

**PROJECT DESCRIPTION  
GENERAL**

THIS PROJECT INVOLVES THE CONSTRUCTION OF A TEMPORARY SIGNAL AT THE INTERSECTION OF MD 24 AND RAMP A1 IN HARFORD COUNTY DURING THE MAINTENANCE OF TRAFFIC FOR STAGE 4. THIS STAGE OF MOT INVOLVES THE INSTALLATION OF ULTIMATE SIGNAL MAST ARMS WITH STRUCTURES AT THE ULTIMATE LOCATION.

**INTERSECTION OPERATION**

A NEW BASE MOUNTED CABINET SHALL BE INSTALLED AT THIS LOCATION. THE INTERSECTION SHALL OPERATE IN A SEMI-ACTUATED MODE USING 2 NEMA PHASES. THE LEFT TURN PHASE ALONG SOUTHBOUND MD 24 SHALL OPERATE WITH EXCLUSIVE LEFT TURN PHASING. VIDEO DETECTION SHALL BE PLACED INTO OPERATION. PRIOR TO COMPLETION OF THIS PROJECT THE CONTRACTOR SHALL NOTIFY MR. ROBERT SNYDER OF SHA AT 410-398-7631. TO ARRANGE FOR THE PHONE LINE INSTALLATION. THE CONTRACTOR IS TO PROVIDE MR. SNYDER WITH THE NEAREST STREET ADDRESS, ZIP CODE AND TELEPHONE NUMBERS.

**SPECIAL NOTES**

1. THE FOLLOWING CONTACT PERSONS FOR THIS PROJECT ARE AS FOLLOWS:

**PROJECT CONTACTS:**

MR. RANDALL SCOTT, ASSISTANT DISTRICT ENGINEER-TRAFFIC  
PHONE: (410) 321-2781  
MR. STEVE MARCISZEWSKI, ASSISTANT DISTRICT ENGINEER - MAINTENANCE  
PHONE: (410) 321-2761  
MR. MICHAEL PASQUARIELLO, UTILITY ENGINEER  
PHONE: (410) 321-2841  
MR. RICHARD L. DAFF, SR., CHIEF TRAFFIC OPERATIONS DIVISION  
PHONE: (410) 787-7630  
MR. EDWARD RODENHIZER, SIGNAL OPERATIONS CHIEF  
PHONE: (410) 787-7650  
MR. EUGENE BAILEY, SIGN OPERATIONS MANAGER  
PHONE: (410) 787-7676

MS. ROXANE MUKAI, TRAFFIC MANAGER  
MARYLAND TRANSPORTATION AUTHORITY  
PHONE: (410) 288-8484

**EQUIPMENT LIST**

A. EQUIPMENT TO BE SUPPLIED BY THE MARYLAND STATE HIGHWAY ADMINISTRATION.

CATEGORY CODE NO.	DESCRIPTION	UNITS	QUANTITY
900000	BASE MOUNTED (SIZE 6) CABINET AND CONTROLLER (MSHA SPECIFICATION) WITH VIDEO DETECTION INTERFACE EQUIPMENT FOR 1-4 CAMERAS	EA	1
973023	SHEET ALUMINUM SIGNS R3-3 (2) (30"x30") MAST ARM MOUNT R3-5 (L) (30"x36") MAST ARM MOUNT R3-1 (30"x30") MAST ARM MOUNT	SF EA EA EA	40 1 2 3

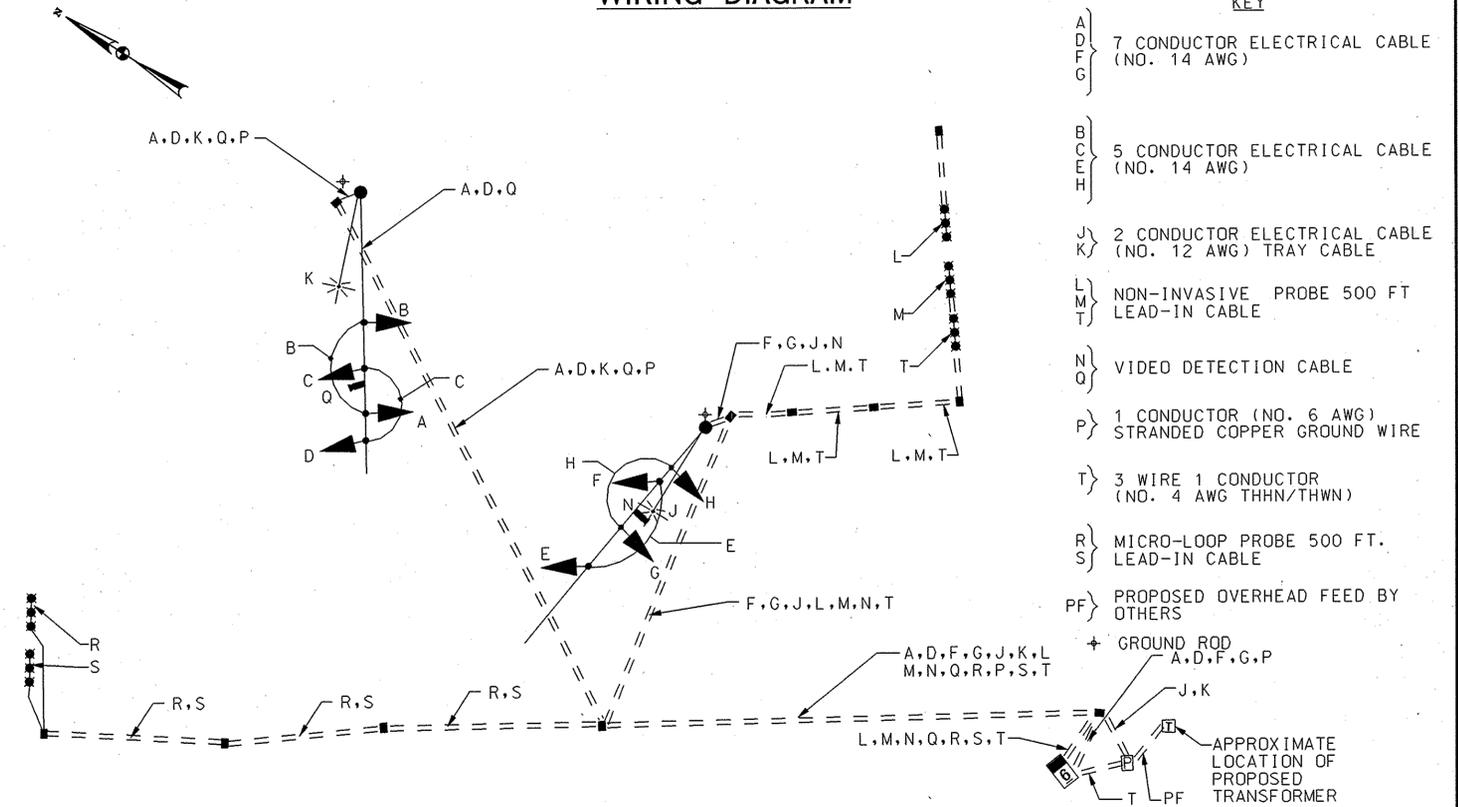
B. EQUIPMENT TO BE FURNISHED AND/OR INSTALLED BY THE CONTRACTOR.

CATEGORY CODE NO.	DESCRIPTION	UNITS	QUANTITY
114245	24 INCH WHITE REMOVABLE PREFORMED PAVEMENT MARKING LINE	LF	50
203030	TEST PIT EXCAVATION	CY	2
800000	REMOVE AND DISPOSE OF EXISTING MATERIAL AND EQUIPMENT	LS	1
800000	CONTROL CABLE 200 FOOT VIDEO DETECTION CAMERA TO CONTROLLER	EA	1
800000	CONTROL CABLE 400 FOOT VIDEO DETECTION CAMERA TO CONTROLLER	EA	1
801004	CONCRETE FOR SIGNAL FOUNDATION	CY	12
802501	NO. 6 AWG STRANDED BARE COPPER GROUND WIRE	LF	220
805011	1 INCH ELECTRICAL CONDUIT - GALVANIZED FOR DETECTOR SLEEVE	LF	10
805115	3 INCH SCHEDULE 80 RIGID PVC CONDUIT - BORED	LF	60
805118	4 INCH SCHEDULE 80 RIGID PVC CONDUIT - BORED	LF	400
805125	2 INCH SCHEDULE 80 RIGID PVC CONDUIT - TRENCHED	LF	420
805135	3 INCH SCHEDULE 80 RIGID PVC CONDUIT - TRENCHED	LF	410
807202	METERED SERVICE PEDESTAL	EA	1
810550	MICROLOOP PROBE, 500 FOOT LEAD IN CABLE	EA	2
810605	NON-INVASIVE DETECTOR, 1000 FOOT LEAD IN CABLE	EA	3
811001	ELECTRICAL HANDHOLE	EA	11
813015	INSTALL OVERHEAD SIGN	SF	40
816001	VIDEO DETECTION CAMERA	EA	2
818036	STEEL POLE WITH A SINGLE 50 FOOT MAST ARM	EA	1
818041	STEEL POLE WITH A SINGLE 60 FOOT MAST ARM	EA	1
831010	250 WATT HPS LAMP AND LUMINAIRE	EA	2
837001	GROUND ROD - 3/4 INCH DIAMETER X 10 FOOT LENGTH	EA	3
860284	12 INCH LED VEHICULAR TRAFFIC SIGNAL HEAD SECTION	EA	24
861107	ELECTRICAL CABLE - 5 CONDUCTOR (NO. 14 AWG)	LF	1320
861108	ELECTRICAL CABLE - 7 CONDUCTOR (NO. 14 AWG)	LF	1400
861117	ELECTRICAL CABLE - 3 WIRE (NO. 4 AWG)	LF	20
862102	SAWCUT FOR SIGNAL (LOOP DETECTOR)	LF	10
866104	20 FOOT LIGHTING ARM ON SIGNAL	EA	2
871202	INSTALL CONTROLLER AND CABINET - BASE MOUNT	EA	1

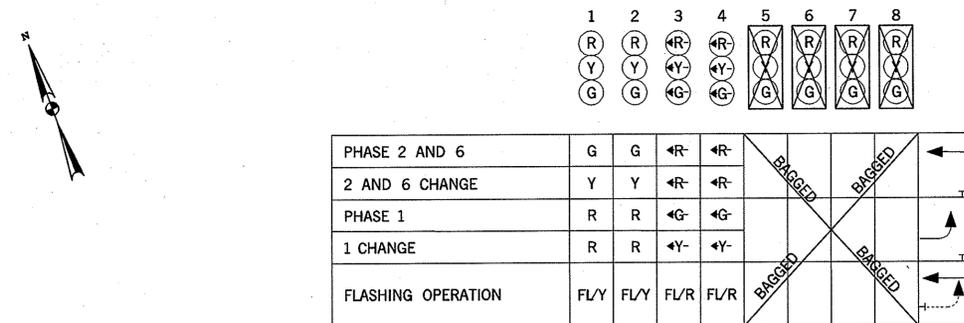
C. EQUIPMENT TO BE REMOVED BY THE CONTRACTOR AND DELIVERED TO THE STATE HIGHWAY ADMINISTRATION, 7491 CONNELLY DRIVE, HANOVER, MARYLAND 21076.

CATEGORY CODE NO.	DESCRIPTION	UNITS	QUANTITY
900000	CONTROLLER AND ASSOCIATED AUXILLARY EQUIPMENT	EA	1

**WIRING DIAGRAM**



**PHASE CHART**



**MOT STAGE :4**

**SHA** STATE OF MARYLAND  
DEPARTMENT OF TRANSPORTATION  
STATE HIGHWAY ADMINISTRATION  
OFFICE OF TRAFFIC & SAFETY  
TRAFFIC ENGINEERING DESIGN DIVISION  
MD 24 AT NORTHBOUND I-95 OFF-RAMP (RAMP A1)  
IMPROVEMENTS TO I-95 AND MD 24 INTERCHANGE  
ABINGDON, MARYLAND

**GENERAL INFORMATION SHEET**

SCALE	N.T.S.	DATE	06/2006	CONTRACT NO.	KH-271-000-002
DESIGNED BY	A. MOHAMMEDSDU	COUNTY	HARFORD		
DRAWN BY	M. RAFFLE	LOGMILE			
CHECKED BY	K. BINIKER	TMS NO.			
FAP NO.	NONE	TOD NO.			
TS NO.	DRAWING	PSG	OF	N014	SHEET NO. 692 OF 889

**SABRA, WANG & ASSOCIATES, INC.**  
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