

PROJECT ID:  
WITH: N/A

ORDER OF SHEETS

Section No. 1	Title
Section No. 2	Typical Sections and Details (Includes Erosion Control Plan)
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 :

STATE OF WISCONSIN  
**WINNEBAGO COUNTY HIGHWAY DEPARTMENT**

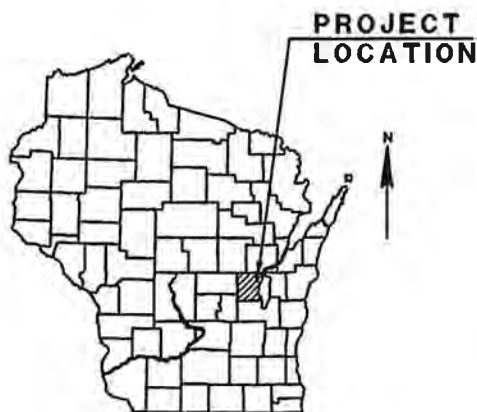
PLAN OF PROPOSED IMPROVEMENT

**CTH Y - CTH GG**

**CTH T**

**WINNEBAGO COUNTY**

*AS-BUILT PLANS*



**BEGIN PROJECT**  
 STA. 10+00  
 X=781056.697  
 Y=496228.691

**END PROJECT**  
 STA. 124+00  
 X=781016.657  
 Y=507621.194



DESIGN DESIGNATION

A.A.D.T. (2012)	= 1250
A.A.D.T. (2032)	= 1700
D.H.V. (2032)	= 213
D.D.	= 50/50
T.	= 2.5%
DESIGN SPEED	= 55 MPH (45 MPH, CTH Y - BROOKS RD)
ESALS	= 166,440

CONVENTIONAL SYMBOLS

**PLAN**

SAW CUT	XXXX
CORPORATE LIMITS	////
PROPERTY LINE	PL + 58.1
LOT LINE	-----
LIMITED HIGHWAY EASEMENT	- - - - -
EXISTING RIGHT OF WAY	=====
PROPOSED OR NEW R/W LINE	=====
SLOPE INTERCEPT	-----
REFERENCE LINE	-----
EXISTING CULVERT	-----
PROPOSED CULVERT (Box or Pipe)	-----
COMBUSTIBLE FLUIDS	CAUTION
MARSH AREA	-----
WOODED OR SHRUB AREA	-----

**PROFILE**

GRADE LINE	-----
ORIGINAL GROUND	-----
MARSH OR ROCK PROFILE (To be noted as such)	-----
SPECIAL DITCH	-----
GRADE ELEVATION	95.36
CULVERT (Profile View)	-----
<b>UTILITIES</b>	
ELECTRIC	E
FIBER OPTIC	FO
GAS	G
SANITARY SEWER	SAN
STORM SEWER	SS
TELEPHONE	T
WATER	W
UTILITY PEDESTAL	-----
POWER POLE	-----
TELEPHONE POLE	-----

LAYOUT  
 SCALE 0 1 MI.

TOTAL NET LENGTH OF CENTERLINE = 2.159 MI.

HORIZONTAL COORDINATES ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM (WCCS), WINNEBAGO COUNTY ZONE, NAD 83 (97) DATUM AND ARE GRID VALUES.

APPROVED FOR WINNEBAGO COUNTY  
 11/22/2011 John Mc. Hane  
 DATE COUNTY HIGHWAY COMMISSIONER

ORIGINAL PLANS PREPARED BY  
**AVRES ASSOCIATES**  
 PHILIP J. VERVILLE  
 E-36336 GREEN BAY, WI  
 PROFESSIONAL ENGINEER  
 DATE: 11/22/11

COUNTY: WINNEBAGO

## GENERAL NOTES

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

ALL DISTANCES ARE GROUND DISTANCE.

CURVE DATA IS BASED ON ARC DEFINITION.

BEARINGS SHOWN ON THIS PLAN ARE TRUE BEARINGS.

ALL TIES ON THIS PLAN ARE HORIZONTAL UNLESS DESCRIBED OTHERWISE.

PROPERTY LINES AS SHOWN ARE APPROXIMATE.

ELEVATIONS SHOWN ON THE ROADWAY CROSS SECTIONS ARE EARTH GRADE ELEVATIONS AT THE CENTERLINE OF THE ROADWAY.

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

INLET AND DISCHARGE ELEVATIONS FOR DRAINAGE STRUCTURES SHOWN ON THE PLAN SHEET ARE APPROXIMATE AND SHALL BE DETERMINED IN THE FIELD.

THE REMOVAL OF HMA PAVEMENT WILL BE PAID AS COMMON EXCAVATION UNLESS OVERLAID ON CONCRETE PAVEMENT OR OTHERWISE NOTED.

MEETING EXISTING PAVEMENT WITH NEW PAVEMENT SHALL BE PERFORMED WITH A BUTT JOINT. ALL BUTT JOINTS ARE TO BE SAW CUT.

WHEN THE QUANTITY OF BASE AGGREGATE DENSE 1 1/4-INCH AND 3/4-INCH MEASURED FOR PAYMENT BY THE TON, THE THICKNESS AS SHOWN ON THE PLAN IS APPROXIMATE AND THE ACTUAL THICKNESS WILL DEPEND ON THE DISTRIBUTION AS DIRECTED BY THE ENGINEER IN THE FIELD.

EXCAVATION BELOW SUBGRADE (E.B.S.) SHALL BE MEASURED AND PAID FOR AS EXCAVATION COMMON. THE EXACT LOCATION FOR E.B.S., AS REQUIRED, SHALL BE DETERMINED BY THE ENGINEER.

FILL EXPANSION FACTOR IS 30%.

REMOVE ALL CONCRETE PAVEMENT THROUGHOUT PROJECT LIMITS.

BOXOUTS WILL BE PROVIDED IN COLORED CONCRETE SIDEWALK BY THE CONTRACTOR FOR SIGN PLACEMENT. THE COST OF THE BOXOUTS WILL BE INCIDENTAL TO CONCRETE SIDEWALK.

PRIOR TO ORDERING DRAINAGE PIPES, THE CONTRACTOR WILL VERIFY RELATED DRAINAGE INFORMATION IN THE PLAN WITH THE ENGINEER IN THE FIELD.

CURB AND GUTTER ELEVATIONS ARE ALONG THE FLANGE LINE UNLESS OTHERWISE NOTED.

RADIUS POINTS UNLESS OTHERWISE NOTES ARE TO THE FLANGE OF THE CURB.

THE EXACT LOCATION AND WIDTH OF ENTRANCES WILL BE DETERMINED IN BY THE ENGINEER IN THE FIELD.

DRIVEWAYS ARE TO BE REPLACED IN KIND.

EROSION CONTROL MEASURES WILL BE PLACED AS SHOWN ON THE EROSION CONTROL PLAN. THE EXACT LOCATIONS WILL BE DETERMINED BY THE ENGINEER IN THE FIELD.

MAINTAIN DRIVING SURFACE TO ALL PROPERTY OWNERS WITH BASE AGGREGATE DENSE 1 1/4-INCH. THE CONTRACTOR IS RESPONSIBLE FOR PROTECTING MOTORISTS AND PEDESTRIANS THAT MAY ENTER THE WORK ZONE.

## UTILITIES

### WISCONSIN PUBLIC SERVICE CORP-ELECTRIC

P.O. BOX 19001  
GREEN BAY, WI 54307  
ATTENTION: MR. DAVE PETERSON  
TELEPHONE 920-236-5910

### WISCONSIN PUBLIC SERVICE CORP-GAS

P.O. BOX 19001  
GREEN BAY, WI 54307  
ATTENTION: MR. PAUL SPANGLER  
TELEPHONE 920-236-5908

### TIME WARNER CABLE

3520 DESTINATION DRIVE  
APPLETON, WI 54915  
ATTENTION: MR. VINCE ALBIN  
TELEPHONE 920-831-9249  
TELEPHONE 920-749-1154

### AT&T

70 EAST DIVISION STREET  
FOND DU LAC, WI 54935  
ATTENTION: MR. CHARLES BARTLETT  
TELEPHONE 920-929-1013



Call 811 3 Work Days Before You Dig  
or Toll Free (800) 242-8511  
Hearing Impaired TDD (800) 542-2289  
[www.DiggersHotline.com](http://www.DiggersHotline.com)

## DESIGN CONTACT

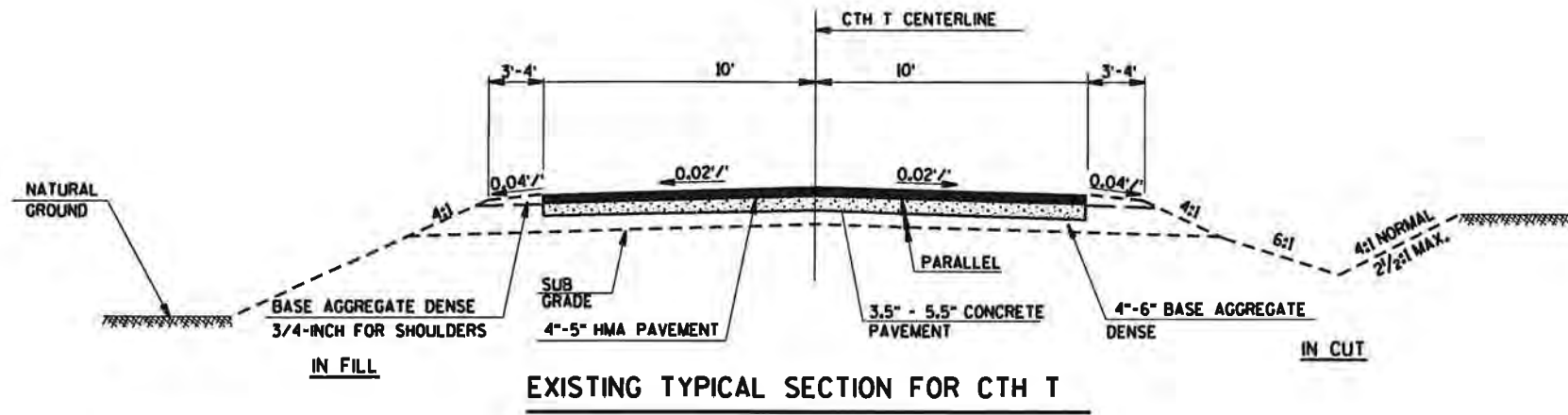
### AYRES ASSOCIATES

3376 PACKERLAND DRIVE  
DE PERE, WISCONSIN 54115  
ATTENTION: PHIL VERVILLE III  
E-MAIL: [VERVILLEP@AYRESASSOCIATES.COM](mailto:VERVILLEP@AYRESASSOCIATES.COM)

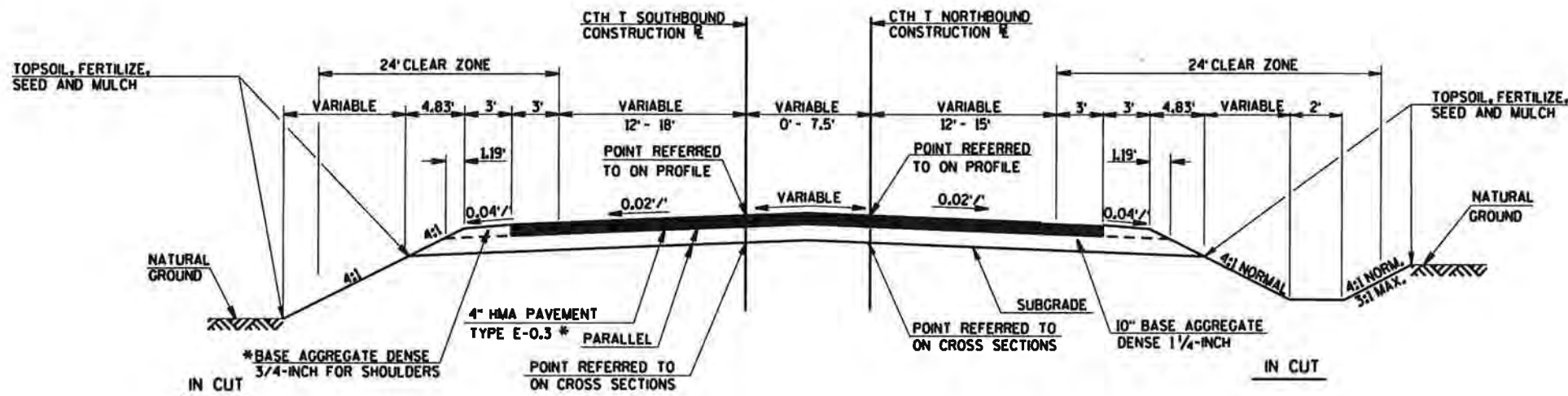
TELEPHONE 920-498-1200

## STANDARD ABBREVIATIONS

ADT	AVERAGE DAILY TRAFFIC	PC	POINT OF CURVATURE
AC	ASPHALT CEMENT	PI	POINT OF INTERSECTION
AGG	AGGREGATE	PE	PRIVATE ENTRANCE
ASPH	ASPHALT	R	RADIUS
BM	BENCH MARK	REM	REMOVE
C/L	CENTERLINE	R/L OR RL	REFERENCE LINE
CONC	CONCRETE	RCCP	REINFORCED CONCRETE CULVERT PIPE
CMP	CORRUGATED METAL PIPE	RCPSS	REINFORCED CONCRETE PIPE STORM SEWER
CR.	CREEK	R.O.	RUNOUT
D	DEGREE OF CURVE	R/W	RIGHT-OF-WAY
DHV	DESIGN HOUR VOLUME	STA	STATION
ESALS	EQUIVALENT SINGLE AXIS LOADS	SE	SUPER ELEVATION
EXIST	EXISTING	SS	STORM SEWER
FE	FIELD ENTRANCE	T	TANGENT
HYD	HYDRANT	TEL	TELEPHONE
IP	IRON PIPE OR PIN	TLE	TEMPORARY LIMITED EASEMENT
L	LENGTH OF CURVE	T	TRUCKS
LC	LONG CHORD OF CURVE	VC	VERTICAL CURVE
MH	MANHOLE	W	WELL
NC	NORMAL CROWN		

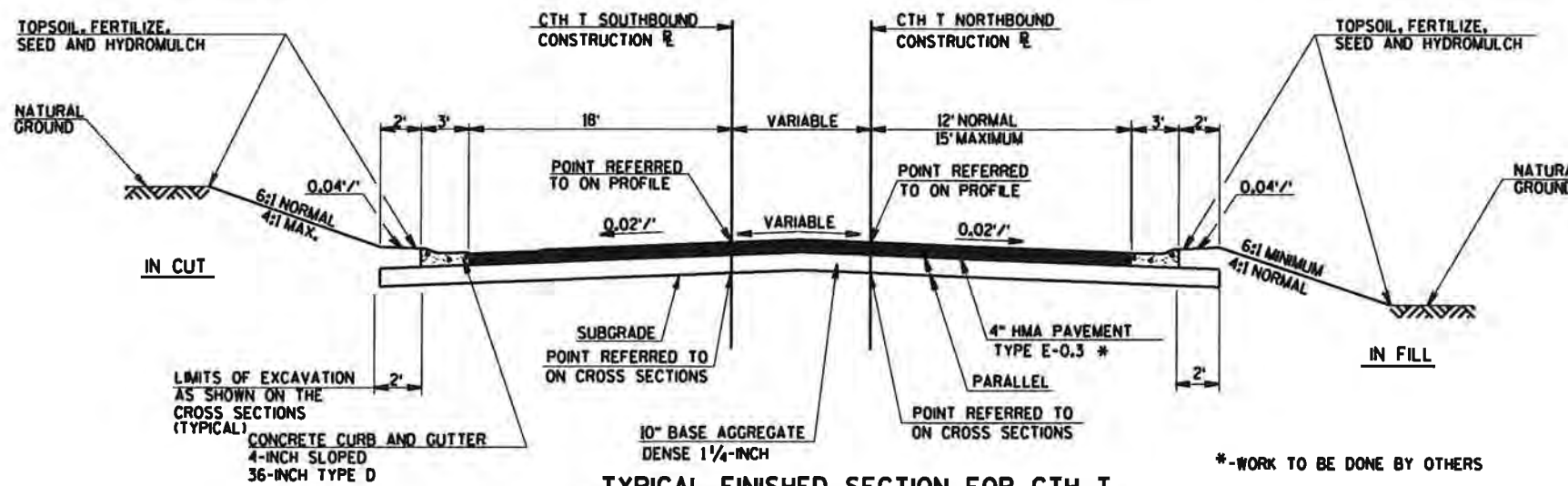


EXISTING TYPICAL SECTION FOR CTH T



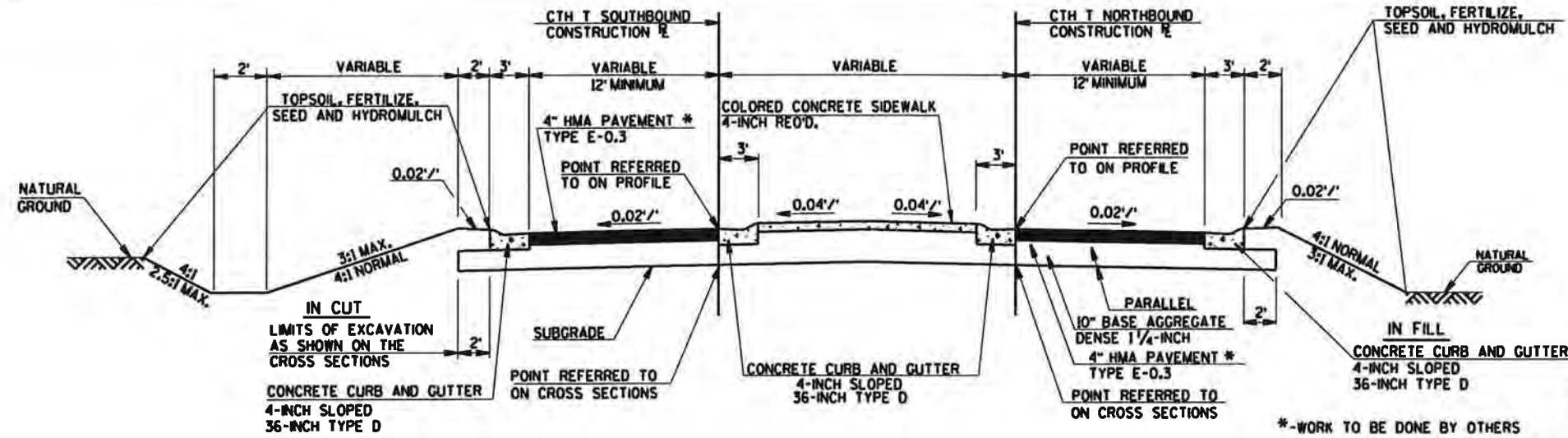
TYPICAL FINISHED SECTION FOR CTH T  
STA. 10+00.00 - STA. 12+00.00 CTH T NORTHBOUND CONSTRUCTION

\*-WORK TO BE DONE BY OTHERS

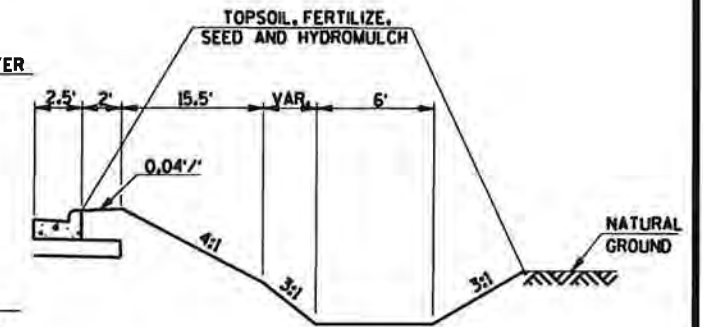


TYPICAL FINISHED SECTION FOR CTH T  
STA. 12+00.00 - STA. 12+73.7 CTH T NORTHBOUND CONSTRUCTION

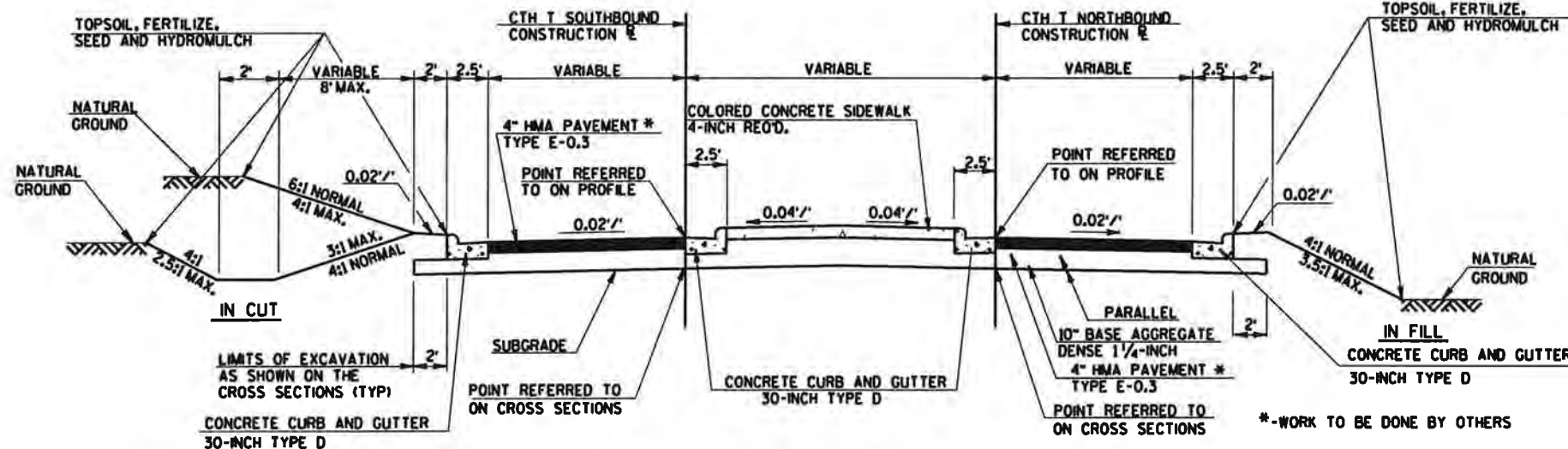
\*-WORK TO BE DONE BY OTHERS



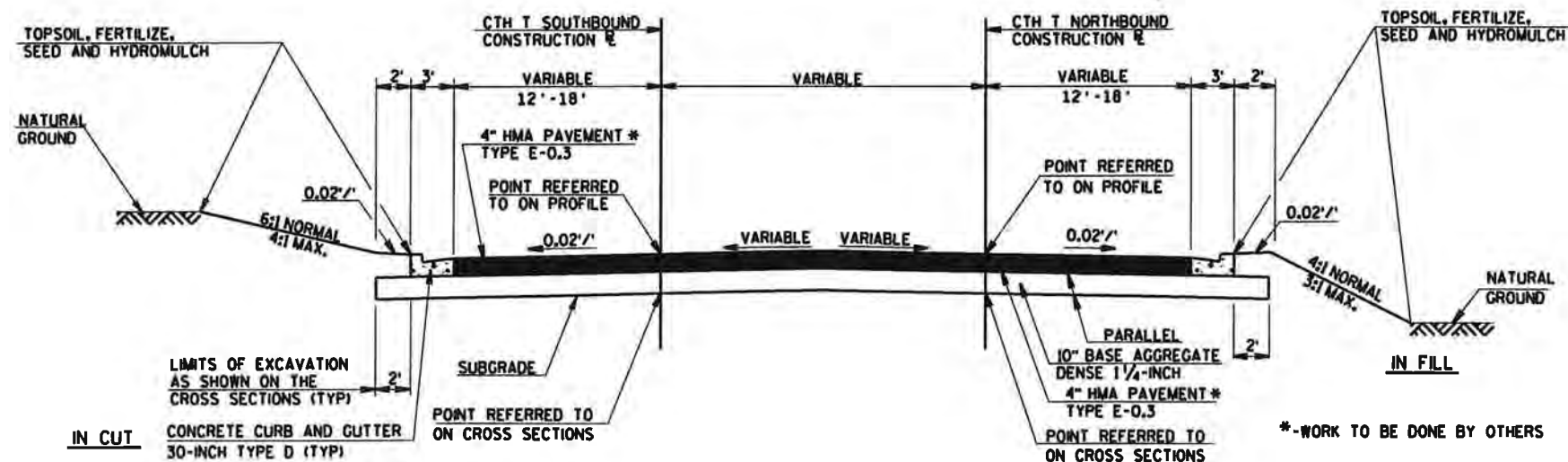
**TYPICAL FINISHED SECTION FOR CTH T**  
 STA. 12+73.7 - STA. 15+01.13 CTH T NORTHBOUND CONSTRUCTION



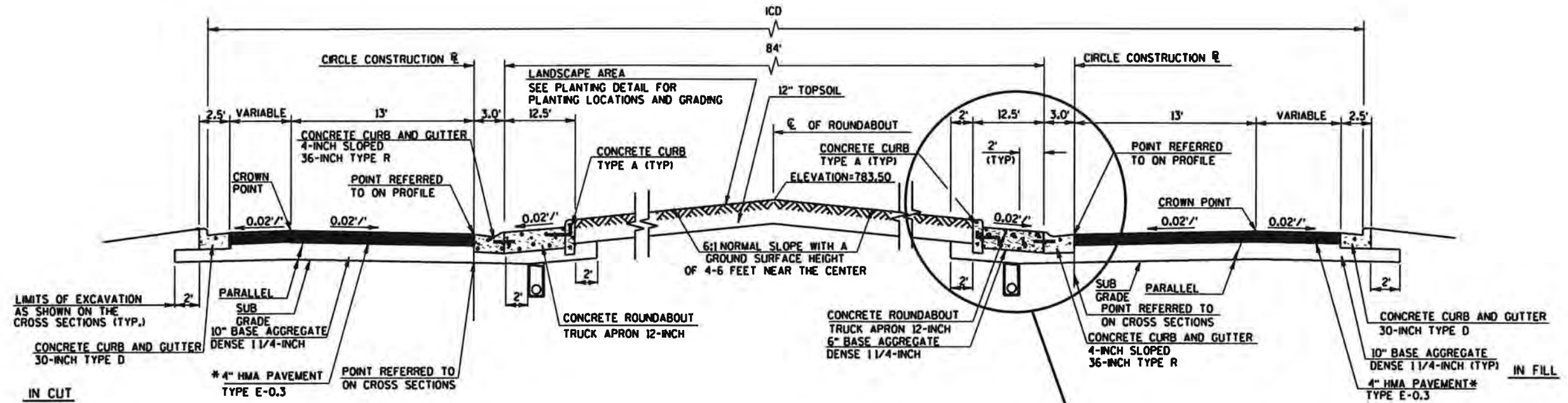
**TYPICAL DITCH CONSTRUCTION FOR CTH T**  
 STA. 14+50 - STA. 16+01.13 RT.  
 STA. 15+00 LT.



**TYPICAL FINISHED SECTION FOR CTH T**  
 STA. 15+01.13 - STA. 16+01.13 CTH T NORTHBOUND CONSTRUCTION  
 STA. 17+36.17 - STA. 19+87.00 CTH T NORTHBOUND CONSTRUCTION

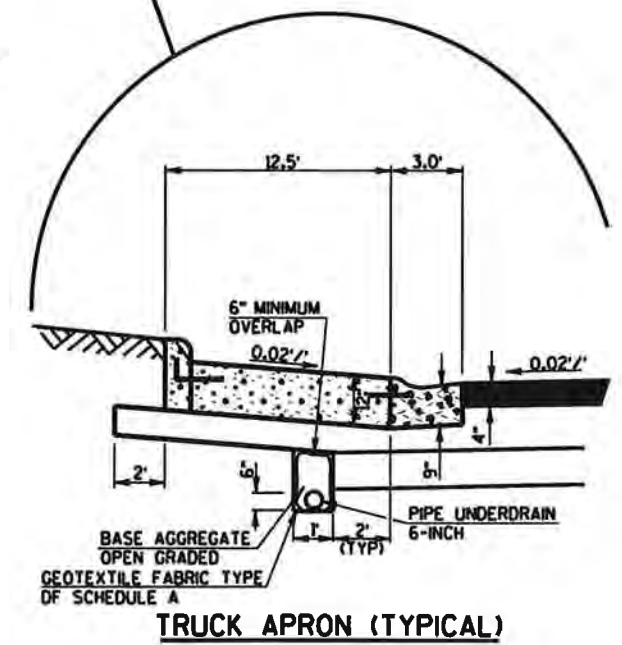


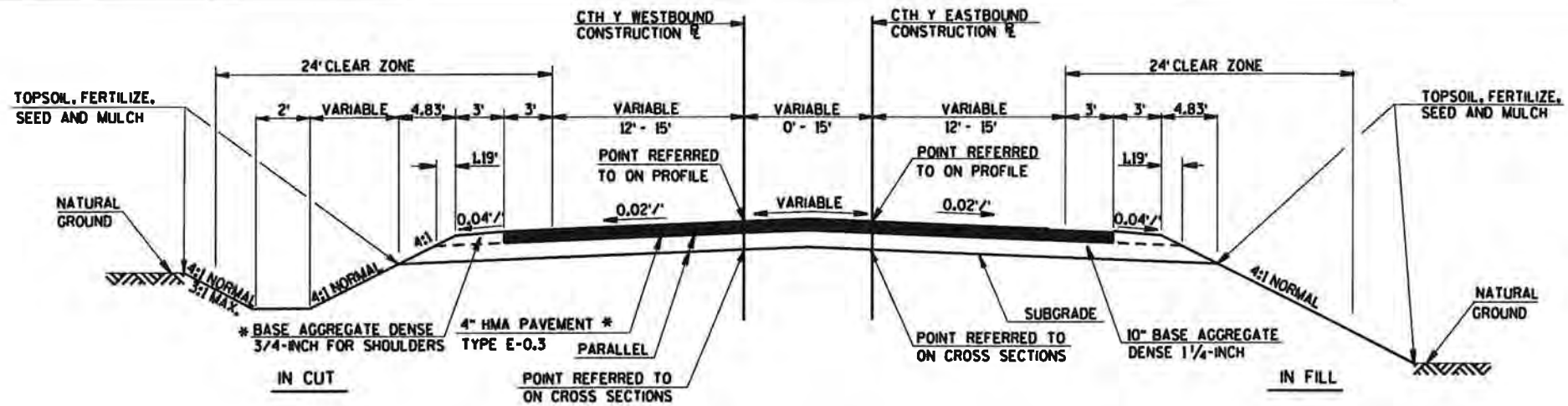
**TYPICAL FINISHED SECTION FOR CTH T**  
 STA. 19+87.00 - STA. 22+06.41 CTH T NORTHBOUND CONSTRUCTION



**TYPICAL FINISHED SECTION FOR CTH T**  
 ROUNDABOUT DETAIL

\*-WORK TO BE DONE BY OTHERS

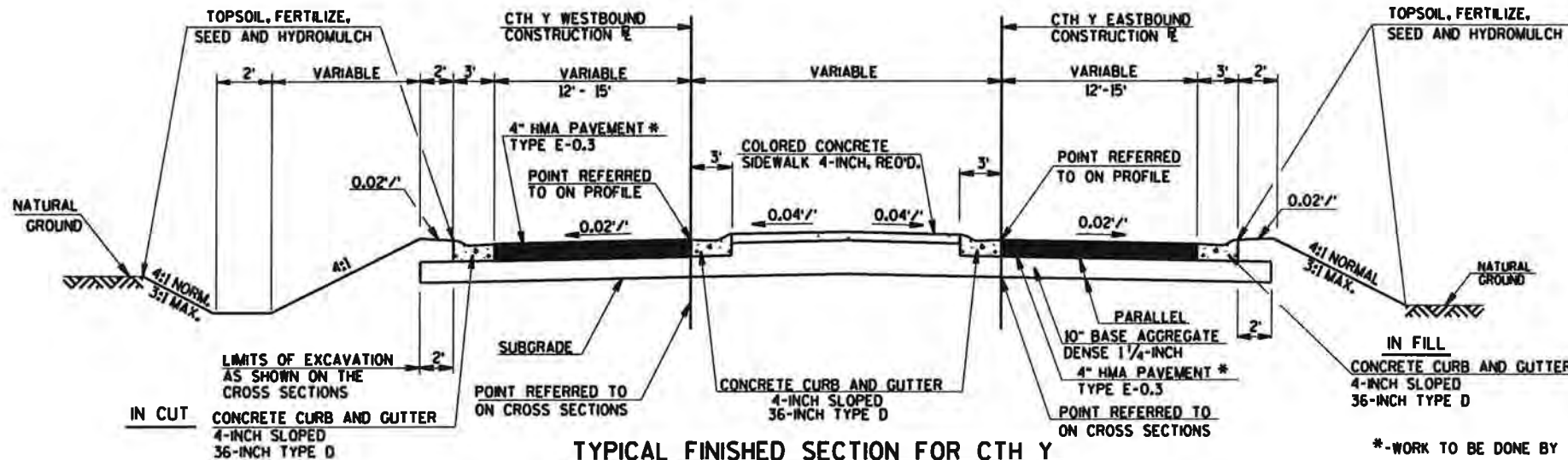




TYPICAL FINISHED SECTION FOR CTH Y

STA. 201+25.00 - STA. 204+29.90 CTH Y EASTBOUND CONSTRUCTION  
STA. 210+59.10 - STA. 213+00.00 CTH Y EASTBOUND CONSTRUCTION

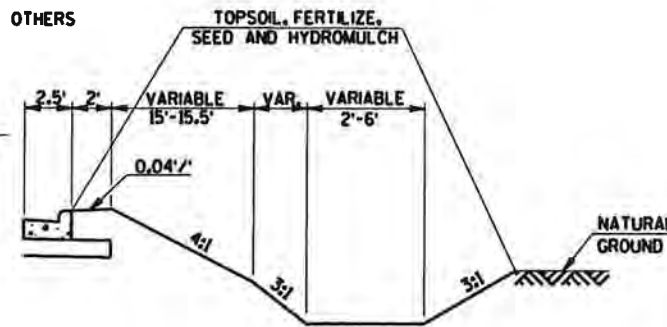
\*-WORK TO BE DONE BY OTHERS



TYPICAL FINISHED SECTION FOR CTH Y

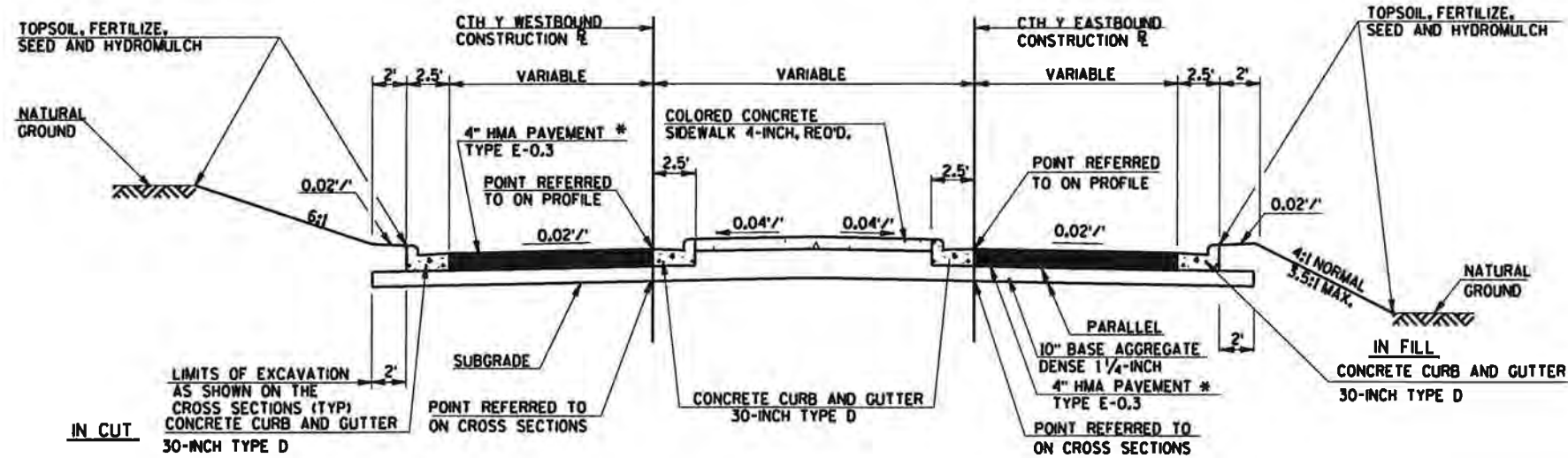
STA. 204+29.90 - STA. 206+18.46 CTH Y EASTBOUND CONSTRUCTION  
STA. 209+53.75 - STA. 210+59.10 CTH Y EASTBOUND CONSTRUCTION

\*-WORK TO BE DONE BY OTHERS



TYPICAL DITCH CONSTRUCTION FOR CTH Y

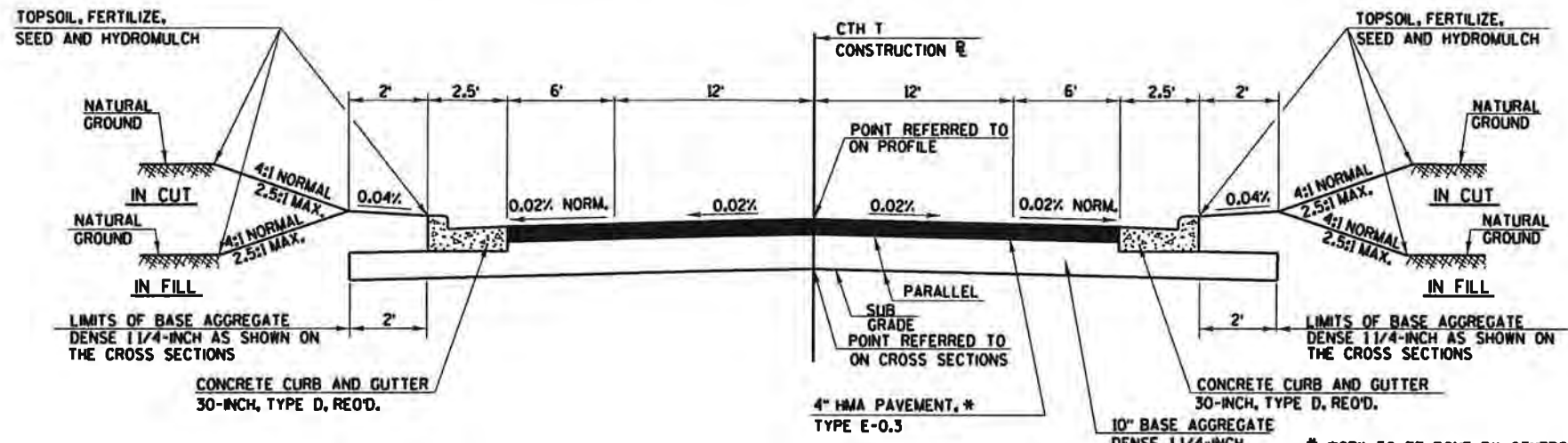
STA. 205+50 - STA. 206+25 RT. (10' WIDE-SEE CROSS SECTIONS)  
STA. 208+53 - STA. 208+75 RT. (6' WIDE-SEE CROSS SECTIONS)



TYPICAL FINISHED SECTION FOR CTH Y

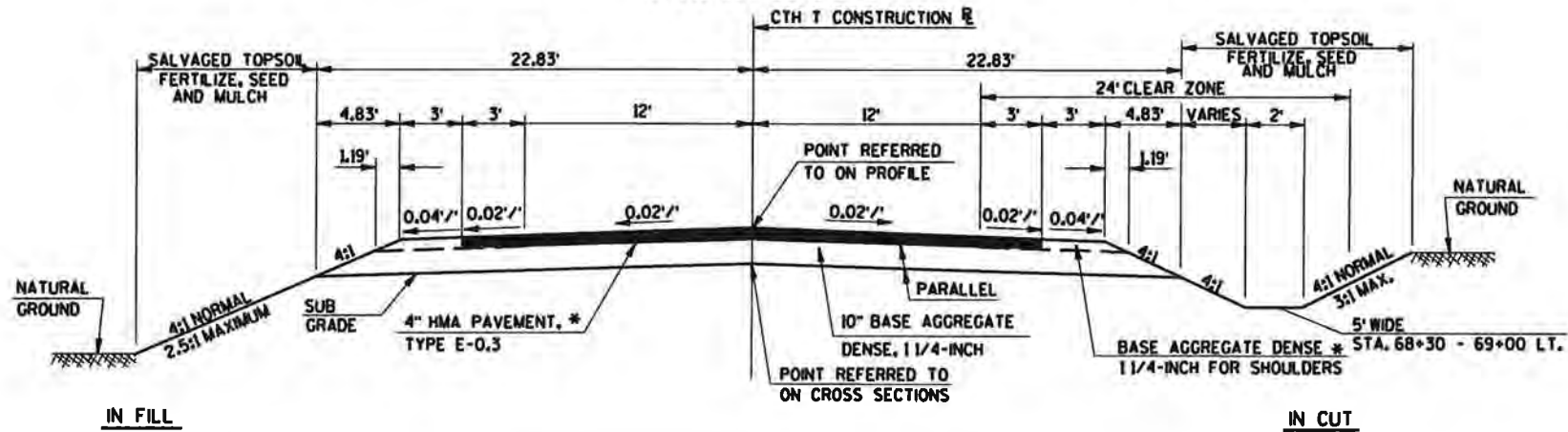
STA. 206+18.46 - STA. 207+18.46 CTH Y EASTBOUND CONSTRUCTION  
STA. 208+56.75 - STA. 209+56.75 CTH Y EASTBOUND CONSTRUCTION

\*-WORK TO BE DONE BY OTHERS



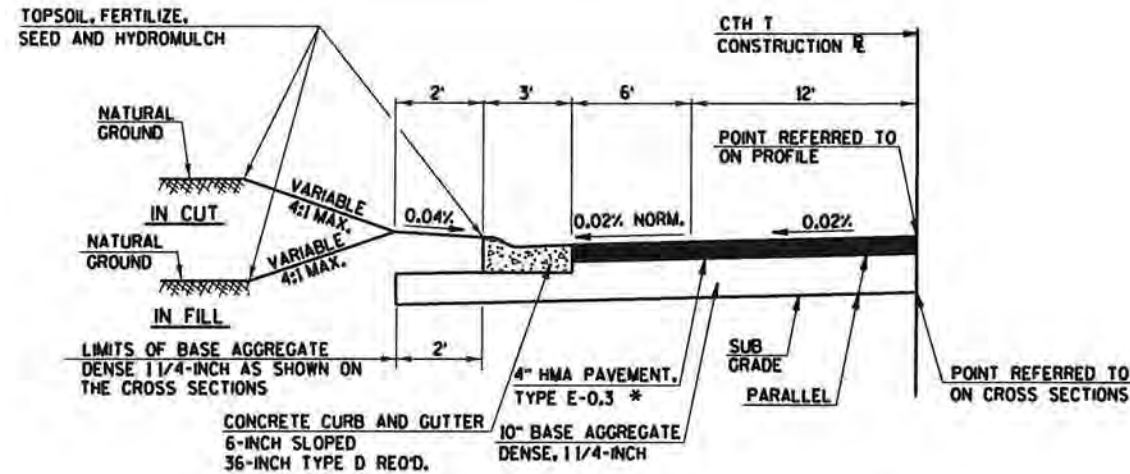
**TYPICAL FINISHED SECTION FOR CTH T**

STA. 22+06.41 - STA. 48+50



**TYPICAL FINISHED SECTION FOR CTH T**

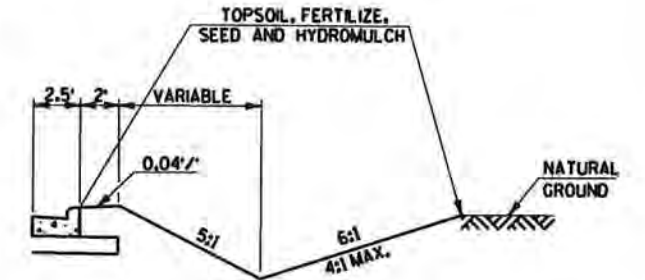
STA. 48+50 - STA. 125+00



**1/2 TYPICAL FINISHED SECTION FOR CTH T**

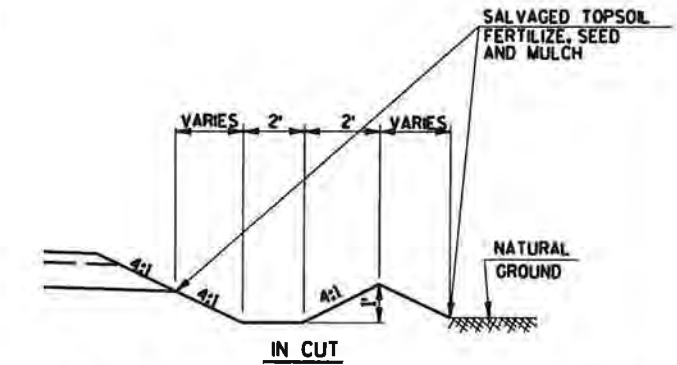
STA. 65+80 - STA. 73+00 CTH T LT.  
 STA. 67+50 - STA. 71+50 CTH T RT.  
 STA. 99+70 - STA. 103+20 CTH T RT.  
 STA. 110+00 - STA. 114+00 CTH T LT.  
 STA. 119+40 - STA. 123+57.73 CTH T LT.  
 STA. 598+25 - STA. 600+79.40 CTH GG RT.  
 STA. 599+22.40 - STA. 601+40 CTH GG LT.

\*-WORK TO BE DONE BY OTHERS



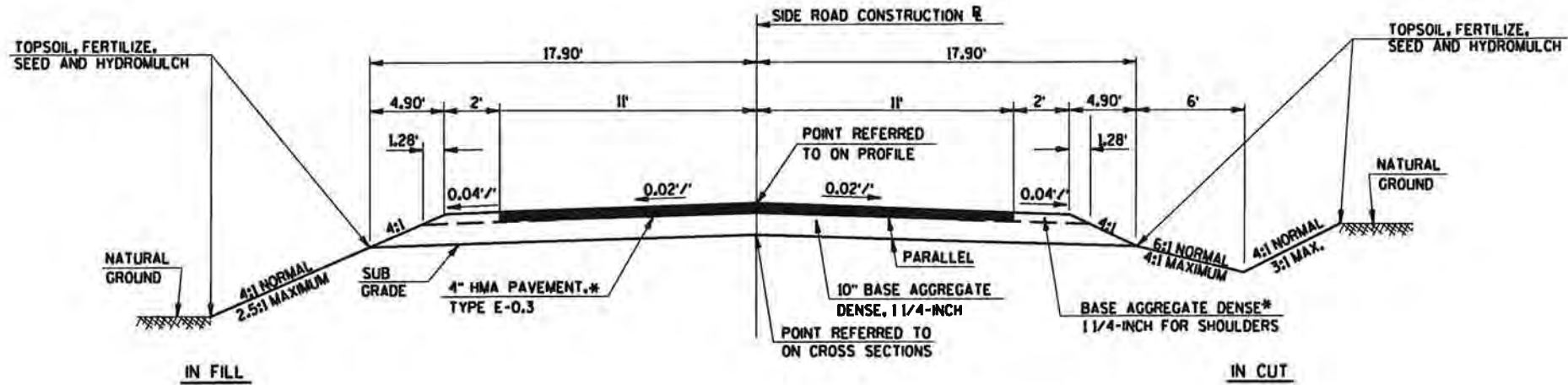
**TYPICAL DITCH CONSTRUCTION FOR CTH T**

STA. 23+25 - STA. 23+50 RT.  
 STA. 24+40 - STA. 25+00 RT.  
 (SEE CROSS SECTIONS)



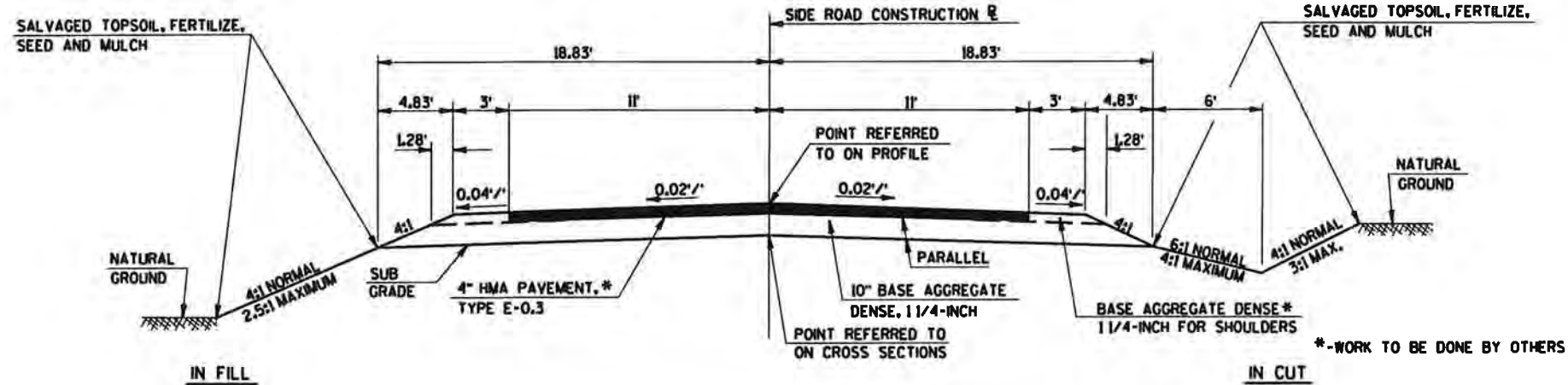
**TYPICAL DITCH CONSTRUCTION FOR CTH T**

STA. 85+00 - STA. 86+00  
 (SEE CROSS SECTIONS)



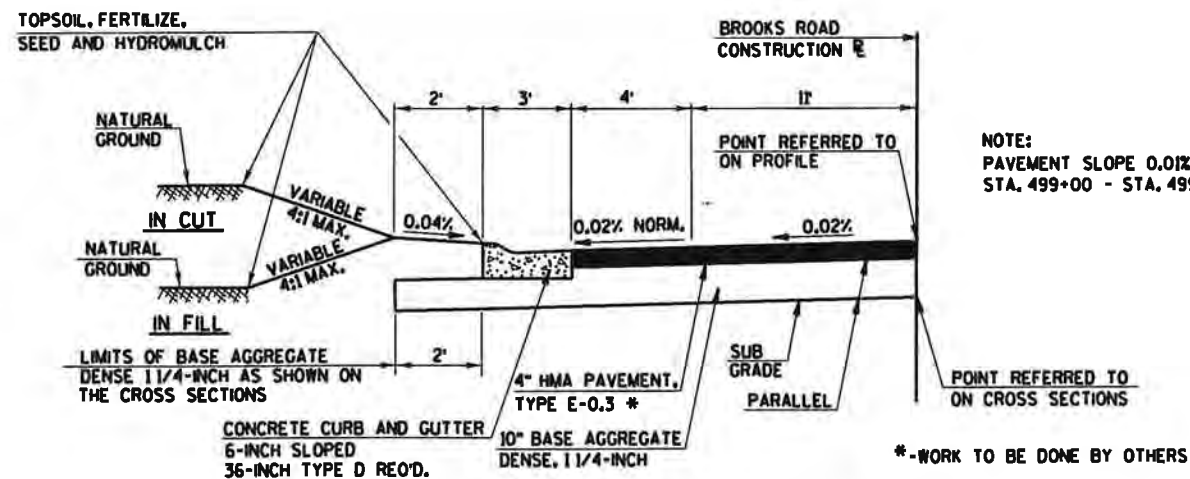
TYPICAL FINISHED SECTION FOR SIDE ROADS

RICHARDS AVE.  
ROBERTS AVE.  
SKY RANCH AVE.



TYPICAL FINISHED SECTION FOR SIDE ROADS

CTH GG  
BROOKS ROAD

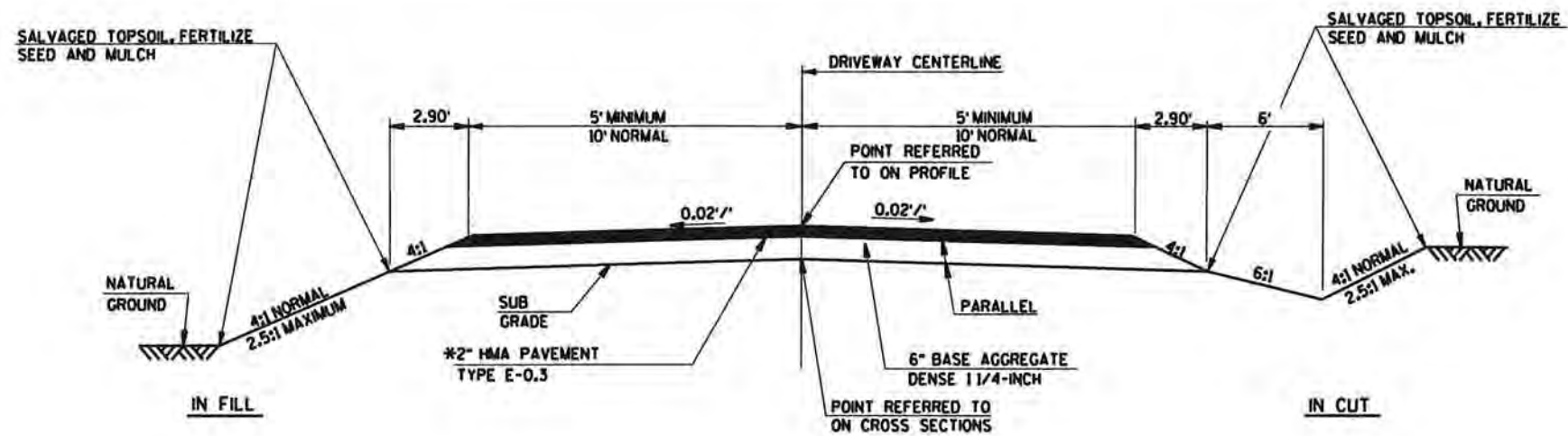


1/2 TYPICAL FINISHED SECTION FOR BROOKS ROAD

STA. 496+50 - STA. 501+50 LT.  
STA. 499+31.07 - STA. 501+80 RT.

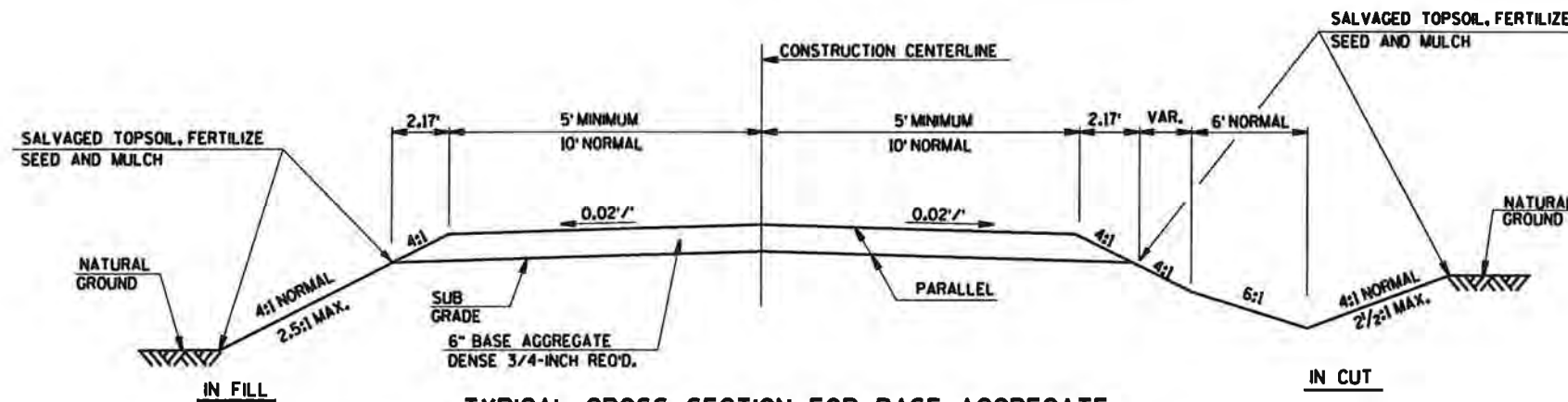
NOTE:  
PAVEMENT SLOPE 0.01% FROM  
STA. 499+00 - STA. 499+50 LT.



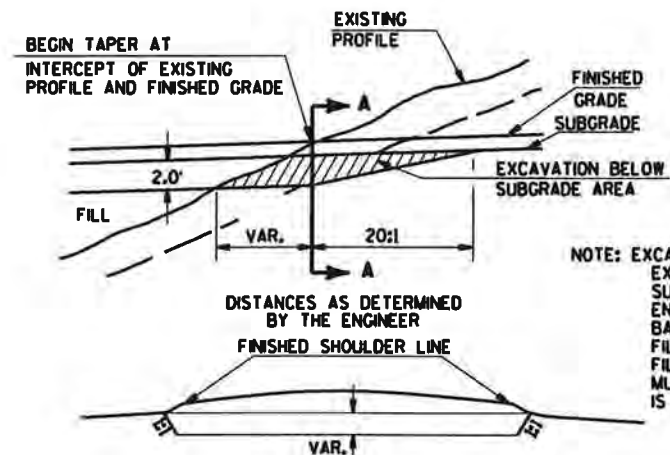


**TYPICAL FINISHED SECTION FOR HMA PAVEMENT DRIVEWAY**  
(REPLACE IN KIND)

\*-WORK TO BE DONE BY OTHERS

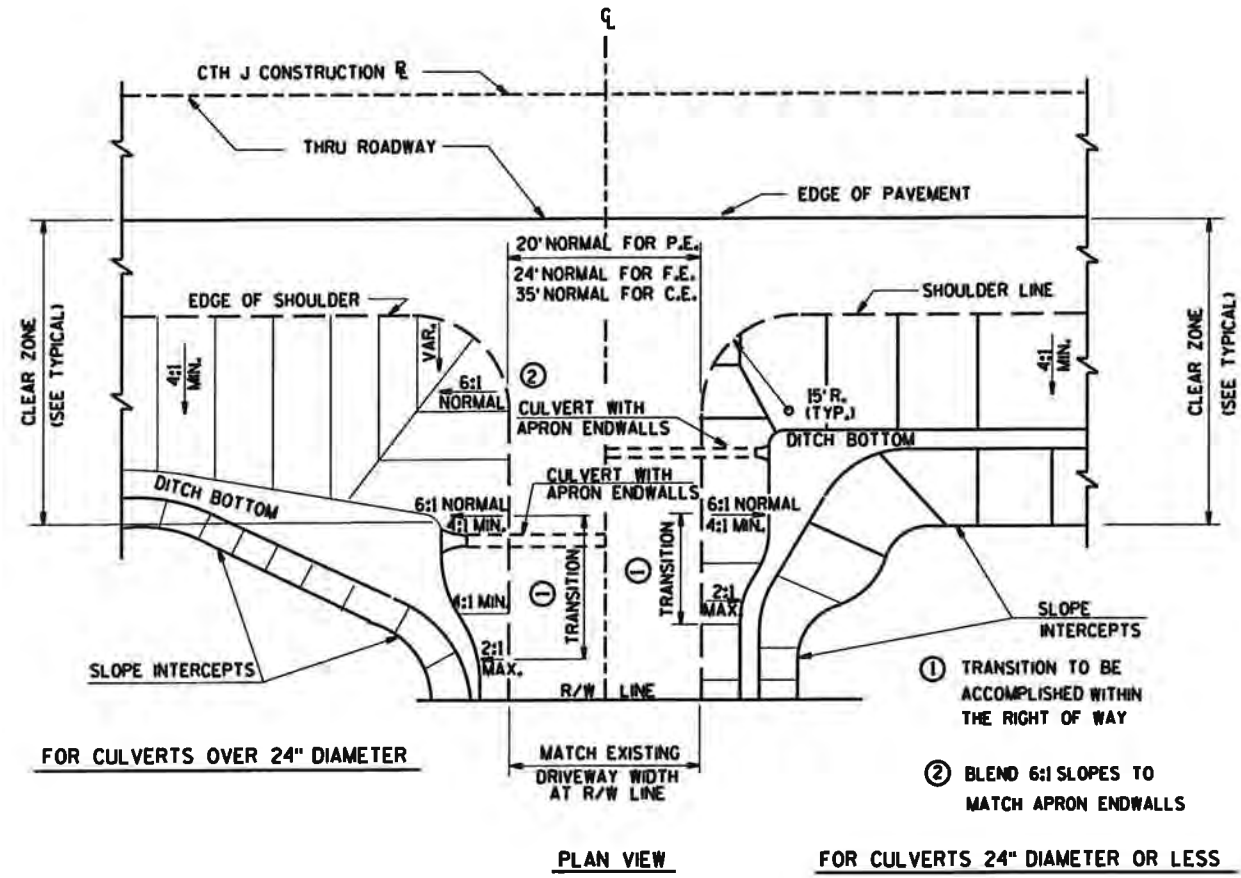


**TYPICAL CROSS SECTION FOR BASE AGGREGATE DENSE PRIVATE ENTRANCES AND FIELD ENTRANCES**  
(REPLACE IN KIND)

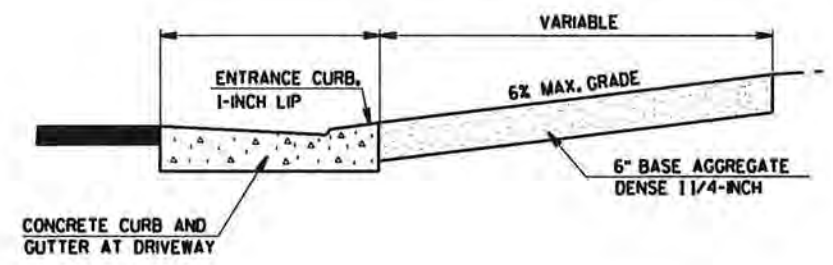


NOTE: EXCAVATE BELOW SUBGRADE ALL MOUTHS OF CUTS. EXACT LOCATIONS AND EXTENT OF EXCAVATION BELOW SUBGRADE (E.B.S.) SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD. E.B.S. AREA TO BE BACKFILLED MUST BE HOMOGENEOUS WITH ADJOINING FILL MATERIAL ACCEPTABLE TO THE ENGINEER. THE FILL WITHIN 100' OF THE MOUTH OF THE CUT MUST BE KEPT 2' BELOW SUBGRADE UNTIL E.B.S. IS COMPLETED.

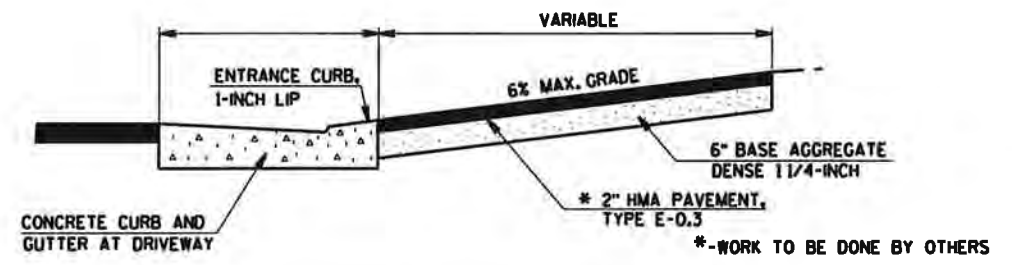
**SECTION A-A CROSS SECTION SHOWING UNDERCUT**  
**DETAIL FOR EXCAVATION BELOW SUBGRADE AT CUTS**



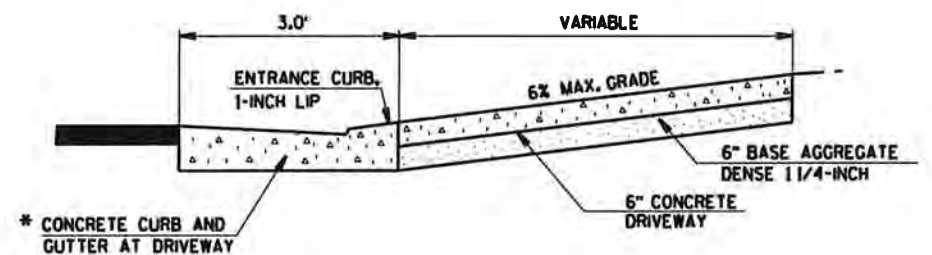
PRIVATE ENTRANCE GRADING DETAIL



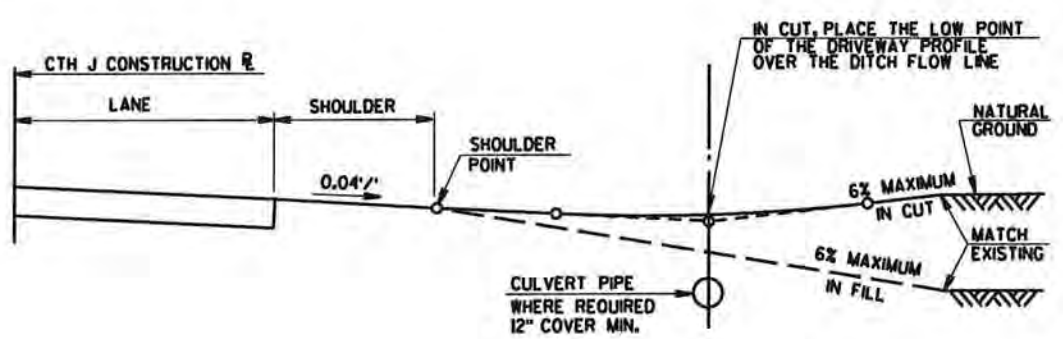
TYPICAL LONGITUDINAL SECTION AT BASE AGGREGATE DENSE PRIVATE ENTRANCE (REPLACE IN KIND)



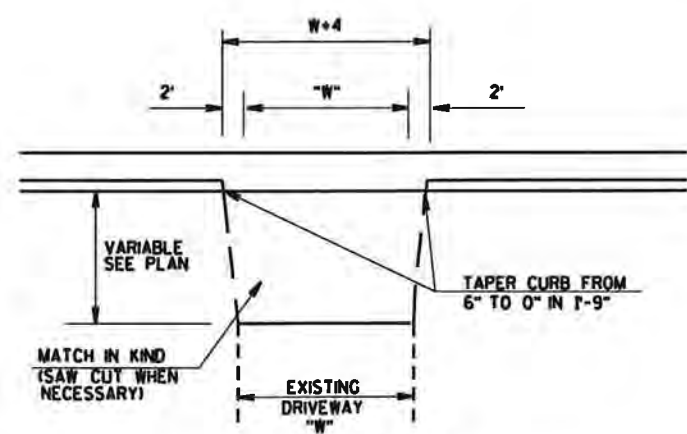
TYPICAL LONGITUDINAL SECTION AT HMA PAVED PRIVATE ENTRANCES (REPLACE IN KIND)



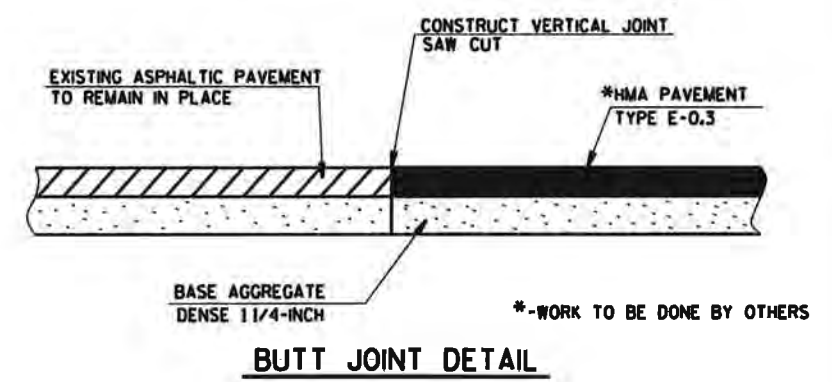
TYPICAL LONGITUDINAL SECTION AT CONCRETE DRIVEWAY (REPLACE IN KIND)



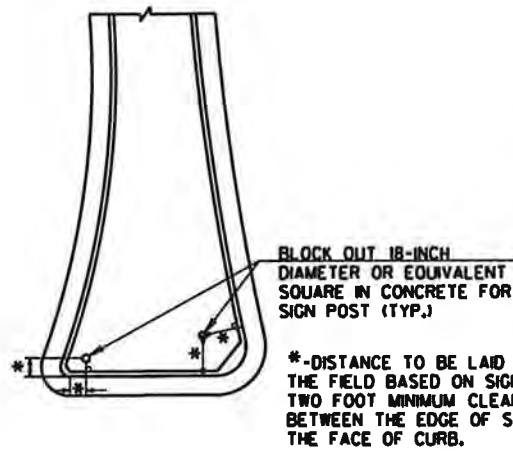
TYPICAL DRIVEWAY PROFILES



CURB CUT DETAIL FOR P.E.'s AND F.E.'s

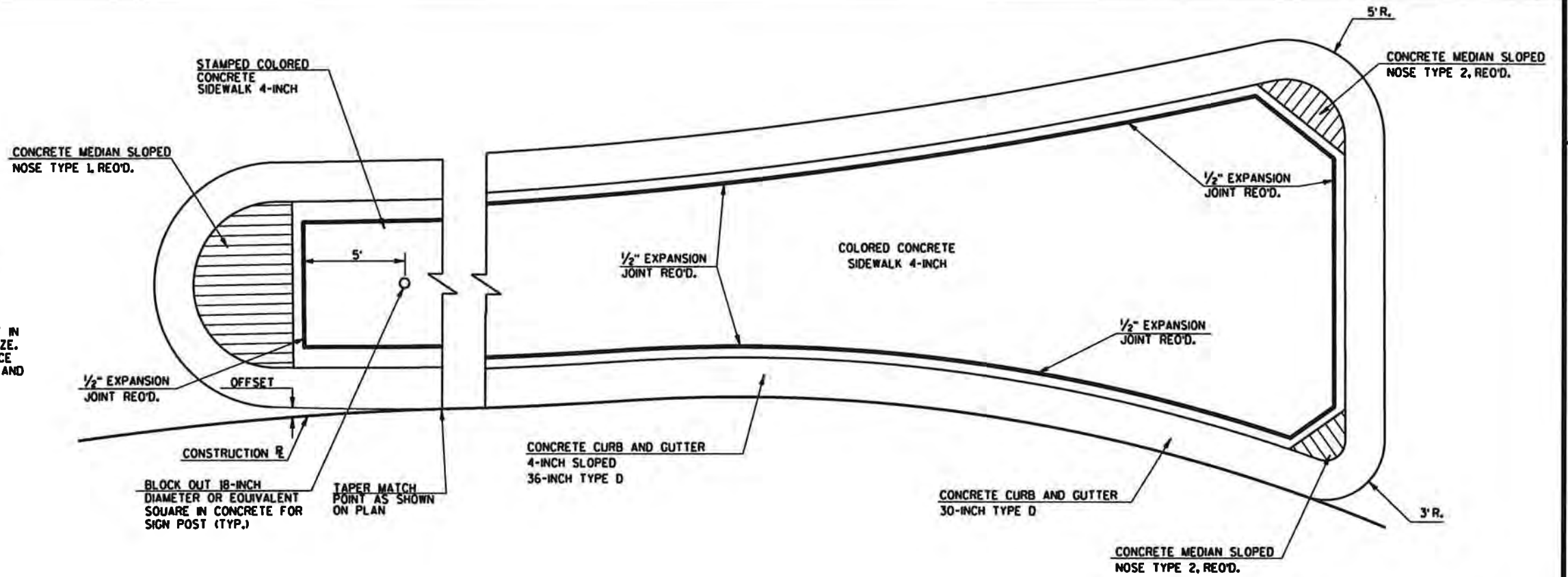


BUTT JOINT DETAIL

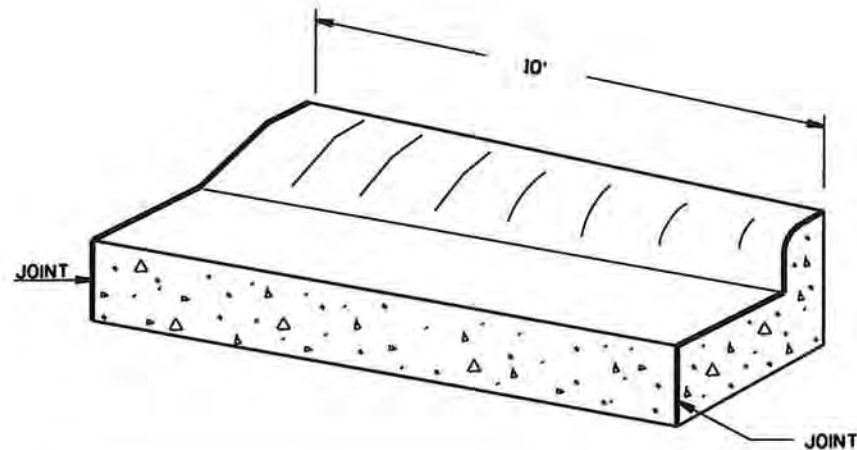


**ISLAND SIGN LOCATION DETAIL (TYP.)**

CONFIRM EXACT LOCATION OF BLOCK OUTS WITH THE ENGINEER

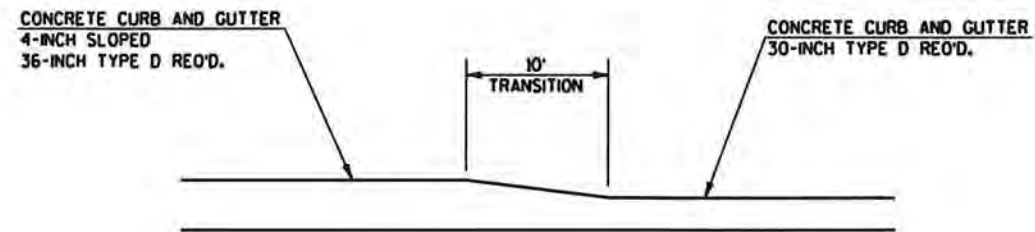


**SPLITTER ISLAND DETAIL**



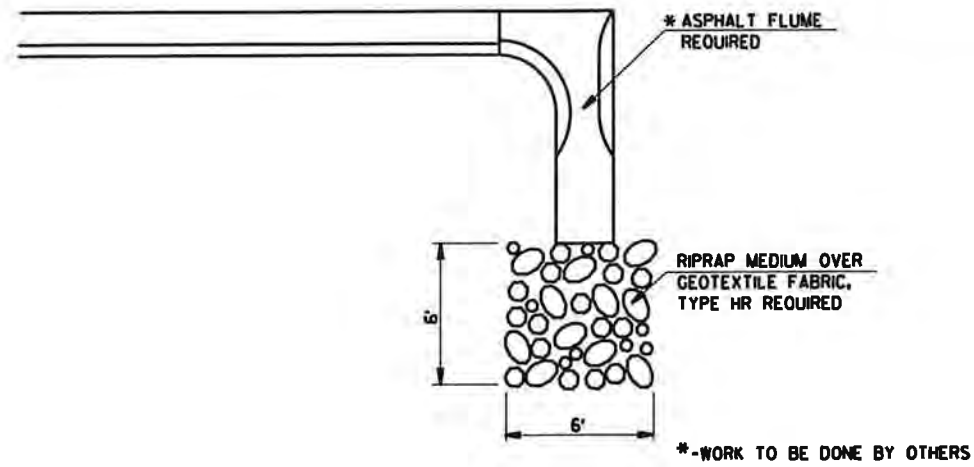
**CONCRETE CURB AND GUTTER TRANSITION DETAIL**

CONCRETE CURB AND GUTTER 4-INCH SLOPED 36-INCH TYPE D TO CONCRETE CURB AND GUTTER 30-INCH TYPE D  
(TO BE MEASURED AND PAID FOR AS CONCRETE CURB AND GUTTER 4-INCH SLOPED 36-INCH TYPE D)

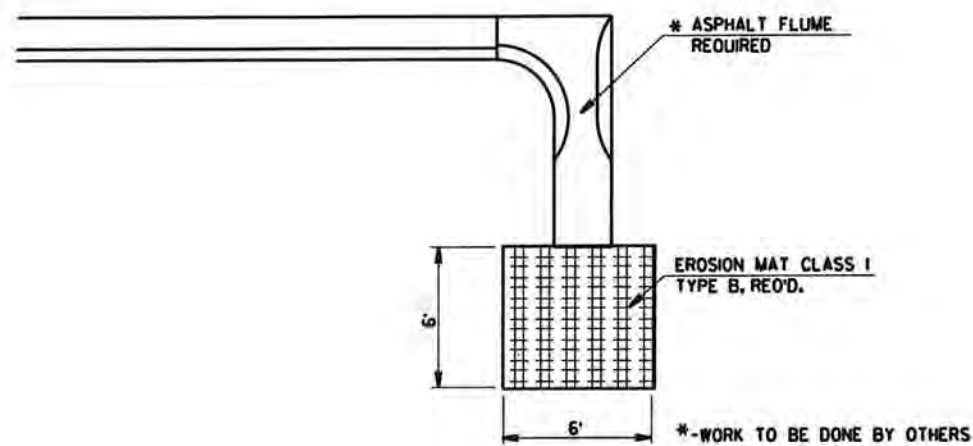


**CONCRETE CURB AND GUTTER TRANSITION DETAIL**

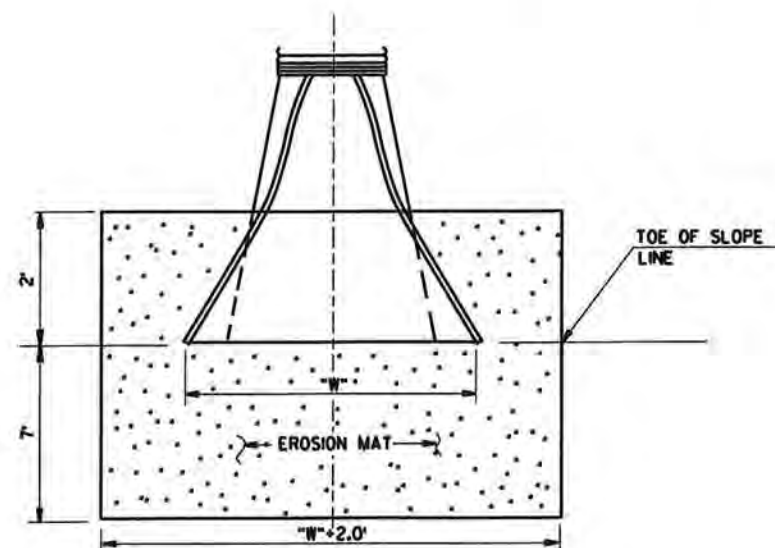
SEE PLAN DETAIL SHEETS FOR LOCATION



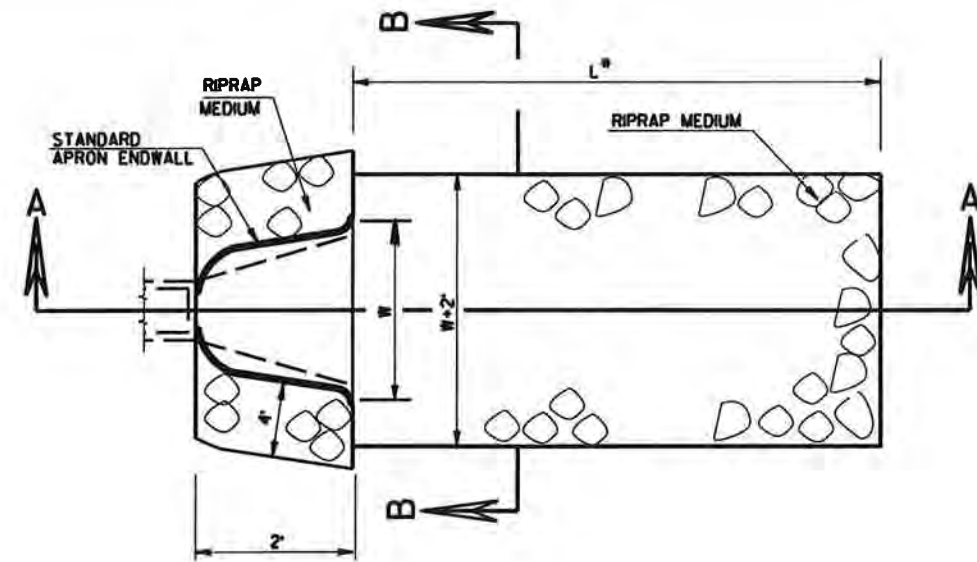
**RIPRAP MEDIUM AT ASPHALT FLUME**  
(SEE MISCELLANEOUS QUANTITIES FOR LOCATION)



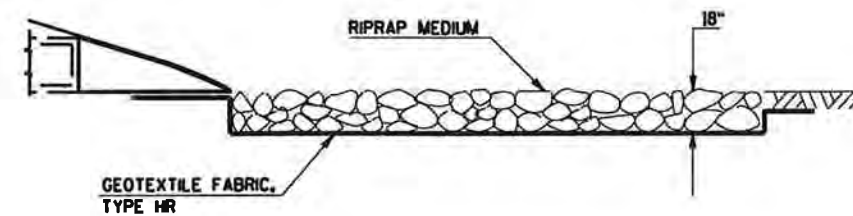
**EROSION MAT AT ASPHALT FLUME**  
(SEE MISCELLANEOUS QUANTITIES FOR LOCATION)



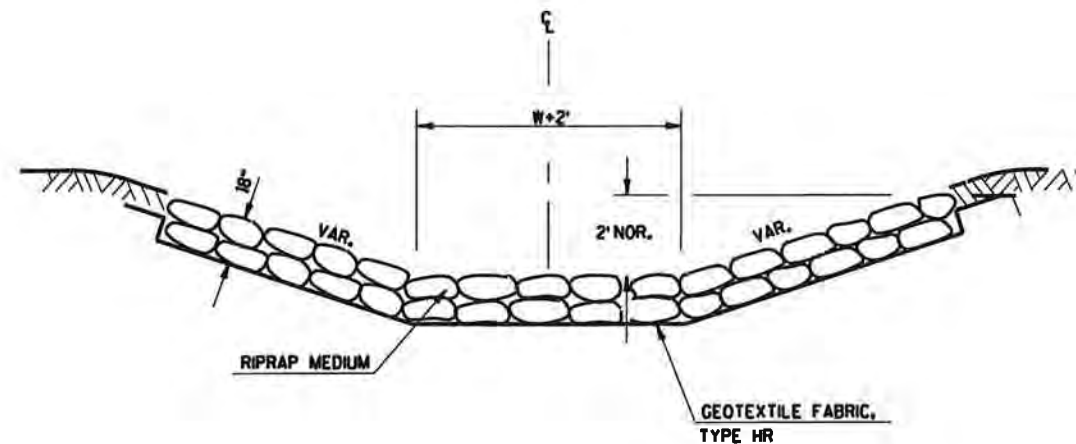
**EROSION MAT AT END OF PIPE**  
(CONCRETE OR METAL)  
(SEE MISCELLANEOUS QUANTITIES FOR LOCATIONS)



\* L = 3 TIMES DIAMETER (NORMAL) OR 10' MIN. OR AS DIRECTED BY THE ENGINEER

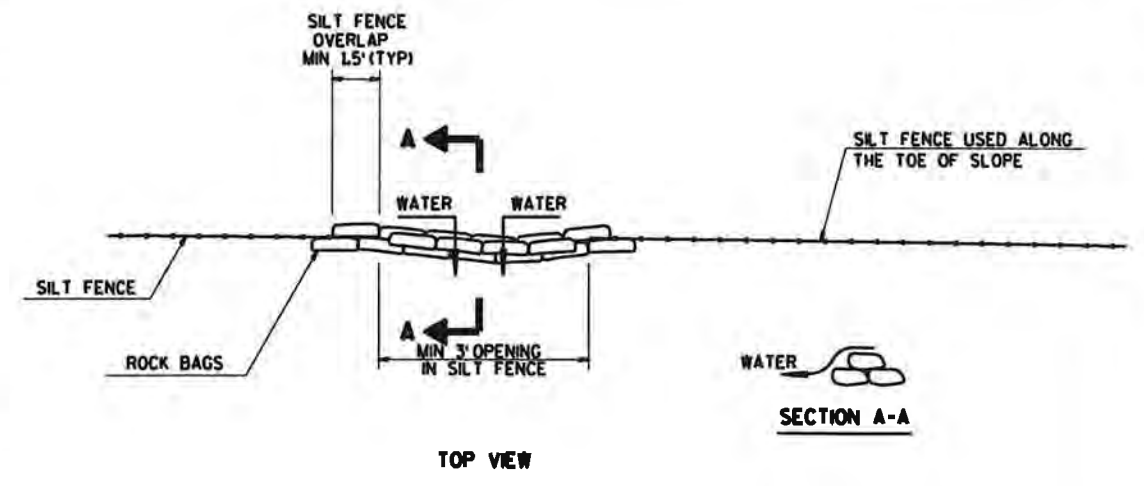
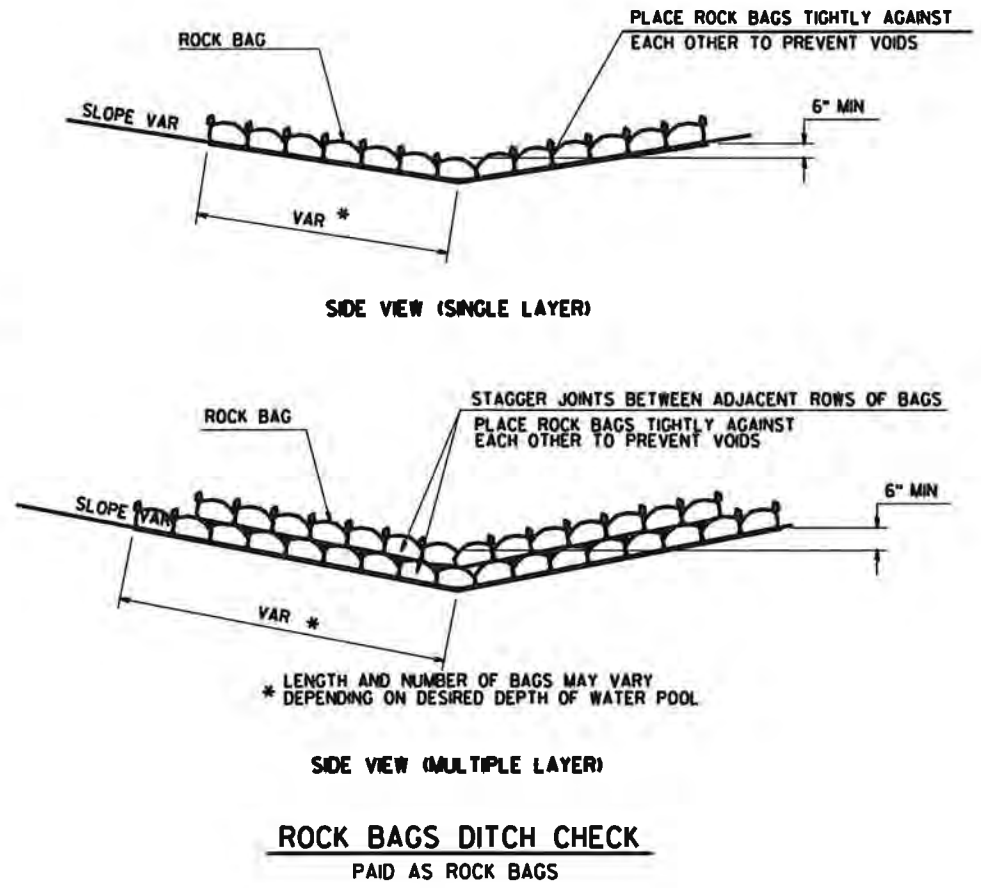
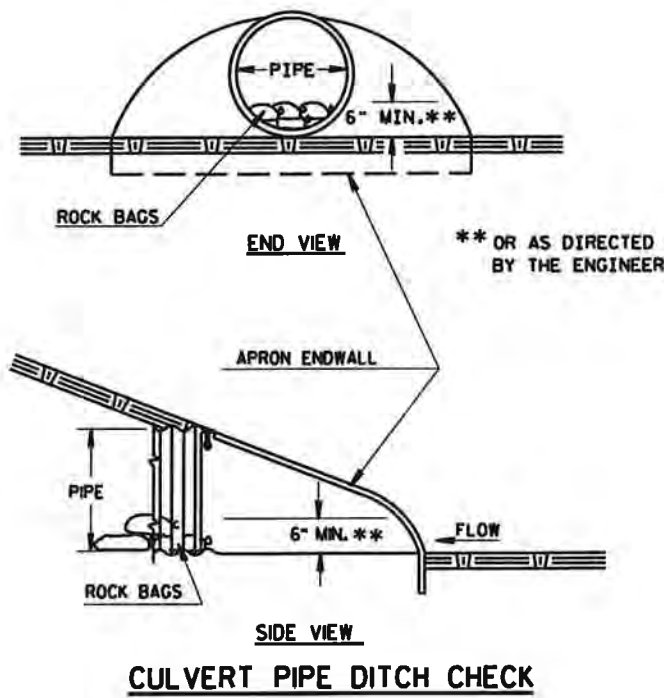


**SECTION A-A**

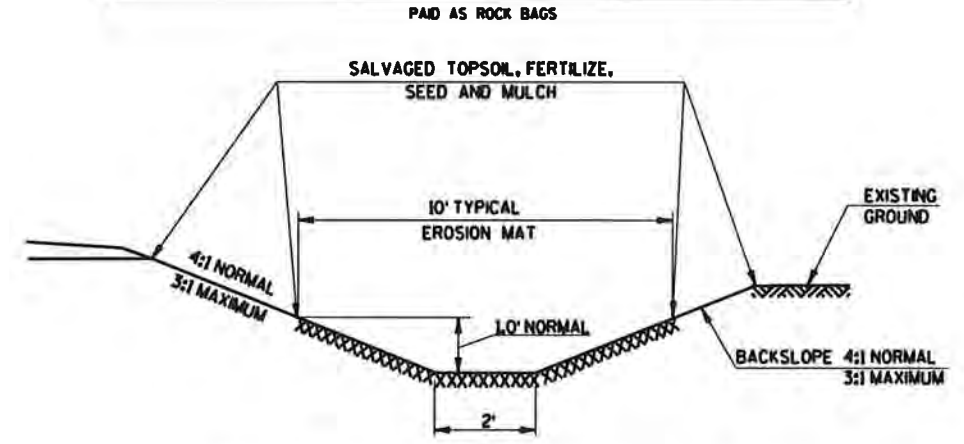


**SECTION B-B**

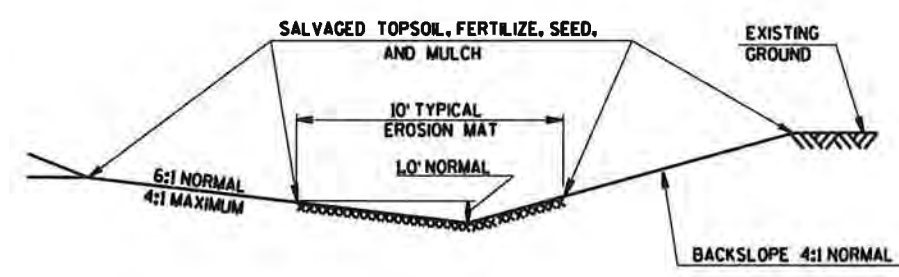
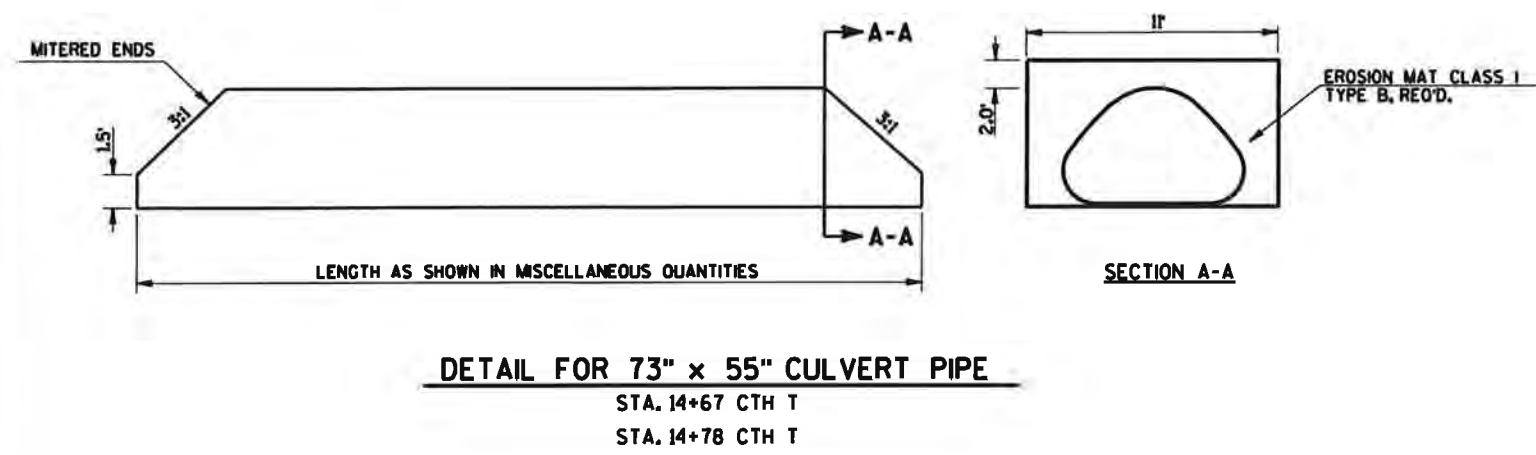
**RIPRAP MEDIUM AND GEOTEXTILE FABRIC  
DETAIL AT APRON ENDWALLS**



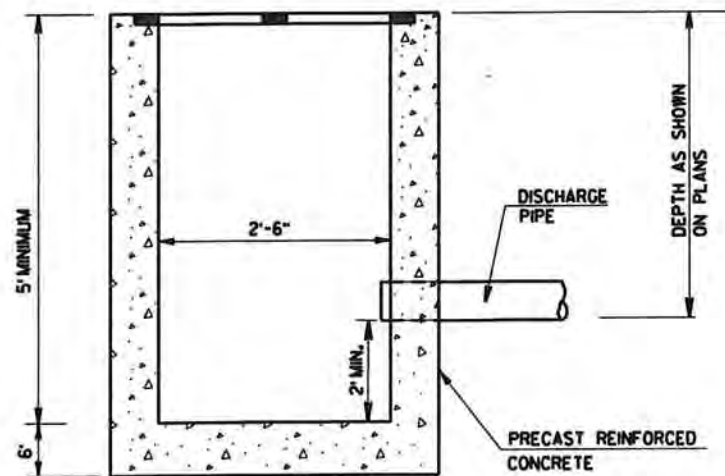
**ROCK BAGS USED FOR SILT FENCE RELIEF DETAIL**



**TYPICAL INSTALLATION FOR EROSION MAT**  
TRAPEZOIDAL DITCH LINING  
(SEE MISCELLANEOUS QUANTITIES FOR LOCATIONS)

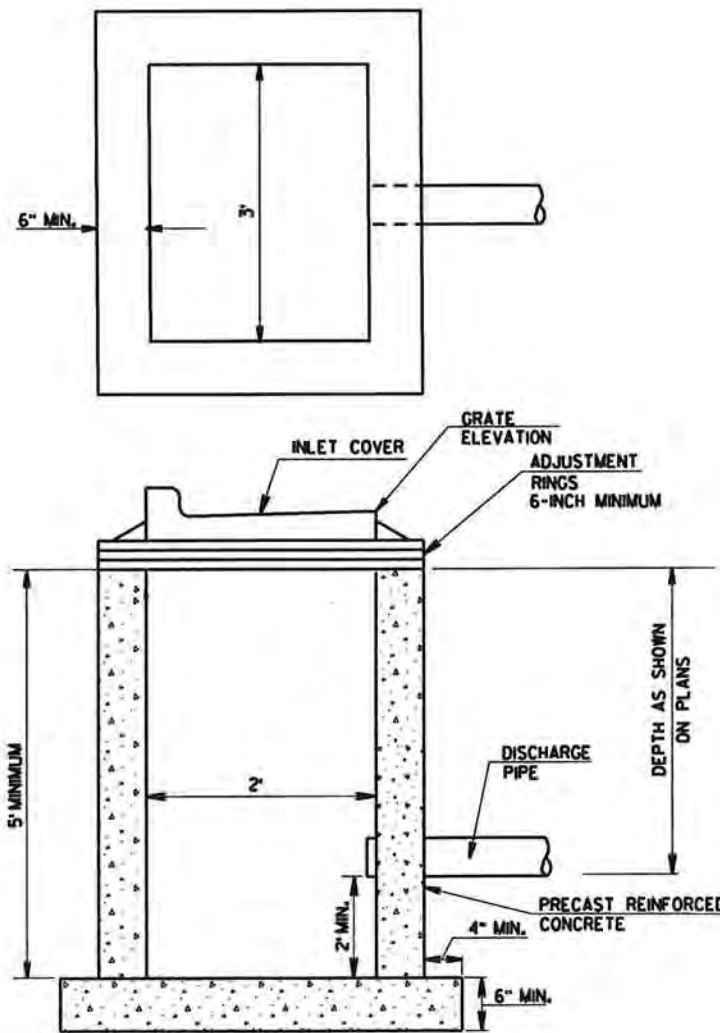


**TYPICAL INSTALLATION FOR EROSION MAT**  
DITCH LINING  
(SEE MISCELLANEOUS QUANTITIES FOR LOCATIONS)



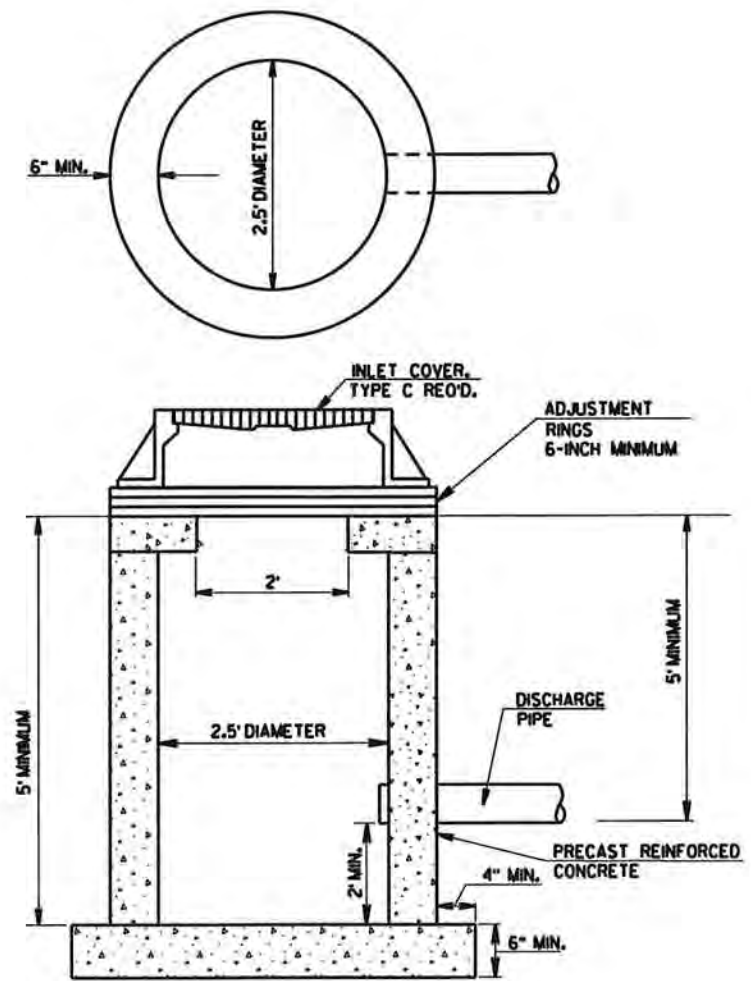
**INLET TYPE 8 SPECIAL**

SEE MISCELLANEOUS QUANTITIES FOR LOCATION AND DEPTHS  
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP  
NOT SHOWN ON THIS DRAWING WILL CONFORM TO THE STANDARD  
DETAIL DRAWING FOR INLET TYPE 8



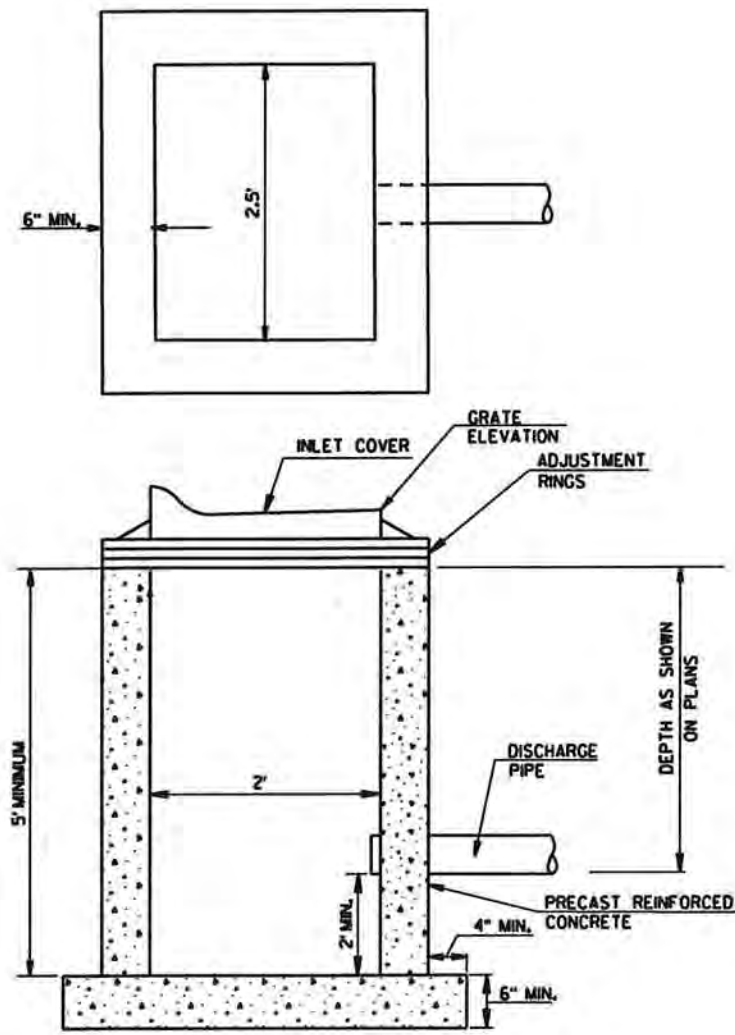
**INLET TYPE 3 SPECIAL**

SEE MISCELLANEOUS QUANTITIES FOR LOCATION AND DEPTHS  
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP  
NOT SHOWN ON THIS DRAWING WILL CONFORM TO THE STANDARD  
DETAIL DRAWING FOR INLET TYPE 3



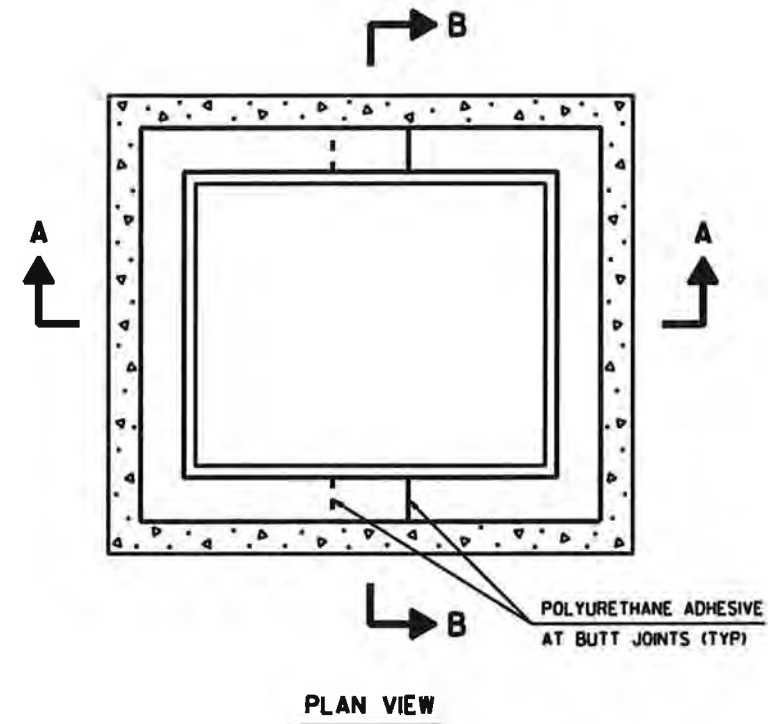
**INLET TYPE 1 SPECIAL**

SEE MISCELLANEOUS QUANTITIES FOR LOCATION AND DEPTHS  
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP  
NOT SHOWN ON THIS DRAWING WILL CONFORM TO THE STANDARD  
DETAIL DRAWING FOR INLET TYPE 1

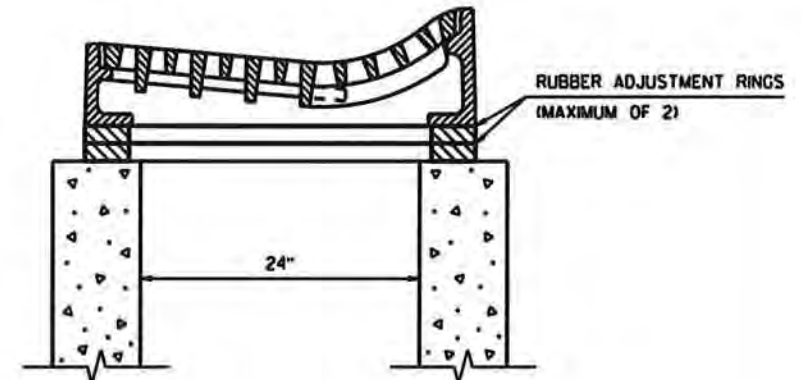
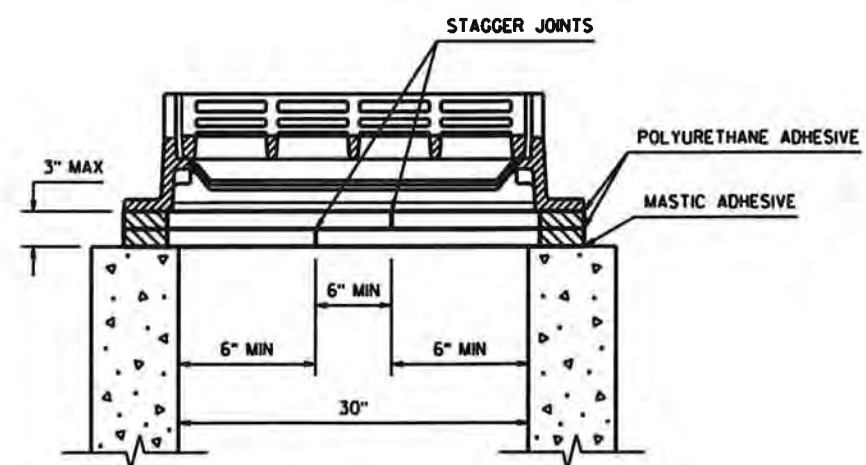


**INLET TYPE 2 SPECIAL**

SEE MISCELLANEOUS QUANTITIES FOR LOCATION AND DEPTHS  
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP  
NOT SHOWN ON THIS DRAWING WILL CONFORM TO THE STANDARD  
DETAIL DRAWING FOR INLET TYPE 2



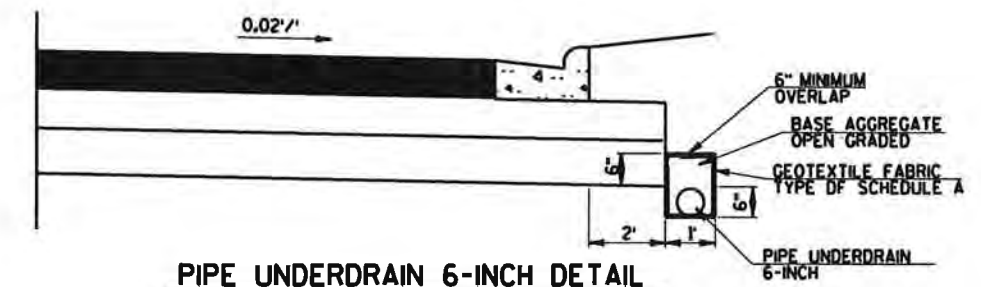
NOTE: ALL CUTS MADE TO RUBBER ADJUSTMENT RINGS WILL BE PERPENDICULAR AND PROVIDE A TIGHT JOINT.



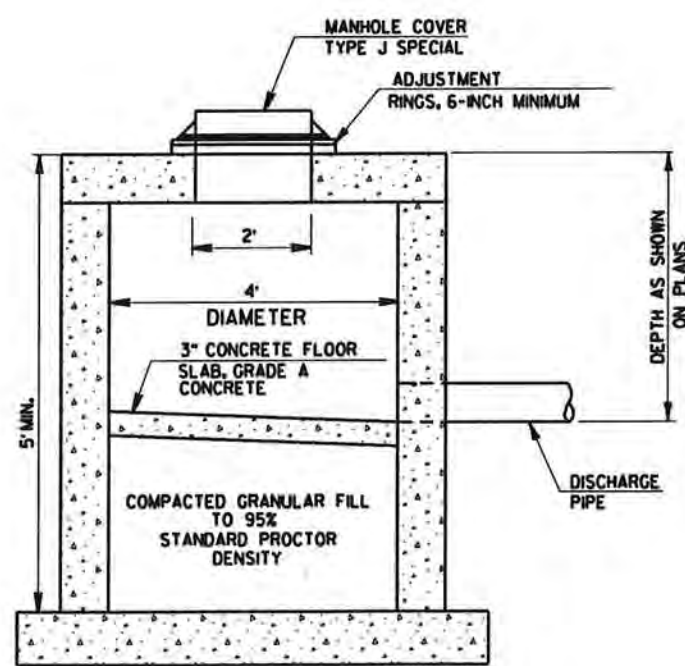
**SECTION A-A**

**SECTION B-B**

**RUBBER RING CUTTING DETAIL FOR INLET TYPE 2 SPECIAL**

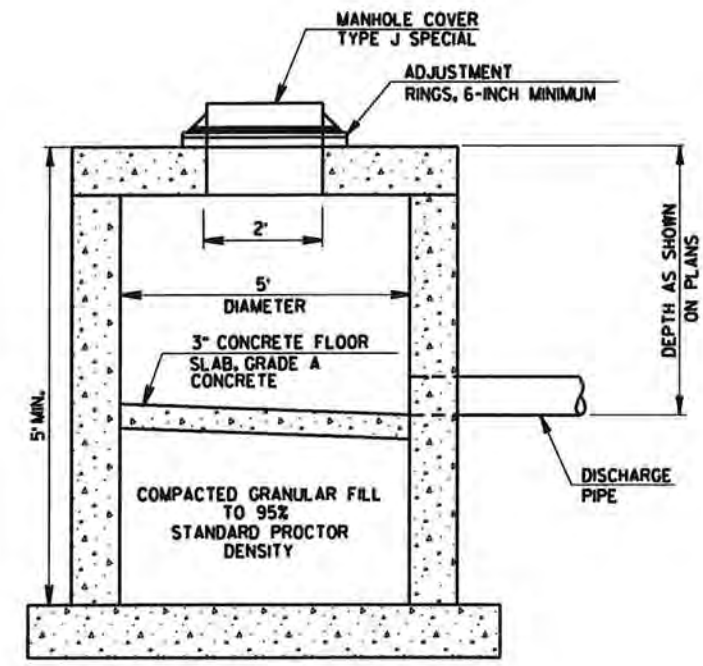


**PIPE UNDERDRAIN 6-INCH DETAIL**  
(SEE MISCELLANEOUS QUANTITIES FOR LOCATION)



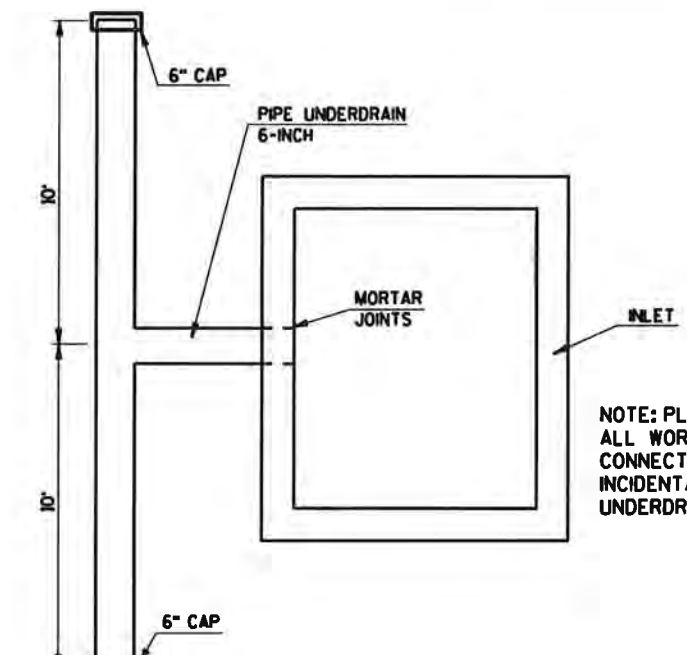
**MANHOLE TYPE 1 SPECIAL**

SEE MISCELLANEOUS QUANTITIES FOR LOCATION AND DEPTHS. DETAILS OF CONSTRUCTION MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE STANDARD DETAIL DRAWING FOR MANHOLE TYPE 1.



**MANHOLE 5-FOOT**

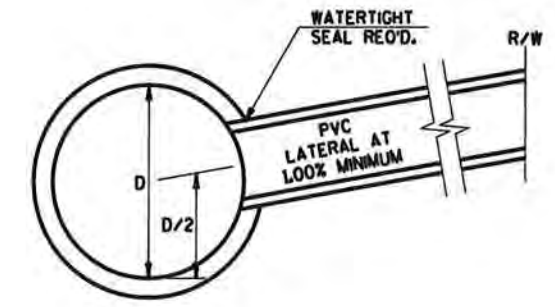
SEE MISCELLANEOUS QUANTITIES FOR LOCATION AND DEPTHS.



**PIPE UNDERDRAIN CONNECTION TO INLET**

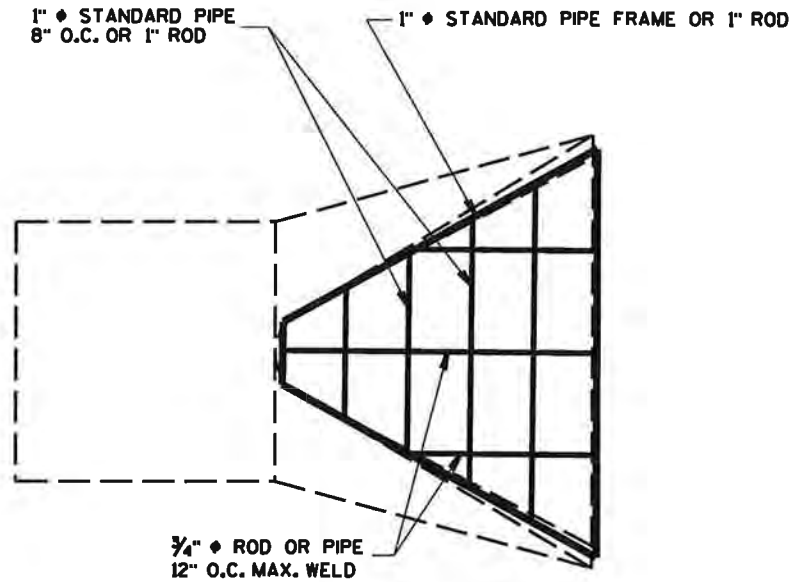
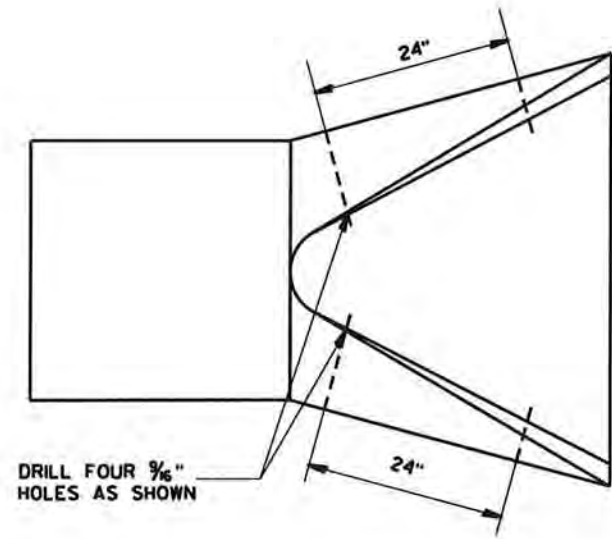
(SEE MISCELLANEOUS QUANTITIES FOR LOCATION)

NOTE: PLACING HOLE IN INLET AND ALL WORK ASSOCIATED WITH CONNECTING TO THE INLET IS INCIDENTAL TO THE COST OF PIPE UNDERDRAIN 6-INCH.

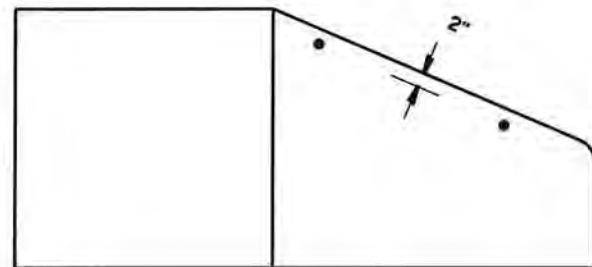


**RESIDENTIAL STORM SEWER LATERAL, PIPE CONNECTION DETAIL**

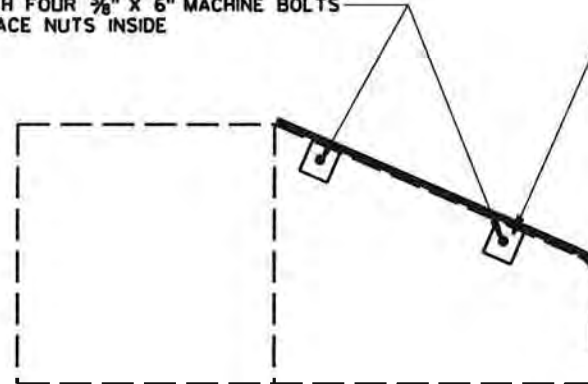




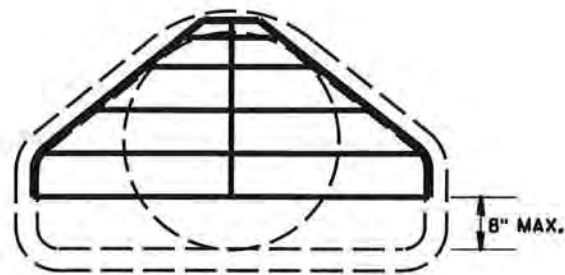
AT EACH PIPE



BOLT GRATE TO CONCRETE ENDWALL WITH FOUR 3/8" X 6" MACHINE BOLTS PLACE NUTS INSIDE



6" X 4" X 1/4" ANGLES (4 REQ'D.) WELD TO FRAME PROVIDE 3/8" HOLE IN EACH

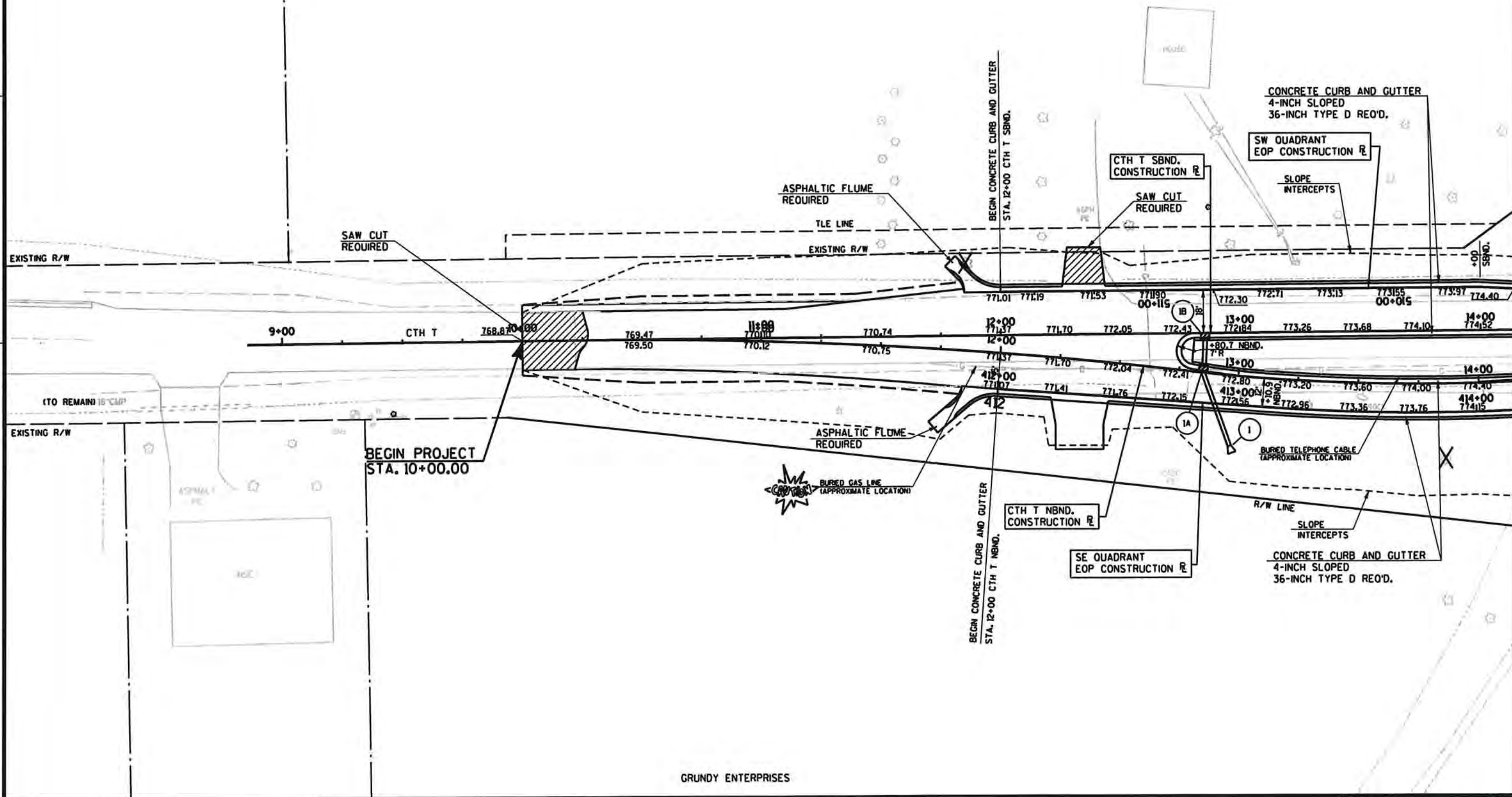


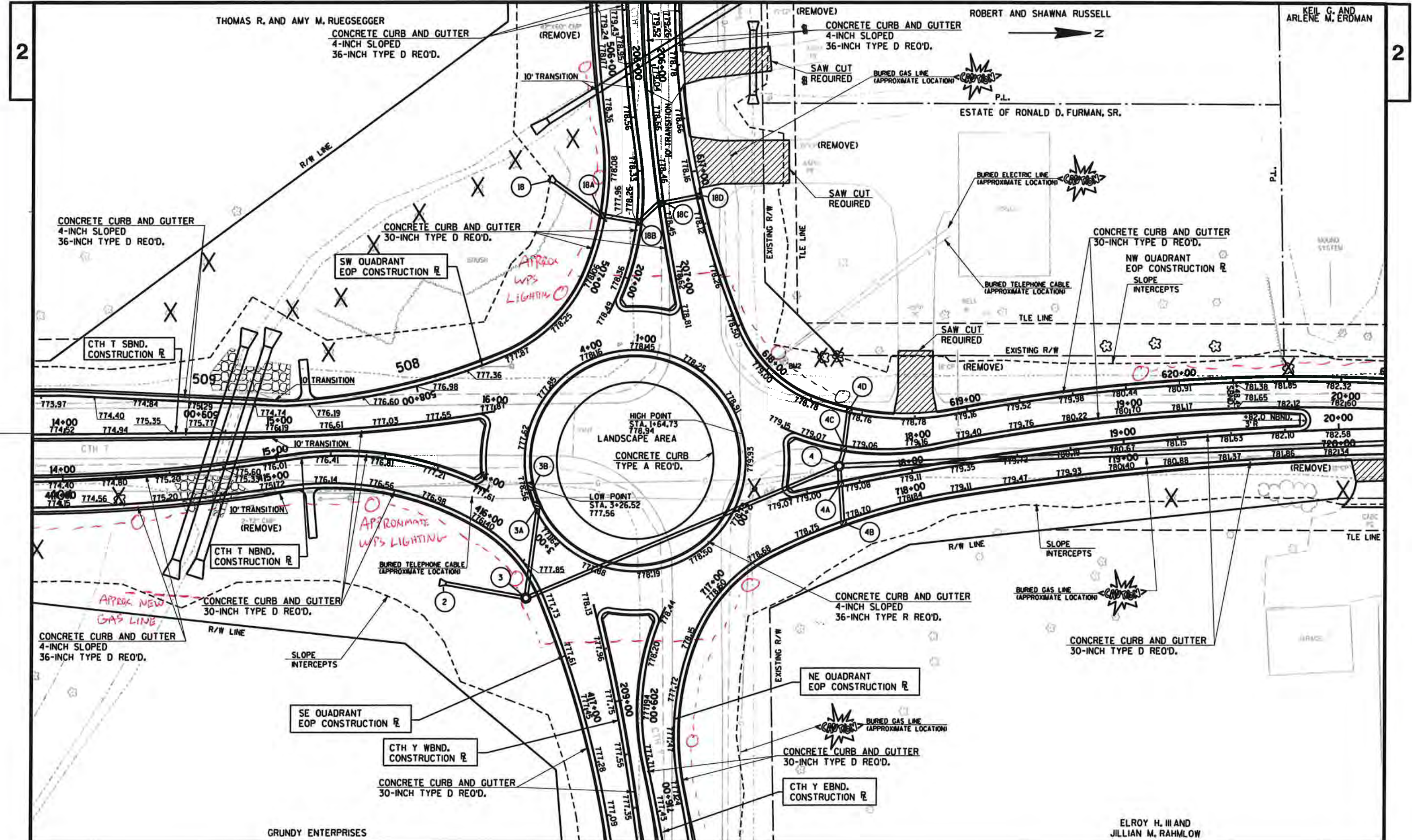
PIPE GRATE DETAIL

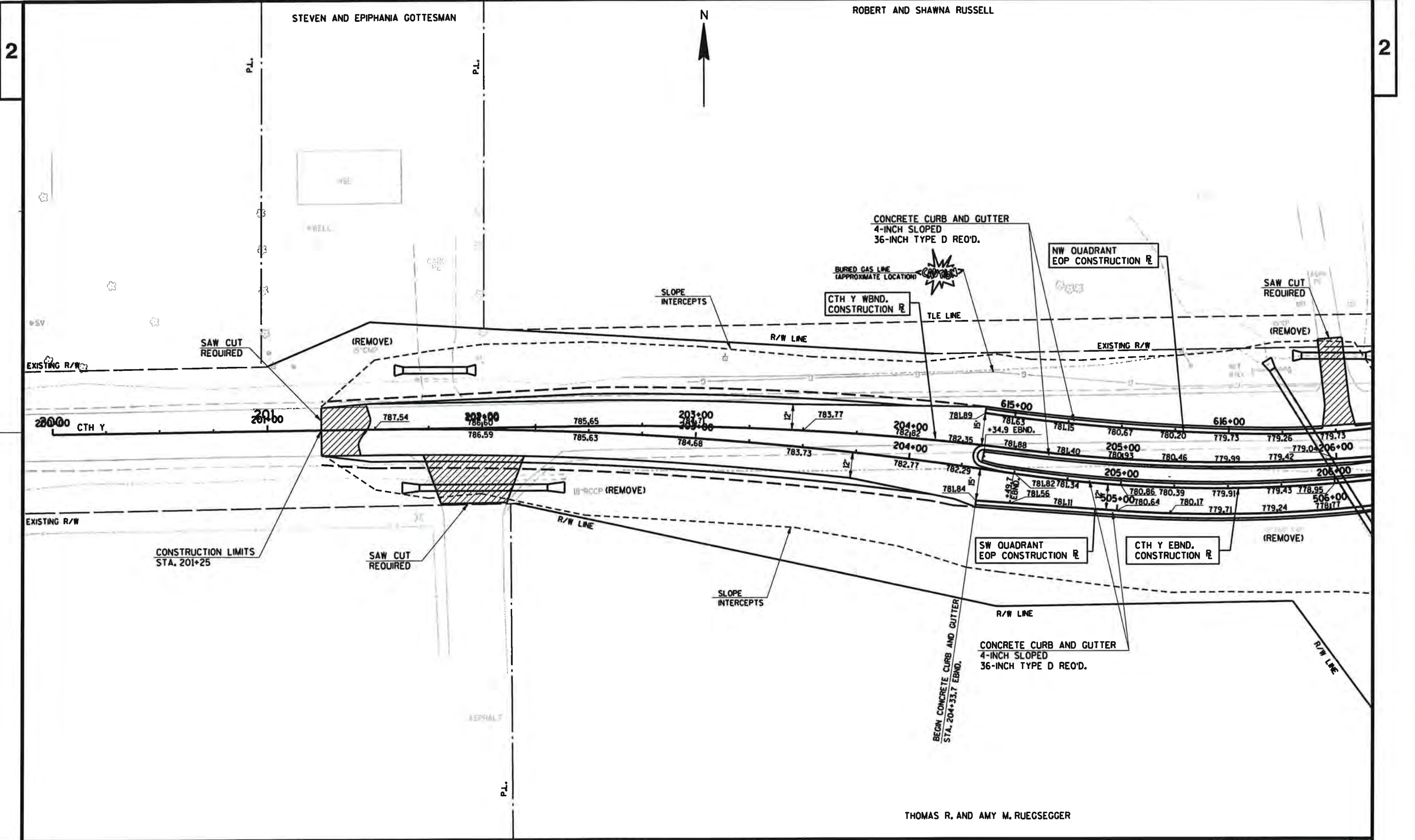


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2







2

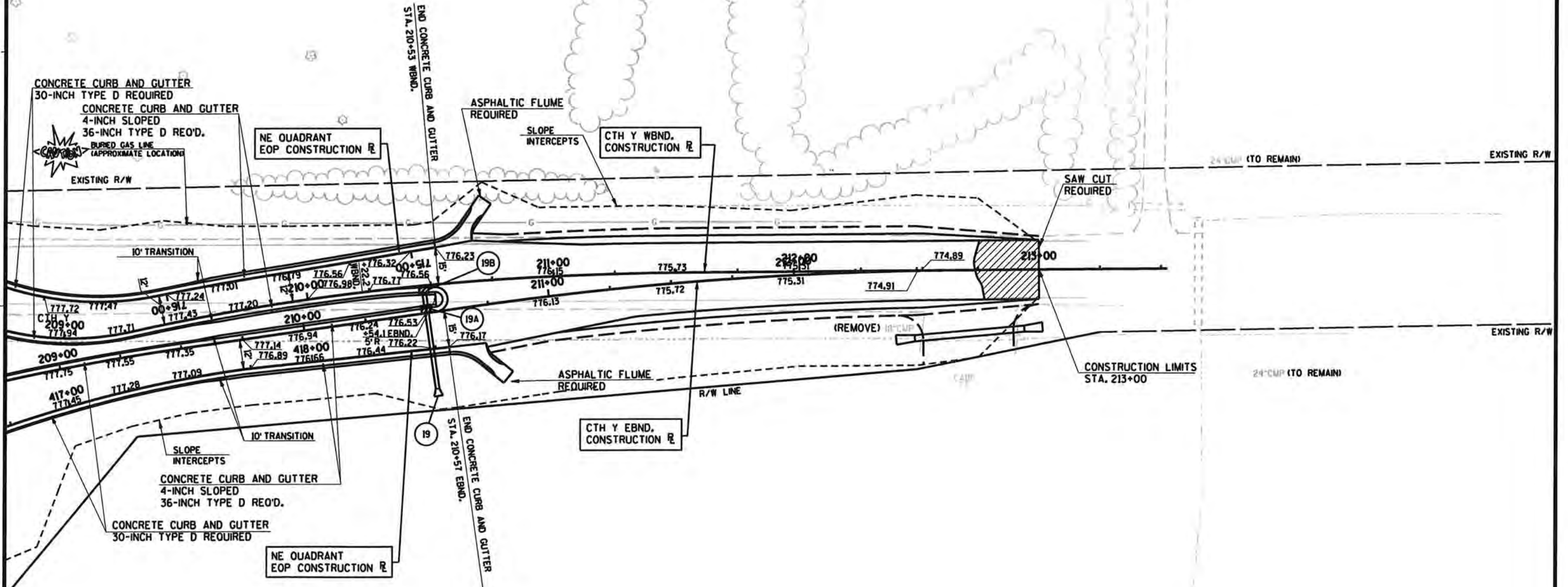
2

STEVEN AND EPIPHANIA GOTTESMAN

ROBERT AND SHAWNA RUSSELL



ELROY H. III AND  
JILLIAN M. RAHMLOW



GRUNDY ENTERPRISES

PROJECT NO: 41-0452.00

HWY: CTH T

COUNTY: WINNEBAGO

PLAN DETAIL

SHEET 21

E

FILE NAME : \$\$...designfile...\$\$

PLOT DATE : \$\$...plottingdate...\$\$ PLOT BY : \$\$...plotuser...\$\$ PLOT NAME :

PLOT SCALE : \$\$...plotscale...\$\$ WISDOT/CADD SHEET 42

KEIL G. AND ARLENE M. ERDMAN

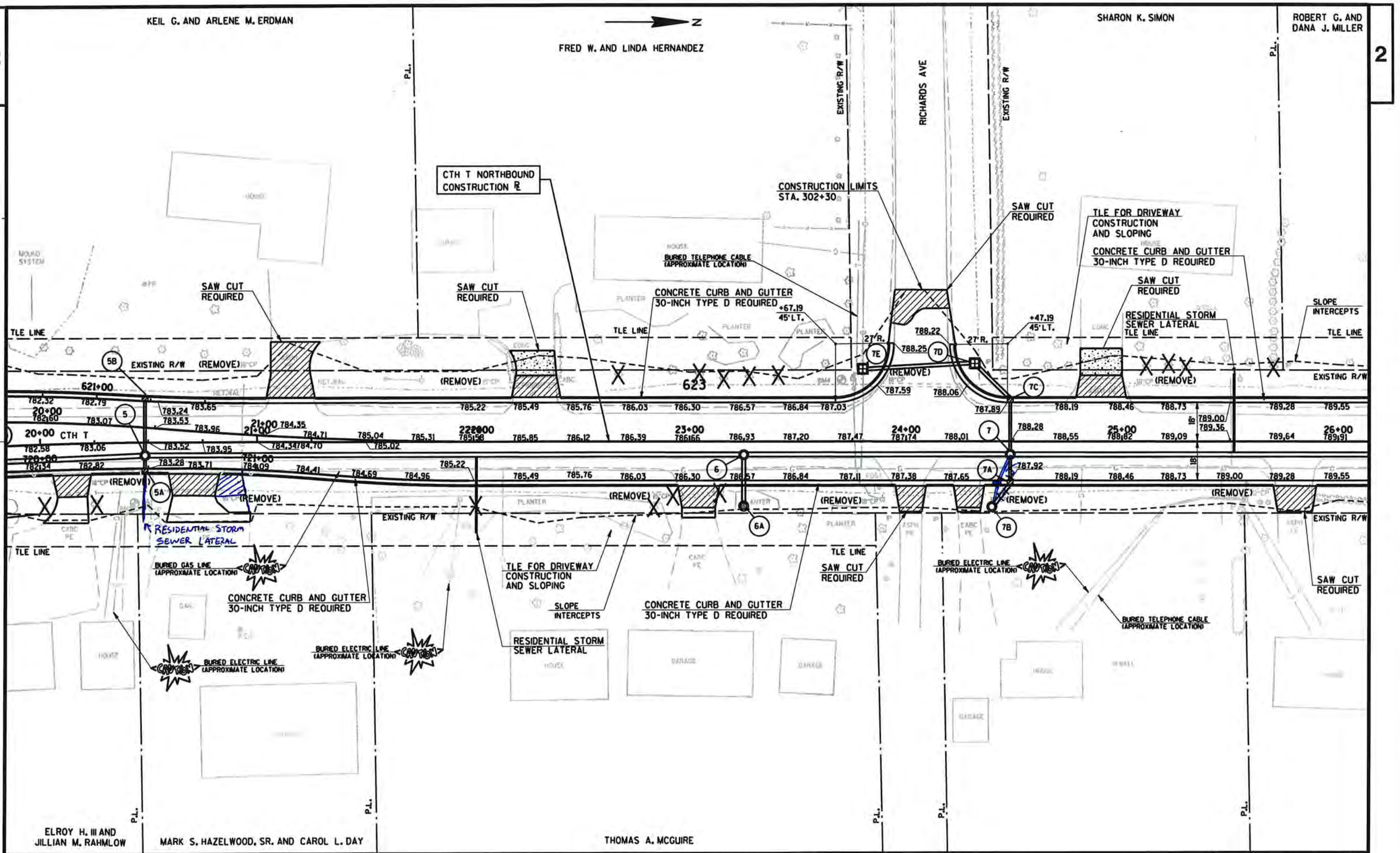
FRED W. AND LINDA HERNANDEZ

SHARON K. SIMON

ROBERT G. AND DANA J. MILLER

2

2



PROJECT NO: 41-0452.00

HWY: CTH T

COUNTY: WINNEBAGO

PLAN DETAIL

SHEET

22

E

FILE NAME : ##....designfile....##

PLOT DATE : ##...plottingdate...## PLOT BY : ##...plotuser...## PLOT NAME :

PLOT SCALE : ##.....plotscale.....##

WISDOT/CADD SHEET 42

ROBERT G. AND DANA J. MILLER

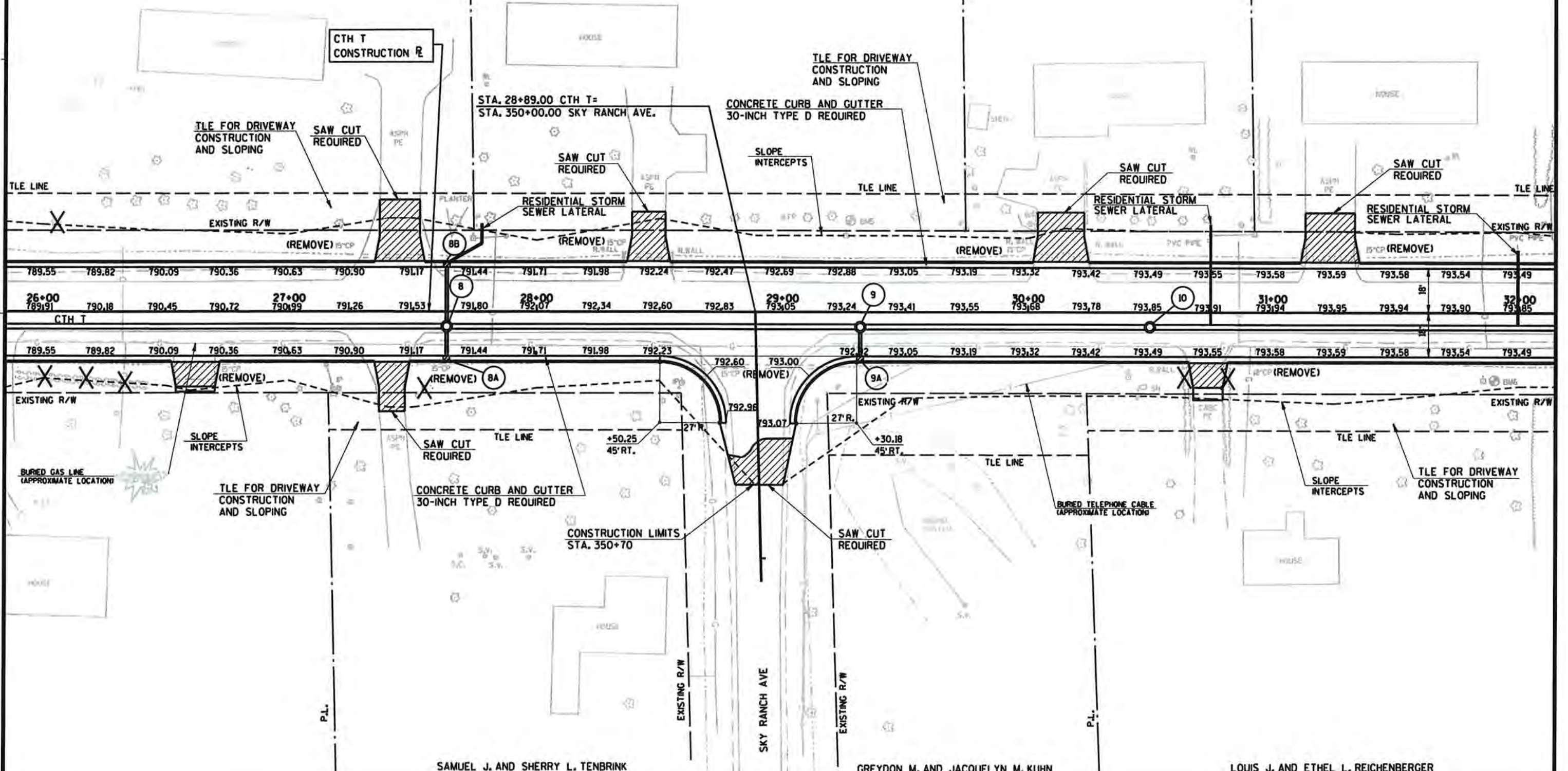
STEVEN G. AND DEBRA J. DODD

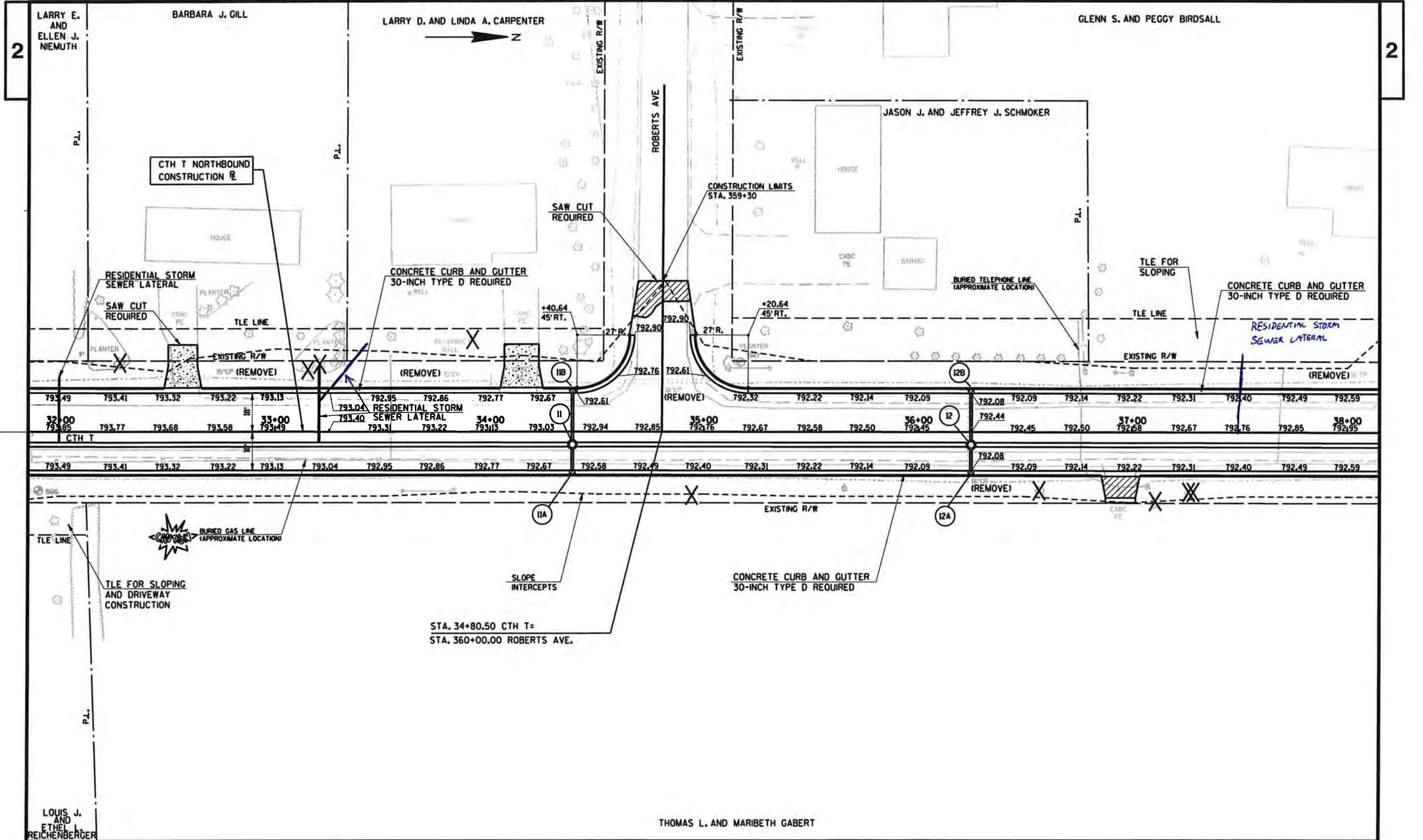
DEVIN S. AND KATHERINE A. STELZNER

LARRY E. AND ELLEN J. NIEMUTH

2

2







GLENN S. AND PEGGY BIRDSALL

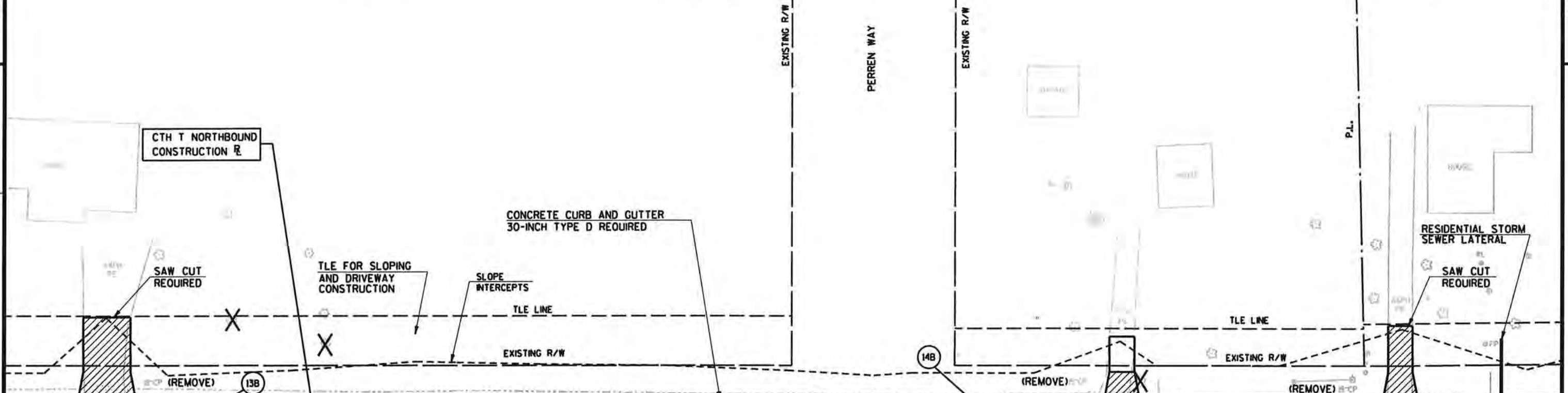
RONALD M. AND DONNA M. MISCHLER

RANDAL T. DARABOSH

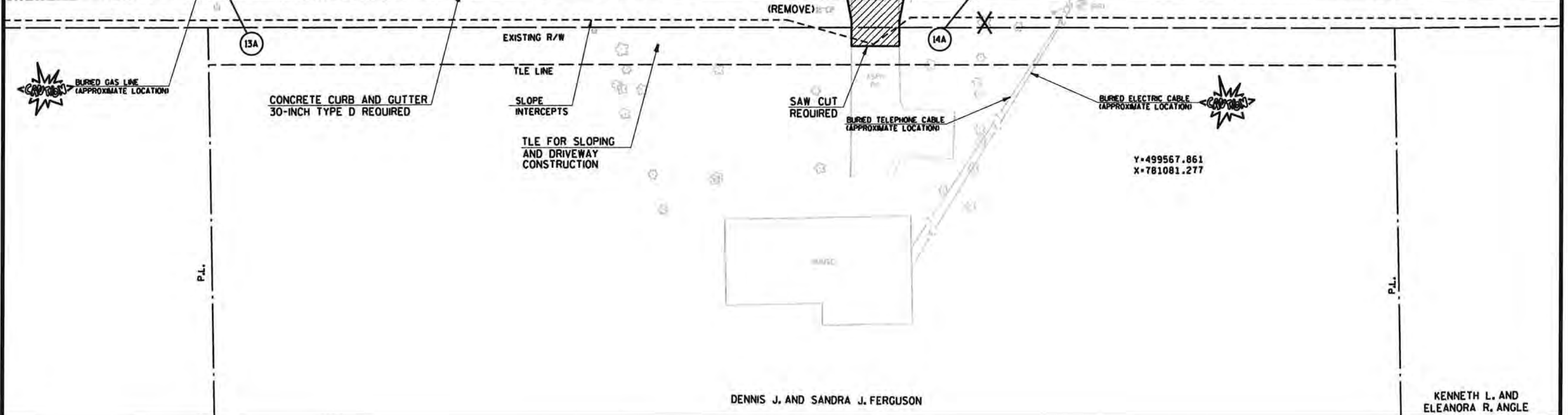


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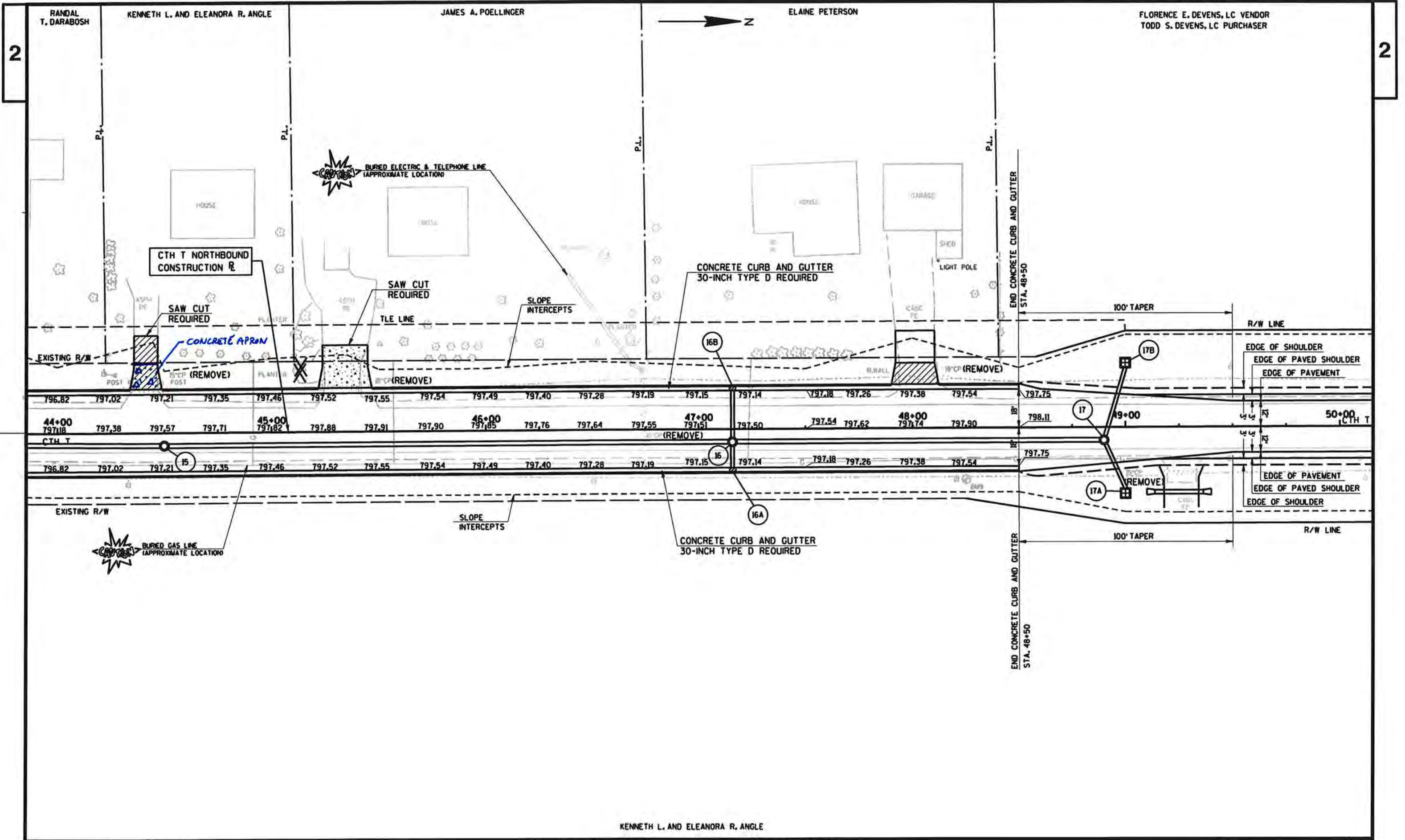


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38+00 792.95	793.04	793.13	793.23 793.34	39+00 793.34	793.47	793.61	793.77	40+00 793.94	794.12	794.32	794.52	41+00 794.73	794.93	795.13	795.34	42+00 795.54	795.75	795.95	796.16	43+00 796.36	796.57	796.77	796.97	44+00 797.18
CTH T																								
792.59	792.68	792.77	792.87	792.98	793.11	793.25	793.41	793.58	793.76	793.96	794.16	794.37	794.57	794.77	794.98	795.18	795.39	795.59	795.80	796.00	796.21	796.41	796.61	796.82



DENNIS J. AND SANDRA J. FERGUSON

KENNETH L. AND ELEANORA R. ANGLE



KENNETH L. AND ELEANORA R. ANGLE

TODD S. DEVENS, LC PURCHASER  
FLORENCE E. DEVENS, LC VENDOR

JON E. AND DONNA M. MULLEN

MARK E. AND JUDITH M. LENZ



2

2

CTH T NORTHBOUND  
CONSTRUCTION R

SAW CUT  
REQUIRED

SLOPE  
INTERCEPTS

BURIED ELECTRIC LINE  
(APPROXIMATE LOCATION)

ASPHALTIC FLUME  
REQUIRED

BEGIN CONCRETE CURB AND GUTTER  
STA. 65+80

SAW CUT  
REQUIRED

RESIDENTIAL STORM  
SEWER LATERAL

CONCRETE CURB AND GUTTER  
6-INCH SLOPED  
36-INCH TYPE D REO'D

TLE FOR SLOPING,  
DRIVEWAY CONSTRUCTION  
AND PIPE INSTALLATION

TLE LINE  
EXISTING R/W

EDGE OF SHOULDER  
EDGE OF PAVED SHOULDER  
EDGE OF PAVEMENT

(REMOVE)

STOP (REMOVE)

(REMOVE)

62+00 CTH T

63+00

64+00

65+00

66+00

67+00

68+00

807.82 807.90 807.99 808.09 808.19 808.29 808.38 808.48 808.58 808.67  
808.08 808.25 808.35 808.45 808.55 808.65 808.74 808.84 808.94 809.03

EDGE OF PAVEMENT  
EDGE OF PAVED SHOULDER  
EDGE OF SHOULDER

100' TAPER

SLOPE  
INTERCEPTS

R/W LINE

ASPHALTIC FLUME  
REQUIRED

BEGIN CONCRETE CURB AND GUTTER  
STA. 67+50

CONCRETE CURB AND GUTTER  
6-INCH SLOPED  
36-INCH TYPE D REO'D

BURIED GAS LINE  
(APPROXIMATE LOCATION)

JUAN C. AND CYNTHIA T. LOZANO

CARLTON W. AND GLADYS E. MARONN LIVING TRUST

PROJECT NO: 41-0452.00

HWY: CTH T

COUNTY: WINNEBAGO

PLAN DETAIL

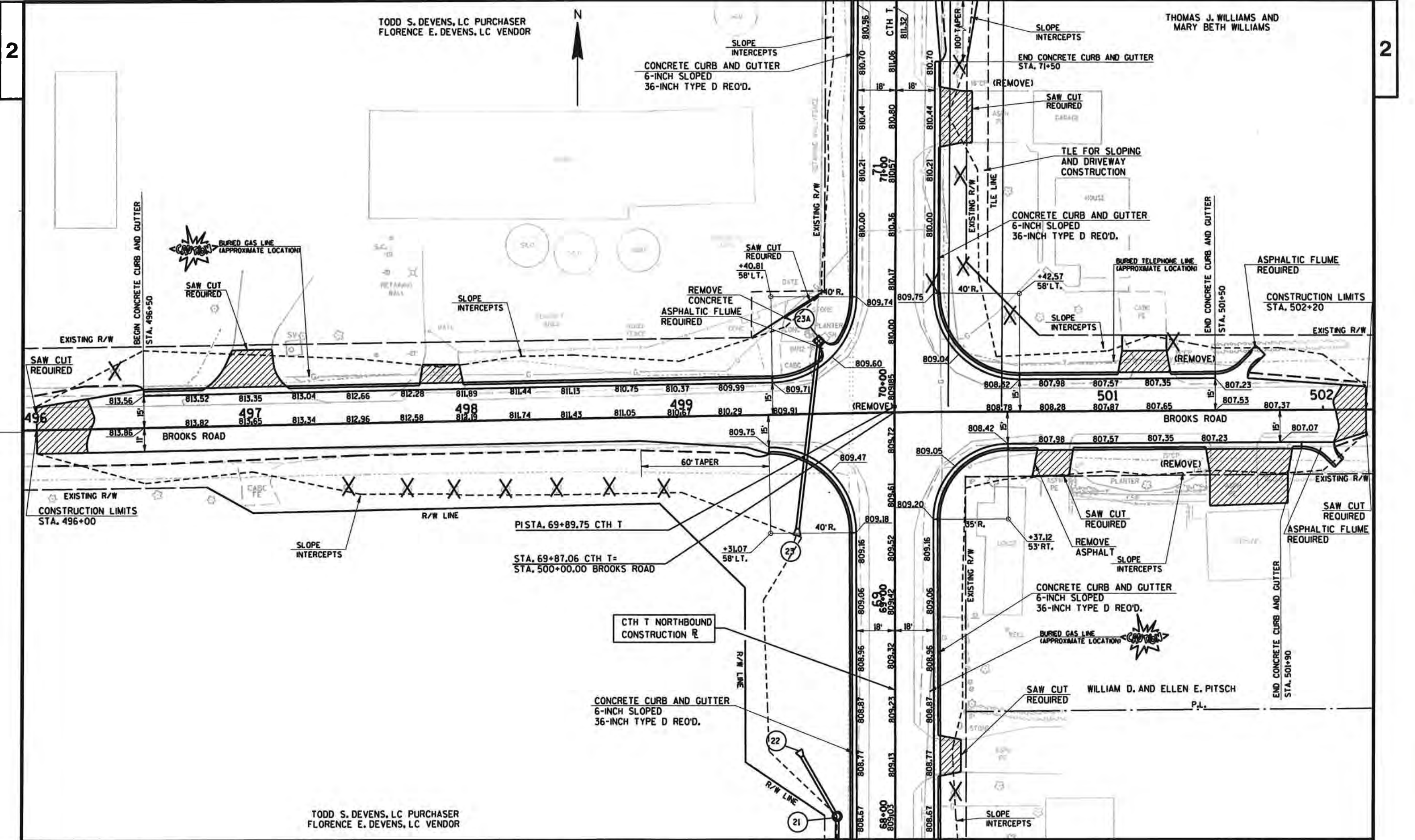
SHEET 27

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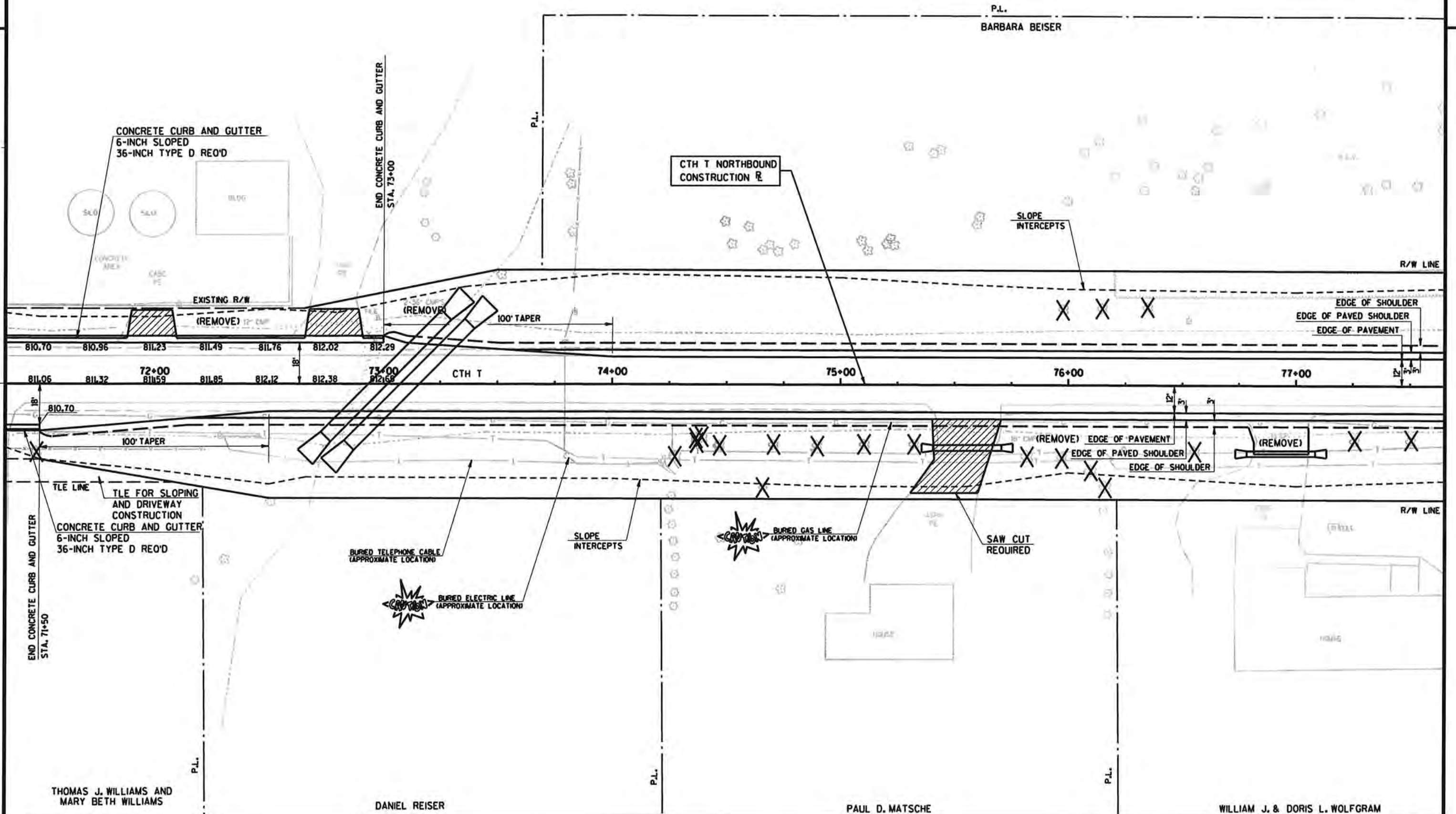
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PLOT SCALE : \*\*....plotscale....\*\* WISDOT/CADD SHEET 42





FLORENCE E. DEVENS, LC VENDOR  
TODD S. DEVENS, LC PURCHASER



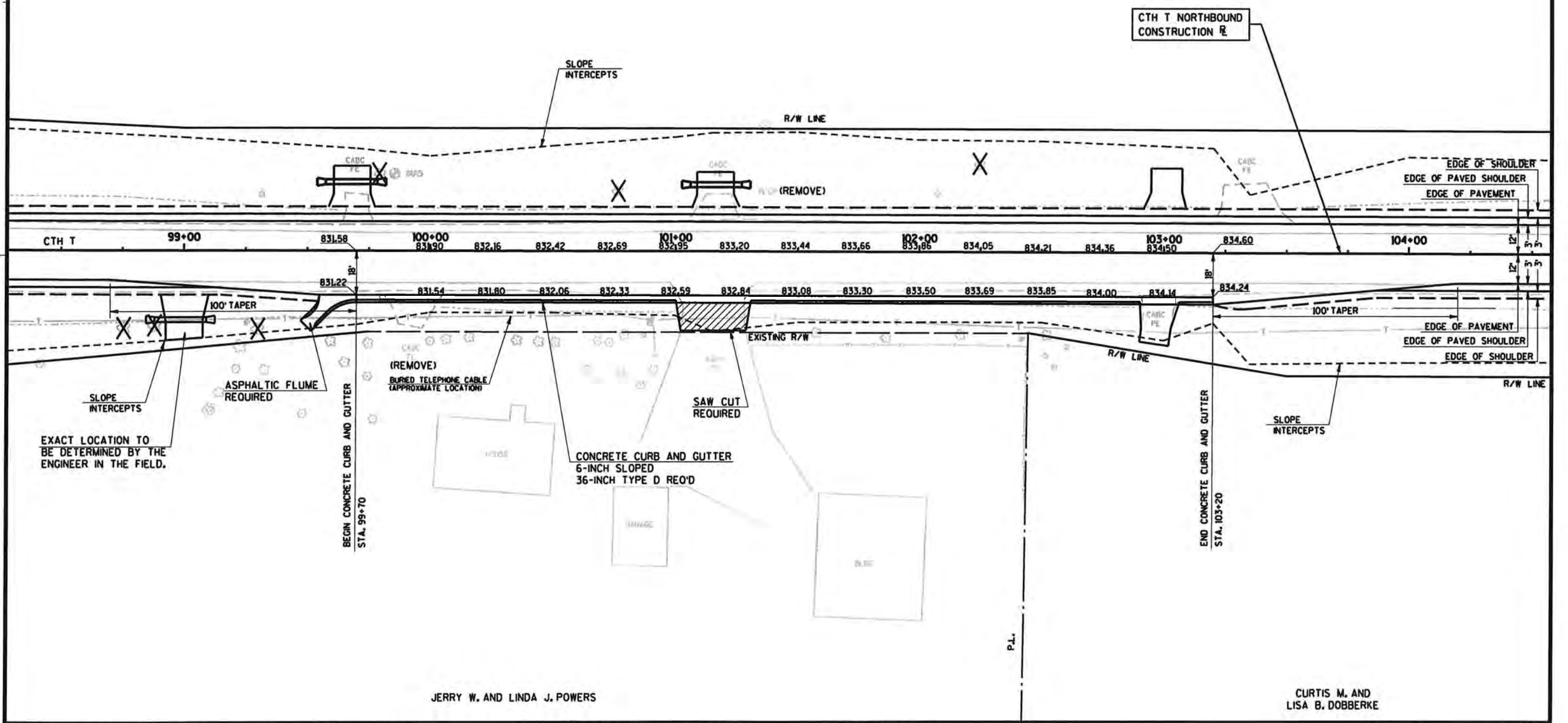
PROJECT NO: 41-0452.00	HWY: CTH T	COUNTY: WINNEBAGO	PLAN DETAIL	SHEET 29	E
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WILDE FARMS, INC.



2

2



PROJECT NO: 41-0452.00

HWY: CTH T

COUNTY: WINNEBAGO

PLAN DETAIL

SHEET 30

E

FILE NAME : \*\*....designfile....\*\*

PLOT DATE : \*\*...plottingdate...\*\* PLOT BY : \*\*...plotuser...\*\* PLOT NAME :

PLOT SCALE : \*\*....plotscale....\*\* WISDOT/CADD SHEET 42

WILDE FARMS, INC.

FLORENCE E. DEVENS-LC VENDOR  
TODD S. DEVENS-LC PURCHASER



2

2

VIRGINIA L. SCHONSHECK

CTH T NORTHBOUND  
CONSTRUCTION

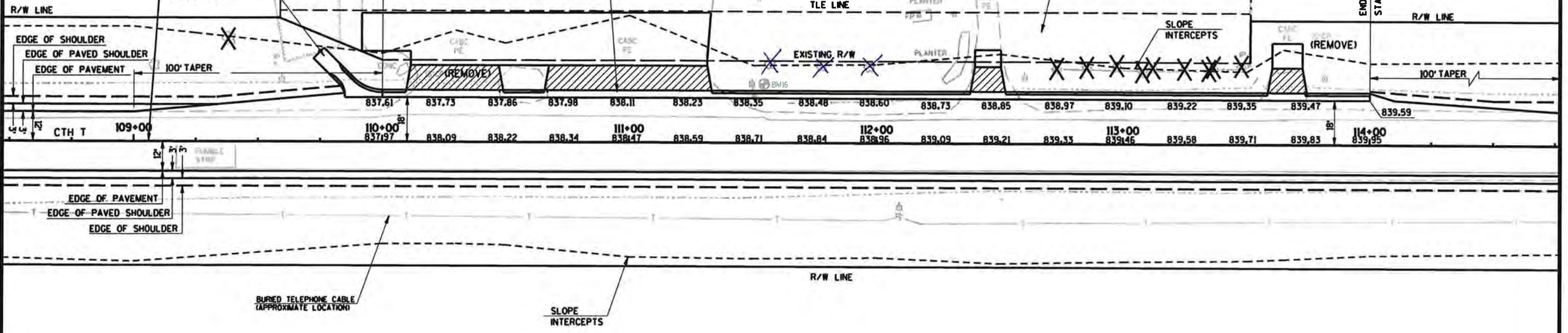
ASPHALTIC FLUME  
REQUIRED

BEGIN CONCRETE CURB AND GUTTER  
STA. 110+00

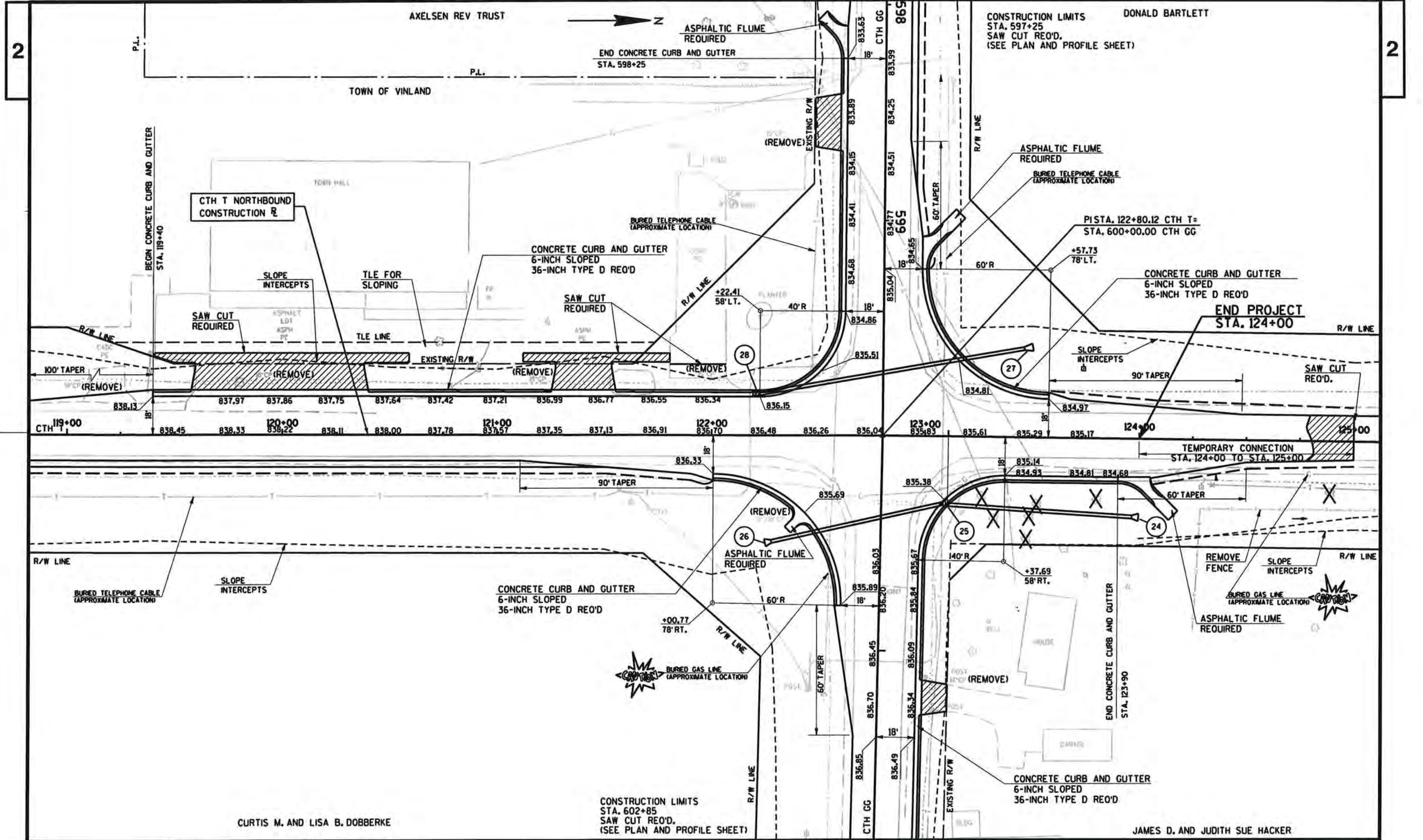
CONCRETE CURB AND GUTTER  
6-INCH SLOPED  
36-INCH TYPE D REQ'D

TILE FOR SLOPING  
AND DRIVEWAY  
CONSTRUCTION

END CONCRETE CURB AND GUTTER  
STA. 114+00



CURTIS M. AND  
LISA B. DOBBERKE



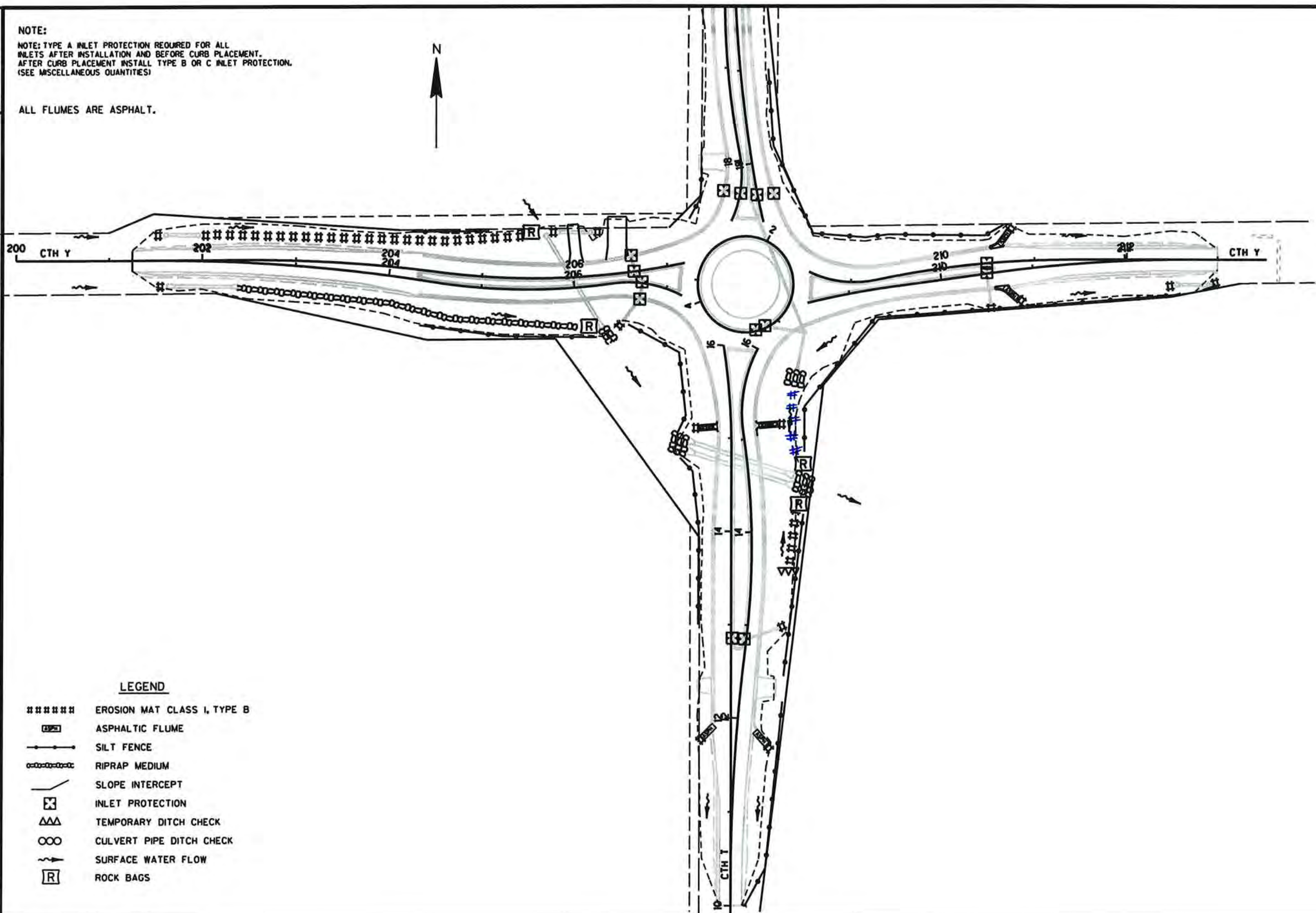
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2



NOTE:  
 NOTE: TYPE A INLET PROTECTION REQUIRED FOR ALL  
 INLETS AFTER INSTALLATION AND BEFORE CURB PLACEMENT.  
 AFTER CURB PLACEMENT INSTALL TYPE B OR C INLET PROTECTION.  
 (SEE MISCELLANEOUS QUANTITIES)

ALL FLUMES ARE ASPHALT.



**LEGEND**

- ##### EROSION MAT CLASS I, TYPE B
- [R] ASPHALTIC FLUME
- |—|—|— SILT FENCE
- - - - - RIPRAP MEDIUM
- SLOPE INTERCEPT
- [X] INLET PROTECTION
- △△△ TEMPORARY DITCH CHECK
- OOO CULVERT PIPE DITCH CHECK
- ~ ~ ~ SURFACE WATER FLOW
- [R] ROCK BAGS

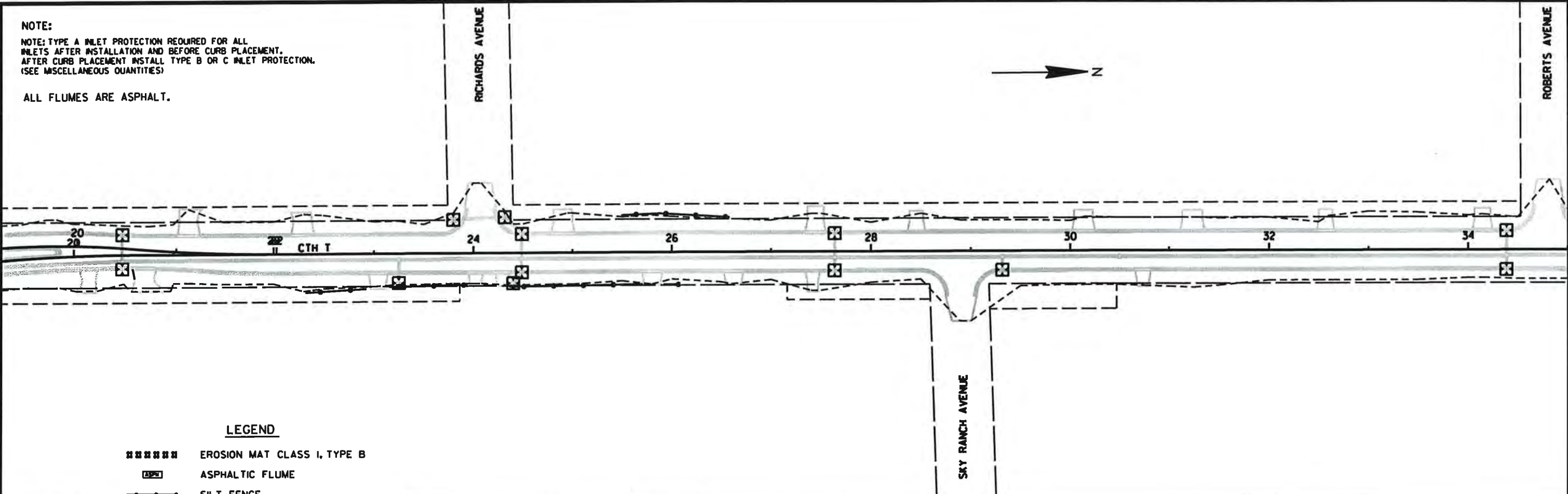
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NOTE:

NOTE: TYPE A INLET PROTECTION REQUIRED FOR ALL INLETS AFTER INSTALLATION AND BEFORE CURB PLACEMENT. AFTER CURB PLACEMENT INSTALL TYPE B OR C INLET PROTECTION. (SEE MISCELLANEOUS QUANTITIES)

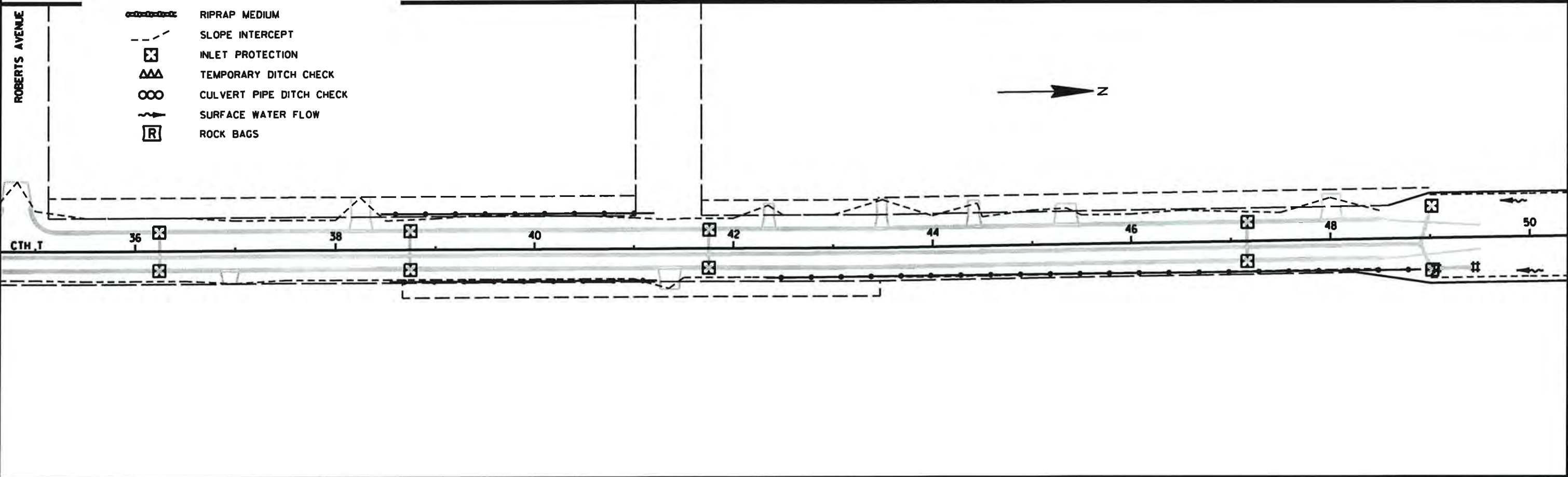
ALL FLUMES ARE ASPHALT.

2



LEGEND

- ##### EROSION MAT CLASS I, TYPE B
- [ASPH] ASPHALTIC FLUME
- SILT FENCE
- RIPRAP MEDIUM
- - - SLOPE INTERCEPT
- ⊗ INLET PROTECTION
- △△△ TEMPORARY DITCH CHECK
- CULVERT PIPE DITCH CHECK
- ~ SURFACE WATER FLOW
- [R] ROCK BAGS



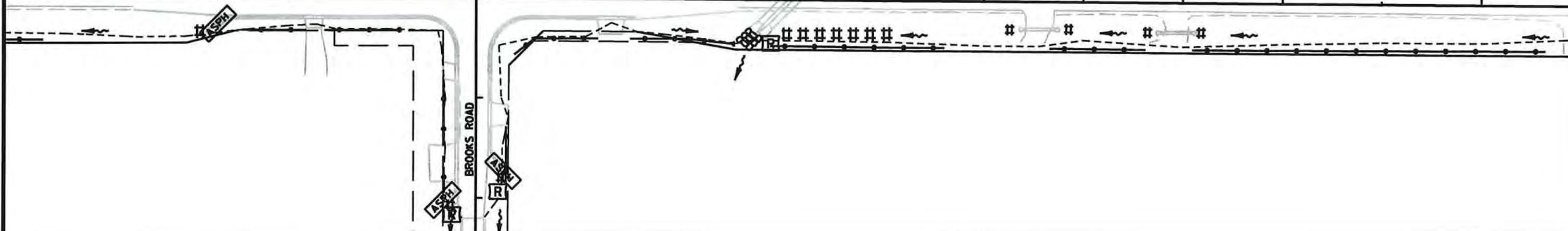
NOTE:  
 NOTE: TYPE A INLET PROTECTION REQUIRED FOR ALL  
 INLETS AFTER INSTALLATION AND BEFORE CURB PLACEMENT.  
 AFTER CURB PLACEMENT INSTALL TYPE B OR C INLET PROTECTION.  
 (SEE MISCELLANEOUS QUANTITIES)

ALL FLUMES ARE ASPHALT.



**LEGEND**

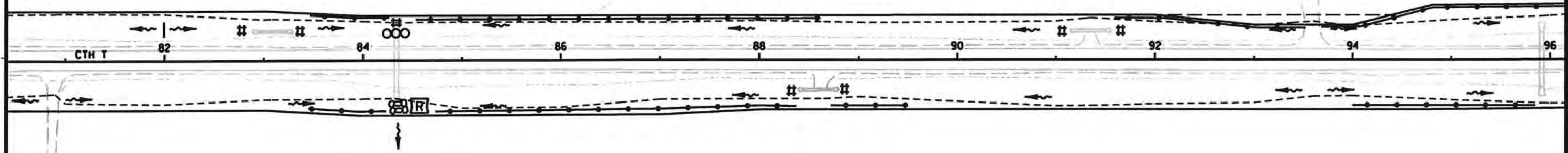
- ##### EROSION MAT CLASS I, TYPE B
- ASPH ASPHALTIC FLUME
- SILT FENCE
- RIPRAP MEDIUM
- - - SLOPE INTERCEPT
- ☒ INLET PROTECTION
- △△ TEMPORARY DITCH CHECK
- OO CULVERT PIPE DITCH CHECK
- ~ SURFACE WATER FLOW
- R ROCK BAGS



NOTE:

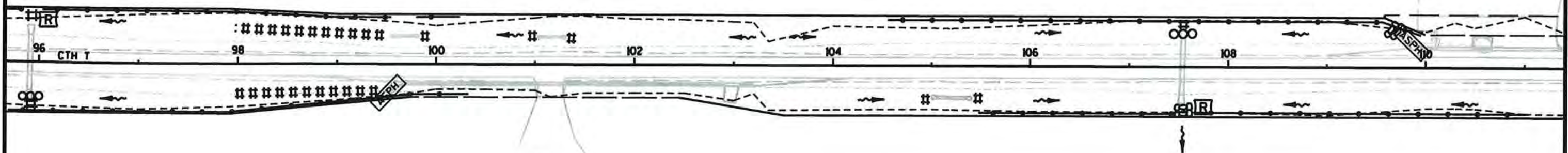
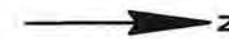
NOTE: TYPE A INLET PROTECTION REQUIRED FOR ALL INLETS AFTER INSTALLATION AND BEFORE CURB PLACEMENT. AFTER CURB PLACEMENT INSTALL TYPE B OR C INLET PROTECTION. (SEE MISCELLANEOUS QUANTITIES)

ALL FLUMES ARE ASPHALT.



LEGEND

- ##### EROSION MAT CLASS I, TYPE B
- ASPH ASPHALTIC FLUME
- SILT FENCE
- RIPRAP MEDIUM
- - - SLOPE INTERCEPT
- ⊗ INLET PROTECTION
- △△△ TEMPORARY DITCH CHECK
- CULVERT PIPE DITCH CHECK
- ~> SURFACE WATER FLOW
- R ROCK BAGS



2

NOTE:

NOTE: TYPE A INLET PROTECTION REQUIRED FOR ALL INLETS AFTER INSTALLATION AND BEFORE CURB PLACEMENT. AFTER CURB PLACEMENT INSTALL TYPE B OR C INLET PROTECTION. (SEE MISCELLANEOUS QUANTITIES)

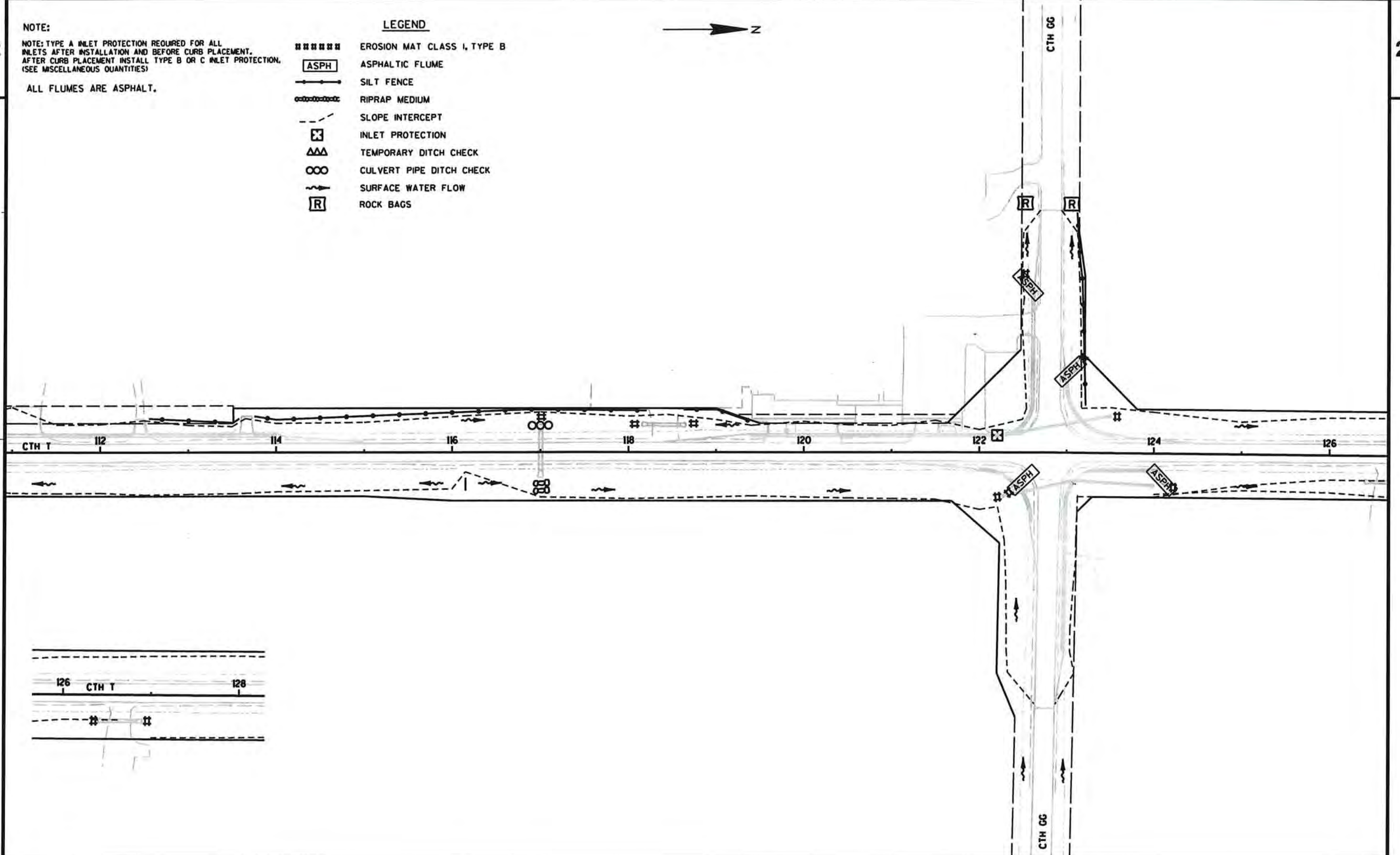
ALL FLUMES ARE ASPHALT.

LEGEND

- ▣ EROSION MAT CLASS 1, TYPE B
- ASPH ASPHALTIC FLUME
- SILT FENCE
- RIPRAP MEDIUM
- - - SLOPE INTERCEPT
- ⊠ INLET PROTECTION
- △△△ TEMPORARY DITCH CHECK
- ∞∞∞ CULVERT PIPE DITCH CHECK
- ~ SURFACE WATER FLOW
- R ROCK BAGS



2





DONALD WYMAN  
FLOWERING CRAB

COLORED CONCRETE  
PAVEMENT 12-INCH

LOW MAINTENANCE  
SEEDING REQ'D.

MANEY  
JUNIPER

CTH Y

CTH Y

CTH T

CTH T

**PLANTING NOTES**  
USE SELECTIVE PRE-EMERGENCE HERBICIDE  
IN PLANT BEDS BEFORE MULCHING

SIGNING NOTES

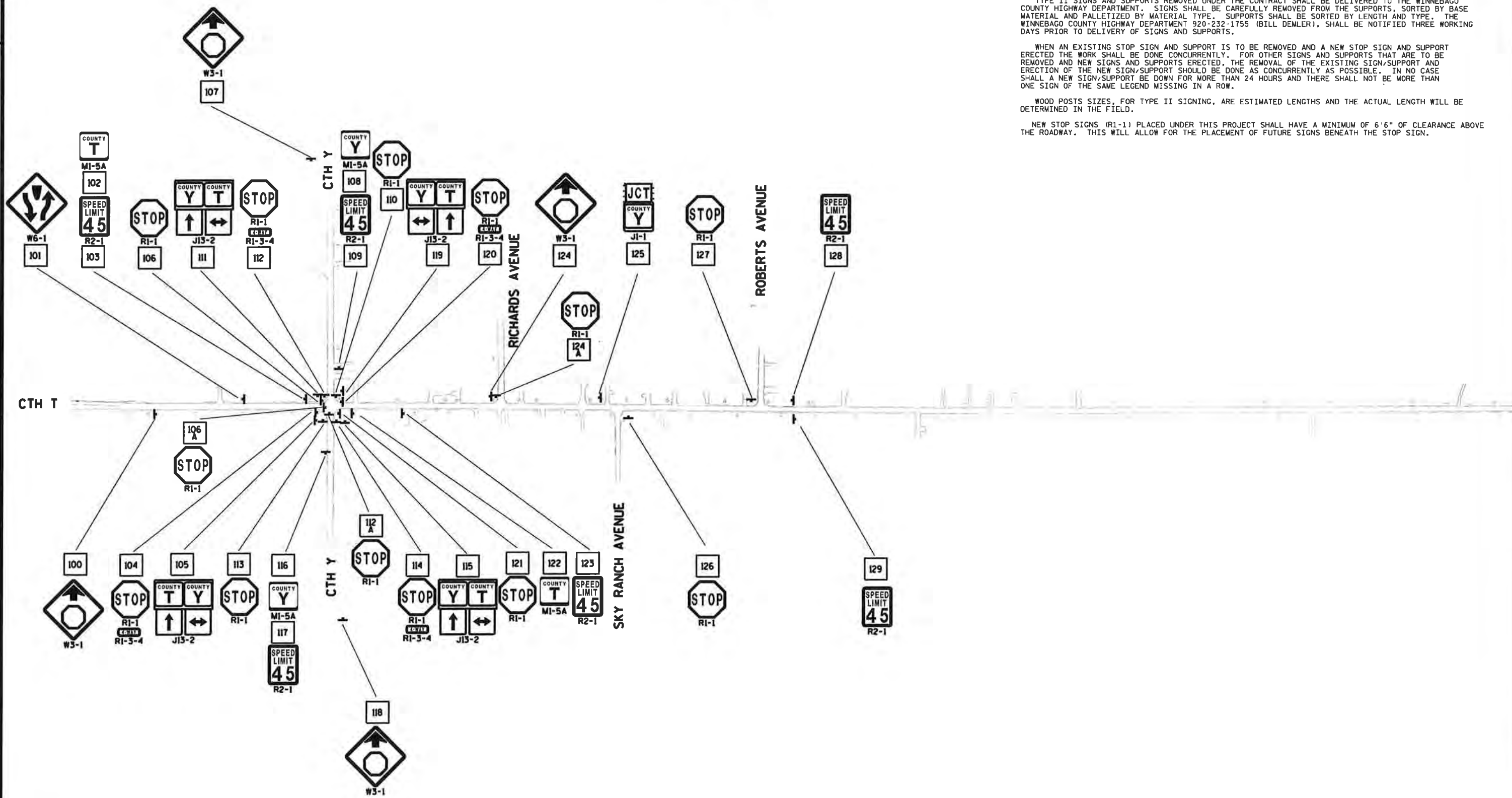
THE CONTRACTOR SHALL NOTIFY THE WINNEBAGO COUNTY HIGHWAY DEPARTMENT, 920-232-1755 (BILL DEMLER), A MINIMUM OF TWO WEEKS PRIOR TO THE NEED FOR SIGN PLACEMENT TO ALLOW FOR STAKING OF ANY PERMANENT SIGNING REQUIRED ON THE PROJECT.

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□ SIGN-REMOVE EXISTING



SIGNING NOTES

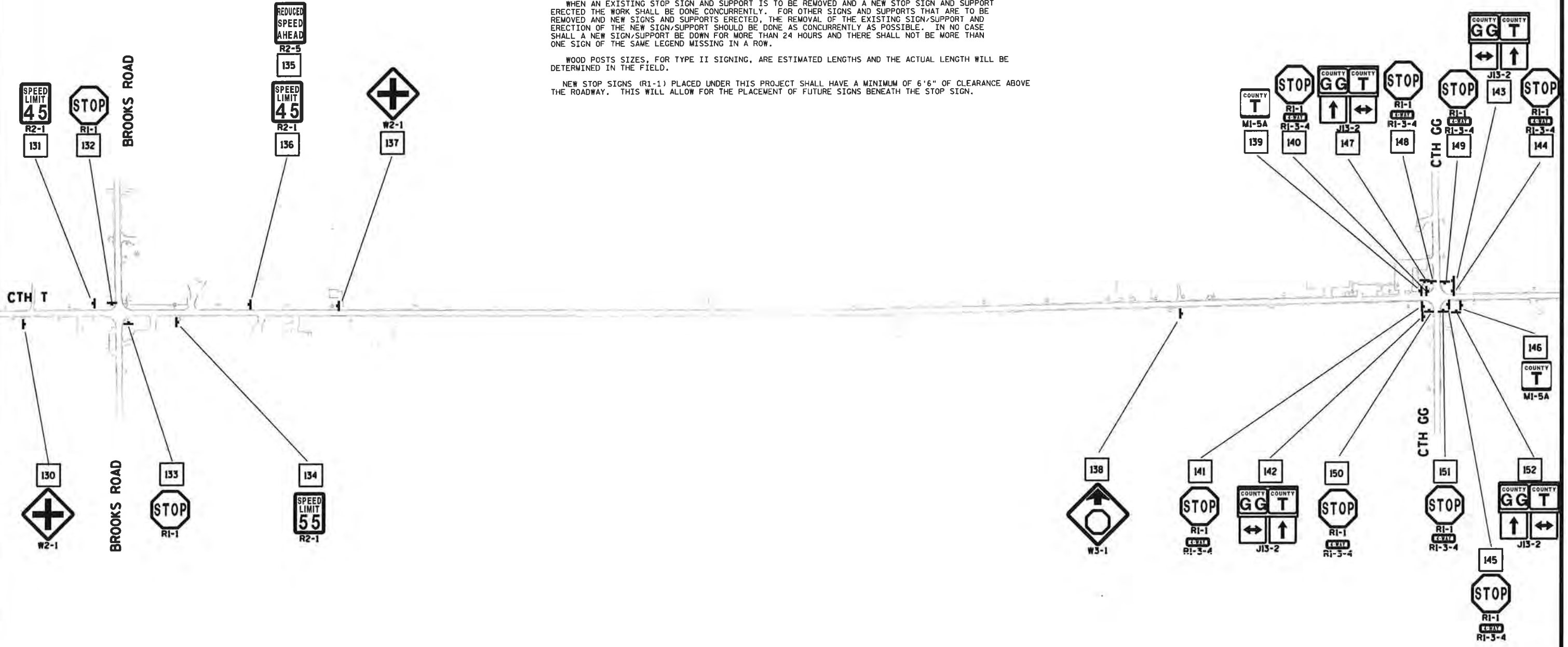
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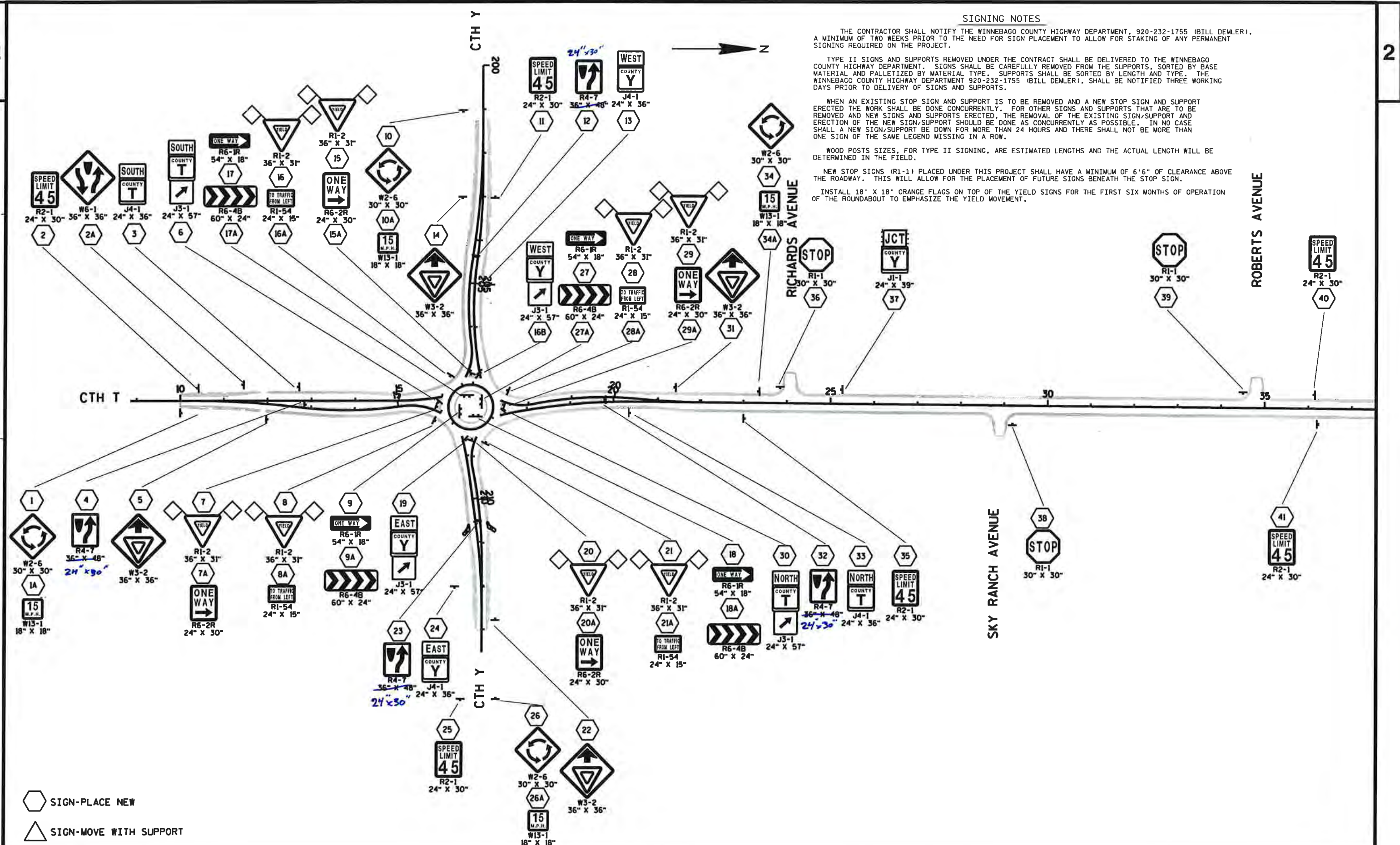
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INSTALL 18" X 18" ORANGE FLAGS ON TOP OF THE YIELD SIGNS FOR THE FIRST SIX MONTHS OF OPERATION OF THE ROUNDABOUT TO EMPHASIZE THE YIELD MOVEMENT.



 SIGN-PLACE NEW  
 SIGN-MOVE WITH SUPPORT



SIGNING NOTES

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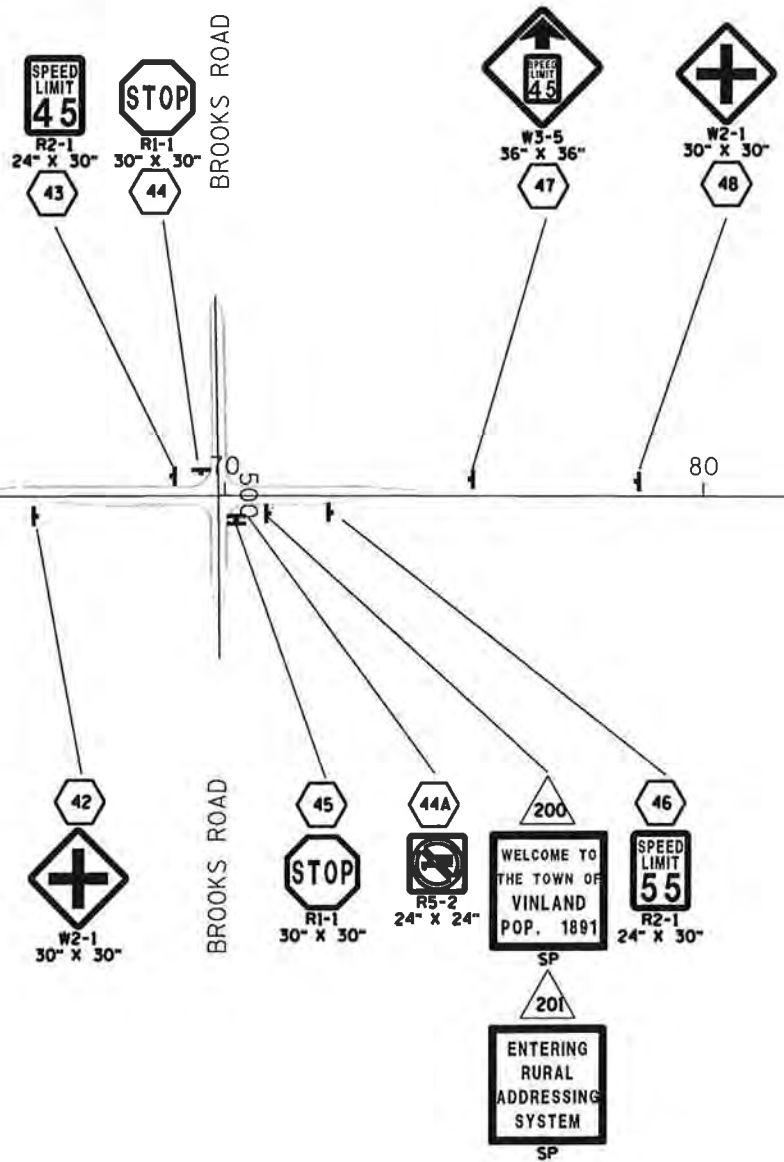
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40 50 60 80 90



- SIGN-PLACE NEW
- SIGN-MOVE WITH SUPPORT

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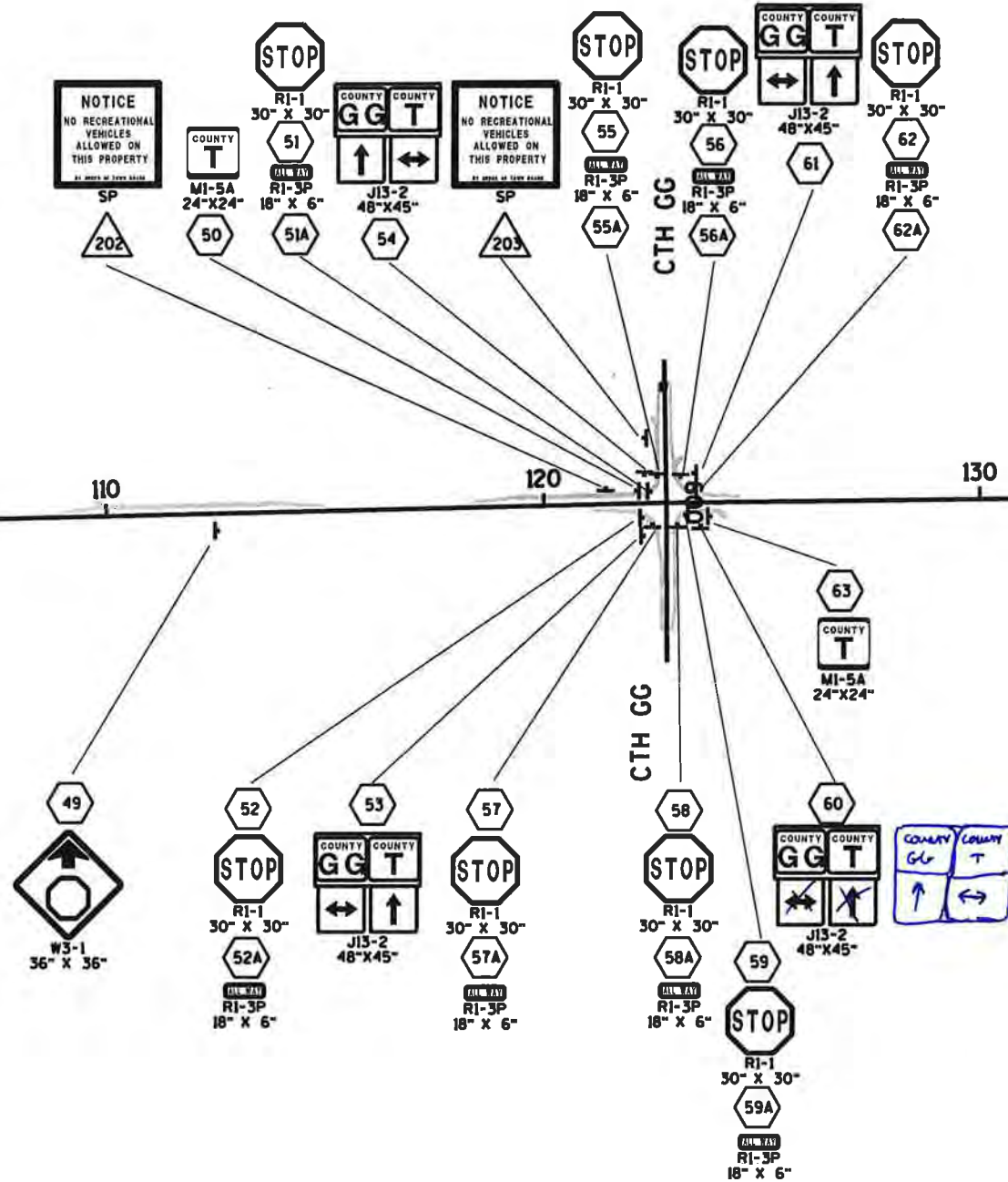
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

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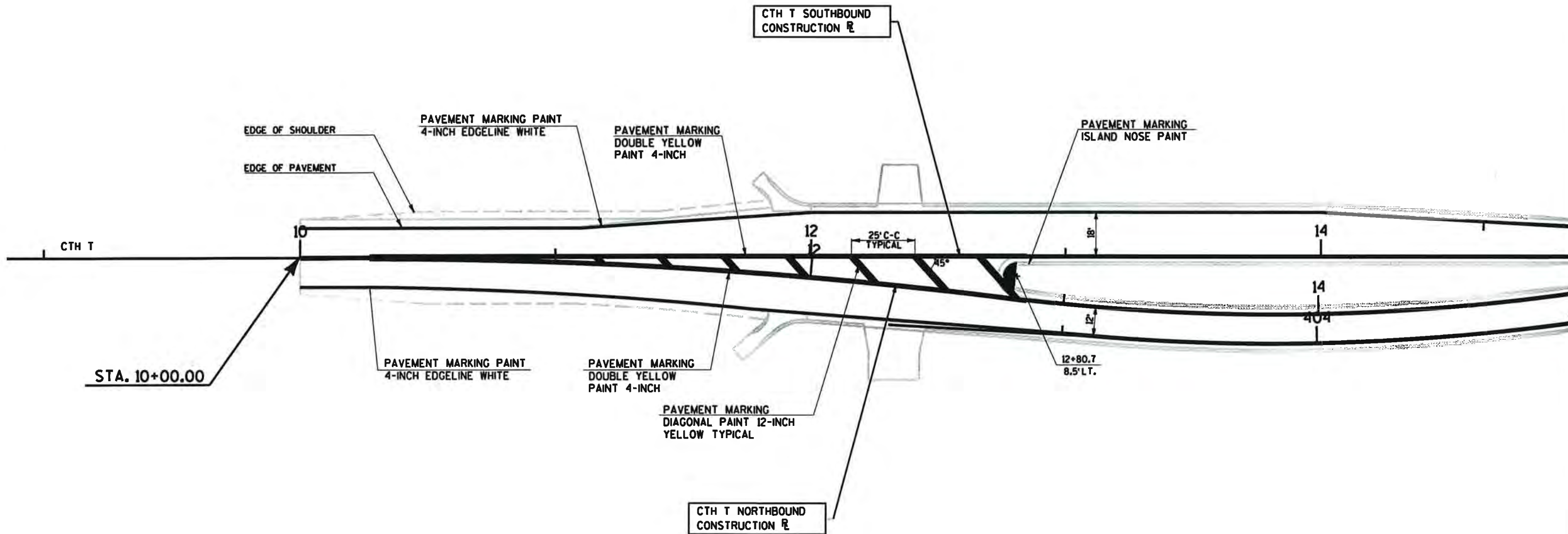
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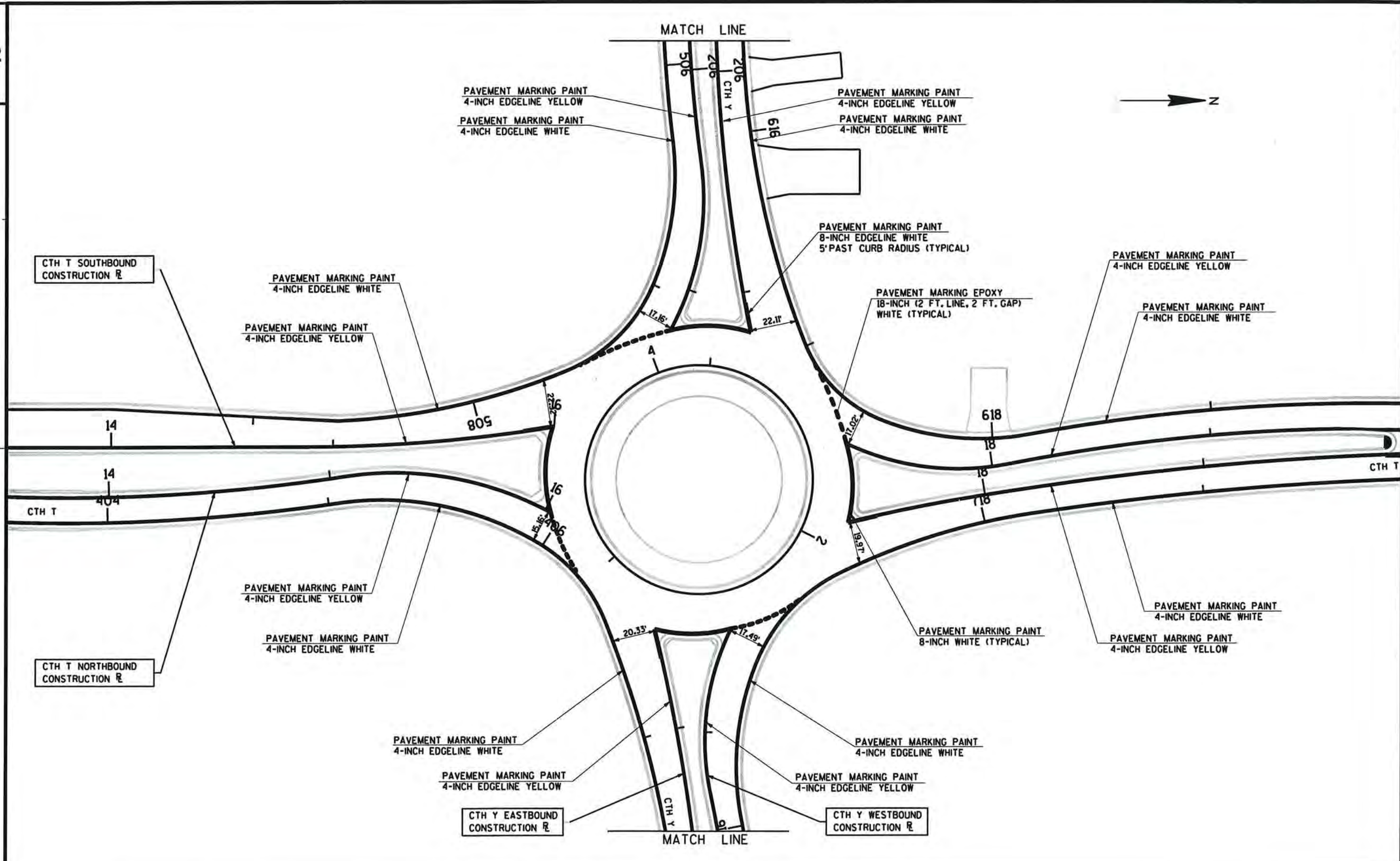
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-  SIGN-PLACE NEW
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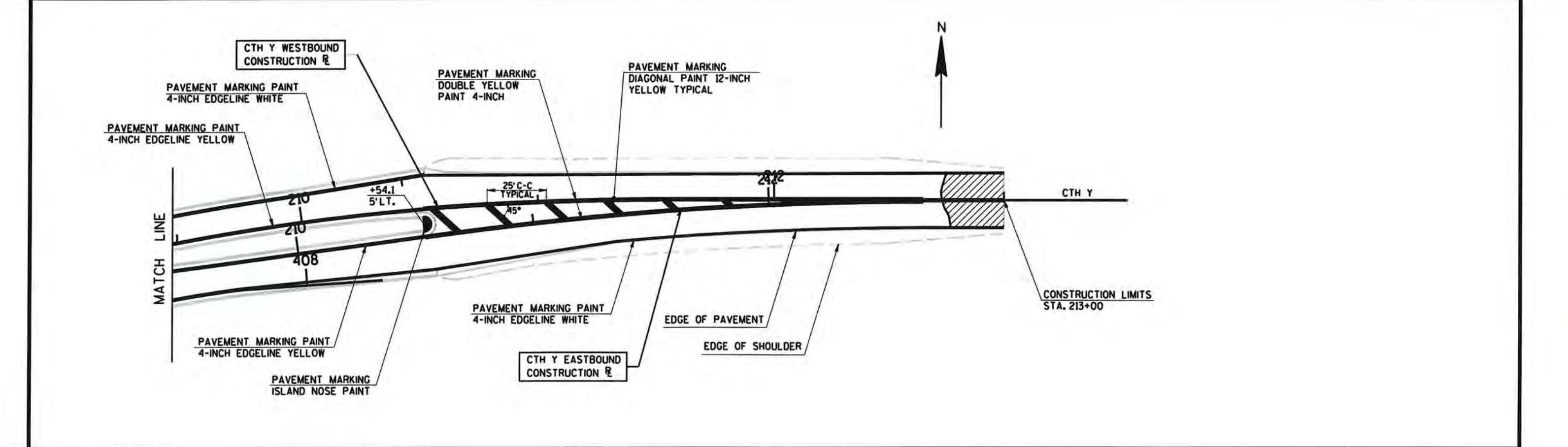
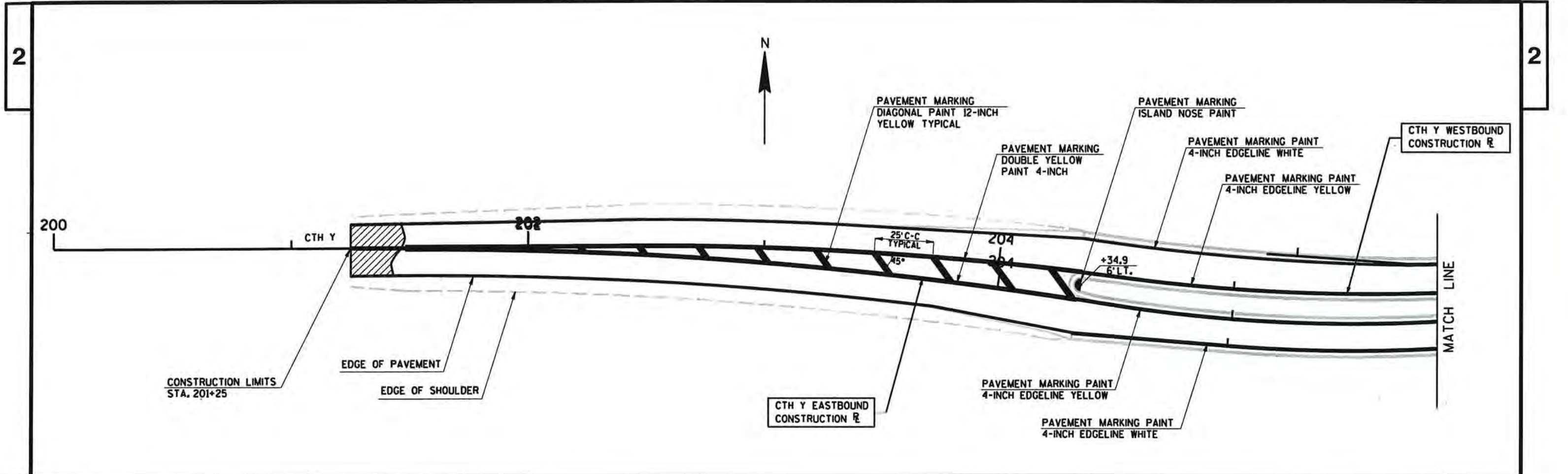


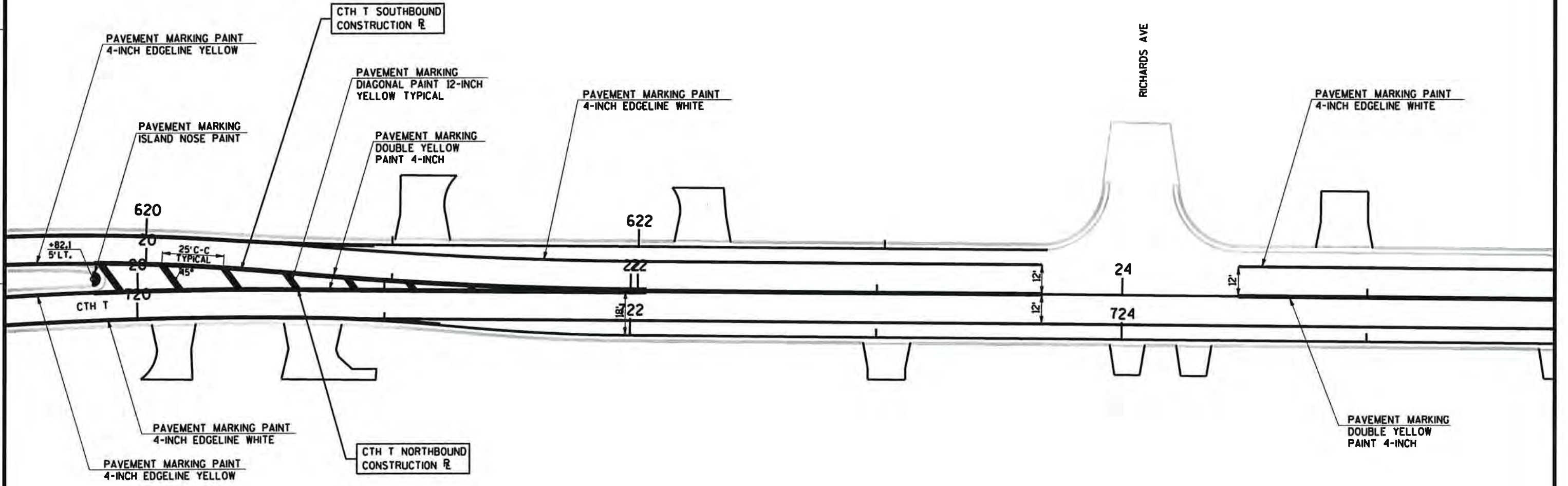
CTH T SOUTHBOUND  
CONSTRUCTION R

CTH T NORTHBOUND  
CONSTRUCTION R

CTH Y EASTBOUND  
CONSTRUCTION R

CTH Y WESTBOUND  
CONSTRUCTION R





NOTE:  
 USE STANDARD DETAIL DRAWING FOR  
 REMAINDER OF PROJECT STA. 24+00  
 TO STA. 125+00

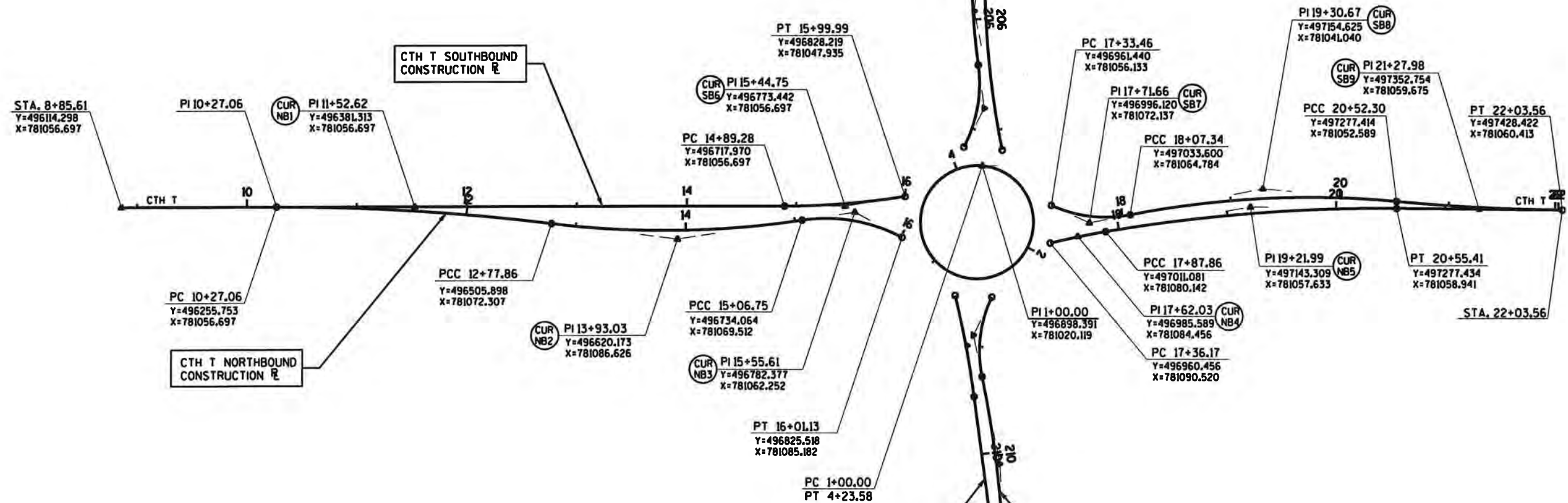
SB CTH T CONSTRUCTION  $\curvearrowright$  CURVE DATA

**CURVE SB6**

PISTA	15+44.75
Y	496773.442
X	781056.697
DELTA	-9°05'16"
D	8°12'31"
T	55.47'
L	110.71'
R	698.00'
PC STA	14+89.28
PT STA	15+99.99

SB CTH T CONSTRUCTION  $\curvearrowright$  CURVE DATA

CURVE SB7		CURVE SB8		CURVE SB9	
PISTA	17+71.66	PISTA	19+30.67	PISTA	21+27.98
Y	496996.120	Y	497154.625	Y	497352.754
X	781072.137	X	781041.040	X	781059.675
DELTA	-35°52'19"	DELTA	16°28'24"	DELTA	-4°48'53"
D	48°33'21"	D	6°43'29"	D	3°10'59"
T	38.19'	T	123.33'	T	75.67'
L	73.88'	L	244.96'	L	151.26'
R	118.00'	R	852.00'	R	1800.00'
PC STA	17+33.46	PC STA	18+07.34	PC STA	20+52.30
PT STA	18+07.34	PT STA	20+52.30	PT STA	22+03.56



NB CTH T CONSTRUCTION  $\curvearrowright$  CURVE DATA

CURVE NB1		CURVE NB2		CURVE NB3	
PISTA	11+52.62	PISTA	13+93.03	PISTA	15+55.61
Y	496381.313	Y	496620.173	Y	496782.377
X	781056.697	X	781086.626	X	781062.252
DELTA	7°08'31"	DELTA	-15°41'15"	DELTA	36°32'14"
D	2°50'52"	D	6°51'13"	D	38°42'48"
T	125.56'	T	115.17'	T	48.86'
L	250.79'	L	228.90'	L	94.38'
R	2012.00'	R	836.00'	R	148.00'
PC STA	10+27.06	PC STA	12+77.86	PC STA	15+06.75
PT STA	12+77.86	PT STA	15+06.75	PT STA	16+01.13

NB CTH T CONSTRUCTION  $\curvearrowright$  CURVE DATA

CURVE NB4		CURVE NB5	
PISTA	17+62.03	PISTA	19+21.99
Y	496985.589	Y	497143.309
X	781084.456	X	781057.633
DELTA	3°57'33"	DELTA	10°13'11"
D	7°39'36"	D	3°49'11"
T	25.85'	T	134.13'
L	51.69'	L	267.55'
R	748.00'	R	1500.00'
PC STA	17+36.17	PC STA	17+87.86
PT STA	17+87.86	PT STA	20+55.41

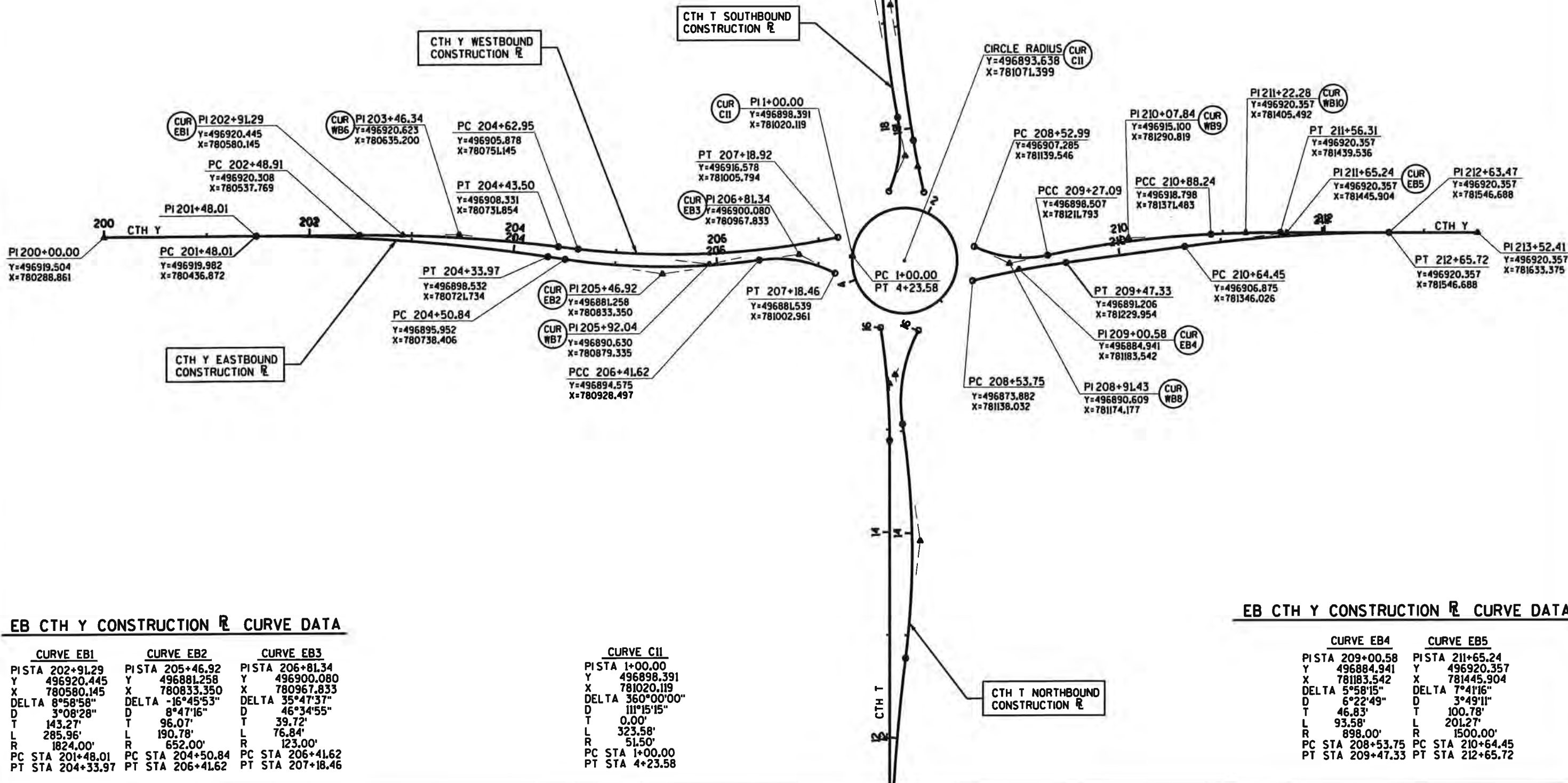


WB CTH Y CONSTRUCTION R CURVE DATA

CURVE WB6		CURVE WB7	
PISTA	203+46.34	PISTA	205+92.04
Y	496920.623	Y	496890.630
X	780635.200	X	780879.335
DELTA	7°25'58"	DELTA	-18°22'42"
D	3°49'11"	D	7°10'48"
T	97.43'	T	129.09'
L	194.59'	L	255.97'
R	1500.00'	R	798.00'
PC STA	202+48.91	PC STA	204+62.95
PT STA	204+43.50	PT STA	207+18.92

WB CTH Y CONSTRUCTION R CURVE DATA

CURVE WB8		CURVE WB9		CURVE WB10	
PISTA	208+91.43	PISTA	210+07.84	PISTA	211+22.28
Y	496890.609	Y	496915.100	Y	496920.357
X	781174.177	X	781290.819	X	781405.492
DELTA	-37°34'16"	DELTA	9°13'59"	DELTA	2°37'29"
D	50°42'15"	D	5°43'46"	D	3°51'21"
T	38.44'	T	80.75'	T	34.04'
L	74.10'	L	161.15'	L	68.08'
R	113.00'	R	1000.00'	R	1486.00'
PC STA	208+52.99	PC STA	209+27.09	PC STA	210+88.24
PT STA	209+27.09	PT STA	210+88.24	PT STA	211+56.31



EB CTH Y CONSTRUCTION R CURVE DATA

CURVE EB1		CURVE EB2		CURVE EB3		CURVE CII	
PISTA	202+91.29	PISTA	205+46.92	PISTA	206+81.34	PISTA	1+00.00
Y	496920.445	Y	496881.258	Y	496900.080	Y	496898.391
X	780580.145	X	780833.350	X	780967.833	X	781020.119
DELTA	8°58'58"	DELTA	-16°45'53"	DELTA	35°47'37"	DELTA	360°00'00"
D	3°08'28"	D	8°47'16"	D	46°34'55"	D	111°15'15"
T	143.27'	T	96.07'	T	39.72'	T	0.00'
L	285.96'	L	190.78'	L	76.84'	L	323.58'
R	1824.00'	R	652.00'	R	123.00'	R	51.50'
PC STA	201+48.01	PC STA	204+50.84	PC STA	206+41.62	PC STA	1+00.00
PT STA	204+33.97	PT STA	206+41.62	PT STA	207+18.46	PT STA	4+23.58

EB CTH Y CONSTRUCTION R CURVE DATA

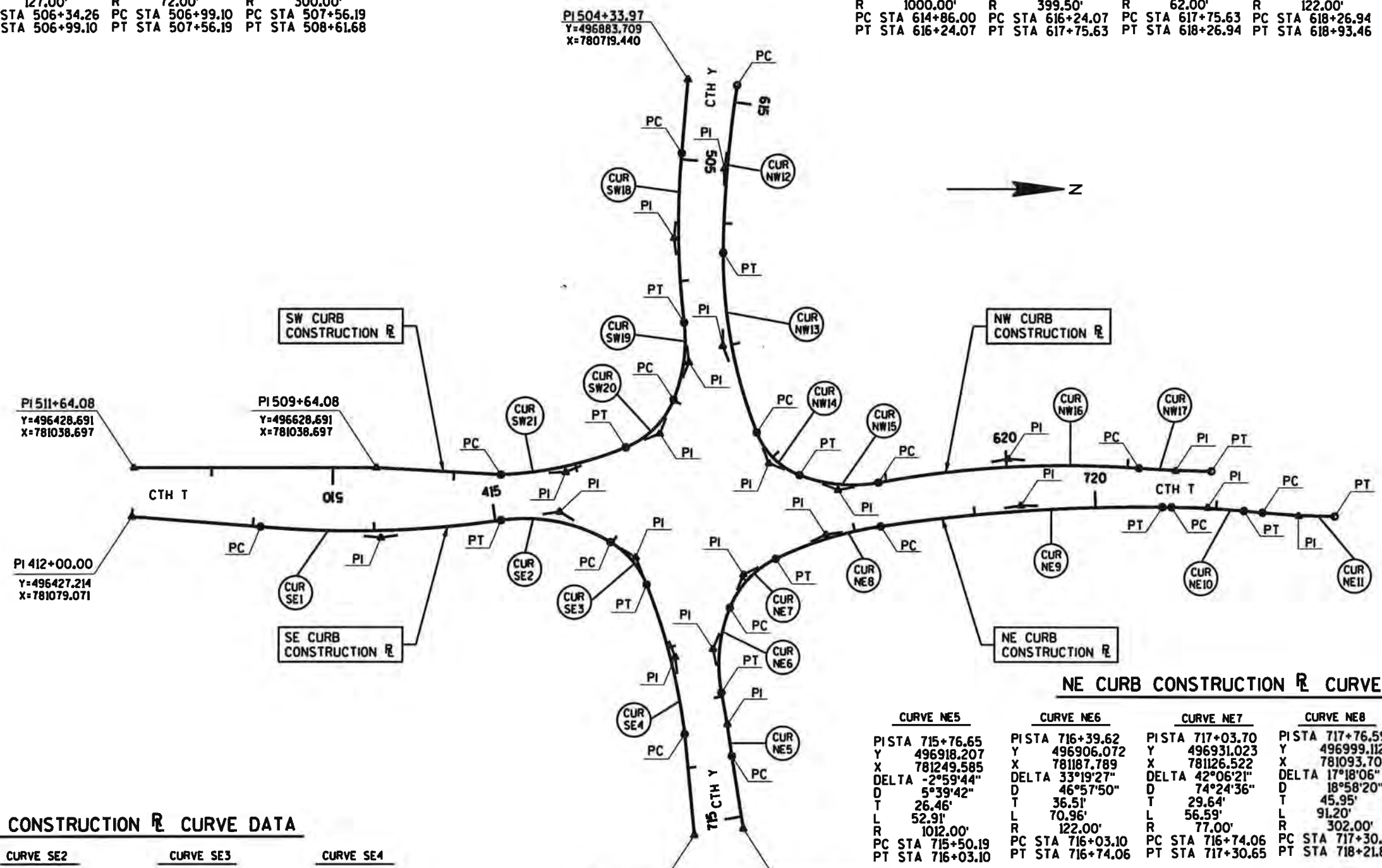
CURVE EB4		CURVE EB5	
PISTA	209+00.58	PISTA	211+65.24
Y	496884.941	Y	496920.357
X	781183.542	X	781445.904
DELTA	5°58'15"	DELTA	7°41'16"
D	6°22'49"	D	3°49'11"
T	46.83'	T	100.78'
L	93.58'	L	201.27'
R	898.00'	R	1500.00'
PC STA	208+53.75	PC STA	210+64.45
PT STA	209+47.33	PT STA	212+65.72

### SW CURB CONSTRUCTION CURVE DATA

CURVE SW18	CURVE SW19	CURVE SW20	CURVE SW21
PISTA 505+64.85	PISTA 506+67.40	PISTA 507+29.24	PISTA 508+09.48
Y 496872.713	Y 496885.306	Y 496861.357	Y 496784.188
X 780849.855	X 780952.152	X 781010.728	X 781042.439
DELTA -12°01'22"	DELTA 29°15'20"	DELTA 45°25'23"	DELTA 20°08'50"
D 8°37'44"	D 45°06'53"	D 79°34'39"	D 19°05'55"
T 69.92'	T 33.15'	T 30.14'	T 53.30'
L 139.33'	L 64.85'	L 57.08'	L 105.49'
R 664.00'	R 127.00'	R 72.00'	R 300.00'
PC STA 504+94.93	PC STA 506+34.26	PC STA 506+99.10	PC STA 507+56.19
PT STA 506+34.26	PT STA 506+99.10	PT STA 507+56.19	PT STA 508+61.68

### NW CURB CONSTRUCTION CURVE DATA

CURVE NW12	CURVE NW13	CURVE NW14	CURVE NW15	CURVE NW16	CURVE NW17
PISTA 615+55.14	PISTA 617+00.77	PISTA 618+02.85	PISTA 618+61.04	PISTA 620+02.09	PISTA 621+39.62
Y 496914.070	Y 496913.289	Y 496951.771	Y 497009.067	Y 497149.498	Y 497287.822
X 780792.715	X 780938.557	X 781035.097	X 781056.983	X 781031.373	X 781041.041
DELTA -7°54'39"	DELTA -21°44'12"	DELTA -47°24'42"	DELTA -31°14'27"	DELTA 14°19'60"	DELTA -3°26'22"
D 5°43'46"	D 14°20'31"	D 92°24'45"	D 46°57'50"	D 6°37'53"	D 5°43'46"
T 69.14'	T 76.70'	T 27.22'	T 34.11'	T 108.64'	T 30.02'
L 138.07'	L 151.56'	L 51.30'	L 66.52'	L 216.14'	L 60.03'
R 1000.00'	R 399.50'	R 62.00'	R 122.00'	R 864.00'	R 1000.00'
PC STA 614+86.00	PC STA 616+24.07	PC STA 617+75.63	PC STA 618+26.94	PC STA 618+93.46	PC STA 621+09.60
PT STA 616+24.07	PT STA 617+75.63	PT STA 618+26.94	PT STA 618+93.46	PT STA 621+09.60	PT STA 621+69.63



### SE CURB CONSTRUCTION CURVE DATA

CURVE SE1	CURVE SE2	CURVE SE3	CURVE SE4
PISTA 414+05.97	PISTA 415+53.43	PISTA 416+22.58	PISTA 417+08.99
Y 496632.457	Y 496779.305	Y 496841.906	Y 496874.683
X 781096.334	X 781075.112	X 781112.581	X 781194.389
DELTA -13°24'36"	DELTA 39°07'29"	DELTA 37°15'52"	DELTA 14°29'54"
D 6°45'24"	D 41°49'18"	D 79°34'39"	D 11°24'49"
T 99.69'	T 48.68'	T 24.28'	T 63.85'
L 198.47'	L 93.55'	L 46.83'	L 127.03'
R 848.00'	R 137.00'	R 72.00'	R 502.00'
PC STA 413+06.28	PC STA 415+04.75	PC STA 415+98.30	PC STA 416+45.13
PT STA 415+04.75	PT STA 415+98.30	PT STA 416+45.13	PT STA 417+72.16

### NE CURB CONSTRUCTION CURVE DATA

CURVE NE5	CURVE NE6	CURVE NE7	CURVE NE8	CURVE NE9	CURVE NE10	CURVE NE11
PISTA 715+76.65	PISTA 716+39.62	PISTA 717+03.70	PISTA 717+76.59	PISTA 719+38.85	PISTA 720+92.89	PISTA 721+68.09
Y 496918.207	Y 496906.072	Y 496931.023	Y 496999.112	Y 497160.310	Y 497314.815	Y 497389.753
X 781249.585	X 781187.789	X 781126.522	X 781093.700	X 781069.799	X 781071.306	X 781078.037
DELTA -2°59'44"	DELTA 33°19'27"	DELTA 42°06'21"	DELTA 17°18'06"	DELTA 8°59'34"	DELTA 4°34'26"	DELTA -4°34'26"
D 5°39'42"	D 46°57'50"	D 74°24'36"	D 18°58'20"	D 3°51'02"	D 7°38'22"	D 7°38'22"
T 26.46'	T 36.51'	T 29.64'	T 45.95'	T 117.01'	T 29.95'	T 29.95'
L 52.91'	L 70.96'	L 56.59'	L 91.20'	L 233.54'	L 59.87'	L 59.87'
R 1012.00'	R 122.00'	R 77.00'	R 302.00'	R 1488.00'	R 750.00'	R 750.00'
PC STA 715+50.19	PC STA 716+03.10	PC STA 716+74.06	PC STA 717+30.65	PC STA 718+21.84	PC STA 720+62.93	PC STA 721+38.14
PT STA 716+03.10	PT STA 716+74.06	PT STA 717+30.65	PT STA 718+21.84	PT STA 720+55.39	PT STA 721+22.81	PT STA 721+98.01

3

## GRUBBING

STATION	TO	STATION	LOCATION	201.0205 GRUBBING STA
11+00	-	12+00	CTH T	1
13+00	-	14+00	CTH T	1
19+00	-	21+00	CTH T	2
22+00	-	24+00	CTH T	2
25+00	-	27+00	CTH T	2
34+00	-	35+00	CTH T	1
36+00	-	38+00	CTH T	2
42+00	-	43+00	CTH T	1
54+00	-	59+00	CTH T	5
63+00	-	65+00	CTH T	2
66+00	-	69+00	CTH T	3
70+00	-	72+00	CTH T	2
74+00	-	80+00	CTH T	6
81+00	-	85+00	CTH T	4
87+00	-	89+00	CTH T	2
90+00	-	96+00	CTH T	6
97+00	-	101+00	CTH T	4
102+00	-	103+00	CTH T	1
106+00	-	110+00	CTH T	4
112+00	-	114+00	CTH T	2
115+00	-	116+00	CTH T	1
123+00	-	125+00	CTH T	2
206+00	-	207+00	CTH Y	1
497+00	-	499+00	BROOKS ROAD	2
501+00	-	502+00	BROOKS ROAD	1

TOTALS 60

## REMOVING PAVEMENT

STATION	LOCATION	204.0100 SY	REMARKS
10+00 - 124+00	CTH T	28,000	MAINLINE
22+30	CTH T, LT	30	PE
24+95	CTH T, LT	30	PE
32+60	CTH T, LT	35	PE
122+00	CTH T, LT	20	PE
499+55	BROOKS ROAD, LT	35	PE

TOTAL 28,150

## REMOVE AND SALVAGE OLD STRUCTURE (STATION 14+75)

STATION	LOCATION	SPV.0105.01 LS	DESCRIPTION
14+75	CTH T	1	2 - 72" x 60.5', CMP
TOTAL		1	

## REMOVING SMALL PIPE CULVERTS

STATION	LOCATION	203.0100 EACH	DESCRIPTION
18+15	CTH T, LT	1	18" X 21', CMP
20+15	CTH T, RT	1	18" X 18', CMP
20+75	CTH T, RT	1	18" X 24', CMP
21+15	CTH T, LT	1	18" X 21', CMP
22+30	CTH T, LT	1	15" X 26', CMP
23+00	CTH T, RT	1	15" X 20', CMP
24+00	CTH T, RT	1	18" X 17', CMP
24+00	CTH T, LT	1	18" X 46', CMP
24+32	CTH T, RT	1	18" X 16', CMP
24+95	CTH T, LT	1	18" X 32', CMP
25+80	CTH T, RT	1	12" X 20', CMP
26+60	CTH T, RT	1	15" X 21', CMP
27+40	CTH T, LT	1	15" X 30', CMP
27+40	CTH T, RT	1	15" X 20', CMP
28+50	CTH T, LT	1	15" X 21', CMP
28+89	CTH T, RT	1	15" X 50', CMP
30+15	CTH T, LT	1	15" X 25', CMP
30+75	CTH T, RT	1	18" X 20', CMP
31+25	CTH T, LT	1	15" X 24', CMP
32+60	CTH T, LT	1	15" X 25', CMP
34+15	CTH T, LT	1	15" X 25', CMP
34+82	CTH T, LT	1	18" X 42', CMP
36+24	CTH T	1	18" X 41', CMP
38+25	CTH T, LT	1	18" X 20', CMP
41+35	CTH T, RT	1	18" X 21', CMP
42+35	CTH T, LT	1	15" X 21', CMP
43+50	CTH T, LT	1	15" X 19', CMP
44+45	CTH T, LT	1	15" X 21', CMP
45+35	CTH T, LT	1	18" X 21', CMP
46+74	CTH T	1	18" X 43', CMP
48+00	CTH T, LT	1	18" X 25', CMP
49+25	CTH T, RT	1	15" X 17', CMP
53+50	CTH T, LT	1	15" X 24', CMP
56+50	CTH T, LT	1	18" X 20', CMP
57+80	CTH T, RT	1	15" X 28', CMP
60+09	CTH T	1	18" X 44', CMP
63+33	CTH T, LT	1	15" X 24', CMP
63+85	CTH T, LT	1	15" X 21', CMP
66+40	CTH T, LT	1	15" X 21', CMP
68+30	CTH T, RT	1	15" X 22', CMP

## REMOVING SMALL PIPE CULVERTS (CONTINUED)

STATION	LOCATION	203.0100 EACH	DESCRIPTION
71+25	CTH T, RT	1	18" X 30', CMP
72+80	CTH T, LT	1	12" X 44', CMP
72+85	CTH T	1	36" X 51', CMP
72+95	CTH T	1	36" X 51', CMP
75+55	CTH T, RT	1	18" X 31', CMP
77+00	CTH T, RT	1	18" X 31', CMP
78+80	CTH T, LT	1	18" X 20', CMP
80+90	CTH T, RT	1	18" X 28', CMP
83+08	CTH T, LT	1	18" X 28', CMP
84+32	CTH T	1	18" X 51', CMP
91+35	CTH T, LT	1	15" X 20', CMP
95+92	CTH T	1	24" X 55', CMP
101+15	CTH T, LT	1	15" X 23', CMP
105+20	CTH T, RT	1	15" X 17', CMP
107+53	CTH T	1	18" X 47', CMP
110+30	CTH T, LT	1	15" X 43', CMP
113+65	CTH T, LT	1	15" X 20', CMP
118+45	CTH T, LT	1	18" X 36', CMP
119+18	CTH T, LT	1	18" X 23', CMP
120+00	CTH T, LT	1	18" X 82', CMP
121+50	CTH T, LT	1	15" X 30', CMP
122+00	CTH T, LT	1	15" X 42', CMP
126+65	CTH T, RT	1	15" X 31', CMP
201+75	CTH Y, LT	1	15" X 20', CMP
202+00	CTH Y, RT	1	18" X 64', RCCP
205+86	CTH Y	1	42" X 60" X 57', CMP
206+05	CTH Y, LT	1	15" X 25', CMP
206+50	CTH Y, LT	1	15" X 30', CMP
212+65	CTH Y, RT	1	18" X 45', CMP
499+50	BROOKS ROAD, LT	1	15" X 36', RCCP
499+80	BROOKS ROAD	1	15" X 72', RCCP
501+20	BROOKS ROAD, LT	1	15" X 20', CMP
501+60	BROOKS ROAD, RT	1	15" X 31', CMP
598+50	CTH GG, RT	1	15" X 30', CMP
600+30	CTH GG	1	15" X 18" X 44', CMP
601+23	CTH GG, LT	1	12" X 26', CMP

TOTAL 76

## ASPHALT PAVEMENT MILLING

STATION	TO	STATION	LOCATION	SPV.0180.02 SY
10+00	-	69+50	CTH T	14,500
201+25	-	207+57	CTH Y, WB	1,550
207+84	-	213+00	CTY Y, WB	1,250
TOTAL				17,300

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## GRUBBING

STATION	TO	STATION	LOCATION	201.0205 GRUBBING STA
11+00	-	12+00	CTH T	1
13+00	-	14+00	CTH T	1
19+00	-	21+00	CTH T	2
22+00	-	24+00	CTH T	2
25+00	-	27+00	CTH T	2
34+00	-	35+00	CTH T	1
36+00	-	38+00	CTH T	2
42+00	-	43+00	CTH T	1
54+00	-	59+00	CTH T	5
63+00	-	65+00	CTH T	2
66+00	-	69+00	CTH T	3
70+00	-	72+00	CTH T	2
74+00	-	80+00	CTH T	6
81+00	-	85+00	CTH T	4
87+00	-	89+00	CTH T	2
90+00	-	96+00	CTH T	6
97+00	-	101+00	CTH T	4
102+00	-	103+00	CTH T	1
106+00	-	110+00	CTH T	4
112+00	-	114+00	CTH T	2
115+00	-	116+00	CTH T	1
123+00	-	125+00	CTH T	2
206+00	-	207+00	CTH Y	1
497+00	-	499+00	BROOKS ROAD	2
501+00	-	502+00	BROOKS ROAD	1

TOTALS 60

## REMOVING PAVEMENT

STATION	LOCATION	204.0100 SY	REMARKS
10+00 - 124+00	CTH T	28,000	MAINLINE
22+30	CTH T, LT	30	PE
24+95	CTH T, LT	30	PE
32+60	CTH T, LT	35	PE
122+00	CTH T, LT	20	PE
499+55	BROOKS ROAD, LT	35	PE

TOTAL 28,150

## REMOVING SMALL PIPE CULVERTS

STATION	LOCATION	203.0100 EACH	DESCRIPTION
18+15	CTH T, LT	1	18" X 21', CMP
20+15	CTH T, RT	1	18" X 18', CMP
20+75	CTH T, RT	1	18" X 24', CMP
21+15	CTH T, LT	1	18" X 21', CMP
22+30	CTH T, LT	1	15" X 26', CMP
23+00	CTH T, RT	1	15" X 20', CMP
24+00	CTH T, RT	1	18" X 17', CMP
24+00	CTH T, LT	1	18" X 46', CMP
24+32	CTH T, RT	1	18" X 16', CMP
24+95	CTH T, LT	1	18" X 32', CMP
25+80	CTH T, RT	1	12" X 20', CMP
26+60	CTH T, RT	1	15" X 21', CMP
27+40	CTH T, LT	1	15" X 30', CMP
27+40	CTH T, RT	1	15" X 20', CMP
28+50	CTH T, LT	1	15" X 21', CMP
28+89	CTH T, RT	1	15" X 50', CMP
30+15	CTH T, LT	1	15" X 25', CMP
30+75	CTH T, RT	1	18" X 20', CMP
31+25	CTH T, LT	1	15" X 24', CMP
32+60	CTH T, LT	1	15" X 25', CMP
34+15	CTH T, LT	1	15" X 25', CMP
34+82	CTH T, LT	1	18" X 42', CMP
36+24	CTH T	1	18" X 41', CMP
38+25	CTH T, LT	1	18" X 20', CMP
41+35	CTH T, RT	1	18" X 21', CMP
42+35	CTH T, LT	1	15" X 21', CMP
43+50	CTH T, LT	1	15" X 19', CMP
44+45	CTH T, LT	1	15" X 21', CMP
45+35	CTH T, LT	1	18" X 21', CMP
46+74	CTH T	1	18" X 43', CMP
48+00	CTH T, LT	1	18" X 25', CMP
49+25	CTH T, RT	1	15" X 17', CMP
53+50	CTH T, LT	1	15" X 24', CMP
56+50	CTH T, LT	1	18" X 20', CMP
57+80	CTH T, RT	1	15" X 28', CMP
60+09	CTH T	1	18" X 44', CMP
63+33	CTH T, LT	1	15" X 24', CMP
63+85	CTH T, LT	1	15" X 21', CMP
66+40	CTH T, LT	1	15" X 21', CMP
68+30	CTH T, RT	1	15" X 22', CMP

## REMOVING SMALL PIPE CULVERTS (CONTINUED)

STATION	LOCATION	203.0100 EACH	DESCRIPTION
71+25	CTH T, RT	1	18" X 30', CMP
72+80	CTH T, LT	1	12" X 44', CMP
72+85	CTH T	1	36" X 51', CMP
72+95	CTH T	1	36" X 51', CMP
75+55	CTH T, RT	1	18" X 31', CMP
77+00	CTH T, RT	1	18" X 31', CMP
78+80	CTH T, LT	1	18" X 20', CMP
80+90	CTH T, RT	1	18" X 28', CMP
83+08	CTH T, LT	1	18" X 28', CMP
84+32	CTH T	1	18" X 51', CMP
91+35	CTH T, LT	1	15" X 20', CMP
95+92	CTH T	1	24" X 55', CMP
101+15	CTH T, LT	1	15" X 23', CMP
105+20	CTH T, RT	1	15" X 17', CMP
107+53	CTH T	1	18" X 47', CMP
110+30	CTH T, LT	1	15" X 43', CMP
113+65	CTH T, LT	1	15" X 20', CMP
118+45	CTH T, LT	1	18" X 36', CMP
119+18	CTH T, LT	1	18" X 23', CMP
120+00	CTH T, LT	1	18" X 82', CMP
121+50	CTH T, LT	1	15" X 30', CMP
122+00	CTH T, LT	1	15" X 42', CMP
126+65	CTH T, RT	1	15" X 31', CMP
201+75	CTH Y, LT	1	15" X 20', CMP
202+00	CTH Y, RT	1	18" X 64', RCCP
205+86	CTH Y	1	42" X 60" X 57', CMP
206+05	CTH Y, LT	1	15" X 25', CMP
206+50	CTH Y, LT	1	15" X 30', CMP
212+65	CTH Y, RT	1	18" X 45', CMP
499+50	BROOKS ROAD, LT	1	15" X 36', RCCP
499+80	BROOKS ROAD	1	15" X 72', RCCP
501+20	BROOKS ROAD, LT	1	15" X 20', CMP
501+60	BROOKS ROAD, RT	1	15" X 31', CMP
598+50	CTH GG, RT	1	15" X 30', CMP
600+30	CTH GG	1	15" X 18" X 44', CMP
601+23	CTH GG, LT	1	12" X 26', CMP
TOTAL		76	

## REMOVE AND SALVAGE OLD STRUCTURE (STATION 14+75)

STATION	LOCATION	SPV.0105.01 LS	DESCRIPTION
14+75	CTH T	1	2 - 72" x 60.5', CMP
TOTAL		1	

See Addendum Sheet

**EARTHWORK SUMMARY**

Division	From/To Station	Location	Common Excavation (1) (item # 205.0100)		Available Material (5)	Rock Excavation (7) (item #205.0200)	Expanded EBS Backfill (11) Factor 1.30	Unexpanded Fill	Expanded Fill (13) Factor 1.30	Mass Ordinate +/- (14)	Waste	Comment:
			Cut	EBS Excavation (3)								
1	1+00 - 4+23.58	ROUNDAABOUT	300	0	300	0	0	1,662	2,161	-1,861	0	
	10+00 - 48+50	CTH T	13,697	0	13,697	544	0	2,075	1,919	11,778	11,778	
	48+50 - 124+00	CTH T	18,701	1,063	18,701	0	1,382	5,993	7,790	10,911	10,911	
	201+25 - 213+00	CTH Y	2,683	0	2,683	0	0	1,678	2,181	502	502	
	496+00 - 502+20	BROOKS ROAD	1,532	0	1,532	0	0	37	48	1,484	1,484	
	597+25 - 602+85	CTH GG UNDISTRIBUTED	1,509 0	0 1,000	1,509 0	0 456	0 1,300	56 0	72 0	1,437 0	1,437 0	
Division 1 Total			38,422	2,063	38,422	1,000	2,682	11,500	14,172	24,250	26,111	
Total Common Exc			40,485									

- 1) Common Excavation is the sum of the Cut and EBS Excavation columns. Item number 205.0100
- 3) EBS Excavation to be backfilled with Waste material.
- 5) Available Material = Cut
- 7) Rock Excavation
- 11) Expanded EBS Backfill - This is to be filled with Waste material. EBS Backfill Factor = 1.3.
- 13) Expanded Fill. Factor = 1.3 Expanded Fill = Unexpanded Fill \* Fill Factor
- 14) The Mass Ordinate + or - Qty calculated for the Division. Plus quantity indicates an excess of material within the Division. Minus indicates a shortage of material within the Division.

BASE AGGREGATE DENSE

REMOVING BUILDING FOUNDATION

STATION TO STATION	LOCATION	204.9035.S.01 CY
15+00 - 17+00	CTH T, NB, RT	33
TOTAL		33

REMOVING FENCE

STATION TO STATION	LOCATION	204.0170 LF
124+29 - 125+35	CTH T, RT	106
TOTALS		106

STATION TO STATION	LOCATION	305.0120 1 1/4-INCH TON	305.0110 3/4-INCH TON
10+00 - 12+00	CTH T	305	-
12+00 - 16+00	CTH T	1590	-
1+00 - 4+24	ROUNDAABOUT	720	-
17+34 - 48+50	CTH T	8935	-
48+50 - 65+65	CTH T	4490	-
65+65 - 73+00	CTH T	1,930	-
73+00 - 99+24	CTH T	6,810	-
99+24 - 103+83	CTH T	1,270	-
103+83 - 109+33	CTH T	1,430	-
109+33 - 114+55	CTH T	1,420	-
114+55 - 118+73	CTH T	1,085	-
118+73 - 124+00	CTH T	1,475	-
201+25 - 207+19	CTH Y	1,860	-
208+53 - 213+00	CTH Y	1,330	-
	RICHARDS AVENUE	150	-
	SKY RANCH AVENUE	145	-
	ROBERTS AVENUE	150	-
496+00 - 499+82	BROOKS ROAD	980	-
500+18 - 502+20	BROOKS ROAD	560	-
597+25 - 599+82	CTH GG	770	-
600+18 - 602+90	CTH GG	795	-
ENTIRE PROJECT REPLACING CABG DRIVEWAYS		-	550
TOTALS		38,200	550

BREAKER RUN AND GEOTEXTILE TYPE SR FABRIC

STATION	LOCATION	311.0110 BREAKER RUN TON	645.0135 TYPE SR SY
UNDISTRIBUTED	CTH T	1,000	750
TOTALS		1,000	750

CONCRETE PAVEMENT

STATION TO STATION	LOCATION	405.0100 COLORING CONCRETE RED CY	416.0512 ROUNDAABOUT TRUCK APRON 12-INCH SY
1+00 - 4+24	ROUNDAABOUT	120	355
TOTALS		120	355

NOTE: 3/4-INCH BASE AGGREGATE DENSE FOR SHOULDERING NOT INCLUDED IN SUMMARY, COUNTY TO PERFORM WORK.

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## CULVERT PIPES

STATION	LOCATION	521.0118	521.0124	521.0721	521.0728	521.0735	521.0749	SPV.0090.01	522.0154	THICKNESS	ELEVATION	END OF PIPE OFFSETS	
		CULVERT PIPE CORRUGATED STEEL 18-INCH LF	CULVERT PIPE CORRUGATED STEEL 24-INCH LF	PIPE ARCH CORRUGATED STEEL 21 X 15-INCH LF	PIPE ARCH CORRUGATED STEEL 28 X 20-INCH LF	PIPE ARCH CORRUGATED STEEL 35 X 24-INCH LF	PIPE ARCH CORRUGATED STEEL 49 X 33-INCH LF	PIPE ARCH CORRUGATED STEEL 73 X 55-INCH LF	REINFORCED CONCRETE CLASS III 54-INCH LF				INLET
14+67	CTH T	-	-	-	-	-	-	116	-	0.064	767.60	765.00	14+94.1 NB, 58.4' LT. 14+46.5 NB, 47.4' RT.
14+78	CTH T	-	-	-	-	-	-	116	-	0.064	767.60	765.00	15+05.3 NB, 57' LT. 14+56.4 NB, 48.4' RT.
60+09	CTH T	-	-	-	56	-	-	-	-	0.064	801.75	801.58	60+09, 28.5' LT. 60+09, 27.5' RT.
73+00	CTH T	-	-	-	-	-	86	-	-	0.109	807.00	806.75	73+27.5, 33' LT. 72+72.5, 33' RT.
73+10	CTH T	-	-	-	-	-	86	-	-	0.109	807.00	806.75	73+37.5, 33' LT. 72+82.5, 33' RT.
84+32	CTH T	-	-	-	-	58	-	-	-	0.079	816.25	815.90	84+32, 28.5' LT. 84+32, 29.5' RT.
95+92	CTH T	-	70	-	-	-	-	-	-	0.064	821.55	821.30	95+92, 35.5' LT. 95+92, 34.5' RT.
107+53	CTH T	-	70	-	-	-	-	-	-	0.064	830.75	830.40	107+53, 34.5' LT. 107+53, 35.5' RT.
117+00	CTH T	-	-	-	58	-	-	-	-	0.064	835.25	835.00	117+00, 28.5' LT. 117+00, 29.5' RT.
206+05	CTH Y	-	-	-	-	-	-	-	96	-	771.50	770.35	205+71.9 EB, 57.3' LT. 206+24 EB, 42.1' RT.
49+25	CTH T, RT	36	-	-	-	-	-	-	-	0.064	-	-	-
53+50	CTH T, LT	-	-	36	-	-	-	-	-	0.064	-	-	-
63+33	CTH T, LT	-	-	36	-	-	-	-	-	0.064	-	-	-
63+85	CTH T, LT	38	-	-	-	-	-	-	-	0.064	-	-	-
75+55	CTH T, RT	44	-	-	-	-	-	-	-	0.064	-	-	-
77+00	CTH T, RT	34	-	-	-	-	-	-	-	0.064	-	-	-
78+80	CTH T, LT	32	-	-	-	-	-	-	-	0.064	-	-	-
83+08	CTH T, LT	36	-	-	-	-	-	-	-	0.064	-	-	-
88+65	CTH T, RT	-	-	36	-	-	-	-	-	0.064	-	-	-
91+35	CTH T, LT	-	-	36	-	-	-	-	-	0.064	-	-	-
99+00	CTH T, RT	30	-	-	-	-	-	-	-	0.064	-	-	-
99+70	CTH T, LT	36	-	-	-	-	-	-	-	0.064	-	-	-
101+15	CTH T, LT	52	-	-	-	-	-	-	-	0.064	-	-	-
105+20	CTH T, RT	40	-	-	-	-	-	-	-	0.064	-	-	-
118+45	CTH T, LT	50	-	-	-	-	-	-	-	0.064	-	-	-
126+65	CTH T, RT	-	-	-	38	-	-	-	-	0.064	-	-	-
201+75	CTH Y, LT	-	-	32	-	-	-	-	-	0.064	-	-	-
202+00	CTH Y, RT	-	-	54	-	-	-	-	-	0.064	-	-	-
206+00	CTH Y, LT	30	-	-	-	-	-	-	-	0.064	-	-	-
212+65	CTH Y, RT	46	-	-	-	-	-	-	-	0.064	-	-	-
TOTALS		504	140	230	152	58	172	232	96				

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## APRON ENDWALLS

STATION	LOCATION	521.1018 CULVERT PIPE STEEL 18-INCH EACH	521.1024 CULVERT PIPE STEEL 24-INCH EACH	521.1221 PIPE ARCH STEEL 21 X 15-INCH EACH	521.1228 PIPE ARCH STEEL 28 X 20-INCH EACH	521.1235 PIPE ARCH STEEL 35 X 24-INCH EACH	521.1249 PIPE ARCH STEEL 49 X 33-INCH EACH	522.1054 CULVERT PIPE REINFORCED CONCRETE 54-INCH EACH
60+09	CTH T	-	-	-	2	-	-	-
73+00	CTH T	-	-	-	-	-	2	-
73+10	CTH T	-	-	-	-	-	2	-
84+32	CTH T	-	-	-	-	2	-	-
95+92	CTH T	-	2	-	-	-	-	-
107+53	CTH T	-	2	-	-	-	-	-
117+00	CTH T	-	-	-	2	-	-	-
206+05	CTH Y	-	-	-	-	-	-	2
49+25	CTH T, RT	2	-	-	-	-	-	-
53+50	CTH T, LT	-	-	2	-	-	-	-
63+33	CTH T, LT	-	-	2	-	-	-	-
63+85	CTH T, LT	2	-	-	-	-	-	-
75+55	CTH T, RT	2	-	-	-	-	-	-
77+00	CTH T, RT	2	-	-	-	-	-	-
78+80	CTH T, LT	2	-	-	-	-	-	-
83+08	CTH T, LT	2	-	-	-	-	-	-
88+65	CTH T, RT	-	-	2	-	-	-	-
91+35	CTH T, LT	-	-	2	-	-	-	-
99+00	CTH T, RT	2	-	-	-	-	-	-
99+70	CTH T, LT	2	-	-	-	-	-	-
101+15	CTH T, LT	2	-	-	-	-	-	-
105+20	CTH T, RT	2	-	-	-	-	-	-
118+45	CTH T, LT	2	-	-	-	-	-	-
126+65	CTH T, RT	-	-	-	2	-	-	-
201+75	CTH Y, LT	-	-	2	-	-	-	-
202+00	CTH Y, RT	-	-	2	-	-	-	-
206+00	CTH Y, LT	2	-	-	-	-	-	-
212+65	CTH Y, RT	2	-	-	-	-	-	-
TOTALS		26	4	12	6	2	4	2

STORM SEWER PIPE

TO	FROM	LOCATION	608.0312	608.0315	608.0318	608.0321	608.0324	611.9800.S	INLET ELEVATION	DISCHARGE ELEVATION	SLOPE FT/FT
			REINFORCED CONCRETE CLASS III 12-INCH LF	REINFORCED CONCRETE CLASS III 15-INCH LF	REINFORCED CONCRETE CLASS III 18-INCH LF	REINFORCED CONCRETE CLASS III 21-INCH LF	REINFORCED CONCRETE CLASS III 24-INCH LF	PIPE GRATES EACH			
1	1A	CTH T	37	-	-	-	-	-	768.94	768.75	0.0050
1A	1B	CTH T	14	-	-	-	-	-	769.01	768.94	0.0050
2	3	CTH T	-	-	-	-	-	44	769.95	769.25	0.0160
3	3A	ROUNDAABOUT	45	-	-	-	-	-	772.23	772.00	0.0050
3A	3B	ROUNDAABOUT	10	-	-	-	-	-	772.28	772.23	0.0050
3	4	CTH T	-	-	-	-	158	-	772.47	769.94	0.0160
4	4A	CTH T	9	-	-	-	-	-	773.55	773.50	0.0050
4A	4B	CTH T	18	-	-	-	-	-	773.64	773.55	0.0050
4	4C	CTH T	8	-	-	-	-	-	773.54	773.50	0.0050
4C	4D	CTH T	18	-	-	-	-	-	773.63	773.54	0.0050
4	5	CTH T	-	-	-	-	283	-	777.00	772.47	0.0160
5	5A	CTH T	8	-	-	-	-	-	778.04	778.00	0.0050
5	5B	CTH T	26	-	-	-	-	-	778.13	778.00	0.0050
5	6	CTH T	-	-	-	-	276	-	779.75	777.00	0.0100
6	6A	CTH T	22	-	-	-	-	-	780.36	780.25	0.0050
6	7	CTH T	-	-	-	-	125	-	781.00	779.75	0.0100
7	7A	CTH T	8	-	-	-	-	-	782.04	782.00	0.0050
7A	7B	CTH T	14	-	-	-	-	-	782.11	782.04	0.0050
7	7C	CTH T	26	-	-	-	-	-	782.13	782.00	0.0050
7C	7D	CTH T	22	-	-	-	-	-	782.24	782.13	0.0050
7D	7E	CTH T	54	-	-	-	-	-	782.51	782.24	0.0050
7	8	CTH T	-	-	-	-	315	-	782.58	781.00	0.0050
8	8A	CTH T	14	-	-	-	-	-	786.07	786.00	0.0050
8	8B	CTH T	26	-	-	-	-	-	786.13	786.00	0.0050
8	9	CTH T	-	-	-	-	167	-	783.33	782.58	0.0045
9	9A	CTH T	14	-	-	-	-	-	787.07	787.00	0.0050
9	10	CTH T	-	-	-	-	118	-	783.86	783.33	0.0045
10	11	CTH T	-	-	-	-	389	-	785.61	783.86	0.0045
11	11A	CTH T	14	-	-	-	-	-	787.07	787.00	0.0050
11	11B	CTH T	26	-	-	-	-	-	785.74	785.61	0.0050
11	12	CTH T	-	-	-	-	186	-	786.39	785.61	0.0042
12	12A	CTH T	14	-	-	-	-	-	786.46	786.39	0.0050
12	12B	CTH T	26	-	-	-	-	-	786.52	786.39	0.0050
12	13	CTH T	-	-	-	250	-	-	788.00	786.39	0.0064
13	13A	CTH T	14	-	-	-	-	-	788.07	788.00	0.0050
13	13B	CTH T	26	-	-	-	-	-	788.13	788.00	0.0050
13	14	CTH T	-	-	-	300	-	-	790.25	788.00	0.0075
14	14A	CTH T	14	-	-	-	-	-	790.32	790.25	0.0050
14	14B	CTH T	26	-	-	-	-	-	790.38	790.25	0.0050
14	15	CTH T	-	-	-	275	-	-	791.27	790.25	0.0037
15	16	CTH T	-	-	-	266	-	-	792.25	791.27	0.0037
16	16A	CTH T	14	-	-	-	-	-	792.32	792.25	0.0050
16	16B	CTH T	26	-	-	-	-	-	792.38	792.25	0.0050
16	17	CTH T	-	-	174	-	-	-	793.20	792.25	0.0055
17	17A	CTH T	-	27	-	-	-	-	793.35	793.20	0.0055

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STORM SEWER PIPE (CONTINUED)

TO	FROM	LOCATION	608.0312 REINFORCED CONCRETE CLASS III 12-INCH LF	608.0315 REINFORCED CONCRETE CLASS III 15-INCH LF	609.0318 REINFORCED CONCRETE CLASS III 18-INCH LF	608.0321 REINFORCED CONCRETE CLASS III 21-INCH LF	608.0324 REINFORCED CONCRETE CLASS III 24-INCH LF	611.9800.S PIPE GRATES EACH	INLET ELEVATION	DISCHARGE ELEVATION	SLOPE FT/FT
17	17B	CTH T	-	37	-	-	-	-	793.41	793.20	0.0055
18	18A	CTH Y	-	32	-	-	-	-	772.16	772.00	0.0050
18A	18B	CTH Y	-	18	-	-	-	-	772.25	772.16	0.0050
18B	18C	CTH Y	13	-	-	-	-	-	772.32	772.25	0.0050
18C	18D	CTH Y	19	-	-	-	-	-	772.41	772.32	0.0050
19	19A	CTH Y	36	-	-	-	-	-	772.83	772.65	0.0050
19A	19B	CTH Y	8	-	-	-	-	-	772.87	772.83	0.0050
20	21	CTH T	-	245	-	-	-	-	805.10	804.36	0.0030
21	22	CTH T	-	33	-	-	-	-	805.20	805.10	0.0030
23	23A	CTH T	81	-	-	-	-	-	805.74	805.50	0.0030
24	25	CTH Y	-	-	90	-	-	-	831.27	831.00	0.0030
25	26	CTH Y	-	-	88	-	-	-	831.53	831.27	0.0030
27	28	CTH T	134	-	-	-	-	-	831.67	831.00	0.0050
TOTALS			884	392	352	1,091	2,061	1			

STORM SEWER LATERALS

STATION	LOCATION	SPV.0090.02 4-INCH LF	SPV.0090.03 6-INCH LF
22+00	CTH T, RT	25	-
25+50	CTH T, LT	-	40
27+80	CTH T, LT	30	-
30+74	CTH T, LT	35	-
32+00	CTH T, LT	35	-
33+25	CTH T, LT	40	-
43+90	CTH T, LT	50	-
TOTALS		215	40

STORM SEWER STRUCTURES AND COVERS

STR.	STATION	OFFSET	LOCATION	SPV.0060.01	SPV.0060.02	SPV.0060.03	SPV.0060.04	SPV.0060.05	SPV.0060.06	611.0535	611.0612	611.0624	611.0636	611.0639	611.0642	611.0645	611.0652	522.1012	522.1015	522.1018	522.1024	* JOINT TIES EACH	OUTLET	STR.			
				MH	MANHOLE	INLET	INLET	INLET	INLET	MH	INLET	INLET	INLET	INLET	INLET	INLET	INLET	INLET	INLET	APRON	APRON		APRON	APRON	GRAVE	INVERT	DEPTH
				TYPE 1 SPECIAL	5-FOOT	TYPE 2 SPECIAL	TYPE 1 SPECIAL	TYPE 3 SPECIAL	TYPE 8 SPECIAL	COVERS TYPE J SPECIAL	COVERS TYPE C	COVERS TYPE H	COVERS TYPE H-M-S	COVERS TYPE H-S	COVERS TYPE M-S	COVERS TYPE M-S-A	COVERS TYPE T	FOR CULVERT PIPE REINFORCED CONCRETE 12-INCH EACH	FOR CULVERT PIPE REINFORCED CONCRETE 15-INCH EACH	FOR CULVERT PIPE REINFORCED CONCRETE 18-INCH EACH	FOR CULVERT PIPE REINFORCED CONCRETE 24-INCH EACH		ELEV.	ELEV.	FT.		
1	13+00	33' RT	CTH T	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	6	768.75	-	-		
1A	12+85 NB	3.75' LT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	772.56	768.94	4.32	
1B	12+86 SB	3' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	772.59	769.01	4.27	
2	16+00	48' RT	CTH T	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	6	769.25	-	-	
3	2+92	30' LT	ROUNDAABOUT	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	777.50	769.95	6.30	
3A	3+17	3' RT	ROUNDAABOUT	-	-	1	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	777.57	772.23	4.35	
3B	3+27	3' RT	ROUNDAABOUT	-	-	1	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	777.56	772.28	4.28	
4	17+67 NB	9.5' LT	CTH T	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	779.50	772.47	5.78	
4A	17+65 NB	2.5' LT	CTH T	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	778.99	773.55	4.44	
4B	717+68	2.5' RT	NE QUAD. EOP	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	778.68	773.64	4.04	
4C	17+66 SB	2.5' RT	CTH T	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	779.05	773.54	4.51	
4D	618+44	2.5' LT	NW QUAD. EOP	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	778.74	773.63	4.11	
5	20+49 NB	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	783.50	777.00	5.25	
5A	720+49	2.5' RT	NE QUAD. EOP	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	783.26	778.04	4.22	
5B	621+23	2.5' LT	NW QUAD. EOP	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	783.20	778.13	4.07	
6	23+25	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	786.81	779.75	5.81	
6A	23+25	28' RT	CTH T	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	785.75	780.36	4.14	
7	24+50	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	788.16	781.00	5.91	
7A	24+50	20.5' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	787.92	782.04	4.88	
7B	24+40	30' RT	CTH T	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	786.90	782.11	3.54	
7C	24+50	20.5' LT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	787.92	782.13	4.79	
7D	24+32	36' LT	CTH T	-	-	-	-	-	1	-	-	-	-	-	-	1	-	-	-	-	-	-	-	786.75	782.24	4.51	
7E	23+80	34' LT	CTH T	-	-	-	-	-	1	-	-	-	-	-	-	1	-	-	-	-	-	-	-	786.25	782.51	3.74	
8	27+65	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	791.57	782.58	7.74	
8A	27+65	20.5' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	791.33	786.07	4.26	
8B	27+65	20.5' LT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	791.33	786.13	4.20	
9	29+32	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	793.17	783.33	8.59	
9A	29+32	20.5' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	792.93	787.07	4.86	
10	30+50	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	793.73	783.86	8.62	
11	34+39	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	792.86	785.61	6.00	
11A	34+39	20.5' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	792.62	787.07	4.55	
11B	34+39	20.5' LT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	792.62	787.13	4.49	
12	36+25	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	792.32	786.39	4.68	
12A	36+25	20.5' RT	CTH T	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	792.08	786.46	4.62	
12B	36+25	20.5' LT	CTH T	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	792.08	786.52	4.56	
13	38+75	6' RT	CTH T	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	793.11	788.00	3.86	
13A	38+75	20.5' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	792.87	788.07	3.80	
13B	38+75	20.5' LT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	792.87	788.13	3.74	
14	41+75	6' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	795.22	790.25	3.97	
14A	41+75	20.5' RT	CTH T	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	794.98	790.32	3.66	

STORM SEWER STRUCTURES AND COVERS (CONTINUED)

STR.	STATION	OFFSET	LOCATION	SPV.0060.01	SPV.0060.02	SPV.0060.03	SPV.0060.04	SPV.0060.05	SPV.0060.06	611.0535	611.0612	611.0624	611.0636	611.0639	611.0642	611.0645	611.0652	522.1012	522.1015	522.1018	522.1024	* JOINT TIES	OUTLET ELEV.	STR. INVERT ELEV.	DEPTH FT.	
				MH TYPE 1 SPECIAL	MANHOLE 5-FOOT	INLET TYPE 2 SPECIAL	INLET TYPE 1 SPECIAL	INLET TYPE 3 SPECIAL	INLET TYPE 8 SPECIAL	MH COVERS TYPE J SPECIAL	INLET COVERS TYPE C	INLET COVERS TYPE H	INLET COVERS TYPE HM-S	INLET COVERS TYPE H-S	INLET COVERS TYPE MS	INLET COVERS TYPE MS-A	INLET COVERS TYPE T	APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 12-INCH EACH	APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 15-INCH EACH	APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 18-INCH EACH	APRON ENDWALLS FOR CULVERT PIPE REINFORCED CONCRETE 24-INCH EACH					
14B	41+75	20.5' LT	CTHT	-	-	-	-	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	794.98	790.38	3.35
15	44+50	6' RT	CTHT	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	797.45	791.27	4.93
16	47+16	6' RT	CTHT	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	797.38	792.25	3.88
16A	47+16	20.5' RT	CTHT	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	797.14	792.32	3.82
16B	47+16	20.5' LT	CTHT	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	797.14	792.38	3.76
17	48+90	6' RT	CTHT	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	798.47	793.20	4.02
17A	49+00	31' RT	CTHT	-	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	795.41	793.35	2.06
17B	49+00	30' LT	CTHT	-	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	795.43	793.41	2.02
18	206+50 EB	42' RT	CTHY	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	6	772.00	-	-
18A	506+73	2.5' RT	SW QUAD. EOP	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	777.96	772.16	4.80
18B	206+73 EB	2.5' LT	CTHY	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	778.26	772.25	5.01
18C	206+65 WB	2.5' RT	CTHY	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	778.43	772.32	5.11
18D	617+12	2.5' LT	NW QUAD. EOP	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	778.11	772.41	4.70
19	210+50 EB	34' RT	CTHY	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	6	772.65	-	-
19A	210+50 EB	3' LT	CTHY	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	776.53	772.83	2.70
19B	210+47 WB	3.75' RT	CTHY	-	-	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	776.59	772.87	2.72
20	65+55	31' LT	CTHT	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	804.35	-	-
21	68+00	27' LT	CTHT	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	808.50	805.09	2.16
22	68+30	41' LT	CTHT	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	805.20	-	-
23	69+30	42' LT	CTHT	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	805.20	-	-
23A	70+20	36' LT	CTHT	-	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	808.50	805.74	2.76
24	124+00	36' RT	CTHT	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	831.00	-	-
25	123+11	32.4' RT	CTHT	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	835.38	831.27	3.11
26	122+28	50' RT	CTHT	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	-	-	-	831.53	-	-
27	123+50	42' LT	CTHT	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	831.00	-	-
28	122+21	21' LT	CTHT	-	-	-	-	1	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	836.15	831.67	3.48
TOTALS				13	2	2	2	32	5	15	2	14	4	14	3	2	2	2	6	2	1					

**REMARKS:**

- OFFSET DISTANCE TO CENTER FOR MANHOLES, BACK OF CURB FOR INLETS/CATCHBASINS, AND END OF ENDWALLS.
- GRATE ELEVATION IS FIGURED TO EDGE OF PAVEMENT FOR INLETS, CENTER OF MANHOLE COVER AND ENDWALL INVERT.
- FINAL LOCATION TO BE DETERMINED BY THE ENGINEER.
- STRUCTURE DEPTHS COMPUTED WITH A MINIMUM OF 6-INCHES ADJUSTMENT TO COVERS FOR TYPE 1 SPECIAL INLETS, TYPE 3 SPECIAL INLETS, & TYPE 1 MANHOLES
- INLET DEPTHS COMPUTED WITH A 1-INCH RUBBER ADJUSTMENT TO COVERS FOR TYPE 2 SPECIAL INLETS
- \*-FOR INFORMATION ONLY: JOINT TIES ARE REQUIRED FOR ENDWALLS. TIE LAST THREE PIPE JOINTS (TWO TIES PER JOINT-6 TIES MINIMUM PER ENDWALL).
- JOINT TIES ARE NON-PAY ITEMS.

CONCRETE CURB AND CURB & GUTTER

STATION - STATION	LOCATION	601.0105	601.0411	601.0553	601.0557	601.0580
		CONCRETE CURB TYPE A LF	30-INCH TYPE D LF	4-INCH SLOPED 36-INCH TYPE D LF	6-INCH SLOPED 36-INCH TYPE D LF	4-INCH SLOPED 36-INCH TYPE R LF
1+00 - 4+24	ROUNDAABOUT	230	-	-	-	308
12+80 - 15+01	CTH T NBND	-	-	221	-	-
12+81 - 14+98	CTH T SBND	-	-	217	-	-
14+98 - 15+92	CTH T SBND	-	94	-	-	-
15+01 - 15+92	CTH T NBND	-	91	-	-	-
17+42 - 19+82	CTH T SBND	-	240	-	-	-
17+44 - 19+82	CTH T NBND	-	238	-	-	-
20+95 - 23+92	CTH T, LT	-	312	-	-	-
21+98 - 28+75	CTH T, RT	-	692	-	-	-
24+23 - 34+66	CTH T, LT	-	1,072	-	-	-
29+05 - 48+50	CTH T, RT	-	1,960	-	-	-
34+96 - 48+50	CTH T, LT	-	1,369	-	-	-
65+80 - 69+71	CTH T, LT	-	-	-	412	-
67+50 - 69+72	CTH T, RT	-	-	-	239	-
70+01 - 73+00	CTH T, LT	-	-	-	318	-
70+03 - 71+50	CTH T, RT	-	-	-	168	-
99+70 - 103+20	CTH T, RT	-	-	-	350	-
110+00 - 114+00	CTH T, LT	-	-	-	400	-
119+40 - 122+62	CTH T, LT	-	-	-	342	-
122+01 - 122+61	CTH T, RT	-	-	-	92	-
122+97 - 123+90	CTH T, RT	-	-	-	112	-
122+98 - 123+58	CTH T, LT	-	-	-	91	-
412+00 - 415+02	SE QUADRANT EOP	-	-	302	-	-
415+02 - 417+55	SE QUADRANT EOP	-	253	-	-	-
417+55 - 418+56	SE QUADRANT EOP	-	-	101	-	-
504+34 - 506+22	SW QUADRANT EOP	-	-	188	-	-
506+22 - 508+65	SW QUADRANT EOP	-	243	-	-	-
508+66 - 511+64	SW QUADRANT EOP	-	-	298	-	-
614+86 - 616+65	NW QUADRANT EOP	-	-	179	-	-
616+65 - 621+70	NW QUADRANT EOP	-	505	-	-	-
714+90 - 715+90	NE QUADRANT EOP	-	-	100	-	-
715+90 - 721+98	NE QUADRANT EOP	-	608	-	-	-
204+34 - 206+16	CTH Y EBND	-	-	182	-	-
204+35 - 206+18	CTH Y WBND	-	-	183	-	-
206+16 - 207+11	CTH Y EBND	-	95	-	-	-
206+18 - 207+10	CTH Y WBND	-	92	-	-	-
208+61 - 209+53	CTH Y EBND	-	92	-	-	-
208+62 - 209+57	CTH Y WBND	-	95	-	-	-
209+53 - 210+52	CTH Y EBND	-	-	99	-	-
209+57 - 210+54	CTH Y WBND	-	-	97	-	-
496+50 - 499+43	BROOKS ROAD, LT	-	-	-	293	-
500+53 - 501+50	BROOKS ROAD, LT	-	-	-	97	-
500+58 - 501+90	BROOKS ROAD, RT	-	-	-	132	-
598+25 - 599+42	CTH GG, RT	-	-	-	117	-
600+58 - 602+25	CTH GG, LT	-	-	-	167	-
TOTAL		230	8,051	2,167	3,330	308

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CONCRETE SIDEWALK AND DRIVEWAYS

STATION	TO	STATION	LOCATION	416.0160 DRIVEWAY 6-INCH SY	SPV.0165.01 COLORED SIDEWALK 4-INCH SF
12+80	-	15+94	CTH T, SB, RT	-	4,180
17+40	-	19+79	CTH T, SB, RT	-	2,130
22+18	-	22+40	CTH T, LT	26	-
24+80	-	25+02	CTH T, LT	30	-
32+48	-	32+66	CTH T, LT	32	-
34+05	-	34+25	CTH T, LT	42	-
45+22	-	45+57	CTH T, LT	50	-
204+34	-	207+08	CTH Y, EB, RT	-	2,016
208+59	-	210+54	CTH Y, EB, RT	-	1,474
TOTALS				180	9,800

RIPRAP AND GEOTEXTILE

STATION	LOCATION	606.0200 RIPRAP MEDIUM CY	645.0120 GEOTEXTILE TYPE HR SY	645.0130 GEOTEXTILE TYPE R SY	REMARKS
14+90	CTH T, SB, LT & RT	23	45	-	CULVERT PIPE ENDS
16+00	CTH T, NB, RT	4	7	-	CULVERT PIPE END
72+70	CTH T, RT	16	32	-	CULVERT PIPE ENDS
73+40	CTH T, LT	16	32	-	CULVERT PIPE ENDS
84+32	CTH T, RT	5	11	-	CULVERT PIPE ENDS
107+53	CTH T, RT	5	11	-	CULVERT PIPE END
109+74	CTH T, LT	2	4	-	ASPHALT FLUME
117+00	CTH T, RT	5	10	-	CULVERT PIPE END
205+68	CTH Y, WB, LT	4	9	-	CULVERT PIPE END
206+25	CTH Y, EB, RT	4	9	-	CULVERT PIPE END
202+40 - 206+25	CTH Y, EB, RT UNDISTRIBUTED	210 26	- 30	550 50	DITCH PROTECTION
TOTALS		320	200	600	

DUST CONTROL SURFACE TREATMENT

LOCATION	623.0200 SY
UNDISTRIBUTED	100,000
TOTAL	100,000

UNDERDRAIN

STATION	TO	STATION	LOCATION	310.0110 BASE AGGREGATE DENSE OPEN GRADED TON	612.0106 PIPE 6-INCH LF	612.0600 PIPE UNDERDRAIN TRENCH LF	645.0111 GEOTEXTILE FABRIC TYPE DF SCHEDULE A SY
1+00	-	4+24	ROUNDAABOUT	53	290	290	145
17+55	-	17+75	CTH T, SB, LT & RT	7	40	40	20
17+55	-	17+75	CTH T, NB, LT & RT	7	40	40	20
36+15	-	36+35	CTH T, LT & RT	7	40	40	20
47+06	-	47+26	CTH T, LT & RT	7	40	40	20
206+55	-	206+75	CTH Y, WB, LT & RT	7	40	40	20
206+62	-	206+82	CTH Y, EB, LT & RT	7	40	40	20
TOTALS				95	530	530	265

CONCRETE MEDIAN SLOPE NOSE

STATION	LOCATION	620.0300 SF
12+78	CTH T	42
15+94	CTH T, SB, RT	6
15+94	CTH T, NB, LT	6
17+40	CTH T, SB, RT	6
17+42	CTH T, NB, LT	6
19+80	CTH T, SB, RT	13
204+34	CTH Y, WB, RT	12
207+11	CTH Y, EB, LT	5
207+13	CTH Y, WB, RT	5
208+60	CTH Y, EB, LT	5
208+60	CTH Y, WB, RT	5
210+55	CTH Y, EB, LT	13
TOTAL		124

WATER

STATION	TO	STATION	LOCATION	624.0100 MGAL
10+00	-	12+00	CTH T	3
12+00	-	16+00	CTH T	16
1+00	-	4+24	ROUNDAABOUT	7
17+34	-	48+50	CTH T	89
48+50	-	65+65	CTH T	45
65+65	-	73+00	CTH T	19
73+00	-	99+24	CTH T	68
99+24	-	103+83	CTH T	13
103+83	-	109+33	CTH T	14
109+33	-	114+55	CTH T	14
114+55	-	118+73	CTH T	11
118+73	-	124+00	CTH T	15
201+25	-	207+19	CTH Y	19
208+53	-	213+00	CTH Y	13
RICHARDS AVENUE				2
SKY RANCH AVENUE				1
ROBERTS AVENUE				2
496+00	-	499+82	BROOKS ROAD	10
500+18	-	502+20	BROOKS ROAD	6
597+25	-	599+82	CTH GG	8
600+18	-	602+90	CTH GG	8
ENTIRE PROJECT REPLACING CABG DRIVEWAYS				6
TOTAL				383

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See Addendum Sheet

CONCRETE SIDEWALK AND DRIVEWAYS

STATION	TO	STATION	LOCATION	416.0160 DRIVEWAY 6-INCH SY	SPV.0165.01 COLORED SIDEWALK 4-INCH SF
12+80	-	15+94	CTH T, SB, RT	-	4,180
17+40	-	19+79	CTH T, SB, RT	-	2,130
22+18	-	22+40	CTH T, LT	26	-
24+80	-	25+02	CTH T, LT	30	-
32+48	-	32+66	CTH T, LT	32	-
34+05	-	34+25	CTH T, LT	42	-
45+22	-	45+57	CTH T, LT	50	-
204+34	-	207+08	CTH Y, EB, RT	-	2,016
208+59	-	210+54	CTH Y, EB, RT	-	1,474
TOTALS				180	9,800

RIPRAP AND GEOTEXTILE

STATION	LOCATION	606.0200 RIPRAP MEDIUM CY	645.0120 GEOTEXTILE TYPE HR SY	645.0130 GEOTEXTILE TYPE R SY	REMARKS
14+90	CTH T, SB, LT & RT	23	45	-	CULVERT PIPE ENDS
16+00	CTH T, NB, RT	4	7	-	CULVERT PIPE END
72+70	CTH T, RT	16	32	-	CULVERT PIPE ENDS
73+40	CTH T, LT	16	32	-	CULVERT PIPE ENDS
84+32	CTH T, RT	5	11	-	CULVERT PIPE ENDS
107+53	CTH T, RT	5	11	-	CULVERT PIPE END
109+74	CTH T, LT	2	4	-	ASPHALT FLUME
117+00	CTH T, RT	5	10	-	CULVERT PIPE END
205+68	CTH Y, WB, LT	4	9	-	CULVERT PIPE END
206+25	CTH Y, EB, RT	4	9	-	CULVERT PIPE END
202+40 - 206+25	CTH Y, EB, RT UNDISTRIBUTED	210 26	- 30	550 50	DITCH PROTECTION
TOTALS		320	200	600	

MONUMENT SUMMARY

STATION	LOCATION	DESCRIPTION	SPV.0060.07 LANDMARK REFERENCE EACH	SPV.0060.08 SECTION SURVEY EACH
16+96.47, 33.50 LT	CTH T, NB	SW CORNER SECTION 27, T19N, R16E	4	1
43+45.95, 0.0 LT	CTH T	W QUARTER CORNER SECTION 27, T19N, R16E	4	1
69+89.75, 0.0 LT	CTH T	NW CORNER SECTION, T19N, R16E	4	1
96+36.36, 0.91 RT	CTH T	W QUARTER CORNER SECTION 22, T19N, R16E	4	1
122+80.13, 0.0 LT	CTH T	NW CORNER SECTION 22, T19N, R16E	4	1

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NOTE: STATIONING IS BASED OFF PROPOSED NORTHBOUND ALIGNMENT,  
NOT THE RIGHT-OF-WAY ALIGNMENT.

UNDERDRAIN

STATION	TO	STATION	LOCATION	310.0110 BASE AGGREGATE DENSE OPEN GRADED TON	612.0106 PIPE UNDERDRAIN 6-INCH LF	612.0600 PIPE UNDERDRAIN TRENCH LF	645.0111 GEOTEXTILE FABRIC TYPE DF SCHEDULE A SY
1+00	-	4+24	ROUNDAABOUT	53	290	290	145
17+55	-	17+75	CTH T, SB, LT & RT	7	40	40	20
17+55	-	17+75	CTH T, NB, LT & RT	7	40	40	20
36+15	-	36+35	CTH T, LT & RT	7	40	40	20
47+06	-	47+26	CTH T, LT & RT	7	40	40	20
206+55	-	206+75	CTH Y, WB, LT & RT	7	40	40	20
206+62	-	206+82	CTH Y, EB, LT & RT	7	40	40	20
TOTALS				95	530	530	265

CONCRETE MEDIAN SLOPE NOSE

STATION	LOCATION	620.0300 SF
12+78	CTH T	42
15+94	CTH T, SB, RT	6
15+94	CTH T, NB, LT	6
17+40	CTH T, SB, RT	6
17+42	CTH T, NB, LT	6
19+80	CTH T, SB, RT	13
204+34	CTH Y, WB, RT	12
207+11	CTH Y, EB, LT	5
207+13	CTH Y, WB, RT	5
208+60	CTH Y, EB, LT	5
208+60	CTH Y, WB, RT	5
210+55	CTH Y, EB, LT	13
TOTAL		124

DUST CONTROL SURFACE TREATMENT

LOCATION	623.0200 SY
UNDISTRIBUTED	100,000
TOTAL	100,000

WATER

STATION	TO	STATION	LOCATION	624.0100 MGAL
10+00	-	12+00	CTH T	3
12+00	-	16+00	CTH T	16
1+00	-	4+24	ROUNDAABOUT	7
17+34	-	48+50	CTH T	89
48+50	-	65+65	CTH T	45
65+65	-	73+00	CTH T	19
73+00	-	99+24	CTH T	68
99+24	-	103+83	CTH T	13
103+83	-	109+33	CTH T	14
109+33	-	114+55	CTH T	14
114+55	-	118+73	CTH T	11
118+73	-	124+00	CTH T	15
201+25	-	207+19	CTH Y	19
208+53	-	213+00	CTH Y	13
RICHARDS AVENUE				2
SKY RANCH AVENUE				1
ROBERTS AVENUE				2
496+00	-	499+82	BROOKS ROAD	10
500+18	-	502+20	BROOKS ROAD	6
597+25	-	599+82	CTH GG	8
600+18	-	602+90	CTH GG	8
ENTIRE PROJECT REPLACING CABG DRIVEWAYS				6
TOTAL				383

SALVAGED TOPSOIL, MULCHING, FERTILIZER, AND SEED

STATION	TO	STATION	LOCATION	625.0100 TOPSOIL SY	625.0105 TOPSOIL CY	625.0500 SALVAGED TOPSOIL SY	627.0200 MULCHING SY	629.0210 FERTILIZER, TYPE B CWT	630.0120 SEEDING MIXTURE NO 20 LB	630.0140 SEEDING MIXTURE NO 40 LB	630.0200 SEEDING TEMPORARY LB	SPV.0085.01 LOW MAINTENANCE SEED MIX LB	SPV.0180.01 HYDROMULCHING SY
1+00	-	4+24	ROUNDAABOUT	-	135	-	-	0.3	-	-	11	11	405
10+00	-	16+00	CTH T	2,450	-	-	-	1.5	-	44	66	-	2,318
17+36	-	48+50	CTH T	7,350	-	-	-	4.6	-	132	200	-	7,350
48+50	-	65+80	CTH T, LT	-	-	3,420	3,369	2.2	92	-	92	-	-
48+50	-	67+50	CTH T, RT	-	-	3,445	3,422	2.2	93	-	93	-	-
65+80	-	69+50	CTH T, LT	580	-	-	-	0.4	-	10	16	-	568
67+50	-	69+50	CTH T, RT	170	-	-	-	0.1	-	3	5	-	170
70+00	-	73+00	CTH T, LT	410	-	-	-	0.3	-	7	11	-	410
70+00	-	71+50	CTH T, RT	250	-	-	-	0.2	-	5	7	-	250
71+50	-	99+70	CTH T, RT	-	-	6,290	5,929	4.0	170	-	170	-	-
73+00	-	110+00	CTH T, LT	-	-	8,735	8,440	5.5	236	-	236	-	-
99+70	-	103+20	CTH T, RT	255	-	-	-	0.2	-	5	7	-	255
103+20	-	122+50	CTH T, RT	-	-	5,685	5,667	1.7	154	-	154	-	-
110+00	-	114+00	CTH T, LT	660	-	-	-	0.4	-	12	18	-	660
114+00	-	119+40	CTH T, LT	-	-	1,060	1,052	0.7	29	-	29	-	-
119+40	-	122+50	CTH T, LT	290	-	-	-	0.2	-	5	8	-	290
123+00	-	124+00	CTH T, LT	-	-	460	454	0.3	12	-	12	-	-
123+00	-	124+00	CTH T, RT	285	-	-	-	0.2	-	5	8	-	279
124+00	-	127+00	CTH T, RT	-	-	1,160	1,142	0.7	31	-	31	-	-
201+25	-	204+30	CTH Y	-	-	990	545	0.6	27	-	27	-	-
204+30	-	207+18	CTH Y	1,940	-	-	-	1.2	-	35	52	-	1,496
208+54	-	210+59	CTH Y	740	-	-	-	0.5	-	13	20	-	734
210+59	-	213+00	CTH Y	-	-	640	624	0.4	17	-	17	-	-
23+85	-	24+35	RICHARDS AVENUE	150	-	-	-	0.1	-	3	4	-	150
28+65	-	29+15	SKY RANCH AVENUE	150	-	-	-	0.1	-	3	4	-	150
34+56	-	35+00	ROBERTS AVENUE	150	-	-	-	0.1	-	3	4	-	150
496+00	-	499+50	BROOKS ROAD, LT	420	-	-	-	0.3	-	8	11	-	420
496+00	-	499+50	BROOKS ROAD, RT	-	-	615	555	0.4	17	-	17	-	-
500+00	-	502+20	BROOKS ROAD	320	-	-	-	0.2	-	6	9	-	312
597+25	-	599+50	CTH GG, LT	-	-	295	291	0.2	8	-	8	-	-
597+25	-	599+50	CTH GG, RT	180	-	-	-	0.1	-	3	5	-	172
600+50	-	602+85	CTH GG, LT	195	-	-	-	0.1	-	4	5	-	195
600+50	-	602+85	CTH GG, RT	-	-	650	650	0.4	18	-	18	-	-
			WASTE AREA UNDISTRIBUTED	1555	-	-	15,000	9.5	405	-	405	-	-
							5,860	10.1	192	37	220	-	1766
TOTALS				18,500	135	33,445	53,000	50	1,500	343	2,000	11	18,500

NOTE: SEEDING MIXTURE 40 AND TOPSOIL ARE TO BE USED IN URBAN AREA AND BEHIND ALL CURB AND GUTTER.  
SEEDING MIXTURE 40 AND FERTILIZER TO BE APPLIED IN CONJUNCTION WITH MULCH USING HYDROMULCHING METHOD.

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## SILT FENCE

STATION TO	STATION	LOCATION	628.1504 SILT FENCE LF	628.1520 MAINTENANCE LF
10+00 -	16+01	CTH T, NB	600	1200
13+15 -	14+85	CTH T, SB	170	340
15+15 -	15+75	CTH T, SB	60	120
17+36 -	18+75	CTH T, NB	140	280
17+50 -	18+00	CTH T, SB	50	100
22+75 -	25+75	CTH T, NB	300	600
25+65 -	26+25	CTH T, LT	60	120
31+00 -	32+15	CTH T, RT	115	230
38+50 -	41+35	CTH T, LT	285	570
38+50 -	41+00	CTH T, RT	250	500
43+25 -	48+75	CTH T, RT	550	1100
56+50 -	63+30	CTH T, LT	680	1360
57+80 -	65+50	CTH T, RT	770	1540
65+50 -	66+35	CTH T, LT	85	170
67+40 -	68+30	CTH T, LT	90	180
67+40 -	69+00	CTH T, RT	160	320
70+25 -	74+50	CTH T, RT	425	850
75+60 -	79+50	CTH T, RT	390	780
75+75 -	77+50	CTH T, LT	175	350
83+50 -	88+25	CTH T, LT	475	950
83+50 -	89+50	CTH T, RT	600	1200
91+35 -	100+00	CTH T, LT	865	1730
94+50 -	100+00	CTH T, RT	550	1100
104+50 -	109+90	CTH T, LT	540	1080
105+20 -	110+75	CTH T, RT	555	1110
112+75 -	115+50	CTH T, LT	275	550
204+40 -	205+15	CTH Y, LT	75	150
204+50 -	207+20	CTH Y, RT	270	540
208+54 -	210+25	CTH Y, RT	170	340
208+75 -	210+60	CTH Y, LT	185	370
496+75 -	498+25	BROOKS ROAD, RT	150	300
501+00 -	502+20	BROOKS ROAD, RT	120	240
501+30 -	502+20	BROOKS ROAD, RT	90	180
597+75 -	498+25	CTH GG, RT	50	100
WASTE AREA UNDISTRIBUTED	CTH T CTH T		1000 1675	2000 3350
TOTALS			13,000	26,000

## EROSION MAT

STATION	LOCATION	628.2004 CLASS I TYPE B SY	REMARKS
11+71	CTH T, RT	4	ASPHALT FLUME
11+79	CTH T, LT	4	ASPHALT FLUME
13+00	CTH T, RT	6	STORM PIPE END
13+75 - 14+75	CTH T, RT	110	DITCH PROTECTION
15+15	CTH T, LT & RT	8	ASPHALT FLUMES
49+25	CTH T, RT	10	CULVERT PIPE ENDS
53+48	CTH T, LT	12	CULVERT PIPE ENDS
60+10	CTH T, LT & RT	18	CULVERT PIPE ENDS
63+32	CTH T, LT	10	CULVERT PIPE ENDS
63+86	CTH T, LT	10	CULVERT PIPE ENDS
65+54	CTH T, LT	4	ASPHALT FLUME
65+55	CTH T, LT	6	CULVERT PIPE END
68+30	CTH T, LT	6	CULVERT PIPE END
67+22	CTH T, RT	4	ASPHALT FLUME
69+30	CTH T, LT	6	STORM PIPE END
72+72	CTH T, RT	22	CULVERT PIPE END
73+10 - 74+00	CTH T, RT	100	DITCH PROTECTION
73+40	CTH T, LT	22	CULVERT PIPE END
75+55	CTH T, RT	12	CULVERT PIPE ENDS
76+93	CTH T, RT	12	CULVERT PIPE ENDS
78+73	CTH T, LT	12	CULVERT PIPE ENDS
83+09	CTH T, LT	12	CULVERT PIPE ENDS
84+32	CTH T, LT	9	CULVERT PIPE END
88+60	CTH T, RT	12	CULVERT PIPE ENDS
91+35	CTH T, LT	12	CULVERT PIPE ENDS
95+92	CTH T, RT & LT	18	CULVERT PIPE ENDS
98+00 - 99+70	CTH T, LT	190	DITCH PROTECTION
98+00 - 99+70	CTH T, RT	190	DITCH PROTECTION
99+44	CTH T, RT	4	ASPHALT FLUME
99+68	CTH T, LT	10	CULVERT PIPE ENDS
101+16	CTH T, LT	10	CULVERT PIPE ENDS
105+20	CTH T, RT	12	CULVERT PIPE ENDS
107+53	CTH T, LT	9	CULVERT PIPE END
117+00	CTH T, LT	8	CULVERT PIPE END
122+25	CTH T, RT	6	STORM PIPE END
123+50	CTH T, LT	6	STORM PIPE END
124+00	CTH T, RT	6	STORM PIPE END
124+16	CTH T, RT	4	ASPHALT FLUME
126+65	CTH T, RT	14	CULVERT PIPE ENDS
201+63	CTH Y, RT	7	CULVERT PIPE END
201+78	CTH Y, LT	14	CULVERT PIPE ENDS
202+00 - 205+75	CTH Y, LT	420	DITCH PROTECTION
206+02	CTH Y, LT	14	CULVERT PIPE ENDS
206+50	CTH Y, RT	6	CULVERT PIPE END
210+50	CTH Y, RT	6	CULVERT PIPE END

## EROSION MAT

STATION	LOCATION	628.2004 CLASS I TYPE B SY	REMARKS
210+76	CTH Y, LT	4	ASPHALT FLUME
210+83	CTH Y, RT	4	ASPHALT FLUME
212+65	CTH Y, RT	8	CULVERT END PIPES
499+00 - 499+50	BROOKS ROAD, RT	60	DITCH PROTECTION
501+71	BROOKS ROAD, LT	4	ASPHALT FLUME
501+97	BROOKS ROAD, RT	4	ASPHALT FLUME
598+05	CTH GG, RT	4	ASPHALT FLUME
598+97	CTH GG, LT	4	ASPHALT FLUME
600+45	CTH GG, RT	4	ASPHALT FLUME
	UNDISTRIBUTED	207	
TOTAL		1700	

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## INLET PROTECTION

STRUCTURE NO.	STATION	LOCATION	628.7005 TYPE A EACH	628.7010 TYPE B EACH	628.7015 TYPE C EACH
1A	12+85	CTH T	1	-	1
1B	12+85	CTH T	1	-	1
3A	3+16	CTH T	1	-	1
3B	3+26	CTH T	1	-	1
4A	17+66	CTH T	1	-	1
4B	17+64	CTH T	1	-	1
4C	17+65	CTH T	1	-	1
4D	17+64	CTH T	1	-	1
5A	20+48	CTH T	1	-	1
5B	20+49	CTH T	1	-	1
6A	22+25	CTH T	1	1	-
7A	24+49	CTH T	1	-	1
7B	24+40	CTH T	1	1	-
7C	24+49	CTH T	1	-	1
7D	24+32	CTH T	1	1	-
7E	23+80	CTH T	1	1	-
8A	27+64	CTH T	1	-	1
8B	27+64	CTH T	1	-	1
9A	29+32	CTH T	1	-	1
11A	34+39	CTH T	1	-	1
11B	34+39	CTH T	1	-	1
12A	36+25	CTH T	1	-	1
12B	36+25	CTH T	1	-	1
13A	38+74	CTH T	1	-	1
13B	38+74	CTH T	1	-	1
14A	41+75	CTH T	1	-	1
14B	41+75	CTH T	1	-	1
16A	47+16	CTH T	1	-	1
16B	47+16	CTH T	1	-	1
17A	49+00	CTH T	1	1	-
17B	49+00	CTH T	1	1	-
18A	206+72	CTH T	1	-	1
18B	206+73	CTH T	1	-	1
18C	206+64	CTH T	1	-	1
18D	206+63	CTH T	1	-	1
19A	210+50	CTH T	1	-	1
19B	210+47	CTH T	1	-	1
23A	70+20	CTH T	1	1	-
25	123+11	CTH T	1	-	1
28	122+21	CTH T	1	-	1
TOTALS			40	7	33

## CULVERT PIPE CHECKS

STATION	LOCATION	628.7555 EACH
60+09 RT	CTH T	3
73+00 LT	CTH T	6
73+10 LT	CTH T	6
84+32 LT	CTH T	4
95+92 RT	CTH T	3
107+53 LT	CTH T	3
117+.00 LT	CTH T	3
TOTAL		28

## ROCK BAGS

STATION	LOCATION	628.7570 EACH
14+40 RT	CTH T	10
14+60 RT	CTH T	10
58+25 LT	CTH T	10
72+81 RT	CTH T	10
84+32 RT	CTH T	10
95+92 LT	CTH T	10
107+53 RT	CTH T	10
205+65 LT	CTH Y	10
206+20 RT	CTH Y	10
213+00 RT & LT	CTH Y	20
502+20 RT & LT	BROOKS ROAD	20
597+25 RT & LT	CTH GG	20
UNDISTRUBUTED		20
TOTAL		170

## TEMPORARY DITCH CHECKS

STATION	LOCATION	628.7504 LF
13+75	CTH T, RT	15
UNDISTRUBUTED		30
TOTAL		45

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**ERECTION OF TYPE II SIGNS AND SUPPORTS**

SIGN NO.	LOCATION	SIGN CODE	W X H	637.0202 SIGNS REFLECTIVE TYPE II S.F.	634.0612 POSTS WOOD 4x6x12 EACH	634.0614 POSTS WOOD 4x6x14 EACH	634.0616 POSTS WOOD 4x6x16 EACH	REMARKS
1	CTH T, S. OF CTH Y	W2-6	30" X 30"	6.25		1		
1A	"	W13-1	18" X 18"	2.25				15 MPH, MOUNT BELOW SIGN #1
2	"	R2-1	24" X 30"	5.00		1		45 MPH
2A	"	W6-1	36" X 36"	9.00		1		
3	"	J4-1	24" X 36"	6.00		1		CTH T, SEE PLAN SHEET
4	CTH T MEDIAN, S, OF CTH Y	R4-7	36" X 48"	12.00		1		
5	CTH T, S. OF CTH Y	W3-2	36" X 36"	9.00		1		
6	CTH T MEDIAN, S, OF CTH Y	J3-1	24" X 57"	9.50		1		CTH T, SEE PLAN SHEET
7	"	R1-2	36" X 31"	7.00			1	
7A	"	R6-2R	24" X 30"	5.00				MOUNT BELOW SIGN #7
8	CTH T AT CTH Y	R1-2	36" X 31"	7.00		1		
8A	"	R1-54	24" X 15"	2.50				MOUNT BELOW SIGN #8
9	IN ROUNDABOUT	R6-1R	54" X 18"	6.75		2		
9A	"	R6-4B	60" X 24"	10.00				MOUNT BELOW SIGN #9
10	CTH Y, W. OF CTH T	W2-6	30" X 30"	6.25		1		
10A	"	W13-1	18" X 18"	2.25				15 MPH, MOUNT BELOW SIGN #10
11	"	R2-1	24" X 30"	5.00		1		45 MPH
12	CTH Y MEDIAN, W. OF CTH T	R4-7	36" X 48"	12.00		1		
13	"	J4-1	24" X 36"	6.00		1		CTH Y, SEE PLAN SHEET
14	CTH Y, W. OF CTH T	W3-2	36" X 36"	9.00		1		
15	CTH Y MEDIAN AT CTH T	R1-2	36" X 31"	7.00			1	
15A	"	R6-2R	24" X 30"	5.00				MOUNT BELOW SIGN #15
16	CTH Y, W. OF CTH T	R1-2	36" X 31"	5.18		1		
16A	"	R1-54	24" X 15"	2.50				MOUNT BELOW SIGN #16
16B	CTH Y MEDIAN AT CTH T	J3-1	24" X 57"	9.50		1		CTH Y, SEE PLAN SHEET
17	IN ROUNDABOUT	R6-1R	54" X 18"	6.75		2		
17A	"	R6-4B	60" X 24"	10.00				MOUNT BELOW SIGN #17
18	"	R6-1R	54" X 18"	6.75		2		
18A	"	R6-4B	60" X 24"	10.00				MOUNT BELOW SIGN #18
19	CTH Y MEDIAN, E. OF CTH T	J3-1	24" X 57"	9.50		1		CTH Y, SEE PLAN SHEET
20	"	R1-2	36" X 31"	7.00			1	
20A	"	R6-2R	24" X 30"	5.00				MOUNT BELOW SIGN #20
21	CTH Y, E. OF CTH T	R1-2	36" X 31"	7.00		1		
21A	"	R1-54	24" X 15"	2.50				MOUNT BELOW SIGN #21
22	"	W3-2	36" X 36"	9.00		1		
23	CTH Y MEDIAN, E. OF CTH T	R4-7	36" X 48"	12.00		1		
24	CTH Y, E. OF CTH T	J4-1	24" X 36"	6.00		1		CTH Y, SEE PLAN SHEET
25	"	R2-1	24" X 30"	5.00		1		45 MPH
26	"	W2-6	30" X 30"	6.25		1		
26A	"	W13-1	18" X 18"	2.25		1		15 MPH, MOUNT BELOW SIGN #26
27	IN ROUNDABOUT	R6-1R	54" X 18"	6.75				
27A	"	R6-4B	60" X 24"	10.00		2		MOUNT BELOW SIGN #27
28	CTH T, N. OF CTH Y	R1-2	36" X 31"	7.00				
28A	"	R1-54	24" X 15"	2.50		1		MOUNT BELOW SIGN #28
29	CTH T MEDIAN, N. OF CTH Y	R1-2	36" X 31"	7.00			1	
29A	"	R6-2R	24" X 30"	5.00				MOUNT BELOW SIGN #29

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**ERECTION OF TYPE II SIGNS AND SUPPORTS**

SIGN NO.	LOCATION	SIGN CODE	W X H	637.0202 SIGNS REFLECTIVE TYPE II S.F.	634.0612 POSTS WOOD 4x6x12 EACH	634.0614 POSTS WOOD 4x6x14 EACH	634.0616 POSTS WOOD 4x6x16 EACH	REMARKS
30	CTH T MEDIAN, N. OF CTH Y	J3-1	24" X 57"	9.50		1		CTH T, SEE PLAN SHEET
31	CTH T, N. OF CTH Y	W3-2	36" X 36"	9.00		1		
32	CTH T MEDIAN, N. OF CTH Y	R4-7	36" X 48"	12.00		1		
33	CTH T, N. OF CTH Y	J4-1	24" X 36"	6.00		1		CTH T, SEE PLAN SHEET
34	"	W2-6	30" X 30"	6.25		1		
34A	"	W13-1	18" X 18"	2.25		1		15 MPH, MOUNT BELOW SIGN #34
35	"	R2-1	24" X 30"	5.00				35 MPH
36	RICHARDS AVE	R1-1	30" X 30"	5.18		1		
37	CTH T, N. OF RICHARDS AVE	J1-1	24" X 39"	6.50		1		CTH Y, SEE PLAN SHEET
38	SKY RANCH AVE	R1-1	30" X 30"	5.18		1		
39	ROBERTS AVE	R1-1	30" X 30"	5.18		1		
40	CTH T, N. OF ROBERTS AVE	R2-1	24" X 30"	5.00		1		45 MPH
41	"	R2-1	24" X 30"	5.00		1		45 MPH
42	CTH T, S. OF BROOKS RD	W2-1	30" X 30"	6.25		1		
43	"	R2-1	24" X 30"	5.00		1		45 MPH
44	BROOKS RD	R1-1	30" X 30"	5.18		1		
44A	BROOKS RD	R5-2	24" X 24"	4.00				MOUNT ON OPPOSITE SIDE OF SIGN #45
45	"	R1-1	30" X 30"	5.18		1		
46	CTH T, N. OF BROOKS RD	R2-1	24" X 30"	5.00		1		55 MPH
47	"	W3-5	36" X 36"	9.00		1		45 MPH
48	"	W2-1	30" X 30"	6.25		1		
49	CTH T, S. OF CTH GG	W3-1	36" X 36"	9.00		1		
50	"	M1-5A	24" X 24"	4.00	1			CTH T, SEE PLAN SHEET
51	CTH T AT CTH GG	R1-1	30" X 30"	5.18	1			
51A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #51
52	"	R1-1	30" X 30"	5.18		1		
52A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #52
53	"	J13-2	48" X 45"	15.00		1		CTH GG, CTH T, SEE PLAN SHEET
54	CTH GG AT CTH T	J13-2	48" X 45"	15.00		1		CTH GG, CTH T, SEE PLAN SHEET
55	"	R1-1	30" X 30"	5.18	1			
55A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #55
56	CTH GG AT CTH T	R1-1	30" X 30"	5.18	1			
56A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #56
57	"	R1-1	30" X 30"	5.18		1		
57A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #57
58	"	R1-1	30" X 30"	5.18	1			
58A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #58
59	CTH T, N. OF CTH GG	R1-1	30" X 30"	5.18		1		
59A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #59
60	CTH GG AT CTH T	J13-2	48" X 45"	15.00		1		CTH GG, CTH T, SEE PLAN SHEET
61	CTH T, N. OF CTH GG	J13-2	48" X 45"	15.00		1		CTH GG, CTH T, SEE PLAN SHEET
62	CTH T, N. OF CTH GG	R1-1	30" X 30"	5.18	1			
62A	"	R1-3P	18" X 6"	0.75				MOUNT BELOW SIGN #62
63	"	M1-5A	24" X 24"	4.00		1		CTH T, SEE PLAN SHEET
TOTALS				562.52	6	60	4	

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REMOVING, TYPE II SIGNS AND  
REMOVING SMALL SIGN SUPPORTS

SIGN	LOCATION	SIGN CODE	638.2602 REMOVING SIGNS TYPE II EACH	638.3000 REMOVING SMALL SIGN SUPPORTS EACH	REMARKS
100	CTH T, S. OF CTH Y	W3-1	1	1	
101	"	W6-2	1	1	
102	"	M1-5A	1	1	
103	"	R2-1	1		
104	"	R1-1	1	1	REMOVE R1-3-4 ALSO
105	"	J13-2	3	1	
106	"	R1-1	1	1	
106A	CTH T & CTH Y INTERSECTION	R1-1	1	1	
107	CTH Y, W. OF CTH T	W3-1	1	1	
108	"	M1-5A	1	1	
109	"	R2-1	1		
110	"	R1-1	1	1	
111	"	J13-2	3	1	
112	"	R1-1	1	1	REMOVE R1-3-4 ALSO
112A	CTH T & CTH Y INTERSECTION	R1-1	1		
113	CTH Y, E. OF CTH T	R1-1	1	1	
114	"	R1-1	1	1	
115	"	J13-2	3	1	
116	"	M1-5A	1	1	
117	"	R2-1	1		
118	"	W3-1	1	1	
119	CTH T, N. OF CTH Y	J13-2	3	1	
120	"	R1-1	1	1	REMOVE R1-3-4 ALSO
121	"	R1-1	1	1	
122	"	M1-5A	1	1	
123	"	R2-1	1	1	
124	CTH T, S. OF RICHARDS AVE	W3-1	1	1	
124A	RICHARDS AVE, W. OF CTH T	R1-1	1	1	
125	CTH T, N. OF RICHARDS AVE	J1-1	2	1	
126	SKY RANCH RD	R1-1	1	1	
127	ROBERTS AVE	R1-1	1	1	
128	CTH T, N. OF ROBERTS AVE	R2-1	1	1	
129	"	R2-1	1	1	
130	CTH T, S. OF BROOKS RD	W2-1	1	1	
131	"	R2-1	1	1	
132	BROOKS RD	R1-1	1	1	
133	"	R1-1	1	1	
134	CTH T, N. OF BROOKS RD	R2-1	1	1	

**REMOVING, TYPE II SIGNS AND  
REMOVING SMALL SIGN SUPPORTS**

SIGN	LOCATION	SIGN CODE	638.2602 REMOVING SIGNS TYPE II EACH	638.3000 REMOVING SMALL SIGN SUPPORTS EACH	REMARKS
135	CTH T, N. OF BROOKS RD	R2-5	1	1	
136	"	R2-1	1		
137	"	W2-1	1	1	
138	CTH T, S. OF CTH GG	W3-1	1	1	
139	"	M1-5A	1	1	
140	"	R1-1	1	1	REMOVE R1-3-4 ALSO
141	"	R1-1	1	1	REMOVE R1-3-4 ALSO
142	"	J13-2	3	1	
143	CTH T, N. OF CTH GG	J13-2	3	1	
144	"	R1-1	1	1	REMOVE R1-3-4 ALSO
145	"	R1-1	1	1	REMOVE R1-3-4 ALSO
146	"	M1-5A	1	1	
147	CTH GG, W. OF CTH T	J13-2	3	1	
148	"	R1-1	1	1	REMOVE R1-3-4 ALSO
149	"	R1-1	1	1	REMOVE R1-3-4 ALSO
150	CTH GG, E. OF CTH T	R1-1	1	1	REMOVE R1-3-4 ALSO
151	"	R1-1	1	1	REMOVE R1-3-4 ALSO
152	"	J13-2	3	1	
TOTALS			73	51	

**MOVING SIGNS TYPE II**

SIGN NO.	LOCATION	638.2102 MOVING SIGNS TYPE II EACH	638.4000 MOVING SMALL SIGN SUPPORTS EACH	REMARKS
200	CTH T, N. OF BROOKS RD	1	1	MOVE SIGN FOR CONST.
201	"	1		MOVE WITH SIGN #200
202	CTH T, S. OF CTH GG	1	1	MOVE SIGN FOR CONST.
203	CTH GG, N. OF CTH T	1	1	"
TOTALS		4	3	

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PLANT DATA SUMMARY

LOCATION	COMMON NAME	SCIENTIFIC NAME	AVERAGE TYPE	MATURE HEIGHT	SIZE WHEN PLANTED	ROOT ZONE MODE	MINIMUM CONTAINER SIZE	MINIMUM HOLE SIZE	WRAPPING REQ'D	FERT. UNITS REQ'D	RODENT PROTECTION REQ'D	MULCH RING DIAMETER	632.0101	632.0201	632.9101
													TREES	SHRUBS	LANDSCAPING PLANTING SURVEILLANCE AND CARE CYCLES EACH
CENTER ISLAND	CRAB, DONALD WYMAN	MALUS X "DONALD WYMAN"	3T	20'	1" CAL.	CG	#15	**	YES	3	YES	48"	3	-	-
CENTER ISLAND	JUNIPER, MANEY	JUNIPERUS CHINENSIS "MANEY"	2C	5'	15" SPD.	CG	#5	**	NO	1	NO	36"	-	15	-
TOTALS													3	15	15

\*\* DIAMETER OF THE PLANTING HOLE SHALL BE 24-INCHES GREATER THAN THE DIAMETER OF THE CONTAINER. PLANTING HOLE DEPTH SHALL BE THE SAME AS THE DEPTH OF THE CONTAINER.

TRAFFIC CONTROL SUMMARY

LOCATION	APPROXIMATE SERVICE DAYS	643.0300 DRUMS		643.0420 BARRICADES TYPE III		643.0705 WARNING LIGHTS TYPE A		643.0900 SIGNS		REMARKS
		NO. IN SERVICE	DAYS	NO. IN SERVICE	DAYS	NO. IN SERVICE	DAYS	NO. IN SERVICE	DAYS	
CTH T / CTH S	140	-	0	2	280	2	280	3	420	BARRICADES AND SIGNS FOR MAINLINE CLOSURES - DETAIL A
CTH T / STEAMS DRIVE	140	-	0	2	280	4	560	5	700	BARRICADES AND SIGNS FOR MAINLINE CLOSURES - DETAIL C
CTH T (STATION 9+75)	140	-	0	5	700	6	840	1	140	BARRICADES AND SIGNS FOR MAINLINE CLOSURES - DETAIL D
CTH Y (STATION 200+25)	140	-	0	2	280	4	560	4	560	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES - DETAIL 4
CTH Y (STATION 213+00)	140	-	0	2	0	4	0	4	0	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES - DETAIL 4
BROOKS ROAD (STATION 495+90)	140	-	0	2	280	4	560	4	560	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES - DETAIL 4
BROOKS ROAD (STATION 502+25)	140	-	0	2	280	4	560	4	560	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES - DETAIL 4
CTH GG (STATION 597+00)	140	-	0	2	280	4	560	4	560	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES - DETAIL 4
CTH GG (STATION 603+00)	140	-	0	2	280	4	560	4	560	BARRICADES AND SIGNS FOR SIDEROAD CLOSURES - DETAIL 4
CTH T (STATION 125+25)	140	-	0	5	700	5	700	1	140	BARRICADES AND SIGNS FOR MAINLINE CLOSURES - DETAIL D
CTH T / MAXWELL ROAD	140	-	0	2	280	4	560	7	980	BARRICADES AND SIGNS FOR MAINLINE CLOSURES - DETAIL B
UNDISTRIBUTED	140	15	2100	0	0	0	0	0	0	
TOTALS			2100		3640		5740		5180	

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## PAVEMENT MARKING

STATION	TO	STATION	LOCATION	DESCRIPTION	646.0106		646.0126	646.0156	647.0456	647.0566	647.0606	647.0726
					EPOXY 4-INCH	EPOXY 4-INCH	EPOXY 8-INCH	EPOXY 18-INCH	CURB EPOXY	STOP LINE 18-INCH	ISLAND NOSE EPOXY	DIAGONAL EPOXY 12-INCH
					YELLOW LF	WHITE LF	WHITE LF	WHITE LF	YELLOW LF	WHITE LF	YELLOW EACH	YELLOW LF
1+00	-	4+24	ROUNDAABOUT		-	-	148	73	-	-	-	-
10+00	-	10+27	CENTERLINE CTH T	DOUBLE	54	-	-	-	-	-	-	-
10+27	-	12+85	CTH T	PAINTED MEDIAN	1032	-	-	-	10	-	1	85
10+27	-	12+00	NB CTH T, RT	EDGE LINE	-	173	-	-	-	-	-	-
10+27	-	12+00	SB CTH T, LT	EDGE LINE	-	173	-	-	-	-	-	-
12+85	-	16+02	NB CTH T, LT	EDGE LINE	317	-	-	-	-	-	-	-
12+85	-	16+00	SB CTH T, RT	EDGE LINE	301	-	14	-	-	-	-	-
17+36	-	19+82	NB CTH T, LT	EDGE LINE	232	-	14	-	-	-	-	-
17+33	-	19+79	SB CTH T, RT	EDGE LINE	246	-	-	-	-	-	-	-
19+79	-	22+06	CTH T	PAINTED MEDIAN	908	-	-	-	10	-	1	62
21+00	-	28+50	CTH T, RT	EDGE LINE	-	750	-	-	-	-	-	-
22+06	-	23+67	CENTERLINE CTH T	DOUBLE	322	-	-	-	-	-	-	-
24+47	-	28+50	CENTERLINE CTH T	DOUBLE	806	-	-	-	-	-	-	-
24+47	-	34+41	CTH T, LT	EDGE LINE	-	994	-	-	-	-	-	-
29+30	-	34+41	CENTERLINE CTH T	DOUBLE	1022	-	-	-	-	-	-	-
29+30	-	69+37	CTH T, RT	EDGE LINE	-	4007	-	-	-	-	-	-
35+21	-	48+50	CENTERLINE CTH T	DOUBLE	2658	-	-	-	-	-	-	-
35+21	-	69+31	CTH T, LT	EDGE LINE	-	3410	-	-	-	-	-	-
48+50	-	69+31	CENTERLINE CTH T	SKIPS	520	-	-	-	-	-	-	-
69+60	-	69+60	CTH T	STOP LINE	-	-	-	-	-	18	-	-
70+13	-	70+13	CTH T	STOP LINE	-	-	-	-	-	18	-	-
70+41	-	122+01	CTH T, RT	EDGE LINE	-	5160	-	-	-	-	-	-
70+41	-	110+57	CENTERLINE CTH T	SKIPS	1004	-	-	-	-	-	-	-
70+41	-	122+22	CTH T, LT	EDGE LINE	-	5181	-	-	-	-	-	-
110+57	-	122+01	CENTERLINE CTH T	SKIPS LT, SOLID RT	1679	-	-	-	-	-	-	-
122+55	-	122+55	CTH T	STOP LINE	-	-	-	-	-	18	-	-
123+10	-	123+10	CTH T	STOP LINE	-	-	-	-	-	18	-	-
123+38	-	125+00	CTH T, RT	EDGE LINE	-	162	-	-	-	-	-	-
123+58	-	125+00	CTH T, LT	EDGE LINE	-	142	-	-	-	-	-	-
123+58	-	125+00	CENTERLINE CTH T	SOLID LT, SKIPS LT	178	-	-	-	-	-	-	-
201+25	-	204+34	EB CTH Y, RT	EDGE LINE	-	309	-	-	-	-	-	-
201+25	-	201+48	CENTERLINE CTH Y	DOUBLE	46	-	-	-	-	-	-	-
201+25	-	204+34	WB CTH Y, LT	EDGE LINE	-	309	-	-	-	-	-	-
201+48	-	204+34	CTH Y	PAINTED MEDIAN	1144	-	-	-	10	-	1	88
204+34	-	207+18	WB CTH Y	EDGE LINE	270	-	14	-	-	-	-	-

PAVEMENT MARKING (CONTINUED)

STATION	TO	STATION	LOCATION	DESCRIPTION	646.0106		646.0126	646.0156	647.0456	647.0566	647.0606	647.0726
					EPOXY	EPOXY	EPOXY	EPOXY	CURB	STOP LINE	ISLAND NOSE	DIAGONAL
					4-INCH	4-INCH	8-INCH	18-INCH	EPOXY	18-INCH	EPOXY	EPOXY
					YELLOW	WHITE	WHITE	WHITE	YELLOW	WHITE	YELLOW	YELLOW
					LF	LF	LF	LF	LF	LF	EACH	LF
204+34	-	207+19	EB CTH Y	EDGE LINE	285	-	-	-	-	-	-	-
208+53	-	210+51	WB CTH Y	EDGE LINE	198	-	-	-	-	-	-	-
208+54	-	210+54	EB CTH Y	EDGE LINE	186	-	14	-	-	-	-	-
210+51	-	212+63	CTH Y	PAINTED MEDIAN	848	-	-	-	10	-	1	63
210+53	-	213+00	WB CTH Y	EDGE LINE	-	247	-	-	-	-	-	-
210+57	-	213+00	EB CTH Y	EDGE LINE	-	243	-	-	-	-	-	-
212+66	-	213+00	CENTERLINE CTH Y	DOUBLE	68	-	-	-	-	-	-	-
412+00	-	418+56	SE QUADRANT EOP	EDGE LINE	-	656	-	-	-	-	-	-
499+70	-	499+70	BROOKS ROAD	STOP LINE	-	-	-	-	30	-	-	-
500+30	-	500+30	BROOKS ROAD	STOP LINE	-	-	-	-	30	-	-	-
504+34	-	511+64	SW QUADRANT EOP	EDGE LINE	-	730	-	-	-	-	-	-
597+25	-	599+82	CTH GG, LT & RT	EDGELINES	-	514	-	-	-	-	-	-
597+26	-	599+83	CENTERLINE CTH GG	SOLID RT, SKIPS LT	321	-	-	-	-	-	-	-
599+71	-	599+71	CTH GG	STOP LINE	-	-	-	-	30	-	-	-
600+18	-	602+90	CTH GG, LT & RT	EDGELINES	-	544	-	-	-	-	-	-
600+19	-	602+91	CENTERLINE CTH GG	DOUBLE	544	-	-	-	-	-	-	-
600+30	-	600+30	CTH GG	STOP LINE	-	-	-	-	30	-	-	-
SUBTOTALS					15,189	23,704	204	73	40	192	4	298
TOTALS					38,893		204	73	40	192	4	298

DITCHING

STATION	TO	STATION	LOCATION	SPV.0090.04 LF
124+00	-	127+00	CTH T, RT	300
TOTAL				300

LOCATING NO-PASSING ZONES

STATION	TO	STATION	LOCATION	648.0100 MI
10+00	-	124+00	CTH T	2.16
TOTAL				2.16

RELOCATING MONUMENT

STATION	LOCATION	SPV.0105.05 LS
70+20	CTH T, LT	1
TOTAL		1

SAWING CONCRETE

STATION	LOCATION	690.0250 LF
22+30	CTH T, LT	21
24+95	CTH T, LT	20
32+60	CTH T, LT	15
122+00	CTH T, LT	28
499+55	BROOKS ROAD, LT	16
TOTAL		100

SAWING ASPHALT

STATION	LOCATION	690.0150 LF
10+00	CTH T	24
12+25	CTH T, LT	14
18+15	CTH T, LT	16
21+15	CTH T, LT	23
24+00	CTH T, RT	10
25+80	CTH T, RT	16
27+40	CTH T, RT	11
27+40	CTH T, LT	16
28+50	CTH T, LT	14
30+15	CTH T, LT	20
31+25	CTH T, LT	20
38+25	CTH T, LT	20
41+35	CTH T, RT	20
43+50	CTH T, LT	10
44+45	CTH T, LT	11
45+35	CTH T, LT	21
57+80	CTH T, RT	12
63+85	CTH T, LT	10
66+40	CTH T, LT	11
68+30	CTH T, RT	15
71+25	CTH T, RT	24
75+55	CTH T, RT	30
101+15	CTH T, LT	27
120+00	CTH T, LT	120
121+50	CTH T, LT	70
125+00	CTH T	21
201+25	CTH Y	22
202+00	CTH Y, RT	31
206+00	CTH Y, LT	11
206+50	CTH Y, LT	20
213+00	CTH Y	23
302+30	RICHARDS AVENUE	24
350+70	SKY RANCH AVENUE	20
359+30	ROBERTS AVENUE	23
496+00	BROOKS ROAD	22
497+00	BROOKS ROAD, LT	19
500+75	BROOKS ROAD, RT	17
502+20	BROOKS ROAD	22
597+25	CTH GG	24
598+50	CTH GG, RT	23
602+85	CTH GG	23
TOTAL		930







**SCHEDULE OF LANDS & INTERESTS REQUIRED**

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

PARCEL NUMBER	OWNER (S)	INTEREST REQUIRED	TLE SO. FT.
17	DEVIN S. & KATHERINE A. STELZNER	TLE	1060
18	LARRY E. & ELLEN J. NEMUTH	TLE	1800
19	BARBARA J. GILL	TLE	1800
20	LOUIS J. & ETHEL L. REICHENBERGER	TLE	2820
21	LARRY D. & LINDA A. CARPENTER	TLE	1800
23	JASON J. & JEFFREY J. SCHMOKER	TLE	3330
24	GLENN S. & PEGGY BIRDSALL	TLE	8450
25	DENNIS J. & SANDRA J. FERGUSON	TLE	7190
26	RONALD M. & DONNA M. MISCHLER	TLE	2490
27	RANDALL T. & AMY J. DARABOSH	TLE	170

**TRANSPORTATION PROJECT PLAT NO: 488-4.03**

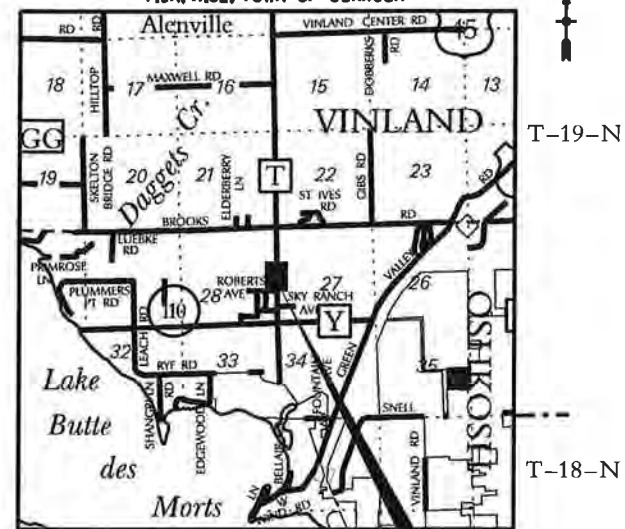
THAT PART OF THE NORTHEAST 1/4 OF THE SOUTHWEST 1/4, SECTION 28 AND THE NORTHWEST 1/4 OF THE SOUTHWEST 1/4, SECTION 27, TOWNSHIP 19 NORTH, RANGE 16 EAST, LOCATED IN THE TOWN OF OSHKOSH, WINNEBAGO COUNTY, WISCONSIN

RELOCATION ORDER CTH T WINNEBAGO COUNTY

TO PROPERLY ESTABLISH, LAY OUT, WIDEN, ENLARGE, EXTEND, CONSTRUCT, RECONSTRUCT, IMPROVE, OR MAINTAIN A PORTION OF THE HIGHWAY DESIGNATED ABOVE, THE STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION DEEMS IT NECESSARY TO RELOCATE OR CHANGE SAID HIGHWAY AND ACQUIRE CERTAIN LANDS AND INTERESTS OR RIGHTS IN LANDS FOR THE ABOVE PROJECT.

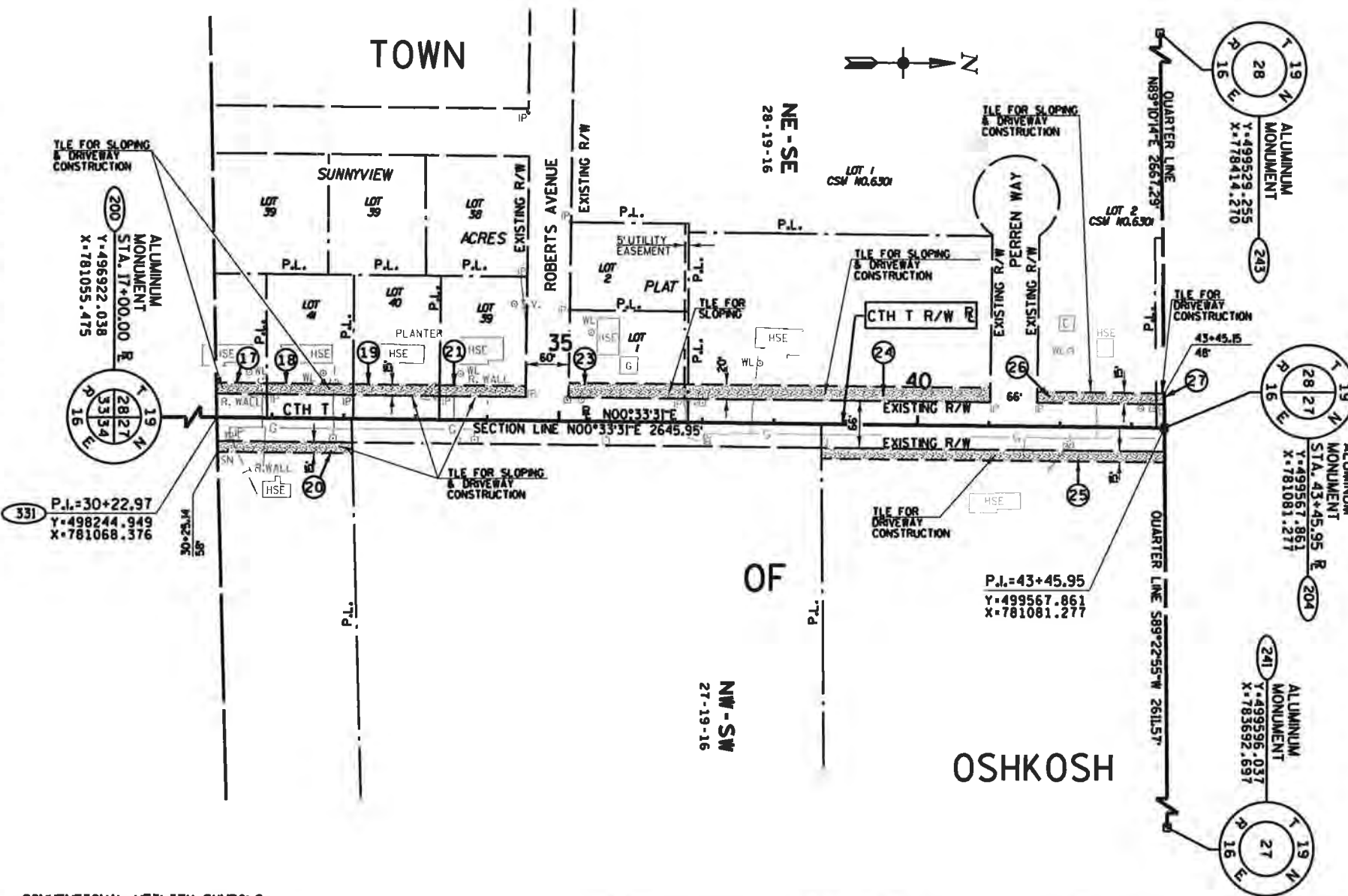
TO EFFECT THIS CHANGE, PURSUANT TO AUTHORITY GRANTED UNDER SECTION 84.02 (3) AND 84.09, WISCONSIN STATUTES, WINNEBAGO COUNTY HIGHWAY DEPARTMENT HEREBY ORDERS THAT:  
 1. THAT PORTION OF SAID HIGHWAY AS SHOWN ON THIS PLAT IS Laid OUT AND ESTABLISHED TO THE LINES AND WIDTHS AS SO SHOWN FOR THE ABOVE PROJECT.  
 2. THE LANDS OR INTERESTS OR RIGHTS IN LANDS AS SHOWN ON THIS PLAT ARE REQUIRED BY THE DEPARTMENT FOR THE ABOVE PROJECT AND SHALL BE ACQUIRED IN THE NAME OF THE STATE OF WISCONSIN, PURSUANT TO THE PROVISIONS OF SECTION 84.09 (1) OR (2), WISCONSIN STATUTES.

NE 1/4 -SE 1/4, SEC. 28 AND THE NW 1/4 -SW 1/4, SEC. 27 T19N, R16E, TOWN OF OSHKOSH



**EXISTING MONUMENTATION COORDINATES**

Y	X	DESCRIPTION
497997.461	781031.020	1" PIPE
498079.746	781097.632	2" PIPE
498082.870	781319.723	1" PIPE
498139.681	781100.301	.75" REBAR
498266.864	781099.843	2" PIPE
498196.298	781034.913	1" PIPE
498554.340	781038.416	1" PIPE
498314.320	781034.333	.25" PIN
498434.376	781037.333	1" PIPE
498900.607	781045.942	1" PIPE
498735.213	780918.913	1" PIPE
498736.423	780796.801	1" PIPE
498677.670	780645.627	2" PIPE
498676.853	780873.197	2" PIPE
498674.266	781039.548	2" PIPE
499390.064	781046.069	1" PIPE
500063.252	781046.527	1" PIPE
498898.053	781047.281	1" PIPE
499732.994	781047.379	1" PIPE
499645.038	781047.209	1" PIPE
499557.159	781046.984	1" PIPE
500838.104	781108.960	1" PIPE



**NOTES:**

COORDINATES AND BEARINGS SHOWN ON THIS PLAT ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM, WINNEBAGO COUNTY ZONE, NAD83 (1997) ADJUSTMENT. THE COORDINATES SHOWN ARE GRID COORDINATES AND ARE TO BE USED AS GRID OR GROUND VALUES ON THIS PLAT. RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND WILL BE PLACED PRIOR TO THE COMPLETION OF THE PROJECT (1"x24" IRON PIPE-MIN. WT. 1.13 LBS./LIN. FT. WITH PLASTIC CAP STAMPED "AYRES"). RIGHT-OF-WAY BOUNDARIES ARE DEFINED WITH COURSES OF THE PERIMETER OF THE HIGHWAY LANDS REFERENCED TO THE U.S. PUBLIC LAND SURVEY OR OTHER SURVEYS OF RECORD.

PROPERTY LINES SHOWN ON THIS PLAT ARE DRAWN FROM DATA DERIVED FROM MAPS AND DOCUMENTS OF PUBLIC RECORD AND/OR EXISTING OCCUPATIONAL LINES. THIS PLAT MAY NOT BE A TRUE REPRESENTATION OF EXISTING PROPERTY LINES, EXCLUDING RIGHT-OF-WAY LINES, AND SHOULD NOT BE USED AS A SUBSTITUTE FOR AN ACCURATE FIELD SURVEY.

EXISTING HIGHWAY RIGHT-OF-WAY SHOWN HEREIN IS BASED ON THE FOLLOWING POINTS OF REFERENCE: EXISTING HIGHWAY RIGHT-OF-WAY FOR CTH T ESTABLISHED FROM EVIDENCE IN TOWN RECORDS, SUNNYVIEW ACRES PLAT, AND CERTIFIED SURVEY MAP NUMBER 2856.

EXISTING RIGHT-OF-WAY FOR ROBERTS AVENUE WAS ESTABLISHED FROM SUNNYVIEW ACRES PLAT. EXISTING RIGHT-OF-WAY FOR PERREN WAY WAS ESTABLISHED FROM CERTIFIED SURVEY MAP 6301.

A TEMPORARY LIMITED EASEMENT (TLE) IS A RIGHT FOR CONSTRUCTION PURPOSES, AS DEFINED HEREIN, INCLUDING THE RIGHT TO OPERATE NECESSARY EQUIPMENT THEREON AND 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 NECESSARY OR DESIRABLE. ALL TLEs ARE TO TERMINATE ON 1/01/2015 OR THE DATE THE CONSTRUCTION OF THE PROJECT IS COMPLETED, WHICHEVER OCCURS FIRST.

CONVENTIONAL ABBREVIATIONS	CONVENTIONAL SYMBOLS	CONVENTIONAL UTILITY SYMBOLS
ACCESS POINT AP	PROPOSED R/W LINE (IF UNLESS NOTED)	WATER
ACCESS RIGHTS AR	EXISTING R/W LINE	GAS
ACRES AC.	PROPERTY LINE	TELEPHONE
AND OTHERS ET.AL.	LOT & TIE LINES	OVERHEAD
CENTERLINE C/L	SLOPE INTERCEPTS	TRANSMISSION LINES
CERTIFIED SURVEY MAP CSM	CORPORATE LIMITS	ELECTRIC
CORNER COR.	NO ACCESS (BY PREVIOUS ACQUISITION/CONTROL)	CABLE TELEVISION
CONVEYANCE OF RIGHTS CR	NO ACCESS (BY ACQUISITION)	FIBER OPTIC
DOCUMENT DOC.	NO ACCESS (BY STATUTORY AUTHORITY)	SANITARY SEWER
EASEMENT EASE.	SECTION LINE	STORM SEWER
LAND CONTRACT LC	QUARTER LINE	
MONUMENT MON.	SIXTEENTH LINE	
PAGE P.	EXISTING CENTERLINE	
PERMANENT LIMITED EASEMENT PLE	PROPOSED REFERENCE LINE	
PROPERTY LINE PL	PARALLEL OFFSET	
RECORDED AS (100') SQ. FT.		

CONVENTIONAL ABBREVIATIONS	CONVENTIONAL SYMBOLS	CONVENTIONAL UTILITY SYMBOLS
R/L REFERENCE LINE	PROPOSED R/W LINE	NON COMPENSABLE
REM. REMAINING	EXISTING H.E. LINE	COMPENSABLE
R/W RIGHT-OF-WAY	PROPERTY LINE	COMPENSABLE
SEC. SECTION	LOT & TIE LINES	
STA. STATION	SLOPE INTERCEPTS	
TLE TEMPORARY LIMITED EASEMENT	CORPORATE LIMITS	
V. VOLUME	NO ACCESS (BY PREVIOUS ACQUISITION/CONTROL)	
	NO ACCESS (BY ACQUISITION)	
	NO ACCESS (BY STATUTORY AUTHORITY)	
	SECTION LINE	
	QUARTER LINE	
	SIXTEENTH LINE	
	EXISTING CENTERLINE	
	PROPOSED REFERENCE LINE	
	PARALLEL OFFSET	



**AYRES ASSOCIATES**

I, JASON M. INGRAM, REGISTERED LAND SURVEYOR, HEREBY CERTIFY THAT IN FULL COMPLIANCE WITH THE PROVISIONS OF SECTION 84.095 OF THE WISCONSIN STATUTES AND UNDER THE DIRECTION OF WINNEBAGO COUNTY, I HAVE SURVEYED TRANSPORTATION PROJECT PLAT 488 - 4.03 AND THAT SUCH PLAT CORRECTLY REPRESENTS ALL EXTERIOR BOUNDARIES OF THE SURVEYED LAND.

JASON M. INGRAM, RLS 5-2630 DATE \_\_\_\_\_

THIS PLAT IS APPROVED FOR WINNEBAGO COUNTY.

COMMISSIONER DATE \_\_\_\_\_

**RESERVED FOR REGISTER OF DEEDS**

ACCEPTED FOR RECORDING AND FILING IN THE OFFICE OF THE REGISTER OF DEEDS IN \_\_\_\_\_ COUNTY, WISCONSIN AT \_\_\_\_\_ M ON \_\_\_\_\_ AS DOCUMENT \_\_\_\_\_ AND FILED IN \_\_\_\_\_

SIGNATURE OF REGISTER OF DEEDS \_\_\_\_\_



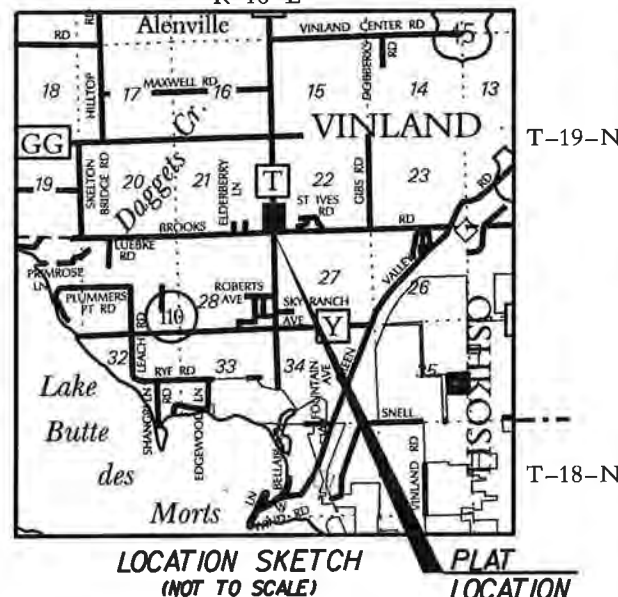


SCHEDULE OF LANDS & INTERESTS REQUIRED

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

Table with 6 columns: PARCEL NUMBER, OWNER (S), INTEREST REQUIRED, R/W ACRES (NEW, EXISTING, TOTAL), and TLE ACRES. Lists parcels 32, 42, 43, 44, 45, 46, 47, 101, and 105.

SE 1/4-SE 1/4, SEC. 21 AND SW 1/4-SW 1/4, SEC. 22 T9N, R16E, TOWN OF VINLAND R-16-E



PLAT LOCATION

NOTES:

COORDINATES AND BEARINGS SHOWN ON THIS PLAT ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM, WINNEBAGO COUNTY ZONE, NAD83 (1991) ADJUSTMENT. THE COORDINATES SHOWN ARE GRID COORDINATES AND ARE TO BE USED AS GRID OR GROUND VALUES ON THIS PLAT. RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND WILL BE PLACED PRIOR TO THE COMPLETION OF THE PROJECT...

PARCELS 32 AND 44

COURSE TABLE for parcels 32 and 44, listing course, distance, and bearing for various segments.

PARCELS 32 AND 44

COORDINATES for parcels 32 and 44, listing point numbers, Y, and X values.

TRANSPORTATION PROJECT PLAT NO: 488 - 4.06 AMENDMENT NO: 1

AMENDS PARCEL 32 AND 100 OF THE TRANSPORTATION PROJECT PLAT 488-4.06 RECORDED AS DOCUMENT NO: 1547294 AND FILED IN FILE 10F TPP, PAGE 118. THAT PART OF THE SOUTHEAST 1/4 OF THE SOUTHEAST 1/4, SECTION 21 AND THE SOUTHWEST 1/4 OF THE SOUTHWEST 1/4, SECTION 22, TOWNSHIP 19 NORTH, RANGE 16 EAST, LOCATED IN THE TOWN OF VINLAND, WINNEBAGO COUNTY, WISCONSIN

RELOCATION ORDER CTH T WINNEBAGO COUNTY

TO PROPERLY ESTABLISH, LAY OUT, WIDEN, ENLARGE, EXTEND, CONSTRUCT, RECONSTRUCT, IMPROVE, OR MAINTAIN A PORTION OF THE HIGHWAY DESIGNATED ABOVE, THE STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION DEEMS IT NECESSARY TO RELOCATE OR CHANGE SAID HIGHWAY AND ACQUIRE CERTAIN LANDS AND INTERESTS OR RIGHTS IN LANDS FOR THE ABOVE PROJECT.

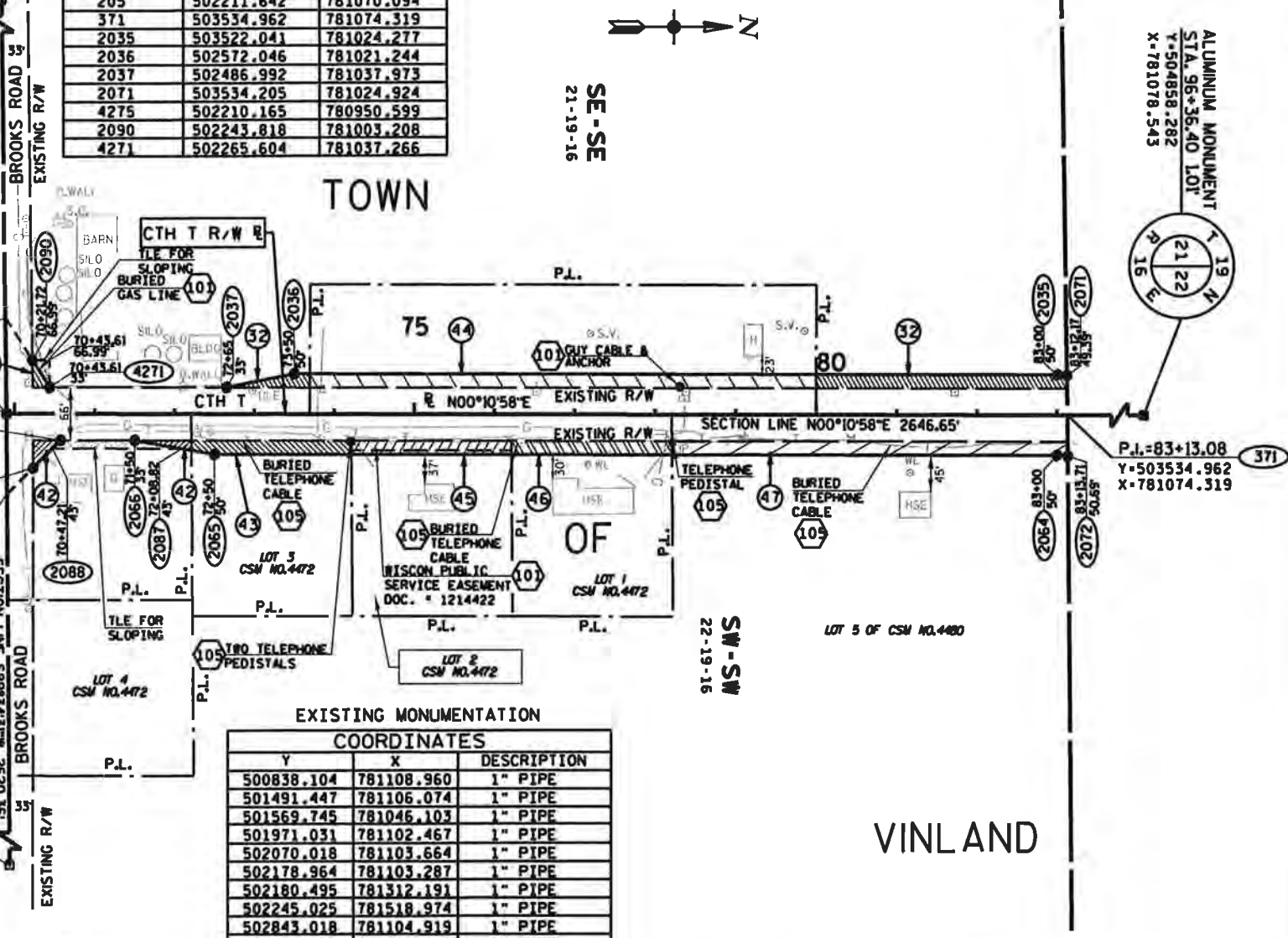
TO EFFECT THIS CHANGE, PURSUANT TO AUTHORITY GRANTED UNDER SECTION 84.02 (3) AND 84.09, WISCONSIN STATUTES, THE WINNEBAGO COUNTY HIGHWAY DEPARTMENT HEREBY ORDERS THAT: 1. THAT PORTION OF SAID HIGHWAY AS SHOWN ON THIS PLAT IS Laid OUT AND ESTABLISHED TO THE LINES AND WIDTHS AS SHOWN FOR THE ABOVE PROJECT.

PARCELS 42, 43, 45, 46, 47

COURSE TABLE for parcels 42, 43, 45, 46, and 47.

PARCELS 42, 43, 45, 46, 47

COORDINATES for parcels 42, 43, 45, 46, and 47.



EXISTING MONUMENTATION COORDINATES table listing Y, X, and DESCRIPTION for various pipe monuments.

CONVENTIONAL ABBREVIATIONS

Table of conventional abbreviations for survey features like ACCESS POINT, ACRES, AND OTHERS, etc.

CURVE DATA

Table of curve data abbreviations including LCH, LCB, R, MON., P., PERMANENT LIMITED EASEMENT, PROPERTY LINE, and RECORDED AS.

CONVENTIONAL SYMBOLS

Table of conventional symbols for various survey elements like PROPOSED R/W LINE, EXISTING H.E. LINE, PROPERTY LINE, etc.

CONVENTIONAL UTILITY SYMBOLS

Table of conventional utility symbols for WATER, GAS, TELEPHONE, OVERHEAD TRANSMISSION LINES, etc.



RYAN M. BELTRAND, REGISTERED LAND SURVEYOR, HEREBY CERTIFY THAT IN FULL COMPLIANCE WITH THE PROVISIONS OF SECTION 84.095 OF THE WISCONSIN STATUTES AND UNDER THE DIRECTION OF WINNEBAGO COUNTY, I HAVE SURVEYED TRANSPORTATION PROJECT PLAT 488 - 4.06 AND THAT SUCH PLAT CORRECTLY REPRESENTS ALL EXTERIOR BOUNDARIES OF THE SURVEYED LAND.

RYAN M. BELTRAND, RLS S-2825

THIS PLAT IS APPROVED FOR WINNEBAGO COUNTY.

COMMISSIONER

RESERVED FOR REGISTER OF DEEDS PROJECT NUMBER 488 - 4.06 AMENDMENT NO: 1

ACCEPTED FOR RECORDING AND FILING IN THE OFFICE OF THE REGISTER OF DEEDS IN COUNTY, WISCONSIN AT ON AS DOCUMENT AND FILED IN

SIGNATURE OF REGISTER OF DEEDS



SCHEDULE OF LANDS & INTERESTS REQUIRED

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

Table with columns: PARCEL NUMBER, OWNER (S), INTEREST REQUIRED, R/W ACRES (NEW, EXISTING, TOTAL), PLE ACRES. Rows include parcels 48, 49, and 53.

PARCEL 53

COURSE TABLE for Parcel 53 with columns: COURSE, DISTANCE, BEARING. Courses range from 214-446 to 2067-214.

COORDINATES for Parcel 53 with columns: POINT NUMBER, Y, X. Points range from 214 to 2067.

TRANSPORTATION PROJECT PLAT NO: 488-4.08 AMENDMENT NO. 1

AMENDS PARCEL 48 OF THE TRANSPORTATION PROJECT PLAT 488-4.08 RECORDED AS DOCUMENT NO: 1547296 AND FILED IN FILE 1 OF TPP, PAGE 120.

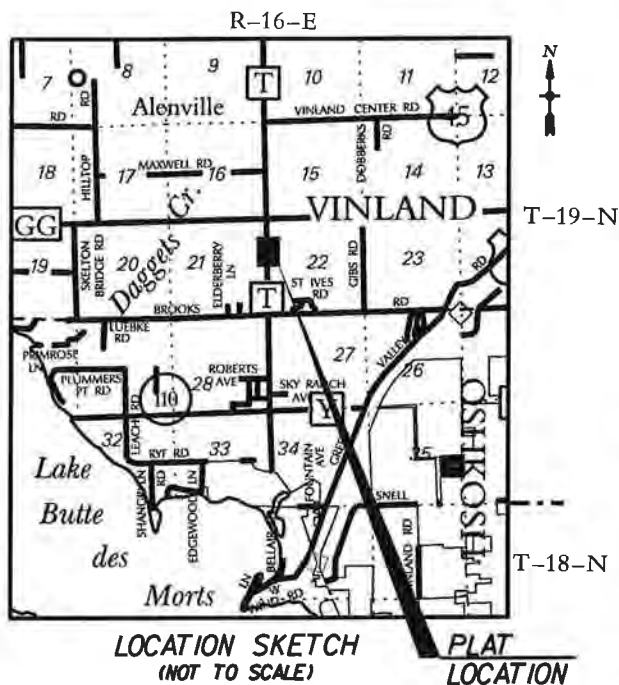
THAT PART OF THE SOUTHEAST 1/4 OF THE NORTHEAST 1/4, SECTION 21 AND THE SOUTHWEST 1/4 OF THE NORTHWEST 1/4, SECTION 22, TOWNSHIP 19 NORTH, RANGE 16 EAST, LOCATED IN THE TOWN OF VINLAND, WINNEBAGO COUNTY, WISCONSIN

RELOCATION ORDER CTH T WINNEBAGO COUNTY

TO PROPERLY ESTABLISH, LAY OUT, WIDEN, ENLARGE, EXTEND, CONSTRUCT, RECONSTRUCT, IMPROVE, OR MAINTAIN A PORTION OF THE HIGHWAY DESIGNATED ABOVE, THE STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION DEEMS IT NECESSARY TO RELOCATE OR CHANGE SAID HIGHWAY AND ACQUIRE CERTAIN LANDS AND INTERESTS OR RIGHTS IN LANDS FOR THE ABOVE PROJECT.

TO EFFECT THIS CHANGE, PURSUANT TO AUTHORITY GRANTED UNDER SECTION 84.02 (3) AND 84.09, WISCONSIN STATUTES, THE WINNEBAGO COUNTY HIGHWAY DEPARTMENT HEREBY ORDERS THAT: 1. THAT PORTION OF SAID HIGHWAY AS SHOWN ON THIS PLAT IS Laid OUT AND ESTABLISHED TO THE LINES AND WIDTHS AS SO SHOWN FOR THE ABOVE PROJECT. 2. THE LANDS OR INTERESTS OR RIGHTS IN LANDS AS SHOWN ON THIS PLAT ARE REQUIRED BY THE DEPARTMENT FOR THE ABOVE PROJECT AND SHALL BE ACQUIRED IN THE NAME OF THE STATE OF WISCONSIN, PURSUANT TO THE PROVISIONS OF SECTION 84.09 (1) OR (2), WISCONSIN STATUTES.

SE 1/4-NE 1/4, SEC. 21 AND SW 1/4-NW 1/4, SEC. 22 T19N, R16E, TOWN OF VINLAND



PARCEL 49 COURSE TABLE with columns: COURSE, DISTANCE, BEARING. Courses include 214-438, 438-446, 446-2042, etc.

PARCELS 48 AND 49 COORDINATES with columns: POINT NUMBER, Y, X. Points range from 214 to 438.

PARCELS 48 (PLE) COURSE TABLE with columns: COURSE, DISTANCE, BEARING. Courses include 214-4270, 4270-2058, etc.

NOTES:

COORDINATES AND BEARINGS SHOWN ON THIS PLAT ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM, WINNEBAGO COUNTY ZONE, NAD83 (1997) ADJUSTMENT. THE COORDINATES SHOWN ARE GRID COORDINATES AND ARE TO BE USED AS GRID OR GROUND VALUES ON THIS PLAT. RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND WILL BE PLACED PRIOR TO THE COMPLETION OF THE PROJECT (1"x2" IRON PIPE-MIN. WT. 1.13 LBS/LIN. FT. WITH PLASTIC CAP STAMPED "AYRES").

PROPERTY LINES SHOWN ON THIS PLAT ARE DRAWN FROM DATA DERIVED FROM MAPS AND DOCUMENTS OF PUBLIC RECORD AND/OR EXISTING OCCUPATIONAL LINES. THIS PLAT MAY NOT BE A TRUE REPRESENTATION OF EXISTING PROPERTY LINES, EXCLUDING RIGHT-OF-WAY LINES, AND SHOULD NOT BE USED AS A SUBSTITUTE FOR AN ACCURATE FIELD SURVEY.

EXISTING HIGHWAY RIGHT-OF-WAY SHOWN HEREIN IS BASED ON THE FOLLOWING POINTS OF REFERENCE: EXISTING HIGHWAY RIGHT-OF-WAY FOR CTH T ESTABLISHED FROM EVIDENCE IN TOWN RECORDS, WISCONSIN STATE STATUTE 82.34, AND HIGHWAY DEEDS FOUND AT THE REGISTER OF DEEDS IN VOLUME 409, EASEMENTS AND HIGHWAY DEEDS, PAGES 379, 386.

A PERMANENT LIMITED EASEMENT (PLE) IS A RIGHT FOR CONSTRUCTION AND MAINTENANCE PURPOSES, AS DEFINED HEREIN, INCLUDING THE RIGHT TO OPERATE NECESSARY EQUIPMENT THEREON AND 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 NECESSARY OR DESIRABLE, BUT WITHOUT PREJUDICE TO THE OWNER'S RIGHT TO MAKE OR CONSTRUCT IMPROVEMENT ON SAID LANDS OR TO FLATTEN THE SLOPES, PROVIDING SAID ACTIVITIES WILL NOT IMPAIR OR OTHERWISE ADVERSELY AFFECT THE HIGHWAY FACILITIES.

CONVENTIONAL ABBREVIATIONS

Table of conventional abbreviations for surveying symbols, including ACCESS POINT, ACCESS RIGHTS, ACRES, AND OTHERS, etc., and their corresponding symbols.

CURVE DATA

Table defining curve data abbreviations: LCH (LONG CHORD), LCB (LONG CHORD BEARING), MON. (MONUMENT), etc.

CONVENTIONAL SYMBOLS

Table of conventional symbols for surveying, including FOUND IRON PIPE/PIN, PROPOSED R/W LINE, EXISTING H.E. LINE, etc.

CONVENTIONAL UTILITY SYMBOLS

Table of conventional utility symbols for water, gas, telephone, etc., and their corresponding symbols.

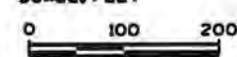
CURVE DATA

Table with columns: CURVE, PC STATION, PT STATION. Row shows curve C1 with stations 96+36.39 and 97+92.58BK.

CURVE TABLE

Table with columns: CURVE, CHORD DISTANCE, CHORD BEARING, RADIUS, ARC LENGTH, PT COORDINATES Y, X. Row shows curve C1 with a radius of 12000'.

SCALE, FEET





**SCHEDULE OF LANDS & INTERESTS REQUIRED**

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

PARCEL NUMBER	OWNER (S)	INTEREST REQUIRED	R/W ACRES			TLE
			NEW	EXISTING	TOTAL	ACRES
32	FLORENCE E. DEVENS, LC VENDOR TODD S. DEVENS, LC PURCHASER	FEE	0.13	----	0.13	----
49	CURTIS M. & LISA B. DOBBERKE	FEE	0.73	1.21	1.94	----
70	VIRGINIA SCHONSHECK	FEE & TLE	0.01	0.30	0.31	0.17
71	TOWN OF VINLAND	FEE & TLE	0.18	----	0.18	0.05
101	WISCONSIN PUBLIC SERVICE CORP.	RELEASE	----	----	----	----
105	AT&T WISCONSIN	RELEASE	----	----	----	----

**PARCELS 32, 70, AND 71**

COURSE TABLE			COORDINATES	
COURSE	DISTANCE	BEARING	Y	X
213-446	1321.86'	S 1°18'31" E	507501.319	781018.171
446-2024	50.00'	S 88°54'54" W	506179.800	781048.357
2024-4106	44.88'	N 20°57'02" E	506178.854	780998.366
4106-1560	351.40'	N 1°18'31" W	506220.766	781014.413
1560-4108	17.00'	S 88°54'58" W	506572.074	781006.388
4108-4109	548.53'	N 1°18'31" W	506571.752	780989.391
4109-4110	52.81'	N 17°28'10" E	507120.143	780976.865
4110-4064	213.24'	N 1°18'31" W	507170.518	780992.719
4064-4065	118.98'	N 46°13'02" W	507383.702	780987.849
4065-4053	46.74'	N 46°13'02" W	507466.029	780901.947
4053-213	150.00'	N 88°52'28" E	507498.372	780868.200

**TRANSPORTATION PROJECT PLAT NO: 488-4.09 AMENDMENT NO: 1**

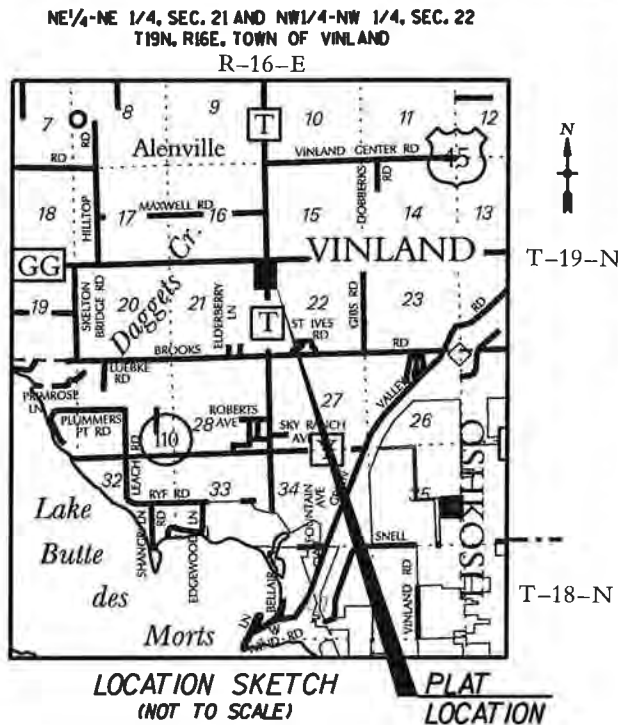
AMENDS PARCELS 32, 49, 71, 100 OF THE TRANSPORTATION PROJECT PLAT 488-4.09 RECORDED AS DOCUMENT NO: 1547297 AND FILED IN FILE 1 OF TPP, PAGE 121.

THAT PART OF THE NORTHEAST 1/4 OF THE NORTHEAST 1/4, SECTION 21 AND THE NORTHWEST 1/4 OF THE NORTHWEST 1/4, SECTION 22, TOWNSHIP 19 NORTH, RANGE 16 EAST, LOCATED IN THE TOWN OF VINLAND, WINNEBAGO COUNTY, WISCONSIN

RELOCATION ORDER CTH T WINNEBAGO COUNTY

TO PROPERLY ESTABLISH LAY OUT, WIDEN, ENLARGE, EXTEND, CONSTRUCT, RECONSTRUCT, IMPROVE, OR MAINTAIN A PORTION OF THE HIGHWAY DESIGNATED ABOVE, THE STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION DEEMS IT NECESSARY TO RELOCATE OR CHANGE SAID HIGHWAY AND ACQUIRE CERTAIN LANDS AND INTERESTS OR RIGHTS IN LANDS FOR THE ABOVE PROJECT.

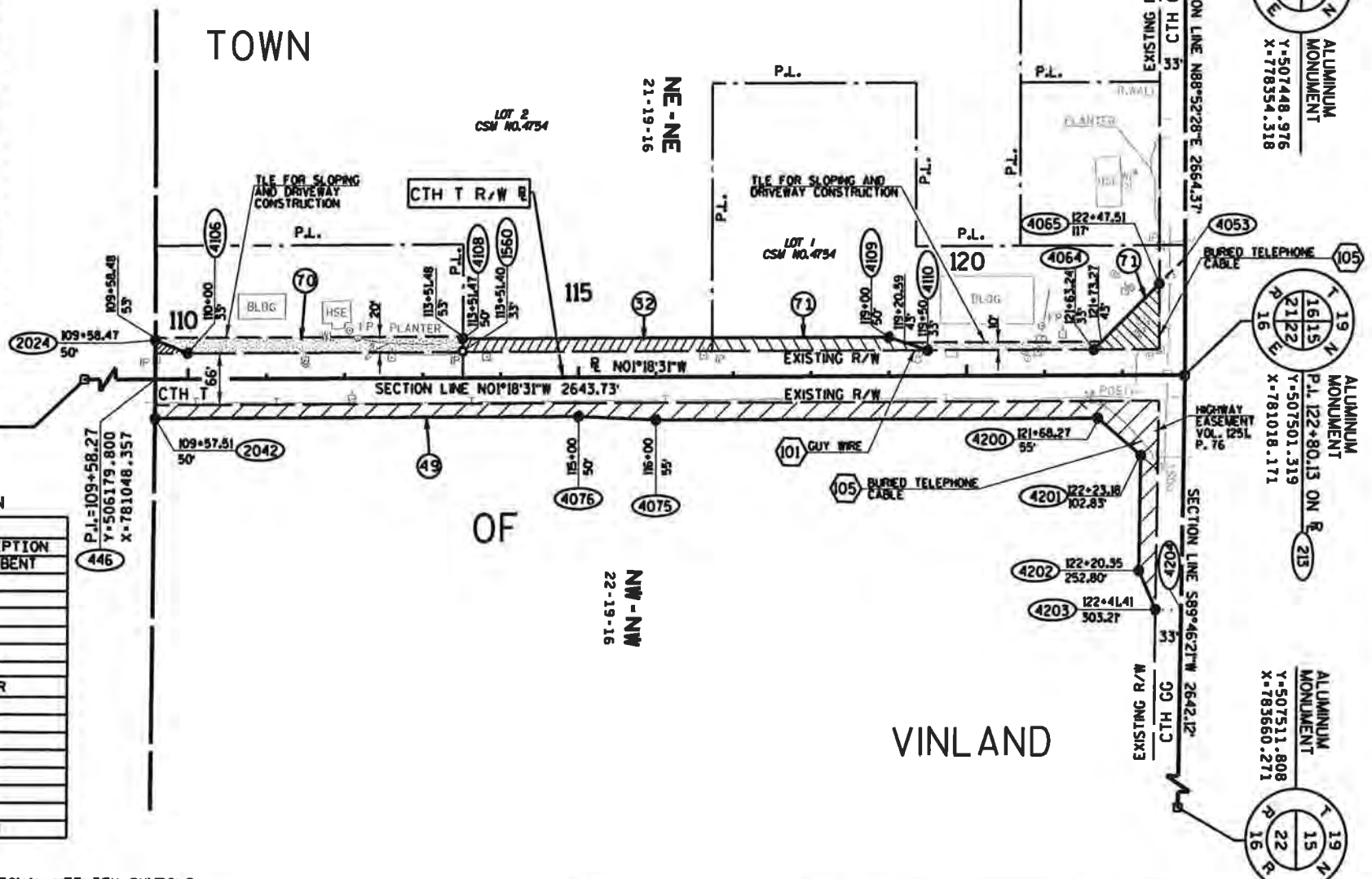
TO EFFECT THIS CHANGE, PURSUANT TO AUTHORITY GRANTED UNDER SECTION 84.02 (3) AND 84.09, WISCONSIN STATUTES, THE WINNEBAGO COUNTY HIGHWAY DEPARTMENT HEREBY ORDERS THAT:  
 1. THAT PORTION OF SAID HIGHWAY AS SHOWN ON THIS PLAT IS LAID OUT AND ESTABLISHED TO THE LINES AND WIDTHS AS SO SHOWN FOR THE ABOVE PROJECT.  
 2. THE LANDS OR INTERESTS OR RIGHTS IN LANDS AS SHOWN ON THIS PLAT ARE REQUIRED BY THE DEPARTMENT FOR THE ABOVE PROJECT AND SHALL BE ACQUIRED IN THE NAME OF THE STATE OF WISCONSIN, PURSUANT TO THE PROVISIONS OF SECTION 84.09 (D) OR (2), WISCONSIN STATUTES.



**PARCEL 49**

COURSE TABLE		
COURSE	DISTANCE	BEARING
213-446	1321.86'	S 1°18'31" E
446-2042	50.01'	N 89°34'05" E
2042-4076	542.49'	N 1°18'31" W
4076-4075	100.12'	N 1°33'14" E
4075-4200	568.27'	N 1°18'31" W
4200-4201	72.82'	N 39°44'59" E
4201-4202	150.00'	N 89°46'21" E
4202-4203	54.63'	N 66°01'23" E
4203-4204	33.00'	N 0°13'39" W
4204-213	303.89'	S 89°46'21" W

COORDINATES		
POINT NUMBER	Y	X
446	506179.800	781048.357
2042	506180.177	781098.361
4076	506722.531	781085.973
4075	506822.619	781088.688
4200	507390.744	781075.711
4201	507446.732	781122.275
4202	507447.327	781272.274
4203	507469.526	781322.186
4204	507502.525	781322.055



**EXISTING MONUMENTATION**

Y	X	DESCRIPTION
506177.695	781016.888	1" PIPE BENT
506893.332	780998.918	1" PIPE
506572.006	781006.272	1" PIPE
507392.588	781054.971	
507469.332	781135.454	
507470.680	781596.594	1" PIPE
507536.292	781510.315	1" PIPE
507535.067	781253.673	3/4" REBAR
507534.234	781051.698	1" PIPE
507465.079	780852.732	1" PIPE
507467.721	780985.921	1" PIPE
507751.516	781047.980	1" PIPE
508101.571	781043.475	1" PIPE
508120.929	780977.397	1" PIPE
508820.036	781034.411	1" PIPE
508320.916	780974.790	.75" PIN

**NOTES:**

COORDINATES AND BEARINGS SHOWN ON THIS PLAT ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM, WINNEBAGO COUNTY ZONE, NAD83 (1991) ADJUSTMENT. THE COORDINATES SHOWN ARE GRID COORDINATES AND ARE TO BE USED AS GRID OR GROUND VALUES ON THIS PLAT.

RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND WILL BE PLACED PRIOR TO THE COMPLETION OF THE PROJECT (7"x24" IRON PIPE-MIN. WT. 1.13 LBS/LIN. FT. WITH PLASTIC CAP STAMPED "AYRES").

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

PROPERTY LINES SHOWN ON THIS PLAT ARE DRAWN FROM DATA DERIVED FROM MAPS AND DOCUMENTS OF PUBLIC RECORD AND/OR EXISTING OCCUPATIONAL LINES. THIS PLAT MAY NOT BE A TRUE REPRESENTATION OF EXISTING PROPERTY LINES, EXCLUDING RIGHT-OF-WAY LINES, AND SHOULD NOT BE USED AS A SUBSTITUTE FOR AN ACCURATE FIELD SURVEY.

EXISTING HIGHWAY RIGHT-OF-WAY SHOWN HEREIN IS BASED ON THE FOLLOWING POINTS OF REFERENCE: EXISTING HIGHWAY RIGHT-OF-WAY FOR CTH T ESTABLISHED FROM EVIDENCE IN TOWN RECORDS, WISCONSIN STATE STATUTE 82.31, CERTIFIED SURVEY MAP NUMBER 4754, AND HIGHWAY DEEDS FOUND AT THE REGISTER OF DEEDS IN VOLUME 409, EASEMENTS AND HIGHWAY DEEDS, PAGES 379, 386. EXISTING HIGHWAY RIGHT-OF-WAY FOR CTH GG ESTABLISHED FROM HIGHWAY EASEMENT VOLUME 125L, PAGE 76 AND WISCONSIN STATE STATUTE 82.31.

A TEMPORARY LIMITED EASEMENT (TLE) IS A RIGHT FOR CONSTRUCTION PURPOSES, AS DEFINED HEREIN, INCLUDING THE RIGHT TO OPERATE NECESSARY EQUIPMENT THEREON AND 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 NECESSARY OR DESIRABLE. ALL TLEs ARE TO TERMINATE ON 1/01/2015 OR THE DATE THE CONSTRUCTION OF THE PROJECT IS COMPLETED, WHICHEVER OCCURS FIRST.

<p><b>CONVENTIONAL ABBREVIATIONS</b></p> <p>ACCESS POINT AP REFERENCE LINE R/L</p> <p>ACCESS RIGHTS AR REMAINING REM.</p> <p>ACRES AC. RIGHT-OF-WAY R/W</p> <p>AND OTHERS ET.AL. SECTION SEC.</p> <p>CENTERLINE C/L STATION STA.</p> <p>CERTIFIED SURVEY MAP CSM TEMPORARY LIMITED EASEMENT TLE</p> <p>CORNER COR. VOLUME V.</p> <p>CONVEYANCE OF RIGHTS OR</p> <p>DOCUMENT DOC.</p> <p>EASEMENT EASE.</p> <p>LAND CONTRACT LC LONG CHORD BEARING LCH</p> <p>MONUMENT MON. RADIUS LCB</p> <p>PAGE P. DEGREE OF CURVE D</p> <p>PERMANENT LIMITED EASEMENT PLE CENTRAL ANGLE OR DELTA DELTA</p> <p>PROPERTY LINE PL LENGTH OF CURVE L</p> <p>RECORDED AS (100') TANGENT TAN</p>	<p><b>CONVENTIONAL SYMBOLS</b></p> <p>FOUND IRON PIPE/PIN</p> <p>PROPOSED R/W LINE</p> <p>EXISTING H.E. LINE</p> <p>PROPERTY LINE</p> <p>LOT &amp; TIE LINES</p> <p>SLOPE INTERCEPTS</p> <p>CORPORATE LIMITS</p> <p>NO ACCESS (BY PREVIOUS ACQUISITION/CONTROL)</p> <p>NO ACCESS (BY ACQUISITION)</p> <p>NO ACCESS (BY STATUTORY AUTHORITY)</p> <p>SECTION LINE</p> <p>QUARTER LINE</p> <p>SIXTEENTH LINE</p> <p>EXISTING CENTERLINE</p> <p>PROPOSED REFERENCE LINE</p> <p>PARALLEL OFFSET</p>	<p><b>CONVENTIONAL UTILITY SYMBOLS</b></p> <p>WATER W</p> <p>GAS G</p> <p>TELEPHONE T</p> <p>OVERHEAD OH</p> <p>TRANSMISSION LINES</p> <p>ELECTRIC E</p> <p>CABLE TELEVISION TV</p> <p>FIBER OPTIC FO</p> <p>SANITARY SEWER SAN</p> <p>STORM SEWER SS</p> <p>NON COMPENSABLE COMPENSABLE</p> <p>POWER POLE</p> <p>TELEPHONE POLE</p> <p>TELEPHONE PEDESTAL</p> <p>ELECTRIC TOWER</p>
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**AYRES ASSOCIATES**

RESERVED FOR REGISTER OF DEEDS PROJECT NUMBER 488 - 4.09 AMENDMENT NO: 1

I, RYAN M. BELTRAND, REGISTERED LAND SURVEYOR, HEREBY CERTIFY THAT IN FULL COMPLIANCE WITH THE PROVISIONS OF SECTION 84.095 OF THE WISCONSIN STATUTES AND UNDER THE DIRECTION OF WINNEBAGO COUNTY, I HAVE SURVEYED TRANSPORTATION PROJECT PLAT 488 - 4.09 AND THAT SUCH PLAT CORRECTLY REPRESENTS ALL EXTERIOR BOUNDARIES OF THE SURVEYED LAND.

ACCEPTED FOR RECORDING AND FILING IN THE OFFICE OF THE REGISTER OF DEEDS IN WINNEBAGO COUNTY, WISCONSIN AT ... M ON ... AS DOCUMENT ... AND FILED IN ...

RYAN M. BELTRAND, RLS 5-2825 DATE ...

SIGNATURE OF REGISTER OF DEEDS

THIS PLAT IS APPROVED FOR WINNEBAGO COUNTY.

COMMISSIONER DATE ...

**SCHEDULE OF LANDS & INTERESTS REQUIRED**

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

PARCEL NUMBER	OWNER (S)	INTEREST REQUIRED	R/W ACRES		
			NEW	EXISTING	TOTAL
50	DONALD W. BARTLETT	FEE	0.46	LO1	L47
72	JAMES D. & JUDITH SUE HACKER	FEE	0.09	0.23	0.32
73	KEVIN D. AND JULIE L. LAUX	FEE	0.14	0.27	0.41
74	PHILIP E. & MARY J. HERGERT	FEE	0.28	0.54	0.82
75	RICKEY L. & TAMIE S. NIEMUTH	FEE	0.05	0.15	0.20
105	AT&T WISCONSIN	RELEASE	----	----	----

**TRANSPORTATION PROJECT PLAT NO: 488-4.10 AMENDMENT NO: 1**

AMENDS PARCEL 100 OF THE TRANSPORTATION PROJECT PLAT 488-4.10 RECORDED AS DOCUMENT NO: 1547298 AND FILED IN FILE 1 OF TPP, PAGE 122.

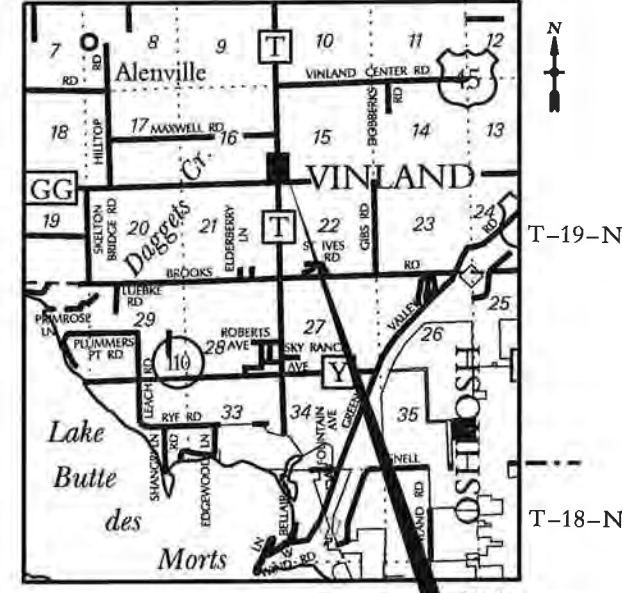
THAT PART OF THE SOUTHEAST 1/4 OF THE SOUTHEAST 1/4, SECTION 16 AND THE SOUTHWEST 1/4 OF THE SOUTHWEST 1/4, SECTION 15, TOWNSHIP 19 NORTH, RANGE 16 EAST, LOCATED IN THE TOWN OF VINLAND, WINNEBAGO COUNTY, WISCONSIN

RELOCATION ORDER CTH T WINNEBAGO COUNTY

TO PROPERLY ESTABLISH, LAY OUT, WIDEN, ENLARGE, EXTEND, CONSTRUCT, RECONSTRUCT, IMPROVE, OR MAINTAIN A PORTION OF THE HIGHWAY DESIGNATED ABOVE, THE STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION DEEMS IT NECESSARY TO RELOCATE OR CHANGE SAID HIGHWAY AND ACQUIRE CERTAIN LANDS AND INTERESTS OR RIGHTS IN LANDS FOR THE ABOVE PROJECT.

TO EFFECT THIS CHANGE, PURSUANT TO AUTHORITY GRANTED UNDER SECTION 84.02 (3) AND 84.09, WISCONSIN STATUTES, THE WINNEBAGO COUNTY HIGHWAY DEPARTMENT HEREBY ORDERS THAT:  
 1. THAT PORTION OF SAID HIGHWAY AS SHOWN ON THIS PLAT IS LAY OUT AND ESTABLISHED TO THE LINES AND WIDTHS AS SO SHOWN FOR THE ABOVE PROJECT.  
 2. THE LANDS OR INTERESTS OR RIGHTS IN LANDS AS SHOWN ON THIS PLAT ARE REQUIRED BY THE DEPARTMENT FOR THE ABOVE PROJECT AND SHALL BE ACQUIRED IN THE NAME OF THE STATE OF WISCONSIN, PURSUANT TO THE PROVISIONS OF SECTION 84.09 (1) OR (2), WISCONSIN STATUTES.

SE 1/4-SE 1/4, SEC. 16 AND SW 1/4-SW 1/4, SEC. 15  
 T19N, R16E, TOWN OF VINLAND  
 R-16-E



LOCATION SKETCH (NOT TO SCALE) PLAT LOCATION

**EXISTING MONUMENTATION**

COORDINATES		
Y	X	DESCRIPTION
506177.695	781016.888	1" PIPE BENT
506893.332	780998.918	1" PIPE
506572.006	781006.272	1" PIPE
507392.588	781054.971	
507469.332	781135.454	
507470.680	781596.594	1" PIPE
507536.292	781510.315	1" PIPE
507535.067	781253.673	3/8" REBAR
507534.234	781051.698	1" PIPE
507465.079	780852.732	1" PIPE
507467.721	780985.921	1" PIPE
507751.516	781047.980	1" PIPE
508101.571	781043.475	1" PIPE
508120.929	780977.397	1" PIPE
508820.036	781034.411	1" PIPE
508320.916	780974.790	.75" PIN

**PARCELS 50 & 75 COURSE TABLE**

COURSE	DISTANCE	BEARING
213-1362	1318.12'	N 00°43'24" W
1362-1378	45.00'	S 88°55'42" W
1378-1374	197.98'	S 00°43'24" E
1374-4067	100.12'	S 2°08'20" W
4067-4121	150.00'	S 0°43'24" E
4121-4120	50.85'	S 12°03'43" E
4120-4118	100.13'	S 0°43'24" E
4118-4119	50.99'	S 10°35'11" W
4119-4068	570.22'	S 08°43'24" E
4068-4124	85.15'	S 44°04'32" W
4124-4126	90.00'	S 88°52'28" W
4126-4129	50.49'	S 80°54'17" W
4129-4130	33.00'	S 1°07'32" E
4130-213	249.72'	N 88°52'28" E

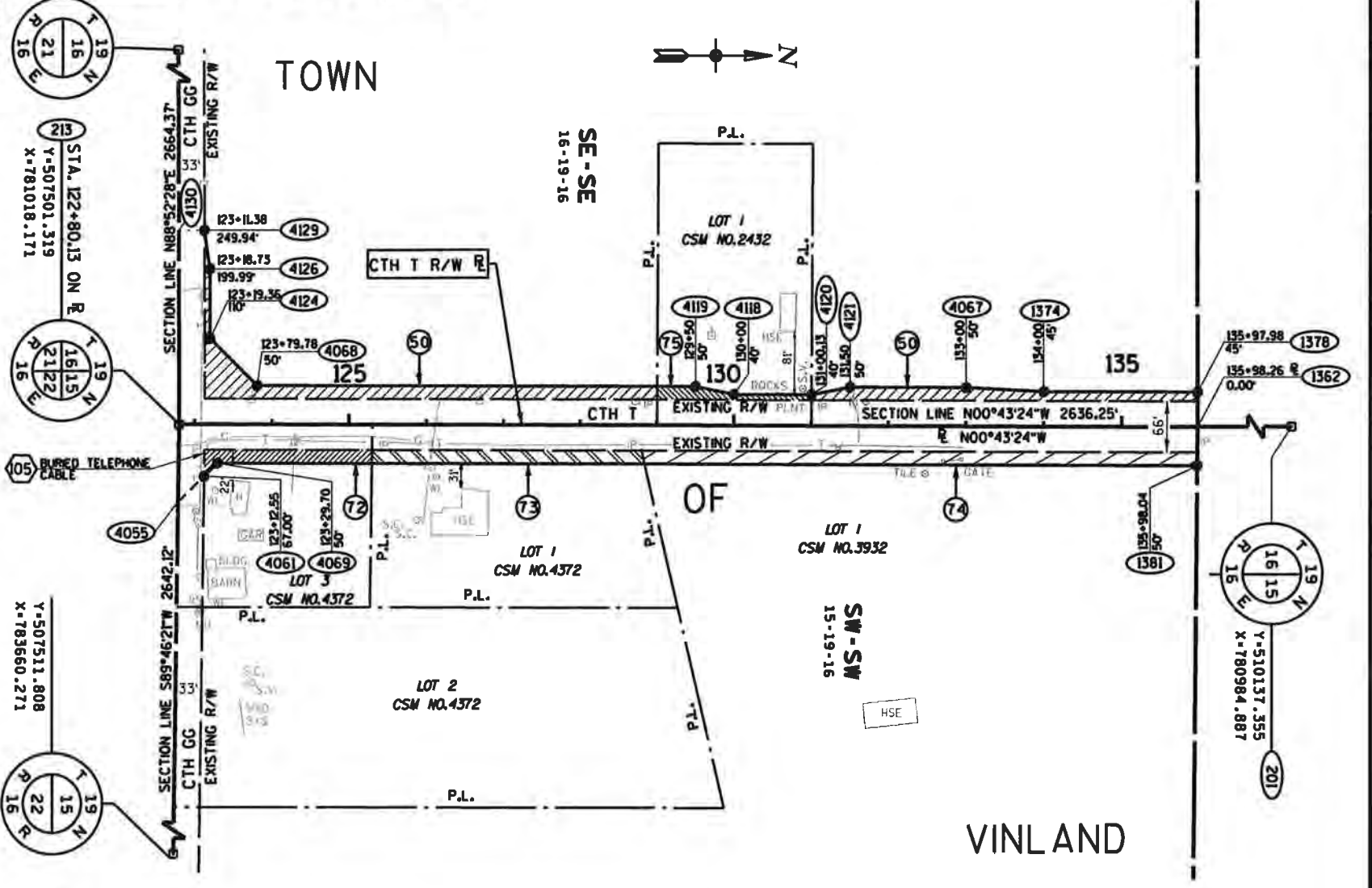
**PARCELS 50 & 75 COORDINATES**

POINT NUMBER	Y	X
213	507501.319	781018.171
1362	508819.337	781001.529
1378	508818.495	780956.536
1374	508620.528	780959.036
4067	508520.473	780955.299
4121	508370.485	780957.192
4120	508320.745	780967.821
4118	508220.623	780969.085
4119	508170.501	780959.718
4068	507600.327	780966.917
4124	507539.156	780907.688
4126	507537.388	780817.706
4129	507529.407	780767.853
4130	507496.413	780768.501

**PARCELS 72, 73, & 74 COURSE TABLE**

COURSE	DISTANCE	BEARING
213-1362	1318.12'	N 00°43'24" W
1362-1381	50.00'	N 89°31'26" E
1381-4069	1268.34'	S 00°43'24" E
4069-4061	24.14'	S 45°28'32" E
4061-4055	46.87'	S 45°28'32" E
4055-213	100.00'	S 89°46'21" W

COORDINATES		
POINT NUMBER	Y	X
1381	508819.752	781051.528
1362	508819.337	781001.529
4055	507501.716	781118.170
4061	507534.584	781084.753
4069	507551.512	781067.541



**NOTES:**  
 COORDINATES AND BEARINGS SHOWN ON THIS PLAT ARE REFERENCED TO THE WISCONSIN COUNTY COORDINATE SYSTEM, WINNEBAGO COUNTY ZONE, NAD83 (1997) ADJUSTMENT. THE COORDINATES SHOWN ARE GRID COORDINATES AND ARE TO BE USED AS GRID OR GROUND VALUES ON THIS PLAT. RIGHT-OF-WAY MONUMENTS ARE TYPE 2 AND WILL BE PLACED PRIOR TO THE COMPLETION OF THE PROJECT (1"x24" IRON PIPE-MIN. WT. 1.13 LBS/LIN. FT.).  
 RIGHT-OF-WAY BOUNDARIES ARE DEFINED WITH COURSES OF THE PERIMETER OF THE HIGHWAY LANDS REFERENCED TO THE U.S. PUBLIC LAND SURVEY OR OTHER SURVEYS OF RECORD.  
 PROPERTY LINES SHOWN ON THIS PLAT ARE DRAWN FROM DATA DERIVED FROM MAPS AND DOCUMENTS OF PUBLIC RECORD AND/OR EXISTING OCCUPATIONAL LINES. THIS PLAT MAY NOT BE A TRUE REPRESENTATION OF EXISTING PROPERTY LINES, EXCLUDING RIGHT-OF-WAY LINES, AND SHOULD NOT BE USED AS A SUBSTITUTE FOR AN ACCURATE FIELD SURVEY.  
 EXISTING HIGHWAY RIGHT-OF-WAY SHOWN HEREIN IS BASED ON THE FOLLOWING POINTS OF REFERENCE: EXISTING HIGHWAY RIGHT-OF-WAY FOR CTH T ESTABLISHED FROM EVIDENCE IN TOWN RECORDS, WISCONSIN STATE STATUTE 82.31, AND HIGHWAY DEEDS FOUND AT THE REGISTER OF DEEDS IN VOLUME 409, EASEMENTS AND HIGHWAY DEEDS, PAGES 379, 386.  
 EXISTING HIGHWAY RIGHT-OF-WAY FOR CTH GG ESTABLISHED FROM WISCONSIN STATE STATUTE 82.31.

CONVENTIONAL ABBREVIATIONS		CONVENTIONAL SYMBOLS		CONVENTIONAL UTILITY SYMBOLS	
ACCESS POINT	AP	REFERENCE LINE	R/L	FOUND IRON PIPE/PIN	—
ACCESS RIGHTS	AR	REMAINING	REM.		
ACRES	AC.	RIGHT-OF-WAY	R/W	R/W MONUMENT	—
AND OTHERS	ET. AL.	SECTION	SEC.	R/W STANDARD	—
CENTERLINE	C/L	STATION	STA.	SIGN	—
CERTIFIED SURVEY MAP	CSM	TEMPORARY LIMITED EASEMENT	TLE	SECTION CORNER MONUMENT	—
CORNER	COR.	VOLUME	V.	SECTION CORNER SYMBOL	—
CONVEYANCE OF RIGHTS	OR				
DOCUMENT	DOC.				
EASEMENT	EASE.	LONG CHORD	LCH	FEE (HATCH VARIES)	—
LAND CONTRACT	LC	LONG CHORD BEARING	LCB	TEMPORARY LIMITED EASEMENT	—
MONUMENT	MON.	RADIUS	R	PERMANENT LIMITED EASEMENT	—
PAGE	P.	DEGREE OF CURVE	D	R/W BOUNDARY POINT	—
PERMANENT LIMITED EASEMENT	PLE	CENTRAL ANGLE OR DELTA	DELTA	PARCEL NUMBER	—
PROPERTY LINE	PL	LENGTH OF CURVE	L	SIGN NUMBER (OFF PREMISE)	—
RECORDED AS	(100')	TANGENT	TAN	BUILDING	—



**AVRES ASSOCIATES**

RYAN M. BELTRAND, REGISTERED LAND SURVEYOR, HEREBY CERTIFY THAT IN FULL COMPLIANCE WITH THE PROVISIONS OF SECTION 84.095 OF THE WISCONSIN STATUTES AND UNDER THE DIRECTION OF WINNEBAGO COUNTY, I HAVE SURVEYED TRANSPORTATION PROJECT PLAT 488 - 4.10 AND THAT SUCH PLAT CORRECTLY REPRESENTS ALL EXTERIOR BOUNDARIES OF THE SURVEYED LAND.

RYAN M. BELTRAND, RLS 5-2825 DATE \_\_\_\_\_

THIS PLAT IS APPROVED FOR WINNEBAGO COUNTY. \_\_\_\_\_ DATE \_\_\_\_\_

COMMISSIONER

BENCH MARKS			
NO.	STA.	DESCRIPTION	ELEV.
1	9+43	6" NAIL IN PP*19634, 31' RT. @ HSE#4400	765.44
2	17+33	6" NAIL IN PP NW QUAD OF INT. CTH T & Y	778.04
3	20+49	6" NAIL IN PP*1916-27L11, 27' RT.	784.97
4	23+74	6" NAIL IN PP*1916-28R3, 30' LT.	787.08
5	29+26	6" NAIL IN PP*1916-28R5, 29' LT.	793.64
6	31+85	6" NAIL IN PP*27, 26' RT.	795.09
7	35+10	6" NAIL IN PP*1916-28R15NW QUAD ROBERTS	794.08
8	42+14	6" NAIL IN PP*1916-27L16 OPP HSE#4851	796.25

THOMAS R. AND AMY M. RUEGSEGER

ROBERT AND SHAWNA RUSSELL

DONALD D. SR AND ALICE M. FURMAN

KEIL G. AND ARLENE M. ERDMAN

FRED W. AND LINDA HERNANDEZ

SHARON N. SIMON

DEVIN S. AND KATHERINE A. STELZNER

LARRY D. AND LINDA A. CARPENTER

ROBERT G. AND DANA J. MILLER

STEVEN G. AND DEBRA J. DODD

BARBARA J. GILL

ELROY H. III AND JILLIAN M. RAHMLOW

MARK S. HAZELWOOD, SR. AND CAROL L. DAY

DONNA D. ALM

SAMUEL J. AND SHERRY L. TENBRINK

MARK G. AND SHARON L. WIETZ

GREYDON M. AND JACQUELYN M. KUHN

LOUIS J. AND ETHEL L. REICHENBERGER

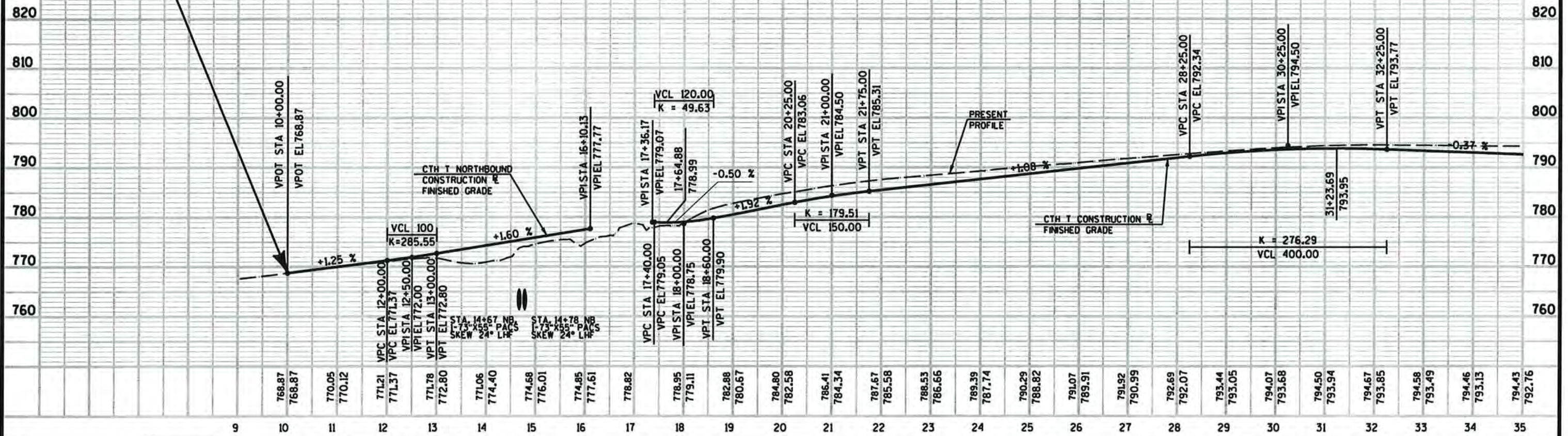
THOMAS L. AND MARIBETH GABERT

5

5

BEGIN PROJECT STA. 10+00.00

GRUNDY ENTERPRISES



BENCH MARKS			ELEV.
NO.	STA.	DESCRIPTION	
1	9+43	6" NAIL IN PP*19634.31' RT. @ HSE*4400	765.44
2	17+33	6" NAIL IN PP NW QUAD OF INT. CTH T & Y	778.04
3	20+49	6" NAIL IN PP*1916-27L11.27' RT.	784.97
4	23+74	6" NAIL IN PP*1916-28R3, 30' LT.	787.08
5	29+26	6" NAIL IN PP*1916-28R5, 29' LT.	793.64
6	31+85	6" NAIL IN PP*27, 26' RT.	795.09
7	35+10	6" NAIL IN PP*1916-28R15NW QUAD ROBERTS	794.08
8	42+14	6" NAIL IN PP*1916-27L16 OPP HSE*4851	796.25

THOMAS R. AND  
AMY M. RUEGSEGER

ROBERT AND  
SHAWNA RUSSELL

LARRY E. AND  
ELLEN J. NIEMUTH

DEVIN S. AND  
KATHERINE A. STELZNER

LARRY D. AND  
LINDA A. CARPENTER

DONALD D. SR AND  
ALICE M. FURMAN

KEIL G. AND  
ARLENE M. ERDMAN

FRED W. AND  
LINDA HERNANDEZ

ROBERT G. AND  
DANA J. MILLER

STEVEN G. AND  
DEBRA J. DODD

BARBARA  
J. GILL

ELROY H. III AND  
JILLIAN M. RAHMLOW

MARK S. HAZELWOOD, SR.  
AND CAROL L. DAY

DONNA  
D. ALM

SAMUEL J.  
AND SHERRY L.  
TENBRINK

MARK G. AND  
SHARON L.  
WIETZ

GREYDON  
M. AND  
JACQUELYN  
M. KUHN

LOUIS J.  
AND  
ETHEL L.  
REICHENBERGER

THOMAS L. AND  
MARIBETH GABERT

CTH T SOUTHBOUND  
CONSTRUCTION

CTH T NORTHBOUND  
CONSTRUCTION

BURIED GAS LINE  
(APPROXIMATE LOCATION)

BURIED TELEPHONE CABLE  
(APPROXIMATE LOCATION)

SAW CUT  
REQUIRED

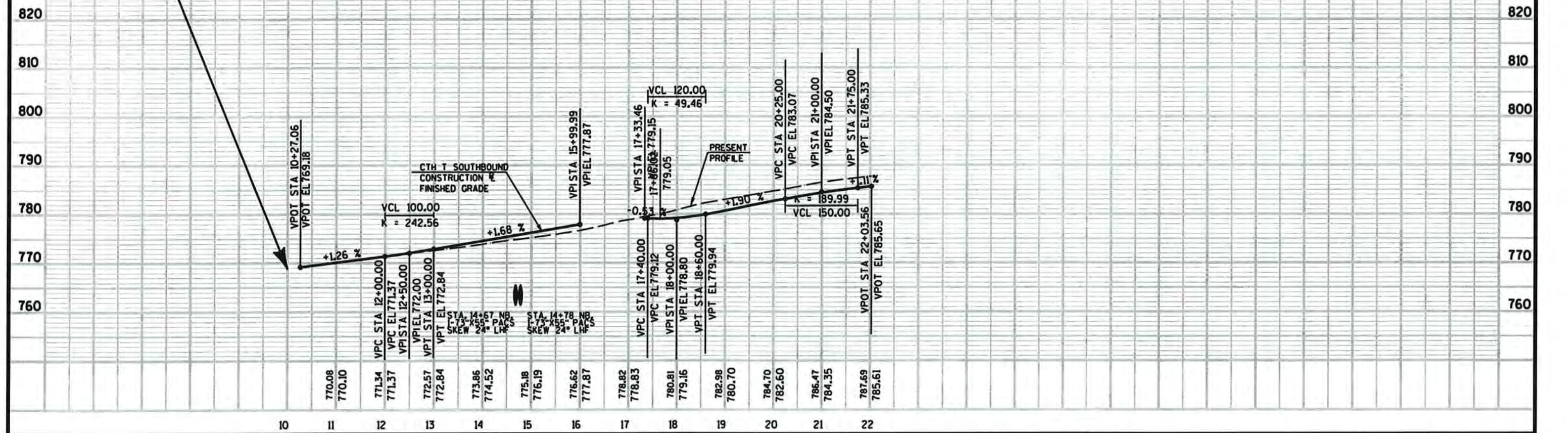
SAW CUT  
REQUIRED

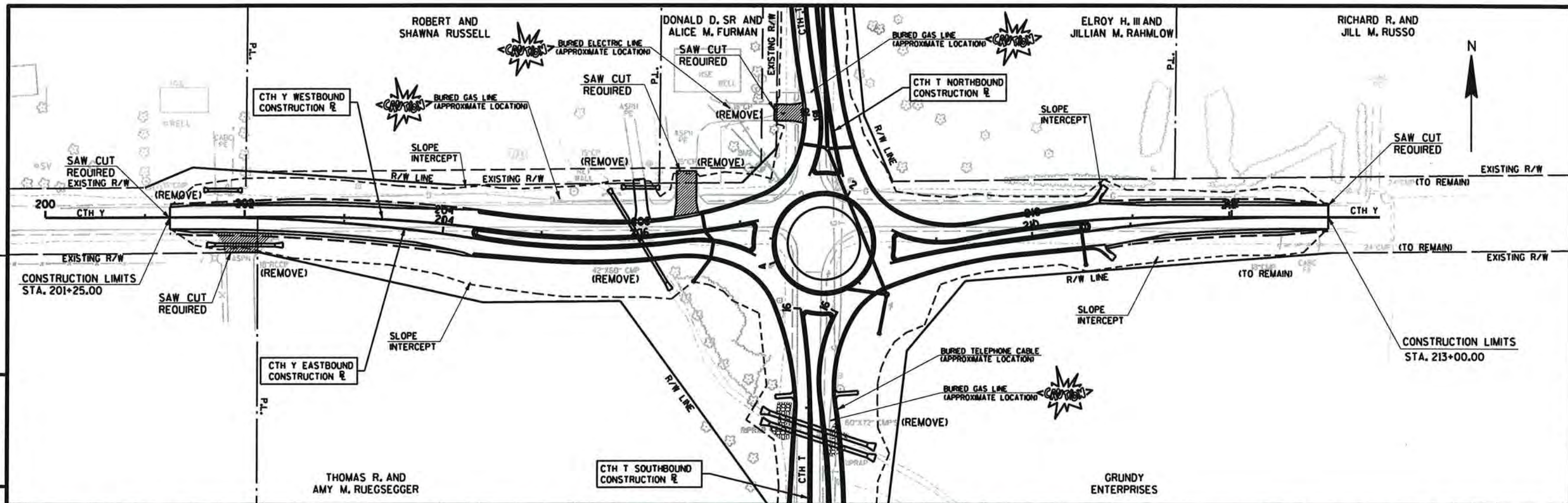
SAW CUT  
REQUIRED

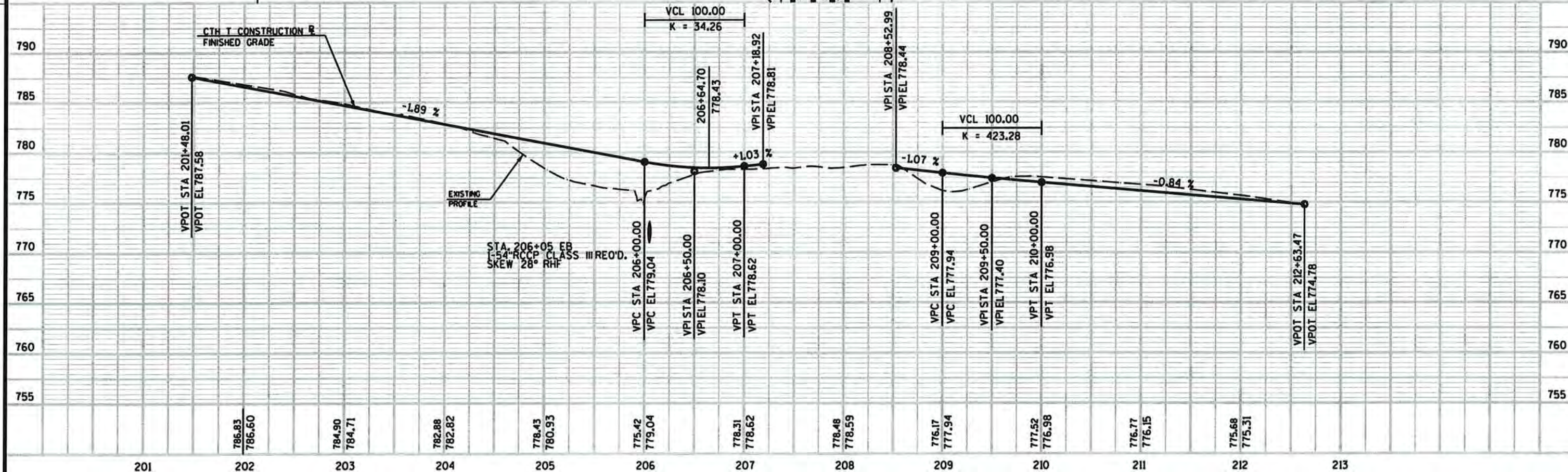
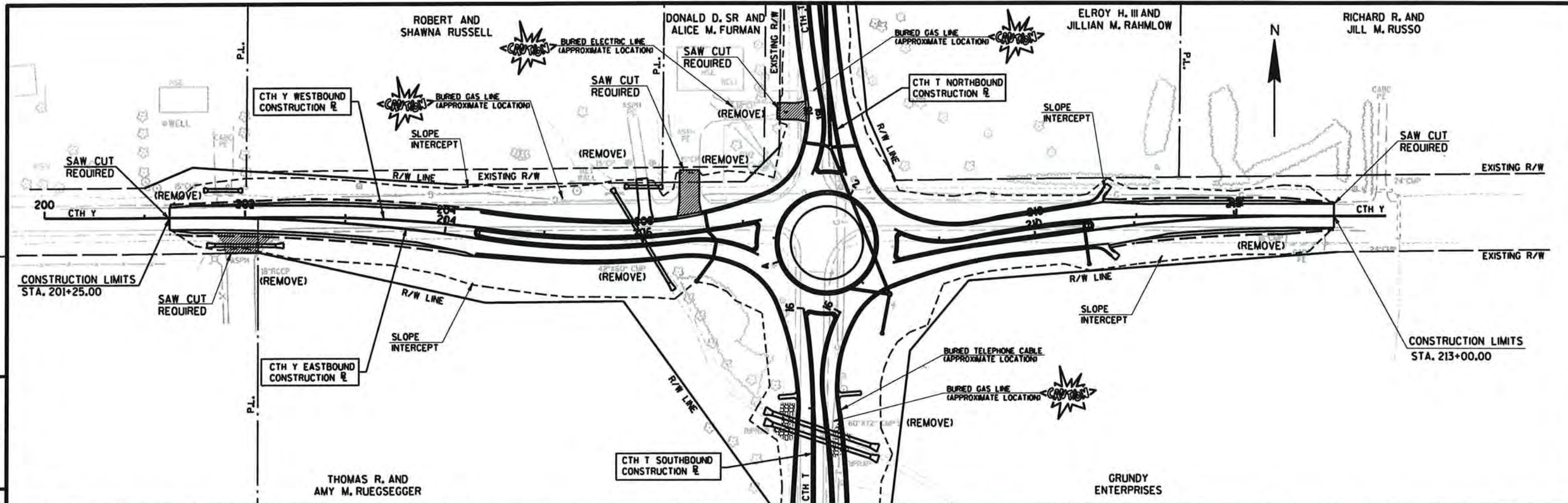
CTH T  
CONSTRUCTION

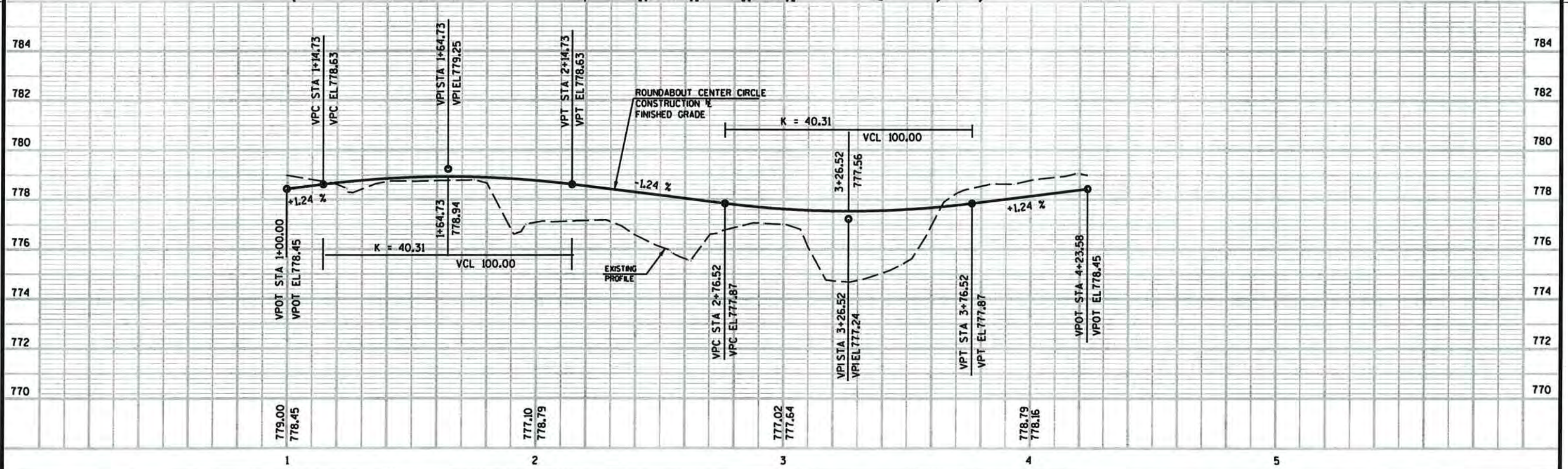
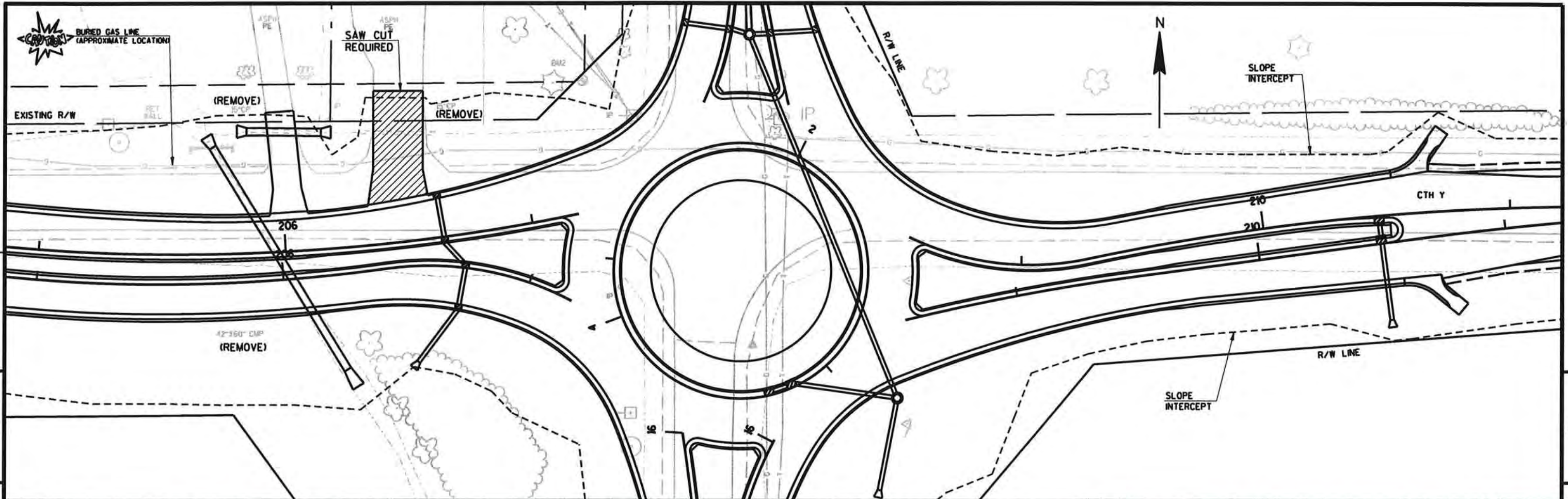
STA. 34+80.50 CTH T =  
STA. 360+00.00 ROBERTS AVE.  
CONCRETE CURB AND GUTTER  
30-INCH TYPE D REQUIRED

BEGIN PROJECT  
STA. 10+00.00

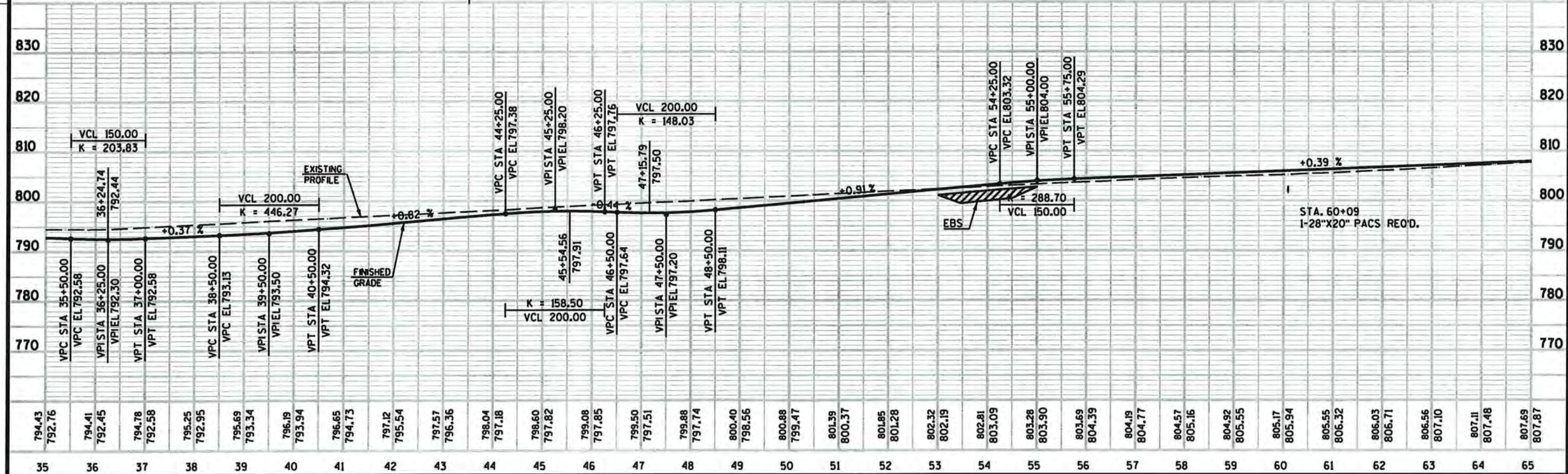
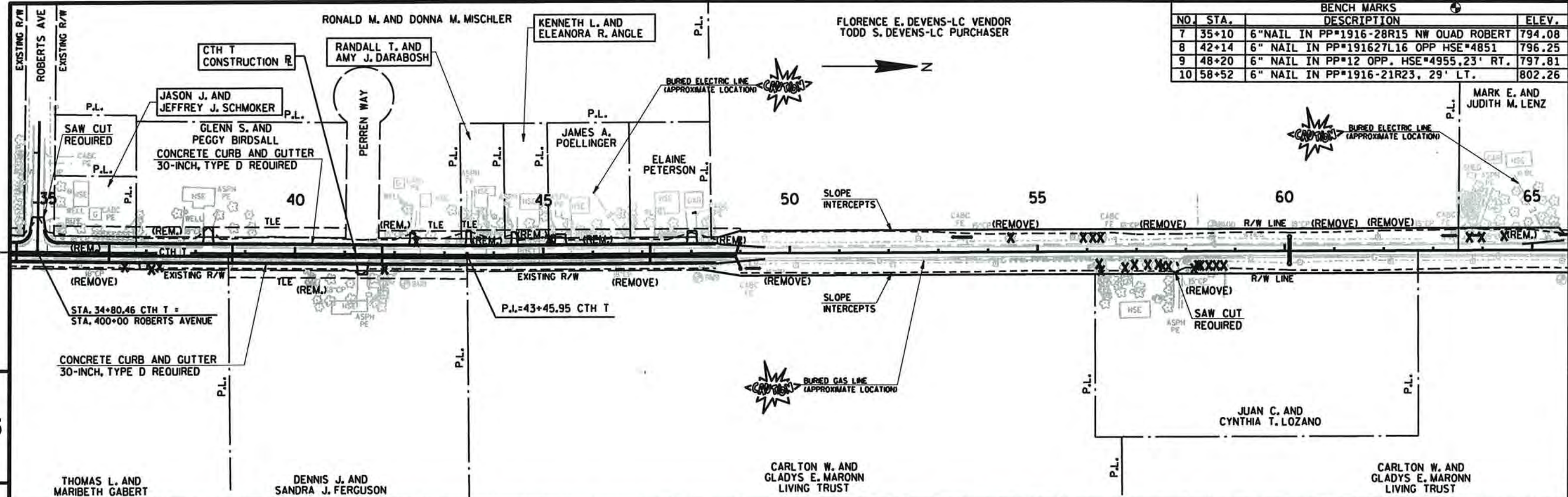






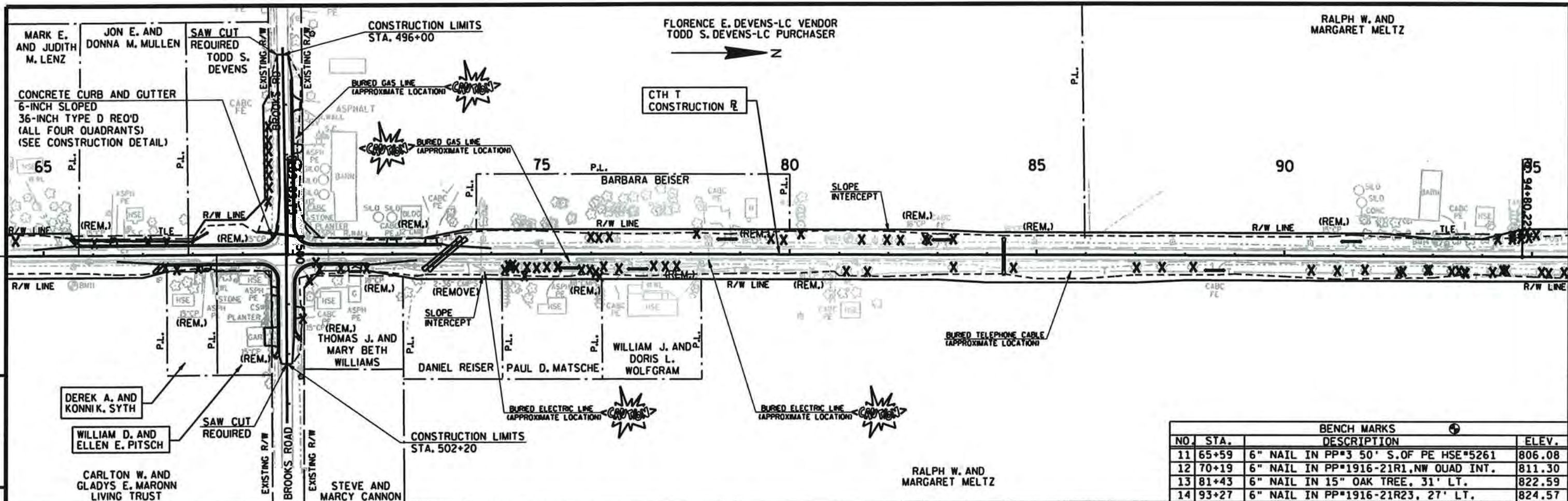


BENCH MARKS			
NO.	STA.	DESCRIPTION	ELEV.
7	35+10	6" NAIL IN PP*1916-28R15 NW QUAD ROBERT	794.08
8	42+14	6" NAIL IN PP*191627L16 OPP HSE*4851	796.25
9	48+20	6" NAIL IN PP*12 OPP. HSE*4955, 23' RT.	797.81
10	58+52	6" NAIL IN PP*1916-21R23, 29' LT.	802.26

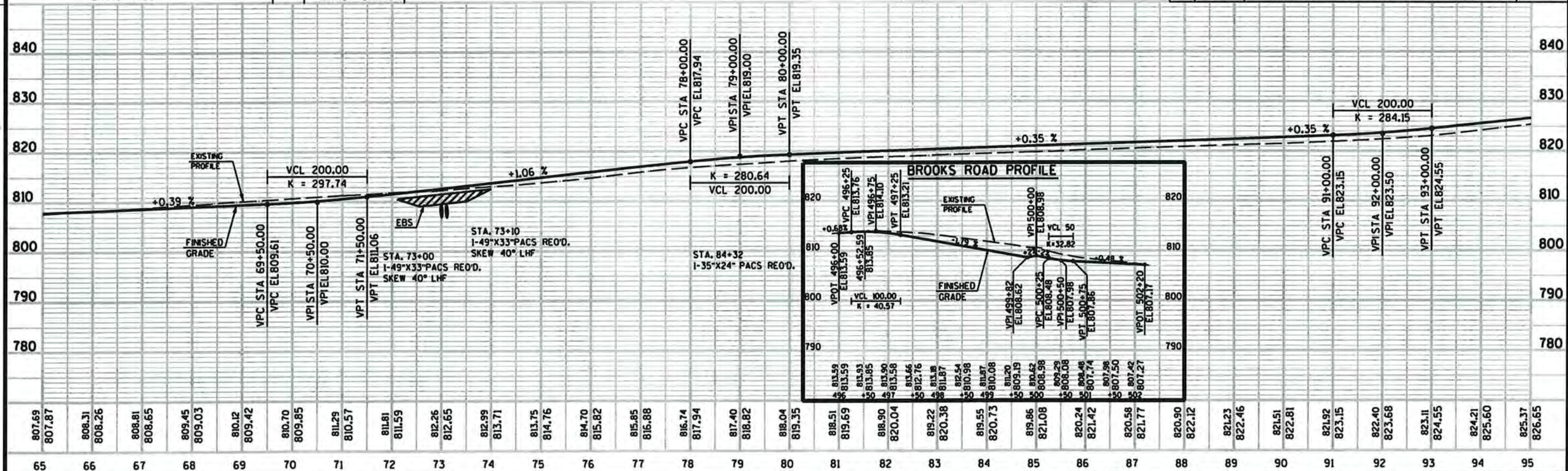


PROJECT NO: 41-0452.00      HWY: CTH T      COUNTY: WINNEBAGO      PLAN AND PROFILE      SHEET 86





BENCH MARKS			
NO.	STA.	DESCRIPTION	ELEV.
11	65+59	6" NAIL IN PP#3 50' S.OF PE HSE#5261	806.08
12	70+19	6" NAIL IN PP#1916-21R1, NW QUAD INT.	811.30
13	81+43	6" NAIL IN 15" OAK TREE, 31' LT.	822.59
14	93+27	6" NAIL IN PP#1916-21R23, 27' LT.	824.57

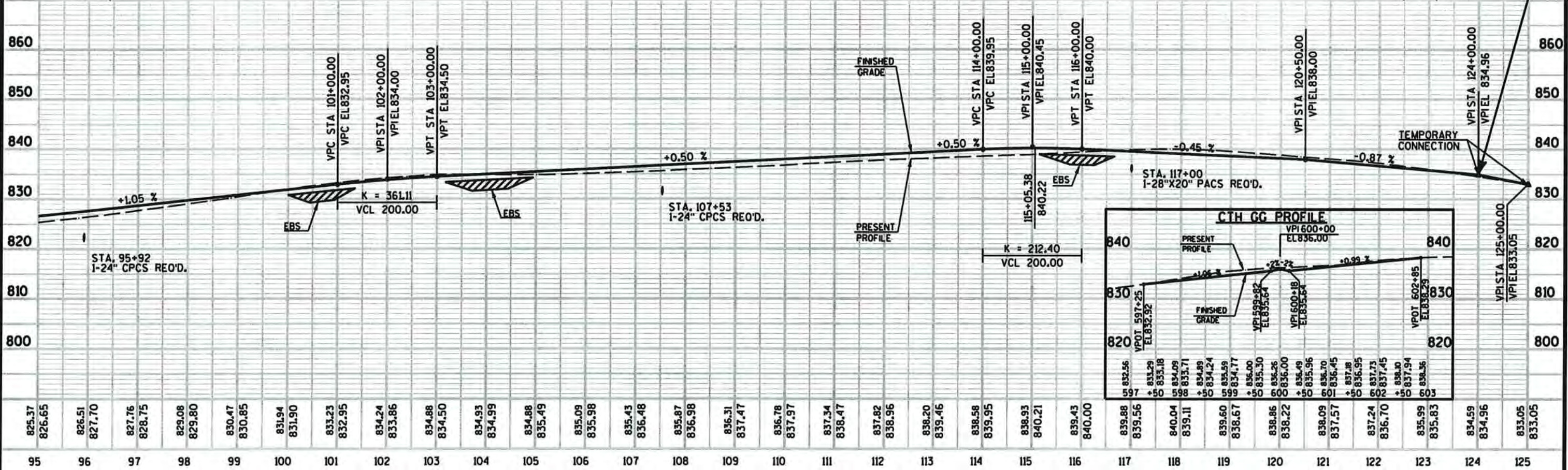
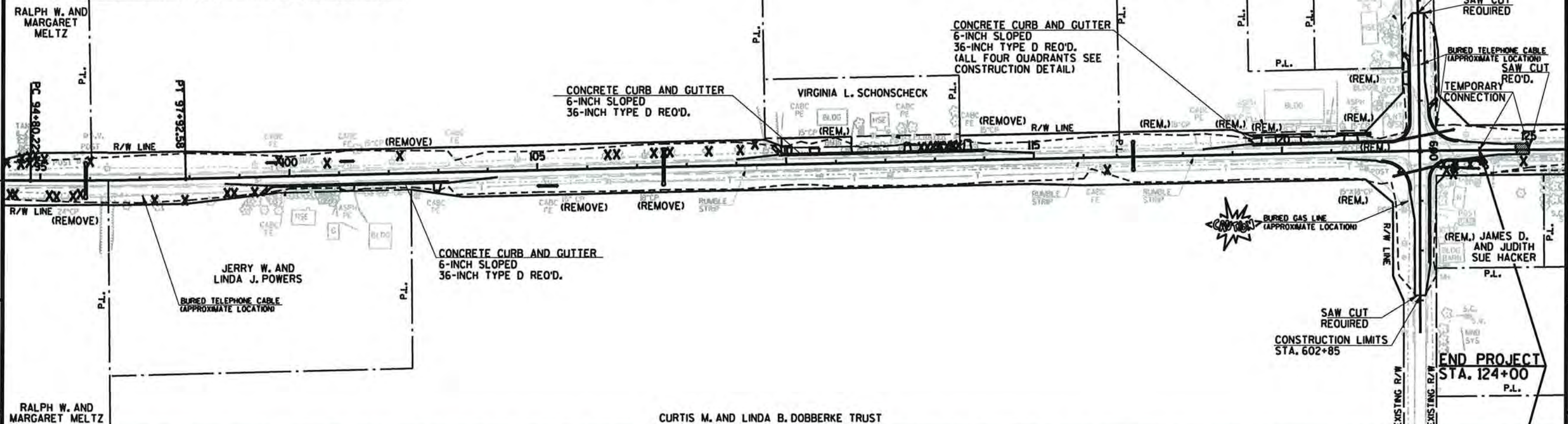


BENCH MARKS			
NO.	STA.	DESCRIPTION	ELEV.
15	99+78	6" 18" MAPLE TREE OPP HSE# 5434 33' LT	830.87
16	111+47	6" NAIL IN PP#1916-2124, 25' LT.	837.79
17	122+02	6" NAIL IN LPOL IN TOWN HALL LOT 109' LT	837.84

WILDE FARMS, INC.

FLORENCE E. DEVENS-LC VENDOR  
TODD S. DEVENS-LC PURCHASER

DONALD W. BARTLETT

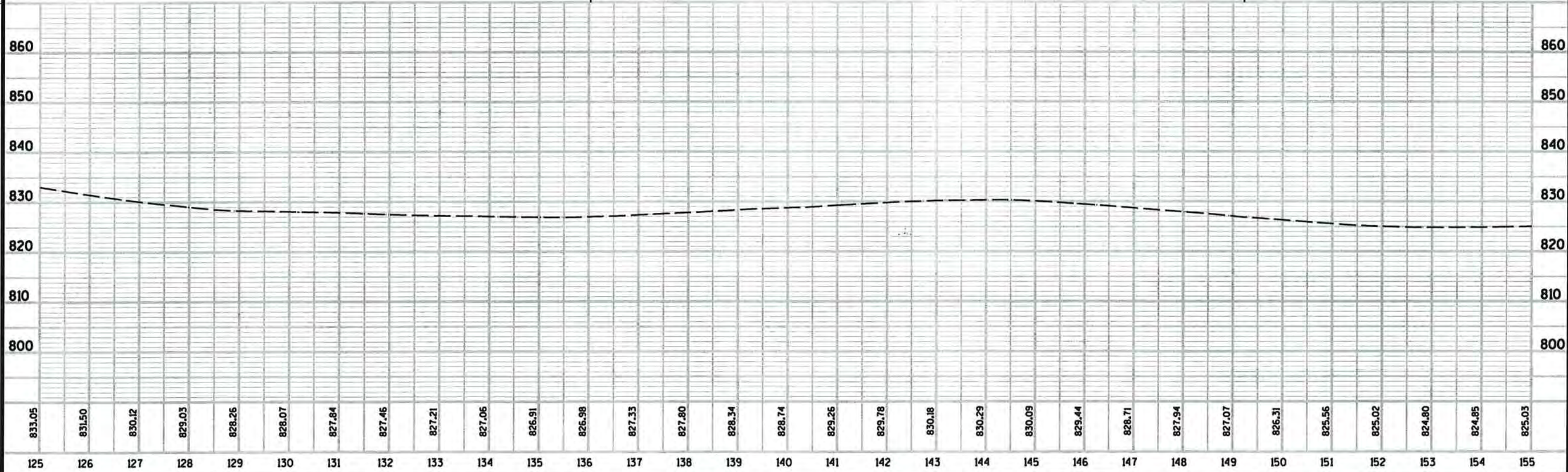
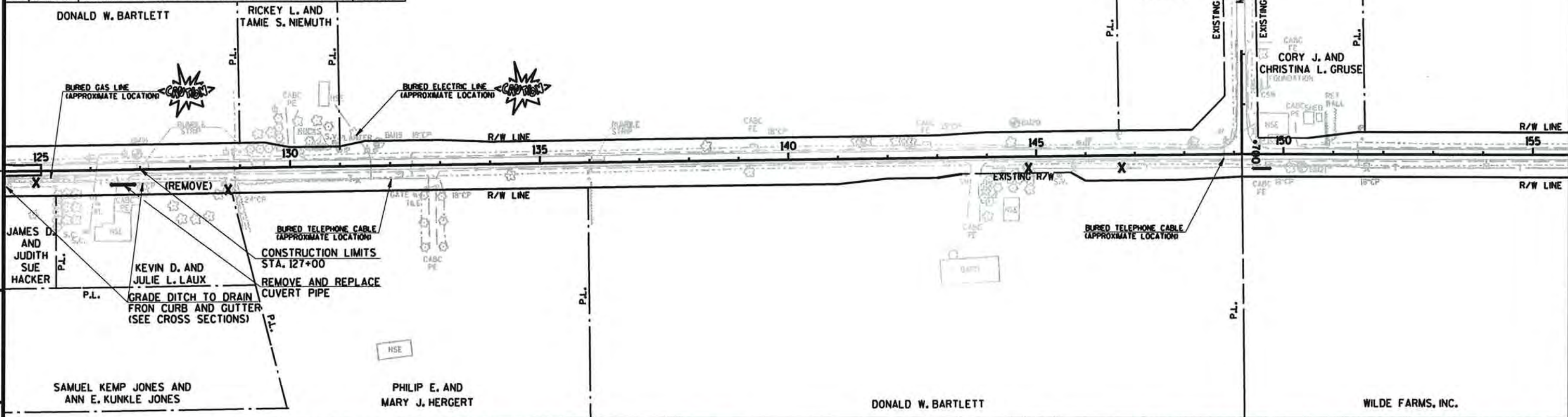


BENCH MARKS			
NO.	STA.	DESCRIPTION	ELEV.
18	126+68	6" NAIL IN PP*1916-16R16, OPP HSE #6128	829.18
19	131+54	6" NAIL IN PP*1619-16R10, OPP PE #6176	826.83
20	144+48	6" NAIL IN 18" MAPLE TREE, OPP PE #6264	832.06
21	150+12	6" NAIL 18" TREE OPP N.FACE TO HSE #6303	826.03

DONALD W. BARTLETT

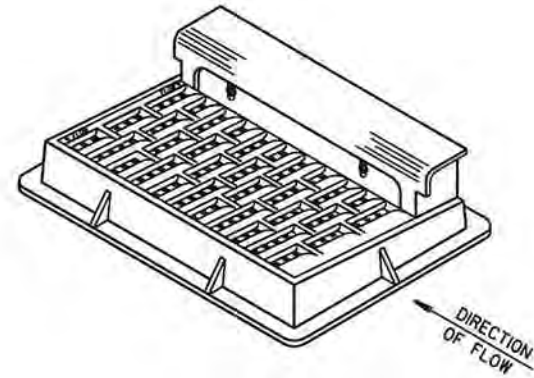
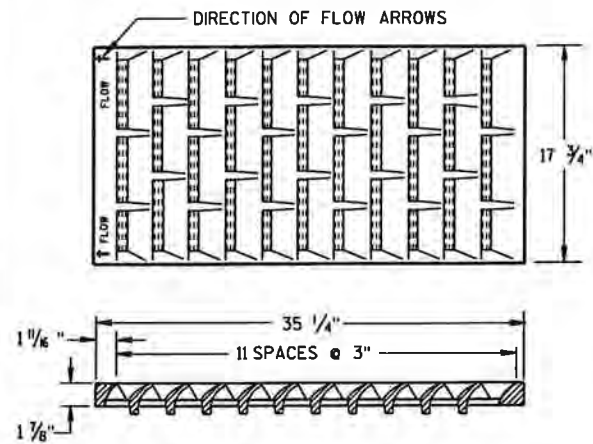


WILDE FARMS, INC.

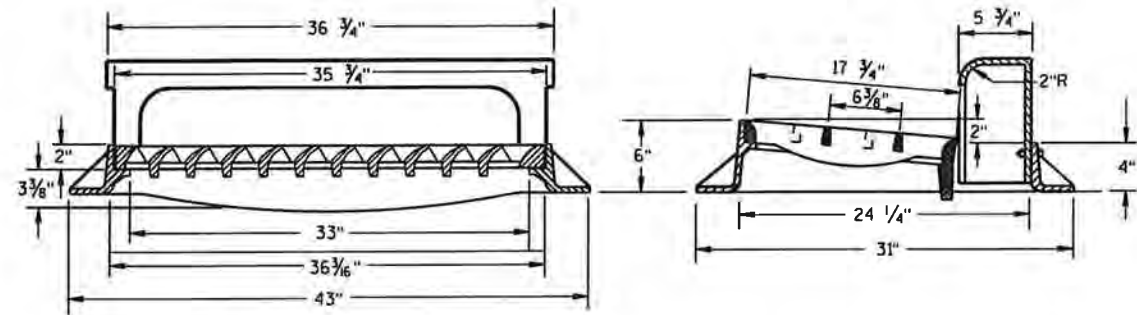


PROJECT NO: 41-0452.00      HWY: CTH T      COUNTY: WINNEBAGO      PLAN AND PROFILE      SHEET 89 E

NOTE:  
GRATE IS REVERSIBLE.



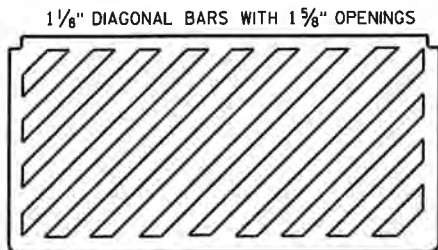
NOTE: CURB BOX HEIGHT ADJUSTABLE 6" TO 9"



**TYPE "H"**

(APPROXIMATE WEIGHT 422 LBS.)

- FRAME..... 175 LBS.
- GRATE..... 138 LBS.
- CURB BOX..... 109 LBS.



**SPECIAL GRATE FOR TYPE "H" COVER**

(MEASURES 35 1/4" X 17 3/4" X 2")  
(APPROXIMATE WEIGHT 172 LBS.)  
GRATE..... 172 LBS.

(NOTED AS TYPE H-S ON DRAINAGE TABLE)

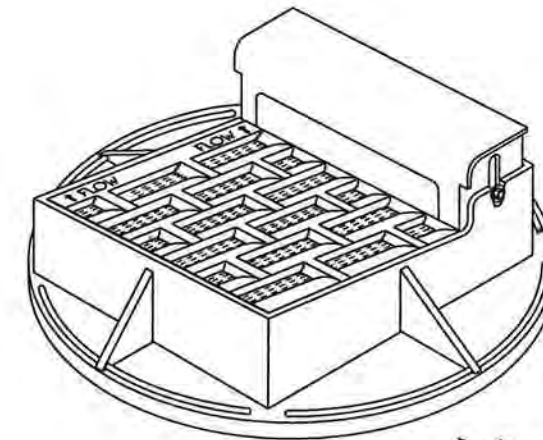
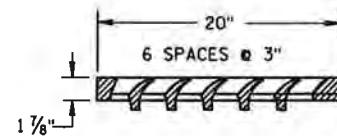
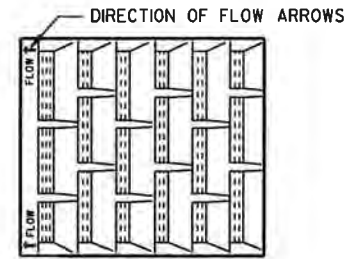
**GENERAL NOTES**

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

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

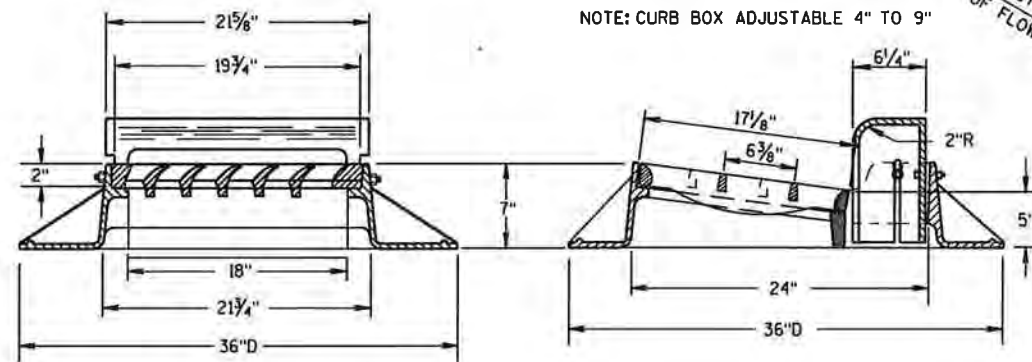
ROUND FRAMES AND COVERS SHALL HAVE CONTINUOUSLY MACHINED BEARING SURFACES TO PREVENT ROCKING AND RATTLING.

THE ACTUAL WEIGHT OF COVERS MAY VARY WITHIN 5 PERCENT, PLUS OR MINUS, OF THE APPROXIMATE WEIGHT.



NOTE:  
GRATE IS REVERSIBLE.

NOTE: CURB BOX ADJUSTABLE 4" TO 9"

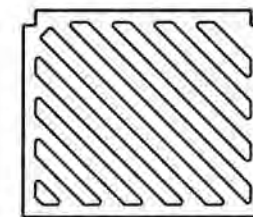


**TYPE "A"**

(APPROXIMATE WEIGHT 325 LBS.)

- FRAME..... 157 LBS.
- GRATE..... 84 LBS.
- CURB BOX..... 84 LBS.

1" DIAGONAL BARS WITH 1 1/2" OPENINGS



**SPECIAL GRATE FOR TYPE "A" COVER**

(MEASURES 19 3/4" X 17" X 1 7/8")

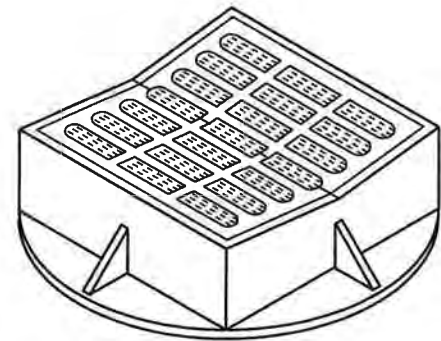
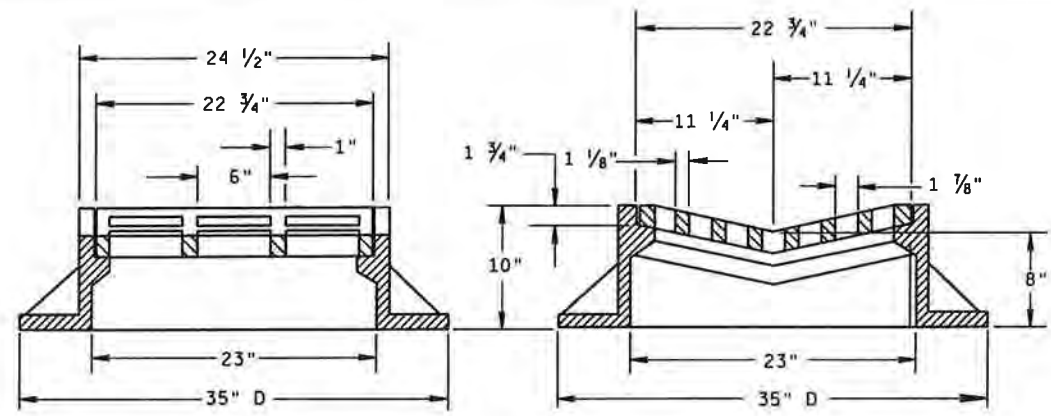
GRATE..... 84 LBS.

(NOTED AS TYPE A-S ON DRAINAGE TABLE)

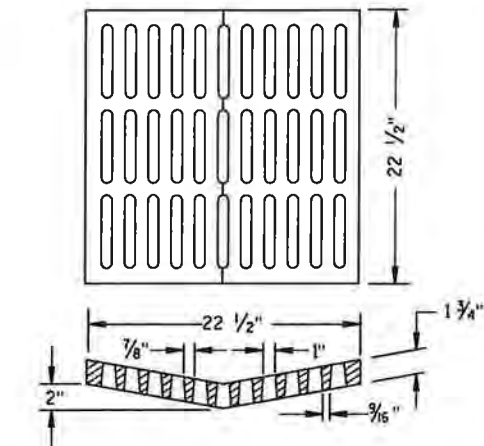
**INLET COVERS  
TYPE A, H, A-S, & H-S**

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED  
10/4/1999 /S/ Rory L. [Signature]  
DATE CHIEF ROADWAY DE 90 INEER  
FHWA

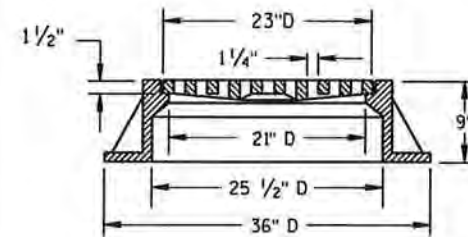


**TYPE "B"**  
(APPROXIMATE WEIGHT 395 LBS.)  
FRAME..... 285 LBS.  
GRATE..... 110 LBS.



**ALTERNATIVE GRATE FOR TYPE "B" COVER**

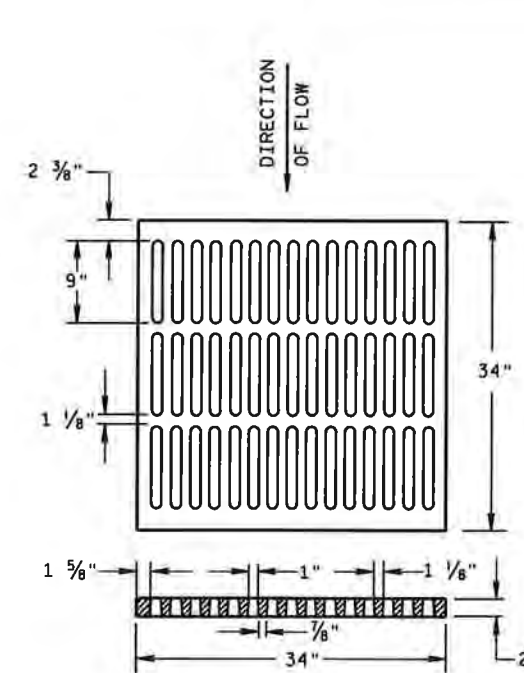
(APPROXIMATE GRATE WEIGHT 125 LBS.)  
GRATE.....125 LBS.  
USE WHERE PEDESTRIAN OR BICYCLE TRAFFIC IS POSSIBLE.  
**NOTED AS TYPE B-A ON THE DRAINAGE TABLE**



**TYPE "C"**  
(APPROXIMATE WEIGHT 340 LBS.)  
FRAME..... 235 LBS.  
GRATE..... 105 LBS.

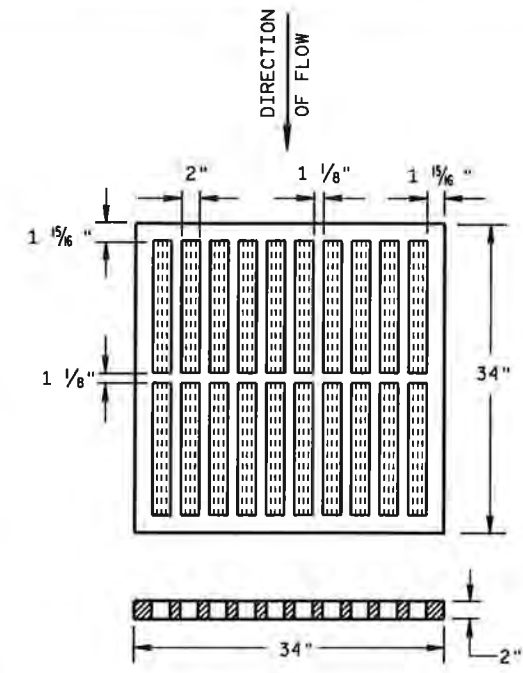
**GENERAL NOTES**

DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.  
DETAIL DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR CATCH BASIN, MANHOLE AND INLET COVERS SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PROVIDING THAT SUCH ALTERNATE DESIGNS MAKE PROVISION FOR EQUIVALENT CAPACITY AND STRENGTH.  
ROUND FRAMES AND COVERS SHALL HAVE CONTINUOUSLY MACHINED BEARING SURFACES TO PREVENT ROCKING AND RATTLING.  
THE ACTUAL WEIGHT OF COVERS MAY VARY WITHIN 5 PERCENT, PLUS OR MINUS, OF THE APPROXIMATE WEIGHT.



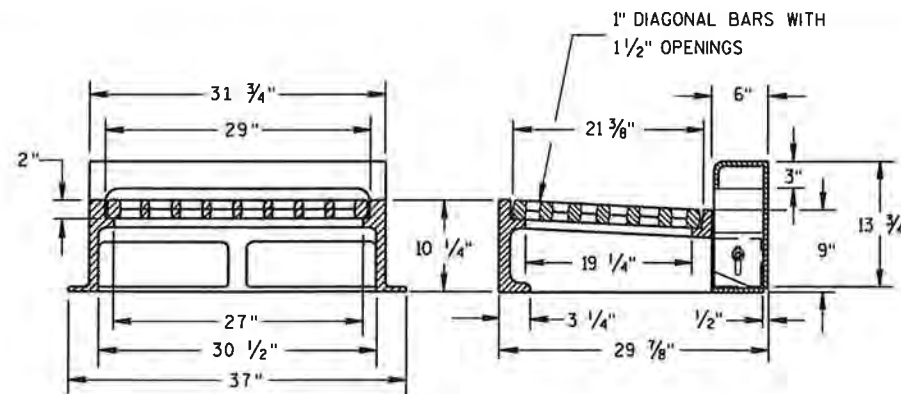
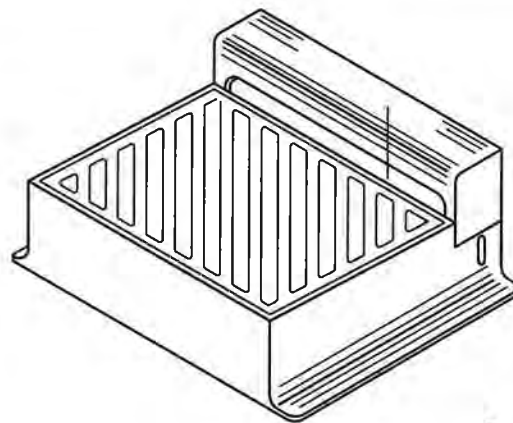
**ALTERNATIVE TYPE "MS"**  
(APPROXIMATE GRATE WEIGHT 365 LBS.)  
GRATE.....365 LBS.

USE WHERE PEDESTRIAN OR BICYCLE TRAFFIC IS PERMITTED  
**NOTED AS TYPE MS-A ON THE DRAINAGE TABLE**



**TYPE "MS"**  
(APPROXIMATE GRATE WEIGHT 270 LBS.)  
GRATE.....270 LBS.

USE ON FREEWAYS AND EXPRESSWAYS  
**NOTED AS TYPE MS ON DRAINAGE TABLE**



NOTE: CURB BOX HEIGHT ADJUSTABLE 6" TO 9"

**TYPE "WM"**  
(APPROXIMATE WEIGHT 670 LBS.)

FRAME..... 360 LBS.  
GRATE..... 160 LBS.  
CURB BOX..... 150 LBS.

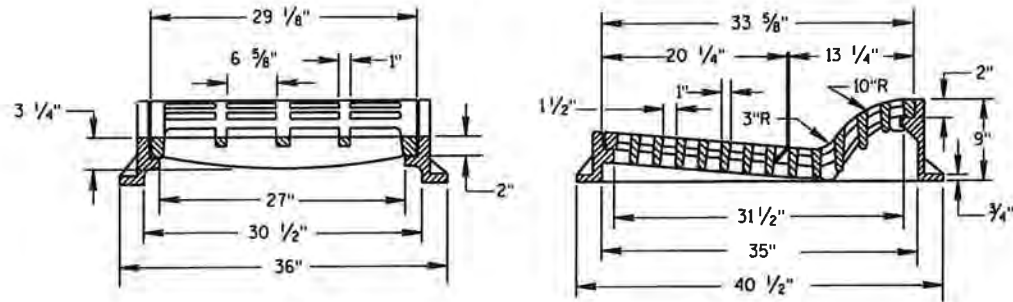
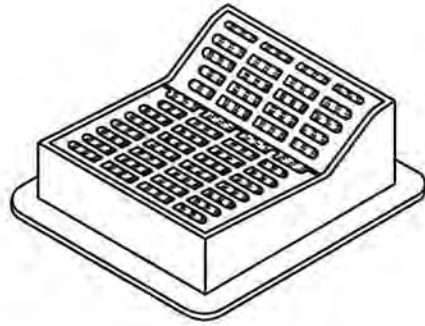
DIAGONAL SLOTS, SHALL BE ORIENTED TO THE DIRECTION OF FLOW AS ILLUSTRATED. GRATES ARE MANUFACTURED TO BE REVERSIBLE.

DIRECTION OF FLOW

**INLET COVERS**  
**TYPE B, B-A, C, MS, MS-A, & WM**

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED  
10/4/1999 /S/ Rory L. [Signature]  
DATE CHEIF ROADWAY DE 91 INEER  
FHWA



**TYPE "F"**

(APPROXIMATE WEIGHT 645 LBS.)

FRAME.....300 LBS.  
 GRATE.....165 LBS.  
 GRATE.....180 LBS.

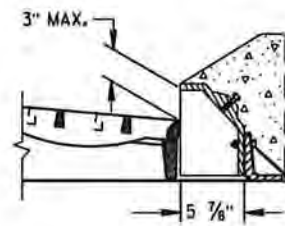
USE WITH TYPES A & D CONCRETE CURB & GUTTER, 36 INCH.

**GENERAL NOTES**

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

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

THE ACTUAL WEIGHT OF COVERS MAY VARY WITHIN 5 PERCENT, PLUS OR MINUS, OF THE APPROXIMATE WEIGHT.

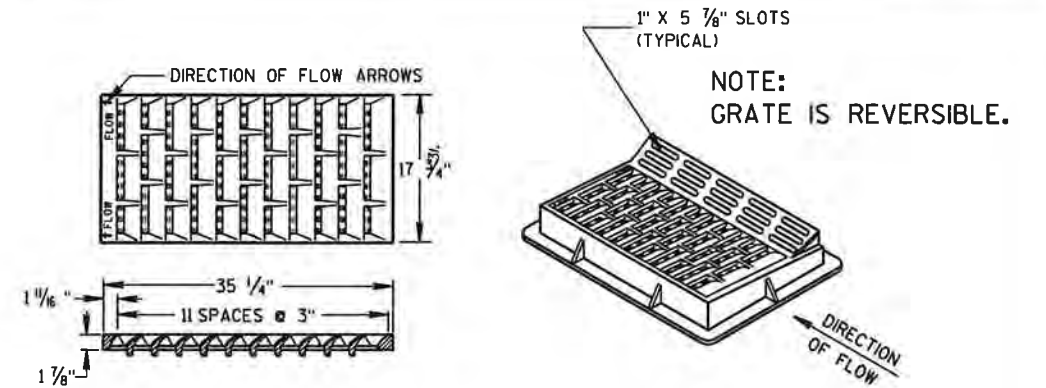


**ALTERNATIVE CURB BOX FOR TYPE "HM" COVER**

(APPROXIMATE WEIGHT 79 LBS.)

CURB BOX.....79 LBS.

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



**TYPE "HM"**

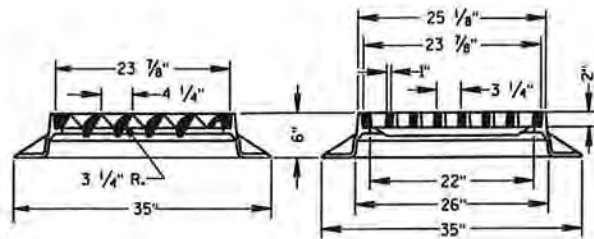
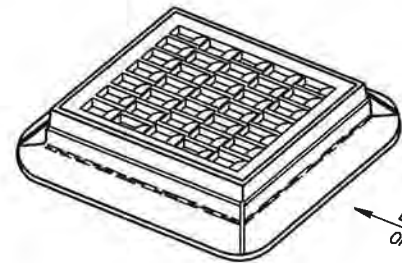
(APPROXIMATE WEIGHT 375 LBS.)

FRAME.....175 LBS.  
 GRATE.....138 LBS.  
 CURB BOX.....62 LBS.

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

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

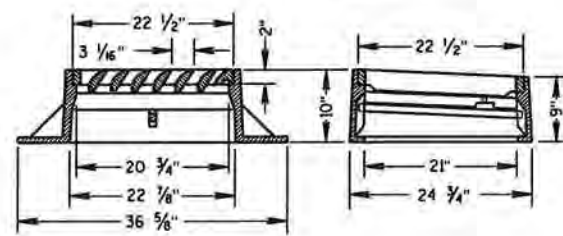
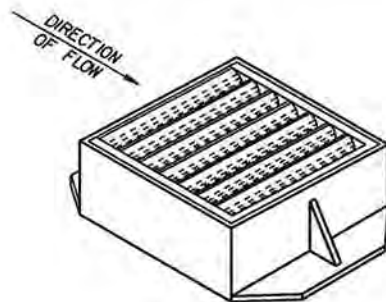
NOTE: SPECIAL GRATE FOR THE TYPE "H" COVER MAY ALSO BE USED FOR THE TYPE "HM-GJ" COVER NOTED AS TYPE HM-GJ-S ON DRAINAGE TABLE



**TYPE "S"**

(APPROXIMATE WEIGHT 334 LBS.)

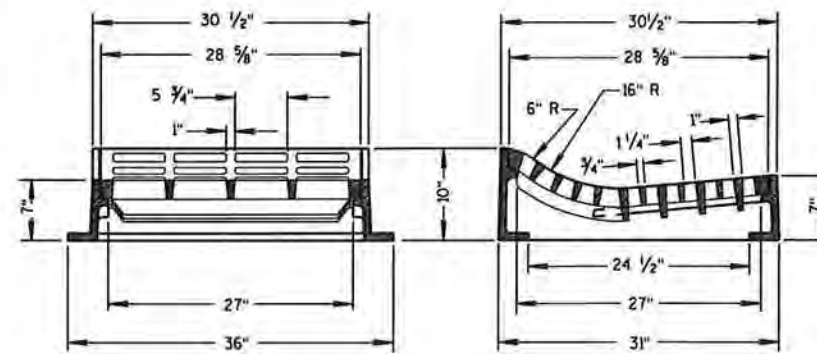
FRAME.....165 LBS.  
 GRATE.....169 LBS.



**TYPE "V"**

(APPROXIMATE WEIGHT 405 LBS.)

FRAME.....270 LBS.  
 GRATE.....130 LBS.  
 SAFETY BAR.....5 LBS.

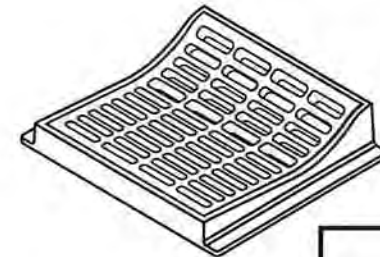


**TYPE "T"**

(APPROXIMATE WEIGHT 530 LBS.)

FRAME.....270 LBS.  
 GRATE.....260 LBS.

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



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

STATE OF WISCONSIN  
 DEPARTMENT OF TRANSPORTATION

APPROVED  
 1/7/08 DATE /s/ Jerry H. Zook ROADWAY STANDARDS DIVISION ENT  
 FHWA ENCL.

**GENERAL NOTES**

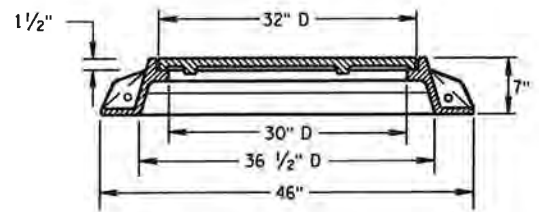
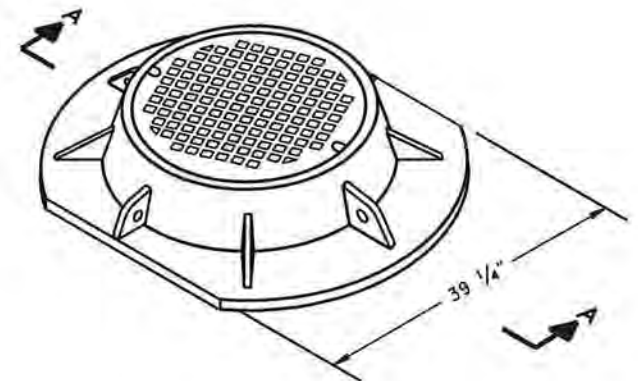
DETAILS OF CONSTRUCTION, MATERIALS AND WORKMANSHIP NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

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

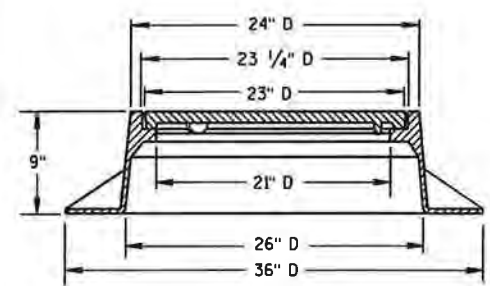
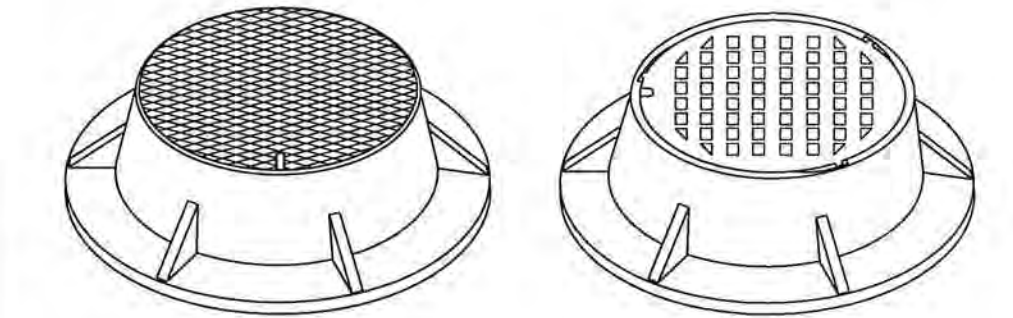
ROUND FRAMES AND COVERS SHALL HAVE CONTINUOUSLY MACHINED BEARING SURFACES TO PREVENT ROCKING AND RATTLING.

THE ACTUAL WEIGHT OF COVERS MAY VARY WITHIN 5 PERCENT, PLUS OR MINUS, OF THE APPROXIMATE WEIGHT.

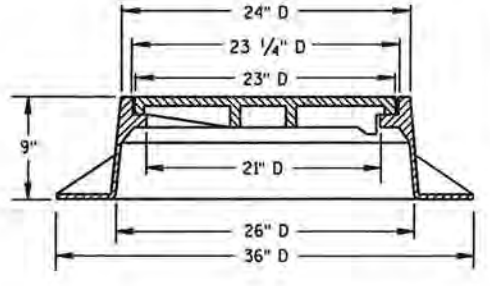
① MANUFACTURER MAY PROVIDE ADDITIONAL SEALS OR GASKETS.



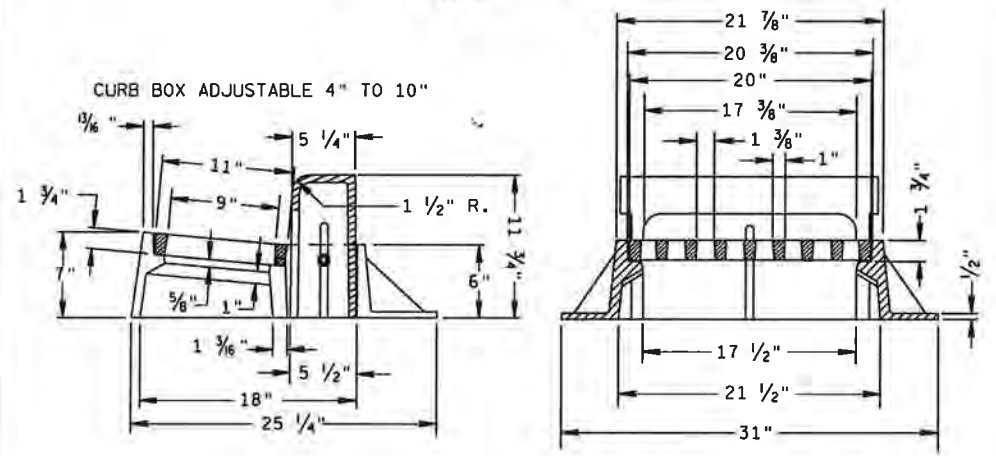
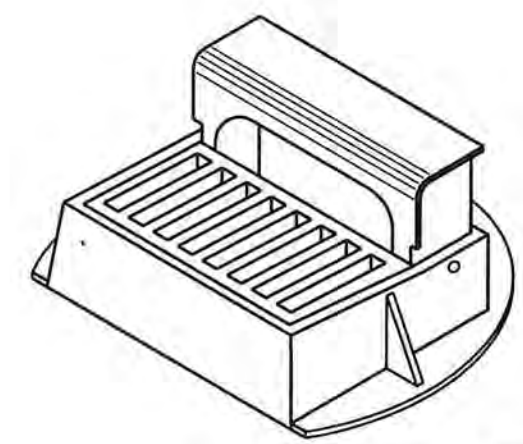
**SECTION A-A  
TYPE "K"**  
(APPROXIMATE WEIGHT 415 LBS.)  
FRAME.....210 LBS.  
LID.....205 LBS.



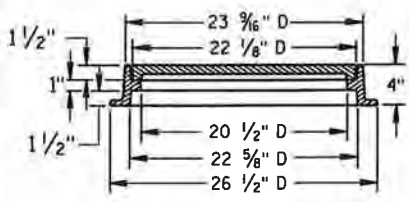
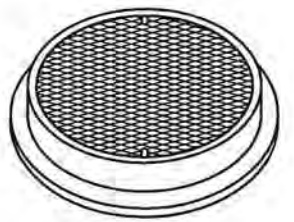
**TYPE "J"**  
(APPROXIMATE WEIGHT 250 LBS.)  
FRAME.....135 LBS.  
LID.....115 LBS.



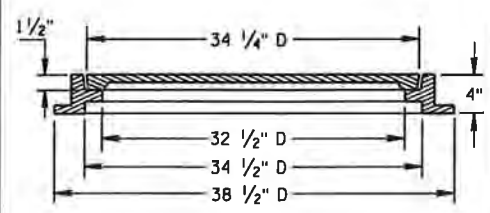
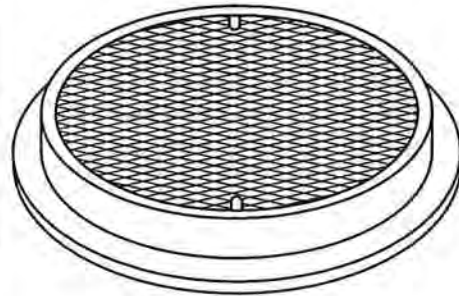
**TYPE "J" SPECIAL**  
TYPE "B" NON-ROCKING SELF-SEAL LID  
(APPROXIMATE WEIGHT 245 LBS.)  
FRAME.....145 LBS.  
LID.....100 LBS.  
(NOTED AS TYPE J-S ON THE DRAINAGE TABLE)



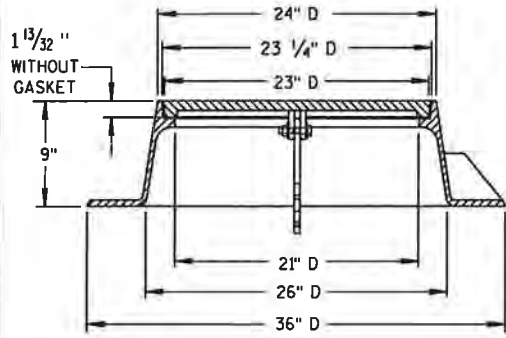
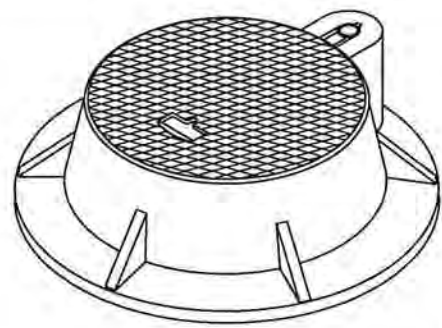
**INLET COVER TYPE "Z"**  
(APPROXIMATE WEIGHT 340 LBS.)  
FRAME.....198 LBS.  
GRATE.....50 LBS.  
CURB BOX.....92 LBS.



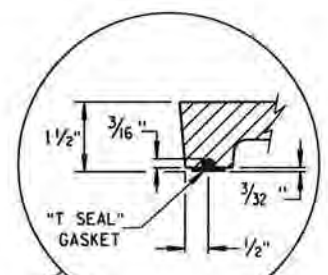
**TYPE "L"**  
(APPROXIMATE WEIGHT 145 LBS.)  
FRAME.....75\*  
LID.....70\*



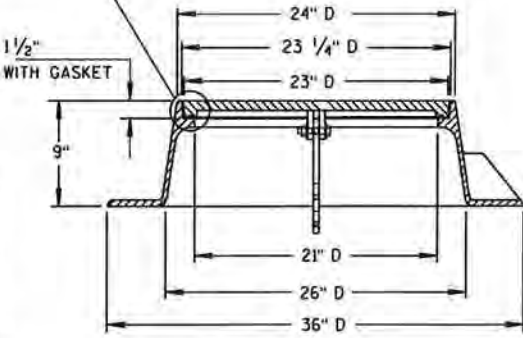
**TYPE "M"**  
(APPROXIMATE WEIGHT 385 LBS.)  
FRAME.....125\*  
LID.....260\*



**TYPE "J" HINGED**  
LID WITHOUT "T SEAL" GASKET  
(APPROXIMATE WEIGHT 310 LBS.)  
FRAME.....190 LBS.  
LID.....120 LBS.  
(NOTED AS TYPE J-H ON THE DRAINAGE TABLE)



**"T SEAL" GASKET DETAIL**

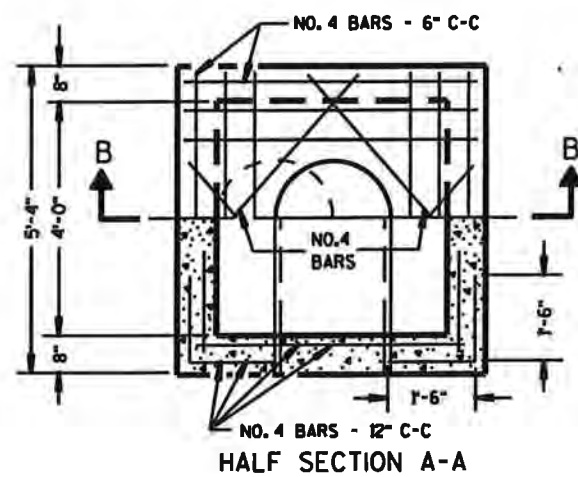


**TYPE "J" HINGED-SPECIAL** ①  
LID WITH "T SEAL" GASKET  
(APPROXIMATE WEIGHT 310 LBS.)  
FRAME.....190 LBS.  
LID.....120 LBS.  
(NOTED AS TYPE J-S-H ON THE DRAINAGE TABLE)

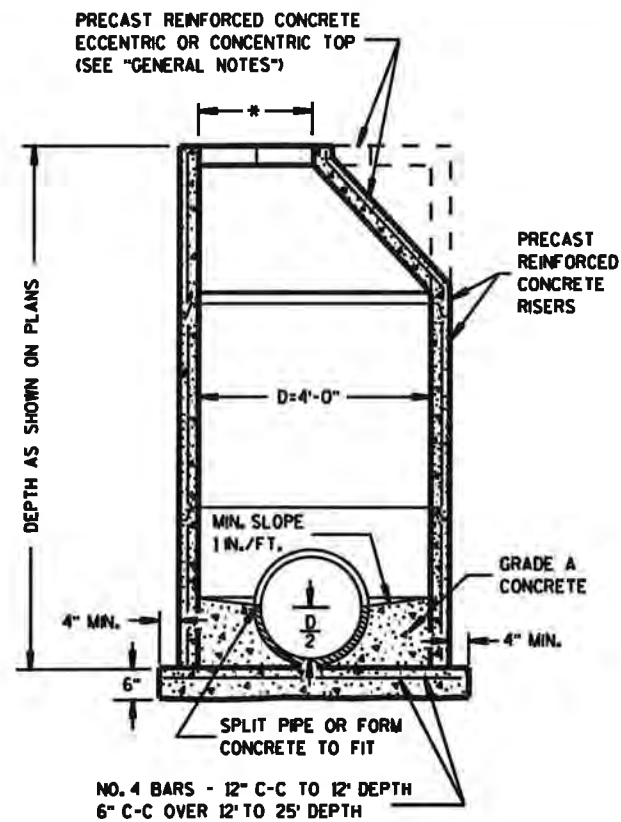
**INLET COVER, TYPE Z  
MANHOLE COVERS, TYPE  
K, J, J-S, J-H, J-H-S, L & M**

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

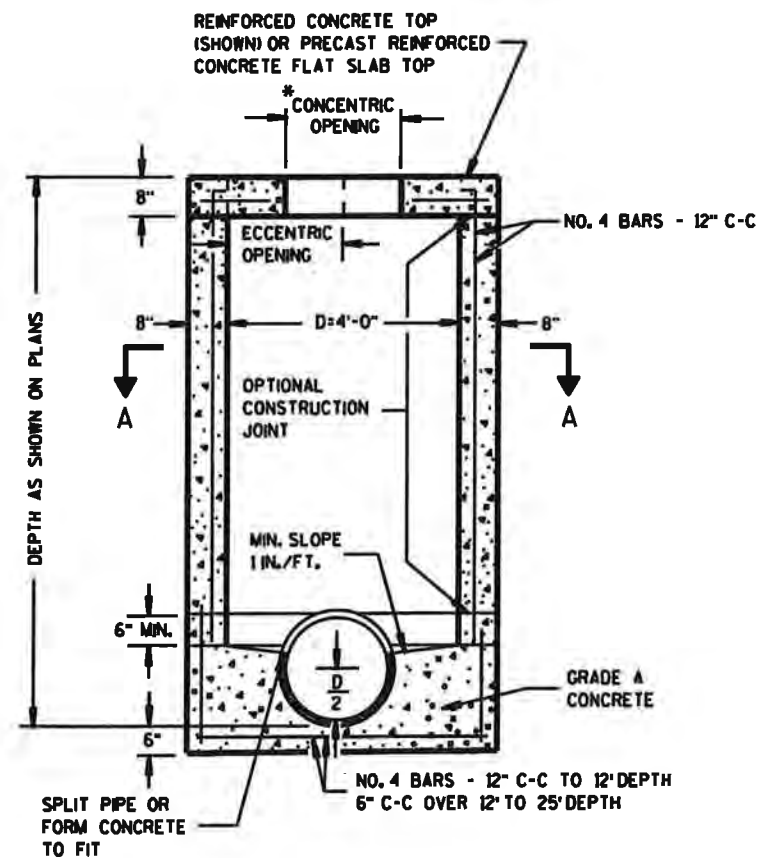
APPROVED  
11/24/2005 DATE /S/ Beth [Signature]  
CHIEF ROADWAY DE 93 IEER  
FHWA



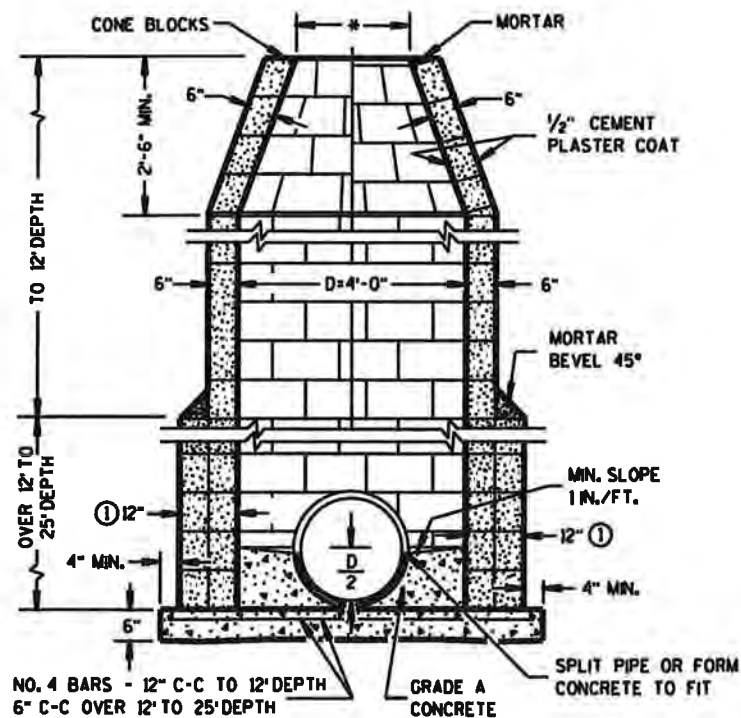
HALF SECTION A-A



PRECAST REINFORCED CONCRETE



SECTION B-B  
REINFORCED CONCRETE



CONCRETE BLOCK

**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.

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 1-C", "CATCH BASINS 1-B", "INLETS 3-H", ETC. THE FIRST DIGIT DESIGNATES THE MASONRY PORTION OF THE STRUCTURE, AND THE FOLLOWING LETTER DESIGNATES THE TYPE OF COVER TO BE USED TO COMPRISE THE COMPLETE UNIT.

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

PRECAST REINFORCED CONE TOPS (ECCENTRIC OR CONCENTRIC) MAY BE USED ON CONCRETE BLOCK STRUCTURES. THE CONE TOPS SHALL BE INSTALLED ON A BED OF MORTAR.

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 CONFORMING TO AASHTO M 199 SHALL BE INSTALLED IN ALL STRUCTURES OVER 5 FEET IN DEPTH.

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.

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

PRECAST REINFORCED CONCRETE RISERS MAY BE PLACED WITH TONGUE UP OR DOWN.

ALL PRECAST INLET UNITS AND MANHOLES SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF AASHTO DESIGNATION M 199.

\* USE 2'-0" DIAMETER OPENING WITH TYPE "C", "L" AND "J" COVERS, OR 3'-0" DIAMETER WITH TYPE "K" AND "M" COVERS.

① 2 COURSES 6" BLOCK.

6

6

S.D.D. 8 B 6-4

S.D.D. 8 B 6-4

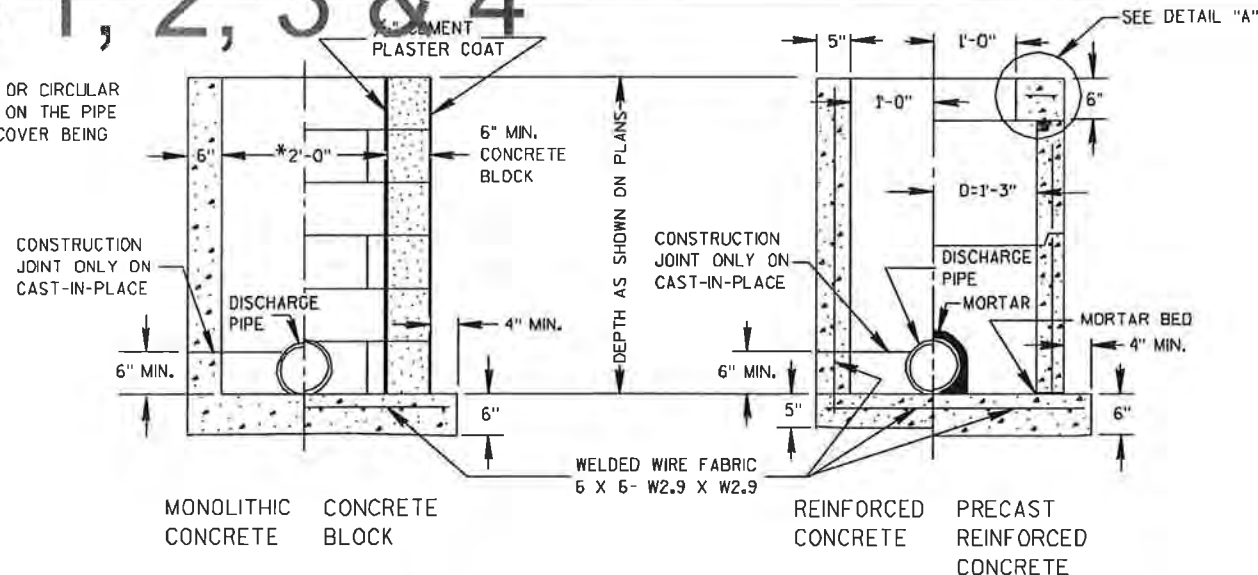
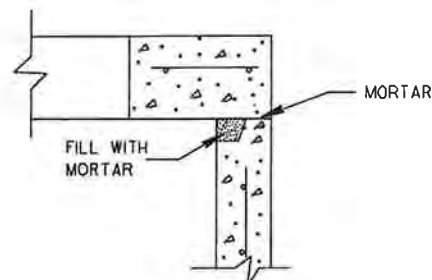
MANHOLES TYPE 1

MANHOLES TYPE 1			
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION			
APPROVED	9/9/05	/s/ Jerry H. Zogg	
DATE	ROADWAY STAND.	94	VENT
PHWA	ENK		



# 3C1: Inlets Type 1, 2, 3 & 4

\*SELECTION OF SQUARE OR CIRCULAR DESIGN WILL BE BASED ON THE PIPE SIZES AND THE INLET COVER BEING UTILIZED



## 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.

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

ALL PRECAST INLET UNITS SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF AASHTO DESIGNATION M 199.

ALL DRAINAGE STRUCTURES ARE DESIGNATED ON THE PLANS AS "MANHOLES I-C", "CATCH BASINS I-B", "INLETS 3-H", ETC. THE FIRST DIGIT DESIGNATES THE MASONRY PORTION OF THE STRUCTURE, AND THE FOLLOWING LETTER DESIGNATES THE TYPE OF COVER TO BE USED TO COMPRISE THE COMPLETE UNIT.

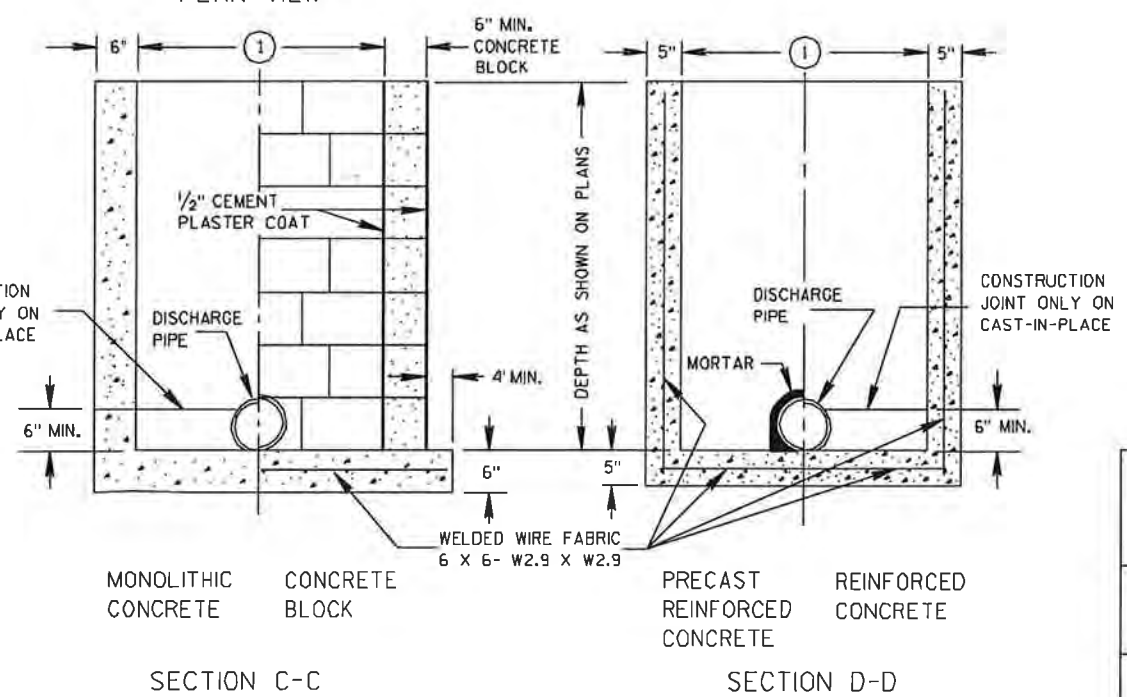
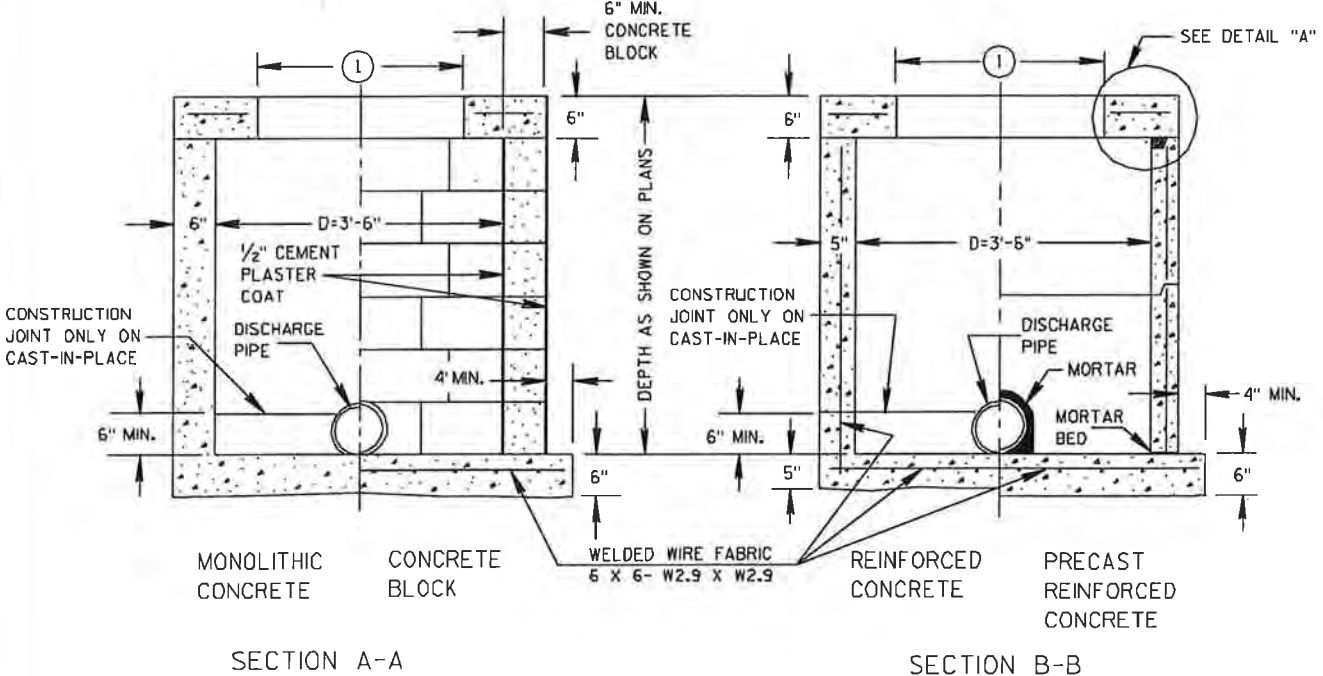
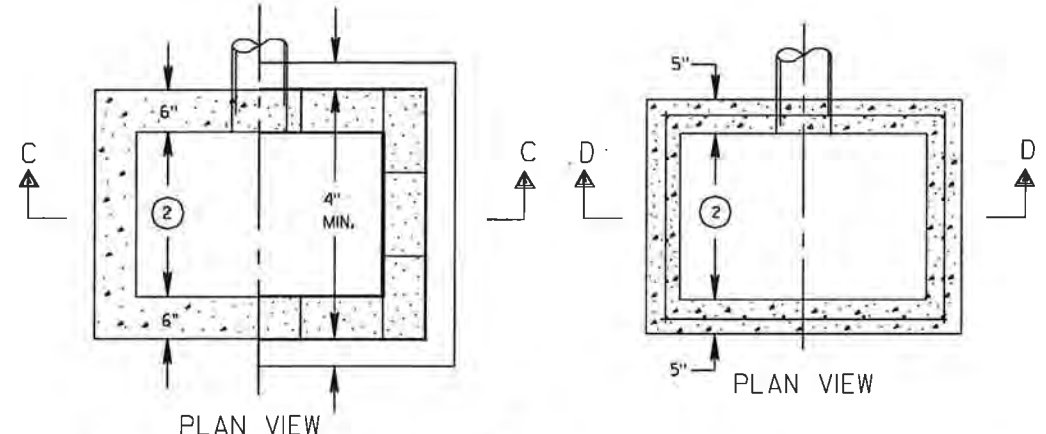
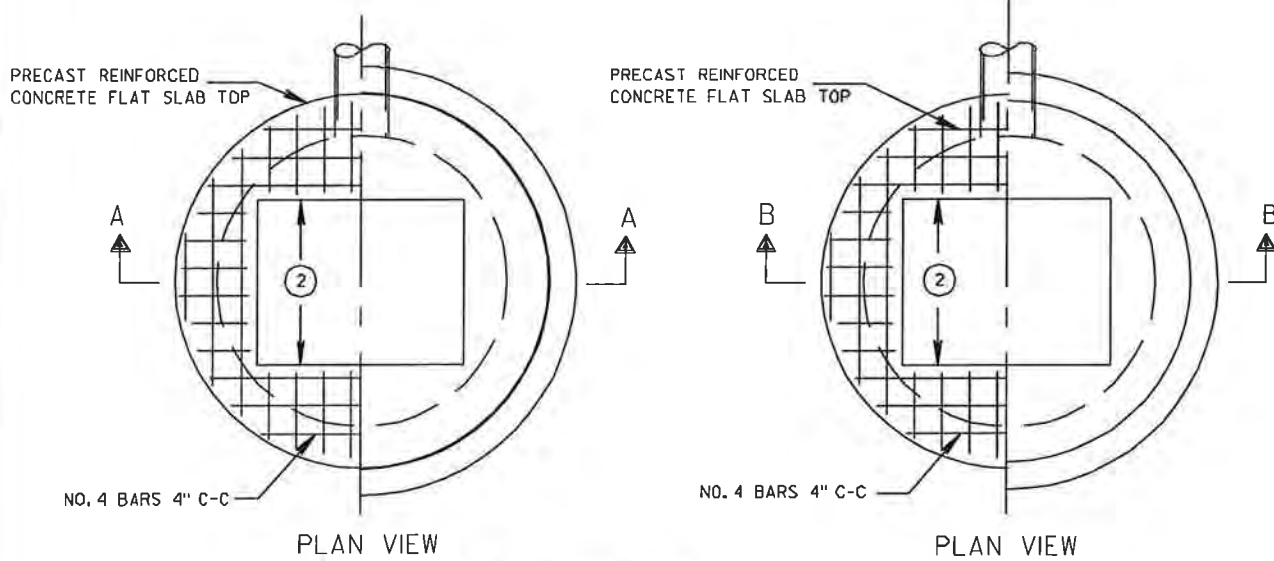
PRECAST REINFORCED BASES SHALL BE PLACED ON A BED OF MATERIAL AT LEAST 6 INCHES IN DEPTH, WHICH MEETS THE REQUIREMENTS OF GRANULAR BACKFILL. THIS BEDDING SHALL BE COMPACTED AND PROVIDE UNIFORM SUPPORT FOR THE ENTIRE AREA OF THE BASE.

PRECAST REINFORCED CONCRETE FLAT SLAB TOPS MAY BE USED ON THE STRUCTURES. THE TOPS SHALL BE INSTALLED ON A BED OF MORTAR.

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

PRECAST REINFORCED CONCRETE RISERS SHALL BE PLACED WITH TONGUE DOWN.

- ① USE 2'-6" OPENING FOR TYPE 2 INLETS, 3'-0" OPENING FOR TYPE 3 INLETS, AND 2'-11" FOR TYPE 4 INLETS.
- ② USE 2'-0" OPENING FOR TYPE 1, 2 & 3 INLETS, 2'-6 1/2" OPENING FOR TYPE 4 INLETS.



INLETS TYPE 2, 3 & 4

INLETS TYPE 1, 2, 3 & 4

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED \_\_\_\_\_  
DATE \_\_\_\_\_ CHIEF ROADWAY DEVELOPMENT ENGINEER  
FHWA 95

APPROVED \_\_\_\_\_  
DATE \_\_\_\_\_ STATE MAT'L'S ENGINEER FOR HWYS

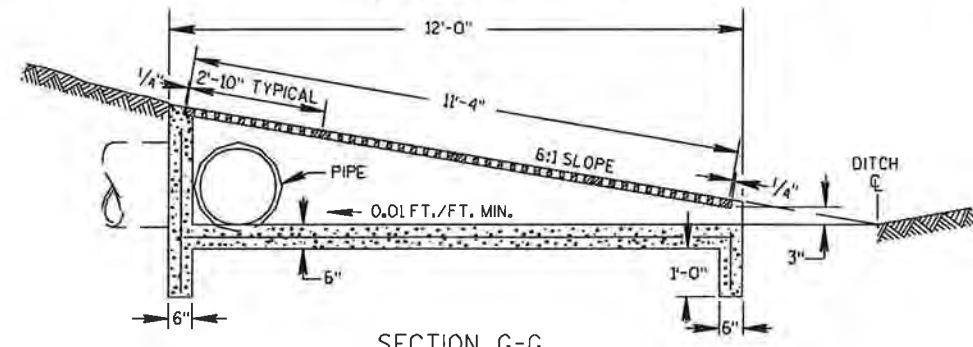
APPROVED \_\_\_\_\_  
DATE \_\_\_\_\_ STATE CONST. ENGINEER FOR HWYS

APPROVED \_\_\_\_\_  
DATE \_\_\_\_\_ STATE DESIGN ENGINEER FOR HWYS

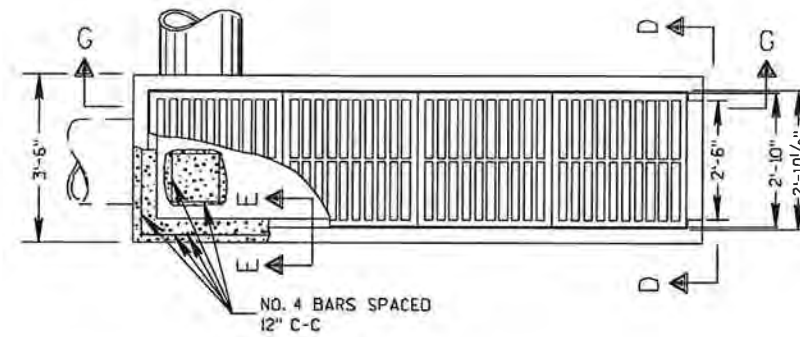
S.D.D. 8 C 1-5

S.D.D. 8 C 1-5

# 8C5: Inlets Type 8, 9, 10 and 11

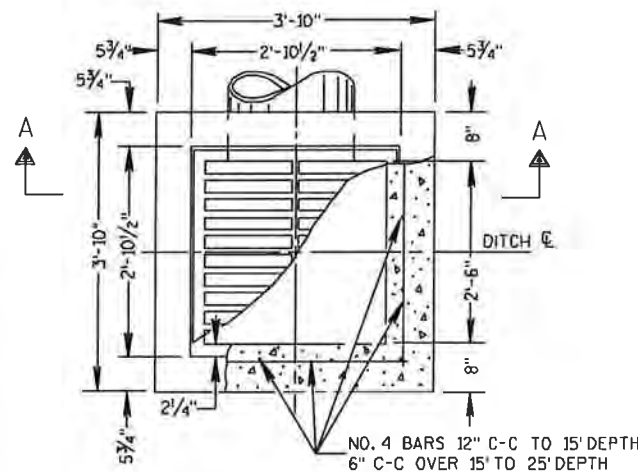


SECTION G-G

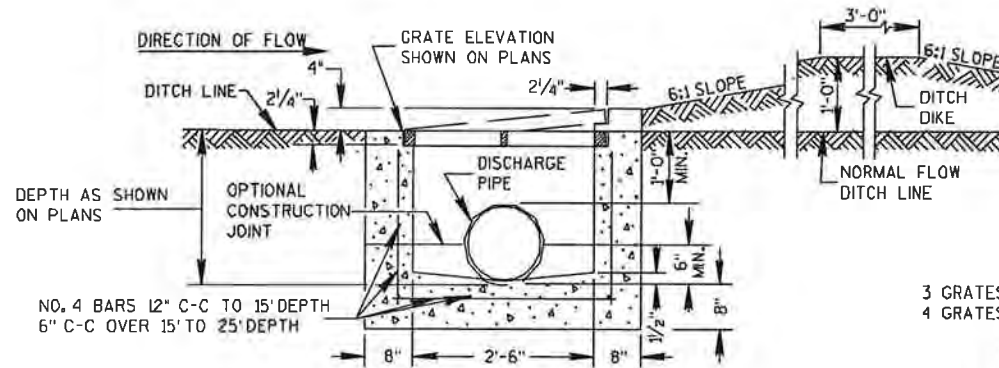


PLAN VIEW

REINFORCED CONCRETE INLET TYPE 11

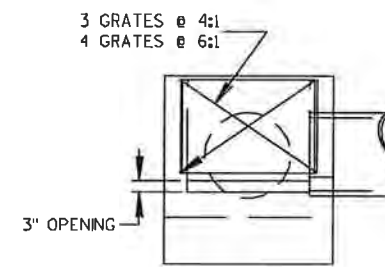


PLAN VIEW

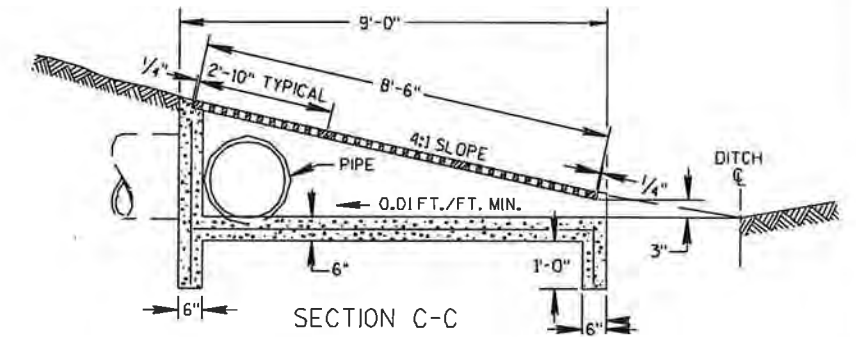


SECTION A-A

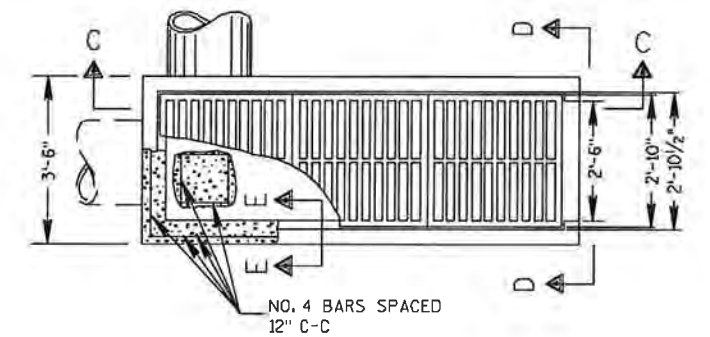
REINFORCED CONCRETE INLET TYPE 8



SECTION D-D

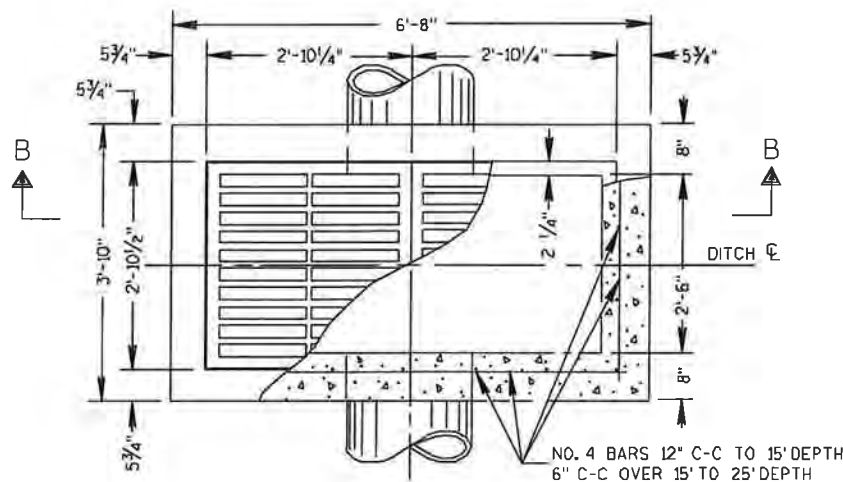


SECTION C-C

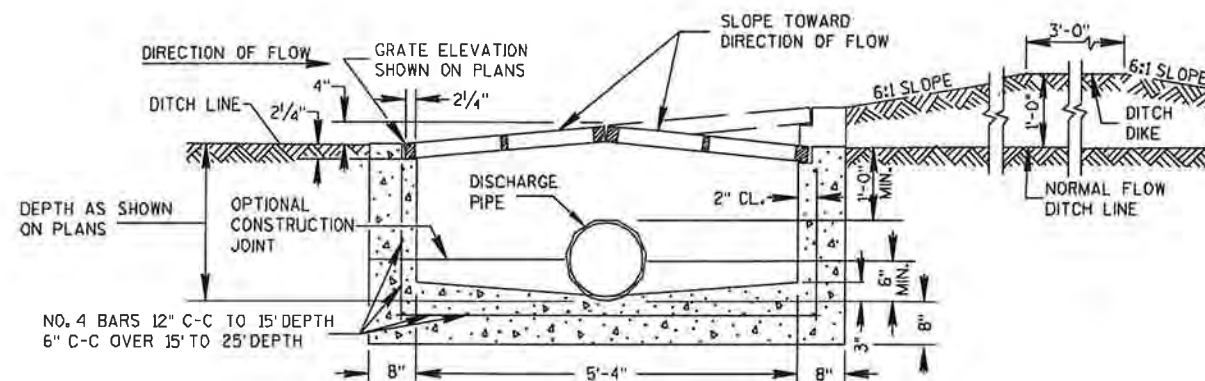


PLAN VIEW

REINFORCED CONCRETE INLET TYPE 10

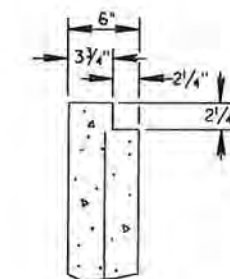


PLAN VIEW



SECTION B-B

REINFORCED CONCRETE INLET TYPE 9



SECTION E-E

INLETS TYPE 8, 9, 10 AND 11

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED

DATE \_\_\_\_\_ CHIEF ROADWAY DEVELOPMENT ENGINEER

FHWA

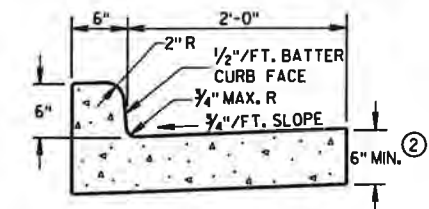
96

S.D.D. 8 C 5-2

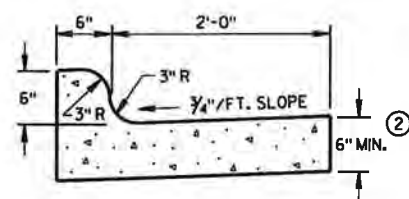
APPROVED  
DATE \_\_\_\_\_ STATE CONST. ENGINEER FOR HWYS

S.D.D. 8 C 5-2

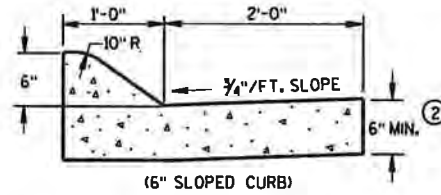
# 8D1: Concrete Curb, Concrete Curb & Gutter and Ties



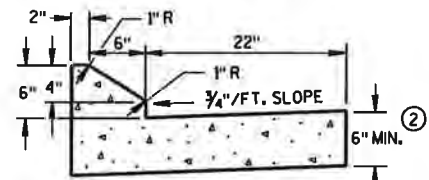
TYPES A & D ①



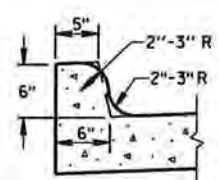
TYPES K & L ①



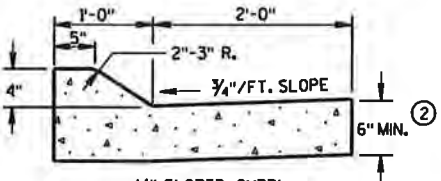
(6" SLOPED CURB) ②



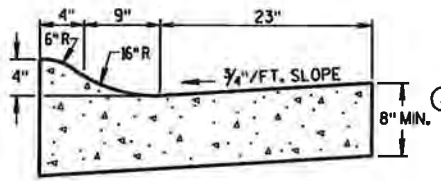
6" SLOPED CURB TYPES G & J ①



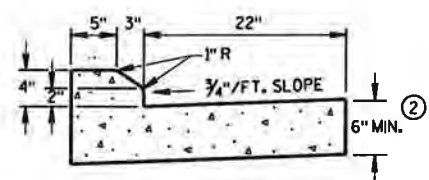
OPTIONAL CURB SHAPE FOR TYPES K & L ①



(4" SLOPED CURB) TYPES A & D ①

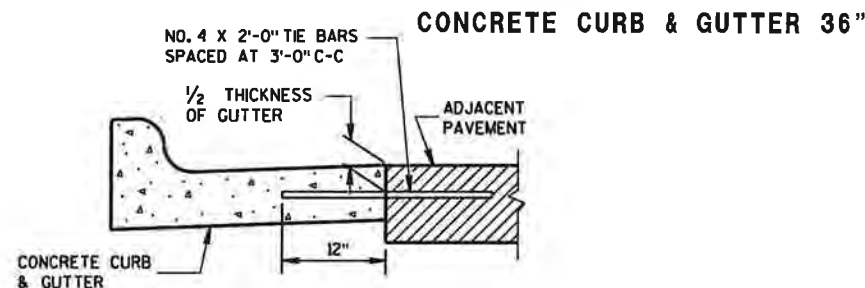


4" SLOPED CURB TYPES R & T ① ④

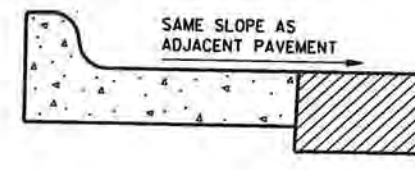


4" SLOPED CURB TYPES G & J ①

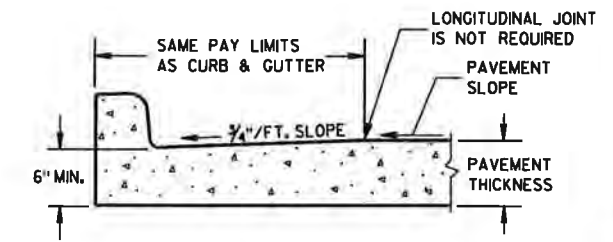
CONCRETE CURB & GUTTER 30"



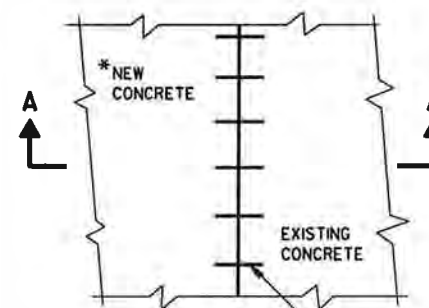
TYPICAL TIE BAR LOCATION ①



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



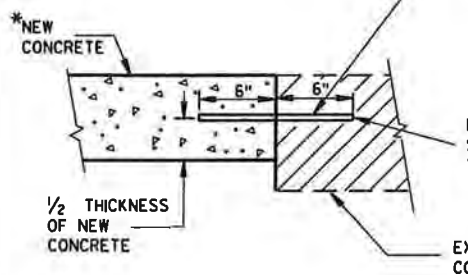
PARTIAL SECTION OF PAVEMENT WITH INTEGRAL CURB & GUTTER



PLAN VIEW

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

NO. 6 TIE BARS SPACED 2'-6" C-C, INSTALLED PERPENDICULAR TO THE LONGITUDINAL JOINT.

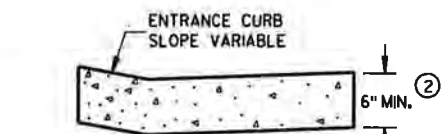


SECTION A-A

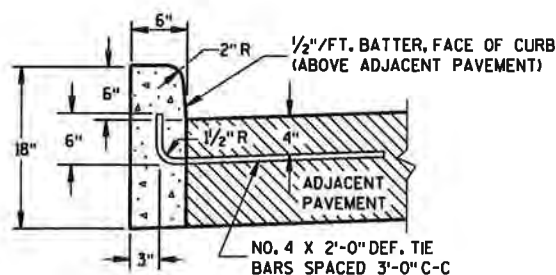
TIE BARS DRILLED INTO EXISTING PAVEMENT

MAXIMUM DRILL HOLE SIZE IS 1/8" GREATER THAN TIE BAR DIAMETER

EXISTING CONCRETE

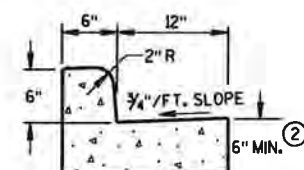


DRIVEWAY ENTRANCE CURB (WHEN DIRECTED BY THE ENGINEER)

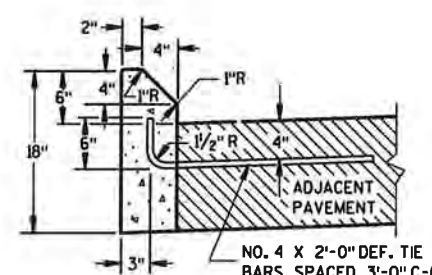


TYPES A & D ①

CONCRETE CURB



TYPES A & D CONCRETE CURB & GUTTER 18" ②



TYPES G & J ①

## GENERAL NOTES

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

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

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

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

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

- ① TIE BARS ARE REQUIRED FOR CURB AND GUTTER TYPES A, G, K AND R.
- ② THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 6" MINIMUM GUTTER THICKNESS IS MAINTAINED.
- ③ THE BOTTOM OF CURB AND GUTTER MAY BE CONSTRUCTED EITHER LEVEL OR PARALLEL TO THE SLOPE OF THE SUBGRADE OR BASE AGGREGATE PROVIDED A 8" MINIMUM GUTTER THICKNESS IS MAINTAINED.
- ④ THE FACE OF CURB IS 6" FROM THE BACK OF CURB.
- ⑤ WHEN REVERSE SLOPE GUTTER IS REQUIRED, THE LOCATION(S) WILL BE SHOWN ELSEWHERE IN THE PLAN.

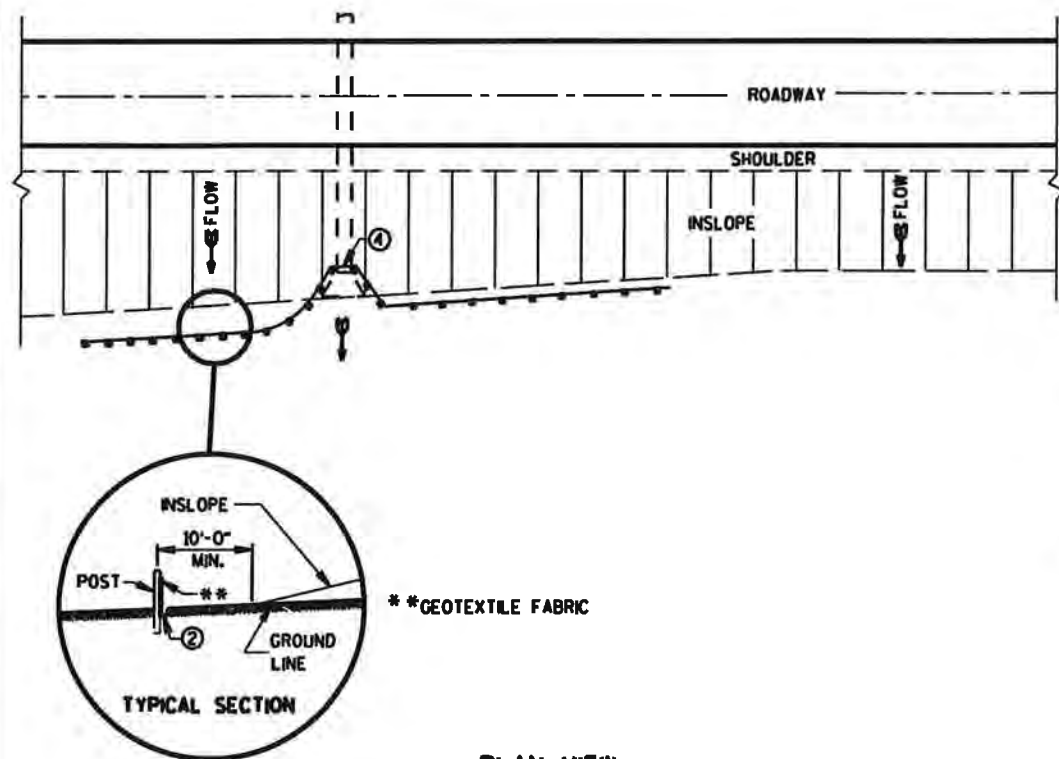
6

6

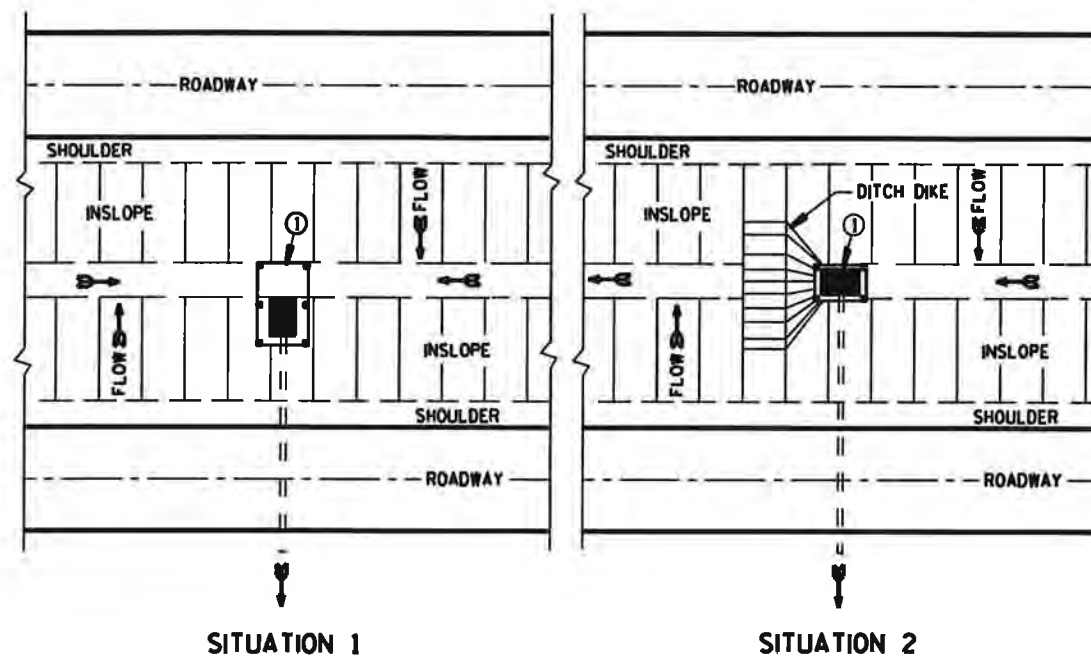
S.D.D. 8 D 1-17

S.D.D. 8 D 1-17

CONCRETE CURB, CONCRETE CURB & GUTTER AND TIES	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED 9/4/08 DATE	/s/ Jerry H. Zogg ROADWAY STANDARDS DEVELOPMENT ENGINEER



PLAN VIEW  
TYPICAL APPLICATION OF SILT FENCE

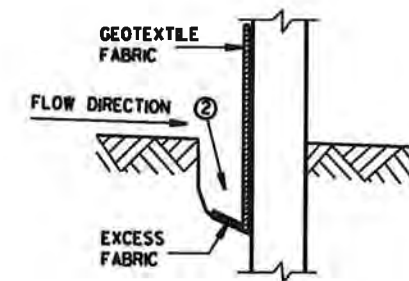


PLAN VIEW  
SILT FENCE AT MEDIAN SURFACE DRAINS

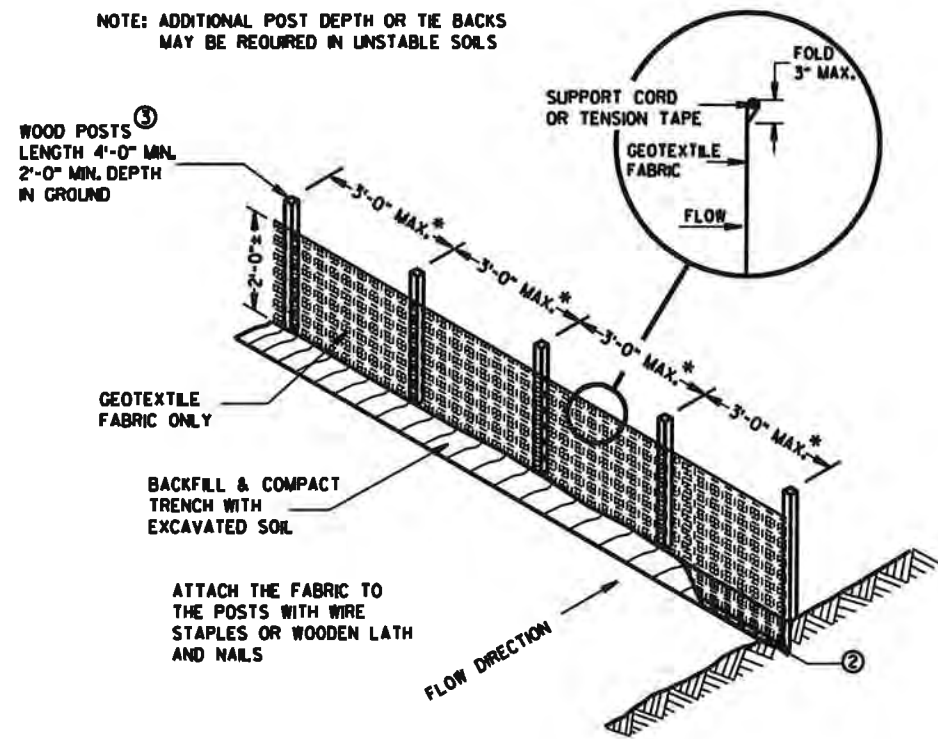
**GENERAL NOTES**

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

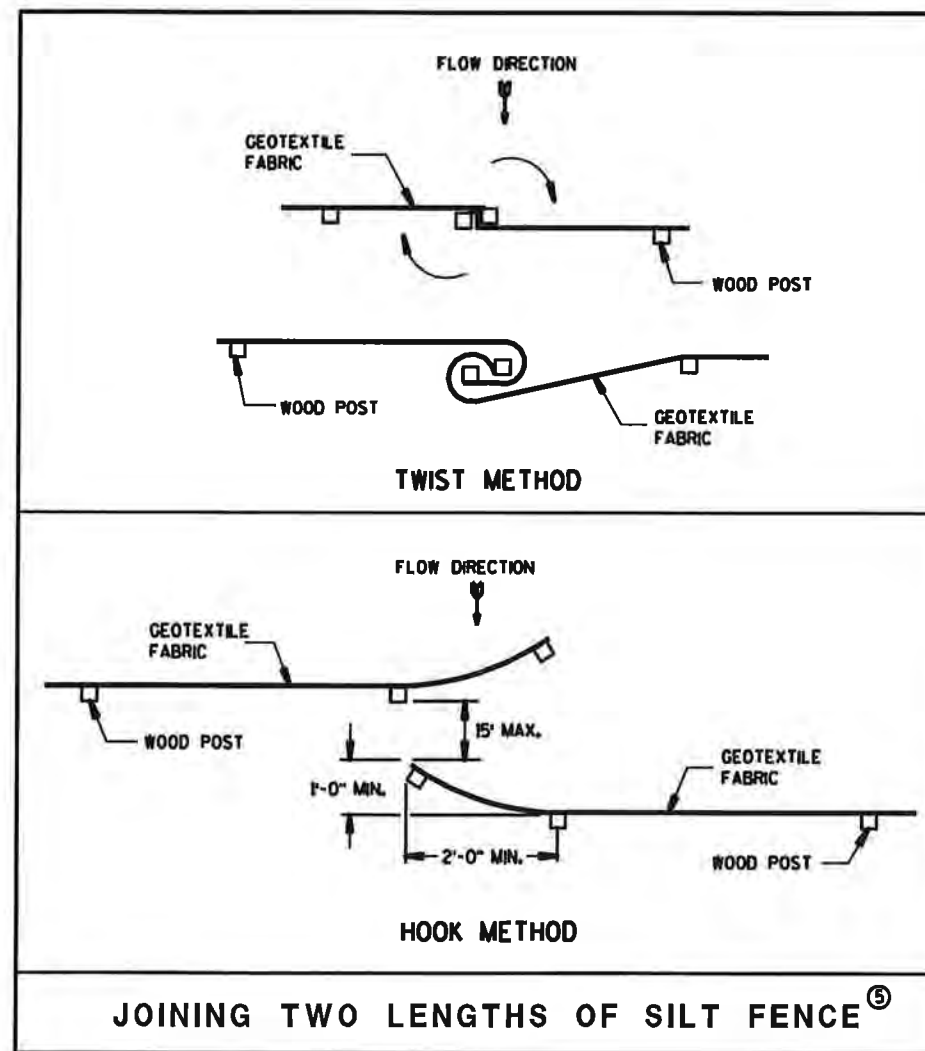
- ① HORIZONTAL BRACE REQUIRED WITH 2" X 4" WOODEN FRAME OR EQUIVALENT AT TOP OF POSTS.
- ② FOR MANUAL INSTALLATIONS THE TRENCH SHALL BE A MINIMUM OF 4" WIDE & 6" DEEP TO BURY AND ANCHOR THE GEOTEXTILE FABRIC. FOLD MATERIAL TO FIT TRENCH AND BACKFILL & COMPACT TRENCH WITH EXCAVATED SOIL.
- ③ WOOD POSTS SHALL BE A MINIMUM SIZE OF 1/6" X 1/6" 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.



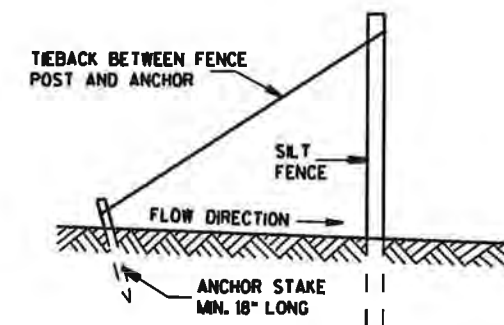
TRENCH DETAIL



SILT FENCE



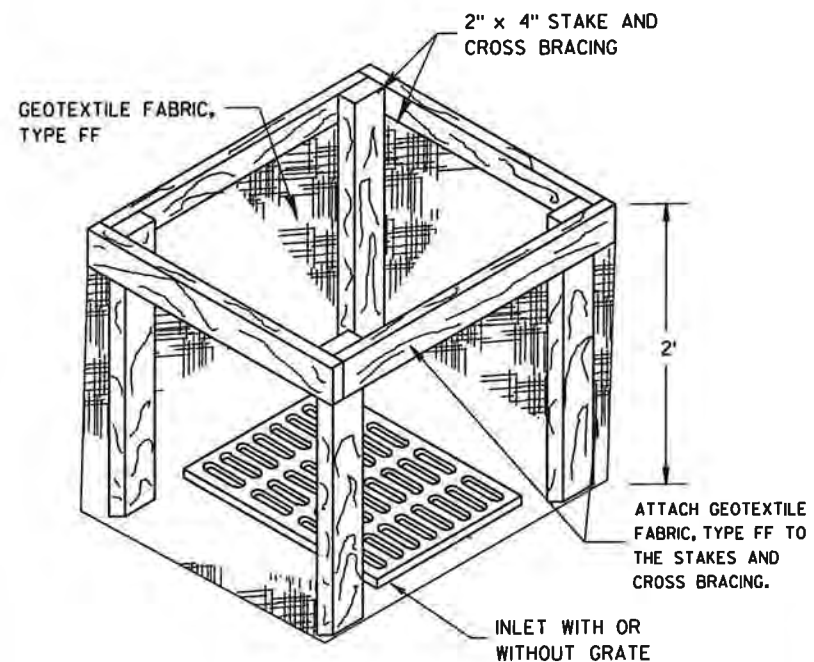
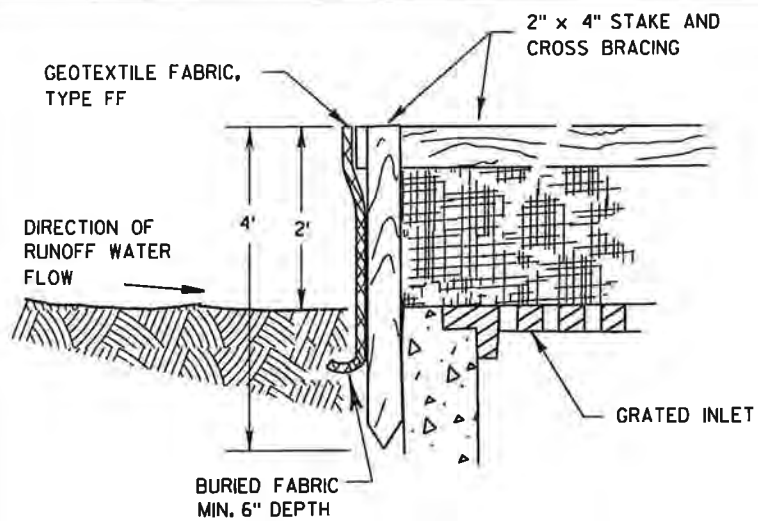
JOINING TWO LENGTHS OF SILT FENCE ⑤



SILT FENCE TIE BACK  
(WHEN REQUIRED BY THE ENGINEER)

<b>SILT FENCE</b>	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
DATE _____	CHEF ROADWAY DEVELOPMENT ENGINEER
FHWA	

# 8E10: Inlet Protection Type A, B, C and D



**INLET PROTECTION, TYPE A**

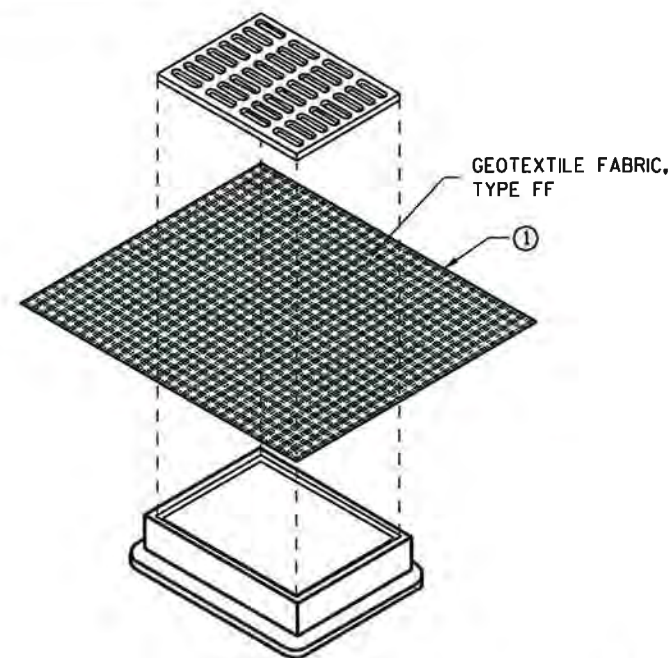
## GENERAL NOTES

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.

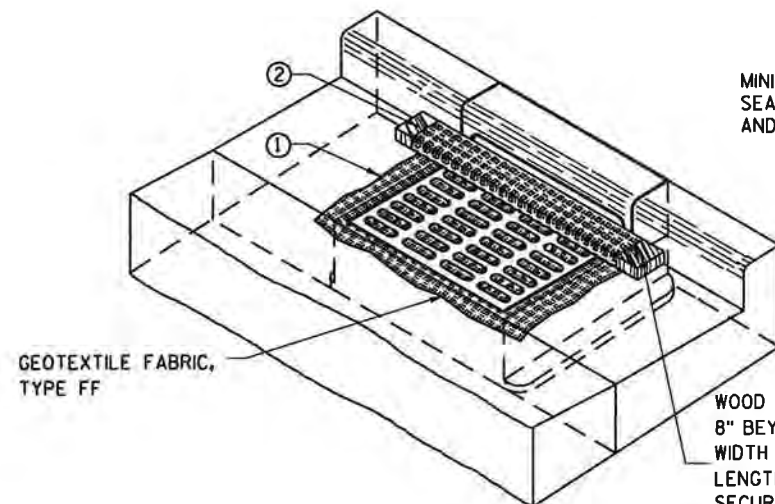
WHEN REMOVING OR MAINTAINING INLET PROTECTION, CARE SHALL BE TAKEN SO THAT THE SEDIMENT TRAPPED ON THE GEOTEXTILE FABRIC DOES NOT FALL INTO THE INLET. ANY MATERIAL FALLING INTO THE INLET SHALL BE REMOVED IMMEDIATELY.

- 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.



**INLET PROTECTION, TYPE B  
(WITHOUT CURB BOX)**

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



**INLET PROTECTION, TYPE C (WITH CURB BOX)**

## INSTALLATION NOTES

### TYPE B & C

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

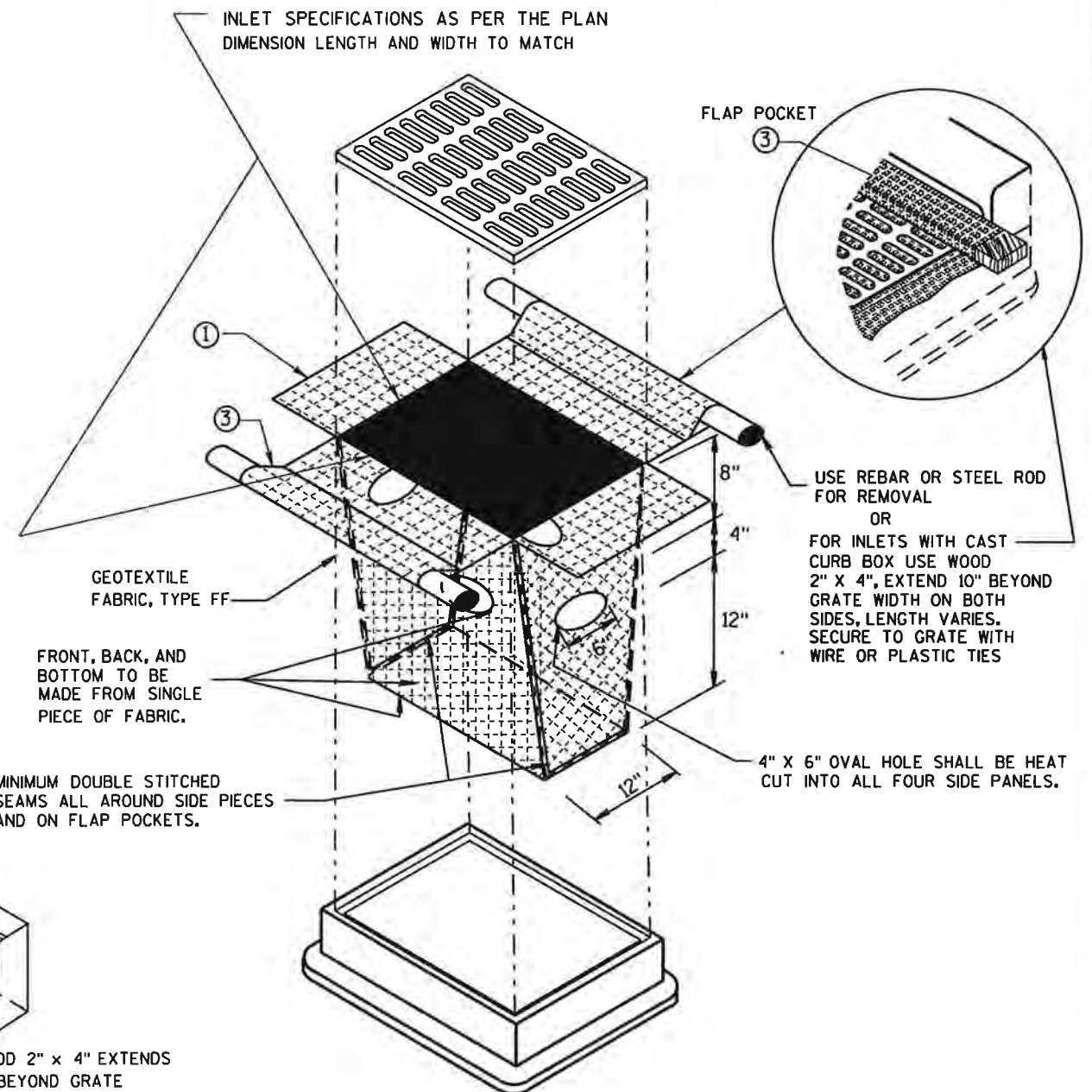
THE CONTRACTOR SHALL DEMONSTRATE A METHOD OF MAINTENANCE, USING A SEWN FLAP, HAND HOLDS OR OTHER METHOD TO PREVENT ACCUMULATED SEDIMENT FROM ENTERING THE INLET.

### 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 D**

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

**INLET PROTECTION  
TYPE A, B, C, AND D**

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED

DATE \_\_\_\_\_ CHIEF ROADWAY DEVELOPMENT ENGINEER  
FHWA

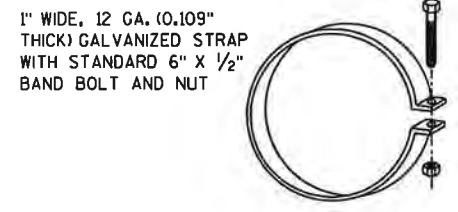
# 8F1: Apron Endwalls for Culvert Pipe

METAL APRON ENDWALLS											
PIPE DIA. (IN.)	MIN. THICK. (Inches)		DIMENSIONS (Inches)						APPROX. SLOPE	BODY	
	STEEL	ALUM.	A (±1")	B (MAX.)	H (±1")	L (±1 1/2")	L1	L2			W (±2")
12	.064	.060	6	6	6	21	12	17 1/2	24	2 1/2 to 1	1 Pc.
15	.064	.060	7	8	6	26	14	21 3/4	30	2 1/2 to 1	1 Pc.
18	.064	.060	8	10	6	31	15	28 1/4	36	2 1/2 to 1	1 Pc.
21	.064	.060	9	12	6	36	18	29 3/8	42	2 1/2 to 1	1 Pc.
24	.064	.075	10	13	6	41	18	37 1/4	48	2 1/2 to 1	1 Pc.
30	.079	.075	12	16	8	51	18	52 1/4	60	2 1/2 to 1	1 Pc.
36	.079	.105	14	19	9	60	24	59 3/4	72	2 1/2 to 1	2 Pc.
42	.109	.105	16	22	11	69	24	75 3/8	84	2 1/2 to 1	2 Pc.
48	.109	.105	18	27	12	78	24	81	90	2 1/4 to 1	3 Pc.
54	.109	.105	18	30	12	84	30	85 1/2	102	2 1/4 to 1	3 Pc.
60	.109*	.105*	18	33	12	87	—	—	114	2 to 1	3 Pc.
66	.109*	.105*	18	36	12	87	—	—	120	2 to 1	3 Pc.
72	.109*	.105*	18	39	12	87	—	—	126	2 to 1	3 Pc.
78	.109*	.105*	18	42	12	87	—	—	132	1 1/2 to 1	3 Pc.
84	.109*	.105*	18	45	12	87	—	—	138	1 1/2 to 1	3 Pc.
90	.109*	.105*	18	37	12	87	—	—	144	1 1/2 to 1	3 Pc.
96	.109*	.105*	18	35	12	87	—	—	150	1 1/2 to 1	3 Pc.

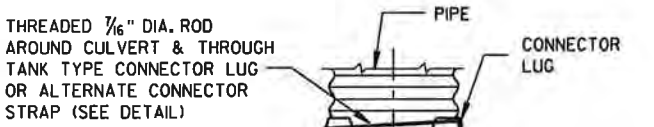
\* EXCEPT CENTER PANEL SEE GENERAL NOTES

REINFORCED CONCRETE APRON ENDWALLS										
PIPE DIA. (IN.)	DIMENSIONS (Inches)								APPROX. SLOPE	
	T	A	B	C	D	E	G			
12	2	4	24	48 1/8	72 1/8	24	2	3 to 1		
15	2 1/4	6	27	46	73	30	2 1/4	3 to 1		
18	2 1/2	9	27	46	73	36	2 1/2	3 to 1		
21	2 3/4	9	36	37 1/2	73 1/2	42	2 3/4	3 to 1		
24	3	9 1/2	43 1/2	30	73 1/2	48	3	3 to 1		
27	3 1/4	10 1/2	49 1/2	24	73 1/2	54	3 1/4	3 to 1		
30	3 1/2	12	54	19 3/4	73 1/2	60	3 1/2	3 to 1		
36	4	15	63	34 3/4	97 3/4	72	4	3 to 1		
42	4 1/2	21	63	35	98	78	4 1/2	3 to 1		
48	5	24	72	26	98	84	5	3 to 1		
54	5 1/2	27	65	33 1/4-35	98 1/4-100	90	5 1/2	2 3/5 to 1		
60	6	30-35	60	39	99	96	5	2 to 1		
66	6 1/2	24-30	72-78	21-27	99	102	5 1/2	2 to 1		
72	7	24-36	78	21	99	108	6	2 to 1		
78	7 1/2	24-36	78	21	99	114	6 1/2	2 to 1		
84	8	36	90 1/2	21	111 1/2	120	6 1/2	1 1/2 to 1		
90	8 1/2	41	87 1/2	24	111 1/2	132	6 1/2	1 1/2 to 1		

\* MINIMUM  
\*\* MAXIMUM



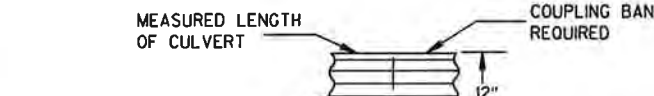
ALTERNATE FOR TYPE 1 CONNECTION  
END SECTION CONNECTOR STRAP



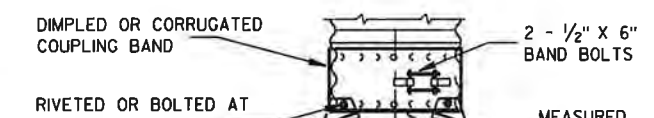
TYPE 1  
FOR 12" THRU 24" CORR. PIPE



TYPE 2  
FOR 30" THRU 96" CORR. PIPE



TYPE 3  
FOR 42" THRU 96" CORR. PIPE



TYPE 5  
ALTERNATE FOR:  
ALL SIZES CORRUGATED CIRCULAR PIPE

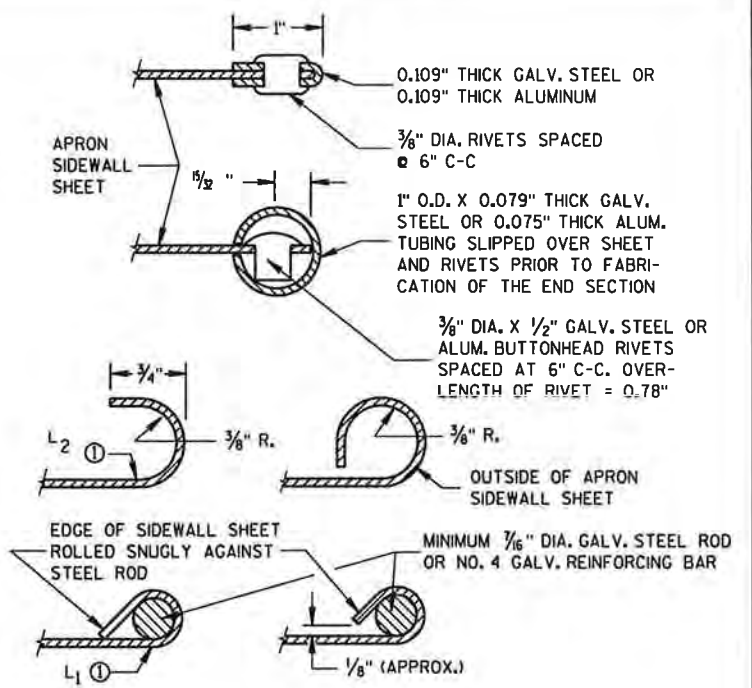
NOTE: DIMPLED BAND FITS OVER OUTSIDE OF ENDWALL, AND CORRUGATED BAND FITS INSIDE ENDWALL. DIMPLED BAND MAY BE USED WITH HELICALLY CORRUGATED PIPE.

FOR CIRCUMFERENTIALLY CORRUGATED PIPE USE ENDWALL CONNECTION DETAILS 1, 2, 3 OR 5 AS APPLICABLE.

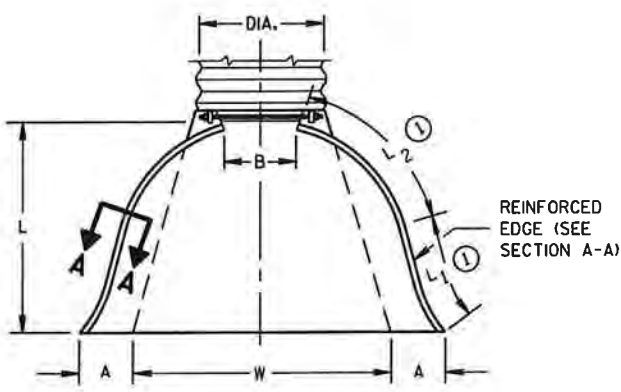
FOR HELICALLY CORRUGATED PIPE USE ENDWALL CONNECTION DETAILS 1, 2 OR 5.

FOR HELICALLY CORRUGATED PIPES WITH TWO CIRCUMFERENTIAL CORRUGATIONS AT EACH END USE ENDWALL CONNECTION DETAILS 1, 2 OR 3.

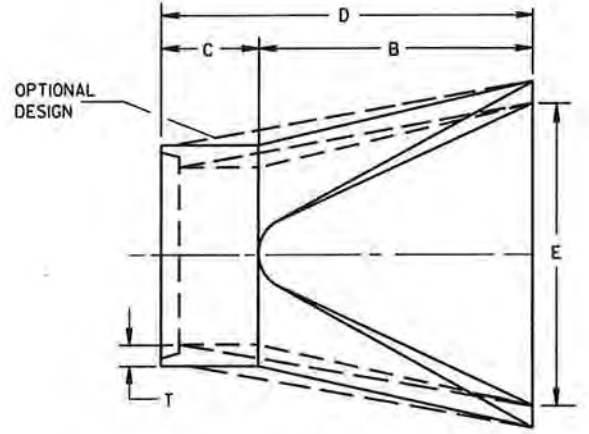
### CONNECTION DETAILS



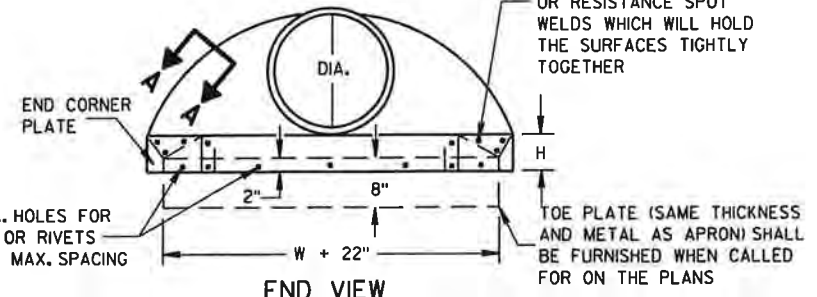
SECTION A-A



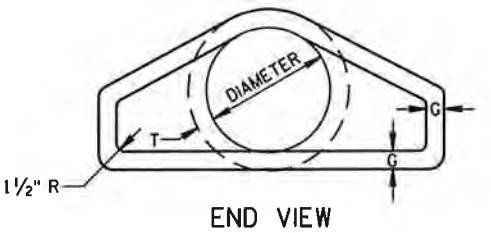
PLAN VIEW



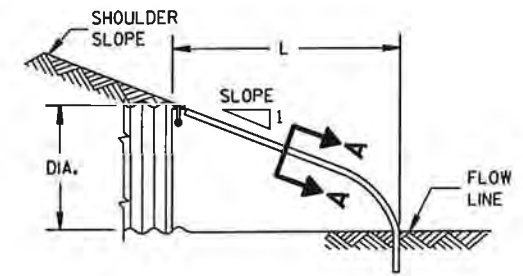
PLAN



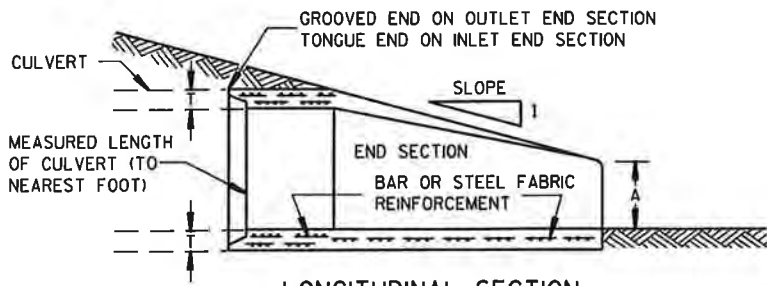
END VIEW



END VIEW



SIDE ELEVATION  
METAL ENDWALLS



LONGITUDINAL SECTION  
CONCRETE ENDWALLS

### GENERAL NOTES

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

CONCRETE CULVERT ENDWALLS MAY NOT BE USED WITH GALVANIZED STEEL OR ALUMINUM CULVERT PIPE OR VISE VERSA. GALVANIZED STEEL OR ALUMINUM ENDWALLS SHALL NORMALLY BE INSTALLED ON CULVERT PIPE OF THE SAME METAL.

ALL THREE PIECE STEEL APRON ENDWALLS FOR 60" DIAMETER PIPE AND LARGER SHALL HAVE 0.109" SIDES AND 0.138" CENTER PANELS. ALL THREE PIECE ALUMINUM APRON ENDWALLS FOR 60" DIAMETER PIPE AND LARGER SHALL HAVE 0.105" SIDES AND 0.134" CENTER PANELS. THE WIDTH OF CENTER PANELS SHALL BE GREATER THAN 20 PERCENT OF THE PIPE PERIMETER.

LAP SEAMS SHALL BE TIGHTLY JOINED BY GALVANIZED RIVETS OR BOLTS FOR STEEL UNITS AND ALUMINUM RIVETS AND BOLTS FOR ALUMINUM UNITS. FOR THE 60" THROUGH 96" DIAMETER APRON ENDWALL SIZES, THE REINFORCED EDGES AND CENTER PANEL SEAMS SHALL BE FURTHER REINFORCED WITH GALVANIZED STEEL OR ALUMINUM STIFFENER ANGLES. THE ANGLES SHALL BE ATTACHED BY GALVANIZED NUTS AND BOLTS FOR STEEL UNITS AND ALUMINUM NUTS AND BOLTS FOR ALUMINUM UNITS.

WHERE TWO OR MORE PIPES WITH APRON ENDWALLS ARE LAID ADJACENT TO EACH OTHER, THEY SHALL BE SEPARATED BY A DISTANCE SUFFICIENT TO PROVIDE A MINIMUM CLEARANCE OF 6 INCHES BETWEEN APRON ENDWALLS.

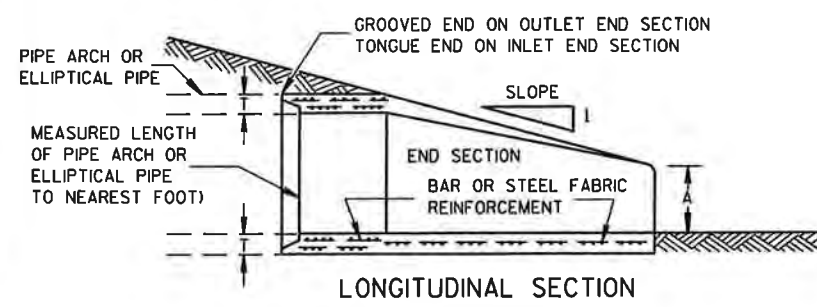
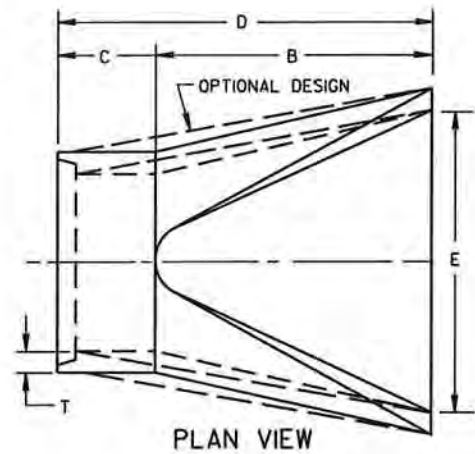
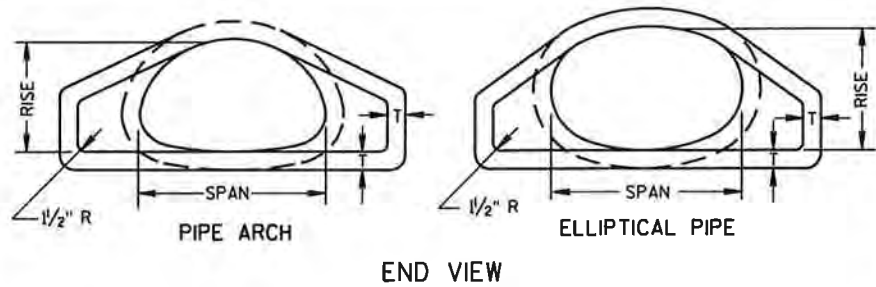
Ⓛ FOR PIPE SIZES UP TO 60" DIAMETER, A 180° ROLLED EDGE MAY BE USED INSTEAD OF STEEL ROD REINFORCEMENT. SEE SECTION A-A.

### APRON ENDWALLS FOR CULVERT PIPE

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED  
11/30/94 DATE  
1/5/ Rory L. [Signature] CHIEF ROADWAY DE 100  
EER  
FHWA

# 8F2: Apron Endwalls for Pipe Arch and Elliptical Pipe



CONCRETE ENDWALLS

2- 2/3" x 1/2" CORRUGATIONS													
EQUIV. DIA. (Inches)	(Inches)		MIN. THICK. (Inches)		DIMENSIONS (Inches)							APPROX. SLOPE	BODY
	SPAN	RISE	STEEL	ALUM.	A (±1")	B (MAX.)	H (±1")	L (±1 1/2")	L1 (1)	L2 (1)	W (±2")		
15	17	13	.064	.060	7	9	6	19	14	16	30	2 1/2 to 1	1 Pc.
18	21	15	.064	.060	7	10	6	23	14	19 3/8	36	2 1/2 to 1	1 Pc.
21	24	18	.064	.060	8	12	6	28	18	21 3/4	42	2 1/2 to 1	1 Pc.
24	28	20	.064	.060	9	14	6	32	18	27 1/2	48	2 1/2 to 1	1 Pc.
30	35	24	.079	.075	10	16	6	39	18	37 5/8	60	2 1/2 to 1	1 Pc.
36	42	29	.079	.075	12	18	8	46	24	45 3/8	75	2 1/2 to 1	1 Pc.
42	49	33	.109	.105	13	21	9	53	24	54 3/4	85	2 1/2 to 1	2 Pc.
48	57	38	.109	.105	18	26	12	63	24	68	90	2 1/2 to 1	3 Pc.
54	64	43	.109	.105	18	30	12	70	24	72 3/4	102	2 1/4 to 1	3 Pc.
60	71	47	.109*	.105*	18	33	12	77	30	82 1/4	114	2 1/4 to 1	3 Pc.
66	77	52	.109*	.105*	18	36	12	77	—	—	126	2 to 1	3 Pc.
72	83	57	.109*	.105*	18	39	12	77	—	—	138	2 to 1	3 Pc.

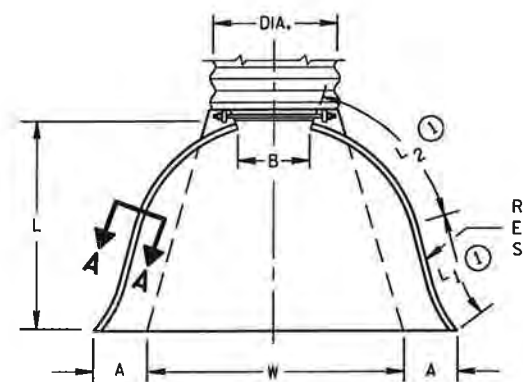
3" X 1" CORRUGATIONS													
EQUIV. DIA. (Inches)	(Inches)		MIN. THICK. (Inches)		DIMENSIONS (Inches)							APPROX. SLOPE	BODY
	SPAN	RISE	STEEL	ALUM.	A (±1")	B (MAX.)	H (±1")	L (±1 1/2")	L1 (1)	L2 (1)	W (±2")		
48	53	41	.109	.105	18	26	12	63	24	72 3/4	90	2 1/2 to 1	2 Pc.
54	60	46	.109	.105	18	30	12	70	30	82 1/4	102	2 to 1	2 Pc.
60	66	51	.109*	.105*	18	33	12	77	—	—	114	1 1/2 to 1	3 Pc.
66	73	55	.109*	.105*	18	36	12	77	—	—	126	1 1/2 to 1	3 Pc.
72	81	59	.109*	.105*	18	39	12	77	—	—	138	2 to 1	3 Pc.
78	87	63	.109*	.105*	22	38	12	77	—	—	148	1 1/2 to 1	3 Pc.
84	95	67	.109*	.105*	22	34	12	77	—	—	162	1 1/2 to 1	3 Pc.
90	103	71	.109*	.105*	22	38	12	77	—	—	174	1 1/2 to 1	3 Pc.
96	112	75	.109*	.105*	24	40	12	77	—	—	174	1 1/2 to 1	3 Pc.

NOTE: ALL SPLICES TO BE LAP RIVETED OR BOLTED. \* EXCEPT CENTER PANEL SEE GENERAL NOTES

REINFORCED CONCRETE PIPE ARCH											
EQUIV. DIA. (Inches)	DIMENSIONS (Inches)								APPROX. SLOPE		
	**SPAN	**RISE	T	A	B	C	D	E			
24	29	18	3	8 1/2	39	33	72	48	3 to 1		
30	36	22	3 1/2	9 1/2	50	46	96	60	3 to 1		
36	44	27	4	11 1/8	60	36	96	72	3 to 1		
42	51	31	4 1/2	15 3/8	60	36	96	78	3 to 1		
48	58	36	5	21	60	36	96	84	3 to 1		
54	65	40	5 1/2	25 1/2	60	36	96	90	3 to 1		
60	73	45	6	31	60	36	96	96	3 to 1		
72	88	54	7	31	60	39	99	120	2 to 1		
84	102	62	8	28 1/2	83	19	102	144	2 to 1		

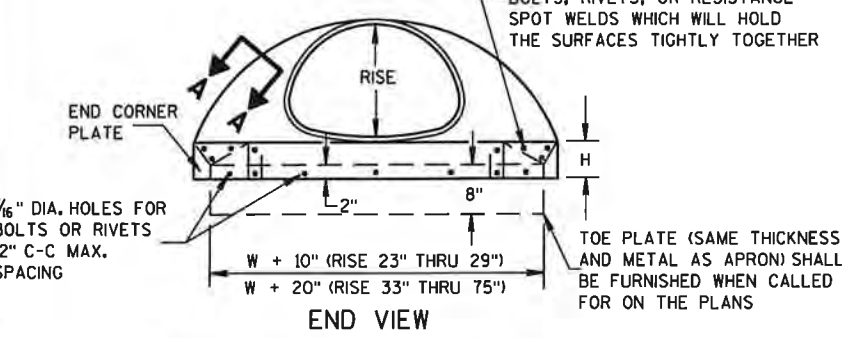
REINFORCED CONCRETE ELLIPTICAL PIPE											
EQUIV. DIA. (Inches)	DIMENSIONS (Inches)								APPROX. SLOPE		
	**SPAN	**RISE	T	A	B	C	D	E			
24	30	19	3 1/4	8 1/2	39	33	72	48	3 to 1		
30	38	24	3 3/4	9 1/2	54	18	72	60	3 to 1		
36	45	29	4 1/2	11 1/8	60	24	84	72	2 1/2 to 1		
42	53	34	5	15 3/4	60	36	96	78	2 1/2 to 1		
48	60	38	5 1/2	21	60	36	96	84	2 1/2 to 1		
54	68	43	6	25 1/2	60	36	96	90	2 1/2 to 1		
60	76	48	6 1/2	30	60	36	96	96	2 1/2 to 1		

\*\*NOMINAL SIZE

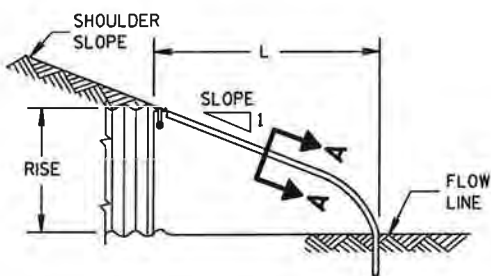


REINFORCED EDGE (SEE SECTION A-A)

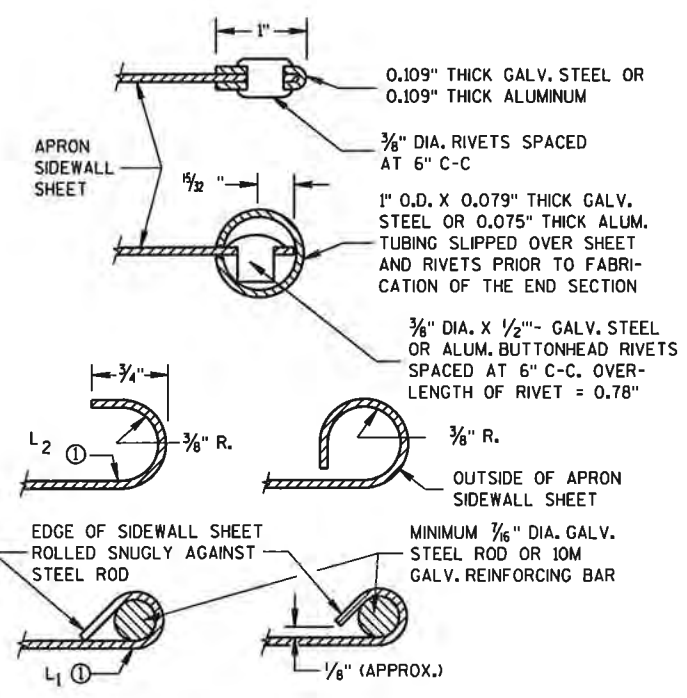
END CORNER PLATES MAY BE FASTENED TO APRON PROPER BY BOLTS, RIVETS, OR RESISTANCE SPOT WELDS WHICH WILL HOLD THE SURFACES TIGHTLY TOGETHER



TOE PLATE (SAME THICKNESS AND METAL AS APRON) SHALL BE FURNISHED WHEN CALLED FOR ON THE PLANS



METAL ENDWALLS

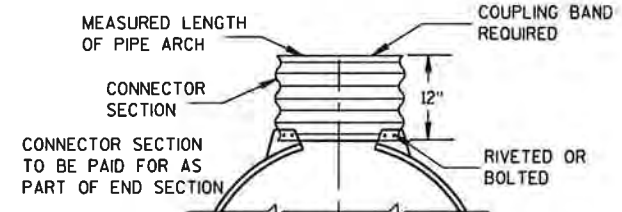


SECTION A-A

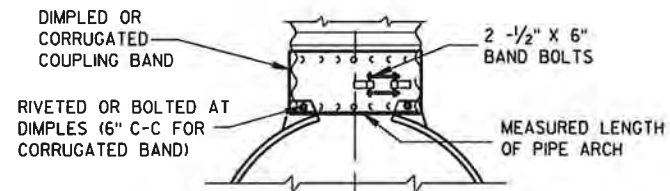
THREADED 1/8" DIA. ROD OVER TOP OF APRON, SIDE LUGS TO BE RIVETED TO APRON



TYPE 2 FOR 17" X 13" THRU 112" X 75" PIPE ARCH



TYPE 3 FOR 64" X 43" THRU 112" X 75" PIPE ARCH



TYPE 5 ALTERNATE FOR: ALL SIZES CORRUGATED PIPE ARCHES

NOTE: DIMPLED BAND FITS OVER OUTSIDE OF ENDWALL, AND CORRUGATED BAND FITS INSIDE ENDWALL.

CONNECTION DETAILS

## GENERAL NOTES

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

CONCRETE APRON ENDWALLS MAY NOT BE USED WITH GALVANIZED STEEL OR ALUMINUM CULVERT PIPE OR VISE VERSA. GALVANIZED STEEL OR ALUMINUM APRON ENDWALLS SHALL NORMALLY BE INSTALLED ON CULVERT PIPE OF THE SAME METAL.

ALL THREE PIECE STEEL APRON ENDWALLS FOR 66" X 51" PIPE ARCH AND LARGER SHALL HAVE 0.109" SIDES AND 0.138" CENTER PANELS. ALL THREE PIECE ALUMINUM APRON ENDWALLS FOR 66" X 51" PIPE ARCH AND LARGER SHALL HAVE 0.105" SIDES AND 0.134" CENTER PANELS. THE WIDTH OF CENTER PANELS SHALL BE GREATER THAN 20 PERCENT OF THE PIPE ARCH PERIMETER.

LAP SEAMS SHALL BE TIGHTLY JOINED BY GALVANIZED RIVETS OR BOLTS FOR STEEL UNITS AND ALUMINUM RIVETS AND BOLTS FOR ALUMINUM UNITS. FOR THE 77" X 52" THROUGH 112" X 75" APRON ENDWALL SIZES, THE REINFORCED EDGES AND CENTER PANEL SEAMS SHALL BE FURTHER REINFORCED WITH GALVANIZED STEEL OR ALUMINUM STIFFENER ANGLES. THE ANGLES SHALL BE ATTACHED BY GALVANIZED NUTS AND BOLTS FOR STEEL UNITS AND ALUMINUM NUTS AND BOLTS FOR ALUMINUM UNITS.

WHERE TWO OR MORE PIPES WITH APRON ENDWALLS ARE LAID ADJACENT TO EACH OTHER, THEY SHALL BE SEPARATED BY A DISTANCE SUFFICIENT TO PROVIDE A MINIMUM CLEARANCE OF 6 INCHES BETWEEN APRON ENDWALLS.

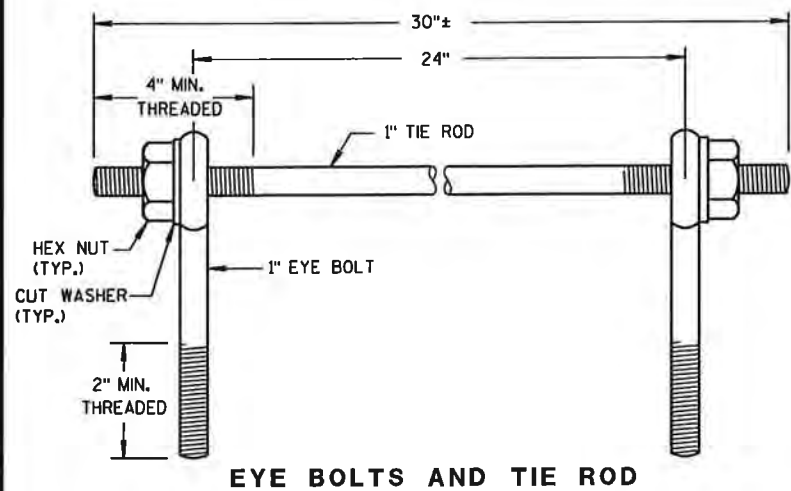
(1) FOR PIPE ARCH SIZES UP TO 73" X 55" A 180° ROLLED EDGE MAY BE USED INSTEAD OF STEEL ROD REINFORCEMENT. SEE SECTION A-A.

## APRON ENDWALLS FOR PIPE ARCH AND ELLIPTICAL PIPE

STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION

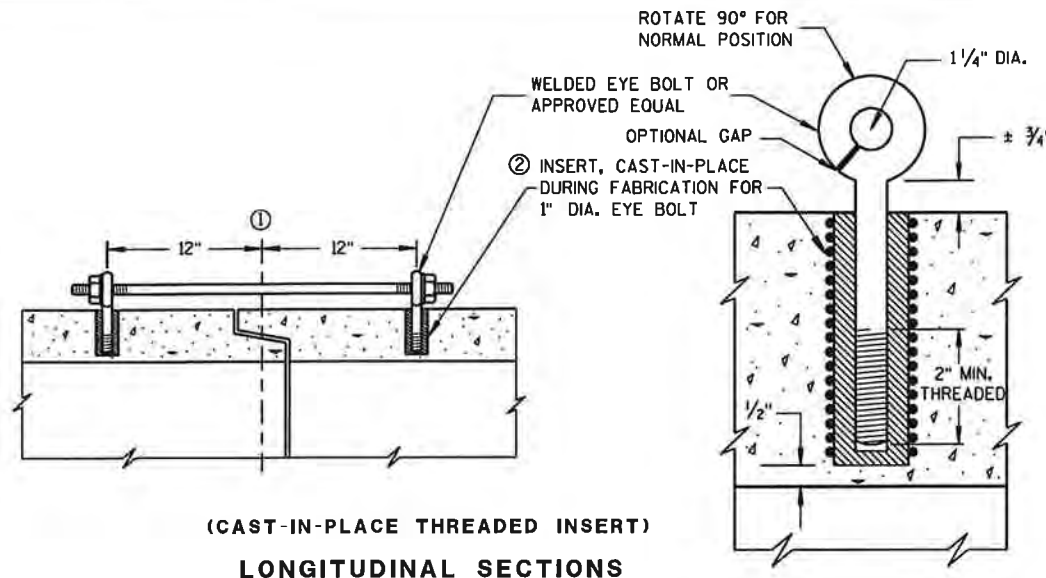
APPROVED 11/30/94 DATE 75/ Rory L. [Signature] CHIEF ROADWAY DE 101 INEER FHWA

# 8F4: Joint Ties for Concrete Pipe



**EYE BOLTS AND TIE ROD**

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



**(CAST-IN-PLACE THREADED INSERT) LONGITUDINAL SECTIONS**

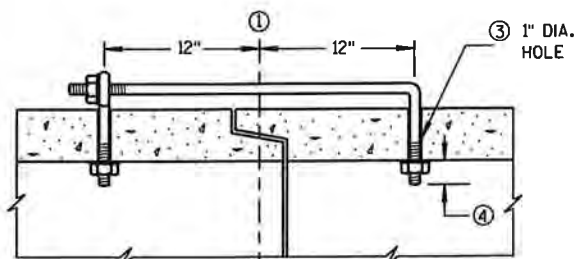
### GENERAL NOTES

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

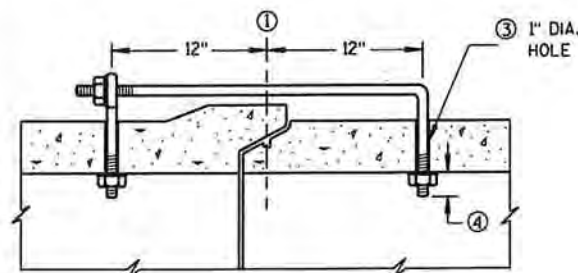
CONCRETE CULVERT PIPE SHALL BE TIED TOGETHER IN THE MANNER ILLUSTRATED BY THIS DETAIL AT LOCATIONS DESIGNATED ON THE PLAN. THE CONTRACTOR MAY USE EITHER ALTERNATE 1, 2 OR 3 FOR DRAINAGE STRUCTURES. ONLY ALTERNATE 1 AND 3 MAY BE USED FOR CATTLE PASSES. UNLESS OTHERWISE STATED IN THE CONTRACT THE MATERIALS, FABRICATION AND WORK NECESSARY TO TIE CULVERT PIPE AS INDICATED ON THE PLANS AND BY THIS DETAIL WILL BE CONSIDERED INCIDENTAL TO CULVERT PIPE, REINFORCED CONCRETE CULVERT PIPE, OR REINFORCED CONCRETE PIPE CATTLE PASS.

DETAILED DRAWINGS FOR PROPOSED ALTERNATE DESIGNS FOR JOINT TIES SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL.

- ①  $\phi$  OF TONGUE AND GROOVE OR BELL AND SPIGOT JOINTS.
- ② THE INSIDE OF THE THREADED INSERTS SHALL BE CLEAN TO ALLOW THE INSERTION OF THREADED EYE BOLTS.
- ③ HOLES SHALL BE CAST-IN-PLACE OR DRILLED 12 INCHES FROM  $\phi$  OF TONGUE AND GROOVE.
- ④ BOLT PROJECTION INSIDE OF PIPE SHALL NOT EXCEED 2 INCHES.
- ⑤ OPENING TO BE ROD DIAMETER PLUS 1 INCH.
- ⑥ LENGTH ADEQUATE TO EXTEND TO WITHIN 1/2 INCH OF THE INNER SURFACE OF THE PIPE.



**(TONGUE & GROOVE PIPE)**



**(MODIFIED BELL PIPE) LONGITUDINAL SECTION**

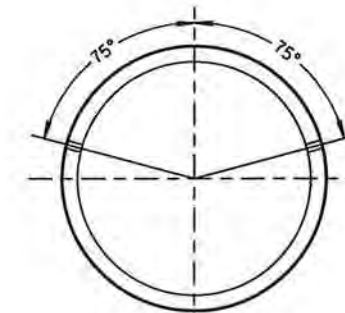
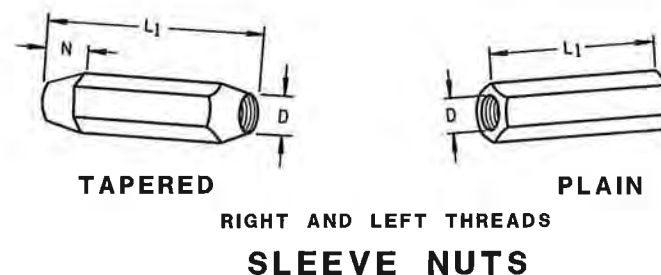
### EYE BOLT DIMENSION TABLE

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

### ADJUSTABLE TIE ROD TABLE

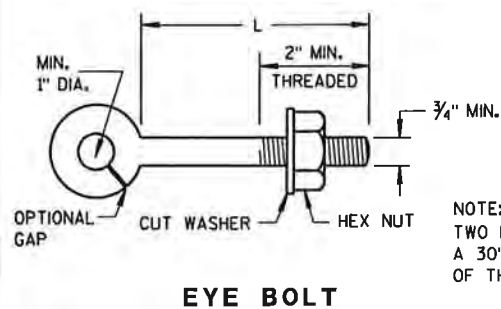
PIPE DIAMETER	TIE ROD DIAMETER	D	L <sub>1</sub>	N
12-60	5/8	5/8	5	1/2
66-84	3/4	3/4	5	1/2
90-108	1	1	7	1 1/8

DIMENSIONS SHOWN ARE IN INCHES



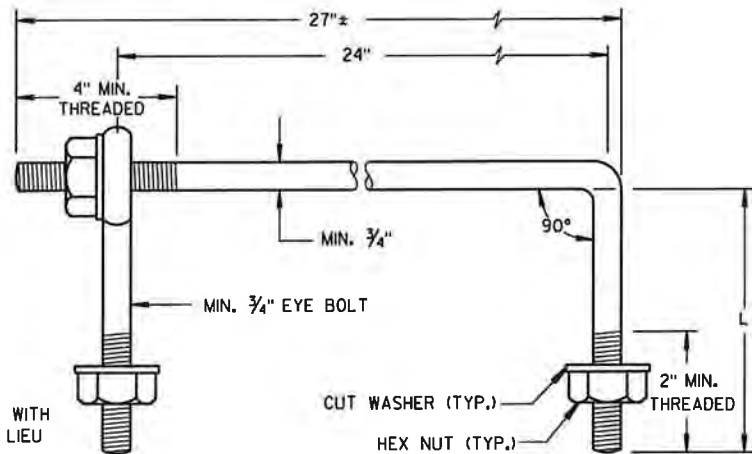
PLACEMENT OF (2) CAST-IN-PLACE INSERTS OR HOLES DURING FABRICATION FOR PIPE SECTIONS REQUIRING TIE RODS

**TRANSVERSE SECTION**



**EYE BOLT**

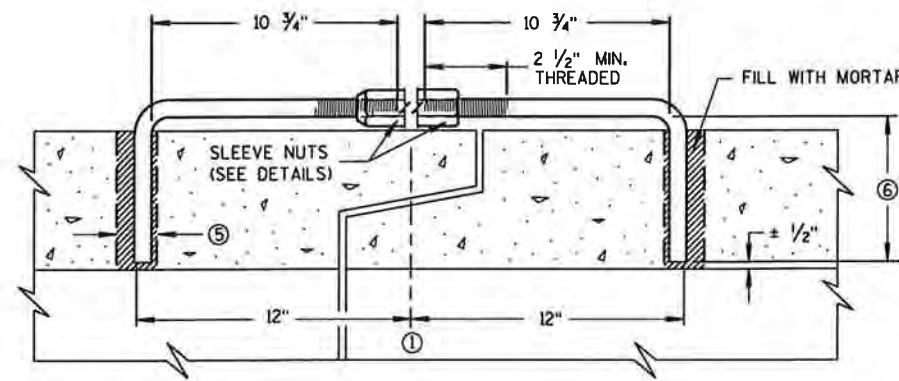
NOTE: TWO EYE BOLTS MAY BE USED WITH A 30" LONG THREADED ROD IN LIEU OF THE 90° BENT TIE ROD.



**EYE BOLT AND TIE ROD**

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

## EYE BOLT AND TIE ROD ASSEMBLY (ALTERNATE NO. 2)



**LONGITUDINAL SECTION**

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

## ADJUSTABLE TIE ROD (ALTERNATE NO. 3)

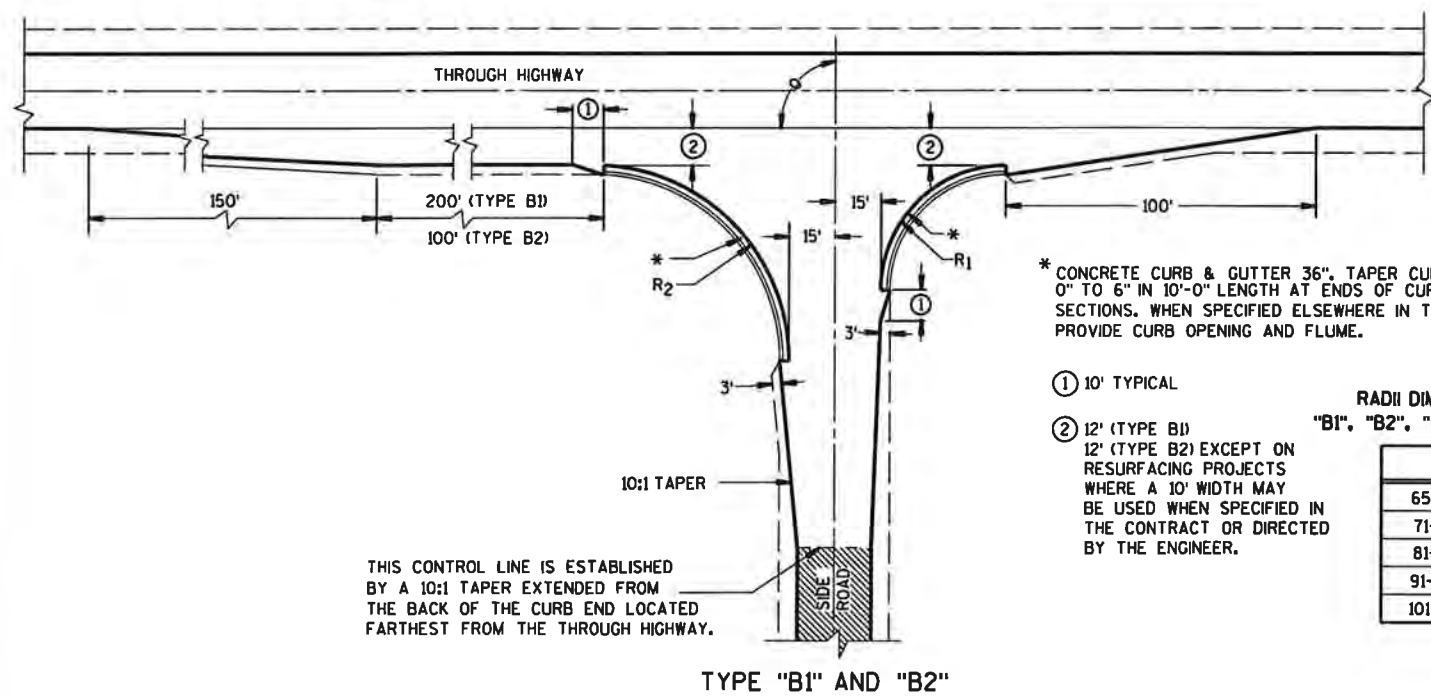
### JOINT TIES FOR CONCRETE PIPE

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED  
DATE 12/17/07  
BY /S/ Jerry H. Zopp  
ROADWAY STAND 102  
ENGINEER

FHWA





THIS CONTROL LINE IS ESTABLISHED BY A 10:1 TAPER EXTENDED FROM THE BACK OF THE CURB END LOCATED FARTHEST FROM THE THROUGH HIGHWAY.

TYPE "B1" AND "B2"

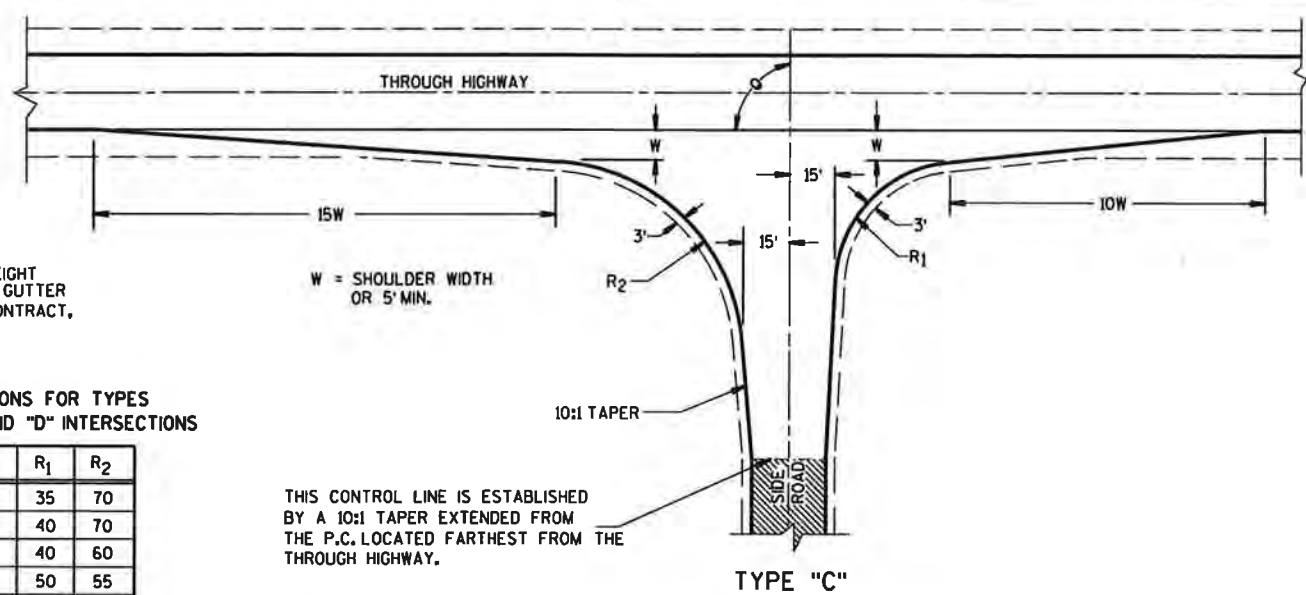
\* CONCRETE CURB & GUTTER 36", TAPER CURB HEIGHT 0" TO 6" IN 10'-0" LENGTH AT ENDS OF CURB & GUTTER SECTIONS. WHEN SPECIFIED ELSEWHERE IN THE CONTRACT, PROVIDE CURB OPENING AND FLUME.

① 10' TYPICAL

② 12' (TYPE B1)  
12' (TYPE B2) EXCEPT ON RESURFACING PROJECTS WHERE A 10' WIDTH MAY BE USED WHEN SPECIFIED IN THE CONTRACT OR DIRECTED BY THE ENGINEER.

RADI DIMENSIONS FOR TYPES "B1", "B2", "C" AND "D" INTERSECTIONS

0	R <sub>1</sub>	R <sub>2</sub>
65-70	35	70
71-80	40	70
81-90	40	60
91-100	50	55
101-110	60	45



THIS CONTROL LINE IS ESTABLISHED BY A 10:1 TAPER EXTENDED FROM THE P.C. LOCATED FARTHEST FROM THE THROUGH HIGHWAY.

TYPE "C"

**GENERAL NOTES**

DESIGNS MAY BE USED INTERCHANGEABLY IN COMBINATION OR SEPARATELY FOR ANY ONE COMPLETE INTERSECTION DEPENDING UPON INTERSECTION ANGLE AND SURFACING OF EACH APPROACH ROADWAY.

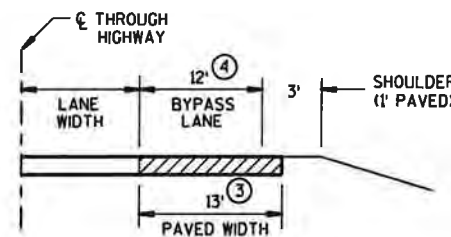
**SIDE ROAD SURFACING NOTE**

WHEN THE SIDE ROAD IS NOT PRESENTLY PAVED, PAVEMENT SHALL BE PLACED TO THE LIMITS SHOWN UNLESS OTHERWISE PROVIDED IN THE CONTRACT, WHERE THE CONSTRUCTION LIMITS ARE BEYOND THE PAVING LIMITS, CRUSHED AGGREGATE SURFACING SHALL BE PLACED BETWEEN THE PAVING LIMITS AND CONSTRUCTION LIMITS.

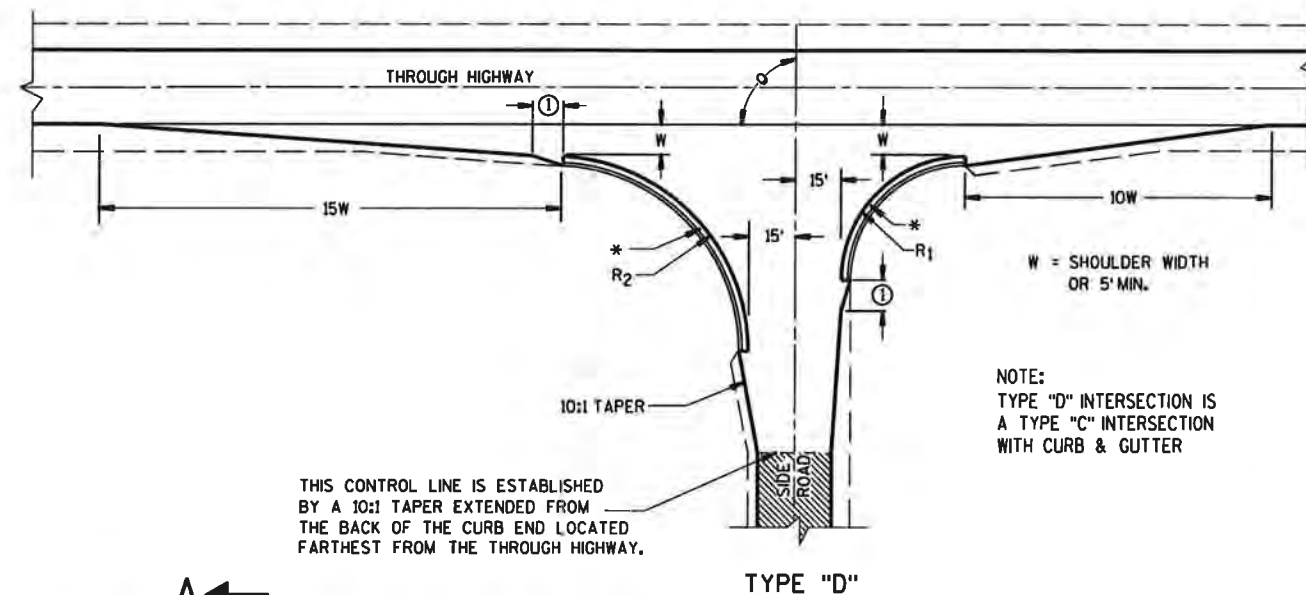
WHEN THE SIDE ROAD IS PRESENTLY PAVED, NEW PAVEMENT SHALL BE PLACED TO THE LIMITS OF DESIGN AS SHOWN AND BEYOND, IF NECESSARY, TO MEET EXISTING PAVEMENT.

WHEN THE SIDE ROAD IS THE CONSTRUCTION PROJECT, THE INTERSECTION SURFACING SHALL BE THE SAME AS FOR THE PROJECT.

EXISTING SURFACE



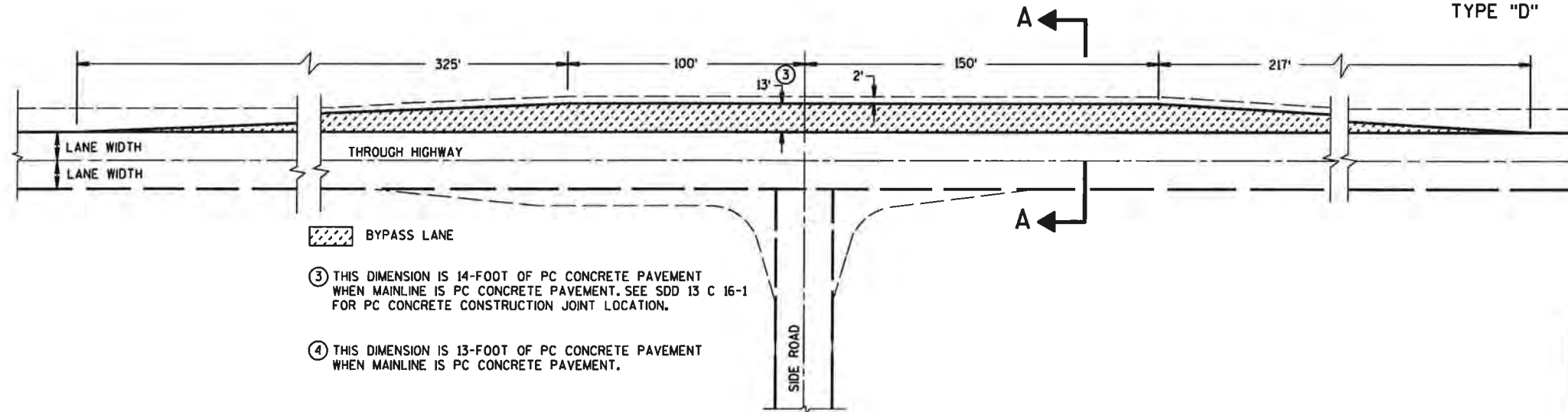
SECTION A-A (SHOWING BYPASS LANE AND SHOULDER)



THIS CONTROL LINE IS ESTABLISHED BY A 10:1 TAPER EXTENDED FROM THE BACK OF THE CURB END LOCATED FARTHEST FROM THE THROUGH HIGHWAY.

TYPE "D"

NOTE: TYPE "D" INTERSECTION IS A TYPE "C" INTERSECTION WITH CURB & GUTTER



BYPASS LANE

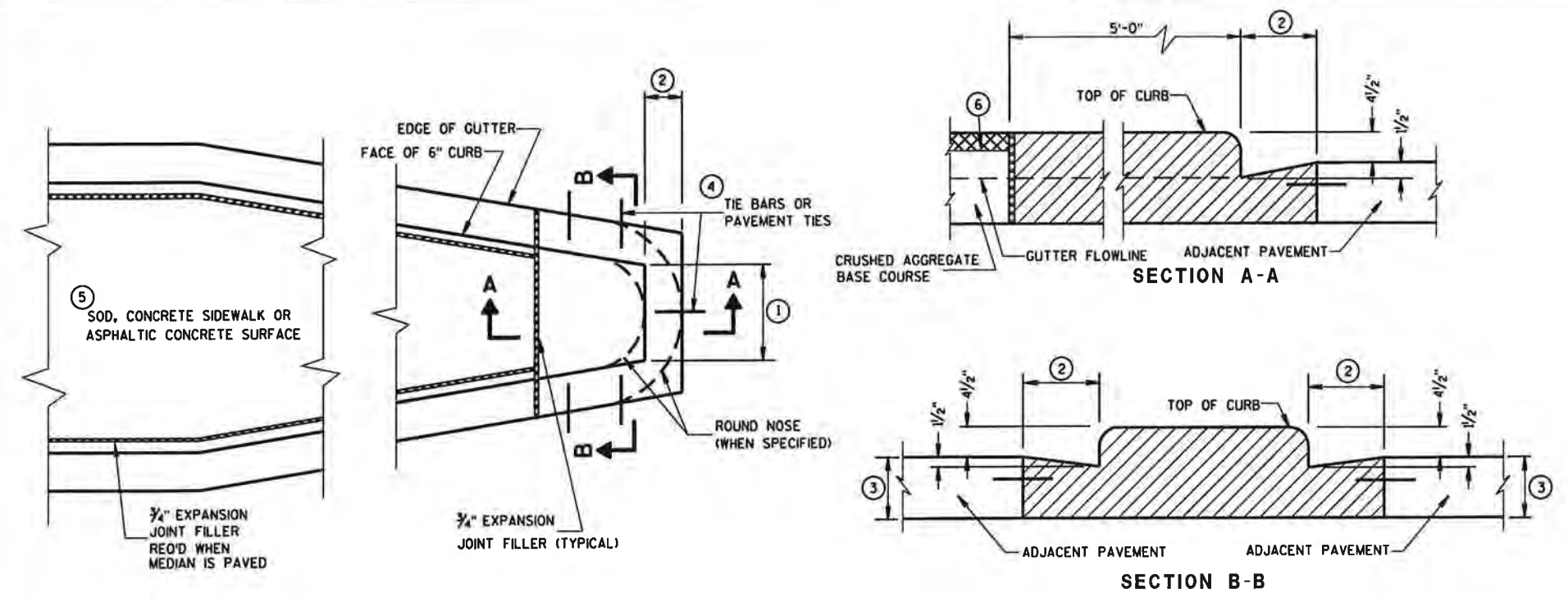
③ THIS DIMENSION IS 14-FOOT OF PC CONCRETE PAVEMENT WHEN MAINLINE IS PC CONCRETE PAVEMENT. SEE SDD 13 C 16-1 FOR PC CONCRETE CONSTRUCTION JOINT LOCATION.

④ THIS DIMENSION IS 13-FOOT OF PC CONCRETE PAVEMENT WHEN MAINLINE IS PC CONCRETE PAVEMENT.

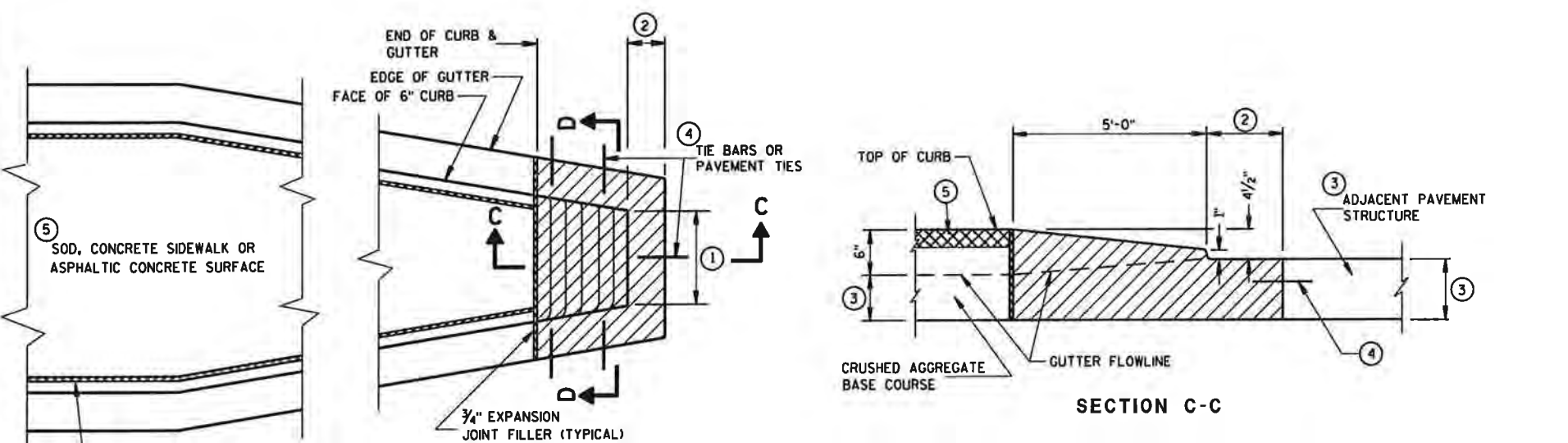
TEE INTERSECTION BYPASS LANE DETAIL

AT-GRADE SIDE ROAD INTERSECTION, TYPES "B1", "B2", "C" AND "D" AND TEE INTERSECTION BYPASS LANE

STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION



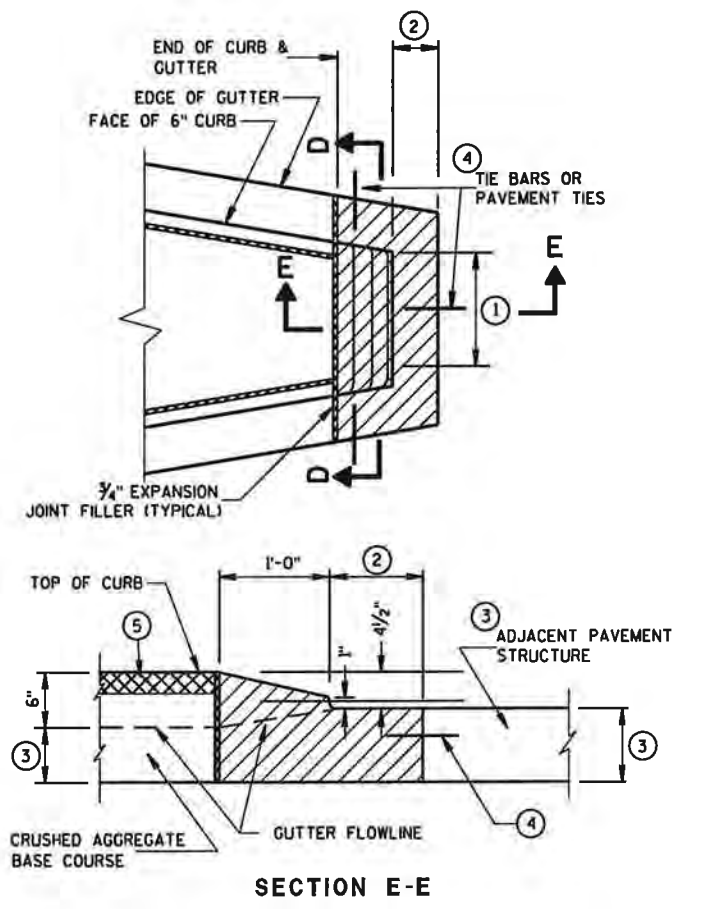
CONCRETE MEDIAN BLUNT NOSE DETAIL



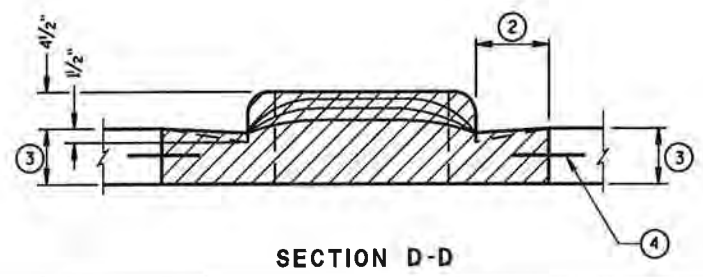
CONCRETE MEDIAN SLOPED NOSE TYPE 1

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 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 2

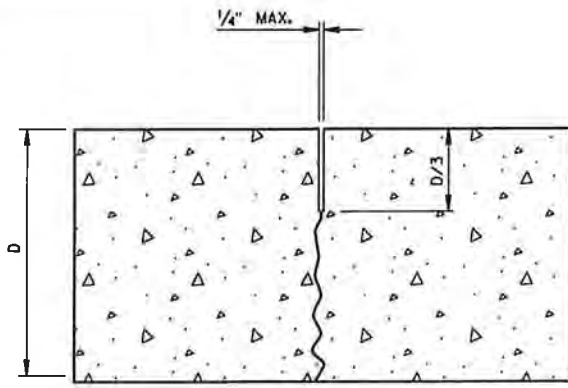


SECTION D-D

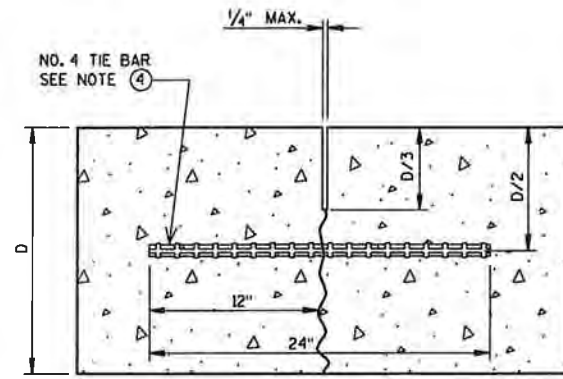
<b>CONCRETE MEDIAN NOSE</b>	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED 6/8/06 DATE	/S/ Jerry H. Zogg ROADWAY STANDARDS DEVELOPMENT ENGINEER
FHWA	

S.D.D. 11B 2-2

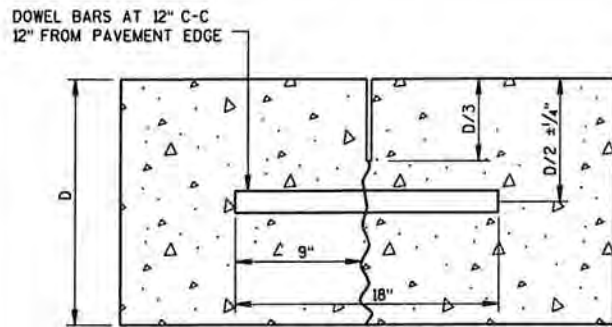
S.D.D. 11B 2-2



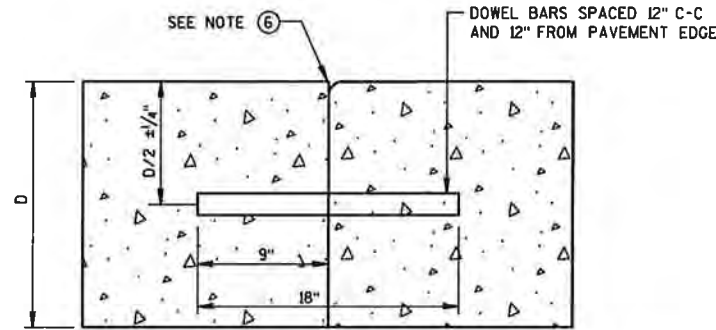
UNDOWELED-TRANSVERSE



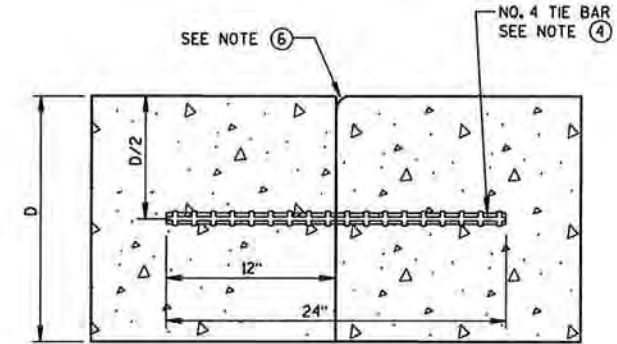
TIED LONGITUDINAL



DOWELED-TRANSVERSE



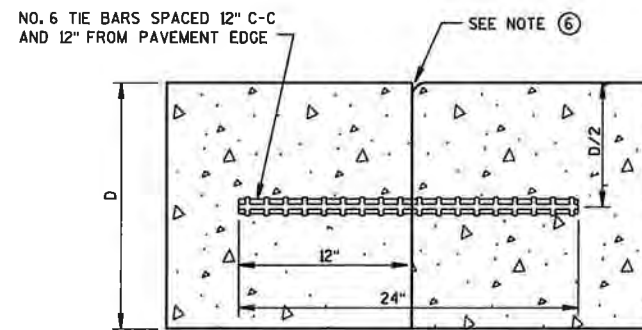
DOWELED TRANSVERSE



TIED LONGITUDINAL

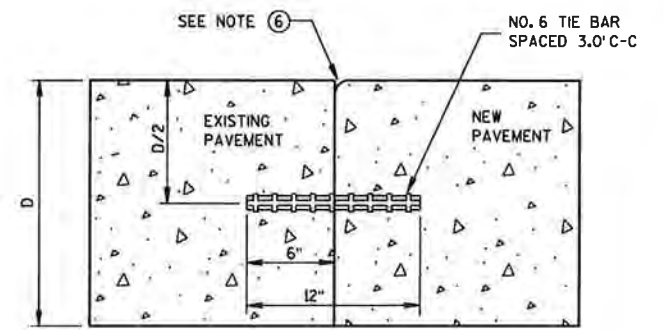
CONTRACTION JOINTS

SEE NOTE ②



TIED TRANSVERSE

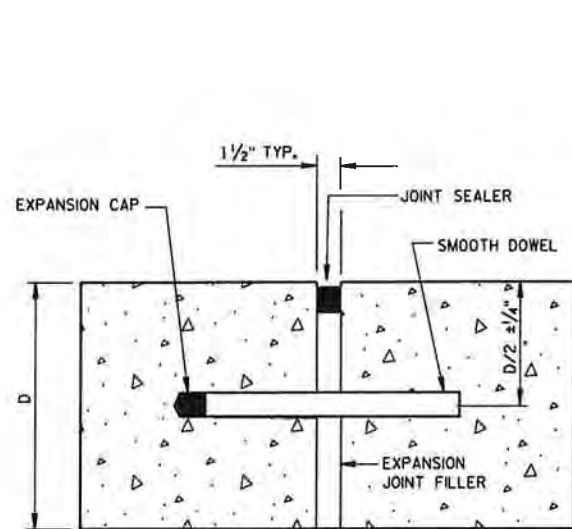
SEE NOTE ③



TIED LONGITUDINAL TO EXISTING

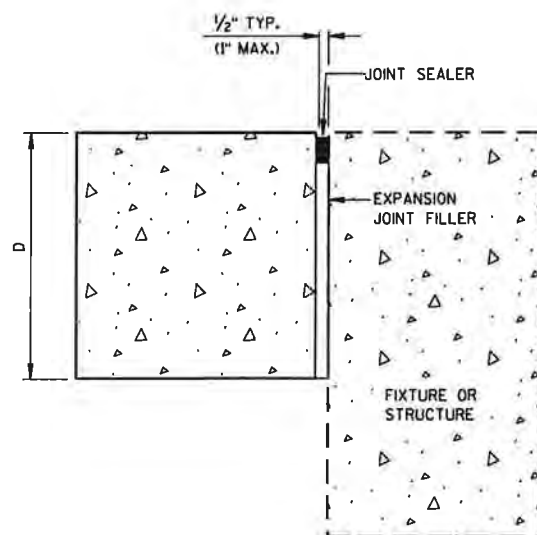
CONSTRUCTION JOINTS

SEE NOTE ⑤



DOWELED-TRANSVERSE

SEE NOTE ①



UNTIED-LONGITUDINAL

EXPANSION JOINTS

GENERAL NOTES

1. USE DOWELED EXPANSION JOINTS ON SIDE ROADS AT INTERSECTIONS (TO ISOLATE THE SIDE ROAD FROM THE THROUGH STREET) IF THE SIDE ROAD IS CONCRETE PAVEMENT AND GREATER THAN 300 FEET IN LENGTH.
2. SPACE CONTRACTION JOINTS IN ACCORDANCE WITH 13C4, 13C11 OR 13C13.
3. LOCATE CONSTRUCTION JOINTS A MINIMUM OF 4 FEET FROM THE NEAREST CONTRACTION JOINT AND ALIGN PARALLEL TO THE CONTRACTION JOINTS.
4. SPACE TIE BARS AT LONGITUDINAL CONSTRUCTION OR CONTRACTION JOINTS IN ACCORDANCE WITH SDD 13CL.
5. CONSTRUCTION JOINTS CAN BE FORMED OR SAWED.
6. IF JOINT IS FORMED, PROVIDE A 1/4-INCH RADIUS.

6

6

S.D.D. 13 C 18-1C

S.D.D. 13 C 18-1C

CONCRETE PAVEMENT  
JOINT TYPES

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

**LEGEND**

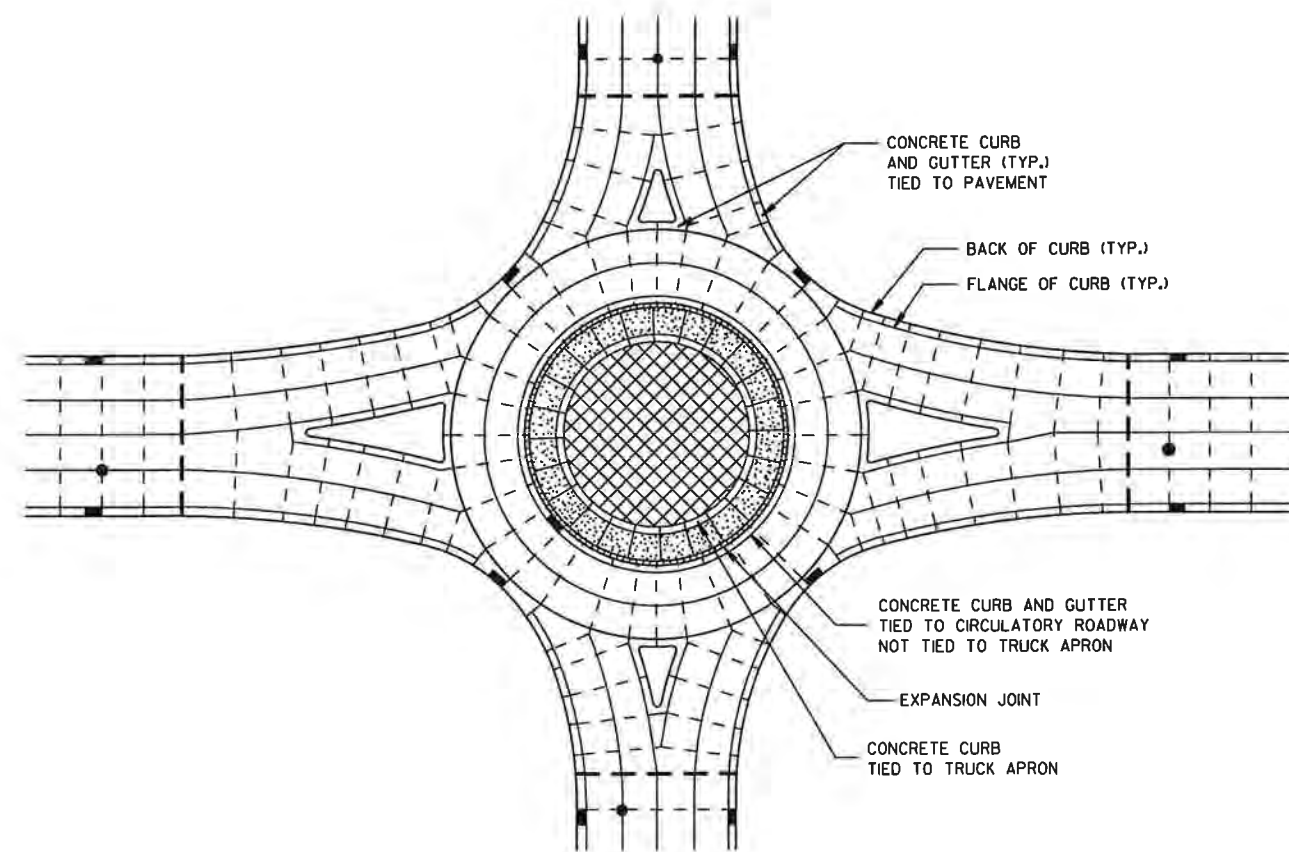
- — DOWELED JOINT
- TIED JOINT
- ▬▬▬ EXPANSION JOINT
- — — POTENTIAL DOWELED EXPANSION JOINT
- ▨ TRUCK APRON
- ▩ CENTRAL ISLAND
- ● UTILITY STRUCTURES

**GENERAL NOTES**

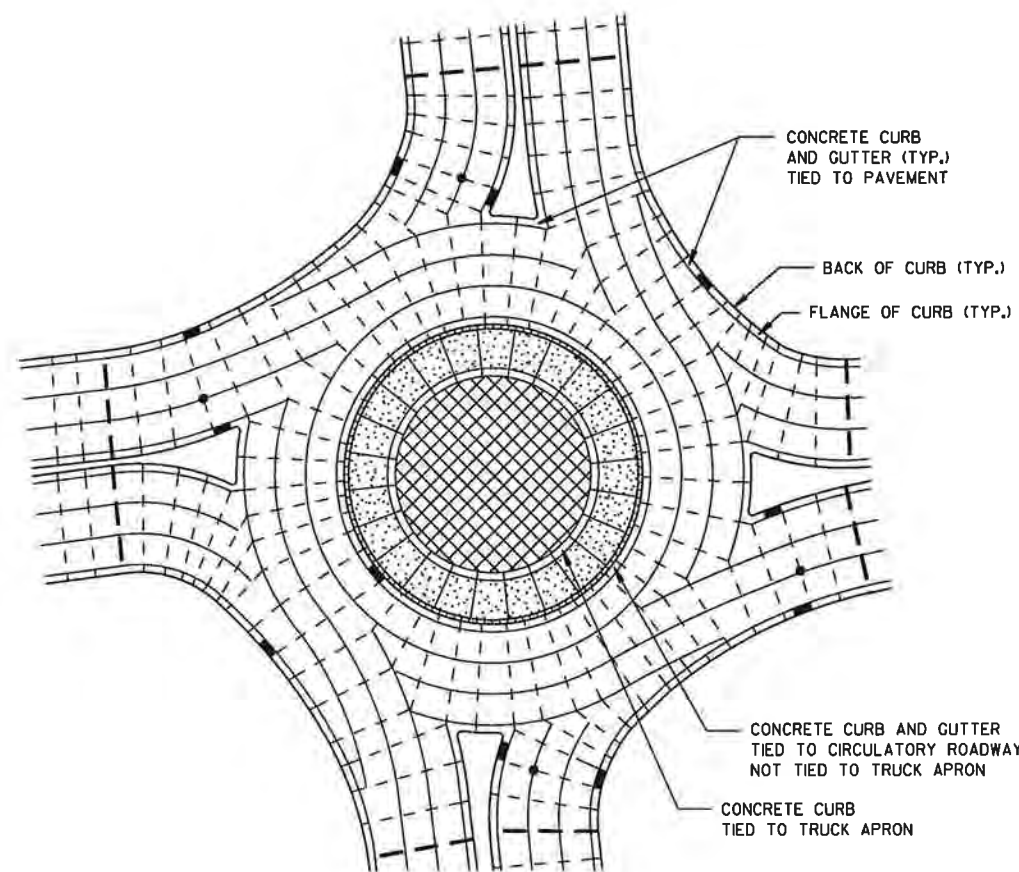
MAXIMUM JOINT SPACING IS IN ACCORDANCE WITH THE TABLE SHOWN ON SDD 13C18-1g.

USE AN EXPANSION JOINT FILLER MEETING THE REQUIREMENTS OF STANDARD SPECIFICATION 415.

DO NOT DOWEL OR TIE THE TRUCK APRON TRANSVERSE JOINTS.



**ISOLATED CIRCLE JOINT LAYOUT FOR ROUNDABOUTS**



**PINWHEEL JOINT LAYOUT FOR ROUNDABOUTS**

6

6

S.D.D. 13 C 18-1e

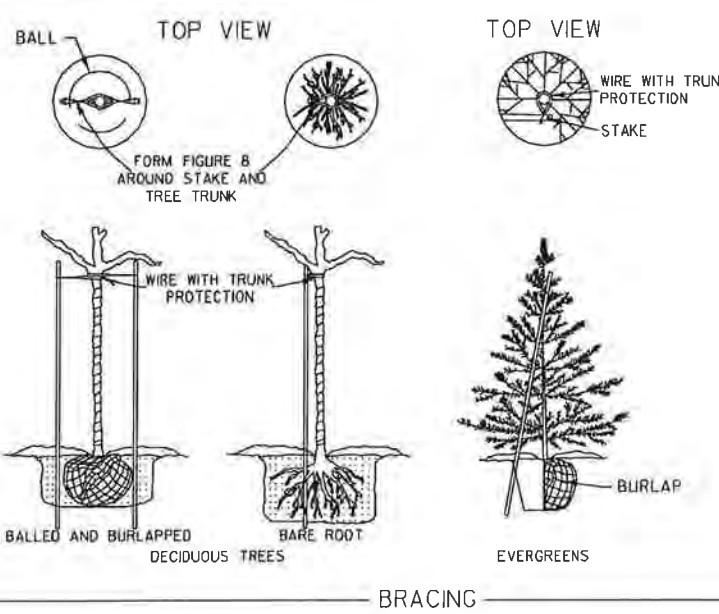
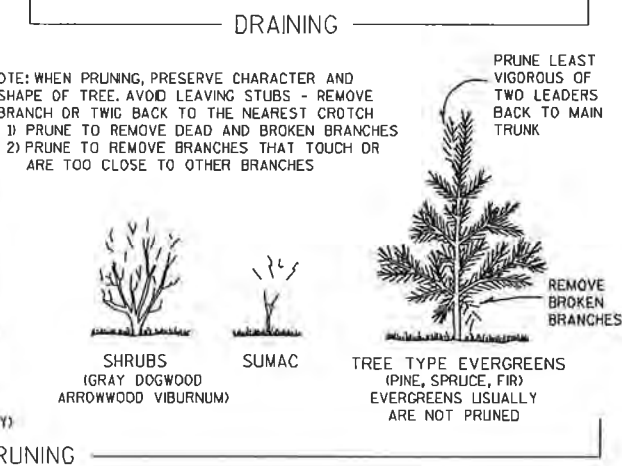
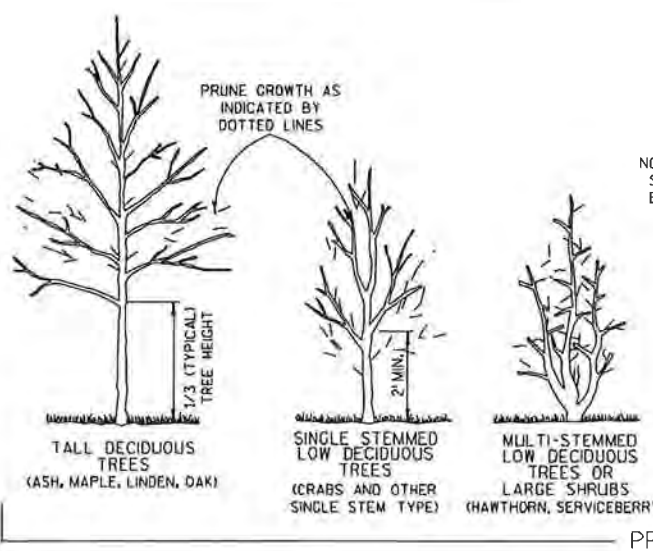
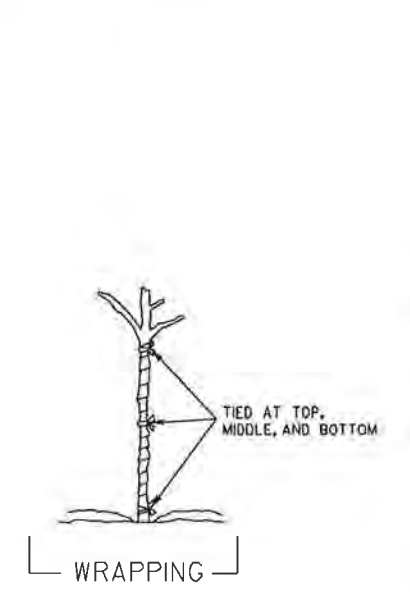
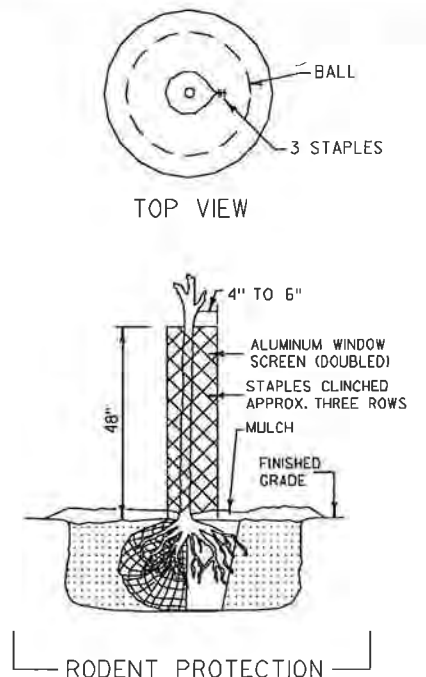
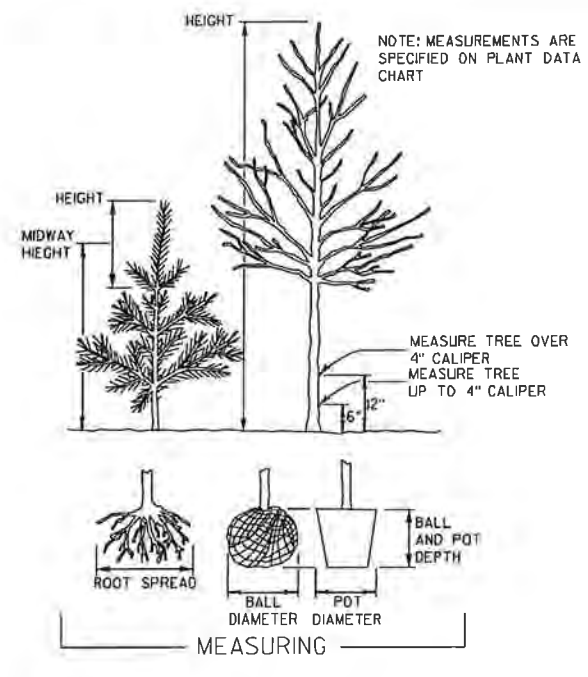
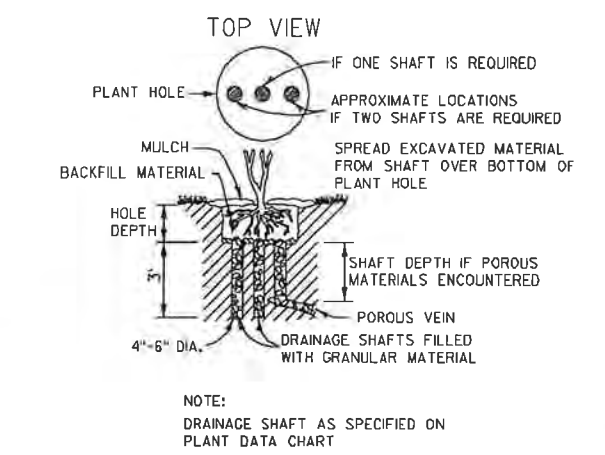
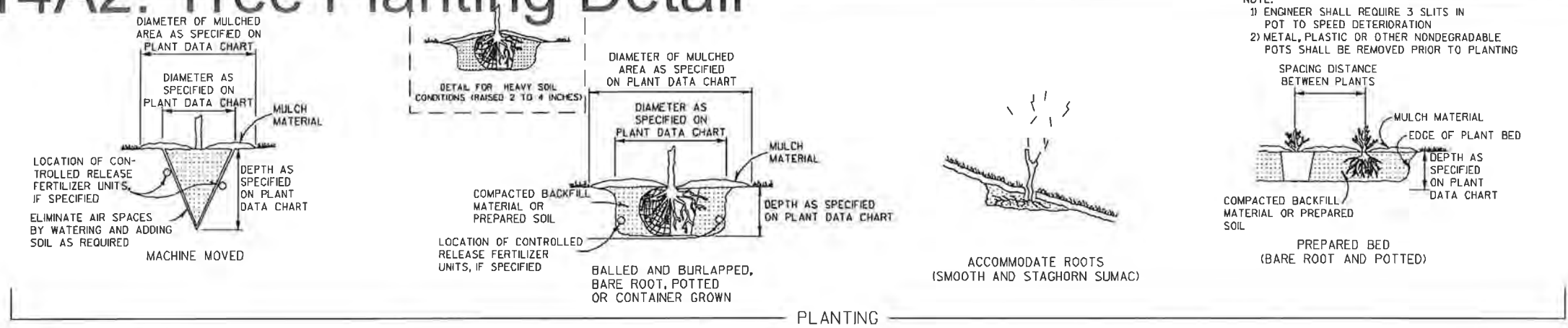
S.D.D. 13 C 18-1e

<b>CONCRETE PAVEMENT JOINTING AND STEEL REINFORCEMENT IN ROUNDABOUTS</b>	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED 10-5-2010 DATE	/S/ Deb Bischoff PAVEMENT POLICY & DESIGN ENGINEER
FHWA 106	



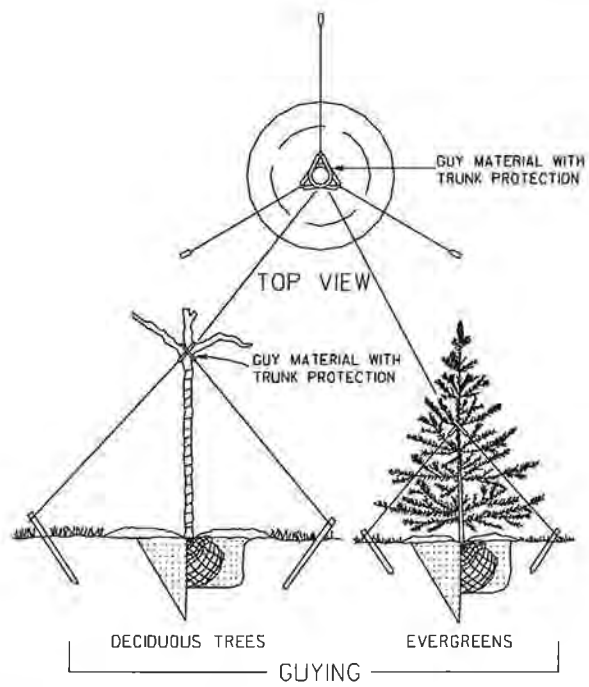
# 14A2: Tree Planting Detail

REVISION DATE: PLOT NAME: PLOT SCALE: FILE NAME: ORIGINATOR: S.D.D. 14 A 2-1

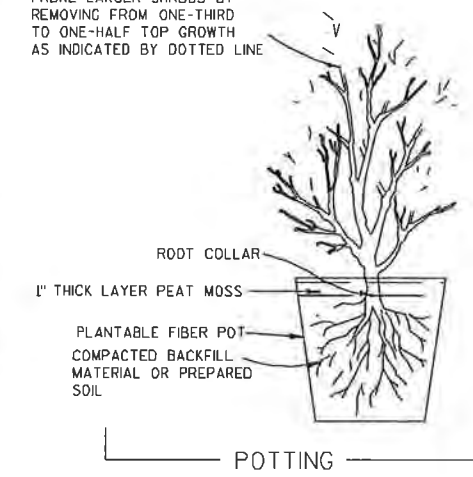


NOTE: BRACING STAKE

- 1) SHALL BE DRIVEN INTO THE GROUND AS CLOSE TO THE TREE AS POSSIBLE WITHOUT DAMAGING THE BRANCHES.
- 2) MAY BE DRIVEN AT SUCH AN ANGLE THAT IT DOES NOT PENETRATE THE BALL OR POT.
- 3) SHALL NOT PROTRUDE ABOVE THE TOP OF THE TREE; AND
- 4) SHALL HAVE A HOLE NEAR THE TOP TO HOLD THE WIRE IN PLACE.



PRUNE LARGER SHRUBS BY REMOVING FROM ONE-THIRD TO ONE-HALF TOP GROWTH AS INDICATED BY DOTTED LINE



**NOTES**

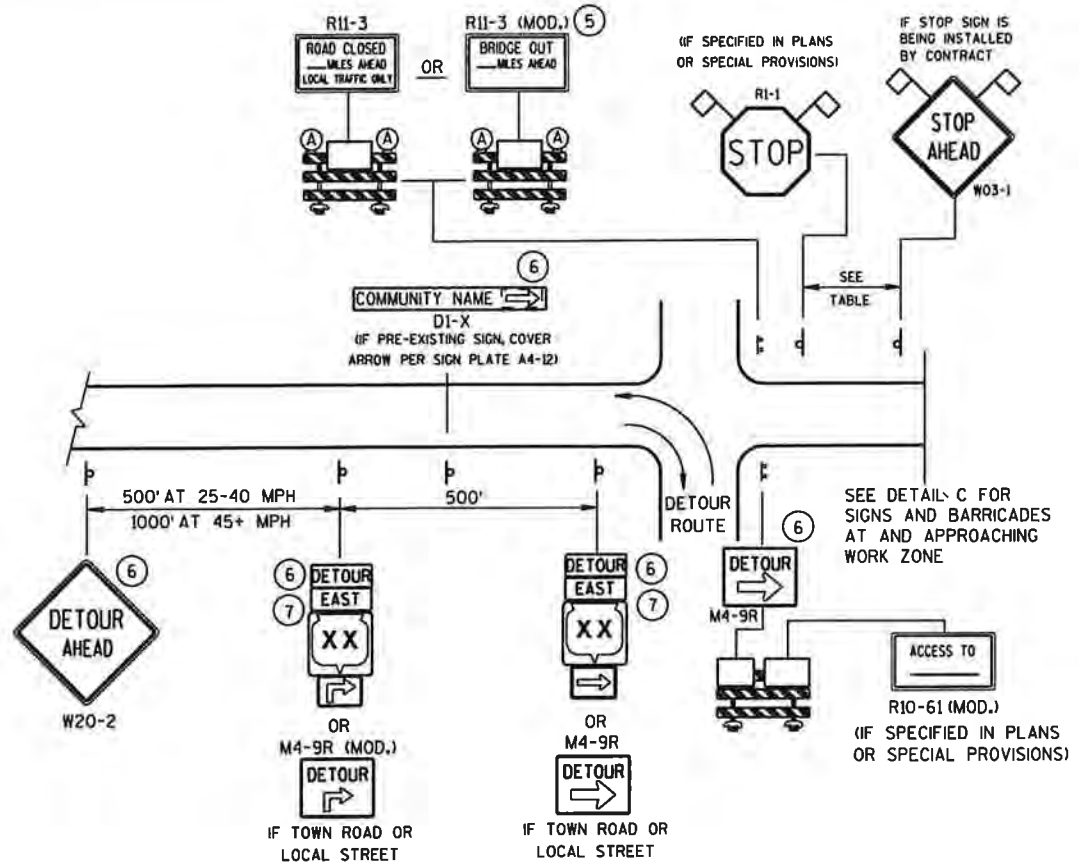
DETAILS OF CONSTRUCTION NOT SHOWN ON THIS DRAWING SHALL CONFORM TO THE PERTINENT REQUIREMENTS OF THE STANDARD SPECIFICATIONS AND THE APPLICABLE SPECIAL PROVISIONS.

BRACING, WRAPPING, GUYING, RODENT PROTECTION, FERTILIZER AND MULCH SHALL BE USED ONLY WHEN SPECIFIED ON THE PLANT DATA CHART (PART OF PLAN) OR SPECIAL PROVISIONS.

TREE PLANTING DETAIL	
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION	
APPROVED	
DATE	CHIEF METHODS DEVELOPMENT ENGINEER
FHWA	

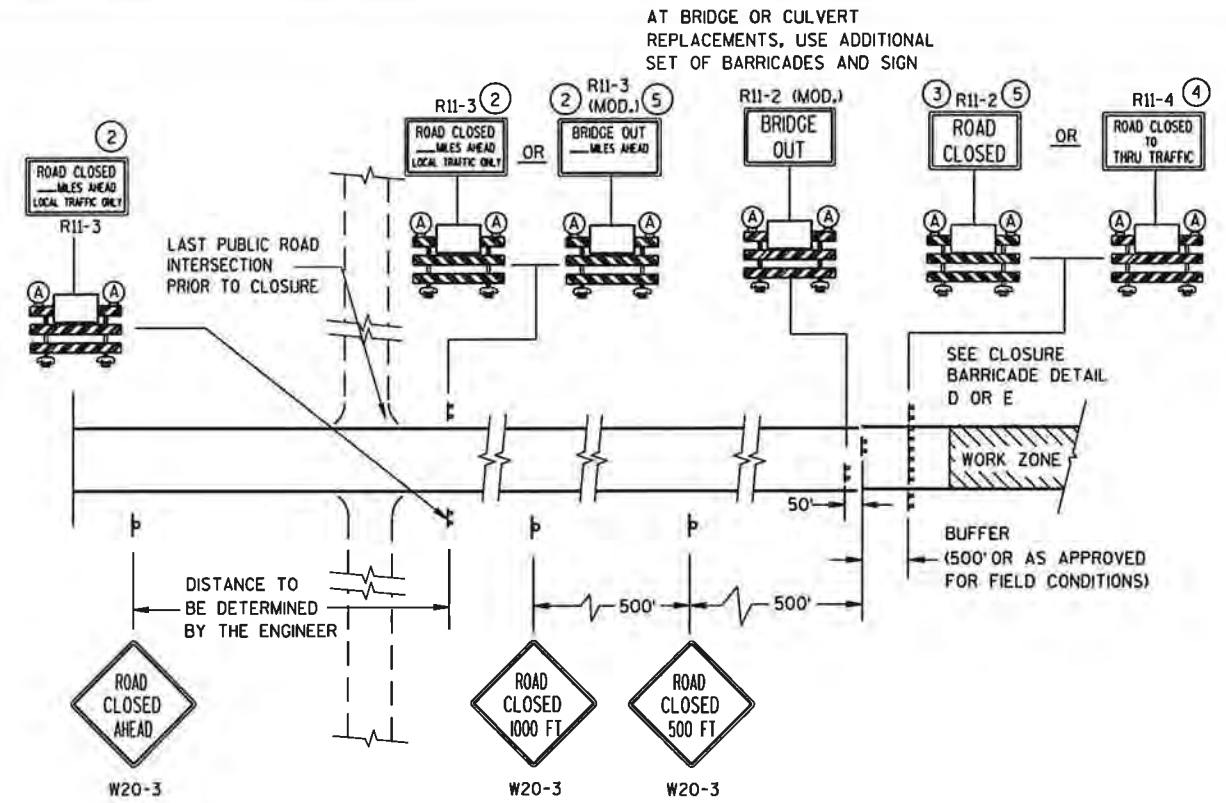
AT BRIDGE OR CULVERT REPLACEMENTS, USE ADDITIONAL SET OF BARRICADES AND SIGN

SPEED LIMIT (MPH)	"STOP AHEAD" ADVANCING WARNING DISTANCE (FT)
25	200
30	200
35	350
40	350
45	500
50	550
55	750



**DETAIL A**  
**MAINLINE CLOSURE WITH POSTED DETOUR**

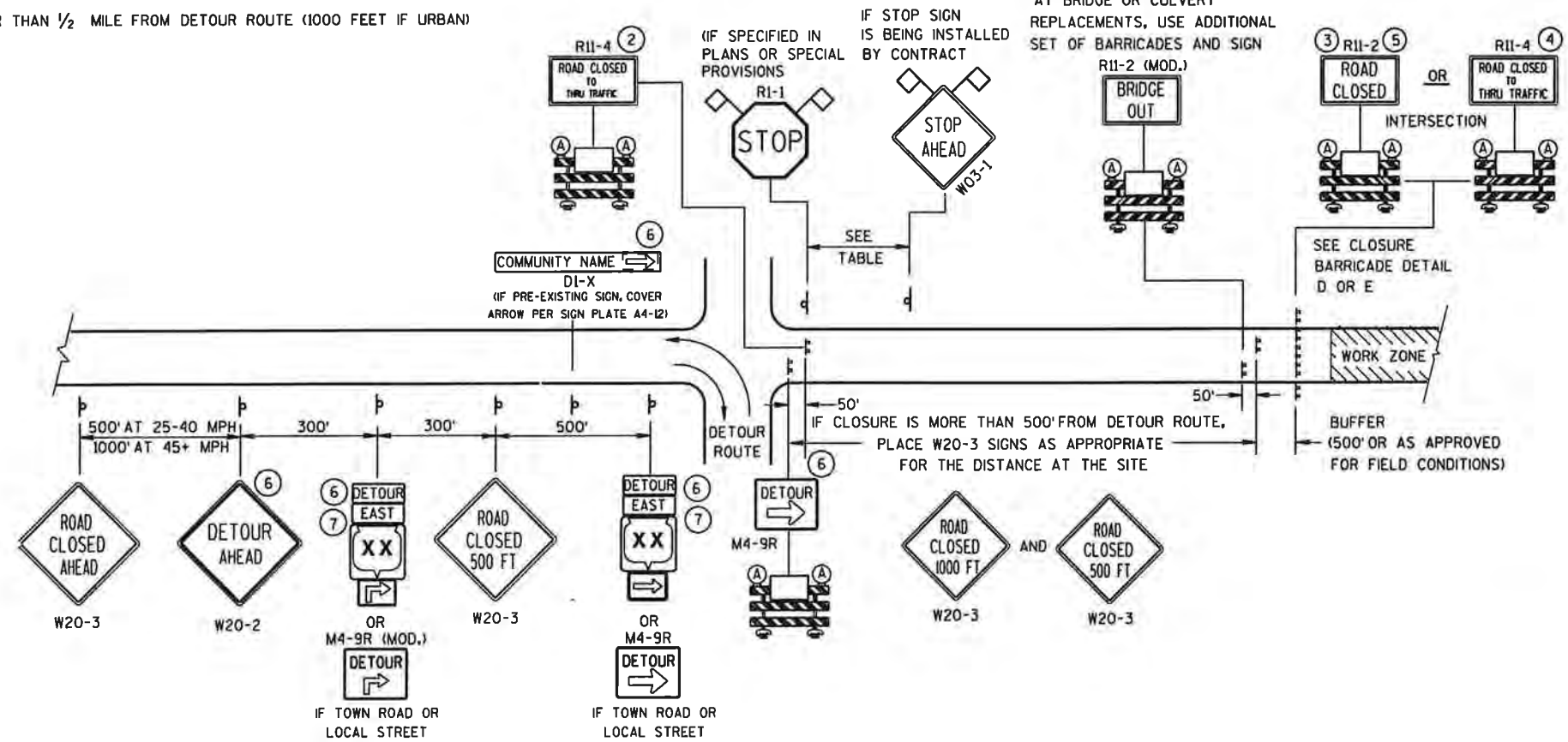
WORK ZONE GREATER THAN 1/2 MILE FROM DETOUR ROUTE (1000 FEET IF URBAN)



**DETAIL C**  
**MAINLINE CLOSURE, NO POSTED DETOUR**

DISTANCE TO BE DETERMINED BY THE ENGINEER

SEE SDD 15C2-4b FOR GENERAL NOTES AND FOOTNOTES ① THROUGH ⑦



**DETAIL B**  
**MAINLINE CLOSURE WITH POSTED DETOUR**

WORK ZONE LESS THAN 1/2 MILE FROM DETOUR ROUTE (1000 FEET IF URBAN)

**LEGEND**

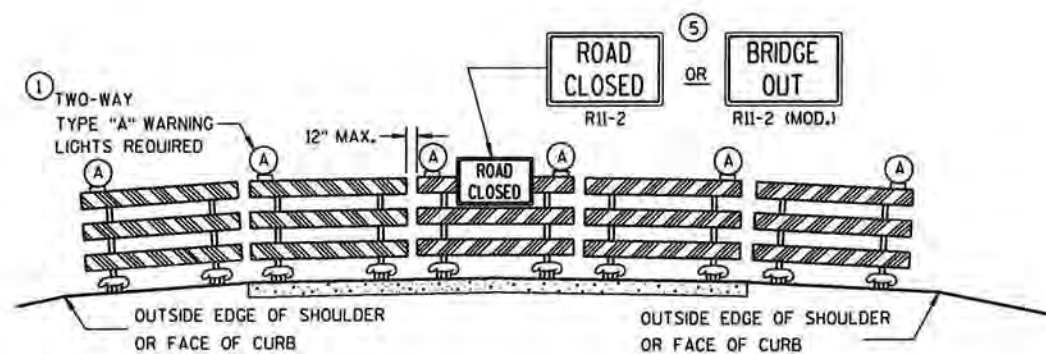
- ⌋ POST MOUNTED SIGN
- ⌋ TYPE III BARRICADES
- Ⓐ TYPE "A" LOW INTENSITY FLASHING WARNING LIGHT (FOR NIGHT USE)
- ▨ WORK ZONE
- DETOUR EAST M4-8 M3-X
- XX OR COUNTY XX OR XX MI-4 MI-5A MI-6
- ⌋ OR ⌋ M05-1 M06-1
- ◇ FLAGS, 16" X 16" MIN., (ORANGE)

**BARRICADES AND SIGNS FOR MAINLINE CLOSURES**

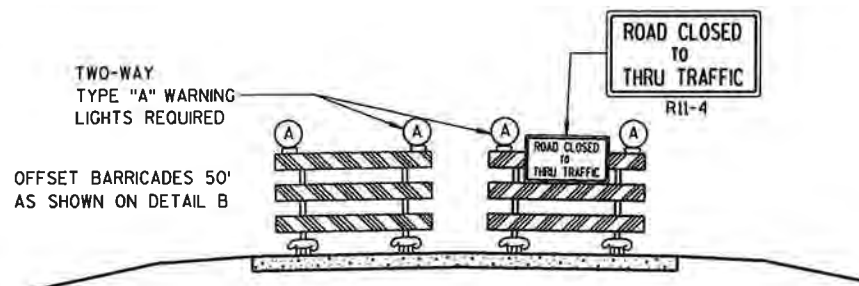
STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

6

6



**DETAIL D**  
**ROAD CLOSURE BARRICADE DETAIL**  
APPROACH VIEW



**DETAIL E**  
**LANE CLOSURE BARRICADE DETAIL**  
APPROACH VIEW

SEE SDD 15C2-4a FOR LEGEND

**GENERAL NOTES**

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

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

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

BARRICADES THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY RE-ESTABLISHED UPON COMPLETION OF THE OPERATION OR, FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

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

ALL TYPE III BARRICADES SHALL HAVE RAILS REFLECTORIZED ON BOTH FACES. STRIPES SHALL BE PROPERLY SLOPED DOWN TOWARD THE TRAFFIC SIDE OR AS SHOWN IN THE ROAD CLOSURE BARRICADE DETAIL D FOR FULL ROAD CLOSURES.

TYPE "A" LOW-INTENSITY FLASHING WARNING LIGHTS SHALL BE VISIBLE ON BOTH SIDES OF THE BARRICADE.

THE R11-2, R11-3, M4-9, R11-4 AND R10-61 SIGNS PLACED ON BARRICADES SHALL COVER NO MORE THAN THE TOP RAIL. THE SIGNS SHALL NOT COVER ANY PORTION OF THE MIDDLE OR BOTTOM RAILS.

THE REFLECTIVE SHEETING USED ON R11-2, R11-3, R11-4, R10-61 AND R1-1 SIGNS SHALL COMPLY WITH SUBSECTION 637.2.2.2 OF THE STANDARD SPECIFICATIONS.

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

ALL SIGNS SHALL BE 48" X 48" UNLESS OTHERWISE NOTED BELOW:

- R11-2 SHALL BE 48" X 30".
- R11-3, R11-4 AND R10-61 SHALL BE 60" X 30".
- M4-9 SHALL BE 30" X 24".
- M3-X AND M4-8 SHALL BE 24" X 12". (30" X 15" IF NEEDED TO MATCH EXISTING SIGNS.)
- M1-4, M1-5A, AND M1-6 SHALL BE 24" X 24". (36" X 36" IF NEEDED TO MATCH EXISTING SIGNS.)
- M05-1 AND M06-1 SHALL BE 21" X 21". (30" X 30" IF NEEDED TO MATCH EXISTING SIGNS.)
- D1-X SHALL BE AS SHOWN ON SPECIFIC PROJECT SIGNING DETAIL SHEETS.
- R1-1 SHALL BE 36" X 36".

- 1 TWO WARNING LIGHTS SHALL BE PROVIDED ON THE CENTER BARRICADE AND A MINIMUM OF ONE WARNING LIGHT SHALL BE PROVIDED ON EACH OF THE OTHER BARRICADES WITHIN THE ROADWAY LIMITS. SPACING OF THE WARNING LIGHTS SHALL BE UNIFORM TO THE EDGE OF ROADWAY AS SHOWN (APPROX. 8-FOOT LIGHT SPACING).
- 2 THESE SIGNS AND BARRICADES ARE NOT REQUIRED IF ROAD CLOSURE BEGINS AT INTERSECTION.
- 3 FOR ROAD CLOSURE WITHOUT LOCAL ACCESS TO PROJECT, SEE ROAD CLOSURE BARRICADE DETAIL D.
- 4 FOR ROAD CLOSURE WITH LOCAL ACCESS TO PROJECT, SEE LANE CLOSURE BARRICADE DETAIL E.
- 5 FOR BRIDGE OR CULVERT REPLACEMENTS, SUBSTITUTE "BRIDGE OUT" INSTEAD OF "ROAD CLOSED" ON R11-2 AND R11-3 SIGNS.
- 6 INSTALL DETOUR AND COMMUNITY GUIDE SIGNS AND ARROWS ONLY IF SPECIFIED IN THE CONTRACT. IF THERE ARE EXISTING ROUTE MARKER ASSEMBLIES THAT WILL REMAIN IN PLACE, ADJUST THE LOCATION OF THE DETOUR ROUTE SIGNS TO CORRESPOND WITH THE EXISTING ASSEMBLIES. MODIFY EXISTING SIGNS WHERE POSSIBLE. SEE SPECIFIC PROJECT DETOUR SIGNING DETAIL SHEETS. IF DETOUR SIGNS ARE BEING INSTALLED BY OTHERS, PLACE THE CONTRACTED TRAFFIC CONTROL SIGNS TO ALLOW FOR PLACEMENT OF ALL WARNING, DETOUR AND GUIDE SIGNS AS SHOWN.
- 7 "EAST" CARDINAL DIRECTION MARKERS AND RIGHT TURN ARROWS ARE SHOWN. USE OTHER CARDINAL DIRECTIONS AND ARROWS AS APPROPRIATE.

**BARRICADES AND SIGNS  
FOR  
MAINLINE CLOSURES**

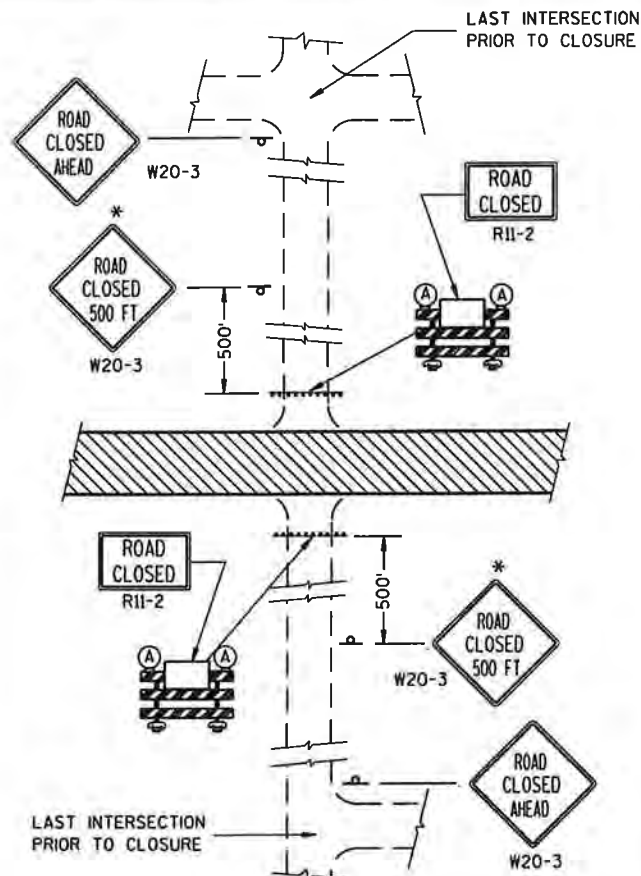
STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED

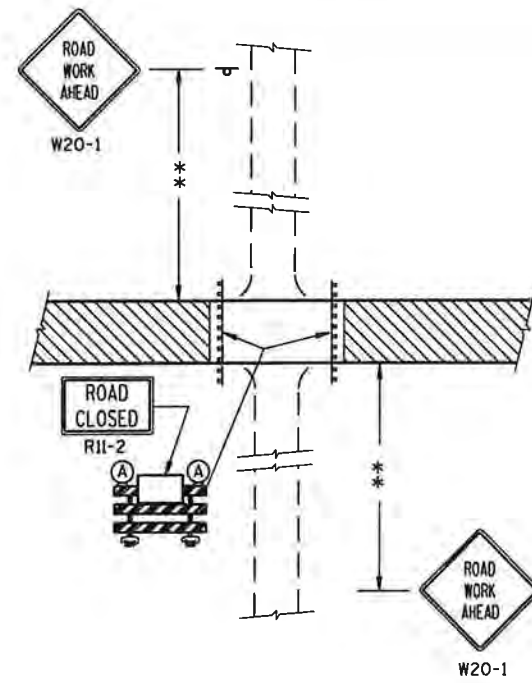
9/16/03 /S/ Thomas A. Neer  
DATE CHIEF SIGNS AND 109

FHWA

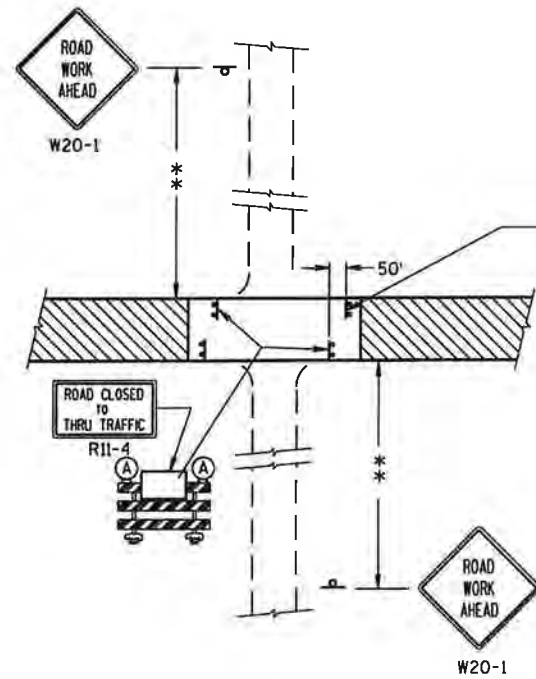
# 15C3: Barricades and Signs for Sideroad Closures



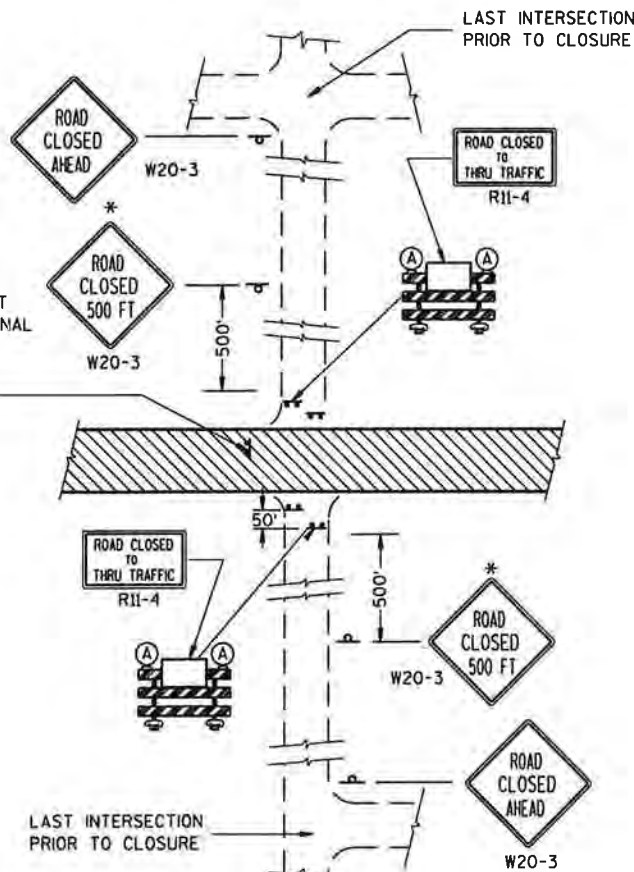
**DETAIL 1**  
(NO ACCESS TO PROJECT)



**DETAIL 2**  
(PUBLIC CROSS-TRAFFIC MAINTAINED,  
NO ACCESS TO PROJECT).



**DETAIL 3**  
(PUBLIC CROSS-TRAFFIC MAINTAINED, CONTRACTOR,  
LOCAL BUSINESS AND RESIDENT ACCESS).



**DETAIL 4**  
(CONTRACTOR, LOCAL BUSINESS AND  
RESIDENT ACCESS TO PROJECT)

## GENERAL NOTES

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

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

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

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

BARRICADES THAT MUST BE MOVED FOR A WORK OPERATION SHALL BE IMMEDIATELY RE-ESTABLISHED UPON COMPLETION OF THE OPERATION OR, FOR CONTINUING OPERATIONS, AT THE END OF EACH WORKING DAY.

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

ALL TYPE III BARRICADES SHALL HAVE RAILS REFLECTORIZED ON BOTH FACES. STRIPES SHALL BE PROPERLY SLOPED DOWN TOWARD THE TRAFFIC SIDE OR AS SHOWN IN THE ROAD CLOSURE BARRICADE DETAIL D FOR FULL ROAD CLOSURES.

TYPE "A" LOW-INTENSITY FLASHING WARNING LIGHTS SHALL BE VISIBLE ON BOTH SIDES OF THE BARRICADE.

THE R11-2, R11-3 AND R11-4 SIGNS PLACED ON BARRICADES SHALL COVER NO MORE THAN THE TOP RAIL. THE SIGNS SHALL NOT COVER ANY PORTION OF THE MIDDLE OR BOTTOM RAILS.

THE REFLECTIVE SHEETING USED ON R11-2, R11-3 AND R11-4 SIGNS SHALL COMPLY WITH SUBSECTION 637.2.2.2 OF THE STANDARD SPECIFICATIONS.

ALL SIGNS SHALL BE 48" X 48" UNLESS OTHERWISE NOTED BELOW:  
R11-2 SHALL BE 48" X 30".  
R11-4 AND R11-3 SHALL BE 60" X 30".

\*OMIT THE "ROAD CLOSED 500 FT." SIGN IF THE LAST INTERSECTION IS 500 FT. OR LESS FROM THE WORK ZONE.

\*\*500' MAX. OR AT LAST INTERSECTION WHICHEVER IS CLOSER.

## LEGEND

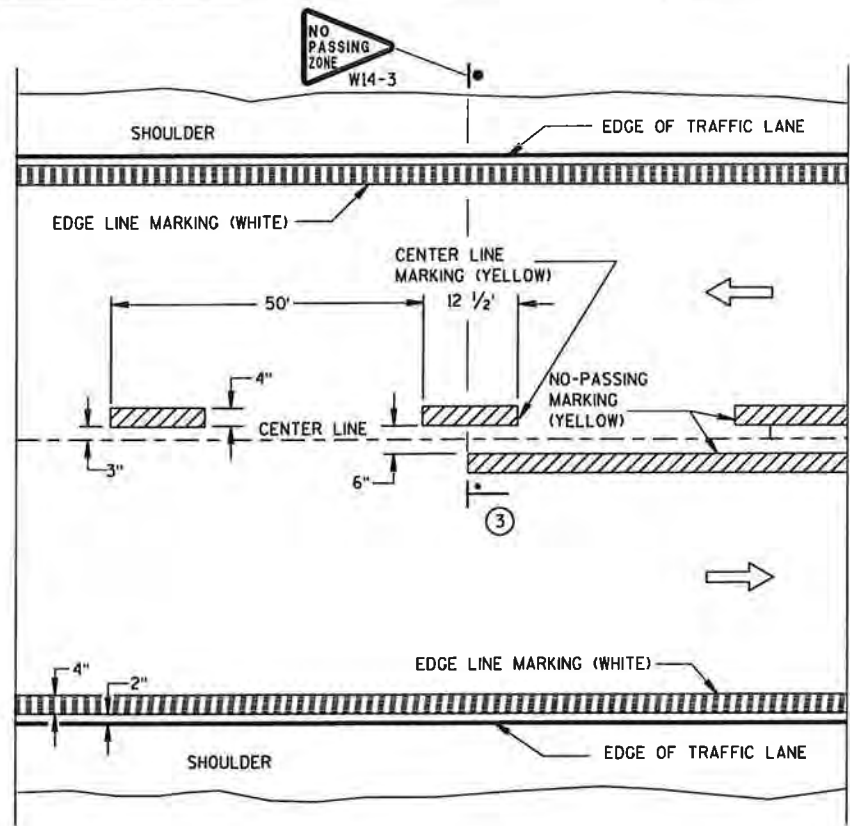
- ⊥ POST MOUNTED WARNING SIGN
- ▬ TYPE III BARRICADES
- Ⓐ TYPE "A" LOW INTENSITY FLASHING WARNING LIGHT (FOR NIGHT USE)
- ▨ WORK AREA

## BARRICADES AND SIGNS FOR SIDEROAD CLOSURES

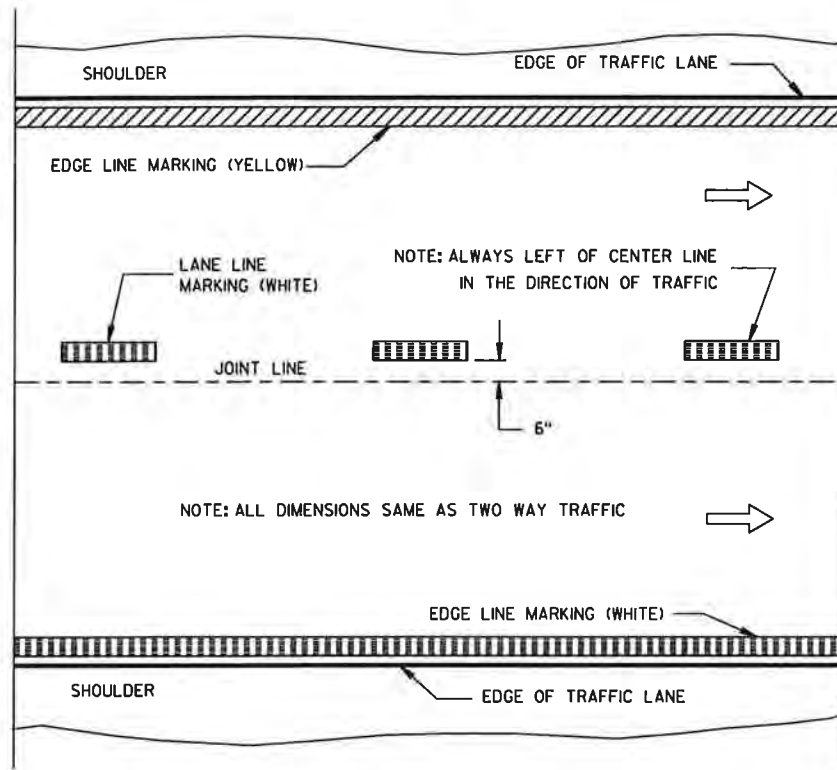
STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED  
9-16-03 /S/ Thomas N. Matthews  
DATE CHIEF SIGNS AND 110 VEER  
FHWA



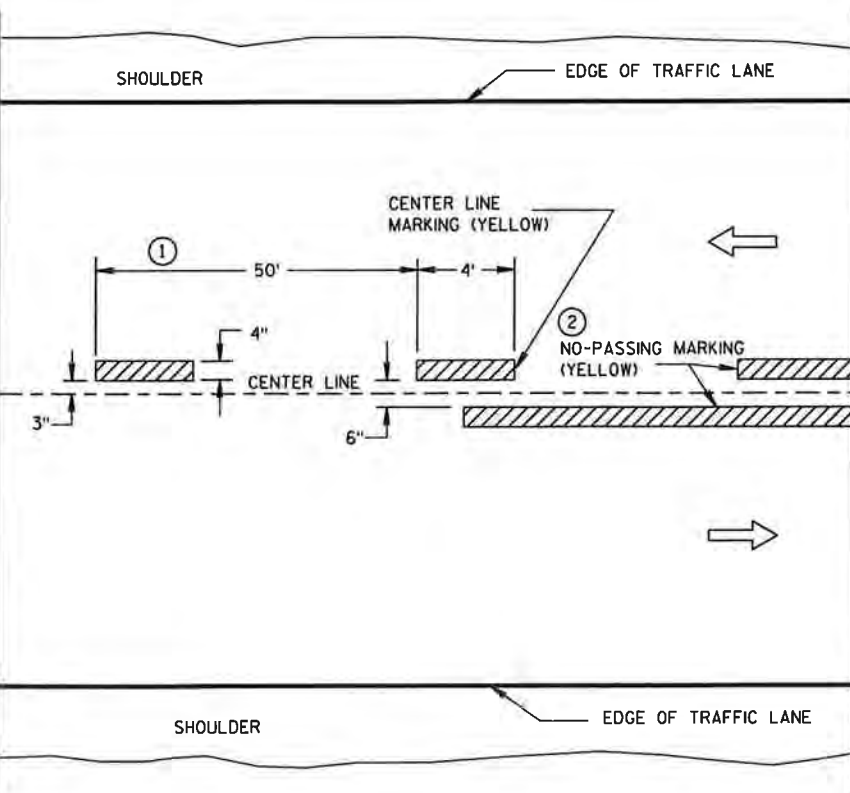


TWO WAY TRAFFIC

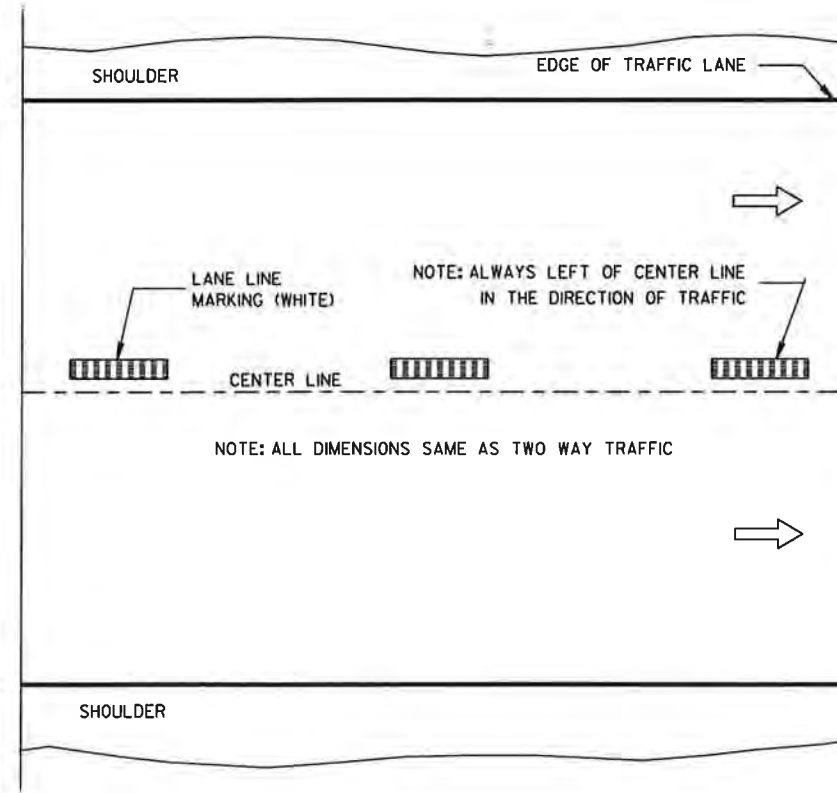


ONE WAY TRAFFIC

**PERMANENT PAVEMENT MARKING**



TWO WAY TRAFFIC



ONE WAY TRAFFIC

**TEMPORARY (INTERMEDIATE) PAVEMENT MARKING**  
(SHOWS CYCLE FOR TEMPORARY CENTER LINE OR TEMPORARY LANE LINE MARKING)

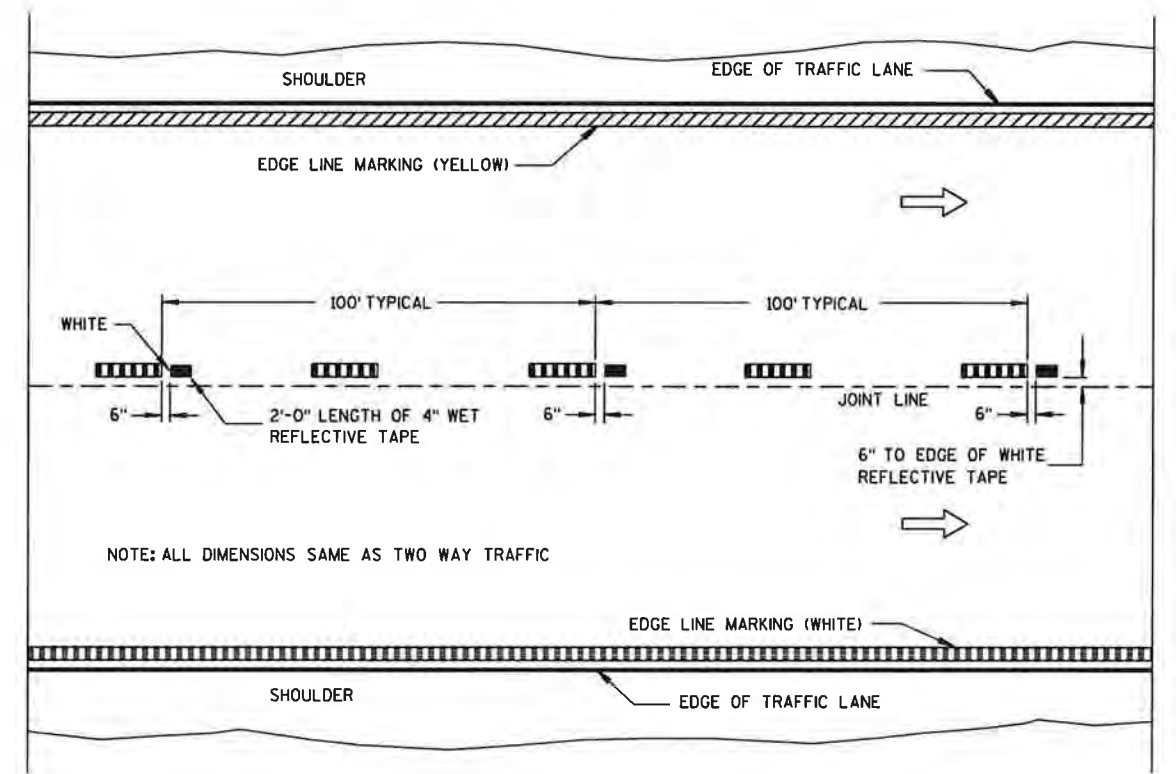
**GENERAL NOTES**

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

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

**NOTE**

ARROW SYMBOL ( → ) SHOWS DIRECTION OF TRAVEL



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

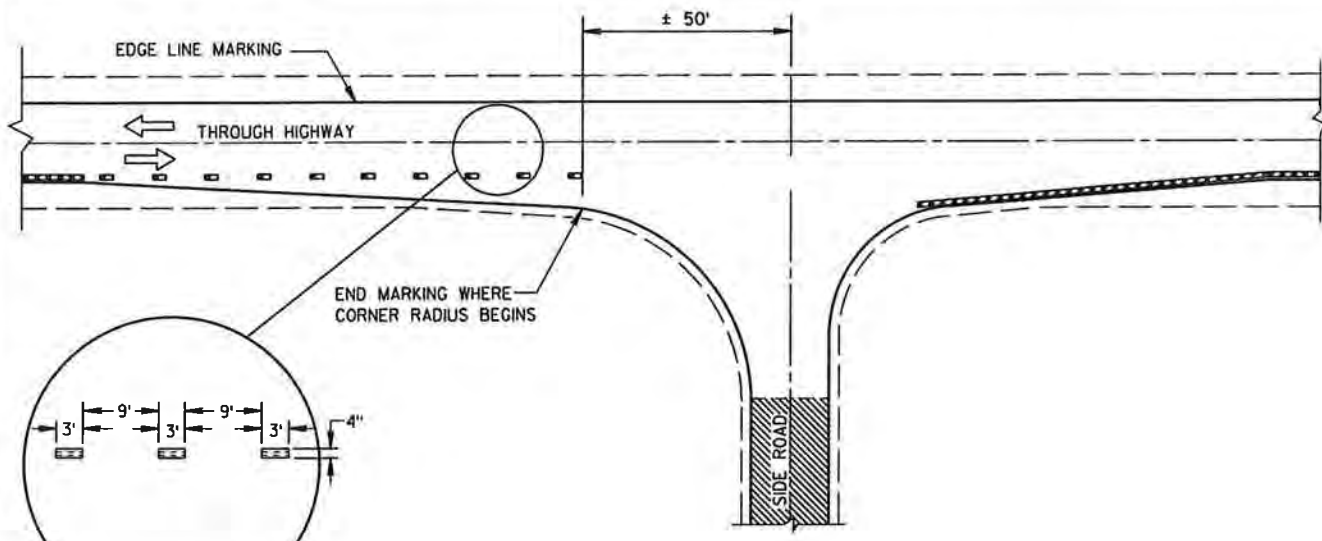
**LEGEND**

- "T" MARKING
- POST MOUNTED SIGN

**PAVEMENT MARKING  
(MAINLINE)**

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

APPROVED  
6-23-11 /S/ Thomas N. Notbohm  
DATE STATE TRAFFIC SIGN  
FHWA



**MINOR INTERSECTION WITHOUT CURBS**

⑦

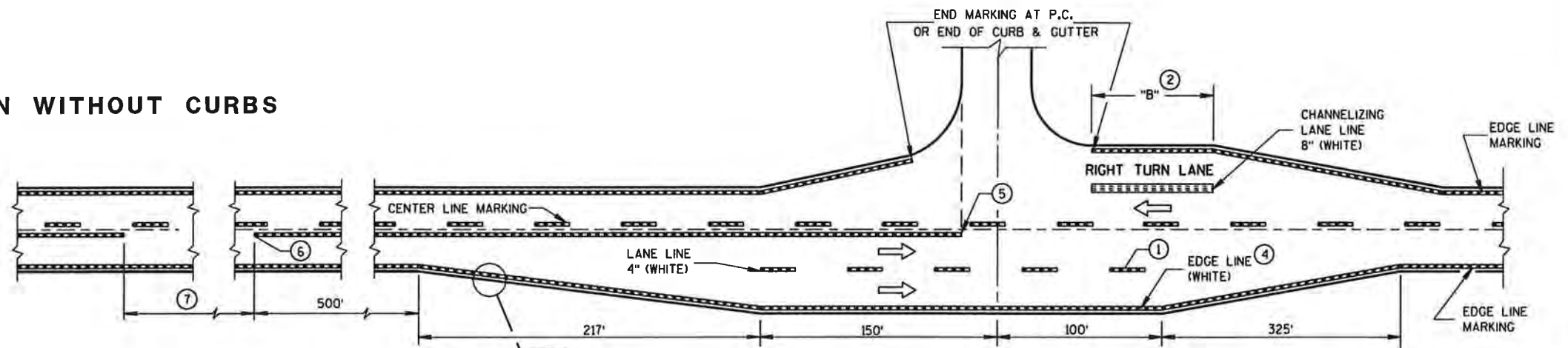
POSTED SPEED (MPH)	MINIMUM DISTANCE BETWEEN ZONES (FEET)
25 - 30	528
35 - 40	528
45 - 50	686
55	792

**GENERAL NOTES**

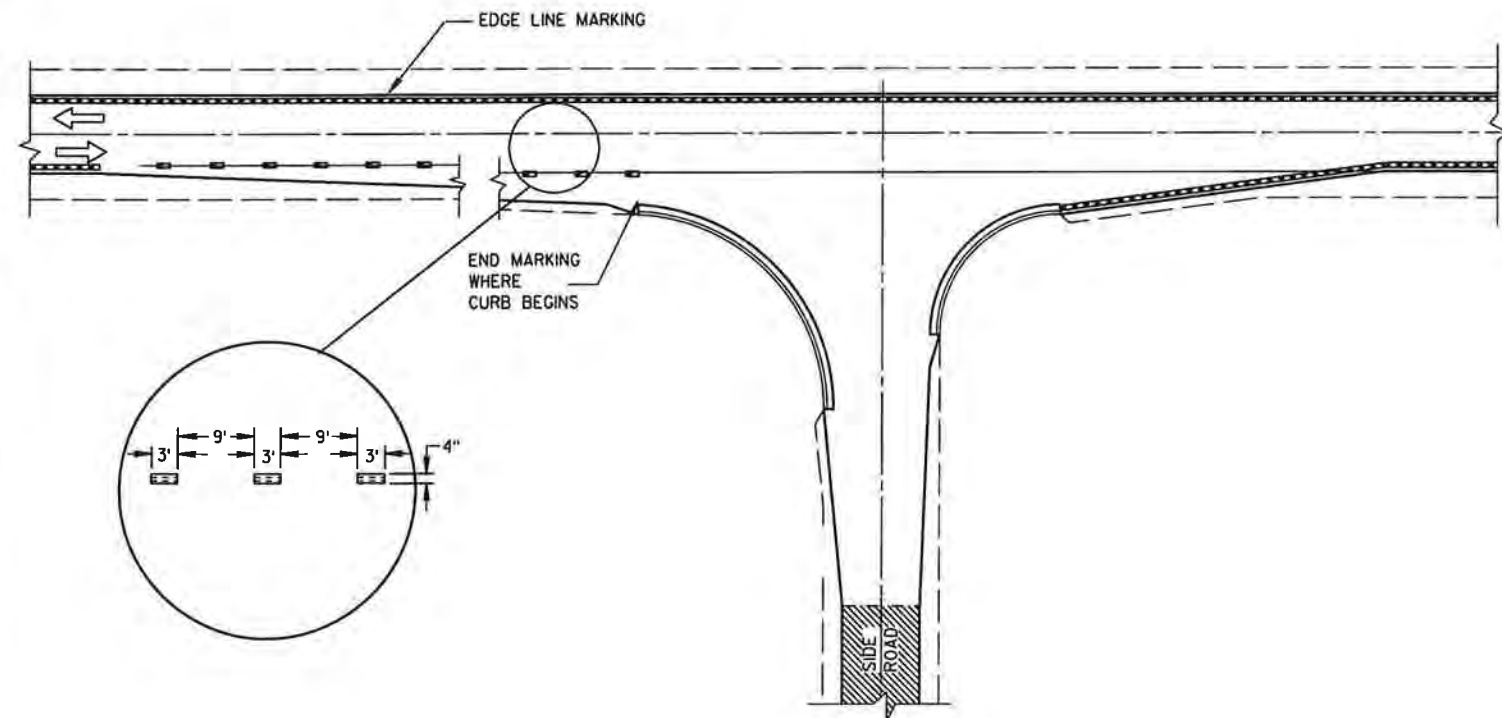
- EDGE LINES SHALL BE OMITTED THROUGH INTERSECTIONS. EDGE LINES SHALL BE CONTINUED THROUGH DRIVEWAYS.
- ① WHEN DISTANCE "A" IS LESS THAN 250 FEET, OMIT LANE LINE.
  - ② WHEN DISTANCE "B" IS LESS THAN 100 FEET, OMIT CHANNELIZING LANE LINE.
  - ③ ALTERNATIVE MARKING SHALL BE PROVIDED WHEN SPECIFIED IN THE CONTRACT. TYPICAL SITUATIONS WHERE THIS MARKING MAY BE REQUIRED ARE WHERE THE INTERSECTION IS ON A SHARP HORIZONTAL CURVE OR CREST VERTICAL CURVE IN AN UNLIGHTED AREA SUCH THAT THE EDGE LINE MAY BE MISLEADING TO THE MOTORIST OR DISAPPEAR FROM SIGHT.
  - ④ THE EDGE LINE IN THE TAPER AREAS OF THE BYPASS LANE AND THE BYPASS LANE SHALL BE LOCATED 1-FOOT FROM EDGE OF PAVEMENT TO THE OUTSIDE EDGE OF EDGE LINE.

- ⑤ BARRIER LINE ENDS AT SIDE ROAD PAVEMENT/SURFACE EDGE EXTENSION.
- ⑥ BARRIER LINE STARTS 500 FEET PRIOR TO THE BYPASS TAPER.
- ⑦ IF THE DISTANCE BETWEEN 2 SUCCESSIVE NO-PASSING ZONES IS LESS THAN THE MINIMUM DISTANCE BETWEEN ZONES, CONNECT THE 2 ZONES.
- ⑧ 3' LINE 9' GAP, EXCEPT RETRACE THE EXISTING LINE - GAP PATTERN WHERE EXISTING MARKINGS ARE IN PLACE.

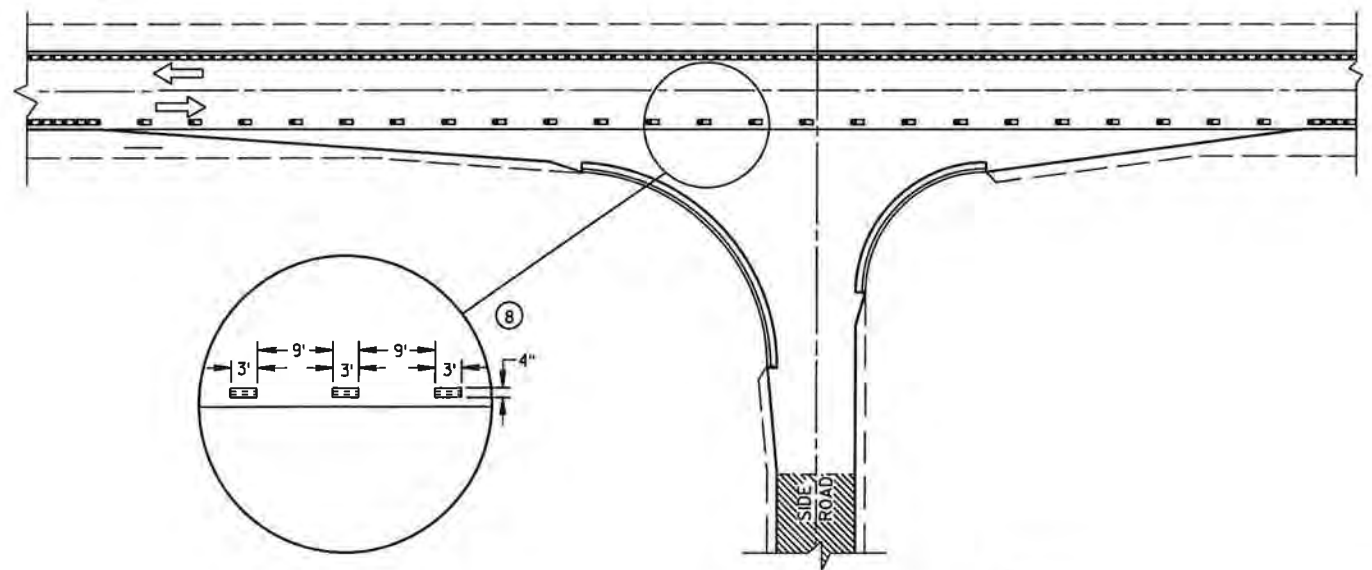
ARROW SYMBOL ( → ) SHOWS DIRECTION OF TRAVEL



**MAJOR INTERSECTIONS  
(INTERSECTION WITH FULL RIGHT TURN LANE OR BYPASS LANES)**

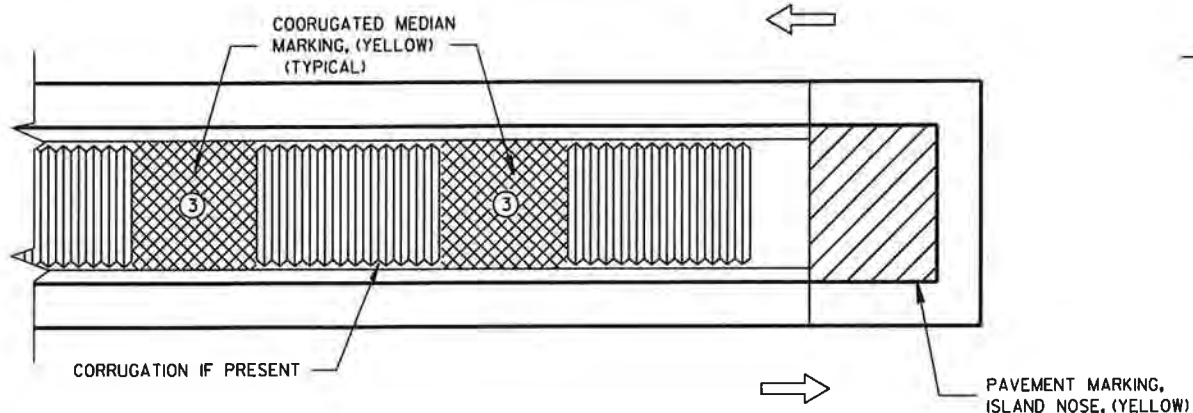


**MINOR INTERSECTION WITH CURBS  
(TYPICAL MARKING)**

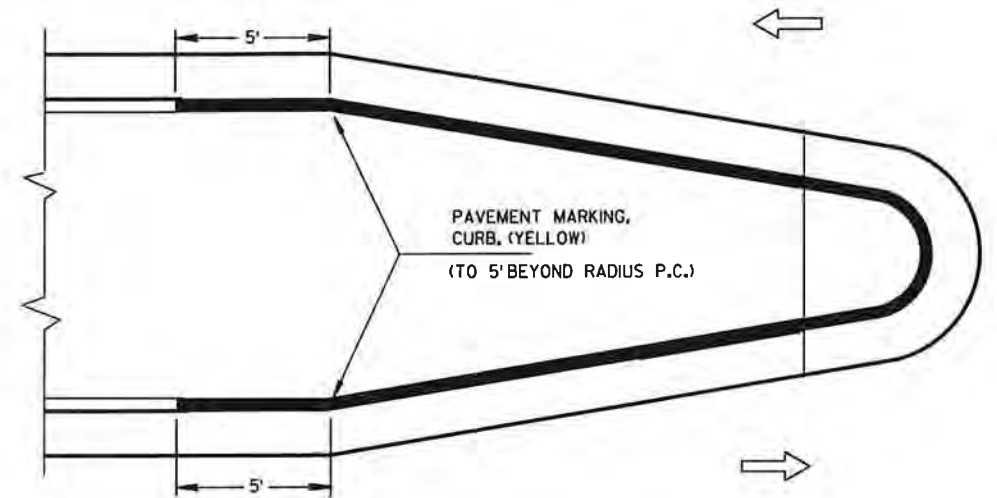


**MINOR INTERSECTION WITH CURBS  
③ (FOR SPECIAL CONDITIONS AS SPECIFIED)**

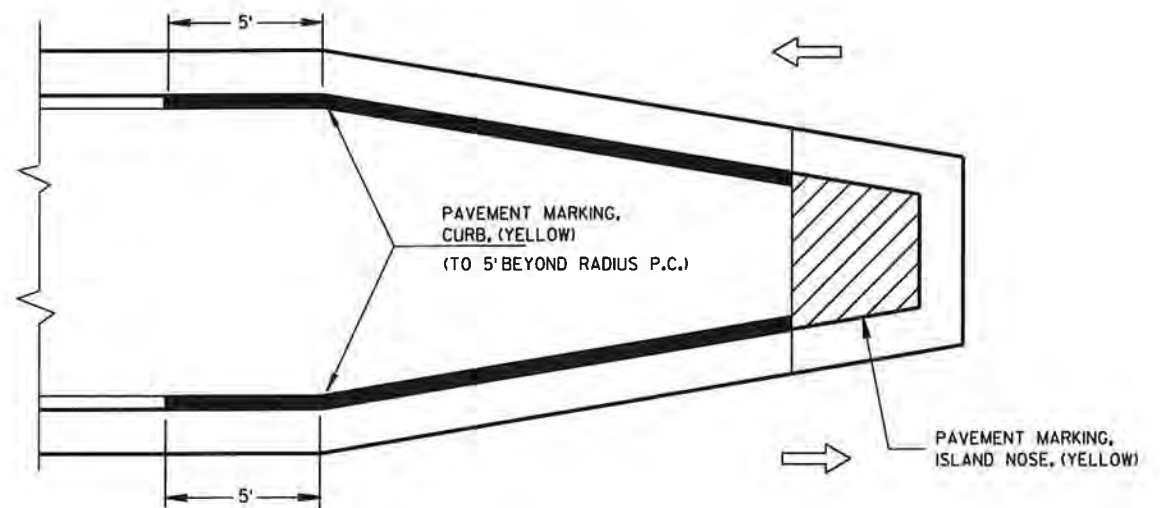
PAVEMENT MARKING (INTERSECTIONS)
STATE OF WISCONSIN DEPARTMENT OF TRANSPORTATION 112



**MEDIAN ISLAND WITH SQUARE BLUNT NOSE**

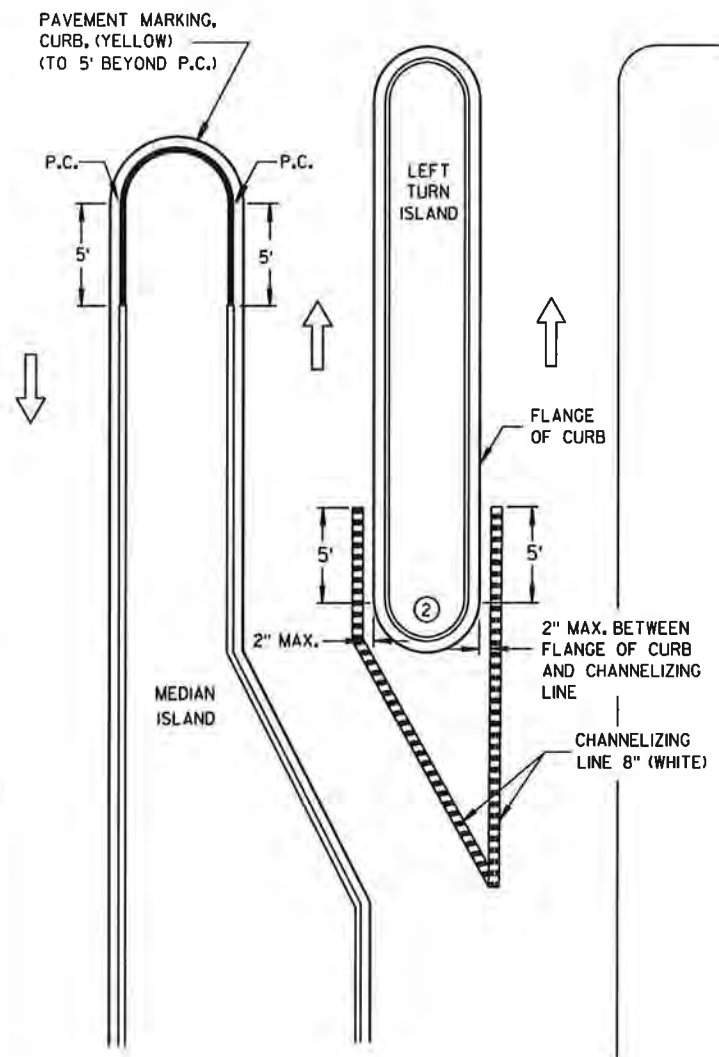


**MEDIAN ISLAND WITH ROUND BLUNT NOSE**



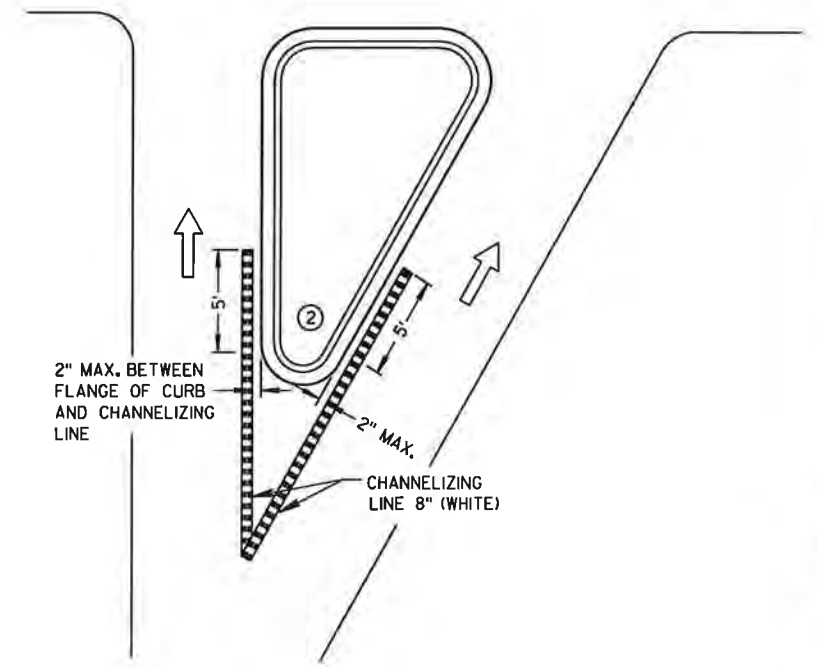
**MEDIAN ISLAND WITH SLOPED NOSE**

**TYPICAL PLACEMENT OF PAVEMENT MARKING ON MEDIAN ISLANDS**

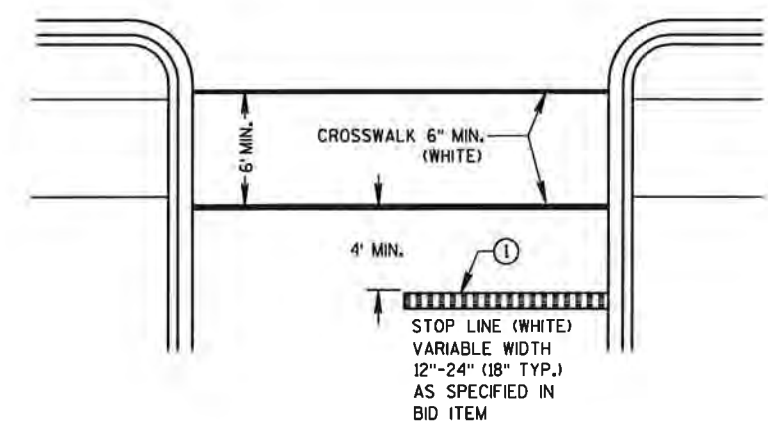


**LEFT TURN & MEDIAN ISLAND**

- GENERAL NOTES**
- ① STOP LINE IS REQUIRED ONLY WHEN SPECIFIED IN THE CONTRACT.
  - ② DO NOT MARK CURB NOSES THAT SEPARATE LANES OF TRAFFIC TRAVELING IN THE SAME DIRECTION.
  - ③ 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.



**RIGHT TURN ISLAND**



**STOP LINE AND CROSSWALK**

- LEGEND**
- ISLAND NOSE MARKING
  - CURB MAKING
  - CORRUGATED MEDIAN MARKING
  - DIRECTION OF TRAVEL

**PAVEMENT MARKING (ISLANDS, STOP LINE & CROSS WALK)**

STATE OF WISCONSIN  
DEPARTMENT OF TRANSPORTATION

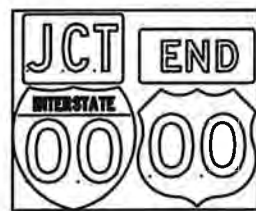
6

6

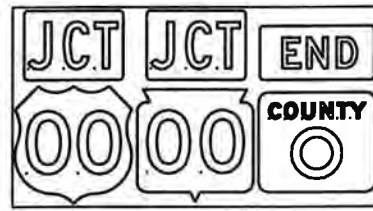
## TYPICAL ASSEMBLIES



J1-1



J1-2



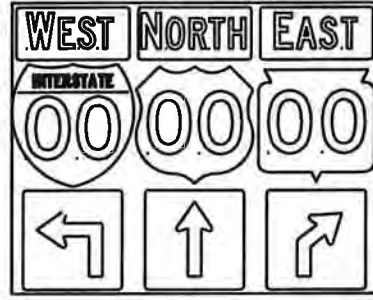
J1-3



J2-1



J2-2



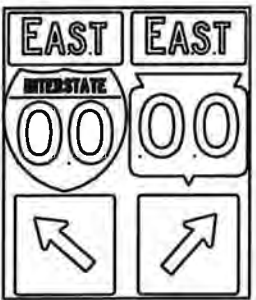
J2-3



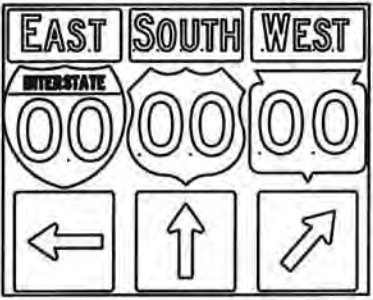
JV



J3-1



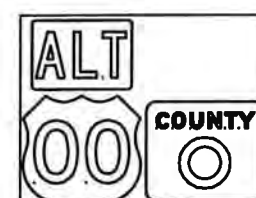
J3-2



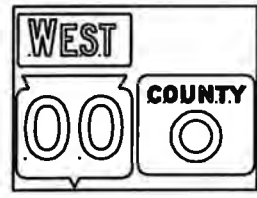
J3-3



J4-1



J4-2



J4-2



J13-1



J12-1



J32-1



J33-1

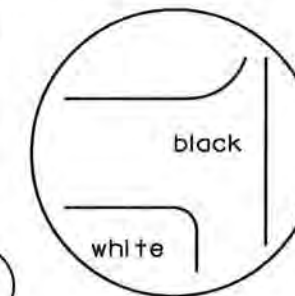
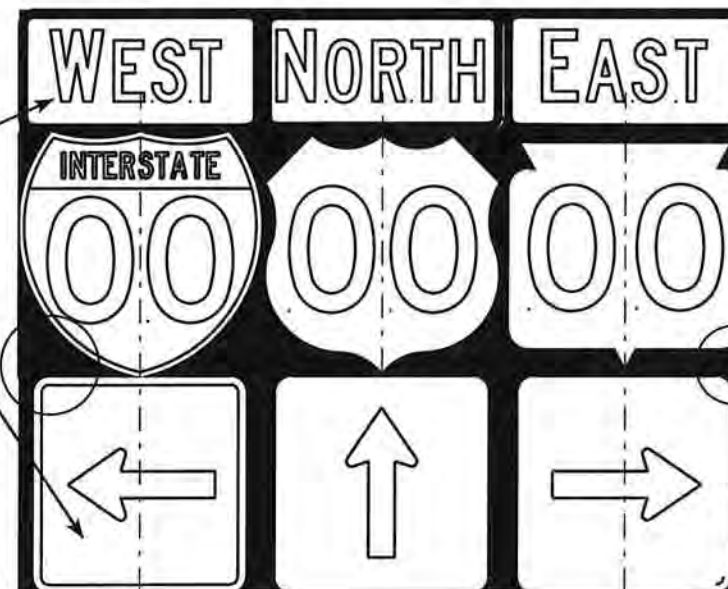
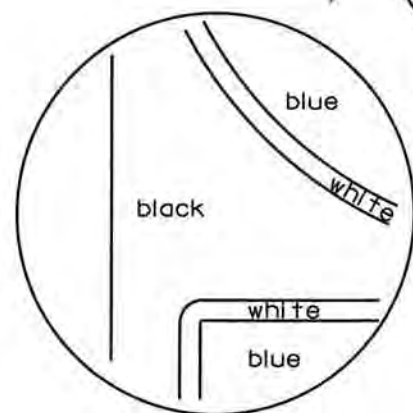


J23-1



J22-1

[blue background with interstate]



[black background]

## NOTES

- Signs are Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
- Color:  
Background - Black Non-reflective  
Message - see Note 5
- Message Series - See Note 5
- Corners shall be square since base material is plywood.
- The colors and message spacing on each marker shall be according to the applicable route marker panel specifications.
- Certain marker heads require the component pieces to be the same color. As an example, all the components used with an MI-1 Interstate marker shall be blue.
- 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.
- 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.
- Route assemblies that have 36 inch shields and have dimensions greater than 48 inches (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.

### ROUTE MARKERS & COMPONENTS IN TYPICAL ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

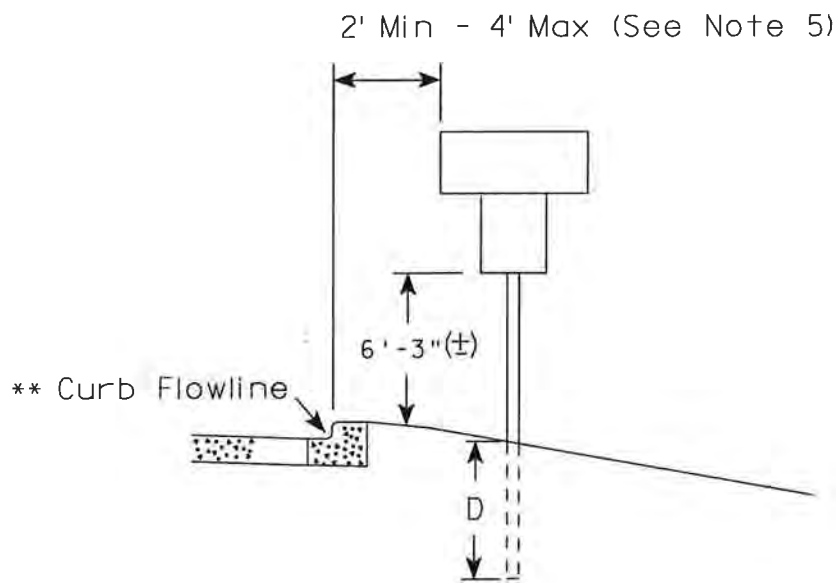
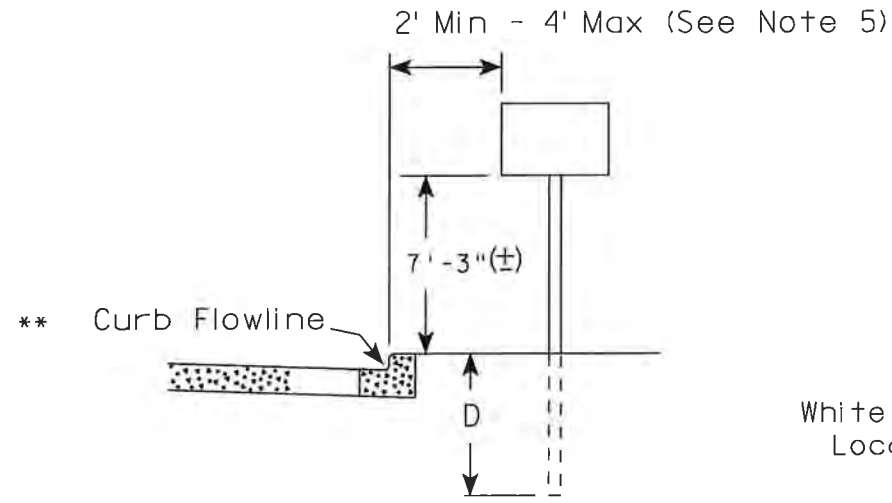
APPROVED

*Matthew R. Rauch*  
For State Traffic Engineer

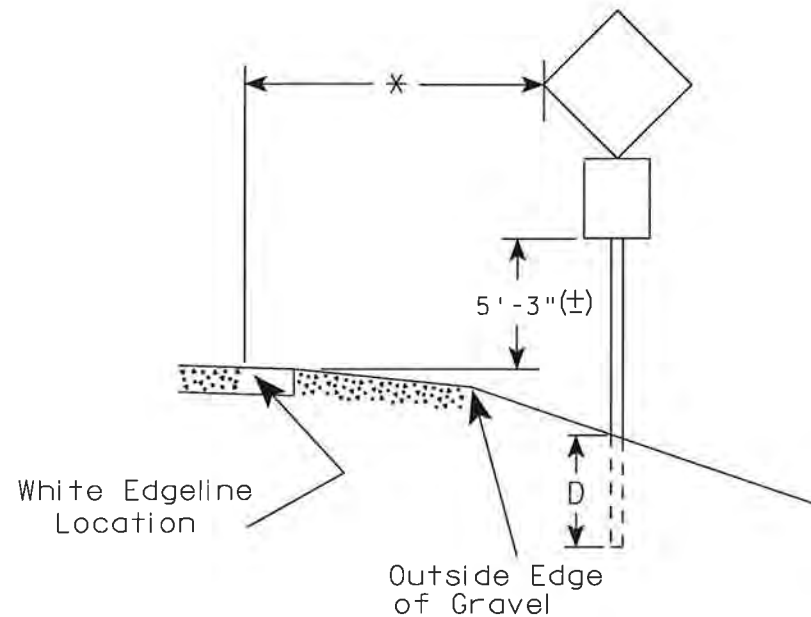
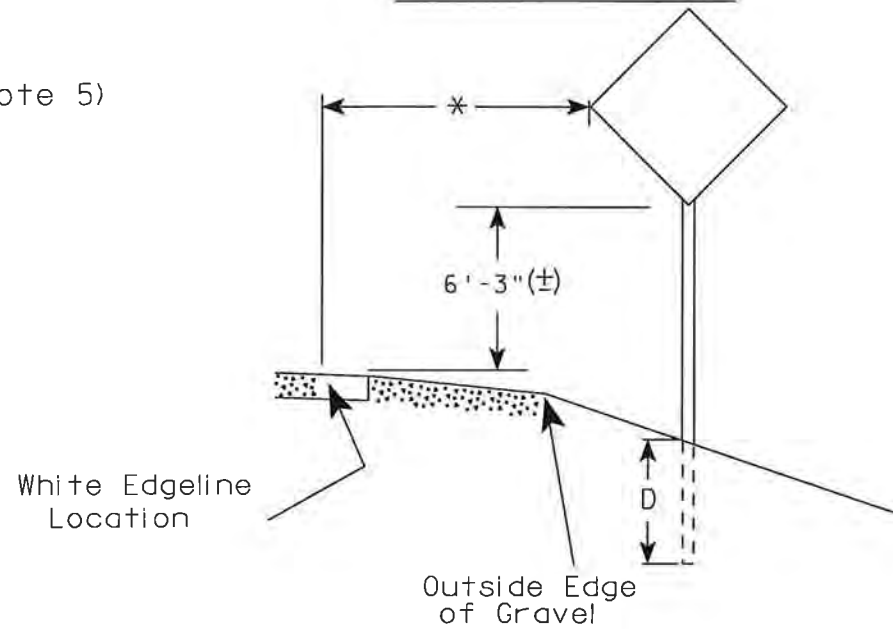
DATE 10/21/09

PLATE NO. A2-15.6

URBAN AREA



RURAL AREA (See Note 2)



GENERAL NOTES

1. Signs wider than 4 feet or larger than 20 sq. ft. shall be mounted on multiple posts. Refer to plate A4-4.
2. If signs are mounted on barrier wall, see A4-10 sign plate.
3. For expressways and freeways, mounting height is 7'-3" (±) or 6'-3" (±) depending upon existence of a sub-sign.
4. Minimum mounting height for J assemblies (A4-5) is 7'-3" (±) or 6'-3" (±) per urban or rural detail respectively.
5. Minimum mounting height for signs mounted on traffic signal poles is 5'-3" (±).
6. Offset distance shall be consistent with existing signs or consistent throughout length of project.
7. The (+) tolerance for mounting height is 3 inches.
8. Folding stop signs (R1-1F) shall be mounted at a height of 5'-3" (±) or as directed by the Engineer.
9. The Double Arrow sign (W12-1) shall be mounted at a height of 2'-3" (±). The Chevron sign (W1-8), Roundabout Chevron panel (W1-8A), Clearance Markers (W5-52), Mile Markers (D10 series) & End of Road Markers (W5-56 & W5-56A) shall be mounted at a height of 4'-3" (±).

POST EMBEDMENT DEPTH

Area of Sign Installation ( Sq. Ft. )	D ( Min )
20 or Less	4'
Greater than 20	5'

\* \* The existence of curb and gutter does not in itself mandate the vertical clearance illustrated. That height is typically measured where there is sidewalk adjacent to the roadway or parking is permitted. In the absence of sidewalk vertical clearance is measured from the top of the curb. Offset of signs is measured from the flow line.

\* 6 feet from edge of a paved shoulder or 12 feet from the edge of pavement (edge line location) or 2 feet from outside edge of gravel, whichever is greater unless directed by project engineer.

TYPICAL INSTALLATION OF PERMANENT TYPE II SIGNS ON SINGLE POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R Rauch*  
For State Traffic Engineer

DATE 9/30/09 PLATE NO. A4-3.15

**GENERAL NOTES**

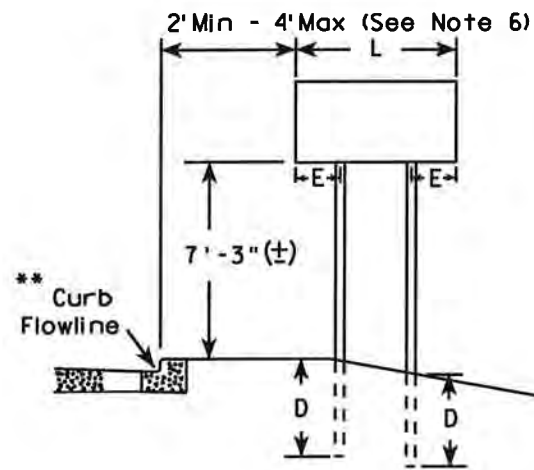
1. For multiple post installations, individual post spacing shall be greater than 3'-6".
2. See tables below for required number of posts.
3. For expressways and freeways, mounting height is 7'-3" (±) or 6'-3" (±) depending upon existence of sub-sign.
4. The (±) tolerance for mounting height is 3 inches.
5. Minimum mounting height for J assemblies (A4-5) is 7'-3" (±) or 6'-3" (±) per urban or rural detail respectively.
6. Offset distance shall be consistent with existing signs or consistent throughout length of project.
7. Folding stop signs (R1-1F) 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 (W1-8A), Clearance Markers (W5-52), Mile Markers (D10 series) & End of Road Markers (W5-56 & W5-56A) 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.

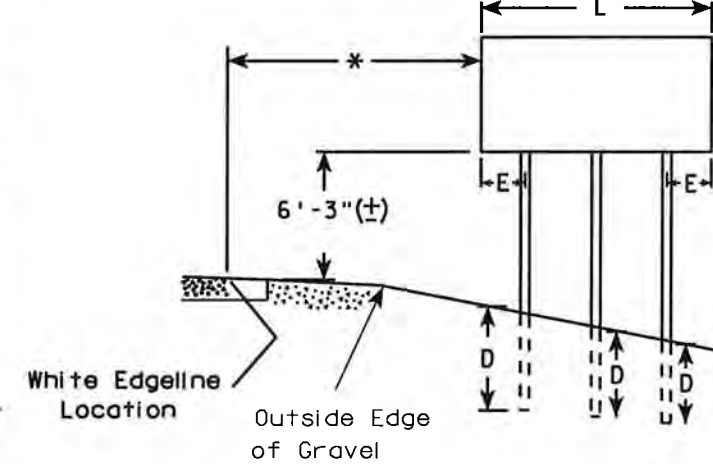
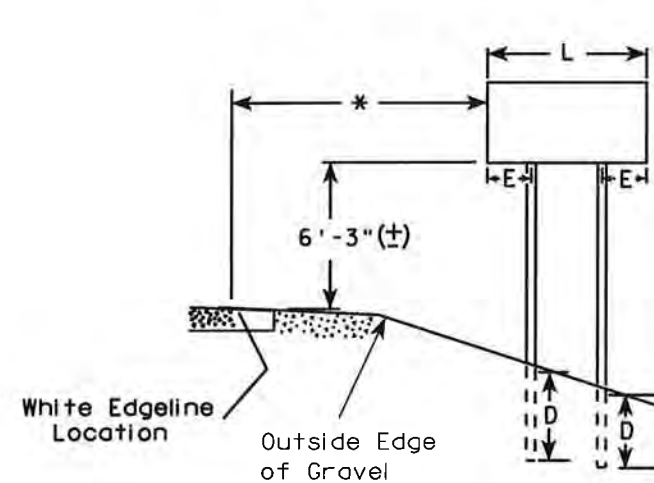
\*\* The existence of curb and gutter does not in itself mandate the vertical clearance illustrated. That height is typically measured where there is sidewalk adjacent to the roadway or parking is permitted. In the absence of sidewalk vertical clearance is measured from the top of the curb. Offset of signs is measured from the flow line.

\*\*\* See A4-3 sign plate for signs 4' or less in width or 20 S.F. or less in area.

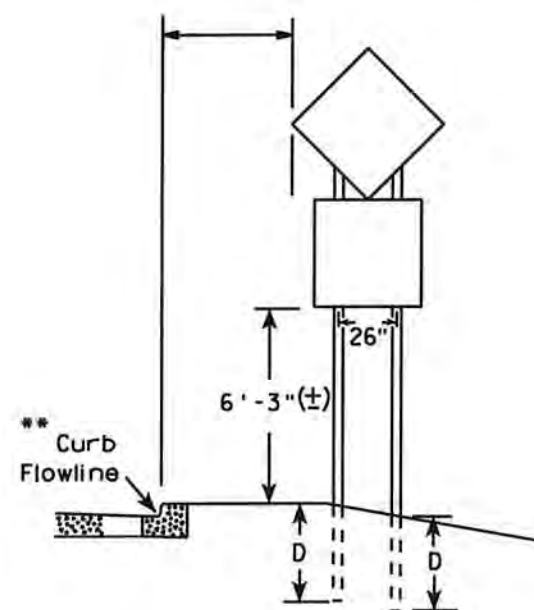
**URBAN AREA**



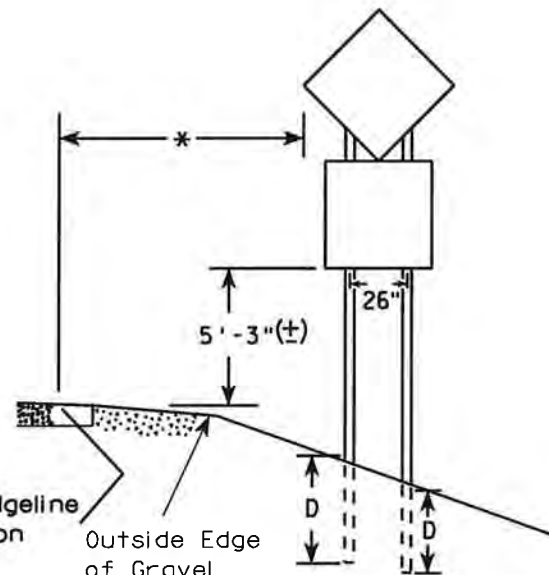
**RURAL AREA (See Note 3)**



2' Min - 4' Max (See Note 6)



**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 120"	L/5

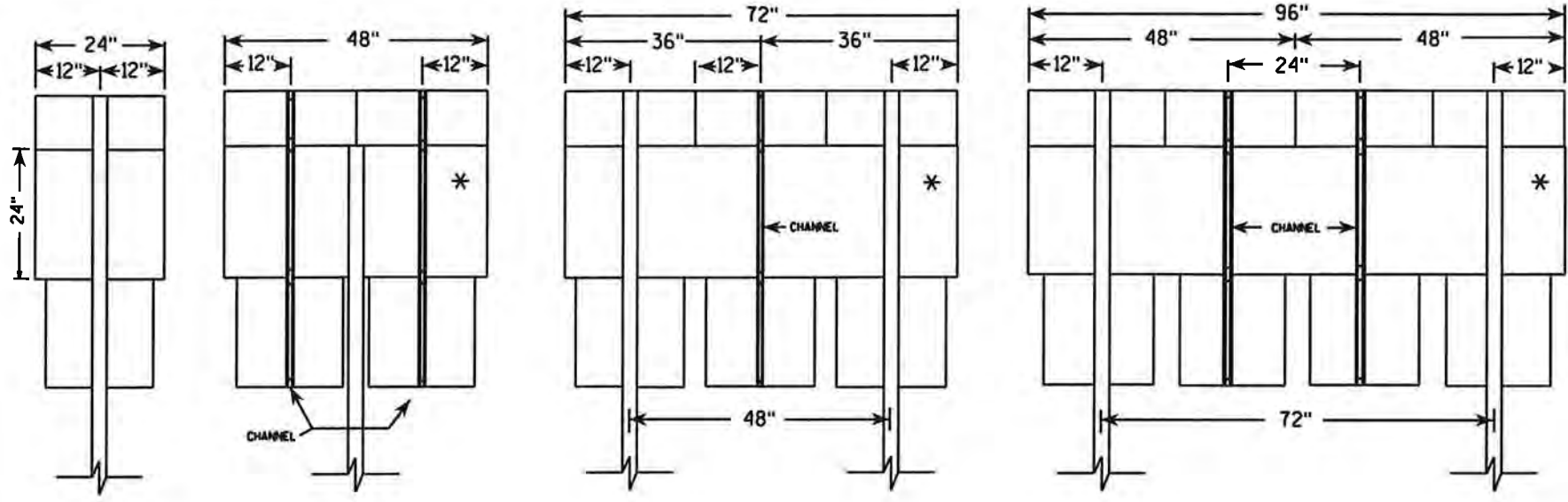
SIGN SHAPE OTHER THAN DIAMOND (THREE POSTS REQUIRED)	
L	E
Greater than 120" less than 168"	12"

SIGN SHAPE OTHER THAN DIAMOND (FOUR POSTS REQUIRED)	
L	E
168" and greater	12"

**POST EMBEDMENT DEPTH**

Area of Sign Installation ( Sq. Ft. )	D ( Min )
20 or Less	4'
Greater than 20	5'

TYPICAL INSTALLATION OF TYPE II SIGNS ON MULTIPLE POSTS	
WISCONSIN DEPT OF TRANSPORTATION	
APPROVED	<i>Matthew R. Rauch</i> For State Traffic Engineer
DATE 9/30/09	PLATE NO. A4-4.10



24" MARKER DETAIL

CHANNEL HARDWARE:

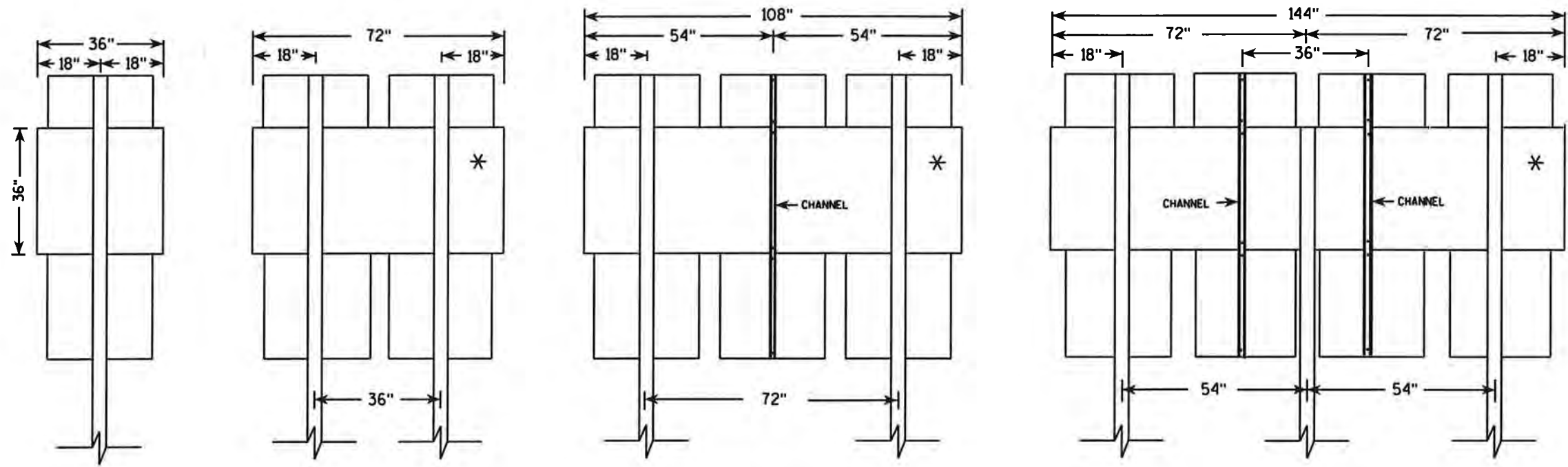
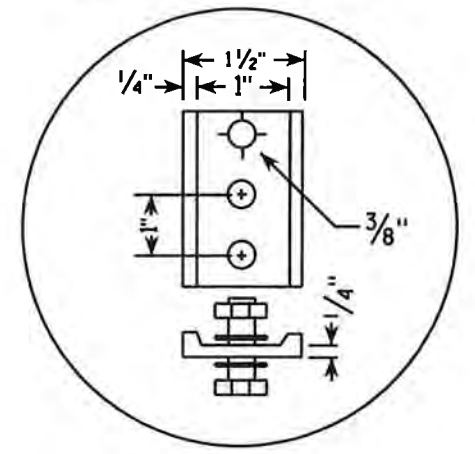
Aluminum Sign components: -1/4" x 3/4" bolt and 1/4" flat washers

Plywood Sign Components: -1/4" x 1 1/4" bolt and 1/4" flat washers

NOTES:

1. Post spacing shall be according to this detail but post embedment depth shall be in accordance with A4-4.
2. Channel material shall be as specified in Section 633 of Std. Specs. and weight shall be approx. 1.4 lbs/ft.
3. Base material for a multiple marker head panel (\*) shall be one piece high density overlay plywood. All other materials within the assembly can be either plywood or aluminum.

CHANNEL DETAIL



36" MARKER DETAIL

TYPICAL PANEL INSTALLATION FOR ASSEMBLIES

WISCONSIN DEPT OF TRANSPORTATION

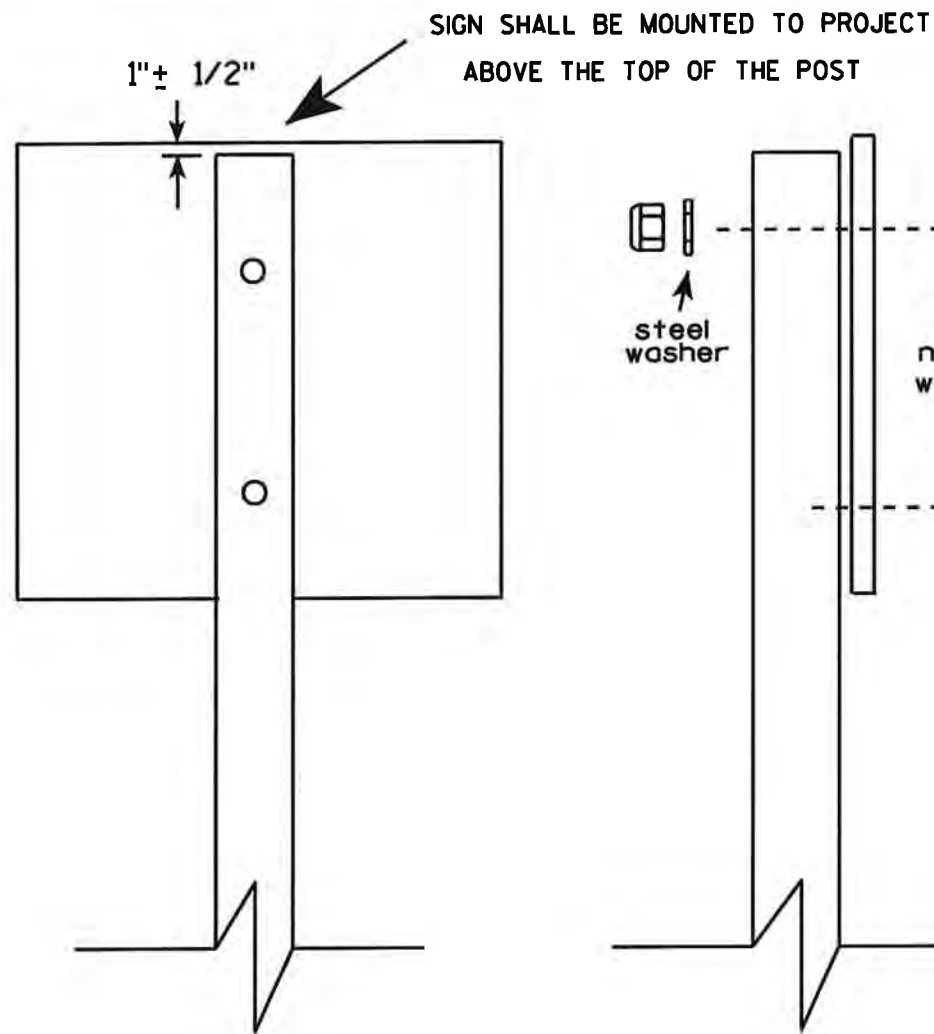
APPROVED *Chester J. Spang*  
for State Traffic Engineer

DATE 10/28/96 PLATE NO. A4-5.4

PROJECT NO:

SHEET N117

E

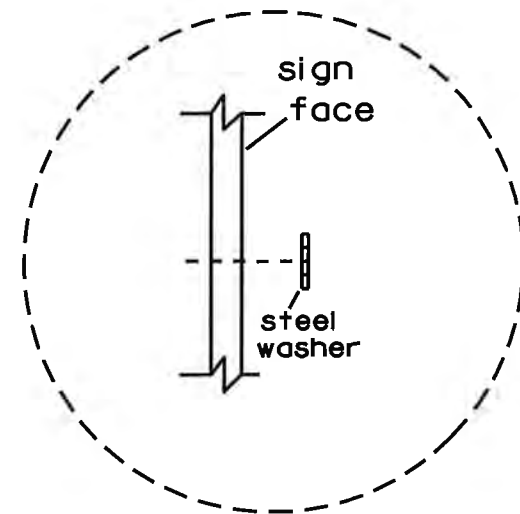


Nuts, bolts and lags used for mounting signs shall have hexagonal heads and shall be either :

- a. Hot dip galvanized in accordance with ASTM Designation: A 153, Class D, or SC 3
- b. Electro-galvanized in accordance with ASTM Designation : B 633, TYPE III, SC 3.

Threads on bolts and nuts shall be manufactured with sufficient allowance for the cadmium plate or galvanized coating to permit the nuts to run freely on the bolts.

- WOOD POSTS (4" x 4" or 4" x 6")
- LAG SCREWS - 3/8" X 3"
- MACHINE BOLTS - 5/16" X 6-1/2" or 7" Length w/ nuts
- SQUARE STEEL POSTS (2" x 2")
- MACHINE BOLTS - 3/8" X 3-1/4" Length w/ nuts
- RIVETS - 9/32" (6605-9-6) BULB-TITE, TRI-FOLD, ALUMINUM BODY/MANDREL
- O.D. FLANGE .720-.765 INCH, GRIP RANGE .042-.375 INCH
- WASHERS (ALL POSTS) -
- 1-1/4" O.D. X 3/8" I.D. X 1/16" STEEL
- 1-1/4" O.D. X 3/8" I.D. X .080 NYLON for all Type H signs.



Washer Placement when Sign Has Other Than Type H or Type F Face

\* Two different fastening systems are shown for illustration purposes. On any individual sign, either one or the other system shall be used. Actual number of fasteners per sign varies with the sign area, but normally there are two. For a single post installation, all signs greater than 9 sq. ft. require the use of 3 fasteners.

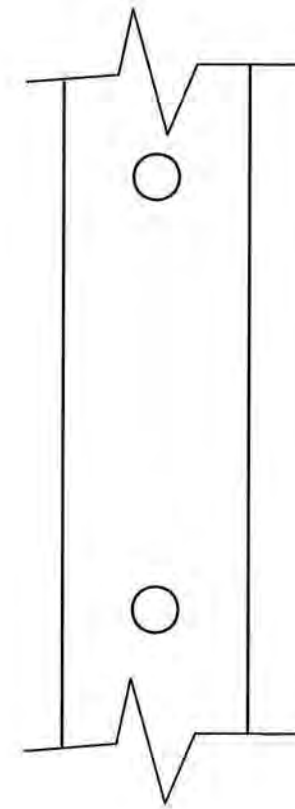
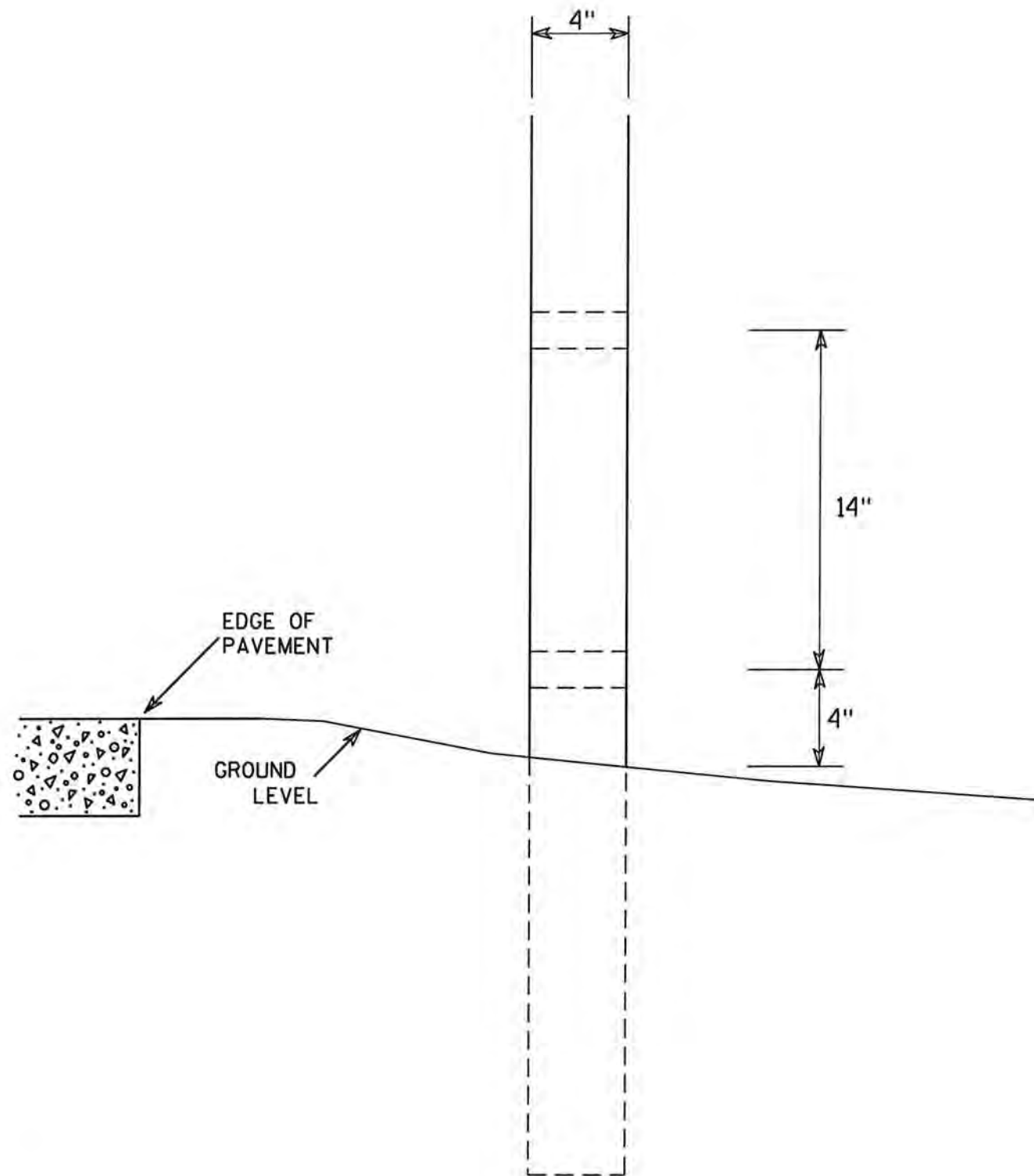
ATTACHMENT OF SIGNS TO POSTS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Rauch*  
For State Traffic Engineer

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





SIDE VIEW

GENERAL NOTES

1. All 4 x 6 Wood Posts shall be modified by having two 1 1/2" diameter holes drilled perpendicular to the roadway centerline.

7

7

4 X 6 WOOD POST  
MODIFICATIONS

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Chester J Spang*  
for State Traffic Engineer

DATE 3/27/97 PLATE NO. A4-11.2

PROJECT NO:

HWY:

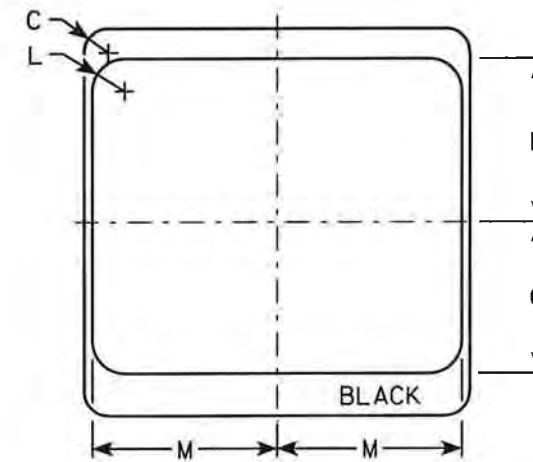
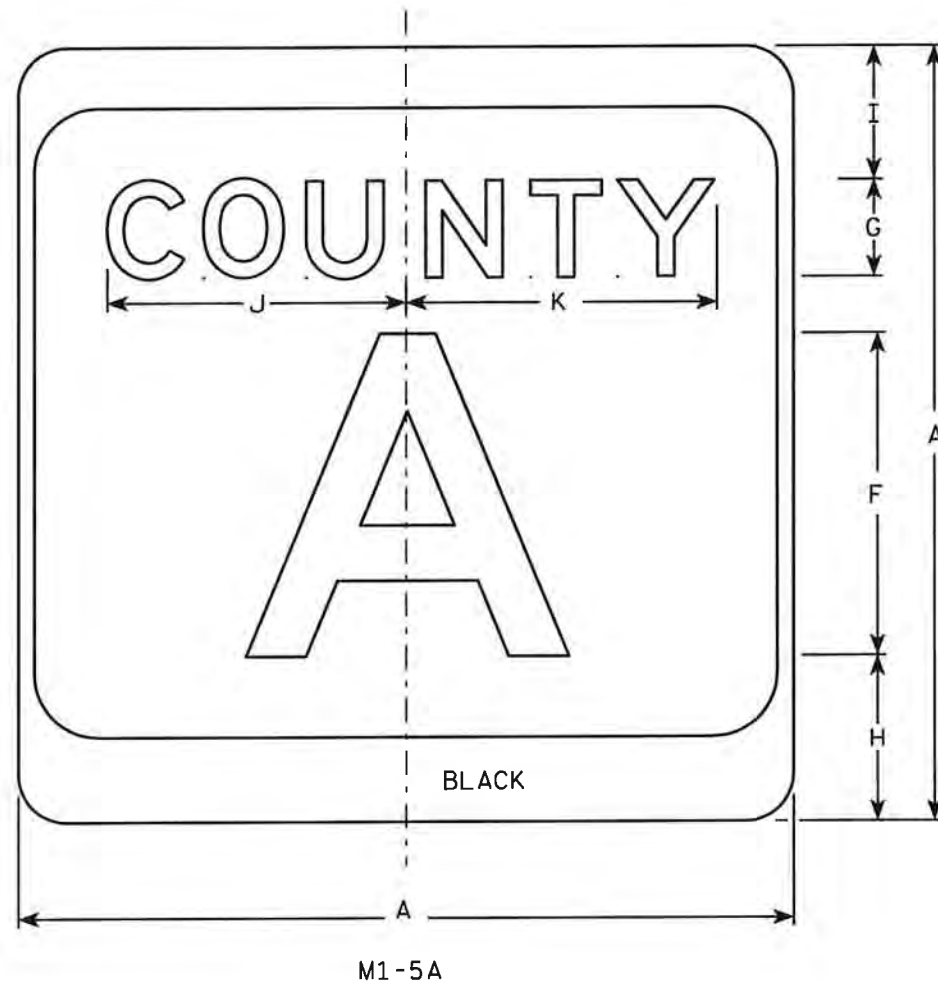
COUNTY:

SHEET N119

E

NOTES

- Sign is Type II - see Note 7 - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
- Color:  
Background - White & Black - See Note 7  
Message - Black
- Message Series - see Note 5
- 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.
- 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.
- Substitute appropriate letters & optically adjust spacing to achieve proper balance.
- Permanent Signs  
Background - Type H Reflective  
Detour or temporary Signs  
Background - Reflective



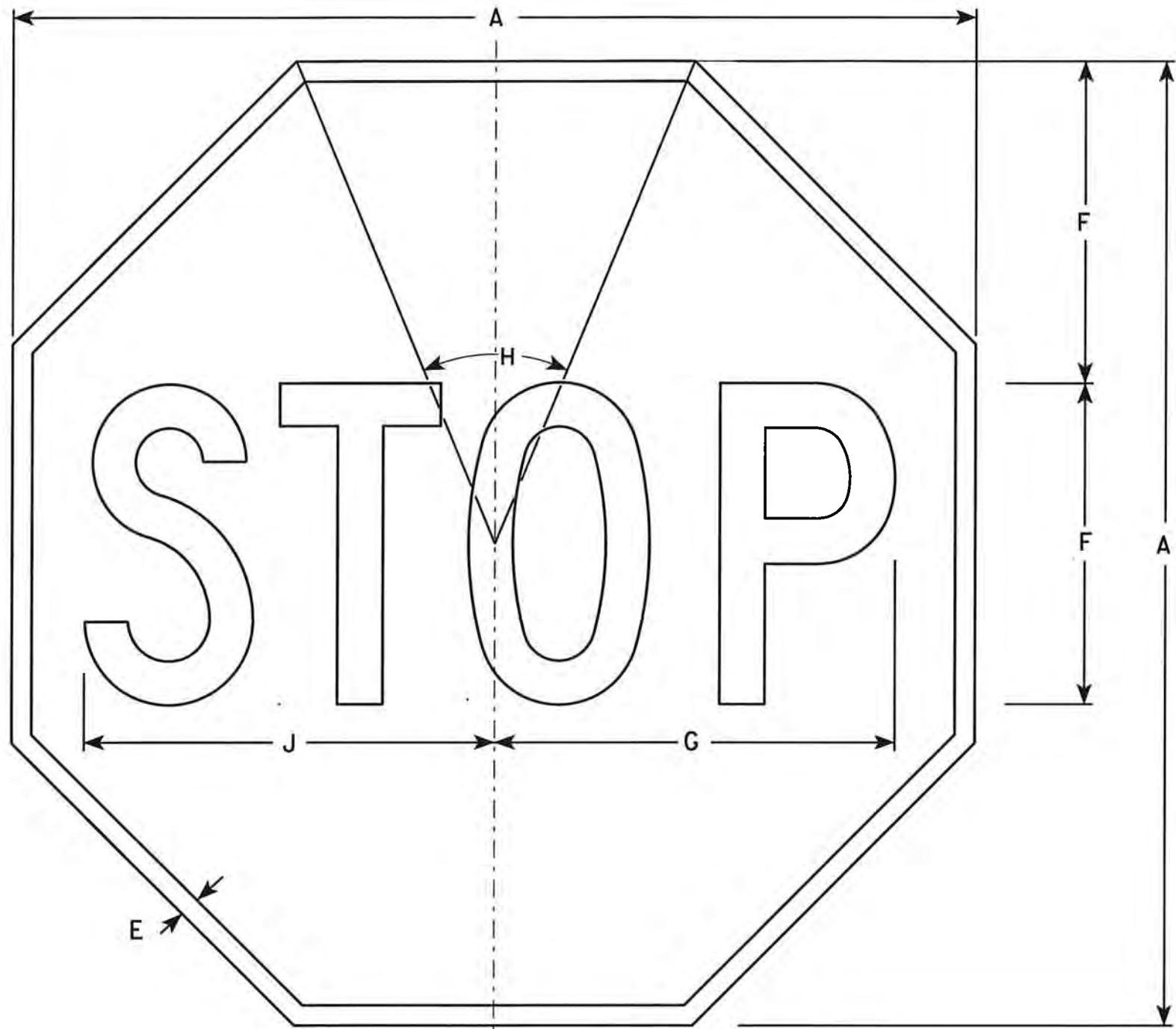
Metric equivalent for this sign is:

SIZE	
1	
2	600 mm X 600 mm
3	900 mm X 900 mm
4	900 mm X 900 mm
5	900 mm X 900 mm

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.	Area m <sup>2</sup>
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												4.0	.36
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												9.0	.81
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												9.0	.81
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												9.0	.81

PROJECT NO: \_\_\_\_\_ HWY: \_\_\_\_\_ COUNTY: \_\_\_\_\_ SHEET N 120 **E**

CTH MARKER  
M1-5A FOR ASSEMBLIES  
WISCONSIN DEPT OF TRANSPORTATION  
APPROVED *Christa J Spay*  
for State Traffic Engineer  
DATE 3/20/02 PLATE NO. M1-5A.7



**NOTES**

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
Background - Red  
Message - White
3. Message Series - C

7

7

R1-1

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	24				3/8	8	10	45°		10 1/4																	3.31
2S	30				3/8	10	12 1/2	45°		12 3/4																	5.18
2M	36				3/4	12	15	45°		15 3/8																	7.46
3	36				3/4	12	15	45°		15 3/8																	7.46
4	48				1	16	20	45°		20 1/2																	13.25
5	48				1	16	20	45°		20 1/2																	13.25
6	18				3/8	6	7 3/4	45°		7 3/4																	1.86
7	12				1/4	4	5	45°		5 1/8																	0.78

**STANDARD SIGN**  
R1-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

DATE 12/03/10 PLATE NO. R1-1.12

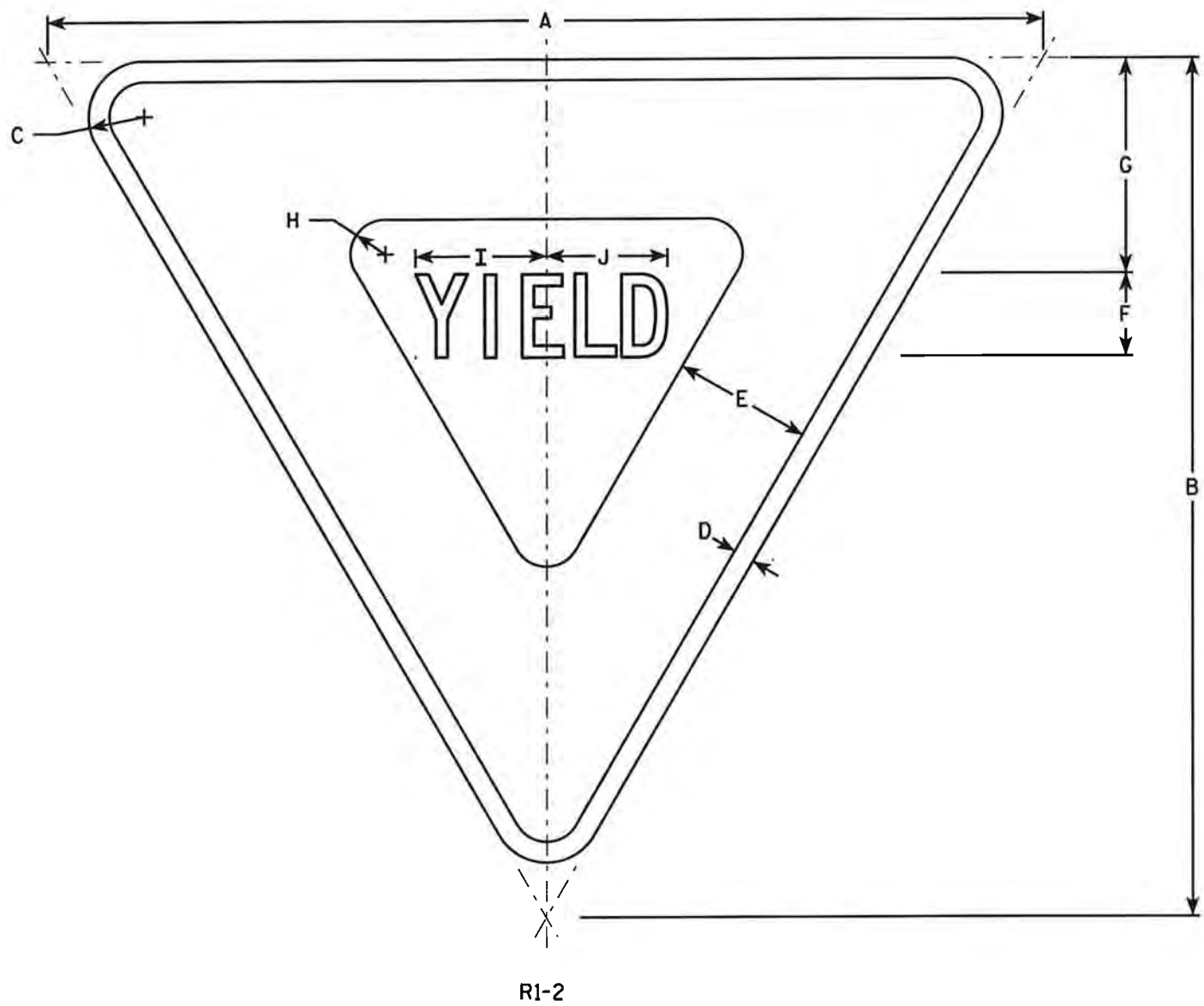
PROJECT NO:

HWY:

COUNTY:

SHEET N121

E



**NOTES**

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
Background - White  
Message - See note 5
3. Message Series - 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. The border strip and word message are reflectorized red.

7

7

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30	26	1 1/2	5/8	4	2 1/2	6 3/8	7/8	4	3 5/8																	2.71
2S	36	31	2	3/4	5	3	7 3/4	1 1/4	4 3/4	4 3/8																	3.88
2M	48	42	3	1	6	4	9 3/4	2	6 1/4	5 7/8																	7.00
3	48	42	3	1	6	4	9 3/4	2	6 1/4	5 7/8																	7.00
4	48	42	3	1	6	4	9 3/4	2	6 1/4	5 7/8																	7.00
5	60	52	3	1 1/2	8	5	13	2 1/2	7 7/8	7 1/4																	10.83
6	24	21	1 1/2	3/8	3	2	4 3/4	7/8	3 1/4	3																	1.75
7	18	15 1/2	1	3/8	2 1/2	1 1/2	3 7/8	5/8	2 3/8	2 1/4																	0.97

**STANDARD SIGN**  
**R1-2**

WISCONSIN DEPT OF TRANSPORTATION

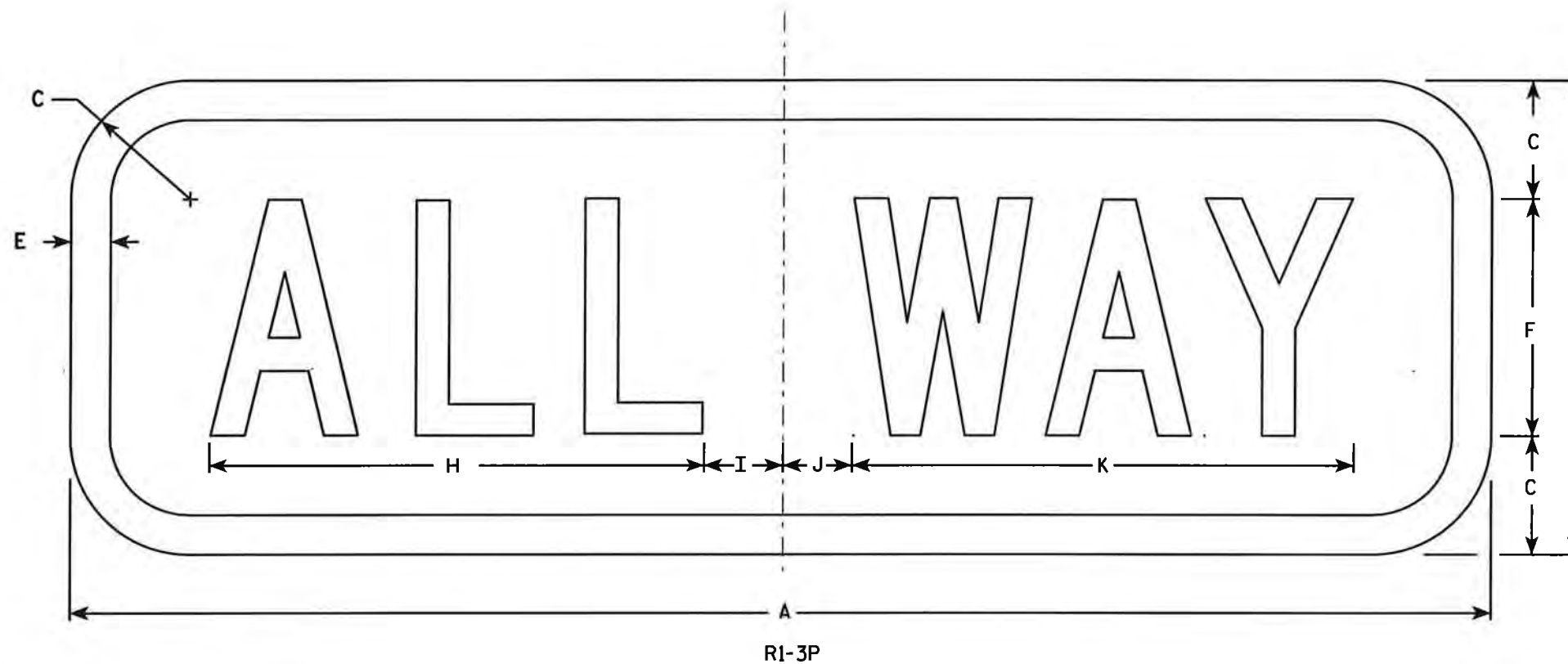
APPROVED *Matthew R. Rauch*  
For State Traffic Engineer

DATE 11/02/10 PLATE NO. R1-2.11

PROJECT NO: \_\_\_\_\_ HWY: \_\_\_\_\_ COUNTY: \_\_\_\_\_ SHEET N122 **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. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.



7

7

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	6	1 1/2		1/2	3		6 1/4	1 1/4	7/8	6 3/8																0.75
2S	18	6	1 1/2		1/2	3		6 1/4	1 1/4	7/8	6 3/8																1.5
2M	24	9	1 1/2		1/2	5		9 1/4	1 1/4	3/4	9 3/4																1.5
3	30	12	2 1/4		5/8	6		11	2 1/4	1 1/2	11 3/4																2.5
4																											
5																											

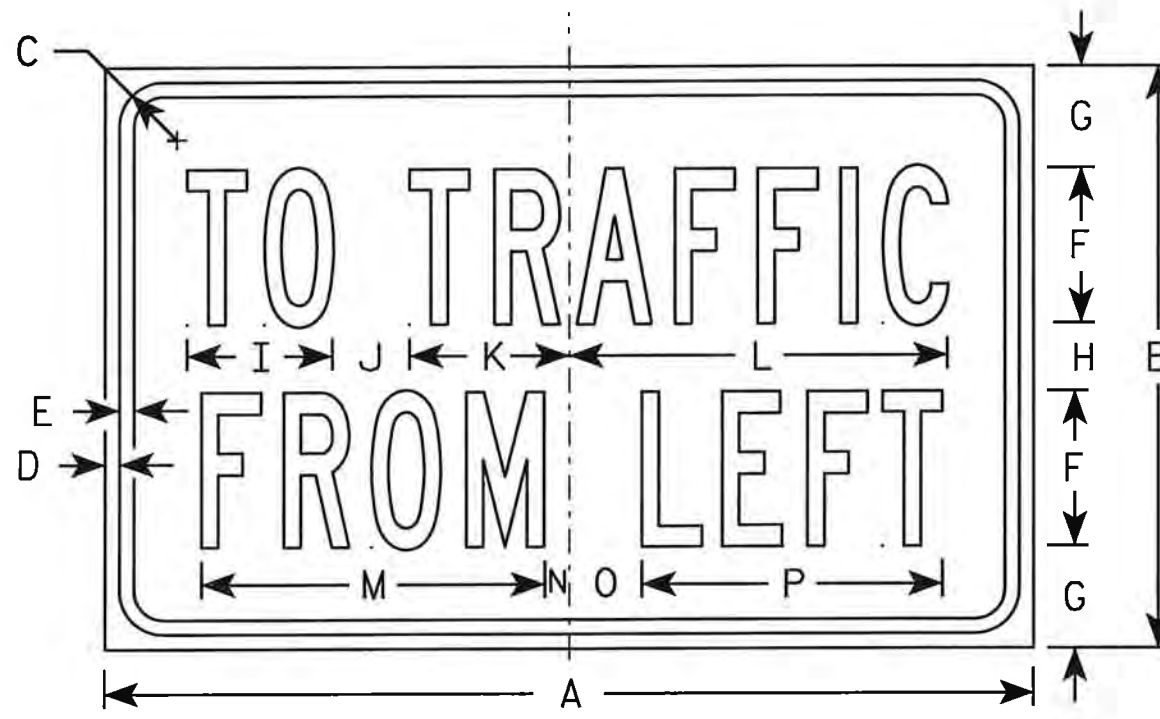
**STANDARD SIGN**  
**R1-3P**

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Raub*  
for State Traffic Engineer

DATE 11/02/10 PLATE NO. R1-3P.1

PROJECT NO: \_\_\_\_\_ HWY: \_\_\_\_\_ COUNTY: \_\_\_\_\_ SHEET N123 **E**



R1-54

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 - B

7

7

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	24	15	1 1/8	3/8	3/8	4	2 5/8	1 3/4	3 3/4	2	4 1/8	9 3/4	8 7/8	5/8	1 7/8	7 3/4											2.5
2M	24	15	1 1/8	3/8	3/8	4	2 5/8	1 3/4	3 3/4	2	4 1/8	9 3/4	8 7/8	5/8	1 7/8	7 3/4											2.5
3																											
4																											
5																											

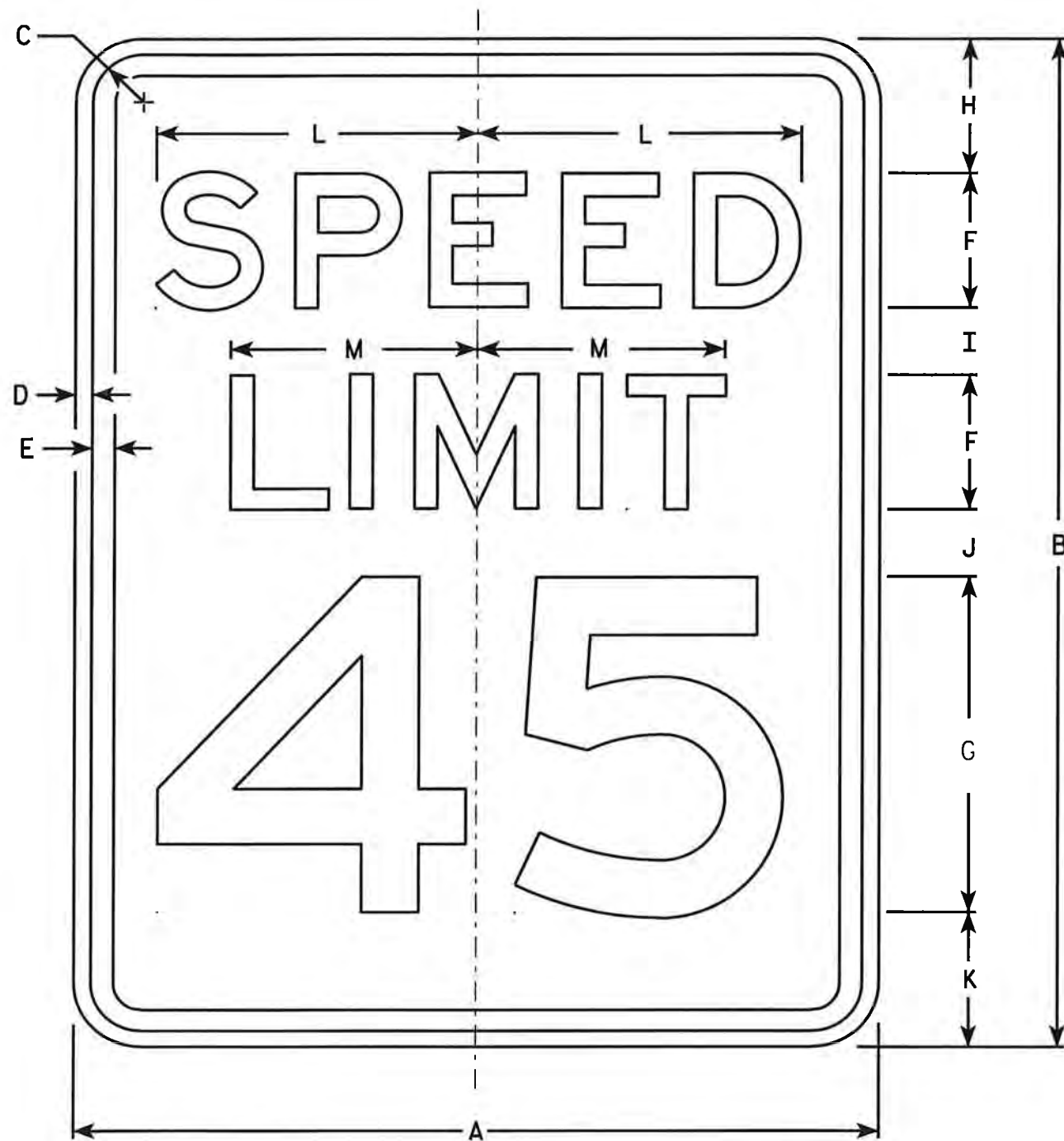
**STANDARD SIGN**  
R1-54

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Raush*  
for State Traffic Engineer

DATE 12/03/10 PLATE NO. R1-54.2

PROJECT NO: \_\_\_\_\_ HWY: \_\_\_\_\_ COUNTY: \_\_\_\_\_ SHEET N124 **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

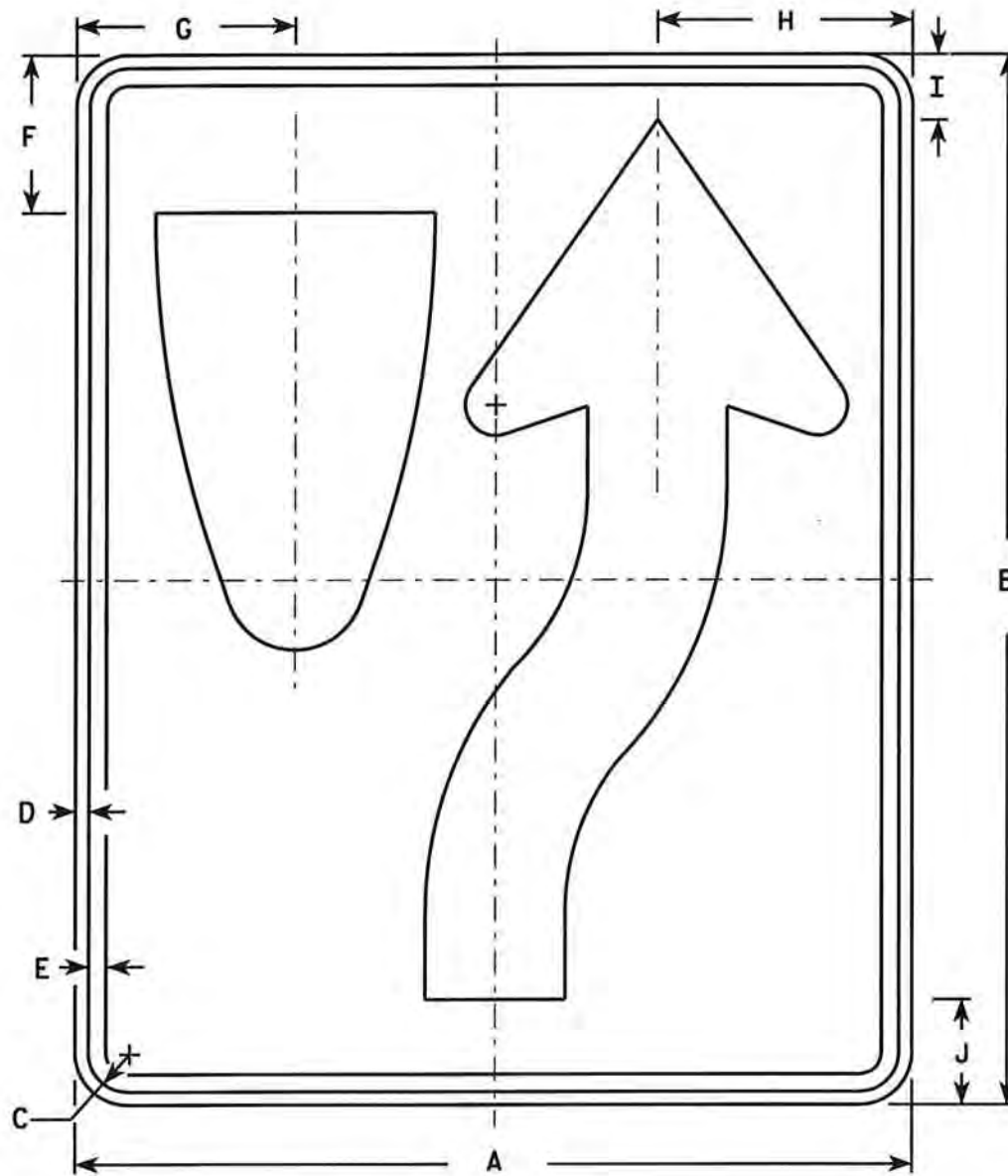
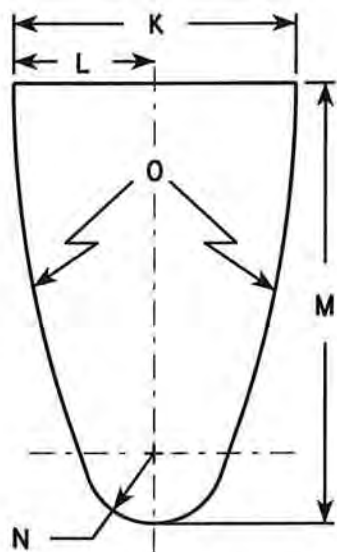
APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

DATE 5/26/10 PLATE NO. R2-113

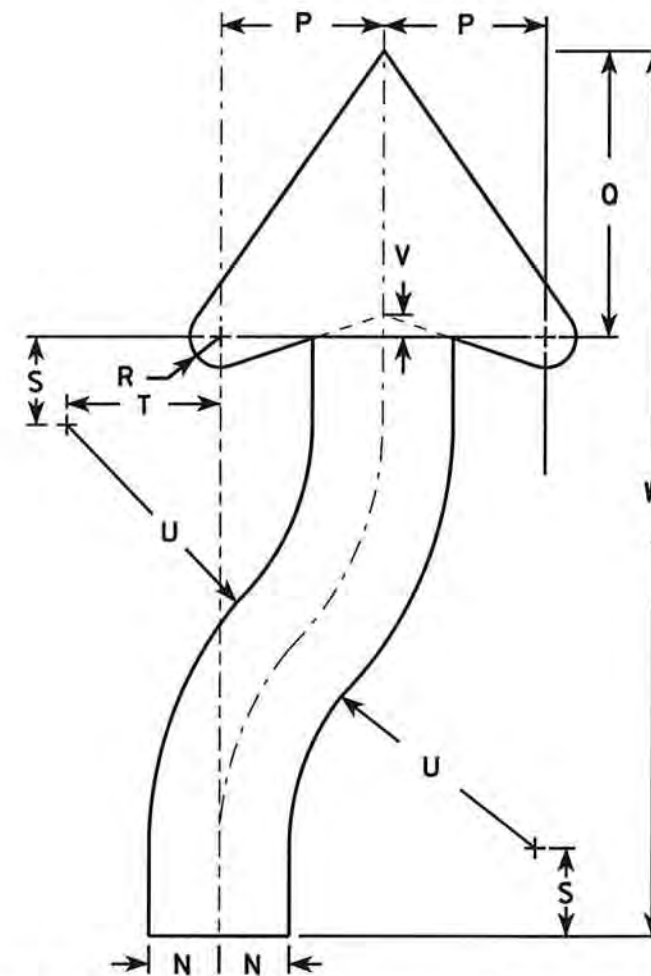
PROJECT NO: \_\_\_\_\_ HWY: \_\_\_\_\_ COUNTY: \_\_\_\_\_ SHEET N125 **E**

**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.



R4-7



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:

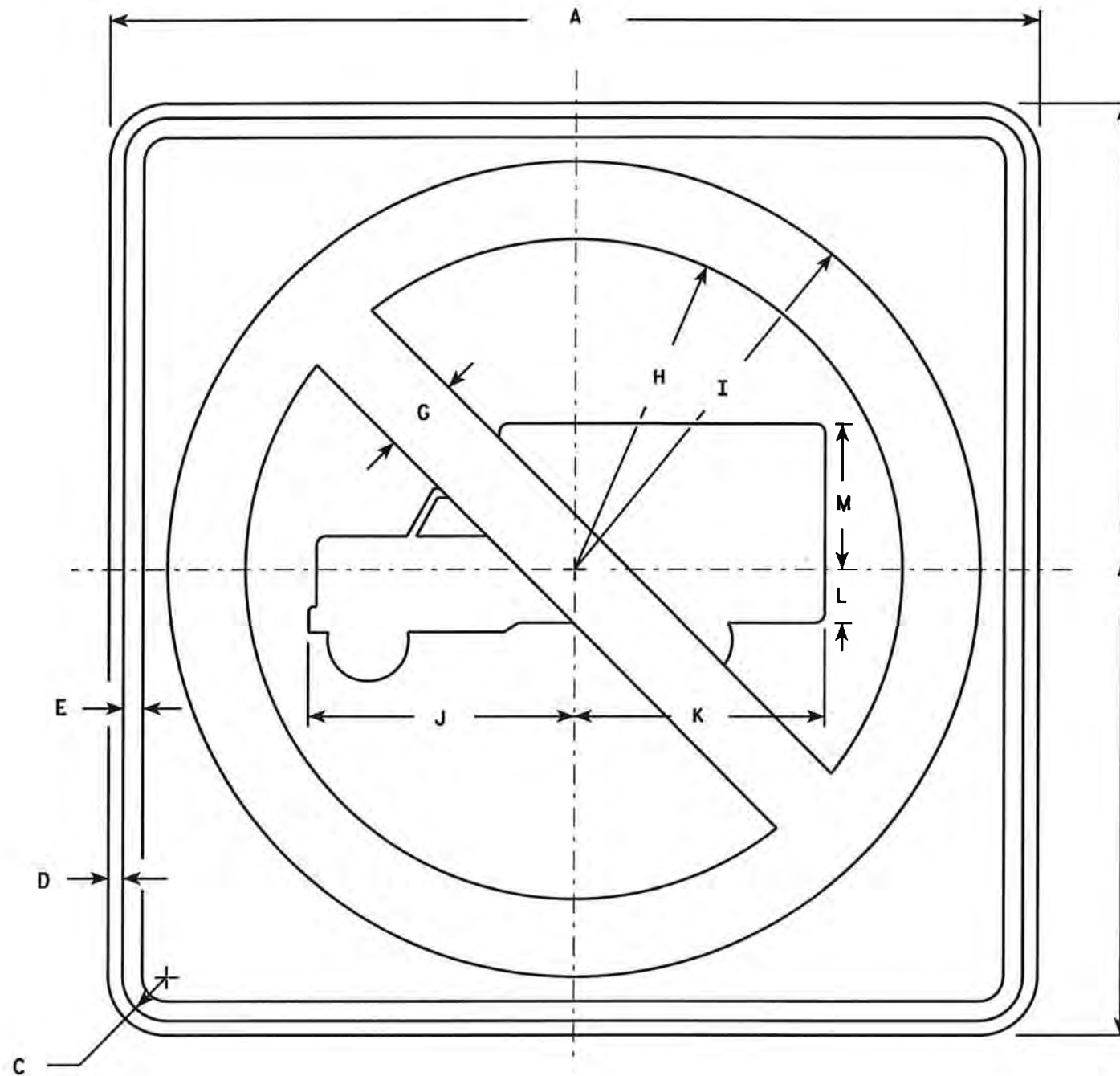
SHEET N126

E



**NOTES**

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
Background - White  
Message - See Note 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. Circle & Diagonal - Reflective red.  
Truck Symbol & Border - Non-reflective black.



R5-2

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																											
2S	24		1 1/8	3/8	1/2		2	8 1/2	10 1/2	6 7/8	6 1/2	1 3/8	3 3/4														4.0
2M	24		1 1/8	3/8	1/2		2	8 1/2	10 1/2	6 7/8	6 1/2	1 3/8	3 3/4														4.0
3	30		1 3/8	1/2	5/8		2 1/2	10 5/8	13 1/8	8 1/2	8 1/8	1 5/8	4 3/4														6.25
4	36		1 5/8	5/8	3/4		3	12 3/4	15 3/4	10 1/4	9 3/4	2	5 3/4														9.0
5	48		2 1/4	3/4	1		4	17	21	13 5/8	13	2 5/8	7 5/8														16.0

STANDARD SIGN  
R5-2

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

DATE 3/29/2011 PLATE NO. R5-2.6

PROJECT NO:

HWY:

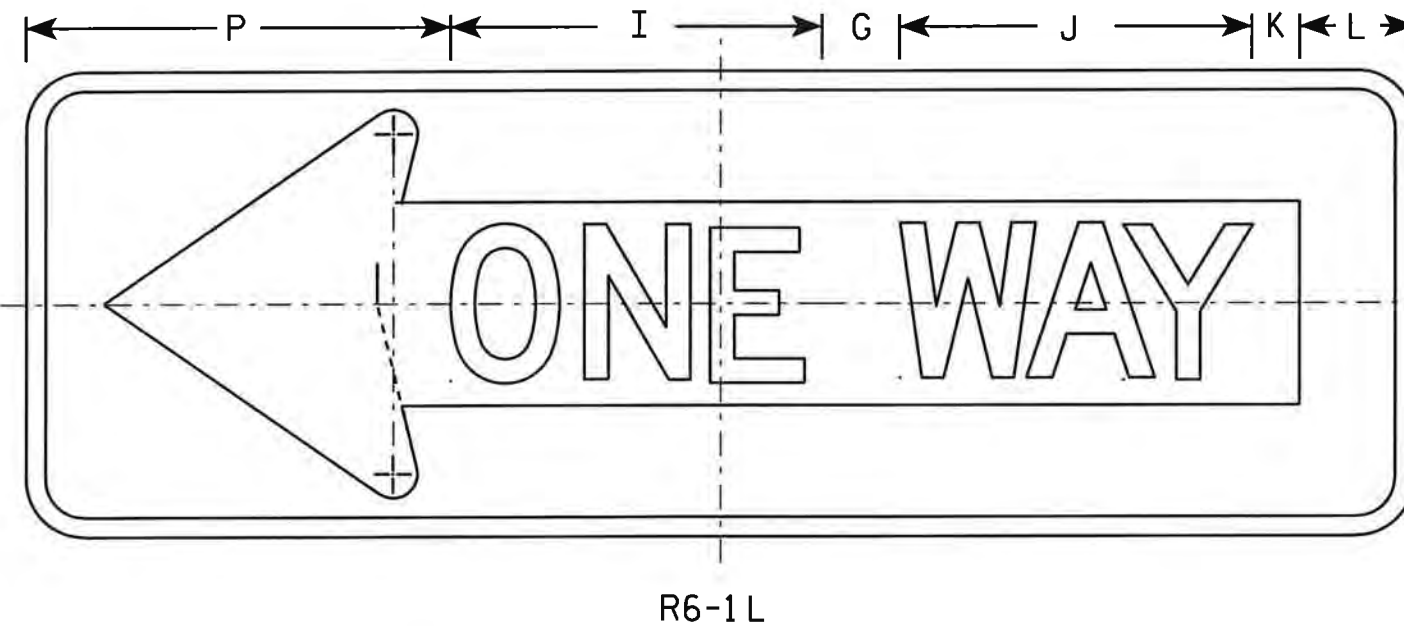
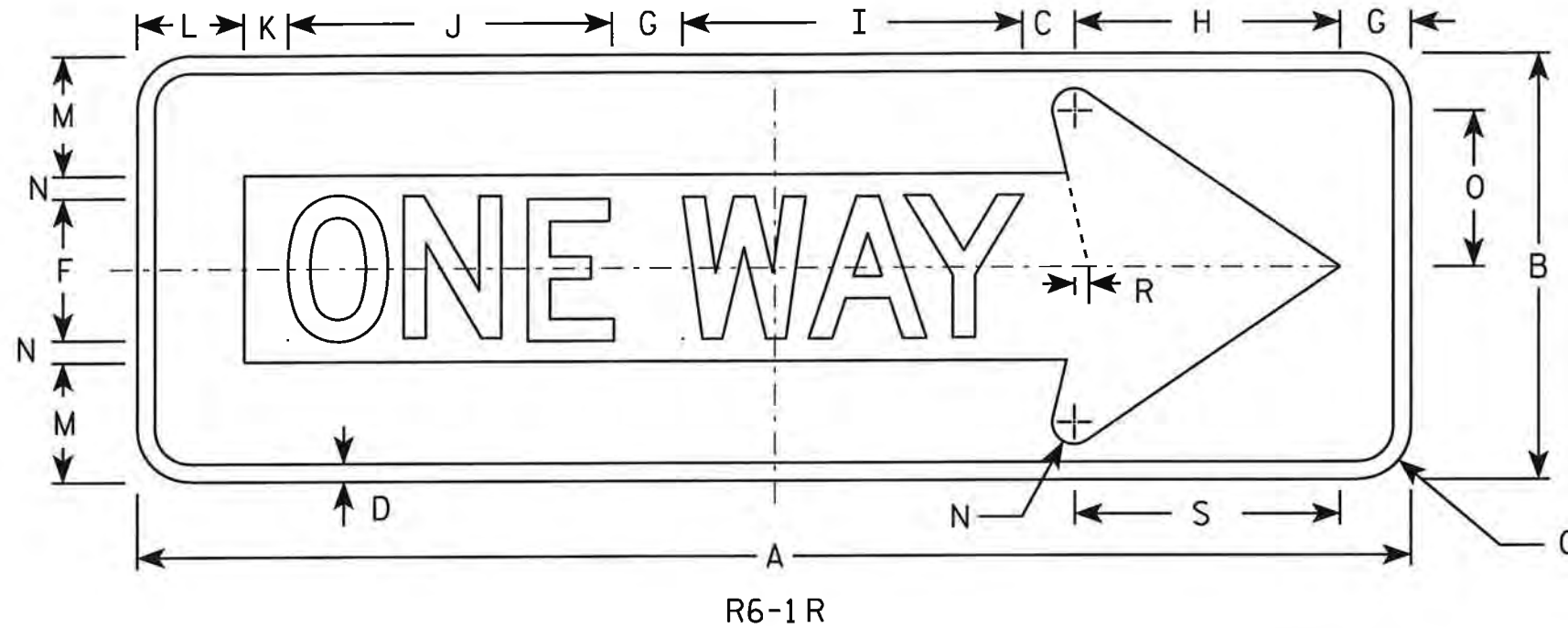
COUNTY:

SHEET N127

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 - BLACK  
Message - BLACK LEGEND & WHITE ARROW & BORDER
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.



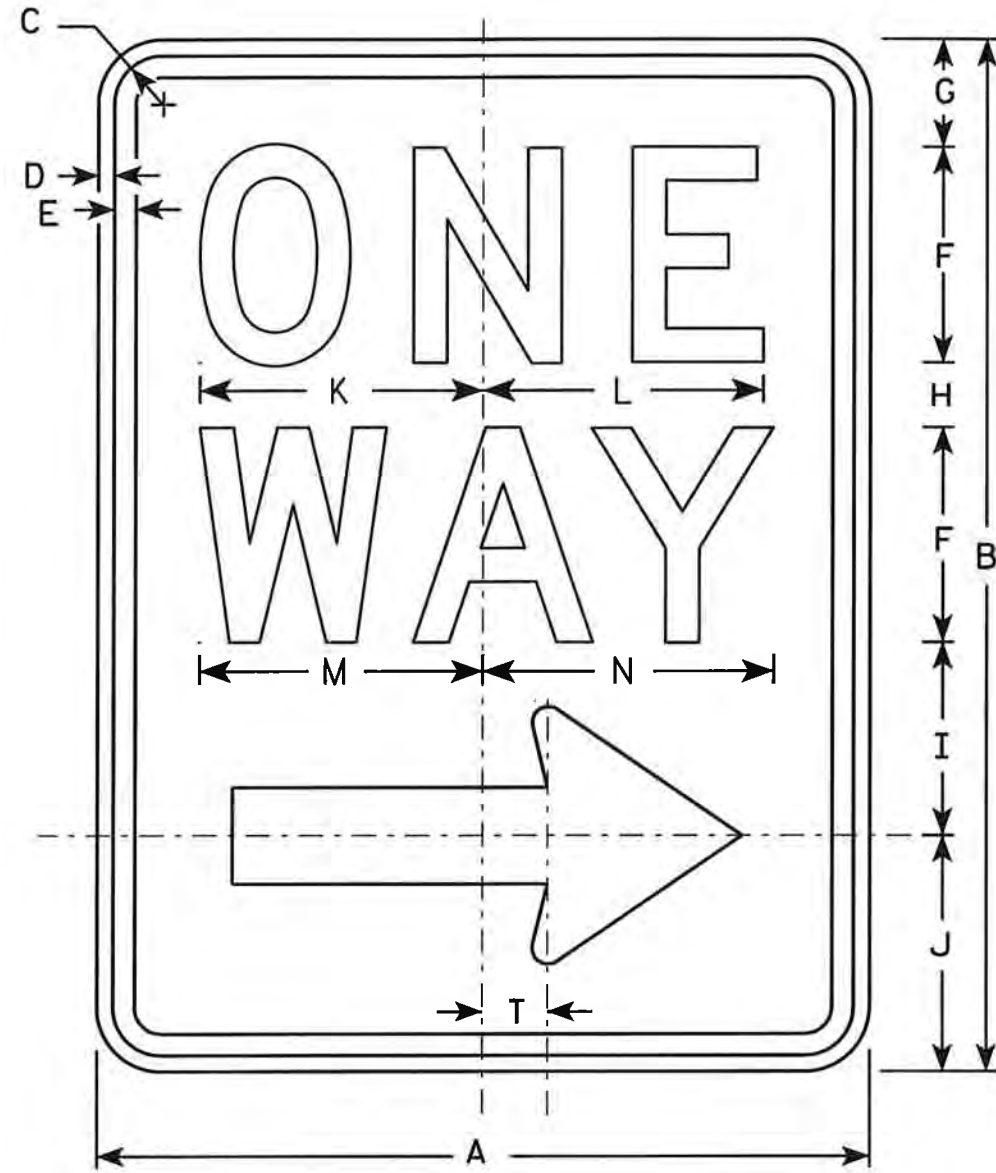
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	36	12	1 1/2	1/2		4	2	7 1/2	9 5/8	9 1/8	1 1/4	3	3 3/8	5/8	4 3/8	11		3/8	7 1/2								3.0
2M	54	18	2 1/4	3/4		6	3	11 1/4	14 1/2	13 5/8	1 7/8	4 1/2	5	1	6 1/2	16 1/2		5/8	11 1/4								6.75
3	54	18	2 1/4	3/4		6	3	11 1/4	14 1/2	13 5/8	1 7/8	4 1/2	5	1	6 1/2	16 1/2		5/8	11 1/4								6.75
4	54	18	2 1/4	3/4		6	3	11 1/4	14 1/2	13 5/8	1 7/8	4 1/2	5	1	6 1/2	16 1/2		5/8	11 1/4								6.75
5																											

**STANDARD SIGN**  
**R6-1 L & R**

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Raub*  
For State Traffic Engineer

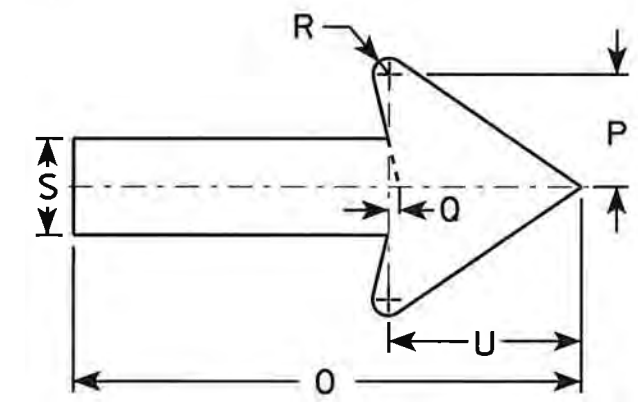
DATE 12/17/10 PLATE NO R6-1.2



R6-2R

**NOTES**

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
Background - White  
Message - Black
3. Message Series - D
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. R6-2L same as R6-2R except arrow points to the left.



7

7

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z
1	18	24	1 1/8	3/8	1/2	5	2 1/2	1 1/2	4 1/2	5 1/2	6 5/8	6 1/2	6 5/8	6 3/4	11 7/8	2 5/8	1/4	3/8	2 1/4	1 1/2	4 1/2					
2S	24	30	1 1/8	3/8	1/2	6	3	2 1/2	5 1/2	7	8 1/8	8 1/8	8 1/2	8 5/8	16	3 1/2	3/8	1/2	3	2	6					
2M	30	36	1 3/8	1/2	5/8	8	2 1/2	2 5/8	6 7/8	8	10 1/2	10 1/2	11 1/4	11 1/4	20	4 3/8	1/2	5/8	3 3/4	2 1/2	7 1/2					
3	36	48	1 7/8	1/2	5/8	10	5 1/4	3 1/4	9	10 1/2	12 3/4	12 3/4	13 1/4	13 1/2	24	5 5/8	1/2	3/4	4 3/4	3	9					
4	36	48	1 7/8	1/2	5/8	10	5 1/4	3 1/4	9	10 1/2	12 3/4	12 3/4	13 1/4	13 1/2	24	5 5/8	1/2	3/4	4 3/4	3	9					
5																										

**STANDARD SIGN**  
**R6-2 R&L**

WISCONSIN DEPT OF TRANSPORTATION

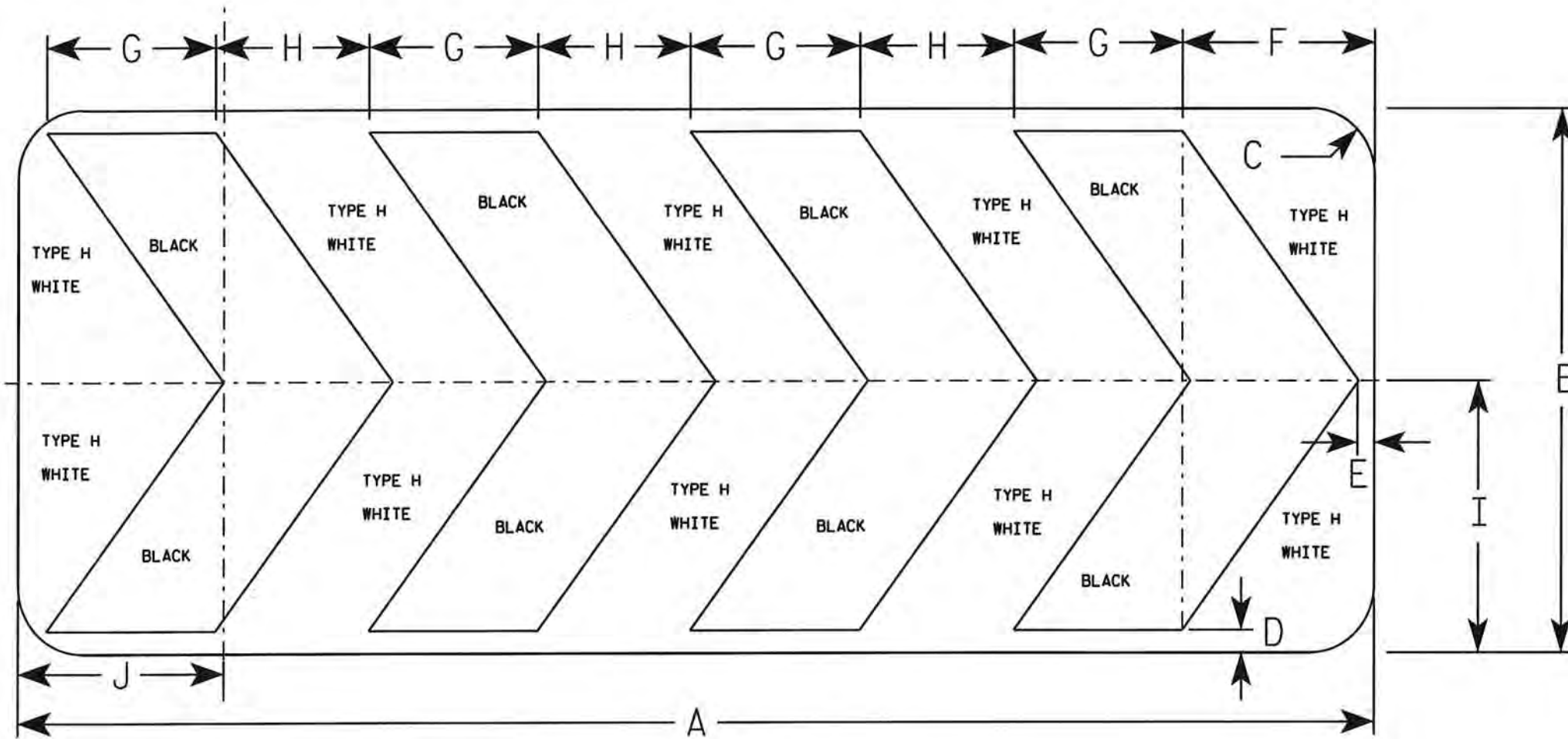
APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

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

PROJECT NO: \_\_\_\_\_ HWY: \_\_\_\_\_ COUNTY: \_\_\_\_\_ SHEET N129 **E**

**NOTES**

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
Background - WHITE  
Message - 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.



R6-4B

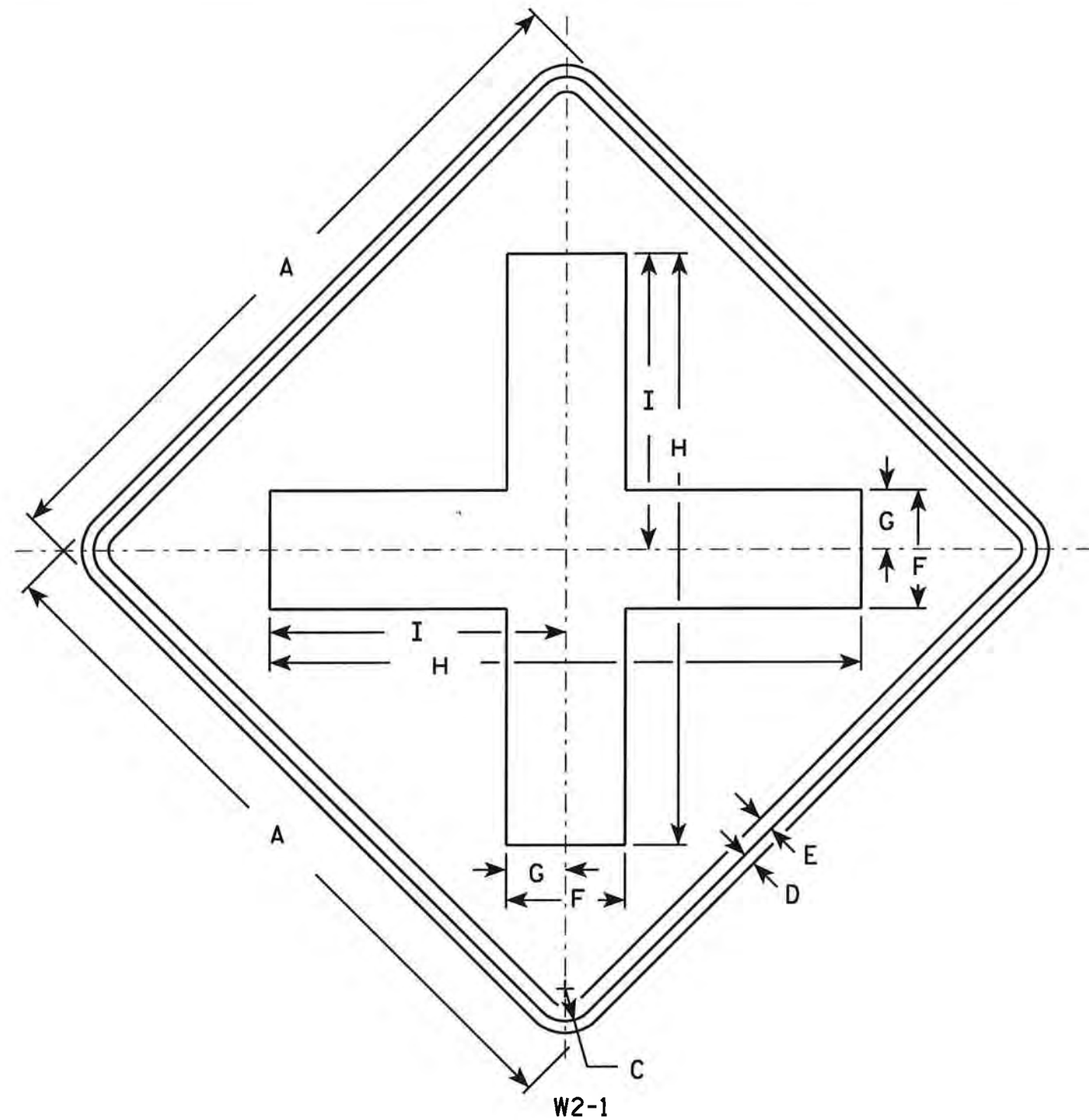
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	60	24	2 1/4	1	3/4	8 1/2	7 1/2	6 3/4	12	9 1/8																	10.0
2M	60	24	2 1/4	1	3/4	8 1/2	7 1/2	6 3/4	12	9 1/8																	10.0
3																											
4																											
5																											

**STANDARD SIGN**  
**R6-4B**

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Raub*  
For State Traffic Engineer

DATE 1/03/11 PLATE NO. R6-4B.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 - 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.

7

7

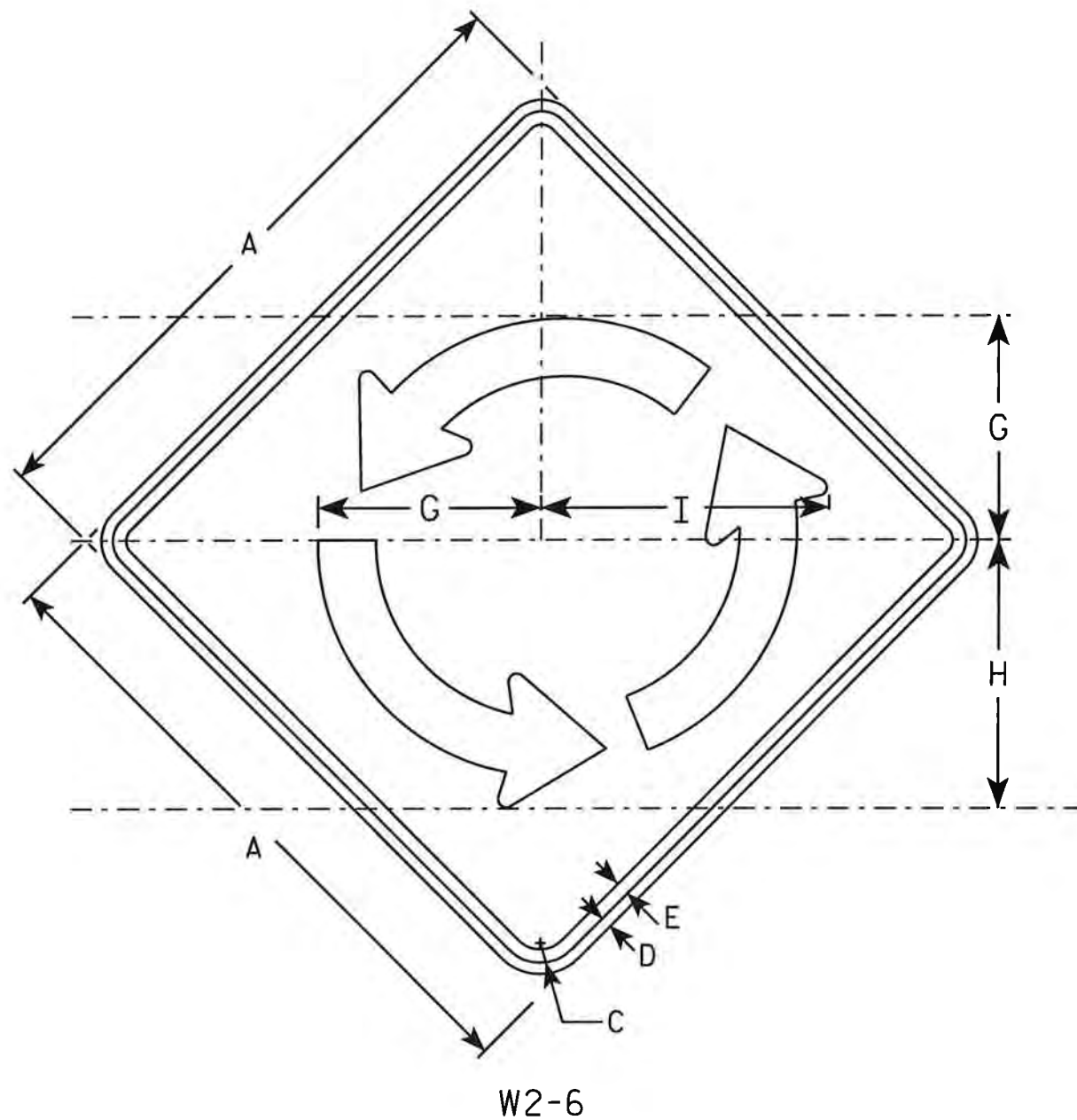
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	24		1 1/8	3/8	1/2	4	2	20	10																		4.0
2S	30		1 3/8	1/2	5/8	5	2 1/2	25	12 1/2																		6.25
2M	30		1 3/8	1/2	5/8	5	2 1/2	25	12 1/2																		6.25
3	36		1 5/8	5/8	3/4	6	3	30	15																		9.0
4	48		2 1/4	3/4	1	8	4	40	20																		16.0
5																											

**STANDARD SIGN**  
**W2-1**

WISCONSIN DEPT OF TRANSPORTATION

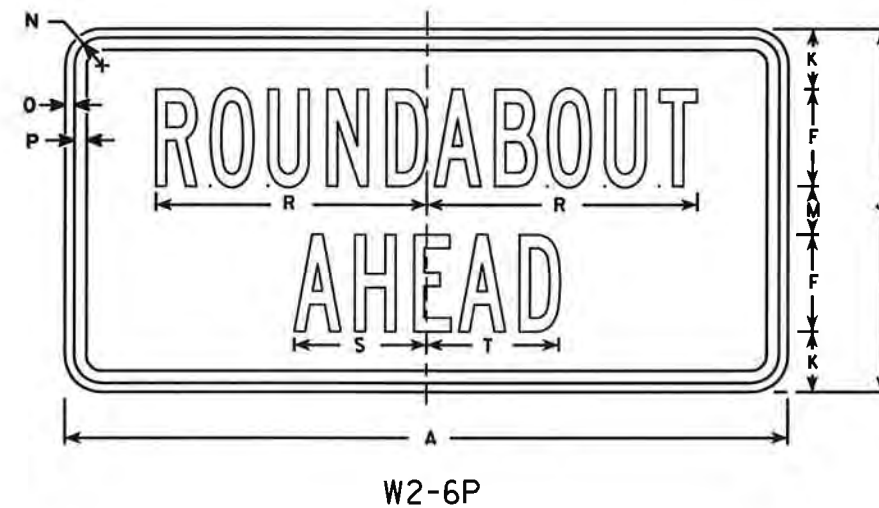
APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

DATE 3/18/11 PLATE NO. W2-1.8



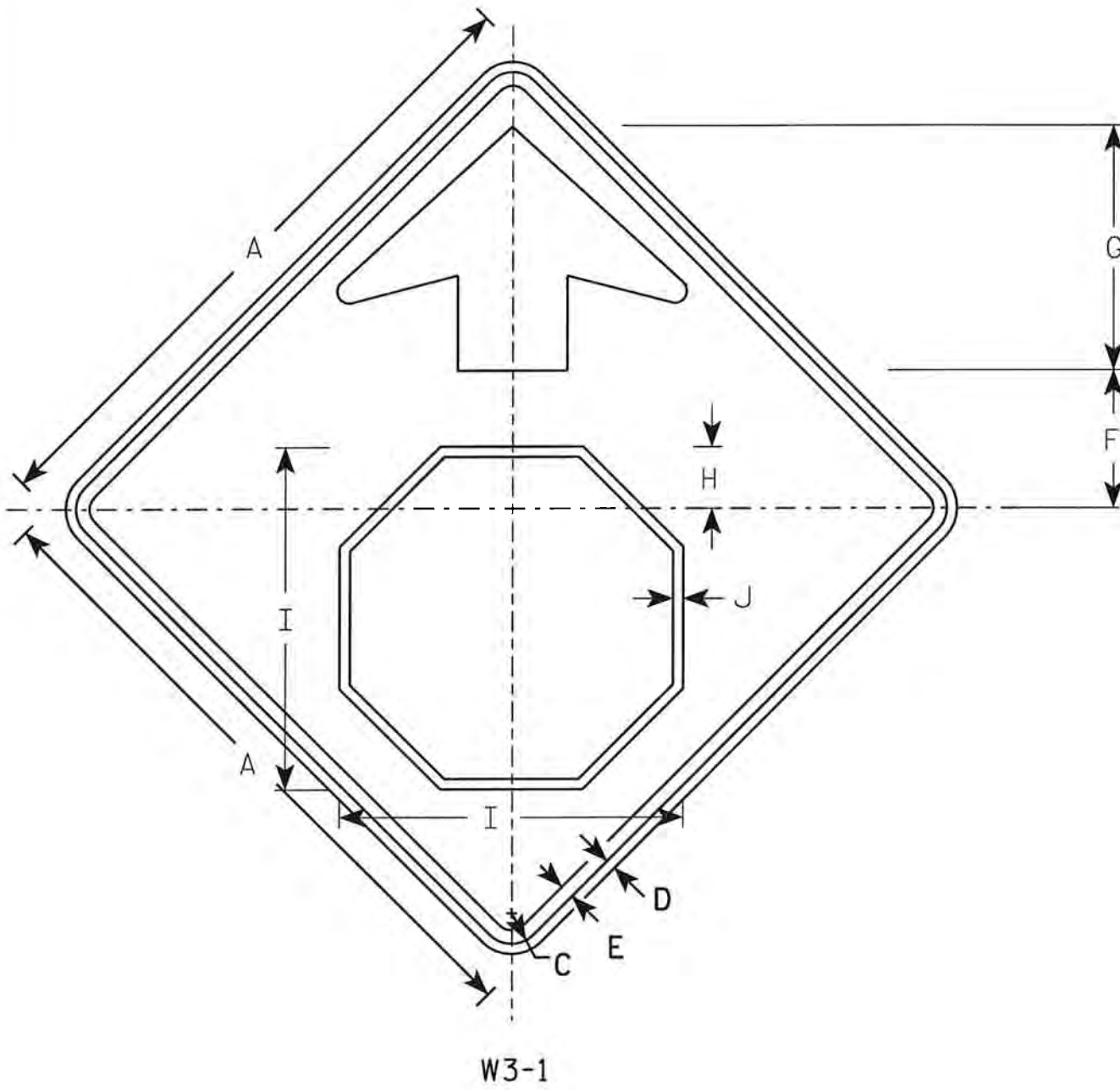
NOTES

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
Background - YELLOW  
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	W2-6 Area sq. ft.	W2-6P Area sq. ft.
1																										
2S	30		1 3/8	1/2	5/8	4	10 3/8	12 1/2	13 1/2	15	2 1/2		2	1 1/8	3/8	1/2		11 1/4	5 1/2	5 1/2					6.25	3.12
2M	30		1 3/8	1/2	5/8	4	10 3/8	12 1/2	13 1/2	15	2 1/2		2	1 1/8	3/8	1/2		11 1/4	5 1/2	5 1/2					6.25	3.12
3	36		1 5/8	5/8	3/4	5	12 1/2	15	16 1/4	18	2 5/8		2 3/4	1 1/8	3/8	1/2		14	7	6 3/4					9.00	4.50
4	48		2 1/4	3/4	1	6	16 5/8	20	16 1/4	24	4 3/8		3 5/8	1 3/8	1/2	5/8		17	8 1/4	8 1/4					16.0	8.0
5																										

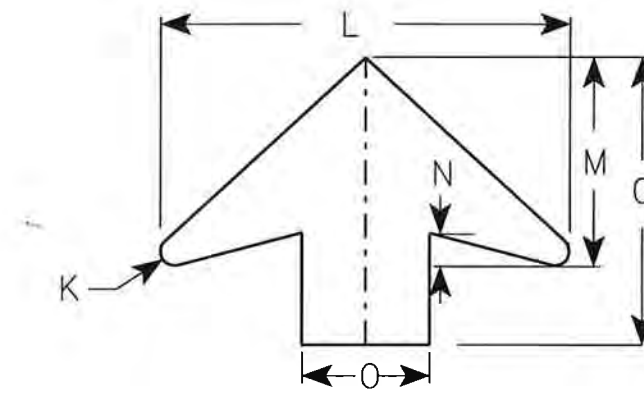
<b>STANDARD SIGN</b>	
<b>W2-6</b>	
WISCONSIN DEPT OF TRANSPORTATION	
APPROVED	<i>Matthew R. Raush</i> For State Traffic Engineer
DATE <u>3/21/11</u>	PLATE NO. <u>W2-6.4</u>



W3-1

NOTES

1. All Signs Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
 Background - YELLOW  
 Arrow & Border - BLACK  
 Stop Symbol - WHITE BORDER ON RED BACKGROUND



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8	6 1/4	11 1/4	2 7/8	15 3/4	1/2	1/2	16	8	1 1/4	5												6.25
2S	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 1/2	19	5/8	5/8	19 1/4	9 3/4	1 5/8	6												9.0
2M	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 1/2	19	5/8	5/8	19 1/4	9 3/4	1 5/8	6												9.0
3	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 1/2	19	5/8	5/8	19 1/4	9 3/4	1 5/8	6												9.0
4	48		2 1/4	3/4	1	10	17 7/8	4 1/2	25 1/8	3/4	7/8	25 5/8	13	2	8												16.0
5	48		2 1/4	3/4	1	10	17 7/8	4 1/2	25 1/8	3/4	7/8	25 5/8	13	2	8												16.0

**STANDARD SIGN**  
W3-1

WISCONSIN DEPT OF TRANSPORTATION

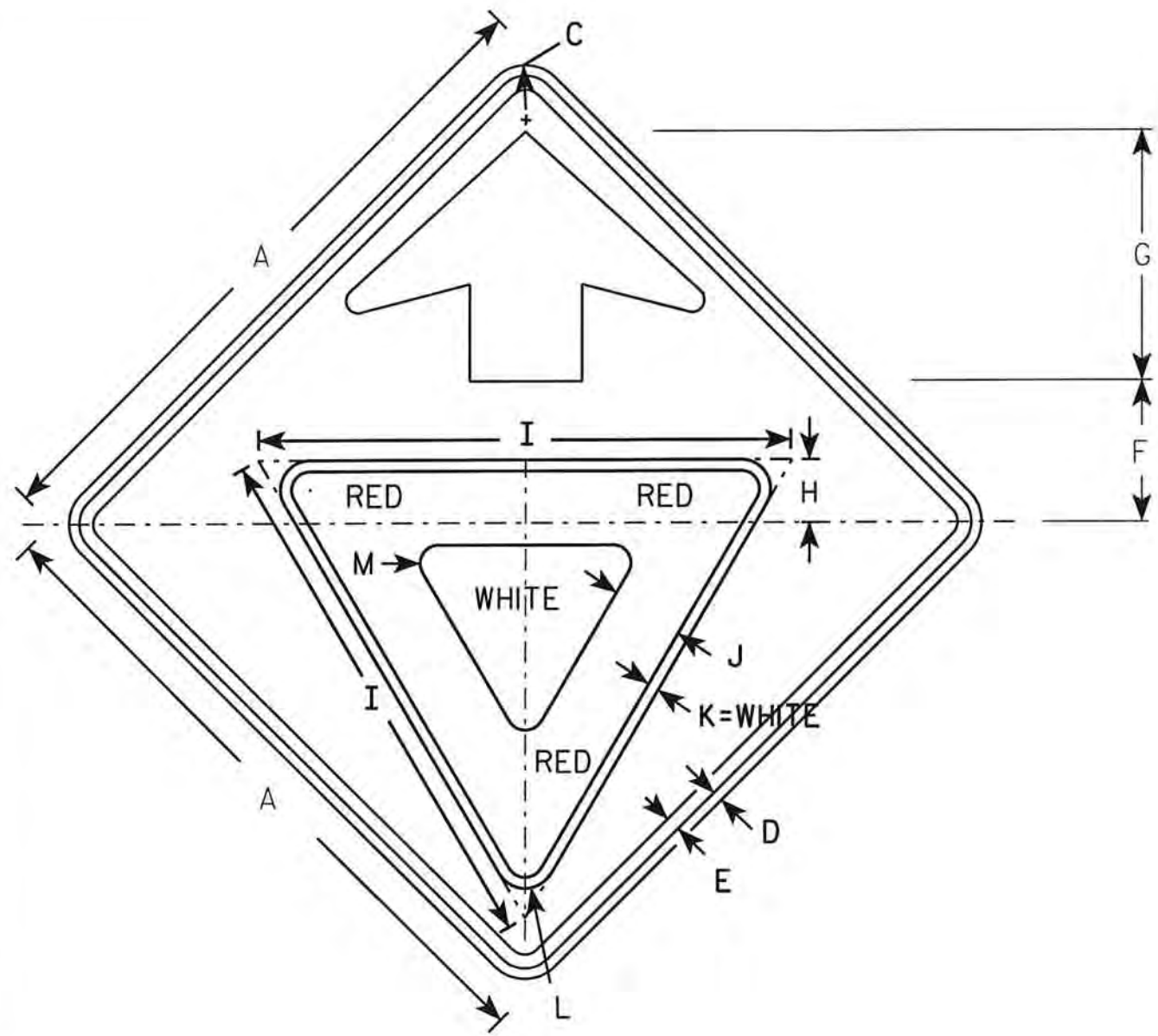
APPROVED *Matthew R. Rauch*  
 For State Traffic Engineer

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

PROJECT NO:

SHEET N133

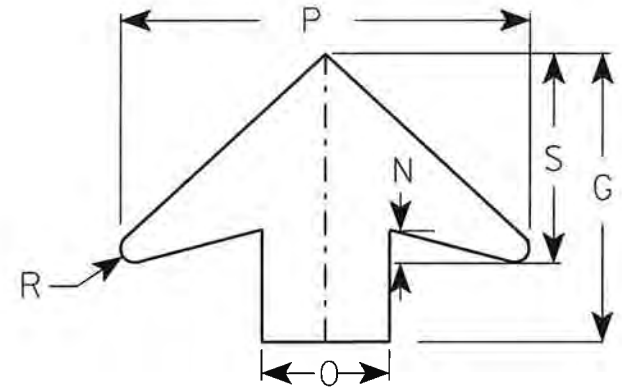
E



W3-2

NOTES

1. All Signs Type II - Type F Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
 Background - YELLOW  
 Arrow & Border - BLACK  
 Yield Symbol - WHITE BORDER ON RED BACKGROUND



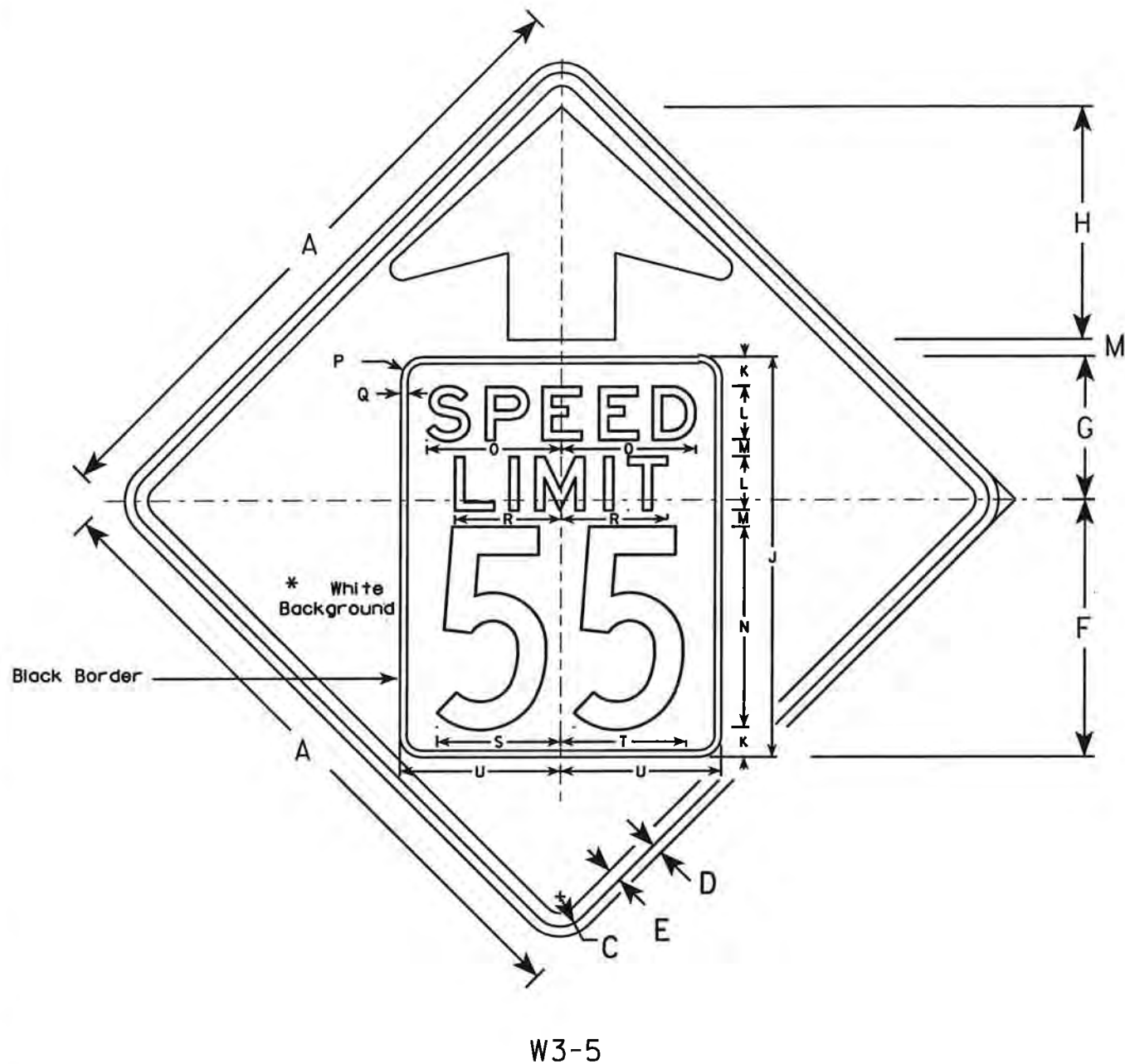
ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8	6 1/4	11 1/4	3	25	3 3/8	1/2	1 3/8	7/8	1 1/4	5	16		1/2	8								6.25
2S	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 3/8	28	3 3/4	5/8	1 1/2	1	1 5/8	6	19 1/4		5/8	9 3/4								9.0
2M	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 3/8	28	3 3/4	5/8	1 1/2	1	1 5/8	6	19 1/4		5/8	9 3/4								9.0
3	36		1 5/8	5/8	3/4	7 1/2	13 1/2	3 3/8	28	3 3/4	5/8	1 1/2	1	1 5/8	6	19 1/4		5/8	9 3/4								9.0
4	48		2 1/4	3/4	1	10	17 7/8	4 1/2	38	5	3/4	2 1/8	1 3/8	2	8	25 5/8		7/8	13								16.0
5	48		2 1/4	3/4	1	10	17 7/8	4 1/2	38	5	3/4	2 1/8	1 3/8	2	8	25 5/8		7/8	13								16.0

7

7



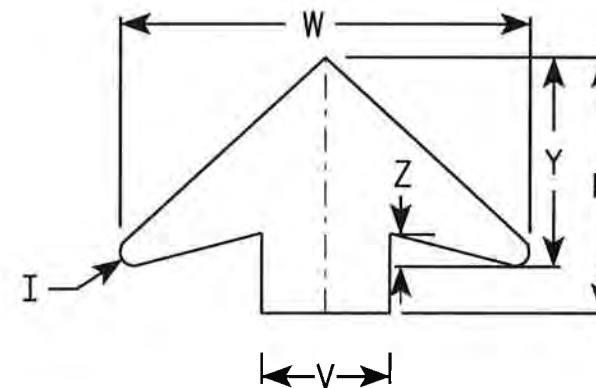


W3-5

NOTES

1. All Signs Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color: \*  
Background - YELLOW\*  
Message - BLACK
3. Message Series - C
4. Substitute appropriate numerals and optically adjust spacing to achieve proper balance

\*Speed Limit Sign shall have a White Background



ARROW DETAIL

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1																											
2S	36		1 5/8	5/8	3/4	14 1/2	9 1/2	11 1/2	5/8	24	2	3	1	12	7 1/8	1 1/2	3/8	5 3/4	7 1/4	7 1/8	9	6	19 1/4		9 3/4	1 5/8	9.0
2M	36		1 5/8	5/8	3/4	14 1/2	9 1/2	11 1/2	5/8	24	2	3	1	12	7 1/8	1 1/2	3/8	5 3/4	7 1/4	7 1/8	9	6	19 1/4		9 3/4	1 5/8	9.0
3	36		1 5/8	5/8	3/4	14 1/2	9 1/2	11 1/2	5/8	24	2	3	1	12	7 1/8	1 1/2	3/8	5 3/4	7 1/4	7 1/8	9	6	19 1/4		9 3/4	1 5/8	9.0
4	48		2 1/4	3/4	1	19 1/4	10 3/4	17 3/8	7/8	30	2 1/4	4	1 1/4	15	10	1 5/8	1/2	8	9 1/4	9 3/8	12	8	25 5/8		13	2	16.0
5	48		2 1/4	3/4	1	19 1/4	10 3/4	17 3/8	7/8	30	2 1/4	4	1 1/4	15	10	1 5/8	1/2	8	9 1/4	9 3/8	12	8	25 5/8		13	2	16.0

**STANDARD SIGN**  
**W3-5**

WISCONSIN DEPT OF TRANSPORTATION

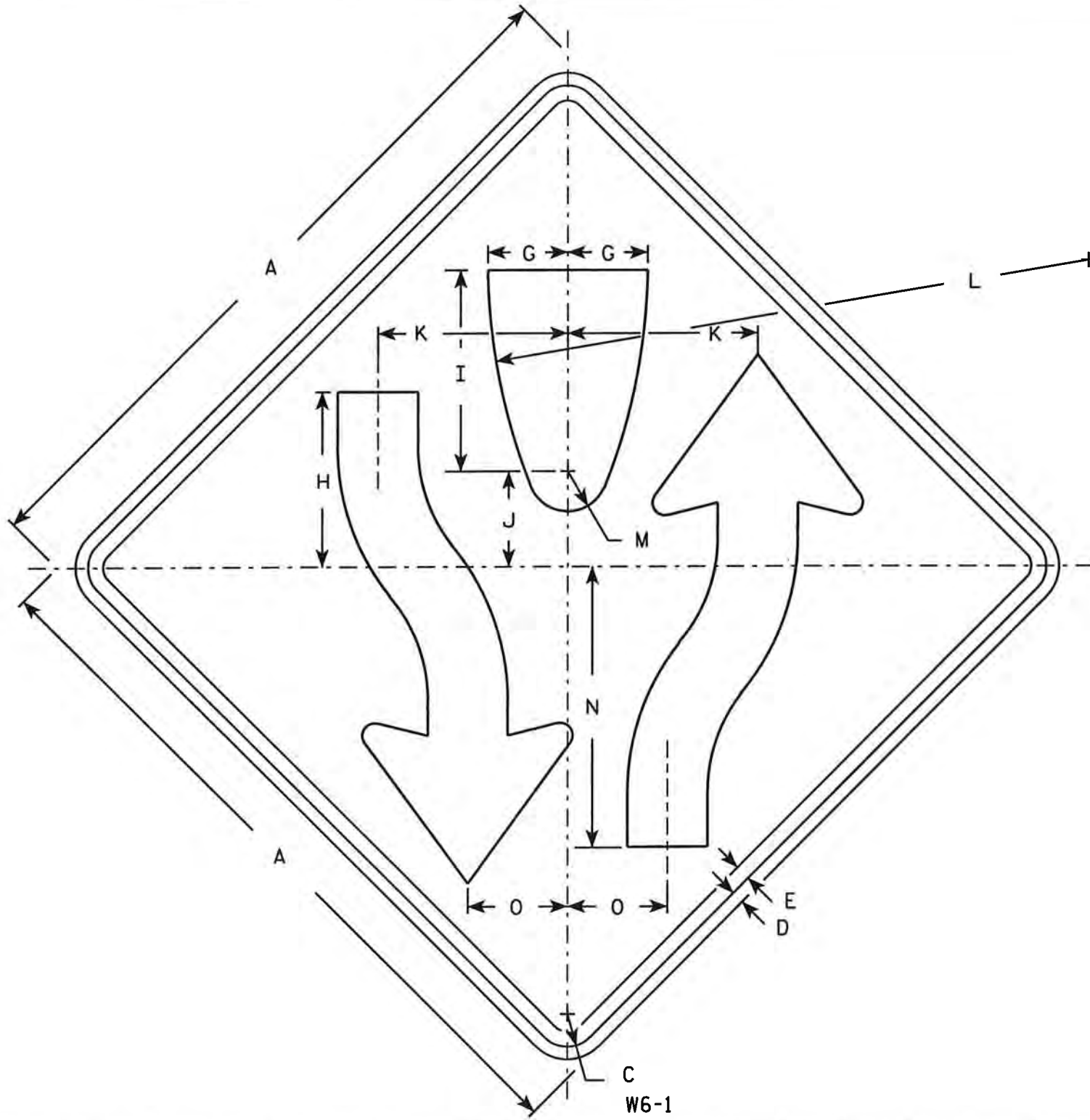
APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

DATE 11/08/10 PLATE NO. W3-5.3

PROJECT NO:

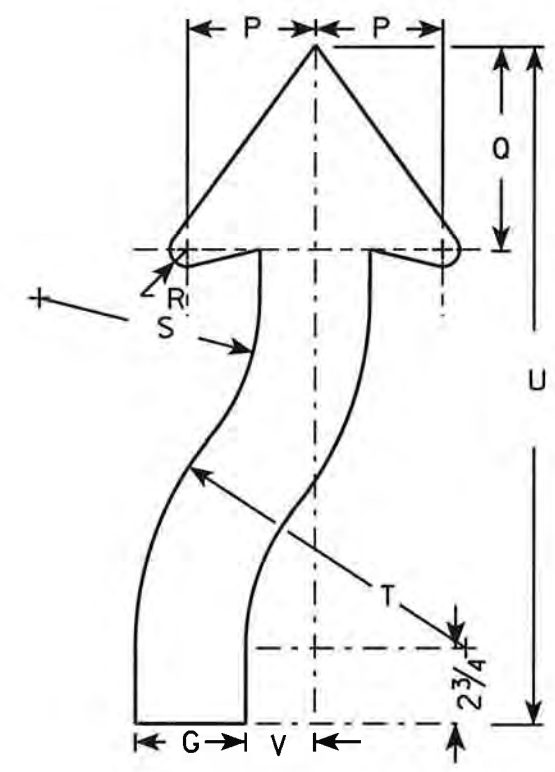
SHEET N135

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 - 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**

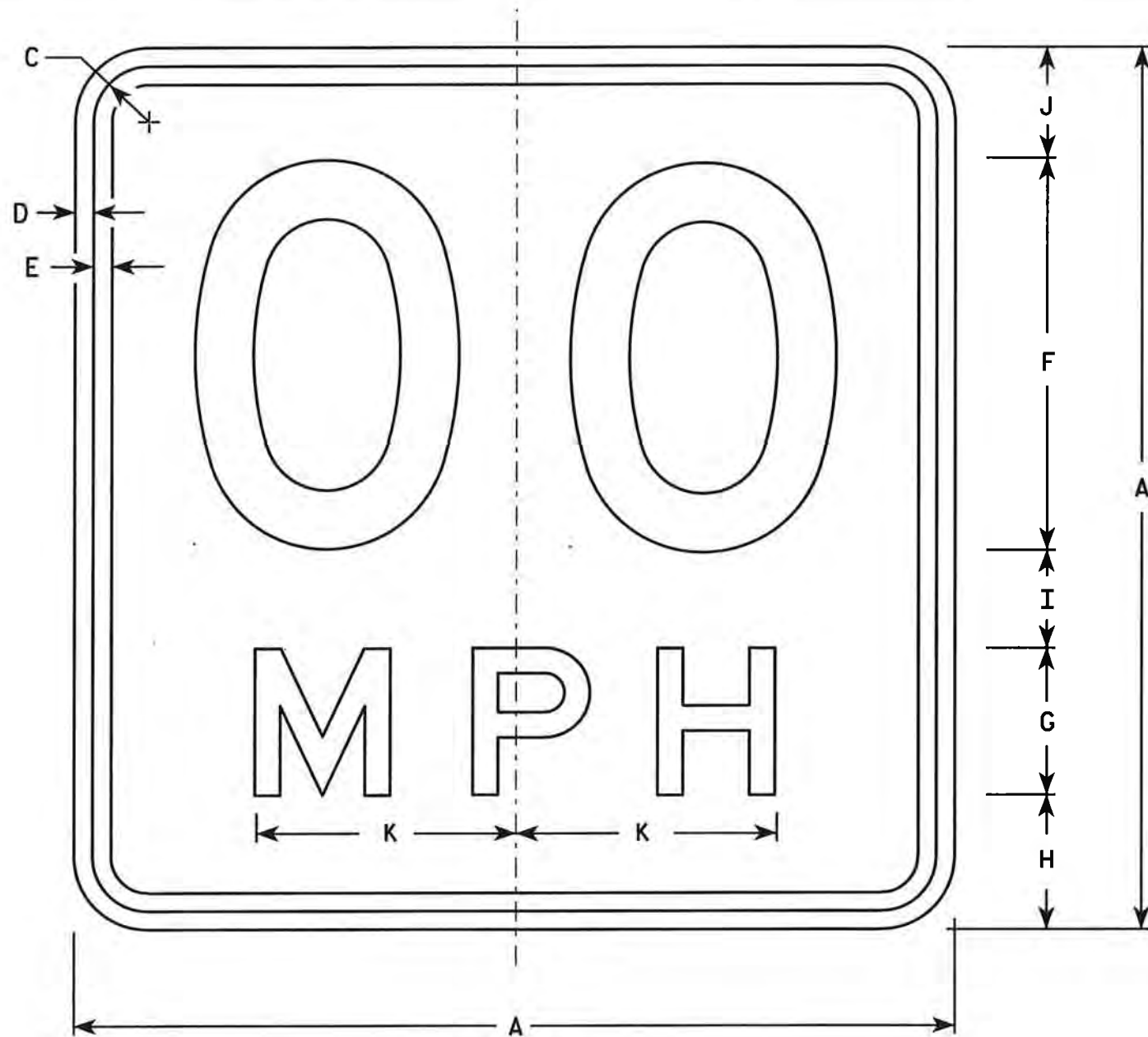
SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	30		1 3/8	1/2	5/8		3 1/4	8	8 1/4	4 1/8	7 7/8	25	1 3/4	11 5/8	4 1/8	3 7/8	6 3/4	5/8	6 5/8	9 7/8	21 5/8	2					6.25
2S	36		1 5/8	5/8	3/4		4	8 3/4	10	4 3/4	9 1/2	30	2	14	5	4 5/8	7 3/8	7/8	8	12	24 1/2	2 1/2					9.0
2M	36		1 5/8	5/8	3/4		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. Raush*  
For State Traffic Engineer

DATE 3/22/11 PLATE NO. W6-1.13



W13-1

\* For 30" x 30" Warning Signs, use 18" x 18" W13-1 signs.  
 For 36" x 36" Warning Signs, use 24" x 24" W13-1 signs.

**NOTES**

1. Sign is Type II - Type H Reflective - reference WIS DOT Standard Specification for HIGHWAY and STRUCTURE CONSTRUCTION latest edition.
2. Color:  
     Background - Yellow  
     Message - Black
3. Message Series - See Note 6
4. Corners may be square or rounded when base material is plywood but borders shall be rounded as shown. When base material is metal, the corners and borders shall be rounded.
5. Substitute appropriate numerals and optically space about centerline to achieve proper balance.
6. Line 1 is Series D  
     Line 2 is Series E

SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z	Area sq. ft.
1	18		1 1/8	3/8	3/8	8	3	2 3/4	2	2 1/4	5 3/8																2.25
* 2S	18		1 1/8	3/8	3/8	8	3	2 3/4	2	2 1/4	5 3/8																2.25
* 2M	18		1 1/8	3/8	3/8	8	3	2 3/4	2	2 1/4	5 3/8																2.25
3	24		1 1/8	3/8	1/2	10	4	4	2 3/4	3 1/4	6 5/8																4.00
4	36		1 5/8	5/8	3/4	16	6	5 1/2	4	4 1/2	10 5/8																9.00
5	36		1 5/8	5/8	3/4	16	6	5 1/2	4	4 1/2	10 5/8																9.00

**STANDARD SIGN**  
W13-1

WISCONSIN DEPT OF TRANSPORTATION

APPROVED *Matthew R. Rauch*  
for State Traffic Engineer

DATE 3/16/11 PLATE NO. W13-1.15

EARTHWORK - CTH T

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
10+00.00	28.0	0.0	0	0									
10+50.00	37.2	7.4	0	0	60	7	0	0	60	9	0	0	51
11+00.00	45.7	3.6	0	0	77	10	0	0	137	22	0	0	115
11+50.00	57.7	0.6	0	0	96	4	0	0	233	27	0	0	206
12+00.00	48.2	4.3	0	0	98	5	0	0	331	33	0	0	298
12+25.00	58.2	0.0	0	0	49	2	0	0	380	36	0	0	344
12+50.00	55.1	0.7	0	0	52	0	0	0	433	36	0	0	397
12+75.00	48.2	5.6	0	0	48	3	0	0	480	40	0	0	441
13+00.00	51.2	17.2	0	0	46	11	0	0	526	54	0	0	473
13+25.00	37.7	47.1	0	0	41	30	0	0	568	92	0	0	475
13+50.00	25.0	81.9	0	0	29	60	0	0	597	170	0	0	427
13+75.00	24.4	86.9	0	0	23	78	0	0	620	272	0	0	348
14+00.00	17.0	102.7	0	0	19	88	0	0	639	386	0	0	253
14+25.00	30.5	102.6	0	0	22	95	0	0	661	509	0	0	151
14+50.00	14.0	202.8	0	0	21	141	0	0	681	693	0	0	-12
14+75.00	16.4	175.4	0	0	14	175	0	0	695	921	0	0	-225
15+00.00	44.1	194.8	0	0	28	171	0	0	723	1,144	0	0	-420
15+25.00	30.5	157.6	0	0	35	163	0	0	758	1,356	0	0	-598
15+50.00	39.4	168.5	0	0	32	151	0	0	790	1,552	0	0	-762
15+75.00	50.6	197.1	0	0	42	169	0	0	832	1,772	0	0	-940
16+00.00	62.7	82.5	0	0	52	129	0	0	884	1,940	0	0	-1,056
16+01.13	63.3	82.3	0	0	3	3	0	0	887	1,945	0	0	-1,058
17+36.17	0.0	17.2	0	0	0	0	0	0	887	1,945	0	0	-1,058
17+50.00	52.5	37.0	0	0	13	14	0	0	901	1,963	0	0	-1,062
17+75.00	84.0	17.4	0	0	63	25	0	0	964	1,995	0	0	-1,032
18+00.00	111.2	0.8	0	0	90	8	0	0	1,054	2,006	0	0	-952
18+15.00	124.9	0.0	0	0	66	0	0	0	1,120	2,007	0	0	-887
18+25.00	122.4	4.6	0	0	46	1	0	0	1,165	2,008	0	0	-842
18+50.00	130.1	4.3	0	0	117	4	0	0	1,282	2,013	0	0	-731
18+75.00	134.6	2.8	0	0	123	3	0	0	1,405	2,017	0	0	-613
19+00.00	135.2	2.2	0	0	125	2	0	0	1,530	2,020	0	0	-491
19+25.00	135.7	1.9	0	0	125	2	0	0	1,655	2,023	0	0	-368
19+50.00	132.0	2.7	0	0	124	2	0	0	1,779	2,026	0	0	-246
19+75.00	139.1	2.2	0	0	126	2	0	0	1,905	2,029	0	0	-124
19+84.25	135.7	2.3	0	0	47	1	0	0	1,952	2,030	0	0	-78
20+00.00	133.5	3.3	0	0	79	2	0	0	2,030	2,032	0	0	-1
20+50.00	120.6	6.0	0	0	235	9	0	0	2,266	2,043	0	0	223
20+75.00	131.4	0.9	0	0	117	3	0	0	2,382	2,047	0	0	335
21+00.00	122.2	9.6	0	0	117	5	0	0	2,500	2,053	0	0	446
21+50.00	125.9	8.5	0	0	230	17	0	0	2,729	2,075	0	0	654

Notes:	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

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EARTHWORK - CTH T (CONTINUED)

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
22+00.00	126.6	6.6	0	0	234	14	0	0	2,963	2,093	0	0	870
22+50.00	127.6	7.2	0	0	235	13	0	0	3,199	2,110	0	0	1,089
23+00.00	131.5	4.5	0	0	240	11	0	0	3,439	2,124	0	0	1,315
23+25.00	119.4	5.7	0	0	116	5	0	0	3,555	2,130	0	0	1,425
23+50.00	116.1	4.1	0	0	109	5	0	0	3,664	2,136	0	0	1,528
23+80.00	123.9	6.0	0	0	133	6	0	0	3,797	2,143	0	0	1,654
24+00.00	210.7	0.0	0	0	124	2	0	0	3,921	2,146	0	0	1,775
24+08.00	219.2	0.0	0	0	64	0	0	0	3,985	2,146	0	0	1,839
24+32.00	127.4	1.4	0	0	154	1	0	0	4,139	2,147	0	0	1,992
24+40.00	109.5	7.0	0	0	35	1	0	0	4,174	2,148	0	0	2,025
24+50.00	108.1	6.9	0	0	40	3	0	0	4,214	2,152	0	0	2,062
25+00.00	107.9	3.6	0	0	200	10	0	0	4,414	2,164	0	0	2,250
25+50.00	96.6	9.3	0	0	189	12	0	0	4,603	2,180	0	0	2,423
26+00.00	93.0	8.6	0	0	176	17	0	0	4,779	2,201	0	0	2,577
26+50.00	91.3	6.7	33	0	171	14	31	0	4,949	2,176	34	0	2,773
27+00.00	87.3	4.5	40	0	165	10	68	0	5,115	2,093	108	0	3,022
27+50.00	100.6	0.0	53	0	174	4	86	0	5,289	1,975	203	0	3,314
28+00.00	70.5	5.9	16	0	158	5	64	0	5,447	1,891	273	0	3,556
28+50.00	78.7	1.6	38	0	138	7	50	0	5,585	1,828	328	0	3,757
28+89.00	150.0	4.4	38	0	165	4	55	0	5,750	1,756	388	0	3,995
29+00.00	138.0	4.2	38	0	59	2	15	0	5,809	1,736	405	0	4,073
29+50.00	62.6	7.8	18	0	186	11	52	0	5,995	1,676	462	0	4,319
30+00.00	62.4	8.7	21	0	116	15	36	0	6,111	1,644	502	0	4,467
30+50.00	63.9	11.0	17	0	117	18	35	0	6,228	1,618	541	0	4,610
30+75.00	79.8	6.2	20	0	67	8	17	0	6,294	1,603	560	0	4,691
31+00.00	65.9	11.6	6	0	67	8	12	0	6,362	1,597	573	0	4,765
31+25.00	73.9	7.2	5	0	65	9	5	0	6,426	1,601	579	0	4,826
31+50.00	68.7	12.3	5	0	66	9	5	0	6,492	1,606	584	0	4,887
32+00.00	74.8	11.7	5	0	133	22	9	0	6,625	1,621	594	0	5,004
32+50.00	83.3	4.6	0	0	146	15	5	0	6,772	1,634	599	0	5,137
33+00.00	82.7	15.9	0	0	154	19	0	0	6,925	1,659	599	0	5,266
33+50.00	87.5	15.5	0	0	158	29	0	0	7,083	1,697	599	0	5,386
34+00.00	96.9	5.9	0	0	171	20	0	0	7,254	1,723	599	0	5,531
34+50.00	102.5	5.7	0	0	185	11	0	0	7,438	1,737	599	0	5,702
34+82.00	208.9	2.4	0	0	184	5	0	0	7,623	1,743	599	0	5,880
35+00.00	139.8	2.0	0	0	116	1	0	0	7,739	1,745	599	0	5,994
35+50.00	114.3	6.0	0	0	235	7	0	0	7,974	1,754	599	0	6,220
36+00.00	121.2	6.4	0	0	218	11	0	0	8,192	1,769	599	0	6,423
36+50.00	130.3	3.1	0	0	233	9	0	0	8,425	1,781	599	0	6,644
37+00.00	140.6	1.4	0	0	251	4	0	0	8,676	1,786	599	0	6,890

Notes:	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

EARTHWORK - CTH T (CONTINUED)

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
37+50.00	138.9	0.4	0	0	259	2	0	0	8,934	1,788	599	0	7,146
38+00.00	142.0	0.0	0	0	260	0	0	0	9,195	1,789	599	0	7,406
38+25.00	175.8	0.0	0	0	147	0	0	0	9,342	1,789	599	0	7,553
38+50.00	142.0	0.0	0	0	147	0	0	0	9,489	1,789	599	0	7,700
39+00.00	139.5	0.9	0	0	261	1	0	0	9,749	1,790	599	0	7,960
39+50.00	137.0	1.5	0	0	256	2	0	0	10,005	1,793	599	0	8,213
40+00.00	132.6	1.2	0	0	250	3	0	0	10,255	1,796	599	0	8,459
40+50.00	127.2	1.0	0	0	241	2	0	0	10,496	1,799	599	0	8,697
41+00.00	125.4	1.1	0	0	234	2	0	0	10,729	1,801	599	0	8,928
41+50.00	120.9	0.3	0	0	228	1	0	0	10,958	1,803	599	0	9,155
42+00.00	114.7	0.1	0	0	218	0	0	0	11,176	1,803	599	0	9,372
42+50.00	111.6	0.1	0	0	209	0	0	0	11,385	1,804	599	0	9,582
43+00.00	101.4	0.1	0	0	197	0	0	0	11,582	1,804	599	0	9,779
43+50.00	111.9	0.3	0	0	197	0	0	0	11,780	1,804	599	0	9,976
44+00.00	80.9	3.4	0	0	178	3	0	0	11,958	1,808	599	0	10,150
44+50.00	75.7	5.6	0	0	145	8	0	0	12,103	1,819	599	0	10,284
45+00.00	72.5	9.4	0	0	137	14	0	0	12,240	1,837	599	0	10,403
45+50.00	80.3	5.4	0	0	141	14	0	0	12,382	1,855	599	0	10,527
46+00.00	91.1	5.7	0	0	159	10	0	0	12,541	1,868	599	0	10,672
46+50.00	108.3	6.4	0	0	185	11	0	0	12,725	1,883	599	0	10,842
47+00.00	124.0	4.3	0	0	215	10	0	0	12,940	1,896	599	0	11,044
47+50.00	132.5	2.6	0	0	237	6	0	0	13,178	1,904	599	0	11,274
48+00.00	153.0	2.4	0	0	264	5	0	0	13,442	1,910	599	0	11,532
48+50.00	122.6	4.4	0	0	255	6	0	0	13,697	1,918	599	0	11,779

13,697      2,075      544      0

<b>Notes:</b>	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

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EARTHWORK - CTH T

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
48+50.00	122.6	4.4	0	0	281	4	0	0	281	5	0	0	276
49+00.00	180.7	0.0	0	0	631	0	0	0	912	5	0	0	906
50+00.00	159.8	0.0	0	0	571	0	0	0	1,482	5	0	0	1,477
51+00.00	148.3	0.0	0	0	515	0	0	0	1,997	5	0	0	1,991
52+00.00	129.6	0.0	0	0									
53+00.00	94.1	0.7	0	0	414	1	0	0	2,411	7	0	0	2,404
53+50.00	77.6	6.9	0	35	159	7	0	32	2,570	16	0	42	2,553
54+00.00	59.8	8.1	0	35	127	14	0	65	2,697	34	0	126	2,663
55+00.00	44.6	10.5	0	0	193	34	0	65	2,890	79	0	211	2,811
56+00.00	40.8	10.7	0	0	158	39	0	0	3,048	130	0	211	2,918
56+50.00	36.6	12.8	0	0	72	22	0	0	3,120	158	0	211	2,962
57+00.00	39.4	9.4	0	0	70	21	0	0	3,190	185	0	211	3,005
58+00.00	19.7	20.9	0	0	110	56	0	0	3,300	258	0	211	3,042
59+00.00	21.8	29.8	0	0	77	94	0	0	3,377	380	0	211	2,997
60+00.00	15.7	35.0	0	0	69	120	0	0	3,446	536	0	211	2,910
60+09.00	15.1	35.5	0	0	5	12	0	0	3,451	552	0	211	2,900
61+00.00	20.7	28.4	0	0	60	108	0	0	3,512	691	0	211	2,820
62+00.00	34.7	16.8	0	0	103	84	0	0	3,614	800	0	211	2,814
63+00.00	40.4	19.5	0	0	139	67	0	0	3,753	888	0	211	2,866
64+00.00	51.0	13.5	0	0	169	61	0	0	3,923	967	0	211	2,956
65+00.00	52.1	13.8	0	0	191	51	0	0	4,114	1,033	0	211	3,081
65+80.00	44.6	13.0	0	0	143	40	0	0	4,257	1,084	0	211	3,173
66+00.00	49.5	9.3	0	0	35	8	0	0	4,292	1,095	0	211	3,197
66+50.00	65.8	6.7	0	0	107	15	0	0	4,398	1,114	0	211	3,284
67+00.00	68.6	3.6	0	0	124	10	0	0	4,523	1,127	0	211	3,396
67+50.00	52.9	5.8	0	0	112	9	0	0	4,635	1,138	0	211	3,497
68+00.00	59.3	5.1	0	0	104	10	0	0	4,739	1,151	0	211	3,588
68+50.00	138.6	4.6	0	0	183	9	0	0	4,922	1,163	0	211	3,760
69+00.00	155.1	4.7	0	0	272	9	0	0	5,194	1,174	0	211	4,020
69+50.00	89.3	1.3	0	0	226	6	0	0	5,421	1,181	0	211	4,239
70+00.00	188.1	0.0	0	0	257	1	0	0	5,677	1,183	0	211	4,495
70+50.00	82.5	5.8	0	0	251	5	0	0	5,928	1,190	0	211	4,738
71+00.00	77.7	5.1	0	0	148	10	0	0	6,076	1,203	0	211	4,873
71+50.00	65.5	6.7	0	0	133	11	0	0	6,209	1,217	0	211	4,992
72+00.00	66.1	3.2	0	0	122	9	0	0	6,331	1,229	0	211	5,102
72+50.00	48.7	20.7	0	55	106	22	0	51	6,437	1,258	0	277	5,179
73+00.00	75.1	20.9	0	55	115	39	0	102	6,552	1,308	0	409	5,244
73+10.00	78.5	17.9	0	55	28	7	0	20	6,580	1,317	0	436	5,263
74+00.00	66.0	9.3	0	0	241	45	0	92	6,821	1,376	0	555	5,445
75+00.00	58.8	13.9	0	0	231	43	0	0	7,052	1,432	0	555	5,620

Notes:	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

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EARTHWORK - CTH T (CONTINUED)

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
76+00.00	13.4	38.5	0	0	134	97	0	0	7,186	1,559	0	555	5,627
77+00.00	31.1	39.0	0	0	82	144	0	0	7,268	1,745	0	555	5,523
78+00.00	30.5	24.6	0	0	114	118	0	0	7,382	1,898	0	555	5,484
79+00.00	27.3	30.4	0	0	107	102	0	0	7,489	2,031	0	555	5,458
80+00.00	51.5	16.3	0	0	146	86	0	0	7,635	2,143	0	555	5,492
81+00.00	101.0	3.3	0	0	282	36	0	0	7,917	2,190	0	555	5,727
82+00.00	123.5	4.8	0	0	416	15	0	0	8,333	2,210	0	555	6,123
83+00.00	40.9	9.7	0	0	304	27	0	0	8,637	2,245	0	555	6,393
84+00.00	7.5	52.9	0	0	90	116	0	0	8,727	2,395	0	555	6,332
84+32.00	1.6	66.4	0	0	5	71	0	0	8,732	2,487	0	555	6,245
85+00.00	2.1	74.1	0	0	5	177	0	0	8,737	2,717	0	555	6,020
86+00.00	2.6	59.8	0	0	9	248	0	0	8,745	3,039	0	555	5,706
87+00.00	9.0	37.5	0	0	22	180	0	0	8,767	3,273	0	555	5,494
88+00.00	22.0	22.9	0	0	57	112	0	0	8,825	3,419	0	555	5,406
89+00.00	27.2	14.2	0	0	91	69	0	0	8,916	3,508	0	555	5,407
90+00.00	56.0	11.0	0	0	154	47	0	0	9,070	3,569	0	555	5,501
91+00.00	95.0	5.3	0	0	280	30	0	0	9,349	3,608	0	555	5,741
92+00.00	81.6	5.9	0	0	327	21	0	0	9,676	3,635	0	555	6,041
93+00.00	54.6	12.3	0	0	252	34	0	0	9,928	3,679	0	555	6,249
94+00.00	15.2	18.1	0	0	129	56	0	0	10,058	3,752	0	555	6,305
95+00.00	6.7	55.1	0	0	41	136	0	0	10,098	3,929	0	555	6,170
95+92.00	1.4	97.6	0	0	14	260	0	0	10,112	4,267	0	555	5,845
96+00.00	1.8	102.2	0	0	0	30	0	0	10,112	4,305	0	555	5,807
97+00.00	11.4	88.4	0	0	24	353	0	0	10,137	4,764	0	555	5,373
98+00.00	21.0	82.7	0	0	60	317	0	0	10,197	5,176	0	555	5,021
99+00.00	38.8	29.9	0	0	111	208	0	0	10,308	5,447	0	555	4,861
100+00.00	70.1	0.1	0	45	202	56	0	83	10,509	5,519	0	663	4,990
100+50.00	105.8	0.0	0	45	163	0	0	83	10,672	5,519	0	772	5,153
101+00.00	147.9	0.0	0	30	235	0	0	69	10,907	5,519	0	862	5,388
101+50.00	163.1	0.0	0	0	288	0	0	28	11,195	5,519	0	898	5,676
102+00.00	142.6	0.0	0	0	283	0	0	0	11,478	5,519	0	898	5,959
102+50.00	128.3	0.0	0	0	251	0	0	0	11,729	5,519	0	898	6,210
103+00.00	120.2	0.0	0	0	230	0	0	0	11,959	5,519	0	898	6,440
103+20.00	111.4	0.0	0	30	86	0	0	11	12,045	5,519	0	912	6,525
104+00.00	96.9	2.7	0	45	309	4	0	111	12,353	5,524	0	1,057	6,829
105+00.00	43.1	23.4	0	0	259	48	0	83	12,612	5,587	0	1,165	7,025
106+00.00	31.9	32.1	0	0	139	103	0	0	12,751	5,721	0	1,165	7,030
107+00.00	20.5	57.6	0	0	97	166	0	0	12,848	5,936	0	1,165	6,912
107+53.00	12.0	83.6	0	0	32	139	0	0	12,880	6,117	0	1,165	6,763
108+00.00	9.3	89.9	0	0	18	151	0	0	12,899	6,313	0	1,165	6,586

<b>Notes:</b>	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

9

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EARTHWORK - CTH T (CONTINUED)

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
109+00.00	13.4	89.6	0	0	42	333	0	0	12,941	6,745	0	1,165	6,195
110+00.00	3.8	73.6	0	0	32	302	0	0	12,973	7,138	0	1,165	5,834
110+50.00	9.3	40.6	0	0	12	106	0	0	12,985	7,276	0	1,165	5,709
111+00.00	37.4	21.8	0	0	43	58	0	0	13,028	7,351	0	1,165	5,677
111+50.00	63.0	4.7	0	0	93	25	0	0	13,121	7,383	0	1,165	5,738
112+00.00	72.1	0.6	0	0	125	5	0	0	13,246	7,389	0	1,165	5,857
112+50.00	80.3	5.2	0	0	141	5	0	0	13,387	7,396	0	1,165	5,991
113+00.00	66.8	15.1	0	0	136	19	0	0	13,523	7,420	0	1,165	6,103
113+50.00	60.0	17.6	0	0	117	30	0	0	13,641	7,460	0	1,165	6,181
114+00.00	44.8	30.5	0	0	97	45	0	0	13,738	7,518	0	1,165	6,220
115+00.00	32.4	19.8	0	0	143	93	0	0	13,881	7,639	0	1,165	6,242
116+00.00	69.2	5.3	0	45	188	46	0	83	14,069	7,699	0	1,274	6,370
117+00.00	171.8	0.9	0	0	446	12	0	83	14,515	7,714	0	1,382	6,801
118+00.00	196.1	0.1	0	0	681	2	0	0	15,196	7,716	0	1,382	7,480
119+00.00	167.8	0.0	0	0	674	0	0	0	15,870	7,717	0	1,382	8,154
119+40.00	132.6	8.5	0	0	223	6	0	0	16,093	7,725	0	1,382	8,368
120+00.00	157.8	0.0	0	0	323	10	0	0	16,415	7,737	0	1,382	8,678
120+50.00	155.4	7.2	0	0	290	7	0	0	16,705	7,746	0	1,382	8,960
121+00.00	168.8	5.3	0	0	300	12	0	0	17,005	7,761	0	1,382	9,245
121+50.00	193.7	0.0	0	0	336	5	0	0	17,341	7,767	0	1,382	9,574
122+00.00	182.2	0.6	0	0	348	1	0	0	17,689	7,768	0	1,382	9,921
123+00.00	131.9	0.0	0	0	582	1	0	0	18,271	7,769	0	1,382	10,501
123+50.00	116.6	7.1	0	0	230	7	0	0	18,501	7,778	0	1,382	10,723
124+00.00	99.7	3.6	0	0	200	10	0	0	18,701	7,790	0	1,382	10,911

18,701      5,993      0      1,063

<b>Notes:</b>	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

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EARTHWORK - CTH Y

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
201+25.00	25.1	0.0	0.0	0.0									
201+50.00	47.4	1.6	0.0	0.0	34	1	0	0	34	1	0	0	33
201+75.00	82.1	1.0	0.0	0.0	60	1	0	0	94	2	0	0	91
202+00.00	78.3	0.3	0.0	0.0	74	1	0	0	168	3	0	0	165
202+50.00	95.1	1.5	0.0	0.0	160	2	0	0	328	5	0	0	323
203+00.00	83.5	8.0	0.0	0.0	165	9	0	0	494	17	0	0	477
203+50.00	72.8	7.5	0.0	0.0	145	14	0	0	638	36	0	0	603
204+00.00	89.0	13.6	0.0	0.0	150	20	0	0	788	61	0	0	727
204+33.97	73.6	22.9	0.0	0.0	102	23	0	0	891	91	0	0	800
204+50.00	76.3	31.7	0.0	0.0	45	16	0	0	935	112	0	0	823
204+75.00	84.7	48.4	0.0	0.0	75	37	0	0	1,010	160	0	0	850
205+00.00	93.4	66.9	0.0	0.0	82	53	0	0	1,092	229	0	0	863
205+25.00	102.7	85.2	0.0	0.0	91	70	0	0	1,183	321	0	0	862
205+50.00	108.1	97.5	0.0	0.0	98	85	0	0	1,280	431	0	0	850
205+75.00	106.8	109.4	0.0	0.0	100	96	0	0	1,380	555	0	0	825
206+00.00	113.2	148.5	0.0	0.0	102	119	0	0	1,482	711	0	0	771
206+25.00	27.1	205.4	0.0	0.0	65	164	0	0	1,547	924	0	0	623
206+50.00	27.9	143.4	0.0	0.0	25	161	0	0	1,572	1,134	0	0	439
206+75.00	33.2	186.5	0.0	0.0	28	153	0	0	1,601	1,332	0	0	268
207+00.00	35.2	199.3	0.0	0.0	32	179	0	0	1,632	1,564	0	0	68
207+18.46	0.0	139.5	0.0	0.0	12	116	0	0	1,644	1,715	0	0	-71
208+53.75	81.2	37.8	0.0	0.0	0	0	0	0	1,644	1,715	0	0	-71
208+75.00	143.5	73.1	0.0	0.0	88	44	0	0	1,733	1,771	0	0	-39
209+00.00	48.0	44.0	0.0	0.0	89	54	0	0	1,821	1,842	0	0	-21
209+25.00	42.2	26.1	0.0	0.0	42	32	0	0	1,863	1,884	0	0	-21
209+50.00	50.3	28.7	0.0	0.0	43	25	0	0	1,906	1,917	0	0	-11
209+75.00	51.6	30.2	0.0	0.0	47	27	0	0	1,953	1,953	0	0	0
210+00.00	51.8	31.4	0.0	0.0	48	29	0	0	2,001	1,990	0	0	11
210+25.00	53.5	29.9	0.0	0.0	49	28	0	0	2,050	2,027	0	0	23
210+50.00	65.2	24.0	0.0	0.0	55	25	0	0	2,105	2,059	0	0	46
210+57.03	66.8	22.7	0.0	0.0	17	6	0	0	2,122	2,067	0	0	55
211+00.00	78.2	9.1	0.0	0.0	115	25	0	0	2,237	2,100	0	0	137
211+50.00	71.5	7.3	0.0	0.0	139	15	0	0	2,376	2,119	0	0	256
212+00.00	58.6	6.0	0.0	0.0	121	12	0	0	2,496	2,135	0	0	361
212+50.00	51.8	5.1	0.0	0.0	102	10	0	0	2,599	2,149	0	0	450
212+75.00	53.0	24.3	0.0	0.0	49	14	0	0	2,647	2,166	0	0	481
213+00.00	25.5	0.0	0.0	0.0	36	11	0	0	2,683	2,181	0	0	502
					2,683	1,678	0	0					

Notes:	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

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EARTHWORK - CTH T / CTH Y ROUNDABOUT

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut	Fill	Rock Exc	EBS	Cut	Expanded Fill	Expanded Rock	Expanded EBS Backfill	
					Note 1	Note 2			Note 1	1.30	1.10	1.30 Note 5	
1+00.00	2.1	135.6	0.0	0.0									
1+25.00	36.2	116.4	0.0	0.0	18	117	0	0	18	152	0	0	-134
1+50.00	36.9	113.3	0.0	0.0	34	106	0	0	52	290	0	0	-238
1+75.00	33.9	113.2	0.0	0.0	33	105	0	0	84	426	0	0	-342
2+00.00	14.5	121.0	0.0	0.0	22	108	0	0	107	567	0	0	-460
2+25.00	57.7	114.4	0.0	0.0	33	109	0	0	140	709	0	0	-569
2+50.00	24.3	118.0	0.0	0.0	38	108	0	0	178	849	0	0	-671
2+75.00	10.2	131.9	0.0	0.0	16	116	0	0	194	999	0	0	-805
3+00.00	86.1	160.0	0.0	0.0	45	135	0	0	239	1,175	0	0	-936
3+25.00	0.0	154.6	0.0	0.0	40	146	0	0	279	1,364	0	0	-1,085
3+50.00	14.1	115.2	0.0	0.0	7	125	0	0	285	1,526	0	0	-1,241
3+75.00	7.8	185.5	0.0	0.0	10	139	0	0	295	1,707	0	0	-1,412
4+00.00	0.2	225.8	0.0	0.0	4	190	0	0	299	1,955	0	0	-1,656
4+23.58	2.1	135.7	0.0	0.0	1	158	0	0	300	2,160	0	0	-1,860
					300	1,662	0	0					

EARTHWORK - BROOKS ROAD

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut	Fill	Rock Exc	EBS	Cut	Expanded Fill	Expanded Rock	Expanded EBS Backfill	
					Note 1	Note 2			Note 1	1.30	1.10	1.30 Note 5	
496+00.00	25.1	0.0	0.0	0.0									
496+50.00	51.5	2.5	0.0	0.0	71	2	0	0	71	3	0	0	68
497+00.00	58.7	0.0	0.0	0.0	102	2	0	0	173	6	0	0	167
497+50.00	89.9	0.0	0.0	0.0	138	0	0	0	310	6	0	0	304
498+00.00	100.1	0.3	0.0	0.0	176	0	0	0	486	6	0	0	480
498+50.00	106.1	4.5	0.0	0.0	191	4	0	0	677	12	0	0	665
499+00.00	107.2	3.0	0.0	0.0	197	7	0	0	875	21	0	0	853
499+50.00	193.8	0.0	0.0	0.0	279	3	0	0	1,153	25	0	0	1,129
500+50.00	68.2	4.0	0.0	0.0	0	0	0	0	1,153	25	0	0	1,129
501+00.00	68.4	4.1	0.0	0.0	127	8	0	0	1,280	35	0	0	1,245
501+50.00	62.3	3.5	0.0	0.0	121	7	0	0	1,401	44	0	0	1,357
502+00.00	49.0	0.0	0.0	0.0	103	3	0	0	1,504	48	0	0	1,456
502+20.00	25.6	0.0	0.0	0.0	28	0	0	0	1,532	48	0	0	1,484
					1,532	37	0	0					

Notes:	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

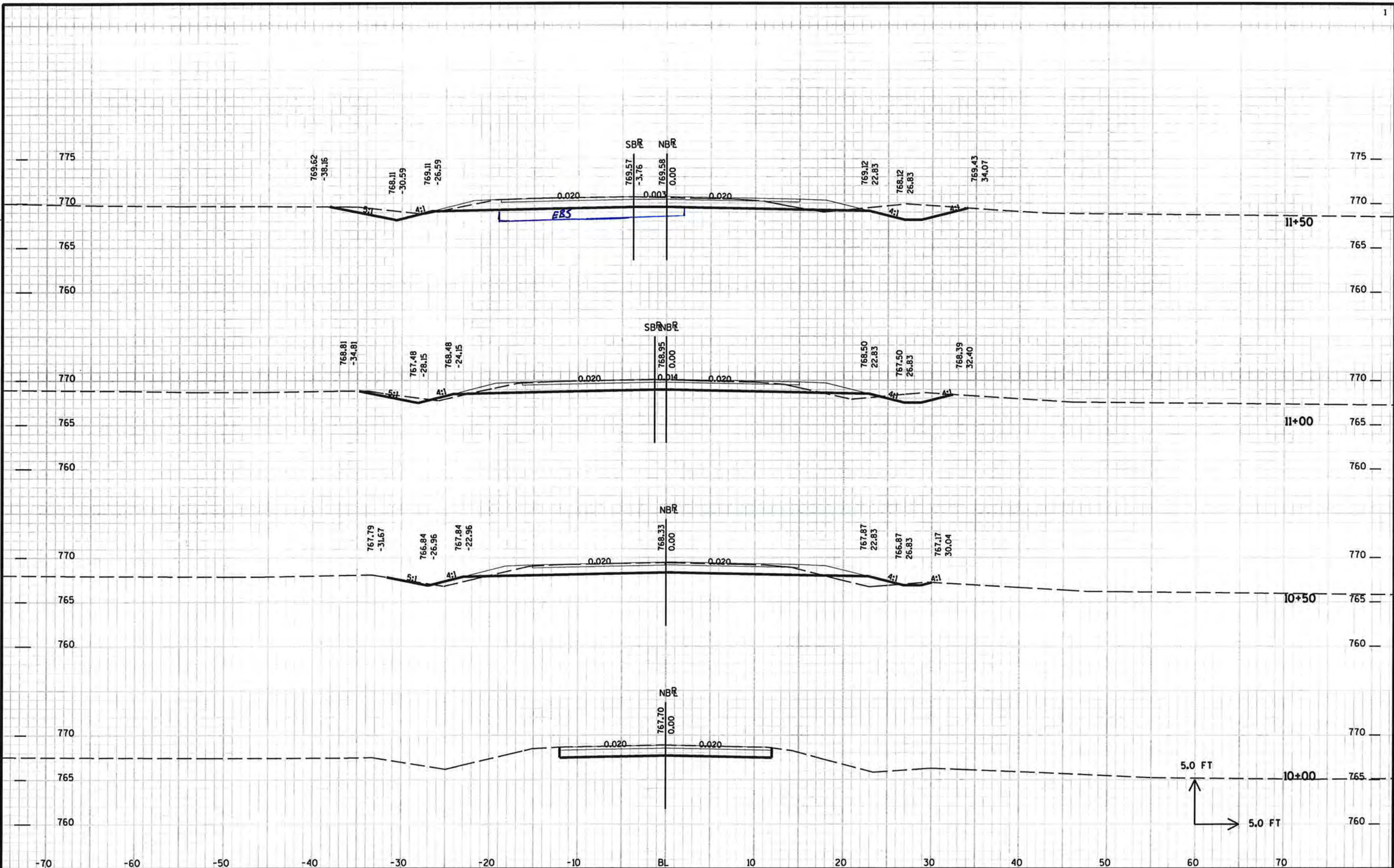
EARTHWORK - CTH GG

STATION	AREA (SF)				Incremental Vol (CY) (Unadjusted)				Cumulative Vol (CY)				Mass Ordinate Note 3
	Cut	Fill	Rock Exc	EBS	Cut Note 1	Fill Note 2	Rock Exc	EBS	Cut 1.00 Note 1	Expanded Fill 1.30	Expanded Rock 1.10	Expanded EBS	
												Backfill 1.30 Note 5	
597+25.00	28.1	0.0	0.0	0.0									
597+50.00	43.1	6.8	0.0	0.0	33	3	0	0	33	4	0	0	29
598+00.00	63.9	1.8	0.0	0.0	99	8	0	0	132	14	0	0	118
598+25.00	70.0	5.7	0.0	0.0	62	3	0	0	194	19	0	0	175
598+50.00	86.3	0.0	0.0	0.0	72	3	0	0	266	22	0	0	244
599+00.00	90.6	3.5	0.0	0.0	164	3	0	0	430	27	0	0	404
599+50.00	90.0	3.2	0.0	0.0	167	6	0	0	597	35	0	0	563
600+50.00	143.1	6.7	0.0	0.0	0	0	0	0	597	35	0	0	563
601+00.00	104.3	6.4	0.0	0.0	229	12	0	0	827	50	0	0	776
601+50.00	112.7	3.9	0.0	0.0	201	10	0	0	1,028	63	0	0	965
602+00.00	114.8	1.5	0.0	0.0	211	5	0	0	1,238	69	0	0	1,169
602+25.00	107.0	1.8	0.0	0.0	103	2	0	0	1,341	71	0	0	1,270
602+50.00	90.9	0.0	0.0	0.0	92	1	0	0	1,432	72	0	0	1,360
602+85.00	27.9	0.0	0.0	0.0	77	0	0	0	1,509	72	0	0	1,437
					1,509	56	0	0					

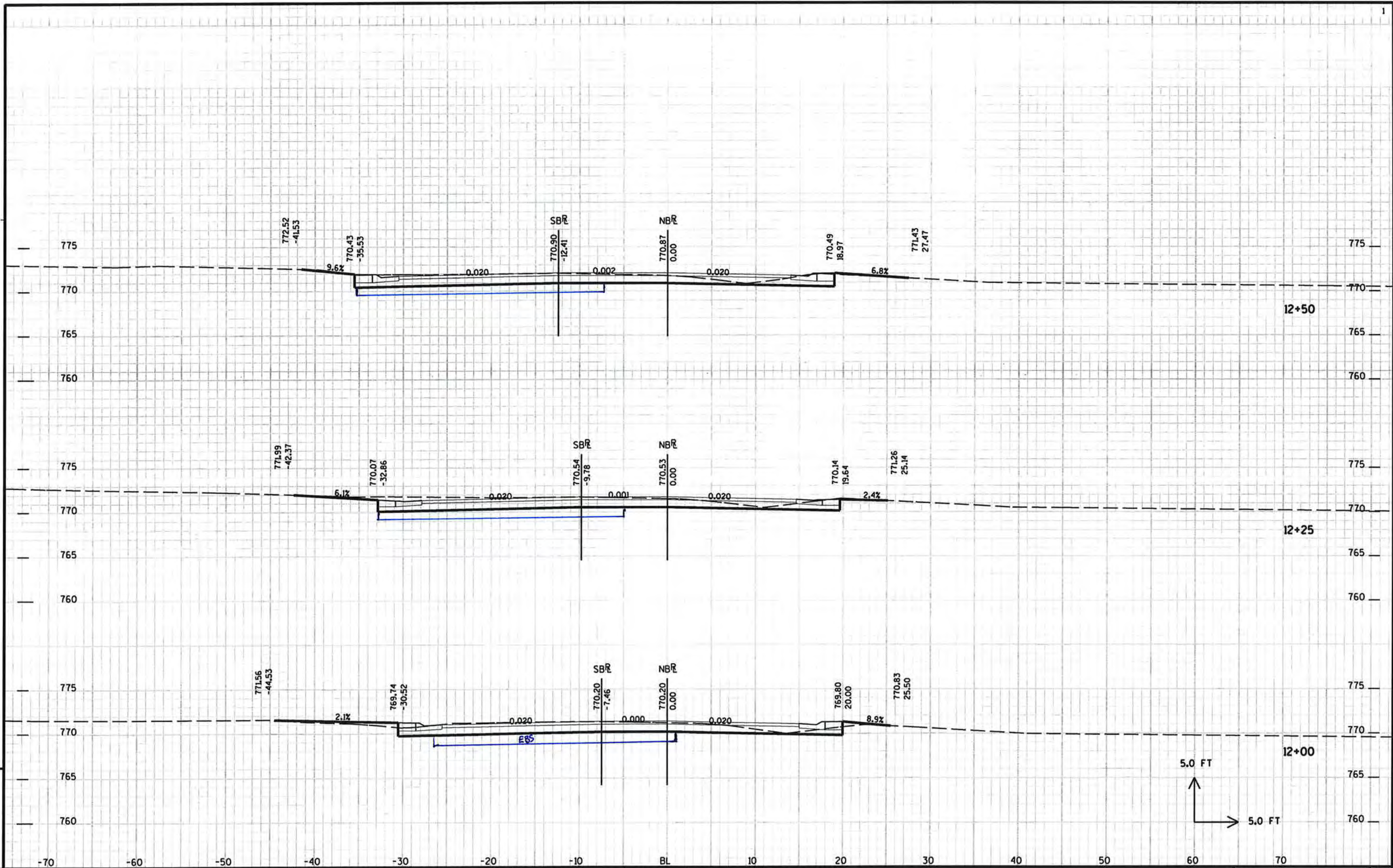
<b>Notes:</b>	
1 - Cut	Cut includes existing asphalt and concrete pavement
2 - Fill	Unexpanded
3 - Mass Ordinate	Cut - (Fill * Fill Factor)
5- Expanded EBS Backfill	Will be backfilled with Waste Material

9

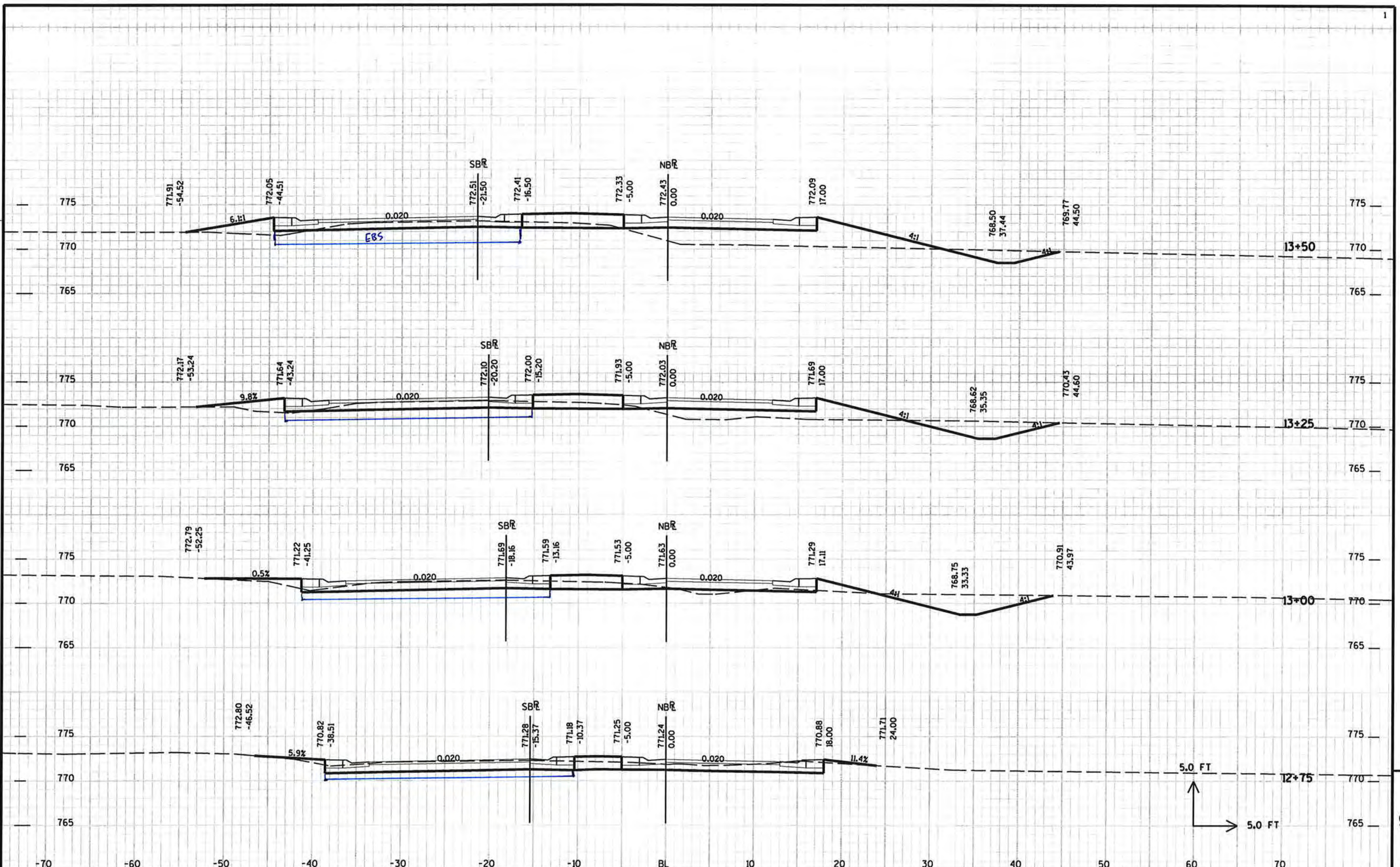
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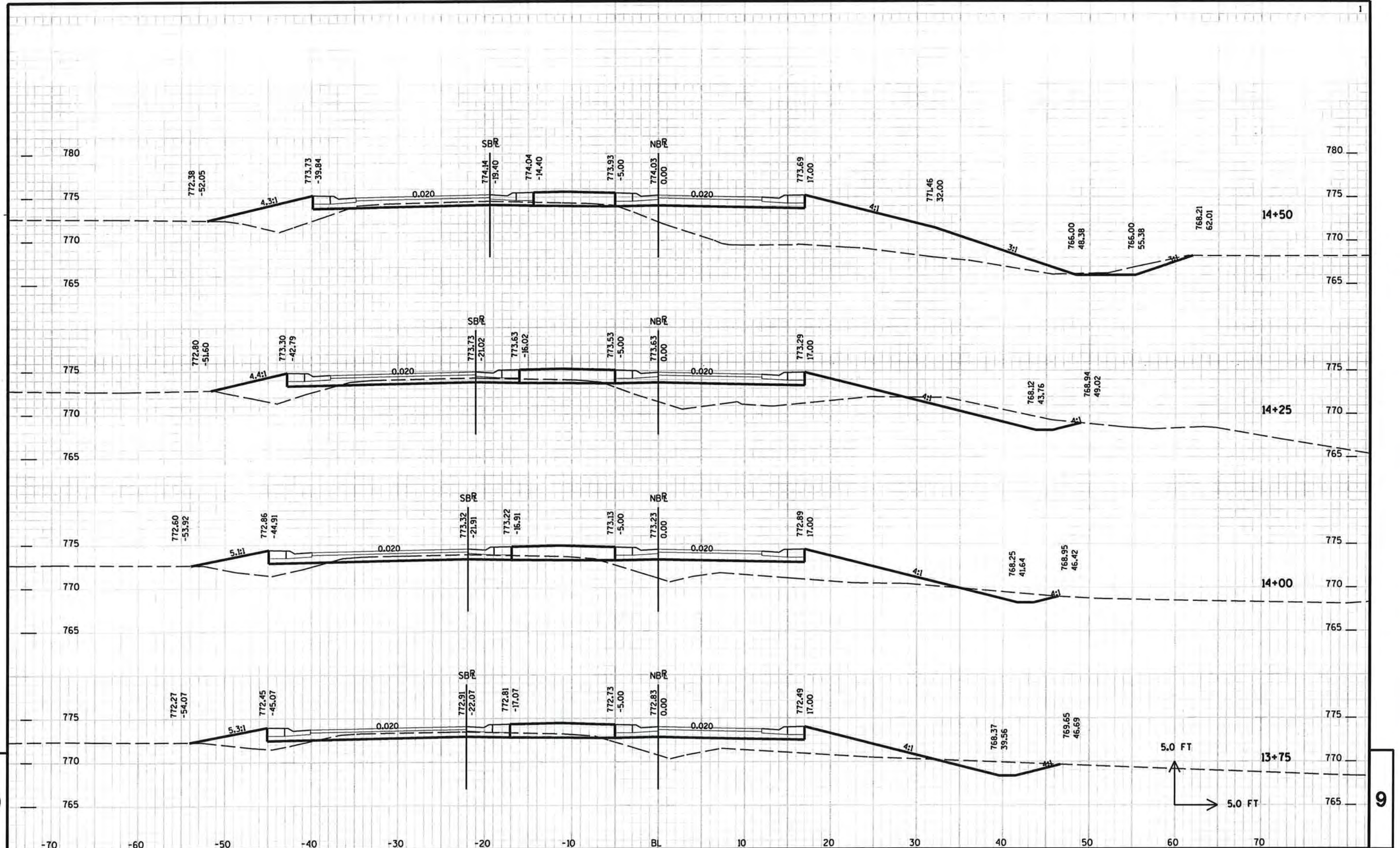
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 148

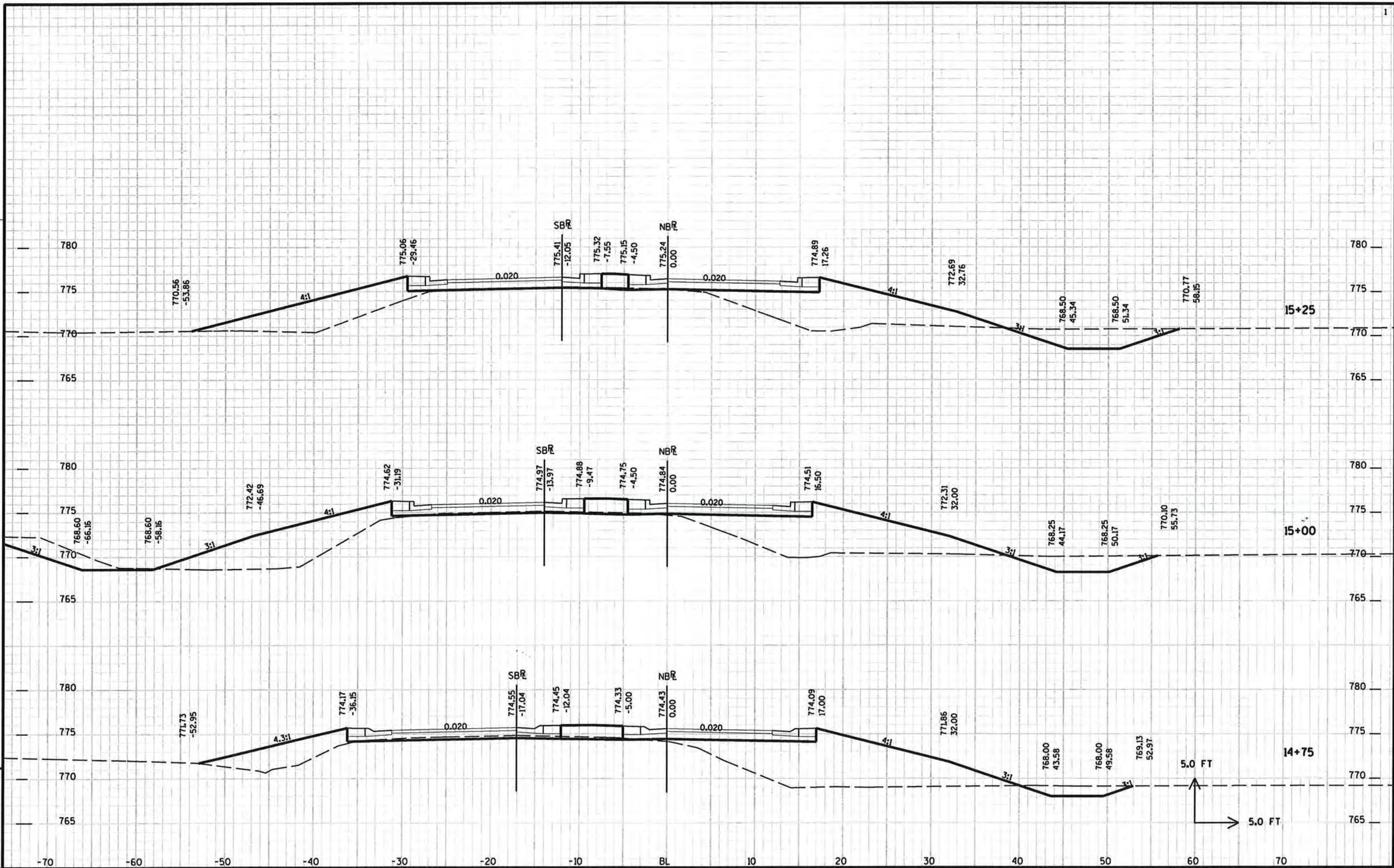


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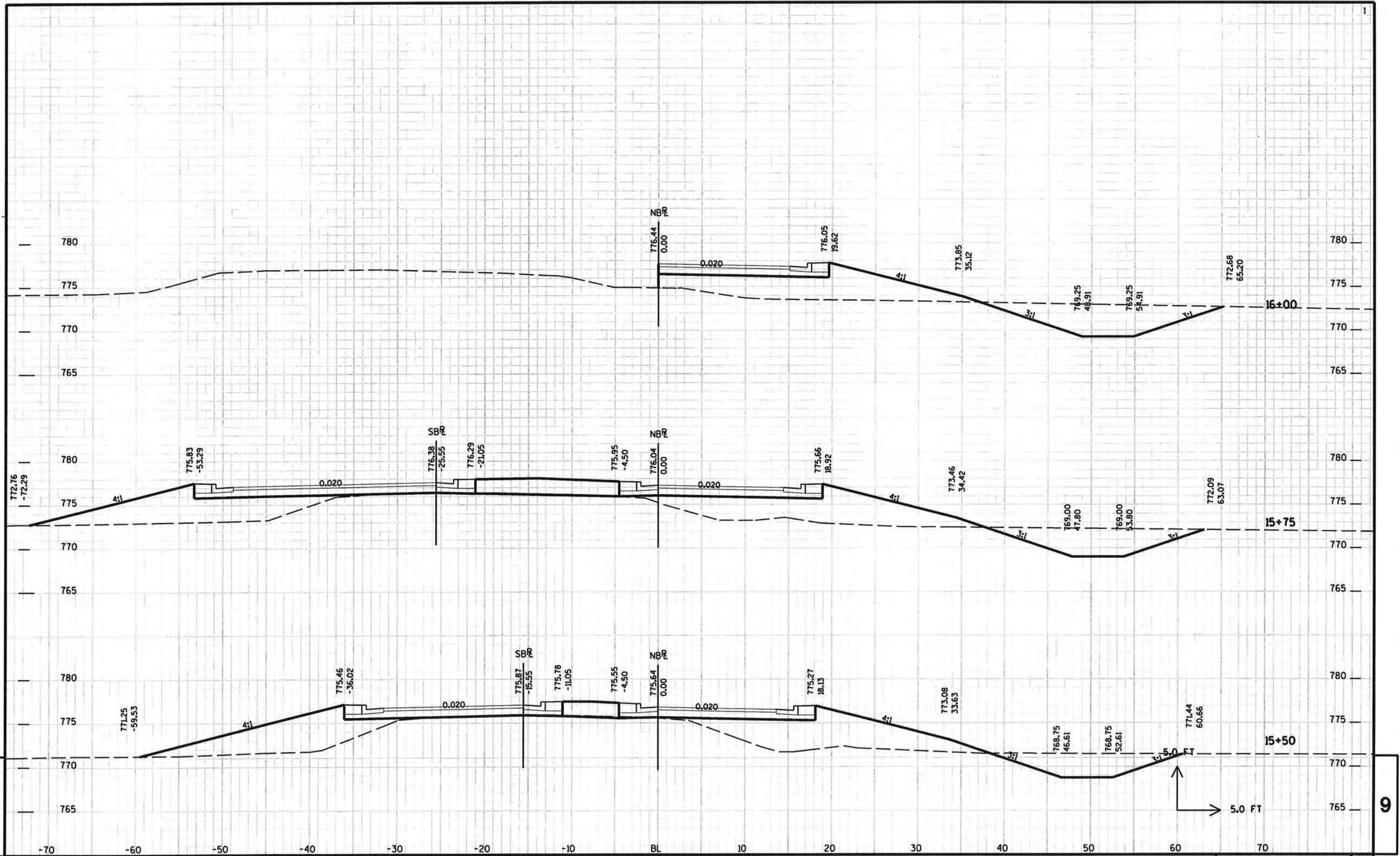


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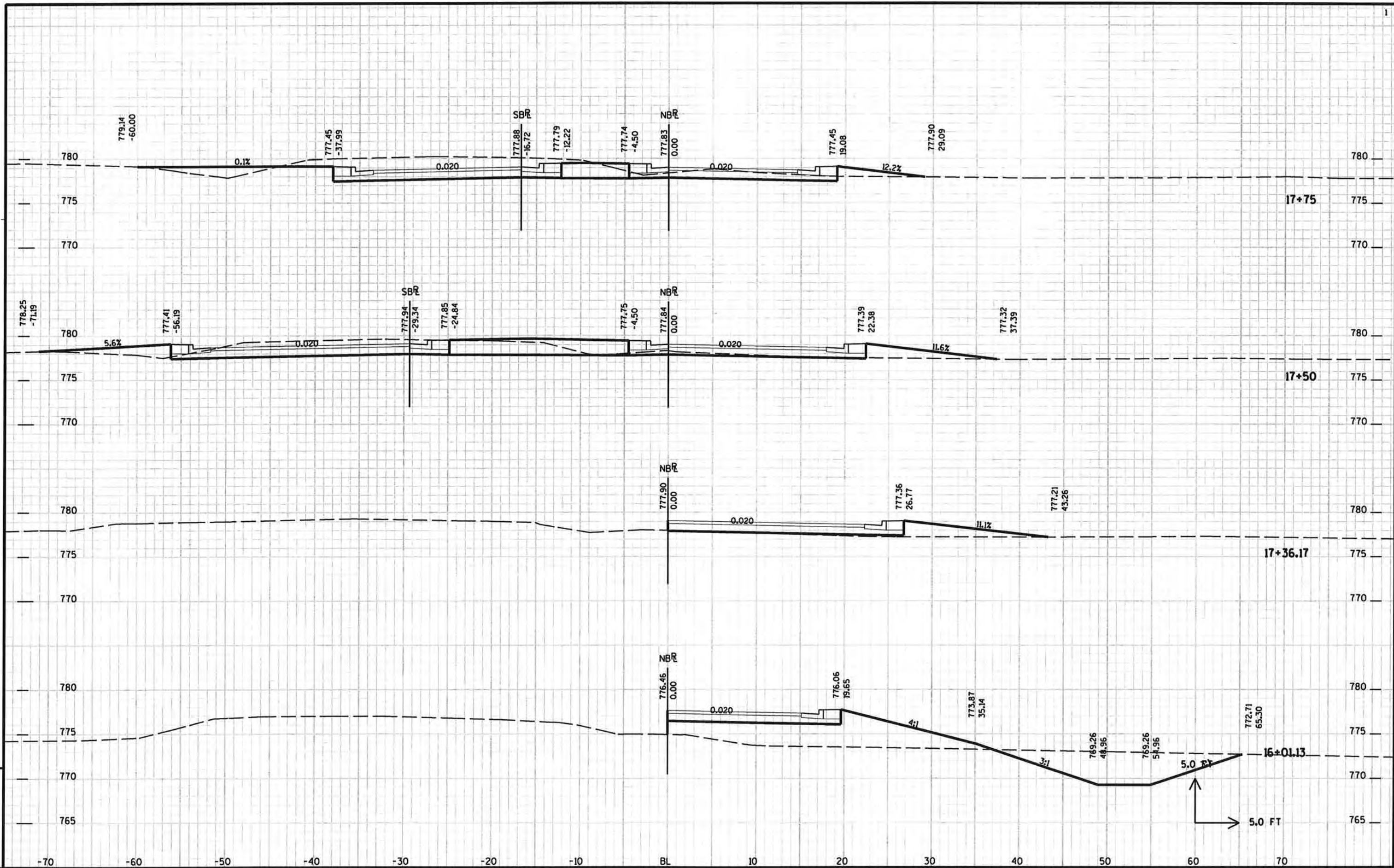




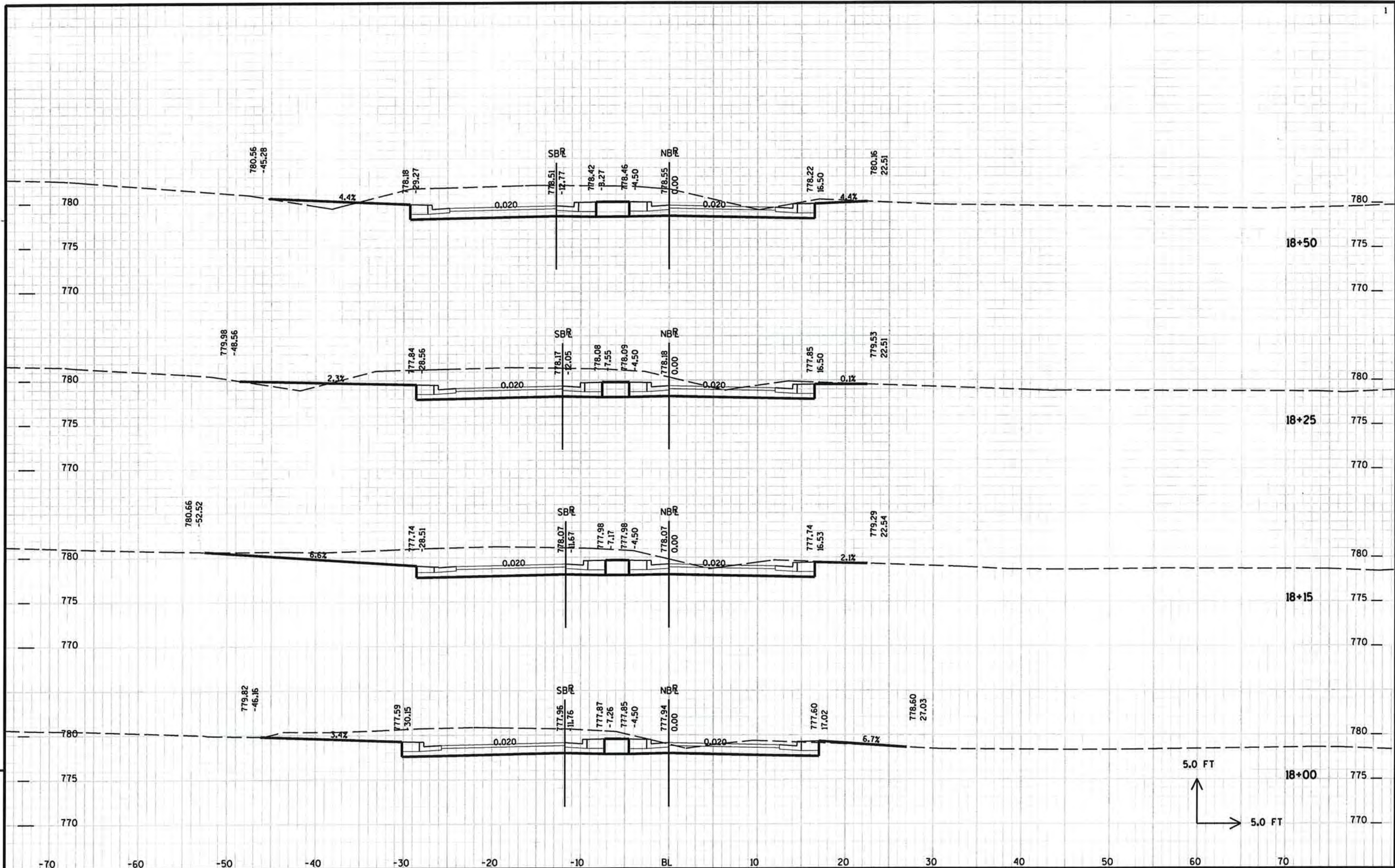
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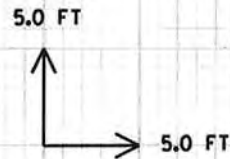


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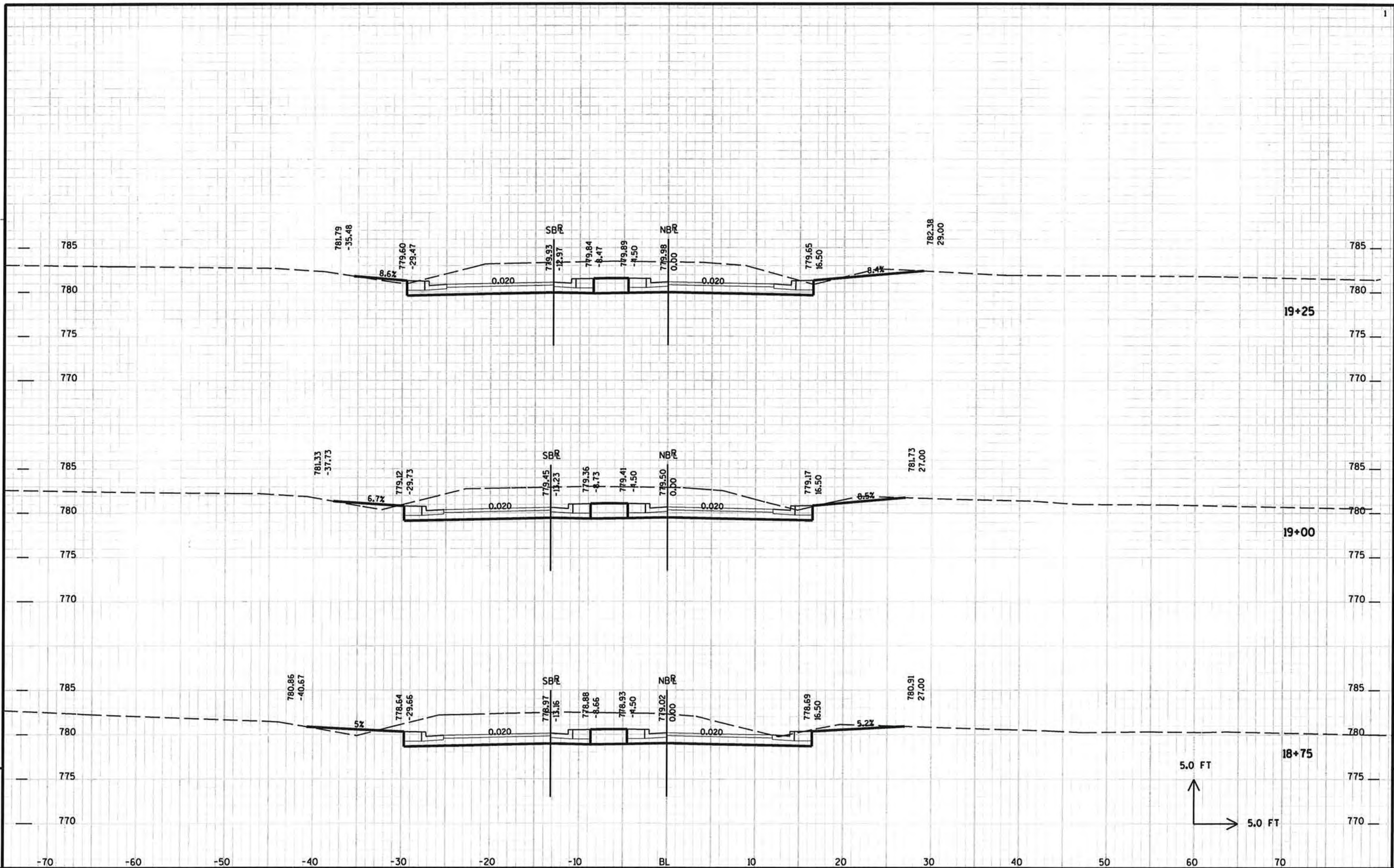


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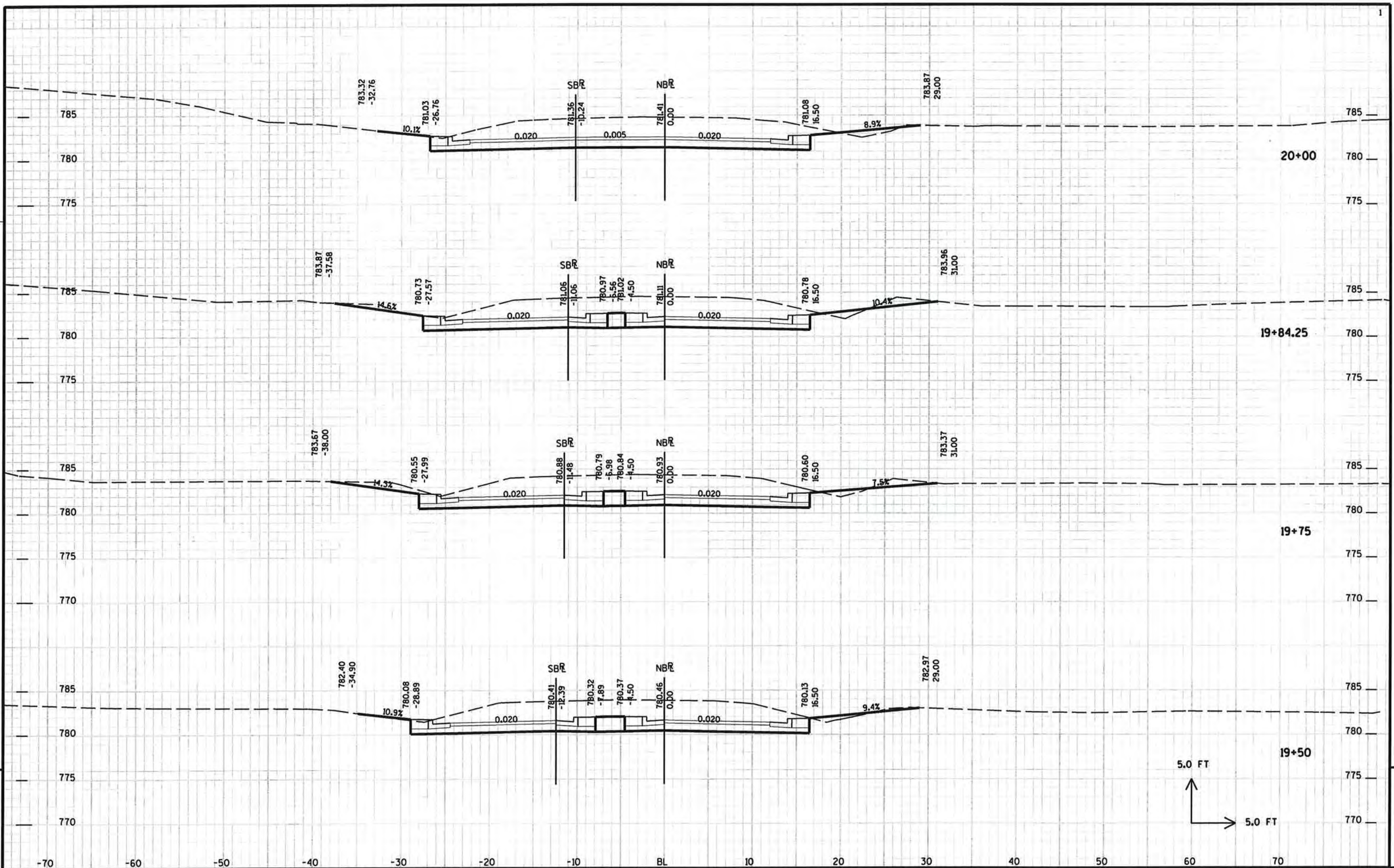
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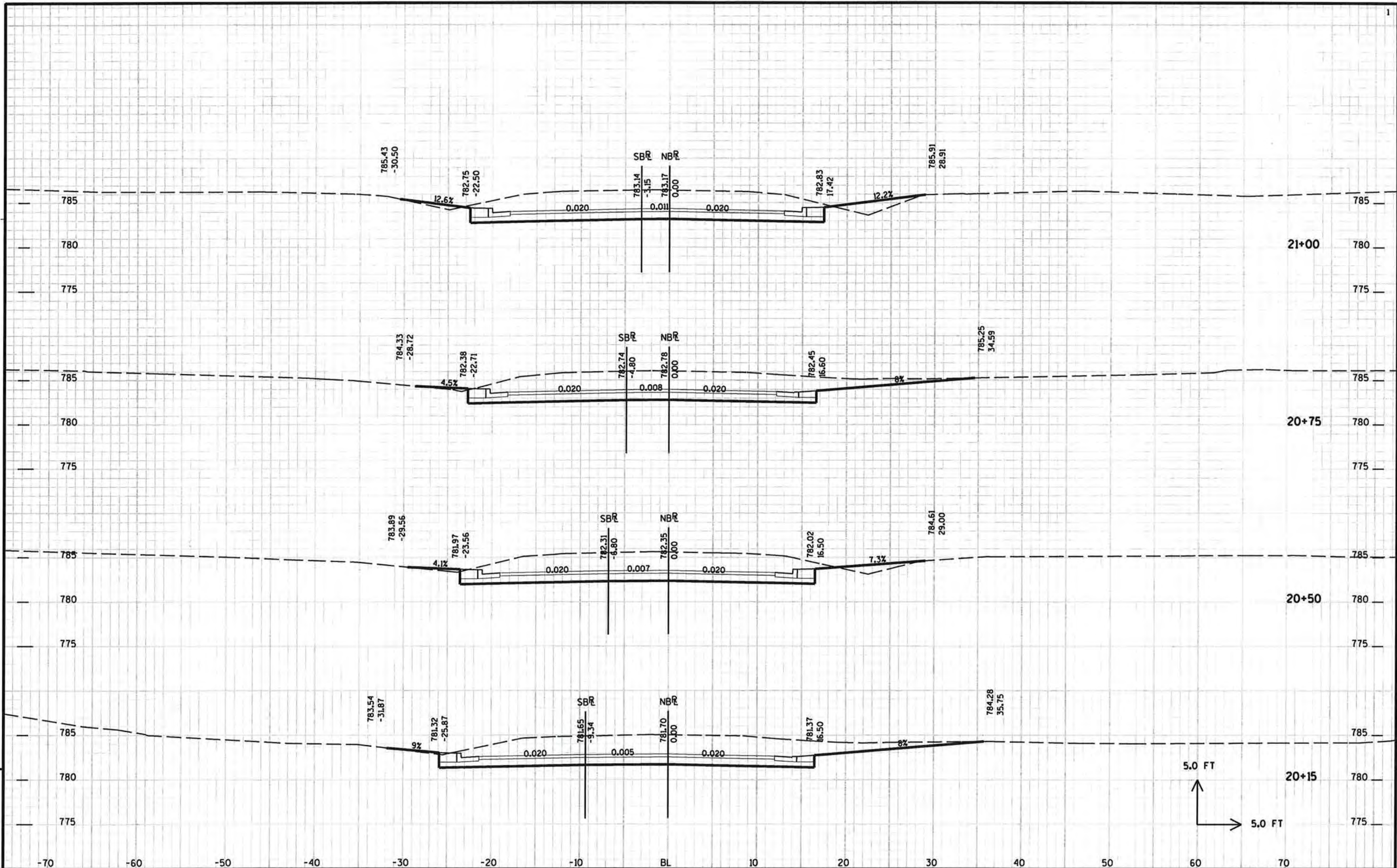
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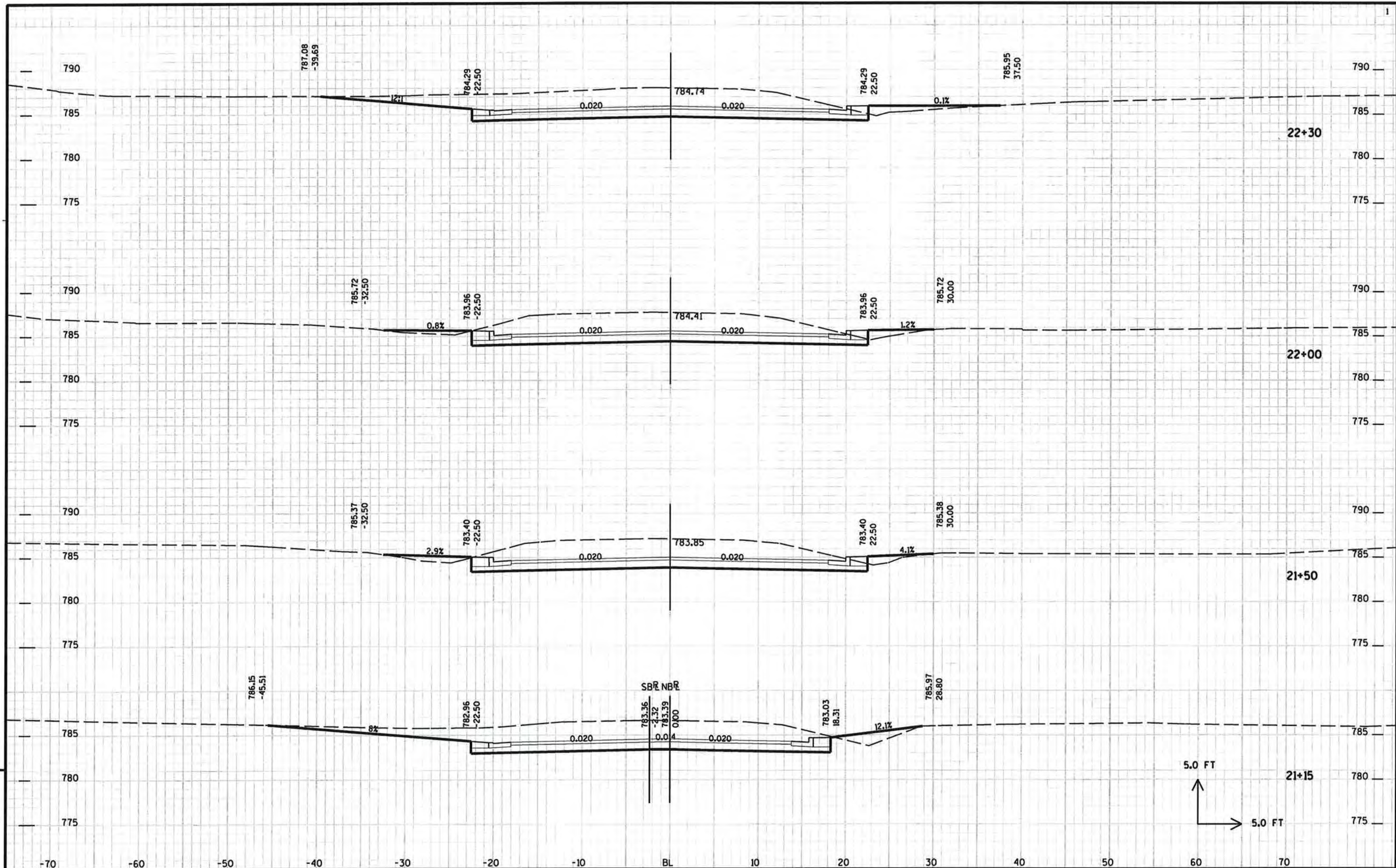
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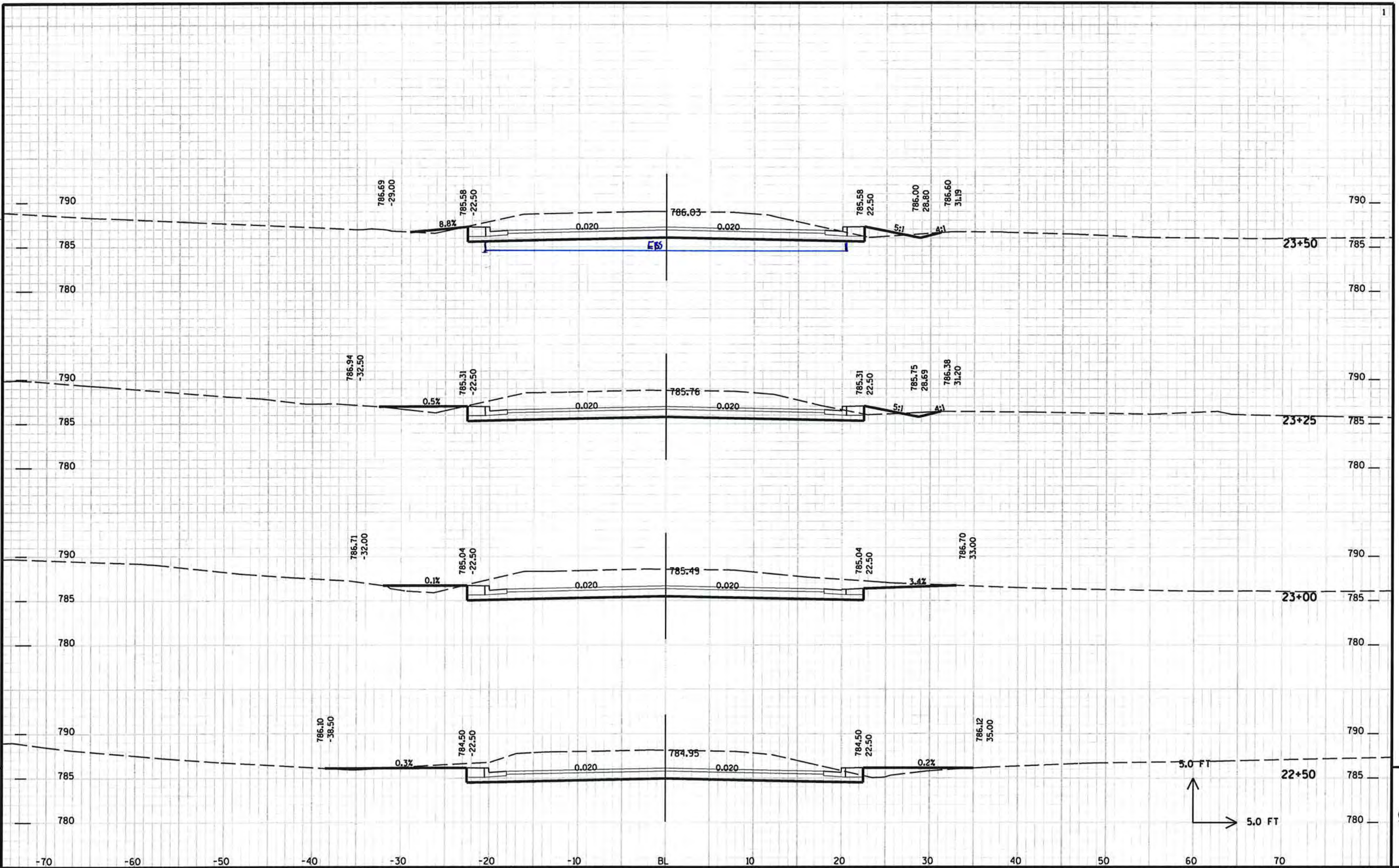


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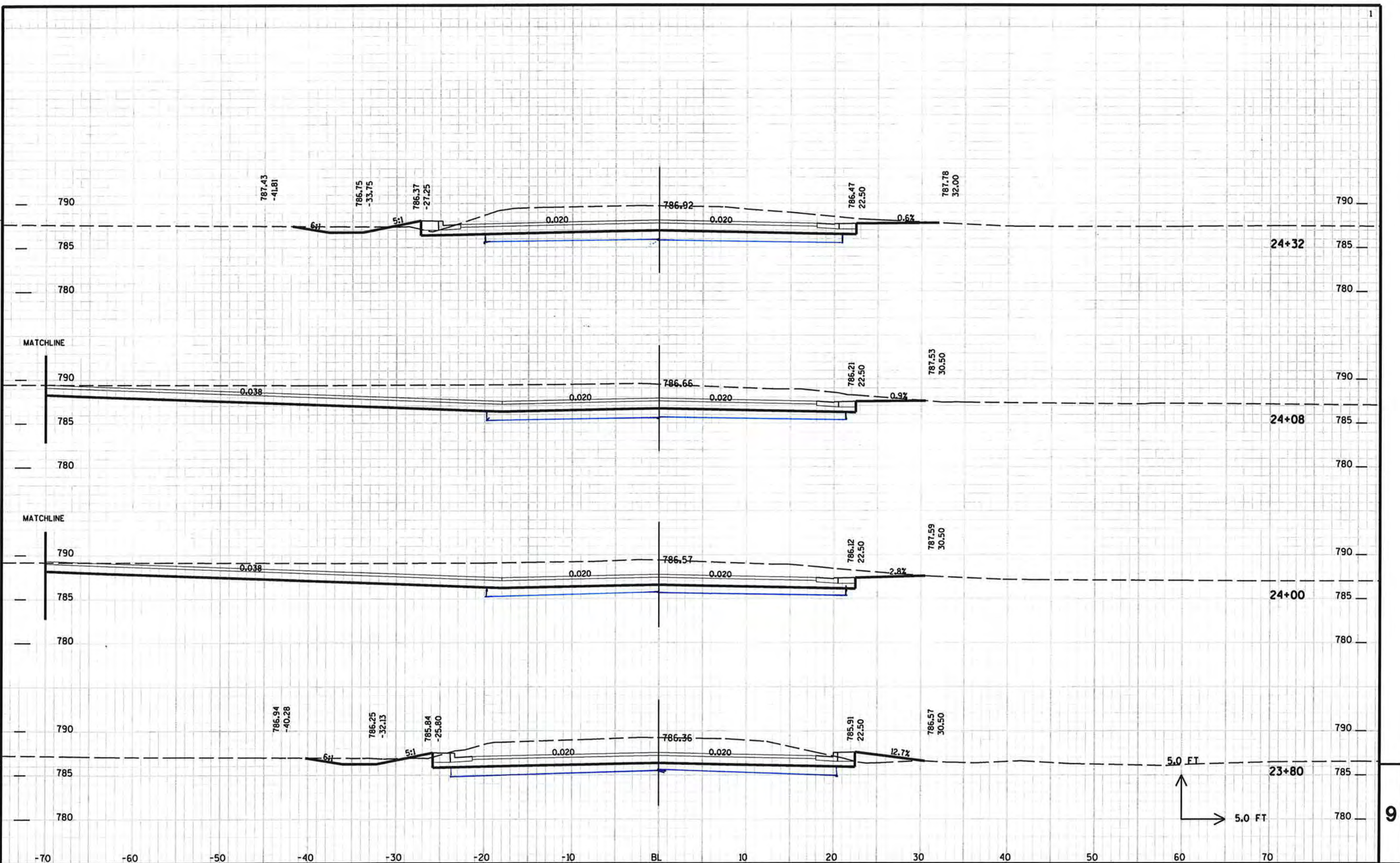


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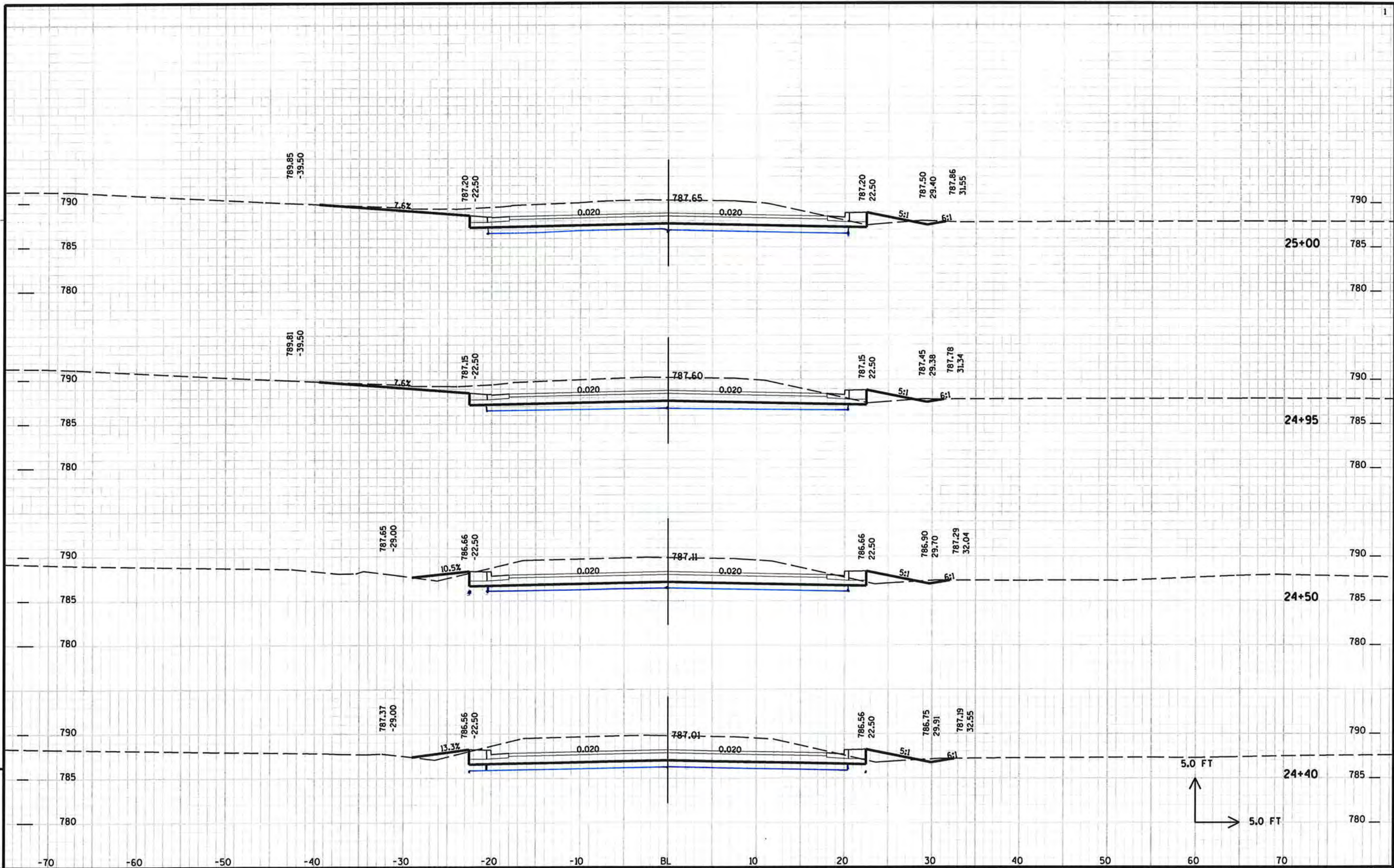




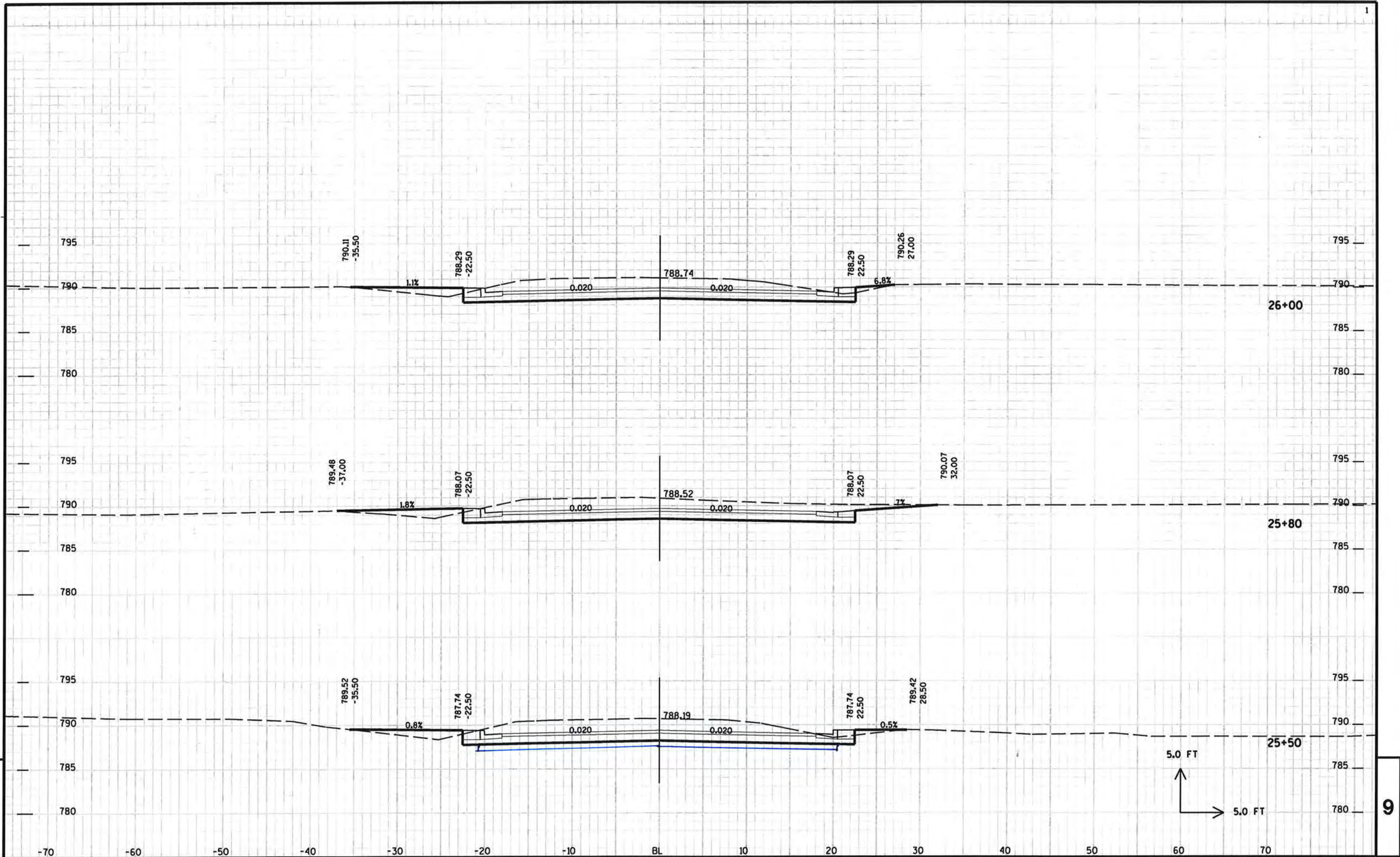
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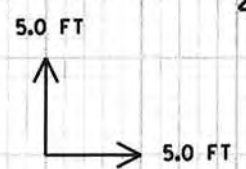


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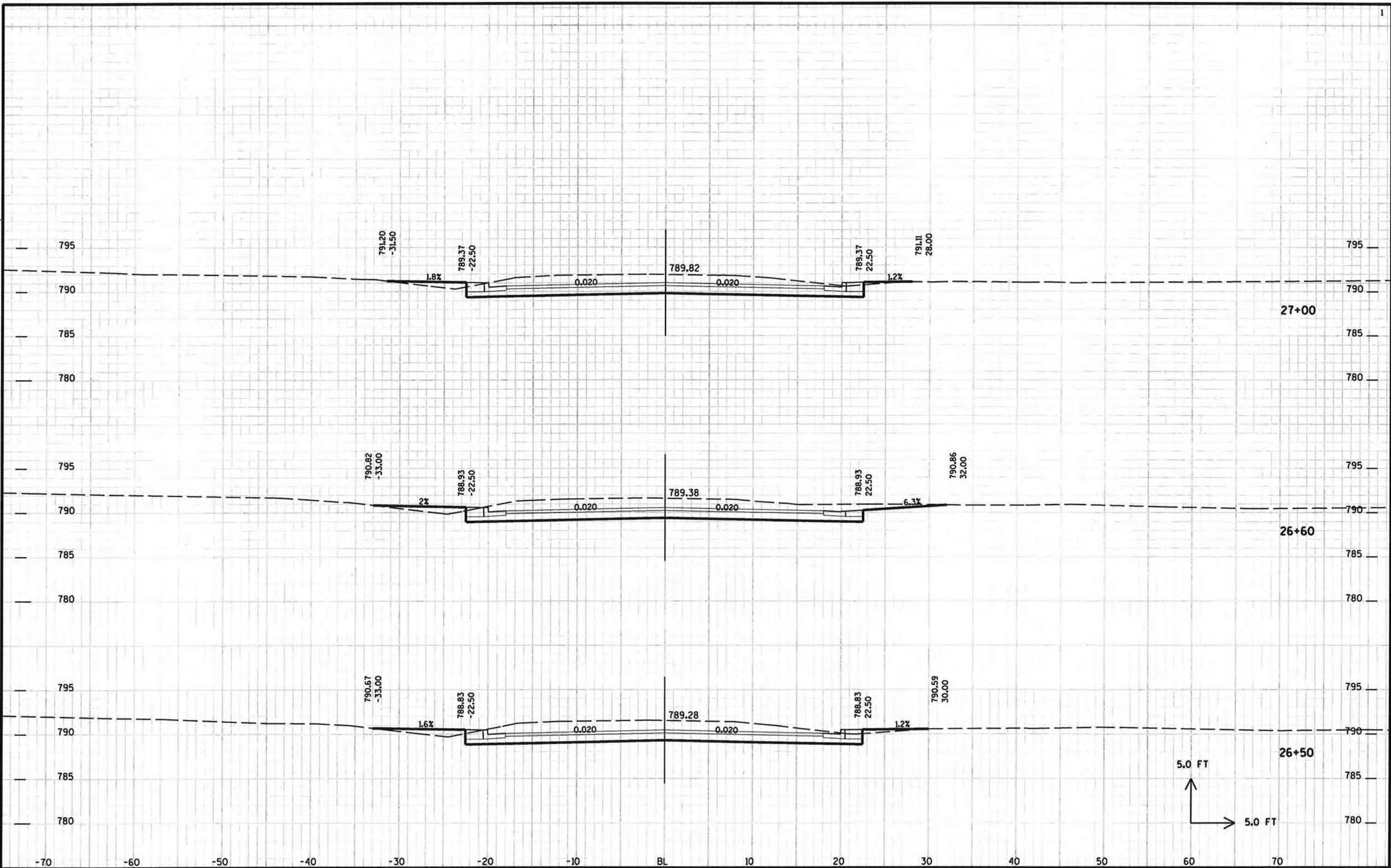


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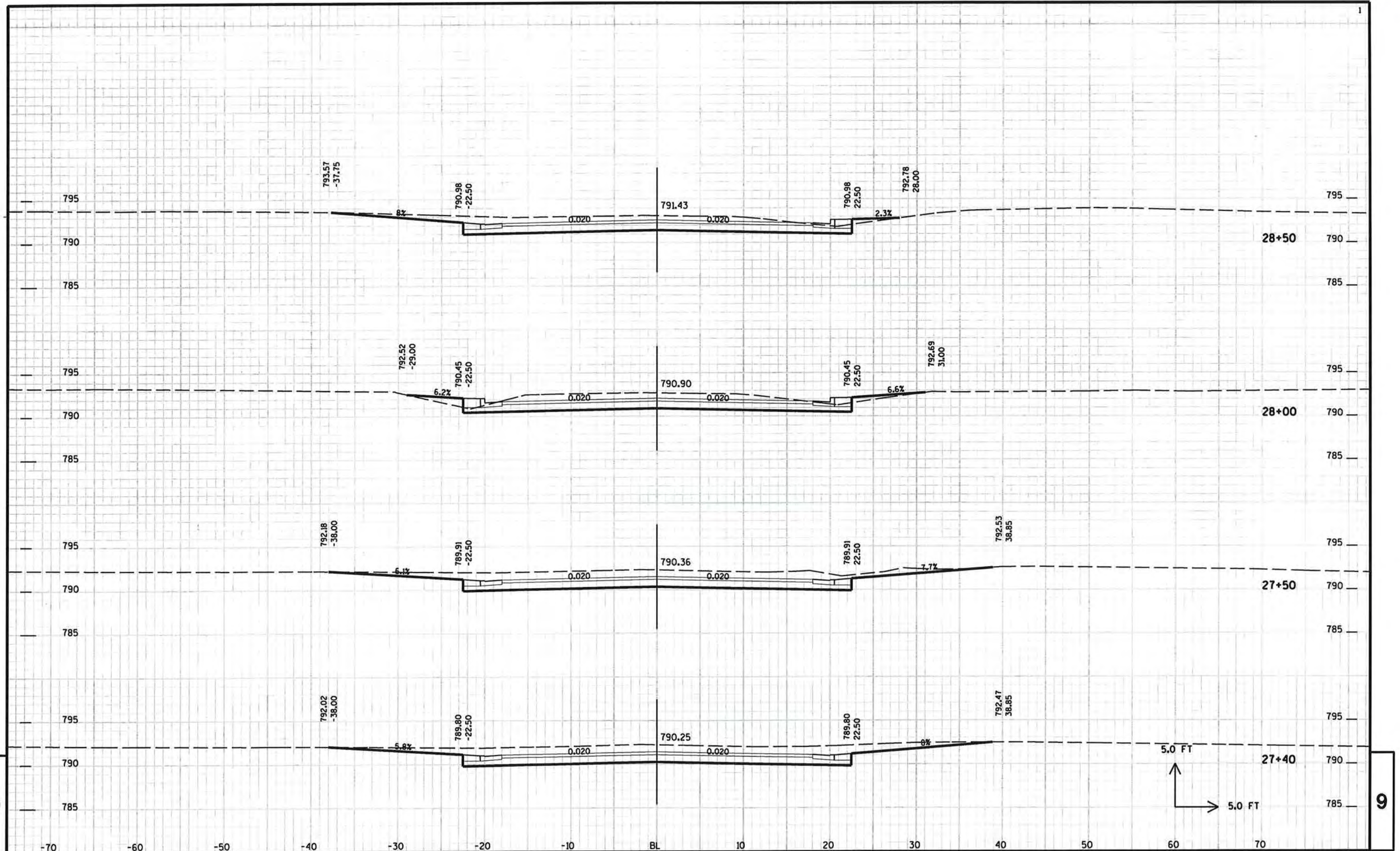
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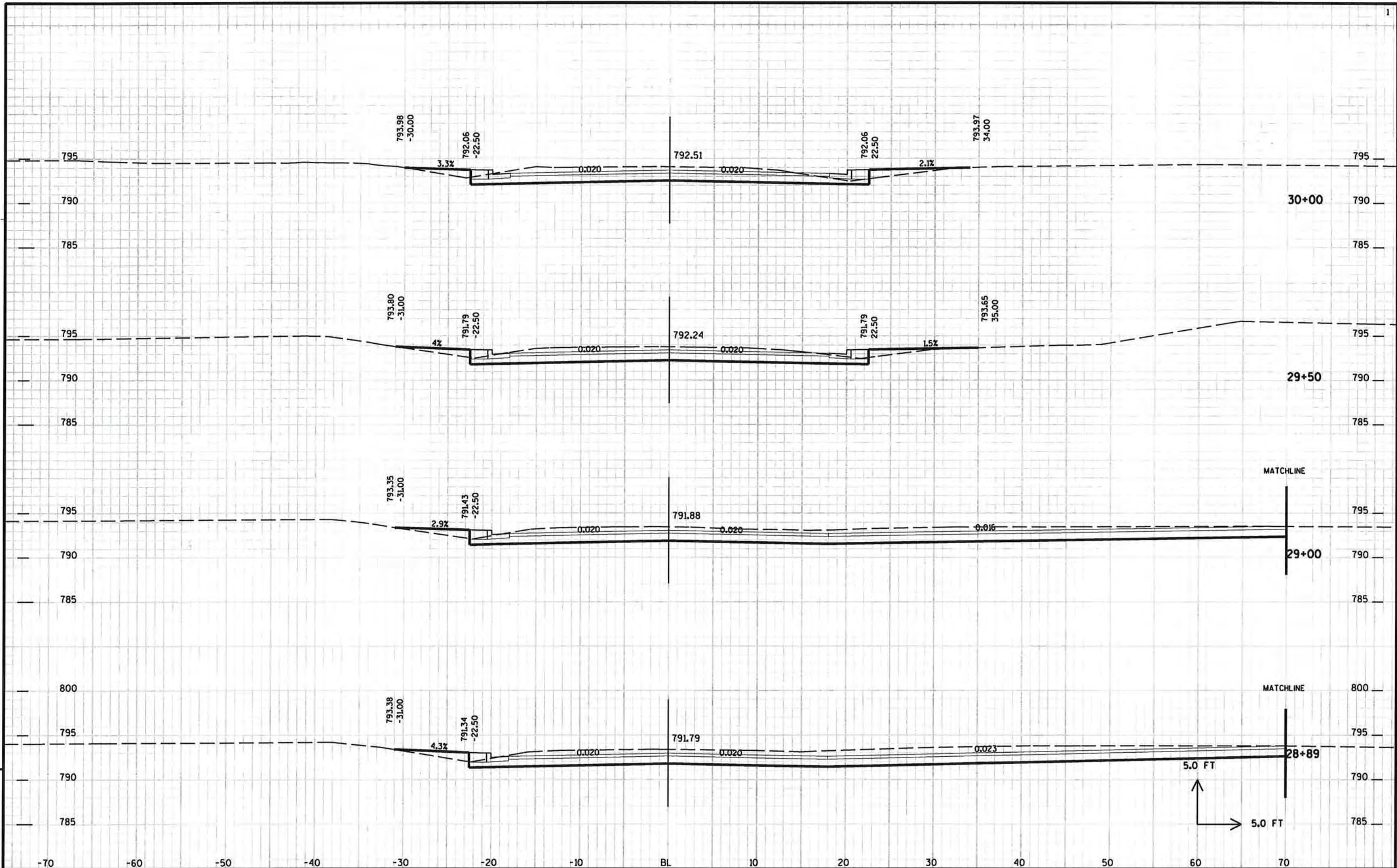
PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 162 E



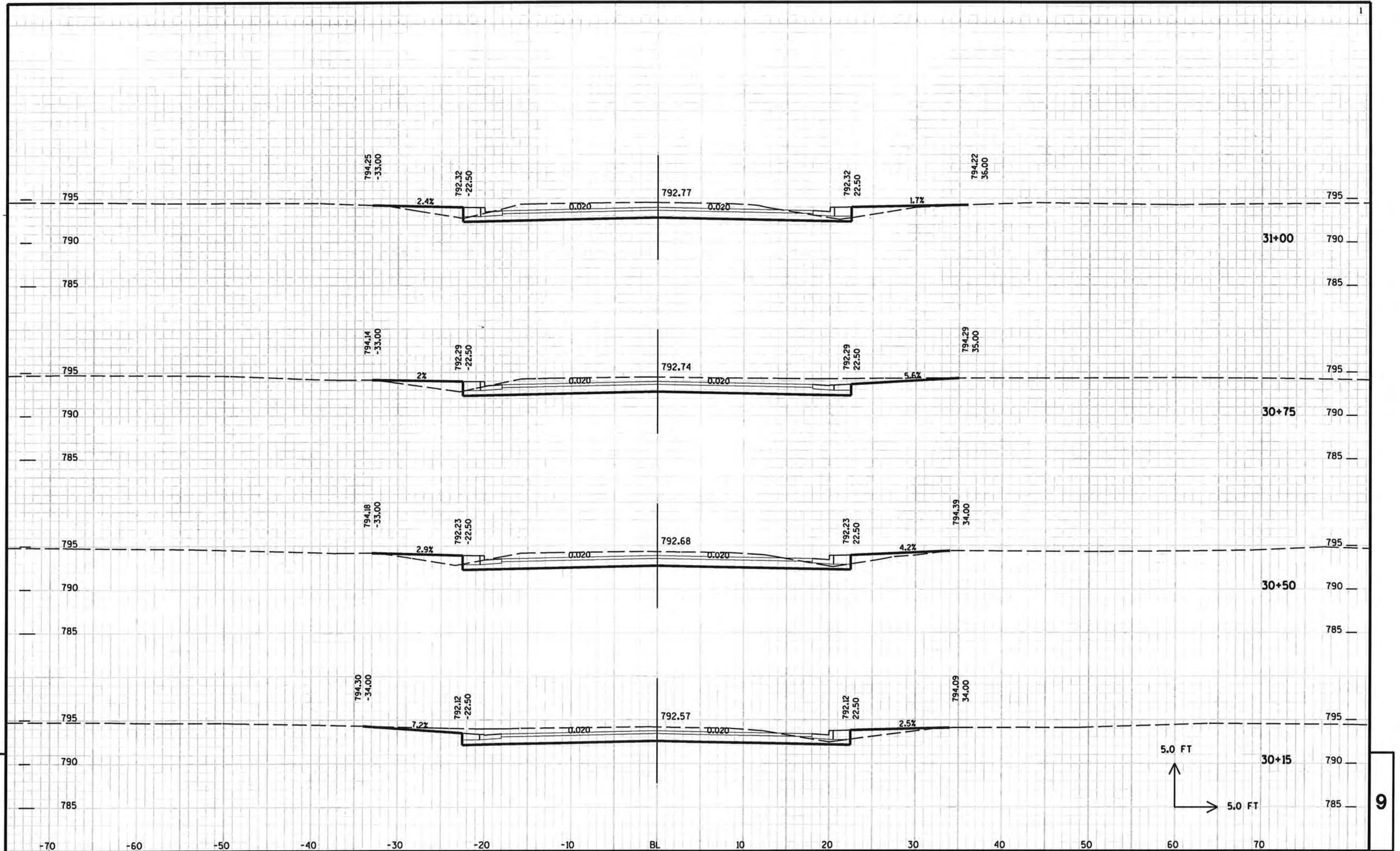
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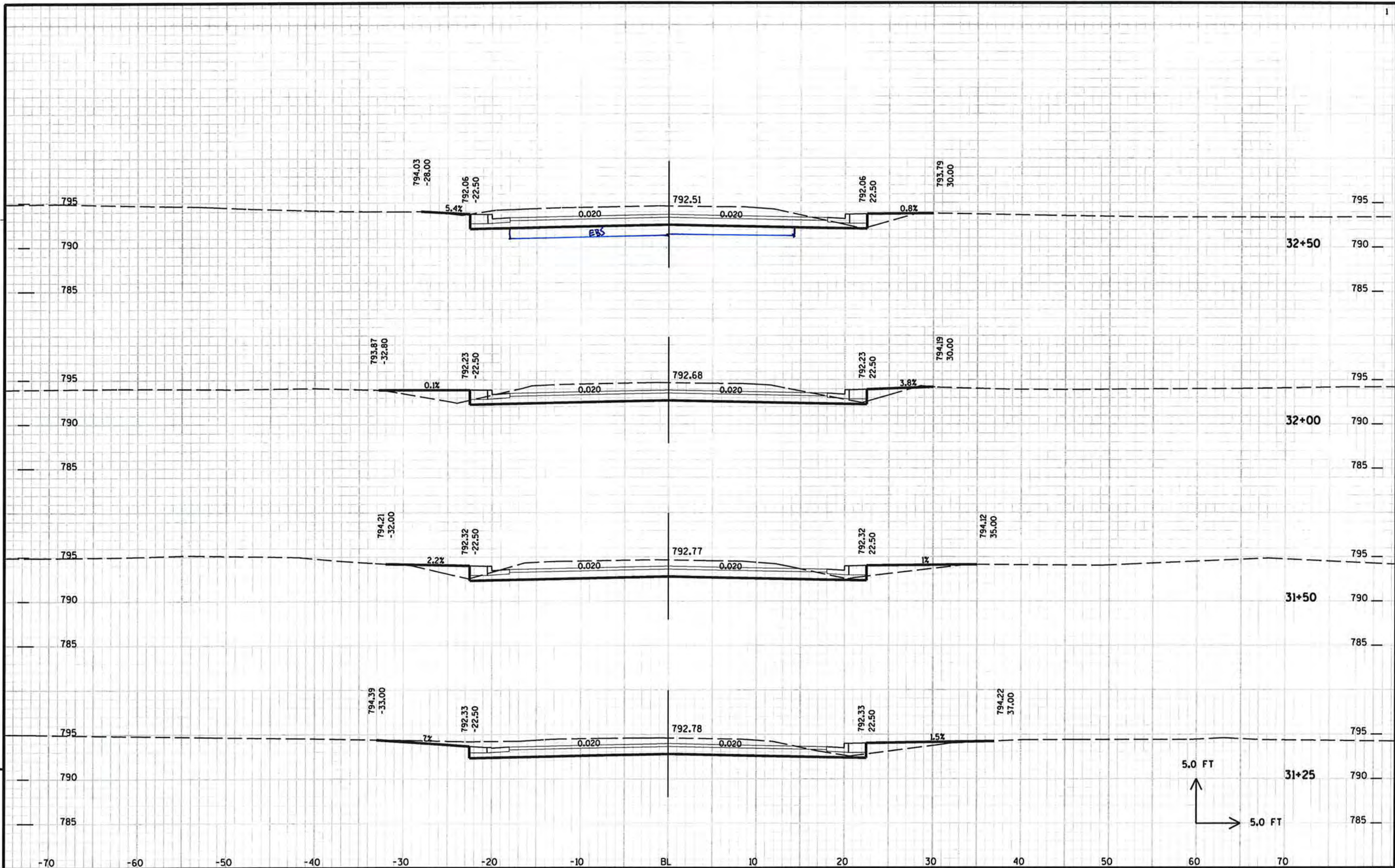


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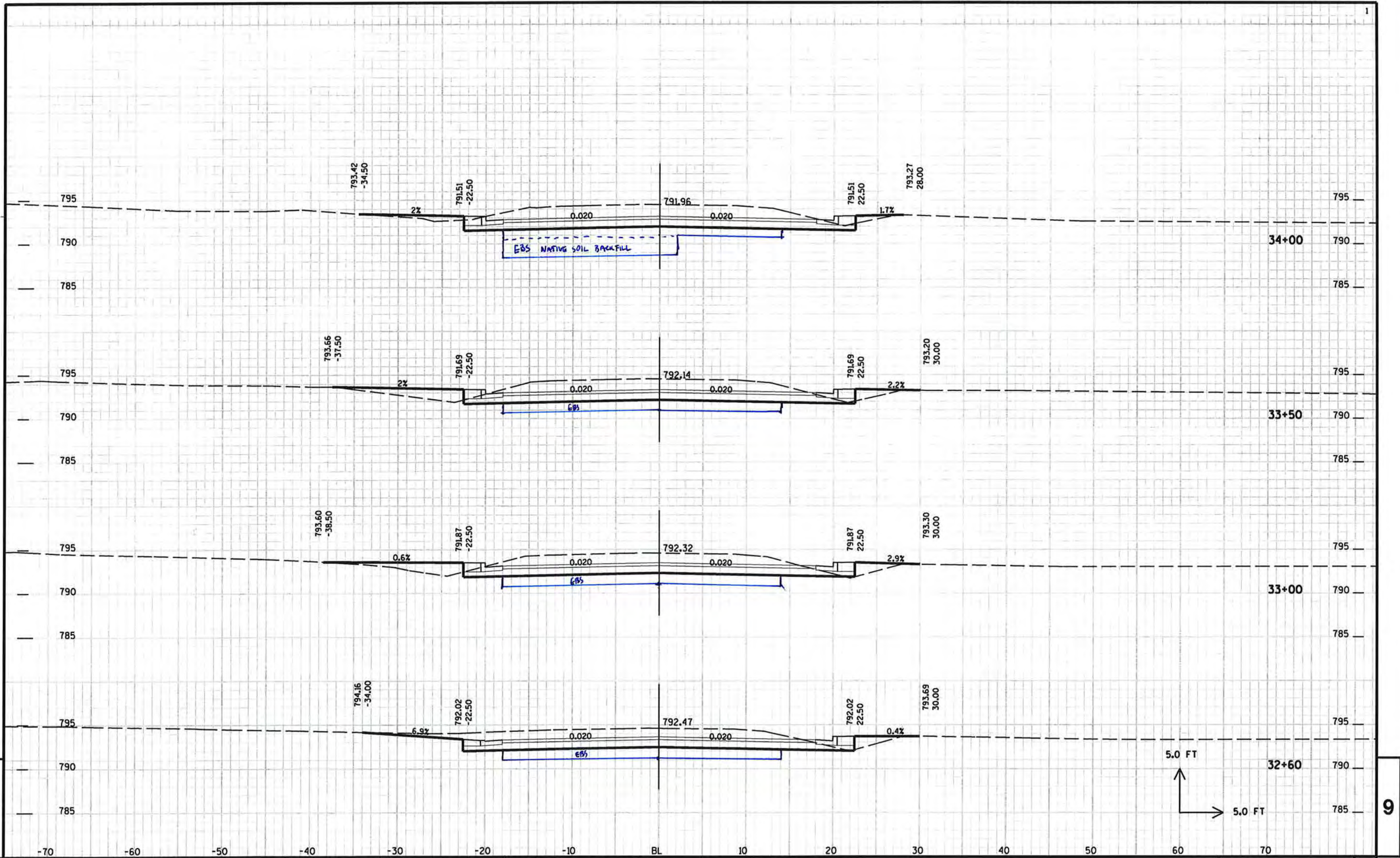


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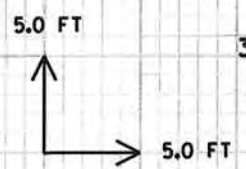


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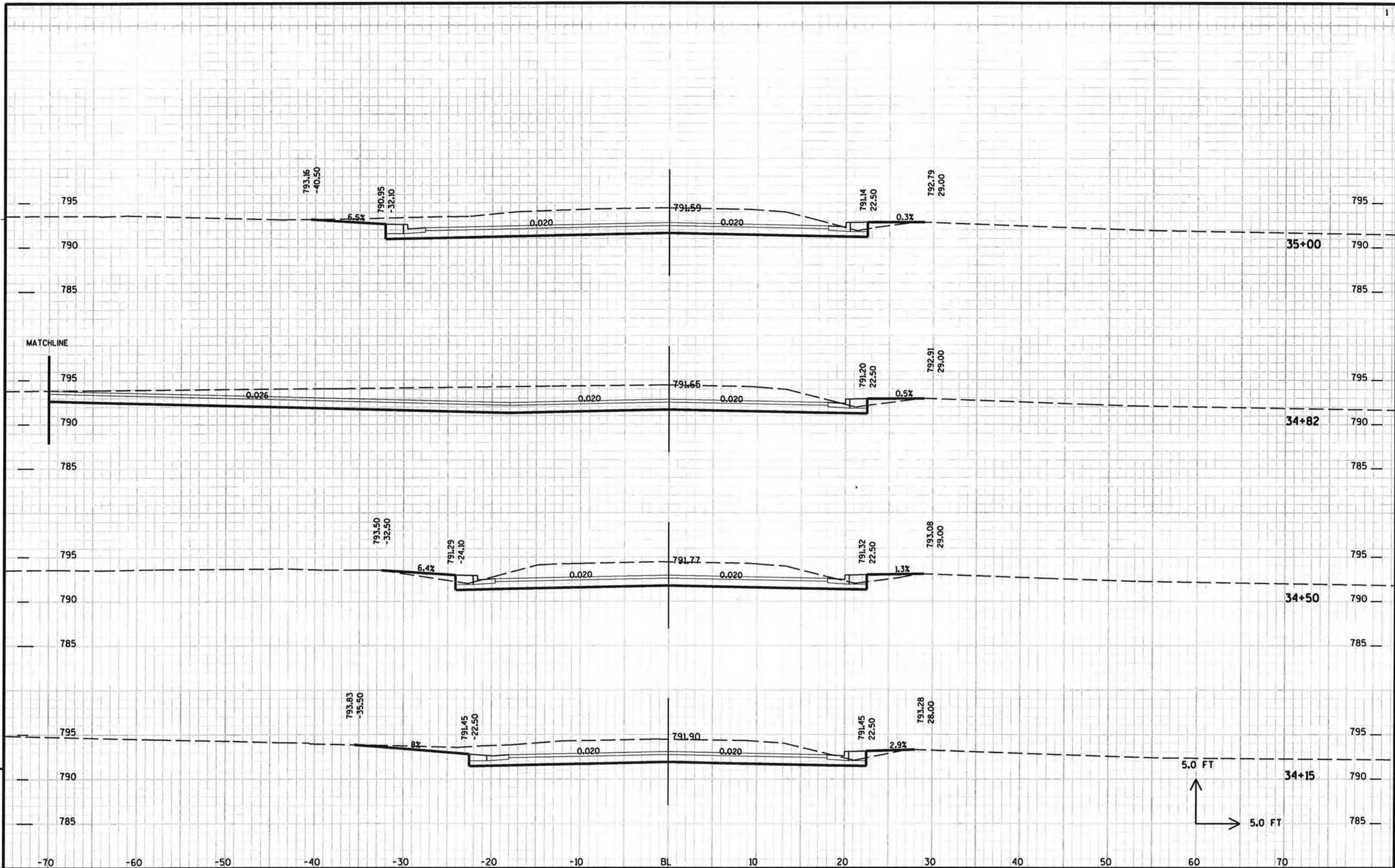


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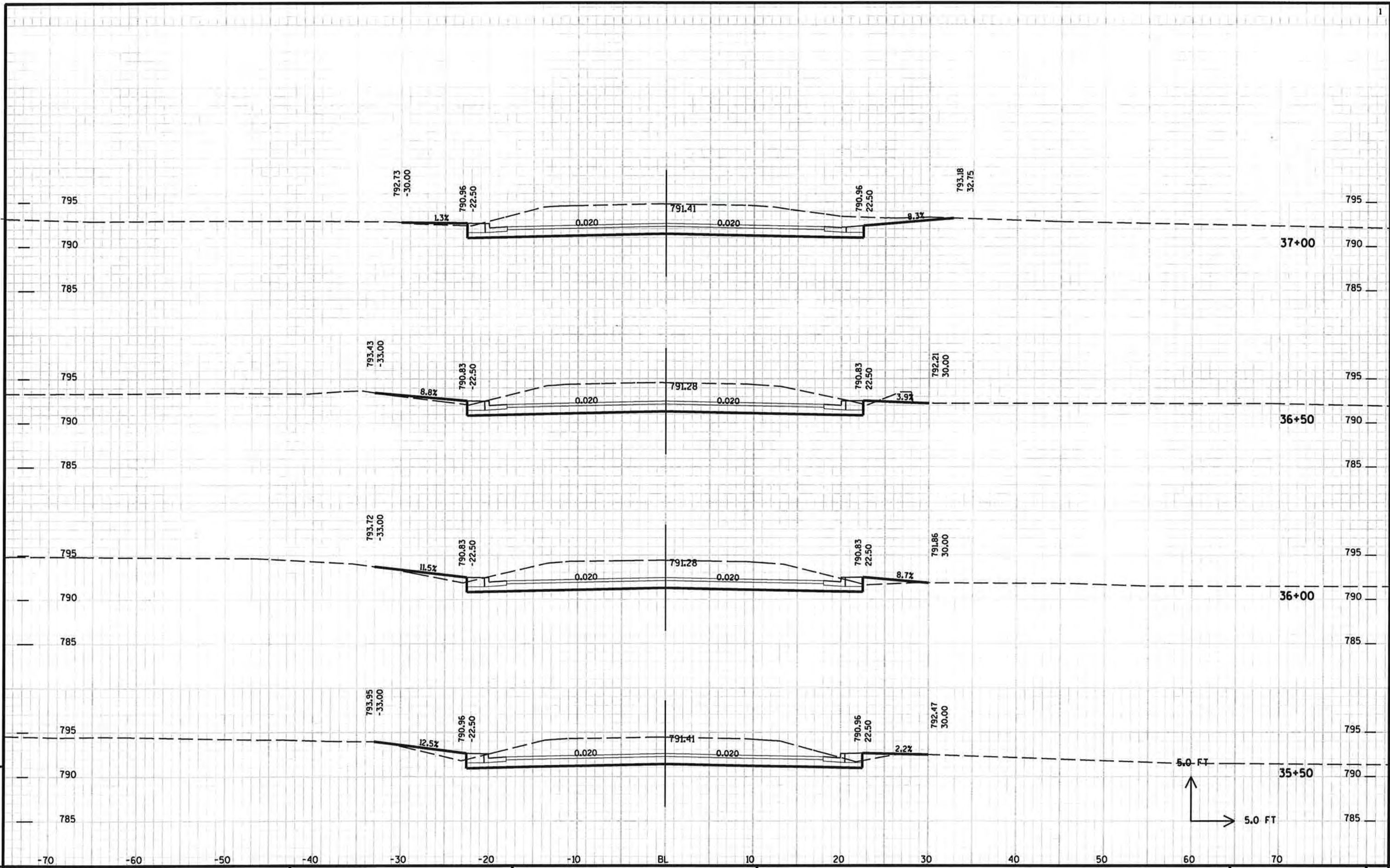
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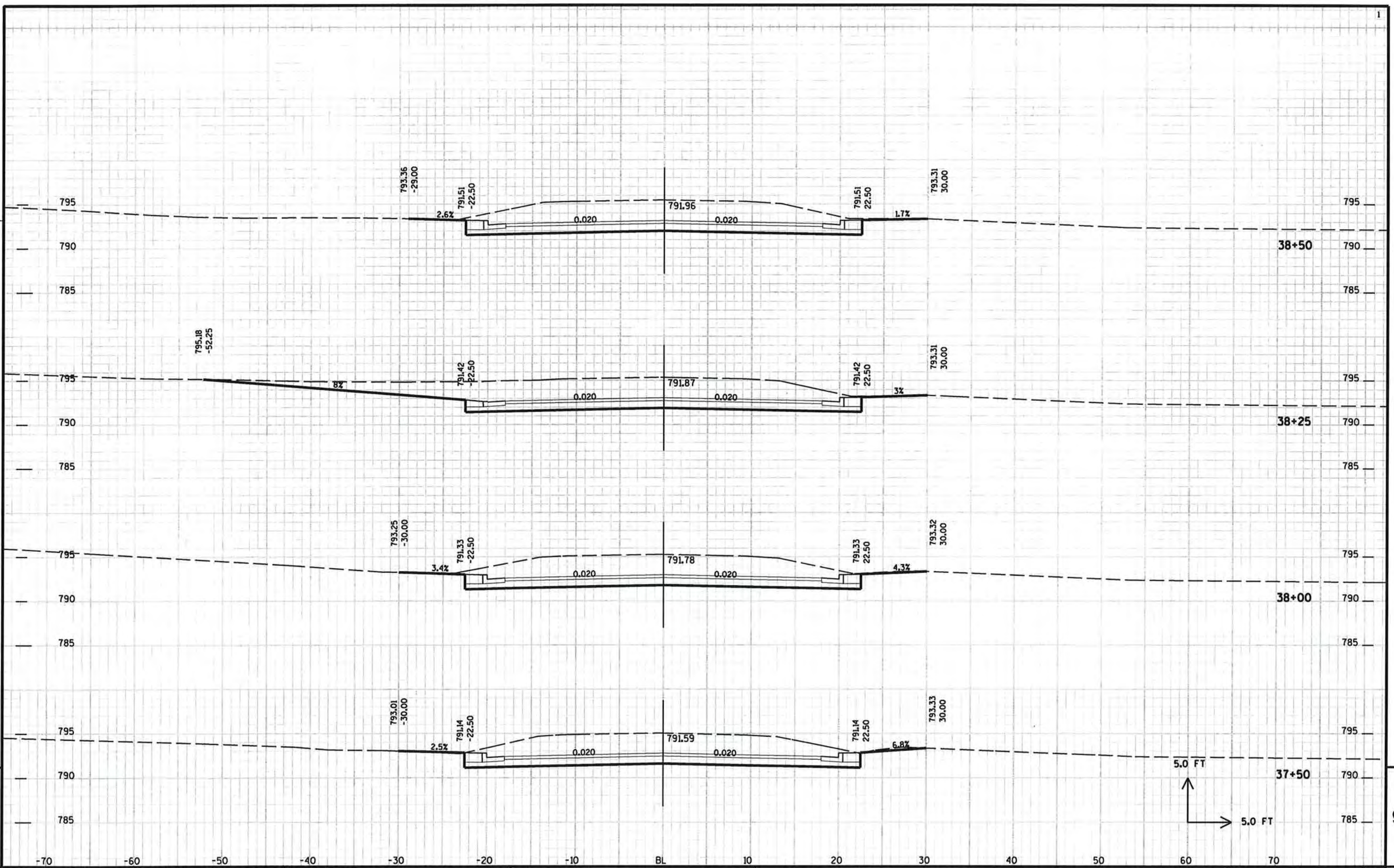
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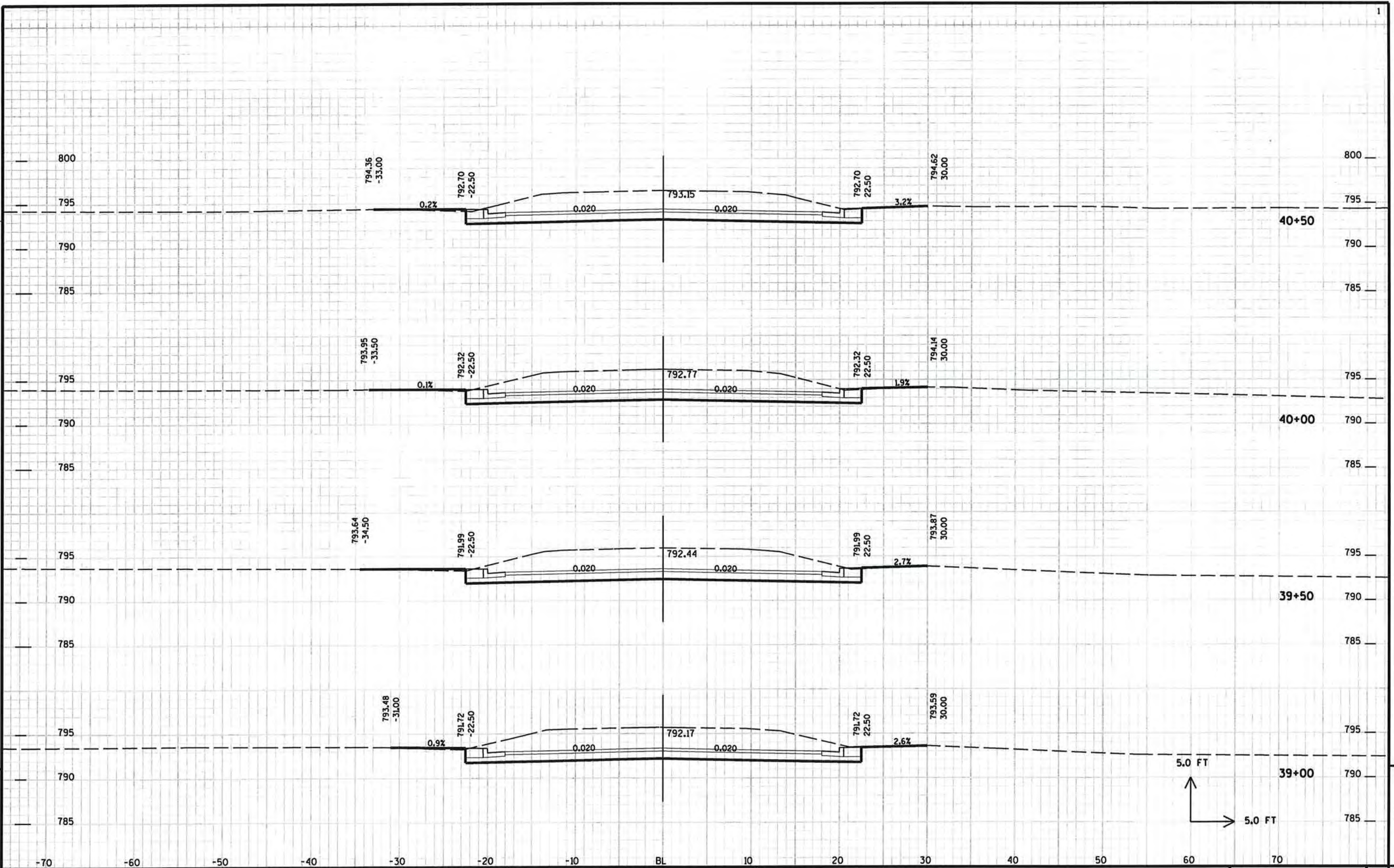
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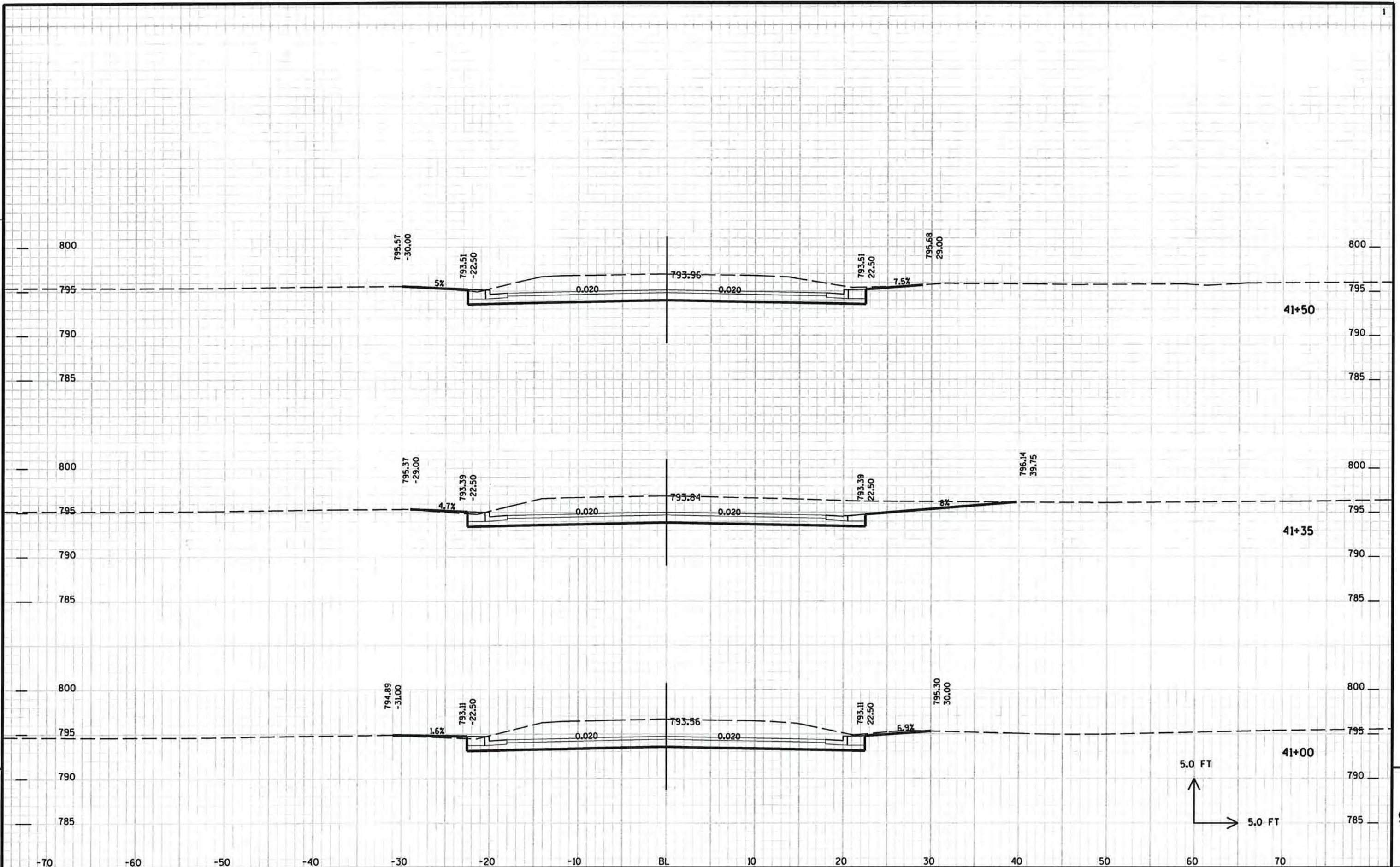
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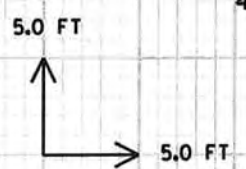
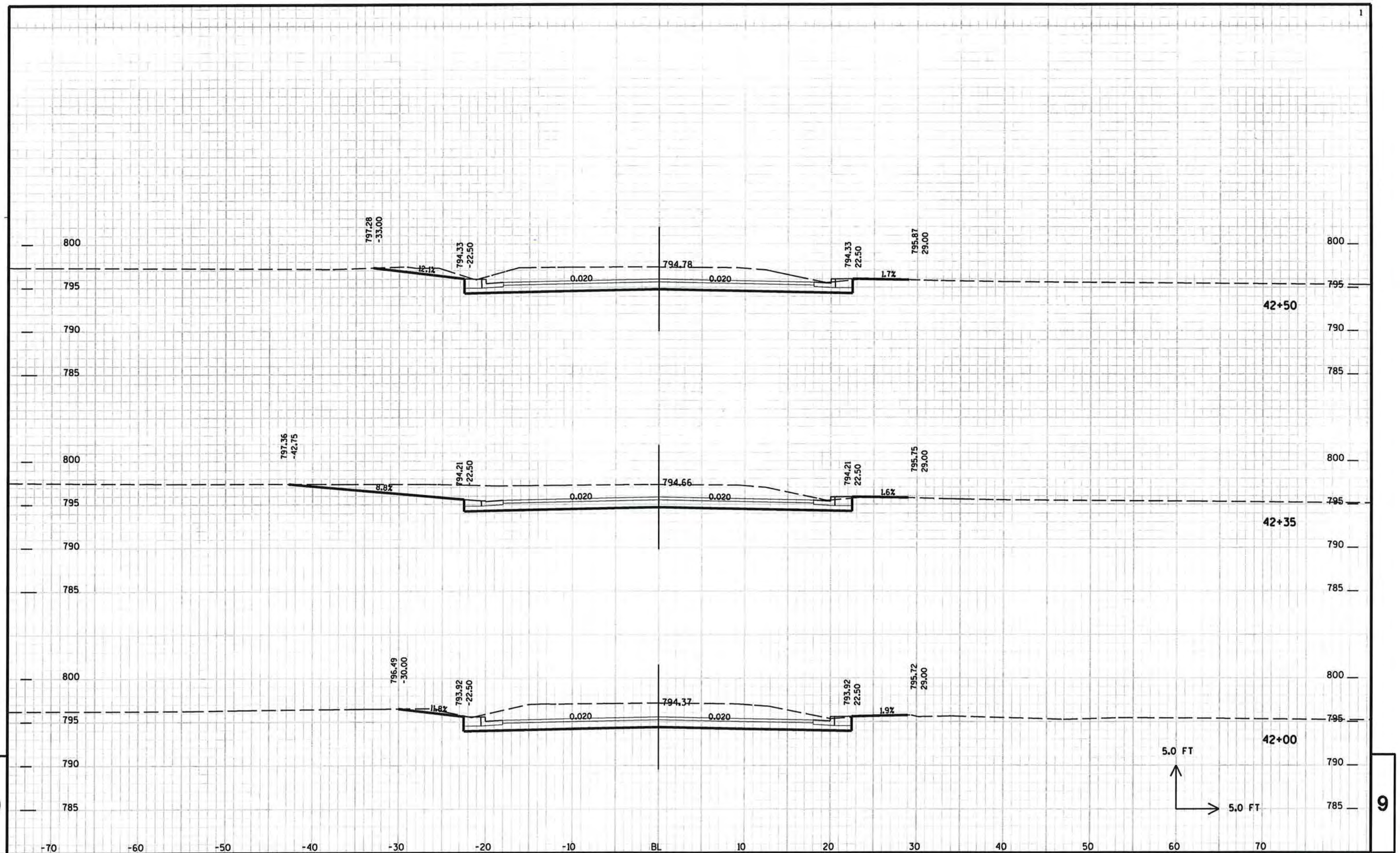
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 172 E



PROJECT NO: \_\_\_\_\_ HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 173 E

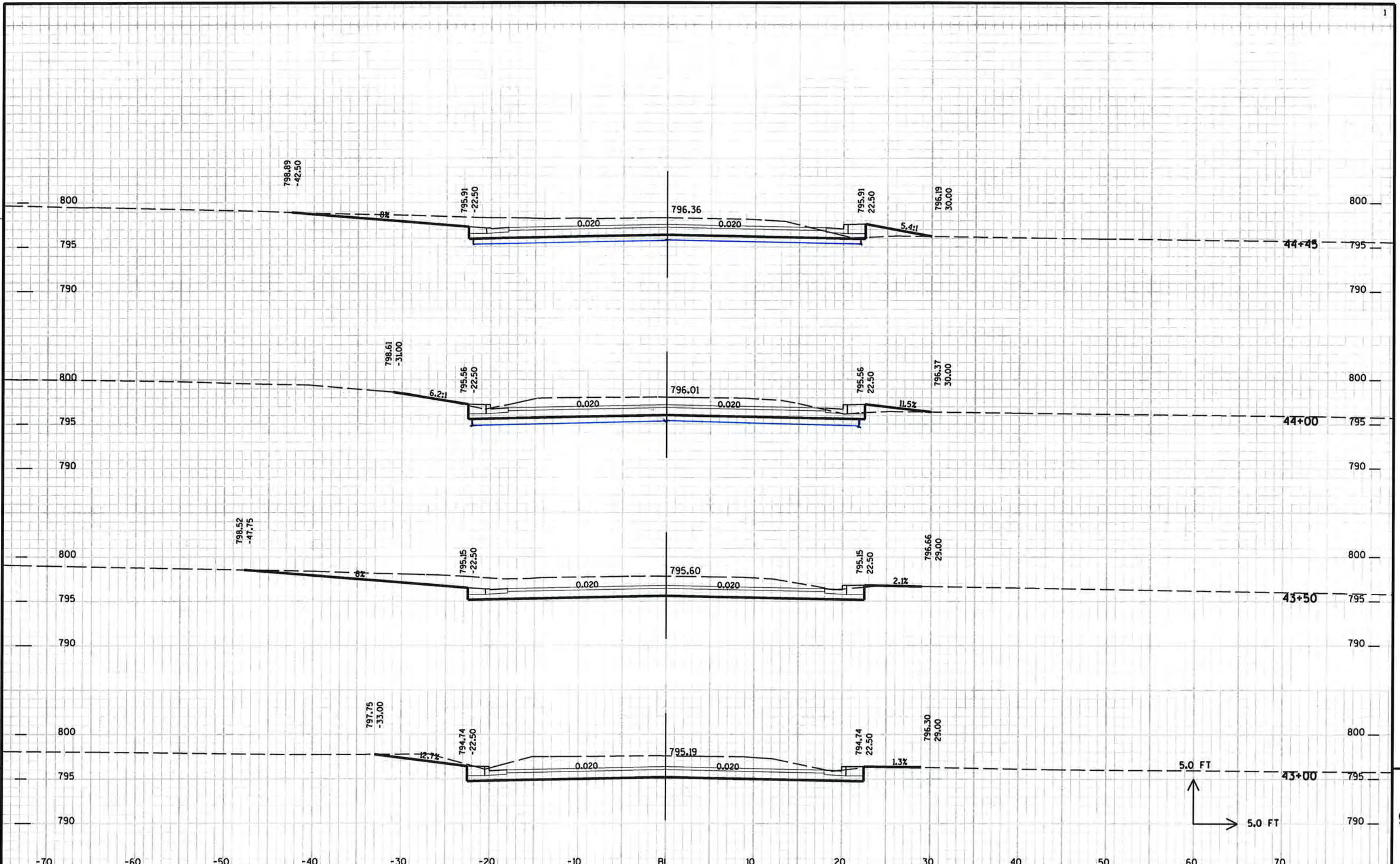


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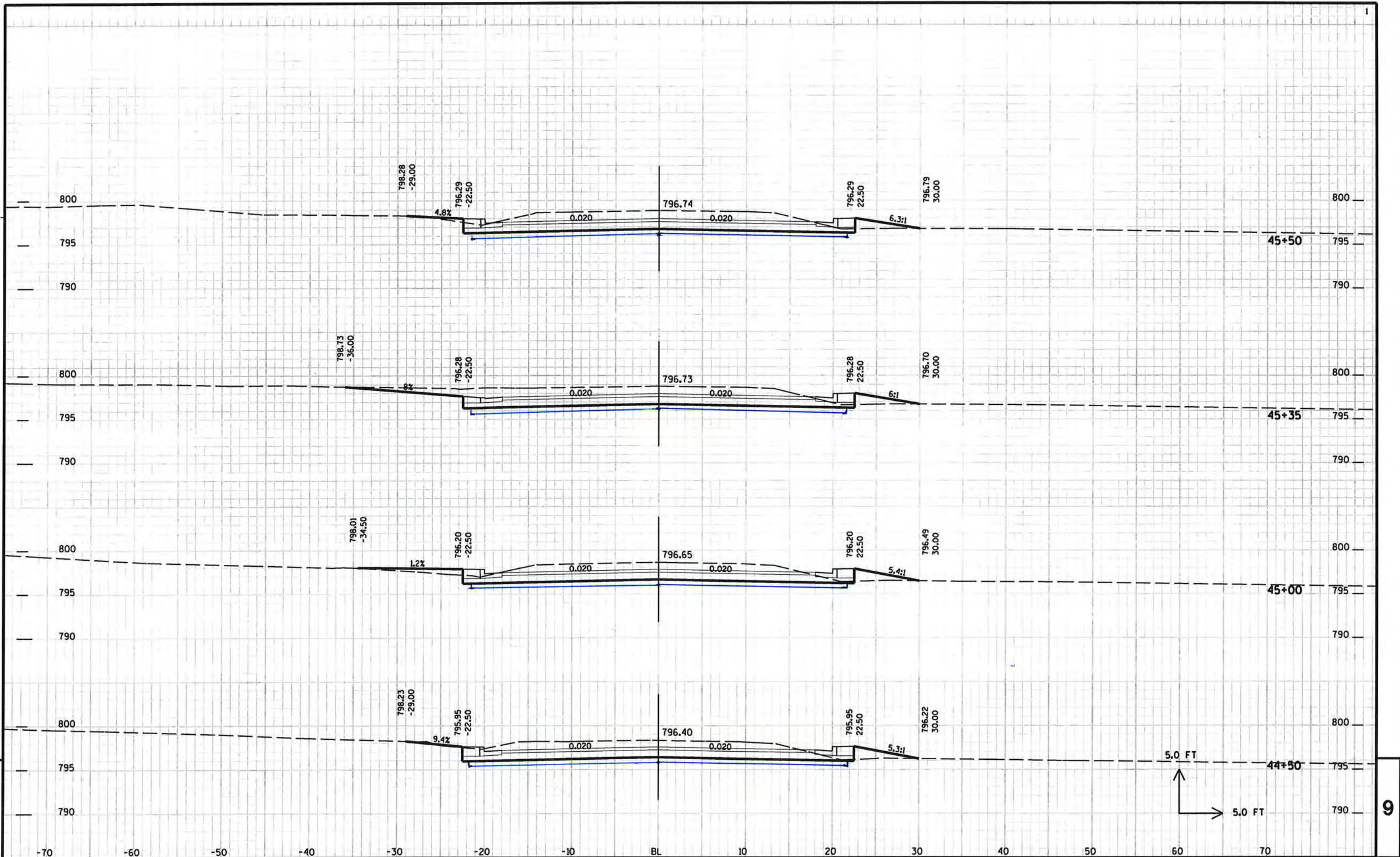
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 174





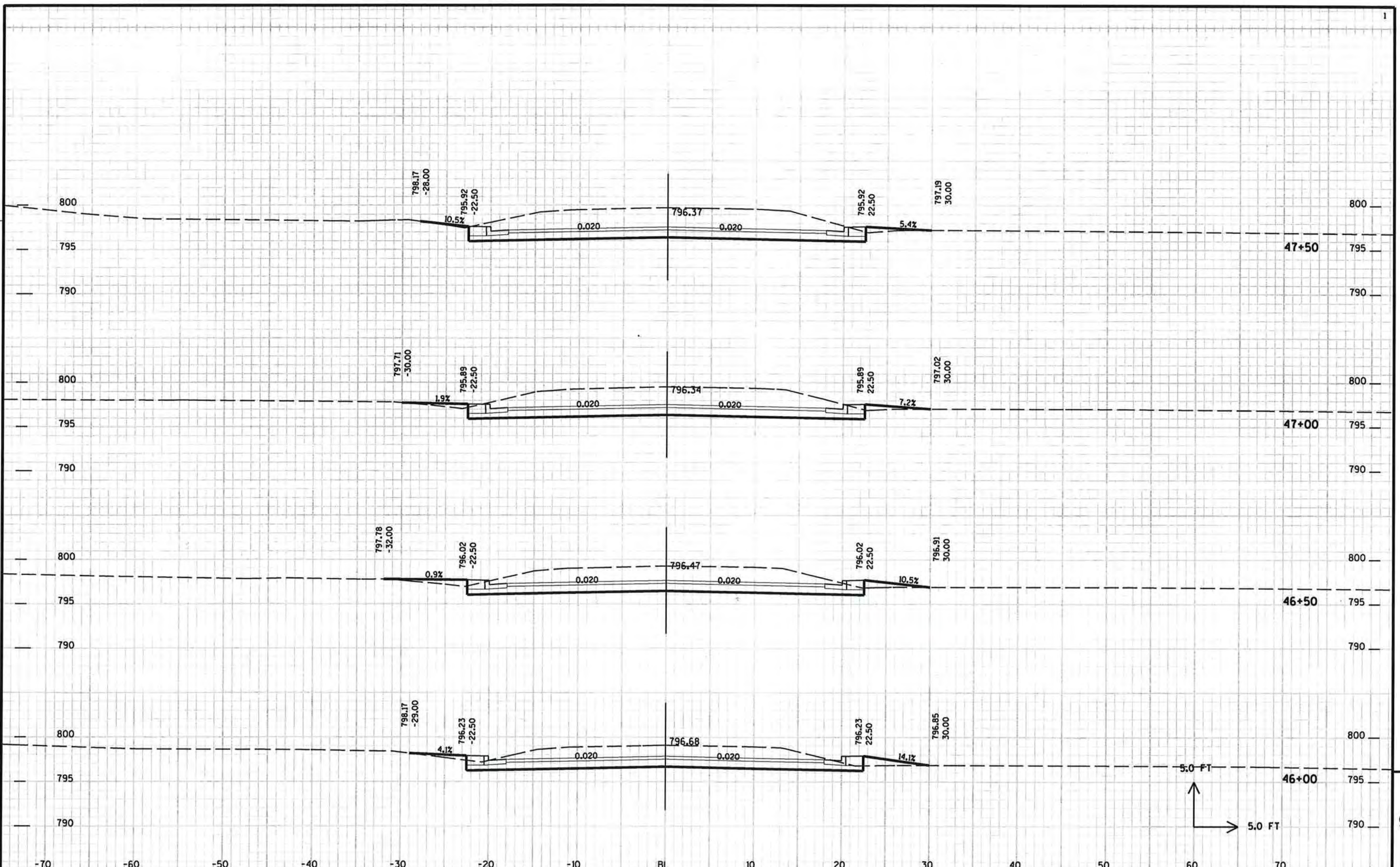
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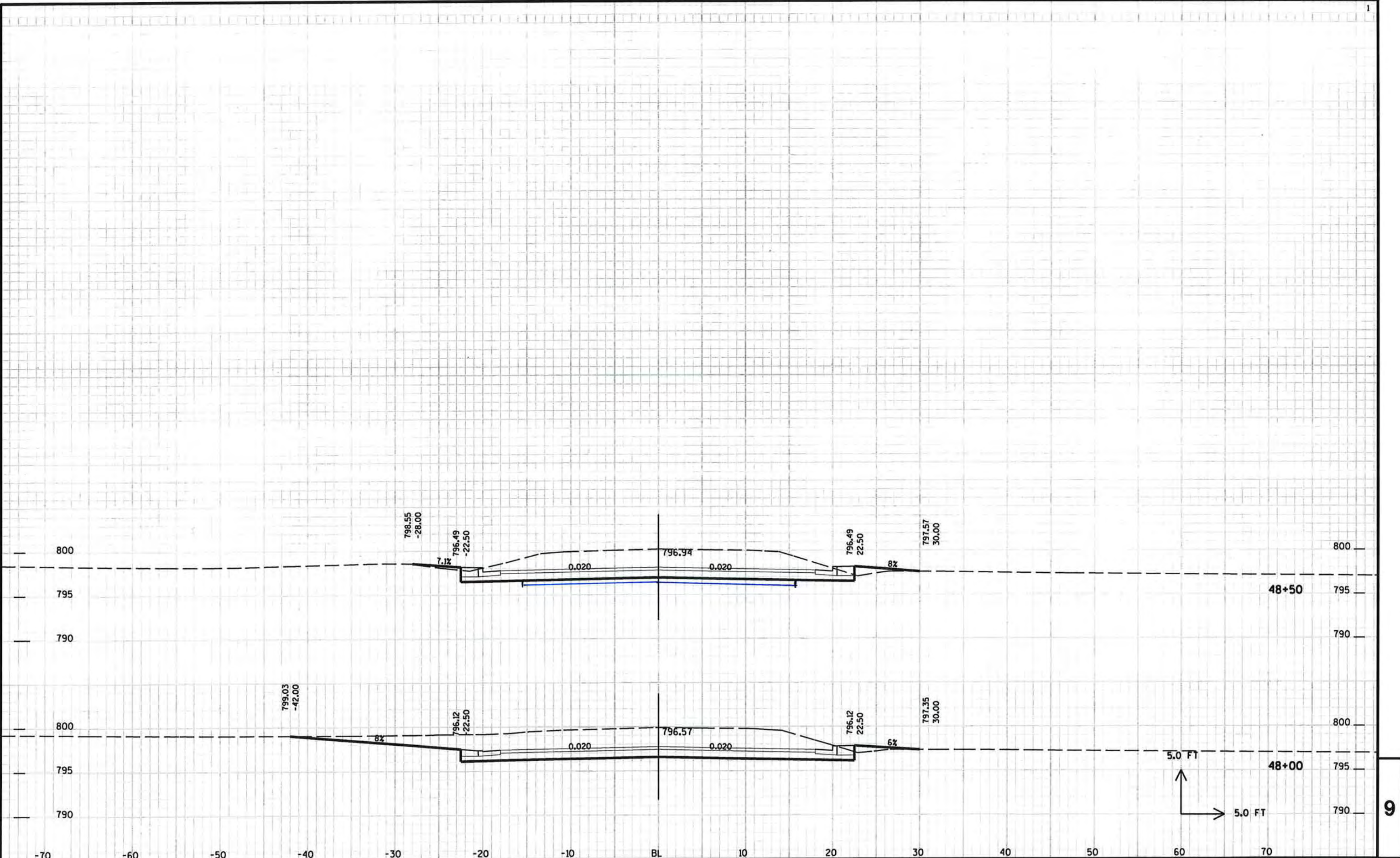
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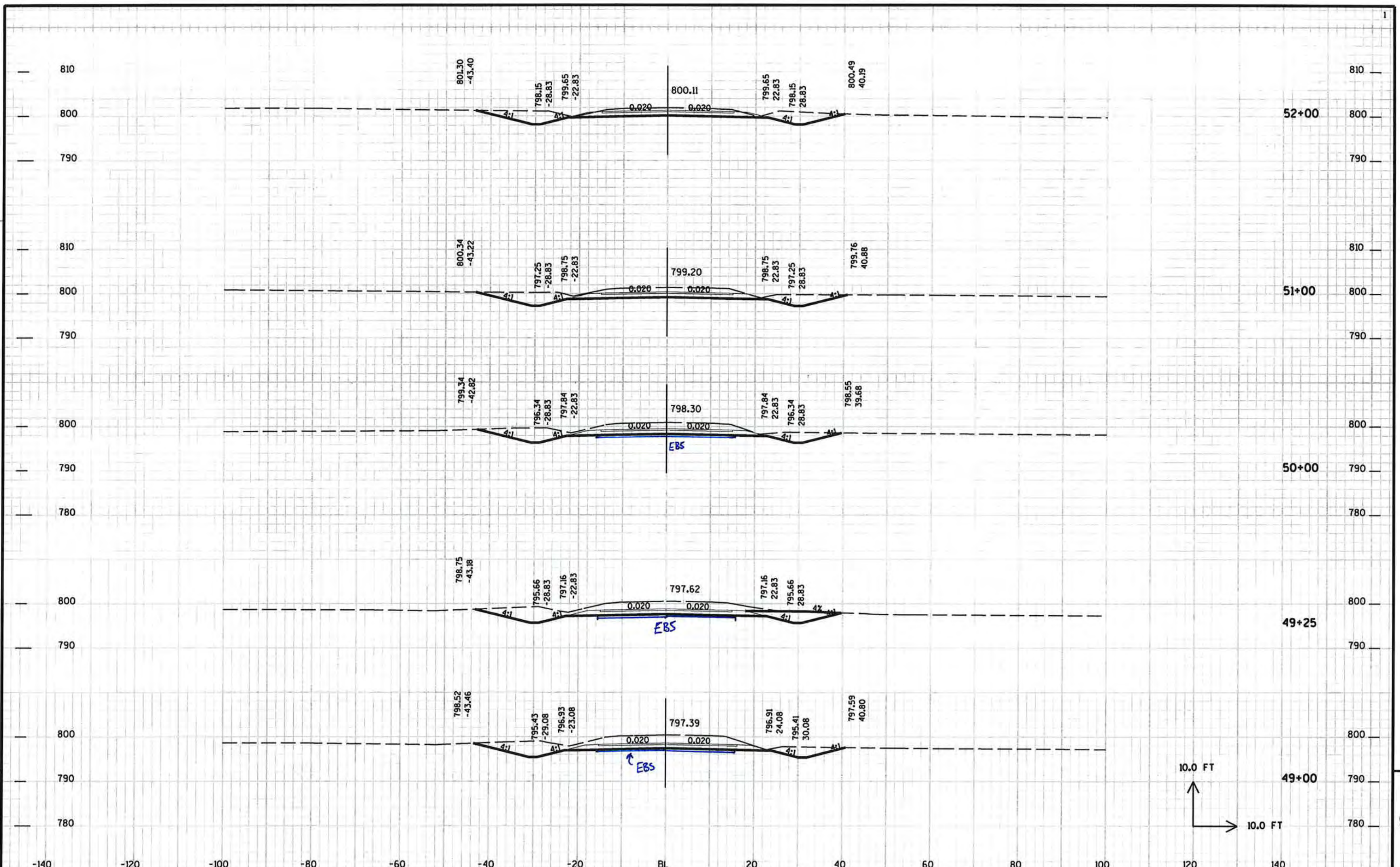
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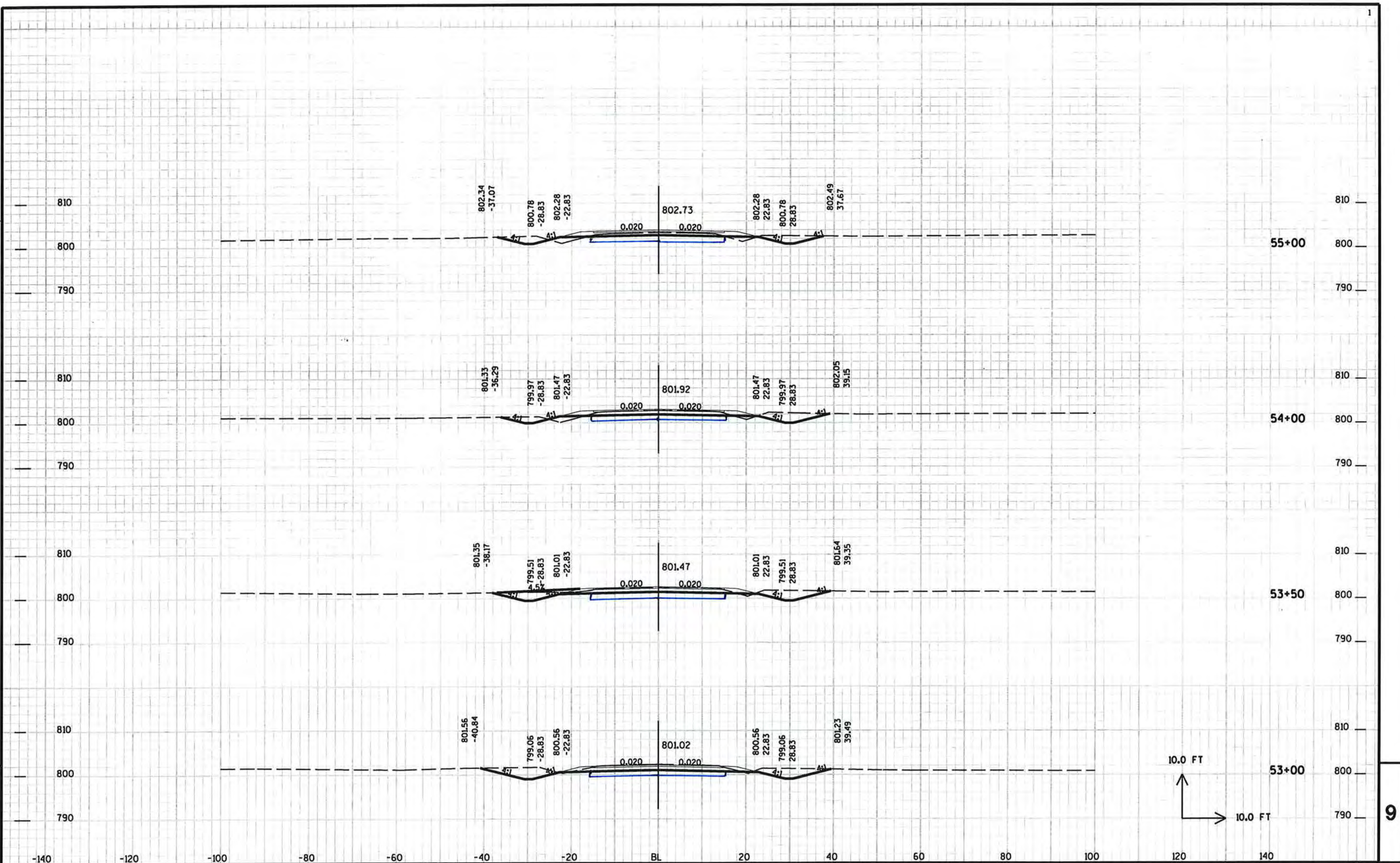
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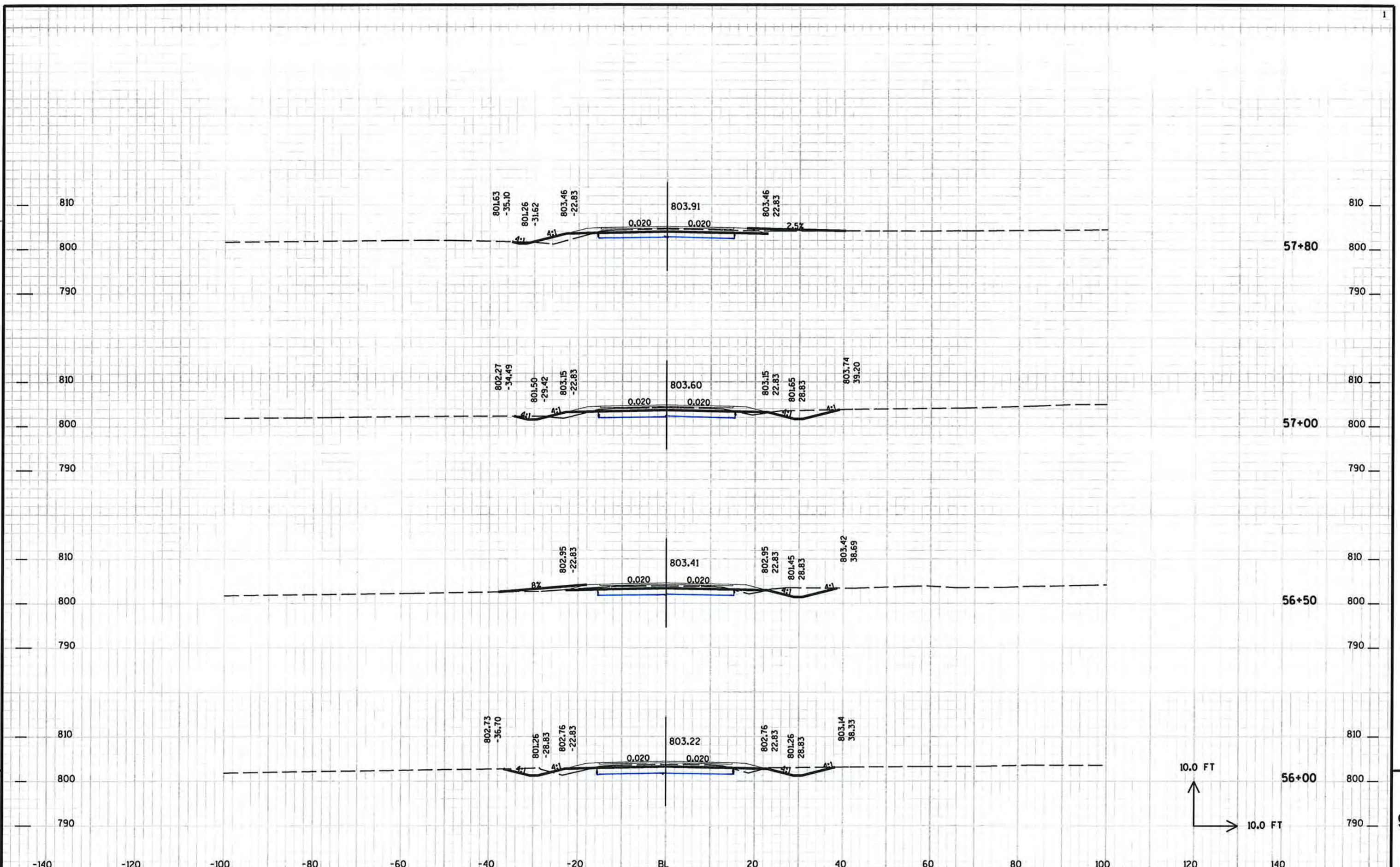
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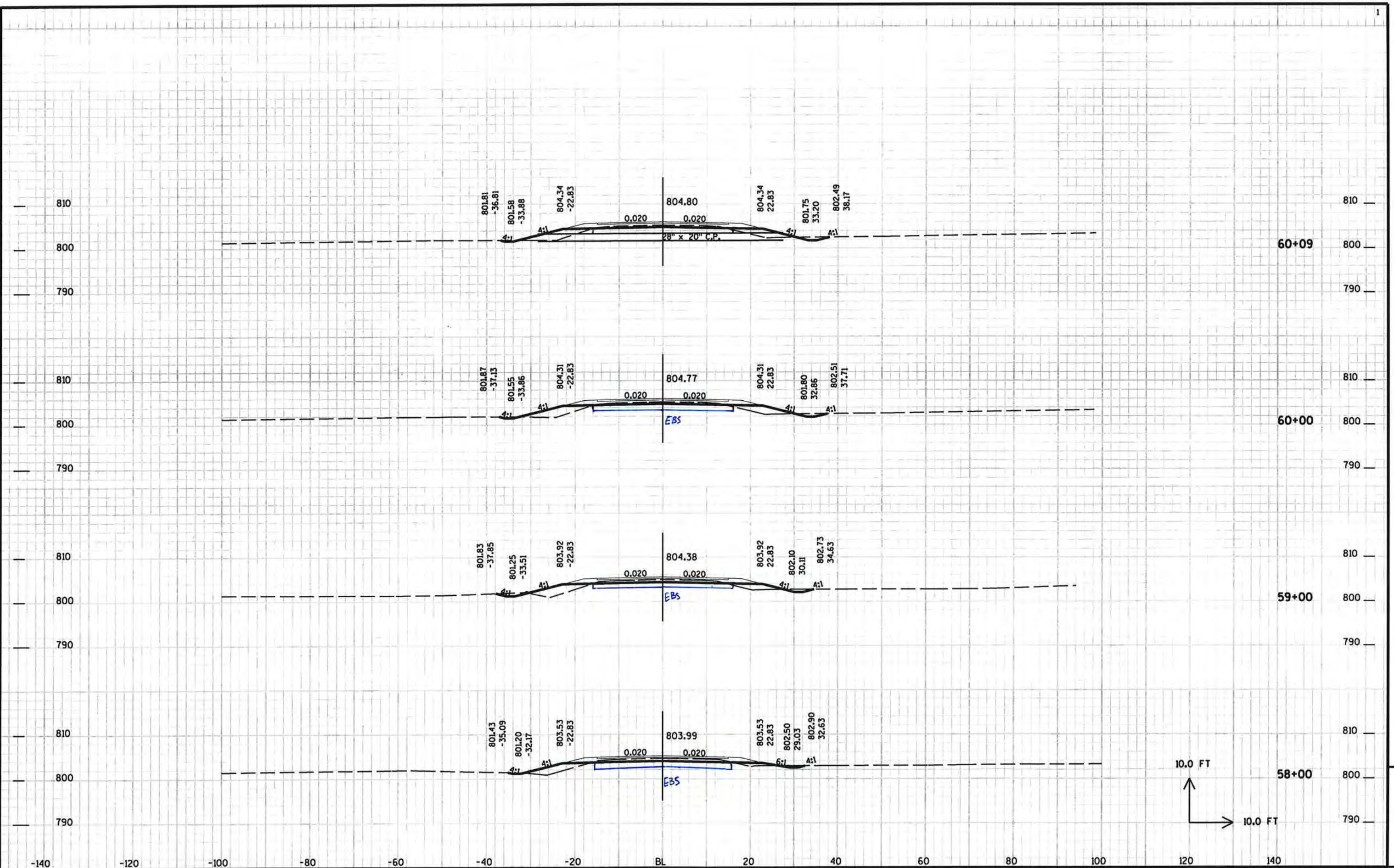
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 181

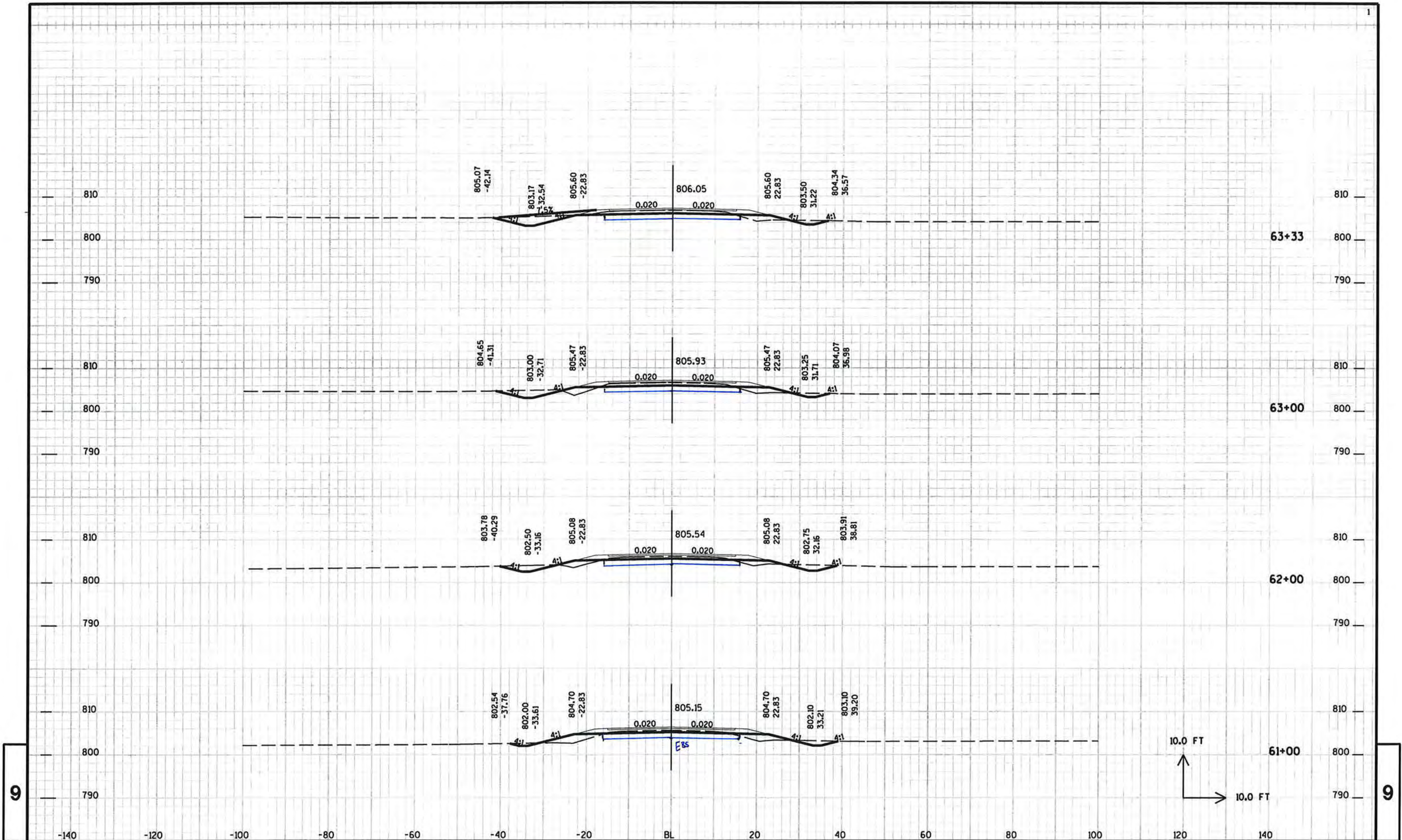


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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 182 E

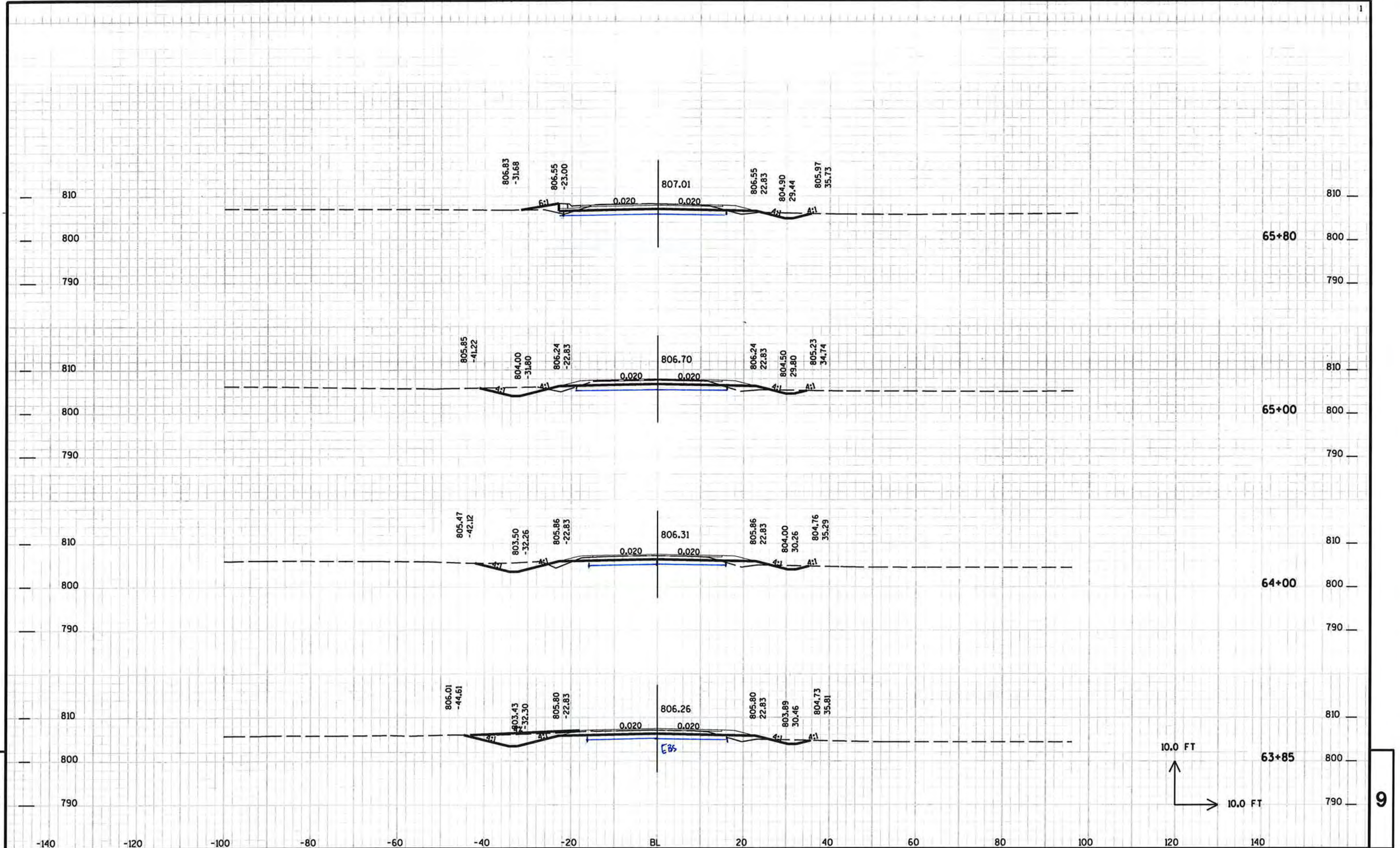




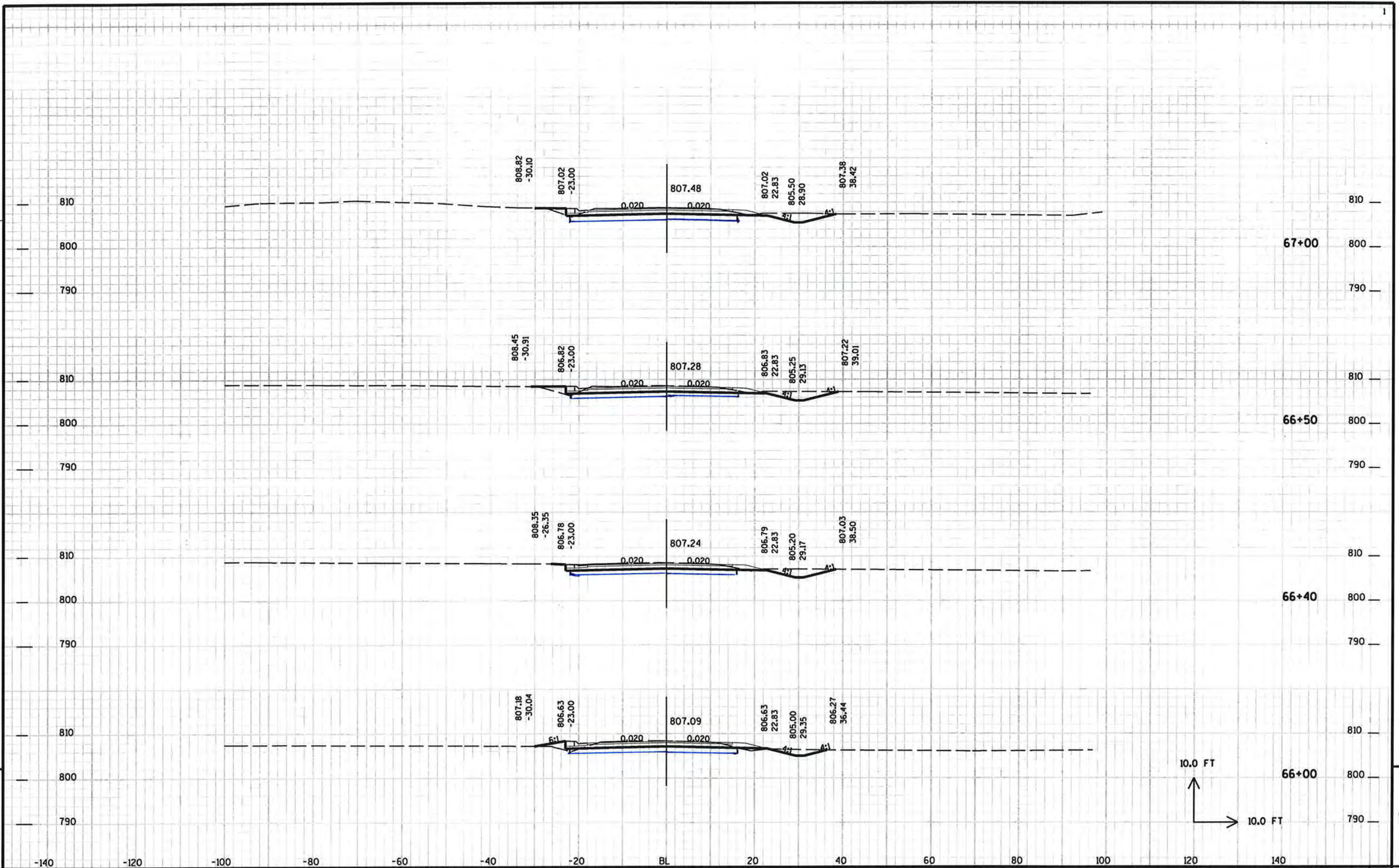
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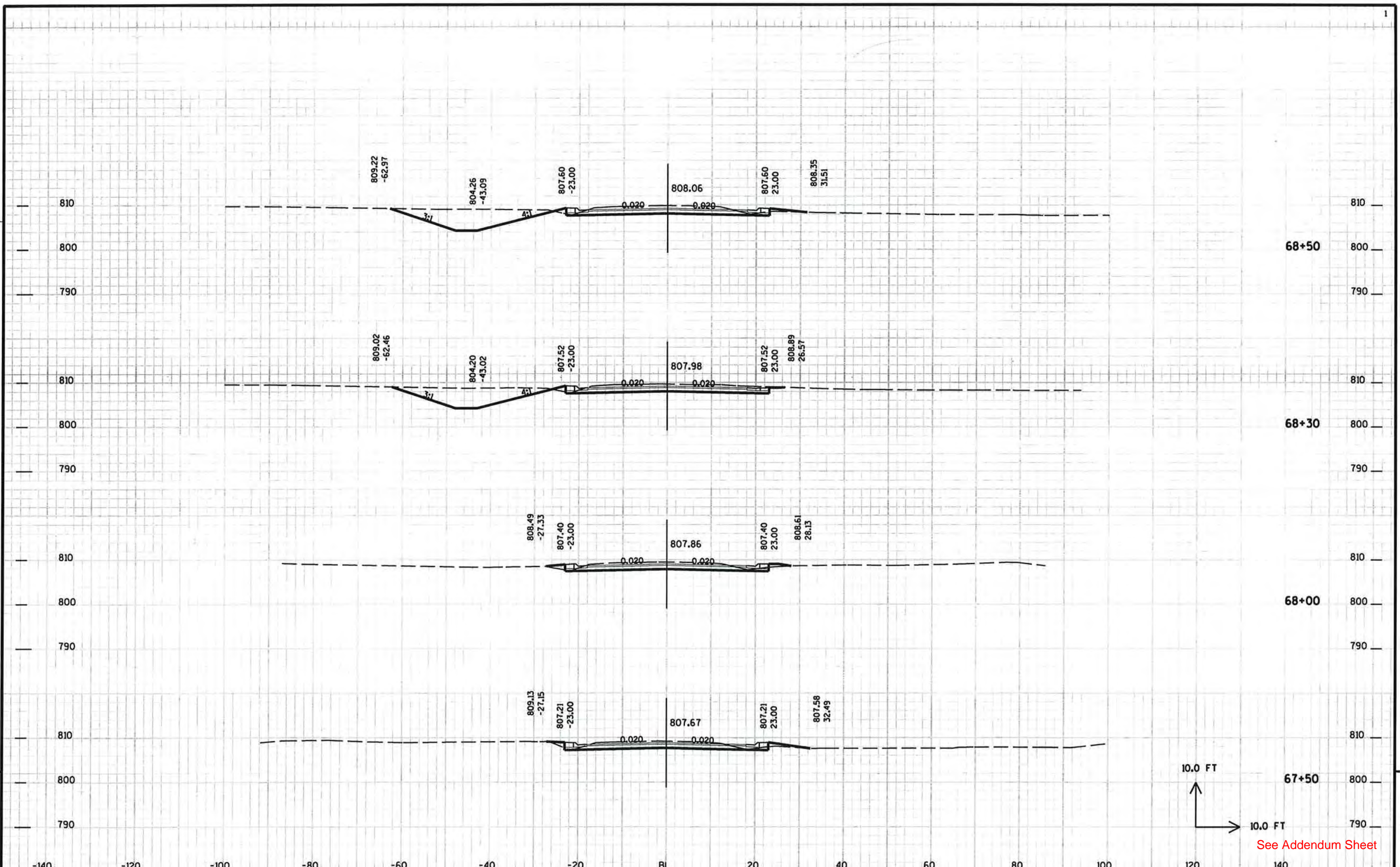
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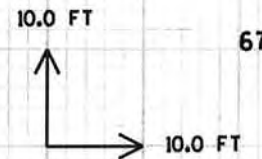


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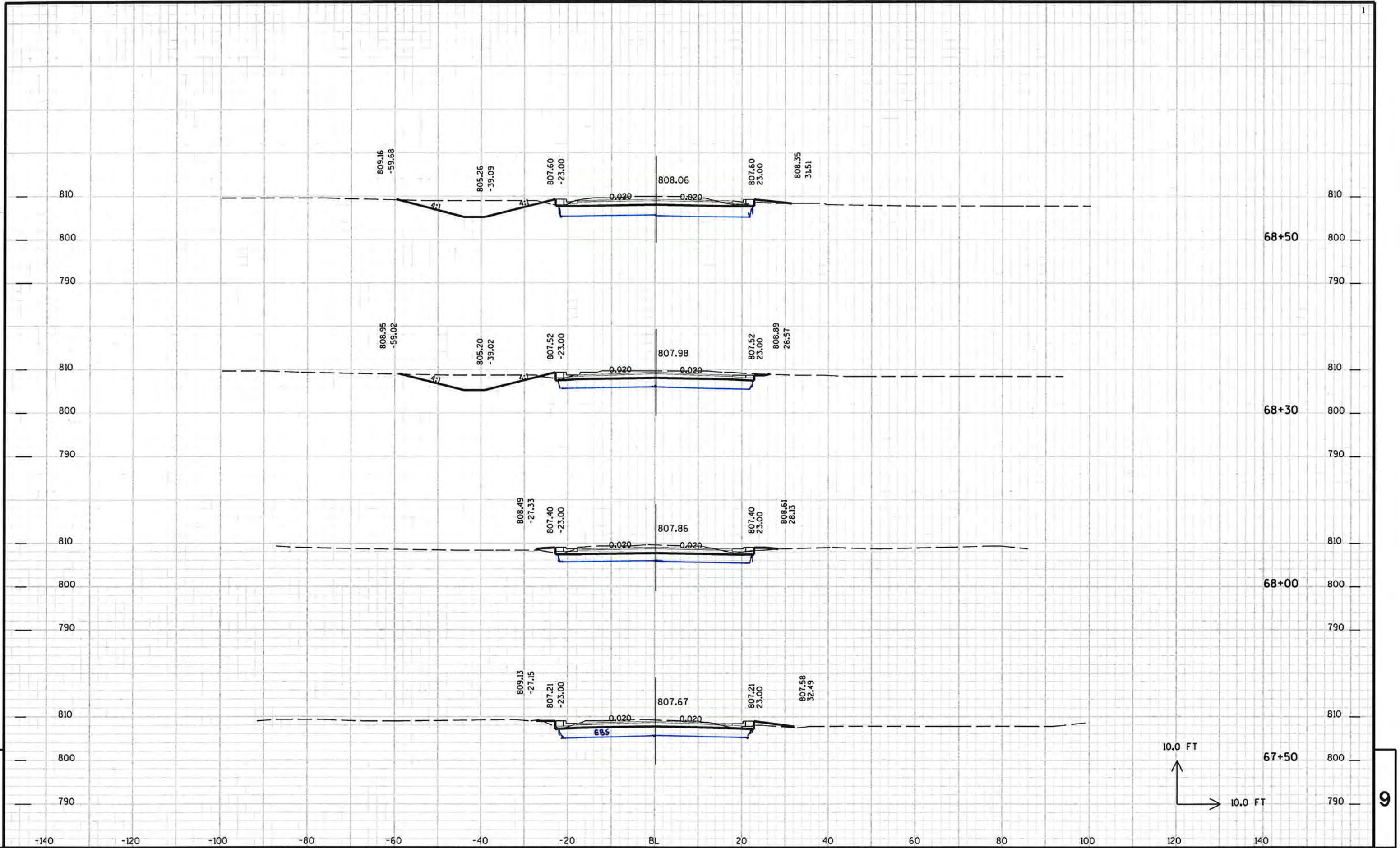


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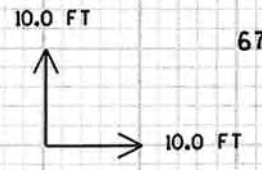


See Addendum Sheet

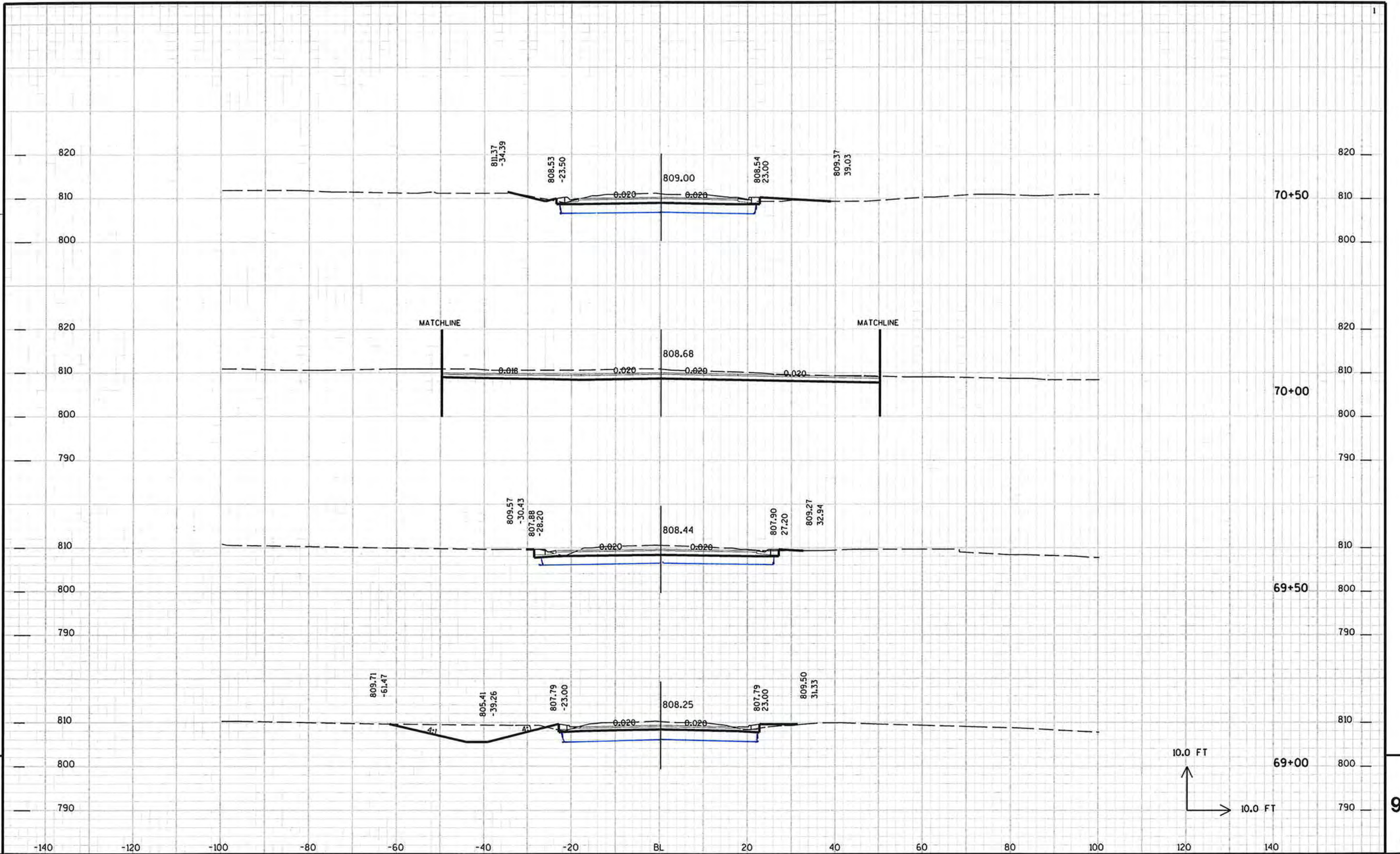


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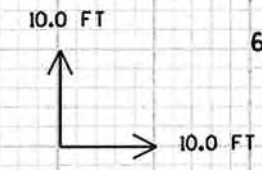


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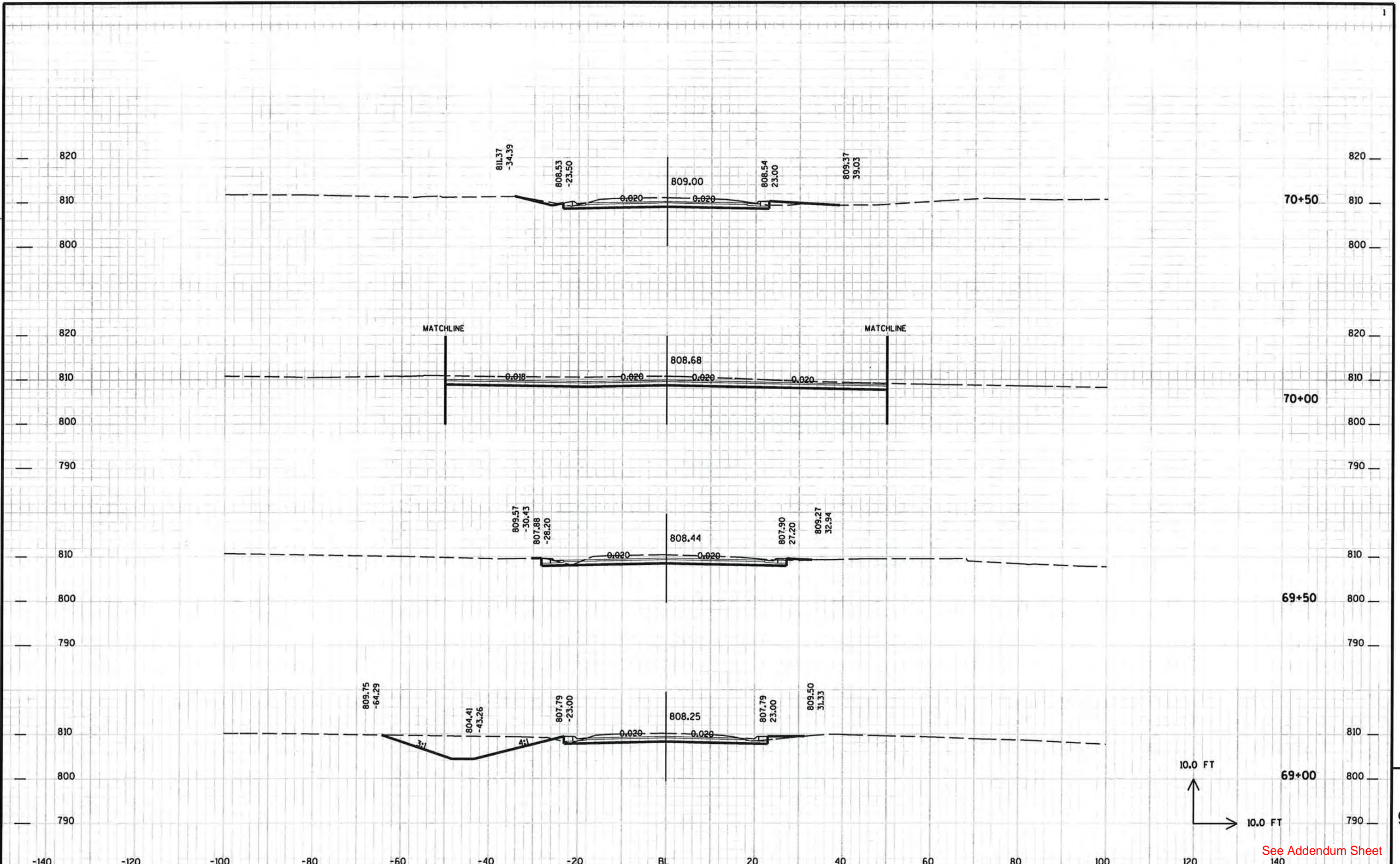


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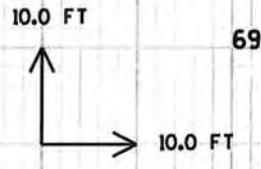
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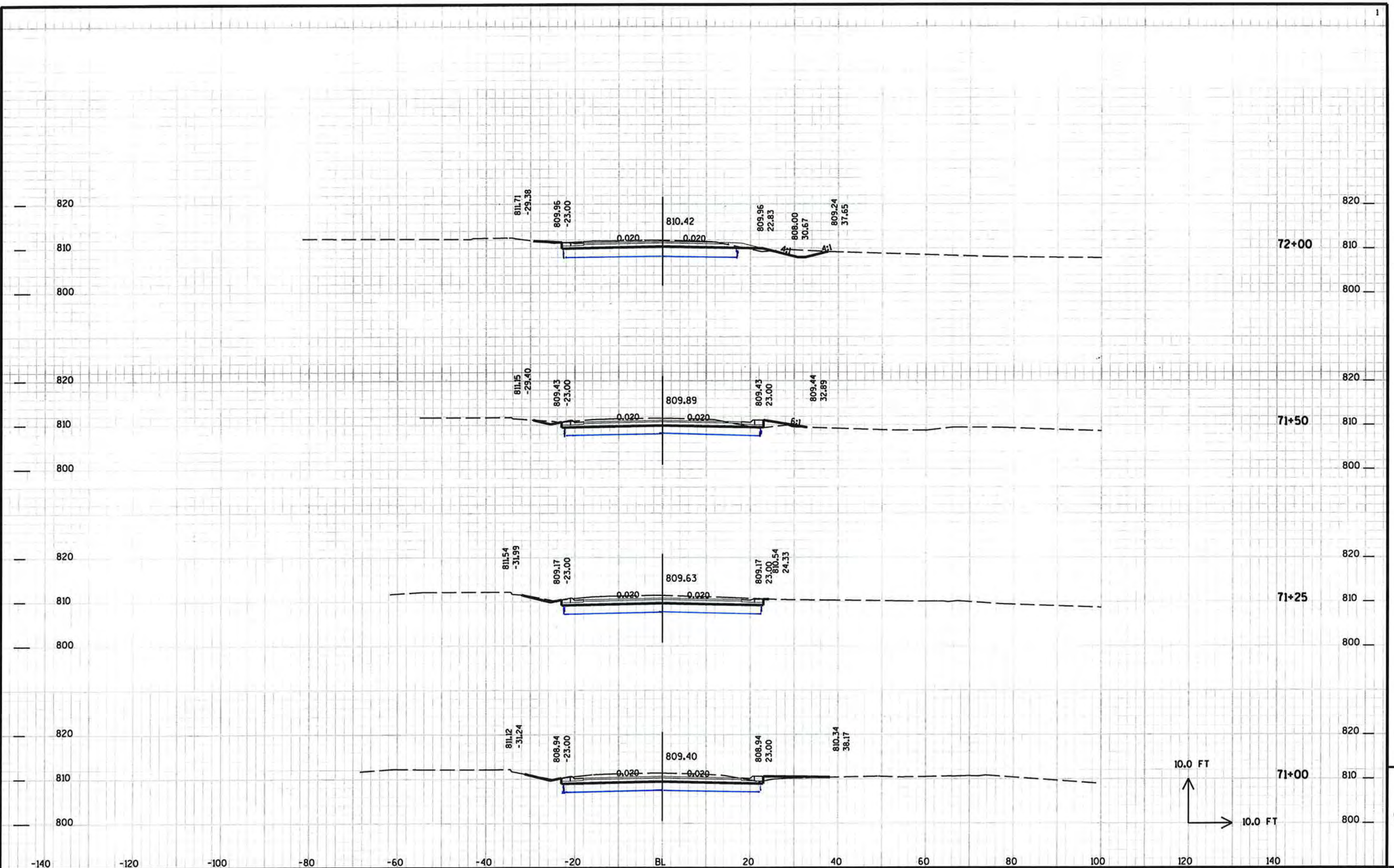
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PROJECT NO: \_\_\_\_\_ HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 187 E

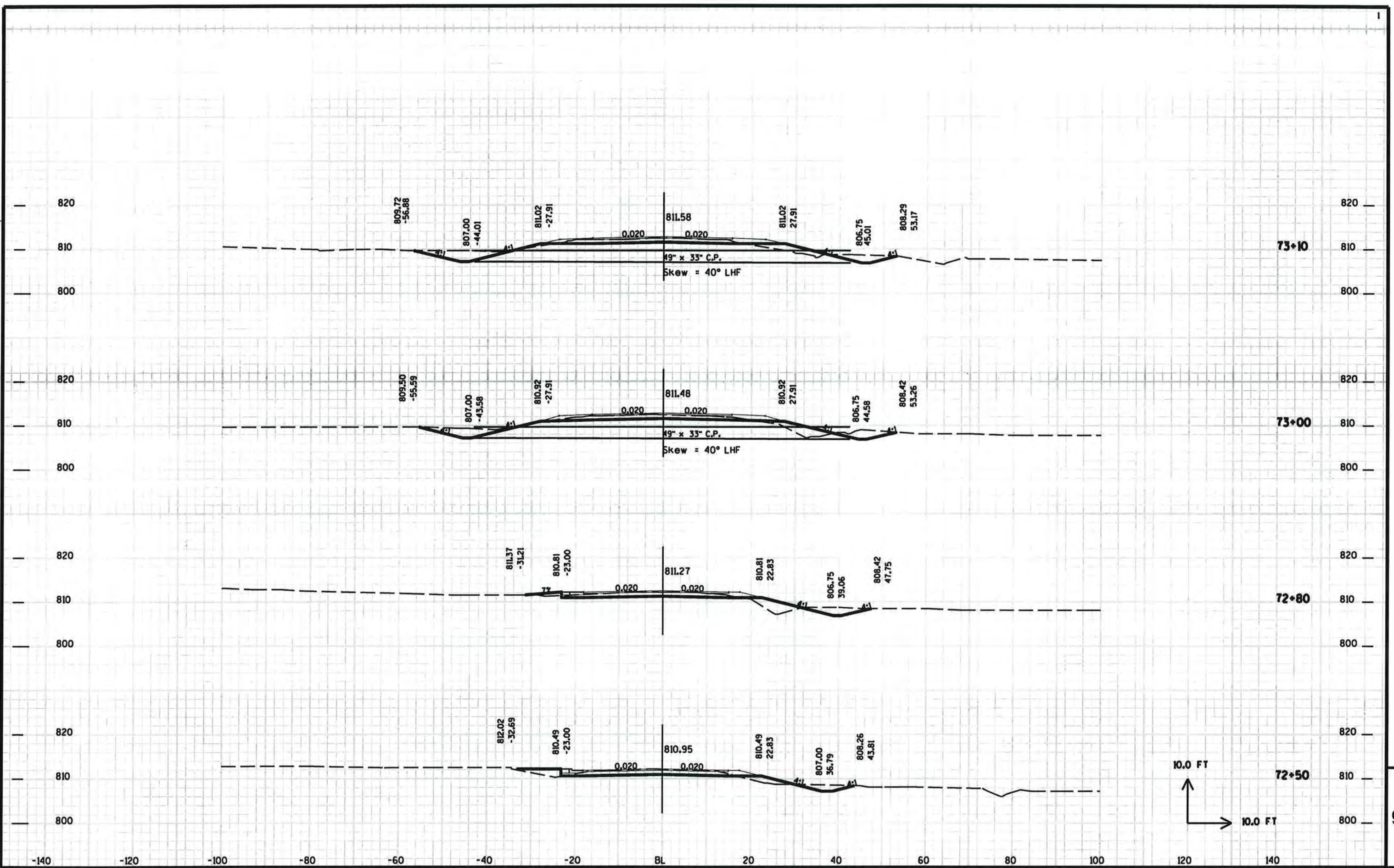


See Addendum Sheet

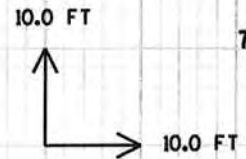
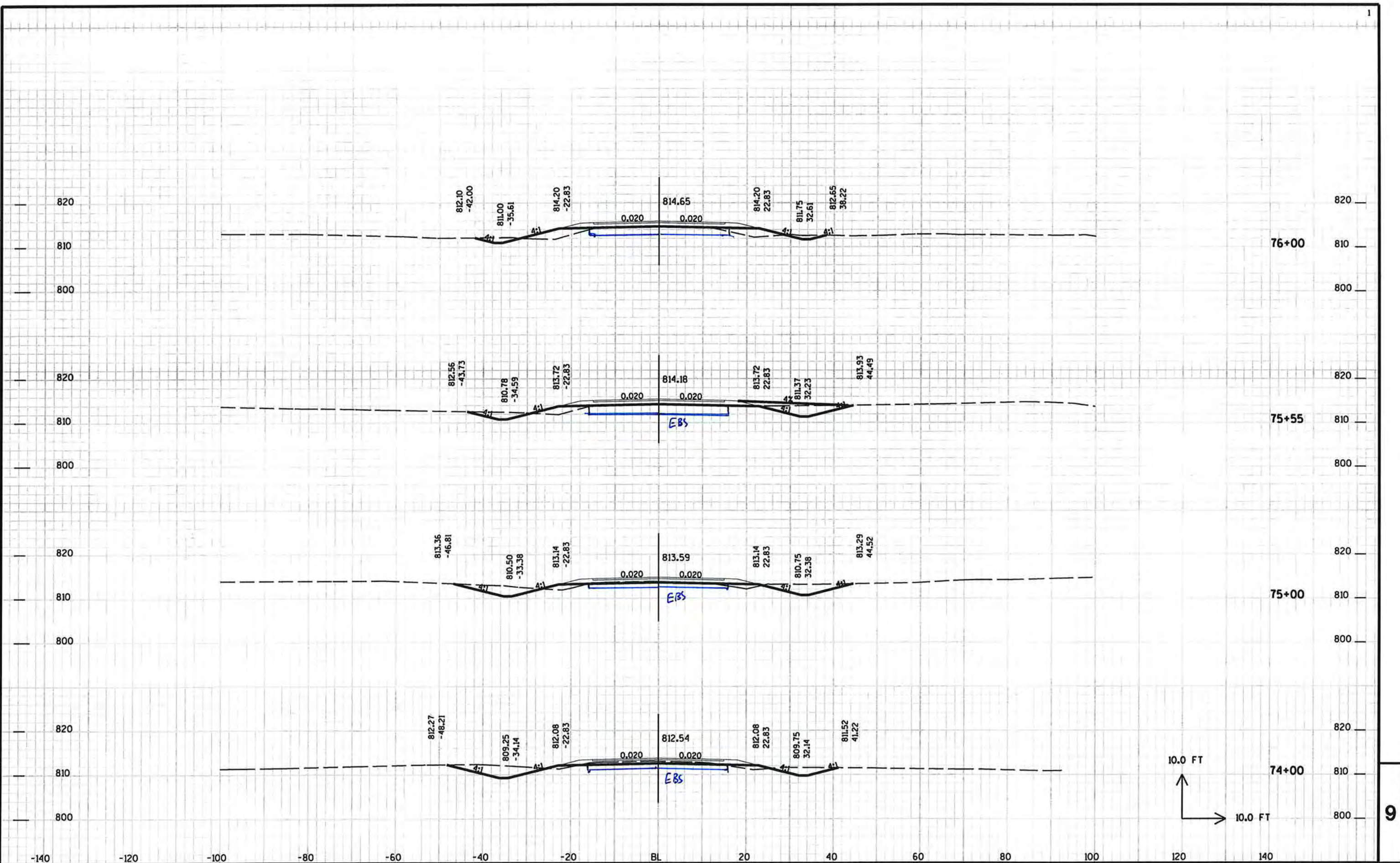


PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 188





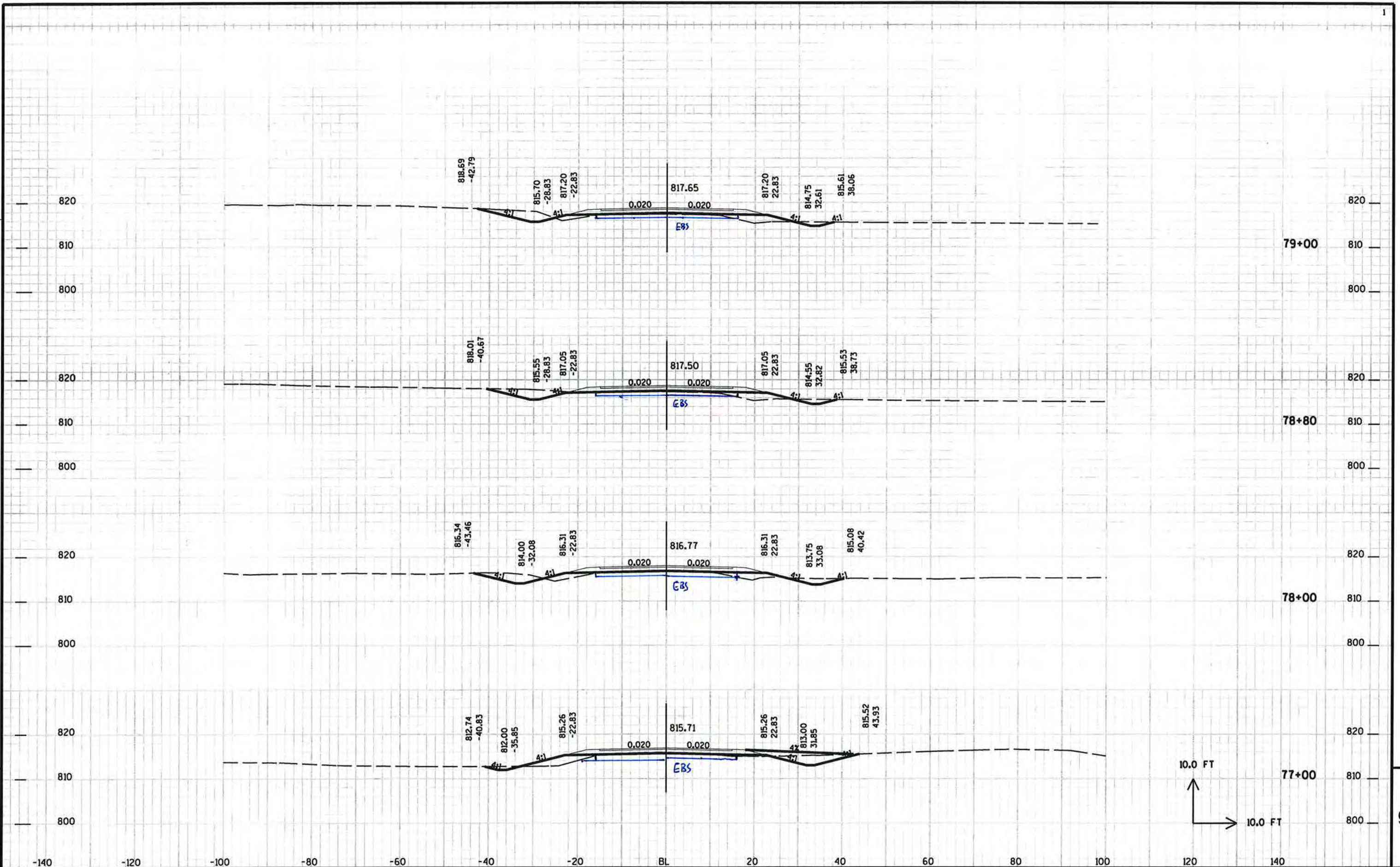
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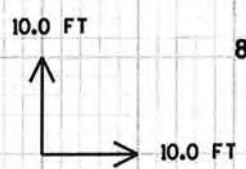
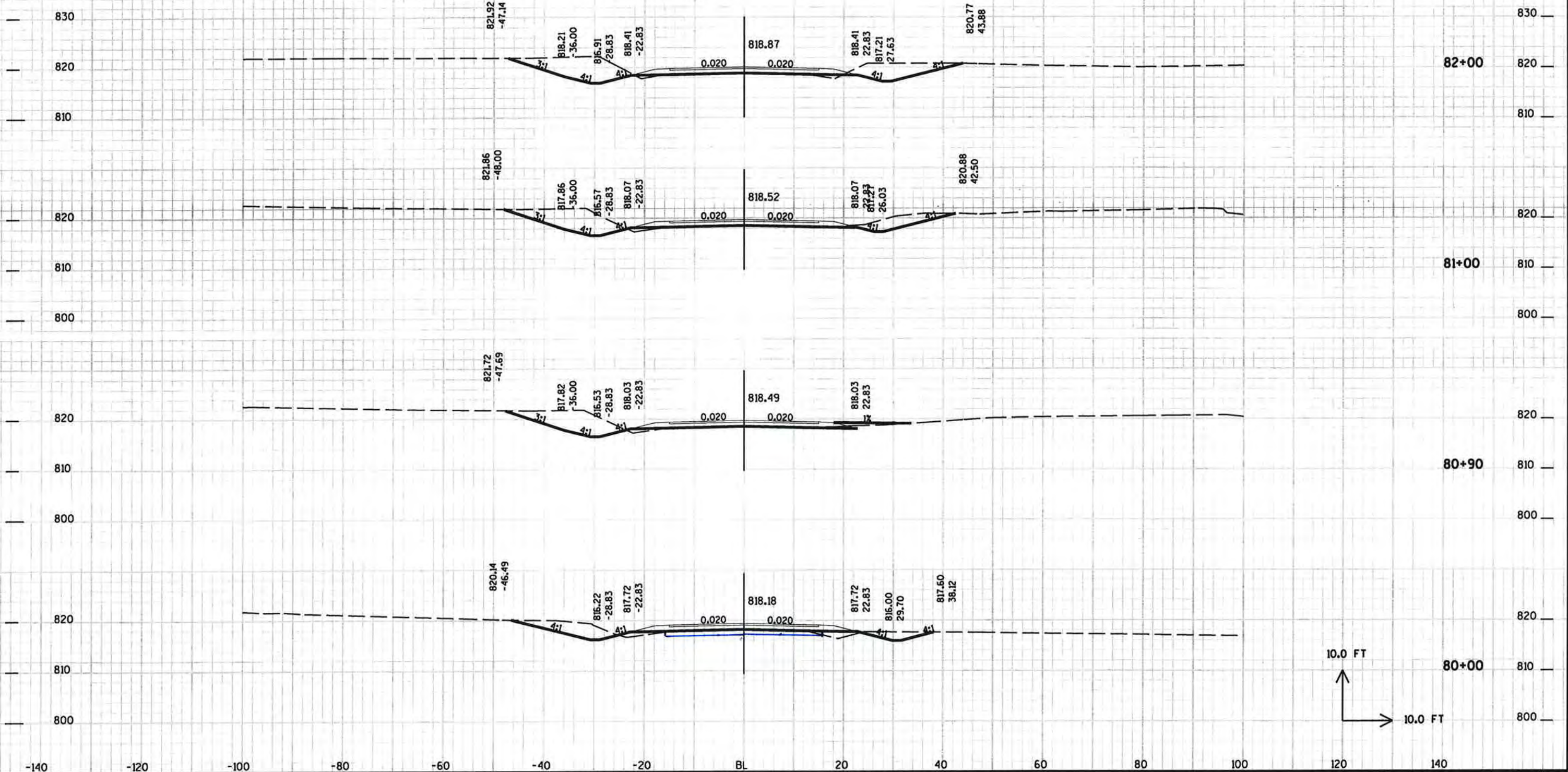


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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 190

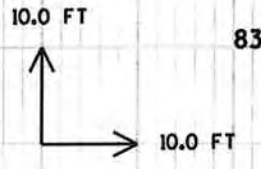
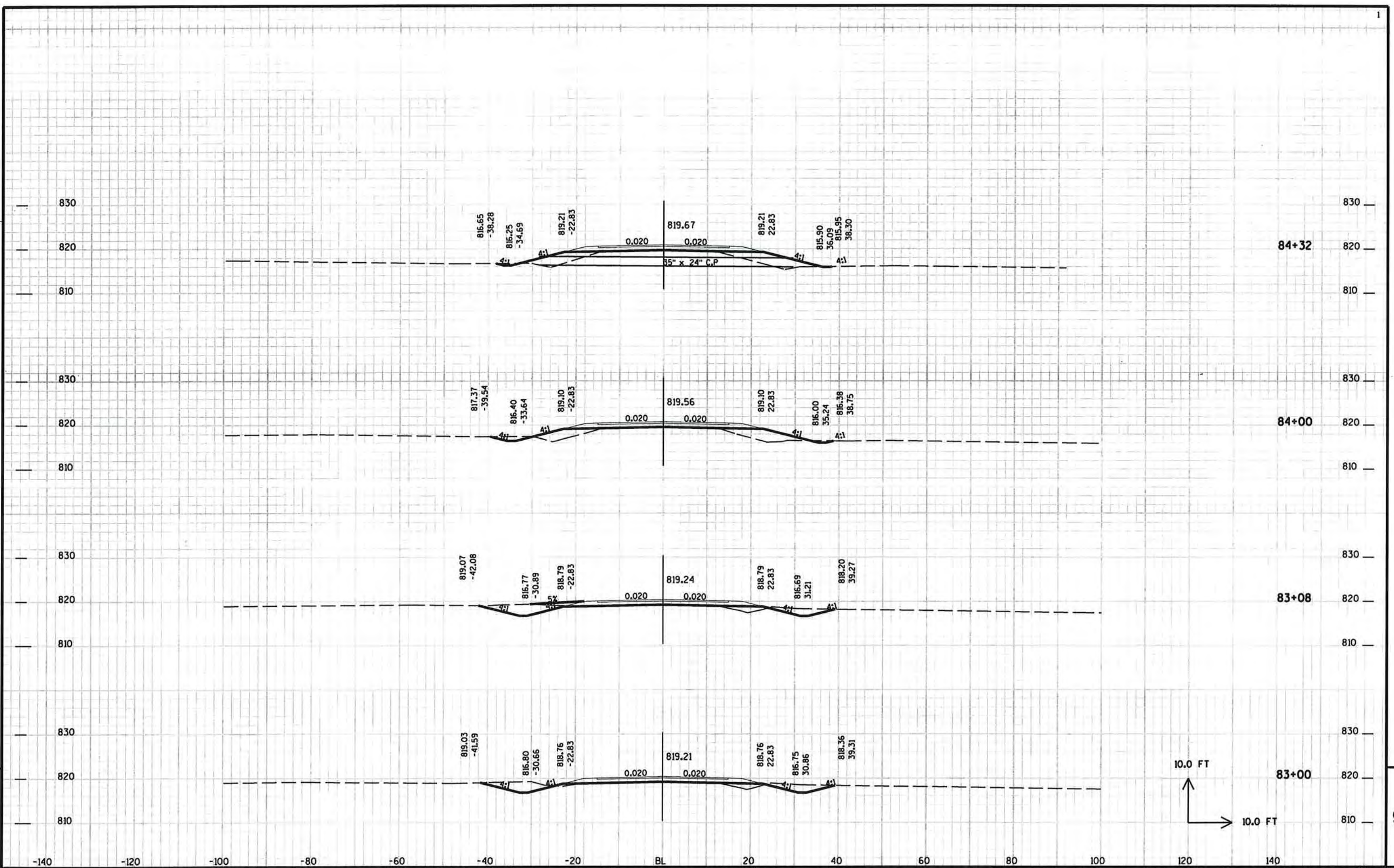




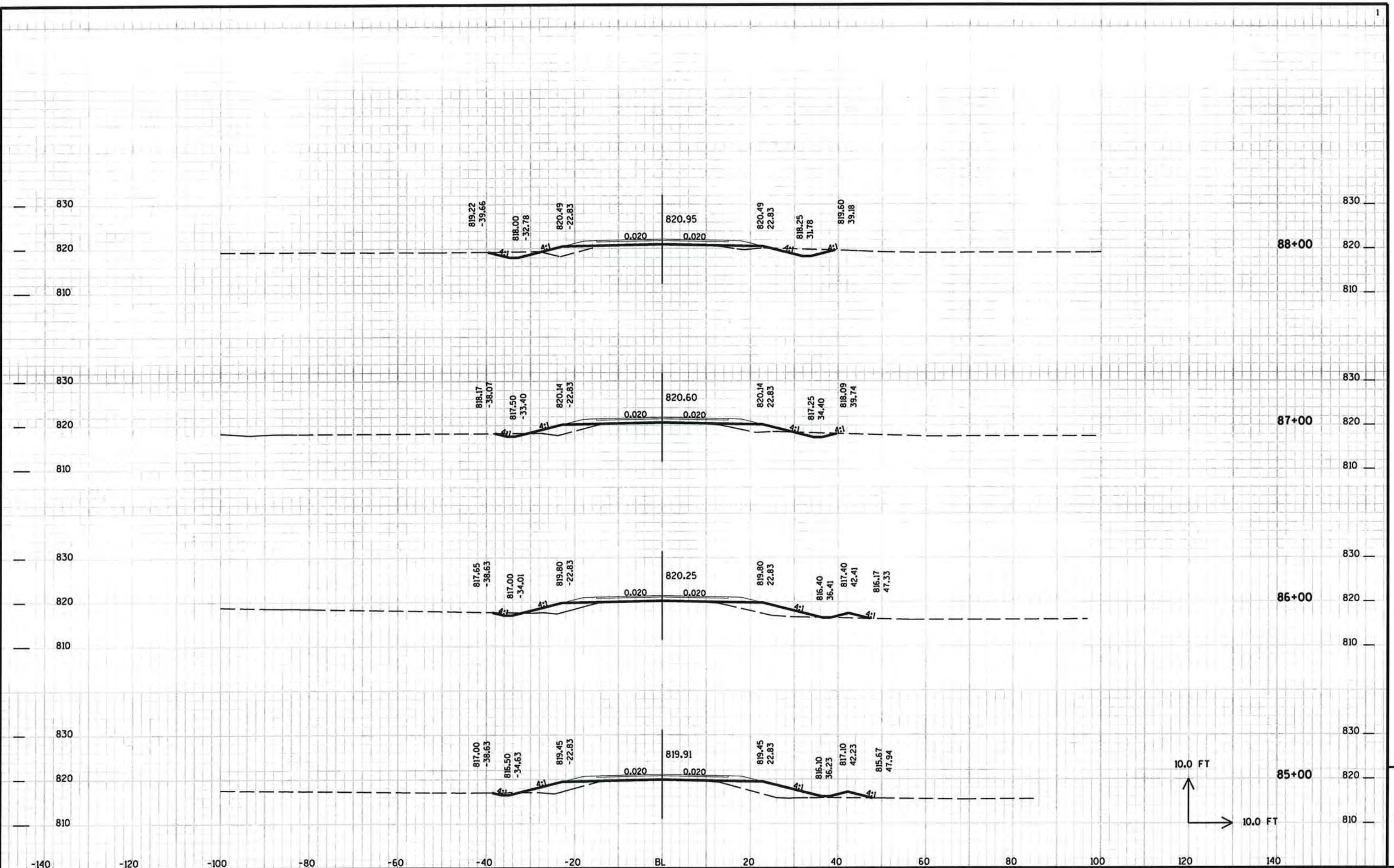
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 192 E



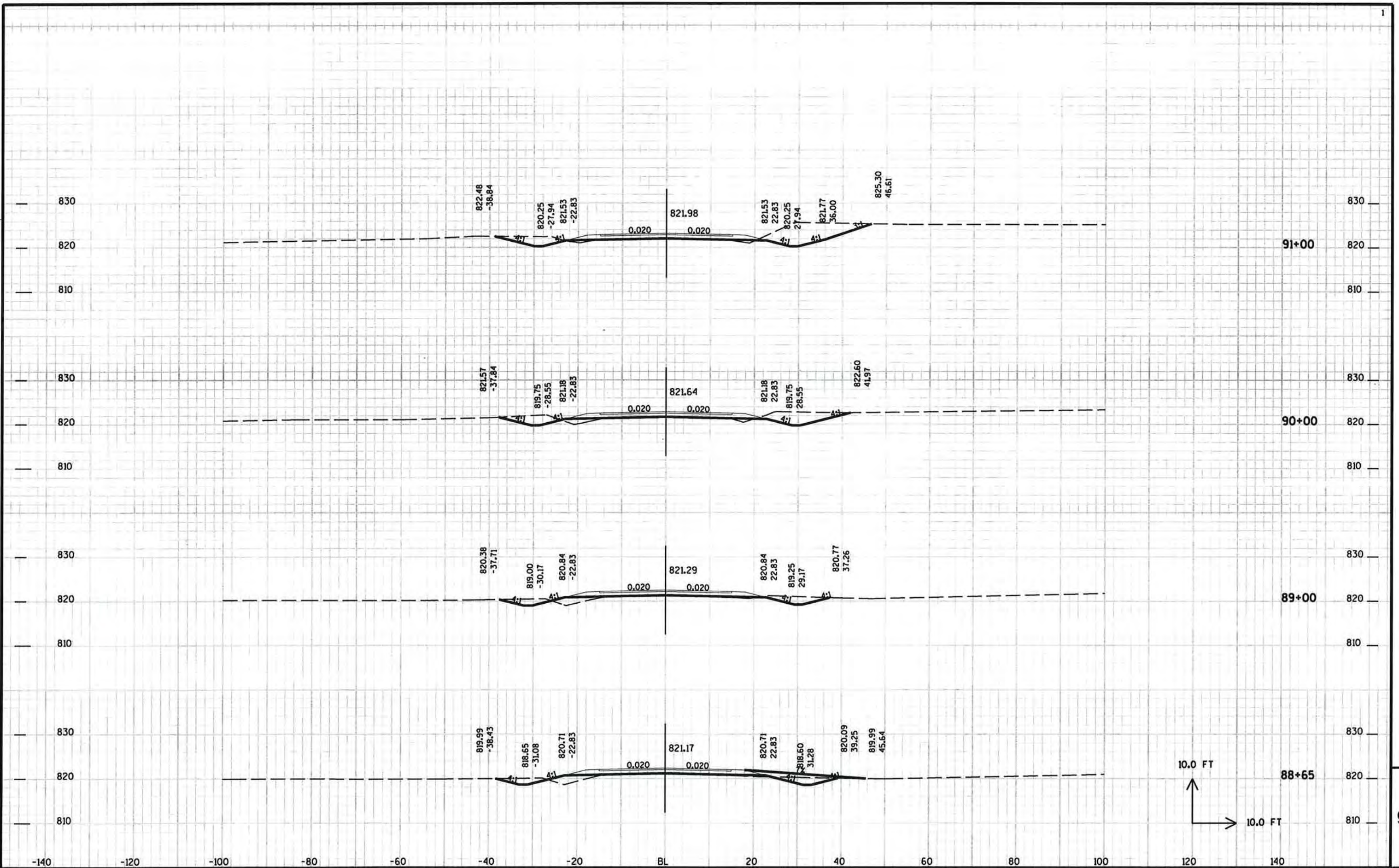
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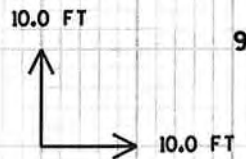
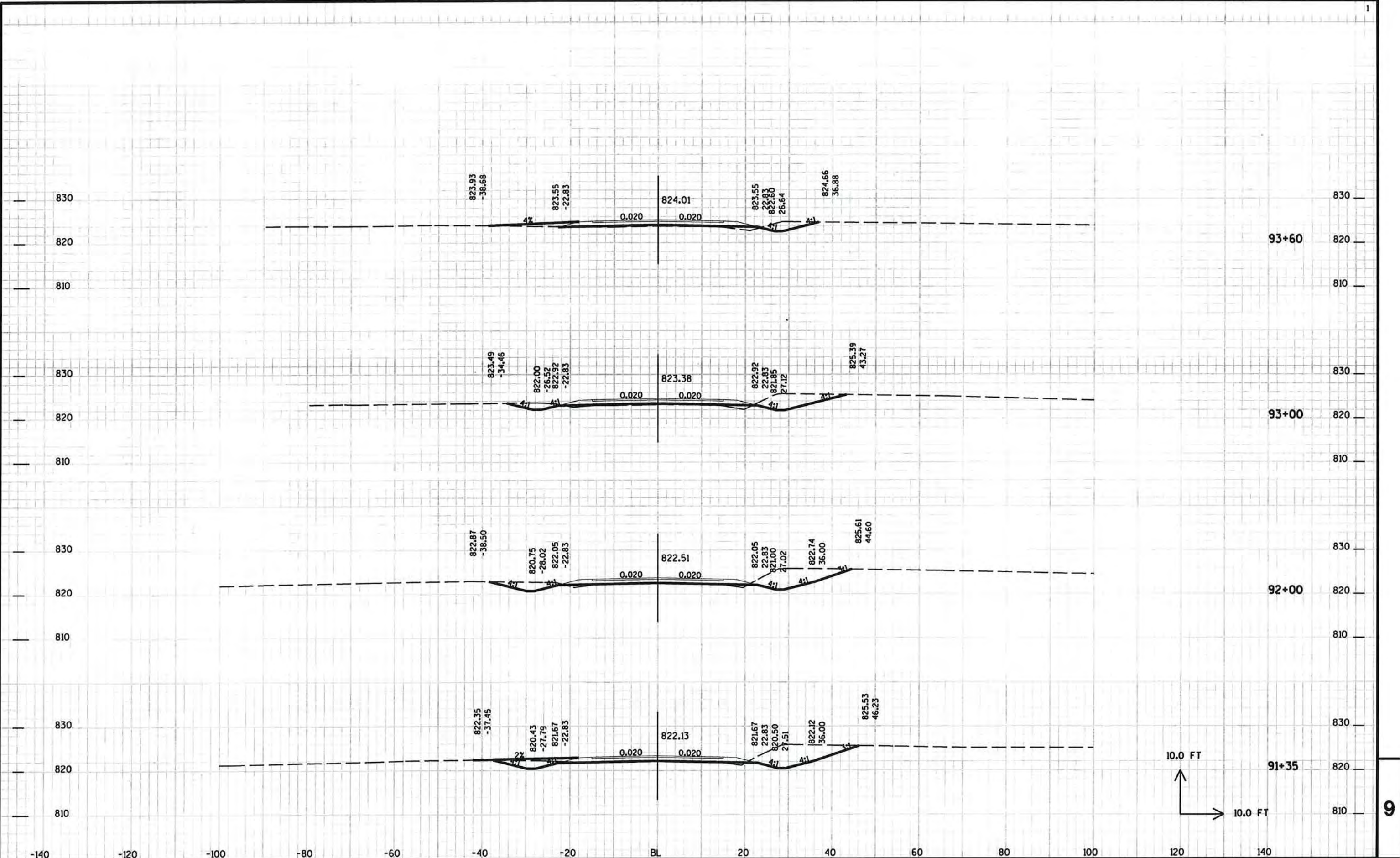
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 194



PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 195

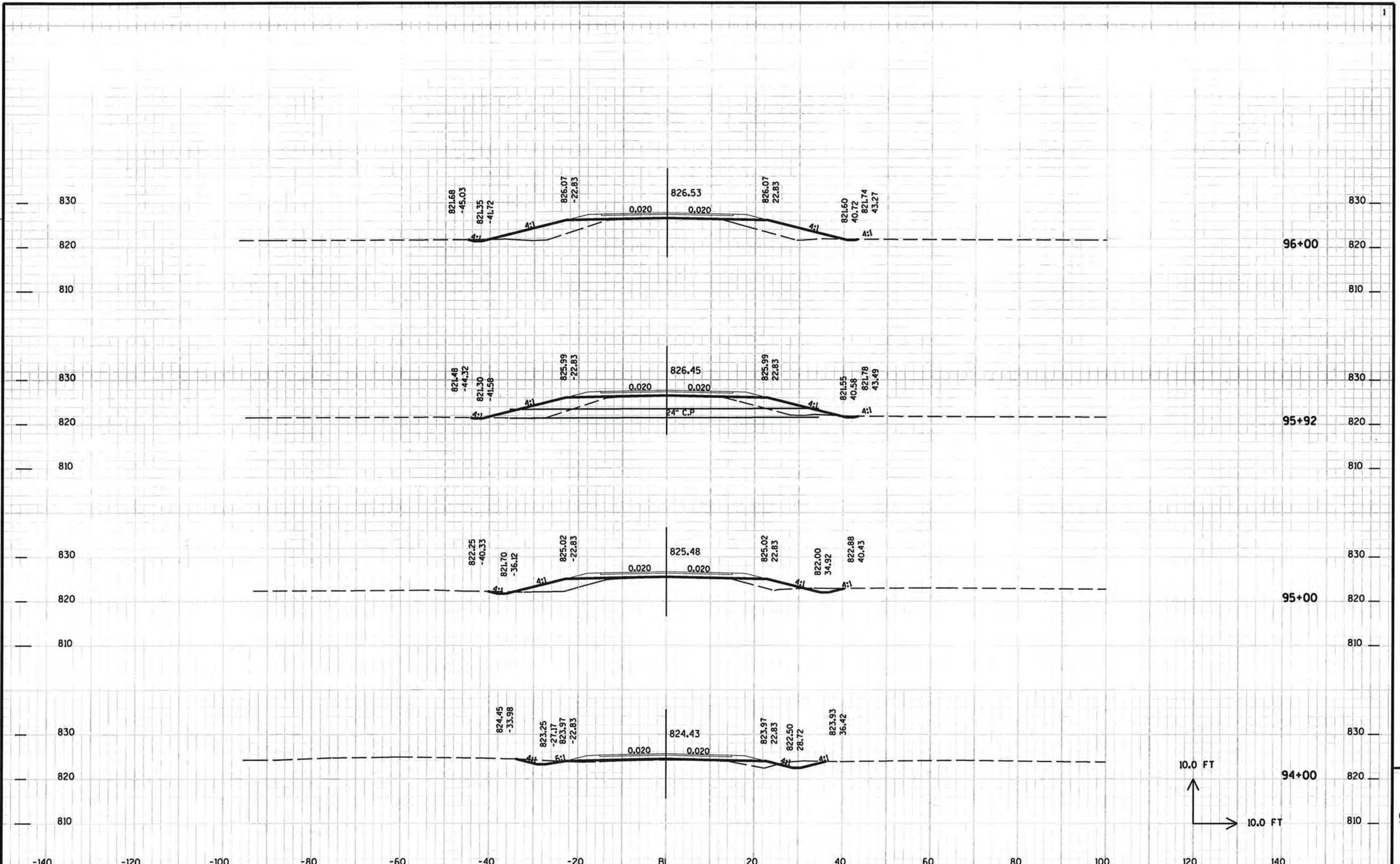


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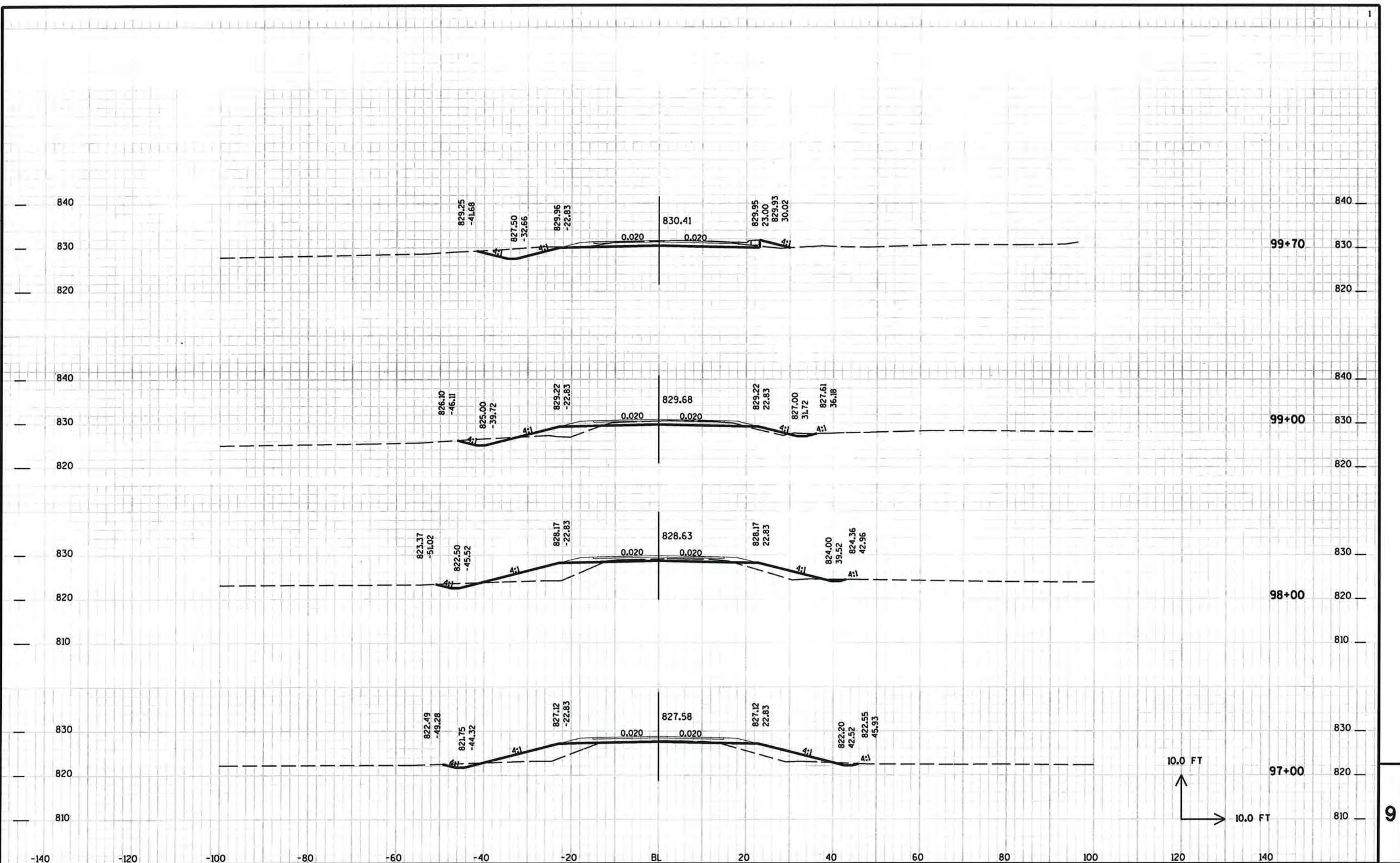
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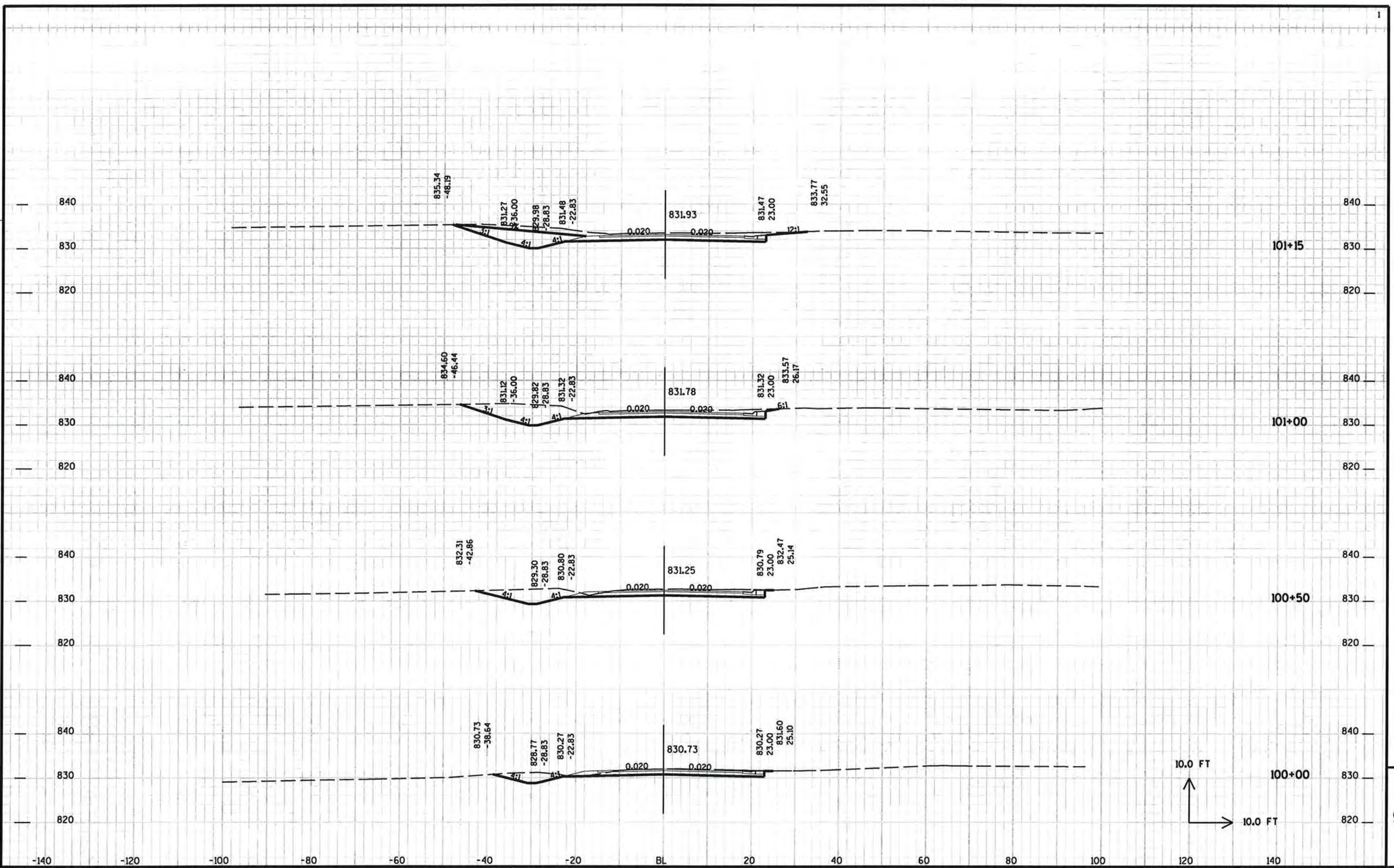
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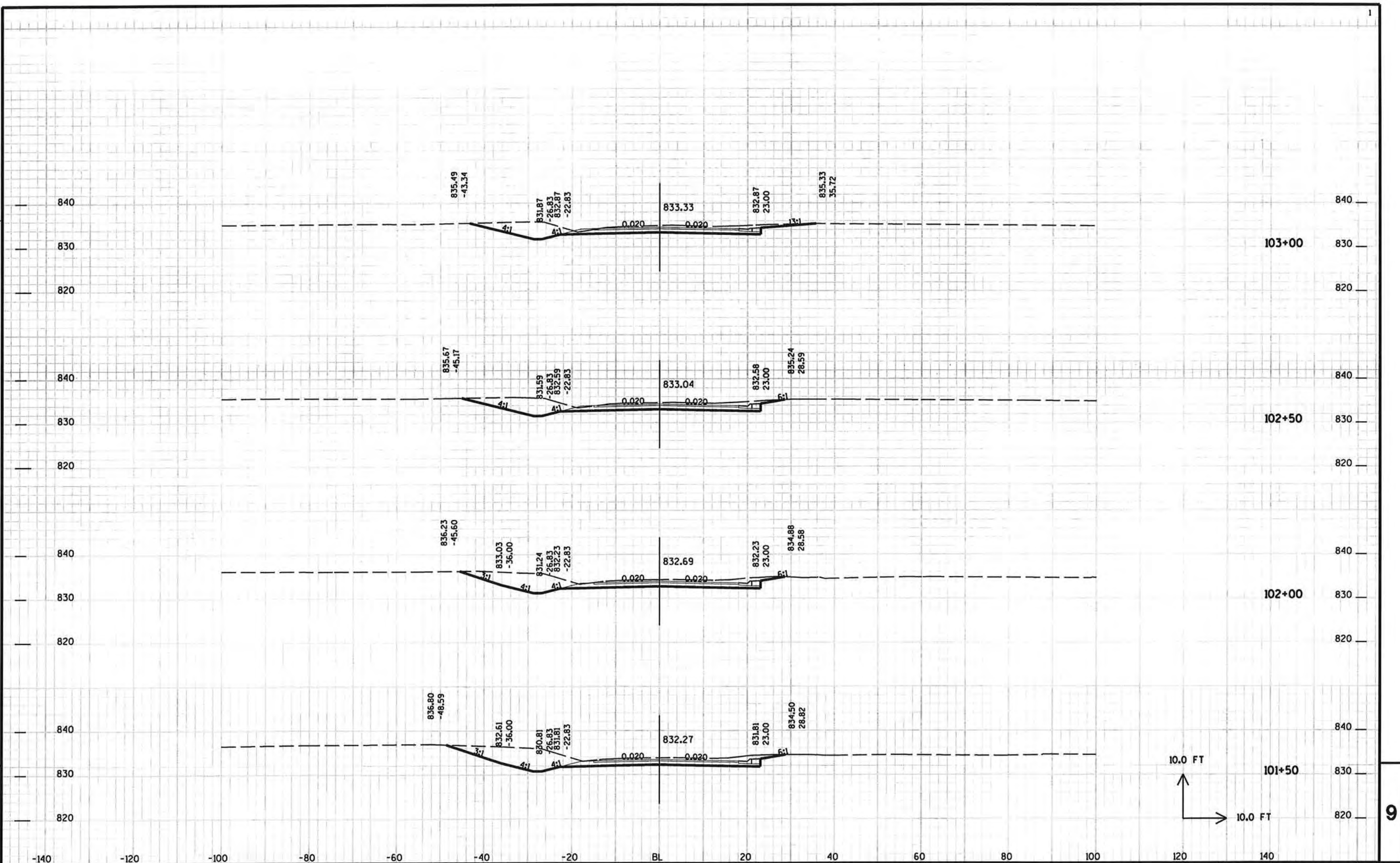
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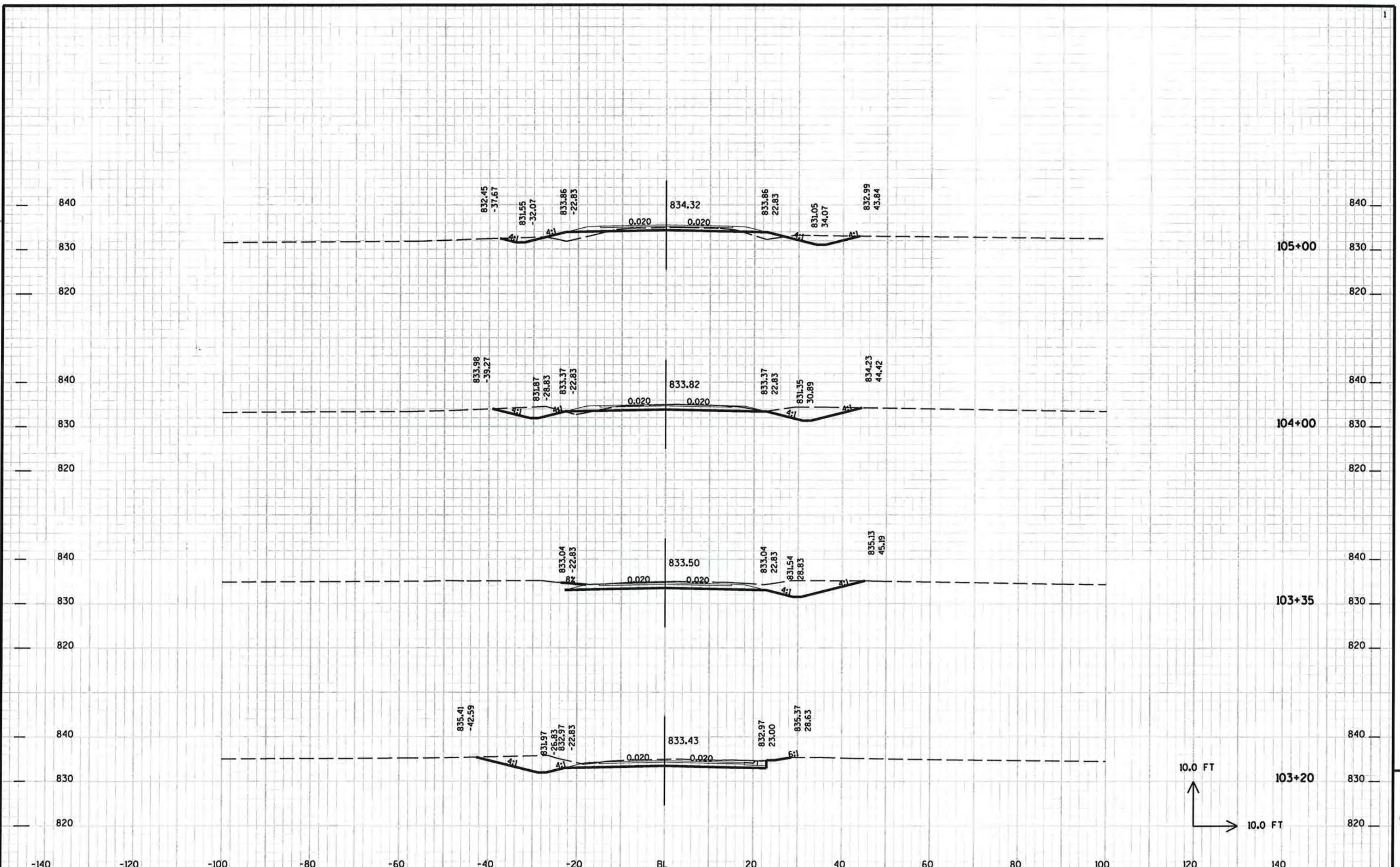
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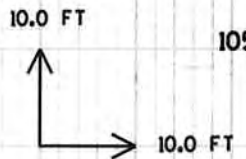
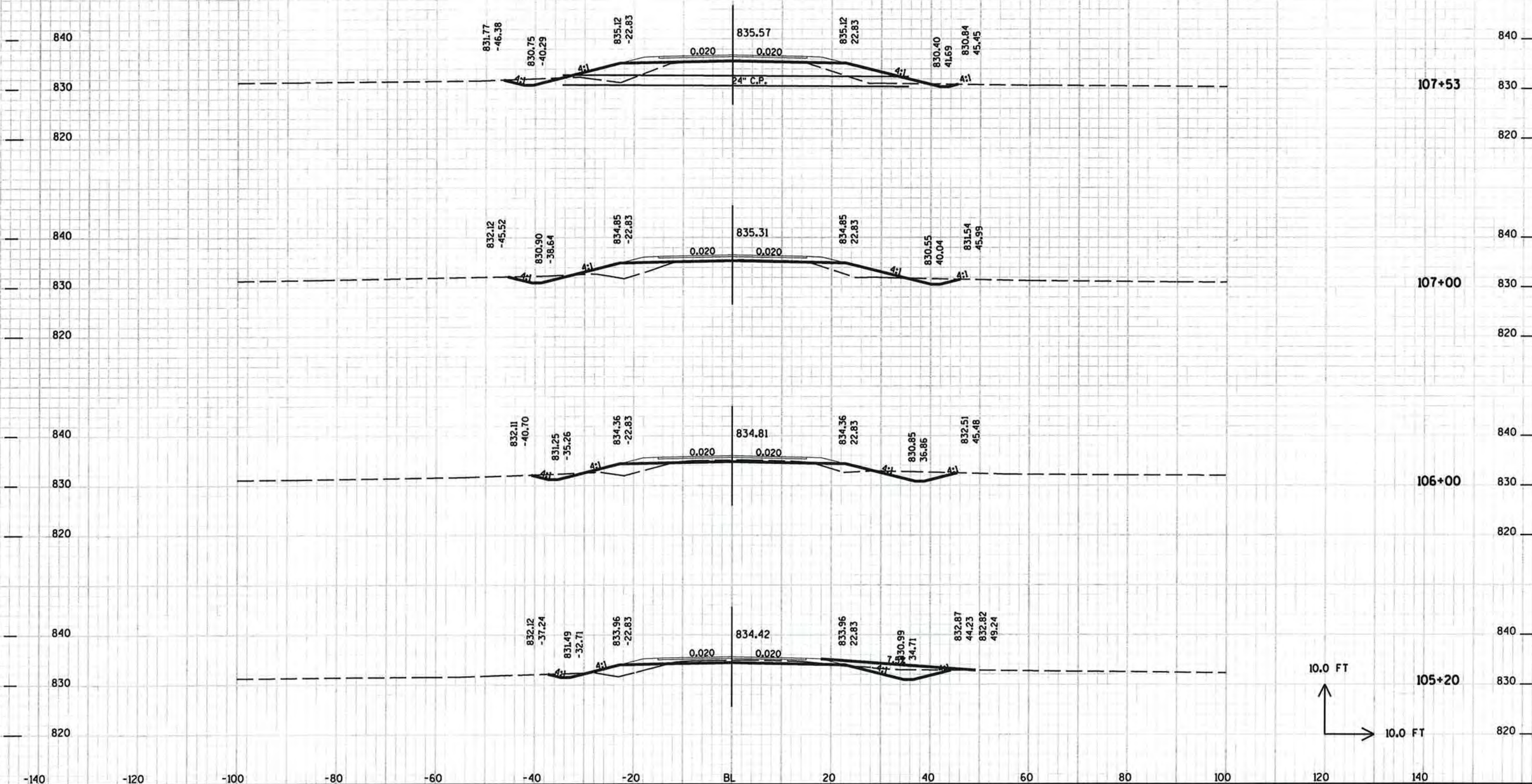
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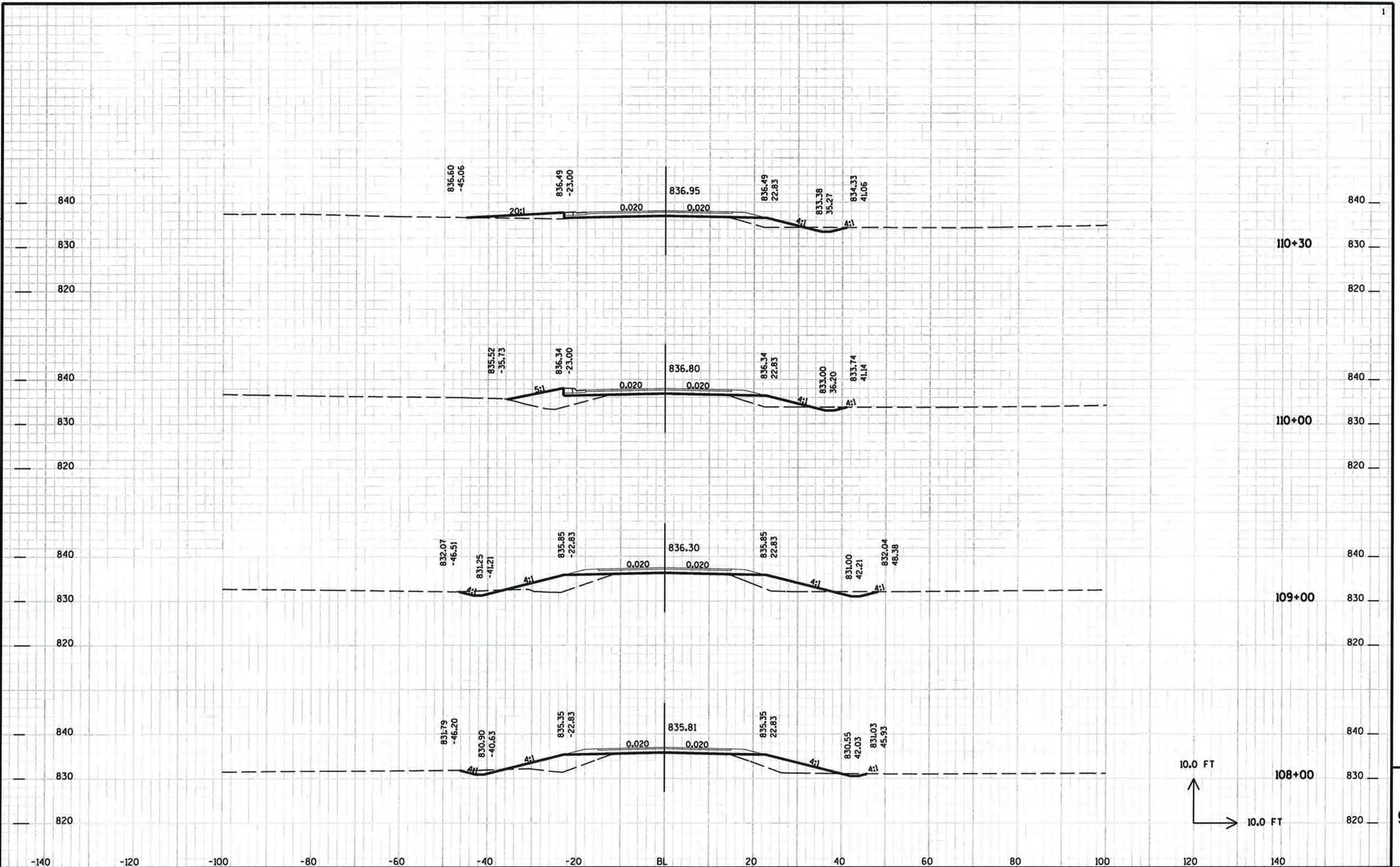
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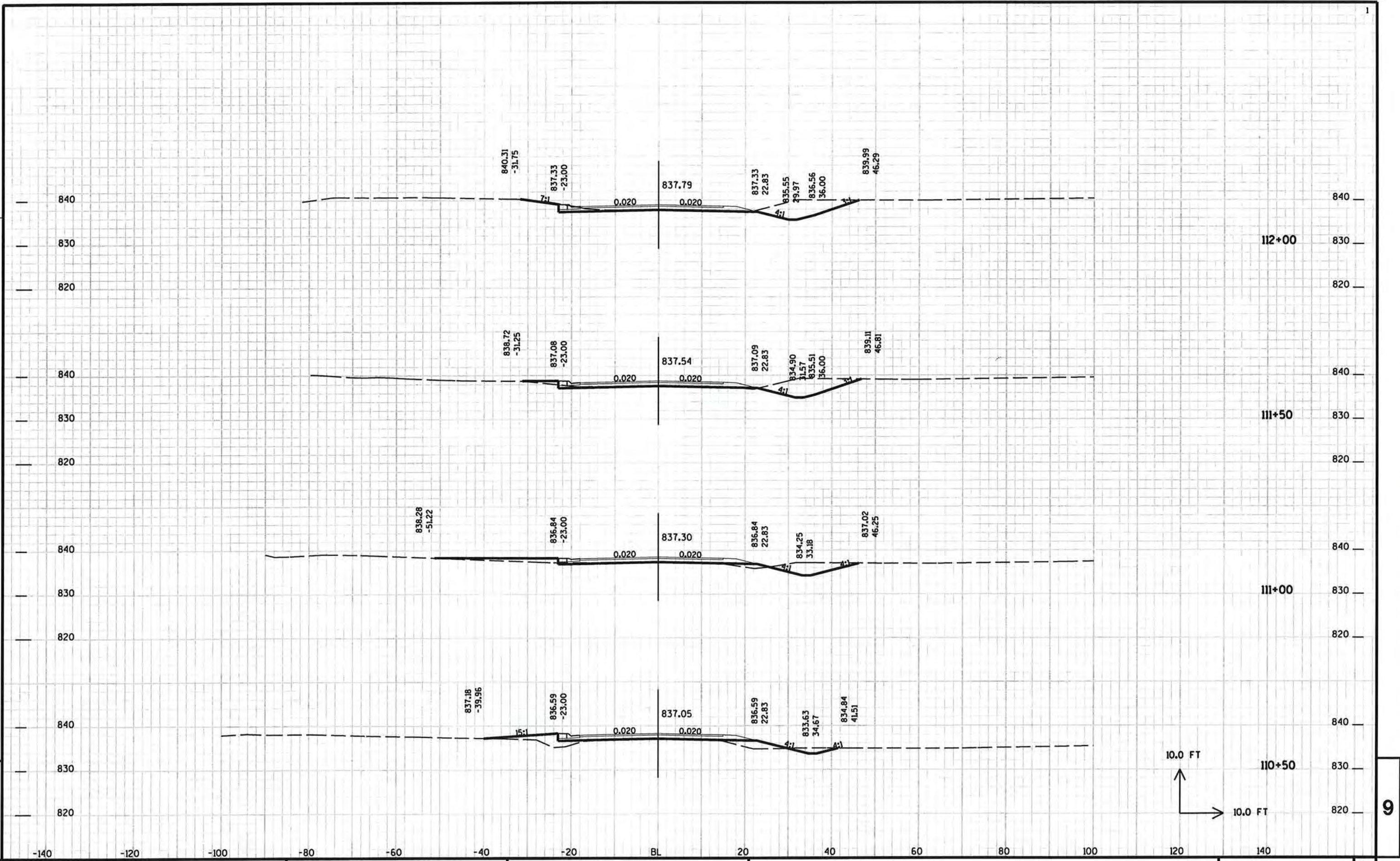
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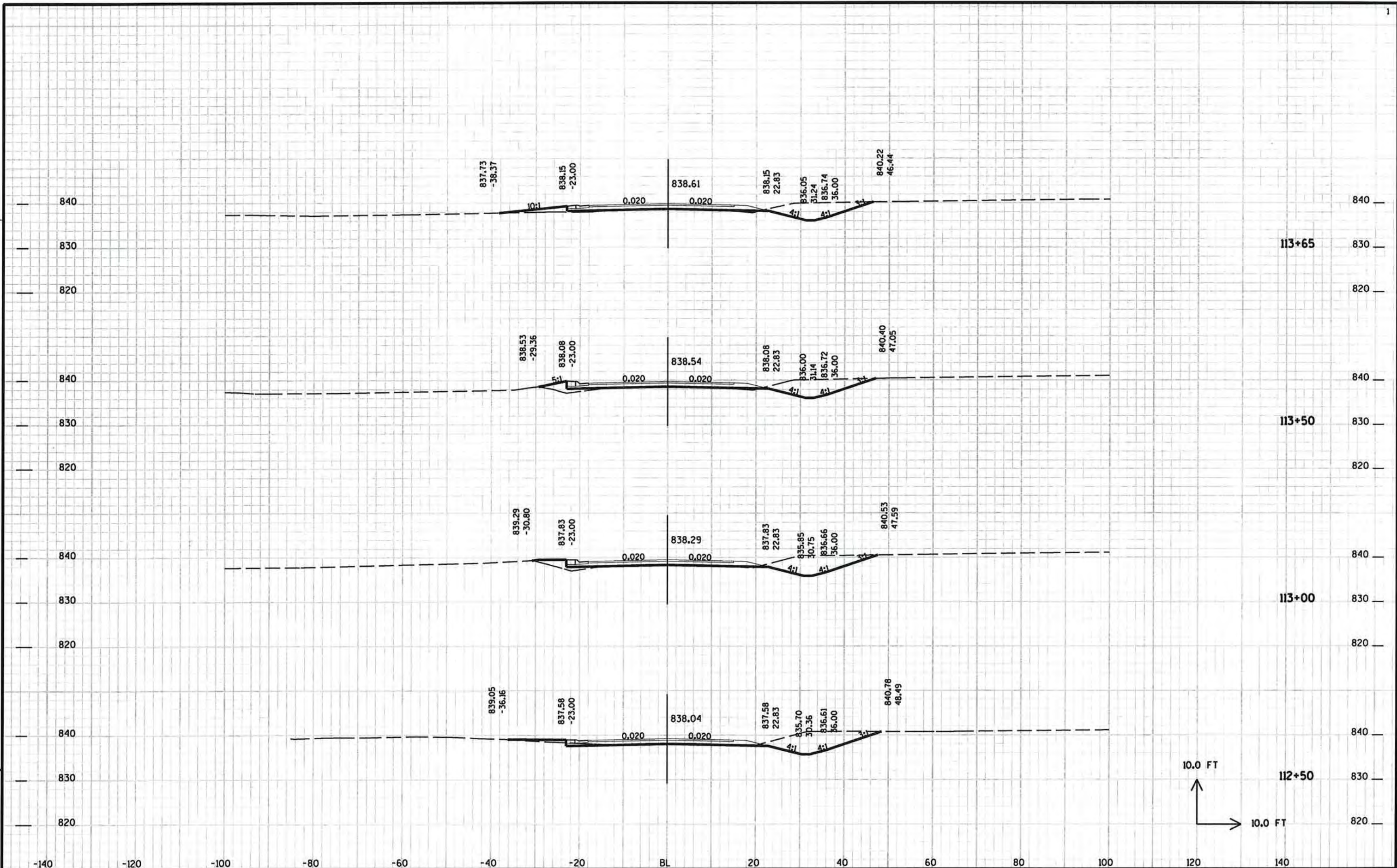


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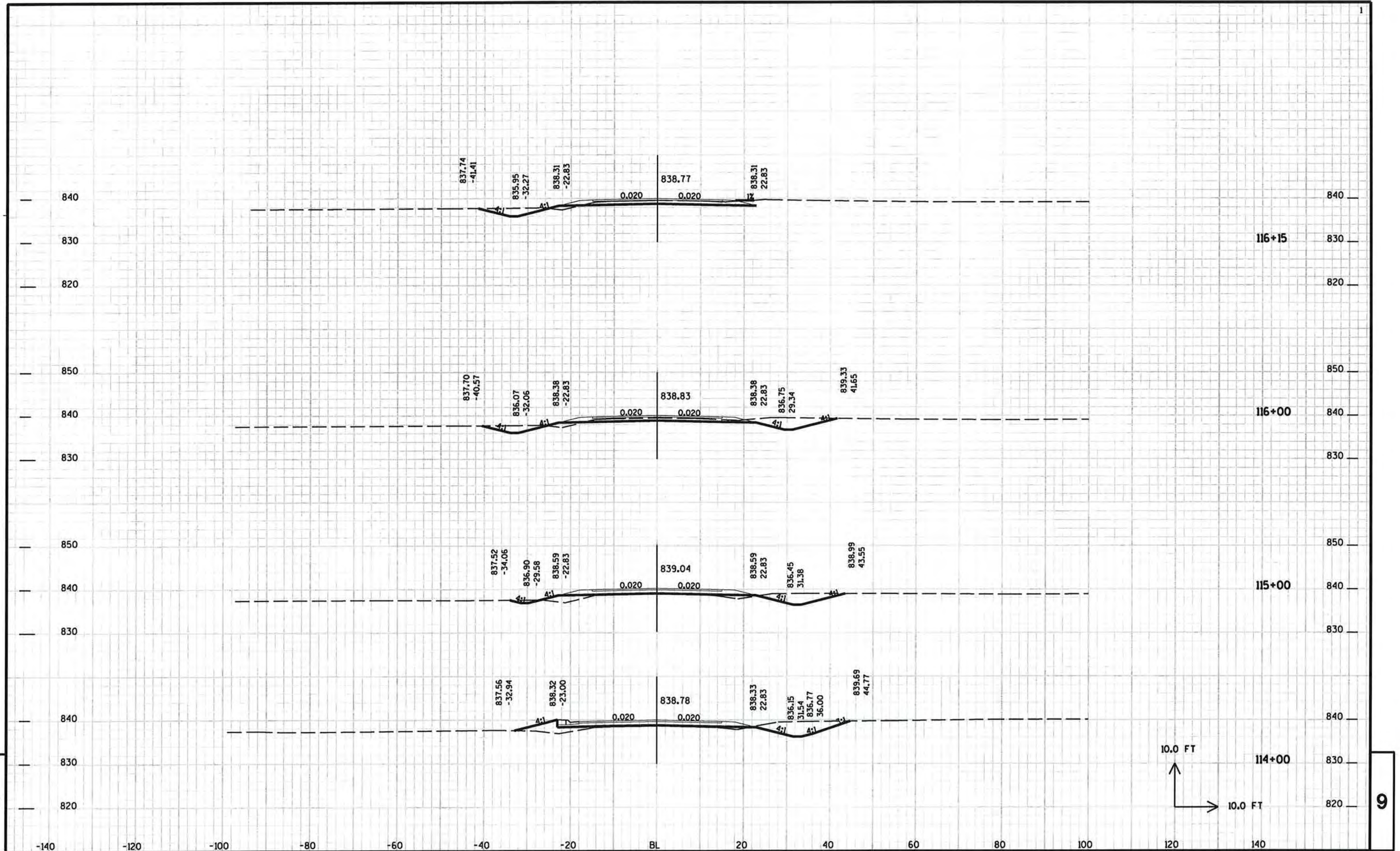


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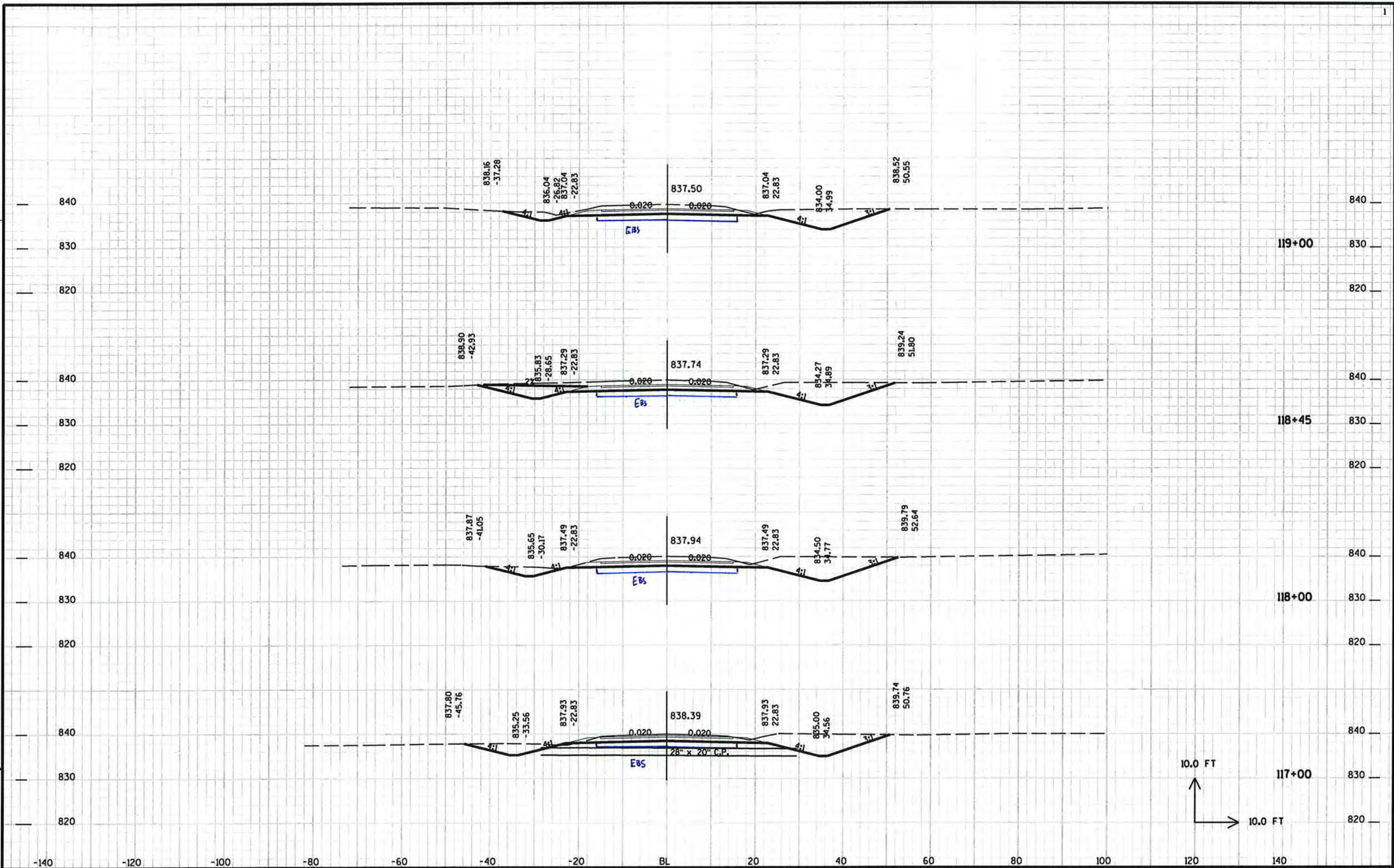




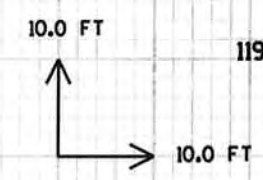
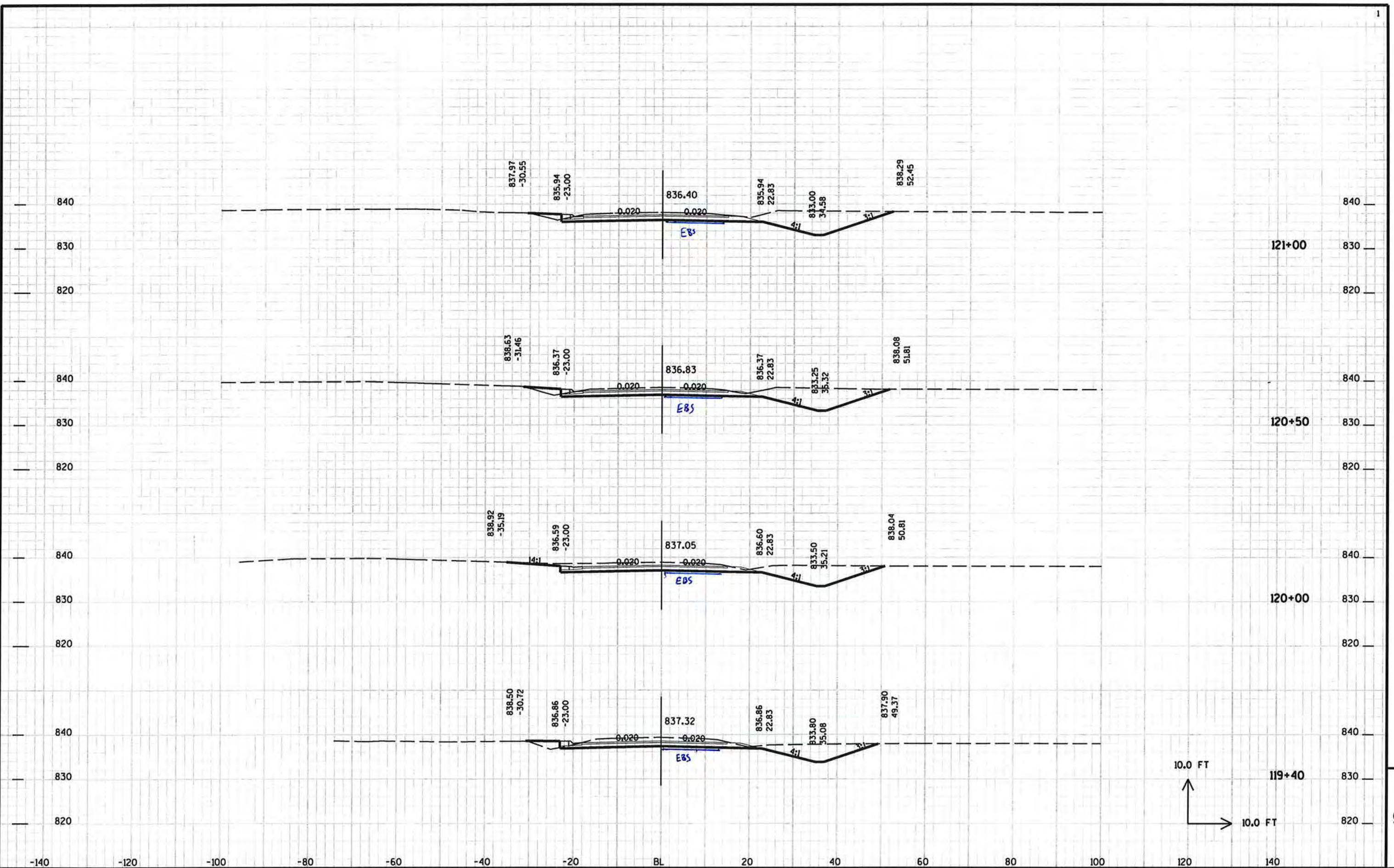
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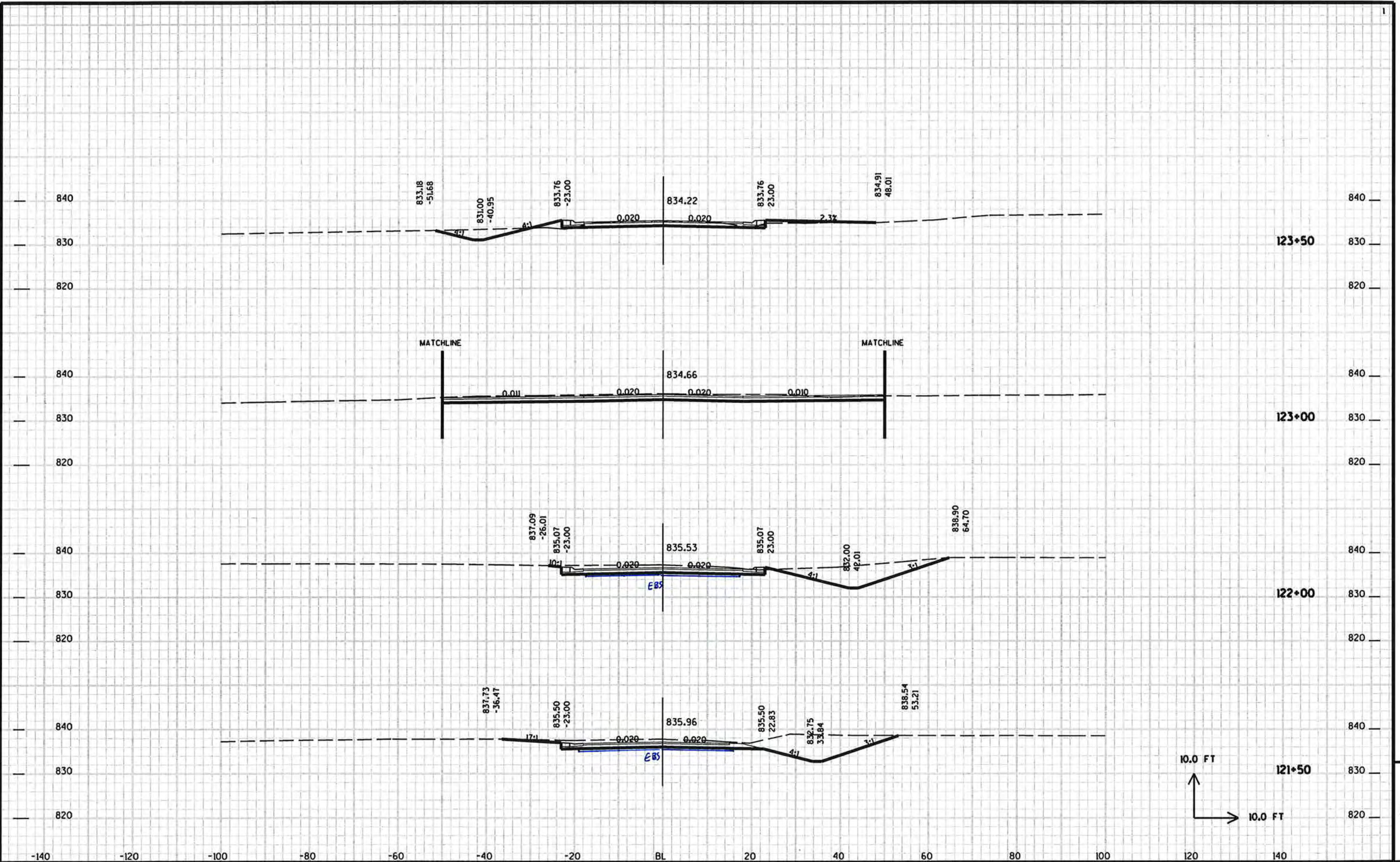
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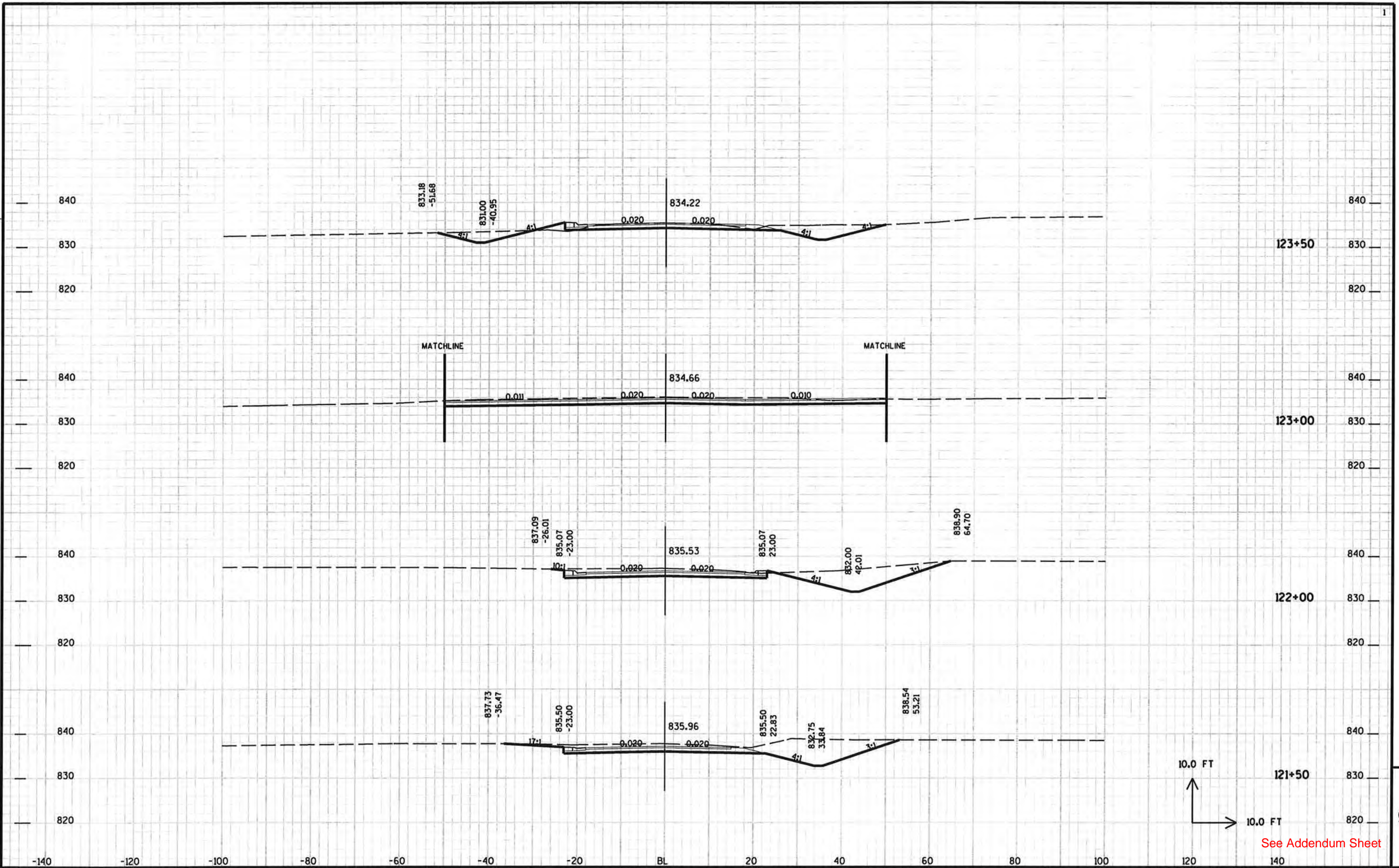
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 208

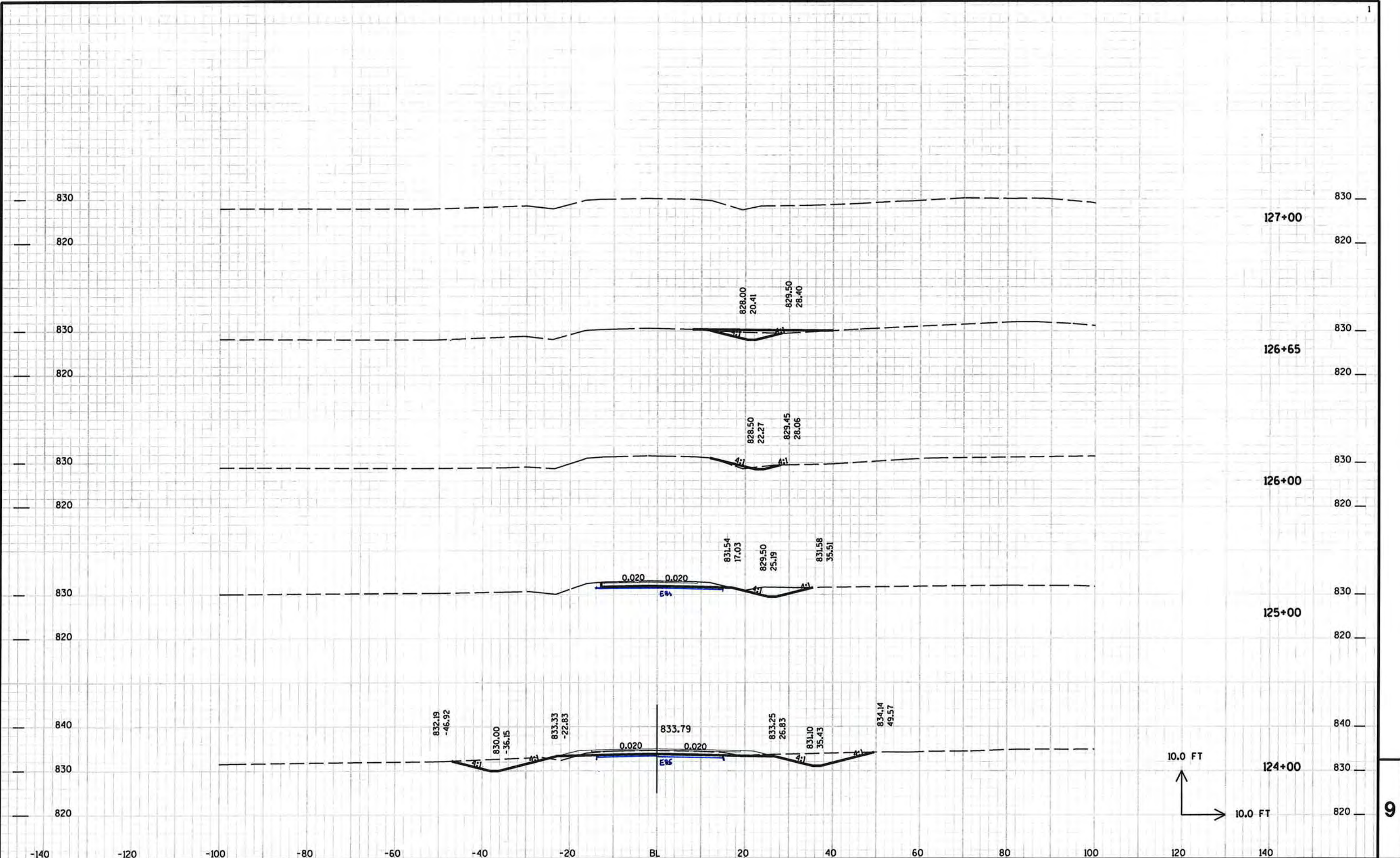


PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET E



PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH T SHEET 209

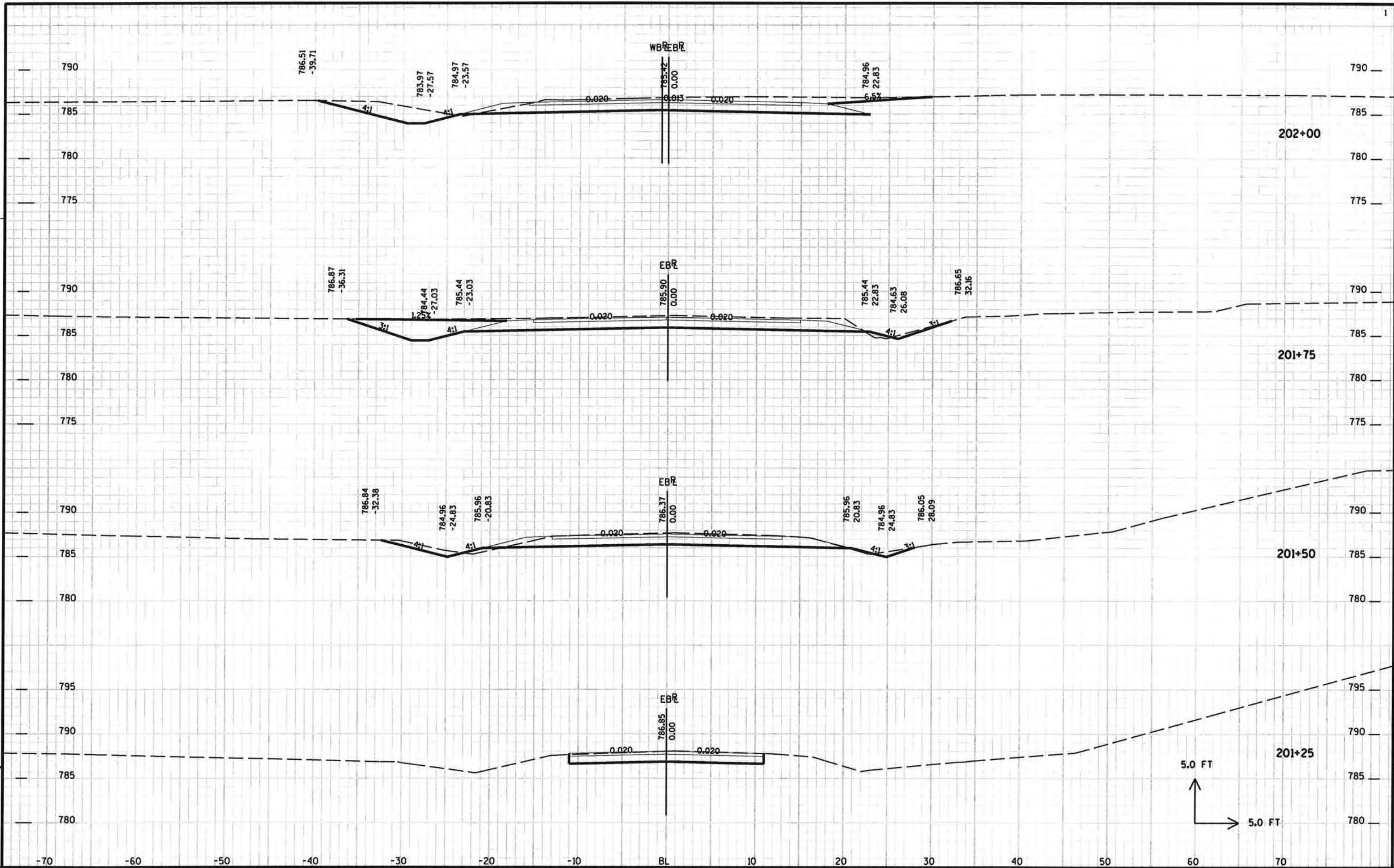
See Addendum Sheet



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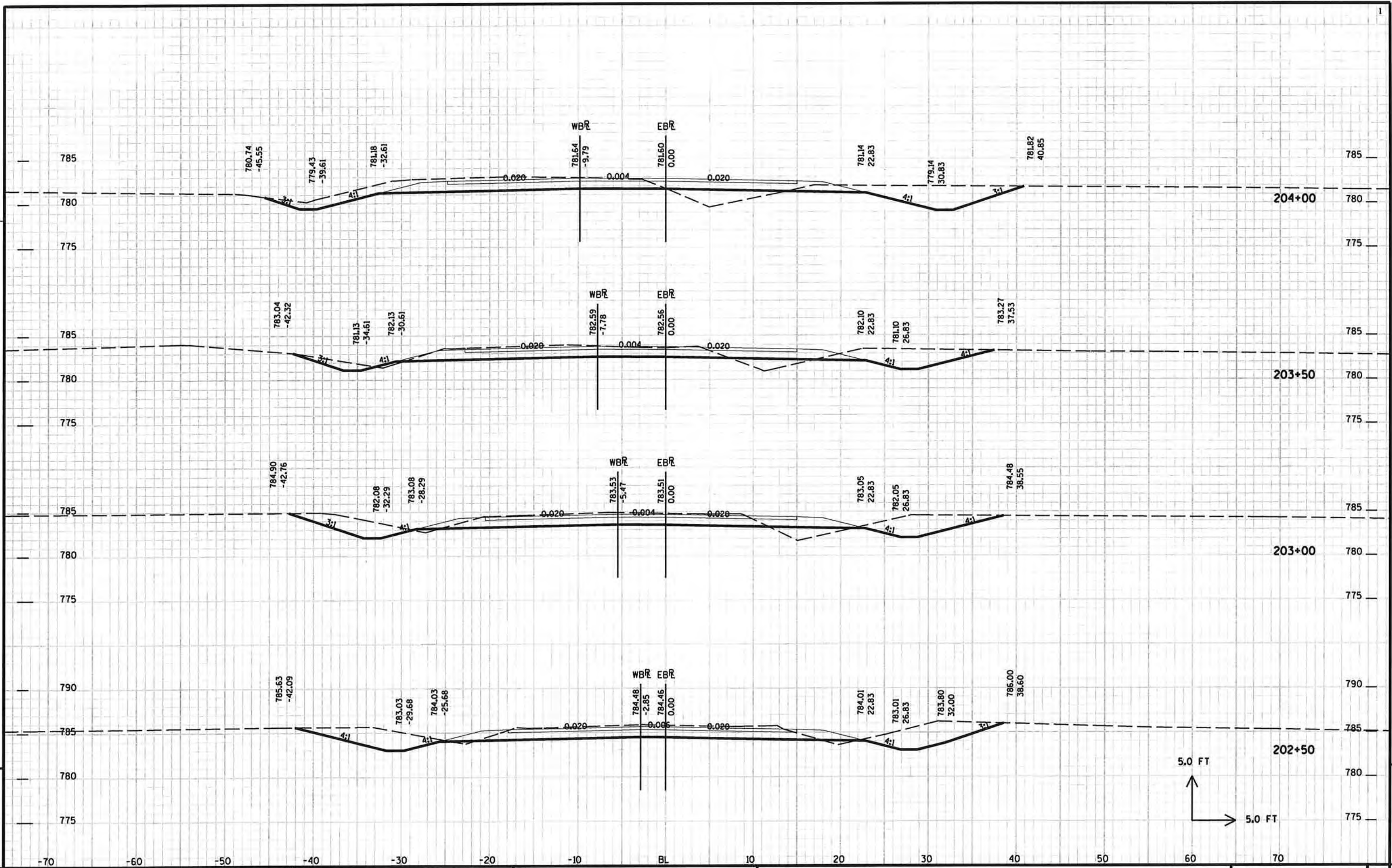
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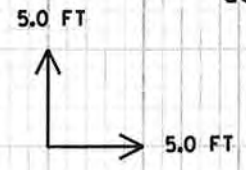
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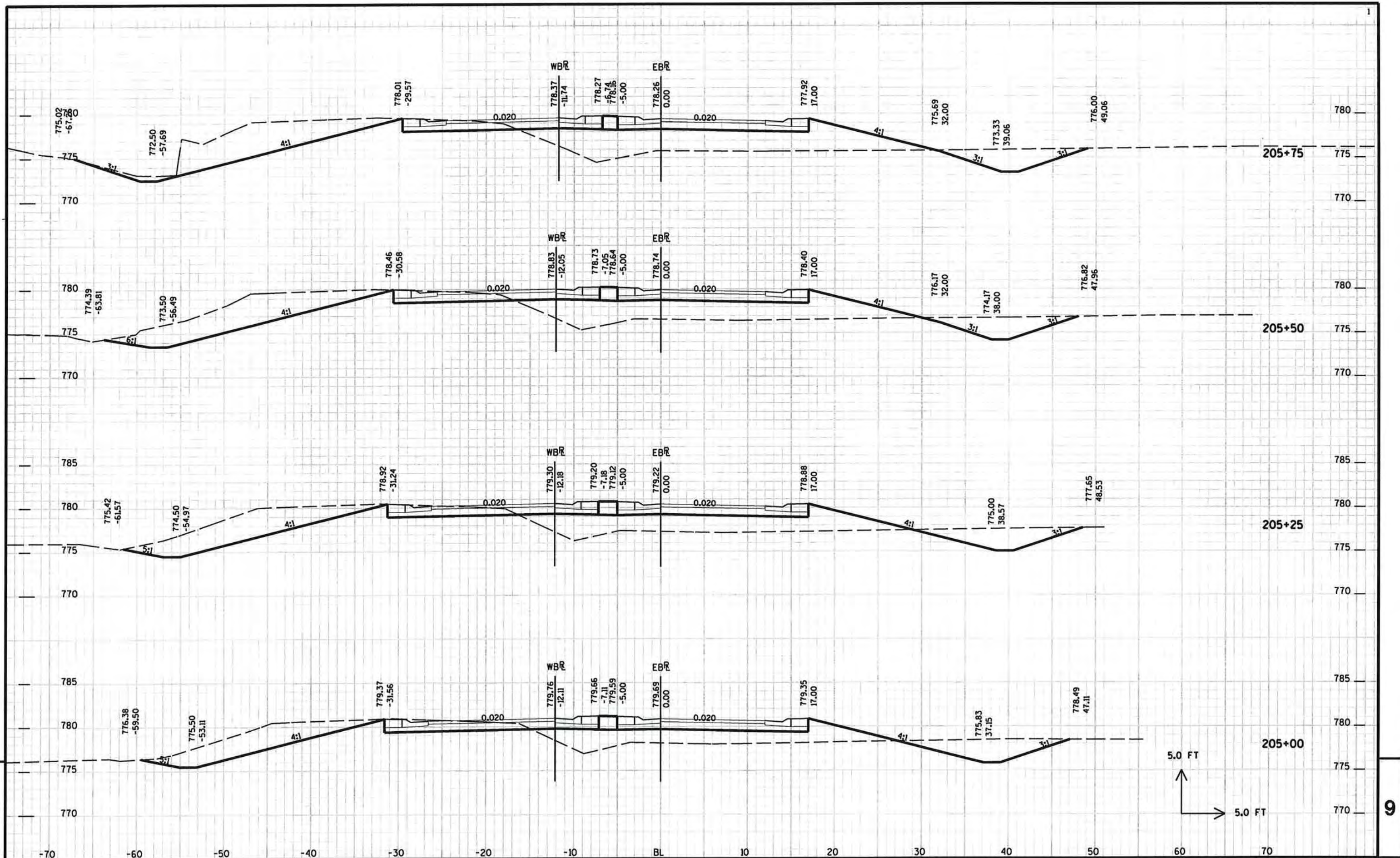
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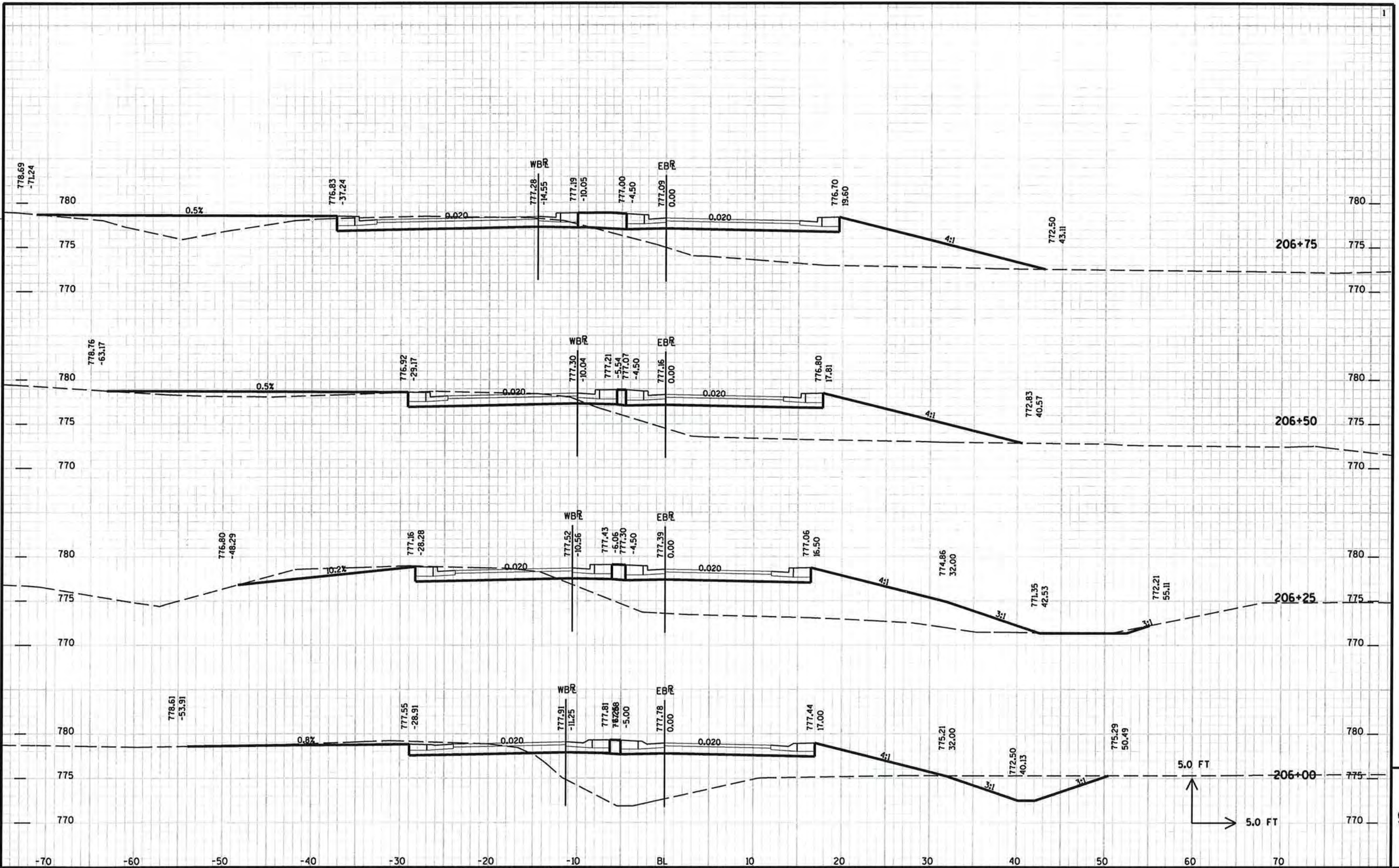
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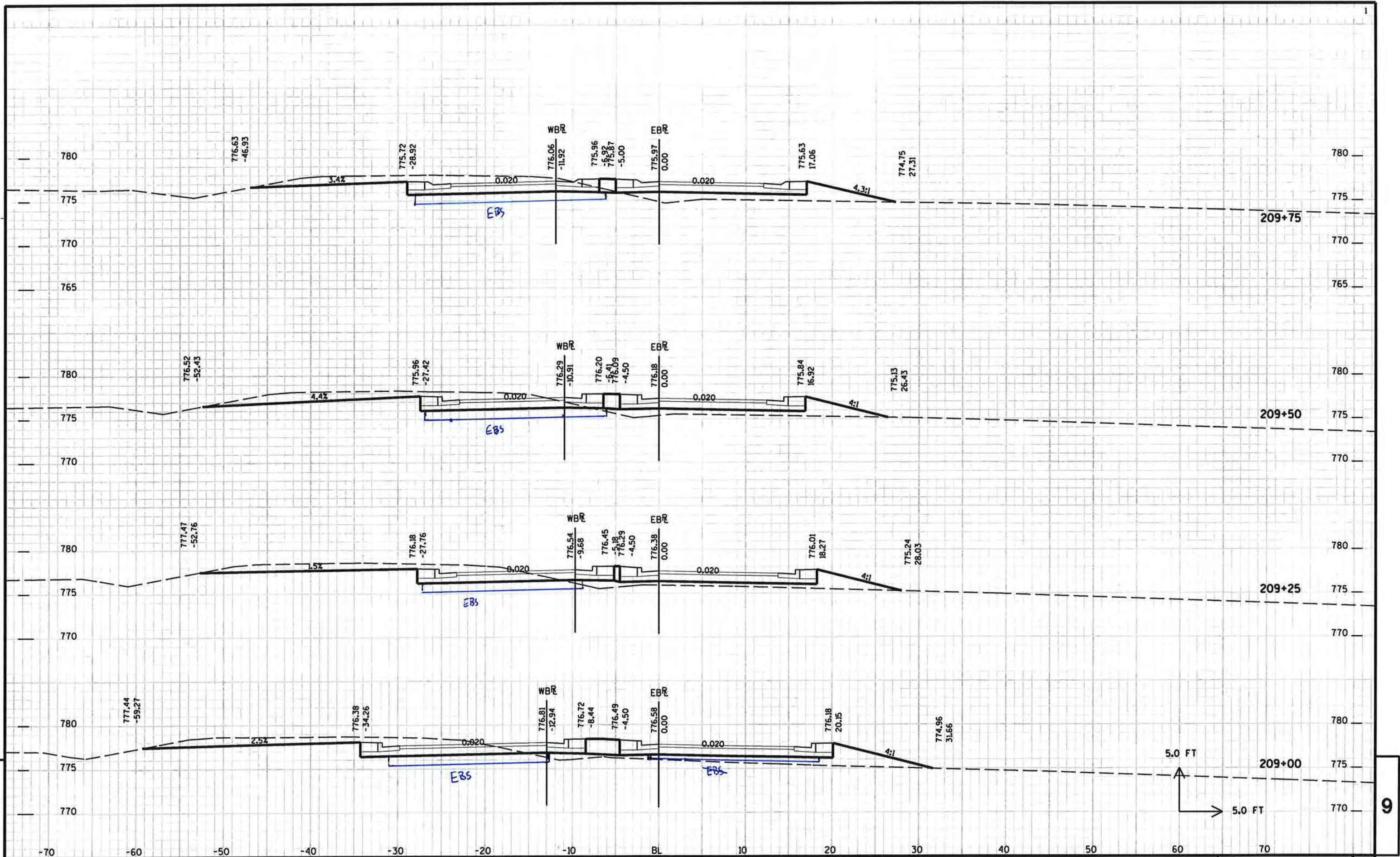
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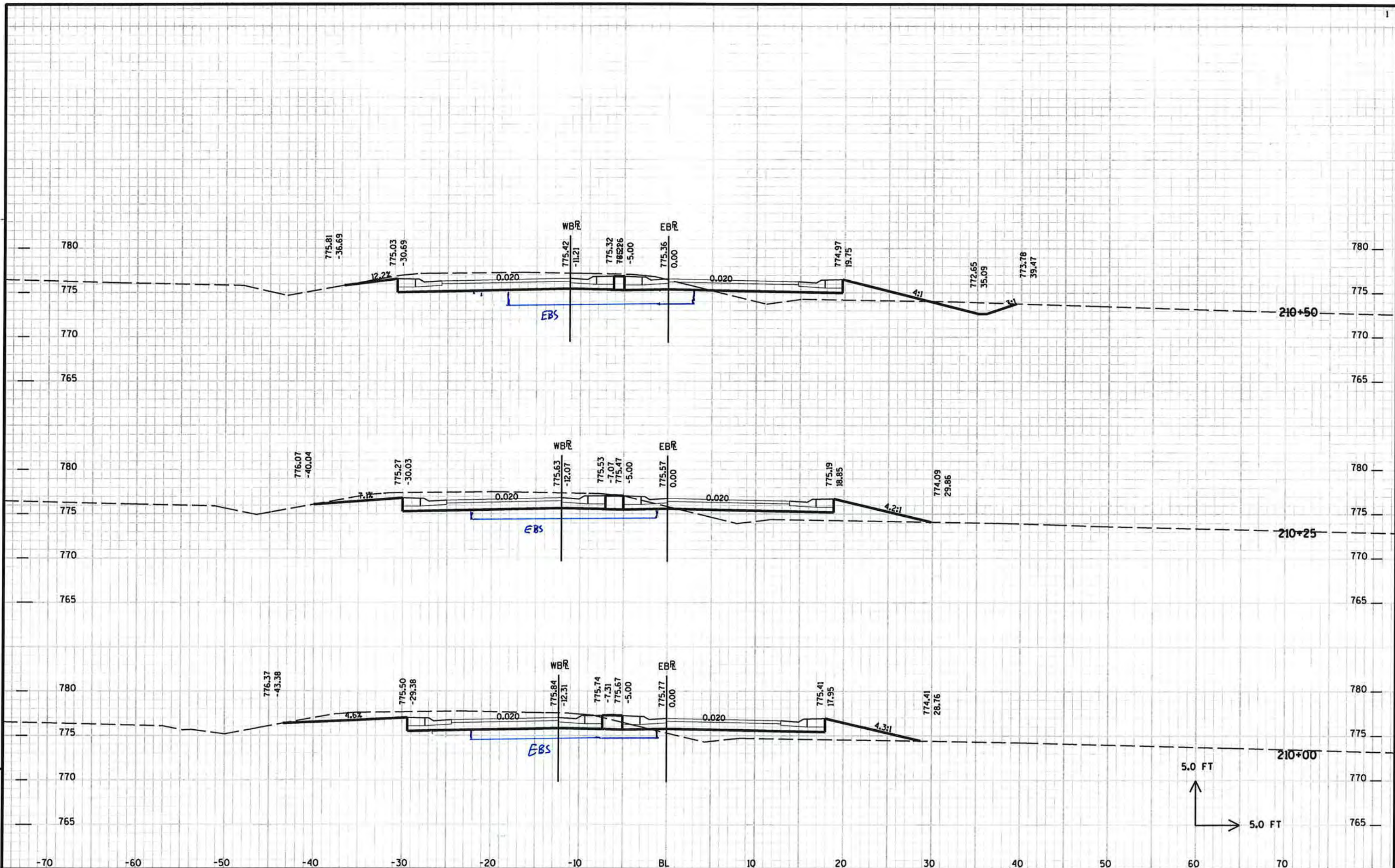
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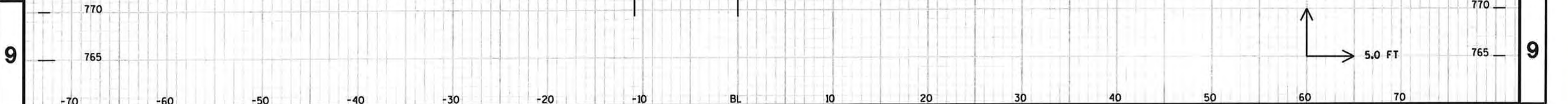
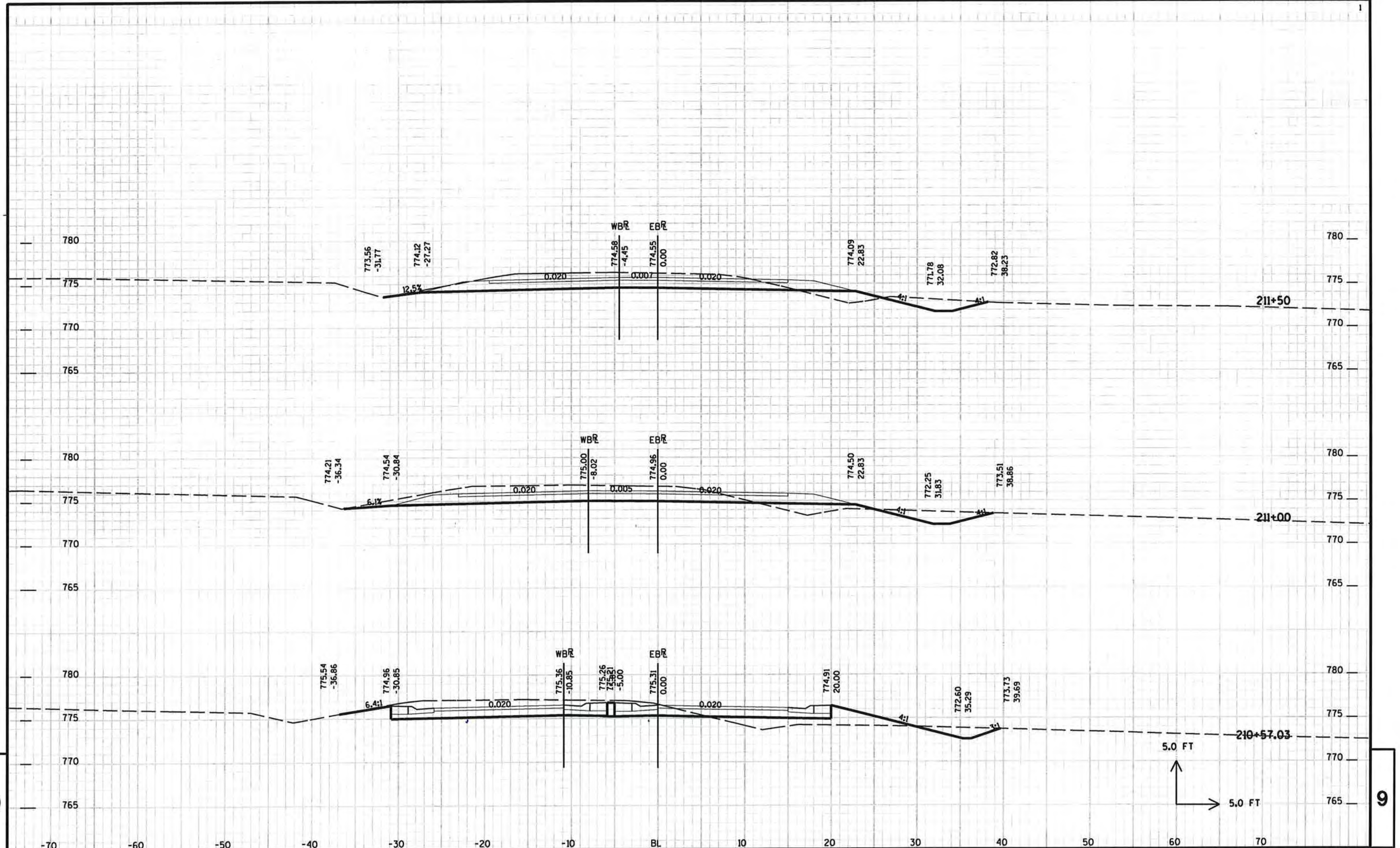
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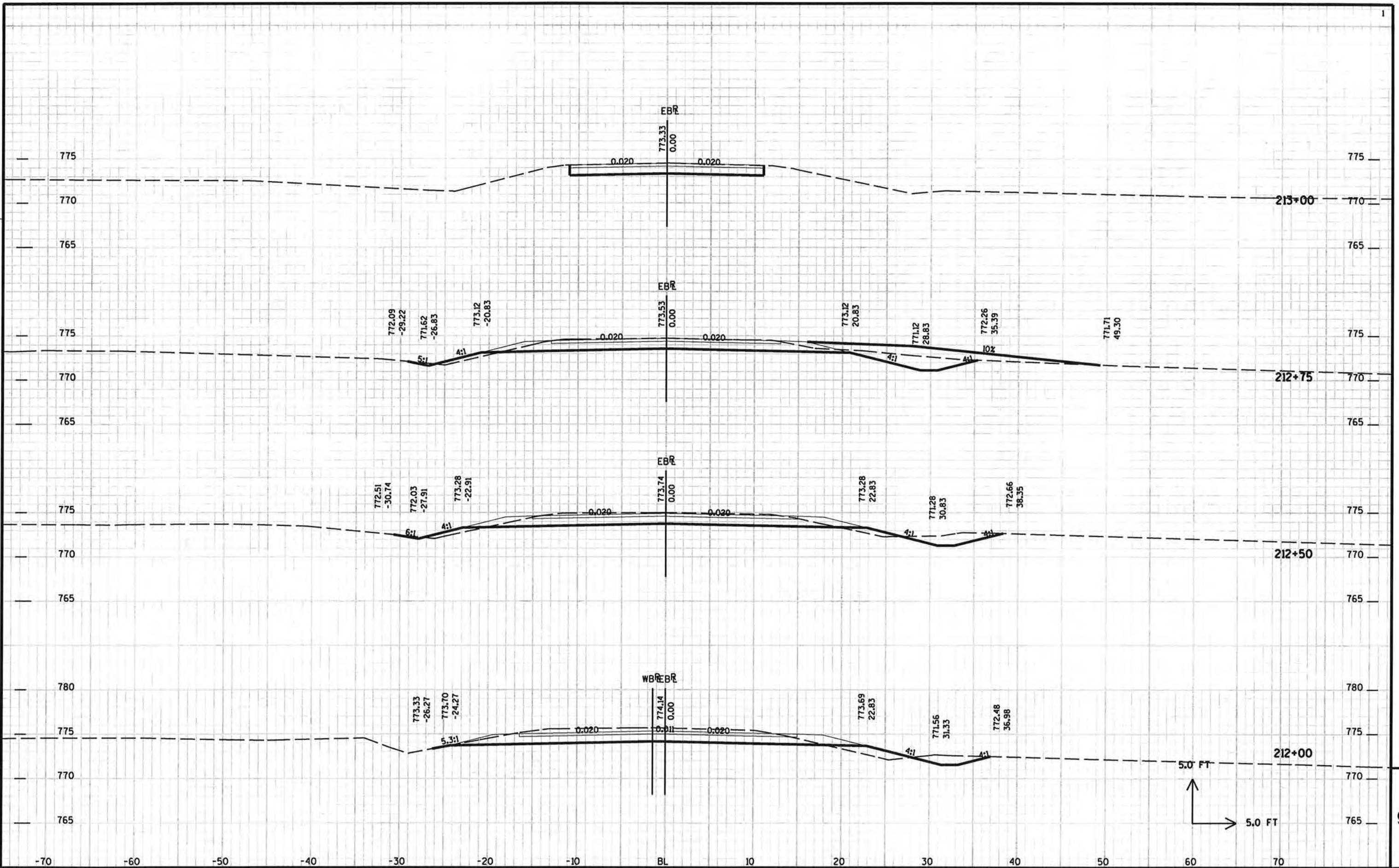
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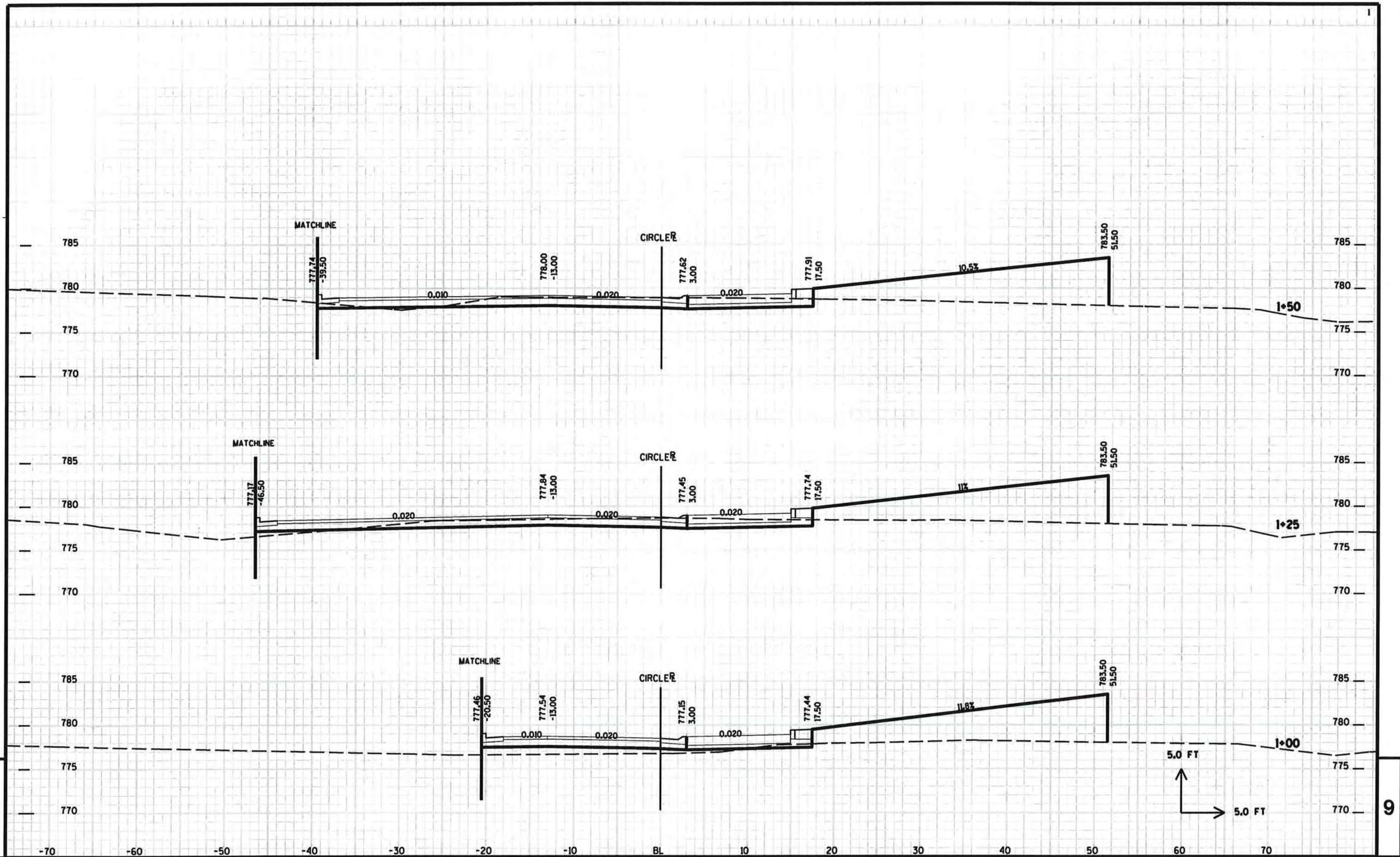


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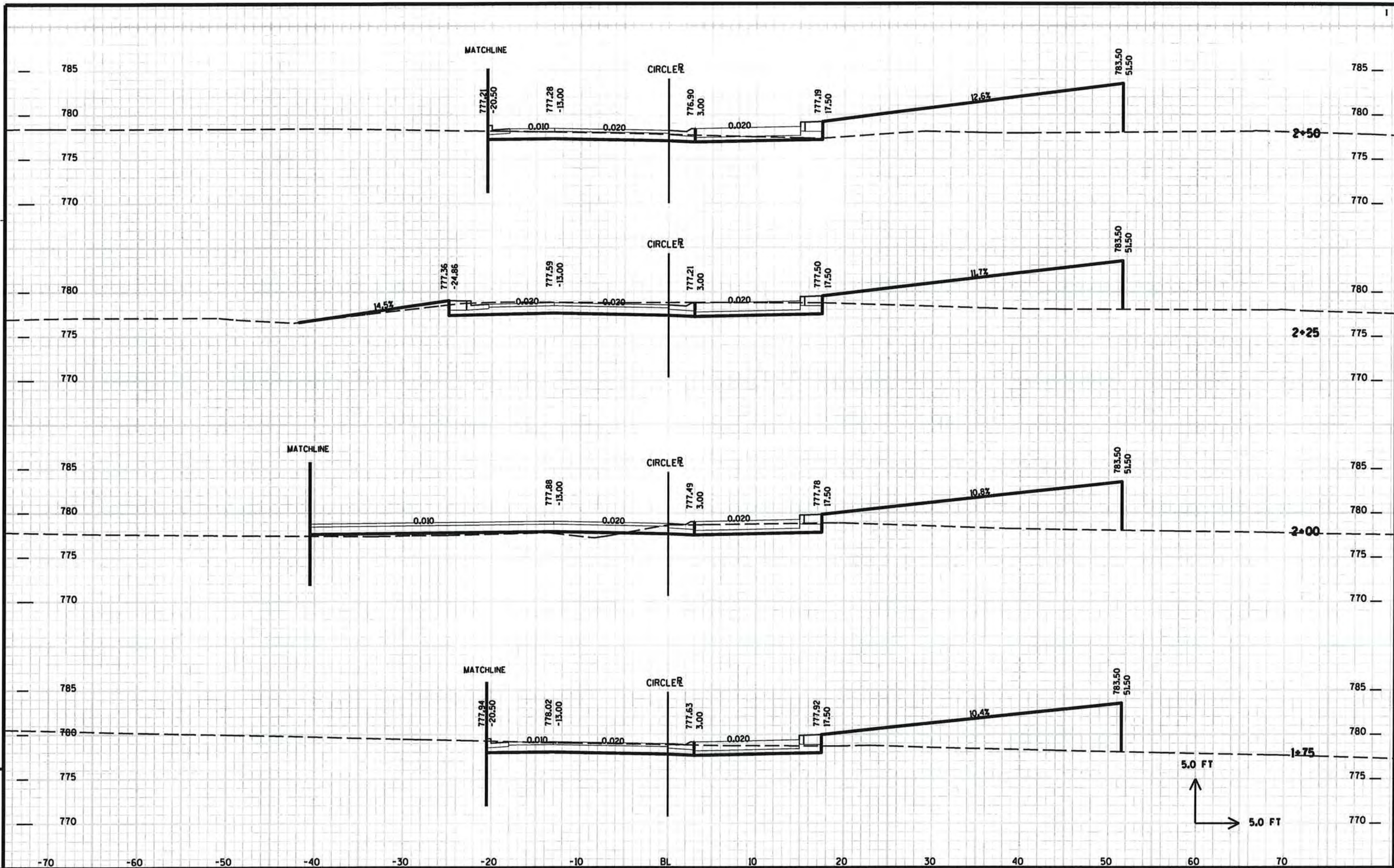


PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH Y SHEET 219 E

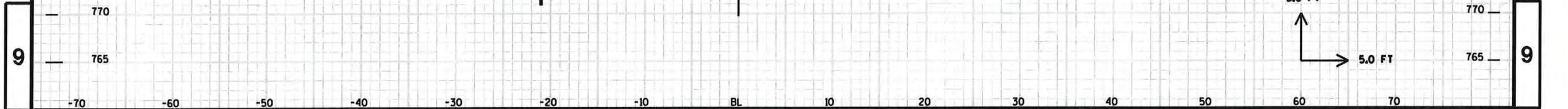
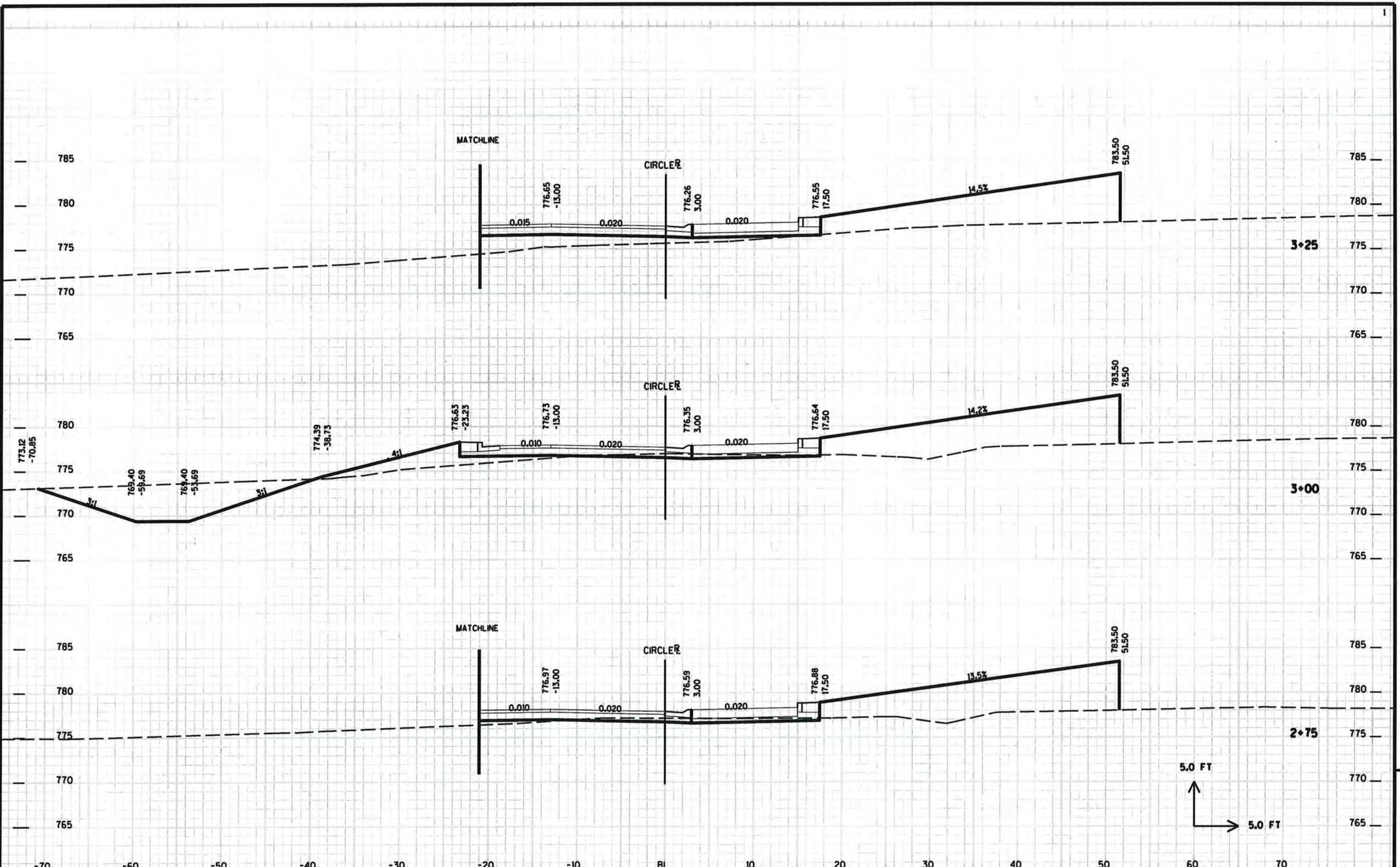




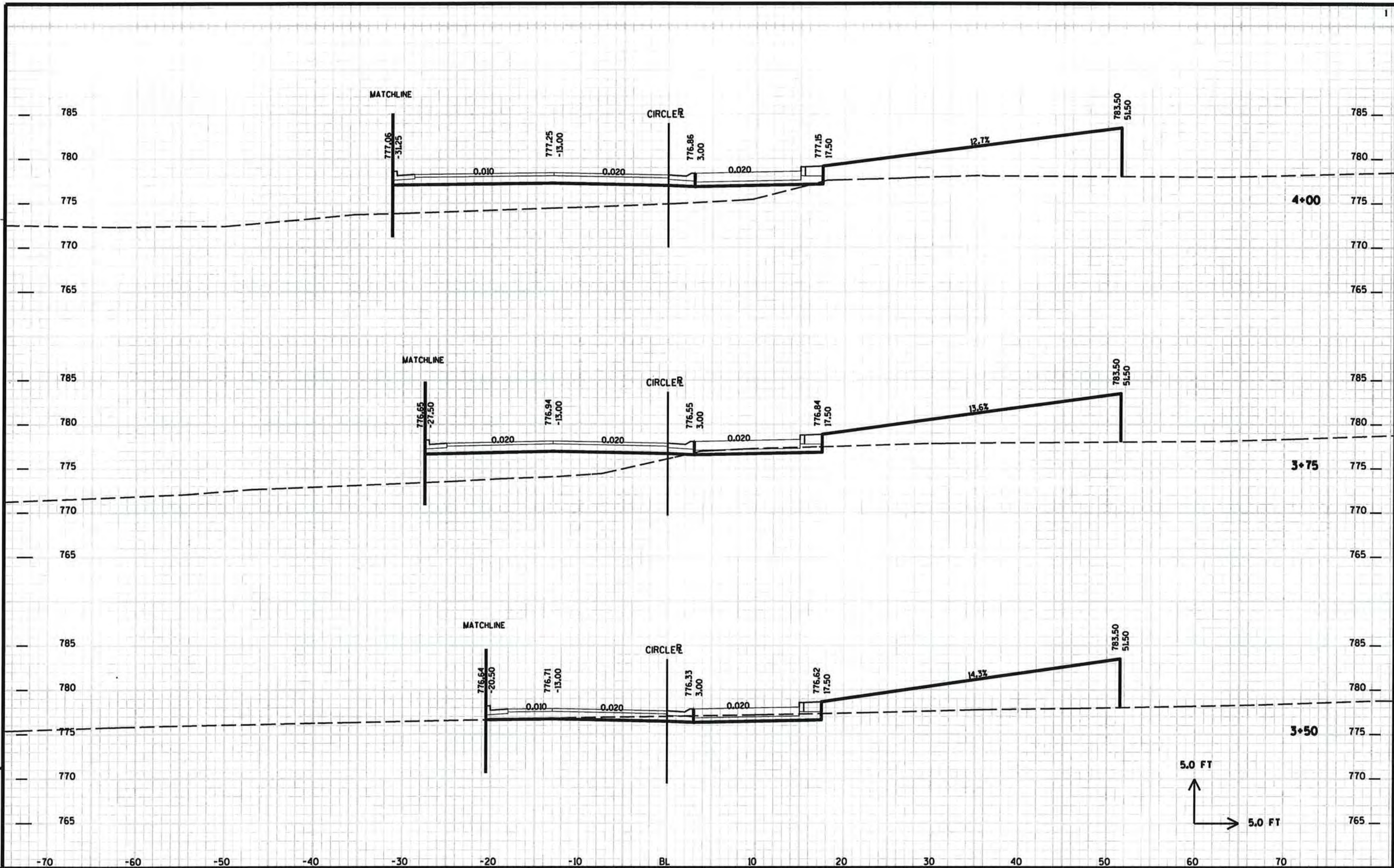
PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CIRCLE SHEET 220 E



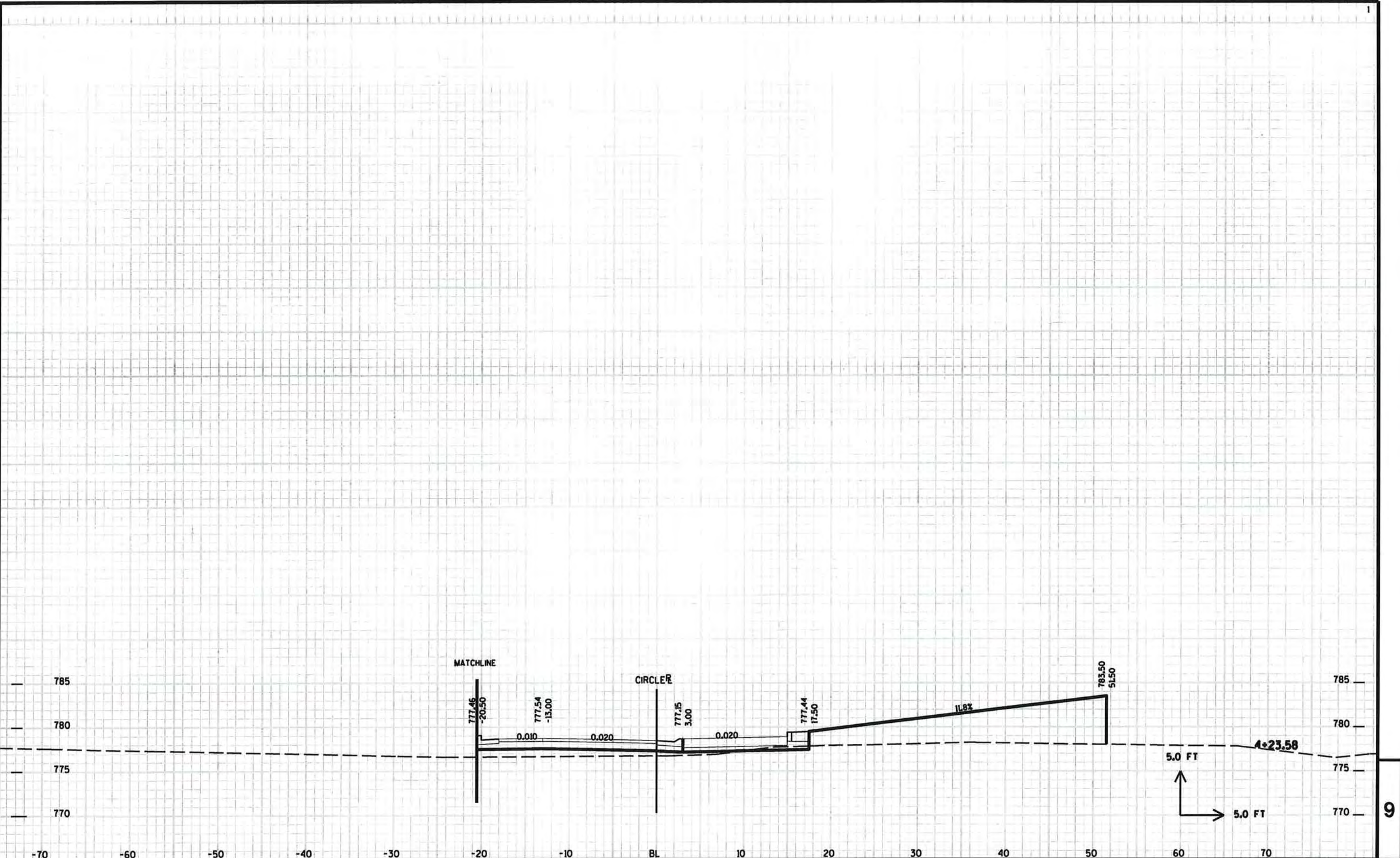
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CIRCLE SHEET 222



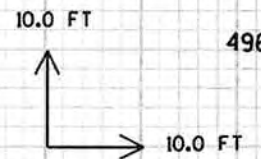
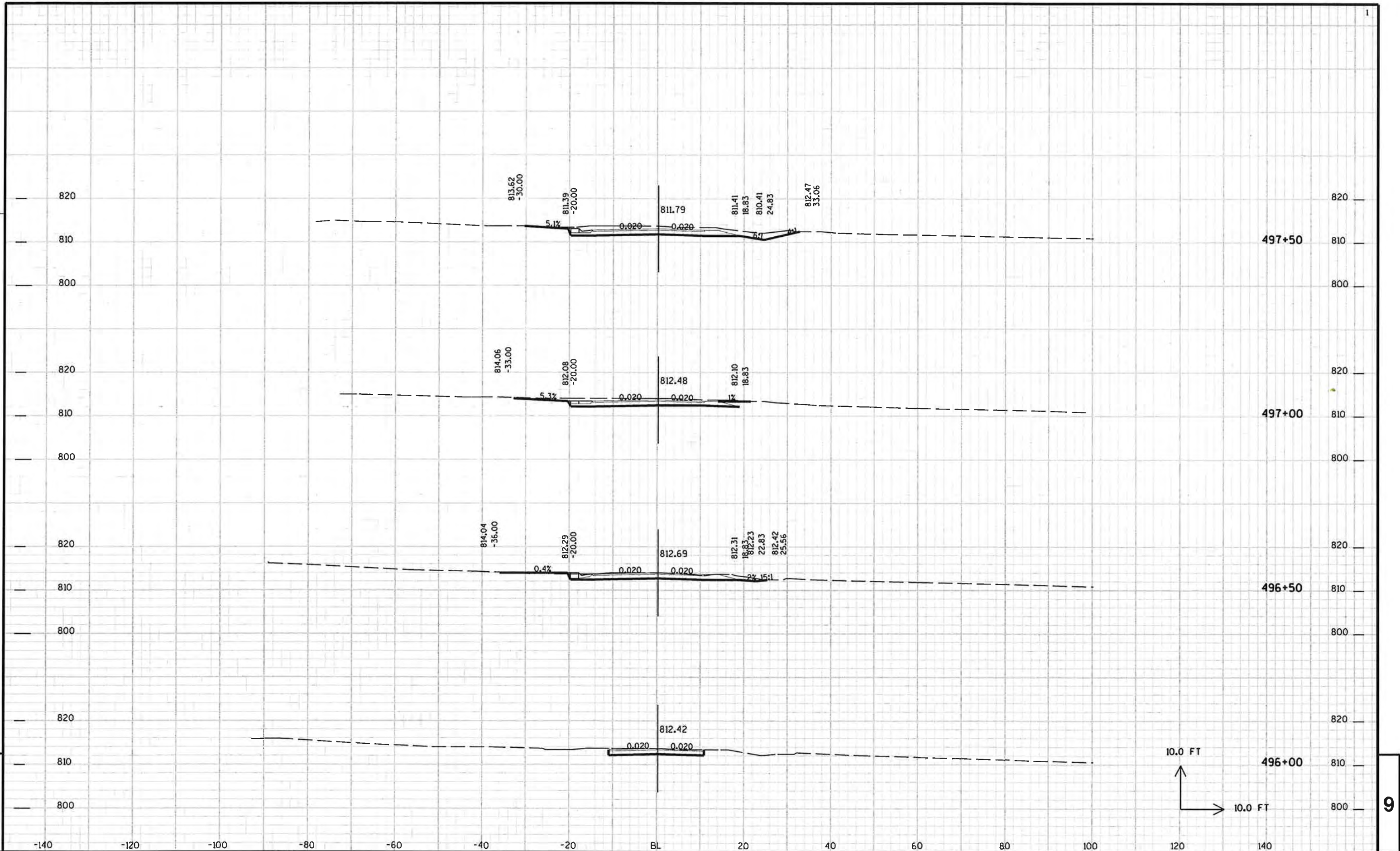
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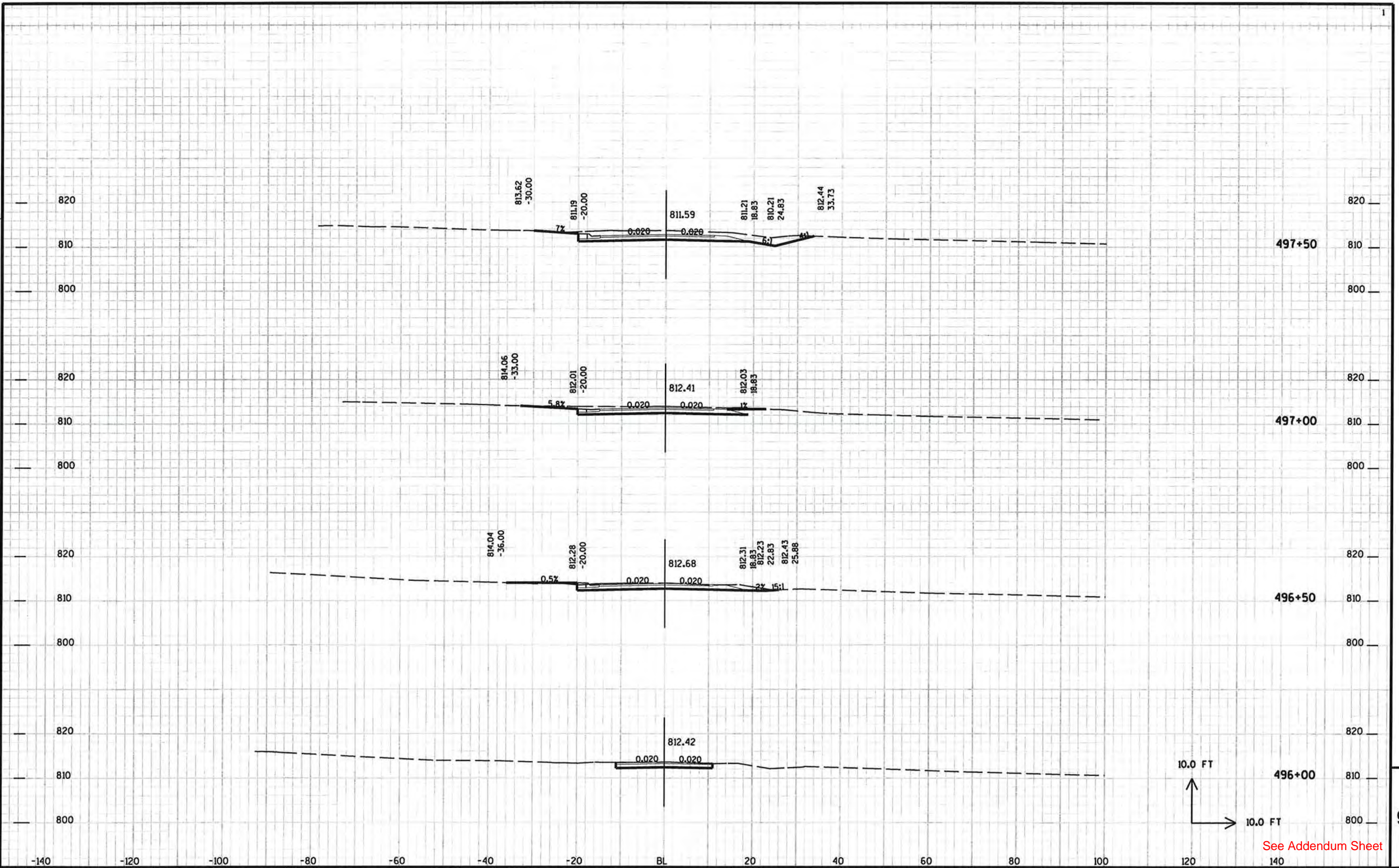
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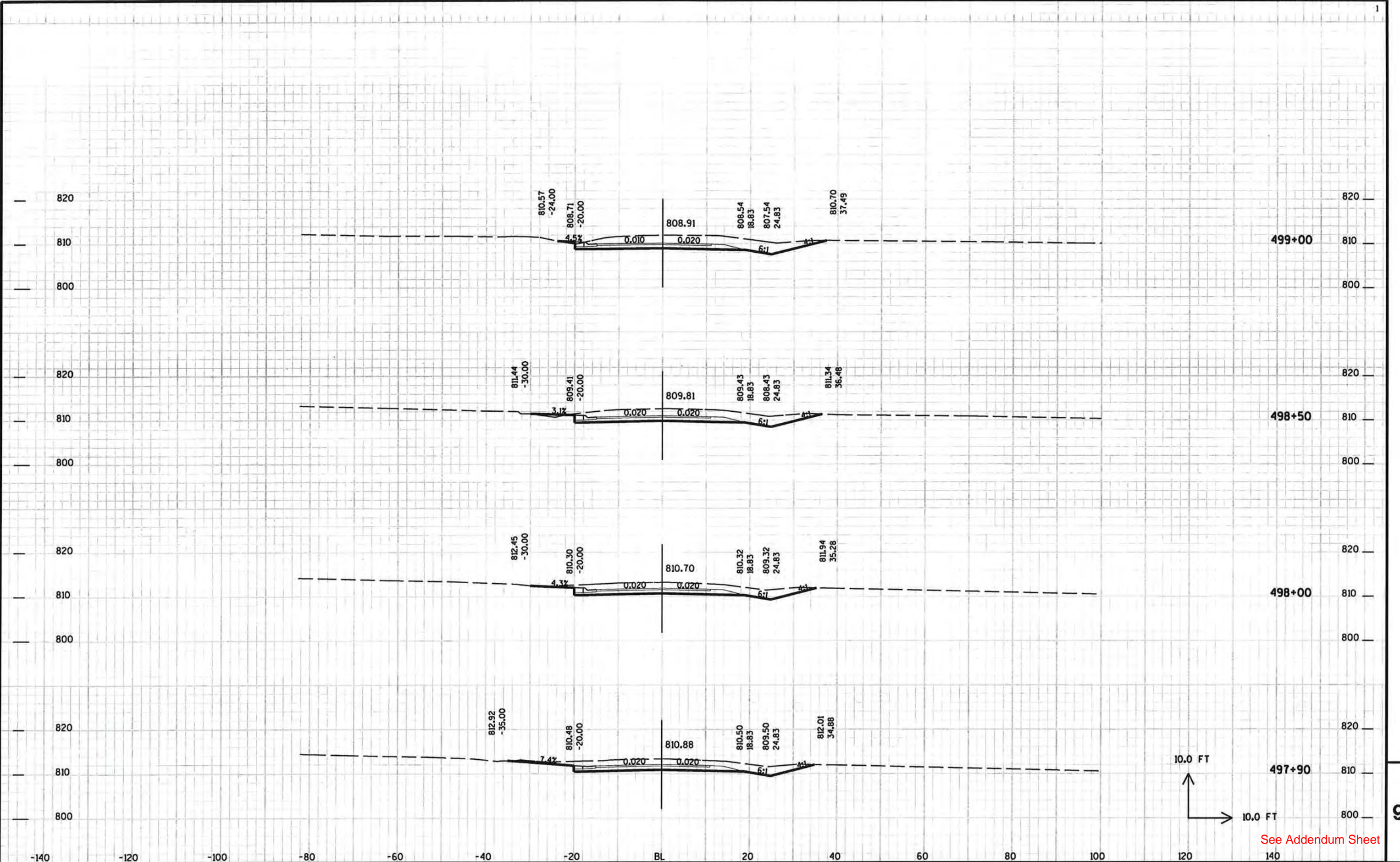
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - BROOKS ROAD SHEET E



PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - BROOKS ROAD SHEET 225

See Addendum Sheet



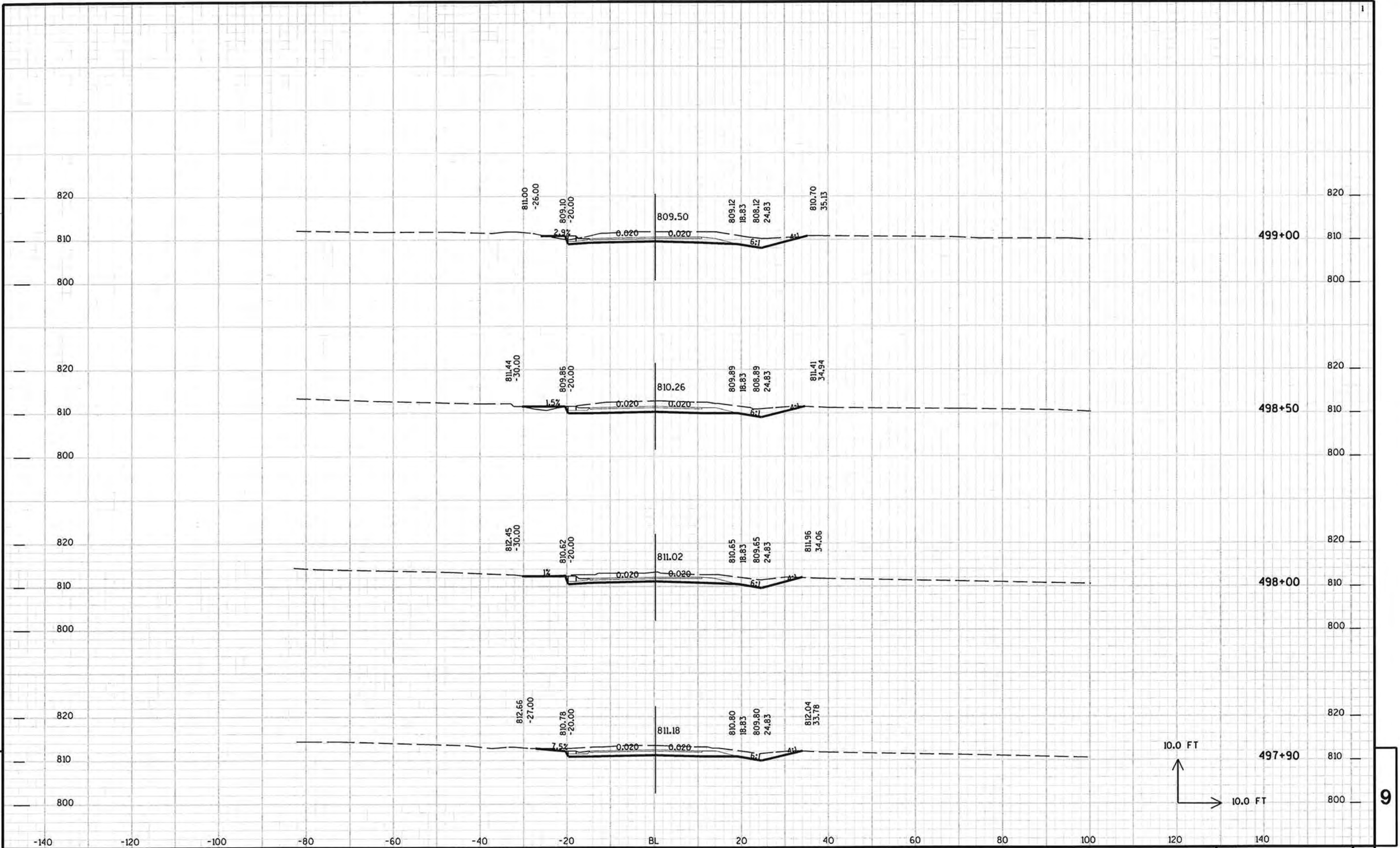
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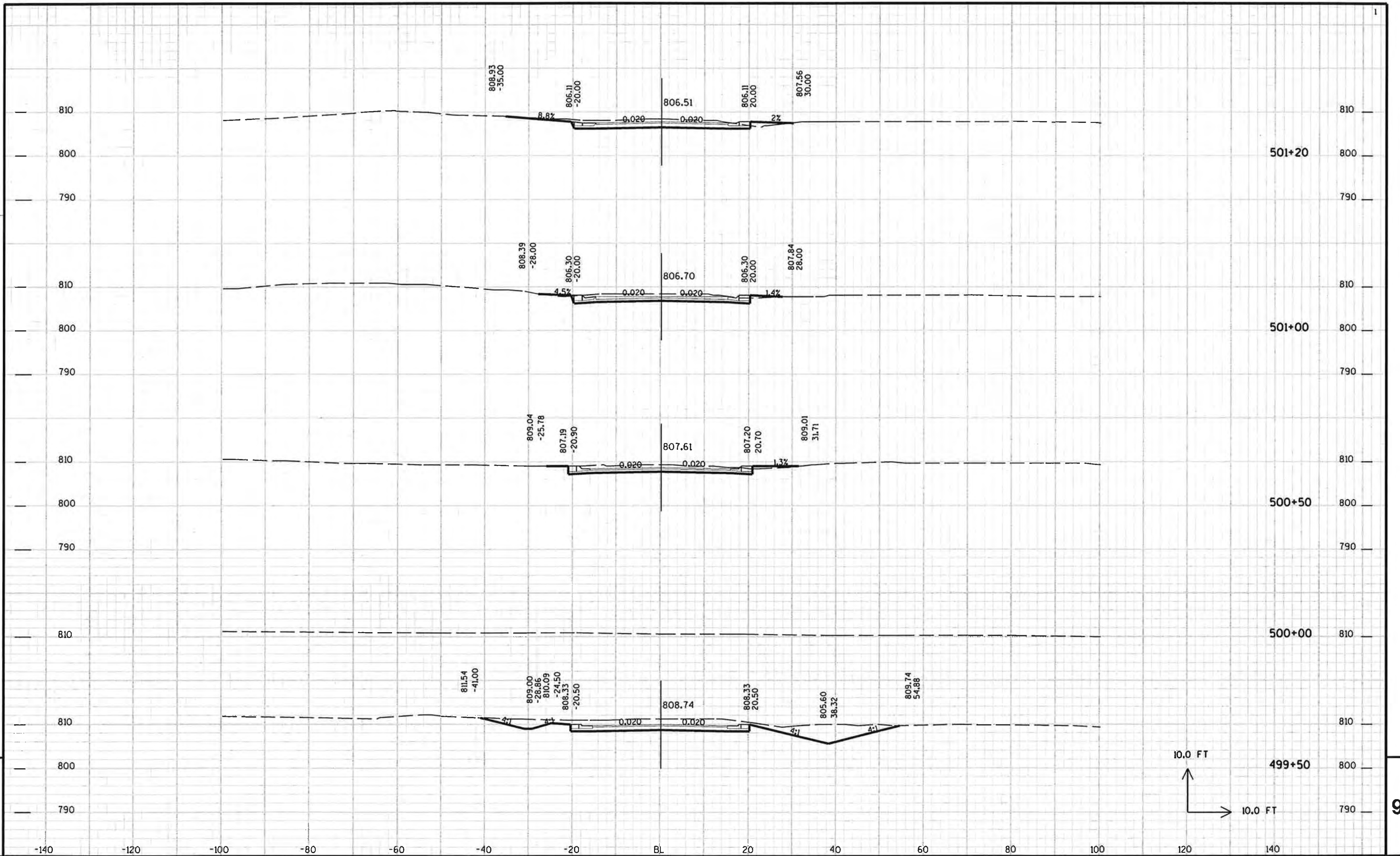
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See Addendum Sheet





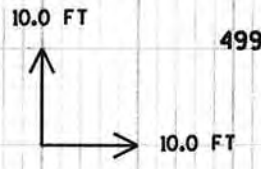
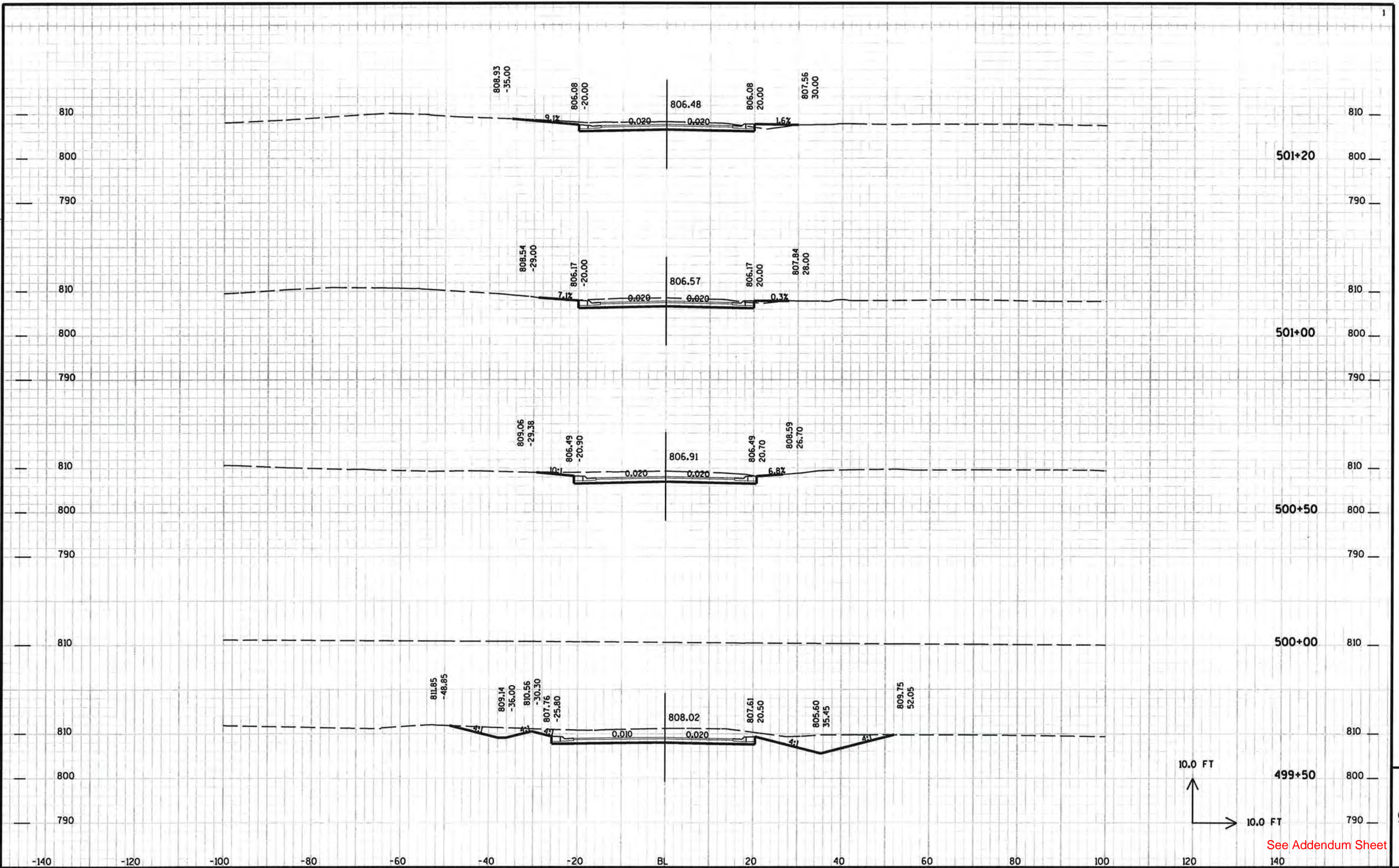
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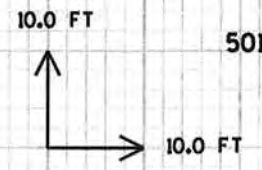
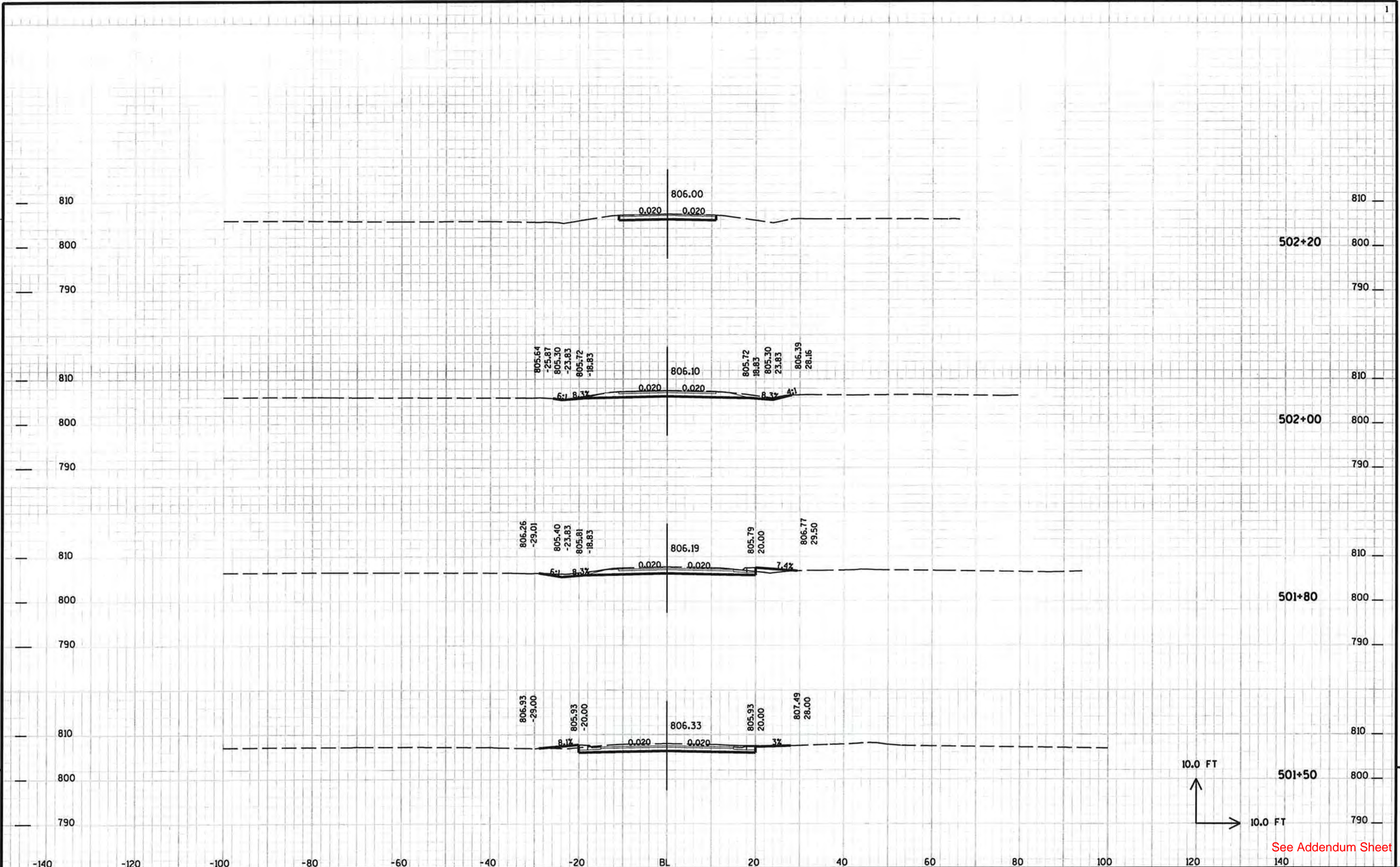
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PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - BROOKS ROAD SHEET E

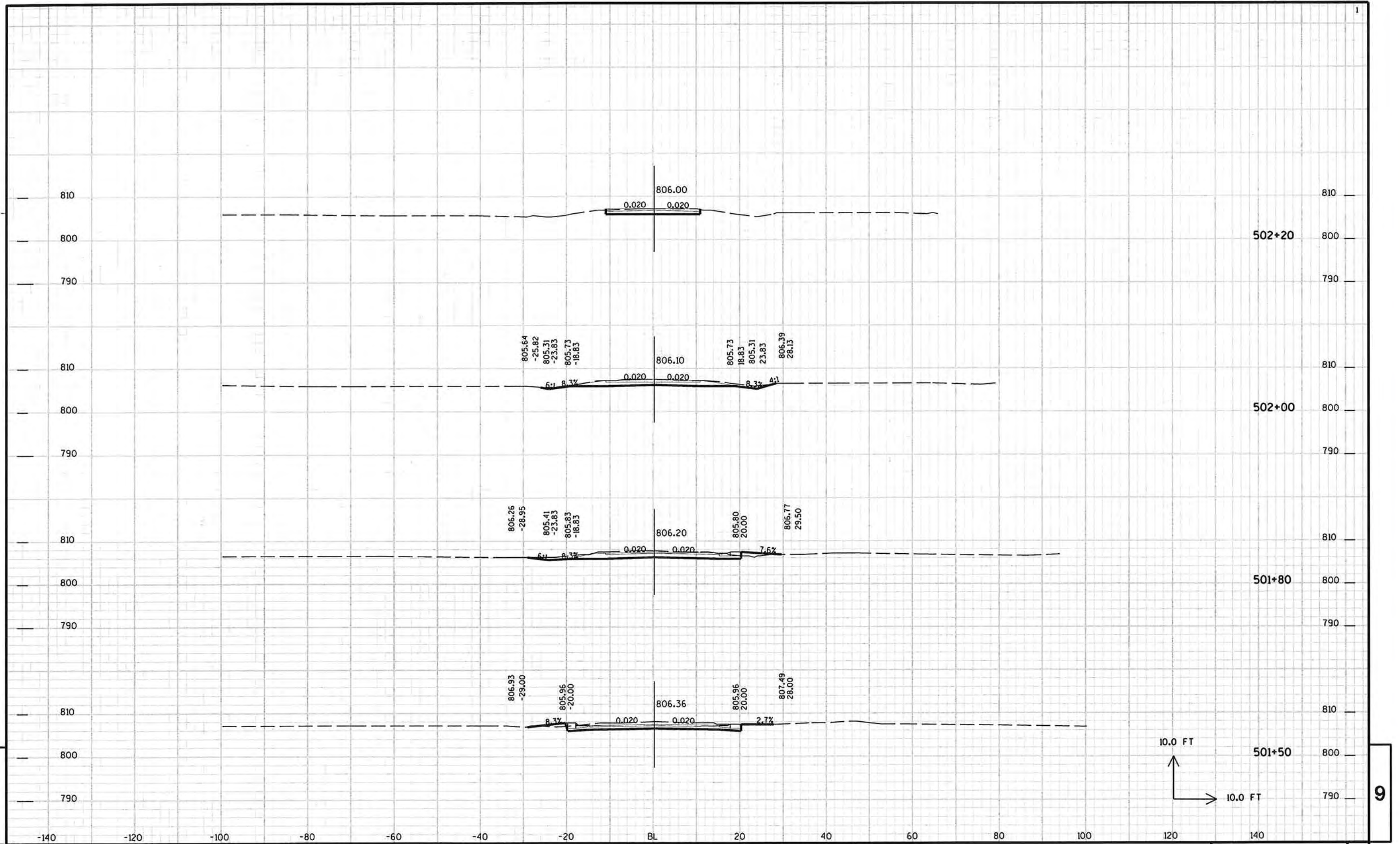


See Addendum Sheet

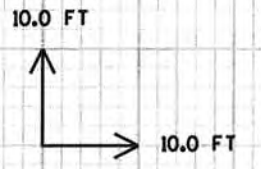
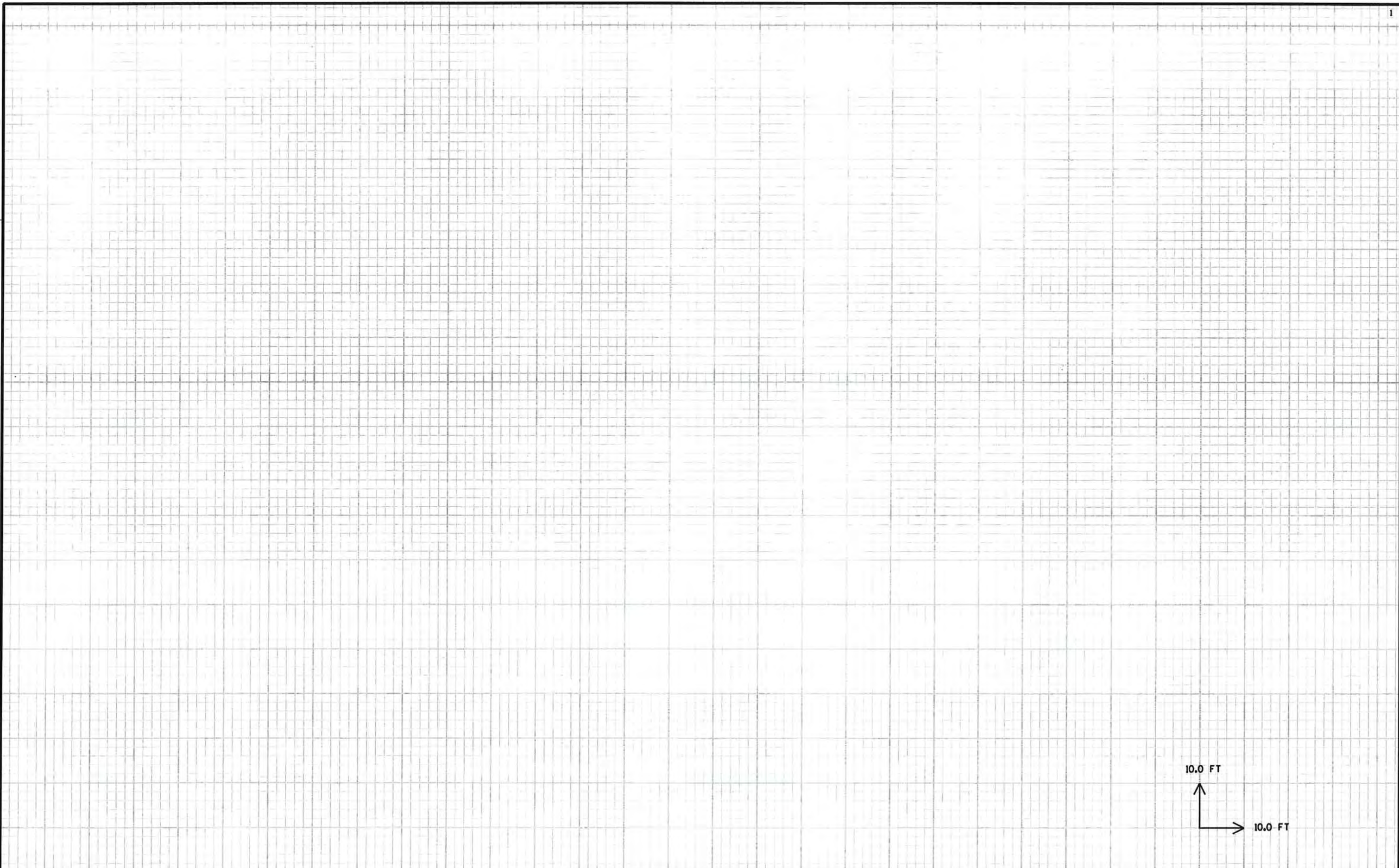
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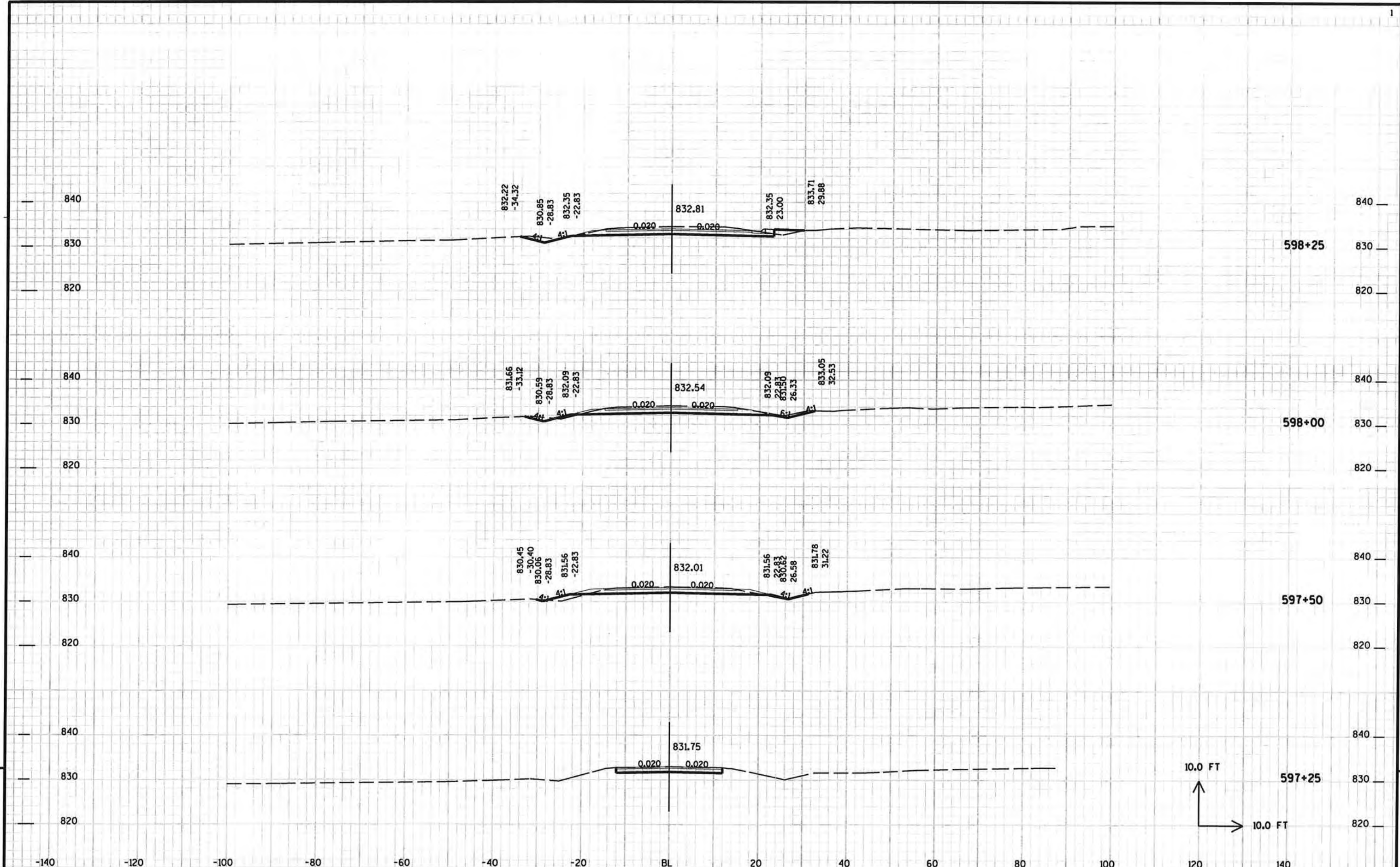
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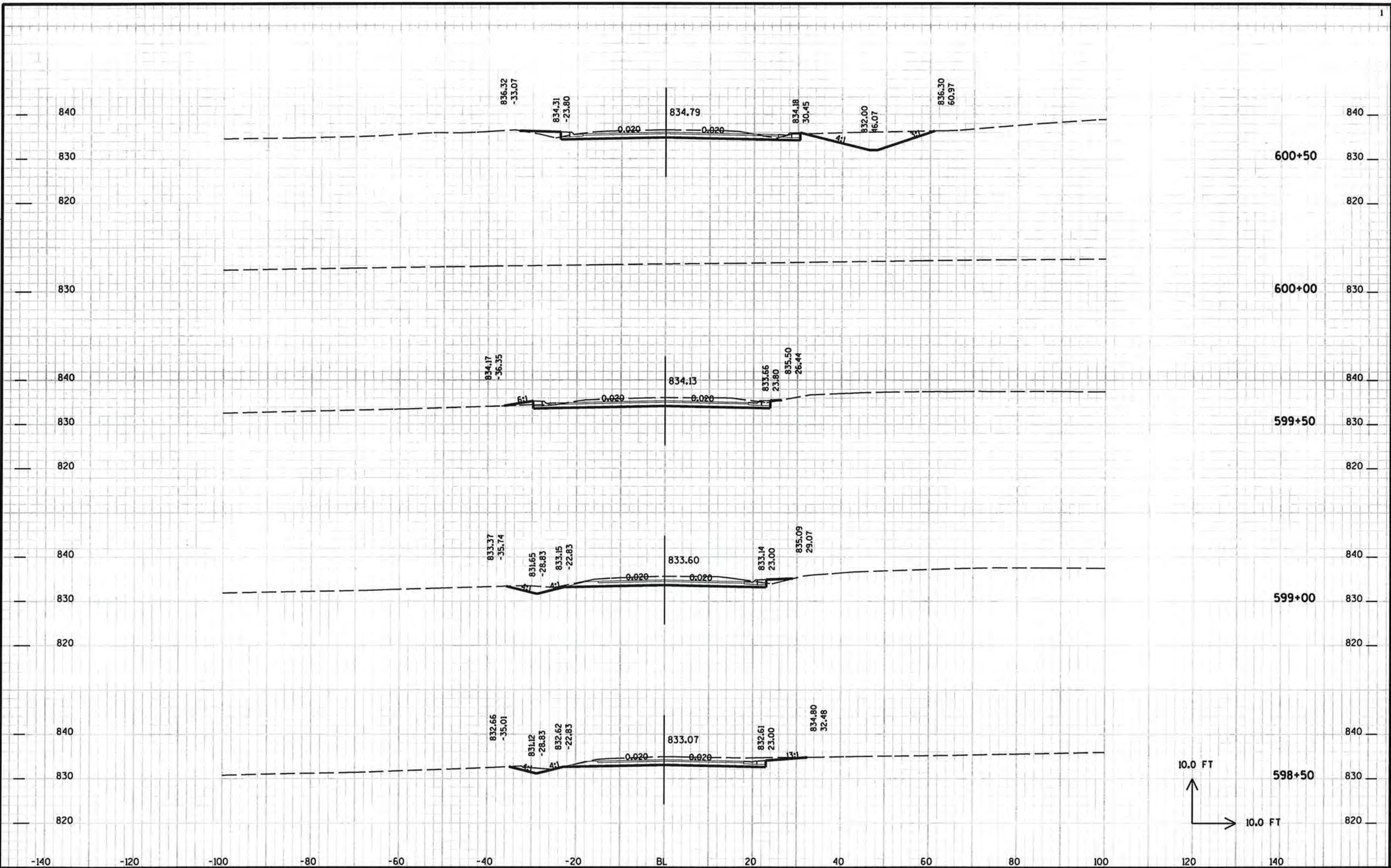
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PROJECT NO:	HWY: CTH T	COUNTY: WINNEBAGO	CROSS SECTIONS - BROOKS ROAD	SHEET 229	E
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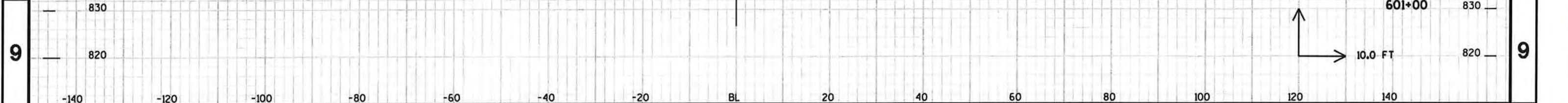
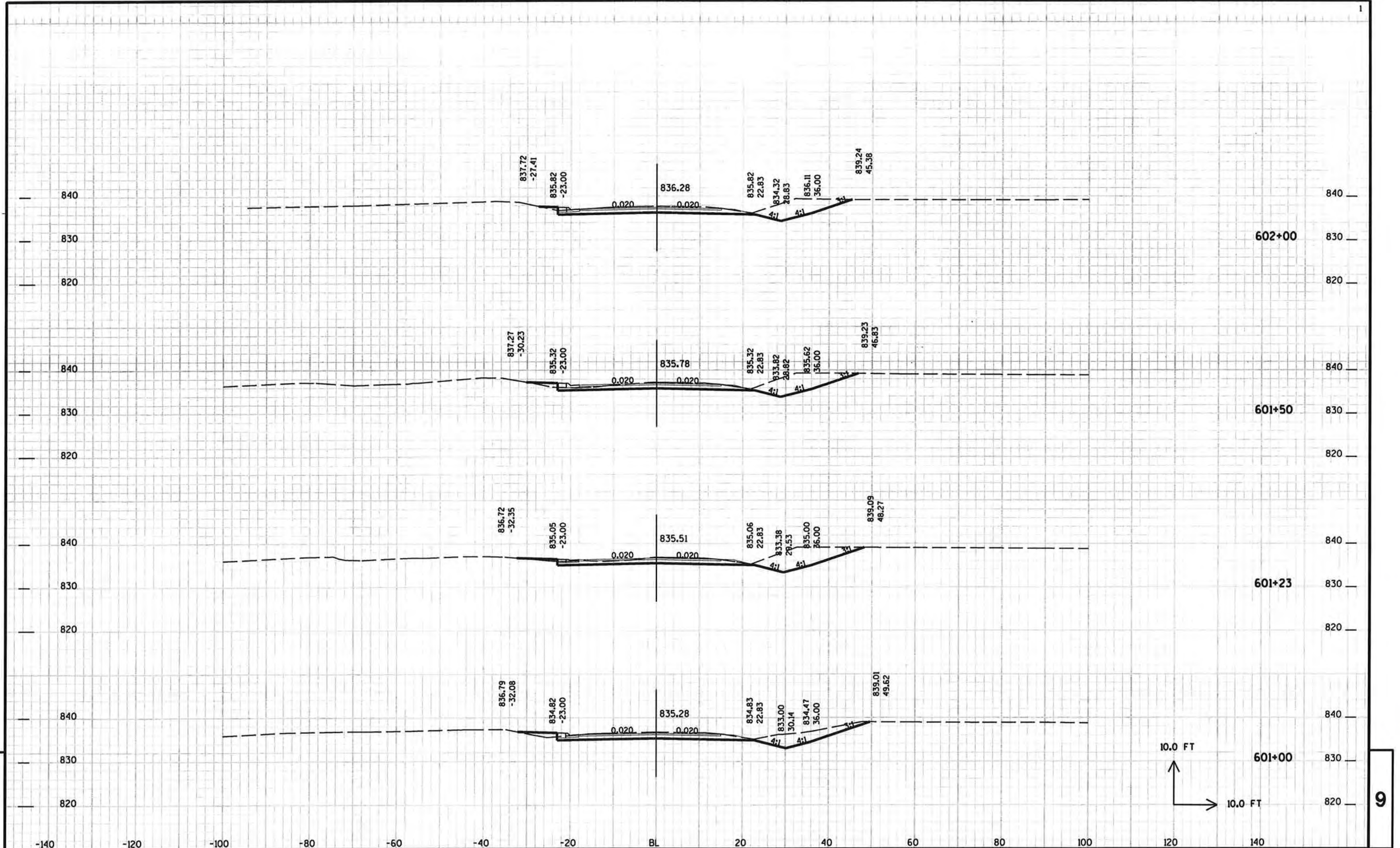


PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH GG SHEET 230

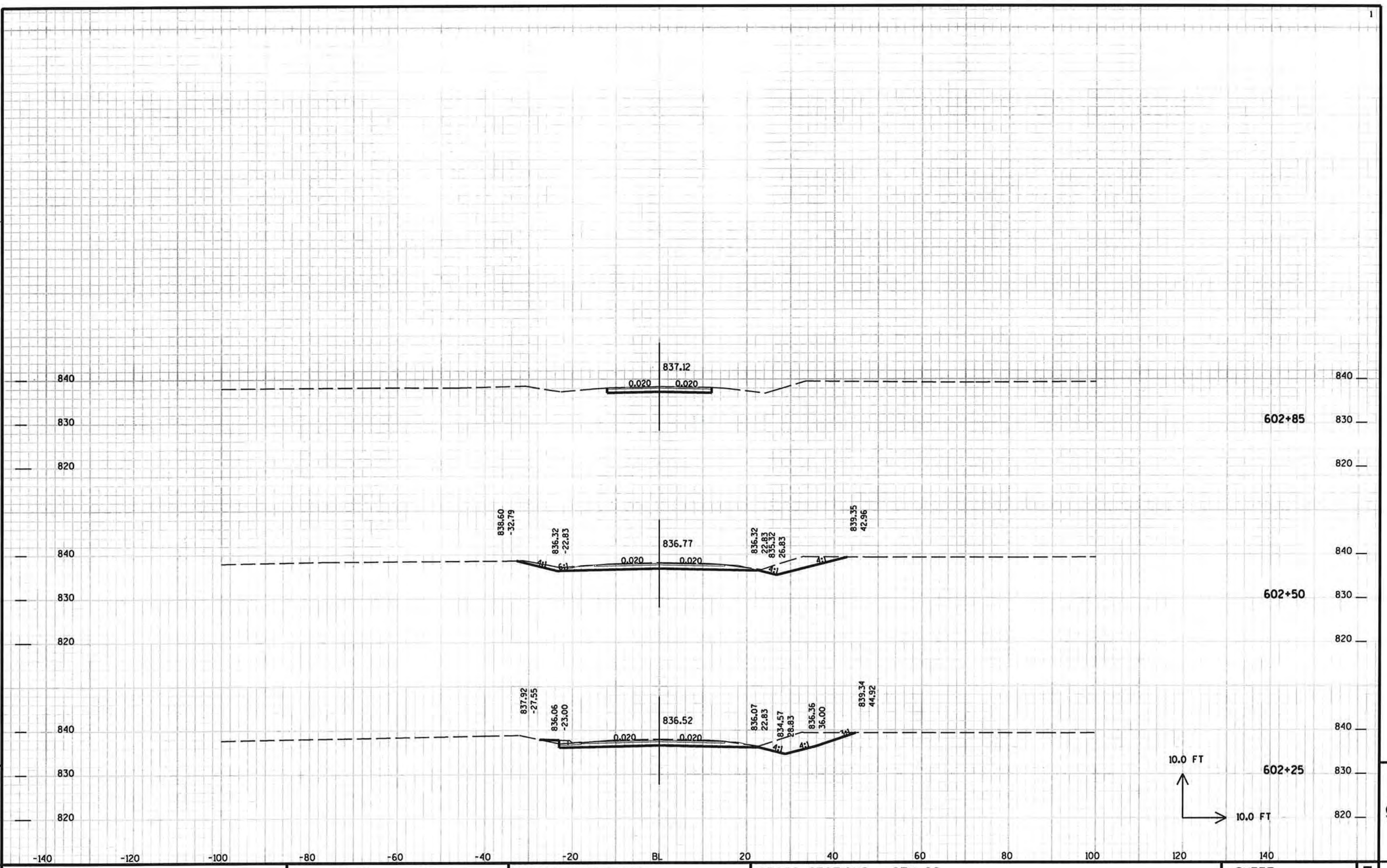


PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH GG SHEET 231 E





PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH GG SHEET 232



PROJECT NO: HWY: CTH T COUNTY: WINNEBAGO CROSS SECTIONS - CTH GG SHEET 233

