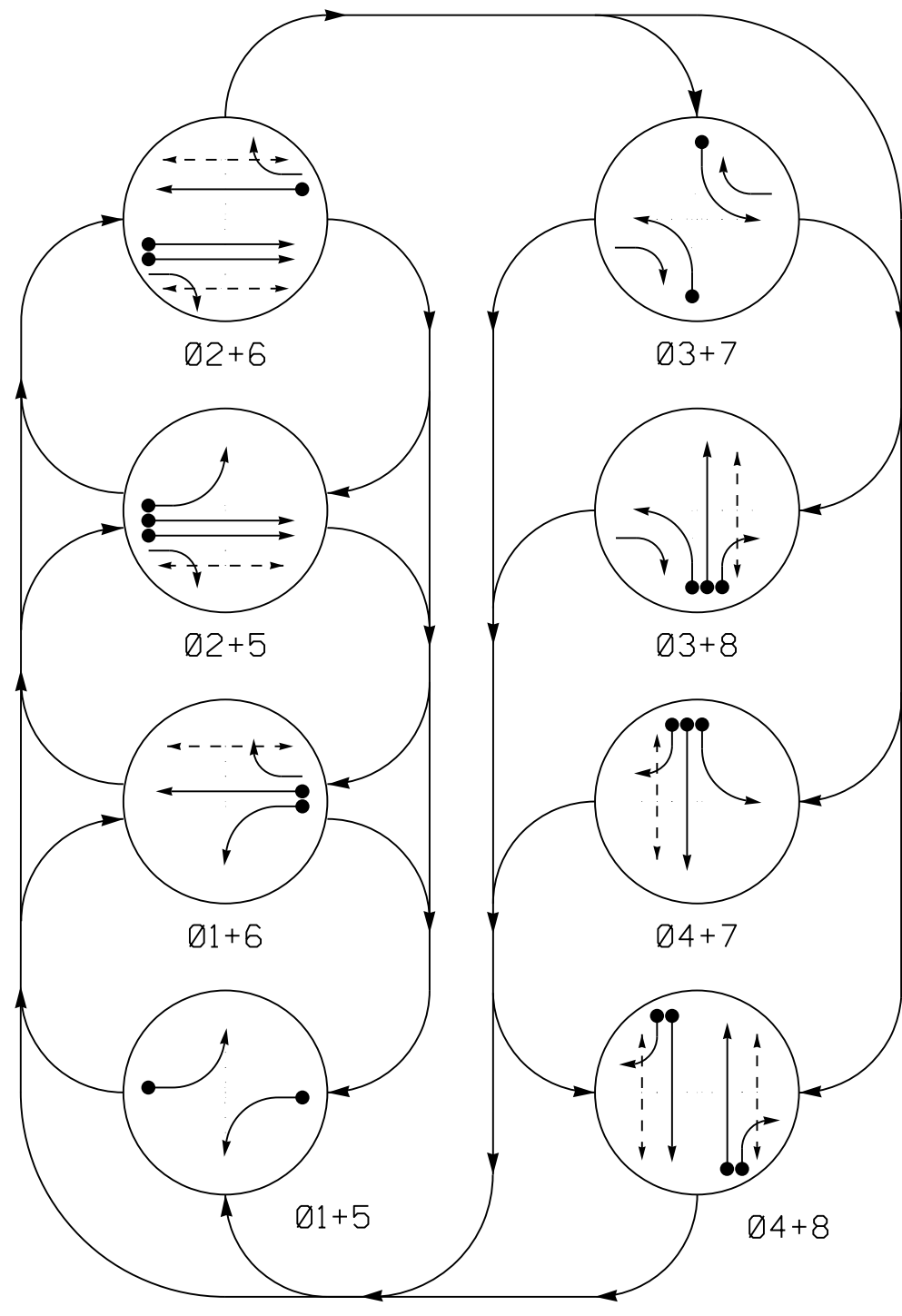


PHASING DIAGRAM



PHASING DIAGRAM DETECTION LEGEND

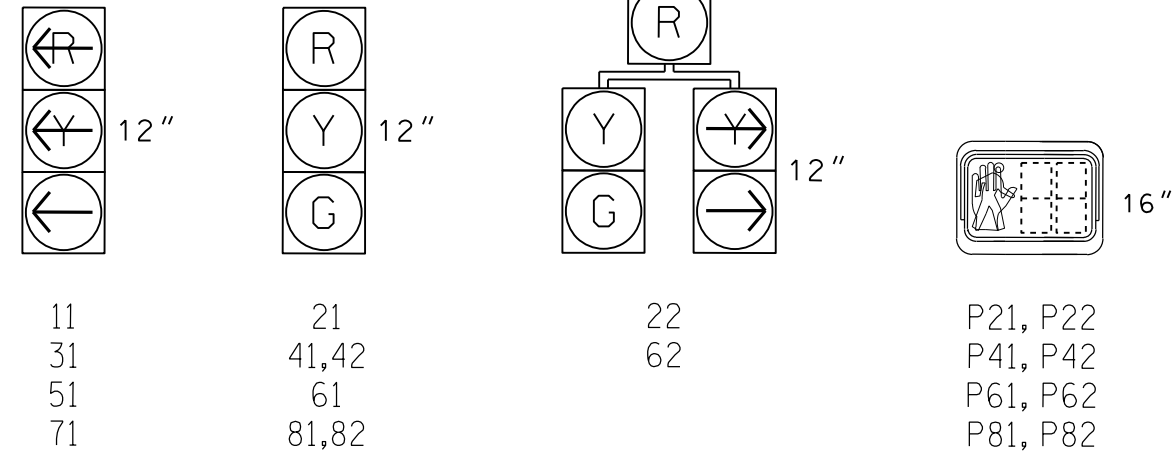
- DETECTED MOVEMENT
- UNDETECTED MOVEMENT (OVERLAP)
- ▲ UNSIGNALIZED MOVEMENT
- ◀ PEDESTRIAN MOVEMENT

TABLE OF OPERATION

SIGNAL FACE	PHASE								FLASH
	Ø 1+5	Ø 2+6	Ø 3+7	Ø 4+8	Ø 1+6	Ø 2+5	Ø 3+8	Ø 4+7	
11	←	←	←	←	←	←	←	←	Y
21	R	R	G	G	R	R	R	R	Y
22	R	R	G	G	R	R	R	R	Y
31	←	←	←	←	←	←	←	←	Y
41, 42	R	R	R	R	R	R	R	R	G
51	←	←	←	←	←	←	←	←	Y
61	R	G	R	G	R	R	R	R	Y
62	R	G	R	G	R	R	R	R	Y
71	←	←	←	←	←	←	←	←	Y
81, 82	R	R	R	R	R	G	R	G	R
P21, P22	DW	DW	W	W	DW	DW	DW	DRK	
P41, P42	DW	DW	DW	DW	DW	DW	W	DRK	
P61, P62	DW	W	DW	W	DW	DW	DW	DRK	
P81, P82	DW	DW	DW	DW	W	DW	W	DRK	

SIGNAL FACE I.D.

All Heads L.E.D.



ASC/3 DETECTOR INSTALLATION CHART

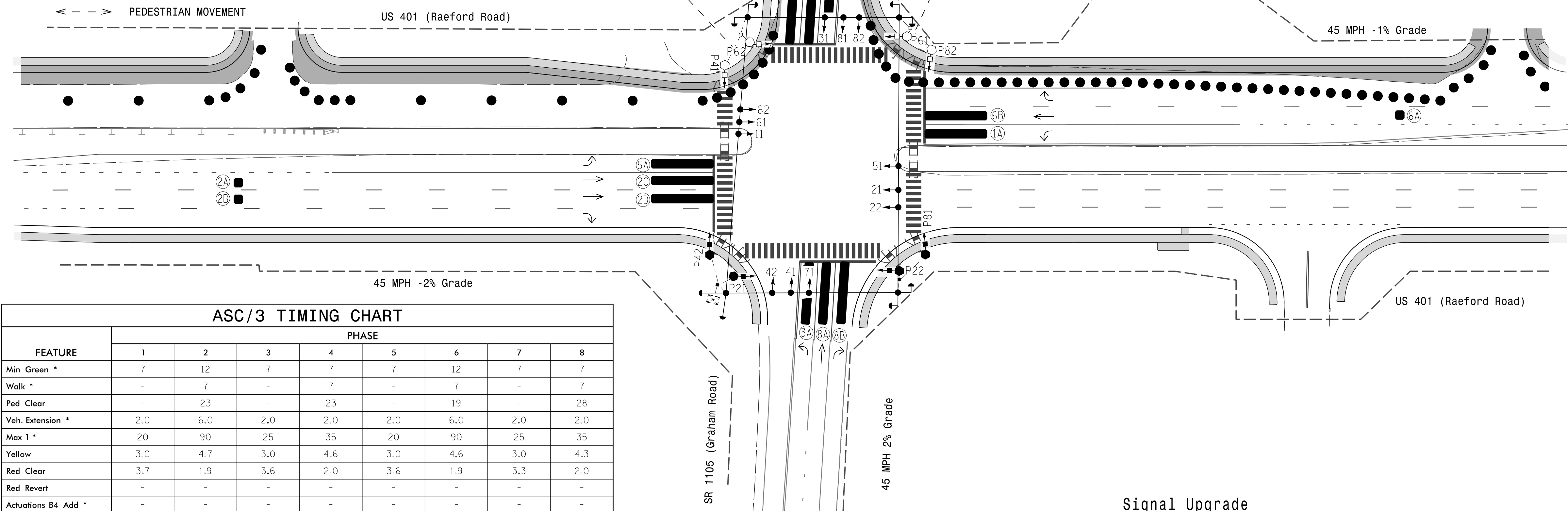
LOOP	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	TURNS	NEW LOOP	PROGRAMMING					SYSTEM LOOP	NEW CARD
					PHASE	CALLING	EXTEND TIME	DELAY TIME	USE ADDED INITIAL		
1A	6X40	0	*	-	1	Yes	-	-	-	S	-
2A	6X6	300	*	-	2	Yes	-	-	-	N	-
2B	6X6	300	*	-	2	Yes	-	-	-	N	X
2C	6X40	0	*	-	2	Yes	2.0	5	-	G	-
2D	6X40	0	*	-	2	Yes	2.0	5	-	G	-
3A	6X40	0	*	-	3	Yes	-	3	-	S	-
4A	6X40	0	*	-	4	Yes	-	-	-	S	-
4B	6X40	0	*	-	4	Yes	-	15	-	S	-
5A	6X40	0	*	-	5	Yes	-	-	-	S	-
6A	6X6	300	*	-	6	Yes	-	-	-	N	-
6B	6X40	0	*	-	6	Yes	2.0	5	-	G	-
7A	6X40	0	*	-	7	Yes	-	3	-	S	-
8A	6X40	0	*	-	8	Yes	-	-	-	S	-
8B	6X40	0	*	-	8	Yes	-	15	-	S	-

* Video Detection Area Camera locations should be confirmed in the field by the contractor in order to provide detection of the areas indicated.

8 Phase Fully Actuated Fayetteville Signal System

NOTES

1. Refer to "Roadway Standard Drawings NCDOT" dated January 2018 and "Standard Specifications for Roads and Structures" dated January 2018.
2. Do not program signal for late night flashing operation unless otherwise directed by the Engineer.
3. Phase 1 and/or phase 5 may be lagged.
4. Phase 3 and/or phase 7 may be lagged.
5. Reposition existing signal heads numbered 11, 21, 22, 51, 61, & 62.
6. Set all detector units to presence mode.
7. Omit "WALK" and flashing "DON'T WALK" with no pedestrian calls.
8. Program pedestrian heads to countdown the flashing "Don't Walk" time only.
9. Pavement markings are existing.
10. Maximum times shown in timing chart are for free-run operation only. Coordinated signal system timing values supersede these values.
11. Pedestrian pedestals are conceptual and are shown for reference only. See 2018 NCDOT Roadway Standard Drawings 1705.04 sheets 1-3 for push button details.



ASC/3 TIMING CHART

FEATURE	PHASE							
	1	2	3	4	5	6	7	8
Min Green *	7	12	7	7	7	12	7	7
Walk *	-	7	-	7	-	7	-	7
Ped Clear	-	23	-	23	-	19	-	28
Veh. Extension *	2.0	6.0	2.0	2.0	2.0	6.0	2.0	2.0
Max I *	20	90	25	35	20	90	25	35
Yellow	3.0	4.7	3.0	4.6	3.0	4.6	3.0	4.3
Red Clear	3.7	1.9	3.6	2.0	3.6	1.9	3.3	2.0
Red Revert	-	-	-	-	-	-	-	-
Actuations B4 Add *	-	-	-	-	-	-	-	-
Seconds / Actuation *	-	-	-	-	-	-	-	-
Max Initial *	-	-	-	-	-	-	-	-
Time Before Reduction *	-	15	-	-	-	15	-	-
Time To Reduce *	-	30	-	-	-	30	-	-
Minimum Gap	-	3.0	-	-	-	3.0	-	-
Locking Detector	-	-	-	-	-	-	-	-
Recall Position	-	VEH. RECALL	-	-	-	VEH. RECALL	-	-
Dual Entry	-	-	-	-	-	-	-	-
Simultaneous Gap	X	X	X	X	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.

LEGEND

- | PROPOSED | EXISTING |
|--|---------------------------------|
| ○ Traffic Signal Head | ● Traffic Signal Head |
| ○ Modified Signal Head | N/A |
| ○ Sign | ○ Sign |
| ○ Pedestrian Signal Head With Push Button & Sign | ○ Pedestrian Signal Head |
| ○ Signal Pole with Guy | ○ Signal Pole with Guy |
| ○ Signal Pole with Sidewalk Guy | ○ Signal Pole with Sidewalk Guy |
| ○ Inductive Loop Detector | ○ Inductive Loop Detector |
| ○ Controller & Cabinet | ○ Controller & Cabinet |
| ○ Junction Box | ○ Junction Box |
| ○ 2-in Underground Conduit | ○ 2-in Underground Conduit |
| N/A Right of Way | ○ Right of Way |
| ○ Directional Arrow | ○ Directional Arrow |
| ○ Video Detection Area | N/A |
| ○ Construction Zone | N/A |
| ○ Drums | N/A |
| ○ Type II Signal Pedestal | ○ Type II Signal Pedestal |

Signal Upgrade Temporary Signal Design 2 - TMP Phase II

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Prepared for the Offices of:

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Division 6 Cumberland County Fayetteville

PLAN DATE: March 2018 REVIEWED BY: E D Harris

PREPARED BY: A D Smith REVIEWED BY: B L Watson

REVISIONS: INIT. DATE

3/29/2018

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED