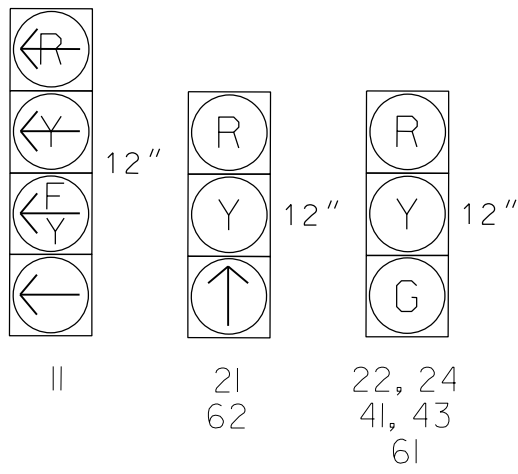


| TABLE OF OPERATION | | | | |
|--------------------|-------------|-------------|---|-------|
| SIGNAL FACE | PHASE | | | |
| | 1 + 6 | 2 + 6 | 4 | FLASH |
| II | ← | → | ← | ← |
| 2I | R | ↑ | R | R |
| 22, 24 | R | G | R | R |
| 4I, 43 | R | R | G | R |
| 6I | G | G | R | R |
| 62 | ↑ | ↑ | R | R |

All Heads L.E.D.

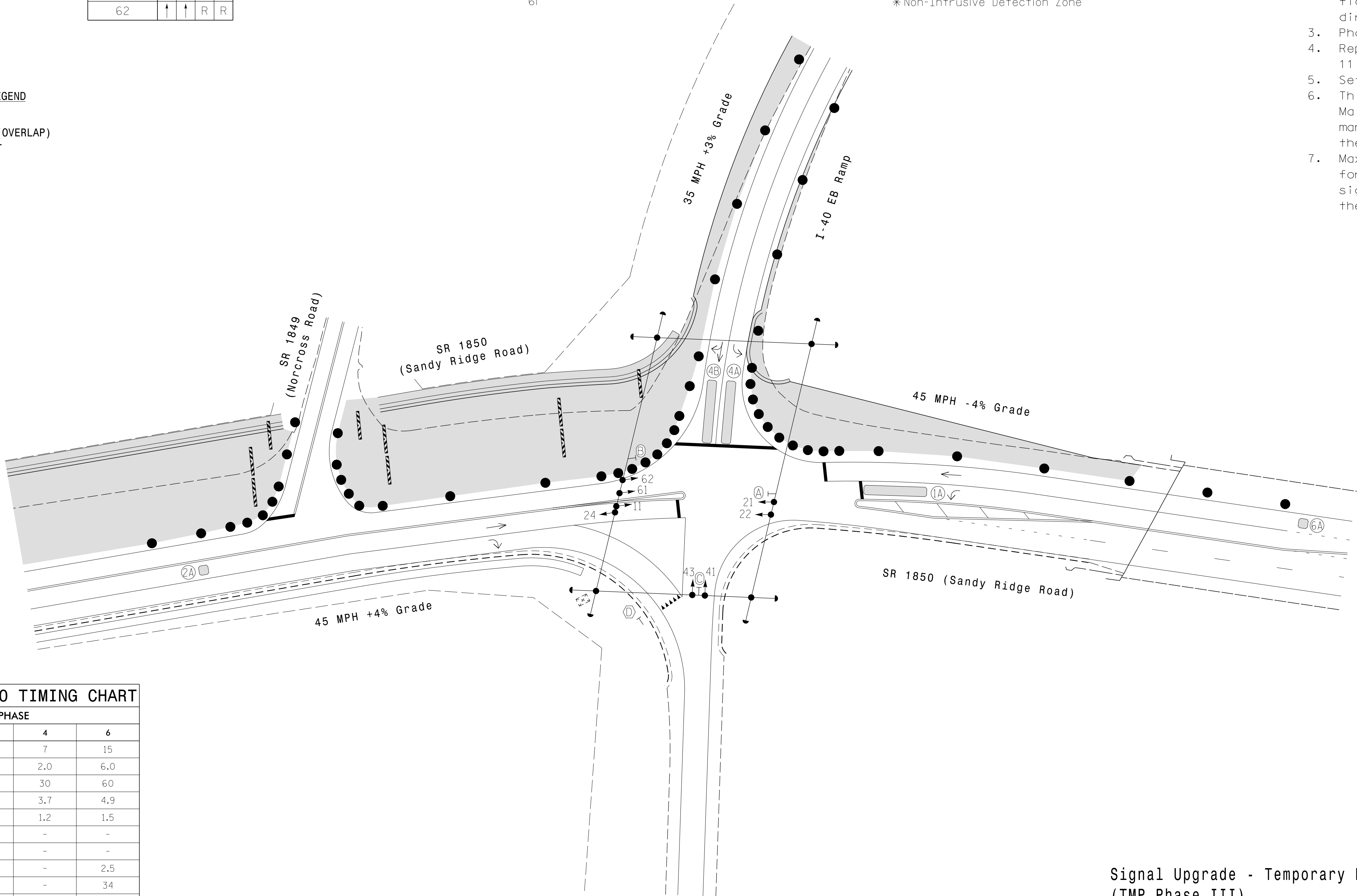
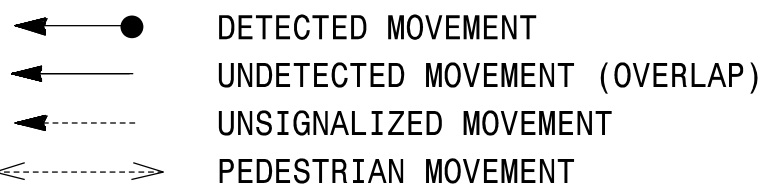


| INDUCTIVE LOOPS/ZONES | | | | | DETECTOR PROGRAMMING | | | | | | | | | |
|-----------------------|-----------|----------------------------|-------|----------|----------------------|----------------|------------|--------------|---------|-----------|-------------|-------------|----------|--|
| ZONE | SIZE (FT) | DISTANCE FROM STOPBAR (FT) | TURNS | NEW LOOP | PHASE | SWITCH (PHASE) | DELAY TIME | STRETCH TIME | CALLING | EXTENSION | ADDED INIT. | SYSTEM LOOP | NEW CARD | |
| 1A* | 6X40 | 0 | * | * | 1 | - | 15.0 | - | X | X | - | - | * | |
| | | | | | 6 | - | - | - | X | X | - | - | * | |
| 2A* | 6X6 | 300 | * | * | 2 | - | - | - | X | X | X | - | * | |
| 4A* | 6X40 | 0 | * | * | 4 | - | - | - | X | X | - | - | * | |
| 4B* | 6X40 | 0 | * | * | 4 | - | 10.0 | - | X | X | - | - | * | |
| 6A* | 6X6 | 300 | * | * | 6 | - | - | - | X | X | X | - | * | |

* Non-Intrusive Detection Zone

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. Phase 1 may be lagged.
4. Reposition existing signal heads numbered 11, 21, 22, 24, 61 and 62.
5. Set all detector units to presence mode.
6. This intersection uses video detection. Maintain detectors according to the manufacturer's instructions to achieve the desired detection.
7. Maximum times shown in timing chart are for free-run operation only. Coordinated signal system timing values supersede these values.

PHASING DIAGRAM DETECTION LEGEND



| FEATURE | PHASE | | | |
|-------------------------|-------|------------|-----|------------|
| | 1 | 2 | 4 | 6 |
| Min Green * | 7 | 15 | 7 | 15 |
| Gap, Extension * | 2.0 | 6.0 | 2.0 | 6.0 |
| Maximum Green 1 * | 20 | 60 | 30 | 60 |
| Yellow Clear | 3.0 | 4.9 | 3.7 | 4.9 |
| Red Clear | 3.2 | 1.5 | 1.2 | 1.5 |
| Walk * | - | - | - | - |
| Pedestrian Clear | - | - | - | - |
| Added Initial * | - | 1.5 | - | 2.5 |
| Maximum Initial * | - | 34 | - | 34 |
| Time Before Reduction * | - | 15 | - | 15 |
| Time To Reduce * | - | 30 | - | 30 |
| Minimum Gap | - | 3.0 | - | 3.0 |
| Recall Mode | - | MIN RECALL | - | MIN RECALL |
| Lock Calls | NO | YES | NO | YES |
| Dual Entry | - | - | - | - |
| Simultaneous Gap | ON | ON | ON | ON |


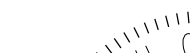



* These values may be field adjusted. Do not adjust Min Green and Extension times for phases 2 and 6 lower than what is shown. Min Green for all other phases should not be lower than 4 seconds.

LEGEND

| 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 | |
| | Non-Intrusive Detection Zone | N/A |
| | Controller & Cabinet | |
| | Junction Box | |
| | 2-in Underground Conduit | |
| N/A | Right of Way | |
| N/A | Guardrail | |
| N/A | Construction Zone | |
| N/A | Construction Zone Drums | |
| N/A | Type III Barrier | |
| | No Left Turn Sign (R3-2) | |
| | No Right Turn Sign (R3-1) | |
| | Street Name Sign (D3-1) | |
| | Yield Sign (R1-2) | |

Signal Upgrade - Temporary Design 3 (TMP Phase III)

AtkinsRéalis
1616 EAST MILLBROOK ROAD, SUITE 160
RALEIGH, NORTH CAROLINA 27609
(919) 876-6888 NCBEES #F-0326

| Prepared for the Offices of:  | <h1 style="margin: 0;">SR 1850 (Sandy Ridge Road)</h1> <h2 style="margin: 0;">at</h2> <h1 style="margin: 0;">I-40 EB Ramps</h1> | SEAL  | | | | | | | | | | | | | | | | | | | | |
|---|--|---|------------------------------------|------------------------------|----------------------------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| TRANSPORTATION SAFETY DIVISION NORTH CAROLINA DEPARTMENT OF TRANSPORTATION Signal Design Section | Division 7 Guilford County Greensboro | PROFESSIONAL ENGINEER SEAL 056276 JAMES S. STIFF | | | | | | | | | | | | | | | | | | | | |
| 750 N. Greenfield Pkwy, Garner, NC 27529 | <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;">PLAN DATE: January 2025</td> <td style="width: 50%;">REVIEWED BY: AM Encarnacion</td> </tr> <tr> <td>PREPARED BY: JT Stiff</td> <td>REVIEWED BY: PL Alexander</td> </tr> </table> | PLAN DATE: January 2025 | REVIEWED BY: AM Encarnacion | PREPARED BY: JT Stiff | REVIEWED BY: PL Alexander | SIGNED BY:  James S. Stiff 0548D00507872A434 3/14/2025 | | | | | | | | | | | | | | | | |
| PLAN DATE: January 2025 | REVIEWED BY: AM Encarnacion | | | | | | | | | | | | | | | | | | | | | |
| PREPARED BY: JT Stiff | REVIEWED BY: PL Alexander | | | | | | | | | | | | | | | | | | | | | |
|  | <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <th style="width: 50%;">REVISIONS</th> <th style="width: 50%;">INIT. DATE</th> </tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> <tr><td> </td><td> </td></tr> </table> | REVISIONS | INIT. DATE | | | | | | | | | | | | | | | | | | | SCALE  1" = 40' |
| REVISIONS | INIT. DATE | | | | | | | | | | | | | | | | | | | | | |
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| SIGNATURE _____ DATE _____ | | SIG. INVENTORY NO. 07-1648T3 | | | | | | | | | | | | | | | | | | | | |