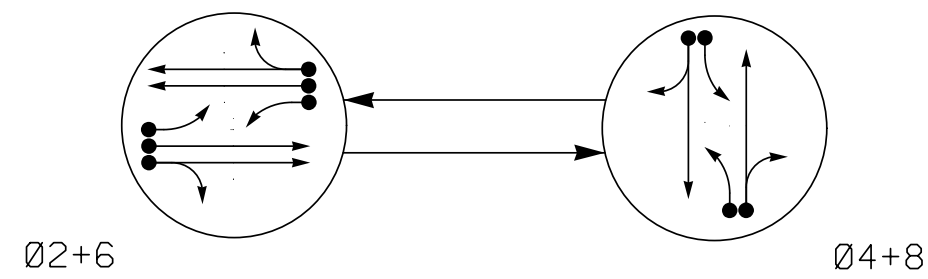


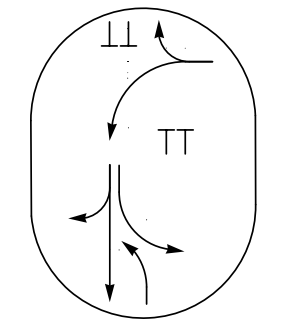
**PHASING DIAGRAM**



**PHASING DIAGRAM DETECTION LEGEND**

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

**EV PREEMPT PHASES (Medium Priority)**



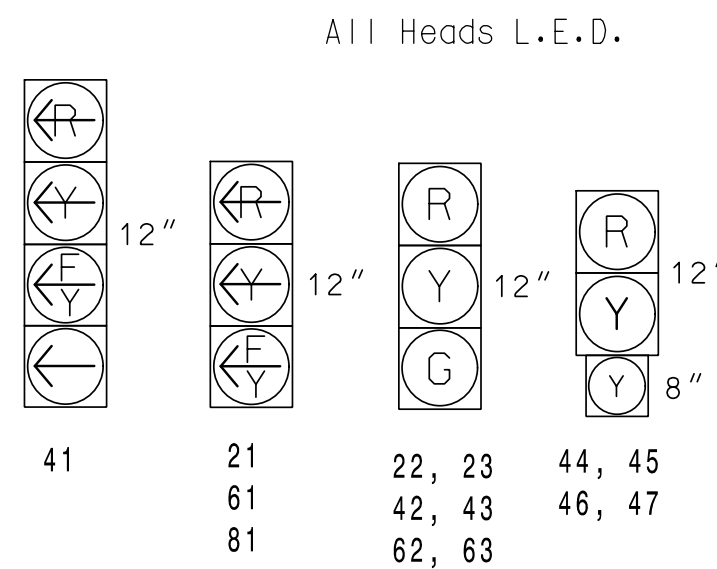
PRE 2 (04+7)

**TABLE OF OPERATION**

SIGNAL FACE	PHASE			
	02+6	04+8	P	F
21	F	R	R	Y
22, 23	G	R	R	Y
41	R	F	R	R
42, 43	R	G	G	R
*44, 45, 46, 47	F	F	R	Y
61	F	R	R	Y
62, 63	G	R	R	Y
81	R	F	R	R
82, 83	R	G	R	R
91	DRK	DRK	G	R

\* Denotes Flashing Yellow for 8" signal face. See note #8.

**SIGNAL FACE I.D.**



**OASIS 2070 LOOP & DETECTOR INSTALLATION CHART**

LOOP	SIZE (FT)	DISTANCE FROM STOPBAR (FT)	TURNS	NEW LOOP	DETECTOR PROGRAMMING				SYSTEM LOOP	NEW CARD
					PHASE	CALLING	EXTENSION	FULL TIME DELAY		
2A	6X6	300	6	Y	2	Y	Y	-	-	-
2B	6X6	300	6	Y	2	Y	Y	-	-	-
2C	6X40	0	2-4-2	Y	2	Y	Y	-	3	-
4A	6X40	0	2-4-2	Y	4	Y	Y	-	3	-
4B	6X40	0	2-4-2	Y	4	Y	Y	-	10	-
4C	6X15	0	2-4-2	Y	4	Y	Y	-	15	-
6A	6X6	300	6	Y	6	Y	Y	-	-	-
6B	6X6	300	6	Y	6	Y	Y	-	-	-
6C	6X40	0	2-4-2	Y	6	Y	Y	-	3	-
8A	6X40	0	2-4-2	Y	8	Y	Y	-	3	-
8B	6X40	0	2-4-2	Y	8	Y	Y	-	10	-
8C	6X6	0	6	Y	8	Y	Y	-	15	-

**2 PHASE FULLY ACTUATED W/EMERGENCY VEHICLE PREEMPTION (ISOLATED)**

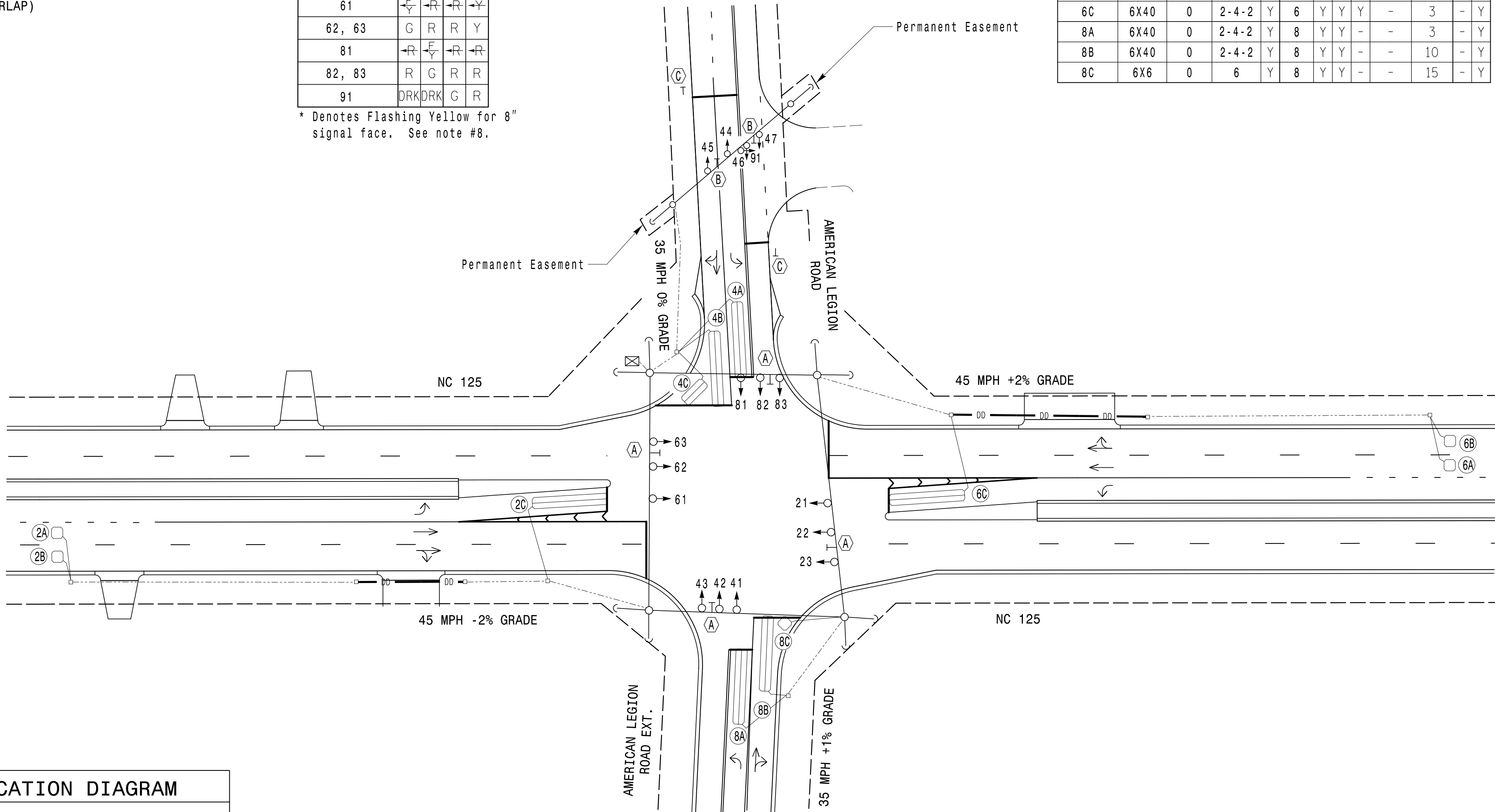
**NOTES**

- Refer to "Roadway Standard Drawings NCDOT" dated January 2018 and "Standard Specifications for Roads and Structures" dated January 2018.
- Set all detector units to presence mode.
- Locate new cabinet so as not to obstruct sight distance of vehicles turning right on red.
- Locate emergency vehicle preemption switch in Firestation.
- The Division Traffic Engineer will determine the Delay before Preempt and Preempt Dwell Min Green time for the emergency vehicle preemption timing.
- Clear signal heads 44, 45, 46 and 47 from flashing 8" yellow to steady 12" yellow and steady red during PRE 2.
- Signal head 91 is dark during normal operation, steady red during clear before emergency preemption, green during emergency preemption dwell time, then clear to yellow and red.

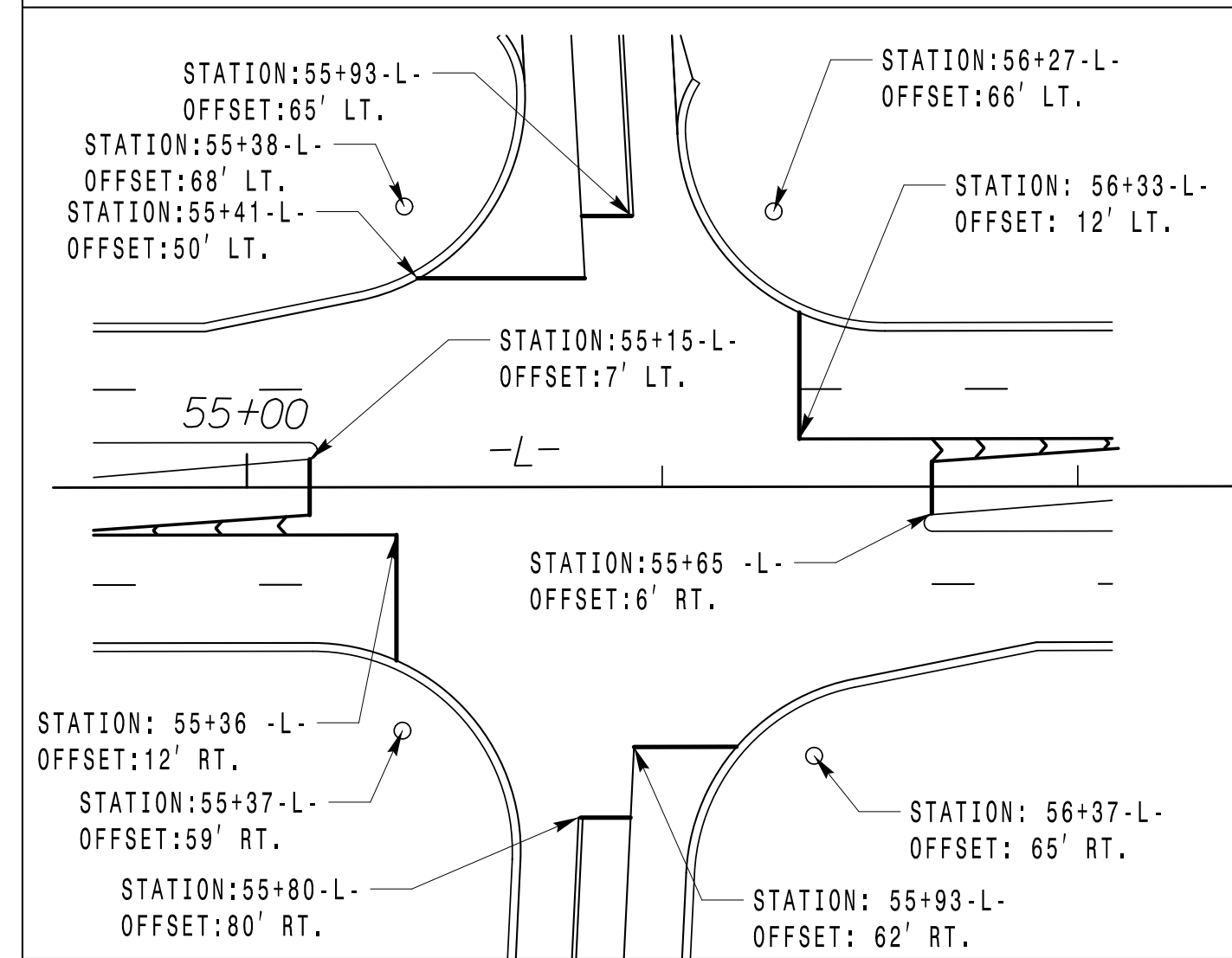
**OASIS 2070 EV PREEMPT**

FUNCTION	PRE 2
Interval 1 - Dwell Green	255
Interval 1 - Dwell Yellow	3,8
Interval 1 - Dwell Red	2,1
Interval 5 - Exit Green	1
Interval 5 - Yellow	0,0
Interval 5 - Red	0,0
Exit Phase(s)	2,6
Priority	MED
Delay Time	**
Min Green Before Pre	1
Ped Clear Before Pre	19
Yellow Clear Before Pre	0,0*
Red Clear Before Pre	0,0*
Dwell Min Time	**
Enable Backup Protection	N
Ped Clear Through Yellow	Y
Omit Overlaps	F

\* Time defaults to time used for phase during normal operation  
\*\* See Note #7.



**STOPLINE AND POLE LOCATION DIAGRAM**

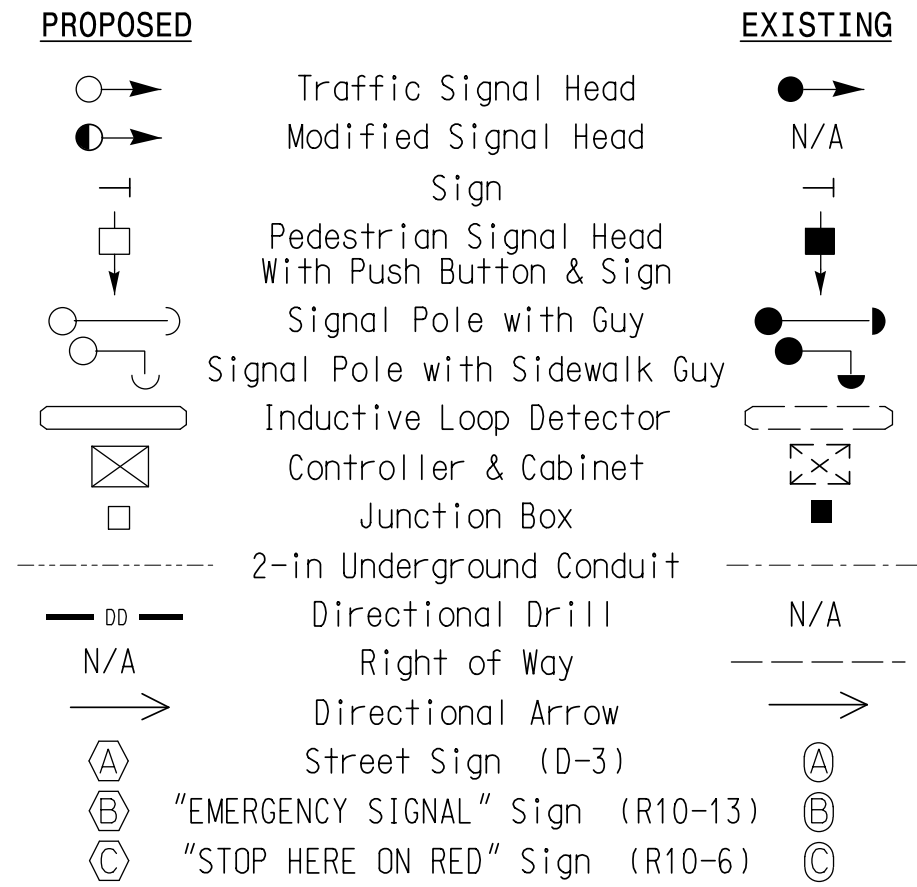


**OASIS 2070 TIMING CHART**

FEATURE	PHASE			
	2	4	6	8
Min Green 1 *	12	7	12	7
Extension 1 *	6,0	2,0	6,0	2,0
Max Green 1 *	90	30	90	30
Yellow Clearance	4,7	3,8	4,7	3,8
Red Clearance	1,9	2,4	1,9	2,4
Walk 1 *	-	-	-	-
Don't Walk 1	-	-	-	-
Seconds Per Actuation *	1,5	-	1,5	-
Max Variable Initial *	34	-	34	-
Time Before Reduction *	15	-	15	-
Time To Reduce *	45	-	45	-
Minimum Gap	3,0	-	3,0	-
Recall Mode	MIN RECALL	-	MIN RECALL	-
Vehicle Call Memory	YELLOW	-	YELLOW	-
Dual Entry	-	ON	-	ON
Simultaneous Gap	ON	ON	ON	ON

\* 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**



**NEW INSTALLATION**

Prepared For:  
  
 750 N. Greenfield Pkwy, Garner, NC 27529  
 SCALE: 1" = 40'

**NC 125 AT AMERICAN LEGION ROAD**

DIVISION 4 HALIFAX COUNTY ROANOKE RAPIDS  
 PLAN DATE: FEBRUARY 2018 REVIEWED BY: SL PHILLIPS  
 PREPARED BY: SP PENNINGTON REVIEWED BY:

REVISIONS	INIT.	DATE

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

SEAL  
  
 SIGNATURE: DATE: 6/12/2018  
 SIG. INVENTORY NO. 04-1435

PLANS PREPARED IN THE OFFICE OF:  
**Kimley-Horn**  
 NC License #0102  
 421 Fayetteville Street, Suite 600  
 Raleigh, NC 27601  
 (919) 677-2000

6/12/2018 2:58:58 PM susan.pennington K:\RAL\_TPTD\SIGNALS\1036392\_R-3822-U-5725\K54 - Signal Des\gn\260\_020\_U5725-R3822\_041435\_2018.dgn