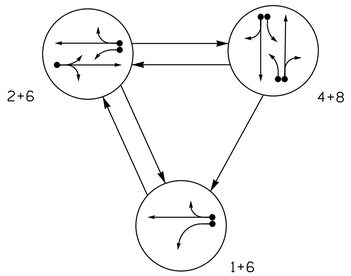
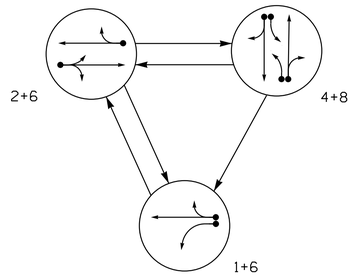
PROJECT REFERENCE NO.	SHEET NO.
U-6018	Sig-11.0

DEFAULT PHASING DIAGRAM



DEFAULT PHASING TABLE OF OPERATION				
SIGNAL FACE	PHASE 1+6	PHASE 2+6	PHASE 4+8	PHASE FLASH
11	←-	F Y	-R	-R
21,22	R	G	R	R
41	-R	-R	F Y	-R
42,43	R	R	G	R
61,62	G	G	R	R
81	-R	-R	F Y	-R
82,83	R	R	G	R

ALTERNATE PHASING DIAGRAM



ALTERNATE PHASING TABLE OF OPERATION				
SIGNAL FACE	PHASE 1+6	PHASE 2+6	PHASE 4+8	PHASE FLASH
11	←-	-R	-R	-R
21,22	R	G	R	R
41	-R	-R	F Y	-R
42,43	R	R	G	R
61,62	G	G	R	R
81	-R	-R	F Y	-R
82,83	R	R	G	R

ASC/3 DETECTOR INSTALLATION CHART

DETECTOR					PROGRAMMING							
ZONE(S)	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	TURNS	NEW LOOP	PHASE	CALLING	EXTEND TIME	DELAY TIME	USE ADDED INITIAL	TYPE	SYSTEM LOOP	NEW CARD
1A	6X40	0	**	**	1	Yes	-	15.0*	-	N	-	**
					6#	Yes	-	3.0	-	G	-	**
2A	6X6	300	**	**	2	Yes	-	-	-	N	-	**
2B	6X40	0	**	**	2	Yes	2.0	5.0	-	G	-	**
4A	6X40	0	**	**	4	Yes	-	3.0	-	N	-	**
4B	6X40	0	**	**	4	Yes	-	10.0	-	N	-	**
6A	6X6	300	**	**	6	Yes	-	-	X	N	-	**
8A	6X40	0	**	**	8	Yes	-	3.0	-	N	-	**
8B	6X40	0	**	**	8	Yes	-	10.0	-	N	-	**

*Reduce delay to 3.0 seconds during Alternate Phasing operation.
#Disable phase call for loop during Alternate Phasing operation.
**Multizone Microwave Detection.

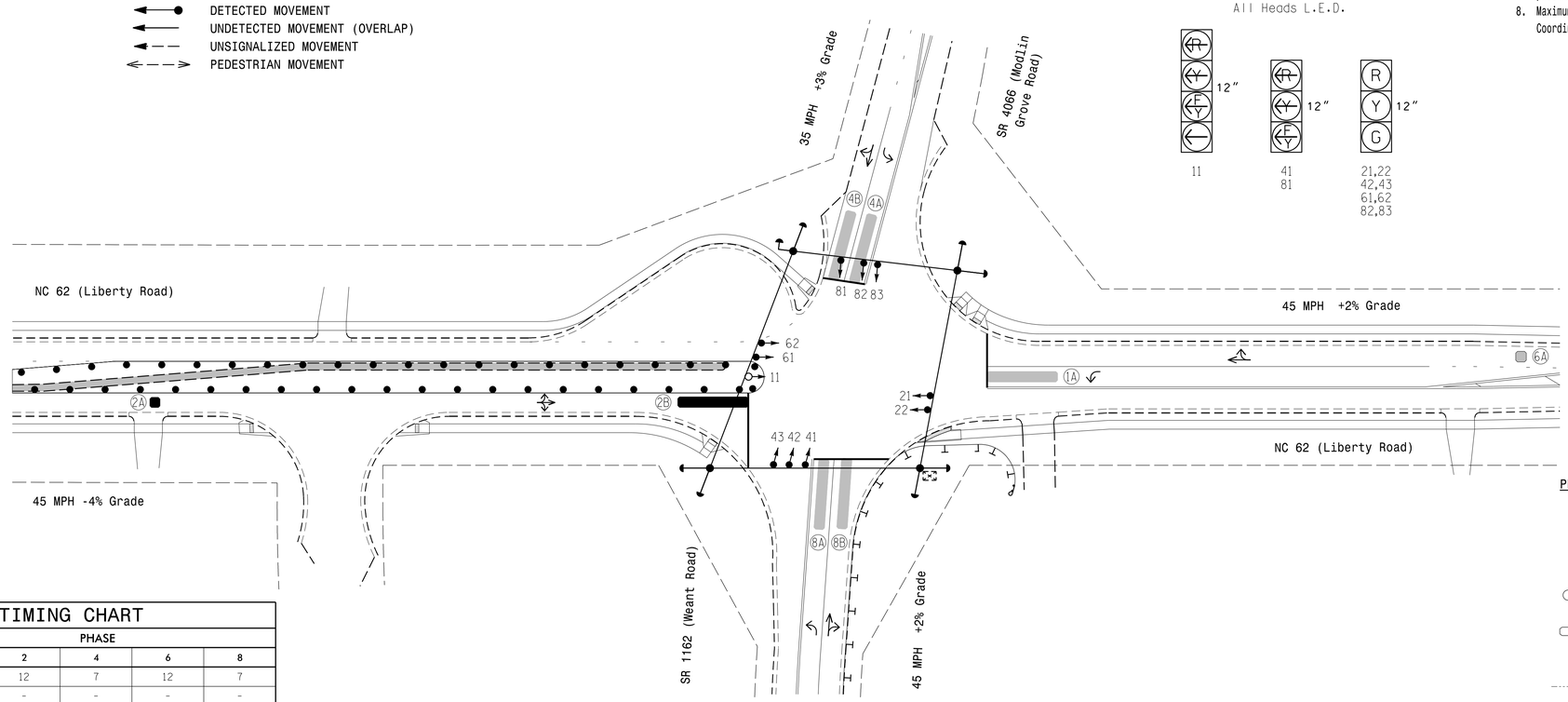
3 Phase
Fully Actuated
(High Point Signal System)

NOTES

1. Refer to "Roadway Standard Drawings NCDOT" dated January 2024 and "Standard Specifications for Roads and Structures" dated January 2024.
2. Do not program signal for late night flashing operation unless otherwise directed by the Engineer.
3. Enable Backup Prevent for phase 6 to allow the controller to clear from phase 2+6 to phase 1+6 by progressing through an all red display.
4. Set all detector units to presence mode.
5. Reposition existing signal heads 21, 22, 61 and 62.
6. This intersection uses multi-zone microwave detection. Install detectors according to the manufacturer's instructions to achieve the desired detection.
7. The City Traffic Engineer will determine the hours of use for each phasing plan.
8. Maximum times shown in timing chart are for free-run operation only. Coordinated signal system timing values supersede these values.

PHASING DIAGRAM DETECTION LEGEND

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



SIGNAL FACE I.D.

All Heads L.E.D.

ASC/3 TIMING CHART

FEATURE	PHASE 1	PHASE 2	PHASE 4	PHASE 6	PHASE 8
Min Green *	7	12	7	12	7
Walk *	-	-	-	-	-
Ped Clear	-	-	-	-	-
Veh. Extension *	2.0	6.0	2.0	6.0	2.0
Max 1 *	20	75	30	75	30
Yellow	3.0	4.9	4.3	4.9	4.3
Red Clear	3.3	2.0	1.6	2.0	1.6
Red Revert	2.0	2.0	2.0	5.0	2.0
Actuations B4 Add *	-	-	-	-	-
Seconds /Actuation *	-	-	-	2.5	-
Max Initial *	-	-	-	34	-
Time Before Reduction *	-	15	-	15	-
Time To Reduce *	-	30	-	30	-
Minimum Gap	-	3.0	-	3.0	-
Locking Detector	-	-	-	X	-
Recall Position	-	VEH RECALL	-	VEH RECALL	-
Dual Entry	-	-	X	-	X
Simultaneous Gap	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	
	Modified Signal Head	N/A
	Sign	
	Pedestrian Signal Head	
	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	
	Directional Arrow	
	Non-Intrusive Detection Zone	
	Construction Zone	N/A
N/A	Guardrail	
N/A	Curb Ramp	
N/A	Construction Zone Drums	

Signal Upgrade -
Temporary Design 2 (TMP Phase II, Step B and TMP Phase III)

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

DRMP
DRMP, INC.
8210 UNIVERSITY EXECUTIVE PARK DR.
SUITE 220
CHARLOTTE, NC 28262
PHONE: 704-549-4260
NC LICENSE NO. F-1524
www.drmp.com

Prepared for: Transportation Mobility and Safety Division, North Carolina Department of Transportation, Signal Design Section

750 N.Greenfield Pkwy,Garner,NC 27529

NC 62 (Liberty Road) at SR 1162 (Weant Road) / SR 4066 (Modlin Grove Road)

Division 7 Guilford County Archdale

PLAN DATE:	March 2025	REVIEWED BY:	ZM Esposito
PREPARED BY:	AW Poole	RKA PROJ. NO:	17380 (040)

SCALE 1"=40'

REVISIONS	INIT.	DATE
1		
2		

SEAL
NORTH CAROLINA PROFESSIONAL SEAL 054155 ENGINEER ZACHARY M. ESPOSITO

Signed by: Zachary M. Esposito 3/17/2025
SIGNATURE DATE

SIG. INVENTORY NO. 07-2100T2