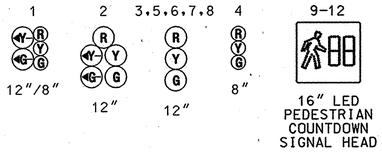
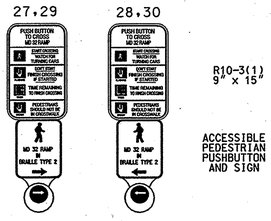
MD 108 IS ASSUMED TO RUN IN AN EAST-WEST DIRECTION

PROPOSED LED SIGNALS

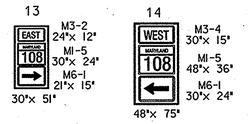


PROPOSED EQUIPMENT

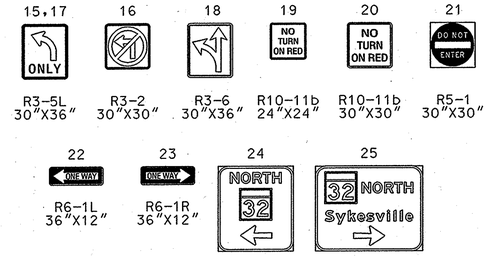
a,b,c PROPOSED VIDEO DETECTOR CAMERA



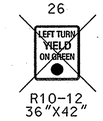
PROPOSED SIGNS



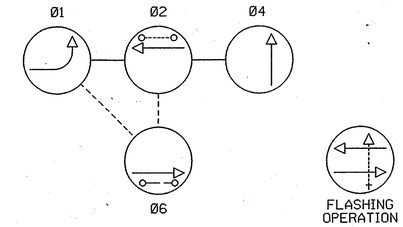
EXISTING SIGNS TO REMAIN



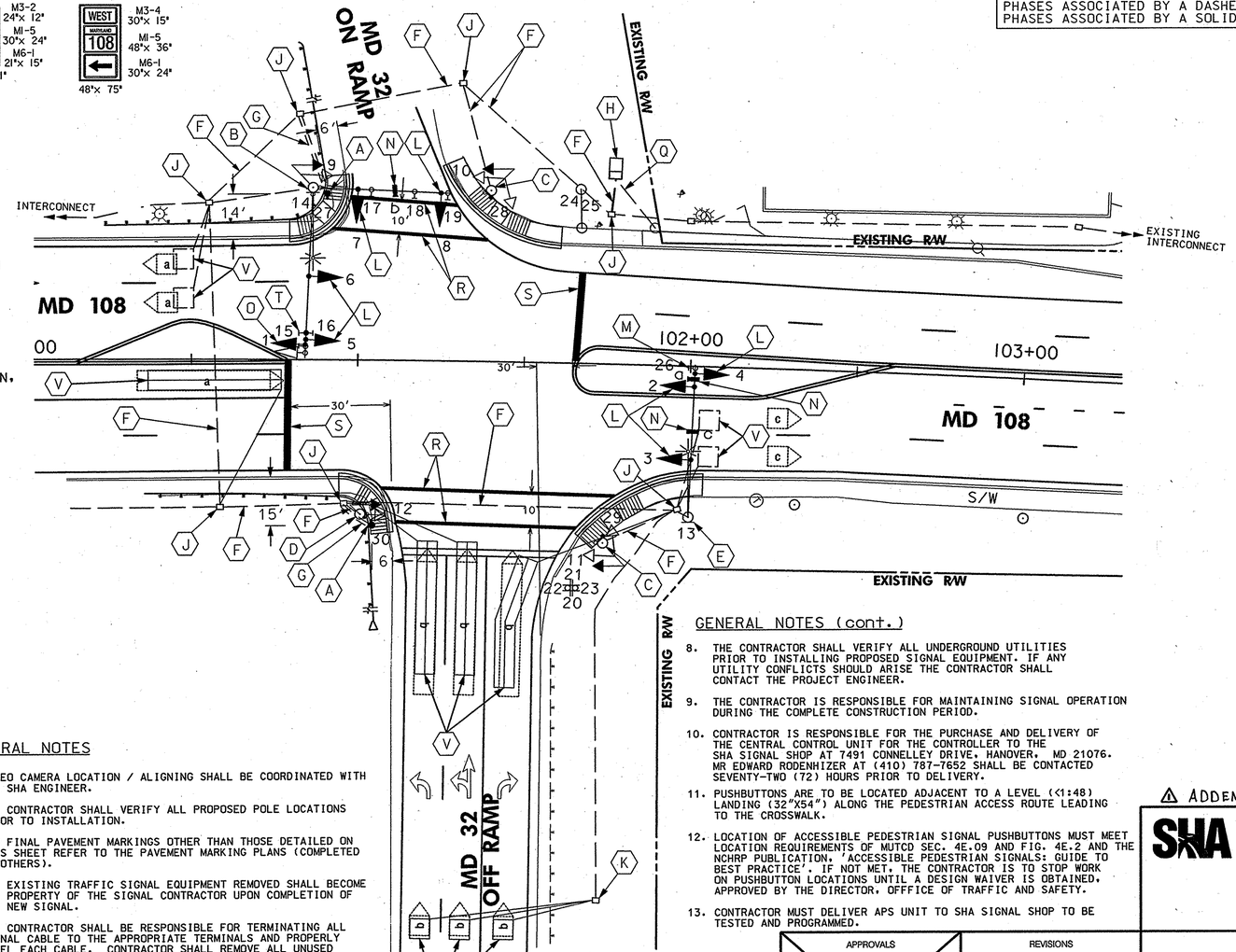
EXISTING SIGNS TO BE REMOVED



NEMA PHASING



NOTE:
PHASES ASSOCIATED BY A DASHED LINE WILL OPERATE CONCURRENTLY.
PHASES ASSOCIATED BY A SOLID LINE WILL NOT OPERATE CONCURRENTLY.



CONSTRUCTION DETAILS

A. INSTALL CONCRETE FOUNDATION WITH 10 FT. BREAKAWAY PEDESTAL POLE WITH APS STATION AND PEDESTRIAN EDUCATION SIGN. THE POLE SHALL BE CUT ABOVE THE PEDESTRIAN EDUCATION SIGN. (NOTE: 1-3 IN. PVC SCHEDULE 80 CONDUIT BEND).

B. REMOVE EXISTING PEDESTRIAN SIGNAL HEAD, PUSHBUTTON, AND SIGN FROM EXISTING SIGNAL POLE. INSTALL LED COUNTDOWN PEDESTRIAN SIGNAL. INSTALL ROUTE SHIELD ASSEMBLY (SIGN 14) ON EXISTING POLE.

C. REMOVE EXISTING PUSHBUTTONS, SIGNS, AND PEDESTRIAN SIGNAL HEADS. INSTALL LED COUNTDOWN PEDESTRIAN SIGNAL, APS STATION, AND PEDESTRIAN EDUCATION SIGN ON EXISTING PEDESTAL POLE.

D. REMOVE EXISTING PEDESTRIAN SIGNAL HEAD, PUSHBUTTON, AND SIGN FROM EXISTING SIGNAL POLE. INSTALL LED COUNTDOWN PEDESTRIAN SIGNAL.

E. INSTALL ROUTE SHIELD ASSEMBLY (SIGN 13) ON EXISTING SIGNAL POLE.

F. USE EXISTING CONDUIT.

G. INSTALL 3" PVC SCHEDULE 80 CONDUIT - TRENCHED.

H. USE EXISTING CONTROLLER CABINET.

J. USE EXISTING HANDHOLE.

K. REMOVE EXISTING HANDHOLE, CAP AND ABANDON EXISTING CONDUIT.

L. REPLACE EXISTING SIGNAL HEAD WITH PROPOSED LED SIGNAL HEAD IN SAME LOCATION.

M. REMOVE EXISTING SIGN 26 FROM EXISTING MAST ARM.

N. INSTALL VIDEO DETECTOR CAMERA ON EXISTING MAST ARM.

O. REPLACE EXISTING SIGNAL HEAD WITH PROPOSED LED SIGNAL HEAD AND RELOCATE ON EXISTING MAST ARM.

P. INSTALL 3" PVC SCHEDULE 80 CONDUIT - SLOTTED.

Q. EXISTING UNDERGROUND ELECTRICAL SERVICE TO BE MAINTAINED BY BG & E.

R. INSTALL 12" HEAT APPLIED WHITE PERMANENT PREFORMED THERMOPLASTIC PAVEMENT MARKINGS.

S. INSTALL 24" HEAT APPLIED WHITE PERMANENT PREFORMED THERMOPLASTIC PAVEMENT MARKINGS.

T. RELOCATE EXISTING SIGN ON EXISTING MAST ARM.

U. INSTALL NON-INVASIVE MICROLOOP PROBE.

V. DISCONNECT AND ABANDON EXISTING LOOP DETECTORS.

GENERAL NOTES

1. VIDEO CAMERA LOCATION / ALIGNING SHALL BE COORDINATED WITH THE SHA ENGINEER.
2. THE CONTRACTOR SHALL VERIFY ALL PROPOSED POLE LOCATIONS PRIOR TO INSTALLATION.
3. FOR FINAL PAVEMENT MARKINGS OTHER THAN THOSE DETAILED ON THIS SHEET REFER TO THE PAVEMENT MARKING PLANS (COMPLETED BY OTHERS).
4. ALL EXISTING TRAFFIC SIGNAL EQUIPMENT REMOVED SHALL BECOME THE PROPERTY OF THE SIGNAL CONTRACTOR UPON COMPLETION OF THE NEW SIGNAL.
5. THE CONTRACTOR SHALL BE RESPONSIBLE FOR TERMINATING ALL SIGNAL CABLE TO THE APPROPRIATE TERMINALS AND PROPERLY LABEL EACH CABLE. CONTRACTOR SHALL REMOVE ALL UNUSED CABLES.
6. ALL TRAFFIC SIGNAL FOUNDATIONS SHALL BE INSTALLED AT THE FINAL SIDEWALK OR CURB GRADE FOR CLOSED SECTIONS, HIGHEST ROADWAY PROFILE GRADE FOR OPEN SECTION, TO MEET CLEARANCES AS SPECIFIED IN MD 816.03, MD 818.01, MD 818.02, AND MD 818.04. THE CONTRACTOR SHALL VERIFY ULTIMATE GRADES PRIOR TO THE INSTALLATION OF ALL PROPOSED EQUIPMENT.
7. ADA CURB RAMPS AND WARNING SURFACE ARE TO BE INSTALLED BY THE ROADWAY CONTRACTOR.

GENERAL NOTES (cont.)

8. THE CONTRACTOR SHALL VERIFY ALL UNDERGROUND UTILITIES PRIOR TO INSTALLING PROPOSED SIGNAL EQUIPMENT. IF ANY UTILITY CONFLICTS SHOULD ARISE THE CONTRACTOR SHALL CONTACT THE PROJECT ENGINEER.
9. THE CONTRACTOR IS RESPONSIBLE FOR MAINTAINING SIGNAL OPERATION DURING THE COMPLETE CONSTRUCTION PERIOD.
10. CONTRACTOR IS RESPONSIBLE FOR THE PURCHASE AND DELIVERY OF THE CENTRAL CONTROL UNIT FOR THE CONTROLLER TO THE SHA SIGNAL SHOP AT 7491 CONNELLEY DRIVE, HANOVER, MD 21076. MR EDWARD RODENHIZER AT (410) 787-7652 SHALL BE CONTACTED SEVENTY-TWO (72) HOURS PRIOR TO DELIVERY.
11. PUSHBUTTONS ARE TO BE LOCATED ADJACENT TO A LEVEL (<1:48) LANDING (32"X54") ALONG THE PEDESTRIAN ACCESS ROUTE LEADING TO THE CROSSWALK.
12. LOCATION OF ACCESSIBLE PEDESTRIAN SIGNAL PUSHBUTTONS MUST MEET LOCATION REQUIREMENTS OF MUTCD SEC. 4E.09 AND FIG. 4E.2 AND THE NCHRP PUBLICATION, 'ACCESSIBLE PEDESTRIAN SIGNALS: GUIDE TO BEST PRACTICE'. IF NOT MET, THE CONTRACTOR IS TO STOP WORK ON PUSHBUTTON LOCATIONS UNTIL A DESIGN WAIVER IS OBTAINED, APPROVED BY THE DIRECTOR, OFFFICE OF TRAFFIC AND SAFETY.
13. CONTRACTOR MUST DELIVER APS UNIT TO SHA SIGNAL SHOP TO BE TESTED AND PROGRAMMED.

UTILITY LEGEND

SD	STORM DRAIN
G	GAS MAIN
W	WATER MAIN
S	SEWER MAIN
E	ELECTRIC CABLES
A	AERIAL CABLES
T	TELEPHONE CABLES
F	FIBER-OPTIC

APPROVALS

TEAM LEADER
ASST. DIV. CHIEF
DIVISION CHIEF
OFFICE DIRECTOR

ORIGINAL ON FILE

REVISIONS

B	UPGRADE TO LED SIGNAL HEADS, APS, AND COUNTDOWN PED SIGNALS. INSTALL VIDEO DETECTION AND NON-INVASIVE MICROLOOP PROBES. SHA NO.: H0888177				3/19/07
SJW	AJM	SDV	MD	MAW	RWB 6-21-02
A	REMARK CROSSWALKS, INSTALL NEW CABINET AND RE-WIRE SHA NO.: X0208595				
RRZ	MAN	EDRB		BK	THRK

PLOTTED: Tuesday, March 27, 2007 at 3:02:26 PM
FILE: p:\t3-P000_md108.dgn

BY: syoung2

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

T3 design
T3 DESIGN, P.C.
3927 OLD LEE HWY
SUITE 101-C
FAIRFAX, VA 22030
PHONE: 703-359-5861
www.t3design.us

⚠ ADDENDUM No. 1

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

MD 108 AND MD 32 W.B. OFF RAMP /MD 32 N.B. ON RAMP

TRAFFIC SIGNAL PLAN

SCALE 1" = 20' DATE MARCH 1993 CONTRACT NO. H0680A51

DESIGNED BY
DRAWN BY AL MAWRY
CHECKED BY EMM
F.A.P. NO.

COUNTY HOWARD
LOGMILE 13010803.78
T.I.M.S. NO. 1021
TOD NO.

DRAWING NO. TS--3317B SHEET NO. 22 OF 27