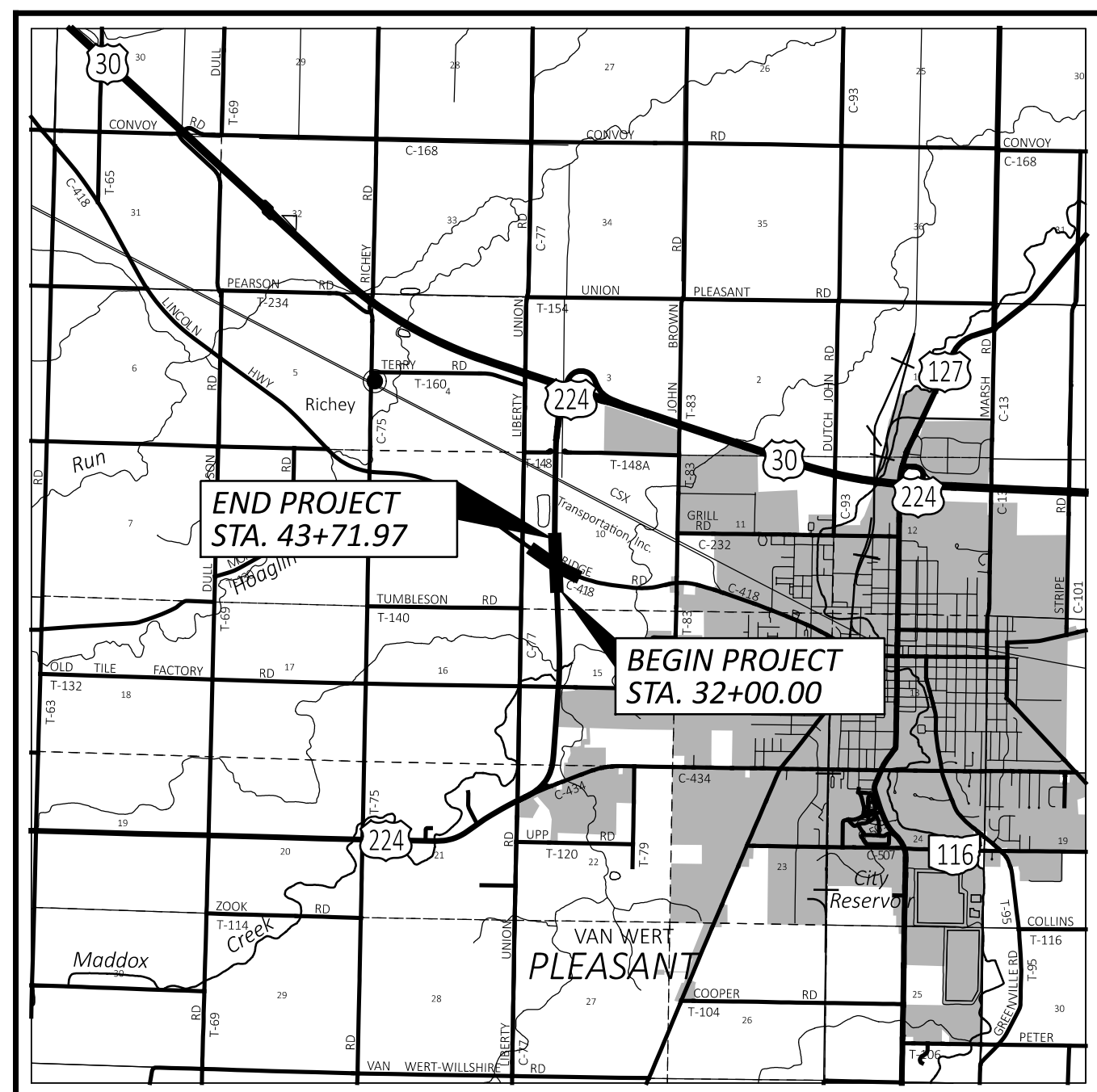


# STATE OF OHIO DEPARTMENT OF TRANSPORTATION

## VAN-224-10.88 PART 1

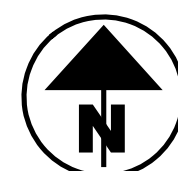
PLEASANT TOWNSHIP  
VAN WERT COUNTY

FOR PART 2, SEE VAN-224-11.44  
FOR PART 3, SEE VAN-30-11.34



**LOCATION MAP**

LATITUDE: 40°52'39" LONGITUDE: -84°37'31"



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

**DESIGN DESIGNATION**

	US 224	LINCOLN HIGHWAY (CR 418)
CURRENT ADT (2026)	4,200	2,800
DESIGN YEAR ADT (2046)	5,100	2,900
DESIGN HOURLY VOLUME (2046)	650	400
DIRECTIONAL DISTRIBUTION	58%	58%
TRUCKS (24 HOUR B&C)	30%	3%
DESIGN SPEED	60 MPH	50 MPH
LEGAL SPEED	55 MPH	45 MPH
DESIGN FUNCTIONAL CLASSIFICATION:		
04 - URBAN MINOR ARTERIAL (US 224), 04 - URBAN MINOR ARTERIAL (LINCOLN HWY EAST),		
05 - URBAN MAJOR COLLECTOR (LINCOLN HWY WEST)		
NHS PROJECT	NO	

**DESIGN EXCEPTIONS**

NONE REQUIRED

**ADA DESIGN WAIVERS**

NONE REQUIRED

**UNDERGROUND UTILITIES**  
Contact Two Working Days  
Before You Dig

**OHIO811.org**  
Before You Dig

**OHIO811, 8-1-1, or 1-800-362-2764**  
(Non members must be called directly)

PLAN PREPARED BY:  
STRAND ASSOCIATES, INC.  
615 ELSINORE PLACE, SUITE 320  
CINCINNATI, OH 45202

**INDEX OF SHEETS:**

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STANDARD CONSTRUCTION DRAWINGS											SUPPLEMENTAL SPECIFICATIONS	SPECIAL PROVISIONS		
BP-2.1	1/21/22	F-2.1	7/20/18	GSD-1-19	7/19/24	HL-60.12	7/21/23	MT-105.10	1/17/20	TC-71.10	7/18/25	800-2023	7/18/25	ASBESTOS REPORT
BP-2.2	1/15/21	F-3.1	7/19/13	HW-2.1	7/15/22	HL-60.31	7/19/24			TC-72.20	7/18/25	808	7/19/24	10/04/21 (PART 2)
BP-3.1	1/19/24			HW-2.2	7/20/18			TC-41.10	7/19/13			813	7/21/23	
BP-4.1	7/19/13	MGS-2.1	7/18/25	ICD-1-20	1/19/24	MT-95.40	7/18/25	TC-41.20	10/18/13			821	4/20/12	
BP-5.1	7/18/25	MGS-3.1	7/18/25	SBR-1-20	7/19/24	MT-95.45	7/21/23	TC-41.30	4/21/23			832	7/18/25	
BP-9.1	1/18/19	MGS-4.3	7/18/25			MT-95.50	7/21/17	TC-41.50	10/18/13			902	7/19/19	
		MGS-5.3	7/15/16	HL-10.11	7/21/23	MT-98.10	1/17/20	TC-42.10	10/18/13			908	1/17/25	
CB-2-2A, 2B, 2C	7/19/24			HL-10.12	7/21/23	MT-98.29	1/17/20	TC-42.20	10/18/13			913	4/16/21	
CB-3A	7/19/24	MH-3	7/19/24	HL-10.13	1/20/23	MT-99.20	4/19/19	TC-51.11	7/18/25			921	7/19/24	
				HL-20.11	7/18/25	MT-99.30	1/17/20	TC-51.12	7/18/25					
DM-1.1	1/17/25	RM-1.1	1/16/26	HL-30.11	7/21/23	MT-101.60	1/17/25	TC-52.10	10/18/13					
DM-1.2	1/17/25	RM-3.1	7/20/18	HL-30.21	4/17/20	MT-101.70	7/19/24	TC-52.20	1/15/21					
DM-4.1	7/17/20	RM-4.2	7/18/25	HL-30.22	1/17/25	MT-101.75	7/21/23	TC-61.10	4/21/23					
DM-4.3	1/15/16			HL-40.20	7/18/25	MT-101.90	7/17/20	TC-61.30	7/19/24					
DM-4.4	1/15/16	AS-1-15	1/20/23	HL-50.11	1/16/15	MT-102.10	7/21/23	TC-65.10	1/17/14					
		AS-2-15	7/21/23	HL-60.11	7/21/17	MT-104.10	1/19/24	TC-65.11	1/17/25					

**FEDERAL PROJECT NUMBER**

E230 (884)

**RAILROAD INVOLVEMENT**

NONE

**PROJECT DESCRIPTION**

CONSTRUCTION OF A SINGLE LANE ROUNDBOUT AT THE INTERSECTION OF US 224 AND LINCOLN HIGHWAY (CR 418) TO IMPROVE TRAFFIC SAFETY. THIS PROJECT INCLUDES NEW PAVEMENT, CURB AND GUTTER, LIGHTING, AND PAVEMENT MARKINGS OVER A PROJECT LENGTH OF APPROXIMATELY 0.18 MILES ALONG US 224 AND 0.18 MILES ALONG LINCOLN HIGHWAY (CR 418).

**EARTH DISTURBED AREAS**

PROJECT EARTH DISTURBED AREA:	4.71 ACRES
ESTIMATED CONTRACTOR EARTH DISTURBED AREA:	0.25 ACRES
NOTICE OF INTENT EARTH DISTURBED AREA:	4.96 ACRES

**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.

**2023 SPECIFICATIONS**

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

I HEREBY APPROVE OF THESE PLANS AND DECLARE THAT THE MAKING OF THIS IMPROVEMENT WILL REQUIRE THE CLOSING TO TRAFFIC OF THE HIGHWAY AND THAT DETOURS WILL BE PROVIDED AS INDICATED ON SHEETS P.13 & P.14.

*Christopher A. Hughes*

Christopher A. Hughes, P.E.  
District 01 Deputy Director

*Pamela Boratyn*

Pamela Boratyn  
Director, Department of Transportation

ENGINEER'S SEAL	ENGINEER'S SEAL
ROADWAY	LIGHTING

TITLE SHEET

DESIGN AGENCY



DESIGNER

NJA

REVIEWER

CJR 08/13/25

PROJECT ID

120111

SHEET

P.1

TOTAL


P.92

VAN-224-10.88

MODEL: Sheet PAPER/DATE: 3/4/22 (m.) DATE: 4/7/2026 TIME: 9:02:33 AM PLTDRY: OHDOT\_PDF.plt PENTBL: OHDOT\_Pen.tbl USER: Jeff.Helmann@strand.com WORKSPACE: OHDOTCEV02\_10.12 WORKSET: 120111 PRODUCT: OpenRoadsDesigner: 10.12.02.4 S:\CIN\3500-3599\3599\03\Drawings\CAD\120111\400-Engineering\Roadway\Sheets\120111\_G1001.dgn

SHEET NUMBER												PART.	ITEM	ITEM	GRAND	UNIT	DESCRIPTION	SEE SHEET NO.
P.12	P.18	P.19	P.65	P.66	P.67	P.68	P.75	P.84				01/55K	EXT	TOTAL				
		1,348										1,348	609	12000	1,348	FT	COMBINATION CURB AND GUTTER, TYPE 2	
		190										190	609	12001	190	FT	COMBINATION CURB AND GUTTER, TYPE 2, AS PER PLAN	P.10
		746										746	609	26001	746	FT	CURB, TYPE 6, AS PER PLAN	P.10
		2,312										2,312	609	31000	2,312	FT	COMBINATION CURB AND GUTTER, TYPE 9	
		790										790	609	31001	790	FT	COMBINATION CURB AND GUTTER, TYPE 9, AS PER PLAN	P.10
																	<b>LIGHTING</b>	
												18	625	00450	18	EACH	CONNECTION, FUSED PULL APART	
												12	625	00480	12	EACH	CONNECTION, UNFUSED PERMANENT	
												9	625	10491	9	EACH	LIGHT POLE, CONVENTIONAL, AS PER PLAN (INSTALLATION ONLY)	P.74
												9	625	14100	9	EACH	LIGHT POLE FOUNDATION, 24" X 8' DEEP	
												4,887	625	23302	4,887	FT	NO. 6 AWG 2400 VOLT DISTRIBUTION CABLE	
												936	625	23400	936	FT	NO. 10 AWG POLE AND BRACKET CABLE	
												1,216	625	25300	1,216	FT	CONDUIT, 1-1/2", 725.04	
												30	625	25400	30	FT	CONDUIT, 2", 725.04	
												246	625	25902	246	FT	CONDUIT, JACKED OR DRILLED, 725.04, 3"	
												9	625	26252	9	EACH	LUMINAIRE, CONVENTIONAL, SOLID STATE (LED), TYPE II, LED, 240 VOLT	P.74
												1,246	625	29000	1,246	FT	TRENCH	
												6	625	30700	6	EACH	PULL BOX, 725.08, 18"	
												9	625	32000	9	EACH	GROUND ROD	
												1	625	34001	1	EACH	POWER SERVICE, AS PER PLAN	P.74
												1,246	625	36010	1,246	FT	UNDERGROUND WARNING/MARKING TAPE	
												1	625	76000	1	EACH	ARC FLASH CALCULATIONS AND LABEL, CCA	
																	<b>TRAFFIC CONTROL</b>	
			144									144	621	00100	144	EACH	RPM	
			26									26	621	54000	26	EACH	RAISED PAVEMENT MARKER REMOVED	
		5										5	626	00112	5	EACH	BARRIER REFLECTOR, TYPE 3 (BIDIRECTIONAL)	
				326.9	201.8							528.7	630	03100	528.7	FT	GROUND MOUNTED SUPPORT, NO. 3 POST	
				125.1	41.9							167	630	03101	167	FT	GROUND MOUNTED SUPPORT, NO. 3 POST, AS PER PLAN	P.10
				20	7							27	630	08600	27	EACH	SIGN POST REFLECTOR	
				256.7	156.2							412.9	630	80100	412.9	SF	SIGN, FLAT SHEET	
					21	3						24	630	84900	24	EACH	REMOVAL OF GROUND MOUNTED SIGN AND DISPOSAL	
					2	4						6	630	85001	6	EACH	REMOVAL OF GROUND MOUNTED SIGN AND STORAGE, AS PER PLAN	P.11
					27	9						36	630	86002	36	EACH	REMOVAL OF GROUND MOUNTED POST SUPPORT AND DISPOSAL	
			1.28									1.28	644	00104	1.28	MILE	EDGE LINE, 6"	
			0.37									0.37	644	00300	0.37	MILE	CENTER LINE	
			283									283	644	00700	283	FT	TRANSVERSE/DIAGONAL LINE	
			152									152	644	01520	152	FT	DOTTED LINE, 12"	
			65									65	644	20800	65	FT	YIELD LINE	
																	<b>LANDSCAPING</b>	
								309				309	661	99930	309	SY	PLANTING, MISC.: 10" GRAY WASHED RIVER STONE MULCH	P.84
																	<b>MAINTENANCE OF TRAFFIC</b>	
20												20	253	02000	20	CY	PAVEMENT REPAIR	
20												20	407	20000	20	GAL	NON-TRACKING TACK COAT	
10												10	441	70000	10	CY	ASPHALT CONCRETE SURFACE COURSE, TYPE 1, (449), PG64-22	
												LS	614	12420	LS		DETOUR SIGNING	
20												20	614	18601	20	SNMT	PORTABLE CHANGEABLE MESSAGE SIGN, AS PER PLAN	P.12
22												22	616	10000	22	MGAL	WATER	
50												50	617	10100	50	CY	COMPACTED AGGREGATE	
																	<b>INCIDENTALS</b>	
												LS	614	11000	LS		MAINTAINING TRAFFIC	
												LS	623	10000	LS		CONSTRUCTION LAYOUT STAKES AND SURVEYING	
												LS	624	10000	LS		MOBILIZATION	

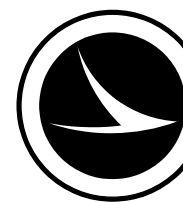
GENERAL SUMMARY

DESIGN AGENCY  
  
 STRAND ASSOCIATES  
 DESIGNER  
 NJA  
 REVIEWER  
 ATW 08/01/25  
 PROJECT ID  
 120111  
 SHEET TOTAL  
 P.17 P.92

SHEET NUM.					PART.	ITEM	ITEM	GRAND	UNIT	DESCRIPTION	SEE SHEET NO.
5	7	10	11	17	02/BRO		EXT	TOTAL			
										<b>STRUCTURE OVER 20 FOOT SPAN (VAN-224-11.44)</b>	
				LS	LS	202	11201	LS		PORTIONS OF STRUCTURE REMOVED, AS PER PLAN	16
				133	133	202	22900	133	SY	APPROACH SLAB REMOVED	
				133	133	202	23500	133	SY	WEARING COURSE REMOVED	
				LS	LS	503	21300	LS		UNCLASSIFIED EXCAVATION	
				LS	LS	505	11100	LS		PILE DRIVING EQUIPMENT MOBILIZATION	
				1,150	1,150	507	00200	1,150	FT	STEEL PILES HP12X53, FURNISHED	
				1,050	1,050	507	00250	1,050	FT	STEEL PILES HP12X53, DRIVEN	16
				20	20	507	93300	20	EACH	STEEL POINTS OR SHOES	
				87,401	87,401	509	10000	87,401	LB	EPOXY COATED STEEL REINFORCEMENT	
				5,214	5,214	509	30020	5,214	FT	NO. 4 DEFORMED GFRP REINFORCEMENT	
				274	274	511	34446	274	CY	CLASS QC2 CONCRETE WITH QC/QA, BRIDGE DECK	
				51	51	511	34450	51	CY	CLASS QC2 CONCRETE WITH QC/QA, BRIDGE DECK (PARAPET)	
				103	103	511	43510	103	CY	CLASS QC1 CONCRETE, ABUTMENT INCLUDING FOOTING	
				420	420	512	10100	420	SY	SEALING OF CONCRETE SURFACES (EPOXY-URETHANE)	17
				3,636	3,636	513	20000	3,636	EACH	WELDED STUD SHEAR CONNECTORS	
				11,587	11,587	514	00050	11,587	SF	SURFACE PREPARATION OF EXISTING STRUCTURAL STEEL	
				11,587	11,587	514	00057	11,587	SF	FIELD PAINTING OF EXISTING STRUCTURAL STEEL, PRIME COAT, AS PER PLAN	16
				11,241	11,241	514	00060	11,241	SF	FIELD PAINTING STRUCTURAL STEEL, INTERMEDIATE COAT	
				11,241	11,241	514	00066	11,241	SF	FIELD PAINTING STRUCTURAL STEEL, FINISH COAT	
				10	10	514	00504	10	MNHR	GRINDING FINES, TEARS, SLIVERS ON EXISTING STRUCTURAL STEEL	
				11	11	514	10000	11	EACH	FINAL INSPECTION REPAIR	
				86	86	516	13200	86	SF	½" PREFORMED EXPANSION JOINT FILLER	
				94	94	516	13600	94	SF	1" PREFORMED EXPANSION JOINT FILLER	
				61	61	516	13900	61	SF	2" PREFORMED EXPANSION JOINT FILLER	
				120	120	516	14014	120	FT	INTEGRAL ABUTMENT EXPANSION JOINT SEAL	
				96	96	516	31010	96	FT	2" DEEP JOINT SEALER	
				12	12	516	44201	12	EACH	ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE), AS PER PLAN, (3.878"x12"x14" PAD AND 2-1.5" x 13" x 15" STEEL PLATES AND HP12x53 SECTION)	25
				6	6	516	44101	6	EACH	ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE), AS PER PLAN, (2.668"x14"x18" PAD, 1.5"x15"x19"(BOT.), 1.5"x13"x15"(TOP) STEEL PLATES AND HP12x53 SECTION)	25
				6	6	516	44101	6	EACH	ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE), AS PER PLAN, (2.668"x14"x18" PAD AND 1.5"x15"x19" STEEL PLATE)	25
				LS	LS	516	47001	LS		JACKING AND TEMPORARY SUPPORT OF SUPERSTRUCTURE, AS PER PLAN	16
				92	92	518	21200	92	CY	POROUS BACKFILL WITH GEOTEXTILE FABRIC	
				136	136	518	40000	136	FT	6" PERFORATED CORRUGATED PLASTIC PIPE	
				60	60	518	40010	60	FT	6" NON-PERFORATED CORRUGATED PLASTIC PIPE, INCLUDING SPECIALS	
				244	244	526	25011	244	SY	REINFORCED CONCRETE APPROACH SLABS WITH QC/QA (T=15"), AS PER PLAN	16
				96	96	526	90031	96	FT	TYPE C INSTALLATION, AS PER PLAN	16
										<b>MAINTENANCE OF TRAFFIC</b>	
	3				3	616	10000	3	MGAL	WATER	
										<b>INCIDENTALS</b>	
				LS	LS	614	11000	LS		MAINTAINING TRAFFIC	
				LS	LS	623	10000	LS		CONSTRUCTION LAYOUT STAKES AND SURVEYING	
				LS	LS	624	10000	LS		MOBILIZATION	

GENERAL SUMMARY

DESIGN AGENCY



DESIGNER

RDM

REVIEWER

KCO 08-21-25

PROJECT ID


120111

SHEET TOTAL

P.9 37

SHEET NUM.											PART.	ITEM	ITEM	GRAND	UNIT	DESCRIPTION	SEE SHEET NO.
\$MN301\$	\$MN302\$	\$MS301\$									03/NHS	EXT	TOTAL				
	80										80	614	11110	80	HOUR	<b>MAINTENANCE OF TRAFFIC</b> LAW ENFORCEMENT OFFICER WITH PATROL CAR FOR ASSISTANCE	
		8,274									8,274	614	11630	8,274	FT	INCREASED BARRIER DELINEATION	
		4									4	614	12380	4	EACH	WORK ZONE IMPACT ATTENUATOR, 24" WIDE HAZARDS, (UNIDIRECTIONAL)	
186											186	614	12801	186	EACH	WORK ZONE RAISED PAVEMENT MARKER, AS PER PLAN	\$MN301\$
		170									170	614	13310	170	EACH	BARRIER REFLECTOR, TYPE 1, ONE WAY	
		166									166	614	13350	166	EACH	OBJECT MARKER, ONE WAY	
6											6	614	18601	6	SNMT	PORTABLE CHANGEABLE MESSAGE SIGN, AS PER PLAN	\$MN301\$
		4.41									4.41	614	22010	4.41	MILE	WORK ZONE EDGE LINE, CLASS I, 6"	
		2,447									2,447	614	24000	2,447	FT	WORK ZONE DOTTED LINE, CLASS I	
0.06											0.06	616	10000	0.06	MGAL	WATER	
		8,274									8,274	622	41100	8,274	FT	PORTABLE BARRIER, UNANCHORED	
	12										12	808	18700	12	SNMT	DIGITAL SPEED LIMIT (DSL) SIGN ASSEMBLY	
											LS	614	11000	LS		<b>INCIDENTALS</b> MAINTAINING TRAFFIC	
											LS	623	10000	LS		CONSTRUCTION LAYOUT STAKES AND SURVEYING	
											LS	624	10000	LS		MOBILIZATION	

GENERAL SUMMARY

DESIGN AGENCY  
  
 4215 North Ave Suite K-201  
 Columbus, GA 31919

DESIGNER  
 CO

REVIEWER  
 BBD 12/18/25

PROJECT ID  
 120111

SHEET TOTAL  
 P.19 | 67