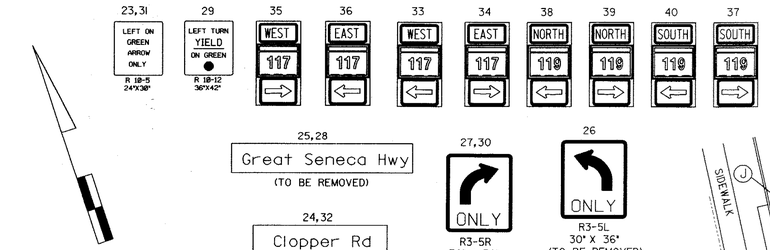
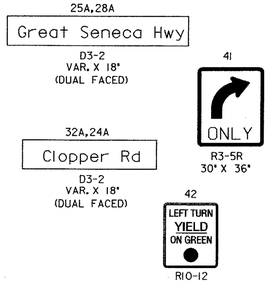
EXISTING SIGNS



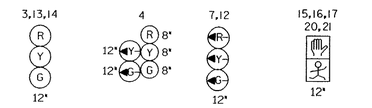
NOTE: MD 117 IS ASSUMED TO RUN IN AN EAST-WEST DIRECTION.

NOTE: Sign #30 is to be removed, Signs 25,29,32,35,36 to be relocated as shown.

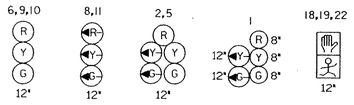
PROPOSED SIGNS



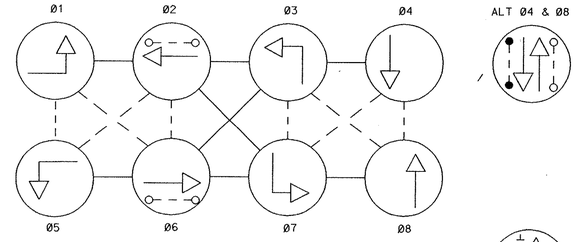
EXISTING SIGNALS



PROPOSED SIGNALS

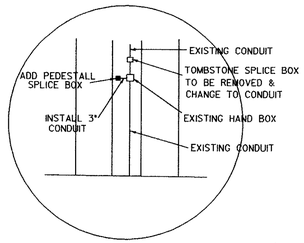


NEMA PHASING



PHASING NOTES:
1. PHASES ASSOCIATED BY A SOLID LINE WILL NOT OPERATE CONCURRENTLY.
2. PHASES ASSOCIATED BY A DASHED LINE WILL OPERATE CONCURRENTLY.

FLASHING OPERATION



INSET "B"

CONSTRUCTION DETAILS

A. Install a 12 in. x 32 ft. steel strain pole, signal heads, control and distribution, ped heads push buttons and R10-4(I) sign, (Note: two-3 in PVC schedule 80 conduit bends and four 2-1/4 in. x 96 in. anchor bolts).

B. Remove existing steel strain pole and foundation.

C. Install NEMA size '6' Base Mounted Cabinet and Controller with all necessary equipment. (Note: Two-4 in., and two-2 in. PVC schedule 80 conduit bends).

E. Pull all proposed electrical cables into the existing controller cabinet and properly tag/label each cable. All internal wiring shall be conducted by Contractor or Montgomery County (To be determined by Bobby Gonzales, (240) 777-8761).

F. Use existing handhole.

G. Install 6' x 22' loop detector encased in 1/4" flexible tubing quadrupole type (3-6-3).

H. Install 1" liquid tight flexible non-metallic electrical conduit (detector wire sleeve).

I. Remove pavement marking message.

J. Install permanent pavement marking symbol.

K. Install handhole.

L. Install 4" schedule 80 PVC electrical conduit-(Trenched)

M. Abandon existing conduit.

N. Use existing strain pole.

O. Use existing steel span wire for installation of new wiring to signal heads (Note: re-ring exisitng span).

P. Install 2 in. schedule 80 PVC electrical conduit (trenched) for electrical service.

Q. Remove handhole. (Cap and abandon attached conduit.)

R. Relocate existing associated shield assembly sign to new location as shown.

S. Remove the existing stopline and/or crosswalk.

T. Install proposed 24" (white) stopline pavement markings as shown.

U. Install proposed 12" (white) crosswalk pavement markings as shown (See typical crosswalk detail).

V. Existing overhead interconnect cable.

X. Abandon existing loop detector.

Y. Remove existing steel span wire, signal heads, signs and associated wiring.

Z. Remove existing Base Mounted Cabinet and Controller.

AA. Install 3/8 in. steel wire, 1/4 in. tether wire, and proposed signal heads and signs as shown.

BB. Install 3 in. schedule 80 PVC electrical conduit (trenched).

CC. Install span and tether wire to new signal pole. Must be 2 ft. minimum from utility cables, 6 ft. from secondary power lines, and 10 ft. minimum from primary power lines. Coordination with utility companies and relocation effort is needed.

DD. Install splice box and attach to pole. Contractor to pull interconnect cable from this location to new controller location. Montgomery County to perform splicing and connecting of cable. Contact Bobby Gonzales at (240)777-8761 seventy two (72) hours in advance of work.

EE. Proposed overhead feed from relocated electrical service.

FF. Add ped head, push button and R10-4(I) signs.

GG. Install 20 ft. arm for video camera detection system. (Installation of detection unit to be performed by Montgomery County forces. Contact Bobby Gonzales at (240)777-8761).

HH. Use existing 3 in. conduit.

II. Install 3 in. schedule 80 PVC electrical conduit (bored).

JJ. Contractor to pull interconnect cable from new controller location to existing splice box approx. 350' west of 117/119 intersection. Montgomery County to perform splicing and connecting of cable. Contact Mr. Bobby Gonzales at (240)777-8761 seventy two (72) hours in advance of work.

KK. Contractor to pull interconnect cable from new controller location to pedestall splice cabinet approx. 0.4 mile south of 117/119 intersection. Montgomery County to perform splicing and connecting of cable. Contact Mr. Bobby Gonzales at (240)777-8761 seventy two (72) hours in advance of work.

LL. Contractor to pull interconnect cable from new controller location to pedestall splice cabinet approx. 0.3 mile north of 117/119 intersection. Montgomery County to perform splicing and connecting of cable. Contact Mr. Bobby Gonzales at (240)777-8761 seventy two (72) hours in advance of work.

UTILITY LEGEND

—G—G—	GAS MAIN
—W—W—	WATER MAIN
—S—S—	SEWER MAIN
—E—E—	ELECTRIC CABLES
—A—A—	AERIAL CABLES
—T—T—	TELEPHONE CABLES

INSET "A"
TYPICAL CROSSWALK DETAIL

GENERAL NOTES:

1. All loop detectors are to be installed prior to the installation of pavement markings.
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 immediatly so that the conflict may be resolved.
3. The Contractor shall confirm the location of proposed geometrics prior to the installation of the signal equipment.
4. All traffic signal equipment shall be installed to final grade.
5. Pavement markings detailed are proposed and shall be installed by the Contractor in accordance with SHA Standards.
6. Any modification to this subject signal should be preceeded by a thorough identification of all existing utilities.

WELLS & ASSOCIATES, LLC
TRANSPORTATION, TRAFFIC, AND PARKING CONSULTANTS
1420 Spring Hill Rd., Suite 600
McLean, VA 22102
Phone: (703) 917-6620 Fax: (703)917-0739

REVISIONS

C 4-5-01 CONTRACT #BW866MB2 RELOCATE POLE & CONTROLLER IN THE NORTHWEST CORNER DUE TO GEOMETRIC IMPROVEMENTS ON GREAT SENECA & 117.
C.A. [illegible]

B 3-3-99 REPLACE LOOPS DUE TO GEO. IMPRVMTS. ON GREAT SENECA AND MD 117 SHA NO.: BW866MB2
R.R.Z.

A 11-96 REDRAWN, REMOVE E/P AND INSTALL EXCLUSIVE LEFT-TURNS ON GREAT SENECA HWY. SHA NO.: AW-102-501-385
SR/RR

APPROVALS

TEAM LEADER, TRAFFIC ENGINEERING DESIGN DIVISION
ASST. CHIEF TRAFFIC ENGINEERING DESIGN DIVISION
CHIEF, TRAFFIC ENGINEERING DESIGN DIVISION
DIRECTOR, TRAFFIC & SAFETY

ORIGINAL ON FILE

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

MD 117 (CLOPPER RD) AND MD 119 (GREAT SENECA HIGHWAY)

DRAWN BY:	CA	F.A.P. NO.		TS NO. 3638C	SHEET NO. 1 OF 2
CHECKED BY:	LES	S.H.A. NO.			
SCALE:	1"=20'	COUNTY:	MONTGOMERY	T.I.M.S. NO. E-002	
DATE:	4-5-01	LOG MILE:	1501708.06		

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