PROJECT DESCRIPTION

I. GENERAL:

THIS PROJECT INVOLVES THE RECONSTRUCTION OF THE EXISTING SIGNALS FROM A STRAIN POLES TO MAST ARMS AT MD 2 (GOVERNOR RITCHIE HIGHWAY) AT WELLHAM AVENUE/HOLSUM WAY AND MD 3 BUSINESS (CRAIN HIGHWAY) IN ANNE ARUNDEL COUNTY.

MD 2 (GOVERNOR RITCHIE HIGHWAY) IS ASSUMED TO RUN IN A NORTH-SOUTH DIRECTION.

II. INTERSECTION OPERATION:

THE INTERSECTIONS ARE INTERCONNECTED TOGETHER TO OPERATE AS ONE IN A NEMA SIX PHASE, FULL TRAFFIC ACTUATED MODE WITH EXCLUSIVE/PERMISSIVE LEFT TURN PHASING FOR NORTHBOUND APPROACH AT THE INTERSECTION OF MD 2 AT WELLHAM AVENUE/HOLSUM WAY. MD 2 NORTH AND SOUTH THROUGH MOVEMENTS SHALL OPERATE CONCUREENTLY.

III. SPECIAL NOTES:

THIS SIGNAL SHALL BE COORDINATED WITH THE RECONSTRUCTION OF MD 2 AT DOVER ROAD. TURN ON DATES SHALL BE COORDINATED TO OCCUR SIMULTANEOUS TO INSURE NO DOWN TIME OF THE INTERCONNECTED SIGNAL SYSTEM.

PROJECT CONTACTS:

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

MS. KIMBERLY TRAN, ASSISTANT DISTRICT ENGINEER - TRAFFIC
PHONE: (410) 841-1003

MR. JAMES FOLDEN, ASSISTANT DISTRICT ENGINEER - CONSTRUCTION
PHONE: (410) 841-1031

MR. JOHN MAYS, ASSISTANT DISTRICT ENGINEER - MAINTENANCE
PHONE: (410) 841-1013

MR. MIKE HUBER, UTILITY ENGINEER
PHONE: (410) 841-1039

MR. RICHARD DAFF, CHIEF TRAFFIC OPERATIONS DIVISION
PHONE: (410) 787- 7630

MR. EDWARD RODENHIZER, SIGNAL SHOP
PHONE: (410) 787- 7652

MR. SONNY BAILEY, CHIEF SIGN SHOP
PHONE: (410) 787-7676

THE POWER COMPANY REPRESENTATIVE
BALTIMORE GAS AND ELECTRIC
7317 PARKWAY DRIVE SOUTH
HANOVER, MARYLAND 21070
(410) 850-4620

2. MAINTENANCE OF TRAFFIC WILL BE HANDLED BY THE CONTRACTOR UTILIZING THE STANDARD PLATES FOR TRAFFIC CONTROL FROM SECTION MD 104.00 OF THE STANDARDS FOR HIGHWAYS & INCIDENTAL STRUCTURES.

EQUIPMENT LIST 'A'

A. EQUIPMENT TO BE SUPPLIED BY THE ADMINISTRATION.

CATEGORY CODE NO.	DESCRIPTION	QUANTITY
900000	SHA - LOCAL CONTROLLER AND CABINET SIZE 6 W/ ALL NECESSARY EQUIPMENT HOUSED IN BASE MOUNTED CABINET	1 EA
900000	"G" CABINET POLE MOUNTED W/ ALL NECESSARY INTERCONNECT EQUIPMENT	1 EA
900000	SHA FURNISHED SIGNS:	127 SF
1 EA	R5-1 "DO NOT ENTER SYMBOL" (30"x30") POLE MOUNTED	
1 EA	R10-12 "LEFT TURN YIELD ON GREEN" (30"x36") MAST ARM MOUNT	
4 EA	R3-5L "LEFT ONLY'(30"x36") MAST ARM MOUNTED	
1 EA	R3-5R "RIGHT ONLY" (30"x36") MAST ARM MOUNTED	
1 EA	R3-5LTR "LEFT & THUR & RIGHT" (30"x36") MAST ARM MOUNT	
2 EA	R3-2 NO LEFT TURN SYBMOL (30"x30") MAST ARM SMOUNT	
2 EA	D-3(1) (16"x96") MAST ARM MOUNT (DUAL FACED) "Wellham AVE DR ,ARROW/ ARROW, Wellham AVE" "ARROW, Holsum WAY/ Holsum WAY, ARROW"	
3 EA	D-3(2) (16"x96") MAST ARM MOUNT (SINGLE FACE) "Governor Ritchie HWY"	
1 EA	M95-1 (30"X78") MAST ARM MOUNTED "NORTH, LEFT ARROW, MD 2, SOUTH, RIGHT ARROW"	
1 EA	M95-1 (30"X78") MAST ARM MOUNTED "SOUTH, LEFT ARROW, MD 2, NORTH, RIGHT ARROW"	

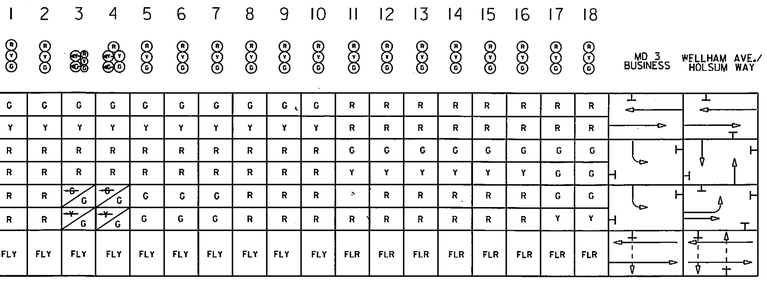
EQUIPMENT LIST 'B'

CATEGORY CODE NO.	DESCRIPTION	QUANTITY
120500	MAINTENANCE OF TRAFFIC	1 EA
203030	TEST PIT EXCAVATION	6 CY
500000	REMOVE PAVEMENT MARKING LINES	260 LF
500000	REMOVE PAVEMENT SYMBOLS/LETTERS	20 EA
585625	24 INCH HEAT APPL. WHITE PERMANENT PREFORMED THERMO. PAVEMENT MARKING	260 LF
585627	WHITE PERMANENT PREFORMED SYMBOL/LETTERS	187 SF
655105	5 INCH CONCRETE SIDEWALK	140 SF
800000	WOOD POST UP TO 4" X6"	13 LF
800000	MAST ARM POLE & 50' FOOT MAST ARM ANY "T" DIMENSION	1 EA
800000	MAST ARM POLE & 60' FOOT MAST ARM ANY "T" DIMENSION	1 EA
800000	MAST ARM POLE & 70' FOOT MAST ARM ANY "T" DIMENSION	1 EA
800000	MAST ARM POLE & 50'/50' FOOT MAST ARMS ANY "T" DIMENSION	1 EA
800000	MAST ARM POLE & 50'/70' FOOT MAST ARMS ANY "T" DIMENSION	1 EA
800000	MICROLOOP PROBE ANY LENGTH LEAD-IN	5 EA
800000	1" DETECTOR SLEEVES	30 LF
800000	REMOVE AND DISPOSE OF EXISTING EQUIPMENT	1 EA
800000	VIDEO CAMERA & CABLE ANY LENGTH	5 EA
800000	12 PAIR COMMUNICATION CABLE	700 LF
800000	DISCONNECT, PULL BACK & REROUTE EXISTING CABLES	500 LF
800000	SCHEDULE 80 PVC CONDUIT UP TO 4" - BORED	470 LF
800000	SCHEDULE 80 PVC CONDUIT UP TO 4" - SLOTTED	300 LF
800000	SCHEDULE 80 PVC CONDUIT UP TO 4" - TRENCHED	500 LF
800000	ANY SIZE LIGHTING ARM ON SIGNAL POLE W/ 250 WATT LUMINAIRE	4 EA
800000	DETECTABLE WARNING SURFACE	10 SF
800000	INSTALL OVERHEAD OR GROUND MOUNTED	127 SF
800000	RELOCATE EXISTING SIGN	1 EA
800000	BATTERY BACKUP SYSTEM WITH NEMA SIZE "6" BASE MOUNTED CABINET	1 EA
800000	8" LED SIGNAL SECTION	3 EA
802501	NO. 6 AWG STRANDED BARE GROUND WIRE	1020 LF
807202	METERED SERVICE PEDESTAL (100 AMP)	1 EA
810022	CABLE 1-CONDUCTOR, NO. 8 AWG-THHN/THWN	100 LF
811001	FURNISH AND INSTALL ELECTRICAL HANDHOLE	10 EA
860284	12' LED SIGNAL HEAD SECTION	55 EA
860292	CUT, CLEAN, GALVANIZED, AND CAP SIGNAL STRUCTURE	1 EA
861107	ELECTRICAL CABLE - 5 CONDUCTOR (NO. 14 AWG)	130 LF
861108	ELECTRICAL CABLE - 7 CONDUCTOR (NO. 14 AWG)	6780 LF
861116	ELECTRICAL CABLE - 2 CONDUCTOR (NO. 12 AWG)	2060 LF
862102	SAWCUT FOR DETECTOR	80 LF
871201	INSTALL CONTROLLER AND CABINET - POLE MOUNT	1 EA
871202	INSTALL CONTROLLER AND CABINET - BASE MOUNT	1 EA

EQUIPMENT LIST 'C'

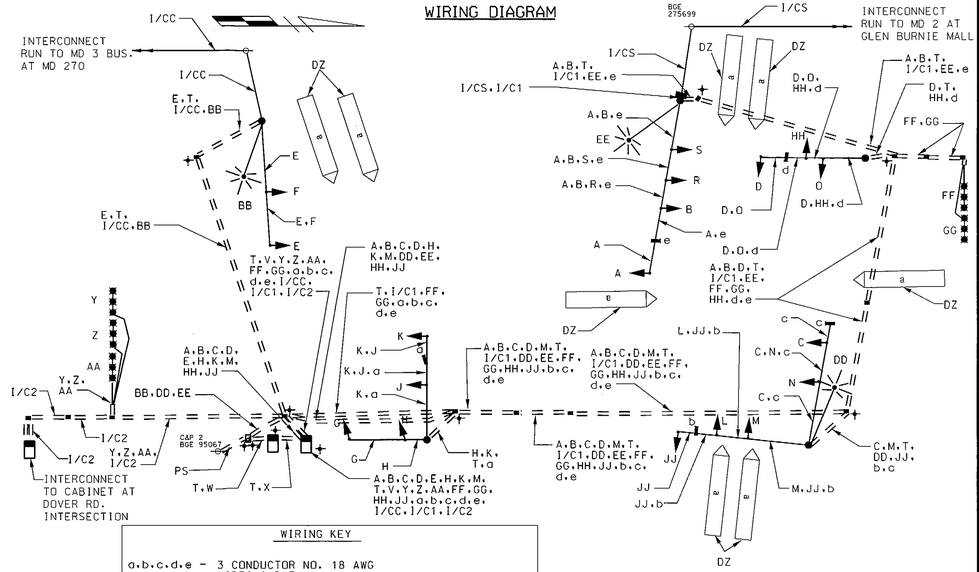
C. SHA FORCES SHALL REMOVE THE CONTROLLER AND ALL AUXILLIARY EQUIPMENT FROM THE CONTROLLER CABINETS. THE CABINETS AND ALL OTHER MATERIALS TO BE REMOVED BY THE CONTRACTOR SHALL BECOME THE PROPERTY OF THE CONTRACTOR.

PHASE CHART



	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
PHASE 2 & 6	G	G	G	G	G	G	G	G	G	G	R	R	R	R	R	R	R	R
PHASE 2 & 6 CHANGE	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	R	R	R	R	R	R	R	R
PHASE 4	R	R	R	R	R	R	R	R	R	R	G	G	G	G	G	G	G	G
PHASE 4 CHANGE	R	R	R	R	R	R	R	R	R	R	Y	Y	Y	Y	Y	Y	G	G
PHASE 8	R	R	G	G	G	G	G	R	R	R	R	R	R	R	R	R	G	G
PHASE 8 CHANGE	R	R	G	G	G	G	G	R	R	R	R	R	R	R	R	R	Y	Y
FLASHING OPERATION	FLY	FLY	FLY	FLY	FLY	FLY	FLY	FLY	FLY	FLY	FLR	FLR	FLR	FLR	FLR	FLR	FLR	FLR

WIRING DIAGRAM



WIRING KEY

a.b.c.d.e	- 3 CONDUCTOR NO. 18 AWG VIDEO CABLE
A.B.C.D. E.H.K.M. HH.JJ	- 7 CONDUCTOR NO. 14 AWG ELEC. CABLE
F.G.J.L.N.- O.R.S.	5 CONDUCTOR NO. 14 AWG ELEC. CABLE
BB.DD.EE-	2 CONDUCTOR NO. 12 AWG ELEC. CABLE
T	- NO 6 AWG STRANDED BARE COPPER GROUND WIRE
W.X	- 1 CONDUCTOR NO. 8 AWG-THHN/THWN ELEC. CABLE
Y.Z.AA. FF.GG	- MICROLOOP PROBES W/ 500' LEAD-IN
I/C1	- 12 PAIR COMMUNICATION CABLE
I/C2	- INTERCONNECT CABLE FROM DOVER ROAD INTERSECTION
I/CS	- EXISTING INTERCONNECT CABLE TO BE PULLED-BACK, RE-ROUTE TO NEW SPLICE CABINET
I/CC	- EXISTING INTERCONNECT CABLE TO BE PULLED-BACK, RE-ROUTE TO NEW CONTROLLER
PS	- PROPOSED SERVICE FEED
DZ	- DETECTION ZONE
⏚	- GROUND ROD (3/4" DIA.x 10' LENGTH)

CENTURY ENGINEERING
CONSULTING ENGINEERS - PLANNERS
10710 GILROY ROAD
HUNT VALLEY, MD 21031

REVISION 'C' 26265.15

STATE OF MARYLAND
DEPARTMENT OF TRANSPORTATION
STATE HIGHWAY ADMINISTRATION
OFFICE OF TRAFFIC & SAFETY
TRAFFIC ENGINEERING DESIGN DIVISION

MD 2 AT WELLHAM AVENUE/ HOLSUM WAY AND MD 3 BUSINESS

GENERAL INFORMATION PLAN

SCALE NONE ADVERTISED DATE 5-20-2009 CONTRACT NO. AA2615168

DESIGNED BY ENB
DRAWN BY ENB
CHECKED BY MR
F.A.P. NO.
COUNTY ANNE ARUNDEL
LOGMILE 02000238.19
TIMS NO. J 661
TOD NO.

TS NO. 826C-G1 | DRAWING 2 - 2 OF | SHEET NO. 9 OF 31

PLOTTED: $DATETIME$
FILE: $FILE$

DRILL HOLES
DRILL HOLES
DRILL HOLES

BORDER REV: DATE: June 1, 2004
BY: $USERNAME$