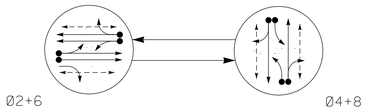
PROJECT REFERENCE NO.	SHEET NO.
U-5742	SIG.262.0

PHASING DIAGRAM



PHASING DIAGRAM DETECTION LEGEND

- DETECTED MOVEMENT
- UNDETECTED MOVEMENT (OVERLAP)
- UNSIGNALIZED MOVEMENT
- PEDESTRIAN MOVEMENT

TABLE OF OPERATION

SIGNAL FACE	PHASE Ø2+6	PHASE Ø4+8	FLASH
21,22	G	R	Y
41,42	R	G	R
61,62	G	R	Y
81,82	R	G	R
P21, P22	W	DW	DRK
P41, P42	DW	W	DRK
P61, P62	W	DW	DRK
P81, P82	DW	W	DRK

W - Walk
DW - Don't Walk
DRK - Dark

ASC/3 DETECTOR INSTALLATION CHART

DETECTOR					PROGRAMMING						
LOOP	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	TURNS	NEW LOOP	PHASE	CALLING	EXTEND TIME	DELAY TIME	TYPE	SYSTEM LOOP	NEW CARD
2A	6X6	90	4	-	2	Yes	-	-	N	-	Y
2B	6X6	90	4	-	2	Yes	-	-	N	-	Y
4A	6X30	+5	2-4-2	-	4	Yes	-	-	N	-	Y
4B	6X60	0	4	-	4	Yes	-	-	N	-	Y
6A	6X6	90	4	-	6	Yes	-	-	N	-	Y
6B	6X6	90	4	-	6	Yes	-	-	N	-	Y
8A	6X60	0	2-4-2	-	8	Yes	-	-	N	-	Y
8B	6X60	0	2-4-2	-	8	Yes	-	-	N	-	Y

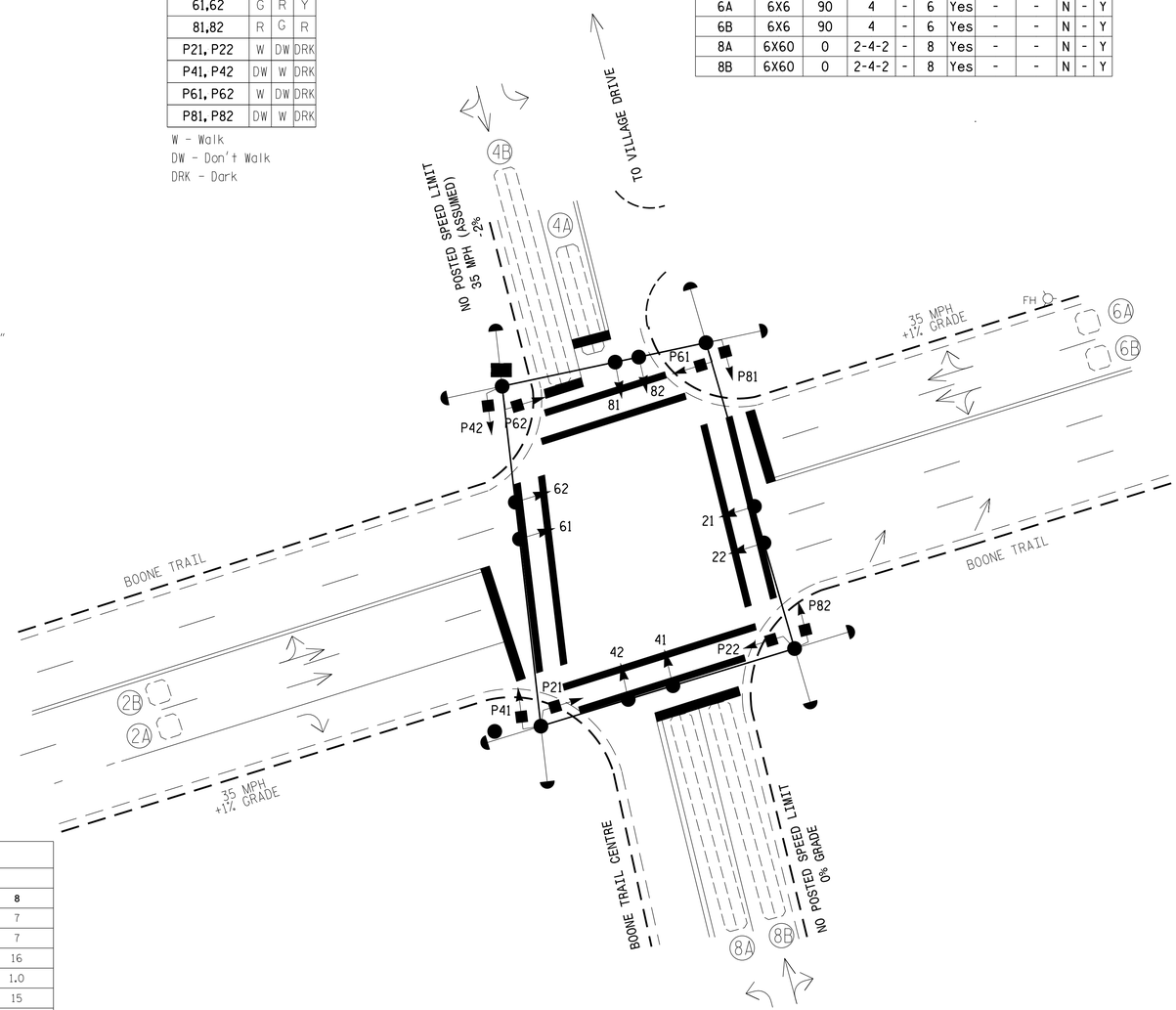
2 Phase
Fully Actuated
(Fayetteville Signal System)

SIGNAL FACE I.D.

All Heads L.E.D.

21, 22
41, 42
61, 62
81, 82

P21, P22
P41, P42
P61, P62
P81, P82



NOTES

1. Refer to "Roadway Standard Drawings NCDOT" dated January 2012 and "Standard Specifications for Roads and Structures" dated January 2012.
2. Do not program signal for late night flashing operation unless otherwise directed by the Engineer.
3. Set all detector units to presence mode.
4. Omit "WALK" and flashing "DON'T WALK" with no pedestrian calls.
5. Program pedestrian heads to countdown the flashing "DON'T WALK" time only.
6. Locate new cabinet on existing foundation.
7. Maximum times shown in timing chart are for free-run operation only. Coordinated signal system timing values supersede these values.

LEGEND

PROPOSED		EXISTING
	Traffic Signal Head	
	Modified Signal Head	N/A
	Sign	
	Pedestrian Signal Head With Push Button & Sign	
	Signal Pole with Guy	
	Signal Pole with Sidewalk Guy	
	Inductive Loop Detector	
	Controller & Cabinet	
	Junction Box	
	2-in Underground Conduit	
N/A	Right of Way with Marker	
	Directional Arrow	
	Pavement Marking Arrow	

ASC/3 TIMING CHART

FEATURE	PHASE 2	PHASE 4	PHASE 6	PHASE 8
Min Green *	10	7	10	7
Walk *	7	7	7	7
Ped Clear	12	16	12	16
Veh. Extension *	2.0	1.0	2.0	1.0
Max 1 *	30	15	30	15
Yellow	3.8	4.0	3.8	3.2
Red Clear	1.4	1.6	1.3	2.4
Red Revert	0.0	0.0	0.0	0.0
Actuations B4 Add *	-	-	-	-
Seconds /Actuation *	-	-	-	-
Max Initial *	-	-	-	-
Time Before Reduction *	-	-	-	-
Time To Reduce *	-	-	-	-
Minimum Gap	-	-	-	-
Locking Detector	X	-	X	-
Recall Position	VEH. RECALL	-	VEH. RECALL	-
Dual Entry	-	X	-	X
Simultaneous Gap	X	X	X	X

* These values may be field adjusted. Do not adjust Min Green and Extension times for phases 2 and 6 lower than what is shown. Min Green for all other phases should not be lower than 4 seconds.

Signal Upgrade

Prepared In the Offices of:
Hatch Mott MacDonald
PO Box 700
Fuquay-Varina, NC 27526
www.hatchmott.com
HATCH MOTT MACDONALD I & E, LLC
LICENSE NO. P-0669

SCALE 0 20

Boone Trail
at
Boone Trail Centre

DIV 06 CUMBERLAND COUNTY FAYETTEVILLE

PLAN DATE:	NOVEMBER 2016	REVIEWED BY:	RWT
PREPARED BY:	RTP	REVIEWED BY:	

REVISIONS	INIT.	DATE

SEAL
NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 036842 RICHARD T. PATE
DocuSigned by: Richard T Pate
F30C9F9B9B3A8BE
11/21/2016
DATE
SIG. INVENTORY NO. C001

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