PROJECT DESCRIPTION

GENERAL

THIS PORTION OF THE PROJECT INVOLVES THE INSTALLATION OF A TEMPORARY TRAFFIC SIGNAL AT THE INTERSECTION OF US 29 AT RAMP A AND RAMP B IN MONTGOMERY COUNTY.

INTERSECTION OPERATION

A SYSTEM CONTROLLER HOUSED IN A BASE MOUNTED CABINET SHALL BE INSTALLED AT THIS LOCATION. THE INTERSECTION WILL OPERATE IN A FULLY ACTUATED MODE USING 4 NEMA PHASES.

SPECIAL NOTES

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

   MR. LEE STARKLOFF, ASSISTANT DISTRICT ENGINEER-TRAFFIC
   PHONE: (301) 513-7300
   MR. RALEIGH MEDLEY, ASSISTANT DISTRICT ENGINEER-MAINTENANCE
   PHONE: (301) 513-7300
   MR. DENNIS McMAHAN, ASSISTANT DISTRICT ENGINEER-CONSTRUCTION
   PHONE: (301) 513-7345
   MR. AUGIE REBISH, UTILITY ENGINEER
   PHONE: (301) 513-7300
   MR. RICHARD L. DAFF, Sr., CHIEF TRAFFIC OPERATIONS DIVISION
   PHONE: (410) 787-7630
   MR. BOBBY GONZALES, TRAFFIC ENGINEER MCDPW&T
   PHONE: (240) 777-2190

2. MAINTENANCE OF TRAFFIC WILL BE HANDLED BY THE CONTRACTOR UTILIZING THE STANDARD PLATES FOR TRAFFIC CONTROL.
3. CONTACT MONTGOMERY COUNTY TMC AT LEAST 72 HOURS PRIOR TO ANY WORK TO LOCATE EXISTING EQUIPMENT.
   TMC - 240-777-2100

EQUIPMENT LIST

A. EQUIPMENT TO BE SUPPLIED BY THE ADMINISTRATION.

CATEGORY CODE NO.	DESCRIPTION	UNITS	QUANTITY
900000	BASE MOUNTED (SIZE 6) CABINET (MSHA SPECIFICATIONS) WITH ECONOLITE ASC II 2100 CONTROLLER, SSM 12 E CONFLICT MONITOR, VIDEO INTERFACE EQUIPMENT, LAU PANEL AND RELAY PACKAGE WIRED TO MONTGOMERY COUNTY SPECIFICATIONS.	EA	1
973023	FLAT SHEET ALUMINUM SIGNS,	SF	51
	R3-5(L) (30"X36")	EA	3
	R3-5(R) (30"X36")	EA	2
	R10-11(B) (24"X24")	EA	2
	R10-6A (24"X30") (GROUND MOUNT)	EA	1

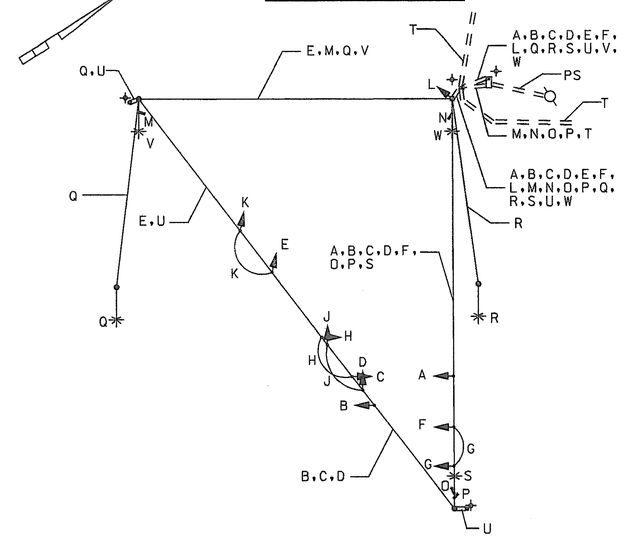
B. EQUIPMENT TO BE FURNISHED AND/OR INSTALLED BY THE CONTRACTOR.

CATEGORY CODE NO.	DESCRIPTION	UNITS	QUANTITY
203030	TEST PIT EXCAVATION	CY	6
585452	24 INCH WHITE PERMANENT PREFORMED PAVEMENT MARK	LF	160
800000	INSTALL BACKGUY AND ASSEMBLY	EA	6
800000	40 FOOT WOOD POLE CLASS II	EA	2
801004	CONCRETE FOR SIGNAL FOUNDATION	CY	16
801104	WOOD POST 4 INCH BY 4 INCH	LF	16
805050	3 IN. WEATHERHEADS	EA	2
805135	3 INCH SCHEDULE 80 RIGID PVC CONDUIT - TRENCHED	LF	325
805140	4 INCH SCHEDULE 80 RIGID PVC CONDUIT - TRENCHED	LF	75
807400	ELEC. UTILITY SER. EQUIP. 120/240V 60 AMP	EA	1
811001	FURNISH AND INSTALL HANDHOLE	EA	3
813014	INSTALL GROUND MOUNTED SIGN	SF	5
813015	INSTALL OVERHEAD SIGN	SF	46
816001	VIDEO DETECTION CAMERA	EA	4
816005	CONTROL CABLE, 250 FOOT, VIDEO DETECTION CAMERA TO CONTROLLER	EA	2
816010	CONTROL CABLE, 500 FOOT, VIDEO DETECTION CAMERA TO CONTROLLER	EA	2
818009	32 FOOT X 14 INCH STRAIN POLE (TWO PLY)	EA	3
831010	250 WATT HPS LUMINAIRE W/PHOTOCELL	EA	5
832017	ELECTRICAL CABLE- 1 CONDUCTOR (NO. 4 AWG)	LF	15
832020	BARE COPPER GROUND WIRE, NO. 6 AWG	LF	725
837001	GROUND ROD - 3/4 INCH DIAMETER X 10 FOOT LENGTH	EA	4
860272	12 INCH VEHICULAR TRAFFIC SIGNAL HEAD SECTION	EA	30
861107	ELECTRICAL CABLE- 5 CONDUCTOR (NO. 14 AWG)	LF	300
861108	ELECTRICAL CABLE- 7 CONDUCTOR (NO. 14 AWG)	LF	2200
861116	ELECTRICAL CABLE- 2 CONDUCTOR (NO. 12 AWG)	LF	1200
866103	15 FOOT LIGHTING ARM FOR SIGNAL STRUCTURE	EA	5
869101	STEEL SPAN WIRE - 1/4 INCH DIAMETER (TETHER WIRE)	LF	1000
869102	STEEL SPAN WIRE - 3/8 INCH DIAMETER	LF	700
871202	INSTALL CONTROLLER AND CABINET - BASE MOUNT	EA	1

C. MATERIALS TO BE REMOVED BY THE CONTRACTOR.

CATEGORY CODE NO.	DESCRIPTION	UNITS	QUANTITY
	NONE		

WIRING DIAGRAM



KEY

A B C D E F	7 CONDUCTOR ELECTRICAL CABLE (NO. 14 AWG)
G H J K L	5 CONDUCTOR ELECTRICAL CABLE (NO. 14 AWG)
Q R S V W	2 CONDUCTOR ELECTRICAL CABLE (NO. 12 AWG) TRAY CABLE
M N O P	VIDEO DETECTION CABLE (500 FT LEAD IN CABLE)
T	12 PAIR JELLY FILLED INTERCONNECT
U	1 CONDUCTOR (NO. 6 AWG) STRANDED COPPER GROUND WIRE
PS	POWER SERVICE UNDERGROUND
⏚	GROUND ROD

PHASE CHART

	1	2	3	4	5	6	7	8	9	10	11	12
PHASE 2 AND 5	←R–	←R–	G	G	G	G	R	R	R	–R→	–R→	–R→
2 AND 5 CHANGE	←R–	←R–	Y	Y	Y	Y	R	R	R	–R→	–R→	–R→
PHASE 5 AND 6+4	←G–	←G–	G	G	R	R	R	R	G	–G→	–G→	–G→
5 AND 6+4 CHANGE	←Y–	←Y–	Y	Y	R	R	R	R	Y	–Y→	–Y→	–Y→
PHASE 4	←R–	←R–	R	R	R	R	G	G	G	–G→	–G→	–G→
4 CHANGE	←R–	←R–	R	R	R	R	Y	Y	Y	–Y→	–Y→	–Y→
FLASHING OPERATION	FL/R	FL/R	FL/Y	FL/Y	FL/Y	FL/Y	FL/R	FL/R	FL/R	FL/R	FL/R	FL/R

FIRE HOUSE PRE-EMPTION

FIRE HOUSE PRE-EMPTION PHASE 4	←R–	←R–	R	R	R	R	G	G	G	–G→	–G→	–G→
FIRE HOUSE PRE-EMPTION CLEARANCE	←R–	←R–	R	R	R	R	Y	Y	Y	–Y→	–Y→	–Y→
PHASE 2 & 5 NORMAL OPERATION	←R–	←R–	G	G	G	G	R	R	R	–R→	–R→	–R→

TSP 19

M.O.T. STAGE 1 /PHASE B & STAGE 2

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

BRIGGS CHANEY ROAD AT RAMP A AND RAMP B INTERCHANGE IMPROVEMENTS

SABRA, WANG & ASSOCIATES, INC.
1504 JOH AVENUE
SUITE 160
BALTIMORE, MD 21227
WWW.SABRA-WANG.COM

DRAWN BY:	S. SMITH	F.A.P. NO.		TS NO. 4223	SHEET NO.
CHECKED BY:		S.H.A. NO.	M08685170		
SCALE:	NTS	COUNTY:	MONTGOMERY	T.I.M.S. NO. F-357	132 OF 504
DATE:	JANUARY, 2003	LOG MILE:	15002907.64		

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