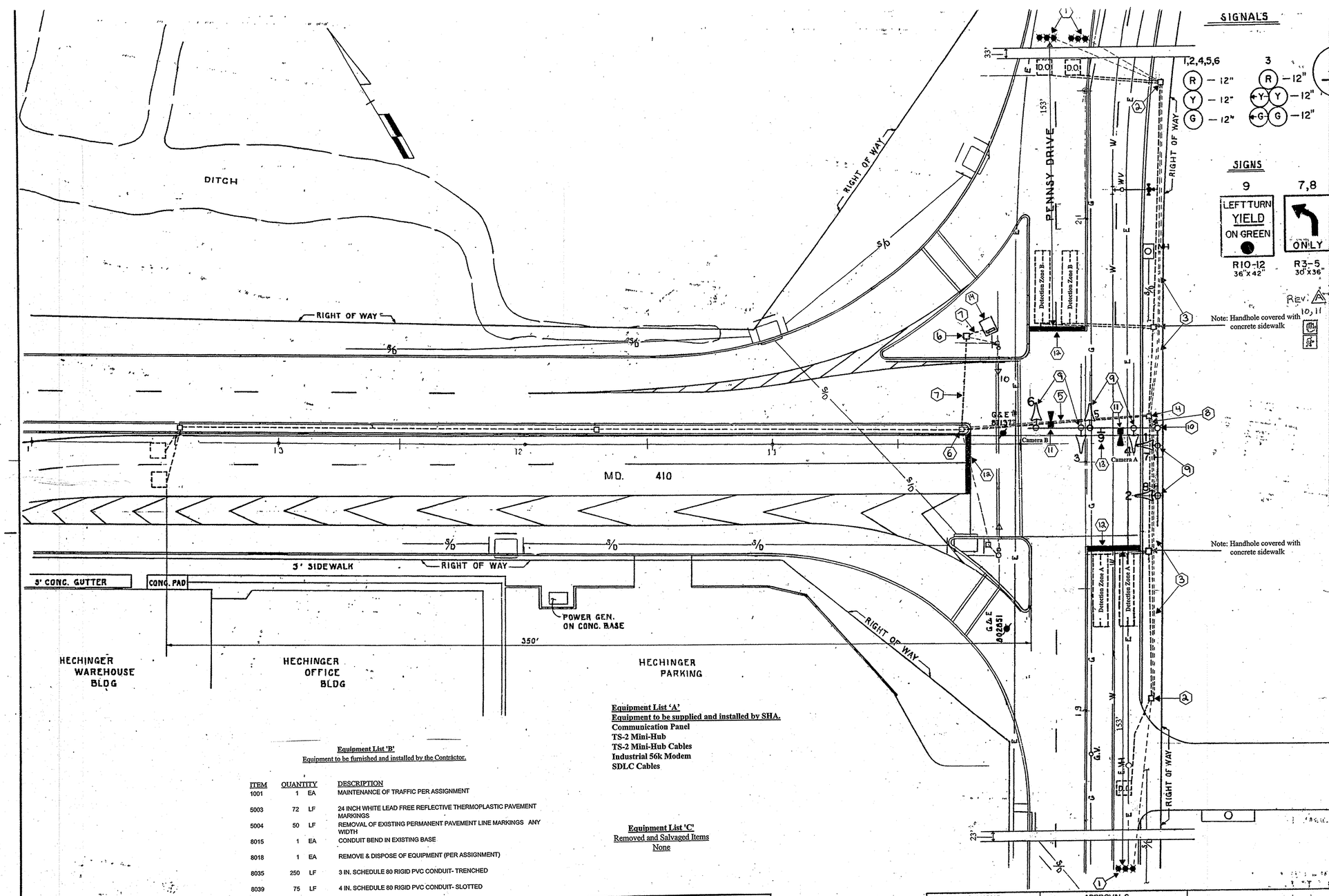
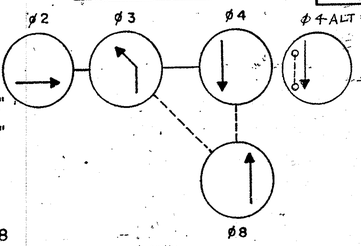
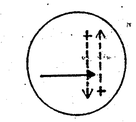


SIGNALS

NEMA PHASING



FLASHING OPERATION



SIGNS

NOTES:
1. PHASES ASSOCIATED WITH DASHED LINES MAY OPERATE CONCURRENTLY.
2. PHASES ASSOCIATED WITH SOLID LINES WILL NOT OPERATE CONCURRENTLY.

REV. A 10, 11

Construction Details

1. Install triple Micro Loop probe set(s).
2. Use existing handhole. Cap and abandon obstructed conduit. Install 1" liquid tight flexible non-metallic conduit. (detector sleeve). Remove existing loop detector lead-in cable and install proposed triple micro loop probe lead-in cable(s).
3. Install 3" schedule 40 polyvinyl chloride electrical conduit (trenched). Install proposed triple micro loop probe lead-in cable.
4. Use existing handhole. Remove existing loop lead-in cables and existing signal wires. Install proposed triple micro loop probe lead-in cables, proposed video detection cables, and proposed signal wires.
5. Install 4" schedule 80 polyvinyl chloride electrical conduit (slotted in roadway). Install proposed triple micro loop probe lead-in cables, proposed video detection cables, and proposed signal wires.
6. Use existing handhole. Cap and abandon obstructed conduit. Remove existing signal wires and existing loop detector lead-in cables for phases 4 and 8. Install proposed triple micro loop lead-in cables, proposed video detection lead-in cables, and proposed signal wires.
7. Use existing conduit. Remove existing signal wires and existing loop detector lead-in cables for phases 4 and 8. Install proposed triple micro loop lead-in cables, proposed video detection lead-in cables, and proposed signal wires.
8. Use existing conduit. Remove existing signal wires and existing loop detector lead-in cable for phase 8. Install proposed triple micro loop probe lead-in cables, proposed signal wires, and proposed video detection lead-in cables.
9. Re-wire existing signal heads.
10. Use existing strain pole. Remove existing signal wires and install proposed signal wires and proposed video detection lead-in cable(s).
11. Install proposed video detection camera(s).
12. Remove existing stop line and replace stop line in accordance with SHA Standards.
13. Remove existing R10-12 sign.
14. Use existing controller cabinet and install 2" schedule 40 polyvinyl chloride electrical conduit bend to accommodate phone drop. Remove existing loop detector lead-in cables for phases 4 and 8 and existing signal wires. Install proposed triple micro loop probe lead-in cables, proposed video detection lead-in cables, and proposed signal wires. TOD personnel will install video detection interface equipment and re-tune amplifiers upon completion of proposed detection work.

Equipment List 'A'
Equipment to be supplied and installed by SHA.
Communication Panel
TS-2 Mini-Hub
TS-2 Mini-Hub Cables
Industrial 56k Modem
SDLC Cables

Equipment List 'B'
Equipment to be furnished and installed by the Contractor.

ITEM	QUANTITY		DESCRIPTION
1001	1	EA	MAINTENANCE OF TRAFFIC PER ASSIGNMENT
5003	72	LF	24 INCH WHITE LEAD FREE REFLECTIVE THERMOPLASTIC PAVEMENT MARKINGS
5004	50	LF	REMOVAL OF EXISTING PERMANENT PAVEMENT LINE MARKINGS ANY WIDTH
8015	1	EA	CONDUIT BEND IN EXISTING BASE
8018	1	EA	REMOVE & DISPOSE OF EQUIPMENT (PER ASSIGNMENT)
8035	250	LF	3 IN. SCHEDULE 80 RIGID PVC CONDUIT- TRENCHED
8039	75	LF	4 IN. SCHEDULE 80 RIGID PVC CONDUIT- SLOTTED
8040	8	LF	1 IN. LIQUID TIGHT FLEXABLE NON-METALLIC CONDUIT FOR DETECTOR SLEEVE
8043	3	EA	MICROLOOP PROBE, 500 FOOT LEAD IN CABLE
8050	2	EA	VIDEO DETECTION CAMERA & CONTROLLER CABLES UP TO 500 LF
8061	714	LF	ELECTRICAL CABLE - 7 CONDUCTOR (NO.14 AWG)
8063	185	LF	SAW CUT FOR SIGNAL (LOOP DETECTOR)

Equipment List 'C'
Removed and Salvaged Items
None

LEGEND OF UNDERGROUND UTILITIES

—G—G—	GAS MAIN
—W—W—	WATER MAIN
—S—S—	SEWER MAIN
—E—E—	ELECTRIC CABLES
—T—T—	TELEPHONE CABLES
—A—A—	AERIAL CABLES
—S/D—S/D—	STORM DRAIN

TRAFFIC SIGNAL SYMBOLS

PROPOSED		EXISTING
■	HANDHOLE	□
▭	LOOP DETECTOR(6X30)	▭
□	LOOP DETECTOR(6X6)	□
------	CONDUIT	------
▬▬	MICRO LOOP PROBE SET	▬▬
■◄	ZOOM LENS IMAGE SENSOR	□◄

PREPARED BY
CENTURY ENGINEERING, INC.
CONSULTING ENGINEERS-PLANNERS
TOWSON, MARYLAND 21204

REVISIONS	
A	11-21-99 Add red indications/ bulbs for West leg of MD 410
B	Install Video Detection, 3/07 OT-2007 I-385

APPROVALS
2-19-87 for: Dennis A. Weins — CHIEF, SIGNAL DESIGN SECTION
2-19-87 — ASST. DISTRICT ENGINEER, TRAFFIC
2-19-87 — CHIEF, BUREAU OF TRAFFIC ENGINEERING
2-19-87 — DEPUTY CHIEF ENGINEER, OFFICE OF TRAFFIC

LOC MILE# 16X41002.07

MARYLAND DEPARTMENT OF TRANSPORTATION
STATE HIGHWAY ADMINISTRATION - OFFICE OF TRAFFIC
BUREAU OF TRAFFIC ENGINEERING

MD 410 EXTENDED AND PENNSY DRIVE

COUNTY: PRINCE GEORGES

SCALE: 1" = 20' DATE: 2-20-87

DRAWN BY JOHN GREEZICKI OF CENTURY ENGINEERING, INC.
DES. BY: REBECCA SAGOS OF CENTURY ENGINEERING, INC.
CHK. BY: 2-19-87

F.A.P. NO. SEE TITLE SHEET
S.H.A. NO. P-822-503-370
TS/FILE NO. TIS - 2280B
SHEET NO. 1 OF 1