Index of Sheets

TOTAL SHEETS =

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

PLAN OF PROPOSED IMPROVEMENT

PRAIRIE RIVER BRIDGE AND APPROACHES

PRAIRIE DRIVE

TOWN ROAD

LINCOLN COUNTY

STATE PROJECT NUMBER
9860-03-70

STATE PROJECT	FEDERAL PROJECT	
	PROJECT	CONTRACT
9860-03-70	BRZ 3599(7)	1

FILE COPY

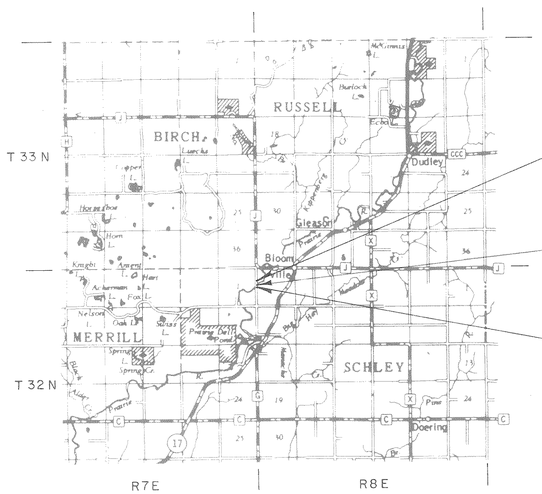
APR 04 1986

DONOHUE & ASSOC. INC.

Scales

5 FT. PLAN & PROFILE 50 FT.

5 FT. CROSS SECTION 5 FT.



END PROJECT
STA. 24+00

STRUCTURE B-35-92

BEGIN PROJECT
STA. 18+00

N- 530,300 (±100')
E- 2,116,250 (±100')

Layout

Scale 0 1 2 MI.

Total Net Length of Centerline = 0.114 Mi. Rural

Design Designation

A.D.T.	(1986)	= 40
A.D.T.	(2006)	= 60
D.H.V.	(2006)	= 9
D.		= 50% — 50%
T.		= 6% ADT
V.		= 30 MPH

Conventional Signs

County Line		Caution Symbol (Combustible fluids under pressure)	CAUTION
Township or Range Line		Railroads	
Section Line		Fence	(TYPE)
Corporate or City Limits		Culverts in Place	
Property line		Culverts Required	
Lot Line		Power Pole	
Existing Right of Way Line		Telephone or Telegraph Pole	
New Right of Way Line		Right of Way Markers	
Base or Survey Line		Marsh	
Slope Intercept		Wooded Area	
Existing Roadway or Private Entrance		Grade Elevation	

NOTE: ALL COORDINATES SHOWN ON THIS PLAN ARE BASED ON THE WISCONSIN COORDINATE SYSTEM CENTRAL ZONE AND ARE SCALED FROM U.S.G.S. TOPOGRAPHIC MAP, GLEASON WISCONSIN QUADRANGLE, FOR IDENTIFICATION ONLY.

ELEVATIONS SHOWN ON THIS PLAN ARE REFERENCED TO U.S.C. & G.S. DATUM.

APPROVED FOR SCHLEY TOWNSHIP

2/12/86 Date — Chairman

APPROVED FOR LINCOLN COUNTY

2/19/86 Date — Commissioner

ORIGINAL PLANS PREPARED BY

Donohue
Engineers & Architects

WISCONSIN
KENNETH A. OJA
E-14036
WISCONSIN RAPIDS
WISCONSIN
PROFESSIONAL ENGINEER

2/10/86 Date

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

Surveyor Donohue & Assoc., Inc. District Checker D.O.K.

Designer Donohue & Assoc., Inc. C.O. Checker

District Supervisor R.J.S. C.O. Coordinator

Approved:

Date — District Transportation Director

Approved:

Date — Chief Design Engineer

Approved:

Date — Director of Development

U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION
REGION 5 WISCONSIN DIVISION

Approved

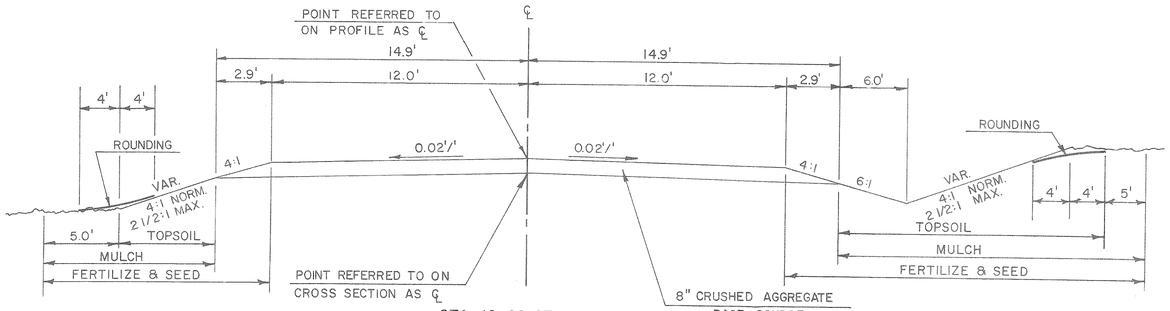
Date — Division Administrator

Cat No. 2130 - 0110

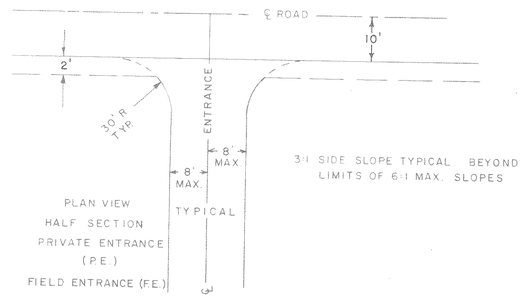
FINAL PLANS
4-4-86

STATE PROJECT NUMBER	SHEET NO.
9860-03-70	

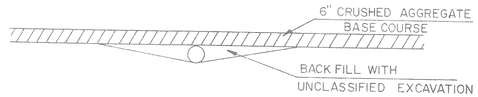
TYPICAL SECTIONS, GENERAL NOTES, UTILITIES, STANDARD ABBREVIATIONS, AND APPLICABLE STANDARD DETAIL DRAWINGS.



STA. 18+00-STA. 24+00
TYPICAL SECTION



PLAN OF ENTRANCES



PROFILE OF ENTRANCES

STANDARD ABBREVIATIONS

A.D.T.	AVERAGE DAILY TRAFFIC	NORM.	NORMAL
BIT.	BITUMINOUS	P.C.	POINT OF CURVATURE
B.M.	BENCH MARK	P.E.	PRIVATE ENTRANCE
℄	CENTERLINE	P.I.	POINT OF INTERSECTION
C.P.	CULVERT PIPE	P.L.	PROPERTY LINE
C.Y.	CUBIC YARD	P.T.	POINT ON TANGENCY
CWT.	HUNDREDWEIGHT	R	RADIUS
D	DEGREE OF CURVE	R.C.C.P.	REINFORCED CONCRETE CULVERT PIPE
△	DELTA ANGLE		
D.H.V.	DESIGN HOUR VOLUME	REQ'D	REQUIRED
DIA.	DIAMETER	RT.	RIGHT
D.	DIRECTIONAL SPLIT	R/W	RIGHT-OF-WAY
E.	EAST	RD.	ROAD
EL.	ELEVATION	S.	SOUTH
EXC.	EXCAVATION	S.Y.	SQUARE YARD
'/',FT./FT.	FOOT PER FOOT	STA.	STATION
IN.	INCH	S.E.	SUPERELEVATION
LBS.	POUNDS	℄	SURVEY LINE
LT.	LEFT	T	TANGENT
L	LENGTH OF CURVE	T.	PERCENT TRUCK TRAFFIC
L.F.	LINEAR FOOT	TYP.	TYPICAL
ℳ	MATCH LINE	UNCL.	UNCLASSIFIED
MAX.	MAXIMUM	V.	DESIGN SPEED
MI.	MILE	V.C.	VERTICAL CURVE
M.P.H.	MILES PER HOUR	VAR.	VARIABLE
N.	NORTH	W.	WEST

QUANTITIES

TOPSOIL, MULCHING, FERTILIZER, SEEDING AND EROSION BALES

STATION	TO	STATION	TOPSOIL S.Y.	MULCHING S.Y.	FERTILIZER TYPE B CWT.	SEEDING NO.1 LBS.	EROSION BALES EACH
18 + 00	-	20 + 22	515	743	0.7	17	-----
21 + 20	-	24 + 00	775	1057	0.9	23	-----
UNDISTRIBUTED			----	----	---	--	15
OBLITERATING OLD ROAD			500	500	0.4	10	-----

CULVERT PIPE

STATION	LOCATION	DIA. IN.	LENGTH L.F.	TYPE	R.C.C.P. CLASS	THICKNESS STEEL IN.	THICKNESS ALUMINUM IN.	END TREATMENT APRON ENDWALLS
19 + 65	P.E. RT.	18	34	C.P.	III	0.064	0.060	2
22 + 25	P.E. LT.	18	36	C.P.	III	0.064	0.060	2

SILT FENCE

STATION	TO	STATION	LOCATION	L.F.
18 + 50	-	19 + 40	LT.	90

OBLITERATING OLD ROAD

STATION	TO	STATION	STATIONS
19+00	-	20+75	2

CRUSHED AGGREGATE BASE COURSE

STATION	TO	STATION	LOCATION	C.Y.
18 + 00	-	20 + 22	℄	184*
21 + 20	-	24 + 00	℄	232*
19 + 65			P.E. RT.	14
22 + 25			P.E. LT.	10

*25% COMPACTION FACTOR USED

CLEARING AND GRUBBING

STATION	TO	STATION	STATIONS CLEARING	STATIONS GRUBBING
18 + 50	-	20 + 50	2	2
21 + 00	-	22 + 00	1	1

SODDING

STATION	TO	STATION	LOCATION	SODDING S.Y.	REMARKS
20 + 00			RT.	9	1 DITCH CHECK
21 + 60	-	22 + 00	LT.	25	LINE DITCH
22 + 50	-	24 + 00	RT.	20	3 DITCH CHECKS
22 + 50	-	24 + 00	LT.	20	3 DITCH CHECKS
19 + 65			P.E. RT.	8	AT ENDWALLS
22 + 25			P.E. LT.	8	AT ENDWALLS
UNDISTRIBUTED				20	AT WINGWALLS

APPLICABLE STANDARD DETAIL DRAWINGS

8E8-1	TYPICAL INSTALLACTION OF EROSION BALES
8E9-2	SILT FENCE
8E4-2	SOD OR MASONRY AND SOD DITCH CHECKS
8F1-9	APRON ENDWALLS FOR CULVERT PIPE AND PIPE ARCHES
12A3-4	NAME PLATE - STRUCTURES
15C1-7	CONSTRUCTION BARRICADES AND STANDARD SIGNS

GENERAL NOTES

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

NO TREES OR SHRUBS ARE TO BE REMOVED UNLESS SUCH TREES OR SHRUBS HAVE FIRST BEEN INDICATED FOR REMOVAL BY THE ENGINEER IN THE FIELD.

ALL DISTURBED AREAS, EXCEPT THE AREA BETWEEN THE FINISHED SHOULDER POINTS, ARE TO BE MULCHED, SEEDED, AND FERTILIZED AS DIRECTED BY THE ENGINEER.

EROSION BALES TO BE PLACED AS DIRECTED BY THE ENGINEER.

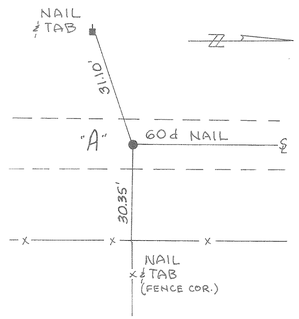
EXACT SIZE AND LOCATION OF ENTRANCES SHALL BE DETERMINED BY THE ENGINEER IN THE FIELD.

WHEN THE QUANTITY OF BASE COURSE IS MEASURED FOR PAYMENT BY THE CUBIC YARD OR TON, THE DEPTH OF THICKNESS OF THE COURSE AS SHOWN ON THE PLANS IS APPROXIMATE AND THE ACTUAL THICKNESS WILL DEPEND UPON THE DISTRIBUTION OF THE MATERIAL AS DIRECTED BY THE ENGINEER.

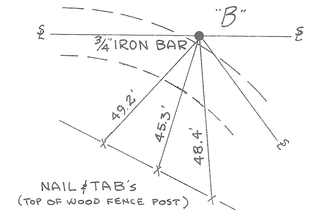
PUBLIC UTILITIES

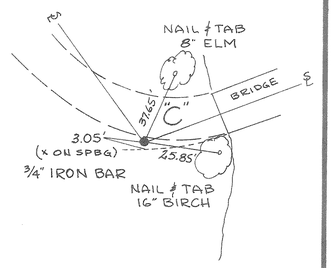
WISCONSIN PUBLIC SERVICE CORP.
300 EAST 2ND STREET
MERRILL, WI 54452
ATTENTION: MR. D. W. KOLL
TELEPHONE: (715) 536-5541

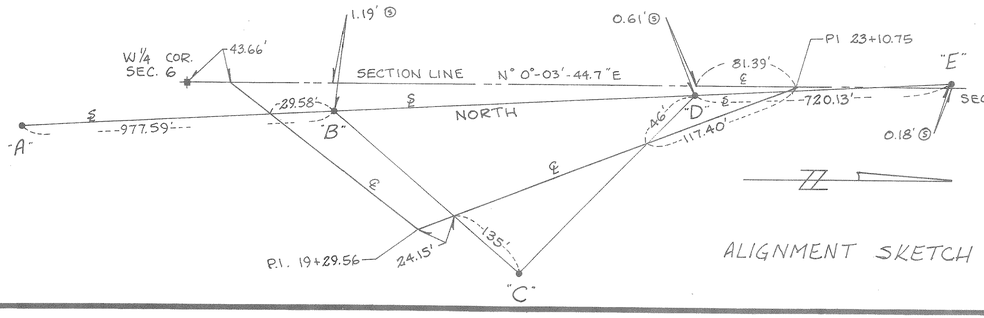
GLEASON TELEPHONE CO.
HAWKINS, WI 54530
ATTENTION: MR. WILMER AHRENHOLZ
TELEPHONE: (715) 585-6301



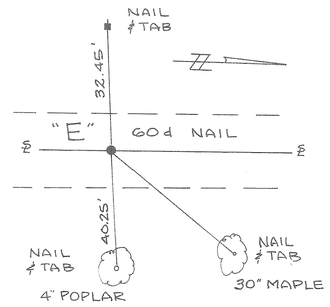
ALIGNMENT TIES

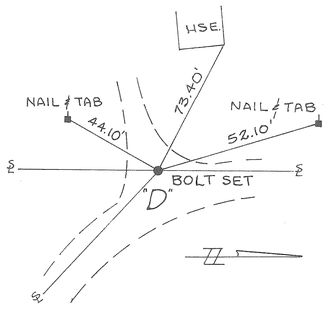






ALIGNMENT SKETCH





SCHEDULE OF LANDS AND INTERESTS REQUIRED

PARCEL NO.	OWNER	INTEREST REQUIRED	TOTAL ACRES	R/W ACRES REQUIRED NEW	EXISTING	TOTAL	TOTAL ACRES REMAINING
1	LAWRENCE HUGI & CARMEN HUGI	FEE	80.00 AC.	.037 AC.	0.34 AC.	0.71 AC.	79.29 AC.

* ACQUIRED IN THE NAME OF TOWN OF SCHLEY

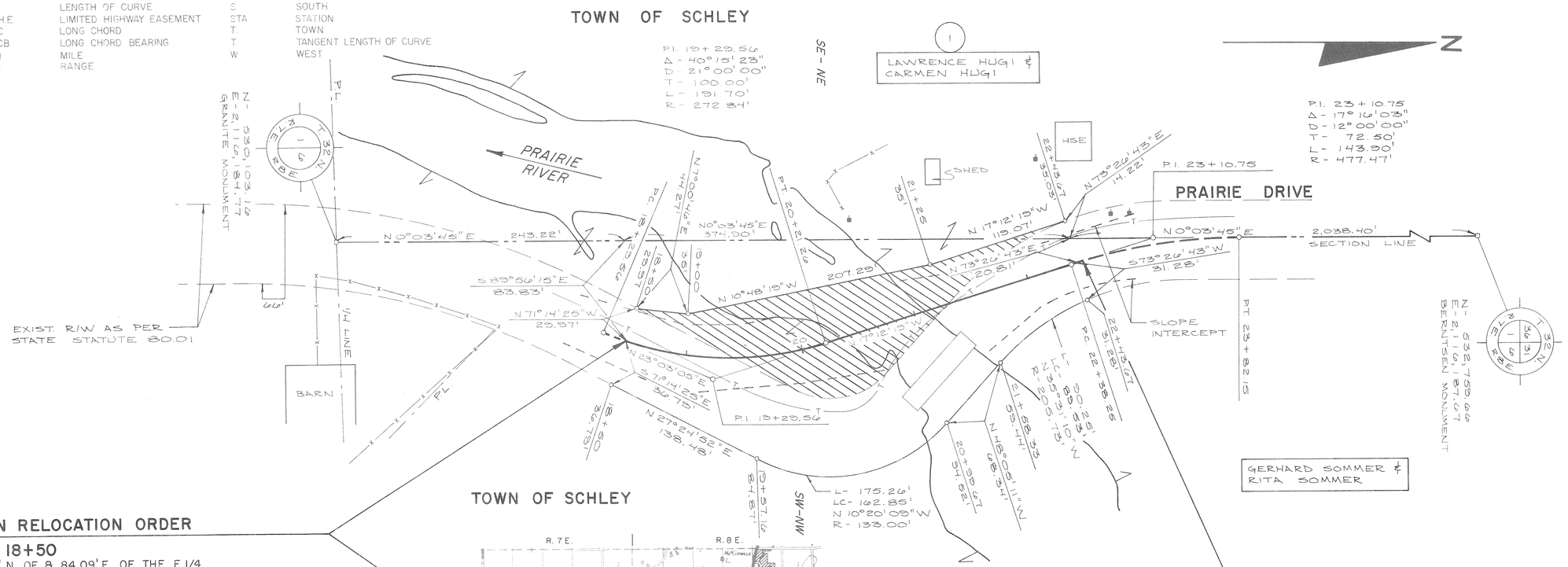
R/W PROJECT NUMBER	SHEET NUMBER	TOTAL SHEETS
9860-03-70	4.0	
FEDERAL PROJECT NUMBER		

PLAT OF RIGHT OF WAY REQUIRED FOR
PRAIRIE RIVER BRIDGE AND APPROACHES
PRAIRIE DRIVE
TOWN ROAD
LINCOLN COUNTY
SCALE 0 25 50 100 FT.

Conventional Signs and Abbreviations

- SECTION LINE
- QUARTER LINE
- TOWNSHIP AND RANGE LINE
- PROPOSED OR NEW CENTERLINE
- PROPOSED OR NEW R/W LINE
- EXISTING R/W LINE
- P.L. PROPERTY LINE
- SLOPE INTERCEPTS
- LIMITED HIGHWAY EASEMENT
- R/W POINT
- FENCE
- SECTION OR QUARTER CORNER
- POWER POLE
- TELEPHONE PEDESTAL
- T UNDERGROUND TELEPHONE CABLE

AC.	ACRES			N	NORTH
ETUX	AND WIFE			P.C.	POINT OF CURVATURE
Δ	CENTRAL ANGLE			P.I.	POINT OF INTERSECTION
COR.	CORNER			P.T.	POINT OF TANGENCY
C.T.H.	COUNTY TRUNK HIGHWAY			R	RADIUS
D	DEGREE OF CURVE			R/W	RIGHT OF WAY
E	EAST			SEC.	SECTION
L	LENGTH OF CURVE			S	SOUTH
L.H.E.	LIMITED HIGHWAY EASEMENT			STA.	STATION
LC	LONG CHORD			T.	TOWN
LCB	LONG CHORD BEARING			T	TANGENT LENGTH OF CURVE
MI	MILE			W	WEST
R.	RANGE				



BEGIN RELOCATION ORDER

STA. 18+50
243.13' N. OF & 84.09' E. OF THE E 1/4 COR. OF SEC. 6, T. 32 N., R. 8 E.
N- 530,346.29
E-2,116,268.87

END RELOCATION ORDER

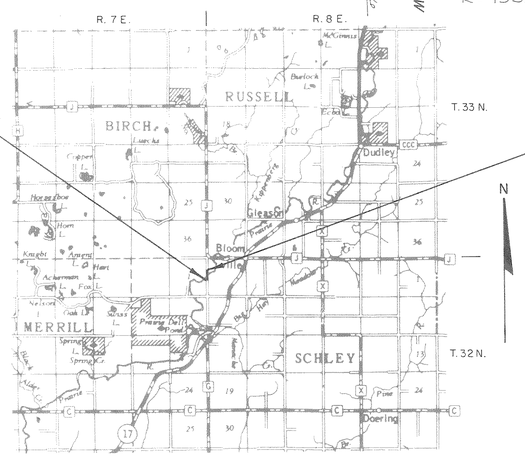
STA. 22+50
2,026.39' S. OF & 15.96' E. OF THE NW COR. OF SEC. 6, T. 32 N., R. 8 E.
N- 530,733.28
E-2,116,203.63

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

BEARING ORIENTATION

RIGHT-OF-WAY PLAT BEARINGS ARE ORIENTED TO THE WEST LINE OF SECTION 6, T. 32 N., R. 8 E., WITH THE BEARING ESTABLISHED AS N 0°03'45" E (ASSUMED). THE DIFFERENCE BETWEEN PLAT BEARINGS REPRESENTS PLANE ANGLES IN DEGRESS, MINUTES, AND SECONDS.

ALL COORDINATES SHOWN ON THIS PLAT ARE BASED ON THE WISCONSIN COORDINATE SYSTEM CENTRAL ZONE AND ARE SCALED FROM U.S.G.S. TOPOGRAPHIC MAP, GLEASON, WISCONSIN QUADRANGLE, FOR IDENTIFICATION ONLY.



LAYOUT
SCALE 0 1 2 MI.

TOTAL NET LENGTH OF CENTERLINE = 0.076 MI.

PLAT PREPARED BY
DONOHUE & ASSOCIATES, INC.
ENGINEERS & ARCHITECTS
PLOVER, WISCONSIN

WISCONSIN
ROBERT F. SCHMALZER
S-1760
STEVENS POINT
WI
LAND SURVEYOR

Robert F. Schmalzer
11/30/86
Date

APPROVED FOR TOWN OF SCHLEY BY:

2/19/86 Date — Town Chairman

DIVISION	DATE

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

Approved:
Date — District Transportation Director

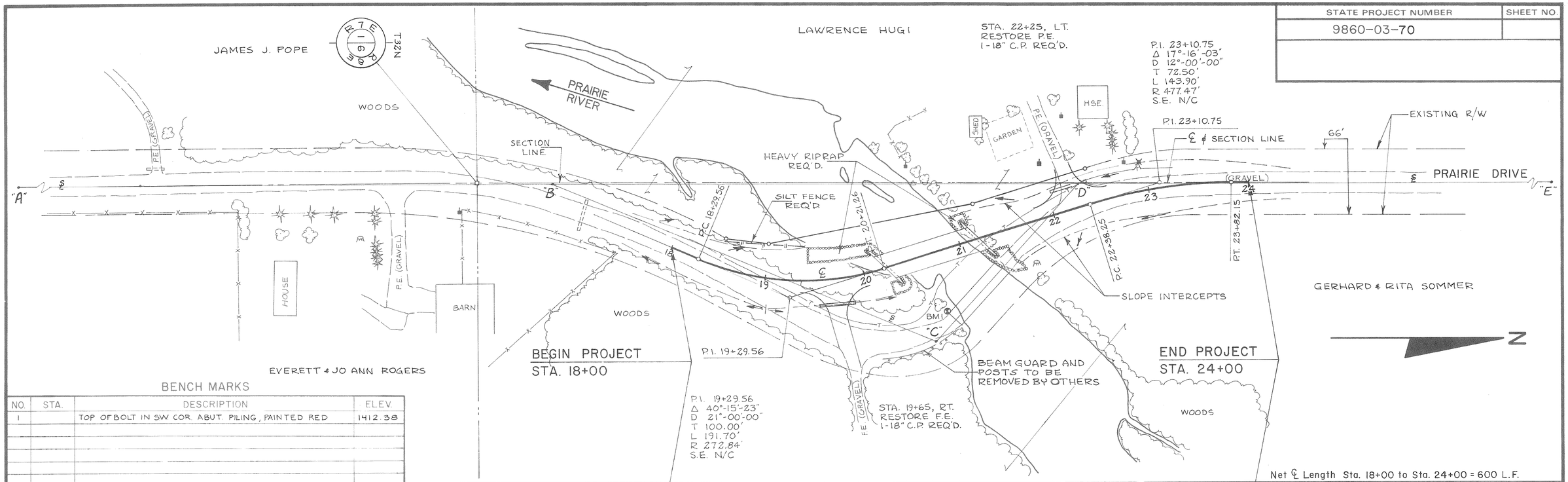
Approved:
Date — Bureau of Real Estate

U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION
WISCONSIN DIVISION

Approved:
Date — Division Administrator

Cat. No. 2130 – 0150

STATE PROJECT NUMBER	SHEET NO.
9860-03-70	



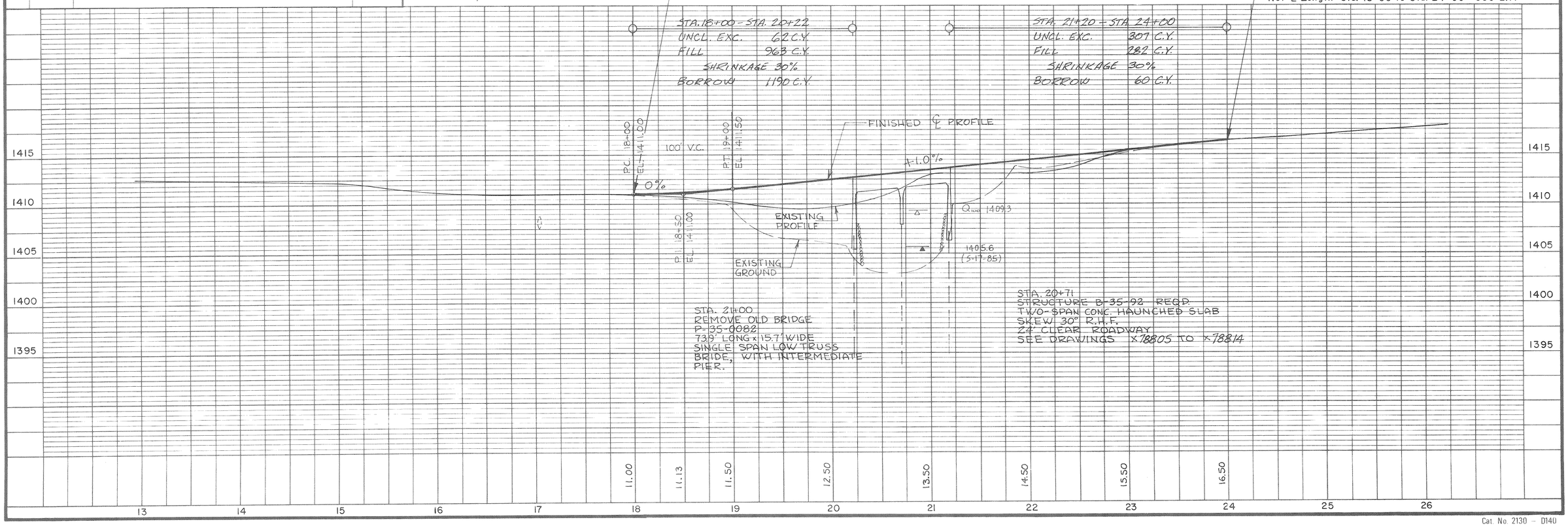
BENCH MARKS

NO.	STA.	DESCRIPTION	ELEV.
1		TOP OF BOLT IN SW COR. ABUT. PILING, PAINTED RED	1412.38

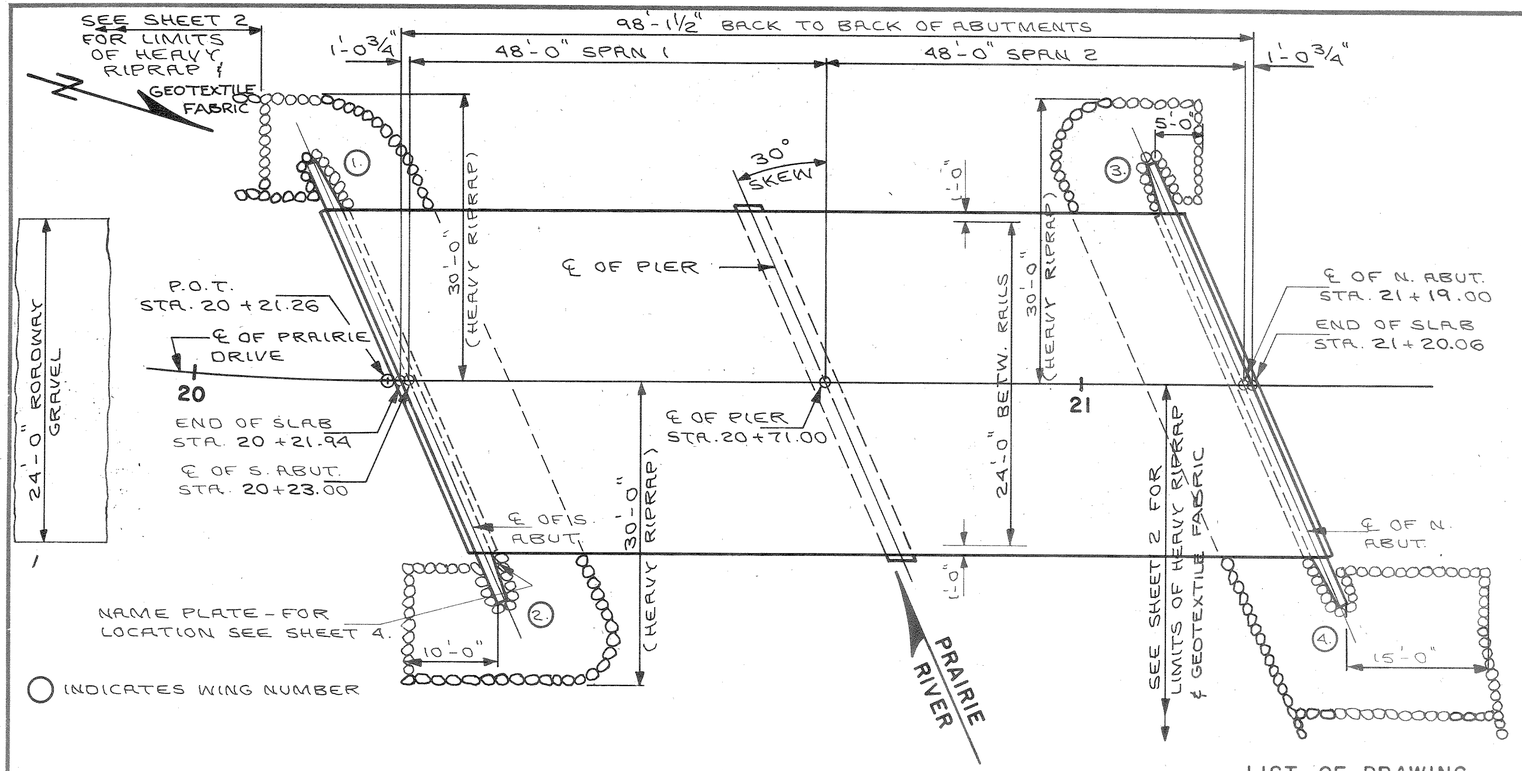
Net ℄ Length Sta. 18+00 to Sta. 24+00 = 600 L.F.

STA. 18+00 - STA. 20+22
UNCL. EXC. 62 C.Y.
FILL 963 C.Y.
SHRINKAGE 30%
BORROW 1190 C.Y.

STA. 21+20 - STA. 24+00
UNCL. EXC. 307 C.Y.
FILL 782 C.Y.
SHRINKAGE 30%
BORROW 60 C.Y.



STATE PROJECT NUMBER	SHEET NO.
9860-3-70	

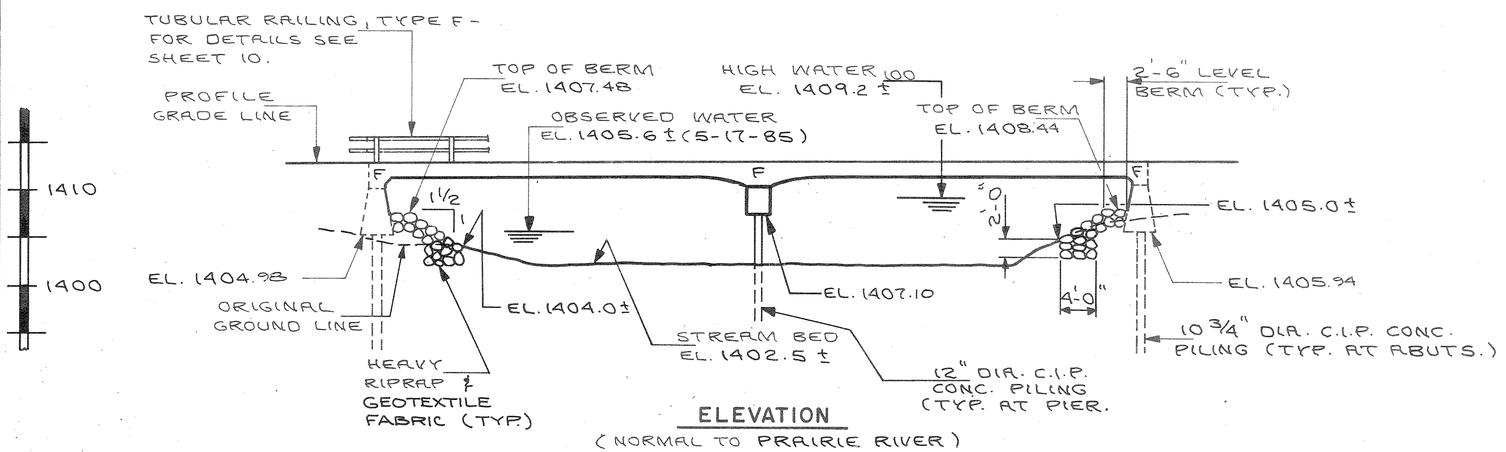


PLAN
(2 SPAN HAUNCHED SLAB)

NOTE: EXISTING STRUCTURE, P-35-82, IS LOCATED 60' ± UPSTREAM. (TO BE REMOVED)

BENCH MARK

NO	STA.	DESCRIPTION	ELEV.
1	-	TOP OF BOLT IN S.W. COR. RBUT. PILING, PRINTED RED	1412.38



ELEVATION
(NORMAL TO PRAIRIE RIVER)

LIST OF DRAWING

DESIGN DATA

LIVELOAD:
- DESIGN RATING: H-20
- INVENTORY RATING: HS-22
- OPERATIONAL RATING: HS-36
- STRUCTURE IS DESIGNED FOR A FUTURE WEARING SURFACE OF 20 POUNDS PER SQ. FT.

ALLOWABLE DESIGN STRESSES:
- CONCRETE MASONRY - SLAB — f'_c = 4,000 P.S.I.
- -ALL OTHER — f'_c = 3,500 P.S.I.
- HIGH-STRENGTH BAR STEEL REINFORCEMENT, GRADE 60 — f_y = 60,000 P.S.I.

FOUNDATION DATA:
ABUTMENTS TO BE SUPPORTED ON 10¾" DIA. C.I.P. CONC. PILING DRIVEN TO A MIN. BRG. VALUE OF 40 TONS PER PILE. PIERS TO BE SUPPORTED ON 12" DIA. C.I.P. CONC. PILING DRIVEN TO A MIN. BRG. VALUE OF 55 TONS PER PILE. EST. LENGTHS ARE: S. ABUT. - 50'-0"; PIER - 55'-0"; N. ABUT. - 40'-0".

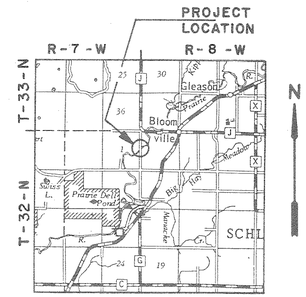
HYDRAULIC DATA:
100 YEAR FREQUENCY
- DRAINAGE AREA — 112.8 SQ. MI.
- Q 100 — 3,100 C.F.S.
- VELOCITY — 7.7 F.P.S.
- WATERWAY AREA — 400 SQ. FT.
- HIGH WATER 100 ELEVATION — 1409.2 ±
- ROAD OVERTOPPING NOT APPLICABLE

TRAFFIC DATA:
- A.D.T. (1986) = 40
- A.D.T. (2006) = 60
- DESIGN SPEED = 30 M.P.H.

CURVE DATA

P.I. = STA. 19+29.56
I. = (39°-44'-37"
Δ = 40°-15'-23"
T. = 100.00'
L. = 191.70'
E. = 17.75'
M. = 16.66'
C. = 187.78'
R. = 272.837'
D. = 21°-00'-00"
S.E. = NORMAL ROAD CROWN.

WISCONSIN JAMES R. LUCHT E-12787 MADISON WIS. PROFESSIONAL ENGINEER
James R. Lucht
april 1, 1986



LAYOUT

No.	Date	Revision	By

donohue & associates inc.
CONSULTING ENGINEERS
STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

PRAIRIE DRIVE OVER PRAIRIE RIVER

County LINCOLN		Town SCHLEY	
Design Spec. A.A.S.H.T.O. 1984		Load H-20	Const. Spec. WIS. 1981
Designed By MTH	Design Checked JRL	Drawn By LEN	Plans Checked JRL

Approved _____ State Bridge Engineer — Date _____

GENERAL PLAN

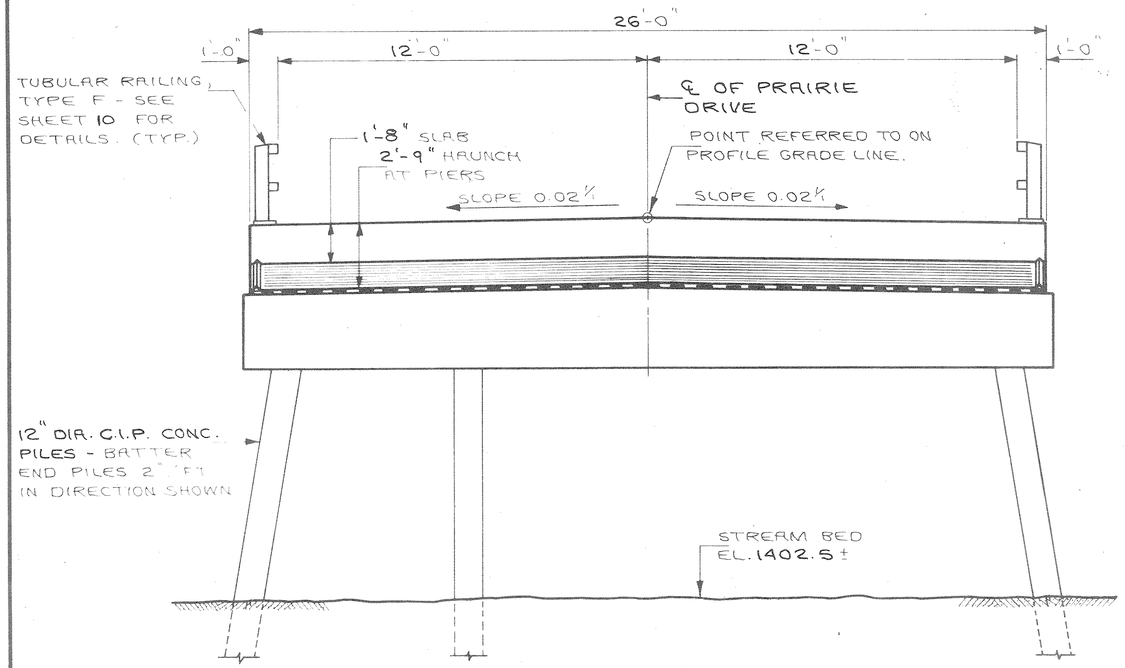
SHEET 1 OF 10

X 78805

D.A. 13997.500

Form F B 11 69

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	



CROSS SECTION THRU BRIDGE

(LOOKING NORTH)

TOTAL ESTIMATED QUANTITIES

BID ITEMS	UNIT	SOUTH ABUT	PIER	NORTH ABUT.	SUPER	TOTAL
REMOVING OLD BRIDGE, STATION 21 + 00	L.S.	—	—	—	—	1
EXCAVATION FOR STRUCTURES, BRIDGES B-35-92	L.S.	—	—	—	—	1
CONCRETE MASONRY, BRIDGES	C.Y.	19.3	10.8	19.3	172.6	222
HIGH-STRENGTH BAR STEEL REINFORCEMENT, BRIDGES	LBS.	1430	2320	1430	18,490	23,670
CAST-IN-PLACE CONCRETE PILING, DELIVERED AND DRIVEN, 10 3/4-INCH	L.F.	250	—	200	—	450
TUBULAR RAILING, TYPE F, STRUCTURE B-35-92	L.S.	—	—	—	—	1
HEAVY RIPRAP	C.Y.	120	—	55	—	175
CAST-IN-PLACE CONCRETE PILING, DELIVERED AND DRIVEN, 12-INCH	L.F.	—	330	—	—	330
COATED HIGH-STRENGTH BAR STEEL REINFORCEMENT	LBS.	—	—	—	11,650	11,650
PROTECTIVE SURFACE TREATMENT	GAL.	—	—	—	12	12
GEOTEXTILE FABRIC, TYPE HR	S.Y	175	—	80	—	255
STRUCTURE CARBON STEEL	LBS	—	—	—	300	300
NON-BID ITEMS						
FILLER	SIZE	—	—	—	—	1/2" & 3/4"
POLYVINYL CHLORIDE WATERSTOP	L.F.	36	—	36	—	72

GENERAL NOTES

DRAWINGS SHALL NOT BE SCALED.

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

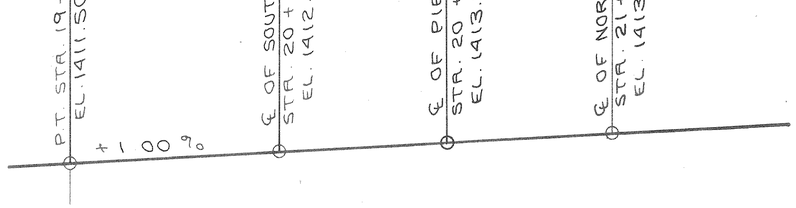
FILLER SHALL CONFORM TO A.A.S.H.T.O. DESIGNATION M153, TYPE I, II OR III OR M213.

THE FIRST DIGIT OF A THREE DIGIT MARK OR THE FIRST TWO DIGITS OF A FOUR DIGIT MARK SIGNIFIES THE BAR SIZE.

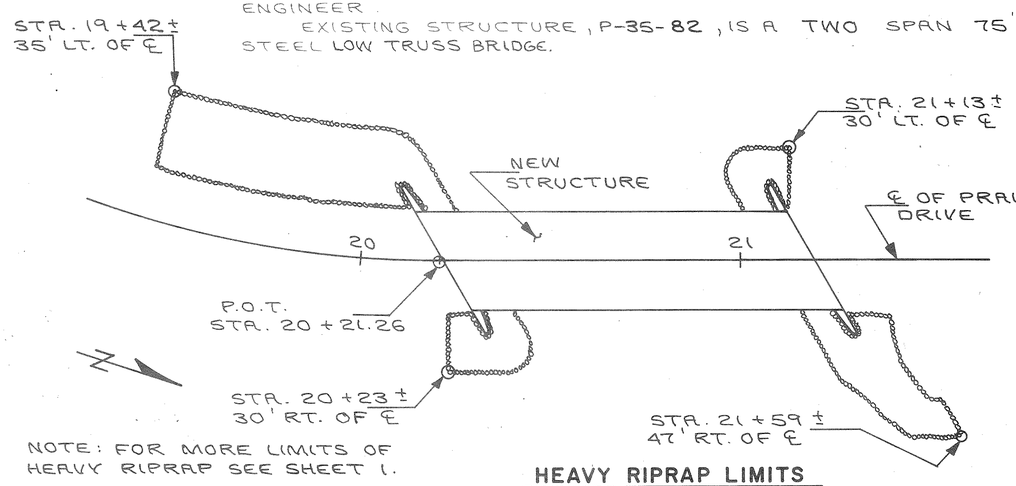
THE SLOPE OF THE FILL IN FRONT OF THE ABUTMENTS SHALL BE COVERED WITH HEAVY RIPRAP OVER GEOTEXTILE FABRIC TO THE LIMITS SHOWN BELOW, ON SHEET 1, ON THE ABUTMENT SHEETS OR AS DIRECTED BY THE ENGINEER.

SLAB FALSEWORK SHALL BE SUPPORTED ON PILES. ALTERNATE SUPPORT MAY BE PROVIDED SUBJECT TO THE APPROVAL OF THE ENGINEER.

EXISTING STRUCTURE, P-35-82, IS A TWO SPAN 75' LONG STEEL LOW TRUSS BRIDGE.



PROFILE GRADE LINE - PRAIRIE DRIVE



NOTE: FOR MORE LIMITS OF HEAVY RIPRAP SEE SHEET 1.

HEAVY RIPRAP LIMITS

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec. WIS. 1981	Drawn By LEN	Plans Checked JRL

GENERAL PLAN

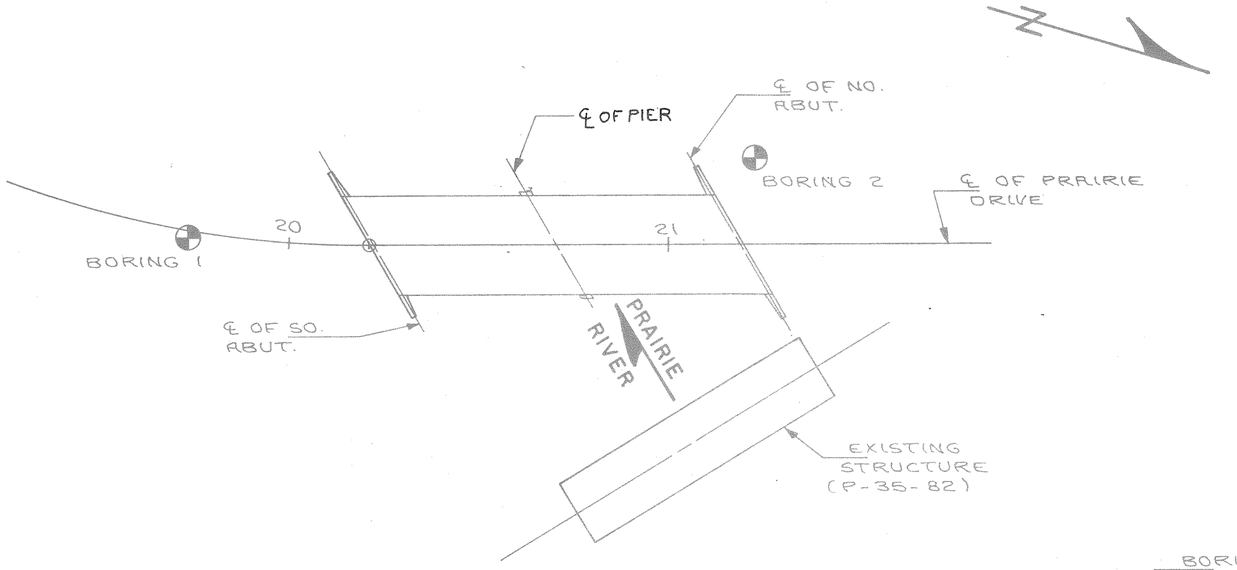
SHEET 2 OF 10

X 78806

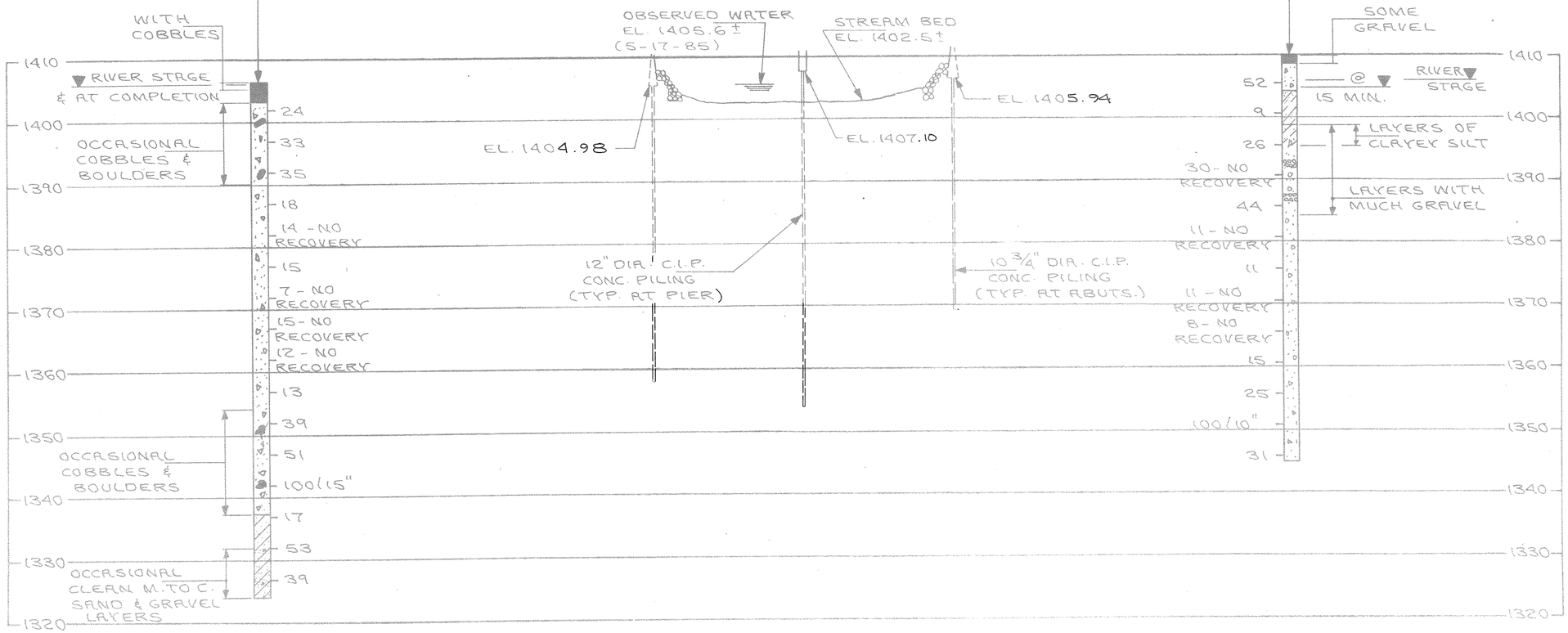
D.R. 13997.500

Form E B 12-69

SOIL BORINGS PERFORMED BY
SOILS & ENGINEERING SERVICES, INC.
1102 STEWART STREET
MADISON, WI. 53713
PERFORMED : 8-14-85



BORING 1, STA. 19+74 ±
2' ± RT. OF ℄, EL. 1406.2



BORING 2, STA. 21+23
23' LT. OF ℄, EL. 1410.0

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	

ABBREVIATIONS
F — Fine M — Medium C — Coarse
Ws — Weathered So — Sound

MATERIAL SYMBOLS
Topsoil, Silt, Sandstone
Sand, Peat, Limestone
Gravel, Clay, Igneous Rock

LEGEND OF PROBING
Probing No.
Sta.
Elevation
7 Average Blows Per Foot
Refusal 95/6
95/6=95 Blows for 6" Penetration
Probing taken with a 350# wt. Falling 18" on a 2" O. D. Point.

LEGEND OF BORING
Boring No.
Elev.
Sta.
Unconfined Strength — 7.7 / 7
Sandy Gravel
Blows Per Ft. Using 140# Wt. Falling 30"
F.
Boulders or Cobbles
Wash Sample
Sand
Shelby Tube — S. T.
Ground Water Elevation
Silty Clay
No Ground Water Observed Above This Elevation
So Limestone

Unless otherwise specified, the blows per foot at the locations indicated are based on driving a 2" O. D. x 1.4" I. D. split spoon sampler with a 140# hammer having a free fall of 30". The blow count is taken in undisturbed soil immediately below a cased or open hole eliminating side friction on the drive pipe.

SUBSURFACE EXPLORATION FOR FOUNDATION DESIGN AND BIDDERS INFORMATION

To obtain relative data concerning the character of material in and upon which the foundation might be built, borings and/or soundings were made at points approximately as indicated on this drawing. The data presented herein represents the findings of the subsurface explorations made. However, because the depths investigated are limited and the area of the borings and/or soundings is very small in relation to the entire area, the Division of Highways does not warrant conditions below the depths investigated or that the classification of material encountered in these investigations is necessarily typical of the entire site.

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec. WIS. 1981	Drawn By LEN	Plans Checked JRL

SUBSURFACE EXPLORATION

SHEET 3 OF 10

X 78807

DA 13997.500

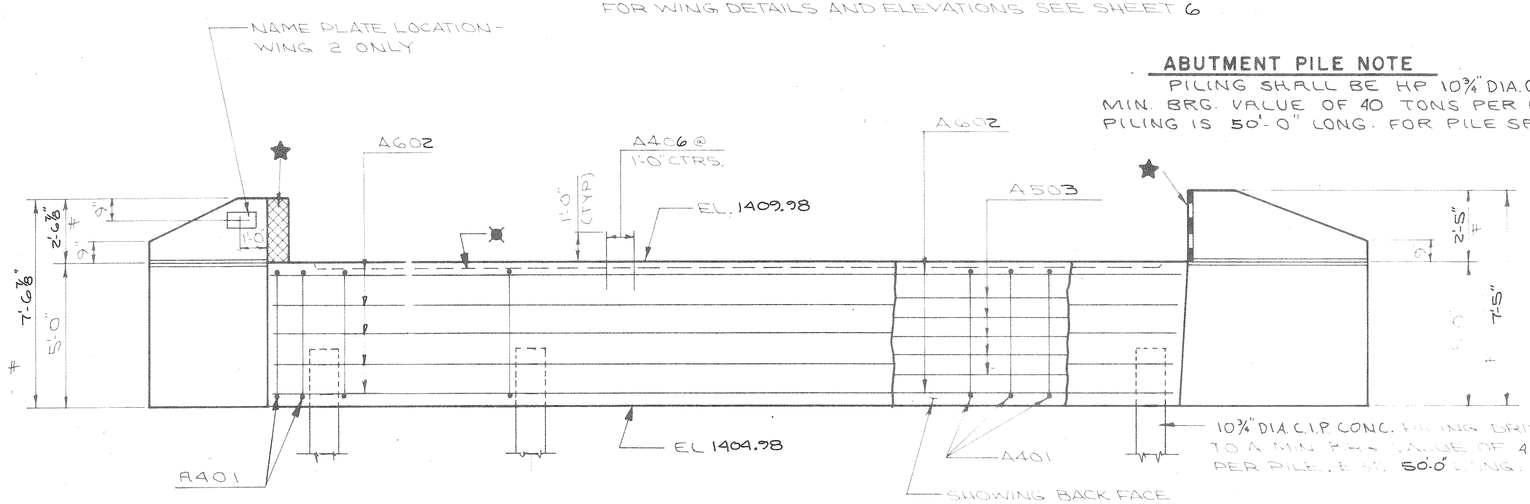
STATE PROJECT NUMBER	SHEET NO.
9860-3-70	

DIMENSIONS ARE GIVEN AT ABUTMENT BODY. FOR WING DETAILS AND ELEVATIONS SEE SHEET 6

NAME PLATE LOCATION - WING 2 ONLY

ABUTMENT PILE NOTE

PILING SHALL BE HP 10¾" DIA. C.I.P. CONC. PILING DRIVEN TO A MIN. BRG. VALUE OF 40 TONS PER PILE. ESTIMATED LENGTH OF PILING IS 50'-0" LONG. FOR PILE SPLICE SEE SHEET 6

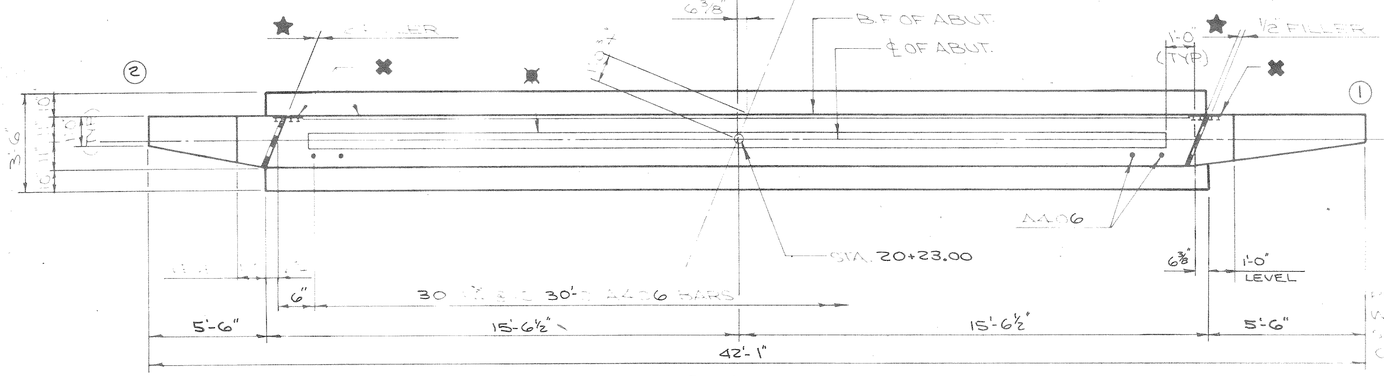


ELEVATION

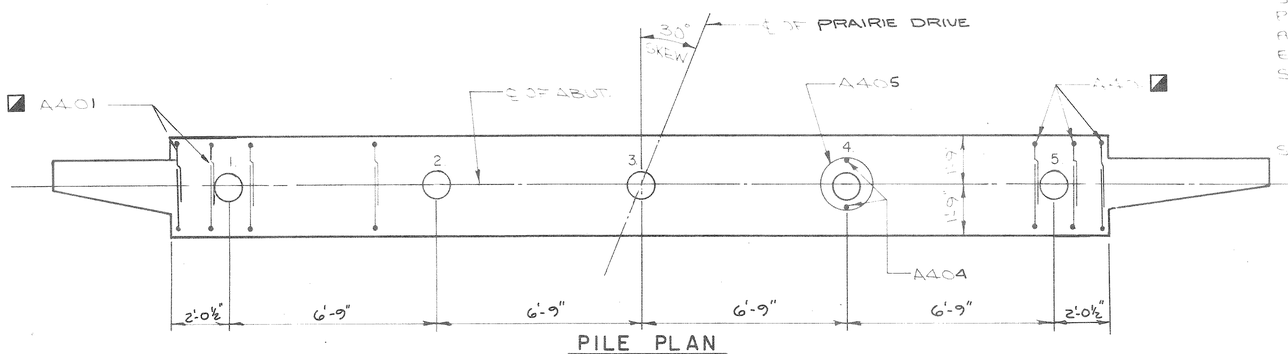
(LOOKING SOUTH)

THE A401 BARS SHALL BE SPACED AT 9" CTRS. IN THE OUTSIDE THIRDS OF BODY LENGTH AND AT 1'-6" CTRS. IN THE MIDDLE THIRD. ALL A401 BARS SHALL BE SPACED TO MISS THE PILES.

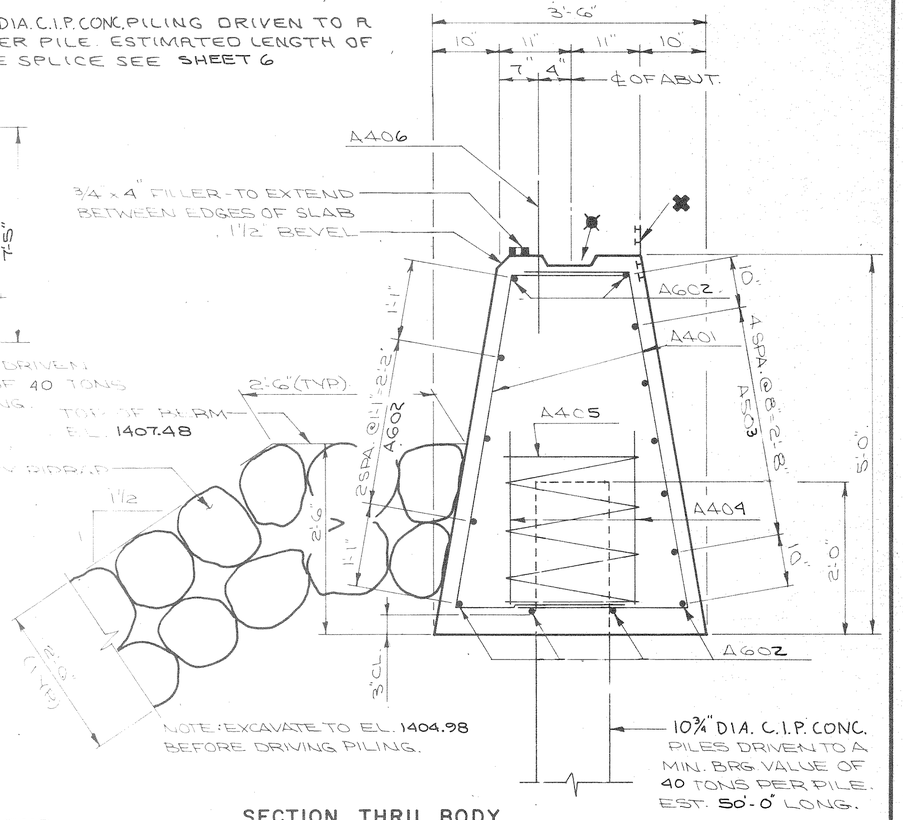
NOTE: A406 BARS MAY BE PLACED AFTER CONCRETE IS POURED, BUT BEFORE THE INITIAL SET HAS TAKEN PLACE.



PLAN



PILE PLAN



SECTION THRU BODY

LEGEND

★ ½" FILLER - TO EXTEND AS SHOWN. SEAL ALL EXPOSED HORIZONTAL AND VERTICAL SURFACES OF FILLER WITH NON-STAINING GRAY NON-BITUMINOUS JOINT SEALER (1" DEEP AND HOLD ⅛" BELOW SURFACE OF CONCRETE.)

✖ POLYVINYL CHLORIDE WATERSTOP (P.C.W.) - TO EXTEND HORIZONTAL BETWEEN WINGS AND VERTICAL FROM TOP OF ABUTMENT BODY TO TOP OF WING. (HOLD FLUSH WITH FACE OF CONCRETE.) FOR DETAIL SEE SHEET 6. P.C.W. SHALL BE BUTT-SPLICED, AT JUNCTIONS, BY USING A SPLICING IRON. PLACE A SEALER, SIMILAR TO THE ONE DESCRIBED ABOVE, BETWEEN THE ½" FILLER AND THE P.C.W. EXTENDING TO WITHIN 3" FROM THE GUTTER LINE. SEAL ALL VERT. ENDS WITH A SIMILAR SEALER.

▣ KEYED CONSTRUCTION JOINT FORMED BY A SURFACED, BEVELED 2" x 6".

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec. WIS. 1981	Drawn By LEN	Plans Checked JRL

SOUTH ABUTMENT

SHEET 4 OF 10

X78808

DA 13997,500

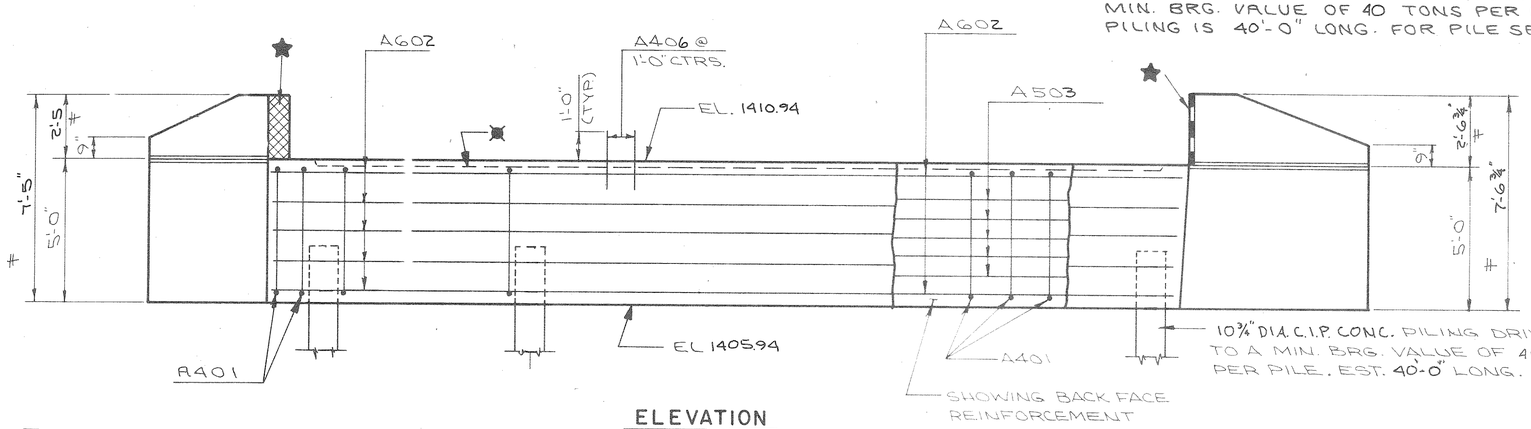
Form E-B-12-69

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	

DIMENSIONS ARE GIVEN AT ABUTMENT BODY.
FOR WING DETAILS AND ELEVATIONS SEE SHEET 6

ABUTMENT PILE NOTE

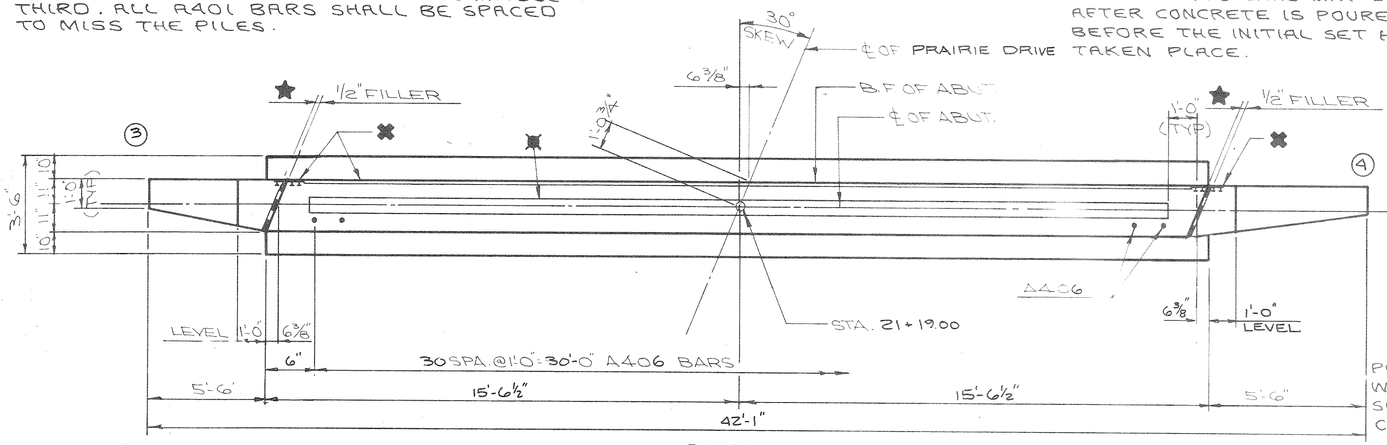
PILING SHALL BE HP 10¾" DIA. C.I.P. CONC. PILING DRIVEN TO A MIN. BRG. VALUE OF 40 TONS PER PILE. ESTIMATED LENGTH OF PILING IS 40'-0" LONG. FOR PILE SPLICE SEE SHEET 6



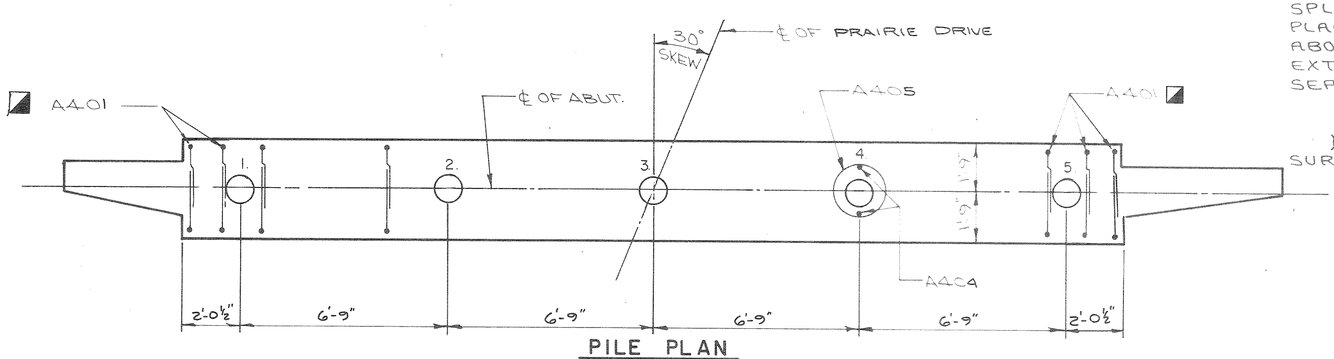
ELEVATION
(LOOKING NORTH)

■ THE A401 BARS SHALL BE SPACED AT 9" CTRS. IN THE OUTSIDE THIRD'S OF BODY LENGTH AND AT 1'-6" CTRS. IN THE MIDDLE THIRD. ALL A401 BARS SHALL BE SPACED TO MISS THE PILES.

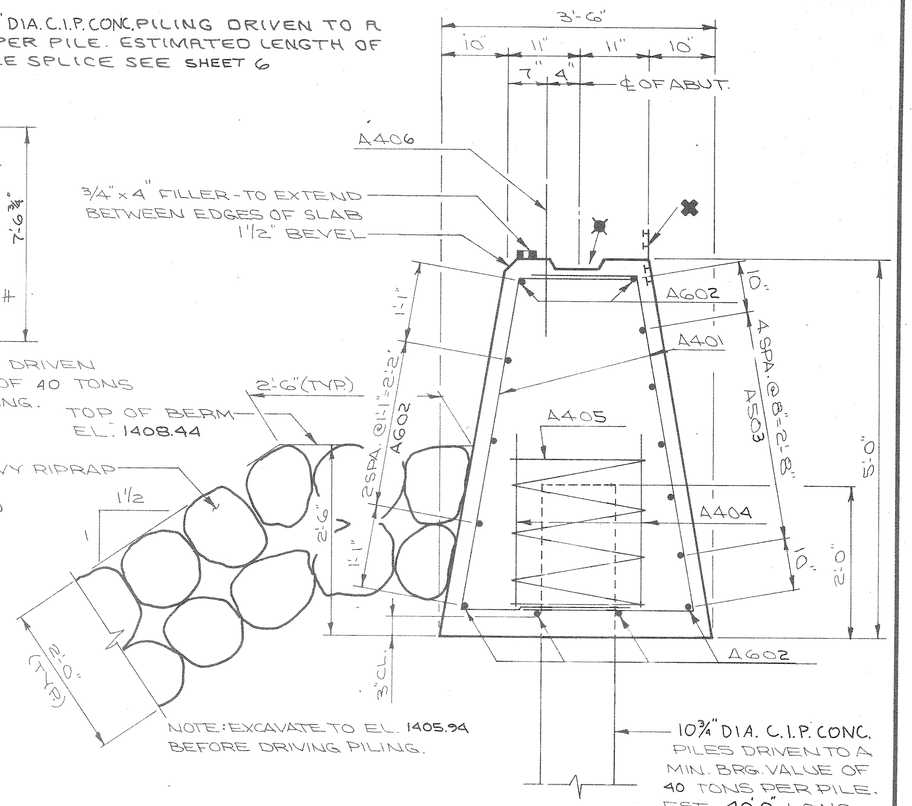
NOTE: A406 BARS MAY BE PLACED AFTER CONCRETE IS POURED, BUT BEFORE THE INITIAL SET HAS TAKEN PLACE.



PLAN



PILE PLAN



SECTION THRU BODY

LEGEND

★ 1/2" FILLER - TO EXTEND AS SHOWN. SEAL ALL EXPOSED HORIZONTAL AND VERTICAL SURFACES OF FILLER WITH NON-STAINING GRAY NON-BITUMINOUS JOINT SEALER. (1" DEEP AND HOLD 1/8" BELOW SURFACE OF CONCRETE.)

✖ POLYVINYL CHLORIDE WATERSTOP (P.C.W.) - TO EXTEND HORIZONTAL BETWEEN WINGS AND VERTICAL FROM TOP OF ABUTMENT BODY TO TOP OF WING. (HOLD FLUSH WITH FACE OF CONCRETE.) FOR DETAIL SEE SHEET 6. P.C.W. SHALL BE BUTT-SPLICED, AT JUNCTIONS, BY USING A SPLICING IRON. PLACE A SEALER, SIMILAR TO THE ONE DESCRIBED ABOVE, BETWEEN THE 1/2" FILLER AND THE P.C.W. EXTENDING TO WITHIN 3" FROM THE GUTTER LINE. SEAL ALL VERT. ENDS WITH A SIMILAR SEALER.

▣ KEYED CONSTRUCTION JOINT FORMED BY A SURFACED, BEVELED 2" x 6".

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec. WIS. 1981	Drawn By LEN	Plans Checked JRL

NORTH ABUTMENT

SHEET 5 OF 10

X78809

DA13997.500

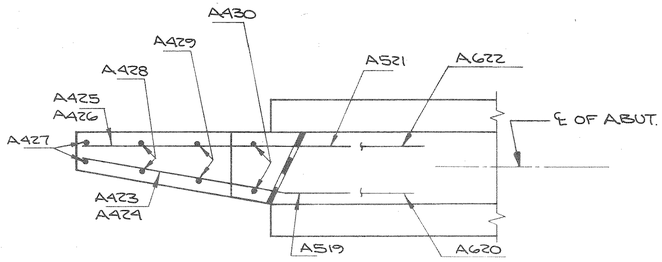
Form E-B-12-69

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	

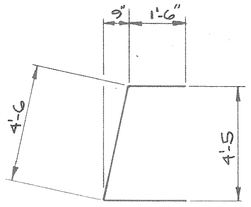
BILL OF BARS

BOTH ABUTMENTS ARE INCLUDED IN THIS BILL.
DIMENSIONS IN THE BENDING DETAILS ARE OUT TO OUT OF BAR.

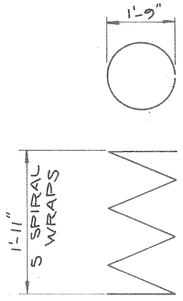
MARK	NO. REQ'D.	LENGTH	BENT	LOCATION	TOTAL WEIGHT = 2860 LBS.
A401	144	8-1	X	BODY - STIRRUPS	VERT
A602	18	32-0	X	" - F.F., BOTTOM, ½ TOP	HORIZ.
A503	10	30-8		" - B.F.	"
A404	20	2-3		" @ PILES - 2 PER PILE	VERT
A405	10	28-6	X	" @ " - 1 " " 5 SPIRAL WRAP	
A406	62	2-0		" - TOP - DOWELS	VERT
A507	10	7-9	X	WINGS 1 & 4 - F.F. - BOTTOM	HORIZ
A608	2	9-6	X	" " & " " - "	"
A509	10	6-10		" " & " B.F. - "	"
A610	2	8-7		" " & " " - "	"
A411	2	6-1		" " & " F.F. - TOP	"
A412	2	6-0	X	" " & " " - "	"
A413	2	5-3		" " & " B.F. - "	"
A414	2	5-2	X	" " & " " - "	"
A415	4	5-6		" " & " F.F. & B.F.	VERT.
A416	4	6-0		" " & " " & "	"
A417	4	6-6		" " & " " & "	"
A418	4	6-10		" " & " " & "	"
A519	10	6-10	X	WINGS 2 & 3 F.F. - BOTTOM	HORIZ.
A620	2	8-7	X	" " & " " - "	"
A521	10	6-10		" " & " B.F. - "	"
A622	2	8-7		" " & " " - "	"
A423	2	6-1		" " & " F.F. - TOP	"
A424	2	6-4	X	" " & " " - "	"
A425	2	5-2		" " & " B.F. - "	"
A426	2	5-4	X	" " & " " - "	"
A427	4	5-4		" " & " F.F. & B.F.	VERT.
A428	4	6-0		" " & " " & "	"
A429	4	6-6		" " & " " & "	"
A430	4	7-0		" " & " " & "	"



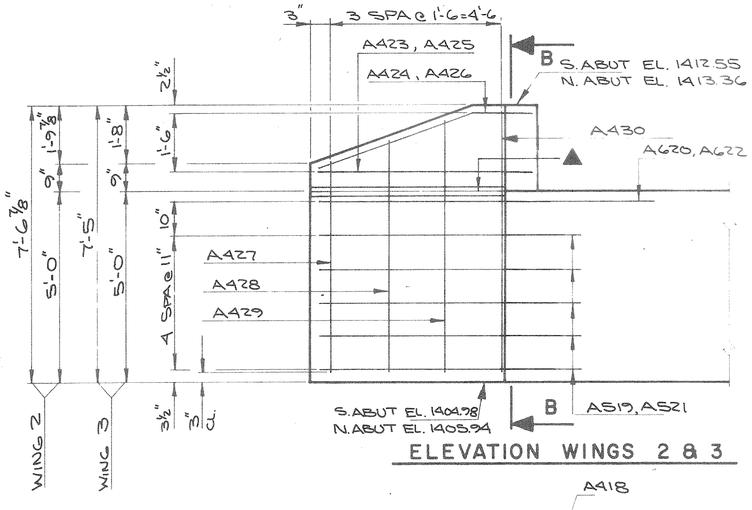
PLAN WINGS 2 & 3



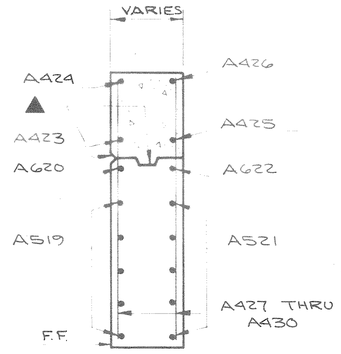
A401



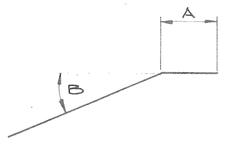
A406



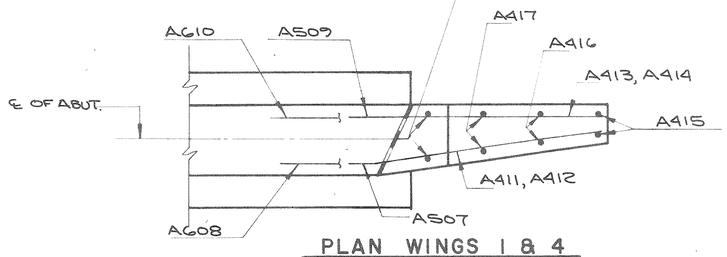
ELEVATION WINGS 2 & 3



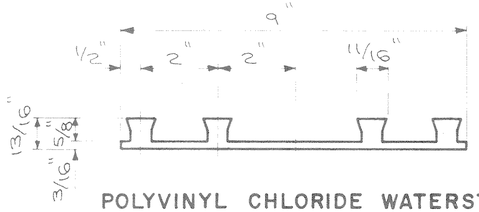
SECTION B



MARK	A	ANGLE B
A507	1-6	7°00'
A608	3-3	7°00'
A412	1-9	22°00'
A414	0-10	22°00'
A519	1-6	7°00'
A620	3-3	7°00'
A424	1-9	22°00'
A426	0-10	22°00'

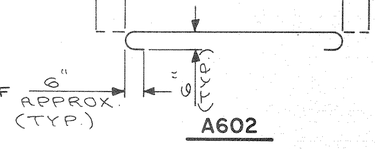


PLAN WINGS 1 & 4

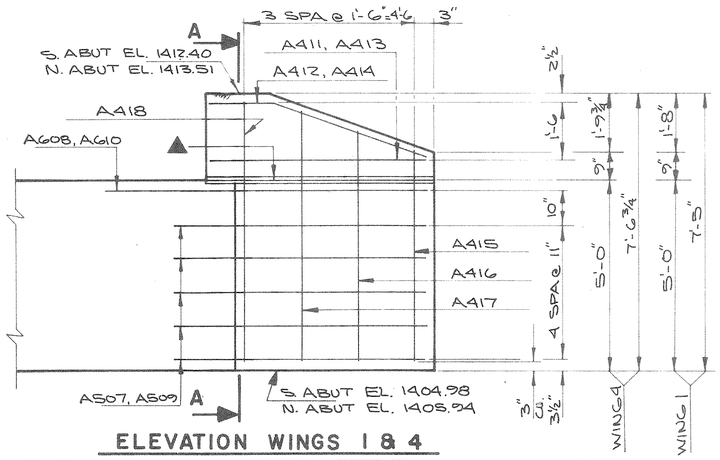


POLYVINYL CHLORIDE WATERSTOP

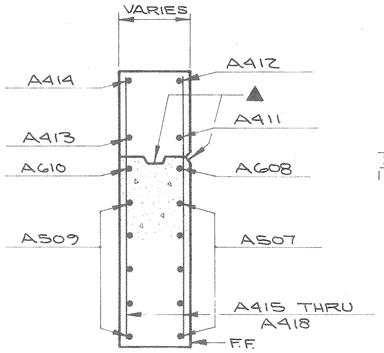
▲ OPTIONAL KEYED CONSTRUCTION JOINT AND ¾" "V" GROOVE. JOINT FORMED BY A SURFACED, BEVELED 2"x6". "V" GROOVE SHALL BE ON FRONT FACE OF WING WALL ONLY. OMIT "V" GROOVE IF JOINT IS NOT USED.



A602

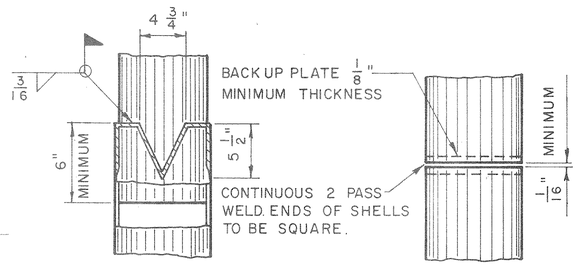


ELEVATION WINGS 1 & 4



SECTION A

NOTE: IF PILE SPLICES ARE REQUIRED, THE SPLICES SHALL BE MADE BY A CERTIFIED WELDER. PILE SHELL MATERIAL SHALL BE A.S.T.M. DESIGNATION A-252, GRADE 2 OR EQUAL.



FLUTED PILE PIPE PILE

PILE SPLICE DETAIL

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const Spec. WIS. 1981	Drawn By LEN	Plans Checked JRL

WING DETAILS

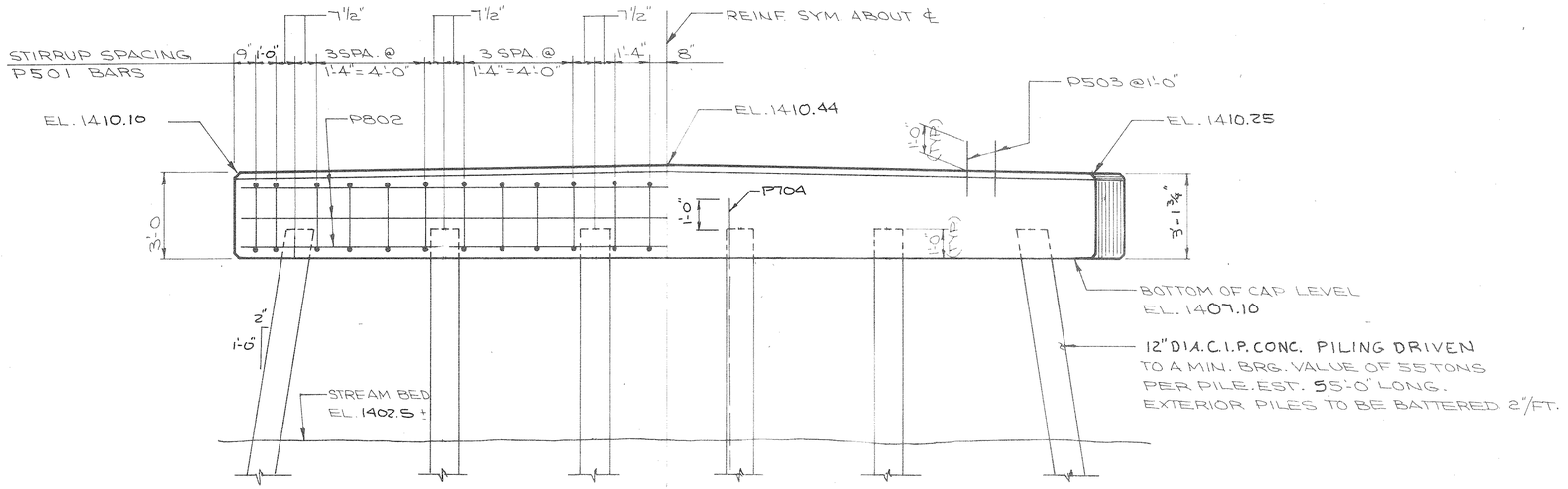
SHEET 6 OF 10

X78810

DA 13997.500

Form E-B 12-69

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	



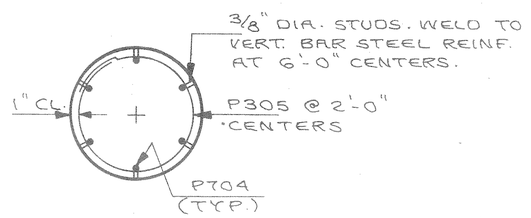
ELEVATION

LOOKING NORTH

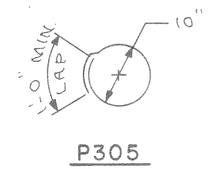
BILL OF BARS

MARK	NO REQ'D.	LENGTH	BENT	LOCATION — TOTAL WEIGHT= 2320 LBS.
P501	24	11-0	X	CAP - STIRRUPS
P802	10	30-7		" - TOP, MIDDLE & BOTTOM-HORIZ.
P503	30	2-0		" - DOWELS-VERT.
P704	36	15-0		PILE - VERTICAL
P305	42	3'-8	X	PILE - HORIZONTAL

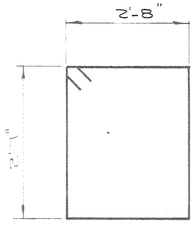
NOTES:
DIMENSIONS IN BENDING DETAILS ARE OUT TO OUT OF BAR.
FOR PILE SPLICE DETAIL SEE SHEET 6.
P503 BARS MAY BE PLACED AFTER CONCRETE IS POURED, BUT BEFORE INITIAL SET HAS TAKEN PLACE.



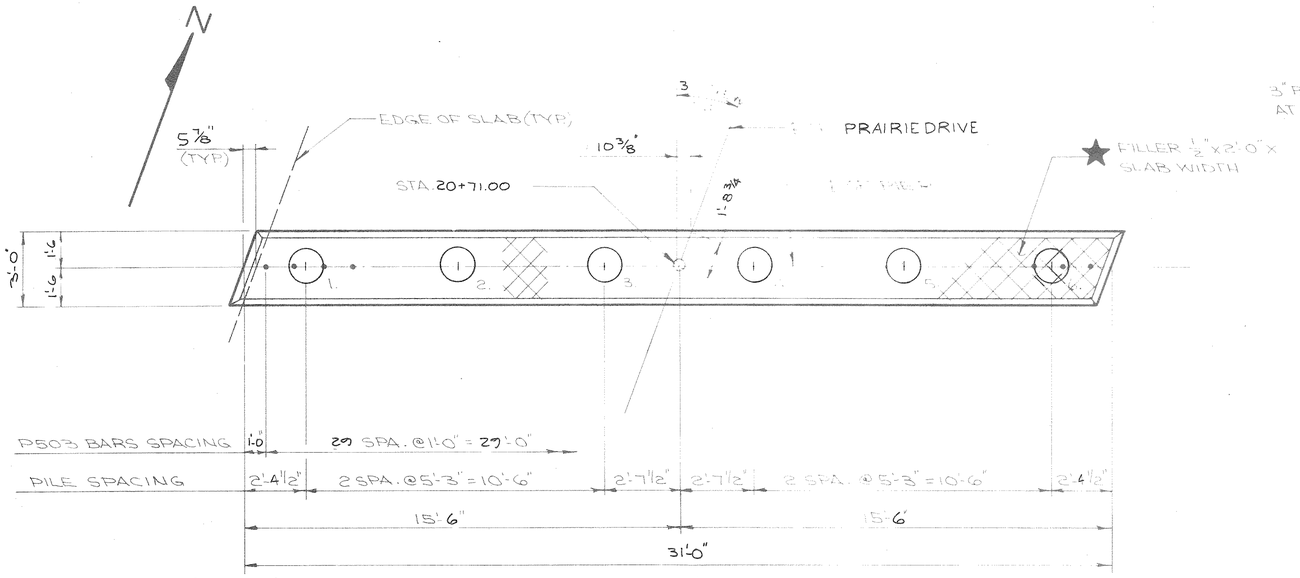
SECTION THRU PILING



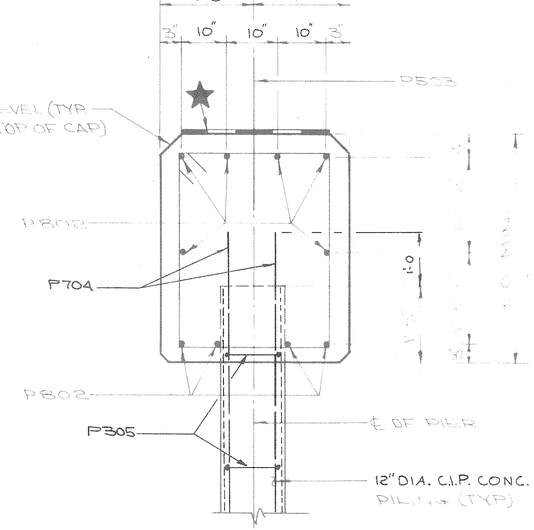
P305



P501



PLAN



SECTION THRU PIER CAP

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec.	Drawn By	Plans Checked
WIS. 1981	J.A.R.	JRL

PIER

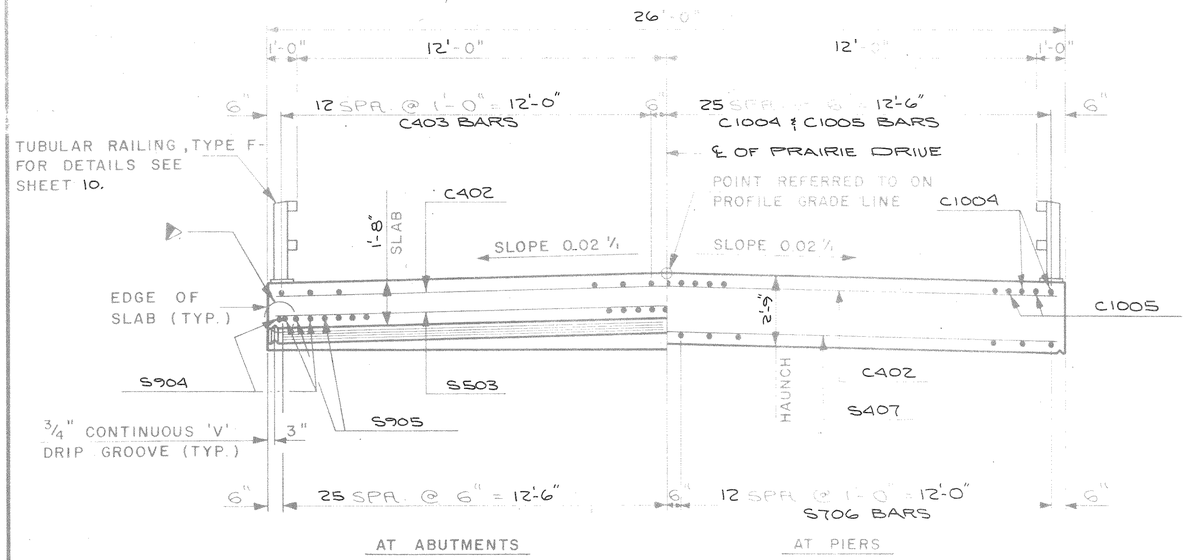
SHEET 7 OF 10

X78811

D.A. 13997.5

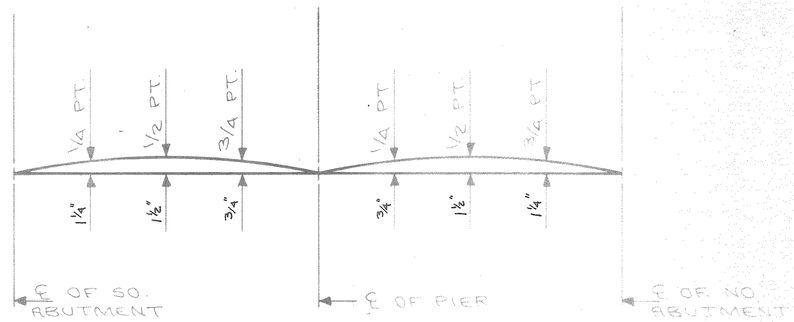
Form E 8-12-69

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	



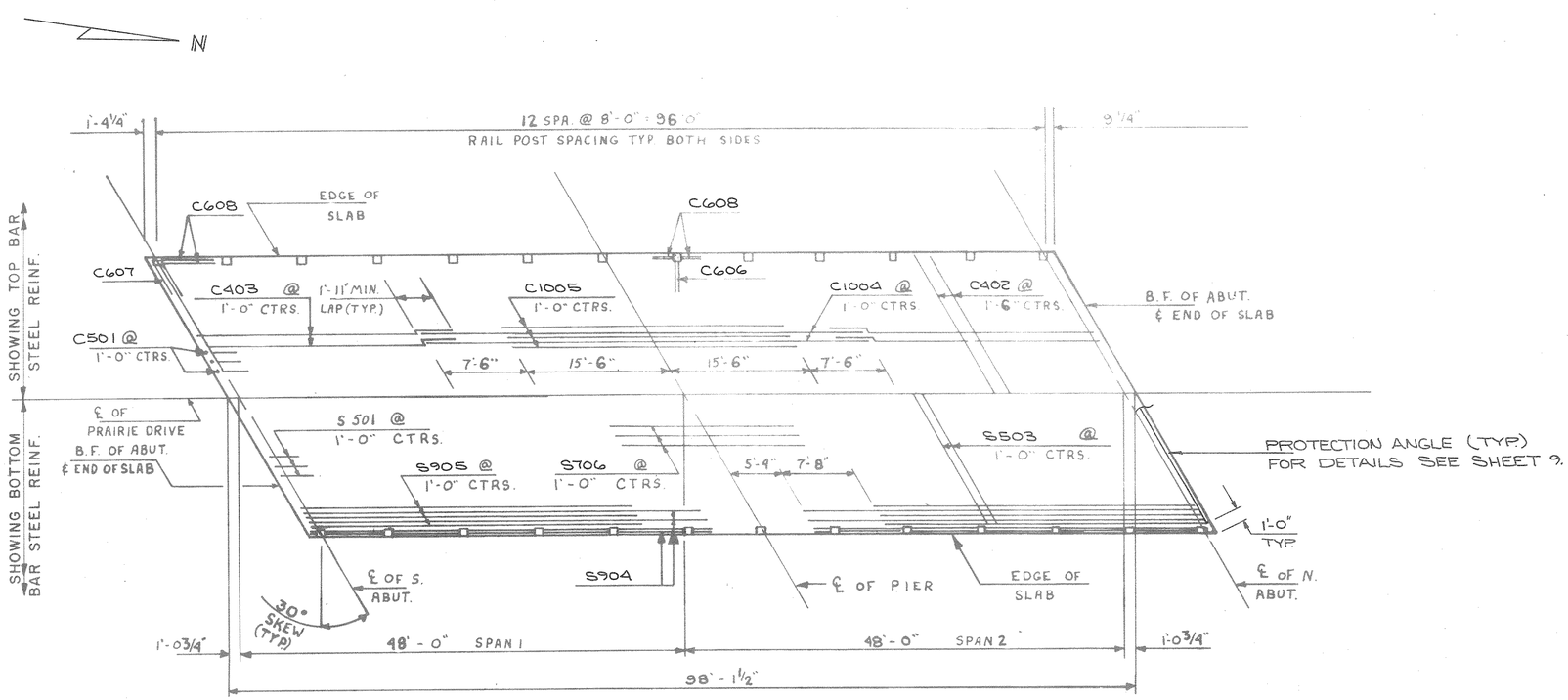
CROSS SECTION THRU BRIDGE
(LOOKING NORTH)

▶ BUNDLE THE TWO EXTERIOR S904 BARS AS SHOWN - SEE THE "BUNDLING DETAIL" ON SHEET 9.



CAMBER DIAGRAM

NOTE: ALL SLAB THICKNESS DIMENSIONS ARE MINIMUM. ANY TOLERANCES NECESSARY TO CORRECT CONSTRUCTION DISCREPANCIES ARE TO BE PLUS (+).
CAMBER SPANS AS SHOWN TO PROVIDE FOR DEADLOAD DEFLECTION AND FUTURE PLASTIC FLOW. CAMBER DOES NOT INCLUDE ALLOWANCE FOR FORM SETTLEMENT. DEADLOAD DEFLECTION ONLY EQUALS APPROXIMATELY 1/3 OF CAMBER VALUES SHOWN.



PLAN

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec. WIS. 1981	Drawn By LEN	Plans Checked JRL

SUPERSTRUCTURE

SHEET 8 OF 10

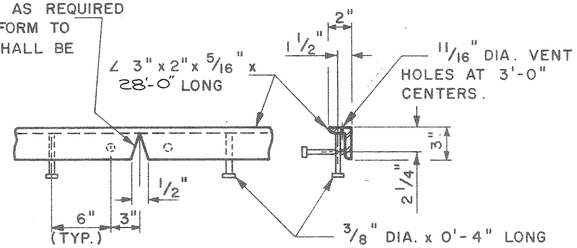
X78812

DA13997.500

Form L-1-12-05

STATE PROJECT NUMBER	SHEET NO.
9860-3-70	

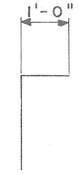
FIELD CUT 3" LEG OF ANGLE AS REQUIRED FOR BENDING ANGLE TO CONFORM TO ROADWAY CROWN. ONE CUT SHALL BE AT THE CROWN.



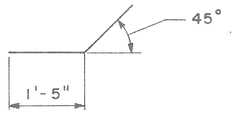
PROTECTION ANGLE DETAIL

NOTE: ANGLE AND STUDS SHALL BE PAID FOR AS "STRUCTURAL CARBON STEEL". NO PAINT REQUIRED.

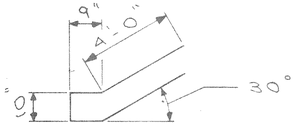
BUNDLING DETAIL



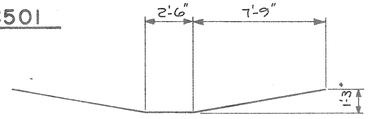
C501



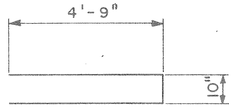
S501



S607



S706



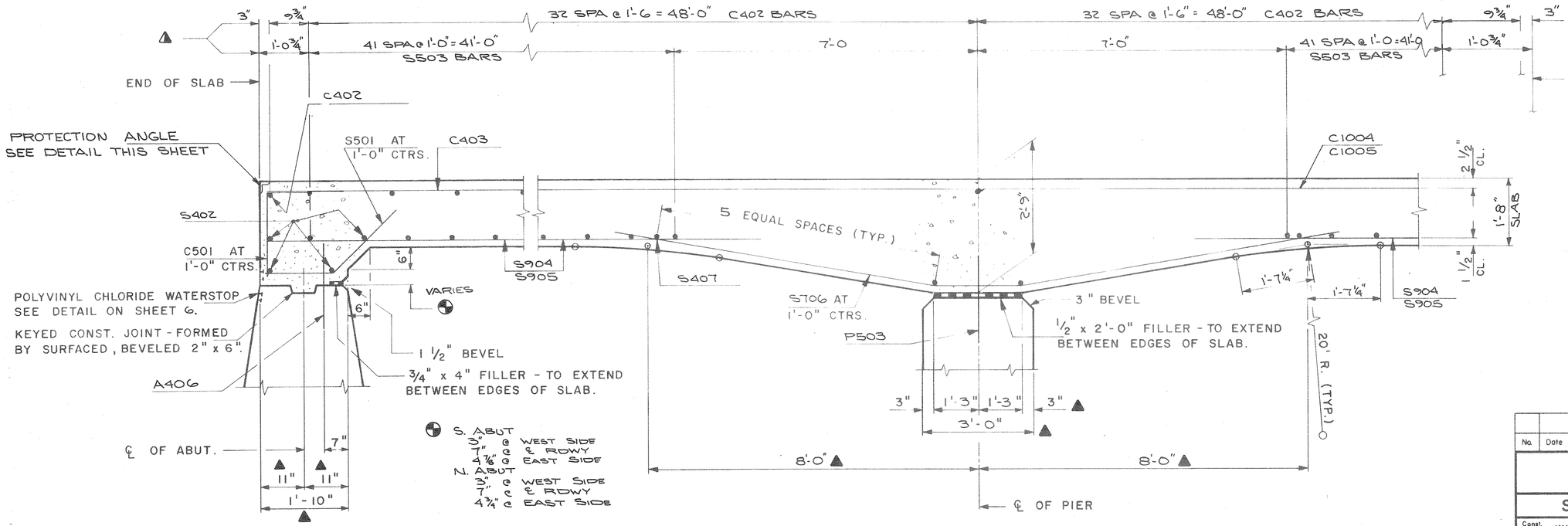
C606

NOTE: ALTERNATE TOP TRANSVERSE BARS IN SLAB SHALL BE SUPPORTED BY INDIVIDUAL BAR CHAIRS AT APPROXIMATELY 3'-0" CENTERS. BOTTOM LONGITUDINAL BARS SHALL BE SUPPORTED BY CONTINUOUS BAR CHAIRS AT APPROXIMATELY 4'-0" CENTERS.

BILL OF BARS

DIMENSIONS IN BENDING DETAILS ARE OUT TO OUT OF BAR.

MARK	NO. REQ'D.	LENGTH	BENT	LOCATION
NON-COATED BARS				TOTAL WT. = 18,490 LBS.
S501	52	3-5	X	DIAPH @ ABUT HORIZ
S402	8	29-7		DIAPH @ ABUT TRANS
S503	84	29-7		SLAB - BOTTOM TRANS
S904	56	43-5		SLAB - BOTTOM LONGIT
S905	50	35-10		SLAB - BOTTOM LONGIT
S706	26	18-0	X	DIAPH @ PIER LONGIT
S407	12	29-7		DIAPH @ PIER TRANS
COATED BARS				TOTAL WT. = 11,650 LBS.
C501	52	3-2	X	DIAPH @ ABUT VERT
C402	67	29-7		SLAB - TOP TRANS
C403	52	27-9		SLAB - TOP @ ABUT LONGIT
C1004	26	46-0		SLAB - TOP @ PIER LONGIT.
C1005	25	31-0		SLAB - TOP @ PIER LONGIT.
C606	24	10-0	X	SLAB - 1 PER POST TRANS
C607	2	10-0	X	SLAB - 1 PER POST (WINGS 1 & 4 ONLY) "
C608	52	4-0		SLAB - 2 PER POST LONGIT



PART LONGITUDINAL SECTION

▲ DIMENSIONS ARE GIVEN PARALLEL TO THE ℄ OF PRAIRIE DRIVE
▲ DIMENSIONS ARE GIVEN NORMAL TO THE ℄ OF THE SUBSTRUCTURE UNITS.

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec.	Drawn By	Plans Checked
WIS. 1981	LEN	JRL

SUPERSTRUCTURE

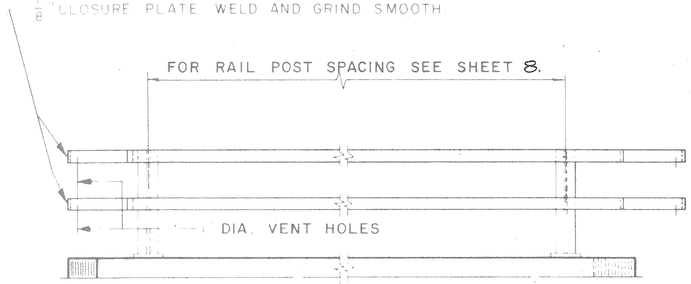
SHEET 9 OF 10

X78813

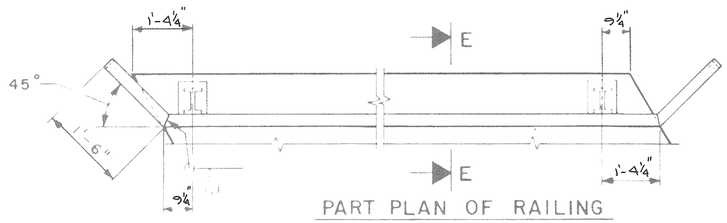
DA13997.500

Form: B-12-

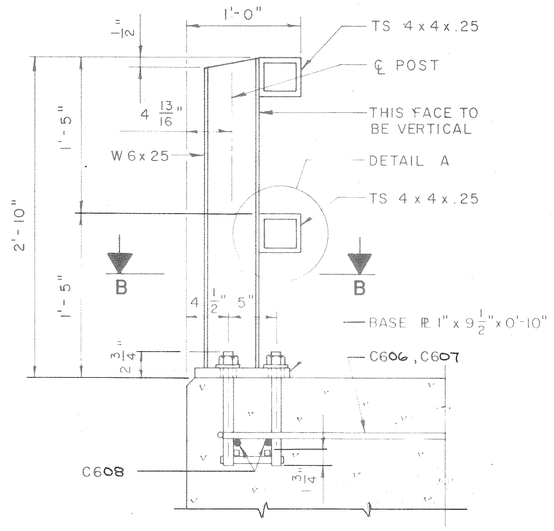
STATE PROJECT NUMBER	SHEET NO.
9860-3-70	



PART ELEVATION OF RAILING



PART PLAN OF RAILING



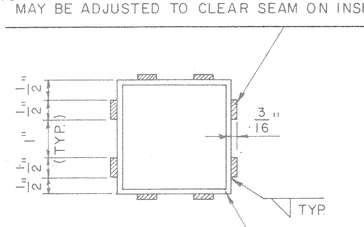
SECTION E

GENERAL NOTES

1. BID ITEM SHALL BE "TUBULAR RAILING, TYPE F".
2. POST BASE PLATES SHALL BE FLAT WITH ALL SURFACES SMOOTH AND FREE FROM WARP AND ALL EDGES SMOOTH, STRAIGHT AND VERTICAL. ALL PLATE CUTS SHALL BE MACHINE OR MACHINE FLAME CUTS.
3. RAILING SHALL BE 4x4x.25 STRUCTURAL TUBING CONFORMING TO A.S.T.M. DESIGNATION A36.
4. ANCHOR BOLTS SHALL BE 7/8" DIA. NOMINAL CONFORMING TO A.S.T.M. A449 ⚠ WITH 3" THREAD AND A325 HIGH STRENGTH NUTS AND WASHERS.
5. CAULK EXPOSED OPENINGS BETWEEN SHIMS.
6. POSTS, BASE PLATES AND SHIMS SHALL BE MADE FROM MATERIAL CONFORMING TO A.S.T.M. DESIGNATION A36. CUT BOTTOM OF POST TO MATCH CROSS SLOPE OF ROADWAY. PLACE POST NORMAL TO GRADE LINE.
7. PLACE ANCHOR BOLTS NORMAL TO BASE PLATE.
8. ALL MEMBERS, INCLUDING UPPER 4" OF ANCHOR BOLTS, SHALL BE GALVANIZED AFTER FABRICATION.
9. RAILS MAY BE WELDED TO POSTS.
10. FILL POST ANCHOR BOLT HOLES WITH NON-STAINING GRAY NON-BITUMINOUS JOINT SEALER.
11. RAILING SHALL BE FABRICATED IN 2 OR 3 PANEL LENGTHS.
12. STEEL SHIMS SHALL BE USED UNDER POSTS WHERE REQUIRED FOR ALIGNMENT.
13. FIELD ERECTION JOINTS SHALL BE ALTERNATIVE 1 OR ALTERNATIVE 2.
14. PRIOR TO GALVANIZING ALL STEEL RAILING SHALL BE GIVEN A NO. 6 COMMERCIAL BLAST CLEANING BY S.S.P.C. SPECIFICATIONS.

⚠ OR MATERIAL OF EQUIVALENT YIELD STRENGTH AND ELONGATION. (MIN. YIELD OF 92 K.S.I. AND ELONGATION OF 14 %)

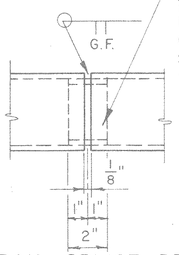
BAR 1/2" x 3/16" x 0'-6". GRIND AS REQUIRED FOR SLIDING FIT. SPACING OF BARS MAY BE ADJUSTED TO CLEAR SEAM ON INSIDE OF RAIL MEMBER.



SECTION THRU SLEEVE

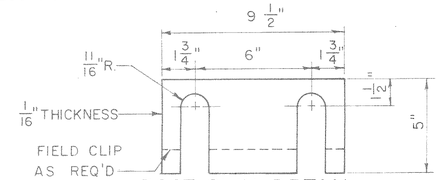
SLEEVE FABRICATED FROM 1/4" PLATE. PROVIDE "SLIDING FIT" WITH A MINIMUM OUT TO OUT DIMENSION OF 3 13/32".

5/8" MINIMUM FLAT SURFACE DIAMETER STEEL PUNCHINGS OR STUDS MAY BE SUBSTITUTED FOR EACH WELD.



SHOP RAIL SPLICE DETAIL

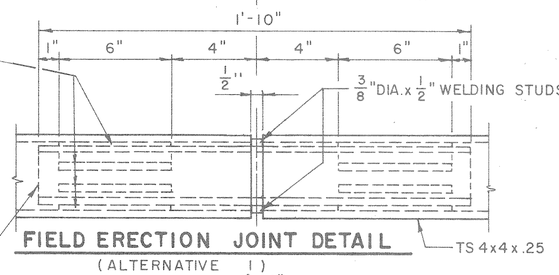
LOCATION MUST BE SHOWN ON THE SHOP DRAWINGS



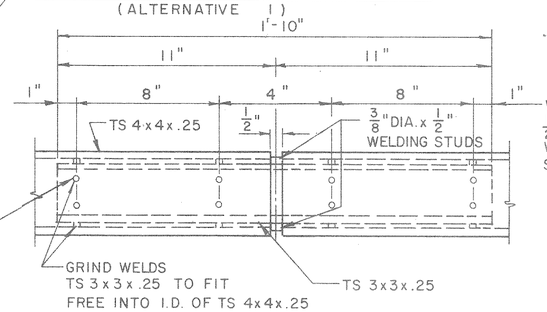
POST SHIM DETAIL
(4 PER POST)

1/6 PANEL LENGTH ± 4" TO NEAREST POST

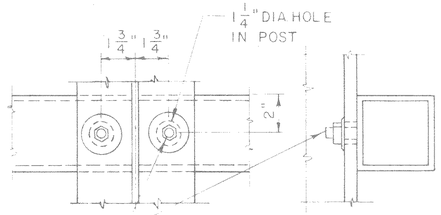
SYM. ABOUT ℄



FIELD ERECTION JOINT DETAIL
(ALTERNATIVE 1)

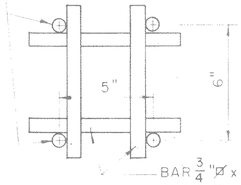


FIELD ERECTION JOINT DETAIL
(ALTERNATIVE 2)



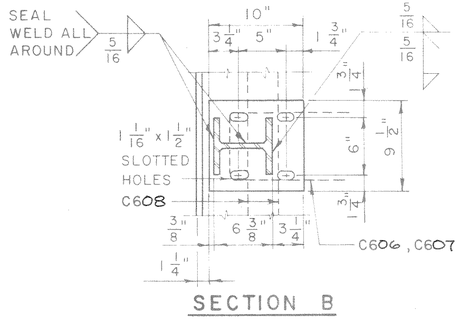
DETAIL A

ANCHOR BOLTS 7/8" DIA. x ◔ WITH WASHER AND HEX. NUT. (4 BOLTS PER POST) CHAMFER TOP OF BOLTS BEFORE THREADING.



ANCHOR BOLT DETAIL

◔ 10" LONG AT MIDDLE POST
1'-3" LONG AT END POST



SECTION B

No.	Date	Revision	By

STATE OF WISCONSIN
DEPARTMENT OF TRANSPORTATION

STRUCTURE B-35-92

Const. Spec. WIS. 1981	Drawn By LEN/TJA	Plans Checked JRL

TUBULAR RAILING, TYPE F

SHEET 10 OF 10

X78814

DA13997.500

Form E-B-12-69