PROJECT DESCRIPTION

GENERAL

THIS PROJECT INVOLES THE MODIFICATION OF AN EXISTING ICB TO A FULL COLOR TRAFFIC SIGNAL WITH INTERSECTION STREET LIGHTING AT US 40 AND ABINGDON ROAD/ OTTER POINT ROAD LOCATED IN HARFORD COUNTY. US 40 IS ASSUMED TO RUN IN AN EAST/WEST DIRECTION.

INTERSECTION OPERATION

A NEMA ASC II CONTROLLER, AMPLIFIERS, AND INCIDENTAL EQUIPMENT SHALL BE INSTALLED IN AN EXISTING NEMA (SIZE 5) POLE MOUNTED CONTROLLER.THE INTERSECTION IS TO OPERATE IN A NEMA SIX (6) PHASE MODE. THE US 40 THROUGH MOVEMENTS WILL RUN CONCURRENTLY WITH EXCLUSIVE LEFT TURN MOVEMENTS. THE SIDE STREETS WILL RUN CONCURRENTLY.

PROJECT CONTACTS:

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MR. RICHARD L. DAFF SR., CHIEF, TRAFFIC OPERATIONS DIVISION
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MR. EDWARD RODENHIZER, CHIEF, SHA, TRAFFIC SIGNAL SHOP
PHONE: (410) 787-7650

MR. RANDALL SCOTT ASSIST., DISTRICT ENGINEER-TRAFFIC
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MAINTENANCE OF TRAFFIC

THE FOLLOWING TEMPORARY WORK ZONE TRAFFIC CONTROL STANDARDS SHALL BE USED FOR THIS PROJECT.

104.32-01 104.48-01
104.33-02 104.49-01
104.44-01 104.81-02

EQUIPMENT LIST

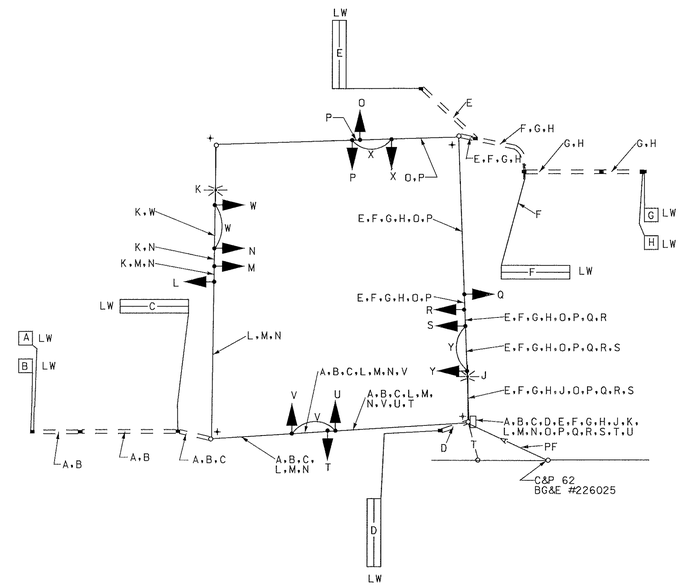
A. EQUIPMENT TO BE FURNISHED BY THE ADMINISTRATION.

ITEM NO.:	SYSTEM READY DESCRIPTION	SPECIFICATION SECTION	UNIT	QUANTITY
9001	DETECTOR RACK RETROFIT		EA	1
9002	NEMA LOAD SWITCH		EA	6
9003	DETECTOR RACK POWER SUPPLY		EA	1
9003	DETECTOR PANEL		EA	2
9004	ASCII CONTROLLER		EA	1
9005	FLAT SHEET ALUMINUM SIGNS CONSISTING OF:		SF	86
	48" X 48" W3-3 Sign-with "NEW" Panel & Flags		EA	2
	R6-1L (12" X 36")		EA	2
	R6-1 (R)		EA	2
	GUIDE SHIELD ASSEMBLY (24" X 51")		EA	2
	GUIDE SHIELD ASSEMBLY (30" X 75")		EA	2

B. EQUIPMENT TO BE FURNISHED AND /OR INSTALLED BY THE CONTRACTOR.

ITEM NO.:	DESCRIPTION	SPECIFICATION SECTION	UNIT	QUANTITY
1001	MAINTENACE OF TRAFFIC		LS	1
5004	24 INCH WHITE THERMOPLASTIC PAVEMENT MARKING TAPE-(FOR STOP LINE)		LF	145
8008	FURNISH AND INSTALL 3 INCH WEATHERHEAD		EA	2
8009	INSTALL CONTROLLER AND CABINET - POLE MOUNT		EA	1
8021	SAWCUT FOR SIGNAL LOOP DETECTORS		LF	750
8022	FURNISH AND INSTALL 1 INCH ELECTRICAL CONDUIT-GALVANIZED SLEEVE		LF	80
8024	FURNISH AND INSTALL 2 INCH SCHEDULE 80 RIGID POLYVINYL CONDUIT-TRENCHED		LF	800
8027	FURNISH AND INSTLAL 3 INCH SCHEDULE 80 RIGID PVC CONDUIT-TRENCHED		LF	50
8033	FURNISH AND INSTALL ELECTRICAL HANHOLE		EA	9
8040	FURNISH AND INSTALL LOOP WIRE ENCASED IN FLEXIBLE TUBING (NO. 14 AWG)		LF	2550
8041	FURNISH AND ELECTRICAL CABLE-2 CONDUCTOR (ALUMINIUM SHIELDED)		LF	2875
8044	FURNISH AND INSTALL ELECTRICAL CABLE-5 CONDUCTOR (NO. 14 AWG)		LF	80
8045	FURNISH AND INSTALL ELECTRICAL CABLE-7 CONDUCTOR (NO. 14 AWG)		LF	1660
8046	FURNISH AND INSTALL ELECTRICAL CABLE-2 CONDUCTOR (NO. 12 AWG)		LF	360
8050	FURNISH AND INSTALL WOOD SIGN SUPPORTS 4 INCH X 4 INCH		LF	30
8052	INSTALL GROUND MOUNTED SIGN		SF	86
8055	FURNISH AND INSTALL 250 WATT H.P.S. LAMP AND LUMINAIRE WITH PHOTOCELL		EA	2
8056	FURNISH AND INSTALL 15 FOOT LIGHTING BRACKET ARM FOR SIGNAL STRUCTURE		EA	2
8060	REMOVE AND DISPOSE OF EXISTING MATERIAL AND EQUIPMENT		EA	1
8061	INSTALL CONDUIT BEND IN EXISTING BASE		EA	3
8067	ADJUST AND RE-RING EXISTING SPAN WIRE		EA	4
8084	FURNISH AND INSTALL 12 INCH VEHICULAR TRAFFIC SIGNAL HEAD SECTION (BLACK FACE)		EA	42
NEG.	REMOVE AND RELOCATE GROUND MOUNTED SIGN		SF	18
NEG.	FURNISH AND INSTALL WOOD SIGN SUPPORTS 6 INCH X 8 INCH		LF	44

WIRING DIAGRAM



WIRING KEY

A B C D E F G H } 2 CONDUCTOR ALUMINIUM SHIELDED

J K } 2 CONDUCTOR NO. 12 AWG

L M N O P Q R S T U } 7 CONDUCTOR NO. 14 AWG

V W X Y } 7 CONDUCTOR NO. 14

LW- LOOP WIRE
EF- EXISTING FEED W/TELEPHONE COMMUNICATIONS
-EXISTING TELEPHONE DROP
+ -EXISTING GROUND ROD

PHASE CHART

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
PHASE 1 & 5	◄G-	◄G-	R	R	◄G-	◄G-	R	R	R	R	R	R	R	R
1 & 5 CHANGE TO 1 & 6, 2 & 5, OR 2 & 6														
PHASE 1 & 6	◄G-	◄G-	G	G	◄R-	◄R-	R	R	R	R	R	R	R	R
1 & 6 CHANGE	◄Y-	◄Y-	G	G	◄R-	◄R-	R	R	R	R	R	R	R	R
PHASE 2 & 5	◄R-	◄R-	R	R	◄G-	◄G-	G	G	R	R	R	R	R	R
2 & 5 CHANGE	◄R-	◄R-	R	R	◄Y-	◄Y-	G	G	R	R	R	R	R	R
PHASE 2 & 6	◄R-	◄R-	G	G	◄R-	◄R-	G	G	R	R	R	R	R	R
2 & 6 CHANGE	◄R-	◄R-	Y	Y	◄R-	◄R-	Y	Y	R	R	R	R	R	R
PHASE 4 & 8	◄R-	◄R-	R	R	◄R-	◄R-	R	R	G	G	G	G	G	G
4 & 8 CHANGE	◄R-	◄R-	R	R	◄R-	◄R-	R	R	Y	Y	Y	Y	Y	Y
FLASHING OPERATION	FL/◄R-	FL/◄R-	FL /Y	FL /Y	FL/◄R-	FL/◄R-	FL /Y	FL /Y	FL /R	FL /R	FL /R	FL /R	FL /R	FL /R

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MARYLAND DOT - STATE HIGHWAY ADMINISTRATION
Office of Traffic & Safety
TRAFFIC ENGINEERING DESIGN DIVISION
GENERAL INFORMATION PLAN

US 40 (Pulaski Highway) and Abingdon Road/Otter Point Road

DRAWN BY: A.FORNARO	F.A.P. NO.		TS NO. 3362-A	SHEET NO.
CHECKED BY: S.RENZI	S.H.A. NO.	HA1808A56/1B56		
SCALE: NTS	COUNTY:	HARFORD	T.I.M.S. NO. D-448	2 OF 2
DATE: SEPTEMBER, 1999	LOG MILE:	12004006.35		

CADDIC:PROJECTS\ 97-II-15\D448GGI.DGN