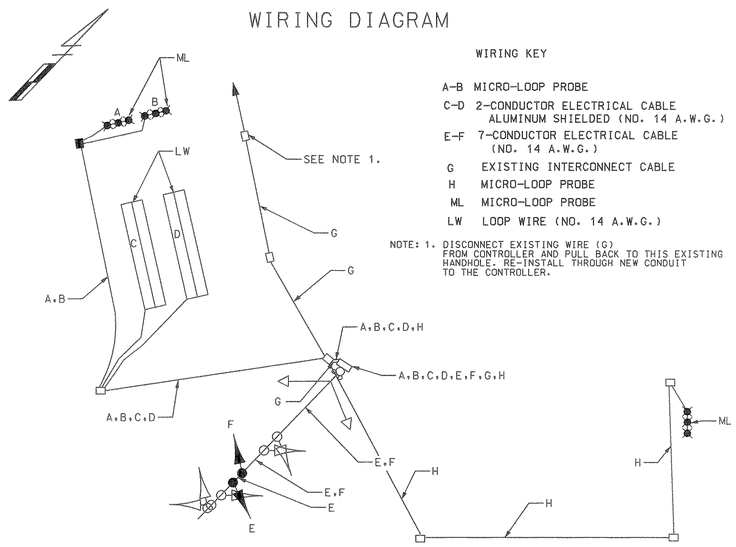
PROJECT DESCRIPTION

THIS PROJECT INVOLVES THE MODIFICATION OF THE EXISTING TRAFFIC CONTROL SIGNAL AT THE INTERSECTION OF MD 7 AND MD 588 IN BALTIMORE COUNTY. MD 7 IS ASSUMED TO RUN IN A NORTH-SOUTH DIRECTION.

CONTROLLER OPERATION

THE EXISTING EIGHT-PHASE, FULLY ACTUATED NEMA CONTROLLER HOUSED IN A POLE MOUNTED CABINET WILL BE USED. THE INTERSECTION CURRENTLY OPERATES AS SEVEN-PHASE CONTROLLER WITH EXCLUSIVE-PERMISSIVE LEFT TURN PHASES FOR NORTHBOUND AND SOUTHBOUNT MD 7 AND EASTBOUND MD 588. A FIREHOUSE PRE-EMPTION PHASE EXISTS FOR EASTBOUND MD 588 AND ALTERNATE PEDESTRIAN PHASES EXIST ON THE NORTH AND WEST LEGS OF THE INTERSECTION. THE MD 588 OPERATION WILL BE CHANGED TO SPLIT PHASING.

WIRING DIAGRAM



WIRING KEY

A-B	MICRO-LOOP PROBE
C-D	2-CONDUCTOR ELECTRICAL CABLE ALUMINUM SHIELDED (NO. 14 A.W.G.)
E-F	7-CONDUCTOR ELECTRICAL CABLE (NO. 14 A.W.G.)
G	EXISTING INTERCONNECT CABLE
H	MICRO-LOOP PROBE
ML	MICRO-LOOP PROBE
LW	LOOP WIRE (NO. 14 A.W.G.)

NOTE: 1. DISCONNECT EXISTING WIRE (G) FROM CONTROLLER AND PULL BACK TO THIS EXISTING HANDHOLE. RE-INSTALL THROUGH NEW CONDUIT TO THE CONTROLLER.

PHASE CHART

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
PHASE 1 & 5	R	R	R	R	R	R	R	R	R	R	DW	DW	DW	DW
1 & 5 CHANGE	PHASE 1 & 5 CHANGE MAY CHANGE TO PHASE 1 & 6, 2 & 5 OR 2 & 6													
PHASE 1 & 6	G	G	G	R	R	R	R	R	R	R	DW	DW	DW	DW
1 & 6 CHANGE	G	G	G	R	R	R	R	R	R	R	DW	DW	DW	DW
PHASE 2 & 5	R	R	R	G	G	G	R	R	R	R	DW	DW	DW	DW
2 & 5 CHANGE	R	R	R	G	G	G	R	R	R	R	DW	DW	DW	DW
PHASE 2 & 6	G	G	G	G	G	G	R	R	R	R	DW	DW	DW	DW
2 & 6 CHANGE	Y	Y	Y	Y	Y	Y	R	R	R	R	DW	DW	DW	DW
PHASE 2 ALT. & 6	G	G	G	G	G	G	R	R	R	R	WK	WK	DW	DW
PED. CLEAR	G	G	G	G	G	G	R	R	R	R	FL/DW	FL/DW	DW	DW
2 ALT. & 6 CHANGE	Y	Y	Y	Y	Y	Y	R	R	R	R	DW	DW	DW	DW
PHASE 3	R	R	R	R	R	R	G	G	R	R	DW	DW	DW	DW
3 CHANGE	R	R	R	R	R	R	Y	Y	R	R	DW	DW	DW	DW
PHASE 3 ALT.	R	R	R	R	R	R	G	G	R	R	DW	DW	WK	WK
PED. CLEAR	R	R	R	R	R	R	G	G	R	R	DW	DW	FL/DW	FL/DW
3 ALT. CHANGE	R	R	R	R	R	R	Y	Y	R	R	DW	DW	DW	DW
PHASE 4	R	R	R	R	R	R	R	R	G	G	DW	DW	DW	DW
4 CHANGE	R	R	R	R	R	R	R	R	Y	Y	DW	DW	DW	DW
PRE-EMPTION	R	R	R	R	R	R	R	R	G	G	DW	DW	DW	DW
CHANGE	R	R	R	R	R	R	R	R	Y	Y	DW	DW	DW	DW
FLASHING OPERATION	FL/Y	FL/Y	FL/Y	FL/Y	FL/Y	FL/Y	FL/R	FL/R	FL/R	FL/R	DARK	DARK	DARK	DARK

EQUIPMENT LIST "A"

A. EQUIPMENT TO BE FURNISHED BY SHA AND INSTALLED BY CONTRACTOR

ITEM NO.	QUANTITY	DESCRIPTION
NONE		

CONTACT PERSONS FOR DISTRICT 4 ARE AS FOLLOWS:

MR. DAVID MALKOWSKI
DISTRICT ENGINEER
(410) 321-2810

MR. JOSEPH MCMAHON
ASSISTANT DISTRICT ENGINEER - UTILITIES
(410) 321-2841

MR. RANDALL SCOTT
ASSISTANT DISTRICT ENGINEER - TRAFFIC
(410) 321-2781

MR. DAVE RAMSEY
ASSISTANT DISTRICT ENGINEER - MAINTENANCE
(410) 321-2761

CONTACTS FOR OFFICE OF TRAFFIC AND SAFETY

MR. RICHARD DAFF SR.
CHIEF, TRAFFIC OPERATIONS
(410) 787-7630

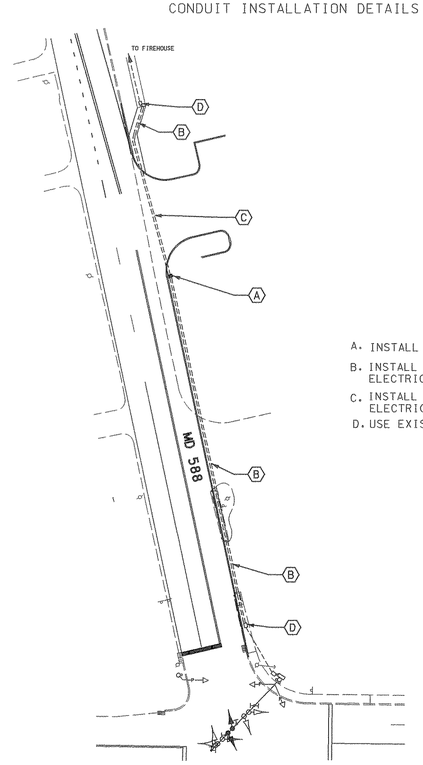
MR. EUGENE BAILEY
TEAM LEADER SIGN OPERATIONS
(410) 787-7676

MR. ROBERT SNYDER
ASSISTANT DIVISION CHIEF,
TRAFFIC OPERATIONS
(410) 787-7631

MR. DAVID SCHWARTZ
SUPPLY OFFICE IV (SIGNAL SHOP WAREHOUSE)
(410) 787-7668

MR. ED RODENHIZER
TEAM LEADER SIGNAL OPERATIONS
(410) 787-7652

CONDUIT INSTALLATION DETAILS



A. INSTALL ELECTRICAL HANDHOLE
B. INSTALL 2 IN. SCHEDULE 80 RIGID ELECTRICAL PVC CONDUIT - TRENCHED
C. INSTALL 2 IN. SCHEDULE 80 RIGID ELECTRICAL PVC CONDUIT - BORED
D. USE EXISTING HANDHOLE

NOT TO SCALE

EQUIPMENT LIST "B" CONTINUED

B. EQUIPMENT TO BE FURNISHED AND/OR INSTALLED BY CONTRACTOR. ALL EQUIPMENT SHALL HAVE CATALOG CUTS SUBMITTED TO OOTS FOR APPROVAL PRIOR TO INSTALLATION.

ITEM NO.	QUANTITY	DESCRIPTION
1001	LS	MAINTENANCE OF TRAFFIC
5004	25 LF	FURNISH AND INSTALL 24 IN. HEAT APPLIED PERMANENT PREFORMED THERMOPLASTIC PAVEMENT MARKING
5006	4 EA	FURNISH AND INSTALL HEAT APPLIED PERMANENT PREFORMED THERMOPLASTIC PAVEMENT MARKING ARROW
8016	2 EA	FURNISH AND INSTALL MICRO-LOOP PROBE WITH 500 FT. LEAD-IN
8017	1 EA	FURNISH AND INSTALL MICRO-LOOP PROBE WITH 1000 FT. LEAD-IN
8021	290 LF	FURNISH AND INSTALL SAW CUT FOR SIGNAL (LOOP DETECTOR)
8022	40 LF	FURNISH AND INSTALL 1 IN. ELECTRICAL CONDUIT GALVANIZED SLEEVE
8023	15 LF	FURNISH AND INSTALL 1 IN. LIQUID TIGHT FLEXIBLE NON-METALLIC CONDUIT FOR DETECTOR SLEEVE
8024	360 LF	FURNISH AND INSTALL 2 IN. SCHEDULE 80 RIGID ELECTRICAL PVC CONDUIT-TRENCHED
8026	60 LF	FURNISH AND INSTALL 2 IN. SCHEDULE 80 RIGID ELECTRICAL PVC CONDUIT-BORED
8033	1 EA	FURNISH AND INSTALL ELECTRICAL HANDHOLE
8040	870 LF	FURNISH AND INSTALL LOOP WIRE ENCASED IN 1/4 IN. FLEXIBLE TUBING (NO. 14 A.W.G.)
8041	550 LF	FURNISH AND INSTALL ELECTRICAL CABLE - 2 CONDUCTOR (ALUMINUM SHEILDED)
8045	160 LF	FURNISH AND INSTALL ELECTRICAL CABLE - 7 CONDUCTOR (NO. 14 A.W.G.)
8060	LS	REMOVE AND DISPOSE OF EXISTING MATERIAL AND EQUIPMENT
8084	8 EA	FURNISH AND INSTALL 12 IN. VEHICULAR TRAFFIC SIGNAL HEAD SECTION
---	320 LF	PULL BACK AND RE-INSTALL EXISTING CABLE
---	1 EA	FURNISH AND INSTALL R3-5L SIGN (30" X 36") MAST ARM MOUNT
---	1 EA	FURNISH AND INSTALL R3-6 MOD. SIGN (30" X 36") MAST ARM MOUNT
---	1 EA	REMOVE EXISTING SIGN

EQUIPMENT LIST "C"

C. EXISTING EQUIPMENT TO BE REMOVED BY THE CONTRACTOR AND DELIVERED TO THE STATE HIGHWAY ADMINISTRATION, 7491 CONNELLEY DRIVE, HANOVER, MARYLAND 21076. THE CONTRACTOR SHALL NOTIFY THE SHA AT (410) 787-7652 AT LEAST THREE DAYS IN ADVANCE OF DELIVERY.

ITEM NO.	QUANTITY	DESCRIPTION
NONE		

NOTE: ALL REMOVED SIGNAL EQUIPMENT AND MATERIAL SHALL BECOME THE PROPERTY OF THE CONTRACTOR

TRAFFIC CONCEPTS, INC.
325 Gambrills Road
Suite E
Gambrills, MD 21054
(410) 923-7101

MARYLAND DOT - STATE HIGHWAY ADMINISTRATION
Office of Traffic & Safety
TRAFFIC ENGINEERING DESIGN DIVISION
GENERAL INFORMATION SHEET
MD 7 (PHILADELPHIA RD.) AND MD 588 (GOLDEN RING RD.)

DRAWN BY: T. ZAYDEL	F.A.P. NO.		TS NO. 1158 H	SHEET NO.
CHECKED BY: K. SCHMID	S.H.A. NO.			
SCALE: NONE	COUNTY:	BALTIMORE	T.I.M.S. NO. E876	2 OF 2
DATE: 6-7-01	LOG MILE:			