MD 7 IS ASSUMED TO RUN IN AN EAST-WEST DIRECTION

PROJECT DESCRIPTION

THIS PROJECT INVOLVES INSTALLING A SPLIT PHASE FOR EBENEZER ROAD AND COWENTON AVENUE.
THE PROJECT IS LOCATED IN BALTIMORE COUNTY AT THE INTERSECTION OF MD 7 (PHILADELPHIA ROAD) AND EBENEZER ROAD/COWENTON AVENUE.

ITERSECTION OPERATION

THE INTERSECTION IS TO OPERATE IN A NEMA SIX-PHASE OPERATION WITH AN EXCLUSIVE PERMISSIVE LEFT-TURN PHASE PROVIDED FOR BOTH APPROACHES OF MD 7. MD 7 APPROACHES SHALL OPRERATE CONCURRENTLY.
EBENEZER ROAD AND COWENTON AVENUE APPROACHES SHALL OPERATE AS SPLIT PHASES.

THE EXISTING HIB OPRERATES IN AN ALTERNATING FLASH MODE WHEN PHASE 2 IS NOT IN OPERATION.

THE EXISTING FIREHOUSE PRE-EMPTION IS USED TO GIVE THE RIGHT-OF-WAY TO EMERGENCY VEHICLES AS THEY TRAVEL NORTHBOUND ON EBENEZER ROAD TOWARDS THE INTERSECTION. THIS OPERATES THE SIGNAL FOR PHASE 4 ONLY.

EXISTING SIGNS

32

20A.22A — Cowenton Ave / Ebenezer Rd — BACK TO BACK 84"X32"

20B.22B — Ebenezer Rd / Cowenton Ave — BACK TO BACK 84"X32"

19.21 — LEFT TURN YIELD ON GREEN — R10-12 42"X36"

23A.23B.25A.25B — Philadelphia Rd — BACK TO BACK 72"X16"

24 — NO TURN ON RED — R10-11B 24"X24"

26 — SIGNAL AHEAD PREPARE TO STOP WHEN FLASHING — W3-3(2) 120"X60"

31 — OVER 3/4 T HERE TO US 1 8 PM TO 7 AM

30 — EAST MARYLAND 7

29 — EAST MARYLAND 7

28 — WEST MARYLAND 7

27 — WEST MARYLAND 7

PROPOSED SIGNALS

7.8 — R Y G G — 12"

EXISTING SIGNALS

1.4 — R Y G — 12"/8"

2.5 — R Y G — 12"

3.6.9.12 — R Y G — 12"

15-18 — V

10.11 — R Y G G — 12"

13.14 — Y — 12"

NEMA PHASING

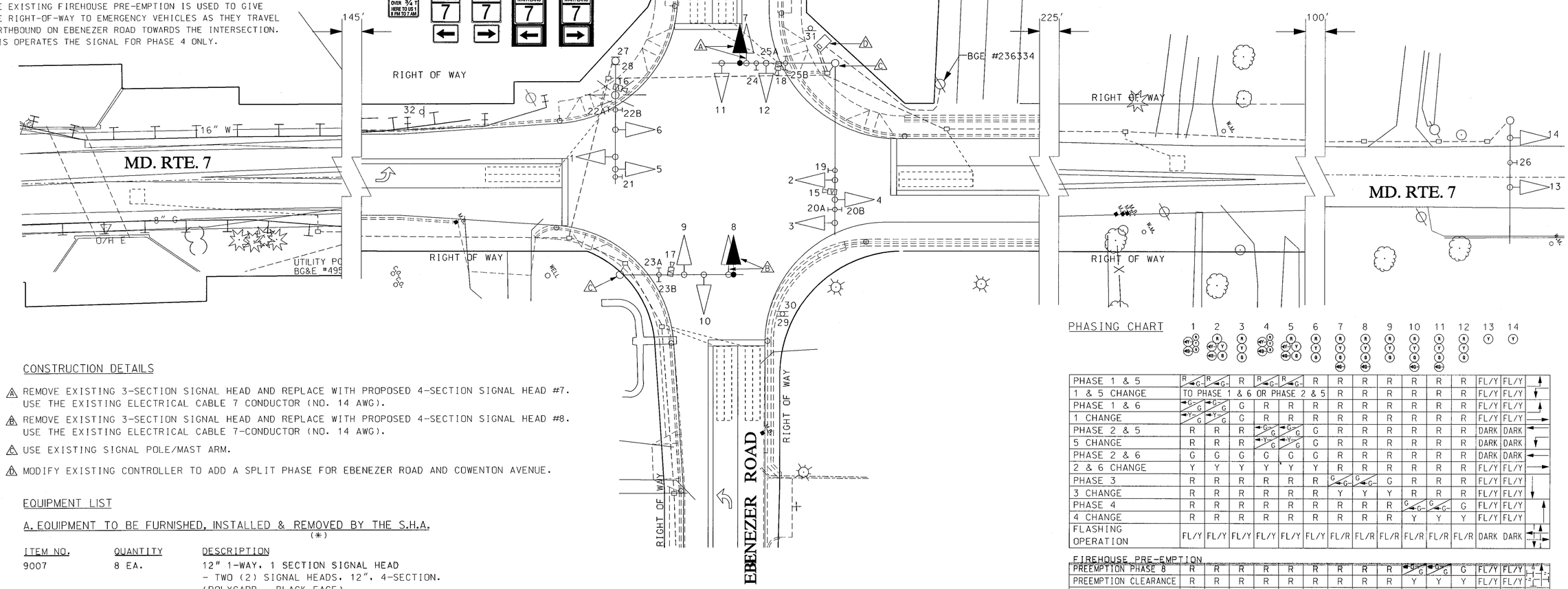
Ø1 Ø2 Ø3 Ø4

Ø5 Ø6

FLASHING OPERATION

FIREHOUSE PREEMPTION

NEMA NOTES:
PHASES ASSOCIATED BY A DASHED LINE WILL OPERATE CONCURRENTLY
PHASES ASSOCIATED BY A SOLID LINE WILL NOT OPERATE CONCURRENTLY



CONSTRUCTION DETAILS

A. REMOVE EXISTING 3-SECTION SIGNAL HEAD AND REPLACE WITH PROPOSED 4-SECTION SIGNAL HEAD #7. USE THE EXISTING ELECTRICAL CABLE 7 CONDUCTOR (NO. 14 AWG).

B. REMOVE EXISTING 3-SECTION SIGNAL HEAD AND REPLACE WITH PROPOSED 4-SECTION SIGNAL HEAD #8. USE THE EXISTING ELECTRICAL CABLE 7-CONDUCTOR (NO. 14 AWG).

C. USE EXISTING SIGNAL POLE/MAST ARM.

D. MODIFY EXISTING CONTROLLER TO ADD A SPLIT PHASE FOR EBENEZER ROAD AND COWENTON AVENUE.

EQUIPMENT LIST

A. EQUIPMENT TO BE FURNISHED, INSTALLED & REMOVED BY THE S.H.A.

ITEM NO.	QUANTITY	DESCRIPTION
9007	8 EA.	12" 1-WAY, 1 SECTION SIGNAL HEAD (*) - TWO (2) SIGNAL HEADS, 12", 4-SECTION. (POLYCARB., BLACK FACE)

(*) TWO (2) SIGNAL HEADS, 12" 3-SECTION.

GENERAL NOTES

1. ALL MODIFICATIONS INSIDE THE CONTROLLER CABINET WILL BE COMPLETED BY THE SHA SIGNAL SHOP.

PHASING CHART

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
PHASE 1 & 5	R G G	R Y G	R Y G	R G G	R Y G	R Y G	R	R	R	R	R	R	FL/Y	FL/Y
1 & 5 CHANGE	TO PHASE 1 & 6 OR PHASE 2 & 5						R	R	R	R	R	R	FL/Y	FL/Y
PHASE 1 & 6	G G G	G Y G	G	R	R	R	R	R	R	R	R	R	FL/Y	FL/Y
1 CHANGE	Y G G	Y Y G	G	R	R	R	R	R	R	R	R	R	FL/Y	FL/Y
PHASE 2 & 5	R	R	R	G G G	G G G	G	R	R	R	R	R	R	DARK	DARK
5 CHANGE	R	R	R	Y G G	Y Y G	G	R	R	R	R	R	R	DARK	DARK
PHASE 2 & 6	G	G	G	G	G	G	R	R	R	R	R	R	DARK	DARK
2 & 6 CHANGE	Y	Y	Y	Y	Y	Y	R	R	R	R	R	R	FL/Y	FL/Y
PHASE 3	R	R	R	R	R	R	G G G	G G G	G	R	R	R	FL/Y	FL/Y
3 CHANGE	R	R	R	R	R	R	Y	Y	Y	R	R	R	FL/Y	FL/Y
PHASE 4	R	R	R	R	R	R	R	R	R	G G G	G G G	G	FL/Y	FL/Y
4 CHANGE	R	R	R	R	R	R	R	R	R	Y	Y	Y	FL/Y	FL/Y
FLASHING OPERATION	FL/Y	FL/Y	FL/Y	FL/Y	FL/Y	FL/Y	FL/R	FL/R	FL/R	FL/R	FL/R	FL/R	DARK	DARK

FIREHOUSE PRE-EMPTION

PREEMPTION PHASE 8	R	R	R	R	R	R	R	R	R	G G G	G G G	G	FL/Y	FL/Y
PREEMPTION CLEARANCE	R	R	R	R	R	R	R	R	R	Y	Y	Y	FL/Y	FL/Y
PHASE 2 & 6	G	G	G	G	G	G	R	R	R	R	R	R	DARK	DARK

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

REVISIONS

A. MODIFY SIGNAL PHASING: SPLIT SIDE STREETS — SHA NO. ASF-SIGNAL 1/2004

APPROVALS

ORIGINAL

DENNIS DODA 11/4/99
TEAM LEADER, TRAFFIC ENGINEERING DESIGN DIVISION

ON

DENNIS DODA FOR DIMITRIOS A. ZAFIRIS 11/4/99
ASST. CHIEF TRAFFIC ENGINEERING DESIGN DIVISION

BARRY R. KNOX 11/4/99
CHIEF, TRAFFIC ENGINEERING DESIGN DIVISION

FILE

THOMAS HICKS 11/4/99
DIRECTOR, TRAFFIC & SAFETY

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

MD 7 (PHILADELPHIA ROAD) & EBENEZER ROAD/COWENTON AVENUE

DRAWN BY:	DMG	F.A.P. NO.	(SEE TITLE SHEET)	TS NO. 3944 - A	SHEET NO. 1 OF 1
CHECKED BY:	GSJ	S.H.A. NO.	BA3151176		
SCALE:	1" = 20'	COUNTY:	BALTIMORE	T.I.M.S. NO. G-174	
DATE:	OCTOBER 1999	LOG MILE:	03007.21		