

OHIO TURNPIKE AND INFRASTRUCTURE COMMISSION THE JAMES W. SHOCKNESSY OHIO TURNPIKE PROJECT NO. 43-20-10 BRIDGE DECK REPLACEMENT AND REHABILITATION

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STATE ROUTE 83 OVER OHIO TURNPIKE M.P. 150.5, STATE ROUTE 252 OVER OHIO TURNPIKE M.P. 156.9 LORAIN AND CUYAHOGA COUNTIES, OHIO



OHIO DEPARTMENT OF TRANSPORTATION STANDARD DRAWINGS

BP-3.1	ASPHALT PAVING	07/18/14
MGS-1.1	MIDWEST GUARDRAIL SYSTEM. GUARDRAIL DETAILS	- 07/19/13
MGS-3.1	MIDWEST GUARDRAIL SYSTEM, MGS BRIDGE TERMINAL ASSEMBLY, TYPE 1 —	- 07/19/13
MGS-4.2	MIDWEST GUARDRAIL SYSTEM, MGS TYPE T ANCHOR ASSEMBLY	- 07/19/13
MGS-4.3	MIDWEST GUARDRAIL SYSTEM, GUARDRAIIL TRANSITIONS	— 01/18/13
MT-96.11	SIGNALIZED CLOSING ONE LANE OF A 2-LANE HIGHWAY	<i>— 07/18/14</i>
MT-96.20	DETAILS FOR SIGNALIZED CLOSING ONE LANE OF A 2-LANE HIGHWAY	— 07/19/13
MT-96.26	TYPICAL WIRING DIAGRAM FOR ONE SIGNAL HEAD AND ONE DETECTOR	- 07/19/13
MT-101.60	ROAD CLOSURE USING TYPE 3 BARRIERS	— 07/19/13
MT-105.10	TEMPORARY SIGN SUPPORT	— 07/19/13
SBR-1-13	SINGLE SLOPE CONCRETE BRIDGE RAILING	— 01/17/14
TC-52.10	SIGN BLANK DETAILS 1	— 10/18/13
TC 52 20	SIGN REANK DETAILS 2	01/17/14

HIO DEPARTMENT OF TRANSPORTATION SUPPLEMENTAL SPECIFICATION

UNIO DEFA	KINNENT OF TRAN	SFORTATION SUFFLEMENTAL SFECIFICATIONS	
SS 800	REVISIONS TO TH	E 2016 CONSTRUCTION & MATERIAL SPECIFICATIONS	10/19/1
SS 821	ARROW BOARD-		04/20/1
SS 921	ARROW BOARD-		04/20/1

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<u>OHIO TUR</u>	NPIKE AND INFRASTRUCTURE COMMISSION STANDARD DRAWINGS	
AS-1	REINFORCED CONCRETE APPROACH SLAB ————————————————————————————————————	
AS-3	REINFORCED CONCRETE APPROACH SLABS - CELLULAR ABUTMENT	
AS-5	REINFORCED CONCRETE APPROACH SLABS - SECTIONS AND DETAILS	
CL-1	CHAIN LINK SAFETY FENCE (ALL ALUMINUM) DETAILS, TYPE I	10/20/1
CL-2	CHAIN LINK SAFETY FENCE (ALL ALUMINUM) DETAILS, TYPE II	10/20/1
DJ-1	DECK JOINT DETAILS, CELLULAR ABUTMENTS	10/20/1
DJ-2	DECK JOINT DETAILS	10/20/1
DJ-3	DECK JOINT DETAILS, BRIDGES WITH SIDEWALKS	
DJ-5	DECK JOINT DETAILS AT PIERS	10/20/1
TCR-1	TEMPORARY TRAFFIC CONTROL GENERAL NOTES	10/20/1
TCR-2	TEMPORARY TRAFFIC CONTROL DETAILS, LEGEND, NOTES, AND STANDARD SINGLE LANE CLOSURE ——	10/20/1
TCR-9	TEMPORARY TRAFFIC CONTROL SHORT DURATION/SHORT TERM SHOULDER CLOSURE	
TCR-10	TEMPORARY TRAFFIC CONTROL DOUBLE LANE CLOSURE	10/20/1
TCR-15	TEMPORARY TRAFFIC CONTROL SIGNS FOR MAINTENANCE AND CONSTRUCTION	10/20/1

APPROVED FOR THE OHIO TURNPIKE AND INFRASTRUCTURE COMMISSION BY

CHIEF ENGINEER

DATE



ENGINEER'S	SEAL

DATE: 11/18/21

			GENERAL SUMMARY		
ITEM	TOTAL	UNIT	DESCRIPTION	M.P. 150.5	M.P. 156.9
			GENERAL		
B.ART.6	LUMP	LUMP SUM	PREMIUM FOR CONTRACT PERFORMANCE BOND AND PAYMENT BOND	LUMP	LUMP
SP 614	LUMP	LUMP SUM	MAINTAINING TRAFFIC	LUMP	LUMP
SP 619	LUMP	LUMP SUM	FIELD OFFICE	LUMP	LUMP
SP 623	LUMP	LUMP SUM	CONSTRUCTION LAYOUT SURVEY	LUMP	LUMP
624	LUMP	LUMP SUM	MOBILIZATION	LUMP	LUMP
			ROADWAY		
202	160	FOOT	GUARDRAIL REMOVED	160	-
254	249	SQ. YD.	PAVEMENT PLANING, ASPHALT CONCRETE, VARIABLE DEPTH	162	87
407	19	GALLON	NON-TRACKING TACK COAT	12	7
407	9	GALLON	NON-TRACKING TACK COAT FOR INTERMEDIATE COURSE	6	3
448	14	CU. YD.	1 ¾" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE 2, PG64-22	9	5
448	9	CU. YD.	1 ¼" ASPHALT CONCRETE SURFACE COURSE, TYPE 1, PG64-22	6	3
526	198	SQ. YD.	REINFORCED CONCRETE APPROACH SLABS	101	97
606	185	FOOT	GUARDRAIL, TYPE MGS	160	25
606	1	EACH	ANCHOR ASSEMBLY, MGS TYPE B	-	1
606	4	EACH	ANCHOR ASSEMBLY, MGS TYPE T	-	4
606	8	EACH	MGS BRIDGE TERMINAL ASSEMBLY, TYPE 1	4	4
SP 607	400	FOOT	TEMPORARY FENCE (7'-0" CHAIN LINK WITH SPECIALS)	-	400
SP 607	2	EACH	TEMPORARY GATE	-	2
608	665	SQ. FT.	CONCRETE WALK, 4"	180	485
609	56	FOOT	CURB, TYPE 6	-	56
614	64	HOURS	LAW ENFORCEMENT OFFICER WITH PATROL CAR	32	32
614	20	CU. YD.	ASPHALT CONCRETE FOR MAINTAINING TRAFFIC	10	10
614	10	EACH	REPLACEMENT SIGN	5	5
630	600	SQ. FT.	SIGNING MISC.: ADDITIONAL SIGNS, GROUND MOUNTED	300	300
642	0.23	MILE	EDGE LINE	0.12	0.11
642	0.12	MILE	CENTER LINE	0.06	0.06
			STRUCTURES		
SP 202	LUMP	LUMP SUM	PORTIONS OF STRUCTURE REMOVED	LUMP	LUMP
SP 509	178,742	POUND	EPOXY COATED REINFORCING STEEL	86,693	92,049
509	200	POUND	REINFORCING STEEL, REPLACEMENT OF EXISTING REINFORCING STEEL	100	100
510	30	EACH	DOWEL HOLES WITH NON-SHRINK, NON-METALLIC GROUT	20	10
SP 511B	421	CU. YD.	CLASS HP4 CONCRETE, SUPERSTRUCTURE DECK SLAB	206	215
SP 511B	238	CU. YD.	CLASS S CONCRETE, BARRIERS AND PARAPETS, USING TYPE I CEMENT	100	138
SP 511B	60	CU. YD.	CLASS HP4 CONCRETE, ABUTMENT SLABS	28	32
SP 511B	7	CU. YD.	CLASS HP4 CONCRETE, FOR PREPLACEMENT TESTING	4	3
513	3,380	EACH	WELDED STUD SHEAR CONNECTORS	1,550	1,830
SP 516A	44	FOOT	CRACK REPAIR USING EPOXY INJECTION	4	40
SP 516B	1,272	FOOT	SEALING OF CONSTRUCTION JOINTS	737	535
SP 516J	10	EACH	REPLACE FIXED BEARING DEVICE	10	-
518	1	CU. YD.	POROUS BACKFILL	-	1
518	6	FOOT	6" PERFORATED CORRUGATED PLASTIC PIPE	-	6
518	5	FOOT	6" NON-PERFORATED CORRUGATED PLASTIC PIPE INCLUDING SPECIALS	-	5

			STRUCTURES		
SP 519	469	SQ. FT.	PATCHING CONCRETE STRUCTURES	144	325
SP 527	LUMP	LUMP SUM	FALSEWORK, TEMPORARY BRACING, AND PROTECTIVE STRUCTURES	LUMP	LUMP
SP 533	139	FOOT	THREE (3) INCH CONTINUOUS STRIP SEAL IN STRUCTURAL STEEL JOINTS	62	77
SP 533A	139	FOOT	$1\frac{1}{2}$ " ELASTOMERIC COMPRESSION SEAL IN STRUCTURAL STEEL JOINT	62	77
SP 536	750	SQ. YD.	CONCRETE WEATHERPROOFING, SUBSTRUCTURE	379	371
SP 536	898	SQ. YD.	CONCRETE WEATHERPROOFING, BARRIERS AND PARAPETS	-	898
SP 536	1,179	SQ. YD.	CONCRETE WEATHERPROOFING, DECK AND ABUTMENT SLABS	580	599
SP 607	620	FOOT	TYPE I FENCE, ALL ALUMINUM (9'-0" CHAIN LINK WITH SPECIALS)	205	415
SP 607	205	FOOT	TYPE II FENCE, ALL ALUMINUM (6'-0" CHAIN LINK WITH SPECIALS)	205	-

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 (DESIGNED	CHECKED	NO.	REVISIONS	BY DA1	E DESIGN AGENC)	
	PROJECI 43-20-10	GENERAL SUMMART	CAC	CMM			•		
2			DRAWN	IN CHARGE			•		
)	DAIE: 2/19/2019	M.P. 150.5 & 156.9 LORAIN & CUYAHOGA COUNTY	CAC	ADY			•		
OHIO	OHIO TU	IRNPIKE AND INFRAST	FRU	CT	IN			SSION	OHIO

ALTERNATE BIDS THE CONTRACTOR SHALL BID ON THE BASE BID ITEMS AND THE ALTERNATE BID ITEMS. SEE SHEETS 17 AND 18 OF 20 FOR ADDITIONAL DETAILS.



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Plans - S.R. 83 - Maintenance of Traffic Phase 1 - Sections.dwg; 3/15/22 - 2:16

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		S.R. 83 - MAINTENANCE OF TRAFFIC PHASE 1 - SECTI	SIAIE KOUIE 83 OVEK URIU LUKNPIKE M.P. 150.5 LORAIN CO	JRNPIKE AND INFRA
	LEGEND - INDICATES REMOVAL IN ACCORDANCE WITH ITEM SP 202 PORTIONS OF STRUCTURE REMOVED NOTES: 1. THE EXISTING BRIDGE FENCING SHALL REMAIN IN	PROJECT 43-20-10	DATE: 2/19/2019	OHIO TU
0"	 PLACE ON THE LEFT SIDE OF THE BRIDGE DURING PHASE 1. PORTABLE BARRIER SHALL BE DELINEATED AS SHOWN ON STANDARD DRAWING TCR-2.1. 		4 6	OHIO TURNPIKE



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Plans - S.R. 83 - Maintenance of Traffic Phase 1 - Sections.dwg; 3/15/22 - 2:16pn

MAINTENANCE OF TRAFFIC SEQUENCE:

THESE PLANS ARE BASED ON THE FOLLOWING SUGGESTED SEQUENCE OF CONSTRUCTION

BOTH DIRECTIONS OF TRAFFIC SHALL BE MAINTAINED AT ALL TIMES BY USE OF THE EXISTING PAVEMENT AND TEMPORARY TRAFFIC SIGNALS.

TRAFFIC SHALL BE MAINTAINED USING A SIGNED DETOUR.

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<u>STATE ROUTE 252</u> SHALL BE CLOSED TO THROUGH TRAFFIC AND DETOURED ACCORDING TO THE PLANS. THE CONTRACTOR SHALL MAINTAIN ACCESS TO ALL DRIVES AND ACCESS ROADS AT ALL TIMES DURING THE PROJECT UNLESS OTHERWISE AUTHORIZED BY THE CHIEF ENGINEER DETOURS SHALL NOT BE PLACED INTO EFFECT UNTIL THE CONTRACTOR IS READY TO COMMENCE WORK

STATE ROUTE 83 - PHASE 1

THIS PHASE WILL CONSIST OF REMOVING AND CONSTRUCTING THE SOUTHBOUND BRIDGE DECK, PARAPET, FENCE, ETC.

TRAFFIC AND PEDESTRIANS WILL BE MAINTAINED USING A TEMPORARY TRAFFIC SIGNAL AS DETAILED ON THE FOLLOWING SHEETS AND STANDARD CONSTRUCTION DRAWINGS MT-96.11, MT-96.20 AND MT-96.26.

STATE ROUTE 83 - PHASE 2

THIS PHASE WILL CONSIST OF REMOVING AND CONSTRUCTING THE NORTHBOUND BRIDGE DECK. PARAPET. FENCE. SIDEWALK. ETC.

TRAFFIC WILL BE MAINTAINED USING A TEMPORARY TRAFFIC SIGNAL AS DETAILED ON THE FOLLOWING SHEETS AND STANDARD CONSTRUCTION DRAWINGS MT-96.11, MT-96.20 AND MT-96.26. PEDESTRIAN TRAFFIC WILL NOT BE MAINTAINED.

<u>MAINTAINING TRAFFIC</u> THE CONTRACTOR'S RESPONSIBILITY TO THE SAFETY OF THE MOTORING PUBLIC WHILE PERFORMING THE REQUIREMENTS OF THE CONTRACT SHALL BE IN ACCORDANCE WITH THESE TEMPORARY TRAFFIC CONTROL PLANS, THE SPECIFICATIONS AND SPECIAL PROVISIONS, THE CURRENT EDITION, LATEST REVISION OF THE "OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES" (OMUTCD) AND "TEMPORARY TRAFFIC CONTROL ON THE TURNPIKE." LATEST REVISION

IN ADDITION, THE FOLLOWING SPECIFIC PROVISIONS ARE MANDATORY.

NOTIFICATION

SINCE FUNCTIONAL TRAFFIC CONTROL IS A MAJOR CONCERN ON THIS PROJECT, IT IS ESSENTIAL THAT THE MOTORING PUBLIC BE ADEQUATELY FOREWARNED OF FUTURE LANE CLOSURES AND TRAFFIC CONSTRUCTIONS. THEREFORE. THE CONTRACTOR SHALL SUBMIT A WRITTEN SCHEDULE TO THE ENGINEER, RESPONSIBLE LAW ENFORCEMENT AGENCIES, CITY OF OF OLMSTED FALLS AND THE OTIC MARKETING AND COMMUNICATIONS OFFICE INDICATING THE LOCATIONS AND DATES OF THE LANE CLOSURES AT LEAST 2 WEEKS PRIOR TO THE IMPLEMENTATION OF ANY SUCH CLOSURES

THE CONTRACTOR SHALL PROVIDE A 48 HOUR NOTICE TO THE OHIO TURNPIKE AND INFRASTRUCTURE COMMISSION CHIEF ENGINEER PRIOR TO INSTALLING AND CHANGING TEMPORARY TRAFFIC CONTROL PHASES.

li. WORK HOURS

NIGHT WORK IS NOT PERMITTED DUE TO THE RESIDENTIAL NATURE OF THE SURROUNDING AREAS LIMIT WORK HOURS TO DAYLIGHT HOURS BETWEEN 7:00 AM AND 9:00 PM. MONDAY THROUGH FRIDAY OR BETWEEN 8:30 AM AND 7:00 PM ON SATURDAY AND SUNDAY

III. LANE CLOSURE

ALL LANE CLOSURES SHALL BE IN ACCORDANCE WITH THE "OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES" (OMUTCD) AND APPLICABLE STANDARD CONSTRUCTION DRAWING.

THE OHIO TURNPIKE AND INFRASTRUCTURE COMMISSION (OTIC) TEMPORARY TRAFFIC CONTROL PHASE DATES, LANE REDUCTION TIME LIMITATIONS, AND LIQUIDATED DAMAGE CLAUSES ARE CONTAINED IN THE FOLLOWING SPECIAL PROVISIONS:

SP 103, CONSTRUCTION PHASING AND TIME OF COMPLETION SP 104, ACCESS TO TURNPIKE AND RESTRICTIONS SP 107. TIME OF ESSENCE - LIQUIDATED DAMAGES

IV MAINTENANCE OF TRAFFIC SYSTEMS

WHEN REQUIRED Α

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WHENEVER ANY PART OF THE TRAVELED SURFACE IS BEING WORKED UPON OR IS OTHERWISE NOT SUITABLE FOR SAFE AND CONVENIENT USE BY VEHICLES, TRAFFIC CONTROL DEVICES SUFFICIENT TO PROTECT SUCH

AREAS TO ASSURE THE SAFE AND CONVENIENT PASSAGE OF VEHICULAR TRAFFIC SHALL BE INSTALLED AND MAINTAINED. SUCH TRAFFIC CONTROL DEVICES AND THE MANNER IN WHICH THEY ARE USED SHALL BE CONSISTENT WITH THESE PLANS AND THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES FOR STREETS AND HIGHWAYS, HEREINAFTER REFERRED TO AS THE OMUTCD. THE TRAFFIC CONTROL DEVICE SYSTEM SHALL CONSTITUTE THE MINIMUM PROVISIONS FOR TRAFFIC CONTROL FOR EACH PARTICULAR SITUATION. WHENEVER THE ENGINEER DEEMS IT NECESSARY ESPECIALLY WHERE A GRADE, CURVE, OR MERGE CONDITIONS EXISTS, HE/SHE MAY DIRECT THAT ADDITIONAL OR ALTERNATIVE DEVICES BE USED

B CONDITIONS

DURING ALL PARTS OF THIS PROJECT, FLAGGERS, SIGNING, BARRICADES, FLASHING ARROWS, ETC. SHALL BE LOCATED AS INDICATED IN THE OMUTCD OR AS SHOWN IN THE STANDARD CONSTRUCTION DRAWINGS. TWO-WAY TRAFFIC SHALL BE MAINTAINED AT ALL TIMES ON STATE ROUTE 83.

C. ADVANCE WARNING SIGNS

ALL ADVANCE WARNING SIGNS FOR ANY CONDITION WHICH RESTRICTS TRAFFIC SHALL BE ERECTED BEFORE ANY SUCH RESTRICTION IS PUT INTO EFFECT. ALL SUCH SIGNS SHALL BE COVERED OR REMOVED FROM THE VIEW OF TRAFFIC WHENEVER THEY ARE NOT APPLICABLE

D. FLASHING ARROW REQUIREMENT

WHENEVER ANY PART OF THE TURNPIKE TRAVELED SURFACE IS CLOSED. THE MOTORISTS SHALL BE WARNED AND DIRECTED BY THE CONTRACTOR THROUGH THE USE OF ONE FLASHING ARROW FOR EACH LANE CLOSED. ADDITIONALLY, THE PROVISIONS SET FORTH IN THE (OMUTCD) AND THE APPLICABLE STANDARD CONSTRUCTION DRAWINGS SHALL BE MET

E. FLAGGERS AND LAW ENFORCEMENT OFFICERS

THE CONTRACTOR SHALL FURNISH ADDITIONAL FLAGGERS AS DIRECTED BY THE ENGINEER. LAW ENFORCEMENT OFFICERS (LEO'S) SHALL BE REQUIRED FOR TRAFFIC DIRECTION ONLY IF TRAFFIC MUST MOVE AGAINST SIGNAL PHASING.

F. TRAFFIC ZONES

THE CONTRACTOR SHALL IMMEDIATELY CORRECT ANY DIFICIENCY IN TRAFFIC ZONE ALIGNMENT, EQUIPMENT, NUMBER OF DEVICES. OR PROCEDURE OF FLAG PERSONS WHICH IS BROUGHT TO HIS ATTENTION BY THE ENGINEER

G. FAILURE TO COMPLY

IF THERE IS ANY FAILURE TO COMPLY WITH PROVISIONS FOR TRAFFIC CONTROL SET OUT IN THESE PLANS AND NOTES. OR WITH THE PROVISIONS OF THE OMUTCD, THE HIGHWAY IN THE VICINITY OF THE WORK AREA SHALL NOT BE CONSIDERED IN A CONDITION FOR THE SAFE AND CONVENIENT USE BY THE TRAVELING PUBLIC. ANY FAILURE TO KEEP THE HIGHWAY, IN THE VICINITY OF THE WORK AREA, IN A CONDITION FOR THE SAFE AND CONVENIENT USE BY THE TRAVELING PUBLIC SHALL BE CONSIDERED A BREACH OF THIS CONTRACT. WORK SHALL BE SUSPENDED UNTIL THE CONTRACTOR COMPLIES WITH THE PROVISIONS OF THE AFOREMENTIONED ITEMS.

- IV. MAINTENANCE OF TRAFFIC MATERIALS
- A SIGNS

SIGN DIMENSIONS AND SPECIFICATIONS, INCLUDING LETTER SIZES SHALL BE AS PROVIDED IN THE OMUTCD, OR IN DESIGN DRAWINGS PROVIDED BY THE COMMISSION. THE SIGNS SHALL BE SUBJECT TO APPROVAL OF THE ENGINEER PRIOR TO THE START OF THE PROJECT

SIGN SUPPORTS В.

SIGN SUPPORTS SHALL BE OF SUFFICIENT SIZE AND HEIGHT AS TO SUPPORT THE SIGNS AT THE APPROPRIATE HEIGHT. SUPPORTS SHALL BE ADEQUATE IN MASS AND STABILITY TO PREVENT THE SIGNS FROM BEING BLOWN OVER BY WIND OR VEHICULAR GENERATED AIR TURBULENCE.

C. DRUMS

DRUMS SHALL BE IN ACCORDANCE WITH PERTINENT SECTIONS OF THE OMUTCD. IN ADDITION TO THE REQUIREMENTS OF THE PLANS, SPECIFICATION AND PROPOSAL, DRUMS FURNISHED BY THE CONTRACTOR SHALL BE LIKE NEW OR UNUSED AT THE TIME OF ARRIVAL ON THE PROJECT. PAYMENT FOR DRUMS SHALL BE INCLUDED IN THE LUMP SUM PRICE BID FOR ITEM SP614 MAINTAINING TRAFFIC UNLESS SEPARATELY ITEMIZED

MAINTENANCE OF TRAFFIC NOTES

D. CONES

CONES SHALL BE LOCATED AS SHOWN IN THE OMUTCD AND THE STANDARD CONSTRUCTION DRAWINGS. IN ADDITION TO THE REQUIREMENTS OF THE PLANS, SPECIFICATION AND PROPOSAL, CONES FURNISHED BY THE CONTRACTOR SHALL BE LIKE NEW OR UNUSED AT THE TIME OF ARRIVAL ON THE PROJECT. PAYMENT FOR CONES SHALL BE INCLUDED IN THE LUMP SUM PRICE BID FOR ITEM SP614 MAINTAINING TRAFFIC UNLESS SEPARATELY ITEMIZED.

E. FLASHERS

FLASHERS SHALL BE 12 VOLT BATTERY-OPERATED MODELS WITH 7 INCH DIAMETER YELLOW LENSES ILLUMINATED BY RAPID INTERMITTENT FLASHERS OF SHORT DURATION AND SHALL BE PLACED ON ALL SIGNS AT ALL TIMES AS REQUIRED BY THE OMUTCD AND THE STANDARD CONSTRUCTION DRAWINGS

G. WORK ZONE PAVEMENT MARKINGS

THE WORK ZONE PAVEMENT MARKINGS SHALL BE 4" WIDE. UNLESS NOTED OTHERWISE ON THE PLANS. ITEM SP 641C - REMOVAL OF PAVEMENT MARKINGS SHALL BE UTILIZED FOR THE REMOVAL OF EXISTING PAVEMENT MARKINGS, THAT WERE PRESENT PRIOR TO THE START OF CONSTRUCTION THAT CONFLICT WITH THE WORK ZONE PAVEMENT MARKINGS AND FOR THE REMOVAL OF ITEM 614 - WORK ZONE PAVEMENT MARKINGS

REMOVAL OF EXISTING CONFLICTING PAVEMENT MARKINGS SHALL BE ACCOMPLISHED BY EITHER GRINDING OR WATER BLAST AS APPROVED BY THE CHIEF ENGINEER, IN ACCORDANCE WITH SP 641C. IN NO INSTANCE SHALL BLACKOUT TAPE BE USED. MEASUREMENT OF THIS ITEM SHALL BE IN ACCORDANCE WITH SP 641C AND SHALL INCLUDE ALL LABOR. MATERIALS EQUIPMENT AND INCIDENTALS NECESSARY TO REMOVE CONFLICTING PAVEMENT MARKINGS TO THE SATISFACTION OF THE CHIEF ENGINEER

WORK ZONE PAVEMENT MARKINGS SHALL BE INSTALLED BY THE CONTRACTOR AS PER ITEM 614 OR PER ITEM 641.

PAYMENT FOR WORK ZONE PAVEMENT MARKINGS SHALL BE INCLUDED IN THE LUMP SUM BID PRICE FOR ITEM SP 614 - MAINTAINING TRAFFIC. PAYMENT SHALL INCLUDE ALL LABOR, TOOLS, EQUIPMENT, AND MATERIALS NECESSARY TO REMOVE CONFLICTING MARKINGS, INSTALL WORK ZONE MARKINGS. MAINTAIN AND REPLACING DAMAGED WORK ZONE MARKINGS, AND REMOVE WORK ZONE MARKINGS WHEN NO LONGER APPLICABLE.

H. GUARDRAIL DELINEATION

GUARDRAIL DELINEATION SHALL CONSIST OF AKT CORPORATION MODEL 567 ONE-WAY DELINEATORS INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S PRINTED INSTRUCTIONS. THE DELINEATORS SHALL BE SPACED 100' (MINIMUM), WITH ALL GUARDRAIL RUNS HAVING NO LESS THAN TWO DELINEATORS (ONE DELINEATOR ON THE BEGIN AND ONE ON THE END OF THE GUARDRAIL RUN).

PAYMENT FOR GUARDRAIL DELINEATION SHALL BE INCLUDED WITH ITEM SP 614 MAINTAINING TRAFFIC. SUCH PAYMENT SHALL INCLUDE PROVIDING, INSTALLING, MAINTAINING, REPLACING DAMAGED DELINEATORS AND REMOVING, AS SPECIFIED, FOR THE ABOVE SAID GUARDRAIL DELINEATION

VI. THE OHIO TURNPIKE AND INFRASTRUCTURE COMMISSION (OTIC) TEMPORARY TRAFFIC CONTROL PHASE DATES. LANE REDUCTION TIME LIMITATIONS, AND LIQUIDATED DAMAGE CLAUSES ARE CONTAINED IN THE FOLLOWING SPECIAL PROVISIONS

SP 103, CONSTRUCTION PHASING AND TIME OF COMPLETION SP 104, ACCESS TO TURNPIKE AND RESTRICTIONS SP 107, TIME OF ESSENCE - LIQUIDATED DAMAGES

VII. TEMPORARY PORTABLE BARRIERS

ALL TEMPORARY PORTABLE BARRIERS SHOWN ON THE PLANS FOR MAINLINE TEMPORARY TRAFFIC CONTROL WILL BE AS PER SP 622A. THE SAME BARRIER CAN BE USED FOR THE VARIOUS PHASES. THE COST FOR TRANSPORTING, INSTALLING, MAINTAINING, REMOVAL AND STORING THE TEMPORARY PORTABLE BARRIER FOR EACH PHASE SHALL BE INCLUDED IN THE ORIGINAL UNIT COST OF SUPPLYING THE BARRIER FOR ITEM SP 622A.

THE CONTRACTOR SHALL REPLACE ANY DAMAGED TEMPORARY PORTABLE BARRIER WITHIN 24 HOURS OF A DAMAGING IMPACT.

PAYMENT

ALL WORK AND TRAFFIC CONTROL DEVICES SHALL BE IN ACCORDANCE WITH ITEM SP 614 AND APPLICABLE PORTIONS OF THE OHIO DEPARTMENT OF TRANSPORTATION STANDARD CONSTRUCTION DRAWINGS, ODOT CONSTRUCTION & MATERIAL SPECIFICATION AND OTHER APPLICABLE PORTIONS OF THE SPECIFICATIONS, AS WELL AS THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES. PAYMENT FOR ALL LABOR. EQUIPMENT AND MATERIALS SHALL BE INCLUDED IN THE LUMP SUM CONTRACT PRICE FOR ITEM SP614. MAINTAINING TRAFFIC. UNLESS SEPARATELY ITEMIZED IN THE PLAN.

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 "OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES" OMUTCD INTENDS THAT FLAGGERS BE USED. IN ADDITION TO THE REQUIREMENTS OF 614 AND THE OMUTCD, 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 ON STATE ROUTE 83.
- DURING A TRAFFIC SIGNAL INSTALLATION WHEN IMPACTING THE NORMAL FUNCTION OF THE SIGNAL OR THE FLOW OF TRAFFIC OR WHEN TRAFFIC NEEDS TO BE DIRECTED THROUGH AN ENERGIZED TRAFFIC SIGNAL CONTRARY TO THE SIGNAL DISPLAY (E.G., DIRECTING MOTORISTS THROUGH A RED LIGHT).

IN ADDITION TO THE REQUIREMENT OF 614 AND THE "OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES" (OMUTCD), A UNIFORMED LAW ENFORCEMENT OFFICER 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 LEO'S DUTIES AND PLACEMENT AND WILL RESOLVE ANY ISSUES THAT MAY ARISE BETWEEN THE TWO PARTIES.

THE LEO SHOULD REPORT 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. THE FOLLOWING ESTIMATED QUANTITIES HAVE BEEN CARRIED TO THE GENERAL SUMMARY

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MAINTENANCE OF TRAFFIC NOTES

ITEM 614- LAW ENFORCEMENT OFFICER WITH PATROL CAR, 64 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.

MAINTENANCE OF TRAFFIC SIGNAL INSTALLATION

THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING THE TRAFFIC SIGNAL INSTALLATION WITHIN THE PROJECT UNDER THE FOLLOWING CONDITIONS.

NEW OR REUSED SIGNAL INSTALLATIONS OR DEVICES INSTALLED BY THE CONTRACTOR. THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTENANCE OF THESE FROM THE TIME OF INSTALLATION UNTIL THE WORK IS ACCEPTED

THE CONTRACTOR SHALL CORRECT AS QUICKLY AS POSSIBLE ALL OUTAGES OR MALFUNCTIONS. HE SHALL PROVIDE THE MAINTAINING AGENCY AND THE ENGINEER SUCH ADDRESSES AND PHONE NUMBERS WHERE HIS MAINTENANCE FORCES CAN BE CONTACTED. THE CONTRACTOR SHALL PROVIDE ONE OR MORE PERSONS TO RECEIVE ALL CALLS AND DISPATCH THE NECESSARY MAINTENANCE FORCES TO CORRECT OUTAGES. SUCH A PERSON OR PERSONS MAY BE USED TO PERFORM OTHER DUTIES AS LONG AS PROMPT ATTENTION IS GIVEN TO THESE CALLS AND A PERSON IS READILY AVAILABLE CONTINUOUSLY 24 HOURS A DAY, 7 DAYS A WEEK. ALL LAMP OUTAGES, CABLE OUTAGES, ELECTRICAL FAILURES, EQUIPMENT MALFUNCTIONS AND MISALIGNED SIGNAL HEADS SHALL BE CORRECTED TO THE SATISFACTION OF THE ENGINEER WITH THE SIGNAL BACK TO SERVICE WITHIN FOUR HOURS AFTER THE CONTRACTOR HAS BEEN NOTIFIED OF THE OUTAGE.

IN THE EVENT NEW SIGNALS ARE DAMAGED PRIOR TO ACCEPTANCE, ALL DAMAGED EQUIPMENT EXCEPT POLES AND CONTROL EQUIPMENT SHALL BE REPLACED BY THE CONTRACTOR TO THE SATISFACTION OF THE ENGINEER WITH THE SIGNAL BACK IN SERVICE WITHIN & HOURS AFTER THE CONTRACTOR'S NOTIFICATION OF THE OUTAGE. THE CONTRACTOR SHALL ARRANGE FOR FULL TRAFFIC CONTROL UNTIL THE SIGNAL IS BACK IN OPERATION.

IF POLES AND/OR CONTROL EQUIPMENT ARE DAMAGED AND MUST BE REPLACED. THE CONTRACTOR SHALL MAKE TEMPORARY REPAIRS AS NECESSARY TO BRING THE SIGNAL BACK INTO FULL OPERATION WITHIN THE ALLOWED 8-HOUR PERIOD. AND SHALL MAKE PERMANENT REPAIRS OR REPLACEMENT AS SOON THEREAFTER AS POSSIBLE.

NONE OF THE ABOVE SHALL BE CONSTRUED AS COLLECTIVE OR CONSECUTIVE OUTAGE TIME PERIODS AT ANY ONE LOCATION. THAT IS. WHERE MORE THAN ONE OUTAGE OCCURS AT ANY ONE LOCATION THEN THE ALLOTTED TIME LIMIT SHALL BE FOR THE WORST SINGLE OUTAGE.

WHERE OUTAGES ARE THE DIRECT RESULT OF A VEHICLE ACCIDENT, THE RESPONSE OF THE CONTRACTOR SHALL BE AS OUTLINED ABOVE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE COLLECTION OF ANY COMPENSATION FOR THIS WORK FROM THOSE PARTIES RESPONSIBLE FOR THE DAMAGE

WHERE THE CONTRACTOR HAS FAILED TO, OR CANNOT RESPOND TO, AN OUTAGE OR SIGNAL EQUIPMENT MALFUNCTION AT THESE LOCATIONS WITHIN HIS RESPONSIBILITY WITHIN PERIODS AS SPECIFIED ABOVE, THE ENGINEER MAY INVOKE THE PROVISIONS OF SECTION 105.15 AND ANY SUBSEQUENT BILLINGS TO THE COMMISSION OR CITY FOR POLICE SERVICES AND MAINTENANCE SERVICES SHALL BE DEDUCTED FROM MONIES DUE OR TO BECOME DUE THE CONTRACTOR IN ACCORDANCE WITH PROVISIONS OF SECTION 105.15.

THE CONTRACTOR SHALL PROVIDE THE MAINTENANCE SERVICE ENTIRELY WITH HIS FORCES OR HE OR SHE MAY CHOOSE TO ENTER INTO A COOPERATIVE UNDERSTANDING WITH THE LOCAL MAINTAINING AGENCY TO PROVIDE THE MAINTENANCE. THE CONTRACTOR SHALL INFORM THE ENGINEER, IN WRITING, OF THE MAINTENANCE METHOD SELECTED

THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DAMAGE TO ANY TRAFFIC SIGNAL COMPONENTS REQUIRED TO BE HANDLED DURING THE RELOCATION OF POLES AND REVISIONS TO THE SIGNAL SYSTEM. WHEN A TRAFFIC SIGNAL MUST BE TAKEN OUT OF SERVICE BY THE CONTRACTOR DUE TO CONSTRUCTION PROCEDURES, THIS OUTAGE SHALL NOT EXCEED 8 HOURS AND SHALL NOT INCLUDE THE HOURS OF 8 PM TO 6 AM. ANY SIGNALIZED INTERSECTION WHERE THE SIGNAL IS OUT OF SERVICE DUE TO CONSTRUCTION PROCEDURES, OR DUE TO AN OUTAGE OR MALFUNCTION OF EQUIPMENT AS DESCRIBED ABOVE, SHALL BE PROTECTED BY THE CONTRACTOR BY THE INSTALLATION OF TEMPORARY STOP SIGNS.

ANY VEHICULAR TRAFFIC SIGNAL HEAD, EITHER NEW OR EXISTING WHICH WILL BE OUT OF OPERATION SHALL BE COVERED IN THE MANNER DESCRIBED IN 632.23.

THE CONTRACTOR SHALL MAINTAIN COMPLETE RECORDS OF MALFUNCTIONS INCLUDING:

- TIME OF NOTIFICATION OF MALFUNCTION.
- TIME OF WORK CREW'S ARRIVAL TO CORRECT THE MALFUNCTION. 3. ACTIONS TAKEN TO CORRECT THE MALFUNCTION. INCLUDING A LIST
- OF PARTS REPAIRED OR REPLACED. A DIAGNOSIS OF REASON FOR THE MALFUNCTION AND PROBABILITY
- OF REOCCURRENCE
- TIME OF COMPLETION OF THE REPAIR AND SYSTEM RESTORED TO FULL SERVICE.

A COPY OF THESE RECORDS SHALL BE PROVIDED TO THE ENGINEER WITHIN THREE (3) WORKING DAYS FOLLOWING COMPLETION OF EACH RFPAIR

ALL COSTS RESULTING FROM THE ABOVE REQUIREMENTS SHALL BE CONSIDERED TO BE INCLUDED IN THE LUMP SUM BID PRICE FOR ITEM SP 614 MAINTAINING TRAFFIC

MULTI-PLAN, TIME-OF-DAY OPERATION OF SR 83 WORK ZONE SIGNAL

THE WORK ZONE SIGNAL CONTROL REQUIRED FOR THIS PROJECT AND DETAILED ON THE FOLLOWING SHEETS AND STANDARD CONSTRUCTION DRAWINGS MT-96.11, MT-96.20 AND MT-96.26 SHALL BE CAPABLE OF PROVIDING MULTIPLE TIMING PATTERNS CHOSEN ON A TIME-OF-DAY BASIS

TRAFFIC CONTROL EQUIPMENT SHALL BE CAPABLE OF TIME-OF-DAY/DAY-OF-WEEK PROGRAMMING; WITH A MINIMUM OF THREE-DIAL, THREE OFFSETS AND THREE SPLITS, OR A MINIMUM OF FIFTEEN SEPARATE TIMING PLANS.

TIMING PLAN (SEC	OND	S)
PLAN	A	В	С
NORTHBOUND GREEN	29	31	20
NORTHBOUND YELLOW	3.5	3.5	3.5
NORTHBOUND ALL RED	21	21	21
SOUTHBOUND GREEN	22	40	21
SOUTHBOUND YELLOW	3.5	3.5	3.5
SOUTHBOUND ALL RED	21	21	21
TOTAL CYCLE LENGTH	100	120	90

-	TIME	OF L	DAY	PLA	V		
TIME	MON	TUES	WED	THUR	FRI	SAT	SUN
MIDNIGHT – 6:00 A.M.	С	С	С	С	С	С	С
6:00 A.M 2:00 P.M.	A	А	А	A	А	A	A
2:00 P.M 7:00 P.M.	В	В	В	В	В	A	A
7:00 P.M MIDNIGHT	С	С	С	С	С	С	С

PAYMENT IS INCIDENTAL TO THE LUMP SUM BID FOR ITEM SP 614, MAINTAINING TRAFFIC.

CONTRACTOR'S EQUIPMENT · OPERATION AND STORAGE VEHICLES AND EQUIPMENT SHALL ALWAYS MOVE WITH, AND NOT ACROSS OR AGAINST THE FLOW OF TRAFFIC. VEHICLES AND OTHER EQUIPMENT SHALL NOT PARK OR STOP EXCEPT WITHIN DESIGNATED WORK AREAS: AND SHALL NOT ENTER AND LEAVE WORK AREAS IN A MANNER WHICH WILL BE HAZARDOUS TO, OR INTERFERE WITH THE NORMAL TRAFFIC FLOW. PERSONAL VEHICLES WILL NOT BE PERMITTED TO PARK WITHIN THE RIGHT-OF-WAY EXCEPT IN SPECIFIC AREAS DESIGNATED BY THE FNGINEER

FOUIPMENT VEHICLES AND MATERIALS SHALL NOT BE STORED OR PARKED WITHIN 30 FEET OF THE TRAVELED WAY UNLESS 6 FEET BEHIND PCB OR GUARDRAII

ALL WORK VEHICLES AND EQUIPMENT THAT ENTERS THE WORK ZONE MORE THAN ONCE A DAY MUST BE EQUIPPED WITH AT LEAST ONE FLASHING, ROTATING, OR OSCILLATING AMBER LIGHT THAT IS VISIBLE IN ALL DIRECTIONS OF TRAFFIC FOR AT LEAST ONE QUARTER OF A MILE, DAY OR NIGHT

SUSPENSION OF WORK

IF THE CONTRACTOR FAILS TO COMPLY WITH THE PROVISIONS FOR TRAFFIC CONTROL AS SET FORTH IN THESE PLANS OR WITH PROVISIONS OF THE OMUTCD, THE ENGINEER SHALL SUSPEND WORK UNTIL THE CONTRACTOR COMPLIES WITH THE NECESSARY REQUIREMENTS.

ALTERNATE METHODS

IF THE CONTRACTOR SO ELECTS, HE/SHE MAY SUBMIT ALTERNATE METHODS FOR THE MAINTENANCE OF TRAFFIC, PROVIDED THE INTENT OF THE PROVISIONS IS FOLLOWED AND NO ADDITIONAL INCONVENIENCE TO THE TRAVELING PUBLIC RESULTS THERE FROM. NO ALTERNATE PLAN SHALL BE PLACED INTO EFFECT UNTIL APPROVAL HAS BEEN GRANTED IN WRITING. BY THE CHIEF ENGINEER.

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 ODOT OFFICE OF ROADWAY ENGINEERING'S WFRSITE

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 INCLUDED IN THE LUMP SUM BID PRICE ITEM SP 614, MAINTAINING TRAFFIC. THIS 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.

NOTICE OF CLOSURE SIGNS (SR 252)

NOTICE OF CLOSURE SIGNS SHALL BE ERECTED BY THE CONTRACTOR AT LEAST TWO WEEKS IN ADVANCE OF THE SCHEDULED ROAD CLOSURE. THE SIGNS SHALL BE ERECTED ON THE RIGHT HAND SIDE OF THE ROAD FACING TRAFFIC. THEY SHALL BE PLACED SO AS NOT TO INTERFERE WITH THE VISIBILITY OF ANY OTHER TRAFFIC CONTROL SIGNS. THEY SHALL BE ERECTED AT THE POINT OF CLOSURE.

THE NOTICE OF CLOSURE SIGNS SHALL BE IN ACCORDANCE WITH CMS 614 AND ODOT SIGN DESIGNS AND MARKINGS MANUAL. EXCEPT THE LAST LINE SHALL READ "OHIO TURNPIKE AND INFRASTRUCTURE COMMISSION".



60"x36' W20-H14

CONSTRUCTION TRAFFIC

ALL CONSTRUCTION TRAFFIC SHALL USE ACCEPTABLE TRUCK ROUTES TO ACCESS THE CONSTRUCTION AREA. USE OF LOCAL RESIDENTIAL STREETS IS STRICTLY PROHIBITED UNLESS ALLOWED IN WRITING BY THE LOCAL ENFORCEMENT AUTHORITY

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PERMANENT PAVEMENT MARKINGS

AFTER PLACING THE SURFACE COURSE. THE CONTRACTOR MAY PLACE PERMANENT PAVEMENT MARKINGS INSTEAD OF PLACING WORK ZONE PAVEMENT MARKINGS, WHICH SHALL BE NON-PERFORMED AT THESE LOCATIONS.

MAINTENANCE OF TRAFFIC CONTROL ZONES

THE CONTRACTOR SHALL BE RESPONSIBLE TO MAINTAIN THE SIGNS, DRUMS AND TEMPORARY PAVEMENT MARKINGS AT THE LOCATIONS DETAILED IN THE PLANS OR SPECIFIED IN THE STANDARD DRAWINGS WHEN THE CONTRACTOR IS NOTIFIED OF DEFICIENCIES HE/SHE SHALL CORRECT THE DEFICIENCIES AS SOON AS POSSIBLE, PREFERABLY WITHIN 12 HOURS AND NO LATER THAN 24 HOURS.

CONTINUOUS ACCESS

THE CONTRACTOR SHALL MAINTAIN SAFE AND ADEQUATE DRIVEWAYS AND WALKWAYS IN ORDER TO PROVIDE CONTINUOUS ACCESS FOR PASSENGER VEHICLES, TRUCKS, AND SAFETY EQUIPMENT TO ALL ADJOINING PROPERTIES.

THE COST FOR ALL MATERIALS, EQUIPMENT, AND LABOR NECESSARY TO PROVIDE CONTINUOUS ACCESS SHALL BE INCLUDED IN THE LUMP SUM BID PRICE TOR ITEM SP 614, MAINTAINING TRAFFIC.

ITEM 614 - ASPHALT CONCRETE FOR MAINTAINING TRAFFIC

THIS ITEM SHALL BE USED TO INSTALL AND REMOVE TEMPORARY ASPHALT RAMPS AT BUTT JOINTS, AND DRAINAGE/UTILITY CASTINGS WHERE REQUIRED. MATERIAL SHALL BE REMOVED PRIOR TO THE PLACEMENT OF THE NEXT COURSE OF ASPHALT. THE FOLLOWING ESTIMATED QUANTITY HAS BEEN CARRIED TO THE GENERAL SUMMARY TO ACCOMPLISH THIS ITEM OF WORK

ITEM 614, ASPHALT CONCRETE FOR MAINTAINING TRAFFIC, 20 CUBIC YARDS

ITEM 614 - REPLACEMENT SIGN

FLAT SHEET SIGNS 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 CHIEF ENGINEER REPLACEMENT SIGNS SHALL BE NEW. OTHER MATERIALS MAY BE IN USED, BUT GOOD, CONDITION SUBJECT TO APPROVAL BY THE CHIEF ENGINEER

PAYMENT FOR THE NEW SIGNS SHALL BE MADE AT THE CONTRACT PRICE PER EACH FOR ITEM 614. REPLACEMENT SIGN. AND SHALL INCLUDE THE COST OF REMOVING AND DISPOSING OF DAMAGED SIGNS HARDWARE AND SUPPORTS, AND PROVIDING THE NECESSARY REPLACEMENT HARDWARE, SUPPORTS, ETC. AN ESTIMATED QUANTITY OF 10 EACH HAS BEEN PROVIDED IN THE GENERAL SUMMARY.

COVERING OF GROUND-MOUNTED SIGNS - GENERAL

WHEN REQUIRED BY OTHER ITEMS OR INCIDENTALLY TO ITEM SP 614, MAINTAINING TRAFFIC, COVER EXISTING GROUND-MOUNTED SIGNS WITH PLYWOOD OR OSB BLANKS (1/2" MINIMUM THICKNESS) COVERING MINIMUM OF 80% OF THE SIGN AREA AND ALL OF THE SIGN LEGEND. THE USE OF LOW QUALITY MATERIALS SUCH AS DUCT TAPE AND BLACK PLASTIC IS NOT PERMITTED.

SURFACE CONDITION SIGNS

ERECT A GROOVED PAVEMENT SIGN (W8-H15) 250 FEET IN ADVANCE OF ANY SECTION OF ROADWAY WHERE TRAFFIC MUST TRAVEL ON A PLANED SURFACE. ENSURE THESE SIGNS ARE IN PLACE BEFORE OPENING THE ROADWAY TO TRAFFIC. ERECT THESE SIGNS ON EACH ENTRANCE RAMP AND AT INTERSECTIONS OF THROUGH ROUTES TO WARN TRAFFIC OF THIS SURFACE CONDITION. PAYMENT SHALL BE INCLUDED IN THE LUMP SUM BID FOR ITEM SP 614, MAINTAINING TRAFFIC

ITEM 630, SIGNING MISC .: ADDITIONAL SIGNS, GROUND MOUNTED, AS DIRECTED BY THE ENGINEER

WHEN ADDITIONAL SIGNING IS NEEDED TO MAINTAIN TRAFFIC, THE CONTRACTOR SHALL FURNISH THE SIGN OR SIGNS AS DIRECTED BY THE ENGINEER. THESE SIGNS SHALL BE GROUND MOUNTED AND MEET ALL THE SPECIFICATIONS OF THE PLAN, PROPOSAL AND CURRENT YEAR CMS.

PAYMENT TOR THIS ITEM SHALL INCLUDE. BUT NOT BE LIMITED TO. THE COST TO FURNISH AND ERECT THE SIGN, INCLUDING DRIVING POSTS OR OTHER APPROVED METHODS OF SIGN SUPPORT, MAINTAINING THE SIGN AND REMOVAL OF THE SIGN. THE FOLLOWING ESTIMATED QUANTITY HAS BEEN CARRIED TO THE GENERAL SUMMARY FOR USE AS DIRECTED BY THE ENGINEER:

ITEM 630 - SIGNING MISC ADDITIONAL SIGNS GROUND MOUNTED 600 SOUARE FEET

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STRUCTURE - GENERAL NOTES

PROPOSED WORK

THE STATE ROUTE 83 BRIDGE OVER THE OHIO TURNPIKE SHALL BE REHABILITATED UNDER THIS CONTRACT. MAJOR WORK INCLUDES REPLACING THE BRIDGE DECK, ABUTMENT SLABS, BEARING DEVICES AND DECK JOINTS, MISCELLANEOUS PATCHING OF SUBSTRUCTURE, SEALING OF CONSTRUCTION JOINTS, PERFORMING CONCRETE WEATHERPROOFING, MAINTENANCE OF TRAFFIC, AND INSTALLING FENCING. DETAILS OF THIS WORK ARE SHOWN IN THE PLANS.

THE STATE ROUTE 252 BRIDGE OVER THE OHIO TURNPIKE SHALL BE REHABILITATED UNDER THIS CONTRACT. MAJOR WORK INCLUDES REPLACING THE BRIDGE DECK, ABUTMENT SLABS AND DECK JOINTS AND INSTALLING FENCING. DETAILS OF THIS WORK ARE SHOWN IN THE PLANS.

DESIGN SPECIFICATIONS

STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES ADOPTED BY THE AMERICAN ASSOCIATION OF STATE HIGHWAY AND TRANSPORTATION OFFICIALS, DATED 2002, AND THE OHIO "SUPPLEMENT" TO THESE SPECIFICATIONS. THE DESIGN LOADING IS HS 20-44 CASE II AND THE ALTERNATE MILITARY LOADING.

THE CLASS OF CONCRETE AND THE GRADES OF REINFORCING STEEL FOR THE CONSTRUCTION ARE AS FOLLOWS:

CONCRETE CLASS S - COMPRESSIVE STRENGTH 4,500 P.S.I. CONCRETE CLASS HP4 - COMPRESSIVE STRENGTH 4,500 P.S.I. REINFORCING STEEL - ASTM A615, A616, A617 - GRADE 60

ORIGINAL CONSTRUCTION PLANS

THE ORIGINAL CONSTRUCTION PLANS, SHOWING THE ORIGINAL ALIGNMENT, PROFILE AND DETAILS OF THE BRIDGE ARE AVAILABLE ON BID EXPRESS WITH THE OTHER BID DOCUMENTS.

EXISTING STRUCTURE VERIFICATION

DETAILS, DIMENSIONS, AND ELEVATIONS SHOWN ON THESE PLANS PERTAINING TO THE EXISTING STRUCTURE HAVE BEEN OBTAINED FROM PLANS OF THE EXISTING STRUCTURE AND/OR 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 SECTION 501.02 OF THE SPECIFICATIONS AND OHIO TURNPIKE INSTRUCTION TO BIDDERS ARTICLE 2.1 AND GENERAL CONDITIONS ARTICLE 1.5.

CONTRACT BID PRICES SHALL BE BASED UPON A RECOGNITION OF THE UNCERTAINTIES DESCRIBED ABOVE AND UPON A PREBID EXAMINATION OF THE EXISTING STRUCTURE BY THE CONTRACTOR. HOWEVER, ALL PROJECT WORK SHALL BE BASED UPON ACTUAL DETAILS, DIMENSIONS, ELEVATIONS, AND SKEW ANGLES WHICH HAVE BEEN FIELD VERIFIED BY THE CONTRACTOR. THE STRUCTURAL STEEL AND STRUCTURAL STEEL DECK JOINTS SHALL NOT BE FABRICATED UNTIL ACTUAL DETAILS, DIMENSIONS, ELEVATIONS, AND SKEW ANGLES HAVE BEEN FIELD VERIFIED BY THE CONTRACTOR.

ANY ADDITIONAL COSTS RESULTING FROM VARIATIONS FROM PLAN DIMENSIONS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR AND NO ADDITIONAL PAYMENT OVER THE UNIT PRICE BID WILL BE AWARDED BY THE COMMISSION.

REMOVAL

GENERAL:

THE CONTRACTOR SHALL REMOVE THE DESIGNATED PORTIONS OF THE EXISTING STRUCTURE TO THE LIMITS SHOWN ON THE PLANS OR TO THE LIMITS AS DIRECTED BY THE ENGINEER. WHEN SO DIRECTED BY THE ENGINEER, THE CONTRACTOR SHALL WET DOWN THE CONCRETE THOROUGHLY DURING REMOVAL OPERATIONS TO PREVENT SPREAD OF DUST. ALL NECESSARY LABOR, EQUIPMENT AND MATERIAL SHALL BE PROVIDED BY THE CONTRACTOR AND INCLUDED BY THE CONTRACTOR AND INCLUDED WITH ITEM SP 202, PORTIONS OF STRUCTURE REMOVED, FOR PAYMENT.

CONCRETE REMOVAL:

CONCRETE SHALL BE REMOVED BY MEANS OF APPROVED PNEUMATIC HAMMERS EMPLOYING POINTED AND BLUNT CHISEL EDGED TOOLS AND/OR BY SAW CUTTING THE CONCRETE DECKS AND REMOVING IN SECTIONS.

CARE SHALL BE TAKEN TO ENSURE AGAINST DAMAGE TO THE STEEL AND CONCRETE MEMBERS WHICH ARE TO BE RETAINED AND TO PRESERVE THE BOND OF THE RETAINED REINFORCEMENT TO THE EXISTING CONCRETE. THESE BARS SHALL BE CLEANED OF ALL CONCRETE FRAGMENTS AND FOREIGN MATTER. PNEUMATIC HAMMERS SHALL NOT BE PLACED IN DIRECT CONTACT WITH THE BARS; HAND TOOLS SHALL BE EMPLOYED FOR FINAL CLEANING. DAMAGED AREAS OF REINFORCEMENT THAT ARE TO REMAIN SHALL BE CUT AND STRESS TRANSFER ACCOMPLISHED BY EITHER A LAPPED OR MECHANICAL SPLICE. ANY ADDITIONAL REINFORCEMENT OR MECHANICAL SPLICES SHALL BE PROVIDED BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE COMMISSION. OTHER EXISTING REINFORCEMENT WITHIN THE REMOVAL LIMITS SHALL BE REMOVED AND DISPOSED OF.

DISPOSAL OF REMOVED MATERIAL:

THE CONTRACTOR SHALL NOT PERMIT ANY REMOVED MATERIAL TO DROP TO THE GROUND. MEANS SHALL BE PROVIDED FOR CATCHING REMOVED MATERIAL. THE CONTRACTOR SHALL SUBMIT TO THE ENGINEER FOR APPROVAL DETAILS OF THE METHODS TO BE USED FOR REMOVING AND COLLECTING THE MATERIAL. ALL CONCRETE, STEEL, REINFORCING STEEL, ASPHALT, ETC. REMOVED FROM THE STRUCTURE, UNLESS SPECIFIED, SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND SHALL BE PROMPTLY REMOVED BY HIM FROM THE SITE.

UNDER NO CIRCUMSTANCES SHALL THE MATERIAL BE PERMITTED TO REMAIN ON THE PREMISES, RIGHT OF WAY OR STREETS PENDING DISPOSAL OF SAME OR FOR ANY OTHER PURPOSES, UNLESS OTHERWISE SPECIFIED BY THE ENGINEER.

CUTTING OR BENDING OF REINFORCING BARS

ANY CUTTING OR BENDING OF BARS NECESSARY TO ACCOMMODATE ANY ESSENTIAL ELEMENT OF WORK RELATED TO THE PROJECT, SHALL BE INCLUDED IN THE UNIT PRICE BID FOR ITEM 509 REINFORCING STEEL REPLACEMENT OF EXISTING REINFORCING STEEL AND/OR ITEM SP 509 EPOXY COATED REINFORCING STEEL UNLESS OTHERWISE NOTED.

DIMENSIONS

DIMENSIONS GIVEN ARE MEASURED HORIZONTALLY AND AT 60° F UNLESS OTHERWISE NOTED. DIMENSIONS GIVEN FOR THE EXISTING STRUCTURE ARE FROM THE ORIGINAL CONSTRUCTION PLANS. SOME VARIATION FROM PLAN DIMENSIONS ARE EXPECTED. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROPER FIT-UP BETWEEN THE PROPOSED AND EXISTING CONSTRUCTION. ADEQUATE MEASUREMENTS SHALL BE MADE IN THE FIELD PRIOR TO THE FABRICATION OR INSTALLATION OF ANY PART TO ENSURE THAT ALL PARTS CAN BE PROPERLY ASSEMBLED AS SPECIFIED IN THE PLANS. ANY ADDITIONAL COST RESULTING FROM VARIATIONS FROM PLAN DIMENSIONS IS THE RESPONSIBILITY OF THE CONTRACTOR AND NO ADDITIONAL PAYMENT WILL BE AWARDED BY THE COMMISSION.

REPAIR OF EXISTING CONCRETE ELEMENTS

EXISTING REINFORCED CONCRETE STRUCTURE ELEMENTS WHICH ARE INCORPORATED IN THIS CONSTRUCTION PROJECT ARE TO BE MODIFIED AND/OR REPAIRED. A CONDITION SURVEY WAS PERFORMED IN DECEMBER 2014. REPAIR AREAS WERE DETERMINED BY VISUAL INSPECTION. THE STRUCTURAL ELEMENTS INSPECTED INCLUDE CONCRETE ABUTMENTS AND PIERS (EXPOSED SURFACES ONLY). THE RECORDS OF THIS INSPECTION ARE THE BASIS FOR THE REPAIR RECOMMENDATIONS AS DETAILED IN THE PLANS.

ITEM 509 - REINFORCING STEEL, REPLACEMENT OF EXISTING REINFORCING STEEL

REPLACE ALL EXISTING REINFORCING BARS DEEMED BY THE ENGINEER TO BE UNUSABLE BECAUSE OF CORROSION. THE COMMISSION WILL MEASURE THE REPLACEMENT REINFORCING STEEL BY THE NUMBER OF POUNDS ACCEPTED IN PLACE. AN ESTIMATED QUANTITY OF 100 POUNDS HAS BEEN INCLUDED FOR THIS WORK. 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 REMOVAL OPERATIONS WITH NEW EPOXY COATED REINFORCING STEEL OF THE SAME SIZE AT NO COST TO THE COMMISSION.

ITEM SP 536 - CONCRETE WEATHERPROOFING

ITEM SP 536 - CONCRETE WEATHERPROOFING SHALL BE APPLIED TO THE FOLLOWING EXPOSED CONCRETE SURFACES OF THE BRIDGE:

- THE TOP OF NEW ABUTMENT SLABS AND NEW SUPERSTRUCTURE SLABS.
- ALL SLAB SIDE EDGES.
- THE BOTTOM SURFACE OF THE NEW SUPERSTRUCTURE SLAB FROM THE SLAB SIDE EDGE TO THE EXTERIOR STRINGER FLANGE.
- ALL EXPOSED CONCRETE SURFACES OF ALL ABUTMENTS AND PIERS. SEALING SHALL NOT BE DONE UNTIL ALL CONCRETE PATCHING REPAIRS HAVE BEEN COMPLETED AND CURED.

CARE SHALL BE TAKEN NOT TO APPLY WEATHERPROOFING ON CONSTRUCTION JOINT SURFACES, SURFACES TO RECEIVE JOINT SEALER OR FASCIA BEAM PAINT.

CONCRETE PARAPETS

PARAPET FORMS:

FORMS FOR THE BRIDGE PARAPETS AND SLAB EDGES SHALL BE IN ACCORDANCE WITH 508.02 OF THE SPECIFICATIONS AND THE FOLLOWING:

WHEN WOOD FORMS ARE USED THEY SHALL PROVIDE A SMOOTH SURFACE OF UNIFORM TEXTURE AND COLOR SUBSTANTIALLY EQUAL TO THAT WHICH WOULD BE OBTAINED WITH THE USE OF NEW PLYWOOD CONFORMING TO THE NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY PRODUCT STANDARD PSI FOR EXTERIOR B-B CLASS I PLYWOOD.

STANDARD PSI FOR EXTERIOR B-B CLASS I PLYWOOD.

FORMS SHALL BE OF A CONSTRUCTION WHICH WOULD ALLOW FOR THEIR REMOVAL WITHIN 24 HOURS OF THE CONCRETE PLACEMENT WITHOUT CAUSING DAMAGE TO THE CONCRETE.

CONSTRUCTION JOINTS

CONSTRUCTION JOINT SURFACES SHALL BE FREE FROM OIL, LAITANCE, FORM RELEASE AGENT, OR ANY OTHER MATERIAL THAT WOULD PREVENT BONDING TO THE CONCRETE SURFACE. ALL LAITANCE AND OTHER CONTAMINANTS SHALL BE REMOVED BY HIGH PRESSURE WATER BLASTING WITH A MINIMUM PRESSURE OF 5,000 P.S.I. HOWEVER, WATER BLASTING SHALL NOT BE REQUIRED WHERE EXISTING CONCRETE HAS BEEN ROUGHENED BY JACKHAMMERS DURING CONCRETE REMOVAL OPERATIONS. SURFACES SHALL BE THOROUGHLY DRENCHED WITH CLEAN WATER AND

ALLOWED TO DRY TO A DAMP CONDITION FREE OF STANDING WATER BEFORE PLACING CONCRETE. PREPARATION OF CONSTRUCTION JOINT SURFACES SHALL NOT BE MEASURED FOR PAYMENT. THE COST THEREOF SHALL BE INCLUDED IN THE CONTRACT PRICE OF THE PERTINENT CONCRETE ITEMS.

EXISTING RIGHT OF WAY FENCE

IT IS THE INTENT OF THE PROJECT FOR THE EXISTING RIGHT OF WAY FENCE NEAR THE BRIDGE TO REMAIN, HOWEVER IF THE CONTRACTOR DEEMS IT NECESSARY TO REMOVE THE FENCE FOR HIS OPERATIONS AS APPROVED BY THE ENGINEER, THE CONTRACTOR SHALL CAREFULLY REMOVE THE FENCE AND REINSTALL THE FENCE IN ACCORDANCE WITH ITEM 607. IF THE FENCE BECOMES DAMAGED DUE TO THE CONTRACTORS OPERATIONS THE FENCE SHALL BE REPLACED AT NO COST TO THE COMMISSION.

ALL LABOR, MATERIALS, EQUIPMENT AND INCIDENTALS NECESSARY TO COMPLETE THE WORK SHALL BE CONSIDERED INCIDENTAL TO THE PROJECT AND NO ADDITIONAL COMPENSATION SHALL BE GRANTED.

EROSION CONTROL

IT IS THE INTENT OF THE PROJECT TO NOT DISTURB ANY SEEDED AREAS AND/OR DRAINAGE ELEMENTS. ANY WORK INVOLVING SEEDED AREAS, DRAINAGE ELEMENTS OR EROSION CONTROL SHALL BE CONSIDERED INCIDENTAL TO THE PROJECT COST AND SHALL BE REPAIRED/PROTECTED AS DIRECTED BY THE ENGINEER.

ALL LABOR, MATERIALS, EQUIPMENT AND INCIDENTALS NECESSARY TO COMPLETE THE WORK SHALL BE CONSIDERED INCIDENTAL TO THE PROJECT AND NO ADDITIONAL COMPENSATION SHALL BE GRANTED.

ALTERNATE DESIGNS - STATE ROUTE 252 OVER THE OHIO TURNPIKE BRIDGE

THERE ARE ALTERNATE PARAPET DESIGNS ON THE STATE ROUTE 252 OVER THE OHIO TURNPIKE BRIDGE (MP 156.9) WHICH INVOLVE AESTHETIC TREATMENT OF THE PARAPET INCLUDING USE OF A FORMLINER AND AN EPOXY-URETHANE COATING. ALL PAY ITEMS, WITH THE EXCEPTION OF THOSE RELATED TO THE PARAPETS, ARE INCLUDED IN THE BASE BID. THE PAY ITEMS RELATED TO THE PARAPETS ARE INCLUDED AS ALTERNATE BID ITEMS. THE CONTRACTOR SHALL SUBMIT BIDS FOR THE BASE BID ITEMS AS WELL AS EACH OF THE ALTERNATES. AFTER OPENING OF THE BIDS, THE COMMISSION WILL SELECT ONE OF THE ALTERNATES TO PROCEED TO CONSTRUCTION.

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(NEDAL NOTES	DESIGNED	CHECKED	NO	REVISIONS	BY D	DA TE DESIGN	I AGENCY
13	PROJECI 43-20-10	5	NERAL NULES	CAC	CMM					
06				DRAWN	IN CHARGE	•		•		
)	DAIE: 2/19/2019	M.P. 150.5 & 156.9	LORAIN & CUYAHOGA COUNTY	CAC	ADΥ			•		
OHIO	OHIO TU	IRNPIKE	AND INFRAST	TRU	CTI		E COM	Σ	NOISS	ОНЮ



is - SR 83 Site Plan dwa: 3/15/22 -

		-		
	EXISTING STRUCTURE			
	TYPE: CONTINUOUS AND SIMPLE SPAN STEEL BEAMS WITH REINFORCED CONCRETE DECK, SUBSTRUCTURE, CELLULAR ABUTMENTS, CAP AND COLUMN TYPE PIERS	4 <i>GENCY</i>		UF
	SPANS: 28'-8"±, 65'-6 ¾ "±, 65'-6 ¾ "± AND 28'-8"±	SIGNA		7
₩ORK 5+46.00 ₫ ₫ ₫ ₫ ₫	ROADWAY: 29'-4"± TOE/TOE CURB WITH ONE 1'-6" PARAPET AND ONE 4'-6" SIDEWALK WITH A 1'-0" PARAPET	DE		Ō
	ALIGNMENT: TANGENT			S
CH \	SKEW: 2°29'06.6"	NATE -		S
	WEARING SURFACE: MONOLITHIC CONCRETE	BY D		
	LOADING: CF-30			2
	BUILT: 1954			Σ
	STRUCTURE FILE NUMBER: 4729757	SNO		0
TI I I I	PROPOSED STRUCTURE	REVISIO	. .	U U
SLAB STA. 16+21.11	PROPOSED WORK: REINFORCED CONCRETE DECK REPLACEMENT WITH SINGLE SLOPE PARAPET WITH FENCE, SIDEWALK AND 1'-0" WIDE PARAPET WITH FENCE			К Ш
	TYPE: CONTINUOUS AND SIMPLE SPAN, STEEL BEAMS	Ϋ́,	· ·	
	WITH COMPOSITE REINFORCED CONCRETE DECK, SUBSTRUCTURE, CELLULAR ABUTMENTS, CAP AND COLUMN TYPE PIERS	HECKED	CHARGE ADY	F
	SPANS: 28'-8"±, 65'-6 ¾ "±, 65'-6 ¾ "± AND 28'-8"±		_ ₹	12
	ROADWAY: 29'-8" TOE/TOE CURB WITH ONE 1'-6" PARAPET AND ONE 6'-0" SIDEWALK WITH A 1'-0" PARAPET	DESIGNED		RU N
	ALIGNMENT: TANGENT	ŀ		
ANCE	SPANS: 2°29'06.6"		JNTY	ι.
REQUIRED 14'-6"	APPROACH SLAB: AS-1-15		COL	
14'-6"	WEARING SURFACE: 1" MONOLITHIC CONCRETE	Ц	ERAIN	
	LOADING: HS20-44 CASE II AND ALTERNATE MILITARY LOADING	PROF	RNPIK LO	
	COORDINATES: LATITUDE: 41°22' 48" N LONGITUDE: 82° 01' 06" W	AND	UT OIH	Z
	L	A	ERC	
		<u>٦</u>	20	Z
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770		83 GE	ATE R(
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750			M.F	
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730		43-2	2/19/20	0
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SP 519	REPAIR A	REAS
MEASURED QUANTITY (SQ. FT.)	CONTINGENT QUANTITY (SQ. FT.)	TOTAL (SQ. FT.)
ŀ	REAR ABUTMENT	
10	5	15
FO	RWARD ABUTMEN	Т
0	5	5
	TOTAL =	20

SP 516A	REPAIR	AREAS
MEASURED QUANTITY (FOOT)	CONTINGENT QUANTITY (FOOT)	TOTAL (FOOT)
	REAR ABUTMENT	
3	1	4
FO	RWARD ABUTMENT	Γ
0	0	0
	TOTAL =	4

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אַצ 3 1	0JECI 43-20-10		CMM	CAC	•	•		
/1 3		STATE ROUTE 83 OVER OHIO TURNPIKE	DRAWN	IN CHARGE		•		
_ 2	JAIE: 2/19/2019	M.P. CUYAHOGA LORAIN COUNTY	CMM	ΑDΥ				
	UT OIHC	RNPIKE AND INFRASI	L RU	CTL	JR	Ĭ	SSION	

NOTES:

- 1. THE AREAS OF REPAIR SHOWN ARE APPROXIMATE AND ARE BASED ON A FIELD INSPECTION. FINAL DETERMINATION OF THE AREAS TO BE REPAIRED WILL BE MADE BY THE ENGINEER AT THE TIME OF CONSTRUCTION.
- 2. THE TOTAL CONCRETE PATCHING AND CRACK REPAIR AREAS INDICATED ON THE DETAILS HAVE BEEN INCREASED TO ACCOUNT FOR ANY FURTHER DETERIORATION THAT MAY HAVE OCCURRED SINCE THE FIELD INSPECTION

LEGEND



- DENOTES AREAS TO BE REPAIRED AS PER ITEM SP 519

- DENOTES CRACKS TO BE REPAIRED AS PER ITEM SP 516A





9 SQ. FT. 9 SQ. FT. 15 SQ. FT. CONCRETE BARRIER (TYP.) VIEW A-A VIEW B-B



SP 519	REPAIR A	AREAS	
MEASURED QUANTITY (SQ. FT.)	CONTINGENT QUANTITY (SQ. FT.)	TOTAL (SQ. FT.)	Λ
49	10	59	

SP 516A	A REPAIR	AREAS
MEASURED QUANTITY (LIN. FT.)	CONTINGENT QUANTITY (LIN. FT.)	TOTAL (LIN. FT.)
0	0	0

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(DESIGNED	CHECKED	NO.	REVISIONS	BY DATE	DESIGN AGENCY	
(1 3	4	PROJECI 43-20-10		CMM	CAC			•		
4	/ 1		STATE ROUTE 83 OVER OHIO TURNPIKE	DRAWN	IN CHARGE			•		
)	2	DAIE: 2/19/2019	M.P. 150.5 LORAIN COUNTY	CMM	ADY			•		
OHIO					ŀ					OHO
URNPIKE			JKNPINE AND INFRAU	D N N	ר ר ר	Y		N N	NON	TURNPIKE
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NOTES:

- 1. THE AREAS OF REPAIR SHOWN ARE APPROXIMATE AND ARE BASED ON A FIELD INSPECTION. FINAL DETERMINATION OF THE AREAS TO BE REPAIRED WILL BE MADE BY THE ENGINEER AT THE TIME OF CONSTRUCTION.
- 2. THE TOTAL CONCRETE PATCHING AND CRACK REPAIR AREAS INDICATED ON THE DETAILS HAVE BEEN INCREASED TO ACCOUNT FOR ANY FURTHER DETERIORATION THAT MAY HAVE OCCURRED SINCE THE FIELD INSPECTION

LEGEND



- DENOTES AREAS TO BE REPAIRED AS PER ITEM SP 519

- DENOTES CRACKS TO BE REPAIRED AS PER ITEM SP 516A



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9 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	(07 00 07 TOTI 000		DESIGNED	CHECKED	NO.	REVISIONS	BY L	A TE DESIG	SN AGENCY
9 0 1 Date: 2/19/2019 STATE ROUTE 83 OVER OHIO TURNPIKE DRAIN W CHARGE C CARREE C CARREE <thc carree<="" th=""> C CARREE <t< th=""><th>1</th><th>5</th><th>PROJECT 43-20-10</th><th>O.K. OJ FIER J REFAIR DE LAILO</th><th>CMM</th><th>CAC</th><th></th><th></th><th></th><th></th><th></th></t<></thc>	1	5	PROJECT 43-20-10	O.K. OJ FIER J REFAIR DE LAILO	CMM	CAC					
	5	/1		STATE ROUTE 83 OVER OHIO TURNPIKE	DRAWN	IN CHARGE	•		•		
)	2	DAIE: 2/19/2019	M.P. 150.5 LORAIN COUNTY	CMM	ADY			•		
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									TOP (OF PAV	EMEN	TELEV	ATIONS	S								
		REAF	RABUTMENT			SPAN 1			S	PAN 2				SPAN	3			SPAN	4	F	ORWARD AB	UTMENT
LOCATIO	DN .	BEGIN ABUTMENT SLAB	1/2 PT.	END ABUTMENT SLAB	€ BEARING REAR ABUTMENT	1/2 PT.	€ REAR BEARING PIER 1	€ FORWARD BEARING PIER 1	1/4 PT.	1/2 PT.	3/4 PT.	€ PIER 2	1/4 PT.	1/2 PT.	3/4 PT.	€ REAR BEARING PIER 3	€ FORWARD BEARING PIER 3	1/2 PT.	€ BEARING FORWARD ABUTMENT	BEGIN ABUTMENT SLAB	1/2 PT.	END ABUTMENT SLAB
LEFT SLAB	STA.	13+94.64	13+99.96	14+05.27	14+06.52	14+20.61	14+34.69	14+35.69	14+51.96	14+68.22	14+84.49	15+00.75	15+17.02	15+33.28	15+49.55	15+65.81	15+66.81	15+80.90	15+94.98	15+96.22	16+01.54	16+06.86
FASCIA	ELEV.	756.41	756.47	756.53	756.54	756.68	756.80	756.81	756.91	756.99	757.03	757.04	757.03	756.98	756.90	756.80	756.79	756.67	756.53	756.51	756.45	756.39
LEFT GUTTER	STA.	13+94.57	13+99.88	14+05.20	14+06.45	14+20.53	14+34.62	14+35.62	14+51.88	14+68.15	14+84.41	15+00.68	15+16.94	15+33.21	15+49.47	15+65.74	15+66.74	15+80.82	15+94.91	15+96.15	16+01.47	16+06.79
LINE	ELEV.	756.41	756.47	756.53	756.54	756.68	756.80	756.81	756.91	756.98	757.03	757.04	757.03	756.98	756.90	756.80	756.79	756.67	756.53	756.51	756.45	756.39
EXISTING	STA.				14+06.37	14+20.46	14+34.54	14+35.54	14+51.81	14+68.07	14+84.34	15+00.60	15+16.87	15+33.13	15+49.40	15+65.66	15+66.66	15+80.75	15+94.83			
BEAM A	ELEV.				756.57	756.71	756.83	756.83	756.94	757.01	757.06	757.07	757.06	757.01	756.93	756.82	756.82	756.70	756.56			
EXISTING	STA.				14+06.04	14+20.13	14+34.21	14+35.21	14+51.48	14+67.74	14+84.01	15+00.27	15+16.54	15+32.80	15+49.07	15+65.33	15+66.33	15+80.42	15+94.50			
BEAM B	ELEV.				756.69	756.83	756.94	756.95	757.06	757.13	757.18	757.19	757.17	757.13	757.05	756.95	756.94	756.82	756.68			
€ STATE	STA.	13+93.89	13+99.21	14+04.52	14+05.77	14+19.86	14+33.94	14+34.94	14+51.21	14+67.47	14+83.74	15+00.00	15+16.27	15+32.53	15+48.80	15+65.06	15+66.06	15+80.15	15+94.23	15+95.47	16+00.79	16+06.11
ROUTE 83	ELEV.	756.64	756.71	756.77	756.78	756.92	757.04	757.05	757.15	757.23	757.27	757.29	757.27	757.23	757.15	757.05	757.04	756.92	756.78	756.77	756.71	756.64
EXISTING	STA.				14+05.71	14+19.80	14+33.88	14+34.88	14+51.15	14+67.41	14+83.68	14+99.94	15+16.21	15+32.47	15+48.74	15+65.00	15+66.00	15+80.09	15+94.17			
BEAM C	ELEV.				756.76	756.90	757.02	757.02	757.13	757.21	757.25	757.27	757.25	757.21	757.13	757.03	757.02	756.90	756.76			
EXISTING	STA.				14+05.38	14+19.47	14+33.55	14+34.55	14+50.82	14+67.08	14+83.35	14+99.61	15+15.88	15+32.14	15+48.41	15+64.67	15+65.67	15+79.76	15+93.84			
BEAM D	ELEV.				756.64	756.78	756.90	756.90	757.01	757.09	757.13	757.15	757.13	757.09	757.01	756.91	756.90	756.78	756.64			
RIGHT	STA.	13+93.28	13+98.60	14+03.91	14+05.16	14+19.25	14+33.33	14+34.33	14+50.60	14+66.86	14+83.13	14+99.39	15+15.66	15+31.92	15+48.19	15+64.45	15+65.45	15+79.54	15+93.62	15+94.86	16+00.18	16+05.50
GUTTER LINE	ELEV.	756.42	756.48	756.54	756.55	756.70	756.81	756.82	756.93	757.01	757.05	757.07	757.05	757.01	756.94	756.83	756.82	756.71	756.57	756.55	756.50	756.43
EXISTING	STA.				14+05.05	14+19.14	14+33.22	14+34.22	14+50.49	14+66.75	14+83.02	14+99.28	15+15.55	15+31.81	15+48.08	15+64.34	15+65.34	15+79.43	15+93.51			
BEAM E	ELEV.				756.55	756.70	756.81	756.82	756.93	757.01	757.05	757.07	757.05	757.01	756.94	756.83	756.82	756.71	756.57			
RIGHT SLAB	STA.	13+92.98	13+98.29	14+03.61	14+04.86	14+18.94	14+33.03	14+34.03	14+50.29	14+66.56	14+82.82	14+99.09	15+15.35	15+31.62	14+47.88	15+64.15	15+65.15	15+79.23	15+93.32	15+94.56	15+99.88	16+05.20
FASCIA	ELEV.	756.41	756.48	756.54	756.55	756.69	756.81	756.82	756.93	757.00	757.05	757.07	757.06	757.01	756.94	756.83	756.83	756.71	756.57	756.56	756.50	756.44



DEFLECTION DUE TO CONCRETE



		AB	BUTME	NT RE	INFO	RCIN	IG SC	CHEL	DULE	•		
BAR	Λ	O. REQUIRE	Ð	BAR	BAR			DIMEN	ISIONS			WEIGHT
MARK	REAR	FORWARD	TOTAL	LENGTH	TYPE	А	В	С	D	E	INCR.	LBS.
A501	18	18	36	16'-9"	STR							629
A502	91	91	182	10'-0"	STR							1,898
A503	4	4	8	5'-9"	STR							48
A504	4	4	8	5'-8"	14	1'-10"	2'-5"	1'-5"				47
A505	4	4	8	6'-0"	STR							50
A506	21	21	42	6'-6"	STR							285
A507	21	21	42	1'-10"	5	11"	7"					80
A508	21	21	42	1'-11"	5	1'-0"	7"					84
A509	18	18	36	23'-3"	STR							873
A601	16	16	32	2'-5"	4	1'-0"	1'-7"					116
A602	2 SERIES OF 9	2 SERIES OF 9	4 SERIES OF 9	3'-11" TO 4'-9"	4	1'-0"	3'-1" TO 3'-11"					234
A603	21	21	42	8'-9"	30	8"	8"	3'-6"	3'-11"			552
A701	76	76	152	10'-0"	STR							3,107
					ТО	TAL ABUT	TMENT RE	INFORCI	NG STEE	L WEIGH	T (LBS.) =	8,004

MARK	110.	BAR	BAR			DIMEN	ISIONS			WEIGH
	REQUIRED	LENGTH	TYPE	A	В	С	D	E	INCR.	LBS
<i>S501</i>	380	17'-0"	STR							6,73
<i>S502</i>	380	17'-7"	1	17'-0"						6,96
<i>S503</i>	760	5'-5"	1	4'-10"						4,294
<i>S504</i>	190	29'-0"	STR							5,74
<i>S505</i>	468	30'-0"	STR							14,64
<i>S506</i>	95	20'-3"	STR							2,000
<i>S507</i>	88	33'-6"	STR							3,075
<i>S508</i>	380	1'-10"	5	11"	7"					727
S509	380	1'-11"	5	1'-0"	7"					760
S510	380	6'-6"	STR							2,576
S511	380	7'-3"	12	3'-3"	3'-0"	10"				2,87
S512	20	6'-9"	STR							141
S513	12	9'-0"	STR							113
S514	380	23'-3"	STR							9,21
S515	380	23'-10"	1	23'-3"						9,440
S516	6	9'-6"	STR							59
S601	380	8'-9"	30	8"	8"	3'-6"	3'-11"			4,994
S602	12	17'-0"	STR							306
S603	10	6'-9"	STR							101
S604	12	9'-0"	STR							162
S605	12	23'-3"	STR							419
S606	380	2'-5"	4	1'-0"	1'-7"					1,37
S607	380	3'-4"	10	1'-0"	1'-1"	1'-7"	1			1,90
S608	3	9'-6"	STR							43
		. 7	OTAL SUF	PERSTRUC	TURE RE	EINFORCI	NG STEE	L WEIGH	T (LBS.) =	78,69
			ТС	TAL ABUT	MENT R	EINFORCI	NG STEE	L WEIGH	T (LBS.) =	8,00

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BAR BENDING DIAGRAMS





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e Plans - SR 83 Superstructure.dwg: 3/15/22 - 2:17pm

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$\frac{2}{3}$	5 PROJECI 43-20-10		CAC	CMM					
2		STATE ROUTE 83 OVER OHIO TURNPIKE	DRAWN	IN CHARGE			•		
)	5 DAIE: 2/19/2019	M.P. 150.5 LORAIN COUNTY	CAC	ADY			•		
OHIO	OHIO TU	IRNPIKE AND INFRAST	-RU	CT		E COMI	Ī	NOISS	OHIO

NOTES:

- 1. ALL REINFORCING BARS SHALL BE EPOXY COATE
- 2. BAR DIMENSIONS ARE OUT TO OUT UNLESS OTHERWISE INDICATED.
- 3. BAR SIZE IS INDICATED IN THE BAR MARK BY THE FIRST DIGIT.
- 4. EPOXY COATED REINFORCING STEEL SUPPORT: IN ACCORDANCE WITH THE REQUIREMENTS OF SP505 AND 509.09, THE TOP AND BOTTOM MATS OF THE LONGITUDINAL AND TRANSVERSE EPOXY COATED REINFORCING STEEL SHALL BE SUPPORTED BY APPROVED EPOXY COATED DEVICES WITH SPACING NOT EXCEEDING 3'.0" CENTERS IN EACH DIRECTION. BROKEN CONCRETE, BRICKS, ETC. SHALL NOT BE USED FOR SUPPORT OF REINFORCING STEEL.



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MGS TYPE B	EXISTING STRUCTURE				OHIO
OR ASSEMBLY	TYPE: CONTINUOUS AND SIMPLE SPAN STEEL BEAMS WITH REINFORCED CONCRETE DECK, SUBSTRUCTURE, CELLULAR ABUTMENTS, CAP AND COLUMN TYPE PIERS	ENCY			
	SPANS: 27'-11"±, 65'-9"±, 65'-9"± AND 27'-11"±	IGN AG			-
	ROADWAY: 28'-0"± TOE/TOE CURB WITH 4'-0" SIDEWALKS WITH 1'-0" PARAPETS	DES			6
END WORK	ALIGNMENT: TANGENT				
STA. 6+36.00	SKEW: 5°01'15"				S S
_ ∳ ╇	WEARING SURFACE: MONOLITHIC CONCRETE	DATE	11/16		<u></u>
PPROACH	LOADING: CF-30	BΥ	CAC		5
STA. 6+21.70	BUILT: 1954				
	STRUCTURE FILE NUMBER: 1829203		_		
	PROPOSED STRUCTURE	REVISIONS	DDENDUM 1		
MGS TYPE T RASSEMBLY	PROPOSED WORK: REINFORCED CONCRETE DECK REPLACEMENT WITH SIDEWALKS AND 1'-0" WIDE PARAPET WITH FENCE		AI		Ш
ISTING OVERHEAD POWER LINE	TYPE: CONTINUOUS AND SIMPLE SPAN, STEEL				
(TO REMAIN) \square	BEAMS WITH COMPOSITE REINFORCED CONCRETE DECK, SUBSTRUCTURE,	N	-	· ·	
	CELLULAR ABUTMENTS, CAP AND COLUMN TYPE PIERS	HECKED	OMM	CHARGE ADY	F
	SPANS: 27'-11"±, 65'-9"±, 65'-9"± AND 27'-11"±	Ö -	_	₹ 1	1 2
	KUADWAY: 28'-0" IOE/IOE CURB WITH 5'-0" SIDEWALKS AND 1'-0" PARAPETS	ESIGNED	CAC		2
	ALIGNMENT: TANGENT	DE	_		
	SKEW: 5°01'15"			Ę	5
	WEARING SURFACE: 1" MONOLITHIC CONCRETE			cou	
	LOADING: HS20-44 CASE II AND ALTERNATE MILITARY LOADING		Ľ,	ЭĞ	
	COORDINATES: LATITUDE: 41°21' 24" N LONGITUDE: 81° 54' 18" W			CUYAH	
					N N
				252 OVE	N
800				JTE .	
			5	ROL	Ш
790			707	TATE	X
780 -		6	2 (0	ດ ເ	
				. 156.	Z
770				M.P	
		F			
760			29	6	F
			2-20	1/201	
750 <u>No</u>	<u>DTES:</u>	ן י	4	2/19	
740 0	RIGINAL CONSTRUCTION PLANS	{	5	ш	II
<i>140 O</i>	RIGINAL CONSTRUCTION PLANS, SHOWING THE		Ş	DAT	O
	RIGHWAL ALIGHWIENT, PROFILE AND DETAILS OF THE RIDGE ARE AVAILABLE FOR INSPECTION AT THE	Ľ	Ţ		
H	ING I GAINFIRE AND INFRASTRUCTURE COMMISSION EADQUARTERS.		1 /	14	
68 RI	22 PROSPECT STREET FRFA, OHIO 44017	Γ	2	3	
(4	40) 234-2081	lf	3	6)	OHIO
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(07 00 07 IOL	C D 257 ADUITMENT DEDAID DETAU C	DESIGNED	CHECKED	NO.	REVISIONS	BY L	DATE	DESIGN AGENCY
2 3	О 2 3	JECI 43-20-10		CMM	CAC			•		
5	: /1		STATE ROUTE 252 OVER OHIO TURNPIKE	DRAWN	IN CHARGE		•	•		
)	รัก 4	VIE: 2/19/2019	M.P. 156.9 CUVAHOGA COUNTY	CMM	ADΥ	•		•		
OHIO	0	HIO TU	RNPIKE AND INFRAST	IRU	CTL	R R	E COMI	Σ	SSIO	OHIO TURNPIKE

SP 51	9 REPAIR AR	EAS
MEASURED QUANTITY (SQ. FT.)	CONTINGENT QUANTITY (SQ. FT.)	TOTAL (SQ. FT.)
	REAR ABUTMENT	-
28	21	49
FO	RWARD ABUTMEN	Г
9	6	15
	TOTAL =	64

SP 516	SA REPAIR AF	REAS
MEASURED QUANTITY (LIN. FT.)	CONTINGENT QUANTITY (LIN. FT.)	TOTAL (LIN. FT.)
	REAR ABUTMENT	
0	15	15
FO	RWARD ABUTMEN	Г
0	15	15
	TOTAL =	30

NOTES:

- 1. THE AREAS OF REPAIR SHOWN ARE APPROXIMATE AND ARE BASED ON A FIELD INSPECTION. FINAL DETERMINATION OF THE AREAS TO BE REPAIRED WILL BE MADE BY THE ENGINEER AT THE TIME OF CONSTRUCTION.
- 2. THE TOTAL CONCRETE PATCHING AND CRACK REPAIR AREAS INDICATED ON THE DETAILS HAVE BEEN INCREASED TO ACCOUNT FOR ANY FURTHER DETERIORATION THAT MAY HAVE OCCURRED SINCE THE FIELD INSPECTION

- DENOTES AREAS TO BE REPAIRED AS PER ITEM SP 519



ans - SR 252 Renair Details dwo: 3/15/22 - 2·18

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(DESIGNED	CHECKED	NO	REVISIONS	Bγ	DATE	DESIGN AGENCY	_
2 3	+ PROJECI 43-20-10		CMM	CAC			•			
6	71	STATE ROUTE 252 OVER OHIO TURNPIKE	DRAWN	IN CHARGE			•			
)	4 DAIE: 2/19/2019	M.P. 156.9 CUYAHOGA COUNTY	CMM	ADY	•		•			
OHIO	OHIO TU	RNPIKE AND INFRAST	RU(CTI	JR	LE COM	Σ	SSIC	N	

NOTES:

- 1. THE AREAS OF REPAIR SHOWN ARE APPROXIMATE AND ARE BASED ON A FIELD INSPECTION. FINAL DETERMINATION OF THE AREAS TO BE REPAIRED WILL BE MADE BY THE ENGINEER AT THE TIME OF CONSTRUCTION.
- 2. THE TOTAL CONCRETE PATCHING AND CRACK REPAIR AREAS INDICATED ON THE DETAILS HAVE BEEN INCREASED TO ACCOUNT FOR ANY FURTHER DETERIORATION THAT MAY HAVE OCCURRED SINCE THE FIELD INSPECTION

- DENOTES AREAS TO BE REPAIRED AS PER ITEM SP 519

- DENOTES CRACKS TO BE REPAIRED AS PER ITEM SP 516A



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(1			DESIGNED	CHECKED	NO.	REVISIONS	BΥ	DATE	DESIGN AGENCY	
23	5	PROJECI 43-20-10		CMM	CAC				•		
6	1		STATE ROUTE 252 OVER OHIO TURNPIKE	DRAWN	IN CHARGE	•		•			
)	4	UAIE: 2/19/2019	M.P. 156.9 CUNTY CUYAHOGA COUNTY	CMM	ADΥ						
OHIO		OHIO TU	RNPIKE AND INFRAST	RU.	CT		RE COM	Σ	ISS	NOI	OHIO TURNPIKE

NOTES:

-111-

- 1. THE AREAS OF REPAIR SHOWN ARE APPROXIMATE AND ARE BASED ON A FIELD INSPECTION. FINAL DETERMINATION OF THE AREAS TO BE REPAIRED WILL BE MADE BY THE ENGINEER AT THE TIME OF CONSTRUCTION.
- 2. THE TOTAL CONCRETE PATCHING AND CRACK REPAIR AREAS INDICATED ON THE DETAILS HAVE BEEN INCREASED TO ACCOUNT FOR ANY FURTHER DETERIORATION THAT MAY HAVE OCCURRED SINCE THE FIELD INSPECTION

- DENOTES AREAS TO BE REPAIRED AS PER ITEM SP 519



UNDERSIDE OF CAP







SP 519 REPAIR AREAS CONTINGENT QUANTITY (SQ. FT.) MEASURED TOTAL QUANTITY (SQ. FT.) (SQ. FT.) 73 37 110

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DES/GN AGENCY	BY DATE	REVISIONS - -	<u> </u>	CHECKED CAC IN CHARGE	CMM CMM DRAWN CMM	S.R. 252 - PIER 3 REPAIR DETAILS STATE ROUTE 252 OVER OHIO TURNPIKE M.P. 1569 CUNT	PROJECT 43-20-10 DATE: 2/19/2019	6 / 14 28
DESIGN AGENCY	BY DATE	REVISIONS	NO.	CHECKED	DESIGNED			((

— 6 SQ. FT.

NOTES:

- 1. THE AREAS OF REPAIR SHOWN ARE APPROXIMATE AND ARE BASED ON A FIELD INSPECTION. FINAL DETERMINATION OF THE AREAS TO BE REPAIRED WILL BE MADE BY THE ENGINEER AT THE TIME OF CONSTRUCTION.
- 2. THE TOTAL CONCRETE PATCHING AND CRACK REPAIR AREAS INDICATED ON THE DETAILS HAVE BEEN INCREASED TO ACCOUNT FOR ANY FURTHER DETERIORATION THAT MAY HAVE OCCURRED SINCE THE FIELD INSPECTION

- DENOTES AREAS TO BE REPAIRED AS PER ITEM SP 519



ELEVATIONS

POINT	ELEVATION
A	780.90
В	781.11
С	780.88
D	780.84
E	781.05
F	780.82

(DESIGNED	CHECKED	NO.	REVISIONS	BY DA	TE DESIGN AGENCY	
(2 3	4 PROJECI 43-20-10		CAC	CMM			•		
9 6		STATE ROUTE 252 OVER OHIO TURNPIKE	DRAWN	IN CHARGE			•		
4	DAIE: 2/19/2019	M.P. 156.9 CUYAHOGA COUNTY	CAC	ADY	•		•		
OHIO TURNPIKE	OHIO TU	IRNPIKE AND INFRAST	RU	CTI		E COMI	Ĩ	SSION	OHIO TURNPIKE

SECTION C-C

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PARAPETS, USING EPOXY SEALER, TINTED AS SHOWN.

									Τι			FI FVATI	ONS									
		REAR	ABUTMENT			SPAN NO. 1			SPA	AN NO. 2				SPAN NC	D. 3			SPANN	IO. 4		FWD. ABUT	MENT
LOCATIO	N	BEGIN ABUTMENT SLAB	1/2 PT.	END ABUTMENT SLAB	€ BEARING REAR ABUTMENT	1/2 PT.	€ REAR BEARING PIER 1	€ FORWARD BEARING PIER 1	1/4 PT.	1/2 PT.	3/4 PT.	Q PIER 2	1/4 PT.	1/2 PT.	3/4 PT.	€ REAR BEARING PIER 3	€ FORWARD BEARING PIER 3	1/2 PT.	€ BEARING FORWARD ABUTMENT	BEGIN ABUTMENT SLAB	1/2 PT.	END ABUT. SLAB
LEFT SLAB	STA.	3+91.60	3+97.46	4+03.32	4+04.57	4+18.24	4+31.91	4+33.07	4+49.37	4+65.66	4+81.95	4+98.24	5+14.54	5+30.83	5+47.12	5+63.41	5+64.57	5+78.24	5+91.91	5+93.16	5+99.02	6+04.88
FASCIA	ELEV.	780.82	780.85	780.88	780.89	780.95	781.01	781.01	781.07	781.12	781.16	781.19	781.20	781.21	781.21	781.20	781.20	781.18	781.15	781.15	781.14	781.12
EX. BEAM A	STA.				4+04.92	4+18.59	4+32.26	4+33.42	4+49.72	4+66.01	4+82.30	4+98.59	5+14.89	5+31.18	5+47.47	5+63.76	5+64.92	5+78.59	5+92.26			
	ELEV.				780.89	780.95	781.01	781.01	781.07	781.12	781.16	781.19	781.20	781.21	781.21	781.20	781.20	781.18	781.15			
LEFT GUTTER	STA.	3+92.13	3+97.99	4+03.85	4+05.10	4+18.77	4+32.44	4+33.60	4+49.89	4+66.19	4+82.48	4+98.77	5+15.06	5+31.36	5+47.65	5+63.94	5+65.10	5+78.77	5+92.44	5+93.69	5+99.55	6+05.41
LINE	ELEV.	780.82	780.85	780.88	780.89	780.95	781.01	781.01	781.07	781.12	781.16	781.19	781.20	781.21	781.21	781.20	781.20	781.18	781.15	781.15	781.14	781.12
EX REAM R	STA.				4+05.63	4+19.30	4+32.97	4+34.13	4+50.42	4+66.71	4+83.00	4+99.30	5+15.59	5+31.88	5+48.17	5+64.47	5+65.63	5+79.30	5+92.97			
	ELEV.				780.99	781.05	781.11	781.11	781.17	781.22	781.25	781.29	781.30	781.31	781.30	781.29	781.29	781.27	781.24			
EX. BEAM C	STA.	3+93.36	3+99.22	4+05.08	4+06.33	4+20.00	4+33.67	4+34.83	4+51.12	4+67.42	4+83.71	5+00.00	5+16.29	5+32.59	5+48.88	5+65.17	5+66.33	5+80.00	5+93.67	5+94.92	6+00.78	6+06.64
ROUTE 252	ELEV.	781.05	781.08	781.11	781.11	781.18	781.23	781.24	781.30	781.34	781.38	781.41	781.42	781.43	781.43	781.41	781.41	781.39	781.37	781.36	781.35	781.34
EX REAM D	STA.				4+07.03	4+20.70	4+34.37	4+35.53	4+51.83	4+68.12	4+84.41	5+00.70	5+17.00	5+33.29	5+49.58	5+65.87	5+67.03	5+80.70	5+94.37			
EX. DEAM D	ELEV.				780.99	781.06	781.11	781.12	781.17	781.22	781.26	781.28	781.30	781.31	781.30	781.29	781.29	781.27	781.24			
RIGHT	STA.	3+94.59	4+00.45	4+06.31	4+07.56	4+21.23	4+34.90	4+36.06	4+52.35	4+68.64	4+84.94	5+01.23	5+17.52	5+33.81	5+50.11	5+66.40	5+67.56	5+81.23	5+94.90	5+96.15	6+02.01	6+07.87
GUTTER LINE	ELEV.	780.84	780.87	780.90	780.90	780.96	781.02	781.02	781.08	781.13	781.16	781.19	781.21	781.21	781.21	781.19	781.19	781.17	781.15	781.14	781.13	781.11
	STA.				4+07.74	4+21.41	4+35.08	4+36.24	4+52.53	4+68.82	4+85.11	5+01.41	5+17.70	5+33.99	5+50.28	5+66.58	5+67.74	5+81.41	5+95.08			
EA. BEAME	ELEV.				780.90	780.97	781.02	781.02	781.08	781.13	781.16	781.19	781.21	781.21	781.21	781.19	781.19	781.17	781.15			
RIGHT SLAB	STA.	3+95.12	4+00.98	4+06.84	4+08.09	4+21.76	4+35.43	4+36.59	4+52.88	4+69.17	4+85.46	5+01.76	5+18.05	5+34.34	5+50.63	5+66.93	5+68.09	5+81.76	5+95.43	5+96.68	6+02.54	6+08.40
FASCIA	ELEV.	780.84	780.87	780.90	780.90	780.97	781.02	781.03	781.08	781.13	781.16	781.19	781.21	781.21	781.21	781.19	781.19	781.17	781.14	781.14	781.13	781.11

DEFLECTION DUE TO CONCRETE

1			DESIGNED	CHECKED	NO.	REVISIONS	BY 1	DA TE DESIGN AGE	ENCY
3	PROJECI 43-20-10		CAC	CMM					
/1		STATE ROUTE 252 OVER OHIO TURNPIKE	DRAWN	IN CHARGE			•		
<u>₄</u>	UAIE: 2/19/2019	M.P. 156.9 CUYAHOGA COUNTY	CAC	ADΥ			•		
OHIO	OHIO TU	RNPIKE AND INFRAST	-RU	CTI	JRE	COMI	М	SSION	OHIO

MARK	0540		9	BAR	BAR			DIMEN	ISIONS			WEIGH
A501	REAR	FORWARD	TOTAL	LENGTH	TYPE	A	В	С	D	Ε	INCR.	LBS.
	20	20	40	39'-6"	STR.							1,648
A502	80	80	160	11'-0"	STR.							1,836
A503	20	28	48	12'-6"	STR.							626
A504	8		8	6'-6"	STR.							54
A505	7		7	13'-0"	5	1'-3"	6'-0"					95
A506	52	52	104	5'-6"	STR.							597
A507	52	52	104	1'-10"	5	11"	7"					199
A508	52	52	104	1'-11"	5	1'-0"	7"					208
A509	7		7	8'-6"	5	1'-3"	3'-9"					62
A601	10		10	2'-6"	STR.							38
A602	40	52	92	8'-9"	30	8"	8"	3'-6"	3'-11"			1,209
A603	10		10	7'-3"	STR.							109
A604	7		7	6'-10"	4	1'-0"	6'-0"					72
A605	7		7	7'-2"	4	1'-0"	6'-4"					75
A701	80	80	160	11'-0"	STR.							3,597

	Sl	JPERST	RUCTU	RE RE	INFOR	CING	SCHEL	DULE		
BAR	NO.	BAR	BAR			DIMEN	ISIONS			WEIGHT
MARK	REQUIRED	LENGTH	TYPE	А	В	С	D	E	INCR.	LBS.
S501	378	39'-6"	STR.							15,573
S502	378	40'-8"	2	39'-6"						16,033
S503	756	5'-11"	1	5'-4"						4,665
S504	218	28'-6"	STR.							6,480
S505	512	30'-0"	STR.							16,020
S506	109	21'-0"	STR.							2,387
S507	88	27'-6"	STR.							2,524
S508	756	1'-10"	5	11"	7"					1,446
S509	756	1'-11"	5	1'-0"	7"					1,511
S510	756	5'-6"	STR.							4,337
S601	756	8'-9"	30	8"	8"	3'-6"	3'-11"			9,936
S602	12	39'-6"	STR.							712
		7	OTAL SUP	ERSTRUC	CTURE RI	EINFORCI	NG STEE	L WEIGH	T (LBS.) =	81,625
			то	TAL ABUT	MENT RI	EINFORCI	NG STEE	L WEIGH	T (LBS.) =	10,424
					TOTAL RI	EINFORCI	NG STEE	L WEIGH	T (LBS.) =	92,049

BAR BENDING DIAGRAMS

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NOTES:

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			•		-	ADY	CAC	M.P. 156.9 CUYAHOGA COUNTY		-)
			•			IN CHARGE	DRAWN	STATE ROUTE 252 OVER OHIO TURNPIKE		6 6
			•			CMM	CAC		PROJECI 43-20-10	- 3 3
	DESIGN AGENCY	DATE	ВΥ	REVISIONS	NO.	CHECKED	DESIGNED			(

1. ALL REINFORCING BARS SHALL BE EPOXY COATED.

2. BAR DIMENSIONS ARE OUT TO OUT UNLESS OTHERWISE INDICATED.

3. BAR SIZE IS INDICATED IN THE BAR MARK BY THE FIRST DIGIT.

4. EPOXY COATED REINFORCING STEEL SUPPORT: IN ACCORDANCE WITH THE REQUIREMENTS OF SP 509 AND 509.09, THE TOP AND BOTTOM MATS OF THE LONGITUDINAL AND TRANSVERSE EPOXY COATED REINFORCING STEEL SHALL BE SUPPORTED BY APPROVED EPOXY COATED DEVICES WITH SPACING NOT EXCEEDING 3'-0" CENTERS IN EACH DIRECTION. BROKEN CONCRETE, BRICKS, ETC. SHALL NOT BE USED FOR SUPPORT OF REINFORCING STEEL.

5. REINFORCING STEEL SAMPLES: REFER TO OTIC GENERAL CONDITIONS G-6.02 AND CMS SECTION 700, 709.01 THROUGH 709.05 AND 709.08. SUFFICIENT ADDITIONAL REINFORCING STEEL SHALL BE PROVIDED FOR SAMPLING. RANDOM SAMPLES SHALL BE REPLACED IN THE STRUCTURES BY THE ADDITIONAL STEEL SPLICED IN ACCORDANCE WITH 509.08.