PROJECT DESCRIPTION

GENERAL

This project involves the reconstruction of the existing traffic control signal at MD 198 and Sweitzer Lane in Prince George's County. As part of this project, the northbound right turn from Sweitzer Lane will be signalized and a third lane will be added to eastbound MD 198. MD 198 is assumed to run in an east-west orientation. Phase 2 involves the construction of the eastbound through lane on MD 198.

INTERSECTION OPERATIONS

The intersection will operate in a NEMA six phase, semi-actuated mode with the MD 198 approaches running concurrently. The Sweitzer Lane approaches will operate as split phases. Exclusive left turn phasing will be provided on the MD 198 approaches. An alternate pedestrian phase will be provided across the west leg of MD 198. A pedestrian phase concurrent with the MD 198 through phases will be provided across the south leg of Sweitzer Lane.

CONTROLLER REQUIREMENTS

The existing full-traffic-actuated, eight phase controller with four (4) , four channel, time-delay-output loop detector amplifiers, intersection monitor with battery back-up for phone drop and telemetry module in a NEMA size "6" base mounted cabinet that was installed in Phase 1 will be used.

MAINTENANCE OF TRAFFIC

THE FOLLOWING WORK ZONE TRAFFIC CONTROL STANDARDS SHALL BE USED FOR THE PROJECT:

STANDARD NO. MD-104.44-01 (LEFT LANE CLOSURE)

STANDARD NO. MD-104.45-01 (RIGHT LANE CLOSURE)

STANDARD NO. MD-104.48-01 (INTERSECTION LEFT LANE/TURN BAY CLOSURE)

STANDARD NO. MD-104.02-01 (FLAGGING OPERATION)

STANDARD NO. MD-104.03-01 (INTERSECTION FLAGGING)

PROJECT CONTACTS

THE CONTACT PERSONS FOR DISTRICT #3 ARE AS FOLLOWS:

MR. CHARLIE K. WATKINS
DISTRICT ENGINEER
(301) 513-7311

MR. JOE GECKLE
ASSISTANT DISTRICT ENGINEER - UTILITY
(301) 513-7350

MR. MAJID SHAKIB
ASSISTANT DISTRICT ENGINEER - TRAFFIC
(301) 513-7358

MR. RICHARD L. DAFF, SR.
CHIEF, TRAFFIC OPERATIONS DIVISION
(301) 787-7630

MR. RANDY BROWN
ASSISTANT DISTRICT ENGINEER - MAINTENANCE
(301) 531-7304

MR. BARRY KING
CHIEF, TRAFFIC ENGINEERING DESIGN DIVISION
(410) 787-4011

POWER COMPANY REPRESENTATIVE:

BALTIMORE GAS AND ELECTRIC
MR. JOE BRAUCH
7317 PARKWAY DRIVE SOUTH
HANOVER, MD 21076

PHASE CHART

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21
	R Y C	R Y C	R Y G	R Y G	R Y C	R Y C	R Y G	R Y G	R Y G C	R Y G C	R Y G	R Y G C	R Y G C	R Y G C	R Y G	R Y G C	R Y G				
PHASE 1 + 5 *	G	G	R	R	G	G	R	R	R	R	R	G	G	G	R	R	R	DW	DW	DW	DW
1 + 5 CHANGE	Y	Y	R	R	Y	Y	R	R	R	R	R	SEE NOTE #2			R	R	R	DW	DW	DW	DW
PHASE 1 + 6	G	G	G	G	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	R	R	R	DW	DW	DW	DW
1 + 6 CHANGE	Y	Y	Y	Y	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	R	R	R	DW	DW	DW	DW
PHASE 2 + 5	R	R	R	R	G	G	G	G	R	R	R	G	G	G	R	R	R	DW	DW	WALK	WALK
2 + 5 CHANGE	R	R	R	R	Y	Y	Y	Y	R	R	R	Y	Y	Y	R	R	R	DW	DW	DW	DW
PHASE 2 + 6	R	R	G	G	R	R	G	G	R	R	R	FL/R	FL/R	FL/R	R	R	R	DW	DW	DW	DW
PED. CLEAR	R	R	R	R	G	G	G	G	R	R	R	G	G	G	R	R	R	DW	DW	FL/DW	FL/DW
2 + 6 CHANGE	R	R	Y	Y	R	R	Y	Y	R	R	R	FL/R	FL/R	FL/R	R	R	R	DW	DW	DW	DW
PHASE 3	R	R	R	R	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	G	G G	G	DW	DW	DW	DW
3 CHANGE	R	R	R	R	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	Y	Y	Y	DW	DW	DW	DW
PHASE 3 ALT.	R	R	R	R	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	G	G G	G	WALK	WALK	DW	DW
PED. CLEAR	R	R	R	R	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	G	G G	G	FL/DW	FL/DW	DW	DW
3 ALT. CHANGE	R	R	R	R	R	R	R	R	R	R	R	FL/R	FL/R	FL/R	Y	Y	Y	DW	DW	DW	DW
PHASE 4	R	R	R	R	R	R	R	R	G G	G G	G	G	G	G	R	R	R	DW	DW	DW	DW
4 CHANGE	R	R	R	R	R	R	R	R	Y	Y	Y	G	G	G	R	R	R	DW	DW	DW	DW
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	FL/R	FL/R	FL/R	DARK	DARK	DARK	DARK

PHASING NOTES

* ① PHASE 1 + 5 MAY CHANGE TO PHASE 1 + 6 OR PHASE 2 + 5

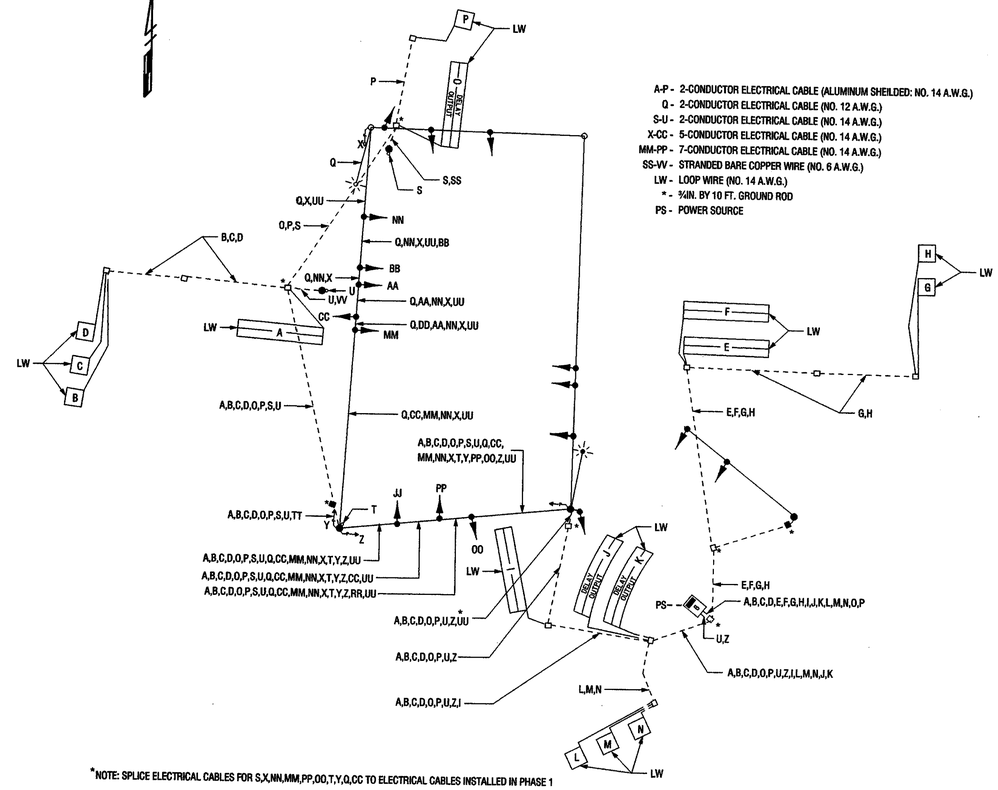
② IF PHASE 1 + 5 CHANGES TO PHASE 2 + 5, THEN DISPLAY —G— FOR SIGNALS 12 AND 13 OTHERWISE DISPLAY FL/R

TIME OF DAY / DAY OF WEEK / HOLIDAY PHASING

SIGNALS 12, 13 AND 14 WILL OPERATE IN RED FLASH DURING WEEKDAY NON-PEAK HOURS, WEEKENDS AND HOLIDAYS.

THE SIGNALS WILL OPERATE AS SHOWN IN THE ABOVE PHASING CHART DURING WEEKDAY PEAK HOURS. PEAK HOURS ARE FROM 7 AM - 9 AM, AND 4 PM TO 6 PM.

WIRING DIAGRAM



*NOTE: SPLICE ELECTRICAL CABLES FOR S,X,NN,MM,PP,OO,T,Y,Q,CC TO ELECTRICAL CABLES INSTALLED IN PHASE 1

EQUIPMENT LIST A

EQUIPMENT TO BE SUPPLIED BY THE SHA

900000	3 EACH	12 IN., ONE-WAY, THREE-SECTION (R,Y,G) BLACK POLYCARBIDE TRAFFIC SIGNAL HEAD - SPAN MOUNT
900000	3 EACH	12 IN., ONE-WAY, THREE SECTION (RA,YA,GA) BLACK POLYCARBIDE TRAFFIC SIGNAL HEAD - SPAN MOUNT
900000	2 EACH	12 IN., ONE-WAY, FOUR-SECTION (R,Y,G,GA) BLACK POLYCARBIDE TRAFFIC SIGNAL HEAD - SPAN MOUNT
900000	2 EACH	12 IN., ONE-WAY, TWO-SECTION (DON'T WALK, WALK) PEDESTRIAN SIGNAL HEAD WITH ADJUSTABLE BRACKET FOR STRAIN POLE MOUNTING AND CUTAWAY VISORS-POLE MOUNT
965001	3 EACH	PEDESTRIAN PUSHBUTTON AND R10-4(1) SIGN (NOTE: SIGN TO READ "PUSH BUTTON TO CROSS MD 198")

SHEET ALUMINUM SIGNS:
2 EACH - R3-5, 'LEFT ONLY' SIGN (30" X 36")- SPAN WIRE MOUNT
1 EACH - SHIELD ASSEMBLY (48" X 75") - POLE MOUNT
1 EACH - SHIELD ASSEMBLY (30" X 51") - POLE MOUNT

EQUIPMENT LIST B

EQUIPMENT TO BE FURNISHED OR INSTALLED BY THE CONTRACTOR

130850	LUMP SUM	MOBILIZATION
120500	LUMP SUM	MAINTENANCE OF TRAFFIC
203030	2 CY	TEST PIT EXCAVATION
130840	LUMP SUM	CONSTRUCTION STAKEOUT
801004	6 CY	FURNISH AND INSTALL CONCRETE FOR SIGNAL FOUNDATION
869102	225 LF	FURNISH AND INSTALL STEEL SPAN WIRE - 3/8 IN. DIAMETER
869101	225 LF	FURNISH AND INSTALL STEEL BOTTOM SPAN WIRE - 1/4 IN. DIAMETER
862101	8100 LF	FURNISH AND INSTALL LOOP WIRE ENCASED IN FLEXIBLE TUBING (NO. 14 A.W.G.)
861116	407 LF	FURNISH AND INSTALL ELECTRICAL CABLE - 2-CONDUCTOR (NO. 12 A.W.G.)
861104	785 LF	FURNISH AND INSTALL ELECTRICAL CABLE - 2-CONDUCTOR (NO. 14 A.W.G.)
861107	893 LF	FURNISH AND INSTALL ELECTRICAL CABLE - 5-CONDUCTOR (NO. 14 A.W.G.)
861108	630 LF	FURNISH AND INSTALL ELECTRICAL CABLE - 7-CONDUCTOR (NO. 14 A.W.G.)
802501	279 LF	FURNISH AND INSTALL STRANDED BARE COPPER GROUND WIRE (NO. 6 A.W.G.)
800000	1 EACH	FURNISH AND INSTALL 12 IN. BY 32 FT STRAIN POLE (TWO PLY), ANCHOR BOLTS WILL BE 2 1/4 IN. BY 96 IN.
868003	2 EACH	FURNISH AND INSTALL 10 FT. BREAKAWAY PEDESTAL POLE
800000	2 EACH	CUT, CLEAN, GALVANIZE AND CAP STEEL STRAIN POLE
862102	1299 LF	FURNISH AND INSTALL SAW CUT FOR SIGNAL (LOOP WIRE)
805150	90 LF	FURNISH AND INSTALL 3 IN. SCHEDULE 80 PVC ELECTRICAL CONDUIT (SLOTTED)
837001	1 EACH	FURNISH AND INSTALL GROUND ROD - 3/4 IN. DIAMETER BY 10 FT. LENGTH
585445	116 LF	FURNISH AND INSTALL 24 IN. WHITE REFLECTIVE THERMOPLASTIC PAVEMENT MARKING TAPE
585443	375 LF	FURNISH AND INSTALL 12 IN. WHITE REFLECTIVE THERMOPLASTIC PAVEMENT MARKING TAPE
800000	10 EACH	INSTALL SIGNAL HEAD
865001	3 EACH	INSTALL PUSHBUTTON AND SIGN
813015	36 SF	INSTALL SHEET ALUMINUM SIGNS
813006	2 EACH	RELOCATE EXISTING SIGN: 2 EACH - D3-2, DUAL FACED(18" X VAR.) - SPAN WIRE MOUNT
800000	LUMP SUM	REMOVE AND DISPOSE OF EXISTING EQUIPMENT
805125	8 LF	FURNISH AND INSTALL 2 IN. SCHEDULE 80 PVC ELECTRICAL CONDUIT (TRENCHED)
805135	8 LF	FURNISH AND INSTALL 3 IN. SCHEDULE 80 PVC ELECTRICAL CONDUIT (TRENCHED)
805160	48 LF	FURNISH AND INSTALL 1 IN. LIQUID TIGHT FLEXIBLE NON-METALLIC CONDUIT FOR DETECTOR SLEEVE
805160	29 LF	FURNISH AND INSTALL 1 IN. GALVANIZED CONDUIT FOR DETECTOR SLEEVE
811001	1 EACH	FURNISH AND INSTALL ELECTRICAL HANDBOX
800000	LUMP SUM	REMOVE AND DELIVER SIGNAL POLE

(TSP-2)

GREENHORNE & O'MARA, INC.
810 GLENEAGLES COURT, SUITE 106
(410) 583-6700
ANNAPOLIS,MD-ATLANTA,GA-BALTIMORE,MD-FAIRFAX,VA-ORLANDO,FLA
TAMPA,FLA-WEST PALM BEACH,FLA-RALEIGH,NC-ROCKVILLE,MD, GREENBELT, MD

REVISIONS

(C) Signal reconstruct due to geometric improvements				June 1999
KAR	JMC			
(B) As-Built				
(A) Install split phase NB/SB Sweitzer Lane				February 6, 1997
FJH		DD	BK	TH

APPROVALS

ORIGINAL

ASST. TRAFFIC ENGINEERING DESIGN DIVISION

ON

ASST. DISTRICT ENGINEER, TRAFFIC

CHIEF, TRAFFIC ENGINEERING DESIGN DIVISION

FILE

DIRECTOR, TRAFFIC & SAFETY

MARYLAND DOT - STATE HIGHWAY ADMINISTRATION
Office of Traffic & Safety
TRAFFIC ENGINEERING DESIGN DIVISION
Traffic Signal Plan - Phase 2
MD 198 at Sweitzer Lane

DRAWN BY:	D. ANDREWS	F.A.P. NO.	N/A	TS NO. 2110 C	SHEET NO.
CHECKED BY:	S. RENZI	S.H.A. NO.	855-16001		
SCALE:	1" = 20'	COUNTY:	Prince George's	T.I.M.S. NO.	56 OF 65
DATE:	AUGUST 22, 1985	LOG MILE:	16001980.67		