PROJECT DESCRIPTION

I. GENERAL

This project involves the modification of an existing Traffic Control Signal with street lighting at the intersection of MD 27 (Ridge Rd) and Watersville Road in Carroll County. The modifications, which consist of new loop detectors and conduits are the result of geometric improvements at this intersection. MD 27 (Ridge Rd) is assumed to run a north-south direction.

II. INTERSECTION OPERATION

1. There shall be no change in the phasing of this intersection. The intersection shall continue to operate in a NEMA four-phase, fully-actuated mode, with the MD 27 (Ridge Rd) approaches running concurrently. The Watersville Rd approaches shall also run concurrently. Pre-emption for the eastbound approach of Watersville Rd shall continue to be provided.

2. A full-traffic-actuated, eight-phase controller with all necessary equipment housed in a NEMA size "6" base-mounted cabinet shall be utilized 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 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.

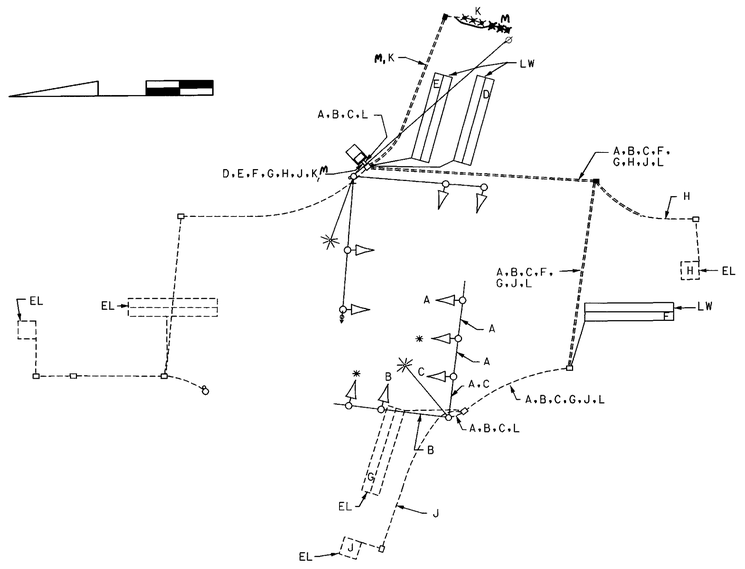
3. All underground and overhead utilities shown on these plans are schematic only and may not be complete. The Contractor shall be responsible for notifying Miss Utility prior to construction so that all utilities may be located in the field. If the Contractor perceives that a conflict between the utilities and the traffic signal will occur, the Contractor shall notify the Project Engineer immediately so that the conflict may be resolved.

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

SPEC. NUMBER	DESCRIPTION	QUANTITY
815	Saw cut for signal (loop detector).	370 L.F.
805	1" galvanized steel electrical conduit (detector wire sleeve)	45 L.F.
805	1" liquid tight flexible non-metallic conduit for detector sleeve.	5 L.F.
805	Furnish and install 2" schedule 80 rigid polyvinyl chloride - trenched	45 L.F.
805	Furnish and install 3" schedule 80 rigid polyvinyl chloride conduit - trenched	95 L.F.
805	Furnish and install 4" schedule 80 rigid polyvinyl chloride conduit - bored.	155 L.F.
811	Furnish and install electrical handhole.	2 EA
556	24" white heat applied permanent preformed thermoplastic pavement marking	80 L.F.
813	Overhead mounted sheet aluminum sign consisting of: R3-5L "LEFT TURN ONLY" sign, (30" x 36") span wire mounted.	7.5 S.F.
	Relocate existing overhead sign	1 EA
810	Furnish and install loop wire encased in flexible tubing (No. 14 AWG).	1420 L.F.
810	Furnish and install electrical cable - 2 conductor (aluminum shielded).	1305 L.F.
810	Furnish and install 5-conductor electrical cable (No. 14 A.W.G.).	250 L.F.
810	Furnish and install 7-conductor electrical cable (No. 14 A.W.G.).	560 L.F.
810	Furnish and install No. 6 AWG stranded bare copper ground wire.	195 L.F.
	Furnish and install micro-loop probe set with 500' lead-in.	2 EA
	Remove and dispose of existing signal equipment.	LUMP SUM

THERE IS NO PHASING CHANGE TO THIS INTERSECTION

WIRING DIAGRAM



WIRING KEY

A } 7-CONDUCTOR ELECTRICAL
B } CABLE (NO. 14 A.W.G)

C - 5-CONDUCTOR ELECTRICAL CABLE (NO. 14 A.W.G)

D } 2-CONDUCTOR ELECTRICAL
E } CABLE (NO. 14 A.W.G)
F } ALUMINUM SHIELDED

G } 2-CONDUCTOR ELECTRICAL
H } CABLE (NO. 14 A.W.G)
J } ALUMINUM SHIELDED SPLICED TO EXISTING LOOP WIRE

M,K - MICROLOOP LEAD-IN CABLE (500')

L - STRANDED BARE COPPER GROUND WIRE (NO. 6 A.W.G.)

EL - LOOP WIRE (NO. 14 A.W.G.) EXISTING

LW - LOOP WIRE (NO. 14 A.W.G.)

* - EXISTING JUMPER CABLE TO REMAIN IN USE

ES - EXISTING OVERHEAD SERVICE TO BE INSTALLED BY ALLEGHANY POWER

STREET TRAFFIC STUDIES, LTD.
400 Crain Hwy.,NW.
Glen Burnie,MD 21061
Ph (410) 590-5500
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4328.dgn

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

MD 27 AND WATERSVILLE ROAD

DRAWN BY: S.R.BARANOWSKI	F.A.P. NO.	TS NO. 2466 C	SHEET NO. 2 OF 2
CHECKED BY: R.R.ZACHERL	S.H.A. NO.		
SCALE: NONE	COUNTY: CARROLL	T.I.M.S. NO. F965X	
DATE: 8-5-03	LOG MILE: 06002702.32		