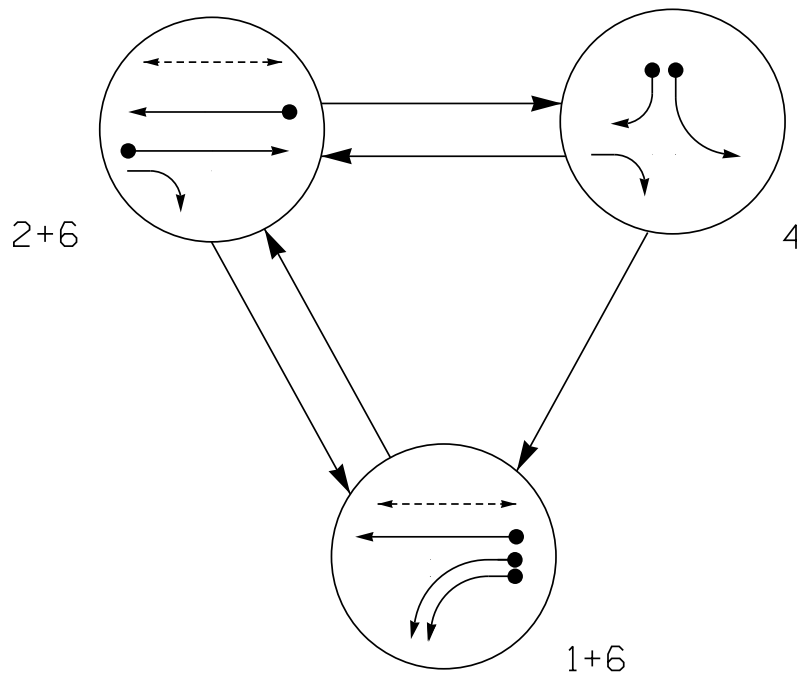


PHASING DIAGRAM



SIGNAL FACE	PHASE			
	1 + 6	2 + 6	4	FLASH
11,12	←	←R	←R	←R
21	R	↑	R	R
22	R	G	R	R
23	R	→	→	R
41	←R	←R	←	←R
42	R	R	G	R
43	R	R	↗	R
61	G	G	R	R
62	↑	↑	R	R
P61,P62	W	W	DW	DRK

MAXTIME DETECTOR INSTALLATION CHART										
DETECTOR					PROGRAMMING					
LOOP	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	URNS	NEW LOOP	CALL PHASE	DELAY TIME	EXTEND TIME	EXTEND	ADDED INITIAL CALL	NEW CARD
1A	6X40	0	2-4-2	X	1	3.0	-	X	-	X
1B	6X40	0	2-4-2	X	1	-	-	X	-	X
2A	6X6	250	5	X	2	-	-	X	X	X
4A	6X40	0	2-4-2	X	4	-	-	X	-	X
4B	6X40	0	2-4-2	X	4	15.0	-	X	-	X
6A	6X6	250	4	X	6	-	-	X	X	X

3 Phase
Fully Actuated
(NC 135 CLS)
Signal System # D07-09_Mayodan

NOTES

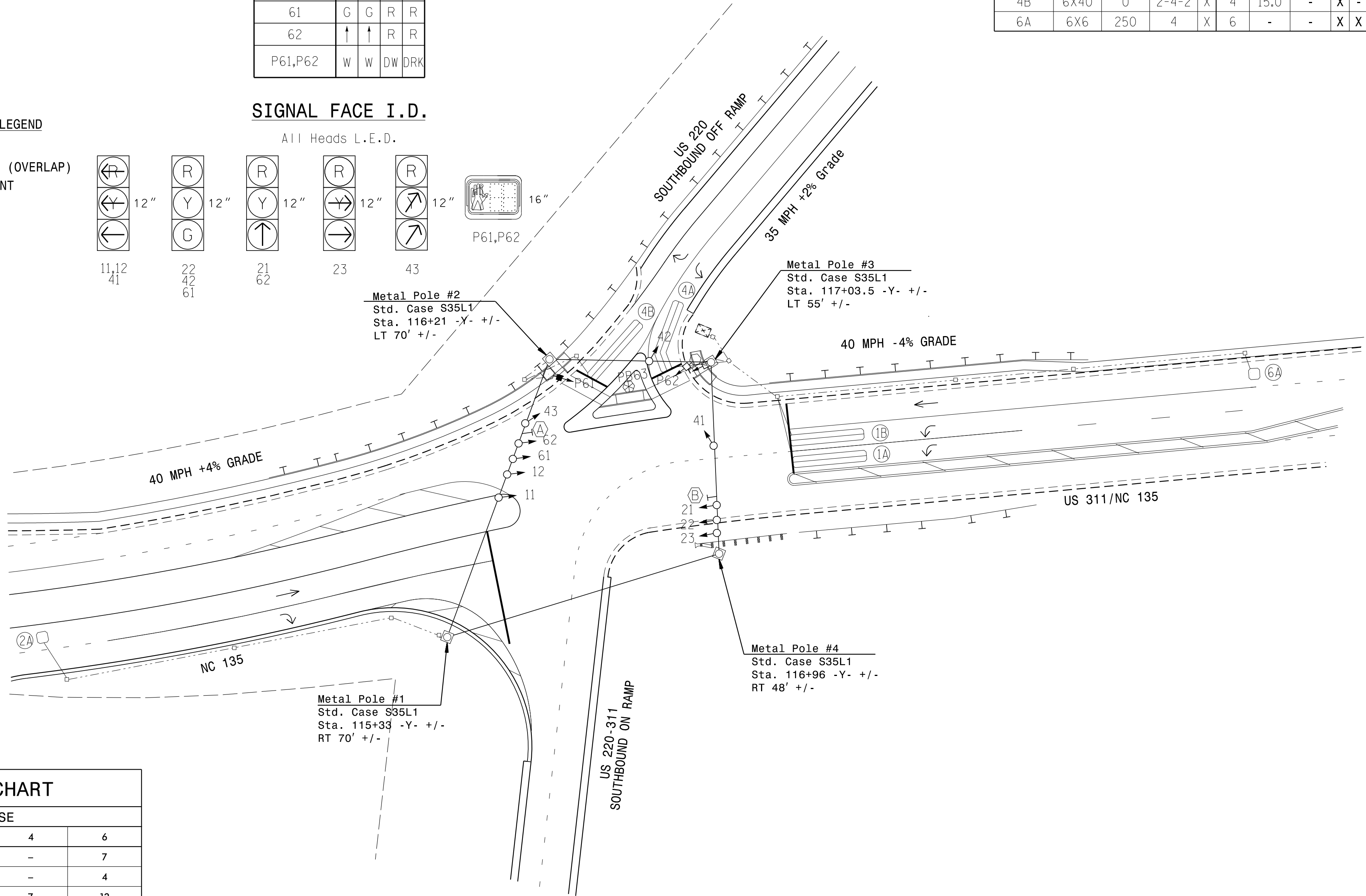
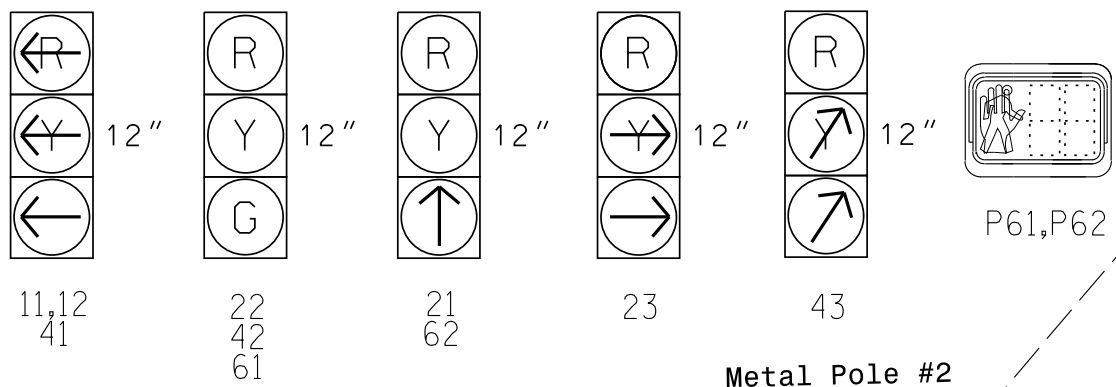
- Refer to "Roadway Standard Drawings NCDOT" dated January 2024 and "Standard Specifications for Roads and Structures" dated January 2024.
- Do not program signal for late night flashing operation unless otherwise directed by the Engineer.
- Phase 1 may be lagged.
- Tether signalheads numbered 43 and 62.
- Set all detector units to presence mode.
- Omit "Walk" and flashing "Don't Walk" with no pedestrian calls.
- Program pedestrian heads to countdown the flashing "Don't Walk" time only.
- Maximum times shown in timing chart are for free-run operation only. Coordinated signalsystem 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.



MAXTIME TIMING CHART

FEATURE	PHASE			
	1	2	4	6
Walk *	-	-	-	7
Ped Clear	-	-	-	4
Min Green *	7	12	7	12
Passage *	2.0	6.0	2.0	6.0
Max 1 *	20	90	40	90
Yellow Change	3.0	4.1	3.0	4.1
Red Clear	3.9	3.1	2.8	3.1
Added Initial *	-	2.5	-	2.5
Maximum Initial *	-	29	-	29
Time Before Reduction *	-	15	-	15
Time To Reduce *	-	30	-	30
Minimum Gap	-	3.0	-	3.0
Advance Walk	-	-	-	-
Non Lock Detector	X	-	X	-
Vehicle Recall	-	MIN RECALL	-	MIN RECALL
Dual Entry	-	-	-	-

* These values may be field adjusted. Do not adjust Min Green and Passage 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: Traffic Signal Head Sign, Pedestrian Signal Head With Push Button & Sign, Inductive Loop Detector, Controller & Cabinet Junction Box, 2-in Underground Conduit, Right of Way, Directional Arrow, Guardrail, Type I Pushbutton Post, Type II Signal Pedestal, Metal Strain Pole, Curb Ramp, No Right Turn Sign (R3-1), No U-turn/No Left Turn Sign (R3-18).
- EXISTING: Traffic Signal Head Sign, Pedestrian Signal Head With Push Button & Sign, Inductive Loop Detector, Controller & Cabinet Junction Box, 2-in Underground Conduit, Right of Way, Directional Arrow, Guardrail, Type I Pushbutton Post, Type II Signal Pedestal, Metal Strain Pole, Curb Ramp, No Right Turn Sign (R3-1), No U-turn/No Left Turn Sign (R3-18).

Signal Upgrade - Final Design

Prepared for the Offices of:

Transportation Mobility and Safety Division
DEPARTMENT OF TRANSPORTATION
Signal Design Section

750 N. Greenfield Pkwy, Garner, NC 27529

US 311/NC 135
at
US 220 Southbound Ramps

Division 7 Rockingham County Mayodan

PLAN DATE: August 2025 REVIEWED BY: _____

PREPARED BY: Golam Moinuddin REVIEWED BY: _____

REVISIONS	INIT.	DATE

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

SEAL
NORTH CAROLINA
PROFESSIONAL ENGINEER
SEAL 034454
GOLAM M. MOINUDDIN

Signed by: Golam Moinuddin
8/1/2025
SIGNATURE DATE
SIC. INVENTORY NO. 07-1475

Plans Prepared in the Offices of:



Johnson, Mirmiran, & Thompson Inc.
4700 Falls of Neuse Rd, Suite 100,
Raleigh, NC, 27606
License No: C-3097



SCALE
0 40
1"=40'