

STATE OF OHIO

DEPARTMENT OF TRANSPORTATION

D08 BRIDGE MAINTENANCE FY2014

VILLAGE OF JAMESTOWN, OHIO

CITIES OF NORWOOD, OHIO & LEBANON, OHIO

CLERMONT, GREENE, HAMILTON,

PREBLE & WARREN COUNTIES

PROJECT DESCRIPTION

GENERAL BRIDGE MAINTENANCE PROJECT INCLUDING STRUCTURAL STEEL REPAIR, PAINTING, SEALING, EXPANSION JOINT REPLACEMENT, BEARING REHABILITATION AND OTHER MINOR MAINTENANCE WORK ON SEVERAL BRIDGES IN THE DISTRICT.

PROJECT EARTH DISTURBED AREA: 0 ACRES
ESTIMATED CONTRACTOR EARTH DISTURBED AREA: N/A ACRES
NOTICE OF INTENT EARTH DISTURBED AREA: N/A ACRES (MAINTENANCE PROJECT)

LIMITED ACCESS

THIS IMPROVEMENT IS ESPECIALLY DESIGNED FOR THROUGH TRAFFIC AND HAS BEEN DECLARED A LIMITED ACCESS HIGHWAY OR FREEWAY BY ACTION OF THE DIRECTOR IN ACCORDANCE WITH THE PROVISIONS OF SECTION 5511.02 OF THE OHIO REVISED CODE.

2013 SPECIFICATIONS

THE STANDARD SPECIFICATIONS OF THE STATE OF OHIO, DEPARTMENT OF TRANSPORTATION, INCLUDING CHANGES AND SUPPLEMENTAL SPECIFICATIONS LISTED IN THE PROPOSAL SHALL GOVERN THIS IMPROVEMENT.

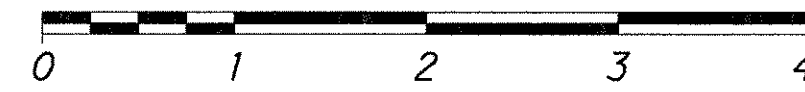
I HEREBY APPROVE THESE PLANS AND DECLARE THAT THE MAKING OF THIS IMPROVEMENT WILL NOT REQUIRE THE CLOSING OF THE HIGHWAY TO TRAFFIC AND THAT PROVISIONS FOR THE MAINTENANCE AND SAFETY OF TRAFFIC WILL BE AS SET FORTH IN THE PLANS AND ESTIMATES.

LOCATION MAP
SEE PAGE 2

LOCATION MAP

LATITUDE: 39°26'40" LONGITUDE: 84°16'43"

SCALE IN MILES



- PORTION TO BE IMPROVED
- INTERSTATE HIGHWAY
- FEDERAL ROUTES
- STATE ROUTES
- COUNTY & TOWNSHIP ROADS
- OTHER ROADS

DESIGN DESIGNATION (SEE SHEET 2 OF 60)

DESIGN EXCEPTIONS

NONE

INDEX OF SHEETS:

TITLE SHEET	1
LOCATION MAP	2
GENERAL NOTES	3 - 4
MAINTENANCE OF TRAFFIC	5, 6, 6A, 7, 8, 8A, 9, 10, 10A, 11, 11A, 12, 13, 13A, 14, 15
GENERAL SUMMARY	16, 16A
SUBSUMMARY & PAVEMENT CALCULATIONS	17 - 18
STRUCTURE GENERAL NOTES	19 - 21
STRUCTURE QUANTITIES	22 - 24
STRUCTURES OVER 20' SPAN	
CLE-125-1347	25 - 35
CLE-32-1425L/R	36
CLE-32-1314L	37
CLE-32-1214	38, 38A, 39 - 41
CLE-132-2473	42
GRE-35-2297	43
HAM-562-0227	44
PRE-127-1718	45
PRE-177-0486	46
CLE-743-0466	47
WAR-123-0598	48 - 59
WAR-123-1740	60

UNDERGROUND UTILITIES
CONTACT BOTH SERVICES
CALL TWO WORKING DAYS
BEFORE YOU DIG

CALL
1-800-362-2764
(TOLL FREE)

OHIO UTILITIES PROTECTION SERVICE
NON-MEMBERS
MUST BE CALLED DIRECTLY

OIL & GAS PRODUCERS UNDERGROUND
PROTECTION SERVICE CALL: 1-800-925-0988

ENGINEERS SEAL:

SIGNED: *Christopher A. Howard*
DATE: 1-22-14

STANDARD CONSTRUCTION DRAWINGS								SUPPLEMENTAL SPECIFICATIONS		SPECIAL PROVISIONS	
BP-2.4	7/19/13	DBR-2-73	7/19/02	MGS-1.1	7/19/13	MT-95.30	7/19/13	800	1-17-14		
BP-3.1	4/20/12	DBR-3-11	7/15/11	MGS-2.1	7/19/13	MT-95.31	7/19/13	821	4-20-12		
BP-9.1	7/19/13	GSD-1-96	7/19/02	MGS-3.1	7/19/13	MT-95.32	7/19/13	832	1-17-14		
		PCB-91	1/18/13	MGS-3.2	1/18/13	MT-95.41	7/19/13	842	7-15-11		
DM-4.1	7/19/13	RB-1-55	7/19/13	MGS-4.3	1/18/13	MT-96.11	1/17/14	846	10-18-13		
DM-4.2	7/20/12					MT-96.20	7/19/13	921	4-20-12		
DM-4.3	7/19/13	TC-41.20	10/18/13			MT-97.10	7/19/13	987	1-16-09		
DM-4.4	7/20/12	TC-42.20	10/18/13			MT-98.11	7/19/13				
		TC-61.10	1/17/14			MT-98.20	7/19/13				
		TC-61.30	1/17/14			MT-101.70	1/17/14				
RM-4.2	10/15/10	TC-65.10	1/17/14			MT-101.90	7/19/13				
		TC-65.11	1/17/14			MT-102.20	7/19/13				
A-1-69	7/19/02	TC-71.10	1/17/14			MT-102.30	7/19/13				
BR-1	7/19/02	TC-72.20	7/20/12			MT-105.10	7/19/13				
EXJ-4-87	7/19/02					MT-99.30	7/19/13				
AS-1-81	1/18/13										

APPROVED: *Steve May*
DATE: 1/23/14 DISTRICT DEPUTY DIRECTOR

APPROVED: _____
DATE: _____ DIRECTOR, DEPARTMENT OF TRANSPORTATION

FEDERAL PROJECT NO. E110(812)

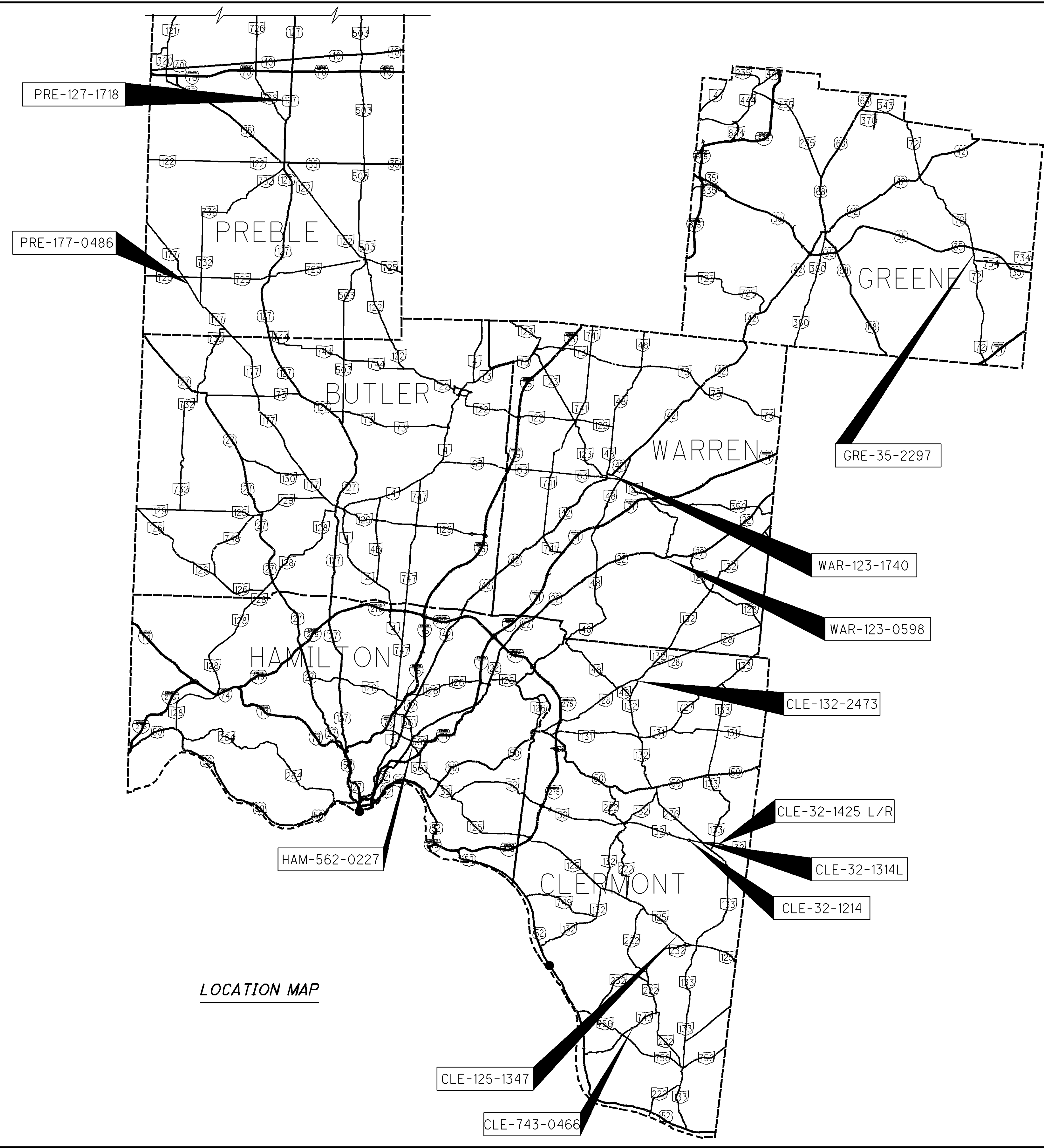
PID NO. 84530

CONSTRUCTION PROJECT NO.

RAILROAD INVOLVEMENT N/A

D08 - BM - FY2014

1/60



LOCATION MAP

DESIGN DESIGNATION

CURRENT ADT (2015)
 DESIGN YEAR ADT (2027)
 DESIGN HOURLY VOLUME (2027)
 DIRECTIONAL DISTRIBUTION
 TRUCKS (24 HOUR B&C)
 DESIGN SPEED
 LEGAL SPEED
 DESIGN FUNCTIONAL CLASSIFICATION:
 NHS PROJECT

CLE-125-13.47

ADT: 13,000
 ADT: 13,000
 DHV: 1,300
 0.53
 3%
 60 MPH
 55 MPH
 RURAL PRINCIPAL ARTERIAL
 YES

CLE-32-12.14

ADT: 24,000
 ADT: 27,000
 DHV: 2,700
 0.53
 11%
 65 MPH
 60 MPH
 URBAN PRINCIPAL ARTERIAL
 YES

DESIGN DESIGNATION

CURRENT ADT (2015)
 DESIGN YEAR ADT (2027)
 DESIGN HOURLY VOLUME (2027)
 DIRECTIONAL DISTRIBUTION
 TRUCKS (24 HOUR B&C)
 DESIGN SPEED
 LEGAL SPEED
 DESIGN FUNCTIONAL CLASSIFICATION:
 NHS PROJECT

CLE-32-13.14L

ADT: 24,000
 ADT: 27,000
 DHV: 2,700
 0.53
 11%
 65 MPH
 60 MPH
 RURAL PRINCIPAL ARTERIAL
 YES

CLE-32-14.25 L/R

ADT: 21,000
 ADT: 23,000
 DHV: 2,800
 0.53
 12%
 65 MPH
 60 MPH
 RURAL PRINCIPAL ARTERIAL
 YES

DESIGN DESIGNATION

CURRENT ADT (2015)
 DESIGN YEAR ADT (2027)
 DESIGN HOURLY VOLUME (2027)
 DIRECTIONAL DISTRIBUTION
 TRUCKS (24 HOUR B&C)
 DESIGN SPEED
 LEGAL SPEED
 DESIGN FUNCTIONAL CLASSIFICATION:
 NHS PROJECT

CLE-132-24.73

ADT: 3,100
 ADT: 3,600
 DHV: 470
 0.53
 2%
 45 MPH
 40 MPH
 URBAN MINOR ARTERIAL
 NO

CLE-743-4.66

ADT: 590
 ADT: 780
 DHV: 80
 0.53
 6%
 60 MPH
 55 MPH
 RURAL MINOR COLLECTOR
 NO

DESIGN DESIGNATION

CURRENT ADT (2015)
 DESIGN YEAR ADT (2027)
 DESIGN HOURLY VOLUME (2027)
 DIRECTIONAL DISTRIBUTION
 TRUCKS (24 HOUR B&C)
 DESIGN SPEED
 LEGAL SPEED
 DESIGN FUNCTIONAL CLASSIFICATION:
 NHS PROJECT

GRE-35-22.97

ADT: 10,000
 ADT: 13,000
 DHV: 1,200
 0.53
 33%
 70 MPH
 65 MPH
 RURAL PRINCIPAL ARTERIAL
 YES

HAM-562-2.27 (OVERPASS)

2015 ADT: 2,000 (APPROX.)
 2027 ADT: 2,500 (APPROX.)
 2027 DHV: 250 (APPROX.)
 0.53
 6% (APPROX.)
 30 MPH
 25 MPH
 URBAN PRINCIPAL COLLECTOR
 YES

DESIGN DESIGNATION

CURRENT ADT (2015)
 DESIGN YEAR ADT (2027)
 DESIGN HOURLY VOLUME (2027)
 DIRECTIONAL DISTRIBUTION
 TRUCKS (24 HOUR B&C)
 DESIGN SPEED
 LEGAL SPEED
 DESIGN FUNCTIONAL CLASSIFICATION:
 NHS PROJECT

PRE-127-17.18

ADT: 6,600
 ADT: 6,800
 DHV: 820
 0.53
 11%
 60 MPH
 55 MPH
 RURAL MINOR ARTERIAL
 NO

PRE-177-4.86

ADT: 1,500
 ADT: 1,600
 DHV: 190
 0.53
 9%
 60 MPH
 55 MPH
 RURAL MAJOR COLLECTOR
 NO

DESIGN DESIGNATION

CURRENT ADT (2015)
 DESIGN YEAR ADT (2027)
 DESIGN HOURLY VOLUME (2027)
 DIRECTIONAL DISTRIBUTION
 TRUCKS (24 HOUR B&C)
 DESIGN SPEED
 LEGAL SPEED
 DESIGN FUNCTIONAL CLASSIFICATION:
 NHS PROJECT

WAR-123-5.98

ADT: 1,100
 ADT: 1,500
 DHV: 150
 0.53
 7%
 60 MPH
 55 MPH
 RURAL MAJOR COLLECTOR
 NO

WAR-123-17.40

ADT: 18,000
 ADT: 23,000
 DHV: 2,100
 0.53
 5%
 60 MPH
 55 MPH
 URBAN MINOR ARTERIAL
 NO



CONSTRUCTION NOTIFICATION

THE CONTRACTOR WILL ADVISE THE PROJECT ENGINEER A MINIMUM OF FOURTEEN (14) DAYS PRIOR TO THE FOLLOWING: THE START OF CONSTRUCTION ACTIVITIES, LANE RESTRICTIONS, LANE CLOSURES, AND OR ROAD CLOSURES. THE PROJECT ENGINEER WILL FORWARD THIS INFORMATION TO THE FOLLOWING:

DISTRICT PUBLIC INFORMATION OFFICER (PIO) BY FAX AT (513) 933-9472 OR EMAIL AT SHARON.SMIGIELSKI@DOT.STATE.OH.US

DISTRICT PERMIT SECTION BY FAX AT (513) 933-9472 OR EMAIL AT TOM.MAKRIS@DOT.STATE.OH.US

CENTRAL OFFICE SPECIAL HAUL PERMITS SECTION BY FAX AT (614) 728-4099 OR EMAIL AT HAULING.PERMITS@DOT.STATE.OH.US

THE PIO WILL, IN TURN, NOTIFY THE PUBLIC, THE LOCAL EMERGENCY SERVICES, AFFECTED SCHOOLS AND BUSINESSES, AND ANY OTHER IMPACTED LOCAL PUBLIC AGENCY OF ANY OF THE ABOVE MENTIONED ITEMS, VIA MEDIA SOURCES.

REFERENCES:

REFERENCE SHALL BE MADE TO THE ODOT CONSTRUCTION AND MATERIAL SPECIFICATIONS DATED JANUARY 1, 2013.

EXISTING PLANS

EXISTING PLANS MAY BE INSPECTED IN THE ODOT DISTRICT 8 OFFICE IN LEBANON, OHIO.

PROTECTION OF RIGHT-OF-WAY LANDSCAPING

PRIOR TO BEGINNING WORK, THE CONTRACTOR, THE PROJECT ENGINEER, AND A REPRESENTATIVE OF THE MAINTAINING AGENCY WILL REVIEW AND RECORD ALL LANDSCAPING ITEMS WITHIN THE RIGHT OF WAY (BOTH WITHIN AND OUTSIDE THE CONSTRUCTION LIMITS) A RECORD OF THIS REVIEW WILL BE KEPT IN THE PROJECT ENGINEER'S FILES. PRIOR TO FINAL ACCEPTANCE, A FINAL REVIEW OF LANDSCAPING ITEMS WILL BE MADE.

CONSTRUCT ALL ACTIVITIES, EQUIPMENT STORAGE, AND STAGING TO WITHIN THE CONSTRUCTION LIMITS. UNLESS OTHERWISE IDENTIFIED IN THE PLANS OR PROPOSAL, THE CONSTRUCTION LIMITS ARE IDENTIFIED AS 30 FEET FROM THE EDGE OF PAVEMENT.

SUBMIT A WRITTEN REQUEST TO THE PROJECT ENGINEER TO USE ANY AREA OUTSIDE THESE LIMITS. THE DOCUMENT SUBMITTED MUST CLEARLY IDENTIFY THE AREA AND EXPLAIN THE PROPOSED USE AND RESTORATION OF THE AREA. EXCEPT AS INDICATED ON SHEET --- USE OF THESE AREAS FOR DISPOSAL OF WASTE MATERIAL AND CONSTRUCTION DEBRIS, EXCAVATION OF BORROW MATERIAL AND PLACEMENT OF PORTABLE PLANTS IS PROHIBITED. THE REQUEST MUST BE APPROVED, IN WRITING, BEFORE THE CONTRACTOR HAS PERMISSION TO USE THE AREA.

ANY ITEMS DAMAGED BEYOND THE CONSTRUCTION LIMITS AS DEFINED ABOVE WILL BE REPLACED IN KIND OR AS APPROVED BY THE PROJECT ENGINEER.

PAVEMENT PLANING AND RESURFACING AT BRIDGES

THE CONTRACTOR SHALL PLANE THE ASPHALT CONCRETE SURFACE COURSE TO THE DEPTH AND AT THE LOCATIONS SHOWN IN THE PLANS. THE CONTRACTOR SHALL RESURFACE THOSE SAME AREAS WITH ITEM 448 - ASPHALT CONCRETE SURFACE COURSE, TYPE 1, PG64-28. THE CONTACTOR SHALL PROVIDE A BUTT JOINT WHERE THE NEW ASPHALT MEETS EXISTING PER STD. DWG. BP-3.1.

ITEM 201 - CLEARING AND GRUBBING, AS PER PLAN

ALTHOUGH THERE ARE NO TREES OR STUMPS SPECIFICALLY MARKED FOR REMOVAL WITHIN THE LIMITS OF THE PROJECT, A LUMP SUM QUANTITY IS INCLUDED IN THE GENERAL SUMMARY FOR ITEM 201, CLEARING AND GRUBBING, AS PER PLAN.

REMOVE ANY TREES, BRUSH, OR STUMPS NOT SPECIFICALLY MARKED FOR REMOVAL IF LOCATED UNDER OR WITHIN TEN FEET OF THE BRIDGE STRUCTURES. THE REMOVAL OF DEBRIS FROM AROUND THE PIERS AND ABUTMENTS AS DIRECTED BY THE ENGINEER SHALL ALSO BE INCLUDED WITH THIS ITEM FOR PAYMENT.

ALL PROVISIONS SET FORTH IN THE SPECIFICATIONS UNDER THIS ITEM SHALL BE INCLUDED IN THE LUMP SUM PRICE BID FOR ITEM 201, CLEARING AND GRUBBING, AS PER PLAN.

ITEM 626 - BARRIER REFLECTOR

AN ESTIMATED QUANTITY OF 15 EACH HAS BEEN PROVIDED FOR THE PLACEMENT OF BARRIER REFLECTORS. THE CONTRACTOR SHALL PLACE A BARRIER REFLECTORS ALONG THE NEWLY CONSTRUCTED GUARDRAIL BRIDGE TERMINAL ASSEMBLIES AND/OR ANCHOR ASSEMBLIES (1 PER LOCATION). THIS QUANTITY HAS BEEN CARRIED TO THE GENERAL SUMMARY.

CONSTRUCTION IN WATERWAYS

THE CONTRACTOR SHALL NOT BE PERMITTED TO ENTER ANY WATERWAY TO PERFORM ANY OF THE PROPOSED WORK.

NON-USE OF ASBESTOS-CONTAINING MATERIALS

THE CONTRACTOR SHALL AT NO TIME INCORPORATE ANY MATERIALS WHICH ARE COMPOSED OF OR CONTAIN ANY AMOUNT OF ASBESTOS. THE SUBSTITUTION OF MATERIALS WHICH CONTAIN ANY AMOUNTS OF ASBESTOS WILL IN NO CIRCUMSTANCES BE ACCEPTABLE. UPON COMPLETION OF THE PROJECT, THE CONTRACTOR SHALL SUBMIT A WRITTEN STATEMENT OF CERTIFICATION ASSERTING THAT NO ASBESTOS CONTAINING MATERIALS WERE USED IN ANY PORTION OF THE CONSTRUCTION.

DEMOLITION DEBRIS

THE CONTRACTOR SHALL TAKE PRECAUTIONS TO AVOID AND/OR LIMIT DEMOLITION DEBRIS FROM ENTERING THE STREAM. ANY MATERIAL THAT DOES FALL INTO THE STREAM SHALL BE IMMEDIATELY REMOVED AT THE CONTRACTOR'S EXPENSE.

WHILE PAINTING OR SEALING ANY PORTION OF THE BRIDGE STRUCTURES, AN APPROPRIATE APRON WILL BE UTILIZED TO PREVENT DEBRIS, PAINT OVER SPRAY, AND SEALANTS FROM ENTERING INTO THE STREAMS OR AFFECTING VEHICULAR/PEDESTRIAN TRAFFIC.

WORK LIMITS

THE WORK LIMITS SHOWN ON THESE PLANS ARE FOR PHYSICAL CONSTRUCTION ONLY. PROVIDE THE INSTALLATION AND OPERATION OF ALL WORK ZONE TRAFFIC CONTROL AND WORK ZONE TRAFFIC CONTROL DEVICES REQUIRED BY THESE PLANS WHETHER INSIDE OR OUTSIDE THESE WORK LIMITS.

CONSTRUCTION SITE ACCESS

THE CONTRACTOR'S WORK MUST STAY WITHIN THE EXISTING R/W AND CHANNEL EASEMENTS AS SHOWN IN THE PLANS. NO ADDITIONAL EASEMENTS OR R/W HAVE BEEN OBTAINED FOR THIS WORK. ACCESS TO THE SITE(S) MAY REQUIRE LOWERING OF EQUIPMENT BY CRANE INTO THE STREAMBED, DUMPING MATERIAL OVER THE SIDE OF THE STRUCTURE, USE OF SPECIALIZED EQUIPMENT, ETC.

CONSTRUCTION NOISE

ACTIVITIES AND LAND USE ADJACENT TO THIS PROJECT MAY BE AFFECTED BY CONSTRUCTION NOISE. IN ORDER TO MINIMIZE ANY ADVERSE CONSTRUCTION NOISE IMPACTS, DO NOT PERFORM ANY OF THE FOLLOWING ACTIVITIES BETWEEN THE HOURS OF 8:00 PM AND 7:00 AM IF WITHIN 300 FEET OF RESIDENTIAL ZONING DISTRICTS:

- LOADING/UNLOADING OF MATERIALS
- CONSTRUCTION ACTIVITY
- OPERATION OF VEHICLES WEIGHING MORE THAN 10,000 POUNDS AND AUXILIARY EQUIPMENT ATTACHED TO THOSE VEHICLES
- VEHICLE, MACHINERY OR OTHER SIMILAR EQUIPMENT REPAIR OUTSIDE A COMPLETELY ENCLOSED STRUCTURE
- OPERATE POWER-OPERATED CONSTRUCTION-TYPE DEVICES

IN ADDITION, DO NOT OPERATE AT ANY TIME ANY DEVICE IN SUCH A MANNER THAT THE NOISE CREATED SUBSTANTIALLY EXCEEDS THE NOISE CUSTOMARILY AND NECESSARILY ATTENDANT TO THE REASONABLE AND EFFICIENT PERFORMANCE OF SUCH EQUIPMENT.

PERMANENT PAVEMENT MARKINGS AND RAISED PAVEMENT MARKERS

ALL EXISTING PAVEMENT MARKINGS AND RAISED PAVEMENT MARKERS ON THE BRIDGE SUPERSTRUCTURES AND APPROACH PAVEMENTS SHALL BE REPLACED AS SHOWN IN THE PLANS. PROPOSED EDGE LINE, CENTER LINE AND LANE LINE PAVEMENT MARKINGS SHALL BE ITEM 642, PAINT.

THE CONTRACTOR SHALL REFERENCE ALL EXISTING PAVEMENT MARKINGS AND RAISED PAVEMENT MARKERS BEFORE THE START OF ANY PAVEMENT REMOVAL. THIS WILL BE NECESSARY TO ASSURE CORRECT REPLACEMENT IN THEIR ORIGINAL AND/OR RECONFIGURED LOCATIONS. PAYMENT FOR THIS WORK SHALL BE INCIDENTAL TO THE RESPECTIVE PROPOSED PAVEMENT MARKING AND RPM PAY ITEMS.

CONNECTION BETWEEN EXISTING AND PROPOSED GUARDRAIL

WHEN IT IS NECESSARY TO SPLICE PROPOSED GUARDRAIL TO EXISTING GUARDRAIL, ONLY THE EXISTING GUARDRAIL SHALL BE CUT, DRILLED, OR PUNCHED. THE CONNECTION SHALL BE MADE USING A "W-BEAM RAIL SPLICE" AS SHOWN IN AASHTO M 180. PAYMENT SHALL BE INCLUDED IN THE CONTRACT PRICE FOR THE RESPECTIVE GUARDRAIL ITEMS.

UPGRADE OF GUARDRAIL END TERMINALS

THE EXISTING TYPE 'A' ANCHOR ASSEMBLIES SHALL BE REPLACED WITH TYPE E ANCHOR ASSEMBLIES AT THE LOCATIONS SHOWN IN THE PLANS. A PORTION OF THE EXISTING ADJACENT GUARDRAIL SHALL ALSO BE REMOVED TO ACCOMMODATE THE TYPE E ANCHOR ASSEMBLY. POST #1 OF THE TYPE E ANCHOR (i.e., THE FIRST POST AFTER THE IMPACT HEAD) SHALL BE LOCATED AT THE SAME LOCATION AS THE CONCRETE ANCHOR OF THE OLD TYPE 'A' ANCHOR ASSEMBLY. REFER TO STANDARD DRAWING MGS-4.1 AND THE TYPE E ANCHOR APPROVED SHOP DRAWINGS FOR ADDITIONAL INFORMATION.

GUARDRAIL, MISC.: RE-ATTACH GUARDRAIL POST

THIS ITEM SHALL CONSIST OF RE-ATTACHING THE EXISTING METAL GUARDRAIL POST TO THE EXISTING GUARDRAIL W-BEAM.

THE CONTRACTOR SHALL PROVIDE ALL MATERIALS, LABOR, EQUIPMENT AND ANY MISCELLANEOUS APPURTENANCES (i.e., DRILLING OF BOLT HOLES, ETC.) REQUIRED TO COMPLETE THIS WORK AT THE LOCATIONS SHOWN IN THE PLANS.

ANCHOR ASSEMBLY REMOVED, TYPE A, AS PER PLAN

IN ADDITION TO REMOVAL AND DISPOSAL OF THE EXISTING TYPE 'A' ANCHOR ASSEMBLY, THIS ITEM SHALL ALSO INCLUDE REMOVAL OF THE EXISTING BURIED CONCRETE ANCHOR BLOCKS AND CONCRETE ENCASEMENTS FOR THE ANCHOR ASSEMBLY POSTS, BACK FILLING OF VOIDS LEFT BY REMOVAL OF THE EXISTING CONCRETE POST ENCASEMENTS AND/OR CONCRETE ANCHOR BLOCKS WITH CMS 203 EMBANKMENT, RE-GRADING OF THE BERM OR SLOPE AND ANY SEEDING REQUIRED AS A RESULT OF THE ANCHOR ASSEMBLY REMOVAL.

ITEM 606 - ANCHOR ASSEMBLY, TYPE E

THIS ITEM SHALL CONSIST OF FURNISHING AND INSTALLING ANY OF THE GUARDRAIL END TERMINALS AS LISTED ON ROADWAY ENGINEERING'S WEB PAGE UNDER ROADSIDE SAFETY DEVICES FOR APPROVED GUARDRAIL END TREATMENTS. INSTALLATION SHALL BE AT THE LOCATIONS SPECIFIED IN THE PLANS, IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFICATIONS.

THE FACE OF THE TYPE E IMPACT HEAD SHALL BE COVERED WITH A SHEET OF TYPE G REFLECTIVE SHEETING, PER CMS 730.19.

REFER TO THE MANUFACTURER'S INSTRUCTIONS REGARDING THE INSTALLATION OF, AND THE GRADING AROUND THE FOUNDATION TUBES AND GROUND STRUT. THE TOP OF ANY FOUNDATION TUBE SHOULD BE LESS THAN 4 INCHES ABOVE THE GROUND. THE PLACEMENT OF THE FOUNDATION TUBES SHOULD BE AN APPROPRIATE DEPTH BELOW THE LEVEL LINE IN ORDER TO MAINTAIN THE FINISHED GUARDRAIL HEIGHT OF 27.75 INCHES FROM THE EDGE OF THE SHOULDER.

ON-SITE GRADING IS REQUIRED IF THE TOP OF THE FOUNDATION TUBES OR TOP OF THE GROUND STRUT DOES PROJECT MORE THAN 4 INCHES ABOVE THE GROUND LINE.

PAYMENT FOR THE ABOVE WORK SHALL BE MADE AT THE UNIT PRICE BID FOR ITEM 606, ANCHOR ASSEMBLY, TYPE E, EACH, AND SHALL INCLUDE ALL LABOR, TOOLS, EQUIPMENT AND MATERIALS NECESSARY TO CONSTRUCT A COMPLETE AND FUNCTIONAL ANCHOR ASSEMBLY SYSTEM, INCLUDING ALL RELATED TRANSITIONS, REFLECTIVE SHEETING, HARDWARE, GRADING, EMBANKMENT AND EXCAVATION NOT SEPARATELY SPECIFIED, AS REQUIRED BY THE MANUFACTURER.

CALCULATED
CHECKED

GENERAL NOTES 1

D08 - BM - FY 2014

3
60

UTILITIES

LISTED BELOW ARE ALL THE UTILITIES LOCATED WITHIN THE PROJECT CONSTRUCTION LIMITS TOGETHER WITH THEIR RESPECTIVE OWNERS.

THE LOCATION OF THE UNDERGROUND UTILITIES SHOWN ON THE PLANS ARE AS OBTAINED FROM THE OWNERS AS REQUIRED BY SECTION 153.64 O.R.C.

CLE-125-1347

DUKE ENERGY (ELECTRIC)
139 EAST 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY (GAS)
139 EAST 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

CINCINNATI BELL TELEPHONE
221 EAST 4TH STREET, BLDG. 121-900
CINCINNATI, OHIO 45201
513-565-7043 (MARK CONNER)

TIME WARNER CABLE
11252 CORNELL PARK DRIVE
CINCINNATI, OHIO 45242
513-386-5483 (JIM O'REILLY)

TATE MONROE WATER ASSOCIATION, INC.
P.O. BOX 90
BETHEL, OHIO 45106
513-734-2236, EXT. 211 (DAVE CONN)

CLERMONT COUNTY WATER RESOURCES DEPARTMENT
4400 HASKELL LANE
BATAVIA, OHIO 45103
513-479-4031 (TIM CHERRY)

VILLAGE OF BETHEL
120 N. MAIN STREET
BETHEL, OHIO 45106
513-600-4139 (MITCH HATFIELD)

CLE-32-1425L/R

DUKE ENERGY (ELECTRIC)
139 EAST 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY (GAS)
139 EAST 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

CINCINNATI BELL TELEPHONE
221 EAST 4TH STREET, BLDG. 121-900
CINCINNATI, OHIO 45201
513-565-7043 (MARK CONNER)

TIME WARNER CABLE
11252 CORNELL PARK DRIVE
CINCINNATI, OHIO 45242
513-386-5483 (JIM O'REILLY)

BROWN COUNTY RURAL WATER ASSOCIATION
3818 U.S. 52
RIPLEY, OHIO 45167
937-375-4106 (DAN SARBACH)

CLERMONT COUNTY WATER RESOURCES DEPARTMENT
4400 HASKELL LANE
BATAVIA, OHIO 45103
513-479-4031 (TIM CHERRY)

VILLAGE OF WILLIAMSBURG
107 WEST MAIN STREET
WILLIAMSBURG, OHIO 45176
513-659-2561 (KYLE CRIBBET)

CLE-32-1314L

DUKE ENERGY (ELECTRIC)
139 EAST 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY (GAS)
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3818 U.S. 52
RIPLEY, OHIO 45167
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4400 HASKELL LANE
BATAVIA, OHIO 45103
513-479-4031 (TIM CHERRY)

CLE-32-1214

DUKE ENERGY (ELECTRIC)
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CINCINNATI BELL TELEPHONE
221 EAST 4TH STREET, BLDG. 121-900
CINCINNATI, OHIO 45201
513-565-7043 (MARK CONNER)

CLERMONT COUNTY WATER RESOURCES DEPARTMENT
4400 HASKELL LANE
BATAVIA, OHIO 45103
513-479-4031 (TIM CHERRY)

CLE-132-2473

DUKE ENERGY (ELECTRIC)
139 EAST 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY (GAS)
139 EAST 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

CINCINNATI BELL TELEPHONE
221 EAST 4TH STREET, BLDG. 121-900
CINCINNATI, OHIO 45201
513-565-7043 (MARK CONNER)

TIME WARNER CABLE
11252 CORNELL PARK DRIVE
CINCINNATI, OHIO 45242
513-386-5483 (JIM O'REILLY)

CLERMONT COUNTY WATER RESOURCES DEPARTMENT
4400 HASKELL LANE
BATAVIA, OHIO 45103
513-479-4031 (TIM CHERRY)

GRE-35-2297

DAYTON POWER AND LIGHT
1900 DRYDEN ROAD
DAYTON, OHIO 45439
937-331-4132 (JOHN KENTON)

AT&T OHIO
3233 WOODMAN DRIVE, ROOM 225
DAYTON, OHIO 45420
937-296-3894 (JESSE WEAD)

TIME WARNER CABLE
3691 TURNER ROAD
DAYTON, OHIO 45415
937-425-8850 (TIM KUSS)

GREENE COUNTY WATER AND SEWER
667 DAYTON-XENIA ROAD
XENIA, OHIO 45385
937-562-7462 (TIM GROW)

CLE-743-0466

DUKE ENERGY (ELECTRIC)
139 EAST 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY (GAS)
139 EAST 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

FRONTIER COMMUNICATIONS
241 SOUTH NELSON AVENUE
WILMINGTON, OHIO 45177
937-382-2222 (ROB LATHAM)

TIME WARNER CABLE
11252 CORNELL PARK DRIVE
CINCINNATI, OHIO 45242
513-386-5483 (JIM O'REILLY)

TATE MONROE WATER ASSOCIATION, INC.
P.O. BOX 90
BETHEL, OHIO 45106
513-734-2236, EXT. 211 (DAVE CONN)

VILLAGE OF FELICITY
415 WALNUT STREET
P.O. BOX 613
FELICITY, OHIO 45120
513-876-3400 (HEATHER MCINTYRE)

HAM-562-0227

DUKE ELECTRIC
139 EAST 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-3674 (AARON WRIGHT)

DUKE GAS
139 EAST 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

CINCINNATI BELL TELEPHONE
221 EAST 4TH STREET, BLDG 121-900
CINCINNATI, OHIO 45201
513-565-7043 (MARK CONNER)

TIME WARNER CABLE
11252 CORNELL PARK DRIVE
CINCINNATI, OHIO 45242
513-386-5483 (JIM O'REILLY)

CINCINNATI WATER WORKS
4747 SPRING GROVE AVE
CINCINNATI, OHIO 45232
513-591-6856 (JON HUNSEDER)

CINCINNATI MSD
1600 GEST STREET
CINCINNATI, OHIO 45204
513-557-7188 (ROB FRANKLIN)
(PLEASE SEND PLANS TO E-MAIL ADDRESS:
ROB.FRANKLIN@CINCINNATI-OH.GOV)

CINCINNATI STORMWATER MANAGEMENT
225 WEST GALBRAITH ROAD
CINCINNATI, OHIO 45215
(PLEASE SEND PLANS FOR DISTRIBUTION/REVIEW
TO E-MAIL BOX: SMUPLANREVIEW@CINCINNATI-OH.GOV)

WINDSTREAM COMMUNICATIONS, INC.
3701 COMMUNICATIONS WAY
EVANSVILLE, INDIANA 47715
330-650-7663 (DOUG NELISSE)

PRE-177-0486

DAYTON POWER & LIGHT
1900 DRYDEN ROAD
DAYTON, OHIO 45439
937-331-4132 (JOHN KENTON)

FRONTIER COMMUNICATIONS
6464 WESTBROOK ROAD
CLAYTON, OHIO 45315
937-833-0468 (RICHARD FERRIS)

PRE-127-1718

DAYTON POWER & LIGHT
1900 DRYDEN ROAD
DAYTON, OHIO 45439
937-331-4132 (JOHN KENTON)

DARKE RURAL ELECTRIC COOPERATIVE
P.O. BOX 278
GREENVILLE, OHIO 45331
937-548-4114, EXT. 213 (BRUCE BURKE)

VECTREN ENERGY DELIVERY OF OHIO, INC.
6500 CLYO ROAD
CENTERVILLE, OHIO 45459
937-312-2533 (DON SPECHT)

CENTURYLINK TELEPHONE
803 E. 12TH STREET
GREENVILLE, OHIO 45331
937-547-4255 (DAVID KAPLAN)

CITY OF EATON PUBLIC WORKS
P.O. BOX 27
328 N. MAPLE STREET
EATON, OHIO 45320
937-456-4125 (SHAWN HOLLON)

WAR-123-0598

DUKE ENERGY - ELECTRIC
139 E. 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY - GAS
139 E. 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

CENTURYLINK TELEPHONE
20 NORTH MECHANIC STREET
LEBANON, OHIO 45036
513-933-3502 (MS. VIC BATES)

WARREN COUNTY TELECOM
500 JUSTICE DRIVE
LEBANON, OHIO 45036
513-695-1318 (PAUL KINDELL)

WAR-123-1740

DUKE ENERGY - ELECTRIC
139 E. 4TH STREET, ROOM 467A
CINCINNATI, OHIO 45202
513-287-1748 (GINNY MEYER)

DUKE ENERGY - GAS
139 E. 4TH STREET, ROOM 460A
CINCINNATI, OHIO 45202
513-287-2366 (ED PAMER)

CINCINNATI BELL TELEPHONE
221 EAST 4TH STREET, BLDG. 121-900
CINCINNATI, OHIO 45201
513-565-7043 (MARK CONNER)

CENTURYLINK TELEPHONE
20 NORTH MECHANIC STREET
LEBANON, OHIO 45036
513-933-3502 (MS. VIC BATES)

TIME WARNER CABLE
11252 CORNELL PARK DRIVE
CINCINNATI, OHIO 45242
513-386-5483 (JIM O'REILLY)

WESTERN WATER COMPANY
1775 S.R. 28
GOSHEN, OHIO 45122
513-899-3211, EXT. 22 (KURT MEEKER)

CITY OF LEBANON
50 S. BROADWAY
LEBANON, OHIO 45036
513-228-3130 (DARREN OWENS)
ELECTRIC: 513-228-3200 (SHAWN COFFEY)
WATER/SEWER: 513-228-3601 (JOHN HABIG)
STORM: 513-228-3701 (SCOTT HORNE)

WARREN COUNTY TELECOM
500 JUSTICE DRIVE
LEBANON, OHIO 45036
513-695-1318 (PAUL KINDELL)

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GENERAL NOTES 2

D08 - BM - FY 2014

ITEM 614- MAINTAINING TRAFFIC

IT IS THE INTENTION OF THESE PLANS TO PERFORM THE REQUIRED WORK WITH THE LEAST INCONVENIENCE TO AND THE MAXIMUM SAFETY OF, THE CONTRACTOR AND THE TRAVELING PUBLIC. THE REQUIREMENTS FOR MAINTAINING TRAFFIC SHALL BE AS INDICATED IN THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES FOR STREETS AND HIGHWAYS, CURRENT EDITION. THE PROPOSAL, THE SPECIFICATION AND THE PLANS. ANY VARIANCE FROM THESE REQUIREMENTS SHALL BE APPROVED BY THE DIRECTOR IN WRITING.

A. BEFORE WORK BEGINS, THE CONTRACTOR SHALL SUBMIT TO THE ENGINEER THE NAMES AND TELEPHONE NUMBERS OF PERSONS WHO CAN BE CONTACTED 24 HOURS A DAY BY THE OHIO DEPARTMENT OF TRANSPORTATION AND ALL INTERESTED POLICE AGENCIES. THESE PERSONS SHALL BE RESPONSIBLE FOR PLACING OR REPLACING NECESSARY TRAFFIC CONTROL DEVICES TO MAINTAIN THE TRAVELED PAVEMENT SAFELY.

B. TRAFFIC SHALL BE MAINTAINED AT ALL INTERSECTIONS AND DRIVES AT ALL TIMES AND SHALL BE CONTROLLED WITH FLAGGERS AND TRAFFIC CONTROL DEVICES AS REQUIRED AND SHALL BE SUBJECT TO APPROVAL BY THE ENGINEER.

C. UNLESS OTHERWISE NOTED IN THE PLANS, DURING NON -WORKING HOURS, TRAFFIC SHALL BE RESTORED TO THE FULL WIDTH OF EXISTING PAVEMENT.

D. LANE CLOSURES/REDUCTIONS

LENGTH AND DURATION OF LANE CLOSURES AND RESTRICTIONS SHALL BE AT THE APPROVAL OF THE ENGINEER. IT IS THE INTENT TO MINIMIZE THE IMPACT TO THE TRAVELING PUBLIC. LANE CLOSURES OR RESTRICTIONS OVER SEGMENTS OF THE PROJECT IN WHICH NO WORK IS ANTICIPATED WITHIN A REASONABLE TIME FRAME, AS DETERMINED BY THE ENGINEER, SHALL NOT BE PERMITTED. THE LEVEL OF UTILIZATION OF MAINTENANCE OF TRAFFIC DEVICES SHALL BE COMMENSURATE WITH THE WORK IN PROGRESS.

ALL WORK AND TRAFFIC CONTROL DEVICES SHALL BE IN ACCORDANCE WITH CMS 614 AND OTHER APPLICABLE PORTIONS OF THE SPECIFICATIONS, AS WELL AS THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES. PAYMENT FOR ALL THE ITEMS REQUIRED TO MAINTAIN TRAFFIC IN ACCORDANCE WITH THE REQUIREMENTS SHALL BE INCLUDED IN THE LUMP SUM CONTRACT PRICE FOR ITEM 614, MAINTAINING TRAFFIC, AS PER PLAN, UNLESS SEPARATELY ITEMIZED IN THE PLAN.

PERMITTED LANE CLOSURE TIMES

SHORT TERM LANE CLOSURES ARE THOSE WHICH ARE PERMITTED BY THE PERMITTED LANE CLOSURE NOTE. THESE TIMES SHALL NOT BE REVISED WITHOUT PRIOR APPROVAL FROM THE DISTRICT 8 WORK ZONE TRAFFIC CONTROL ENGINEER. SHORT TERM LANE CLOSURES SHALL ONLY BE IMPLEMENTED WHEN WORK IS BEING CONTINUOUSLY PERFORMED IN THE LANE. THE CLOSURE SHALL BE REMOVED AS SOON AS POSSIBLE AFTER WORK HAS STOPPED. PERMITTED LANE CLOSURES SHALL ONLY BE ALLOWED DURING THE TIMES SPECIFIED IN THE DISTRICT 8 PERMITTED LANE CLOSURE TIMES, WHICH IS LOCATED ON THE ODOT WEBSITE: <http://plcm.dot.state.oh.us> OR AS LISTED BELOW. MAINTENANCE OF TRAFFIC PLANS SHALL ADHERE WITH THE FOLLOWING RESTRICTIONS:

IN ALL CASES, THE MINIMUM LANE WIDTH SHALL BE 11 FEET.

VERTICAL CLEARANCE:

ANY WORK (FALSEWORK, TRAFFIC PROTECTION, CONTAINMENT, ETC.) OVER LIVE TRAFFIC BY THE CONTRACTOR THAT REDUCES THE EXISTING VERTICAL CLEARANCE IS PROHIBITED UNLESS 4 WEEKS ADVANCED NOTICE IS PROVIDED WITH NEW PROPOSED VERTICAL CLEARANCES. THE CONTRACTOR SHALL PROVIDE FIELD MEASUREMENTS BEFORE ALLOWING TRAFFIC UNDERNEATH. IF ANY WORK IS TO OCCUR BELOW 14'-6", THEN SIGNS ON THE STRUCTURE AND ADVANCE WARNING SIGNS SHALL BE INSTALLED A MINIMUM OF 2 WEEKS PRIOR TO PERFORMING SUCH WORK. SIGNING SHALL BE IN ACCORDANCE WITH THE "OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES" (OMUTCD) AND THE OHIO "TRAFFIC ENGINEERING MANUAL" (TEM). NO WORK OVER TRAFFIC SHALL OCCUR WITH A VERTICAL CLEARANCE LESS THAN 13'-10". LOWERING THE VERTICAL CLEARANCE DURING CONSTRUCTION IS CONSIDERED THE CONTRACTOR'S MEANS AND METHODS OF ACCOMPLISHING THE WORK, AND THEREFORE THE STATE IS NOT RESPONSIBLE FOR ANY DAMAGE FROM VEHICULAR IMPACTS THAT MAY RESULT AS PER 107.10.

BRIDGE NO. CLE-125-1347 (SFN 1302434) OVER POPLAR CREEK. MAINTAIN ONE LANE OF TRAFFIC IN EACH DIRECTION AT ALL TIMES. SEE SHEETS 7 THRU 13 OF THE PLANS.

BRIDGE NO. CLE-32-1425L/R (SFN 1300490 / SFN 13000504) OVER EAST FORK LITTLE MIAMI. ONE LANE OF TRAFFIC MAY BE CLOSED PER THE PERMITTED LANE CLOSURE SCHEDULE. REFER TO STD. DWG. MT-95.30.

BRIDGE NO. CLE-32-1314L (SFN 1300458) OVER SR 276 ONE LANE OF TRAFFIC MAY BE CLOSED PER THE PERMITTED LANE CLOSURE SCHEDULE. REFER TO STD. DWG. MT-95.30.

BRIDGE NO. CLE-32-1214 (SFN 1300431) HALF ACRE ROAD OVER SR 32. MAINTAIN A MINIMUM OF ONE LANE OF TRAFFIC IN EACH DIRECTION AT ALL TIMES. REFER TO STD. DWG. MT-95.31 AND MT-95-32.

BRIDGE NO. CLE-132-2473 (SFN 1303090) OVER O'BANNON CREEK MAINTAIN ONE LANE OF TWO-WAY TRAFFIC USING FLAGGERS PER STD. DWG. MT-97.10.

BRIDGE NO. GRE-35-2297 (SFN 2900521) SOUTH CHARLESTON RD. OVER US 35 MAINTAIN ONE LANE OF TWO-WAY TRAFFIC USING FLAGGERS PER STD. DWG. MT-97.10.

BRIDGE NO. HAM-562-0227 (SFN 3113981) WESLEY AVENUE OVER SR 562 THE LANE ADJACENT TO THE BARRIER MAY BE CLOSED BETWEEN THE HOURS OF 9AM TO 3PM TO PERFORM THE WORK. REFER TO STD. DWG. MT-95.31. PROVIDE ADVANCED WARNING ALONG WESLEY AVE., ALONG NORWOOD AVE. APPROACHING THE BRIDGE. PROVIDE ADVANCED WARNING ALONG THE SR 562 EASTBOUND EXIT RAMP TO WESLEY AVE. DURING THE WORK HOURS OF 9AM TO 3PM, TEMPORARILY CLOSE THE RIGHT TURN LANE FROM EASTBOUND NORWOOD AVE. TO WESLEY AVE AND ALLOW TURNING MOVEMENTS FROM THE EASTBOUND NORWOOD AVE. THRU LANE TO WESLEY AVE.

THE CONTRACTOR SHALL NOT BE ALLOWED TO DISMANTLE OR ERECT VANDAL PROTECTION FENCE OVER TRAFFIC. THE CONTRACTOR SHALL BE ALLOWED TO CLOSE ONE LANE IN EACH DIRECTION BELOW ACTIVE THE BRIDGE WORK BETWEEN THE HOURS OF 8:00 PM AND 6:00 AM IN ACCORDANCE WITH THE PERMITTED LANE CLOSURE SCHEDULE AND STANDARD DRAWINGS MT-95.31 AND MT-95.32. REFERENCE STANDARD DRAWINGS MT-98.11 AND MT-98.20 TO MAINTAIN RAMP ACCESS WHEN THE RAMP LANE IS CLOSED.

BRIDGE NO. PRE-127-1718 (SFN 6802680) US 127 OVER LOWRY RUN MAINTAIN ONE LANE OF TWO-WAY TRAFFIC USING FLAGGERS PER STD. DWG. MT-97.10.

BRIDGE NO. PRE-177-0486 (SFN 6803032) OVER EAST FORK FOUR MILE CREEK. MAINTAIN ONE LANE OF TWO-WAY TRAFFIC USING FLAGGERS PER STD. DWG. MT-97.10.

BRIDGE NO. CLE-743-0466 (SFN 1304887) OVER BIG INDIAN CREEK MAINTAIN ONE LANE OF TWO-WAY TRAFFIC USING FLAGGERS PER STD. DWG. MT-97.10.

BRIDGE NO. WAR-123-0598 (SFN 8304157) OVER TODD FORK MAINTAIN ONE LANE OF TWO WAY TRAFFIC USING A TEMPORARY SIGNAL AS SHOWN ON SHEETS 14 AND 15. INCLUDE ADVANCED SIGNAGE DIRECTING THE MOTORIST TO WATCH FOR STOPPED TRAFFIC AHEAD DUE TO THE TERRAIN. ON THE EAST SIDE OF THE BRIDGE, LOCATE THE TEMPORARY SIGNAL BETWEEN THE BRIDGE AND THE INTERSECTION WITH NEAREST DRIVEWAYS TO PREVENT MOTORISTS FROM ENTERING THE ONE-WAY TRAFFIC ZONE OUT OF PHASE. PROVIDE R3-2 SIGNS FOR THE AFFECTED DRIVES.

BRIDGE NO. WAR-123-1740 (SFN 8304432) OVER TURTLE CREEK TRAFFIC MAY BE REDUCED TO ONE LANE IN EACH DIRECTION BETWEEN THE HOURS OF 8PM AND 6AM ONLY. ALL MATERIAL REMOVED SHALL BE RECONSTRUCTED PRIOR TO OPENING. REFER TO STD. DWG. MT-95.31 AND MT-95-32.

THE CONTRACTOR SHALL BE ASSESSED DISINCENTIVES IN THE AMOUNT OF \$50.00 FOR EVERY MINUTE OF TIME THE DESCRIBED CRITICAL LANE(S) IS RESTRICTED FROM FULL USE BY THE TRAVELING PUBLIC WITHIN THE RESTRICTED TIME PERIOD.

ITEM 614. MAINTAINING TRAFFIC (LANES OPEN DURING HOLIDAYS OR SPECIAL EVENTS)

NO WORK SHALL BE PERFORMED AND ALL EXISTING LANES SHALL BE OPEN TO TRAFFIC DURING THE FOLLOWING DESIGNATED HOLIDAYS OR EVENTS:

CHRISTMAS	FOURTH OF JULY	EASTER
NEW YEARS	LABOR DAY	
MEMORIAL DAY	THANKSGIVING	

NO EXTENSIONS OF TIME SHALL BE GRANTED FOR DELAYS IN MATERIAL, DELIVERIES, UNLESS SUCH DELAYS ARE INDUSTRY WIDE, OR FOR LABOR STRIKE, UNLESS SUCH STRIKES ARE AREA WIDE.

DAY OF HOLIDAY OR EVENT	TIME ALL LANES MUST BE OPEN TO TRAFFIC
SUNDAY	12:00N FRIDAY THROUGH 12:00N MONDAY
MONDAY	12:00N FRIDAY THROUGH 12:00N TUESDAY
TUESDAY	12:00N MONDAY THROUGH 12:00N WEDNESDAY
WEDNESDAY	12:00N TUESDAY THROUGH 12:00N THURSDAY
THURSDAY	12:00N WEDNESDAY THROUGH 12:00N FRIDAY
THURSDAY (THANKSGIVING ONLY)	12:00N WEDNESDAY THROUGH 12:00N MONDAY
FRIDAY	12:00N THURSDAY THROUGH 12:00N MONDAY
SATURDAY	12:00N FRIDAY THROUGH 12:00N MONDAY

SHOULD THE CONTRACTOR FAIL TO MEET ANY OF THESE REQUIREMENTS, THE CONTRACTOR SHALL BE ASSESSED A DISINCENTIVE IN THE AMOUNT OF \$50 FOR EACH MINUTE THE ABOVE DESCRIBED LANE CLOSURE RESTRICTIONS ARE VIOLATED.

WINDOW CONTRACT TABLE	
DESCRIPTION OF CRITICAL WORK	CALENDAR DAYS TO COMPLETE
ALL WORK ON CLE-125-1347	45
ALL WORK ON WAR-123-0598	45

FLOODLIGHTING

FLOODLIGHTING OF THE WORK SITE FOR OPERATIONS CONDUCTED DURING NIGHTTIME PERIODS SHALL BE ACCOMPLISHED SO THAT THE LIGHTS DO NOT CAUSE GLARE TO THE DRIVERS ON THE ROADWAY. TO ENSURE THE ADEQUACY OF THE FLOODLIGHT PLACEMENT, THE CONTRACTOR AND THE ENGINEER SHALL DRIVE THROUGH THE WORK SITE EACH NIGHT WHEN THE LIGHTING IS IN PLACE AND OPERATIVE PRIOR TO COMMENCING ANY WORK. IF GLARE IS DETECTED, THE LIGHT PLACEMENT AND SHIELDING SHALL BE ADJUSTED TO THE SATISFACTION OF THE ENGINEER BEFORE WORK PROCEEDS.

PAYMENT FOR ALL LABOR, EQUIPMENT AND MATERIALS SHALL BE INCLUDED IN THE LUMP SUM CONTRACT PRICE FOR ITEM 614, MAINTAINING TRAFFIC (SECTION 642-2).

SPECIFIC SERVICE AND TOURIST-ORIENTED DIRECTIONAL SIGNS REMOVAL AND REINSTALLTION

IN THE EVENT THAT THIS PROJECT NECESSITATES THE REMOVAL OF ANY SPECIFIC SERVICE (LOGO) SIGNS AND/OR TOURIST-ORIENTED DIRECTIONAL SIGNS (TODS) THAT ARE NOT SPECIFICALLY DESCRIBED IN OTHER ITEMS OF WORK, THE CONTRACTOR SHALL CAREFULLY REMOVE SUCH SIGNS. REMOVED LOGO SIGNS AND TODS SHALL BE IMMEDIATELY RE-ERECTED ON APPROVED TEMPORARY SUPPORTS IN THE SAME GENERAL VICINITY ALONG THE ROADWAY TO BE VIEWED BY THE MOTORING PUBLIC. UNLESS THE ORIGINAL SUPPORTS WILL BE REUSED, THE CONTRACTOR SHALL REMOVE AND DISPOSE OF THE SUPPORTS AND FOUNDATIONS IN ACCORDANCE WITH ITEM 630.12. THE CONTRACTOR SHALL NOTIFY OHIO LOGOS, INC. AT (800) 860-5646 AT LEAST 60 DAYS PRIOR TO PROJECT COMPLETION TO ALERT THEM THAT ONE OR MORE LOGO SIGNS AND/OR TODS ARE ON TEMPORARY SUPPORTS. OHIO LOGOS, INC. WILL MAKE ARRANGEMENTS TO HAVE THE SIGNS INSTALLED ON PERMANENT SUPPORTS AT THE COMPLETION OF THE PROJECT.

THIS ITEM OF WORK INCLUDES REMOVAL AND TEMPORARY RE-ERECTION OF LOGO SIGNS AND TODS, FURNISHING AND INSTALLATION OF TEMPORARY SUPPORTS, REMOVAL AND DISPOSAL OF THE ORIGINAL SUPPORTS AND FOUNDATIONS, AND PROVIDING NOTIFICATION TO OHIO LOGOS, INC. THIS WORK WILL BE INCLUDED IN THE LUMP SUM PAYMENT FOR ITEM 614, MAINTAINING TRAFFIC.

DELINEATION OF PORTABLE AND PERMANENT BARRIER

BARRIER REFLECTORS AND OBJECT MARKERS SHALL BE INSTALLED ON ALL PORTABLE BARRIER (PB) USED FOR TRAFFIC CONTROL AND ON PERMANENT CONCRETE BARRIER (INCLUDING BRIDGE PARAPETS) LOCATED WITHIN 5 FEET OF THE EDGE OF THE ADJACENT TRAVEL LANE.

BARRIER REFLECTORS SHALL CONFORM TO C&MS 626, EXCEPT THAT THE SPACING SHALL BE AS PER TRAFFIC SCD MT-101.70. OBJECT MARKERS AND THEIR INSTALLATION SHALL CONFORM TO C&MS 614.03 AND SCD MT-101.70. WHEN THE PB CONTAINS GLARE SCREEN, ONE SET OF THREE VERTICAL STRIPES OF SHEETING SHALL BE CONSIDERED EQUIVALENT TO AN OBJECT MARKER, ONE-WAY.

SEE MAINTENANCE OF TRAFFIC PLANS FOR QUANTITIES.

PAYMENT SHALL BE FULL COMPENSATION FOR ALL MATERIAL, LABOR, INCIDENTALS AND EQUIPMENT NECESSARY FOR FURNISHING, INSTALLING, MAINTAINING AND REMOVING EACH OF THE ABOVE ITEMS.

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MAINTENANCE OF TRAFFIC

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ITEM 614, WORK ZONE IMPACT ATTENUATOR FOR 24" WIDE HAZARDS, BIDIRECTIONAL

THIS ITEM SHALL CONSIST OF FURNISHING AND INSTALLING A NON-GATING IMPACT ATTENUATOR. FURNISH AN IMPACT ATTENUATOR FROM THE OFFICE OF ROADWAY ENGINEERING APPROVED LIST FOR WORK ZONE IMPACT ATTENUATORS. THE APPROVED LIST IS AVAILABLE AT THE "ROADWAY STANDARDS: PROPRIETARY ROADSIDE SAFETY DEVICES" WEB PAGE ON THE OFFICE OF ROADWAY ENGINEERING WEBSITE.

INSTALLATION SHALL BE AT THE LOCATIONS SPECIFIED IN THE PLANS IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFICATIONS.

THE CONTRACTOR SHALL REPAIR OR REPLACE A DAMAGED UNIT WITHIN 24 HOURS OF A DAMAGING IMPACT.

WHEN BIDIRECTIONAL DESIGNS ARE SPECIFIED, THE CONTRACTOR SHALL SUPPLY APPROPRIATE TRANSITIONS.

WHEN GATING IMPACT ATTENUATORS ARE DESIRED, THE CONTRACTOR SHALL SUBMIT DOCUMENTATION TO THE ENGINEER FOR ACCEPTANCE.

THE COST FOR THE ADDITIONAL BARRIER REQUIRED FOR A GATING IMPACT ATTENUATOR SHALL BE INCLUDED IN THE COST OF THE GATING IMPACT ATTENUATOR.

PAYMENT FOR THE ABOVE WORK SHALL BE MADE AT THE UNIT PRICE BID AND SHALL INCLUDE ALL LABOR, TOOLS, EQUIPMENT AND MATERIALS NECESSARY TO CONSTRUCT AND MAINTAIN A COMPLETE AND FUNCTIONAL IMPACT ATTENUATOR SYSTEM, INCLUDING ALL RELATED BACKUPS, TRANSITIONS, LEVELING PADS, HARDWARE AND GRADING, NOT SEPARATELY SPECIFIED, AS REQUIRED BY THE MANUFACTURER.

ITEM 614, PORTABLE CHANGEABLE MESSAGE SIGNS, AS PER

THE CONTRACTOR SHALL FURNISH, INSTALL, MAINTAIN AND REMOVE, WHEN NO LONGER NEEDED, A CHANGEABLE MESSAGE SIGN. THE SIGN SHALL BE OF A TYPE SHOWN ON A LIST OF APPROVED PCMS UNITS AVAILABLE ON THE (OFFICE OF MATERIALS MANAGEMENT WEB PAGE). THE LIST CONTAINS CLASS A AND B UNITS WITH MINIMUM LEGIBILITY DISTANCES OF 650 FEET AND 475 FEET, RESPECTIVELY.

EACH SIGN SHALL BE TRAILER-MOUNTED AND EQUIPPED WITH A FUNCTIONAL DIMMING MECHANISM, TO DIM THE SIGN DURING DARKNESS, AND A TAMPER AND VANDAL PROOF ENCLOSURE. EACH SIGN SHALL BE PROVIDED WITH APPROPRIATE TRAINING AND OPERATION INSTRUCTIONS TO ENABLE ON-SITE PERSONNEL TO OPERATE AND TROUBLESHOOT THE UNIT. THE SIGN SHALL ALSO BE CAPABLE OF BEING POWERED BY AN ELECTRICAL SERVICE DROP FROM A LOCAL UTILITY COMPANY. THE PCMS SHALL BE DELINEATED IN ACCORDANCE WITH CMS 614.03.

THE PROBABLE PCMS LOCATIONS AND WORK LIMITS FOR THOSE LOCATIONS ARE SHOWN ON SHEET(S) OF THE PLAN. PLACEMENT, OPERATION, MAINTENANCE AND ALL ACTIVATION OF THE SIGNS BY THE CONTRACTOR SHALL BE AS DIRECTED BY THE ENGINEER. THE PCMS SHALL BE LOCATED IN A HIGHLY VISIBLE POSITION YET PROTECTED FROM TRAFFIC. THE CONTRACTOR SHALL, AT THE DIRECTION OF THE ENGINEER, RELOCATE THE PCMS TO IMPROVE VISIBILITY OR ACCOMMODATE CHANGED CONDITIONS. WHEN NOT IN USE, THE PCMS SHALL BE TURNED OFF. ADDITIONALLY, WHEN NOT IN USE FOR EXTENDED PERIODS OF TIME, THE PCMS SHALL BE TURNED AWAY FROM ALL TRAFFIC.

ITEM 614, PORTABLE CHANGEABLE MESSAGE SIGNS, AS PER PLAN (CONTINUED):

THE ENGINEER SHALL BE PROVIDED ACCESS TO EACH SIGN UNIT AND SHALL BE PROVIDED WITH APPROPRIATE TRAINING AND OPERATION INSTRUCTIONS TO ENABLE ODOT PERSONNEL TO OPERATE AND TROUBLESHOOT THE UNIT, AND TO REVISE SIGN MESSAGES, IF NECESSARY.

(THE CONTRACTOR SHALL IMPLEMENT A SYSTEM WHEREBY CHANGEABLE MESSAGES WILL BE IMPLEMENTED WITHIN _____ HOURS FOLLOWING TELEPHONE NOTIFICATION FROM THE PROJECT ENGINEER TO A DESIGNATED PHONE.)

ALL MESSAGES TO BE DISPLAYED ON THE SIGN WILL BE PROVIDED BY THE ENGINEER. A LIST OF ALL REQUIRED PRE-PROGRAMMED MESSAGES WILL BE GIVEN TO THE CONTRACTOR AT THE PROJECT PRECONSTRUCTION CONFERENCE. THE SIGN SHALL HAVE THE CAPABILITY TO STORE UP TO 99 MESSAGES. MESSAGE MEMORY OR PRE-PROGRAMMED DISPLAYS SHALL NOT BE LOST AS A RESULT OF POWER FAILURES TO THE ON-BOARD COMPUTER. THE SIGN LEGEND SHALL BE CAPABLE OF BEING CHANGED IN THE FIELD. THREE-LINE PRESENTATION FORMATS WITH UP TO SIX MESSAGE PHASES SHALL BE SUPPORTED. PCMS FORMAT SHALL PERMIT THE COMPLETE MESSAGE FOR EACH PHASE TO BE READ AT LEAST TWICE. THE PCMS SHALL CONTAIN AN ACCURATE CLOCK AND PROGRAMMING LOGIC WHICH WILL ALLOW THE SIGN TO BE ACTIVATED, DEACTIVATED OR MESSAGES CHANGED AUTOMATICALLY AT DIFFERENT TIMES OF THE DAY FOR DIFFERENT DAYS OF THE WEEK.

(THE PCMS SHALL CONTAIN A CELLULAR TELEPHONE DATA LINK WHICH WILL (IN ACTIVE CELLULAR PHONE AREAS) ALLOW REMOTE SIGN ACTIVATION, MESSAGE CHANGES, MESSAGE ADDITIONS AND REVISIONS TO TIME OF DAY PROGRAMS. THE SYSTEM SHALL ALSO PERMIT VERIFICATION OF CURRENT AND PROGRAMMED MESSAGES. ONE REMOTE DATA INPUT DEVICE (LAPTOP COMPUTER PLUS MODEM OR EQUIVALENT) SHALL BE FURNISHED FOR USE BY THE DISTRICT TRAFFIC ENGINEER, OR EQUIVALENT, AND SHALL BE INSURED AGAINST THEFT.)

THE PCMS UNIT SHALL BE MAINTAINED IN GOOD WORKING ORDER BY THE CONTRACTOR IN ACCORDANCE WITH THE PROVISIONS OF CMS 614.07. THE CONTRACTOR SHALL, PRIOR TO ACTIVATING THE UNIT, MAKE ARRANGEMENTS, WITH AN AUTHORIZED SERVICE AGENT FOR THE PCMS, TO ASSURE PROMPT SERVICE IN THE EVENT OF FAILURE. ANY FAILURE SHALL NOT RESULT IN THE SIGN BEING OUT OF SERVICE FOR MORE THAN 12 HOURS, INCLUDING WEEKENDS. FAILURE TO COMPLY MAY RESULT IN AN ORDER TO STOP WORK AND OPEN ALL TRAFFIC LANES AND/OR IN THE DEPARTMENT TAKING APPROPRIATE ACTION TO SAFELY CONTROL TRAFFIC. THE ENTIRE COST TO CONTROL TRAFFIC, ACCRUED BY THE DEPARTMENT DUE TO THE CONTRACTOR'S NONCOMPLIANCE, WILL BE DEDUCTED FROM MONEYS DUE, OR TO BECOME DUE THE CONTRACTOR ON HIS CONTRACT.

THE CONTRACTOR SHALL BE RESPONSIBLE FOR 24-HOUR-PER-DAY OPERATION AND MAINTENANCE OF THESE SIGNS ON THE PROJECT FOR THE DURATION OF THE PHASES WHEN THE PLAN REQUIRES THEIR USE.

PAYMENT FOR THE ABOVE DESCRIBED ITEM SHALL BE AT THE CONTRACT UNIT PRICE. PAYMENT SHALL INCLUDE ALL LABOR, MATERIALS, EQUIPMENT, FUELS, LUBRICATING OILS, SOFTWARE, HARDWARE AND INCIDENTALS TO PERFORM THE ABOVE DESCRIBED WORK.

ITEM 614- PORTABLE CHANGEABLE MESSAGE SIGN, AS PER PLAN
3 SIGN MONTH

ITEM 614 - LAW ENFORCEMENT OFFICER (WITH PATROL CAR) FOR ASSISTANCE DURING CONSTRUCTION OPERATIONS

USE OF LAW ENFORCEMENT OFFICERS (LEOS) BY CONTRACTORS OTHER THAN THE USES SPECIFIED BELOW WILL NOT BE PERMITTED AT PROJECT COST. LEOS SHOULD NOT BE USED WHERE THE ODOT INTENDS THAT FLAGGERS BE USED.

IN ADDITION TO THE REQUIREMENTS OF CMS 614 AND THE ODOT, A UNIFORMED LEO WITH AN OFFICIAL PATROL CAR (CAR WITH TOP-MOUNTED EMERGENCY FLASHING LIGHTS AND

COMPLETE MARKINGS OF THE APPROPRIATE LAW ENFORCEMENT AGENCY) SHALL BE PROVIDED FOR THE FOLLOWING TRAFFIC CONTROL TASKS:

DURING THE ENTIRE ADVANCE PREPARATION AND CLOSURE SEQUENCE WHERE COMPLETE BLOCKAGE OF TRAFFIC IS REQUIRED.

IN ADDITION TO THE REQUIREMENT OF CMS 614 AND THE ODOT, A UNIFORMED LEO WITH AN OFFICIAL PATROL CAR (CAR WITH TOP-MOUNTED EMERGENCY FLASHING LIGHTS AND COMPLETE MARKINGS OF THE APPROPRIATE LAW ENFORCEMENT AGENCY) SHOULD BE PROVIDED FOR THE FOLLOWING TRAFFIC CONTROL TASKS:

FOR LANE CLOSURES: DURING INITIAL SET-UP PERIODS, TEAR DOWN PERIODS, SUBSTANTIAL SHIFTS OF A CLOSURE POINT OR WHEN NEW LANE CLOSURE ARRANGEMENTS ARE INITIATED FOR LONG-TERM LANE CLOSURES/SHIFTS (FOR THE FIRST AND LAST DAY OF MAJOR CHANGES IN TRAFFIC CONTROL SETUP). IN GENERAL, LEOS SHOULD BE POSITIONED AT THE POINT OF LANE RESTRICTION OR ROAD CLOSURE AND TO MANUALLY CONTROL TRAFFIC MOVEMENTS THROUGH INTERSECTIONS IN WORK ZONES.

WHEN CONSTRUCTION VEHICLES ARE ENTERING/EXITING THE ZONE DIRECTLY FROM/INTO AN OPEN LANE OF TRAFFIC. IF A LANE HAS BEEN CLOSED TO PROVIDE AN ACCELERATION/ DECELERATION LANE FOR THE VEHICLE, THE LEO WILL NOT BE REQUIRED.

LEOS SHOULD NOT FORGO THEIR TRAFFIC CONTROL RESPONSIBILITIES TO APPREHEND MOTORISTS FOR ROUTINE TRAFFIC VIOLATIONS. HOWEVER, IF A MOTORIST'S ACTIONS ARE CONSIDERED TO BE RECKLESS, THEN PURSUIT OF THE MOTORIST IS APPROPRIATE.

THE LEOS WORK AT THE DIRECTION OF THE CONTRACTOR. THE CONTRACTOR IS RESPONSIBLE FOR SECURING THE SERVICES OF THE LEOS WITH THE APPROPRIATE AGENCIES AND COMMUNICATING THE INTENTIONS OF THE PLANS WITH RESPECT TO DUTIES OF THE LEOS. THE ENGINEER SHALL HAVE FINAL CONTROL OVER THE LEOS' DUTIES AND PLACEMENT, AND WILL RESOLVE ANY ISSUES THAT MAY ARISE BETWEEN THE TWO PARTIES.

THE LEO SHALL REPORT IN TO THE CONTRACTOR PRIOR TO THE START OF THE SHIFT, IN ORDER TO RECEIVE INSTRUCTIONS REGARDING SPECIFIC WORK ASSIGNMENTS DURING HIS/HER SHIFT. THE LEO IS EXPECTED TO STAY AT THE PROJECT SITE FOR THE ENTIRE DURATION OF HIS/HER SHIFT. THE LEO SHALL

REPORT TO THE CONTRACTOR AT THE END OF HIS/HER SHIFT. ONCE THE LEO HAS COMPLETED THE DUTIES DESCRIBED ABOVE AND STILL HAS TIME REMAINING ON HIS/HER SHIFT, THE LEO MAY BE ASKED TO PATROL THROUGH THE WORK ZONE (WITH FLASHING LIGHTS OFF) OR BE PLACED AT A LOCATION TO DETER MOTORISTS FROM SPEEDING. SHOULD IT BE NECESSARY TO LEAVE THE PROJECT SITE, THE LEO SHALL NOTIFY THE ENGINEER. THE CONTRACTOR SHALL PROVIDE THE LEO WITH A TWO-WAY COMMUNICATION DEVICE WHICH SHALL BE RETURNED TO THE CONTRACTOR AT THE END OF HIS/HER SHIFT.

LEOS (WITH PATROL CAR) REQUIRED BY THE TRAFFIC MAINTENANCE TASKS ABOVE SHALL BE PAID FOR ON A UNIT PRICE (HOURLY) BASIS UNDER ITEM 614, LAW ENFORCEMENT OFFICER (WITH PATROL CAR) FOR ASSISTANCE. THE FOLLOWING ESTIMATED QUANTITIES HAVE BEEN CARRIED TO THE GENERAL SUMMARY.

ITEM 614, LAW ENFORCEMENT OFFICER WITH PATROL CAR FOR ASSISTANCE 200 HOURS

THE HOURS PAID SHALL INCLUDE ANY MINIMUM SHOW-UP TIME REQUIRED BY THE LAW ENFORCEMENT AGENCY INVOLVED. ANY ADDITIONAL COSTS (ADMINISTRATIVE OR OTHERWISE) INCURRED BY THE CONTRACTOR TO OBTAIN THE SERVICES OF AN LEO ARE INCLUDED WITH THE BID UNIT PRICE FOR ITEM 614, LAW ENFORCEMENT OFFICER WITH PATROL CAR FOR ASSISTANCE.

ITEM 614, REPLACEMENT DRUM

DRUMS FURNISHED BY THE CONTRACTOR IN ACCORDANCE WITH THE REQUIREMENTS OF THE PLANS, SPECIFICATIONS AND PROPOSAL WHICH BECOME DAMAGED BY TRAFFIC FOR REASONS BEYOND THE CONTROL OF THE CONTRACTOR SHALL BE REPLACED IN KIND WHEN ORDERED BY THE ENGINEER. REPLACEMENT DRUMS SHALL BE NEW.

PAYMENT FOR THE NEW DRUMS SHALL BE MADE AT THE CONTRACT PRICE PER EACH FOR ITEM 614, REPLACEMENT DRUM, AND SHALL INCLUDE THE COST OF REMOVING AND DISPOSING OF THE DAMAGED DRUM, AND PROVIDING AND MAINTAINING THE REPLACEMENT DRUM IN ACCORDANCE WITH THE CONTRACT REQUIREMENTS FOR THE ORIGINAL DRUM.

AN ESTIMATED QUANTITY OF ____ EACH HAS BEEN PROVIDED IN THE GENERAL SUMMARY.

ITEM 614, REPLACEMENT DRUM

DRUMS FURNISHED BY THE CONTRACTOR IN ACCORDANCE WITH THE REQUIREMENTS OF THE PLANS, SPECIFICATIONS AND PROPOSAL WHICH BECOME DAMAGED BY TRAFFIC FOR REASONS BEYOND THE CONTROL OF THE CONTRACTOR SHALL BE REPLACED IN KIND WHEN ORDERED BY THE ENGINEER. REPLACEMENT DRUMS SHALL BE NEW.

PAYMENT FOR THE NEW DRUMS SHALL BE MADE AT THE CONTRACT PRICE PER EACH FOR ITEM 614, REPLACEMENT DRUM, AND SHALL INCLUDE THE COST OF REMOVING AND DISPOSING OF THE DAMAGED DRUM, AND PROVIDING AND MAINTAINING THE REPLACEMENT DRUM IN ACCORDANCE WITH THE CONTRACT REQUIREMENTS FOR THE ORIGINAL DRUM.

SEE MAINTENANCE OF TRAFFIC PLANS FOR ESTIMATED QUANTITIES.

CALCULATED
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MAINTENANCE OF TRAFFIC

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ITEM 614, WORK ZONE SPEED LIMIT SIGN

THE CONTRACTOR SHALL FURNISH, INSTALL, MAINTAIN, COVER DURING SUSPENSION OF WORK, AND SUBSEQUENTLY REMOVE WORK ZONE SPEED LIMIT (R2-1) (45 SPEED LIMIT) SIGNS AND SUPPORTS WITHIN THE WORK LIMITS IN ACCORDANCE WITH THE FOLLOWING REQUIREMENTS:

THE CONTRACTOR SHALL COVER OR REMOVE ANY EXISTING SPEED LIMIT SIGNS WITHIN THE REDUCED SPEED ZONE(S). THESE SIGNS SHALL BE RESTORED DURING SUSPENSION OR TERMINATION OF THE REDUCED SPEED LIMIT. THE EXPENSE OF COVERING OR REMOVAL AND RESTORATION OF EXISTING SPEED LIMIT OR MINIMUM SPEED LIMIT SIGNS SHALL BE INCLUDED IN THE PAY ITEM FOR THE WORK ZONE SPEED LIMIT SIGNS.

THE WORK ZONE SPEED LIMIT SIGNS MAY BE ERECTED OR UNCOVERED NO MORE THAN FOUR HOURS BEFORE THE ACTUAL START OF WORK THAT CAUSES THE WARRANTING CONDITION(S) TO OCCUR. THE SIGNS SHALL BE REMOVED OR COVERED NO LATER THAN FOUR HOURS FOLLOWING REMOVAL OF THE WARRANTING CONDITION(S), OR SOONER AS DIRECTED BY THE ENGINEER. TEMPORARY SIGN COVERING AND UNCOVERING DUE TO TEMPORARY REMOVAL OF WARRANTING CONDITION(S) SHALL BE GUIDED BY THE FOUR-HOUR LIMITATIONS STATED ABOVE.

CONSTRUCTION AND MATERIAL SPECIFICATIONS ITEM 614, PARAGRAPH 614.02(B), INDICATES THAT THE TWO DIRECTIONS OF A DIVIDED HIGHWAY ARE CONSIDERED SEPARATE HIGHWAY SECTIONS. THEREFORE, IF THE WORK ON A MULTI-LANE DIVIDED HIGHWAY IS LIMITED TO ONLY ONE DIRECTION, A SPEED REDUCTION IN THE DIRECTION OF THE WORK DOES NOT AUTOMATICALLY CONSTITUTE A SPEED REDUCTION IN THE OPPOSITE DIRECTION. A SPEED LIMIT REDUCTION IN THE OPPOSITE DIRECTION, IN SUCH CASE, IS APPROPRIATE ONLY IF CONDITIONS ARE EXPECTED TO HAVE AN IMPACT ON THE DIRECTIONAL TRAFFIC FLOW, AS DIRECTED BY THE ENGINEER.

THE CONTRACTOR SHALL ERECT A WORK ZONE SPEED LIMIT SIGN IN ADVANCE OF THE WARRANTING CONDITION, AS DETAILED IN THE PLANS OR AS DIRECTED BY THE ENGINEER. THE SIGN SHALL BE MOUNTED ON BOTH SIDES OF A DIRECTIONAL ROADWAY OF DIVIDED HIGHWAYS. THE FIRST WORK ZONE SPEED LIMIT SIGN SHALL BE PLACED APPROXIMATELY 500 FEET IN ADVANCE OF THE LANE REDUCTION, SHIFT TAPER, OR OTHER ROADWAY OR SHOULDER RESTRICTION THAT WARRANTED THE WORK ZONE SPEED ZONE. ON UNDIVIDED HIGHWAYS THE SIGN SHALL BE MOUNTED ON THE RIGHT SIDE, APPROXIMATELY 250 FEET IN ADVANCE OF SUCH RESTRICTIONS. THE SIGN SHALL BE REPEATED EVERY 1 MILE FOR 60 AND 55 MPH ZONES AND EVERY ONE-HALF MILE FOR 50 MPH AND 45 MPH ZONES. THESE SIGNS SHALL ALSO BE ERECTED IMMEDIATELY AFTER EACH OPEN ENTRANCE RAMP WITHIN THE ZONE.

THE SPEED LIMIT REDUCTION SHALL BE LIMITED TO ONLY THE PORTION OF THE PROJECT AND THE WORK THAT WARRANTED THE WORK ZONE SPEED LIMIT REDUCTION.

SPEED REDUCTION (SPEED ZONE AHEAD SYMBOL) SIGNS (W3-5) SHALL BE ERECTED IN ADVANCE OF THE SPEED REDUCTION, APPROXIMATELY 1250 FEET ON MULTI-LANE HIGHWAYS AND 500 FEET ON TWO-LANE HIGHWAYS.

A SIGN(S) TO INDICATE THE RESUMPTION OF THE STATUTORY SPEED LIMIT SHALL BE ERECTED AT THE END OF ANY REDUCED SPEED ZONE. THE CONTRACTOR MAY USE SIGNS AND SUPPORTS IN USED, BUT GOOD CONDITION, PROVIDED THE SIGNS MEET CURRENT ODOT SPECIFICATIONS. SIGN FACES SHALL BE RETROREFLECTORIZED WITH TYPE G SHEETING COMPLYING WITH THE REQUIREMENTS OF CMS 730.19.

WORK ZONE SPEED LIMIT SIGNS SHALL BE MOUNTED ON TWO ITEM 630, GROUND MOUNTED SUPPORTS, NO. 3 POSTS, UNLESS MOUNTED ON A TEMPORARY SIGN SUPPORT PER SCD MT 105.10.

WORK ZONE SPEED LIMIT AND RELATED SIGN SIZES, PLACEMENT, SUPPORTS, ETC. SHALL BE PER THE ODOTCD, WITH TWO EXCEPTIONS: 1) EXPRESSWAY SIZE SPEED LIMIT SIGNS MAY BE USED ON FREEWAYS AND EXPRESSWAYS, IF NECESSARY; 2) THE HEIGHT OF SIGNS MOUNTED ON PORTABLE SUPPORTS SHOULD BE THE HEIGHT REQUIRED FOR GROUND-MOUNTED SIGNS BUT SHALL NOT BE MORE THAN 1 FOOT LOWER THAN THE HEIGHT REQUIRED BY THE ODOTCD, OR AS DIRECTED BY THE ENGINEER. PORTABLE SUPPORTS SHOULD NOT BE USED FOR A DURATION OF MORE THAN 3 DAYS.

WORK ZONE SPEED LIMIT SIGNS AND SUPPORTS WILL BE MEASURED AS THE NUMBER OF SIGN INSTALLATIONS, INCLUDING THE SIGNS AND NECESSARY SUPPORTS. IF A SIGN AND SUPPORT COMBINATION IS REMOVED AND REERECTED AT ANOTHER LOCATION WITHIN THE PROJECT DUE TO CHANGES IN THE SPEED ZONE AS DETAILED IN THE PLANS OR AS DIRECTED BY THE ENGINEER, IT SHALL BE CONSIDERED ANOTHER UNIT.

PAYMENT FOR ACCEPTED QUANTITIES, COMPLETE IN PLACE, WILL BE MADE AT THE CONTRACT UNIT PRICE. PAYMENT SHALL BE FULL COMPENSATION FOR ALL MATERIALS, LABOR, INCIDENTALS AND EQUIPMENT FOR FURNISHING, ERECTING, MAINTAINING, COVERING DURING SUSPENSION OF WORK, AND REMOVING THE SIGNS AND SUPPORTS. SPEED LIMIT SIGNING FOR THE POINT OF RESUMPTION OF THE STATUTORY SPEED LIMIT SHALL BE PAID FOR AS WORK ZONE SPEED LIMIT SIGNS.

SEE MAINTENANCE OF TRAFFIC PLANS FOR QUANTITIES.

THE FOLLOWING TABLE PROVIDES DETAILS ON WORK ZONE SPEED ZONES APPROVED FOR USE ON THIS PROJECT:

WZSV	REVISION	COUNTY & ROUTE	SLM FROM TO	PHASE/PART & DIRECTION	APPROVED SPEED LIMIT(MPH)	SPECIFIC WARRANTING CONDITIONS & FACTORS
WZ-	45037	CLE/SR 125	12.8 14.4	1&2 (EB & WB)	45	REDUCE MOT/MULT. DRIVES
WZ-						
WZ-						
WZ-						

ITEM 614 - WORK ZONE RAISED PAVEMENT MARKER, AS PER PLAN

WORK ZONE RAISED PAVEMENT MARKERS, AS PER PLAN, AND THEIR INSTALLATION SHALL CONFORM TO CMS 614 OR CMS 621 AS SPECIFIED HEREIN.

RAISED PAVEMENT MARKERS IN USE DURING THE SNOW-PLOWING SEASON SHALL CONFORM TO 621.

RAISED PAVEMENT MARKERS IN USE DURING THE NON-SNOW-PLOW SEASON SHALL CONFORM TO EITHER 614 OR TO 621.

THE SNOW-PLOWING SEASON SHALL RUN FROM DECEMBER THROUGH FEBRUARY.

IF PROJECT DELAYS, NOT THE FAULT OF ODOT, CAUSE THE WORK TO EXTEND INTO THE SNOW-PLOWING SEASON, THE CONTRACTOR SHALL BE RESPONSIBLE FOR REPLACING WORK ZONE RAISED PAVEMENT MARKERS (WZRPMS) CONFORMING TO CMS 614, WITH RAISED PAVEMENT MARKERS CONFORMING TO 621, AS DETERMINED BY THE ENGINEER, AT THE CONTRACTOR'S EXPENSE.

THIS ITEM SHALL INCLUDE PURCHASE, INSTALLATION AND REMOVAL OF ITEM 614 WORK ZONE RAISED PAVEMENT MARKER, AS PER PLAN, INCLUDING FILLING OF ANY DEPRESSIONS CREATED IN THE PAVEMENT AS PER CMS 621.08.

SEE MAINTENANCE OF TRAFFIC PLANS FOR WORK ZONE RAISED PAVEMENT MARKER QUANTITIES.

FULLY-ACTUATED OPERATION OF WORK ZONE TRAFFIC SIGNAL

THE WORK ZONE SIGNAL CONTROL REQUIRED FOR THIS PROJECT AND SHOWN ON SHEETS 14 & 15 AND TRAFFIC SCDS MT-96.11, 96.20 AND 96.26 SHALL BE FULLY TRAFFIC-ACTUATED AND OPERATE IN A MANNER SIMILAR TO THAT DESCRIBED IN SECTION 733.02 OF THE CONSTRUCTION AND MATERIAL SPECIFICATIONS.

THE INITIAL CONTROLLER TIMING SHALL BE AS FOLLOWS:

	PHASE *			
	1	2	3	4
	(All Red)	Mainline	(All Red)	Mainline
	Dummy Phase (direction)		Dummy Phase (direction)	
MIN. GREEN EXTENSION	Tlc1-6+/-	10	Tlc3-6+/-	10
MAX. GREEN	Tlc1-5+/-	30	Tlc2-5+/-	30
YELLOW	3	3.5	3	3.5
ALL RED	2	2	2	2
RECALL	MAX.	MIN.	MAX.	MIN.

*PHASES AS SHOWN ON TRAFFIC SCD MT-96.20 FOR ACTUATED CONTROL. ADD MORE PHASES AS NEEDED TO ACCOMMODATE SIDE STREETS, DRIVEWAYS, ETC.

+/- PROVIDE TIMING FOR THE SIGNAL LOCATION UNDER CONSIDERATION.

Tlc1 IS THE DESIRED INTERNAL CLEARANCE TIME FOR PHASE 1. Tlc3 IS THE DESIRED INTERNAL CLEARANCE TIME FOR PHASE 3. USUALLY, Tlc1=Tlc3.

1 INDICATE DIRECTION OF GREEN.

THE CONTRACTOR SHALL ALSO DESIGN, FURNISH, INSTALL AND MAINTAIN A TRAFFIC DETECTOR ON EACH TRAFFIC APPROACH WHICH WILL RELIABLY DETECT ALL LEGAL TRAFFIC APPROACHING (BUT NOT LEAVING) THE SIGNAL AS IT PASSES OR WAITS IN THE DESIGNATED DETECTOR ZONE SHOWN IN THE PLANS. DETECTOR DESIGNS WHICH DO NOT PROVIDE RELIABLE DETECTION, FREE FROM FALSE CALLS, SHALL BE IMMEDIATELY REPLACED BY THE CONTRACTOR.

WORK ZONE INCREASED PENALTIES SIGN (R11-H5A)

R11-H5A-48 SIGNS SHALL BE FURNISHED, ERECTED, AND MAINTAINED IN GOOD CONDITION AND/OR REPLACED AS NECESSARY AND SUBSEQUENTLY REMOVED BY THE CONTRACTOR. SIGNS SHALL BE MOUNTED AT THE APPROPRIATE OFFSETS AND ELEVATIONS AS PRESCRIBED BY THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES. THEY SHALL BE MAINTAINED ON SUPPORTS MEETING CURRENT SAFETY CRITERIA.

THE SIGNS MAY BE ERECTED OR UNCOVERED NO MORE THAN FOUR HOURS BEFORE THE ACTUAL START OF WORK. THE SIGNS SHALL BE REMOVED OR COVERED NO LATER THAN FOUR HOURS FOLLOWING RESTORATION OF ALL LANES TO TRAFFIC WITH NO RESTRICTIONS, OR SOONER AS DIRECTED BY THE ENGINEER. TEMPORARY SIGN COVERING AND UNCOVERING DUE TO TEMPORARY LANE RESTORATIONS SHALL BE GUIDED BY THE FOUR-HOUR LIMITATIONS STATED ABOVE. SUCH LANE RESTORATIONS SHOULD BE EXPECTED TO REMAIN IN EFFECT FOR 30 OR MORE CONSECUTIVE CALENDAR DAYS, SUCH AS DURING WINTER SHUTDOWNS.

(THE SIGNS ON THE MAINLINE SHALL BE DUAL MOUNTED UNLESS NOT PHYSICALLY POSSIBLE. THE FIRST SIGN SHALL BE PLACED BETWEEN THE ROAD WORK AHEAD (W20-1) SIGN AND THE NEXT SIGN IN THE SEQUENCE. SIGNS SHALL BE ERECTED ON EACH ENTRANCE RAMP AND EVERY 2 MILES THROUGH THE CONSTRUCTION WORK LIMITS. SIGNS ON THE MAINLINE SHALL BE R11-H5A-48. SIGNS USED ON THE RAMPS SHALL BE R11-H5A-24. R11-H5A-24 SIGNS MAY BE USED IN THE MEDIAN IN LIEU OF R11-H5A-48 SIGNS IF IT IS NOT PHYSICALLY POSSIBLE TO PROVIDE R11-H5A-48 SIGNS IN THE MEDIAN.)

THE CONTRACTOR MAY USE SIGNS AND SUPPORTS IN USED, BUT GOOD, CONDITION PROVIDED THE SIGNS MEET CURRENT ODOT SPECIFICATIONS. SIGN FACES SHALL BE RETROREFLECTORIZED WITH TYPE G SHEETING COMPLYING WITH THE REQUIREMENTS OF CMS 730.19.

WORK ZONE INCREASED PENALTIES SIGNS AND SUPPORTS WILL BE MEASURED AS THE NUMBER OF SIGN INSTALLATIONS, INCLUDING THE SIGN AND NECESSARY SUPPORTS. IF A SIGN AND SUPPORT COMBINATION IS REMOVED AND REERECTED AT ANOTHER LOCATION AS DIRECTED BY THE ENGINEER, IT SHALL BE CONSIDERED ANOTHER UNIT.

PAYMENT FOR ACCEPTED QUANTITIES, COMPLETE, IN PLACE WILL BE MADE AT THE CONTRACT UNIT PRICE. PAYMENT SHALL BE FULL COMPENSATION FOR ALL MATERIALS, LABOR, INCIDENTALS AND EQUIPMENT FOR FURNISHING, ERECTING, MAINTAINING, COVERING DURING SUSPENSION OF WORK, AND REMOVAL OF THE SIGN AND SUPPORT.

SEE MAINTENANCE OF TRAFFIC PLANS FOR ESTIMATED QUANTITIES.

WORK ZONE INCREASED PENALTIES SIGNS WILL BE PLACED AT THE FOLLOWING LOCATIONS:

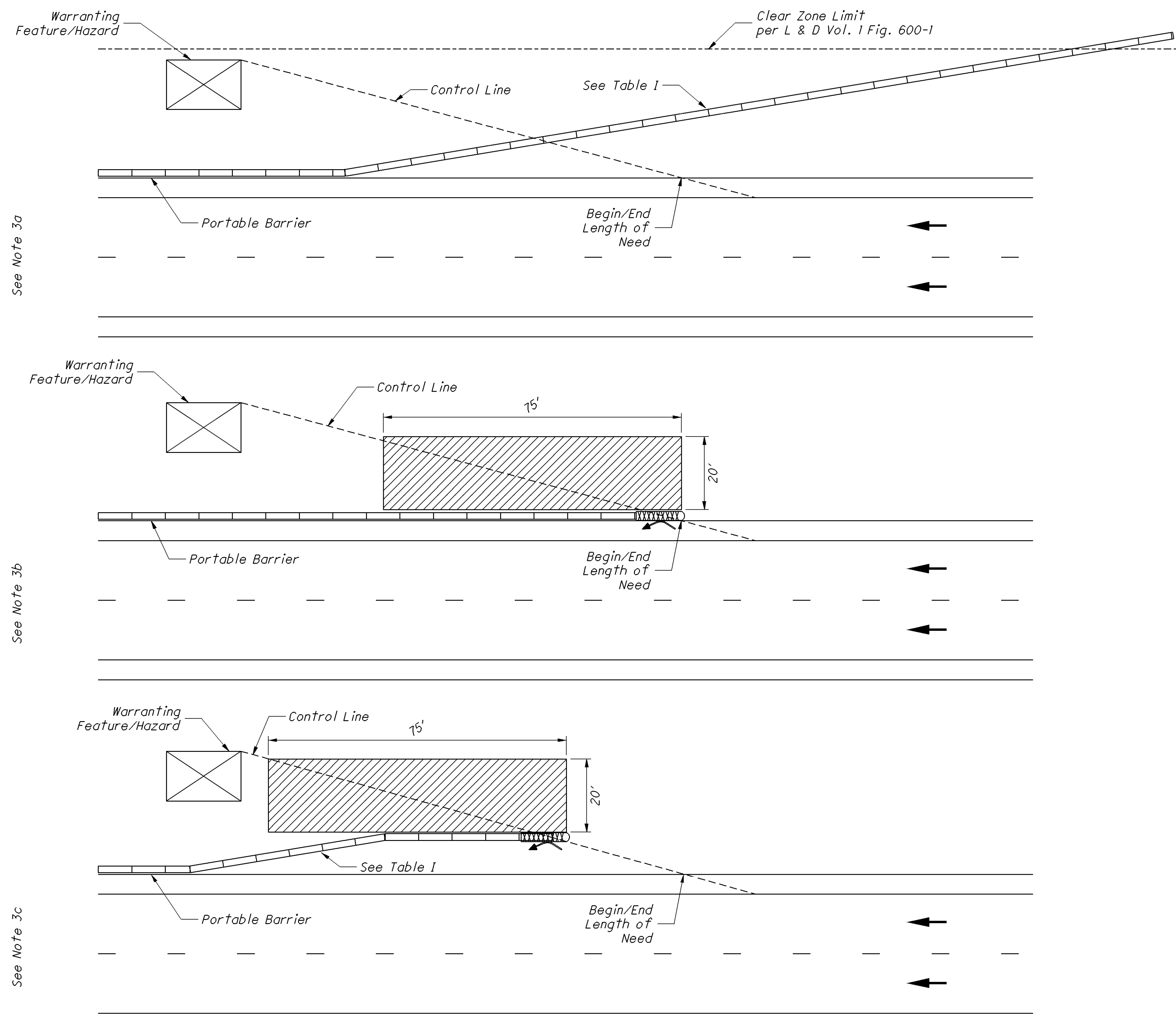
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MAINTENANCE OF TRAFFIC

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See Note 3a

See Note 3b

See Note 3c

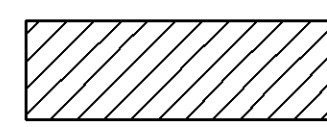
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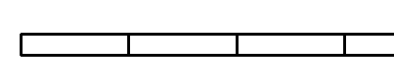
1. Attenuators shall be installed per the manufacturer's specifications.
2. Recovery area shall have slopes 3:1 or flatter and be free of workers, hazards, equipment, drop-offs, and material storage.
3. The Contractor shall select one of the three acceptable options for terminating portable barrier:
 - a) Terminate flared section of portable barrier outside clear zone with tapered end only where cross slopes are 10:1 or flatter.
 - b) Terminate portable barrier with an impact attenuator. A non-gating attenuator may be included in the length of need measurement.
 - c) Flare a section of portable barrier to the length of need control line and terminate with an impact attenuator. A non-gating impact attenuator may be included in the flared section of portable barrier.
4. The Contractor shall submit documentation to the Engineer, 2 weeks prior to implementation, for acceptance when:
 - a) Deviating from the three acceptable options for terminating portable barrier.
Documentation shall explain any deviations and verify that the recovery area fulfills the manufacturer's specifications and Note 2.
 - b) Using a gating impact attenuator in lieu of a non-gating impact attenuator.
The gating impact attenuator length shall not be included as part of the length of need or recovery area requirements. Additional portable barrier will need to be added. The additional cost for the additional barrier required for a gating impact attenuator shall be included in the cost of the gating impact attenuator.
Documentation shall verify that the extended recovery area fulfills the manufacturer's specifications and Note 2.
5. Gating impact attenuators shall not be used in gore locations or within the clear zone between bi-directional traffic.


TABLE 1


SPEED LIMIT (MPH)	PB FLARE RATE MINIMUM
25	8:1
30	8:1
35	9:1
40	10:1
45	12:1
50	14:1
55	16:1
60	18:1
65	19:1
70	20:1

LEGEND

RECOVERY AREA 

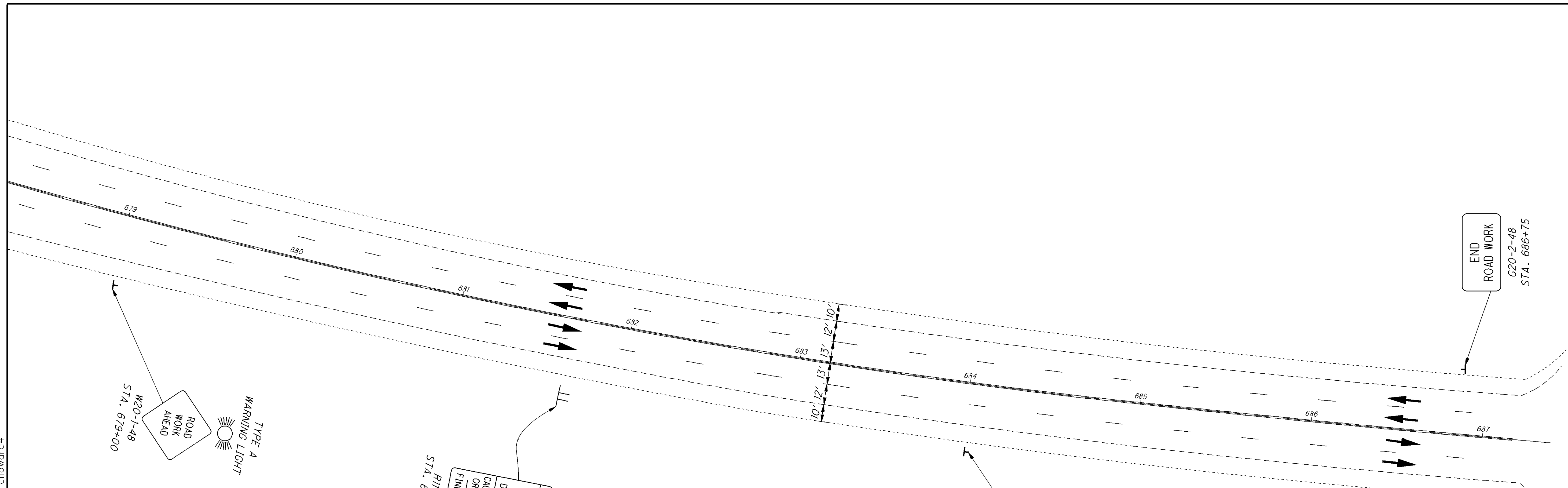
PORTABLE BARRIER 

NON-GATING IMPACT ATTENUATOR 

DIRECTION OF TRAVEL 

THIS DRAWING REPLACES PIS 2010175 DATED 7-20-2012.

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NOTES:

1. PRIOR TO PHASE ONE, REPLACE ALL SHOULDER PAVEMENT BETWEEN STA. 700+00 AND STA. 735+00 PER CMS 615. CLOSE SHOULDER AND OUTSIDE LANE(S) PER STD. DWG. MT-95.31.
2. SHOULDER PAVEMENT SHALL MEET ALL REQUIREMENTS FOR CLASS B FLEXIBLE PAVEMENT (13.75" THICK).
3. ANY SUBGRADE COMPACTION OR EARTHWORK REQUIRED TO COMPLETE THE SHOULDER WORK SHALL BE INCLUDED WITH ITEM 615 - ROADS FOR MAINTAINING TRAFFIC FOR PAYMENT.
4. ONCE CONSTRUCTION IS COMPLETED, ITEM 615 SHOULDER PAVEMENT SHALL BE LEFT IN PLACE.
5. PROVIDE WORK ZONE RAISED PAVEMENT MARKERS AT ALL LANE SHIFTS AND FOR 300 FEET BEYOND THE LANE SHIFT. RPM SPACING AT THESE LOCATIONS SHALL BE 20 FEET.

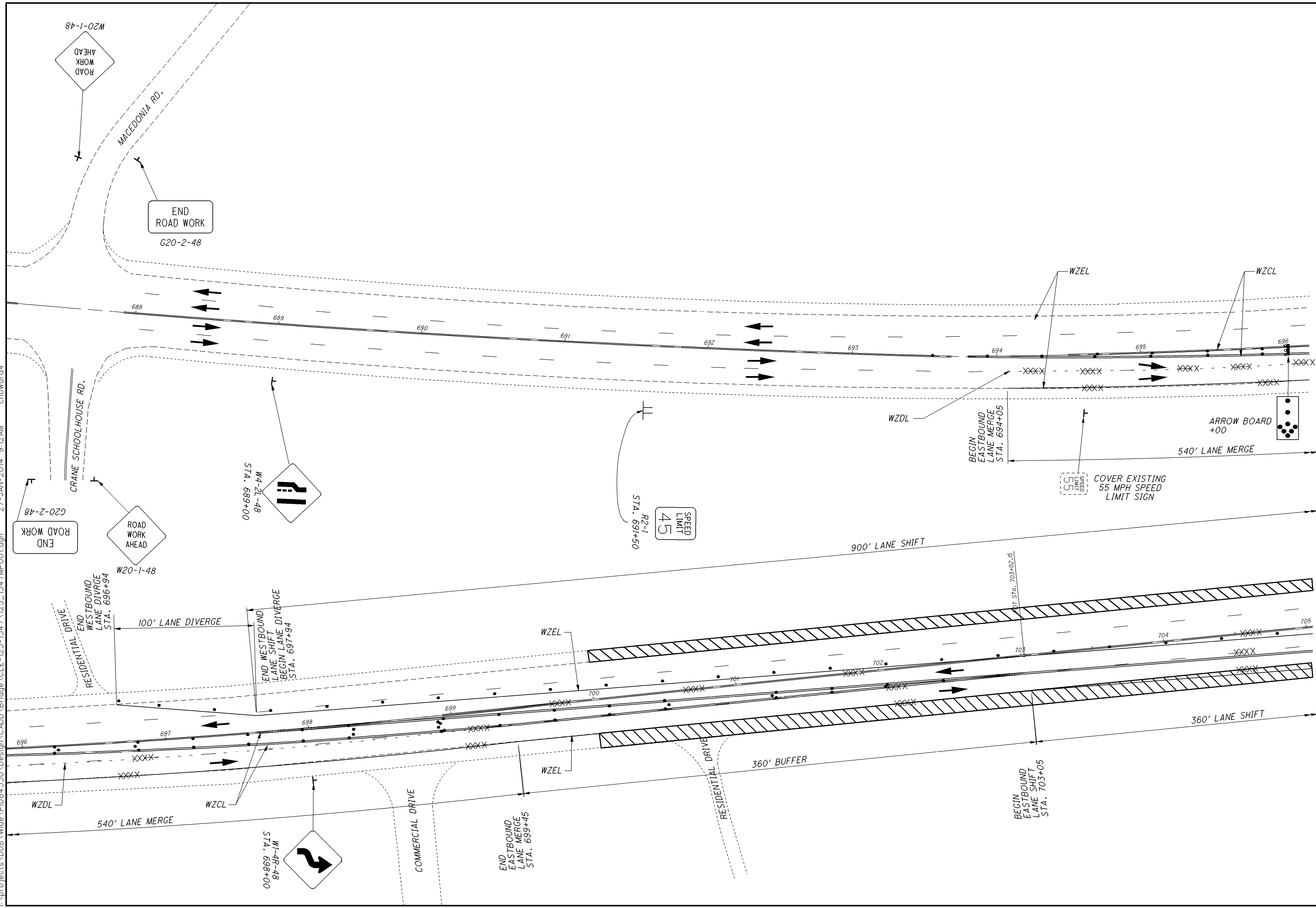
MAINTENANCE OF TRAFFIC: PHASE 1 SUB-SUMMARY			
ITEM	TOTAL	UNIT	DESCRIPTION
202	8,002	SQ YD	PAVEMENT REMOVED, ASPHALT
614	12	EACH	BARRIER REFLECTOR, TYPE B2
614	12	EACH	OBJECT MARKER, TWO WAY
614	1	MILE	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I
614	2	MILE	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I
614	1,080	FEET	WORK ZONE DOTTED LINE, CLASS I, 740.06, TYPE I
614	250	EACH	WORK ZONE RAISED PAVEMENT MARKER, AS PER PLAN
614	2	EACH	WORK ZONE IMPACT ATTENUATOR (BI-DIRECTIONAL)
614	20	EACH	REPLACEMENT DRUM
614	1	EACH	WORK ZONE SPEED LIMIT SIGN
614	1	EACH	SPEED ZONE AHEAD SYMBOL SIGN
614	1	EACH	WORK ZONE INCREASED PENALTIES SIGN
615	8,002	SQ YD	PAVEMENT FOR MAINTAINING TRAFFIC, AS PER PLAN
615		LUMP	ROADS FOR MAINTAINING TRAFFIC
622	435	FEET	PORTABLE BARRIER, 32"
622	175	FEET	PORTABLE BARRIER, 32" BRIDGE MOUNTED
630	8	SO FT	COVERING OF SIGN
TOTALS CARRIED TO THE GENERAL SUMMARY			

TABLE I (SIGN SPACING)

SIGNED SPEED LIMIT = 55 MPH
 MOT SPEED LIMIT = 45 MPH
 $L = W * S = 12 * 45 = 540 \text{ FT}$
 A = 500 FT
 B = 500 FT
 C = 500 FT

LEGEND	
	WORK AREA
	PAVEMENT FOR MAINTAINING TRAFFIC, AS PER PLAN (PLACED PRIOR TO PHASE ONE)
	PORTABLE CONCRETE BARRIER (PCB)
	IMPACT ATTENUATOR
	EXIST. PAVEMENT MARKING REMOVED
	DRUMS
	DIRECTION OF TRAVEL
WZEL	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I
WZCL	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I (DOUBLE SOLID)
WZDL	WORK ZONE DOTTED LINE, CLASS I, 740.06, TYPE I

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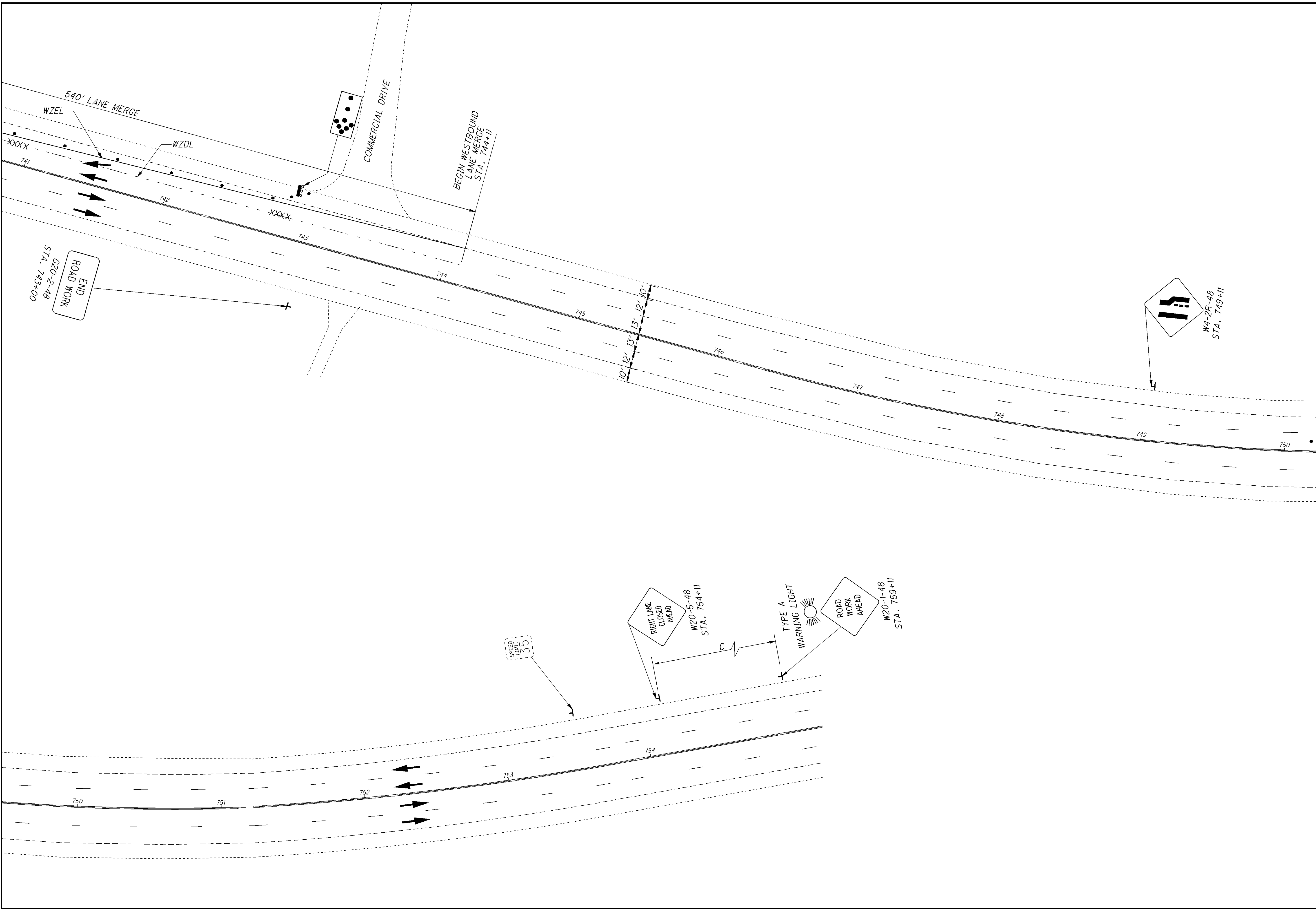
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HORIZONTAL
SCALE IN FEET

PHASE ONE MAINTENANCE OF TRAFFIC - 2
CLE-125-1347 STA. 687+50 TO STA. 705+00

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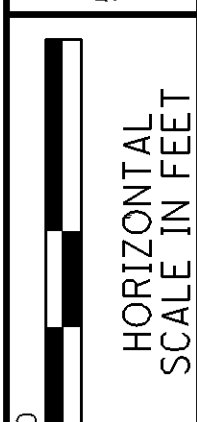
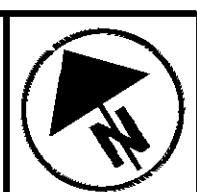


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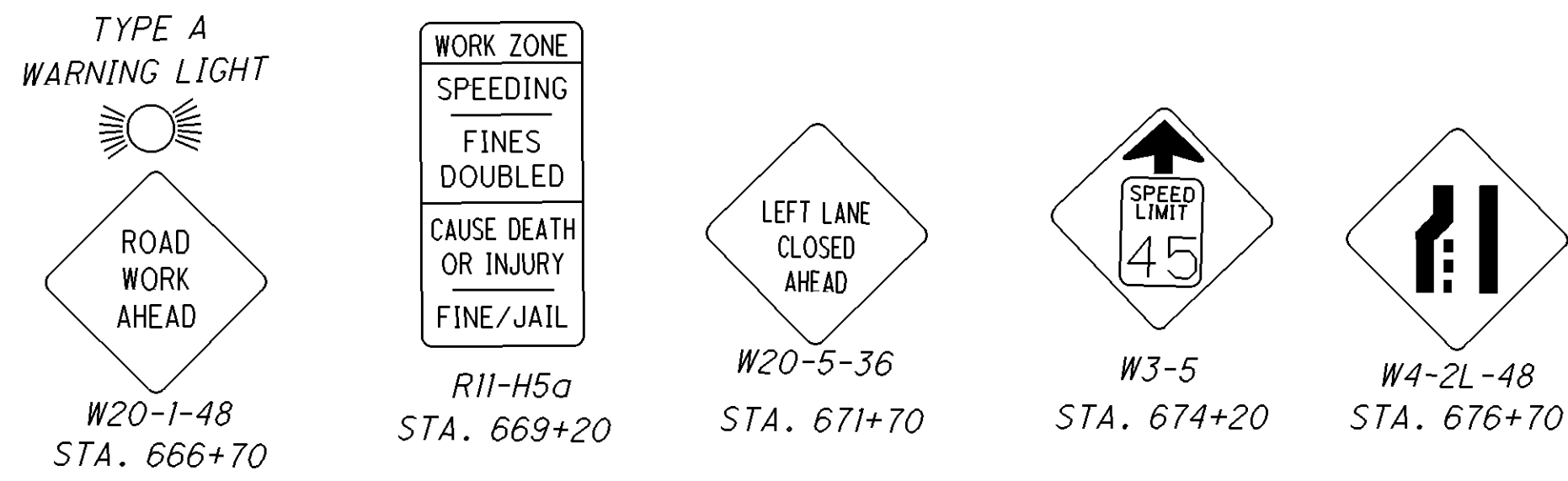
PHASE ONE MAINTENANCE OF TRAFFIC - 5
CLE-125-1347 STA. 741+00 TO STA. 754+00

D08-BM-2014

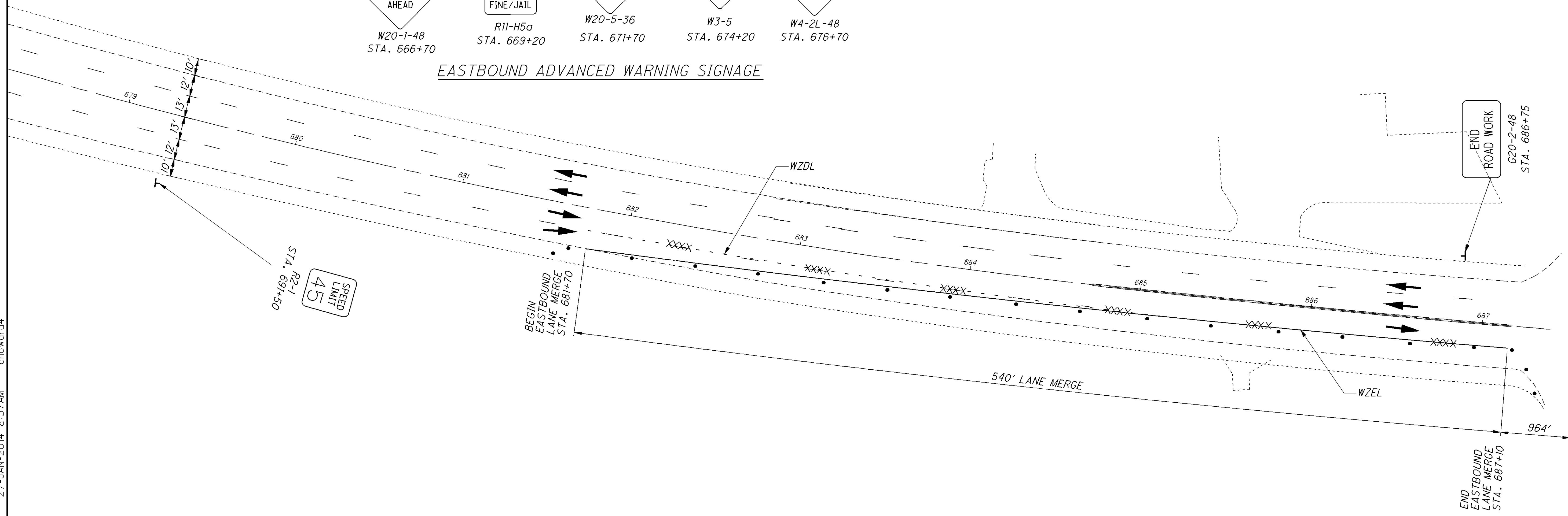
10A
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EASTBOUND ADVANCED WARNING SIGNAGE



NOTES:

1. MAINTAIN SHOULDER PAVEMENT PLACED PRIOR TO PHASE ONE BETWEEN STA. 700+00 AND STA. 735+00.
2. PROVIDE WORK ZONE RAISED PAVEMENT MARKERS AT ALL LANE SHIFTS AND FOR 300 FEET BEYOND THE LANE SHIFT. RPM SPACING AT THESE LOCATIONS SHALL BE 20 FEET.

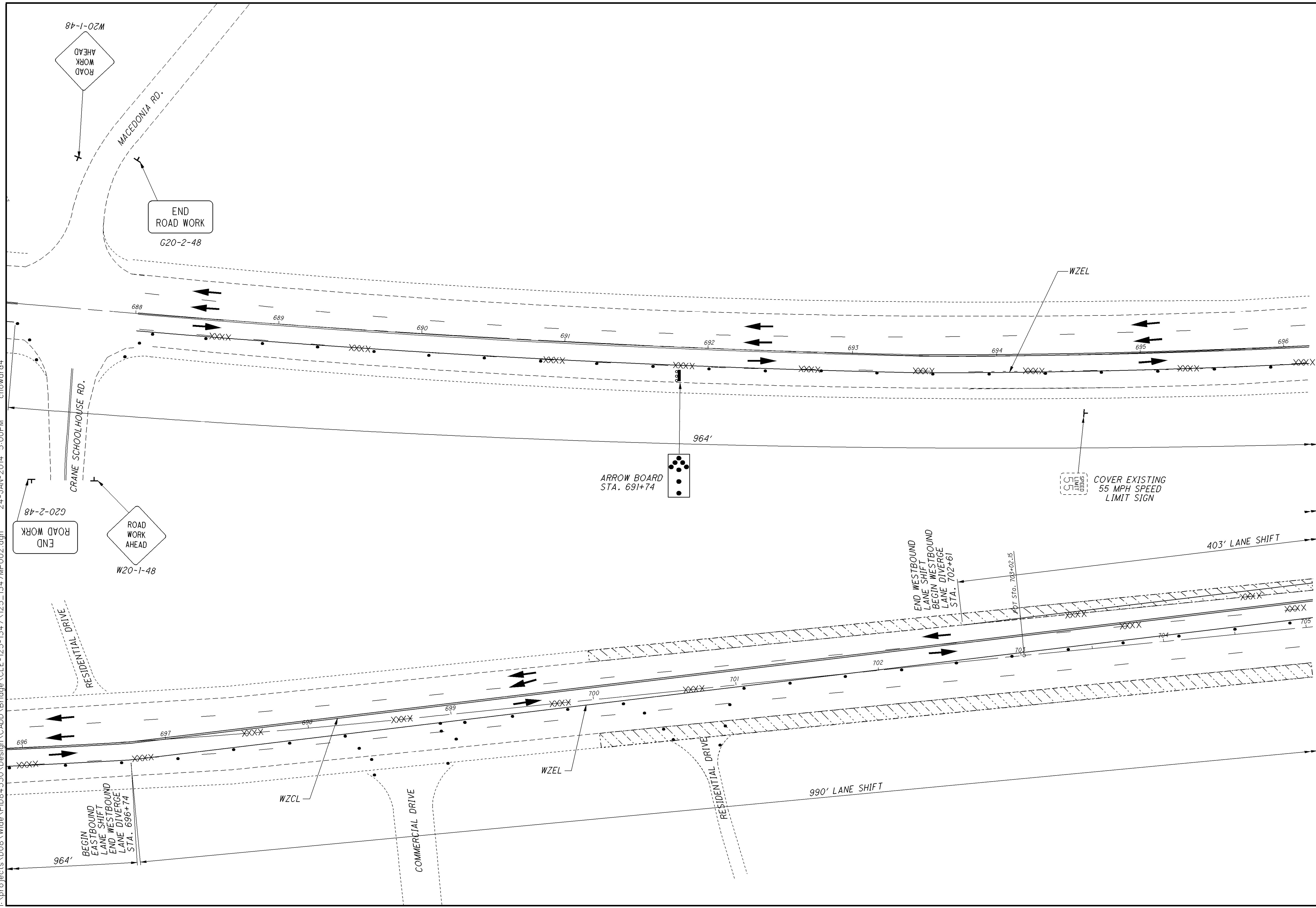
MAINTENANCE OF TRAFFIC: PHASE 2 SUB-SUMMARY			
ITEM	TOTAL	UNIT	DESCRIPTION
614	12	EACH	BARRIER REFLECTOR, TYPE B2
614	12	EACH	OBJECT MARKER, TWO-WAY
614	1	MILE	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I
614	2	MILE	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I
614	1,080	FEET	WORK ZONE DOTTED LINE, CLASS I, 740.06, TYPE I
614	250	EACH	WORK ZONE RAISED PAVEMENT MARKER, AS PER PLAN
614	2	EACH	WORK ZONE IMPACT ATTENUATOR (BI-DIRECTIONAL)
614	20	EACH	REPLACEMENT DRUM
614	1	EACH	WORK ZONE SPEED LIMIT SIGN
614	1	EACH	SPEED ZONE AHEAD SYMBOL SIGN
614	1	EACH	WORK ZONE INCREASED PENALTIES SIGN
622	435	FEET	PORTABLE BARRIER, 32"
622	175	FEET	PORTABLE BARRIER, 32" BRIDGE MOUNTED
630	8	SQ FT	COVERING OF SIGN
TOTALS CARRIED TO THE GENERAL SUMMARY			

TABLE I (SIGN SPACING)

SIGNED SPEED LIMIT = 55 MPH
 MOT SPEED LIMIT = 45 MPH
 $L = W * S = 12 * 45 = 540 \text{ FT}$
 A = 500 FT
 B = 500 FT
 C = 500 FT

LEGEND	
	WORK AREA
	PAVEMENT FOR MAINTAINING TRAFFIC, AS PER PLAN (PLACED PRIOR TO PHASE ONE)
	PORTABLE CONCRETE BARRIER (PCB)
	IMPACT ATTENUATOR
	EXIST. PAVEMENT MARKING REMOVED
	DRUMS
	DIRECTION OF TRAVEL
WZEL	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I
WZCL	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I (DOUBLE SOLID)
WZDL	WORK ZONE DOTTED LINE, CLASS I, 740.06, TYPE I

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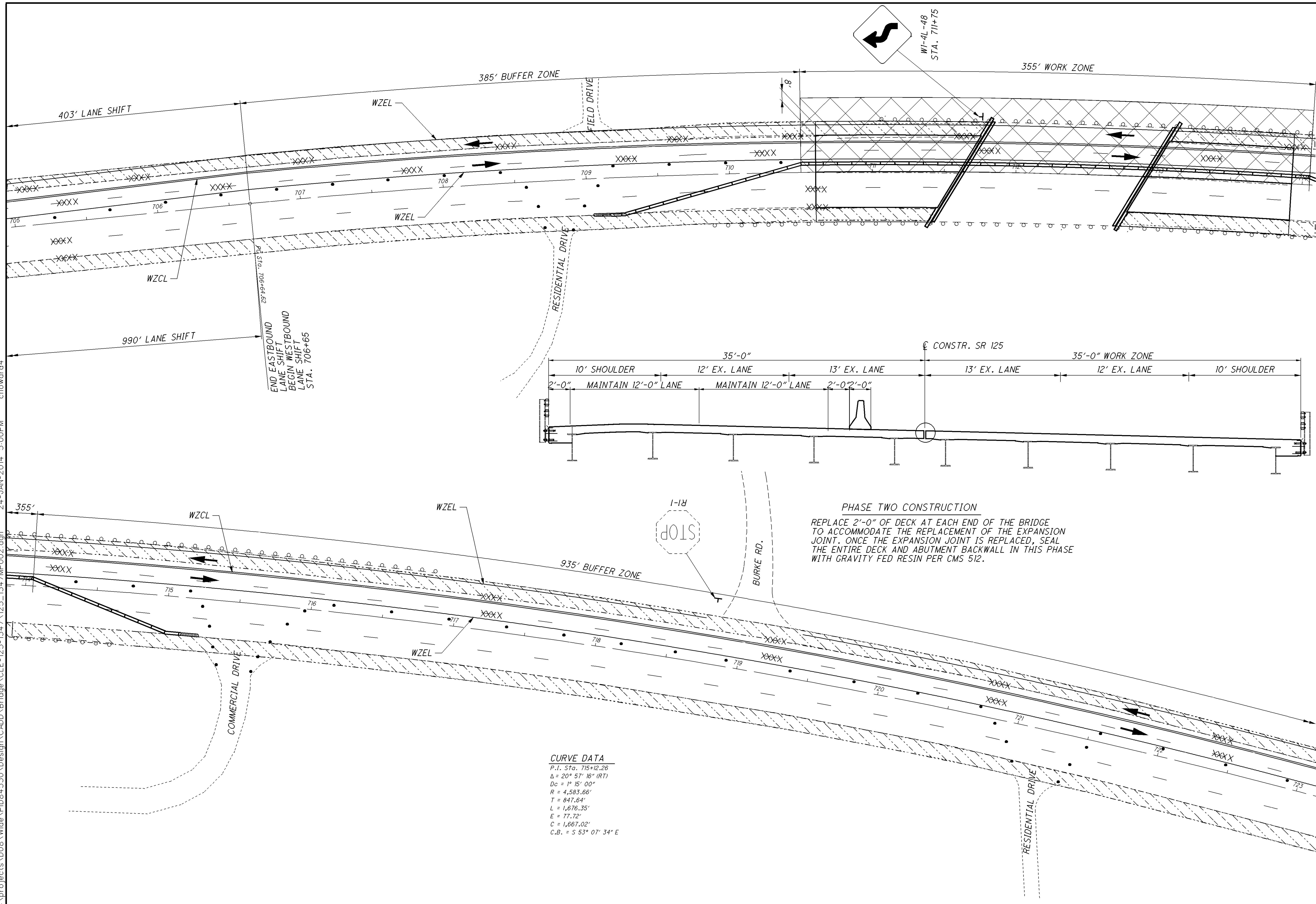
HORIZONTAL SCALE IN FEET

PHASE TWO MAINTENANCE OF TRAFFIC - 2
CLE-125-1347 STA. 687+50 TO STA. 705+00

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CURVE DATA
 P.I. Sta. 715+12.26
 $\Delta = 20^\circ 57' 16''$ (RT)
 $D_c = 1^\circ 15' 00''$
 $R = 4,593.66'$
 $T = 847.64'$
 $L = 1,676.35'$
 $E = 77.72'$
 $C = 1,667.02'$
 $C.B. = S 53^\circ 07' 34'' E$

PHASE TWO CONSTRUCTION
 REPLACE 2'-0" OF DECK AT EACH END OF THE BRIDGE TO ACCOMMODATE THE REPLACEMENT OF THE EXPANSION JOINT. ONCE THE EXPANSION JOINT IS REPLACED, SEAL THE ENTIRE DECK AND ABUTMENT BACKWALL IN THIS PHASE WITH GRAVITY FED RESIN PER CMS 512.

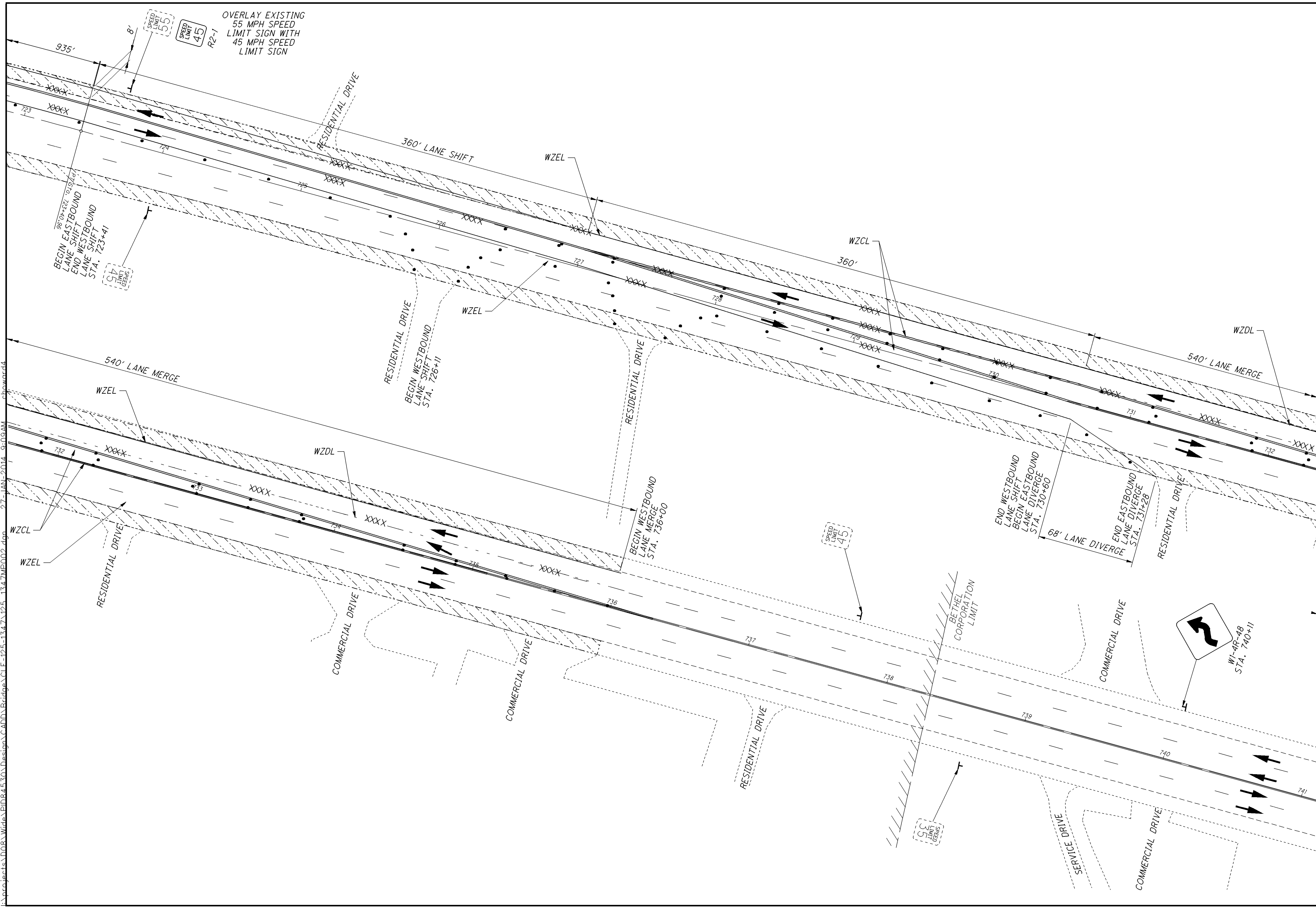
CALCULATED
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HORIZONTAL SCALE IN FEET

PHASE TWO MAINTENANCE OF TRAFFIC - 3
CLE-125-1347 STA. 705+00 TO STA. 723+00

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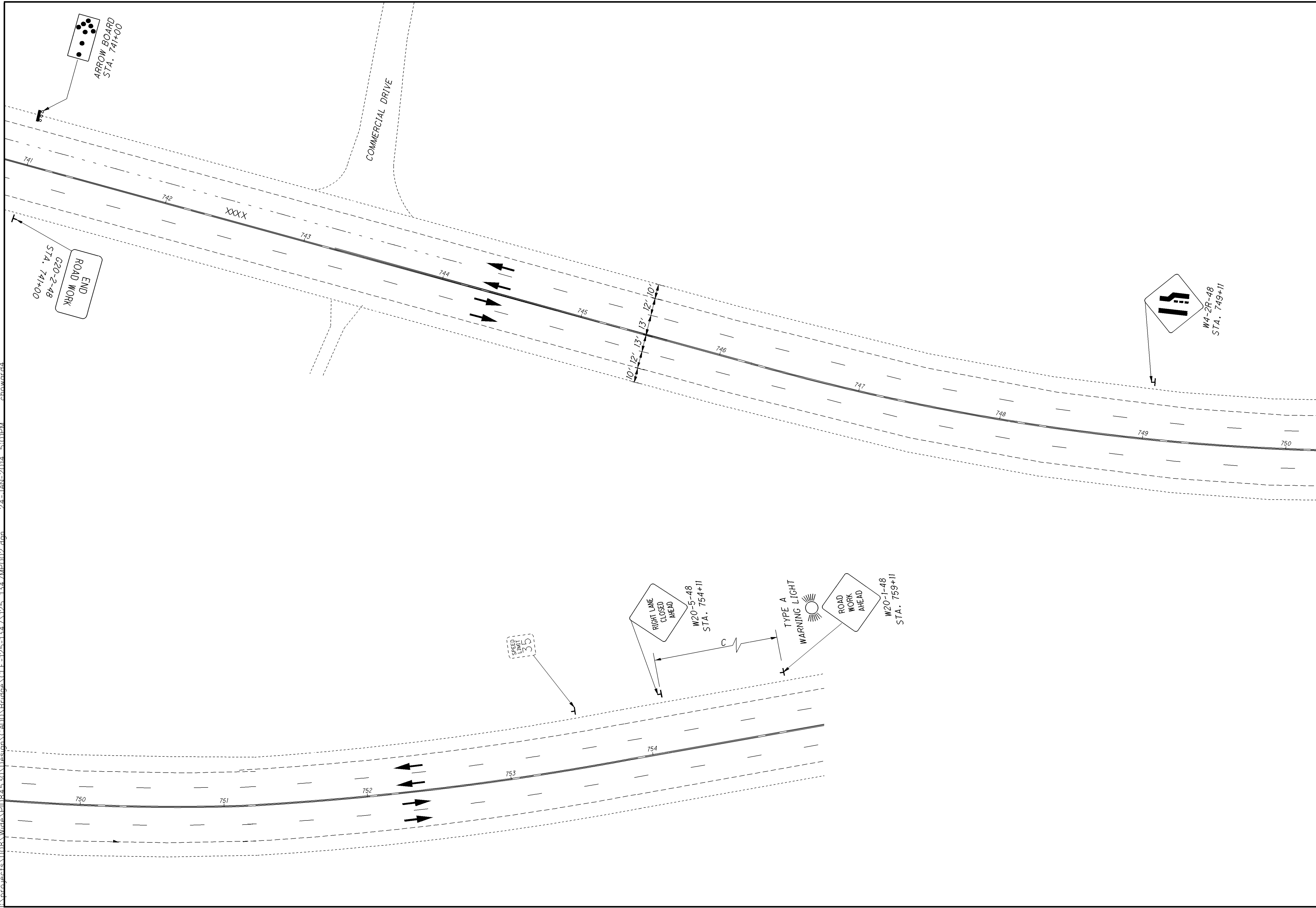


CALCULATED
CHECKED

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HORIZONTAL
SCALE IN FEET

PHASE TWO MAINTENANCE OF TRAFFIC - 4
CLE-125-1347 STA. 723+00 TO STA. 741+00

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CALCULATED	0
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HORIZONTAL SCALE IN FEET

PHASE TWO MAINTENANCE OF TRAFFIC - 5
CLE-125-1347 STA. 741+00 TO STA. 754+00

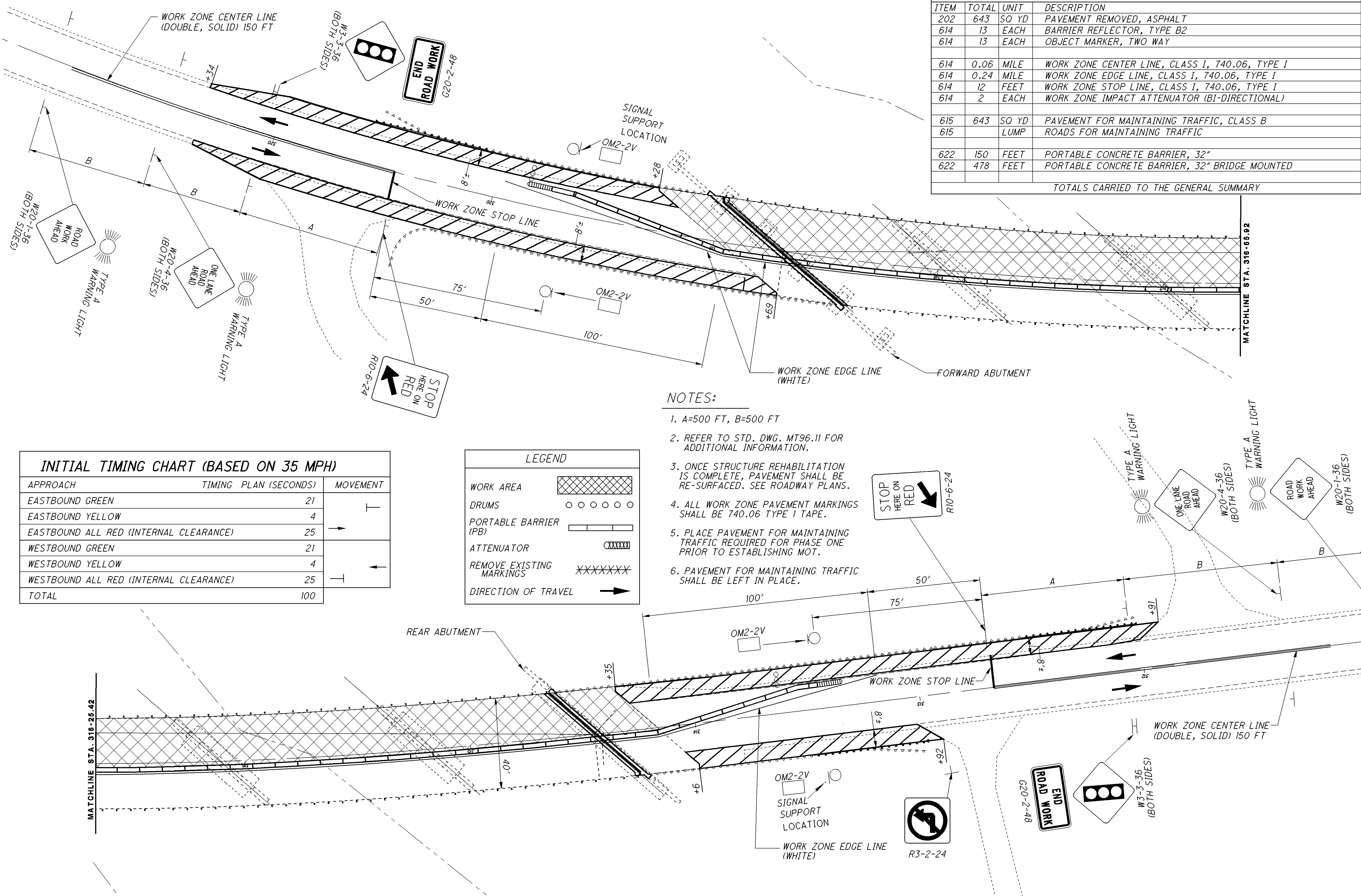
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MAINTENANCE OF TRAFFIC: PHASE 1 SUB-SUMMARY			
ITEM	TOTAL	UNIT	DESCRIPTION
202	643	SQ YD	PAVEMENT REMOVED, ASPHALT
614	13	EACH	BARRIER REFLECTOR, TYPE B2
614	13	EACH	OBJECT MARKER, TWO WAY
614	0.06	MILE	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I
614	0.24	MILE	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I
614	12	FEET	WORK ZONE STOP LINE, CLASS I, 740.06, TYPE I
614	2	EACH	WORK ZONE IMPACT ATTENUATOR (BI-DIRECTIONAL)
615	643	SQ YD	PAVEMENT FOR MAINTAINING TRAFFIC, CLASS B
615		LUMP	ROADS FOR MAINTAINING TRAFFIC
622	150	FEET	PORTABLE CONCRETE BARRIER, 32"
622	478	FEET	PORTABLE CONCRETE BARRIER, 32" BRIDGE MOUNTED
TOTALS CARRIED TO THE GENERAL SUMMARY			

D08 - BM - FY 2015
 MAINTENANCE OF TRAFFIC PLAN - PHASE 1
 WAR-123-0598 OVER TODD CREEK
 14
 60



- NOTES:**
1. A=500 FT, B=500 FT
 2. REFER TO STD. DWG. MT96.11 FOR ADDITIONAL INFORMATION.
 3. ONCE STRUCTURE REHABILITATION IS COMPLETE, PAVEMENT SHALL BE RE-SURFACED. SEE ROADWAY PLANS.
 4. ALL WORK ZONE PAVEMENT MARKINGS SHALL BE 740.06 TYPE I TAPE.
 5. PLACE PAVEMENT FOR MAINTAINING TRAFFIC REQUIRED FOR PHASE ONE PRIOR TO ESTABLISHING MOT.
 6. PAVEMENT FOR MAINTAINING TRAFFIC SHALL BE LEFT IN PLACE.

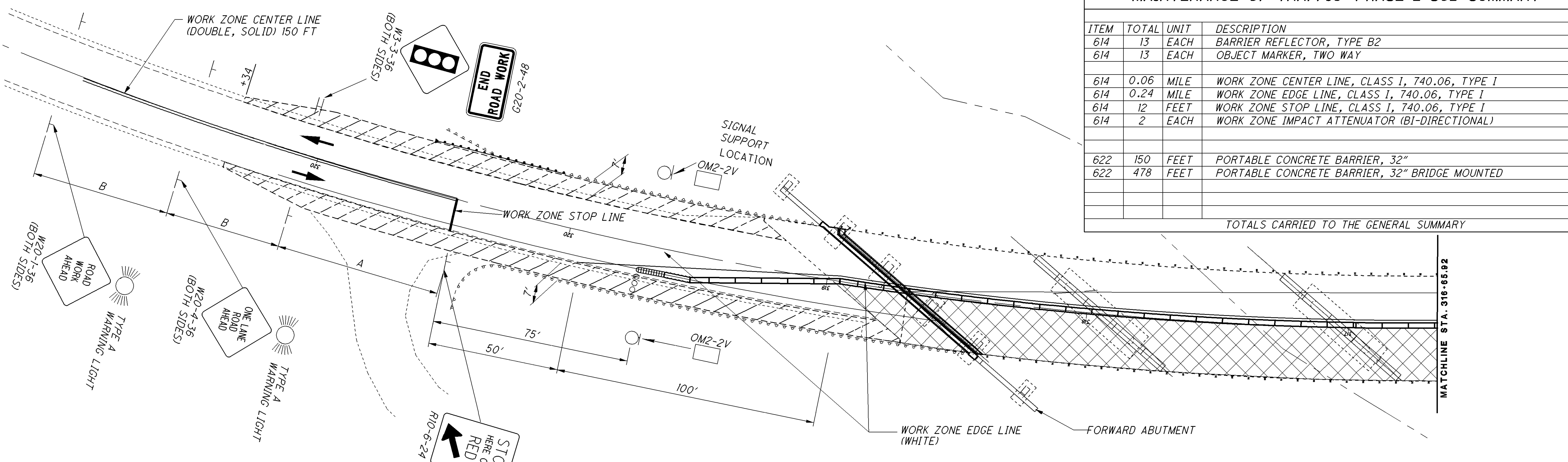
APPROACH	TIMING PLAN (SECONDS)	MOVEMENT
EASTBOUND GREEN	21	T
EASTBOUND YELLOW	4	
EASTBOUND ALL RED (INTERNAL CLEARANCE)	25	→
WESTBOUND GREEN	21	←
WESTBOUND YELLOW	4	
WESTBOUND ALL RED (INTERNAL CLEARANCE)	25	T
TOTAL	100	

WORK AREA	
DRUMS	
PORTABLE BARRIER (PB)	
ATTENUATOR	
REMOVE EXISTING MARKINGS	
DIRECTION OF TRAVEL	

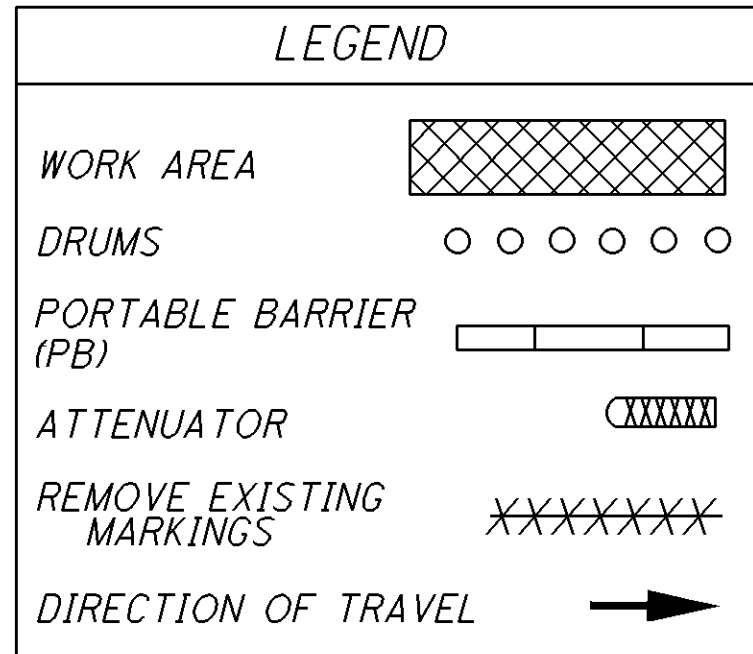


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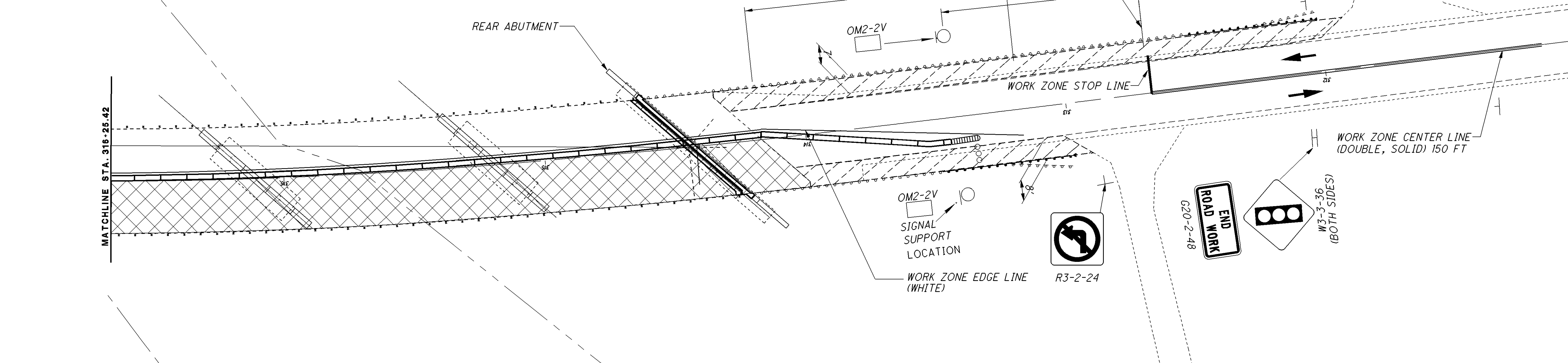
MAINTENANCE OF TRAFFIC: PHASE 2 SUB-SUMMARY			
ITEM	TOTAL	UNIT	DESCRIPTION
614	13	EACH	BARRIER REFLECTOR, TYPE B2
614	13	EACH	OBJECT MARKER, TWO WAY
614	0.06	MILE	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I
614	0.24	MILE	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I
614	12	FEET	WORK ZONE STOP LINE, CLASS I, 740.06, TYPE I
614	2	EACH	WORK ZONE IMPACT ATTENUATOR (BI-DIRECTIONAL)
622	150	FEET	PORTABLE CONCRETE BARRIER, 32"
622	478	FEET	PORTABLE CONCRETE BARRIER, 32" BRIDGE MOUNTED
TOTALS CARRIED TO THE GENERAL SUMMARY			



APPROACH	TIMING PLAN (SECONDS)	MOVEMENT
EASTBOUND GREEN	21	→
EASTBOUND YELLOW	4	
EASTBOUND ALL RED (INTERNAL CLEARANCE)	25	←
WESTBOUND GREEN	21	
WESTBOUND YELLOW	4	
WESTBOUND ALL RED (INTERNAL CLEARANCE)	25	←
TOTAL	100	



- NOTES:
- A=500 FT, B=500 FT
 - REFER TO STD. DWG. MT96.11 FOR ADDITIONAL INFORMATION.
 - ONCE STRUCTURE REHABILITATION IS COMPLETE, PAVEMENT SHALL BE RE-SURFACED. SEE ROADWAY PLANS.
 - ALL WORK ZONE PAVEMENT MARKINGS SHALL BE 740.06 TYPE I TAPE.
 - PAVEMENT FOR MAINTAINING TRAFFIC SHALL BE LEFT IN PLACE.



MAINTENANCE OF TRAFFIC PLAN - PHASE 2
 WAR-123-0598 OVER TODD CREEK

D08 - BM - FY 2015

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SHEET NUMBER										PARTICIPATION				ITEM	ITEM EXT.	GRAND TOTAL	UNIT	DESCRIPTION	SEE SHEET NO.
3	6	8	11	14	15	17	18	38	01/NHS/BR	02/S>2/BR	03/NFA/BR	04/STR/BR							
																	ROADWAY		
		8002		643					8002			643	201	11001	LUMP		CLEARING AND GRUBBING, AS PER PLAN	3	
						1312.5			1200			112.5	202	23010	8645	SQ YD	PAVEMENT REMOVED, ASPHALT		
						1						1	202	38000	1312.5	FT	GUARDRAIL REMOVED		
						7			4			3	202	38700	1	EACH	GUARDRAIL POST REMOVED		
													202	42001	7	EACH	ANCHOR ASSEMBLY REMOVED, TYPE A, AS PER PLAN	3	
								20	20				203	10000	20	CU YD	EXCAVATION		
								5	5				203	20000	5	CU YD	EMBANKMENT		
						965			927.5			37.5	606	15050	965	FT	GUARDRAIL, TYPE MGS		
						1						1	606	17900	1	EACH	GUARDRAIL POST		
						5			2			3	606	26150	5	EACH	ANCHOR ASSEMBLY, MGS TYPE E	3	
						2			2				606	26550	2	EACH	ANCHOR ASSEMBLY, MGS TYPE T		
						6			6				606	35002	6	EACH	MGS BRIDGE TERMINAL ASSEMBLY, TYPE 1		
						2			2				606	35102	2	EACH	MGS BRIDGE TERMINAL ASSEMBLY, TYPE 2		
						1						1	606	98100	1	EACH	GUARDRAIL, MISC.:	3	
																	EROSION CONTROL		
								7	7				659	10000	7	SQ YD	SEEDING AND MULCHING		
								0.05	0.05				659	35000	0.05	M GAL	WATER		
									17000	4000	2000	9000	832	30000	32000	EACH	EROSION CONTROL		
																	PAVEMENT		
								14	14				204	10000	14	SQ YD	SUBGRADE COMPACTION		
							1650		1650				254	01000	1650	SQ YD	PAVEMENT PLANING, ASPHALT CONCRETE		
								3	3				304	20000	3	CU YD	AGGREGATE BASE		
						84			84				407	14000	84	GALLON	TACK COAT FOR INTERMEDIATE COURSE		
						70			70				448	47010	70	CU YD	ASPHALT CONCRETE SURFACE COURSE, TYPE 1, PG64-28		
																	TRAFFIC CONTROL		
							21		16		5		621	00100	21	EACH	RPM		
							20		15		5		621	54000	20	EACH	RAISED PAVEMENT MARKER REMOVED		
15									12			3	626	00100	15	EACH	BARRIER REFLECTOR		
						0.611			0.551	0.004	0.046	0.01	642	00090	0.611	MILE	EDGE LINE, 4"		
						0.333			0.331	0.002			642	00190	0.333	MILE	LANE LINE, 4"		
						0.201			0.17	0.002	0.023	0.006	642	00290	0.201	MILE	CENTER LINE		
						5092			4726		366		642	30000	5092	FT	REMOVAL OF PAVEMENT MARKING		
																	MAINTENANCE OF TRAFFIC		
	200								200				614	11110	200	HOOR	LAW ENFORCEMENT OFFICER WITH PATROL CAR FOR ASSISTANCE	6	
		2	2	2	2				4			4	614	12338	8	EACH	WORK ZONE IMPACT ATTENUATOR (BIDIRECTIONAL)		
		1	1						2				614	12410	2	EACH	SPEED ZONE AHEAD SYMBOL SIGN		
		1	1						2				614	12470	2	EACH	WORK ZONE SPEED LIMIT SIGN		
		1	1						2				614	12484	2	EACH	WORK ZONE INCREASED PENALTIES SIGN		
		20	20						40				614	12600	40	EACH	REPLACEMENT DRUM		
		250	250						500				614	12801	500	EACH	WORK ZONE RAISED PAVEMENT MARKER, AS PER PLAN		
																	BARRIER REFLECTOR, TYPE B2		
									24			26	614	13302	50	EACH	OBJECT MARKER, TWO WAY		
									24			26	614	13360	50	EACH			
									6				614	18600	6	SIGN	PORTABLE CHANGEABLE MESSAGE SIGN	6	
	6								2			0.12	614	21200	2.12	MILE	WORK ZONE CENTER LINE, CLASS I, 740.06, TYPE I		
		1	1	0.06	0.06				4			0.48	614	22200	4.48	MILE	WORK ZONE EDGE LINE, CLASS I, 740.06, TYPE I		
		1,080	1,080						2160				614	24400	2160	FT	WORK ZONE DOTTED LINE, CLASS I, 740.06, TYPE I		
						12	12					24	614	26400	24	FT	WORK ZONE STOP LINE, CLASS I, 740.06, TYPE I		
		LUMP		LUMP									615	10000	LUMP		ROADS FOR MAINTAINING TRAFFIC		
		8002		643					8002			643	615	25000	8645	SQ YD	PAVEMENT FOR MAINTAINING TRAFFIC, CLASS B		
																	PORTABLE BARRIER, 32"		
		435	435	150	150				870			300	622	41000	1170	FT	PORTABLE BARRIER, 32", BRIDGE MOUNTED		
		175	175	478	478				350			956	622	41020	1306	FT			
																	COVERING OF SIGN		
									16				630	83000	16	SQ FT			

GENERAL SUMMARY

D08 - BM - FY 2014

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SHEET NUMBER										PARTICIPATION				ITEM	ITEM EXT.	GRAND TOTAL	UNIT	DESCRIPTION	SEE SHEET NO.
3	6	7	8	11	14	15	17	18	38	01/NHS/BR	02/S>2/BR	03/NFA/BR	04/STR/BR						
																	STRUCTURE (20' AND OVER)	22-24	
																	INCIDENTALS		
														614	11000	LUMP	MAINTAINING TRAFFIC		
														623	10000	LUMP	CONSTRUCTION LAYOUT STAKES AND SURVEYING		
														624	10000	LUMP	MOBILIZATION		

CALCULATED	CHECKED
GENERAL SUMMARY	
D08 - BM - FY 2014	
16A	60

REF NO.	SHEET NO.	STATION		SIDE	202	202	202	606	606	606	606	606	SPECIAL	606								
		FROM	TO		ANCHOR ASSEMBLY REMOVED, TYPE A, AS PER PLAN	GUARDRAIL REMOVED	GUARDRAIL POST REMOVED	ANCHOR ASSEMBLY, MGS TYPE E	MGS BRIDGE TERMINAL ASSEMBLY, TYPE 1	MGS BRIDGE TERMINAL ASSEMBLY, TYPE 2	GUARDRAIL, TYPE MGS	GUARDRAIL POST	GUARDRAIL - MISC.; RE-ATTACH GUARDRAIL POST	ANCHOR ASSEMBLY, MGS TYPE T								
					EACH	FT	EACH	EACH	EACH	FT	EACH	EACH	EACH									
CLE-32-12.14																						
	38	117+17	118+70	33.4' LT	1	137.5		1		1	87.5											
	38	115+44	118+96	33.4' RT	1	387.5			1		351			1								
	38A	121+04	124+56	33.4' LT	1	387.5			1		351			1								
	38A	121+30	122+82	33.4' RT	1	137.5		1		1	87.5											
CLE-32-14.25L/R																						
	36	425+36		24' RT		37.5			1		12.5											
	36	425+30		64' RT		37.5			1		12.5											
	36	428+54		24' LT		37.5			1		12.5											
	36	428+60		64' LT		37.5			1		12.5											
WAR-123-5.98																						
	48	313+00		20' LT	1	37.5		1			12.5											
	48	314+16		20' LT			1					1										
	48	314+16		20' LT									1									
	48	312+00		20' RT	1	37.5		1			12.5											
	49	428+60		64' LT	1	37.5		1			12.5											
TOTALS CARRIED TO GENERAL SUMMARY					7	1,312.5	1	5	6	2	964.5	1	1	2								

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STATION TO STATION (* - WIDTH MEASURED ALONG THE SKEW)	SIDE	LENGTH L	AVERAGE WIDTH W	SURFACE AREA A A = L x W	PLANIMETERED AREAS	THICKNESS T	254	407	448		202	642	642	642		621	621	
							PAVEMENT PLANING, ASPHALT CONCRETE	TACK COAT FOR INTERMEDIATE COURSE (0.05 GAL/SQ YD)	ASPHALT CONCRETE SURFACE COURSE, TYPE 1, PG64-28	REMOVAL OF PAVEMENT MARKING	EDGE LINE, 4"	LANE LINE, 4"	CENTERLINE	RPM	RAISED PAVEMENT MARKER REMOVED	SQ YD	GAL	CU YD
							INCHES											
CLE-125-13.47																		
STA. 710+57.88 TO STA. 711+57.88 (END APPR. SLAB)	CENTER	100	70	7,000		1.50	778	39	33									
STA. 712+90.08 (BEGIN APPR. SLAB) TO STA. 713+90.08	CENTER	100	70	7,000		1.50	778	39	33									
STA. 710+57.88 TO STA. 713+90.08	CENTER	332									996	0.13	0.13	0.06		10	9	
WAR-123-5.98																		
STA. 314+38.93 TO STA. 314+41.93 (END APPR. SLAB)	CENTER	3	55 (*)	165		2.00	19	1	1									
STA. 318+73.16 (BEGIN APPR. SLAB) TO STA. 318+76.16	CENTER	3	55 (*)	165		2.00	19	1	1									
STA. 314+38.93 TO STA. 314+46.93	CENTER	8										0.003		0.002				
STA. 318+68.16 TO STA. 318+76.16	CENTER	8										0.003		0.002				
CLE-32-14.25 L																		
STA. 425+96.98 TO STA. 425+99.98 (END APPR. SLAB)	CENTER	3	40	120		1.25	14	1	0.46									
STA. 428+47.52 (BEGIN APPR. SLAB) TO STA. 428+50.52	CENTER	3	40	120		1.25	14	1	0.46									
STA. 425+96.98 TO STA. 428+50.52	CENTER	254									762	0.10	0.05			3	3	
CLE-32-14.25 R																		
STA. 425+81.46 TO STA. 425+84.46 (END APPR. SLAB)	CENTER	3	40	120		1.25	14	1	0.46									
STA. 428+32.00 (BEGIN APPR. SLAB) TO STA. 428+35.00	CENTER	3	40	120		1.25	14	1	0.46									
STA. 425+81.46 TO STA. 428+35.00	CENTER	254									762	0.10	0.05			3	3	
CLE-32-12.14																		
STA. 118+70.08 TO STA. 121+29.92	CENTER	260									1,300	0.10	0.10	0.05				
GRE-35-22.97																		
STA. 48+51.49 TO STA. 51+53.51	CENTER	302									906	0.12		0.06				
CLE-743-4.66																		
STA. 246+19.88 TO STA. 247+41.62	CENTER	122									366	0.046		0.023		5	5	
CLE-32-13.14L																		
(2) POLY MOD EXPANSION JOINTS	CENTER	4										0.001	0.001					
WAR-123-17.40																		
(2) POLY MOD EXPANSION JOINTS	CENTER	4										0.002	0.002	0.001				
PRE-127-17.18																		
(2) POLY MOD EXPANSION JOINTS	CENTER	4										0.002		0.001				
PRE-177-4.68																		
(2) POLY MOD EXPANSION JOINTS	CENTER	4										0.002		0.001				
CLE-132-24.73																		
(2) POLY MOD EXPANSION JOINTS	CENTER	4										0.002		0.001				
TOTALS CARRIED TO GENERAL SUMMARY							1,650	84	70		5,092	0.611	0.333	0.201		21	20	

PAVEMENT CALCULATIONS

D08 - BM - FY 2014

CALCULATED
CAH
CHECKED

STANDARD DRAWINGS AND SUPPLEMENTAL SPECIFICATIONS

REFER TO THE FOLLOWING STANDARD BRIDGE DRAWING(S):

A-1-69	07-19-02	EXJ-4-87	07-19-02
AS-1-81	01-18-13	GSD-1-96	07-19-02
BR-1	07-19-02	PCB-1-99	01-18-13
DBR-2-73	07-19-02	RB-1-55	02-02-59
		VPF-1-90	04/15/11

REFER TO THE FOLLOWING SUPPLEMENTAL SPECIFICATION(S):

842	07-15-11
846	10-18-13

DESIGN SPECIFICATIONS

THESE STRUCTURES CONFORM TO "STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES" ADOPTED BY THE AMERICAN ASSOCIATION OF STATE HIGHWAY AND TRANSPORTATION OFFICIALS, 17TH ED. , AND THE 2004 ODOT BRIDGE DESIGN MANUAL.

EXISTING STRUCTURE VERIFICATION

DETAILS AND DIMENSIONS SHOWN ON THESE PLANS PERTAINING TO THE EXISTING STRUCTURE HAVE BEEN OBTAINED FROM PLANS OF THE EXISTING STRUCTURE AND FROM FIELD OBSERVATIONS AND MEASUREMENTS. CONSEQUENTLY, THEY ARE INDICATIVE OF THE EXISTING STRUCTURE AND THE PROPOSED WORK BUT THEY SHALL BE CONSIDERED TENTATIVE AND APPROXIMATE. THE CONTRACTOR IS REFERRED TO CMS SECTIONS 102.05, 105.02 AND 513.04.

BASE CONTRACT BID PRICES UPON A RECOGNITION OF THE UNCERTAINTIES DESCRIBED ABOVE AND UPON A PREBID EXAMINATION OF THE EXISTING STRUCTURE. HOWEVER, THE DEPARTMENT WILL PAY FOR ALL PROJECT WORK BASED UPON ACTUAL DETAILS AND DIMENSIONS WHICH HAVE BEEN VERIFIED IN THE FIELD.

ITEM 509 - EPOXY COATED REINFORCING STEEL, AS PER PLAN

IN ADDITION TO THE PROVISIONS OF ITEM 509, FIELD BEND AND/OR FIELD CUT THE REINFORCING STEEL DESIGNATED IN THE PLANS, AS NECESSARY, IN ORDER TO MAINTAIN THE REQUIRED CLEARANCES AND BAR SPACINGS. REPAIR ALL DAMAGE TO THE EPOXY COATING, AS A RESULT OF THIS WORK, ACCORDING TO 709.00.

ITEM 519 - PATCHING CONCRETE STRUCTURES, AS PER PLAN

PRIOR TO THE SURFACE CLEANING SPECIFIED IN 519.04 AND WITHIN 24 HOURS OF PLACING PATCHING MATERIAL, BLAST CLEAN ALL SURFACES TO BE PATCHED INCLUDING THE EXPOSED REINFORCING STEEL. ACCEPTABLE METHODS INCLUDE HIGH-PRESSURE WATER BLASTING WITH OR WITHOUT ABRASIVES IN THE WATER, ABRASIVE BLASTING WITH CONTAINMENT, OR VACUUM ABRASIVE BLASTING. MINIMUM WATER PRESSURE SHALL BE 1,500 PSI.

EXISTING BRIDGE PLANS

EXISTING BRIDGE PLANS MAY BE INSPECTED IN THE OFFICE OF STRUCTURAL ENGINEERING IN COLUMBUS, OHIO OR AT THE ODOT DISTRICT EIGHT OFFICE IN LEBANON, OHIO.

ITEM 530 - STRUCTURE, MISC.: POWER WASHING STRUCTURE CONCRETE

REMOVE DIRT AND DEBRIS FROM ABUTMENT SEATS AND POWER WASH ABUTMENT SEATS PRIOR TO REFURBISHING OR REPLACING BEARINGS, END CROSSFRAMES AND/OR EXPANSION JOINT WORK. MINIMUM WATER PRESSURE SHALL BE 1,500 PSI.

THE CONTRACTOR SHALL ADHERE TO THE REQUIREMENTS OF CMS 107.19.

ITEM 513 - STRUCTURAL STEEL FOR REHABILITATION, AS PER PLAN

THIS ITEM INCLUDES THE WORK NECESSARY FOR REPLACEMENT OF SELECT END CROSS FRAMES, PARTIAL BEAM WEB AND STIFFENER REPLACEMENT, INSTALLATION OF STEEL SLAB SUPPORTS AND/OR THE RETROFIT OF STRUCTURE BEARINGS. THESE ITEMS SHALL BE COMPLETED AT THE LOCATIONS SPECIFIED ON THE PLANS. THIS ITEM ALSO INCLUDES GRINDING THE BEARING AND END CROSS FRAME CONNECTION WELDS SMOOTH AT THE LOCATIONS SHOWN ON THE PLANS.

STEEL MEMBERS TO BE FABRICATED UNDER THIS ITEM WILL NOT REQUIRE SHOP DRAWINGS PRIOR TO FABRICATION. THE CONTRACTOR SHALL MAKE NECESSARY MEASUREMENTS AND PREPARE SKETCHES, DRAWINGS, TABLES, ETC. THE PROJECT ENGINEER SHALL HAVE THE AUTHORITY AND RESPONSIBILITY FOR ENSURING THAT THE FABRICATED STEEL IS ACCEPTABLE. TECHNICAL ASSISTANCE WILL BE PROVIDED TO THE ENGINEER, IF REQUESTED, BY THE OFFICE OF STRUCTURAL ENGINEERING. MILL TEST REPORTS AND SHIPPING DOCUMENTS SHALL BE SUBMITTED TO THE ENGINEER FOR REVIEW AND APPROVAL PRIOR TO INCORPORATING STEEL ITEMS INTO THE WORK, AS REQUIRED BY 501.06. AFTER FABRICATION, THE CONTRACTOR SHALL SUBMIT AS-BUILT DRAWINGS TO THE ENGINEER FOR REVIEW AND APPROVAL TO ENSURE THAT THE DRAWINGS DEPICT THE STEEL AS ACTUALLY INCORPORATED INTO THE WORK. THE ENGINEER WILL THEN SEND ONE APPROVED SET TO THE OFFICE OF STRUCTURAL ENGINEERING FOR INFORMATION. PAY WEIGHTS SHALL BE COMPUTED IN COMPLIANCE WITH 513 OF THE CMS AND SUBMITTED TO THE ENGINEER FOR HIS REVIEW AND APPROVAL.

PAYMENT FOR THIS WORK SHALL INCLUDE ALL EQUIPMENT, TOOLS, MATERIALS AND LABOR NECESSARY TO PERFORM THIS TASK. PAYMENT FOR WELDING, CUTTING, GRINDING, DRILLING AND BOLTING SHALL BE DEEMED TO BE INCLUDED FOR PAYMENT UNDER THIS ITEM. PAYMENT FOR FIELD DRILLING HOLES IN EXISTING MATERIAL IN-SITU AS PART OF THE REPAIR SHALL ALSO BE INCLUDED FOR PAYMENT UNDER THIS ITEM. PAYMENT SHALL BE MADE AT A UNIT BID PRICE OF POUNDS.

CONCRETE PARAPETS

AS SOON AS A CONCRETE SAW CAN BE OPERATED WITHOUT DAMAGING THE FRESHLY PLACED CONCRETE, SAWCUT 1¼" DEEP CONTROL JOINTS INTO THE PERIMETER OF THE CONCRETE PARAPET STARTING AND ENDING AT THE ELEVATION OF THE CONCRETE DECK. PLACE THE SAWCUTS AT A MINIMUM OF 6 FEET AND A MAXIMUM OF 10 FEET CENTERS. USE AN EDGE GUIDE, FENCE, OR JIG TO ENSURE THAT THE CUT JOINT IS STRAIGHT, TRUE, AND ALIGNED ON ALL FACES OF THE PARAPET. THE JOINT WIDTH SHALL BE THE WIDTH OF THE SAW BLADE, A NOMINAL WIDTH OF ¼ INCH. SEAL THE PERIMETER OF THE DEFLECTION CONTROL JOINT TO A MINIMUM DEPTH OF 1 INCH WITH A POLYURETHANE OR POLYMERIC MATERIAL CONFORMING TO ASTM C920, TYPE S. LEAVE THE BOTTOM ½ INCH OF THE INSIDE AND OUTSIDE FACE UNSEALED TO ALLOW WATER TO ESCAPE.

ITEM 202 - PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN

THIS WORK CONSISTS OF THE REMOVAL OF PORTIONS OF THE EXISTING STRUCTURES, ETC. AS SHOWN IN THE PLANS OR AS DIRECTED BY THE ENGINEER. THIS WORK ALSO INCLUDES THE REMOVAL OF SUPERSTRUCTURE BEARINGS AND MISCELLANEOUS STRUCTURAL STEEL ITEMS AS DIRECTED BY THE ENGINEER.

TOP OF ABUTMENT BACKWALL AND APPROACH SLAB PATCHING WORK CONSISTS OF THE REMOVAL OF ALL LOOSE AND UNSOUND PORTIONS OF THE CONCRETE AND OVERLAYS (IF PRESENT), ETC. AS WELL AS REMOVAL OF BITUMINOUS PATCHES TO ACCOMMODATE PATCHING WITH FLEXIBLE CONCRETE.

THE PROVISIONS OF ITEM 202 APPLY EXCEPT AS SPECIFIED BY THE FOLLOWING NOTES. PERFORM WORK CAREFULLY DURING BACKWALL/APPROACH SLAB REMOVALS TO PROTECT PORTIONS OF SUCH SYSTEMS THAT ARE TO BE SALVAGED AND INCORPORATED INTO THE PROPOSED STRUCTURE. THE USE OF EXPLOSIVES, HEADACHE BALLS AND/OR HOE RAM TYPE OF EQUIPMENT IS PROHIBITED. SUBMIT CONSTRUCTION PLANS ACCORDING TO CMS 501.05.

AREAS TO BE REPAIRED WITH FLEXIBLE CONCRETE ARE SHOWN ON THE PLANS AND SHALL BE CONSIDERED TENTATIVE AND APPROXIMATE. THE PROJECT ENGINEER SHALL SOUND (IF REQUIRED) AND MARK THE PERIMETER OF THE DELAMINATED AREAS TO BE REPAIRED ONCE CONSTRUCTION BEGINS IN ACCORDANCE WITH THE PHASED MAINTENANCE OF TRAFFIC.

SOUNDING MAY HAVE TO BE DELAYED UNTIL THE CONCRETE IS SUFFICIENTLY DRY TO PERMIT DETECTION OF ALL AREAS OF DELAMINATION. THE PERIMETER OF ALL REMOVAL AREAS SHALL BE SAWED TO A DEPTH OF 1 INCH (25 MM) TO PRODUCE A VERTICAL OR SLIGHTLY UNDERCUT FACE. REMOVE CONCRETE TO A ROUGH SURFACE. ADDITIONAL SAW CUTS MAY BE REQUIRED TO FACILITATE REMOVAL. ALL UNSOUND CONCRETE INCLUDING ALL PATCHES OTHER THAN SOUND PORTLAND CEMENT CONCRETE, AND ALL LOOSE AND DISINTEGRATED CONCRETE SHALL BE REMOVED. THE UNSOUND CONCRETE MAY BE REMOVED BY CHIPPING OR HAND DRESSING. CHIPPING HAMMERS SHALL NOT BE HEAVIER THAN THE NOMINAL 35 POUND (16 KG) CLASS AND SHALL BE OPERATED AT AN ANGLE OF LESS THAN 45 DEGREES MEASURED FROM THE SURFACE OF THE DECK CONCRETE AND SHALL BE REMOVED IN A MANNER THAT PREVENTS CUTTING, ELONGATING OR DAMAGING REINFORCING STEEL. WHERE THE BOND BETWEEN THE CONCRETE AND A PRIMARY REINFORCING BAR HAS BEEN DESTROYED, OR WHERE MORE THAN ONE HALF OF THE PERIPHERY OF SUCH A BAR HAS BEEN EXPOSED, THE ADJACENT CONCRETE SHALL BE REMOVED TO A DEPTH THAT WILL PROVIDE A MINIMUM ¾ INCH CLEARANCE AROUND THE BAR EXCEPT WHERE OTHER REINFORCING BARS MAKE THIS IMPRACTICABLE. REINFORCEMENT WHICH HAS BECOME LOOSE SHALL BE ADEQUATELY SUPPORTED AND TIED BACK INTO PLACE. AFTER COMPLETION OF THE REMOVAL OPERATIONS, THE ENGINEER WILL RE-SOUND THE CONCRETE TO ENSURE THAT ONLY SOUND CONCRETE REMAINS. MINIMIZE CONSTRUCTION JOINTS. CONSTRUCTION JOINTS SHALL ONLY BE PLACED ON THE PERIMETER OF THE REMOVAL AREAS.

CUT LINE CONSTRUCTION JOINT PREPARATION: SAW CUT BOUNDARIES OF PROPOSED CONCRETE REMOVALS 1 INCH DEEP. REMOVE CONCRETE TO A ROUGH SURFACE. LEAVE THE EXISTING REINFORCING STEEL, IF REQUIRED IN THE PLANS, IN PLACE. INSTALL DOWEL BARS IF SPECIFIED. PRIOR TO CONCRETE PLACEMENT ABRASIVELY CLEAN JOINT SURFACES AND EXISTING EXPOSED REINFORCEMENT TO REMOVE LOOSE AND DISINTEGRATED CONCRETE AND LOOSE RUST. THOROUGHLY CLEAN THE JOINT SURFACE AND EXPOSED REINFORCEMENT OF ALL DIRT, DUST, RUST, OR OTHER FOREIGN MATERIAL BY THE USE OF WATER, AIR UNDER PRESSURE, OR OTHER METHODS THAT PRODUCE SATISFACTORY RESULTS.

EXISTING REINFORCING STEEL DOES NOT HAVE TO HAVE A BRIGHT STEEL FINISH, BUT REMOVE ALL PACK AND LOOSE RUST. THOROUGHLY DRENCH EXISTING CONCRETE SURFACES WITH CLEAN WATER AND ALLOW TO DRY TO A DAMP CONDITION BEFORE PLACING CONCRETE.

SUBSTRUCTURE CONCRETE REMOVAL: REMOVE CONCRETE BY MEANS OF APPROVED PNEUMATIC HAMMERS EMPLOYING POINTED AND BLUNT CHISEL TOOLS. HYDRAULIC HOE-RAM TYPE HAMMERS WILL NOT BE PERMITTED. THE WEIGHT OF THE HAMMER SHALL NOT BE MORE THAN 35 POUNDS FOR REMOVAL WITHIN 18 INCHES OF PORTIONS TO BE PRESERVED. OUTSIDE THE 18 INCH LIMIT, THE CONTRACTOR MAY USE HAMMERS NOT EXCEEDING 90 POUNDS UPON THE APPROVAL OF THE ENGINEER. CHIPPING HAMMERS NOT HEAVIER THAN THE NOMINAL 35-POUND CLASS SHALL BE USED FOR REMOVALS AT THE TOP OF ABUTMENT BACKWALLS AND APPROACH SLABS. DO NOT PLACE PNEUMATIC HAMMERS IN DIRECT CONTACT WITH REINFORCING STEEL THAT IS TO BE RETAINED IN THE REBUILT STRUCTURE.

THE CONTRACTOR SHALL TAKE CARE NOT TO DAMAGE ANY PORTION OF THE STRUCTURE THAT WILL REMAIN IN SERVICE. ANY PORTION OF THE REMAINING STRUCTURE DAMAGED AS A RESULT OF CONTRACTOR ACTIONS SHALL BE REPLACED IN KIND AT THE CONTRACTOR'S EXPENSE.

THE CONTRACTOR MUST REVIEW THE STRUCTURE WHEN PREPARING HIS BID. THE CONTRACTOR WILL REVIEW THE CONDITION OF THE STRUCTURE TO DETERMINE WHAT DEBRIS WILL FALL FROM THE STRUCTURE DURING REMOVAL. THE CONTRACTOR WILL DETERMINE THE CORRESPONDING COST TO CLEAN UP ANY AND ALL DEBRIS WHICH FALLS FROM THE STRUCTURE DURING ANY ALL REMOVAL OPERATION. THE COST TO CLEAR AND CLEAN UP ALL DEBRIS DURING REMOVAL SHALL BE INCLUDED WITH THE BID FOR THIS ITEM OF WORK. NO ADDITIONAL COST WILL BE RECOGNIZED TO CLEAN DEBRIS RESULTING FROM THE STRUCTURE REMOVAL OPERATION.

MEASUREMENT & PAYMENT: THE DEPARTMENT WILL MEASURE THE QUANTITY OF REMOVALS ON A LUMP SUM BASIS. THE DEPARTMENT WILLPAY FOR THE ACCEPTED QUANTITIES OF REMOVALS AT THE CONTRACT PRICE FOR ITEM 202, PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN.

ITEM 509 REINFORCING STEEL, REPLACEMENT OF EXISTING REINFORCING STEEL, AS PER PLAN

ITEM 509 REINFORCING STEEL, REPLACEMENT OF EXISTING REINFORCING STEEL, AS PER PLAN: REPLACE ALL EXISTING REINFORCING BARS DEEMED BY THE ENGINEER TO BE UNUSABLE BECAUSE OF CORROSION. THE DEPARTMENT WILL MEASURE THE REPLACEMENT REINFORCING STEEL BY THE NUMBER OF POUNDS ACCEPTED IN PLACE.

REPLACE ALL EXISTING REINFORCING STEEL BARS WHICH ARE TO BE INCORPORATED INTO THE NEW WORK AND ARE DEEMED BY THE ENGINEER TO BE MADE UNUSABLE BY CONCRETE REMOVAL OPERATIONS WITH NEW EPOXY COATED REINFORCING STEEL OF THE SAME SIZE AT NO COST TO THE DEPARTMENT.

IN ADDITION TO THE PROVISIONS OF ITEM 509, FIELD BEND AND/OR FIELD CUT THE REINFORCING STEEL DESIGNATED IN THE PLANS, AS NECESSARY, IN ORDER TO MAINTAIN THE REQUIRED CLEARANCES AND BAR SPACINGS. REPAIR ALL DAMAGE TO THE EPOXY COATING, AS A RESULT OF THIS WORK, ACCORDING TO 709.00.

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DESIGNED CAH	CHECKED RSK	DRAWN CAH	REVIEWED SCS	DATE	DESIGN AGENCY
				STRUCTURE FILE NUMBER	STATE OF OHIO
BRIDGE NO: VARIES				DEPT. OF TRANSPORTATION	
BRIDGE NO: VARIES				DISTRICT & BRIDGE DEPT.	
STRUCTURE GENERAL NOTES 1					
PID No. 84530					
D08-BM-FY2014					
1 / 3					
19 60					

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PROPOSED WORK

BRIDGE NO. CLE-125-1347 (SFN 1302434) OVER POPLAR CREEK

- REPLACE ALL ABUTMENT BEARINGS WITH ELASTOMERIC BEARINGS AT REAR AND FORWARD ABUTMENTS.
- REPLACE BOTTOM FLANGE AND WEB AT THE FOLLOWING BEAM END LOCATIONS:
 - FORWARD ABUTMENT BEAM 5 (HEIGHT OF 10", LENGTH OF 3 FEET)
 - FORWARD ABUTMENT BEAM 6 (HEIGHT OF 10", LENGTH OF 4 FEET)
 - FORWARD ABUTMENT BEAM 10 (HEIGHT OF 10", LENGTH OF 3 FEET)
- REPLACE THE END EXPANSION JOINTS, 2 FEET OF THE DECK, THE TOP OF THE BACKWALL TO THE APPROACH SLAB SEAT, AND THE END CROSSFRAMES. THE NEW JOINT SHALL BE A STRIP SEAL EXPANSION JOINT. THE NEW BACKWALL SHALL BE RAISED UP TO THE TOP OF ROADWAY SURFACE ELEVATION.
- CLOSE THE GAP BETWEEN THE LEFT AND RIGHT STRUCTURES INSTALLING A LONGITUDINAL ELASTOMERIC SEAL MANUFACTURED BY ONE OF THE FOLLOWING APPROVED COMPANIES:

D. S. BROWN
300 EAST CHERRY STREET
NORTH BALTIMORE, OH 45872
TELEPHONE: 1-419-257-3561

WATSON BOWMAN ACME CORPORATION
95 PINEVIEW DRIVE
AMHERST, NY 14228
TELEPHONE: 1-800-677-4922

- PAINT THE STRUCTURAL STEEL USING OZEU SPECIFICATIONS. THE NEW COLOR SHALL BE FEDERAL COLOR 15526 (BLUE).
- REMOVE EXISTING CONCRETE SEALER AND RE-SEAL THE DECK EDGES, ABUTMENTS, AND PIER ENDS WITH EPOXY URETHANE SEALER.
- SEAL THE DECK WITH GRAVITY FED RESIN PER 512.
- MILL AND FILL SURFACE COURSE OF THE APPROACH ROADWAY (INCLUDING THE APPROACH SLABS) FOR A DISTANCE OF 100 FEET.

BRIDGE NO. CLE-32-1425L/R (SFN 1300490 / SFN 13000504) OVER EAST FORK LITTLE MIAMI.

- PATCH TOP OF BACKWALLS WITH CONCRETE. EXISTING CONCRETE SHALL BE REMOVED TO A DEPTH OF 4" OR TO SOUND CONCRETE, WHICHEVER IS DEEPER.
- MILL AND FILL 3 FEET OF ASPHALT IMMEDIATELY ADJACENT TO THE BACKWALL.
- PATCH VISIBLY DELAMINATED AREAS OF THE CONCRETE DECK WITH CONCRETE.
- SEAL DECK WITH GRAVITY FED RESIN.
- UPGRADE BRIDGE TERMINAL ASSEMBLIES.

BRIDGE NO. CLE-32-1314L (SFN 1300458) OVER SR 276

- REPLACE FAILING CONCRETE PATCH AREA AT THE TOP OF BACKWALL (1' X10") AND THE APPROACH SLAB (10' X 2'-3") WITH A NEW CONCRETE PATCH. EXISTING CONCRETE SHALL BE REMOVED TO A DEPTH OF 4" OR TO SOUND CONCRETE, WHICHEVER IS DEEPER.

BRIDGE NO. CLE-32-1214 (SFN 1300431) HALF ACRE ROAD OVER SR 32

- INSTALL A POLYMER MODIFIED ASPHALT (PMAJ) JOINT BETWEEN THE TOP OF BACKWALL AND THE APPROACH SLAB. THE PMAJ SHALL BE OFF CENTER SUCH THAT IT EXTENDS 8" ONTO THE BACKWALL AND 15" ONTO THE APPROACH SLAB TO ENSURE ALL UNSOUND CONCRETE IS REMOVED, BUT TO STILL OFFER SOME PROTECTIVE CONCRETE FOR THE EXPANSION JOINT ARMOR.
- PRIOR TO INSTALLING PMAJ, PATCH 5 FEET OF THE DETERIORATED PORTIONS OF THE TOP OF BACKWALL ADJACENT TO THE SOUTH EXPANSION JOINT IN EAST SHOULDER WITH CONCRETE. ONCE CURED, THE AREA MAY THEN BE SAWCUT FOR INSTALLATION OF THE PMAJ.
- PATCH 8' X 5' AREA OF THE NORTH APPROACH SLAB IN THE NORTHBOUND, INTERIOR LANE WITH CONCRETE.
- SEAL DECK WITH GRAVITY FED RESIN.
- INSTALL NEW GUARDRAIL, BRIDGE AND TERMINAL ASSEMBLIES, INCLUDING CONCRETE BARRIER TRANSITIONS OFF THE BRIDGE. THE NEW TRANSITIONS MAY BE DRILLED AND GROUTED INTO THE SIDE OF THE EXISTING APPROACH SLABS.

BRIDGE NO. CLE-132-2473 (SFN 1303090) OVER O'BANNON CREEK

- REPLACE THE EXISTING POLYMER MODIFIED ASPHALT EXPANSION JOINT. THE MINIMUM THICKNESS SHALL BE 3".

BRIDGE NO. GRE-35-2297 (SFN 2900521) SOUTH CHARLESTON RD. OVER US 35

- FILL VOIDS UNDER APPROACH SLABS PER SUPPLEMENTAL SPECIFICATION 842.
- SEAL DECK AND APPROACH SLABS WITH GRAVITY FED RESIN.

BRIDGE NO. HAM-562-0227 (SFN 3113981) WESLEY AVENUE OVER SR 562

- REPLACE CURVED VPF ON WEST SIDE WITH A NEW 8' TALL STRAIGHT FENCE RE-USING EXISTING BASE-PLATES.
- THE LANE ADJACENT TO THE BARRIER MAY BE CLOSED BETWEEN THE HOURS OF 9AM TO 3PM TO PERFORM THE WORK.

BRIDGE NO. PRE-127-1718 (SFN 6802680) US 127 OVER LOWRY RUN

- REPLACE POLYMER MODIFIED ASPHALT EXPANSION JOINTS.

BRIDGE NO. PRE-177-0486 (SFN 6803032) OVER EAST FORK FOUR MILE CREEK

- REPLACE POLYMER MODIFIED ASPHALT EXPANSION JOINTS.

BRIDGE NO. CLE-743-0466 (SFN 1304887) OVER BIG INDIAN CREEK

- FILL VOIDS UNDER APPROACH SLABS PER SUPPLEMENTAL SPECIFICATION 842.
- SEAL DECK AND APPROACH SLABS WITH GRAVITY FED RESIN.

BRIDGE NO. WAR-123-1740 (SFN 8304432) OVER TURTLE CREEK

- REPLACE POLYMER MODIFIED ASPHALT EXPANSION JOINTS.

BRIDGE NO. WAR-123-0598 (SFN 8304157) OVER TODD FORK

- REPLACE THE END EXPANSION JOINTS, 2 FEET OF THE DECK, THE TOP OF THE BACKWALL TO THE APPROACH SLAB SEAT, AND THE END CROSSFRAMES. UNSOUND AREAS OF THE BACKWALL BELOW THE APPROACH SLAB SEAT THAT ARE CONTIGUOUS WITH THE REMOVED PORTIONS SHALL BE REMOVED TO SOUND CONCRETE AND POURED WITH THE TOP OF THE BACKWALL CONCRETE. THESE AREAS CAN BE PAID FOR UNDER 519 PATCHING. THE NEW JOINT SHALL BE A STRIP SEAL EXPANSION JOINT. THE NEW BACKWALL SHALL BE RAISED UP TO THE TOP OF ROADWAY SURFACE ELEVATION. ADJUST EXPANSION JOINTS AT ACUTE CORNERS.
- PATCH THE SPALLED/UNSOUND AREAS OF THE BACKWALL BELOW THE ABUTMENT SEAT, THE WINGWALLS, AND PIER 1. THE BRIDGE DEPARTMENT SHALL MARK IN THE FIELD AND PROVIDE QUANTITIES FOR THE ABUTMENTS. ENGINEERING SHALL ESTIMATE SPALLING/UNSOUND AREA FROM VISUAL OBSERVATIONS OF PIER 1. ALL AREAS SHALL BE SHOWN IN THE PLANS.
- REFURBISH ALL ABUTMENT BEARINGS. IN ADDITION TO THE REFURBISHMENTS, INCLUDE THE REPLACEMENT OF TWO BEARINGS TO BE USED "AS DIRECTED BY THE ENGINEER" UPON COMPLETION OF THE REFURBISHMENTS.
- PAINT THE LAST 10 FEET OF THE STRUCTURAL STEEL NEAR THE REAR ABUTMENT AND THE LAST 5 FEET OF THE STRUCTURAL STEEL AT THE FORWARD ABUTMENT. THE COLOR SHALL MATCH THE EXISTING AND SHALL MEET OZEU SPECIFICATIONS.
- SEAL THE DECK EDGES, ABUTMENTS, AND PIER ENDS (EXTERIOR 5 FEET) WITH EPOXY URETHANE SEALERS. EXISTING SEALERS WILL REQUIRE SEPARATE REMOVAL PAY ITEM.
- SEAL THE WEARING SURFACE WITH SOLUBLE REACTIVE SILICATE (SRS) PER 512.
- UPGRADE GUARDRAIL END TERMINAL ASSEMBLIES. REPLACE THE FIRST WOOD POST AND RE-ATTACH THE METAL POST AT THE LEFT REAR CORNER.
- MILL AND FILL THE SURFACE COURSE FOR THE APPROACH ROADWAY (INCLUDING THE APPROACH SLABS) FOR A DISTANCE OF 3 FEET.
- RECONSTRUCT THE BERM AT THE RIGHT FORWARD CORNER THAT HAS ERODED FROM THE ROADWAY RUN-OFF FOR THE APPROXIMATE LENGTH OF THE GUARDRAIL.

ITEM 514 - FIELD PAINTING EXISTING STRUCTURAL STEEL

THIS ITEM INCLUDES THE WORK NECESSARY FOR PAINTING THE EXISTING STRUCTURAL STEEL OF SPECIFIED BRIDGES AS SHOWN ON THE PLANS USING SYSTEM OZEU. PAINT COLOR SHALL MATCH EXISTING.

PAYMENT FOR THIS WORK SHALL INCLUDE ALL EQUIPMENT, TOOLS, MATERIALS AND LABOR NECESSARY TO PERFORM THIS TASK. PAYMENT SHALL BE MADE AT A UNIT BID PRICE OF SQUARE FEET.

ITEM 517 - RAILING MISC.: PORTION OF BRIDGE RAILING REMOVED AND REBUILT

THIS ITEM CONSISTS OF DISMANTLING, SALVAGING AND RECONSTRUCTING A PORTION OF THE BRIDGE RAILING AS NEEDED TO ACCOMMODATE THE EXPANSION JOINT AND PARTIAL DECK SLAB REPLACEMENT.

PAYMENT FOR THIS WORK SHALL INCLUDE ALL MATERIALS (INCLUDING NEW ANCHOR BOLTS, RAILING HARDWARE, ETC.), LABOR, EQUIPMENT AND ANY MISCELLANEOUS APPURTENANCES REQUIRED TO COMPLETE THE ABOVE TASK.

HMM CONCRETE SEALER

THE CONTRACTOR SHALL SEAL ALL CONSTRUCTION JOINTS AND PATCHES IN THE DECK SLAB, ABUTMENT BACK WALLS AND/OR APPROACH SLABS WITH A HIGH MOLECULAR WEIGHT METHACRYLATE SEALER PER CMS 511.22. SEALING SHALL BE CONSIDERED INCIDENTAL TO THE APPROPRIATE CONCRETE ITEM.

BEARING WORK

THE CONTRACTOR SHALL PROVIDE THE ENGINEER WITH AS-BUILT INFORMATION OF EACH REFURBISHED OR REPLACED BEARING SHOWING FINAL BEARING AND SHIM SIZES. PAYMENT FOR THE AS-BUILT INFORMATION AS WELL AS ANY SURVEY WORK REQUIRED TO COMPLETE THE BEARING WORK SHALL BE INCLUDED WITH THE RESPECTIVE BEARING ITEMS FOR PAYMENT.

ITEM 512 - TREATING CONCRETE BRIDGE DECKS WITH GRAVITY-FED RESIN, AS PER PLAN

IN ADDITION TO THE SPECIFICATION REQUIREMENTS, PROTECT BY MASKING OR OTHER MEANS THE EXISTING RAISED PAVEMENT MARKERS, EXPANSION JOINTS AND PARAPETS LOCATED WITHIN THE PROPOSED SEALING LIMITS SO THAT NO RESIN IS DEPOSITED ON THEIR SURFACES DURING APPLICATION AND CURING TIMES. REMOVE THE PROTECTION PRIOR TO ALLOWING TRAFFIC ON THE TREATED SURFACE.

ALL EXISTING PAVEMENT MARKINGS SHALL BE REMOVED IN THE PROJECT AREA PRIOR TO PLACEMENT OF RESIN.

SEE ROADWAY PLANS FOR PAVEMENT MARKING REMOVAL QUANTITIES.

ITEM 516 - REFURBISHING BEARING DEVICES, AS PER PLAN

THIS ITEM APPLIES TO SELECT BEARINGS AT THE REAR AND FORWARD ABUTMENT LOCATIONS ONLY AS SHOWN IN THE PLANS.

THIS ITEM SHALL INCLUDE ALL WORK NECESSARY TO PROPERLY ALIGN BRIDGE BEARINGS AS WELL AS THEIR CLEANING AND PAINTING. INCLUDED SHALL BE THE DISASSEMBLY OF THE BEARINGS, HAND TOOL CLEANING (GRINDING IF NECESSARY), PAINTING ACCORDING TO ITEM 514, REPLACEMENT OF ANY DAMAGED SHEET LEAD WITH PREFORMED BEARING PADS (711.21), INSTALLATION OF ANY NECESSARY STEEL SHIMS OF THE SAME SIZE AS THE BEARINGS TO PROVIDE A SNUG FIT, REALIGNMENT OF THE UPPER BEARING PLATE BY REMOVING EXISTING WELDS AND REWELDING SO THAT THE BEARINGS ARE VERTICALLY ALIGNED AT 60 DEGREES F, LUBRICATING SLIDING SURFACES, AND REASSEMBLY OF THE BEARINGS. ASSURE ALL BEARINGS ARE SHIMMED ADEQUATELY AND THAT NO BEAMS AND/OR BEARING DEVICES ARE "FLOATING". ONLY ONE SHIM PLATE SHALL BE INSTALLED AT EACH BEARING. AT NO ADDITIONAL COST TO THE STATE, THE CONTRACTOR MAY INSTALL NEW BEARINGS OF THE SAME TYPE AS THE EXISTING IN PLACE OF REFURBISHING THE BEARINGS. ALL WORK SHALL BE TO THE SATISFACTION OF THE ENGINEER. PAYMENT FOR ALL OF THE ABOVE DESCRIBED LABOR AND MATERIALS WILL BE MADE AT THE CONTRACT PRICE BID FOR ITEM 516 - REFURBISH BEARING DEVICES, AS PER PLAN.

DESIGNED CAH CHECKED RSK	DRAWN CAH REVISED	REVIEWED SCS	DATE	DESIGN AGENCY STATE OF OHIO
		STRUCTURE FILE NUMBER	VARIES	DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.
STRUCTURE GENERAL NOTES 2				
BRIDGE NO: VARIES				
D08-BM-FY2014		PID No. 84530		
2 / 3		20 60		

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ITEM SPECIAL MISC.: CONSULTANT FOR CONCRETE QUALITY CONTROL INCLUDING TESTING AND INSPECTION

ALL CONCRETE SHALL BE TESTED. ALL TESTING, INSPECTION AND QUALITY CONTROL FOR CONCRETE, NOT INCLUDED UNDER SUPPLEMENTAL SPECIFICATIONS 888 AND 898, SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. THE CONTRACTOR SHALL PROVIDE A CONCRETE TESTING CONSULTANT WITH PREVIOUS EXPERIENCE AND FAMILIARITY IN ODOT PROCEDURES, CONCRETE TESTING REQUIREMENTS AND CONCRETE TESTING DOCUMENTATION. AT LEAST 30 DAYS PRIOR TO CONCRETE PLACEMENT, SUBMIT TO THE ENGINEER FOR APPROVAL, THE PROPOSED CONCRETE TESTING CONSULTANT ALONG WITH THE RESUMES OF THE PROPOSED TESTING PERSONNEL.

TESTING CONCRETE FOR STRUCTURES AND PORTLAND CEMENT CONCRETE PAVEMENT SHALL BE PERFORMED AS OUTLINED IN SUPPLEMENTAL SPECIFICATIONS 898 AND 888 RESPECTIVELY.

THROUGH THE CONTRACTOR, THE CONSULTANT SHALL BE RESPONSIBLE FOR ENSURING THAT ALL CONCRETE PLACED IS IN ACCORDANCE WITH THE SPECIFICATIONS. SUCH WORK SHALL BE IN ACCORDANCE WITH THE APPLICABLE CONSTRUCTION AND MATERIAL SPECIFICATIONS AND THE ODOT CONSTRUCTION INSPECTION MANUAL OF PROCEDURES FOR CONCRETE. THE CONCRETE CONSULTANT SHALL PROVIDE THE NECESSARY TRAINED TECHNICIANS AND EQUIPMENT AND SHALL FURNISH THE PROJECT ENGINEER WITH TWO (2) COPIES OF ALL TEST RESULTS WITHIN 24 HOURS AFTER COMPLETION OF CONCRETE PLACEMENT.

THE TECHNICIANS SHALL BE ACI LEVEL 1 CERTIFIED AND WILL BE REQUIRED TO DEMONSTRATE HIS/HER COMPETENCE AND EXPERIENCE LEVELS TO THE ENGINEER PRIOR TO BEGINNING WORK. THE ENGINEER WILL ORDER THE CONTRACTOR TO REPLACE ANY TECHNICIAN THAT IS NOT VERSED IN THE REQUIRED TESTING PROCEDURE.

THE TECHNICIAN SHALL VERBALLY NOTIFY THE ODOT PROJECT ENGINEER OF ANY FAILING TESTS AND SHALL SUBMIT FOLLOW-UP WRITTEN NOTIFICATION TO THE PROJECT ENGINEER OF REMEDIAL ACTION(S) TAKEN. TESTS SHALL BE TAKEN AS SPECIFIED WITHIN THE CONSTRUCTION AND MATERIAL SPECIFICATIONS, CONCRETE MANUAL OR APPROPRIATE SUPPLEMENTAL SPECIFICATION AS LISTED IN THE PROPOSAL GOVERNING THE PROJECT. IT SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR TO MAKE IMMEDIATE CORRECTIONS OR ADJUSTMENTS TO THE CONCRETE MIX VIA DIRECT COMMUNICATION WITH THE CONCRETE SUPPLIER'S PLANT PERSONNEL TO MAINTAIN UNINTERRUPTED COMPLIANCE WITH THE SPECIFICATIONS UPON NOTIFICATION OF CONCRETE MIX NON-COMPLIANCE BY THE CONSULTANT TECHNICIAN. THE PROJECT ENGINEER MAY REQUIRE MORE FREQUENT TESTING AS CONDITIONS WARRANT.

UPON COMPLETION OF DAILY CONCRETE PLACEMENT(S), THE CONCRETE CONSULTANT SHALL PROVIDE THE PROJECT ENGINEER WITH DAILY TEST REPORTS, TE-45'S, INSPECTOR'S DAILY REPORT AND SUPPORTING DOCUMENTATION FOR EACH ITEM OF CONCRETE WORK PERFORMED SEPARATED BY MIX DESIGN. SUBSEQUENTLY, UPON COMPLETION OF AN ENTIRE CONCRETE SPECIFICATION ITEM, THE CONCRETE CONSULTANT SHALL ALSO PROVIDE THE PROJECT ENGINEER WITH TWO (2) COPIES OF AN ADDITIONAL INSPECTION REPORT BY A REGISTERED PROFESSIONAL ENGINEER, STATE OF OHIO, WHICH CONTAINS THE TESTING- RESULTS SUMMARY FOR EACH ITEM BY CONTRACT REFERENCE NUMBER AND THE CONSULTANT'S CONCLUSIONS RELATIVE TO SPECIFICATION COMPLIANCE FOR ALL CONCRETE TESTING WORK.

THE ODOT PROJECT ENGINEER RESERVES THE RIGHT TO MAKE UNANNOUNCED QUALITY-CONTROL TESTS TO VERIFY PROCEDURES USED AND RESULTS BEING OBTAINED BY THE CONTRACTOR.

THE CONCRETE TECHNICIAN SHALL WORK UNDER THE DIRECTION OF A REGISTERED PROFESSIONAL ENGINEER, STATE OF OHIO, WHO WILL MONITOR THE CONCRETE TEST RESULTS. THE FINAL INSPECTION REPORTS FOR EACH COMPLETED ITEM SHALL BE SIGNED BY A REGISTERED PROFESSIONAL ENGINEER, STATE OF OHIO, CERTIFYING THAT ALL CONCRETE TESTS PROVIDED BY THE CONTRACTOR MET APPLICABLE CONTRACT REQUIREMENTS. A FINAL REPORT ISSUED BY THE CONSULTING FIRM SHALL CONTAIN A CERTIFIED STATEMENT OF COMPLIANCE WITH ODOT SPECIFICATIONS AND ANY OTHER CONCLUSIONS REGARDING THE CONCRETE MATERIALS INCORPORATED INTO THE PROJECT. SUCH STATEMENT SHALL BE SIGNED BY A REGISTERED PROFESSIONAL ENGINEER, STATE OF OHIO. AND, THE CONCRETE CONSULTANT SHALL BE REQUIRED TO ATTEND MONTHLY PROGRESS MEETINGS AS REQUIRED BY THE PROJECT ENGINEER.

ADDITIONALLY, THE CONTRACTOR SHALL BE REQUIRED TO KEEP A POSTED LIST OF BEAM AND CYLINDER IDENTIFICATION NUMBERS FOR THE PURPOSE OF IDENTIFYING THE CORRESPONDING PLACEMENT LOCATION AND CONCRETE SPECIFICATION ITEM.

PAYMENT SHALL BE BID AS LUMP SUM FOR ITEM SPECIAL MISC.: CONSULTANT FOR CONCRETE QUALITY CONTROL INCLUDING TESTING AND INSPECTION. THE ITEM WILL BE PAID FOR AS FOLLOWS:

- UPON APPROVAL OF CONSULTANT 20%
- PROGRESSIVE EQUIVALENT PAYMENTS 50%
- UPON SUBMISSION OF FINAL REPORT 30%

THE TECHNICIAN SHALL HAVE THE FULL EFFECT AND AUTHORITY OF AN ODOT PROJECT INSPECTOR IN DETERMINING ACCEPTABILITY OF MATERIAL AND CONCRETE PLACEMENT PRACTICES.

ITEM 516, JACKING AND TEMPORARY SUPPORT OF SUPER-STRUCTURE, AS PER PLAN

THIS WORK CONSISTS OF RAISING OR RE-POSITIONING EXISTING STRUCTURES TO THE DIMENSIONS AND REQUIREMENTS DEFINED IN THE PROJECT PLANS.

SUBMIT CONSTRUCTION PLANS IN ACCORDANCE WITH CMS 501.05.

IF, DURING THE JACKING OPERATIONS, CRACKING OF THE CONCRETE SUPERSTRUCTURE, SEPARATION OF THE CONCRETE DECK FROM THE STEEL STRINGERS, OR OTHER DAMAGE TO THE STRUCTURE IS VISUALLY OBSERVED, IMMEDIATELY CEASE THE JACKING OPERATION AND INSTALL SUPPORTS TO THE SATISFACTION OF THE ENGINEER. ANALYZE THE DAMAGE AND SUBMIT A METHOD OF CORRECTION TO THE ENGINEER FOR APPROVAL. EPOXY INJECT ALL BEAMS THAT SEPARATE FROM THE DECK FOR THE DISTANCE OF THE SEPARATION IN ACCORDANCE WITH CMS 512.07. THE DEPARTMENT WILL NOT PAY FOR THE COST OF THIS EPOXY INJECTION OR OTHER REQUIRED REPAIRS. THE BRIDGE BEARINGS SHALL BE FULLY SEATED AT ALL CONTACT AREAS. IF FULL SEATING IS NOT ATTAINED, SUBMIT A REPAIR PLAN TO THE ENGINEER. THE DEPARTMENT WILL NOT PAY FOR THE REPAIR COSTS TO ENSURE FULL SEATING ON BEARINGS.

THE DEPARTMENT WILL MEASURE THIS WORK ON A LUMP SUM BASIS.

THE DEPARTMENT WILL PAY FOR THE ACCEPTED QUANTITIES AT THE CONTRACT PRICE FOR ITEM 516, JACKING AND TEMPORARY SUPPORT OF SUPERSTRUCTURE, AS PER PLAN.

ADDITION OF CORROSION INHIBITOR TO CONCRETE MIX

IN ADDITION TO THE REQUIREMENTS OF CMS 511, THE CONCRETE MIX SHALL HAVE AN ODOT APPROVED CORROSION INHIBITOR ADMIXTURE CONFORMING TO CMS 515.15. CONCRETE CONTAINING AN APPROVED CORROSION INHIBITOR FROM THE QUALIFIED PRODUCT LIST SHALL BE USED FOR ALL LOCATIONS SUBJECT TO SALT/ DE-ICER SPRAY (I.E. BRIDGE DECKS/ SLABS, APPROACH SLABS, PARAPETS, PIERS, ABUTMENTS, ETC.). FOOTINGS ARE EXCUSED FROM MEETING THIS ADMIXTURE REQUIREMENT.

THE ADDITION OF THE ADMIXTURE SHALL NOT DEGRADE CONCRETE STRENGTH OR ANY OTHER MATERIAL PROPERTIES OF THE CONCRETE.

PAYMENT FOR MATERIAL, LABOR, EQUIPMENT AND ANY MISCELLANEOUS APPURTENANCES REQUIRED FOR THIS ADMIXTURE SHALL BE INCLUDED IN THE RESPECTIVE CONCRETE ITEMS FOR PAYMENT.

ITEM 516 - BEARING DEVICE ROCKER, AS PER PLAN

THIS ITEM APPLIES TO SELECT ABUTMENT BEARINGS AT THE WAR-123-0598 BRIDGE.

THIS ITEM SHALL INCLUDE ALL WORK NECESSARY TO REPLACE AND PAINT SELECT BRIDGE BEARINGS. BEARINGS ARE TO BE REPLACED ONLY IF AUTHORIZED BY THE ENGINEER. INCLUDED SHALL BE THE WELDING OF THE BEARING TO THE BOTTOM FLANGE, INSTALLATION OF ONE SHIM (IF REQUIRED) TO ENSURE A SNUG FIT. ASSURE ALL BEARINGS ARE SHIMMED ADEQUATELY AND THAT NO BEAMS AND/OR BEARING DEVICES ARE "FLOATING". ALIGN THE UPPER BEARING PLATE SO THAT THE BEARINGS ARE VERTICALLY ALIGNED AT 60 DEGREES F. LUBRICATE SLIDING SURFACES.

THE CONTRACTOR SHALL VERIFY THE REQUIRED BEARING SIZE PRIOR TO FABRICATION AND ALERT THE ENGINEER TO ANY CHANGES TO BEARING SIZES SHOWN IN THE PLANS.

ALL WORK SHALL BE TO THE SATISFACTION OF THE ENGINEER. PAYMENT FOR ALL OF THE ABOVE DESCRIBED LABOR AND MATERIALS WILL BE MADE AT THE CONTRACT PRICE BID FOR ITEM 516 - BEARING DEVICE ROCKER, AS PER PLAN.

DESIGNED CAH CHECKED RSK		DRAWN CAH REVISED		REVIEWED SCS STRUCTURE FILE NUMBER VARIES	DATE	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.
STRUCTURE GENERAL NOTES 3						BRIDGE NO: VARIES
D08-BM-FY2014 PID No. 84530						
3 / 3						21 60

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ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-125-1347					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
509	10001	2,707	POUND	EPOXY COATED REINFORCING STEEL, AS PER PLAN	1,705		1,002		19/60
509	20001	300	POUND	REINFORCING STEEL, REPLACEMENT OF EXISTING REINFORCING STEEL, AS PER PLAN	100		200		19/60
510	10000	354	EACH	DOWEL HOLES WITH NONSHRINK, NONMETALLIC GROUT	354				
511	34410	11	CU YD	CLASS QC2 CONCRETE, SUPERSTRUCTURE			11		
511	45710	17	CU YD	CLASS QC1 CONCRETE, ABUTMENT	17				
512	10100	474	SQ YD	SEALING OF CONCRETE SURFACES (EPOXY-URETHANE)	285	46	143		
512	73501	1,029	SQ YD	TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN			1,029		20/60
512	74000	451	SQ YD	REMOVAL OF EXISTING COATINGS FROM CONCRETE SURFACES	285	23	143		
513	21600	3,865	POUND	STRUCTURAL STEEL FOR REHABILITATION, AS PER PLAN			3,865		19/60
514	00050	12,847	SQ FT	SURFACE PREPARATION OF EXISTING STRUCTURAL STEEL			12,847		
514	00056	12,847	SQ FT	FIELD PAINTING OF EXISTING STRUCTURAL STEEL, PRIME COAT			12,847		
514	00060	12,847	SQ FT	FIELD PAINTING STRUCTURAL STEEL, INTERMEDIATE COAT			12,847		
514	00066	12,847	SQ FT	FIELD PAINTING STRUCTURAL STEEL, FINISH COAT			12,847		
514	00504	22	MAN HOUR	GRINDING FINS, TEARS, SLIVERS ON EXISTING STRUCTURAL STEEL			22		
514	10000	11	EACH	FINAL INSPECTION REPAIR			11		
516	10901	129	FT	ELASTOMERIC COMPRESSION SEAL, AS PER PLAN			129		27/60
516	11211	162	FT	STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL, AS PER PLAN			162		35/60
516	44101	20	EACH	ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE), AS PER PLAN (10.5"x10.5"x2.06" WITH 17.75"x13.88"x1.50" MIN. THICKNESS LOAD PLATE)			20		32/60
516	47001	LUMP		JACKING AND TEMPORARY SUPPORT OF SUPERSTRUCTURE, AS PER PLAN				LUMP	21/60
517	76300	25	FT	RAILING, MISC.: PORTION OF BRIDGE RAIL REMOVED AND REBUILT			25		20/60
SPECIAL	51822300	12	FT	STEEL DRIP STRIP			12		
519	11101	15.75	SQ FT	PATCHING CONCRETE STRUCTURE, AS PER PLAN	15.75				19/60
SPECIAL	53000200	LUMP		STRUCTURE, MISC.: POWER WASHING STRUCTURE CONCRETE				LUMP	19/60
SPECIAL	690 98400	LUMP		MISC.: CONSULTANT FOR CONCRETE QUALITY CONTROL INCLUDING TESTING AND INSPECTION				LUMP	21/60

ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-32-1425L					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
512	73501	1,064	SQ YD	TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN			1,064		20/60
519	11101	103	SQ FT	PATCHING CONCRETE STRUCTURE, AS PER PLAN			103		

ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-32-1425R					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
512	73501	1,064	SQ YD	TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN			1,064		20/60
519	11101	100	SQ FT	PATCHING CONCRETE STRUCTURE, AS PER PLAN			100		19/60

ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-32-1314L					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
512	10300	3	SQ YD	SEALING CONCRETE BRIDGE DECKS WITH HMWM RESIN			3		
519	11101	36	SQ FT	PATCHING CONCRETE STRUCTURE, AS PER PLAN			36		19/60

DESIGN AGENCY: STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE
 DATE: _____
 REVIEWED: SCS
 STRUCTURE FILE NUMBER: _____
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 BRIDGE No.: VARIES
 D08 - BM - FY 2014
 PID No. 84530
 1 / 3
 22 / 60

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ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-32-1214					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
509	10001	2,672	POUND	EPOXY COATED REINFORCING STEEL, AS PER PLAN				2,672	
510	10000	140	EACH	DOWEL HOLES WITH NONSHRINK, NONMETALLIC GROUT	20			120	
511	34410	30	CU YD	CLASS QC2 CONCRETE, SUPERSTRUCTURE				30	
512	10100	43	SQ YD	SEALING OF CONCRETE SURFACES (EPOXY-URETHANE)				43	
512	73501	1,930	SQ YD	TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN			1,930		20/60
516	13600	16	SQ FT	1" PREFORMED EXPANSION JOINT FILLER	16				
519	11101	44	SQ FT	PATCHING CONCRETE STRUCTURE, A PER PLAN				44	19/60
SPECIAL	690 98400	LUMP		MISC.: CONSULTANT FOR CONCRETE QUALITY CONTROL INCLUDING TESTING AND INSPECTION				LUMP	
846	00120	2.45	CU YD	POLYMER MODIFIED ASPHALT EXPANSION JOINT SYSTEM			2.45		

ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-132-2473					FUNDING: 100% 02/S>2/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
846	00120	1.20	CU YD	POLYMER MODIFIED ASPHALT EXPANSION JOINT SYSTEM			1.20		

ESTIMATED QUANTITIES FOR BRIDGE No.: GRE-35-2297					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
512	73501	1,007	SQ YD	TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN			840	167	
842	10000	20,000	POUND	CORRECTING ELEVATION OF CONCRETE APPROACH SLABS WITH HIGH DENSITY POLYURETHANE				20,000	

ESTIMATED QUANTITIES FOR BRIDGE No.: HAM-562-0227					FUNDING: 100% 01/NHS/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	75261	170	FT	VANDAL PROTECTION FENCE REMOVED, AS PER PLAN			170		44/60
607	39911	170	FT	VANDAL PROTECTION FENCE, 8' STRAIGHT, COATED FABRIC, AS PER PLAN			170		44/60

ESTIMATED QUANTITIES FOR BRIDGE No.: PRE-127-1718					FUNDING: 100% 04/STR/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
846	00120	1.57	CU YD	POLYMER MODIFIED ASPHALT EXPANSION JOINT SYSTEM			1.57		

ESTIMATED QUANTITIES FOR BRIDGE No.: PRE-177-0486					FUNDING: 100% 04/STR/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
846	00120	1.50	CU YD	POLYMER MODIFIED ASPHALT EXPANSION JOINT SYSTEM			1.50		

DESIGN AGENCY
STATE OF OHIO
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DISTRICT 8 - BRIDGE OFFICE

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BRIDGE No.: VARIES

D08 - BM - FY 2014
PID No. 84530

2 / 3

23
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ESTIMATED QUANTITIES FOR BRIDGE No.: CLE-743-0466					FUNDING: 100% 03/NFA/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
512	73501	433	SQ YD	TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN			255	178	20/60
842	10000	20,000	POUND	CORRECTING ELEVATION OF CONCRETE APPROACH SLABS WITH HIGH DENSITY POLYURETHANE				20,000	

ESTIMATED QUANTITIES FOR BRIDGE No.: WAR-123-0598					FUNDING: 100% 04/STR/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
509	10001	3,888	POUND	EPOXY COATED REINFORCING STEEL, AS PER PLAN	1,463		2,425		19/60
509	20001	400	POUND	REINFORCING STEEL, REPLACEMENT OF EXISTING REINFORCING STEEL, AS PER PLAN	200		200		19/60
510	10000	284	EACH	DOWEL HOLES WITH NONSHRINK, NONMETALLIC GROUT	284				
511	34410	10	CU YD	CLASS QC2 CONCRETE, SUPERSTRUCTURE			10		
511	45710	14	CU YD	CLASS QC1 CONCRETE, ABUTMENT	14				
512	10100	861	SQ YD	SEALING OF CONCRETE SURFACES (EPOXY-URETHANE)	334	53	474		
512	10400	1,894	SQ YD	TREATING OF CONCRETE BRIDGE DECK WITH SRS			1,894		
512	74000	861	SQ YD	REMOVAL OF EXISTING COATINGS FROM CONCRETE SURFACES	334	53	474		
513	21600	2,912	POUND	STRUCTURAL STEEL FOR REHABILITATION, AS PER PLAN			2,912		19/60
514	00050	27,517	SQ FT	SURFACE PREPARATION OF EXISTING STRUCTURAL STEEL			27,517		
514	00056	27,517	SQ FT	FIELD PAINTING OF EXISTING STRUCTURAL STEEL, PRIME COAT			27,517		
514	00060	27,517	SQ FT	FIELD PAINTING STRUCTURAL STEEL, INTERMEDIATE COAT			27,517		
514	00066	27,517	SQ FT	FIELD PAINTING STRUCTURAL STEEL, FINISH COAT			27,517		
514	00504	36	MAN HOUR	GRINDING FINS, TEARS, SLIVERS ON EXISTING STRUCTURAL STEEL			36		
514	10000	23	EACH	FINAL INSPECTION REPAIR			23		
516	11211	127	FT	STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL, AS PER PLAN			127		58/60
516	46201	2	EACH	BEARING DEVICE, ROCKER, AS PER PLAN			2		
516	45305	10	EACH	REFURBISH BEARING DEVICE, AS PER PLAN			10		20/60
516	47001	LUMP		JACKING AND TEMPORARY SUPPORT OF SUPERSTRUCTURE, AS PER PLAN					
517	76300	25	FT	RAILING, MISC.: PORTION OF BRIDGE RAIL REMOVED AND REBUILT			25		20/60
SPECIAL	51822300	12	FT	STEEL DRIP STRIP			12		
519	11101	379	SQ FT	PATCHING CONCRETE STRUCTURE, AS PER PLAN	278	101			19/60
SPECIAL	53000200	LUMP		STRUCTURE, MISC.: POWER WASHING STRUCTURE CONCRETE					
SPECIAL	690 98400	LUMP		MISC.: CONSULTANT FOR CONCRETE QUALITY CONTROL INCLUDING TESTING AND INSPECTION				LUMP	

ESTIMATED QUANTITIES FOR BRIDGE No.: WAR-123-1740					FUNDING: 100% 02/S>2/BR				
ITEM	EXTENSION	TOTAL	UNIT	DESCRIPTION	ABUT.	PIERS	SUPER.	GEN.	SHT. No.
202	11203	LUMP		PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	19/60
846	00120	2.30	CU YD	POLYMER MODIFIED ASPHALT EXPANSION JOINT SYSTEM			2.30		

DESIGN AGENCY
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STRUCTURE ESTIMATED QUANTITIES
BRIDGE No.: VARIES

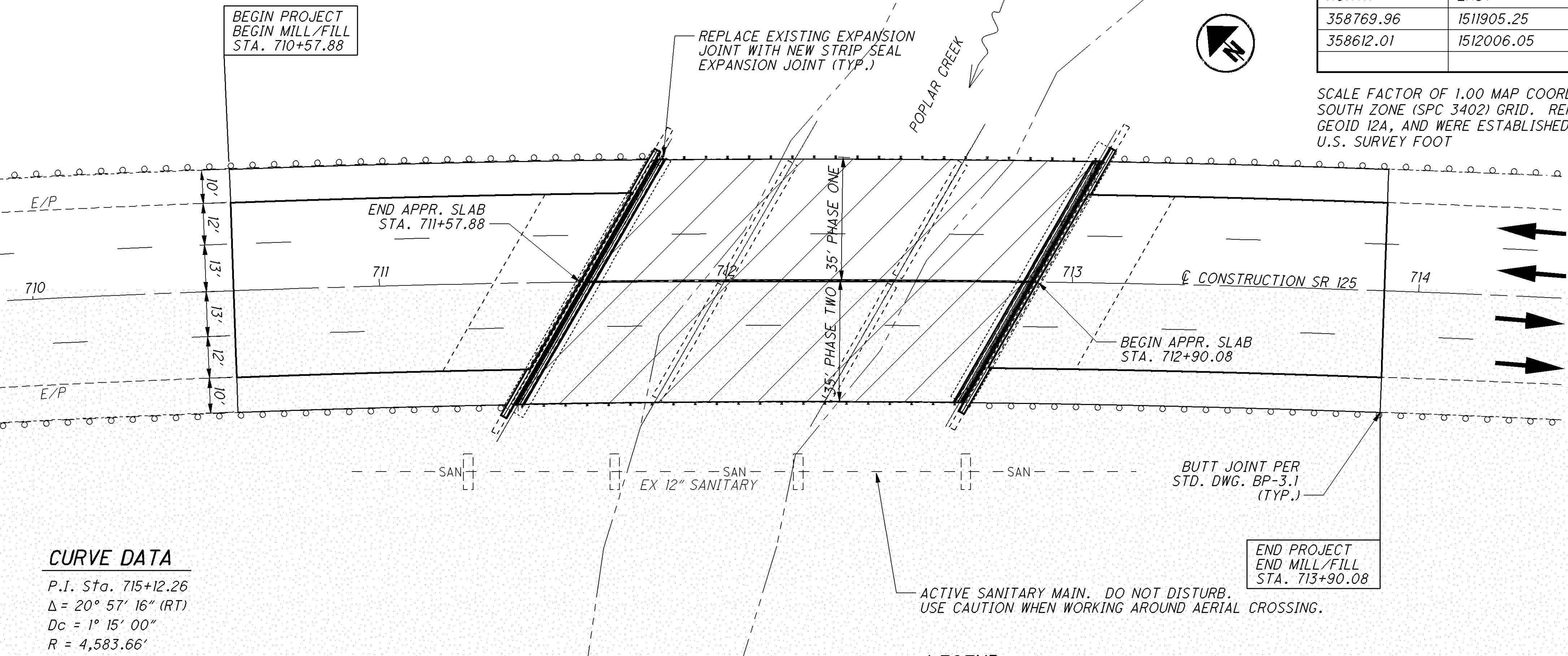
D08 - BM - FY2014
PID No. 84530

3 / 3

24
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BENCHMARK DATA					
NORTH	EAST	ELEVATION	FEATURE	STATION	OFFSET
358769.96	1511905.25	831.08	MAGS	711+08.59	38.63 LT
358612.01	1512006.05	829.04	MAG	712+79.18	38.91 RT

SCALE FACTOR OF 1.00 MAP COORDINATES ARE ON OHIO STATE PLANE SOUTH ZONE (SPC 3402) GRID. REFERENCE FRAME NAD 83 ELLIPOID GRS 80 GEOID 12A, AND WERE ESTABLISHED USING THE ODOT VRS. UNITS ARE IN U.S. SURVEY FOOT



EXISTING STRUCTURE

TYPE: CONTINUOUS STEEL BEAM WITH NON-COMPOSITE REINFORCED CONCRETE DECK SUPPORTED ON REINFORCED CONCRETE STUB ABUTMENTS AND 'T' TYPE PIERS

SPANS: 39'-0"±, 49'-0"±, 39'-0"

ROADWAY: 70'-0"± FACE/FACE OF RAILING

LOADING: HS20-44

SKUEW: 30° LEFT FORWARD

APPROACH SLABS: 25'-0" (AS-1-54)

ALIGNMENT: 1°15' CURVE RIGHT

SUPER ELEVATION: 0.024 FT/FT

STRUCTURAL FILE NUMBER: 1302434

WEARING SURFACE: 2" THK. MSC OVERLAY

DATE BUILT: 1969

DISPOSITION: SEE PROPOSED WORK

COORDINATES: LATITUDE N 38°58'26" LONGITUDE W84°06'22"

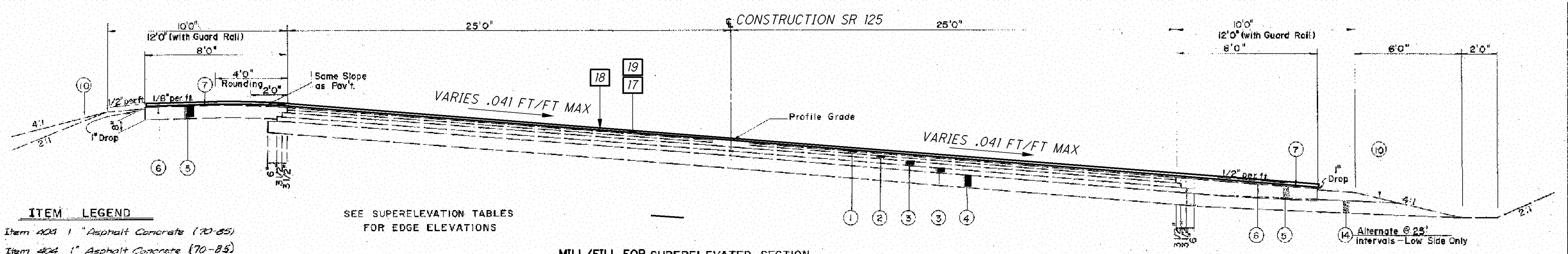
CURVE DATA

P.I. Sta. 715+12.26
 $\Delta = 20^\circ 57' 16''$ (RT)
 $D_c = 1^\circ 15' 00''$
 $R = 4,583.66'$
 $T = 847.64'$
 $L = 1,676.35'$
 $E = 77.72'$
 $C = 1,667.02'$
 $C.B. = S 53^\circ 07' 34'' E$

LEGEND

SEALING CONCRETE WITH GRAVITY FED RESIN

ACTIVE SANITARY MAIN. DO NOT DISTURB. USE CAUTION WHEN WORKING AROUND AERIAL CROSSING.



ITEM	LEGEND
1	Item 401 1" Asphalt Concrete (70-85)
14	Item 404 1" Asphalt Concrete (70-85)
2	Item 402 1" Asphalt Concrete (70-85)
24	Item 402 1" Asphalt Concrete (70-85)
3	Item 301 3/4" Bituminous Aggregate Base 70E101 (85-100) or 70E102 14-12
34	Item 301 Variable Thickness (9" Min.) Bituminous Aggregate Base 70E101 (85-100) or 70E102 14-12 (Precluding 5" Min. in Proposal)
36	Item 301 4" Bituminous Aggregate Base 70E101 (85-100) or 70E102 14-12
4	Item 310 8" Subbase
44	Item 310 6" Subbase
46	Item 310 8" Subbase, Grading 'C' or 'D'
48	Item 310 6" Subbase, Grading 'C' or 'D'
49	Item 310 4" Subbase, Grading 'C' or 'D'
5	Item 304 6" Aggregate Base
54	Item 304 6" Aggregate Base
56	Item 304 5" Aggregate Base
6	Item 405 Bituminous Prime Coat (Applied at the Rate of 0.4 gal./sq.yd.) 70E101 R.T. 2" or R.T. 3"
7	Item 405 Seal Coat (Applied at rate of 0.3 gal./sq.yd. 70E101, RT. 1" or 2" or 70E102 RT. 1" or 2" and 1/2" Aggregate applied at 0.025 cu.yd./sq.yd.)

SEE SUPERELEVATION TABLES FOR EDGE ELEVATIONS

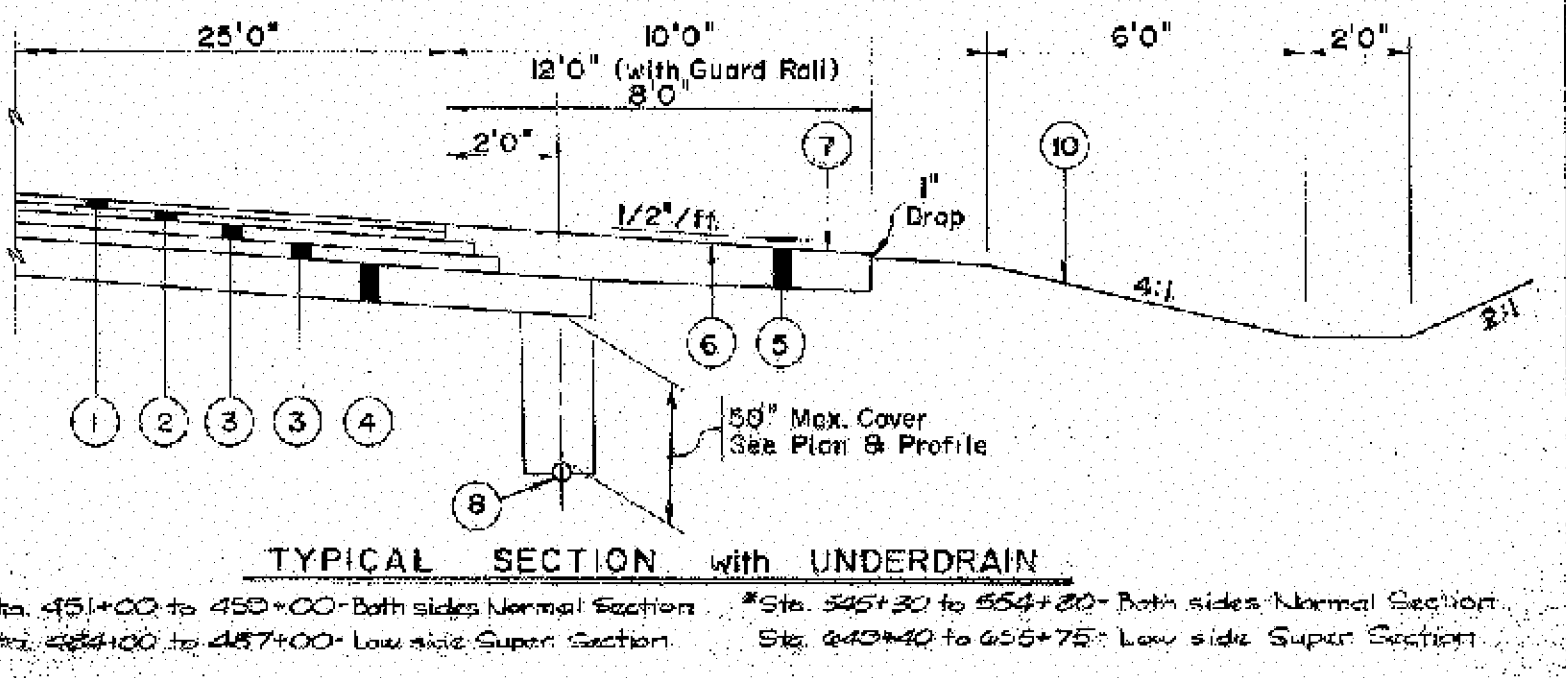
MILL/FILL FOR SUPERELEVATED SECTION

Sta. 425+75 to 415+75 (Trans.)	Sta. 487+00 to 480+00	Sta. 607+25 to 607+50 (Trans.)	Sta. 705+00 to 705+00 (Trans.)
Sta. 415+75 to 415+00	Sta. 480+00 to 482+25 (Trans.)	Sta. 607+50 to 648+50 (Trans.)	Sta. 705+00 to 721+75
Sta. 415+00 to 415+25 (Trans.)	Sta. 482+25 to 533+00 (Trans.)	Sta. 648+50 to 648+10	Sta. 711+37.25 to 711+37.58 Approach Slope
Sta. 415+25 to 445+50 (Trans.)	Sta. 533+00 to 543+25	Sta. 648+10 to 655+75	Sta. 711+37.58 to 718+15.08 Bridge CLE 125-1354
Sta. 445+50 to 458+25	Sta. 543+25 to 548+25	See Underdrain Section	Sta. 718+15.08 to 723+75 (Trans.)
Sta. 458+25 to 471+50 (Trans.)	Sta. 548+25 to 548+25	Sta. 655+75 to 657+00	Sta. 723+75 to 725+50 (Trans.)
Sta. 471+50 to 478+25 (Trans.)	Sta. 548+25 to 570+25	Sta. 657+00 to 658+25 (Trans.)	Sta. 725+50 to 725+25
Sta. 478+25 to 484+00	Sta. 570+25 to 581+75	Sta. 658+25 to 664+50 (Trans.)	Sta. 725+25 to 725+50 (Trans.)
Sta. 484+00 to 487+00	Sta. 581+75 to 595+25 (Trans.)	Sta. 664+50 to 673+25	Sta. 725+50 to 725+50 (Trans.)
See Underdrain Section	Sta. 595+25 to 607+25	Sta. 673+25 to 683+75	(See Detail)

6	Item 605 6" Deep Pipe Underdrains
7	Item 613 Traffic Dividers, Standard Precast Concrete
8	Item 650 Seeding and Mulching
10	Item 606 Guard Rail, Type 4
11	Item 407 Bituminous Tack Coat (Applied at the rate of 0.10 gal./sq.yd.) 70E101 RT. 1" or 1.5" or 70E102 RT. 1" or 1.5"
12	Item 609 Combination Curb & Gutter, Std. Type 2 (T+3/16")
13	Item 609 Combination Curb & Gutter, Type 2 Modified 45 per plan (T+1/16")
14	Item 605 Aggregate Drains
15	Item 305 9" Portland Cement Concrete Base
16	Item 608 4" Concrete Walk

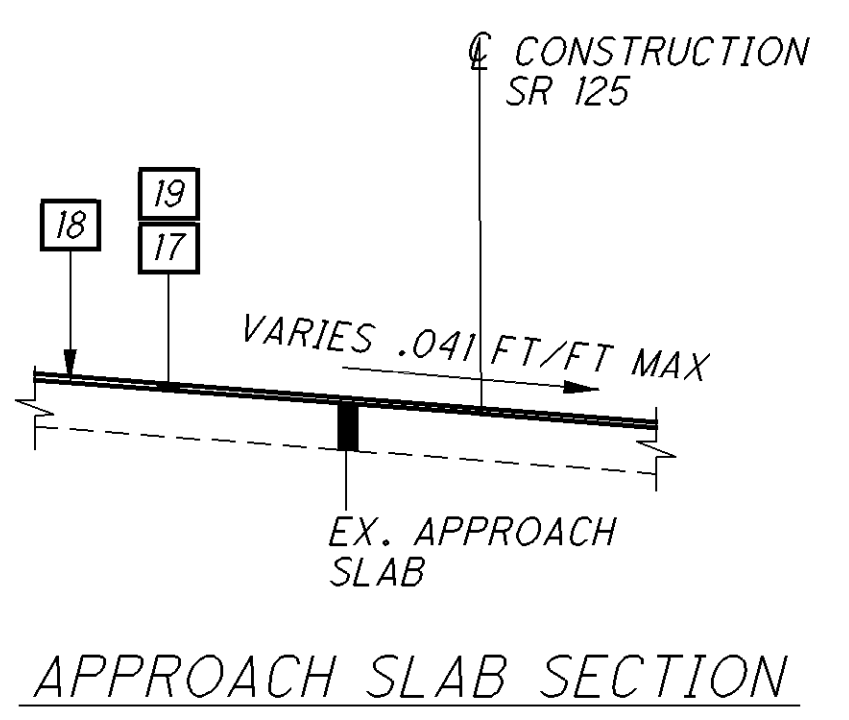
PROPOSED WORK

- 17 PAVEMENT PLANING, ASPHALT (T=1.50')
- 18 TACK COAT FOR INTERMEDIATE COURSE
- 19 ASPHALT CONCRETE SURFACE COURSE, TYPE 1, PG 64-28 (T=1.50')

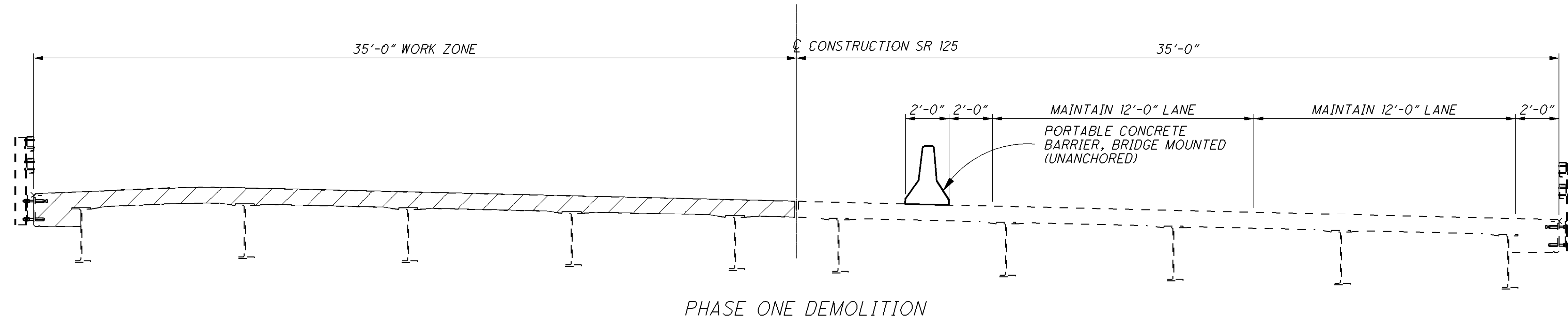
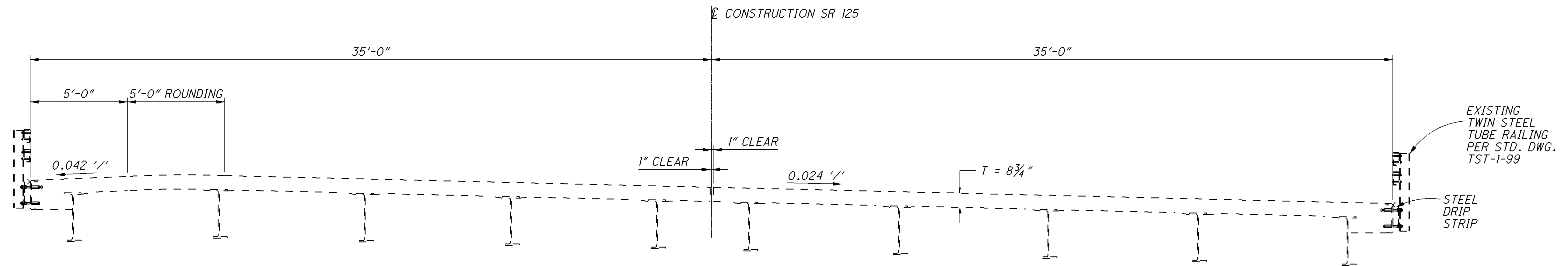


NOTE:

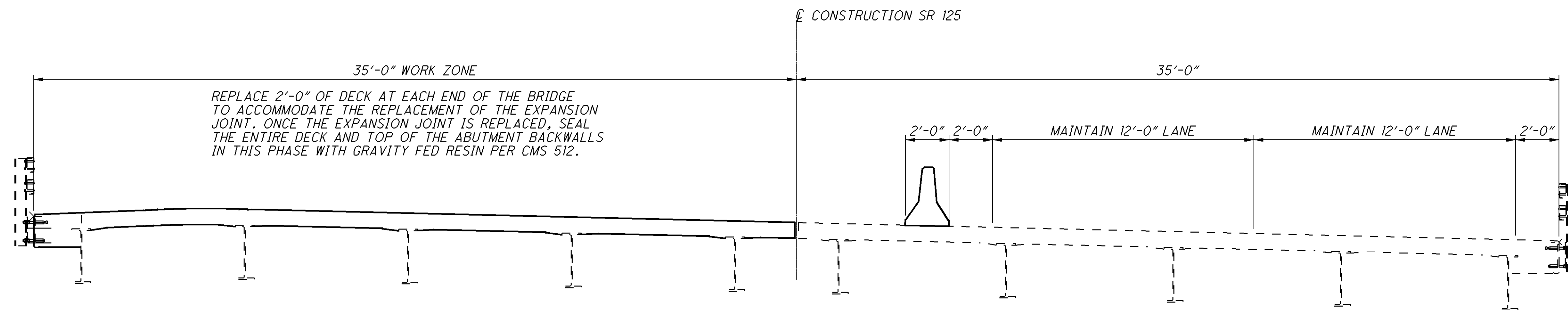
- SEE SHEET 18 OF 60 FOR PAVEMENT QUANTITIES.
- PROVIDE PAVEMENT BUTT JOINT WHERE NEW ASPHALT MEETS EXISTING PER STD. DWG. BP-3.1.



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PHASE ONE DEMOLITION



PHASE ONE CONSTRUCTION

LEGEND

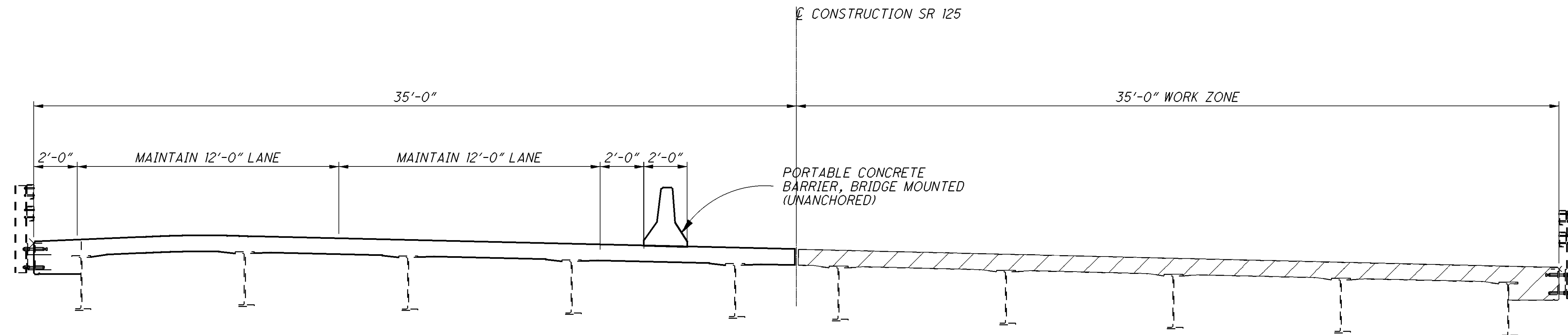
ITEM 202 - PORTIONS OF EXISTING STRUCTURE TO BE REMOVED

NOTES:

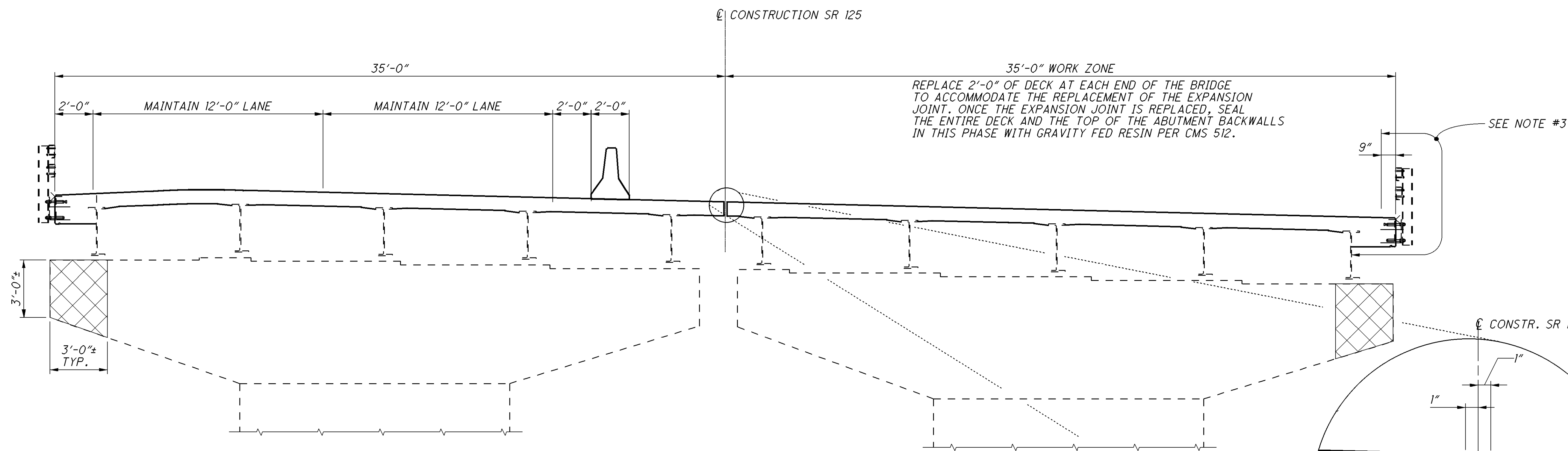
1. REFER TO MAINTENANCE OF TRAFFIC PLANS FOR ADDITIONAL INFORMATION.
2. CROSSFRAMES NOT SHOWN FOR CLARITY.

PHASE CONSTRUCTION DETAILS 01	BRIDGE NO: CLE-125-1347 S.R. 125 OVER POPLAR CREEK	DESIGNED CAH	CHECKED RSK
D08-BM-FY2014	PID No. 84530	DRAWN CAH	REVISED
2 / 11	26 / 60	REVIEWED SCS	DATE 1-24-14
		STRUCTURE FILE NUMBER 1302434	DESIGN AGENCY STATE OF OHIO DEPARTMENT OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE

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PHASE TWO DEMOLITION



PHASE TWO CONSTRUCTION

LEGEND

- ITEM 202 - PORTIONS OF EXISTING STRUCTURE TO BE REMOVED
- ITEM 512 - SEALING EXISTING STRUCTURE WITH EPOXY-URETHANE

NOTES:

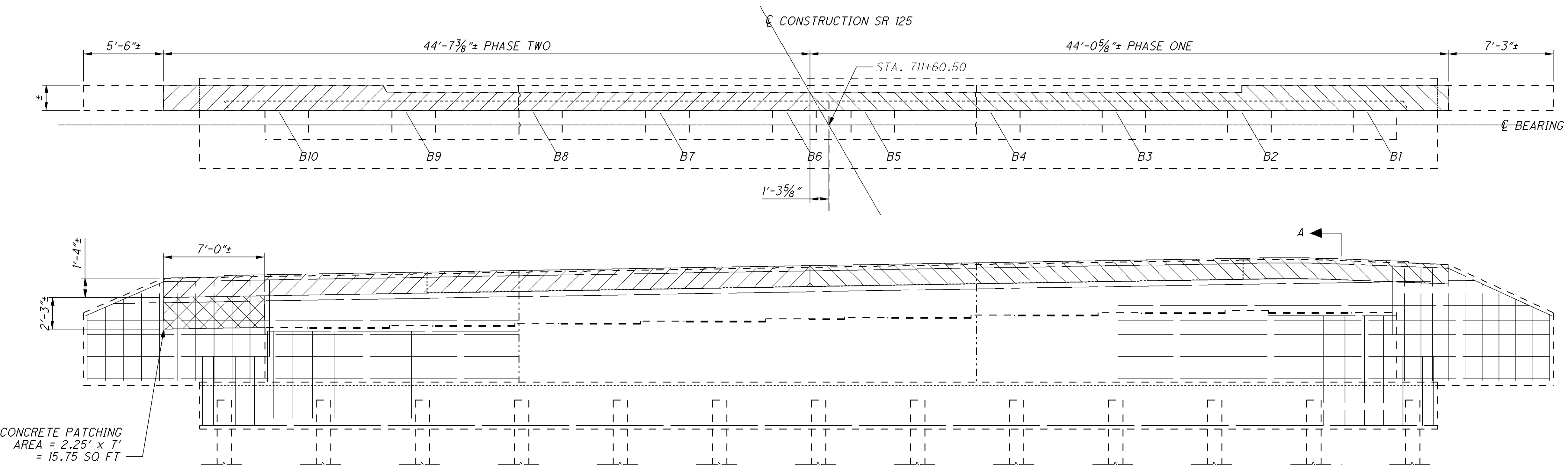
1. REFER TO MAINTENANCE OF TRAFFIC PLANS FOR ADDITIONAL INFORMATION.
2. CROSSFRAMES NOT SHOWN FOR CLARITY.
3. REMOVE EXISTING CONCRETE SEALER AND RE-SEAL ENDS OF PIER CAPS AND DECK EDGES AS SHOWN.

ITEM 516 - ELASTOMERIC COMPRESSION SEAL, AS PER PLAN

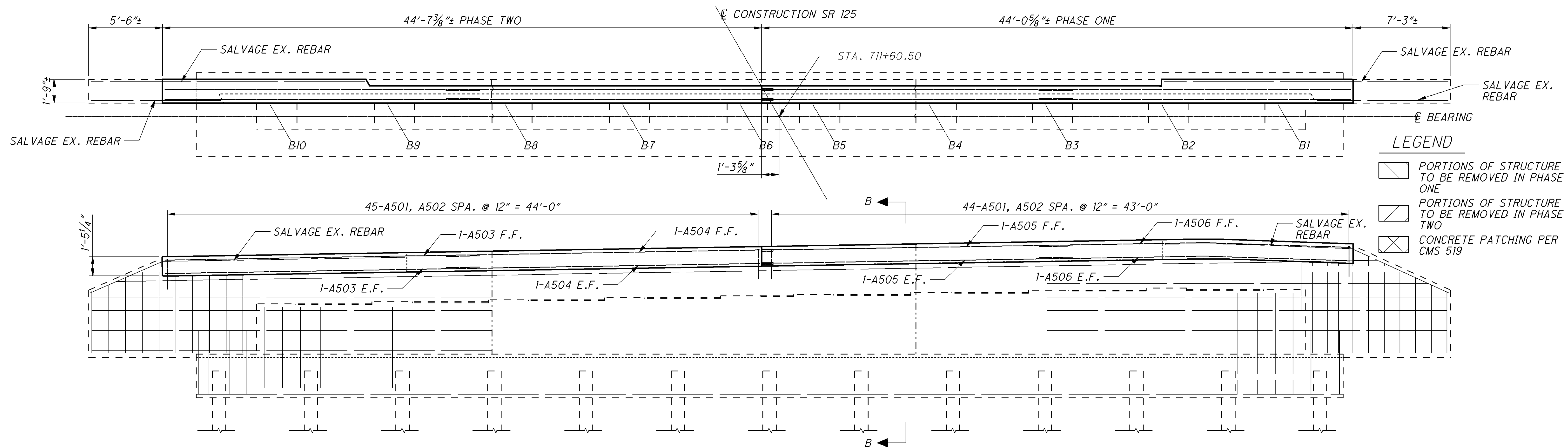
ONCE THE DECK IS SEALED WITH GRAVITY FED RESIN AND ALLOWED TO CURE, INSTALL AN ELASTOMERIC JOINT SEALER FOR THE FULL LENGTH OF THE LONGITUDINAL JOINT BETWEEN THE DECKS. ELASTOMERIC JOINT SEALER SHALL BE BONDED TO THE DECK EDGES USING EPOXY ADHESIVE. GLAND SHALL BE D.S. BROWN JP 300 JOINT WITH A 3.25" MINIMUM WIDTH, WATSON BOWMAN JEENE 75W JOINT WITH A 3" MINIMUM WIDTH OR APPROVED EQUAL. THE COMPRESSION SEAL AND BONDING AGENT ALONG WITH ANY MISCELLANEOUS TASKS OR ITEMS REQUIRED TO COMPLETE THE INSTALLATION SHALL BE INCLUDED WITH ITEM 516 - ELASTOMERIC COMPRESSION SEAL, AS PER PLAN FOR PAYMENT.

PHASE CONSTRUCTION DETAILS 02	DESIGN AGENCY STATE OF OHIO DEPARTMENT OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE
BRIDGE NO: CLE-125-1347 S.R. 125 OVER POPLAR CREEK	DATE 1-24-14 REVIEWED SCS STRUCTURE FILE NUMBER 8305374
DRAWN CAH REVISED	DESIGNED CAH CHECKED RSK
D08-BM-FY2014	PID No. 84530
3 / 11	27 / 60

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ABUTMENT DEMOLITION



- LEGEND**
- PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE ONE
 - PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE TWO
 - CONCRETE PATCHING PER CMS 519

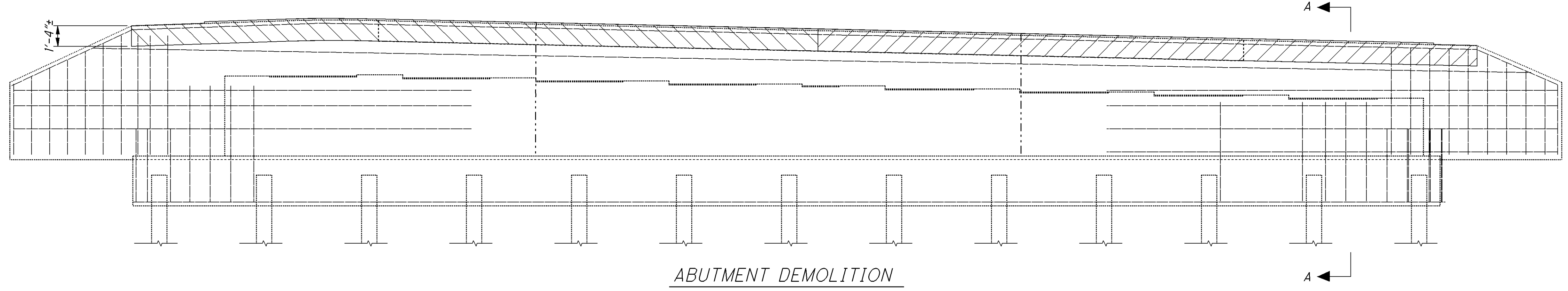
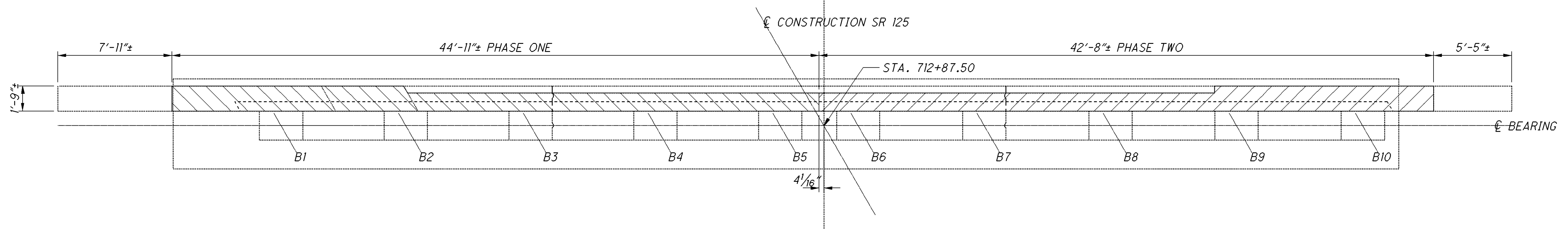
NOTES:

1. SAWCUT AND REMOVE A PORTION OF THE EXISTING ABUTMENT BACKWALL FULL DEPTH INCLUDING REBAR. SALVAGE SELECT REBAR AS NOTED IN THE PLANS. CONTRACTOR SHALL NOT DAMAGE THE PORTION OF THE EXISTING APPROACH SLAB TO REMAIN. SAW CUTTING INCLUDING UNDER ITEM 202 - PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN FOR PAYMENT.
2. 12" MIN. EMBEDMENT FOR REBAR DOWELS
3. SEE SHEET 10 & 11 OF 11 FOR DECK SLAB DETAILS.
4. ANY ELEVATIONS SHOWN SHOULD BE CONSIDERED TENTATIVE AND APPROXIMATE. IT IS THE CONTRACTOR'S RESPONSIBILITY TO SURVEY AND VERIFY THE EXISTING DECK/BACKWALL ELEVATIONS REQUIRED TO FABRICATE A PROPOSED STRIP SEAL EXPANSION JOINT THAT WILL TIE IN WITH THE EXISTING ROADWAY PROFILE AND CROSS SLOPE. COSTS TO SURVEY AND VERIFY THE EXISTING ABUTMENT ELEVATIONS SHALL BE INCLUDED UNDER ITEM 516 - STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL FOR PAYMENT.
5. SEE SHEET 6 OF 11 FOR ABUTMENT SECTIONS.

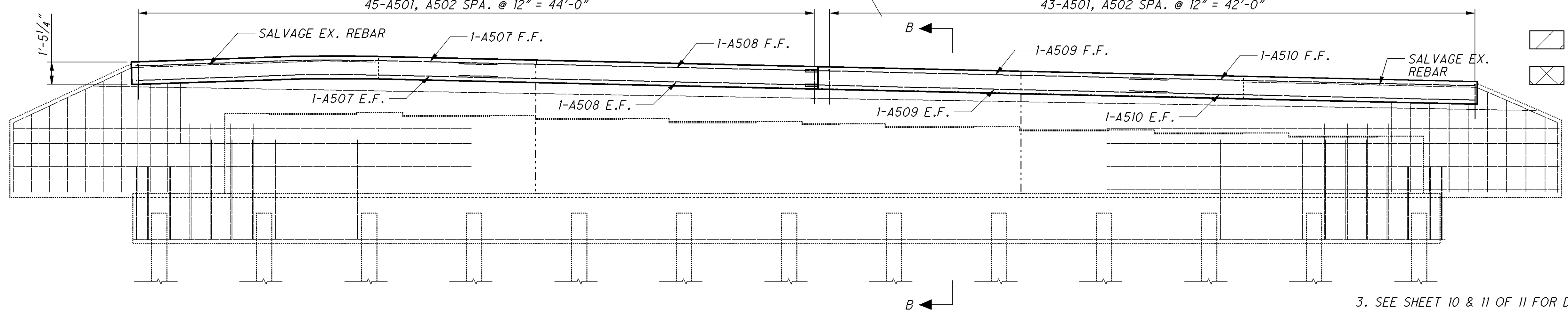
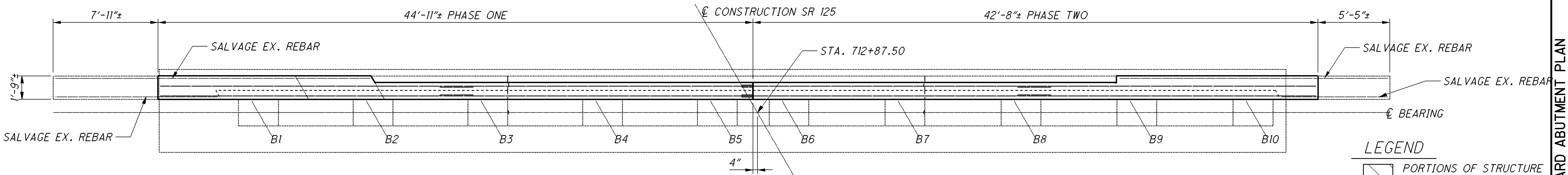
ABUTMENT CONSTRUCTION

DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE	DATE 1-24-14	REVIEWED SCS	DRAWN CAH	DESIGNED CAH
STRUCTURE FILE NUMBER 1302434	STRUCTURE FILE NUMBER 1302434	REVISOR REVISED	CHECKED NEW	CHECKED NEW
REAR ABUTMENT PLAN				
BRIDGE No.: CLE-125-1347				
SR 125 OVER POPLAR CREEK				
D08 - BM - FY2014	PID No. 84530			4 / 11
28				60

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ABUTMENT DEMOLITION



ABUTMENT CONSTRUCTION

- LEGEND**
- PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE ONE
 - PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE TWO
 - CONCRETE PATCHING PER CMS 519

NOTES:

1. SAWCUT AND REMOVE A PORTION OF THE EXISTING ABUTMENT BACKWALL FULL DEPTH INCLUDING REBAR. SALVAGE SELECT REBAR AS NOTED IN THE PLANS. CONTRACTOR SHALL NOT DAMAGE THE PORTION OF THE EXISTING APPROACH SLAB TO REMAIN. SAW CUTTING INCLUDING UNDER ITEM 202 - PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN FOR PAYMENT.
2. 12" MIN. EMBEDMENT FOR REBAR DOWELS
3. SEE SHEET 10 & 11 OF 11 FOR DECK SLAB DETAILS.
4. ANY ELEVATIONS SHOWN SHOULD BE CONSIDERED TENTATIVE AND APPROXIMATE. IT IS THE CONTRACTOR'S RESPONSIBILITY TO SURVEY AND VERIFY THE EXISTING DECK/BACKWALL ELEVATIONS REQUIRED TO FABRICATE A PROPOSED STRIP SEAL EXPANSION JOINT THAT WILL TIE IN WITH THE EXISTING ROADWAY PROFILE AND CROSS SLOPE. COSTS TO SURVEY AND VERIFY THE EXISTING ABUTMENT ELEVATIONS SHALL BE INCLUDED UNDER ITEM 516 - STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL FOR PAYMENT.
5. SEE SHEET 6 OF 11 FOR ABUTMENT SECTIONS.

DESIGN AGENCY
STATE OF OHIO
DEPT. OF TRANSPORTATION
DISTRICT 8 - BRIDGE OFFICE

DATE
1-24-14

REVIEWED
SCS

STRUCTURE FILE NUMBER
1302434

DRAWN
CAH

CHECKED
CAH

REVISED
NEW

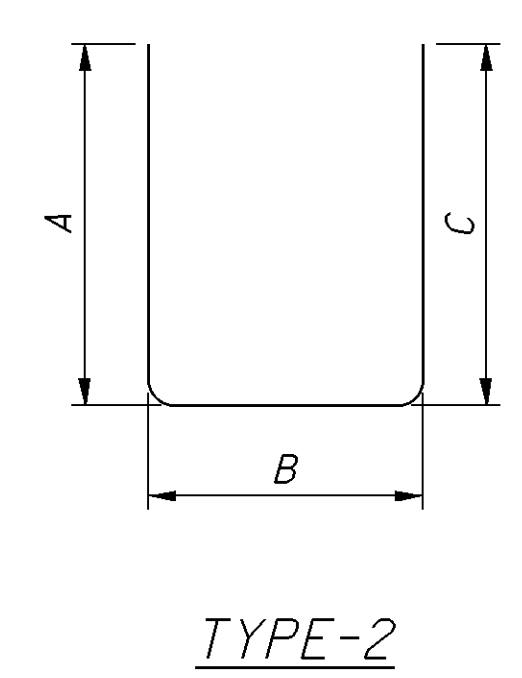
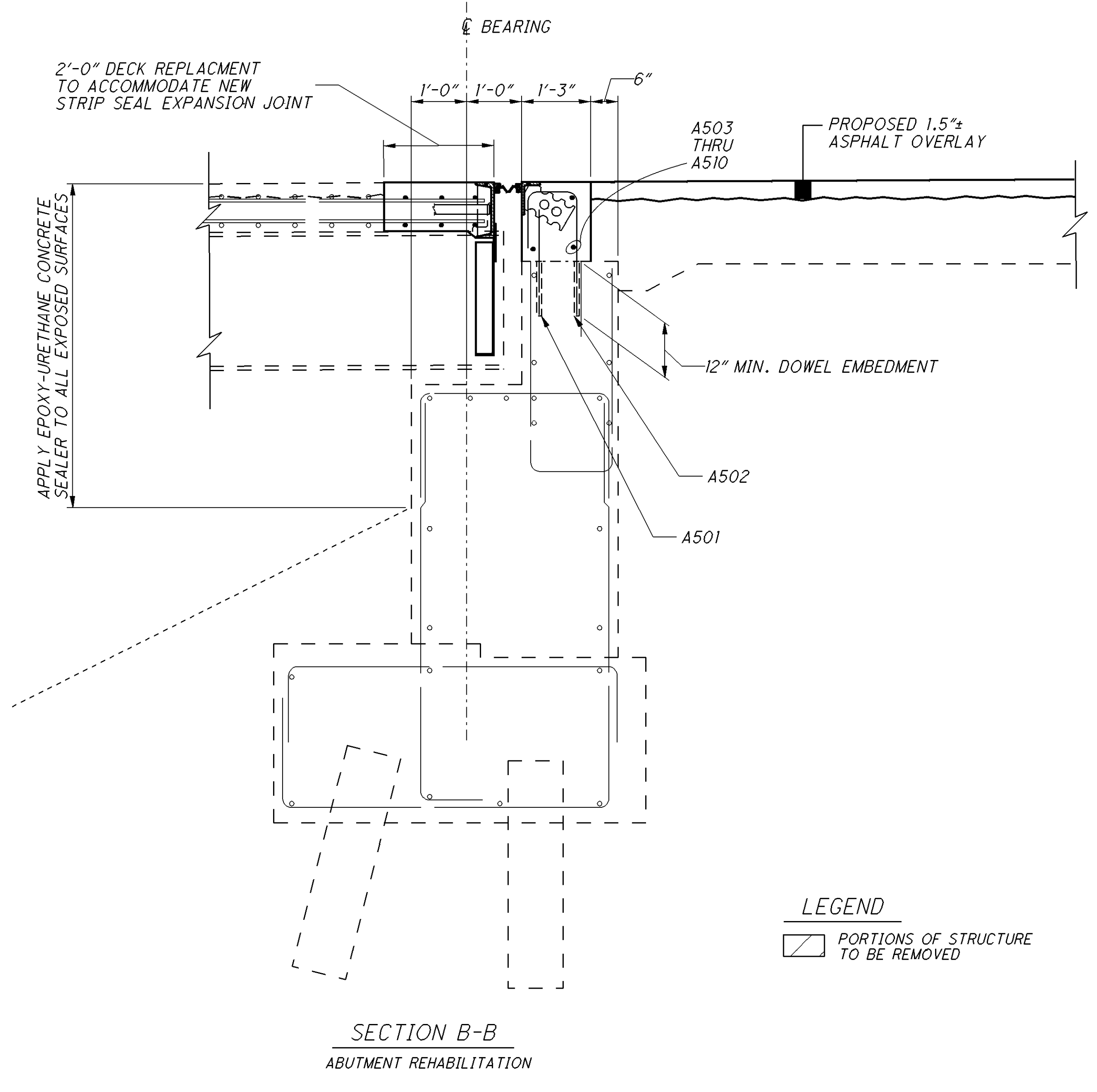
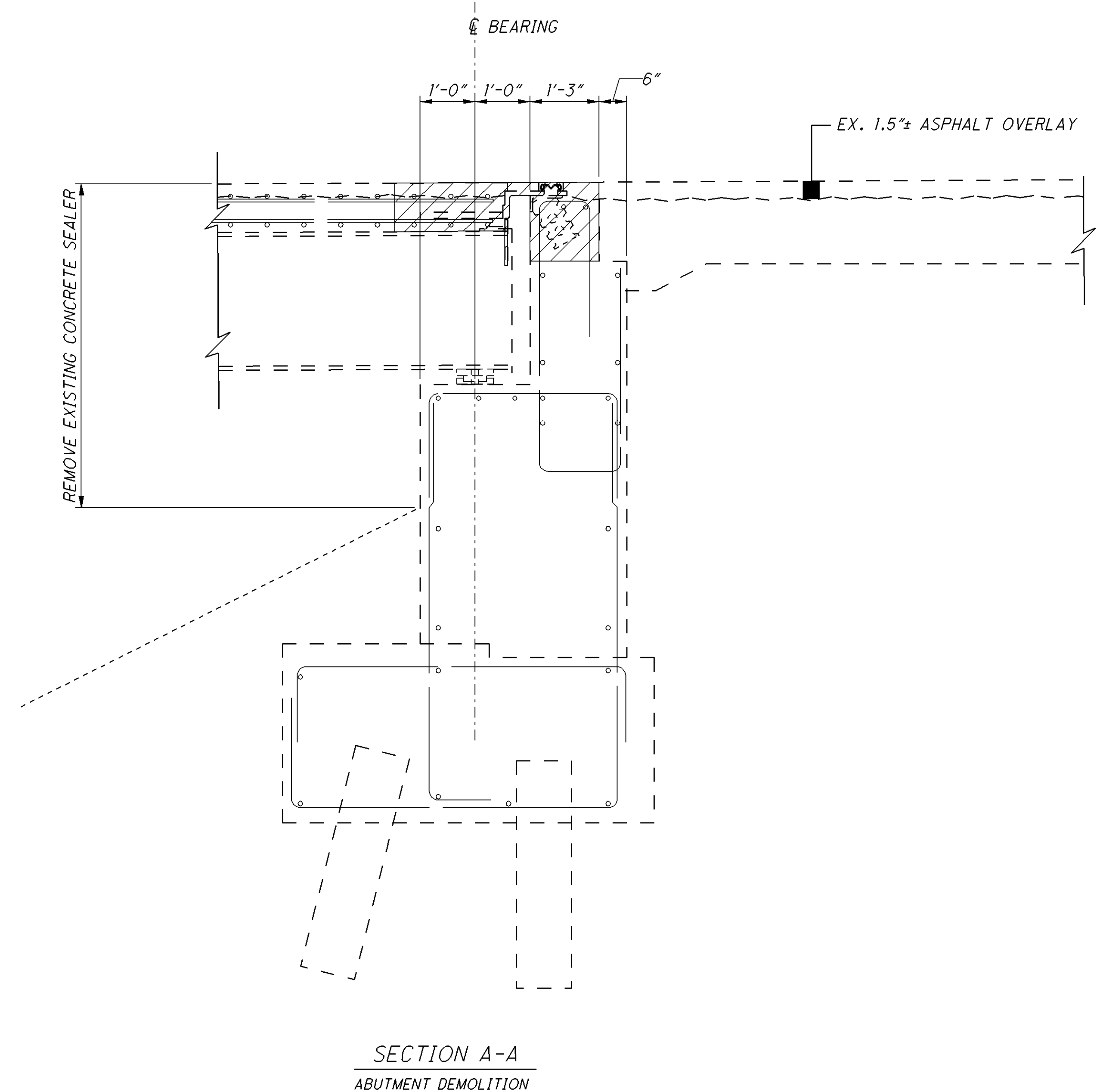
FORWARD ABUTMENT PLAN

BRIDGE No.: CLE-125-1347
SR 125 OVER POPLAR CREEK

D08 - BM - FY 2014

PID No. 84530

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LEGEND
 PORTIONS OF STRUCTURE TO BE REMOVED

MARK	NUMBER			LENGTH	WEIGHT	TYPE	DIMENSIONS					
	REAR ABUTMENT	FORWARD ABUTMENT	TOTAL				A	B	C	D	E	R
ABUTMENT REINFORCING STEEL LIST												
A501	89	88	177	2'-0"	369	STR						
A502	89	88	177	4'-1"	754	2	1'-2"	0'-11"	2'-3"			
A503	3		3	23'-6"	74	STR						
A504	3		3	23'-6"	74	STR						
A505	3		3	23'-2"	72	STR						
A506	3		3	23'-3"	73	STR						
A507		3	3	23'-6"	74	STR						
A508		3	3	23'-6"	74	STR						
A509		3	3	22'-9"	71	STR						
A510		3	3	22'-6"	70	STR						
SUB-TOTAL					1,705							

DESIGN AGENCY: STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE

DATE: 1-24-14
 REVIEWED: SCS
 STRUCTURE FILE NUMBER: 1302434

DRAWN: CAH
 CHECKED: CAH
 REVISIONS: NEW

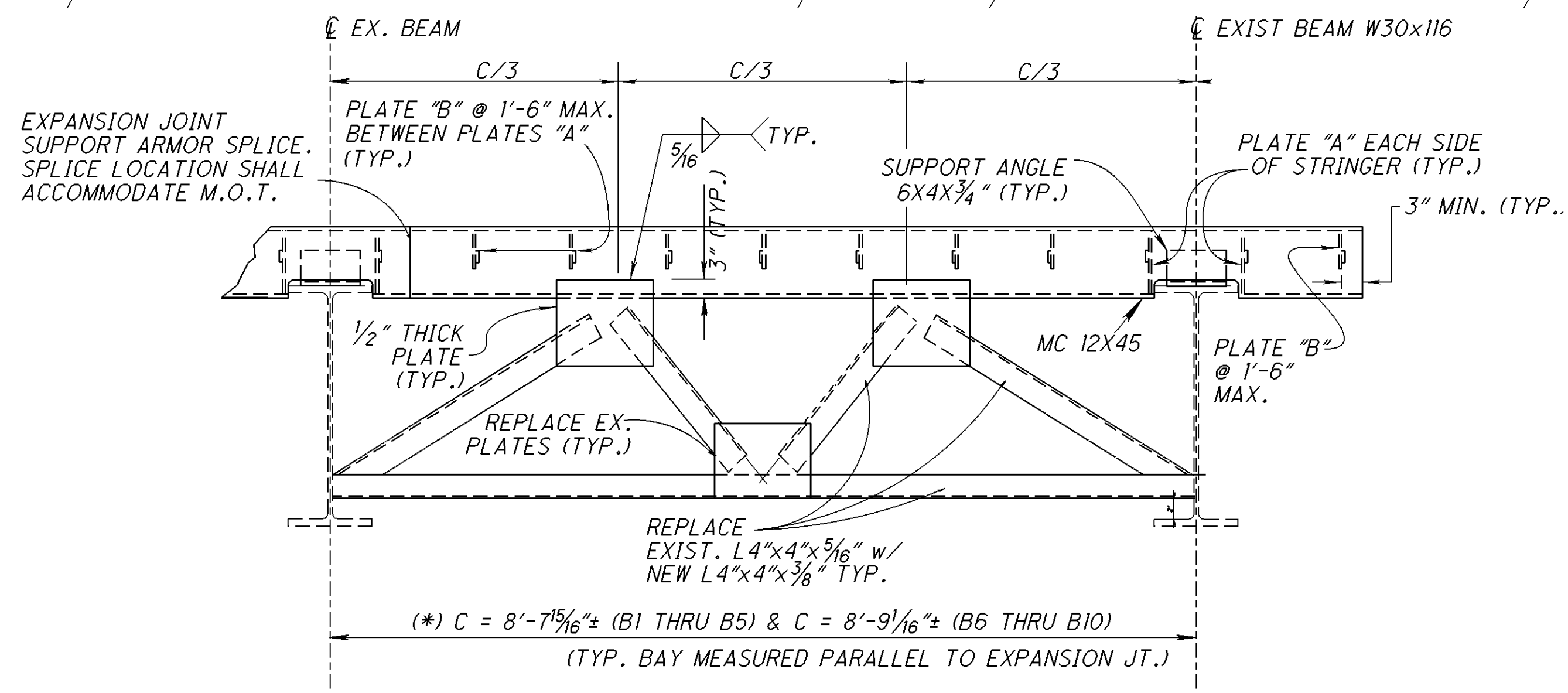
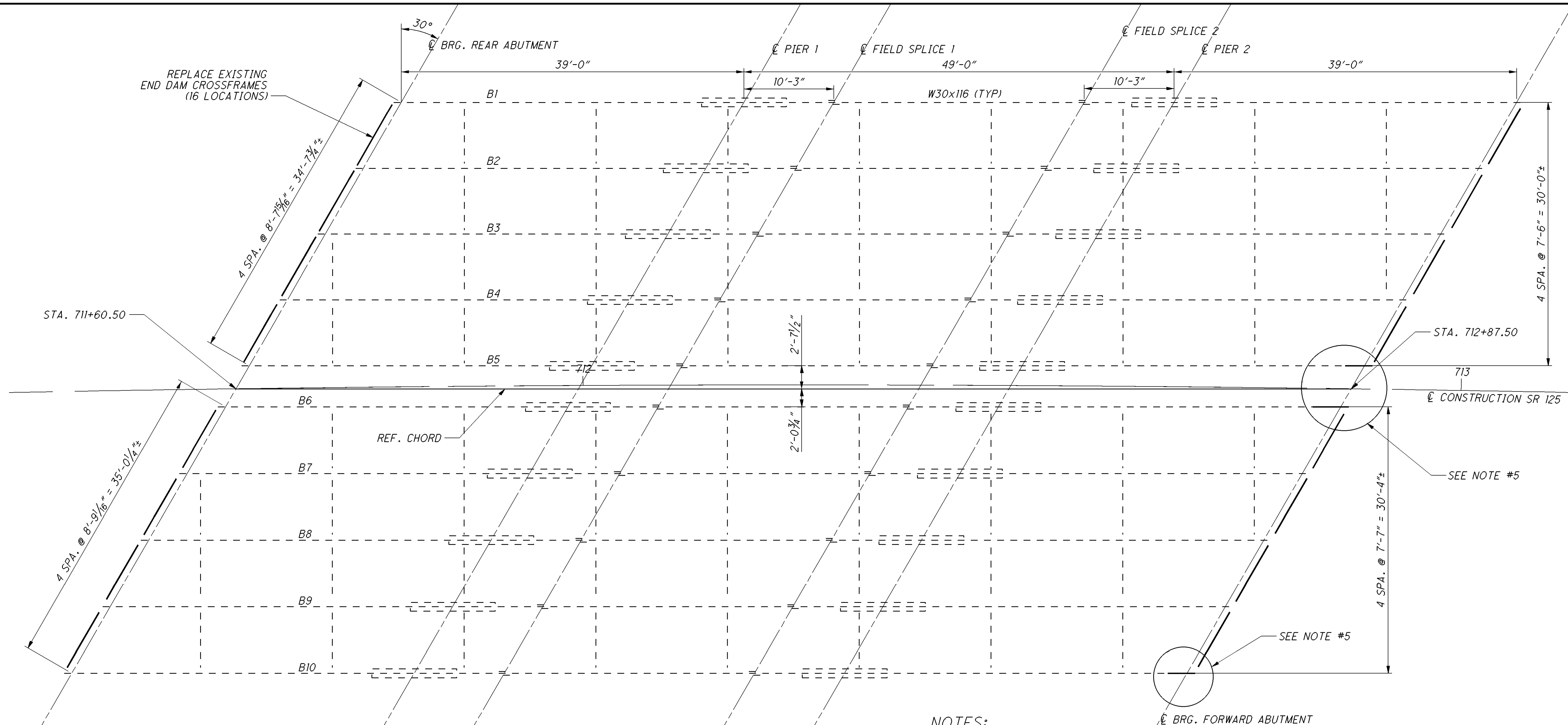
ABUTMENT DETAILS
 BRIDGE No.: CLE-125-1347
 SR 125 OVER POPLAR CREEK

D08 - BM - FY 2014
 PID No. 84530

6 / 11

30
60

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END DAM CROSSFRAME DETAIL
 (*) - MEASURED PARALLEL TO EXPANSION JOINT

NOTES:

1. PAINT ALL STRUCTURAL STEEL INCLUDING END CROSS FRAMES, BEARING PLATES AND SCUPPERS USING SYSTEM OZEU. PAINT COLOR SHALL BE FEDERAL COLOR 15526 (BLUE).
2. REPLACE ALL EXISTING ABUTMENT SLIDING BEARINGS WITH NEW ELASTOMERIC BEARINGS. SEE SHEET 8 & 9 OF 11 FOR DETAILS.
3. REPLACE ALL EXISTING END DAM CROSSFRAMES AND GUSSET PLATES PER STD. DWG. GSD-1-96 & EXJ-4-87. STRUCTURAL STEEL FOR END CROSS FRAMES SHALL BE INCLUDED WITH ITEM 513 - STRUCTURAL STEEL FOR REHABILITATION, AS PER PLAN FOR PAYMENT.

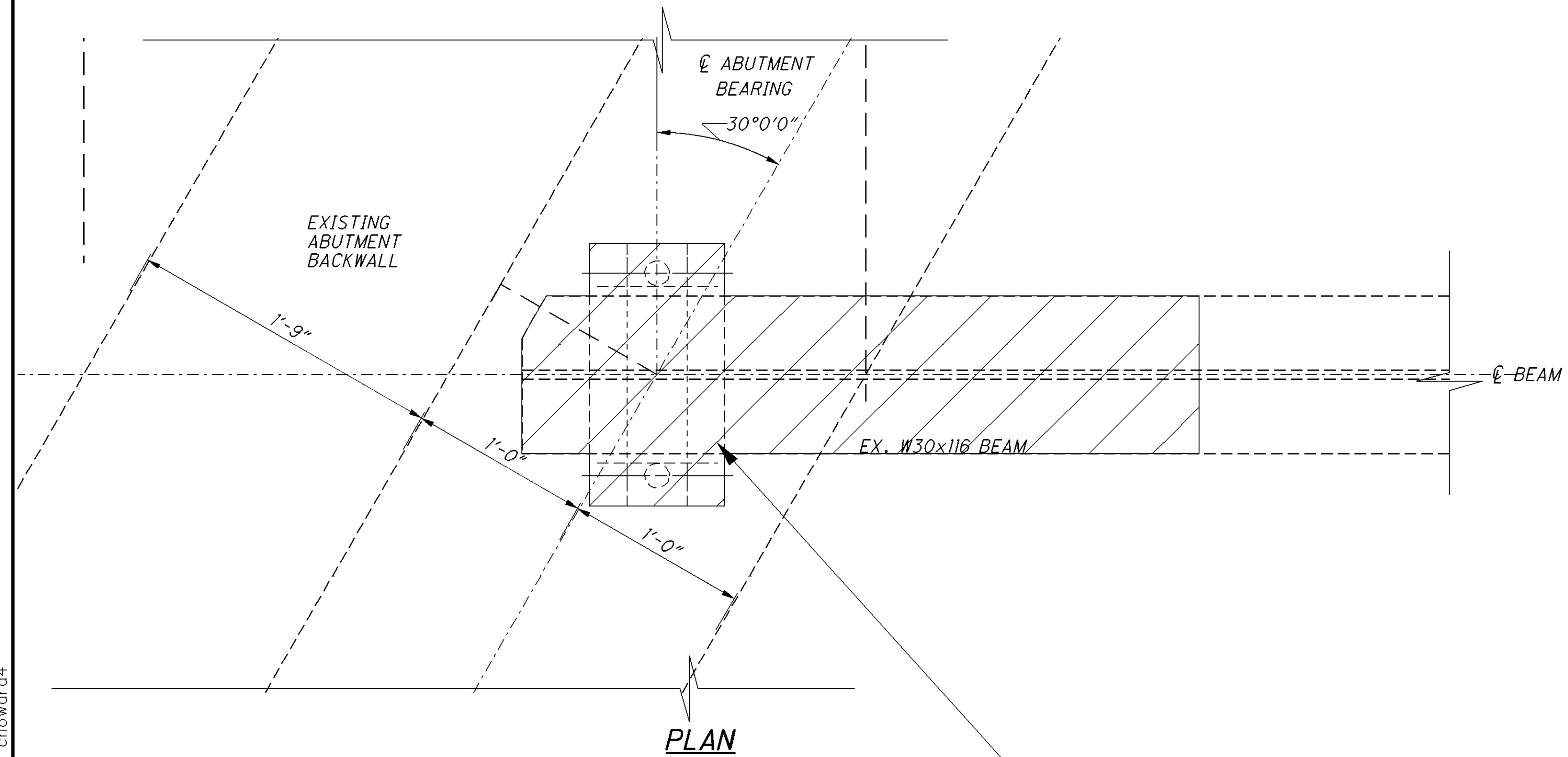
STRUCTURAL STEEL REQUIRED TO ACCOMMODATE EXPANSION JOINT REPLACEMENT SHALL BE INCLUDED WITH ITEM 516 - STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL, AS PER PLAN FOR PAYMENT. SEE THIS SHEET AND SHEETS 10 & 11 OF 11 FOR DETAILS.
4. REPLACE EXISTING SLIDING EXPANSION JOINT WITH NEW ELASTOMERIC STRIP SEAL EXPANSION JOINT. SEE SHEET 11 OF 11 AND STD. DWG. EXJ-4-87 FOR ADDITIONAL EXPANSION JOINT INFORMATION.
5. REPLACE PORTIONS OF BEAM WEB AND BOTTOM FLANGE IN KIND AS FOLLOWS:
 A. FORWARD ABUTMENT BEAM 5 (HEIGHT OF 10", LENGTH OF 3 FEET)
 B. FORWARD ABUTMENT BEAM 6 (HEIGHT OF 10", LENGTH OF 4 FEET)
 C. FORWARD ABUTMENT BEAM 10 (HEIGHT OF 10", LENGTH OF 3 FEET)

REFER TO DETAILS ON SHEET 8 & 9 OF 11.
6. REMOVAL OF EXISTING BEARINGS, END CROSS FRAMES AS WELL AS PORTIONS OF THE DECK SLAB, EXISTING BEAMS AND ABUTMENTS SHALL BE INCLUDED UNDER ITEM 202 - PORTIONS OF STRUCTURE REMOVED, OVER 20' SPAN, AS PER PLAN FOR PAYMENT.

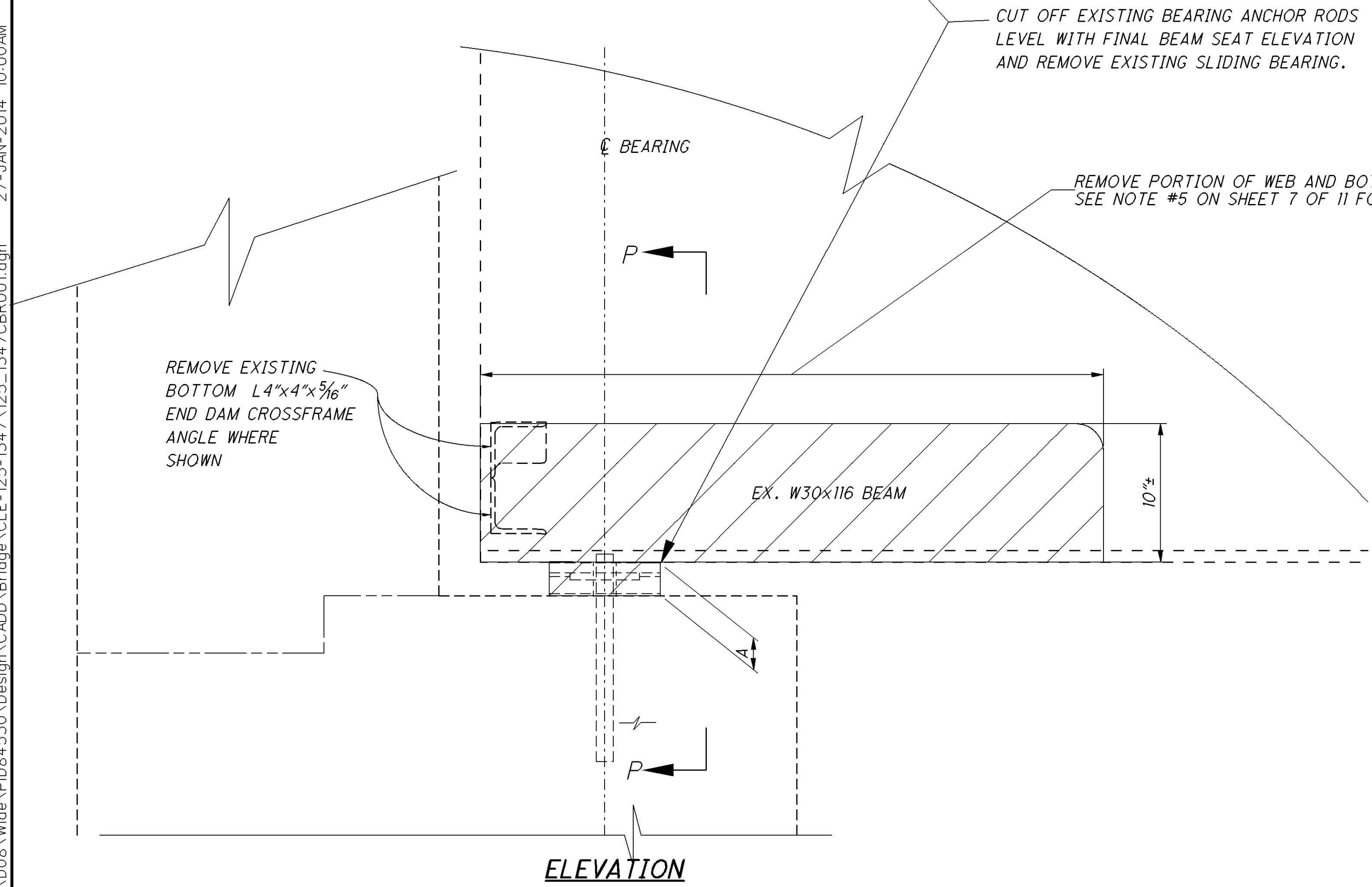
DESIGNED CAH	CHECKED RSK	DRAWN CAH	REVISED	REVIEWED SCS	DATE 1-24-14
				STRUCTURE FILE NUMBER 1302434	
FRAMING PLAN					
BRIDGE No.: CLE-125-1347 SR 125 OVER POPLAR CREEK					
D08 - BM - FY2014 PID No. 84530					
7 / 11					
31 60					

DESIGN AGENCY
 STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE

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PLAN



ELEVATION

ABUTMENT BEARING & PARTIAL BEAM REMOVAL DETAILS

NOTES:

1. STRUCTURAL STEEL FOR ABUTMENT LOAD PLATES SHALL BE PAINTED USING AN OZEU PAINT SYSTEM.
2. STRUCTURAL STEEL FOR ABUTMENT LOAD PLATES AND STEEL SHIM PLATES SHALL BE INCLUDED WITH ELASTOMERIC BEARINGS FOR PAYMENT.
3. DUE TO NEGLIGIBLE LONGITUDINAL ROADWAY SLOPE, NEW LOAD PLATES FOR THIS BRIDGE SHALL BE FABRICATED WITHOUT A TAPERED THICKNESS.
4. CUT EXISTING BEARING ANCHORS OFF FLUSH WITH TOP OF ABUTMENT SEAT.
5. POWER WASH ABUTMENT SEAT PRIOR TO INSTALLATION OF NEW BEARINGS.

ELASTOMERIC BEARINGS

ELASTOMERIC BEARINGS: THE ELASTOMER SHALL HAVE A HARDNESS OF 50 DUROMETER. THE BEARINGS WERE DESIGNED UNDER DIVISION 1, SECTION 14.6.6 (METHOD A) OF THE AASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES.

WELDING: CONTROL WELDING SO THAT THE PLATE TEMPERATURE AT THE ELASTOMER BONDED SURFACE DOES NOT EXCEED 300° F AS DETERMINED BY USE OF PYROMETRIC STICKS OR OTHER TEMPERATURE MONITORING DEVICES.

BEARING REPOSITIONING: IF STEEL IS ERECTED AT AN AMBIENT TEMPERATURE HIGHER THAN 80° F OR LOWER THAN 40° F AND THE BEARING SHEAR DEFLECTION EXCEEDS 1/6 OF THE BEARING HEIGHT AT 60° (±) 10° F, THE BEAMS SHALL BE RAISED TO ALLOW THE BEARINGS TO RETURN TO THEIR UNDEFORMED SHAPE AT 60° F (±) 10° F.

THE CONTRACTOR IS REQUIRED TO FIELD VERIFY THE EXISTING BOTTOM OF BEAM AND BEAM SEAT ELEVATIONS PRIOR TO JACKING OPERATIONS. THE CONTRACTOR IS TO SUBMIT THE VERIFIED ELEVATIONS TO THE DISTRICT 8 BRIDGE ENGINEER PRIOR TO JACKING. APPROVAL OF THE ELEVATIONS IS NOT REQUIRED.

ANY BEARING/LOADPLATE HEIGHTS OR DIMENSIONS SHOWN SHALL BE CONSIDERED APPROXIMATE AND ARE SHOWN FOR INFORMATION PURPOSES ONLY. THE CONTRACTOR SHALL VERIFY THE HEIGHT OF REPLACEMENT LOAD PLATE BY MEASURING THE DISTANCE BETWEEN THE BEAM SEAT ELEVATION AND THE BOTTOM OF THE EXISTING BEAM FLANGE AND THEN SUBTRACTING FROM THAT DISTANCE THE THICKNESS OF THE BEARING.

IF THERE IS INSUFFICIENT HEIGHT FOR THE BEARING AND MINIMUM LOAD PLATE THICKNESS, THE CONTRACTOR SHALL DETERMINE THE REQUIRED DEPTH OF BEAM SEAT GRINDING AND SHALL SUBMIT THIS INFORMATION TO THE ENGINEER FOR APPROVAL PRIOR TO PROCEEDING WITH THE GRINDING WORK. PROVIDE A LEVEL SURFACE BELOW BEARING. GROUND AREA OF ABUTMENT SEAT SHALL NOT HINDER BEARING MOVEMENT AND SHALL POSITIVELY DRAIN TO FRONT FACE OF ABUTMENT.

ANY PLATE THICKNESS ADJUSTMENTS AND/OR SHIMS REQUIRED TO COMPLETE THE BEARINGS INSTALLATIONS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.

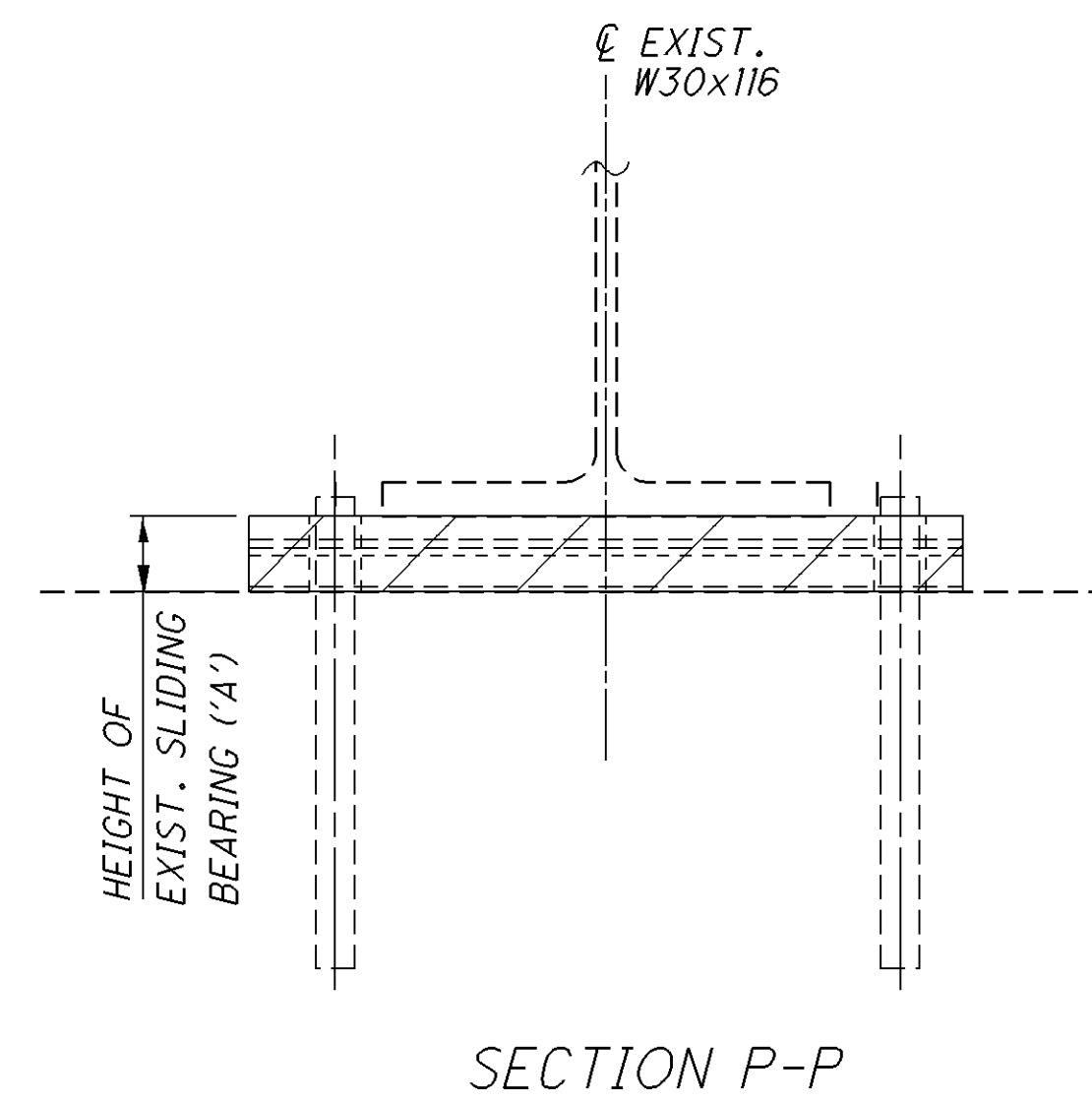
IN ADDITION TO THE REQUIREMENTS OF 516 AND THE DETAILS SHOWN ON THESE PLANS, THE CONTRACTOR SHALL ASSURE THAT THERE IS A SNUG FIT BETWEEN THE BEARING DEVICE AND BEARING SEAT. THE CONTRACTOR SHALL ASSURE THAT NO BEAMS OR BEARING DEVICES ARE FLOATING.

BASIS OF PAYMENT: THE UNIT PRICE BIDS SHALL INCLUDE ALL MATERIALS, LABOR AND INCIDENTALS NECESSARY TO FURNISH AND INSTALL THE LAMINATED ELASTOMERIC BEARINGS WITH STEEL LOAD PLATES INCLUDING GRINDING OF WELDS. PAYMENT WILL BE MADE AT THE CONTRACT PRICE FOR ITEM 516 - ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE), AS PER PLAN.

ALL MATERIAL, EQUIPMENT, LABOR AND ANY MISCELLANEOUS ITEMS REQUIRED TO COMPLETE THE GRINDING OF THE BEAM SEATS SHALL BE INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, OVER 20', AS PER PLAN FOR PAYMENT.

LEGEND

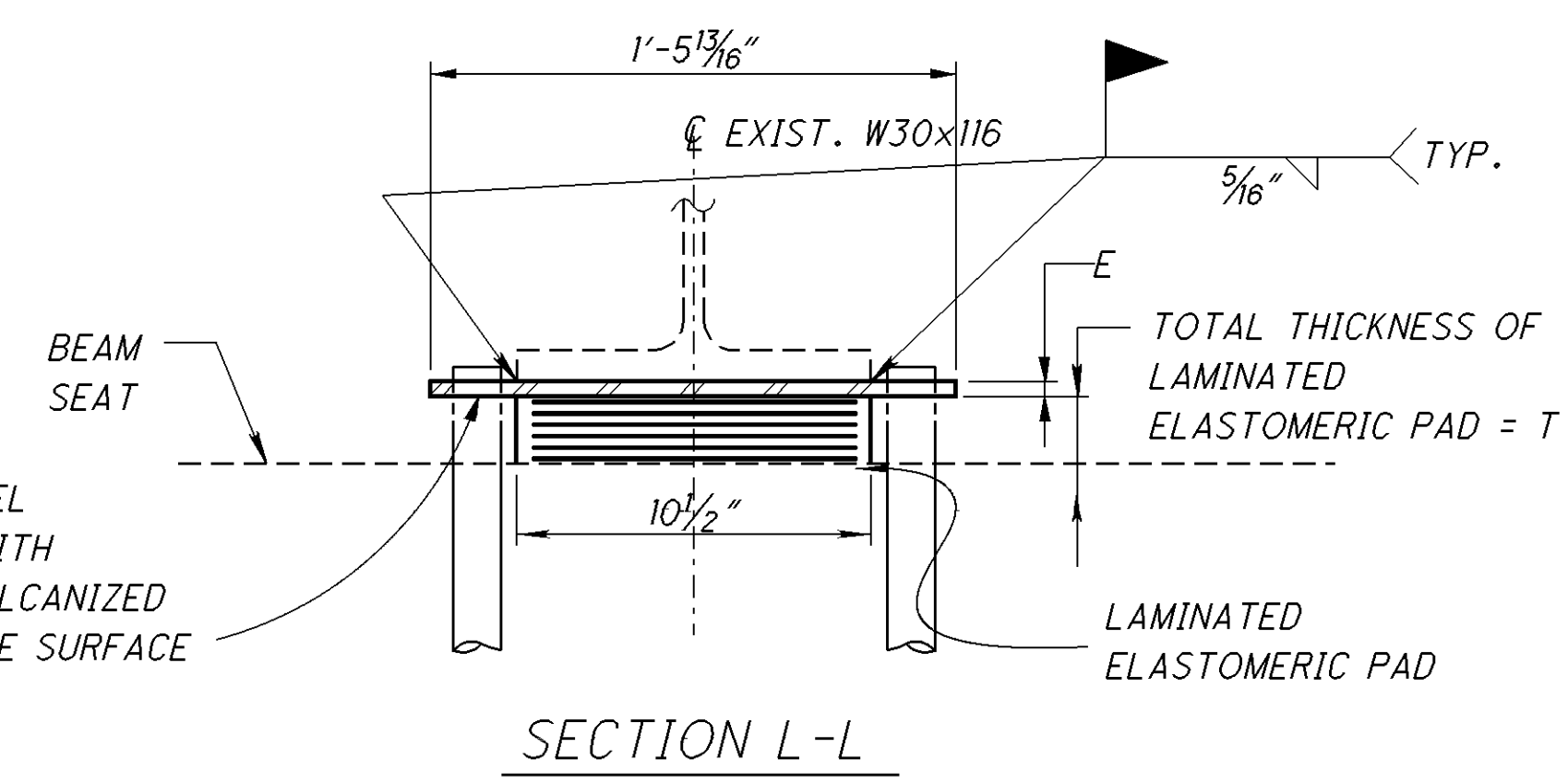
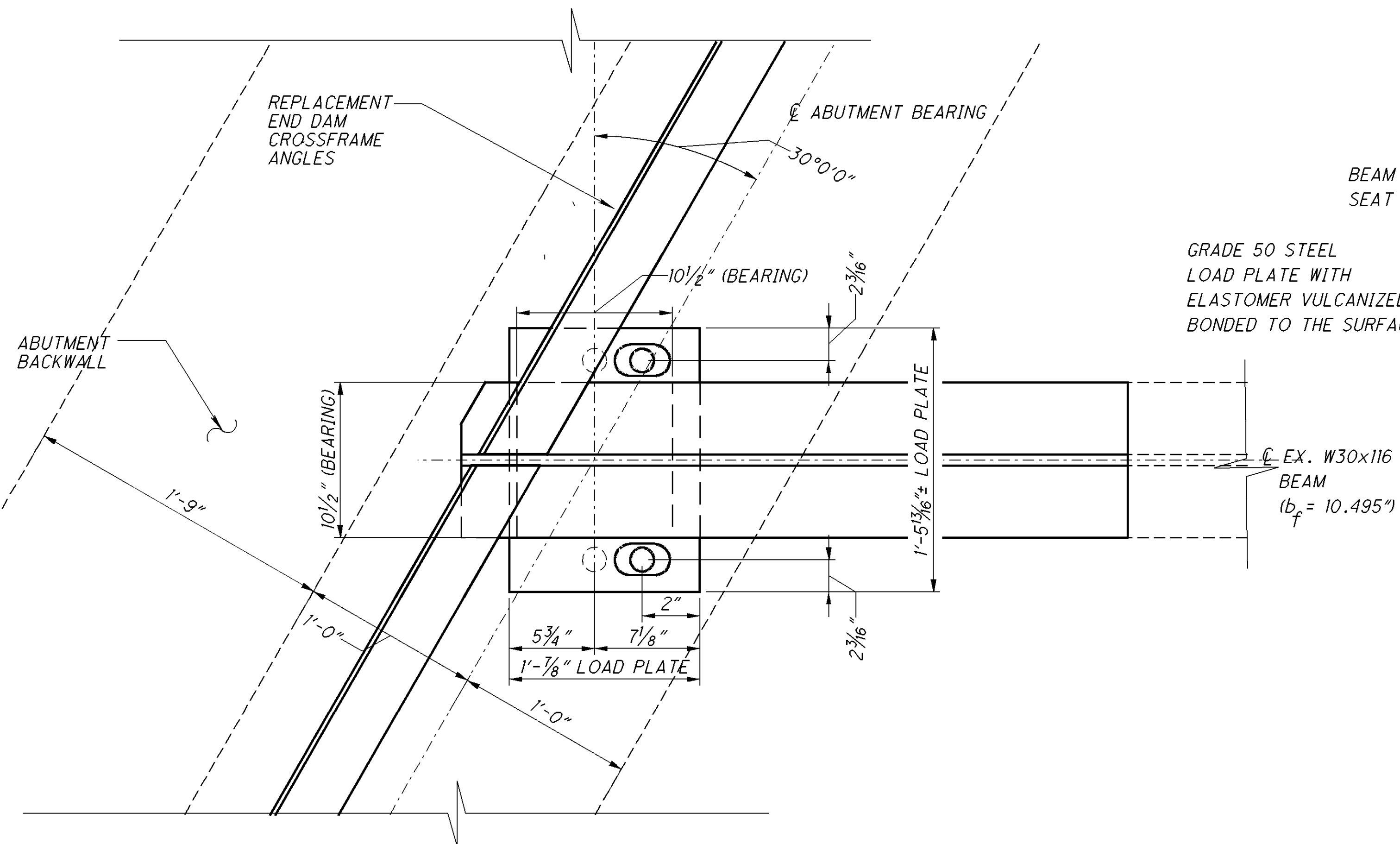
 ITEM 202 - PORTIONS OF EXISTING STRUCTURE REMOVED



SECTION P-P

DESIGNED	C/AH	CHECKED	RSK
DRAWN	CAH	REVISED	
REVIEWED	SCS	STRUCTURE FILE NUMBER	1302434
DATE	1-24-14		
DESIGN AGENCY	STATE OF OHIO DEPARTMENT OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE		
BEARING DETAILS 01			
BRIDGE No: CLE-125-1347 SR 125 OVER POPLAR CREEK			
D08-BM-FY2014 PID No. 84530			
8 / 11			
32 60			

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GRADE 50 STEEL LOAD PLATE WITH ELASTOMER VULCANIZED BONDED TO THE SURFACE

ELASTOMERIC BEARING PAD DATA FOR EXISTING BEAMS

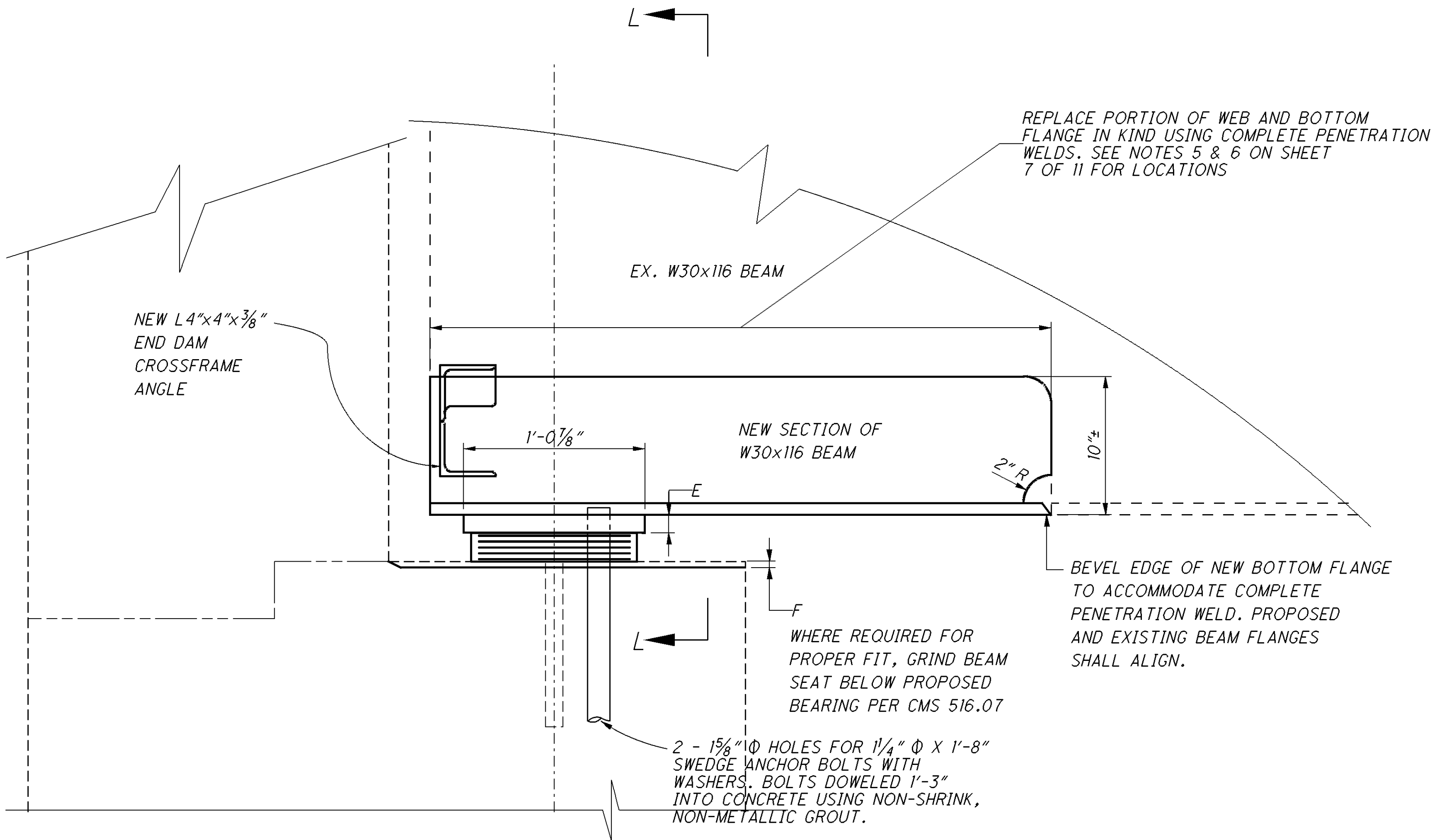
BRIDGE NO.	SUB-STRUCTURE	BRIDGE MEMBER	ELASTOMERIC PAD						REACTIONS		
			T	NO. OF INTER. LAYERS	t _i	t _e	STEEL LAMINATES NO. THICK.	TYPE	DEAD LOAD (KIPS)	LIVE * LOAD (KIPS)	MAXIMUM DESIGN LOAD (K)
CLE-125-1347	ABUTMENTS	BEAMS 1 THRU 10	2.06"	4	0.360"	0.125"	5 0.0747"	EXPANSION	19.88	52.34	72.22

LONGITUDINAL SLOPE REAR ABUT. = 0.0037 FT/FT±

LONGITUDINAL SLOPE FORWARD ABUT. = 0.0037 FT/FT±

t_i = THICKNESS OF INTERNAL ELASTOMER LAYER * W/O IMPACT

t_e = THICKNESS OF EXTERNAL ELASTOMER LAYER



REAR ABUTMENT ELASTOMERIC BEARING PAD DATA

BEAM No.	A	B	C	D	E	F
	FIELD MEASURED BEARING HEIGHT	PROPOSED BEARING THICKNESS	REQUIRED MIN. LOAD PLATE THICKNESS	REMAINING BEARING HEIGHT (A-B-C)	FINAL LOAD PLATE THICKNESS E = C + D	MIN. REQUIRED DEPTH OF BEAM SEAT GRINDING
1	4.22"±	2.06"	1.50"	0.66"±	2.16"±	N/A
2	4.09"±	2.06"	1.50"	0.53"±	2.03"±	N/A
3	4.02"±	2.06"	1.50"	0.46"±	1.96"±	N/A
4	3.97"±	2.06"	1.50"	0.41"±	1.91"±	N/A
5	4.08"±	2.06"	1.50"	0.52"±	2.02"±	N/A
6	4.34"±	2.06"	1.50"	0.78"±	2.28"±	N/A
7	3.96"±	2.06"	1.50"	0.40"±	1.90"±	N/A
8	3.90"±	2.06"	1.50"	0.34"±	1.84"±	N/A
9	4.15"±	2.06"	1.50"	0.59"±	2.09"±	N/A
10	4.06"±	2.06"	1.50"	0.50"±	2.00"±	N/A

FORWARD ABUTMENT ELASTOMERIC BEARING PAD DATA

BEAM No.	A	B	C	D	E	F
	FIELD MEASURED BEARING HEIGHT	PROPOSED BEARING THICKNESS	REQUIRED MIN. LOAD PLATE THICKNESS	REMAINING BEARING HEIGHT (A-B-C)	FINAL LOAD PLATE THICKNESS E = C + D	MIN. REQUIRED DEPTH OF BEAM SEAT GRINDING
1	4.07"±	2.06"	1.50"	0.51"±	2.01"	N/A
2	3.82"±	2.06"	1.50"	0.26"±	1.76"	N/A
3	3.95"±	2.06"	1.50"	0.39"±	1.89"	N/A
4	3.85"±	2.06"	1.50"	0.29"±	1.79"	N/A
5	3.92"±	2.06"	1.50"	0.36"±	1.86"	N/A
6	4.04"±	2.06"	1.50"	0.48"±	1.98"	N/A
7	4.13"±	2.06"	1.50"	0.57"±	2.07"	N/A
8	4.24"±	2.06"	1.50"	0.68"±	2.18"	N/A
9	4.35"±	2.06"	1.50"	0.79"±	2.29"	N/A
10	4.19"±	2.06"	1.50"	0.63"±	2.13"	N/A

DESIGN AGENCY: STATE OF OHIO DEPARTMENT OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE

DATE: 1-24-14

REVIEWED: SCS

DRAWN: CAH

CHECKED: RSK

STRUCTURE FILE NUMBER: 1302434

DESIGNED: CAH

BEARING DETAILS 02

BRIDGE No: CLE-125-1347

SR 125 OVER POPLAR CREEK

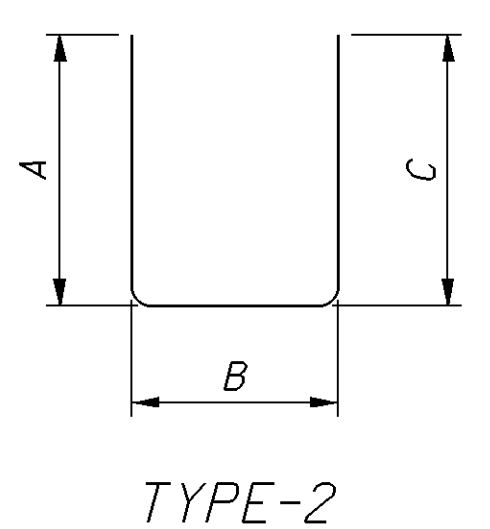
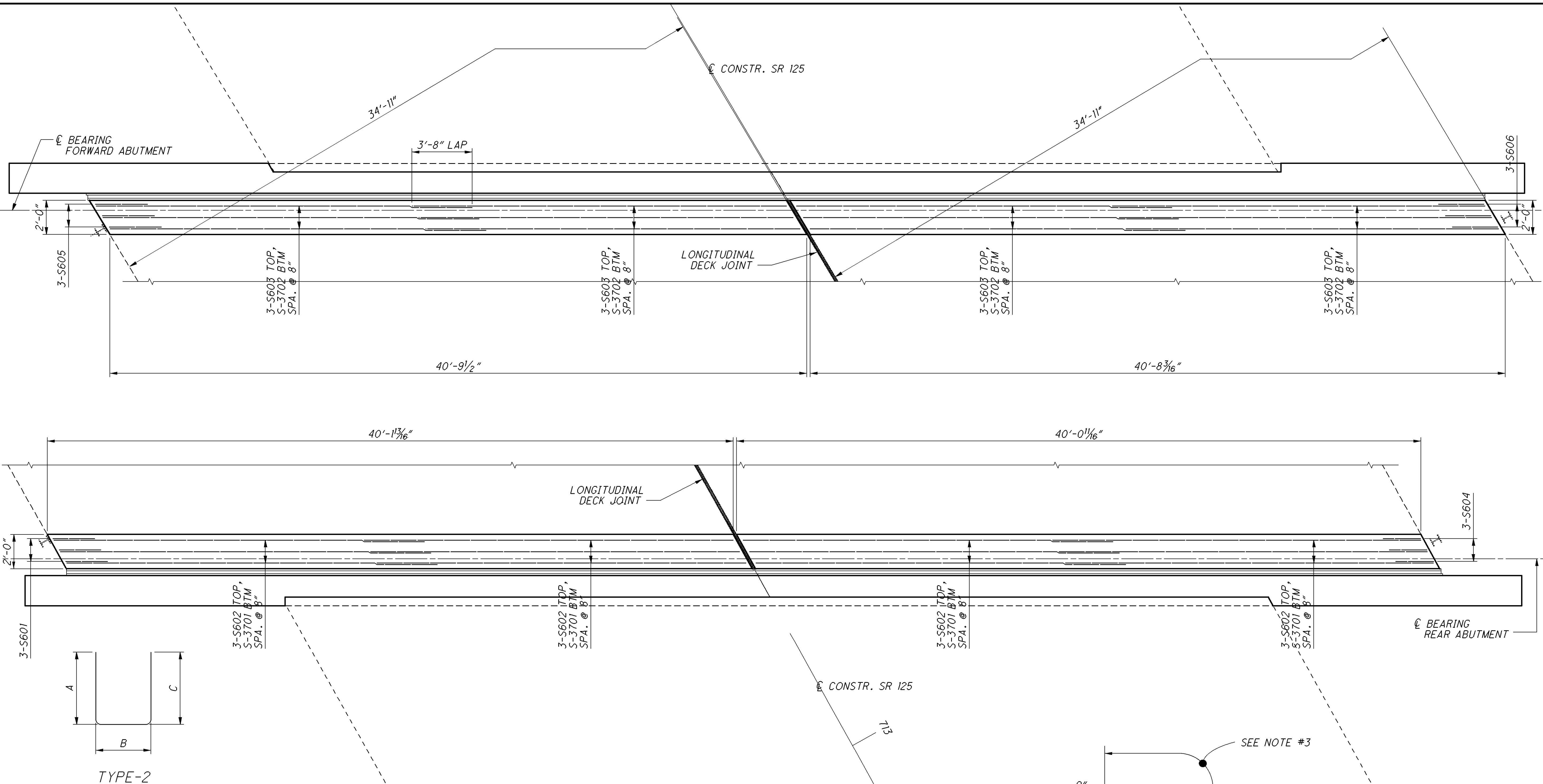
D08-BM-FY2014

PID No. 84530

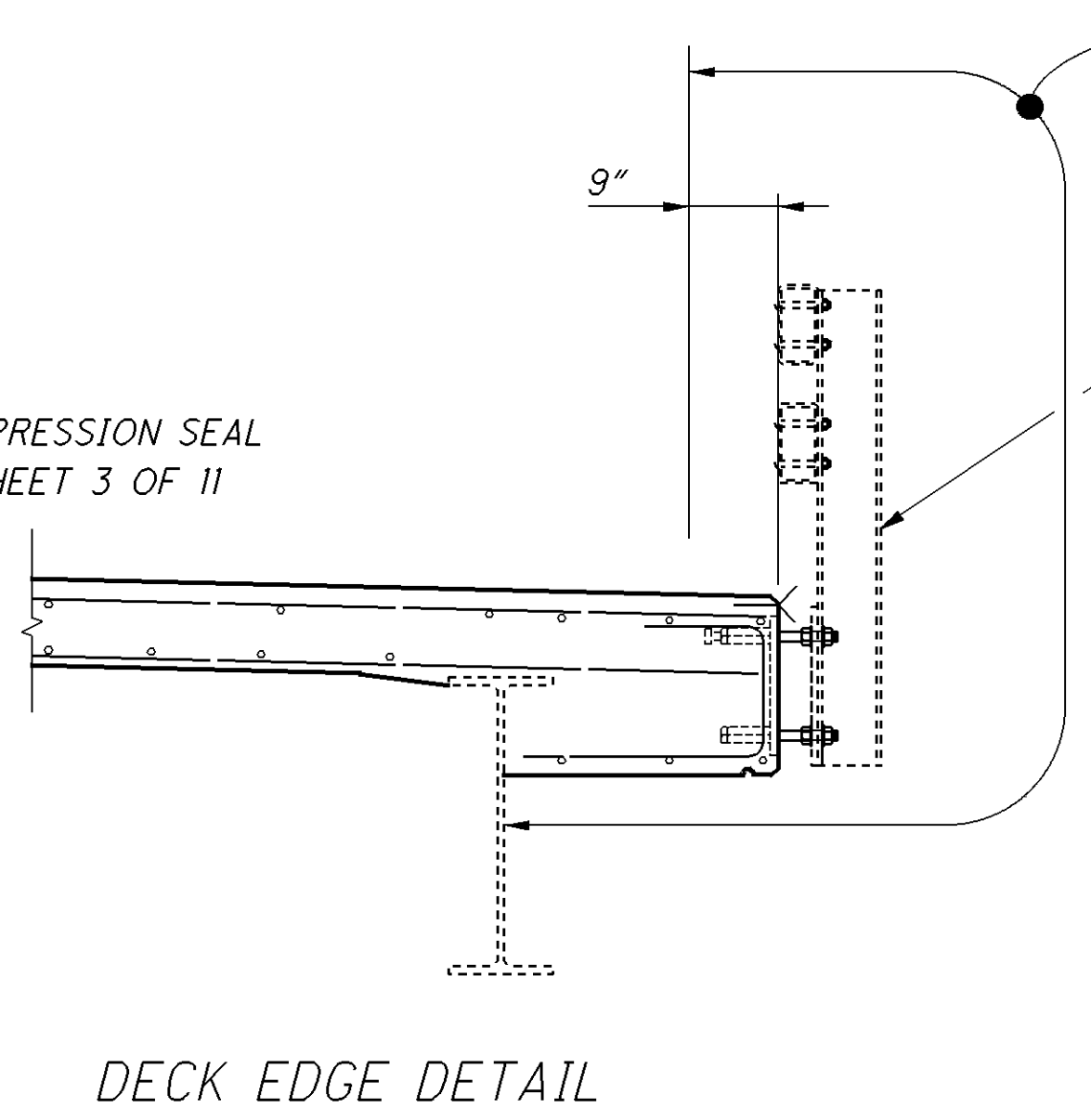
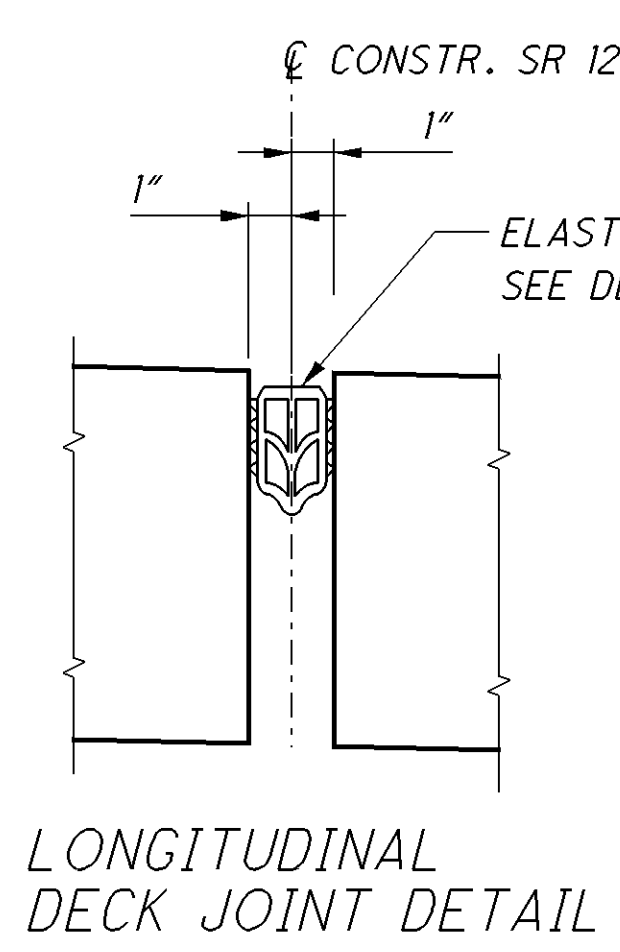
9 / 11

33 / 60

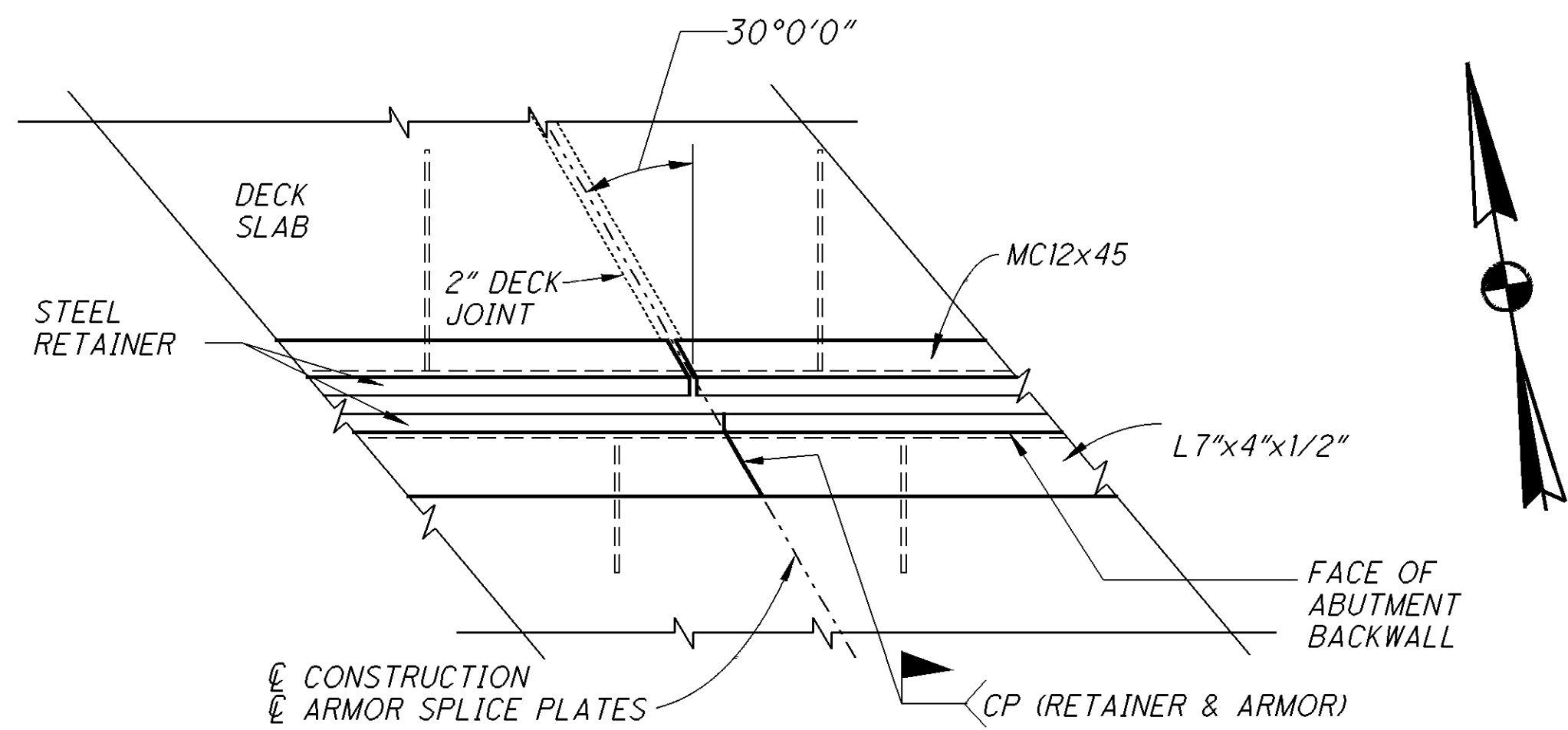
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MARK	NUMBER		LENGTH	WEIGHT	TYPE	DIMENSIONS					
	TOTAL					A	B	C	D	E	R
SUPERSTRUCTURE REINFORCING STEEL LIST											
S601	3		4'-3"	19	2	1'-0"	0'-11"	2'-8"			
S602	6		21'-11"	198	STR						
S603	6		21'-7"	195	STR						
S604	3		4'-8"	21	2	1'-0"	0'-11"	3'-1"			
S605	3		3'-10"	17	2	1'-0"	0'-11"	2'-3"			
S606	3		4'-0"	18	2	1'-0"	0'-11"	2'-5"			
S701	6		21'-11"	269	STR						
S702	6		21'-7"	265	STR						
SUB-TOTAL			1,002								

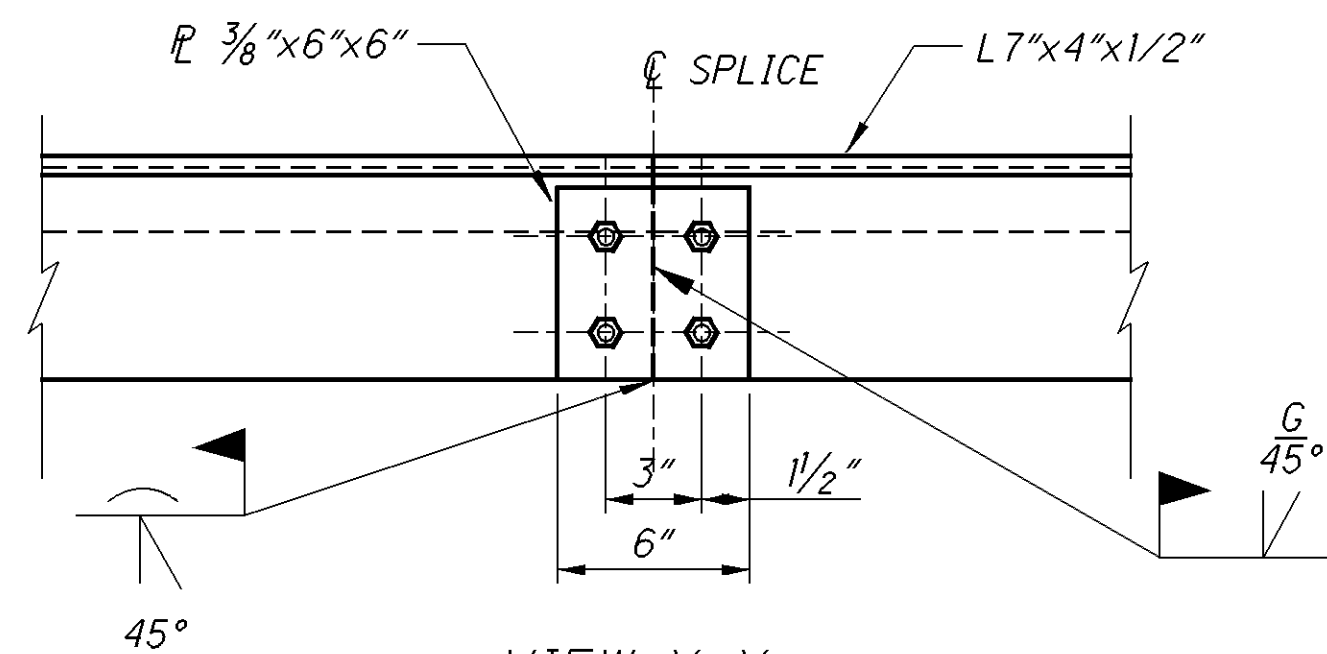


- NOTES:
- REFER TO MAINTENANCE OF TRAFFIC PLANS FOR ADDITIONAL INFORMATION.
 - CROSSFRAMES NOT SHOWN FOR CLARITY.
 - REMOVE EXISTING CONCRETE SEALER AS NEEDED AND RE-SEAL ENDS OF DECK AS SHOWN.
 - SAWCUT AND REMOVE EXISTING DECK CONCRETE PER PHASE CONSTRUCTION. SALVAGE EXISTING LONGITUDINAL DECK REBAR. SAWCUTTING OF DECK REBAR SHALL NOT BE ALLOWED.
- REMOVE AND REPLACE A PORTION OF THE BRIDGE RAILING TO ACCOMMODATE PARTIAL DECK SLAB REPLACEMENT. REPLACE RAILING ANCHOR BOLTS AS NEEDED. ANCHOR BOLTS REMOVED WITH THE DECK SHALL NOT BE RE-USED. BOLTS SHALL MEET THE REQUIREMENTS OF STD. DWG. DBR-2-73. THIS WORK SHALL BE INCLUDED WITH ITEM 517 - RAILING MISC.: PORTION OF BRIDGE RAILING REMOVED AND REBUILT FOR PAYMENT.



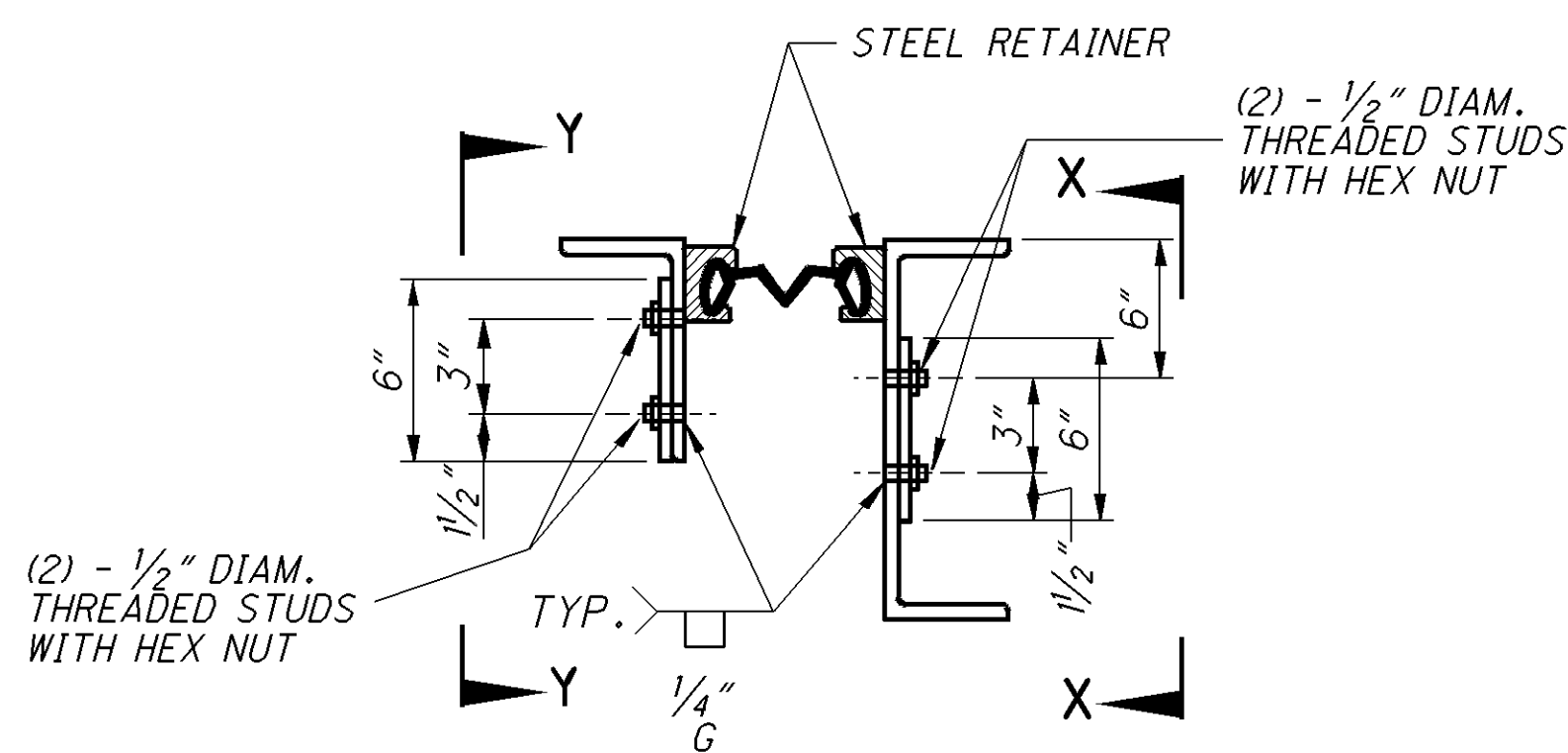
END DAM SPLICE DETAIL

REAR ABUTMENT SHOWN
FORWARD ABUTMENT SIMILAR

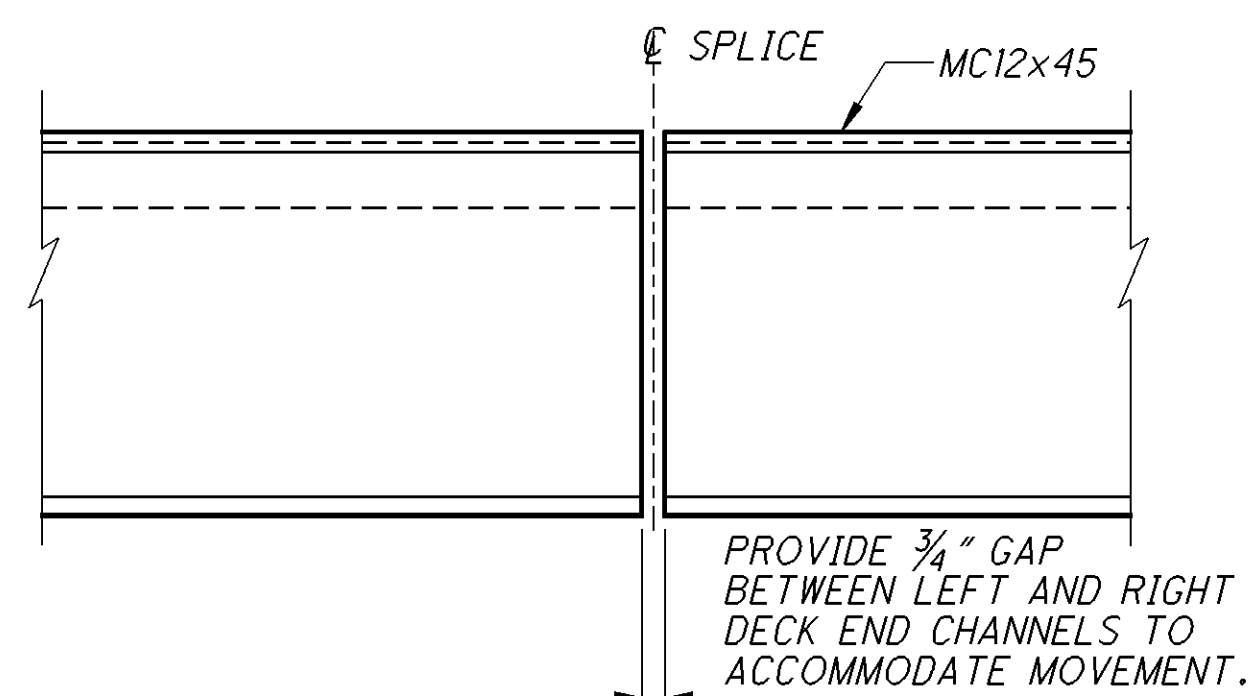


VIEW Y-Y

ABUTMENT SIDE SUPPORT
ARMOR SPLICE DETAIL

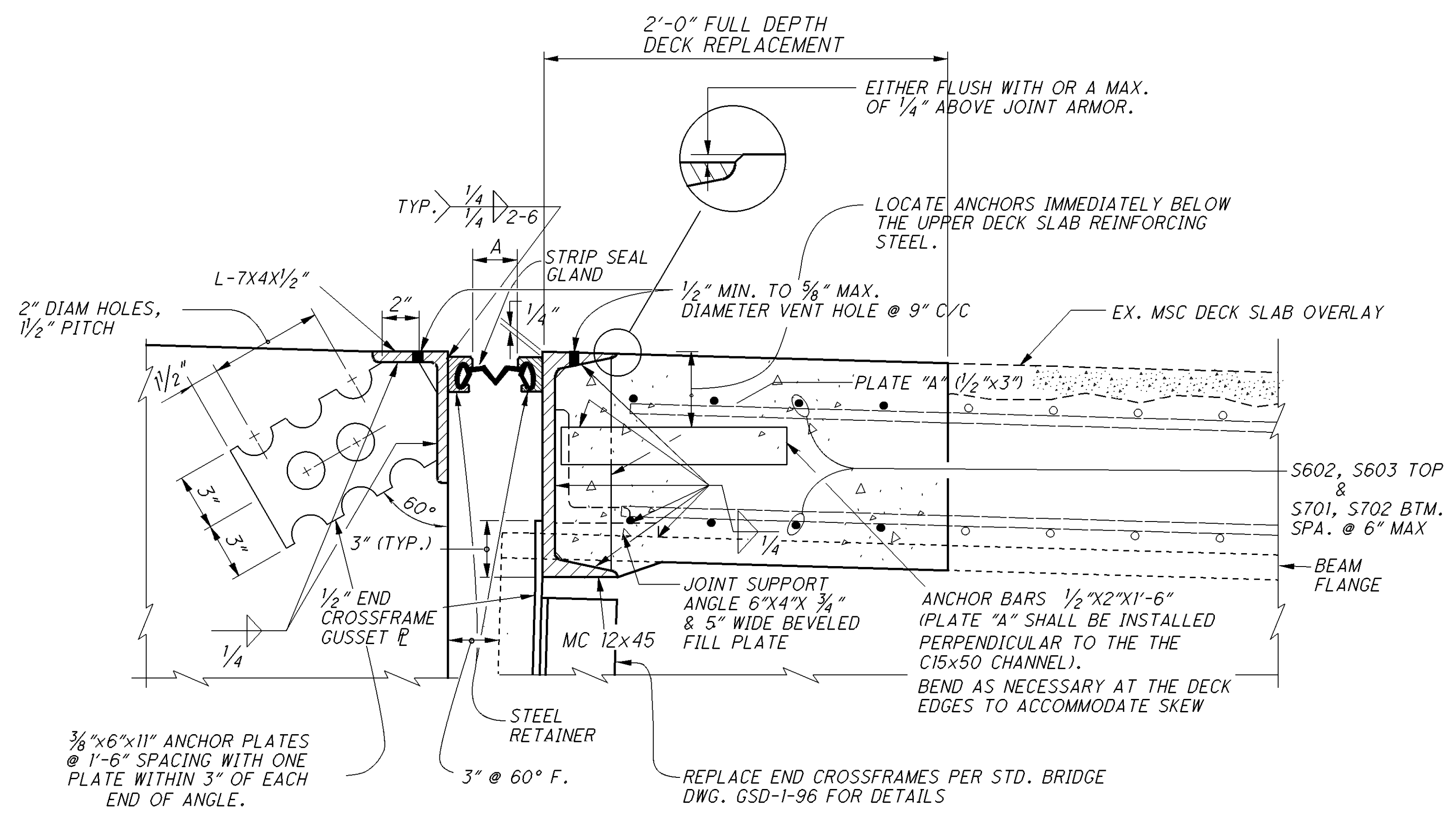


**STRIP SEAL EXPANSION JOINT
SPLICE DETAIL**



VIEW X-X

DECK SLAB SUPPORT
ARMOR DETAIL



ELASTOMERIC STRIP SEAL JOINT SECTION

TYPICAL THRU DECK SLAB

NOTES:

- SEE STD. DWG. EXJ-4-87 FOR ADDITIONAL INFORMATION.
- STRIP SEAL GLAND SHALL BE INSTALLED IN ONE CONTINUOUS PIECE AFTER COMPLETION OF THE END DAM INSTALLATION.
- PORTIONS OF THE STRIP SEAL EXPANSION JOINT ASSEMBLY THAT ARE ANGLED TO MEET THE TRANSVERSE DECK CROSS SLOPE SHALL BE CONNECTED AS SHOWN AT THE ϕ OF CONSTRUCTION USING COMPLETE PENETRATION FIELD WELDS AND SPLICE PLATES. WELDS SHALL BE GROUND SMOOTH. WELDS AND SPLICE PLATES SHALL BE INCLUDED WITH THE EXPANSION JOINT FOR PAYMENT.
- INSTALLATION OF SEAL: DURING INSTALLATION OF THE SUPPORT/ARMOR FOR THE SUPERSTRUCTURE SIDE OF THE EXPANSION JOINT SEAL, OBSERVE THE SEATING OF BEAMS ON BEARINGS TO ASSURE THAT POSITIVE BEARING IS MAINTAINED.

PROPER ELEVATION OF THE SUPPORT/ARMOR ON THE BEAMS SHALL BE ACHIEVED BY POSITIONING OF THE BEVEL FILL PLATES RATHER THAN BY CLAMPING FORCE.
- ALL COSTS ASSOCIATED WITH THE ELASTOMERIC STRIP SEAL EXPANSION JOINT, ANCHOR PLATES, AND ANY REMAINING INCIDENTALS REQUIRED TO COMPLETE THE EXPANSION JOINT INSTALLATION SHALL BE INCLUDED WITH ITEM 516 - STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL, AS PER PLAN FOR PAYMENT.
- FOR LOCATION OF FIELD SPLICES, SEE ABUTMENT AND DECK PLAN SHEETS.
- SEAL THE OPENING WHERE THE STRIP SEAL GLAND MEETS THE LONGITUDINAL COMPRESSION SEAL WITH WEATHERPROOF CAULK (2 LOCATIONS). COST ASSOCIATED WITH CAULK INSTALLATION SHALL BE CONSIDERED INCIDENTAL TO THE STRIP SEAL EXPANSION JOINT.

3" ABUTMENT EXPANSION JOINT OPENING		
AMBIENT TEMP (°F)	DIMENSION "A"	
	REAR ABUT.	FWD. ABUT.
30°	2.41"	2.42"
40°	2.30"	2.31"
50°	2.20"	2.19"
60°	2.09"	2.08"
70°	1.99"	1.96"
80°	1.88"	1.84"
90°	1.78"	1.73"

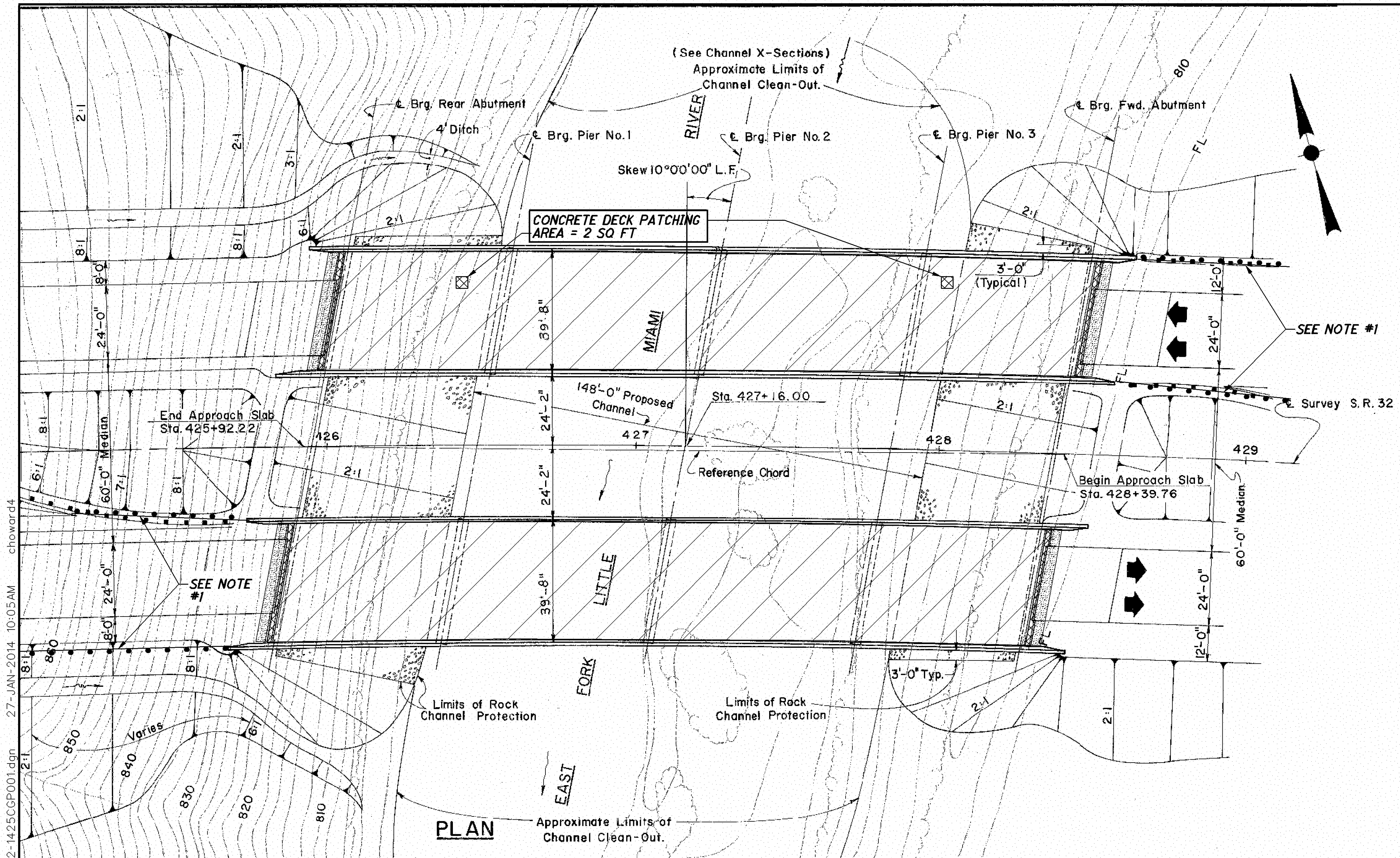
MINIMUM JOINT OPENING (DIMENSION 'A') AT THE TIME OF SEAL GLAND INSTALLATION SHALL NOT BE LESS THAN 2". IF THE JOINT OPENING IS LESS, INSTALLATION SHALL BE POSTPONED UNTIL THE TEMPERATURE DROPS A SUFFICIENT AMOUNT TO ALLOW THE 2" OPENING.

LEGEND

CP = COMPLETE PENETRATION
FIELD WELD,
GRIND SMOOTH

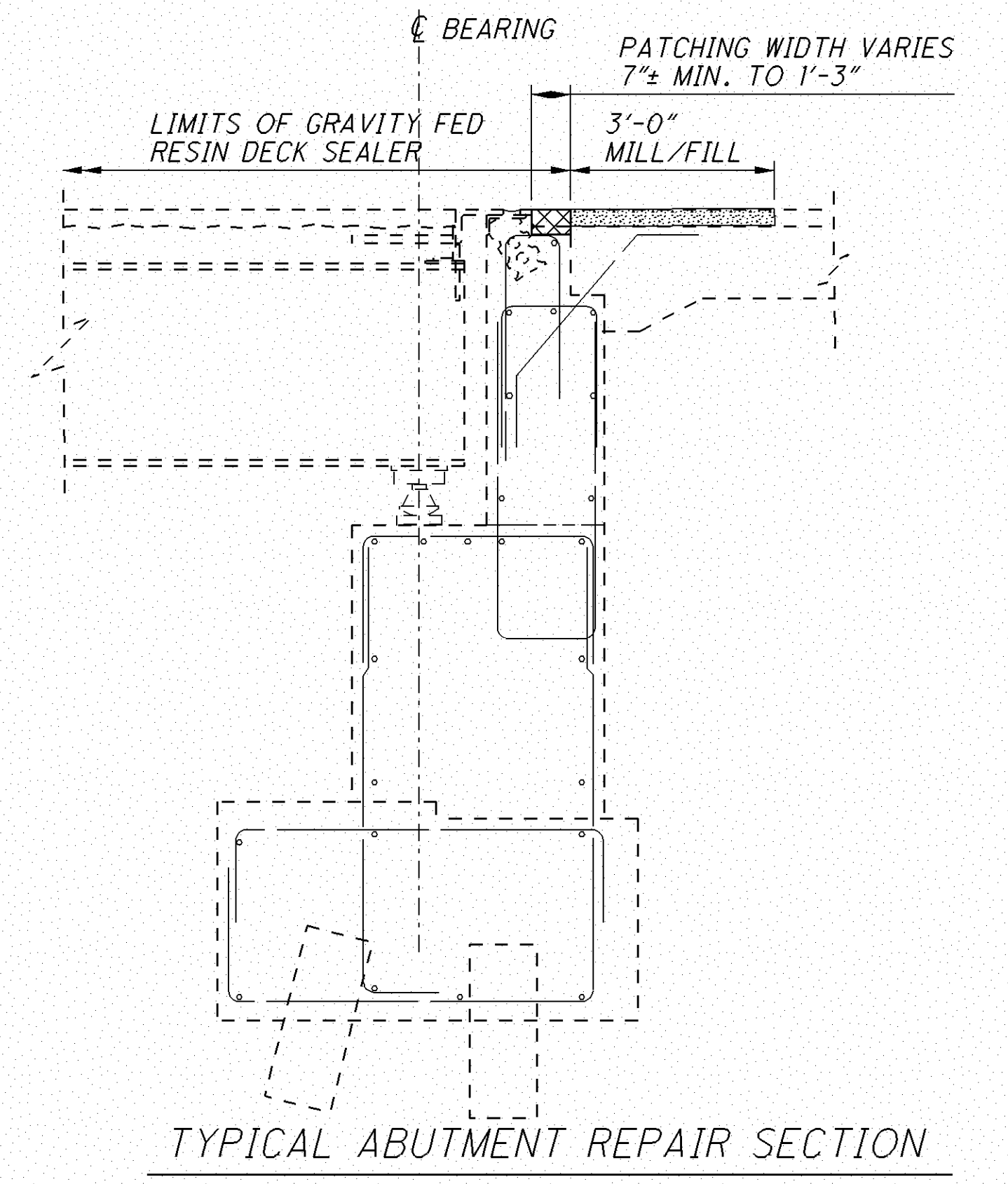
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EXPANSION JOINT DETAILS BRIDGE No: CLE-125-1347 SR 125 OVER POPLAR CREEK	DESIGN AGENCY STATE OF OHIO DEPARTMENT OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE	DATE 1-24-14 REVISIONS SCS STRUCTURE FILE NUMBER 1302434 DRAWN CAH CHECKED RSK
D08-BM-FY2014 PID No. 84530	11 / 11 35 / 60	

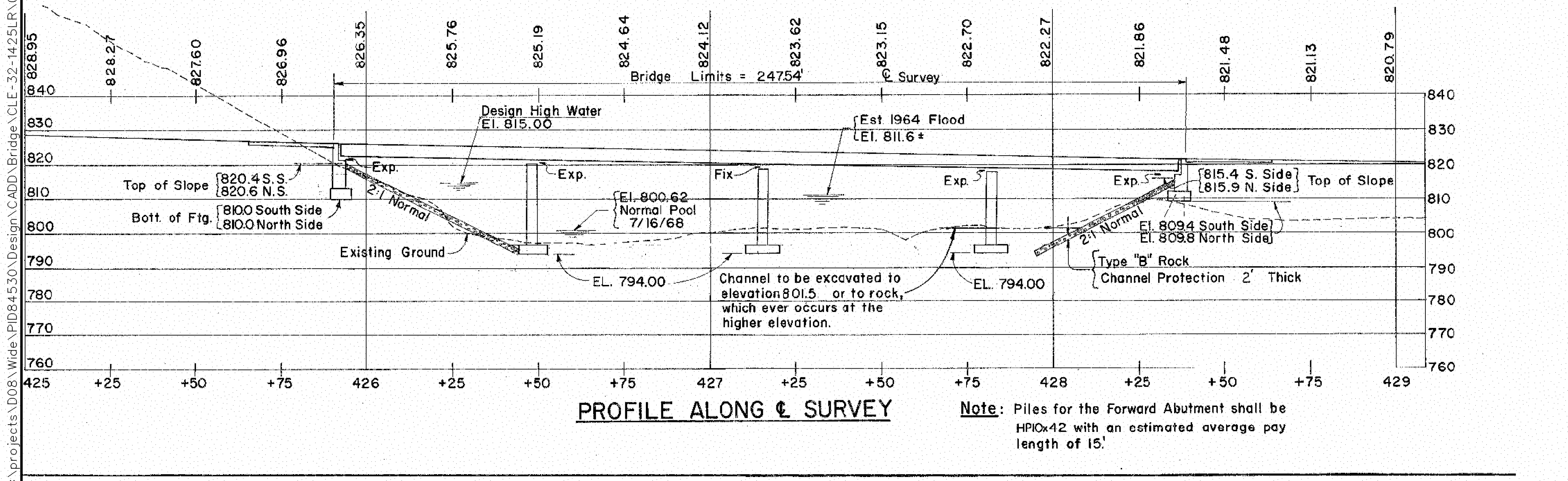


- LEGEND**
- SEALING CONCRETE WITH GRAVITY FED RESIN
 - MILL & FILL ASPHALT
 - ITEM 519 - CONCRETE PATCHING (4" MINIMUM DEPTH)

- NOTES:**
1. REPLACE EXISTING BRIDGE TERMINAL ASSEMBLIES WITH NEW MGS TYPE 1 BRIDGE TERMINAL ASSEMBLIES (4 LOCATIONS). PROVIDE TRANSITION TO TYPE 5 GUARDRAIL.
 2. MILL 1.25" OF SURFACE COURSE AND REPLACE WITH 1.25" OF 448-ASPHALT CONCRETE, SURFACE COURSE, TYPE 1, PG 64-28
SEE SHEET 18 OF 60 FOR PAVEMENT QUANTITIES.



CONCRETE PATCHING AREA = 39.67' x 1.25' = 49.6 SQ FT
49.6 SQ FT * 4 ABUTMENT LOCATIONS = 198.4 SQ FT



Note: Piles for the Forward Abutment shall be HPI0x42 with an estimated average pay length of 15'.

EXISTING STRUCTURE

TYPE: CONTINUOUS STEEL BEAMS ON CAST-IN-PLACE REINFORCED CONCRETE STUB ABUTMENTS AND 'T' TYPE PIERS

SPANS: 54'-0", 67'-6", 67'-6", 54'-0" ALONG & OF SURVEY

ROADWAY: 39'-8" TOE TO TOE OF PARAPET RAILING

LOADING: HS20-44 (CASE II) AND ALTERNATE MILITARY LOADING

SKIEW: 10°-00'-00" L.F.

ALIGNMENT: 1°00'00" CURVE RT.

SUPERELEVATION: 0.024 FT/FT

APPROACH SLABS: AS-1-72 (25')

STRUCTURAL FILE NUMBER: (L)1300490 / (R)1300504

CROWN: NORMAL 0.0156 FT/FT

WEARING SURFACE: MONOLITHIC CONCRETE

DATE BUILT: 1980

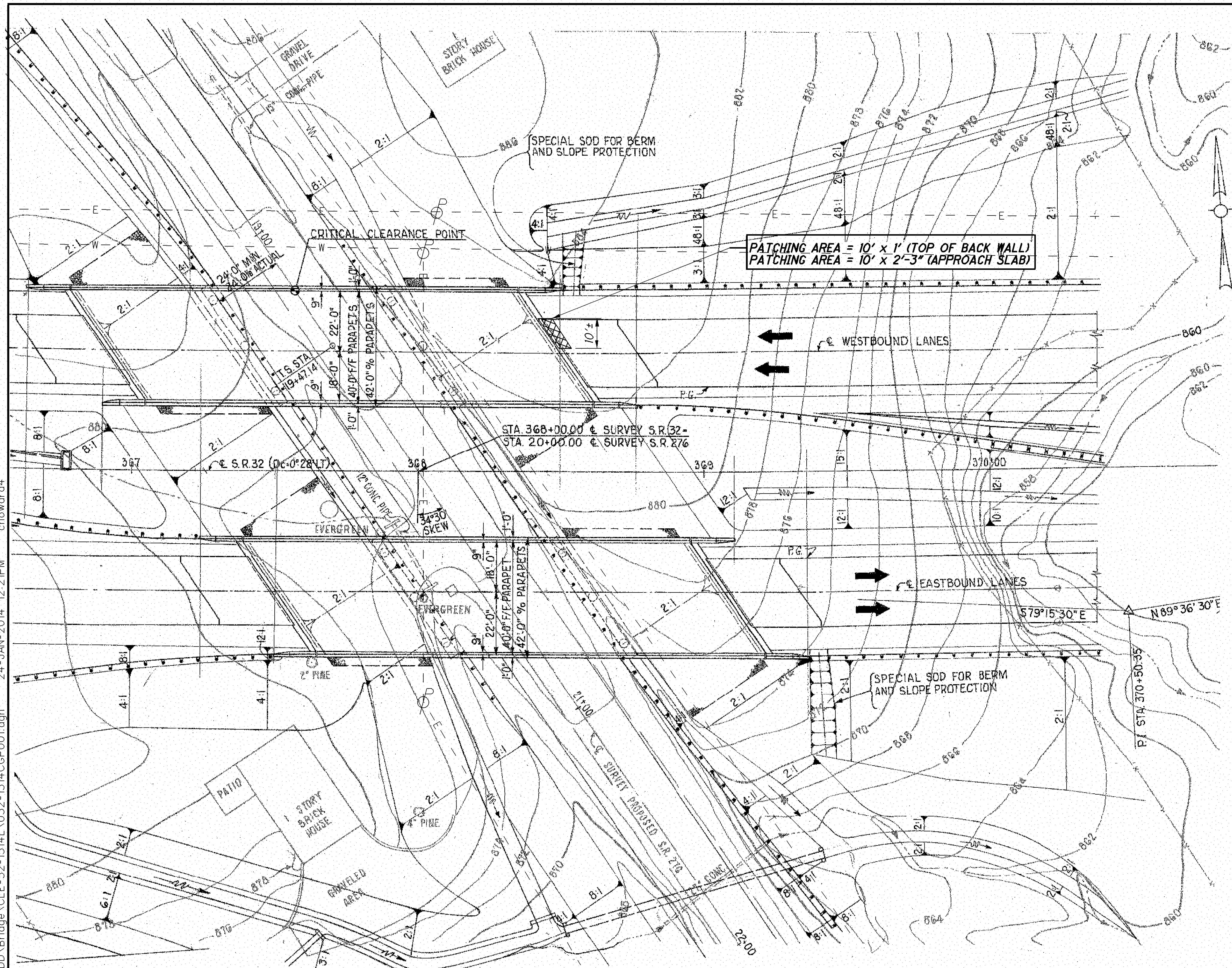
DISPOSITION:

COORDINATES: LATITUDE N 39°04'01"
LONGITUDE W84°03'17"

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DESIGN AGENCY	STATE OF OHIO	DATE	1-24-14	DESIGN AGENCY	STATE OF OHIO
DEPT. OF TRANSPORTATION		STRUCTURE FILE NUMBER		DESIGNED	CAH
DISTRICT 8 - BRIDGE OFFICE		REVIEWED	CAH	CHECKED	CAH
		REVISION	REVISED	NEW	NEW
		CLERMONT COUNTY	STA. 425+92.22	CLERMONT COUNTY	STA. 428+39.76
		BRIDGE No.:	CLE-32-1425 L/R	SITE PLAN	
		SR 32 OVER EAST FORK OF THE LITTLE MIAMI RIVER		PID No. 84530	
		1 / 1		36	
		60			

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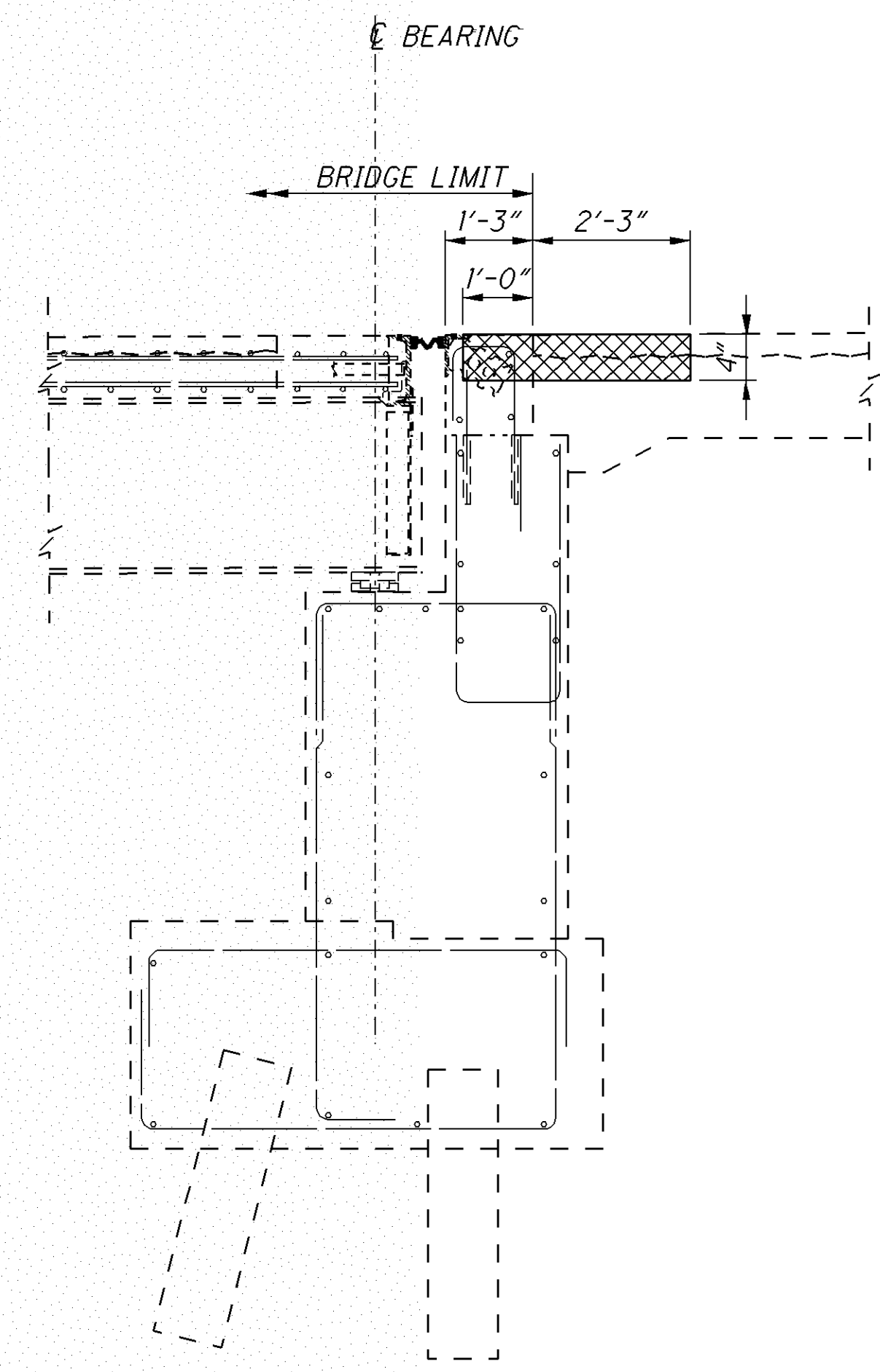


LEGEND

ITEM 519 - PATCHING CONCRETE (4" DEPTH MIN.)

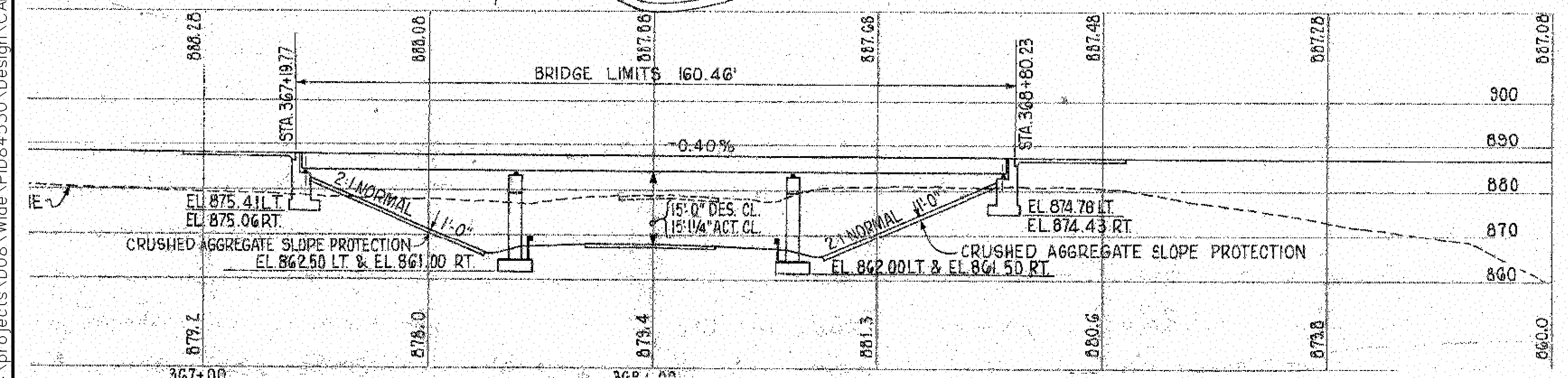
NOTES:

1. SEAL PERIMETER OF PATCHING AREA WITH HMWM RESIN. RESIN SHALL BE 12" WIDE AND CENTERED ON REPAIR EDGES.



LEFT BRIDGE - FORWARD ABUTMENT SECTION

ITEM 519 - CONCRETE PATCHING
 TOTAL AREA = 10' x 3.25' = 32.50 SQ FT
 PLUS 10% CONTINGENCY = 35.8 SQ FT



EXISTING STRUCTURE

TYPE: CONTINUOUS STEEL BEAMS ON CAST-IN-PLACE REINFORCED CONCRETE STUB ABUTMENTS AND 'T' TYPE PIERS

SPANS: 54'-0", 67'-6", 67'-6", 54'-0" ALONG ϵ OF SURVEY
 ROADWAY: 39'-8" TOE TO TOE OF PARAPET RAILING

LOADING: HS20-44 (CASE II) AND ALTERNATE MILITARY LOADING
 SKEW: 10°-00'-00" L.F.

ALIGNMENT: 1°00'00" CURVE RT.
 SUPERELEVATION: 0.024 FT/FT
 APPROACH SLABS: AS-1-72 (25')

STRUCTURAL FILE NUMBER: (L)1300458 / (R)1300466
 CROWN: NORMAL 0.0156 FT/FT
 WEARING SURFACE: MONOLITHIC CONCRETE
 DATE BUILT: 1971
 DISPOSITION: SEE PROPOSED WORK
 COORDINATES: LATITUDE N 39°04'03"
 LONGITUDE W 84°04'31"

DESIGN AGENCY: STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE

DATE: 1-24-14
 REVIEWED: SCS
 STRUCTURE FILE NUMBER: 1300458, R1300466

DRAWN: CAH
 CHECKED: CAH
 REVISED: NEW

CLERMONT COUNTY
 STA. 367+19.17
 STA. 368+80.23

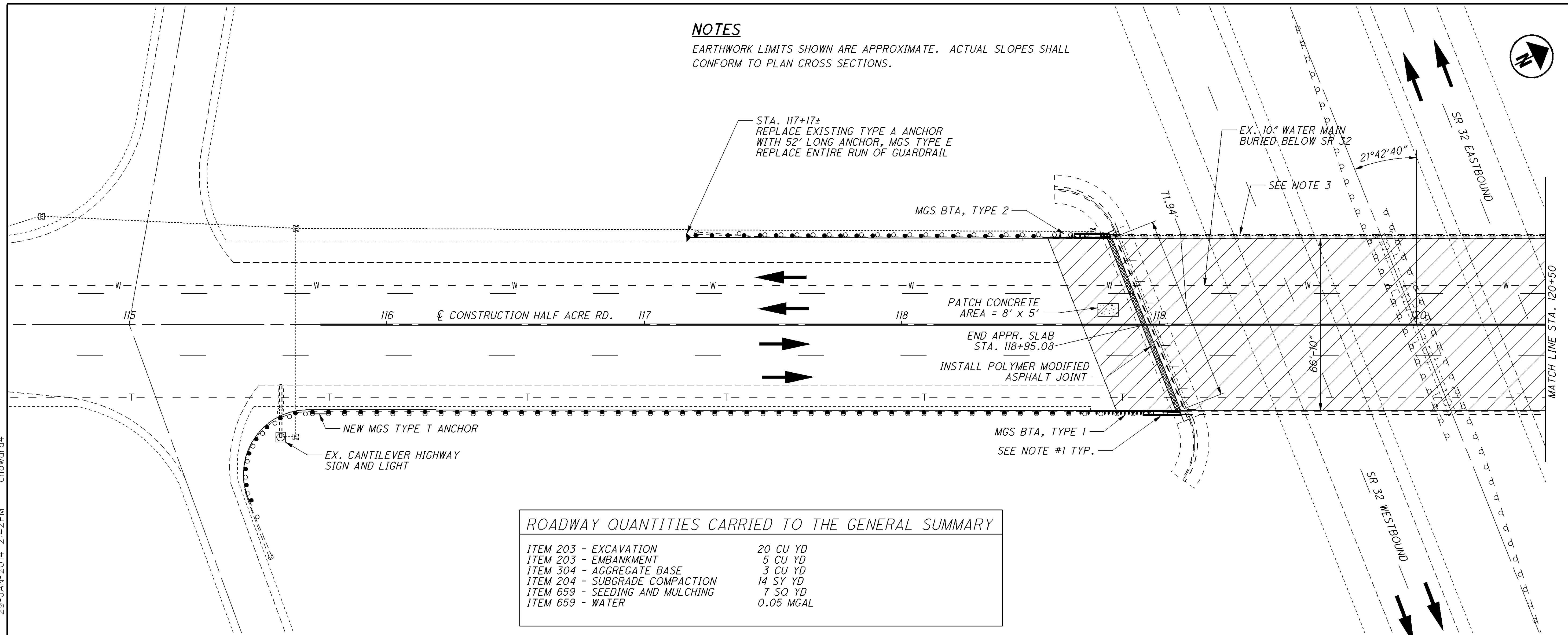
SITE PLAN
 BRIDGE NO: CLE-32-1314L
 SR 32 OVER SR 276

D08-BM-FY2014
 PID No. 84530

1 / 1
 37 / 60

NOTES

EARTHWORK LIMITS SHOWN ARE APPROXIMATE. ACTUAL SLOPES SHALL CONFORM TO PLAN CROSS SECTIONS.



ROADWAY QUANTITIES CARRIED TO THE GENERAL SUMMARY	
ITEM 203 - EXCAVATION	20 CU YD
ITEM 203 - EMBANKMENT	5 CU YD
ITEM 304 - AGGREGATE BASE	3 CU YD
ITEM 204 - SUBGRADE COMPACTION	14 SY YD
ITEM 659 - SEEDING AND MULCHING	7 SQ YD
ITEM 659 - WATER	0.05 MGAL

ITEM 519 - CONCRETE PATCHING
 REAR APPROACH SLAB AREA = 40 SQ FT
 FORWARD ABUTMENT BACK WALL AREA = 4 SQ FT
 TOTAL AREA = 44 SQ FT

NOTES:

- RECONSTRUCT PARAPET TO GUARDRAIL TRANSITION BY EXTENDING PARAPET ONTO A WIDENED APPROACH SLAB. SEE ROADWAY QUANTITIES THIS SHEET.
- REPLACE ALL APPROACH GUARDRAIL, END ANCHORS AND BRIDGE TERMINAL ASSEMBLIES.
- EXISTING HIGHWAY LIGHTING ELECTRICAL ABANDONED IN PLACE. HIGHWAY LIGHTING WIRES AND CONDUIT RELOCATED UNDER SEPERATE CONTRACT.

LEGEND

- ITEM 519 - CONCRETE PATCHING
- ITEM 512 - TREATING CONCRETE BRIDGE DECK AND APPROACH SLABS WITH GRAVITY FED RESIN
- ITEM 846 - POLYMER MODIFIED ASPHALT JOINT

PROPOSED WORK

- INSTALL A POLYMER MODIFIED ASPHALT (PMAJ) JOINT BETWEEN THE TOP OF BACKWALL AND THE APPROACH SLAB. THE PMAJ SHALL BE OFF CENTER SUCH THAT IT EXTENDS 8" ONTO THE ABUTMENT BACKWALL AND 15" ONTO THE APPROACH SLAB TO ENSURE ALL UNSOUND CONCRETE IS REMOVED, BUT TO STILL OFFER SOME PROTECTIVE CONCRETE FOR THE EXPANSION JOINT ARMOR.
- PRIOR TO INSTALLING PMAJ, PATCH 5 FEET OF THE DETERIORATED PORTIONS OF THE TOP OF BACKWALL ADJACENT TO THE SOUTH EXPANSION JOINT IN EAST SHOULDER WITH CONCRETE. ONCE CURED, THE AREA MAY THEN BE SAWCUT FOR INSTALLATION OF THE PMAJ.
- PATCH 8'x5' AREA OF THE NORTH APPROACH SLAB IN THE NORTHBOUND, INTERIOR LANE WITH CONCRETE.
- SEAL DECK WITH GRAVITY FED RESIN.
- INSTALL NEW GUARDRAIL TERMINAL ASSEMBLIES, INCLUDING CONCRETE BARRIER TRANSITION OFF THE BRIDGE. THE NEW TRANSITION MAY BE DRILLED AND GROUTED INTO THE SIDE OF THE EXISTING APPROACH SLABS.
- REMOVE LOOSE CONCRETE OVER SR 32 FROM BOTTOM OF DECK SLAB. INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, AS PER PLAN FOR PAYMENT.

EXISTING STRUCTURE

TYPE: CONTINUOUS NON-COMPOSITE STEEL PLATE GIRDER WITH REINFORCED CONCRETE DECK SLAB, CAP & COLUMN PIER AND WALL TYPE REINFORCED CONCRETE ABUTMENTS

SPANS: 102'-6", 102'-6"

ROADWAY: 66'-10"± TOE/TOE OF PARAPETS

LOADING: HS20-44 & ALT. MILITARY LOADING

SKEW: 21°42'40" RT. FWD

APPROACH SLABS: 25'-0" LONG (AS-1-72)

ALIGNMENT: TANGENT

CROWN: NORMAL (0.0156 FT/FT)

STRUCTURAL FILE NUMBER: 1300431

DATE BUILT: 1980

DISPOSITION: GOOD CONDITION - MINOR REHAB.

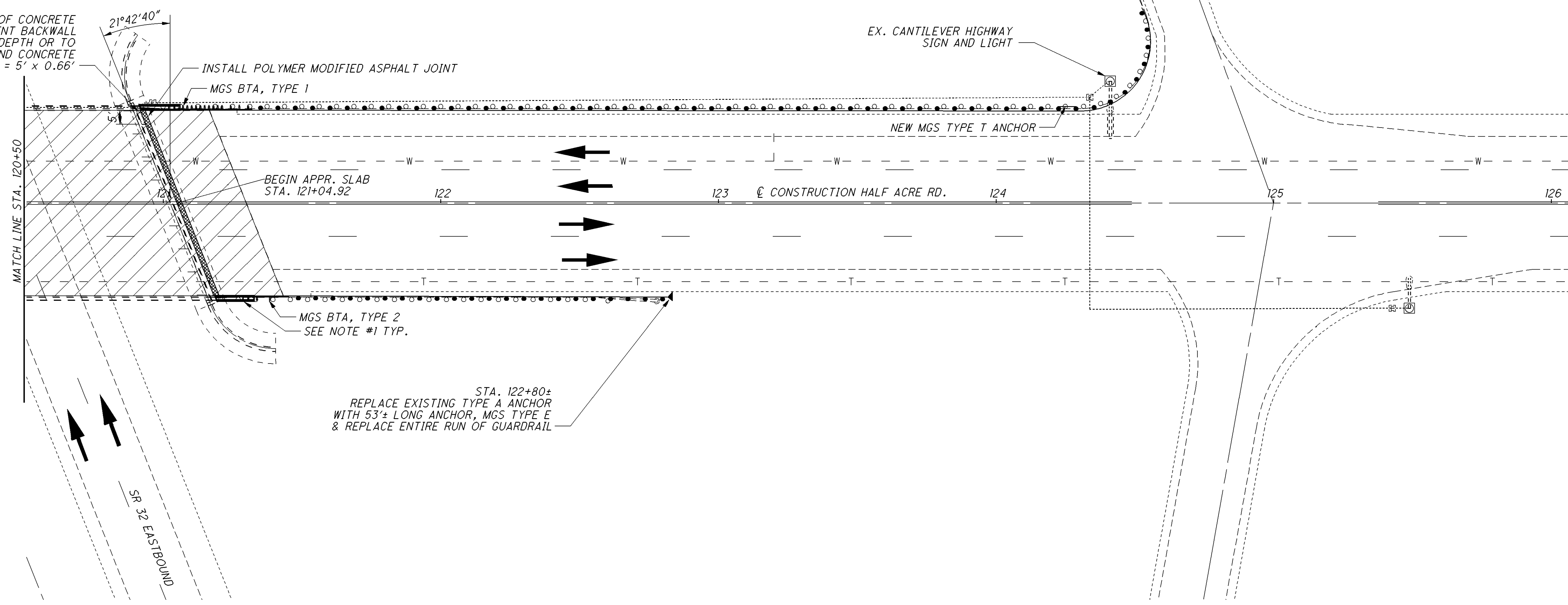
COORDINATES: LATITUDE N 39°04'12"
 LONGITUDE W 84°05'37"

DESIGN AGENCY: STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE
 DATE: 1-24-14
 REVIEWED: SCS
 STRUCTURE FILE NUMBER: 1300431
 DRAWN: CAH
 CHECKED: CAH
 DESIGNED: CAH
 CLEMMONT COUNTY
 STA. 118+95.08
 STA. 121+04.92
SITE PLAN - 1
 BRIDGE No.: CLE-32-1214
 HALF ACRE RD. OVER SR 32
D08-BM-FY2014
 PID No. 84530
 1/5
 38
 60


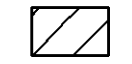
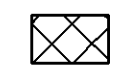
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PATCH TOP OF CONCRETE ABUTMENT BACKWALL 4" MINIMUM DEPTH OR TO SOUND CONCRETE AREA = 5' x 0.66'



LEGEND

-  ITEM 519 - CONCRETE PATCHING (TOTAL AREA = 40 SQ FT)
-  ITEM 512 - TREATING CONCRETE BRIDGE DECK AND APPROACH SLABS WITH GRAVITY FED RESIN
-  ITEM 846 - POLYMER MODIFIED ASPHALT JOINT

PROPOSED WORK

1. INSTALL A POLYMER MODIFIED ASPHALT (PMAJ) JOINT BETWEEN THE TOP OF BACKWALL AND THE APPROACH SLAB. THE PMAJ SHALL BE OFF CENTER SUCH THAT IT EXTENDS 8" ONTO THE ABUTMENT BACKWALL AND 15" ONTO THE APPROACH SLAB TO ENSURE ALL UNSOUND CONCRETE IS REMOVED, BUT TO STILL OFFER SOME PROTECTIVE CONCRETE FOR THE EXPANSION JOINT ARMOR.
2. PRIOR TO INSTALLING PMAJ, PATCH 5 FEET OF THE DETERIORATED PORTIONS OF THE TOP OF BACKWALL ADJACENT TO THE SOUTH EXPANSION JOINT IN EAST SHOULDER WITH CONCRETE. ONCE CURED, THE AREA MAY THEN BE SAWCUT FOR INSTALLATION OF THE PMAJ.
3. PATCH 8'x5' AREA OF THE NORTH APPROACH SLAB IN THE NORTHBOUND, INTERIOR LANE WITH CONCRETE.
4. SEAL DECK WITH GRAVITY FED RESIN.
5. INSTALL NEW GUARDRAIL TERMINAL ASSEMBLIES, INCLUDING CONCRETE BARRIER TRANSITION OFF THE BRIDGE. THE NEW TRANSITION MAY BE DRILLED AND GROUTED INTO THE SIDE OF THE EXISTING APPROACH SLABS.
6. REMOVE LOOSE CONCRETE OVER SR 32 FROM BOTTOM OF DECK SLAB. INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, AS PER PLAN FOR PAYMENT.

EXISTING STRUCTURE

TYPE: CONTINUOUS NON-COMPOSITE STEEL PLATE GIRDER WITH REINFORCED CONCRETE DECK SLAB, CAP & COLUMN PIER AND WALL TYPE REINFORCED CONCRETE ABUTMENTS

SPANS: 102'-6", 102'-6"

ROADWAY: 66'-10"± TOE/TOE OF PARAPETS

LOADING: HS20-44 & ALT. MILITARY LOADING

SKEW: 21°42'40" RT. FWD

APPROACH SLABS: 25'-0" LONG (AS-1-72)

ALIGNMENT: TANGENT


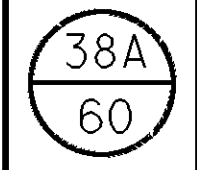
CROWN: NORMAL (0.0156 FT/FT)

STRUCTURAL FILE NUMBER: 1300431

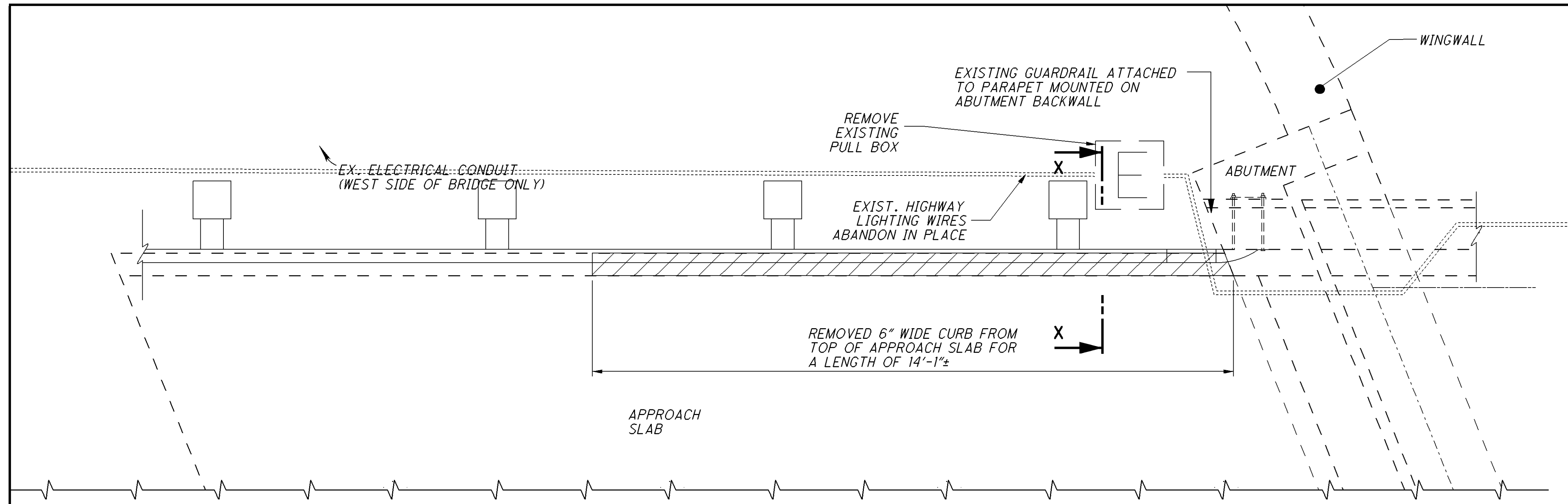
DATE BUILT: 1980

DISPOSITION: GOOD CONDITION - MINOR REHAB.

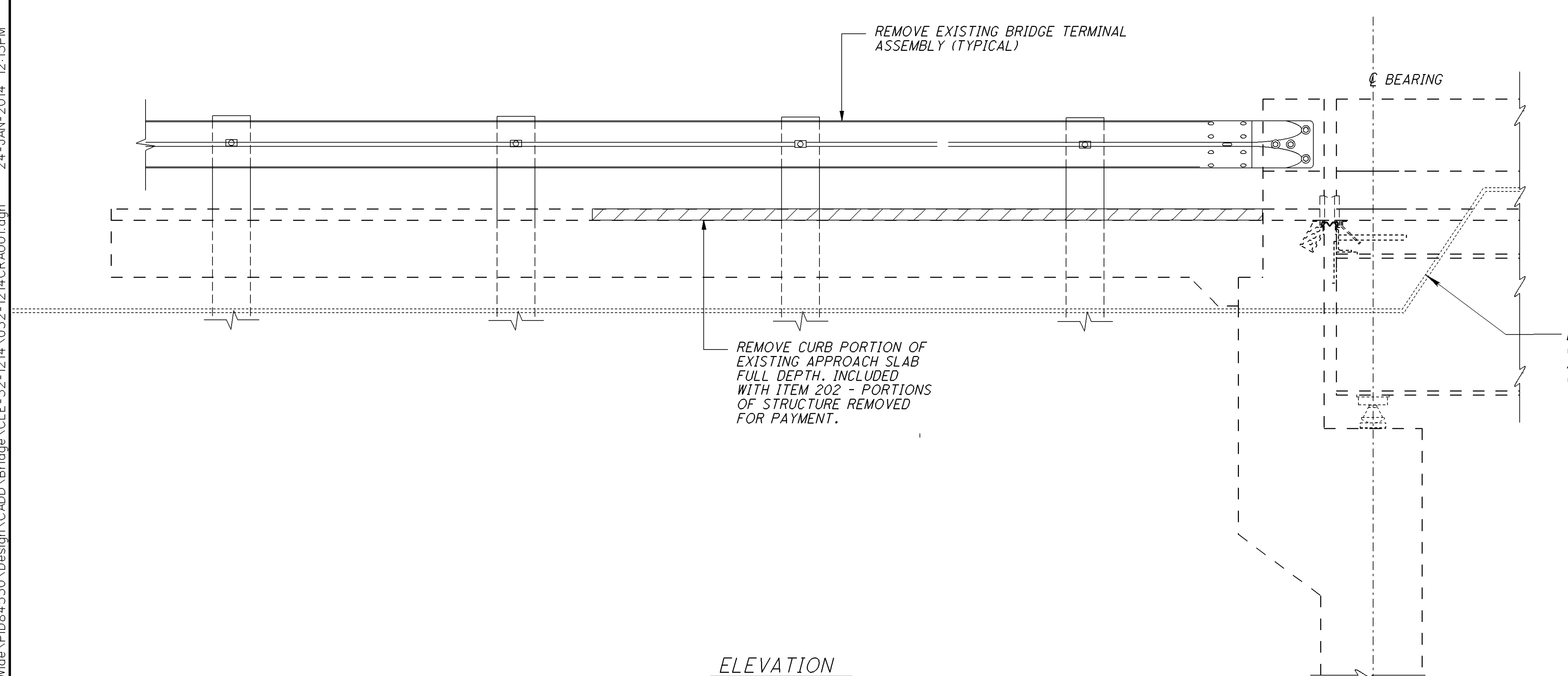
COORDINATES: LATITUDE N 39°04'12"
LONGITUDE W 84°05'37"

	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE
DATE 1-24-14	REVIEWED SCS STRUCTURE FILE NUMBER 1300431
DRAWN CAH	REVISIONS REVISED NEW
CLERMONT COUNTY STA. 118+95.08 STA. 121+04.92	
SITE PLAN - 2 BRIDGE No.: CLE-32-1214 HALF ACRE RD. OVER SR 32	
D08-BM-FY2014 PID No. 84530	
2 / 5	
	

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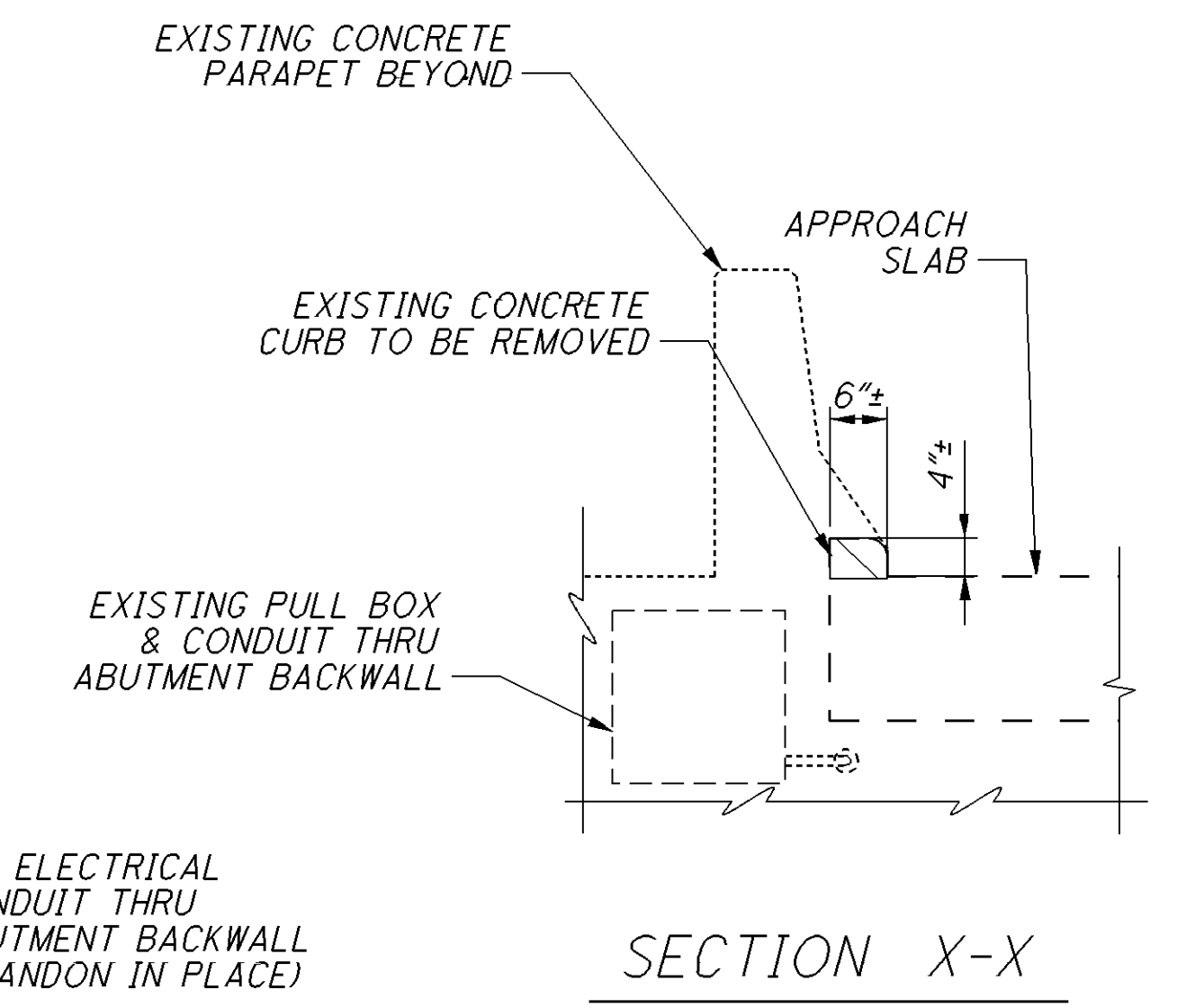


PLAN



ELEVATION

SAWCUTTING INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED FOR PAYMENT.



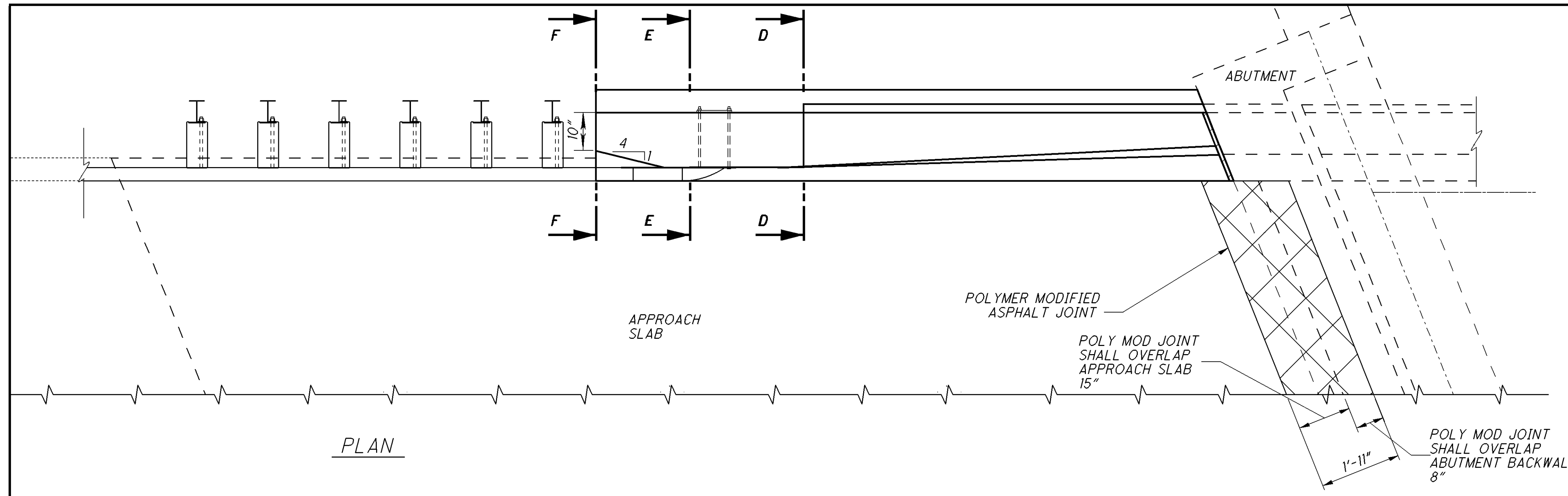
SECTION X-X

LEGEND
 PORTIONS OF STRUCTURE TO BE REMOVED

- NOTES:**
- EARTHWORK MAY IMPACT EXISTING BURIED ELECTRICAL CONDUIT FOR HIGHWAY LIGHTING. SEE ROADWAY NOTES FOR CONTINGENCY QUANTITIES FOR ELECTRICAL CONDUIT REPAIR AND/OR RELOCATION.

DESIGNED CAH	CHECKED RSK	DRAWN CAH	REVIEWED SCS	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO
		REVISED	STRUCTURE FILE NUMBER 1300431	DEPT. OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE	
PARAPET TRANSITION DETAILS 01					
BRIDGE No.: CLE-32-1214 HALF ACRE RD. OVER SR 32					
D08-BM-FY2014					
PID No. 84530					
3 / 5					
39 60					

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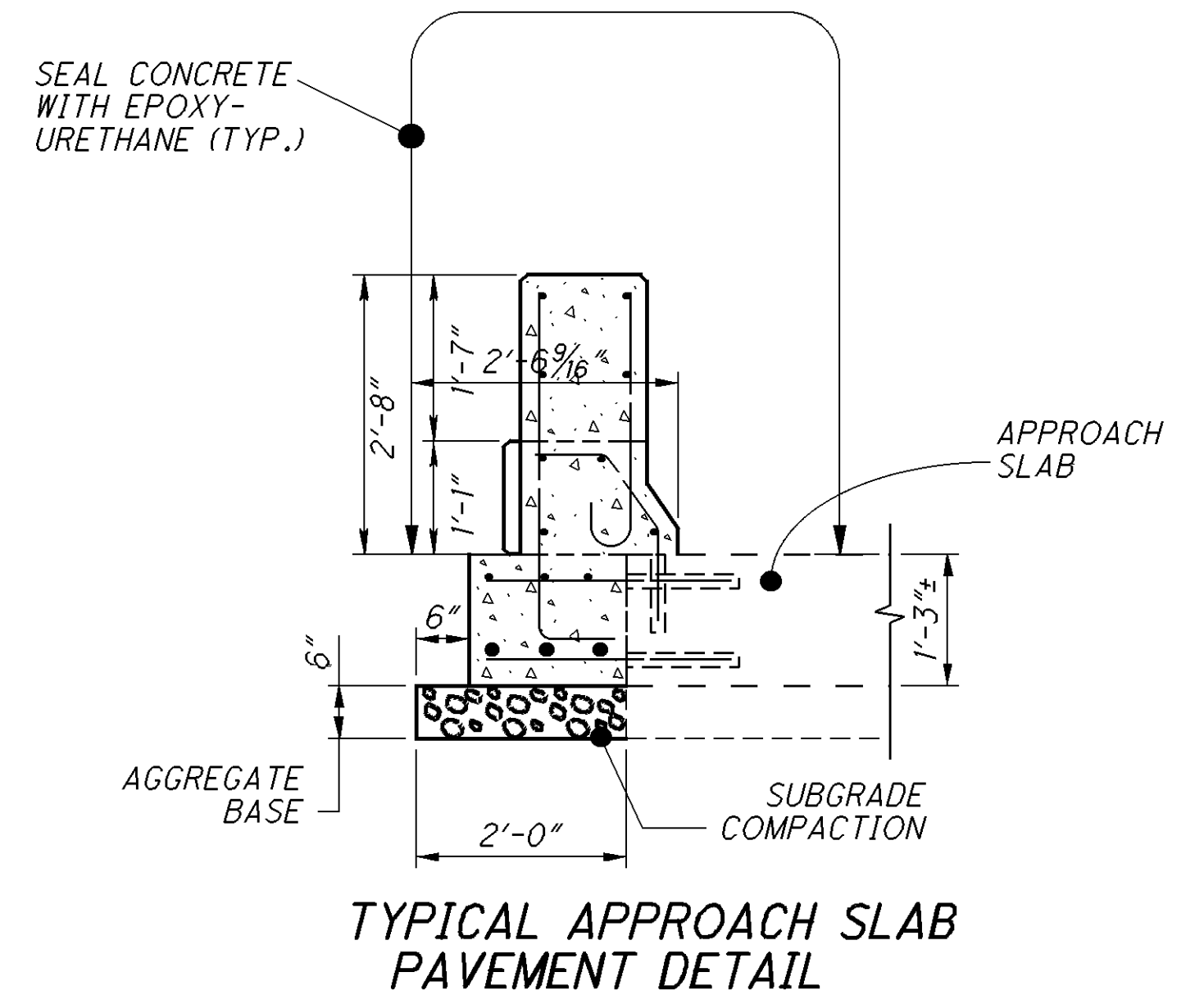
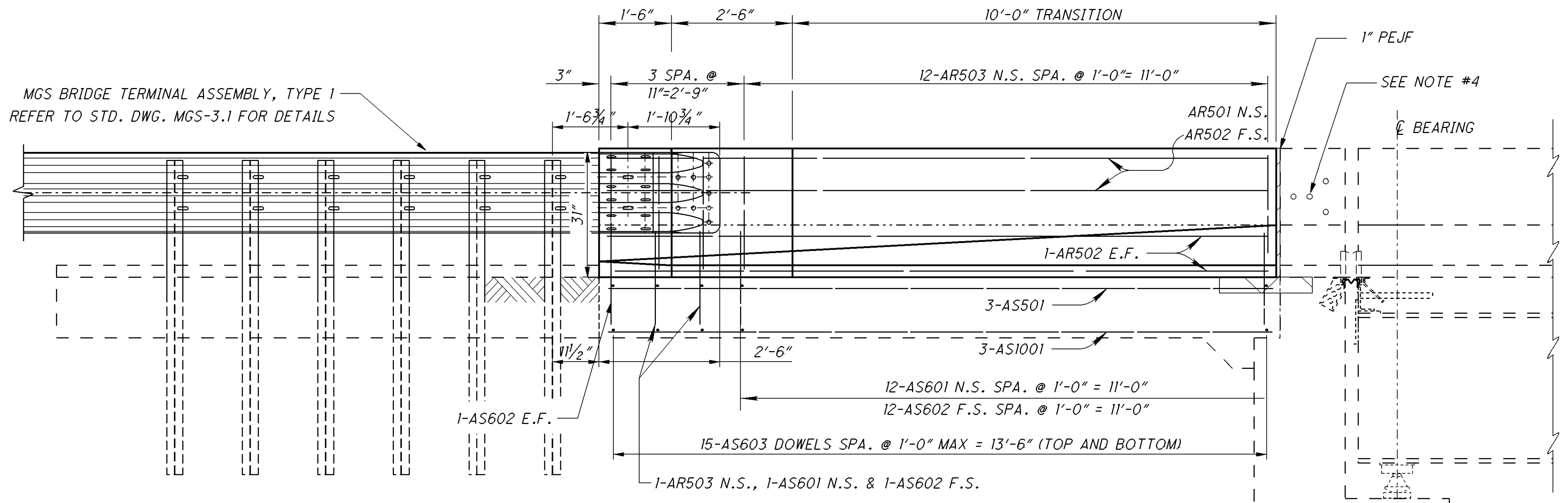
PLAN

NOTES:

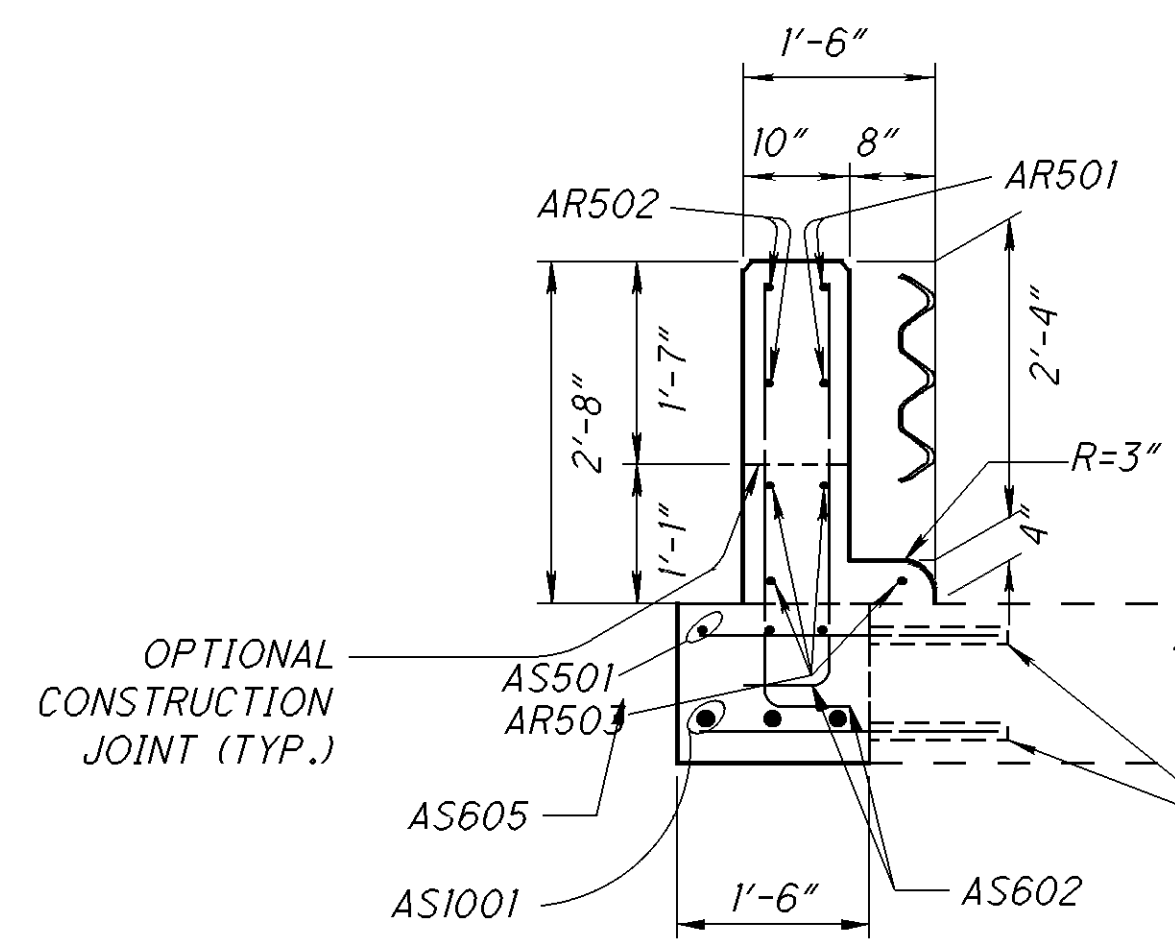
- AS603 REBAR SHALL HAVE A 12" EMBEDMENT INTO THE EXISTING APPROACH SLAB.
- AS601 REBAR SHALL HAVE AN 8" EMBEDMENT INTO THE EXISTING APPROACH SLAB.
- DOWEL REBAR INTO EXISTING APPROACH SLAB USING NON-SHRINK, NON-METALLIC GROUT PER CMS 510.
- PATCH HOLES IN EXISTING PARAPET USING NON-SHRINK, NON-METALLIC GROUT (20 LOCATIONS)

LEGEND

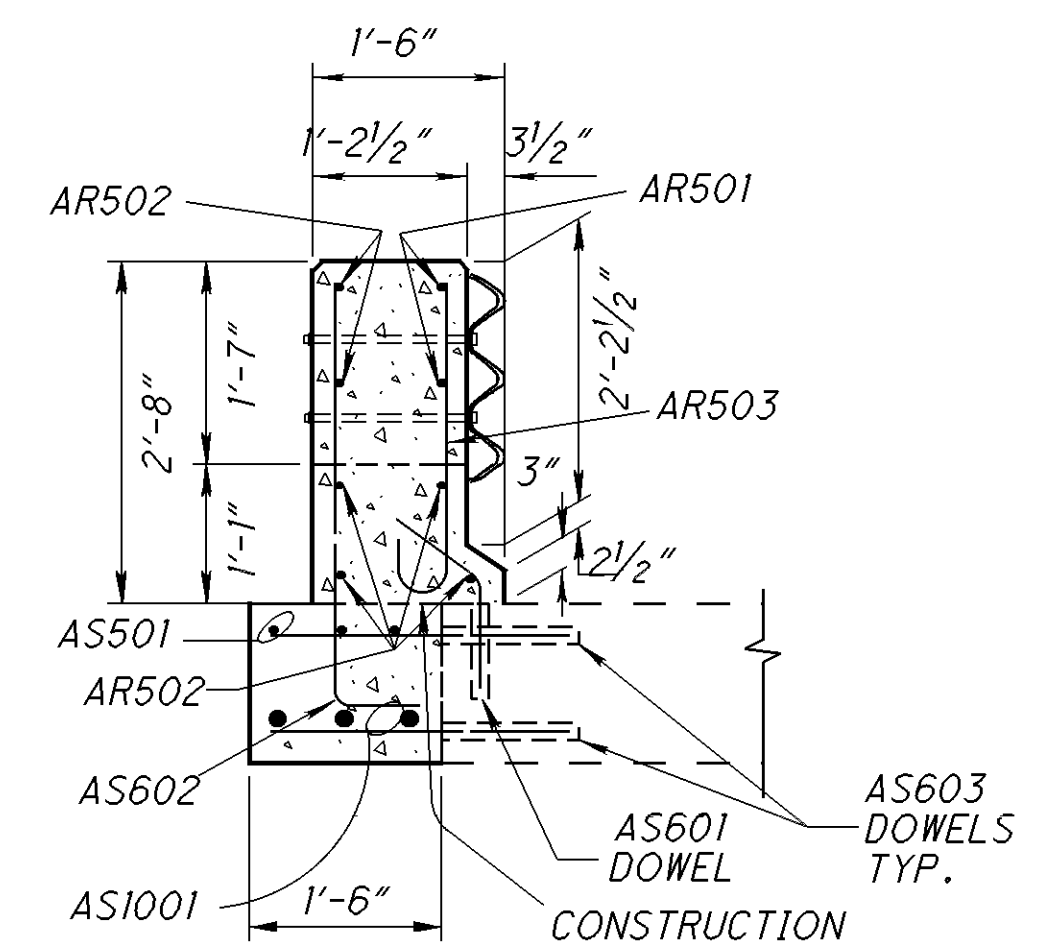
- N.S. = NEAR SIDE
- F.S. = FAR SIDE
- E.F. = EACH FACE
- PEJF = PREFORMED EXPANSION JOINT FILLER



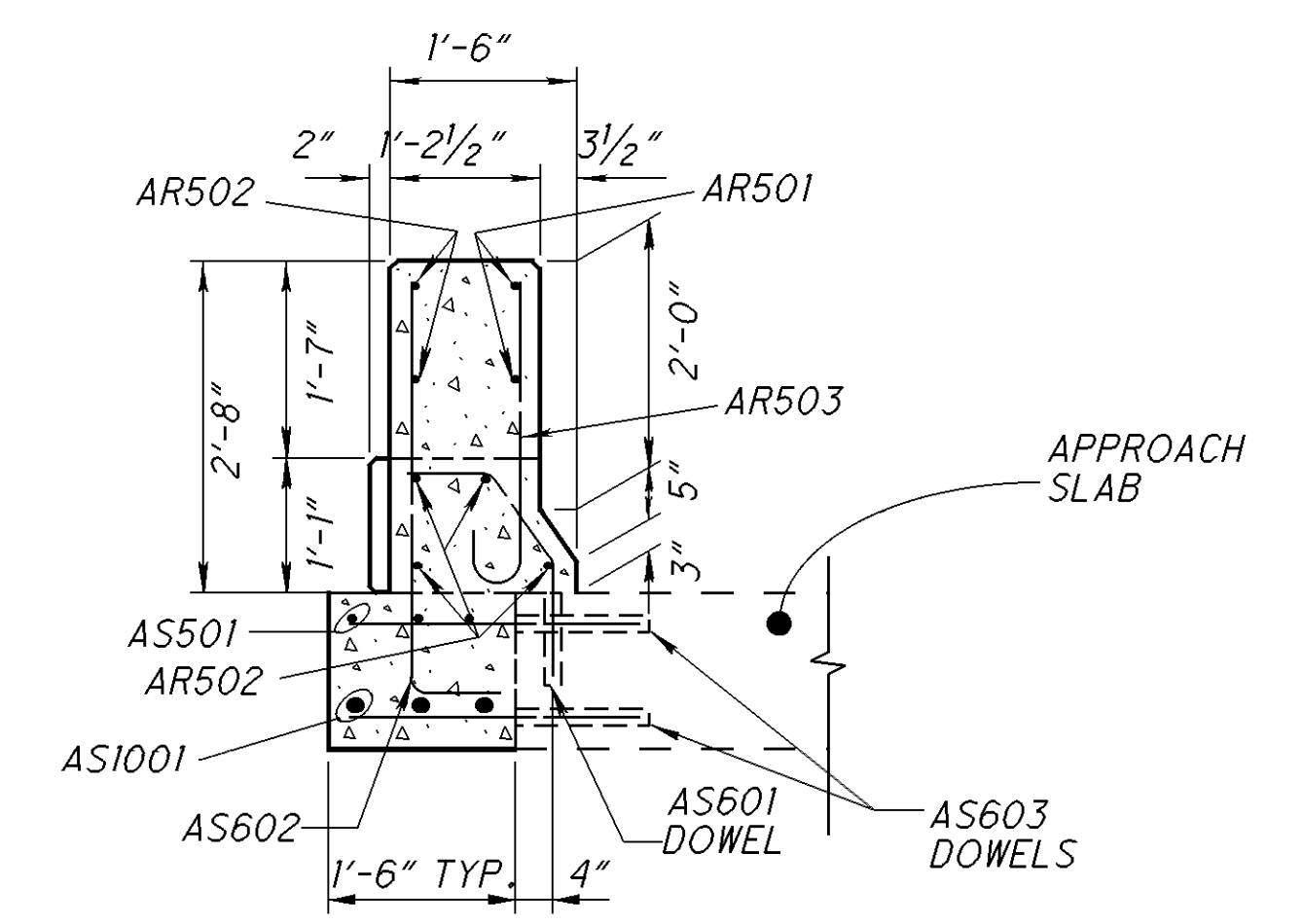
TYPICAL APPROACH SLAB PAVEMENT DETAIL



SECTION F-F



SECTION E-E



SECTION D-D

REFERENCE STD. DWG. AS-1-81 FOR ADDITIONAL INFORMATION

DESIGNED CAH	CHECKED RSK	DRAWN CAH	REVIEWED SCS	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO
				STRUCTURE FILE NUMBER 1300431	DEPT. OF TRANSPORTATION
					DISTRICT 8 BRIDGE OFFICE
PARAPET TRANSITION DETAILS 02					
BRIDGE No.: CLE-32-1214					
HALF ACRE RD. OVER SR 32					
D08-BM-FY2014					
PID No. 84530					
4/5					
40					
60					

NOTES:

THE REPLACEMENT POLYMER MODIFIED ASPHALT (PMA) EXPANSION JOINT SHALL EXTEND 1/4" MINIMUM DEEPER IN DEPTH THAN THE EXISTING PMA JOINT.

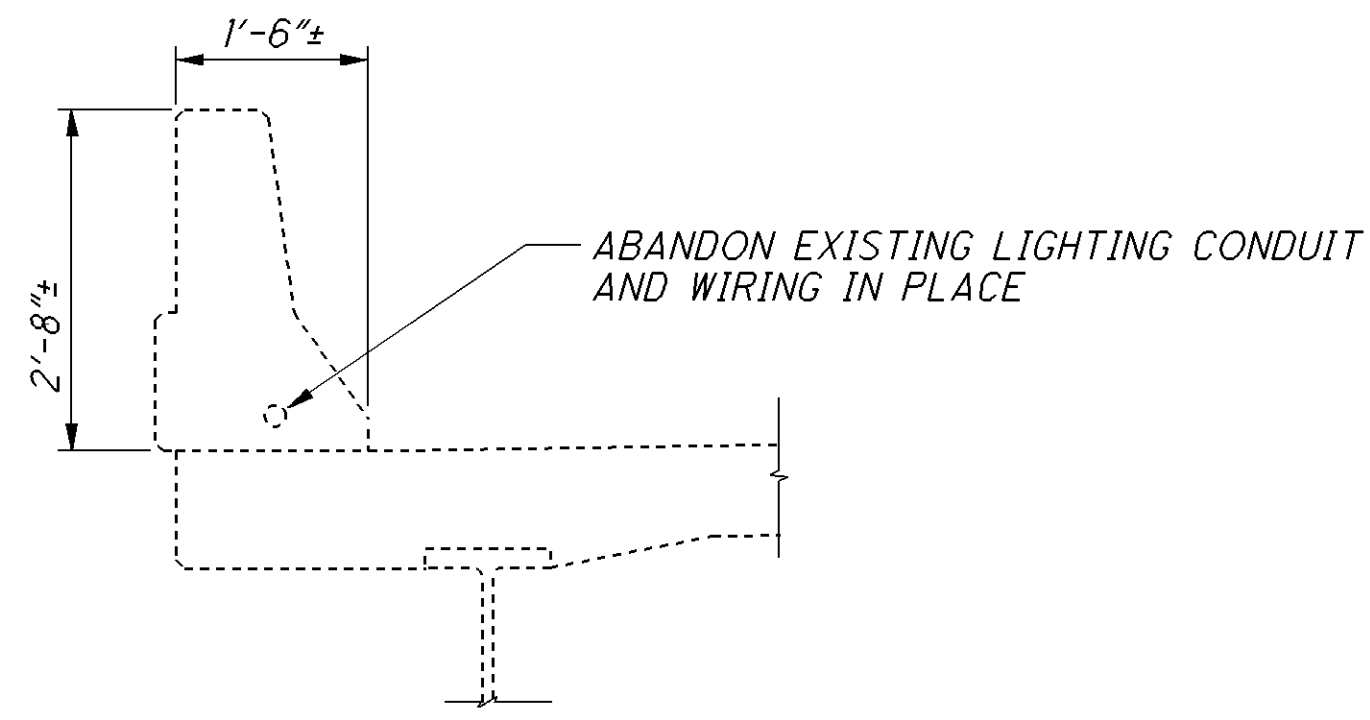
WIDTH = 1.92 FT
 LENGTH = 71.94 FT
 DEPTH = 0.25 FT

VOLUME = 1.83' * 71.94' * 0.25' * 1/27 = 1.22 CU YD

NUMBER OF EXPANSION JOINTS = 2

FINAL VOLUME = 2 * 1.22 CU YD = 2.44 CU YD

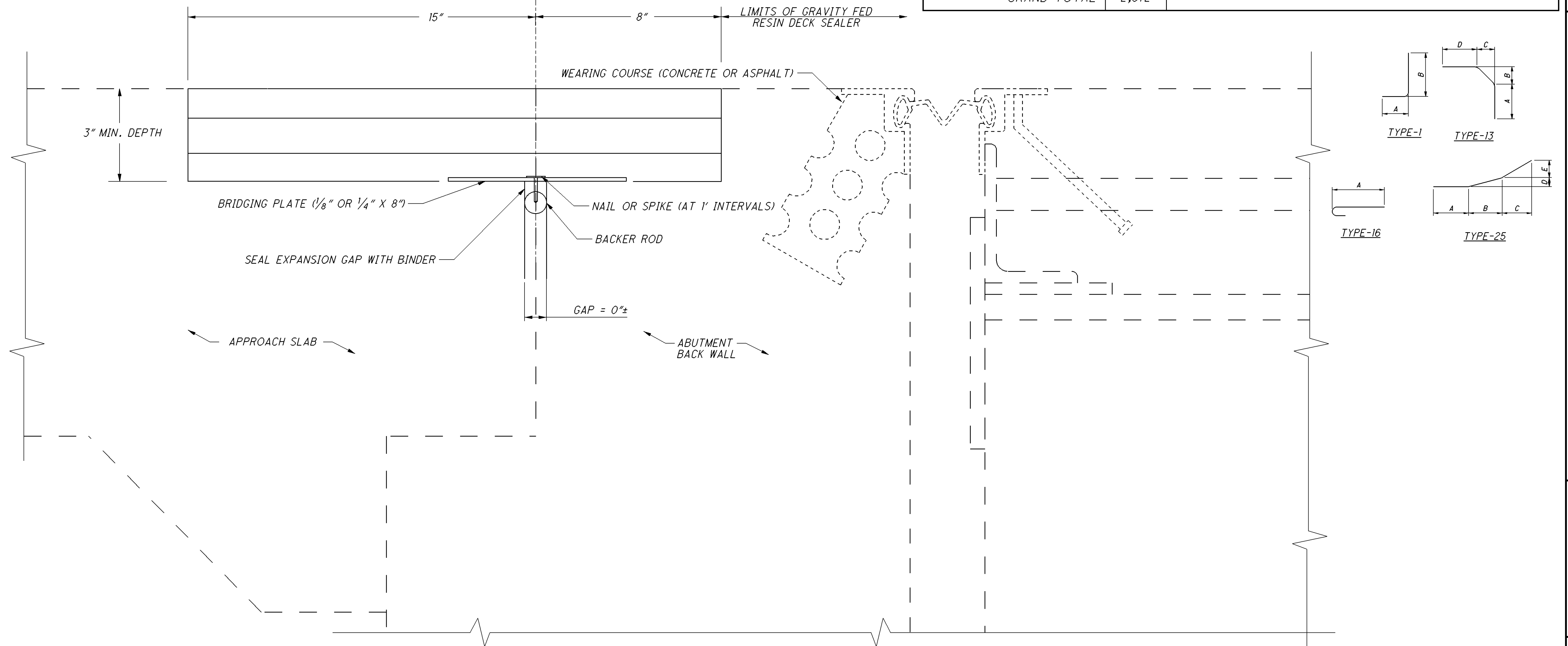
REMOVAL OF THE EXISTING PMA JOINT AND PARTIAL DEPTH APPROACH SLAB/ ABUTMENT BACKWALL REMOVAL TO ACCOMMODATE NEW THICKER PMA JOINT WILL BE INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, A PER PLAN FOR PAYMENT.



LIGHTING CONDUIT DETAIL

MARK	NUMBER	LENGTH	WEIGHT	TYPE	DIMENSIONS					
					A	B	C	D	E	R
APPROACH SLAB PARAPET REINFORCING STEEL LIST										
AR501	8	13'-11"	116	25	10'-0"	2'-5"	1'-5"	0'-1 1/2"	0'-5"	
AR502	24	13'-10"	346	STR						
AR503	56	2'-11"	170	16	2'-4"					
SUB-TOTAL			632							
APPROACH SLAB REINFORCING STEEL LIST										
AS501	12	13'-10"	173	STR						
AS601	56	3'-3"	273	13	0'-10 1/2"	1'-0"	0'-8 1/2"	0'-6"	0'-9"	
AS602	64	3'-10"	369	1	0'-9"	3'-3"				
AS603	120	2'-10"	511	STR						
AS1001	12	13'-10"	714	STR						
SUB-TOTAL			2,040							
GRAND TOTAL			2,672							

⊙ JOINT STA. 118+95.08 (REAR ABUTMENT)
 ⊙ JOINT STA. 121+04.92 (FWD. ABUTMENT)



POLYMER MODIFIED ASPHALT EXPANSION JOINT DETAIL

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DESIGN AGENCY
 STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 BRIDGE OFFICE

DATE
 1-24-14
 REVIEWED
 SCS
 STRUCTURE FILE NUMBER
 2903768

DRAWN
 CWW
 REVISED

DESIGNED
 CWW
 CHECKED
 CAH

PARAPET TRANSITION REINFORCING STEEL LIST

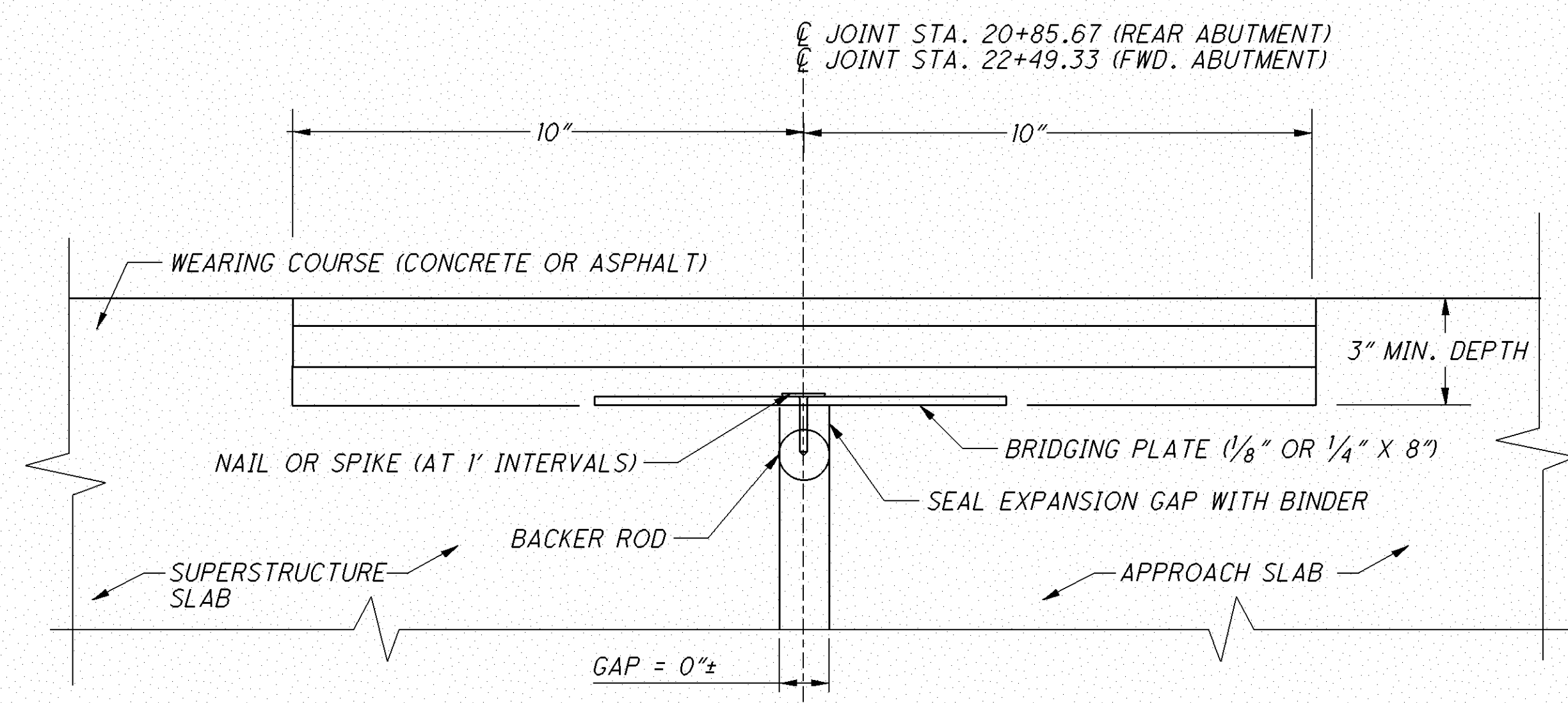
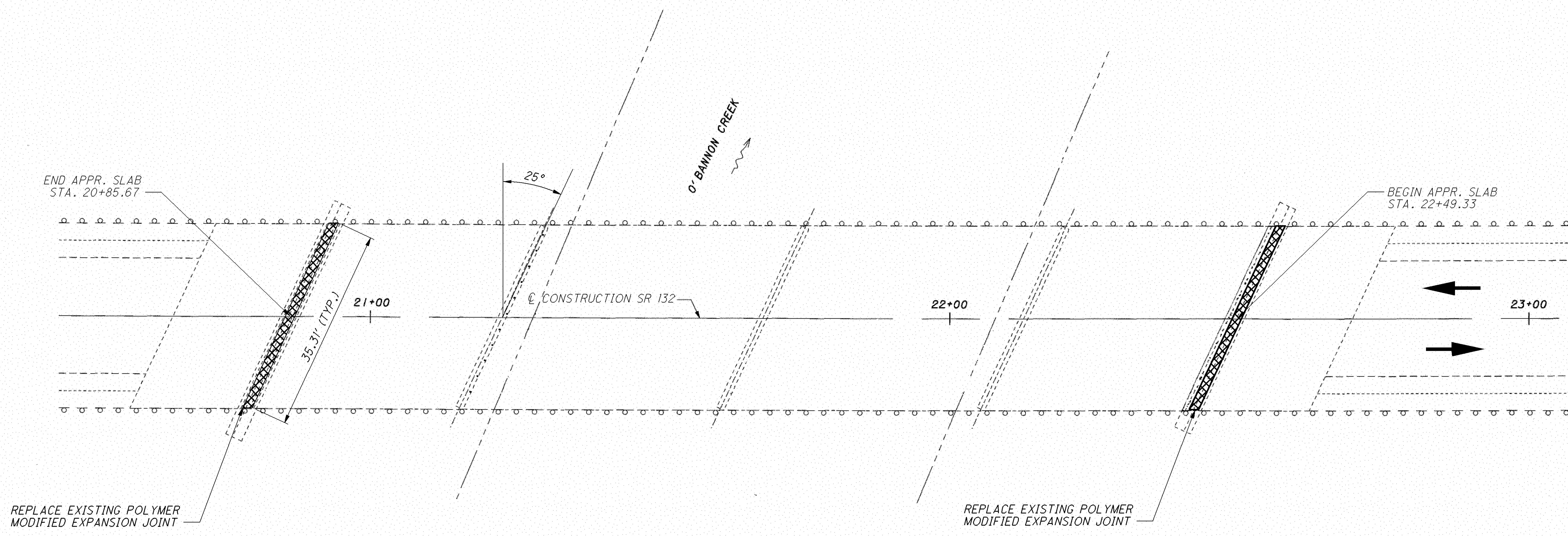
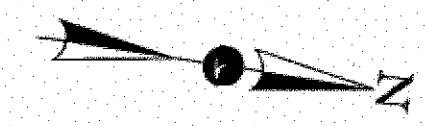
BRIDGE No.: CLE-32-1214
 HALF ACRE RD. OVER SR 32

D08-BM-FY2014
 PID No. 84530

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 60

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TYPICAL POLYMER MODIFIED ASPHALT EXPANSION JOINT FOR CONCRETE SLAB

NOTE:
 THE REPLACEMENT POLYMER MODIFIED ASPHALT (PMA) EXPANSION JOINT SHALL EXTEND 1/4" MINIMUM DEEPER IN DEPTH THAN THE EXISTING PMA JOINT.

WIDTH = 1.83 FT
 LENGTH = 35.31 FT
 DEPTH = 0.25 FT

VOLUME = 1.83' * 35.31' * 0.25' * 1/27 = 0.60 CU YD

NUMBER OF EXPANSION JOINTS = 2

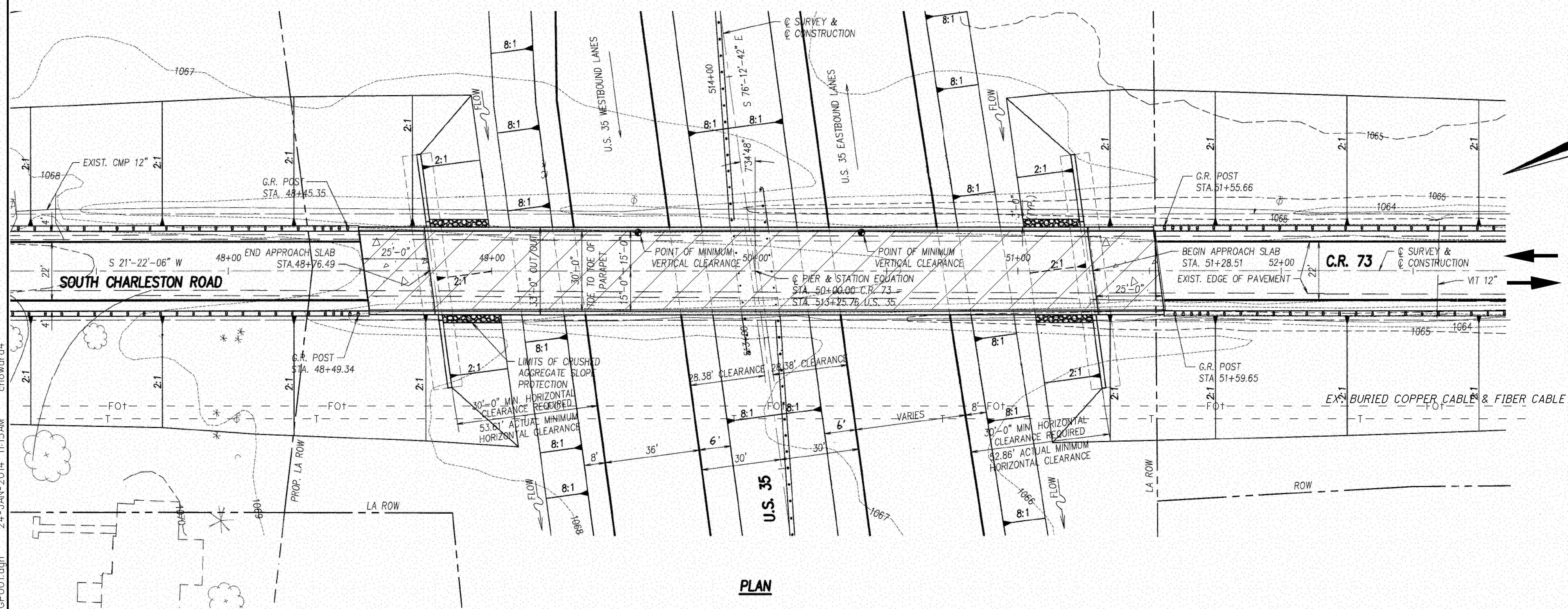
FINAL VOLUME = 2 * 0.6 CU YD = 1.20 CU YD

REMOVAL OF THE EXISTING PMA JOINT AND PARTIAL DEPTH APPROACH SLAB/ ABUTMENT BACKWALL REMOVAL TO ACCOMMODATE NEW THICKER PMA JOINT WILL BE INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, A PER PLAN FOR PAYMENT.

EXISTING STRUCTURE	
TYPE:	CONTINUOUS REINFORCED CONCRETE SLAB WITH REINFORCED CONCRETE SUBSTRUCTURE
SPANS:	36'-0", 45'-0", 45'-0", 36'-0" C/C BEARINGS
ROADWAY:	32' F/F RAILING
LOADING:	HS-20-44
SKEW:	25° LEFT FORWARD
ALIGNMENT:	TANGENT
APPROACH SLABS:	AS-1-54 (20'-0")
STRUCTURAL FILE NUMBER:	1303090
CROWN:	NORMAL 0.0156 FT/FT
WEARING SURFACE:	MONOLITHIC CONCRETE
DATE BUILT:	1955 (REHAB 1995)
DISPOSITION:	SEE PROPOSED WORK
COORDINATES:	LATITUDE N 39°13'45" LONGITUDE W84°09'48"

DESIGNED CAH CHECKED NEW	DRAWN CAH REVISED ---	REVIEWED SCS	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO
		STRUCTURE FILE NUMBER 1303090		DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.
CLERMONT COUNTY STA. 20+85.67 STA. 22+49.33		SITE PLAN BRIDGE NO. CLE-132-2473 S.R. 132 OVER O'BANNON CREEK		
D08-BM-FY2014 PID No. 84530		1/1		
		42 60		

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PLAN

ITEM 842 - FILLING VOIDS UNDER CONCRETE APPROACH SLABS WITH HIGH DENSITY POLYURETHANE

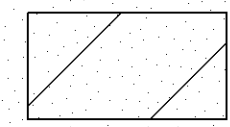
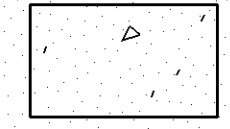
PERFORM WORK ON THE APPROACH SLABS PER SUPPLEMENTAL SPECIFICATION 842. A QUANTITY OF 20,000 POUNDS HAS BEEN CARRIED TO THE STRUCTURE QUANTITIES.

ITEM 512 TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN

THIS ITEM SHALL CONSIST OF TREATING THE BRIDGE DECK ALONG WITH EACH APPROACH SLAB. A QUANTITY OF 1007 SQ YD HAS BEEN CARRIED TO THE STRUCTURE QUANTITIES.

MAINTENANCE OF TRAFFIC

ONE LANE OF TWO WAY TRAFFIC SHALL BE MAINTAINED AT ALL TIMES BY FLAGGERS. DO NOT PERMIT TRAFFIC ON THE TREATED DECK UNTIL THE RESIN IS TACK FREE, A MINIMUM OF 6 HOURS HAS ELAPSED SINCE TREATMENT, AND THE SAND COVER ADHERES SUFFICIENTLY TO RESIST BRUSHING OFF BY HAND.

- LEGEND**
-  SEALING CONCRETE WITH GRAVITY FED RESIN
 -  FILL VOIDS UNDER CONCRETE APPROACH SLABS WITH HIGH DENSITY POLYURETHANE

EXISTING STRUCTURE

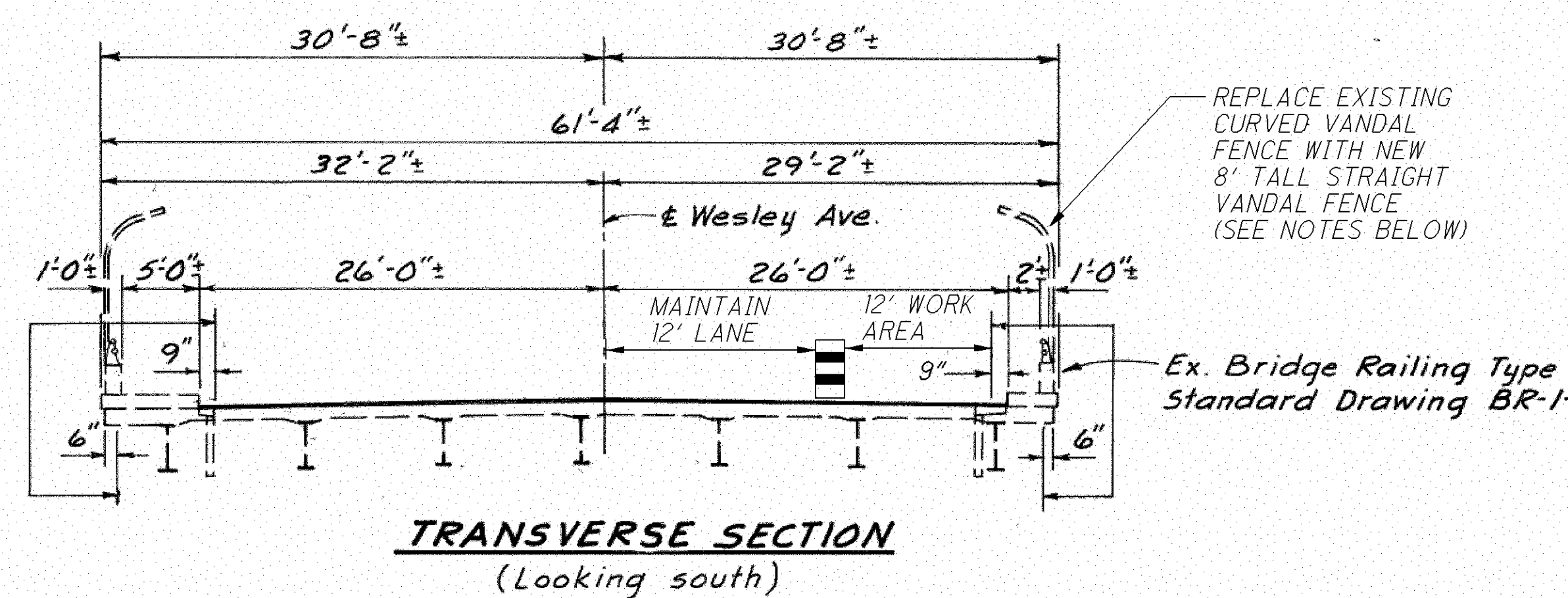
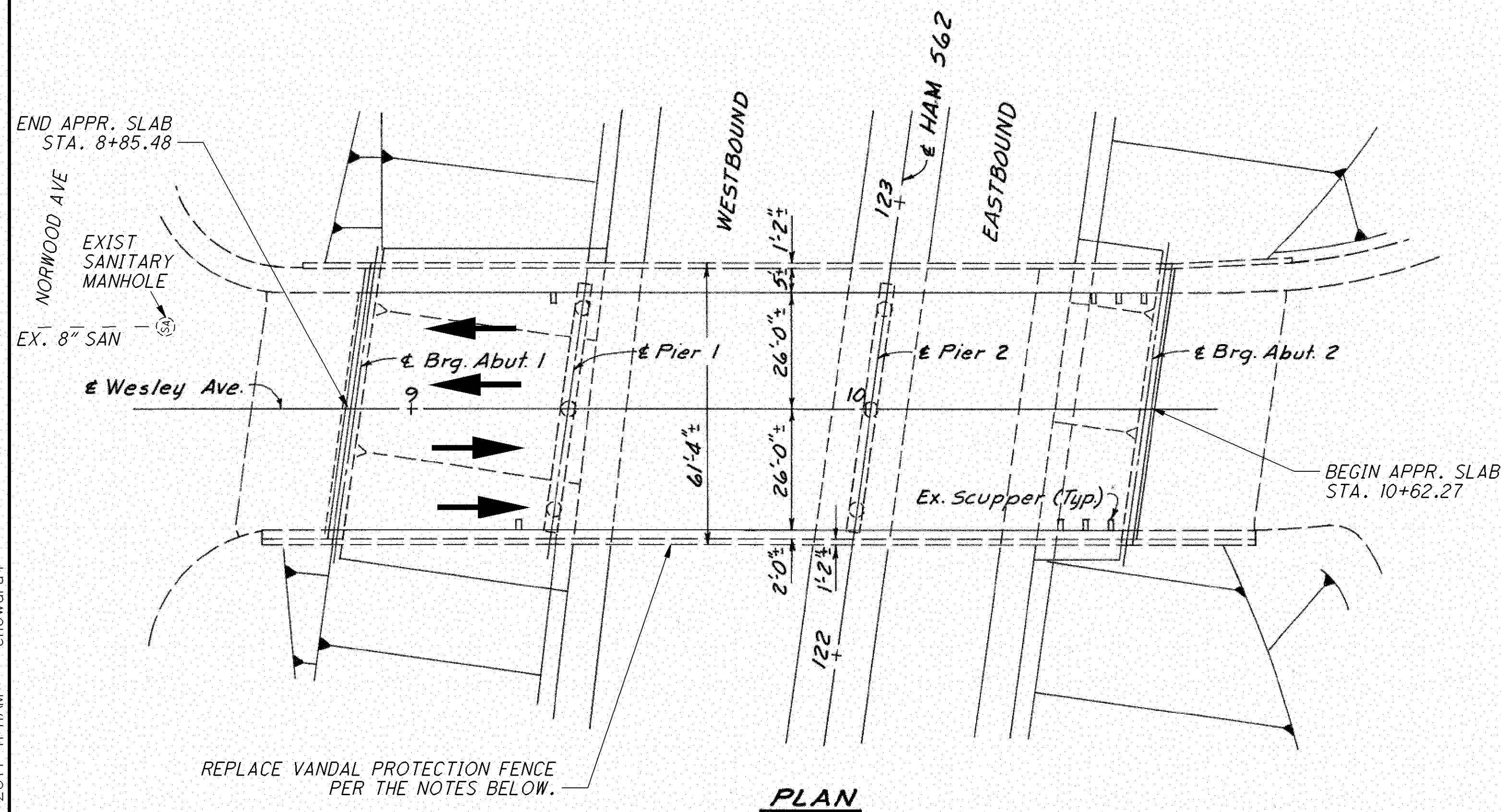
TYPE: CONTINUOUS COMPOSITE, A572 PAINTED STEEL WELDED PLATE I-GIRDER ON CAST-IN-PLACE REINFORCED CONCRETE HALF-HEIGHT, SEMI-INTEGRAL ABUTMENTS AND CAP AND COLUMN PIER

SPANS: 1 @ 122'-3" & 1 @ 127'-3" \bar{C} - \bar{C} BEARINGS
ROADWAY: 30'-0" TOE TO TOE OF PARAPET RAILING

LOADING: HS20-44 (CASE II) AND ALTERNATE MILITARY LOADING
SKEW: 7°-34'-48" R.F.
ALIGNMENT: TANGENT
APPROACH SLABS: AS-1-81 (25')
STRUCTURAL FILE NUMBER: 2900521
CROWN: NORMAL 0.0156 FT/FT
WEARING SURFACE: MONOLITHIC CONCRETE
DATE BUILT: 1999
DISPOSITION: SEE PROPOSED WORK
COORDINATES: LATITUDE N 39°40'10"
LONGITUDE W 84°43'52"

DESIGNED CAH CHECKED NEW	DRAWN CAH REVISED ---	REVIEWED SCS STRUCTURE FILE NUMBER 2900521	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.
GREENE COUNTY STA. 48+76.49 STA. 51+28.51		SITE PLAN BRIDGE NO. GRE-35-2297 CR 73 (S. CHARLESTON RD.) OVER U.S. 35		
D08-BM-FY2014 PID No. 84530		1 / 1 43 60		

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CURB/WALK WIDTH	BASE PLATE TYPE	PROPOSED FENCE TYPE	FENCE SIDE	LINE SPACING FOR FENCE POSTS	LENGTH (LF)
2'-0"	BP-3	8' TALL TYPE PS-3	WEST	1 @ 5'9 1/2", 22 @ 7'5 1/2"	169.87

ITEM 202 - VANDAL PROTECTION FENCE REMOVED, AS PER PLAN
 ITEM 607 - VANDAL PROTECTION FENCE, 8' STRAIGHT, COATED FABRIC, AS PER PLAN

REMOVE THE EXISTING 169.87 FT OF VANDAL PROTECTION FENCE, TYPE PS-1. EXISTING BASE PLATES ARE TO BE RE-USED WITH THE PROPOSED FENCE, DO NOT REMOVE. NEW FENCE SHALL BE STRAIGHT 8' TALL TYPE PS-3 FENCING PER STANDARD CONSTRUCTION DRAWING VPF-1-90. A QUANTITY OF 170' HAS BEEN CARRIED TO THE STRUCTURE QUANTITIES.

EXISTING STRUCTURE	
TYPE: CONTINUOUS ROLLED STEEL BEAMS WITH REINFORCED CONCRETE DECK AND SUBSTRUCTURE	
SPANS: 46'-0", 66'-3", 60'-0"	
ROADWAY: 52'-0" F/F CURB WITH 5'-0" SIDEWALK AND 2'-0" SAFETY CURB	
LOADING: 2000 (57)	
SKEW: 8°05'50"	
ALIGNMENT: TANGENT	
STRUCTURAL FILE NUMBER: 3113981	
CROWN: NORMAL 0.0156 FT/FT	
WEARING SURFACE: MONOLITHIC CONCRETE	
DATE BUILT: 1970	
DISPOSITION: SEE PROPOSED WORK	
COORDINATES: LATITUDE N 39°09'50" LONGITUDE W84°27'05"	

DESIGN AGENCY: STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT & BRIDGE DEPT.

DATE: 1-24-14
 STRUCTURE FILE NUMBER: 3113981

REVIEWED: SCS
 DRAWN: CAH
 CHECKED: CAH
 DESIGNED: CAH
 NEW

HAMILTON COUNTY
 STA. 8+85.48
 STA. 10+62.27

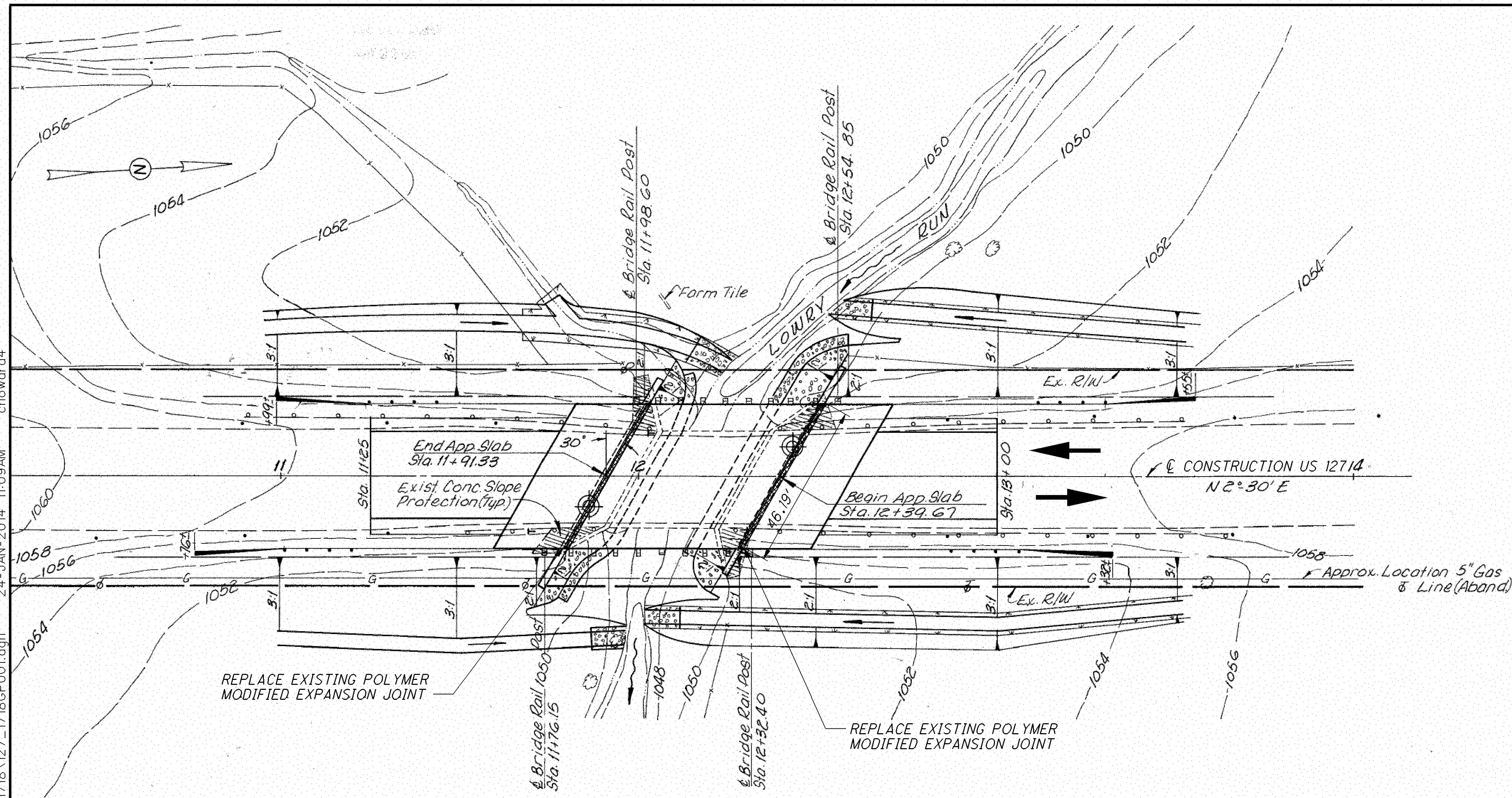
SITE PLAN
 BRIDGE NO. - HAM-562-0227
 WESLEY AVENUE OVER S.R. 562

D08-BM-FY2014
 PID No. 84530

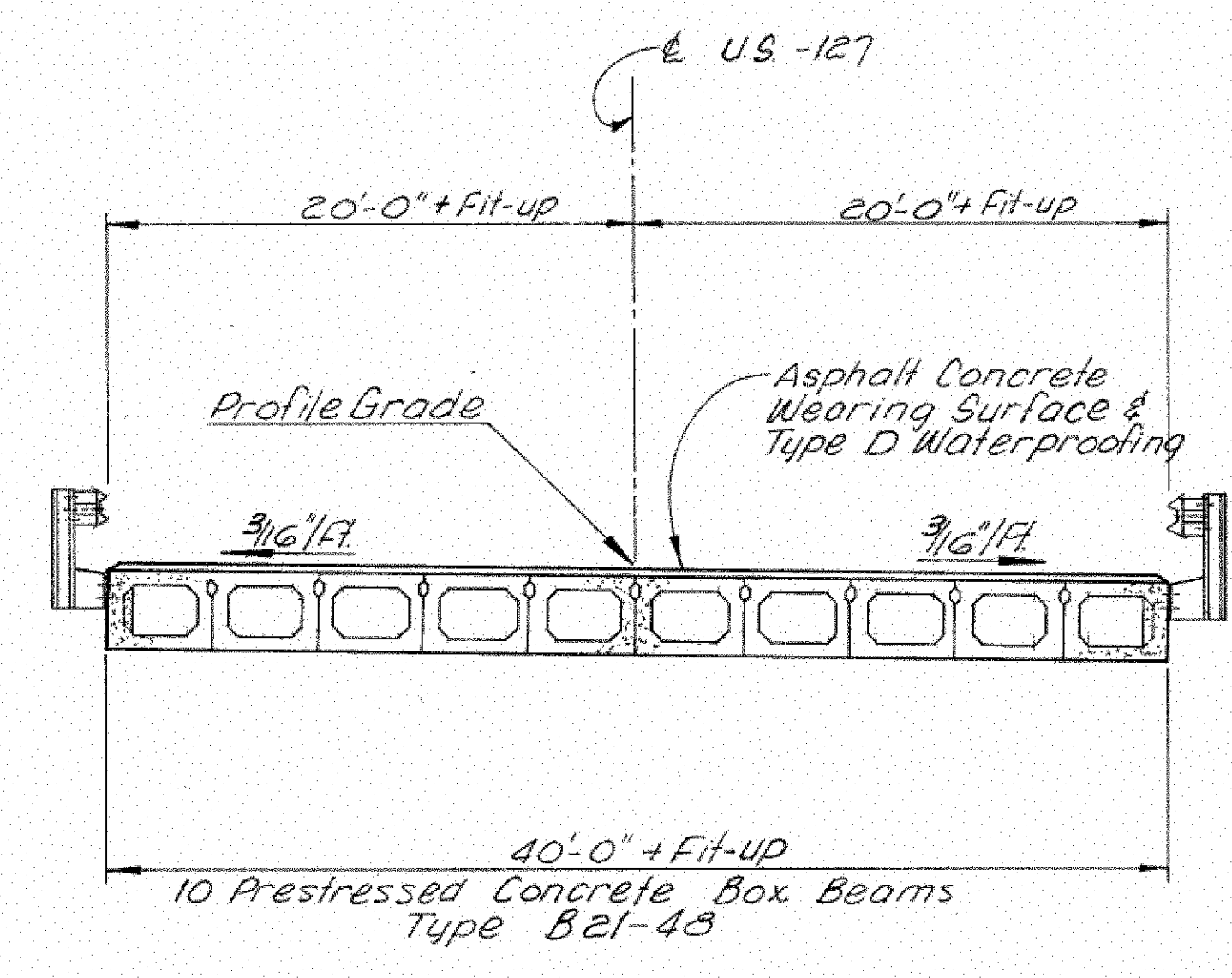
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44
60

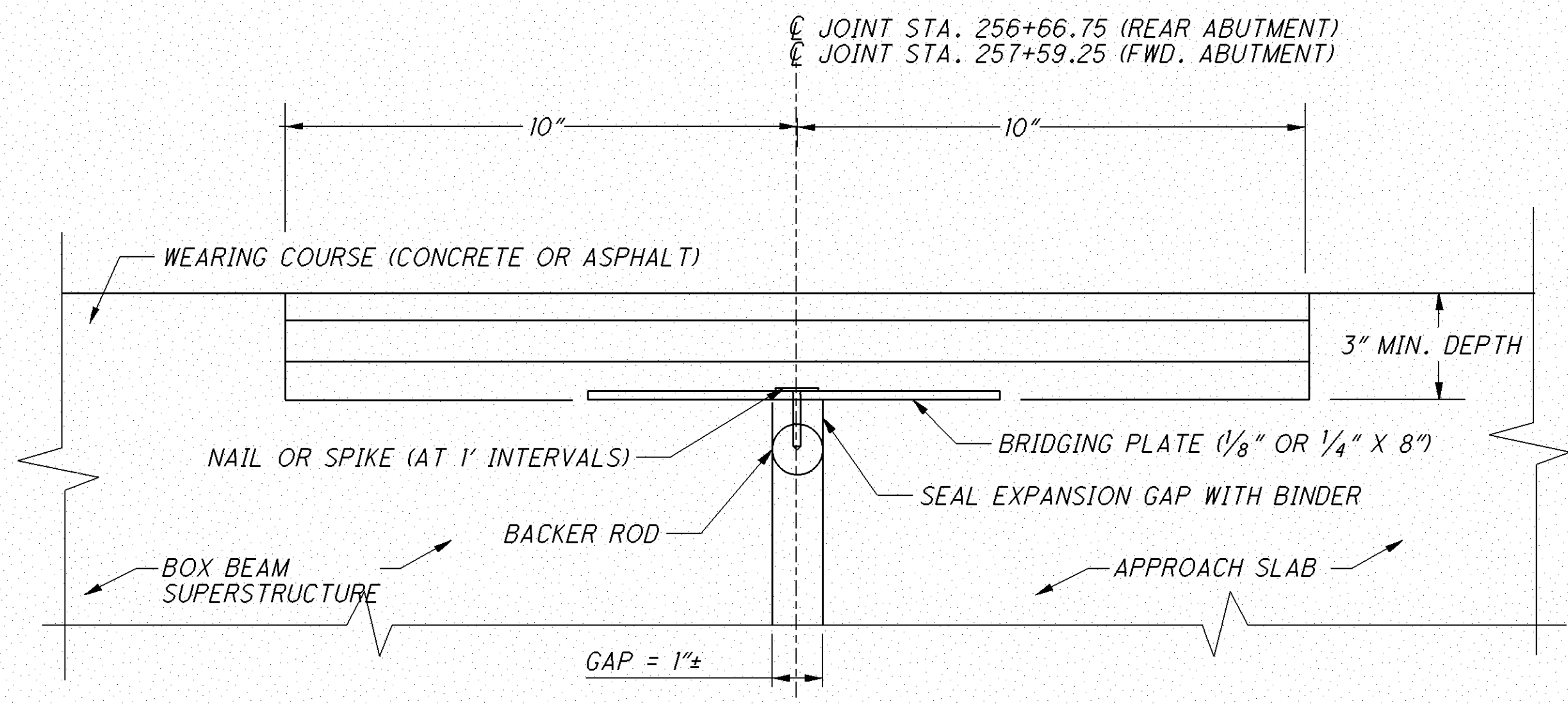
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PLAN



SECTION THROUGH BRIDGE



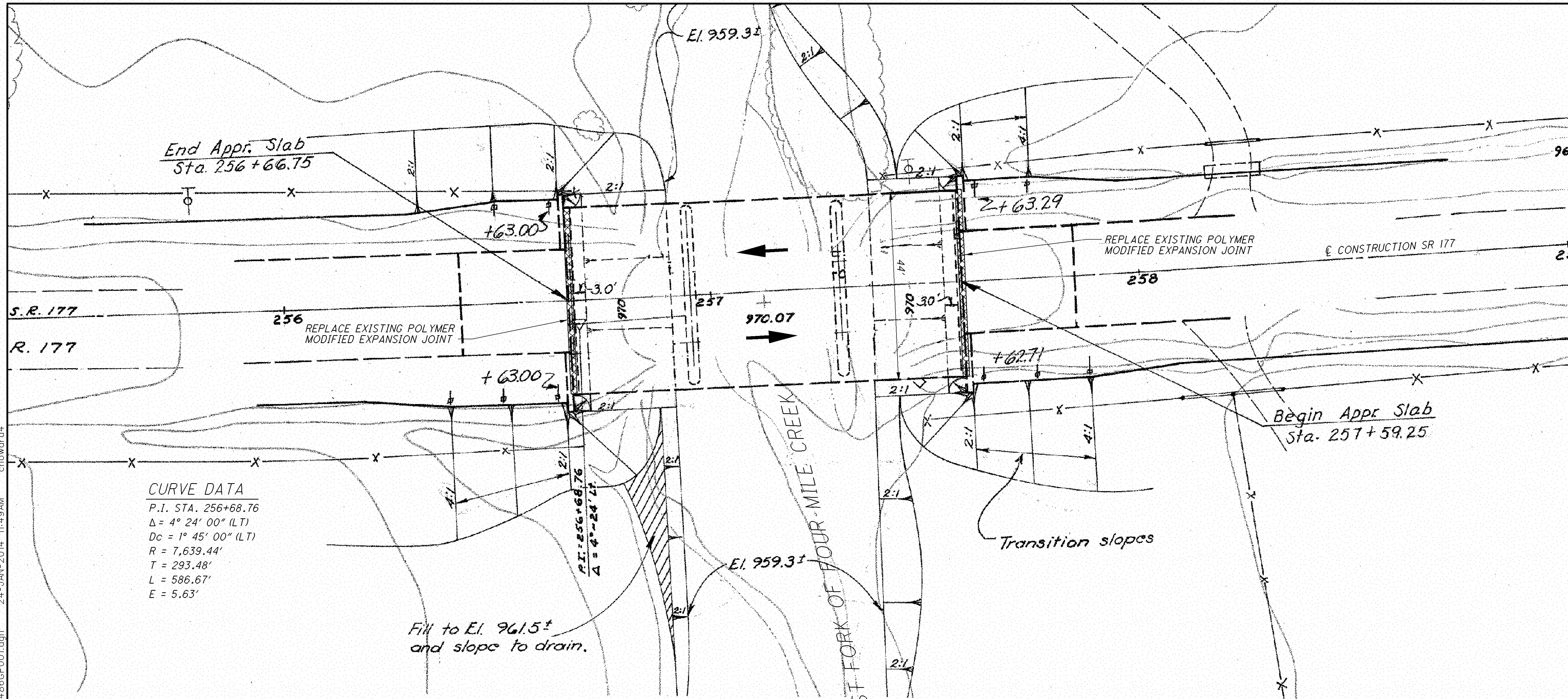
TYPICAL POLYMER MODIFIED ASPHALT EXPANSION JOINT FOR CONCRETE SLAB

NOTE:
 THE REPLACEMENT POLYMER MODIFIED ASPHALT (PMA) EXPANSION JOINT SHALL EXTEND 1/4" MINIMUM DEEPER IN DEPTH THAN THE EXISTING PMA JOINT.
 WIDTH = 1.83 FT
 LENGTH = 46.19 FT
 DEPTH = 0.25 FT
 VOLUME = 1.83' * 46.19' * 0.25' * 1/27 = 0.785 CU YD
 NUMBER OF EXPANSION JOINTS = 2
 FINAL VOLUME = 2 * 0.75 CU YD = 1.57 CU YD
 REMOVAL OF THE EXISTING PMA JOINT AND PARTIAL DEPTH APPROACH SLAB/ ABUTMENT BACKWALL REMOVAL TO ACCOMMODATE NEW THICKER PMA JOINT WILL BE INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, A PER PLAN FOR PAYMENT.

EXISTING STRUCTURE	
TYPE:	PRESTRESSED CONCRETE BOX BEAM ON REINFORCED CONCRETE SUBSTRUCTURE
SPANS:	47'-0" C/C BEARINGS
ROADWAY:	40'-0" F/F GUARDRAIL
LOADING:	HS 20-44 AND ALTERNATE MILITARY LOADING
SKEW:	30°00' LEFT FORWARD
ALIGNMENT:	TANGENT
STRUCTURAL FILE NUMBER:	6802680
CROWN:	NORMAL 0.0156 FT/FT
WEARING SURFACE:	4" ASPHALT CONCRETE
DATE BUILT:	1988
DISPOSITION:	SEE PROPOSED
COORDINATES:	LATITUDE N 39°48'26" LONGITUDE W 84°37'49"

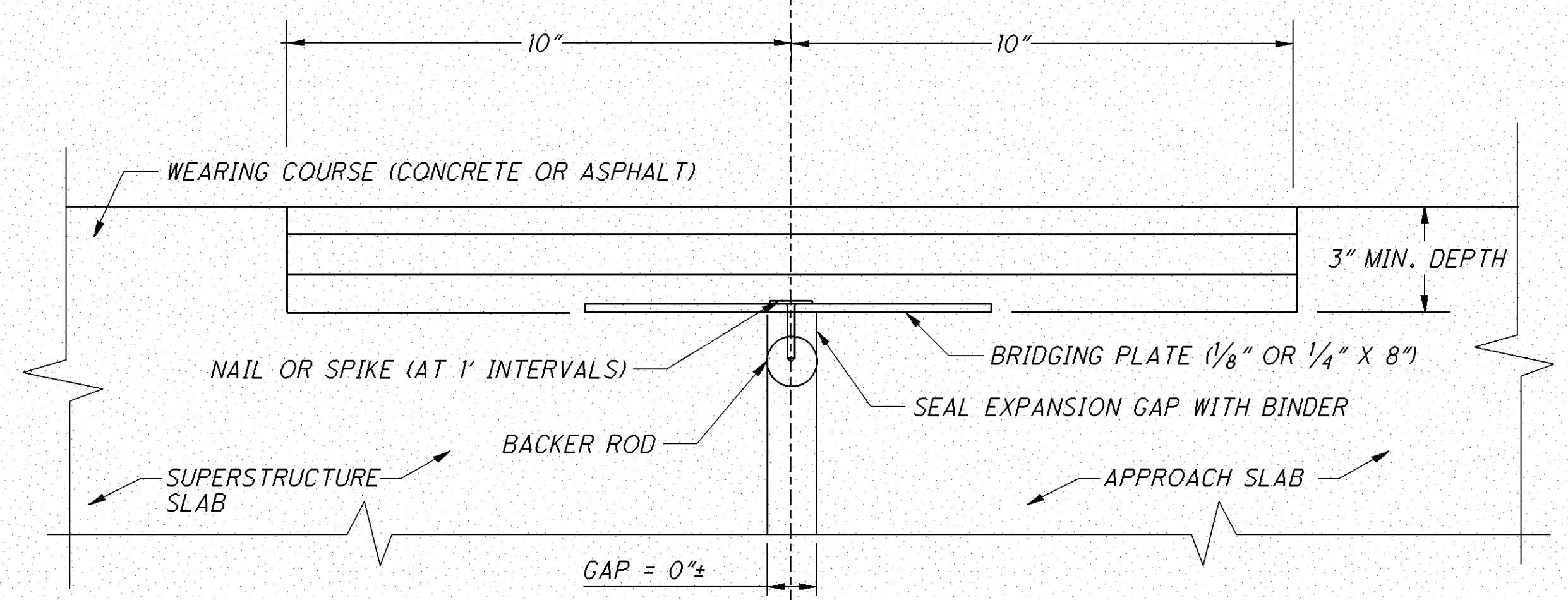
DESIGNED	CAH	CHECKED	NEW
DRAWN	CAH	REVISED	---
REVIEWED	SCS	STRUCTURE FILE NUMBER	6802680
DATE	1-24-14	DESIGN AGENCY	STATE OF OHIO
			DEPT. OF TRANSPORTATION
			DISTRICT & BRIDGE DEPT.
SITE PLAN			
BRIDGE NO. PRE-127-1718			
US 127 OVER LOWRY RUN			
PREBLE COUNTY			
STA. 11+91.33			
STA. 12+39.67			
D08-BM-FY2014			
PID No. 84530			
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45 / 60			

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CURVE DATA
 P.I. STA. 256+68.76
 $\Delta = 4^\circ 24' 00''$ (LT)
 $D_c = 1^\circ 45' 00''$ (LT)
 $R = 7,639.44'$
 $T = 293.48'$
 $L = 586.67'$
 $E = 5.63'$

JOINT STA. 256+66.75 (REAR ABUTMENT)
 JOINT STA. 257+59.25 (FWD. ABUTMENT)



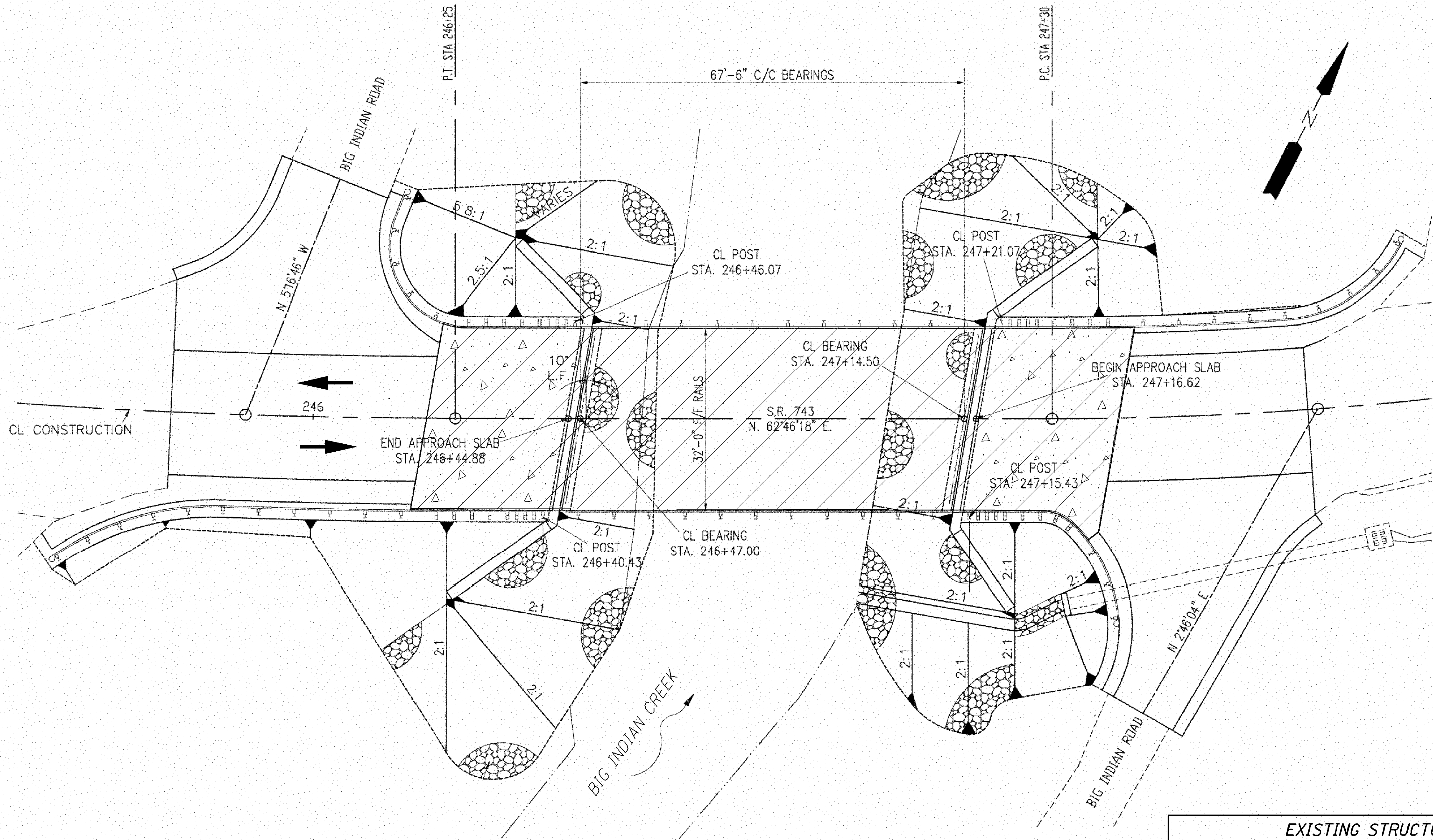
TYPICAL POLYMER MODIFIED ASPHALT EXPANSION JOINT FOR CONCRETE SLAB

NOTE:
 THE REPLACEMENT POLYMER MODIFIED ASPHALT (PMA) EXPANSION JOINT SHALL EXTEND 1/4" MINIMUM DEEPER IN DEPTH THAN THE EXISTING PMA JOINT.
 WIDTH = 1.83 FT
 LENGTH = 44 FT
 DEPTH = 0.25 FT
 $VOLUME = 1.83' * 44' * 0.25' * \frac{1}{27} = 0.75$ CU YD
 NUMBER OF EXPANSION JOINTS = 2
 FINAL VOLUME = 2 * 0.75 CU YD = 1.50 CU YD
 REMOVAL OF THE EXISTING PMA JOINT AND PARTIAL DEPTH APPROACH SLAB/ ABUTMENT BACKWALL REMOVAL TO ACCOMMODATE NEW THICKER PMA JOINT WILL BE INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, A PER PLAN FOR PAYMENT.

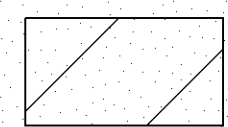
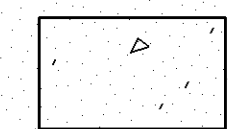
EXISTING STRUCTURE	
TYPE:	CONTINUOUS REINFORCED CONCRETE SLAB WITH CAPPED PILE SUBSTRUCTURE
SPANS:	28'-0", 35'-0", 28'-0" C/C BRGS.
ROADWAY:	44'-0" F/F RAILING
LOADING:	CF-400(57)
SKEW:	NONE
ALIGNMENT:	0°-45' L.C.
APPROACH SLABS:	AS-1-54 (25'-0")
STRUCTURAL FILE NUMBER:	6803032
CROWN:	NORMAL 0.0156 FT/FT
WEARING SURFACE:	2.25" MSC OVERLAY
DATE BUILT:	1961
DISPOSITION:	
COORDINATES:	LATITUDE N 39°37'11" LONGITUDE W 84°45'30"

DESIGNED	CAH	CHECKED	NEW
DRAWN	CAH	REVISED	---
REVIEWED	SCS	STRUCTURE FILE NUMBER	6803032
DATE	1-24-14		
DESIGN AGENCY	STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.		
PREBLE COUNTY	STA. 256+66.75 STA. 257+59.25		
SITE PLAN	BRIDGE NO. PRE-177-0486 SR 177 OVER EAST FORK OF FOUR MILE CREEK		
D08-BM-FY2014	PID No. 84530		
	1 / 1		
	46 / 60		

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PLAN

- LEGEND**
-  SEALING CONCRETE WITH GRAVITY FED RESIN
 -  FILL VOIDS UNDER CONCRETE APPROACH SLABS WITH HIGH DENSITY POLYURETHANE

ITEM 842 FILLING VOIDS UNDER CONCRETE APPROACH SLABS WITH HIGH DENSITY POLYURETHANE

PERFORM WORK ON THE APPROACH SLABS PER SUPPLEMENTAL SPECIFICATION 842. A QUANTITY OF 20,000 POUNDS HAS BEEN CARRIED TO THE STRUCTURE QUANTITIES

ITEM 512 TREATING CONCRETE BRIDGE DECKS WITH GRAVITY FED RESIN, AS PER PLAN

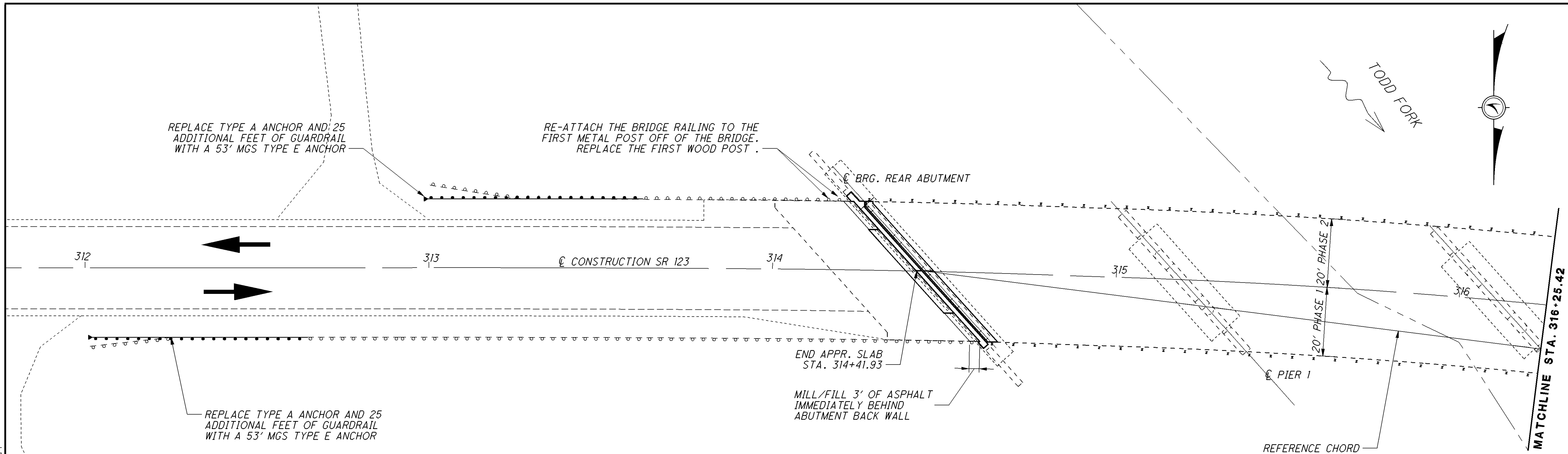
THIS ITEM SHALL CONSIST OF TREATING THE BRIDGE DECK ALONG WITH EACH APPROACH SLAB. A QUANTITY OF 433 SQ YD HAS BEEN CARRIED TO THE STRUCTURE QUANTITIES.

ONE LANE OF TWO WAY TRAFFIC SHALL BE MAINTAINED AT ALL TIMES BY FLAGGERS. DO NOT PERMIT TRAFFIC ON THE TREATED DECK UNTIL THE RESIN IS TACK FREE, A MINIMUM OF 6 HOURS HAS ELAPSED SINCE TREATMENT, AND THE SAND COVER ADHERES SUFFICIENTLY TO RESIST BRUSHING OFF BY HAND.

EXISTING STRUCTURE	
TYPE: PRESTRESSED COMPOSITE CONCRETE BOX BEAMS ON REINFORCED CONCRETE CANTILEVER ABUTMENTS	
SPANS: 67'-6" C/C BEARINGS	
ROADWAY: 32'-0" F/F RAILS	
LOADING: HS20-44 AND ALTERNATE MILITARY LOADING	
SKEW: 10° L.F.	
ALIGNMENT: TANGENT	
APPROACH SLABS: AS-1-81 (25')	
STRUCTURAL FILE NUMBER: 1304887	
CROWN: NORMAL 0.0156 FT/FT	
WEARING SURFACE: MONOLITHIC CONCRETE	
DATE BUILT: 1997	
DISPOSITION: SEE PROPOSED WORK	
COORDINATES: LATITUDE N 38°52'47"	
LONGITUDE W 84°09'40"	

SITE PLAN BRIDGE NO. CLE-743-0466 SR 743 OVER BIG INDIAN CREEK	CLERMONT COUNTY STA. 246+44.88 STA. 247+16.62	DESIGNED CAH CHECKED NEW	DRAWN AK REVISED ---	REVIEWED SCS STRUCTURE FILE NUMBER 1304887	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.
	D08-BM-FY2014 PID No. 84530	1 / 1 47 60				

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CURVE DATA

P.I. Sta. 319+80.00
 $\Delta = 37^\circ 04' 44''$ (RT)
 $D_c = 4^\circ 00' 00''$
 $R = 1,432.39'$
 $L_s = 400.00'$
 $\theta_s = 8^\circ 00' 00''$
 $LT = 266.94'$
 $ST = 133.58'$
 $x = 399.22'$
 $y = 18.59'$
 $k = 199.87'$
 $p = 4.65'$
 $\Delta_c = 21^\circ 04' 44''$ (RT)
 $L_c = 526.97'$
 $T_s = 681.80'$
 $E = 83.31'$
 $C = 524.00'$
 $C1 = C2 = 399.65'$
 $C.B.1 = N 68^\circ 19' 39'' W$
 $C.B. = N 52^\circ 27' 15'' W$
 $C.B.2 = S 36^\circ 34' 52'' E$

NOTES:

1. PROVIDE PROPER TRANSITION FROM NEW MGS GUARDRAIL TO EXISTING TYPE 5 GUARDRAIL PER STD. DWG. MGS-4.3.
2. SEE SHEET 18 OF 60 FOR PAVEMENT QUANTITIES.
3. PROVIDE PAVEMENT BUTT JOINT WHERE NEW ASPHALT MEETS EXISTING PER STD. DWG. BP-3.1.

BENCHMARK DATA

North	East	Elevation	Feature	Station	Offset
490667.58	1519362.02	745.18	MAGS	320+24.97	LT 27.46
490382.02	1519911.39	715.20	MAGS	314+10.32	LT 16.69
490341.63	1520023.37	713.98	CMON	312+91.47	LT 18.00
490375.66	1520035.09	713.60	CMON	312+91.47	18.00
490818.97	1519218.65	756.32	CMON	322+30.16	LT 18.79

SCALE FACTOR OF 1.00 MAP COORDINATES ARE ON OHIO STATE PLANE SOUTH ZONE (SPC 3402) GRID. REFERENCE FRAME NAD 83 ELLIPOID GRS 80 GEOID 12A, AND WERE ESTABLISHED USING THE ODOT VRS. UNITS ARE IN U.S. SURVEY FOOT

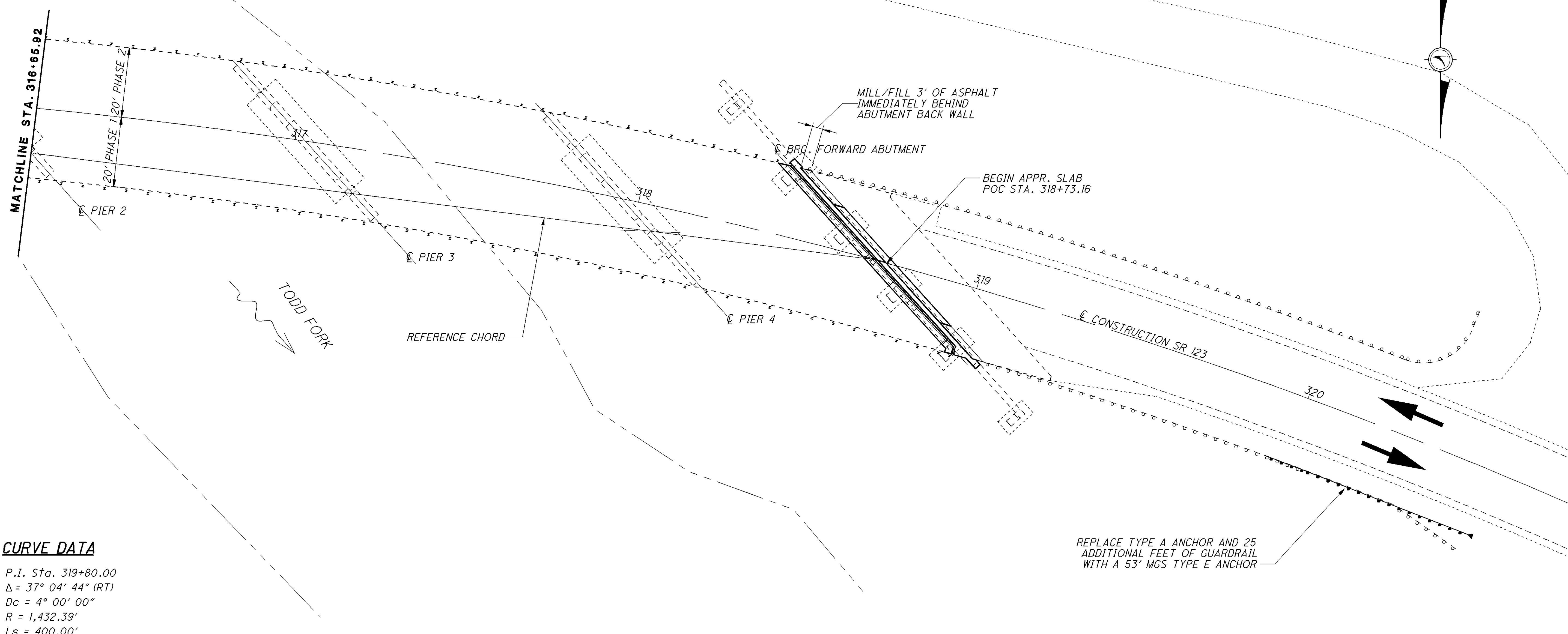
EXISTING STRUCTURE

TYPE: CONTINUOUS STEEL BEAM WITH NON-COMPOSITE REINFORCED CONCRETE DECK SUPPORTED ON REINFORCED CONCRETE STUB ABUTMENTS AND 'T' TYPE PIERS

SPANS: 74'-0", 92'-0", 92'-0", 92'-0", 74'-0" ALONG CURVE
 ROADWAY: 40'-0" F/F RAILING
 LOADING: HS20-44 & ALT. MILITARY
 SKEW: 50°00'00" RIGHT FORWARD
 APPROACH SLABS: 25'-0" LONG (AS-1-72)
 ALIGNMENT: 4°00'00" CURVE RIGHT
 SUPERELEVATION: VARIES, 0.083 FT/FT MAX.
 STRUCTURAL FILE NUMBER: 8304157
 DATE BUILT: 1978
 DISPOSITION:
 COORDINATES: LATITUDE N39°20'08"
 LONGITUDE W84°05'09"
 WEARING SURFACE: 1.25" MICRO-SILICA CONCRETE OVERLAY

DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE	DATE 1-24-14
	REVIEWED SCS STRUCTURE FILE NUMBER 8304157
DRAWN CAH REVISED	DESIGNED CAH CHECKED NEW
WARREN COUNTY STA. 314+41.93 STA. 318+73.16	SITE PLAN BRIDGE No.: WAR-123-0598 SR 123 OVER TODD FORK
D08 - BM - FY2014 PID No. 84530	1 / 12 48 / 60

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CURVE DATA

P.I. Sta. 319+80.00
 $\Delta = 37^\circ 04' 44''$ (RT)
 $Dc = 4^\circ 00' 00''$
 $R = 1,432.39'$
 $Ls = 400.00'$
 $\theta s = 8^\circ 00' 00''$
 $LT = 266.94'$
 $ST = 133.58'$
 $x = 399.22'$
 $y = 18.59'$
 $k = 199.87'$
 $p = 4.65'$
 $\Delta c = 21^\circ 04' 44''$ (RT)
 $Lc = 526.97'$
 $Ts = 681.80'$
 $E = 83.31'$
 $C = 524.00'$
 $C1 = C2 = 399.65'$
 $C.B.1 = N 68^\circ 19' 39'' W$
 $C.B. = N 52^\circ 27' 15'' W$
 $C.B.2 = S 36^\circ 34' 52'' E$

NOTES:

1. PROVIDE PROPER TRANSITION FROM NEW MGS GUARDRAIL TO EXISTING TYPE 5 GUARDRAIL PER STD. DWG. MGS-4.3.
2. SEE SHEET 18 OF 60 FOR PAVEMENT QUANTITIES.
3. PROVIDE PAVEMENT BUTT JOINT WHERE NEW ASPHALT MEETS EXISTING PER STD. DWG. BP-3.1.

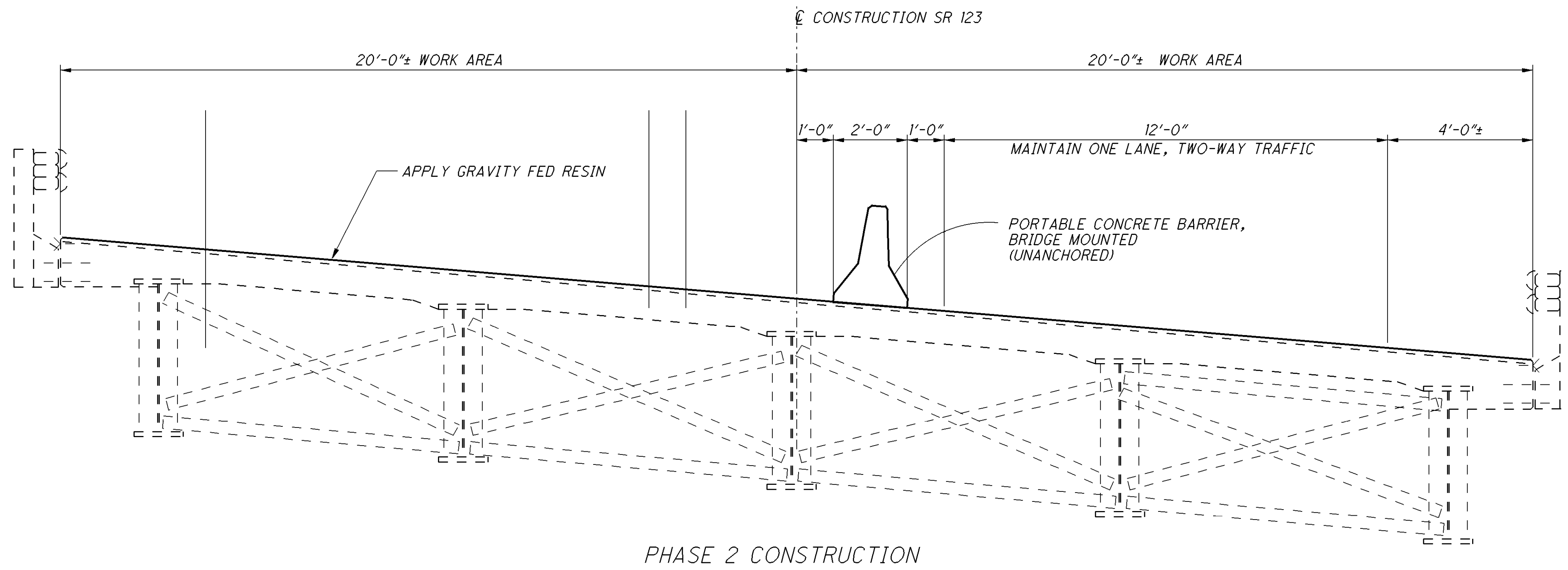
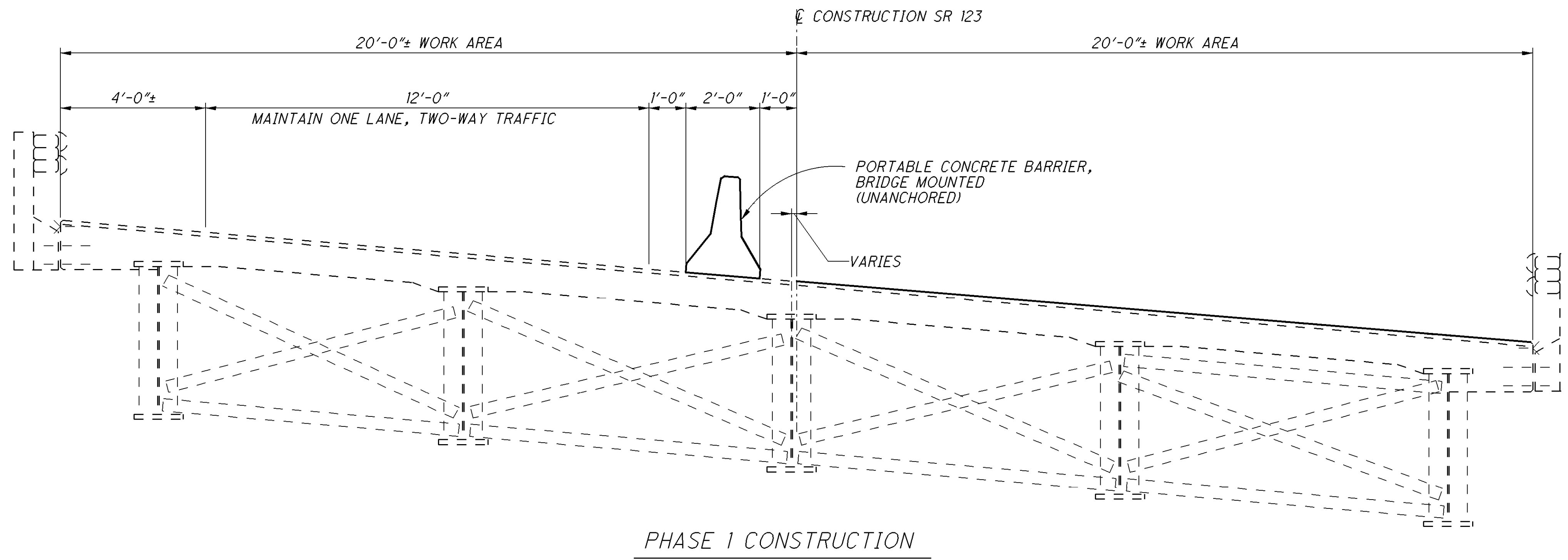
BENCHMARK DATA					
North	East	Elevation	Feature	Station	Offset
490667.58	1519362.02	745.18	MAGS	320+24.97	LT 27.46
490382.02	1519911.39	715.20	MAGS	314+10.32	LT 16.69
490341.63	1520023.37	713.98	CMON	312+91.47	LT 18.00
490375.66	1520035.09	713.60	CMON	312+91.47	18.00
490818.97	1519218.65	756.32	CMON	322+30.16	LT 18.79

SCALE FACTOR OF 1.00 MAP COORDINATES ARE ON OHIO STATE PLANE SOUTH ZONE (SPC 3402) GRID. REFERENCE FRAME NAD 83 ELLIPSOID GRS 80 GEOID 12A, AND WERE ESTABLISHED USING THE ODOT VRS. UNITS ARE IN U.S. SURVEY FOOT

EXISTING STRUCTURE	
TYPE: CONTINUOUS STEEL BEAM WITH NON-COMPOSITE REINFORCED CONCRETE DECK SUPPORTED ON REINFORCED CONCRETE STUB ABUTMENTS AND 'T' TYPE PIERS	
SPANS: 74'-0", 92'-0", 92'-0", 92'-0", 74'-0" ALONG CURVE	
ROADWAY: 40'-0" F/F RAILING	
LOADING: HS20-44 & ALT. MILITARY	
SKEW: 50°00'00" RIGHT FORWARD	
APPROACH SLABS: 25'-0" LONG (AS-I-72)	
ALIGNMENT: 4°00'00" CURVE RIGHT	
SUPERELEVATION: VARIES, 0.083 FT/FT MAX.	
STRUCTURAL FILE NUMBER: 8304157	
DATE BUILT: 1978	
DISPOSITION:	
COORDINATES: LATITUDE N39°20'08"	
LONGITUDE W84°05'09"	
WEARING SURFACE: 1.25" MICRO-SILICA CONCRETE OVERLAY	

WARREN COUNTY STA. 314+41.93 STA. 318+73.16	DESIGNED CAH CHECKED NEW	DRAWN CAH REVISED	REVIEWED SCS STRUCTURE FILE NUMBER 8304157	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE
	SITE PLAN BRIDGE No.: WAR-123-0598 SR 123 OVER TODD FORK				
D08 - BM - FY2014 PID No. 84530		2 / 12		49 60	

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DESIGN AGENCY
STATE OF OHIO
DEPT. OF TRANSPORTATION
DISTRICT 8 - BRIDGE OFFICE

REVIEWED
SCS

DATE
1-24-14

STRUCTURE FILE NUMBER
8304157

DRAWN
CAH

CHECKED
CAH

REVISED
REVIS

DESIGNED
CAH

CHECKED
NEW

PHASE CONSTRUCTION FOR PARTIAL DECK SEALING

BRIDGE No.: WAR-123-0598
SR 123 OVER TODD FORK

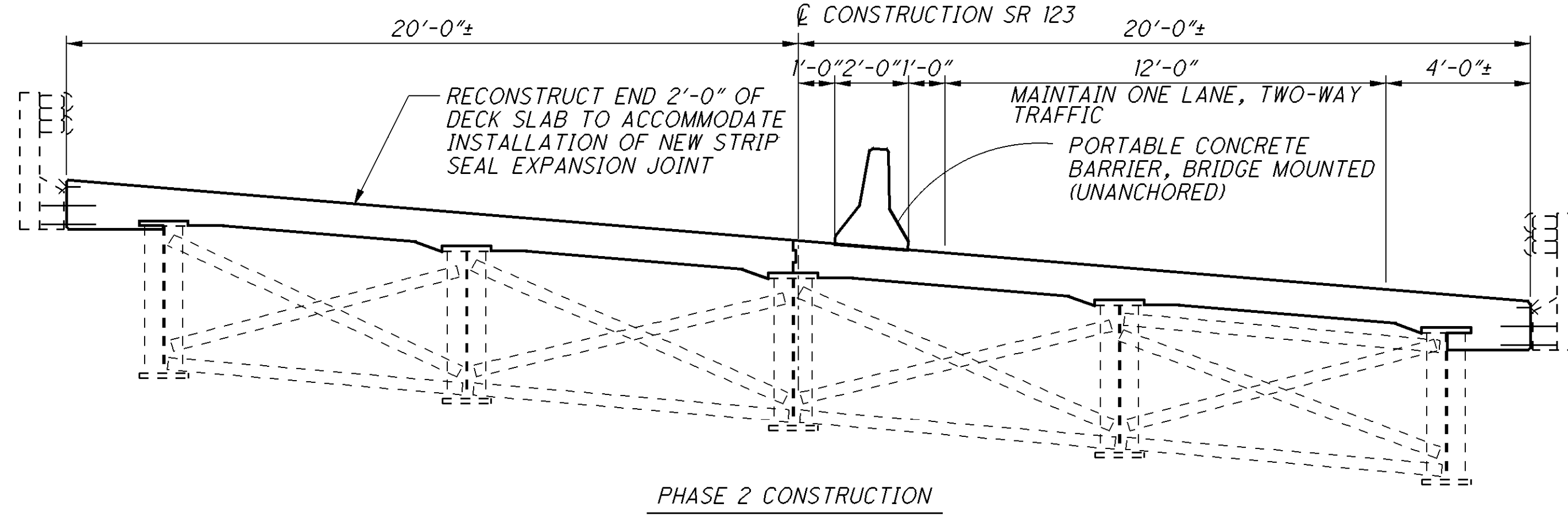
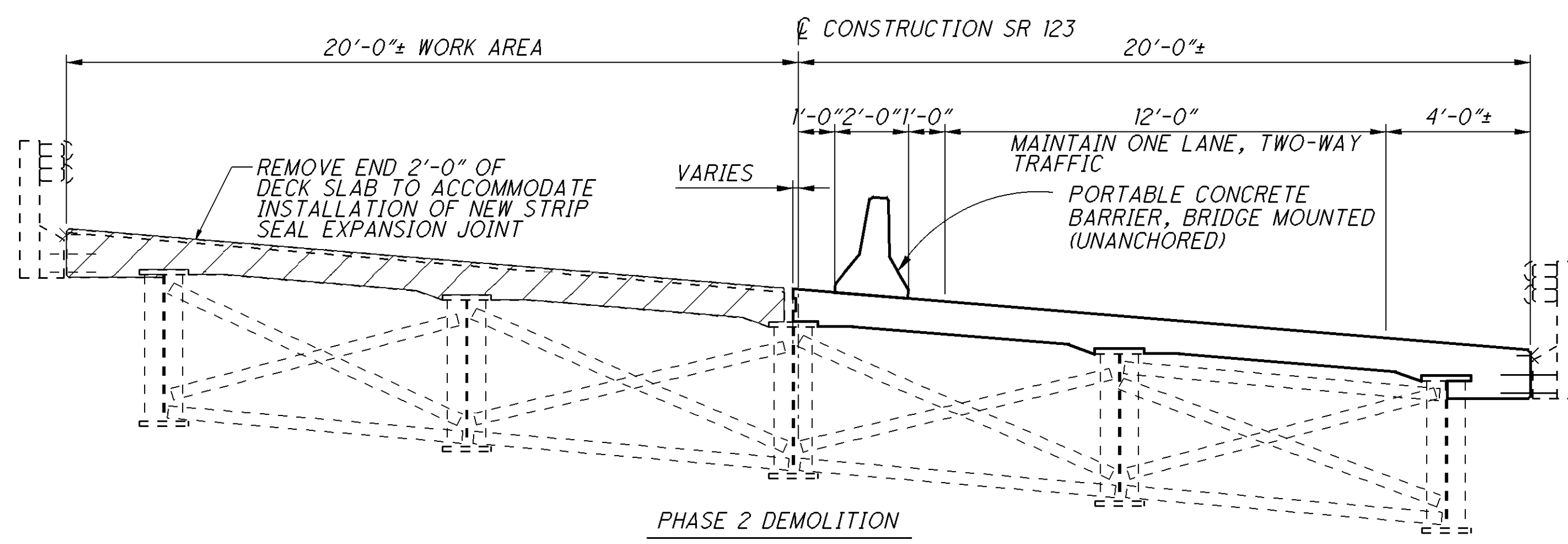
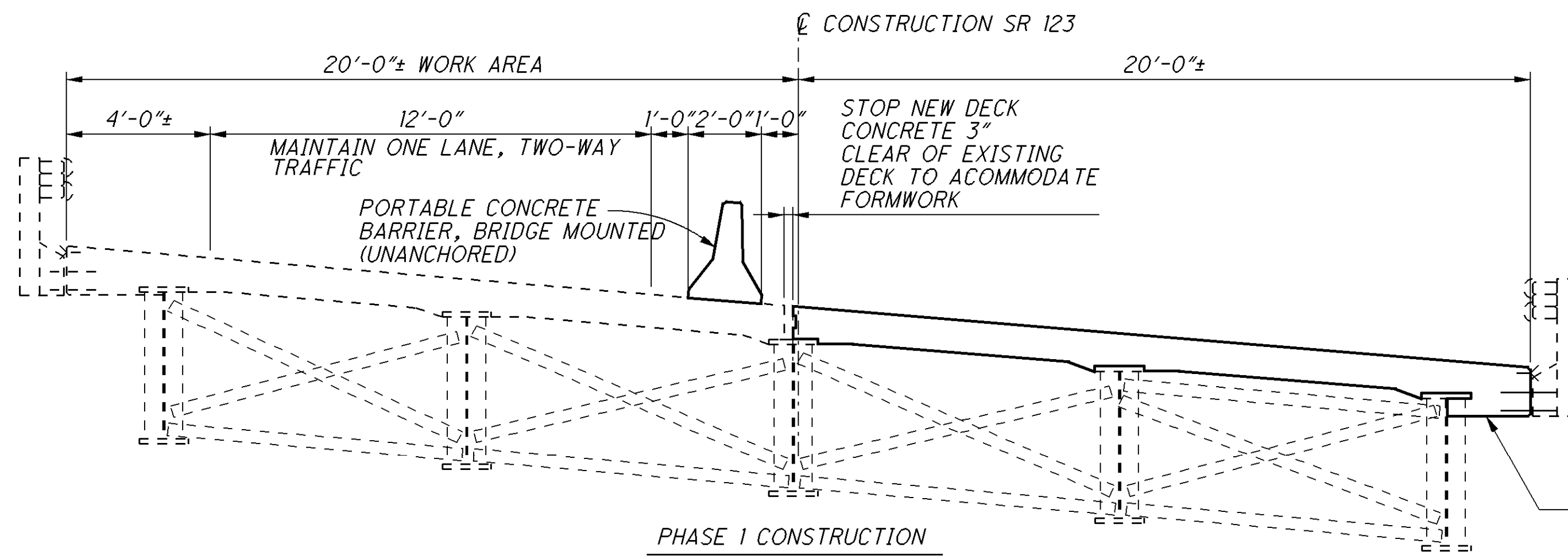
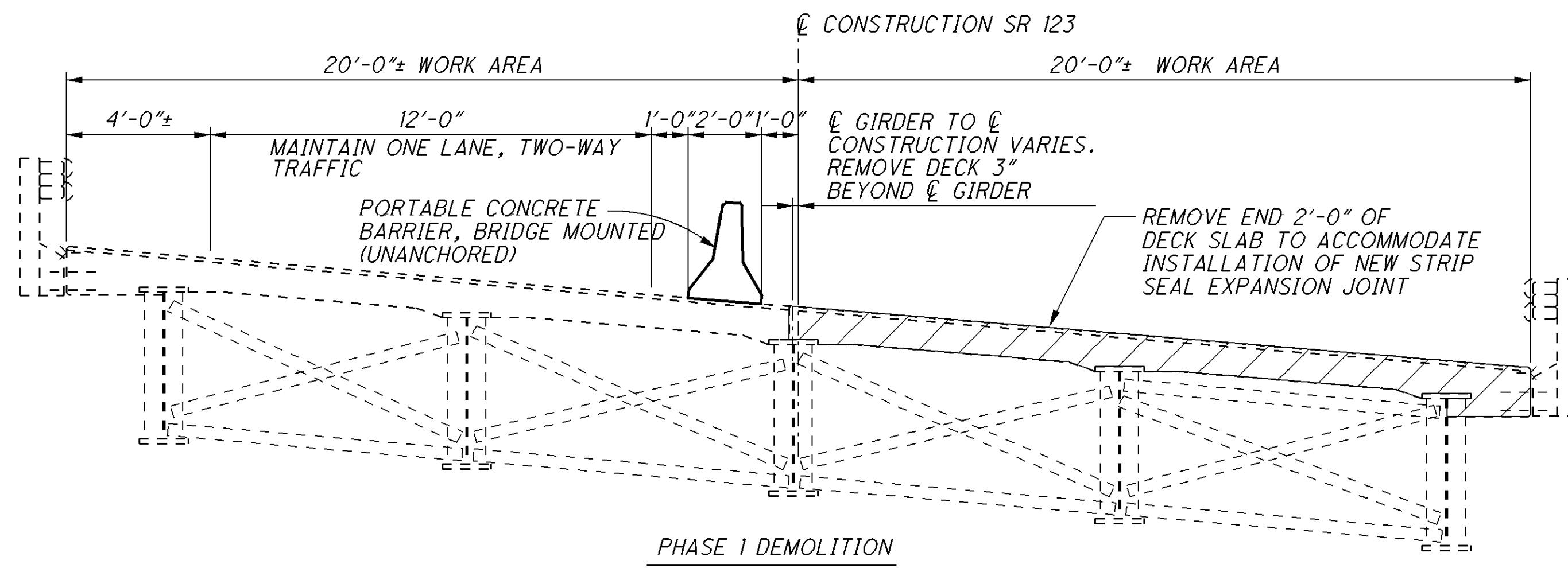
D08 - BM - FY2014

PID No. 84530

3 / 12

50
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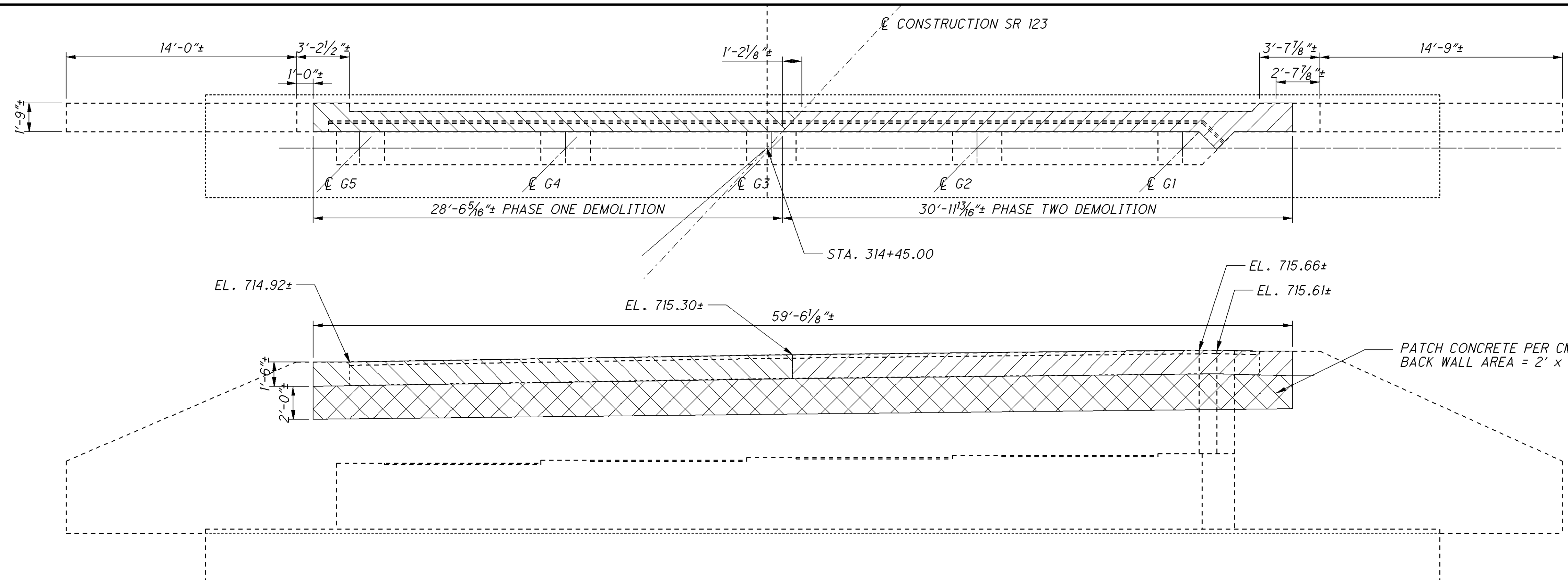
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NOTES:
1. PROVIDE KEYWAY IN PHASE ONE DECK SLAB

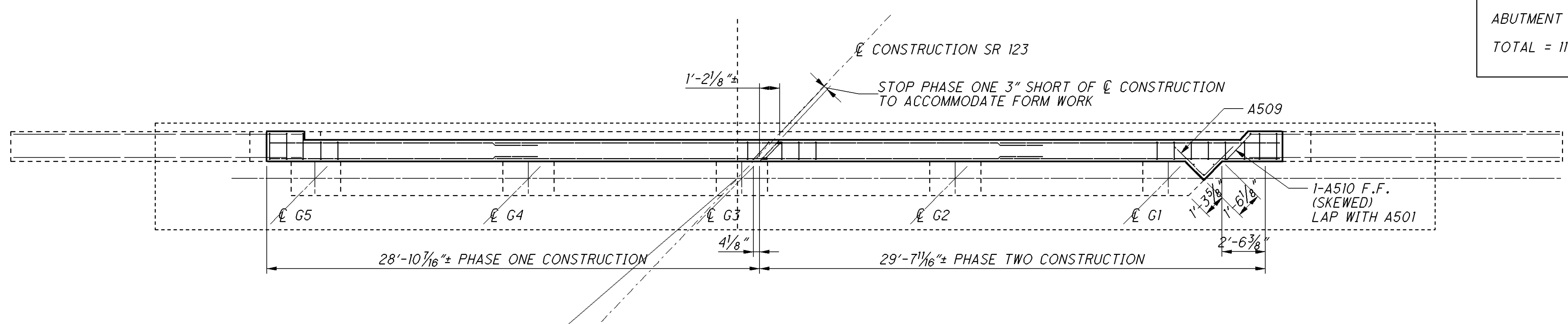
DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE	
REVIEWED SCS	DATE 1-24-14
DRAWN CAH	STRUCTURE FILE NUMBER 8304157
DESIGNED CAH	CHECKED NEW
PHASE CONSTRUCTION FOR PARTIAL DECK REPLACEMENT	
BRIDGE No.: WAR-123-0598	
SR 123 OVER TODD FORK	
D08 - BM - FY 2014	
PID No. 84530	
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51 / 60	

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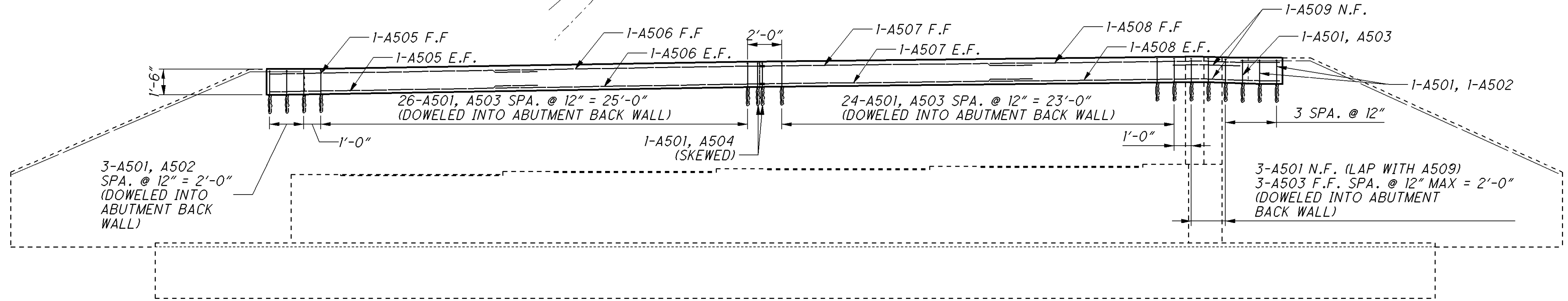
DEMOLITION

TOTAL AREA OF 519 PATCHING
 ABUTMENT BACK WALL AREA = 117 SQ FT
 TOTAL = 117 SQ FT



LEGEND

- PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE ONE
- PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE TWO
- CONCRETE PATCHING PER CMS 519



REHABILITATION

NOTES

1. SALVAGE AND CLEAN UP EXISTING HORIZONTAL WING WALL REBAR FOR RE-USE. LAP 18" MIN. WITH A505 & A508 REBARS.
2. SEE SHEET 7 OF 12 FOR ADDITIONAL NOTES.

DESIGN AGENCY
 STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE

DATE
 1-24-14
 REVIEWED
 SCS
 STRUCTURE FILE NUMBER
 8304157

DRAWN
 CAH
 CHECKED
 CAH
 REVISED
 NEW

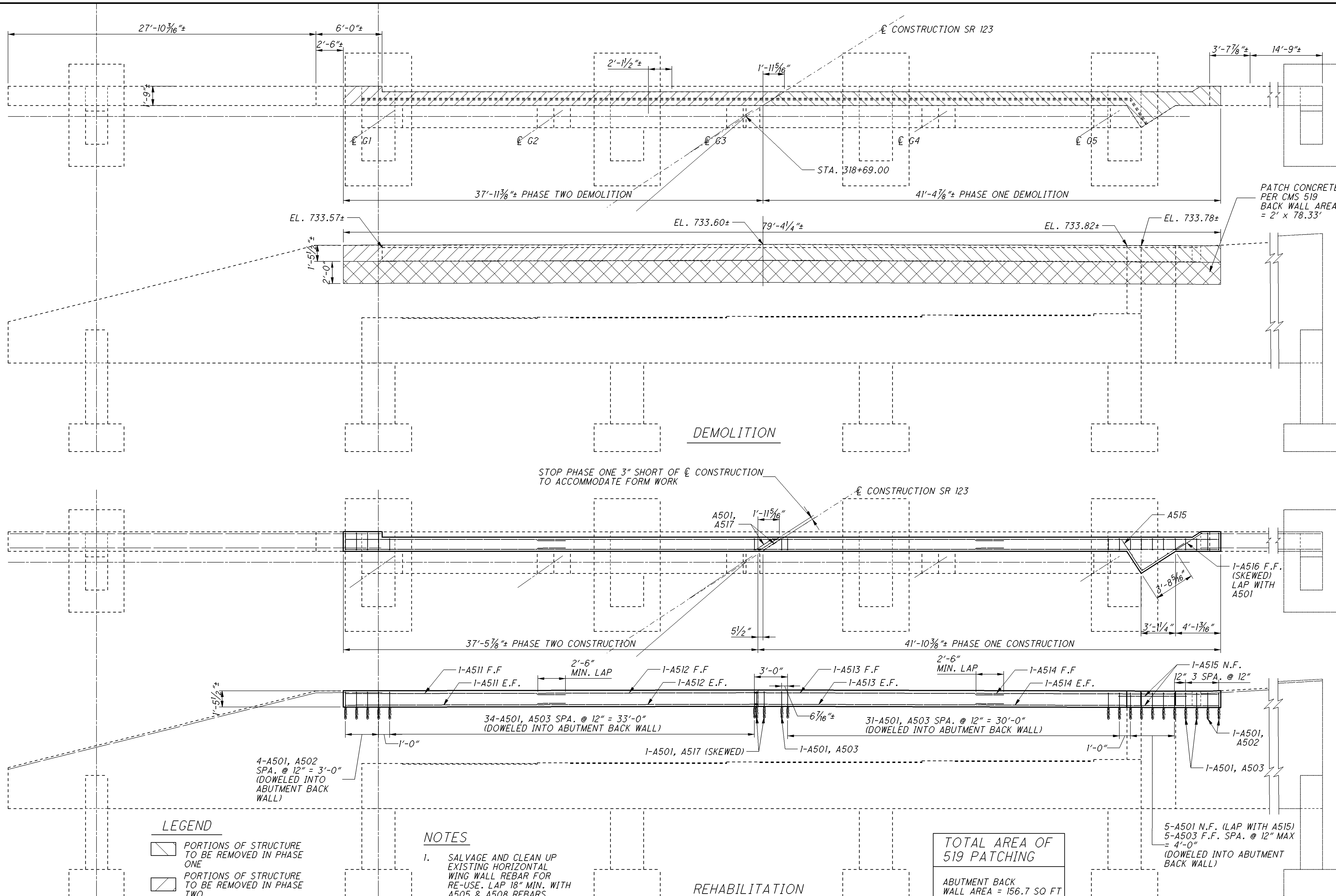
REAR ABUTMENT PLAN
 BRIDGE No.: WAR-123-0598
 SR 123 OVER TODD FORK

D08 - BM - FY2014
 PID No. 84530

5 / 12

52
 60

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LEGEND

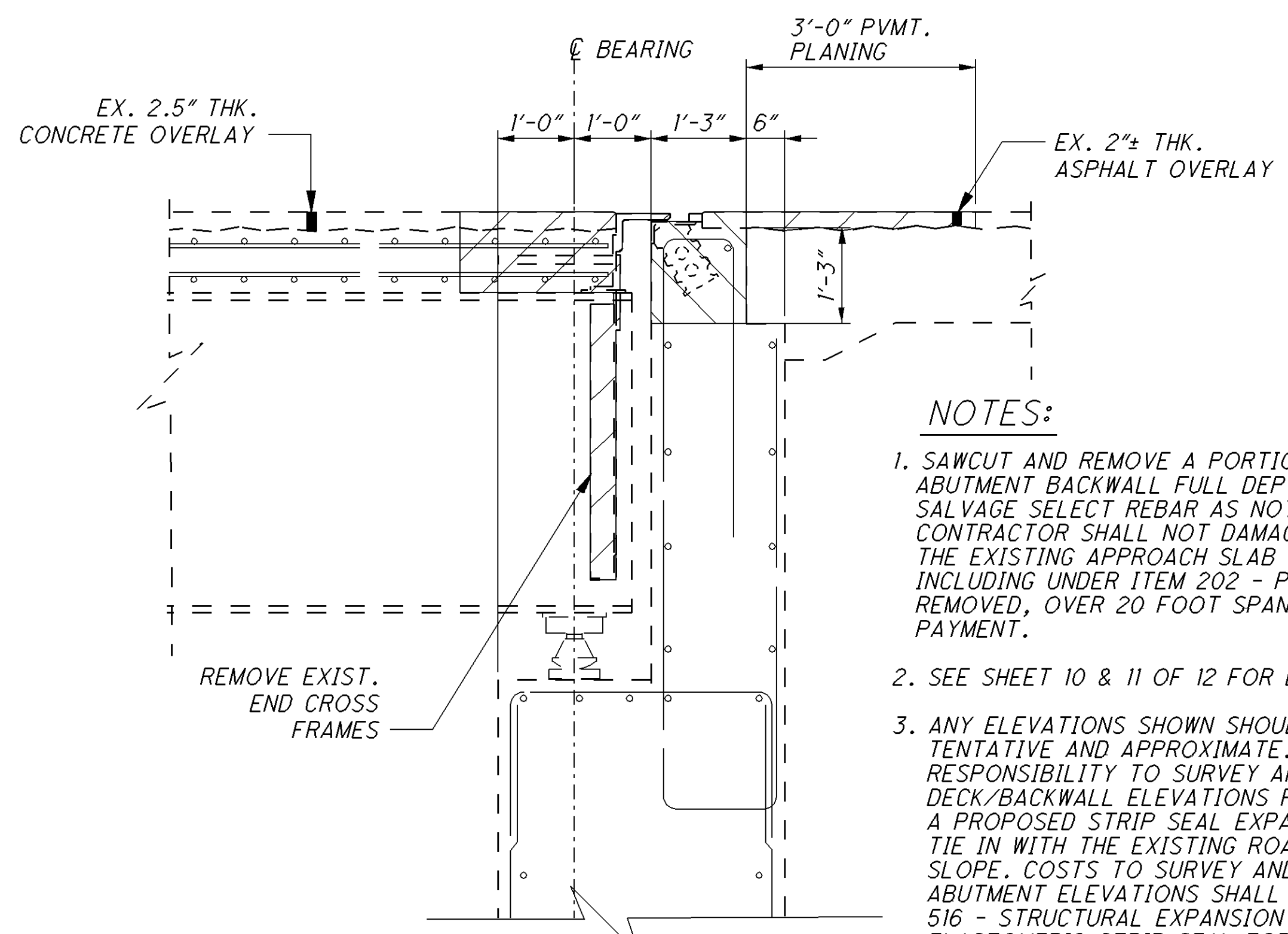
	PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE ONE
	PORTIONS OF STRUCTURE TO BE REMOVED IN PHASE TWO
	CONCRETE PATCHING PER CMS 519

- NOTES**
- SALVAGE AND CLEAN UP EXISTING HORIZONTAL WING WALL REBAR FOR RE-USE. LAP 18" MIN. WITH A505 & A508 REBARS.
 - SEE SHEET 7 OF 12 FOR ADDITIONAL NOTES.

TOTAL AREA OF 519 PATCHING
 ABUTMENT BACK WALL AREA = 156.7 SQ FT
 TOTAL = 156.7 SQ FT

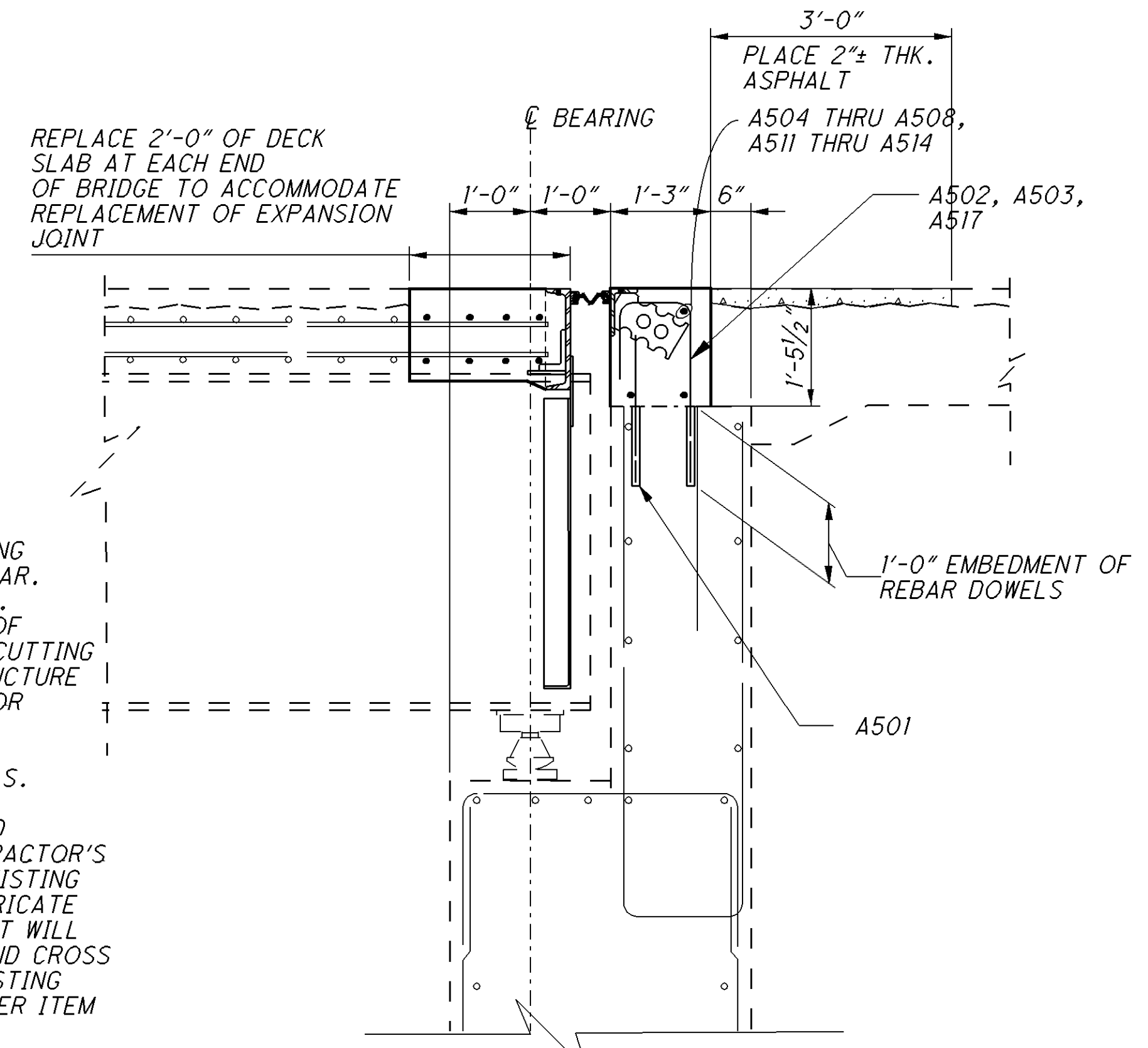
DESIGNED CAH	CHECKED NEW	DRAWN CAH	REVIEWED SCS	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE
				STRUCTURE FILE NUMBER 8304157	
FORWARD ABUTMENT PLAN					
BRIDGE No.: WAR-123-0598					
SR 123 OVER TODD FORK					
D08 - BM - FY2014					
PID No. 84530					
6 / 12					
53					
60					

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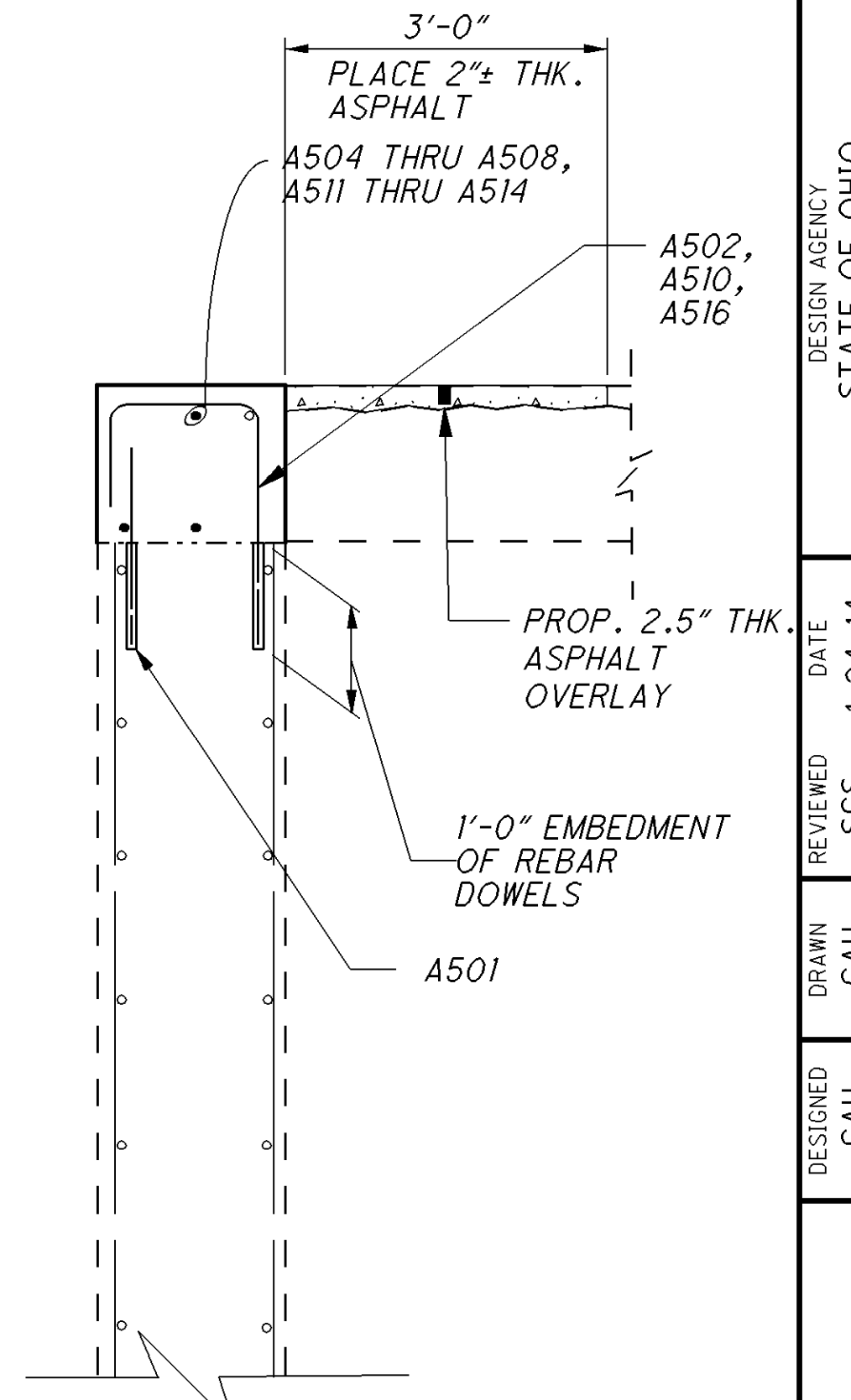


ABUTMENT DEMOLITION

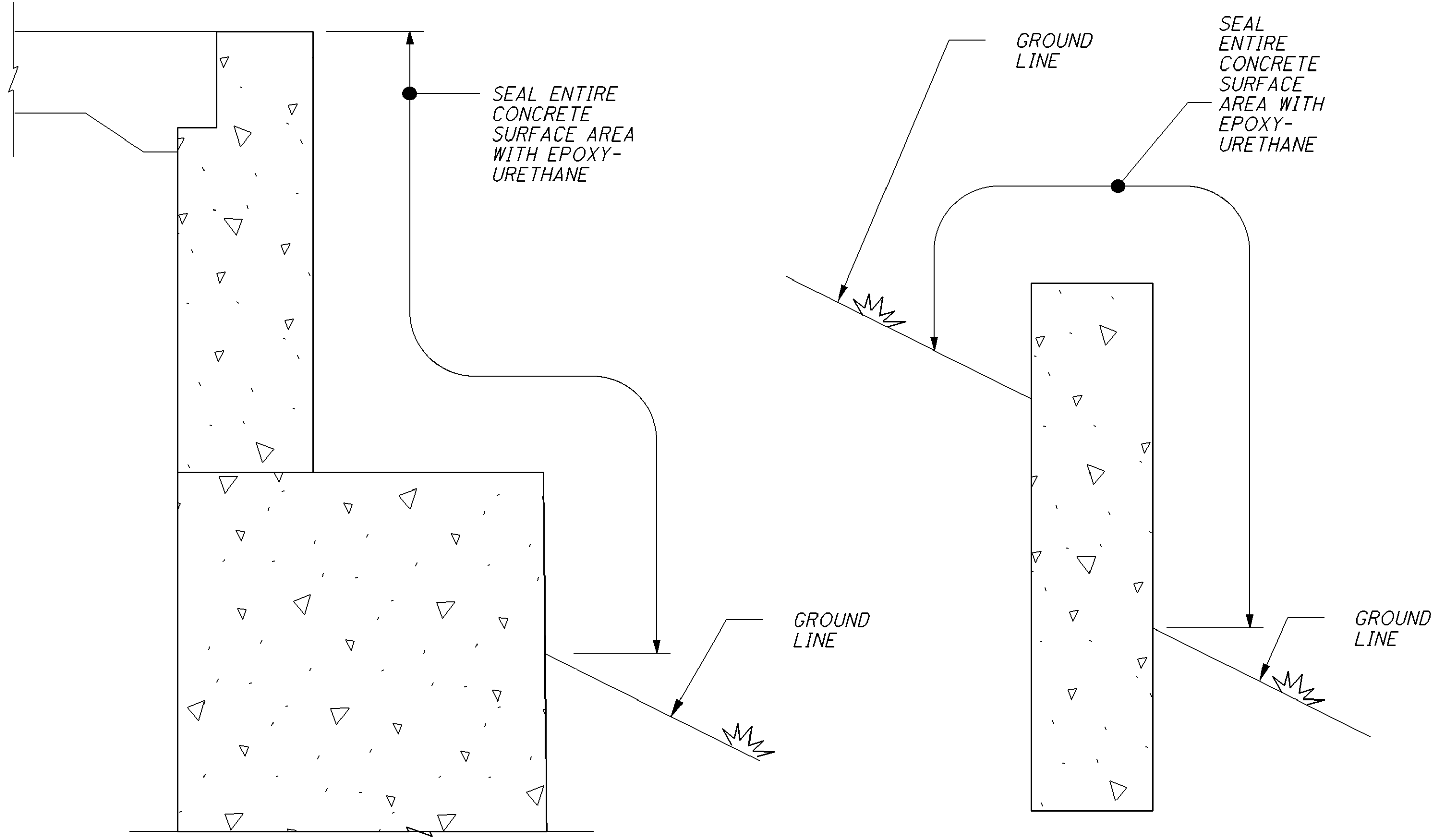
- NOTES:**
1. SAWCUT AND REMOVE A PORTION OF THE EXISTING ABUTMENT BACKWALL FULL DEPTH INCLUDING REBAR. SALVAGE SELECT REBAR AS NOTED IN THE PLANS. CONTRACTOR SHALL NOT DAMAGE THE PORTION OF THE EXISTING APPROACH SLAB TO REMAIN. SAW CUTTING INCLUDING UNDER ITEM 202 - PORTIONS OF STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN FOR PAYMENT.
 2. SEE SHEET 10 & 11 OF 12 FOR DECK SLAB DETAILS.
 3. ANY ELEVATIONS SHOWN SHOULD BE CONSIDERED TENTATIVE AND APPROXIMATE. IT IS THE CONTRACTOR'S RESPONSIBILITY TO SURVEY AND VERIFY THE EXISTING DECK/BACKWALL ELEVATIONS REQUIRED TO FABRICATE A PROPOSED STRIP SEAL EXPANSION JOINT THAT WILL TIE IN WITH THE EXISTING ROADWAY PROFILE AND CROSS SLOPE. COSTS TO SURVEY AND VERIFY THE EXISTING ABUTMENT ELEVATIONS SHALL BE INCLUDED UNDER ITEM 516 - STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL FOR PAYMENT.
 4. SEE SHEETS 5 & 6 OF 12 FOR ABUTMENT PLANS.
 5. POWER WASH ABUTMENTS PRIOR TO REFURBISHING BEARINGS.



ABUTMENT REHABILITATION



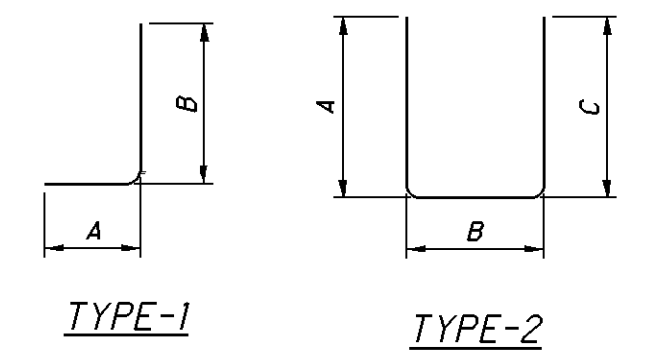
WINGWALL REHABILITATION



ABUTMENT SEALING DETAIL

WING WALL SEALING DETAIL

MARK	NUMBER			LENGTH	WEIGHT	TYPE	DIMENSIONS						
	REAR ABUTMENT	FORWARD ABUTMENT	TOTAL				A	B	C	D	E	R	INC
ABUTMENT REINFORCING STEEL LIST													
A501	62	82	144	2'-2"	325	STR							
A502	5	6	11	4'-8"	54	2	1'-2"	1'-5"	2'-4"				
A503	54	73	127	4'-2"	552	2	1'-2"	0'-11"	2'-4"				
A504	2		2	4'-7"	10	2	1'-2"	1'-4"	2'-4"				
A505	3		3	15'-9"	49	STR							
A506	3		3	16'-6"	52	STR							
A507	3		3	16'-7"	52	STR							
A508	3		3	17'-0"	53	STR							
A509	2		2	4'-8"	10	1	2'-5"	2'-5"					
A510	1		1	5'-3"	5	2	1'-2"	2'-0"	2'-4"				
A511		3	3	19'-11"	62	STR							
A512		3	3	21'-7"	68	STR							
A513		3	3	22'-2"	69	STR							
A514		3	3	22'-0"	69	STR							
A515		2	2	7'-7"	16	1	3'-3"	4'-6"					
A516		1	1	6'-0"	6	2	1'-2"	2'-8 3/4"	2'-4"				
A517		2	2	5'-1"	11	2	1'-2"	1'-10"	2'-4"				
SUB-TOTAL					1,463								



LEGEND
 PORTIONS OF CONCRETE REMOVED

DESIGN AGENCY: STATE OF OHIO
 DEPT. OF TRANSPORTATION
 DISTRICT 8 - BRIDGE OFFICE

DATE: 1-24-14
 REVIEWED: SCS
 STRUCTURE FILE NUMBER: 8304157

DRAWN: CAH
 CHECKED: CAH
 REVISIONS: NEW

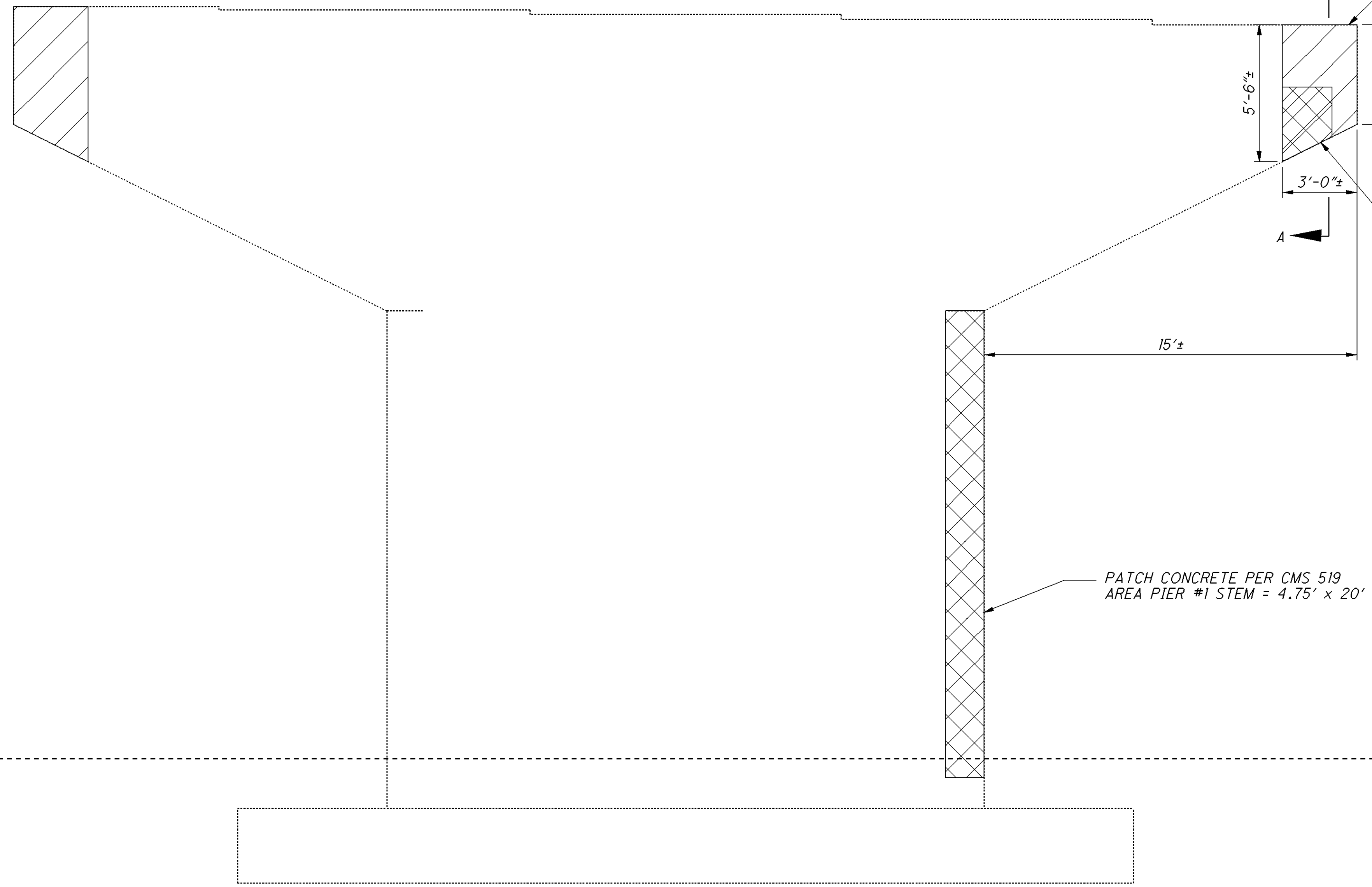
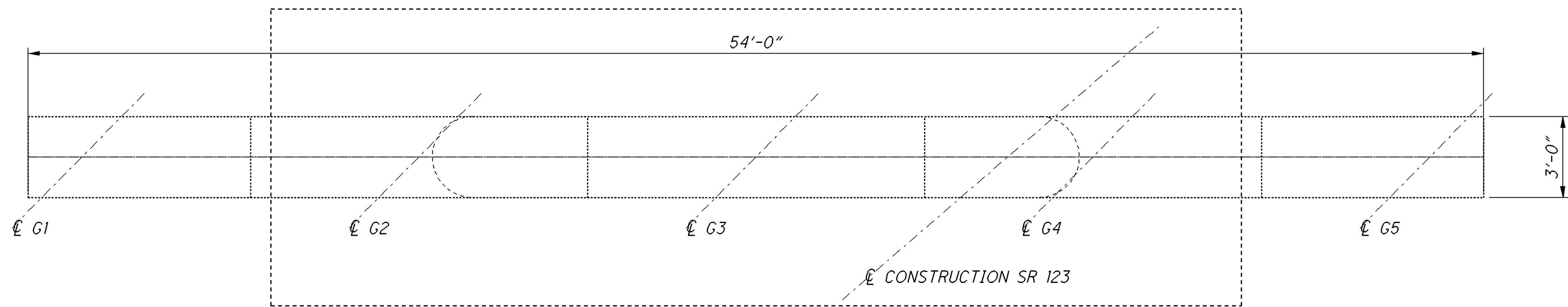
DESIGNED: CAH
 CHECKED: CAH
 REVISIONS: NEW

ABUTMENT DETAILS
 BRIDGE No.: WAR-123-0598
 SR 123 OVER TODD FORK

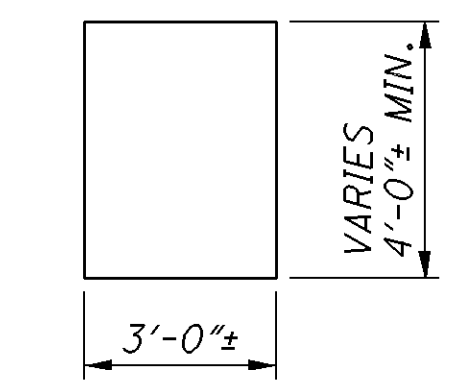
D08-BM-FY2014
 PID No. 84530

7 / 12
 54
 60

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SEAL SIDES, ENDS AND BOTTOM OF PIER PIER CAPS TO THE LIMITS SHOWN WITH EPOXY-URETHANE. SEAL TOP OF PIER CAP AROUND BEARING



PATCH CONCRETE PER CMS 519
 AREA SIDE OF PIER #1 CAP = 2' x 2'
 AREA BOTTOM OF PIER #1 CAP = 1' x 2'

TOTAL AREA OF 519 PATCHING	
AREA PIER #1 STEM = 95 SQ FT	
AREA SIDE OF PIER #1 CAP = 4 SQ FT	
AREA BOTTOM OF PIER #1 CAP = 2 SQ FT	
TOTAL = 101 SQ FT	

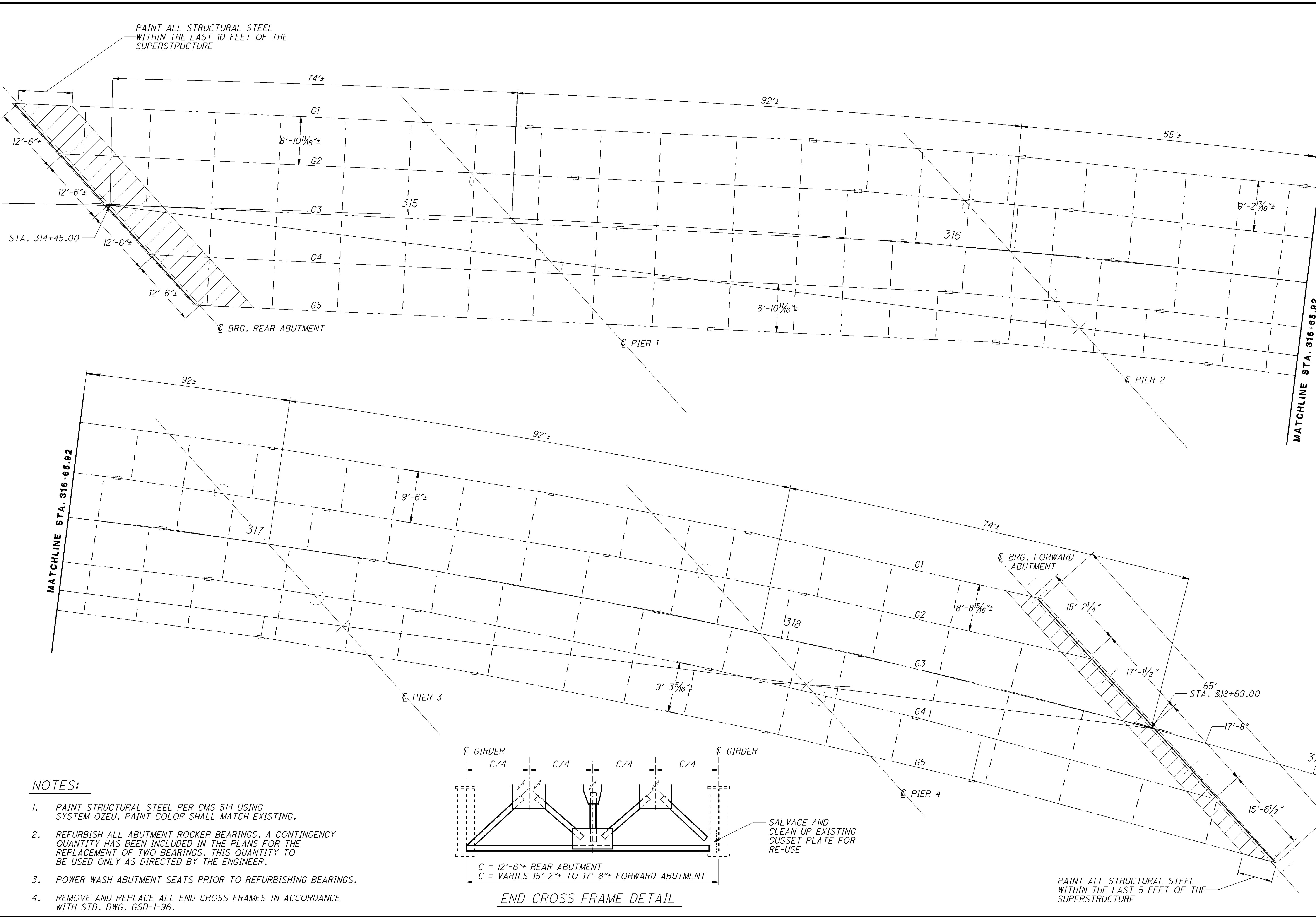
LEGEND

- PATCH CONCRETE PER CMS 519
- SEAL CONCRETE USING EPOXY-URETHANE SEALER

TYPICAL PIER SEALING DETAIL

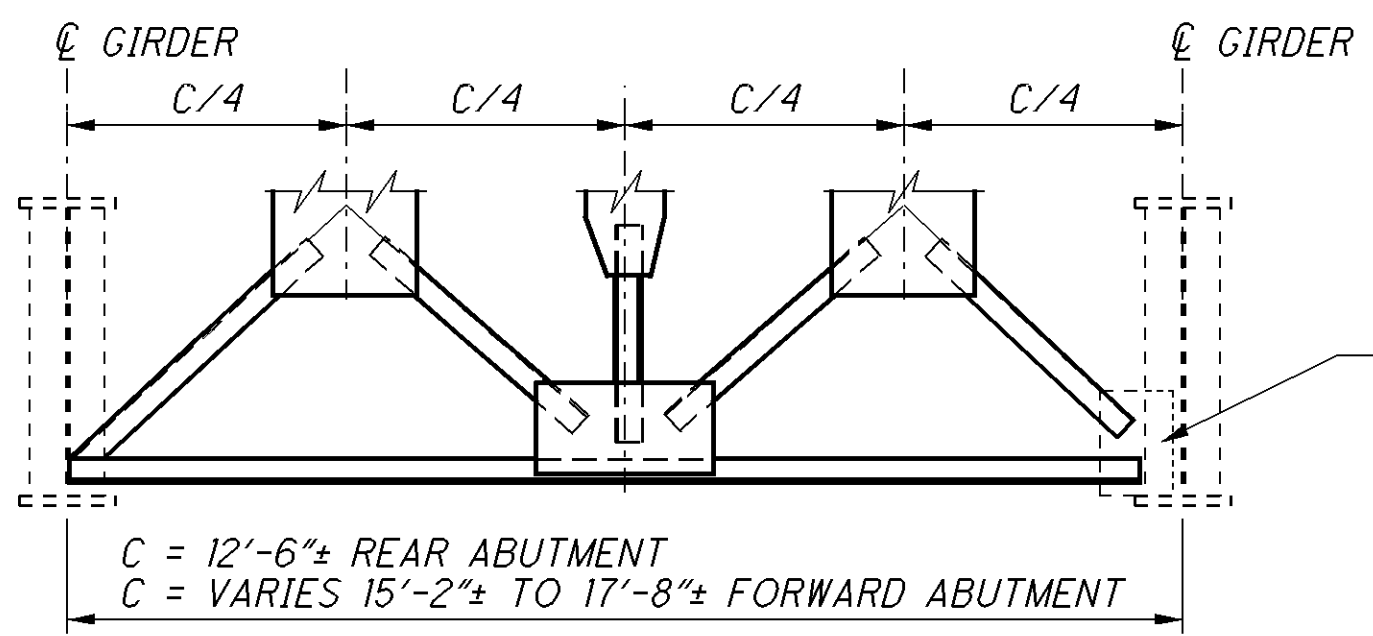
D08 - BM - FY2014 PID No. 84530	PIER PLAN BRIDGE No.: WAR-123-0598 SR 123 OVER TODD FORK	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE	REVIEWED SCS STRUCTURE FILE NUMBER 8304157
8 / 12	55 60	DATE 1-24-14	DRAWN CAH REVISER
DESIGNED CAH	CHECKED NEW		

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NOTES:

1. PAINT STRUCTURAL STEEL PER CMS 514 USING SYSTEM OZEU. PAINT COLOR SHALL MATCH EXISTING.
2. REFURBISH ALL ABUTMENT ROCKER BEARINGS. A CONTINGENCY QUANTITY HAS BEEN INCLUDED IN THE PLANS FOR THE REPLACEMENT OF TWO BEARINGS. THIS QUANTITY TO BE USED ONLY AS DIRECTED BY THE ENGINEER.
3. POWER WASH ABUTMENT SEATS PRIOR TO REFURBISHING BEARINGS.
4. REMOVE AND REPLACE ALL END CROSS FRAMES IN ACCORDANCE WITH STD. DWG. GSD-1-96.



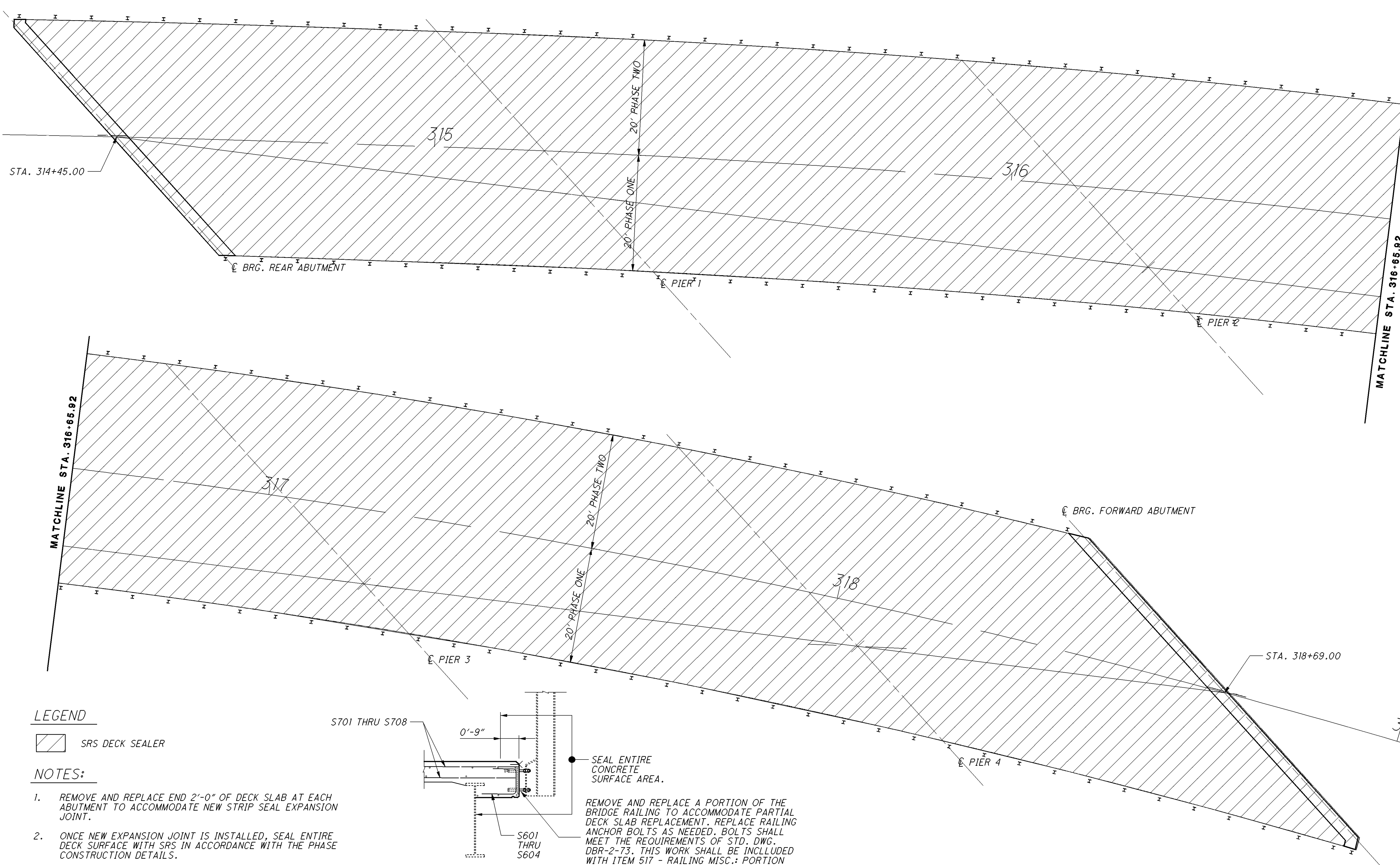
END CROSS FRAME DETAIL

SALVAGE AND CLEAN UP EXISTING GUSSET PLATE FOR RE-USE

PAINT ALL STRUCTURAL STEEL WITHIN THE LAST 5 FEET OF THE SUPERSTRUCTURE

DESIGNED	CAH	CHECKED	NEW
DRAWN	CAH	REVISED	
REVIEWED		STRUCTURE FILE NUMBER	8304157
DATE	1-24-14		
DESIGN AGENCY	STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE		
FRAMING PLAN			
BRIDGE No.: WAR-123-0598			
SR 123 OVER TODD FORK			
D08-BM-FY2014			
PID No. 84530			
9 / 12			
56			
60			

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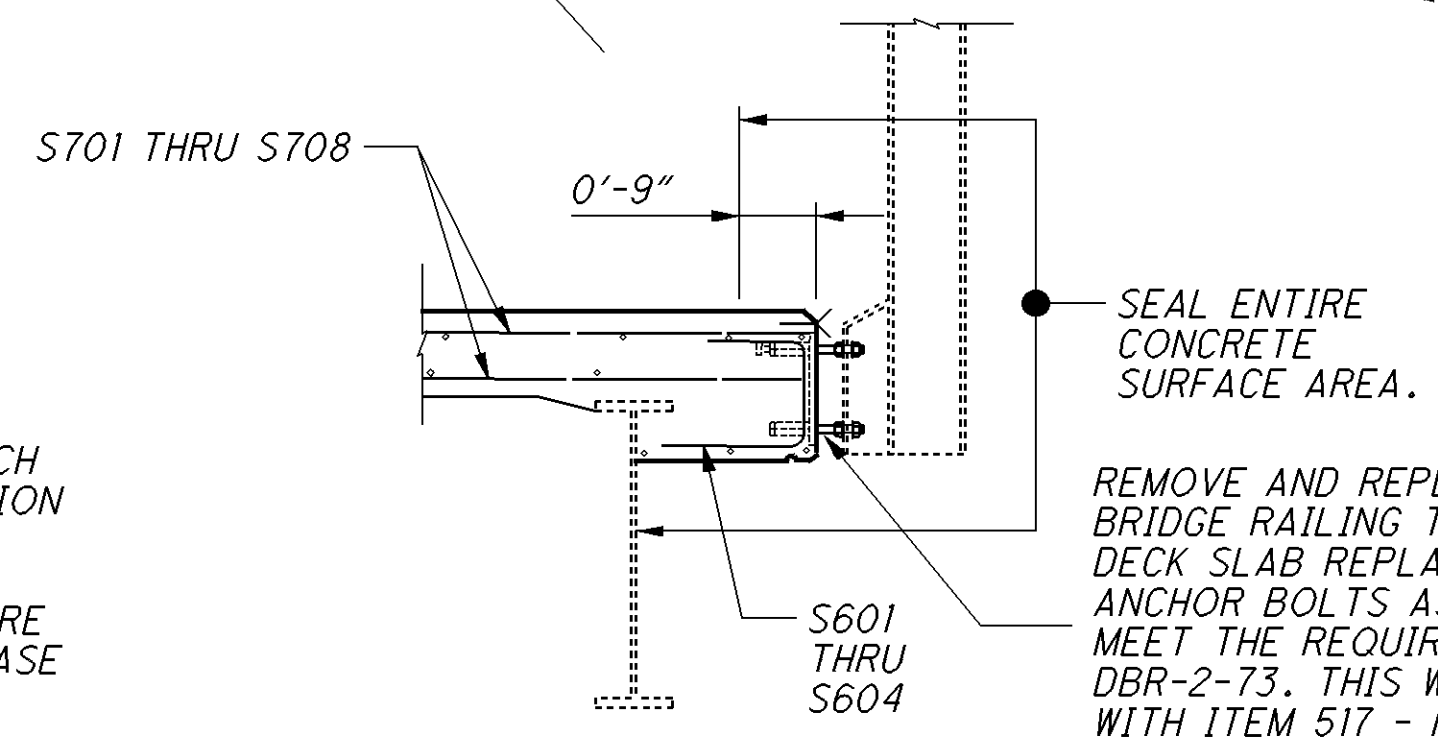


LEGEND

SRS DECK SEALER

NOTES:

1. REMOVE AND REPLACE END 2'-0" OF DECK SLAB AT EACH ABUTMENT TO ACCOMMODATE NEW STRIP SEAL EXPANSION JOINT.
2. ONCE NEW EXPANSION JOINT IS INSTALLED, SEAL ENTIRE DECK SURFACE WITH SRS IN ACCORDANCE WITH THE PHASE CONSTRUCTION DETAILS.
3. SEAL DECK EDGES WITH EPOXY-URETHANE.

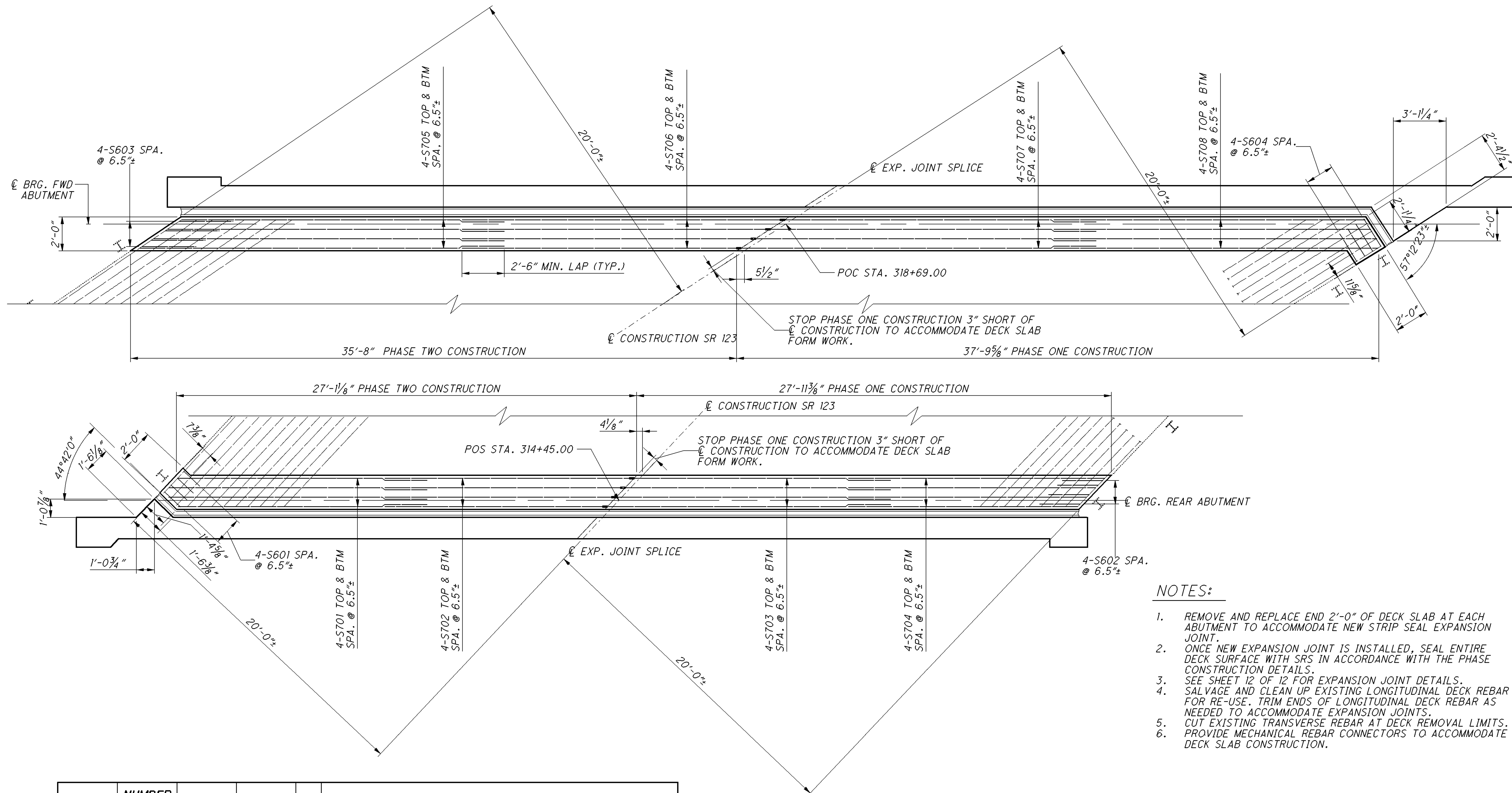


REMOVE AND REPLACE A PORTION OF THE BRIDGE RAILING TO ACCOMMODATE PARTIAL DECK SLAB REPLACEMENT. REPLACE RAILING ANCHOR BOLTS AS NEEDED. BOLTS SHALL MEET THE REQUIREMENTS OF STD. DWG. DBR-2-73. THIS WORK SHALL BE INCLUDED WITH ITEM 517 - RAILING MISC.; PORTION OF BRIDGE RAILING REMOVED AND REBUILT FOR PAYMENT.

DECK EDGE SEALING

DECK PLAN		BRIDGE No.: WAR-123-0598 SR 123 OVER TODD FORK	DESIGN AGENCY STATE OF OHIO DEPT. OF TRANSPORTATION DISTRICT 8 - BRIDGE OFFICE
DESIGNED CAH	CHECKED CAH	DRAWN CAH	REVIEWED CAH
DATE 1-24-14	STRUCTURE FILE NUMBER 8304157		
D08 - BM - FY2014		PID No. 84530	
10 / 12		57 / 60	

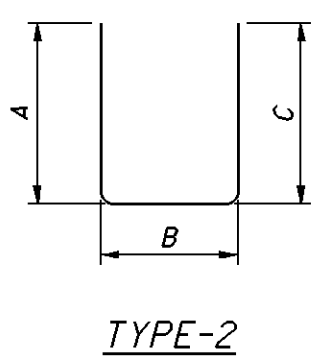
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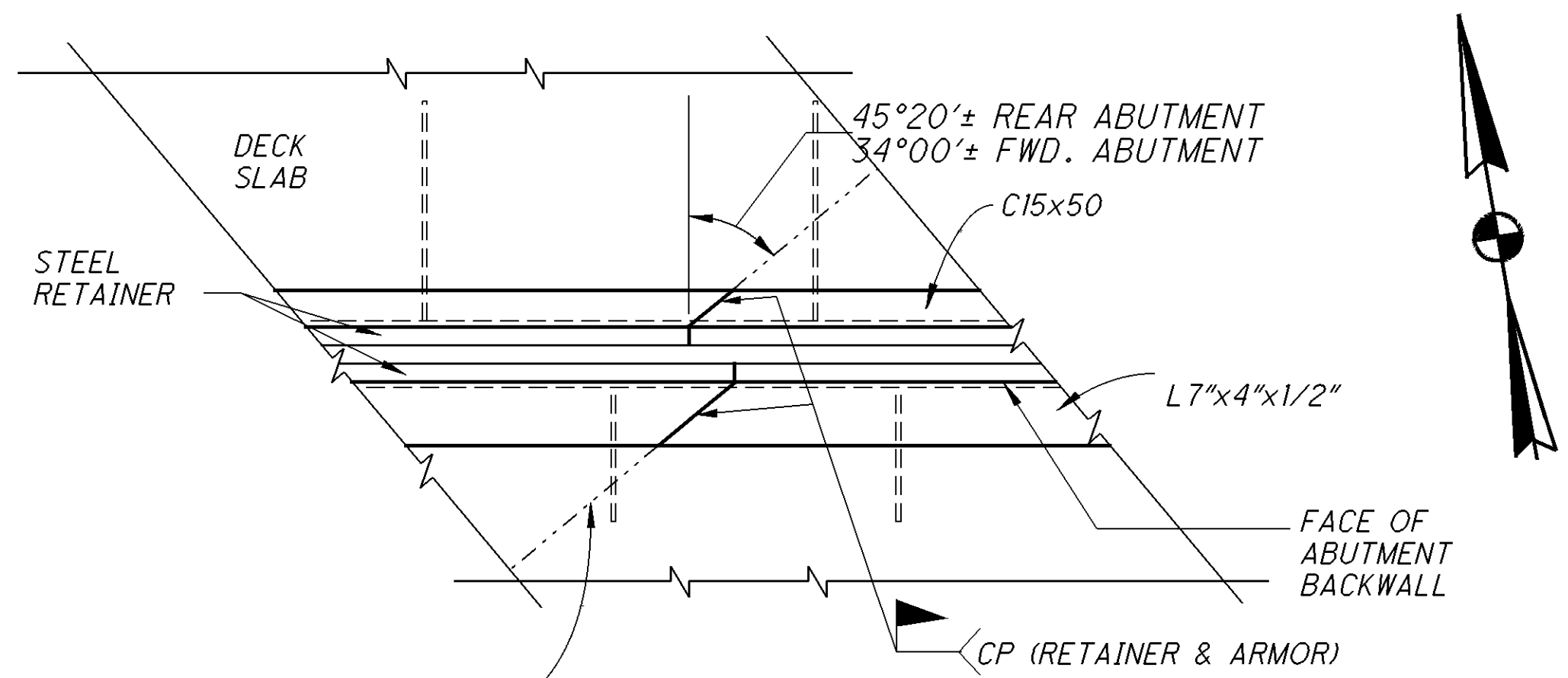


- NOTES:**
- REMOVE AND REPLACE END 2'-0" OF DECK SLAB AT EACH ABUTMENT TO ACCOMMODATE NEW STRIP SEAL EXPANSION JOINT.
 - ONCE NEW EXPANSION JOINT IS INSTALLED, SEAL ENTIRE DECK SURFACE WITH SRS IN ACCORDANCE WITH THE PHASE CONSTRUCTION DETAILS.
 - SEE SHEET 12 OF 12 FOR EXPANSION JOINT DETAILS.
 - SALVAGE AND CLEAN UP EXISTING LONGITUDINAL DECK REBAR FOR RE-USE. TRIM ENDS OF LONGITUDINAL DECK REBAR AS NEEDED TO ACCOMMODATE EXPANSION JOINTS.
 - CUT EXISTING TRANSVERSE REBAR AT DECK REMOVAL LIMITS.
 - PROVIDE MECHANICAL REBAR CONNECTORS TO ACCOMMODATE DECK SLAB CONSTRUCTION.

MARK	NUMBER TOTAL	LENGTH	WEIGHT	TYPE	DIMENSIONS						
					A	B	C	D	E	R	INC
SUPERSTRUCTURE REINFORCING STEEL LIST											
S701	8	15'-3"	249	STR							
S702	8	14'-9"	241	STR							
S703	8	16'-9"	274	STR							
S704	8	15'-2"	248	STR							
S705	8	21'-7"	353	STR							
S706	8	19'-0"	311	STR							
S707	8	21'-0"	343	STR							
S708	8	19'-2"	313	STR							
SUB-TOTAL			2,332								

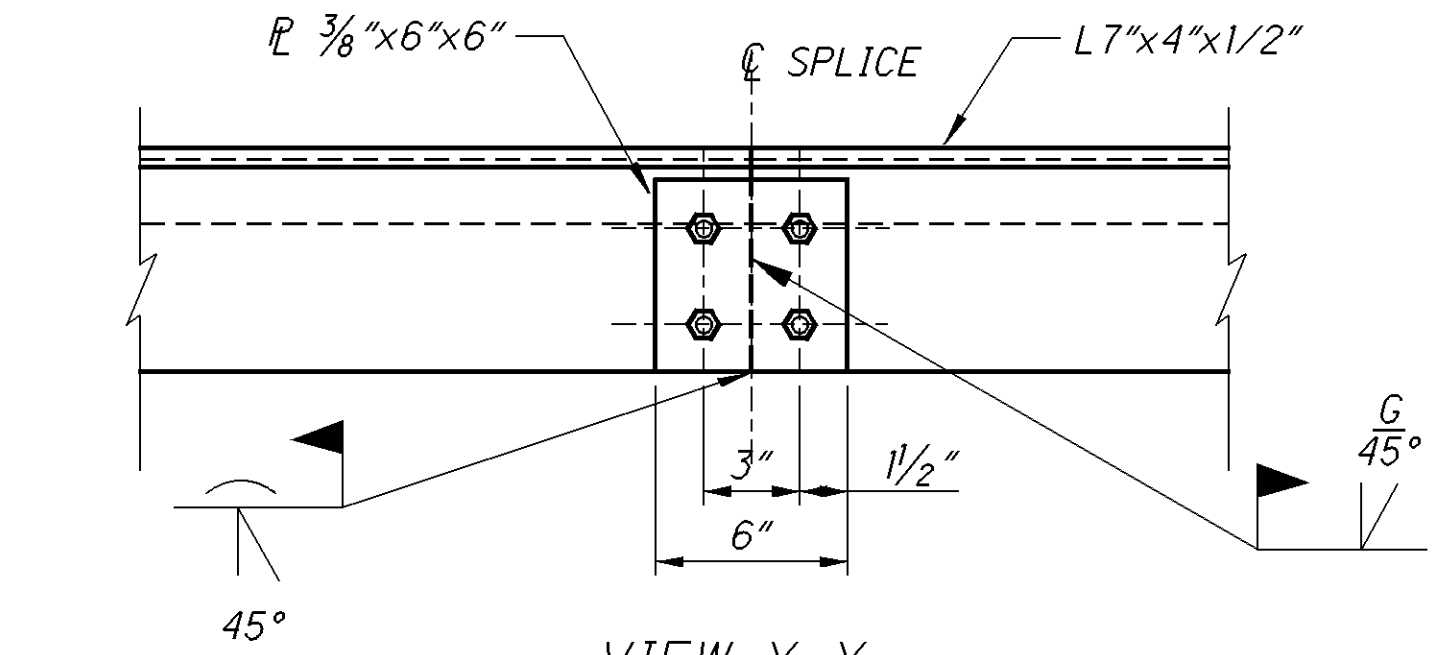
MARK	NUMBER TOTAL	LENGTH	WEIGHT	TYPE	DIMENSIONS						
					A	B	C	D	E	R	INC
SUPERSTRUCTURE REINFORCING STEEL LIST											
S601	4	3'-0"	18	2	1'-0"	1'-0"	1'-4"				
S602	4	4'-0"	24	2	1'-0"	1'-0"	2'-4"				
S603	4	4'-10"	29	2	1'-0"	1'-0"	3'-2"				
S604	4	3'-7"	22	2	1'-0"	1'-0"	1'-11"				
TOTAL			2,425								



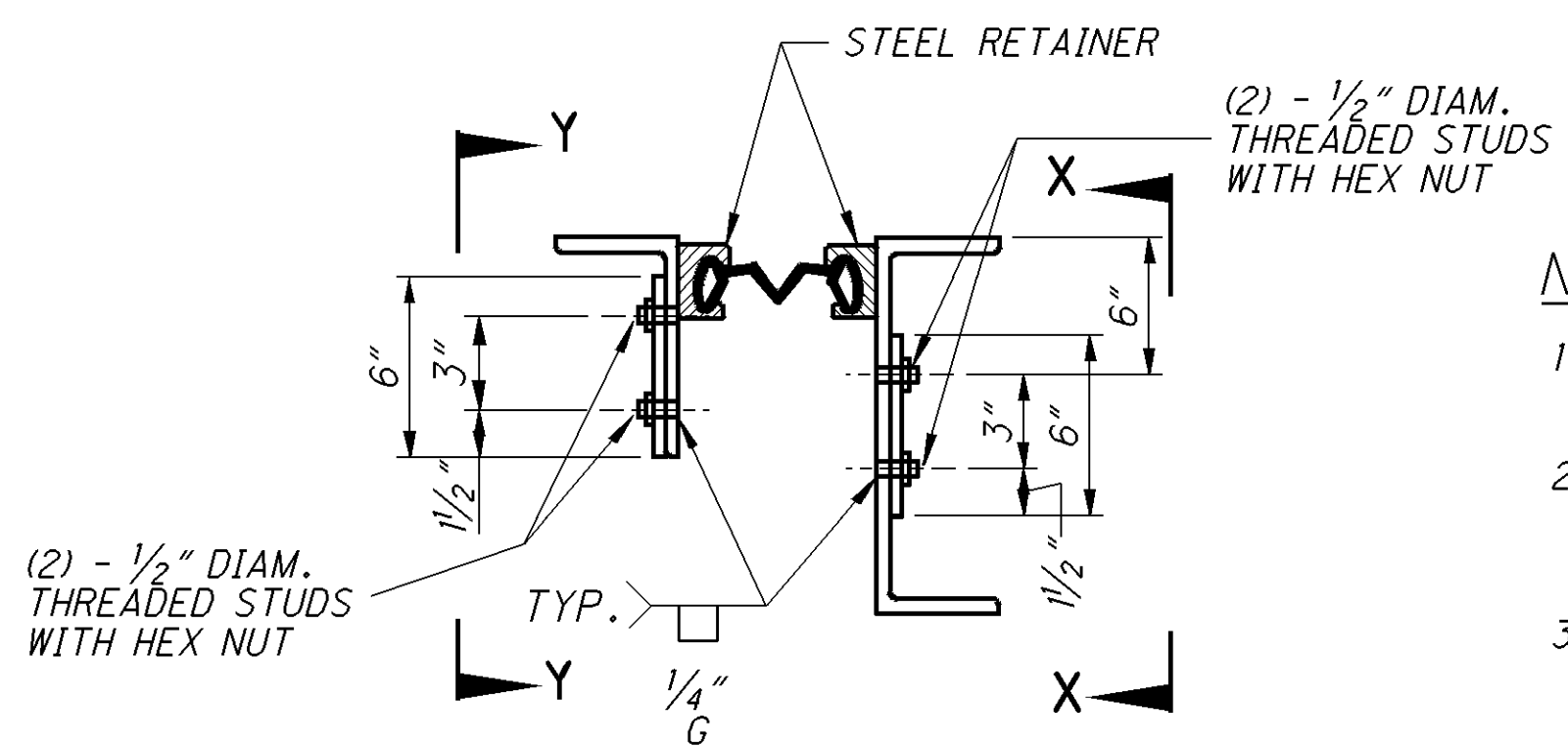


END DAM SPLICE DETAIL

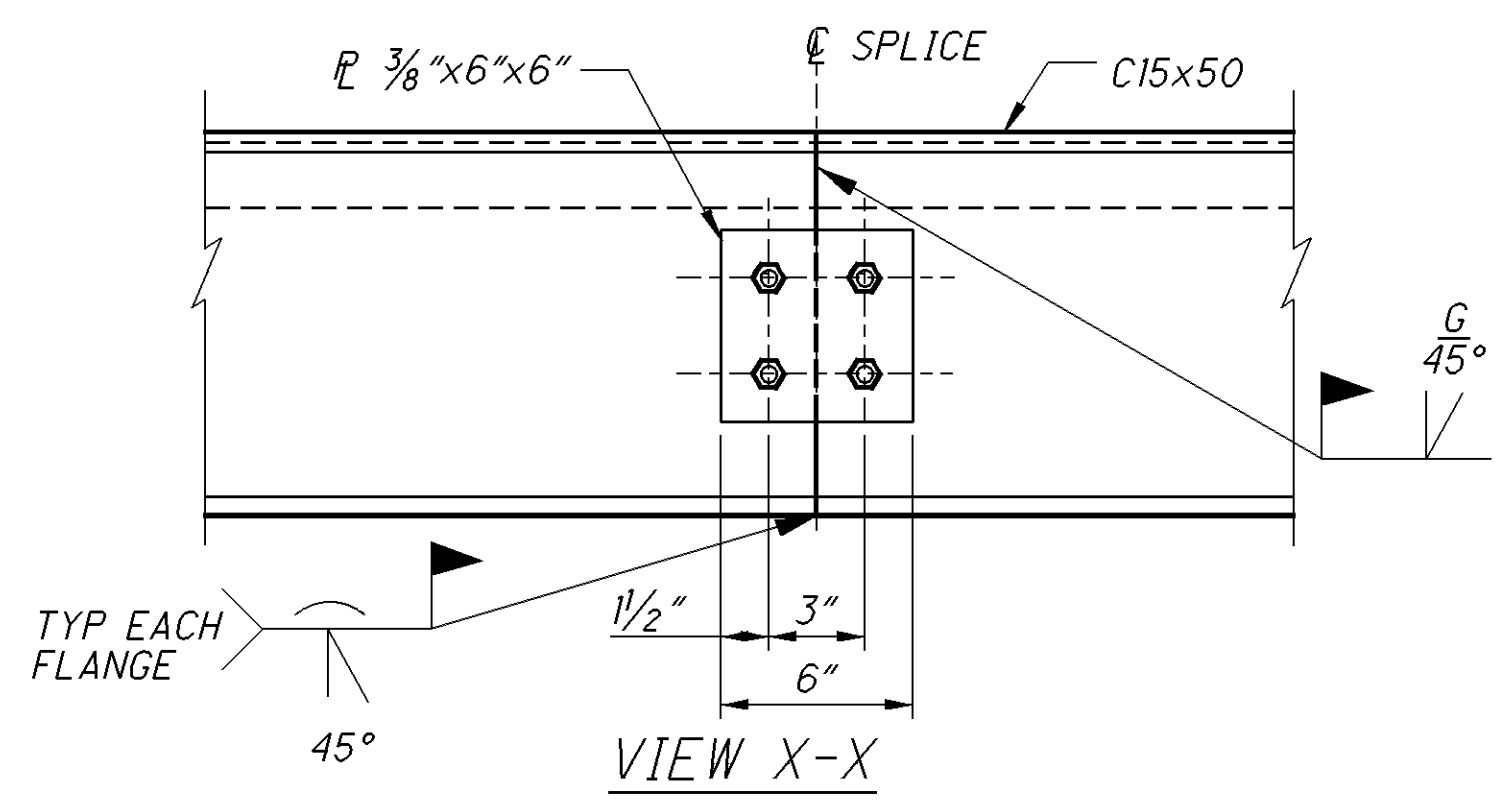
REAR ABUTMENT SHOWN
FORWARD ABUTMENT SIMILAR



VIEW Y-Y
ABUTMENT SIDE SUPPORT
ARMOR SPLICE DETAIL



**STRIP SEAL EXPANSION JOINT
SPLICE DETAIL**



VIEW X-X
DECK SLAB SUPPORT
ARMOR SPLICE DETAIL

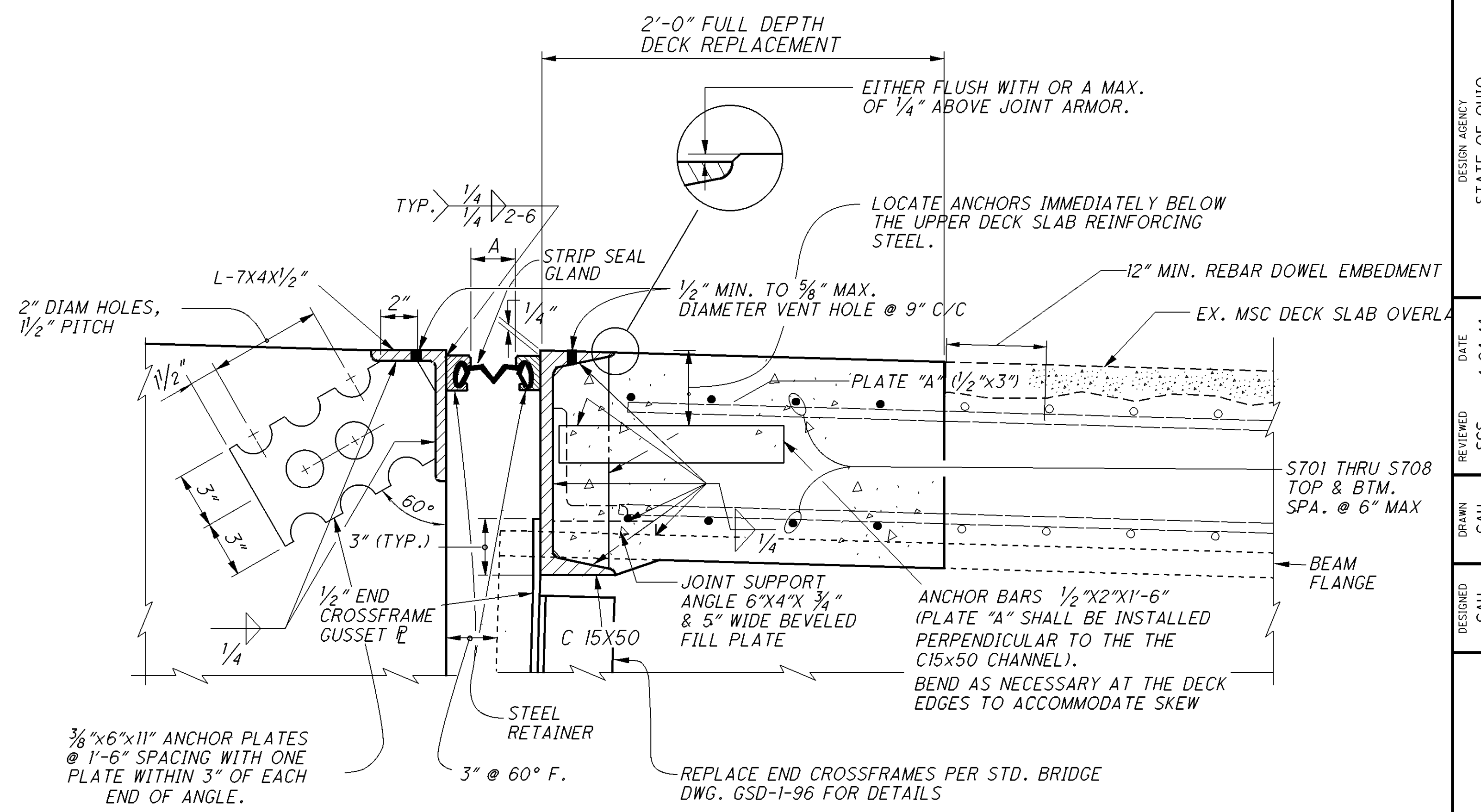
DIMENSION "A"		
	REAR ABUTMENT 4" GLAND	FORWARD ABUTMENT 5" GLAND
30°	2 7/16"	3 1/16"
40°	2 5/16"	2 7/8"
50°	2 3/16"	2 5/8"
60°	2 1/16"	2 1/16"
70°	1 15/16"	2 1/4"
80°	1 13/16"	2"
90°	1 1/16"	1 13/16"

MINIMUM JOINT OPENING (DIMENSION 'A') AT THE TIME OF SEAL GLAND INSTALLATION SHALL NOT BE LESS THAN 2". IF THE JOINT OPENING IS LESS, INSTALLATION SHALL BE POSTPONED UNTIL THE TEMPERATURE DROPS A SUFFICIENT AMOUNT TO ALLOW THE 2" OPENING.

NOTES:

- SEE STD. DWG. EXJ-4-87 FOR ADDITIONAL INFORMATION.
- STRIP SEAL GLAND SHALL BE INSTALLED IN ONE CONTINUOUS PIECE AFTER COMPLETION OF THE END DAM INSTALLATION.
- PORTIONS OF THE STRIP SEAL EXPANSION JOINT ASSEMBLY THAT ARE ANGLED TO MEET THE TRANSVERSE DECK CROSS SLOPE SHALL BE CONNECTED AT THE PHASE CONSTRUCTION JOINT USING COMPLETE PENETRATION FIELD WELDS AND SPLICE PLATES. WELDS SHALL BE GROUND SMOOTH. WELDS AND SPLICE PLATES SHALL BE INCLUDED WITH THE EXPANSION JOINT FOR PAYMENT.
- INSTALLATION OF SEAL: DURING INSTALLATION OF THE SUPPORT/ARMOR FOR THE SUPERSTRUCTURE SIDE OF THE EXPANSION JOINT SEAL, OBSERVE THE SEATING OF BEAMS ON BEARINGS TO ASSURE THAT POSITIVE BEARING IS MAINTAINED.

PROPER ELEVATION OF THE SUPPORT/ARMOR ON THE BEAMS SHALL BE ACHIEVED BY POSITIONING OF THE BEVEL FILL PLATES RATHER THAN BY CLAMPING FORCE.
- ALL COSTS ASSOCIATED WITH THE ELASTOMERIC STRIP SEAL EXPANSION JOINT, ANCHOR PLATES, AND ANY REMAINING INCIDENTALS REQUIRED TO COMPLETE THE EXPANSION JOINT INSTALLATION SHALL BE INCLUDED WITH ITEM 516 - STRUCTURAL EXPANSION JOINT INCLUDING ELASTOMERIC STRIP SEAL, AS PER PLAN FOR PAYMENT.
- FOR LOCATION OF FIELD SPLICES, SEE DECK SLAB PLAN ON SHEET 11 OF 12.

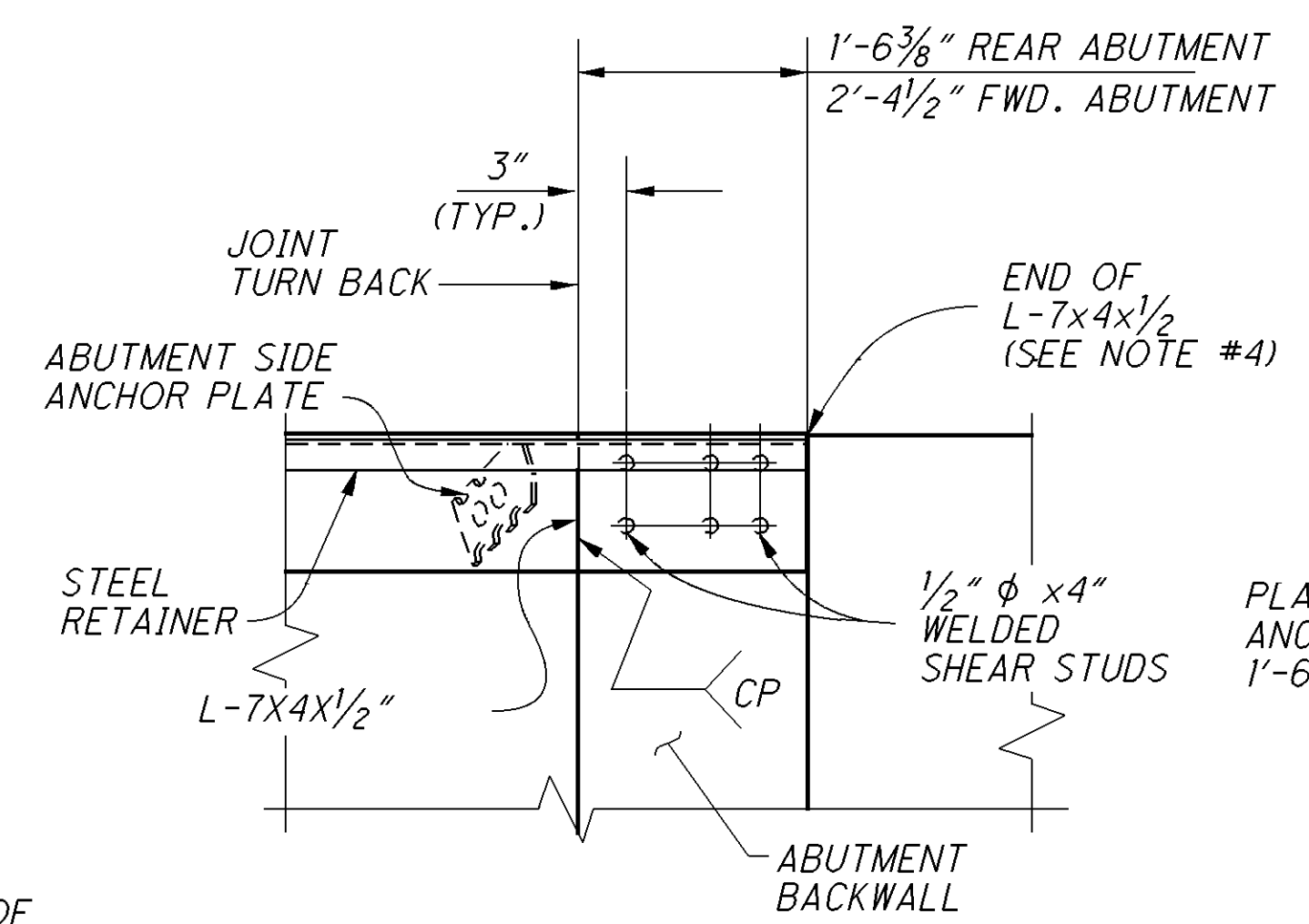


ELASTOMERIC STRIP SEAL JOINT SECTION

TYPICAL THRU DECK SLAB

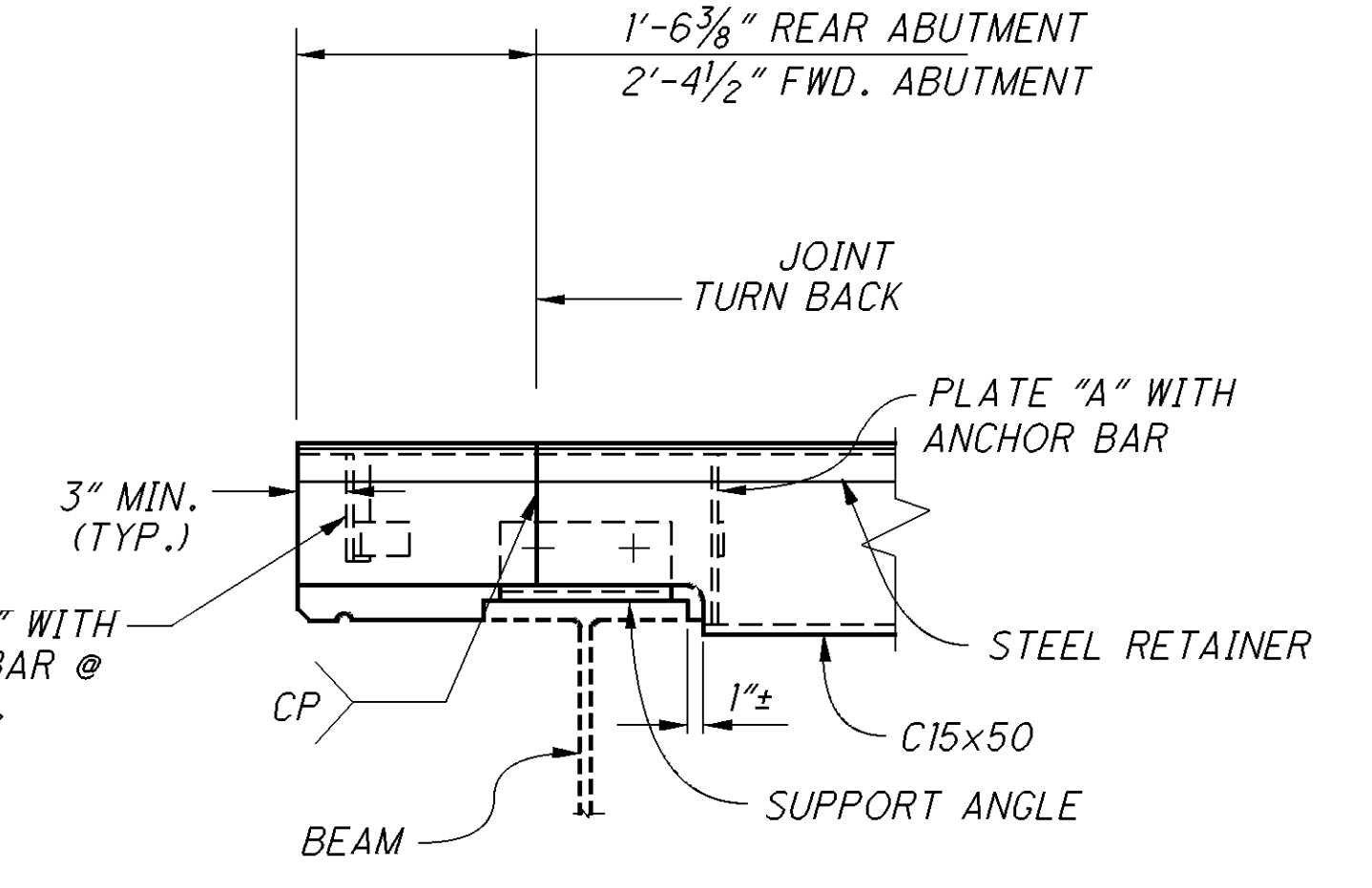
LEGEND

CP = COMPLETE PENETRATION
FIELD WELD,
GRIND SMOOTH



SECTION A-A

FROM STANDARD DRAWING EXJ-4-87



SECTION B-B

FROM STANDARD DRAWING EXJ-4-87

STRIP SEAL EXPANSION JOINT DETAILS

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DESIGNED	CAH	CHECKED	RSK
DRAWN	CAH	REVISED	
REVIEWED	SCS	STRUCTURE FILE NUMBER	310923L/310958R
DATE	1-24-14		
DESIGN AGENCY	STATE OF OHIO DEPARTMENT OF TRANSPORTATION DISTRICT 8 BRIDGE OFFICE		

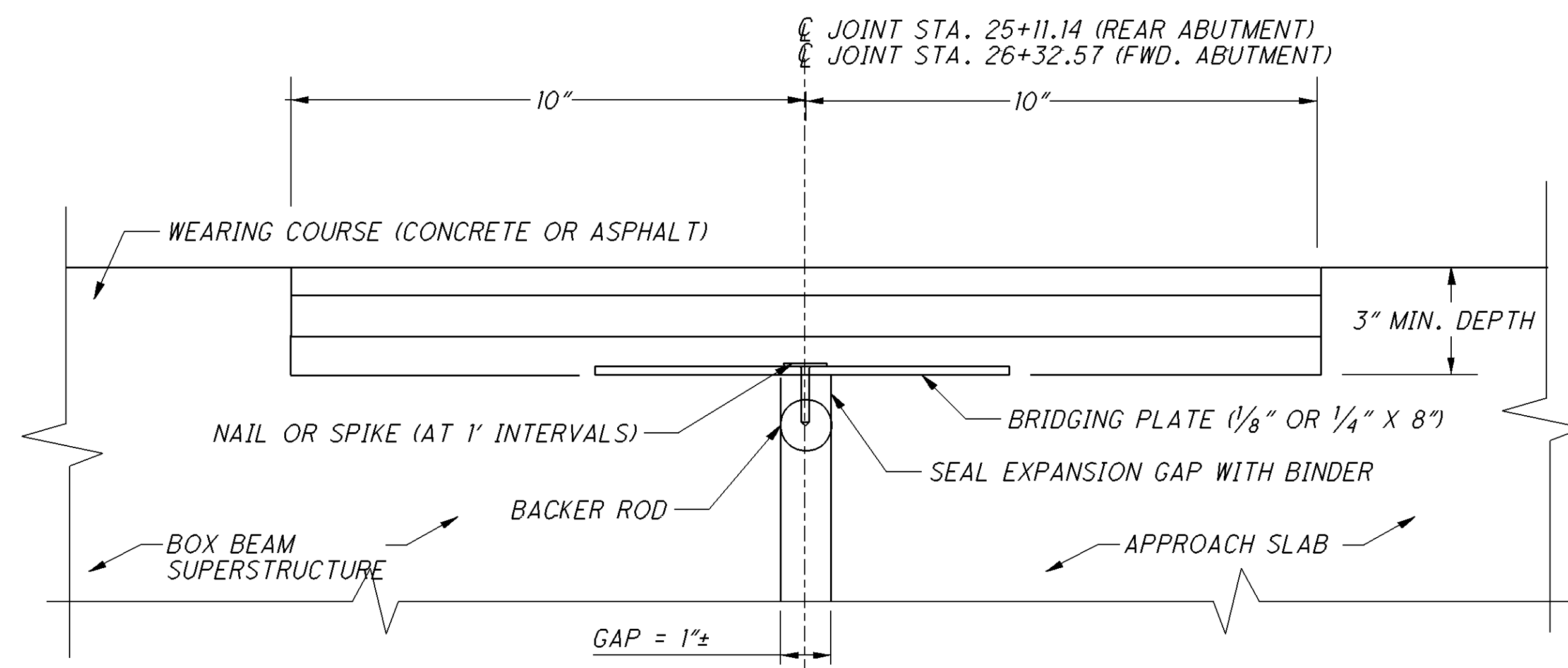
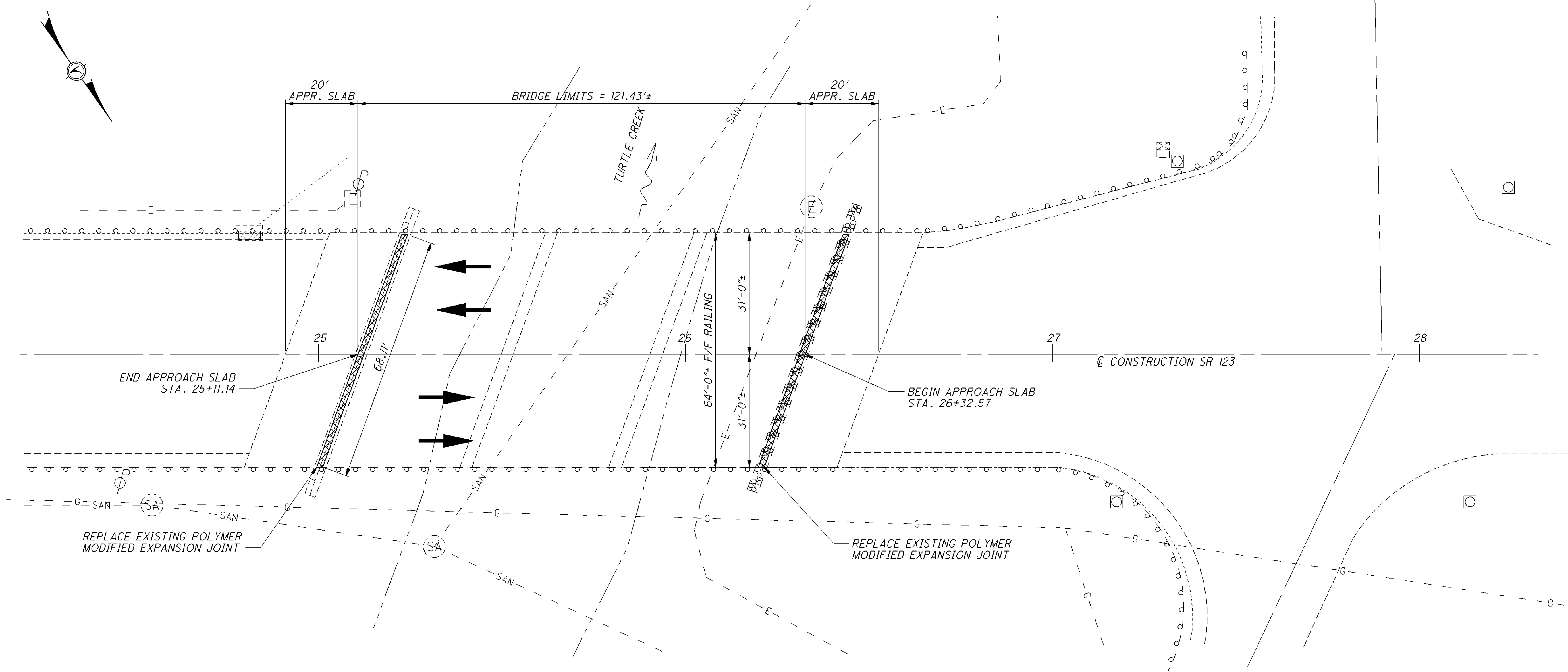
EXPANSION JOINT DETAILS
BRIDGE No: HAM-75-1539L/R
1-75 OVER SHARON RD.

HAM-75-14.56
PID No. 84495

12 / 12

59 / 60

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TYPICAL POLYMER MODIFIED ASPHALT EXPANSION JOINT FOR CONCRETE SLAB

NOTE:

THE REPLACEMENT POLYMER MODIFIED ASPHALT (PMA) EXPANSION JOINT SHALL EXTEND 1/4" MINIMUM DEEPER IN DEPTH THAN THE EXISTING PMA JOINT.

WIDTH = 1.83 FT
 LENGTH = 68.11 FT
 DEPTH = 0.25 FT

VOLUME = 1.83' * 68.11' * 0.25' * 1/27 = 1.15 CU YD

NUMBER OF EXPANSION JOINTS = 2

FINAL VOLUME = 2 * 1.15 CU YD = 2.30 CU YD

REMOVAL OF THE EXISTING PMA JOINT AND PARTIAL DEPTH APPROACH SLAB/ ABUTMENT BACKWALL REMOVAL TO ACCOMMODATE NEW THICKER PMA JOINT WILL BE INCLUDED WITH ITEM 202 - PORTIONS OF STRUCTURE REMOVED, A PER PLAN FOR PAYMENT.

EXISTING STRUCTURE

TYPE: NON-COMPOSITE PRESTRESSED CONCRETE BOX BEAMS ON CAPPED PILE ABUTMENTS AND PIERS

SPANS: 39'-0", 39'-0", 39'-0" ± C/C BEARINGS

ROADWAY: 64'-0" ± F/F RAILING

LOADING: HS20-44 & ALT. MILITARY LOADING

SKEW: NONE

ALIGNMENT: TANGENT

APPROACH SLABS: AS-1-81 (20'-0")

STRUCTURAL FILE NUMBER: 8304432

CROWN: NORMAL 0.0156 FT/FT

WEARING SURFACE: 3" ASPHALT CONCRETE

DATE BUILT: 1993

DISPOSITION: SEE PROPOSED

COORDINATES: LATITUDE N 39°25'52"
 LONGITUDE W84°11'17"

DESIGNED CAH CHECKED NEW	DRAWN AHK REVISED ---	REVIEWED SCS	DATE 1-24-14	DESIGN AGENCY STATE OF OHIO
		STRUCTURE FILE NUMBER 8304432		DEPT. OF TRANSPORTATION DISTRICT & BRIDGE DEPT.
WARREN COUNTY STA. 25+11.14 STA. 26+32.57		SITE PLAN BRIDGE NO. WAR-123-1740 OVER TURTLE CREEK		D08-BM-FY2014 PID No. 84530
1/1		60/60		