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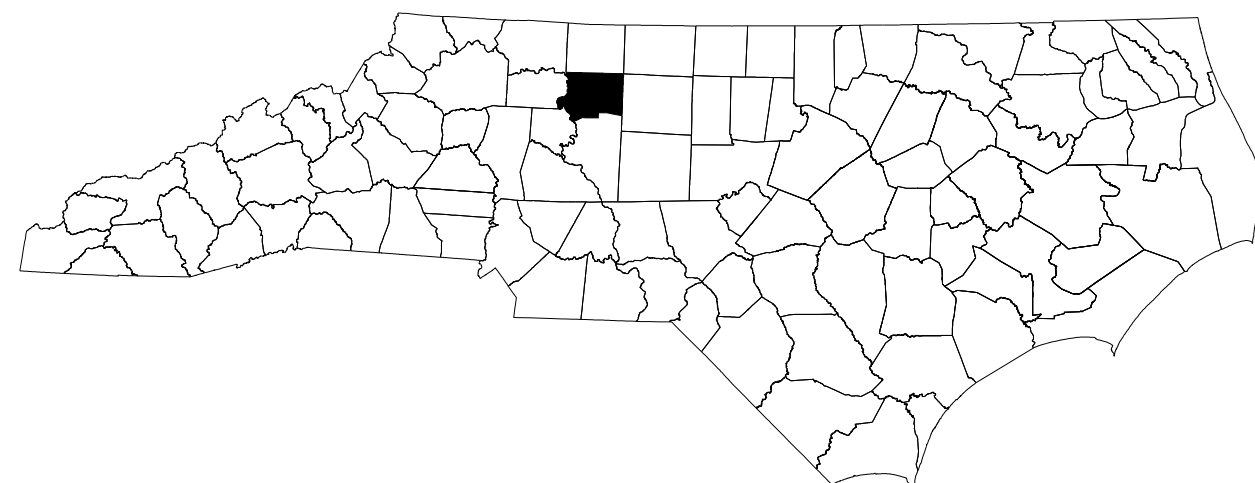
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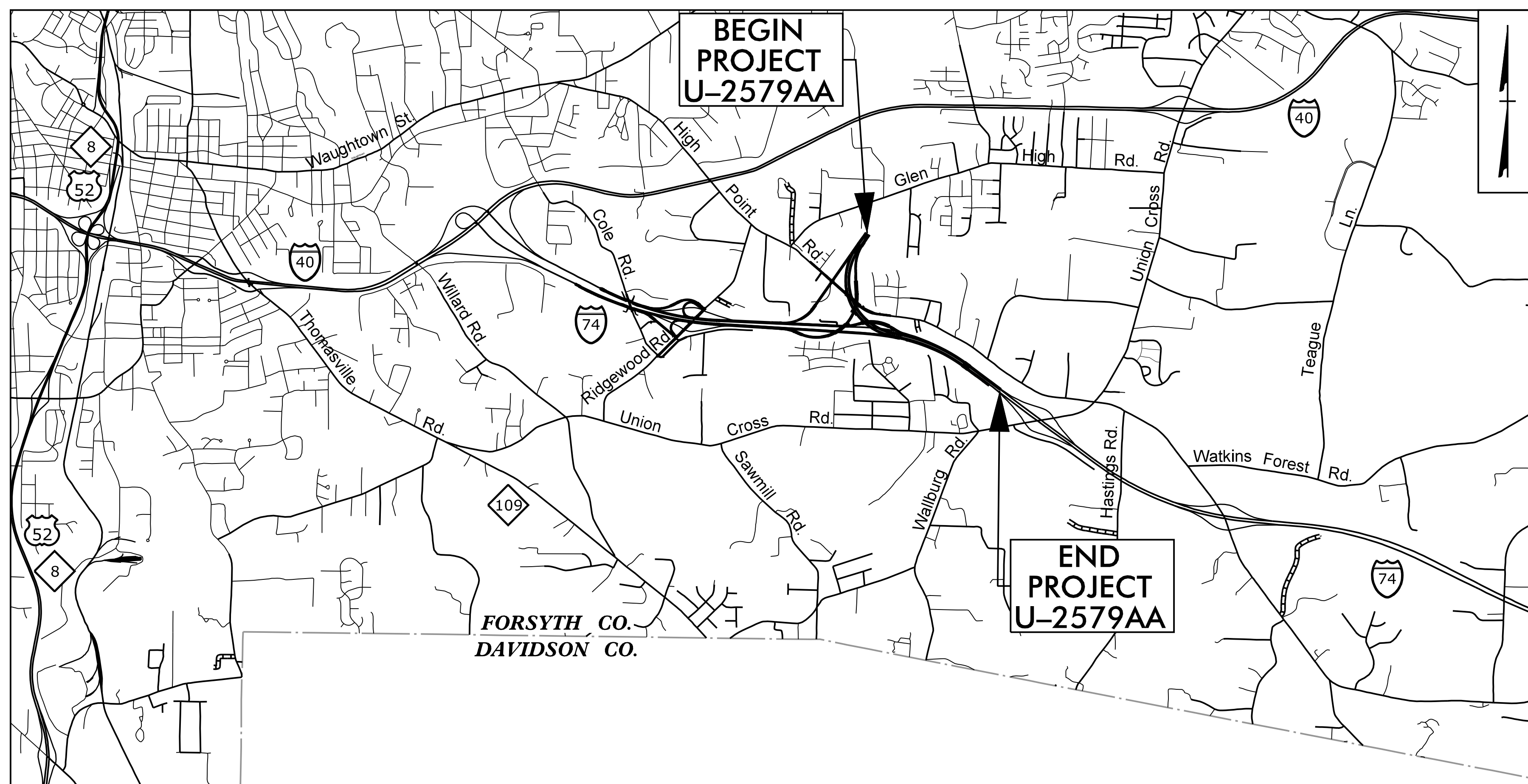
STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

TRANSPORTATION MANAGEMENT PLAN

FORSYTH COUNTY



**LOCATION: WINSTON-SALEM NORTHERN BELTWAY EASTERN SECTION
(FUTURE I-74) FROM US 311 TO I-40**



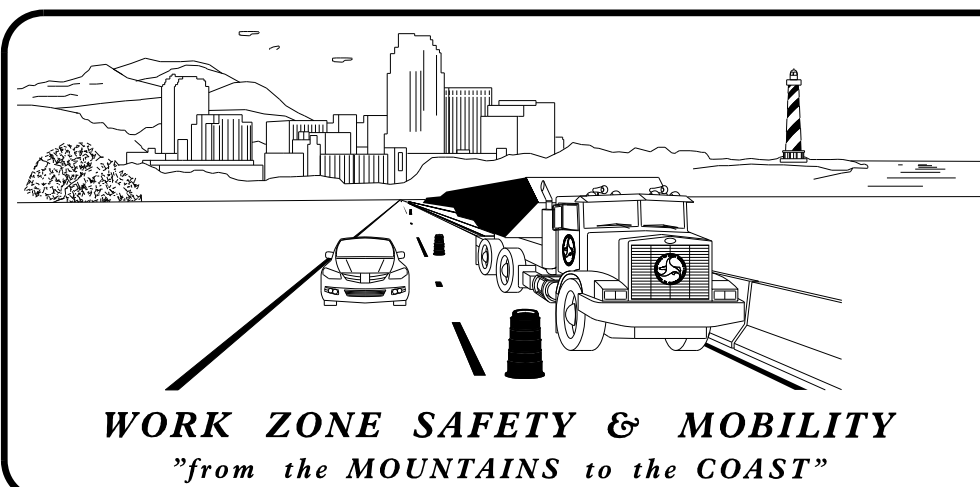
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SHEET NO.
TMP-1

U-2579AA

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PLANS PREPARED BY:

MICHELLE WARD, P.E.
TRAFFIC CONTROL PROJECT ENGINEER

CHRIS HARNDEN
TRAFFIC CONTROL DESIGN ENGINEER

NCDOT CONTACTS:

KEN THORNEWELL, P.E.
PROJECT ENGINEER

ALLA LYUDMIRSKAYA
PROJECT DESIGN ENGINEER



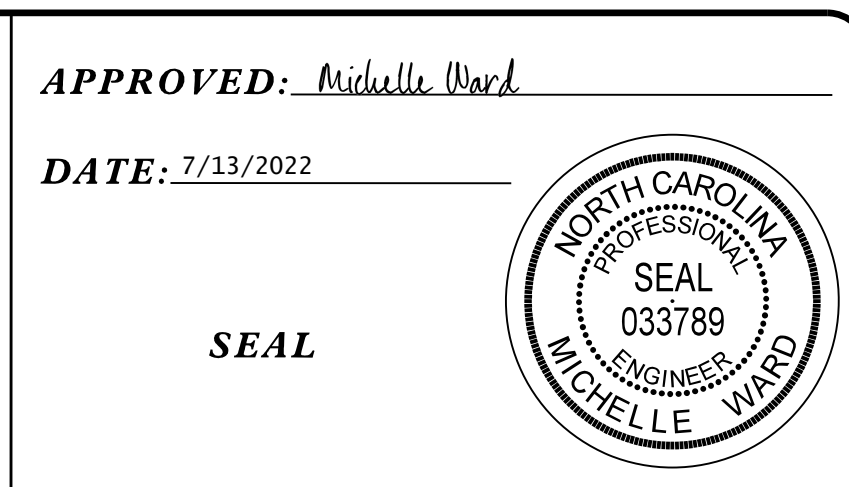
PLAN PREPARED BY:
HDR HDR Engineering, Inc. of the Carolinas
555 Fayetteville St, Suite 900 Raleigh, N.C. 27601
N.C.B.E.L.S. License Number: F-0116

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APPROVED: Michelle Ward


DATE: 7/13/2022

SEAL



TIP PROJECT:

MANAGEMENT STRATEGIES

PROJ. REFERENCE NO. U-2579AA	SHEET NO. TMP-1B
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AREA 1

MAINLINE -L- AND ALL RAMPS AND LOOPS WILL BE CONSTRUCTED AS MUCH AS POSSIBLE AWAY FROM TRAFFIC. WORK ON -L- AND RAMPS WILL BE COORDINATED WITH AREAS 2 AND 3 CONSTRUCTION.

AREA 2

-Y1- (HIGH POINT ROAD/OLD US 311) WILL BE CLOSED TO TRAFFIC AND AN OFF-SITE DETOUR WILL BE UTILIZED TO CONSTRUCT -Y1- (HIGH POINT ROAD/OLD US 311). TEMPORARY DRIVEWAY DETOURS WILL BE USED TO MAINTAIN ACCESS TO SEVERAL PROPERTIES.

ONCE -Y1- (HIGH POINT ROAD/OLD US 311) IS CONSTRUCTED, SHIFT TRAFFIC ONTO NEW -Y1- (HIGH POINT ROAD/OLD US 311).

AREA 3

PHASE 1: -Y2- (I-74) WILL REMAIN IN THE EXISTING PATTERN AND UTILIZE LANE CLOSURES/NARROWING TO CONSTRUCT PERMANENT AND TEMPORARY PAVEMENT TO THE INSIDE NB AND SB LANES. OTHER WORK IN THE INTERCHANGE WITH -Y3- (RIDGWOOD ROAD) WILL BEGIN IN PHASE 1, STEP 1, AWAY FROM TRAFFIC.

PHASE 2, STEP 1: SHIFT NB AND SB -Y2- (I-74) TRAFFIC TO PREVIOUSLY CONSTRUCTED PERMANENT AND TEMPORARY PAVEMENT AND CONSTRUCT OUTSIDE WIDENING. BEGIN CONSTRUCTION OF -Y2FLYCA- BRIDGE OVER -Y2- (I-74).

PHASE 2, STEPS 2, 2A, 2B & 2C: CLOSE EXISTING -Y2NBL- ENTRANCE RAMP FOR INTERCHANGE WITH -Y3- (RIDGWOOD ROAD) AND CONSTRUCT -Y3RPB- TIE-IN AND -Y2NBL- RECONSTRUCTION DURING AN ICT. -Y3RPB- IS THEN OPENED AND REMAINDER OF RECONSTRUCTION ON -Y2NBL- IS COMPLETED DURING THE ICT.

PHASE 2, STEP 3: BEHIND BARRIER, RECONSTRUCT -Y2SBL- UNDER -Y3- (RIDGWOOD ROAD).

PHASE 2, STEPS 4, 4A & 4B: -Y2SBL- IS REDUCED TO A SINGLE LANE AND RECONSTRUCTION ON -Y2SBL- IS COMPLETED DURING AN ICT.

PHASE 3: UTILIZING ON-SITE DETOURS, TEMPORARY PAVEMENT AND PROPOSED PAVEMENT, ALL OTHER WORK IN AREA 3 IS COMPLETE, INCLUDING SEQUENCING OF -Y2FLYCA- BRIDGE OVER -Y2- (I-74-).

GENERAL NOTES

CHANGES MAY BE REQUIRED WHEN PHYSICAL DIMENSIONS IN THE DETAIL DRAWINGS, STANDARD DETAILS, AND ROADWAY DETAILS ARE NOT ATTAINABLE TO MEET FIELD CONDITIONS OR RESULT IN DUPLICATE OR UNDESIRED OVERLAPPING OF DEVICES. MODIFICATION MAY INCLUDE: MOVING, SUPPLEMENTING, COVERING, OR REMOVAL OF DEVICES AS DIRECTED BY THE ENGINEER.

THE FOLLOWING GENERAL NOTES APPLY AT ALL TIMES FOR THE DURATION OF THE CONSTRUCTION PROJECT EXCEPT WHEN OTHERWISE NOTED IN THE PLAN OR DIRECTED BY THE ENGINEER.

TIME RESTRICTIONS

A) DO NOT CLOSE OR NARROW TRAVEL LANES AS FOLLOWS:

ROAD NAME	DAY AND TIME RESTRICTIONS
-Y2- (EX. I-74)	MONDAY - FRIDAY
I-40	6:00 A.M. - 9:00 P.M.
US 421	SATURDAY & SUNDAY
NC 74 (PROPOSED I-74)	11:00 A.M. TO 9:00 P.M.
US 52	
(INCLUDES ALL RAMPS ON THESE ROADS)	

ROAD NAME	DAY AND TIME RESTRICTIONS
-Y1- SR 1003 (HIGH POINT RD/OLD US 311)	ON SCHEDULED SCHOOL DAYS MONDAY - FRIDAY
-Y3- SR 2698 (RIDGWOOD RD) (INCLUDING RAMPS)	6:00 A.M. TO 9:00 A.M. AND 2:00 P.M. TO 4:30 P.M.

B) DO NOT CLOSE OR NARROW TRAVEL LANES DURING HOLIDAYS AND SPECIAL EVENTS AS FOLLOWS:

ROAD NAME	
-Y2- (EX. I-74)	
I-40	
US 421	
NC 74 (PROPOSED I-74)	
US 52	
(INCLUDES ALL RAMPS ON THESE ROADS)	

HOLIDAY

- FOR ANY UNEXPECTED OCCURRENCE THAT CREATES UNUSUALLY HIGH TRAFFIC VOLUMES, AS DIRECTED BY THE ENGINEER.
- FOR NEW YEAR'S, BETWEEN THE HOURS OF 6:00 A.M. DECEMBER 31st TO 9:00 P.M. JANUARY 2ND. IF NEW YEAR'S DAY IS ON A FRIDAY, SATURDAY, SUNDAY, OR MONDAY THEN UNTIL 9:00 P.M. THE FOLLOWING TUESDAY.
- FOR EASTER, BETWEEN THE HOURS OF 6:00 A.M. THURSDAY AND 9:00 P.M. MONDAY.
- FOR MEMORIAL DAY, BETWEEN THE HOURS OF 6:00 A.M. FRIDAY TO 9:00 P.M. TUESDAY.
- FOR INDEPENDENCE DAY, BETWEEN THE HOURS OF 6:00 A.M. THE DAY BEFORE INDEPENDENCE DAY AND 9:00 P.M. THE DAY AFTER INDEPENDENCE DAY.

IF INDEPENDENCE DAY IS ON A FRIDAY, SATURDAY, SUNDAY OR MONDAY THEN BETWEEN THE HOURS OF 6:00 A.M. THE THURSDAY BEFORE INDEPENDENCE DAY AND 9:00 P.M. THE TUESDAY AFTER INDEPENDENCE DAY.
- FOR LABOR DAY, BETWEEN THE HOURS OF 6:00 A.M. FRIDAY TO 9:00 P.M. TUESDAY.
- FOR THANKSGIVING DAY, BETWEEN THE HOURS OF 6:00 A.M. TUESDAY AND 9:00 P.M. MONDAY.
- FOR CHRISTMAS, BETWEEN THE HOURS OF 6:00 A.M. THE FRIDAY BEFORE THE WEEK OF CHRISTMAS DAY AND 9:00 P.M. THE FOLLOWING TUESDAY AFTER THE WEEK OF CHRISTMAS.

C) DO NOT CLOSE ROADS AS FOLLOWS:

ROAD NAME	DAY AND TIME RESTRICTIONS
US 421 RAMPS	MONDAY THRU SUNDAY
FOR SIGN INSTALLATION	6:00 A.M. TO 12:00 A.M. (MIDNIGHT)

D) DO NOT STOP TRAFFIC AS FOLLOWS:

ROAD NAME	DAY AND TIME RESTRICTIONS	DURATION OF OPERATION
-Y2- (EX. I-74) I-40 US 421 NC 74 (PROPOSED I-74) US 158 US 52 (INCLUDES ALL RAMPS ON THESE ROADS)	MONDAY THRU SUNDAY 6:00 A.M. TO 12:00 A.M. (MIDNIGHT)	30 MINUTES FOR OVERHEAD BRIDGE WORK & SIGN INSTALLATION (IF NEEDED & APPROVED BY THE ENGINEER)

E) DO NOT CONDUCT ANY HAULING OPERATIONS AGAINST THE FLOW OF TRAFFIC OF AN OPEN TRAVELWAY UNLESS THE HAULING OPERATION IS PROTECTED BY BARRIER OR GUARDRAIL OR AS DIRECTED BY THE ENGINEER.

LANE AND SHOULDER CLOSURE REQUIREMENTS

F) REMOVE LANE CLOSURE DEVICES FROM THE LANE WHEN WORK IS NOT BEING PERFORMED BEHIND THE LANE CLOSURE OR WHEN A LANE CLOSURE IS NO LONGER NEEDED OR AS DIRECTED BY THE ENGINEER.

G) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING WITHIN 15 FT OF AN OPEN TRAVEL LANE, CLOSE THE NEAREST OPEN SHOULDER USING ROADWAY STANDARD DRAWING NO. 1101.04 UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL OR A LANE CLOSURE IS INSTALLED.

H) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING ON THE SHOULDER ADJACENT TO AN UNDIVIDED FACILITY AND WITHIN 5 FT OF AN OPEN TRAVEL LANE, CLOSE THE NEAREST OPEN TRAVEL LANE USING ROADWAY STANDARD DRAWING NO. 1101.02 UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL.

WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING ON THE SHOULDER ADJACENT TO A DIVIDED FACILITY AND WITHIN 10 FT OF AN OPEN TRAVEL LANE, CLOSE THE NEAREST OPEN TRAVEL LANE USING ROADWAY STANDARD DRAWING NO. 1101.02 UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL.

I) WHEN PERSONNEL AND/OR EQUIPMENT ARE WORKING WITHIN A LANE OF TRAVEL OF AN UNDIVIDED OR DIVIDED FACILITY, CLOSE THE LANE ACCORDING TO THE TRANSPORTATION MANAGEMENT PLANS, ROADWAY STANDARD DRAWINGS, OR AS DIRECTED BY THE ENGINEER. CONDUCT THE WORK SO THAT ALL PERSONNEL AND/OR EQUIPMENT REMAIN WITHIN THE CLOSED TRAVEL LANE.

J) DO NOT WORK SIMULTANEOUSLY WITHIN 15 FT ON BOTH SIDES OF AN OPEN TRAVELWAY, RAMP, OR LOOP WITHIN THE SAME LOCATION UNLESS PROTECTED WITH GUARDRAIL OR BARRIER.



K) DO NOT INSTALL MORE THAN 1 MILE OF LANE CLOSURE ON EX. I-74 (-Y2-) MEASURED FROM THE BEGINNING OF THE MERGE TAPER TO THE END OF THE LANE CLOSURE.

L) DO NOT INSTALL MORE THAN TWO SIMULTANEOUS LANE CLOSURE IN ANY ONE DIRECTION ON EX. I-74 (-Y2-).


M) PROVIDE A MINIMUM OF 1 MILE BETWEEN LANE CLOSURES, MEASURED FROM THE END OF ONE CLOSURE TO THE FIRST SIGN OF THE NEXT LANE CLOSURE.

N) PROVIDE TRAFFIC CONTROL FOR APPROPRIATE LANE CLOSURES FOR SURVEYING.

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 REVISIONS

APPROVED: <i>Michelle Ward</i> DATE: 7/13/2022 		TRANSPORTATION OPERATIONS PLAN (MANAGEMENT STRATEGIES AND GENERAL NOTES)
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED		

GENERAL NOTES

PROJ. REFERENCE NO.	SHEET NO.
U-2579AA	TMP-1C
 HDR Engineering, Inc. of the Carolinas 555 Fayetteville St, Suite 900 Raleigh, N.C. 27601 N.C.B.E.L.S. License Number: F-0116	

PAVEMENT EDGE DROP OFF REQUIREMENTS

- O) BACKFILL AT A 6:1 SLOPE UP TO THE EDGE AND ELEVATION OF EXISTING PAVEMENT IN AREAS ADJACENT TO AN OPENED TRAVEL LANE THAT HAS AN EDGE OF PAVEMENT DROP-OFF AS FOLLOWS:

 BACKFILL DROP-OFFS THAT EXCEED 2 INCHES ON ROADWAYS WITH POSTED SPEED LIMITS OF 45 MPH OR GREATER.

 BACKFILL DROP-OFFS THAT EXCEED 3 INCHES ON ROADWAYS WITH POSTED SPEED LIMITS LESS THAN 45 MPH.

 BACKFILL WITH SUITABLE COMPACTED MATERIAL, AS APPROVED BY THE ENGINEER, AT NO EXPENSE TO THE DEPARTMENT.
- P) DO NOT EXCEED A DIFFERENCE OF 2 INCHES IN ELEVATION BETWEEN OPEN LANES OF TRAFFIC FOR NOMINAL LIFTS OF 1.5 INCHES. INSTALL ADVANCE WARNING "UNEVEN LANES" SIGNS (W8-11) 500 FT IN ADVANCE AND A MINIMUM OF EVERY HALF MILE THROUGHOUT THE UNEVEN AREA.

TRAFFIC PATTERN ALTERATIONS

- Q) NOTIFY THE ENGINEER THIRTY (30) CALENDAR DAYS PRIOR TO ANY TRAFFIC PATTERN ALTERATION.

SIGNING

- R) INSTALL ADVANCE WORK ZONE WARNING SIGNS WHEN WORK IS WITHIN 40 FT FROM THE EDGE OF TRAVEL LANE AND NO MORE THAN THREE (3) DAYS PRIOR TO THE BEGINNING OF CONSTRUCTION.
- S) PROVIDE SIGNING AND DEVICES REQUIRED TO CLOSE THE ROAD ACCORDING TO THE ROADWAY STANDARD DRAWINGS AND TRAFFIC CONTROL PLANS.

 PROVIDE SIGNING REQUIRED FOR THE OFF-SITE DETOUR ROUTE AS SHOWN IN THE TRAFFIC CONTROL PLANS.
- T) COVER OR REMOVE ALL SIGNS AND DEVICES REQUIRED TO CLOSE THE ROAD WHEN ROAD CLOSURE IS NOT IN OPERATION.

 COVER OR REMOVE ALL SIGNS REQUIRED FOR THE OFF-SITE DETOUR WHEN THE DETOUR IS NOT IN OPERATION.
- U) ENSURE ALL NECESSARY SIGNING IS IN PLACE PRIOR TO ALTERING ANY TRAFFIC PATTERN.
- V) INSTALL BLACK ON ORANGE "DIP" SIGNS (W8-2) AND/OR "BUMP" SIGNS (W8-1) 500 FT IN ADVANCE OF THE UNEVEN AREA, OR AS DIRECTED BY THE ENGINEER.

TRAFFIC BARRIER

- W) INSTALL TEMPORARY BARRIER ACCORDING TO THE TRANSPORTATION MANAGEMENT PLANS A MAXIMUM OF TWO (2) WEEKS PRIOR TO BEGINNING WORK IN ANY LOCATION. ONCE TEMPORARY BARRIER IS INSTALLED AT ANY LOCATION PROCEED IN A CONTINUOUS MANNER TO COMPLETE THE PROPOSED WORK IN THAT LOCATION UNLESS OTHERWISE STATED IN THE TRANSPORTATION MANAGEMENT PLANS OR AS DIRECTED BY THE ENGINEER.

 DO NOT PLACE BARRIER DIRECTLY ON ANY SURFACE OTHER THAN ASPHALT OR CONCRETE.

 ONCE TEMPORARY BARRIER IS INSTALLED AT ANY LOCATION AND NO WORK IS PERFORMED BEHIND THE TEMPORARY BARRIER FOR A PERIOD LONGER THAN TWO (2) MONTHS, REMOVE / RESET TEMPORARY BARRIER AT NO COST TO THE DEPARTMENT UNLESS OTHERWISE STATED IN THE TRANSPORTATION MANAGEMENT PLANS, TEMPORARY BARRIER IS PROTECTING A HAZARD, OR AS DIRECTED BY THE ENGINEER.

INSTALL TEMPORARY BARRIER WITH THE TRAFFIC FLOW BEGINNING WITH THE UPSTREAM SIDE OF TRAFFIC. REMOVE TEMPORARY BARRIER AGAINST THE TRAFFIC FLOW BEGINNING WITH THE DOWNSTREAM SIDE OF TRAFFIC.

INSTALL AND SPACE DRUMS NO GREATER THAN TWICE THE POSTED SPEED LIMIT (MPH) TO CLOSE OR KEEP THE SECTION OF THE ROADWAY CLOSED UNTIL THE TEMPORARY BARRIER CAN BE PLACED OR AFTER THE TEMPORARY BARRIER IS REMOVED.

- X) PROTECT THE APPROACH END OF MOVABLE/PORTABLE CONCRETE BARRIER AT ALL TIMES DURING THE INSTALLATION AND REMOVAL OF THE BARRIER BY EITHER A MOUNTED ATTENUATOR (MAXIMUM 72 HOURS) OR A TEMPORARY CRASH CUSHION.

PROTECT THE APPROACH END OF MOVABLE/PORTABLE CONCRETE BARRIER FROM ONCOMING TRAFFIC AT ALL TIMES BY A TEMPORARY CRASH CUSHION UNLESS THE APPROACH END OF MOVABLE/PORTABLE CONCRETE BARRIER IS OFFSET FROM ONCOMING TRAFFIC AS FOLLOWS OR AS SHOWN IN THE PLANS: (SEE ALSO 1101.05)

POSTED SPEED LIMIT	MINIMUM OFFSET
40 OR LESS	15 FT
45 - 50	20 FT
55	25 FT
60 MPH or HIGHER	30 FT

TRAFFIC CONTROL DEVICES

- Y) WHEN LANE CLOSURES ARE NOT IN EFFECT SPACE CHANNELIZING DEVICES IN WORK AREAS NO GREATER IN FEET THAN TWICE THE POSTED SPEED LIMIT (MPH) EXCEPT, 10 FT ON-CENTER IN RADII, AND 3 FT OFF THE EDGE OF AN OPEN TRAVELWAY. REFER TO STANDARD SPECIFICATIONS FOR ROADS AND STRUCTURES SECTIONS 1130 (DRUMS), 1135 (CONES) AND 1180 (SKINNY DRUMS) FOR ADDITIONAL REQUIREMENTS.
- Z) PLACE TYPE III BARRICADES, WITH "ROAD CLOSED" SIGN R11-2 ATTACHED, OF SUFFICIENT LENGTH TO CLOSE ENTIRE ROADWAY.
- AA) PLACE ADDITIONAL SETS OF THREE CHANNELIZING DEVICES (DRUMS) PERPENDICULAR TO THE EDGE OF TRAVELWAY ON 500 FT CENTERS WHEN UNOPENED LANES ARE CLOSED TO TRAFFIC.

PAVEMENT MARKINGS AND MARKERS

- BB) INSTALL TEMPORARY PAVEMENT MARKINGS AND TEMPORARY PAVEMENT MARKERS ON INTERIM LAYERS OF PAVEMENT AS FOLLOWS:

ROAD NAME	MARKING	MARKER
-Y2- (EX. I-74)	WZ PERF. MARKINGS	TEMPORARY RAISED
ALL OTHER ROADS	PAINT	TEMPORARY RAISED (IF EXIST. MARKERS ARE PRESENT)

- CC) PLACE ONE APPLICATION OF PAINT FOR TEMPORARY TRAFFIC PATTERNS. PLACE A SECOND APPLICATION OF PAINT SIX (6) MONTHS AFTER THE INITIAL APPLICATION AND EVERY SIX MONTHS AS DIRECTED BY THE ENGINEER.

- DD) TIE PROPOSED PAVEMENT MARKING LINES TO EXISTING PAVEMENT MARKING LINES.



- EE) REMOVE/REPLACE ANY CONFLICTING/DAMAGED PAVEMENT MARKINGS AND MARKERS BY THE END OF EACH DAY'S OPERATION.

- FF) TRACE THE EXISTING AND PROPOSED MONOLITHIC ISLAND LOCATIONS WITH PROPER COLOR PAVEMENT MARKINGS PRIOR TO REMOVAL AND INSTALLATION. PLACE CONES TO DELINEATE ANY EXISTING AND PROPOSED MONOLITHIC ISLANDS AFTER REMOVAL AND BEFORE INSTALLATION.


MISCELLANEOUS

- GG) LAW ENFORCEMENT MAY BE USED TO MAINTAIN TRAFFIC THROUGH THE WORK AREA AND/OR INTERSECTIONS AS DIRECTED BY THE ENGINEER.
- HH) PLACE DRUMS ALONG ALL DRIVEWAYS TO PREVENT TRAFFIC FROM ENTERING ACTIVE CONSTRUCTION AREAS.

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APPROVED: <i>Michelle Ward</i> DATE: 7/13/2022 SEAL 		TRANSPORTATION OPERATIONS PLAN (MANAGEMENT STRATEGIES AND GENERAL NOTES)
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED		

TEMPORARY SHORING DATA

PROJ. REFERENCE NO.	SHEET NO.
U-2579AA	TMP-2A
 HDR Engineering, Inc. of the Carolinas 555 Fayetteville St, Suite 900 Raleigh, N.C. 27601 N.C.B.E.L.S. License Number: F-0116	

SHORING LOCATION NO. 1

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STATION 19+06± -Y2NBL-, 36.7' LT, TO STATION 19+44± -Y2NBL-, 36.6' LT.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STATION 19+06± -Y2NBL-, 36.7' LT, TO STATION 19+44± -Y2NBL-, 36.6' LT, FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF
 GROUNDWATER ELEVATION = 790 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STATION 19+06± -Y2NBL-, 36.7' LT, TO STATION 19+44± -Y2NBL-, 36.6' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STATION 19+06± -Y2NBL-, 36.7' LT, TO STATION 19+44± -Y2NBL-, 36.6' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STATION 19+06± -Y2NBL-, 36.7' LT, TO STATION 19+44± -Y2NBL-, 36.6' LT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

SHORING LOCATION NO. 2

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STATION 21+30± -Y2NBL-, 38.7' LT, TO STATION 21+62± -Y2NBL-, 38.7' LT.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STATION 21+30± -Y2NBL-, 38.7' LT, TO STATION 21+62± -Y2NBL-, 38.7' LT, FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF
 GROUNDWATER ELEVATION = 790 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STATION 21+30± -Y2NBL-, 38.7' LT, TO STATION 21+62± -Y2NBL-, 38.7' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STATION 21+30± -Y2NBL-, 38.7' LT, TO STATION 21+62± -Y2NBL-, 38.7' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STATION 21+30± -Y2NBL-, 38.7' LT, TO STATION 21+62± -Y2NBL-, 38.7' LT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

SHORING LOCATION NO. 9

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STATION 29+00± -Y2SBL-, 34.3' RT, TO STATION 29+29± -Y2SBL-, 34.4' RT.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STATION 29+00± -Y2SBL-, 34.3' RT, TO STATION 29+29± -Y2SBL-, 34.4' RT, FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF
 GROUNDWATER ELEVATION = 790 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STATION 29+00± -Y2SBL-, 34.3' RT, TO STATION 29+29± -Y2SBL-, 34.4' RT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STATION 29+00± -Y2SBL-, 34.3' RT, TO STATION 29+29± -Y2SBL-, 34.4' RT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STATION 29+00± -Y2SBL-, 34.3' RT, TO STATION 29+29± -Y2SBL-, 34.4' RT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

SHORING LOCATION NO. 10

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STATION 31+04± -Y2SBL-, 34.8' RT, TO STATION 31+41± -Y2SBL-, 34.9' RT.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STATION 31+04± -Y2SBL-, 34.8' RT, TO STATION 31+41± -Y2SBL-, 34.9' RT, FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF
 GROUNDWATER ELEVATION = 795 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STATION 31+04± -Y2SBL-, 34.8' RT, TO STATION 31+41± -Y2SBL-, 34.9' RT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STATION 31+04± -Y2SBL-, 34.8' RT, TO STATION 31+41± -Y2SBL-, 34.9' RT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STATION 31+04± -Y2SBL-, 34.8' RT, TO STATION 31+41± -Y2SBL-, 34.9' RT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

SHORING LOCATION NO. 17

FOR TEMPORARY SHORING AND POSITIVE PROTECTION FOR TEMPORARY SHORING, SEE PLANS AND TEMPORARY SHORING PROVISION.

TEMPORARY SHORING IS REQUIRED FOR THE BRIDGE END BENT CONSTRUCTION FROM STATION 36+20± -Y2FLYAB-, 12.7' LT, TO STATION 36+74± -Y2FLYAB-, 11.7' LT.

BEFORE BEGINNING TEMPORARY SHORING DESIGN OR CONSTRUCTION, SURVEY EXISTING GROUND ELEVATIONS IN THE VICINITY OF SHORING LOCATIONS TO DETERMINE ACTUAL SHORING HEIGHTS.

DESIGN TEMPORARY SHORING FROM STATION 36+20± -Y2FLYAB-, 12.7' LT, TO STATION 36+74± -Y2FLYAB-, 11.7' LT, FOR THE FOLLOWING ASSUMED SOIL PARAMETERS AND GROUNDWATER ELEVATION:

UNIT WEIGHT (γ) = 120 LB/CF
 FRICTION ANGLE (ϕ) = 30 DEGREES
 COHESION (c) = 0 LB/SF
 GROUNDWATER ELEVATION = 845 FT

DO NOT USE A TEMPORARY WALL FOR TEMPORARY SHORING FROM STATION 36+20± -Y2FLYAB-, 12.7' LT, TO STATION 36+74± -Y2FLYAB-, 11.7' LT.

AT THE CONTRACTOR'S OPTION, USE STANDARD TEMPORARY SHORING FOR TEMPORARY SHORING FROM STATION 36+20± -Y2FLYAB-, 12.7' LT, TO STATION 36+74± -Y2FLYAB-, 11.7' LT. SEE STANDARD DETAIL NO. 1801.01 FOR STANDARD TEMPORARY SHORING.

IT MAY BE PREFERRED TO USE A TEMPORARY SOIL NAIL WALL FOR TEMPORARY SHORING FROM STATION 36+20± -Y2FLYAB-, 12.7' LT, TO STATION 36+74± -Y2FLYAB-, 11.7' LT. FOR TEMPORARY SOIL NAIL WALLS, SEE TEMPORARY SOIL NAIL WALLS PROVISION.

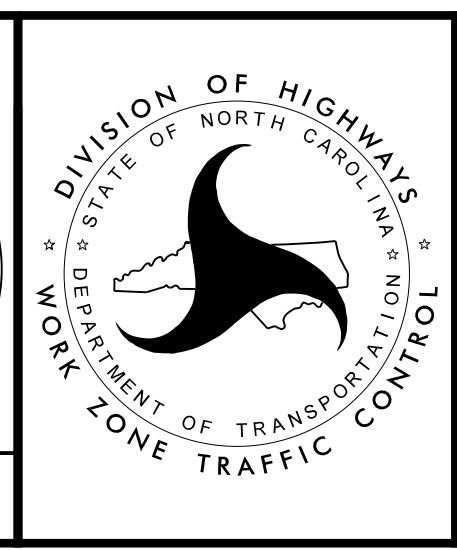
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THE TEMPORARY SHORING NOTES SHOWN ON THIS SHEET WERE PROVIDED THROUGH SEALED DOCUMENTS FROM THE GEOTECHNICAL ENGINEERING UNIT. THE DOCUMENT WAS SUBMITTED TO THE WZTC SECTION ON 03/30/2022 AND SEALED BY A PROFESSIONAL ENGINEER, SHIPING YANG, LICENSE # 031361.

APPROVED: _____
 DATE: _____


SEAL

**DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED**



TEMPORARY SHORING DATA

PHASING

PROJ. REFERENCE NO.	SHEET NO.
U-2579AA	TMP-3
 HDR Engineering, Inc. of the Carolinas 555 Fayetteville St, Suite 900 Raleigh, N.C. 27601 N.C.B.E.L.S. License Number: F-0116	

NOTES:
 BEFORE BEGINNING ANY CONSTRUCTION ACTIVITIES, THE CONTRACTOR SHALL INSTALL ALL ADVANCE WARNING SIGNS AND TRAFFIC CONTROL DEVICES. FIELD VERIFY LOCATIONS WITH THE RESIDENT ENGINEER PRIOR TO INSTALLATION.

MAINTAIN VEHICULAR ACCESS TO ALL RESIDENCES AND BUSINESSES DURING THE LIFE OF THE CONTRACT, UNLESS OTHERWISE NOTED IN THE PHASING PLANS OR DIRECTED BY THE RESIDENT ENGINEER.

THIS PROJECT HAS BEEN PHASED SUCH THAT WORK IN AREAS 1 THROUGH 3 MAY BE PERFORMED SIMULTANEOUSLY AND/OR INDEPENDENTLY, UNLESS OTHERWISE STATED IN THE PHASING PLANS.

COMPLETE ANY PROPOSED OR TEMPORARY WIDENING IN SUCH A MANNER THAT NO PONDING OF WATER WILL OCCUR WITHIN THE TRAVEL LANE.

WHEN USING LANE CLOSURES (RSD 1101.02), RETURN TRAFFIC TO EXISTING AND/OR TEMPORARY TRAFFIC PATTERN UPON ACTIVITIES COMPLETION, UNLESS OTHERWISE NOTED IN THE PHASING PLANS.

WHEN PHASING STATES TO USE LANE CLOSURES, REFER TO THE FOLLOWING FOR ALL EXISTING AND PROPOSED ROADS:

- ALL TWO-LANE/TWO-WAY FACILITIES SEE RSD 1101.02 SHEET 1 OF 14
- ALL 3-LANE OR 5-LANE ROADWAYS SEE RSD 1101.02 SHEET 2 OF 14
- ALL MULTI-LANE FACILITIES POSTED < 60 MPH SEE RSD 1101.02 SHEET 3 OF 14
- ALL MULTI-LANE FACILITIES POSTED ≥ 60 MPH SEE RSD 1101.02 SHEET 4 OF 14
- ALL ENTRANCE AND EXIT RAMPS SEE RSD 1101.02 SHEETS 9 AND 10 OF 14

COMPLETE PAVING UP TO, BUT NOT INCLUDING, THE FINAL LAYER OF SURFACE COURSE UNTIL STATED TO PLACE FINAL LAYER IN THE PHASING PLANS.

WHEN WEDGING OVER EXISTING PAVEMENT, WEDGE TO PROPOSED ELEVATION (LESS THE FINAL LAYER OF SURFACE COURSE), OR WEDGE AS NEEDED TO MAINTAIN TRAFFIC. MAINTAIN POSITIVE DRAINAGE AND MAINTAIN A MAXIMUM 0.04 ROLLOVER IN BOTH EXISTING AND/OR TEMPORARY TRAVEL LANES.

REPLACE MARKINGS AND RETURN TRAFFIC TO THE CURRENT TRAFFIC PATTERN AT THE END OF EACH WORK PERIOD UNLESS OTHERWISE NOTED IN THE PHASING OR DIRECTED BY THE ENGINEER.

FOR ALL SHOULDER CLOSURES, SEE RSD 1101.04. WHEN PORTABLE CONCRETE BARRIER (PCB) IS PRESENT ON SHOULDERS, PLACE SHOULDER CLOSURE SIGNS & DEVICES IN ADVANCE OF PCB.

AREA 1 MAINLINE -L- FROM STA. 10+00 TO STA. 38+00, RAMP -Y2RPB-, RAMP -Y2FLYCA- (SEE TMP-4)

PHASE 1

AWAY FROM TRAFFIC, BEGIN CONSTRUCTION OF -L- FROM STA. 10+00 +/- TO STA. 38+00 +/-, INCLUDING RAMPS -Y2RPB- AND -Y2FLYCA-.

NOTES:

1. OMIT AREAS OF -L-, INCLUDING RAMPS AND LOOPS, WHERE CONSTRUCTION CONFLICTS WITH PROPERTY ACCESS, TEMPORARY ALIGNMENTS AND TRAFFIC PATTERNS IN AREAS 2 AND 3.
2. SEE PHASING AND DETAILS FOR AREAS 2 AND 3 FOR WORK THAT MUST BE CONSTRUCTED PRIOR TO BEGINNING -L- AND RAMPS IN THESE AREAS.
3. SEE AREA 3 (ALL PHASES) FOR COORDINATING CONSTRUCTION OF -Y2FLYCA- BRIDGE WITH AREA 3 CONSTRUCTION.

PHASE 2

AWAY FROM TRAFFIC AND USING LANE CLOSURES AS NEEDED, COMPLETE ALL WORK ON -L- AND RAMPS -Y2RPB- AND -Y2FLYCA-, (INCLUDING FINAL LAYER OF SURFACE COURSE), PLACE FINAL MARKINGS AND MARKERS ON ALL ROADS AND OPEN TO THE FINAL TRAFFIC PATTERN.

NOTE:

THIS STEP WILL COINCIDE WITH PLACEMENT OF FINAL LAYER AND FINAL MARKINGS ON THE ENTIRE PROJECT AND OPENING ALL ROADS TO THE FINAL TRAFFIC PATTERN.

AREA 2

-Y1- SR 1003 (HIGH POINT ROAD/OLD US 311) & -Y1DRV- (SEE TMP-5.01 THRU TMP-5.06)

PHASE 1

STEP 1:

AWAY FROM TRAFFIC AND USING LANE CLOSURES WHEN NECESSARY, CONSTRUCT -Y1DRV- FROM STA. 10+47 +/- TO STA. 13+50 +/- AND TEMPORARY TIE FROM EXISTING HIGH POINT RD TO -Y1DRV- (USING INCIDENTAL STONE) AND OPEN TO TRAFFIC.

STEP 2:

USING RSD 1101.03, SHEET 1 OF 9, CLOSE -Y1- (HIGH POINT ROAD/OLD US 311) AND SHIFT TRAFFIC TO THE OFF-SITE DETOUR. MAINTAIN ACCESS TO DRIVEWAY AT EAST END OF BRIDGE USING INCIDENTAL STONE AND EXISTING HIGH POINT RD. (SEE TMP-5.06 FOR OFF-SITE DETOUR ROUTE).

STEP 3:

AWAY FROM TRAFFIC, CONSTRUCT THE FOLLOWING:

- Y1- STA. 18+00 +/- TO STA. 41+25 +/-
- REMAINING PORTION OF -Y1DRV-

USING LANE CLOSURES AS NEEDED, CONSTRUCT -Y1-, INCLUDING WEDGING OVER EXISTING, FROM STA. 41+25 +/- TO STA. 46+00 +/-, INCLUDING TRENCHLESS PIPE INSTALLATION.

PHASE 2

STEP 1:

AWAY FROM TRAFFIC AND USING FLAGGERS FOR DRIVEWAYS, WHEN NECESSARY, PLACE TEMPORARY MARKINGS ON -Y1-, RESET BARRICADES FOR -Y1- CLOSURE AS SHOWN ON SHEET TMP-5.03, USING INCIDENTAL STONE TO MAINTAIN DRIVEWAY ACCESS AT WEST END OF -Y1-, AND PLACE TRAFFIC IN THE PHASE 2 PATTERN.

STEP 2:

AWAY FROM TRAFFIC AND USING FLAGGERS FOR DRIVEWAYS, WHEN NECESSARY, CONSTRUCT -Y1- FROM STA. 13+00 +/- TO STA. 18+00 +/-.

USING LANE CLOSURES, COMPLETE REMAINING SHOULDER WORK, EXISTING PAVEMENT REMOVAL AND DRIVEWAYS ON EAST END OF -Y1-.

PHASE 3

STEP 1:

USING LANE CLOSURES, PLACE TEMPORARY MARKINGS ALONG -Y1- IN THE FINAL PATTERN AND SHIFT TRAFFIC TO THE FINAL PATTERN.

STEP 2:

USING LANE CLOSURES, REMOVE INCIDENTAL STONE FOR DRIVEWAY ACCESS AND COMPLETE REMAINING SHOULDER WORK ON WEST END OF -Y1-.

STEP 3:

USING LANE CLOSURES, CONSTRUCT THE FINAL LAYER OF SURFACE COURSE ON ALL ROADS, THEN PLACE FINAL MARKINGS AND MARKERS IN AREA 2 AND OPEN TO THE FINAL TRAFFIC PATTERN. (SEE FINAL MARKING PLAN)

AREA 3

-Y2NBL- (I-74), -Y2SBL- (I-74), -Y2RPC- (I-74), -Y2FLYAB- (I-74), MAINLINE -L- FROM STA. 38+00 TO END (EX. I-74 TIE-IN), -Y2- (UTILITY ACCESS ROAD, -Y3- (SR 2698/RIDGEWOOD ROAD) AND RAMPS, TURN-AROUND ON THAMER LANE, -Y4- (RIDGEWOOD COURT) AND -Y5- (COLE ROAD) (SEE TMP-6.01 THRU 6.46)

PHASE 1

STEP 1: (SEE TMP-6.01 THRU 6.06)

USING LANE CLOSURES, PLACE TEMPORARY MARKINGS AND MARKERS AND SHIFT TRAFFIC TO THE PHASE 1 STEP 1 TRAFFIC PATTERN, THEN CONDUCT THE FOLLOWING.

USING LANE CLOSURES, CONSTRUCT THE FOLLOWING PERMANENT PAVEMENT:

- Y2SBL- STA. 10+00 +/- TO STA. 28+93 +/- (BEGIN APPR. SLAB)
- Y2SBL- STA. 31+13 +/- (END APPR. SLAB) TO STA. 32+67 +/-
- Y2SBL- STA. 34+18 +/- TO STA. 47+24 +/-
- Y2SBL- STA. 54+27 +/- TO STA. 98+98.56 +/-
- Y2RPC- STA. 10+00.00 TO STA. 16+89 +/-
- L- STA. 59+34 +/- TO STA. 87+25 +/-
- Y2NBL- STA. 10+00 +/- TO STA. 16+51 +/-
- Y2NBL- STA. 21+67 +/- (END APPR. SLAB) TO STA. 90+99.12
- L- STA. 52+89 +/- LT TO STA. 91+10 +/- LT
- TURN-AROUND ON THAMER LANE

AWAY FROM TRAFFIC, BEGIN CONSTRUCTION OF THE FOLLOWING:

- L- STA. 38+00 +/- TO STA. 42+00 +/- (RT) / 44+00 +/- (LT)
- Y2FLYAB- STA. 20+50 +/- TO STA. 32+00 +/-

USING LANE CLOSURES, CONSTRUCT THE FOLLOWING TEMPORARY PAVEMENT ALONG THE INSIDE SHOULDER OF -Y2- (I-74):

- Y2SBL-, 254' IN ADVANCE OF STA. 10+00 +/- TO STA. 26+47 +/-
- Y2SBL- STA. 30+95 +/- TO STA. 82+80 +/-
- SBL_DET1-
- Y2RPC- STA. 26+17 +/- TO STA. 31+02.54
- L- STA. 53+79.13 TO STA. 91+15 +/-
- ALONG -Y2NBL- FROM -Y2- STA. 7+82 +/- TO -Y2NBL- EXISTING BRIDGE APPROACH SLAB OVER -Y5- (COLE RD)
- Y2NBL- STA. 24+45 +/- TO STA. 90+99.12
- Y2FLYAB- STA. 34+69 +/- TO STA. 37+31.77
- NBL_DET1-
- L- STA. 67+50 +/- TO STA. 94+34 +/-

USING LANE CLOSURES, CONSTRUCT TEMPORARY PAVEMENT ALONG -Y5- (COLE RD). (SEE TMP-6.01)

USING LANE CLOSURE/NARROWING, CONSTRUCT TEMPORARY PAVEMENT ALONG INSIDE OF EXISTING EXIT RAMP FROM -Y2SBL- TO -Y3- (SR 2698/RIDGEWOOD RD). (SEE TMP-6.02)

AWAY FROM TRAFFIC AND USING LANE CLOSURES AS NECESSARY, BEGIN CONSTRUCTION OF THE FOLLOWING:

- Y3RPB- STA. 15+00 +/- TO STA. 31+67 +/-
- Y3LPB- STA. 16+00 +/- TO STA. 23+30 +/-
- Y3RPC- STA. 15+00 +/- TO STA. 25+92 +/-
- Y3LPC- STA. 15+00 +/- TO STA. 19+17 +/-
- Y4- STA. 10+12 +/- TO STA. 22+00 +/-

STEP 2:

USING LANE CLOSURES, PLACE TEMPORARY MARKINGS AND MARKERS ON INSIDE OF -Y2SBL-, -SBL_DET1-, -Y2RPC-, -Y2NBL-, -NBL_DET1-, AND -L- IN THE PHASE 2 TRAFFIC PATTERN AND SHIFT TRAFFIC, THEN INSTALL PCB AS SHOWN ON THE PHASE 2, STEP 1 DETAILS.

PHASE 2

STEP 1: (SEE TMP-6.07 THRU 6.12)

BEHIND BARRIER, BEGIN CONSTRUCTION ON THE OUTSIDE IN THE FOLLOWING LOCATIONS:

- Y2SBL- STA. 10+00 +/- TO STA. 35+93 +/-, INCLUDING WIDENING OF BRIDGE OVER -Y5- (COLE RD)
- Y3RPC- FROM -Y2SBL- TO STA. 15+00 +/-
- Y2SBL- STA. 40+00 +/- TO STA. 61+00 +/-
- Y3LPC- FROM STA. 12+44 +/- TO -Y2SBL-
- Y2SBL- STA. 80+00 +/- TO STA. 98+98.56, INCLUDING -Y2FLYCA- EB #1
- Y2RPC- STA. 10+00.00 TO STA. 31+02.54
- L- STA. 53+79.13 TO STA. 87+25 +/-, INCLUDING NW 7
- Y2NBL- STA. 10+00 +/- TO -Y3RPB- STA. 11+90 +/-, INCLUDING WIDENING OF BRIDGE OVER -Y5- (COLE RD)
- Y2NBL- STA. 32+50 +/- TO STA. 54+00 +/-
- Y3LPB- FROM -Y2NBL- TO STA. 14+00 +/-
- Y2NBL- STA. 63+50 +/- TO STA. 90+99.12
- Y2A- (UTILITY ACCESS ROAD)
- Y2FLYAB- FROM -L- TO STA. 20+50 +/-
- L- STA. 53+14 +/- TO STA. 91+10 +/-

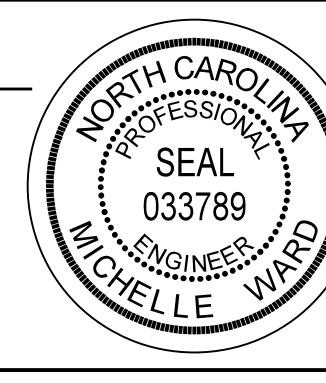

NOTE:

TEMPORARY SHORING WILL BE NEEDED FOR WIDENING OF BRIDGES OVER -Y5- (COLE RD). (SEE TMP-6.07)

USING LANE CLOSURES, CONSTRUCT TEMPORARY PAVEMENT ALONG THE OUTSIDE FROM -Y2NBL- STA. 90+99 +/- TO -Y2FLYAB- STA. 32+31 +/- (SEE TMP-6.10)

BEHIND BARRIER, CONSTRUCT LT SIDE ALONG -Y2RPC- FROM STA. 16+89 +/- TO STA. 34+36 +/- (SEE TMP-6.10 AND 6.11)

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APPROVED: <i>Michelle Ward</i> DATE: 7/13/2022 		TEMPORARY TRAFFIC CONTROL PHASING
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED		

SEE AREA 1 PHASING FOR
 MAINLINE, -Y2RPB- AND -Y2FLYCA-
 CONSTRUCTION

PLACE TEMPORARY MARKINGS IN THE
 FINAL PATTERN ON -Y1- FROM
 STA. 13+00 +/- TO STA. 19+50 +/-
 (SEE FINAL PAVEMENT MARKING PLAN)

REMOVE TEMPORARY DRIVEWAY
 AND COMPLETE REMAINING
 SHOULDER WORK ALONG -Y1-

TRAFFIC DRUMS
 @ 10' SPACING

-Y1-
 SR 1003
 (HIGH POINT ROAD/OLD US 311)

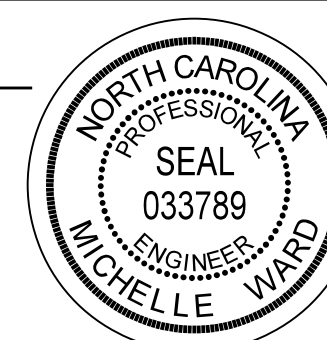
-Y2FLYCA- STA. 37+00
 SEE AREA 3

-L- STA. 38+00
 SEE AREA 3

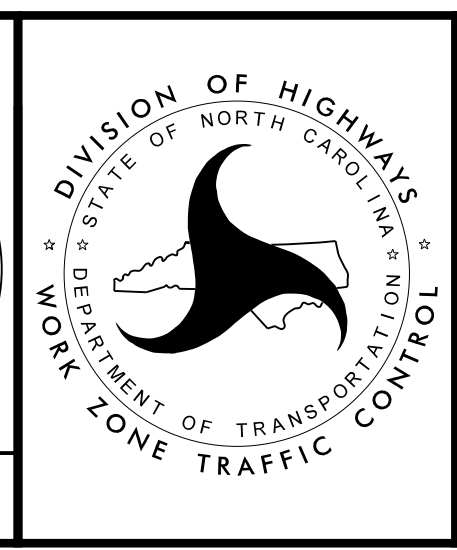
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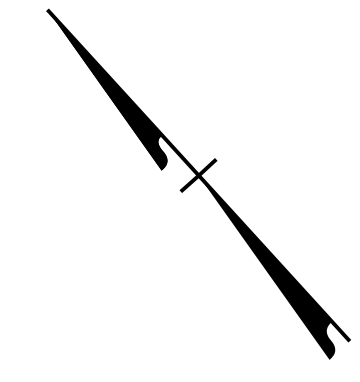
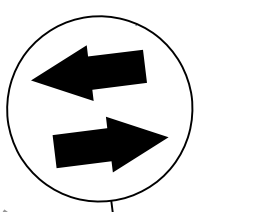
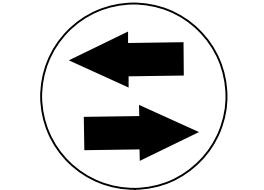
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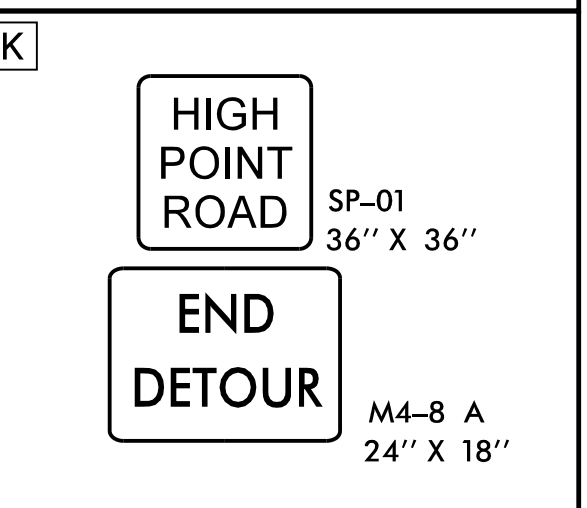
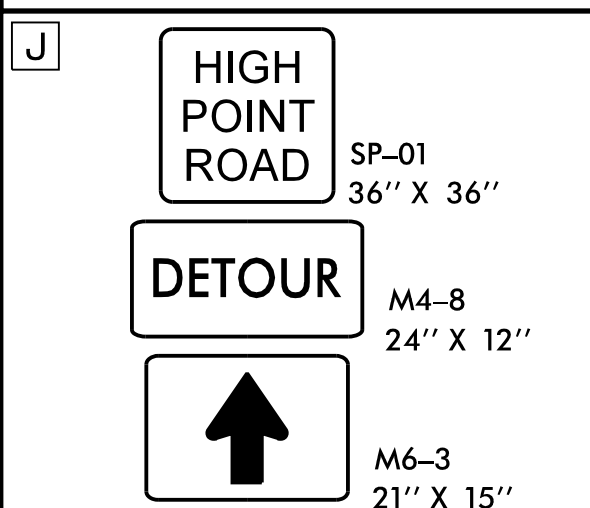
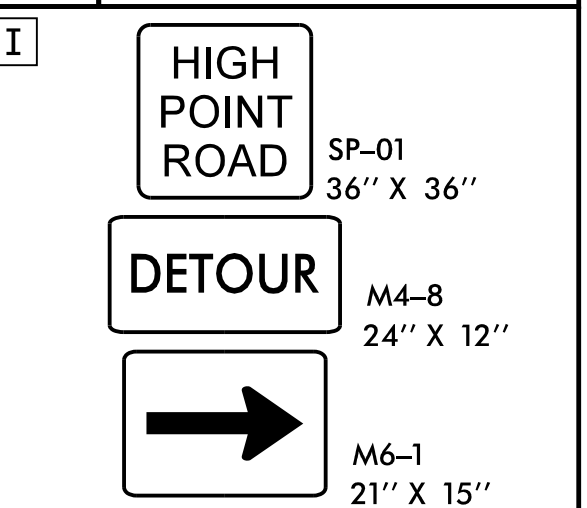
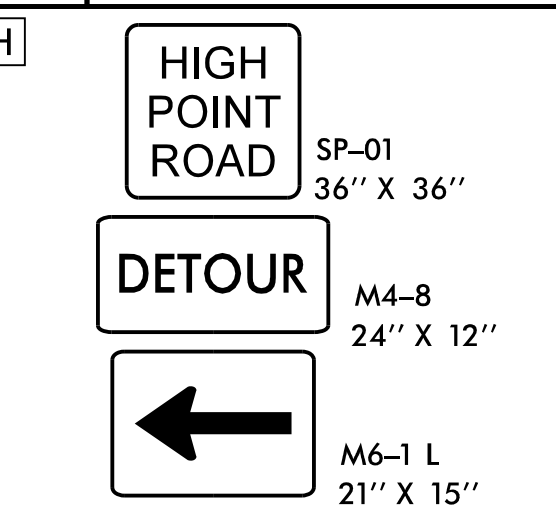
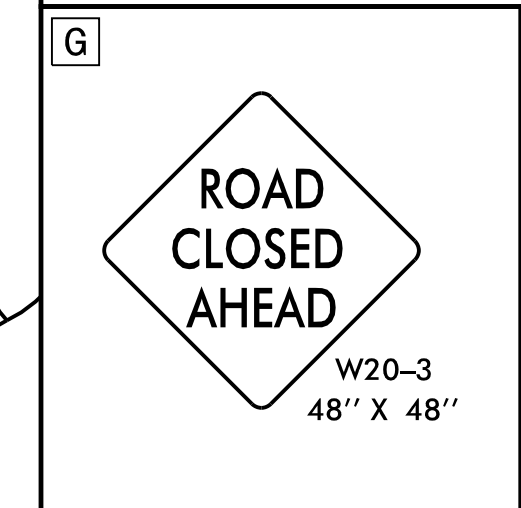
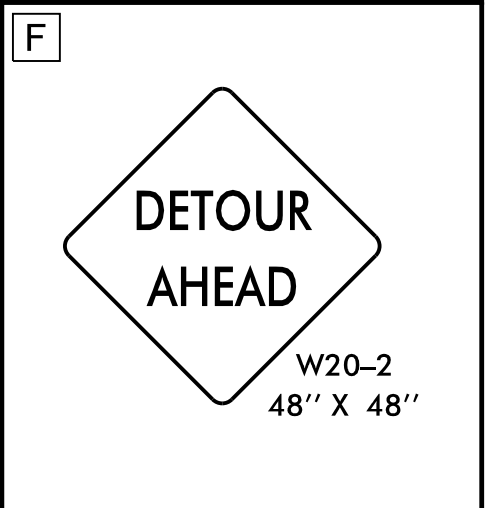
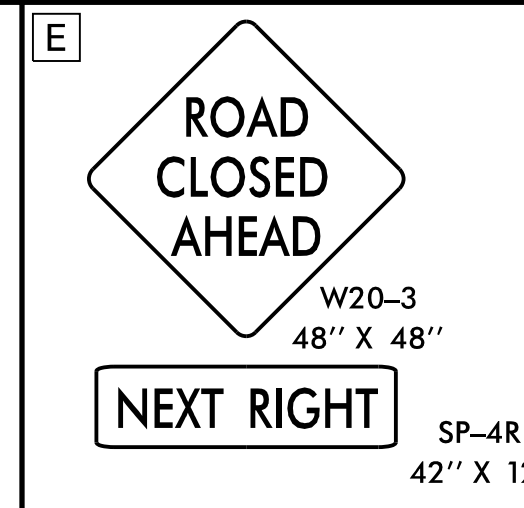
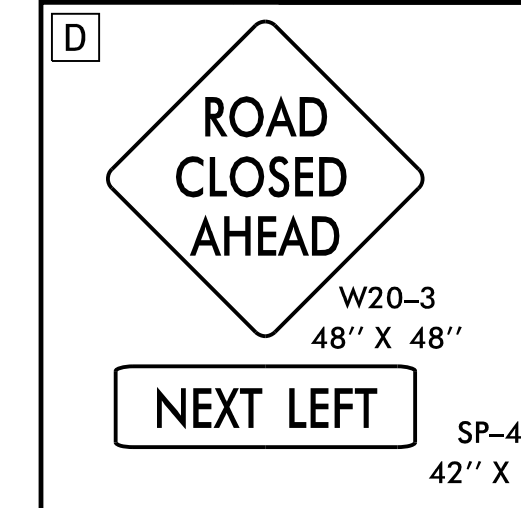
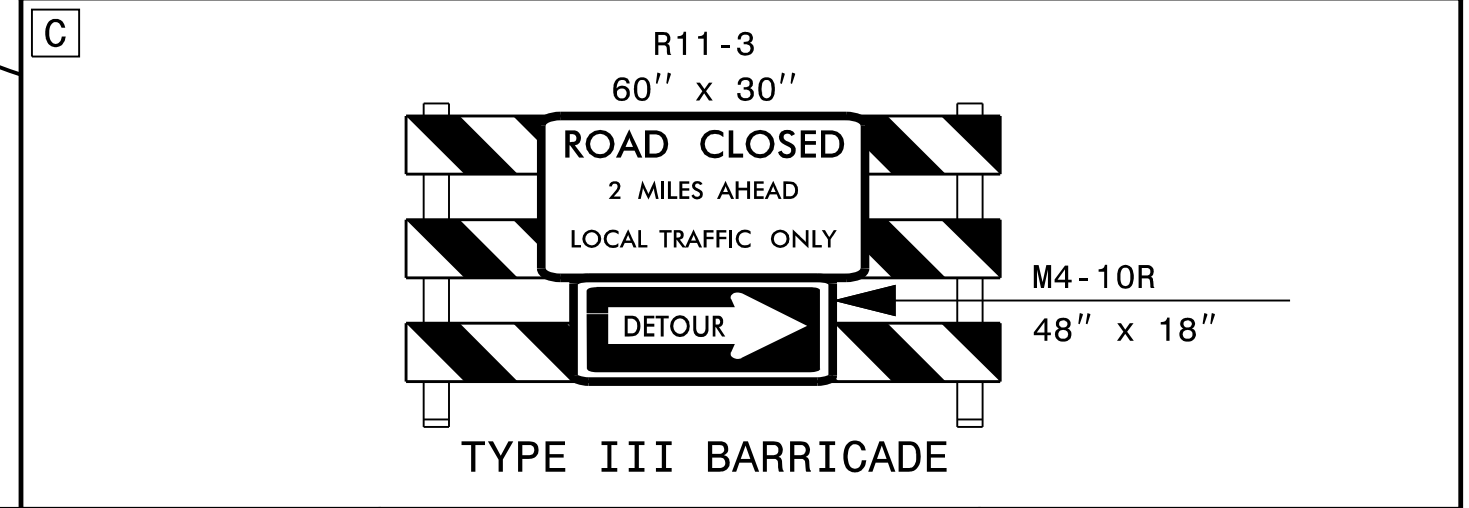
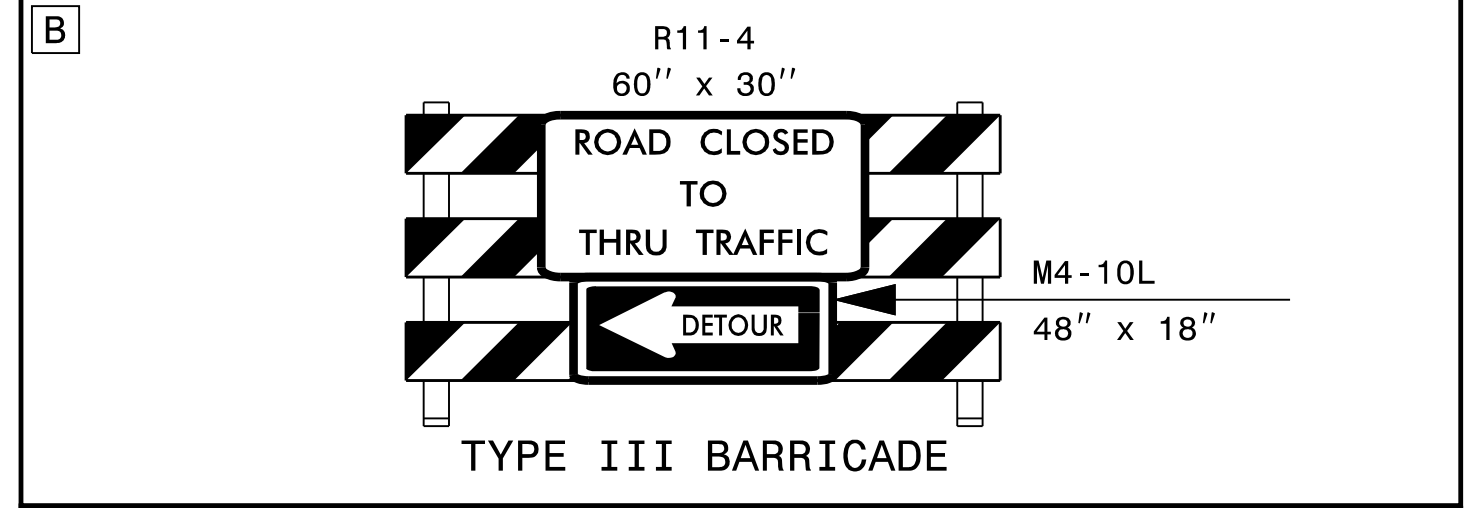
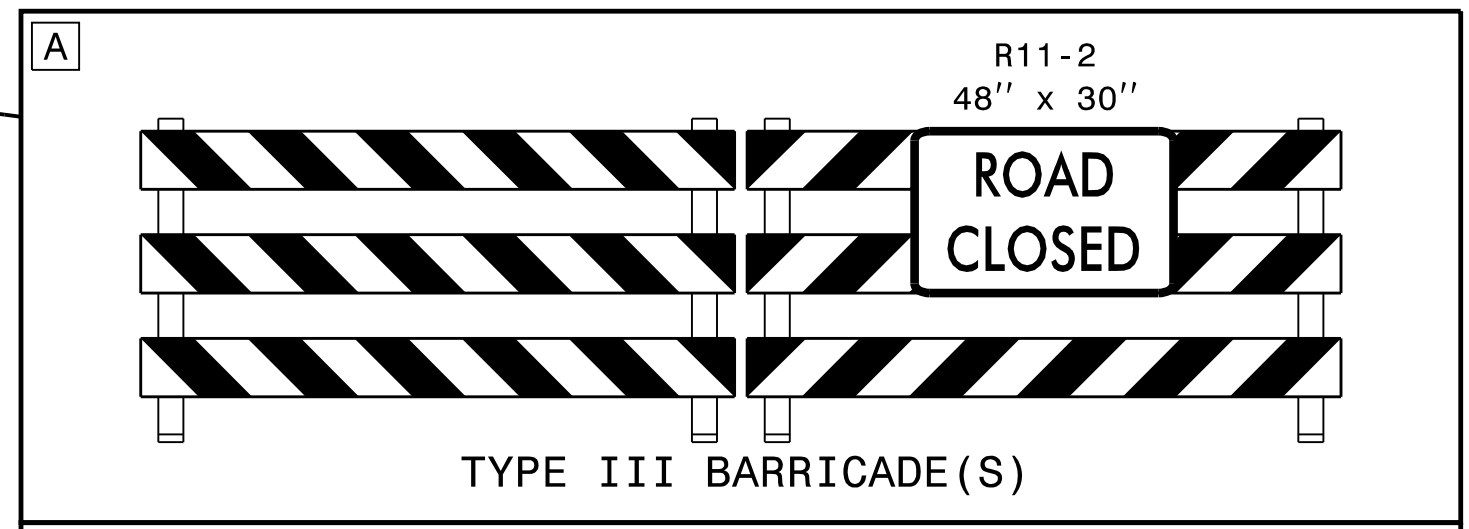
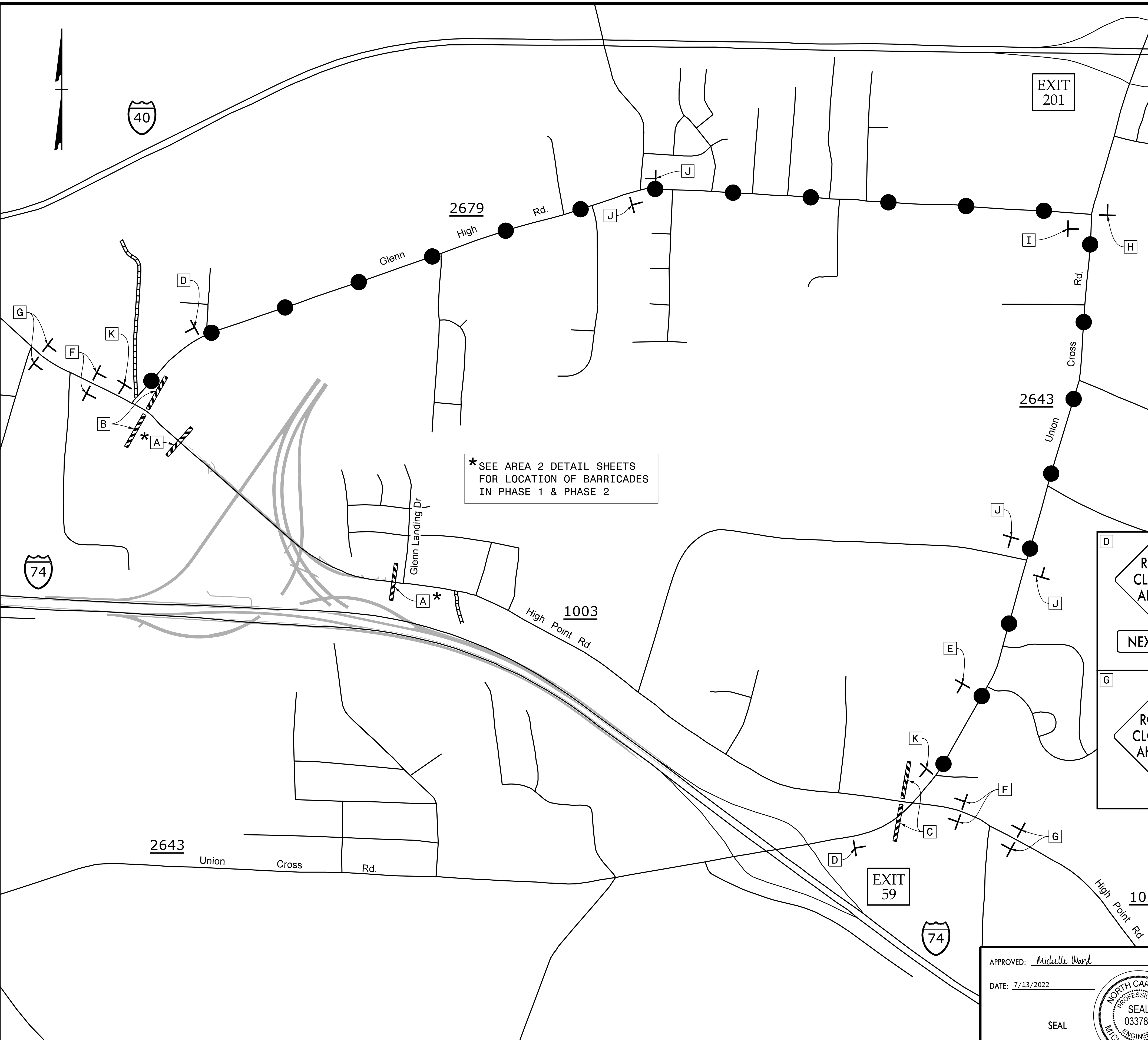


AREA 2
 PHASE 3

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REVISIONS

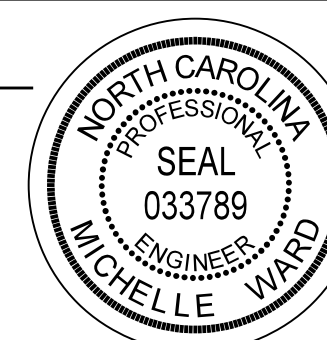




*SEE AREA 2 DETAIL SHEETS FOR LOCATION OF BARRICADES IN PHASE 1 & PHASE 2

NOTE:
 1. SEE RSD 1101.03, SHEET 1 OF 9, FOR ADDITIONAL SIGN AND BARRICADE PLACEMENT.
 2. SEE TMP-2B FOR SPECIAL SIGN DESIGN

● ● ● = DETOUR ROUTE

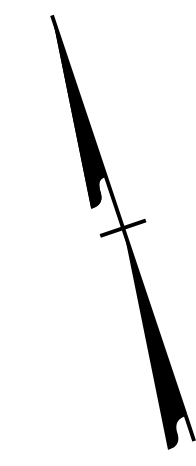
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 DATE: 7/13/2022
 SEAL

 DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED



AREA 2
 DETOUR ROUTE FOR
 -Y1- HIGH POINT RD

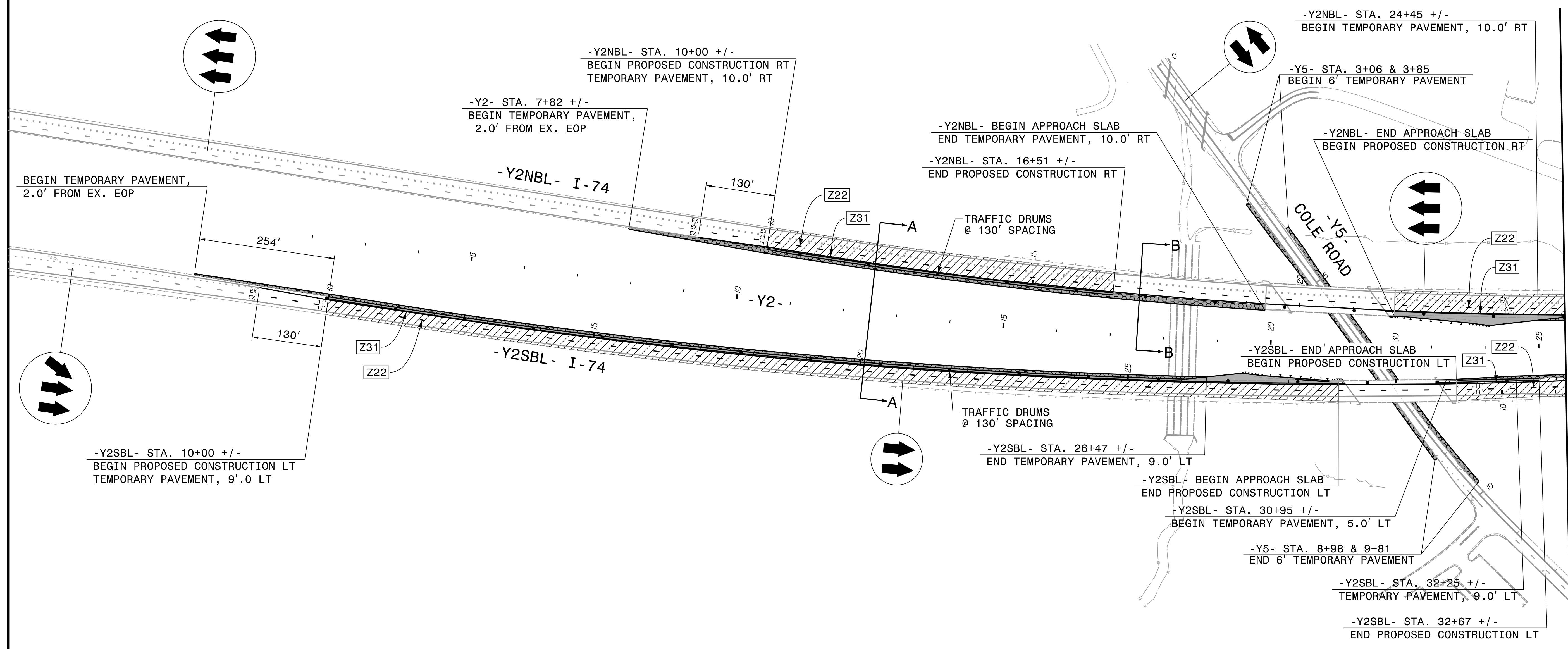
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REVISIONS



REVISIONS

MATCHLINE -Y2- STA. 25 + 50, SEE TMP-6.02



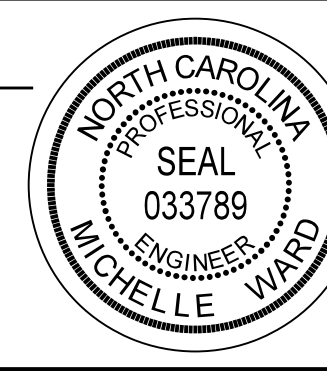

CONSTRUCT 6' OF TEMPORARY PAVEMENT ALONG BOTH SIDES OF -Y5- (COLE RD). FOR PLACEMENT OF PCB IN PHASE 2, STEP 1.

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APPROVED: *Michelle Ward*

DATE: 7/13/2022

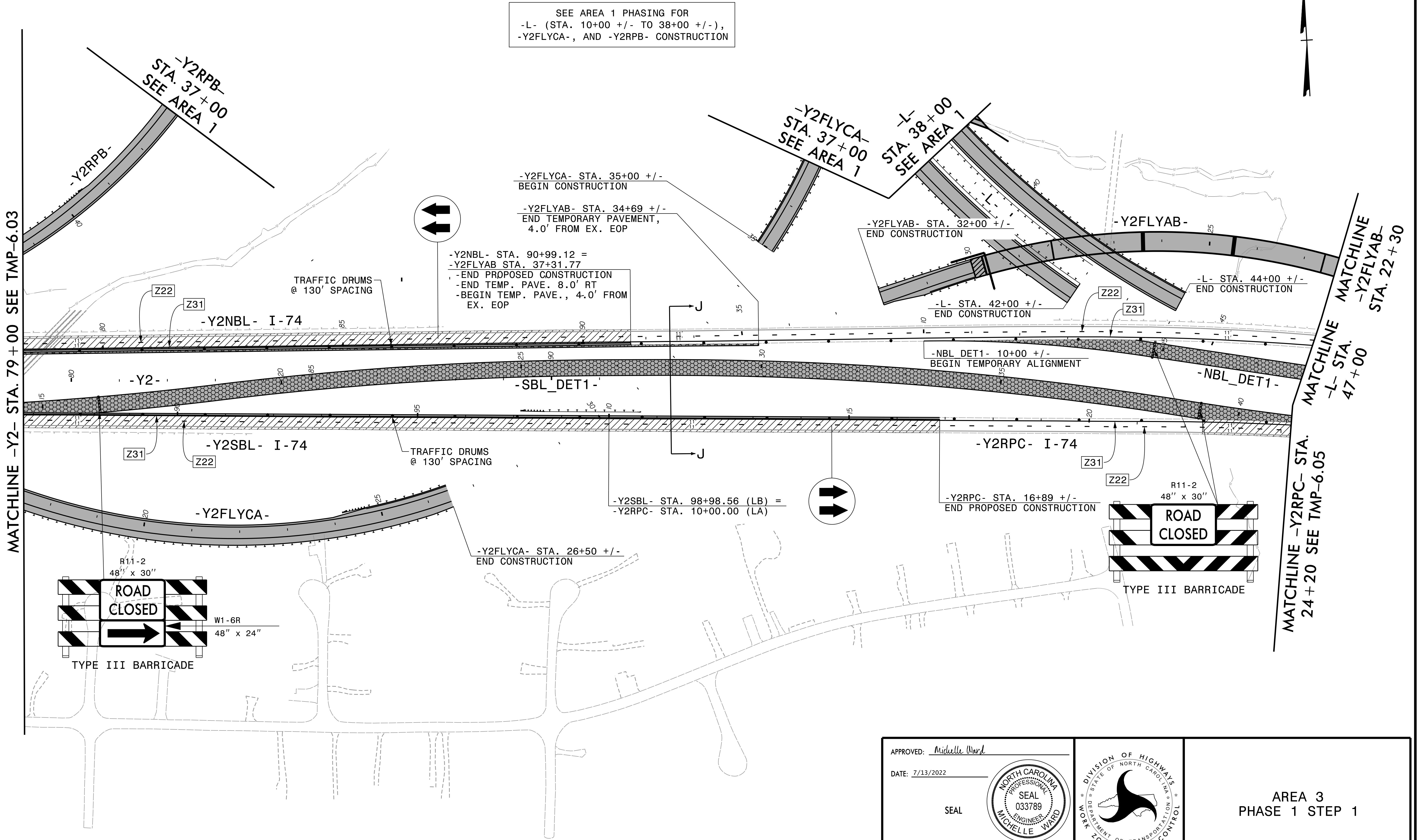
SEAL

DIVISION OF HIGHWAYS
STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
WORK ZONE TRAFFIC CONTROL

AREA 3
PHASE 1 STEP 1

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED



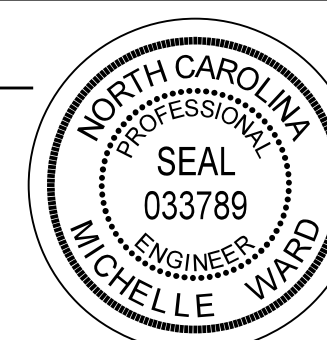
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REVISIONS

APPROVED: *Michelle Ward*

DATE: 7/13/2022

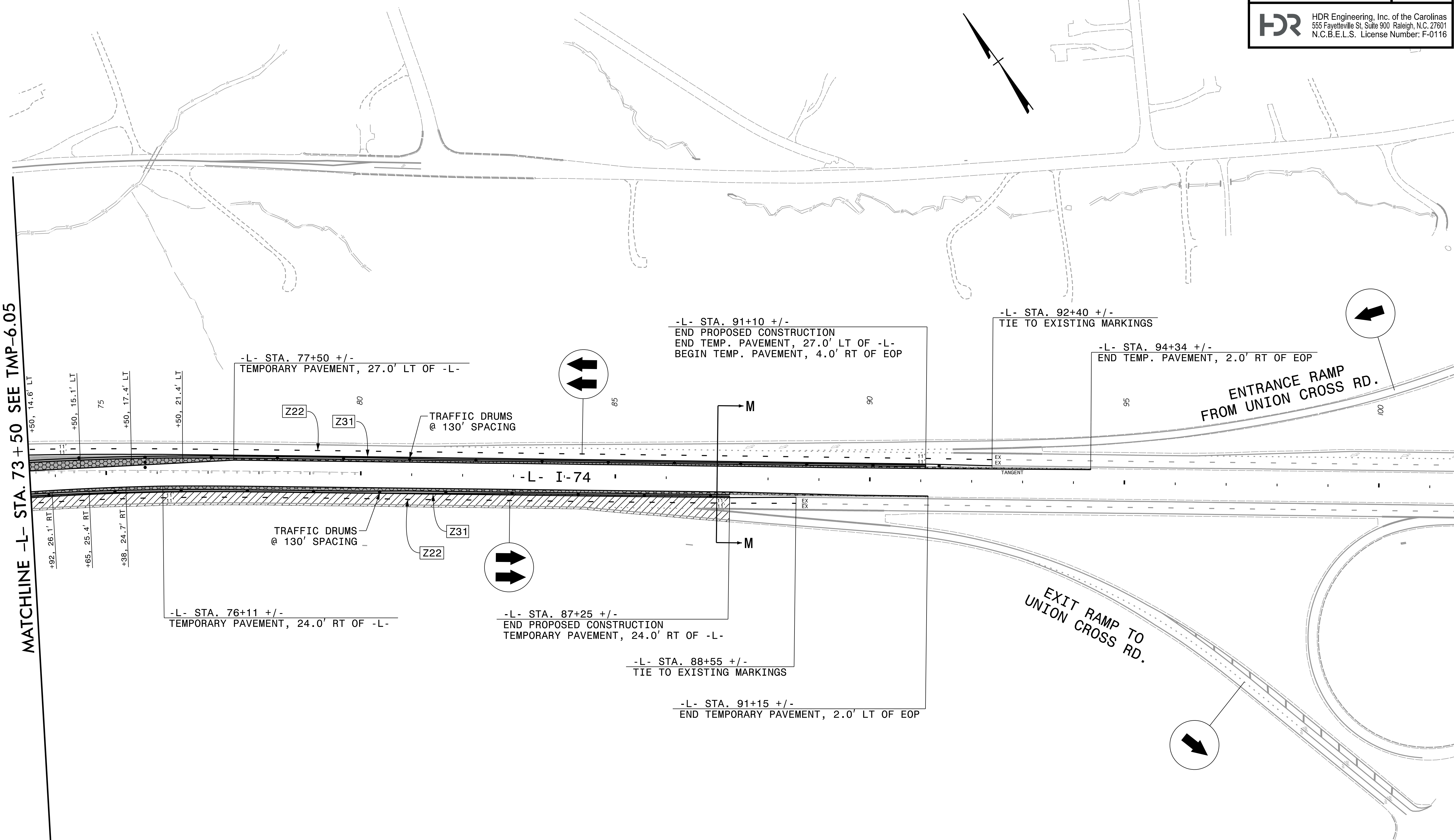
SEAL




AREA 3
 PHASE 1 STEP 1

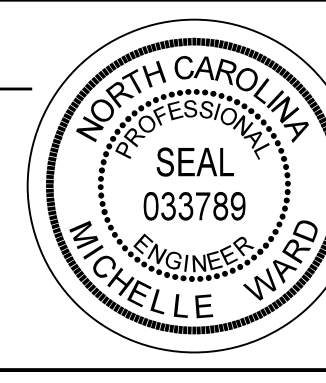
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

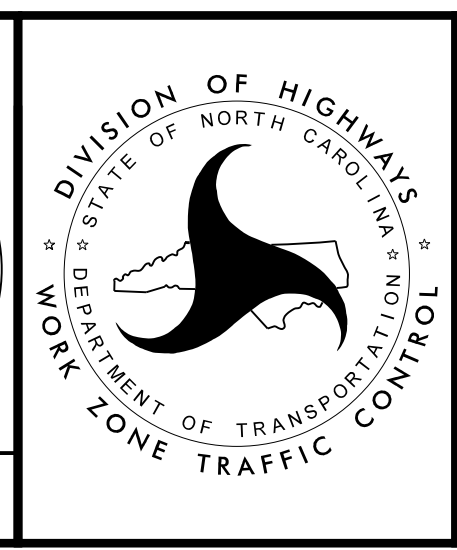
MATCHLINE -L- STA. 73 + 50 SEE TMP-6.05



REVISIONS

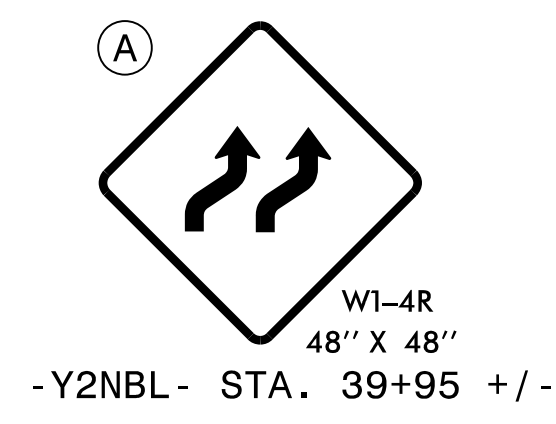
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APPROVED: *Michelle Ward*
 DATE: 7/13/2022
 SEAL




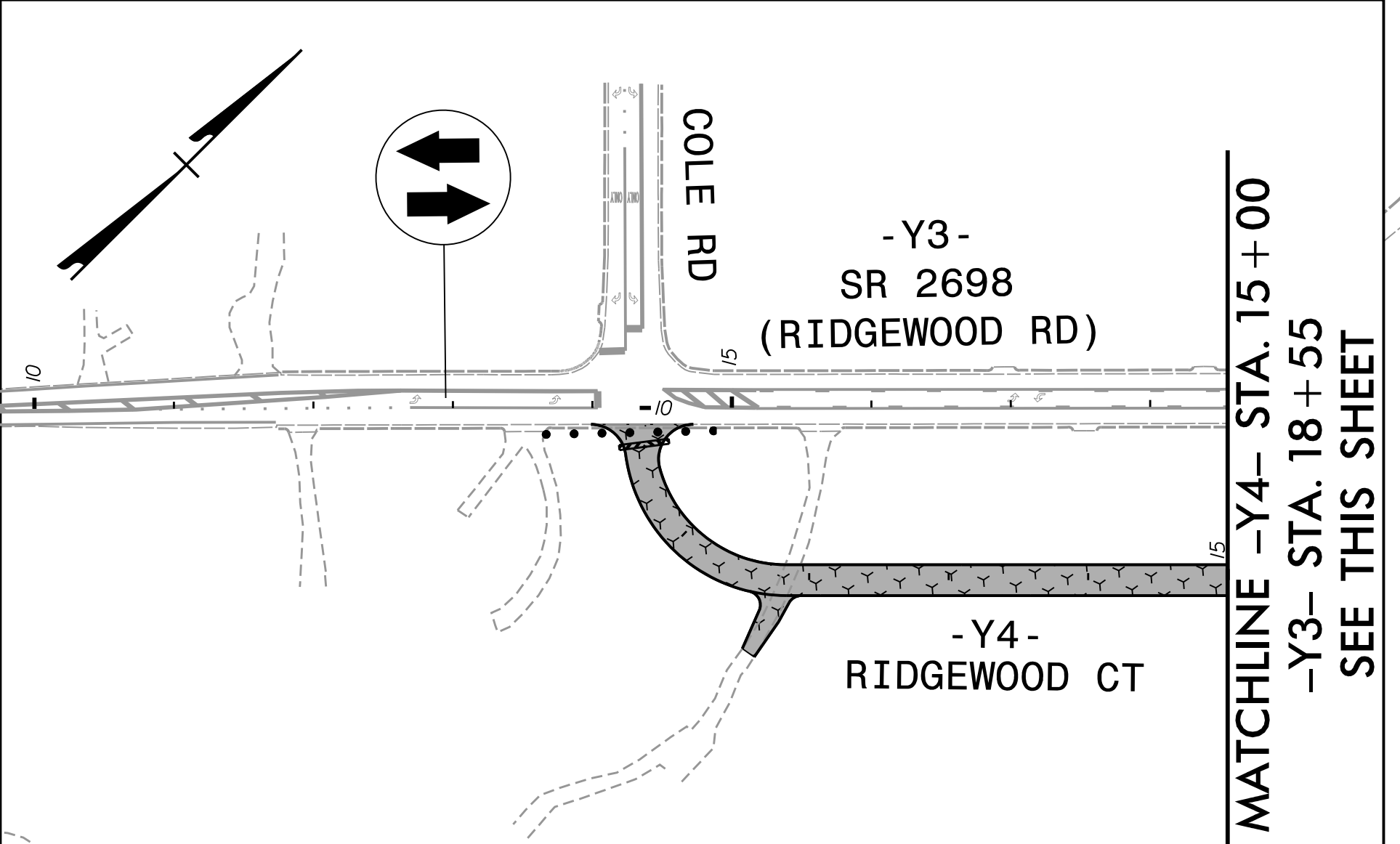
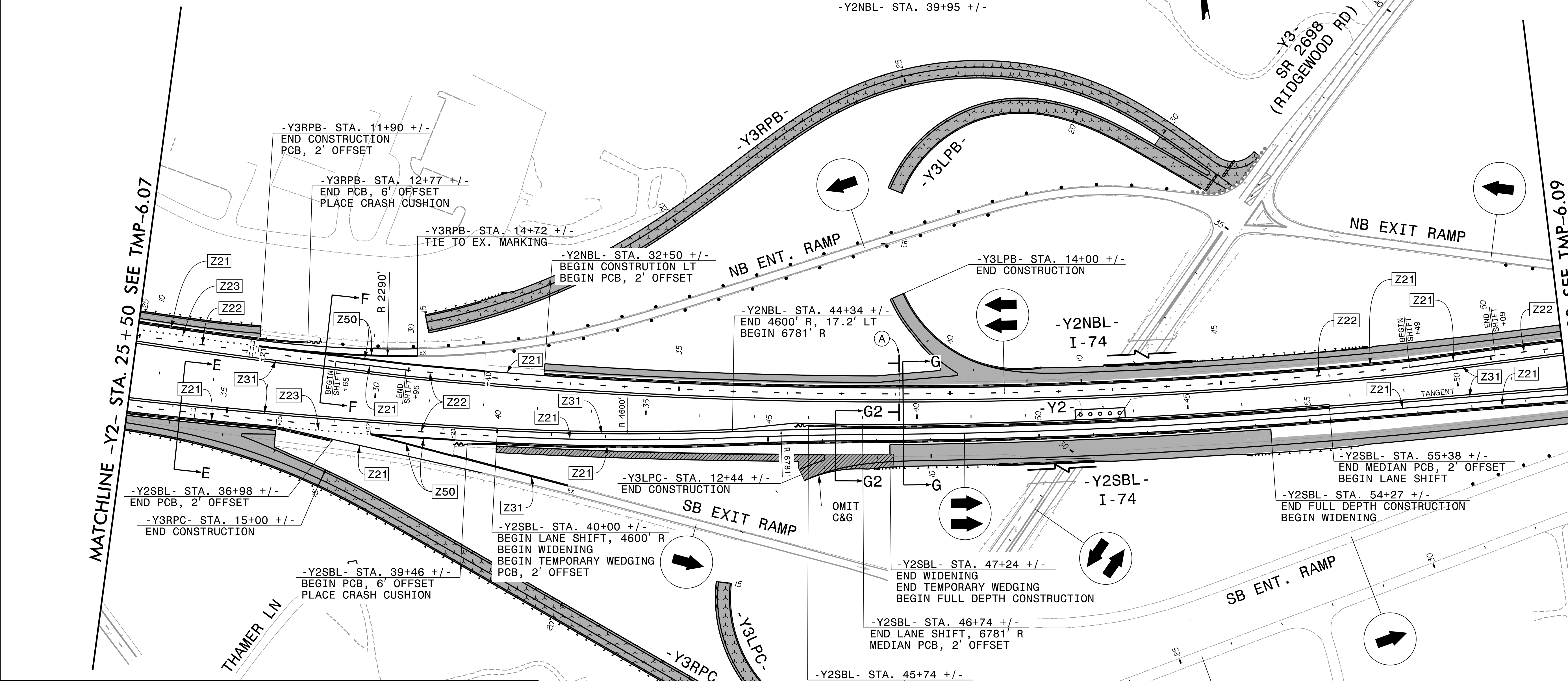
AREA 3
 PHASE 1 STEP 1

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MATCHLINE -Y2- STA. 25+50 SEE TMP-6.07

MATCHLINE -Y2- STA. 52+00 SEE TMP-6.09

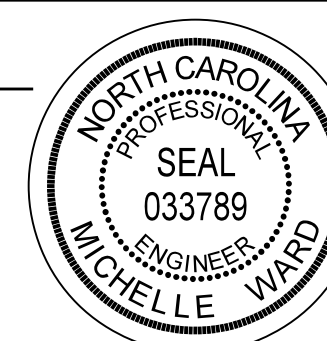


MATCHLINE -Y4- STA. 15+00
-Y3- STA. 18+55
SEE THIS SHEET

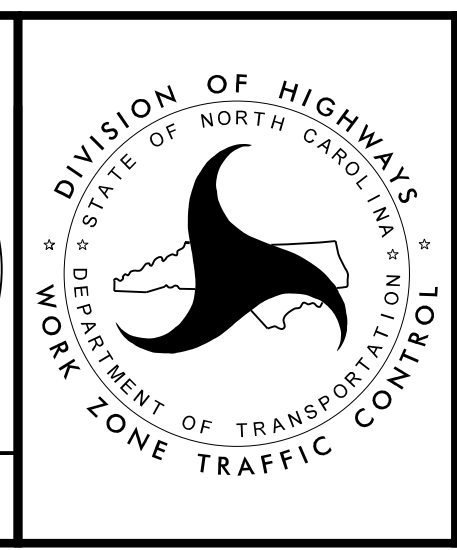
APPROVED: *Michelle Ward*

DATE: 7/13/2022

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DOCUMENT NOT CONSIDERED FINAL
UNLESS ALL SIGNATURES COMPLETED

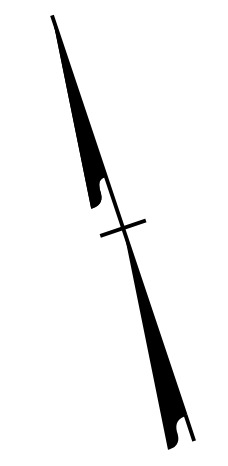


AREA 3
PHASE 2 STEP 1

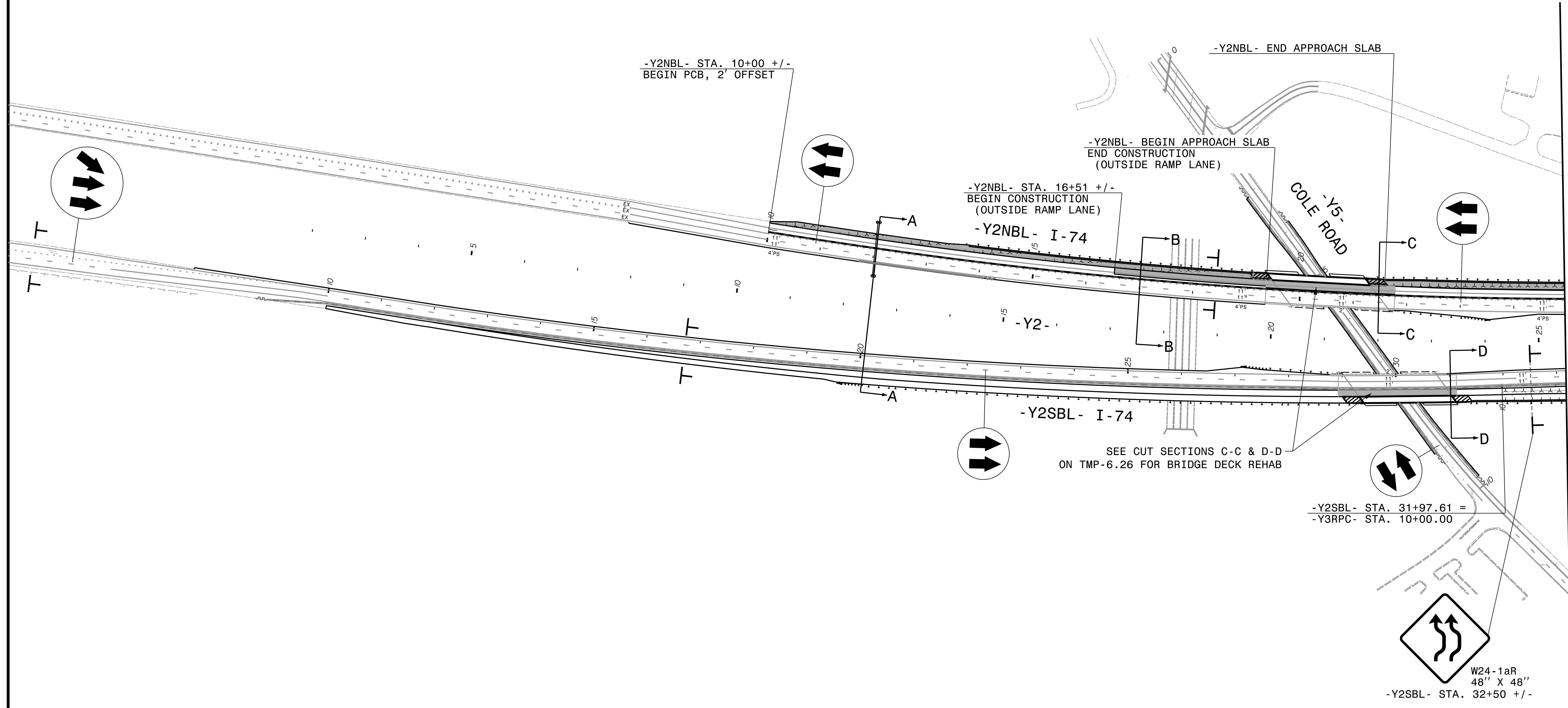
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REVISIONS

-Y2NBL-
SEE PHASING & ICT FOR WORK TO BE COMPLETED ON -Y2NBL- & -Y3RPB- IN AREA 3 - PHASE 2, STEP 2



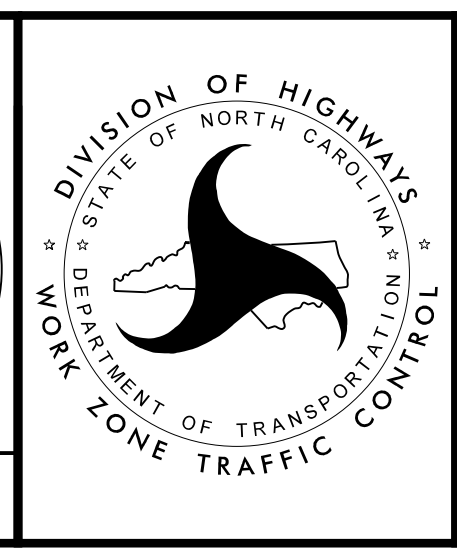
REVISIONS



PLOT DRIVER: NCDOT_pdf_color_eng_50.plt
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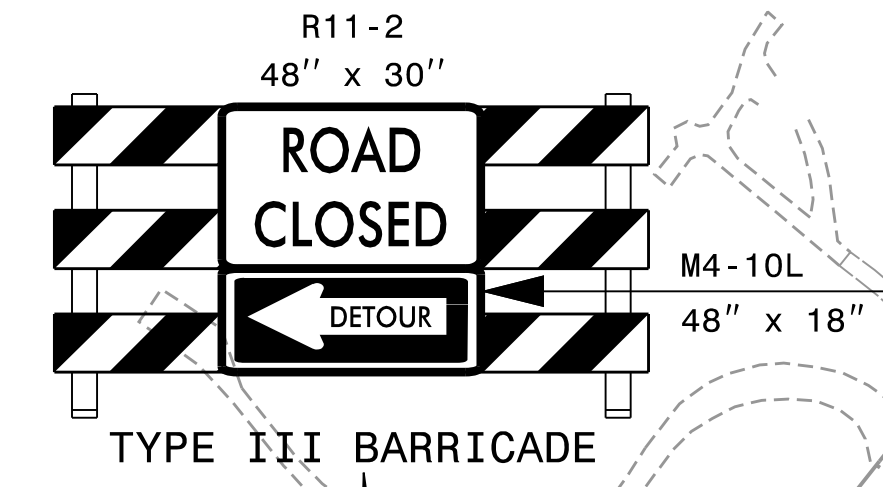
APPROVED: *Michelle Ward*
 DATE: 7/13/2022
 SEAL

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 UNLESS ALL SIGNATURES COMPLETED



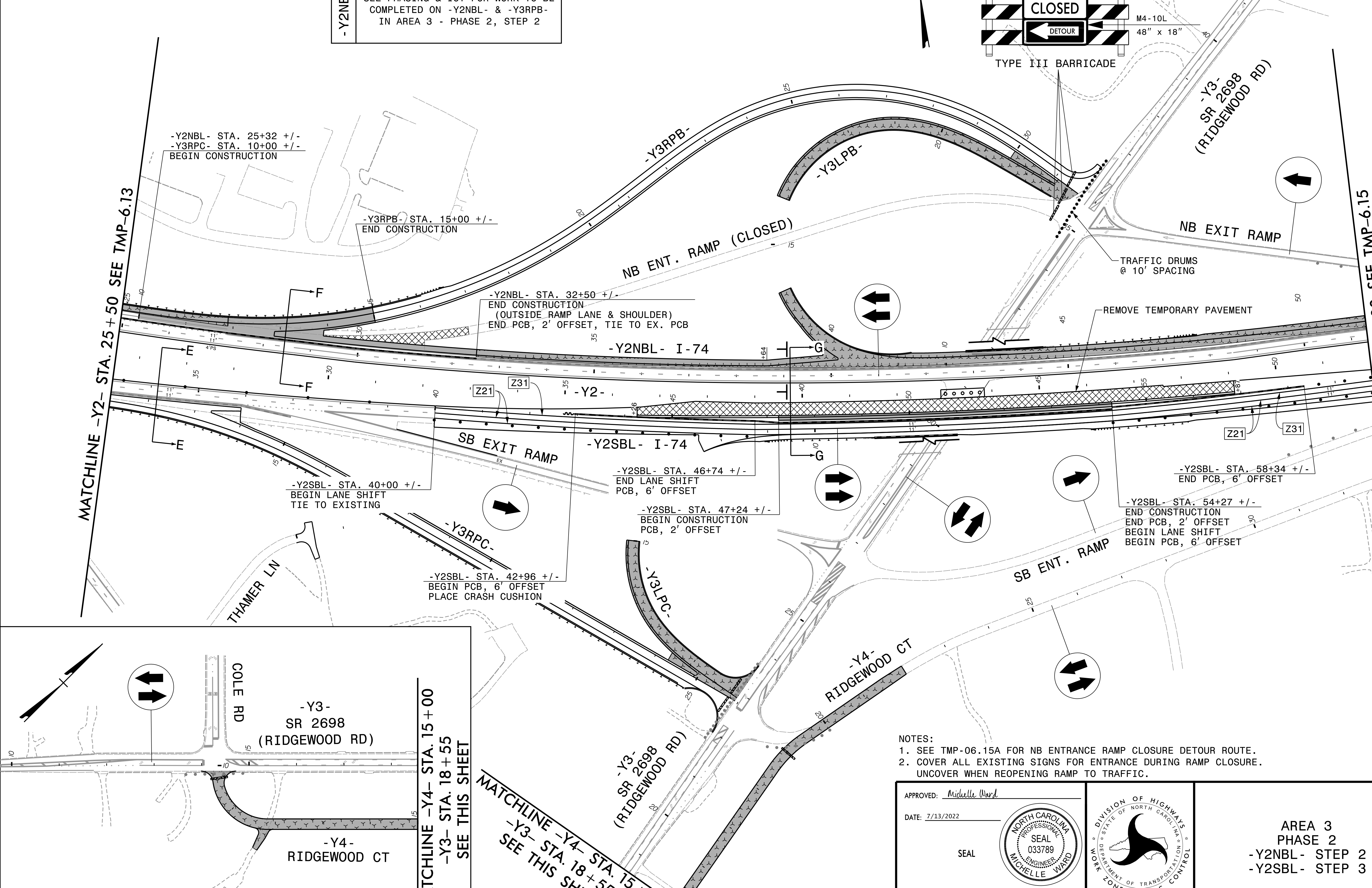
AREA 3
 PHASE 2
 -Y2NBL- STEP 2
 -Y2SBL- STEP 3

-Y2NBL-
 SEE PHASING & ICT FOR WORK TO BE COMPLETED ON -Y2NBL- & -Y3RPB- IN AREA 3 - PHASE 2, STEP 2



MATCHLINE -Y2- STA. 25+50 SEE TMP-6.13

MATCHLINE -Y2- STA. 52+00 SEE TMP-6.15



-Y2NBL- STA. 25+32 +/-
 -Y3RPC- STA. 10+00 +/-
 BEGIN CONSTRUCTION

-Y3RPB- STA. 15+00 +/-
 END CONSTRUCTION

-Y2NBL- STA. 32+50 +/-
 END CONSTRUCTION
 (OUTSIDE RAMP LANE & SHOULDER)
 END PCB, 2' OFFSET, TIE TO EX. PCB

-Y2SBL- STA. 40+00 +/-
 BEGIN LANE SHIFT
 TIE TO EXISTING

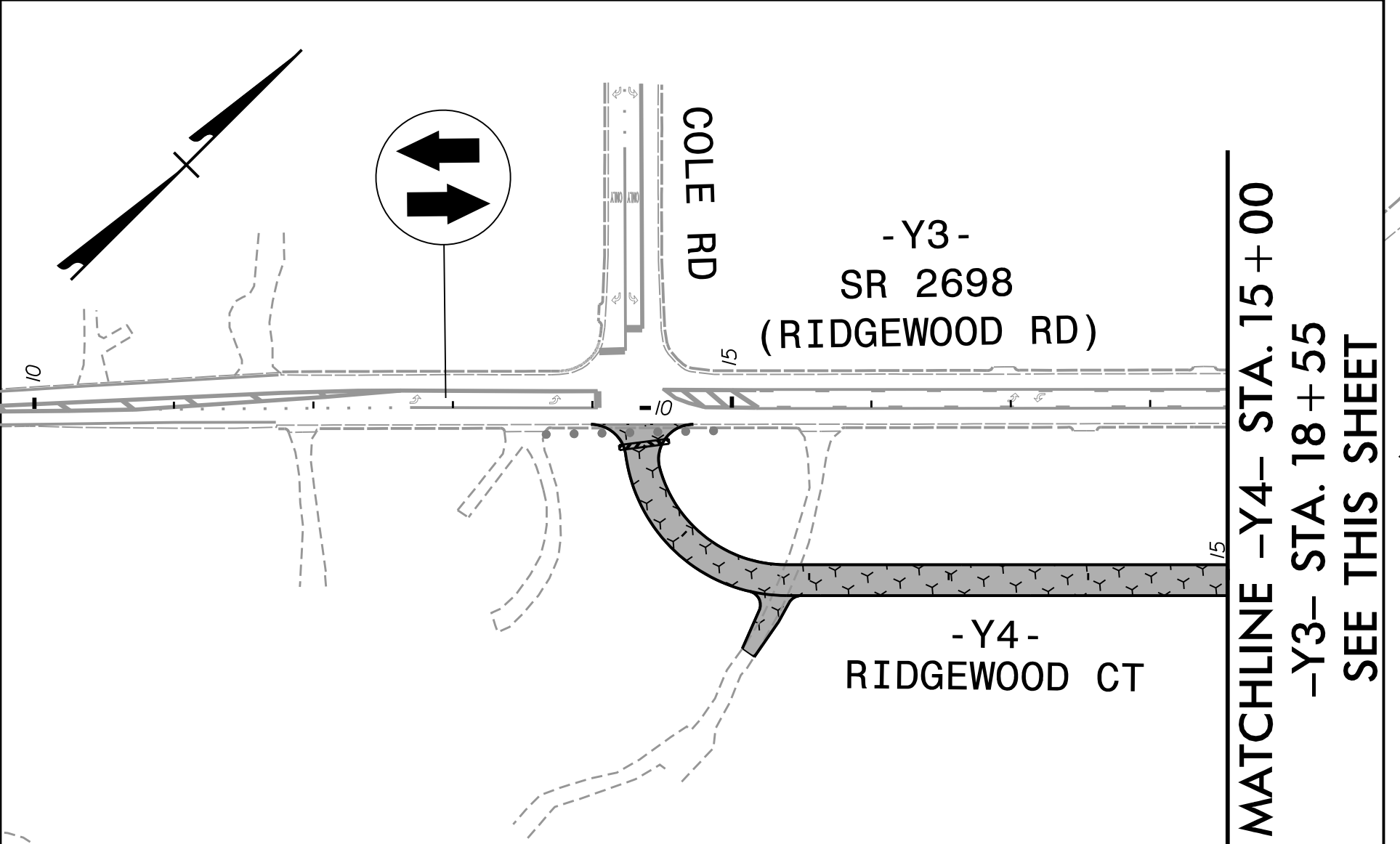
-Y2SBL- STA. 46+74 +/-
 END LANE SHIFT
 PCB, 6' OFFSET

-Y2SBL- STA. 47+24 +/-
 BEGIN CONSTRUCTION
 PCB, 2' OFFSET

-Y2SBL- STA. 42+96 +/-
 BEGIN PCB, 6' OFFSET
 PLACE CRASH CUSHION

-Y2SBL- STA. 58+34 +/-
 END PCB, 6' OFFSET

-Y2SBL- STA. 54+27 +/-
 END CONSTRUCTION
 END PCB, 2' OFFSET
 BEGIN LANE SHIFT
 BEGIN PCB, 6' OFFSET



MATCHLINE -Y4- STA. 15+00
 -Y3- STA. 18+55
 SEE THIS SHEET

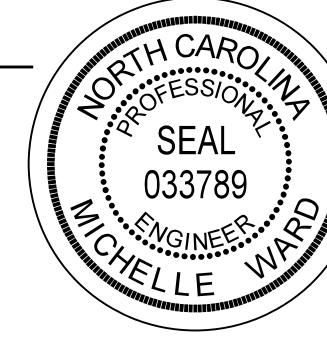
MATCHLINE -Y4- STA. 15+00
 -Y3- STA. 18+55
 SEE THIS SHEET

- NOTES:
- SEE TMP-06.15A FOR NB ENTRANCE RAMP CLOSURE DETOUR ROUTE.
 - COVER ALL EXISTING SIGNS FOR ENTRANCE DURING RAMP CLOSURE. UNCOVER WHEN REOPENING RAMP TO TRAFFIC.

APPROVED: *Michelle Ward*

DATE: 7/13/2022

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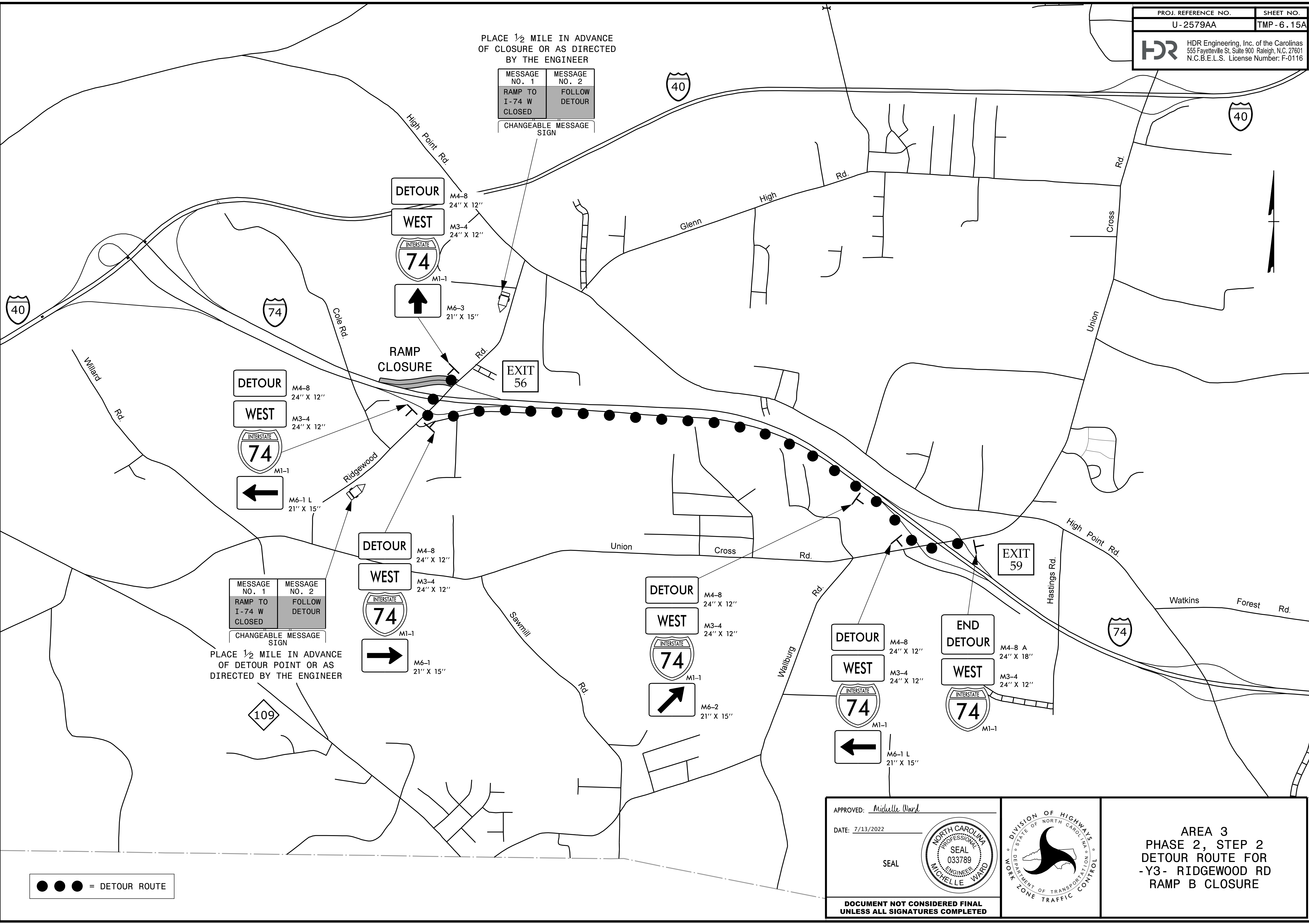
AREA 3
 PHASE 2
 -Y2NBL- STEP 2
 -Y2SBL- STEP 3

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REVISIONS

PLACE 1/2 MILE IN ADVANCE
OF CLOSURE OR AS DIRECTED
BY THE ENGINEER

MESSAGE NO. 1 RAMP TO I-74 W CLOSED	MESSAGE NO. 2 FOLLOW DETOUR
CHANGEABLE MESSAGE SIGN	



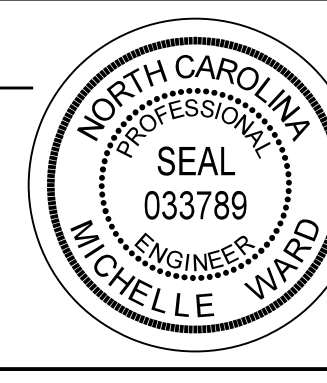
PLACE 1/2 MILE IN ADVANCE
OF DETOUR POINT OR AS
DIRECTED BY THE ENGINEER

MESSAGE NO. 1 RAMP TO I-74 W CLOSED	MESSAGE NO. 2 FOLLOW DETOUR
CHANGEABLE MESSAGE SIGN	

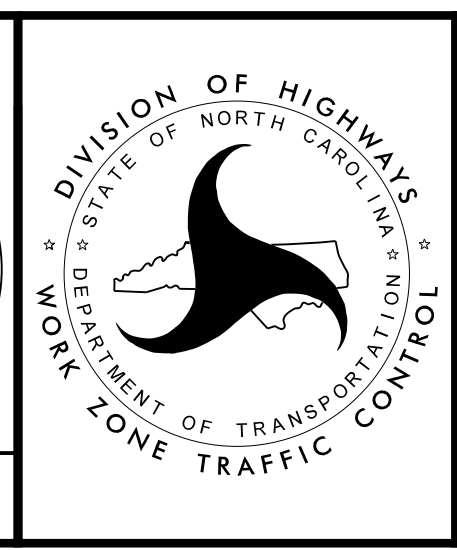
● ● ● = DETOUR ROUTE

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DATE: 7/13/2022

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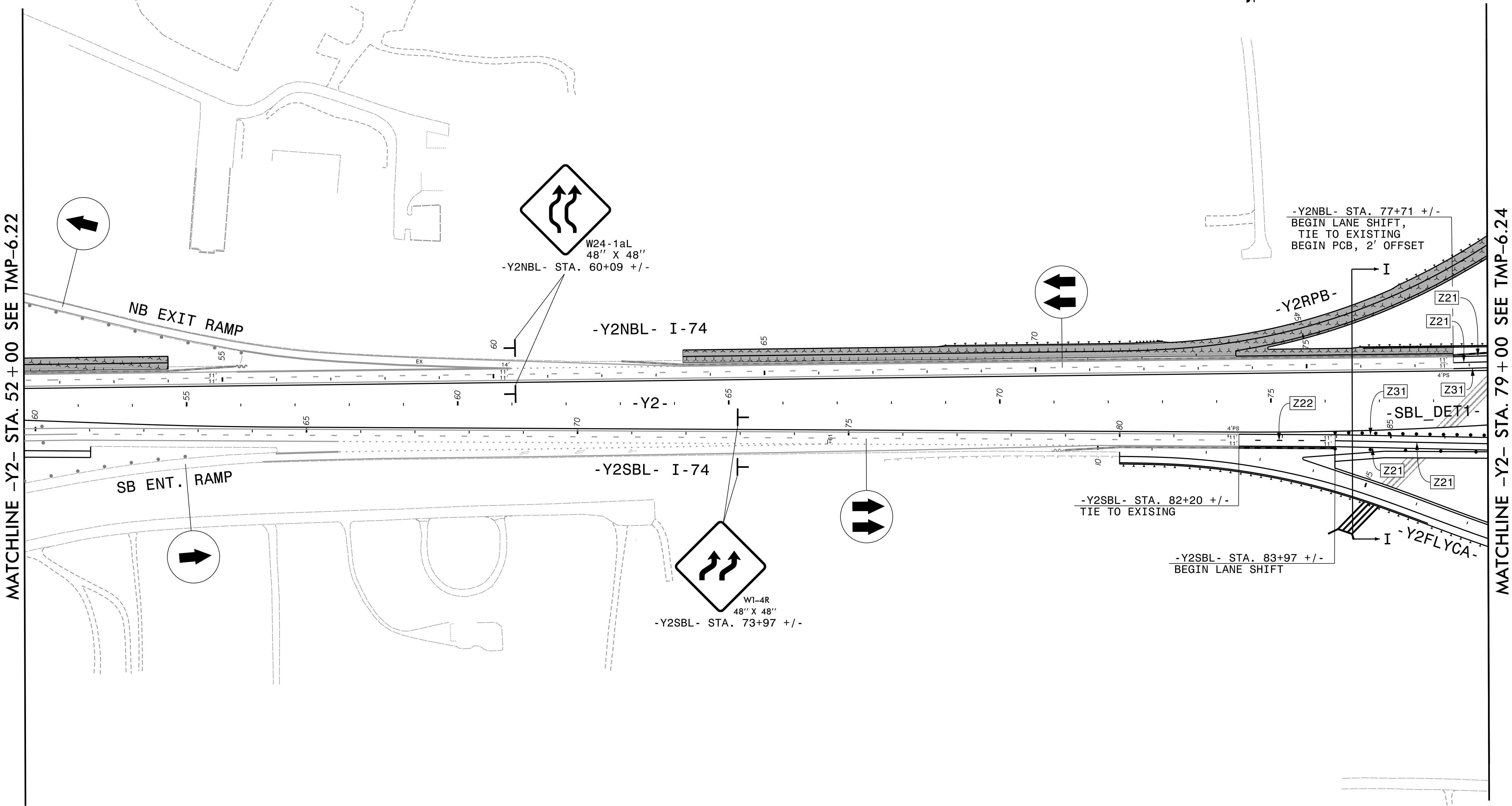


AREA 3
PHASE 2, STEP 2
DETOUR ROUTE FOR
-Y3- RIDGEWOOD RD
RAMP B CLOSURE

PLOT DRIVER: NCDOT_pdf_color_eng_50.pit
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REVISIONS

PROJ. REFERENCE NO.	SHEET NO.
U-2579AA	TMP-6.23
 HDR Engineering, Inc. of the Carolinas 555 Fayetteville St, Suite 900 Raleigh, N.C. 27601 N.C.B.E.L.S. License Number: F-0116	



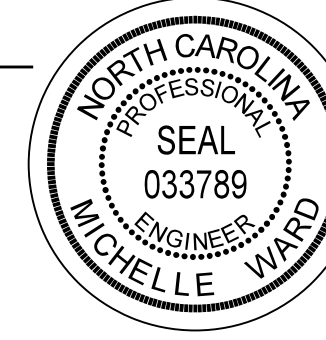
REVISIONS

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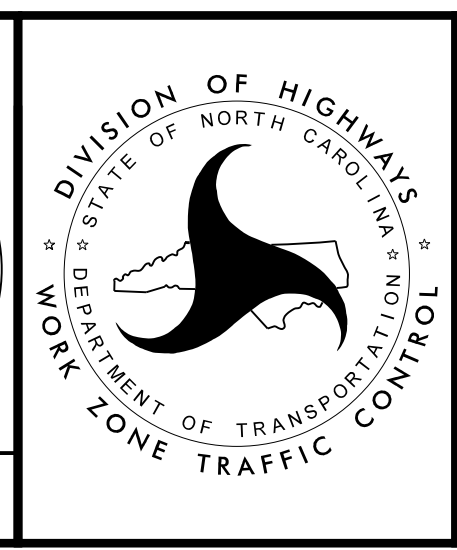
APPROVED: *Michelle Ward*

DATE: 7/13/2022

SEAL

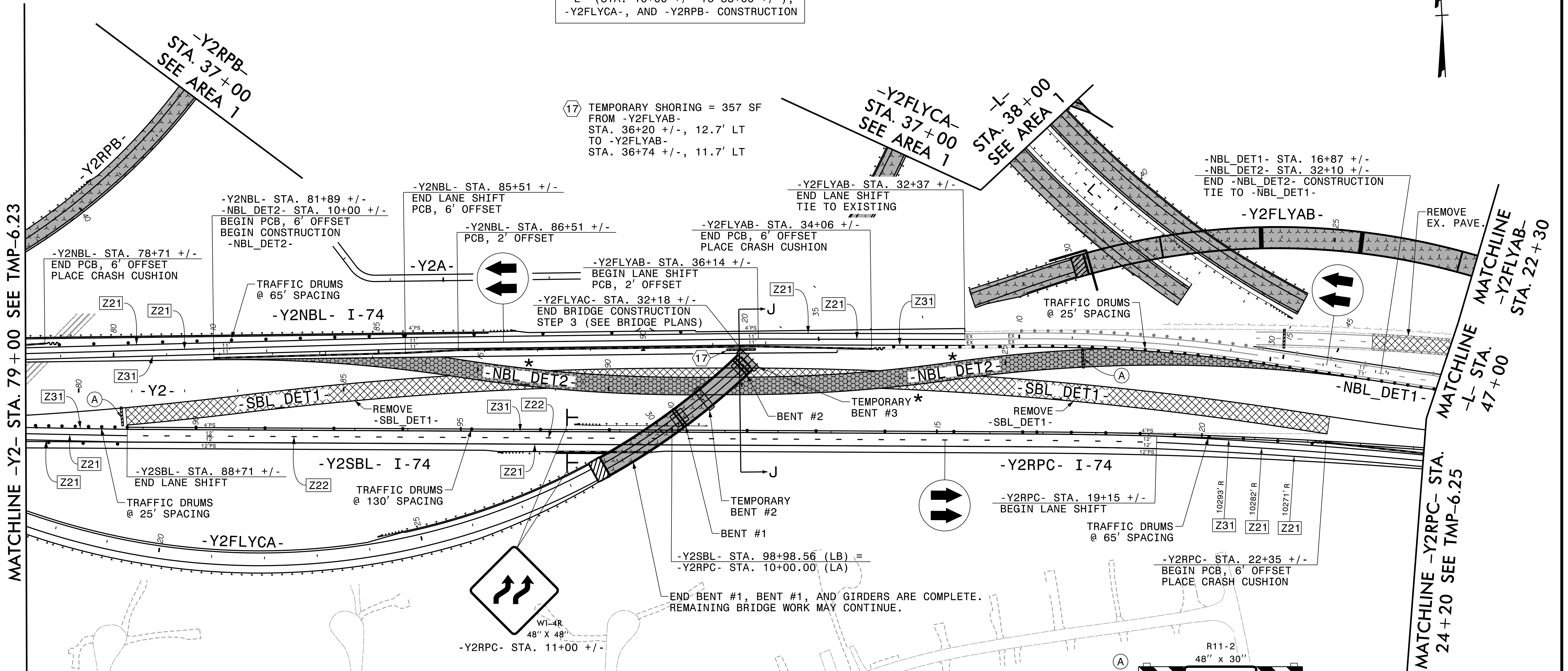


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AREA 3
 PHASE 3 STEP 1

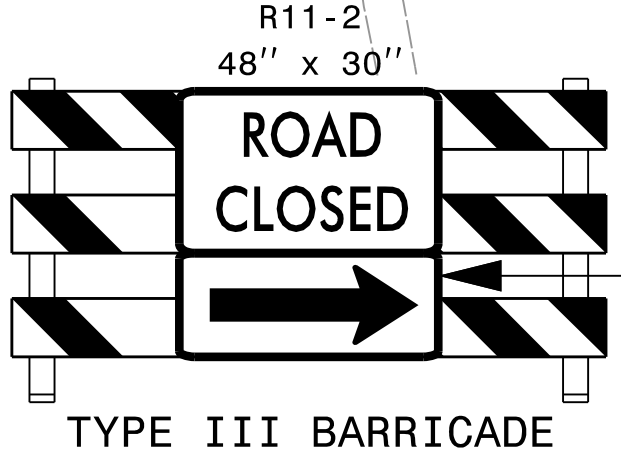
SEE AREA 1 PHASING FOR
 -L- (STA. 10+00 +/- TO 38+00 +/-),
 -Y2FLYCA-, AND -Y2RPB- CONSTRUCTION



17 TEMPORARY SHORING = 357 SF
 FROM -Y2FLYAB-
 STA. 36+20 +/-, 12.7' LT
 TO -Y2FLYAB-
 STA. 36+74 +/-, 11.7' LT

* TEMPORARY BENT #3 IS PLACED AND -NBL_DET2- ARE
 CONSTRUCTED ONLY AFTER BENT #2 CONSTRUCTION
 IS COMPLETE AND SHORING #17 IS REMOVED.

END BENT #1, BENT #1, AND GIRDERS ARE COMPLETE.
 REMAINING BRIDGE WORK MAY CONTINUE.

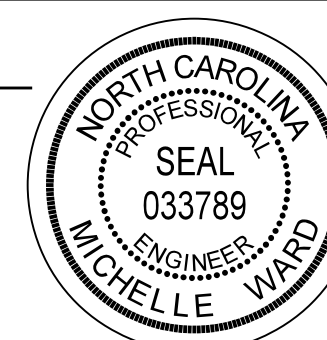


MATCHLINE -Y2- STA. 79+00 SEE TMP-6.23

MATCHLINE -Y2FLYAB- STA. 22+30
 MATCHLINE -L- STA. 47+00
 MATCHLINE -Y2RPC- STA. 24+20 SEE TMP-6.25

PLOT DRIVER: NCDOT_pdf_color_eng_50.pit
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 DATE: 7/13/2022
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AREA 3
 PHASE 3 STEP 1

