T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	1	48
	ILLINOIS	CONTRACT NO. 87818		

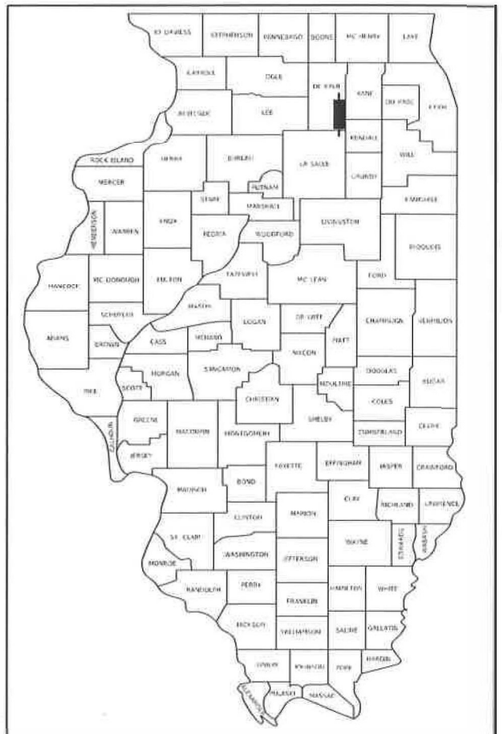
06-14-2024 LETTING ITEM 211

FOR INDEX OF HIGHWAY STANDARDS, SEE SHEET NO. 2
FOR INDEX OF SHEETS, SEE SHEET NO. 2

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

PROPOSED HIGHWAY PLANS

LBFP–OFF SYSTEM
BRIDGE REPLACEMENT
TR 230 (PRITCHARD ROAD)
SQUAW GROVE TOWNSHIP
PROJECT YC0I(431)
SECTION 19–17129–00–BR
DEKALB COUNTY
C–93–005–24

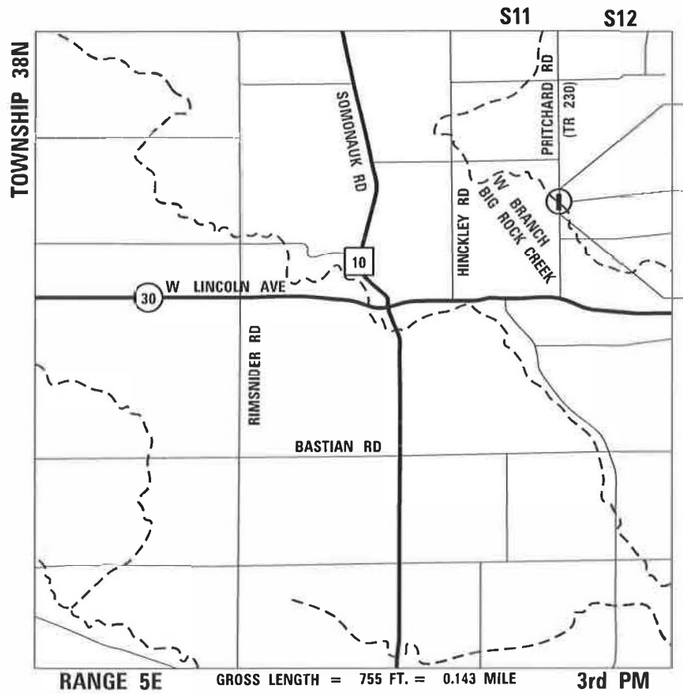


LOCATION OF SECTION INDICATED THUS: –

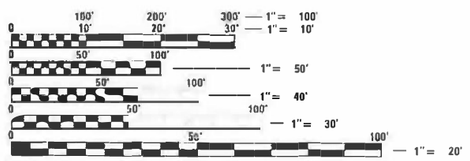
FUNCTIONAL CLASS:
PRITCHARD ROAD – LOCAL ROAD

TRAFFIC DATA: TR 230 (PRITCHARD ROAD)
2021 ADT = 350
2044 ADT = 389

DESIGN SPEED = 30 MPH



GROSS LENGTH = 755 FT. = 0.143 MILE
NET LENGTH = 755 FT. = 0.143 MILE



FULL SIZE PLANS HAVE BEEN PREPARED USING STANDARD ENGINEERING SCALES. REDUCED SIZED PLANS WILL NOT CONFORM TO STANDARD SCALES. IN MAKING MEASUREMENTS ON REDUCED PLANS, THE ABOVE SCALES MAY BE USED.

J.U.L.I.E.
JOINT UTILITY LOCATION INFORMATION FOR EXCAVATORS
1–800–892–0123
OR 811

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

APPROVED 12/27/2023
DEKALB COUNTY HIGHWAY DEPARTMENT COUNTY ENGINEER

PASSED December 29, 2023
DISTRICT 3 ENGINEER OF LOCAL ROADS & STREETS

RELEASING FOR BID BASED ON LIMITED REVIEW December 29, 2023 SC
REGION 2 ENGINEER

PRINTED BY THE AUTHORITY OF THE STATE OF ILLINOIS

CONTRACT NO. 87818

STATE OF ILLINOIS · THOMAS STENSLIK · 062-067665 · LICENSED PROFESSIONAL ENGINEER

DECEMBER 27TH, 2023
THOMAS STENSLIK
ILLINOIS LICENSED PROFESSIONAL ENGINEER NO. 062–067665
EXPIRATION DATE 11–30–2025
SHEET 1 TO 18 , SHEET 42 TO 50

STATE OF ILLINOIS · MELISSA LANGE · 081-006488 · LICENSED STRUCTURAL ENGINEER

DECEMBER 27TH, 2023
MELISSA F. LANGE
ILLINOIS REG STRUCTURAL ENGINEER NO. 081–006488
EXPIRATION DATE 11–30–2024
SHEET 19 TO 41

ENGINEERING RESOURCE ASSOCIATES
ENGINEERING RESOURCE ASSOCIATES, INC.
3e701 WEST AVENUE, SUITE 150
WARRENVILLE, IL 60555
(630) 393–3060

INDEX OF SHEETS

SHEET NO.	DESCRIPTION
1	COVER SHEET
2	INDEX OF SHEETS, HIGHWAY STANDARDS & GENERAL NOTES
3-4	SUMMARY OF QUANTITIES
5-6	TYPICAL SECTIONS
7-8	SCHEDULE OF QUANTITIES
9	ALIGNMENT, TIES, & BENCHMARKS
10	REMOVAL PLAN
11-12	PLAN AND PROFILE
13	TRAFFIC CONTROL PLAN
14	EROSION CONTROL PLAN
15	STORMWATER POLLUTION PREVENTION PLAN (SWPPP)
16	SIGNAGE & LANDSCAPING PLAN
17-39	STRUCTURAL SHEETS
40-41	DISTRICT DETAILS
42-48	CROSS SECTIONS

IDOT HIGHWAY STANDARDS

000001-08	STANDARD SYMBOLS, ABBREVIATIONS AND PATTERNS
001001-02	AREAS OF REINFORCEMENT BARS
001006	DECIMAL OF AN INCH AND OF A FOOT
280001-07	TEMPORARY EROSION CONTROL SYSTEMS
515001-04	NAME PLATES FOR BRIDGES
601101-02	CONCRETE HEADWALL FOR PIPE UNDERDRAINS
631011-10	TRAFFIC BARRIER TERMINAL, TYPE 2
631032-10	TRAFFIC BARRIER TERMINAL, TYPE 6A
635001-02	DELINEATORS
701901-09	TRAFFIC CONTROL DEVICES
720001-01	SIGN PANEL MOUNTING DETAILS
720006-04	SIGN PANEL ERECTION DETAILS
720011-01	METAL POSTS FOR SIGNS, MARKERS & DELINEATORS
725001-01	OBJECT AND TERMINAL MARKERS
BLR 21-9	TYPICAL APPLICATION OF TRAFFIC CONTROL DEVICES FOR CONSTRUCTION ON RURAL LOCAL HIGHWAYS
BLR 23-4	TRAFFIC BARRIER TERMINAL, TYPE 1

DISTRICT 3 STANDARDS

280-1	EROSION CONTROL DETAILS FOR SILT FENCE
406-8	HMA DETAIL AT BUTT JOINTS
782-3	REFLECTOR MOUNTING DETAIL FOR STEEL RAILING

COMMITMENTS

1. ONCE THE STEEL FABRICATOR IS DETERMINED, THE COUNTY WILL SUBMIT A LETTER TO THE BUREAU OF BRIDGES AND STRUCTURES (BBS) REQUESTING THE DEPARTMENT TO PERFORM THE STEEL FABRICATION INSPECTION. THE LETTER SHALL INCLUDE THE FOLLOWING:

   A. JOB INFORMATION (STRUCTURE NUMBER, ROUTE, SECTION, COUNTY, IDOT CONTRACT # IF APPLICABLE, C-# IF APPLICABLE).

   B. POINT OF CONTACT FOR QUESTIONS AND WHO TO SEND REPORTS TO AT JOB COMPLETION; NAME, CONTACT AND LOCATION FOR FABRICATOR AND PRIME CONTRACTOR.

   C. THE APPROXIMATE START DATE AND DURATION IF KNOWN.

2. THE NATURAL RESOURCE REVIEW FOR THE ENDANGERED SPECIES ACT - SECTION 7 AND THE ILLINOIS ENDANGERED SPECIES PROTECTION AND ILLINOIS NATURAL AREAS PRESERVATION - PART 1075 IDENFITIED THE POTENTIAL PRESENCE OF THE TRICOLORED BAT, THE NORTHERN LONG-EARED BAT OR INDIANA BAT WITHIN THE PROJECT AREA. DUE TO THE POTENTIAL PRESENCE OF THESE SPECIES WITHIN THE PROJECT LIMITS, TREES LARGER THAN THREE (3) INCHES DIAMETER AT BREAST HEIGHT (DBH) SHALL NOT BE CLEARED FROM APRIL 1ST TO SEPTEMBER 30TH IN ORDER TO AVOID POTENTIAL IMPACTS TO THOSE SPECIES. ALL TREE REMOVALS SHALL BE PERFORMED TO MEET THE NOTED TIME PERIOD REQUIREMENTS IN ORDER TO MEET SECTION 7 SIGNOFF REQUIREMENTS. TREE REMOVALS SHALL BE COMPLETED BY OTHERS AS REQUIRED TO COMPLETE THE WORK.

GENERAL NOTES

1. ALL REFERENCES TO THE COUNTY OR OWNER SHALL BE INTERPRETTED AS DEKALB COUNTY.
2. THE SCALE SHOWN ON THE DRAWINGS APPLIES ONLY TO FULL SIZE PLANS AND NOT TO THE REDUCED SIZE PLANS. DO NOT SCALE PLANS FOR CONSTRUCTION DIMENSIONS.
3. THE CONTRACTOR SHALL ENSURE ALL PERMITS HAVE BEEN OBTAINED PRIOR TO COMMENCEMENT OF WORK.
4. THE CONTRACTOR WILL BE REQUIRED TO COMPLY WITH ALL STATE REGULATIONS REGARDING AIR, WATER, AND NOISE POLLUTION. THE CONTRACTOR IS PROHIBITED FROM BURNING ANY MATERIAL WITHIN OR ADJACENT TO THE IMPROVEMENT.
5. WHERE SECTIONS OR SUBSECTION MONUMENTS ARE ENCOUNTERED. THE ENGINEER SHALL BE NOTIFIED BEFORE SUCH MONUMENTS ARE REMOVED. THE CONTRACTOR SHALL PROJECT AND CAREFULLY PRESERVE ALL PROPERTY MARKERS, MONUMENTS AND RIGHT OF WAY PINS UNTIL THE OWNER, AN AUTHORIZED SURVEYOR, OR AGENT HAS WITNESSED OR OTHERWISE REFERENCED THEIR LOCATION. ANY PROPERTY MARKERS, SECTION OR SUBSECTION MONUMENTS UNLESS REFERENCED, DAMAGED BY THE CONTRACTOR SHALL BE PLACED AT THE EXPENSE OF THE CONTRACTOR.
6. THE CONTRACTOR SHALL PERFORM ALL CONSTRUCTION ACTIVITIES DURING DAYLIGHT HOURS ONLY.
7. THE ILLINOIS DEPARTMENT OF TRANSPORTATION IS NOT THE OWNER OF RECORD FOR THIS BRIDGE. FOR INFORMATION REGARDING THE EXISTING STRUCTURE, SEE THE RECORD PLANS CONTAINED WITHIN THE STRUCTURAL SHEETS.

EARTHWORK & ROADWAY

1. ALL SAW CUTS SHALL BE INCLUDED IN THE COST OF THE VARIOUS REMOVAL ITEMS.
2. THE CONTRACTOR SHALL NOT CROSS COMPLETED SURFACE COURSE, OR EXISTING PAVEMENT NOT SCHEDULED TO BE REMOVED, WITH CONSTRUCTION EQUIPMENT WHICH MAY DAMAGE THE PAVEMENT.
3. DAMAGE TO PAVEMENT OR ANY OTHER PORTION OF THE ROADWAY NOT SPECIFIED TO BE REMOVED AND REPLACED SHALL BE REPAIRED OR REPLACED BY THE CONTRACTOR AT NO ADDITIONAL COST.
4. THE CONTRACTOR'S OPERATIONS SHALL NOT INCONVENIENCE THE PUBLIC OR INTERFERE WITH THE ABILITY OF THE LOCAL RESIDENTS TO UTILIZE THEIR PRIVATE DRIVEWAYS LOCATED ADJACENT TO THE SOUTHERN PROJECT LIMITS.
5. THE SUBGRADE SHALL BE KEPT DRAINED DURING CONSTRUCTION THE PAVEMENT STRUCTURE. THE CONTRACTOR SHALL FACILITATE SURFACE DRAINAGE BY CUTTING WEEPS IN THE SUBGRADE OR ADJACENT TERRAIN AS NECESSARY. THIS WORK SHALL BE CONSIDERED INCLUDED IN THE UNIT BID PRICES AN NO ADDITIONAL COMPENSATION WILL BE ALLOWED.
6. THE PAVEMENT ELEVATIONS SHOWN ON THE PLANS ARE FINISHED GRADES FOR THE PROPOSED PAVEMENT OR SURFACE COURSE, UNLESS OTHERWISE INDICATED.
7. MATERIAL EXCAVATED FROM THE CHANNEL SHALL NOT BE RETURNED TO THE WATERWAY.
8. GRADING AND SHAPING DITCHES WILL NOT BE PAID FOR SEPARATELY AND SHOULD BE INCLUDED IN THE COST OF EARTH EXCAVATION.
9. ALL SUBSURFACE DRAINS AND/OR FIELD TILES ENCOUNTERED IN THE ROADWAY EXCAVATION SHALL BE REMOVED AND IS CONSIDERED TO BE INCLUDED IN THE COST OF EARTH EXCAVATION. THE CONTRACTOR SHALL BE RESPONSIBLE FOR CAPPING THE EXISTING SUBSURFACE DRAINS OR CONNECTING TO THE PROPOSED DITCH AT THE LOCATIONS SHOWN IN THE PLANS OR AS DIRECTED BY THE OWNER OR HIS REPRESENTATIVE. THIS WORK SHALL NOT BE MEASURED SEPARATELY FOR PAYMENT, BUT SHALL BE INCLUDED IN THE COST OF EARTH EXCAVATION.
10. THE CONTRACTOR WILL BE REQUIRED TO DISPOSE OF ALL MATERIALS EXCAVATED OR REMOVED DUE TO CONSTRUCTION OPERATIONS. ALL EXCESS, EXCAVATED MATERIAL SHALL BE REMOVED FROM THE SITE ON THE DAY IT IS EXCAVATED. HAULING OR TRUCKING THE MATERIAL TO LOCATIONS OUTSIDE OF THE PROJECT LIMITS SHALL BE PROVIDED BY THE CONTRACTOR.
11. AN ALLOWANCE FOR AGGREGATE SUBGRADE IMPROVEMENT HAS BEEN PROVIDED IN THE CONTRACT.
12. THE FINISHED EARTHWORK SHALL HAVE A VEGETATION SUSTAINING SOIL COVERING THE TOP FOUR INCHES IN AREAS TO BE SEEDED OR SODDED. THIS SOIL WILL NOT BE PAID FOR SEPARATELY, BUT WILL BE INCLUDED IN THE COST OF TOPSOIL EXCAVATION & PLACEMENT.

MISCELLANEOUS

1. ALL WASTE MATERIAL SHALL BE LEGALLY DISPOSED OF OUTSIDE THE LIMITS OF THE RIGHT-OF-WAY AT THE CONTRACTOR'S EXPENSE.
2. IT IS THE CONTRACTOR'S RESPONSIBILITY TO ASCERTAIN EXISTING FIELD CONDITIONS BEFORE BIDDING ON THIS CONTRACT, BEGINNING CONSTRUCTION AND ORDERING MATERIALS.
3. WHERE PROPOSED WORK MEETS EXISTING FEATURES TO REMAIN, FIELD CHECK ALL DIMENSIONS AND ELEVATIONS BEFORE PROCEEDING WITH CONSTRUCTION. NOTIFY ENGINEER IMMEDIATELY OF ANY DISCREPANCIES.
4. THE CONTRACTOR SHALL ADHERE TO LIMITS OF RESTORATION SHOWN. AREAS OUTSIDE OF THESE LIMITS THAT ARE DAMAGED OR DISTURBED BY THE CONTRACTOR SHALL BE RESTORED BY THE CONTRACTOR AT HIS/HER EXPENSE, AND NO ADDITIONAL COMPENSATION WILL BE ALLOWED.
5. ALL DISTURED AREAS WITHIN THE PROJECT THAT ARE NOT OTHERWISE SURFACED SHALL BE SEEDED. SEED LIMITS SHOWN ON THE PLANS ARE THE MAXIMUM PAY WIDTHS FOR PAYMENT PURPOSES.
6. EXISTING STRUCTURES (INCLUDING FOUNDATIONS, WELLS, CISTERN, WALLS, OR OTHER UNDERGROUND STRUCTURES) WITHIN THE RIGHT OF WAY SHALL BE REMOVED IN ACCORDANCE WITH ARTICLE 501.04 AND 501.05 OF THE STANDARD SPECIFICATIONS, WITHOUT ADDITIONAL COMPENSATION, UNLESS OTHERWISE NOTED IN THE CONTRACT DOCUMENTS.
7. ALL TYPE I AND II BARRICADES SHALL BE WEIGHTED DOWN WITH TWO SANDBAGS EACH.
8. FOR STEEL BAR CERTIFICATION, PLEASE CONTACT IDOT BUREAU OF MATERIALS AT 815-433-7100.

UTILTIES

1. THE LOCATIONS OF THE EXISTING UTILITIES, AS SHOWN ON THE DRAWINGS, REPRESENT DATA RECEIVED FROM VARIOUS SOURCES, IT IS NOT GUARANTEED TO BE CORRECT OR ALL INCLUSIVE. THE CONTRACTOR SHALL CONDUCT THEIR OWN INVESTIGATIONS INTO THE LOCATION, SIZE, DEPTH, AND NATURE OR ANY AND ALL EXISTING UTILITIES WHICH MAY INTERFERE WITH WORK UNDER THIS CONTRACT. ANY EXISTING UTILITIES WHICH ARE TO REMAIN IN SERVICE SHALL BE FULLY PROTECTED BY THE CONTRACTOR AND ANY DAMAGE CAUSE BY THE CONTRACTOR SHALL BE IMMEDIATELY REPAIRED IN ACCORDANCE WITH ARTICLE 105.07.
2. BEFORE STARTING ANY EXCAVATION, THE CONTRACTOR SHALL CALL "JULIE" AT 1-800-892-0123 FOR FIELD LOCATIONS OF BURIED ELECTRIC, TELEPHONE, GAS, WATER, SEWER, AND CABLE TELEVISION FACILITIES. (48 HOURS NOTIFICATION IS REQUIRED.)
3. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE PROTECTION OF ALL ABOVE AND BELOW GROUND UTILITIES EVEN THOUGH THEY MAY NOT BE SHOWN ON THE PLANS. ANY UTILITY THAT IS DAMAGED DURING CONSTRUCTION SHALL BE REPAIRED OR REPLACED TO THE SATISFACTION OF THE ENGINEER. THIS WORK SHALL BE AT THE CONTRACTOR'S EXPENSE.
4. THE CONTRACTOR SHALL COOPERATE WITH THE COUNTY AND STATE IF ANY UNDERGROUND IMPROVEMENTS ARE REQUIRED BY THE COUNTY OR CITY WITHIN THE DURATION OF THE CONTRACT.
5. THE CONTRACTOR SHALL BE RESPONSIBLE FOR CONTACTING THE OWNERS OF ALL UTILITIES LISTED BELOW, PRIOR TO CONSTRUCTION TO DETERMINE THE LOCATION OF ALL UTILITY EQUIPMENT. THE CONTRACTOR SHALL CORPORATE WITH ALL UTILITY OWNERS AS PROVIDED FOR IN THE STANDARD SPECIFICATIONS IF UTILITY RELOCATION, ADJUSTMENT, OR PROTECTION IS NECESSARY.
6. THE CONTRACTOR SHALL COORDINATE CONSTRUCTION ACTIVITIES WITH UTILITY COMPANIES.

UTILITY CONTACTS

ENTITY	CONTACT PERSON	PHONE NUMBER	EMAIL ADDRESS
AT&T METRO/TCA	TIM LAPOINTE		TL0695@ATT.COM
AT&T TRANSMISSION	EDWARD TILTON	301-882-8726	EDWARD.TILTON@KCI.COM
COMED	JOSE CUEVAS	779-231-2382	JOSE.CUEVAS@COMED.COM
FRONTIER COMMUNICATIONS	JOHN GILLOTT	815-780-7570	JOHN.GILLOTT@FTR.COM
MEDIACOM	MICHAEL WRIGHT	815-716-3646	MWRIGHT1@MEDIACOMCC.COM

RATES OF APPLICATION

HOT MIX ASPHALT	112 LBS/SY-INCH
BITUMINOUS MATERIALS (PRIME COAT) (ON GRAVEL)	0.25 LBS/SF
BITUMINOUS MATERIALS (TACK COAT) (BETWEEN LIFTS)	0.025 LBS/SF (NEW) & 0.05 LB/SF (MILLED)
TEMPORARY EROSION CONTROL SEEDING	100 LBS/ACRE / APPLICATION
FERTILIZER	90 LB/ACRE

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ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	INDEX OF SHEETS, HIGHWAY STANDARDS, & GENERAL NOTES PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK	
	DRAWN - T. STENSLIK	REVISED -			
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -		SCALE: N.T.S. SHEET 1 OF 1 SHEETS STA. N/A TO STA. N/A	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -			

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	2
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		

SPECIALTY ITEMS	CODE NO.	ITEM	UNIT	TOTAL QUANTITY	CONSTRUCTION CODE 80% FEDERAL, 20% LOCAL BRIDGE 0010 SN019-5430
	20101100	TREE TRUNK PROTECTION	EACH	1	1
	20200100	EARTH EXCAVATION	CU YD	190	190
	20201200	REMOVAL AND DISPOSAL OF UNSUITABLE MATERIAL	CU YD	295	295
	20300100	CHANNEL EXCAVATION	CU YD	524	524
	20400800	FURNISHED EXCAVATION	CU YD	665	665
	21001000	GEOTECHNICAL FABRIC FOR GROUND STABILIZATION	SQ YD	1,810	1,810
	21101505	TOPSOIL EXCAVATION AND PLACEMENT	CU YD	250	250
	25000200	SEEDING, CLASS 2	ACRE	0.75	0.75
	25000400	NITROGEN FERTILIZER NUTRIENT	POUND	50	50
	25000500	PHOSPHORUS FERTILIZER NUTRIENT	POUND	50	50
	25000600	POTASSIUM FERTILIZER NUTRIENT	POUND	50	50
	25100115	MULCH, METHOD 2	ACRE	3.50	3.50
	25100630	EROSION CONTROL BLANKET	SQ YD	2,687	2,687
	28000250	TEMPORARY EROSION CONTROL SEEDING	POUND	340	340
	28000305	TEMPORARY DITCH CHECKS	FOOT	30	30
	28000400	PERIMETER EROSION BARRIER	FOOT	1,718	1,718
	28100107	STONE RIPRAP, CLASS A4	SQ YD	550	550
	28200200	FILTER FABRIC	SQ YD	550	550
	30300011	AGGREGATE SUBGRADE IMPROVEMENT	TON	1,268	1,268
	40600275	BITUMINOUS MATERIALS (PRIME COAT)	POUND	2,960	2,960
	40600290	BITUMINOUS MATERIALS (TACK COAT)	POUND	620	620
	40603080	HOT-MIX ASPHALT BINDER COURSE, IL-19.0, N50	TON	135	135
	40604050	HOT-MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50	TON	183	183
	44000100	PAVEMENT REMOVAL	SQ YD	830	830
	44000157	HOT-MIX ASPHALT SURFACE REMOVAL, 2"	SQ YD	703	703
	48101200	AGGREGATE SHOULDERS, TYPE B	TON	58	58
	48203013	HOT-MIX ASPHALT SHOULDERS, 4"	SQ YD	360	360
	50100100	REMOVAL OF EXISTING STRUCTURES	EACH	1	1
	50200100	STRUCTURE EXCAVATION	CU YD	131	131

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ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkalodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	
	DRAWN - T. STENSLIK	REVISED -	
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: N.T.S. | SHEET 1 OF 2 SHEETS | STA. N/A | TO STA. N/A

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	3
		CONTRACT NO. 87818		
		ILLINOIS | FED. AID PROJECT		

SPECIALTY ITEMS	CODE NO.	ITEM	UNIT	TOTAL QUANTITY	CONSTRUCTION CODE 80% FEDERAL, 20% LOCAL BRIDGE 0010 SN019-5430
	50300225	CONCRETE STRUCTURES	CU YD	53.5	53.5
	50300255	CONCRETE SUPERSTRUCTURES	CU YD	120.0	120.0
	50300260	BRIDGE DECK GROOVING	SQ YD	331	331
	50300300	PROTECTIVE COAT	SQ YD	368	368
	50500105	FURNISHING AND ERECTING STRUCTURAL STEEL	L SUM	1	1
	50500505	STUD SHEAR CONNECTORS	EACH	1,380	1380
	50800205	REINFORCEMENT BARS, EPOXY COATED	POUND	31,390	31,390
X	50901050	STEEL RAILING, TYPE SM	FOOT	199	199
	51200959	FURNISHING METAL SHELL PILES 14" X 0.312"	FOOT	360	360
	51202305	DRIVING PILES	FOOT	360	360
	51203200	TEST PILE METAL SHELLS	EACH	2	2
	51204650	PILE SHOES	EACH	10	10
	51500100	NAME PLATES	EACH	1	1
	52100520	ANCHOR BOLTS, 1"	EACH	20	20
	58600101	GRANULAR BACKFILL FOR STRUCTURES	CU YD	195	195
	59100100	GEOCOMPOSITE WALL DRAIN	SQ YD	103	103
	60100060	CONCRETE HEADWALLS FOR PIPE DRAINS	EACH	2	2
	60146304	PIPE UNDERDRAINS FOR STRUCTURES 4"	FOOT	157	157
X	63100045	TRAFFIC BARRIER TERMINAL, TYPE 2	EACH	2	2
X	63100087	TRAFFIC BARRIER TERMINAL, TYPE 6A	EACH	4	4
X	63100167	TRAFFIC BARRIER TERMINAL, TYPE 1 (SPECIAL) TANGENT	EACH	2	2
	67100100	MOBILIZATION	L SUM	1	1
	72400100	REMOVE SIGN PANEL ASSEMBLY - TYPE A	EACH	5	5
X	72501000	TERMINAL MARKER - DIRECT APPLIED	EACH	4	4
X	78200005	GUARDRAIL REFLECTORS, TYPE A	EACH	10	10
	X0322278	RODENT SHIELDS	EACH	2	2
	X7010216	TRAFFIC CONTROL AND PROTECTION, (SPECIAL)	L SUM	1	1
	Z0013798	CONSTRUCTION LAYOUT	L SUM	1	1

ENGINEERING RESOURCE ASSOCIATES

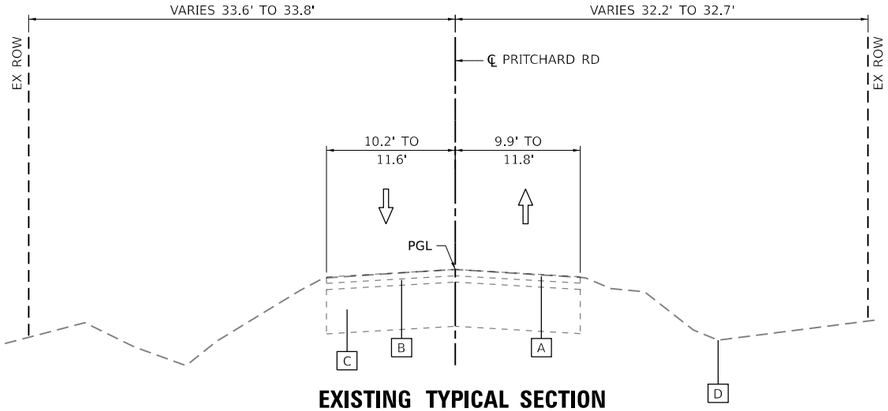
USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	
	DRAWN - T. STENSLIK	REVISED -	
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUMMARY OF QUANTITIES
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

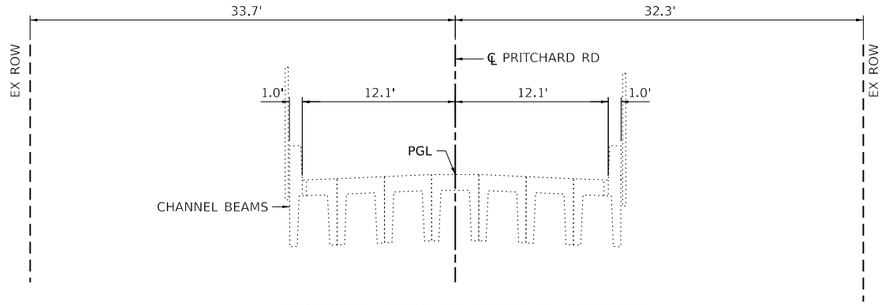
SCALE: N.T.S. | SHEET 2 OF 2 SHEETS | STA. N/A | TO STA. N/A

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	4
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		



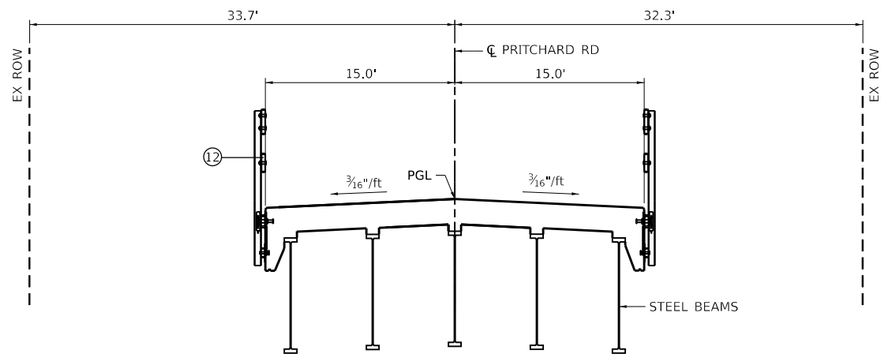
EXISTING TYPICAL SECTION

STA 102+00.00 TO STA 105+06.41
STA 106+02.19 TO STA 109+55.00



EXISTING BRIDGE TYPICAL SECTION

BRIDGE OMISSION - BK TO BK ABUTMENTS
STA 105+06.41 TO STA 106+02.19 (TAKEN AT ℄ OF ROADWAY)

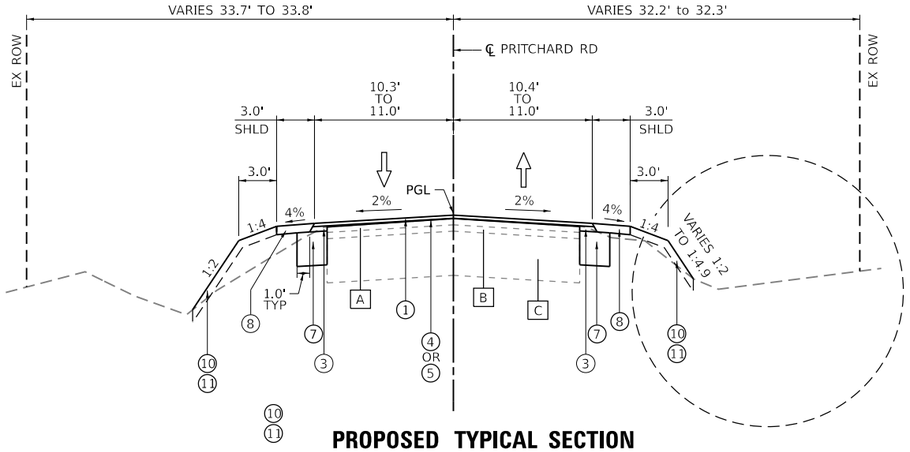


PROPOSED BRIDGE TYPICAL SECTION

BRIDGE OMISSION - BK TO BK ABUTMENTS
STA 104+94.14 TO STA 105+93.38 (TAKEN AT ℄ OF ROADWAY)

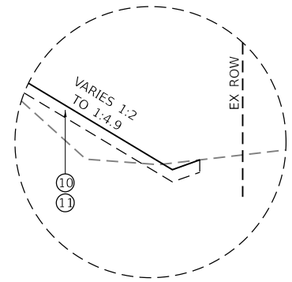
BASED UPON AASHTO MAXIMUM RELATIVE SLOPE FOR DESIGN SPEED = 30 MPH
SHLD TRANSITION (26-FT FOR 1.56% TO 4% CROSS SLOPE):
STA 104+57 TO STA 104+83 (RT) STA 104+74 TO STA 105+00 (LT)
STA 105+88 TO STA 106+14 (RT) STA 106+05 TO STA 106+31 (LT)

LANE TRANSITION (8-FT FOR 1.56% TO 2% CROSS SLOPE):
STA 104+79 TO 104+87
STA 106+00 TO 106+08

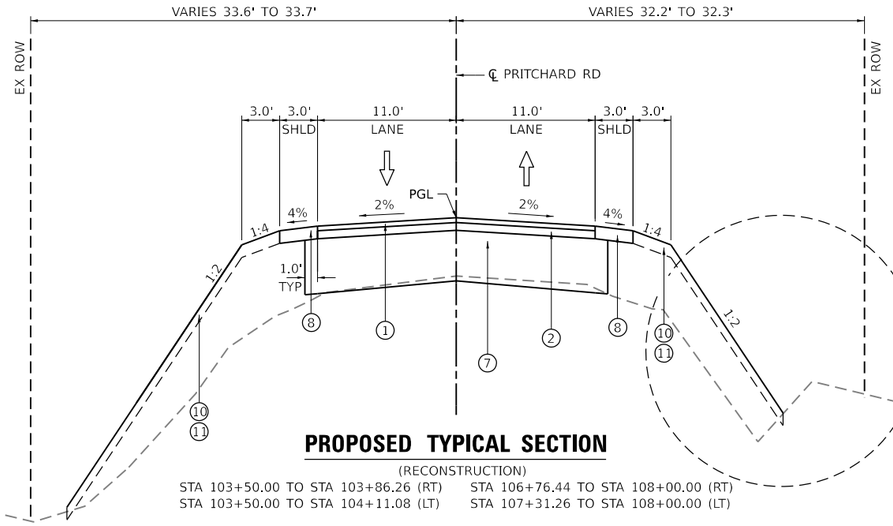


PROPOSED TYPICAL SECTION

(RESURFACING)
STA 102+00.00 TO STA 103+50.00
STA 108+00.00 TO STA 109+55.00

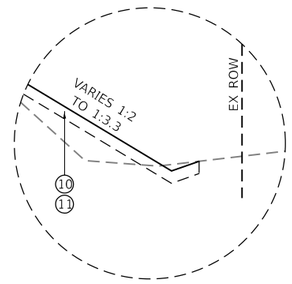


DITCH IN RESURFACING SECTION
STA 102+00.0 TO STA 103+50.00 (RT)



PROPOSED TYPICAL SECTION

(RECONSTRUCTION)
STA 103+50.00 TO STA 103+86.26 (RT) STA 106+76.44 TO STA 108+00.00 (RT)
STA 103+50.00 TO STA 104+11.08 (LT) STA 107+31.26 TO STA 108+00.00 (LT)



DITCH IN RECONSTRUCTION SECTION
STA 103+50.00 TO STA 103+86.26 (RT)

EXISTING LEGEND

- A HMA SURFACE PAVEMENT, 2" WITH FABRIC INTERLAYER
- B SUBBASE STONE, 2"
- C SUBBASE STONE, 14"
- D EXISTING GROUND

NOTES:

1. HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50 SHALL NOT BE PLACED AT LOCATIONS WHERE THE LIFT THICKNESS IS LESS THAN 2.25". AT ALL LOCATIONS WHERE A LIFT THICKNESS LESS THAN 2.25" IS REQUIRED, SURFACE COURSE IL-9.5 SHALL BE USED.
   SURFACE COURSE, IL-9.5 VAR. DEPTH STA. 102+00 TO STA. 103+50; AND STA. 108+22 TO STA. 109+55
   BINDER COURSE, IL-19.0, VAR. DEPTH STA. 108+00 TO STA. 108+22
2. THE AGGREGATE SUBGRADE IMPROVEMENT WILL BE PAID FOR AT THE CONTRACT UNIT PRICE PER TON AND SHALL BE PLACED TO THE THICKNESS SPECIFIED.
3. THE AGGREGATE SHOULDER, TYPE B, 4" WILL BE PAID FOR AT THE CONTRACT UNIT PRICE PER TON AND SHALL BE PLACED A MINIMUM THICKNESS OF 4".

PROPOSED LEGEND

- (1) HOT MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50, 1 ½"
- (2) HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50 2½" (RECONSTRUCTION)
- (3) HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50, 2½" (PAVEMENT WIDENING STRIP)
- (4) HOT MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50, VARIABLE DEPTH (RESURFACING, SEE NOTE 1)
- (5) HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50, VARIABLE DEPTH (RESURFACING, SEE NOTE 1)
- (6) HOT MIX ASPHALT SHOULDERS, 4"
  HOT MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50, 1½"
  HOT MIX ASPHALT BINDER COURSE, IL19.0, N50, 2½"
- (7) AGGREGATE SUBGRADE IMPROVEMENT, 16" (SEE NOTE 2)
- (8) AGGREGATE SHOULDERS, TYPE B, 4" (SEE NOTE 3)
- (9) TRAFFIC BARRIER TERMINAL, TYPE 1, TYPE 2, OR TYPE 6A
- (10) TOPSOIL EXCAVATION AND PLACEMENT, 4"
- (11) SEEDING, CLASS 2 WITH EROSION CONTROL BLANKET, TEMPORARY SEEDING & FERTILIZER
- (12) STEEL RAILING, TYPE SM

MODEL: Default
FILE NAME: V:\DeKalbCty\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\01_Roadway\03_Sheet\03_Typical Sections\W22087-sht-typ4all.dgn

ENGINEERING RESOURCE ASSOCIATES

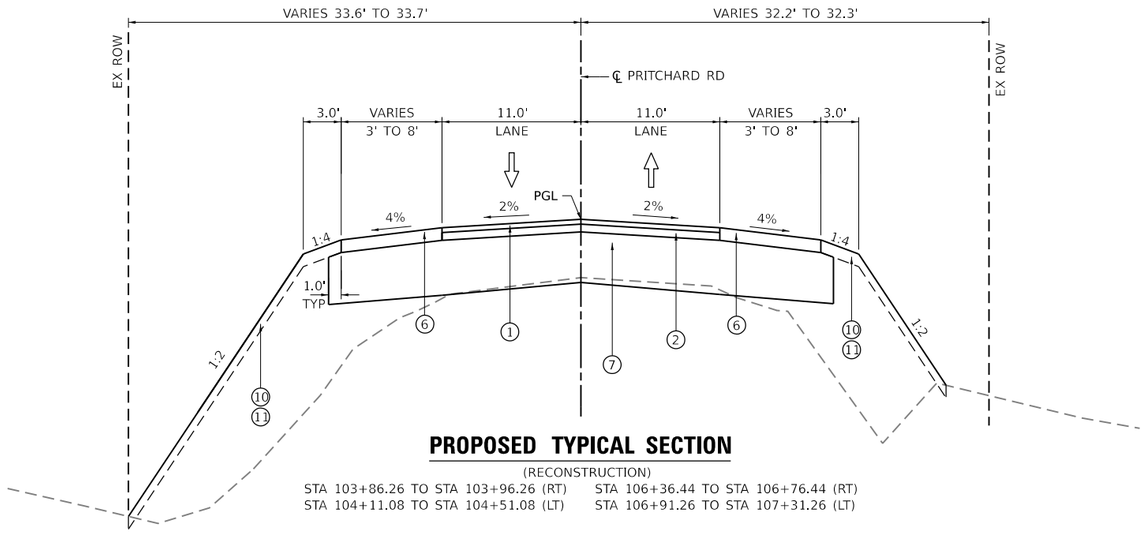
USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024
	DRAWN - T. STENSLIK	REVISED -
PLOT SCALE = 12.000 ' / in.	CHECKED - M. LANGE	REVISED -
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TYPICAL SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: N.T.S. | SHEET 1 OF 2 SHEETS | STA. N/A | TO STA. N/A

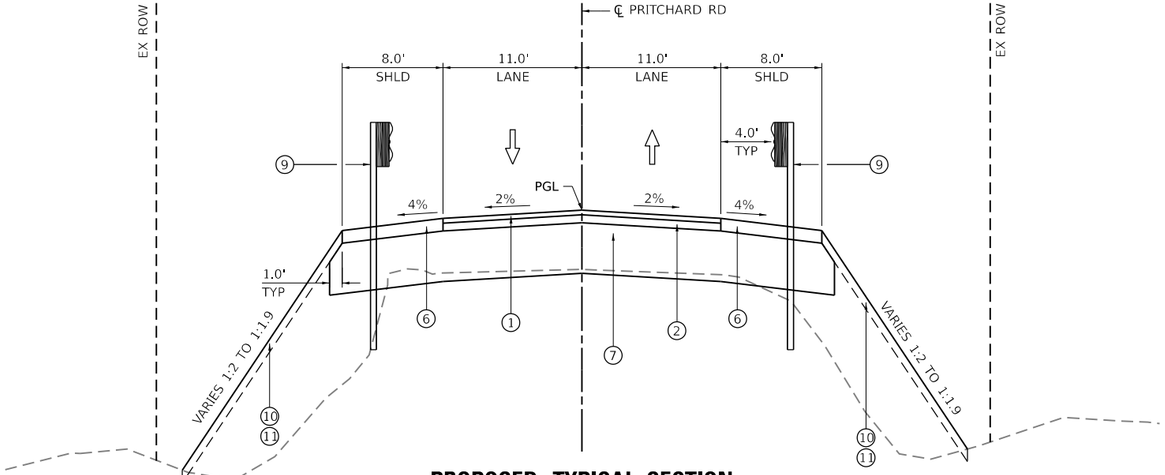
T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	5
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		



PROPOSED TYPICAL SECTION

(RECONSTRUCTION)

STA 103+86.26 TO STA 103+96.26 (RT)
STA 104+11.08 TO STA 104+51.08 (LT)
STA 106+36.44 TO STA 106+76.44 (RT)
STA 106+91.26 TO STA 107+31.26 (LT)



PROPOSED TYPICAL SECTION

(RECONSTRUCTION)

STA 103+96.26 TO STA 104+83.17 (RT)
STA 104+51.08 TO STA 105+02.80 (LT)
STA 105+82.41 TO STA 106+36.44 (RT)
STA 106+02.04 TO STA 106+91.26 (LT)

HOT–MIX ASPHALT REQUIREMENTS

LOCATIONS:	ENTIRE PROJECT	ENTIRE PROJECT	ENTIRE PROJECT	ENTIRE PROJECT
MIXTURE USE(S):	HMA BINDER	HMA SURFACE	HMA SHOULDER BOTTOM LIFT	HMA SHOULDER TOP LIFT
BINDER GRADE (PG):	PG 64-22	PG 64-22	PG 64-22	PG 64-22
DESIGN AIR VOIDS:	4.0% @ N50	4.0% @ N50	4.0% @ N50	4.0% @ N50
MIXTURE COMPOSITION: (MIXTURE GRADATION)	IL-19.0	IL 9.5	IL-19.0	IL 9.5
FRICTION AGGREGATE:		MIXTURE C		
MIXTURE WEIGHT:	112 LB/SY/IN	112 LB/SY/IN	112 LB/SY/IN	112 LB/SY/IN
QUALITY MANAGEMENT PROGRAM:	QCQA	QCQA	QCQA	QCQA
SUBLOT SIZE:	N/A	N/A	N/A	N/A
DENSITY TEST METHOD:	CORES	CORES	CORES	CORES
MATERIAL TRANSFER DEVICE (REQUIRED):	NO	NO	NO	NO

NOTES:

1. HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50 SHALL NOT BE PLACED AT LOCATIONS WHERE THE LIFT THICKNESS IS LESS THAN 2.25". AT ALL LOCATIONS WHERE A LIFT THICKNESS LESS THAN 2.25" IS REQUIRED, SURFACE COURSE IL-9.5 SHALL BE USED.
   SURFACE COURSE, IL-9.5 VAR. DEPTH STA. 102+00 TO STA. 103+50; AND STA. 108+22 TO STA. 109+55
   BINDER COURSE, IL-19.0, VAR. DEPTH STA. 108+00 TO STA. 108+22
2. THE AGGREGATE SUBGRADE IMPROVEMENT WILL BE PAID FOR AT THE CONTRACT UNIT PRICE PER TON AND SHALL BE PLACED TO THE THICKNESS SPECIFIED.
3. THE AGGREGATE SHOULDER, TYPE B, 4" WILL BE PAID FOR AT THE CONTRACT UNIT PRICE PER TON AND SHALL BE PLACED A MINIMUM THICKNESS OF 4".

PROPOSED LEGEND

1. HOT MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50, 1 ½"
2. HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50 2½" (RECONSTRUCTION)
3. HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50, 2½" (PAVEMENT WIDENING STRIP)
4. HOT MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50, VARIABLE DEPTH (RESURFACING, SEE NOTE 1)
5. HOT MIX ASPHALT BINDER COURSE, IL-19.0, N50, VARIABLE DEPTH (RESURFACING, SEE NOTE 1)
6. HOT MIX ASPHALT SHOULDERS, 4"
   HOT MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50, 1½"
   HOT MIX ASPHALT BINDER COURSE, IL19.0, N50, 2½"
7. AGGREGATE SUBGRADE IMPROVEMENT, 16" (SEE NOTE 2)
8. AGGREGATE SHOULDERS, TYPE B, 4" (SEE NOTE 3)
9. TRAFFIC BARRIER TERMINAL, TYPE 1, TYPE 2, OR TYPE 6A
10. TOPSOIL EXCAVATION AND PLACEMENT, 4"
11. SEEDING, CLASS 2 WITH EROSION CONTROL BLANKET, TEMPORARY SEEDING & FERTILIZER
12. STEEL RAILING, TYPE SM

MODEL: Default
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ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkollodziejczyk		DESIGNED - T. STENSLIK	REVISED - 04/26/2024		
		DRAWN - T. STENSLIK	REVISED -		
PLOT SCALE = 12.000 ' / in.		CHECKED - M. LANGE	REVISED -		
PLOT DATE = 4/29/2024		DATE - 12/27/2023	REVISED -		

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TYPICAL SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: N.T.S. | SHEET 1 OF 2 SHEETS | STA. N/A | TO STA. N/A

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	6
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

EARTHWORK SCHEDULE													
STA TO STA		LENGTH	END AREAS				20200100			20400800	21101505		
			EARTH EXCAVATION	EMBANKMENT (SUITABLE FILL)	TOPSOIL EXCAVATION	TOPSOIL PLACEMENT	EARTH EXCAVATION	EARTH EX ADJ (15 %)	EMBANKMENT	BALANCE WASTE (+) SHORTAGE (-)	TOPSOIL EXCAVATION & PLACEMENT	TOPSOIL TO BE PLACED	TOPSOIL BALANCE WASTE (+) SHORTAGE (-)
		(FT)	(SF)	(SF)	(SF)	(SF)	CU YD	CU YD	CU YD	CU YD	CU YD	CU YD	CU YD
102+00	102+50	50	4.7	0.0	5.4	3.4	8.7	7.4	1.6	5.8	11.8	7.6	4.2
102+50	103+00	50	4.7	1.7	7.3	4.8	9.9	8.5	9.0	-0.5	15.0	10.5	4.5
103+00	103+50	50	6.0	8.0	8.9	6.6	6.0	5.1	21.0	-15.9	17.1	12.6	4.4
103+50	RESURFACING TO RECON.		0.5	14.7			0.0	0.0	0.0	0.0	0.0	0.0	0.0
103+50	104+00	50	28.9	16.9	9.6	7.1	34.5	29.3	64.5	-35.2	20.7	14.7	6.0
104+00	104+50	50	8.3	52.7	12.8	8.8	7.7	6.6	115.9	-109.4	24.8	15.9	8.9
104+50	104+83	33	0.0	72.5	14.1	8.4	15.2	12.9	80.4	-67.5	17.6	8.2	9.4
104+83	105+00	17	24.7	58.5	14.6	4.9	8.0	6.8	30.8	-24.0	6.9	3.1	3.8
105+00	105+05	5	0.9	40.2	7.4	4.9	0.5	0.4	4.5	-4.1	1.2	0.5	0.7
105+05			4.3	7.1	4.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
BRIDGE LIMITS AT ROADWAY CL: STA. 104+94.14 TO STA. 105+93.38 (SEE STRUCTURE EXCAVATION AND CHANNEL EXCAVATION)													
105+82	106+00	18	1.3	26.8	4.3	0.0	0.4	0.4	16.0	-15.6	3.7	1.4	2.2
106+00	106+04	4	0.1	22.2	7.0	4.4	0.7	0.6	9.2	-8.6	1.7	0.7	1.0
106+04	106+50	46	8.3	92.1	13.8	4.4	7.0	6.0	156.4	-150.4	23.7	11.2	12.5
106+50	107+00	50	0.0	93.0	14.3	8.9	5.5	4.7	139.8	-135.1	24.3	15.5	8.8
107+00	107+50	50	6.0	58.0	12.0	7.9	21.1	17.9	73.8	-55.9	19.9	13.4	6.4
107+50	108+00	50	16.8	21.7	9.5	6.6	39.4	33.5	33.8	-0.3	16.7	11.7	5.1
108+00	RESURFACING TO RECON.		25.8	14.8			0.0	0.0	0.0	0.0	0.0	0.0	0.0
108+00	108+50	50	3.3	14.5	8.6	6.0	6.3	5.3	26.3	-20.9	15.5	10.7	4.7
108+50	109+00	50	3.5	13.9	8.1	5.6	6.8	5.8	24.1	-18.4	14.4	10.0	4.4
109+00	109+50	50	3.8	12.1	7.4	5.2	6.7	5.7	13.2	-7.5	11.9	7.9	3.9
109+50	109+55	5	3.3	2.1	5.4	3.4	0.8	0.7	0.2	0.5	0.7	0.5	0.3
109+55			5.0	0.0	2.5	1.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0
						TOTAL	185.2	157.4	820.6	-663.2	247.5	156.3	91.2
						ADJUSTED	190	160	825	665	250	160	95

EARTHWORK NOTES;

1. EARTH EXCAVATION, STOCKPILE (IF REQUIRED) AND SUBSEQUENT PLACEMENT (WHEN APPLICABLE) SHALL ONLY BE MEASURED AND PAID FOR ONCE, NOT EACH TRANSPORT. ALL STOCKPILES TO BE APPROVED OF BY ENGINEER.
2. EXISTING TOPSOIL EXCAVATION SHALL BE MEASURED IN PLACE AND PAID PER CUBIC YARD AS "TOPSOIL EXCAVATION AND PLACEMENT". EXISTING TOPSOIL IS ASSUMED TO BE SUITABLE FOR PROPOSED TOPSOIL. AN ASSUMED DEPTH OF 4" WAS USED TO CALCULATE EXISTING TOPSOIL.
3. TOPSOIL STRIPPED IN EXCESS OF THAT REQUIRED FOR THE CONTRACT, SHALL BE REMOVED PER ARTICLE 202.03 OF THE STANDARD SPECIFICATIONS AND WILL BE INCLUDED IN THE COST OF THE INITIAL "TOPSOIL EXCAVATION AND PLACEMENT".

UNDERCUT NOTES;

1. UNDERCUTS WILL BE PAID FOR AS "REMOVAL AND DISPOSAL OF UNSUITABLE MATERIAL."
2. THE PROPOSED EMBANKMENT GRADING WILL INCLUDE FILLING THE EXISTING DITCHES. LOW STRENGTH, UNSUITABLE SOILS MAY BE ENCOUNTERED AT THE BASE. POOR SOILS SHALL BE UNDERCUT AND REMOVED. GEOTECHNICAL FABRIC FOR GROUND STABILIZATION SHOULD BE PLACED AT ANY UNDERCUTS. A NOMINAL QUANTITY HAS BEEN INCLUDED IN THE CONTRACT.

PAVEMENT SCHEDULE								
STA TO STA		30300011	40600275	40600290	40603080	40604050	48101200	48203013
		AGGREGATE SUBGRADE IMPROVEMENT	BITUMINOUS MATERIAL (PRIME COAT)	BITUMINOUS MATERIAL (TACK COAT)	HOT-MIX ASPHALT BINDER COURSE, IL-19.0, N50	HOT-MIX ASPHALT SURFACE COURSE, IL-9.5, MIX "C", N50	AGGREGATE SHOULDERS, TYPE B	HOT-MIX ASPHALT SHOULDERS, 4"
		(TON)	(POUND)	(POUND)	(TON)	(TON)	(TON)	(SQ YD)
102+00	102+50	12.6	41.1	53.8	1.1	13.4	6.7	0.0
102+50	103+00	20.8	48.8	55.0	1.3	17.8	6.7	0.0
103+00	103+50	33.7	48.8	55.0	1.3	22.7	6.7	0.0
103+50	104+00	124.9	300.0	34.4	17.1	10.3	3.8	30.5
104+00	104+50	163.7	393.8	43.4	17.1	10.3	0.7	70.7
104+50	105+00	171.2	424.8	41.4	15.1	9.1	0.0	75.7
105+00	105+50	8.2	6.0	0.6	0.0	0.0	0.0	2.5
105+50	106+00	29.4	68.1	6.7	2.2	1.4	0.0	13.6
106+00	106+50	190.7	483.1	47.1	17.1	10.3	0.0	87.0
106+50	107+00	163.9	393.8	40.9	17.1	10.3	1.6	59.7
107+00	107+50	126.4	300.0	31.9	17.1	10.3	4.6	19.5
107+50	108+00	118.2	300.0	27.5	17.1	10.3	6.7	0.0
108+00	108+50	39.2	50.2	67.1	8.9	17.3	6.7	0.0
108+50	109+00	37.9	50.0	55.0	1.4	21.3	6.7	0.0
109+00	109+55	26.2	46.1	59.4	0.0	18.0	7.3	0.0
TOTAL =		1267.0	2954.4	619.1	134.0	182.5	58.0	359.1
ADJUSTED TOTAL =		1268	2960	620	135	183	58	360

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FILE NAME: V:\DeKalbCty\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\01_Roadway\03_Sheet\04_Sched\dgnsW22087-4th-schedule.dgn

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	SCHEDULE OF QUANTITIES PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK	
	DRAWN - T. STENSLIK	REVISED -			
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -			
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -		SCALE: N.T.S. SHEET 1 OF 2 SHEETS STA. N/A TO STA. N/A	

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	7
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		

EROSION CONTROL SCHEDULE							
STA TO STA		LENGTH	25100115	25100630	28000250	28000305	28000400
			MULCH, METHOD 2	EROSION CONTROL BLANKET	TEMPORARY EROSION CONTROL SEEDING	TEMPORARY DITCH CHECKS	PERIMETER EROSION BARRIER
			(ACRE)	(SQ YD)	(POUND)	(FOOT)	(FOOT)
102+00	102+50	50	0.27	214.0	26.5	-	150.0
102+50	103+00	50	0.26	211.1	26.2	-	150.0
103+00	103+50	50	0.26	211.1	26.2	-	150.0
103+50	104+00	50	0.24	195.1	24.2	-	150.0
104+00	104+50	50	0.22	180.7	22.4	-	154.9
104+50	105+00	50	0.17	136.5	16.9	-	112.0
105+00	105+50	50	0.03	24.6	3.0	10	58.9
105+50	106+00	50	0.05	41.6	5.2	10	67.0
106+00	106+50	50	0.24	194.9	24.2	10	105.0
106+50	107+00	50	0.26	206.0	25.5	-	110.0
107+00	107+50	50	0.25	202.2	25.1	-	100.0
107+50	108+00	50	0.26	211.2	26.2	-	100.0
108+00	108+50	50	0.26	211.2	26.2	-	100.0
108+50	109+00	50	0.26	211.2	26.2	-	100.0
109+00	109+55	55	0.29	234.9	29.1	-	110.0
		TOTAL =	3.33	2686.4	333.0	30	1717.8
		ADJUSTED TOTAL =	3.5	2687	340	30	1718

1. TEMPORARY SEEDING AND MULCH METHOD SHALL BE APPLIED 6 TIMES OVER THE PROJECT DURATION AS DIRECTED BY THE ENGINEER.

REMOVAL SCHEDULE					
STA TO STA		44000100	44000157	72400100	
		PAVEMENT REMOVAL	HOT-MIX ASPHALT SURFACE REMOVAL, 2"	REMOVE SIGN PANEL ASSEMBLY - TYPE A	
		(SQ YD)	(SQ YD)	(EACH)	
102+00	102+50	0.0	115.1	0	
102+50	103+00	0.0	115.2	0	
103+00	103+50	0.0	115.1	0	
103+50	104+00	115.4	0.0	0	
104+00	104+50	115.6	0.0	0	
104+50	105+00	120.9	0.0	2	
105+00	105+50	16.5	0.0	1	
105+50	106+00	1.7	0.0	0	
106+00	106+50	114.1	0.0	2	
106+50	107+00	115.7	0.0	0	
107+00	107+50	114.7	0.0	0	
107+50	108+00	114.5	0.0	0	
108+00	108+50	0.0	114.8	0	
108+50	109+00	0.0	115.0	0	
109+00	109+55	0.0	126.8	0	
	TOTAL =	829.0	702.1	5	
	ADJUSTED TOTAL =	830	703	5	

RESTORATION SCHEDULE						
STA TO STA		LENGTH	25000200	25000400	25000500	25000600
			SEEDING, CLASS 2	NITROGEN FERTILIZER NUTRIENT	PHOSPHORUS FERTILIZER NUTRIENT	POTASSIUM FERTILIZER NUTRIENT
			(ACRE)	(POUND)	(POUND)	(POUND)
102+00	102+50	50	0.04	4.0	4.0	4.0
102+50	103+00	50	0.04	3.9	3.9	3.9
103+00	103+50	50	0.04	3.9	3.9	3.9
103+50	104+00	50	0.04	3.6	3.6	3.6
104+00	104+50	50	0.04	3.4	3.4	3.4
104+50	105+00	50	0.03	2.5	2.5	2.5
105+00	105+50	50	0.01	0.5	0.5	0.5
105+50	106+00	50	0.01	0.8	0.8	0.8
106+00	106+50	50	0.04	3.6	3.6	3.6
106+50	107+00	50	0.04	3.8	3.8	3.8
107+00	107+50	50	0.04	3.8	3.8	3.8
107+50	108+00	50	0.04	3.9	3.9	3.9
108+00	108+50	50	0.04	3.9	3.9	3.9
108+50	109+00	50	0.04	3.9	3.9	3.9
109+00	109+55	55	0.05	4.4	4.4	4.4
		TOTAL =	0.56	50.0	50.0	50.0
		ADJUSTED TOTAL =	0.75	50	50	50

MODEL: Default
FILE NAME: V:\Dekalb\City\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\03_Roadway\03_Sheet\04_Schedules\W22087-sht-schedule.dgn

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkollodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	**STATE OF ILLINOIS**	**SCHEDULE OF QUANTITIES**	
	DRAWN - T. STENSLIK	REVISED -	**DEPARTMENT OF TRANSPORTATION**	**PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK**	
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -		SCALE: N.T.S. SHEET 2 OF 2 SHEETS STA. N/A TO STA. N/A	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -			

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	8
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		

CONTROL POINTS

POINT #1	LOCATION	NORTHING	EASTING
1	STA. 103+12.18; OFF -10.15'	1863086.426	905576.122
2	STA. 106+42.71; OFF -10.06	1863416.950	905573.652
3	STA. 110+09.67; OFF 10.05	1863784.061	905590.611
4	STA. 100+00.00; OFF 9.90	1862746.605	905598.016
5	STA. 101+96.09; OFF -10.03	1862970.345	905577.154
6	STA. 104+55.61; OFF 9.50	1863230.005	905594.660
7	STA. 108+05.38; OFF 9.92	1863579.741	905592.264

COORDINATE TABLE – PRITCHARD RD

LOCATION	ALIGNMENT POINT	NORTHING	EASTING
POT 1	100+00.00	1862774.331	905588.003
POT 2	101+95.13	1862969.460	905587.185
BEGIN IMPROVEMENTS	102+00.00	1862974.329	905587.147
POT 3	107+08.97	1863483.282	905583.198
END IMPROVEMENTS	109+55.00	1863729.305	905581.043
POT 4	111+08.66	1863882.962	905579.697

N

0 50 100 150

SCALE IN FEET

BENCHMARK LIST

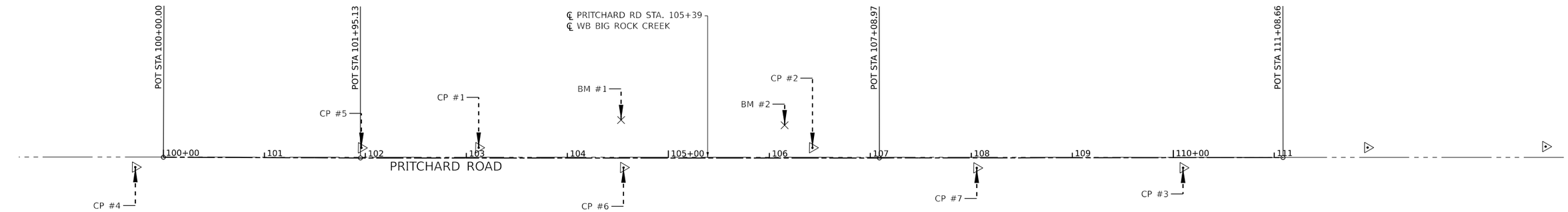
BM #1: STA 104+53.21 -37.54' LT
EL. 736.58 - RAILROAD SPIKE IN UTILITY POLE
N: 1863227.242 E: 905547.647

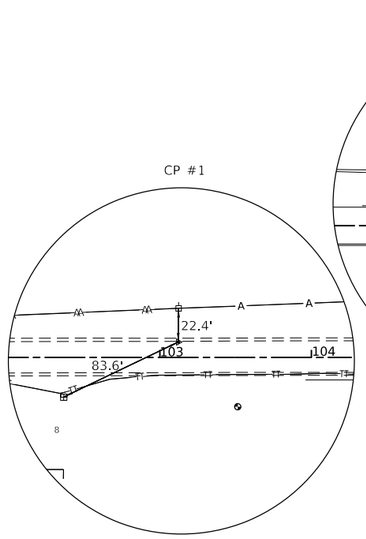
BM #2: STA 106+15.14 -32.39' LT
EL. 737.19 - RAILROAD SPIKE IN UTILITY POLE
N:1863389.205 E: 905551.535

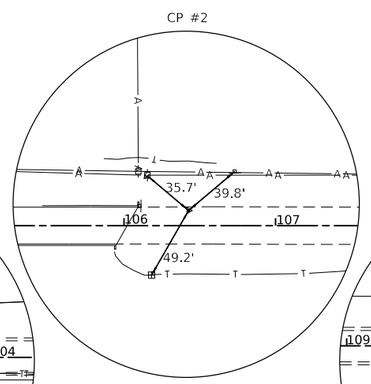
LEGEND

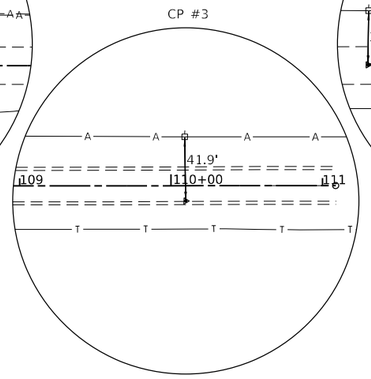
CONTROL POINT

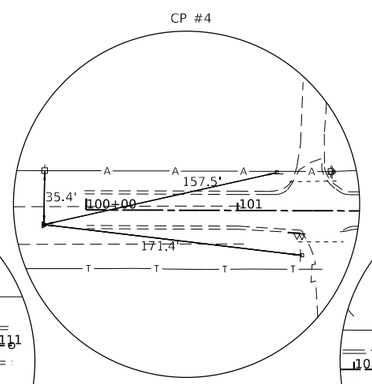
BENCHMARK

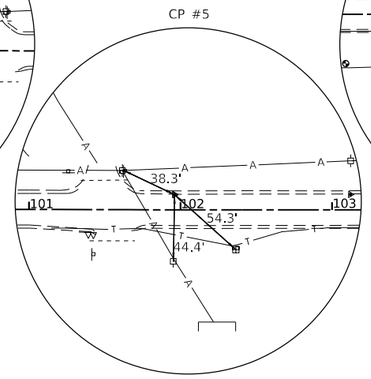


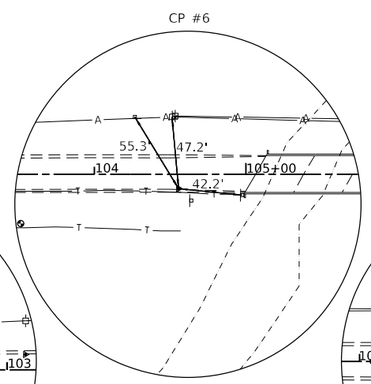


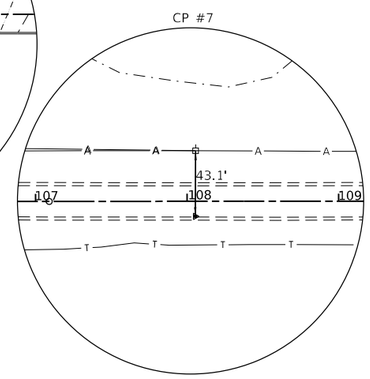












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ENGINEERING RESOURCE ASSOCIATES

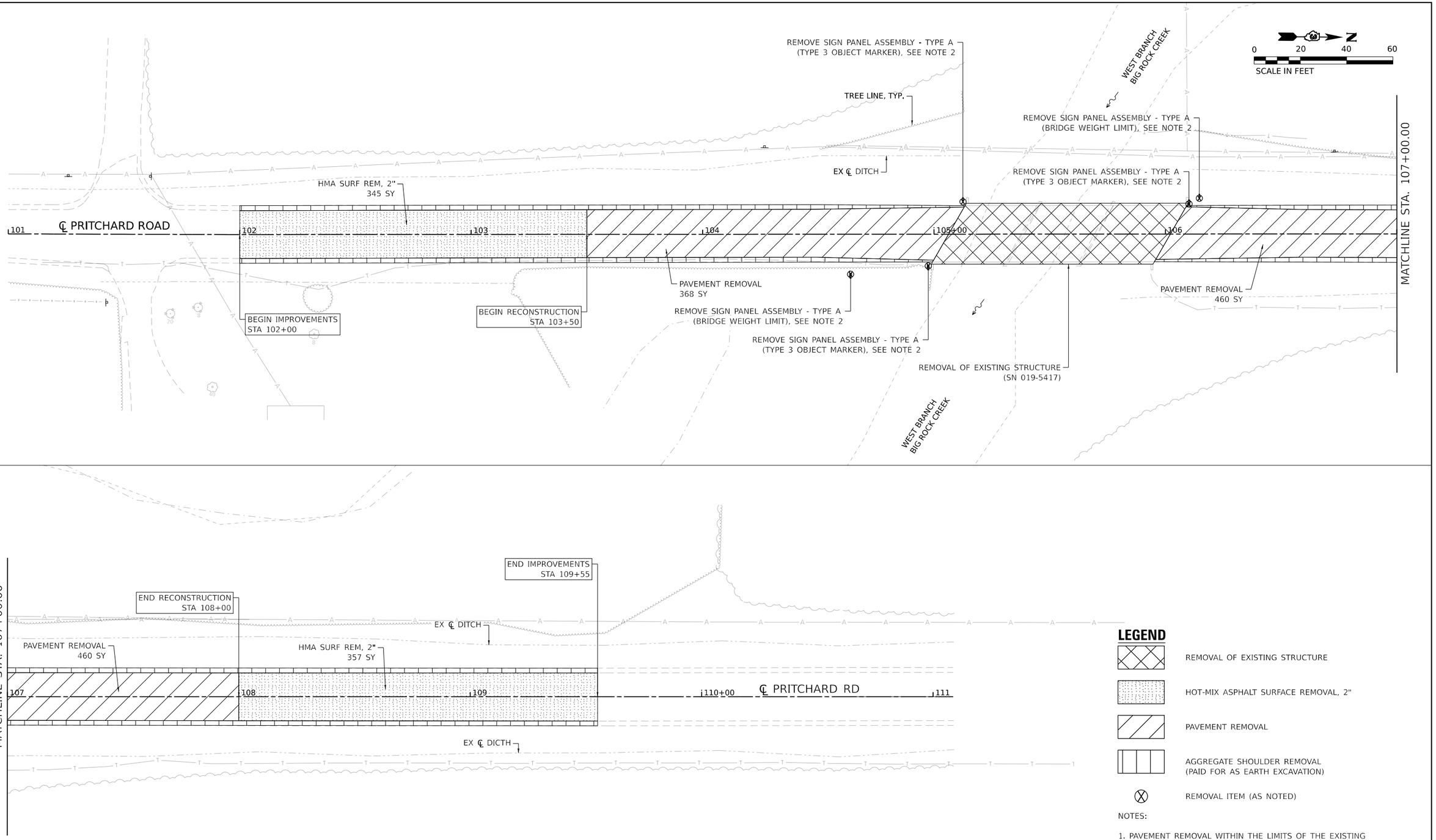
USER NAME = kkołodziejczyk		DESIGNED - T. STENSLIK	REVISED - 04/26/2024		
		DRAWN - T. STENSLIK	REVISED -		
PLOT SCALE = 100.000 ' / in.		CHECKED - M. LANGE	REVISED -		
PLOT DATE = 4/29/2024		DATE - 12/27/2023	REVISED -		

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

ALIGNMENT, TIES, AND BENCHMARKS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1" = 50' | SHEET 1 OF 1 SHEETS | STA. N/A | TO STA. N/A

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	9
		CONTRACT NO. 87818		
	ILLINOIS FED. AID PROJECT			



LEGEND

- REMOVAL OF EXISTING STRUCTURE
- HOT-MIX ASPHALT SURFACE REMOVAL, 2"
- PAVEMENT REMOVAL
- AGGREGATE SHOULDER REMOVAL (PAID FOR AS EARTH EXCAVATION)
- ⊗ REMOVAL ITEM (AS NOTED)

NOTES:

1. PAVEMENT REMOVAL WITHIN THE LIMITS OF THE EXISTING BRIDGE IS INCLUDED IN THE COST OF REMOVAL OF EXISTING STRUCTURES.

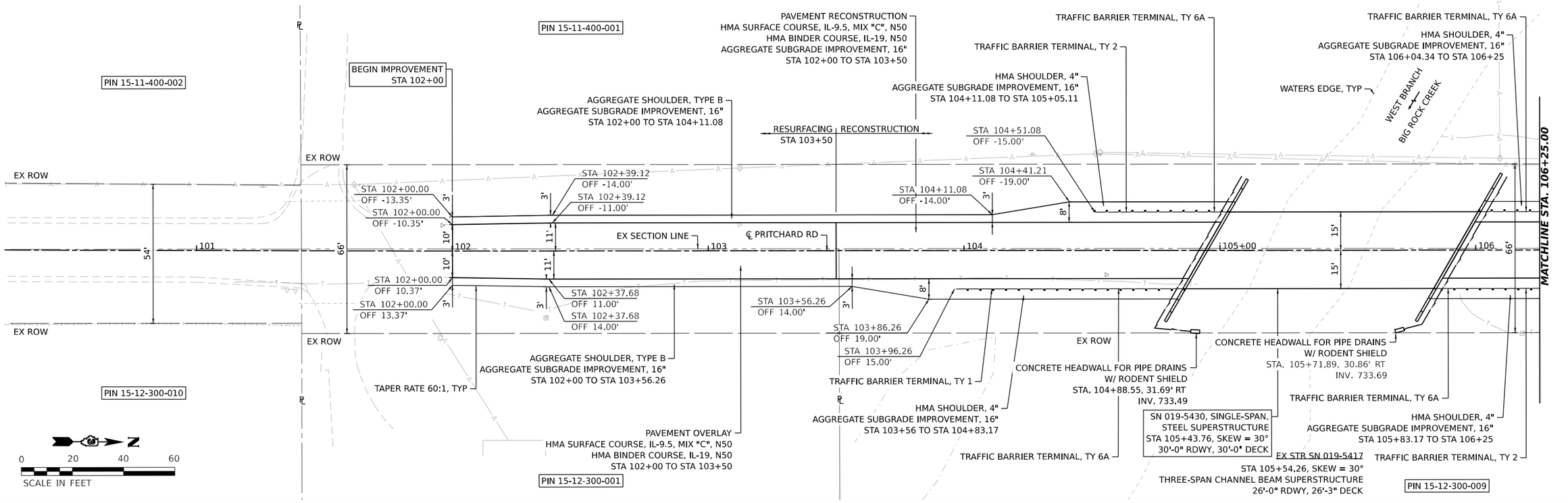
2. THE TYPE 3 OBJECT MARKERS AND WEIGHT LIMIT SIGNAGE SHALL BE SALVAGED, AND SHALL REMAIN THE PROPERTY OF SQUAW GROVE ROAD DISTRICT. THE CONTRACTOR SHALL REMOVE, STORE, AND PROTECT SALVAGED ITEMS UNTIL RETRIEVED BY THE HIGHWAY COMMISSIONER.

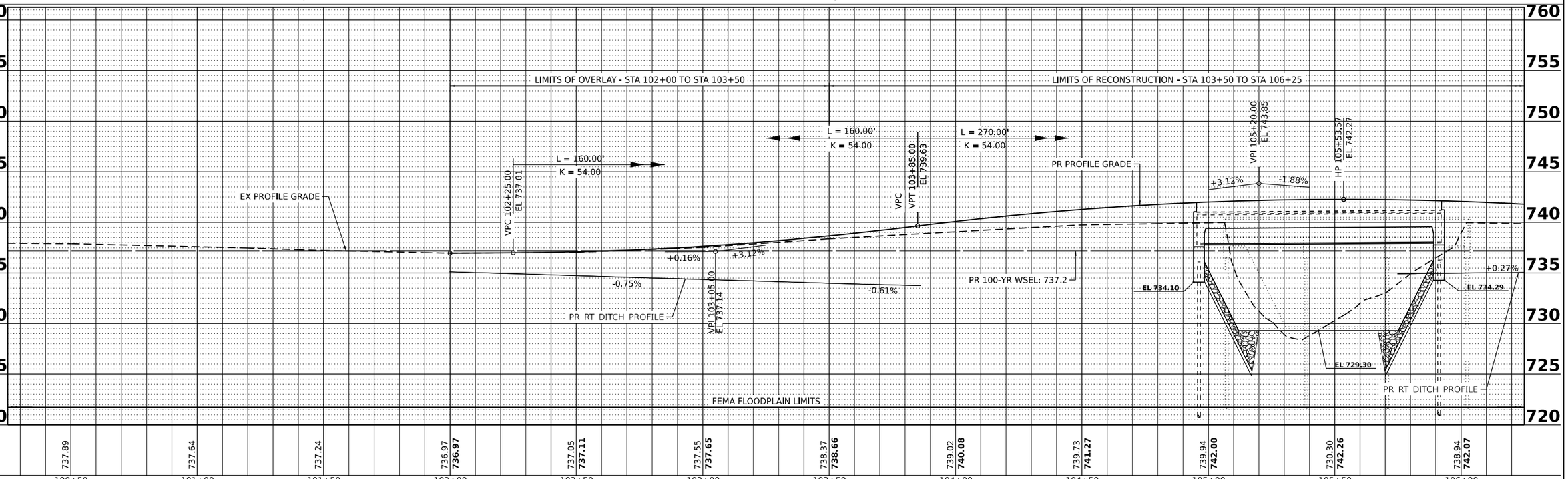
MODEL: PrCL_Pritchard - Plan 1 [Sheet]
FILE NAME: V:\DeKalb\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\01_Roadway\03_Sheet\06_Removal Plans\W22087-alt+removal.dgn

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	**STATE OF ILLINOIS**	**REMOVAL PLAN**	
	DRAWN - T. STENSLIK	REVISED -	**DEPARTMENT OF TRANSPORTATION**	**PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK**	
PLOT SCALE = 0.16666000 ' / in.	CHECKED - M. LANGE	REVISED -		SCALE: 1" = 20' SHEET 1 OF 1 SHEETS STA. 101+00 TO STA. 111+00	
PLOT DATE = 4/29/2024	DATE - 07/28/2023	REVISED -			

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	10
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		





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ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024
	DRAWN - T. STENSLIK	REVISED -
PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -
PLOT DATE = 4/29/2024	DATE - 07/28/2023	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

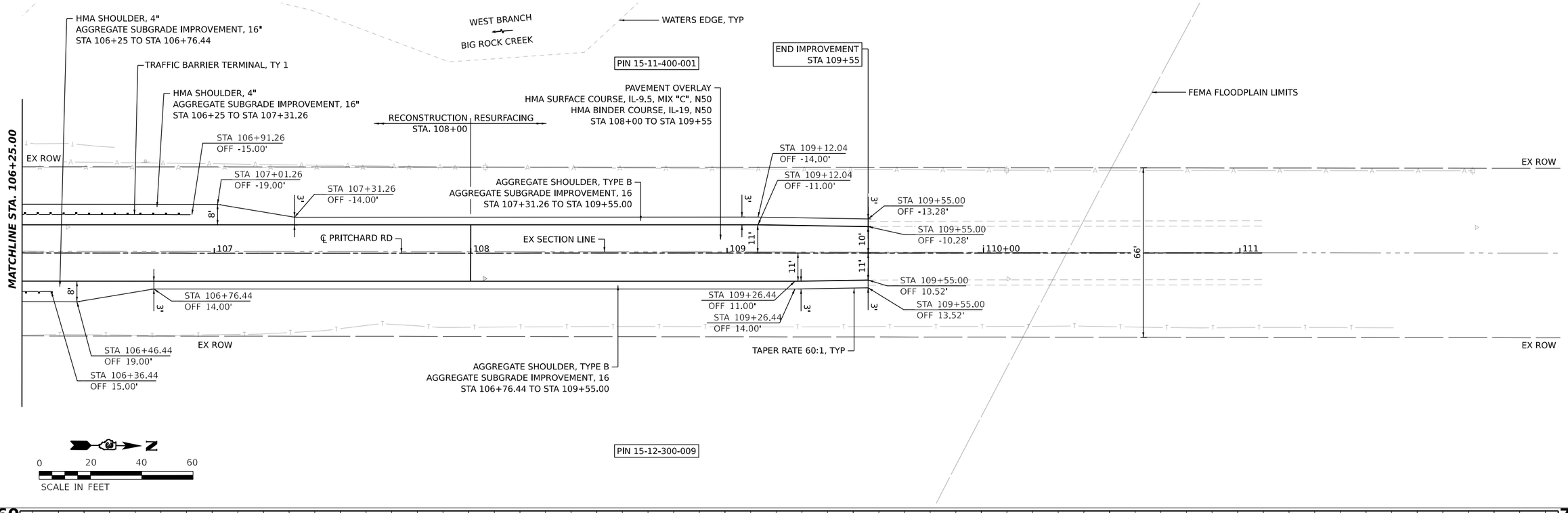
PLAN AND PROFILE
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

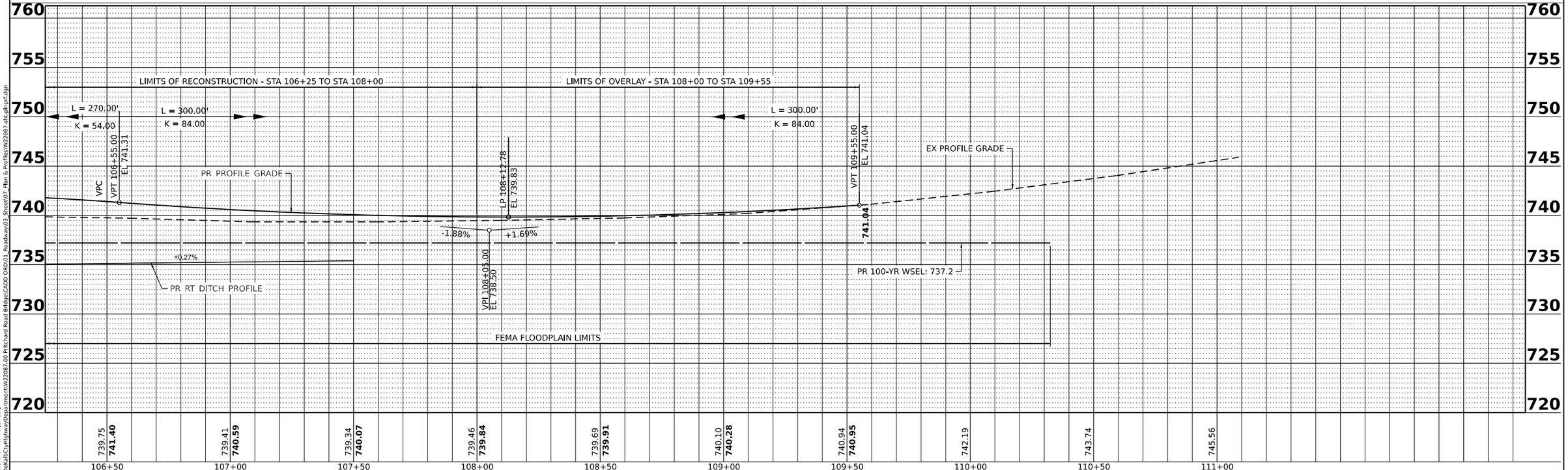
SCALE: 1"=20' | SHEET 1 OF 2 SHEETS | STA. 100+50.00 TO STA. 106+25.00

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	11

CONTRACT NO. 87818

ILLINOIS | FED. AID PROJECT





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ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	**STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION**	**PLAN AND PROFILE**
		DRAWN - T. STENSLIK	REVISED -		**PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK**
	PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -		SCALE: 1"=20' SHEET 2 OF 2 SHEETS STA. 106+25.00 TO STA. 111+00.00
	PLOT DATE = 4/29/2024	DATE - 07/28/2023	REVISED -		

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	12
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

LEGEND

IDOT D3
STANDARD 720-10
(BY OTHERS)

W20-3
48" X 48"

W20-3
48" X 48"

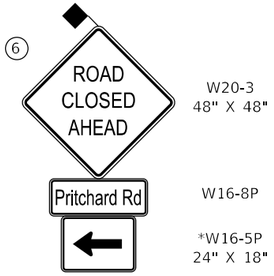
R11-2
48" X 30"

R11-4
48" X 30"

TYPE III BARRICADES
WITH 2 FLASHING LIGHTS

SIGN WITH
DOUBLE POST

SIGN WITH
SINGLE POST

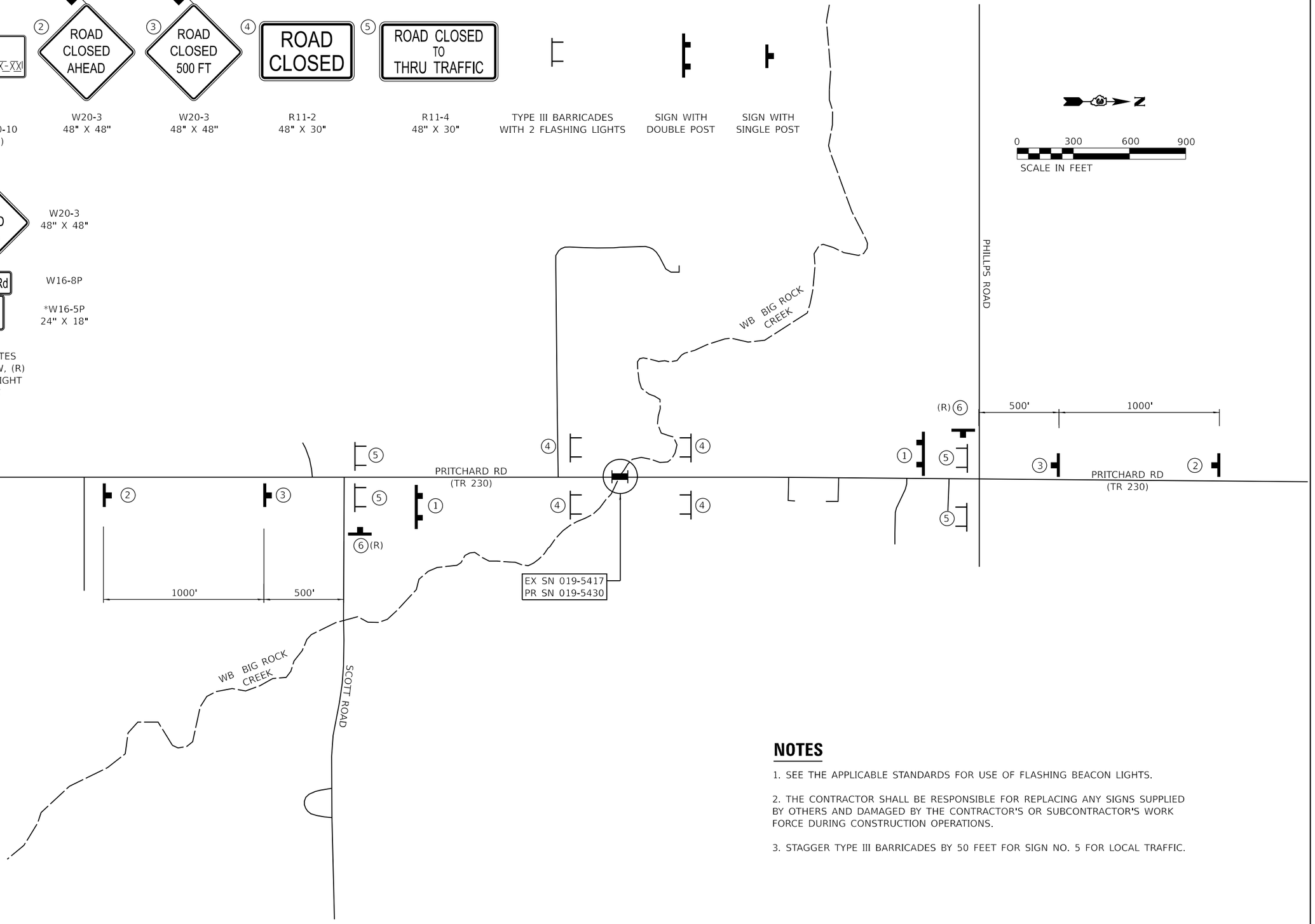


W20-3
48" X 48"

W16-8P

*W16-5P
24" X 18"

*(L) DENOTES
LEFT ARROW, (R)
DENOTES RIGHT
ARROW



NOTES

1. SEE THE APPLICABLE STANDARDS FOR USE OF FLASHING BEACON LIGHTS.

2. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REPLACING ANY SIGNS SUPPLIED BY OTHERS AND DAMAGED BY THE CONTRACTOR'S OR SUBCONTRACTOR'S WORK FORCE DURING CONSTRUCTION OPERATIONS.

3. STAGGER TYPE III BARRICADES BY 50 FEET FOR SIGN NO. 5 FOR LOCAL TRAFFIC.

MODEL: Default
FILE NAME: V:\DeKalbCty\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\01 Roadway\03 Sheet\08 Detour & TCP\W22087-sht-detour.dgn

ENGINEERING RESOURCE ASSOCIATES

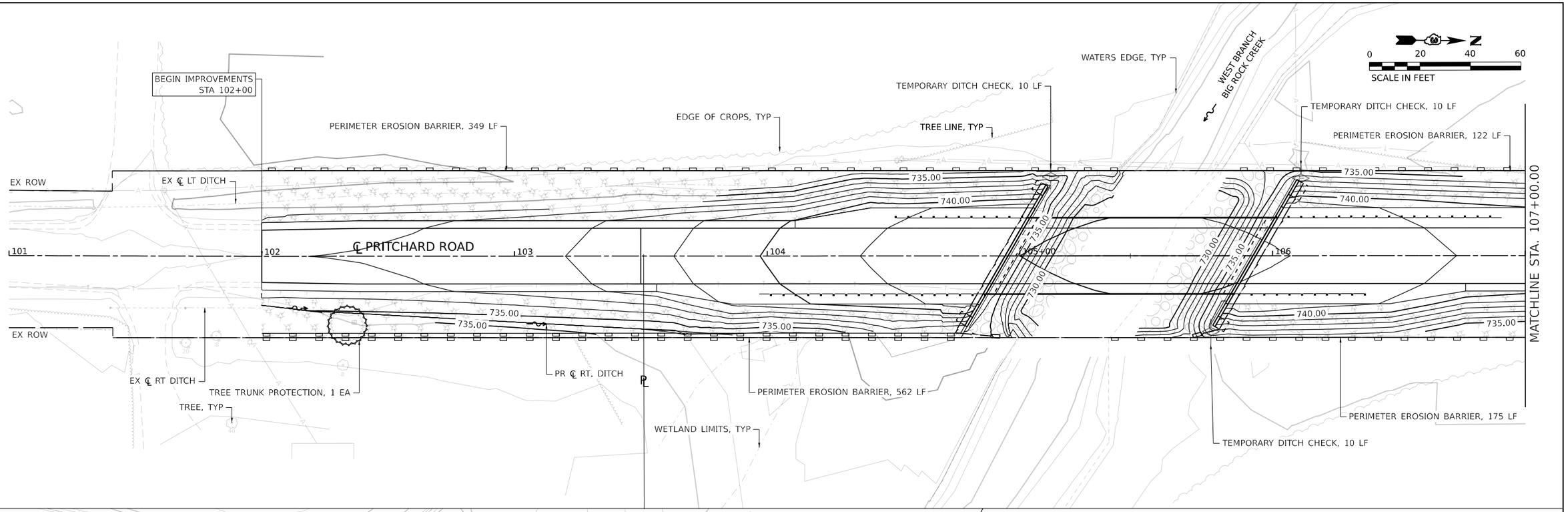
USER NAME = kkolodziejczyk		DESIGNED -	T. STENSLIK	REVISED -	04/26/2024
		DRAWN -	T. STENSLIK	REVISED -	
PLOT SCALE = 600.000 ' / in.		CHECKED -	M. LANGE	REVISED -	
PLOT DATE = 4/29/2024		DATE -	12/27/2023	REVISED -	

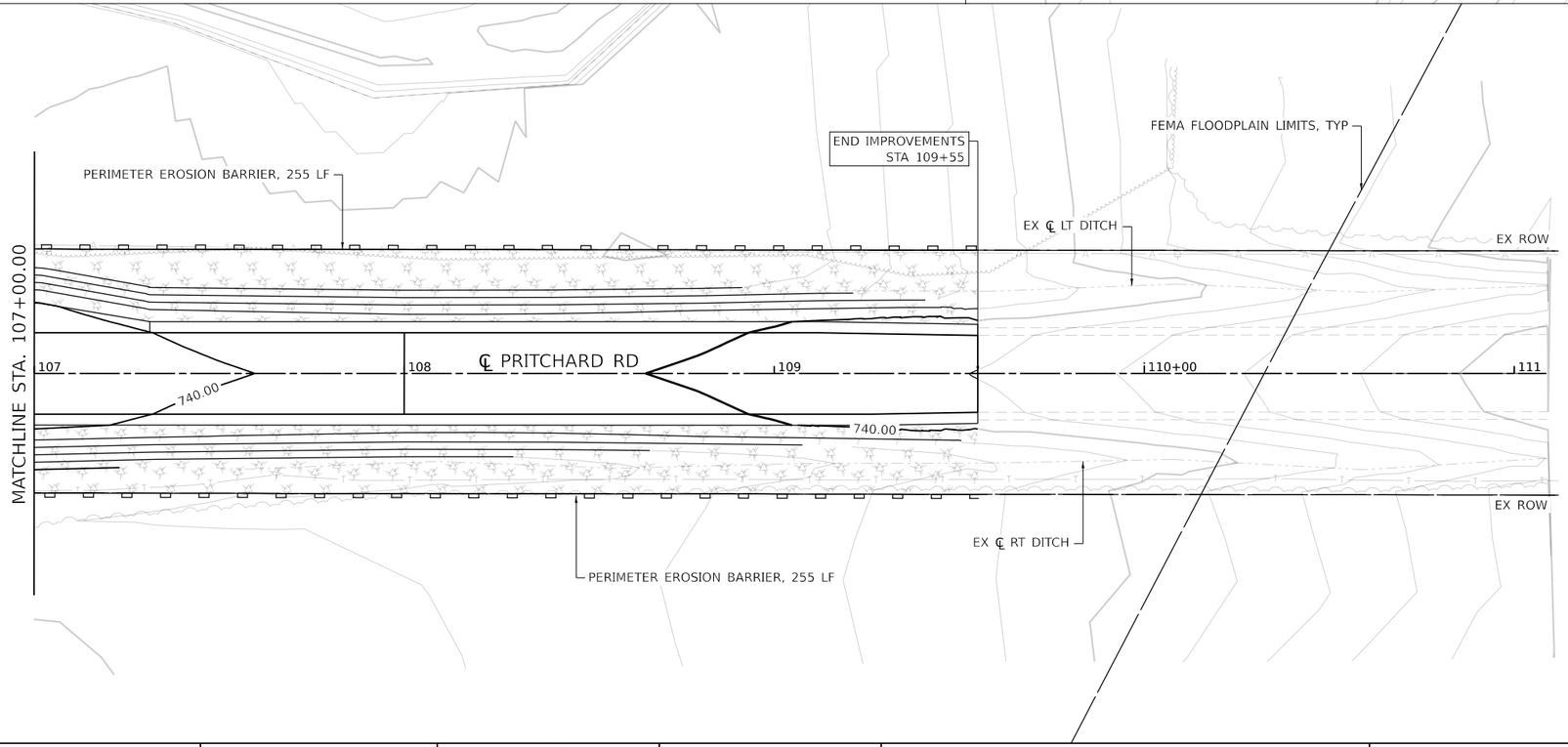
STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TRAFFIC CONTROL PLAN
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1"=300' | SHEET 1 OF 1 SHEETS | STA. N/A | TO STA. N/A

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	13
		CONTRACT NO. 87818		
	ILLINOIS FED. AID PROJECT			





LEGEND

- TEMPORARY EROSION CONTROL SEEDING MULCH METHOD 2
- STONE RIPRAP, CLASS A4 (SEE STRUCTURAL PLANS)
- PERIMETER EROSION BARRIER
- TREE TRUNK PROTECTION
- TEMPORARY DITCH CHECKS

MODEL: PrCL_Pritchard - Plan 1 [Sheet]
FILE NAME: V:\Hakalt\Civil\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\05_Environmental\03_Sheet\09_Erosion & Sediment Control\W22087-sht-eros.dgn

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EROSION CONTROL PLAN PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK	
	DRAWN - T. STENSLIK	REVISED -			
PLOT SCALE = 0.16666000 ' / in.	CHECKED - M. LANGE	REVISED -			
PLOT DATE = 4/29/2024	DATE - 07/28/2023	REVISED -		SCALE: 1"=20' SHEET 1 OF 1 SHEETS STA. 102+00 TO STA. 109+55	

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	14
		CONTRACT NO. 87818		
	ILLINOIS FED. AID PROJECT			

GENERAL SOIL EROSION AND SEDIMENT CONTROL NOTES

1. THE RESIDENT ENGINEER MUST BE NOTIFIED ONE WEEK PRIOR TO THE PRE-CONSTRUCTION MEETING, ONE WEEK PRIOR TO THE COMMENCEMENT OF LAND DISTURBING ACTIVITIES AND ONE WEEK PRIOR TO THE FINAL INSPECTION.

2. A COPY OF THE APPROVED STORMWATER POLLUTION PREVENTION PLAN (SWPPP) SHALL BE MAINTAINED ON SITE.

3. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO INFORM ANY SUB-CONTRACTOR(S) WHO MAY PERFORM WORK ON THIS OF THE REQUIREMENTS TO IMPLEMENT AND MAINTAIN THE SWPPP AND ALL PERMIT CONDITIONS AS REQUIRED BY THE NATIONAL POLLUTION DISCHARGE ELIMINATION SYSTEM (NPDES) ILR10 PERMIT SET FORTH BY THE EPA, THE U.S. ARMY CORPS OF ENGINEERING JOINT 404 PERMIT AND ALL REQUIREMENTS SET FORTH BY DEKALB COUNTY, THE DEKALB COUNTY SOIL AND WATER CONSERVATION DISTRICT (DCSWCD) AND THE STATE OF ILLINOIS.

4. THE EROSION CONTROL MEASURES INDICATED ON THE PLANS ARE THE MINIMUM REQUIREMENTS. THE CONTRACTOR IS RESPONSIBLE FOR INSTALLATION OF ANY ADDITIONAL EROSION CONTROL MEASURES NECESSARY TO PREVENT EROSION AND SEDIMENTATION AS DETERMINED BY THE ENGINEER, THE DCSWCD OR THE COUNTY IN ACCORDANCE WITH THE STANDARD SPECIFICATIONS AND THE ILLINOIS URBAN MANUAL.

5. ALL TEMPORARY AND PERMANENT EROSION CONTROL MEASURES SHALL BE INSTALLED PER THE ILLINOIS URBAN MANUAL STANDARD DETAILS OR AS DIRECTED BY THE RESIDENT ENGINEER. ALL MEASURES MUST BE IN PLACE PRIOR TO ANY LAND DISTURBING ACTIVITIES AND MAINTAINED AND REPAIRED AS NEEDED. THE CONTRACTOR SHALL BE ULTIMATELY RESPONSIBLE FOR MAINTENANCE, REPAIR AND INSPECTION OF EROSION CONTROL MEASURES.

6. ALL EROSION CONTROL MEASURES MUST BE INSPECTED WEEKLY AND WITHIN 24-HRS AFTER A RAIN EVENT GREATER THAN ½ ".

7 THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING THE PRACTICES ARE WORKING PROPERLY AND DETERMINING IF ADDITIONAL PRACTICES ARE NEEDED FOR BETTER SOIL EROSION AND SEDIMENT CONTROL. IF ADDITIONAL PRACTICES ARE DEEMED NECESSARY, THE CONTRACTOR WILL IMPLEMENT THE PRACTICE IN A TIMELY MANNER.

8. ALL AREAS OF DISTURBED SOIL SHALL BE STABILIZED WITH BLANKET FOLLOWING COMPLETION OF SOIL DISTURBING ACTIVITIES.

9. ALL ADJACENT ROADWAYS MUST BE KEPT CLEAR OF DEBRIS, INSPECTED DAILY AND CLEANED AT THE END OF EACH DAY'S OPERATION OR MORE FREQUENTLY AS REQUIRED BY THE ENGINEER.

10. THE CONTRACTOR SHALL COMPLY WITH ALL REQUIREMENTS AND PERMIT CONDITIONS FROM THE U.S. ARMY CORPS OF ENGINEERS, THE DCSWCD, THE IEPA AND DEKALB COUNTY.

11. THE COST OF ALL MATERIALS, EQUIPMENT, AND LABOR NECESSARY TO COMPLY WITH THE ABOVE PROVISIONS TO PREPARE, ACCESS AND IMPLEMENT AN IN-STREAM WORK PLAN WILL NOT BE PAID FOR SEPARATELY BUT SHALL BE CONSIDERED AS INCLUDED IN CONTRACT UNIT PRICE FOR THE WORK WHICH IT IS REQUIRED AND NO ADDITIONAL COMPENSATION WILL BE ALLOWED.

12. ALL WORK IN THE WATERWAY SHALL BE TIMED TO TAKE PLACE DURING LOW FLOW CONDITIONS.

13. STOCKPILES OF SOIL AND OTHER MATERIALS TO REMAIN IN PLACE FOR MORE THAN THREE DAYS SHALL BE FURNISHED WITH EROSION AND SEDIMENT CONTROL MEASURES IN ACCORDANCE WITH THE ILLINOIS URBAN MANUAL. NO STOCKPILING OF MATERIAL WILL BE ALLOWED WITHIN THE FLOODPLAIN.

14. IF DEWATERING SERVICES ARE USED, ADJOINING PROPERTIES AND DISCHARGE LOCATIONS SHALL BE PROTECTED FROM EROSION. DISCHARGES SHALL BE ROUTED THROUGH AN EFFECTIVE SEDIMENT CONTROL MEASURE (E.G. SEDIMENT TRAP, SEDIMENT BASIN, OR OTHER APPROPRIATE MEASURE). DEWATERING DIRECTLY TO STREAMS, WETLANDS, FIELD TILES OR STORM WATER STRUCTURES IS STRICTLY PROHIBITED.

15. DEWATERING MEASURES SHALL COMPLY WITH THE ILLINOIS URBAN MANUAL. DURING DEWATERING, THE WATER SHALL BE FILTERED TO TO REMOVE SEDIMENT PRIOR TO DISCHARGE TO THE CREEK. POSSIBLE OPTIONS FOR SEDIMENT REMOVAL INCLUDE BAFFLE SYSTEMS, ANIONIC POLYMERS, DEWATERING BAGS OR OTHER APPROPRIATE METHODS. THE FILTRATION AREAS SHALL BE PLACED ON A STABILIZED AREA OR DISCHARGE TO AN ENERGY DISSIPATING SURFACE PRIOR TO BEING RE-INTRODUCED TO DOWNSTREAM WATERWAY. DISCHARGE WATER IS CONSIDERED CLEAN IF IT DOES NOT RESULT IN A VISUALLY IDENTIFIABLE DEGRADATION OF WATER CLARITY. THE DISCHARGE FROM THE DEWATERING DEVICE SHALL NOT CAUSE EROSION. ANY TREATMENT REQUIRED IS THE CONTRACTOR'S RESPONSIBILITY AND NO ADDITIONAL COMPENSATION WILL BE ALLOWED. THE COST OF DEWATERING SHALL BE INCLUDED IN THE COST OF PAY ITEMS REQUIRING DEWATERING.

MAINTENANCE SCHEDULE

1. PERIMETER EROSION BARRIER - AT A MINIMUM, THE CONTRACTOR SHALL INSPECT ALL PERIMETER EROSION BARRIER WEEKLY OR AFTER EACH ONE-HALF INCH OR GREATER RAINFALL EVENT. ANY REQUIRED REPAIRS SHALL BE MADE BY THE CONTRACTOR TO KEEP THE PERIMETER EROSION BARRIER FUNCTIONAL AS DESIGNED.

2. EROSION CONTROL BLANKET - AT A MINIMUM, THE CONTRACTOR SHALL INSPECT ALL EROSION BLANKET WEEKLY OR AFTER EACH ONE-HALF INCH OR GREATER RAINFALL EVENT. ANY REQUIRED REPAIRS SHALL BE MADE BY THE CONTRACTOR TO KEEP THE EROSION BLANKET FUNCTIONAL AS DESIGNED.

3. TEMPORARY EROSION CONTROL SEEDING - RESEED AREAS WHERE SEEDLING EMERGENCE IS POOR, OR WHERE EROSION OCCURS, AS SOON AS POSSIBLE. PROTECT FROM VEHICULAR TRAFFFIC AND FOOT TRAFFIC AS NEEDED. CONTROL WEEDS BY MOWING.

4. CONCRETE WASHOUT FACILITY - THE CONTRACTOR SHALL MAINTAIN AN ADEQUATE HOLDING CAPCAITY WITH A MINIMUM FREEBOARD OF 4" FOR ABOVE GRADE FACILITIES AND 12" FOR BELOW GRADE FACILITIES. MAINTENANCE SHALL INCLUDE REMOVING AND DISPOSING OF HARDENDED CONCRETE OR SLURRY TO RETURN FACILITIES TO A FUNCTIONAL CONDITION.

5. DEWATERING - AT A MINIMUM, ACCUMULATED SEDIMENT SHALL BE REMOVED FROM THE FLOW AREA AND OUTLET AREAS BE CHECKED REGULARLY. PUMP OUTLETS SHALL BE INSPECTED FOR EROSION, AND SUMPS SHALL BE INSPECTED FOR ACCUMULATED SEDIMENT. DEWATERING BAGS SHALL BE REMOVED AND REPLACED WHEN WHEN HALF FULL OF DEFIMENT OR WHEN THE PUMP DISCHARGE HAS REDUCDED TO AN IMPRACTICAL RATE. THE CONTRACTOR SHALL PERFORM INSPECTIONS TO ENSURE COMPLIANCE WITH PERMITS AND WATER QUALITY STANDARDS.

6. MULCHING - AT A MINIMUM, LOCATIONS WHERE EROSION OR MULCH DISPLACEMENT IS OBSERVED, INCLUDING DAMAGES TO SEED, SHALL BE REPLACED IMMEDIATELY UNTIL SEEDED AREAS ARE FIRMLY ESTABLISHED.

NPDES ILR10 PERMIT COMPLIANCE

1. THIS PROJECT DISTURBS 1.21 ACRES OF TOTAL LAND AREA. COMPLIANCE WITH THE NATIONAL POLLUTION DISHCARGE ELIMINATION SYSTEM (NPDES) ILR10 STORMWATER PERMIT IS REQUIRED SINCE THERE IS MORE THAN 1 ACRE OF DISTURBANCE OF TOTAL LAND AREA.

2. THE CONTRACTOR IS THE PROJECT INSPECTOR RESPONSIBLE FOR MONITORING SESC MEASURES AND SUBMITTING INSPECTION REPORTS TO THE IEPA TO MEET THE PERMIT CONDITIONS.

CERTIFICATIONS

THIS PLAN HAS BEEN PREPARED TO COMPLY WITH THE PROVISIONS OF THE NPDES PERMIT NUMBER ILR10 ISSUED BY THE ILLINOIS ENVIRONMENTAL PROTECTION AGENCY FOR STORM WATER DISCHARGES FROM CONSTRUCTION SITE ACTIVITIES.

I CERTIFY UNDER PENALTY OF LAW THAT THIS DOCUMENT AND ALL ATTACHMENTS WERE PREPARED UNDER MY DIRECTION OR SUPERVISION IN ACCORDANCE WITH A SYSTEM DESIGNED TO ASSURE THAT QUALIFIED PERSONNEL PROPERLY GATHERED AND EVALUATED THE INFORMATION SUBMITTED. BASED ON MY INQUIRY OF THE PERSON OR PERSONS WHO MANAGE THE SYSTEM, OR THOSE PERSONS DIRECTLY RESPONSIBLE FOR GATHERING THE INFORMATION, THE INFORMATION SUBMITTED IS TO THE BEST OF MY KNOWLEDGE AND BELIEF, TRUE, ACCURATE AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE INFORMATION, INCLUDING THE POSSIBILITY OF FINE AND IMPRISONMENT FOR KNOWING VIOLATIONS.

ENGINEER: KENNETH ANDERSON, C.P.E.S.C. #00002092 — DATE: 04/25/2024

OWNER'S CERTIFICATION

"I CERTIFY UNDER PENALTY OF LAW THAT THIS DOCUMENT AND ALL ATTACHMENTS WERE PREPARED UNDER MY DIRECTION OR SUPERVISION IN ACCORDANCE WITH A SYSTEM DESIGNED TO ASSURE THAT QUALIFIED PERSONNEL PROPERLY GATHERED AND EVALUATED THE INFORMATION SUBMITTED. BASED ON MY INQUIRY OF THE PERSON OR PERSONS WHO MANAGE THE SYSTEM, OR THOSE PERSONS DIRECTLY RESPONSIBLE FOR GATHERING THE INFORMATION, THE INFORMATION SUBMITTED IS, TO THE BEST OF MY KNOWLEDGE AND BELIEF, TRUE, ACCURATE AND COMPLETE. I AM AWARE THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE INFORMATION, INCLUDING THE POSSIBILITY OF FINE AND IMPRISONMENT FOR KNOWING VIOLATIONS."

OWNER: DEKALB COUNTY HIGHWAY DEPARTMENT

NATHAN SCHWARTZ, P.E. — COUNTY ENGINEER (TITLE) — 04/25/2024 (DATE)

MODEL: Default
FILE NAME: V:\DeKalbCty\Highway\Departments\W22087.00 Pritchard Road Bridge\CADD ORDER\5 Environmental\03 Sheet\06 Erosion & Sediment Control\W22087-sdheets notes.dgn

ENGINEERING RESOURCE ASSOCIATES

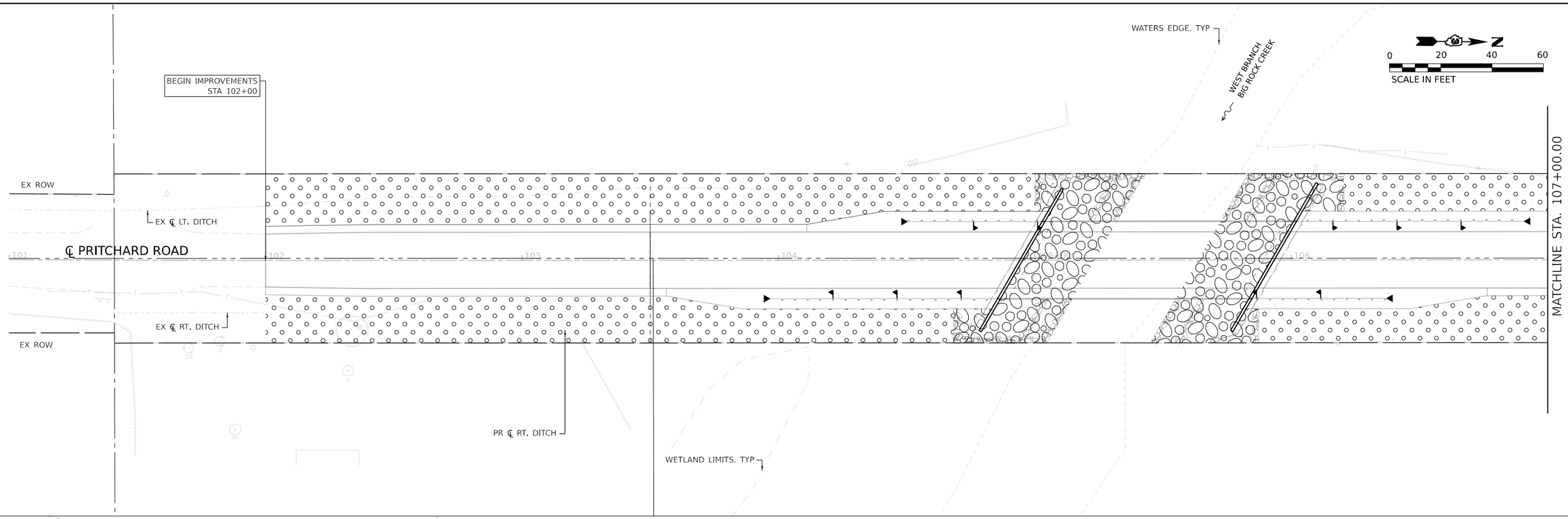
USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED -	04/25/2024
	DRAWN - T. STENSLIK	REVISED -	
PLOT SCALE = 20.000 ' / In.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/25/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

STORMWATER POLLUTION PREVENTION PLAN (SWPPP)
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: N.T.S. | SHEET 1 OF 1 SHEETS | STA. N/A | TO STA. N/A

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	15
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		



LEGEND

SEEDING, CLASS 2
NITROGEN, PHOSPHORUS, AND POTASSIUM FERTILIZER
EROSION CONTROL BLANKET

STONE RIPRAP, CLASS A4
(SEE STRUCTURAL PLANS)

GUARDRAIL REFLECTOR, TYPE A
(25' C-C SPACING)

TERMINAL MARKER - DIRECT APPLIED

MODEL: PrCL_Pritchard - Plan 1 [Sheet]
FILE NAME: V:\DeKalb\Highway\Department\W22087.00 Pritchard Road Bridge\CADD ORD\01_Roadway\03_Sheet\13_Pavement Markings\W22087-sht-pmk.dgn

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	**STATE OF ILLINOIS**	**SIGNAGE AND LANDSCAPING PLAN**	
	DRAWN - T. STENSLIK	REVISED -	**DEPARTMENT OF TRANSPORTATION**	**PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK**	
PLOT SCALE = 0.16666000 ' / in.	CHECKED - M. LANGE	REVISED -		SCALE: 1" = 20' | SHEET 1 OF 1 SHEETS | STA. 102+00 TO STA. 109+55	
PLOT DATE = 4/29/2024	DATE - 07/28/2023	REVISED -			

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	16
		CONTRACT NO. 87818		
	ILLINOIS FED. AID PROJECT			

Benchmark: Set railroad spike in power pole near northwest bridge corner. Station 106+15.1, Offset 32.7' LT. (N: 1863389.207, E: 905551.535) Elevation: 737.189 (NAVD 88).

Existing Structure: SN 019-5417 is a three-span, PPC channel beam bridge with a bituminous wearing surface supported by concrete pile bent abutments on timber piles and concrete pile bent piers on a combination of timber (original) and steel (repaired) piles. The structure carrying Pritchard Road (TR 230) over the West Branch Big Rock Creek was built in 1967, and underwent timber pile repairs in 2013 for the piers using steel piles. The structure length is 97'-5 ¼" back-to-back abutments with the long span measuring 32'-0". The out-to-out deck width is 26'-3" and there is an substructure skew of 30 degrees. The existing structure is to be removed and replaced.

Traffic Control: Roadway closure for thru-traffic with no posted detour route. Local traffic only.

Salvage: None

SEISMIC DATA

Seismic Performance Zone (SPZ) = 1
Design Spectral Acceleration at 1.0 sec. (SD1) = 0.038g
Design Spectral Acceleration at 0.2 sec. (SDS) = 0.162g
Soil Site Class = D

DESIGN SCOUR ELEVATION TABLE

Event / Limit State	Design Scour Elevations (ft.) S. Abut.	N. Abut.	Item 113
Q100	734.10	734.29	5
Q200	734.10	734.29	
Design	734.10	734.29	
Check	734.10	734.29	

DESIGN SPECIFICATIONS

2020 AASHTO LRFD Bridge Design Specifications, 9th Edition

WATERWAY INFORMATION

Drainage Area = 23.7 sq. mi. Low Grade Elev. 737.0 @ Sta. 102+00

Flood	Freq. Yr.	Q C.F.S.	Opening Ft² Exist.	Opening Ft² Prop.	Nat. H.W.E.	Head - Ft. Exist.	Head - Ft. Prop.	Headwater El. Exist.	Headwater El. Prop.
	10	1,060	354	514	736.0	0.5	0.4	736.6	736.4
Design	20	1,272	378	538	736.3	0.6	0.5	736.9	736.8
Base	100	1,780	410	577	736.7	0.7	0.4	737.5	737.2
Scour Check	200	2,022	429	595	736.9	0.7	0.4	737.6	737.3
Overtop Existing	50	1,570	392	558	736.5	0.6	0.4	737.2	736.9
Overtop Proposed	100	1,780	410	577	736.7	0.7	0.4	737.4	737.2
Max. Calc.	500	2,280	445	613	737.1	0.7	0.5	737.8	737.6

10-yr. Velocity Thru Existing Structure = 3.2 fps
10-yr. Velocity Thru Proposed Structure = 2.0 fps

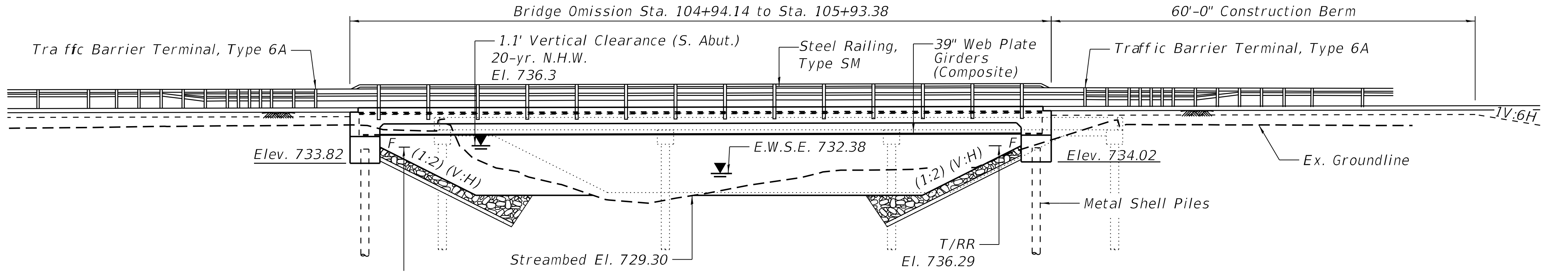
LOADING HL-93

Allow 50#/sq. ft. for future wearing surface.

DESIGN STRESSES

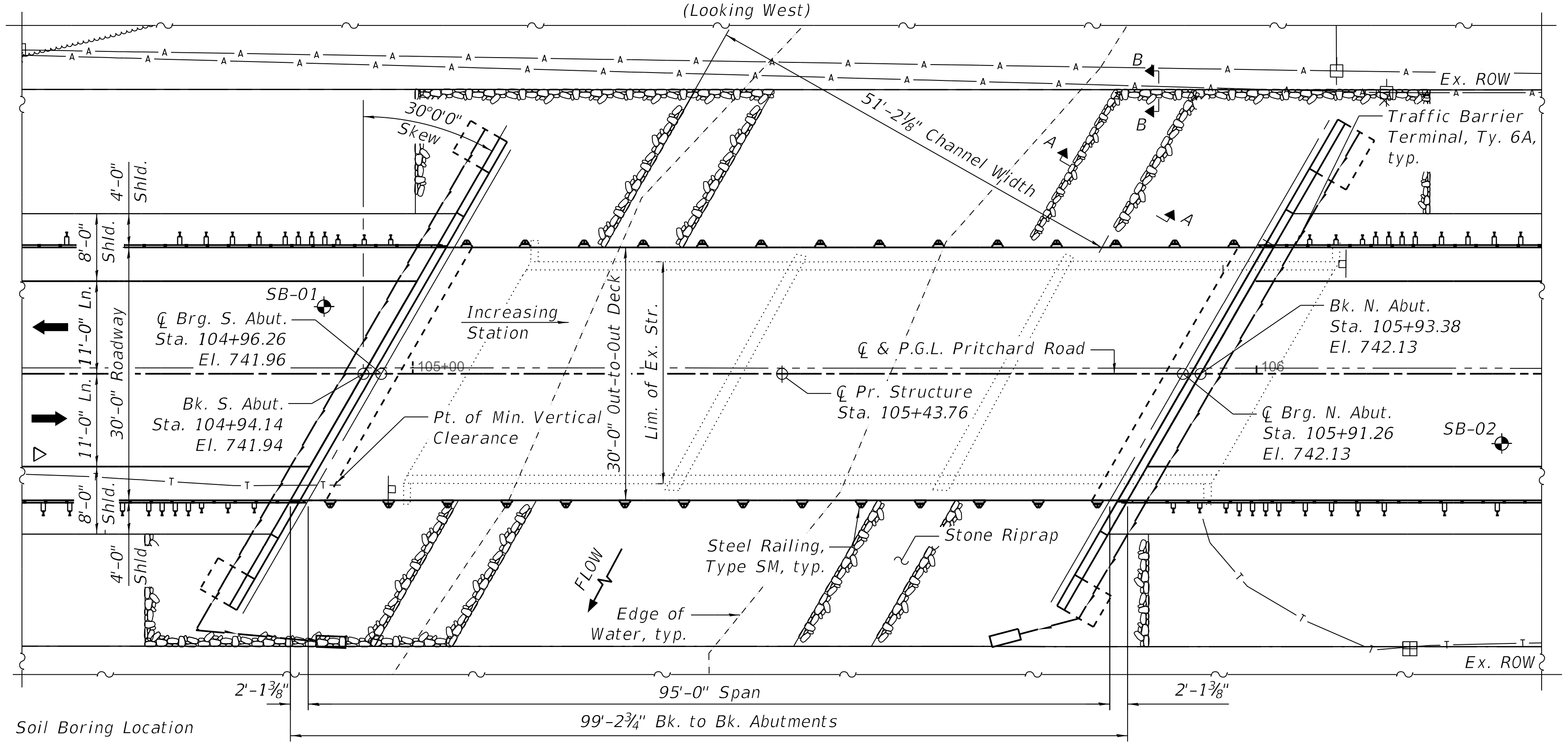
FIELD UNITS

f'c = 5,000 psi (Superstructure)
f'c = 3,500 psi (Substructure)
fy = 60,000 psi (Reinforcement)
fy = 50,000 psi (M270 Grade 50W)



ELEVATION

(Looking West)



LEGEND

Soil Boring Location
—A— Ex. Aerial
—T— Ex. Telephone
— — Pipe Underdrain for Structures, 4"

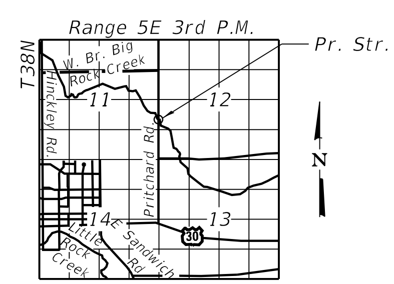
PLAN

N

APRIL 25TH, 2024

MELISSA F. LANGE
ILLINOIS REG STRUCTURAL ENGINEER NO. 081-006488
EXPIRATION DATE 11-30-2024
SHEET 17 TO 39

I certify to the best of my knowledge, information and belief, this bridge design is structurally adequate for the design loading shown on the plans. The design is an economical one for the style of the structure and complies with the requirements of the 2020 AASHTO LRFD Bridge Design Specifications.



LOCATION SKETCH

GENERAL PLAN & ELEVATION
PRITCHARD RD
OVER WEST BRANCH BIG ROCK CREEK
TR 230 SEC. 19-17129-00-BR
DEKALB COUNTY
STA. 105+43.76
STRUCTURE NO. 019-5430

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024
	DRAWN - K. KOLODZIEJCZYK	REVISED -
PLOT SCALE = 240.0000 ' / ft.	CHECKED - M. LANGE	REVISED -
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

GENERAL PLAN & ELEVATION
SN 019-5430
SHEET S1 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	17

CONTRACT NO. 87818
ILLINOIS FED. AID PROJECT

MODEL: Default
FILE NAME: V:\DeKalbCty\HighwayDepartment\W22087.00 Pritchard Road Bridge\CADD SS\10\04_Structural\03_Sheet\16_Structural Sheets\0195430-W22087-S01-TS&L_GP&E.dgn

4/29/2024 5:13:39 PM

GENERAL NOTES

Fasteners shall be ASTM F3125 Grade A325 Type 1, mechanically galvanized bolts in painted or coated metallized areas. Fasteners shall be ASTM F3125 Grade A325 Type 1, hot dipped galvanized in uncoated areas. Fasteners shall be ASTM F3125 Grade A325 Type 3 weathering steel bolts in unpainted areas. Bolts $\frac{7}{8}$ in. diameter, holes $\frac{15}{16}$ in. diameter, unless otherwise noted.

Calculated weight of Structural Steel = 98,570 lb.

All structural steel shall be AASTHO M270 Grade 50W.

No field welding is permitted except as specified in the contract documents.

Reinforcement bars designated (E) shall be epoxy coated.

Bearing seat surfaces shall be constructed or adjusted to the designated elevations within a tolerance of $\frac{1}{8}$ in. (0.01 ft). Adjustment shall be made either by grinding the surface or by shimming the bearings.

The structural steel plates of the Bearing Assembly shall conform to the requirements of AASHTO M270 Grade 50W.

Granular Backfill behind the abutments shall be compacted according to Article 205.06 of the Standard Specifications.

Layout of the slope protection system may be varied to suit ground conditions in the field as directed by the Engineer.

The embankment configuration shown shall be the minimum that must be placed and compacted prior to construction of the abutments.

Structural steel shall be painted for a distance equal to the depth of the embedment into the concrete cap plus 18 in. Painted areas shall be primed in the shop with a Department-approved zinc rich primer. Field painting will not be required.

The Inorganic Zinc Rich Primer / Acrylic / Acrylic Paint System shall be used for shop and field painting of new structural steel except where otherwise noted. The color of the final finish coat for the beam ends shall be Reddish Brown, Munsell No. 2.5YR 3/4.

Contractor to cut the existing piles a minimum of 3-ft. below the streambed. Work is included in the cost of Removal of Existing Structures.

INDEX OF SHEETS

S1	General Plan & Elevation
S2	General Data
S3	Top of Slab Elevations I
S4	Top of Slab Elevations II
S5	Superstructure Plan
S6	Superstructure Details
S7	Framing Plan and Beam Details
S8	Beam and Framing Details
S9	Girder Moment and Reaction Tables
S10	Steel Railing, Type SM
S11	North Abutment Plan
S12	South Abutment Plan
S13	Abutment Details
S14	Metal Shell Pile Details
S15	Soil Boring I
S16	Soil Boring II
S17-S23	Existing Plans

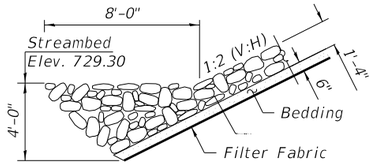
TOTAL BILL OF MATERIAL

ITEM	UNIT	SUPER	SUB	TOTAL
Channel Excavation	Cu. Yd.	-	524	524
Stone Riprap, Class A4	Sq. Yd.	-	550	550
Filter Fabric	Sq. Yd.	-	550	550
Removal of Existing Structures	Each	0.5	0.5	1
Structure Excavation	Cu. Yd.	-	131	131
Concrete Structures	Cu. Yd.	-	53.5	53.5
Concrete Superstructure	Cu. Yd.	120	-	120
Bridge Deck Grooving	Sq. Yd.	331	-	331
Protective Coat	Sq. Ft.	368	-	368
Furnishing and Erecting Structural Steel	LSum	1	-	1
Stud Shear Connectors	Each	1380	-	1380
Reinforcement Bars, Epoxy Coated	Pound	20,960	10,430	31,390
Steel Railing, Type SM	Foot	199	-	199
Furnishing Metal Shell Piles 14" x 0.312"	Foot	-	360	360
Driving Piles	Foot	-	360	360
Test Pile Metal Shells	Each	-	2	2
Pile Shoes	Each	-	10	10
Name Plate	Each	1	-	1
Anchor Bolts, 1"	Each	20	-	20
Granular Backfill For Structures	Cu. Yd.	-	195	195
Geocomposite Wall Drain	Sq. Yd.	-	103	103
Concrete Headwalls for Pipe Drains	Each	-	2	2
Pipe Underdrains For Structures 4"	Foot	-	157	157
Rodent Shields	Each		2	2

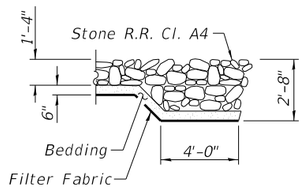
W. BR. BIG ROCK CREEK
BUILT 202_ BY
DEKALB COUNTY
SQUAW GROVE RD DIST
SEC. 19-17129-00-BR
STATION 105+43.76
STR. NO. 019-5430 LOADING HL-93

NAME PLATE

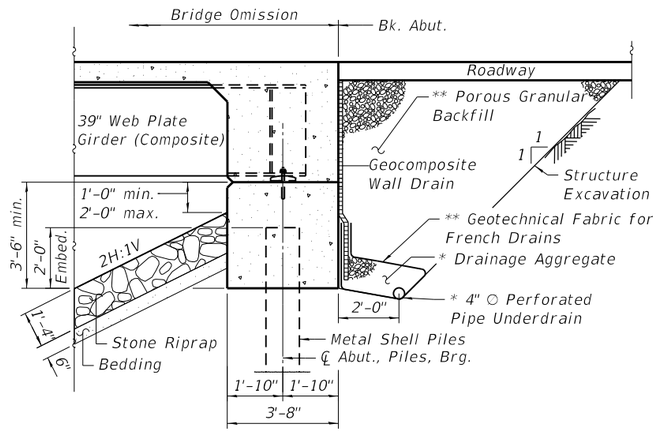
See Std. 515001.
Plate to be installed on southeast wingwall.



SECTION A-A



SECTION B-B

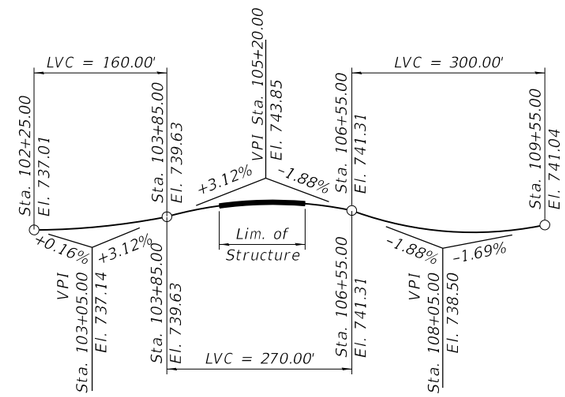


SECTION THRU. INTEGRAL ABUTMENT

(Horiz. Dims. @ Rt. Angles)

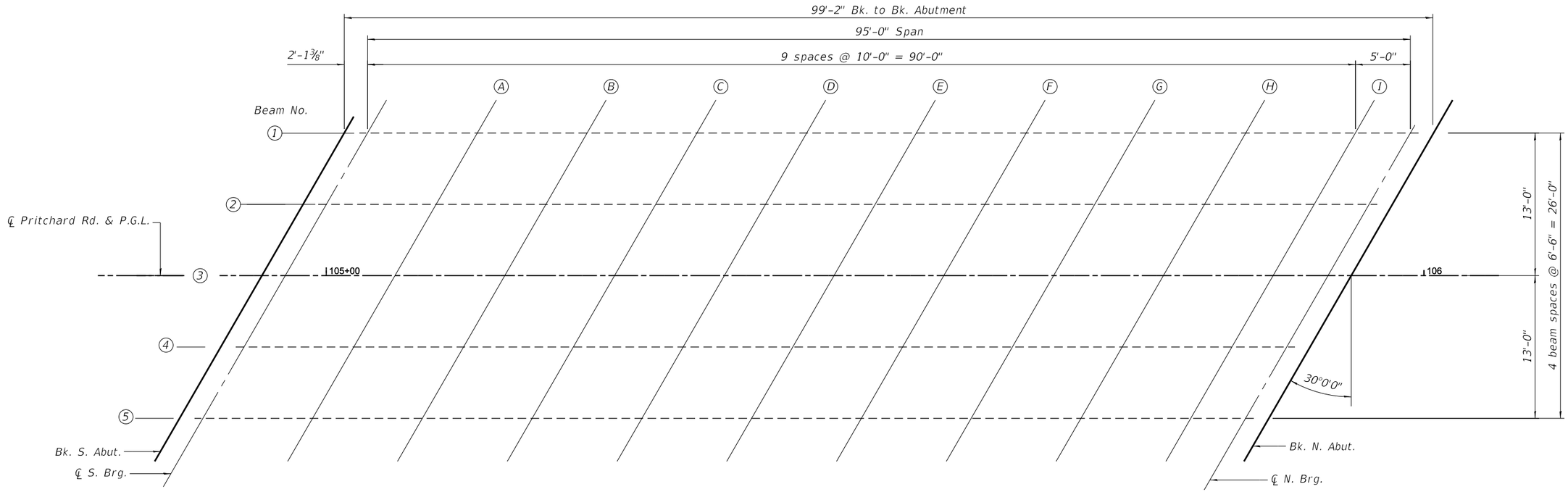
*Included in the cost of Pipe Underdrains for Structures, 4"
**Porous Granular Backfill material shall be CA-7.

Note:
All drainage system components shall extend to 2'-0" from the end of each wingwall except an outlet pipe shall extend until intersecting with the side slopes. The pipes shall drain into concrete headwalls. (See Article 601.05 of the Standard Specifications and Highway Standard 601101).

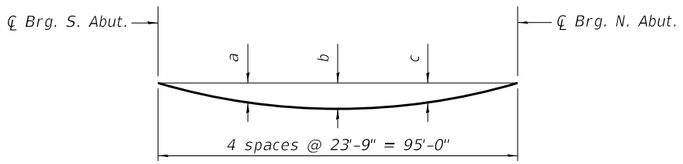


PRITCHARD RD. PROFILE GRADE

(Along ℄ Roadway)



PLAN

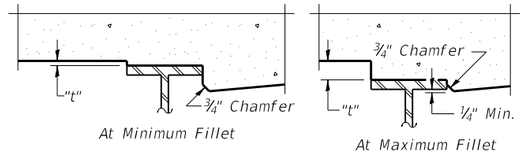


DEAD LOAD DEFLECTION DIAGRAM

(Includes weight of concrete, excluding beams).

Note:
The above deflections are not to be used in the field if the engineer is working from the grade elevations adjusted for dead load deflections as shown below.

Location	Girder	
	1 & 5	2 - 4
a	2 7/8"	2 3/4"
b	4"	3 7/8"
c	2 7/8"	2 3/4"



To determine "t": After all structural steel has been erected, elevations of the top flanges of the beams shall be taken at intervals shown below. These elevations subtracted from the "Theoretical Grade Elevations Adjusted for Dead Load Deflection" shown below, minus slab thickness, equals the fillet heights "t" above top flange of beams.

FILLET HEIGHTS

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED -	04/25/2024
	DRAWN - K. KOLODZIEJCZYK	REVISED -	
PLOT SCALE = 120.0000 ' / ft.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

TOP OF SLAB ELEVATIONS I
SN 019-5430
SHEET S3 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	19
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		

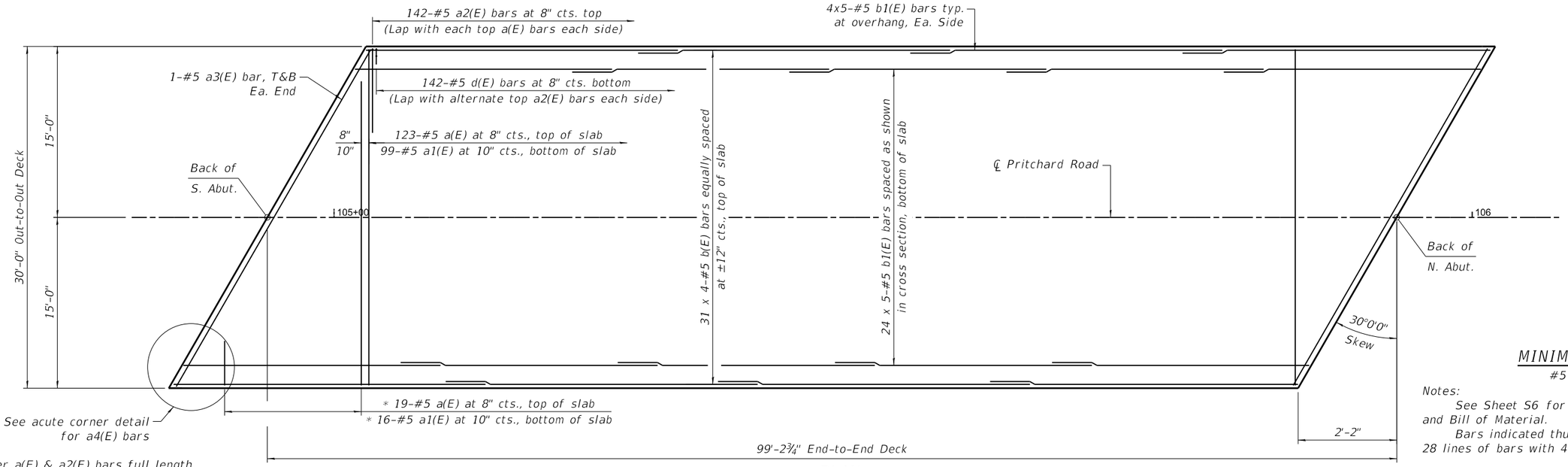
BEAM 1				
LOCATION	STATION	OFFSET	THEORECTICAL GRADE ELEVATIONS	THEORECTICAL GRADE ELEVATIONS ADJUSTED FOR DL DEFLECTIONS
Bk. S. Abut.	105+01.65	-13.00 Lt.	741.81	741.81
CL S. Brg	105+03.76	-13.00 Lt.	741.83	741.83
A	105+13.76	-13.00 Lt.	741.91	742.00
B	105+23.76	-13.00 Lt.	741.98	742.14
C	105+33.76	-13.00 Lt.	742.02	742.24
D	105+43.76	-13.00 Lt.	742.05	742.30
E	105+53.76	-13.00 Lt.	742.06	742.32
F	105+63.76	-13.00 Lt.	742.05	742.29
G	105+73.76	-13.00 Lt.	742.02	742.21
H	105+83.76	-13.00 Lt.	741.98	742.10
I	105+93.76	-13.00 Lt.	741.91	741.95
CL N. Brg	105+98.76	-13.00 Lt.	741.87	741.87
Bk. N. Abut.	106+00.88	-13.00 Lt.	741.85	741.85

BEAM 2				
LOCATION	STATION	OFFSET	THEORECTICAL GRADE ELEVATIONS	THEORECTICAL GRADE ELEVATIONS ADJUSTED FOR DL DEFLECTIONS
Bk. S. Abut.	104+97.89	-6.50 Lt.	741.88	741.88
CL S. Brg	105+00.01	-6.50 Lt.	741.90	741.90
A	105+10.01	-6.50 Lt.	741.99	742.07
B	105+20.01	-6.50 Lt.	742.06	742.21
C	105+30.01	-6.50 Lt.	742.11	742.32
D	105+40.01	-6.50 Lt.	742.15	742.38
E	105+50.01	-6.50 Lt.	742.16	742.40
F	105+60.01	-6.50 Lt.	742.16	742.38
G	105+70.01	-6.50 Lt.	742.14	742.32
H	105+80.01	-6.50 Lt.	742.10	742.22
I	105+90.01	-6.50 Lt.	742.04	742.08
CL N. Brg	105+95.01	-6.50 Lt.	742.00	742.00
Bk. N. Abut.	105+97.13	-6.50 Lt.	741.99	741.99

PGL & BEAM 3				
LOCATION	STATION	OFFSET	THEORECTICAL GRADE ELEVATIONS	THEORECTICAL GRADE ELEVATIONS ADJUSTED FOR DL DEFLECTIONS
Bk. S. Abut.	104+94.14	0.00	741.94	741.94
CL S. Brg	104+96.26	0.00	741.96	741.96
A	105+06.26	0.00	742.06	742.14
B	105+16.26	0.00	742.14	742.29
C	105+26.26	0.00	742.20	742.40
D	105+36.26	0.00	742.24	742.47
E	105+46.26	0.00	742.26	742.50
F	105+56.26	0.00	742.26	742.49
G	105+66.26	0.00	742.25	742.43
H	105+76.26	0.00	742.22	742.33
I	105+86.26	0.00	742.17	742.21
CL N. Brg	105+91.26	0.00	742.13	742.13
Bk. N. Abut.	105+93.38	0.00	742.12	742.12

BEAM 4				
LOCATION	STATION	OFFSET	THEORECTICAL GRADE ELEVATIONS	THEORECTICAL GRADE ELEVATIONS ADJUSTED FOR DL DEFLECTIONS
Bk. S. Abut.	104+90.39	6.50 Rt.	741.79	741.79
CL S. Brg	104+92.51	6.50 Rt.	741.82	741.82
A	105+02.51	6.50 Rt.	741.92	742.00
B	105+12.51	6.50 Rt.	742.01	742.16
C	105+22.51	6.50 Rt.	742.07	742.28
D	105+32.51	6.50 Rt.	742.12	742.36
E	105+42.51	6.50 Rt.	742.15	742.39
F	105+52.51	6.50 Rt.	742.16	742.39
G	105+62.51	6.50 Rt.	742.16	742.34
H	105+72.51	6.50 Rt.	742.13	742.25
I	105+82.51	6.50 Rt.	742.09	742.13
CL N. Brg	105+87.51	6.50 Rt.	742.06	742.06
Bk. N. Abut.	105+89.62	6.50 Rt.	742.04	742.04

BEAM 5				
LOCATION	STATION	OFFSET	THEORECTICAL GRADE ELEVATIONS	THEORECTICAL GRADE ELEVATIONS ADJUSTED FOR DL DEFLECTIONS
Bk. S. Abut.	104+86.64	13.00 Rt.	741.65	741.65
CL S. Brg	104+88.75	13.00 Rt.	741.67	741.67
A	104+98.75	13.00 Rt.	741.78	741.87
B	105+08.75	13.00 Rt.	741.88	742.03
C	105+18.75	13.00 Rt.	741.95	742.17
D	105+28.75	13.00 Rt.	742.00	742.25
E	105+38.75	13.00 Rt.	742.04	742.30
F	105+48.75	13.00 Rt.	742.06	742.30
G	105+58.75	13.00 Rt.	742.06	742.25
H	105+68.75	13.00 Rt.	742.04	742.16
I	105+78.75	13.00 Rt.	742.00	742.05
CL N. Brg	105+83.75	13.00 Rt.	741.98	741.98
Bk. N. Abut.	105+85.87	13.00 Rt.	741.96	741.96



PLAN

*Order a(E) & a2(E) bars full length. Cut to fit skew and use remainder of bars in opposite end.

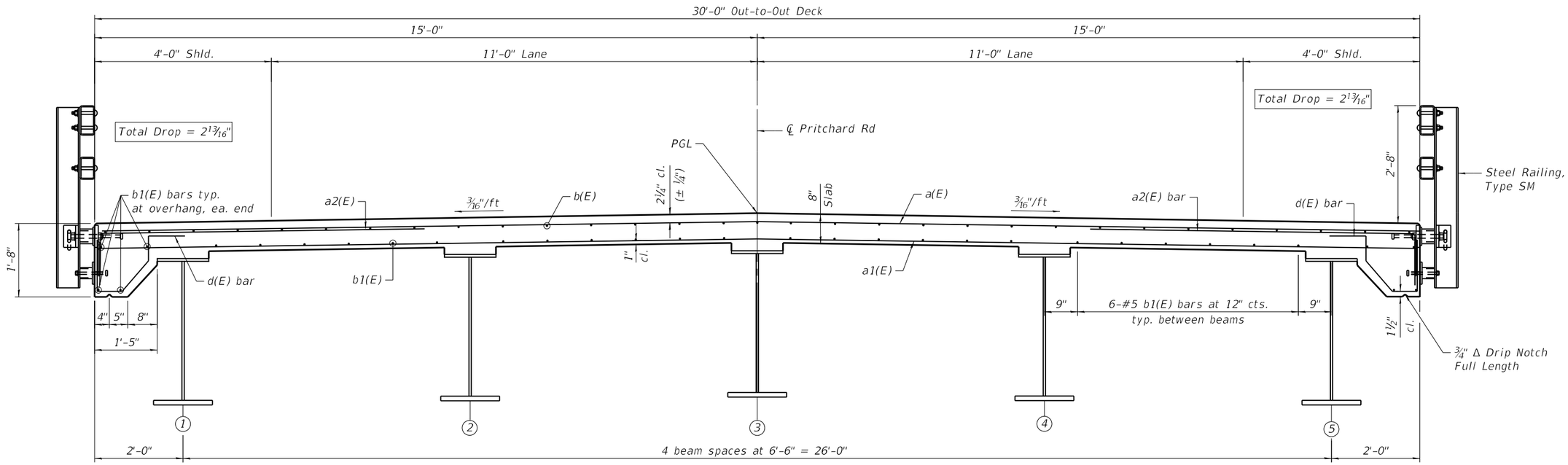
MINIMUM BAR LAP

#5 bar = 3'-6"

Notes:

See Sheet S6 for Superstructure Details and Bill of Material.

Bars indicated thus 28 x 4-#5 etc. indicates 28 lines of bars with 4 lengths per line.



CROSS SECTION

(Looking South)

ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	SUPERSTRUCTURE PLAN SN 019-5430
		DRAWN - K. KOLODZIEJCZYK	REVISED -		SHEET S5 OF S23 SHEETS
	PLOT SCALE = 120.0000 '' / ft.	CHECKED - M. LANGE	REVISED -		
	PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -		

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	21
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

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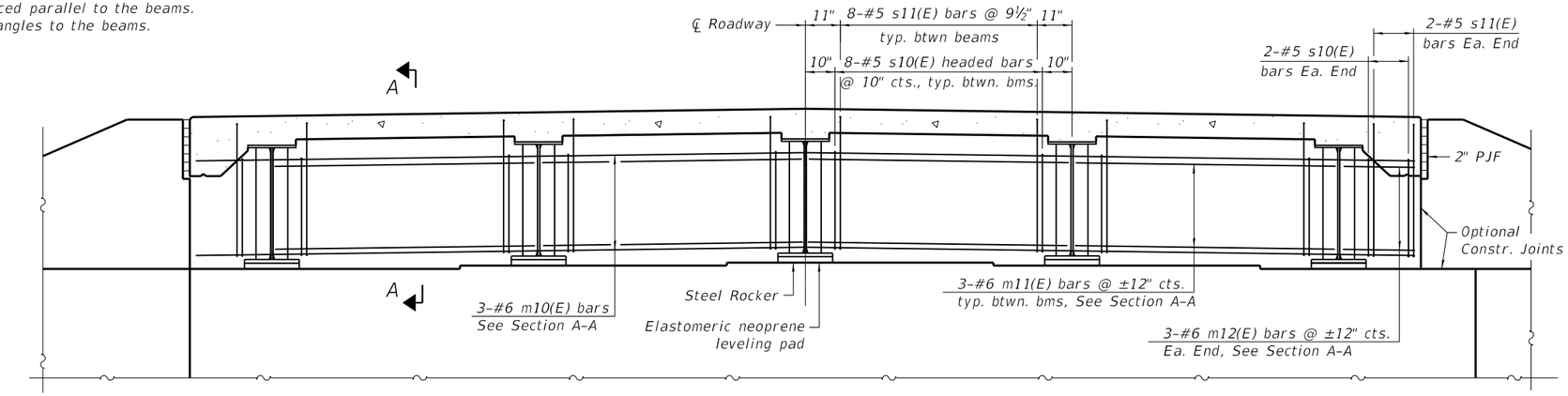
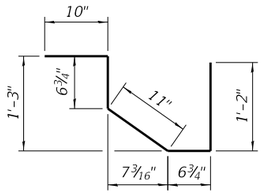
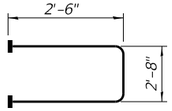
Notes:
The s10(E) and s11(E) bars shall be placed parallel to the beams. Spacing for these bars shall be at right angles to the beams.



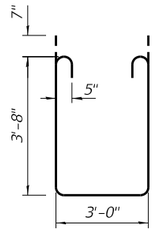
DIAPHRAGM AT ABUTMENT



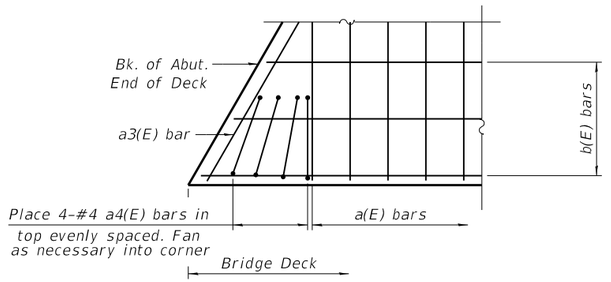
BAR d(E)



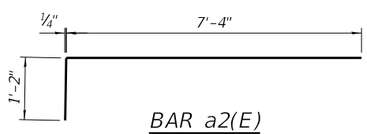
BAR s10(E)
(Headed)



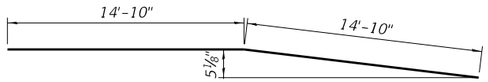
BAR s11(E)



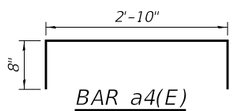
ACUTE CORNER DECK REINFORCEMENT
FOR SIDE MOUNTED RAILS ON INTEGRAL ABUTMENTS



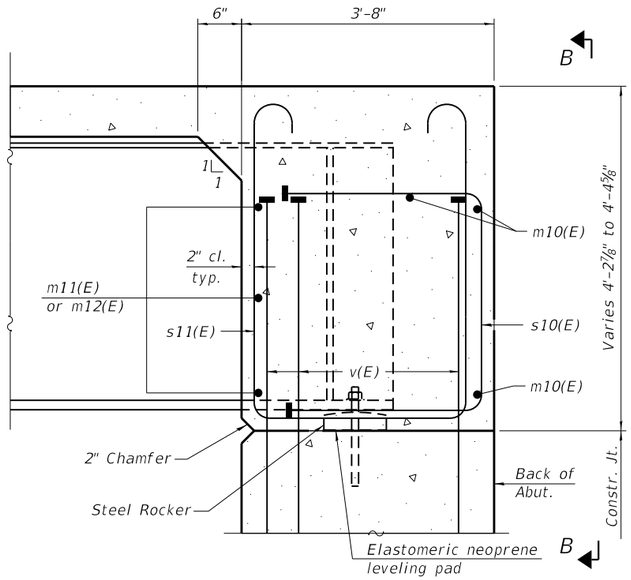
BAR a2(E)



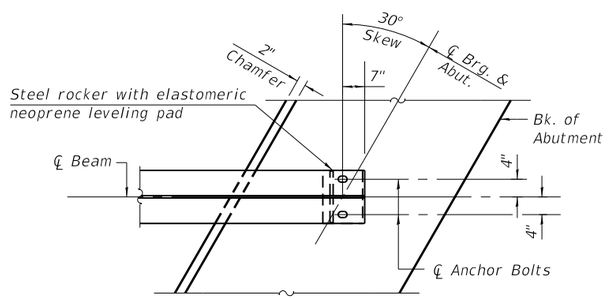
BAR a(E)



BAR a4(E)



SECTION A-A
(at Rt. L's)



PLAN AT ABUTMENT
(Showing bottom flange of beam)

BILL OF MATERIAL

Bar	No.	Size	Length	Shape
a(E)	142	#5	29'-8"	
a1(E)	115	#5	27'-8"	
a2(E)	284	#5	8'-6"	
a3(E)	4	#5	34'-4"	
a4(E)	8	#4	4'-2"	
b(E)	124	#5	27'-5"	
b1(E)	160	#5	22'-7"	
d(E)	284	#5	4'-1"	
m10(E)	6	#6	34'-4"	
m11(E)	24	#6	7'-0"	
m12(E)	12	#6	1'-8"	
s10(E)	72	#5	7'-8"	
s11(E)	72	#5	11'-6"	

Item	Unit	Quantity
Concrete Superstructure	Cu. Yd.	120
Bridge Deck Grooving	Sq. Yd.	331
Protective Coat	Sq. Yd.	368
Reinforcement Bars, Epoxy Coated	Pound	20,960
Anchor Bolts, 1"	Each	20

MODEL: Default
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4/29/2024 5:13:49 PM

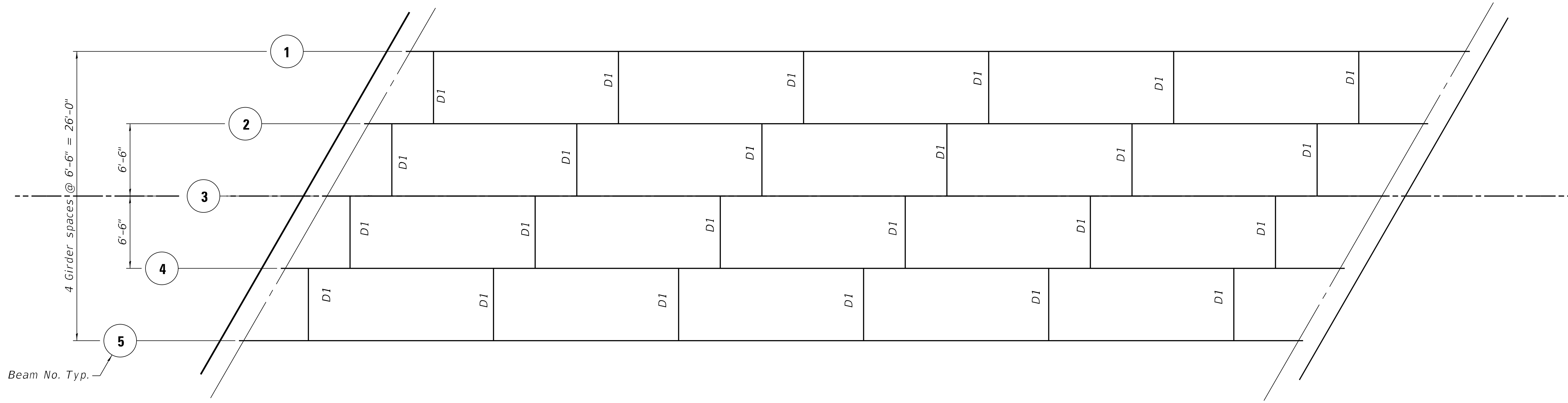
ENGINEERING RESOURCE ASSOCIATES

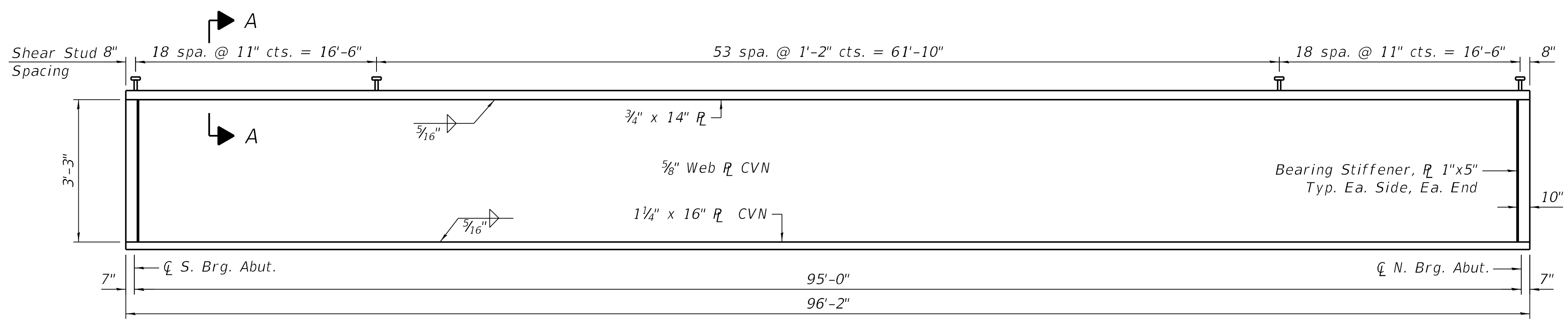
USER NAME	= kkolodziejczyk	DESIGNED	- K. KOLODZIEJCZYK	REVISED	- 04/25/2024
		DRAWN	- K. KOLODZIEJCZYK	REVISED	-
PLOT SCALE	= 4820.0000 '/ ft.	CHECKED	- M. LANGE	REVISED	-
PLOT DATE	= 4/29/2024	DATE	- 12/27/2023	REVISED	-

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SUPERSTRUCTRE DETAILS
SN 019-5430
SHEET S6 OF S23 SHEETS

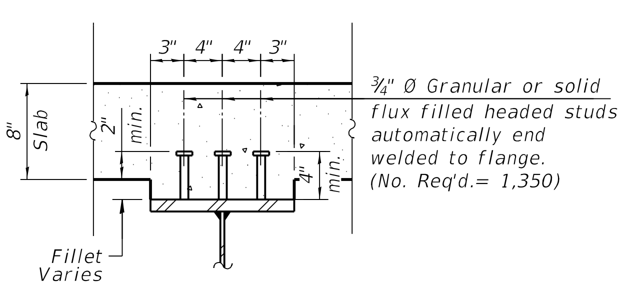
T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	22
		CONTRACT NO. 87818		
	ILLINOIS FED. AID PROJECT			



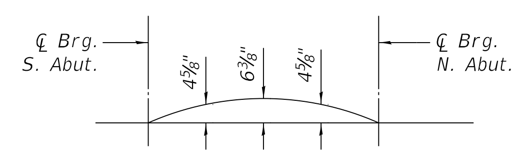


GIRDER ELEVATION

Load carrying components designated "CVN" shall conform to the Charpy-V-Notch Impact Energy Requirement, Zone 2.

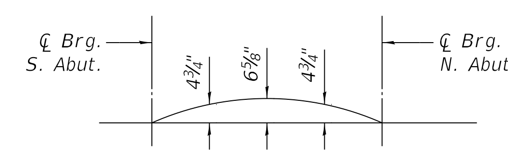


SECTION A-A



CAMBER DIAGRAM

(Beams 2 thru 4)



CAMBER DIAGRAM

(Beams 1 & 5)

ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	FRAMING PLAN AND BEAM DETAILS SN 019–5430
		DRAWN - K. KOLODZIEJCZYK	REVISED -		
	PLOT SCALE = 120.0000 ' / ft.	CHECKED - M. LANGE	REVISED -		
	PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -		SHEET S7 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	23
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

MODEL: Default
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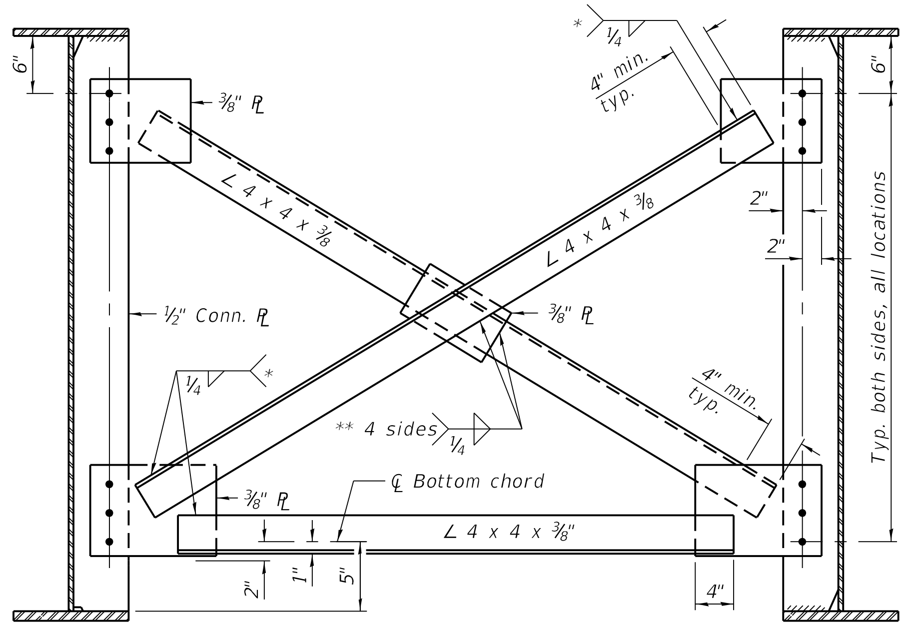


* Fillet weld angles along 3 sides on one face of gusset plate; however, if cross-frames are galvanized, weld all-around.

** If cross-frames are galvanized, weld all-around.

D1 INTERIOR CROSS-FRAME

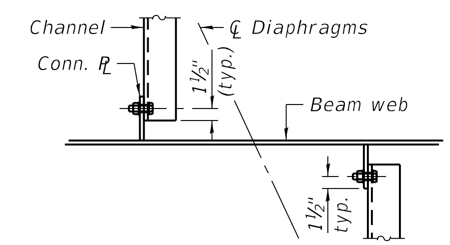
(24 required)

Notes:

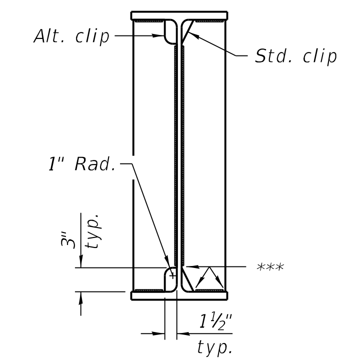
Detail 15/16" Ø holes for all 3/4" Ø bolts (1 1/16" Ø holes for all 7/8" Ø bolts only if required by design).

Two hardened washers required for each set of oversized holes.

All cross frames or diaphragms between beams or girders shall be installed with erection pins and bolts in accordance with the erection plan approved by the Engineer. Individual cross frames or diaphragms at supports may be temporarily disconnected to install bearing anchor bolts.

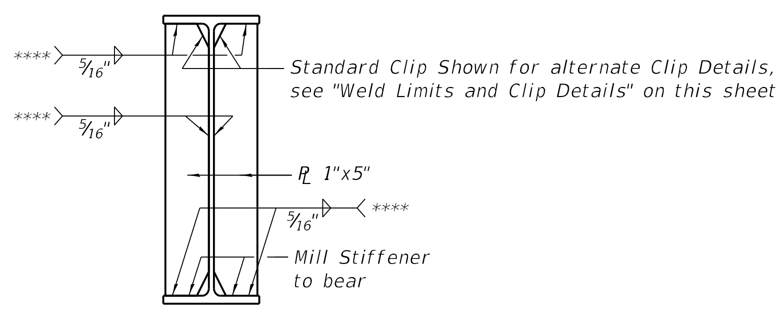


INTERIOR CROSS FRAME PLAN



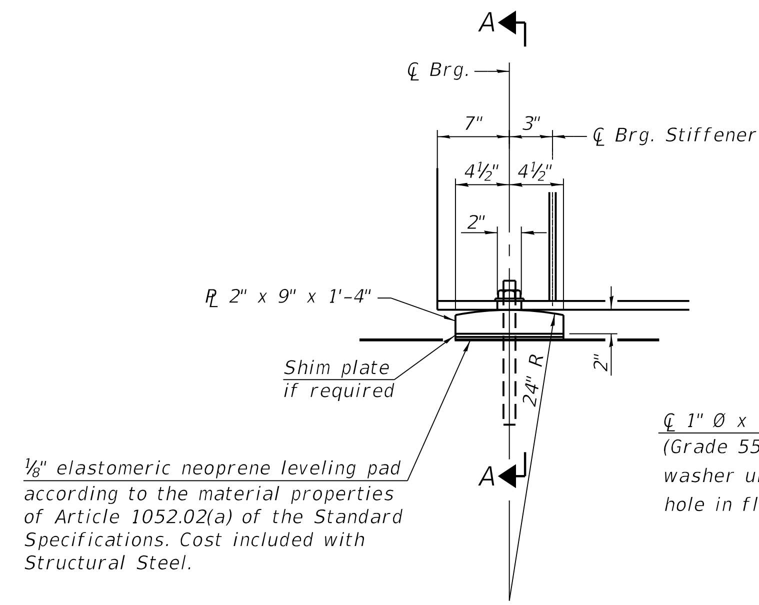
WELD LIMITS AND CLIP DETAILS

*** Stop welds 1/4" (±1/8") from edges as shown. Typical.

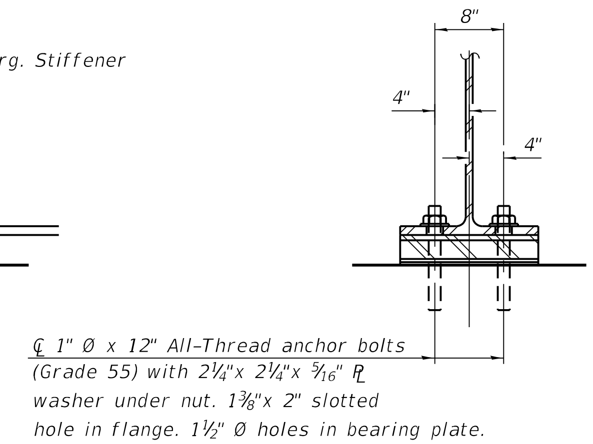


SECTION AT ABUTMENT

**** Terminate 1/4" (± 1/8") from the end of plate intersects.



ELEVATION AT ABUTMENT



SECTION A-A

FIXED BEARING

Notes:

Anchor bolts shall be according to Article 521.06 of the Standard Specifications.

Beams shall be braced for stability during erection and remain braced until deck is poured and cured.

Anchor bolts at all supports shall be installed as each member is erected unless an equivalent temporary means of lateral restraint is used.

MODEL: Default
FILE NAME: V:\DeKalbCtyHighwayDepartment\W22087.00 Pritchard Road Bridge\CADD SS\10\04_Structural\03_Sheet16_Structural Sheets\0195430-W22087-S08-BeamDetails.dgn

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION
	DRAWN - K. KOLODZIEJCZYK	REVISED -	
PLOT SCALE = 120.0000 ' / ft.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

BEAM AND FRAMING DETAILS
SN 019-5430
SHEET S8 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	24

CONTRACT NO. 87818

ILLINOIS | FED. AID PROJECT

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INTERIOR GIRDER MOMENT TABLE			
		0.5 Span	
		Interior Girder	Exterior Girder
I_s	(in^4)	14,656	14,656
$I_c(n)$	(in^4)	43,168	40,789
$I_c(3n)$	(in^4)	30,592	28,473
$I_c(cr)$	(in^4)	–	–
S_s	(in^3)	851	851
$S_c(n)$	(in^3)	1,229	1,212
$S_c(3n)$	(in^3)	1,117	1,100
$S_c(cr)$	(in^3)	–	–
S_x	(in^3)	1080.1	1,062.1
DC1	(k/')	0.900	0.939
M_{DC1}	('k)	1,015.3	1,059.3
DC2	(k/')	0.048	0.048
M_{DC2}	('k)	54.2	54.2
DW	(k/')	0.325	0.300
M_{DW}	('k)	366.6	338.4
LLDF		0.550	0.475
M_{L+IM}	('k)	1,443.3	1,247.5
f_f (Strength I)	(ksi)	–	–
$M_u + \frac{1}{3} f_f S_x$	('k)	4,412.6	4,082.6
$\phi_f M_n$	('k)	5,637	5,431.3
f_s DC1	(ksi)	14.3	14.9
f_s DC2	(ksi)	0.58	0.59
f_s DW	(ksi)	3.94	4.02
f_s (L+IM)	(ksi)	14.1	12.4
f_f (Service II)	(ksi)	–	–
$f_s + {}^{f_f}/_2$ (Service II)	(ksi)	37.1	35.3
Service II Resistance	(ksi)	47.5	47.5
$f_s + {}^{f_f}/_3$ (Strength I)	(ksi)	–	–
$\phi_f F_n$	(ksi)	–	–
V_f	(k)	87.6	76.1

GIRDER REACTION TABLE			
		Abut. (Interior)	Abut. (Exterior)
LLDF		0.707	0.615
OCF		1.112	1.112
R_{DC1}	(k)	42.7	44.5
R_{DC2}	(k)	2.3	2.3
R_{DW}	(k)	15.4	14.3
R_L	(k)	75.0	65.2
R_{IM}	(k)	16.8	14.6
R_{Total} (Strength I)(Impact)	(k)	240.1	219.6
R_{Total} (Strength I)(No Impact)	(k)	210.6	193.9

I_s, S_s : Non-composite moment of inertia and section modulus of the steel section used for computing f_s(Total-Strength I, and Service II) due to non-composite dead loads (in.⁴ and in.³).

$I_c(n)$, $S_c(n)$: Composite moment of inertia and section modulus of the steel and deck based upon the modular ratio, "n", used for computing f_s(Total-Strength I, and Service II) in uncracked sections due to short-term composite live loads (in.⁴ and in.³).

$I_c(3n)$, $S_c(3n)$: Composite moment of inertia and section modulus of the steel and deck based upon 3 times the modular ratio, "3n", used for computing f_s(Total-Strength I, and Service II) in uncracked sections, due to long-term composite (superimposed) dead loads (in.⁴ and in.³).

$I_c(cr)$, $S_c(cr)$: Composite moment of inertia and section modulus of the steel and longitudinal deck reinforcement, used for computing f_s (Total-Strength I and Service II) in cracked sections, due to both short-term composite live loads and long-term composite (superimposed) dead loads (in.⁴ and in.³).

S_x : Section modulus about the major axis of a section to the controlling flange, tension or compression, taken as yield moment with respect to the controlling flange over the yield strength of the controlling flange (in.³).

DC1: Un-factored non-composite dead load (kips/ft.).

M_{DC1} : Un-factored moment due to non-composite dead load (kip-ft.).

DC2: Un-factored long-term composite (superimposed excluding future wearing surface) dead load (kips/ft.).

M_{DC2} : Un-factored moment due to long-term composite (superimposed excluding future wearing surface) dead load (kip-ft.).

DW: Un-factored long-term composite (superimposed future wearing surface only) dead load (kips/ft.).

M_{DW} : Un-factored moment due to long-term composite (superimposed future wearing surface only) dead load (kip-ft.).

LLDF: Live Load Distribution Factor for moment and shear computed according to Article 4.6.2.2 and further IDOT provisions.

M_{L+IM}: Un-factored live load moment plus dynamic load allowance (impact) (kip-ft.).

M_u : Strength I load combination of factored design moments (kip-ft.). $1.25 (M_{DC1} + M_{DC2}) + 1.5 M_{DW} + 1.75 M_{L+IM}$

f_f : Factored calculated flange lateral bending stress as calculated using Article 6.10.1.6 and as further simplified by IDOT provisions (ksi).

$\phi_f M_n$: Factored nominal flexural resistance of the section determined as specified in Article 6.10.7.1 or A6 as applicable (kip-ft.).

f_s DC1: Un-factored stress at edge of flange for controlling steel flange due to vertical non-composite dead loads as calculated below (ksi).
M_{DC1} / S_s

f_s DC2: Un-factored stress at edge of flange for controlling steel flange due to vertical composite dead loads as calculated below (ksi).
$M_{DC2} / S_c(3n)$ or $M_{DC2} / S_c(cr)$ as applicable.

f_s DW: Un-factored stress at edge of flange for controlling steel flange due to vertical composite future wearing surface loads as calculated below (ksi).
$M_{DW} / S_c(3n)$ or $M_{DW} / S_c(cr)$ as applicable.

f_s (L + IM): Un-factored stress at edge of flange for controlling steel flange due to vertical composite live load plus impact loads as calculated below (ksi).
$M_{L+IM} / S_c(n)$ or $M_{L+IM} / S_c(cr)$ as applicable.

$f_s + f_f/2$ (Service II): Sum of stresses as computed below (ksi).
f_s DC1 + f_s DC2 + f_s DW + 1.3 f_s (L + IM) + $f_f/2$

Service II Resistance: Composite ($0.95R_hF_{yf}$) or noncomposite ($0.80R_hF_{yf}$) stress capacity according to Article 6.10.4.2 (ksi).

$f_s + f_f/3$ (Strength I): Sum of stresses as computed below on non-compact sections (ksi).
$1.25 (f_s$ DC1 + f_s DC2) + 1.5 f_s DW + 1.75 f_s (L + IM) + $f_f/3$

$\phi_f F_n$: Factored nominal flexural resistance of the section as specified in Article 6.10.7.2 or 6.10.8 as applicable (ksi).

V_f : Maximum factored shear range in span computed according to Article 6.10.10.

OCF: Obtuse Correction Factor according to Article 4.6.2.2.3c or as further simplified by IDOT provisions.

R_{DC1} : Un-factored reaction due to non-composite dead load (kip).

R_{DC2} : Un-factored reaction due to long-term composite (superimposed excluding future wearing surface) dead load (kip).

R_{DW} : Un-factored reaction due to long-term composite (superimposed future wearing surface only) dead load (kip).

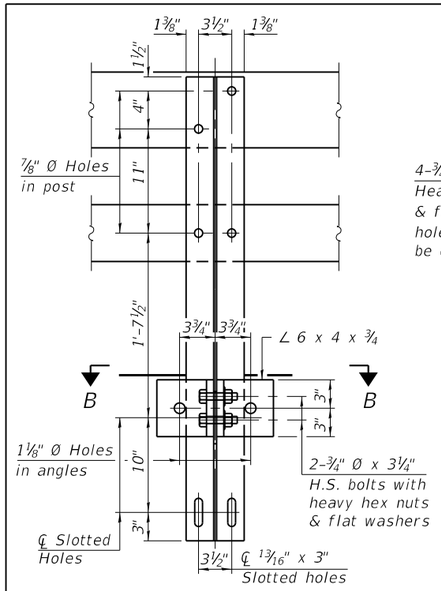
R_L : Un-factored live load reaction (kip).

R_{IM} : Un-factored dynamic load allowance (impact) (kip).

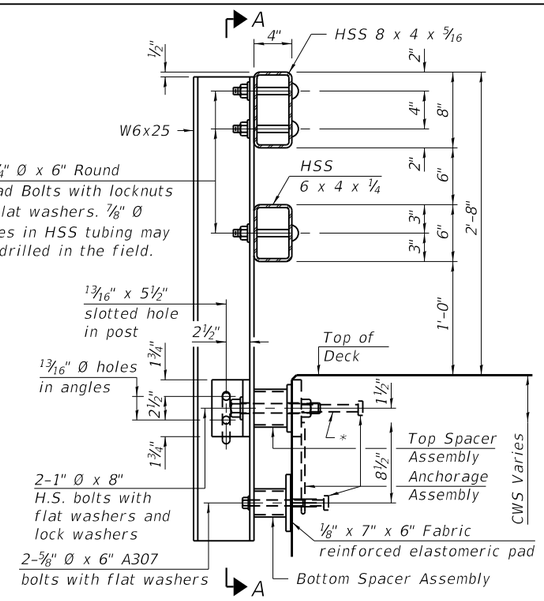
R_{Total} (Strength I)(Impact): Strength I load combination of factored design reactions (kip).
$1.25 (R_{DC1} + R_{DC2}) + 1.5R_{DW} + 1.75 (R_L + R_{IM})$

R_{Total} (Strength I)(No Impact): Strength I load combination of factored design reactions, not including dynamic load allowance (Impact) (kip).
$1.25 (R_{DC1} + R_{DC2}) + 1.5R_{DW} + 1.75 (R_L)$

Note:
M_L and R_L include the effects of centrifugal force and superelevation.

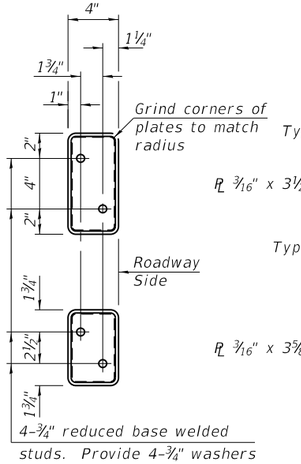


SECTION A-A



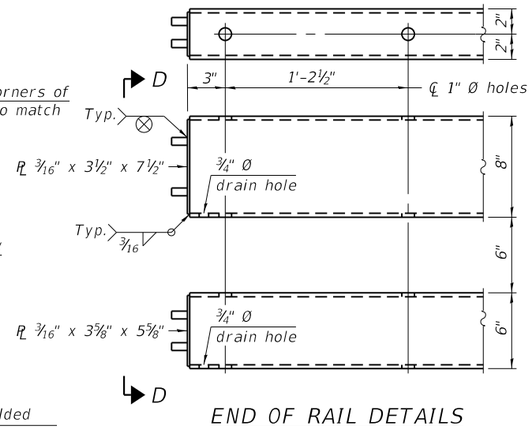
SECTION AT RAIL POST

* The outermost longitudinal reinforcement bar and 3 transverse reinforcement bars shall be placed directly above the studs of the rail post anchorage assembly as shown in the superstructure details.



4-¾" reduced base welded studs. Provide 4-¾" washers and self-locking nuts or nuts and jam nuts for guardrail connection shown on Hwy. Std. 631032.

VIEW D-D



END OF RAIL DETAILS

Notes:

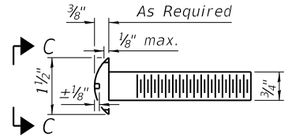
A sufficient number of shims of various thicknesses, sized to fit behind the top spacer assembly, 5" x 11½", and bottom spacer assembly, 6" x 7", shall be provided to adjust posts for proper alignment. If the summation of shims is greater than ¼" (top) or ½" (bottom), longer bolts are required. Cost included with Steel Railing, Type SM.

All steel rail elements including shims shall be galvanized according to Article 509.05 of the Standard Specifications.

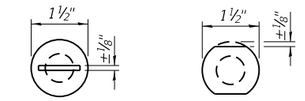
All HSS tubing serving as railing shall be CVN tested according to Article 1006.34(b) of the Standard Specifications.

Rail splice inserts may be built out of 2 -⅜" bent plates in lieu of the 4 plate rail splice inserts shown, provided the outside dimensions are matched.

All round head bolts shall be ASTM A307 with locknuts according to ASTM A563 grade A.



ROUND HEAD BOLT DETAIL

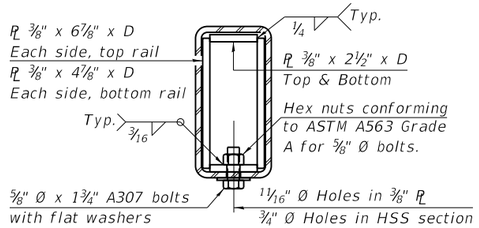


With Slot (shown) or Approved Recess

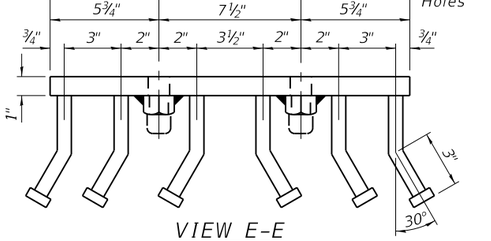
Without Slot or Recess

VIEW C-C

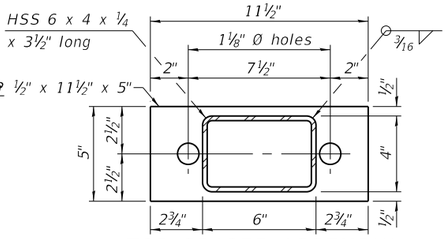
SECTION B-B



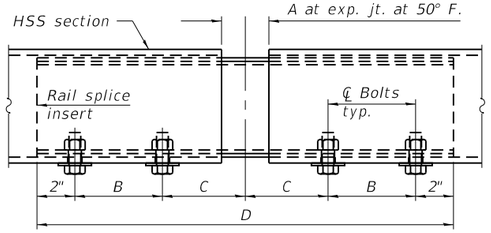
SECTION AT RAIL SPLICE



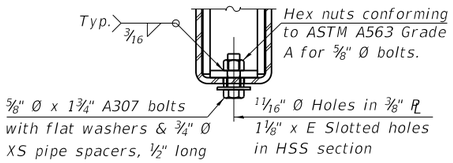
VIEW E-E



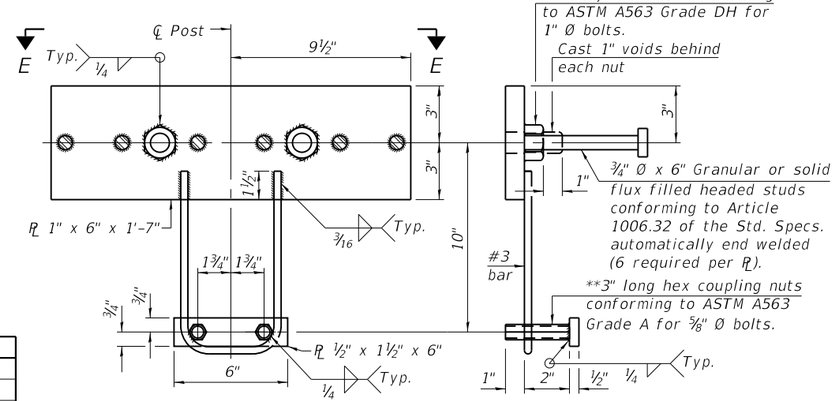
TOP SPACER ASSEMBLY



RAIL SPLICE ELEVATION

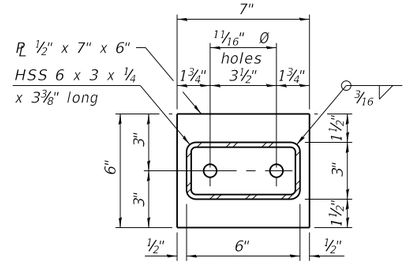


RAIL SPLICE CONNECTION AT EXPANSION JT.



ANCHORAGE ASSEMBLY

** Threaded areas shall be plugged or blocked off during casting of concrete.



BOTTOM SPACER ASSEMBLY

RAILING CRITERIA

MASH 2016 Test Level	2
Railing Weight (plf)	90
Min f'c (psi)	5,000
Max Post Spacing	6'-3"
CWS thickness range (in)	5 - 7⅛

SPLICE DIMENSIONS

Location	T	A	B	C	D	E
All locs. not over exp. jts.	0	¼"	4"	4"	1'-8"	-
Over Strip Seal Jt.	≤4"	2½"	4⅝"	4⅜"	1'-10"	3¹⁄₁₆"
Over Finger or Modular Jt.	≤9½"	5½"	7⅜"	7¼"	2'-9¼"	5¹³⁄₁₆"
Over Finger or Modular Jt.	≤15"	8¼"	10⅛"	10"	3'-8¼"	8⁹⁄₁₆"

T = ; total movement along centerline of roadway at expansion joint.

BILL OF MATERIAL

Item	Unit	Quantity
Steel Railing, Type SM	Foot	199

R-34CWS (Modified) 9-1-2022

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk		DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024		
		DRAWN - K. KOLODZIEJCZYK	REVISED -		
PLOT SCALE = 240⁄0.0000 '' / ft.		CHECKED - M. LANGE	REVISED -		
PLOT DATE = 4/29/2024		DATE - 12/27/2023	REVISED -		

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

STEEL RAILING, TYPE SM
SN 019-5430
SHEET S10 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	26
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

MODEL: Default
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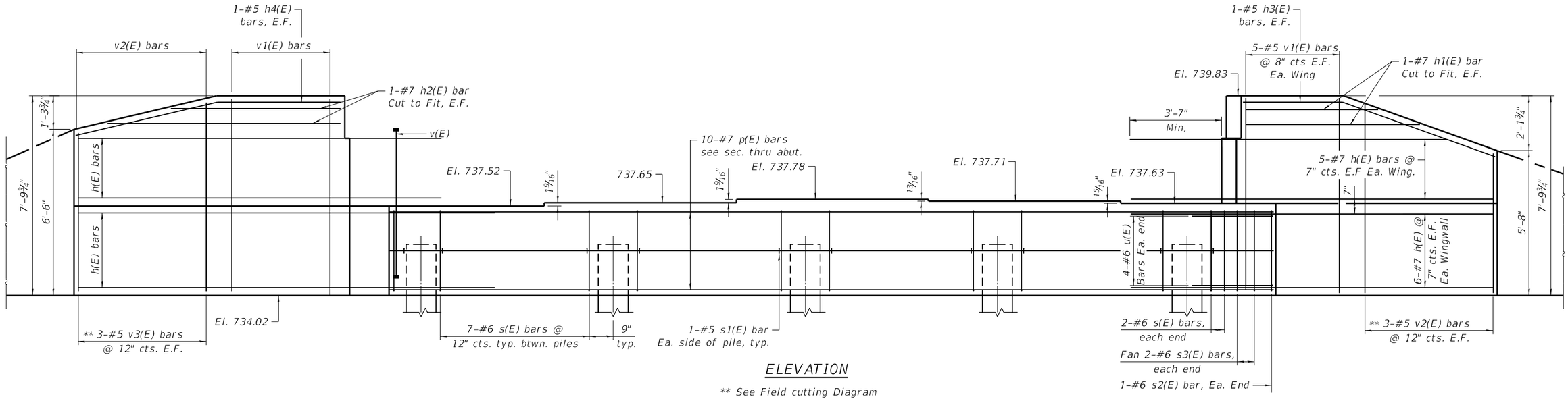
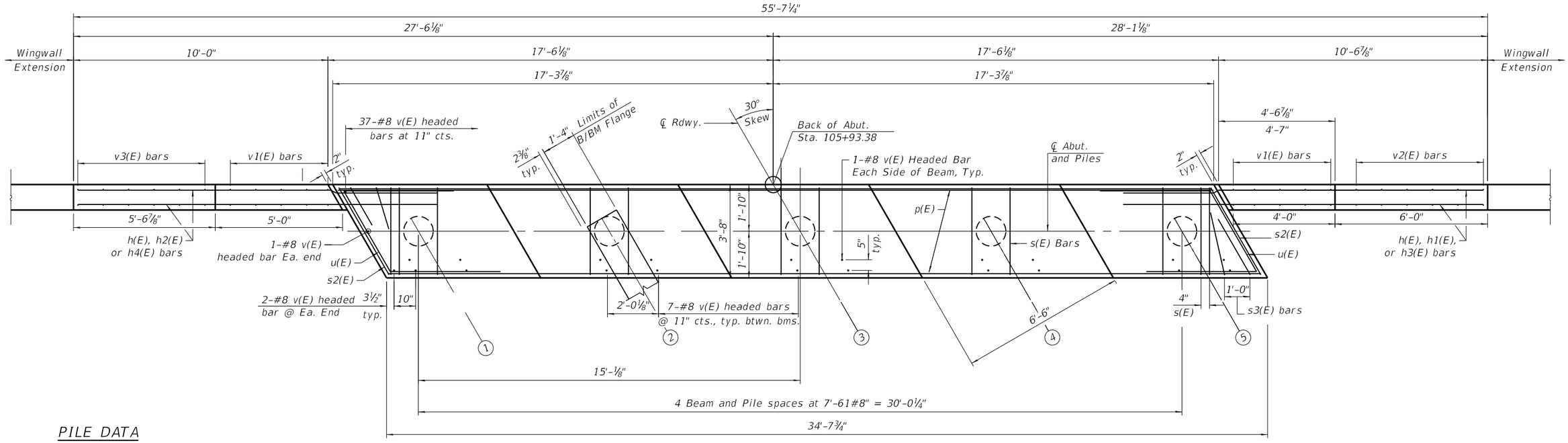
4/29/2024 5:13:52 PM



ELEVATION

** See Field cutting Diagram

* See Field Cutting Diagram



PLAN

PILE DATA

Type: Metal Shell 14" ○ x 0.312"
Nominal Required Bearing: 502 kip
Factored Resistance Available: 270 kip
Est. Length: 50-ft
No. Production Piles: 4
No. Test Piles: 1

MODEL: Default
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4/29/2024 5:13:53 PM

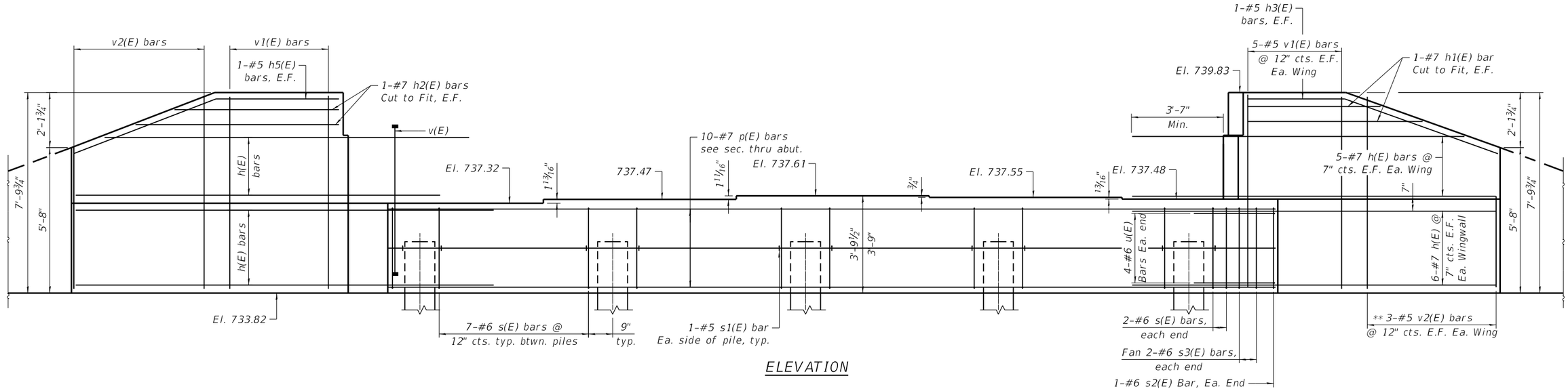
ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk		DESIGNED - K. KOLODZIEJCZYK	REVISED -	04/25/2024
		DRAWN - K. KOLODZIEJCZYK	REVISED -	
PLOT SCALE = 4820.0000 '/ IN.		CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024		DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

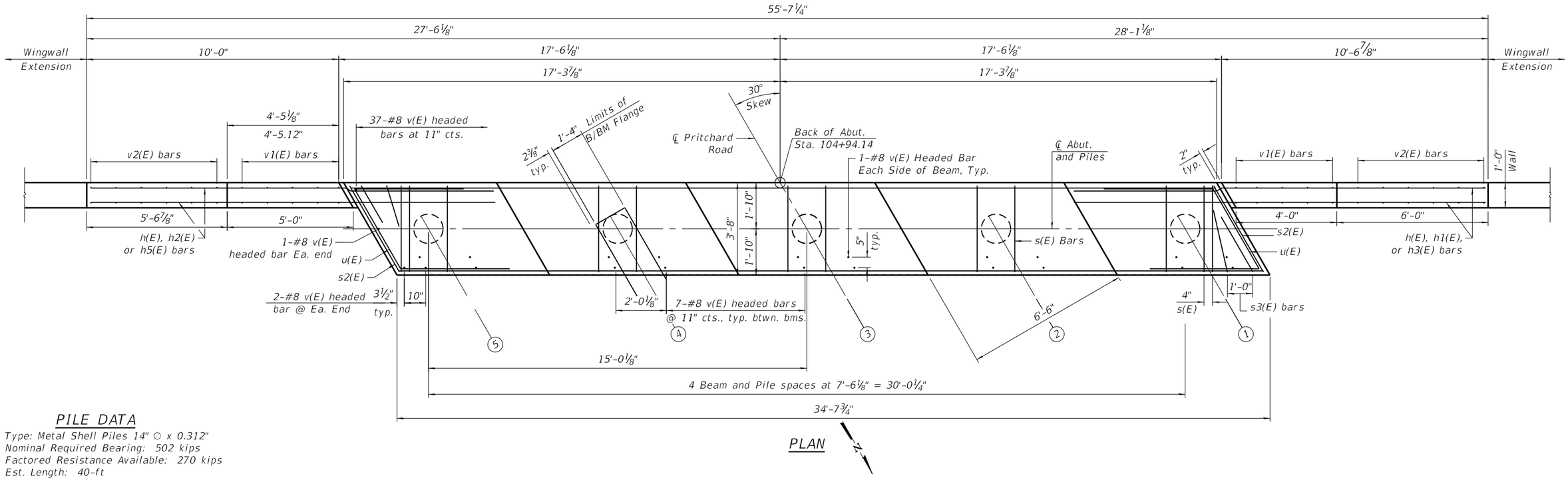
NORTH ABUTMENT PLAN
SN 019-5430
SHEET S11 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	27
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	



ELEVATION

* See Field Cutting Diagram



PLAN

PILE DATA

Type: Metal Shell Piles 14" ○ x 0.312"
Nominal Required Bearing: 502 kips
Factored Resistance Available: 270 kips
Est. Length: 40-ft
No. Production Piles: 4
No. Test Piles: 1

MODEL: Default
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ENGINEERING RESOURCE ASSOCIATES

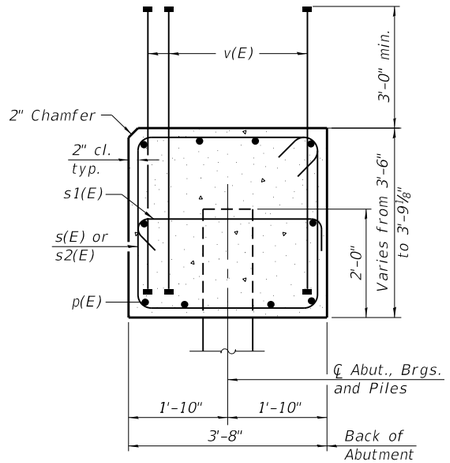
USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024
	DRAWN - K. KOLODZIEJCZYK	REVISED -
PLOT SCALE = 4820.0000 ':' / ft.	CHECKED - M. LANGE	REVISED -
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

SOUTH ABUTMENT PLAN
SN 019-5430
SHEET S12 OF S23 SHEETS

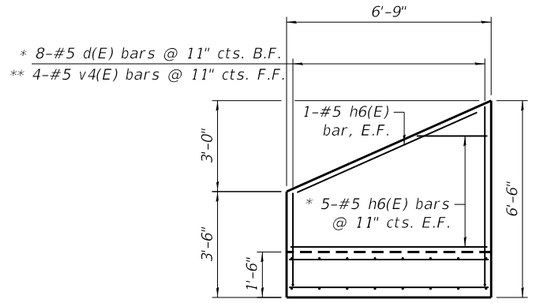
T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	28
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

4/29/2024 5:13:54 PM



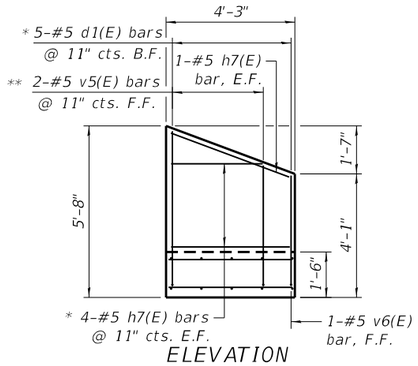
SEC. THRU ABUT.

Dimensions at right angles to abutment.

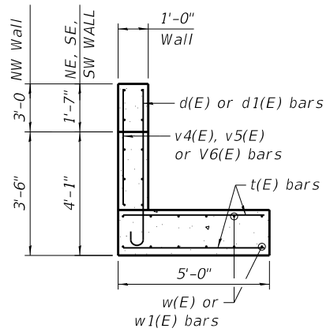


ELEVATION

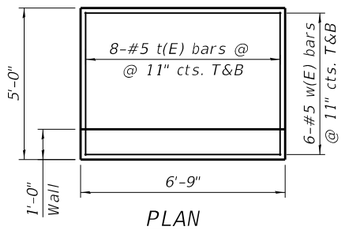
* Cut to fit
** See field cutting diagram



ELEVATION

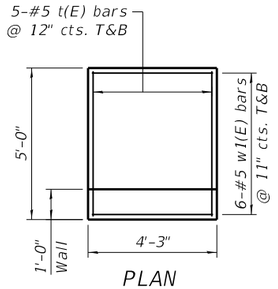


CROSS SECTION



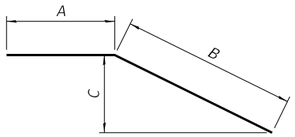
PLAN

NW WINGWALL EXTENSION

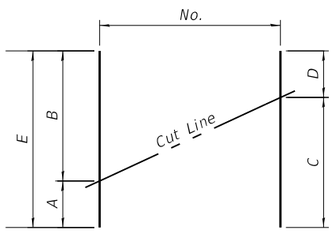


PLAN

NE, SE AND SW WINGWALL EXTENSIONS



Bar	A	B	C
h3(E)	3'-10"	6'-4"	2'-1⅝"
h4(E)	4'-9"	5'-8"	1'-3⅜"
h5(E)	4'-9"	5'-11"	2'-1½"

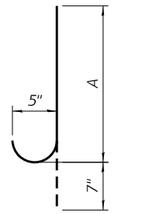


FIELD CUTTING DIAGRAM

Bar	No.	A	B	C	D	E
h1(E)	2	13'-2"	9'-1"	10'-5"	11'-10"	22'-3"
v2(E)	3	7'-4"	5'-4"	6'-6"	6'-2"	12'-8"
v3(E)	3	7'-5"	6'-2"	6'-8"	6'-11"	13'-7"
v4(E)	4	1'-8"	4'-7"	2'-11"	3'-4"	6'-3"
v5(E)	2	3'-9"	2'-8"	3'-5"	3'-0"	6'-5"

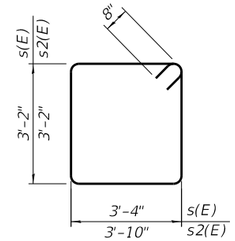
BAR v(E)

(Headed)

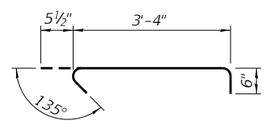


BARS d(E) or d1(E)

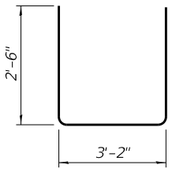
Bar	A
d(E)	5'-10"
d1(E)	5'-2"



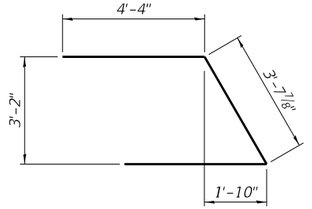
BAR s(E) & s2(E)



BAR s1(E)



BAR s3(E)



BAR u(E)

BILL OF MATERIAL

(Two Abutments)

Bar	No.	Size	Length	Shape
d(E)	8	#5	6'-5"	
d1(E)	15	#5	5'-9"	
h(E)	88	#7	14'-2"	
h1(E)	4	#7	11'-11"	
h2(E)	4	#5	15'-9"	
h3(E)	4	#5	10'-2"	
h4(E)	2	#5	10'-5"	
h5(E)	2	#5	10'-8"	
h6(E)	12	#5	6'-6"	
h7(E)	30	#5	3'-11"	
p(E)	20	#7	34'-4"	
s(E)	64	#6	14'-4"	
s1(E)	20	#5	4'-4"	
s2(E)	4	#6	15'-4"	
s3(E)	8	#6	8'-2"	
t(E)	46	#5	4'-8"	
u(E)	16	#6	12'-4"	
v(E)	162	#8	6'-6"	
v1(E)	40	#5	7'-5"	
v2(E)	18	#5	12'-8"	
v3(E)	6	#5	13'-7"	
v4(E)	4	#5	6'-3"	
v5(E)	6	#5	6'-5"	
v6(E)	3	#5	2'-4"	
w(E)	12	#5	6'-5"	
w1(E)	36	#5	3'-11"	

Item	Unit	Quantity
Structure Excavation	Cu. Yd.	131
Concrete Structures	Cu. Yd.	53.5
Reinforcement Bars, Epoxy Coated	Pound	10,430
Furnishing Metal Shell Piles, 14" x 0.312"	Foot	360
Driving Piles	Foot	360
Test Pile, Metal Shells	Each	2
Granular Backfill for Structures	Cu. Yd.	195
Geocomposite Wall Drain	Sq. Yd.	103
Concrete Headwalls or Pipe Drains	Each	2
Pipe Underdrains for Structures 4"	Foot	157
Rodent Shields	Each	2

Notes:

Pour steps monolithically with cap.

Headed bars shall conform to ASTM A970 with threaded attachment; Class HA; and reinforcement bars conforming to ASTM A706. Cost included with Reinforcement Bars, Epoxy Coated.

For details of piles see sheet S14

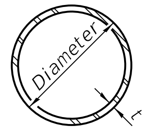
ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED -	04/25/2024
	DRAWN - K. KOLODZIEJCZYK	REVISED -	
PLOT SCALE = 2402.0000 ' / ft.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

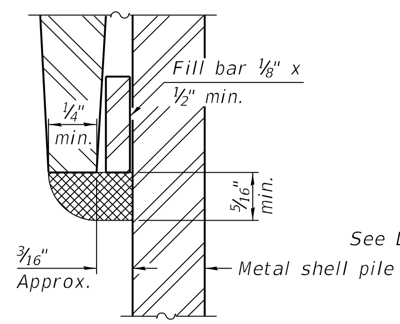
ABUTMENT DETAILS
SN 019-5430
SHEET S13 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	29
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

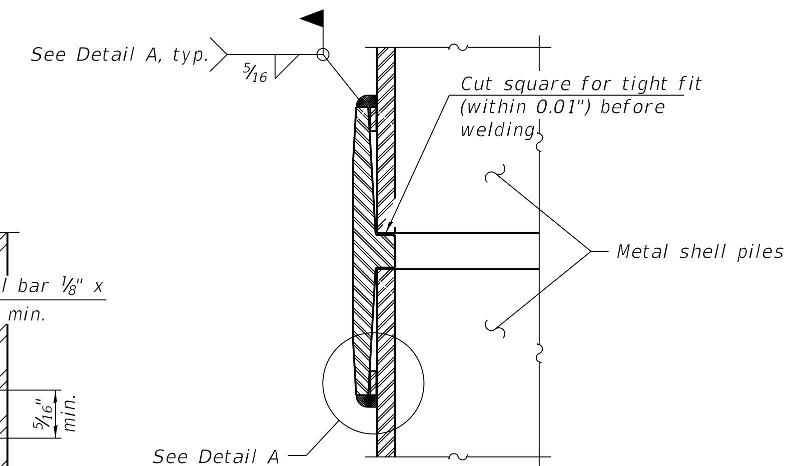


METAL SHELL PILE TABLE

Designation and outside diameter	Wall thickness t	Weight per foot (Lbs./ft.)	Inside volume (yd.^{3}/ft.)
PP12	0.250"	31.40	0.0267
PP14	0.250"	36.75	0.0368
PP14	0.312"	45.65	0.0361
PP16	0.312"	52.32	0.0478
PP16	0.375"	62.64	0.0470

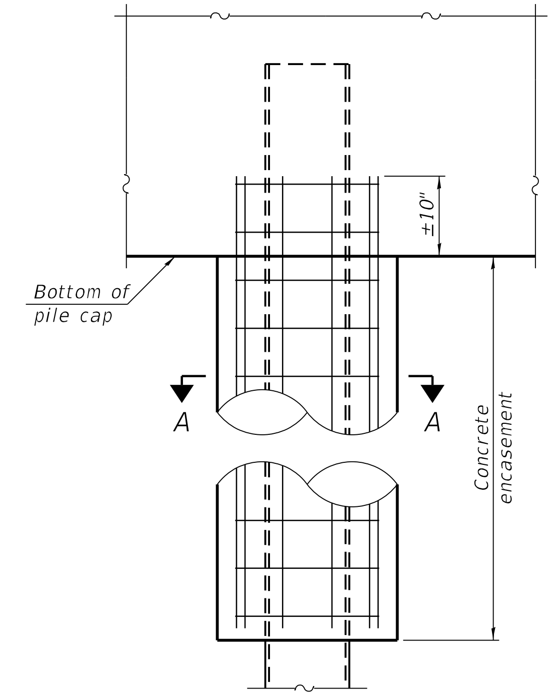


DETAIL A

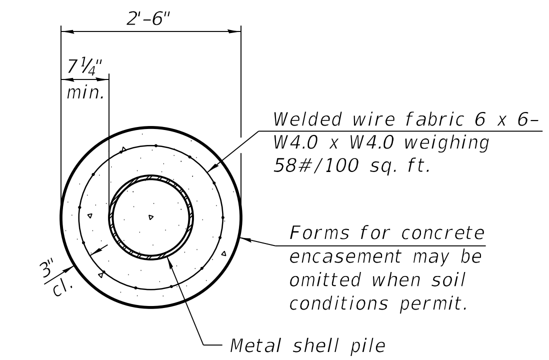


WELDED COMMERCIAL SPLICE

Notes:
The ⅛" x ½" min. fill bar may be constructed of 2 bars with a ⅛" max. gap between them.
Pile segments shall be driven to solid contact with splicer before welding.

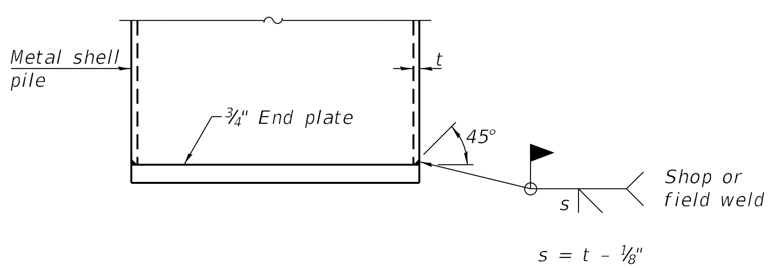


ELEVATION

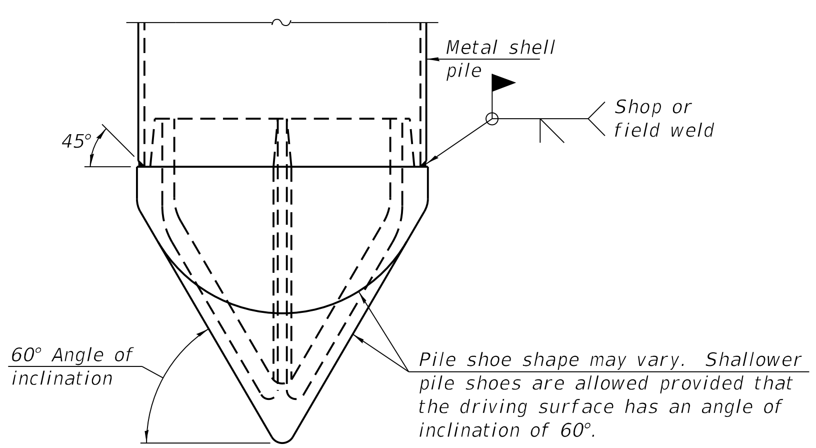


SECTION A–A

INDIVIDUAL PILE CONCRETE ENCASEMENT
(When specified)

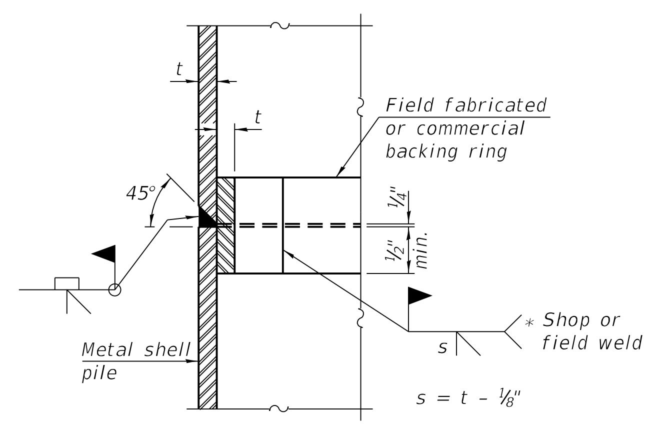


END PLATE ATTACHMENT



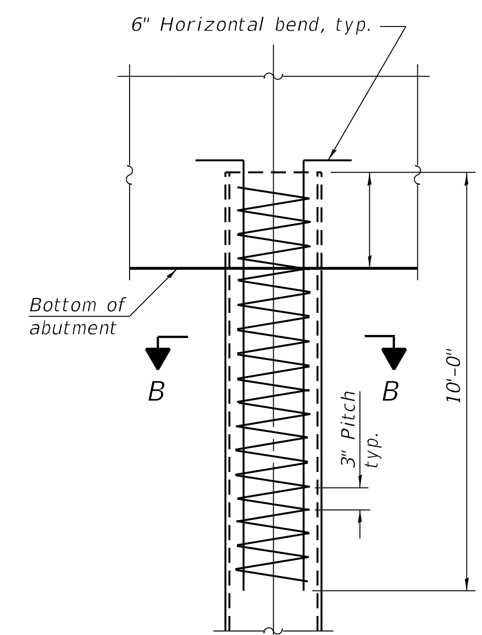
PILE SHOE ATTACHMENT

(When called for on the plans, the Contractor shall furnish metal shell pile shoes consisting of a single piece conical pile point as shown. The pile shoes shall be cast in one piece steel according to either ASTM A 148 Grade 80-50 or AASHTO M 103 Grade 65-35 and shall provide full bearing over the full circumference of the metal shell pile. The pile shoe shall have tapered leads to assure proper alignment and fitting and shall be secured to the pile with a circumferential weld).

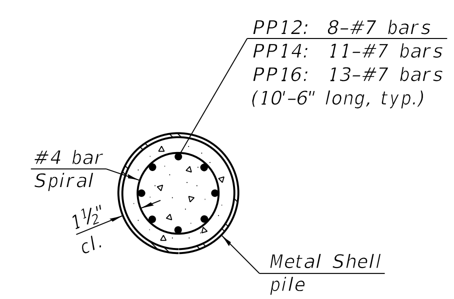


COMPLETE PENETRATION WELD SPLICE

* Field fabricated backing ring may be made from pile shell by removing segment to allow reducing circumference and vertically rejoin with partial joint penetration weld.



ELEVATION



SECTION B–B

REINFORCEMENT AT ABUTMENTS
(Omit when concrete encasement is specified)

Note:
The metal shell piles shall be according to Article 1006.05 of the Standard Specifications.

F-MS 2-1-2023

USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	
	DRAWN - K. KOLODZIEJCZYK	REVISED -	
PLOT SCALE = 48.0000 '/" / ft.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

ENGINEERING RESOURCE ASSOCIATES

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

METAL SHELL PILE DETAILS
SN 019-5430

SHEET S14 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	30

CONTRACT NO. 87818
ILLINOIS FED. AID PROJECT

MODEL: Default
FILE NAME: V:\DeKalbCity\HighwayDepartment\W22087.00 Pritchard Road Bridge\CADD SS\10\04_Structural\03_Sheet\16_Structural Sheets\0195430-W22087-S14-Pile Details.dgn
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rubino ENGINEERING INC.

SOIL BORING LOG

Date 8/3/22

ROUTE TR 230 DESCRIPTION SB lane of Pritchard Road LOGGED BY J. Watrobka

SECTION 19-17129-00-BR LOCATION South Abutment

COUNTY DeKalb County DRILLING METHOD Hollow Stem Auger HAMMER TYPE Automatic

STRUCT. NO. 019-5430
Station 105+43.76

BORING NO. BSB-01
Station 104+89.48
Offset 7.97LT
Ground Surface Elev. 739.82 ft

Surface Water Elev. 732.28 ft
Stream Bed Elev. 729.30 ft

Groundwater Elev.:
First Encounter 11 ft ▼
Upon Completion 13 ft ▽
After ____ Hrs. N/A ft

	DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Approximately 5 inches of ASPHALT	739.40			
Approximately 9 inches of GRAVEL FILL	738.66			
FILL: black, brown, and gray silty clay, trace sand and gravel *2% Organic Content*		2 3 6	1.5 P	21
5% Organic Content		2 3 5	0.9 B	23
4% Organic Content		3 2 2	0.5 P	29
4% Organic Content		2 2 2	0.5 P	32
	728.82 ▼			
Gray coarse grained SAND, some gravel	728.32	0 3 6	2.9 B	13
Stiff to very stiff, brown SILTY CLAY, trace sand and gravel		7 5 7	2.1 B	11
		6 8 12	2.4 B	11
	721.32			
Medium dense, gray coarse-grained SAND, some gravel and fines		8 13 10		8
Medium dense, gray coarse-grained SAND, some gravel and fines *(continued)*	718.82			
Very stiff, gray SILTY CLAY LOAM, some sand and gravel		8 12 15	2.0 B	10
	716.32			
Very stiff, gray SILTY CLAY LOAM, little gravel, trace sand		9 10 14	1.8 B	10
	713.82			
Medium dense, gray SAND and GRAVEL, some fines		23 10 12		11
	711.32			
Medium dense, brown fine-grained SAND, little gravel		10 12 8		17
	706.32			
Medium dense, brown fine-grained SAND, trace gravel		6 8 11		16
	701.32			
Dense to very dense, brown and gray medium to coarse grained SAND, little to some gravel		11 17 21		11

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

rubino ENGINEERING INC.

SOIL BORING LOG

Date 8/3/22

ROUTE TR 230 DESCRIPTION SB lane of Pritchard Road LOGGED BY J. Watrobka

SECTION 19-17129-00-BR LOCATION South Abutment

COUNTY DeKalb County DRILLING METHOD Hollow Stem Auger HAMMER TYPE Automatic

STRUCT. NO. 019-5430
Station 105+43.76

BORING NO. BSB-01
Station 104+89.48
Offset 7.97LT
Ground Surface Elev. 739.82 ft

Surface Water Elev. 732.28 ft
Stream Bed Elev. 729.30 ft

Groundwater Elev.:
First Encounter 11 ft ▼
Upon Completion 13 ft ▽
After ____ Hrs. N/A ft

	DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Dense to very dense, brown and gray medium to coarse grained SAND, little to some gravel *(continued)*				
	695.32	26 29 37		14
Very dense, gray fine-grained SAND, trace gravel				
	691.32			
Medium dense, gray SANDY LOAM, little gravel		3 8 11		16
	686.32			
Medium dense, gray medium grained SAND, trace gravel		2 5 15		13
	681.32			
Very dense, gray SANDY LOAM, little gravel		10 16 37		15
Very dense, gray SANDY LOAM, little gravel *(continued)*				
	676.32			
Very dense, gray medium to coarse grained SAND, little to some gravel and rock chips		19 24 50/4		10
	671.32			
Very stiff to hard, gray SILTY CLAY, trace sand and gravel		11 13 26	4.8 B	11
	664.82	5 10 19	2.9 B	13
End of boring at approximately 75 feet below existing grade.				

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

rubino ENGINEERING INC.

SOIL BORING LOG

Date 8/11/22

ROUTE TR 230 DESCRIPTION NB lane of Pritchard Road LOGGED BY P. Patel

SECTION 19-17129-00-BR LOCATION North Abutment

COUNTY DeKalb County DRILLING METHOD Hollow Stem Auger HAMMER TYPE Automatic

STRUCT. NO. 019-5430
Station 105+43.76

BORING NO. BSB-02
Station 106+29.05
Offset 8.25RT
Ground Surface Elev. 739.79 ft

Surface Water Elev. 732.28 ft
Stream Bed Elev. 729.30 ft

Groundwater Elev.:
First Encounter 13.5 ft ▼
Upon Completion N/A ft
After ____ Hrs. N/A ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Approximately 4 inches of ASPHALT 739.46			
Approximately 10 inches of GRAVEL FILL 738.63			
FILL: dark brown to black silty clay, trace gravel *4% Organic Content*	4 3 6	1.3 P	20
Some gravel *4% Organic Content*	4 6 14	2.1 B	20
4% Organic Content	2 2 2		22
731.29			
Medium stiff, gray SILTY CLAY LOAM, little sand, trace gravel *Interbedded sand and silt lenses observed* *4% Organic Content*	0 0 1	0.6 B	44
728.79			
Stiff, brown silty CLAY, trace sand and gravel	3 4 5	2.1 B	11
▼			
	3 5 6	1.6 B	12
723.79			
Stiff to very stiff, gray SILTY CLAY, trace to little sand and gravel	8 9 9	1.8 B	11
	7 11 9	1.8 B	8

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Stiff to very stiff, gray SILTY CLAY, trace to little sand and gravel *(continued)*			
	23 35 20	2.8 P	10
	8 8 9	2.6 B	9
	6 6 22	2.0 B	10
	3 4 6	2.2 B	10
706.29			
Medium dense, gray SANDY LOAM, some gravel	10 6 9		8
701.29			
Stiff, gray SILT, trace sand and gravel	3 4 6	1.8 P	17

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

BBS, from 137 (Rev. 8-99)

rubino ENGINEERING INC.

SOIL BORING LOG

Date 8/11/22

ROUTE TR 230 DESCRIPTION NB lane of Pritchard Road LOGGED BY P. Patel

SECTION 19-17129-00-BR LOCATION North Abutment

COUNTY DeKalb County DRILLING METHOD Hollow Stem Auger HAMMER TYPE Automatic

STRUCT. NO. 019-5430
Station 105+43.76

BORING NO. BSB-02
Station 106+29.05
Offset 8.25RT
Ground Surface Elev. 739.79 ft

Surface Water Elev. 732.28 ft
Stream Bed Elev. 729.30 ft

Groundwater Elev.:
First Encounter 13.5 ft ▼
Upon Completion N/A ft
After ____ Hrs. N/A ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Stiff, gray SILT, trace sand and gravel *(continued)*			
696.29			
Stiff, gray SILTY LOAM, little sand, trace gravel	0 4 5		21
	5 6 1		17
686.29			
Very dense, gray SANDY LOAM, trace gravel	29 22 29		17
664.79			

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Very dense, gray SANDY LOAM, trace gravel *(continued)*			
676.29			
Medium dense, gray SANDY LOAM, trace gravel	6 7 8		16
	10 11 14		14
666.29			
Very stiff, gray SILTY CLAY, trace sand and gravel	11 15 20	3.3 B	17
End of boring at approximately 75 feet below existing grade.			

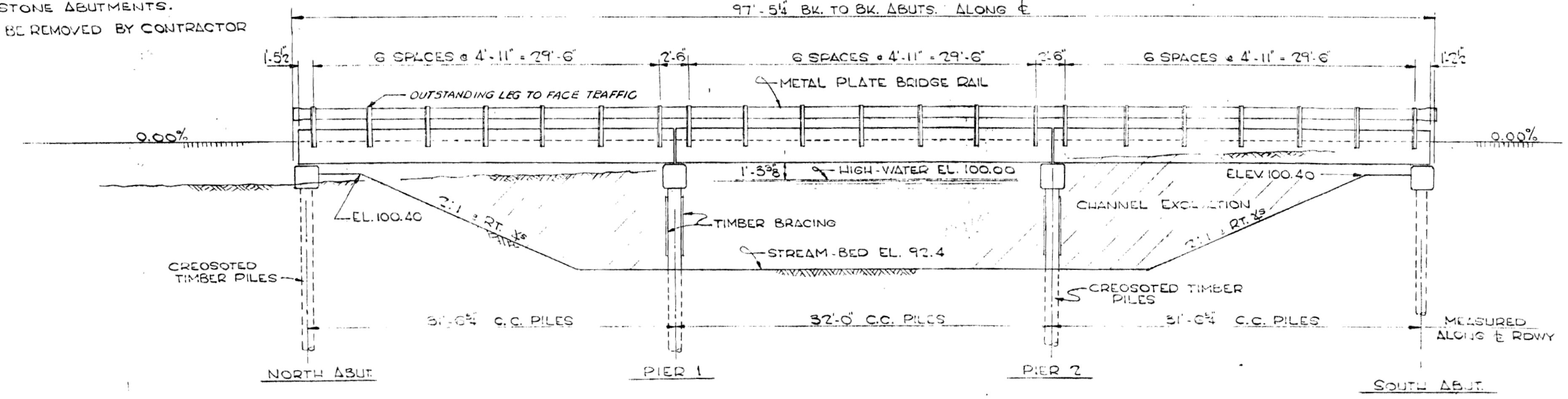
The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)

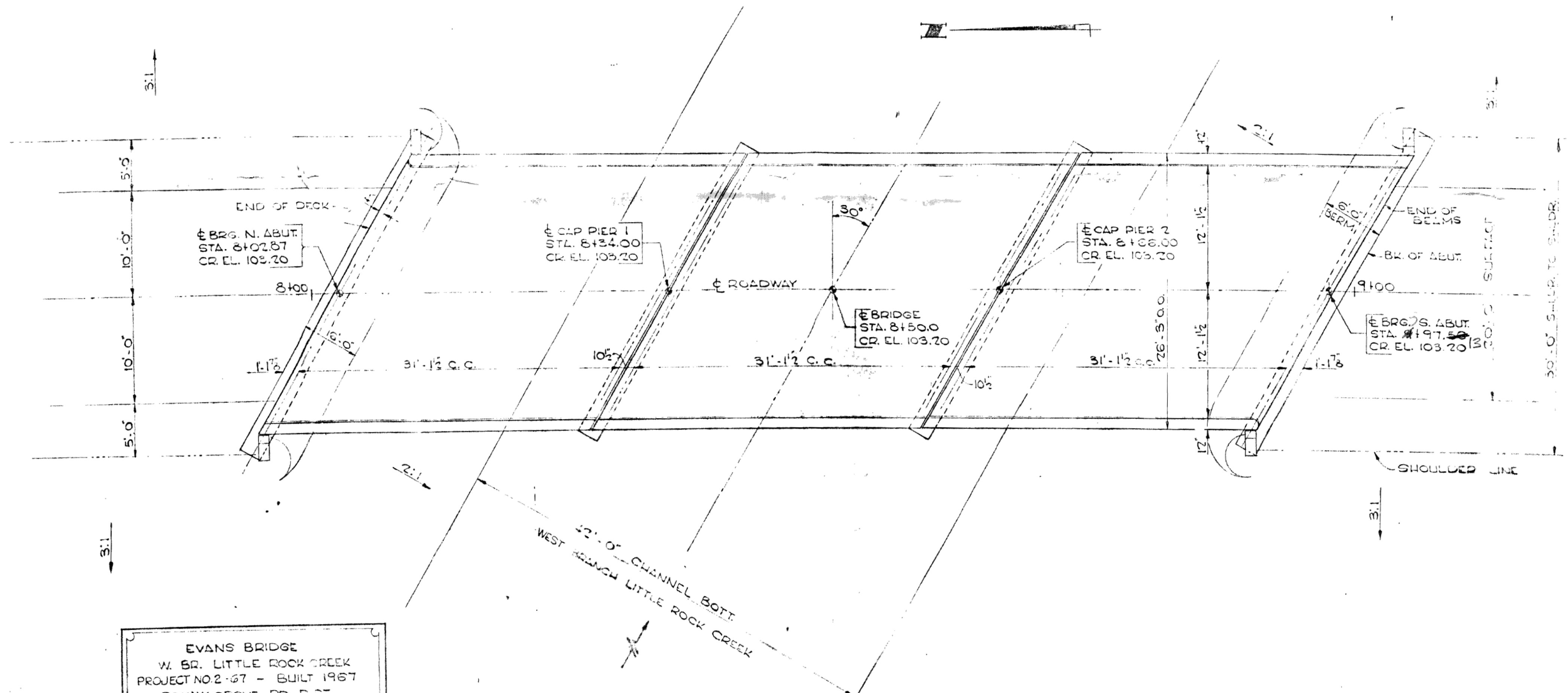
BBS, from 137 (Rev. 8-99)

SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
PROJECT NO.2	DEKALB	8	4
SQUAW GROVE ROAD DISTRICT			

B. M. - SPIKE IN POWER POLE 24' RT.
STA. 6+21 ELEV. 100.00 (ASSUMED)

EXISTING STRUCTURE: STA. 9+45
STEEL TRUSS 60' SPAN 12' RDWY.
CUT STONE ABUTMENTS.
TO BE REMOVED BY CONTRACTOR





SUMMARY OF QUANTITIES - BRIDGE

ITEM	UNIT	SUPER	SUB	TOTAL
REMOVAL OF EXISTING STRUCTURES	EACH			1
PRECAST CONCRETE BRIDGE SLABS	SQ. FT.	2513		2513
PRECAST CONCRETE CAPS	LIN. FT.		132	132
METAL PLATE BRIDGE RAIL	LIN. FT.	187		187
NAME PLATES	EACH	1		1
FURNISHING CREOSOTED PILES 20.1 TO 35	[illegible]		660	660
DRIVING TIMBER PILES	LIN. FT.		660	660
TEST PILE TIMBER	EACH		2	2
TREATED TIMBER	F.B.M.		456	456
HARDWARE	[illegible]		170	170

GENERAL NOTES:

STANDARD SPECIFICATIONS FOR ROAD & BRIDGE CONSTRUCTION ADOPTED BY THE DEPT. OF PUBLIC WORKS & BUILDINGS, JAN. 2, 1958 SHALL APPLY.

THE SUPPLEMENTAL SPECIFICATIONS EFFECTIVE JAN 3, 1963 ALSO APPLY TO THIS WORK.

ALL UNITS TO BE PRECAST AND ASSEMBLED IN FIELD. CURBS SHALL BE [illegible] MONOLITHICALLY WITH EXTERIOR BEAMS AT TIME OF PRECASTING.

A LIFTING DEVICE FOR [illegible] OF PRECAST CAPS & BEAMS SHALL BE DETAILED [illegible] FABRICATOR OF PRECAST UNITS TO ACCOM[illegible] WEIGHT OF UNITS WITH A SAFETY FA[illegible]

THE CONTRACTOR SHA[illegible] 2 TIMBER TEST PILES IN A PERMANENT LO[illegible] THE ENGINEER BEFORE [illegible] PILES.

THE COST OF [illegible] EXCAVATION FOR STRUCTURES SHALL BE INCLUDED IN THE CONTRACT UNIT PRICE PER LIN. FT. OF PRECAST CONCRETE CAPS.

TREATED [illegible] SHALL BE FULL-SAWN ROUGH DOUGLAS FIR [illegible] SOUTHERN PINE, [illegible] INSTALLED [illegible] ACCORDANCE WITH ART. [illegible] OF THE STD. SPECIF[illegible] ALL HARDWARE SHALL BE GALVANIZED.

THE CO[illegible] REINFORC[illegible] PRE[illegible] FILLER AND [illegible] ACCESSORIES [illegible] UNITS BEAMS AND CAPS SHALL [illegible] INCLUDED IN THE CONTRACT UNIT PRICE FOR THE [illegible]CAST UNIT INVOLVED.

FOR ITEM "PRECAST CONCRETE CAPS" SEE SPECIAL PROVISIONS.

CHANNEL [illegible] ATION SHALL BE CARRIED OUT IN VICINITY OF [illegible] PILE BEFORE IT IS DRIVEN.

THE COST OF THE FABRIC PADS SHALL BE INCLUDED IN THE CONTRACT UNIT PRICE FOR PRECAST CONCRETE BRIDGE DECK.

EVANS BRIDGE
W. BR. LITTLE ROCK CREEK
PROJECT NO. 2-67 - BUILT 1967
SQUAW GROVE RD. DIST.
DEKALB COUNTY
LOADING HS-15

LETTERING FOR NAME PLATE
ILL. STD. 2115-1

WATERWAY DATA
DRAINAGE AREA: 17000 ACRES
CHARACTER: LEVEL, ROLLING & CULTIVATED
EXIST. OPENING: 270 SQ. FT.
REQ'D. OPENING: 420 SQ. FT. (10 YR. FLOOD)
PROP. OPENING: 420 SQ. FT.

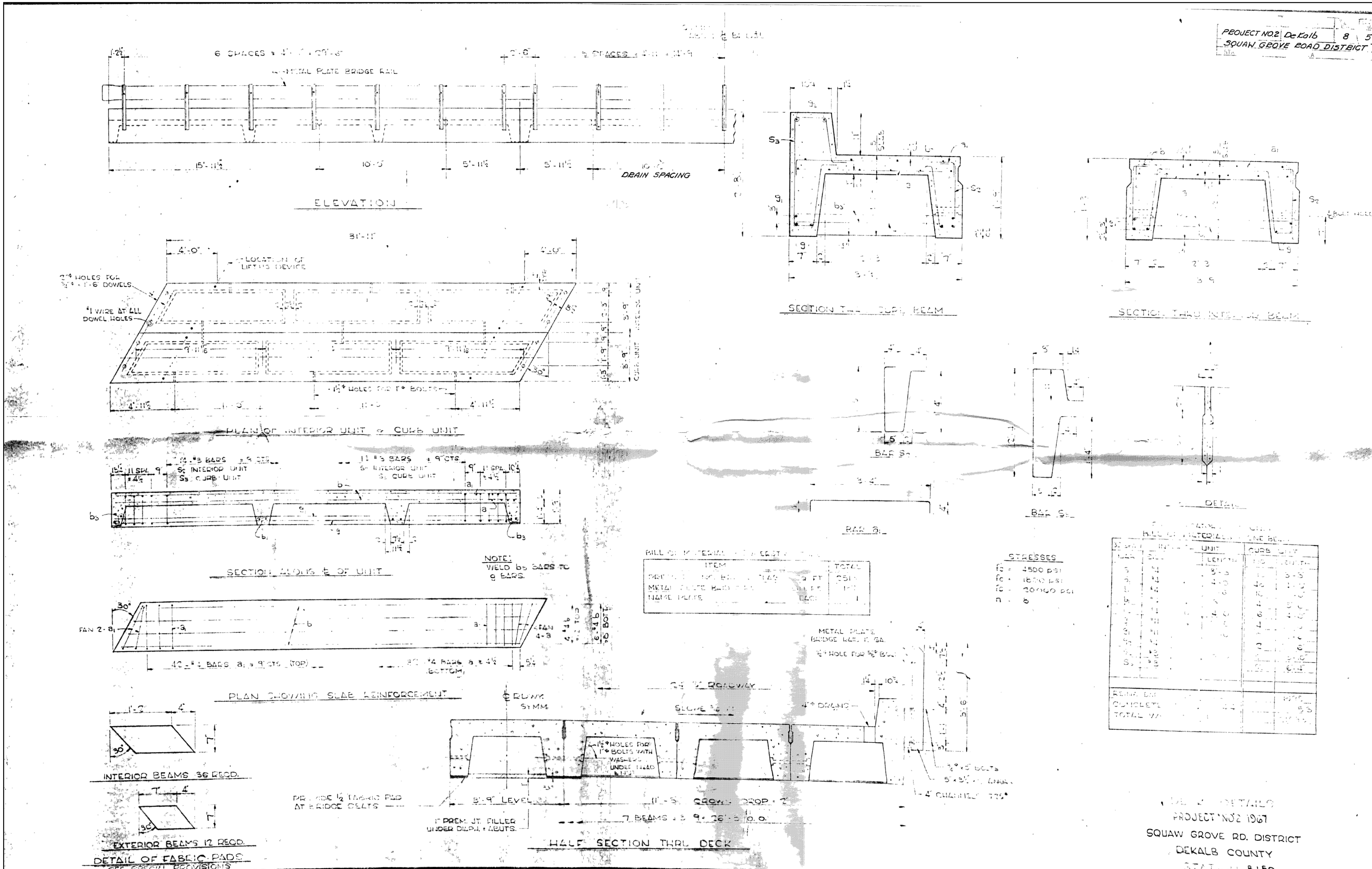
DESIGN STRESSES (PRECAST UNITS)
f'c = 4500 psi
fc = 1800 psi
fs = 20000 psi
n = 8
LOADING HS-15

GENERAL PLAN AND ELEVATION
EVANS BRIDGE OVER W. BR. LITTLE ROCK CR.
PROJECT NO. 2 - SQUAW GROVE RD. DIST.
DEKALB COUNTY
STATION 8+50

DESIGNED BY D. HUFFMAN
DRAWN BY R. R.
CHECKED BY T. D. G.
REVISED

W. KNETSCH & ASSOCIATES, INC.
CONSULTING ENGINEERS
DEKALB ILLINOIS

FOR INFORMATION ONLY



FOR INFORMATION ONLY

ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	
		DRAWN - K. KOLODZIEJCZYK	REVISED -	
	PLOT SCALE = 240:0.0000 ' / ft.	CHECKED - M. LANGE	REVISED -	
	PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING PLANS II
SN 019–5430

SHEET S18 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	34
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

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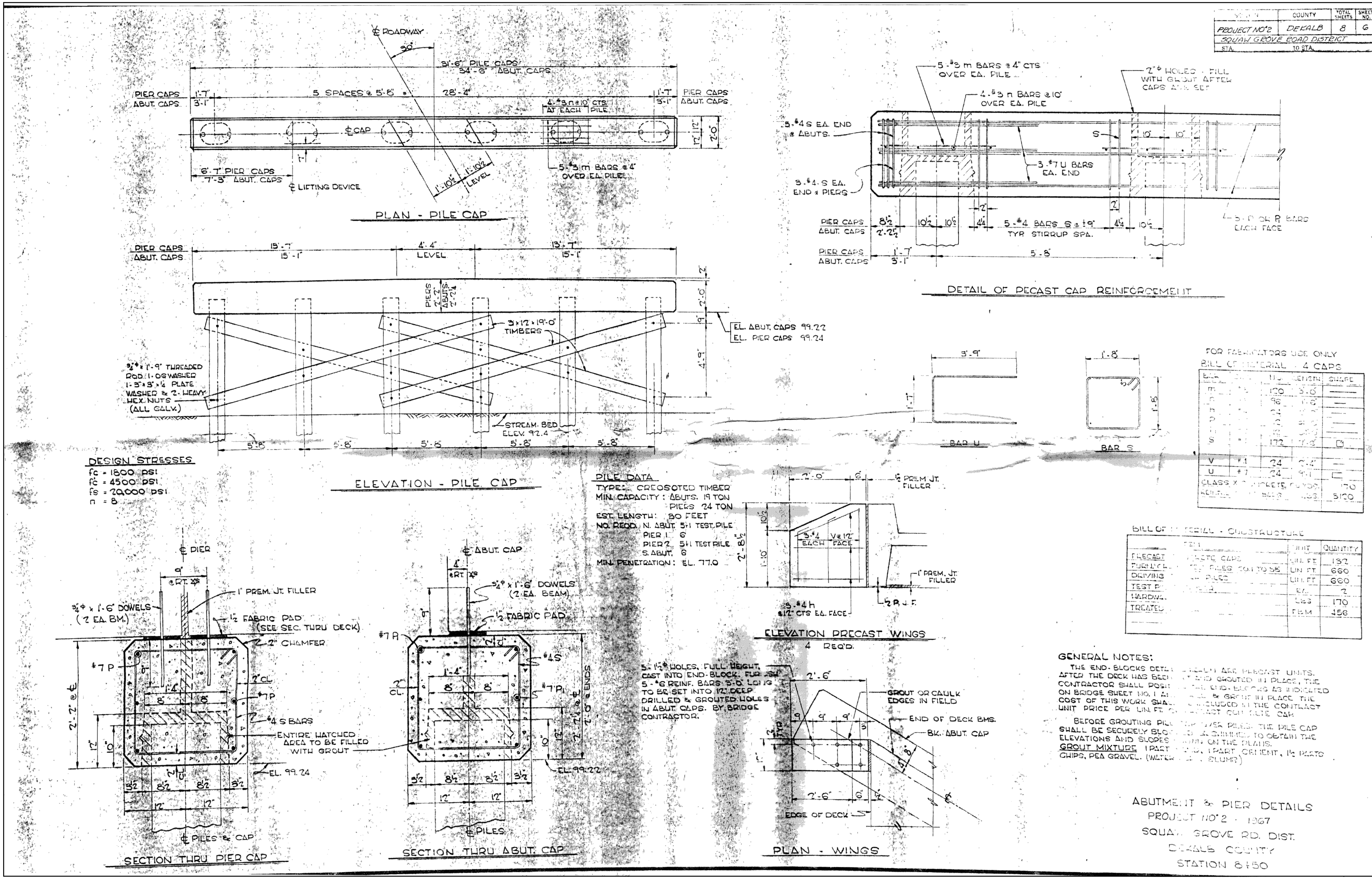

PROJECT NO. 2
DEKALB
8
6
SQUAW GROVE ROAD DISTRICT
PLAN - PILE CAP
℄ ROADWAY
31'-6" PILE CAPS
34'-6" ABUT. CAPS
PIER CAPS
ABUT. CAPS
5 SPACES @ 5'-8" = 28'-4"
4-#3 n @ 10" CTS AT EACH PILE
℄ CAP
6'-7" PIER CAPS
7'-3" ABUT. CAPS
℄ LIFTING DEVICE
5-#3 m BARS @ 4" OVER EA. PILE
LEVEL
ELEVATION - PILE CAP
15'-7"
15'-1"
4'-4" LEVEL
3x12x19'-0" TIMBERS
EL. ABUT. CAPS 99.22
EL. PIER CAPS 99.24
3/4"Φ x 1'-9" THREADED ROD, 1-OG WASHER, 1-3"x3"x1/4" PLATE WASHER & 2-HEAVY HEX. NUTS (ALL GALV.)
STREAM BED ELEV. 92.4
5'-8"
DESIGN STRESSES
fc = 1800 PSI
f'c = 4500 PSI
fs = 20,000 PSI
n = 8
PILE DATA
TYPE: CREOSOTED TIMBER
MIN. CAPACITY: ABUTS. 19 TON
PIERS 24 TON
EST. LENGTH: 30 FEET
NO. REQD.: N. ABUT. 5+1 TEST PILE
PIER 1 6
PIER 2 5+1 TEST PILE
S. ABUT. 6
MIN. PENETRATION: EL. 77.0
SECTION THRU PIER CAP
℄ PIER
1" PREM. JT. FILLER
3/4"Φ x 1'-6" DOWELS (2 EA. BM.)
1/2" FABRIC PAD (SEE SEC. THRU DECK)
2" CHAMFER
#7 P
#4 S BARS
ENTIRE HATCHED AREA TO BE FILLED WITH GROUT
EL. 99.24
℄ PILES & CAP
SECTION THRU ABUT. CAP
℄ ABUT. CAP
3/4"Φ x 1'-6" DOWELS (2 EA. BEAM)
1/2" FABRIC PAD
#7 A
#4 S
#7 P
EL. 99.22
℄ PILES
DETAIL OF PRECAST CAP REINFORCEMENT
5-#3 m BARS @ 4" CTS OVER EA. PILE
4-#3 n BARS @ 10" OVER EA. PILE
2"Φ HOLES - FILL WITH GROUT AFTER CAPS ARE SET
5-#4 S EA. END @ ABUTS.
3-#4 S EA. END @ PIERS
3-#7 U BARS EA. END
5-#4 BARS S @ 19" TYP. STIRRUP SPA.
5-#7 or P BARS EACH FACE
BAR U
BAR S
ELEVATION PRECAST WINGS
4 REQ'D.
1/2" PREM. JT. FILLER
1" PREM. JT. FILLER
3-#4 h @ 12" CTS EA. FACE
5-1 1/2"Φ HOLES, FULL HEIGHT, CAST INTO END BLOCK. FURNISH 5-#6 REINF. BARS 5'-0" LONG TO BE SET INTO 12" DEEP DRILLED & GROUTED HOLES IN ABUT. CAPS. BY BRIDGE CONTRACTOR.
PLAN - WINGS
GROUT OR CAULK EDGES IN FIELD
END OF DECK BMS.
BK. ABUT. CAP
EDGE OF DECK
FOR FABRICATORS USE ONLY
BILL OF MATERIAL - 4 CAPS
BILL OF MATERIAL - SUBSTRUCTURE
PRECAST
DRIVING
TEST P.
HARDWA.
TREATED
LIN. FT. 132
LIN. FT. 660
LIN. FT. 660
EA. 2
LBS 170
F.B.M. 456
GENERAL NOTES:
GROUT MIXTURE
ABUTMENT & PIER DETAILS
PROJECT NO. 2 - 1967
SQUAW GROVE RD. DIST.
DEKALB COUNTY
STATION 8+50

FOR INFORMATION ONLY

USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	
	DRAWN - K. KOLODZIEJCZYK	REVISED -	
PLOT SCALE = 240.0000 ' / ft.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

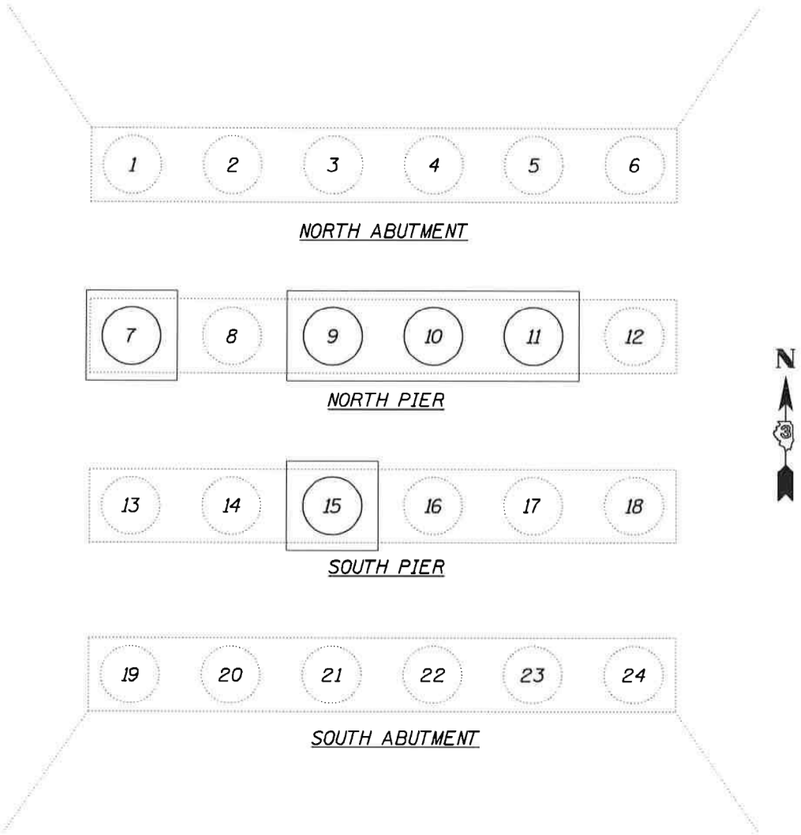
ENGINEERING RESOURCE ASSOCIATES

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

EXISTING PLANS III
SN 019–5430

SHEET S19 OF S23 SHEETS

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	35
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	



- Denotes Piles To Be Repaired

LICENSED STRUCTURAL ENGINEER
DAVID CARL PUZEY
081-005470
SPRINGFIELD ILLINOIS
STATE OF ILLINOIS

Expires: November 30, 2014

GENERAL NOTES

Plan dimensions and details relative to existing plans are subject to nominal construction variations. The Contractor shall field verify existing dimensions and details affecting new construction and make necessary approved adjustments prior to construction or ordering of materials. Such variations shall not be cause for additional compensation for a change in scope of the work, however, the Contractor will be paid for the quantity actually furnished at the unit price bid for the work.

All structural steel used for timber pile repairs shall be unpainted.

All traffic shall be removed from the structure during repair.

The Contractor shall provide support and/or shoring systems for the cap and superstructure in the area of timber pile repair.

Existing backing planks shall be notched as required for plate installation.

All hardware shall be hot-dipped galvanized and have a minimum bending yield strength Fyb of 45,000 psi.

As built plans must be provided to the Bureau of Bridges and Structures upon completion of the project, indicating which Alternate Method was used.

TIMBER PILE REPAIR CONSTRUCTION METHOD

1. Provide temporary support for the superstructure before starting repairs.
2. Only one pile shall be repaired at a time to ensure stability of the substructure unit. The Contractor's Sequence of Construction shall be approved by the Engineer prior to the start of construction.
3. Cut off timber pile level, through a non-deteriorated cross section, to allow full bearing contact with the bottom base plate of the steel pile assembly (Alternate 1) or Pile Stub Assembly (Alternate 2 & 3). Remove section of timber pile. Top of remaining timber pile shall be coated with Copper Naphthenate meeting the material requirements of AWPA Standard M4-06.
4. Top of deteriorated timber pile section shall be removed or cut flush with the bottom of the existing pile bent cap.
5. Install Bottom Base Plate (Alternate 1) or Pile Stub Assembly (Alternate 2 & 3). Bottom base plate shall bear on pile in a level position. Field measure the length required for the steel pile assembly (Alternate 1 & 2) or Steel Sleeve Assembly (Alternate 3), allowing for the ½" bottom base plate.
6. Cut steel pile assembly (Alternate 1 & 2) or Steel Sleeve Assembly (Alternate 3) to required length and grind ends to be field welded. ½" cap plate should be shop welded to the steel pile.
7. Place steel pile assembly (Alternate 1 & 2) or Steel Sleeve Assembly (Alternate 3) in the removed pile location. Position the steel pile on bottom base plate. Field weld the steel pile to bottom base plate at locations shown.
8. Connect cap plate to the existing pile bent cap. Use shop fabricated cap plates as a template for drilling holes into the existing pile bent cap. Provide shims for tight fit if necessary. Install ¾" wedge anchors or lag screws as required.
9. Repeat procedures for all remaining piles to be repaired

DESIGN SPECIFICATIONS

2002 AASHTO

DESIGN STRESSES

FIELD UNITS (NEW CONSTRUCTION)

f'c = 3,500 psi (Concrete Pile Encasement)
fy = 60,000 psi (Reinforcement)
fy = 36,000 psi (Structural Steel)
unless otherwise noted

LOADING HS15-44 - NEW CONSTR.

TIMBER PILE REPAIRS
PRITCHARD ROAD OVER W BR LITTLE ROCK CREEK
DEKALB COUNTY
STRUCTURE NO. 019-5417

DESIGNED WAB	EXAMINED	DATE - September 3, 2013	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION		F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
CHECKED JAE	ACTING ENGINEER OF STRUCTURAL SERVICES						DEKALB		
DRAWN WAB	PASSED	REVISED		SHEET NO. 1 OF 4 SHEETS			CONTRACT NO.		
CHECKED JAE	ACTING ENGINEER OF BRIDGES AND STRUCTURES	REVISED					ILLINOIS	FED. AID PROJECT	

FOR INFORMATION ONLY

ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EXISTING PLANS IV SN 019-5430	T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
		DRAWN - K. KOLODZIEJCZYK	REVISED -			230	19-17129-00-BR	DEKALB	48	36
	PLOT SCALE = 2400.0000 ' / ft.	CHECKED - M. LANGE	REVISED -		SHEET S20 OF S23 SHEETS			CONTRACT NO. 87818		
	PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -					ILLINOIS	FED. AID PROJECT	

MODEL: Default
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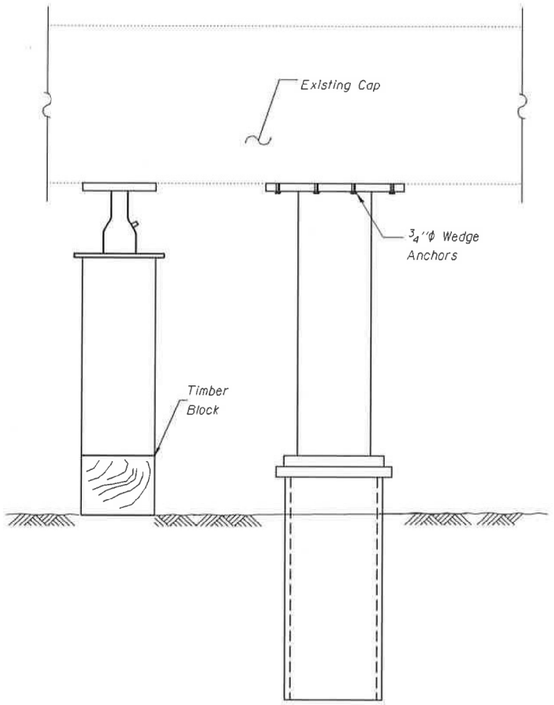
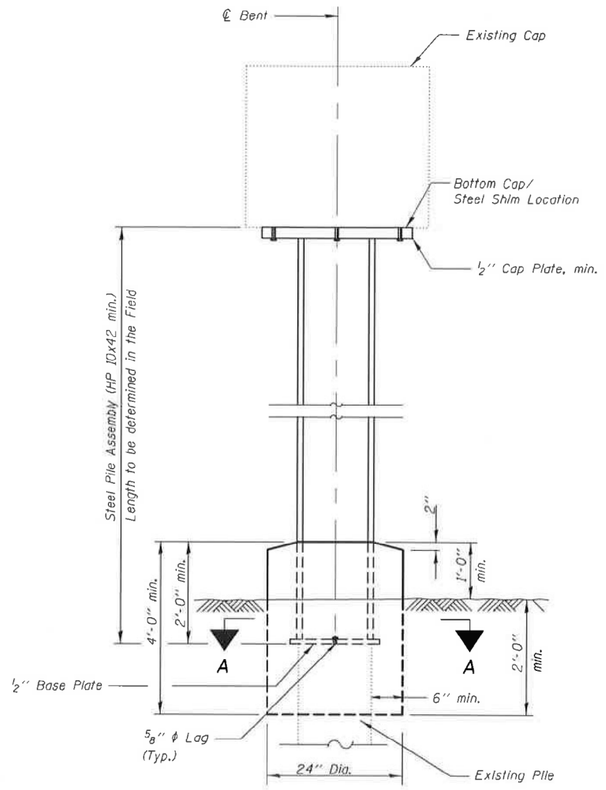


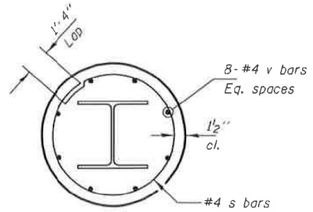
TEMPORARY SUPPORT

Temporary support must be less than half the spacing to the adjacent pile but not to exceed 3'-0''.

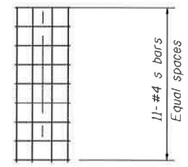


SIDE VIEW

REPAIR ALTERNATE 1



SECTION A-A



REINFORCEMENT

Note: See Sheet 4 of 4 for additional details.

DESIGNED WAB	EXAMINED Timothy A. Bullock ACTING ENGINEER OF STRUCTURAL SERVICES	DATE - September 3, 2013	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	TIMBER PILE REPAIR DETAILS EXISTING STRUCTURE NO. 019-5417	F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
CHECKED JAE							DEKALB		
DRAWN WAB	PASSED A. Carl Bury ACTING ENGINEER OF BRIDGES AND STRUCTURES	REVISED		SHEET NO. 2 OF 4 SHEETS			CONTRACT NO.		
CHECKED JAE		REVISED					ILLINOIS FED. AID PROJECT		

FOR INFORMATION ONLY

ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	EXISTING PLANS V SN 019-5430	T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
		DRAWN - K. KOLODZIEJCZYK	REVISED -			230	19-17129-00-BR	DEKALB	48	37
	PLOT SCALE = 2400.0000 ' / ft.	CHECKED - M. LANGE	REVISED -					CONTRACT NO. 87818		
	PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -		SHEET S21 OF S23 SHEETS			ILLINOIS FED. AID PROJECT		

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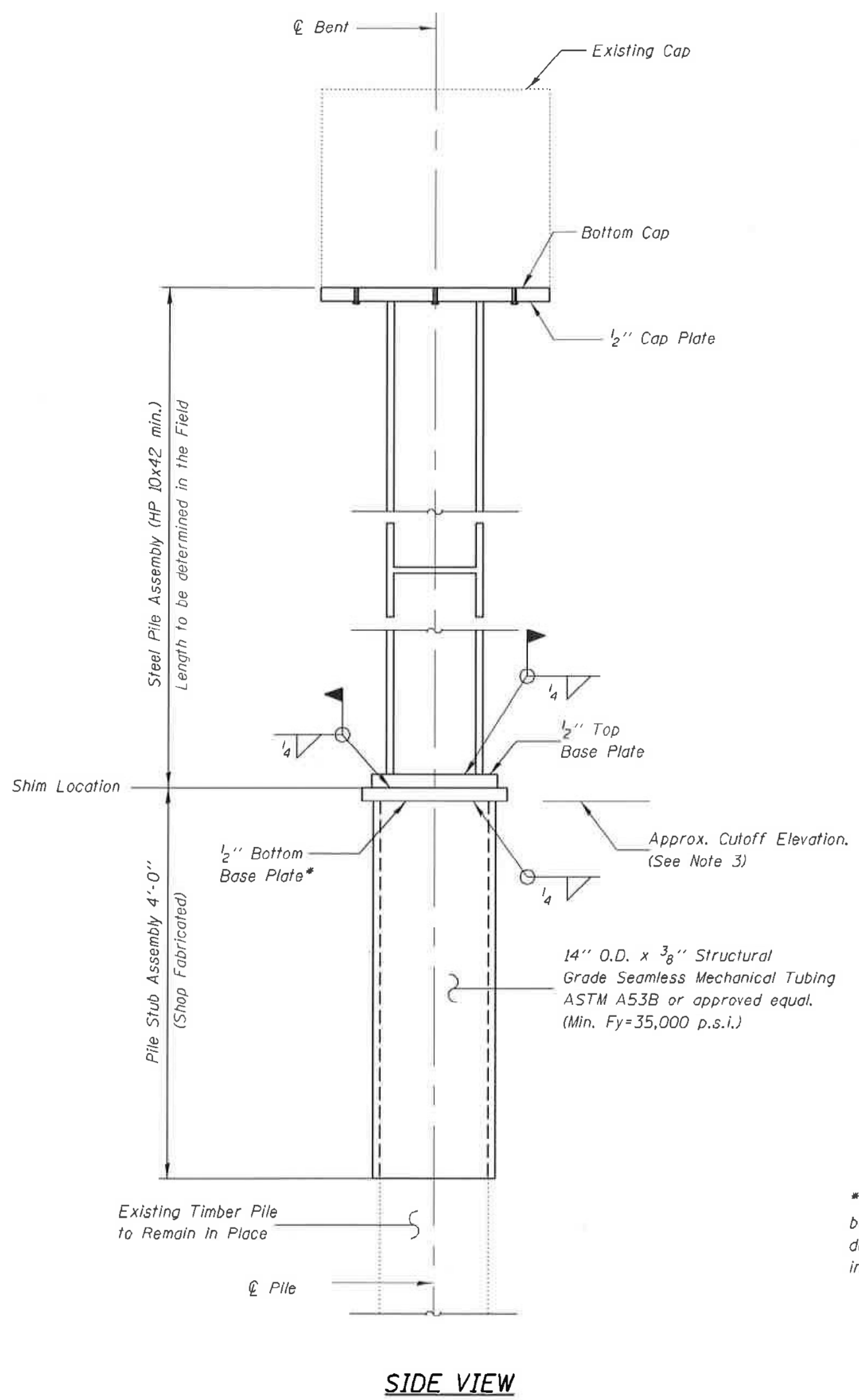
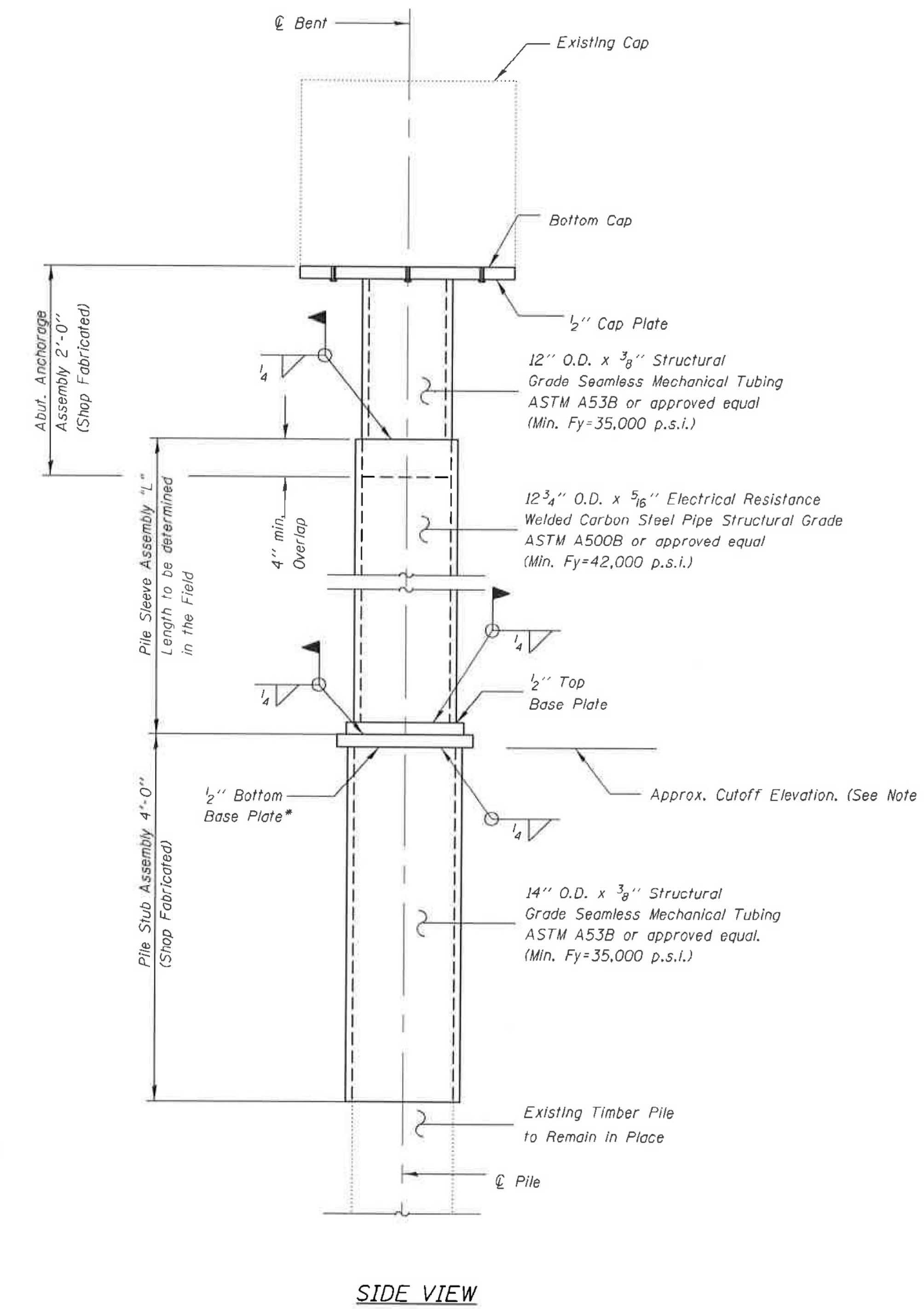
4/29/2024 5:14:29 PM



SIDE VIEW

REPAIR ALTERNATE 2

* Vent holes should be provided in bottom base plate to allow air and water to escape during installation. Holes may also be used to inject epoxy if required for stability.



SIDE VIEW

REPAIR ALTERNATE 3

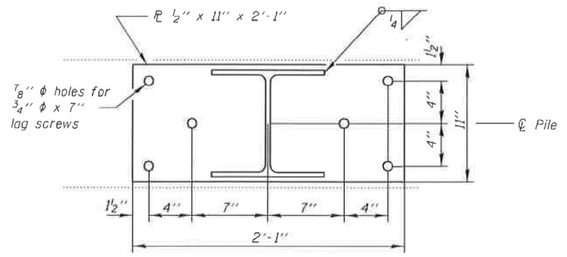
Note: See Sheet 4 of 4 for additional details.

DESIGNED WAB	EXAMINED Timothy A. Armbrecht — ACTING ENGINEER OF STRUCTURAL SERVICES	DATE - September 3, 2013	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION
CHECKED JAE			
DRAWN WAB	PASSED D. Carl Puzey — ACTING ENGINEER OF BRIDGES AND STRUCTURES	REVISED	
CHECKED JAE		REVISED	

TIMBER PILE REPAIR DETAILS
EXISTING STRUCTURE NO. 019-5417
SHEET NO. 3 OF 4 SHEETS

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
		DEKALB		
CONTRACT NO.				
ILLINOIS FED. AID PROJECT				

FOR INFORMATION ONLY

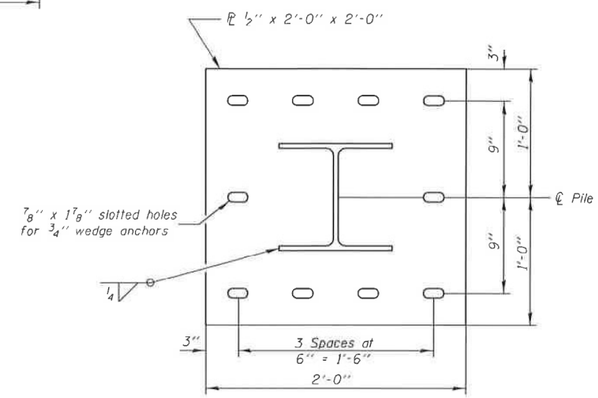


SECTION AT ABUTMENT

Repair Alternate 2 shown; Others similar.

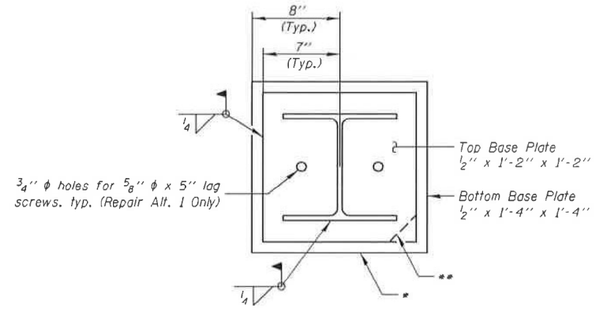
CAP PLATE DETAIL

(For Timber Abutment/Pier Cap)



CAP PLATE DETAIL

H-Pile shown; Structural Tubing similar
(For Concrete Abutment/Pier Cap)



BASE AND SHIM PLATE

H-Pile shown; Structural Tubing similar

* Bottom Base Plate is not required for Repair Alternate 1.
** Plate corners may be clipped for Repair Alternate 1 to provide clearance within concrete encasement.

DESIGNED WAB	EXAMINED Timothy A. Bradt, ACTING ENGINEER OF STRUCTURAL SERVICES	DATE - September 3, 2013	**STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION**	**TIMBER PILE REPAIR DETAILS EXISTING STRUCTURE NO. 019-5417**	F.A. RTE. / SECTION / COUNTY / TOTAL SHEETS / SHEET NO.
CHECKED JAE					DEKALB
DRAWN WAB	PASSED A. Carl Long, ACTING ENGINEER OF BRIDGES AND STRUCTURES	REVISED		SHEET NO. 4 OF 4 SHEETS	CONTRACT NO.
CHECKED JAE		REVISED			ILLINOIS FED. AID PROJECT

FOR INFORMATION ONLY

ENGINEERING RESOURCE ASSOCIATES	USER NAME = kkolodziejczyk	DESIGNED - K. KOLODZIEJCZYK	REVISED - 04/25/2024	**STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION**	**EXISTING PLANS VII SN 019-5430**
		DRAWN - K. KOLODZIEJCZYK	REVISED -		SHEET S23 OF S23 SHEETS
	PLOT SCALE = 2400.0000 '/ in.	CHECKED - M. LANGE	REVISED -		
	PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -		

T.R.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	39
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

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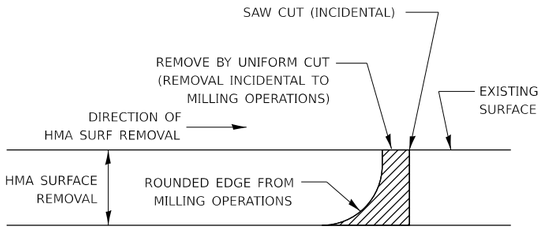
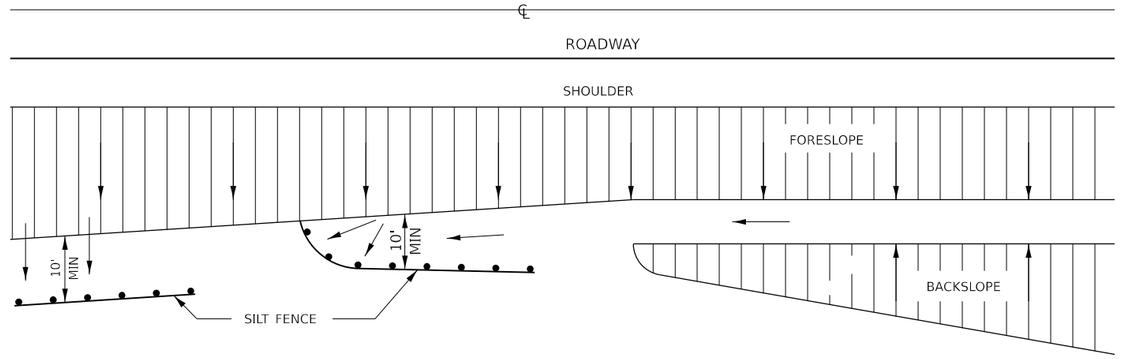
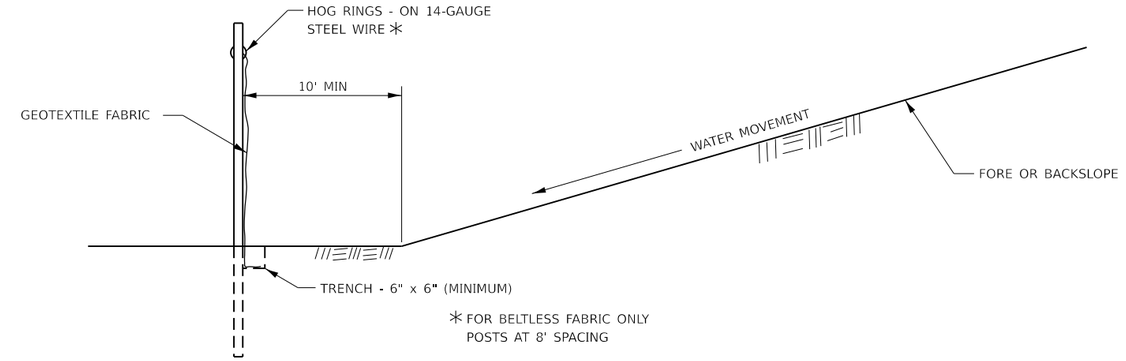


NOTE:

WHEN MILLING OPERATIONS PRODUCE A ROUNDED EDGE, THEN A SAW CUT SHALL BE USED TO MANUFACTURE A PERPENDICULAR EDGE AS SHOWN IN THE DETAIL. THE ENGINEER SHALL BE THE SOLE JUDGE CONCERNING THE USE OF THIS DETAIL

HMA DETAIL AT BUTT JOINTS





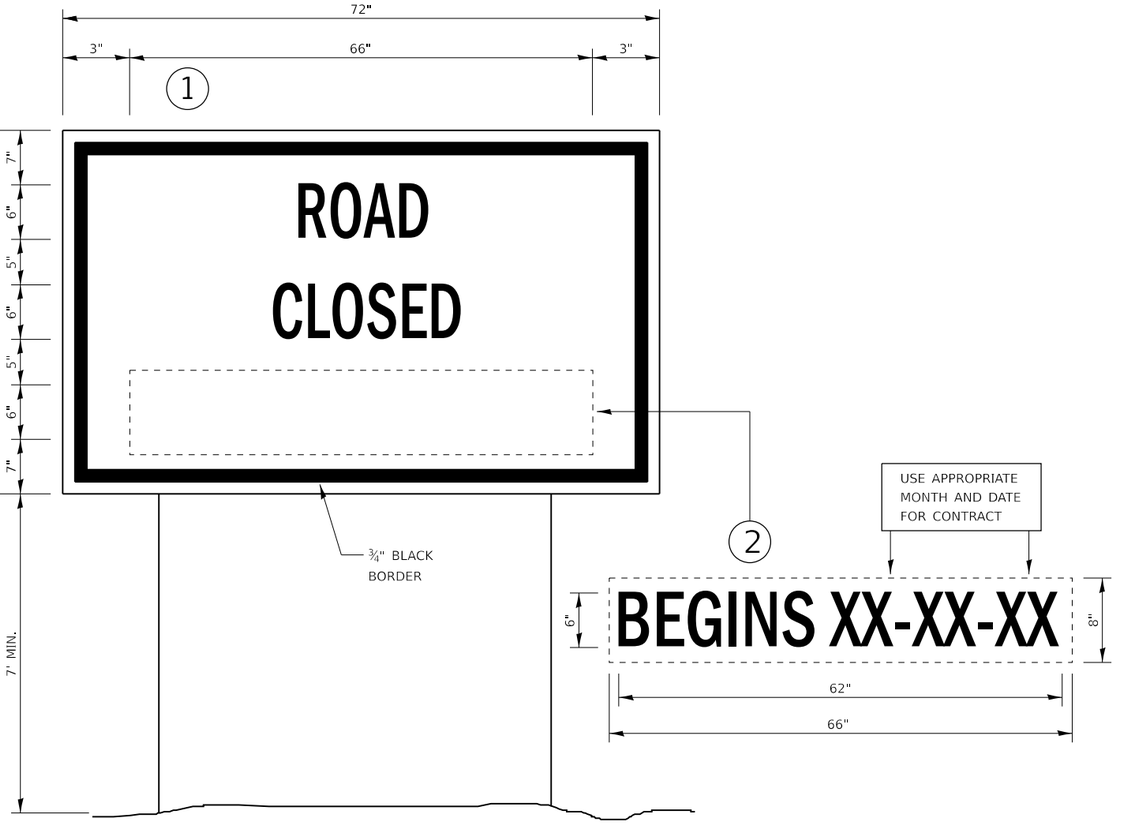
DETAILS OF SILT FENCE

EROSION CONTROL DETAILS FOR SILT FENCE

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	DISTRICT DETAILS PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK	
	DRAWN - T. STENSLIK	REVISED -			
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -		SCALE: N.T.S. SHEET 1 OF 2 SHEETS STA. N/A TO STA. N/A	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -			

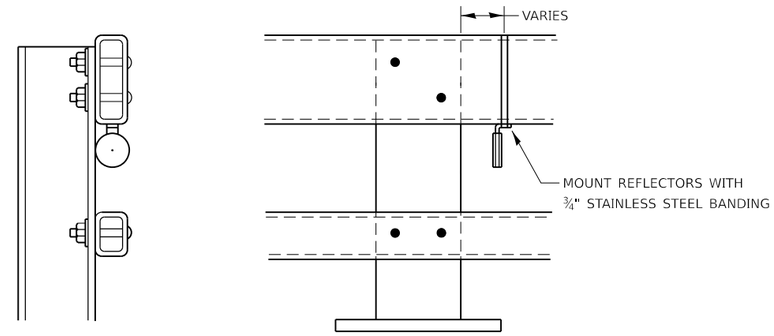
T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	40
		CONTRACT NO. 87818		
		ILLINOIS FED. AID PROJECT		



TEMPORARY INFORMATION SIGNING

NOTES:

1. USE 6" D BLACK LETTERING ON FLUORESCENT ORANGE BACKGROUND.
2. ERECT SIGNS AT LOCATIONS IN ADVANCE OF THE "ROAD CONSTRUCTION AHEAD" SIGNS AS DIRECTED BY THE ENGINEER.
3. ERECT SIGN (1) WITH INSTALLED PANEL (2) A MINIMUM OF ONE WEEK PRIOR TO THE START OF THE ROAD CLOSURE.
4. REMOVE PANEL (2) ON THAT DATE.
5. THE SIGN WILL BE SUPPLIED AND PLACED BY OTHERS.



NOTES

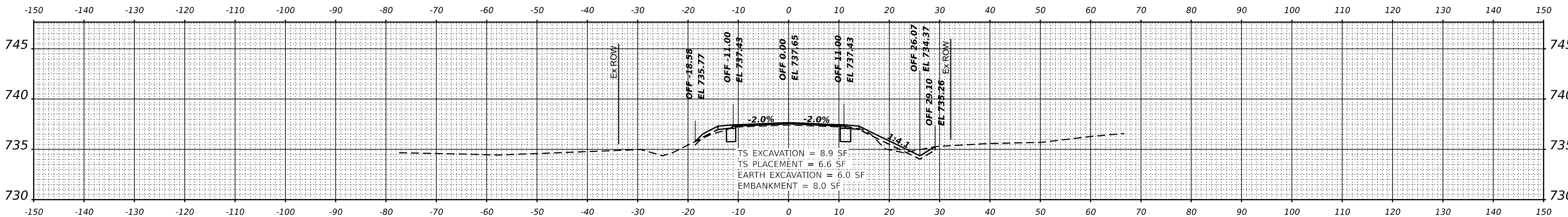
1. REFLECTORS SHALL MEET THE REQUIREMENTS OF ARTICLE 1097.03 OF THE STANDARD SPECIFICATIONS.
2. FURNISHING AND INSTALLING THE COMPLETE REFLECTOR UNIT WILL WILL BE PAID AT THE CONTRACT UNIT PRICE EACH FOR GUARD RAIL MARKERS.

REFLECTOR MOUNTING DETAIL FOR STEEL RAIL

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/25/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	DISTRICT DETAILS PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK	
	DRAWN - T. STENSLIK	REVISED -			
PLOT SCALE = 20.000 ' / in.	CHECKED - M. LANGE	REVISED -			
PLOT DATE = 5/1/2024	DATE - 12/27/2023	REVISED -		SCALE: N.T.S. SHEET 2 OF 2 SHEETS STA. N/A TO STA. N/A	

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BR	DEKALB	48	41
		CONTRACT NO. 87818		
	ILLINOIS FED. AID PROJECT			



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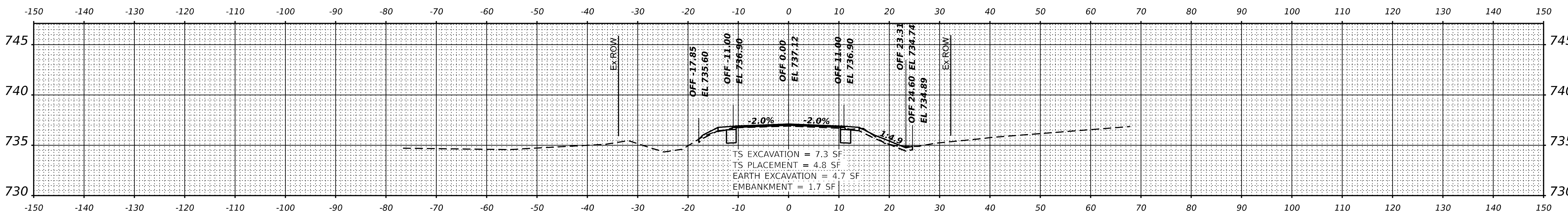
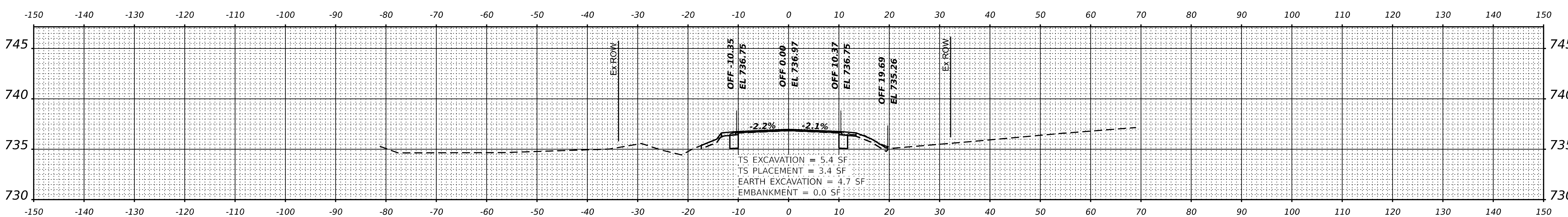


STA 102+50.00



STA 102+00.00

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ORIGINAL SURVEY: NOTE BOOK NO. / SURVEYED / PLOTTED / TEMPLATE / AREAS / AREAS CHECKED / BY / DATE

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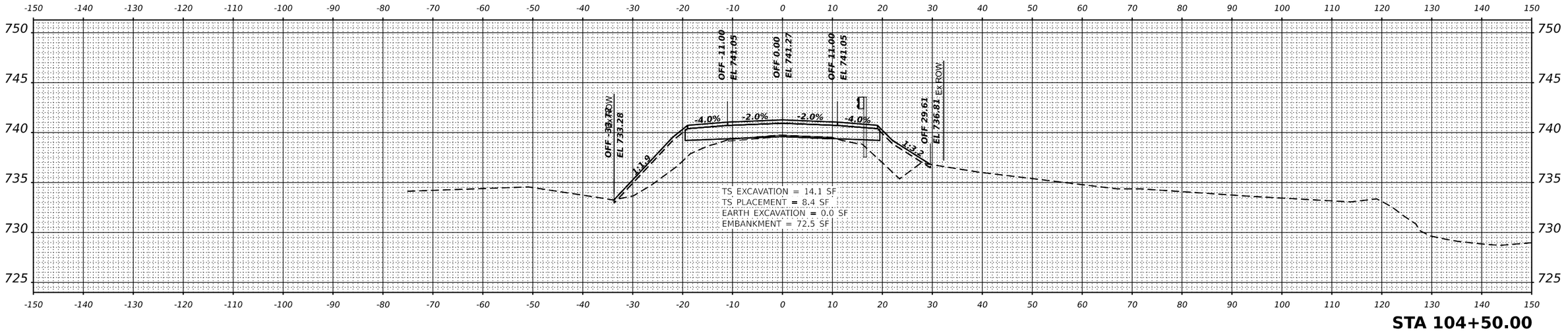
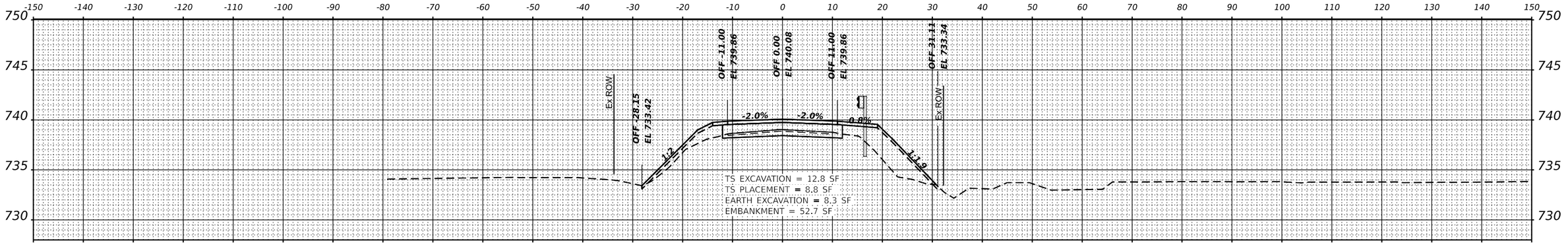
ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	STATE OF ILLINOIS DEPARTMENT OF TRANSPORTATION	CROSS SECTIONS PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK	
	DRAWN - T. STENSLIK	REVISED -			
PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -			
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -		SCALE: 1H : 2V; SHEET 1 OF 7 SHEETS; STA. 102+00 TO STA. 103+00	

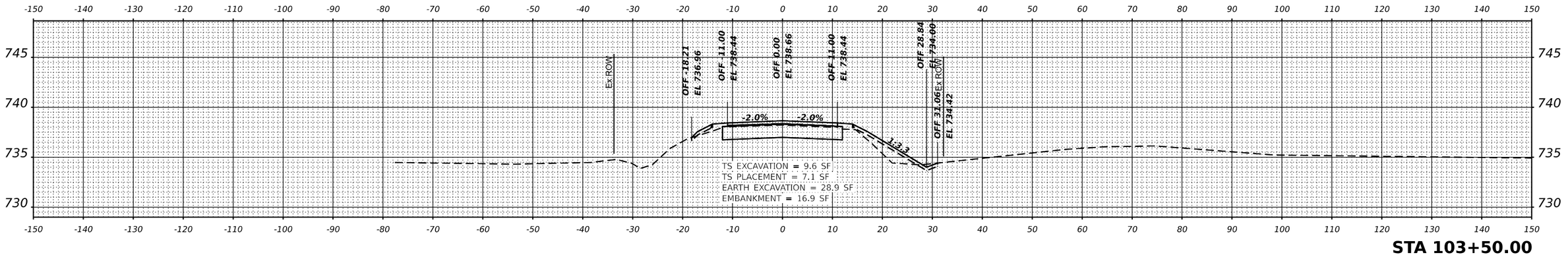
T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	42
CONTRACT NO. 87818				
	ILLINOIS	FED. AID PROJECT		



STA 104+50.00



STA 104+00.00



STA 103+50.00

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	BY	DATE
SURVEYED		
PLOTTED		
TEMPLATE		
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ENGINEERING RESOURCE ASSOCIATES

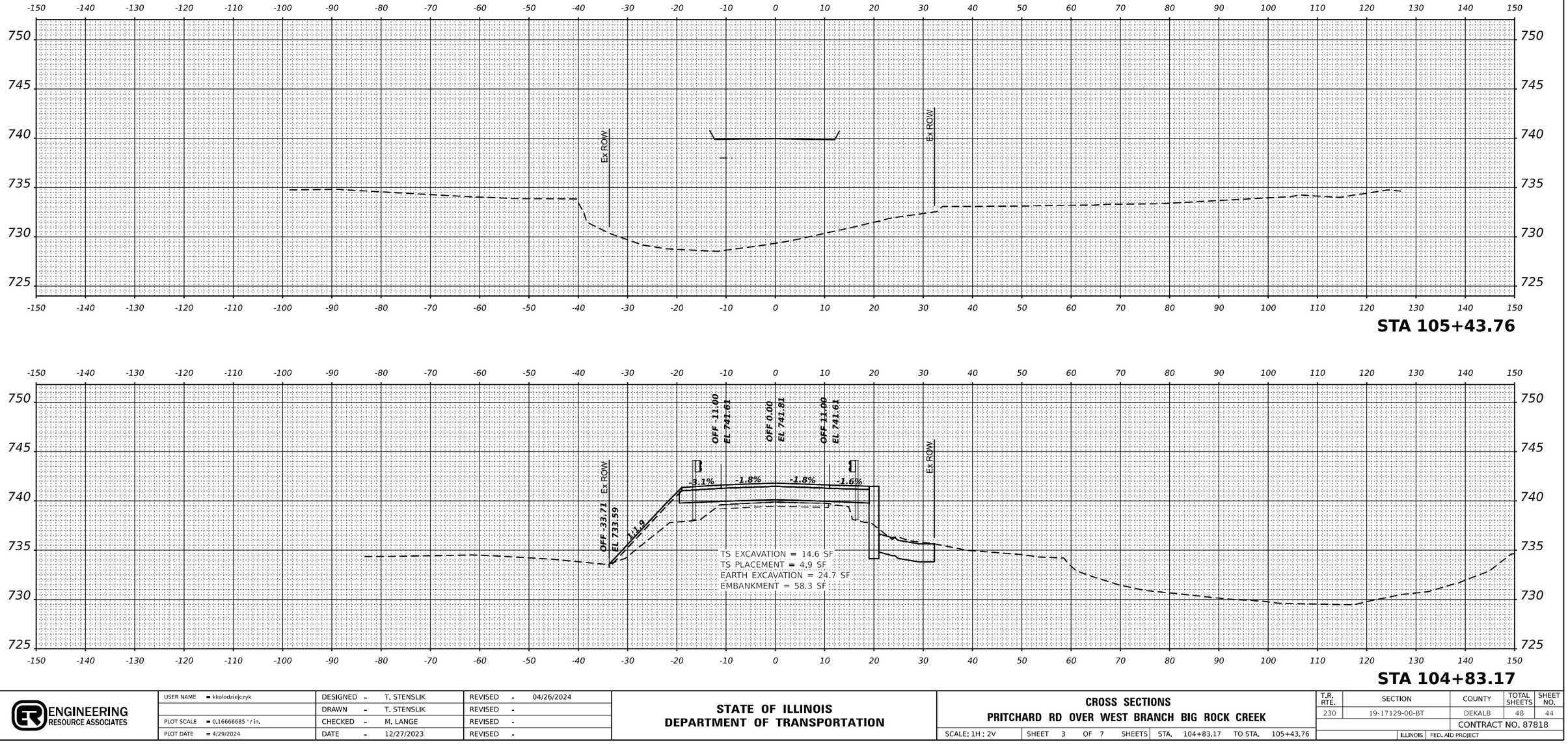
USER NAME = kkolodziejczyk		DESIGNED - T. STENSLIK		REVISED - 04/26/2024	
		DRAWN - T. STENSLIK		REVISED -	
PLOT SCALE = 0.16666685 ' / in.		CHECKED - M. LANGE		REVISED -	
PLOT DATE = 4/29/2024		DATE - 12/27/2023		REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1H : 2V | SHEET 2 OF 7 SHEETS | STA. 103+50 | TO STA. 104+50

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	43
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	



STA 105+43.76

STA 104+83.17

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	
	DRAWN - T. STENSLIK	REVISED -	
PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1H : 2V | SHEET 3 OF 7 SHEETS | STA. 104+83.17 TO STA. 105+43.76

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	44
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	

ORIGINAL SURVEY
FINAL SURVEY
NOTE BOOK
NO.
SURVEYED
PLOTTED
TEMPLATE
AREAS
AREAS CHECKED
BY
DATE

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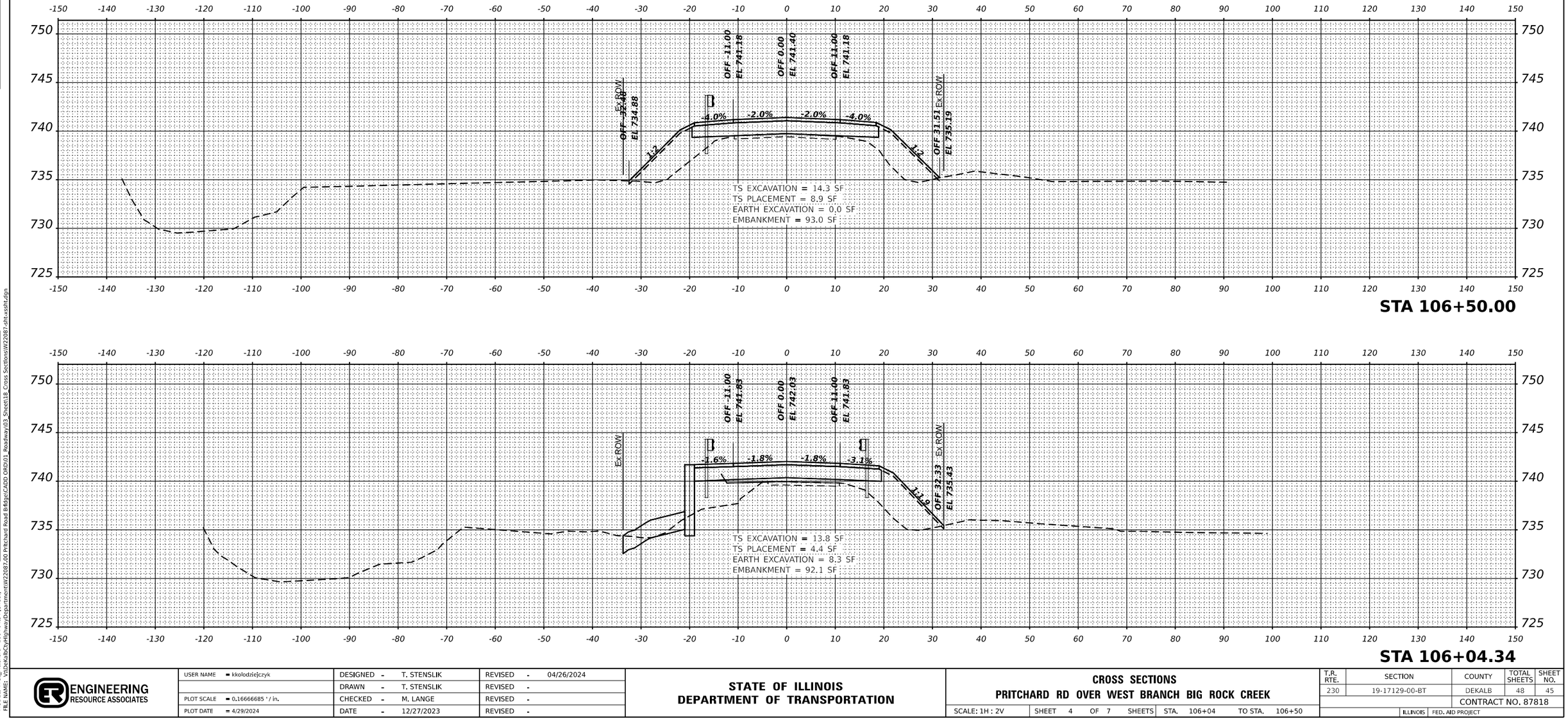

FINAL SURVEY

NO.	BY	DATE
NOTE BOOK		
SURVEYED		
PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		

ORIGINAL SURVEY

NO.	BY	DATE
NOTE BOOK		
SURVEYED		
PLOTTED		
TEMPLATE		
AREAS		
AREAS CHECKED		

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ENGINEERING RESOURCE ASSOCIATES

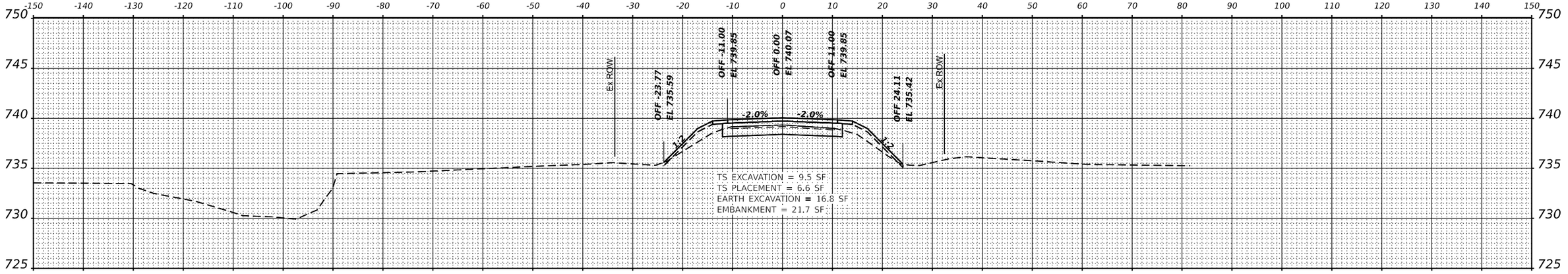
USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024
	DRAWN - T. STENSLIK	REVISED -
PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

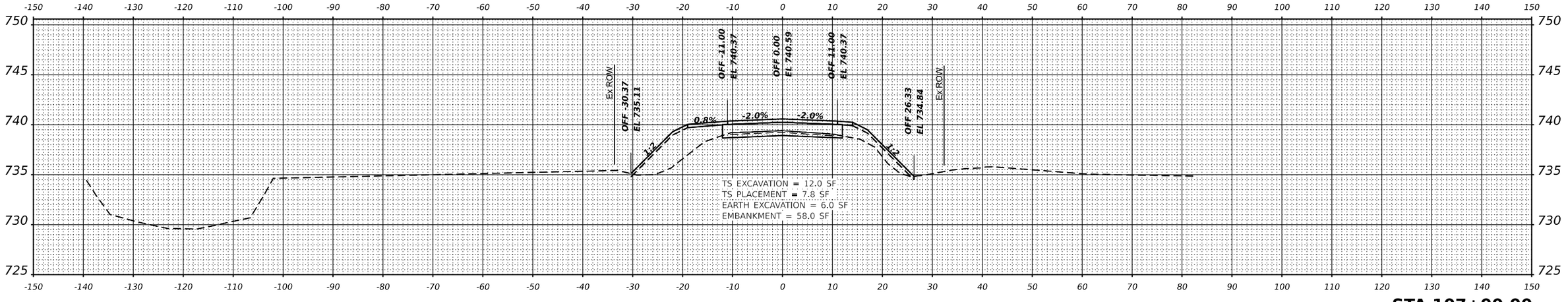
CROSS SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1H : 2V | SHEET 4 OF 7 SHEETS | STA. 106+04 | TO STA. 106+50

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	45
		CONTRACT NO. 87818		
		ILLINOIS	FED. AID PROJECT	



STA 107+50.00



STA 107+00.00

FINAL SURVEY	NOTE BOOK	NO.
ORIGINAL SURVEY	NOTE BOOK	NO.

	BY	DATE
SURVEYED		
PLOTTED		
TEMPLATE		
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AREAS CHECKED		

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ENGINEERING RESOURCE ASSOCIATES

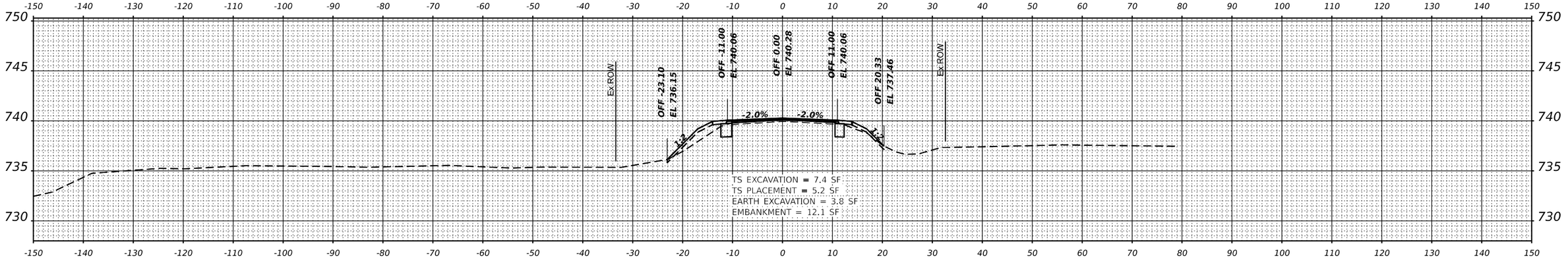
USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024
	DRAWN - T. STENSLIK	REVISED -
PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

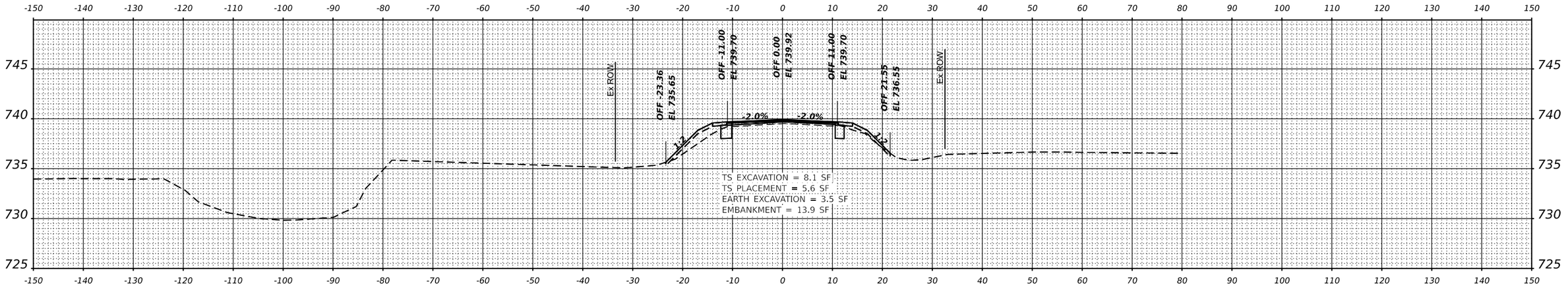
CROSS SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1H : 2V | SHEET 5 OF 7 SHEETS | STA. 107+00 | TO STA. 107+50

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	46
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		



STA 109+00.00



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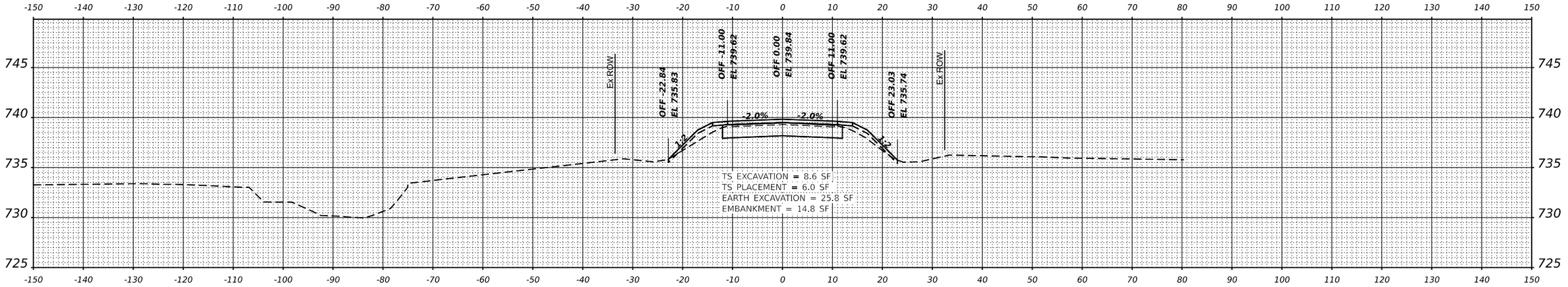

STA 108+00.00

FINAL SURVEY					
NOTE BOOK	SURVEYED				
NO.	PLOTTED				
	TEMPLATE				
	AREAS				
	AREAS CHECKED				

ORIGINAL SURVEY					
NOTE BOOK	SURVEYED				
NO.	PLOTTED				
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	AREAS				
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ENGINEERING RESOURCE ASSOCIATES

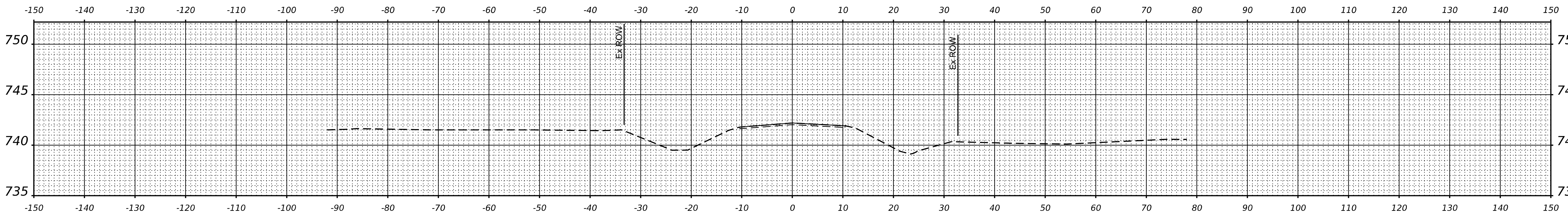
USER NAME = kkolodziejczyk		DESIGNED - T. STENSLIK		REVISED - 04/26/2024	
		DRAWN - T. STENSLIK		REVISED -	
PLOT SCALE = 0.16666685 ' / in.		CHECKED - M. LANGE		REVISED -	
PLOT DATE = 4/29/2024		DATE - 12/27/2023		REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

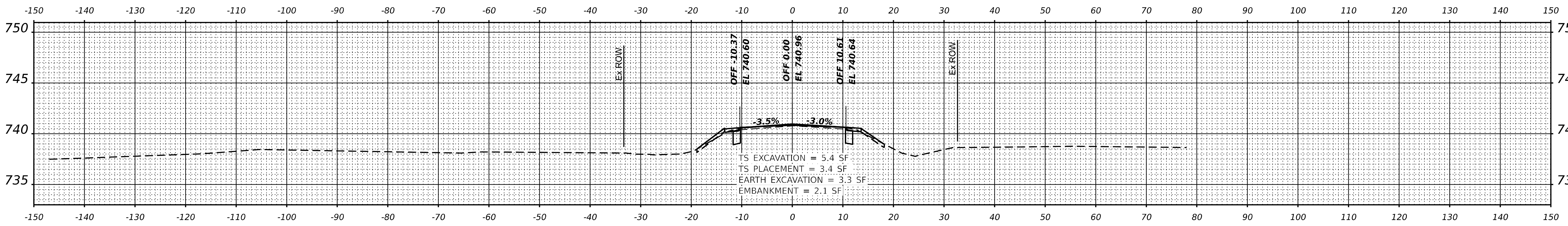
CROSS SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1H : 2V | SHEET 6 OF 7 SHEETS | STA. 108+00 | TO STA. 109+00

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	47
		CONTRACT NO. 87818		
	ILLINOIS	FED. AID PROJECT		



STA 110+00.00



STA 109+50.00

FINAL SURVEY — NOTE BOOK NO. — SURVEYED / PLOTTED / TEMPLATE / AREAS / AREAS CHECKED — BY — DATE

ORIGINAL SURVEY — NOTE BOOK NO. — SURVEYED / PLOTTED / TEMPLATE / AREAS / AREAS CHECKED — BY — DATE

FILE NAME: V:\DeKalbCtyHighwayDepartment\W22087.00 Pritchard Road Bridge\CADD ORD\01_Roadway\03_Sheet\18_Cross Sections\W22087-sht-xssht.dgn
MODEL: PCL_Pritchard - 109+50.00 [Sheet]

ENGINEERING RESOURCE ASSOCIATES

USER NAME = kkolodziejczyk	DESIGNED - T. STENSLIK	REVISED - 04/26/2024	
	DRAWN - T. STENSLIK	REVISED -	
PLOT SCALE = 0.16666685 ' / in.	CHECKED - M. LANGE	REVISED -	
PLOT DATE = 4/29/2024	DATE - 12/27/2023	REVISED -	

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

CROSS SECTIONS
PRITCHARD RD OVER WEST BRANCH BIG ROCK CREEK

SCALE: 1H : 2V | SHEET 7 OF 7 SHEETS | STA. 109+50 TO STA. 110+00

T.R. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
230	19-17129-00-BT	DEKALB	48	48

CONTRACT NO. 87818

ILLINOIS | FED. AID PROJECT