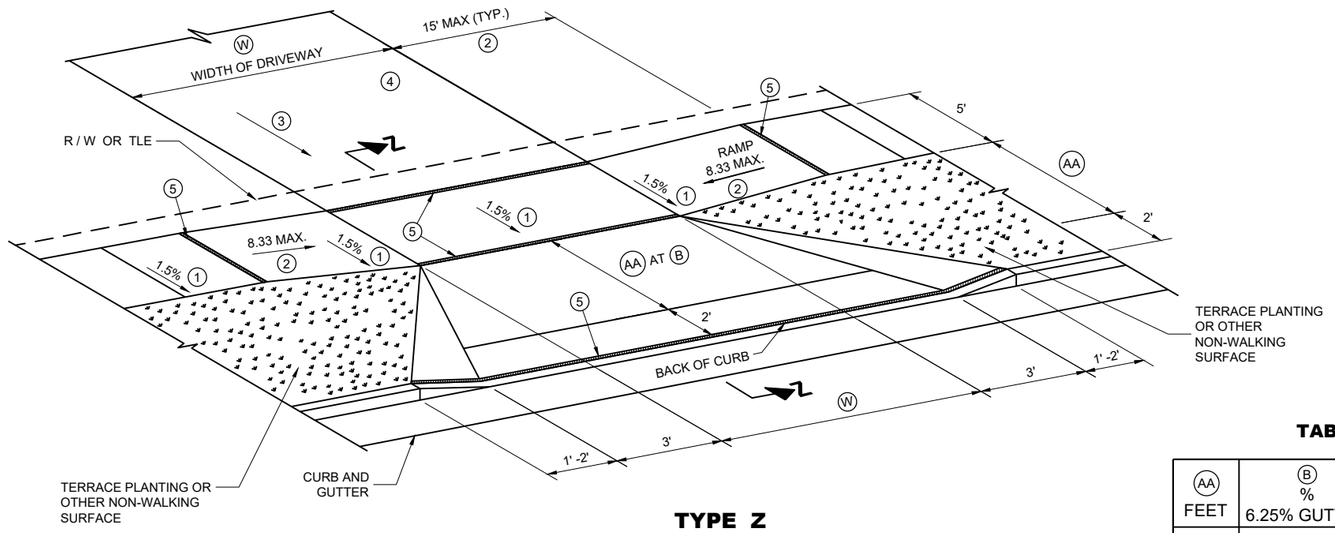
⑤ ½" EXPANSION JOINT FILLER

DRIVEWAY AND SIDEWALK RAMPS TYPES X AND Y

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
July 2023 — DATE
/S/ Rodney Taylor — ROADWAY STANDARDS DEVELOPMENT UNIT SUPERVISOR

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TYPE Z
SIDEWALK WITH WIDER TERRACE
TERRACE VARIES 7 TO 12 FEET

GENERAL NOTES

PROVIDE CONSTRUCTION JOINTS ALONG THE CENTER OF THE CONCRETE FOR DRIVEWAYS UNDER 20 FEET IN WIDTH AND AT THE THIRD POINTS OVER 20 FEET IN WIDTH.

(W) IS SHOWN ON PLAN AND PROFILE SHEETS.

OFFSETS, ELEVATIONS, AND PERCENT GRADE ARE SHOWN ON THE CROSS SECTIONS.

(1) CONSTRUCTION TOLERANCE OF 0.5%± FOR SIDEWALK CROSS SLOPE. THE SIDEWALK CROSS SLOPE SHALL NOT EXCEED 2%.

(2) THE SIDEWALK RAMP MAXIMUM RUNNING SLOPE SHALL NOT REQUIRE THE RAMP LENGTH TO EXCEED 15 FEET TO AVOID CHASING THE SLOPE INDEFINITELY WHEN CONNECTING TO STEEP GRADES. WHEN APPLYING THE 15 FOOT MAXIMUM LENGTH, THE RUNNING SLOPE OF THE SIDEWALK SHALL BE AS FLAT AS FEASIBLE AND NOT EXCEED THE LONGITUDINAL GRADE OF THE ROADWAY.

(3) DRIVEWAY SLOPES: DESIRABLE MAXIMUM
- 10.5% UP AWAY FROM SIDEWALK (SAG)
- 8.5% DOWN AWAY FROM SIDEWALK (CREST)
- ABSOLUTE MAXIMUM 15% FOR BOTH CREST AND SAG

(4) DRIVEWAY TYPES
- 6-INCH CONCRETE DRIVEWAY PAVEMENT OVER 6-INCH BASE AGGREGATE
- 2-INCH TO 3-INCH ASPHALTIC SURFACE OVER 6-INCH BASE AGGREGATE
- 6-INCH BASE AGGREGATE (MAY BE INCREASED FOR CLAY SUBGRADES.)

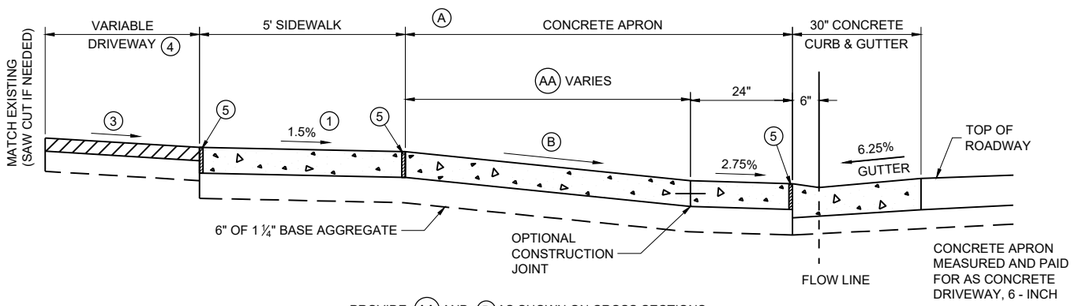
(5) ½" EXPANSION JOINT FILLER.

TABLE Z

(AA) FEET	(B) % 6.25% GUTTER	(B) % 4% GUTTER
4.5'	11.5%	9% TO 11.5%
5.5'	9% TO 11.5%	8% TO 11.5%
6.5'	8% TO 11.5%	6% TO 11.5%
7.5'	7% TO 11.5%	6% TO 11.5%
8.5'	6% TO 11.5%	5% TO 11.5%
9.5'	5% TO 11.5%	4% TO 11.5%

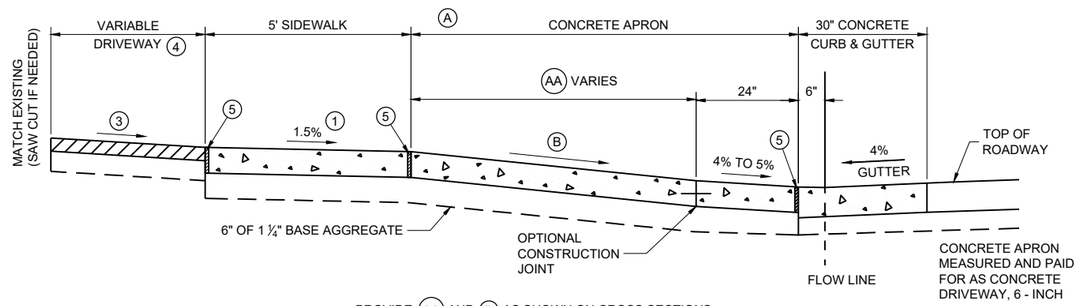
(W): 12' MIN. - 24' MAX. RESIDENTIAL AND NON-COMMERCIAL (PE & FE)

16' MIN. - 35' MAX. COMMERCIAL (CE)



PROVIDE (AA) AND (B) AS SHOWN ON CROSS SECTIONS.

6.25% GUTTER SLOPE



PROVIDE (AA) AND (B) AS SHOWN ON CROSS SECTIONS.

4% GUTTER SLOPE

NOTE: SIDEWALK MY BE DEPRESSED IN DRIVEWAY AREAS FOR (B) VALUES NOT SHOWN IN TABLE Z.

SIDEWALK WITHIN THE LIMITS OF THE DRIVEWAY PAID FOR AS CONCRETE DRIVEWAY 6-INCH.

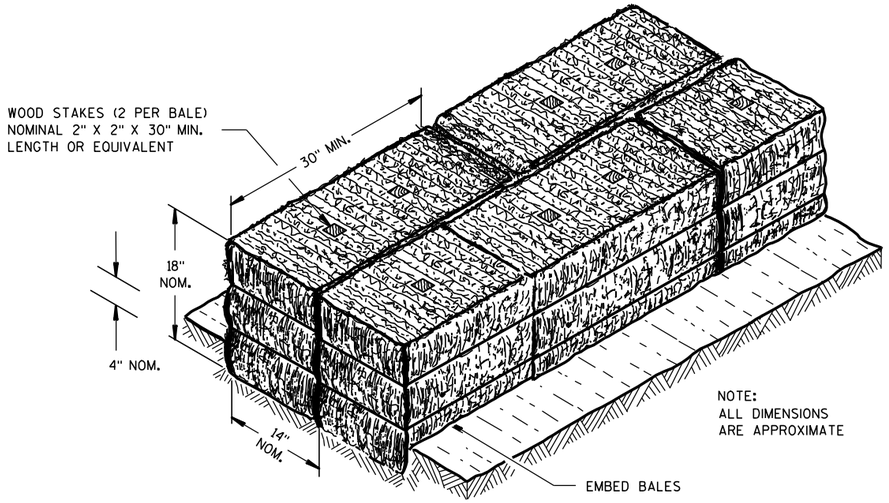
SECTION Z - Z
DRIVEWAY DETAIL WITH CONCRETE CURB AND GUTTER
(URBAN AND SUBURBAN)

DRIVEWAY AND SIDEWALK RAMPS TYPE Z

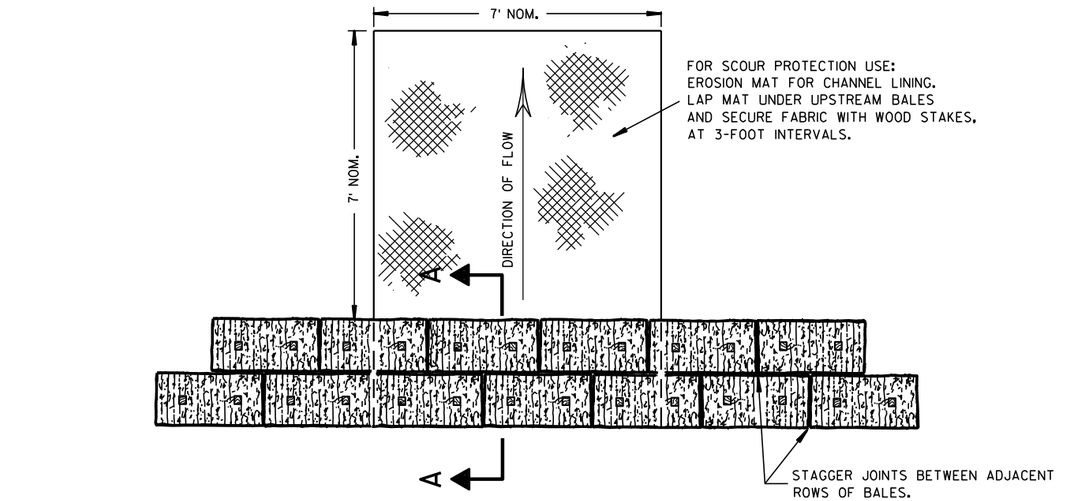
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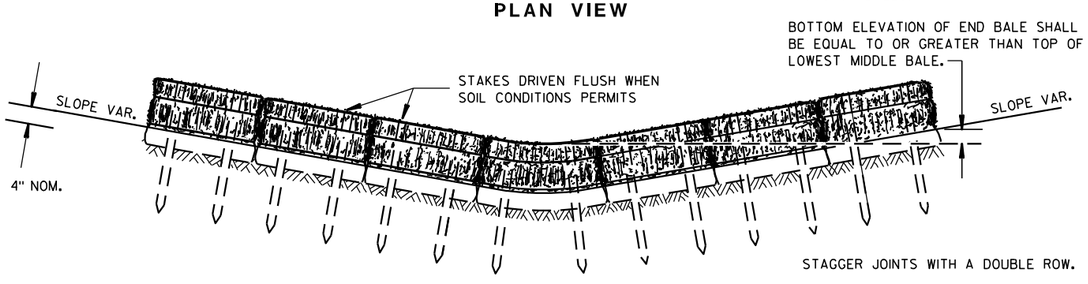
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SECTION A-A



PLAN VIEW



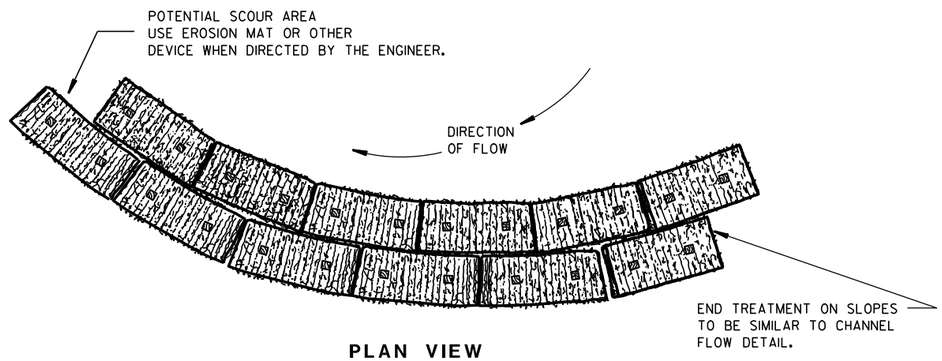
FRONT ELEVATION

TEMPORARY DITCH CHECK USING EROSION BALES ①

GENERAL NOTES

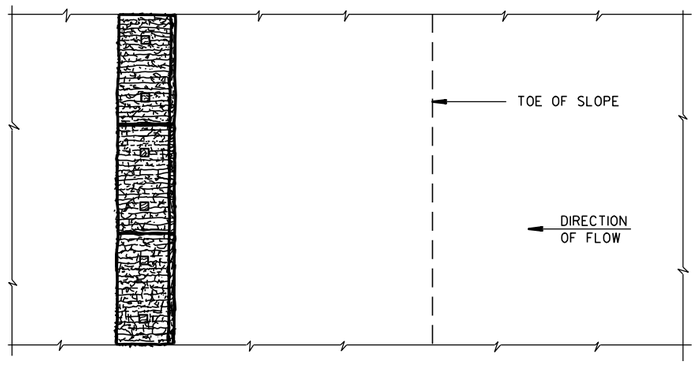
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

① TEMPORARY DITCH CHECKS EITHER EROSION BALES OR MANUFACTURED SHALL BE PAID FOR UNDER THE BID ITEM OF TEMPORARY DITCH CHECK. THE DEPARTMENT WILL NOT PAY FOR TEMPORARY DITCH CHECKS CONSTRUCTED OF A SINGLE ROW OF EROSION BALES.

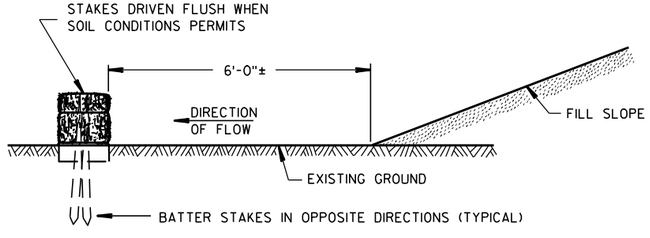


PLAN VIEW

WHEN ALTERING THE DIRECTION OF FLOW



PLAN VIEW



FRONT ELEVATION

WHEN EXISTING GROUND SLOPES AWAY FROM FILL SLOPE

EROSION BALES FOR SHEET FLOW

TYPICAL INSTALLATIONS OF EROSION BALES / TEMPORARY DITCH CHECKS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

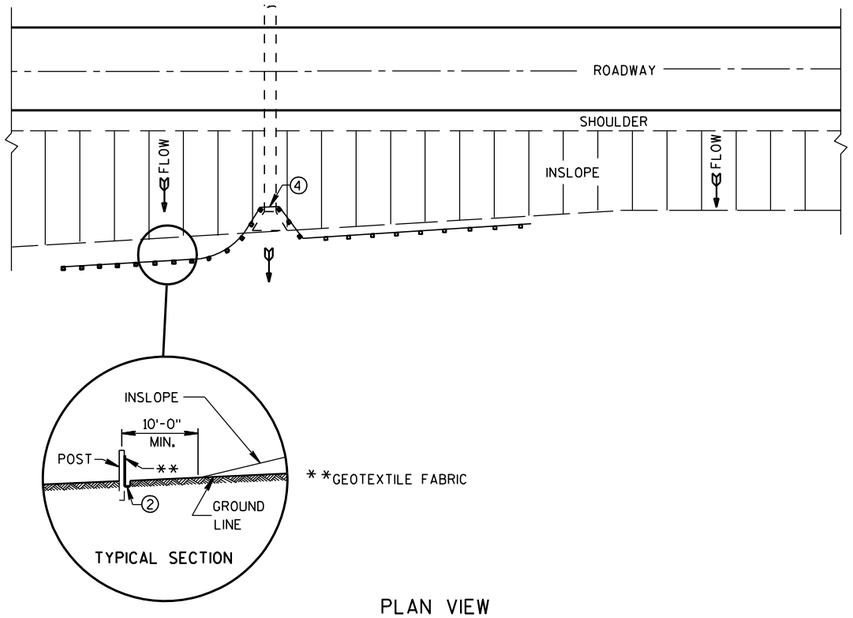
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6/04/02 DATE
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CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

6

S.D.D. 8 E 8-3

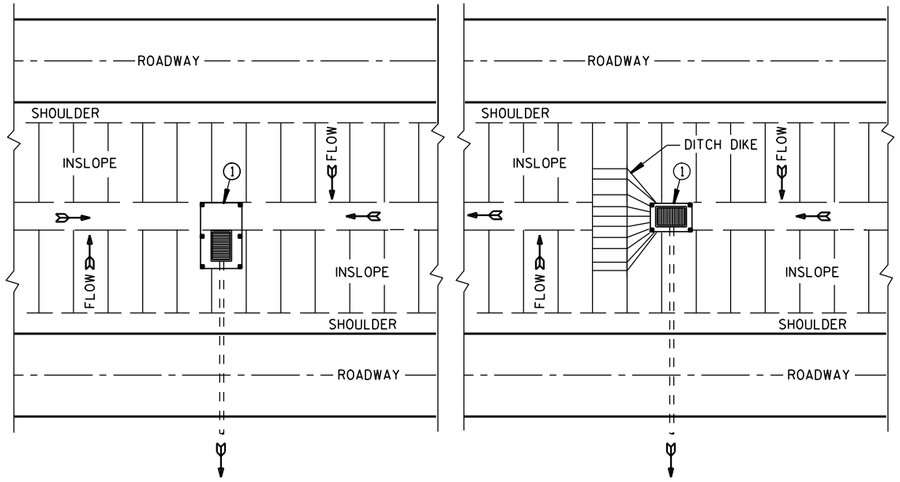
6

S.D.D. 8 E 8-3



PLAN VIEW

TYPICAL APPLICATION OF SILT FENCE



PLAN VIEW

SILT FENCE AT MEDIAN SURFACE DRAINS

GENERAL NOTES

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

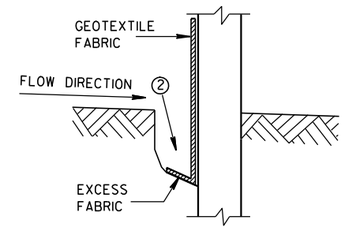
① HORIZONTAL BRACE REQUIRED WITH 2" X 4" WOODEN FRAME OR EQUIVALENT AT TOP OF POSTS.

② FOR MANUAL INSTALLATIONS THE TRENCH SHALL BE A MINIMUM OF 4" WIDE & 6" DEEP TO BURY AND ANCHOR THE GEOTEXTILE FABRIC. FOLD MATERIAL TO FIT TRENCH AND BACKFILL & COMPACT TRENCH WITH EXCAVATED SOIL.

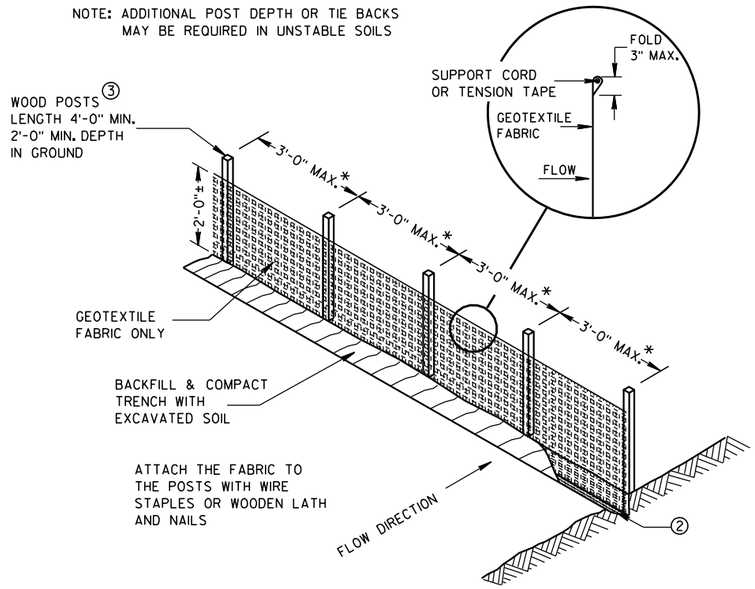
③ WOOD POSTS SHALL BE A MINIMUM SIZE OF 1⅛" X 1⅛" OF OAK OR HICKORY.

④ SILT FENCE TO EXTEND ACROSS THE TOP OF THE PIPE.

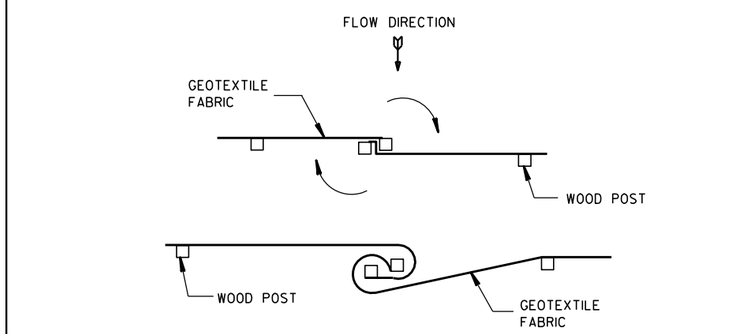
⑤ CONSTRUCT SILT FENCE FROM A CONTINUOUS ROLL IF POSSIBLE BY CUTTING LENGTHS TO AVOID JOINTS. IF A JOINT IS NECESSARY USE ONE OF THE FOLLOWING TWO METHODS; A) OVERLAP THE END POSTS AND TWIST, OR ROTATE, AT LEAST 180 DEGREES, B) HOOK THE END OF EACH SILT FENCE LENGTH.



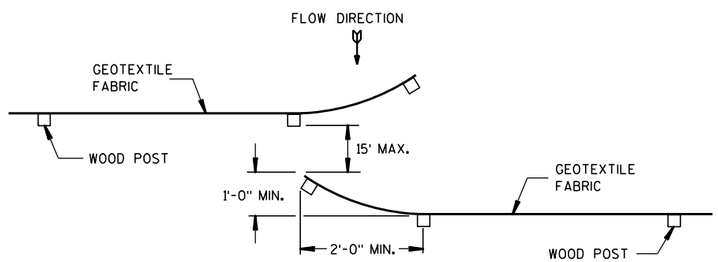
TRENCH DETAIL



SILT FENCE

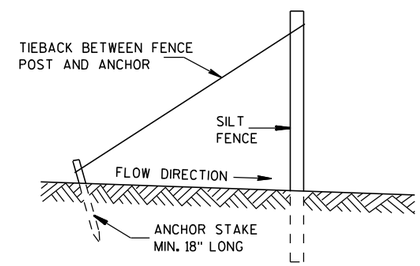


TWIST METHOD



HOOK METHOD

JOINING TWO LENGTHS OF SILT FENCE ⑤



SILT FENCE TIE BACK

(WHEN REQUIRED BY THE ENGINEER)

SILT FENCE

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DEPARTMENT OF TRANSPORTATION

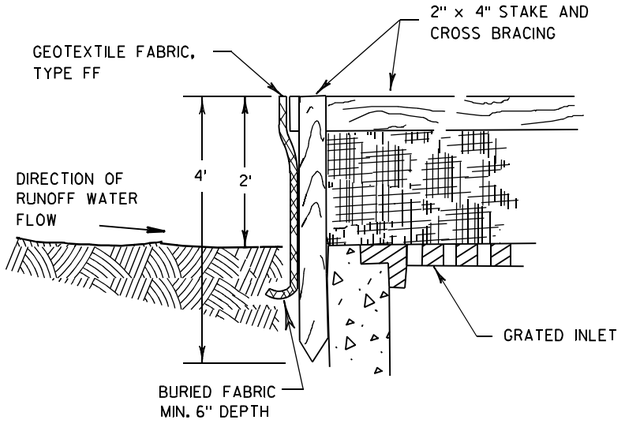
APPROVED
4-29-05 DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

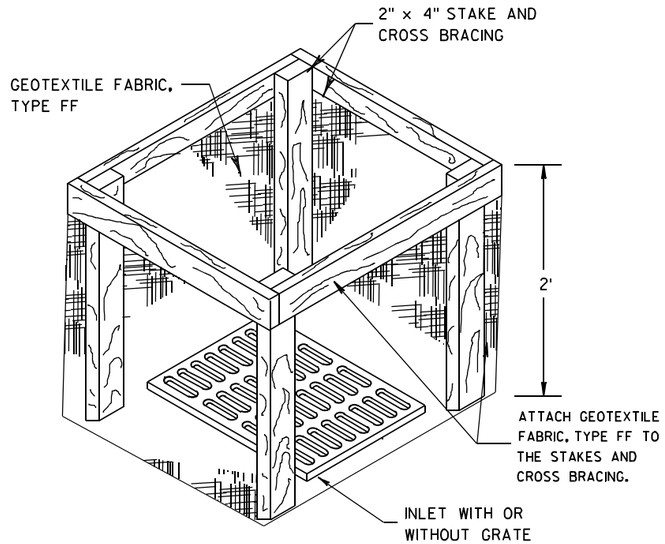
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S.D.D. 8 E 9-6

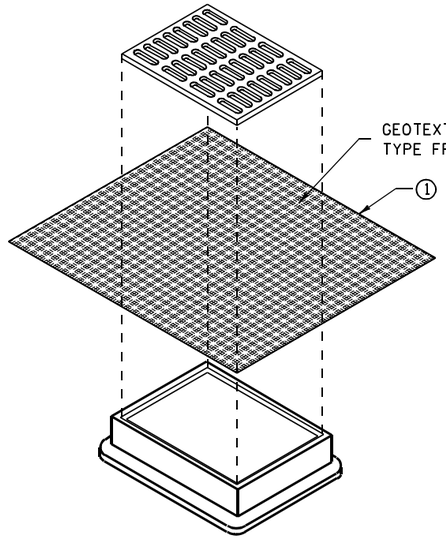
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S.D.D. 8 E 9-6



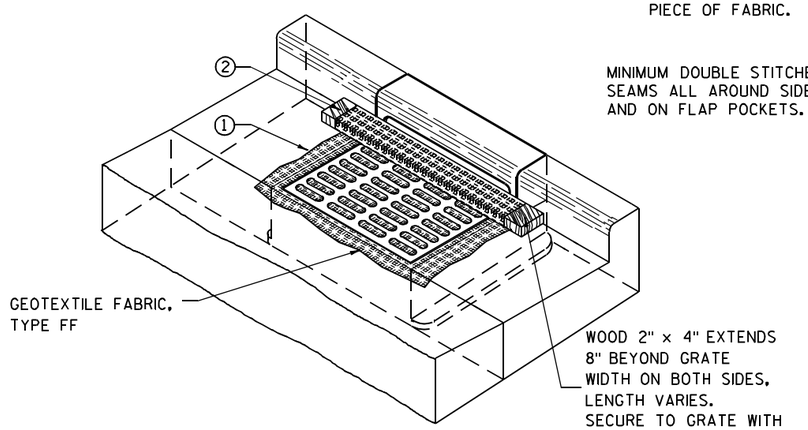


INLET PROTECTION, TYPE A

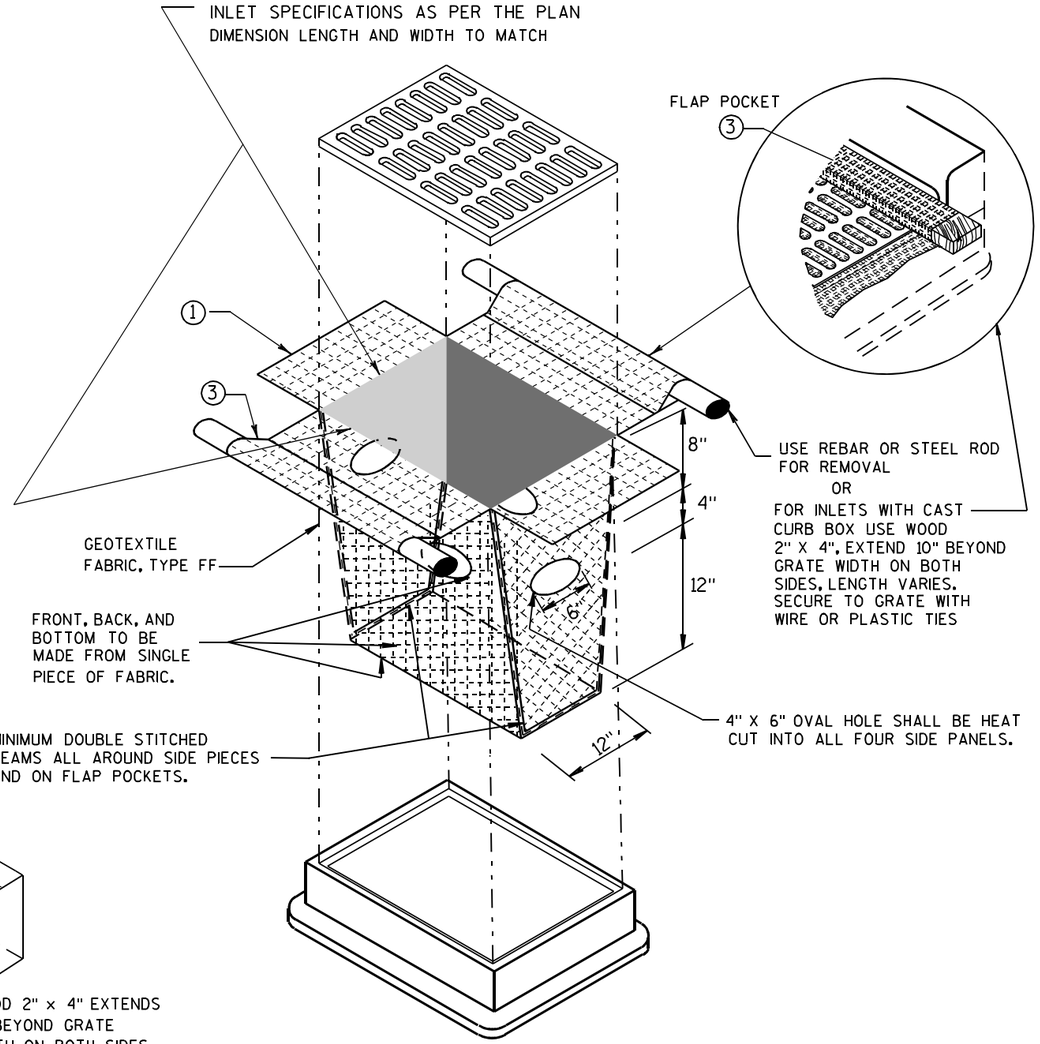


INLET PROTECTION, TYPE B
(WITHOUT CURB BOX)

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



INLET PROTECTION, TYPE C (WITH CURB BOX)



INLET PROTECTION, TYPE D

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

GENERAL NOTES

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

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

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

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

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

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

INSTALLATION NOTES

TYPE B & C

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

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

TYPE D

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

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

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

INLET PROTECTION
TYPE A, B, C, AND D

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

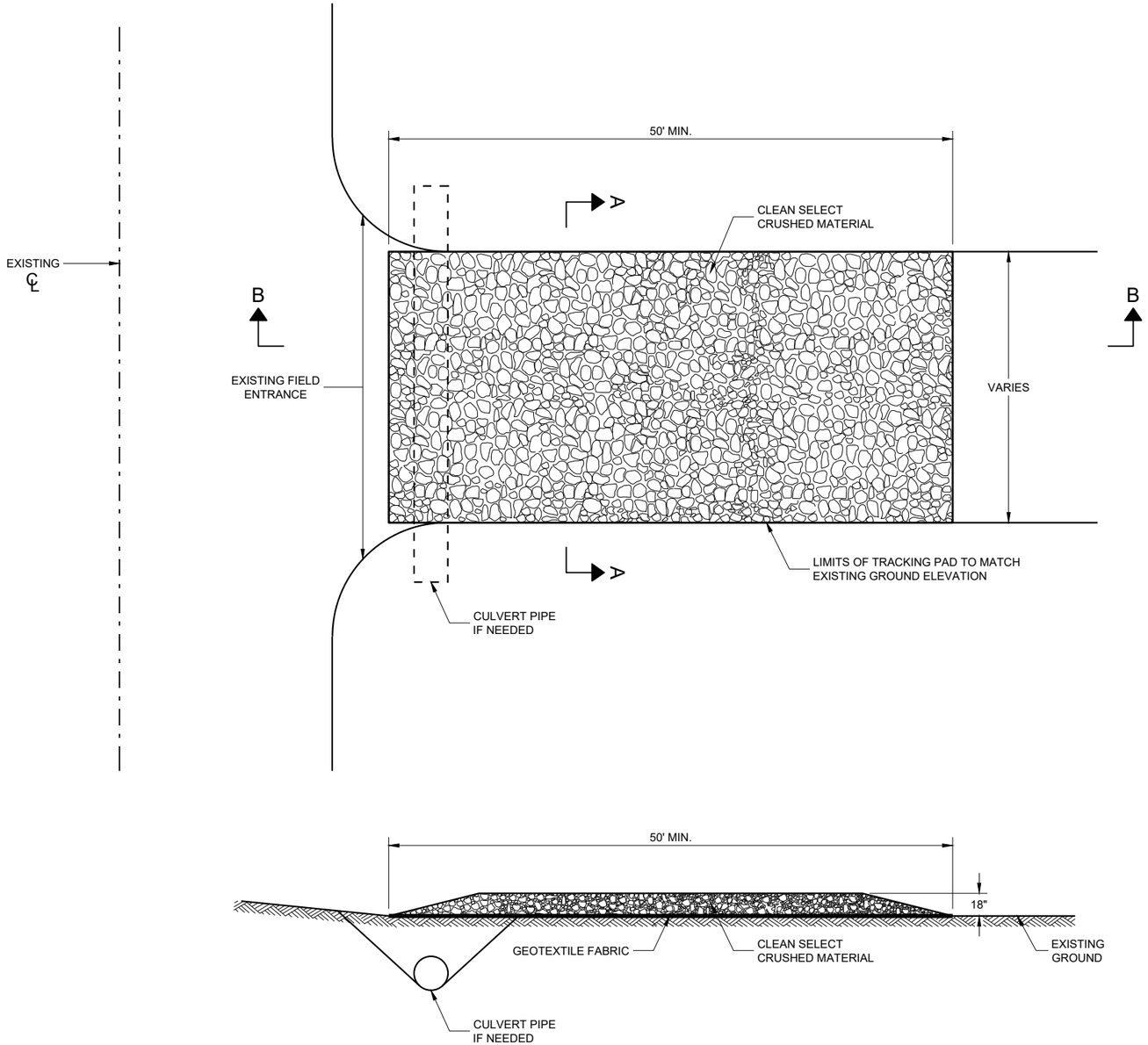
APPROVED
10/16/02
DATE
/S/ Beth Cannestra
CHIEF ROADWAY DEVELOPMENT ENGINEER
FHWA

6

S.D.D. 8 E 10-2

6

S.D.D. 8 E 10-2



SECTION B - B

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.

TRACKING PAD SHALL BE INSPECTED DAILY. DEFICIENT AREAS SHALL BE REPAIRED OR REPLACED IMMEDIATELY.

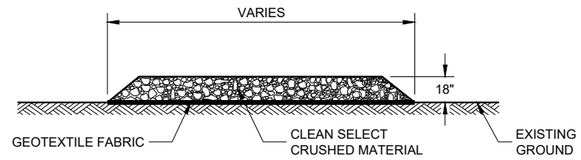
TRACKING PAD TO BE REMOVED AFTER CONSTRUCTION IS COMPLETED.

TRACKING PAD SHALL BE THE FULL WIDTH OF THE EGRESS POINT.

SURFACE WATER MUST BE PREVENTED FROM PASSING THROUGH THE TRACKING PAD. FLOWS SHALL BE DIVERTED AWAY, AROUND OR CONVEYED UNDER THE TRACKING PAD.

CULVERT PIPE OR OTHER BMP USED TO DIVERT WATER AWAY, AROUND OR UNDER THE TRACKING PAD SHALL BE DESIGNED TO CONVEY THE 2 YEAR - 24 HOUR EVENT.

THE COST OF ADDITIONAL BMP TO DIVERT WATER ARE INCIDENTAL TO THE TRACKING PAD BID ITEM.



SECTION A - A

TRACKING PAD

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
3/24/2011 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVE ENGINEER

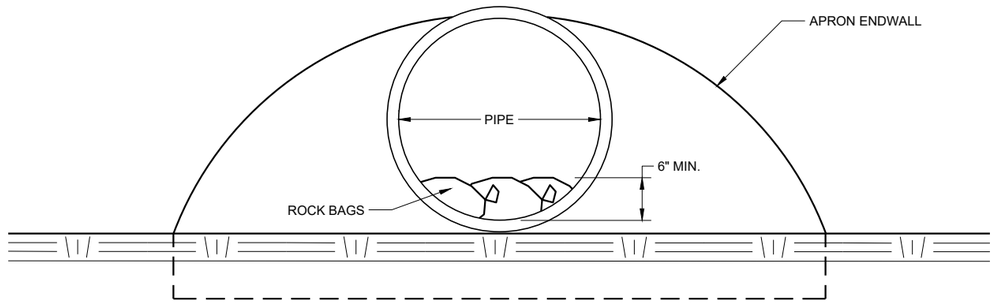
FHWA

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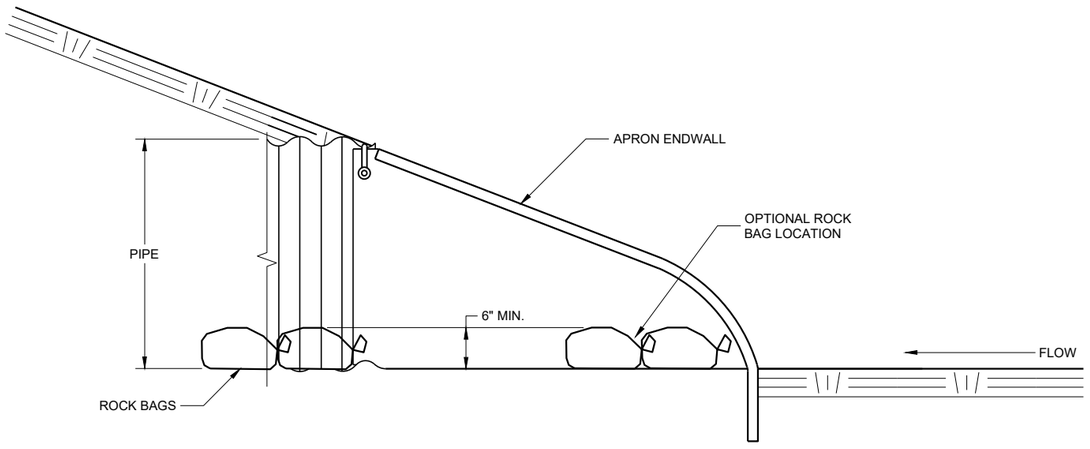
SDD 08E14 - 01

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SDD 08E14 - 01



END VIEW



SIDE VIEW

CULVERT PIPE CHECK

(INSTALL ON INLET END ONLY)

CULVERT PIPE CHECK

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2019
DATE

/S/ Daniel Schave
EROSION CONTROL ENGI

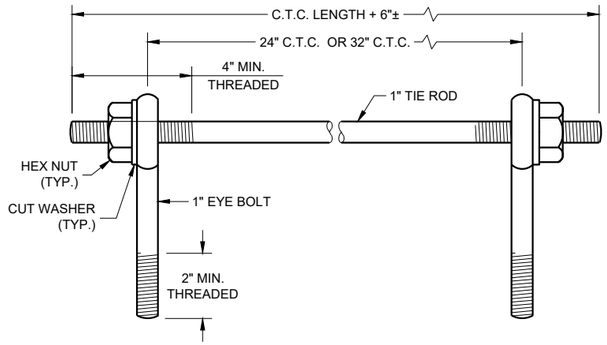
FHWA

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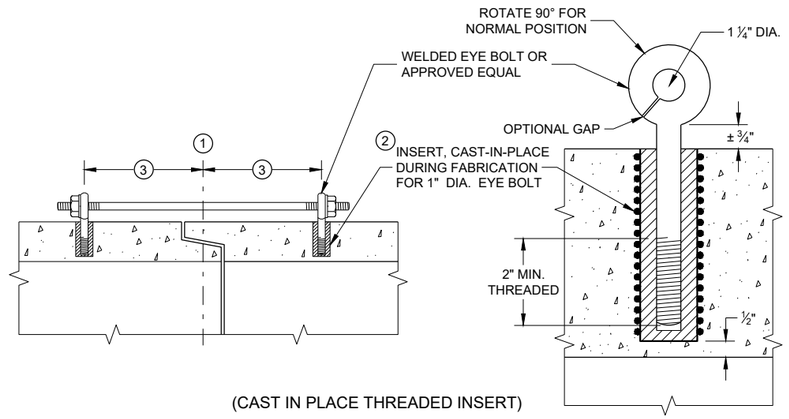
SDD 08E15 - 01

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SDD 08E15 - 01



EYE BOLTS AND TIE ROD



(CAST IN PLACE THREADED INSERT)

LONGITUDINAL SECTIONS

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

GENERAL NOTES

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

CONCRETE CULVERT AND STORM SEWER PIPE SHALL BE TIED TOGETHER IN THE MANNER ILLUSTRATED BY THIS DETAIL AT LOCATIONS DESIGNATED IN THE STANDARD SPECIFICATIONS AND THE PLAN. THE CONTRACTOR MAY USE EITHER ALTERNATE 1, 2 OR 3 FOR DRAINAGE STRUCTURES. ONLY ALTERNATE 1 AND 3 MAY BE USED FOR CATTLE PASSES, UNLESS OTHERWISE STATED IN THE CONTRACT. THE MATERIALS, FABRICATION AND WORK NECESSARY TO TIE THE PIPE BY THIS DETAIL WILL BE CONSIDERED INCIDENTAL TO THE PIPE AND APRON ENDWALLS IF REQUIRED.

DETAILED DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR JOINT TIES SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL.

JOINT TIES TO BE HOT-DIP GALVANIZED PER ASTM A 153.

(1) CENTER LINE 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.

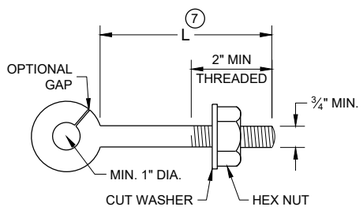
(3) HOLES SHALL BE CAST-IN-PLACE OR DRILLED PER THE APPLICABLE DETAIL, AND EQUAL DISTANCE FROM THE CENTERLINE OF THE JOINT.

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

(5) OPENING TO BE ROD DIAMETER PLUS 1 INCH.

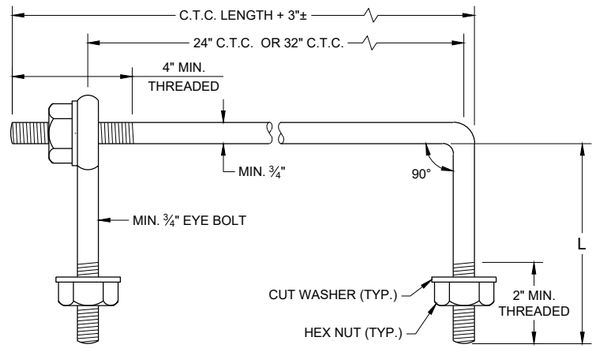
(6) LENGTH ADEQUATE TO EXTEND TO WITHIN ½ INCH OF THE INNER SURFACE OF THE PIPE.

(7) EYE BOLT LENGTH DETERMINED BY WALL THICKNESS, BELL THICKNESS AND BOLT PROJECTION INSIDE PIPE.

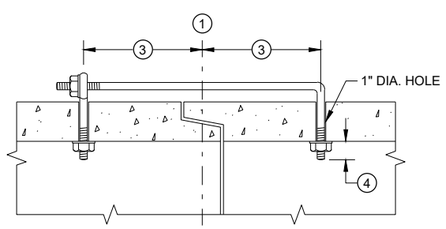


EYE BOLT (7)

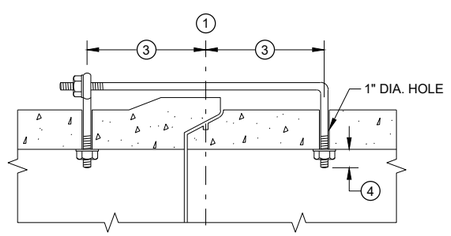
NOTE: TWO EYE BOLTS MAY BE USED WITH A 30" OR 38" LONG THREADED ROD IN LIEU OF THE 90° BENT TIE ROD.



EYE BOLT AND TIE ROD



(TONGUE AND GROOVE PIPE)



(MODIFIED BELL PIPE)

LONGITUDINAL SECTION

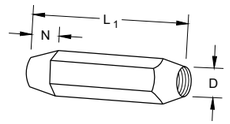
(JOINT TIES FOR 18" TO 66" DIA. CONCRETE PIPE)

EYE BOLT AND TIE ROD ASSEMBLY (ALTERNATE NO. 2)

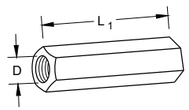
ADJUSTABLE TIE ROD TABLE

PIPE DIAMETER	TIE ROD DIAMETER	D	L_1	N
12 - 60	⅝	⅝	5	½
66 - 84	¾	¾	5	½
90 - 144	1	1	7	1 7/16

DIMENSIONS SHOWN ARE IN INCHES



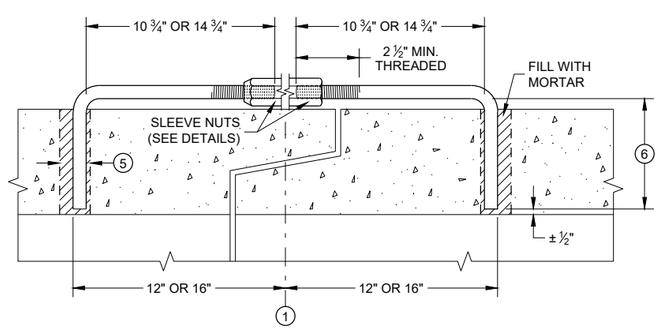
TAPERED



PLAIN

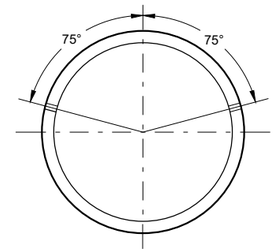
RIGHT AND LEFT THREADS

SLEEVE NUTS



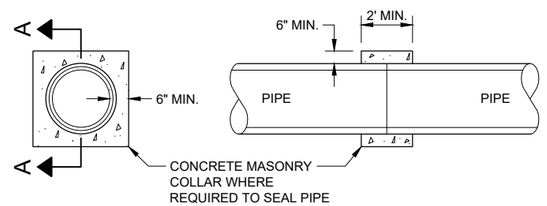
LONGITUDINAL SECTION

ADJUSTABLE TIE ROD (ALTERNATE NO. 3)



PLACEMENT OF (2) CAST-IN-PLACE INSERTS OR HOLES DURING FABRICATION FOR PIPE SECTIONS REQUIRING TIE RODS

TRANSVERSE SECTION



SECTION A - A

CONCRETE COLLAR DETAIL

JOINT TIES FOR CONCRETE PIPE AND CONCRETE COLLAR DETAIL

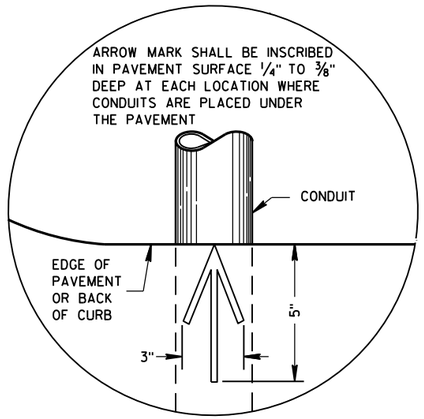
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
November 2021 — DATE
/S/ Rodney Taylor — ROADWAY STANDARDS DEVE ENGINEER

FHWA

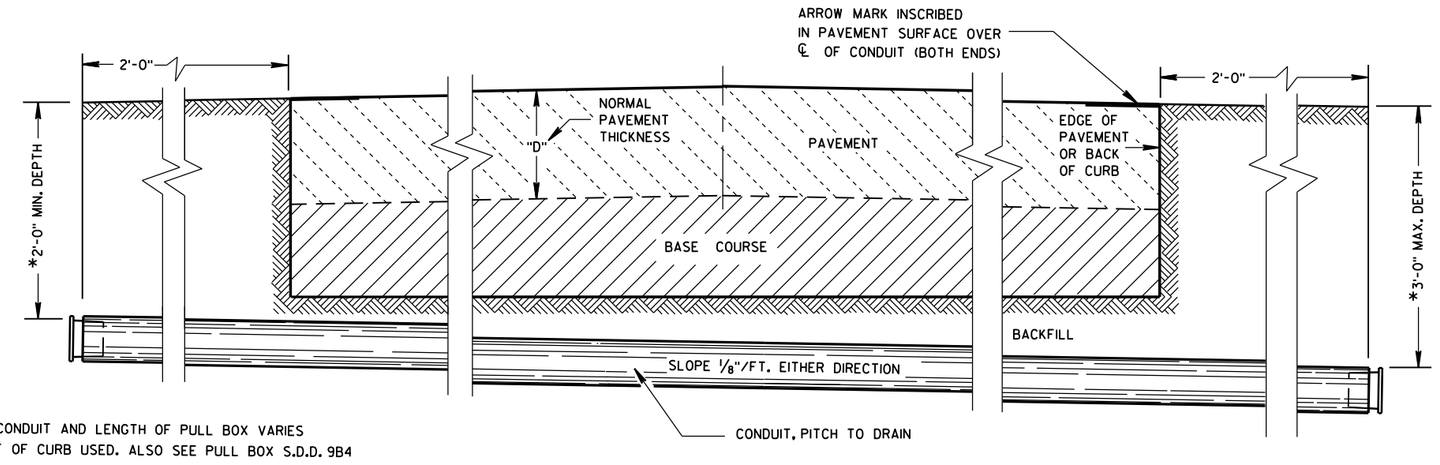
SDD 08F04 - 08

SDD 08F04 - 08



PLAN VIEW

ARROW MARK



*DEPTH OF CONDUIT AND LENGTH OF PULL BOX VARIES WITH HEIGHT OF CURB USED. ALSO SEE PULL BOX S.D.D. 9B4

SIDE ELEVATION

DETAIL FOR CONDUIT UNDER PAVED HIGHWAYS

GENERAL NOTES

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

METALLIC (STANDARD SPECIFICATION 652.2.2) OR NONMETALLIC (STANDARD SPECIFICATION 652.2.3) CONDUIT SHALL BE FURNISHED AND PLACED AS SHOWN.

DEPTH OF CONDUIT INSTALLED BELOW THE TRAVELED WAY SHALL BE 24 INCHES MINIMUM AND 36 INCHES MAXIMUM.

DEPTH OF CONDUIT INSTALLED THAT IS NOT BELOW THE TRAVELED WAY SHALL BE 18 INCHES MINIMUM AND 36 INCHES MAXIMUM.

ANY EXCEPTION TO THE MAXIMUM DEPTH SHALL BE ONLY WITH THE WRITTEN APPROVAL OF THE ENGINEER.

THE TRENCH SHALL NOT BE BACKFILLED PRIOR TO INSPECTION OF THE CONDUIT.

ALL METALLIC CONDUIT RACEWAY ENDS SHALL BE REAMED AND THREADED.

ALL METALLIC CONDUIT IN WHICH WIRE OR CABLE IS TO BE INSTALLED SHALL BE BUSHED WITH APPROVED THREADED BUSHINGS BEFORE INSTALLATION OF THE WIRE OR CABLE.

ALL METALLIC CONDUITS IN WHICH WIRE OR CABLE IS NOT TO BE INSTALLED SHALL BE CAPPED WITH THREADED PROTECTIVE CAPS, AS APPROVED BY THE ENGINEER.

ALL NONMETALLIC CONDUIT SHALL BE CAPPED OR PLUGGED IMMEDIATELY AFTER INSTALLATION AND SHALL REMAIN CAPPED OR PLUGGED UNTIL WIRE/CABLES ARE INSTALLED.

NONMETALLIC CONDUITS IN WHICH WIRE OR CABLE IS NOT BEING INSTALLED SHALL REMAIN CAPPED OR PLUGGED.

BENDING OF PVC ELECTRICAL CONDUIT SHALL BE ACCOMPLISHED BY USING A BLANKET OR EMERSION TYPE TANK DESIGNED FOR THE PURPOSE OF BENDING PVC ELECTRICAL CONDUIT.

ALL CUT ENDS SHALL BE TRIMMED INSIDE AND OUTSIDE TO REMOVE ALL ROUGH EDGES ON NONMETALLIC CONDUIT. (SEE NEC 347.5)

WHEN REQUIRED TO CONNECT NONMETALLIC CONDUIT TO METALLIC CONDUIT, ONLY U.L. LISTED ADAPTER FITTINGS SHALL BE USED.

PRIOR TO CONDUIT ACCEPTANCE, CONDUIT CAPS OR PLUGS SHALL BE REMOVED, AND THE CAPS, PLUGS AND CONDUIT ENDS SHALL BE THOROUGHLY CLEANED AND THEN THE CAPS OR PLUGS REINSTALLED TO ENSURE THAT THE CAPS OR PLUGS CAN BE EASILY REMOVED IN THE FUTURE.

ALL CONDUIT BEING FURNISHED AND INSTALLED SHALL HAVE THE U.L. LABEL FIRMLY ATTACHED.

CONDUIT RUNS SHALL BE THE SAME SIZE OF CONDUIT FROM ONE END TO THE OTHER (FROM PULL BOX TO PULL BOX-OR-JUNCTION BOX TO JUNCTION BOX-OR-BASE TO BASE, ETC.).

TRACER WIRE SHALL BE INSTALLED AS STATED IN THE STANDARD SPECIFICATION, ITEM 652.3.1.1.

ALL CONDUIT RUNS SHALL BE STRAIGHT (WITHOUT BENDS) FROM PULL BOX TO PULL BOX, PULL BOX TO BASE AND BASE TO BASE AS SHOWN ON THE PLANS.

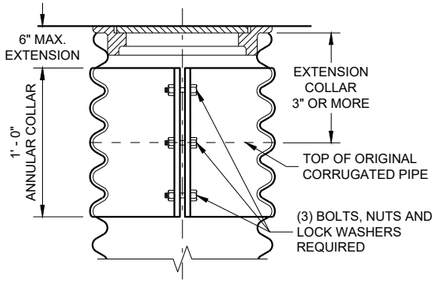
CONDUIT

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

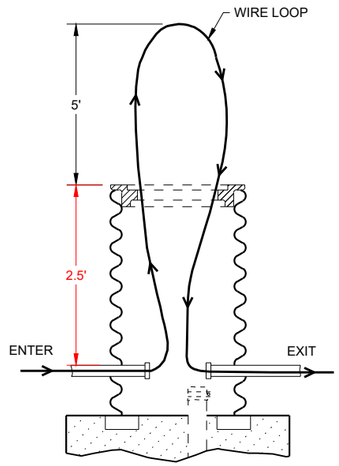
APPROVED
March, 2017 — DATE
/S/ Ahmet Demirbilek — STATE ELECTRICAL
FHWA

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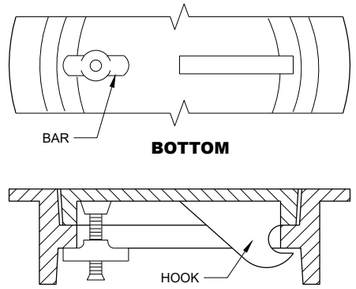
S.D.D. 9 B 2-10



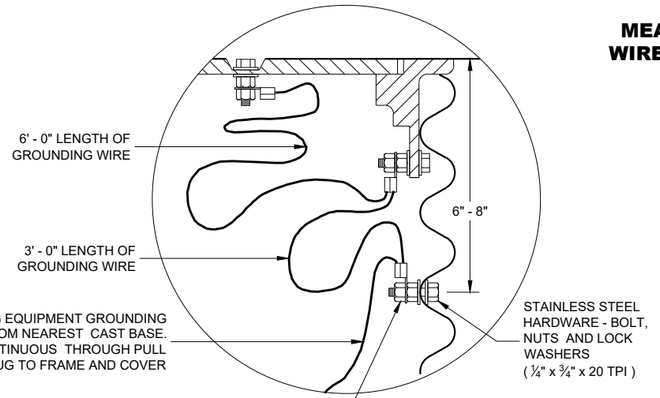
CORRUGATED PIPE EXTENDER



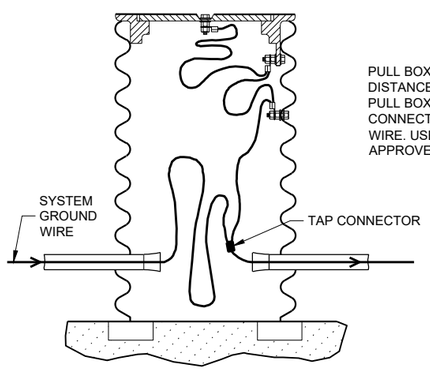
MEASUREMENT DETAIL FOR WIRE/CABLE IN THE PULL BOX



ALTERNATE COVER (LOCKING)
TIGHTENING BAR TYPE

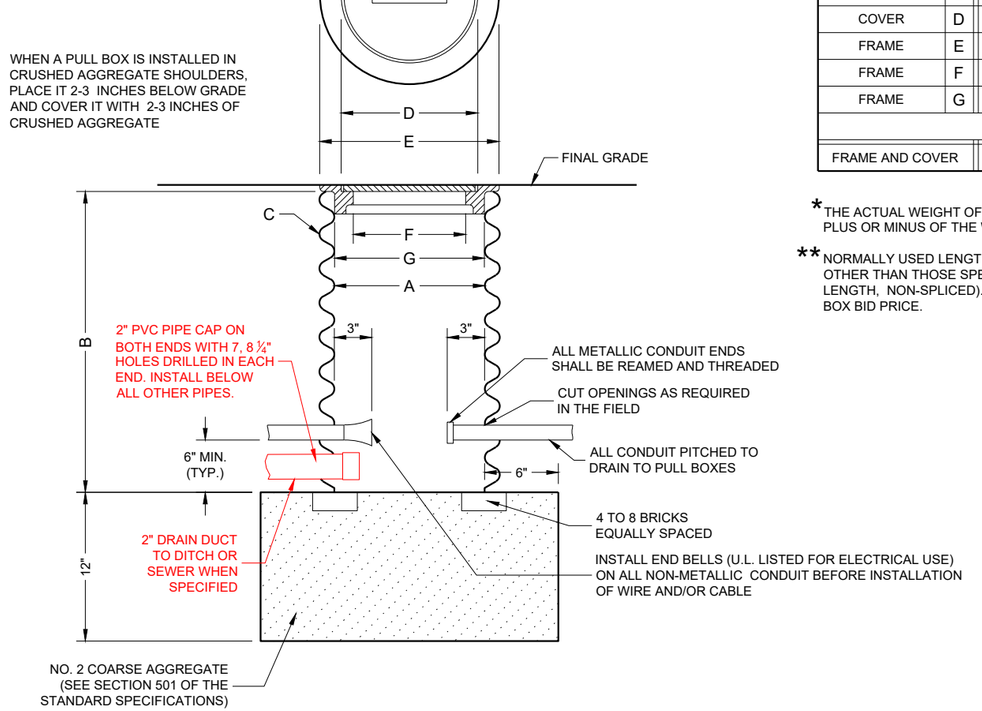


EQUIPMENT GROUNDING LUG AND LOCATION IN STEEL PULL BOXES



PULL BOX TO NEAREST BASE DISTANCE MORE THAN 20 FEET. PULL BOX GROUND WIRE SHALL CONNECT AT SYSTEM GROUNDING WIRE. USE DEPARTMENT APPROVED TAP CONNECTOR.

EQUIPMENT GROUNDING LUG AND LOCATION IN STEEL PULL BOXES



PULL BOX

GENERAL NOTES

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

ALL FRAMES AND COVERS SHALL BE HEAVY DUTY TYPE, SUITABLE FOR VEHICULAR TRAFFIC LOADS.

PULL BOXES LOCATED IN THE ROADWAYS SHALL HAVE LOCKING COVERS.

ENTRANCE HOLES INTO PULL BOXES SHALL BE CUT WITH A CIRCULAR HOLE SAW OR HYDRAULIC CONDUIT PUNCH. HOLE SIZE SHALL BE THE OUTSIDE DIAMETER OF THE CONDUIT THAT IS TO FIT IN THE OPENING PLUS NO MORE THAN ¼".

THE CONTRACTOR SHALL NOT INSTALL WIRE IN ANY PULL BOX UNTIL ITS INSTALLATION HAS BEEN INSPECTED AND ACCEPTED BY THE ENGINEER.

GROUNDING LUGS (MECHANICAL CONNECTORS) SHALL BE U.L. LISTED AND APPROVED FOR USE WITH COPPER WIRE.

ALL METALLIC CONDUIT IN WHICH WIRE AND/OR CABLE IS TO BE INSTALLED, SHALL BE BUSHED BEFORE INSTALLATION OF THE WIRE AND/OR CABLE.

WHEN PULL BOXES ARE INSTALLED FOR FUTURE USE, DO NOT INSTALL THE EQUIPMENT GROUNDING LUG. THE EQUIPMENT GROUNDING LUG, THE EQUIPMENT GROUNDING ELECTRODE AND THE EQUIPMENT GROUNDING CONDUCTOR SHALL BE REQUIRED AND INSTALLED UNDER A FUTURE WIRING CONTRACT.

TABLE OF NOMINAL DIMENSIONS AND WEIGHTS

DIMENSION IN INCHES		CORRUGATED STEEL PIPE								
PIPE DIAMETER (INSIDE)	A	12	12	12	18	18	18	24	24	24
PIPE LENGTH**	B	24	30	36	24	30	36	36	42	48
WALL THICKNESS	C	0.064	0.064	0.064	0.064	0.064	0.064	0.064	0.064	0.064
COVER	D	10 ¼	10 ¼	10 ¼	16 ¼	16 ¼	16 ¼	22 ¼	22 ¼	22 ¼
FRAME	E	14 ½	14 ½	14 ½	20 ½	20 ½	20 ½	26 ½	26 ½	26 ½
FRAME	F	8 ½	8 ½	8 ½	14 ½	14 ½	14 ½	20 ½	20 ½	20 ½
FRAME	G	11 ½	11 ½	11 ½	17 ½	17 ½	17 ½	23 ½	23 ½	23 ½
WEIGHT IN POUNDS*										
FRAME AND COVER		60	60	60	110	110	110	155	155	155

*THE ACTUAL WEIGHT OF THE MANHOLE FRAME AND COVER MAY VARY WITHIN 5 PERCENT PLUS OR MINUS OF THE WEIGHTS SHOWN.

**NORMALLY USED LENGTHS. THE PROJECT ENGINEER SHALL DETERMINE IF PIPE LENGTHS, OTHER THAN THOSE SPECIFIED, SHALL BE USED, TO A MAXIMUM OF 48" (CONTINUOUS LENGTH, NON-SPLICED). THE ADDITIONAL LENGTH SHALL BE INCIDENTAL TO THE PULL BOX BID PRICE.

PULL BOX

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2022
DATE

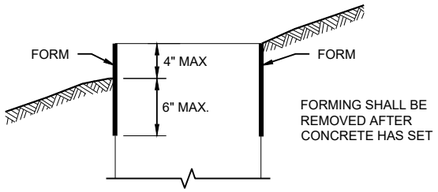
/S/ Ahmet Demirbilek
STATE ELECTRICAL ENGI 150

FHWA

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SDD 09B04 -12

FORM DEPTH SHALL BE NO MORE THAN 6" BELOW GRADE ON THE LOWER SIDE OF BASE



FORMING DETAIL

QUANTITY REQUIREMENTS	CONCRETE BASE TYPE		
	1	2	5 & 6
APPROX. CUBIC YARDS OF CONCRETE	0.40	0.57	0.40
LBS. OF HOOP BAR STEEL	NONE	23	16
LBS. OF VERTICAL BAR STEEL	NONE	60	18

GENERAL NOTES

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

BASES SHALL BE EXCAVATED BY USE OF A CIRCULAR AUGER.

TOP SURFACES OF CONCRETE BASES SHALL BE TROWEL FINISHED SMOOTH AND LEVEL.

CONDUIT SIZES AND LOCATIONS SHALL BE SHOWN ON THE PLANS

THE FINAL OR TERMINATING CONCRETE BASE IN A CONDUIT RUN SHALL HAVE A 6" EXIT STUB INSTALLED FOR FUTURE CABLING USE. THE EXIT STUB SHALL BE SIZED AS USED THROUGHOUT THE CONDUIT RUN AS SHOWN A THE ENTRANCE OF THE BASE.

ENDS OF CONDUIT INSTALLED BELOW GRADE FRO FUTURE USE SHALL BE CAPPED IF METALLIC OR PLUGGED IF NON-METALLIC.

MINIMUM BENDING RADIUS OF CONDUIT IS EQUAL TO 6X THE DIAMETER.

CONDUIT HEIGHT ABOVE CONCRETE BASES SHALL BE 1 INCH. ALL METALLIC CONDUIT ENDS SHALL BE REAMED AND THREADED.

ALL CONDUIT ENDS AT THE TOP OF CONCRETE BASES SHALL BE CAPPED IF METALLIC OR PLUGGED IF NON-METALLIC IMMEDIATELY AFTER PLACEMENT AND BEFORE CONCRETE IS POURED. CONDUITS IN WHICH WIRE OR CABLE IS NOT INSTALLED SHALL REMAIN CAPPED OR PLUGGED.

BELL ENDS SHALL BE INSTALLED ON ALL PVC CONDUIT EXPOSED AT THE TOP OF CONCRETE BASES BEFORE INSTALLATION.

WHEN REQUIRED TO CONNECT NON-METALLIC CONDUIT TO METALLIC CONDUIT, ONLY ADAPTER FITTINGS, U.L. LISTED FOR ELECTRICAL USE, SHALL BE USED.

IF A BASE REQUIRES A DEEP FORM BECAUSE OF LOOSE DIRT OR FILL, THE FORM SHALL BE REMOVED BEFORE BACKFILLING AROUND THE BASE. BACKFILL SHALL BE TAMPED TIGHT AGAINST THE BARE CONCRETE BASE IN LAYERS OF 1 FOOT OR LESS.

A NO. 4 AWG STRANDED COPPER EQUIPMENT GROUNDING CONDUCTOR SHALL BE EXOTHERMICALLY WELDED TO THE EQUIPMENT GROUNDING ELECTRODE (GROUND ROD) FOR TYPE 2, TYPE 5 AND TYPE 6 BASES.

THE EQUIPMENT GROUNDING CONDUCTOR SHALL BE FURNISHED AND INSTALLED TO ENTER ALL BASE TYPES THROUGH A 1 INCH CONDUIT INSTALLED FOR GROUNDING PURPOSES, LEAVING A 4 FOOT COIL OF WIRE ABOVE THE CONCRETE BASE. THE EQUIPMENT GROUNDING CONDUCTOR SHALL BE NEATLY COILED AND THE COILS TIED TOGETHER.

ANCHOR RODS SHALL BE THREADED 12" IN LENGTH ON EACH END OF THE ROD. ANCHOR RODS SHALL BE MANUFACTURED IN ACCORDANCE WITH SECTION 654.2.1 OF THE STANDARD SPECIFICATIONS.

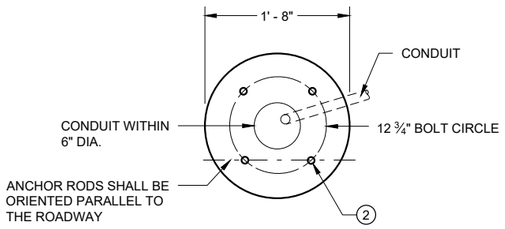
WASHERS AND LOCK WASHERS ARE REQUIRED ON ALL ANCHOR RODS.

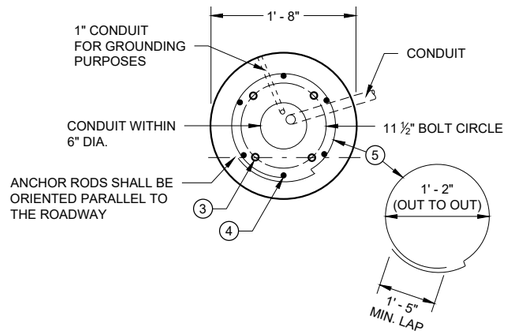
WHEN ANCHOR RODS USING THE ALTERNATE "L" BEND ARE FURNISHED, THE 4 INCH"L" BEND SHALL BE IN ADDITION TO THE SPECIFIED ANCHOR ROD BAR LENGTH. THE "L" BEND SHALL NOT BE THREADED.

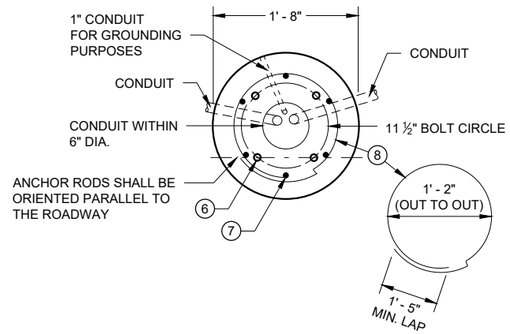
ANCHOR RODS SHALL BE INSTALLED WITH MISALIGNMENTS OF LESS THAN 1:40 FROM VERTICAL.

WELDING OF THE ANCHOR RODS TO THE CAGE IS UNACCEPTABLE. TIE WIRES SHALL BE USED.

BAR STEEL REINFORCEMENT SHALL BE COATED WITH POWDERED EPOXY RESIN IN ACCORDANCE WITH SECTION 505 OF THE STANDARD SPECIFICATIONS (LATEST EDITION).







1 THE MINIMUM DEPTH OF CONDUIT EXITING THE CONCRETE BASE AND INSTALLED BELOW THE TRAVELED WAY SHALL BE 24 INCHES. THE MINIMUM DEPTH OF CONDUIT EXITING THE CONCRETE BASE THAT IS NOT INSTALLED BELOW THE TRAVELED WAY SHALL BE 18 INCHES. THE MAXIMUM DEPTH OF ALL CONDUIT SHALL BE 36 INCHES EXCEPT WITH WRITTEN APPROVAL OF THE ENGINEER.

2 (4) 1" DIA. X 3' - 6" ANCHOR RODS.

3 (4) 1" DIA. X 5' - 0" ANCHOR RODS.

4 (6) NO. 6 X 6' - 8" BAR STEEL REINFORCEMENT.

5 (7) NO. 4 X 5' - 1" BAR STEEL REINFORCEMENT @ 1' - 0" C - C.

6 (4) 1" DIA. X 3' - 6" ANCHOR RODS.

7 (6) NO. 4 X 4' - 8" BAR STEEL REINFORCEMENT.

8 (5) NO. 4 X 5' - 1" BAR STELL REINFORCEMENT @ 1' - 0" C -C.

9 EXOTHERMIC CONNECTION TO EUIPMENT GROUNDING CONDUCTOR

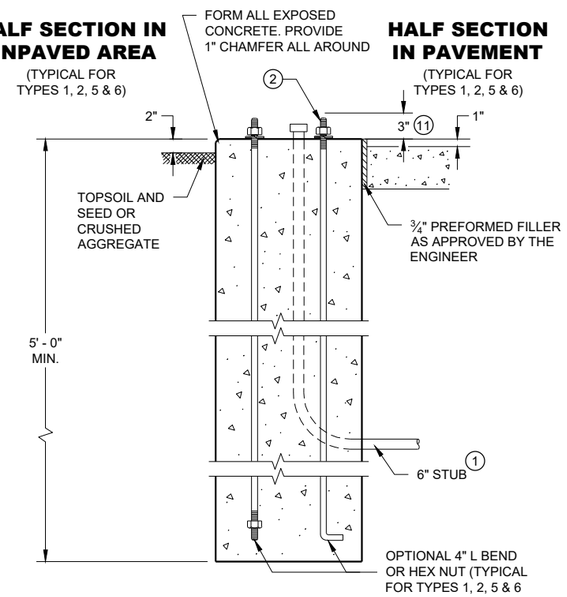
10 ⅝" DIA. X 8' -0" COPPERCLAD EQUIPMENT GROUNDING ELECTRODE REQUIRED

11 ANY ANCHOR ROD PROJECTION SHORTER THAN 2 ¾" OR LONGER THAN 3 ¼" SHALL REQUIRE THE BASE TO BE REMOVED AND REPLACED AT THE CONTRACTORS EXPENSE.

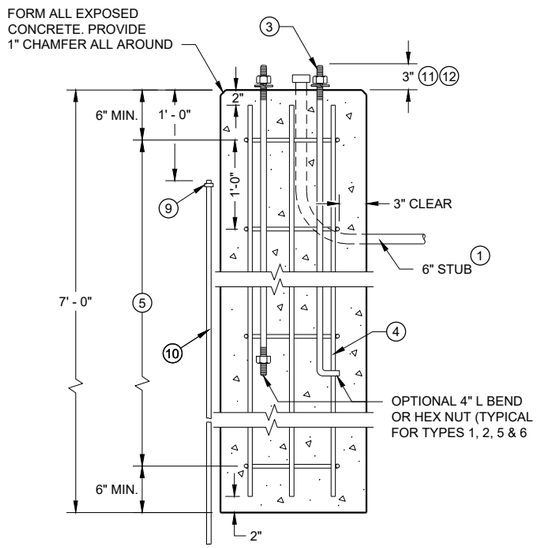
12 FOR NON - BREAKAWAY INSTALLATIONS, 4 ½" ± ANCHOR ROD PROJECTION WITH THE USE OF LEVELING NUTS. RODENT SCREEN REQUIRED.

HALF SECTION IN UNPAVED AREA
(TYPICAL FOR TYPES 1, 2, 5 & 6)

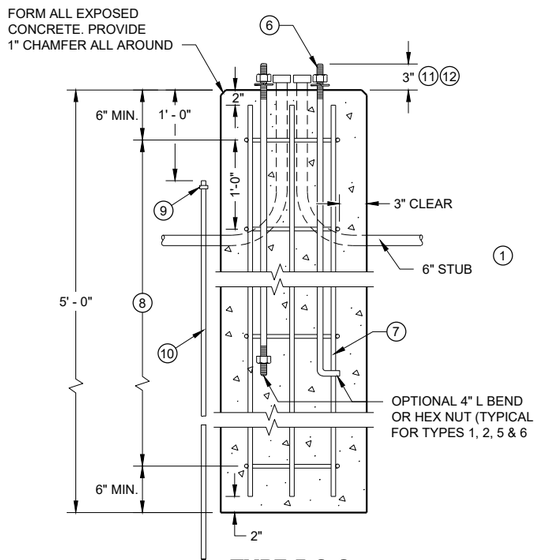
HALF SECTION IN PAVEMENT
(TYPICAL FOR TYPES 1, 2, 5 & 6)



TYPE 1



TYPE 2



TYPE 5 & 6

CONCRETE BASES

CONCRETE BASES
TYPES 1, 2, 5, & 6

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2019
DATE
/S/ Ahmet Demirbilek
STATE ELECTRICAL ENGI

FHWA

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GENERAL NOTES

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

FOUR (4) BOLTS SHALL BE FURNISHED WITH EACH TRANSFORMER BASE. BOLTS SHALL BE 1" DIAMETER, 4" IN LENGTH, WITH WASHERS, LOCK WASHERS AND NUTS. BOLTS, NUTS AND WASHERS SHALL BE MANUFACTURED IN ACCORDANCE WITH SECTION 531.2.2 OF THE STANDARD SPECIFICATIONS.

LEVELING SHIMS, IF NEEDED, SHALL BE DESIGNED FOR THE PURPOSE AND USED UNDER CAST BASES WHEN PLUMBING POLES OR STANDARDS DURING INSTALLATION. THE USE OF WASHERS IN LIEU OF PROPER LEVELING SHIMS IS NOT ACCEPTABLE.

SHIM LENGTH SHALL BE LONG ENOUGH TO COMPLETELY COVER THE AREA UNDER THE LENGTH AND WIDTH OF THE BASE MOUNTING FLANGE.

DOUBLE NUTTING IS NOT ACCEPTABLE FOR LEVELING OR MOUNTING PURPOSES.

A NEMA APPROVED, U.L. LISTED, COPPER WITH BRASS OR STAINLESS STEEL SET SCREW, DIRECT BURY RATED, MECHANICAL CONNECTOR (LUG), SIZED TO ACCEPT AWG. #10 TO #4 COPPER STRANDED WIRE SHALL BE FURNISHED AND INSTALLED IN THE PEDESTAL AND TRANSFORMER BASES.

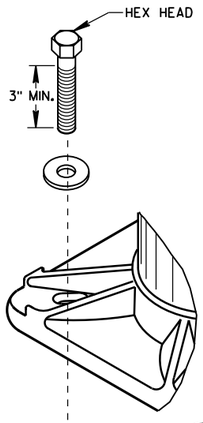
THE MECHANICAL CONNECTOR SHALL BE INSTALLED USING A 1/4" - 20 (TPI) STAINLESS STEEL HEX HEAD BOLT OF SUFFICIENT LENGTH TO FIRMLY ATTACH THE LUG TO THE BASE.

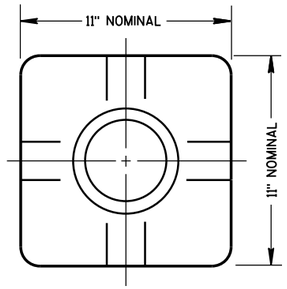
SHOULD THE MANNER OF ATTACHMENT OF THE LUG REQUIRE WASHERS, HEX NUTS, LOCK WASHER - THEY SHALL BE STAINLESS STEEL AS IS THE BOLT. THE MANNER OF ATTACHMENT SHALL NOT BLOCK ACCESSIBILITY TO WIRE PLACEMENT IN THE CONNECTOR.

PEDESTAL BASE COLLAR THREADING SHALL BE TAPERED AND IN ACCORDANCE WITH NATIONAL PIPE THREADING DIMENSIONS.

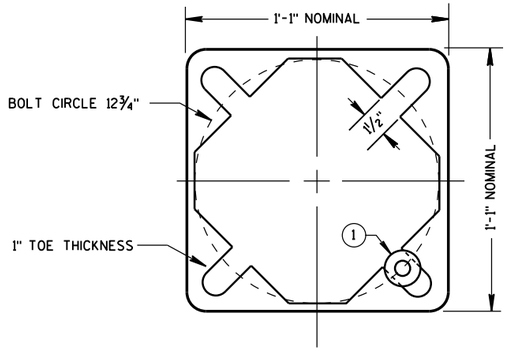
BASE COLLAR THREADING SHALL EXTEND INTO THE BASE COLLAR WITH SUFFICIENT DEPTH TO ACCEPT THE INSTALLATION OF TRAFFIC SIGNAL STANDARDS TO A DEPTH OF 1 1/2", THEN TIGHTENING TO A POINT OF BEING IMMOVABLE.

THE ACCESS DOOR SHALL BE OF THE SAME MATERIAL AS THE BASE.

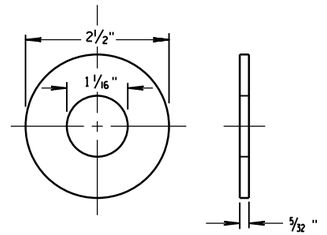




TOP VIEW
(PEDESTAL BASE)

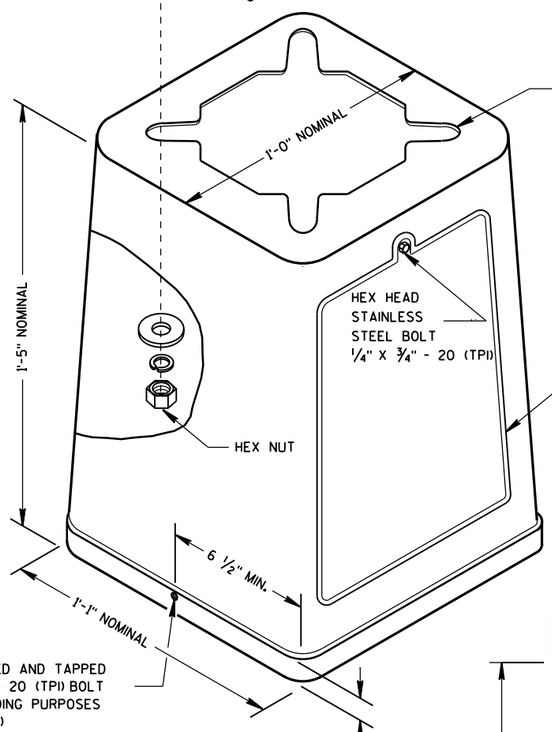


BOTTOM VIEW
(PEDESTAL BASE)

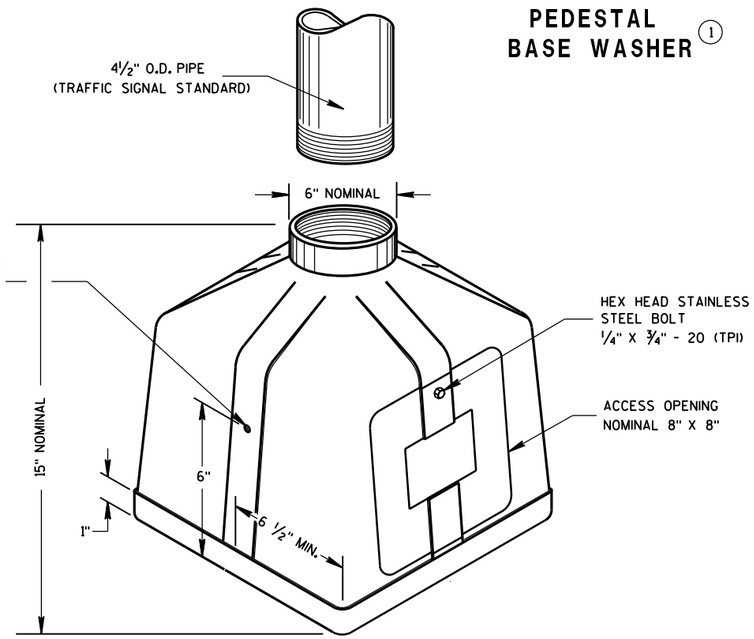


ZINC COATED STEEL WASHER
TO BE PROVIDED BY THE CONTRACTOR

PEDESTAL BASE WASHER (1)

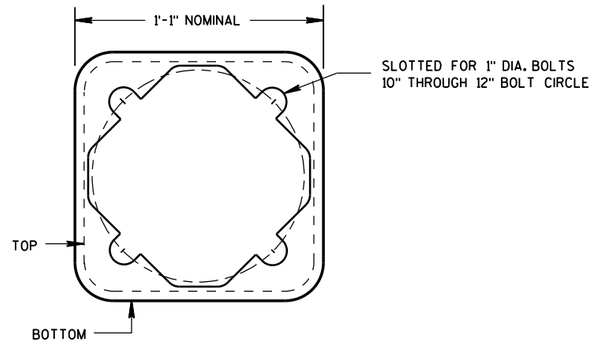


ISOMETRIC VIEW

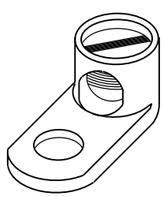


ISOMETRIC VIEW

PEDESTAL BASE



BOTTOM VIEW
(TRANSFORMER BASE)

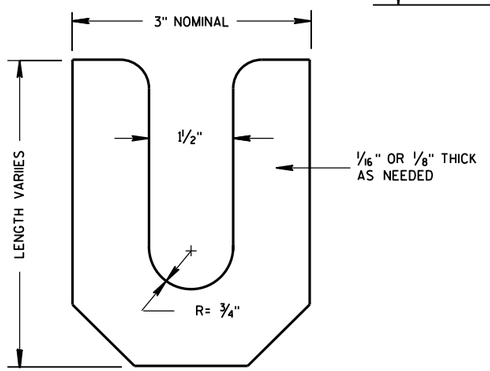


TYPICAL MECHANICAL CONNECTOR LUG

TO BE FURNISHED WITH EACH BASE

TRANSFORMER BASE

INTENDED FOR USE WITH TYPE 2, 3, 4, 5 & 6 POLES



LEVELING SHIM

TRANSFORMER/PEDESTAL BASES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

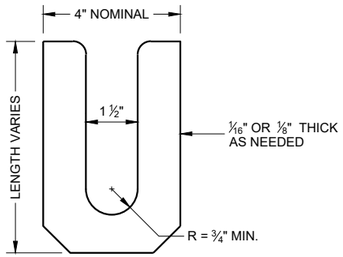
APPROVED
Sept. 2014 — DATE
/S/ Ahmet Demirbilek — STATE ELECTRICAL
FHWA

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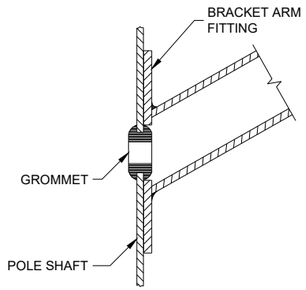
S.D.D. 9 C 3-4

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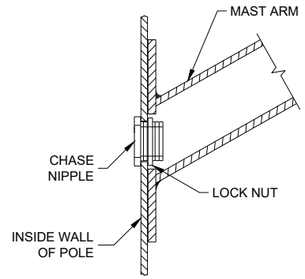
S.D.D. 9 C 3-4



LEVELING SHIM (1)
SHALL BE ALUMINUM



TYPICAL APPLICATION OF GROMMET IN POLE SHAFT



TYPICAL APPLICATION OF CHASE NIPPLE IN POLE SHAFT

GENERAL NOTES

CLAMP BOLT-NUT TIGHTENING TORQUE SHALL BE INDICATED BY INDENT STAMPING (1/2 INCH NUMERALS AND LETTERS) OR WEATHERPROOF PRINTING ON THE INSIDE OF THE CLAMP THAT IS WELDED TO THE ARM MEMBER.

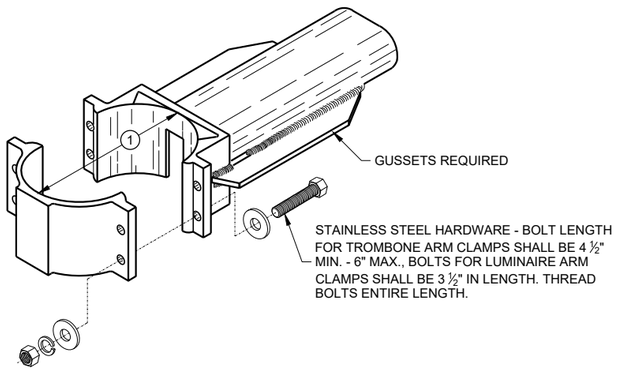
(1) 4.5" I.D. FOR LUMINAIRE MAST ARM CLAMP. 6.625" I.D. FOR TROMBONE MAST ARM CLAMP.

(2) INDIVIDUAL BASE PLATE ANCHOR ROD COVERS. (4 REQUIRED)

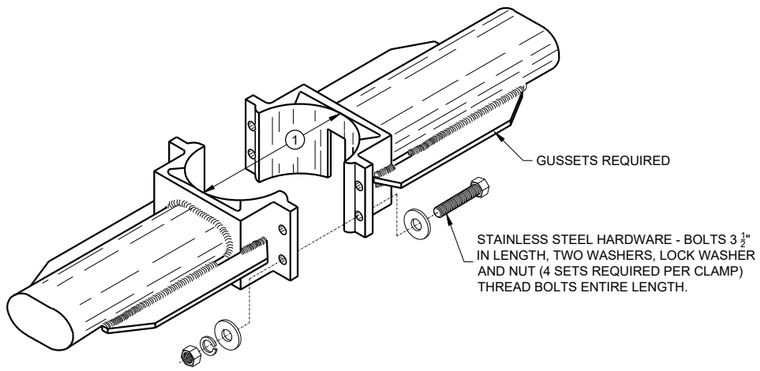
(3) BASE PLATE SLOTTED TO ACCEPT 11" THROUGH 12" BOLT CIRCLE USING 1" DIAMETER ANCHOR RODS.

(4) LEVELING SHIMS, DESIGNED FOR THE PURPOSE, SHALL BE USED WHEN PLUMBING POLES. THE USE OF WASHERS IN LIEU OF PROPER LEVELING SHIMS IS NOT ACCEPTABLE. LEVELING SHIMS SHALL BE USED ONLY BETWEEN THE TOP OF THE CONCRETE BASE AND A METALLIC BASE PLATE.

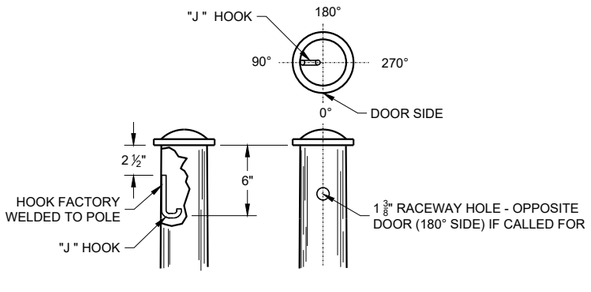
SHIMS SHALL BE LONG ENOUGH AND WIDE ENOUGH TO COMPLETELY COVER THE AREA UNDER THE LENGTH AND WIDTH OF THE BASE MOUNTING FLANGE.



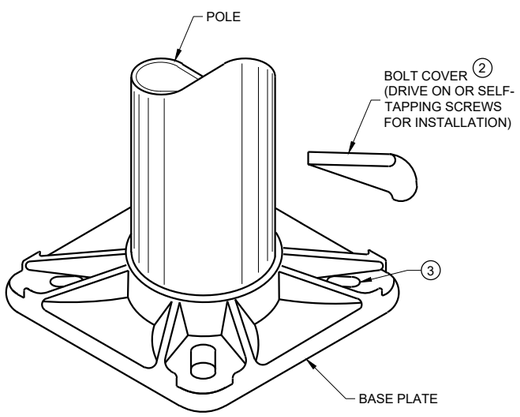
TYPICAL TROMBONE MAST ARM AND SINGLE LUMINAIRE MAST ARM MOUNTING CLAMP



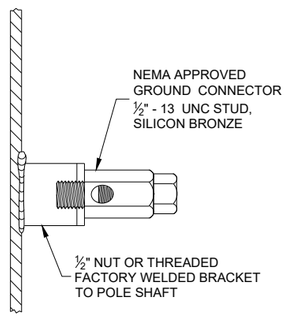
TYPICAL LUMINAIRE MAST ARM (DOUBLE) MOUNTING BRACKETS

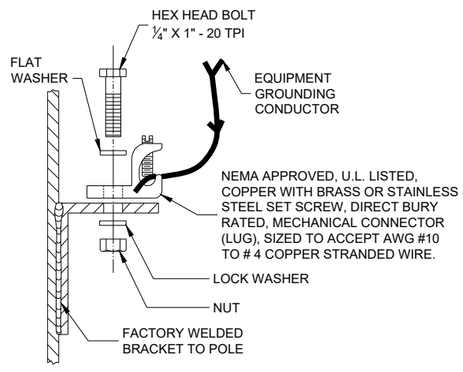


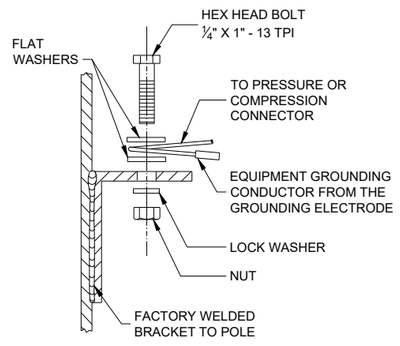
TYPICAL "J" HOOK LOCATION



BASE PLATE







TYPICAL GROUNDING CONNECTIONS
NUT, BOLT AND WASHERS SHALL BE STAINLESS STEEL

HARDWARE DETAILS FOR POLE MOUNTING

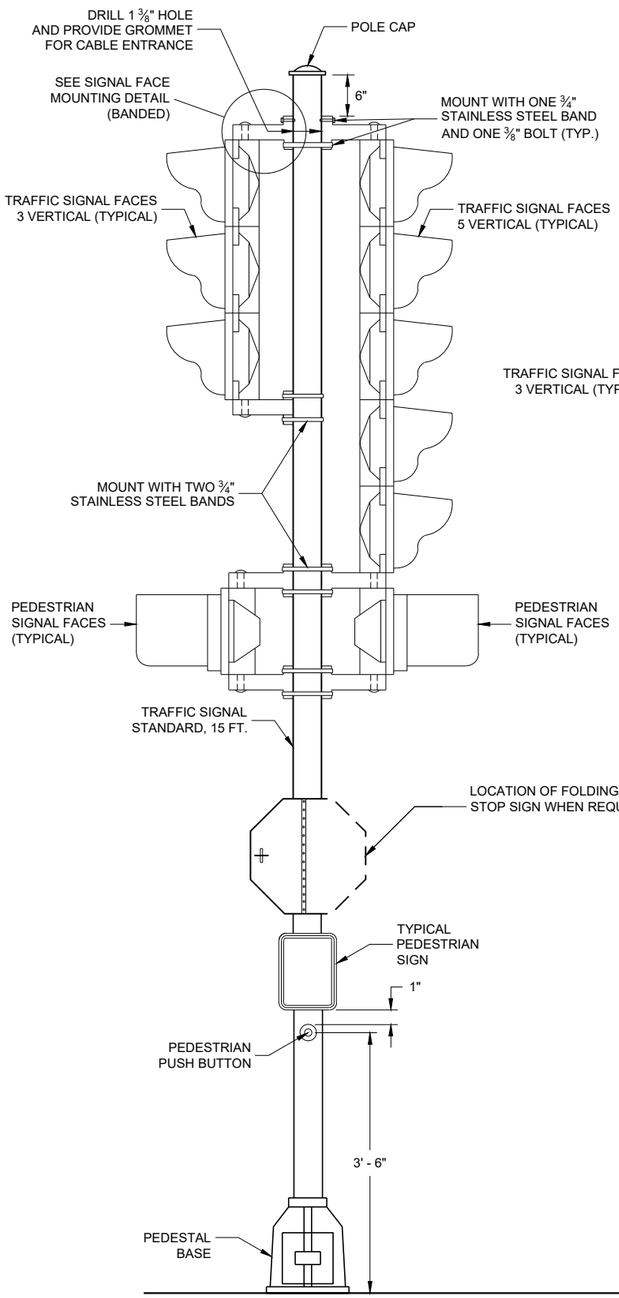
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
November 2018
DATE

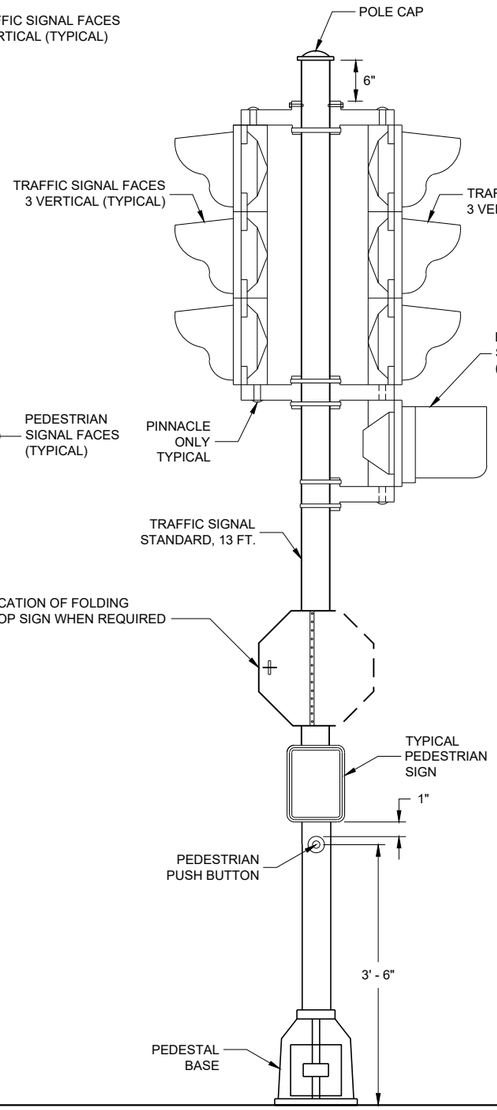
/S/ Ahmet Demirbilek
STATE ELECTRICAL ENGI 153

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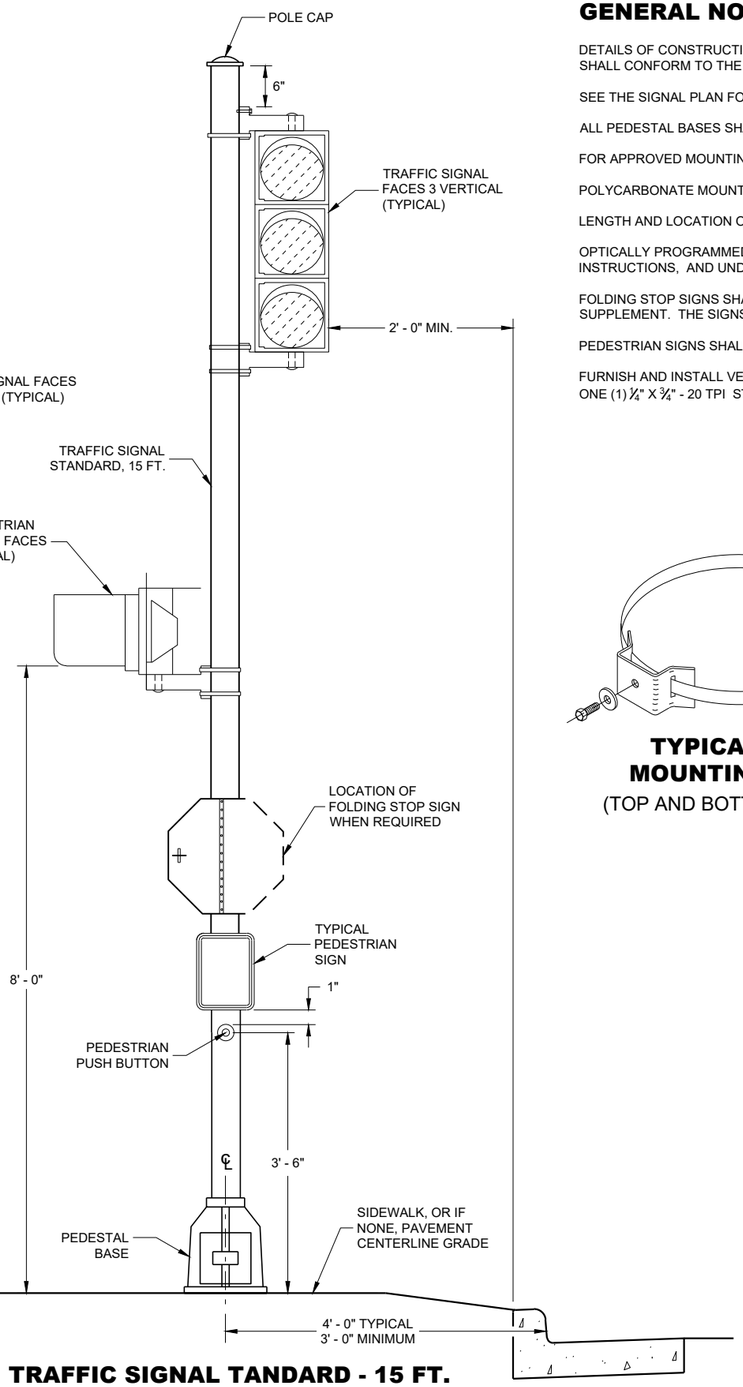
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SDD 09E01 - 15g



TRAFFIC SIGNAL STANDARD - 15 FT.



TRAFFIC SIGNAL STANDARD - 13 FT.



TRAFFIC SIGNAL TANDARD - 15 FT.
3M MOUNTING (TYPICAL)

GENERAL NOTES

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

SEE THE SIGNAL PLAN FOR REQUIRED SIGNAL FACE SIZES.

ALL PEDESTAL BASES SHALL BE MOUNTED ON CONCRETE BASE - TYPE 1.

FOR APPROVED MOUNTING HARDWARE, SEE THE CONTRACT SPECIAL PROVISIONS.

POLYCARBONATE MOUNTING BRACKETS SHALL BE USED.

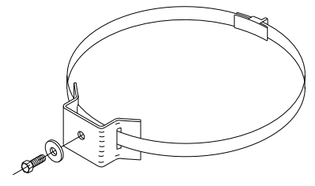
LENGTH AND LOCATION OF TRAFFIC SIGNAL STANDARDS SHALL BE AS SHOWN ON THE PLANS.

OPTICALLY PROGRAMMED SIGNAL FACES SHALL BE MASKED IN ACCORDANCE WITH MANUFACTURERS INSTRUCTIONS, AND UNDER THE DIRECTIONS OF THE REGION TRAFFIC ENGINEER.

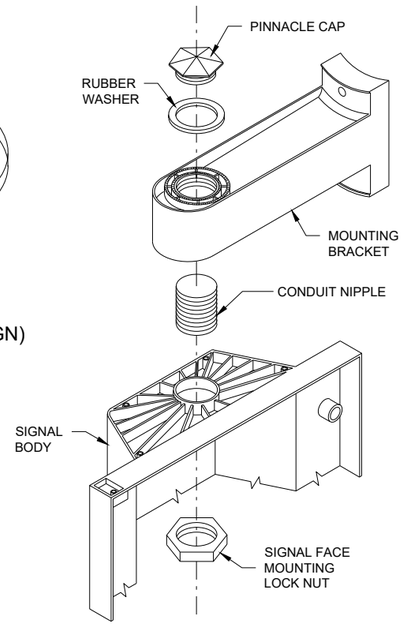
FOLDING STOP SIGNS SHALL BE IN ACCORDANCE WITH THE MUTCD AND/OR THE LATEST WISCONSIN SUPPLEMENT. THE SIGNS SHALL BE SIZED AND LOCATED AS CALLED FOR IN IN THE PLANS.

PEDESTRIAN SIGNS SHALL BE AS DESIGNATED IN THE PLANS.

FURNISH AND INSTALL VENTILATED, CAST, METALLIC (ALUMINUM ALLOY) CAPS. FASTEN CAPS WITH ONE (1) 1/4" X 3/4" - 20 TPI STAINLESS STEEL, HEX HEAD BOLT.



TYPICAL SIGN MOUNTING BAND
(TOP AND BOTTOM OF SIGN)



SIGNAL FACE MOUNTING DETAIL (BANDED)

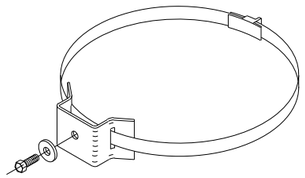
TRAFFIC SIGNAL STANDARD POLY BRACKET MOUNTINGS (TYPICAL) 13 FT. OR 15 FT.

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

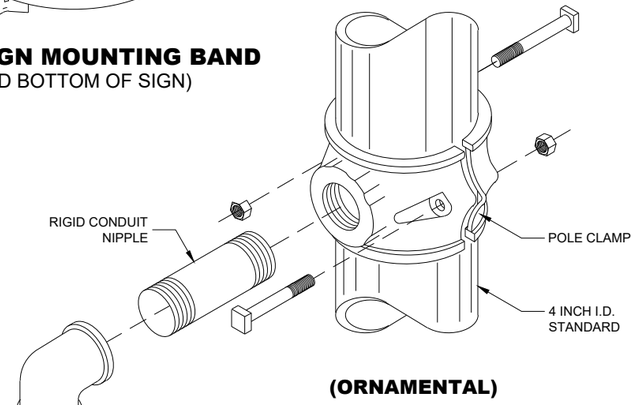
APPROVED
2/28/2013
DATE
/S/ Ahmet Demirbilek
STATE ELECTRICAL ENGI 154

FHWA

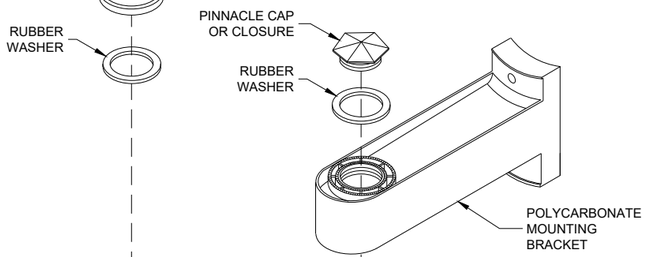
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SDD 09E06 - 05



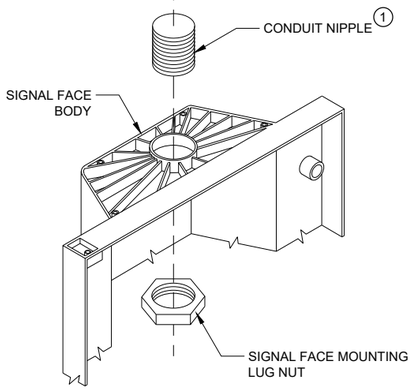
TYPICAL SIGN MOUNTING BAND
(TOP AND BOTTOM OF SIGN)



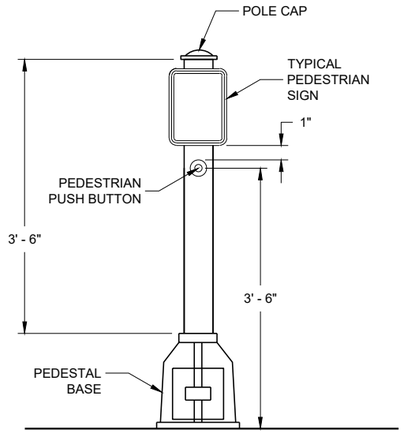
(ORNAMENTAL)



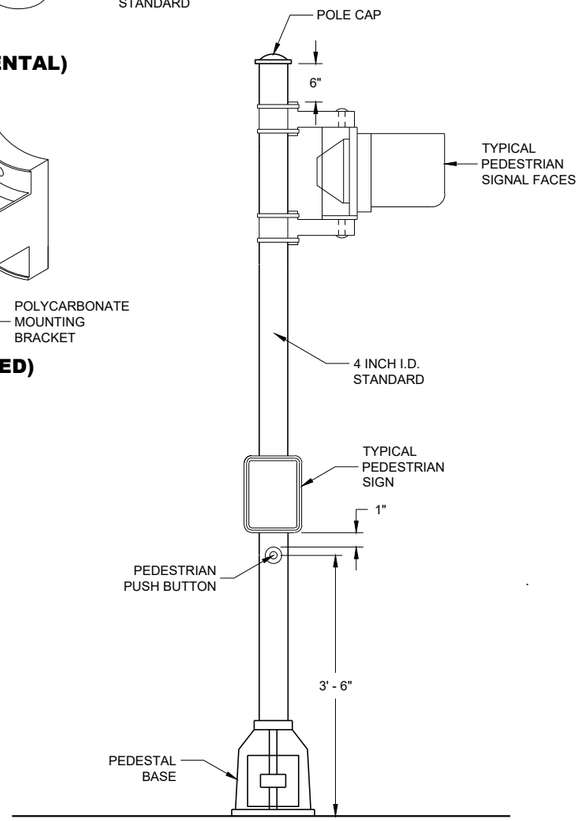
(BANDED)



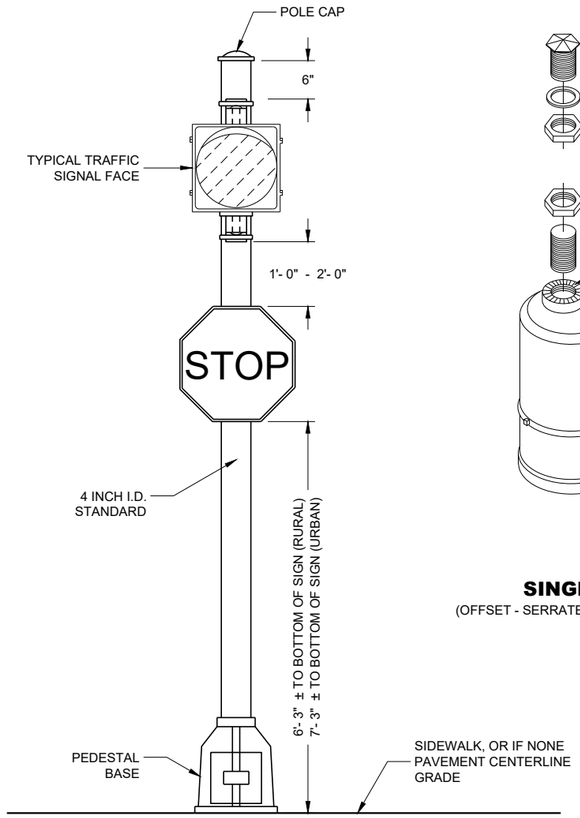
SIGNAL FACE MOUNTING DETAILS



PEDESTRIAN PUSH BUTTON TYPICAL MOUNTING



PEDESTRIAN FACE STANDARD - 10 FT.
(WALK - DON'T WALK)



STANDARD FLASHER
10 FOOT, 13 FOOT OR 15 FOOT AS REQUIRED

GENERAL NOTES

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

SEE THE SIGNAL PLAN FOR REQUIRED SIGNAL FACE SIZES.

LOCATIONS SHALL BE AS SHOWN ON THE PLANS, UNLESS APPROVED BY THE ENGINEER IN THE FIELD.

ALL PEDESTAL BASES SHALL BE MOUNTED ON CONCRETE BASE - TYPE 1.

FOR APPROVED MOUNTING HARDWARE, SEE THE CONTRACT SPECIFICATIONS.

POLYCARBONATE SIGNAL FACE MOUNTING BRACKETS SHALL BE USED UNLESS ORNAMENTAL POLE CLAMPS ARE SPECIFIED.

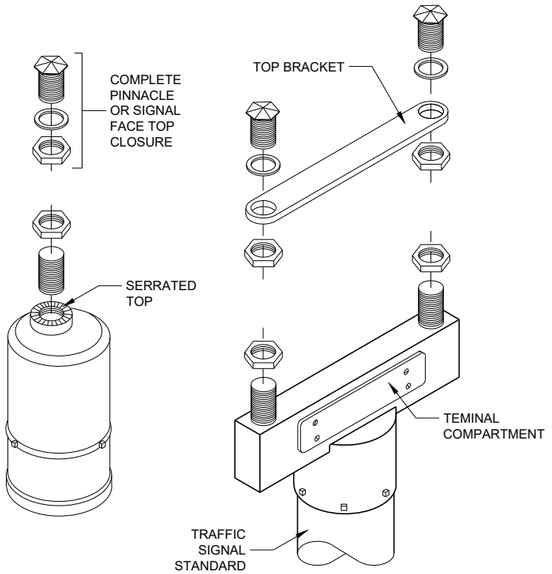
LENGTH OF TRAFFIC STANDARDS SHALL BE AS SHOWN ON THE PLANS.

MOUNTINGS AND BRACKETS SHALL BE AS SHOWN ON THE PLANS OR DESCRIBED IN THE SPECIAL PROVISIONS (BY THE REGION TRAFFIC ENGINEER).

PEDESTRIAN SIGNS SHALL BE AS DESIGNATED IN THE PLANS.

FURNISH AND INSTALL VENTILATED, CAST, METALLIC (ALUMINUM ALLOY) CAPS. FASTEN CAPS WITH ONE (1) ¼" X ¾" - 20 TPI STAINLESS STEEL, HEX HEAD BOLT.

(1) USE 1 ½" ID NIPPLES ZINC-COATED RIGID METAL CONDUIT, LONG ENOUGH TO ACCOMMODATE FULL DEPTH THREADING INTO THE HEAD MOUNTING LOCK NUT IN ORDER TO TIGHTEN THE FACE, BUT THAT DO NOT INTERFERE WITH REFLECTOR CLOSURE. THREAD THE NIPPLE INTO THE MOUNTING BRACKET/ELBOW UNTIL TIGHT. USE APPROVED PINNACLE TYPE HARDWARE FROM A DEPARTMENT APPROVED MANUFACTURER TO CLOSE THE UNUSED 1 ½" OPENING IN SIGNAL FACESAND BRACKET ENDS.



SINGLE
(OFFSET - SERRATED MOUNTING)

DOUBLE
(SERRATED MOUNTING)

SLIPFITTERS

TRAFFIC SIGNAL STANDARD
PEDESTRIAN AND FLASHER
TYPICAL MOUNTING DETAILS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

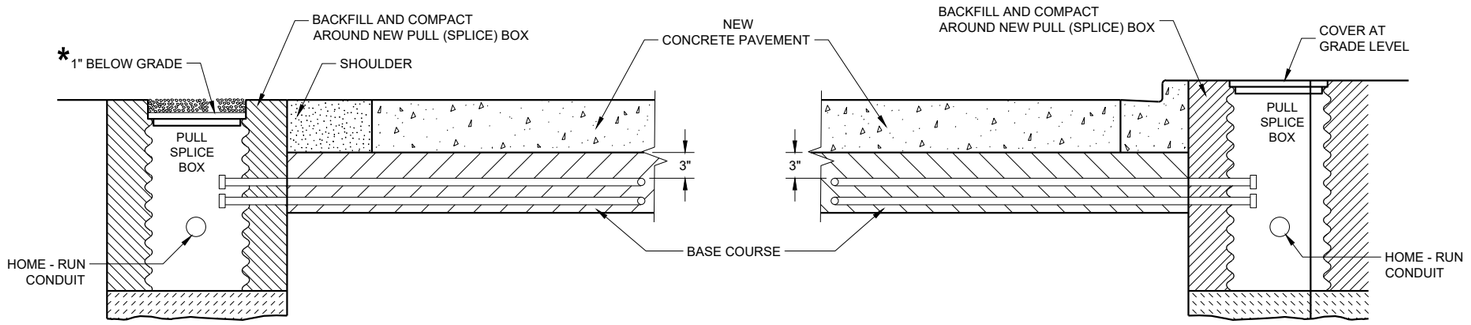
APPROVED
November 2018
DATE

/S/ Ahmet Demirbilek
STATE ELECTRICAL ENGI

FHWA

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SDD 09E07 - 06



SECTION A - A
NO CURB AND GUTTER

SECTION B - B
CURB AND GUTTER

*RECESS PULL (SPLICE) BOX SO THAT THE COVER IS 3" BELOW GRADE IN SHOULDER AREAS OF CRUSHED AGGREGATE. BACKFILL OVER COVER WITH THE CRUSHED AGGREGATE TO BRING THE AREA TO GRADE LEVEL.

LOOP DETECTOR INSTALLATION DETAIL

GENERAL NOTES

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

PITCH LEAD OUT CONDUIT TO DRAIN TO ROADSIDE PULL (SPLICE) BOX.

LOOP SIZE, LOCATION, NUMBER OF TURNS OF WIRE AND ASSOCIATED SIGNAL PHASE SHALL BE AS SHOWN ON THE PLANS.

SPLICES SHALL BE INSTALLED BY USING CAST IN PLACE SPLICE KITS LISTED ON THE DEPARTMENTS APPROVED PRODUCTS LIST OR AN ENGINEER APPROVED EQUAL. NON-INSULATED BUTT SPLICES TO FIT #12 AWG STRANDED WIRE SHALL BE USED. SPLICES SHALL BE SOLDERED AND INSULATED FROM EACH OTHER AS PER INSTRUCTIONS INCLUDED IN THE SPLICE KIT.

MEASURE GROUND RESISTANCE USING A MEGGER. REPLACE LOOP WIRE NOT ATTAINING A READING OF INFINITY TO GROUND.

AFTER SPLICING THE LOOP WIRE TO THE LOOP LEAD-IN CABLE, THE CONTRACTOR SHALL MEASURE INDUCTANCE, GROUND RESISTANCE AND WIRE RESISTANCE AT THE CABINET END OF THE LEAD-IN CABLE AND FURNISH A COPY OF THE READING TO THE PROJECT ENGINEER FOR EVALUATION.

LOOP DETECTOR LEADS SHALL BE IDENTIFIED WITH THEIR ASSOCIATED LOOP BY USE OF WATERPROOF TAGS AT BOTH ENDS OF THE CABLE. A LISTING OF THE CABLE IDENTIFICATION PER INDIVIDUAL LOOP LEAD-IN SHALL BE PLACED IN THE CABINET.

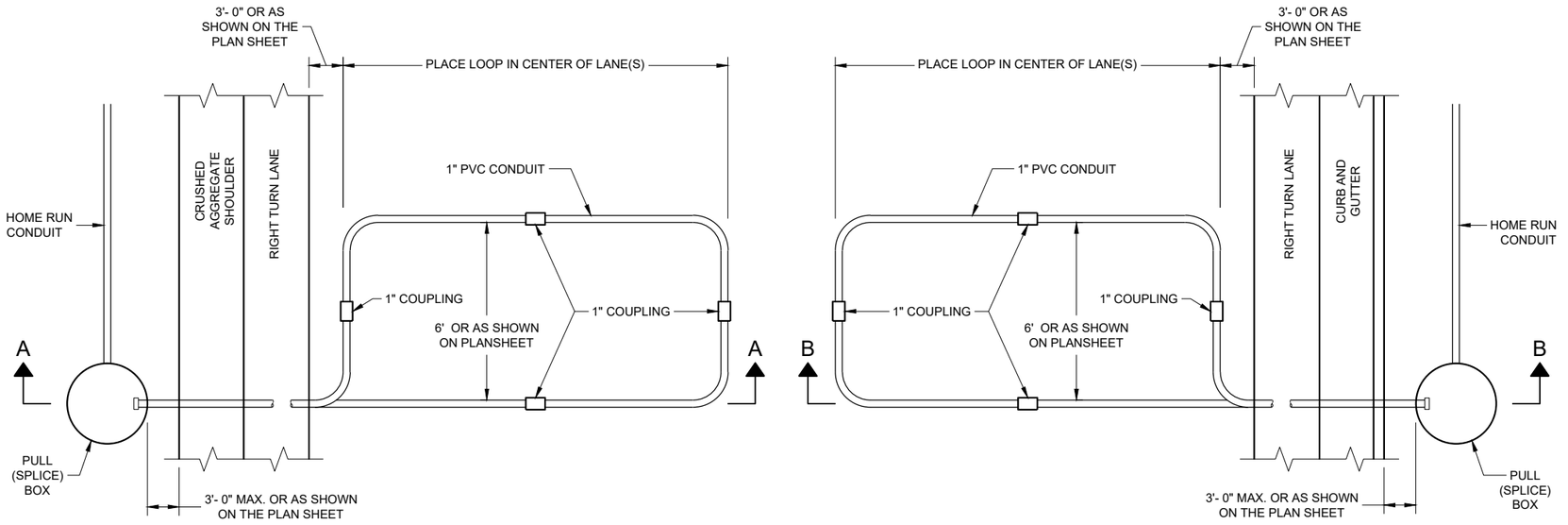
THE #12 AWG LOOP WIRE IN THE PULL (SPLICE) BOX SHALL BE HAND TWISTED AT LEAST 3 TWISTS PER FOOT BEFORE BEING SPLICED TO THE LOOP LEAD-IN CABLE.

SPLICES OF LOOP WIRE TO LEAD-IN CABLE SHALL BE MADE ONLY IN PULL (SPLICE) BOXES AT THE SIDE OF THE ROAD.

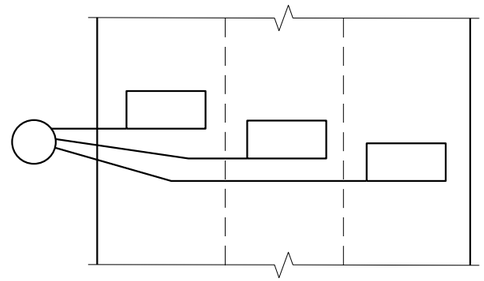
THE #12 AWG LOOP WIRE SHALL BE INSTALLED FROM THE ROADSIDE PULL (SPLICE) BOX, THROUGH THE LOOP CONDUIT, BACK TO THE ROADSIDE PULL (SPLICE) BOX, AND BE INSTALLED IN ONE NON-SPLICED, CONTINUOUS LENGTH.

PROTECTION OF THE CONDUIT IN THE BASE COURSE SHALL BE REQUIRED AFTER INSTALLATION AND BEFORE NEW PAVEMENT IS INSTALLED.

SHOULD INSTALLATION REPAIR BE REQUIRED, IT SHALL BE DONE UNDER THE DIRECTION OF THE PROJECT ENGINEER.



TYPICAL PLAN LOOP DETECTOR
WITH 24" PULL (SPLICE) BOX



MULTI-LANE
INSTALLATION

LOOP DETECTOR INSTALLED IN BASE COURSE WITH PULL (SPLICE) BOX OFF ROADWAY (OPTION 2)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
September 2014
DATE
/S/ Ahmet Demirbilek
STATE ELECTRICAL ENGI

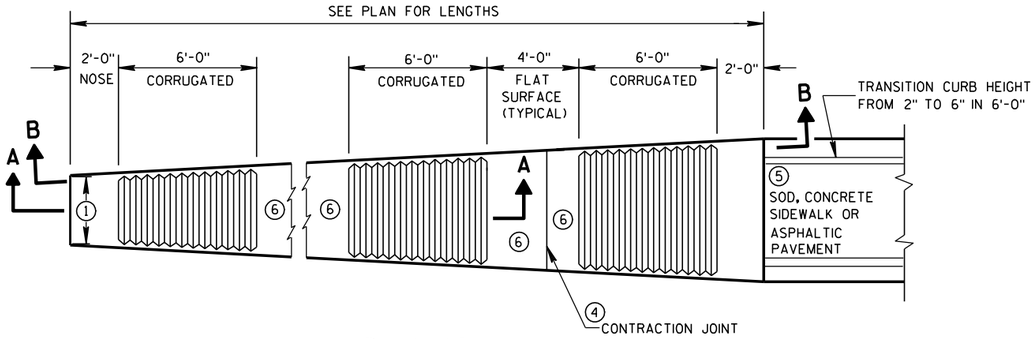
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SDD 09F15 - 04b

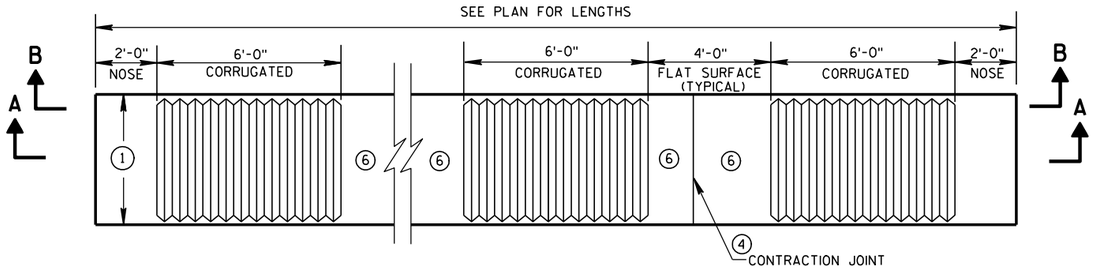
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SDD 09F15 - 04b



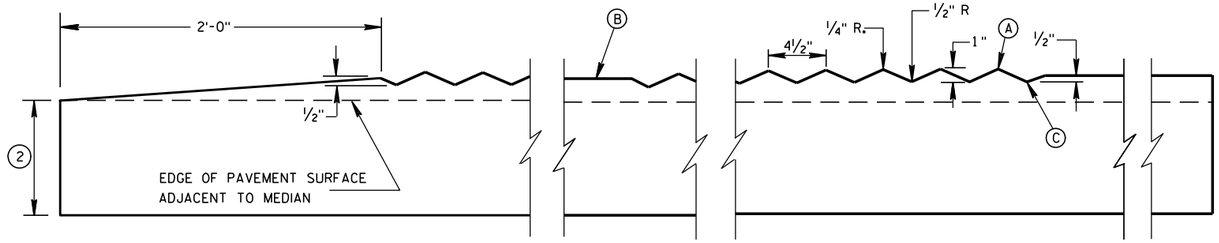
PLAN VIEW

VARIABLE WIDTH CONCRETE CORRUGATED MEDIAN



PLAN VIEW

UNIFORM WIDTH CONCRETE CORRUGATED MEDIAN



SECTION A-A

LONGITUDINAL SECTION

GENERAL NOTES

(1) SEE PLANS FOR CONSTANT OR VARIABLE WIDTH.

(2) THE DEPTH OF THE CONCRETE CORRUGATED MEDIAN SHALL BE 9-INCHES UNLESS SHOWN OTHERWISE IN THE PLAN.

ADJACENT PAVEMENT STRUCTURE DETAILS ARE SHOWN IN THE PLAN. TYPICAL OPTIONS ARE:

(1) NEW OR EXISTING CONCRETE PAVEMENT.

(2) ASPHALTIC CONCRETE OVER NEW OR EXISTING CONCRETE BASE COURSE, OR PAVEMENT.

(3) ASPHALTIC PAVEMENT OVER BASE AGGREGATE DENSE.

(3) TIE BARS OR PAVEMENT TIES REQUIRED IN NEW CONCRETE PAVEMENT OR CONCRETE BASE COURSE. TIE BARS SHALL BE NO. 4 X 2'-0" SPACED AT 2'-0" C-C.

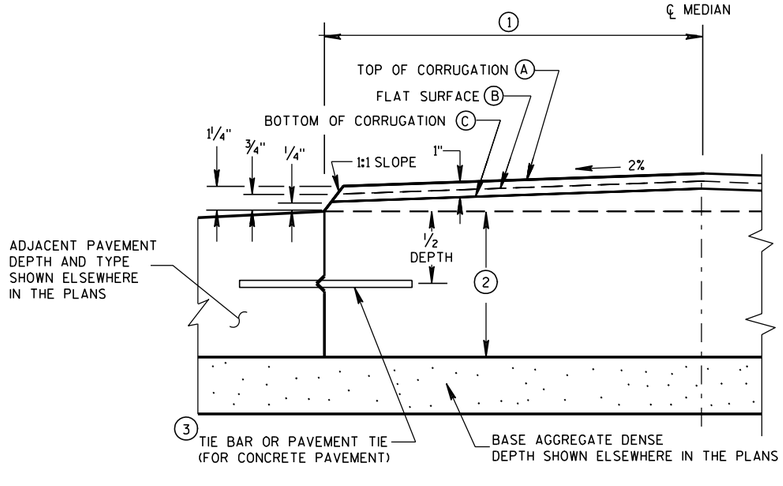
INSTALL TIE BARS TO MAINTAIN A MINIMUM OF 3-INCHES OF COVER BETWEEN THE TIE BAR AND THE CONCRETE SURFACE (BOTTOM AND TOP).

PAVEMENT TIES REQUIRED IN EXISTING CONCRETE PAVEMENT OR CONCRETE BASE COURSE, PAVEMENT TIES SHALL BE NO. 6 X 1'-0" SPACED AT 3'-0" C-C INSTALLED ON A HORIZONTAL SKEW OF 6:1. THE DIRECTION OF SKEW SHALL ALTERNATE AFTER EVERY ONE OR TWO BARS.

(4) CONCRETE CORRUGATED MEDIAN CONTRACTION JOINTS SHALL BE CONSTRUCTED TO MATCH THE JOINTS IN ADJACENT CONCRETE PAVEMENT. WHERE ADJACENT PAVEMENT IS ASPHALT WITH BASE AGGREGATE DENSE. TRANSVERSE CONTRACTION JOINTS SHALL BE PROVIDED AT 20 FOOT INTERVALS.

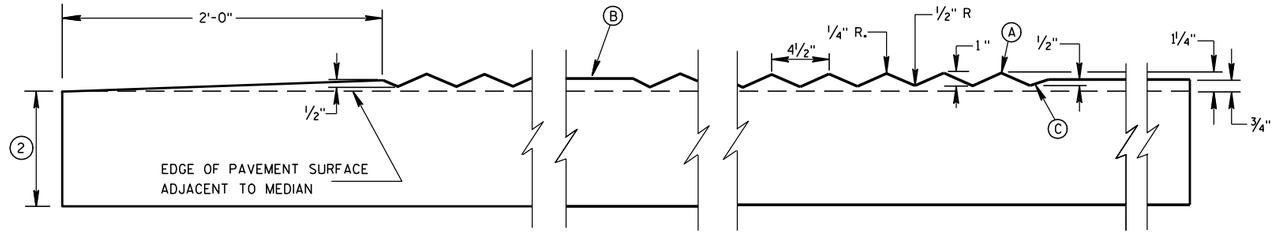
(5) SURFACE TYPE AND DETAILS ARE DEFINED ELSEWHERE IN THE PLAN.

(6) YELLOW MARKING ON FLAT SURFACE WHEN MEDIAN SEPARATES OPPOSING TRAFFIC.



HALF CROSS SECTION

(2) CONCRETE CORRUGATED MEDIAN AND ADJACENT PAVEMENT



SECTION B-B

LONGITUDINAL SECTION

CONCRETE CORRUGATED MEDIAN

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

12/17/07
DATE

/S/ Jerry H. Zogg
ROADWAY STANDARDS DEVELOPMENT ENGINEER

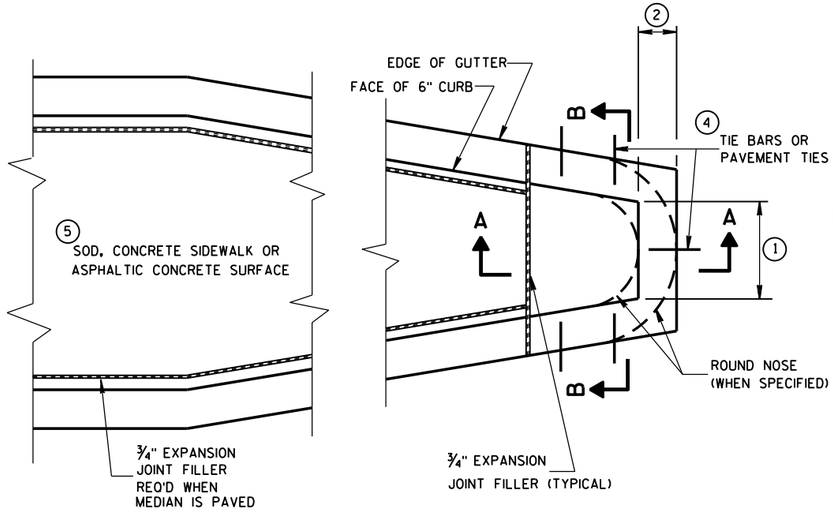
FHWA

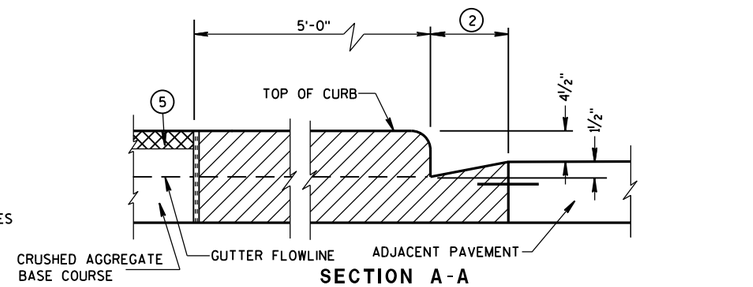
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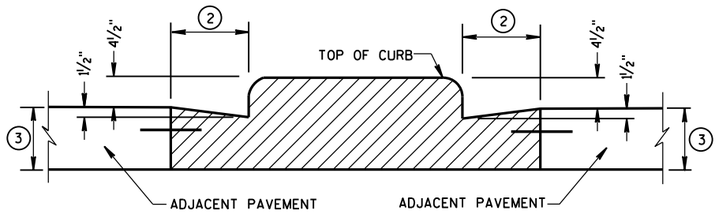
S.D.D. 11 B 1-5

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S.D.D. 11 B 1-5







CONCRETE MEDIAN BLUNT NOSE DETAIL

GENERAL NOTES

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

(1) SEE PLAN FOR MEDIAN NOSE WIDTH AND RADIUS (FOR ROUND NOSE ALTERNATE).

(2) WIDTH OF GUTTER TO MATCH EXISTING ADJACENT GUTTER OR AS SPECIFIED ELSEWHERE IN THE PLAN.

(3) DEPTH EQUAL TO ADJACENT PAVEMENT. ADJACENT PAVEMENT STRUCTURE DETAILS ARE SHOWN ON THE PLAN. TYPICAL OPTIONS ARE:

(1) NEW OR EXISTING CONCRETE PAVEMENT.

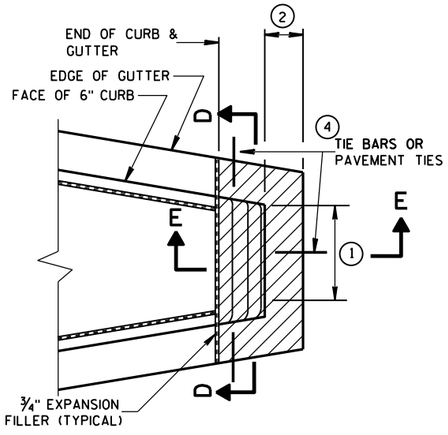
(2) ASPHALTIC CONCRETE PAVEMENT OVER NEW OR EXISTING CONCRETE BASE COURSE.

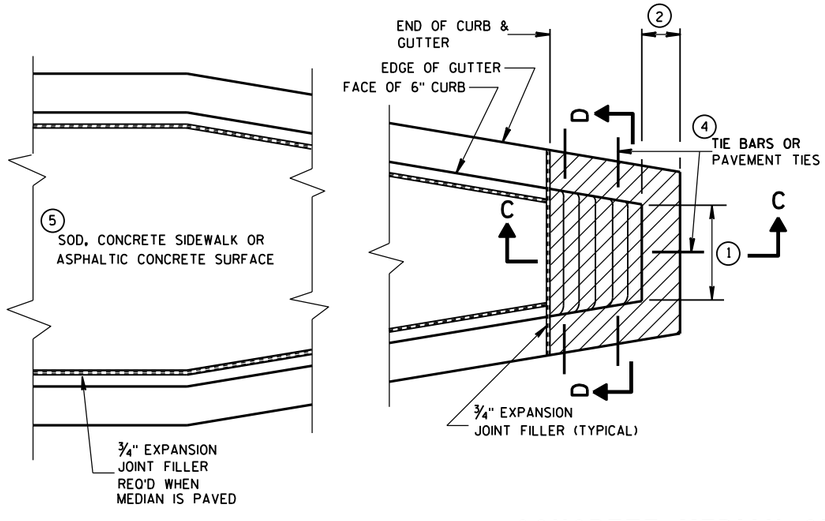
(3) ASPHALTIC CONCRETE PAVEMENT OVER CRUSHED AGGREGATE BASE COURSE.

(4) TIE BARS OR PAVEMENT TIES REQUIRED IN NEW CONCRETE PAVEMENT OR CONCRETE BASE COURSE. TIE BARS SHALL BE NO. 4 X 2'-0" SPACED AT 2'-0" C-C.

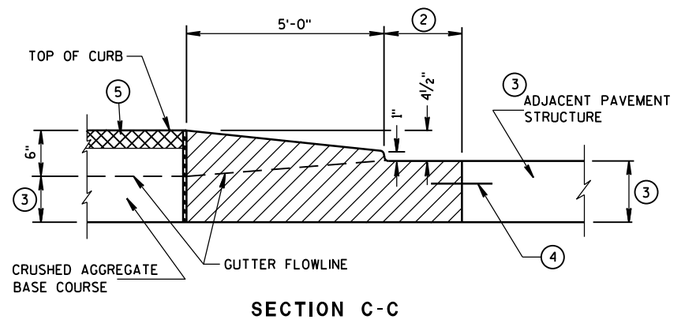
PAVEMENT TIES REQUIRED IN EXISTING CONCRETE BASE COURSE. PAVEMENT TIES SHALL BE NO. 6 X 1'-0" SPACED AT 3'-0" C-C INSTALLED ON A HORIZONTAL SKEW OF 6:1. THE DIRECTION OF SKEW SHALL ALTERNATE AFTER EVERY ONE OR TWO BARS.

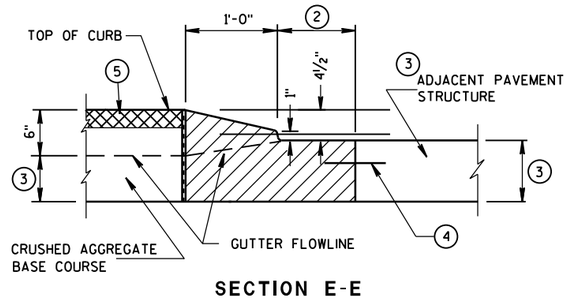
(5) SURFACE TYPE AND DETAILS ARE SHOWN ELSEWHERE IN THE PLAN.



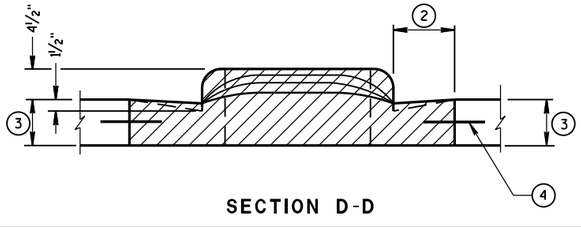


CONCRETE MEDIAN SLOPED NOSE TYPE 1





CONCRETE MEDIAN SLOPED NOSE TYPE 2



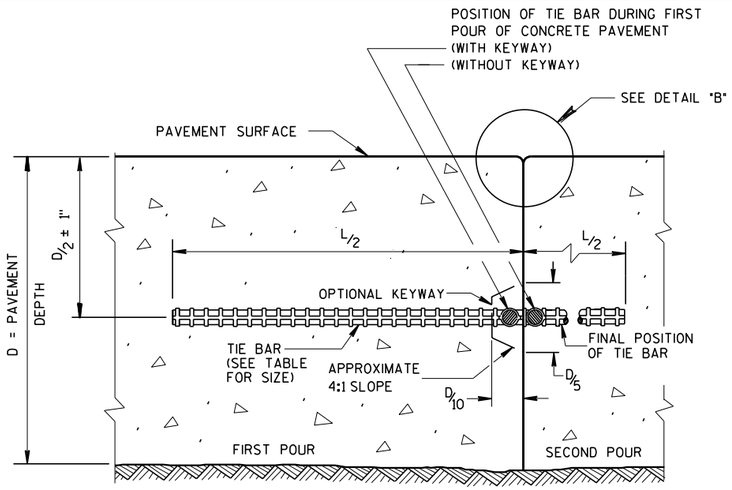
CONCRETE MEDIAN NOSE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

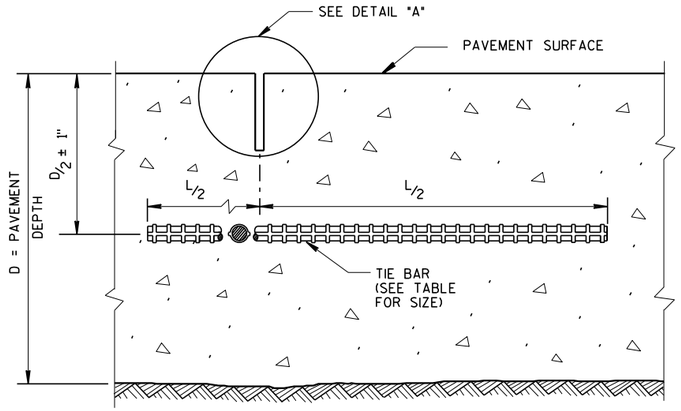
APPROVED
6/8/2006 — DATE
/S/ Jerry H. Zogg — ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA

S.D.D. 11 B 2-2

S.D.D. 11 B 2-2



CONSTRUCTION JOINT



SAWED JOINT

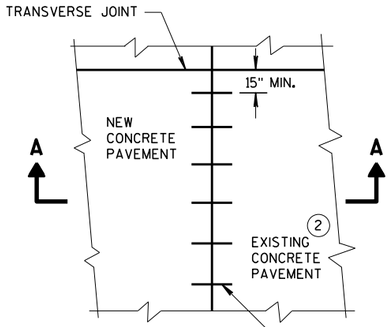
GENERAL NOTES

CREATE A LONGITUDINAL JOINT FOR PAVEMENT WIDTHS GREATER THAN 15 FEET.

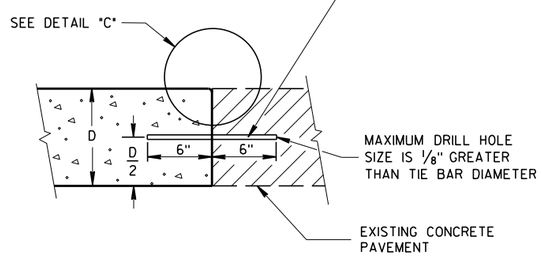
CORRELATE LONGITUDINAL JOINTS WITH LANE LINES WHEN POSSIBLE.

(1) ANCHOR TIE BARS INTO DRILLED HOLES WITH AN EPOXY.

(2) PAVEMENT THAT WAS IN PLACE PRIOR TO THE CONTRACT.

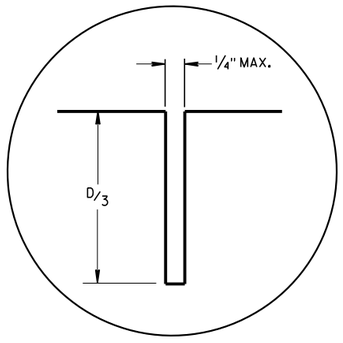


PLAN VIEW

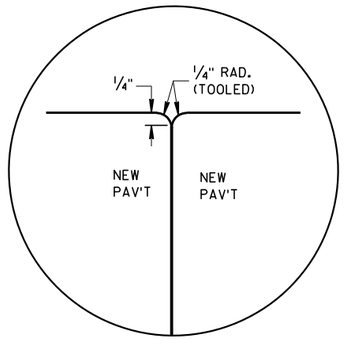


SECTION A-A

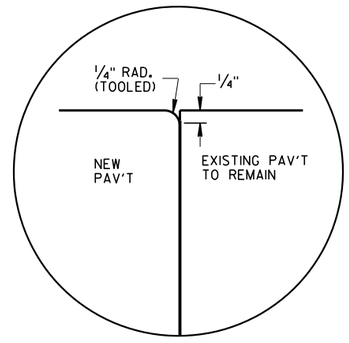
LONGITUDINAL CONSTRUCTION JOINT TIE BARS ANCHORED INTO EXISTING PAVEMENT



DETAIL "A"



DETAIL "B"



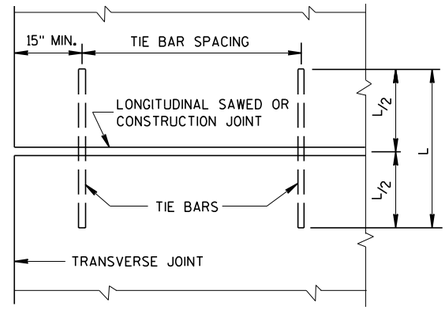
DETAIL "C"

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.



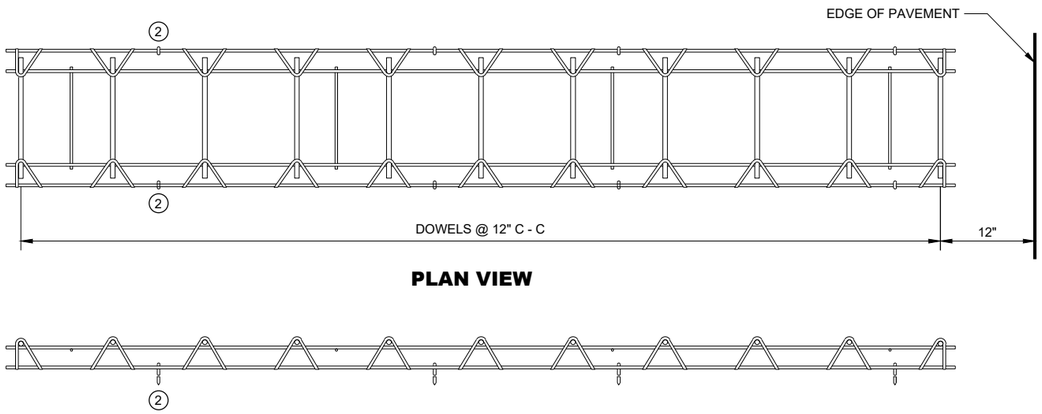
PLAN VIEW
SHOWING LOCATION OF TIE BARS

CONCRETE PAVEMENT LONGITUDINAL JOINTS AND TIES

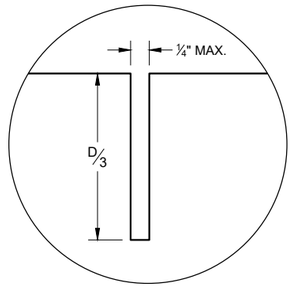
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
March 2018 — DATE
/S/ Peter Kemp PE — PAVEMENT SUPE
FHWA

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S.D.D. 13 C 1-19



CONTRACTION JOINT DOWEL ASSEMBLY (1)



JOINT DETAIL

GENERAL NOTES

CONTRACTION JOINTS

CONSTRUCT TRANSVERSE CONTRACTION JOINTS NORMAL TO THE CENTERLINE. SHOW THE LOCATION OF CONTRACTION JOINTS THROUGH INTERSECTIONS ON THE PLANS OR AS DIRECTED BY THE ENGINEER.

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

FOR PAVEMENT SLABS OF VARYING WIDTHS, LOCATE THE OUTER MOST DOWEL BAR SO THAT THE CENTER OF THE BAR IS A MINIMUM OF 6 INCHES FROM AND A MAXIMUM OF 18 INCHES FROM THE FREE EDGE OF PAVEMENT.

CONSTRUCTION JOINTS

LOCATE CONSTRUCTION JOINTS A MINIMUM OF 6 FEET FROM THE NEAREST CONTRACTION JOINT AND ALIGN PARALLEL TO THE CONTRACTION JOINTS.

(1) OBTAIN THE ENGINEER'S APPROVAL FOR THE USE OF ALTERNATIVE DESIGNS OF THE DOWEL ASSEMBLY. USE MECHANICAL DOWEL BAR INSERTERS OR DOWEL ASSEMBLIES WHEN CONSTRUCTION CONTRACTION JOINTS.

(2) SECURE BASKETS WITH ANCHORS TO HOLD DOWEL BARS IN THE CORRECT POSITION AND ALIGNMENT. TYPE, LOCATION, NUMBER AND LENGTH OF ANCHORS ARE DEPENDENT UPON FIELD CONDITIONS.

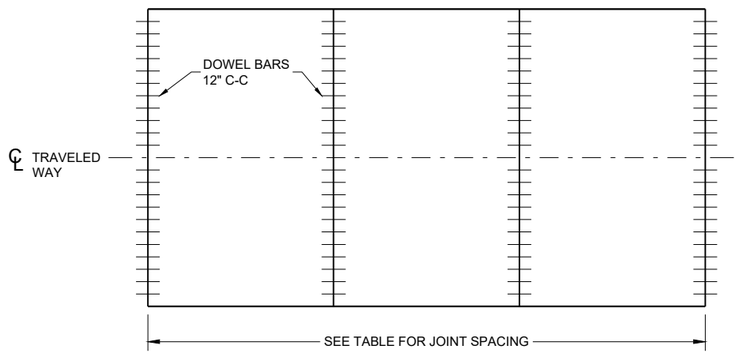
(3) FORM OR SAW CONSTRUCTION JOINTS. PROVIDE A ¼" RADIUS AT FORMED JOINTS.

(4) PROVIDE A SMOOTH VERTICAL FACE FOR THE ENTIRE DEPTH OF THE PAVEMENT WHEN FORMING CONSTRUCTION JOINTS.

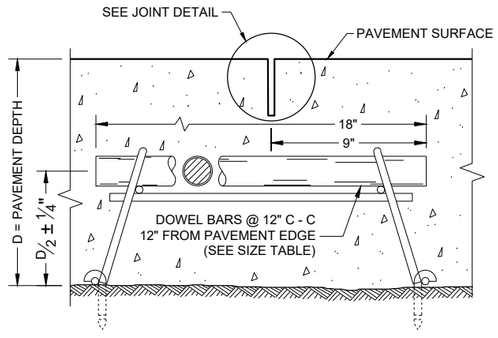
(5) INSTALL DOWEL BARS AT CONSTRUCTION JOINTS BY FORMING OR DRILLING. INSTALL FORMED DOWEL BARS 12 INCHES C - C AND 12 INCHES FROM PAVEMENT EDGE. REMOVE EXCESS CONCRETE FROM THE FREE END OF THE DOWEL BAR IF DOWEL BARS ARE FORMED THROUGH A HEADER BOARD. INSTALL DRILLED DOWEL BARS ACCORDING TO THE "DRILLED DOWEL BAR CONSTRUCTION JOINT" DETAIL.

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

(7) ANCHOR DOWEL BARS AND TIE BARS INTO DRILLED HOLES WITH AN EPOXY. MAXIMUM DRILLED HOLE SIZE IS ⅛" GREATER THAN DOWEL BAR DIAMETER, 9 INCHES IN LENGTH.



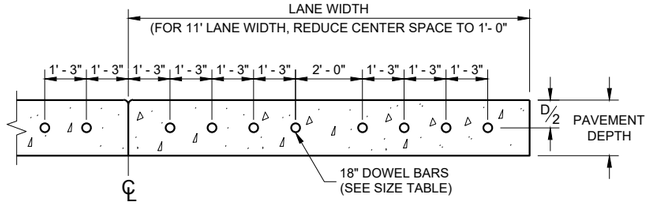
CONTRACTION JOINT LOCATIONS



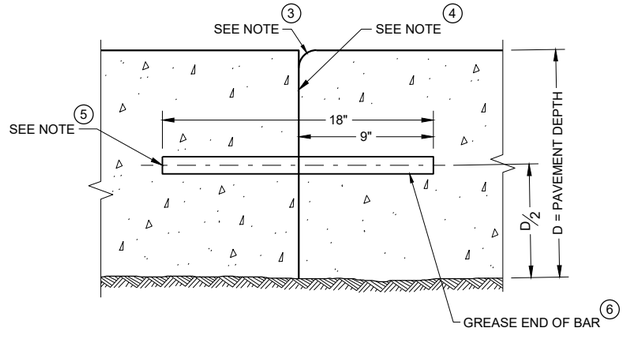
DOWELED CONTRACTION JOINT

PAVEMENT DEPTH, DOWEL BAR SIZE AND JOINT SPACING TABLE

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



DRILLED DOWEL BAR CONSTRUCTION JOINT (7)



TRANSVERSE CONSTRUCTION JOINT

URBAN DOWELED CONCRETE PAVEMENT

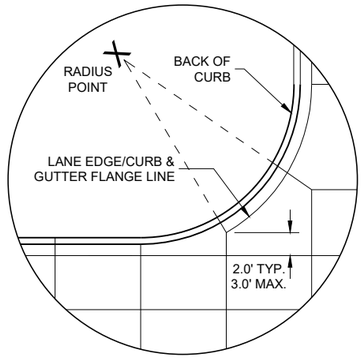
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
November 2022
DATE

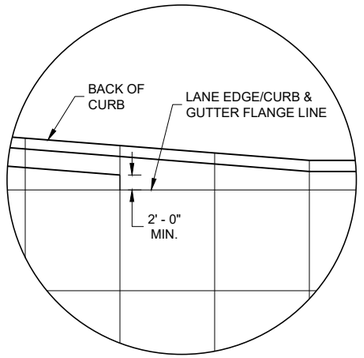
/S/ Peter Kemp P.E.
PAVEMENT SUPERVIS

FHWA

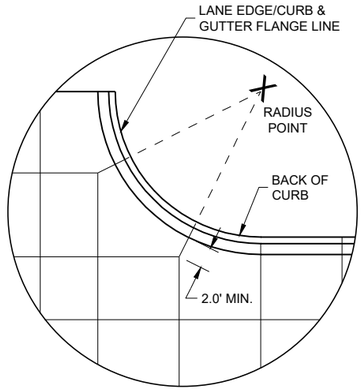
6
SDD 13C13 - 11



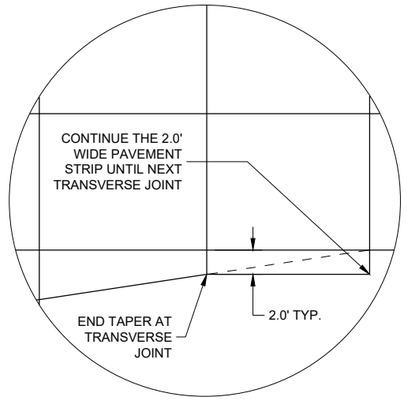
DETAIL "A"



DETAIL "B"



DETAIL "C"



DETAIL "D"

GENERAL NOTES

THE PRIMARY ROADWAY CONTROLS THE TRANSVERSE JOINT PATTERN.

ALIGN NEW JOINTS WITH EXISTING JOINTS OR CRACKS.

CONSTRUCT TRANSVERSE JOINTS PERPENDICULAR TO THE ROADWAY.

ADJUST TRANSVERSE JOINTS TO ALIGN WITH UTILITY FIXTURES (E.G MANHOLES AND INLETS) IN THE PAVEMENT STRUCTURE WHEN POSSIBLE. WATER VALVES DO NOT REQUIRE JOINT ADJUSTMENT.

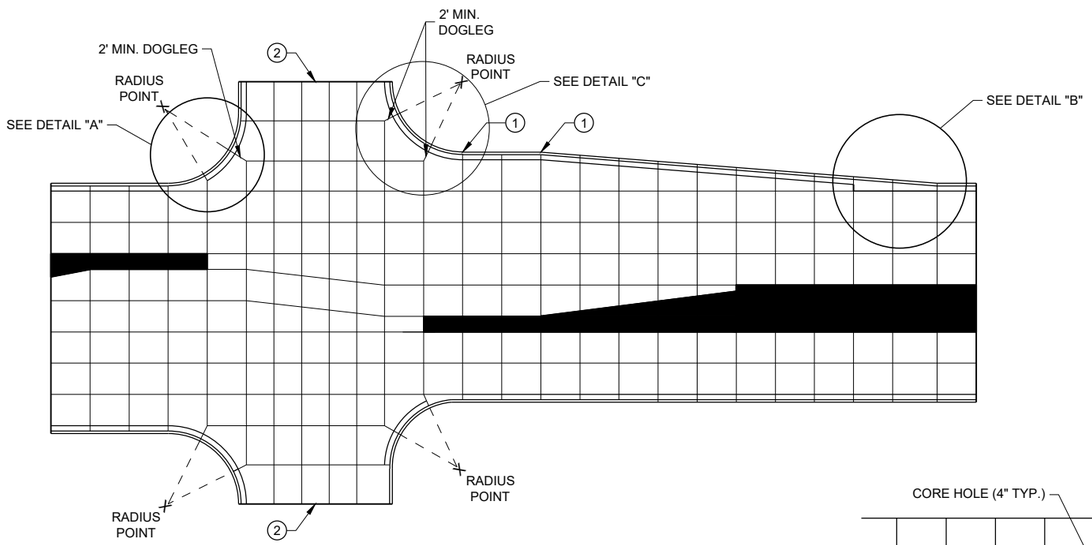
AVOID SLABS LESS THAN 2 FEET WIDE OR GREATER THAN 15 FEET WIDE.

SEE TABLE FOR TRANSVERSE JOINT SPACING. JOINT SPACING SPECIFIED IS MAXIMUM AND ACTUAL SPACING CAN BE ADJUSTED TO ACCOMMODATE INTERSECTIONS.

AVOID ANGLES LESS THAN 60° BY DOGLEGGING JOINTS THROUGH CURVE RADIUS POINTS. USE 90° ANGLES WHEN POSSIBLE.

CORRELATE LONGITUDINAL JOINTS WITH LANE LINES WHEN POSSIBLE.

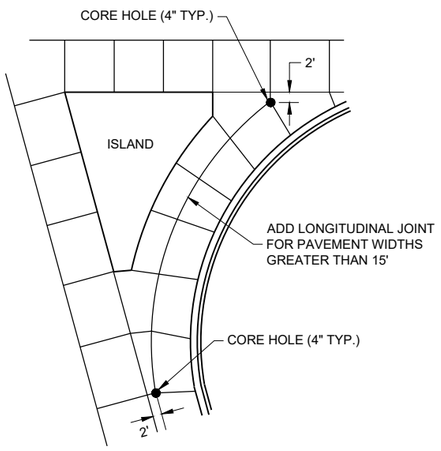
1. PROVIDE TRANSVERSE JOINTS AT ALL PAVEMENT WIDTH CHANGES.
2. CONSTRUCT DOWELED EXPANSION JOINT ON THE SIDE ROAD OF AN INTERSECTION IF THE SIDE ROAD IS CONCRETE PAVEMENT AND GREATER THAN 300 FEET IN LENGTH. ALIGN EXPANSION JOINT WITH EDGE OF RADIUS.
3. THE ENGINEER MAY APPROVE SLIGHT VARIATIONS FROM THESE JOINTING DETAILS.



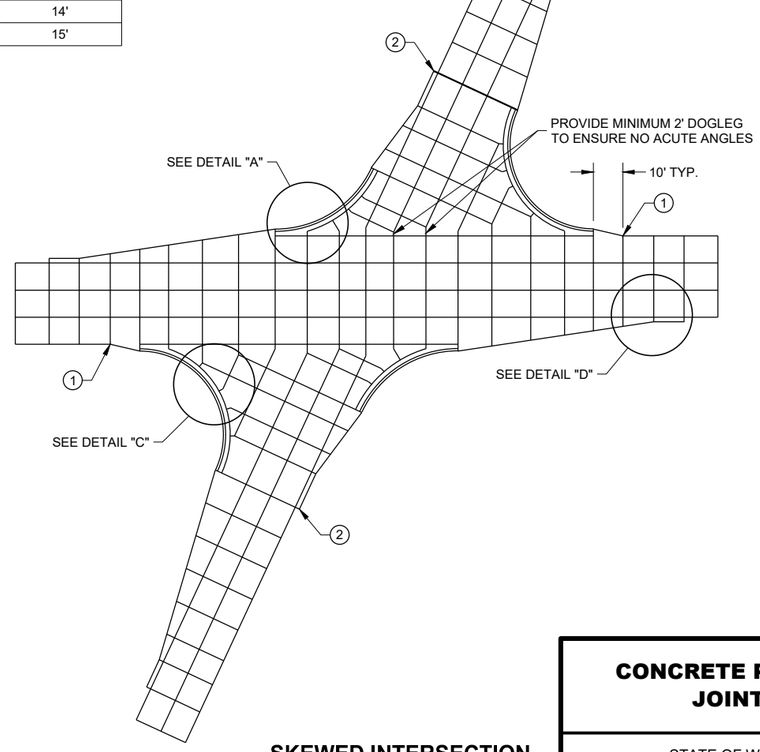
STANDARD INTERSECTION

PAVEMENT DEPTH AND JOINT SPACING TABLE

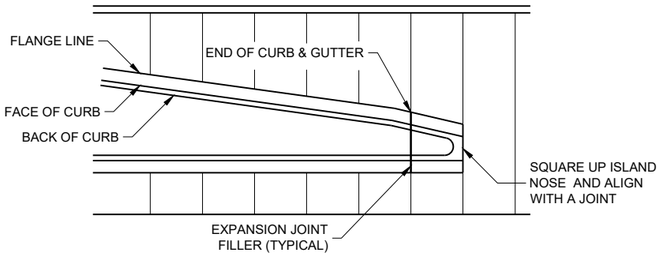
PAVEMENT DEPTH (D)	CONTRACTION JOINT SPACING
6", 6 ½"	12'
7", 7 ½"	14'
8" & ABOVE	15'



LARGE RIGHT TURN



SKEWED INTERSECTION

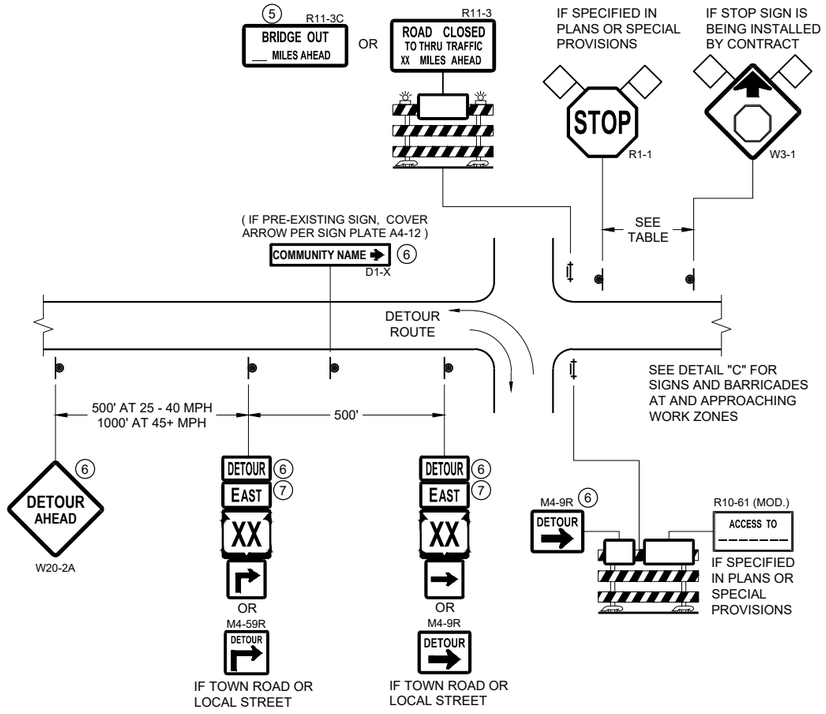


APPROACH TO MEDIAN

CONCRETE PAVEMENT JOINTING

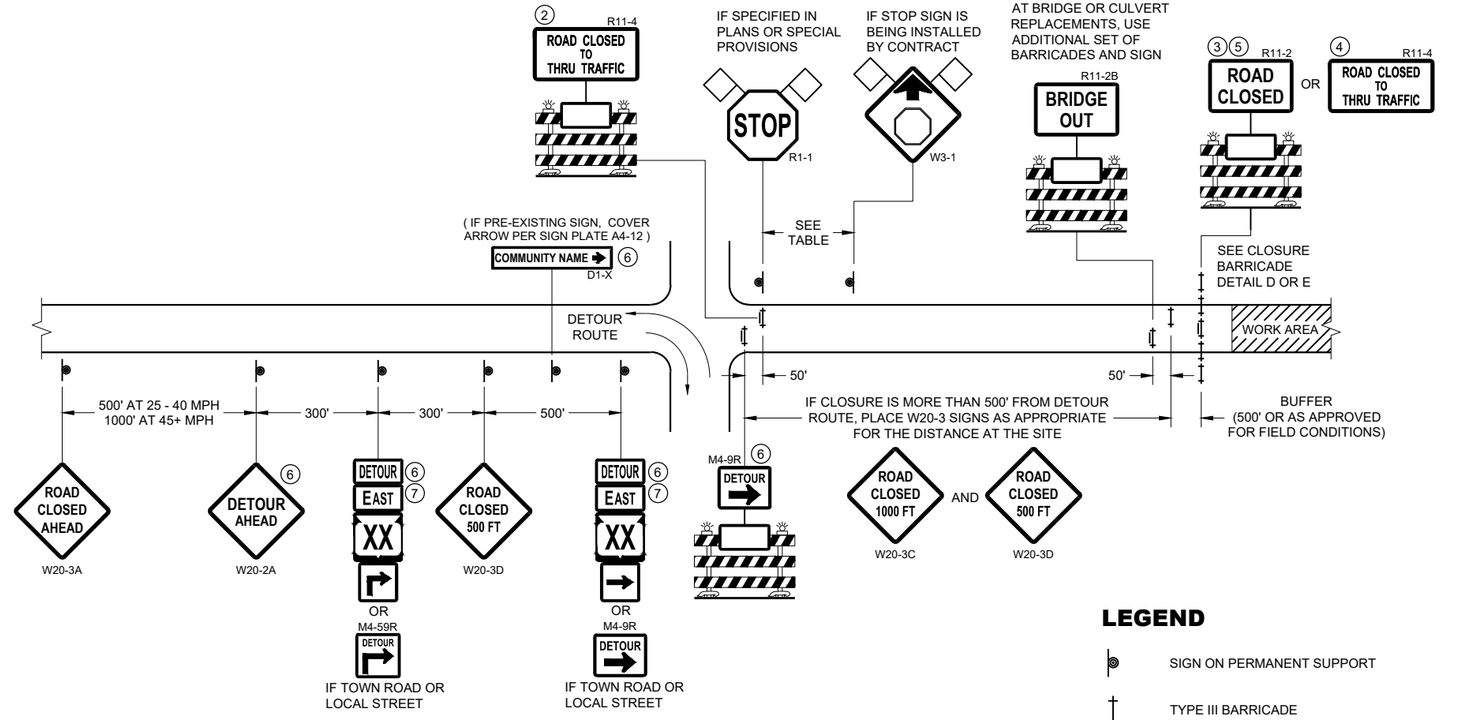
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6
SDD 13C18 - 08a



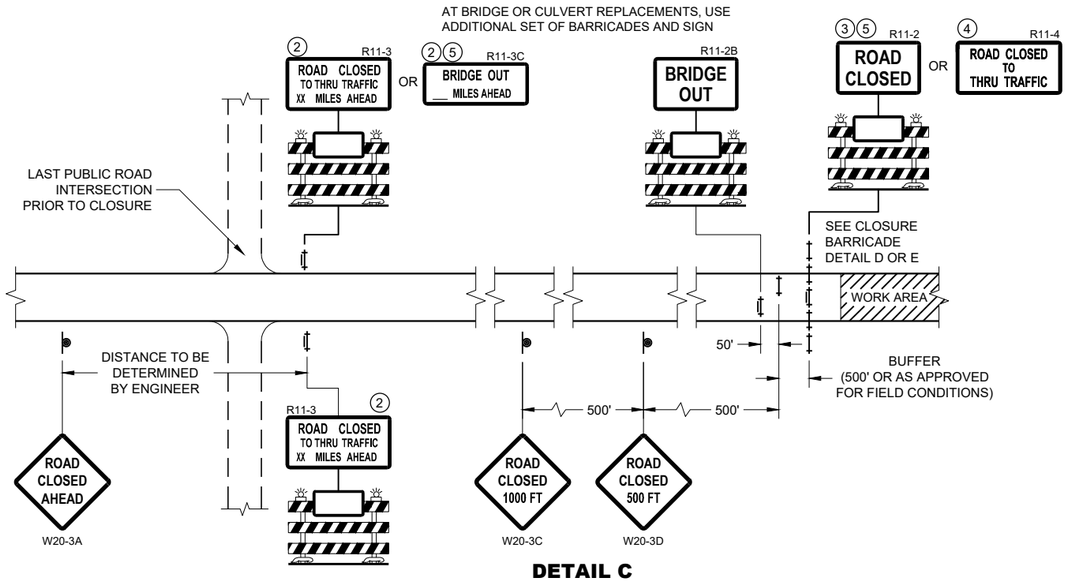
DETAIL A
MAINLINE CLOSURE WITH POSTED DETOUR

WORK ZONE GREATER THAN OR EQUAL TO ½ MILE FROM DETOUR ROUTE (1000 FEET IF URBAN)



DETAIL B
MAINLINE CLOSURE WITH POSTED DETOUR

WORK ZONE LESS THAN ½ MILE FROM DETOUR ROUTE (1000 FEET IF URBAN)



DETAIL C
MAINLINE CLOSURE, NO POSTED DETOUR

SPEED LIMIT (MPH)	"STOP AHEAD" ADVANCE WARNING DISTANCE (FT)
25	200
30	200
35	350
40	350
45	500
50	550
55	750

SEE SDD 15C2-SHEET "b"
FOR GENERAL NOTES
AND FOOTNOTES ① THROUGH ⑦

LEGEND

- SIGN ON PERMANENT SUPPORT
- TYPE III BARRICADE
- TYPE III BARRICADE WITH ATTACHED SIGN
- TYPE "A" WARNING LIGHT (FLASHING)
- WORK AREA
- FLAGS, 16" X 16" MIN. (ORANGE)

DETOUR M4 - 8
EAST M3 - X
XX M1 - 4 OR XX M1 - 6 OR COUNTY X M1 - 5A
M05 - 1 OR M06 - 1

BARRICADES AND SIGNS FOR MAINLINE CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

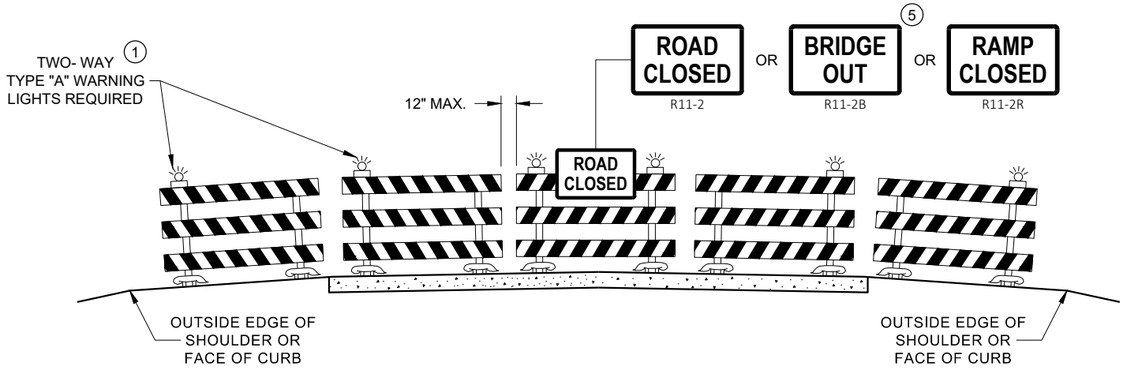
APPROVED
May 2023
DATE
/S/ Andrew Heidtke
WORK ZONE ENGINEER

FHWA

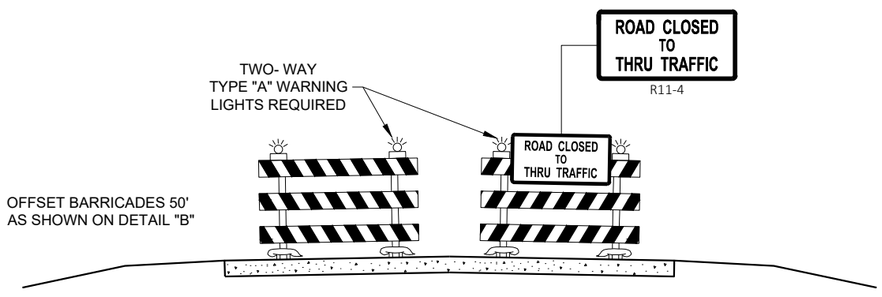
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SDD 15C02 - 09a

SDD 15C02 - 09a



DETAIL D
ROAD CLOSURE BARRICADE DETAIL
APPROACH VIEW



DETAIL E
LANE CLOSURE BARRICADE DETAIL
APPROACH VIEW

SEE SDD 15C2 - SHEET "a" FOR LEGEND

GENERAL NOTES

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

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

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

BARRICADES THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY RE-ESTABLISHED UPON COMPLETION OF THE OPERATION, OR FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

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

ALL TYPE III BARRICADES SHALL HAVE RAILS REFLECTORIZED ON BOTH FACES. STRIPES SHALL BE PROPERLY SLOPED DOWN TOWARD THE TRAFFIC SIDE OR AS SHOWN IN THE ROAD CLOSURE BARRICADE DETAIL "D" FOR FULL ROAD CLOSURES.

TYPE "A" LOW - INTENSITY FLASHING WARNING LIGHTS SHALL BE VISIBLE ON BOTH SIDES OF THE BARRICADE.

THE R11 - 2, R11 - 3, M4 - 9, R11 - 4, AND R10 - 61 SIGNS PLACED ON THE BARRICADES SHALL COVER NO MORE THAN THE TOP RAIL. THE SIGNS SHALL NOT COVER ANY PORTION OF THE MIDDLE RAIL OR BOTTOM RAILS.

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

ALL SIGNS SHALL BE 48" X 48" UNLESS OTHERWISE NOTED BELOW:
- R11 - 2 SHALL BE 48" X 30"
- R11 - 3 SHALL, R11 - 4 AND R10 - 61 SHALL BE 60 " X 30"
- M4 - 9 SHALL BE 30" X 24"
- M3 - X SHALL BE 24" X 12" (36" X 18" IF NEEDED TO MATCH EXISTING SIGNS)
- M4 - 8 SHALL BE 24" X 12" (36" X 18" IF NEEDED TO MATCH EXISTING SIGNS)
- M1 - 4, M1 - 5A AND M1 - 6 SHALL BE 24" X 24" (36" X 36" IF NEEDED TO MATCH EXISTING SIGNS)
- MO5 - 1 AND MO6 - 1 SHALL BE 21" X 21" (30" X 30" IF NEEDED TO MATCH EXISTING SIGNS)
- D1 - X SHALL BE AS SHOWN ON SPECIFIC PROJECT SIGNING DETAIL SHEETS.
- R1 - 1 SHALL BE 36" X 36"

(1) TWO WARNING LIGHTS SHALL BE PROVIDED ON THE CENTER BARRICADE AND A MINIMUM OF ONE WARNING LIGHT SHALL BE PROVIDED ON EACH OF THE OTHER BARRICADES WITHIN THE ROADWAY LIMITS. SPACING OF THE WARNING LIGHTS SHALL BE UNIFORM TO THE EDGE OF ROADWAY AS SHOWN (APPROX. 8 FOOT LIGHT SPACING.

(2) THESE SIGNS AND BARRICADES ARE NOT REQUIRED IF ROAD CLOSURE BEGINS AT AN INTERSECTION.

(3) FOR ROAD CLOSURE WITHOUT LOCAL ACCESS TO PROJECT, SEE ROAD CLOSURE BARRICADE DETAIL "D".

(4) FOR ROAD CLOSURE WITH LOCAL ACCESS TO PROJECT, SEE ROAD CLOSURE BARRICADE DETAIL "E".

(5) FOR BRIDGE OR CULVERT REPLACEMENTS, SUBSTITUTE "BRIDGE OUT" INSTEAD OF "ROAD CLOSED" ON R11 - 2 AND R11 - 3 SIGNS.

(6) INSTALL DETOUR AND COMMUNITY GUIDE SIGNS AND ARROWS ONLY IF SPECIFIED IN THE CONTRACT. IF THERE ARE EXISTING ROUTE MARKER ASSEMBLIES THAT WILL REMAIN IN PLACE, ADJUST THE LOCATION OF THE DETOUR ROUTE SIGNS TO CORRESPOND WITH THE EXISTING ASSEMBLIES. MODIFY EXISTING SIGNS WHERE POSSIBLE. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS. IF DETOUR SIGNS ARE BEING INSTALLED BY OTHERS, PLACE THE CONTRACTED TRAFFIC CONTROL SIGNS TO ALLOW FOR PLACEMENT OF ALL WARNING, DETOUR AND GUIDE SIGNS AS SHOWN.

(7) "EAST" CARDINAL DIRECTION MARKERS AND RIGHT TURN ARROWS ARE SHOWN. USE OTHER CARDINAL DIRECTIONS AND ARROWS AS APPROPRIATE.

BARRICADES AND SIGNS FOR VARIOUS CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2023
DATE
/S/ Andrew Heidtke
WORK ZONE ENGINEE
FHWA

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SDD 15C02 - 09b

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SDD 15C02 - 09b

THIS DRAWING PROVIDES GENERAL GUIDANCE ON TYPICAL DETOUR SIGN LAYOUT AND SPACING. SEE PROJECT DETOUR SIGNING SHEETS FOR SPECIFIC DETAILS FOR EACH PROJECT.

LEGEND

- SIGN ON PERMANENT SUPPORT
- WORK AREA
- DETOUR / EAST — M4 - 8, M3 - X
- XX — M1 - 4; OR XX — M1 - 6; OR COUNTY X — M1 - 5A
- M05 - 1; OR M06 - 1; OR M06 - 1

GENERAL NOTES

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

IF THERE ARE EXISTING ROUTE MARKER ASSEMBLIES THAT WILL REMAIN IN PLACE, ADJUST THE LOCATION OF THE DETOUR ROUTE SIGNS TO CORRESPOND WITH THE EXISTING ASSEMBLIES. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS. MODIFY EXISTING SIGNS WHERE POSSIBLE.

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

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

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

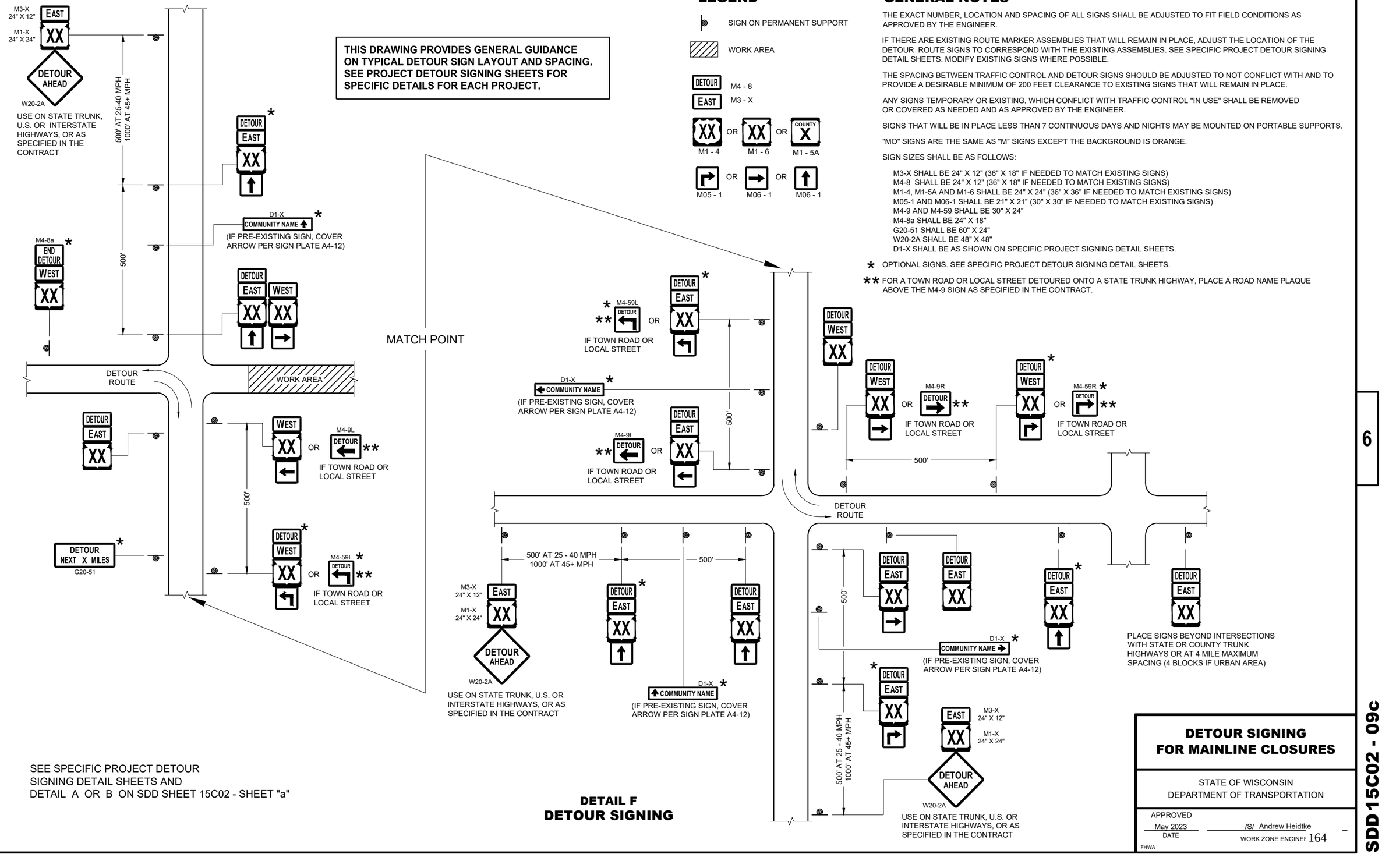
"MO" SIGNS ARE THE SAME AS "M" SIGNS EXCEPT THE BACKGROUND IS ORANGE.

SIGN SIZES SHALL BE AS FOLLOWS:

- M3-X SHALL BE 24" X 12" (36" X 18" IF NEEDED TO MATCH EXISTING SIGNS)
- M4-8 SHALL BE 24" X 12" (36" X 18" IF NEEDED TO MATCH EXISTING SIGNS)
- M1-4, M1-5A AND M1-6 SHALL BE 24" X 24" (36" X 36" IF NEEDED TO MATCH EXISTING SIGNS)
- M05-1 AND M06-1 SHALL BE 21" X 21" (30" X 30" IF NEEDED TO MATCH EXISTING SIGNS)
- M4-9 AND M4-59 SHALL BE 30" X 24"
- M4-8a SHALL BE 24" X 18"
- G20-51 SHALL BE 60" X 24"
- W20-2A SHALL BE 48" X 48"
- D1-X SHALL BE AS SHOWN ON SPECIFIC PROJECT SIGNING DETAIL SHEETS.

* OPTIONAL SIGNS. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS.

** FOR A TOWN ROAD OR LOCAL STREET DETOURED ONTO A STATE TRUNK HIGHWAY, PLACE A ROAD NAME PLAQUE ABOVE THE M4-9 SIGN AS SPECIFIED IN THE CONTRACT.



SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS AND DETAIL A OR B ON SDD SHEET 15C02 - SHEET "a"

DETAIL F
DETOUR SIGNING

DETOUR SIGNING FOR MAINLINE CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

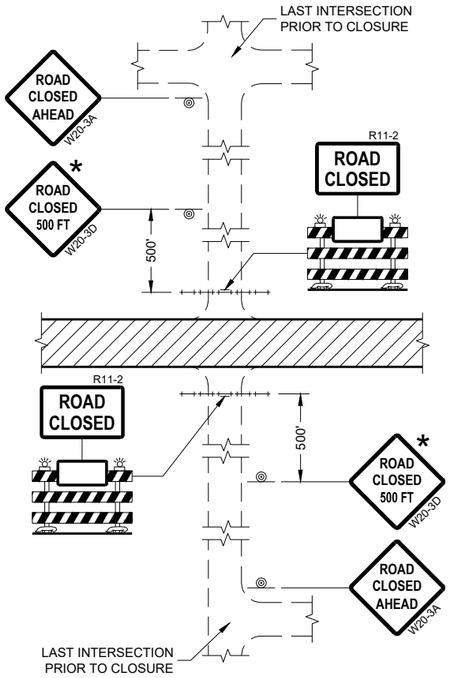
APPROVED
May 2023
DATE

/S/ Andrew Heidtke
WORK ZONE ENGINEER

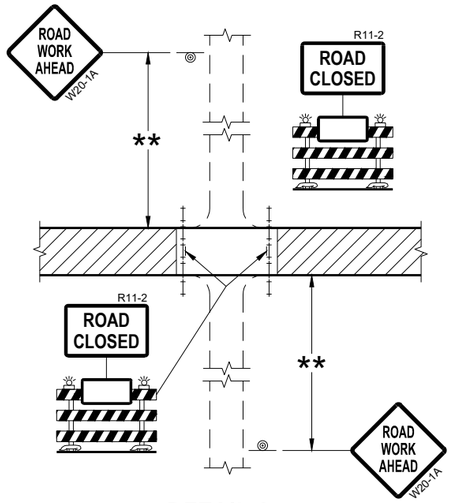
FHWA

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SDD 15C02 - 09c



DETAIL 1
(NO ACCESS TO PROJECT)



DETAIL 2
(PUBLIC CROSS-TRAFFIC MAINTAINED.
NO ACCESS TO PROJECT)

GENERAL NOTES

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

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

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

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

BARRICADES THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY REESTABLISHED UPON COMPLETION OF THE OPERATION OR FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

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

ALL TYPE III BARRICADES SHALL HAVE RAILS REFLECTORIZED ON BOTH FACES. STRIPES SHALL BE PROPERLY SLOPED DOWN TOWARD THE TRAFFIC SIDE OR AS SHOWN IN THE ROAD CLOSURE BARRICADE DETAIL "D" FOR FULL ROAD CLOSURES.

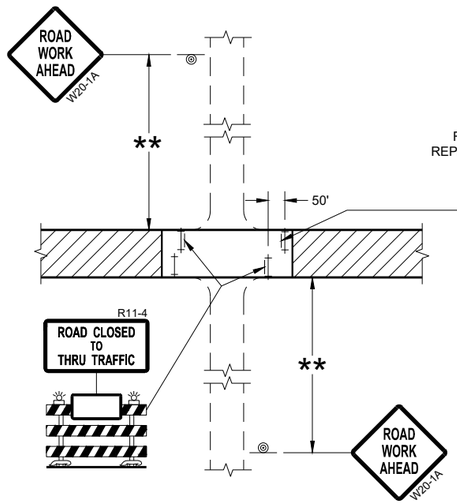
TYPE "A" LOW-INTENSITY FLASHING WARNING LIGHTS SHALL BE VISIBLE ON BOTH SIDES OF THE BARRICADE.

THE R11-2, R11-3, AND R11-4 SIGNS PLACED ON BARRICADES SHALL COVER NO MORE THAN THE TOP RAIL. THE SIGNS SHALL NOT COVER ANY PORTION OF THE MIDDLE OR BOTTOM RAILS.

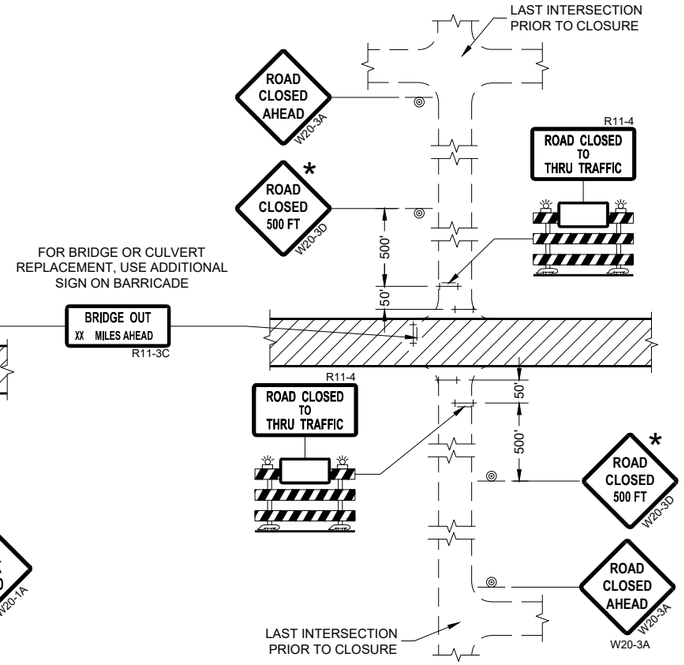
ALL SIGNS SHALL BE 48" X 48" UNLESS OTHERWISE NOTED BELOW:
R11-2 SHALL BE 48" X 30".
R11-4 AND R11-3 SHALL BE 60" X 30".

* OMIT THE "ROAD CLOSED 500 FT." SIGN IF THE LAST INTERSECTION IS 500 FEET OR LESS FROM THE WORK ZONE.

** 500' MAX. OR AT LAST INTERSECTION, WHICHEVER IS CLOSEST.



DETAIL 3
(PUBLIC CROSS-TRAFFIC MAINTAINED.
CONTRACTOR, LOCAL BUSINESS AND
RESIDENT ACCESS TO PROJECT)



DETAIL 4
(CONTRACTOR, LOCAL BUSINESS AND
RESIDENT ACCESS TO PROJECT)

LEGEND

- SIGN ON PERMANENT SUPPORT
- TYPE III BARRICADE
- TYPE III BARRICADE WITH ATTACHED SIGN
- TYPE "A" WARNING LIGHT (FLASHING)
- WORK AREA

BARRICADES AND SIGNS FOR SIDEROAD CLOSURES

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
July 2018
DATE

/S/ Andrew Heidtke
WORK ZONE ENGINEE

FHWA

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SDD 15C03 - 05

SDD 15C03 - 05

GENERAL NOTES

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

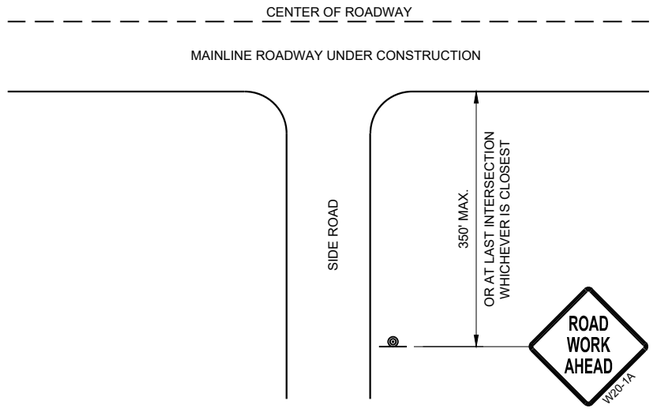
THE SPACING BETWEEN TRAFFIC CONTROL SIGNS SHOULD BE ADJUSTED TO NOT CONFLICT WITH AND SHOULD PROVIDE A MINIMUM OF 200 FEET (500 FEET DESIRABLE) CLEARANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE.

ALL SIGNS ARE 48" X 48" UNLESS OTHERWISE NOTED. IF NECESSARY DUE TO SPACE CONSTRAINTS, 36"X36" SIGNS MAY BE USED INSTEAD OF 48" X 48" SIGNS.

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

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

* THE THIRD W20-1 SIGN IS REQUIRED ONLY IF THERE IS AN INTERSECTION BETWEEN THE "ROAD WORK 500 FEET" SIGN AND THE WORK ZONE. ADJUST THE PLACEMENT OF THIS SIGN BASED ON INTERSECTION LOCATION AND OTHER FIELD CONDITIONS.



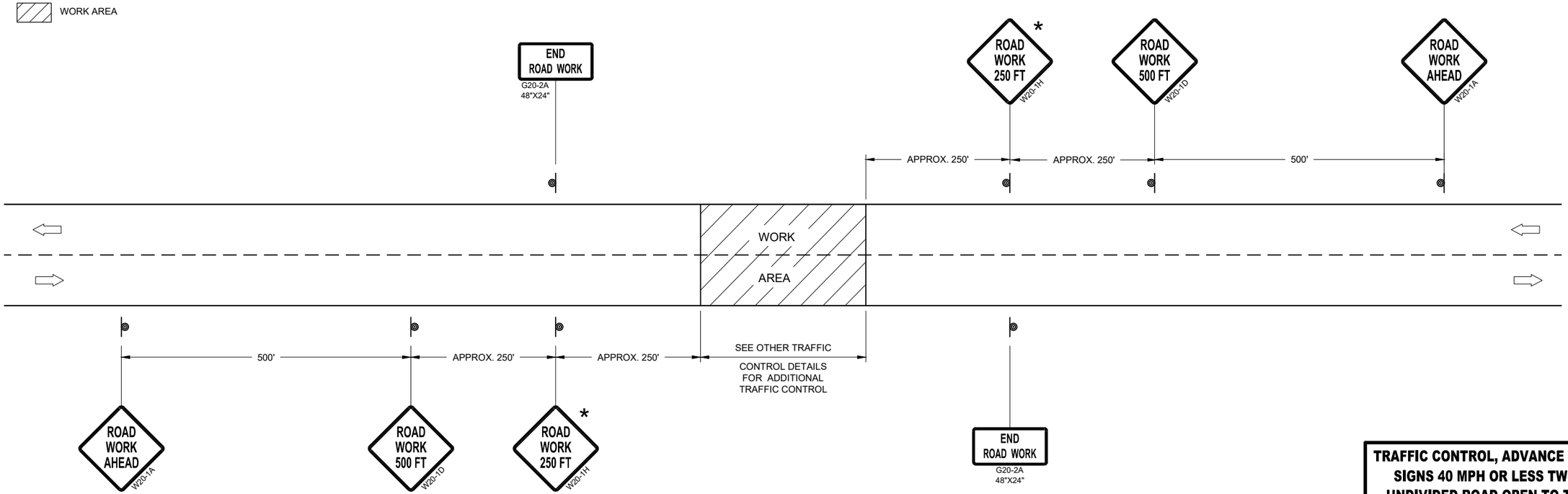
TYPICAL SIDE ROAD APPROACH WARNING SIGN DETAIL

LEGEND

SIGN ON PERMANENT SUPPORT

DIRECTION OF TRAFFIC

WORK AREA



TRAFFIC CONTROL, ADVANCE WARNING SIGNS 40MPH OR LESS

TRAFFIC CONTROL, ADVANCE WARNING SIGNS 40 MPH OR LESS TWO-WAY UNDIVIDED ROAD OPEN TO TRAFFIC

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

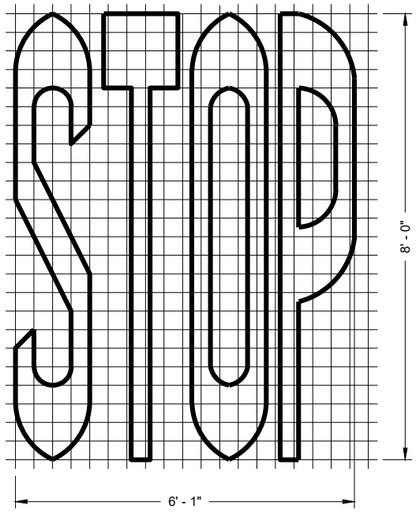
APPROVED
July 2018
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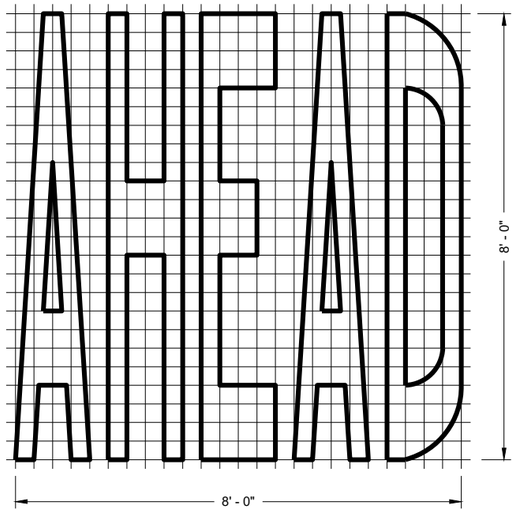
/S/ Andrew Heidtke
WORK ZONE ENGINEE

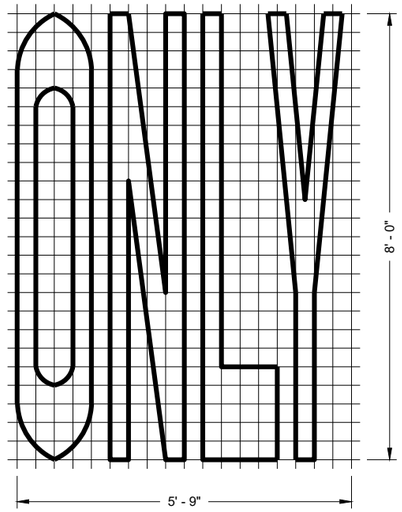
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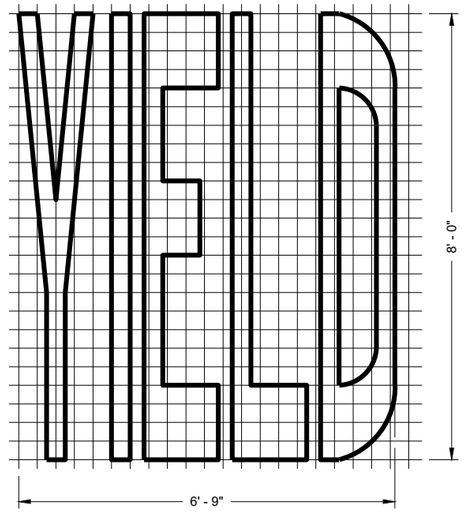
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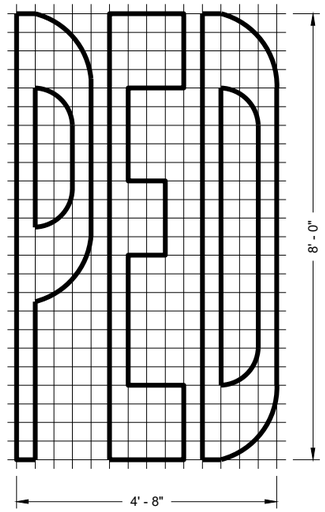
SDD 15C05 - 05

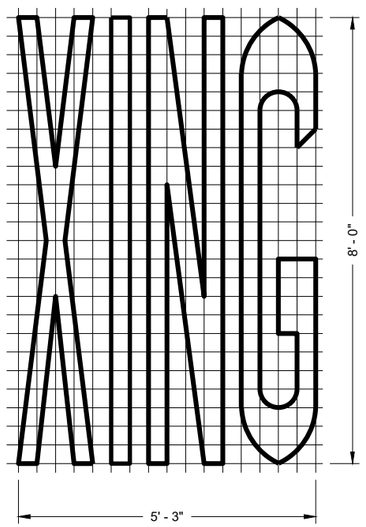


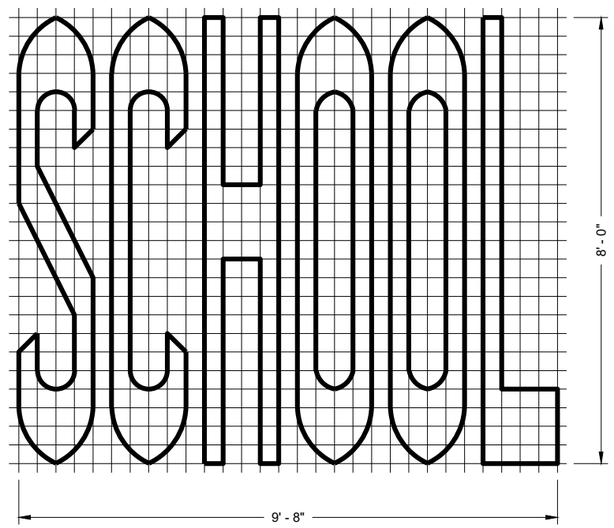




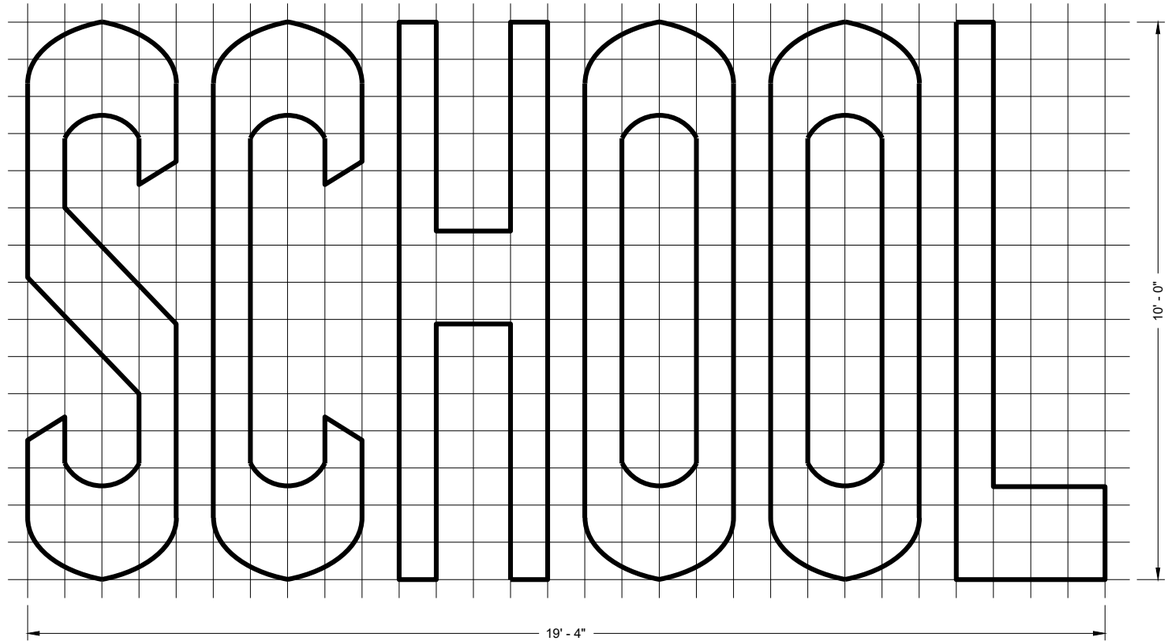








SINGLE LANE



TWO - LANE

GENERAL NOTES

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

PAVEMENT MARKING WORDS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

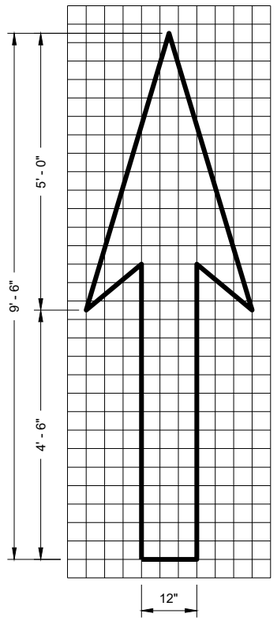
APPROVED
November 2019
DATE

/S/ Matthew Rauch
STATE SIGNING AND MAF ENGINEER

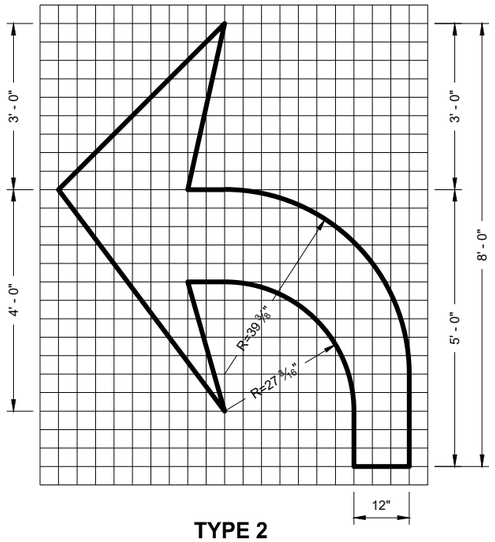
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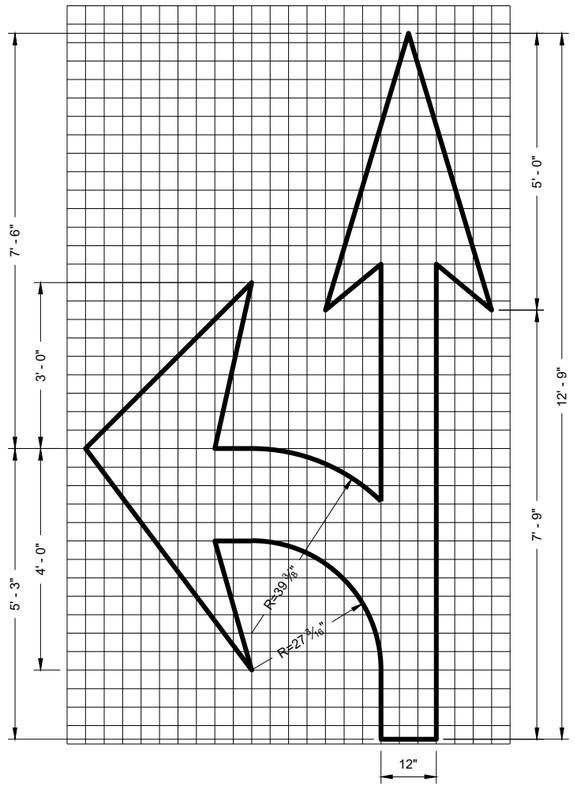
SDD 15C07 - 15b



TYPE 1



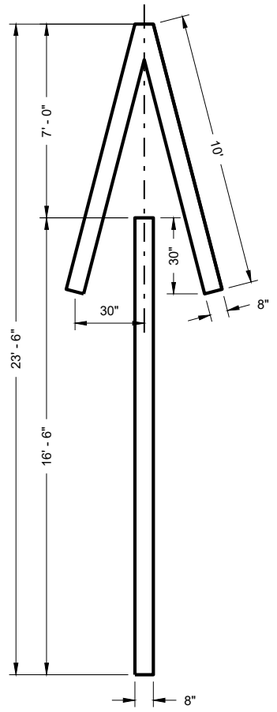
TYPE 2



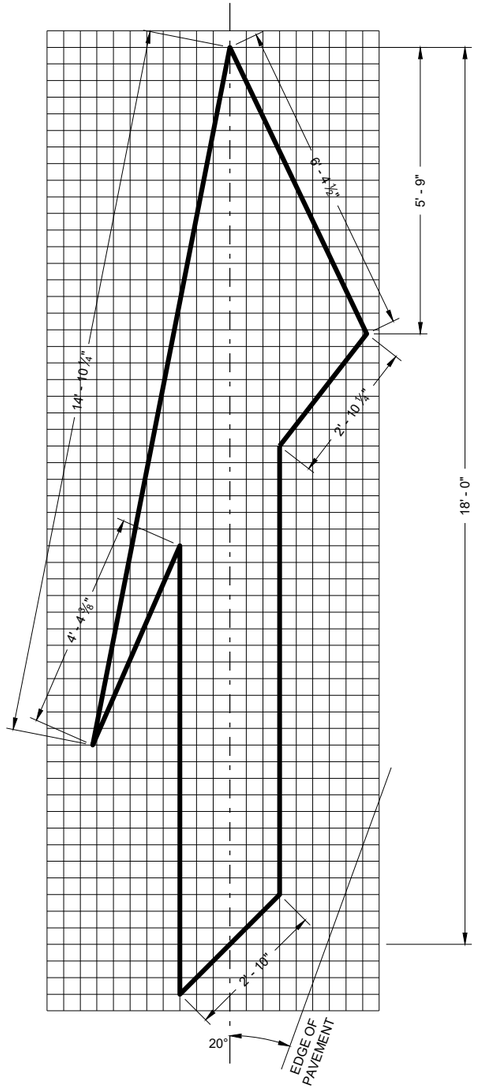
TYPE 3

GENERAL NOTES

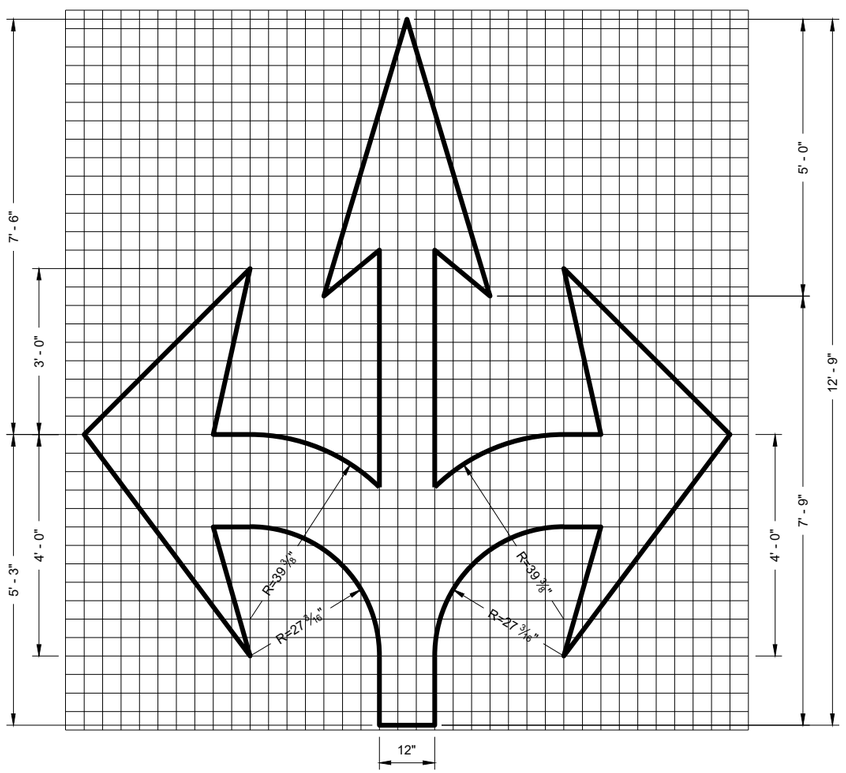
DETAILS OF INSTALLATION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND APPLICABLE SPECIAL PROVISIONS.



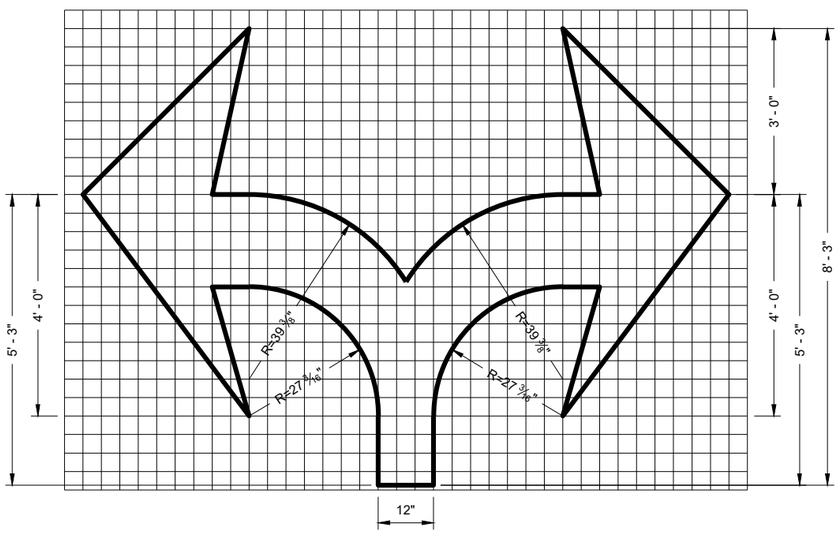
TYPE 4



TYPE 5 LANE DROP ARROW



TYPE 6



TYPE 7

PAVEMENT MARKING ARROWS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
November 2019 — DATE
/S/ Matthew Rauch — STATE SIGNING AND MARKING ENGINEER

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6

SDD 15C07 - 15c

6

SDD 15C07 - 15c

* CONFIRM MARKING LINE WIDTH WITH THE MISCELLANEOUS QUANTITIES

GENERAL NOTES

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

(1) LOCATE THE NO PASSING ZONE W14-3 SIGN WITHIN 50 FEET OF THE "T" MARKING

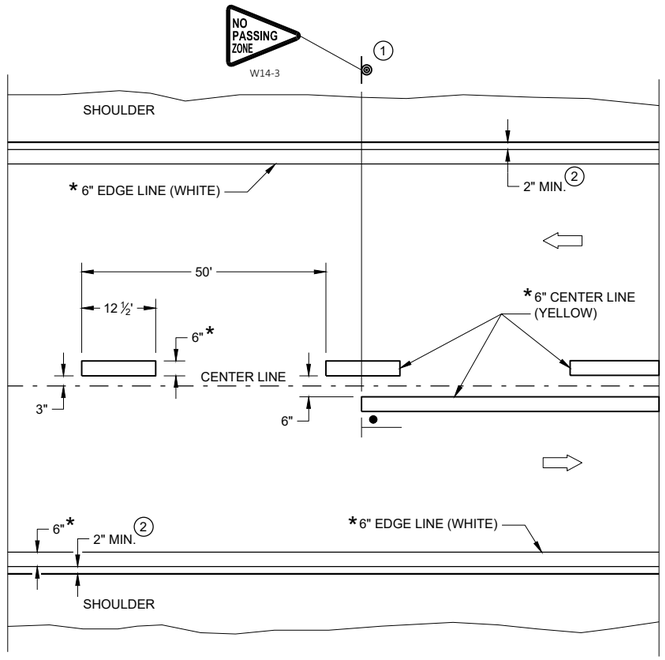
(2) MEASURE FROM EDGE OF MARKING TO JOINT LINE. THIS DOES NOT INCLUDE SPACE NEEDED FOR GROOVING OPERATIONS.

LEGEND

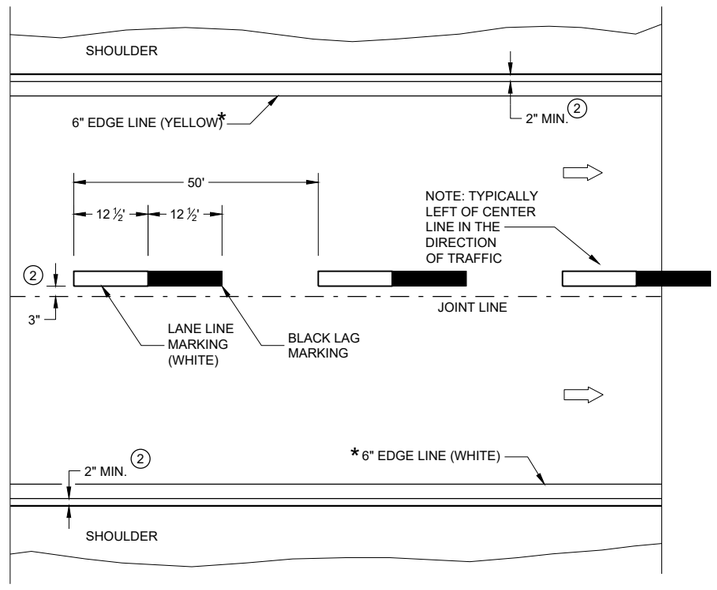
"T" MARKING

SIGN ON PERMANENT SUPPORT

DIRECTION OF TRAFFIC



TWO WAY TRAFFIC



ONE WAY TRAFFIC

PERMANENT PAVEMENT MARKING

PERMANENT LONGITUDINAL PAVEMENT MARKINGS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

May 2023 — DATE

/S/ Jeannie Silver — STATEWIDE SIGNING AND M ENGINEER

FHWA

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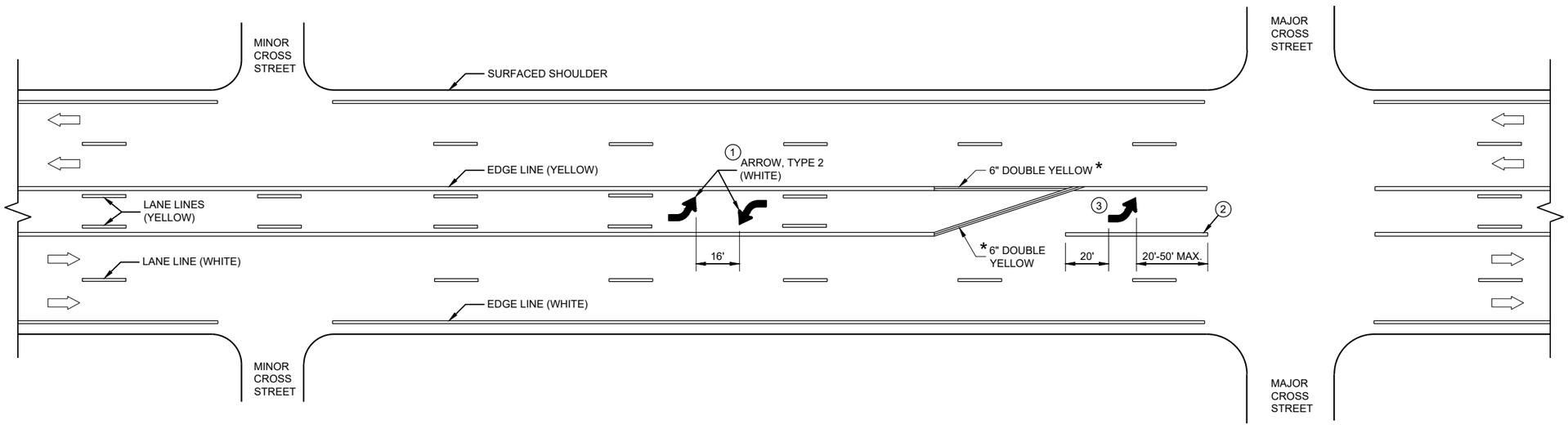
SDD 15C08-23a

GENERAL NOTES

1. A SET OF ARROWS IS REQUIRED EVERY 400 FEET OR NEAR INTERSECTIONS OR DRIVEWAYS WITH TURNING TRAFFIC.
2. 10" WHITE
3. TURN BAY LENGTH OF LESS THAN 48' DOES NOT REQUIRE PAVEMENT ARROWS OR TEXT.

DIRECTION OF TRAFFIC

* CONFIRM MARKING LINE WIDTH WITH THE MISCELLANEOUS QUANTITIES



TWO WAY LEFT TURN LANE

6

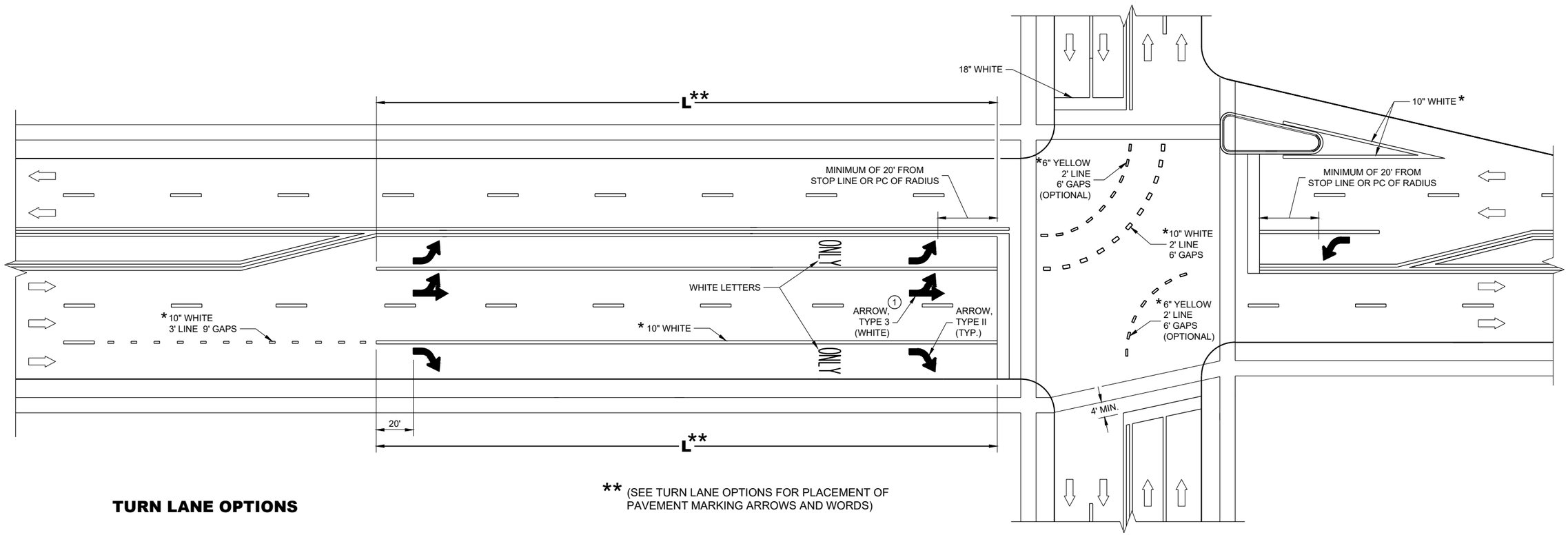
SDD 15C08-23c

PAVEMENT MARKING (TURN LANES)

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTA· 170

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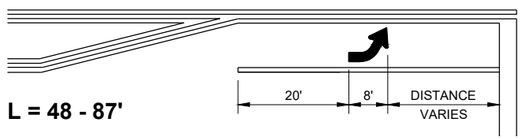
SDD 15C08-23c



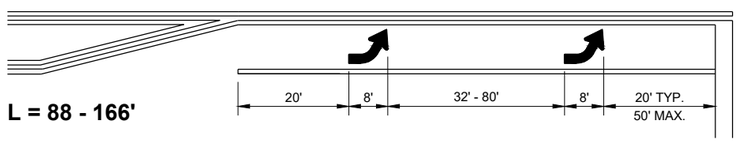
** (SEE TURN LANE OPTIONS FOR PLACEMENT OF PAVEMENT MARKING ARROWS AND WORDS)

TURN LANE OPTIONS

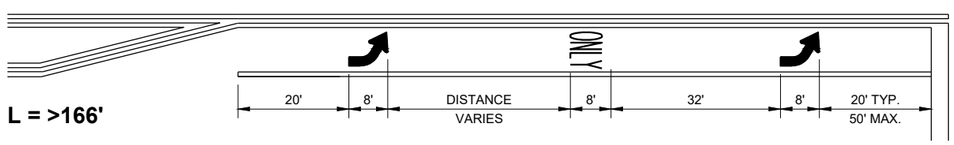
LENGTH OF TURN BAY (**L**) OF 0 - 47' DOES NOT REQUIRE PAVEMENT MARKING ARROWS OR WORDS



L = 48 - 87'



L = 88 - 166'



L = >166'

GENERAL NOTES

(1) QUANTITY AND LOCATION OF TYPE 3 ARROWS ARE THE SAME AS THE TYPE II ARROWS IN THE ADJACENT TURN LANE. FOR TURN LANES WITH A PHYSICAL SEPARATION IN THE SAME DIRECTION OF TRAVEL, THE ARROWS AND "ONLY" MARKING MAY BE ELIMINATED.

DIRECTION OF TRAFFIC

L = LENGTH OF TURN BAY

* CONFIRM MARKING LINE WIDTH WITH THE MISCELLANEOUS QUANTITIES

PAVEMENT MARKING (TURN LANES)

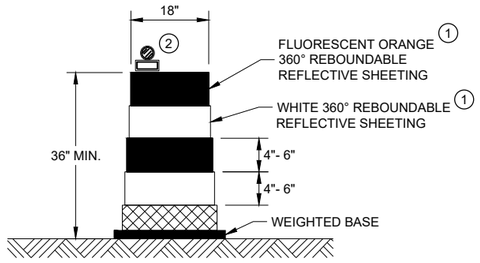
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

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SDD 15C08-23d

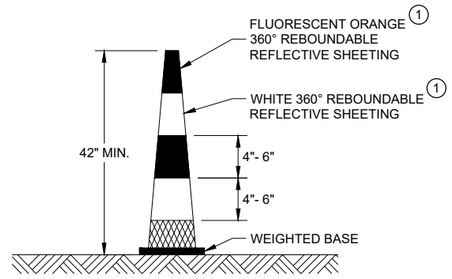
GENERAL NOTES

1. REFLECTIVE SHEETING SHALL FOLLOW THE REQUIREMENTS IN THE APPROVED PRODUCTS LISTING FOR SIGN SHEETING.
2. LOCATION OF WARNING LIGHTS WHEN SHOWN ON THE PLAN.



DRUM

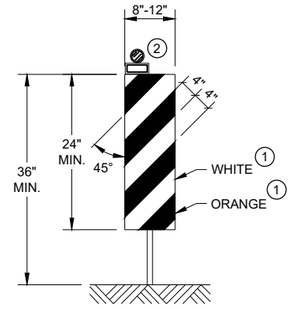
BALLAST WIDTHS
RANGE FROM 24"-36"



42" CONE

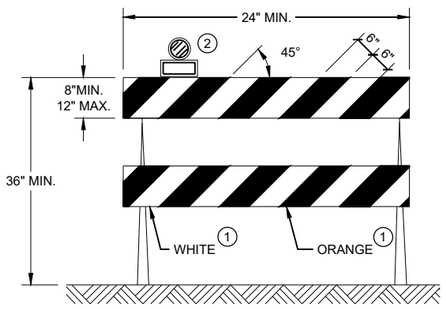
DO NOT USE IN TAPERS
½ SPACING OF DRUMS

BALLAST WIDTHS
RANGE FROM 14"-20"



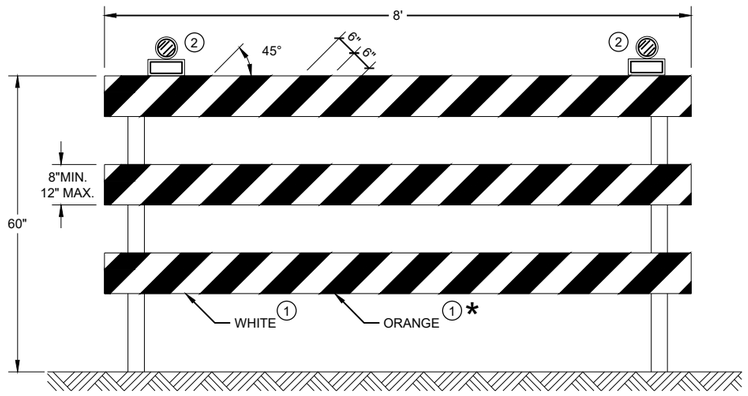
VERTICAL PANEL

THE STRIPES SHALL SLOPE DOWNWARD TO
THE TRAFFIC SIDE FOR CHANNELIZATION.



TYPE II BARRICADE

FOR RAILS LESS THAN 36" LONG, 4" WIDE STRIPES
MAY BE USED. ALL STRIPES SHALL SLOPE DOWNWARD
TO THE TRAFFIC SIDE FOR CHANNELIZATION.



TYPE III BARRICADE

IF SIGN MOUNTED, DO NOT COVER MORE THAN 50% OF THE TOP
TWO RAILS OR 33% OF THE TOTAL AREA OF THE THREE RAILS.

* IF USED FOR A PERMANENT APPLICATION USE RED SHEETING.

CHANNELIZING DEVICES DRUMS, CONES, BARRICADES AND VERTICAL PANELS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
November 2022
DATE

/S/ Andrew Heidtke
WORK ZONE ENGINEE

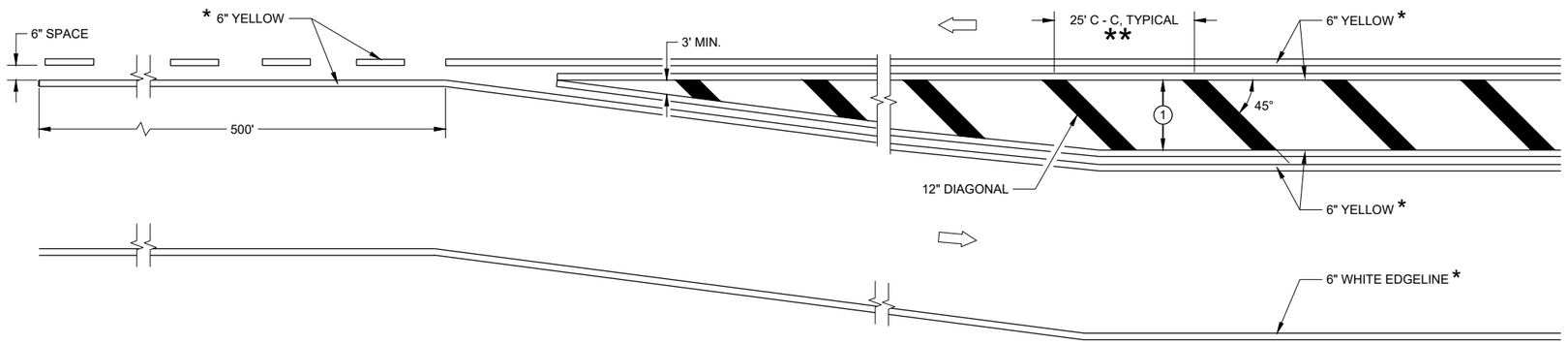
FHWA

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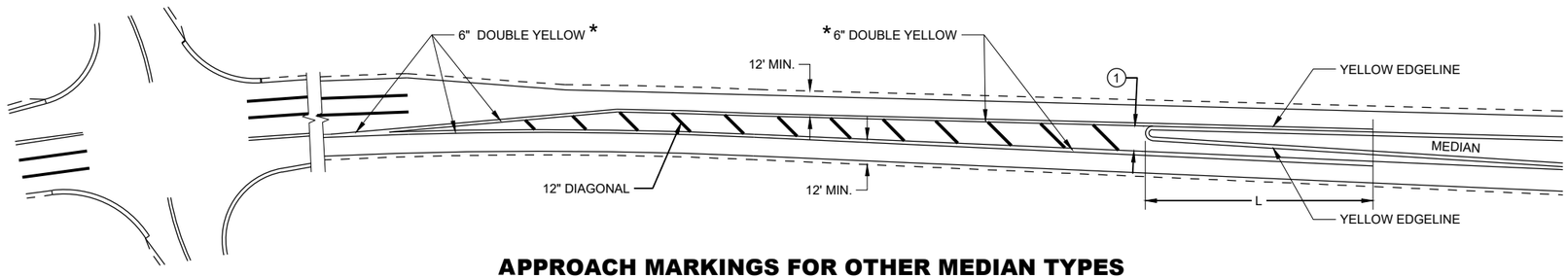
SDD 15C11 - 10b

6

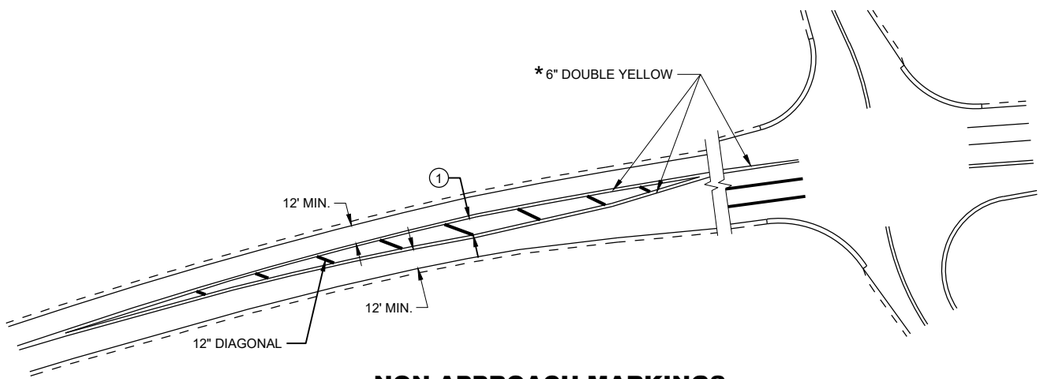
SDD 15C11 - 10b



MEDIAN ISLAND DETAIL



APPROACH MARKINGS FOR OTHER MEDIAN TYPES



NON-APPROACH MARKINGS

GENERAL NOTES

1. DIAGONALS ARE OPTIONAL WHEN PAINTED ISLAND IS LESS THAN 6 FEET AT THE WIDEST POINT. OMIT DIAGONALS IF WIDTH IS LESS THAN 4 FEET.

⇨ DIRECTION OF TRAVEL

* CONFIRM MARKING LINE WIDTH WITH THE MISCELLANEOUS QUANTITIES

SPEED LIMIT	L
<35 MPH	5'
35> MPH	50'

MEDIAN ISLAND PAVEMENT MARKINGS

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

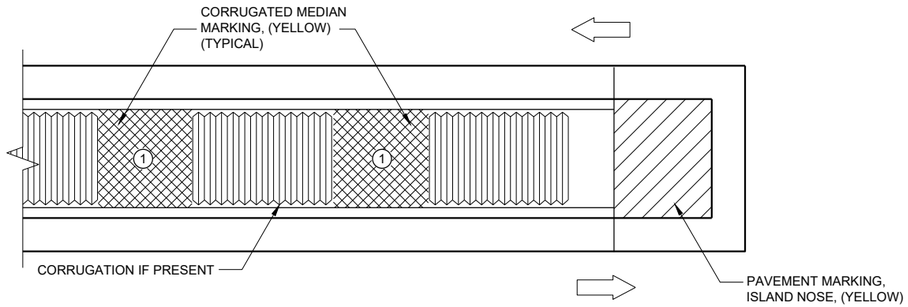
APPROVED
May 2023 — DATE
/S/ Jeannie Silver — STATE SIGNING AND MAF ENGINEER
FHWA

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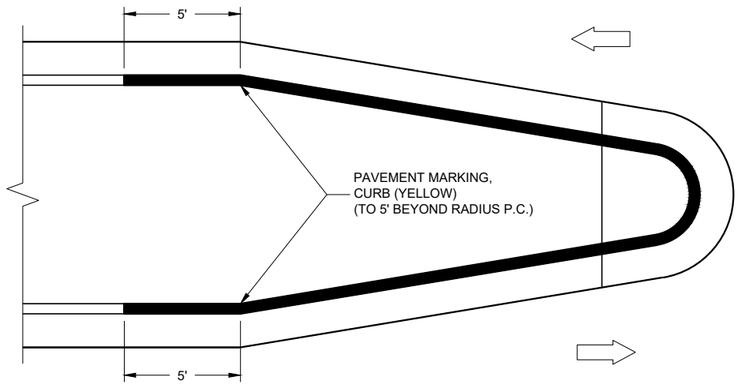
SDD 15C18-08a

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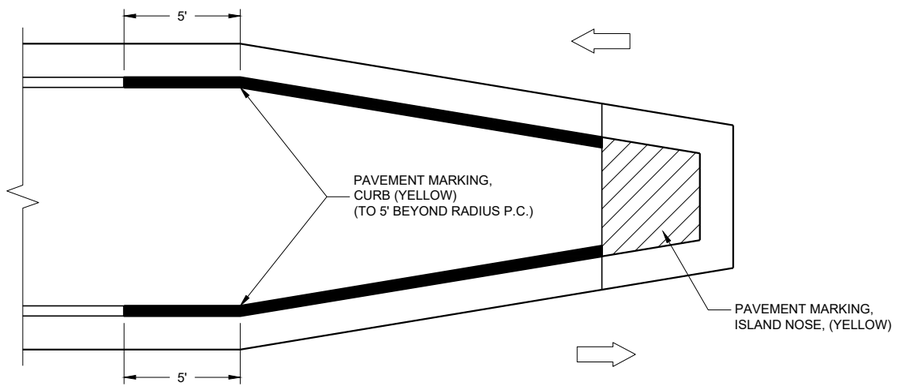
SDD 15C18-08a



MEDIAN ISLAND WITH SQUARE BLUNT NOSE



MEDIAN ISLAND WITH ROUND BLUNT NOSE



MEDIAN ISLAND WITH SLOPED NOSE

TYPICAL PLACEMENT OF PAVEMENT MARKING ON MEDIAN ISLANDS

GENERAL NOTES

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

(1) APPLY PAVEMENT MARKING TO THE FLAT PORTION OF CORRUGATED MEDIAN.

ISLAND NOSE MARKING

CURB MARKING

CORRUGATED MEDIAN MARKING

DIRECTION OF TRAVEL

PAVEMENT MARKINGS, MEDIAN ISLAND NOSE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED

May 2023
DATE

/S/ Jeannie Silver
STATE SIGNING AND MAR ENGINEER

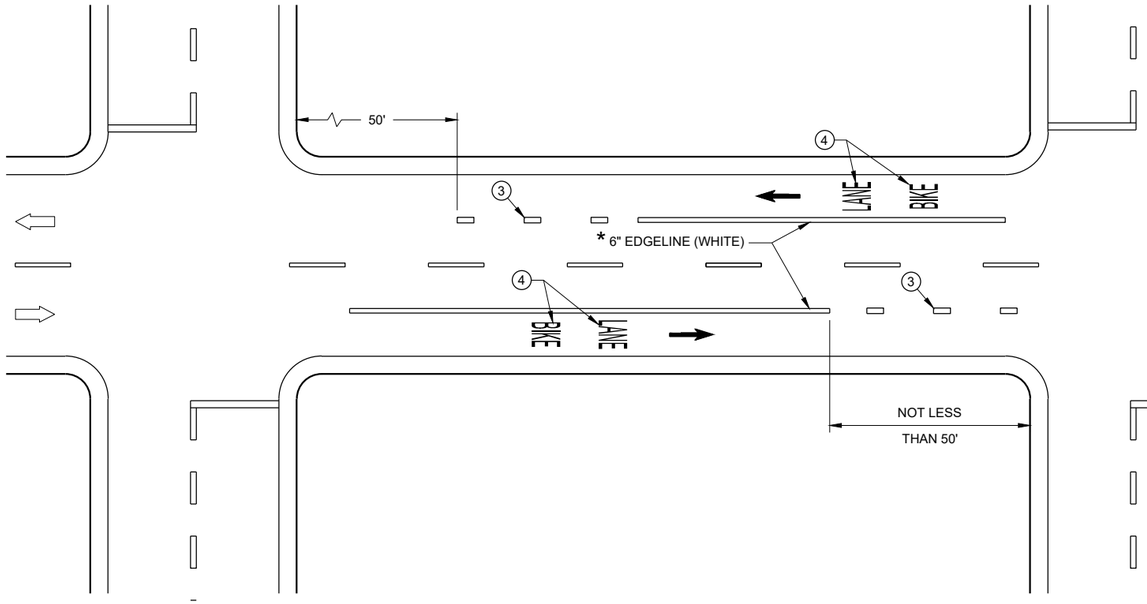
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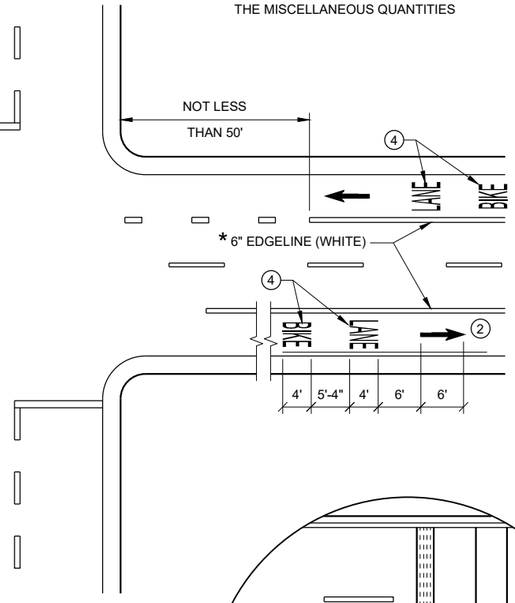
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SDD 15C18-08b

6

SDD 15C18-08b





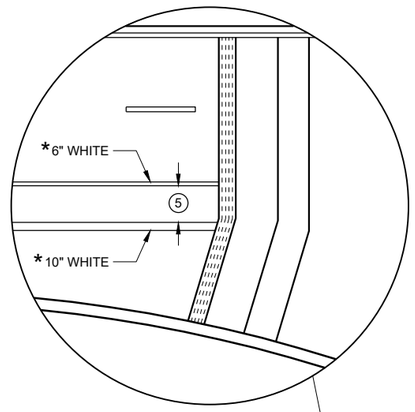
* CONFIRM MARKING LINE WIDTH WITH THE MISCELLANEOUS QUANTITIES

GENERAL NOTES

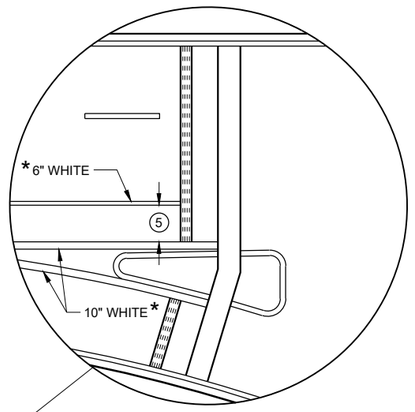
1. DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO STANDARD SPECIFICATIONS AND SPECIAL PROVISIONS.
2. MINIMUM OF ONE PER BLOCK. MAXIMUM OF 250 FEET.
3. DOTTED LINES (3' LINE, 9' GAP) SHOULD BE USED 50 FEET TO 200 FEET IN ADVANCE OF AN INTERSECTION WHERE THERE IS NO RIGHT TURN ONLY LANE AND THERE IS HEAVY RIGHT TURN TRAFFIC OR THERE IS A NEAR-SIDE BUS STOP. AT OTHER INTERSECTIONS WHERE RIGHT TURN TRAFFIC IS LIGHT TO MODERATE, A SOLID LINE CAN BE USED UP TO THE INTERSECTION.
4. BIKE SYMBOLS OR WORDS MAY BE USED.
5. BIKE ACCOMMODATION IS TYPICAL 5 FEET WIDE AND MINIMUM OF 4 FEET FROM A LONGITUDINAL JOINT. USE 5 FEET AT ≥ 45 MPH.
6. OMIT THESE MARKINGS FOR WIDER TURN LANE APPLICATIONS (MINIMUM OF 15 FOOT WIDE TURN LANE).
7. REFER TO CONTRACT PLANS FOR LANE WIDTH.

DIRECTION OF TRAVEL

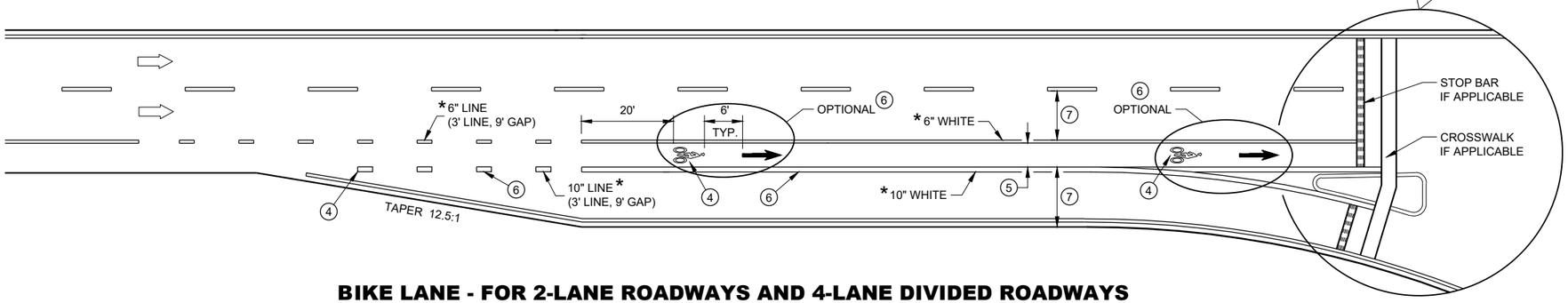
DESIGNATED BIKE LANE - NO PARKING



4 LANE DIVIDED WITHOUT ISLAND



4 LANE DIVIDED WITH ISLAND



BIKE LANE - FOR 2-LANE ROADWAYS AND 4-LANE DIVIDED ROADWAYS (4-LANE DIVIDED WITH RIGHT TURN LANE SHOWN)

BIKE LANE MARKING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2023 — DATE
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FHWA

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SDD 15C29-08a

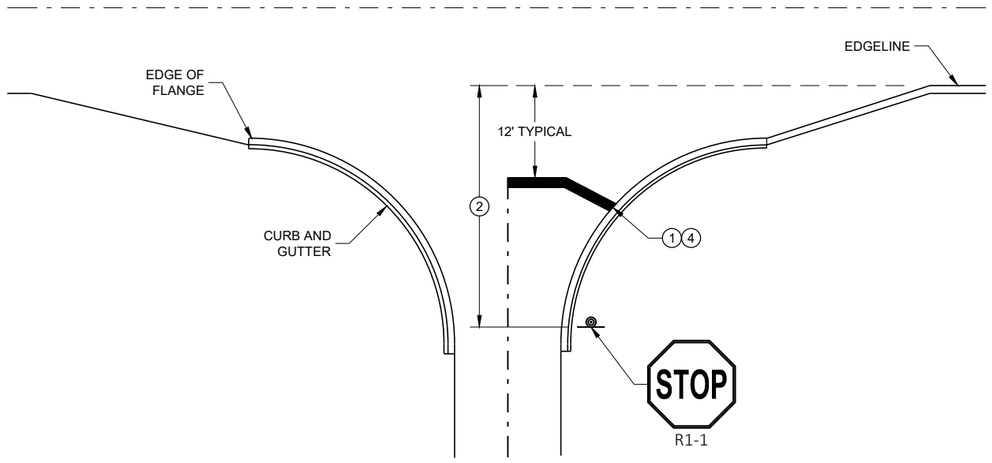
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SDD 15C29-08a

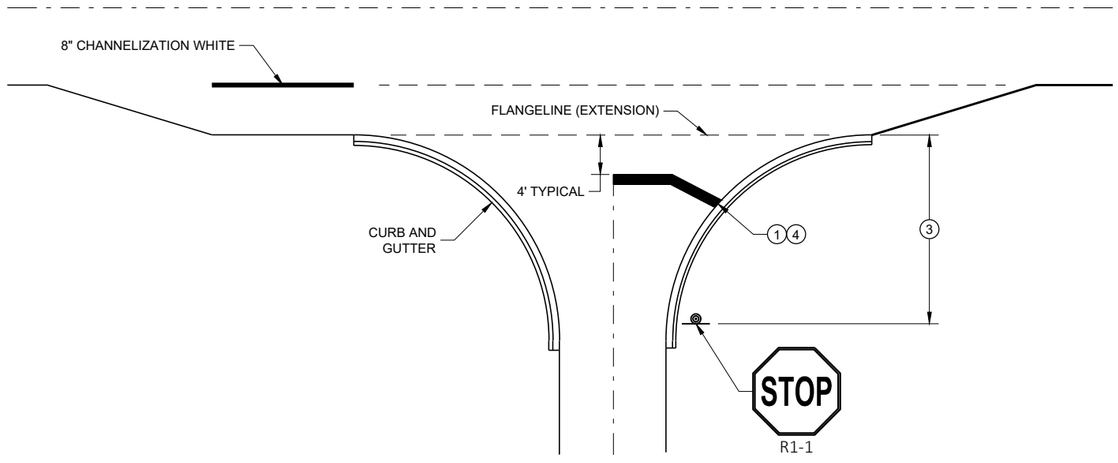
GENERAL NOTES

STOP SIGN SHALL BE PLACED A MINIMUM OF 6 FEET TO A MAXIMUM OF 50 FEET FROM THE EDGELINE LOCATION.

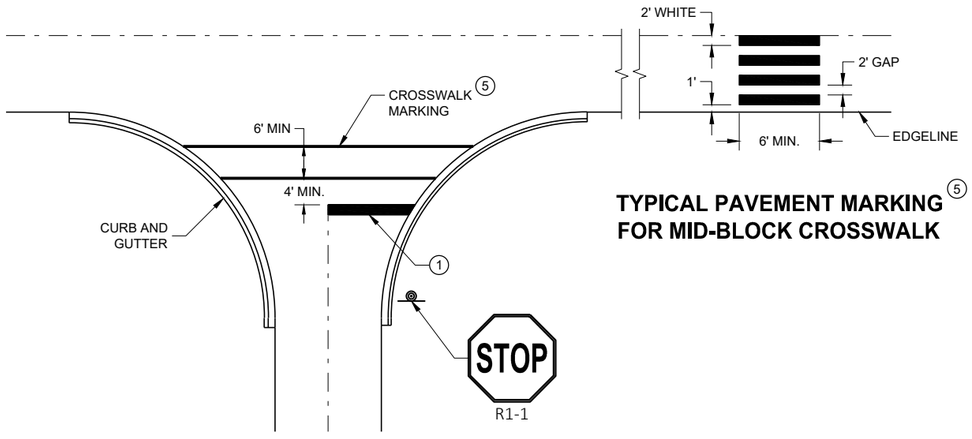
1. 18-INCH STOP LINES MAY BE DELETED OR ADDED BY THE REGION MARKING ENGINEER BASED ON VISIBILITY AND SIGHT LINES.
2. NO STOP LINE IS REQUIRED IF STOP SIGN IS LESS THAN OR EQUAL TO 40 FEET FROM THE EDGELINE.
3. NO STOP LINE IS REQUIRED IF STOP SIGN IS LESS THAN OR EQUAL TO 30 FEET FROM THE FLANGELINE EXTENSION.
4. MOVE CLOSER TO THE EDGE OF TRAVEL LINE AS NEEDED FOR VISIBILITY AND SIGHT LINES (NO CLOSER THAN 4 FEET).
5. LADDER BAR CROSSWALKS SHOULD ONLY BE USED FOR MID BLOCK CROSSINGS. USE 2 - 6" TRANSVERSE LINES INSTEAD.



TYPICAL STOP LINE PAVEMENT MARKING WITH CURB AND GUTTER

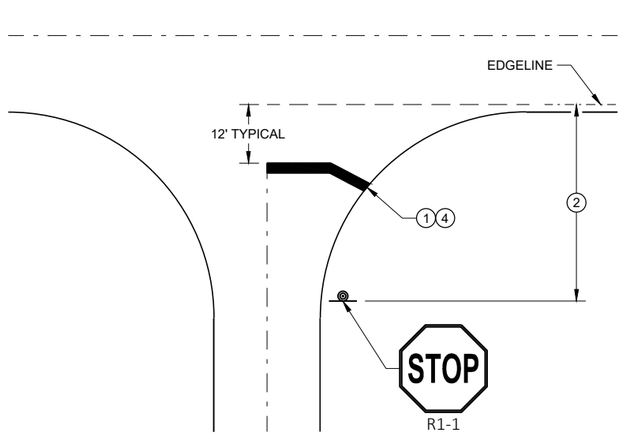


TYPICAL STOP LINE PAVEMENT MARKING FOR SIDEROADS WITH RIGHT TURN LANE



TYPICAL STOP LINE PAVEMENT MARKING FOR SIDEROADS WITH CROSSWALK MARKING

TYPICAL PAVEMENT MARKING FOR MID-BLOCK CROSSWALK 5



TYPICAL STOP LINE PAVEMENT MARKING WITHOUT CURB AND GUTTER

STOP LINE AND CROSSWALK PAVEMENT MARKING

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

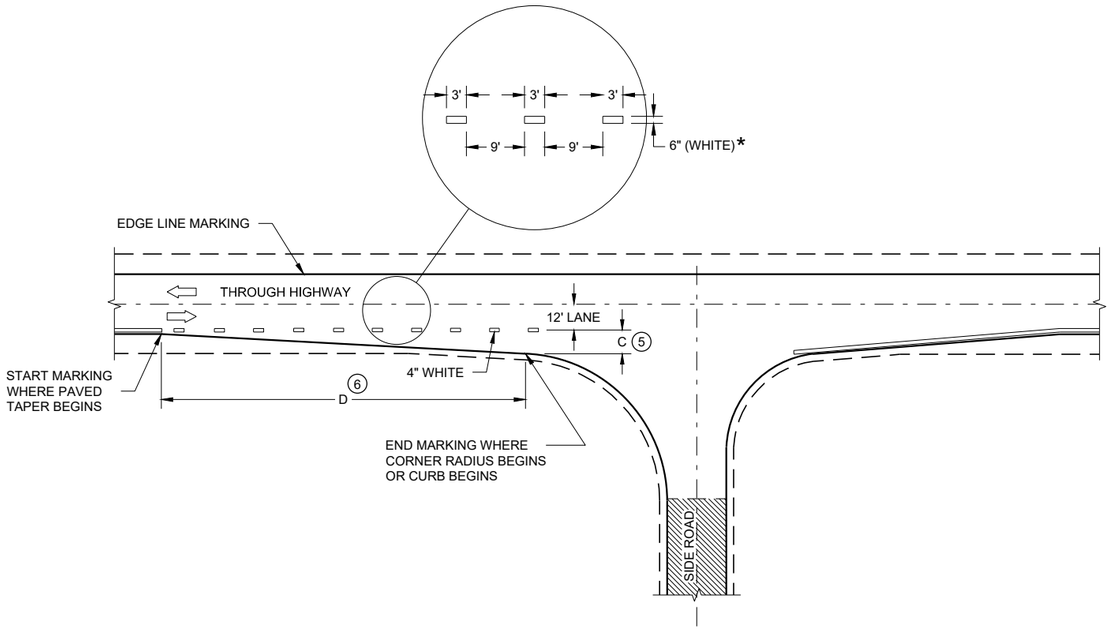
APPROVED
November 2019
DATE

/S/ Matthew Rauch
STATE SIGNING AND MARKING ENGINEER

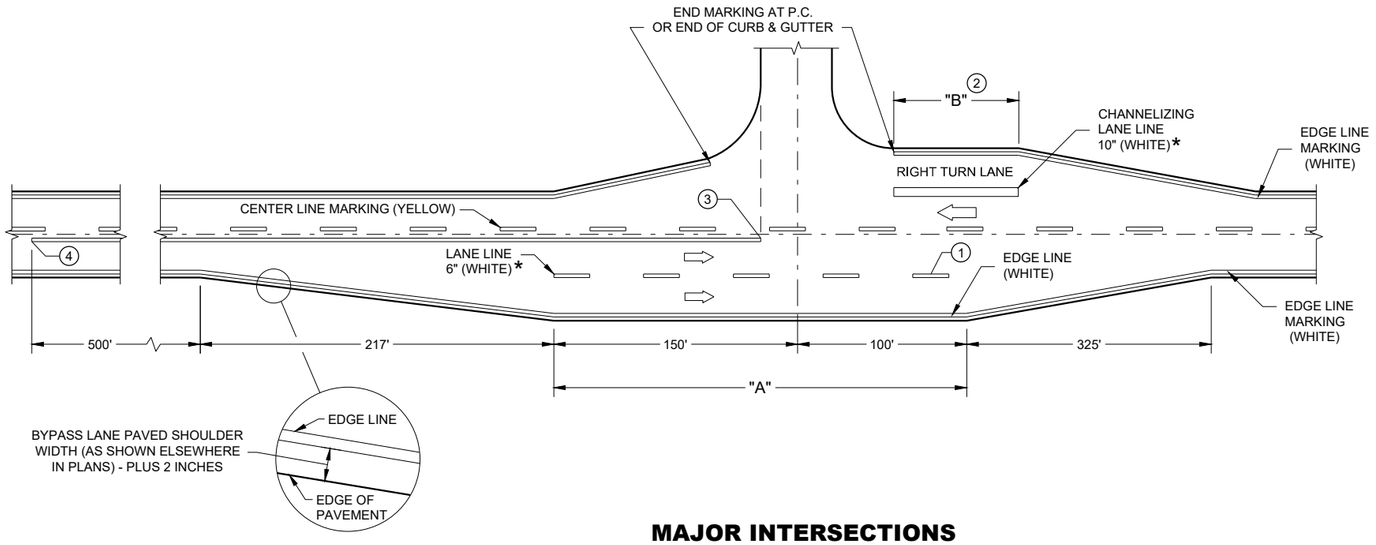
FHWA

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SDD 15C33 - 04



MINOR INTERSECTION



MAJOR INTERSECTIONS

(INTERSECTION WITH FULL RIGHT TURN LANE OR BYPASS LANE)

* CONFIRM MARKING LINE WIDTH WITH THE MISCELLANEOUS QUANTITIES

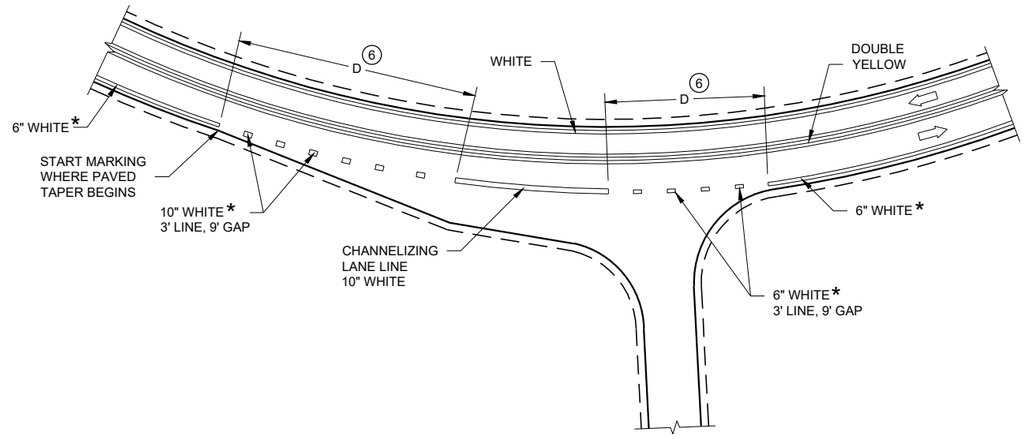
GENERAL NOTES

OMIT EDGE LINES THROUGH INTERSECTIONS. CONTINUE EDGE LINES THROUGH DRIVEWAYS.

1. WHEN DISTANCE "A" IS LESS THAN 250 FEET, OMIT LANE LINE.
2. WHEN DISTANCE "B" IS LESS THAN 100 FEET, OMIT CHANNELIZING LANE LINE.
3. BARRIER LINE ENDS AT SIDE ROAD PAVEMENT / SURFACE EDGE EXTENSION.
4. BARRIER LINE STARTS 500 FEET PRIOR TO THE BYPASS TAPER.
5. WHEN DISTANCE "C" IS LESS THAN 4 FEET, OMIT DOTTED EXTENSION.
6. WHEN DISTANCE "D" IS LESS THAN 50 FEET, OMIT DOTTED EXTENSION.

LEGEND

DIRECTION OF TRAVEL



INTERSECTION ON OUTSIDE OF CURVE

PAVEMENT MARKING (INTERSECTIONS)

SDD 15C35-06a

6

LEGEND

- SIGN ON PERMANENT SUPPORT
- TRAFFIC CONTROL DRUM
- TRAFFIC CONTROL DRUM WITH TYPE "C" STEADY BURN LIGHT
- TYPE III BARRICADE WITH ATTACHED SIGN
- TYPE "A" WARNING LIGHT (FLASHING)
- FLASHING ARROW BOARD
- DIRECTION OF TRAFFIC
- REMOVE PAVEMENT MARKING (SEE GENERAL NOTES)
- WORK AREA



GENERAL NOTES

THIS DETAIL MAY BE USED FOR ROADWAYS WITH EITHER TWO OR THREE LANES IN EACH DIRECTION.

ALL SIGNS ARE 48"X48" UNLESS OTHERWISE NOTED. IF NECESSARY DUE TO SPACE CONSTRAINTS IN URBAN AREAS, 36"X 36" SIGNS MAY BE USED IF APPROVED BY REGIONAL TRAFFIC UNIT.

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

ANY SIGNS TEMPORARY OR EXISTING, WHICH CONFLICT WITH THE 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.

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 TEMPORARY SUPPORTS.

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 TO PROVIDE A MINIMUM OF 200 FEET (500' DESIRABLE) DISTANCE TO EXISTING SIGNS THAT WILL REMAIN IN PLACE

W20-1A, G20-1 AND G20-2A SIGNS ARE NOT REQUIRED IF THE LANE CLOSURE IS WITHIN A LARGER WORK ZONE WHERE THESE SIGNS ARE ALREADY PRESENT.

REMOVE PAVEMENT MARKINGS AND PLACE TEMPORARY PAVEMENT MARKING LINE IF LANE CLOSURE IS TO BE IN PLACE FOR 4 OR MORE CONTINUOUS DAYS AND NIGHTS.

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

BARRICADES IN A CLOSED LANE THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY REESTABLISHED UPON COMPLETION OF THE OPERATION, OR FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

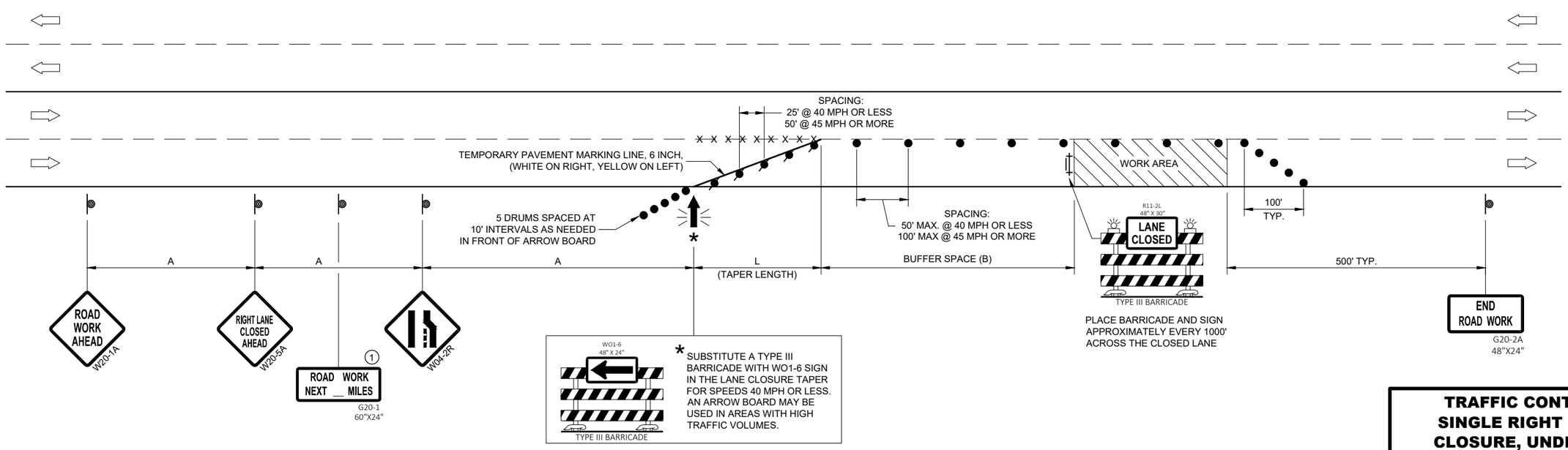
CHANNELIZING DEVICES PLACED ADJACENT TO WORK AREA SHALL BE PULLED BACK FROM THE TRAVEL LANE WHEN WORK IS NOT IN PROGRESS.

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

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

POSTED SPEED LIMIT PRIOR TO WORK STARTING (MPH)	ADVANCE WARNING SIGN SPACING (A) FEET	TAPER LENGTH (12 FT. LANE) (L) FEET	BUFFER SPACE (B) FEET
25	200'	125'	55'
30	200'	180'	85'
35	350'	245'	120'
40	350'	320'	170'
45	500'	540'	220'
50	500'	600'	280'
55	500'	660'	335'





TRAFFIC CONTROL, SINGLE RIGHT LANE CLOSURE, UNDIVIDED NON-FREEWAY/EXPRESSWAY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2023
DATE

/S/ Andrew Heidtke
WORK ZONE ENGINEER

FHWA

6

SDD 15D20-07b
SDD 15D20-07b

LEGEND

- SIGN ON PERMANENT SUPPORT
- TRAFFIC CONTROL DRUM
- TRAFFIC CONTROL DRUM WITH TYPE "C" STEADY BURN LIGHT
- TYPE III BARRICADE WITH ATTACHED SIGN
- TYPE "A" WARNING LIGHT (FLASHING)
- FLASHING ARROW BOARD
- DIRECTION OF TRAFFIC
- REMOVE PAVEMENT MARKING (SEE GENERAL NOTES)
- WORK AREA

GENERAL NOTES

THIS DETAIL MAY BE USED FOR ROADWAYS WITH EITHER TWO OR THREE LANES IN EACH DIRECTION.

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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 TEMPORARY SUPPORTS.

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DUE TO LACK OF SHOULDER/MEDIAN, ARROW BOARD IS PLACED AT THE THE END OF THE TAPER.

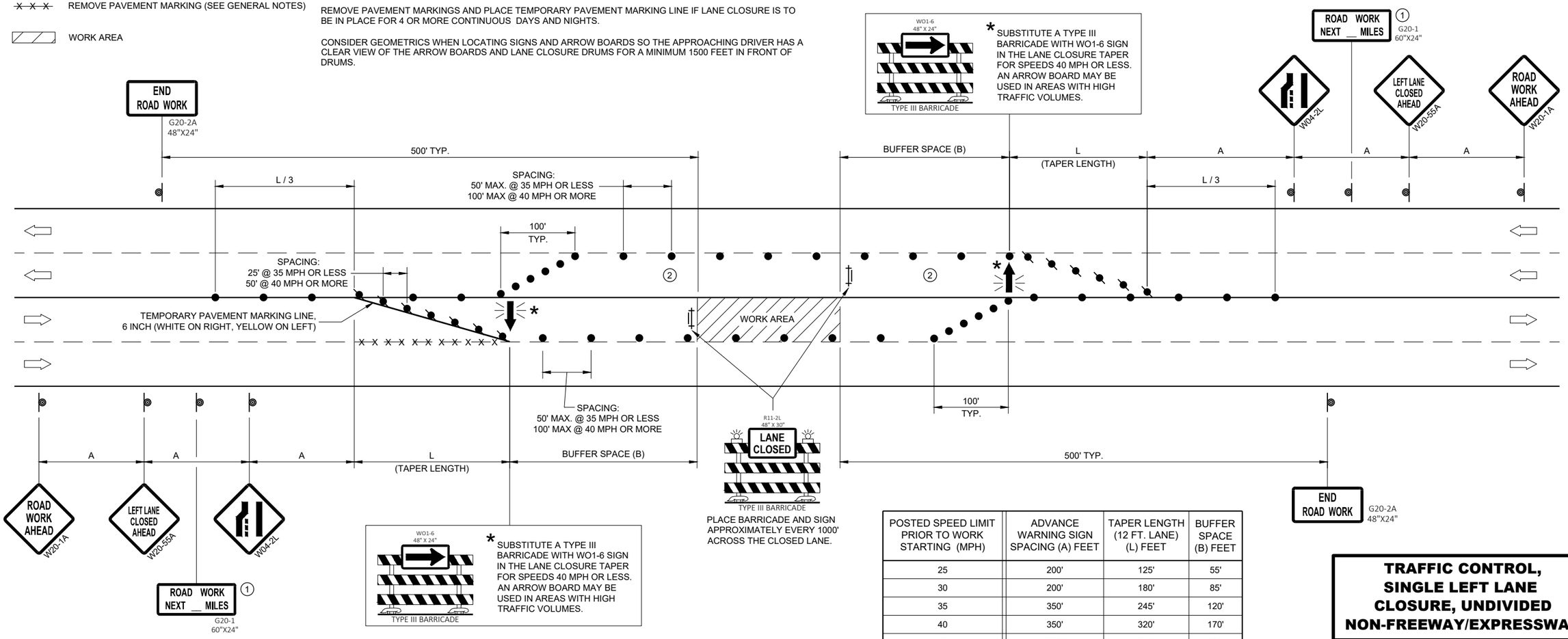
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CHANNELIZING DEVICES PLACED ADJACENT TO WORK AREA SHALL BE PULLED BACK FROM THE TRAVEL LANE WHEN WORK IS NOT IN PROGRESS.

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

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

(2) LANE MAY BE OPENED WHEN WORKERS ARE NOT PRESENT IN THE WORK AREA.



* SUBSTITUTE A TYPE III BARRICADE WITH WO1-6 SIGN IN THE LANE CLOSURE TAPER FOR SPEEDS 40 MPH OR LESS. AN ARROW BOARD MAY BE USED IN AREAS WITH HIGH TRAFFIC VOLUMES.

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TRAFFIC CONTROL, SINGLE LEFT LANE CLOSURE, UNDIVIDED NON-FREEWAY/EXPRESSWAY

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
May 2023
DATE

/S/ Andrew Heidtke
WORK ZONE ENGINEE

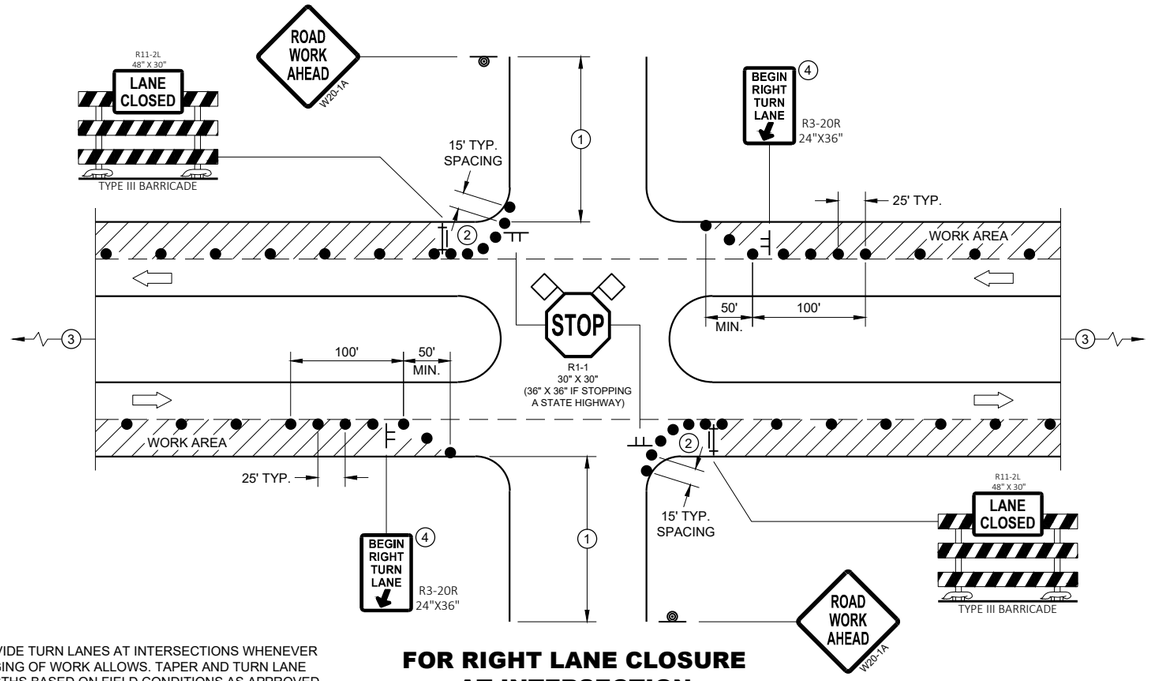
FHWA

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SDD 15D20-07c

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SDD 15D20-07c



PROVIDE TURN LANES AT INTERSECTIONS WHENEVER STAGING OF WORK ALLOWS. TAPER AND TURN LANE LENGTHS BASED ON FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

FOR RIGHT LANE CLOSURE AT INTERSECTION

GENERAL NOTES

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

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

BARRICADES IN A CLOSED LANE THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY REESTABLISHED UPON COMPLETION OF THE OPERATION, OR FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

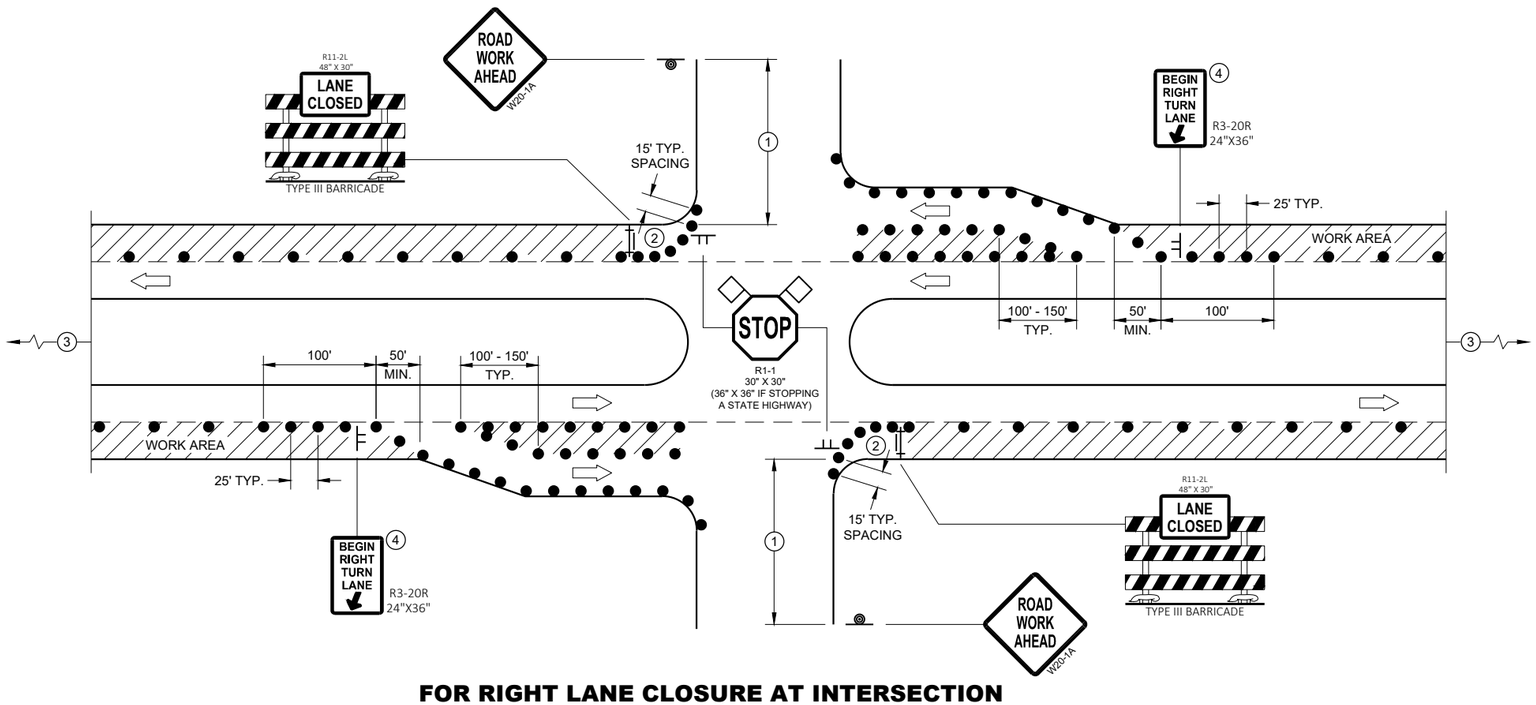
CHANNELIZING DEVICES PLACED ADJACENT TO WORK AREA SHALL BE PULLED BACK FROM THE TRAVEL LANE WHEN WORK IS NOT IN PROGRESS.

(1) 500' TYPICAL OR AT LAST INTERSECTION, WHICHEVER IS CLOSER.
350' IF 35 - 40 MPH.
200' IF 25 - 30 MPH.

(2) ALSO USE BARRICADE AND 15 FOOT TYPICAL DRUM SPACING AT COMMERCIAL DRIVEWAYS

(3) SEE SEPARATE LANE CLOSURE DETAIL FOR ADDITIONAL TRAFFIC CONTROL.

(4) MINIMUM MOUNTING HEIGHT OF 5 FEET FROM EDGE OF PAVEMENT (AT EDGE LINE LOCATION) TO BOTTOM OF SIGN.



FOR RIGHT LANE CLOSURE AT INTERSECTION (WITH RIGHT TURN BAY OPEN)

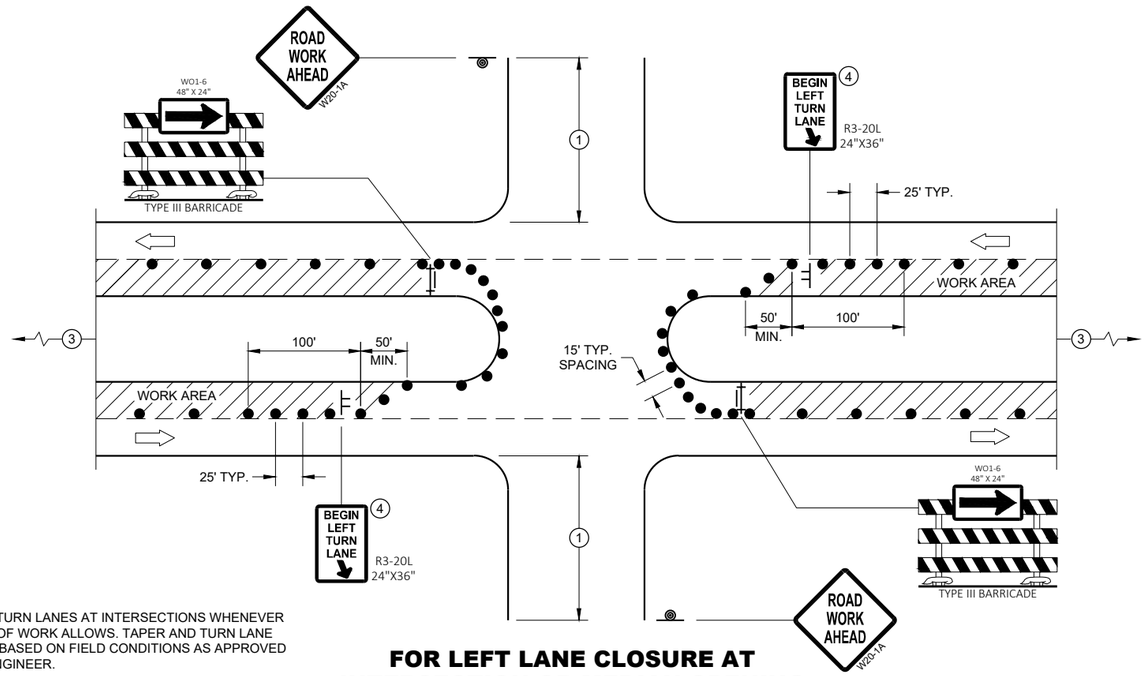
LEGEND

- SIGN ON TEMPORARY SUPPORT
- SIGN ON PERMANENT SUPPORT
- TRAFFIC CONTROL DRUM
- TYPE III BARRICADE WITH ATTACHED SIGN
- DIRECTION OF TRAFFIC
- FLAGS, 16" X 16" MIN., ORANGE
- WORK AREA

TRAFFIC CONTROL, INTERSECTION WITHIN SINGLE RIGHT LANE CLOSURE

SDD 15D21 - 07a

6



PROVIDE TURN LANES AT INTERSECTIONS WHENEVER STAGING OF WORK ALLOWS. TAPER AND TURN LANE LENGTHS BASED ON FIELD CONDITIONS AS APPROVED BY THE ENGINEER.

FOR LEFT LANE CLOSURE AT INTERSECTION OR MEDIAN OPENING

GENERAL NOTES

ALL SIGNS ARE 48"X48" UNLESS OTHERWISE NOTED. IF NECESSARY DUE TO SPACE CONSTRAINTS IN URBAN AREAS, 36" X 36" MAY BE USED IF APPROVED BY THE DISTRICT TRAFFIC UNIT.

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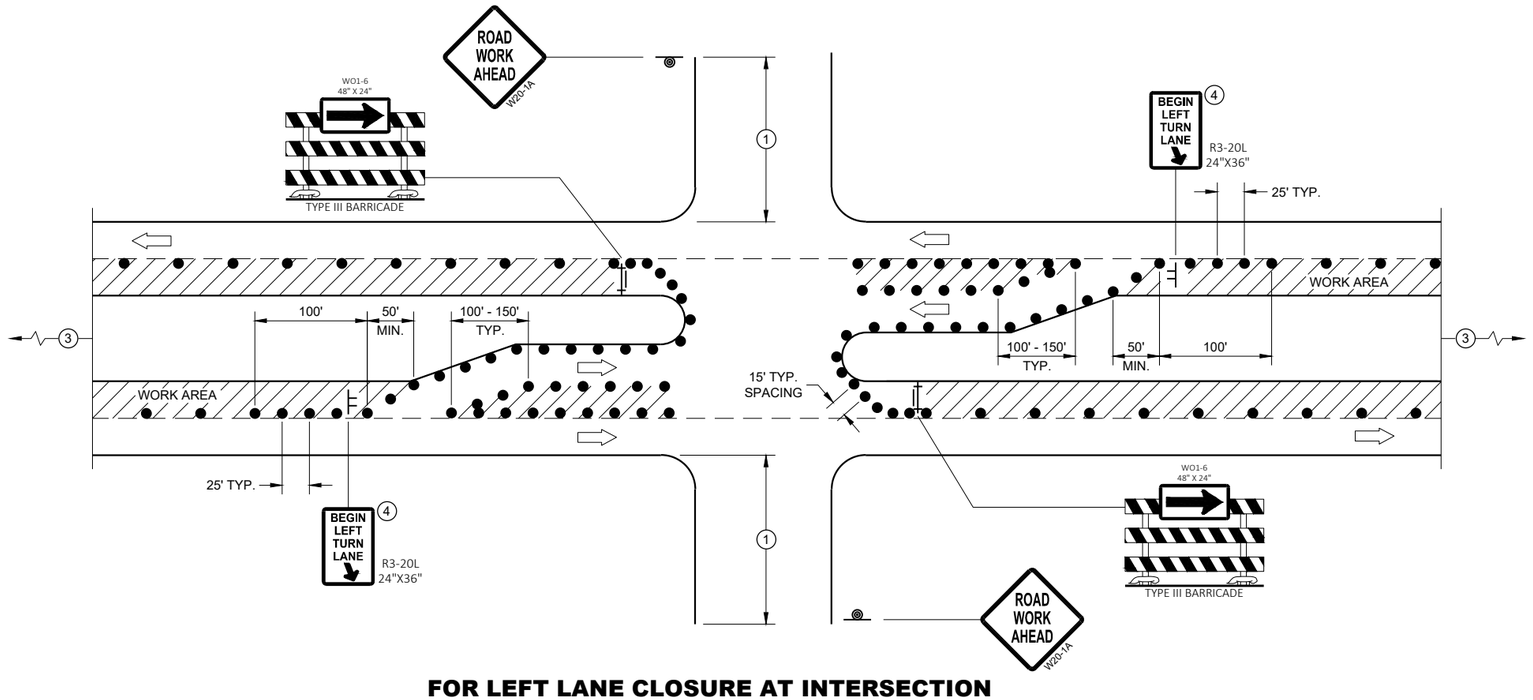
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350' IF 35 - 40 MPH.
200' IF 25 - 30 MPH.

(2) ALSO USE BARRICADE AND 15 FOOT TYPICAL DRUM SPACING AT COMMERCIAL DRIVEWAYS

(3) SEE SEPARATE LANE CLOSURE DETAIL FOR ADDITIONAL TRAFFIC CONTROL.

(4) MINIMUM MOUNTING HEIGHT OF 5 FEET FROM EDGE OF PAVEMENT (AT EDGE LINE LOCATION) TO BOTTOM OF SIGN.



FOR LEFT LANE CLOSURE AT INTERSECTION OR MEDIAN OPENING (WITH LEFT TURN BAY OPEN)

LEGEND

- SIGN ON TEMPORARY SUPPORT
- SIGN ON PERMANENT SUPPORT
- TRAFFIC CONTROL DRUM
- TYPE III BARRICADE WITH ATTACHED SIGN
- DIRECTION OF TRAFFIC
- FLAGS, 16" X 16" MIN., ORANGE
- WORK AREA

TRAFFIC CONTROL, INTERSECTION WITHIN SINGLE LEFT LANE CLOSURE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

APPROVED
August 2020 — DATE
/S/ Andrew Heidtke — WORK ZONE ENGINEER
FHWA

6

SDD 15D21 - 07b

6

SDD 15D21 - 07b

GENERAL NOTES

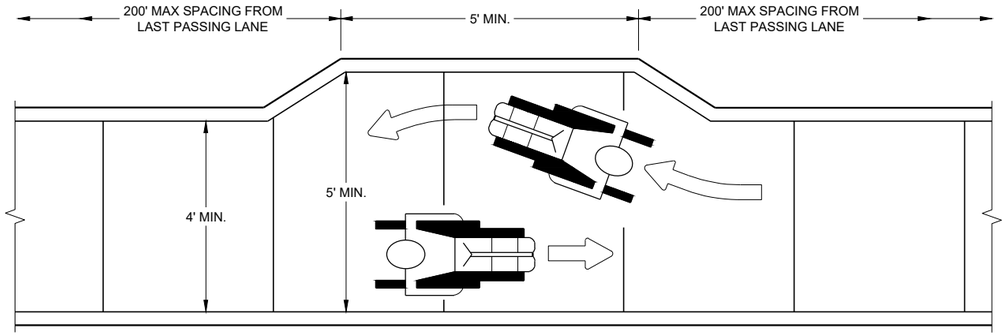
BARRICADE DEVICE SELECTED FROM APPROVED PRODUCT LIST

(1) REFLECTIVE SHEETING SHALL FOLLOW THE REQUIREMENTS IN THE APPROVED PRODUCTS LISTING FOR SIGN SHEETING.

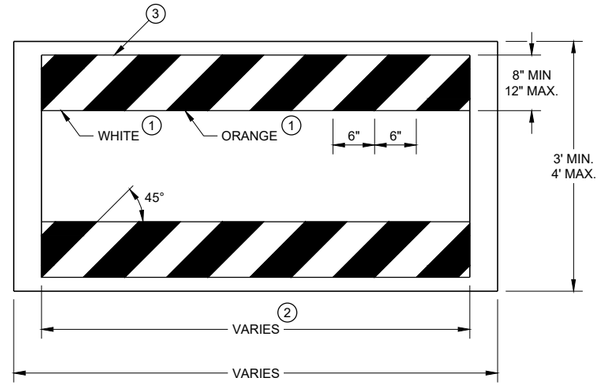
(2) SHEETING REQUIRED ON MORE THAN 50% OF BARRICADE WIDTH.

(3) PLACE SHEETING ON BOTH SIDES OF THE BARRICADE.

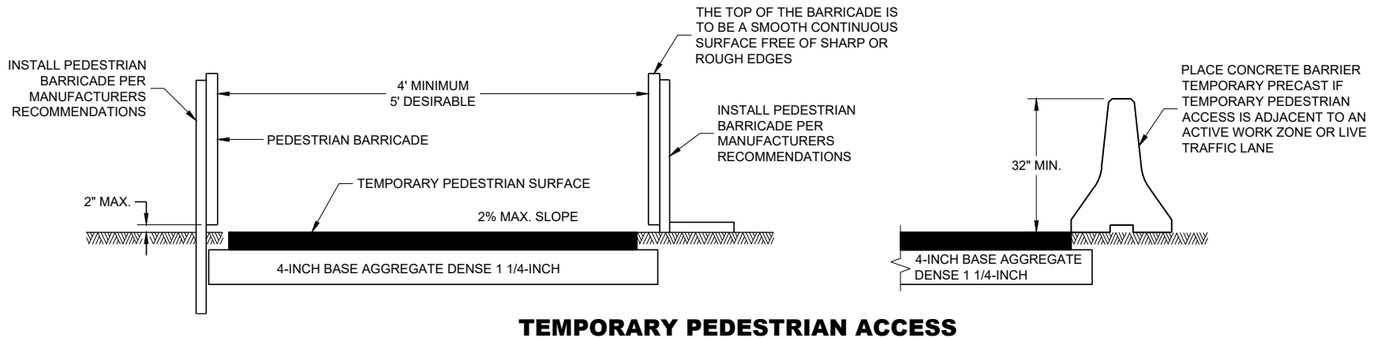
* USE THIS DETAIL FOR SHEETING PLACEMENT REFERENCE.



NARROW SIDEWALK PASSING DETAIL



TEMPORARY PEDESTRIAN BARRICADE*



TEMPORARY PEDESTRIAN ACCESS

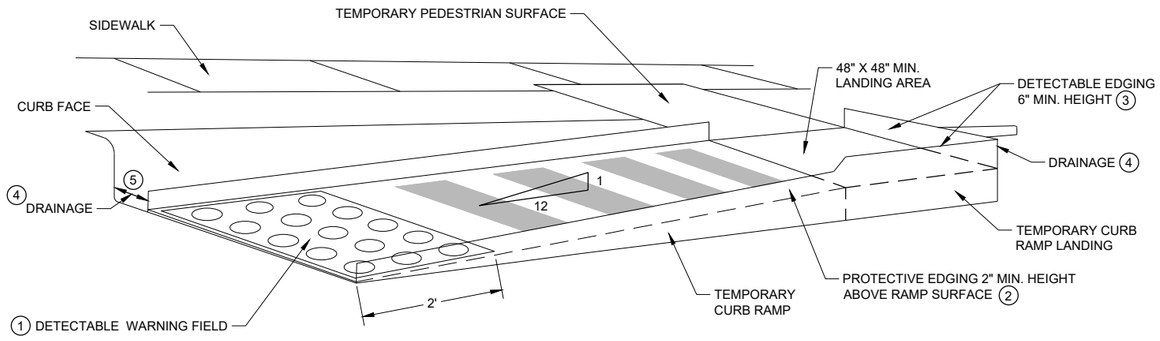
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SDD 15D30 - 09a

SDD 15D30 - 09a

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION



PERSPECTIVE VIEW

GENERAL NOTES

CURB RAMPS SHALL BE 48" MIN. WIDTH WITH A FIRM, STABLE AND SLIP RESISTANT SURFACE.

CURB RAMPS AND LANDINGS SHALL HAVE A 1:50 (2%) MAX. CROSS-SLOPE.

CLEAR SPACE OF 48" X 48" SHALL BE PROVIDED ABOVE AND BELOW THE CURB RAMP. LATERAL JOINTS OR GAPS BETWEEN SURFACES SHALL BE LESS THAN ½" WIDTH.

CHANGES BETWEEN SURFACE HEIGHTS SHALL NOT EXCEED ½". LATERAL EDGES MAY BE VERTICAL UP TO ¼" HIGH AND SHALL BE BEVELED AT 1:2 BETWEEN ¼" AND ½".

(1) INSTALL CONTRASTING TEMPORARY DETECTABLE WARNING FIELD AT PEDESTRIAN STREET CROSSINGS, AS SHOWN IN THE PLANS.

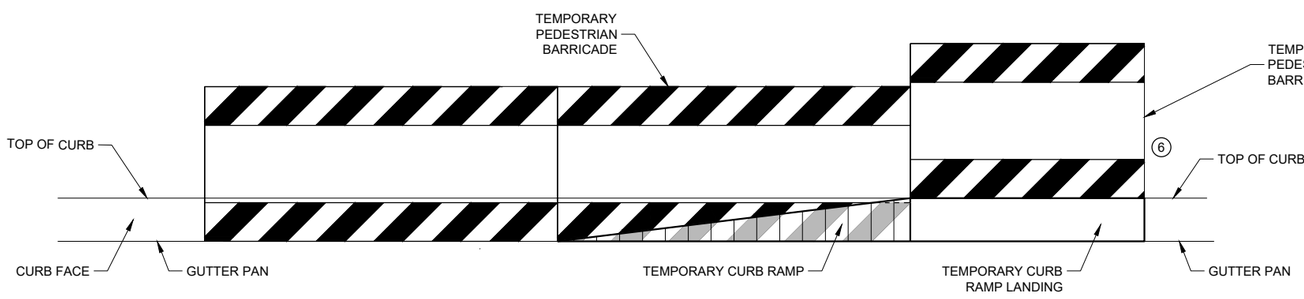
(2) PROTECTIVE EDGING WITH A 2" MIN. HEIGHT SHALL BE INSTALLED WHEN A CURB RAMP OR LANDING PLATFORM HAS A VERTICAL DROP OF 6" OR GREATER OR HAS A SIDE APRON SLOPE STEEPER THAN 1:3 (33%). PROTECTIVE EDGING SHOULD BE CONSIDERED WHEN CURB RAMPS OR LANDING PLATFORMS HAVE A VERTICAL DROP OF 3" OR MORE.

(3) DETECTABLE EDGING WITH 6" MIN. HEIGHT AND CONTRASTING COLOR SHALL BE INSTALLED ON ALL CURB RAMP LANDINGS WHERE THE WALKWAY CHANGES DIRECTION (TURNS).

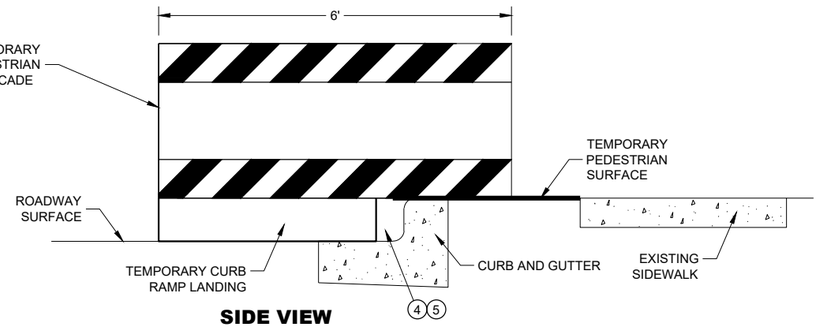
(4) DO NOT RESTRICT WATER FLOW IN THE GUTTER SYSTEM.

(5) ENSURE CURB RAMP IS OUT OF THE GUTTER PAN.

(6) IF ONLY PART OF THE END PANEL OF TEMPORARY PEDESTRIAN BARRICADE PANEL IS NEEDED, EXTEND EXCESS PORTION OF TEMPORARY PEDESTRIAN BARRICADE PANEL HERE.



FRONT VIEW



SIDE VIEW

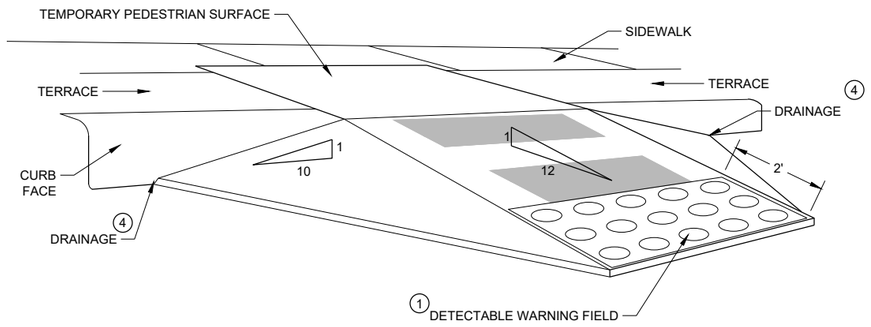
TEMPORARY CURB RAMP PARALLEL TO CURB

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

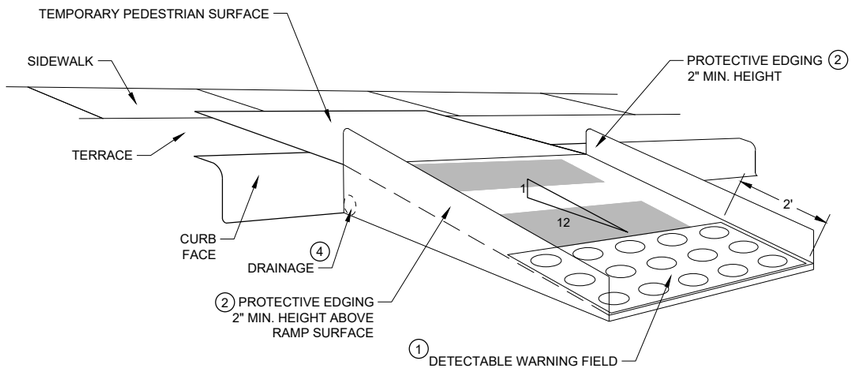
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

SDD 15D30 - 09b



WITH SIDE APRON (5)



WITH PROTECTIVE EDGE

TEMPORARY CURB RAMP PERPENDICULAR TO CURB

GENERAL NOTES

CURB RAMPS SHALL BE 48" MINIMUM WIDTH WITH A FIRM, STABLE AND SLIP RESISTANT SURFACE.

ALTERNATE SIDEWALK WORK BETWEEN LEFT AND RIGHT SIDE OF ROADWAY TO MAINTAIN PEDESTRIAN ACCESS.

CURB RAMPS AND LANDINGS SHALL HAVE A 1:50 (2%) MAX. CROSS-SLOPE.

CLEAR SPACE OF 48" X 48" SHALL BE PROVIDED ABOVE AND BELOW THE CURB RAMP.

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CHANGES BETWEEN SURFACE HEIGHTS SHALL NOT EXCEED ½". LATERAL EDGES MAY BE VERTICAL UP TO ¼" HIGH AND SHALL BE BEVELED AT 1:2 BETWEEN ¼" AND ½".

(1) INSTALL CONTRASTING TEMPORARY DETECTABLE WARNING FIELD AT PEDESTRIAN STREET CROSSINGS, AS SHOWN IN THE PLANS

(2) PROTECTIVE EDGING WITH A 2" MIN. HEIGHT SHALL BE INSTALLED WHEN A CURB RAMP OR LANDING PLATFORM HAS A VERTICAL DROP OF 6" OR GREATER OR HAS A SIDE APRON SLOPE STEEPER THAN 1:3 (33%). PROTECTIVE EDGING SHOULD BE CONSIDERED WHEN CURB RAMPS OR LANDING PLATFORMS HAVE A VERTICAL DROP OF 3" OR MORE.

(3) DETECTABLE EDGING WITH 6" MIN. HEIGHT AND CONTRASTING COLOR SHALL BE INSTALLED ON ALL CURB RAMP LANDINGS WHERE THE WALKWAY CHANGES DIRECTION (TURNS).

(4) DO NOT RESTRICT WATER FLOW IN THE GUTTER SYSTEM.

(5) CAN ONLY BE USED FOR RAMPS WITH 6" OR LESS OF VERTICAL CHANGE.

6
SDD 15D30 - 09c

GENERAL NOTES

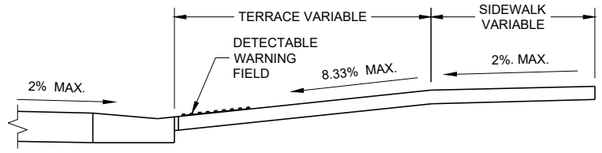
BARRICADE DEVICE SELECTED FROM APPROVED PRODUCT LIST

(1) REFLECTIVE SHEETING SHALL FOLLOW THE REQUIREMENTS IN THE APPROVED PRODUCTS LISTING FOR SIGN SHEETING.

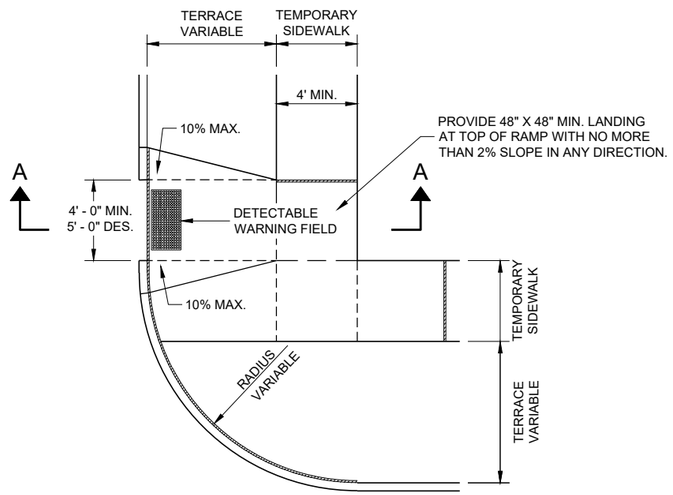
(2) SHEETING REQUIRED ON MORE THAN 50% OF BARRICADE WIDTH.

(3) PLACE SHEETING ON BOTH SIDES OF THE BARRICADE.

* USE THIS DETAIL FOR SHEETING PLACEMENT REFERENCE.



SECTION A - A



PLAN VIEW

TEMPORARY TYPE 3 RAMP

(OUTSIDE OF CROSSWALK AREA)

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

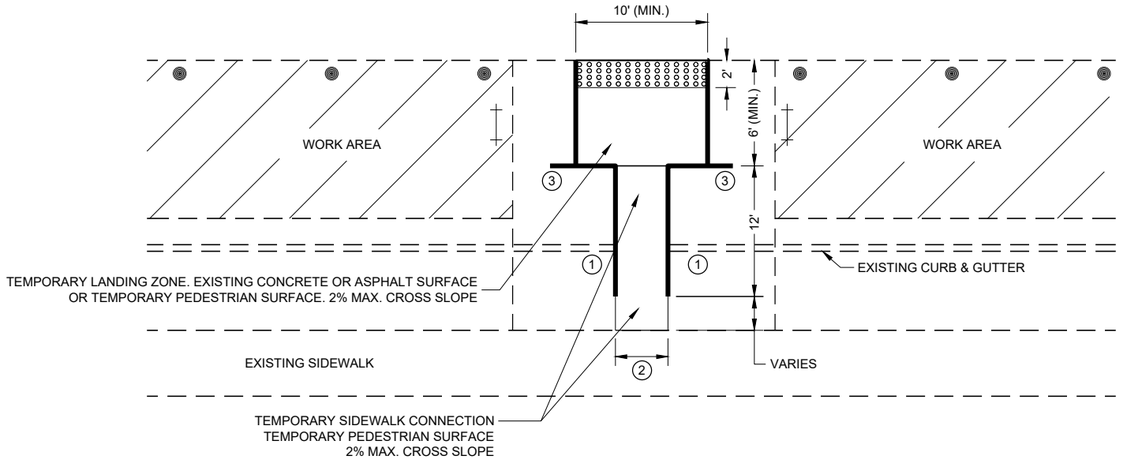
APPROVED
May 2023 — DATE
/S/ Andrew Heidtke — WORK ZONE ENGINEER
FHWA

6

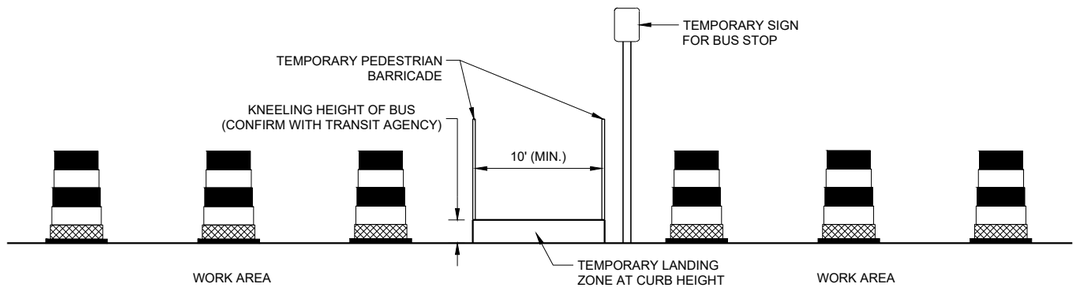
SDD 15D30-09d

6

SDD 15D30-09d



PLAN VIEW



PROFILE VIEW

TEMPORARY BUS STOP PAD

GENERAL NOTES

TYPICAL TEMPORARY PEDESTRIAN BARRICADE PANEL IS 6 FEET LONG.

NOTIFY THE BUS COMPANY 7 DAYS IN ADVANCE OF THE BUS STOP RELOCATION.

PROTECTIVE EDGING WITH A 2" MIN. HEIGHT SHALL BE INSTALLED WHEN A CURB RAMP OR LANDING PLATFORM HAS A VERTICAL DROP OF 6" OR GREATER OR HAS A SIDE APRON SLOPE STEEPER THAN 1:3 (33%). PROTECTIVE EDGING SHOULD BE CONSIDERED WHEN CURB RAMPS OR LANDING PLATFORMS HAVE A VERTICAL DROP OF 3" OR MORE.

DETECTABLE EDGING WITH 6" MIN. HEIGHT AND CONTRASTING COLOR SHALL BE INSTALLED ON ALL CURB RAMP LANDINGS WHERE THE WALKWAY CHANGES DIRECTION (TURNS).

LATERAL JOINTS OR GAPS BETWEEN SURFACES SHALL BE LESS THAN ½" WIDTH.

CHANGES BETWEEN SURFACE HEIGHTS SHALL NOT EXCEED ½". LATERAL EDGES MAY BE VERTICAL UP TO ¼" HIGH AND SHALL BE BEVELED AT 1:2 BETWEEN ¼" AND ½".

CURB RAMPS AND LANDINGS SHALL HAVE A 1:50 (2%) MAX. CROSS-SLOPE.

(1) DO NOT RESTRICT WATER FLOW IN THE GUTTER SYSTEM.

(2) 5' WIDE MIN. WITH TEMPORARY PEDESTRIAN BARRICADE, 10' WIDE MIN. WITHOUT TEMPORARY PEDESTRIAN BARRICADE.

(3) PLACE EXCESS PORTION OF TEMPORARY PEDESTRIAN BARRICADE INTO THIS SPACE.

LEGEND

- TRAFFIC CONTROL DRUM
- TYPE III BARRICADE
- TEMPORARY PEDESTRIAN BARRICADE
- TEMPORARY DETECTABLE WARNING FIELD
- WORK AREA

6

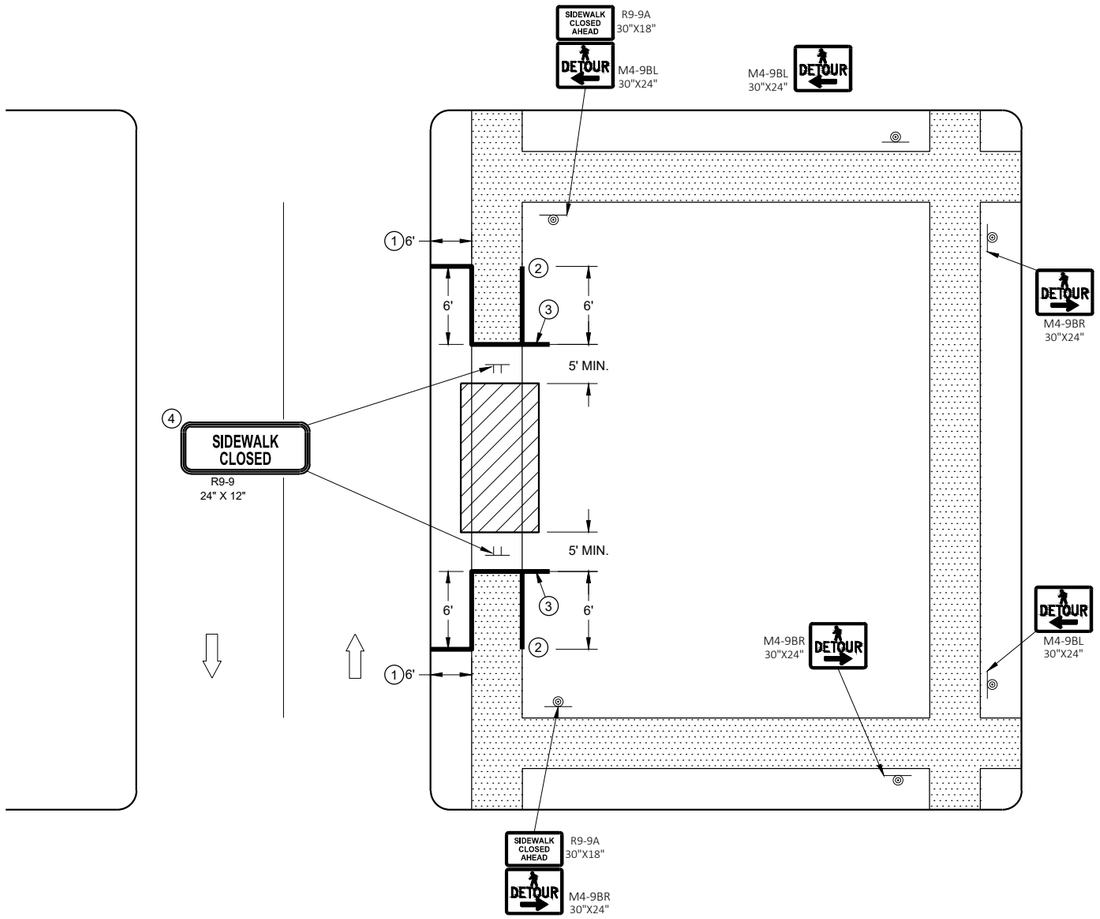
SDD 15D30 - 09e

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTA

LEGEND

- SIGN ON PERMANENT SUPPORT
- SIGN ON TEMPORARY SUPPORT
- UNDER PEDESTRIAN TRAFFIC
- WORK AREA
- TEMPORARY PEDESTRIAN BARRICADE
- DIRECTION OF TRAFFIC



SIDEWALK DETOUR, SIDEWALK ONLY ON ONE SIDE

GENERAL NOTES

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

WHERE TEMPORARY BARRICADE RUNS PARALLEL ALONG SIDEWALK, PLACE THE FACE OF THE BARRICADE AT THE EDGE OF THE SIDEWALK.

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

PLACE TEMPORARY PEDESTRIAN BARRICADE TO FIT FIELD CONDITIONS, AVOIDING CONFLICTS WITH DRIVEWAYS AND OTHER EXISTING FEATURES.

1. IF TERRACE IS LESS THAN 6 FEET WIDE, OMIT TEMPORARY PEDESTRIAN BARRICADE FROM THE SIDEWALK TO THE CURB.
2. PLACE BARRICADE CLOSURE SO THAT THE TEMPORARY PEDESTRIAN BARRICADE END IS AT THE LAST OPEN SIDEWALK ACCESS TO RESIDENCES OR BUSINESSES BEFORE THE SIDEWALK CLOSURE.
3. IF TEMPORARY PEDESTRIAN BARRICADE PANEL IS WIDER THAN THE SIDEWALK WIDTH, THE PORTION OF EXCESS PANEL SHOULD EXTEND INTO THE TERRACE.
4. MOUNTING HEIGHT OF 5 FEET FROM THE SURFACE TO THE BOTTOM OF SIGN.

LEGEND

- SIGN ON TEMPORARY SUPPORT
- WORK AREA
- UNDER PEDESTRIAN TRAFFIC
- TEMPORARY PEDESTRIAN SURFACE
- TEMPORARY PEDESTRIAN BARRICADE
- OPTIONAL TEMPORARY PEDESTRIAN BARRICADE
- DIRECTION OF TRAFFIC

GENERAL NOTES

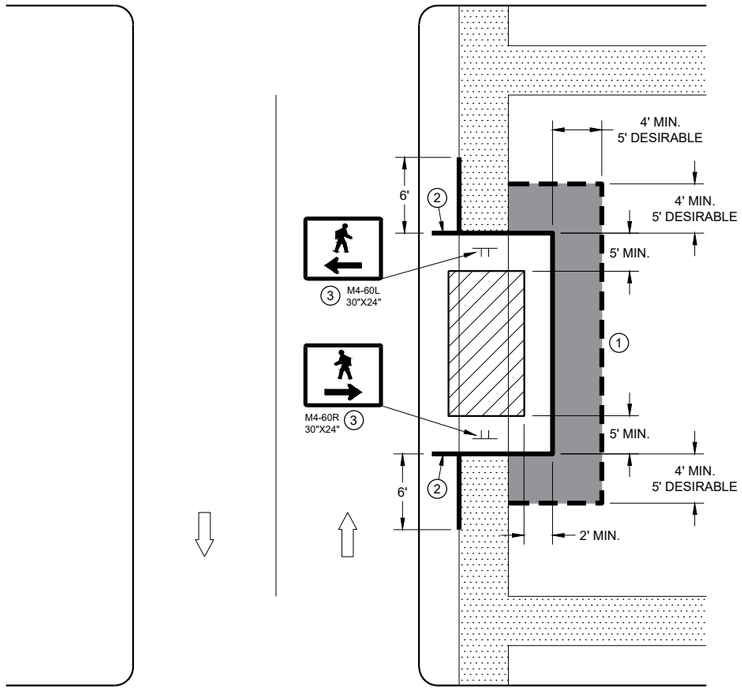
TYPICAL TEMPORARY PEDESTRIAN BARRICADE PANEL IS 6 FEET LONG.

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

WHERE TEMPORARY BARRICADE RUNS PARALLEL ALONG SIDEWALK, PLACE THE FACE OF THE BARRICADE AT THE EDGE OF THE SIDEWALK.

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

1. USE TEMPORARY PEDESTRIAN BARRICADE TO SEPARATE PEDESTRIANS FROM DROP OFFS OR FOR ADDITIONAL PEDESTRIAN CHANNELIZATION.
2. IF TEMPORARY PEDESTRIAN BARRICADE PANEL IS WIDER THAN THE SIDEWALK WIDTH, THE PORTION OF EXCESS PANEL SHOULD EXTEND INTO THE TERRACE.
3. MOUNTING HEIGHT OF 5 FEET FROM THE SURFACE TO THE BOTTOM OF SIGN.



SIDEWALK DIVERSION
SINGLE SIDE

6

SDD 15D30 - 09g

TRAFFIC CONTROL,
PEDESTRIAN ACCOMMODATION

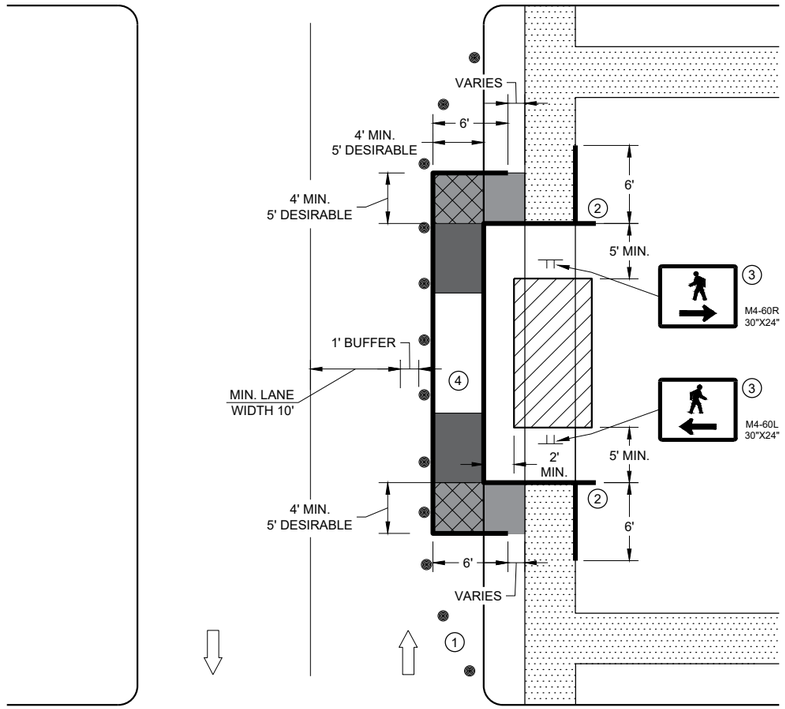
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

6

SDD15D30 - 09g

LEGEND

- SIGN ON TEMPORARY SUPPORT
- TRAFFIC CONTROL DRUM
- WORK AREA
- UNDER PEDESTRIAN TRAFFIC
- TEMPORARY CURB RAMP
- TEMPORARY PEDESTRIAN SURFACE "A"
- TEMPORARY PEDESTRIAN SURFACE "B"
- TEMPORARY PEDESTRIAN BARRICADE
- DIRECTION OF TRAFFIC



SIDEWALK DIVERSION, SINGLE SIDE

GENERAL NOTES

TYPICAL TEMPORARY PEDESTRIAN BARRICADE PANEL IS 6 FEET LONG.

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

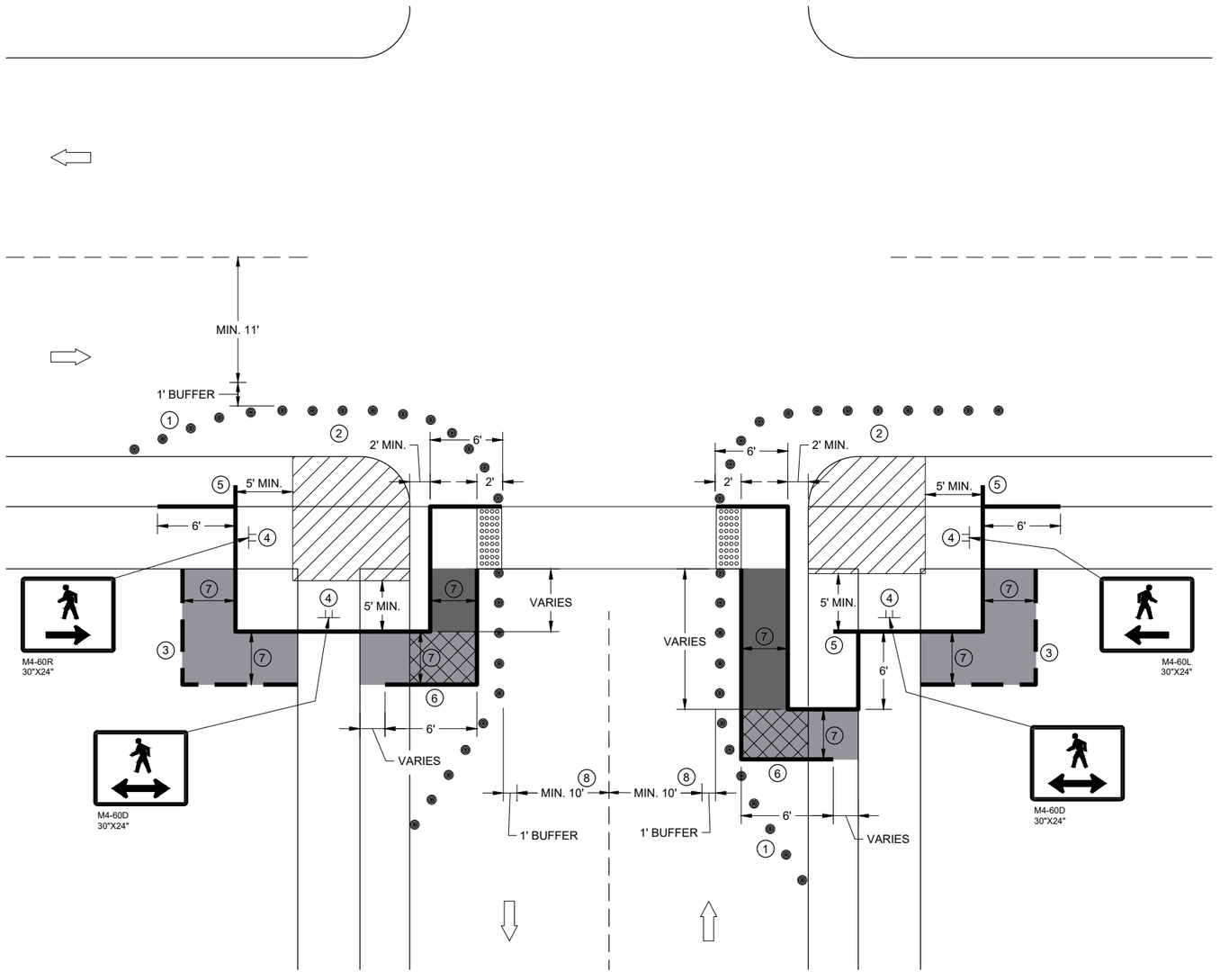
WHERE TEMPORARY BARRICADE RUNS PARALLEL ALONG SIDEWALK, PLACE THE FACE OF THE BARRICADE AT THE EDGE OF THE SIDEWALK.

1. SHOULDER OR LANE CLOSURE ADVANCE WARNING AND BUFFER SPACE REQUIRED.
2. PLACE EXCESS PORTION OF TEMPORARY PEDESTRIAN BARRICADE PANEL PAST THE SIDEWALK ON THE SIDE AWAY FROM THE ROAD.
3. MOUNTING HEIGHT OF 5 FEET FROM THE SURFACE TO THE BOTTOM OF SIGN.
4. USE EXISTING PAVEMENT SURFACE. IF EXISTING PAVEMENT SURACE HAS BEEN REMOVED, USE A TEMPORARY PEDESTRIAN SURFACE.

6

SDD 15D30 - 09h

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION



CURB RAMP PEDESTRIAN TRAFFIC CONTROL
SIDEWALK ON SINGLE SIDE

GENERAL NOTES

IF PEDESTRIAN PUSH BUTTONS ARE PRESENT ON THE EXISTING FACILITY, ENSURE THEY ARE MAINTAINED/ACCESSIBLE FOR PEDESTRIAN USE THROUGHOUT THE TEMPORARY PEDESTRIAN ACCOMMODATIONS.

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

TYPICAL TEMPORARY PEDESTRIAN BARRICADE PANEL IS 6 FEET LONG

WHEN TEMPORARY PEDESTRIAN BARRICADE RUNS PARALLEL ALONG THE SIDEWALK, PLACE THE FACE OF THE BARRICADE AT THE EDGE OF THE SIDEWALK.

(1) SHOULDER OR LANE CLOSURE ADVANCE WARNING AND PROPER BUFFER SPACE REQUIRED.

(2) PROVIDE ADEQUATE SPACE FOR CONTRACTOR OPERATIONS

(3) USE TEMPORARY PEDESTRIAN BARRICADE TO SEPARATE PEDESTRIANS FROM DROP OFFS OR FOR ADDITIONAL PEDESTRIAN CHANNELIZATION.

(4) MOUNTING HEIGHT OF 5 FEET FROM SIDEWALK SURFACE TO BOTTOM OF SIGN.

(5) PLACE EXCESS PORTION OF TEMPORARY PEDESTRIAN BARRICADE PANEL IN THE SIDEWALK TERRACE.

(6) IF TEMPORARY PEDESTRIAN BARRICADE DOES NOT REACH THE FACE OF THE CURB, USE AN ADDITIONAL PANEL AND EXTEND INTO THE TERRACE.

(7) 4 FEET MINIMUM, 5 FEET DESIRABLE

(8) IF MINIMUM LANE WIDTHS CAN'T BE ATTAINED, CURB RAMPS MAY NEED TO BE CONSTRUCTED AT SEPARATE TIMES.

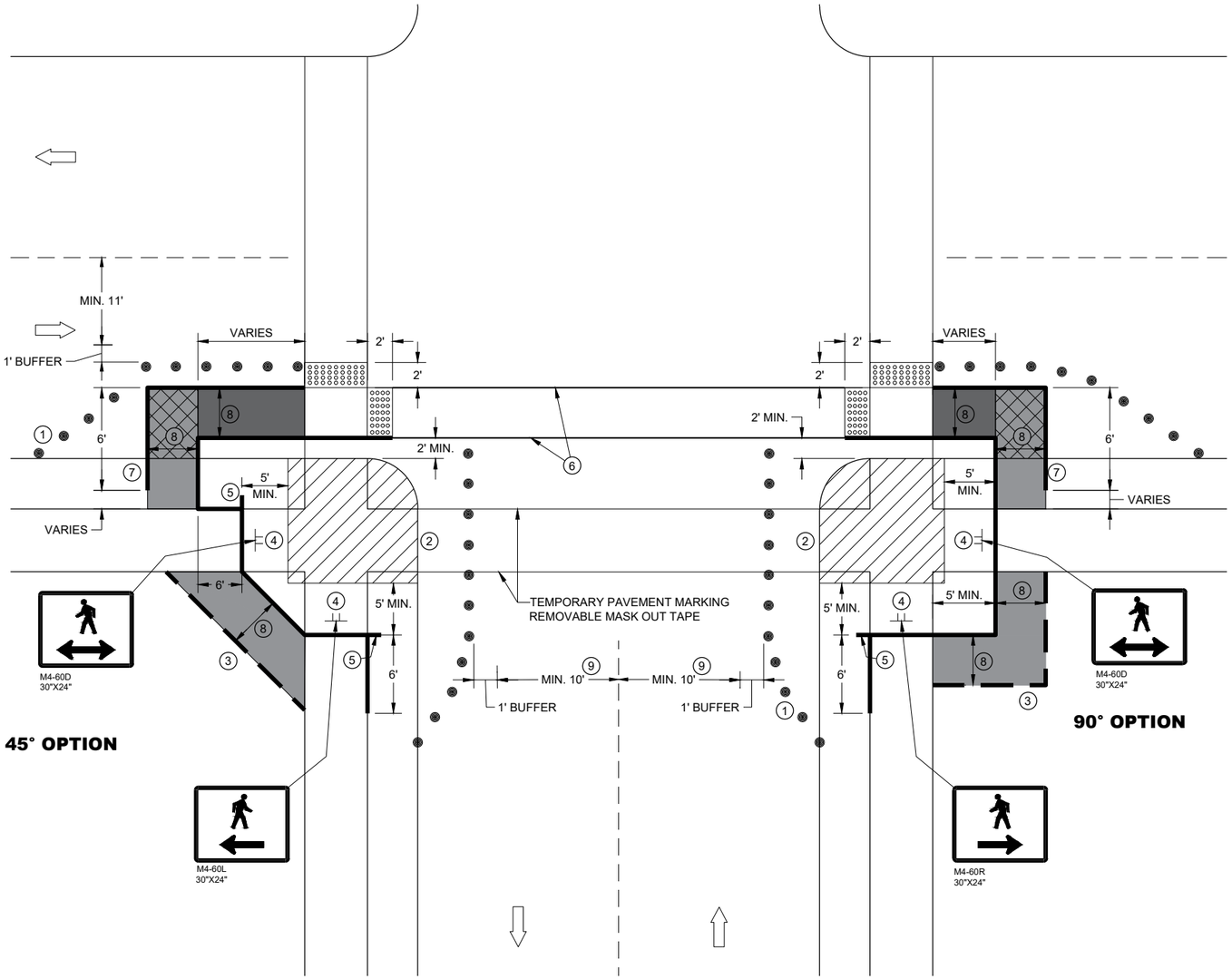
LEGEND

- SIGN ON TEMPORARY SUPPORT
- TRAFFIC CONTROL DRUM
- WORK AREA
- TEMPORARY CURB RAMP
- TEMPORARY PEDESTRIAN SURFACE "A"
- TEMPORARY PEDESTRIAN SURFACE "B"
- TEMPORARY DETECTABLE WARNING FIELD
- TEMPORARY PEDESTRIAN BARRICADE
- OPTIONAL TEMPORARY PEDESTRIAN BARRICADE
- DIRECTION OF TRAFFIC

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

SDD 15D30 - 09i

6



CURB RAMP PEDESTRIAN TRAFFIC CONTROL

GENERAL NOTES

IF PEDESTRIAN PUSH BUTTONS ARE PRESENT ON THE EXISTING FACILITY, ENSURE THEY ARE MAINTAINED/ACCESSIBLE FOR PEDESTRIAN USE THROUGHOUT THE TEMPORARY PEDESTRIAN ACCOMMODATIONS.

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

TYPICAL TEMPORARY PEDESTRIAN BARRICADE PANEL IS 6 FEET LONG

WHEN TEMPORARY PEDESTRIAN BARRICADE RUNS PARALLEL ALONG THE SIDEWALK, PLACE THE FACE OF THE BARRICADE AT THE EDGE OF THE SIDEWALK.

1. SHOULDER OR LANE CLOSURE ADVANCE WARNING AND PROPER BUFFER SPACE REQUIRED.
2. PROVIDE ADEQUATE SPACE FOR CONTRACTOR OPERATIONS
3. USE TEMPORARY PEDESTRIAN BARRICADE TO SEPARATE PEDESTRIANS FROM DROP OFFS OR FOR ADDITIONAL PEDESTRIAN CHANNELIZATION.
4. MOUNTING HEIGHT OF 5 FEET FROM SIDEWALK SURFACE TO BOTTOM OF SIGN.
5. PLACE EXCESS PORTION OF TEMPORARY PEDESTRIAN BARRICADE PANEL IN THE SIDEWALK TERRACE.
6. WHITE 6" TEMPORARY PAVEMENT MARKING
7. IF TEMPORARY PEDESTRIAN BARRICADE DOES NOT REACH THE FACE OF THE CURB, USE AN ADDITIONAL PANEL AND EXTEND INTO THE TERRACE.
8. 4 FEET MINIMUM, 5 FEET DESIRABLE
9. IF MINIMUM LANE WIDTHS CAN'T BE ATTAINED, CURB RAMPS MAY NEED TO BE CONSTRUCTED AT SEPARATE TIMES.

LEGEND

- SIGN ON TEMPORARY SUPPORT
- TRAFFIC CONTROL DRUM
- WORK AREA
- TEMPORARY CURB RAMP
- TEMPORARY PEDESTRIAN SURFACE "A"
- TEMPORARY PEDESTRIAN SURFACE "B"
- TEMPORARY DETECTABLE WARNING FIELD
- TEMPORARY PEDESTRIAN BARRICADE
- OPTIONAL TEMPORARY PEDESTRIAN BARRICADE
- DIRECTION OF TRAFFIC

6

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

SDD 15D30 - 09j

LEGEND

SIGN ON PERMANENT SUPPORT

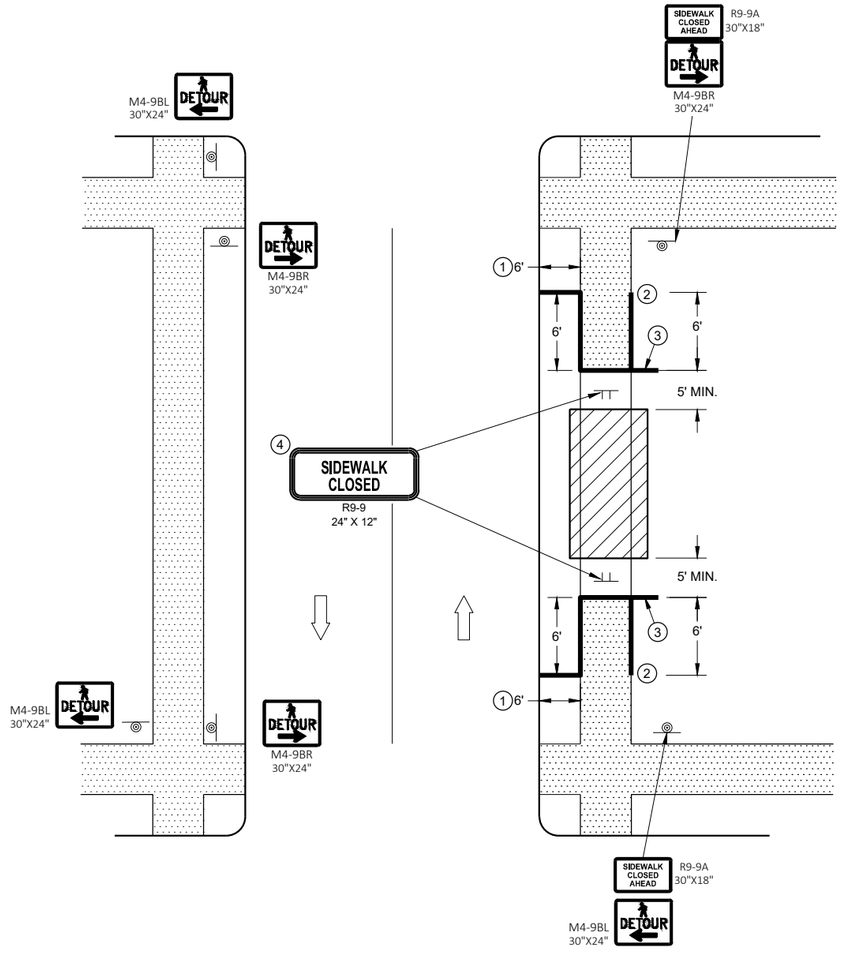
SIGN ON TEMPORARY SUPPORT

UNDER PEDESTRIAN TRAFFIC

WORK AREA

TEMPORARY PEDESTRIAN BARRICADE

DIRECTION OF TRAFFIC



GENERAL NOTES

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

WHERE TEMPORARY BARRICADE RUNS PARALLEL ALONG SIDEWALK, PLACE THE FACE OF THE BARRICADE AT THE EDGE OF THE SIDEWALK.

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

PLACE TEMPORARY PEDESTRIAN BARRICADE TO FIT FIELD CONDITIONS, AVOIDING CONFLICT WITH DRIVEWAYS AND OTHER EXISTING FEATURES.

1. IF TERRACE IS LESS THAN 6 FEET WIDE, OMIT TEMPORARY PEDESTRIAN BARRICADE FROM THE SIDEWALK TO THE CURB.
2. PLACE BARRICADE CLOSURE SO THAT THE TEMPORARY PEDESTRIAN BARRICADE END IS AT THE LAST OPEN SIDEWALK ACCESS TO RESIDENCES OR BUSINESSES BEFORE THE SIDEWALK CLOSURE.
3. IF TEMPORARY PEDESTRIAN BARRICADE PANEL IS WIDER THAN THE SIDEWALK WIDTH, THE PORTION OF EXCESS PANEL SHOULD EXTEND INTO THE TERRACE.
4. MOUNTING HEIGHT OF 5 FEET FROM THE SURFACE TO THE BOTTOM OF SIGN.

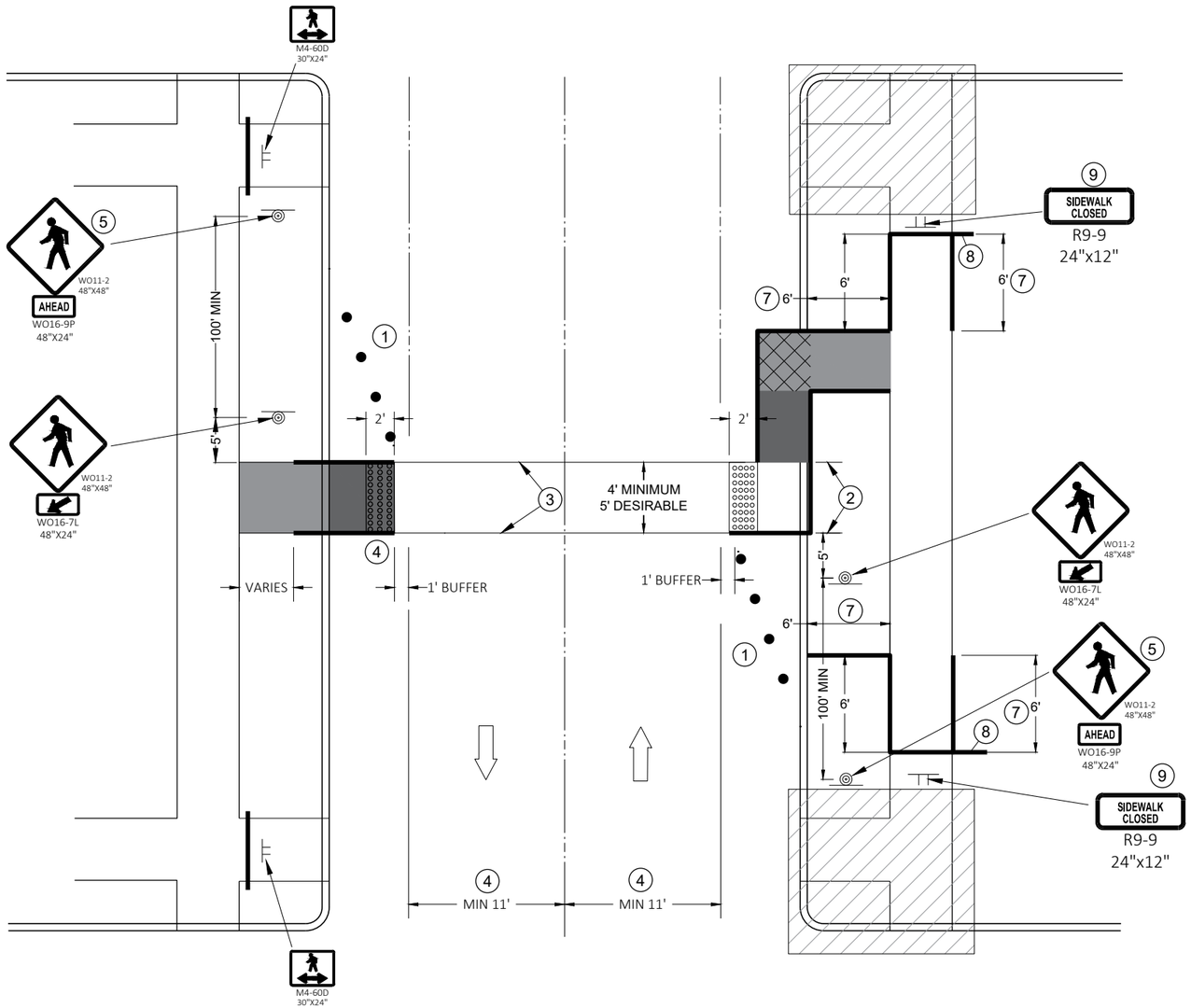
SIDEWALK DETOUR, SIDEWALK ON BOTH SIDES

6

SDD 15D30 - 09k

TRAFFIC CONTROL, PEDESTRIAN ACCOMMODATION

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTAT



TEMPORARY PEDESTRIAN CROSSING

GENERAL NOTES

TYPICAL TEMPORARY PEDESTRIAN BARRICADE PANEL IS 6 FEET LONG.

SIGN LAYOUTS SHALL BE IN ACCORDANCE WITH THE WISCONSIN STANDARD SIGN PLATES.

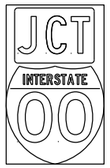
SEE OTHER PEDESTRIAN ACCOMMODATION DETAILS FOR SIGNING AND DEVICES FOR DIFFERENT PEDESTRIAN FACILITIES CLOSURES.

1. SHOULDER OR LANE CLOSURE ADVANCED WARNING AND PROPER BUFFER SPACE REQUIRED.
2. 4 FEET MINIMUM, 5 FEET DESIRABLE.
3. WHITE 6" TEMPORARY PAVEMENT MARKING.
4. IF MINIMUM LANE WIDTHS CAN'T BE ATTAINED, PERPENDICULAR CURB RAMPS MAY NEED TO BE UTILIZED.
5. IF MINIMUM 100' SPACING FROM THE MID-BLOCK CROSSING CANNOT BE ATTAINED BEFORE THE INTERSECTION, REMOVE THIS SIGN ASSEMBLY.
6. IF TERRACE IS LESS THAN 6 FEET WIDE, OMIT TEMPORARY PEDESTRIAN BARRICADE FROM THE SIDEWALK TO THE CURB.
7. PLACE BARRICADE CLOSURE SO THAT THE TEMPORARY PEDESTRIAN BARRICADE END IS AT THE LAST OPEN SIDEWALK ACCESS TO RESIDENCES OR BUSINESSES BEFORE THE SIDEWALK CLOSURE.
8. IF TEMPORARY PEDESTRIAN BARRICADE PANEL IS WIDER THAN THE SIDEWALK WIDTH, THE PORTION OF THE EXCESS PANEL SHOULD EXTEND INTO THE TERRACE.
9. MOUNTING HEIGHT OF 5 FEET FROM THE SURFACE TO THE BOTTOM OF THE SIGN.

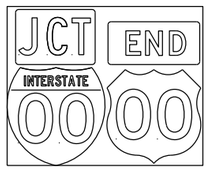
LEGEND

- TRAFFIC CONTROL DRUM
- SIGN ON TEMPORARY SUPPORT
- TEMPORARY CURB RAMP
- TEMPORARY DETECTABLE WARNING FIELD
- TEMPORARY PEDESTRIAN SURFACE "A"
- TEMPORARY PEDESTRIAN SURFACE "B"
- WORK AREA
- TEMPORARY PEDESTRIAN BARRICADE
- DIRECTION OF TRAFFIC

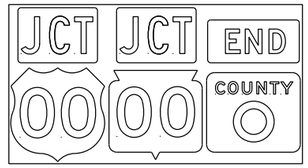
TYPICAL ASSEMBLIES



J1-1



J1-2



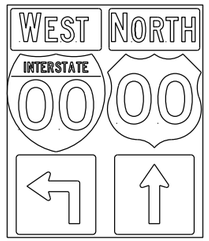
J1-3



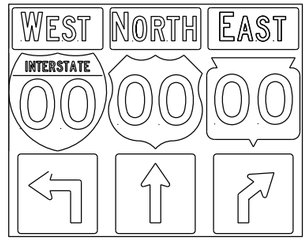
JR1-1



J2-1



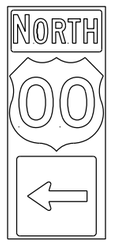
J2-2



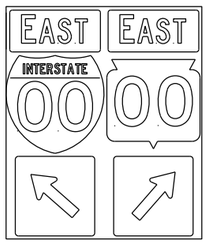
J2-3



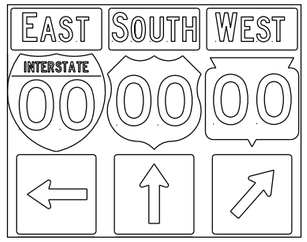
JV
(Typical Vertical J-Assembly
See Note 10 and 11)



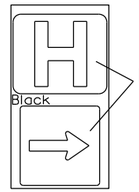
J3-1



J3-2



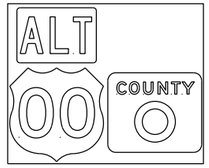
J3-3



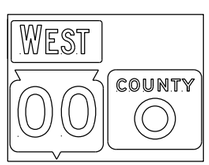
Blue Background
JH-1



J4-1



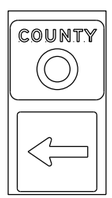
J4-2



J4-2



J12-1



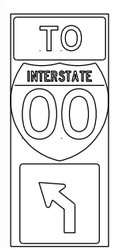
J13-1



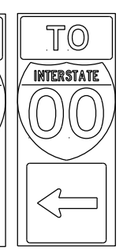
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J33-1



J22-1



J23-1



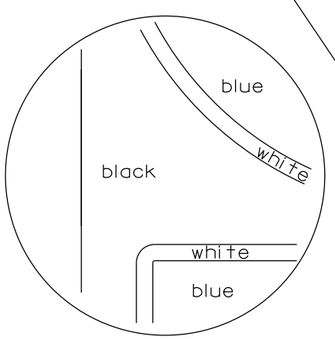
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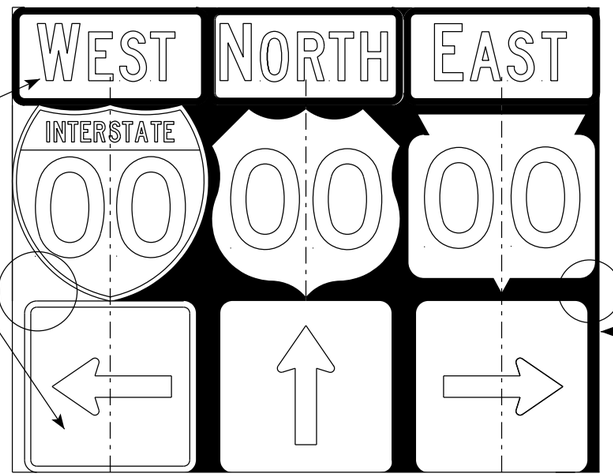


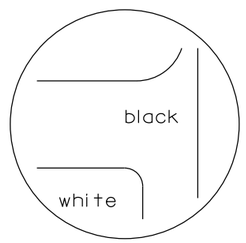
JR23-1



JR99-1







black background

NOTES

1. Signs are Type II - Type H Reflective
2. Color:
   Background - Black Non-reflective
   Message - see Note 5
3. Message Series - See Note 5
4. Corners shall be square or rounded if base material is plywood. If base material is metal the corners shall be rounded.
5. The colors and message spacing on each marker shall be according to the applicable route marker panel specifications.
6. Certain marker heads require the component pieces to be the same color. As an example, all the components used with an M1-1 Interstate marker shall be blue.
7. Single panel j-assemblies shall only be used with route marker shields that are same size. If the route marker shields are different size use multiple piece component.
8. Route assemblies that have 24 inch route shields and have dimensions greater than 48 inches (both vertical and horizontal) shall have one horizontal splice between the arrows and route shields. Vertical splices shall not be used on route assemblies with a horizontal dimension of 144 inches or less. The contractor shall not use more than one vertical joint per sign and the joint shall be between route shields.
9. Route assemblies that have 36 inch shields and have dimensions greater than 48 inchs (both vertical and horizontal) shall have two horizontal splices. One horizontal splice shall be between the cardinal direction and route shields and the other horizontal splice shall be between the arrows and route shields. Vertical splices shall not be used on route assemblies with a horizontal dimension of 144 or less. The contractor shall not use more than one vertical joint per sign and the joint shall be between route shields.
10. All Vertical J Assemblies are given a Sign Code of JV
11. For JV Assemblies that have a mixture of Interstate and non Interstate shields, arrows and cardinals shall be white on blue.

ROUTE MARKERS & COMPONENTS
IN TYPICAL ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/18/21 PLATE NO. A2-1S.9

PROJECT NO:

SHEET NO: 194 E

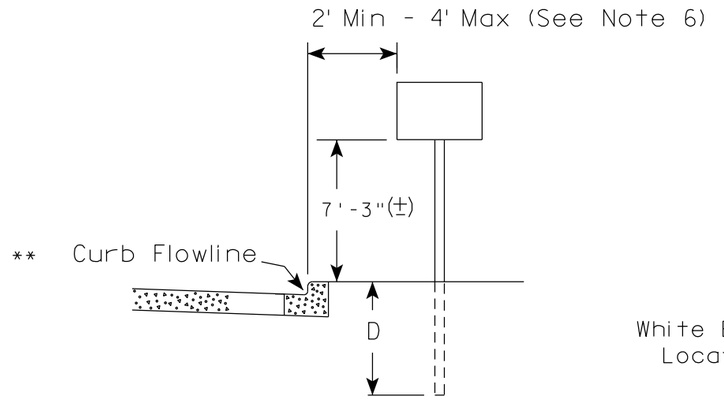
FILE NAME : C:\CAEfiles\Projects\tr_stdplate_A21S.dgn PLOT DATE : 18-MAR 2021 1:37 PLOT BY : mscj9h PLOT NAME :

WISDOT/CADDS SHEET 42

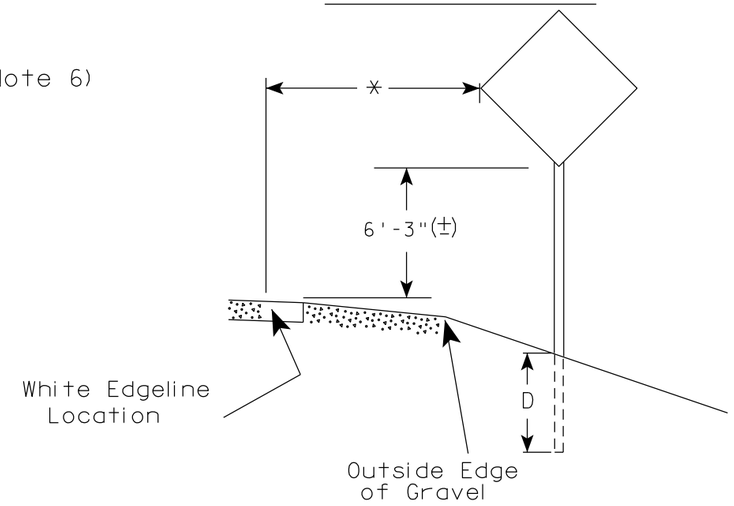
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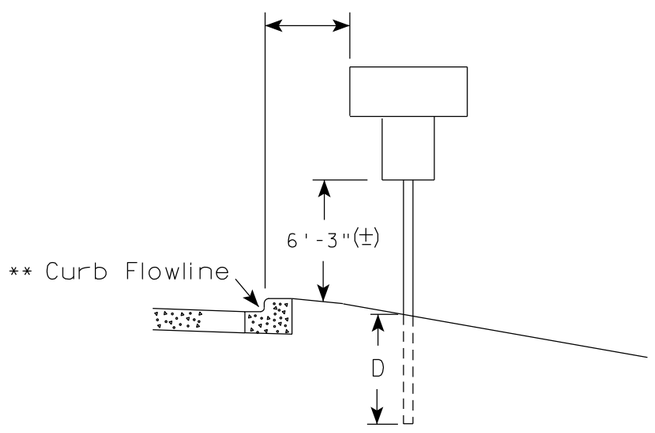
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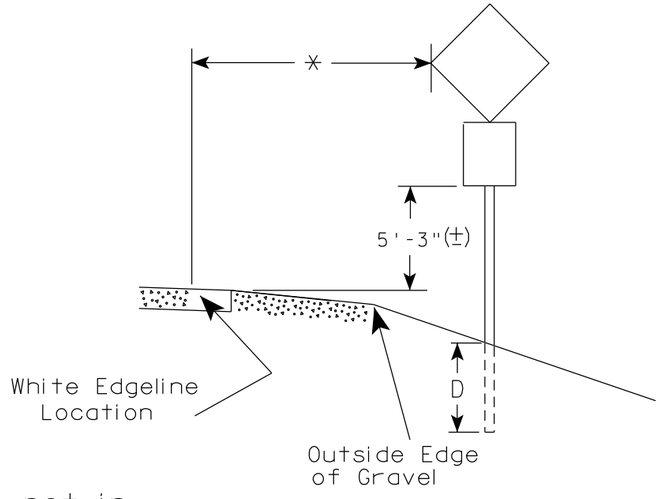
URBAN AREA



RURAL AREA (See Note 2)







** 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.

POST EMBEDMENT DEPTH

Area of Sign Installation (Sq.Ft.)	D (Min)
20 or Less	4'
Greater than 20	5'

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 or behind barrier wall, see A4-10 sign plate.
   The Double Arrow sign (W12-1D) 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" (±).
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 signs mounted on traffic signal poles is 5'- 3" (±).
5. Offset distance shall be consistent with existing signs or consistent throughout length of project.
6. The (±) tolerance for mounting height is 3 inches.
7. Folding signs shall be mounted at a height of 5'-3" (±) or as directd by the Engineer.

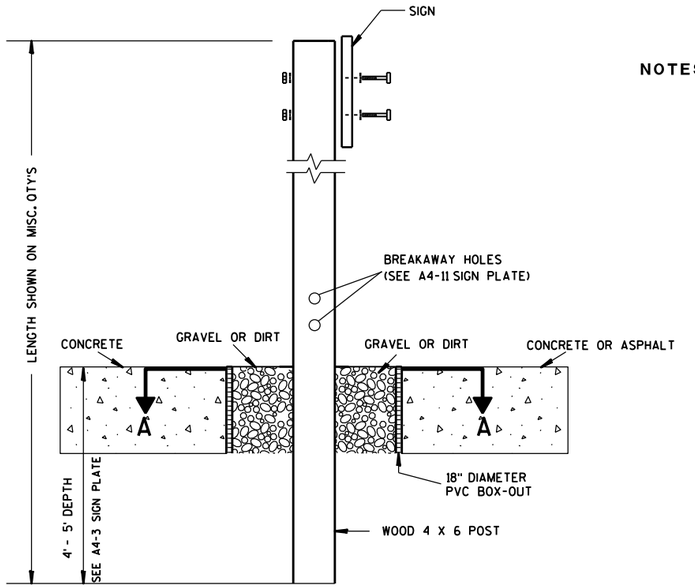
TYPICAL INSTALLATION OF PERMANENT TYPE II SIGNS ON SINGLE POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/13/2020 PLATE NO. A4-3.22

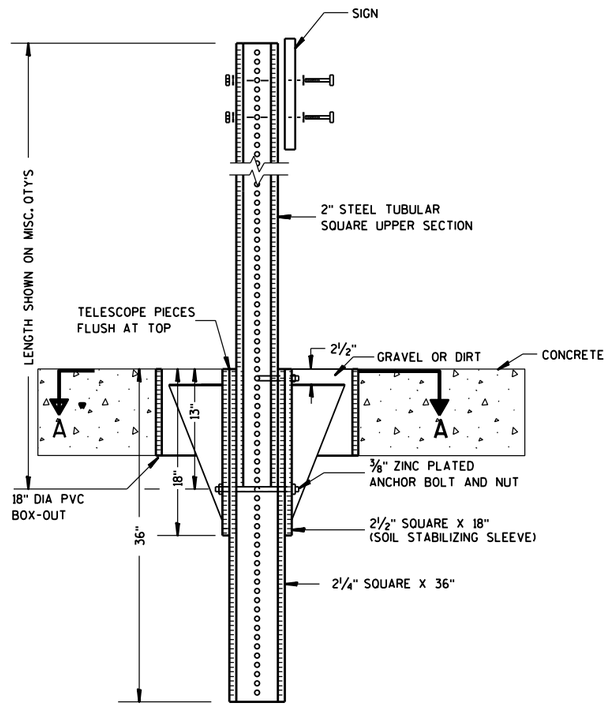
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 195	E



ELEVATION VIEW

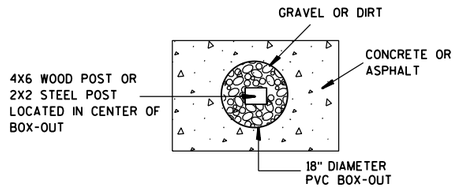
DETAIL OF WOOD 4 X 6 SIGN POST IN BOX-OUT

NOTES:
1. ALL MATERIAL TO BE APPROVED BY ENGINEER PRIOR TO INSTALLATION
2. SEE SIGN PLATE A4-8 FOR SIGN HARDWARE REQUIREMENTS
3. 18 INCH X 18 INCH SQUARE BOX-OUTS MAY BE USED FOR INSTALLATIONS IN EXISTING CONCRETE OR ASPHALT LOCATIONS.



ELEVATION VIEW

DETAIL OF STEEL 2 X 2 SIGN POST IN BOX-OUT



PLAN VIEW

FOR NEW CONCRETE/ASPHALT INSTALLATIONS

SIGN POST BOX-OUTS A4-3B

WISCONSIN DEPT OF TRANSPORTATION

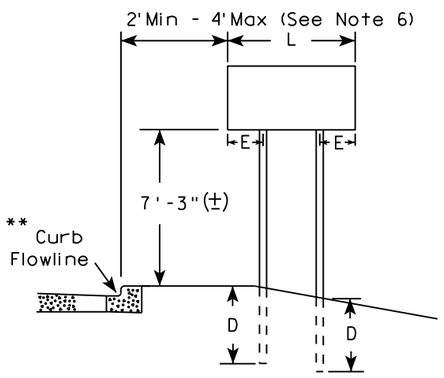
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 1/27/14 PLATE NO. A4-3B.1

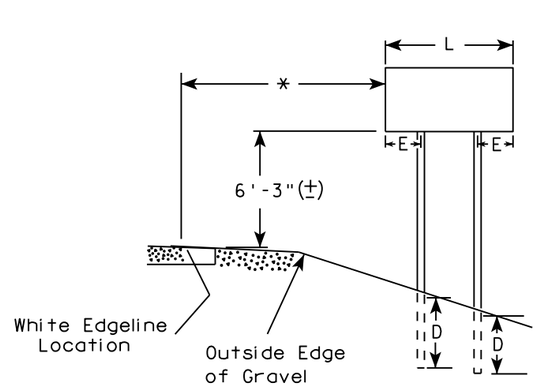
PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E

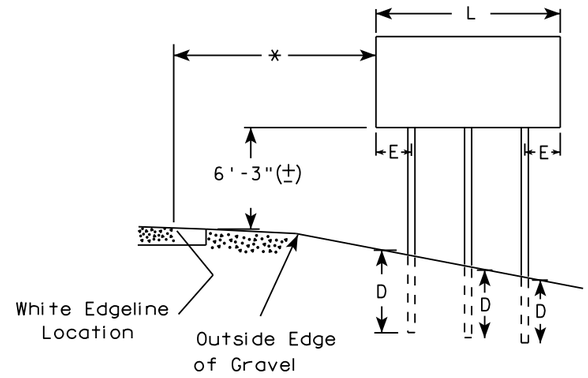
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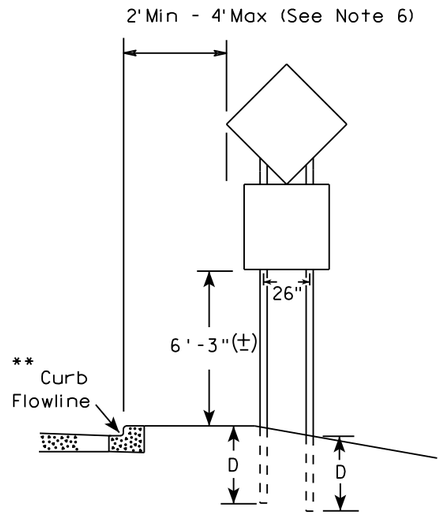
URBAN AREA



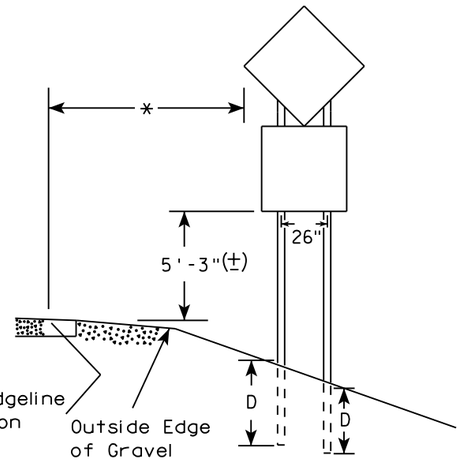
RURAL AREA (See Note 3)







48" DIAMOND WARNING SIGN



48" DIAMOND WARNING SIGN

SIGN SHAPE OTHER THAN DIAMOND (TWO POSTS REQUIRED)		
	L	E
***	Greater than 48" Less than 60"	12"
	60" to 108"	L/5

SIGN SHAPE OTHER THAN DIAMOND (THREE POSTS REQUIRED)	
L	E
Greater than 108" to 144"	12"

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. J-Assemblies are considered to be one sign for mounting height.
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.

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

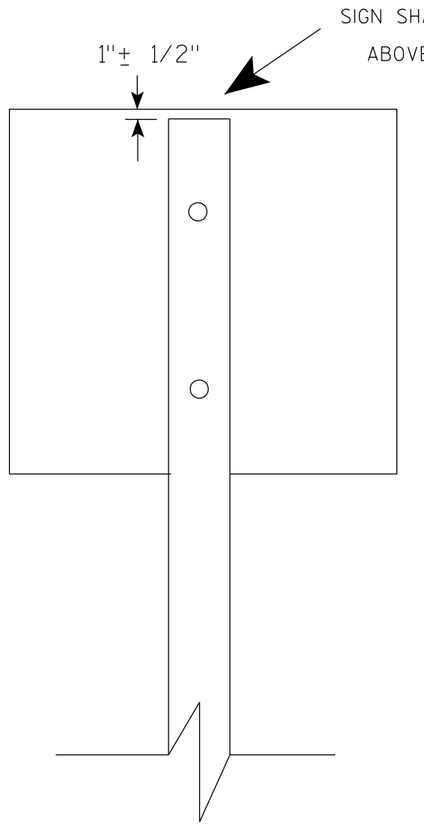
APPROVED Matthew R Rauch
for State Traffic Engineer

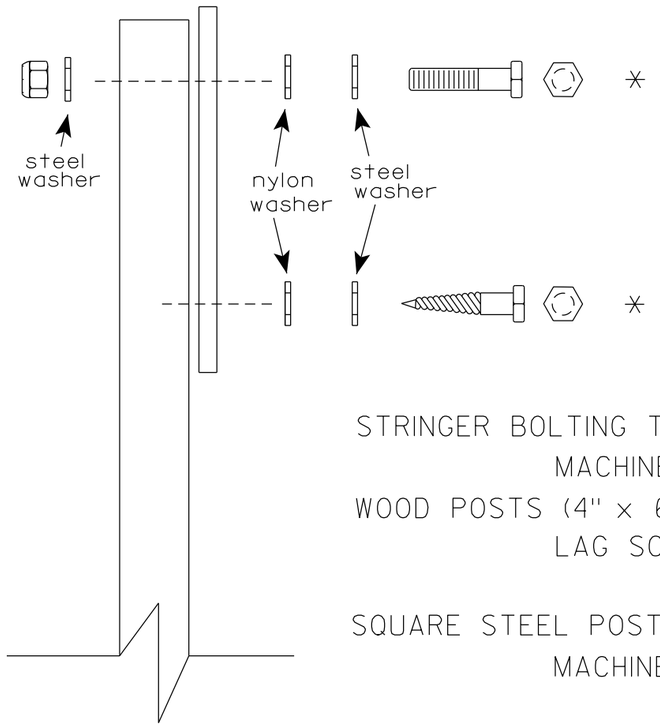
DATE 8/21/17 PLATE NO. A4-4.15

7

7

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 197 | E





Nuts, bolts and lags used for mounting signs shall have hexagonal heads and shall be either :

a. Hot dip galvanized in accordance with ASTM Designation: A 153, Class D, or SC 3

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

Threads on bolts and nuts shall be manufactured with sufficient allowance for the cadmium plate or galvanized coating to permit the nuts to run freely on the bolts.

STRINGER BOLTING TO ALUMINUM SIGNS (SEE SIGN PLATE A4-18)

MACHINE BOLTS - 5/16" X 1-3/4" Length w/ lock nuts

WOOD POSTS (4" x 6")

LAG SCREWS - 3/8" X 3" (NO STRINGERS ON BACK OF SIGN)
3/8" X 4" (STRINGERS ON BACK OF SIGN)

SQUARE STEEL POSTS (2" x 2")

MACHINE BOLTS - 3/8" X 3-1/4" Length w/ nuts (NO STRINGER ON BACK OF SIGN)
3/8" X 5" Length w/ nuts (STRINGERS ON BACK OF SIGN)

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

* Two different fastening systems are shown for illustration purposes. On any individual sign, either one or the other system shall be used. Actual number of fasteners per sign varies with the sign area, but normally there are two. For a single post installation, all signs greater than 9 sq. ft. require the use of 3 fasteners.

ATTACHMENT OF SIGNS TO POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

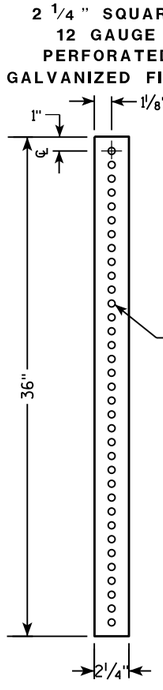
DATE 4/1/2020 PLATE NO. A4-8.9

PROJECT NO:

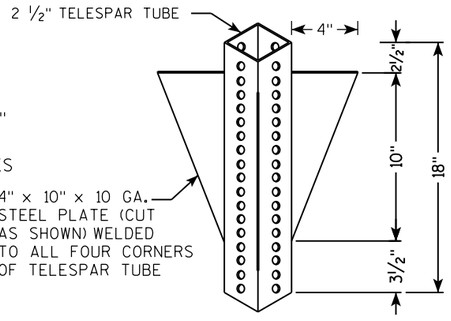
SHEET NO: 198 E

TELESCOPIC TUBING ANCHORS
TWO PIECE SYSTEM

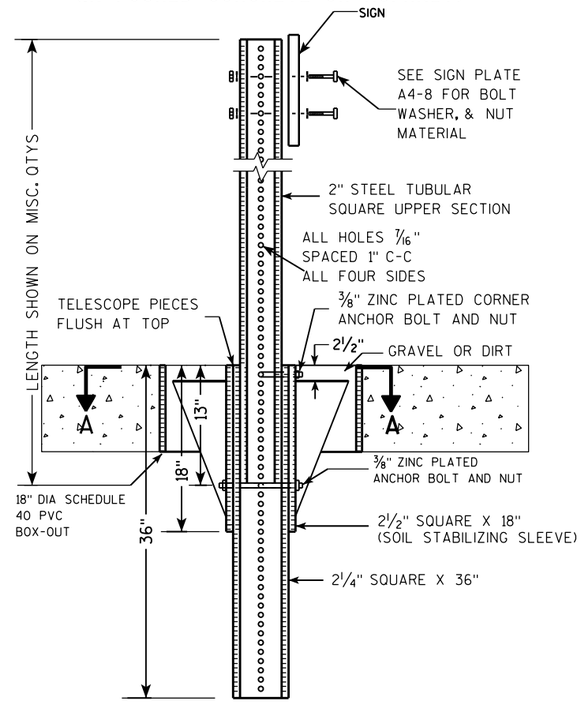
2 1/4 " SQUARE
12 GAUGE
PERFORATED
GALVANIZED FINISH



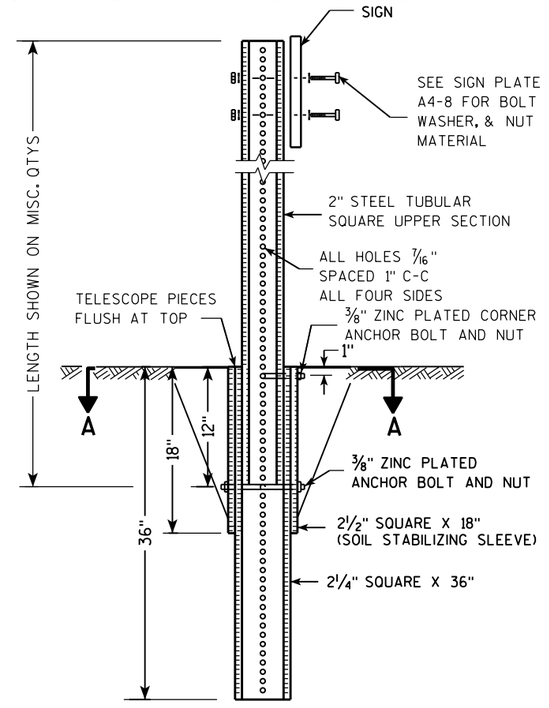
2 1/2 " SQUARE
12 GAUGE
OMNI-DIRECTIONAL
PERFORATED
SOIL STABILIZING SLEEVE
GALVANIZED FINISH

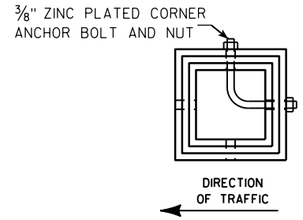


DETAIL OF TUBULAR STEEL SIGN POST
(IN POURED CONCRETE OR ASPHALT)



DETAIL OF TUBULAR STEEL SIGN POST
(IN LOCATIONS OTHER THAN POURED CONCRETE OR ASPHALT)





SECTION A-A

Area of Sign Installation (Sq. Ft.)	Number of Required Posts
9 or less	1
Greater than 9 less than or equal to 18	2
Greater than 18 less than or equal to 27	3

Signs wider than 3 feet or larger than 9 sq. ft shall be mounted on multiple posts (see above table).

TUBULAR STEEL
SIGN POST
A4-9

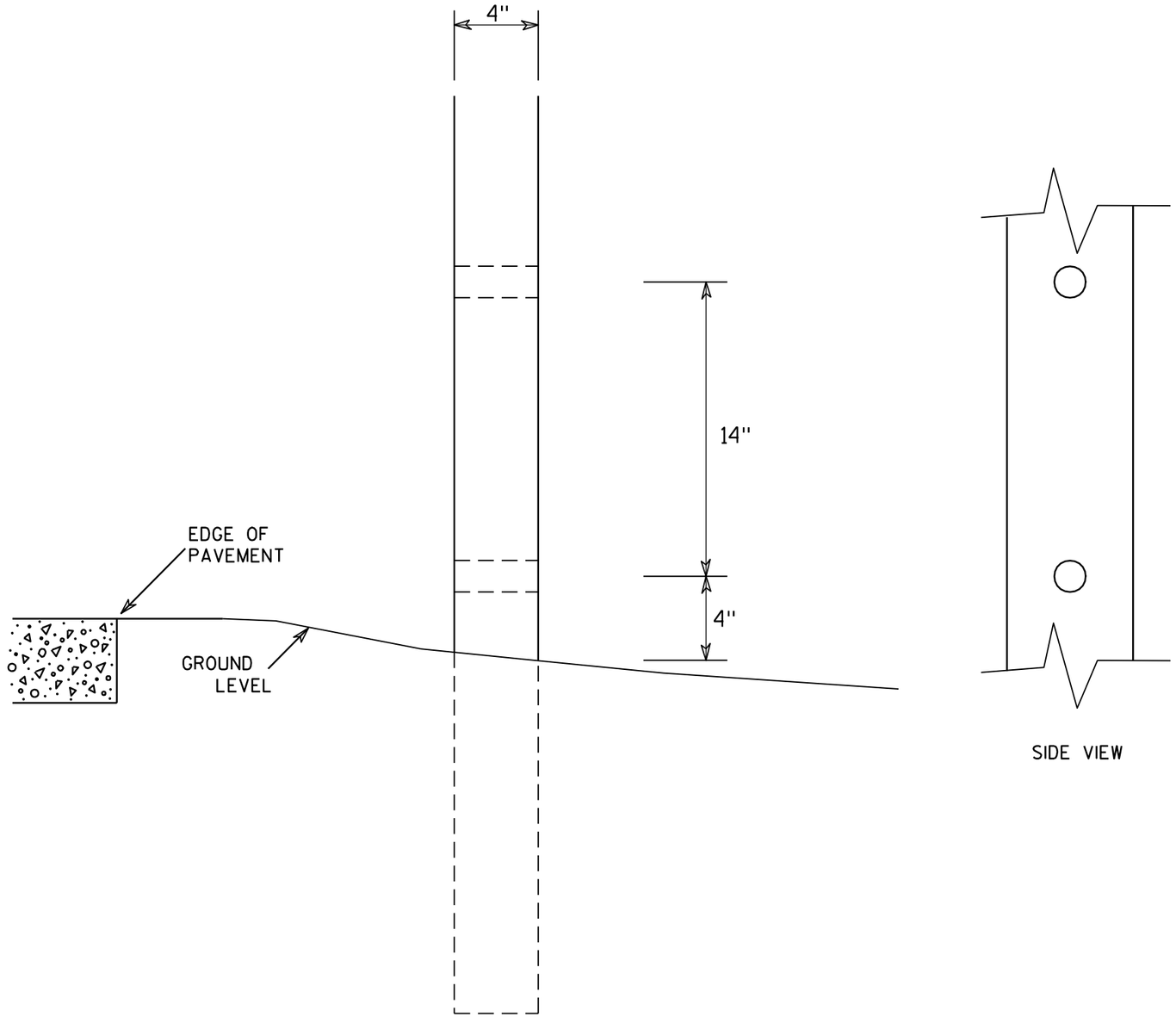
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 2/05/15 PLATE A4-9.9

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E

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WISDOT/CADDS SHEET 42



SIDE VIEW

GENERAL NOTES

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

4 X 6 WOOD POST MODIFICATIONS

WISCONSIN DEPT OF TRANSPORTATION

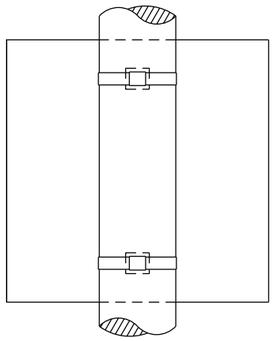
APPROVED Chester J Spang for State Traffic Engineer

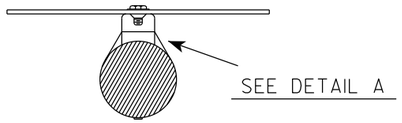
DATE 3/27/97 PLATE NO. A4-11.2

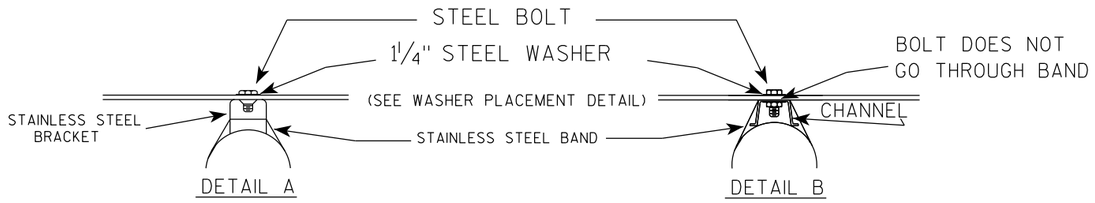
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 200	E

BANDING

SINGLE SIGN



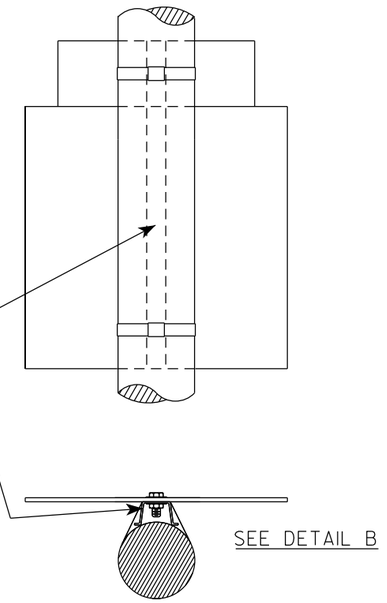




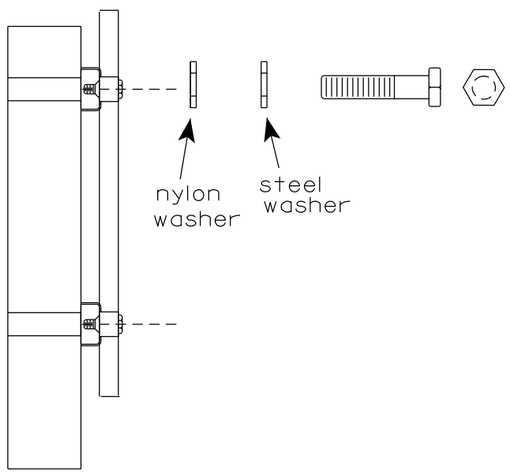
GENERAL NOTES

1. Any sign over 3 feet in width shall use the V-Block banding method. See A5-10 standard plate.
2. Signs 3 feet or greater in height shall have three bracket bands installed. Signs less than 3 feet in height shall have two bracket bands installed.
3. Banding and assembly bracket shall be stainless steel. All bands shall be ¾" in width and 0.025" thickness.
4. ALL SIGN MOUNTING BOLTS AND WASHERS SHALL BE EITHER:
   a. Hot dip or mechanically galvanized in accordance with ASTM Designation: A 153, Class D
   b. Electro-galvanized in accordance with ASTM designation: B 633, Type III, SC 3

"J" ASSEMBLY



WASHER PLACEMENT



WASHERS (ALL POSTS) -
1-1/4" O.D. X ⅜" I.D. X 1/16" STEEL
1-1/4" O.D. X ⅜" I.D. X .080 NYLON
FOR ALL TYPE H SIGNS

STANDARD SIGN
SIGN BANDING DETAILS

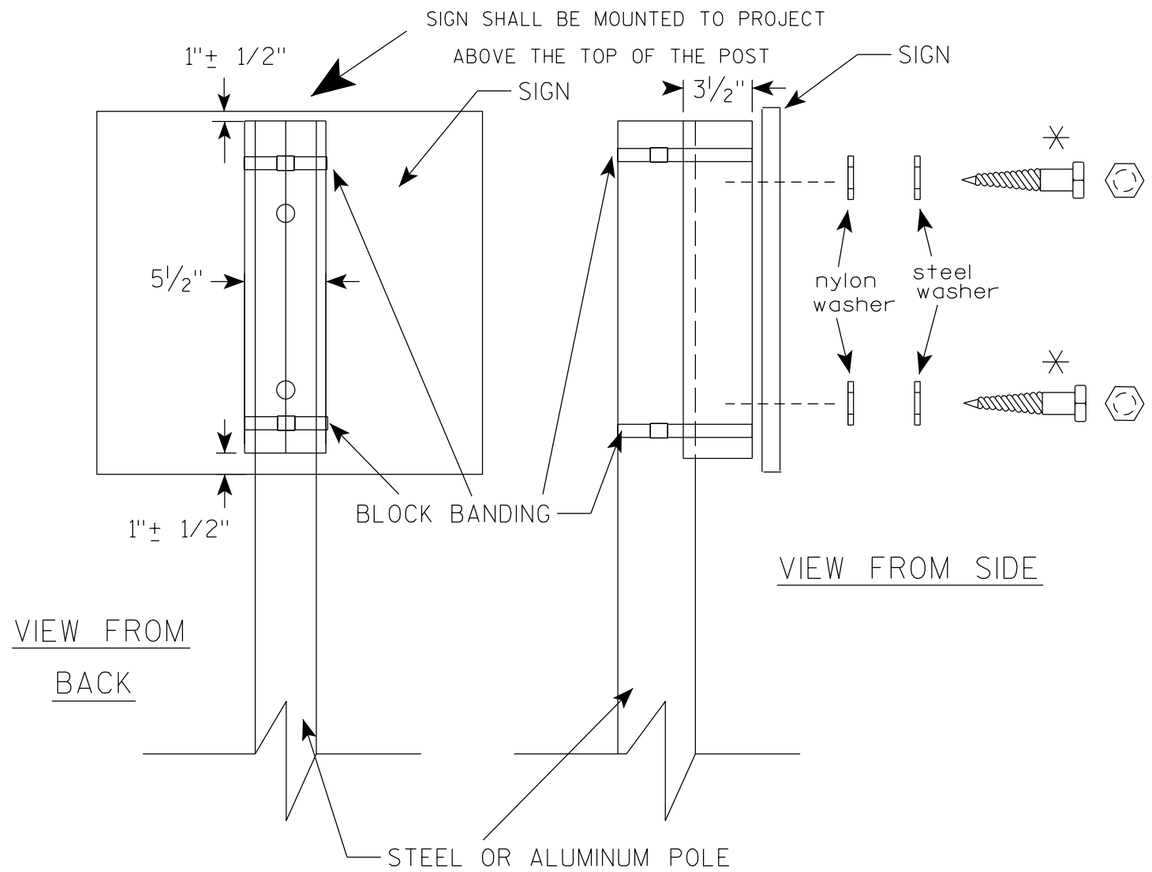
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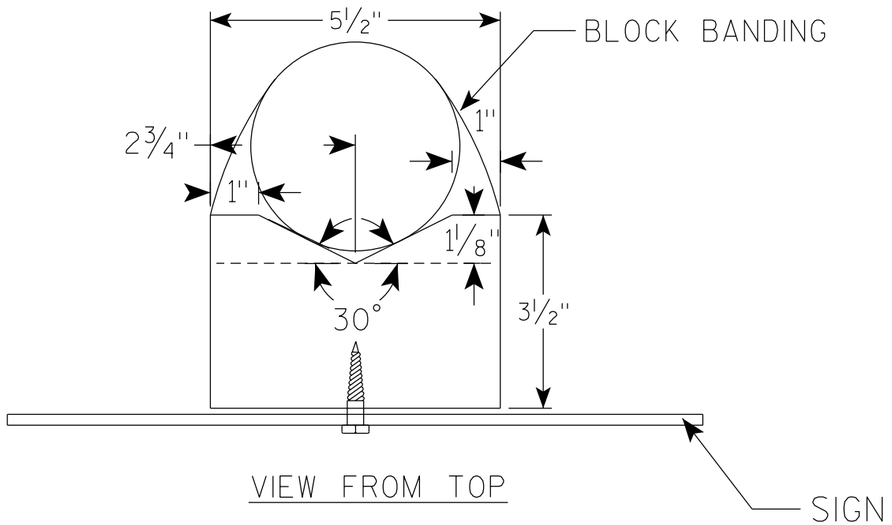
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 6/10/19 PLATE NO. A5-9.4

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 201	E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\A59.dgn PLOT DATE : 10-JUN 2019 4:10 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : $$.....plotscale.....$$





GENERAL NOTES

1. WOOD 4"X6" POST MATERIAL SHALL CONFORM TO 507.2.2 OF THE WisDOT STANDARD SPECIFICATIONS
2. BLOCK BANDING AND CLIPS SHALL BE STAINLESS STEEL, ¾" WIDTH AND 0.025" THICKNESS
3. SIGNS 3' OR GREATER IN HEIGHT SHALL UTILIZE 3 BLOCK BANDS. SIGNS UNDER 3' IN HEIGHT SHALL UTILIZE 2 BLOCK BANDS
4. ACTUAL NUMBER OF FASTENERS PER SIGN VARIES WITH THE SIGN AREA, BUT NORNALLY THERE ARE TWO. FOR SIGNS GREATER THAN 9 S.F. 3 FASTENERS SHALL BE USED.
5. ALL SIGN MOUNTING BOLTS AND WASHERS SHALL BE EITHER:
   a. Hot dip or mechanically galvanized in accordance with ASTM Designation: A 153, Class D
   b. Electro-galvanized in accordance with ASTM Designation : B 633, TYPE III, SC 3
6. ALL BOLTS SHALL HAVE HEXAGONAL HEADS.
7. STEEL WASHERS SHALL BE 1¼" O.D. X ⅜" I.D. X 1/16"
8. NYLON WASHERS SHALL BE 1¼" O.D. X ⅜" I.D. X .080 FOR TYPE H OR TYPE F FACE SIGN

✳ LAG BOLTS SHALL BE ⅜" X 2½"

BLOCK BANDING DETAIL (V-BLOCK OPTION)

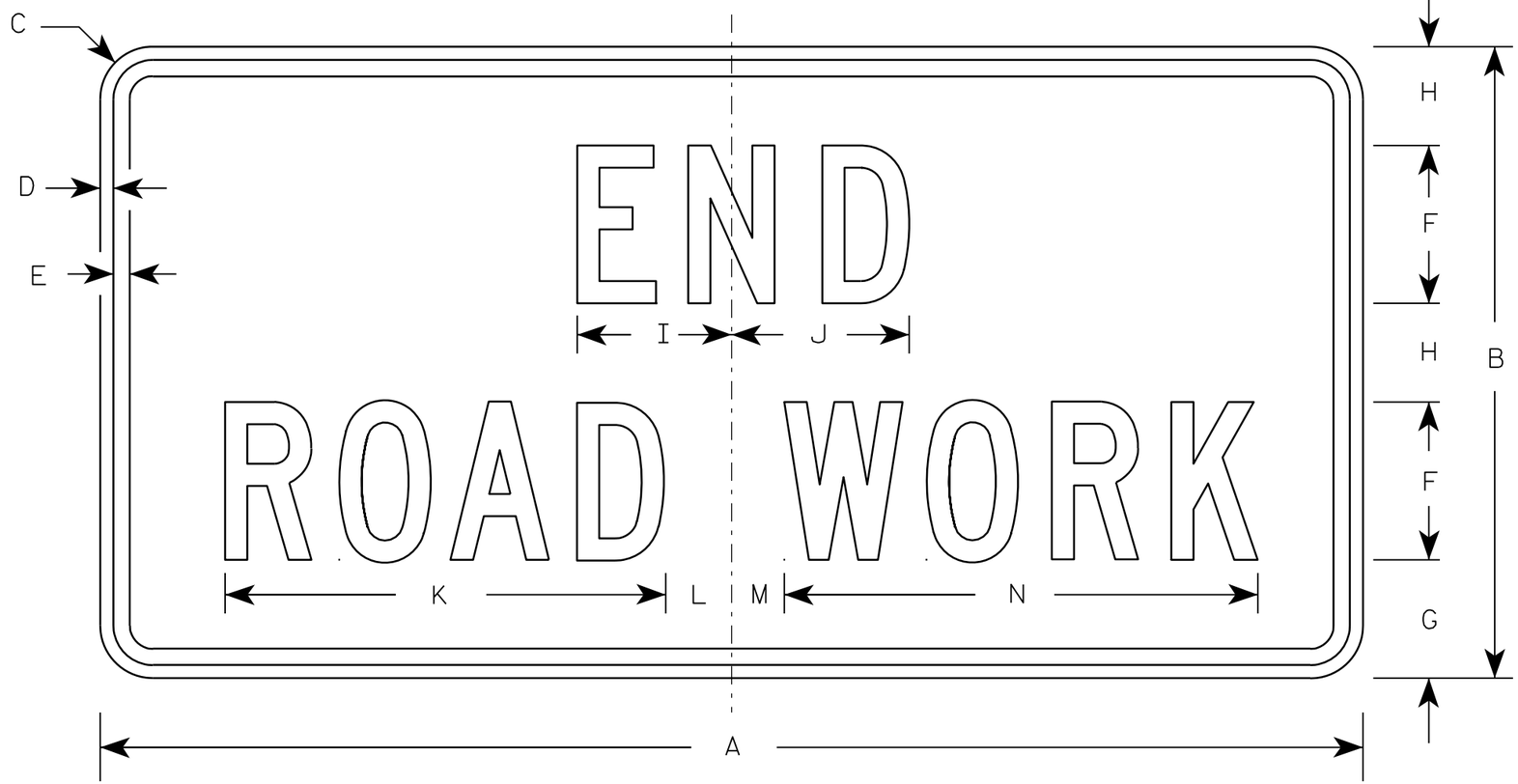
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 4/19/2022 PLATE NO. A5-10.3

PROJECT NO:

SHEET NO: 202 E



G20-2A

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

Metric equivalent for this sign is:

SIZE	
1	900 mm X 450 mm
2	1200 mm X 600 mm
3	1200 mm X 600 mm
4	1200 mm X 600 mm
5	1200 mm X 600 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.	Area m2
1	36	18	1 1/8	3/8	1/2	4	3 3/4	2 1/2	4 1/8	4 1/8	11 1/8	2	1	12 1/8													4.5	0.41
2	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72
3	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72
4	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72
5	48	24	1 1/2	1/2	5/8	6	4 1/2	3 3/4	5 7/8	6 3/4	16 3/4	2 1/2	1 3/4	18 1/2													8.0	0.72

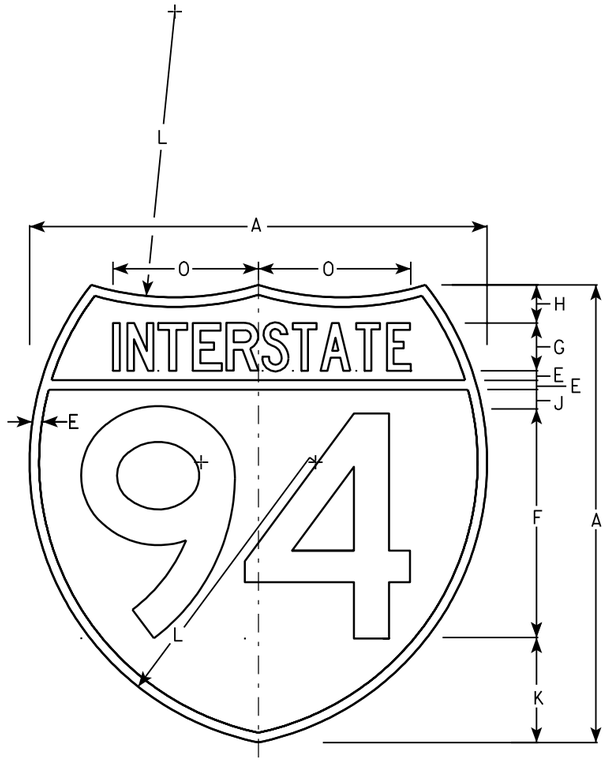
STANDARD SIGN
G20-2A

WISCONSIN DEPT OF TRANSPORTATION

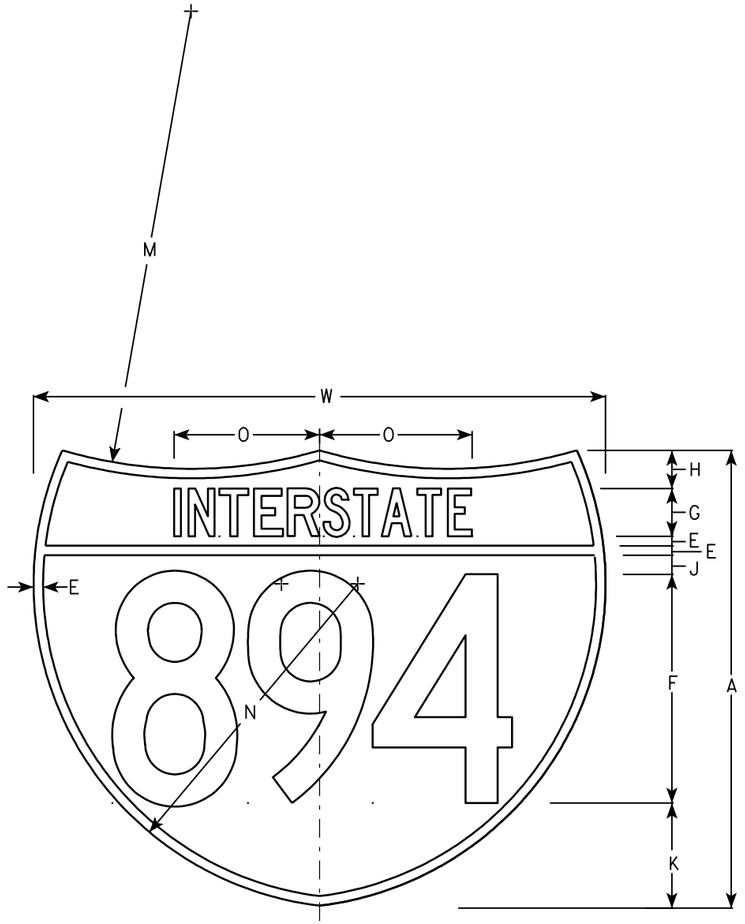
APPROVED Matthew R Rauch
for State Traffic Engineer

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

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 203	E



M1-1



M1-1A

NOTES

1. Sign is Type II - See Note 6 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Top Red - Bottom Blue (See Note 6)
   Message - White - See Note 6
3. Message Series - See note 5
4. Substitute appropriate numerals & ajust spacing as per plate A10-1.
5. M1-1 - Numerals - D
   Interstate - C
   M1-1A - All copy - C
6. Permanent Signs
   Message - Type H Reflective
   Detour or other temporary signs
   Background - Reflective
   Message - Reflective

Metric equivalent for these signs are:

SIZE	M1-1	SIZE	M1-1A
1			
2	600 mm X 600 mm	2	600 mm X 750 mm
3	900 mm X 900 mm	3	900 mm X 1125 mm
4	900 mm X 900 mm	4	900 mm X 1125 mm
5	900 mm X 900 mm	5	900 mm X 1125 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	M1-1 Area sq. ft.	M1-1A Area sq. ft.	M1-1 Area m2	M1-1A Area m2
1																													
2	24				1/2	12	2 1/2	2		1	5 1/2	15	24	17	7 7/8								30			3.13	3.91	.36	.46
3	36				3/4	18	3 3/4	3		1 1/2	8 1/4	22 1/2	36	25 1/2	11 3/4								45			7.03	8.79	.81	1.05
4	36				3/4	18	3 3/4	3		1 1/2	8 1/4	22 1/2	36	25 1/2	11 3/4								45			7.03	8.79	.81	1.05
5	36				3/4	18	3 3/4	3		1 1/2	8 1/4	22 1/2	36	25 1/2	11 3/4								45			7.03	8.79	.81	1.05

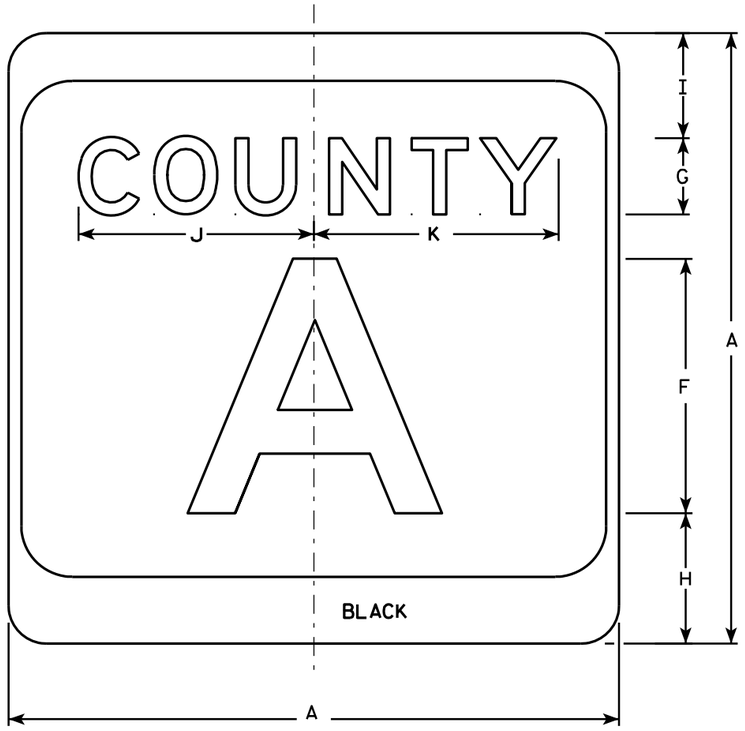
INTERSTATE ROUTE MARKER
M1-1 FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

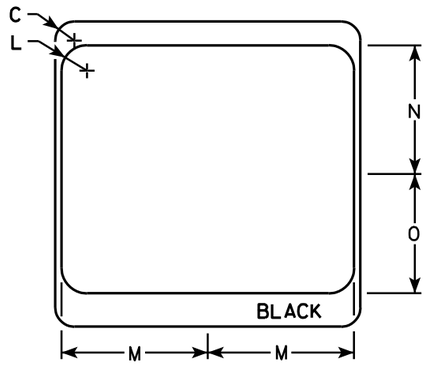
APPROVED Matthew R Rauch
for State Traffic Engineer

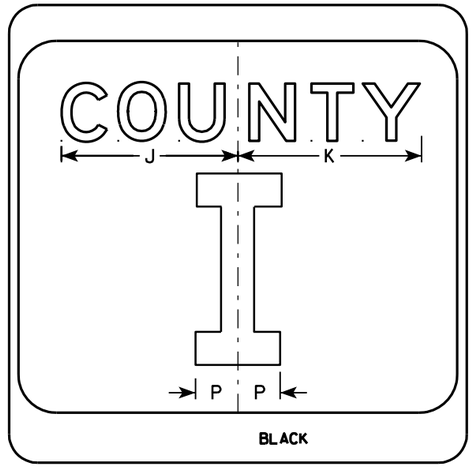
DATE 08/23/05 PLATE NO. M1-1.8

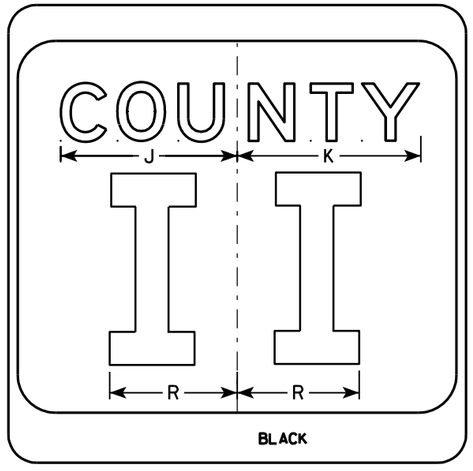
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 204	E



M1-5A







NOTES

1. Sign is Type II - see Note 7 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White & Black - See Note 7
   Message - Black
3. Message Series - see Note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Message Series E for 1 letter.
   Message Series D for 2 letters unless message is too big then Series C.
   Message Series C for 3 letters unless message is too big then Series B.
6. Substitute appropriate letters & optically center to achieve proper balance.
7. Permanent Signs
   Background - Type H Reflective
   Detour or temporary Signs
   Background - Reflective

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24		1 1/2			10	3	5 1/8	4 1/8	9 1/4	9 5/8	2	11 1/2	10 1/8	9 3/8	2 1/4		6 5/8									4.0
3	36		2 1/4			16	4	7 5/8	5 5/8	12 1/4	12 7/8	3	17 1/8	15 1/4	14	3 3/8		10									9.0
4	36		2 1/4			16	4	7 5/8	5 5/8	12 1/4	12 7/8	3	17 1/8	15 1/4	14	3 3/8		10									9.0
5	36		2 1/4			16	4	7 5/8	5 5/8	12 1/4	12 7/8	3	17 1/8	15 1/4	14	3 3/8		10									9.0

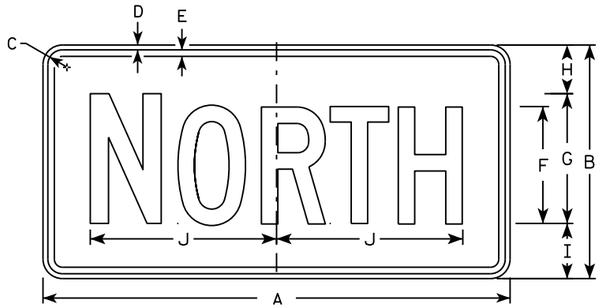
CTH MARKER
M1-5A FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

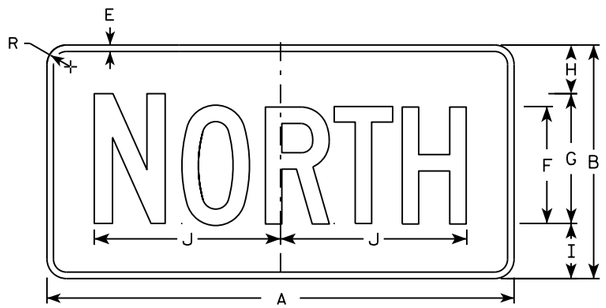
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 9/27/11 PLATE NO. M1-5A.8

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 205 | E



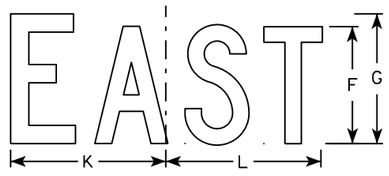
M3-1
MM3-1
MP3-1



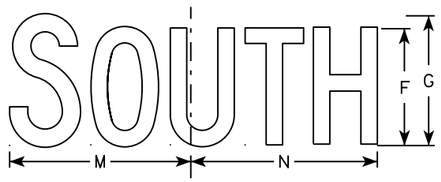
MB3-1
MK3-1
MN3-1



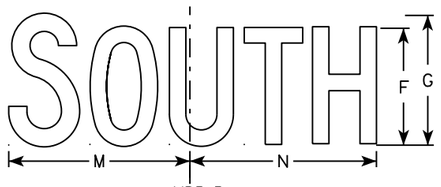
M3-2
MM3-2
MP3-2



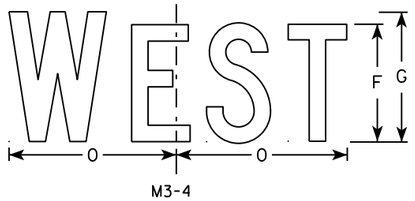
MB3-2
MK3-2
MN3-2



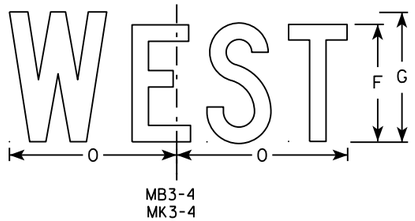
M3-3
MM3-3
MP3-3



MB3-3
MK3-3
MN3-3



M3-4
MM3-4
MP3-4



MB3-4
MK3-4
MN3-4

NOTES

1. All Signs Type II - Type H
2. Color:
   Background - See note 5
   Message - See note 5
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. M3-1 thru M3-4 Background - White
   Message - Black
   MB3-1 thru MB3-4 Background - Blue
   Message - White
   MK3-1 thru MK3-4 Background - Green
   Message - White
   MM3-1 thru MM3-4 Background - White
   Message - Green
   MN3-1 thru MN3-4 Background - Brown
   Message - White
   MP3-1 thru MP3-4 Background - White
   Message - Blue
6. Note the first letter of each direction is larger than the remainder of the message.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24	12	1 1/8	3/8	3/8	6	7	2 1/4	2 3/4	10 1/4	7 7/8	8 3/8	10 1/4	9 3/4	8 3/4			1 1/2									2.00
3	36	18	1 1/8	3/8	1/2	9	10	3 3/4	4 1/4	14 3/8	12	12 1/8	14	14 1/8	13			1 1/2									4.5
4	36	18	1 1/8	3/8	1/2	9	10	3 3/4	4 1/4	14 3/8	12	12 1/8	14	14 1/8	13			1 1/2									4.5
5	36	18	1 1/8	3/8	1/2	9	10	3 3/4	4 1/4	14 3/8	12	12 1/8	14	14 1/8	13			1 1/2									4.5

STANDARD SIGNS
M3-1 thur M3-4
SERIES

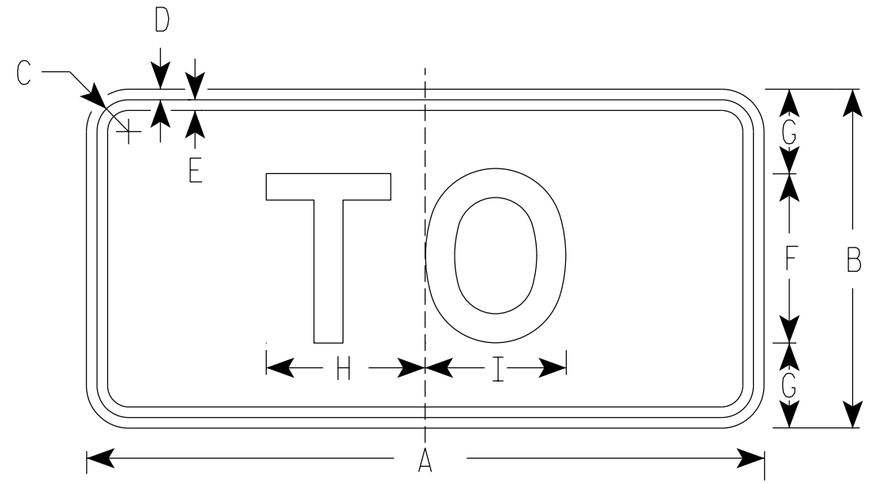
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew P Rauch for State Traffic Engineer

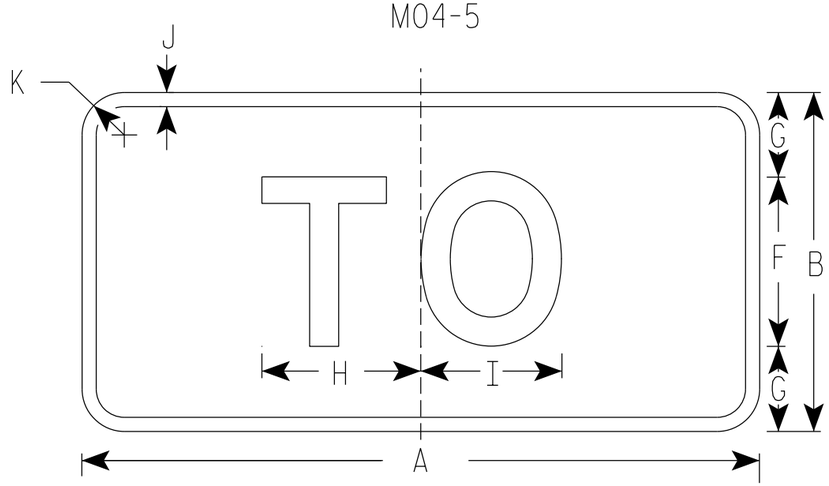
DATE 10/15/15 PLATE NO M3-1.14

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

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\M31.DGN PLOT DATE : 01-DEC-2015 17:54 PLOT BY : $$ plotuser $$ PLOT NAME : PLOT SCALE : 11.675051:1.000000



M4-5
MM4-5
MP4-5
M04-5



MB4-5
MK4-5
MN4-5

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - See note 5
   Message - See note 5
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. M4-5 Background - White
   Message - Black

   MB4-5 Background - Blue
   Message - White

   MK4-5 Background - Green
   Message - White

   MM4-5 Background - White
   Message - Green

   MN4-5 Background - Brown
   Message - White

   MP4-5 Background - White
   Message - Blue

   M04-5 Background - Orange Type F Reflective
   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	6	3	5 3/8	5 1/4	1/2	1 1/2																2.00
3	36	18	1 3/8	3/8	1/2	9	4 1/2	8 1/4	8 3/8	1/2	1 1/2																4.5
4	36	18	1 3/8	3/8	1/2	9	4 1/2	8 1/4	8 3/8	1/2	1 1/2																4.5
5	36	18	1 3/8	3/8	1/2	9	4 1/2	8 1/4	8 3/8	1/2	1 1/2																4.5

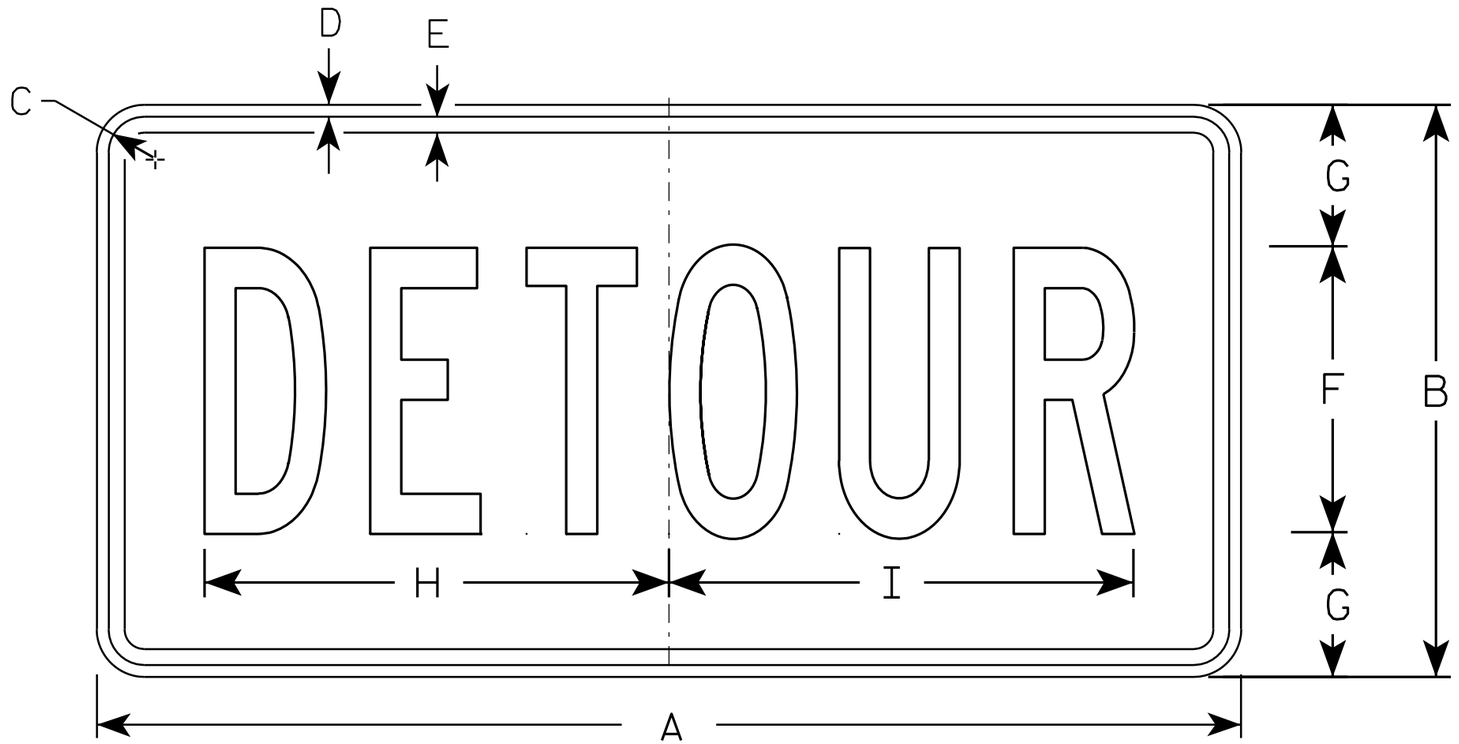
STANDARD SIGN
M4-5

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 03/7/19 PLATE NO. M4-5.9

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 207 | E



M4-8

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - B
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	24	12	1 1/8	3/8	3/8	6	3	10	10 1/4																		2.0
3	36	18	1 1/8	3/8	1/2	9	4 1/2	14 5/8	14 1/2																		4.5
4																											
5																											

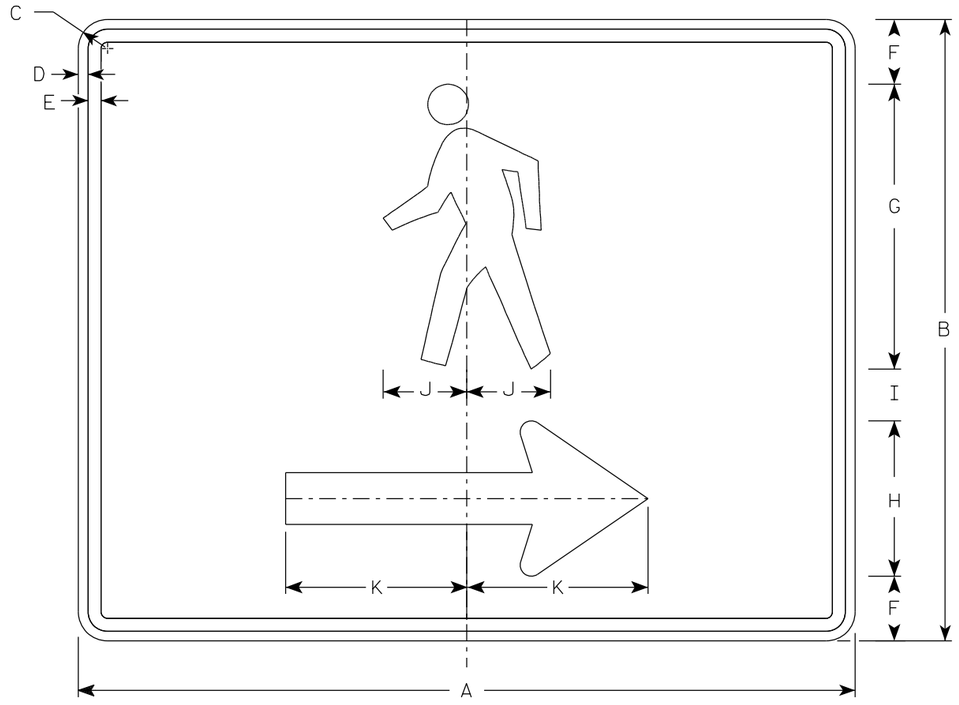
STANDARD SIGN
M4-8

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/10/10 PLATE NO. M4-8.2

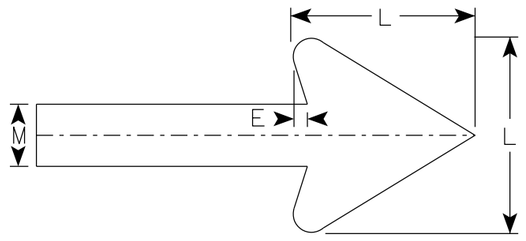
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 208	E



M4-60R

NOTES

1. Sign is Type II- Type F Reflective
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. M4-60L is the same as M4-60R except the arrow is reversed.



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																											
2	30	24	1 1/8	3/8	1/2	2 1/2	11	6	2	3 1/4	7	6	2														5.00
3																											
4																											
5																											

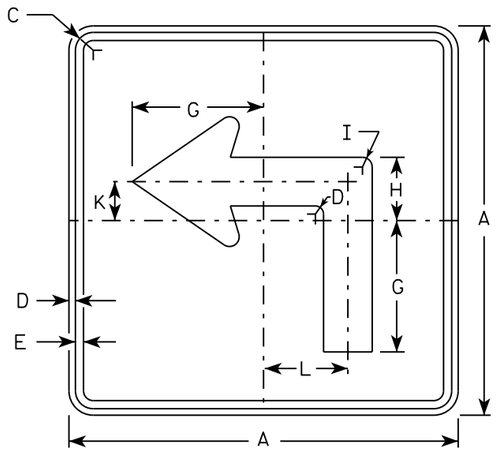
STANDARD SIGN
M4-60 L&R

WISCONSIN DEPT OF TRANSPORTATION

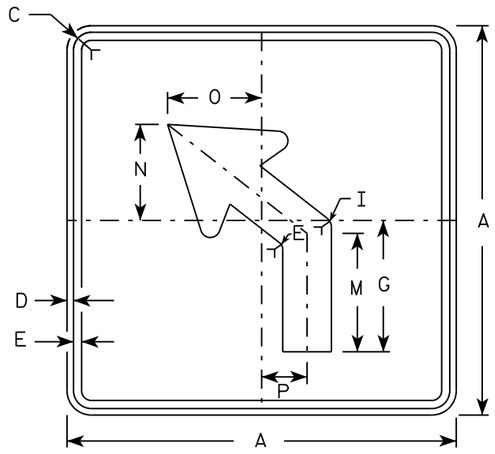
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 9/16/2021 PLATE NO. M4-60.1

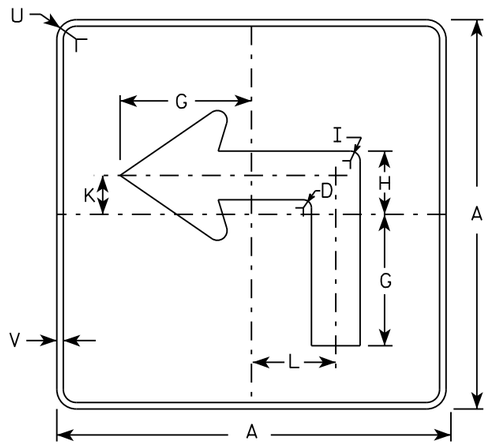
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 209 | E



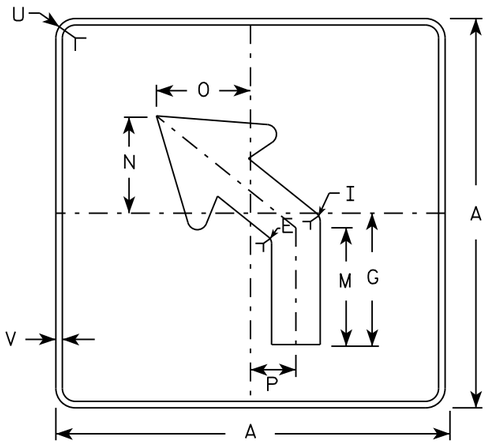
M5-1L
MM5-1L
MO5-1L
MP5-1L



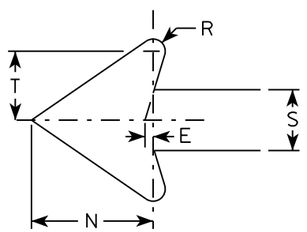
M5-2L
MM5-2L
MO5-2L
MP5-2L



MB5-1L
MK5-1L
MN5-1L
MR5-1L



MB5-2L
MK5-2L
MN5-2L
MR5-2L



NOTES

1. Signs are Type II - Type H reflective except as shown
2. Color:
   Background - See note 4
   Message - See note 4
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. M5-1 and M5-2 Background - White
   Message - Black
   MB5-1 and MB5-2 Background - Blue
   Message - White
   MK5-1 and MK5-2 Background - Green
   Message - White
   MM5-1 and MM5-2 Background - White
   Message - Green
   MN5-1 and MN5-2 Background - Brown
   Message - White
   MO5-1 and MO5-2 Background - Orange - Type F Reflective
   Message - Black
   MP5-1 and MP5-2 Background - White - Type H Reflective
   Message - Blue
   MR5-1 and MR5-2 Background - Brown
   Message - Yellow
5. M5-1R same as M5-1L except arrow points right.
6. M5-2R same as M5-2L except arrow tilts right.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2	21		1 1/8	3/8	3/8		7	3 3/8	5/8		2 1/8	4 1/2	6 3/8	5 1/4	5	2 1/2		1/2	2 5/8	3	1 1/2	1/2					3.06
3	30		1 3/8	1/2	5/8		10 1/8	4 7/8	7/8		3	6 1/2	9 1/8	7 1/2	7 1/4	3 1/2		3/4	3 3/4	4 1/4	1 7/8	1/2					6.25
4	30		1 3/8	1/2	5/8		10 1/8	4 7/8	7/8		3	6 1/2	9 1/8	7 1/2	7 1/4	3 1/2		3/4	3 3/4	4 1/4	1 7/8	1/2					6.25
5	30		1 3/8	1/2	5/8		10 1/8	4 7/8	7/8		3	6 1/2	9 1/8	7 1/2	7 1/4	3 1/2		3/4	3 3/4	4 1/4	1 7/8	1/2					6.25

STANDARD SIGN
M5-1 & M5-2

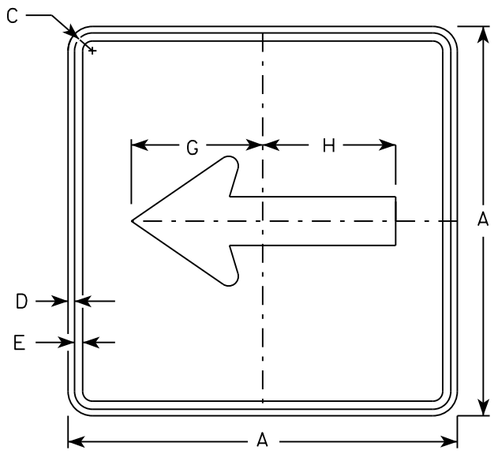
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

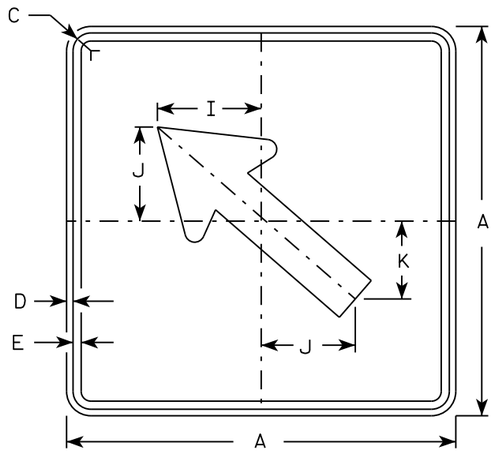
DATE 10/15/15 PLATE NO. M5-1.13

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

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



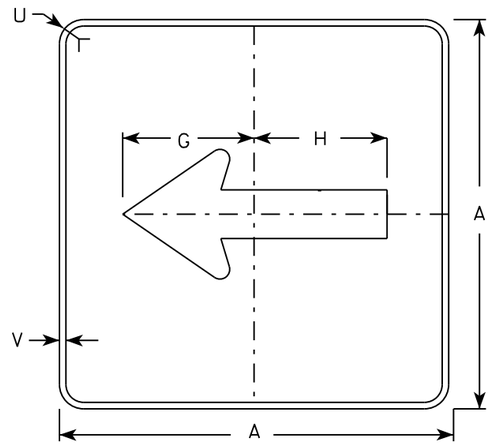
M6-1
MM6-1
MO6-1
MP6-1



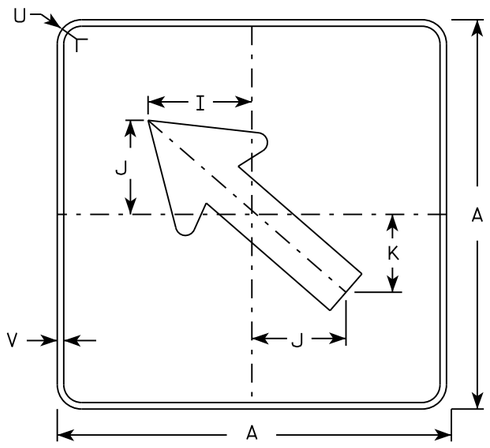
M6-2
MM6-2
MO6-2
MP6-2

NOTES

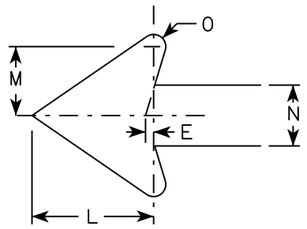
1. Signs are Type II - Type H except as Shown
2. Color:
   Background - See note 4
   Message - See note 4
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. M6-1 and M6-2 Background - 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

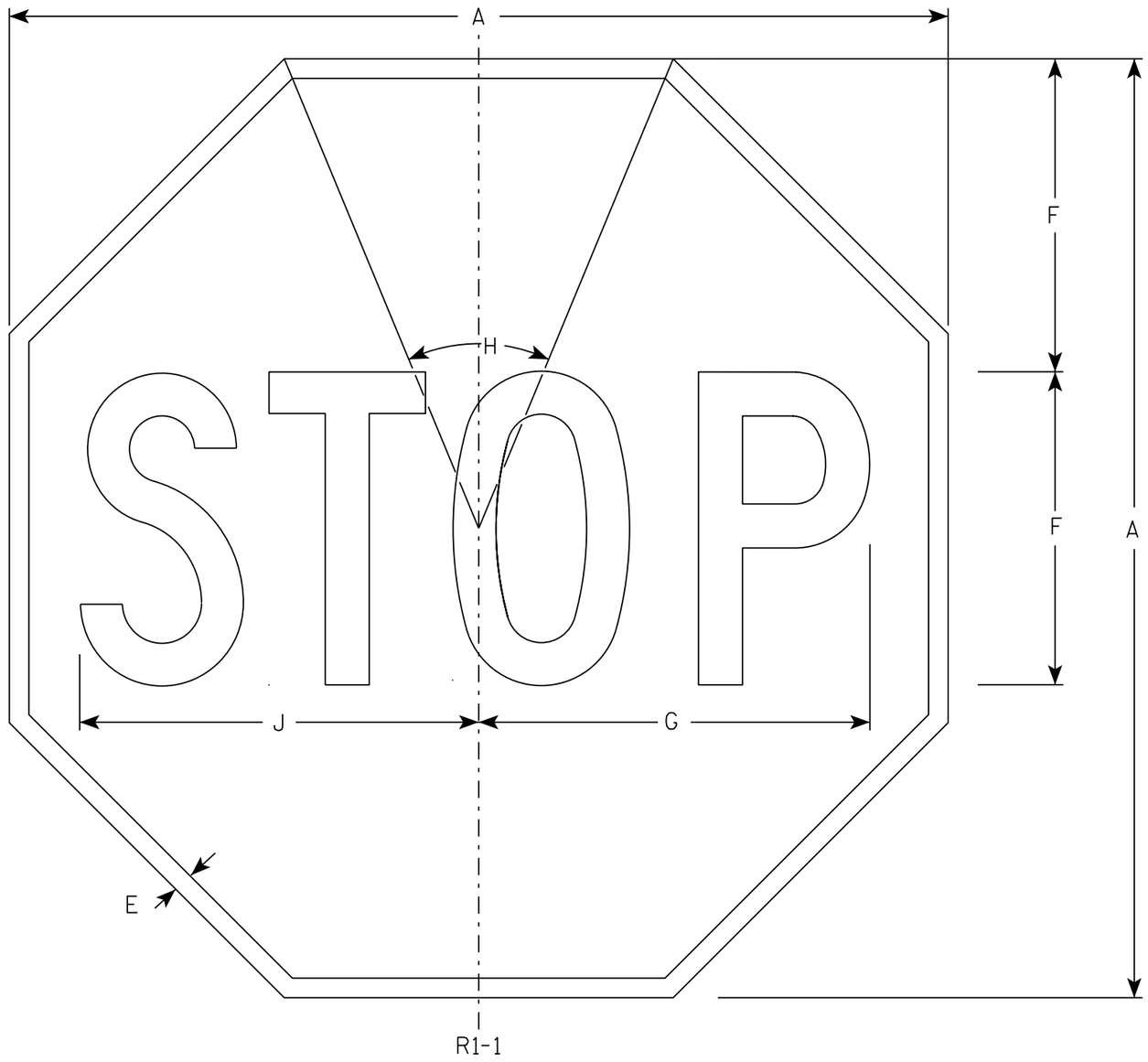
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 10/15/15 PLATE 211 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

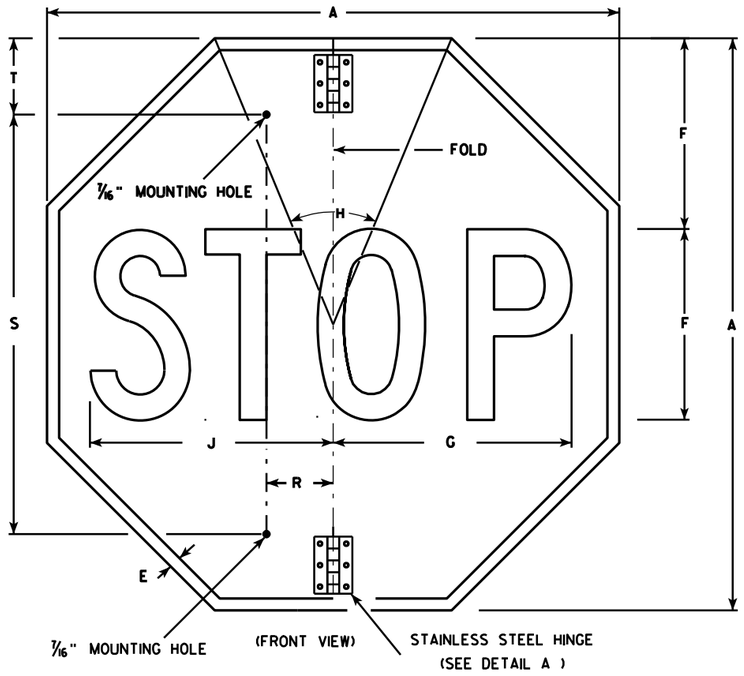
STANDARD SIGN
R1-1

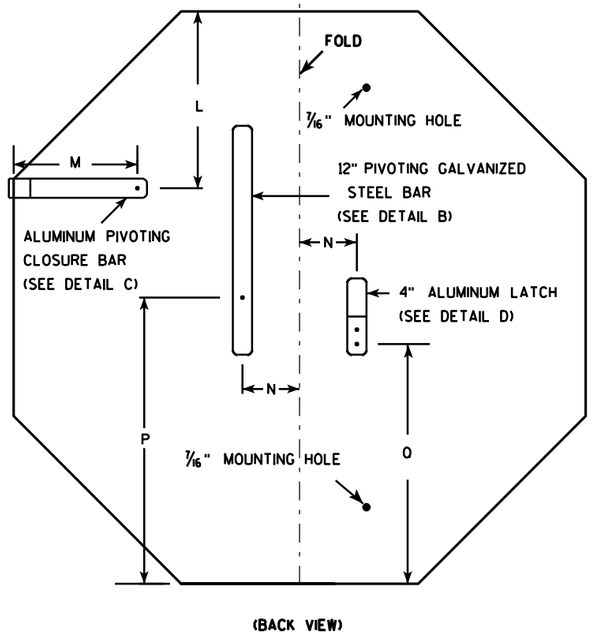
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

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

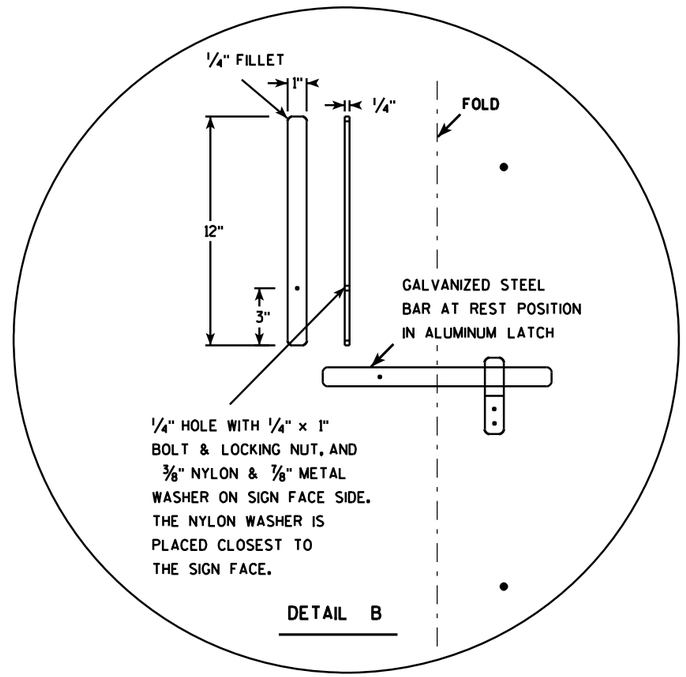
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 212	E

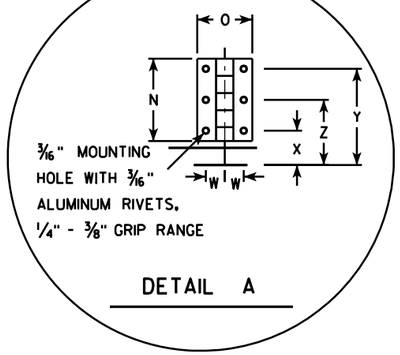


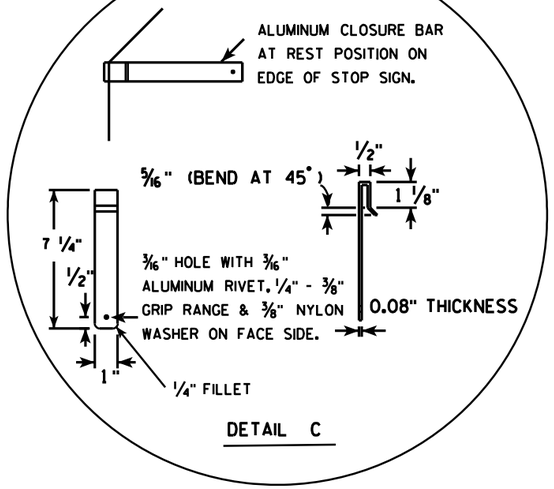


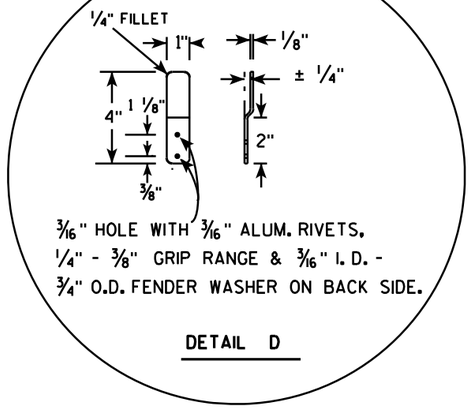
NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Red
   Message - White
3. Message Series - C
4. All hardware used on the folding STOP sign installation shall conform to 637.2.4 of the WIS DOT Standard Specification.









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	30				5/8	10	12 1/2	45		12 3/4		9 1/4	6 1/2	3	2	15	12 3/8	2 1/2	22	5			11/16	1 1/4	3 1/2	2 3/8	5.18
2M	36				3/4	12	15	45		15 3/8		11	6 1/2	3	2	18	15 3/8	2 1/2	26	5			11/16	1 1/4	3 1/2	2 3/8	7.46
3	36				3/4	12	15	45		15 3/8		11	6 1/2	3	2	18	15 3/8	2 1/2	26	5			11/16	1 1/4	3 1/2	2 3/8	7.46
4																											
5																											

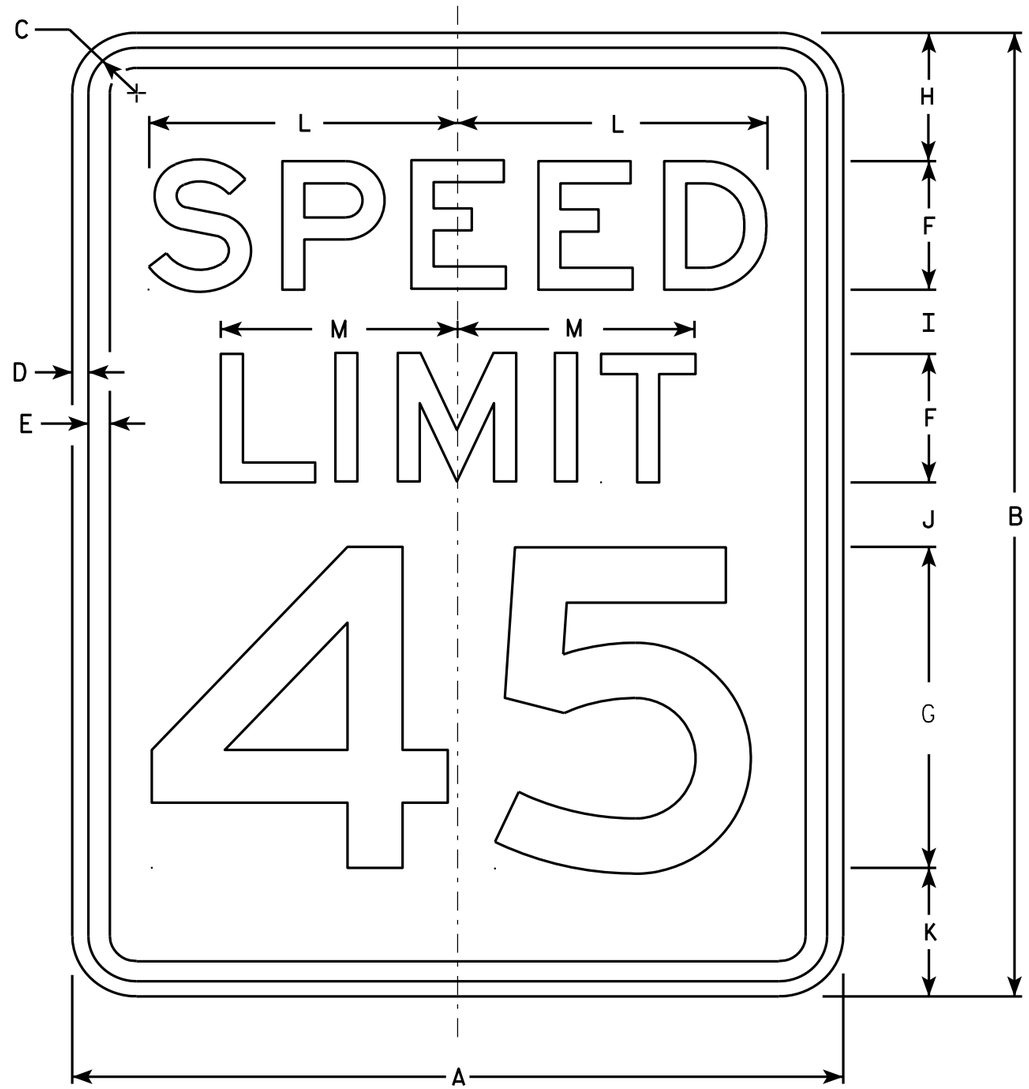
STANDARD SIGN
R1-1F

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/03/10 PLATE NO. R1-1F.3

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 213 | E



R2-1

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - E
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and optically adjust spacing to achieve proper balance.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	18	24	1 1/8	3/8	1/2	3	8	3	2	2	3	7 1/4	5 1/2														3.0
2S	24	30	1 1/8	3/8	1/2	4	10	3	2 1/4	3 3/8	3 3/8	9 5/8	7 3/8														5.0
2M	30	36	1 3/8	1/2	5/8	5	12	5	2 1/2	2 1/2	4	12	9 1/4														7.5
3	36	48	1 3/8	1/2	5/8	6	14	6	5	5	6	14 3/8	11														12.0
4	36	48	1 3/8	1/2	5/8	6	14	6	5	5	6	14 3/8	11														12.0
5	48	60	2 1/4	3/4	1	8	20	6	4 1/2	6 3/4	6 3/4	19 1/4	14 5/8														20.0

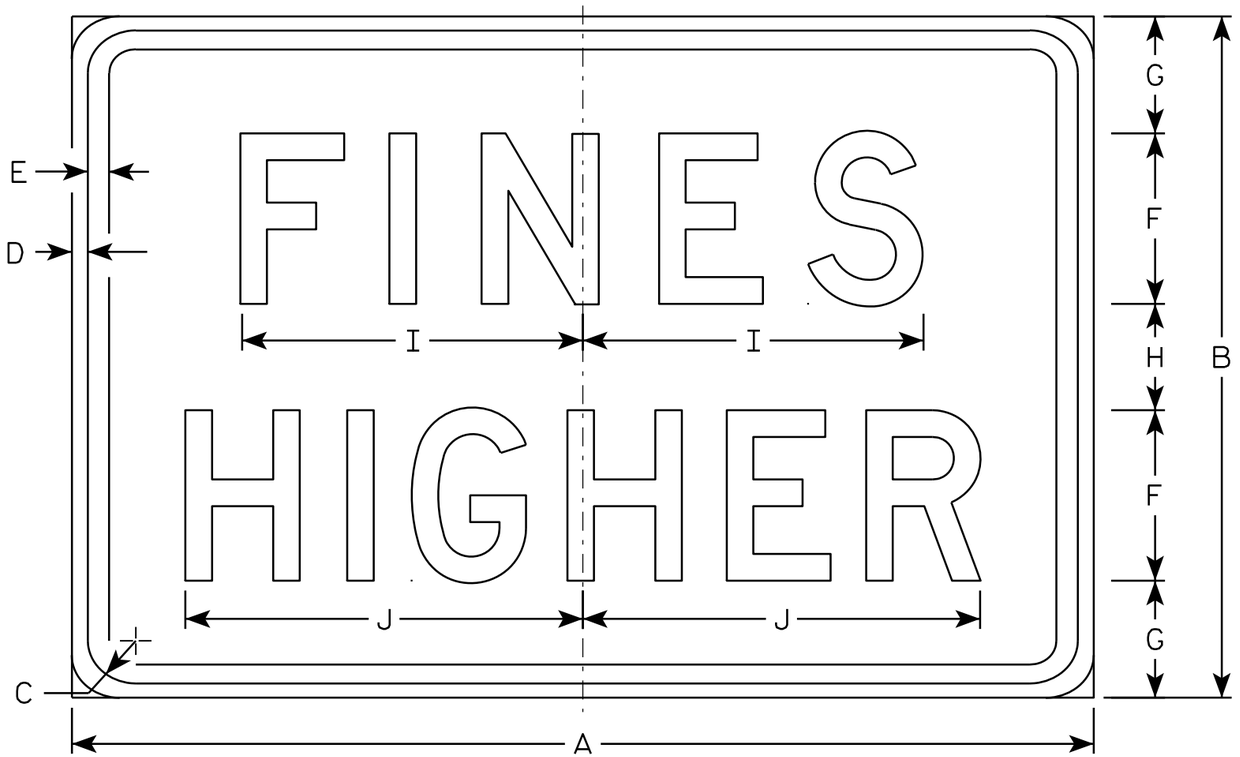
STANDARD SIGN
R2-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

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

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 214 | E



R2-6P

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	18	1 1/8	3/8	3/8	4	3 1/2	3	7 5/8	9 1/4																	3.0
2M	24	18	1 1/8	3/8	3/8	4	3 1/2	3	7 5/8	9 1/4																	3.0
3	36	24	1 1/8	3/8	1/2	6	4 1/8	3 3/4	12	14																	6.0
4	36	24	1 1/8	3/8	1/2	6	4 1/8	3 3/4	12	14																	6.0
5	48	36	1 3/8	1/2	5/8	8	7	6	15 1/8	19																	12.0

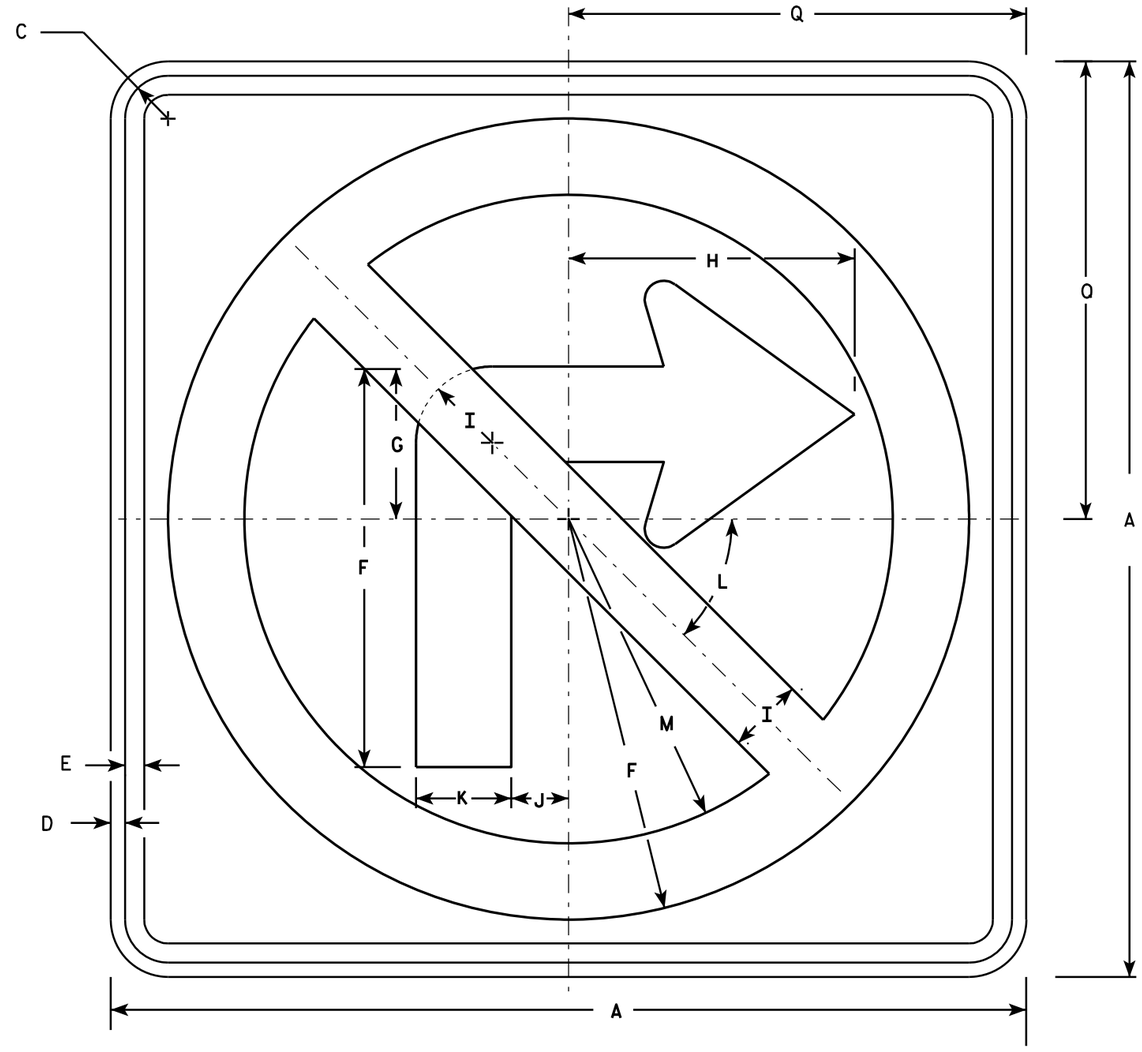
STANDARD SIGN
R2-6P

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 12/20/10 PLATE NO. R2-6P.2

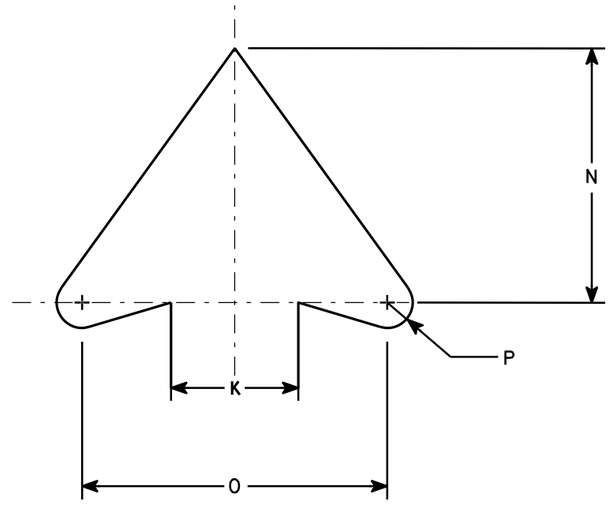
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 215 | E



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

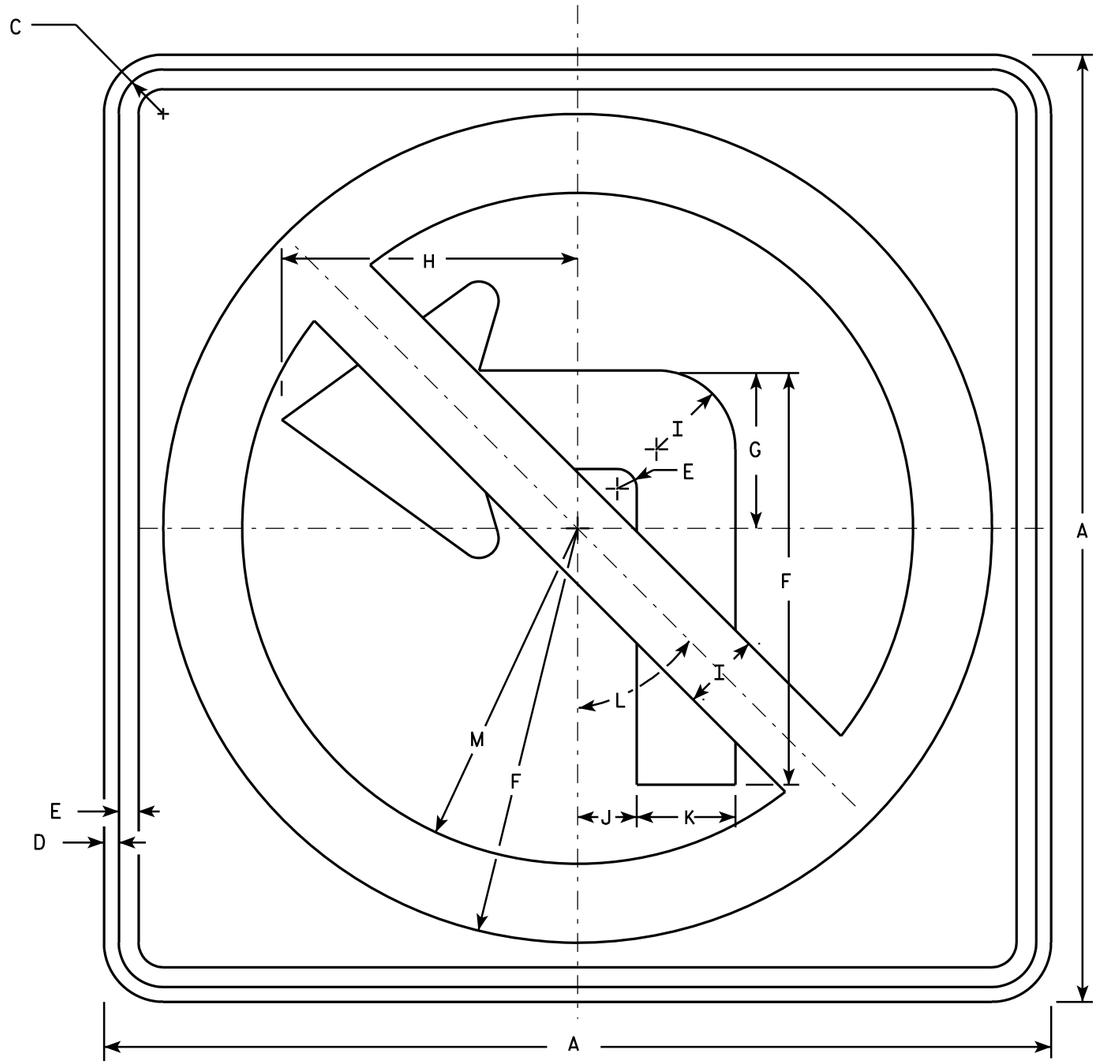
STANDARD SIGN
R3-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

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

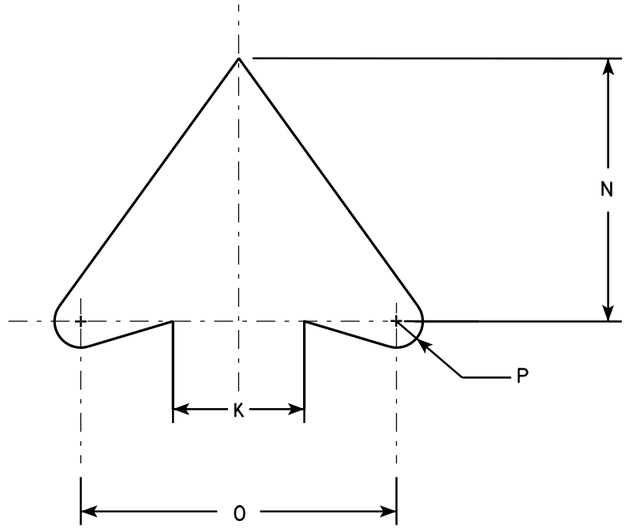
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 216	E



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	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											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

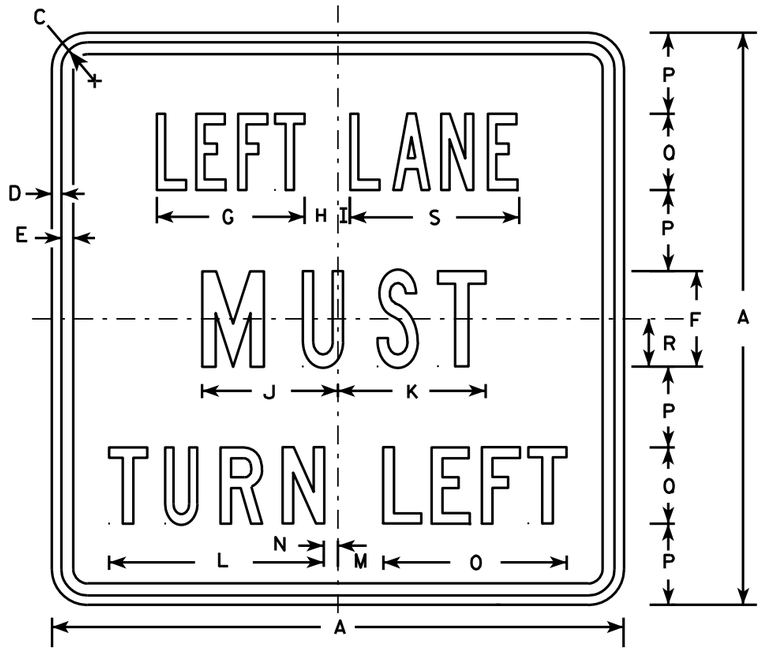
STANDARD SIGN
R3-2

WISCONSIN DEPT OF TRANSPORTATION

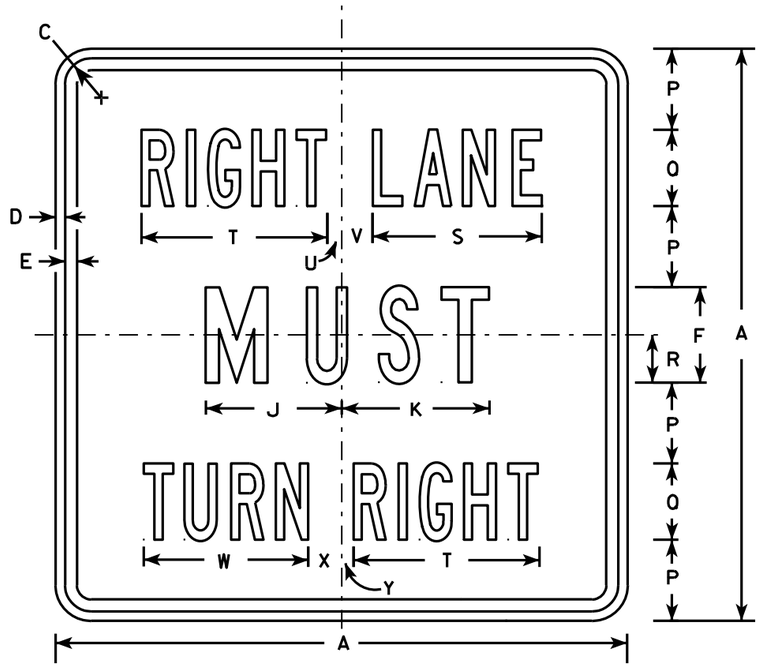
APPROVED Matthew R Rauch
for State Traffic Engineer

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

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 217	E



R3-7L



R3-7R

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 - Line 1 is Series B.
   Line 2 is Series C.
   Line 3 on plate R3-7R is Series B and Series C on plate R3-7L.
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	30		1 3/8	1/2	5/8	5	7 3/4	1 3/4	5/8	7 1/8	7 3/4	11 1/4	2 3/8	3/4	9 5/8	4 1/4	4	2 1/2	8 7/8	9 3/4	3/4	1 5/8	8 5/8	1 5/8	5/8		6.25
2S	30		1 3/8	1/2	5/8	5	7 3/4	1 3/4	5/8	7 1/8	7 3/4	11 1/4	2 3/8	3/4	9 5/8	4 1/4	4	2 1/2	8 7/8	9 3/4	3/4	1 5/8	8 5/8	1 5/8	5/8		6.25
2M	30		1 3/8	1/2	5/8	5	7 3/4	1 3/4	5/8	7 1/8	7 3/4	11 1/4	2 3/8	3/4	9 5/8	4 1/4	4	2 1/2	8 7/8	9 3/4	3/4	1 5/8	8 5/8	1 5/8	5/8		6.25
3	36		1 5/8	5/8	3/4	6	9 5/8	2	1 1/8	8 3/4	9	13 1/2	3 7/8	1 1/2	12 1/2	5	5	3	10 5/8	12	7/8	2 1/4	10 5/8	2 1/8	1		9.00
4	48		2 1/4	3/4	1	8	13 1/2	2 3/8	1 1/2	11 1/2	11 7/8	17 3/4	3 5/8	2 1/2	16 3/8	6 1/2	7	4	14 3/8	16 7/8	5/8	3 1/4	15 1/8	2 3/4	1 1/8		16.00
5																											

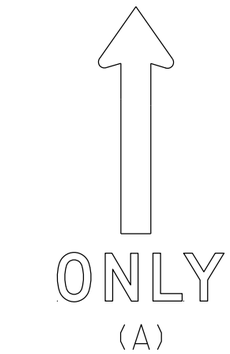
STANDARD SIGN
R3-7L & R3-7R

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/18/2011 PLATE NO. R3-7.3

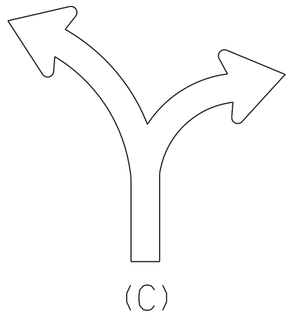
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 218 | E

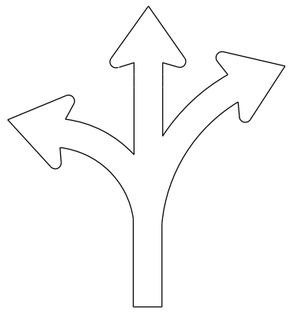


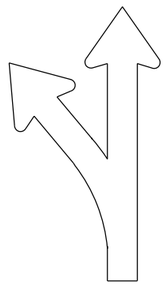
(A)

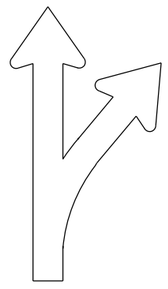


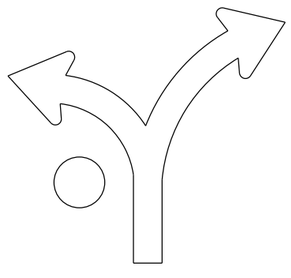
(B)

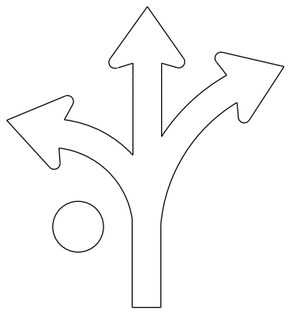

(C)

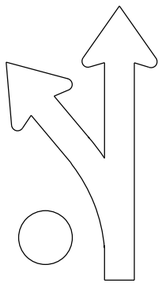

(D)

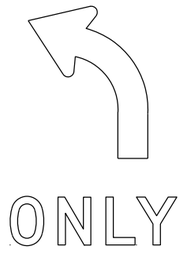

(E)


(F)

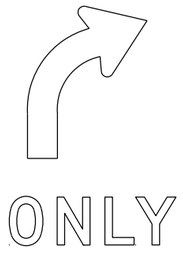

(G)


(H)

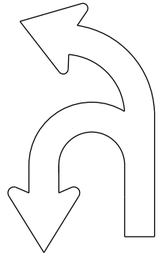

(I)



(L)



(R)


(U)

NOTES

1. Sigs are Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - D
4. Use appropriate Letter for Sign Code
   Each letter added makes sign wider. Example R3-8EAR
5. Square footage of sign varies by letters

1	Letter =	3.75 sq ft for Size 2
		6.0 sq ft for Size 3
		10.0 sq ft for Size 4 or 5
2	Letters =	7.5 sq ft for Size 2
		12.0 sq ft for Size 3
		20.0 sq ft for Size 4 or 5
3	Letters =	11.25 sq ft for Size 2
		18.0 sq ft for Size 3
		30.0 sq ft for Size 4 or 5
4	Letters =	15.0 sq ft for Size 2
		24.0 sq ft for Size 3
		40.0 sq ft for Size 4 or 5
5	Letters =	18.75 sq ft for Size 2
		30.0 sq ft for Size 3
		50.0 sq ft for Size 4 or 5
6	Letters =	22.5 sq ft for Size 2
		36.0 sq ft for Size 3
		60.0 sq ft for Size 4 or 5

6. When letters C,D,G,H are used on the Left or Right end of the sign the Sq. Ft. changes.
   Add the amounts when these letters are used:
   1.25 sq ft for Size 2
   1.5 sq ft for Size 3
   2.0 sq ft for Size 4 or 5

STANDARD SIGN
R3-8 Series

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
For State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

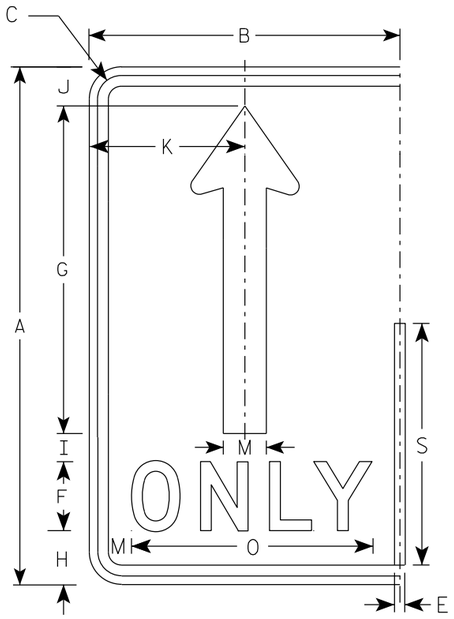
PROJECT NO:

SHEET NO: 219 E

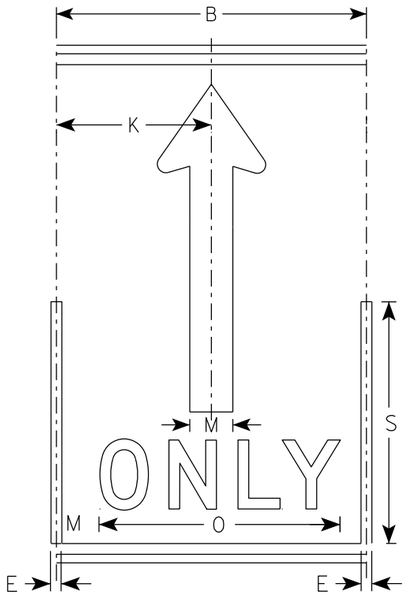
7

NOTES

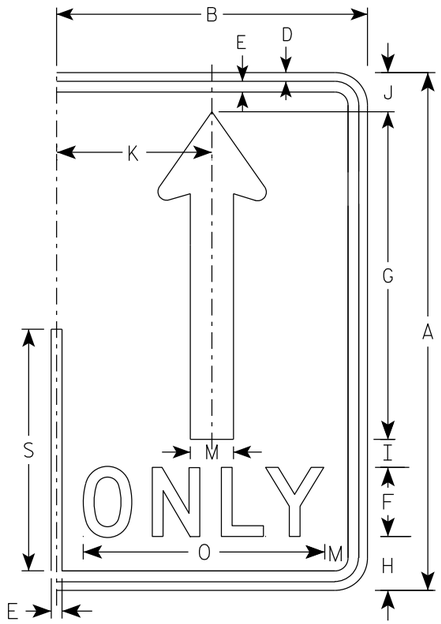
1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - D



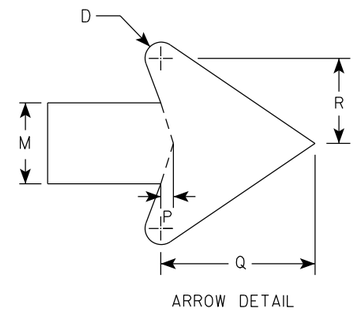
(A)



(A)



(A)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8	4	19	3 1/8	1 5/8	2 1/4	9		2 1/2		14	3/8	4 3/4	2 5/8	14								3.75
2M	30	18	1 3/8	1/2	5/8	4	19	3 1/8	1 5/8	2 1/4	9		2 1/2		14	3/8	4 3/4	2 5/8	14								3.75
3	36	24	1 3/8	1/2	5/8	5	22 3/4	3 3/4	1 3/4	2 3/4	12		3		17 5/8	1/2	5 3/4	3 1/8	16 3/4								6.0
4	48	30	2 1/4	3/4	1	6	30 3/8	5 1/8	2 7/8	3 5/8	15		4		21 3/4	5/8	7 5/8	4 1/4	22 3/8								10.0
5	48	30	2 1/4	3/4	1	6	30 3/8	5 1/8	2 7/8	3 5/8	15		4		21 3/4	5/8	7 5/8	4 1/4	22 3/8								10.0

STANDARD SIGN
R3-8 (A) Arrow

WISCONSIN DEPT OF TRANSPORTATION

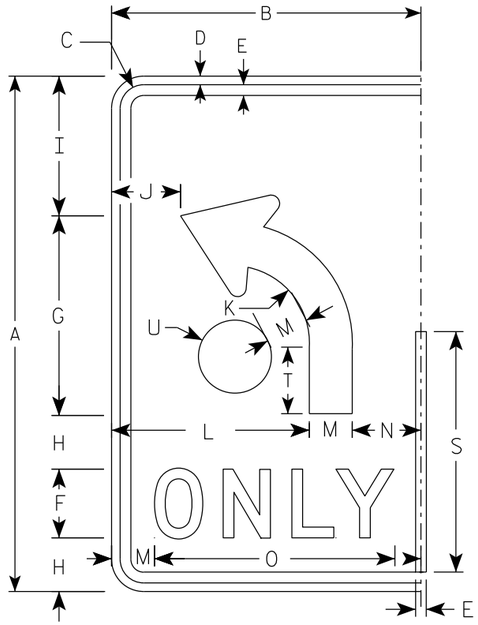
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

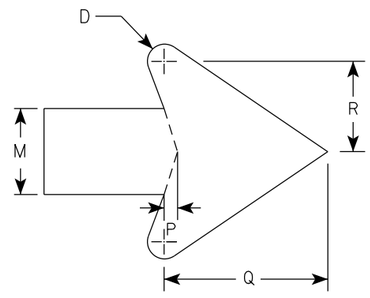
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 220 | E

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
   Message Series - D



(B)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8	4	11 5/8	3 1/8	8 1/8	4	4 1/2	11 1/2	2 1/2	4	14	3/8	4 3/4	2 5/8	14	3 7/8	2 1/8						3.75
2M	30	18	1 3/8	1/2	5/8	4	11 5/8	3 1/8	8 1/8	4	4 1/2	11 1/2	2 1/2	4	14	3/8	4 3/4	2 5/8	14	3 7/8	2 1/8						3.75
3	36	24	1 3/8	1/2	5/8	5	14	3 1/2	9 3/4	6	5 3/8	15	3	6	17 5/8	1/2	5 3/4	3 1/8	16 3/4	4 5/8	2 1/2						6.0
4	48	30	2 1/4	3/4	1	6	18 5/8	5 1/8	13 1/8	6 1/8	7 1/4	18	4	8	21 3/4	5/8	7 5/8	4 1/4	22 3/8	6 1/4	3 3/8						10.0
5	48	30	2 1/4	3/4	1	6	18 5/8	5 1/8	13 1/8	6 1/8	7 1/4	18	4	8	21 3/4	5/8	7 5/8	4 1/4	22 3/8	6 1/4	3 3/8						10.0

STANDARD SIGN

R3-8 (B) Arrow

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch

for State Traffic Engineer

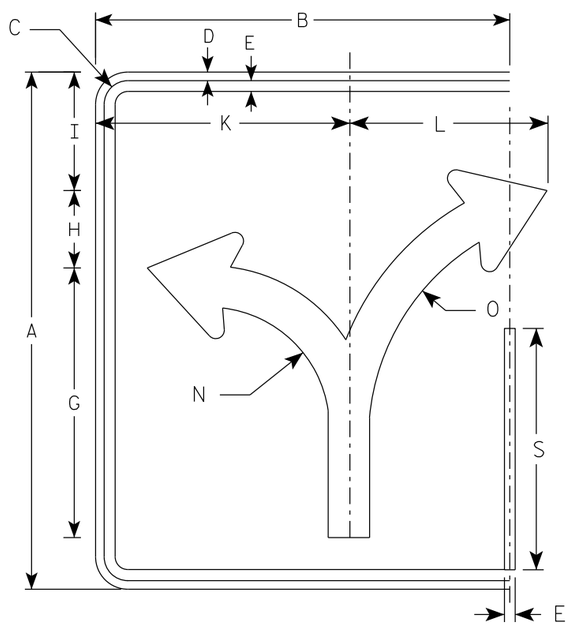
DATE 5/21/19 PLATE NO. R3-8.1

PROJECT NO:

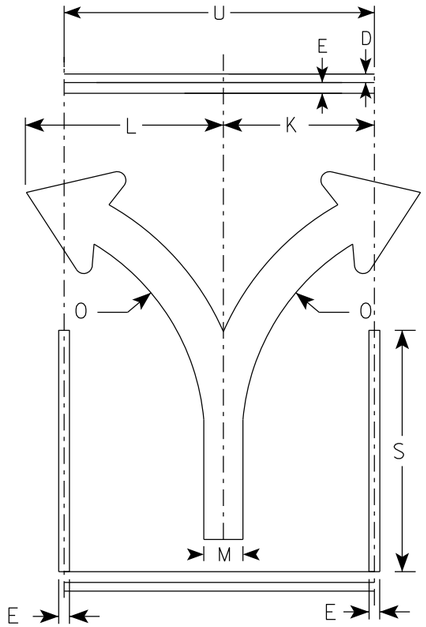
SHEET NO: 221 E

NOTES

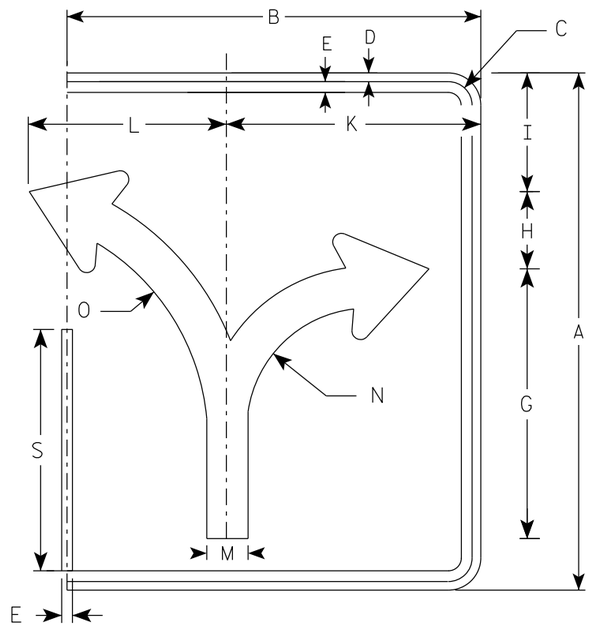
1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



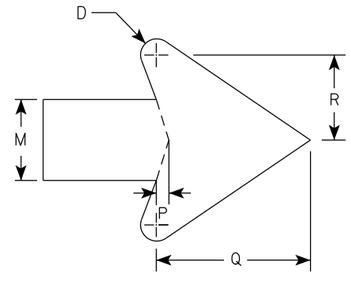
(C)



(C)



(C)



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	ENDS Area sq. ft.	MIDDLE Area sq. ft.
1																												
2S	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	6 7/8		14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		18						5.0	3.75
2M	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	6 7/8		14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		18						5.0	3.75
3	36	30	1 3/8	1/2	5/8		18 3/4	5 1/2	8 1/4		17 1/4	17 1/4	2 7/8	8 3/8	16	1/2	5 1/2	3	16 3/4		24						7.5	6.0
4	48	36	2 1/4	3/4	1		24 7/8	7 1/4	11		23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		30						12.0	10.0
5	48	36	2 1/4	3/4	1		24 7/8	7 1/4	11		23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		30						12.0	10.0

STANDARD SIGN
R3-8 (C) Arrow

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

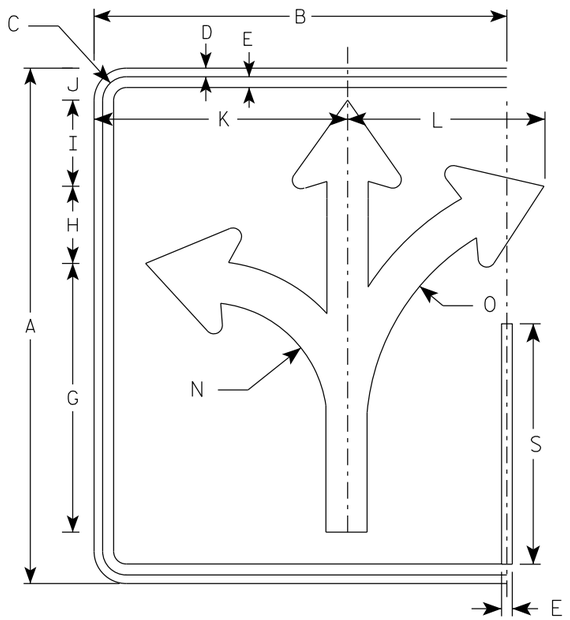
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 222 | E

7

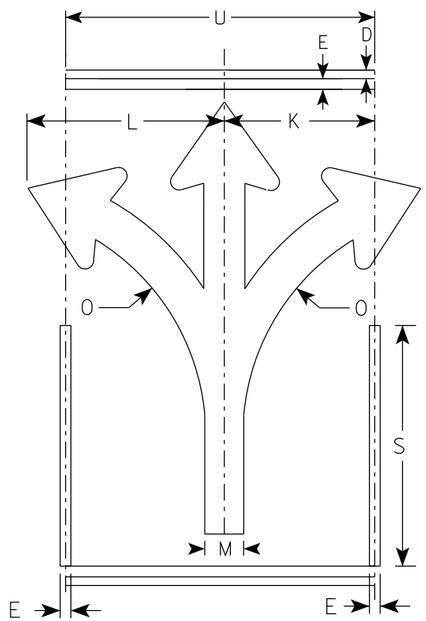
7

NOTES

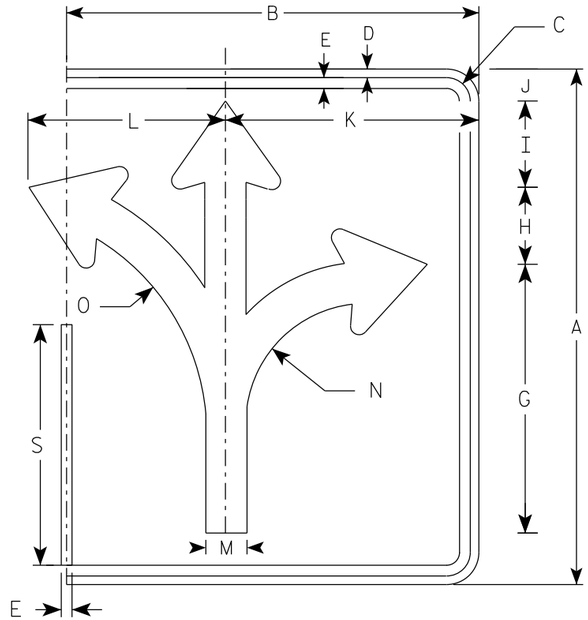
1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



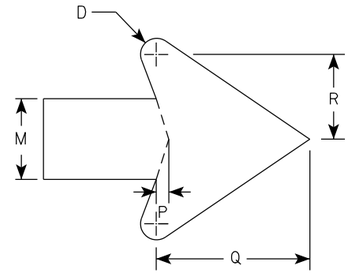
(D)



(D)



(D)



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	ENDS Area sq. ft.	MIDDLE Area sq. ft.
1																												
2S	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	5	1 7/8	14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		18						5.0	3.75
2M	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	5	1 7/8	14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		18						5.0	3.75
3	36	30	1 3/8	1/2	5/8		18 3/4	5 1/2	6	2 1/4	17 1/4	17 1/4	2 7/8	8 3/8	16	1/2	5 1/2	3	16 3/4		24						7.5	6.0
4	48	36	2 1/4	3/4	1		24 7/8	7 1/4	7 7/8	3 1/8	23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		30						12.0	10.0
5	48	36	2 1/4	3/4	1		24 7/8	7 1/4	7 7/8	3 1/8	23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		30						12.0	10.0

STANDARD SIGN
R3-8 (D) Arrow

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

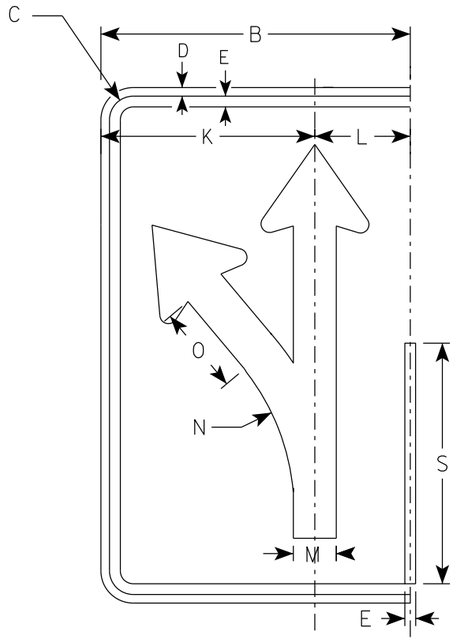
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 223 | E

7

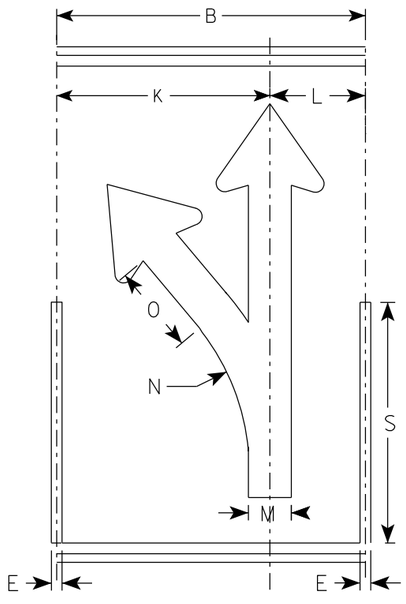
7

NOTES

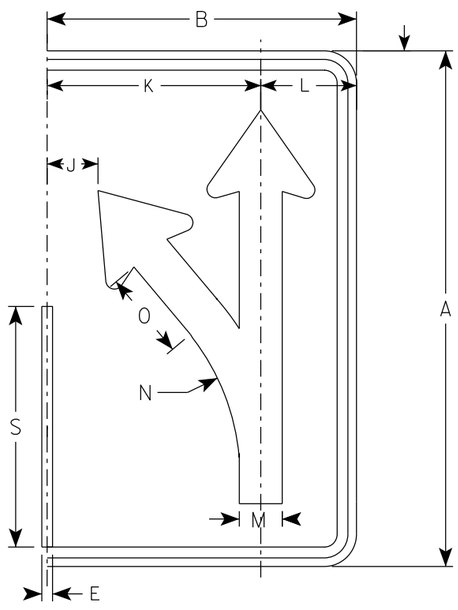
1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



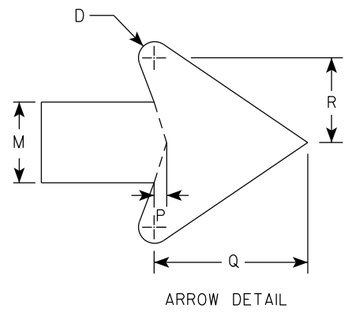
(E)



(E)



(E)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8		18 1/4	4 3/4	3 1/4	3	12 1/2	5 1/2	2 1/2	13 1/4	5 1/8	3/8	4 3/4	2 5/8	14								3.75
2M	30	18	1 3/8	1/2	5/8		18 1/4	4 3/4	3 1/4	3	12 1/2	5 1/2	2 1/2	13 1/4	5 1/8	3/8	4 3/4	2 5/8	14								3.75
3	36	24	1 3/8	1/2	5/8		21 7/8	5 5/8	4	4 7/8	16 1/8	7 3/4	3	15 7/8	6 1/8	1/2	5 3/4	3 1/8	16 3/4								6.0
4	48	30	2 1/4	3/4	1		29 1/8	7 1/2	5 1/4	5 3/8	20 1/2	9 1/2	4	21 1/4	8 1/4	5/8	7 5/8	4 1/4	22 3/8								10.0
5	48	30	2 1/4	3/4	1		29 1/8	7 1/2	5 1/4	5 3/8	20 1/2	9 1/2	4	21 1/4	8 1/4	5/8	7 5/8	4 1/4	22 3/8								10.0

STANDARD SIGN
R3-8 (E) Arrow

WISCONSIN DEPT OF TRANSPORTATION

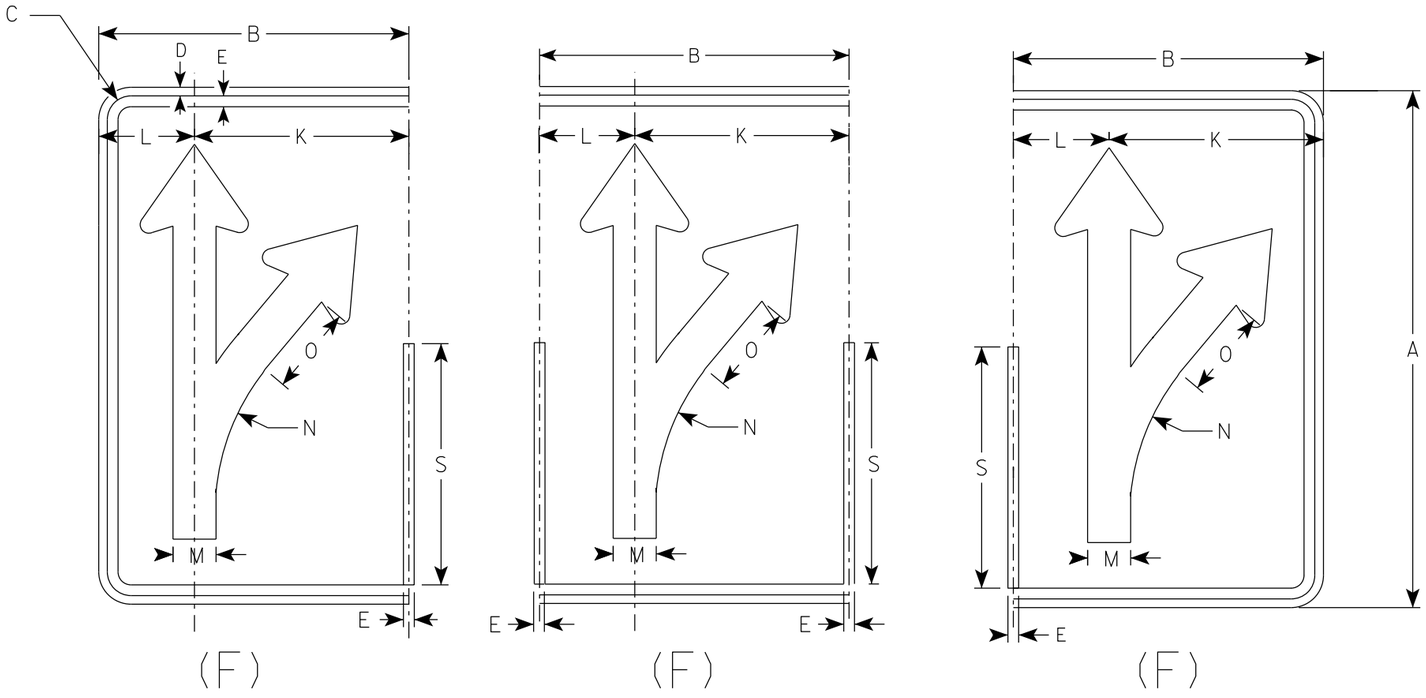
APPROVED Matthew R Rauch
For State Traffic Engineer

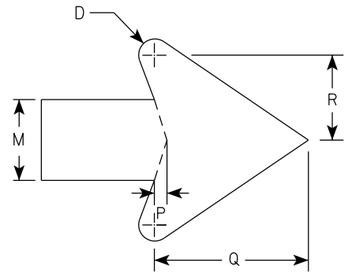
DATE 5/21/19 PLATE NO. R3-8.1

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 224 | E

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None





ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8		18 1/4	4 3/4	3 1/4	3	12 1/2	5 1/2	2 1/2	13 1/4	5 1/8	3/8	4 3/4	2 5/8	14								3.75
2M	30	18	1 3/8	1/2	5/8		18 1/4	4 3/4	3 1/4	3	12 1/2	5 1/2	2 1/2	13 1/4	5 1/8	3/8	4 3/4	2 5/8	14								3.75
3	36	24	1 3/8	1/2	5/8		21 7/8	5 5/8	4	4 7/8	16 1/8	7 3/4	3	15 7/8	6 1/8	1/2	5 3/4	3 1/8	16 3/4								6.0
4	48	30	2 1/4	3/4	1		29 1/8	7 1/2	5 1/4	5 3/8	20 1/2	9 1/2	4	21 1/4	8 1/4	5/8	7 5/8	4 1/4	22 3/8								10.0
5	48	30	2 1/4	3/4	1		29 1/8	7 1/2	5 1/4	5 3/8	20 1/2	9 1/2	4	21 1/4	8 1/4	5/8	7 5/8	4 1/4	22 3/8								10.0

STANDARD SIGN
R3-8 (F) Arrow

WISCONSIN DEPT OF TRANSPORTATION

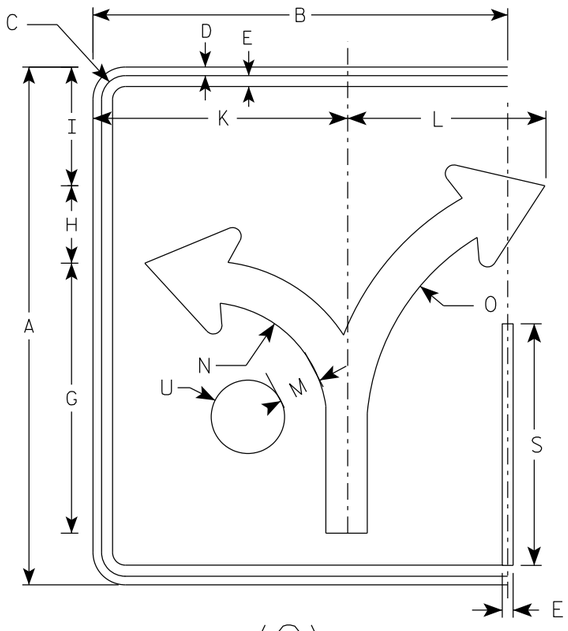
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

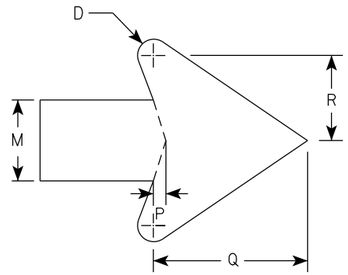
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 225 | E

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



(G)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	6 7/8		14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		2 1/8						5.0
2M	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	6 7/8		14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		2 1/8						5.0
3	36	30	1 3/8	1/2	5/8		18 3/4	5 1/2	8 1/4		17 1/4	17 1/4	2 7/8	8 3/8	16	1/2	5 1/2	3	16 3/4		2 1/2						7.5
4	48	36	2 1/4	3/4	1		24 7/8	7 1/4	11		23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		3 3/8						12.0
5	48	36	2 1/4	3/4	1		24 7/8	7 1/4	11		23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		3 3/8						12.0

STANDARD SIGN
R3-8 (G) Arrow

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

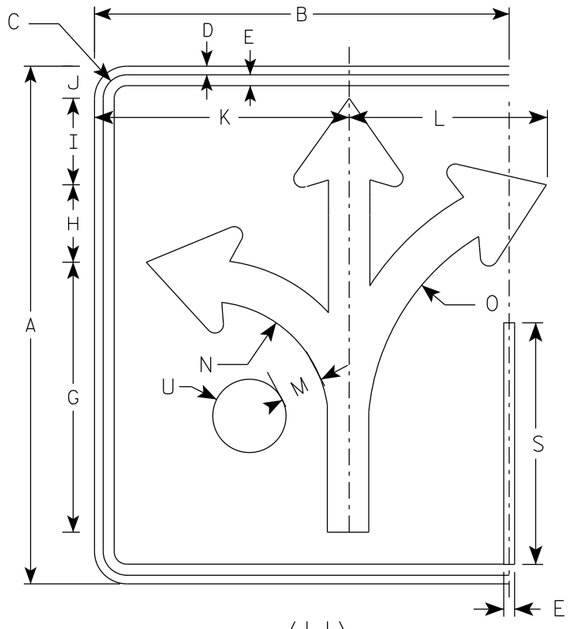
DATE 5/21/19 PLATE NO. R3-8.1

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 226 | E

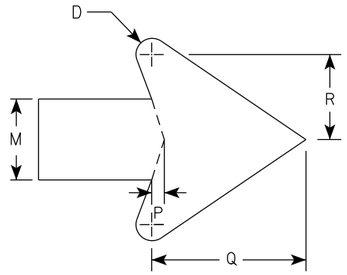
FILE NAME : C:\CAEfiles\Projects\stdplate_R38.dgn PLOT DATE : 21-MAY 2019 4:38 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : $$.....plotscale.....$$ WISDOT/CADDS SHEET 42

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



(H)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	5	1 7/8	14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		2 1/8						5.0
2M	30	24	1 3/8	1/2	5/8		15 5/8	4 1/2	5	1 7/8	14 3/4	11 1/2	2 3/8	7	13 1/4	3/8	4 1/2	2 1/2	14		2 1/8						5.0
3	36	30	1 3/8	1/2	5/8		18 3/4	5 1/2	6	3 1/8	17 1/4	17 1/4	2 7/8	8 3/8	16	1/2	5 1/2	3	16 3/4		2 1/2						7.5
4	48	36	2 1/4	3/4	1		24 7/8	7 1/4	7 7/8	3 1/8	23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		3 3/8						12.0
5	48	36	2 1/4	3/4	1		24 7/8	7 1/4	7 7/8	3 1/8	23 1/8	18	3 3/4	11 1/8	21 1/4	5/8	7 1/8	4	22 3/8		3 3/8						12.0

STANDARD SIGN
R3-8 (H) Arrow

WISCONSIN DEPT OF TRANSPORTATION

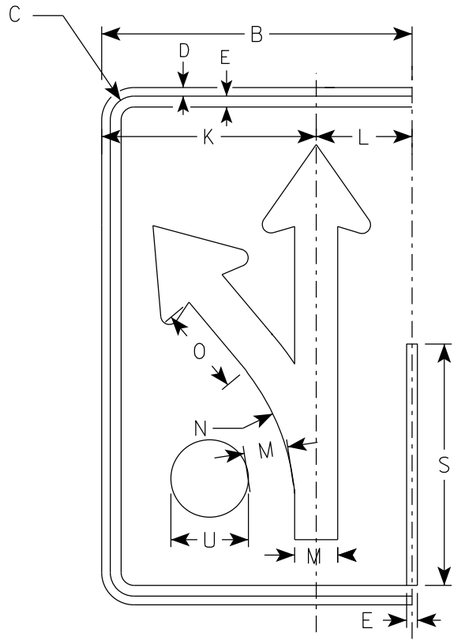
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

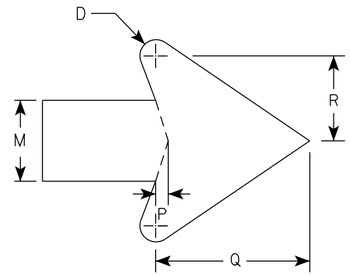
PROJECT NO:	HWY:	COUNTY:		SHEET NO: 227	E

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



(I)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8		18 1/4	4 3/4	3 1/4	3	12 1/2	5 1/2	2 1/2	13 1/4	5 1/8	3/8	4 3/4	2 5/8	14		2 1/8						3.75
2M	30	18	1 3/8	1/2	5/8		18 1/4	4 3/4	3 1/4	3	12 1/2	5 1/2	2 1/2	13 1/4	5 1/8	3/8	4 3/4	2 5/8	14		2 1/8						3.75
3	36	24	1 3/8	1/2	5/8		21 7/8	5 5/8	4	4 7/8	16 1/8	7 3/4	3	15 7/8	6 1/8	1/2	5 3/4	3 1/8	16 3/4		2 1/2						6.0
4	48	30	2 1/4	3/4	1		29 1/8	7 1/2	5 1/4	5 3/8	20 1/2	9 1/2	4	21 1/4	8 1/4	5/8	7 5/8	4 1/4	22 3/8		3 3/8						10.0
5	48	30	2 1/4	3/4	1		29 1/8	7 1/2	5 1/4	5 3/8	20 1/2	9 1/2	4	21 1/4	8 1/4	5/8	7 5/8	4 1/4	22 3/8		3 3/8						10.0

STANDARD SIGN
R3-8 (I) Arrow

WISCONSIN DEPT OF TRANSPORTATION

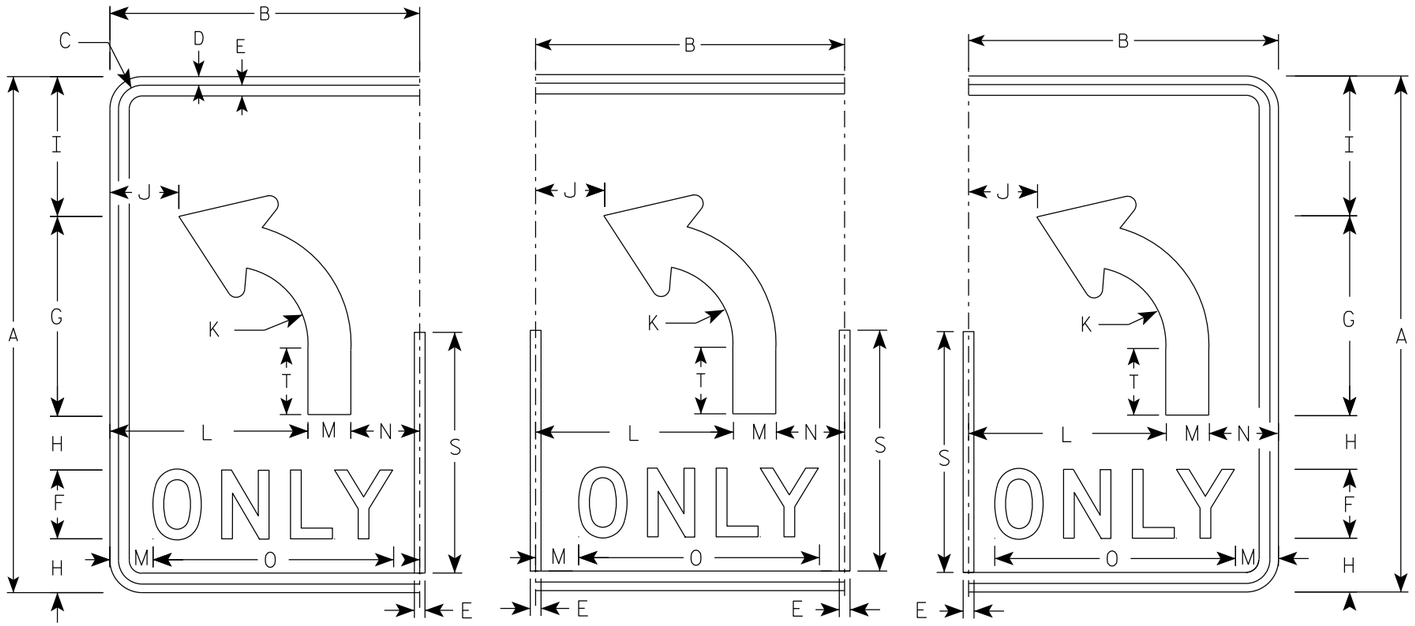
APPROVED Matthew R Rauch
For State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

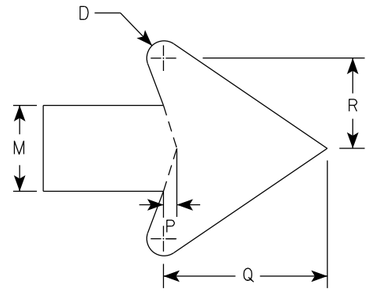
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 228 | E

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - D



(L) (L) (L)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8	4	11 5/8	3 1/8	8 1/8	4	4 1/2	11 1/2	2 1/2	4	14	3/8	4 3/4	2 5/8	14	3 7/8							3.75
2M	30	18	1 3/8	1/2	5/8	4	11 5/8	3 1/8	8 1/8	4	4 1/2	11 1/2	2 1/2	4	14	3/8	4 3/4	2 5/8	14	3 7/8							3.75
3	36	24	1 3/8	1/2	5/8	5	14	3 1/2	9 3/4		5 3/8	15	3	6	17 5/8	1/2	5 3/4	3 1/8	16 3/4	4 5/8							6.0
4	48	30	2 1/4	3/4	1	6	18 5/8	5 1/8	13 1/8	6 1/8	7 1/4	18	4	8	21 3/4	5/8	7 5/8	4 1/4	22 3/8	6 1/4							10.0
5	48	30	2 1/4	3/4	1	6	18 5/8	5 1/8	13 1/8	6 1/8	7 1/4	18	4	8	21 3/4	5/8	7 5/8	4 1/4	22 3/8	6 1/4							10.0

STANDARD SIGN

R3-8 (L) Arrow

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

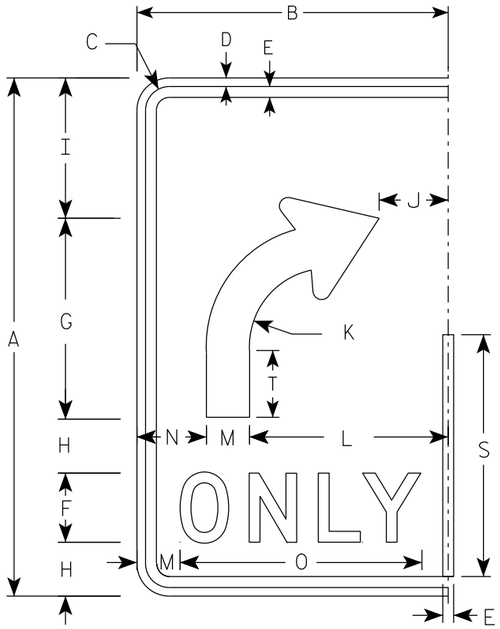
DATE 5/21/19 PLATE NO. R3-8.1

PROJECT NO:

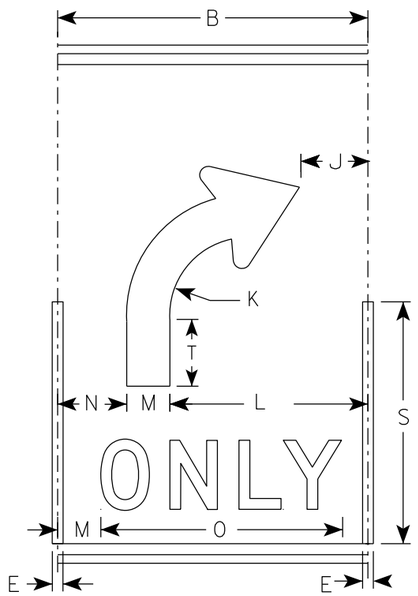
SHEET NO: 229 E

NOTES

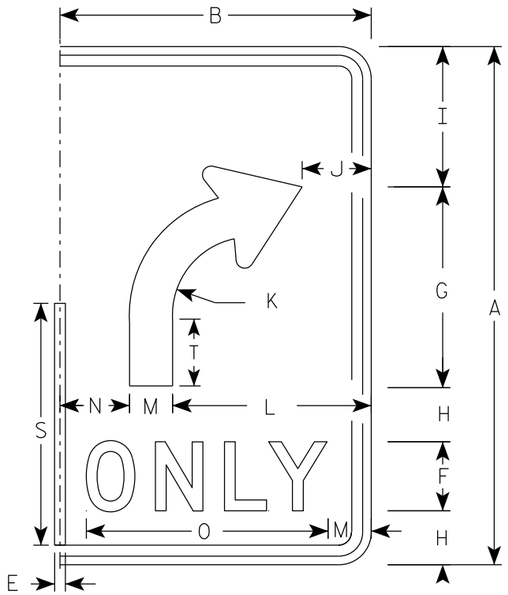
1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - D



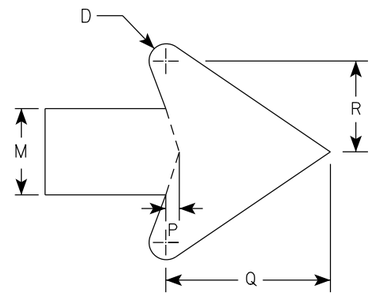
(R)



(R)



(R)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8	4	11 5/8	3 1/8	8 1/8	4	4 1/2	11 1/2	2 1/2	4	14	3/8	4 3/4	2 5/8	14	3 7/8							3.75
2M	30	18	1 3/8	1/2	5/8	4	11 5/8	3 1/8	8 1/8	4	4 1/2	11 1/2	2 1/2	4	14	3/8	4 3/4	2 5/8	14	3 7/8							3.75
3	36	24	1 3/8	1/2	5/8	5	14	3 1/2	9 3/4	6	5 3/8	15	3	6	17 5/8	1/2	5 3/4	3 1/8	16 3/4	4 5/8							6.0
4	48	30	2 1/4	3/4	1	6	18 5/8	5 1/8	13 1/8	6 1/8	7 1/4	18	4	8	21 3/4	5/8	7 5/8	4 1/4	22 3/8	6 1/4							10.0
5	48	30	2 1/4	3/4	1	6	18 5/8	5 1/8	13 1/8	6 1/8	7 1/4	18	4	8	21 3/4	5/8	7 5/8	4 1/4	22 3/8	6 1/4							10.0

STANDARD SIGN

R3-8 (R) Arrow

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

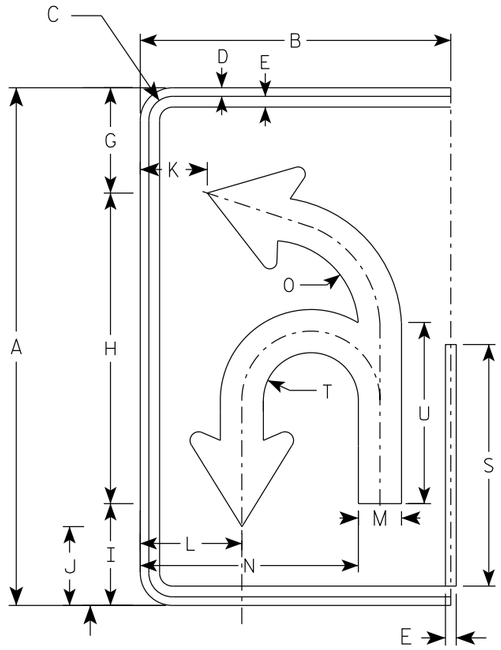
DATE 5/21/19 PLATE NO. R3-8.1

PROJECT NO:

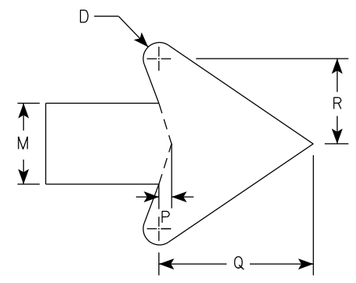
SHEET NO: 230 **E**

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - None



(U)



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	30	18	1 3/8	1/2	5/8		6 1/8	18	5 7/8	4 5/8	3 7/8	5 7/8	2 1/2	12 5/8	5 1/8	3/8	4 3/4	2 5/8	14	2 3/4	10 1/2						3.75
2M	30	18	1 3/8	1/2	5/8		6 1/8	18	5 7/8	4 5/8	3 7/8	5 7/8	2 1/2	12 5/8	5 1/8	3/8	4 3/4	2 5/8	14	2 3/4	10 1/2						3.75
3	36	24	1 3/8	1/2	5/8		21 7/8	21 5/8	7 1/8	5 1/2	5 7/8	8 1/4	3	16 3/8	6 1/8	1/2	5 3/4	3 1/8	16 3/4	3 1/4	12 5/8						6.0
4	48	30	2 1/4	3/4	1		29 1/8	28 3/4	9 3/8	7 1/4	6 7/8	10	4	20 7/8	8 1/8	5/8	7 5/8	4 1/4	22 3/8	4 3/8	16 3/4						10.0
5	48	30	2 1/4	3/4	1		29 1/8	28 3/4	9 3/8	7 1/4	6 7/8	10	4	20 7/8	8 1/8	5/8	7 5/8	4 1/4	22 3/8	4 3/8	16 3/4						10.0

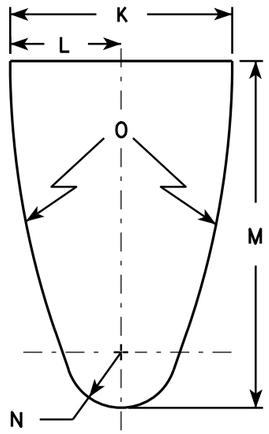
STANDARD SIGN
R3-8 (U) Arrow

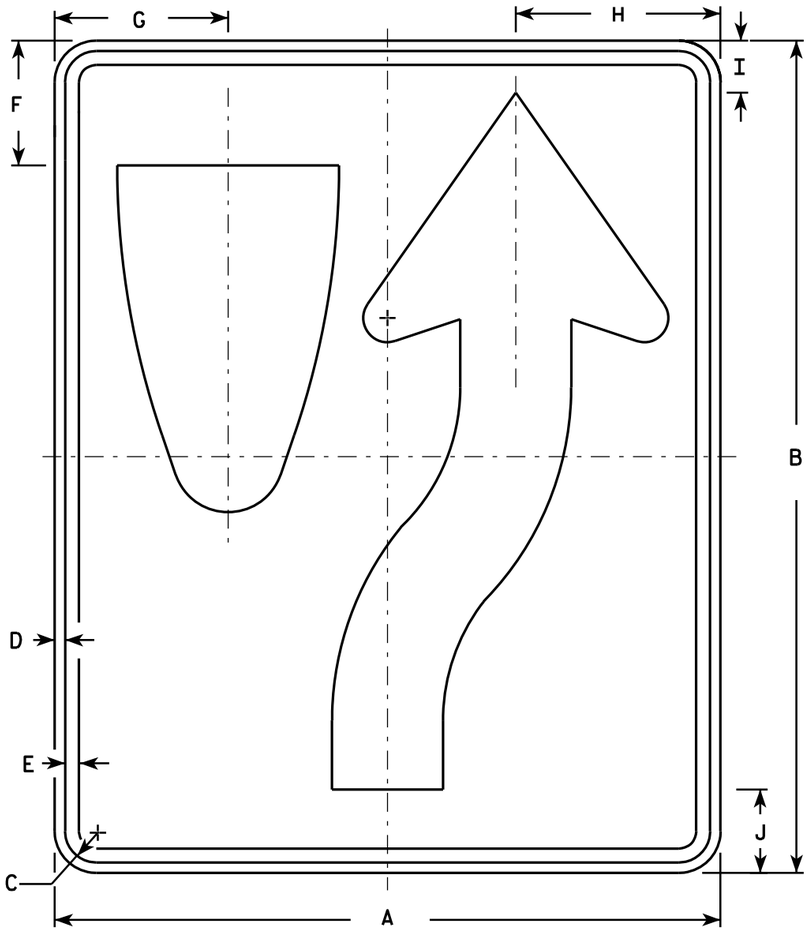
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/21/19 PLATE NO. R3-8.1

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 231 | E

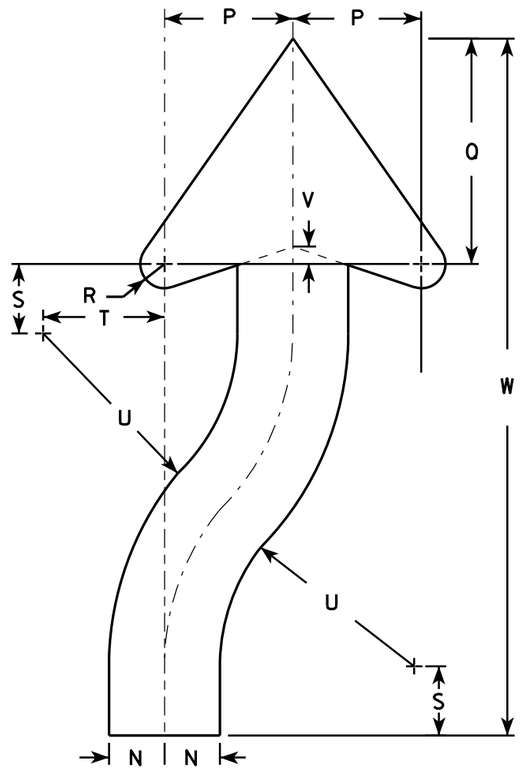




R4-7

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition. material is plywood but borders shall be rounded
2. Color:
   Background - White
   Message - Black
3. Corners may be square or rounded when base as shown. When base material is metal, the corners and borders shall be rounded.
4. R4-8 is the same as R4-7 except Legend is reversed.



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	18	24	1 1/8	3/8	1/2	3 3/8	4 3/4	5 1/2	1 3/8	2 1/4	6	3	9 3/8	1 1/2	22 1/2	3 1/2	6 1/8	5/8	1 7/8	3 1/4	6 3/4	1/2	20 3/8				3.0
2S	24	30	1 1/8	3/8	1/2	4 1/2	6 1/4	7 3/8	1 7/8	3	8	4	12 1/2	2	30	4 5/8	8 1/8	7/8	2 1/2	4 3/8	9	5/8	25 1/8				5.0
2M	24	30	1 1/8	3/8	1/2	4 1/2	6 1/4	7 3/8	1 7/8	3	8	4	12 1/2	2	30	4 5/8	8 1/8	7/8	2 1/2	4 3/8	9	5/8	25 1/8				5.0
3	36	48	1 3/4	1/2	5/8	6 3/4	9 3/8	11 1/8	2 7/8	4 1/2	12	6	18 3/4	3	45	6 7/8	12 1/4	1 1/4	3 3/4	6 5/8	13 1/2	1	40 3/4				12.0
4	36	48	1 3/4	1/2	5/8	6 3/4	9 3/8	11 1/8	2 7/8	4 1/2	12	6	18 3/4	3	45	6 7/8	12 1/4	1 1/4	3 3/4	6 5/8	13 1/2	1	40 3/4				12.0
5	48	60	2 1/4	3/4	1	9	12 1/2	14 3/4	3 3/4	6	16	8	25	4	60	9 1/4	16 1/4	1 5/8	5	8 3/4	18	1 1/4	50 1/4				20.0

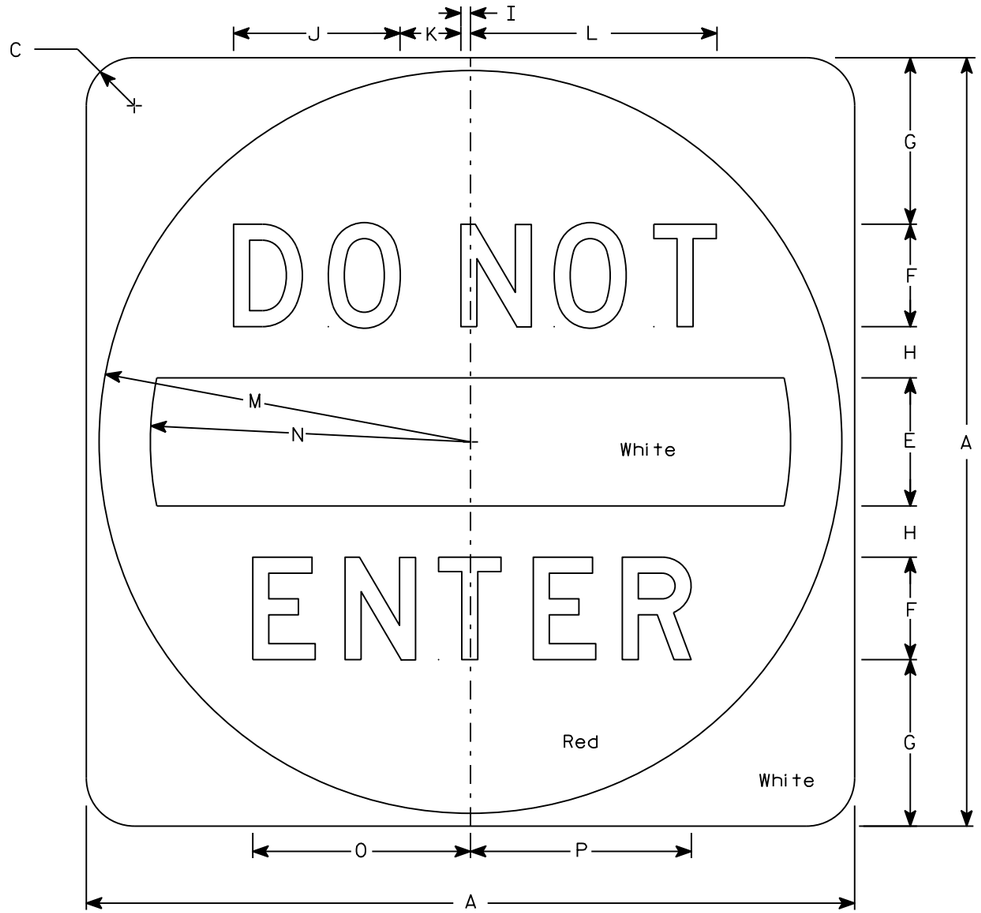
STANDARD SIGN
R4-7 & R4-8

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

DATE 3/25/2011 PLATE NO. R4-7.8

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 232	E



R5-1

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - See detail
   Message - White
3. Message Series - D

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											6.25
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

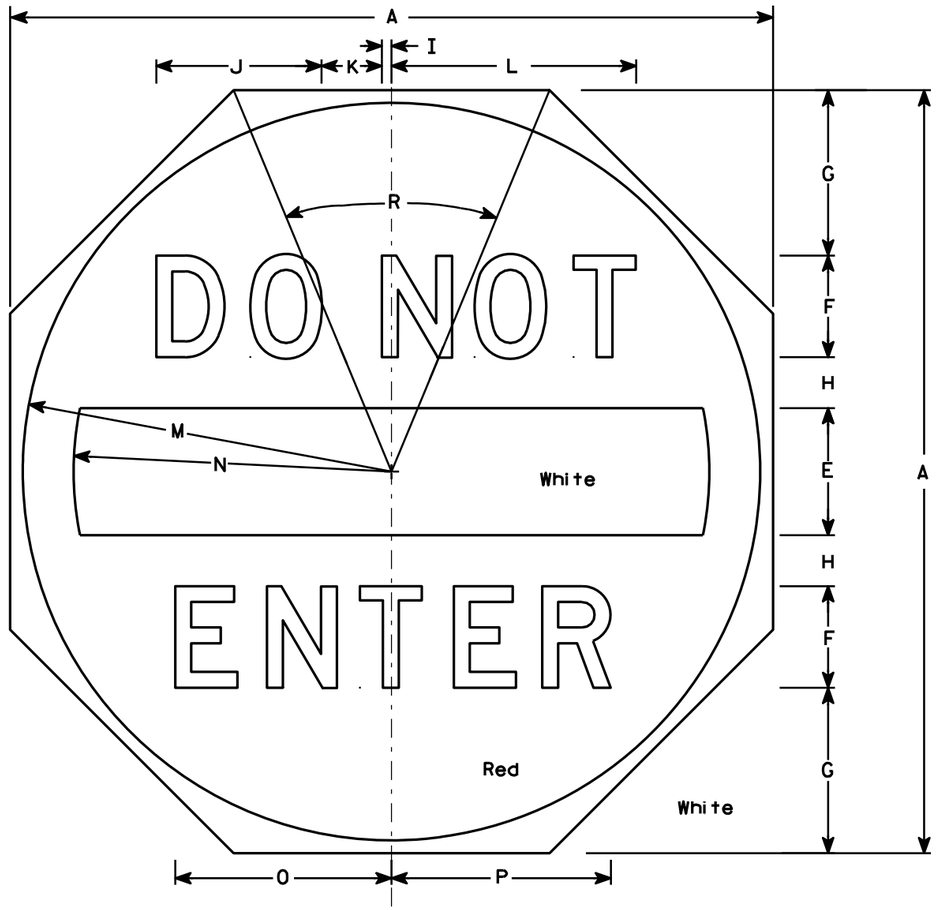
STANDARD SIGN
R5-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/15/18 PLATE NO. R5-1.16

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 233 | E



R5-1C

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.

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		45°									5.18
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		45°									7.46
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		45°									7.46
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		45°									13.25
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		45°									13.25

STANDARD SIGN
R5-1C

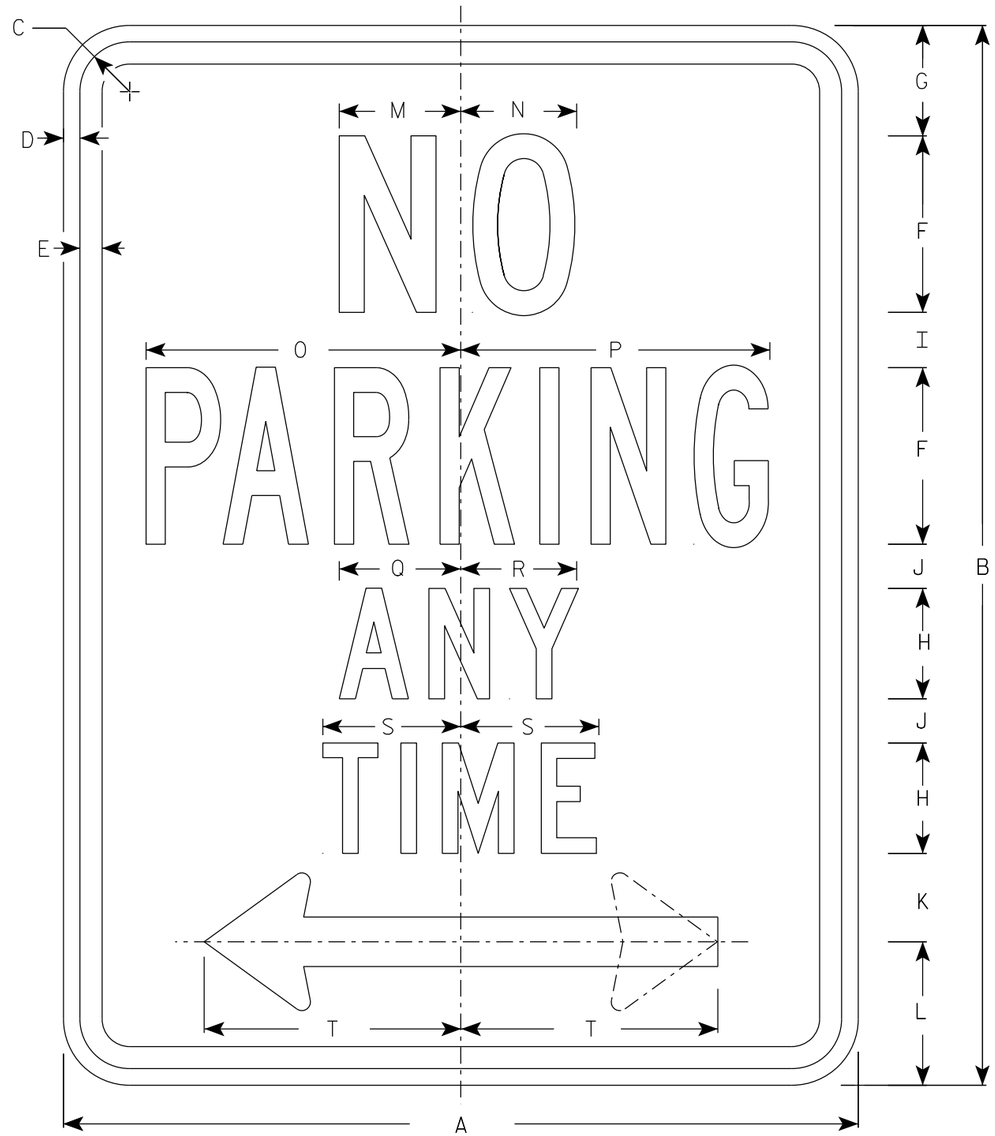
WISCONSIN DEPT OF TRANSPORTATION

APPROVED

State Traffic Engineer

DATE 3/23/11 PLATE NO. R5-1C.1

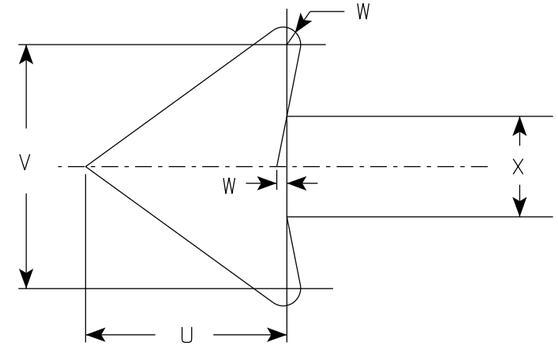
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 234 | E



R7-1

NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Red
3. Message Series - See Note 5
4. Lines 1, 3 and 4 are series C, line 2 is series B.
5. R7-1D (double arrow)
   R7-1L (left arrow)
   R7-1R (right arrow)



SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	12	18	1 1/8	3/8	3/8	3	1 7/8	2	7/8	5/8	1 1/2	2 1/2	2	2	4 7/8	4 7/8	2 1/4	2 1/8	2 1/2	3 7/8	1 1/2	1 3/4	1/8	3/4			1.5
2S	18	24	1 1/8	3/8	1/2	4	2 1/2	2 1/2	1 1/4	1	2	3 1/4	2 3/4	2 5/8	7 1/8	7	2 3/4	2 5/8	3 1/8	5 7/8	2 1/4	2 5/8	1/4	1 1/8			3.0
2M	24	30	1 1/8	3/8	1/2	5	3	3	2	1 1/4	2 1/2	4	3 1/4	3 3/8	9 1/4	9 1/4	3 1/4	3 1/4	3 3/4	7 3/4	3	3 1/2	1/4	1 1/2			5.0
3	24	30	1 1/8	3/8	1/2	5	3	3	2	1 1/4	2 1/2	4	3 1/4	3 3/8	9 1/4	9 1/4	3 1/4	3 1/4	3 3/4	7 3/4	3	3 1/2	1/4	1 1/2			5.0
4																											
5																											

STANDARD SIGN
R7-1

WISCONSIN DEPT OF TRANSPORTATION

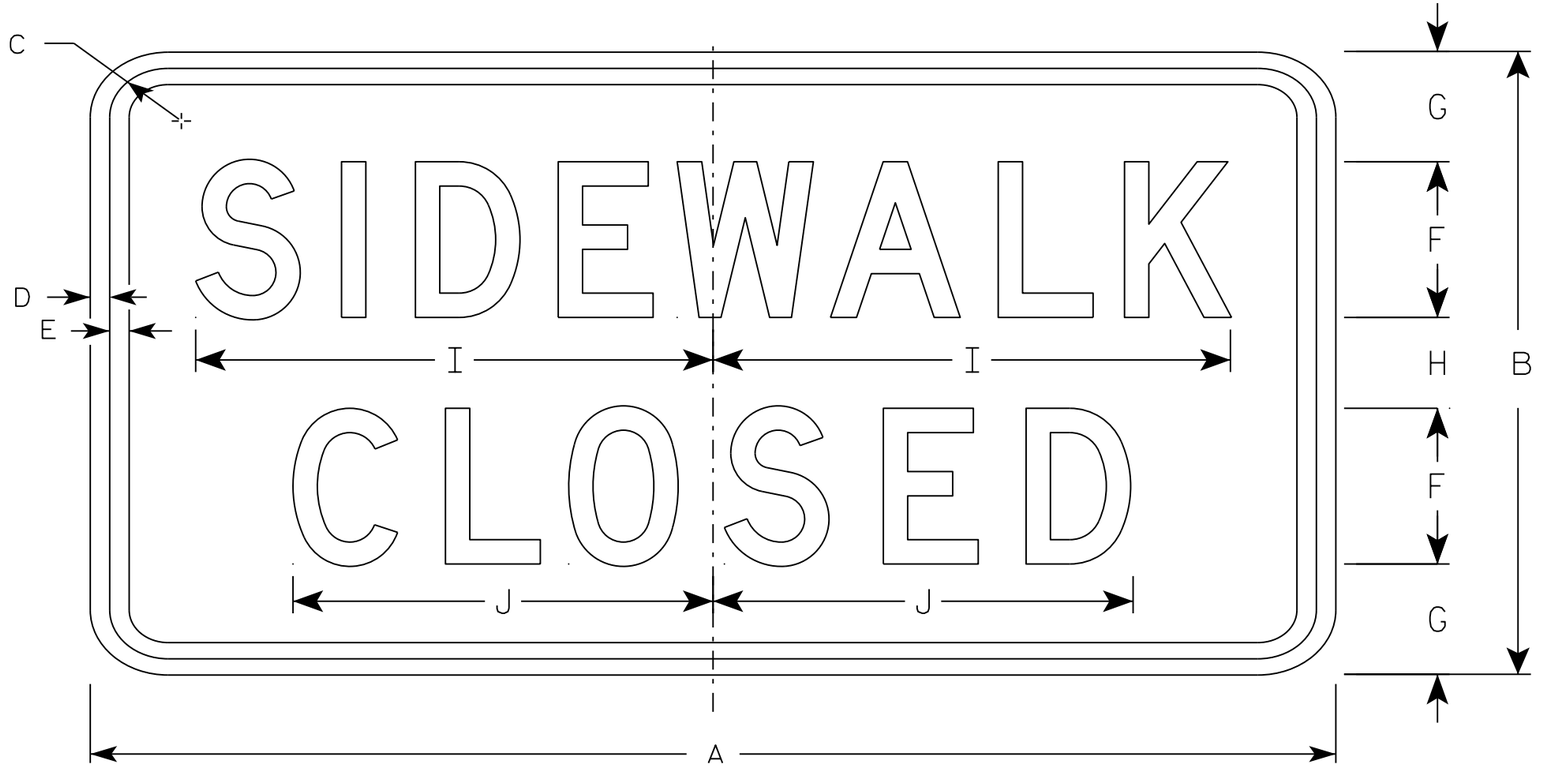
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/31/2021 PLATE NO. R7-1.10

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 235 E

7

7



R9-9

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Use Size 2 for Sidewalks. Use Size 3 for Paths and Trails.

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	12	1 3/4	1/2	1/2	3	2 1/8	1 3/4	10	8 1/8																	2.0
2M	24	12	1 3/4	1/2	1/2	3	2 1/8	1 3/4	10	8 1/8																	2.0
3	30	18	1 3/4	1/2	1/2	4	3 1/2	3	12 1/2	10 1/4																	3.75
4																											
5																											

STANDARD SIGN
R9-9

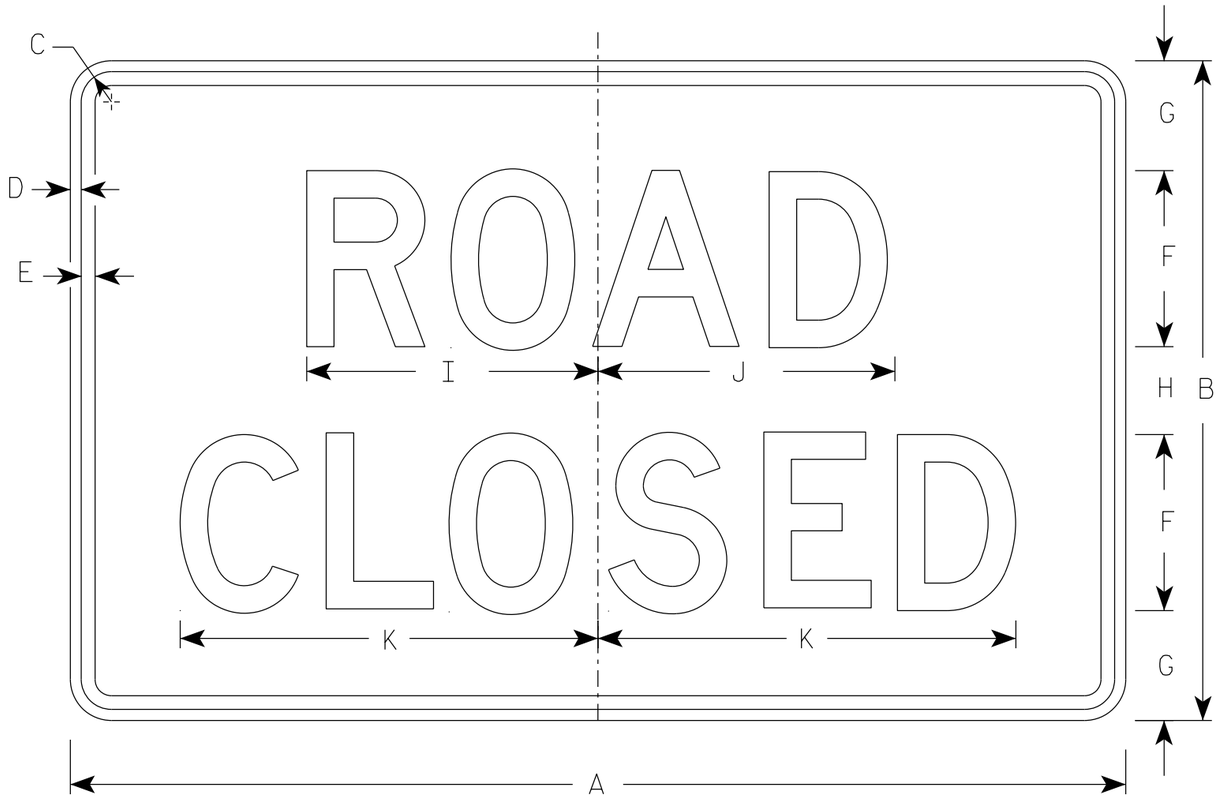
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 8/11/16 PLATE 236 R9-9.6

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

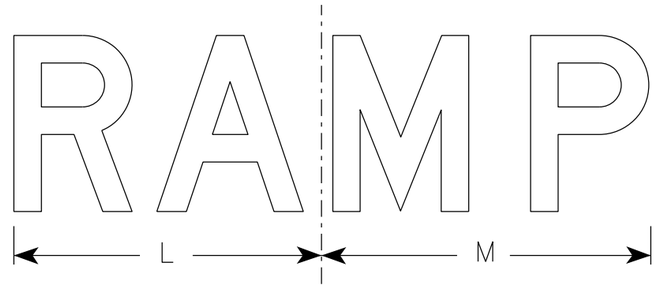
FILE NAME : C:\CAEfiles\Projects\tr_stdplate\R99.DGN PLOT DATE : 11-AUG-2016 11:33 PLOT BY : $$ plotuser $$ PLOT NAME : PLOT SCALE : 2.918761:1.000000



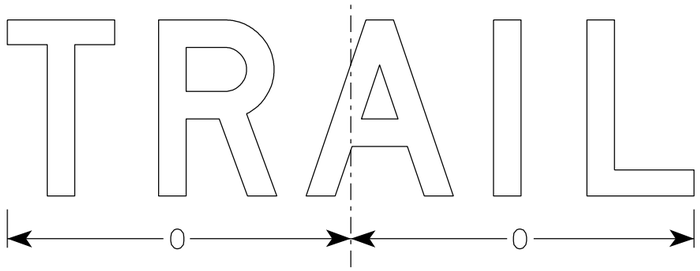
R11-2

NOTES

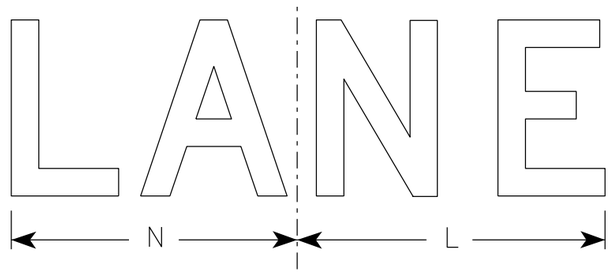
1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - D
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Modify the message as required.



R11-2R



R11-2T



R11-2L

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	48	30	1 3/8	1/2	5/8	8	5	4	13 1/4	13 1/2	19	14	15	13	15 5/8												10.0
2M	48	30	1 3/8	1/2	5/8	8	5	4	13 1/4	13 1/2	19	14	15	13	15 5/8												10.0
3	48	30	1 3/8	1/2	5/8	8	5	4	13 1/4	13 1/2	19	14	15	13	15 5/8												10.0
4	48	30	1 3/8	1/2	5/8	8	5	4	13 1/4	13 1/2	19	14	15	13	15 5/8												10.0
5	48	30	1 3/8	1/2	5/8	8	5	4	13 1/4	13 1/2	19	14	15	13	15 5/8												10.0

STANDARD SIGN
R11-2

WISCONSIN DEPT OF TRANSPORTATION

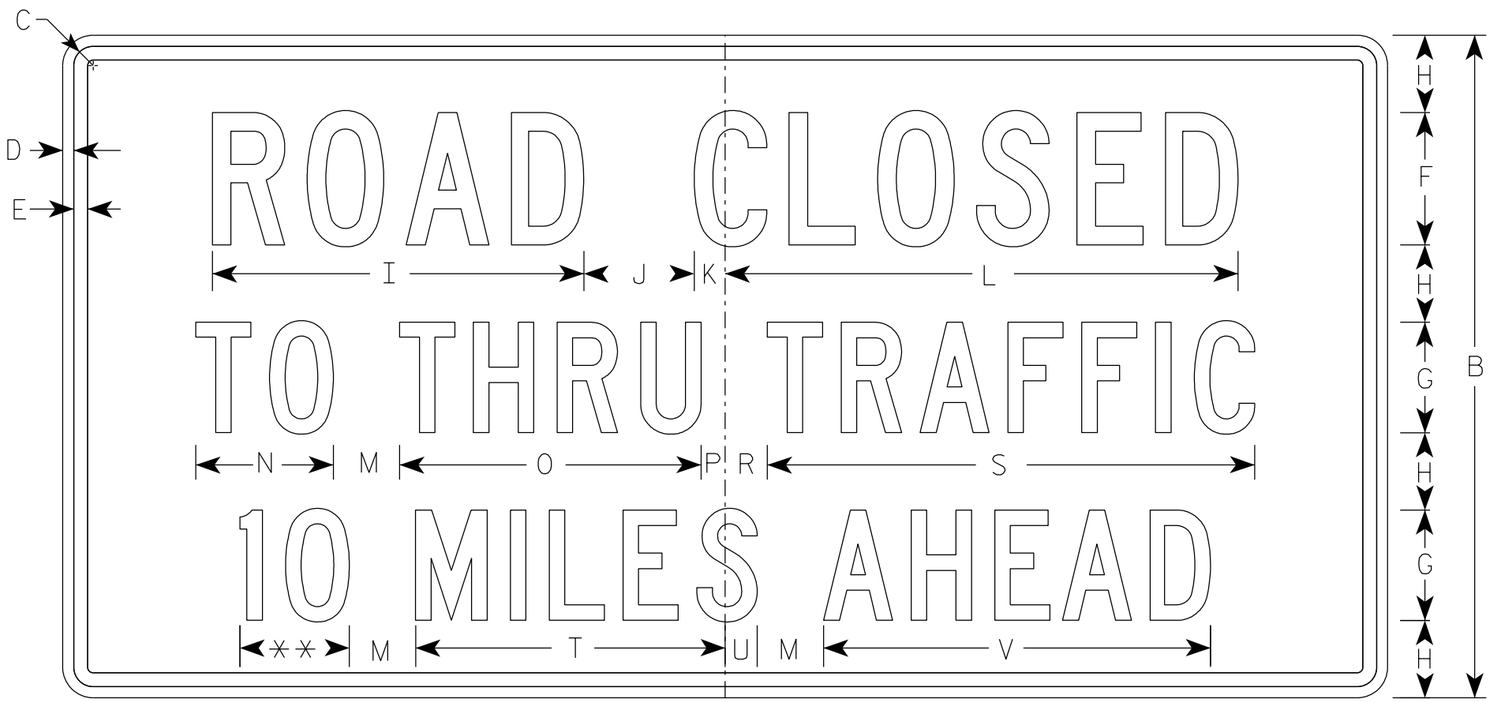
APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/29/2021 PLATE NO. R11-2.11

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 237	E

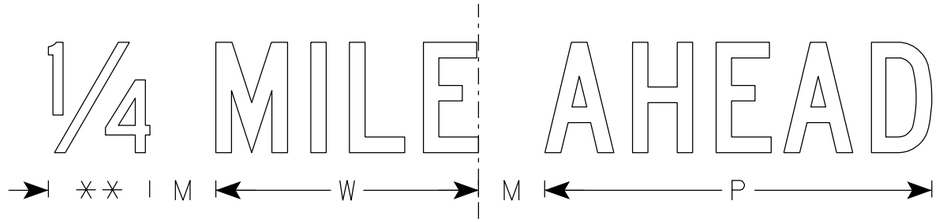
NOTES

1. Sign is Type II - Type H Reflective
2. Color:
   Background - White
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals to nearest quarter mile and optically adjust spacing to achieve proper balance.



R11-3

** See Note 5



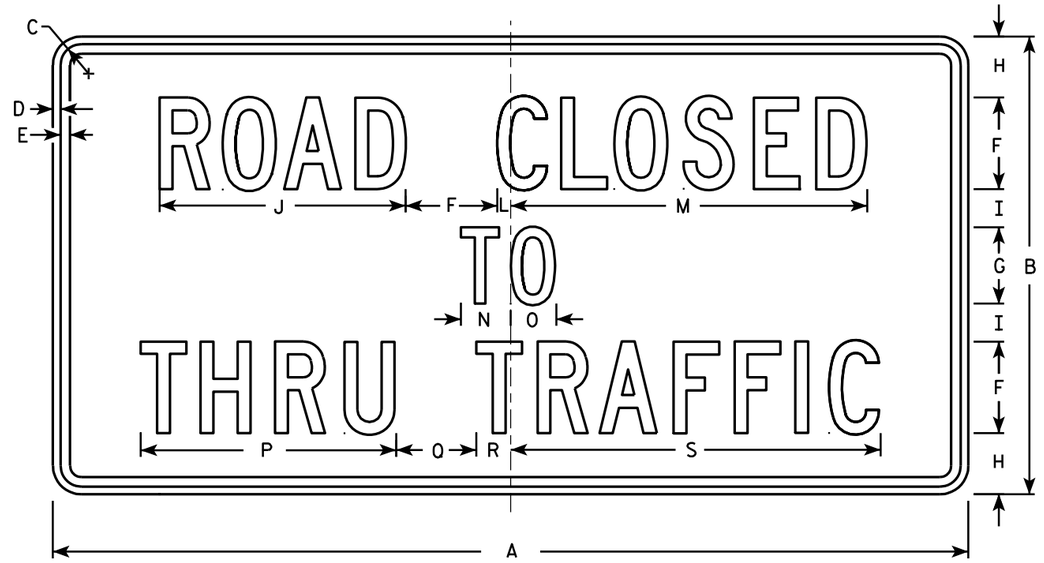
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36	18	1 1/4	3/8	3/8	4	3	2	11 1/4	3	1 1/8	15 3/8	2	3 3/4	8 1/4	5/8		1 3/8	13 1/4	8 3/8	7/8	10 1/2	7 1/8				4.5
2S	60	30	1 3/8	1/2	5/8	6	5	3 1/2	16 7/8	5	1 3/8	23 1/4	3	6 1/4	13 5/8	1 1/8		1 7/8	22 1/8	14	1 1/2	17 1/2	11 7/8				12.5
2M	60	30	1 3/8	1/2	5/8	6	5	3 1/2	16 7/8	5	1 3/8	23 1/4	3	6 1/4	13 5/8	1 1/8		1 7/8	22 1/8	14	1 1/2	17 1/2	11 7/8				12.5
3																											
4																											
5																											

STANDARD SIGN
R11-3

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer
DATE 6/14/2021 PLATE NO. R11-3.9

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 238	E



R11-4

NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - White
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	60	30	1 3/8	1/2	5/8	6	5	4	2 1/2	16 1/8		7/8	23 3/8	3 1/4	3	16 3/4	5 1/4	2 1/4	24 1/4								12.5
2M	60	30	1 3/8	1/2	5/8	6	5	4	2 1/2	16 1/8		7/8	23 3/8	3 1/4	3	16 3/4	5 1/4	2 1/4	24 1/4								12.5
3																											
4																											
5																											

STANDARD SIGN
R11 - 4

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

DATE 4/1/11 PLATE NO. R11-4.3

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 239 | E



R12-1

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 - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Lines 1, 2 & 3 are series E
   Lines 4, 5, & 6 are series D.
6. Substitute appropriate numeral and optically adjust spacing to achieve proper balance.
7. Substitute name of county or town on County Trunk and Town Highways respectively. Community name on City or Village Streets including Connecting Highways is optional.

* Varies (see note 6)

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	30	1 1/8	3/8	1/2	3	6	4	3	1 1/4	2 1/4	1 3/8	3/4	1/2	1 7/8	9	9 1/2	6	6 1/2	7 1/8	6 7/8	3 1/4	3 5/8	7 3/4			5.0
2S	24	30	1 1/8	3/8	1/2	3	6	4	3	1 1/4	2 1/4	1 3/8	3/4	1/2	1 7/8	9	9 1/2	6	6 1/2	7 1/8	6 7/8	3 1/4	3 5/8	7 3/4			5.0
2M	24	30	1 1/8	3/8	1/2	3	6	4	3	1 1/4	2 1/4	1 3/8	3/4	1/2	1 7/8	9	9 1/2	6	6 1/2	7 1/8	6 7/8	3 1/4	3 5/8	7 3/4			5.0
3	36	48	1 3/8	1/2	5/8	6	10	8	4 1/2	2 1/2	2 1/4	1 1/2	3/4	1/2	3	13 1/2	14 1/4	9	9 3/4	10 5/8	10 1/4	3 1/4	3 5/8	7 3/4			12.0
4	48	60	2 1/4	3/4	1	6	12	8	6	2 1/2	4 1/2	2 3/4	1 1/2	1	3 3/4	18	19	12	13	14 1/4	13 3/4	6 1/2	7 1/4	15 1/2			20.0
5																											

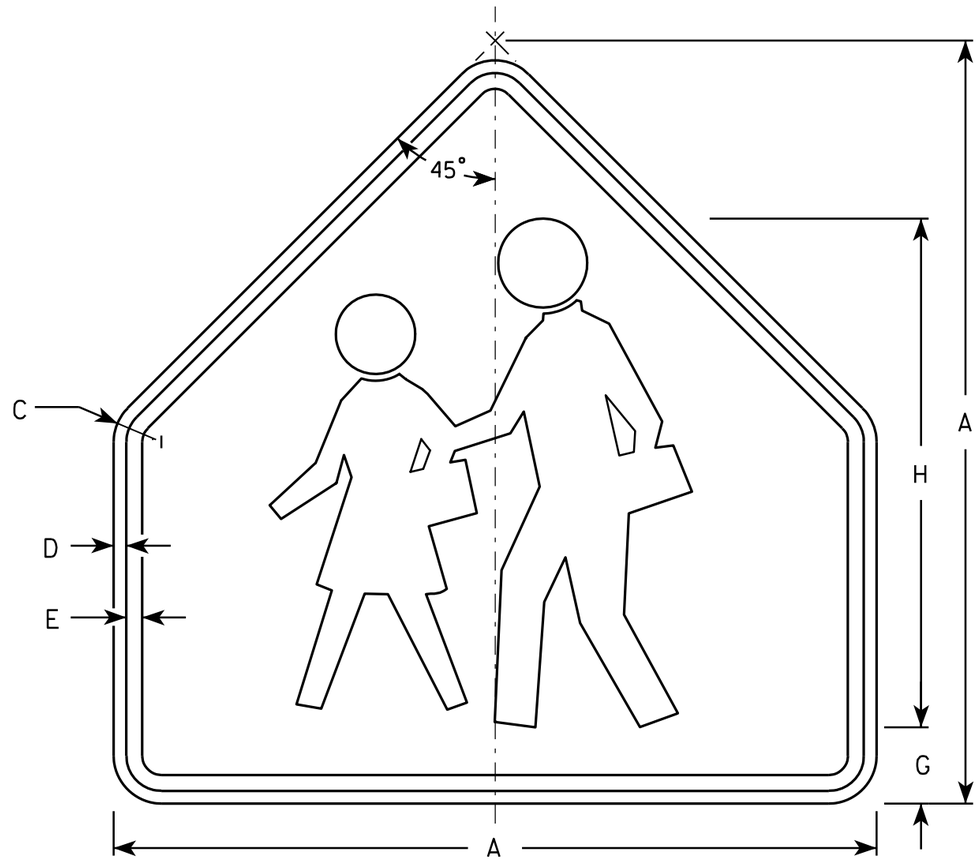
STANDARD SIGN
R12-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 4/1/11 PLATE NO. R12-1.8

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 240 | E



S1-1

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow-Green
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8		3	20																			4.69
2	36		1 5/8	5/8	3/4		3 1/2	24																			6.75
3	36		1 5/8	5/8	3/4		3 1/2	24																			6.75
4	48		2 1/4	3/4	1		4 3/4	32																			12
5																											

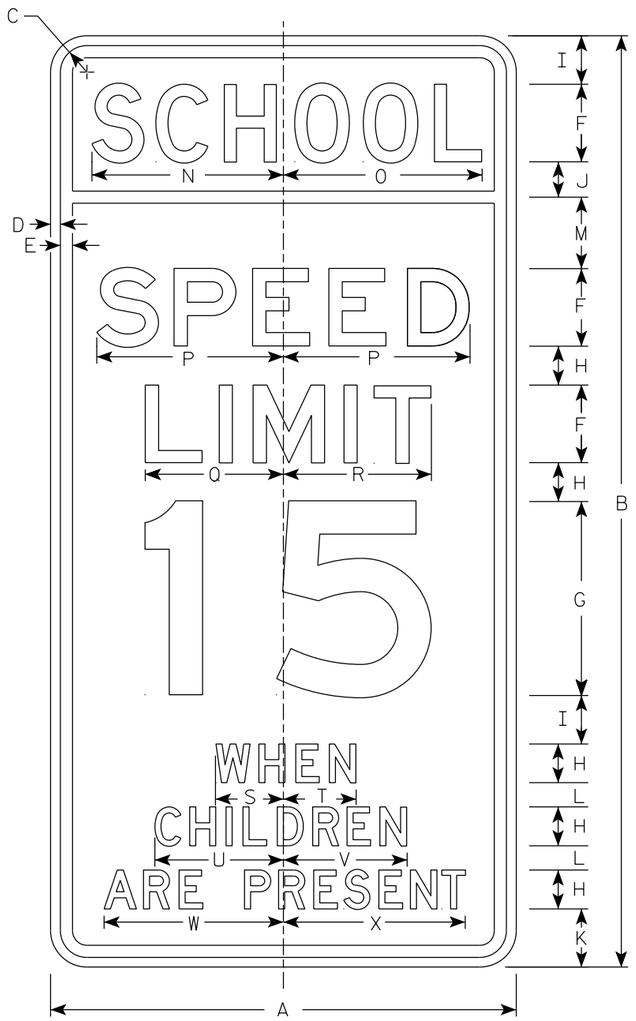
STANDARD SIGN
S1-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 6/30/05 PLATE NO. S1-1.8

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 241	E



S4-51

NOTES

1. Sign is Type II - See Note 2 for Sheeting Type
2. Color:
   Background - See Note 4
   Message - Black
3. Message Series - See Note 5
4. Top panel (SCHOOL) background - Yellow Green - Type F Reflective
   Lower panel background - White - Type SH Reflective
5. From top to bottom:
   Lines 1, 5, 6 & 7 are series D
   Lines 2, 3 & 4 are series E
6. Line 4 substitute appropriate numerals and 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																											
2	24	48	1 3/8	1/2	5/8	4	10	2	2 1/2	1 3/4	3	1 1/4	3 3/4	9 7/8	10 1/4	9 5/8	7 1/8	7 5/8	3 1/2	3 3/8	6 5/8	6 3/8	9 1/4	9 3/8			8.00
3	36	72	2 1/4	3/4	1	6	15	3	3 3/4	2 3/4	4 1/2	1 7/8	5 1/2	15	15 1/4	14 1/2	11 1/4	11 1/2	5 1/2	5 3/4	10	9 3/4	14	14 1/8			18.00
4																											
5																											

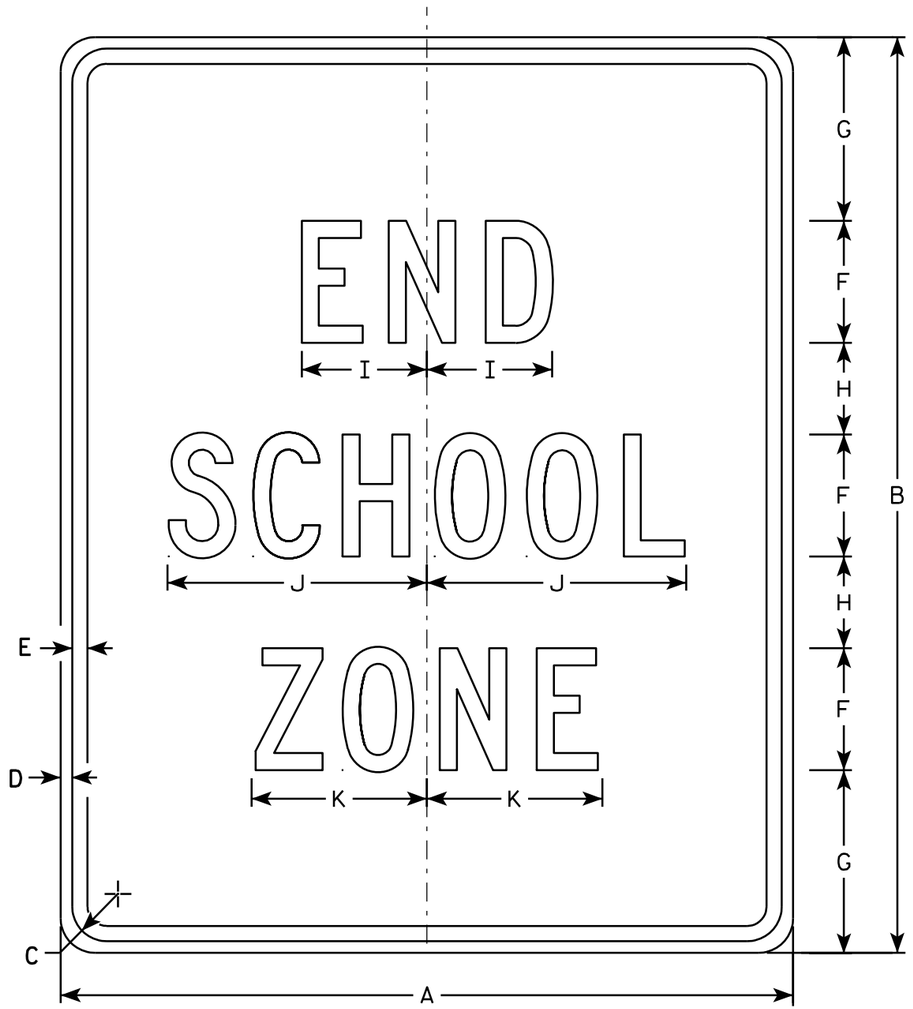
STANDARD SIGN
S4-51

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 7/27/2020 PLATE NO. S4-51.10

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 242 E



S5-2

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 - 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																											
2	24	30	1 1/8	3/8	1/2	4	6	3	4 1/8	8 1/2	5 3/4																5.0
3	36	42	1 5/8	5/8	3/4	6	7	5	6 1/8	12 5/8	8 5/8																10.5
4																											
5																											

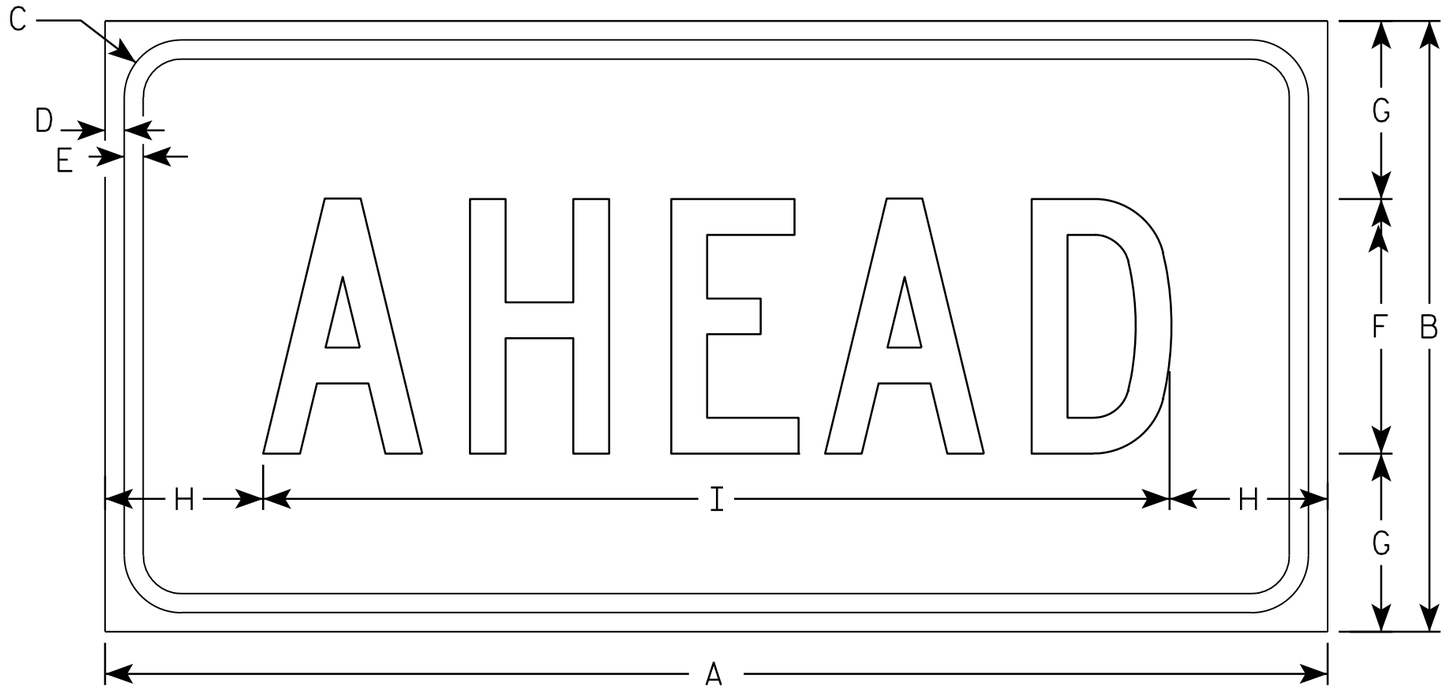
STANDARD SIGN
S5-2

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/8/11 PLATE NO. S5-2.2

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 243 | E



S16-9P

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-Green
   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	24	12	1 1/8	3/8	3/8	5	3 1/2	3 1/8	17 3/4																		2.0
2S	30	18	1 1/8	3/8	1/2	7	5 1/2	2 3/4	24 1/2																		3.75
2M	30	18	1 1/8	3/8	1/2	7	5 1/2	2 3/4	24 1/2																		3.75
3	30	18	1 1/8	3/8	1/2	7	3 1/2	2 3/4	24 1/2																		3.75
4	48	24	1 3/8	1/2	5/8	10	7	6 1/8	35 3/4																		8.0
5																											

STANDARD SIGN
S16-9P

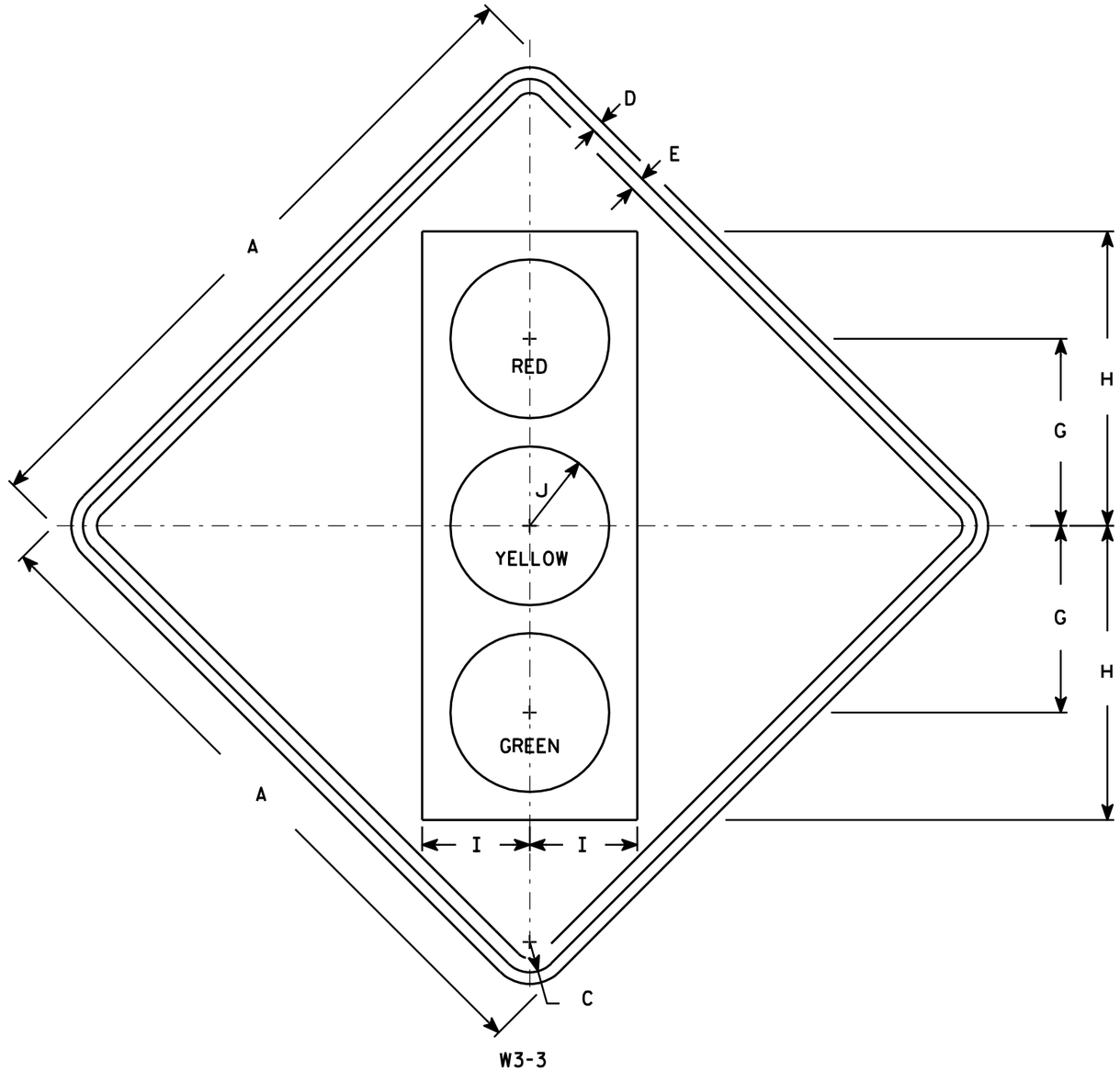
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 7/22/13 PLATE NO. S16-9P.1

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 244 | E

FILE NAME : C:\CAEFiles\Projects\tr_stdplate\S169P.dgn PLOT DATE : 22-JUL-2013 10:32 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : 2.977140:1.000000



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 - 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. Symbol and border are non-reflective black.
   Top circle - Type H Reflectorized Red
   Center circle - Same as background
   Bottom circle - Type H Reflectorized Green

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8		8 3/4	13 3/4	5	3 3/4																	6.25
2S	36		1 5/8	5/8	3/4		10	15 3/4	5 3/4	4 1/4																	9.0
2M	36		1 5/8	5/8	3/4		10	15 3/4	5 3/4	4 1/4																	9.0
3	36		1 5/8	5/8	3/4		10	15 3/4	5 3/4	4 1/4																	9.0
4	48		2 1/4	3/4	1		12 1/2	20	7 1/2	5																	16.0
5	48		2 1/4	3/4	1		12 1/2	20	7 1/2	5																	16.0

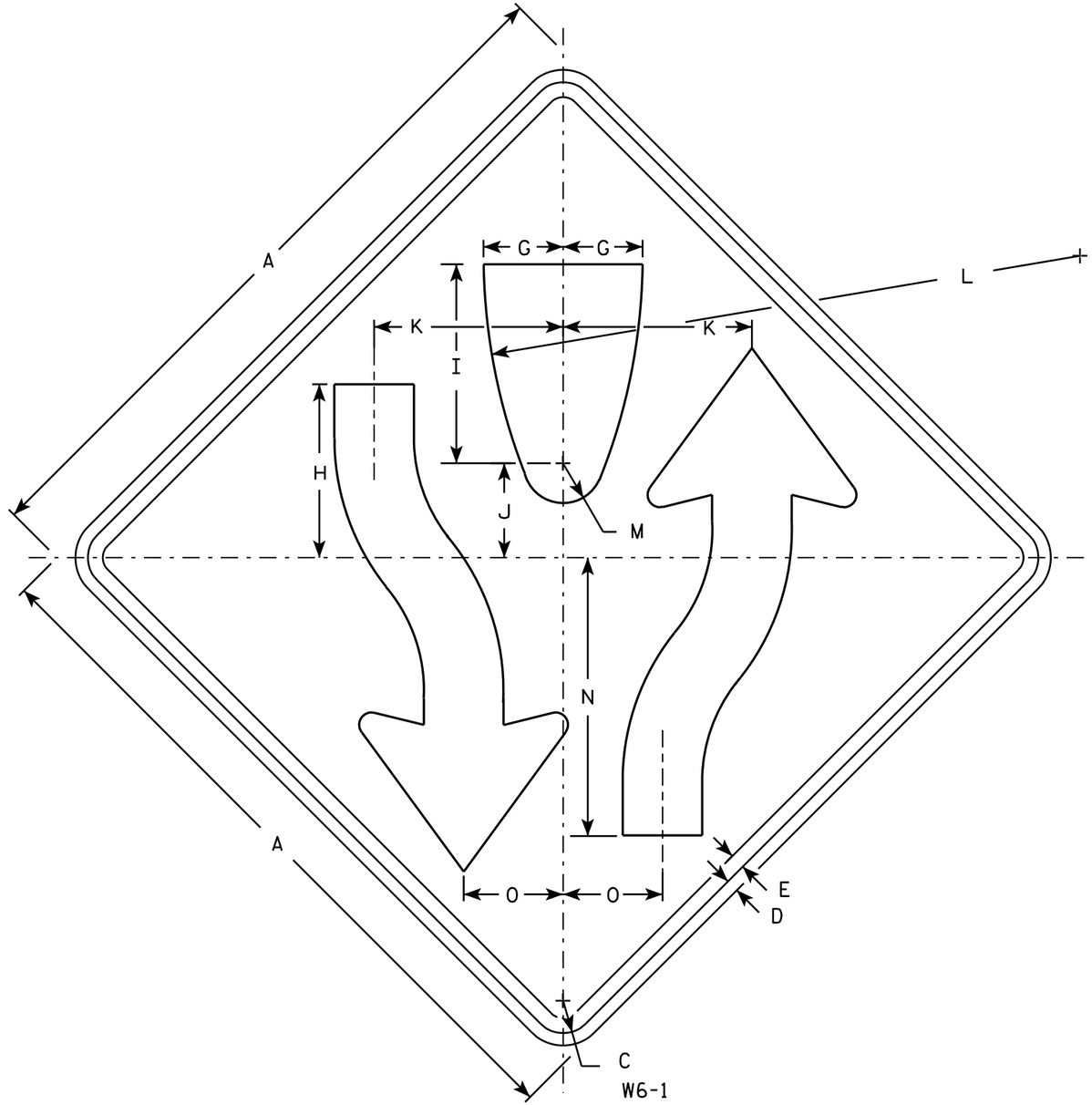
STANDARD SIGN
W3-3

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch for State Traffic Engineer

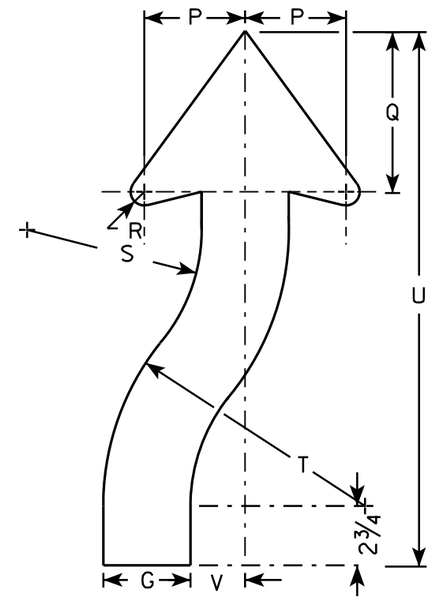
DATE 6/7/10 PLATE NO. W3-3.11

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 245 | E



NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Yellow
   Message - Black
3. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
4. W6-2 same as W6-1 but is rotated 180° when mounted.



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8		3 1/4	8	8 1/4	4 1/8	7 7/8	25	1 3/4	11 5/8	4 1/8	3 7/8	6 3/4	5/8	6 5/8	9 7/8	21 5/8	2					6.25
2S	36		1 5/8	5/8	3/4		4	8 3/4	10	4 3/4	9 1/2	30	2	14	5	4 5/8	7 3/8	7/8	8	12	24 1/2	2 1/2					9.0
2M	36		1 5/8	5/8	3/4		4	8 3/4	10	4 3/4	9 1/2	30	2	14	5	4 5/8	7 3/8	7/8	8	12	24 1/2	2 1/2					9.0
3																											
4	48		2 1/4	3/4	1		5 3/8	11 5/8	13 3/8	6 3/8	12 5/8	40	2 5/8	18 5/8	6 5/8	6 1/4	9 7/8	1 1/4	10 5/8	16	32 5/8	3 3/8					16.0
5	48		2 1/4	3/4	1		5 3/8	11 5/8	13 3/8	6 3/8	12 5/8	40	2 5/8	18 5/8	6 5/8	6 1/4	9 7/8	1 1/4	10 5/8	16	32 5/8	3 3/8					16.0

STANDARD SIGN
W6-1 & W6-2

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

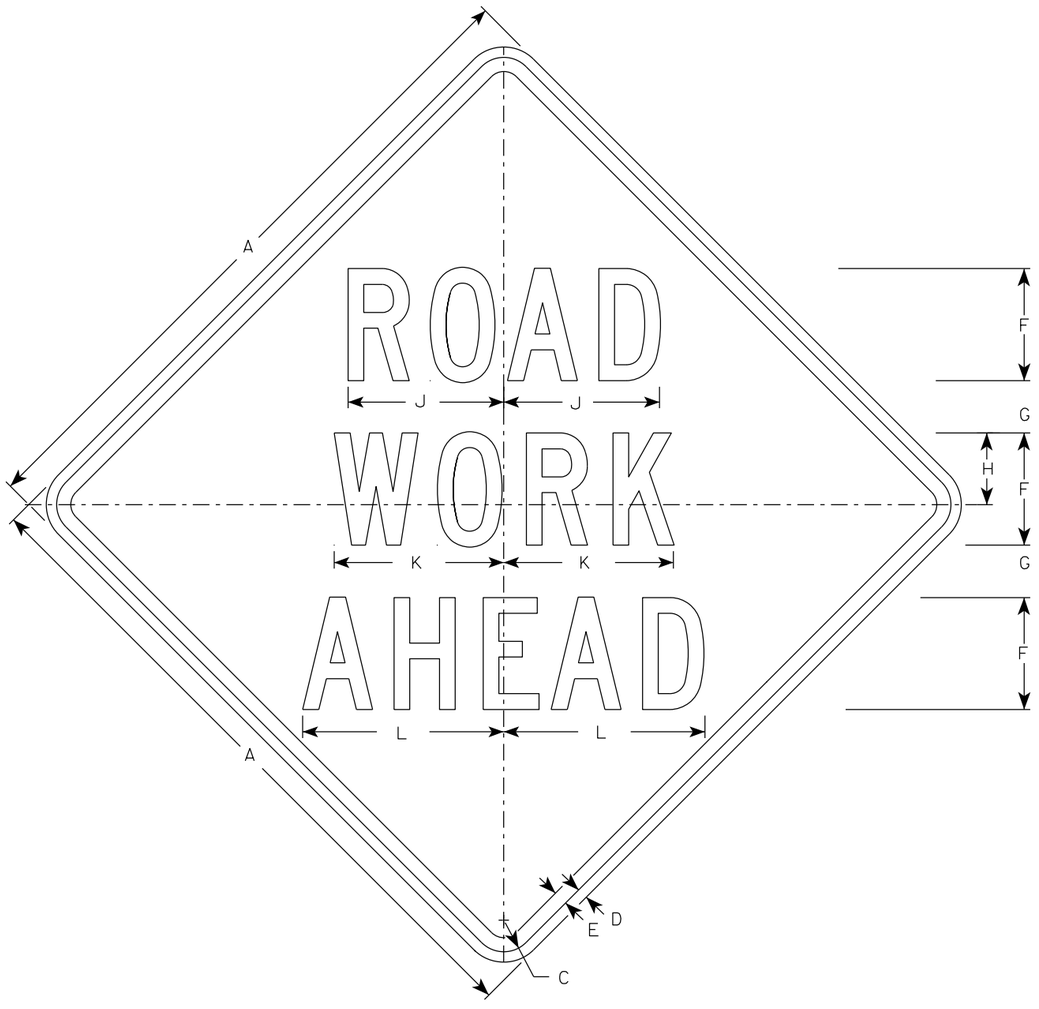
DATE 03/12/13 PLATE NO. W6-1.14

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 246	E

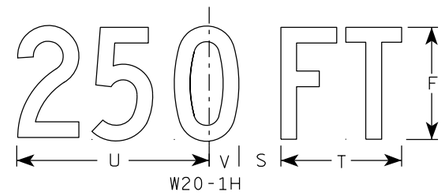
FILE NAME : C:\CAEFiles\Projects\tr_stdplate\W61.DGN PLOT DATE : 12-MAR-2013 14:02 PLOT BY : mscsja PLOT NAME : PLOT SCALE : 6.946657:1.000000
WISDOT/CADDS SHEET 42

NOTES

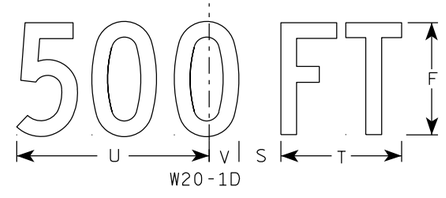
1. Sign is Type II - Type F Reflective
2. Color:
   Background - Orange
   Message - Black
3. Message Series - C
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.



W20-1A



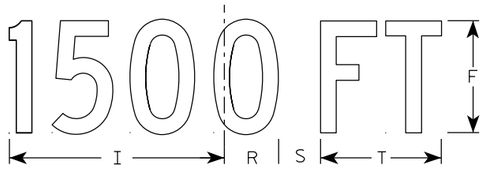
W20-1H



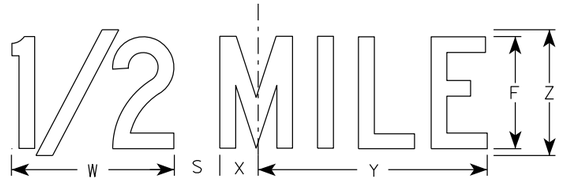
W20-1D



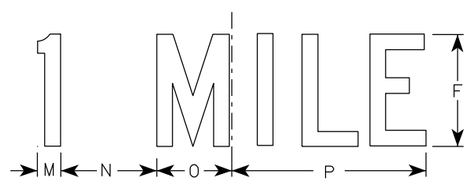
W20-1C



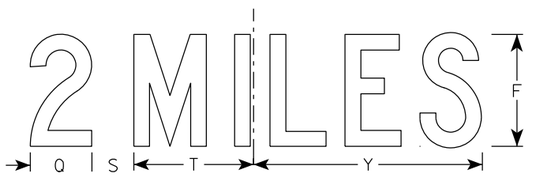
W20-1B



W20-1G



W20-1F



W20-1E

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36		1 5/8	5/8	3/4	5	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	3 1/4	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, E, F, G & H

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/25/2020 PLATE NO. W20-1.11

PROJECT NO:

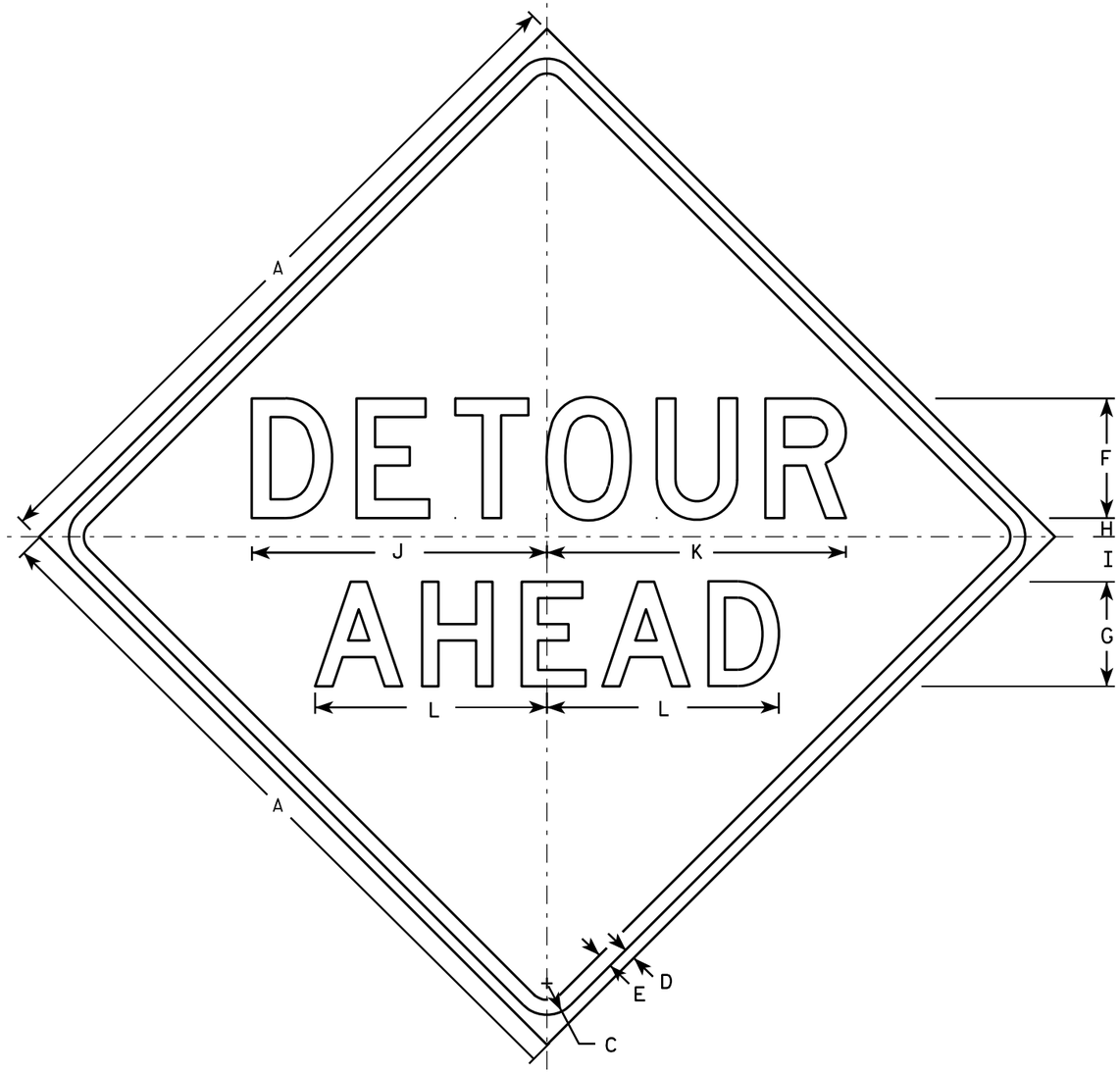
SHEET NO: E

FILE NAME : C:\CAEfiles\Projects\tr_stdplate\W201.DGN PLOT DATE : 25-MARCH-2020 PLOT BY : dotc4c

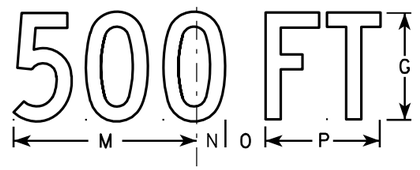
WISDOT/CADDS SHEET 42

7

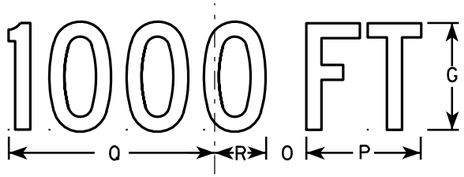
7



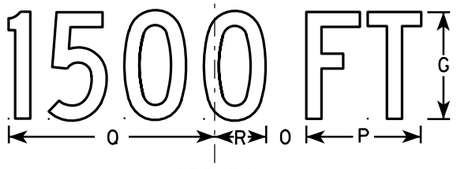
W20-2A



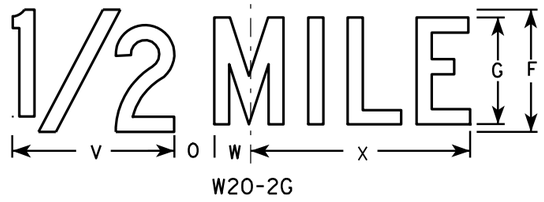
W20-2D



W20-2C



W20-2B



W20-2G



W20-2F

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - See note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Line 1 is Series D.
   Line 2 is Series D for AHEAD and Series C for all other distances.

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	O	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36		1 5/8	5/8	3/4	6	5	1	2 1/4	14 3/4	15	11 5/8	9	1 3/8	1 7/8	5 5/8	10 1/8	2 1/2	1 1/8	4 1/2	3 1/2	8	1 3/4	10 3/4			9.0
2S	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
2M	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
3	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
4	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0
5	48		2 1/4	3/4	1	8	7	1 1/4	3	19 3/4	20	15 1/2	12	1 7/8	2 5/8	7 1/2	13 1/2	3 3/8	1 1/2	6	4 5/8	10 5/8	2 3/8	14 3/8			16.0

STANDARD SIGN
W20-2A,B,C,D,F & G

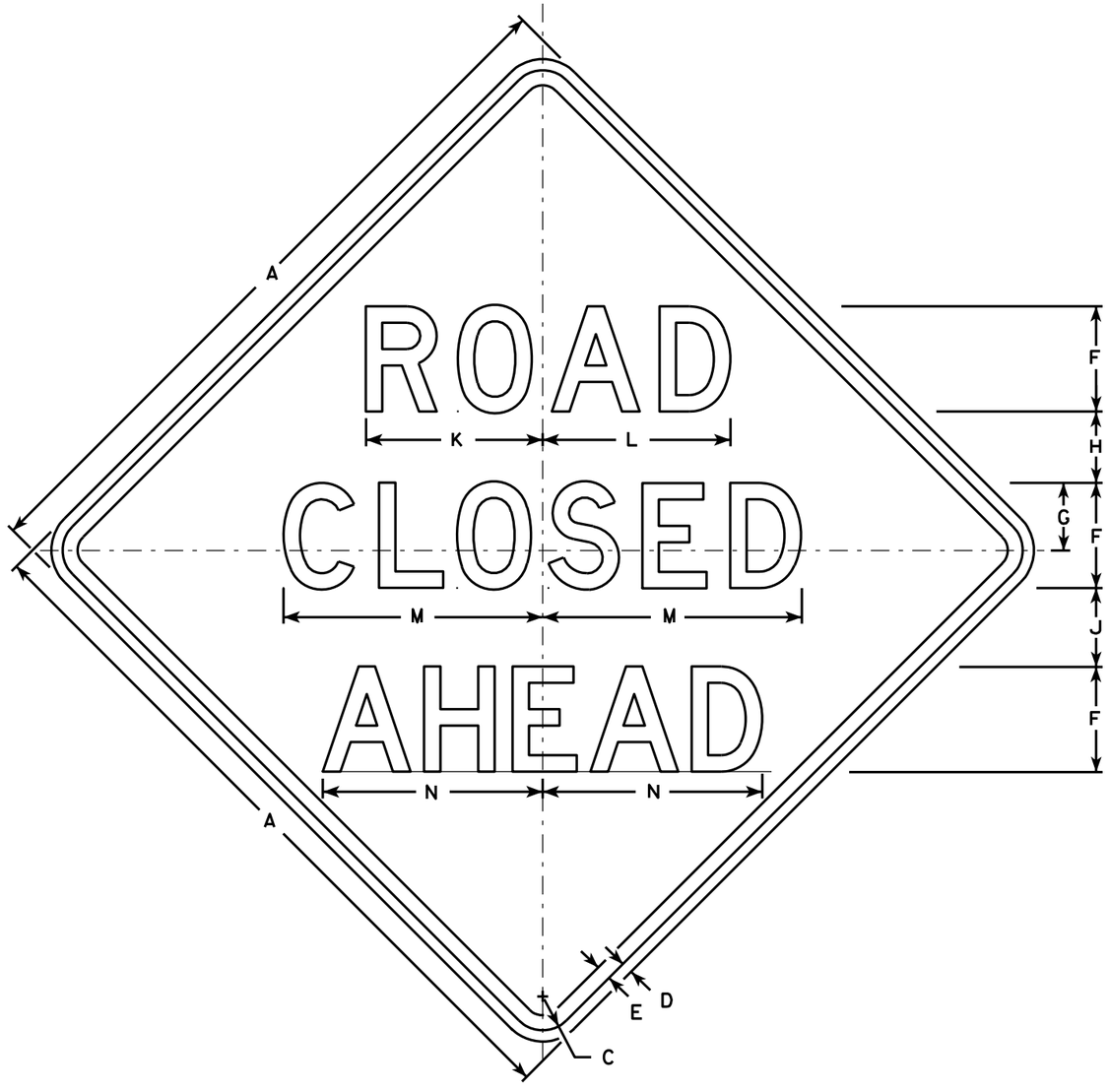
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

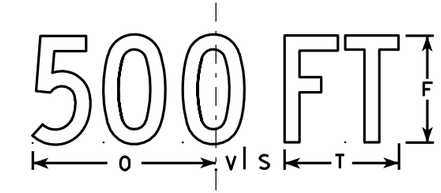
DATE 3/18/11 PLATE NO. W20-2.6

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 248 | E

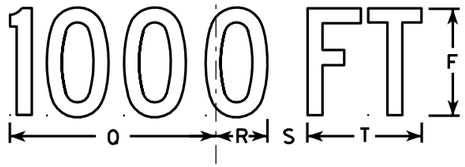
FILE NAME : C:\Users\PROJECTS\tr_stdplate\W202.DGN PLOT DATE : 18-MAR-2011 10:00 PLOT BY : mscj9h PLOT NAME : PLOT SCALE : 9.931739:1.000000
WISDOT/CADDS SHEET 42



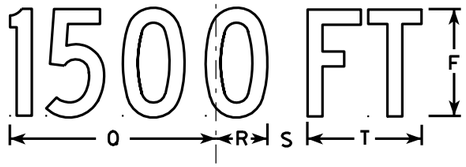
W20-3A



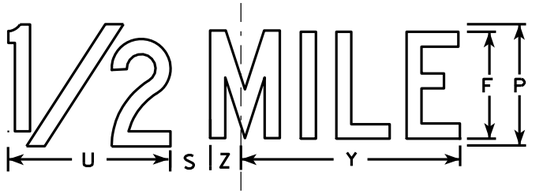
W20-3D



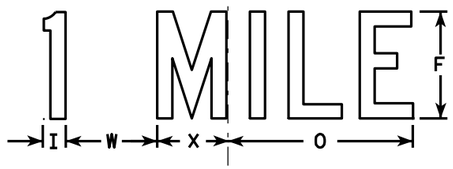
W20-3C



W20-3B



W20-3G



W20-3F

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - Orange
   Message - Black
3. Message Series - see note 5
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Lines 1 and 2 are Series D.
   Line 3 is Series D for AHEAD and Series C for all other distances.

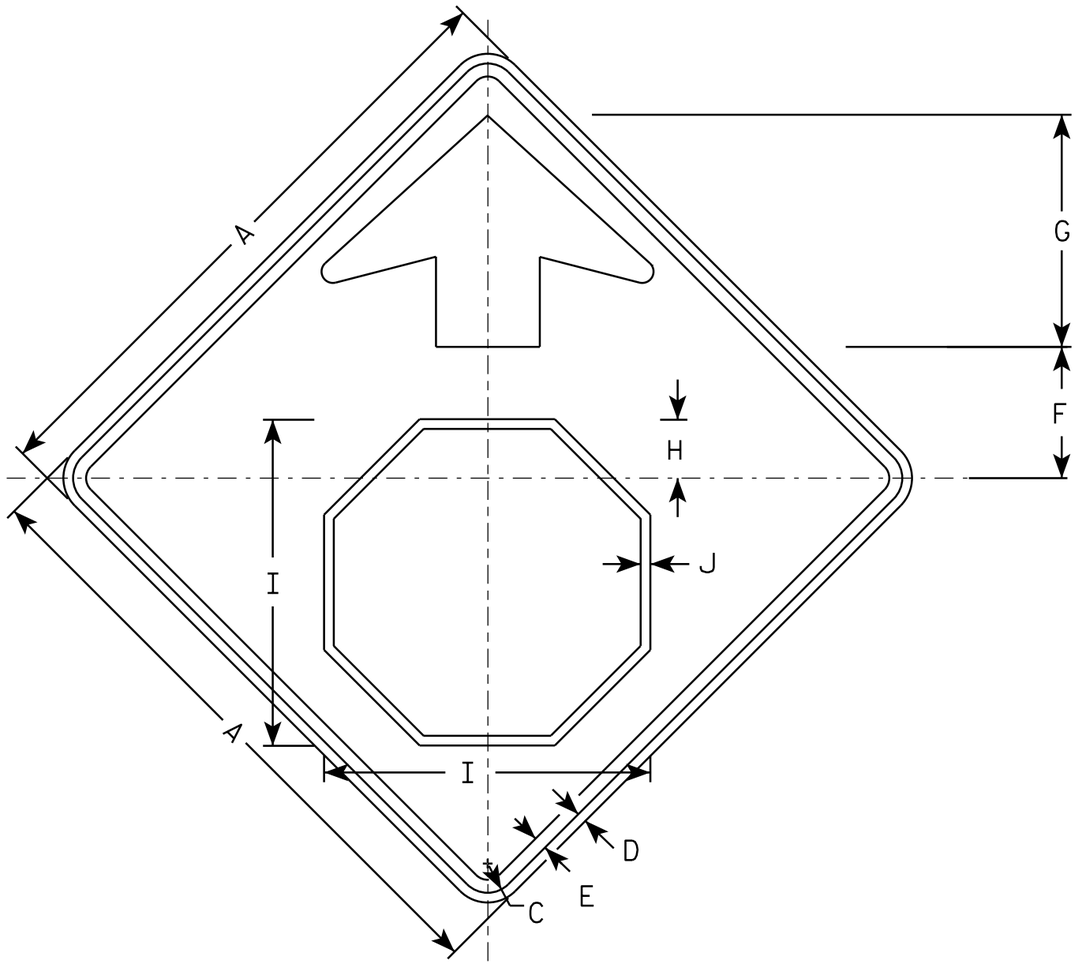
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	36		1 5/8	5/8	3/4	5	3 3/8	3 1/2	1 1/8	4	8 3/8	8 7/8	12 1/2	11	9	6	10 1/8	2 1/2	1 7/8	5 5/8	8	1 3/8	4 1/2	3 1/2	10 3/4	1 3/4	9.0
2S	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
2M	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
3	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
4	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0
5	48		2 1/4	3/4	1	7	4 1/2	4 3/4	1 1/2	5 1/4	11 3/4	12 1/2	17 1/4	14 5/8	12	8	13 1/2	3 3/8	2 5/8	7 1/2	10 5/8	1 7/8	6	4 5/8	14 3/8	2 3/8	16.0

STANDARD SIGN
W20-3A, B, C, D, F & G

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer
DATE 3/18/11 PLATE NO. W20-3.7

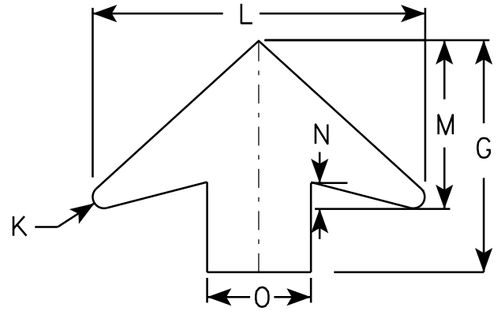
PROJECT NO: | HWY: | COUNTY: | SHEET NO: 249 | E



W03-1

NOTES

1. All Signs Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - ORANGE
   Arrow & Border - BLACK
   Stop Symbol - WHITE BORDER ON RED BACKGROUND



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	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
2S	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
2M	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
3	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
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
W03-1

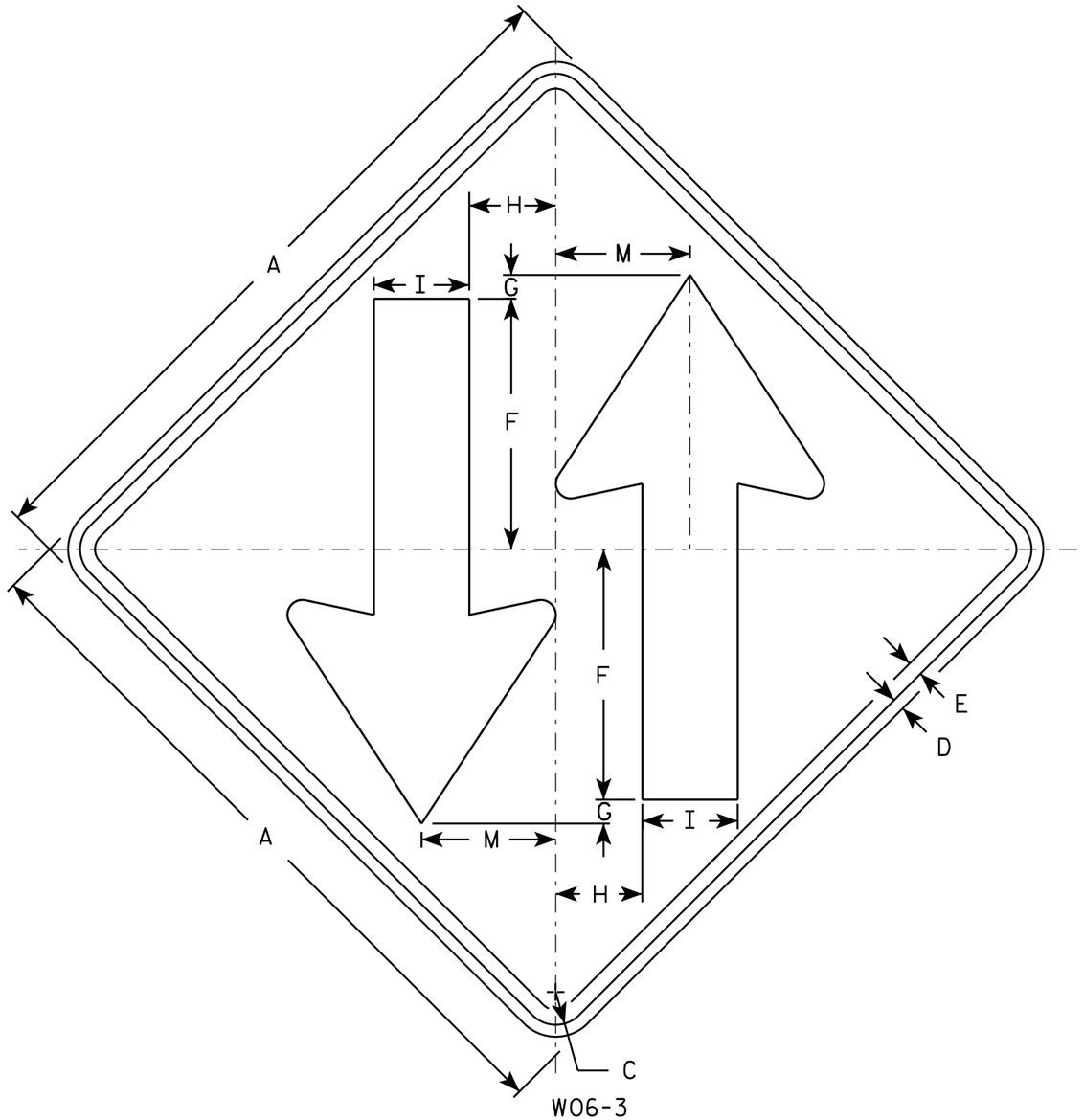
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/20/13 PLATE 250 03-1.1

PROJECT NO: | SHEET NO: E

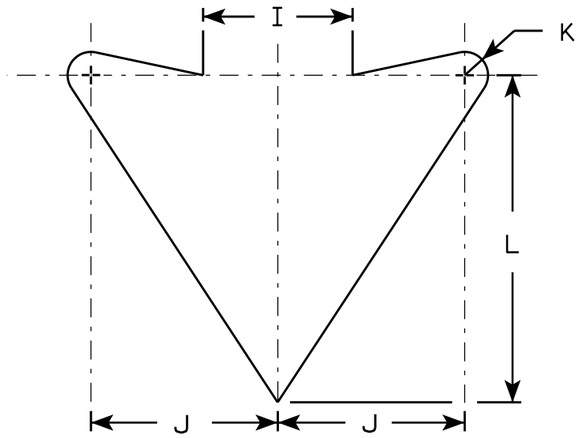
7 7



W06-3

NOTES

1. Sign is Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:
   Background - 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.



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	36		1 5/8	5/8	3/4	12	1	4 1/4	5	6	3/4	10 1/2	6 3/4														9.0
2S	48		2 1/4	3/4	1	15 1/2	1	6	6	8	1	14	9														16.0
2M	48		2 1/4	3/4	1	15 1/2	1	6	6	8	1	14	9														16.0
3	48		2 1/4	3/4	1	15 1/2	1	6	6	8	1	14	9														16.0
4	48		2 1/4	3/4	1	15 1/2	1	6	6	8	1	14	9														16.0
5	48		2 1/4	3/4	1	15 1/2	1	6	6	8	1	14	9														16.0

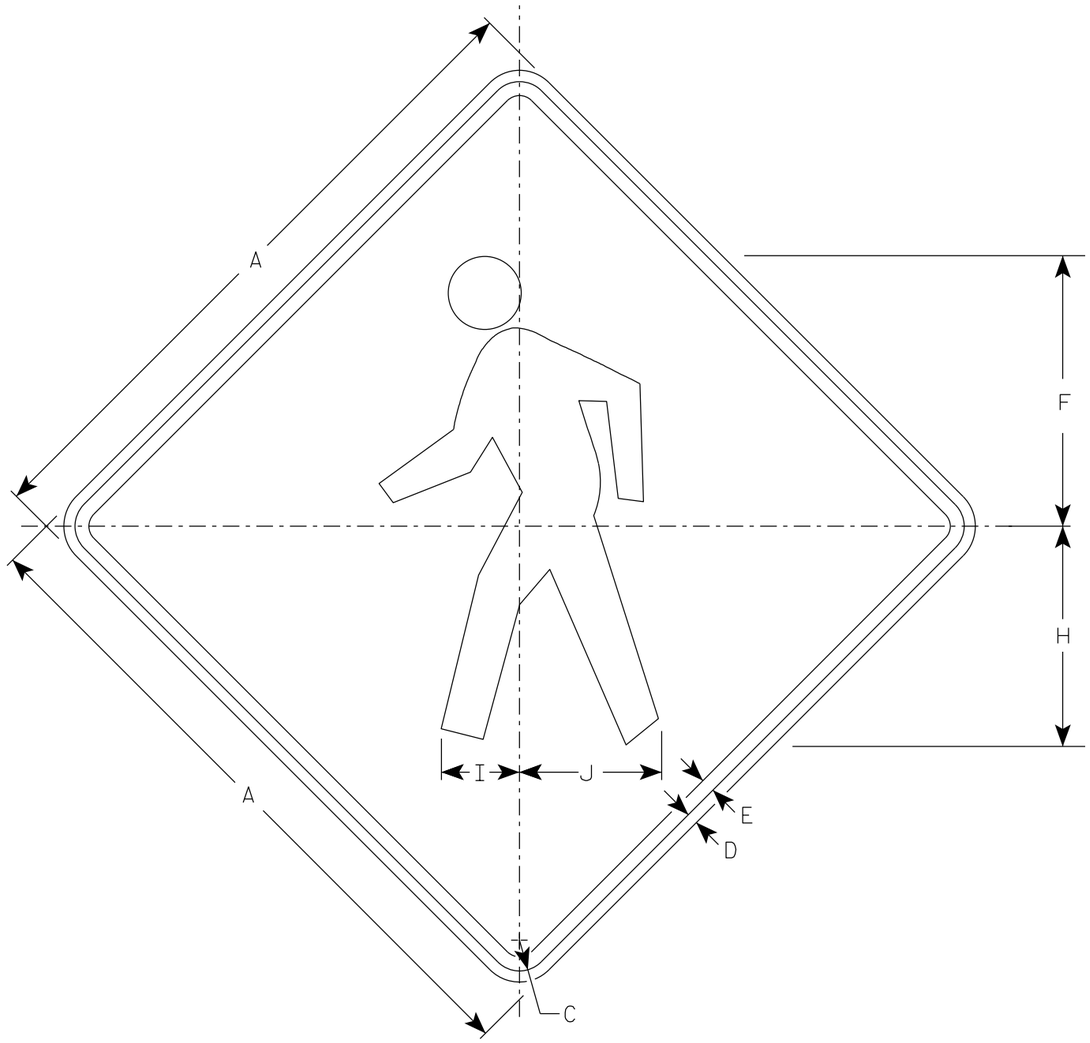
STANDARD SIGN
W06-3

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 11/20/13 PLATE 251 W06-3.1

PROJECT NO:	HWY:	COUNTY:		SHEET NO:	E



WO11-2

NOTES

1. Sign is Type II - Type F Reflective
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.

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	14 1/2		11 7/8	4 1/4	7 5/8																	9.0
2S	48		2 1/4	3/4	1	19 3/8		15 3/4	5 5/8	10 1/4																	16.0
2M	48		2 1/4	3/4	1	19 3/8		15 3/4	5 5/8	10 1/4																	16.0
3	48		2 1/4	3/4	1	19 3/8		15 3/4	5 5/8	10 1/4																	16.0
4	48		2 1/4	3/4	1	19 3/8		15 3/4	5 5/8	10 1/4																	16.0
5																											

STANDARD SIGN

WO11-2

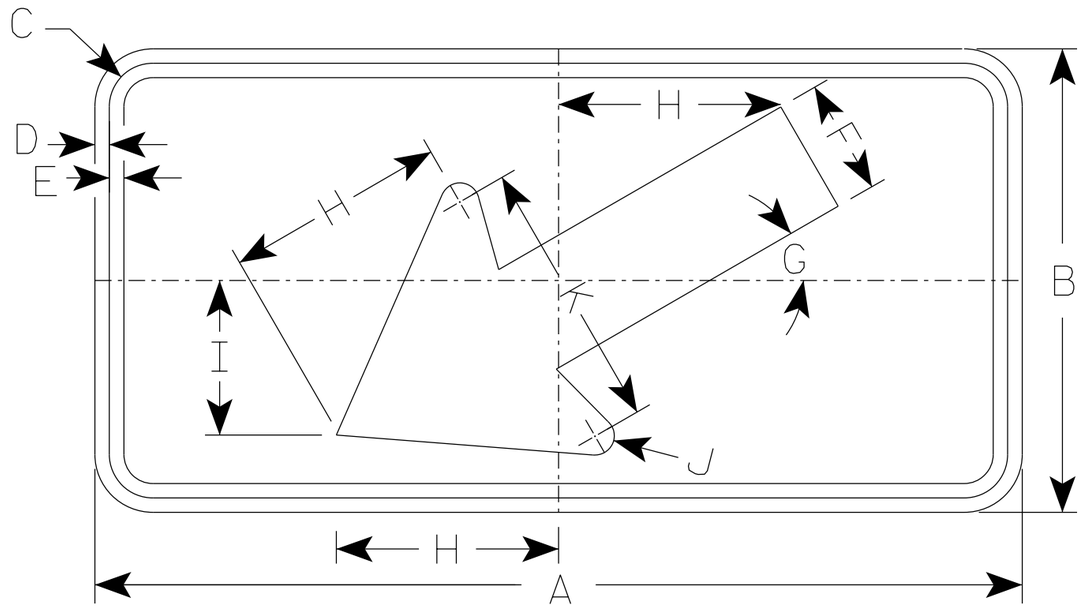
WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch

for State Traffic Engineer

DATE 4/8/2020 PLATE NO. WO11-2.1

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 252	E



W016-7L

NOTES

1. Sign is Type II - Type F Reflective
2. Color:
   Background - Orange
   Message - Black
3. Corners may be square or rounded but corners shall be rounded when base material is metal.
4. W016-7R is the same as W016-L 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	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30	18	1 1/8	3/8	1/2	4 1/2	30°	8 1/2	6	5/8	10 1/4																3.75
2S	48	24	1 3/8	1/2	5/8	6	30°	11 1/2	8	1	14																8.0
2M	48	24	1 3/8	1/2	5/8	6	30°	11 1/2	8	1	14																8.0
3	48	24	1 3/8	1/2	5/8	6	30°	11 1/2	8	1	14																8.0
4	48	24	1 3/8	1/2	5/8	6	30°	11 1/2	8	1	14																8.0
5	48	24	1 3/8	1/2	5/8	6	30°	11 1/2	8	1	14																8.0

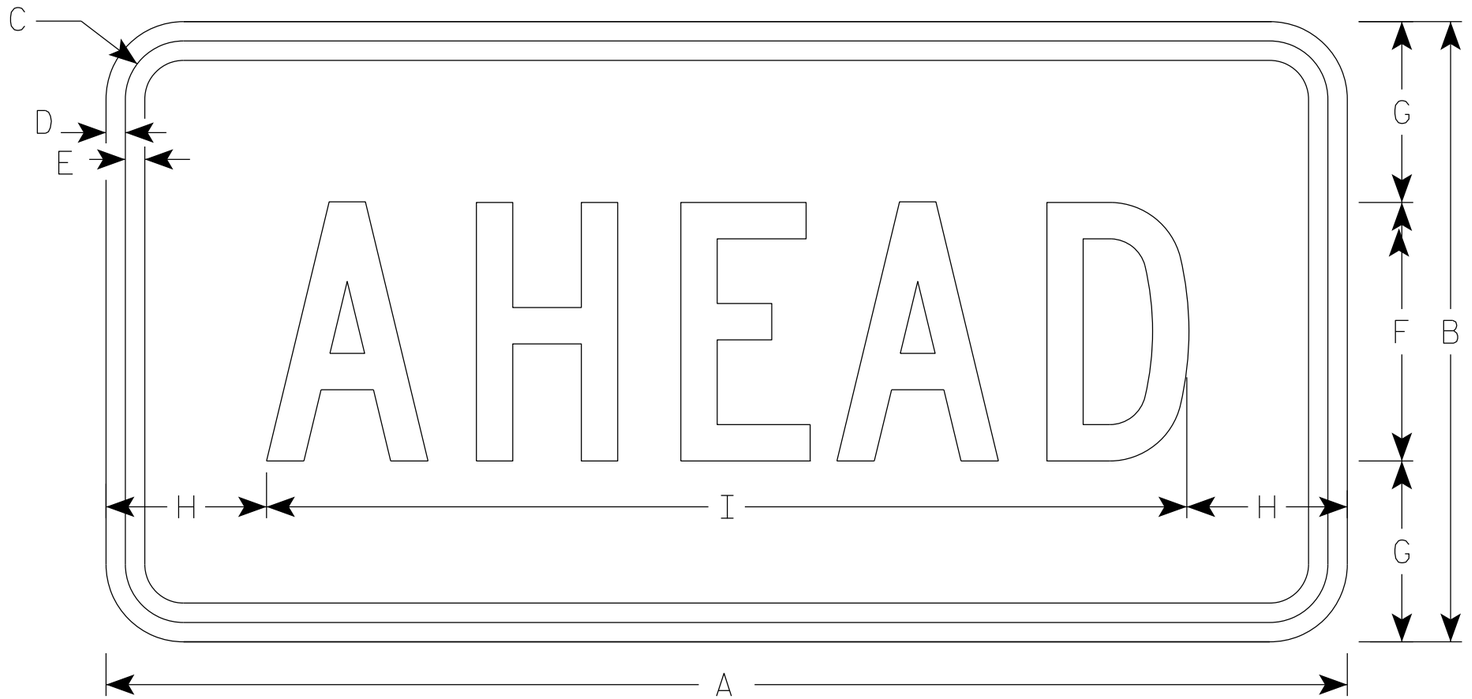
STANDARD SIGN
W016-7

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 3/16/2021 PLATE NO. W016-7.2

PROJECT NO:	HWY:	COUNTY:		SHEET NO: 253	E



W016-9P

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.

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 1/8	3/8	1/2	7	5 1/2	2 3/4	24 1/2																		3.75
2S	48	24	1 3/8	1/2	5/8	10	7	6 1/8	35 3/4																		8.0
2M	48	24	1 3/8	1/2	5/8	10	7	6 1/8	35 3/4																		8.0
3	48	24	1 3/8	1/2	5/8	10	7	6 1/8	35 3/4																		8.0
4	48	24	1 3/8	1/2	5/8	10	7	6 1/8	35 3/4																		8.0
5	48	24	1 3/8	1/2	5/8	10	7	6 1/8	35 3/4																		8.0

STANDARD SIGN
W016-9P

WISCONSIN DEPT OF TRANSPORTATION

APPROVED Matthew R Rauch
for State Traffic Engineer

DATE 5/1/19 PLATE NO. W016-9P.7

PROJECT NO: | HWY: | COUNTY: | SHEET NO: 254 | E

STAGE 1

DIVISION 1 - S. 13TH

STATION	REAL STATION	DISTANCE	AREA (SF)						INCREMENTAL VOL (CY) (UNADJUSTED)						CUMULATIVE VOL (CY)							
			CUT	SALVAGED/UNUSABLE PAVEMENT MATERIAL	FILL	MARSH EXC	ROCK EXC	EBS	CUT	SALVAGED/UNUSABLE PAVEMENT MATERIAL	FILL	MARSH EXC	ROCK EXC	EBS	CUT	EXPANDED FILL	EXPANDED MARSH BACKFILL	EXPANDED ROCK	EXPANDED EBS BACKFILL	REDUCED MARSH IN FILL	REDUCED EBS IN FILL	MASS ORDINATE
															1.00	1.00	1.00	1.00	1.00	1.00	1.00	
									NOTE 1	NOTE 2	NOTE 3				NOTE 1		NOTE 4		NOTE 5	NOTE 6	NOTE 7	NOTE 8
29+50	2950.00	50.00	69.40	34.00	43.02	0.00	0.00	0.00	146	61	69	0	0	0	8,383	438	0	0	0	0	0	5,955
30+00	3000.00	50.00	117.83	58.50	11.34	0.00	0.00	0.00	173	86	50	0	0	0	8,556	488	0	0	0	0	0	5,992
30+50	3050.00	50.00	62.10	35.00	14.48	0.00	0.00	0.00	167	87	24	0	0	0	8,723	512	0	0	0	0	0	6,048
31+00	3100.00	50.00	80.66	35.00	17.35	0.00	0.00	0.00	132	65	29	0	0	0	8,855	541	0	0	0	0	0	6,086
31+50	3150.00	50.00	103.18	35.00	5.92	0.00	0.00	0.00	170	65	22	0	0	0	9,025	563	0	0	0	0	0	6,169
32+00	3200.00	50.00	103.25	35.00	0.63	0.00	0.00	120.00	191	65	6	0	0	111	9,216	458	0	0	111	0	111	6,400
32+50	3250.00	50.00	134.91	46.00	0.00	0.00	0.00	174.00	221	75	1	0	0	272	9,437	187	0	0	383	0	383	6,817
33+00	3300.00	50.00	90.01	35.50	5.71	0.00	0.00	120.00	208	75	5	0	0	272	9,645	-80	0	0	655	0	655	7,217
33+50	3350.00	50.00	88.82	33.00	2.29	0.00	0.00	108.00	166	63	7	0	0	211	9,811	-284	0	0	866	0	866	7,524
34+00	3400.00	50.00	68.42	30.00	52.54	0.00	0.00	94.00	146	58	51	0	0	187	9,957	-420	0	0	1,053	0	1,053	7,748
34+50	3450.00	50.00	62.32	25.50	51.62	0.00	0.00	90.00	121	51	96	0	0	170	10,078	-494	0	0	1,223	0	1,223	7,892
35+00	3500.00	50.00	78.47	23.50	44.39	0.00	0.00	86.00	130	45	89	0	0	163	10,208	-568	0	0	1,386	0	1,386	8,051
35+50	3550.00	50.00	46.44	23.50	115.59	0.00	0.00	84.00	116	44	148	0	0	157	10,324	-577	0	0	1,543	0	1,543	8,132
35+75	3575.00	25.00	45.42	27.00	126.93	0.00	0.00	90.00	43	23	112	0	0	81	10,367	-546	0	0	1,624	0	1,624	8,121
35+87.5	3587.50	12.50	43.03	27.50	121.75	0.00	0.00	90.00	20	13	58	0	0	42	10,387	-530	0	0	1,666	0	1,666	8,112
36+00	3600.00	12.50	52.07	28.00	147.62	0.00	0.00	90.00	22	13	62	0	0	42	10,409	-510	0	0	1,708	0	1,708	8,101
36+50	3650.00	50.00	58.37	32.50	58.75	0.00	0.00	0.00	102	56	191	0	0	83	10,511	-402	0	0	1,791	0	1,791	8,039
37+00	3700.00	50.00	60.14	24.50	30.34	0.00	0.00	0.00	110	53	82	0	0	0	10,621	-320	0	0	1,791	0	1,791	8,014
37+50	3750.00	50.00	85.33	24.00	9.82	0.00	0.00	0.00	135	45	37	0	0	0	10,756	-283	0	0	1,791	0	1,791	8,067
38+00	3800.00	50.00	93.67	24.00	9.91	0.00	0.00	0.00	166	44	18	0	0	0	10,922	-265	0	0	1,791	0	1,791	8,171
38+50	3850.00	50.00	97.51	24.00	7.26	0.00	0.00	0.00	177	44	16	0	0	0	11,099	-249	0	0	1,791	0	1,791	8,288
39+00	3900.00	50.00	74.65	24.00	14.87	0.00	0.00	0.00	159	44	20	0	0	0	11,258	-229	0	0	1,791	0	1,791	8,383
39+50	3950.00	50.00	98.18	24.00	2.39	0.00	0.00	0.00	160	44	16	0	0	0	11,418	-213	0	0	1,791	0	1,791	8,483
40+00	4000.00	50.00	109.20	24.00	3.48	0.00	0.00	0.00	192	44	5	0	0	0	11,610	-208	0	0	1,791	0	1,791	8,626
40+50	4050.00	50.00	93.05	24.00	10.61	0.00	0.00	0.00	187	44	13	0	0	0	11,797	-195	0	0	1,791	0	1,791	8,756
41+00	4100.00	50.00	85.18	24.00	4.15	0.00	0.00	0.00	165	44	14	0	0	0	11,962	-181	0	0	1,791	0	1,791	8,863
41+50	4150.00	50.00	98.15	24.00	4.48	0.00	0.00	0.00	170	44	8	0	0	0	12,132	-173	0	0	1,791	0	1,791	8,981
42+00	4200.00	50.00	80.12	24.00	6.61	0.00	0.00	0.00	165	44	10	0	0	0	12,297	-163	0	0	1,791	0	1,791	9,092
42+50	4250.00	50.00	87.36	24.00	6.82	0.00	0.00	0.00	155	44	12	0	0	0	12,452	-151	0	0	1,791	0	1,791	9,191
43+00	4300.00	50.00	107.92	24.00	0.00	0.00	0.00	0.00	181	44	6	0	0	0	12,633	-145	0	0	1,791	0	1,791	9,322
43+50	4350.00	50.00	77.07	24.00	1.28	0.00	0.00	0.00	171	44	1	0	0	0	12,804	-144	0	0	1,791	0	1,791	9,448
44+00	4400.00	50.00	73.42	24.00	4.11	0.00	0.00	0.00	139	44	5	0	0	0	12,943	-139	0	0	1,791	0	1,791	9,538
44+50	4450.00	50.00	88.32	24.00	0.13	0.00	0.00	0.00	150	44	4	0	0	0	13,093	-135	0	0	1,791	0	1,791	9,640
45+00	4500.00	50.00	62.37	24.00	10.57	0.00	0.00	0.00	140	44	10	0	0	0	13,233	-125	0	0	1,791	0	1,791	9,726
45+50	4550.00	50.00	51.19	24.00	9.26	0.00	0.00	0.00	105	44	18	0	0	0	13,338	-107	0	0	1,791	0	1,791	9,769
46+00	4600.00	50.00	54.60	24.00	10.31	0.00	0.00	0.00	98	44	18	0	0	0	13,436	-89	0	0	1,791	0	1,791	9,805
46+50	4650.00	50.00	102.94	49.00	0.39	0.00	0.00	0.00	146	68	10	0	0	0	13,582	-79	0	0	1,791	0	1,791	9,873
47+00	4700.00	50.00	52.26	23.50	14.05	0.00	0.00	0.00	144	67	13	0	0	0	13,726	-66	0	0	1,791	0	1,791	9,937
47+50	4750.00	50.00	63.96	23.50	14.32	0.00	0.00	0.00	108	44	26	0	0	0	13,834	-40	0	0	1,791	0	1,791	9,975
48+00	4800.00	50.00	48.82	23.50	25.91	0.00	0.00	76.00	104	44	37	0	0	70	13,938	-73	0	0	1,861	0	1,861	10,068
48+50	4850.00	50.00	62.68	23.50	22.98	0.00	0.00	76.00	103	44	45	0	0	141	14,041	-169	0	0	2,002	0	2,002	10,223
49+00	4900.00	50.00	67.02	23.50	28.29	0.00	0.00	76.00	120	44	47	0	0	141	14,161	-263	0	0	2,143	0	2,143	10,393
49+50	4950.00	50.00	47.89	23.50	56.24	0.00	0.00	76.00	106	44	78	0	0	141	14,267	-326	0	0	2,284	0	2,284	10,518
50+00	5000.00	50.00	49.03	23.50	166.00	0.00	0.00	76.00	90	44	206	0	0	141	14,357	-261	0	0	2,425	0	2,425	10,499
50+12.5	5012.50	12.50	41.07	23.50	304.76	0.00	0.00	76.00	21	11	109	0	0	35	14,378	-187	0	0	2,460	0	2,460	10,435
50+25	5025.00	12.50	38.07	23.50	200.43	0.00	0.00	76.00	18	11	117	0	0	35	14,396	-105	0	0	2,495	0	2,495	10,360
50+50	5050.00	25.00	39.18	23.50	97.97	0.00	0.00	76.00	36	22	138	0	0	70	14,432	-37	0	0	2,565	0	2,565	10,306
51+00	5100.00	50.00	44.60	24.50	65.27	0.00	0.00	86.00	78	44	151	0	0	150	14,510	-36	0	0	2,715	0	2,715	10,339
51+50	5150.00	50.00	68.37	34.00	0.00	0.00	0.00	116.00	105	54	60	0	0	187	14,615	-163	0	0	2,902	0	2,902	10,517
52+00	5200.00	50.00	55.80	33.00	1.86	0.00	0.00	128.00	115	62	2	0	0	226	14,730	-387	0	0	3,128	0	3,128	10,794
52+50	5250.00	50.00	54.22	24.00	29.20	0.00	0.00	0.00	102	53	29	0	0	119	14,832	-477	0	0	3,247	0	3,247	10,933
53+00	5300.00	50.00	64.09	23.50	29.29	0.00	0.00	0.00	110	44	54	0	0	0	14,942	-423	0	0	3,247	0	3,247	10,945
53+50	5350.00	50.00	72.57	23.50	22.30	0.00	0.00	0.00	127	44	48	0	0	0	15,069	-375	0	0	3,247	0	3,247	10,980
54+00	5400.00	50.00	105.76	23.50	3.25	0.00	0.00	0.00	165	44	24	0	0	0	15,234	-351	0	0	3,247	0	3,247	11,077
54+50	5450.00	50.00	66.77	23.50	15.57	0.00	0.00	0.00	160	44	17	0	0	0	15,394	-334	0	0	3,247	0	3,247	11,176
55+00	5500.00	50.00	51.05	23.50	24.06	0.00	0.00	0.00	109	44	37	0	0	0	15,503	-297	0	0	3,247	0	3,247	11,204
55+50	5550.00	50.00	47.40	27.00	20.41	0.00	0.00	0.00	91	47	41	0	0	0	15,594	-256	0	0	3,247	0	3,247	11,207
56+00	5600.00	50.00	43.31	28.50	35.09	0.00	0.00	0.00	84	51	51	0	0	0	15,678	-205	0	0	3,247	0	3,247	11,189
56+50	5650.00	50.00	44.60	28.00	17.20	0.00	0.00	0.00	81	52	48	0	0	0	15,759	-157	0	0	3,247	0	3,247	11,170
57+00	5700.00	50.00	54.19	28.50	14.48	0.00	0.00	0.00	91	52	29	0	0	0	15,850	-128	0	0	3,247	0	3,247	11,180
57+50	5750.00	50.00	53.30	29.50	11.08	0.00	0.00	0.00	100	54	24	0	0	0	15,950	-104	0	0	3,247	0	3,247	11,202
58+00	5800.00	50.00	64.12	30.50	15.91	0.00	0.00	0.00	109	56	25	0	0	0	16,059	-79	0	0	3,247	0	3,247	11,230
58+50	5850.00	50.00	53.03	31.50	13.21	0.00	0.00	0.00	108	57	27	0	0	0	16,167	-52	0	0	3,247	0	3,247	11,254
59+00	5900.00	50.00	56.43	35.00	9.91	0.00	0.00	0.00	101	62	21	0	0	0	16,268	-31	0	0	3,247	0	3,247	11,272
59+50	5950.00	50.00	86.83	35.00	6.48	0.00	0.00	0.00	133	65	15	0	0	0	16,401	-16	0	0	3,247	0	3,247	11,325
60+00	6000.00	50.00	109.75	35.50	5.07	0.00	0.00	0.00	182	65	11	0	0	0	16,583	-5	0	0	3,247	0	3,247	11,431

STAGE 1 (CONT')

DIVISION 1 - S. 13TH

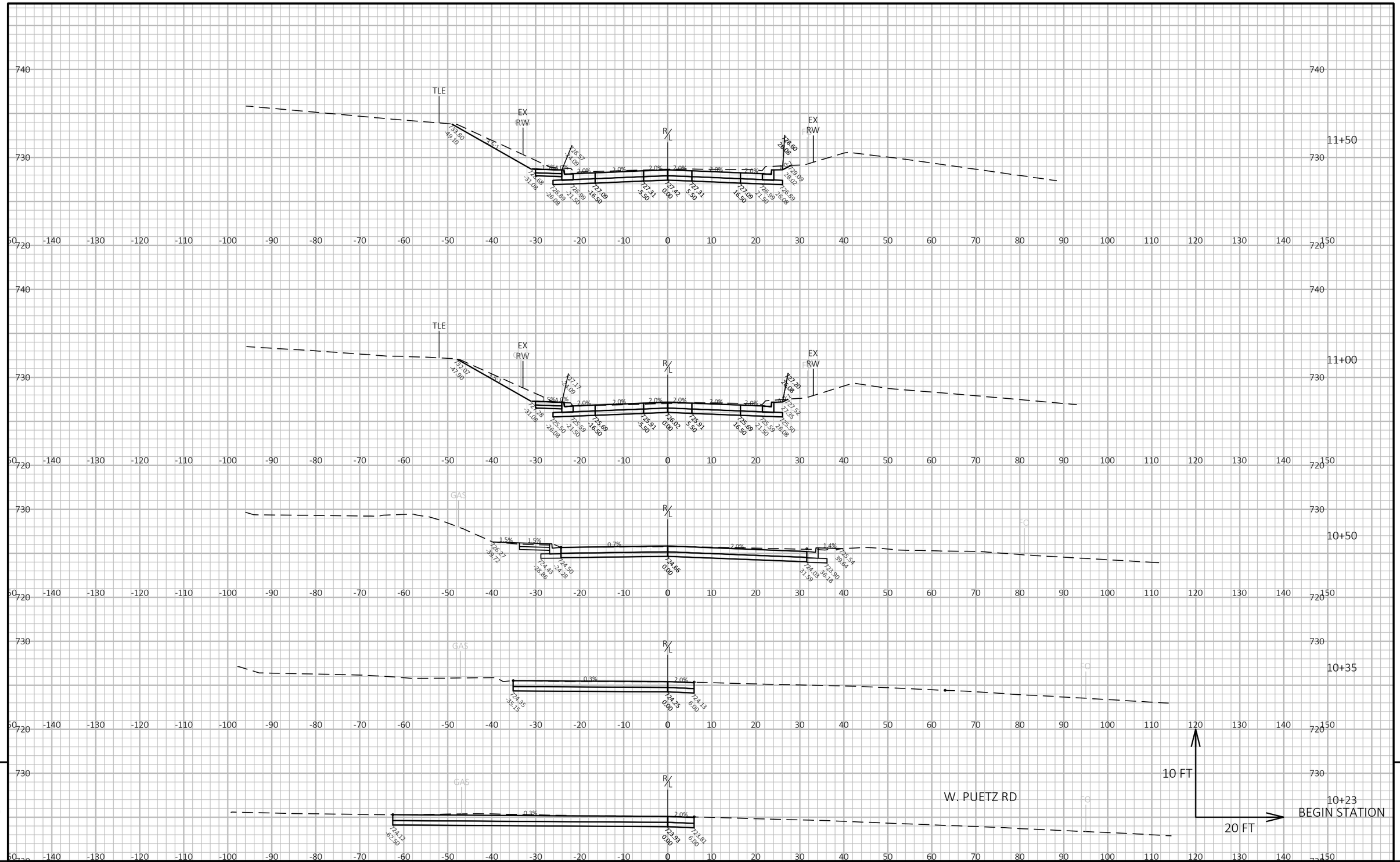
STATION	REAL STATION	DISTANCE	AREA (SF)						INCREMENTAL VOL (CY) (UNADJUSTED)						CUMULATIVE VOL (CY)							
			CUT	SALVAGED/UNUSABLE PAVEMENT MATERIAL	FILL	MARSH EXC	ROCK EXC	EBS	CUT	SALVAGED/UNUSABLE PAVEMENT MATERIAL	FILL	MARSH EXC	ROCK EXC	EBS	CUT	EXPANDED FILL	EXPANDED MARSH BACKFILL	EXPANDED ROCK	EXPANDED EBS BACKFILL	REDUCED MARSH IN FILL	REDUCED EBS IN FILL	MASS ORDINATE
															1.00	1.00	1.00	1.00	1.00	1.00	1.00	
									NOTE 1	NOTE 2	NOTE 3				NOTE 1		NOTE 4		NOTE 5	NOTE 6	NOTE 7	NOTE 8
60+50	6050.00	50.00	132.42	38.50	4.60	0.00	0.00	0.00	224	69	9	0	0	0	16,807	4	0	0	3,247	0	3,247	11,577
61+00	6100.00	50.00	88.01	41.00	7.50	0.00	0.00	0.00	204	74	11	0	0	0	17,011	15	0	0	3,247	0	3,247	11,696
61+34.462	6134.46	34.46	50.58	27.00	11.81	0.00	0.00	0.00	88	43	12	0	0	0	17,099	27	0	0	3,247	0	3,247	11,729

STAGE 2

DIVISION 1 - S. 13TH

STATION	REAL STATION	DISTANCE	AREA (SF)						INCREMENTAL VOL (CY) (UNADJUSTED)						CUMULATIVE VOL (CY)							
			CUT	SALVAGED/UNUSABLE PAVEMENT MATERIAL	FILL	MARSH EXC	ROCK EXC	EBS	CUT	SALVAGED/UNUSABLE PAVEMENT MATERIAL	FILL	MARSH EXC	ROCK EXC	EBS	CUT	EXPANDED FILL	EXPANDED MARSH BACKFILL	EXPANDED ROCK	EXPANDED EBS BACKFILL	REDUCED MARSH IN FILL	REDUCED EBS IN FILL	MASS ORDINATE
															1.00	1.00	1.00	1.00	1.00	1.00	1.00	
									NOTE 1	NOTE 2	NOTE 3				NOTE 1		NOTE 4		NOTE 5	NOTE 6	NOTE 7	NOTE 8
10+22.577	1022.58	0.00	0.00	34.00	0.00	0.00	0.00	0.00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
10+50	1050.00	27.42	70.90	29.00	0.00	0.00	0.00	0.00	36	32	0	0	0	0	36	0	0	0	0	0	0	4
11+00	1100.00	50.00	82.29	19.50	0.00	0.00	0.00	0.00	142	45	0	0	0	0	178	0	0	0	0	0	0	101
11+50	1150.00	50.00	96.10	19.50	0.00	0.00	0.00	0.00	165	36	0	0	0	0	343	0	0	0	0	0	0	230
12+00	1200.00	50.00	113.25	19.50	0.00	0.00	0.00	0.00	194	36	0	0	0	0	537	0	0	0	0	0	0	388
12+50	1250.00	50.00	114.27	19.50	4.55	0.00	0.00	0.00	211	36	4	0	0	0	748	4	0	0	0	0	0	559
13+00	1300.00	50.00	168.59	30.50	0.00	0.00	0.00	0.00	262	46	4	0	0	0	1,010	8	0	0	0	0	0	771
13+50	1350.00	50.00	117.58	28.00	7.19	0.00	0.00	0.00	265	54	7	0	0	0	1,275	15	0	0	0	0	0	975
14+00	1400.00	50.00	128.45	27.00	1.04	0.00	0.00	0.00	228	51	8	0	0	0	1,503	23	0	0	0	0	0	1,144
14+50	1450.00	50.00	120.98	26.50	0.11	0.00	0.00	0.00	231	50	1	0	0	0	1,734	24	0	0	0	0	0	1,324
15+00	1500.00	50.00	104.97	27.00	0.00	0.00	0.00	0.00	209	50	0	0	0	0	1,943	24	0	0	0	0	0	1,483
15+50	1550.00	50.00	75.19	26.50	10.94	0.00	0.00	0.00	167	50	10	0	0	0	2,110	34	0	0	0	0	0	1,590
16+00	1600.00	50.00	60.94	24.00	19.59	0.00	0.00	0.00	126	47	28	0	0	0	2,236	62	0	0	0	0	0	1,641
16+50	1650.00	50.00	63.72	24.00	14.96	0.00	0.00	0.00	115	44	32	0	0	0	2,351	94	0	0	0	0	0	1,680
17+00	1700.00	50.00	71.53	24.00	8.04	0.00	0.00	0.00	125	44	21	0	0	0	2,476	115	0	0	0	0	0	1,740
17+50	1750.00	50.00	94.47	24.00	1.41	0.00	0.00	0.00	154	44	9	0	0	0	2,630	124	0	0	0	0	0	1,841
18+00	1800.00	50.00	122.42	24.00	0.12	0.00	0.00	0.00	201	44	1	0	0	0	2,831	125	0	0	0	0	0	1,997
18+50	1850.00	50.00	133.86	24.00	0.00	0.00	0.00	0.00	237	44	0	0	0	0	3,068	125	0	0	0	0	0	2,190
19+00	1900.00	50.00	123.03	24.00	0.00	0.00	0.00	0.00	238	44	0	0	0	0	3,306	125	0	0	0	0	0	2,384
19+50	1950.00	50.00	120.88	24.50	0.08	0.00	0.00	0.00	226	45	0	0	0	0	3,532	125	0	0	0	0	0	2,565
20+00	2000.00	50.00	122.34	27.00	0.72	0.00	0.00	0.00	225	48	1	0	0	0	3,757	126	0	0	0	0	0	2,741
20+50	2050.00	50.00	121.42	30.50	2.35	0.00	0.00	0.00	226	53	3	0	0	0	3,983	129	0	0	0	0	0	2,911
21+00	2100.00	50.00	106.06	33.00	18.01	0.00	0.00	0.00	211	59	19	0	0	0	4,194	148	0	0	0	0	0	3,044
21+50	2150.00	50.00	117.65	39.50	7.12	0.00	0.00	0.00	207	67	23	0	0	0	4,401	171	0	0	0	0	0	3,161
22+00	2200.00	50.00	123.17	37.00	5.31	0.00	0.00	0.00	223	71	12	0	0	0	4,624	183	0	0	0	0	0	3,301
22+50	2250.00	50.00	132.07	34.00	3.51	0.00	0.00	0.00	236	66	8	0	0	0	4,860	191	0	0	0	0	0	3,463
23+00	2300.00	50.00	153.94	33.50	0.85	0.00	0.00	0.00	265	63	4	0	0	0	5,125	195	0	0	0	0	0	3,661
23+50	2350.00	50.00	142.58	30.50	0.21	0.00	0.00	0.00	275	59	1	0	0	0	5,400	196	0	0	0	0	0	3,876
24+00	2400.00	50.00	154.04	26.00	0.32	0.00	0.00	0.00	275	52	0	0	0	0	5,675	196	0	0	0	0	0	4,099
24+50	2450.00	50.00	155.41	23.50	4.32	0.00	0.00	0.00	287	46	4	0	0	0	5,962	200	0	0	0	0	0	4,336
25+00	2500.00	50.00	148.91	23.50	1.48	0.00	0.00	0.00	282	44	5	0	0	0	6,244	205	0	0	0	0	0	4,569
25+50	2550.00	50.00	155.48	23.50	3.20	0.00	0.00	0.00	282	44	4	0	0	0	6,526	209	0	0	0	0	0	4,803
26+00	2600.00	50.00	148.47	25.50	6.18	0.00	0.00	0.00	281	45	9	0	0	0	6,807	218	0	0	0	0	0	5,030
26+50	2650.00	50.00	136.07	28.00	11.46	0.00	0.00	0.00	263	50	16	0	0	0	7,070	234	0	0	0	0	0	5,227
27+00	2700.00	50.00	181.97	48.50	13.87	0.00	0.00	0.00	294	71	23	0	0	0	7,364	257	0	0	0	0	0	5,427
27+50	2750.00	50.00	116.30	33.00	1.89	0.00	0.00	0.00	276	75	15	0	0	0	7,640	272	0	0	0	0	0	5,613
28+00	2800.00	50.00	113.84	31.50	16.59	0.00	0.00	0.00	213	60	17	0	0	0	7,853	289	0	0	0	0	0	5,749
28+50	2850.00	50.00	105.94	30.00	18.99	0.00	0.00	0.00	204	57	33	0	0	0	8,057	322	0	0	0	0	0	5,863
29+00	2900.00	50.00	88.00	32.00	31.57	0.00	0.00	0.00	180	57	47	0	0	0	8,237	369	0	0	0	0	0	5,939

Notes:		
1 - CUT	CUT INCLUDES SALVAGED/UNUSABLE PAVEMENT MATERIAL	
2 - SALVAGED/UNUSABLE PAVEMENT MATERIAL	THIS DOES NOT SHOW UP IN CROSS SECTIONS	
3 - FILL	DOES NOT INCLUDE UNUSABLE PAVEMENT EXC VOLUME	
4 - EXPANDED MARSH BACKFILL	WILL BE BACKFILLED WITH GRANULAR BACKFILL (OR CUT, OR BORROW)	NOTE 4 - SELECT ONE BASED ON INPUT DIALOG SELECTION
5 - EXPANDED EBS	WILL BE BACKFILLED WITH GRANULAR BACKFILL (OR CUT, OR BORROW)	NOTE 5 - SELECT ONE BASED ON INPUT DIALOG SELECTION
6 - REDUCED MARSH IN FILL	REDUCED MARSH EXCAVATION THAT CAN BE USED IN FILL	NOTE 6 - IF EXCAVATED MARSH CAN BE USED IN FILL
7 - REDUCED EBS IN FILL	REDUCED EBS EXCAVATION THAT CAN BE USED IN FILL	NOTE 7 - IF EXCAVATED EBS CAN BE USED IN FILL
8 - MASS ORDINATE	IF MARSH OR EBS TO BE BACKFILLED WITH COMMON OR BORROW: [(CUT - SALVAGED PAVT - EXPANDED MARSH EXC - EXPANDED EBS) - ((FILL - REDUCED MARSH IN FILL - REDUCED EBS IN FILL - EXPANDED ROCK) * FILL FACTOR)]	NOTE 8 - SELECT ONE BASED ON MASS HAUL INPUT DIALOG SELECTION. EBS AND MARSH EXC USED OUTSIDE 1:1 IN FILL SLOPES
8 - MASS ORDINATE	IF MARSH AND EBS TO BE BACKFILLED WITH GRANULAR: [CUT - SALVAGED PAVT - ((FILL - REDUCED MARSH IN FILL - REDUCED EBS IN FILL - EXPANDED ROCK) * FILL FACTOR)]	EBS AND MARSH EXC USED OUTSIDE 1:1 IN FILL SLOPES
8 - MASS ORDINATE	IF MARSH AND EBS TO BE BACKFILLED WITH COMMON OR BORROW: [(CUT - SALVAGED PAVT - EXPANDED MARSH EXC - EXPANDED EBS) - ((FILL - EXPANDED ROCK) * FILL FACTOR)]	MARSH AND EBS ARE NOT USABLE OUTSIDE THE 1:1 SLOPES
8 - MASS ORDINATE	IF MARSH AND EBS TO BE BACKFILLED WITH GRANULAR: [CUT - SALVAGED PAVT - ((FILL - EXPANDED ROCK) * FILL FACTOR)]	MARSH AND EBS ARE NOT USABLE OUTSIDE THE 1:1 SLOPES

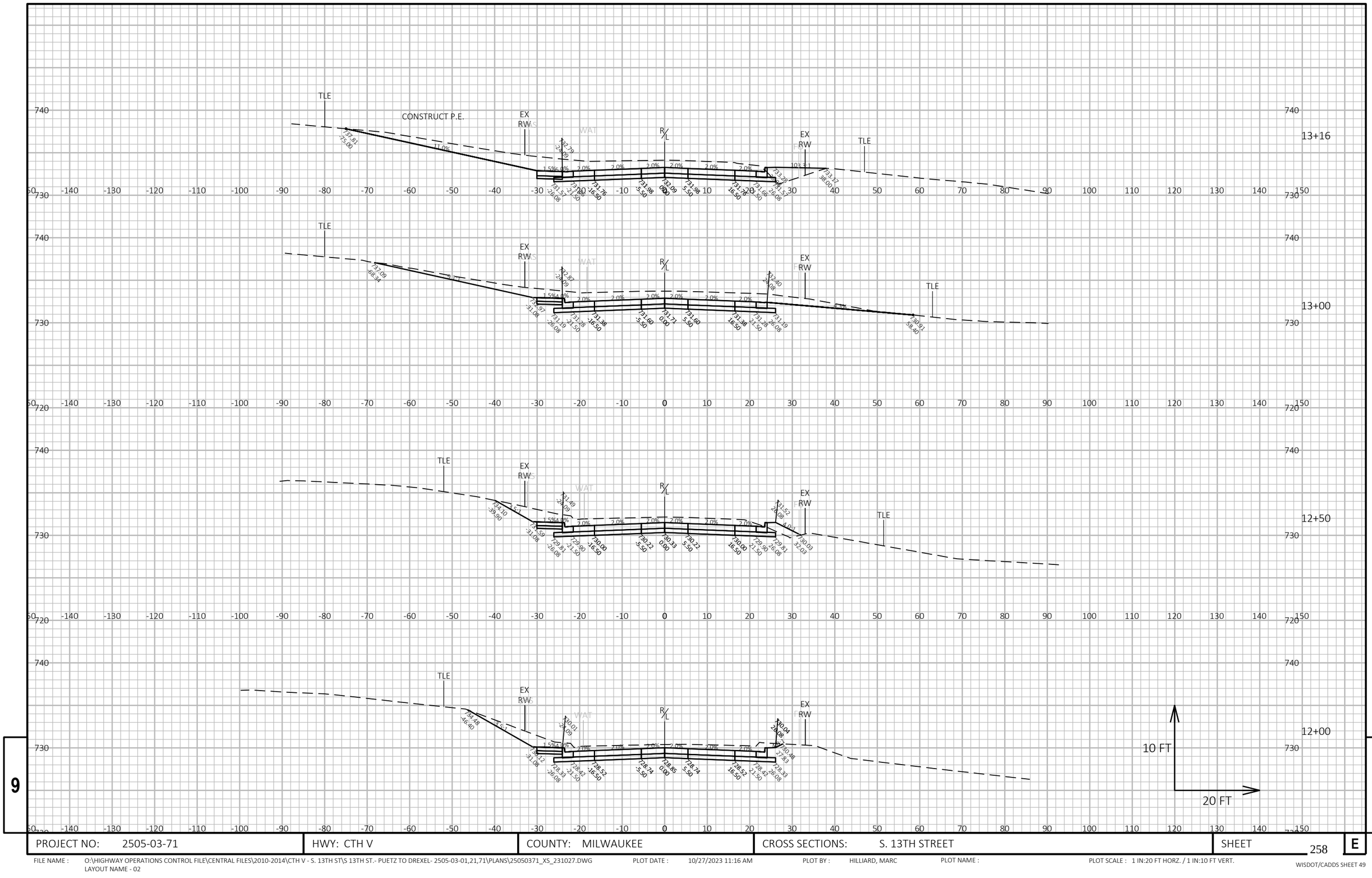


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 257	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 01

PLOT DATE : 10/27/2023 11:16 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

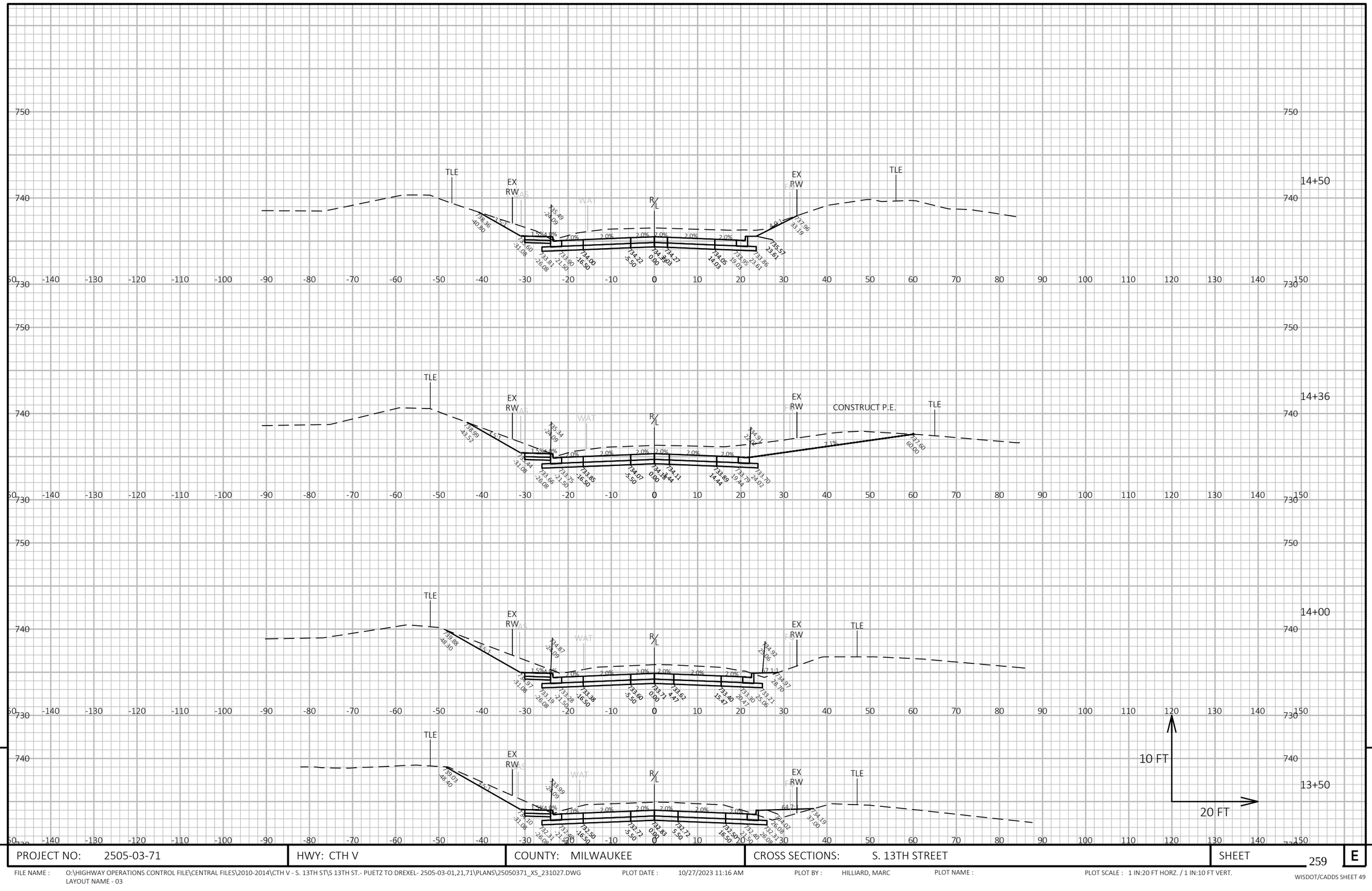
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 258	E

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LAYOUT NAME - 02

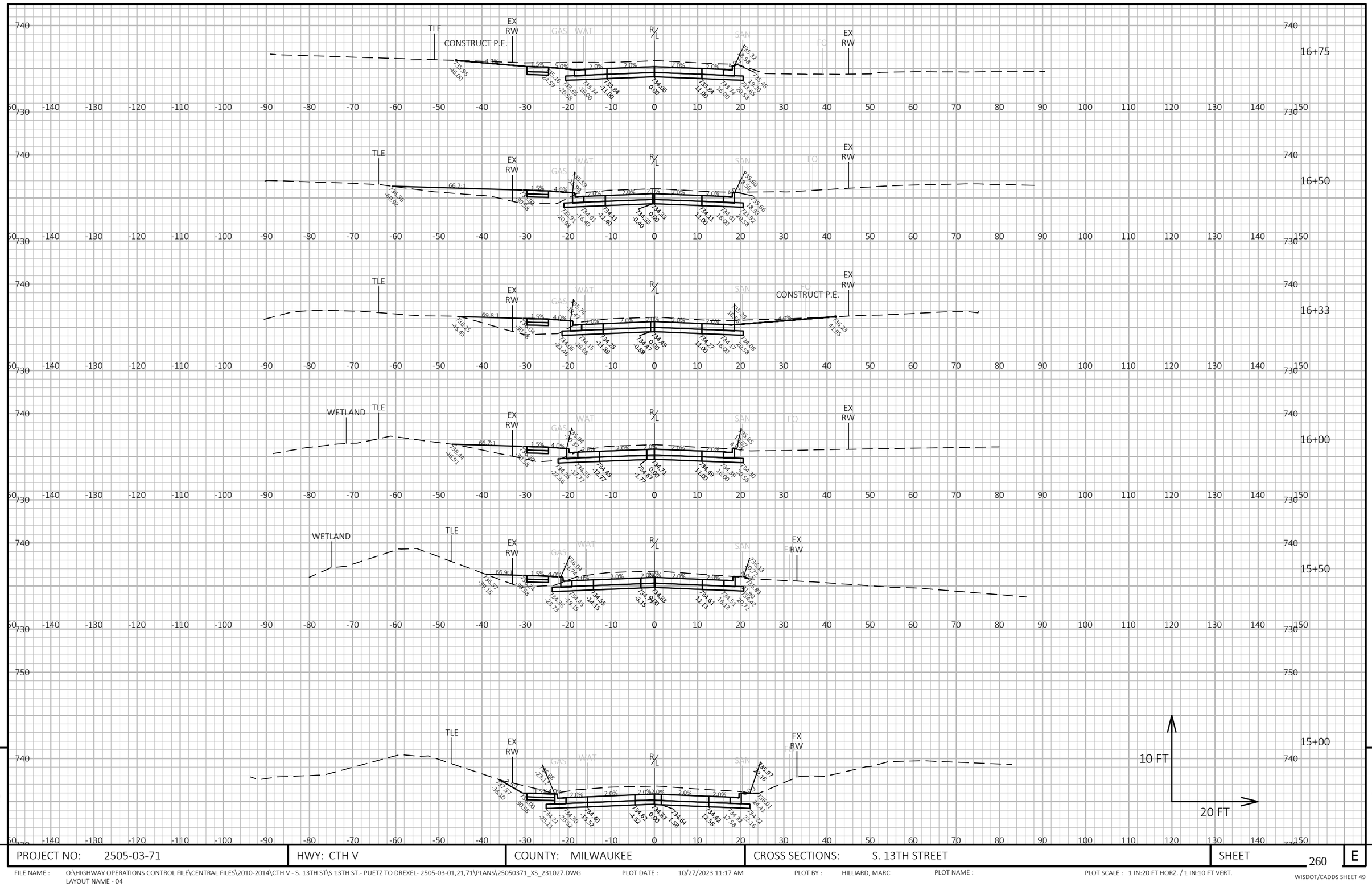
PLOT DATE : 10/27/2023 11:16 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 259	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 03
PLOT DATE : 10/27/2023 11:16 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.



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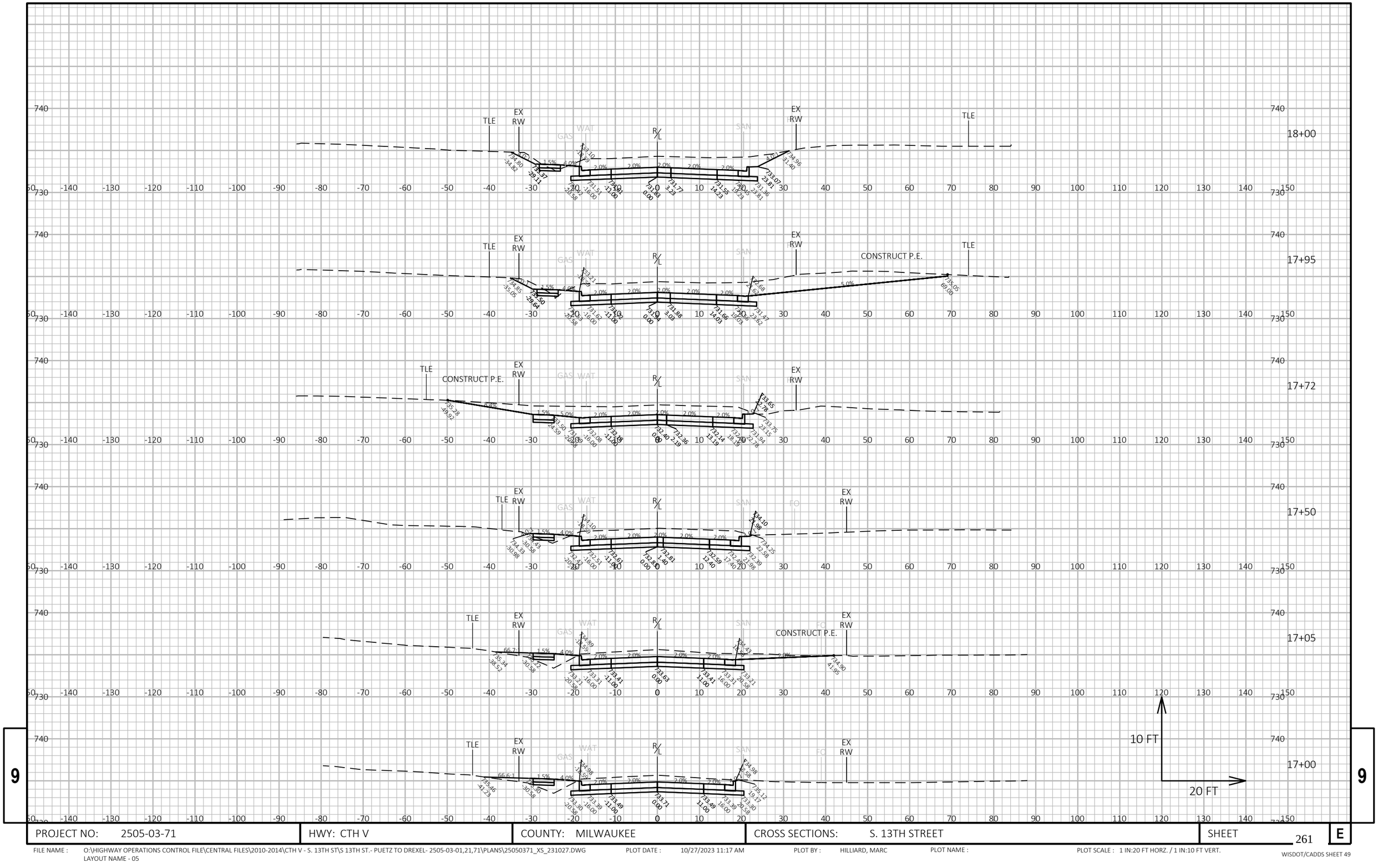
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 260	E

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LAYOUT NAME - 04

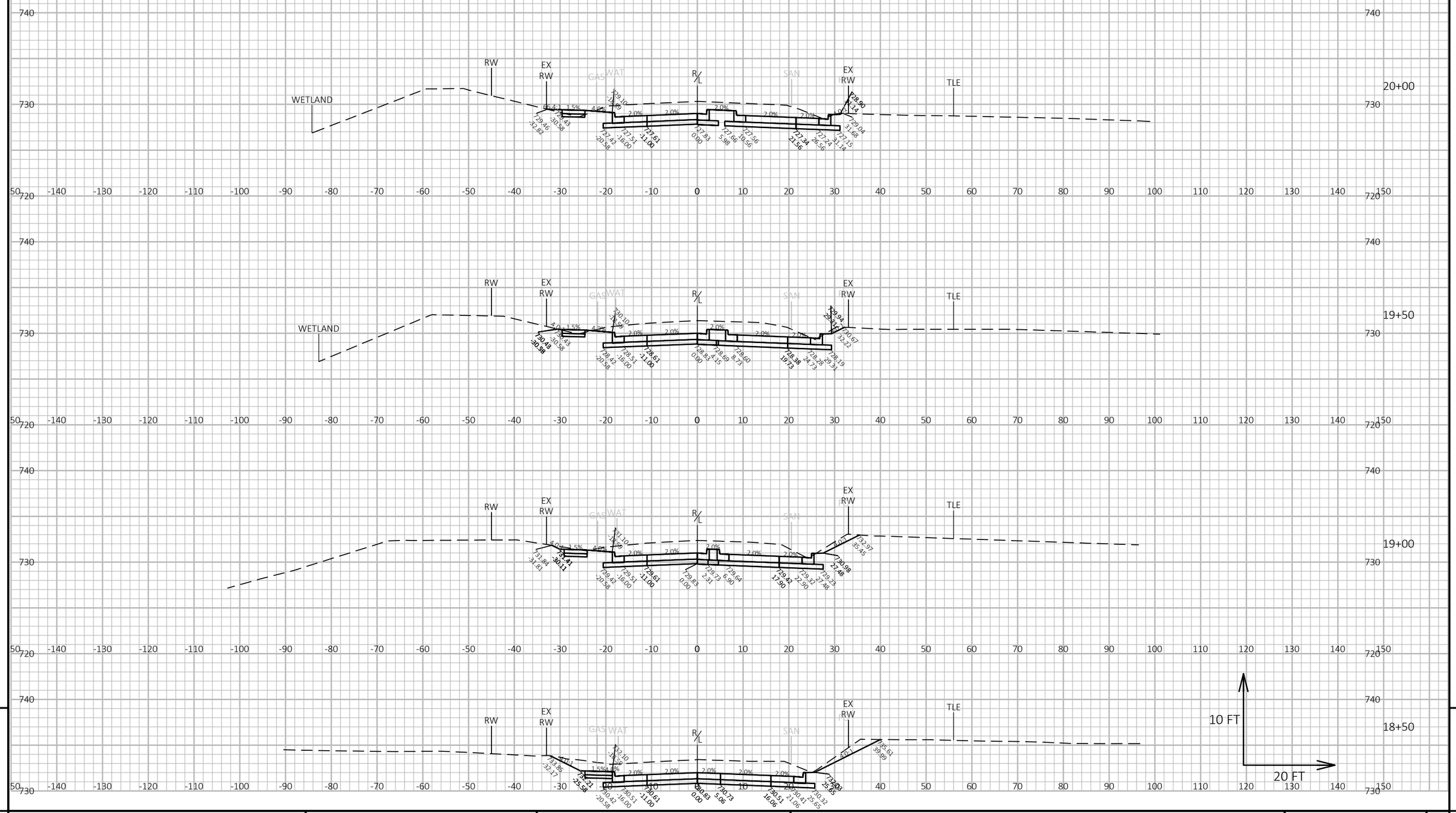
PLOT DATE : 10/27/2023 11:17 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 261	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 05
PLOT DATE : 10/27/2023 11:17 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

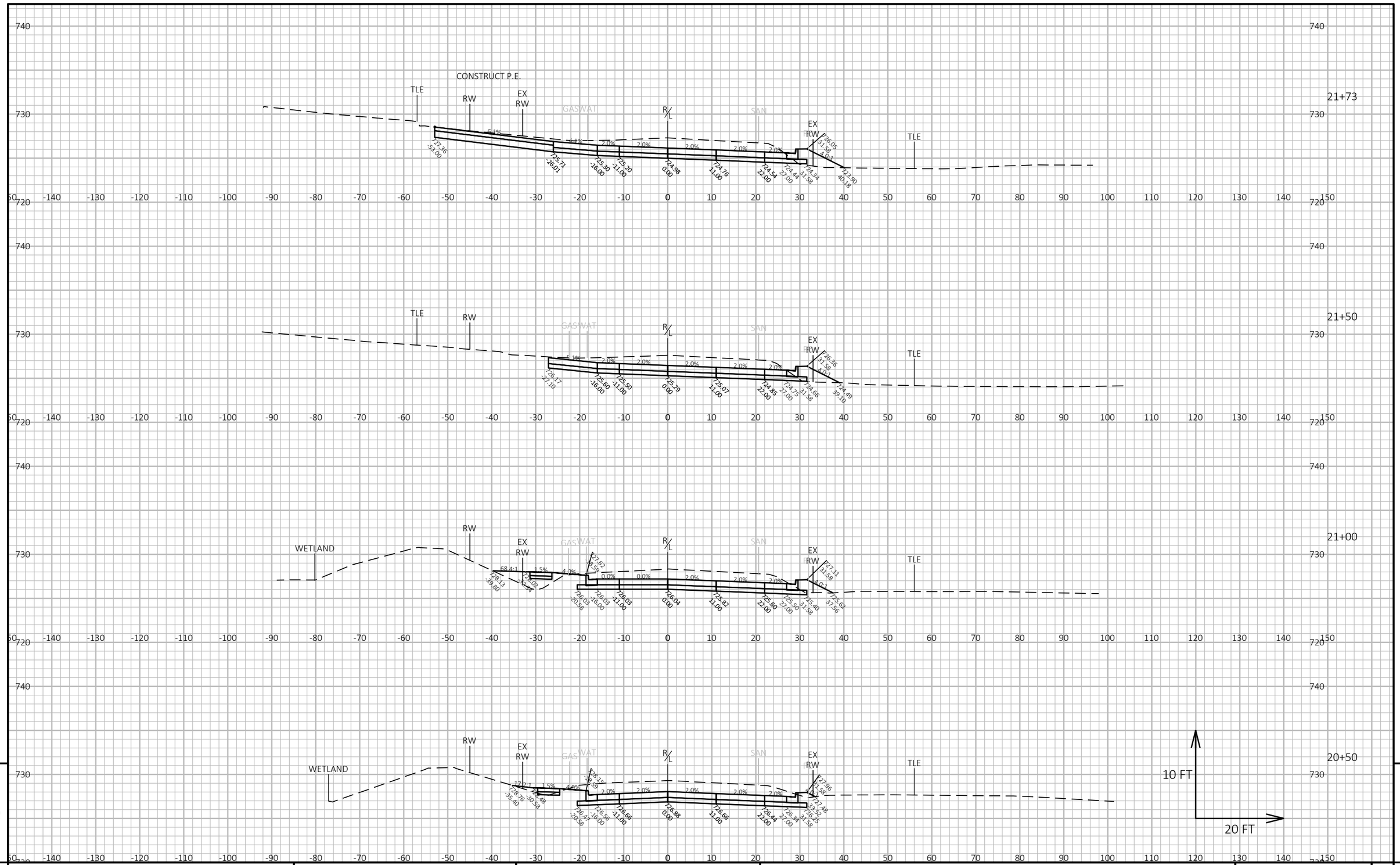


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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 262	E

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LAYOUT NAME - 06
PLOT DATE : 10/27/2023 11:17 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.
WISDOT/CADDS SHEET 49

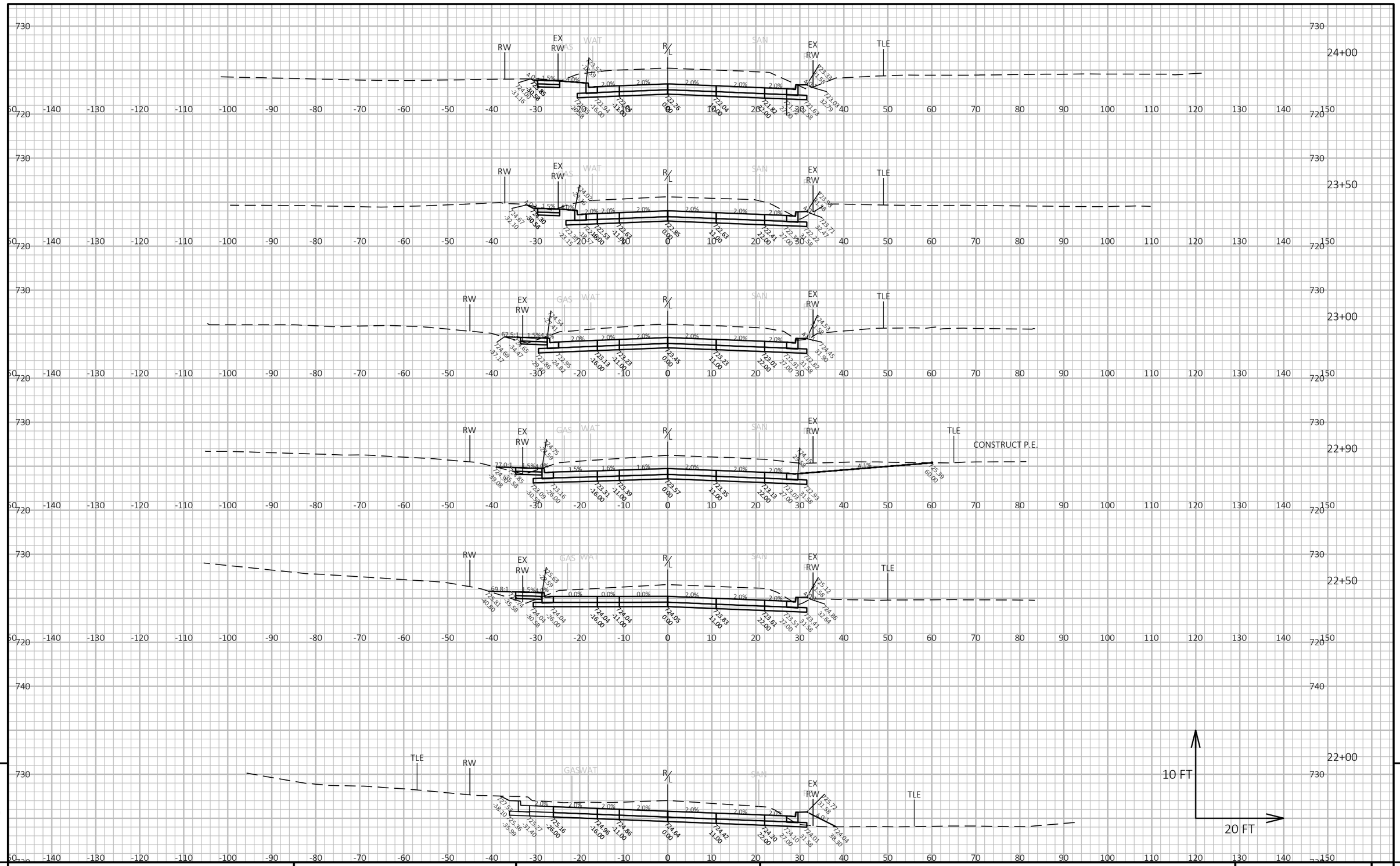


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 263	E

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LAYOUT NAME - 07

PLOT DATE : 10/27/2023 11:17 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



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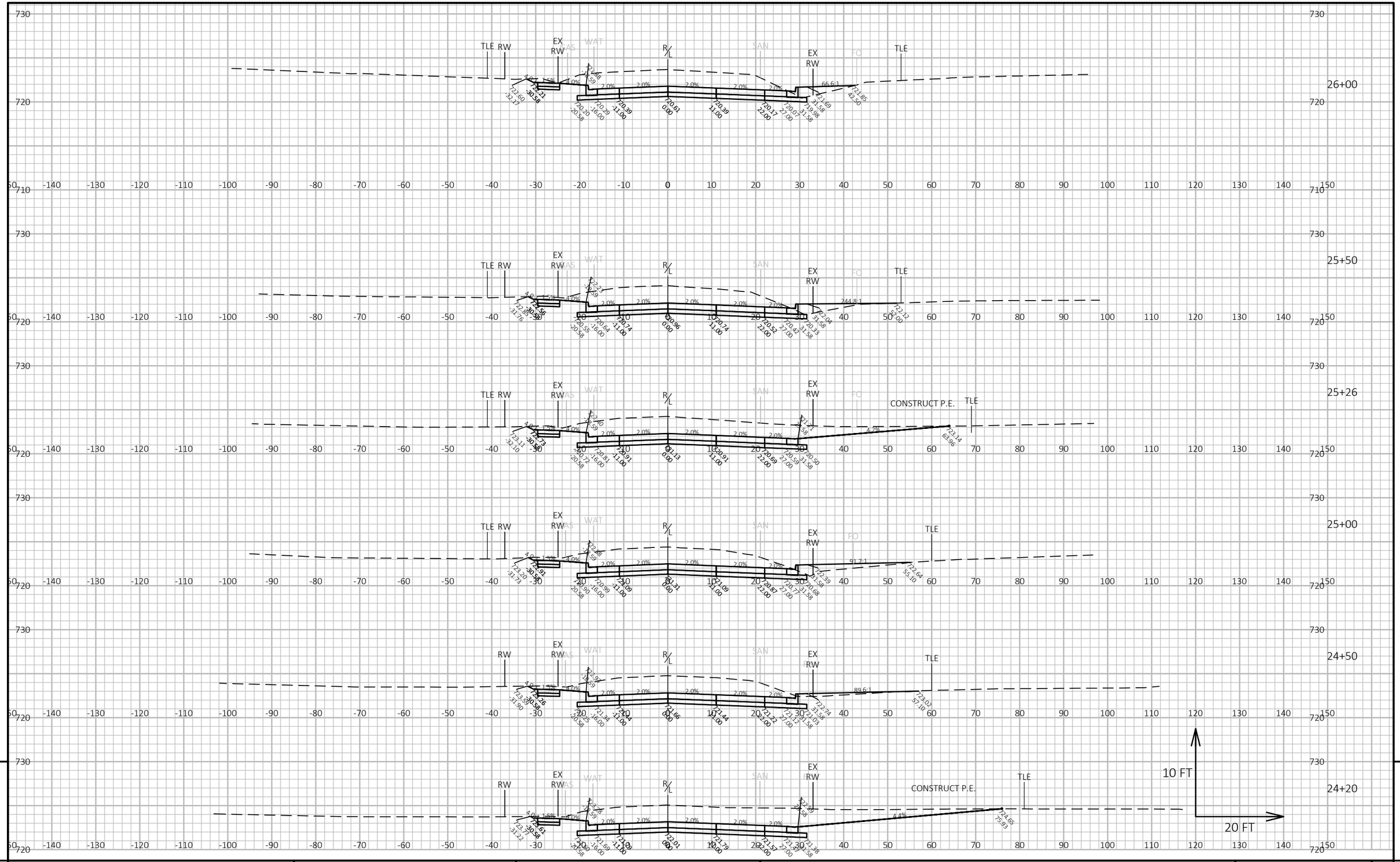
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 264	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 08

PLOT DATE : 10/27/2023 12:09 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

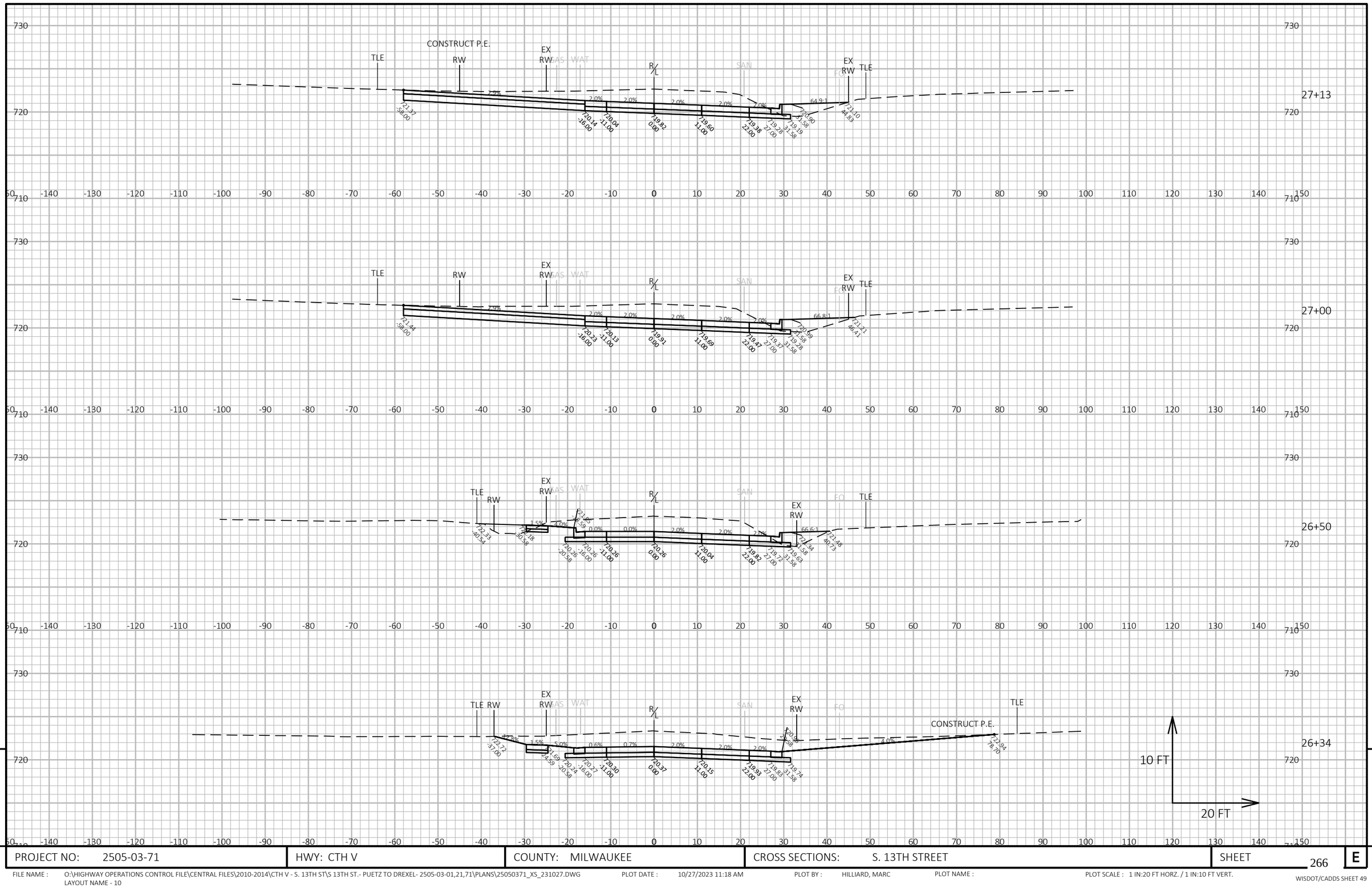
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 265	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 09

PLOT DATE : 10/27/2023 11:18 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

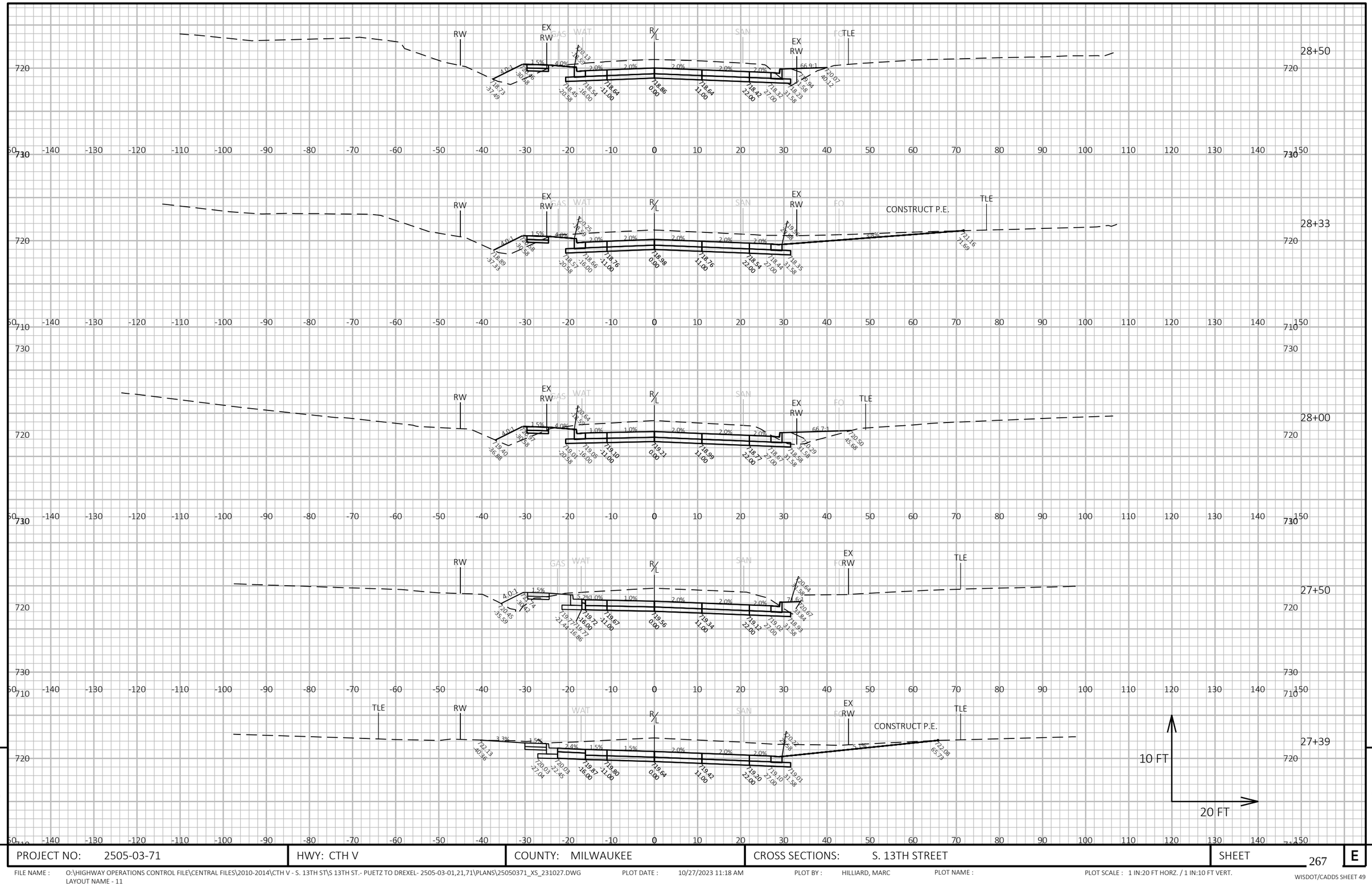
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 266	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 10

PLOT DATE : 10/27/2023 11:18 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

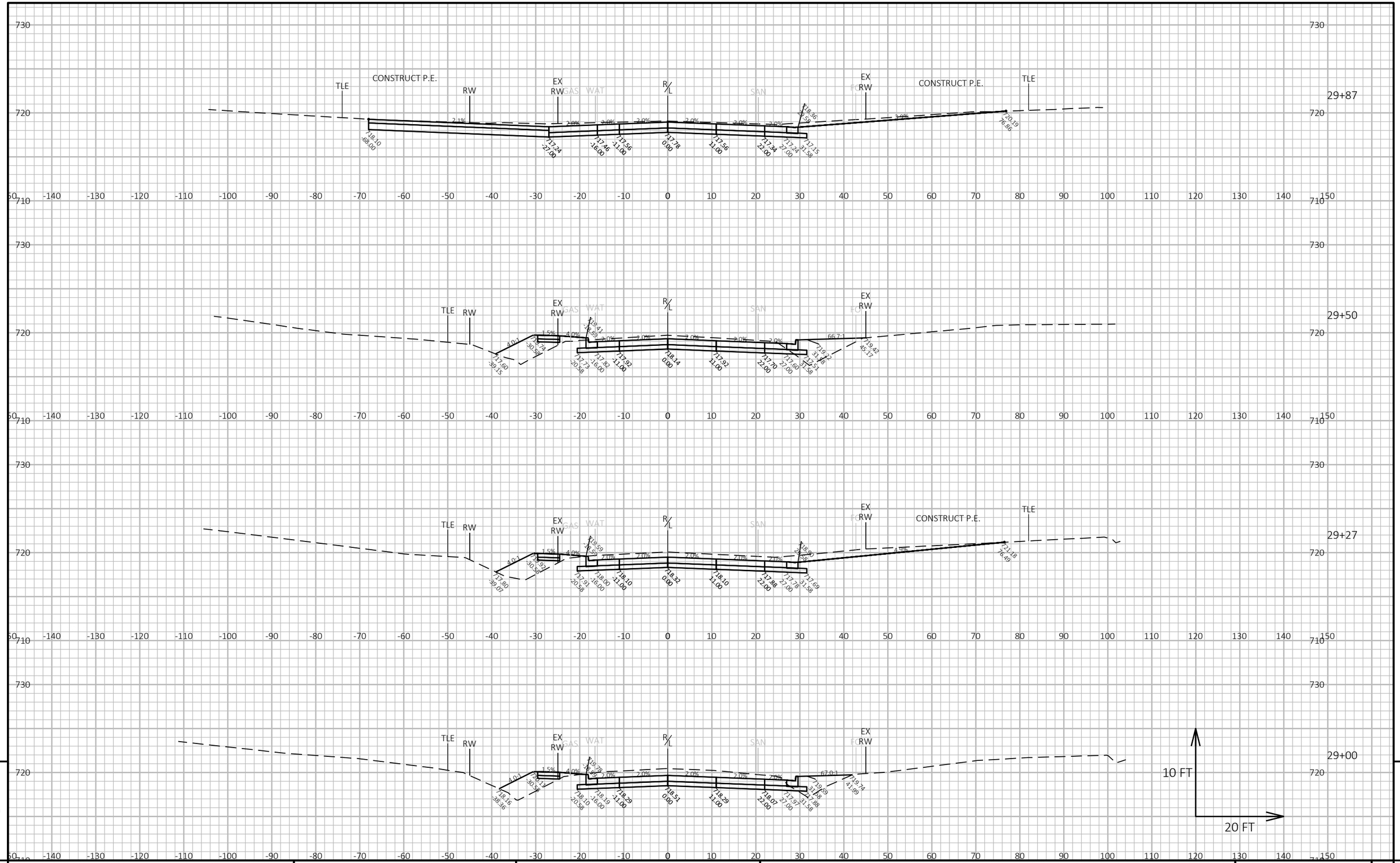
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 267	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 11

PLOT DATE : 10/27/2023 11:18 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



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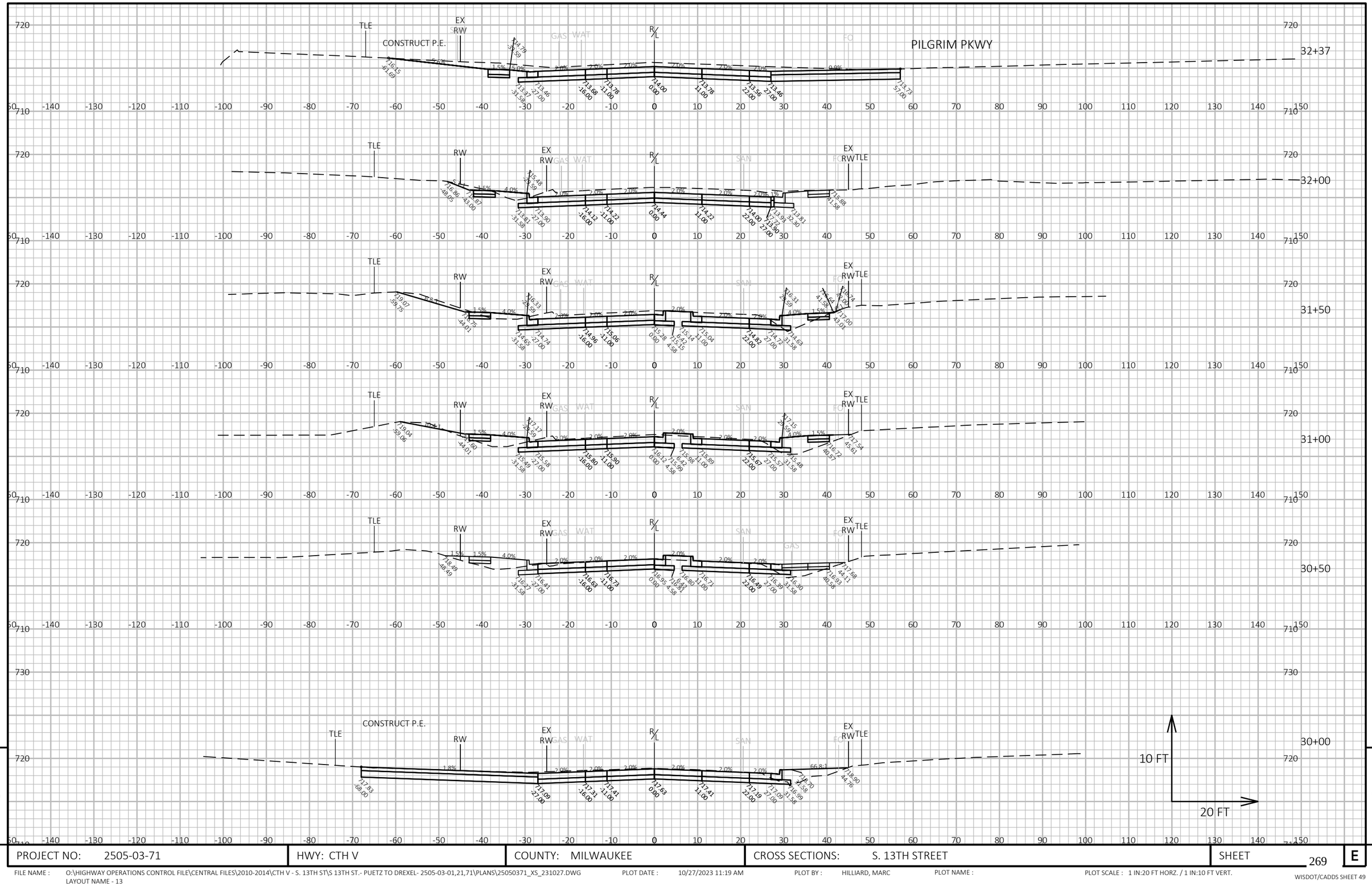
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 268	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 12

PLOT DATE : 10/27/2023 11:19 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

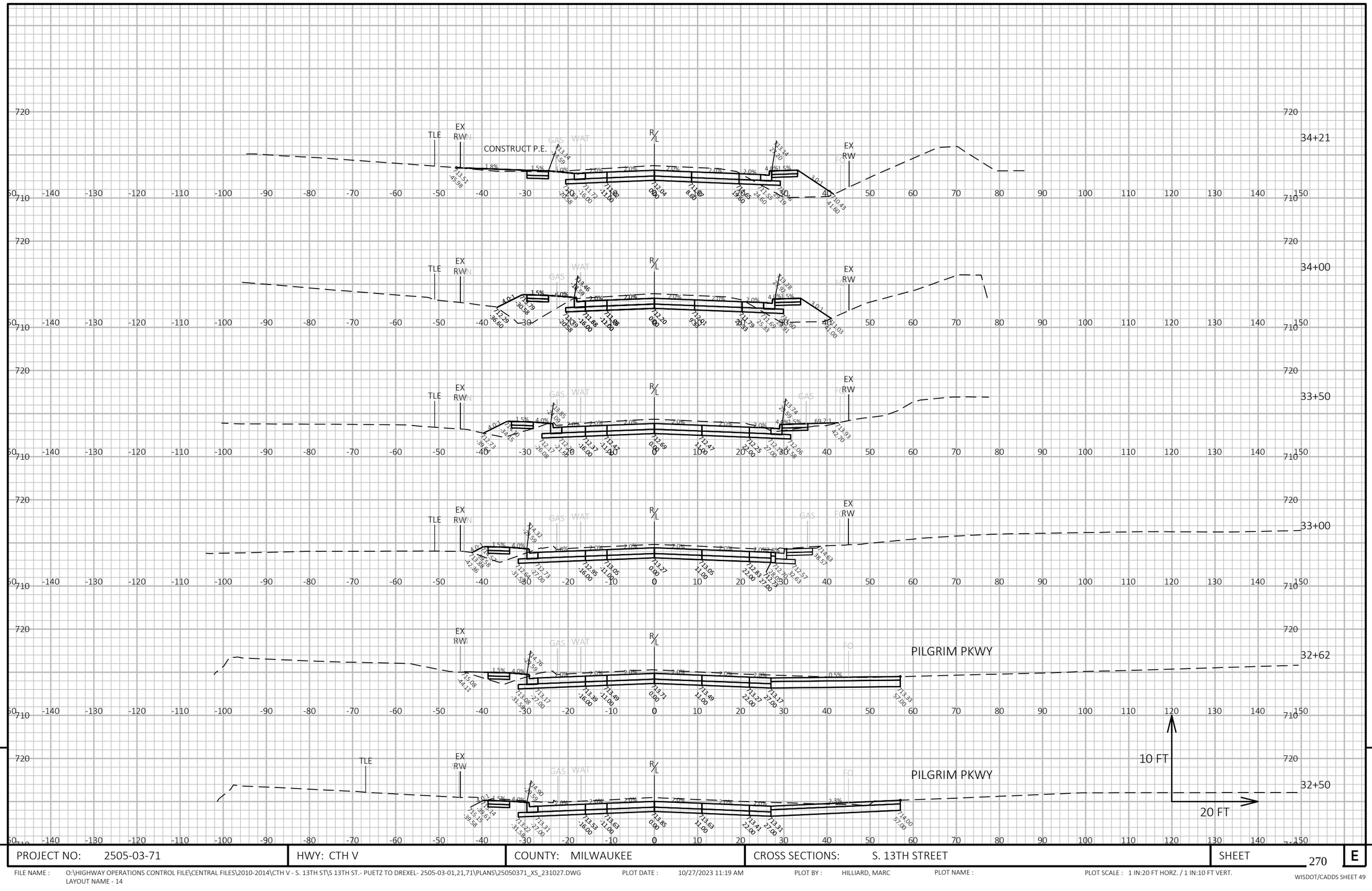
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 269	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 13

PLOT DATE : 10/27/2023 11:19 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

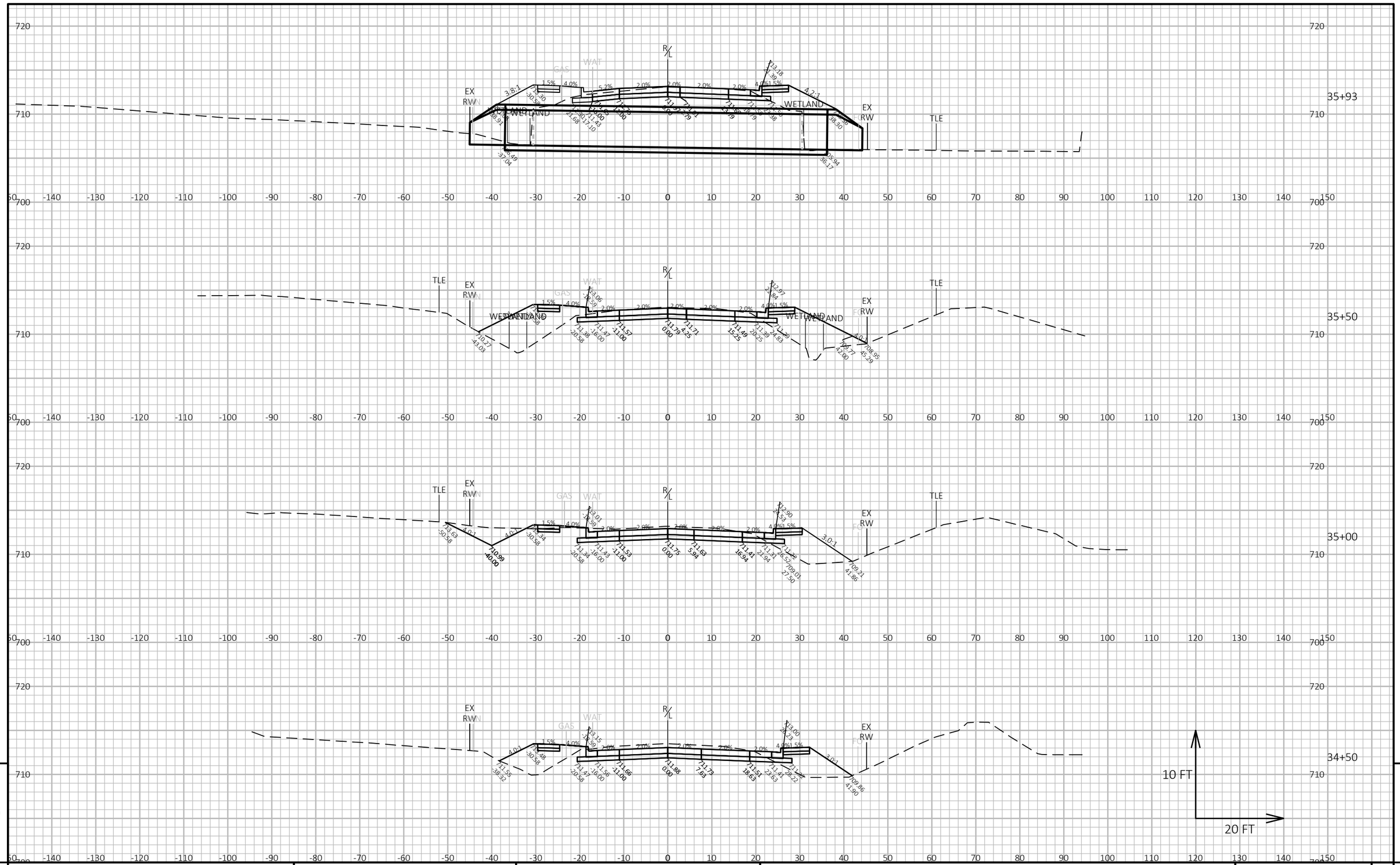
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 270	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 14

PLOT DATE : 10/27/2023 11:19 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

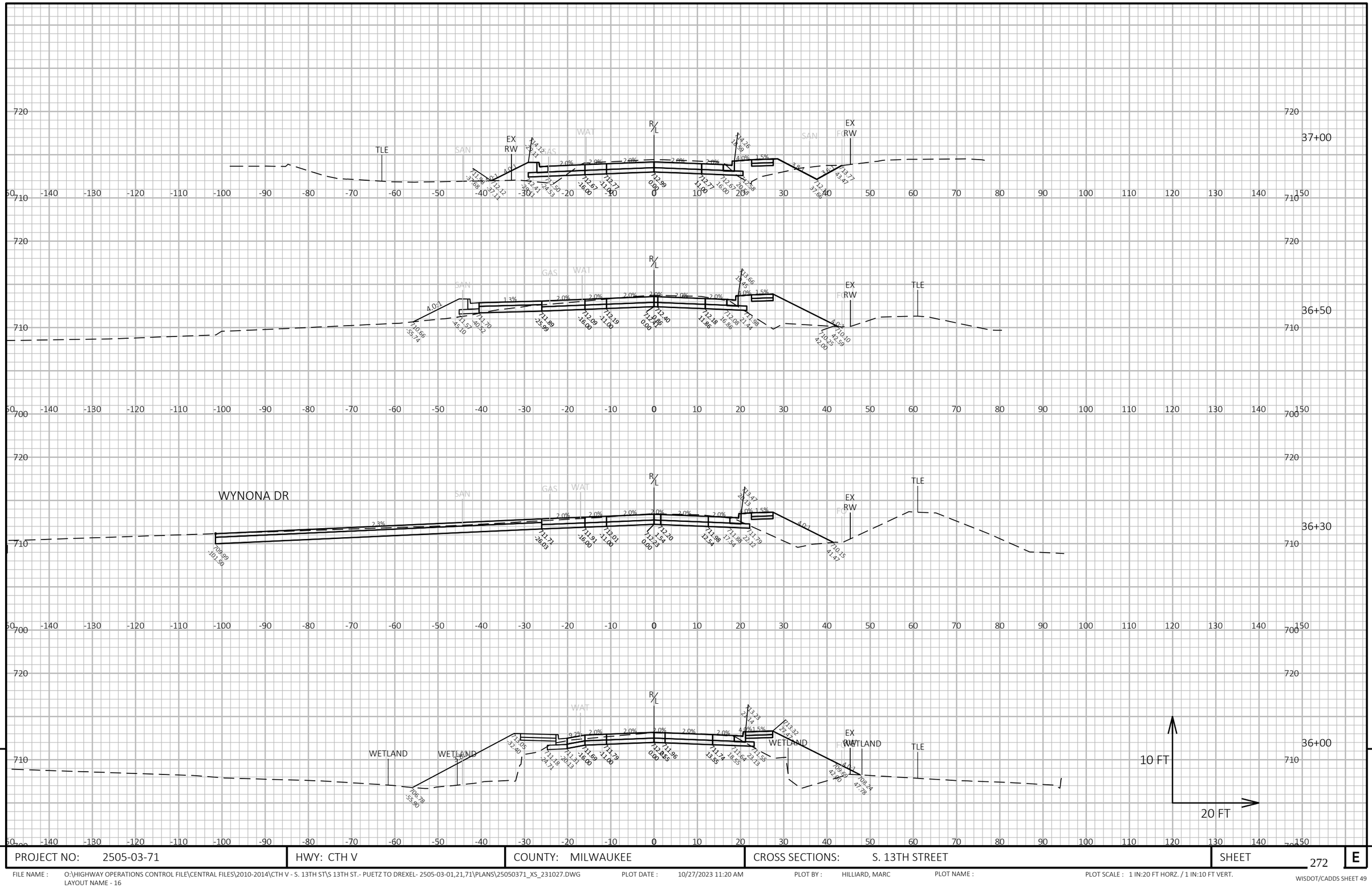
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 271	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 15

PLOT DATE : 10/27/2023 12:04 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

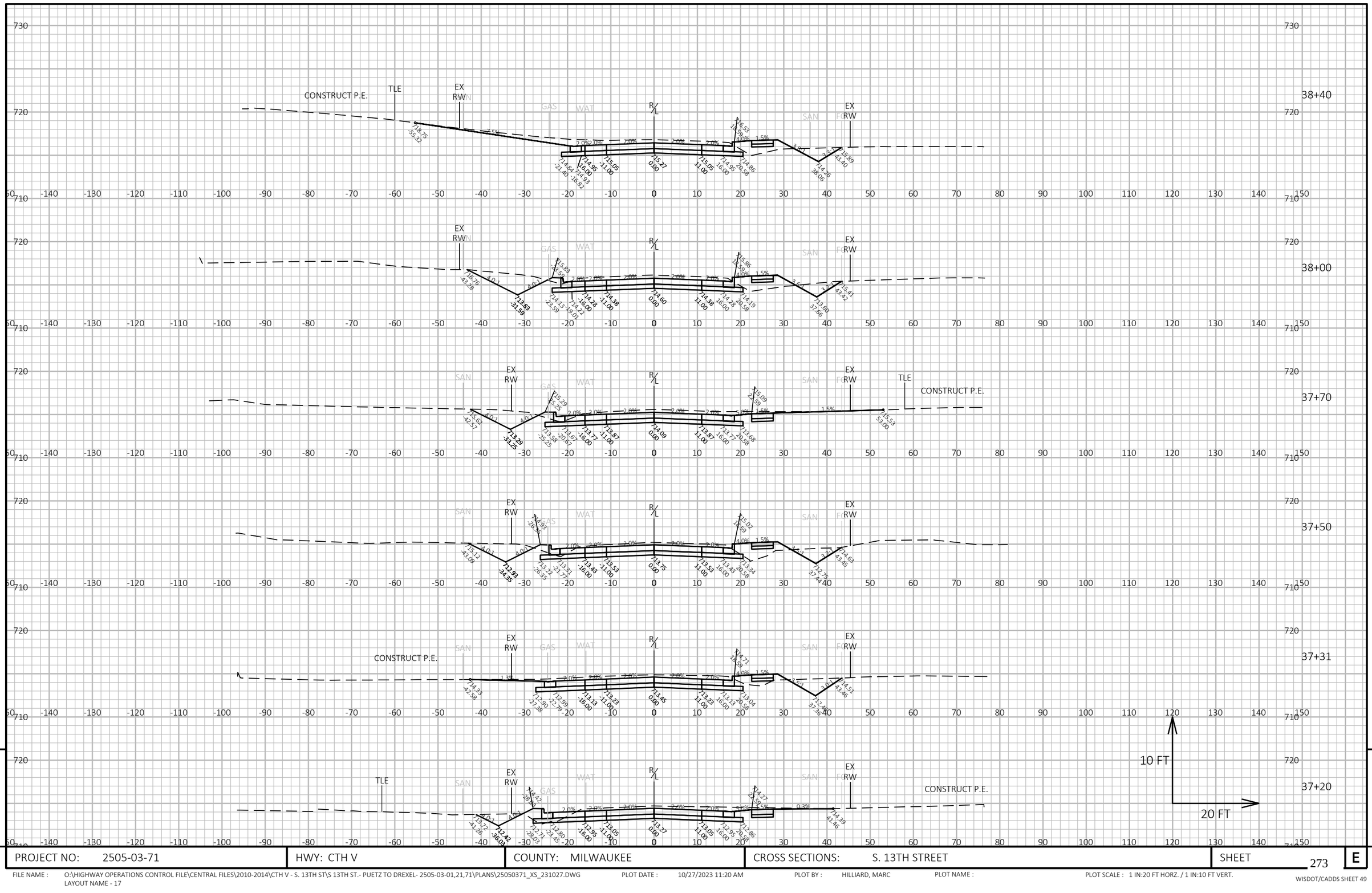
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 272	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 16

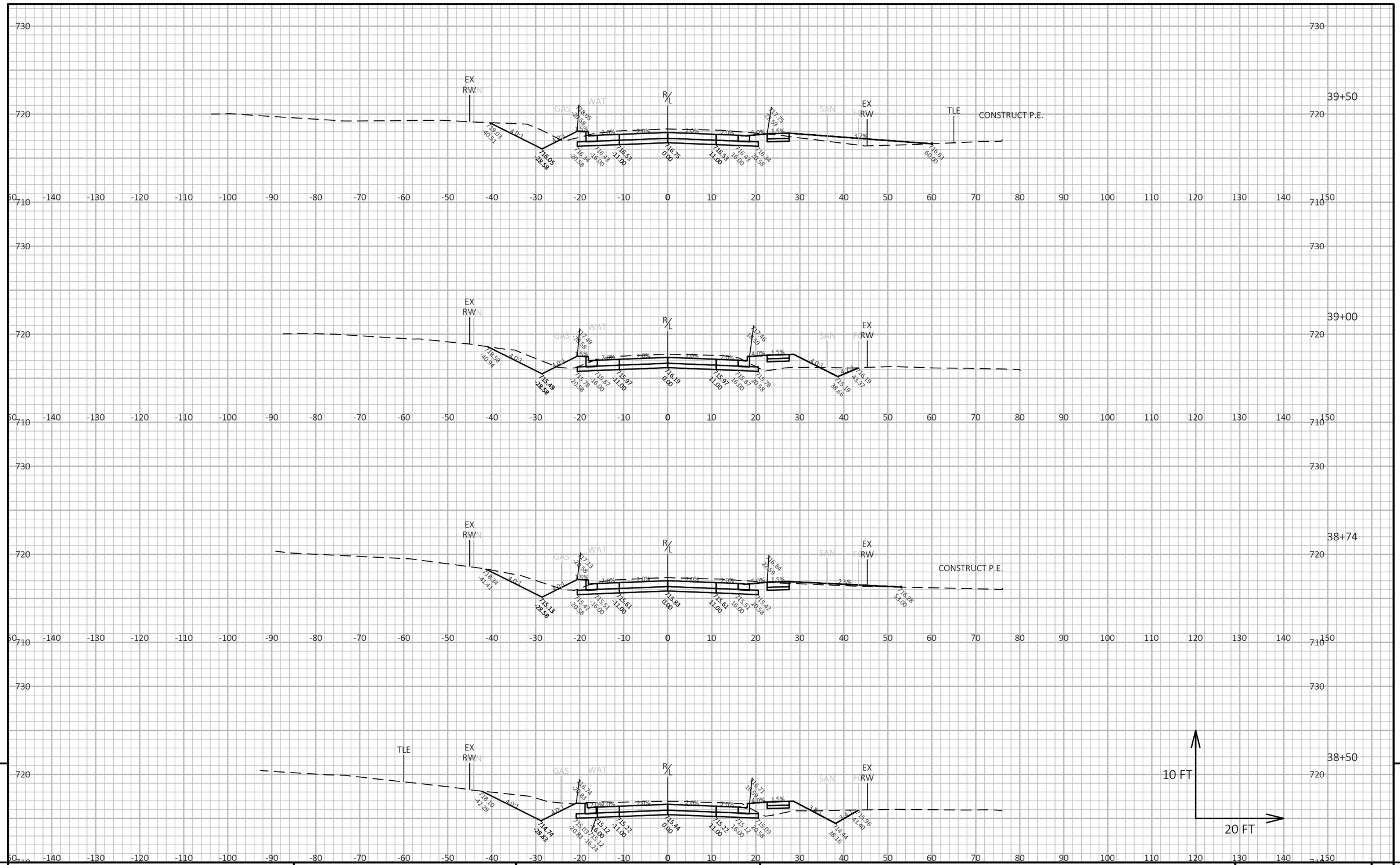
PLOT DATE : 10/27/2023 11:20 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 273	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 17
PLOT DATE : 10/27/2023 11:20 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.
WISDOT/CADDS SHEET 49



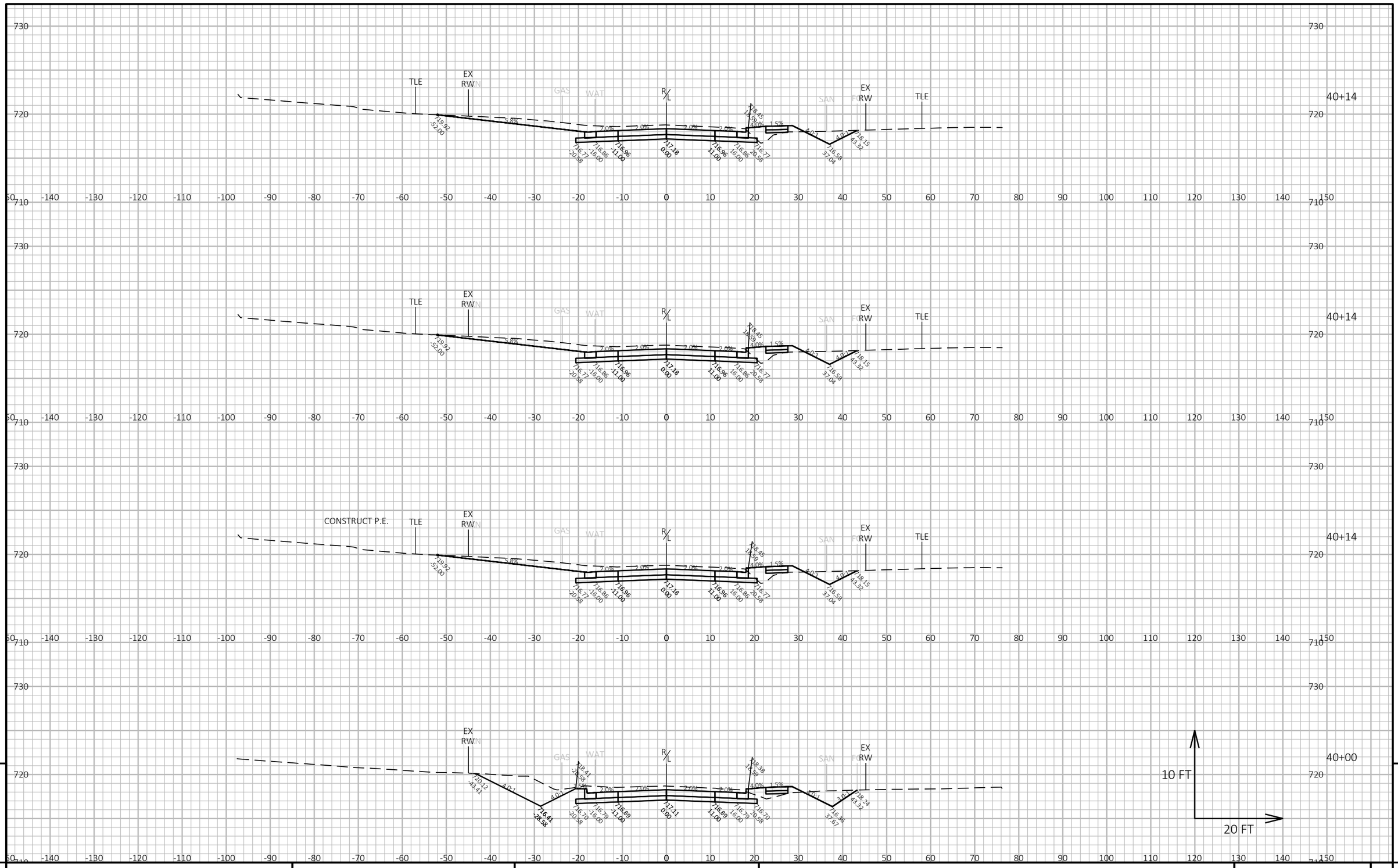
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 274	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 18

PLOT DATE : 10/27/2023 11:20 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.



9

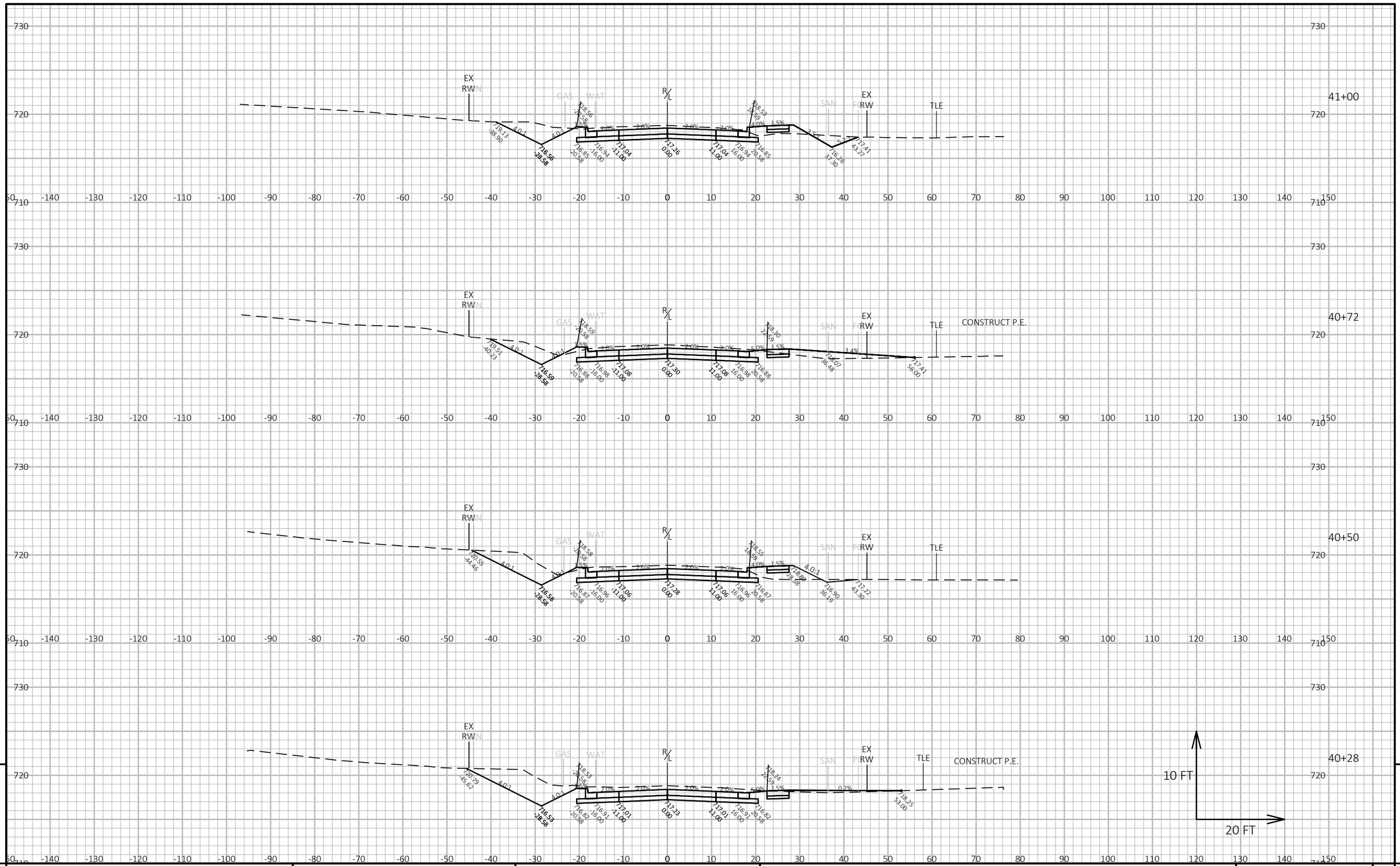
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 275	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 19

PLOT DATE : 10/27/2023 11:20 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

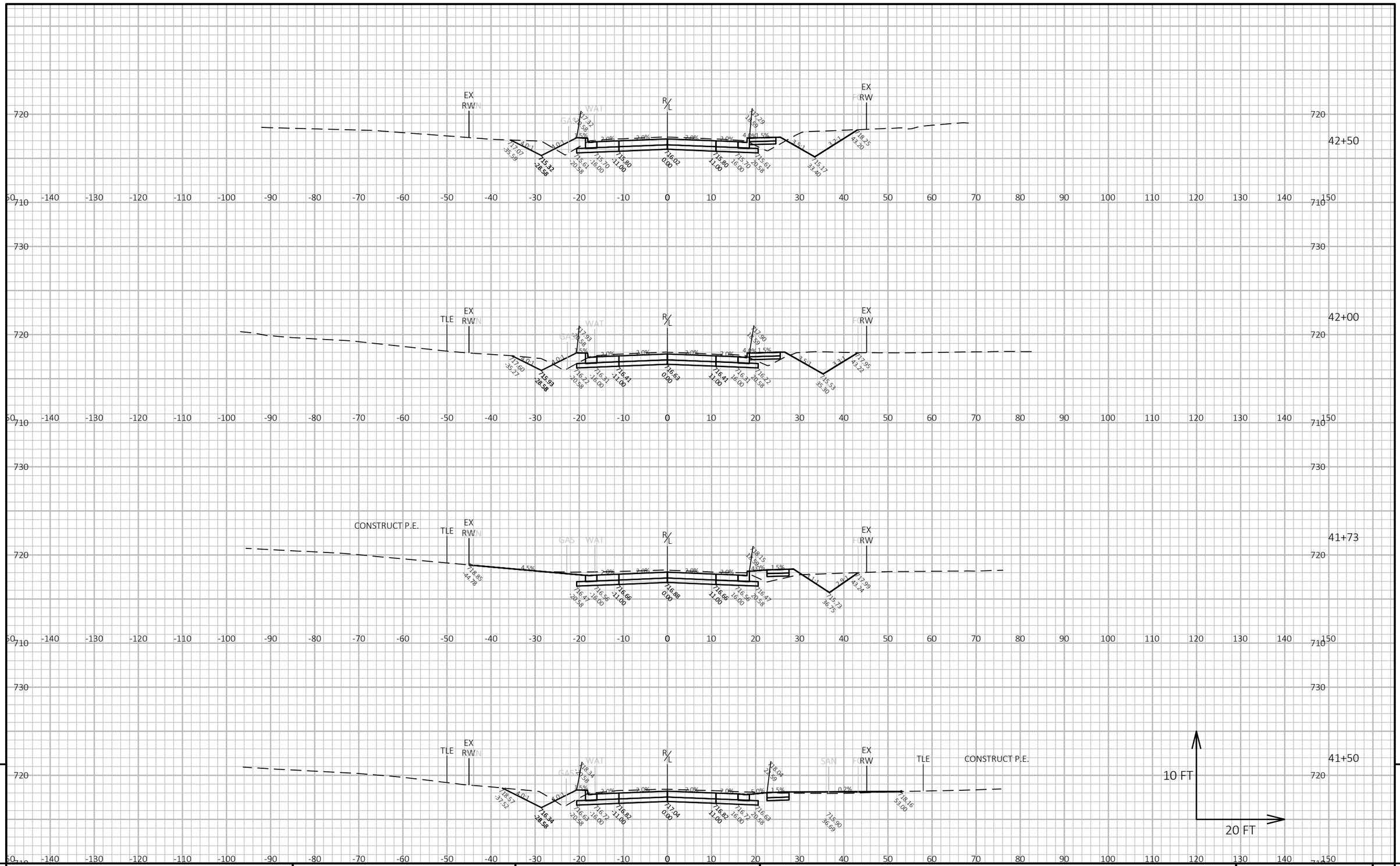
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 276	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 20

PLOT DATE : 10/27/2023 11:21 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

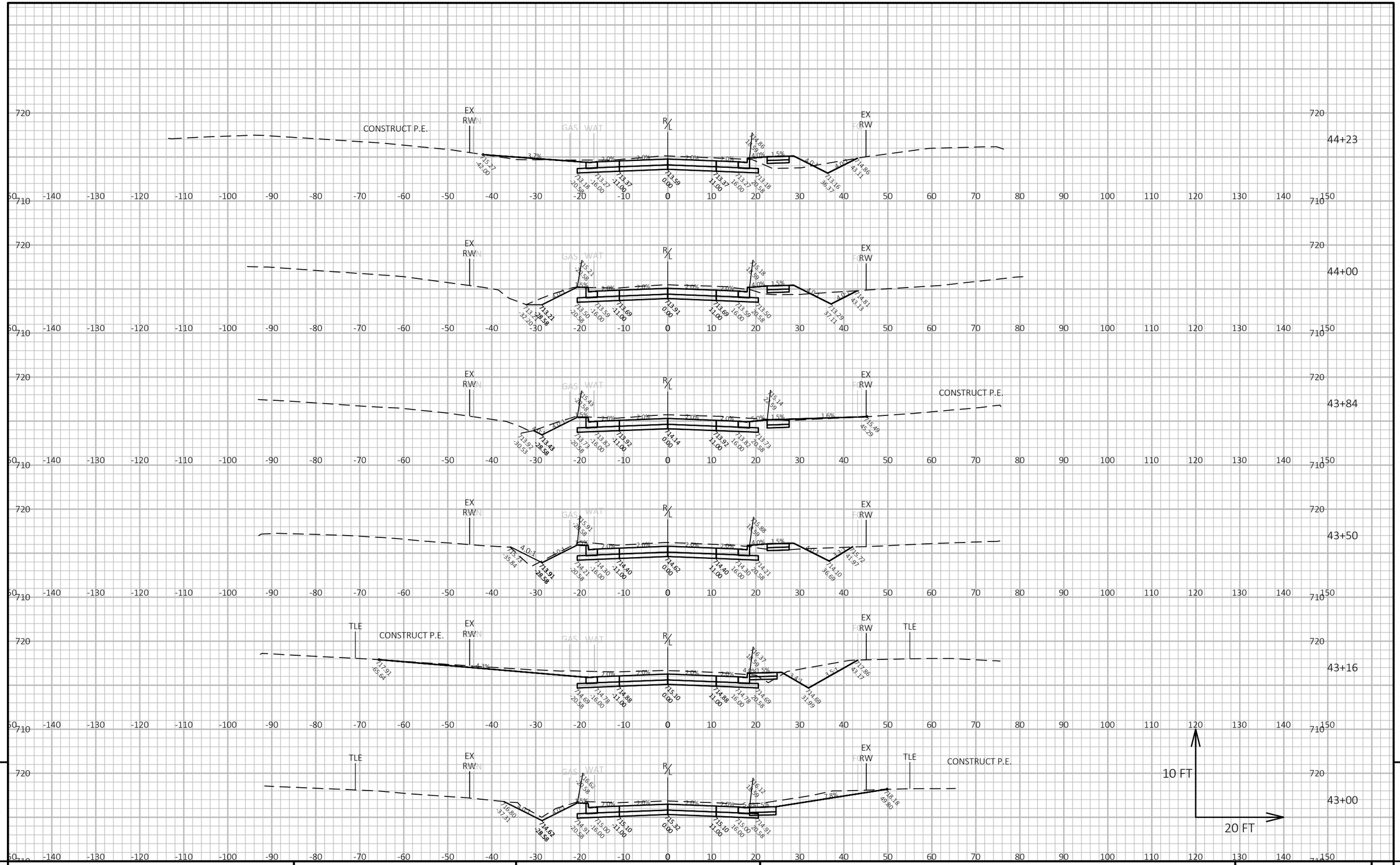
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 277	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 21

PLOT DATE : 10/27/2023 11:21 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

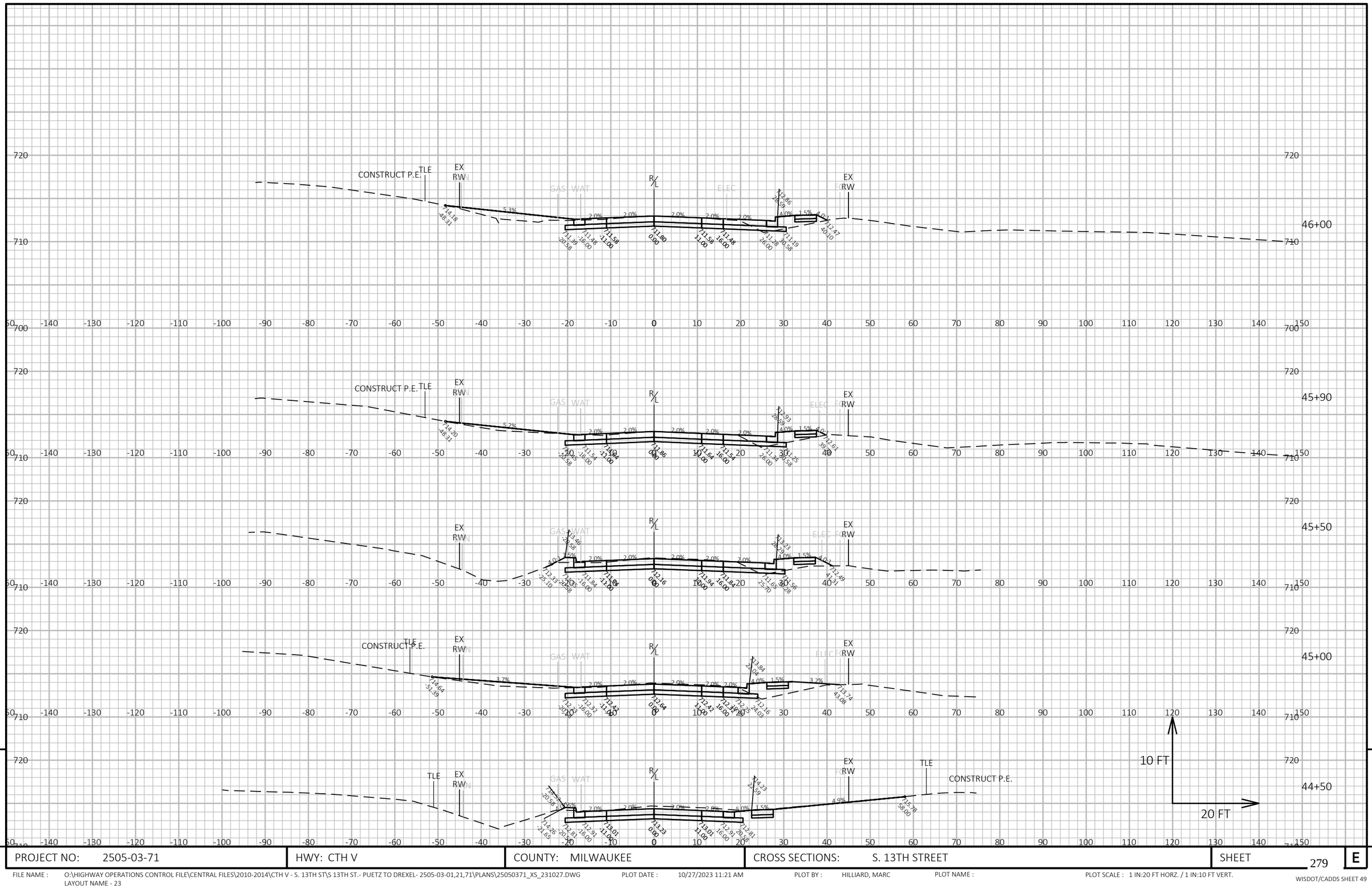
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 278	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 22

PLOT DATE : 10/27/2023 11:21 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

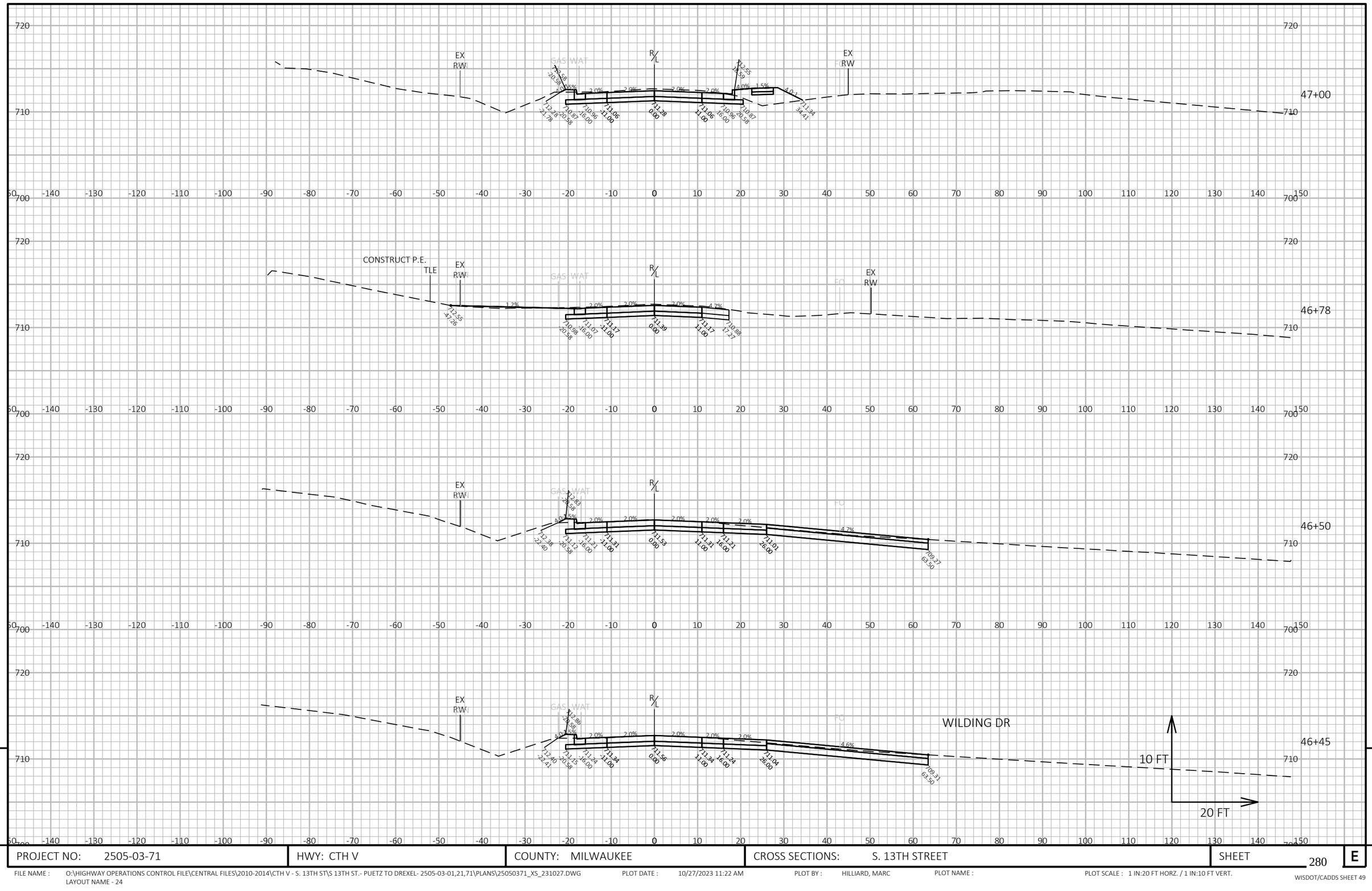
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 279	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 23

PLOT DATE : 10/27/2023 11:21 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

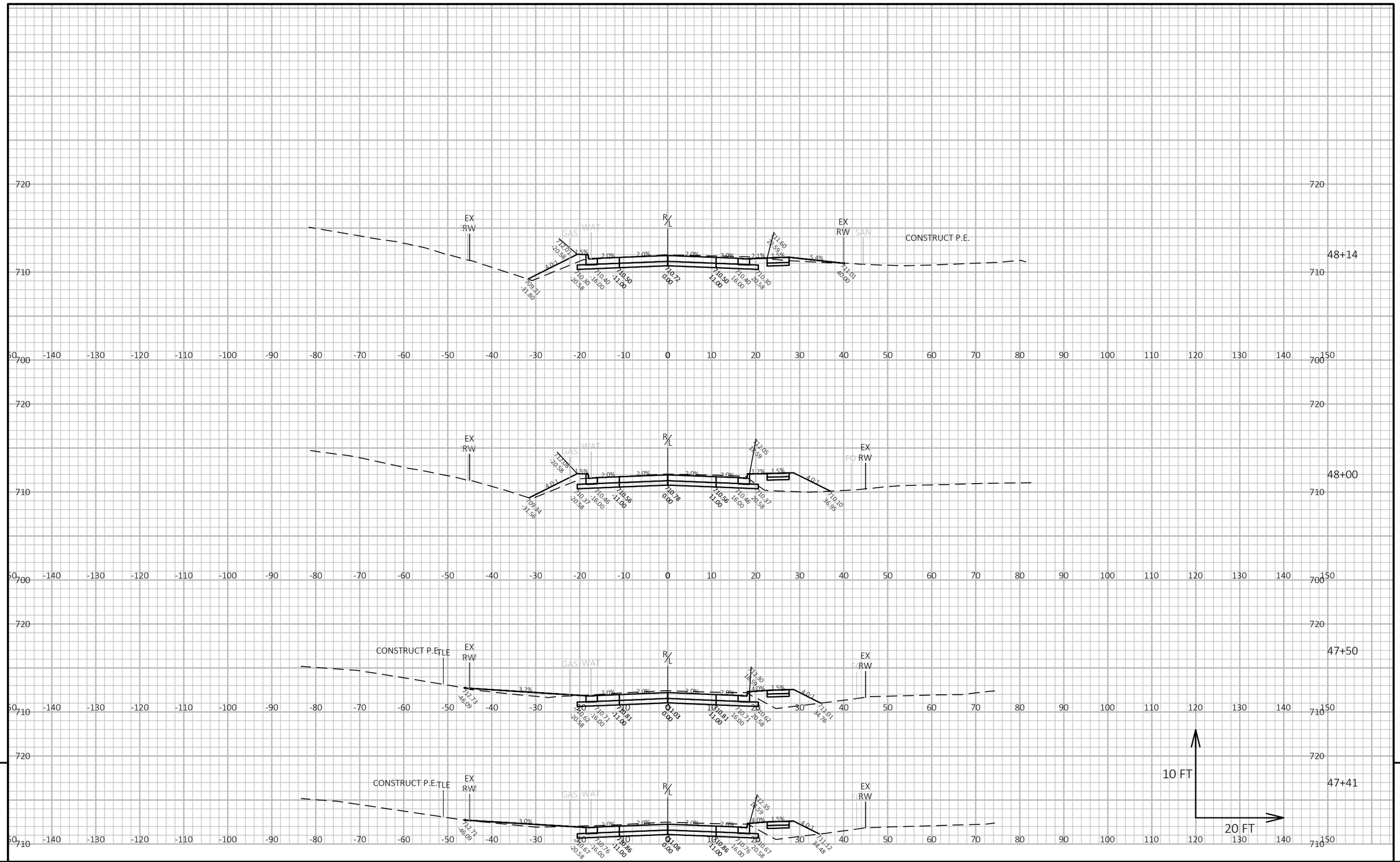
WISDOT/CADDS SHEET 49



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 280 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 24
PLOT DATE : 10/27/2023 11:22 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49

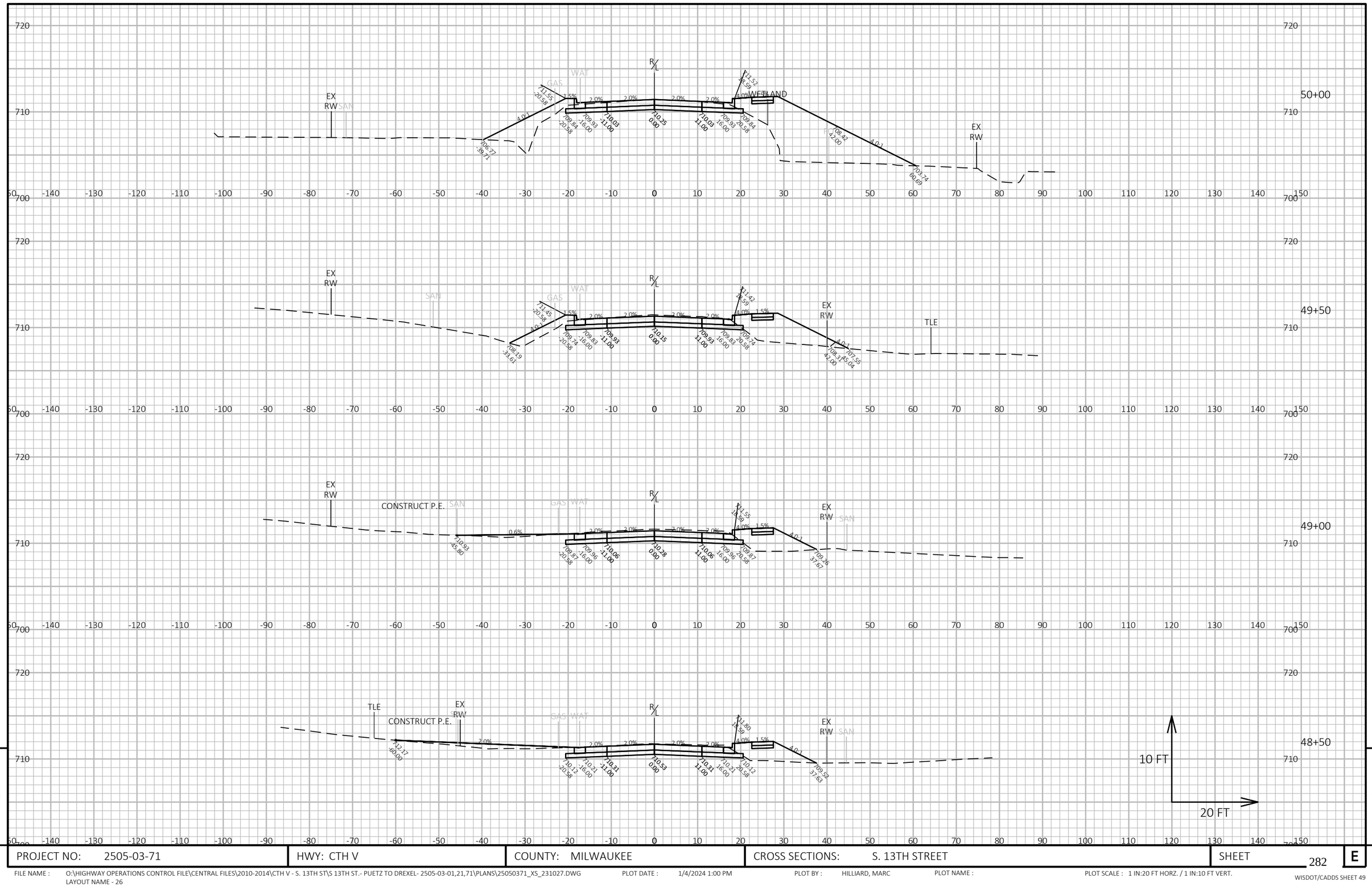


9

9

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 281	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 25
PLOT DATE : 10/27/2023 11:22 AM
PLOT BY : HILLIARD, MARC
PLOT NAME :
PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.
WISDOT/CADDS SHEET 49

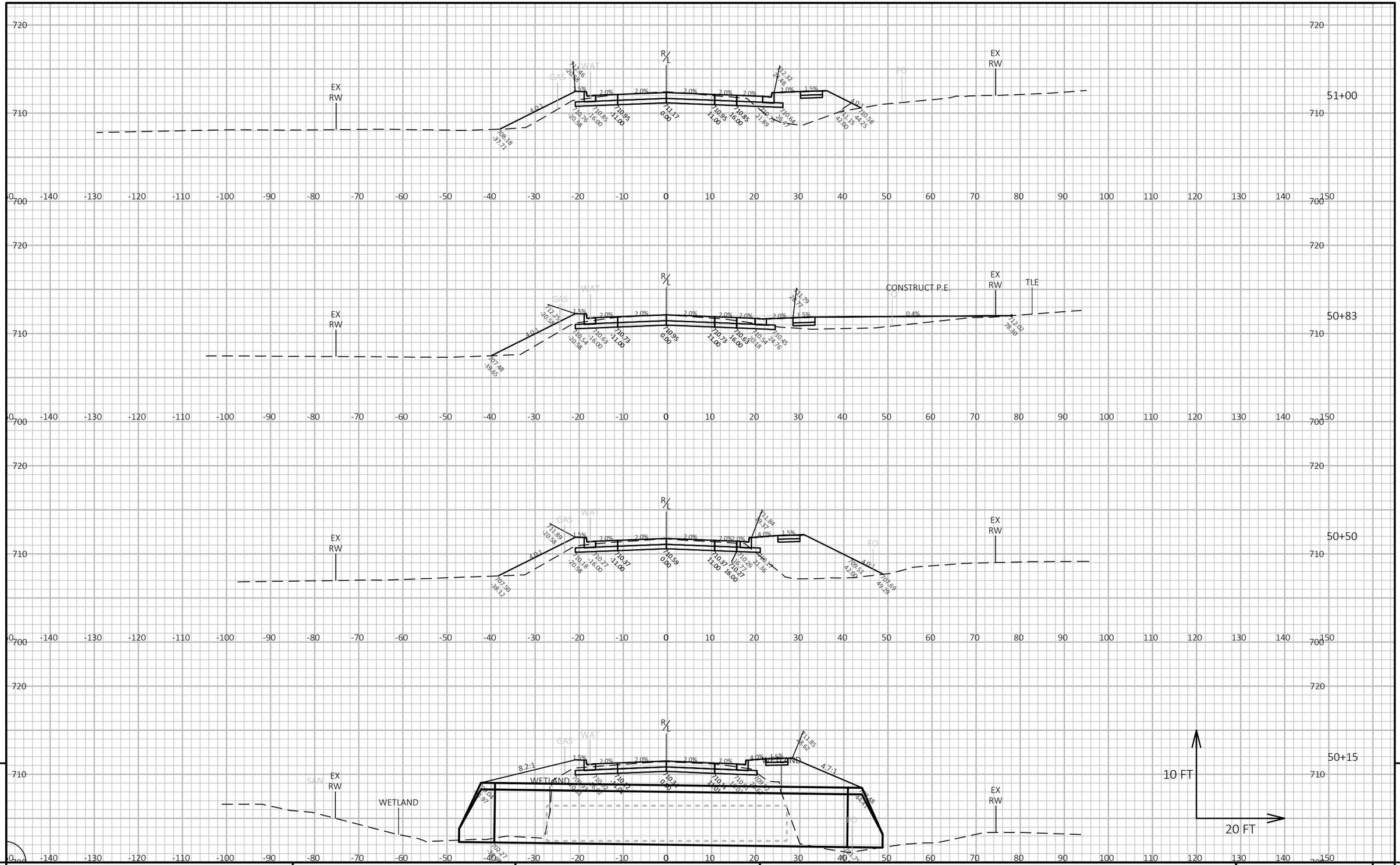


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 282 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 26

PLOT DATE : 1/4/2024 1:00 PM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

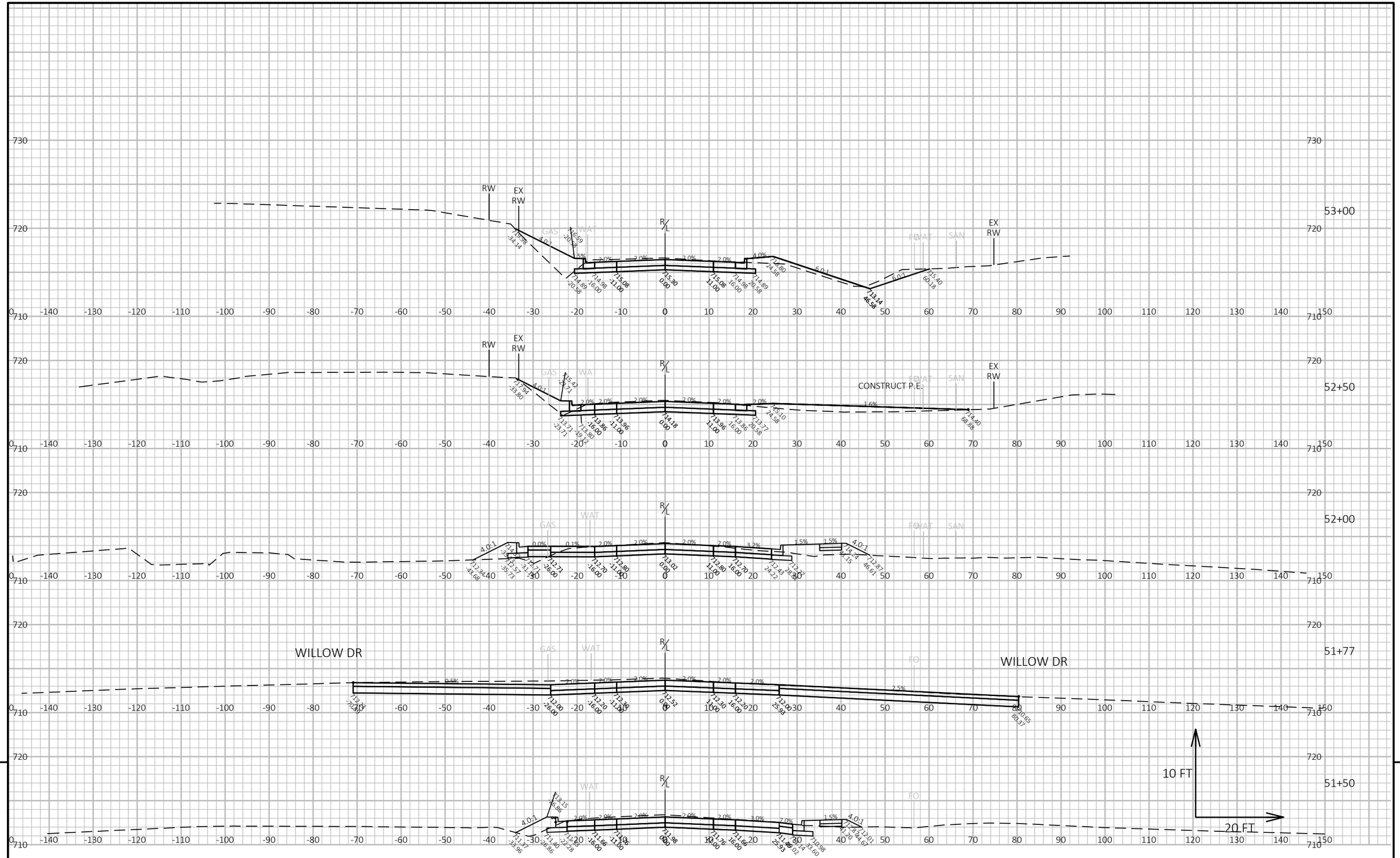
WISDOT/CADDS SHEET 49



PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 283 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 27
PLOT DATE : 10/27/2023 11:22 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

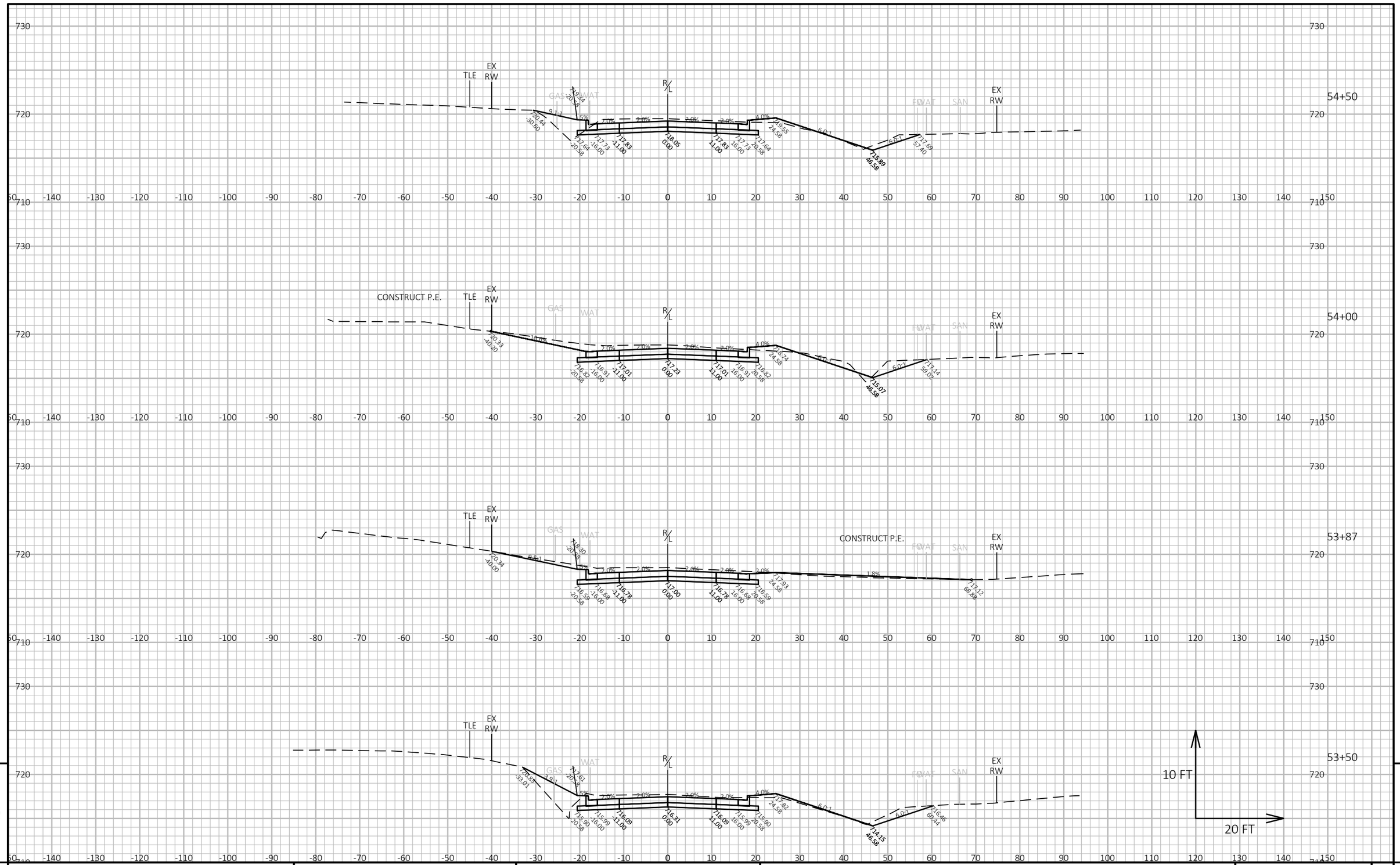
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 284	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 28

PLOT DATE : 10/27/2023 11:22 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

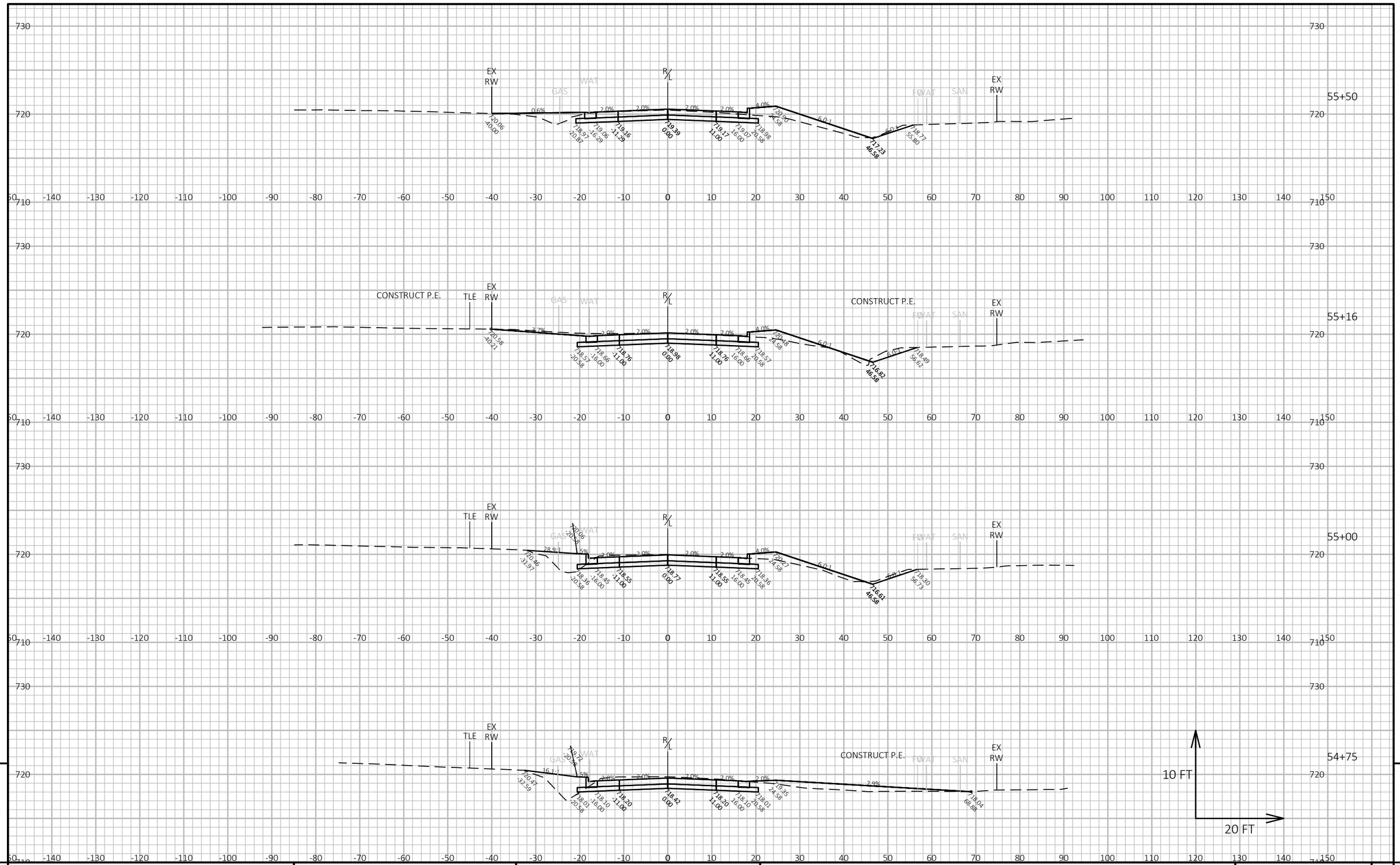
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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 285	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 29

PLOT DATE : 10/27/2023 11:22 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49

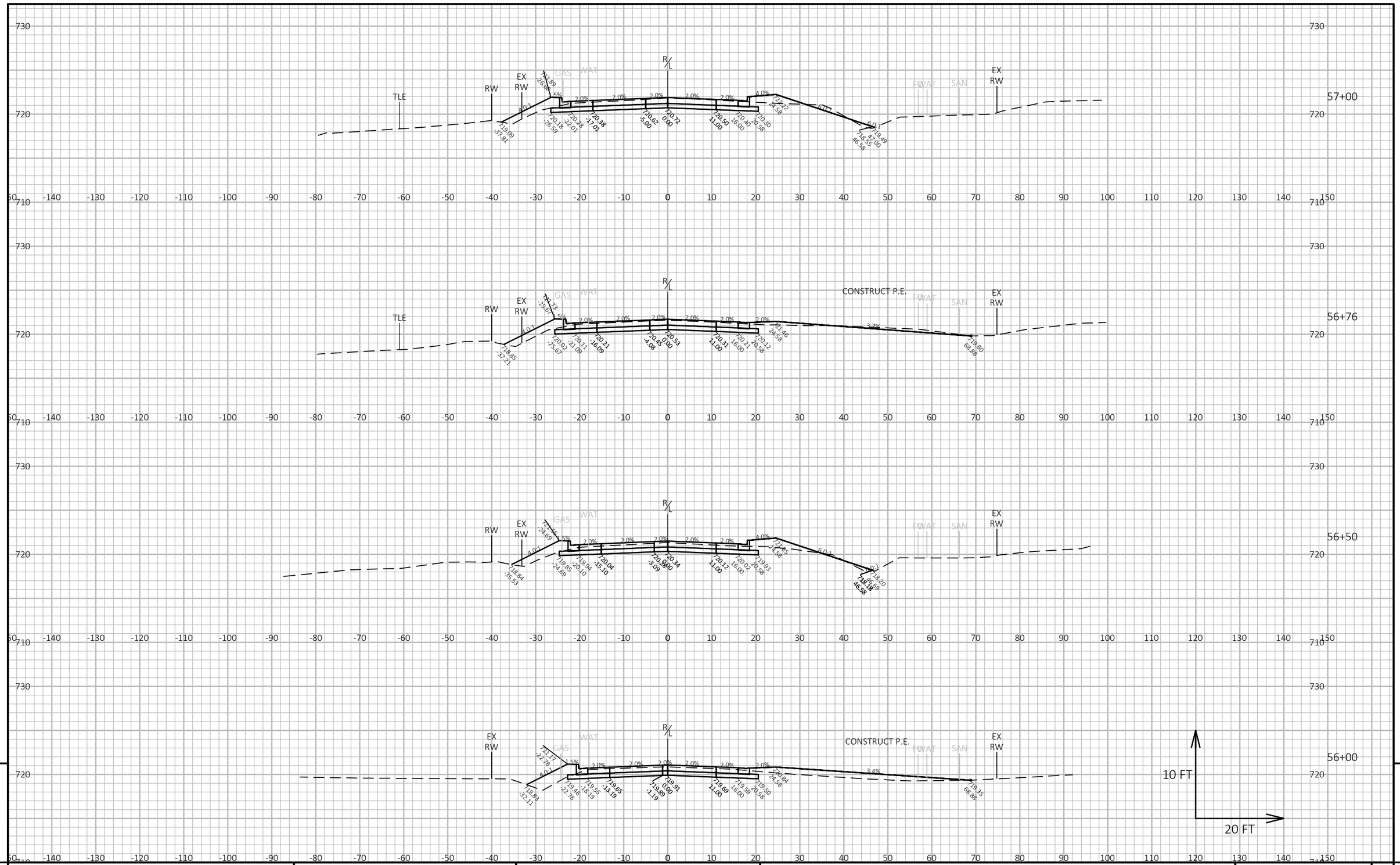


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 286	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 30

PLOT DATE : 10/27/2023 11:23 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49

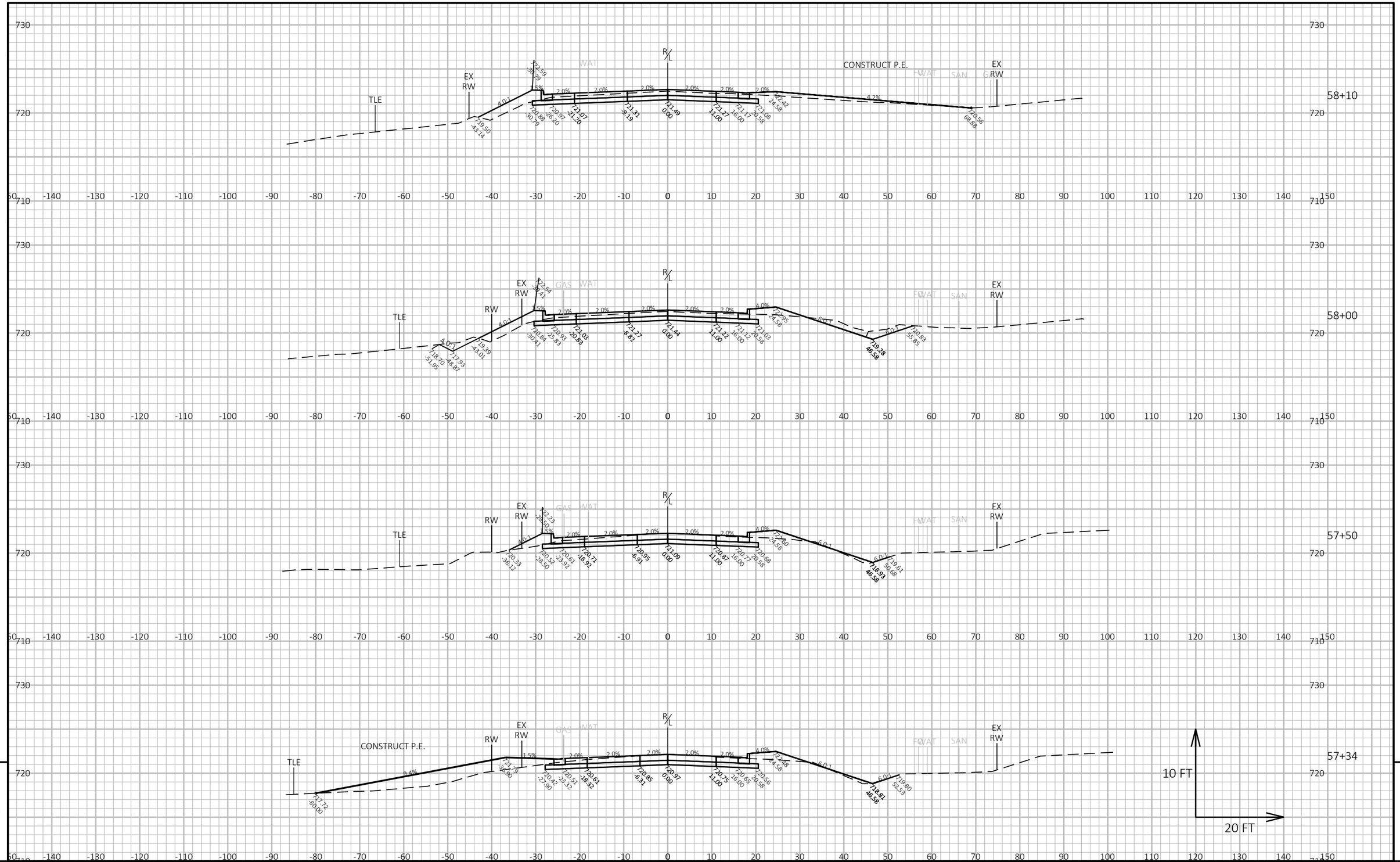


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 287 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 31

PLOT DATE : 10/27/2023 11:23 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49

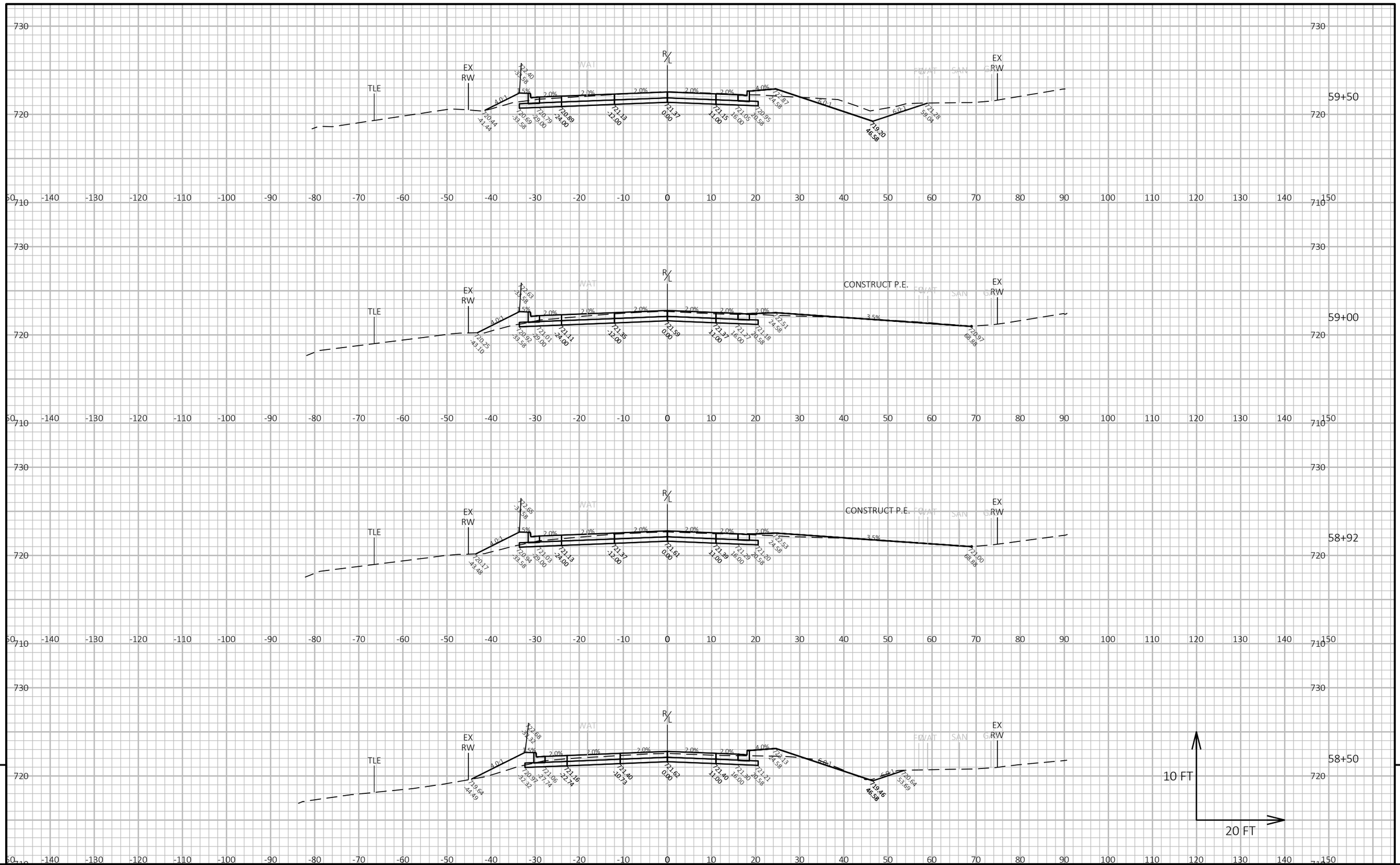


PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 288 E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 32

PLOT DATE : 10/27/2023 11:23 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

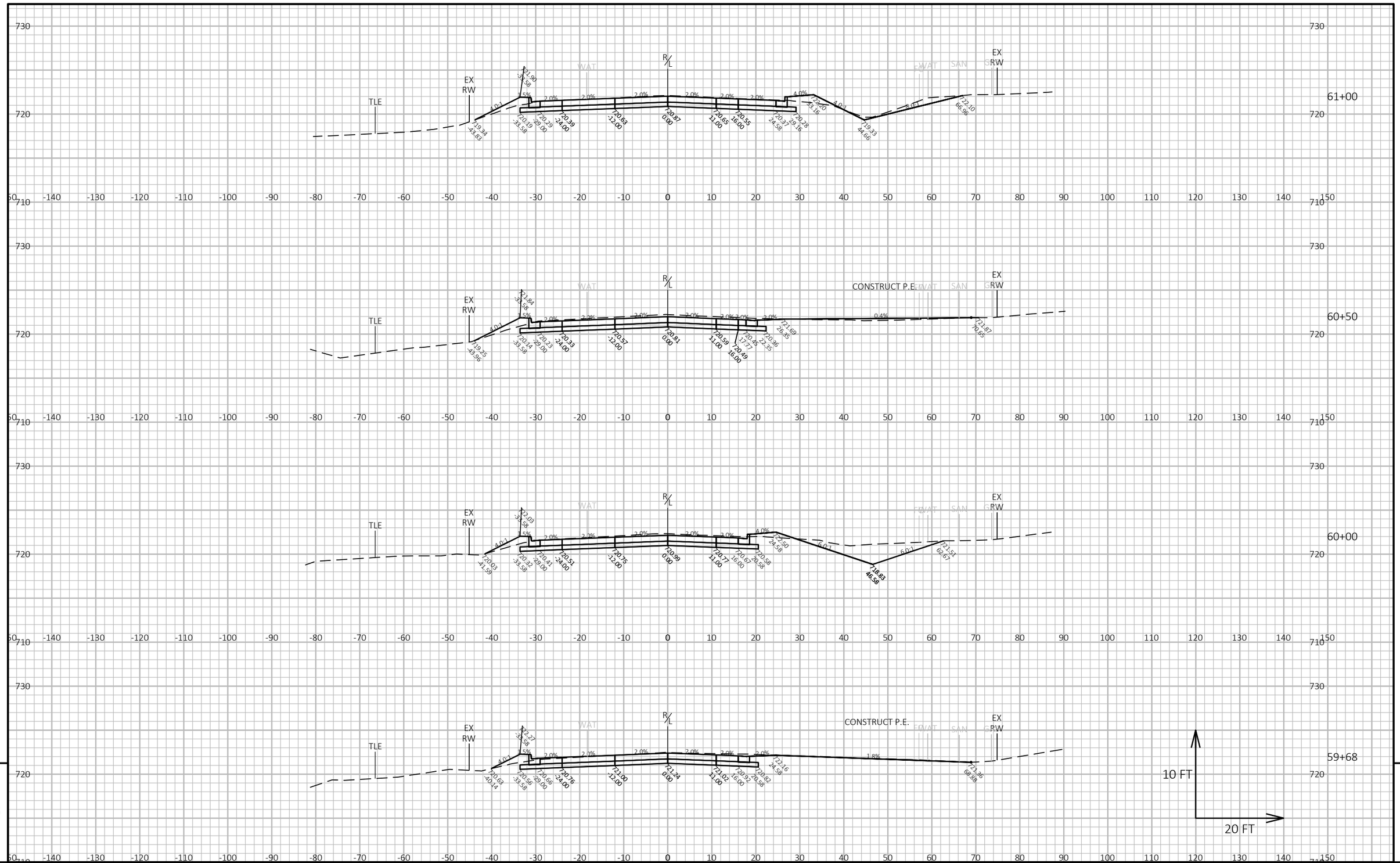
9

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 289	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 33

PLOT DATE : 10/27/2023 11:23 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



9

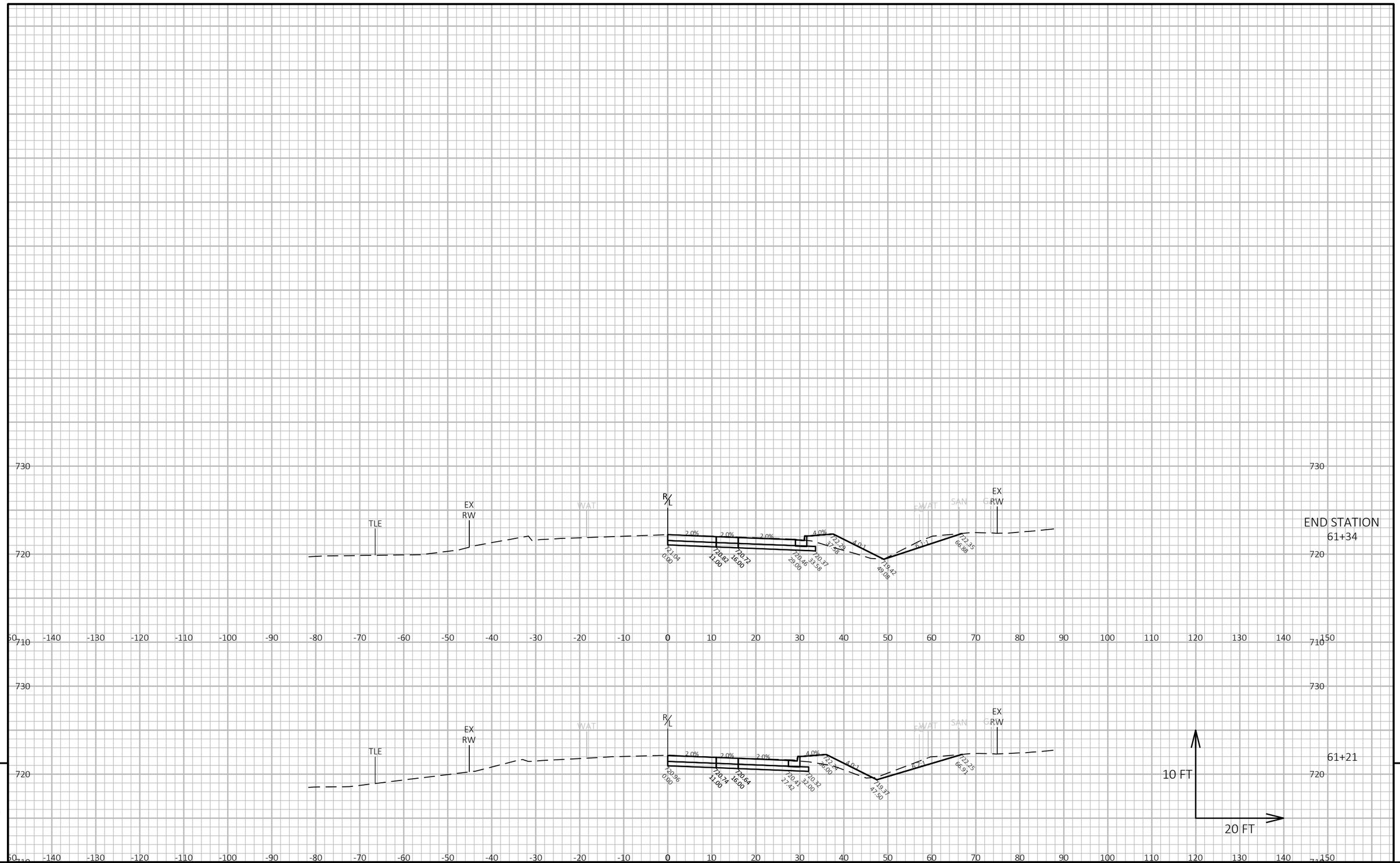
9

PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 290	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 34

PLOT DATE : 10/27/2023 11:23 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49



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PROJECT NO: 2505-03-71	HWY: CTH V	COUNTY: MILWAUKEE	CROSS SECTIONS: S. 13TH STREET	SHEET 291	E

FILE NAME : O:\HIGHWAY OPERATIONS CONTROL FILE\CENTRAL FILES\2010-2014\CTH V - S. 13TH ST\S 13TH ST.- PUETZ TO DREXEL- 2505-03-01,21,71\PLANS\25050371_XS_231027.DWG
LAYOUT NAME - 35

PLOT DATE : 10/27/2023 11:23 AM PLOT BY : HILLIARD, MARC PLOT NAME : PLOT SCALE : 1 IN:20 FT HORZ. / 1 IN:10 FT VERT.

WISDOT/CADDS SHEET 49

Wisconsin Department of Transportation

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