

PROJECT DESCRIPTION

I. GENERAL

This project involves the modification of an existing crosswalk Hazard Identification Beacon at the intersection of MD 500 (Queens Chapel Road) and Buchanan Street / Shopping Center Driveway in Prince George's County. MD 500 (Queens Chapel Road) is assumed to run in a east/west direction.

II. INTERSECTION OPERATION

- a) This intersection is to operate as a pedestrian crossing signal with the MD 500 (Queens Chapel Road) approaches running concurrently in a flashing "Yellow" mode. A pushbutton actuated exclusive pedestrian phase shall be provided across the south leg of the intersection. This phase shall be preceded by a Quick Flashing operation on the MD 500 (Queens Chapel Road) approaches. The Buchanan Street / Shopping Center Driveway approaches shall operate in a flashing Red mode. The existing advance warning Hazard Identification Beacon located approximately 500' south of the MD 500 (Queens Chapel Road) shall remain in operation.
- b) A full-traffic-actuated, eight-phase controller with all necessary equipment housed in a NEMA size "6" base-mounted cabinet shall be installed at this intersection.

III. SPECIAL NOTES

- 1. The Contractor shall be responsible for terminating all signal cables, to the appropriate terminals and shall properly label each cable.
- 2. All underground and overhead utilities shown on these plans are schematic only and may not be complete. The Contractor shall be responsible for notifying Miss Utility prior to construction so that all utilities may be located in the field. If the Contractor perceives that a conflict between the utilities and the traffic signal will occur, the Contractor shall notify the Project Engineer immediately so that the conflict may be resolved.
- 3. All controller cabinet wiring will be performed by the S.H.A. Signal Shop Contact Mr. Ed Rodenhizer at (410) 787-7650 seventy-two hours in advance of intended work.

EQUIPMENT LIST

A. EQUIPMENT TO BE SUPPLIED BY S.H.A

ITEM NO.	DESCRIPTION	QUANTITY
9042	Controller ASC 2 with telemetry	1 EA
9044	Controller cabinet, size "6"	1 EA
9571	Sheet aluminum signs to consist of:	158 SF
	D3-2 "Buchanan ST" sign, (var x 16") (dual faced) mast arm mounted.	2 EA
	M6-2 "ARROW (left)" sign, (21"x15") pole mounted.	2 EA
	M6-2 "ARROW (right)" sign, (21"x15") pole mounted.	2 EA
	W11A-2 "PEDESTRIAN CROSSING (SYMBOLIC)" sign, (30" x 30") pole mounted.	4 EA
	W11A-2 "PEDESTRIAN CROSSING (SYMBOLIC)" sign, (48" x 48") pole mounted.	1 EA
	Spec W11A-2 "PEDESTRIAN CROSSING (SYMBOLIC)"/ PED XING" sign, (5'x9') mast arm mounted.	2 EA
	W25-2 "500 FEET" (24"x18") pole mounted.	1 EA

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

ITEM NO.	DESCRIPTION	QUANTITY
1001	Maintenance of traffic per assignment.	1 EA
2002	Test Pit Excavation	5 C.Y.
8000	Furnish and install 16" countdown pedestrian signal head	4 EA
8009	Furnish and install breakaway pedestal pole (10')	1 EA
8011	Pedestrian pushbutton and R10-4(1) sign. (Note: Sign to read "PUSHBUTTON TO CROSS QUEENS CHAPEL".)	3 EA
8013	Remove and dispose of existing material and equipment per assignment.	1 EA
8016	Furnish and install 2" schedule 80 rigid polyvinyl chloride - trenched.	40 L.F.
8019	Disconnect, pull back and reroute cable.	50 L.F.

EQUIPMENT LIST (CONT.)

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

ITEM NO.	DESCRIPTION	QUANTITY
8024	Furnish and install concrete for signal foundation.	11 C.Y.
8026	Furnish and install No. 6 AWG stranded bare copper ground wire.	385 L.F.
8032	Furnish and install 3" schedule 80 rigid polyvinyl chloride - trenched.	35 L.F.
8033	Furnish and install 4" schedule 80 rigid polyvinyl chloride - trenched.	50 L.F.
8038	Furnish and install electrical utility service equipment (120/240 V, 1 phase 3 wire system).	1 EA
8047	Install overhead sign.	158 SF
8053	Furnish and install ground rod - 3/4" x 10'.	4 EA
8055	Furnish and install 8" vehicular traffic signal head section.	4 EA
8056	Furnish and install 12" vehicular traffic signal head section.	18 EA
8059	Furnish and install electrical cable - 2 conductor (No. 14 AWG).	380 L.F.
8061	Furnish and install electrical cable - 5 conductor (No. 14 AWG).	600 L.F.
8062	Furnish and install electrical cable - 7 conductor (No. 14 AWG).	750 L.F.
8065	Furnish & install steel pole and single mast arm (60' cut to 35')	1 EA
8066	Furnish & install steel pole and twin mast arms (50'/60' cut to 35')	1 EA
8071	Install controller and cabinet base mount.	1 EA

C. EQUIPMENT TO BE REMOVED

SHA Forces shall remove the controller and all auxiliary equipment from the controller cabinet. The cabinet and all other removed signal materials are to become property of the contractor.

The contact persons for District #3 (Prince George's County) are as follows:

Mr. Majid Shakib  
Assistant District Engineer - Traffic  
Phone: (301) 513-7358

Mr. Wayne Mowdy  
Assistant District Engineer - Maintenance  
Phone: (301) 513-7304

Mr. Augie Rebish  
Assistant District Engineer - Utility  
Phone: (301) 513-7350

Mr. Richard L. Daff, Sr.  
Chief, Traffic Operations Division  
Phone: (410) 787-7630

Mr. Ed Rodenhizer  
Signal Shop  
410-787-7652

Mr. Sonny Bailey  
Sign Shop  
(410) 787-7650

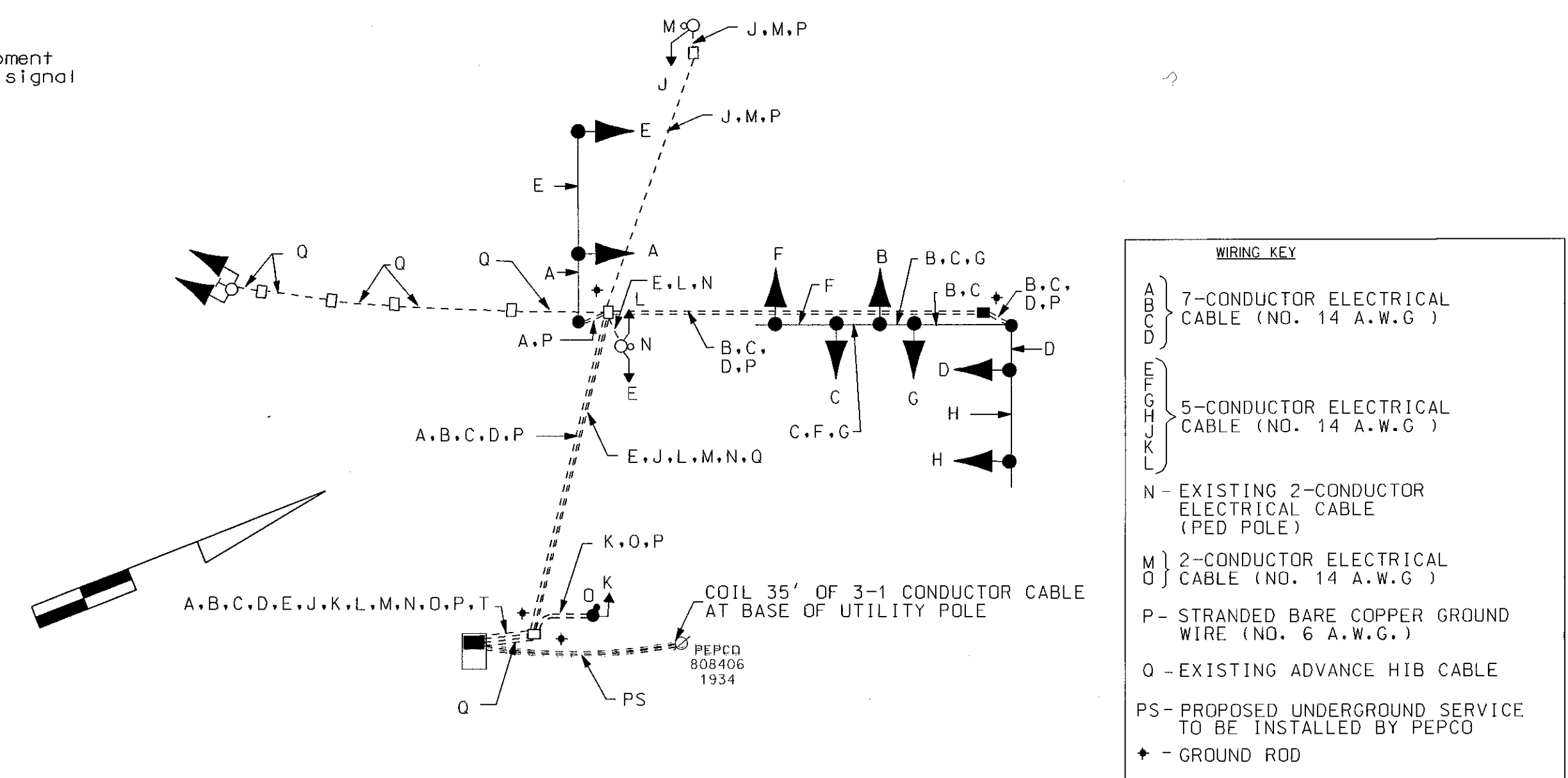
The power company representative is:

Mr. Richard Chilcoat  
PEPCO Customer Design  
8300 Old Marlboro Pike  
Upper Marlboro Pike, MD 20772

PHASE CHART

	1	2	3	4	5	6	7	8	9	10	7	8	9	10
PHASE 2 & 6	Y	Y	R	R	R	R	R	R	R	R	R	R	R	R
2 & 6 CLEAR	Y	Y	QFL	QFL	QFL	QFL	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
PED PHASE	Y	Y	R	R	R	R	R	R	R	R	WK	WK	WK	WK
PED CLEARANCE	Y	Y	R	R	R	R	R	R	R	R	FL/DW	FL/DW	FL/DW	FL/DW
PED CHANGE	Y	Y	R	R	R	R	R	R	R	R	DW	DW	DW	DW
FLASHING OPERATION	Y	Y	FL/8"Y	FL/8"Y	FL/8"Y	FL/8"Y	FL/R	FL/R	FL/R	FL/R	DARK	DARK	DARK	DARK

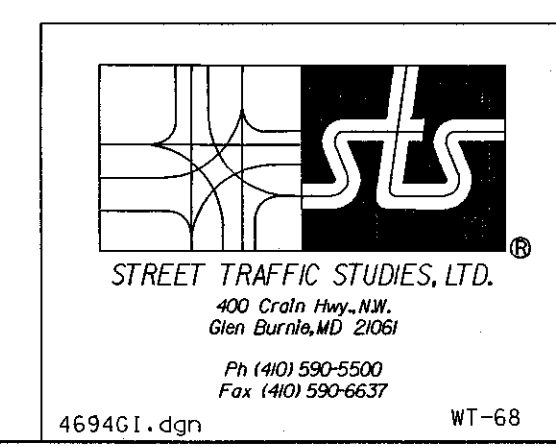
WIRING DIAGRAM



SHA#PG652A53/B53 T0D#AT 582-14

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

MD 500 AND BUCHANAN STREET



DRAWN BY: ROB CICCHINI	F.A.P. NO. AC-STPG-0005(591)E	TS NO. 3867	SHEET NO. 2 OF 2
CHECKED BY: JAMES W ALLEN	S.H.A. NO. 175025533	T.I.M.S. NO. 6245	
SCALE: NONE	COUNTY: PRINCE GEORGE'S		
DATE: 10-05-04	LOG MILE: 16050000.73		