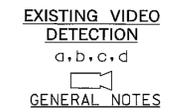
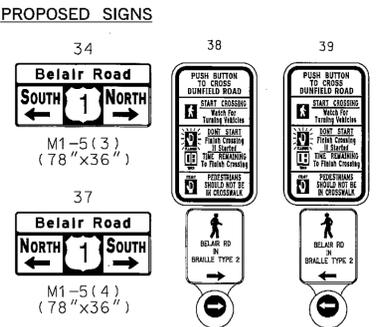
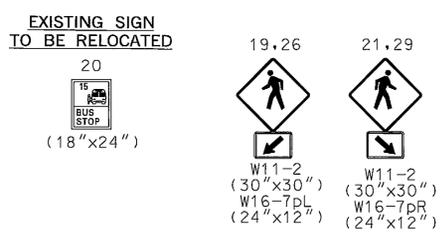
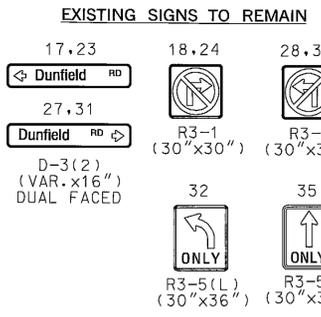
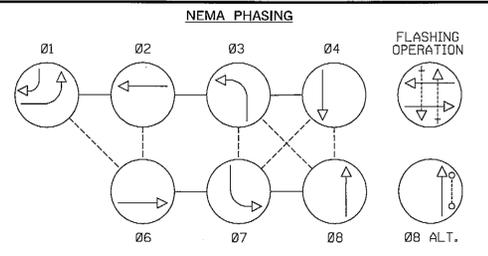
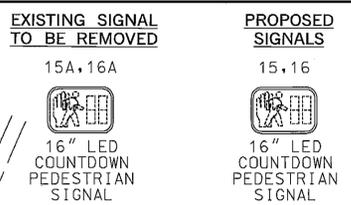
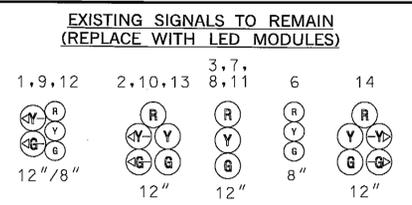
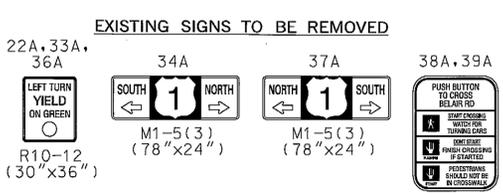
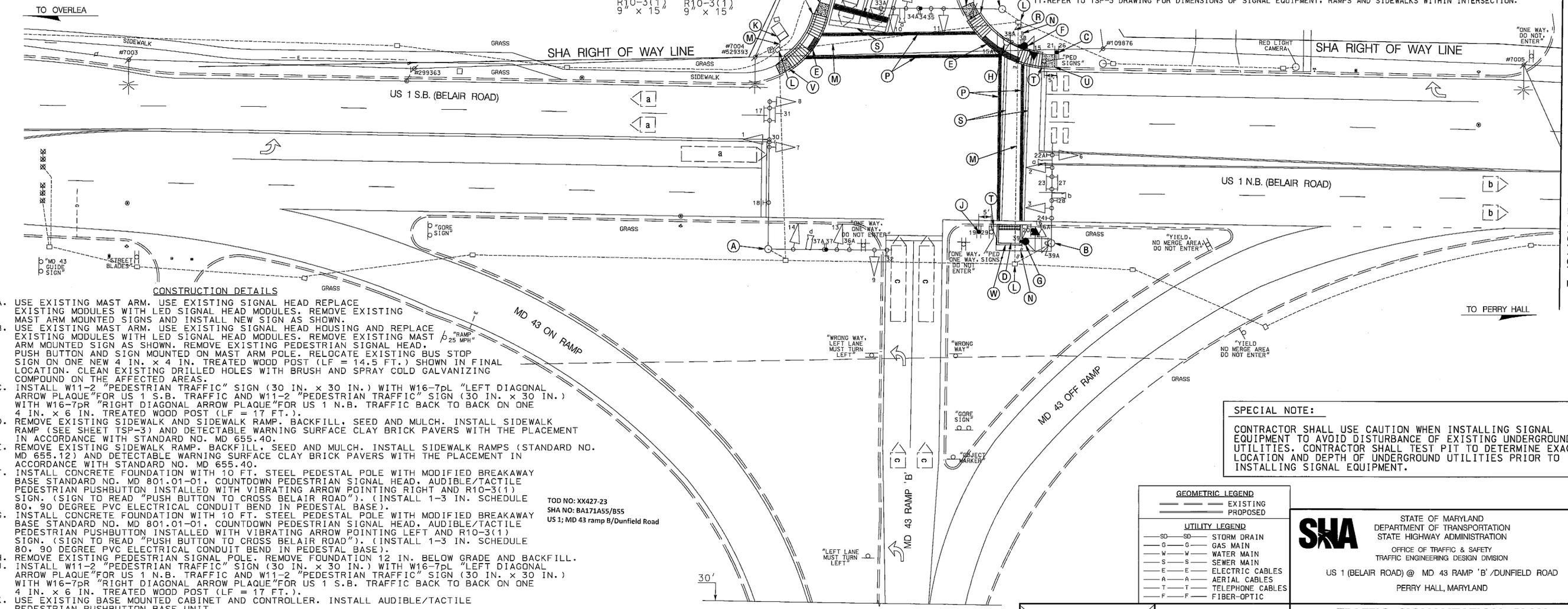


US 1 IS ASSUMED TO RUN IN A NORTH-SOUTH DIRECTION



**GENERAL NOTES**

- ALL TRAFFIC SIGNAL FOUNDATIONS SHALL BE INSTALLED AT THE FINAL SIDEWALK OR CURB GRADE FOR CLOSED SECTIONS, HIGHEST ROADWAY PROFILE GRADE FOR OPEN SECTIONS, TO MEET CLEARANCES AS SPECIFIED IN MD 816.03, MD 818.01, MD 818.02, MD 818.04. THE CONTRACTOR SHALL VERIFY ULTIMATE GRADES PRIOR TO THE INSTALLATION OF ALL SIGNAL EQUIPMENT.
- 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.
- THE CONTRACTOR SHALL VERIFY ALL PROPOSED POLE LOCATIONS PRIOR TO INSTALLATION.
- ALL EXISTING TRAFFIC SIGNAL EQUIPMENT REMOVED SHALL BECOME THE PROPERTY OF THE SIGNAL CONTRACTOR UPON COMPLETION OF THE NEW SIGNAL.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR TERMINATING ALL SIGNAL CABLES TO THE APPROPRIATE TERMINALS AND PROPERLY LABEL EACH CABLE.
- REMOVE AND DISPOSE OF ALL UNUSED SIGNAL CABLE.
- THE CONTRACTOR SHALL REPAIR ANY DAMAGE TO EXISTING SIDEWALKS CAUSED BY THE INSTALLATION OF SIGNAL EQUIPMENT.
- PUSHBUTTONS ARE TO BE LOCATED SO THAT THEY CAN BE ACTIVATED BY A PERSON IN A WHEELCHAIR REACHING LESS THAN 18" FROM A 60" X 60" LEVEL LANDING AREA WITH A CROSS SLOPE OF LESS THAN OR EQUAL TO 2%.
- PUSHBUTTON ARROWS ARE TO BE PARALLEL TO THE CROSSING FOR WHICH THEY ARE INTENDED.
- 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, OFFICE OF TRAFFIC AND SAFETY.
- REFER TO TSP-3 DRAWING FOR DIMENSIONS OF SIGNAL EQUIPMENT, RAMPS AND SIDEWALKS WITHIN INTERSECTION.



- CONSTRUCTION DETAILS**
- USE EXISTING MAST ARM. USE EXISTING SIGNAL HEAD REPLACE EXISTING MODULES WITH LED SIGNAL HEAD MODULES. REMOVE EXISTING MAST ARM MOUNTED SIGNS AND INSTALL NEW SIGN AS SHOWN.
  - USE EXISTING MAST ARM. USE EXISTING SIGNAL HEAD HOUSING AND REPLACE EXISTING MODULES WITH LED SIGNAL HEAD MODULES. REMOVE EXISTING MAST ARM MOUNTED SIGN AS SHOWN. REMOVE EXISTING PEDESTRIAN SIGNAL HEAD. PUSH BUTTON AND SIGN MOUNTED ON MAST ARM POLE. RELOCATE EXISTING BUS STOP SIGN ON ONE NEW 4 IN. X 4 IN. TREATED WOOD POST (LF = 14.5 FT.) SHOWN IN FINAL LOCATION. CLEAN EXISTING DRILLED HOLES WITH BRUSH AND SPRAY COLD GALVANIZING COMPOUND ON THE AFFECTED AREAS.
  - INSTALL W11-2 "PEDESTRIAN TRAFFIC" SIGN (30 IN. X 30 IN.) WITH W16-7PL "LEFT DIAGONAL ARROW PLAQUE" FOR US 1 S.B. TRAFFIC AND W11-2 "PEDESTRIAN TRAFFIC" SIGN (30 IN. X 30 IN.) WITH W16-7DR "RIGHT DIAGONAL ARROW PLAQUE" FOR US 1 N.B. TRAFFIC BACK TO BACK ON ONE 4 IN. X 6 IN. TREATED WOOD POST (LF = 17 FT.).
  - REMOVE EXISTING SIDEWALK AND SIDEWALK RAMP. BACKFILL, SEED AND MULCH. INSTALL SIDEWALK RAMP (SEE SHEET TSP-3) AND DETECTABLE WARNING SURFACE CLAY BRICK PAVERS WITH THE PLACEMENT IN ACCORDANCE WITH STANDARD NO. MD 655.40.
  - REMOVE EXISTING SIDEWALK RAMP. BACKFILL, SEED AND MULCH. INSTALL SIDEWALK RAMPS (STANDARD NO. MD 655.12) AND DETECTABLE WARNING SURFACE CLAY BRICK PAVERS WITH THE PLACEMENT IN ACCORDANCE WITH STANDARD NO. MD 655.40.
  - INSTALL CONCRETE FOUNDATION WITH 10 FT. STEEL PEDESTAL POLE WITH MODIFIED BREAKAWAY BASE STANDARD NO. MD 801.01-01, COUNTDOWN PEDESTRIAN SIGNAL HEAD, AUDIBLE/TACTILE PEDESTRIAN PUSHBUTTON INSTALLED WITH VIBRATING ARROW POINTING RIGHT AND R10-3(1) SIGN. (SIGN TO READ "PUSH BUTTON TO CROSS BELAIR ROAD"). (INSTALL 1-3 IN. SCHEDULE 80, 90 DEGREE PVC ELECTRICAL CONDUIT BEND IN PEDESTAL BASE).
  - INSTALL CONCRETE FOUNDATION WITH 10 FT. STEEL PEDESTAL POLE WITH MODIFIED BREAKAWAY BASE STANDARD NO. MD 801.01-01, COUNTDOWN PEDESTRIAN SIGNAL HEAD, AUDIBLE/TACTILE PEDESTRIAN PUSHBUTTON INSTALLED WITH VIBRATING ARROW POINTING LEFT AND R10-3(1) SIGN. (SIGN TO READ "PUSH BUTTON TO CROSS BELAIR ROAD"). (INSTALL 1-3 IN. SCHEDULE 80, 90 DEGREE PVC ELECTRICAL CONDUIT BEND IN PEDESTAL BASE).
  - REMOVE EXISTING PEDESTRIAN SIGNAL POLE. REMOVE FOUNDATION 12 IN. BELOW GRADE AND BACKFILL.
  - INSTALL W11-2 "PEDESTRIAN TRAFFIC" SIGN (30 IN. X 30 IN.) WITH W16-7PL "LEFT DIAGONAL ARROW PLAQUE" FOR US 1 N.B. TRAFFIC AND W11-2 "PEDESTRIAN TRAFFIC" SIGN (30 IN. X 30 IN.) WITH W16-7DR "RIGHT DIAGONAL ARROW PLAQUE" FOR US 1 S.B. TRAFFIC BACK TO BACK ON ONE 4 IN. X 6 IN. TREATED WOOD POST (LF = 17 FT.).
  - USE EXISTING BASE MOUNTED CABINET AND CONTROLLER. INSTALL AUDIBLE/TACTILE PEDESTRIAN PUSHBUTTON BASE UNIT.
  - USE EXISTING HANDHOLE.
  - USE EXISTING CONDUIT.
  - INSTALL 3 IN. PVC SCHEDULE 80 ELECTRICAL CONDUIT - TRENCHED.
  - INSTALL 12 IN. HEAT APPLIED, WHITE PERMANENT PREFORMED THERMOPLASTIC PAVEMENT MARKING FOR CROSSWALKS.
  - INSTALL 24 IN. HEAT APPLIED, WHITE PERMANENT PREFORMED THERMOPLASTIC PAVEMENT MARKING FOR STOP LINE.
  - CAP AND ABANDON EXISTING CONDUIT.
  - REMOVE EXISTING PAVEMENT MARKING.
  - REMOVE EXISTING PEDESTRIAN SIGNS AND SIGN POST.
  - REMOVE EXISTING SIDEWALK.
  - INSTALL 5 IN. CONCRETE SIDEWALK.
  - REMOVE EXISTING SIDEWALK AND INSTALL 5 IN. CONCRETE SIDEWALK.
  - INSTALL CONCRETE STANDARD TYPE "A" CURB.

**SPECIAL NOTE:**

CONTRACTOR SHALL USE CAUTION WHEN INSTALLING SIGNAL EQUIPMENT TO AVOID DISTURBANCE OF EXISTING UNDERGROUND UTILITIES. CONTRACTOR SHALL TEST PIT TO DETERMINE EXACT LOCATION AND DEPTH OF UNDERGROUND UTILITIES PRIOR TO INSTALLING SIGNAL EQUIPMENT.

GEOMETRIC LEGEND	
---	EXISTING
---	PROPOSED

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

**SHA** STATE OF MARYLAND  
DEPARTMENT OF TRANSPORTATION  
STATE HIGHWAY ADMINISTRATION  
OFFICE OF TRAFFIC & SAFETY  
TRAFFIC ENGINEERING DESIGN DIVISION  
US 1 (BELAIR ROAD) @ MD 43 RAMP 'B' / DUNFIELD ROAD  
PERRY HALL, MARYLAND

APPROVALS		REVISIONS		TRAFFIC SIGNALIZATION PLAN	
TEAM LEADER	ASST. DIV. CHIEF	DESIGNED BY	COUNTY	SCALE 1" = 20'	ADVERTISED DATE 06/10/2011
DESIGNED BY	COUNTY	DRAWN BY	LOGMILE	CONTRACT NO.	B-818-502-471
CHECKED BY	TIMS NO.	F.A.P. NO.	TOD NO.	TS NO. 117J	DRAWING TSP-1 OF 4
OFFICE DIRECTOR					SHEET NO. 1 OF 4

**WR&A**  
WHITMAN, REQUARDT & ASSOCIATES, LLP  
801 South Caroline Street, Baltimore, Maryland 21231

PLOTTED: Monday, September 12, 2011 2:01:41 PM  
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MATCH LINE AA - SEE DRAWING NO. TSP-2