STATE PROJECT REFERENCE NO.	SHEET NO.
U-4026	TCP-1

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

PLAN FOR PROPOSED
TRAFFIC CONTROL, MARKING & DELINEATION
WAKE / DURHAM COUNTIES

U-4026

TIP PROJECT:

ROADWAY STANDARD DRAWINGS

THE FOLLOWING ROADWAY STANDARDS AS APPEAR IN "ROADWAY STANDARD DRAWINGS"-ROADWAY DESIGN UNIT-N.C. DEPARTMENT OF TRANSPORTATION-RALEIGH, N.C., DATED JULY 2006 ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS:

STD. NO.	TITLE
1101.02	TEMPORARY LANE CLOSURES
1101.04	TEMPORARY SHOULDER CLOSURES
1101.05	WORK ZONE VEHICLE ACCESSES
1101.11	TRAFFIC CONTROL PLAN DESIGN TABLES
1110.01	STATIONARY WORK ZONE SIGNS
1110.02	PORTABLE WORK ZONE SIGNS
1115.01	FLASHING ARROW PANELS
1130.01	DRUM
1135.01	CONES
1145.01	TYPE III BARRICADES
1150.01	FLAGGING DEVICES
1165.01	TRUCK MOUNTED IMPACT ATTENUATOR
1180.01	SKINNY-DRUM
1205.01	PAVEMENT MARKINGS - LINE TYPES & OFFSETS
1205.02	PAVEMENT MARKINGS - 2 LANE & MULTILANE ROADWAYS
1205.04	PAVEMENT MARKINGS - INTERSECTIONS
1205.05	PAVEMENT MARKINGS - THRU LANE
1205.06	PAVEMENT MARKINGS - THRU LANE DROPS
1205.07	PAVEMENT MARKINGS - PEDESTRIAN CROSSWALKS
1205.08	PAVEMENT MARKINGS - SYMBOLS AND WORD MESSAGES
1205.09	PAVEMENT MARKINGS - PAINTED ISLANDS
1250.01	PAVEMENT MARKER SPACING
1251.01	RAISED PAVEMENT MARKERS
1253.01	SNOWPLOWABLE RAISED PAVEMENT MARKERS
1261.01	GUARDRAIL AND BARRIER DELINEATOR SPACING
1261.02	GUARDRAIL AND BARRIER DELINEATOR TYPES
1262.01	GUARDRAIL END DELINEATION
1264.01	OBJECT MARKERS

INDEX OF SHEETS

SHEET NO.	TITLE
TCP-1	LIST OF APPLICABLE ROADWAY STANDARD DRAWINGS, LEGEND, INDEX OF SHEETS
TCP-2	TEMPORARY PAVEMENT MARKING SCHEDULE
TCP-3	PROJECT NOTES
TCP-4 THRU TCP-7	PHASE I OVERVIEW AND PHASING
TCP-8 THRU TCP-23	PHASE I DETAILS
TCP-24 THRU TCP-26	PHASE II OVERVIEW AND PHASING
TCP-27 THRU TCP-35	PHASE II DETAILS
TCP-36 THRU TCP-38	PHASE III OVERVIEW AND PHASING
TCP-39 THRU TCP-52	PHASE III DETAILS
TCP-53 THRU TCP-55	PHASE IV OVERVIEW AND PHASING
TCP-56 THRU TCP-70	PHASE IV DETAILS
TCP-71	DETAIL DRAWINGS FOR WORK ZONE SIGNS
PM-1 THRU PM-17	FINAL PAV'T. MARKING SCHEDULE, FINAL PAV'T. MARKINGS AND FINAL PAV'T. MARKERS

LEGEND

GENERAL

- DIRECTION OF TRAFFIC FLOW
- NORTH ARROW
- PROPOSED PVMT.
- EXIST. PVMT.
- PROPOSED CONSTRUCTION
- ONGOING CONSTRUCTION

TRAFFIC CONTROL DEVICES

- TYPE I BARRICADE
- TYPE II BARRICADE
- TYPE III BARRICADE
- CONE
- DRUM
- FLASHING ARROW PANEL (TYPE C)
- TYPE 'B' WARNING LIGHT
- STATIONARY SIGN
- PORTABLE SIGN
- WARNING FLAGS
- CRASH CUSHION
- CHANGEABLE MESSAGE SIGN
- TRUCK MOUNTED IMPACT ATTENUATOR (TMIA)
- POLICE
- FLAGGER
- DRUM (PROFILE)

PAVEMENT MARKINGS

- CRYSTAL PAVEMENT MARKER
- YELLOW/YELLOW PAVEMENT MARKER
- CRYSTAL/RED PAVEMENT MARKER
- PAVEMENT MARKING SYMBOLS

PLAN REVIEWED BY: N.C.D.O.T. TRAFFIC CONTROL, MARKING & DELINEATION SECTION

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APPROVED: Michael T Rzepka
DATE: 5-3-06

SEAL — NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PLAN PREPARED FOR N.C.D.O.T. BY:

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-2

TEMP. PAV'T MARKING SCHEDULE

SYMBOL	DESCRIPTION	QUANTITY BREAKDOWN	PAY ITEM	TOTAL QUANTITY
		PAVEMENT MARKING LINES		
			PAINT (4")	
PA	WHITE EDGELINE	286,494 ft		
PB	YELLOW EDGELINE	141,614 ft		
PC	10 ft. WHITE SKIP	13,898 ft		
PD	2 ft. WHITE MINISKIP	10,331 ft		
PE	WHITE SOLID LANE LINE	66,062 ft		
PF	10 ft. YELLOW SKIP	734 ft		
PH	YELLOW SINGLE CENTER LINE	2,932 ft		
PI	YELLOW DOUBLE CENTER LINE	340,860 ft		
			TOTAL	862,925 ft
			PAINT (8")	
PR	WHITE GORE LINE	1,658 ft		
PS	WHITE DIAGONAL	36 ft		
PV	YELLOW DIAGONAL	12,288 ft		
PX	WHITE CROSSWALK LINE	2,918 ft		
			TOTAL	16,900 ft
			PAINT (24")	
P4	WHITE STOP BAR	7,126 ft		
P5	WHITE CROSSWALK LINE	700 ft		
			TOTAL	7,826 ft
		PAVEMENT MARKING SYMBOLS		
			PAINT	
QA	LEFT TURN ARROW	450 EA		
QB	RIGHT TURN ARROW	306 EA		
QC	STRAIGHT ARROW	304 EA		
QD	COMBO STRAIGHT & LEFT TURN ARROW	4 EA		
QE	COMBO STRAIGHT & RIGHT TURN ARROW	62 EA		
			TOTAL	1126 EA
		PAVEMENT MARKING CHARACTERS		
			PAINT	
QI	ALPHANUMERIC CHARACTER	232 EA		
			TOTAL	232 EA
		PAVEMENT MARKERS		
			TEMPORARY RAISED	
MH	YELLOW AND YELLOW	1,703 EA		
MI	CRYSTAL AND RED	2,171 EA		
			TOTAL	3,874 EA

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For Division of Highways

APPROVED: Michael J Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

TEMPORARY PAVEMENT MARKING SCHEDULE

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA — DEPARTMENT OF TRANSPORTATION — TRAFFIC ENGINEERING BRANCH — TRAFFIC CONTROLS

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-3

GENERAL NOTES

A) ADAPT THE TRAFFIC CONTROL PLANS, WHEN DIRECTED BY THE ENGINEER, TO MEET FIELD CONDITIONS TO PROVIDE SAFE AND EFFICIENT TRAFFIC MOVEMENT. CHANGES MAY BE REQUIRED WHEN PHYSICAL DIMENSIONS IN THE DETAIL DRAWINGS, STANDARD DETAILS AND ROADWAY DETAILS ARE NOT ATTAINABLE, OR RESULT IN DUPLICATE, OR UNDESIRED OVERLAPPING OF DEVICES. MODIFICATION MAY INCLUDE: MOVING, SUPPLEMENTING, COVERING OR REMOVAL OF DEVICES.

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

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

ROAD NAME	DAY AND TIME RESTRICTIONS
DAVIS DRIVE	6:00 A.M. THRU 9:00 A.M. (MONDAY THRU FRIDAY) 3:00 P.M. THRU 6:00 P.M. (MONDAY THRU FRIDAY)

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

ROAD NAME

DAVIS DRIVE

HOLIDAY

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

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

D) DO NOT CONDUCT SINGLE VEHICLE HAULING AS FOLLOWS:

ROAD NAME	DAY AND TIME RESTRICTIONS
DAVIS DRIVE	6:00 A.M. THRU 9:00 A.M. (MONDAY THRU FRIDAY) 3:00 P.M. THRU 6:00 P.M. (MONDAY THRU FRIDAY)

E) DO NOT CONDUCT MULTI-VEHICLE HAULING AS FOLLOWS:

ROAD NAME	DAY AND TIME RESTRICTIONS
DAVIS DRIVE	6:00 A.M. THRU 7:00 P.M. (MONDAY THRU FRIDAY)

F) DO NOT CONDUCT ANY HAULING OPERATIONS AGAINST THE FLOW OF TRAFFIC OF AN OPEN TRAVELWAY UNLESS THE WORK AREA IS PROTECTED BY BARRIER OR GUARDRAIL OR OTHERWISE DIRECTED BY THE ENGINEER.

LANE AND SHOULDER CLOSURE REQUIREMENTS

G) 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.

PROJECT NOTES

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 TRAFFIC CONTROL 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, ON BOTH SIDES OF AN OPEN TRAVELWAY, WITHIN THE SAME LOCATION, ON A TWO-LANE, TWO-WAY ROAD.

K) DO NOT PERFORM WORK INVOLVING HEAVY EQUIPMENT WITHIN 15 FT OF THE EDGE OF TRAVELWAY WHEN WORK IS BEING PERFORMED BEHIND A LANE CLOSURE ON THE OPPOSITE SIDE OF THE TRAVELWAY.

L) DO NOT INSTALL MORE THAN ½ MILE OF LANE CLOSURE ON DAVIS DRIVE MEASURED FROM THE BEGINNING OF THE MERGE TAPER TO THE END OF THE LANE CLOSURE.

PAVEMENT EDGE DROP OFF REQUIREMENTS

M) 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 A 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.

N) DO NOT EXCEED A DIFFERENCE OF 1.5 INCHES IN ELEVATION BETWEEN OPEN LANES OF TRAFFIC. INSTALL ADVANCE WARNING "UNEVEN LANES" SIGNS (W8-11) 500 FT IN ADVANCE AND A MINIMUM OF ONCE EVERY MILE THROUGHOUT THE UNEVEN AREA.

TRAFFIC PATTERN ALTERATIONS

O) NOTIFY THE ENGINEER TWENTY ONE (21) CALENDAR DAYS PRIOR TO ANY TRAFFIC PATTERN ALTERATION.

SIGNING

P) INSTALL ADVANCE WORK ZONE WARNING SIGNS WHEN WORK IS WITHIN 100 FT FROM THE EDGE OF TRAVEL LANE AND NO MORE THAN THREE (3) DAYS PRIOR TO THE BEGINNING OF CONSTRUCTION.

WHEN NO WORK IS BEING CONDUCTED FOR A PERIOD LONGER THAN ONE WEEK, REMOVE OR COVER ALL ADVANCE WORK ZONE WARNING SIGNS, AS DIRECTED BY THE ENGINEER, AT NO COST TO THE DEPARTMENT.

Q) PROVIDE PERMANENT SIGNING.

R) PROVIDE DETOUR SIGNING WITHIN AND OFF THE PROJECT LIMITS.

S) COVER OR REMOVE ALL DETOUR SIGNS WITHIH AND OFF THE PROJECT LIMITS WHEN A DETOUR IS NOT IN OPERATION.

T) ENSURE ALL NECESSARY SIGNING IS IN PLACE PRIOR TO ALTERING ANY TRAFFIC PATTERN.

TRAFFIC CONTROL DEVICES

U) WHEN USING ROADWAY STANDARD NO. 1101.02, DRUMS MAY BE USED IN LIEU OF CONES ON DAVIS DRIVE.

V) SPACE CHANNELIZING DEVICES IN WORK AREAS NO GREATER THAN TWICE THE POSTED SPEED LIMIT (MPH), EXCEPT 10 FT ON-CENTER IN RADII, AND 3 FT OFF THE EDGE OF AN OPEN TRAVELWAY, WHEN LANE CLOSURES ARE NOT IN EFFECT.

W) PLACE TYPE III BARRICADES, WITH "ROAD CLOSED" SIGN R11-2 ATTACHED, OF SUFFICIENT LENGTH TO CLOSE ENTIRE ROADWAY. STAGGER OR OVERLAP BARRICADES TO ALLOW FOR INGRESS OR EGRESS.

X) PLACE SETS OF THREE DRUMS PERPENDICULAR TO THE EDGE OF THE TRAVELWAY ON 500 FT CENTERS WHEN UNOPENED LANES ARE CLOSED TO TRAFFIC. THESE DRUMS SHALL BE IN ADDITION TO CHANNELIZING DEVICES.

PAVEMENT MARKINGS AND MARKERS

Y) INSTALL PAVEMENT MARKINGS AND PAVEMENT MARKERS ON THE FINAL SURFACE AS FOLLOWS:

ROAD NAME	MARKING	MARKER
ALL	THERMOPLASTIC	SNOWPLOWABLE RAISED

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

ROAD NAME	MARKING	MARKER
ALL	PAINT	TEMPORARY RAISED

AA) TIE PROPOSED PAVEMENT MARKING LINES TO EXISTING PAVEMENT MARKING LINES.

BB) REPLACE ANY PAVEMENT MARKINGS THAT HAVE BEEN DAMAGED BY THE END OF EACH DAY'S OPERATION.

CC) TRACE THE EDGE OF PROPOSED MONOLITHIC ISLANDS WITH THE PROPER COLOR PAVEMENT MARKING PRIOR TO INSTALLATION OF A PROPOSED MONOLITHIC ISLAND.

DD) PLACE AT LEAST TWO APPLICATIONS OF PAINT ON NEW ASPHALT WITH TEMPORARY TRAFFIC PATTERNS WHICH WILL REMAIN IN PLACE OVER THREE (3) MONTHS. PLACE ADDITIONAL APPLICATIONS OF PAINT UPON SUFFICIENT DRYING TIME, AS DETERMINED BY THE ENGINEER.

TEMPORARY/FINAL SIGNALS

EE) NOTIFY THE ENGINEER TWO (2) MONTHS BEFORE A TRAFFIC SIGNAL INSTALLATION BY OTHERS IS REQUIRED.

FF) SHIFT AND REVISE ALL SIGNAL HEADS AS SHOWN ON THE SIGNAL PLANS.

MISCELLANEOUS

GG) POLICE MAY BE USED TO MAINTAIN TRAFFIC THROUGH INTERSECTIONS.

LOCAL NOTES

THE FOLLOWING LOCAL NOTES APPLY ONLY AT THE TIMES THEY ARE REFERENCED IN THE PLAN.

1) CONCRETE ISLANDS AND OR MEDIAN CURB AND GUTTER SHALL NOT BE CONSTRUCTED IN AREAS OF DRIVEWAYS OR INTERSECTIONS UNTIL PHASE IV.

2) MAINTAIN INGRESS AND/OR EGRESS TO -Y7- (GEORGE WATTS HILL DRIVE) AT ALL TIMES. WHEN CONSTRUCTING -L- ACROSS -Y7-, USE 5.5" ASPHALT CONCRETE BASE COURSE IN LIEU OF SOIL STABILIZATION.

3) ALTERNATELY, CLOSE PHIL SHARP DRIVE AND WALLY GILBERT DRIVE TO CONSTRUCT -L-, INCLUDING DRIVES, ACROSS INTERSECTIONS UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE. USE 5.5" ASPHALT CONCRETE BASE IN LIEU OF SOIL STABILIZATION. CONTRACTOR SHALL ONLY BE ALLOWED TO CLOSE EACH DRIVE FOR A MAXIMUM OF 14 DAYS.

4) UNDERCUT EXCAVATION ADJACENT TO EXISTING PAVEMENT SHALL BE REPLACED AND/OR PAVEMENT EDGE DROP OFF SHALL BE BACKFILLED AT A 6:1 SLOPE UP TO THE EDGE AND ELEVATION OF EXISTING PAVEMENT AT THE END OF EACH DAY.

Plans prepared by:
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For Division of Highways

APPROVED: Michael T Kozma DATE: 11-2-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T KOZMA

PROJECT NOTES

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL UNIT

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-4

PHASE I PHASING

STEP 1: INSTALL WORK ZONE SIGNS. (SEE SHEETS TCP-8, TCP-23 AND TCP-71)

STEP 2: BEGIN INSTALLATION OF REQUIRED DRAINAGE AS MUCH AS POSSIBLE AS SHOWN IN ROADWAY PLANS EXCLUDING DRAINAGE PIPES AND BOXES WHICH ARE LOCATED WITHIN AND ALONG EXISTING PAVEMENT. USE ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, WHEN INSTALLING PROPOSED DRAINAGE OR REMOVING EXISTING DRAINAGE ACROSS EXISTING PAVEMENT.

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, INSTALL DRAINAGE PIPE ACROSS -L- (DAVIS DR.) AT -L- STA. 61+85 ± AND CONSTRUCT DRAINAGE SYSTEMS BETWEEN -L- STA. 61+85 ± AND -L- STA. 66+50 ± AND BETWEEN -L- STA. 70+10 ± AND -L- STA. 74+60 ±. CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, INSTALL DRAINAGE PIPES ACROSS -L- (DAVIS DR.) AT -L- STA. 77+18 ± AND -L- STA. 86+25 ± AND CONSTRUCT DRAINAGE SYSTEM BETWEEN -L- STA. 82+00 ± AND -L- STA. 86+25 ±. CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEETS 1 AND 3 OF 9, INSTALL DRAINAGE PIPES AND STRUCTURES AS SHOWN IN ROADWAY PLAN BETWEEN -L- STA. 241+00 ± AND -L- STA. 265+60 ± AND BETWEEN -L- STA. 307+00 ± AND -L- STA. 314+00 ±. CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, INSTALL REQUIRED DRAINAGE ALONG AND ACROSS -Y5- (SR 1635, McCRIMMON PKWY.) BETWEEN -Y5- STA. 22+00 ± AND -Y5- STA. 22+50 ± AND BETWEEN -Y5- STA. 29+60 ± AND -Y5- STA. 32+30 ±.
CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, INSTALL 15″ DRAINAGE PIPES AND DI AT -Y9- STA. 11+00 ±, -Y9- STA. 13+50 ±, AND -Y9- STA. 17+30 ± AND DRAINAGE SYSTEMS BETWEEN -Y9- STA. 17+30 ± AND -Y9- STA. 18+20 ± AND BETWEEN -Y9- STA. 22+70 ± AND -Y9- STA. 25+20 ± AS SHOWN IN ROADWAY DESIGN PLANS. CONSTRUCT DRAINAGE STRUCTURE UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, INSTALL CROSS DRAINAGE PIPES FOR -Y10- (DEVELOPMENT DR.). CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, INSTALL CROSS DRAINAGE PIPES FOR -Y12- (SR 1978, HOPSON RD.) FROM -Y12- STA. 10+30 ± TO -Y12- STA. 40+60 ±. CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE.
(SEE ROADWAY DESIGN PLANS)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 3 OF 9, INSTALL 24″ DRAINAGE PIPE AND DI AT -Y13- STA. 14+60 ± AND -Y13- STA. 23+55 ± AND DRAINAGE SYSTEM BETWEEN -Y13- STA. 14+60 ± AND -Y13- STA. 15+00 ±. CONSTRUCT DRAINAGE STRUCTURES UP TO EXISTING PAVEMENT ELEVATION AND COVER WITH A TRAFFIC BEARING STEEL PLATE. (SEE ROADWAY DESIGN PLANS)

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

STEP 3: AWAY FROM TRAFFIC, BEGIN CONSTRUCTION OF THE RIGHT SIDE OF -L- (DAVIS DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATIONS: (SEE LOCAL NOTES 1, 2, AND 3) (SEE SHEETS TCP-8 THROUGH TCP-23)

-L- STA. 32+20 ± TO -L- STA. 49+50 ±
-L- STA. 89+61 ± TO -L- STA. 136+30 ±, INCLUDING -Y7- (GEORGE WATTS HILL DR.)
-L- STA. 148+77 ± TO -L- STA. 158+00 ±
-L- STA. 173+50 ± TO -L- STA. 234+00 ±
-L- STA. 282+00 ± TO -L- STA. 287+50 ±
-L- STA. 294+20 ± TO -L- STA. 299+00 ±

AWAY FROM TRAFFIC, BEGIN CONSTRUCTION OF TEMPORARY WIDENING OF PROPOSED RIGHT SIDE OF -L- (DAVIS DR.) AT THE FOLLOWING LOCATIONS:

-L- STA. 154+94 ± TO -L- STA. 156+84 ±
(SEE SHEET TCP-14, SECTION A-A)
-L- STA. 189+44 ± TO -L- STA. 194+19 ±
(SEE SHEET TCP-16, SECTION C-C)(SEE LOCAL NOTE 3)
-L- STA. 209+88 ± TO -L- STA. 213+95 ±
(SEE SHEET TCP-17, SECTION D-D)

STEP 4: USING ROADWAY STANDARD DRAWING 1101.02, REMOVE EXISTING ISLAND(S) AND CURB AND GUTTER FROM THE CENTER OF -L- (DAVIS DR.) AND RECONSTRUCT UP TO EXISTING PAVEMENT ELEVATION BETWEEN -L- STA. 23+27 ± AND -L- STA. 321+00 ±. PLACE 4″ DOUBLE YELLOW CENTER LINES TO TRACE THE LOCATION OF THE EXISTING ISLAND(S) AND CURB AND GUTTER. TUBULAR MARKERS ON 4′ CENTERS MAY BE USED AS DIRECTED BY ENGINEER TO PREVENT TURNING MOVEMENTS INTO AND OUT OF DRIVEWAYS.

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

COMPLETE THE WORK REQUIRED OF PHASE I, STEP 5 ON WEEKEND(S) FROM 6:00 P.M. FRIDAY TO 6:00 A.M. MONDAY. (SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 5: USING ROADWAY STANDARD DRAWING 1101.02, REMOVE AND REPLACE EXISTING DAVIS DR. PAVEMENT (FULL WIDTH) FROM -L- STA. 268+00 ± TO -L- STA. 304+00 ±. AT END OF EACH WEEKEND, REPLACE PAVEMENT MARKING LINES AND REOPEN ALL LANES TO TRAFFIC.

STEP 6: USING ROADWAY STANDARD DRAWING 1101.02, SHEETS 1 AND 3 OF 9, PAVE/WEDGE EXISTING PAVEMENT (FULL WIDTH) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATIONS:

-L- STA. 23+27 ± TO -L- STA. 32+20 ±, INCLUDING -Y2- (SR 3059, HOLLY CREEK RD.)
-L- STA. 62+50 ± TO -L- STA. 89+61 ±, INCLUDING -Y6- (PARKSIDE VALLEY DR.)
-L- STA. 240+00 ± TO -L- STA. 296+74 ±, INCLUDING -Y11- (KNOLL DR.)
-L- STA. 299+00 ± TO -L- STA. 310+89 ±
-L- STA. 311+63 ± TO -L- STA. 321+08 ±
-Y5- STA. 19+35 ± TO -Y5- STA. 36+65 ±
-Y12- STA. 10+30 ± TO -Y12- STA. 24+50 ±
-Y12- STA. 26+00 ± TO -Y12- STA. 40+60 ±
-Y13- STA. 11+50 ± TO -Y13- STA. 27+00 ±

REPLACE PAVEMENT MARKINGS AND REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

STEP 7: BEGIN CONSTRUCTION OF THE FOLLOWING: (REFER TO ROADWAY STANDARD DRAWING 1101.02, SHEETS 1 AND 3 OF 9)

WIDENING ON RIGHT SIDE UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATION:

-L- STA. 23+27 ± TO -L- STA. 32+20 ±
(SEE SHEET TCP-8)
-L- STA. 240+00 ± TO -L- STA. 282+00 ±
(SEE SHEETS TCP-18, TCP-19, AND TCP-21))
-L- STA. 287+50 ± TO -L- STA. 294+20 ±
(SEE SHEET TCP-22)

WIDENING ON LEFT SIDE UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATIONS:

-L- STA. 13+64 ± TO -L- STA. 29+85 ±. (SEE SHEET TCP-8)
-L- STA. 242+45 ± TO -L- STA. 272+18 ±
(SEE SHEETS TCP-18, TCP-19 AND TCP-21)

WIDENING ON BOTH SIDES UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATIONS: (REFER TO ROADWAY STANDARD DRAWING 1101.02)

-L- STA. 299+00 ± TO -L- STA. 310+89 ±
(SEE SHEETS TCP-22 AND TCP-23)
-L- STA. 311+63 ± TO -L- STA. 321+08 ±
(SEE SHEET TCP-23)
-Y5- STA. 19+35 ± TO -Y5- STA. 24+60 ±
(SEE LOCAL NOTE 4 AND SHEET TCP-10)
-Y12- STA. 10+30 ± TO -Y12- STA. 40+60 ±.
(SEE SHEETS TCP-19 AND TCP-20)
-Y13- STA. 11+50 ± TO -Y13- STA. 27+00 ±
(SEE SHEET TCP-23)

TEMPORARY WIDENING BETWEEN RIGHT EDGE OF PAVEMENT OF EXISTING DAVIS DR. AND LEFT (MEDIAN) EDGE OF PAVEMENT OF PROPOSED RIGHT LANES OF -L- (DAVIS DR.) FROM -L- STA. 282+00 ± TO -L- STA. 287+50 ± AND FROM -L- STA. 294+20 ± TO -L- STA. 296+74 ±.
(SEE SHEETS TCP-21 AND TCP-22)

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

COMPLETE THE WORK REQUIRED OF PHASE I, STEP 8 ON WEEKEND(S) FROM 6:00 P.M. FRIDAY TO 6:00 A.M MONDAY.
(SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 8: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, RECONSTRUCT RIGHT SIDE OF -Y9- (SR 1639, KIT CREEK RD.) FROM -Y9- STA. 23+50 ± TO -Y9- STA. 25+00 ± AND LEFT SIDE FROM -Y9- STA. 21+50 ± TO -Y9- STA. 22+00 ± UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE. REPLACE PAVEMENT MARKING LINES AND REOPEN ALL LANES TO TRAFFIC AT END OF EACH WEEKEND. (REFER TO ROADWAY DESIGN PLANS)

STEP 10: CONSTRUCT -Y9A- UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -Y9A- STA. 10+00 ± TO -Y9A- STA. 13+25 ±. (SEE SHEET TCP-15)

REMOVE TYPE III BARRICADES AND OPEN -Y9A- TO TRAFFIC.

STEP 11: USING TYPE III BARRICADES CLOSE DRIVEWAY ON RIGHT SIDE OF -Y9- (SR 1639, KIT CREEK RD.) AT -Y9- STA. 20+65 ±.

USING ROADWAY STANDARD DRAWING 1101.02, BEGIN WIDENING ON RIGHT SIDE UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -Y9- STA. 20+00 ± TO -Y9- STA. 21+50 ± (INCLUDING DRIVEWAY).

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

UPON COMPLETION OF DRIVEWAY REMOVE TYPE III BARRICADES AND OPEN DRIVEWAY TO TRAFFIC.

STEP 12: USING ROADWAY STANDARD DRAWING 1101.02, CONSTRUCT THE FOLLOWING:

LEFT SIDE WIDENING UP TO EDGE OF PAVEMENT ELEVATION FROM -L- STA. 58+62 ± TO -L- STA. 62+50 ±.
(SEE SHEETS TCP-9 AND TCP-10)

LEFT SIDE WIDENING UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATIONS:

-L- STA. 62+50 ± TO -L- STA. 86+65 ±
(SEE LOCAL NOTE 4 AND SHEETS TCP-10 AND TCP-11)

-Y5- STA. 25+60 ± TO -Y5- STA. 36+65 ±
(SEE LOCAL NOTE 4 AND SHEET TCP-10)

TEMPORARY PAVEMENT ON RIGHT SIDE OF SOUTHBOUND LANES (MEDIAN) OF -L- (DAVIS DR.) FROM -L- STA. 163+41 ± TO -L- STA. 166+47 ±. (SEE SHEETS TCP 14 AND TCP-15, AND SHEET TCP-15, SECTION B-B)

TEMPORARY PAVEMENT ON LEFT SIDE OF -L- (DAVIS DR.) FROM -L- STA. 232+75 ± TO -L- STA. 239+86 ±.
(SEE SHEET TCP-18, SECTION E-E)

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

STEP 13: INSTALL TEMPORARY TRAFFIC SIGNALS AT THE FOLLOWING INTERSECTIONS:

-L- AND -Y5- (SR 1635, McCRIMMON PKWY.)
(SEE SIGNAL PLANS AND SHEET TCP-28).
-L- AND -Y6- (PARKSIDE VALLEY RD.)
(SEE SIGNAL PLANS AND SHEET TCP-42).
-L- AND -Y9- (SR 1639, KIT CREEK RD.)
(SEE SIGNAL PLANS AND SHEET TCP-31).
-L- AND -Y10- (DEVELOPMENT DR.)
(SEE SIGNAL PLANS AND SHEET TCP-48).
-L- AND -Y12- (SR 1978, HOPSON RD.)
(SEE SIGNAL PLANS AND SHEET TCP-35).

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kzpha DATE: 11-2-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KZPHA

PHASE I PHASING

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

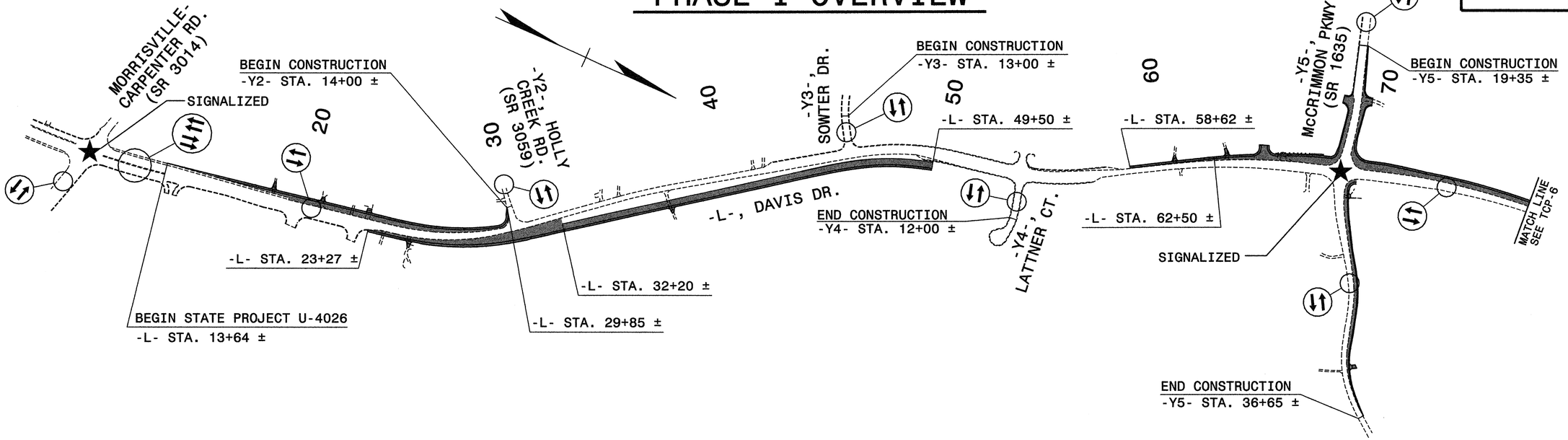
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL UNIT

REVISIONS	
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11/02/2006 02:57:28 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-5

PHASE I OVERVIEW



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For Division of Highways

APPROVED: Michael T Rzepka DATE: 5-3-06

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PHASE I OVERVIEW

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

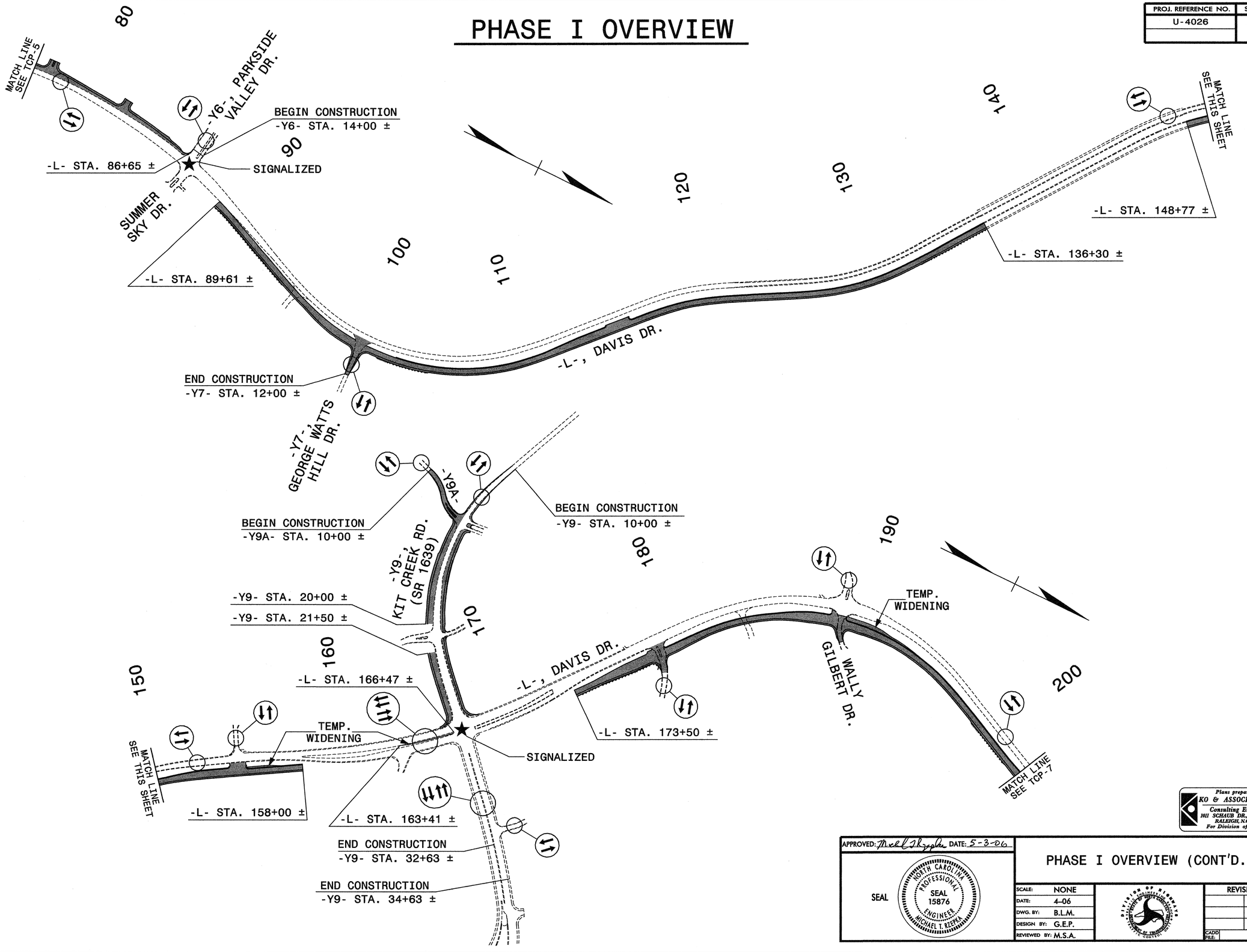
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PHASE I OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-6



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For Division of Highways

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SEAL

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PHASE I OVERVIEW (CONT'D.)

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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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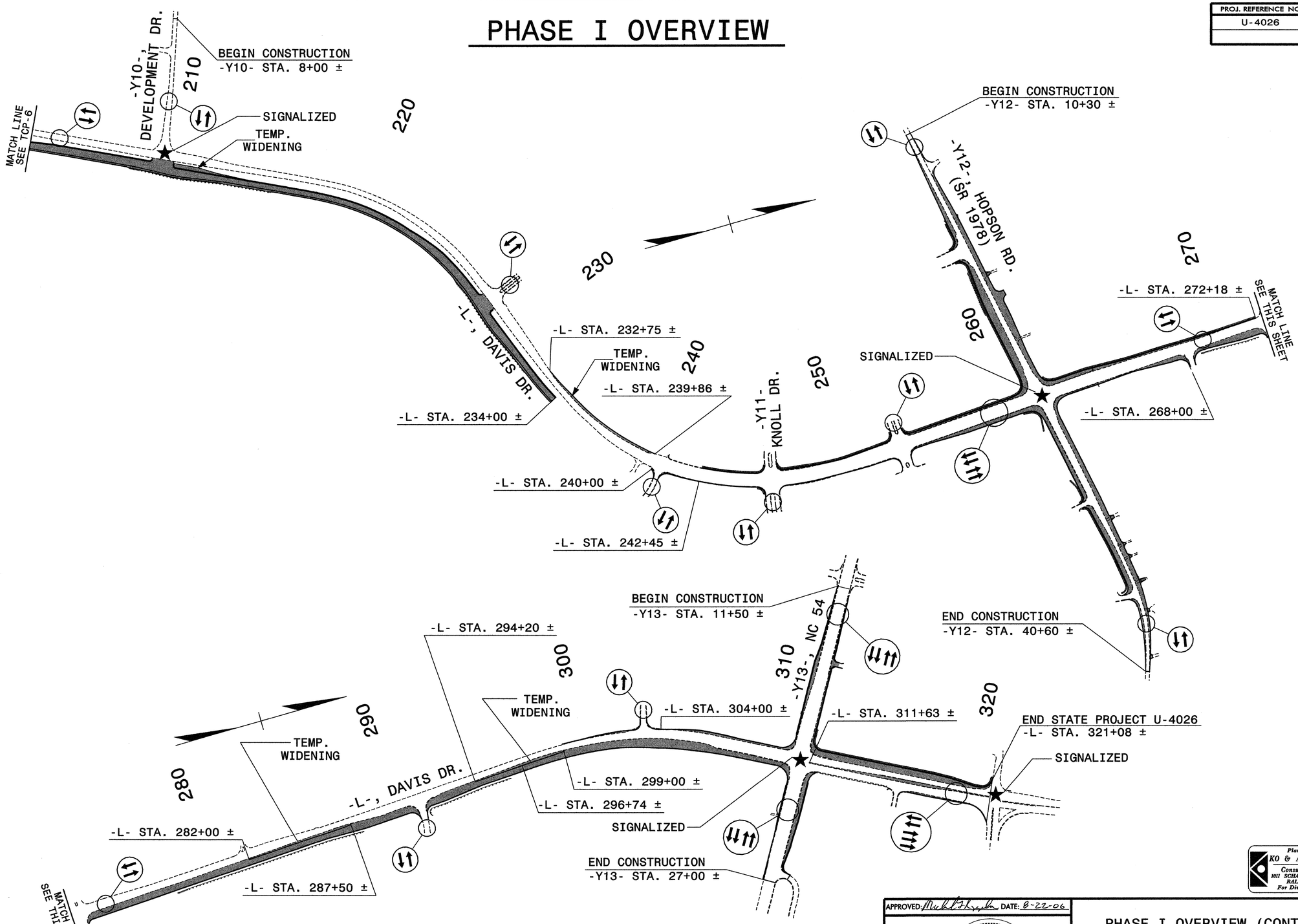
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PHASE I OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-7



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SEAL

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PHASE I OVERVIEW (CONT'D.)

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DATE:	4-06
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

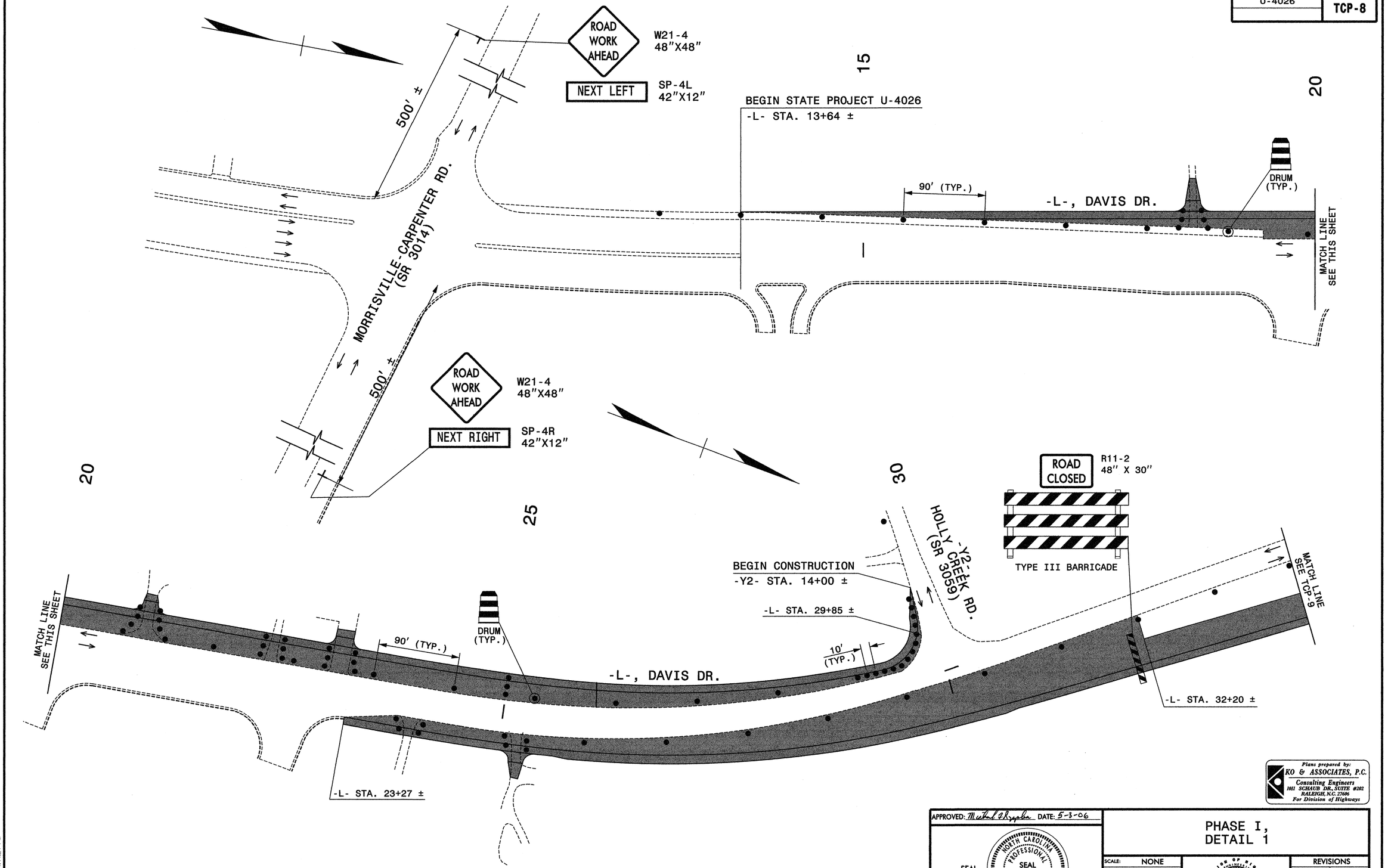
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-8



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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kozpka DATE: 5-3-06

SEAL

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PHASE I, DETAIL 1

SCALE:	NONE
DATE:	4-06
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-9

35

40

45

50

55

60

W1-7
48" X 24"

TYPE III BARRICADE
(TYP.)

DRUM
(TYP.)

-Y3-, SOWTER DR.

MATCH LINE
SEE TCP-8

-L-, DAVIS DR.

90' (TYP.)

MATCH LINE
SEE THIS SHEET

TYPE III BARRICADE
(TYP.)

-L- STA. 58+62 ±

90' (TYP.)

DRUM
(TYP.)

MATCH LINE
SEE TCP-10

MATCH LINE
SEE THIS SHEET

-L- STA. 49+50 ±

ROAD
CLOSED

R11-2
48" X 30"

TYPE III BARRICADE

-L-, DAVIS DR.

-Y4-, LATTNER CT.

P:\TIFF\CU-4026\003\ V8 Files\PLANS\PHII02.dgn
04/05/2006 10:34:45 AM

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For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-5-06

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PHASE I, DETAIL 1 (CONT'D.)

SCALE:	NONE
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-10

BEGIN CONSTRUCTION
-Y5- STA. 19+35 ±

-Y5-, McCRIMMON PKWY. (SR 1635)

MATCH LINE SEE THIS SHEET

90' (TYP.)

-Y5-, McCRIMMON PKWY. (SR 1635)

END CONSTRUCTION
-Y5- STA. 36+65 ±

DRUM (TYP.)

SEE LOCAL NOTE 4

90' (TYP.)

MATCH LINE SEE TCP-11

TYPE III BARRICADE (TYP.)

10' (TYP.)

-L-, DAVIS DR.

MATCH LINE SEE TCP-9

-L- STA. 62+50 ±

-Y5-, McCRIMMON PKWY. (SR 1635)

MATCH LINE SEE THIS SHEET

20 30 35 65 70 75 25

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For Division of Highways

APPROVED: Michael T. Klepka DATE: 5-3-06

SEAL

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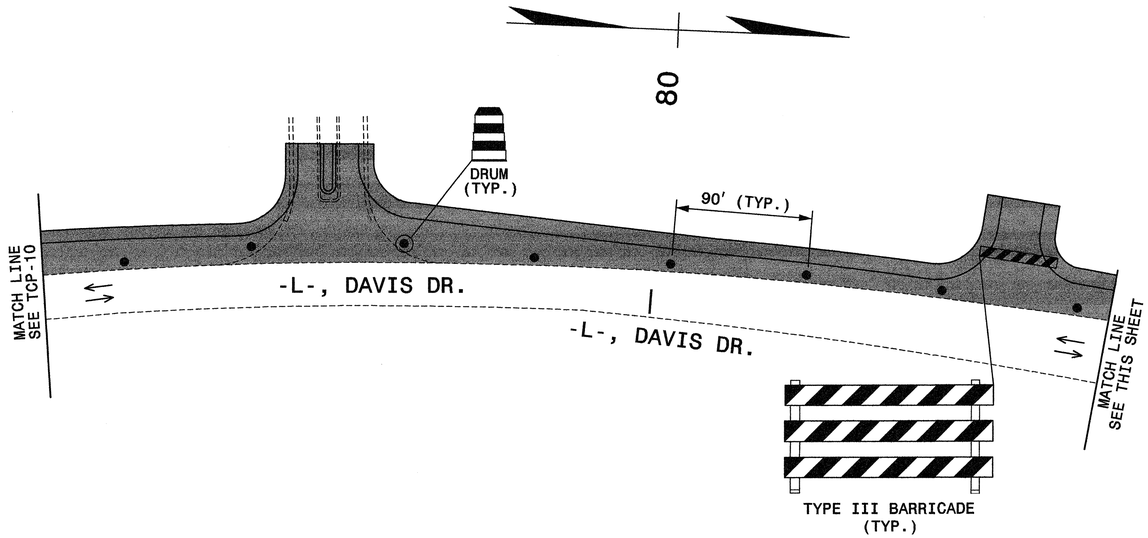
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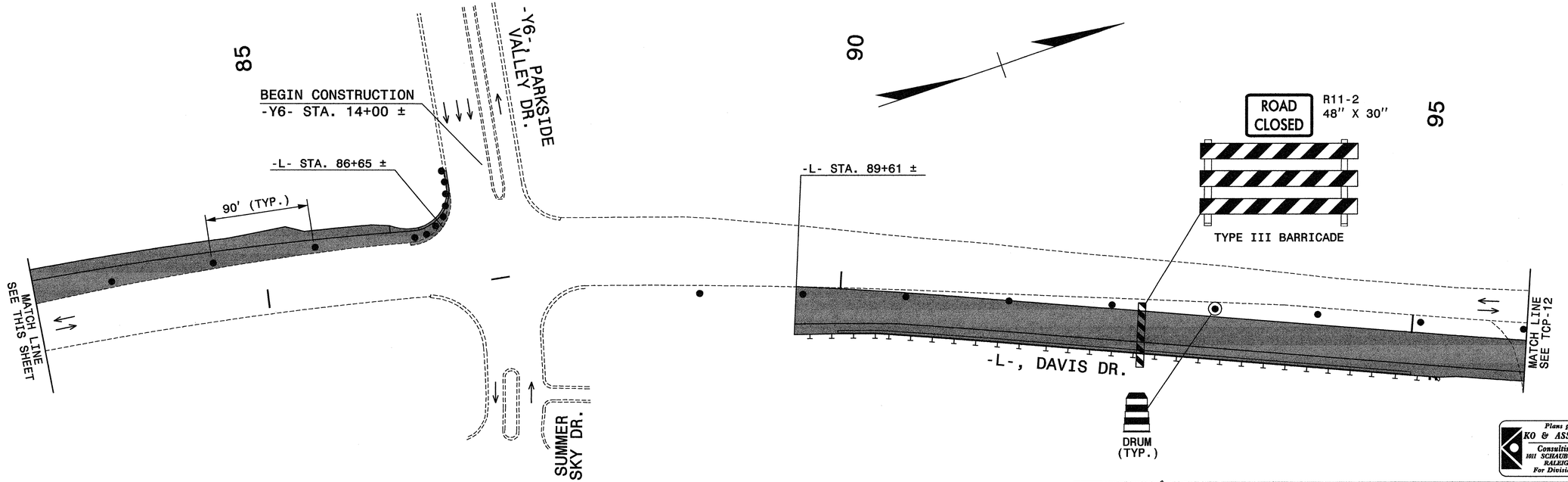
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-11





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PHASE I, DETAIL 1 (CONT'D.)

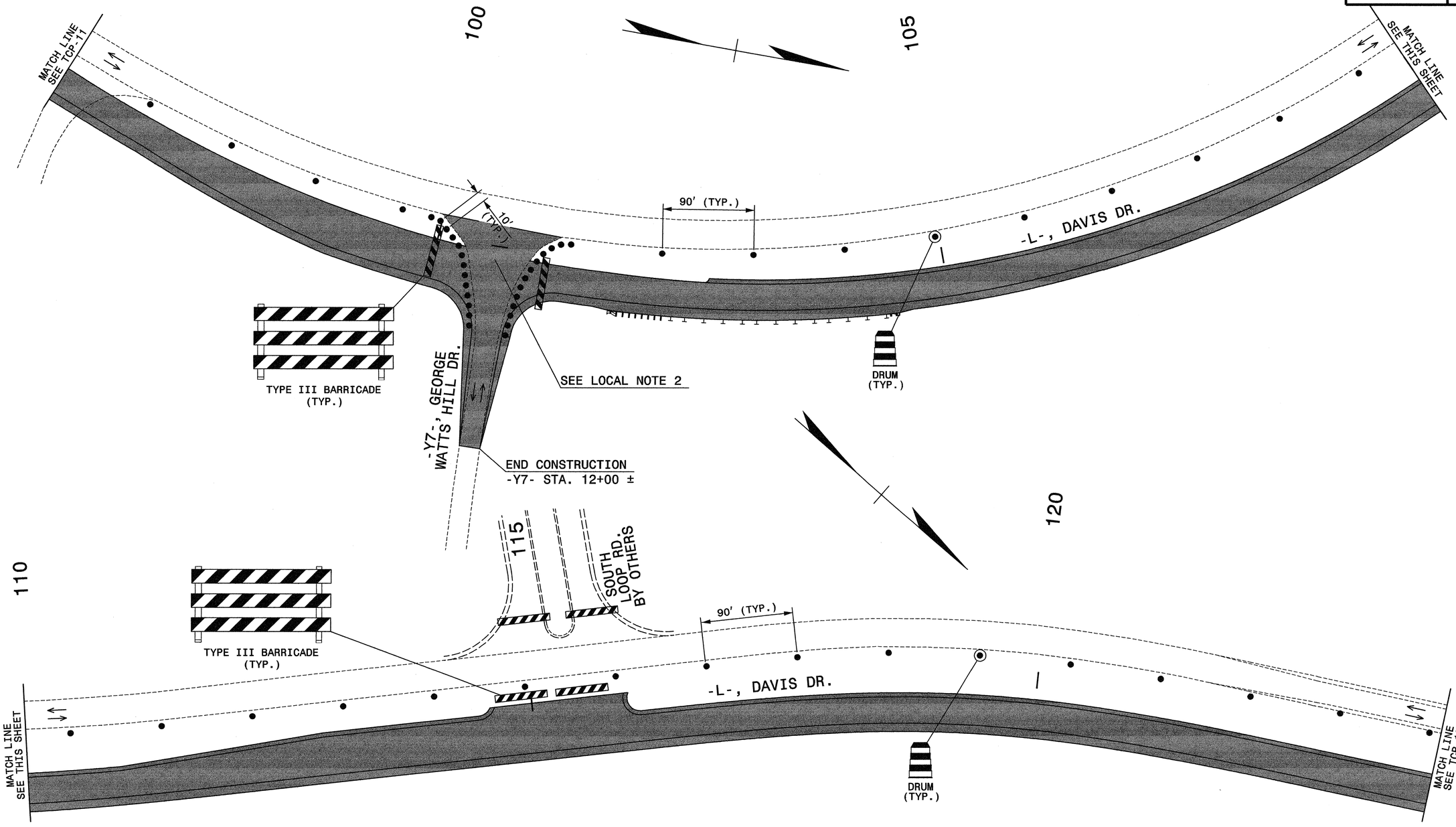
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-12



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SEAL

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PHASE I, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

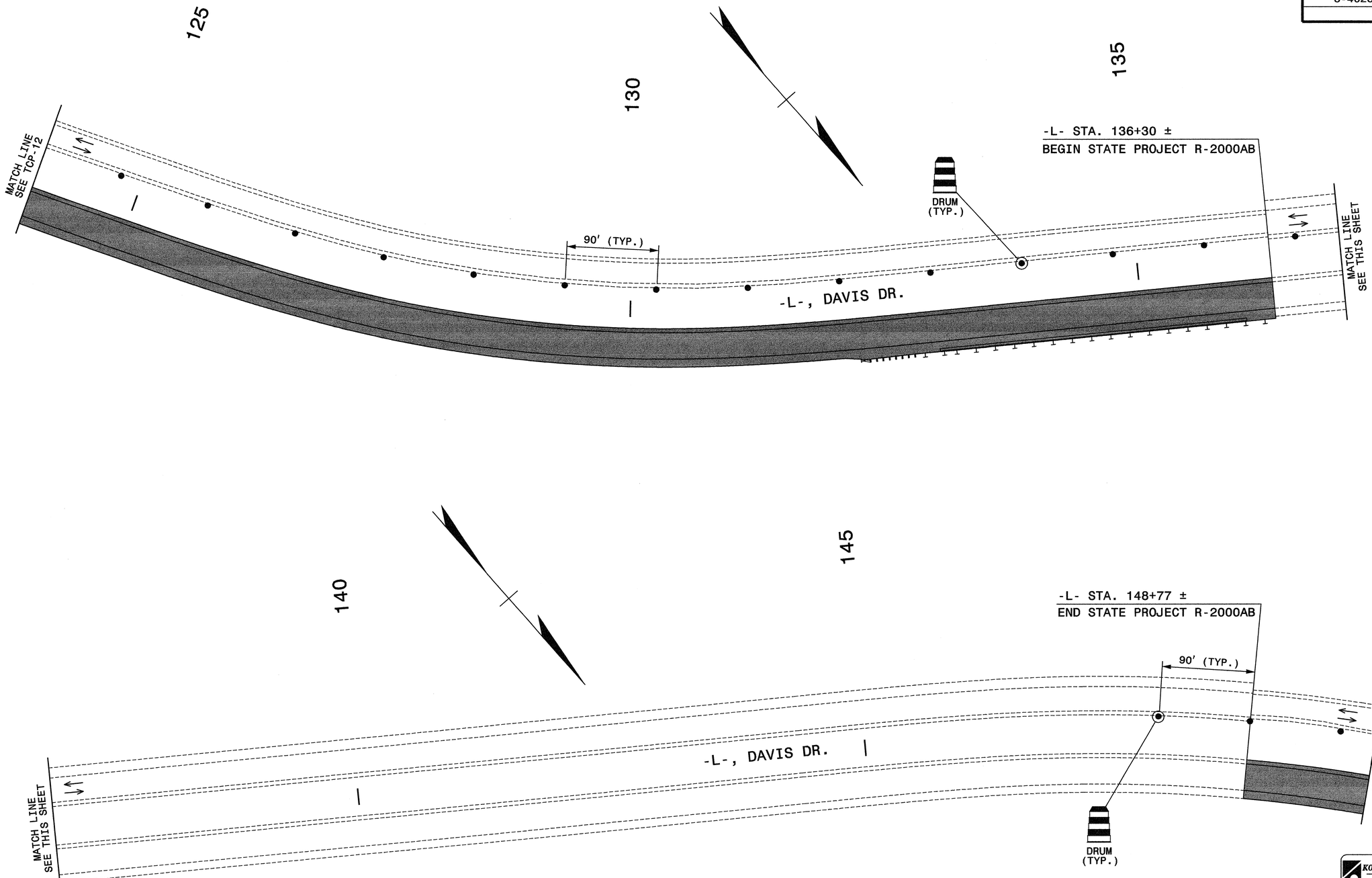
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-13



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For Division of Highways

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SEAL
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PHASE I, DETAIL 1 (CONT'D.)

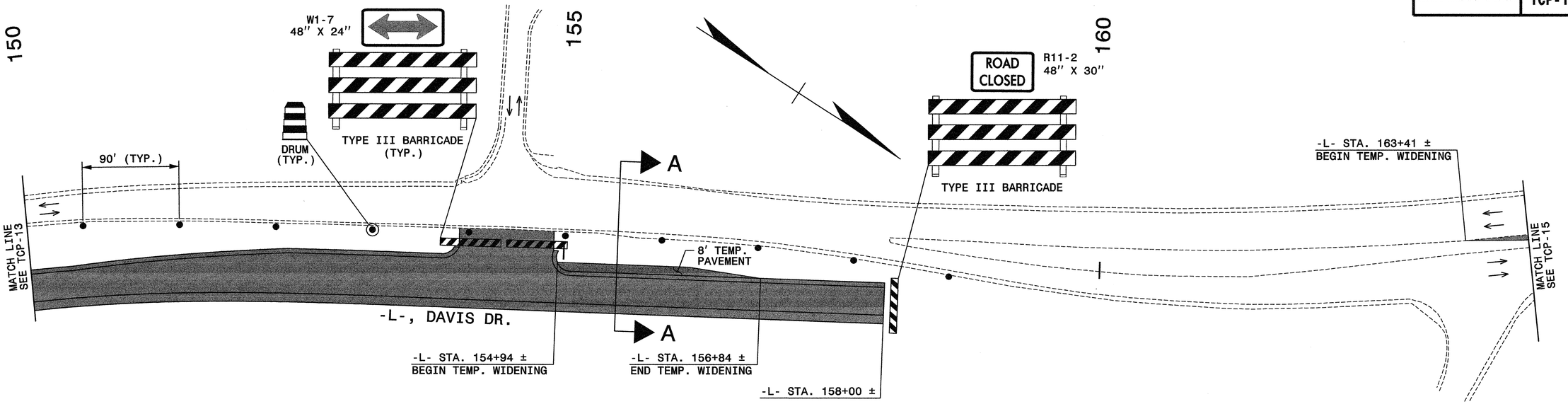
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REVIEWED BY:	M.S.A.

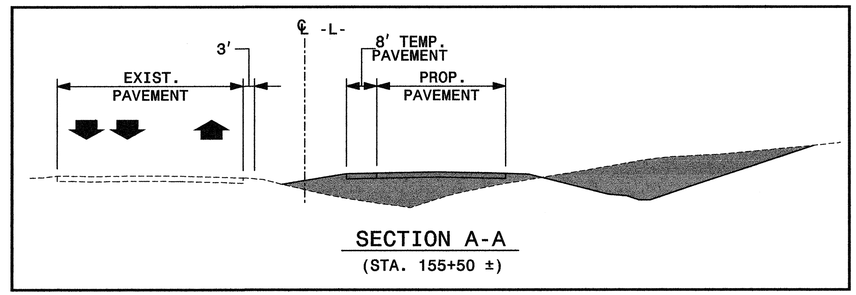
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REVISIONS	
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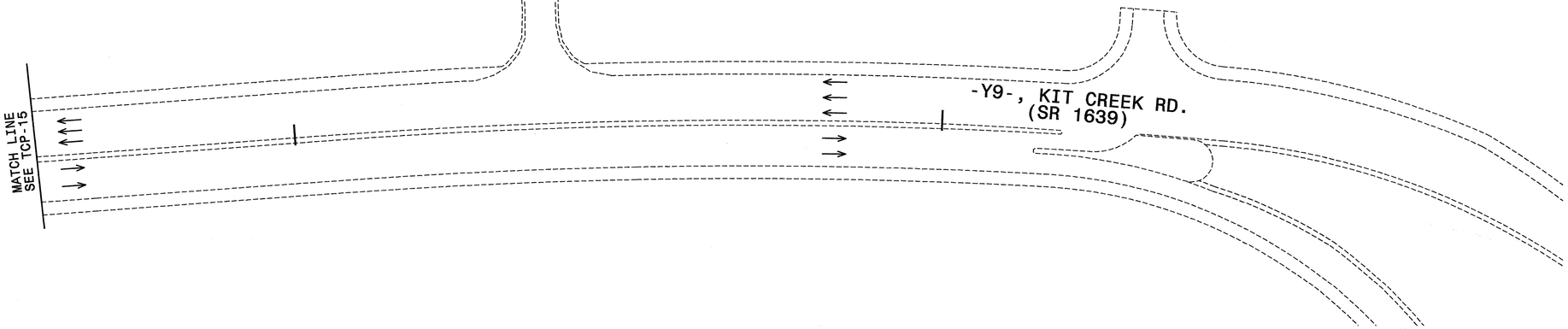
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-14





SECTION A-A
(STA. 155+50 ±)



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For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KLEPKA

PHASE I, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-15

BEGIN CONSTRUCTION
-Y9- STA. 10+00 ±

-Y9-, KIT CREEK RD. (SR 1639)

DRUM (TYP.)

90′ (TYP.)

MATCH LINE A SEE THIS SHEET

MATCH LINE B SEE THIS SHEET

MATCH LINE SEE TCP-16

-L-, DAVIS DR.

170

-Y9-, KIT CREEK RD. (SR 1639)

90′ (TYP.)

10′ (TYP.)

MATCH LINE SEE TCP-14

-L- STA. 166+47 ±
END TEMP. WIDENING

8′ TEMP. PAVEMENT

B

B

TYPE III BARRICADE

-Y9- STA. 20+00 ±

DRUM (TYP.)

-Y9- STA. 21+50 ±

165

MATCH LINE SEE TCP-14

MATCH LINE B SEE THIS SHEET

-Y9A-

-Y9A- STA. 10+00 ±

TYPE III BARRICADE

8′ TEMP. PAVEMENT

℄ -L-

EXIST. PAVEMENT

EXIST. PAVEMENT

SECTION B-B
(STA. 165+00 ±)

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Consulting Engineers
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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T Klepfer DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T KLEPFER

PHASE I, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-16

175

180

185

90' (TYP.)

10' (TYP.)

MATCH LINE SEE TCP-15

-L-, DAVIS DR.

MATCH LINE SEE THIS SHEET

R11-2
48" X 30"
ROAD CLOSED

TYPE III BARRICADE (TYP.)

-L- STA. 173+50 ±

DRUM (TYP.)

SEE LOCAL NOTE 3

PHIL SHARP DR.

190

195

C

90' (TYP.)

TYPE III BARRICADE (TYP.)

10' (TYP.)

20' TEMP. PAVEMENT

-L-, DAVIS DR.

C

SEE LOCAL NOTE 3

DRUM (TYP.)

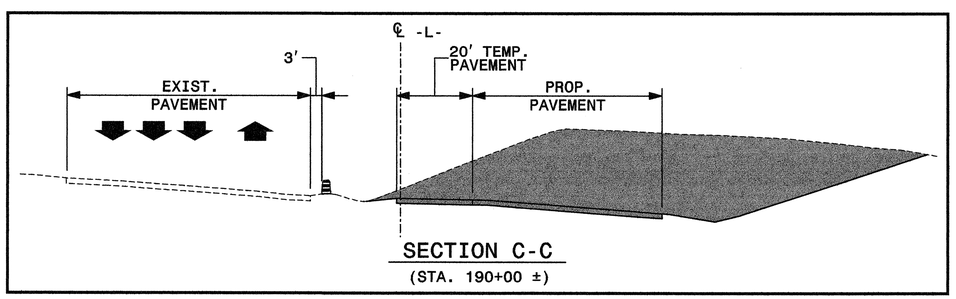
-L- STA. 194+19 ±
END TEMP. WIDENING

MATCH LINE SEE THIS SHEET

-L- STA. 189+44 ±
BEGIN TEMP. WIDENING

WALLY GILBERT DR.

MATCH LINE SEE TCP-17



SECTION C-C
(STA. 190+00 ±)

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KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Klepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KLEPKA

PHASE I, DETAIL 1 (CONT'D.)

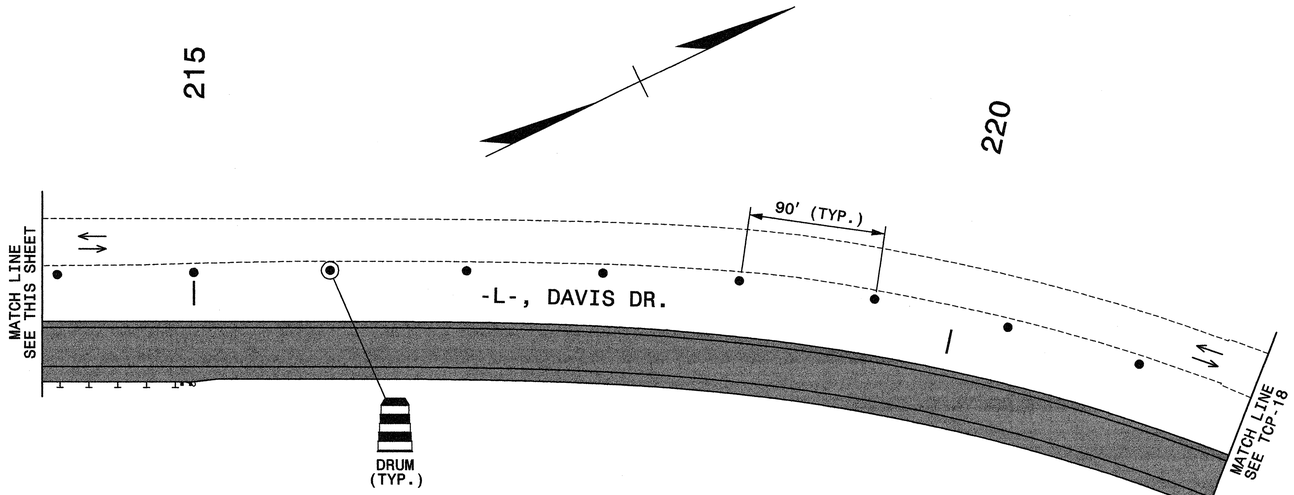
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

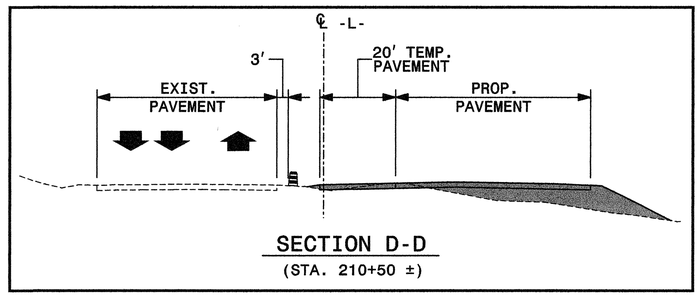
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL UNIT

REVISIONS	
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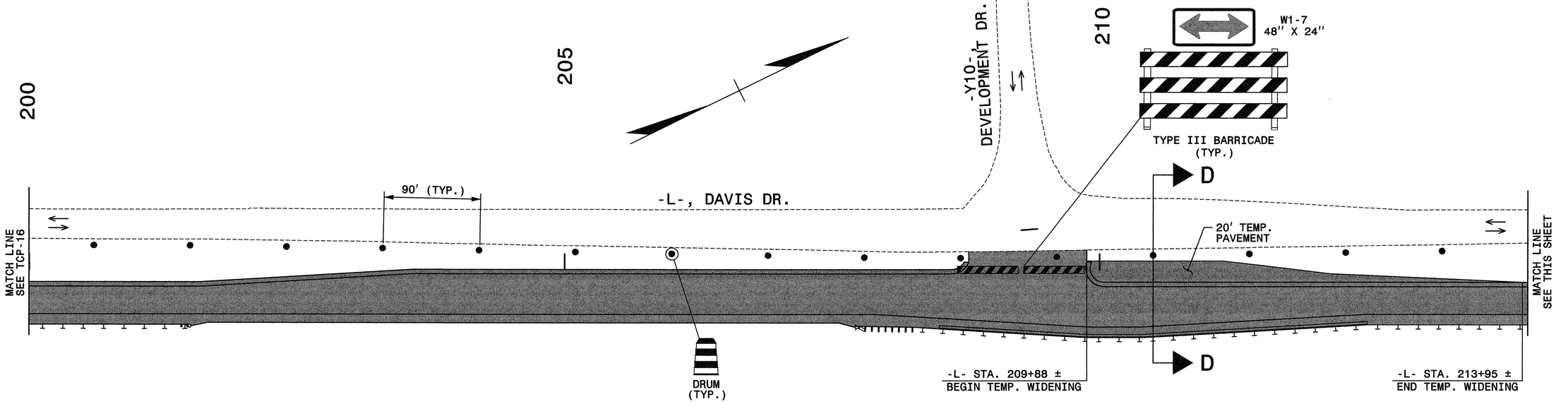
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-17





SECTION D-D
(STA. 210+50 ±)



APPROVED: Michael Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

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Consulting Engineers
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RALEIGH, N.C. 27606
For Division of Highways

PHASE I, DETAIL 1 (CONT'D.)

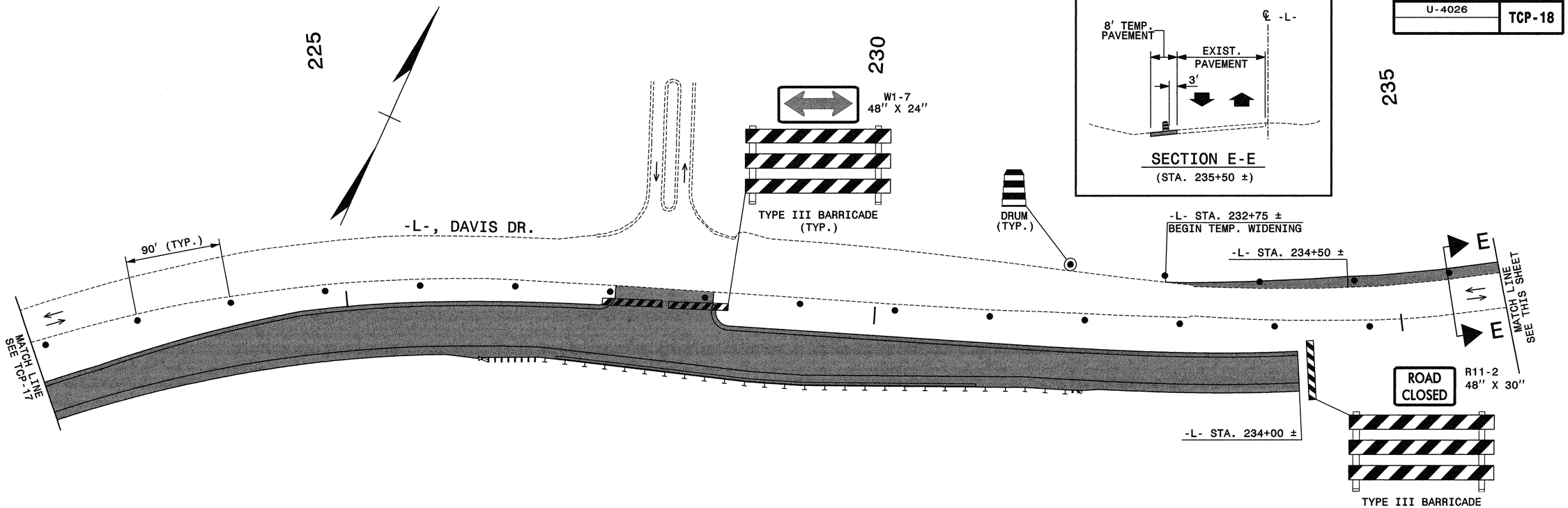
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

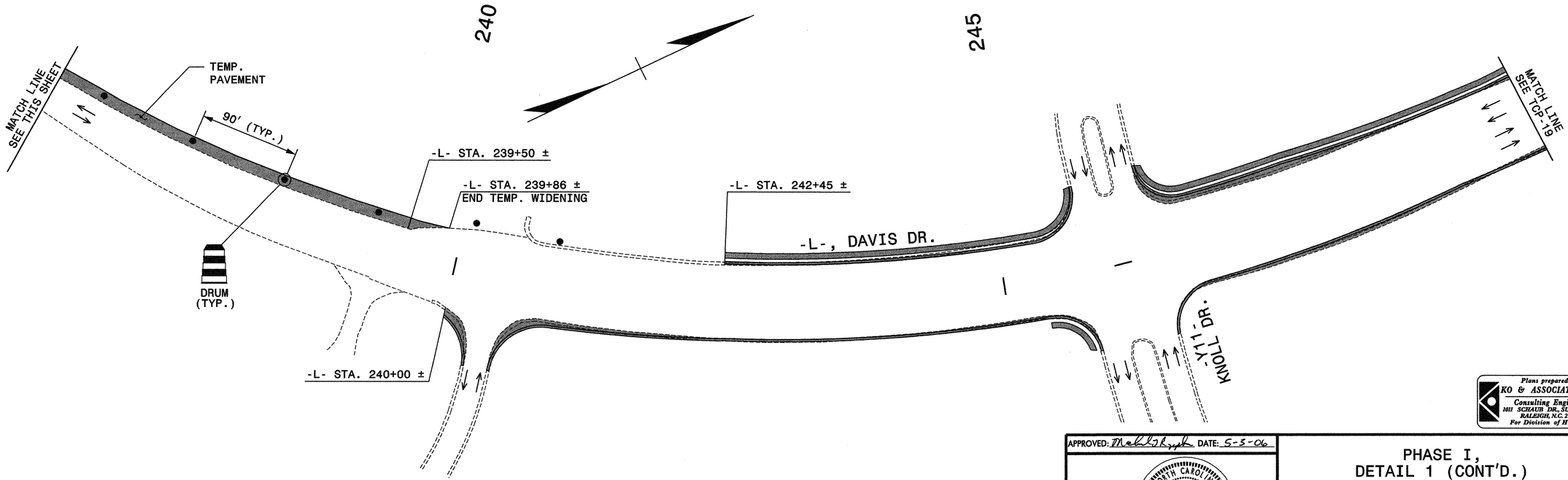
DIVISION OF HIGHWAYS
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DEPARTMENT OF TRANSPORTATION
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REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-18





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APPROVED: Michael Kiepke DATE: 5-5-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KIEPKE

PHASE I, DETAIL 1 (CONT'D.)

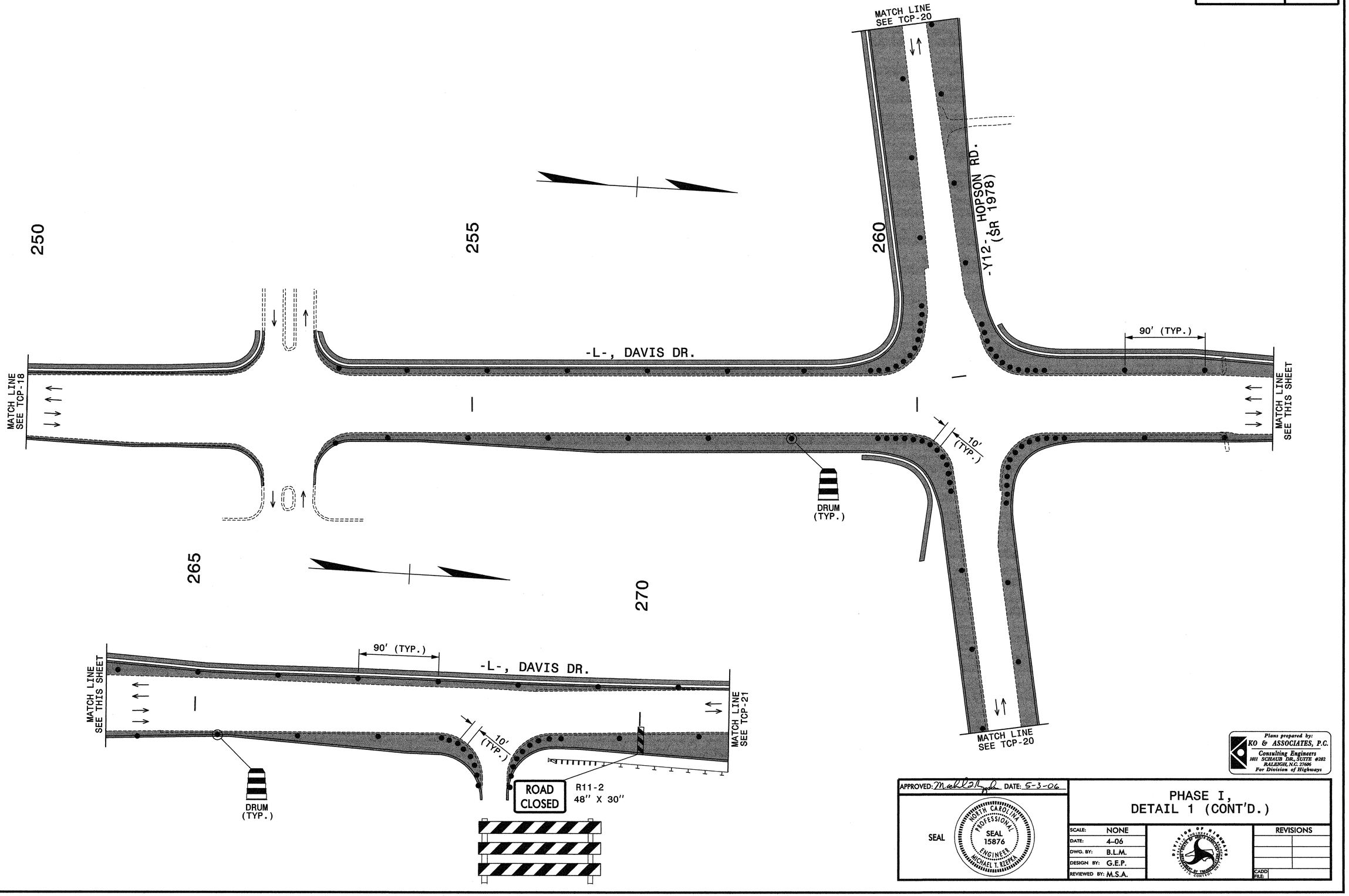
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-19



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SEAL
NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIEPKA

PHASE I, DETAIL 1 (CONT'D.)

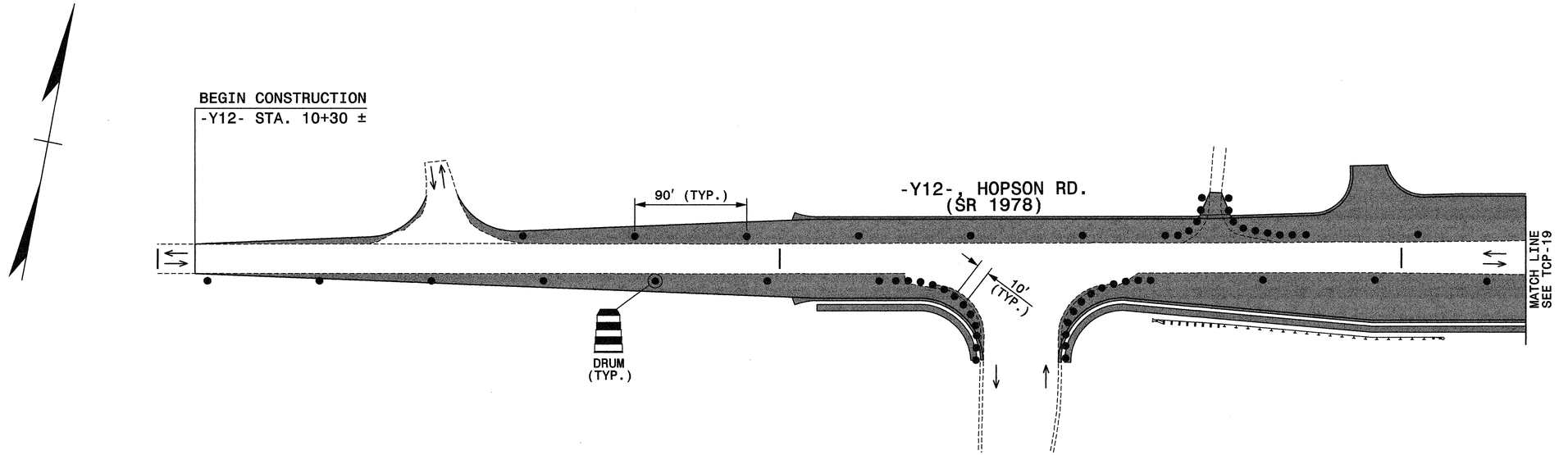
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

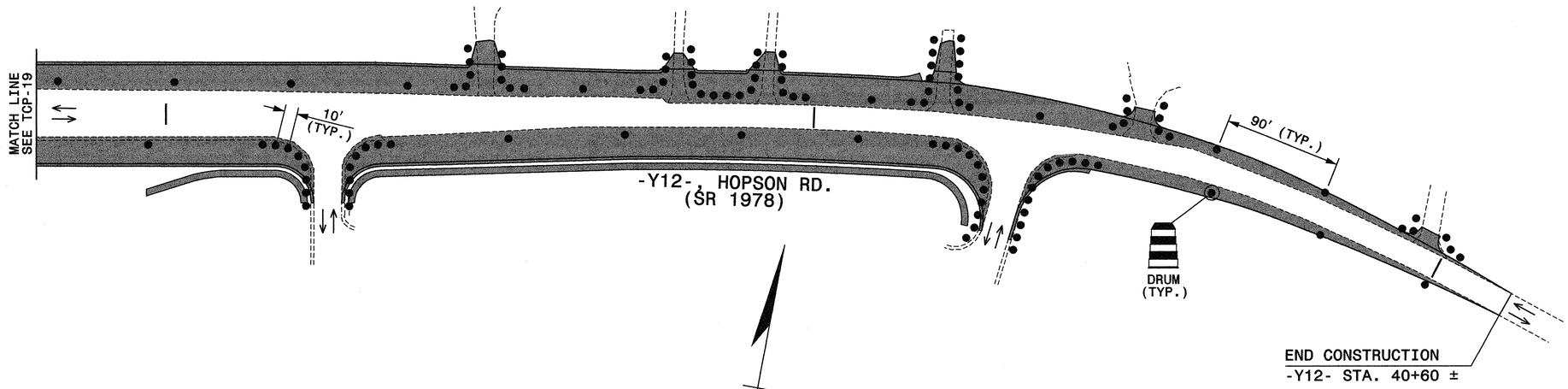
DIVISION OF HIGHWAYS
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REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-20





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For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE I, DETAIL 1 (CONT'D.)

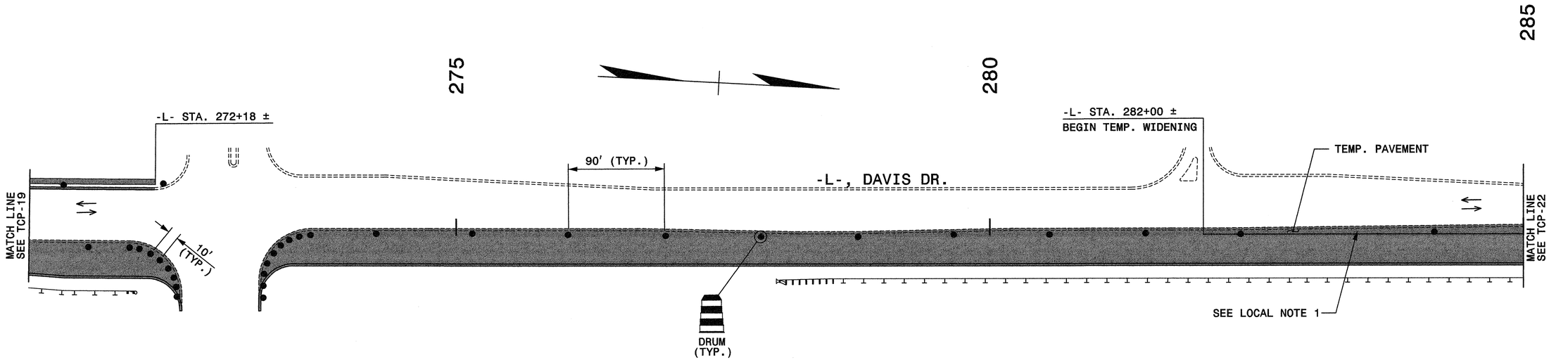
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-21



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For Division of Highways

APPROVED: Michael T. Kiepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KIEPKA

PHASE I, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
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REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH DESIGNED BY TRAFFIC CONTROL

REVISIONS	
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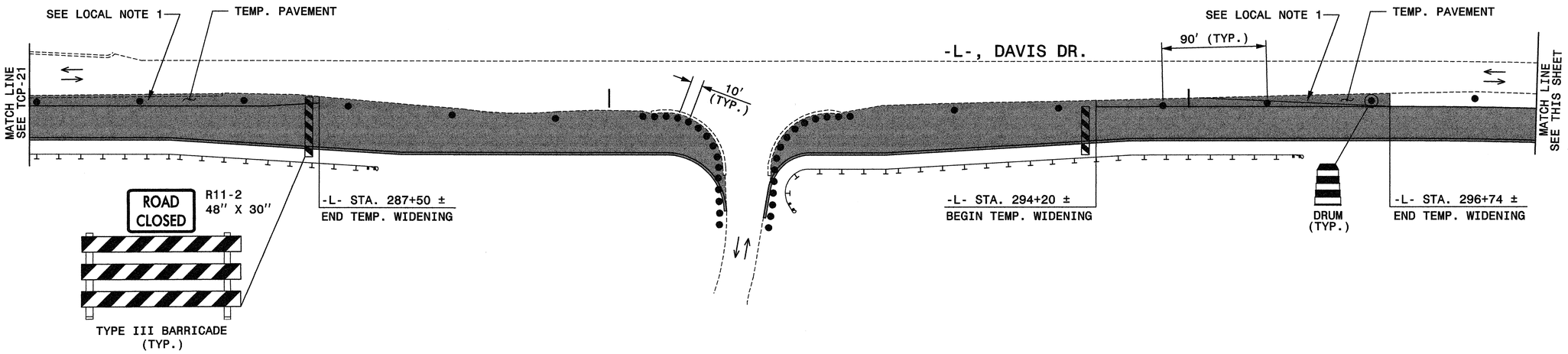
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U-4026	TCP-22

285

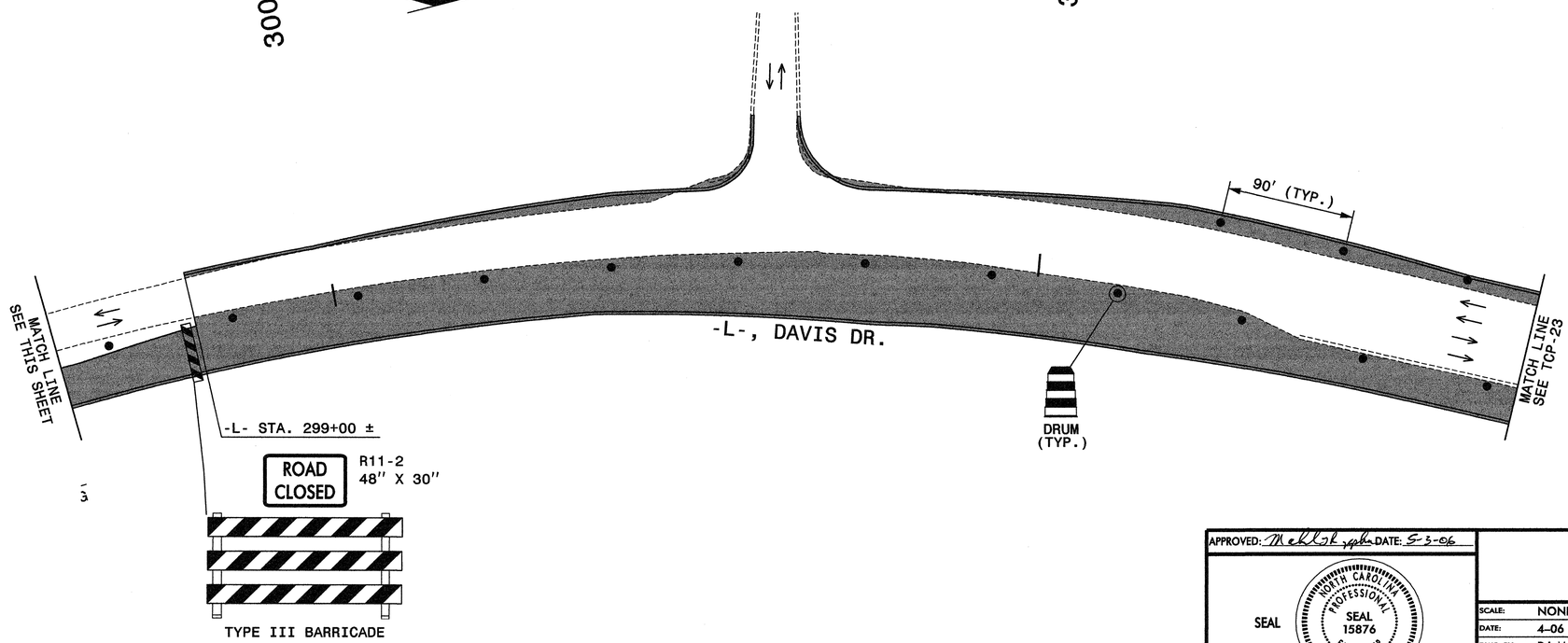
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295



300

305



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SEAL

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PHASE I, DETAIL 1 (CONT'D.)

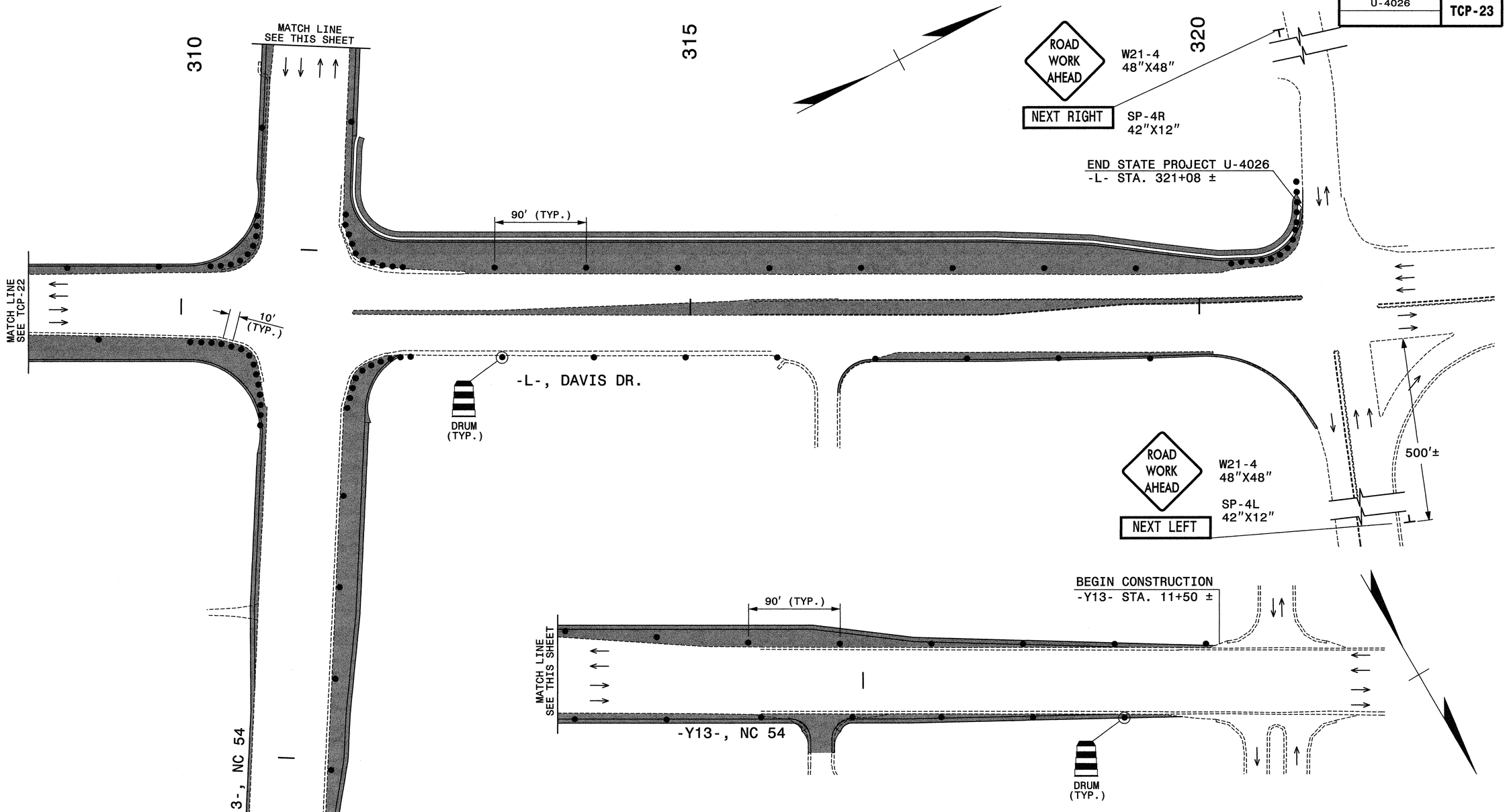
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DESIGN BY:	G.E.P.
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U-4026	TCP-23



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For Division of Highways

APPROVED: Michael T Reepha DATE: 8-22-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T REEPHA

PHASE I, DETAIL 1 (CONT'D.)

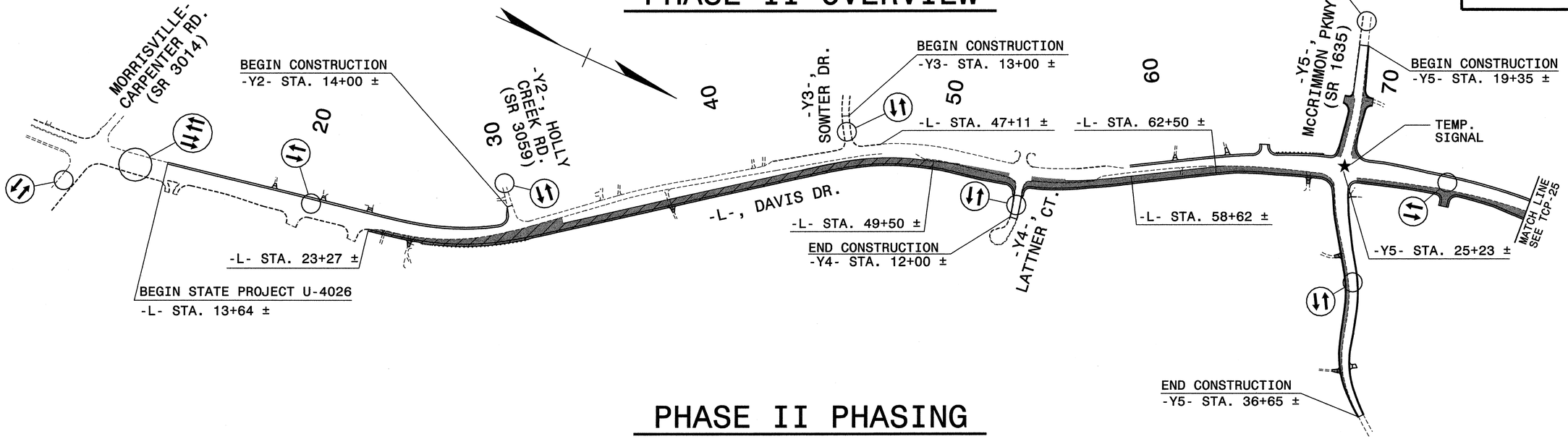
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-24

PHASE II OVERVIEW



PHASE II PHASING

STEP 1: CONTINUE CONSTRUCTION OF ALL WORK STARTED IN PHASE I.

STEP 2: USING ROADWAY STANDARD DRAWING 1101.02,SHEET 1 OF 9, IN ONE CONTINUOUS OPERATION INSTALL INTERIM PAVEMENT MARKING LINES, MARKERS AND MODIFY EXISTING MARKINGS TO SHIFT DAVIS DR. TRAFFIC INTO THE TEMPORARY ALIGNMENT FROM: (SECTIONS ARE INDEPENDENT OF EACH OTHER)

-L- STA. 58+62 ± TO -L- STA. 79+54 ± (TIEING INTO EXISTING MARKINGS). ACTIVATE TEMPORARY TRAFFIC SIGNAL AT -Y5- (SR 1635, McCRIMMON PKWY.) INTERSECTION AND OPEN ALL LANES UP TO TRAFFIC. (SEE SHEETS TCP-27 THROUGH TCP-29)

-L- STA. 233+00 ± TO -L- STA. 268+83 ± (TIEING INTO EXISTING MARKINGS) (REFER TO SHEETS TCP-33 THROUGH TCP-35). ACTIVATE TEMPORARY TRAFFIC SIGNAL AT -Y12- (SR 1978, HOPSON RD.) INTERSECTION AND OPEN ALL LANES UP TO TRAFFIC.

-Y5- STA. 25+23 ± TO -L- STA. 36+65 ± (TIEING INTO EXISTING MARKINGS) (SEE SHEET TCP-28).

COMPLETE THE WORK REQUIRED OF PHASE II, STEP 3 FROM 6:00 P.M. FRIDAY TO 6:00 A.M. MONDAY. (SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 3: USING ROADWAY STANDARD DRAWING 1101.02,SHEET 1 OF 9, PAVE/WEDGE 41' FROM EXISTING LEFT EDGE OF PAVEMENT UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -L- STA. 47+11 ± TO -L- STA. 58+62 ±. AT END OF PAVING OPERATION, INSTALL INTERIM PAVEMENT MARKING LINES, MARKERS AND MODIFY EXISTING MARKINGS TO SHIFT DAVIS DR. TRAFFIC INTO TEMPORARY ALIGNMENT AS SHOWN ON SHEET TCP-27.

STEP 4: CONSTRUCT THE FOLLOWING:

AWAY FROM TRAFFIC, CONSTRUCT THE RIGHT SIDE OF -L- (DAVIS DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM: (SEE LOCAL NOTE 1)

-L- STA. 49+50 ± TO -L- STA. 62+50 ±
(SEE SHEETS TCP-27 THROUGH TCP-28).
-L- STA. 234+00 ± TO -L- STA. 240+00 ±
(SEE SHEET TCP-33).

USING FLAGGER(S), CONSTRUCT -Y4- (LATTINER CT.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -Y4- STA. 10+00 ± TO -Y4- STA. 12+00 ±. (SEE SHEET TCP-27).

USING ROADWAY STANDARD DRAWING 1101.02,SHEET 1 OF 9, CONSTRUCT WIDENING ON RIGHT SIDE UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AT THE FOLLOWING LOCATIONS:

-L- STA. 62+50 ± TO -L- STA. 89+61 ±.
(SEE SHEETS TCP-28 THROUGH TCP-29).
-Y5- STA. 25+60 ± TO -L- STA. 36+65 ±
(SEE SHEET TCP-28).

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

COMPLETE THE WORK REQUIRED OF PHASE II, STEP 5 FROM 7:00 A.M. SATURDAY TO 7:00 A.M. SUNDAY. (SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 5: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, IN ONE CONTINUOUS OPERATION INSTALL INTERIM PAVEMENT MARKING LINES, MARKERS AND MODIFY EXISTING MARKINGS TO SHIFT DAVIS DR. TRAFFIC INTO THE TEMPORARY ALIGNMENT FROM -L- STA. 154+95 ± TO -L- STA. 176+46 ± (TIEING INTO EXISTING MARKINGS) (REFER TO SHEETS TCP-30 THROUGH TCP-32). ACTIVATE TEMPORARY TRAFFIC SIGNAL AT -Y9- (SR 1639, KIT CREEK RD.) INTERSECTION AND OPEN ALL LANES UP TO TRAFFIC.

STEP 6: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9 AND DRUMS, REMOVE EXISTING 4' CONCRETE ISLAND FROM THE CENTER OF -Y9- (SR 1639, KIT CREEK RD.) AND RECONSTRUCT UP TO EXISTING PAVEMENT ELEVATION BETWEEN -Y9- STA. 27+38 ± AND -Y9- STA. 32+63 ±. PLACE 4" DOUBLE YELLOW CENTER LINES TO TRACE THE LOCATION OF THE EXISTING ISLAND.

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

STEP 7: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, PAVE/WEDGE EXISTING -Y9- (SR 1639, KIT CREEK RD.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -Y9- STA. 26+00 ± (SMOOTHLY TIE-IN TO EXISTING DAVIS DR. PAVEMENT) TO -Y9- STA. 34+63 ±.

STEP 8: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 3 OF 9 AND DRUMS, BEGIN CONSTRUCTION OF WIDENING ON LEFT SIDE OF -Y9- (SR 1639, KIT CREEK RD.) FROM -Y9- STA. 27+00 ± TO -Y9- STA. 34+63 ± AND RIGHT SIDE FROM -Y9- STA. 27+00 ± TO -Y9- STA. 32+63 ±.

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

STEP 9: AWAY FROM TRAFFIC, CONSTRUCT RIGHT SIDE OF -L- (DAVIS DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -L- STA. 158+00 ± TO -L- STA. 173+50 ± (SEE SHEETS TCP-30 THROUGH TCP-32).

AWAY FROM TRAFFIC, CONSTRUCT TEMPORARY WIDENING OF PROPOSED RIGHT SIDE OF -L- (DAVIS DR.) FROM -L- STA. 167+52 ± TO -L- STA. 171+57 ± (SEE LOCAL NOTE 1 AND SHEET TCP-31, SECTION F-F).

REMOVE LANE CLOSURE AT THE END OF EACH WORKDAY.

STEP 10: COMPLETE CONSTRUCTION OF RIGHT SIDE OF -L- (DAVIS DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AND TEMPORARY WIDENING WHICH WAS STARTED IN PHASE I, STEP 3.

COMPLETE CONSTRUCTION OF WIDENING ALONG -L- (DAVIS DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE AND TEMPORARY WIDENING WHICH WAS STARTED IN PHASE I, STEP 7.

STEP 11: AWAY FROM TRAFFIC, INSTALL INTERIM PAVEMENT MARKING LINES, MARKERS ON THE COMPLETED RIGHT LANES WHICH CAN BE PLACED WITHOUT INTERFERING WITH EXISTING MARKINGS FROM -L- STA. 19+38 ± TO -L- STA. 311+24 ±. (SEE SHEETS TCP-39 THROUGH TCP-52).

INSTALL TEMPORARY TRAFFIC SIGNALS AT THE -Y9- (SR 1639, KIT CREEK RD.) INTERSECTION. (SEE SIGNAL PLANS AND SHEET TCP-46)

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kozpka DATE: 11-2-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KOZPKA

PHASE II PHASING AND OVERVIEW

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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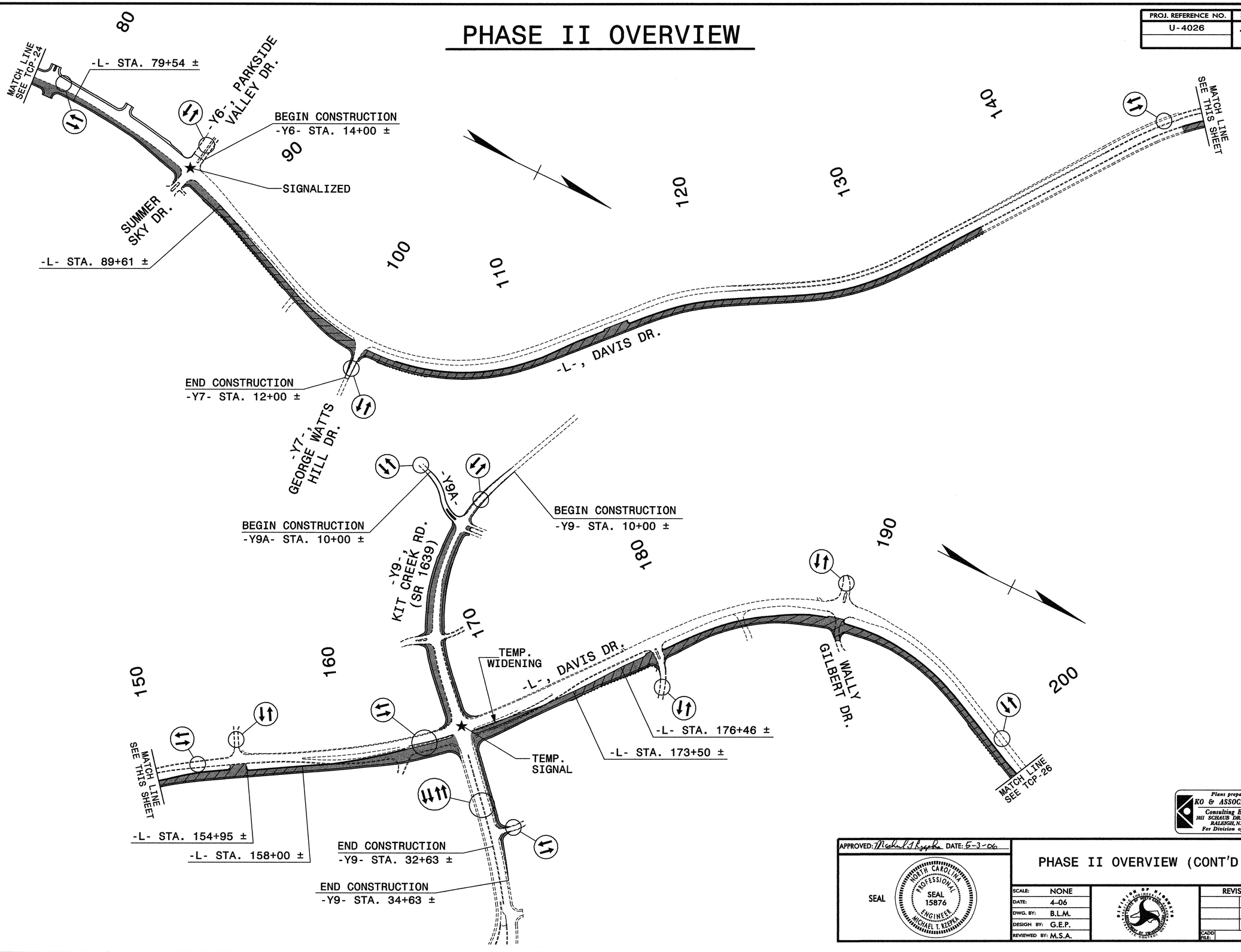
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PHASE II OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-25



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For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL
NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE II OVERVIEW (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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STATE OF NORTH CAROLINA

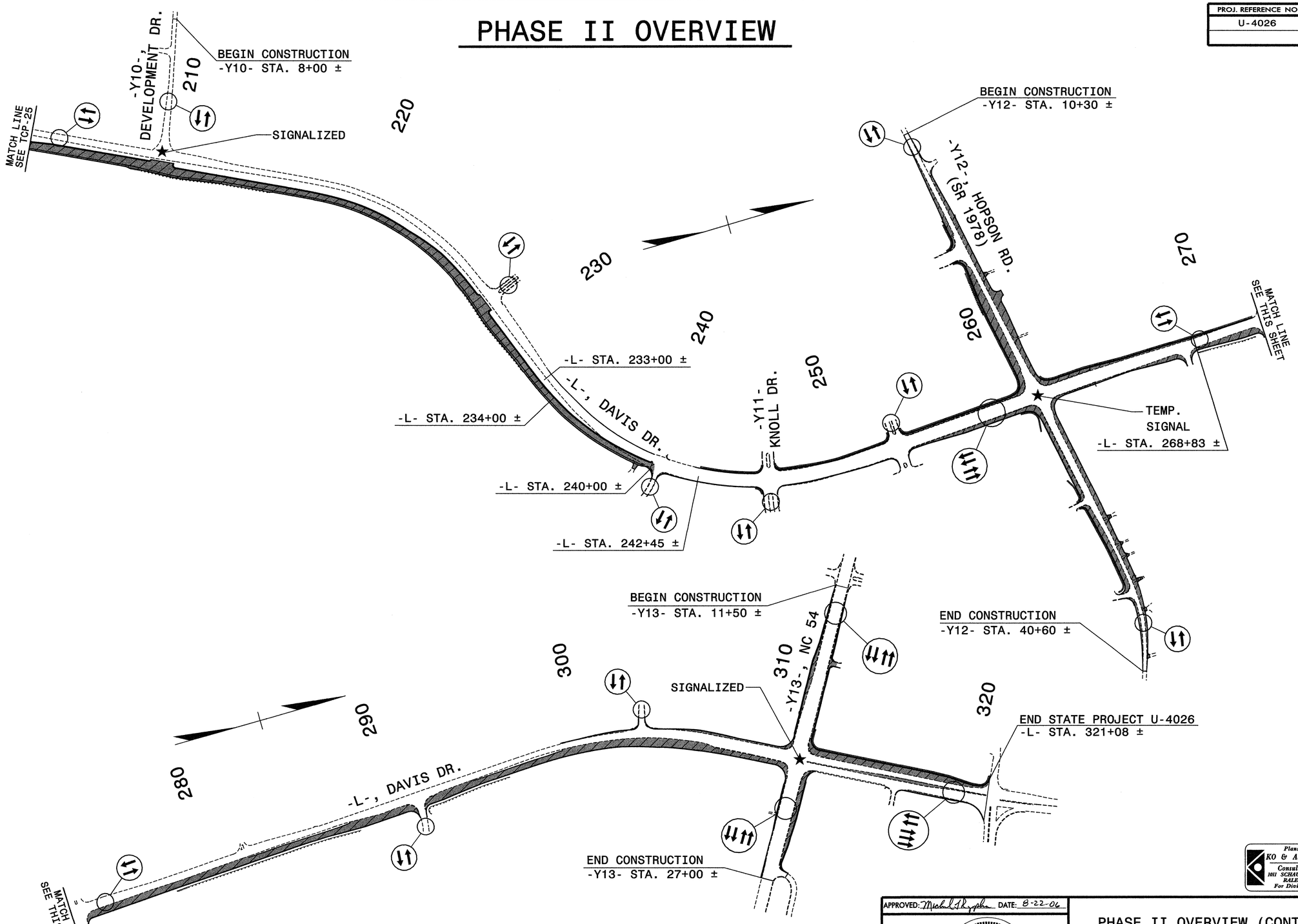
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PHASE II OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-26



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For Division of Highways

APPROVED: Michael T. Kzepka DATE: 8-22-06

SEAL

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PHASE II OVERVIEW (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-27

35

40

45

50

55

60

W1-7
48" X 24"

TYPE III BARRICADE
(TYP.)

-Y3-, SOWTER DR.

EXIST. MARKINGS

DRUM
(TYP.)

EXIST. MARKINGS
AND SYMBOLS

-L- STA. 47+11 ±
TIE TO EXIST. MARKINGS

PC
PV
PI
PA

VAR.
VAR.
VAR.
12'
12'
12'

MATCH LINE
SEE THIS SHEET

-L-, DAVIS DR.

90' (TYP.)

TYPE III BARRICADE
(TYP.)

-L- STA. 48+67 ±

-L- STA. 51+52 ±

-L- STA. 52+02 ±

-L- STA. 53+02 ±

-L- STA. 54+06 ±

-L- STA. 55+56 ±

-L- STA. 58+28 ±

-L- STA. 58+62 ±

-L- STA. 60+86 ±

PC
PV
PD
PI
QA
PE
PA
P4

12'
12'
12'
12' VAR.
12' VAR.

MATCH LINE
SEE THIS SHEET

-L- STA. 49+50 ±

90' (TYP.)

ROAD
CLOSED

R11-2
48" X 30"

TYPE III BARRICADE

10'
(TYP.)

-Y4- STA. 10+04 ±

STOP

R1-1
30" x 30"

15'
15'

-Y4-, LATTNER CT.

END CONSTRUCTION
-Y4- STA. 12+00 ±

-L-, DAVIS DR.

ROAD
CLOSED

R11-2
48" X 30"

TYPE III BARRICADE
(TYP.)

DRUM
(TYP.)

MATCH LINE
SEE TCP-28

Plans prepared by:
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Consulting Engineers
1011 SCHAUB DR., SUITE #202
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For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE II, DETAIL 1

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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TRAFFIC ENGINEERING BRANCH
NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-28

BEGIN CONSTRUCTION
-Y5- STA. 19+35 ±

-Y5-, McCRIMMON PKWY. (SR 1635)

MATCH LINE SEE THIS SHEET

12'
12'

PI
PA

-Y5-, McCRIMMON PKWY. (SR 1635)

90' (TYP.)

END CONSTRUCTION
-Y5- STA. 36+65 ±
TIE TO EXIST. MARKINGS

12'
12' VAR.
VAR.

DRUM (TYP.)

EXIST. MARKINGS

TYPE III BARRICADE (TYP.)

DRUM (TYP.)

-Y5- STA. 24+52 ±
TIE TO EXIST. MARKINGS

EXIST. MARKINGS AND SYMBOLS

-L- STA. 68+89 ±
TIE TO EXIST. MARKINGS

-L- STA. 69+89 ±

-L- STA. 70+89 ±

-L- STA. 72+22 ±

-L- STA. 74+22 ±

PE
PD

-L-, DAVIS DR.

10' (TYP.)

PA
PI
PV

MATCH LINE SEE TOP-27

12'
12'

90' (TYP.)

-L- STA. 62+50 ±

-L- STA. 65+69 ±

-L- STA. 66+69 ±

-L- STA. 67+82 ±

-L- STA. 68+02 ±

P4

QA
QC
QB
QD

-Y5- STA. 25+39 ±

-Y5- STA. 26+90 ±

-Y5-, McCRIMMON PKWY. (SR 1635)

-Y5- STA. 28+90 ±

MATCH LINE SEE THIS SHEET

MATCH LINE SEE TOP-29

12'
12'

65
70
25
35
75

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kiepke DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KIEPKE

PHASE II, DETAIL 1 (CONT'D.)

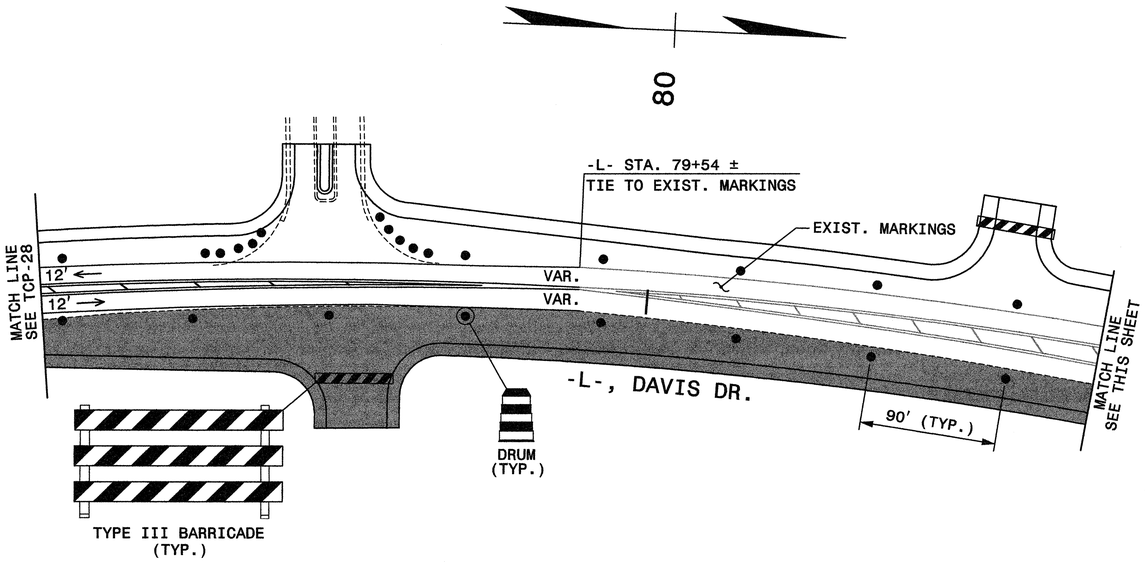
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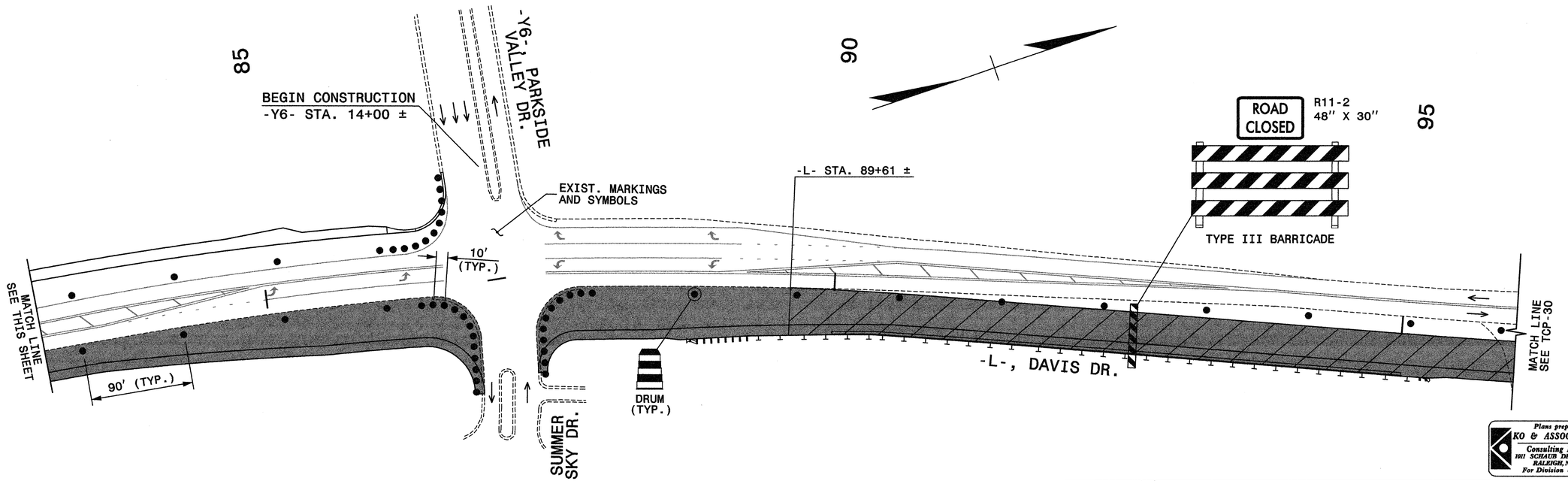
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL UNIT

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-29





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For Division of Highways

APPROVED: Michael T Kiepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T KIEPKA

PHASE II, DETAIL 1 (CONT'D.)

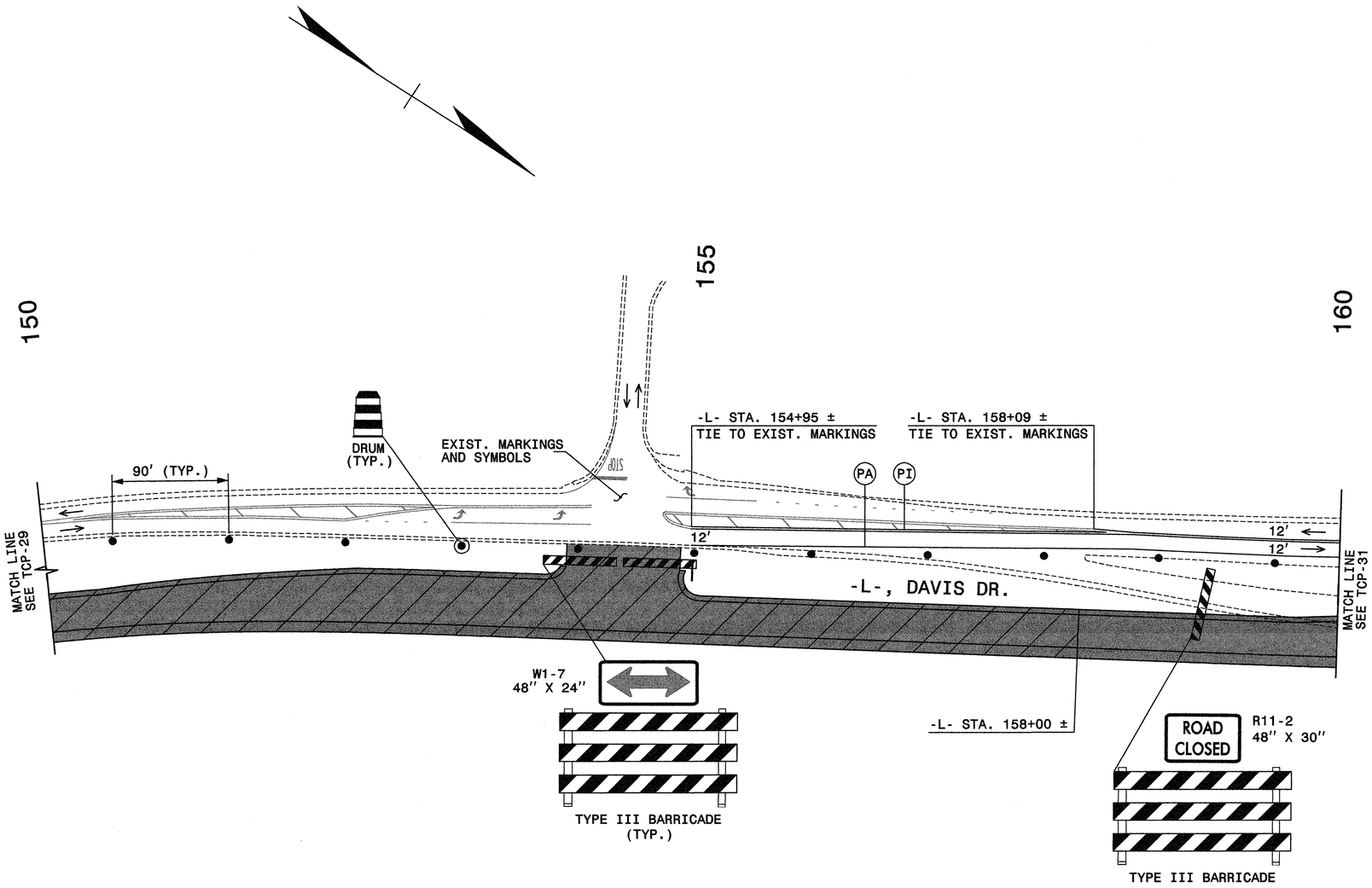
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION — TRAFFIC ENGINEERING BRANCH — TRAFFIC CONTROL UNIT

REVISIONS	
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04/05/2006 01:54:38 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-30



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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Nzepa DATE: 5-3-06

SEAL

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PHASE II, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

REVISIONS	
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04/05/2006 01:55:52 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-31

160

165

170

-Y9- STA. 22+46 ±
TIE TO EXIST. MARKINGS

DRUM
(TYP.)

-L- STA. 161+53 ±

-L- STA. 163+98 ±

-L- STA. 166+49 ±

MATCH LINE
SEE TCP-30

12'
12'
12'
12'

PD
PA
PI
PE
QA
QC
P4

10'
(TYP.)

EXIST. MARKINGS
AND SYMBOLS

F

-L-, DAVIS DR.

-Y9-, KIT CREEK RD.
(SR 1639)

TYPE III BARRICADE
(TYP.)

EXIST. MARKINGS
AND SYMBOLS

-L- STA. 170+05 ±

-L- STA. 172+39 ±

90' (TYP.)

MATCH LINE
SEE TCP-32

22.5' TEMP.
PAVEMENT

F

-L- STA. 167+65 ±

-L- STA. 167+52 ±
BEGIN TEMP. WIDENING

-L- STA. 171+57 ±
END TEMP. WIDENING

-Y9- STA. 26+24 ±

-Y9- STA. 26+91 ±
TIE TO EXIST. MARKINGS

ONLY

ONLY

℄ -L-

3'

22.5' TEMP.
PAVEMENT

EXIST.
PAVEMENT

PROP.
PAVEMENT

EXIST.
PAVEMENT

SECTION F-F
(STA. 169+00 ±)

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For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA
PROFESSIONAL
SEAL
15876
ENGINEER
MICHAEL T. RZEPKA

PHASE II,
DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

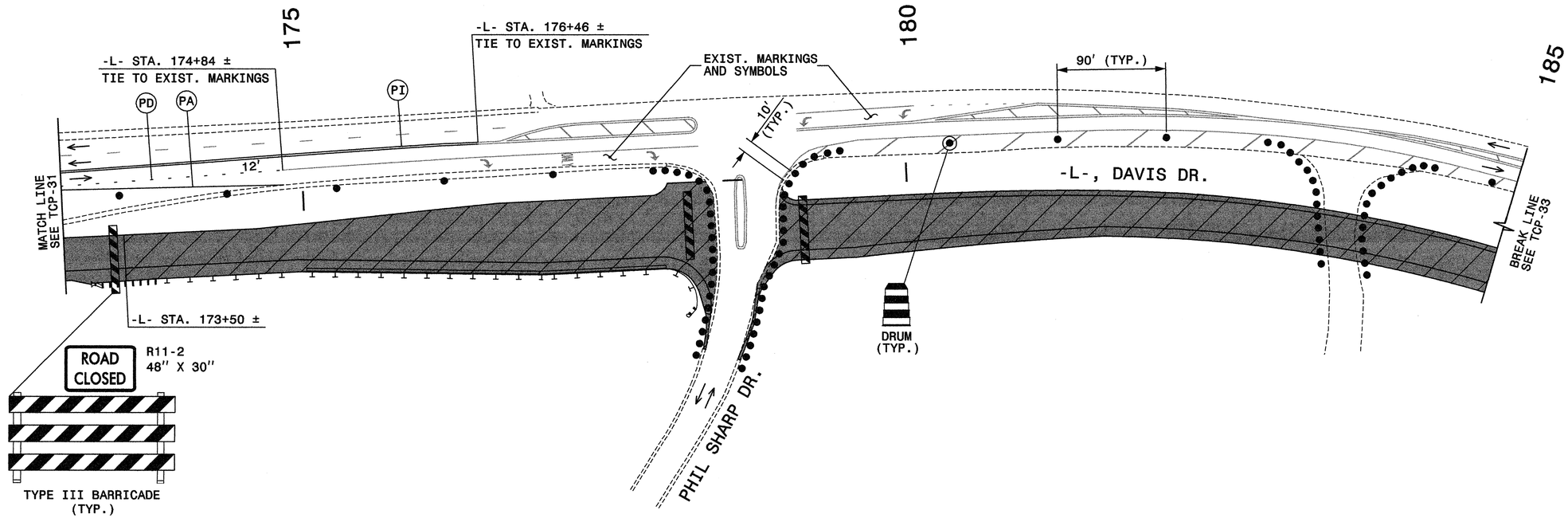
DIVISION OF HIGHWAYS
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STATE OF NORTH CAROLINA
CONTRACT

REVISIONS

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04/28/2006 04:53:54 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-32



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For Division of Highways

APPROVED: Michael T. Nzepa DATE: 5-3-06

SEAL

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PHASE II, DETAIL 1 (CONT'D.)

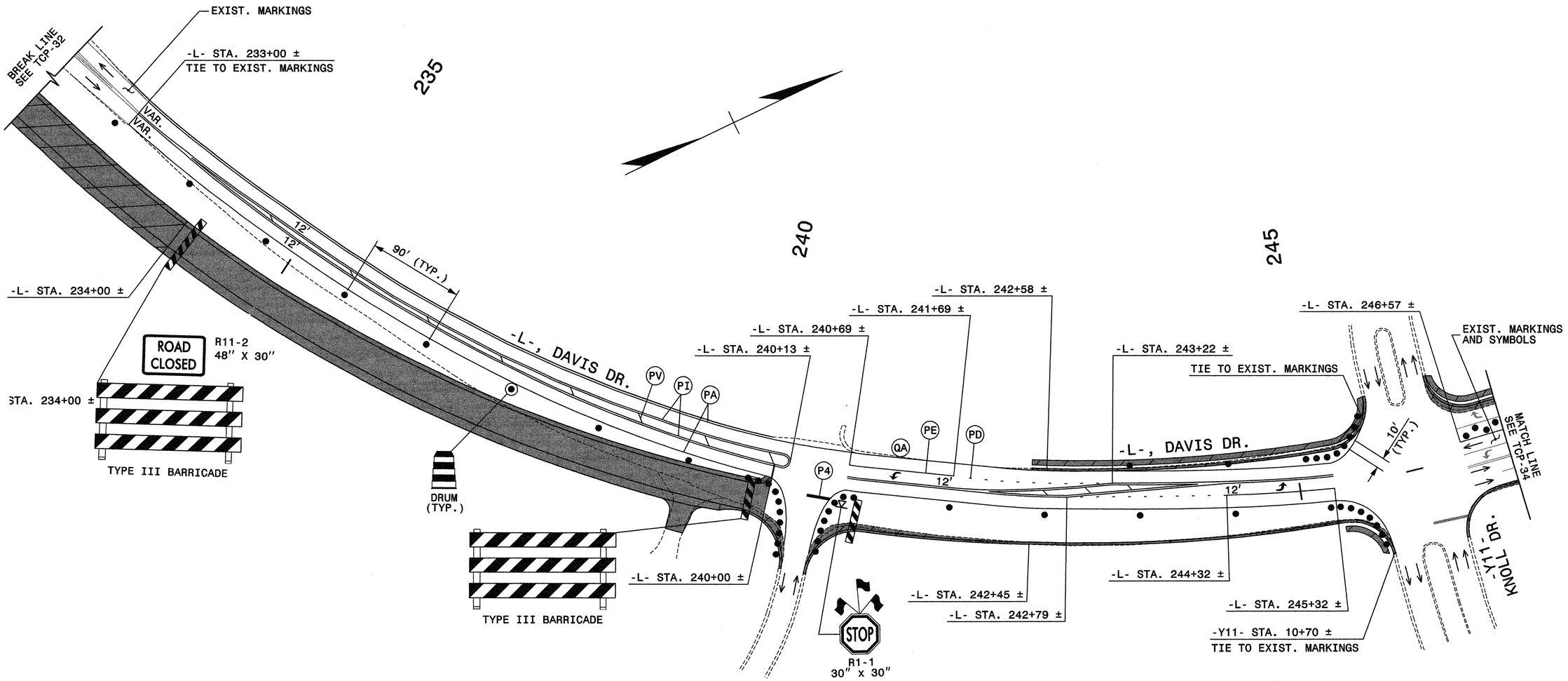
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC ENGINEERING CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-33



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04/05/2006 02:31:31 PM

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Consulting Engineers
1011 SCHAUB DR. SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael Kyzer DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. NZEWA

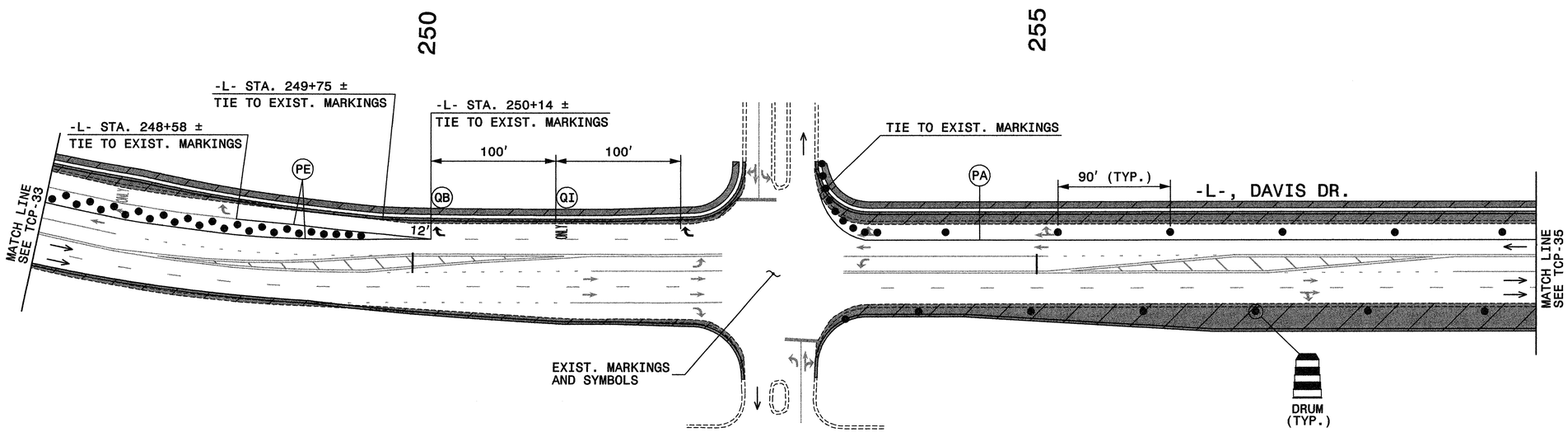
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-34



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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE II, DETAIL 1 (CONT'D.)

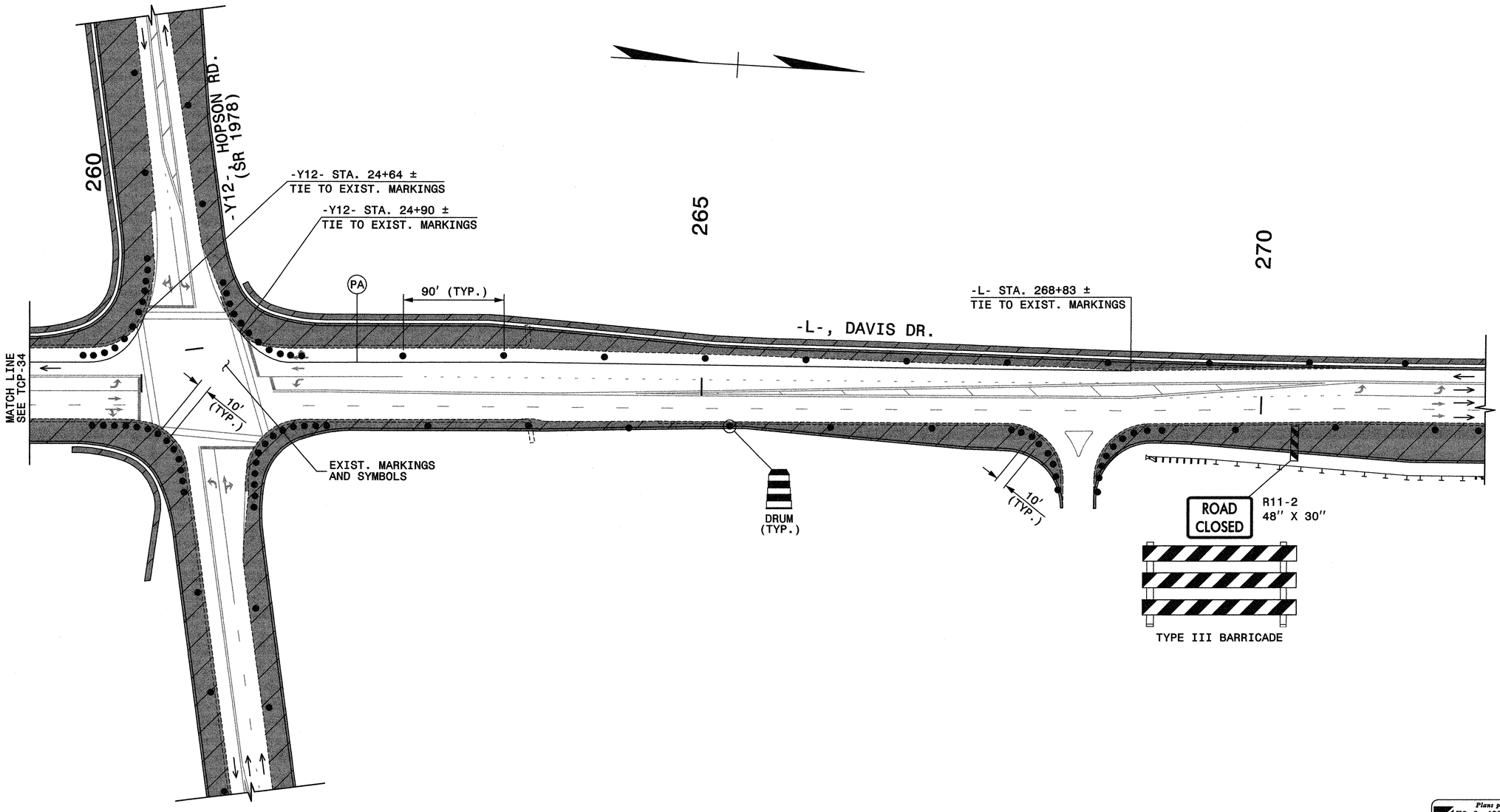
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

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REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-35



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04/05/2006 02:35:8 PM

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For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. NZEPKA

PHASE II, DEAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

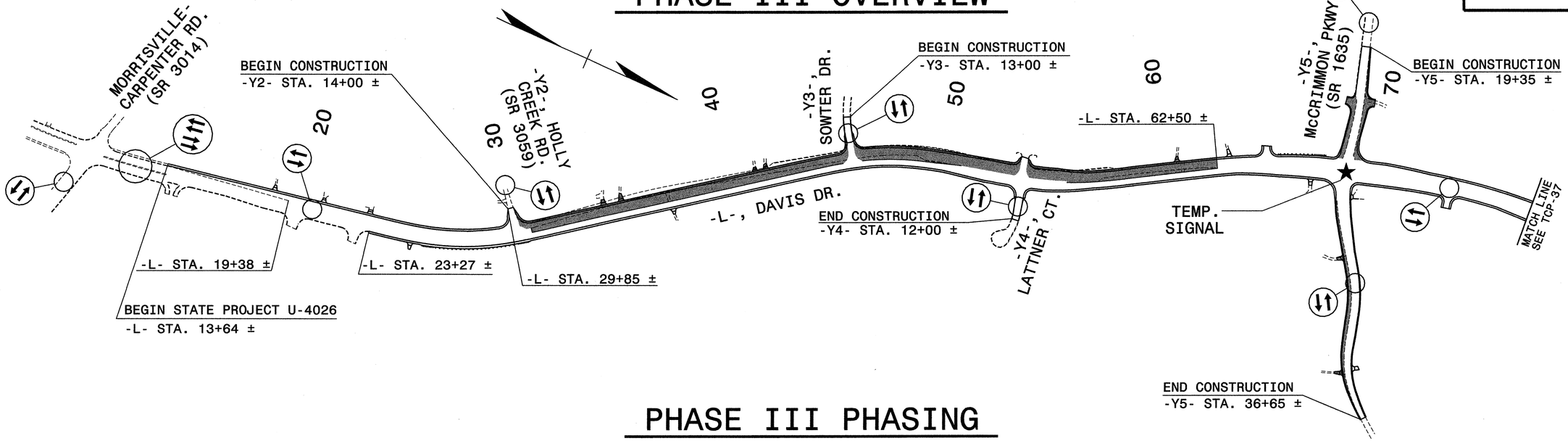
DIVISION OF HIGHWAYS ENGINEERING AND TRAFFIC ENGINEERING BRANCH TRAFFIC ENGINEERING BRANCH NORTH CAROLINA DEPARTMENT OF TRANSPORTATION TRAFFIC CONTROL

REVISIONS

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-36

PHASE III OVERVIEW



PHASE III PHASING

COMPLETE THE WORK REQUIRED OF PHASE III, STEP 1 FROM 6:00 P.M. FRIDAY TO 7:00 A.M. SUNDAY. (SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 1: USING ROADWAY STANDARD DRAWING 1101.02,SHEET 1 OF 9, AND/OR POLICE IN ONE CONTINUOUS OPERATION, INSTALL REMAINING INTERIM PAVEMENT MARKING LINES AND SYMBOLS AND MARKERS AND SHIFT DAVIS DR. TRAFFIC INTO THE TEMPORARY ALIGNMENT FROM -L- STA. 13+64 ± TO -L- STA. 311+24 ±. (SEE SHEETS TCP-39 THROUGH TCP-52).

REMOVE LANE CLOSURE AND ACTIVATE TEMPORARY TRAFFIC SIGNALS AT THE FOLLOWING INTERSECTIONS:

-L- AND -Y5- (SR 1635, McCRIMMONS PKWY.)
(SEE SIGNAL PLANS AND SHEET TCP-41)
-L- AND -Y6- (PARKSIDE VALLEY DR.)
(SEE SIGNAL PLANS AND SHEET TCP-42)
-L- AND -Y9- (SR 1639, KIT CREEK RD.)
(SEE SIGNAL PLANS AND SHEET TCP-46)
-L- AND -Y10- (DEVELOPMENT DR.)
(SEE SIGNAL PLANS AND SHEET TCP-48)

STEP 2: CONSTRUCT THE FOLLOWING:

AWAY FROM TRAFFIC, CONSTRUCT THE LEFT SIDE OF -L- (DAVIS DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE: (SEE LOCAL NOTE 1)

-L- STA. 29+85 ± TO -L- STA. 62+50 ±
(SEE SHEETS TCP-39 THROUGH TCP-41)
-L- STA. 87+23 ± TO -L- STA. 136+30 ±
(SEE SHEETS TCP-42 THROUGH TCP-44).
-L- STA. 148+77 ± TO -L- STA. 242+45 ±
(SEE SHEETS TCP-44 THROUGH TCP-49).
-L- STA. 285+66 ± TO -L- STA. 299+00 ±
(SEE SHEETS TCP-51 AND TCP-52).

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, PAVE/WEDGE AND CONSTRUCT WIDENING OF EXISTING -Y3- (SOWTER DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -Y3- STA. 13+00 ± TO -Y3- STA. 14+57 ±. (SEE SHEET TCP-40)

REPLACE PAVEMENT MARKINGS AND REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, PAVE/WEDGE AND CONSTRUCT WIDENING OF EXISTING -Y10- (DEVELOPMENT DR.) UP TO BUT NOT INCLUDING FINAL LAYER OF SURFACE COURSE FROM -Y10- STA. 8+00 ± TO -Y10- STA. 15+30 ±. (SEE SHEET 48)

REPLACE PAVEMENT MARKINGS AND REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

STEP 3: COMPLETE CONSTRUCTION OF -L- (DAVIS DR.) AND ALL -Y- LINES STARTED IN PHASES I AND II.

STEP 4: AWAY FROM TRAFFIC:

INSTALL INTERIM PAVEMENT MARKING LINES AND SYMBOLS ON THE COMPLETED LEFT LANES WHICH CAN BE PLACED WITHOUT INTERFERING WITH EXISTING MARKINGS FROM -L- STA. 10+78 ± TO -L- STA. 320+98 ± (SEE SHEETS TCP-56 THROUGH TCP-70).

INSTALL FINAL TRAFFIC SIGNALS AND MODIFY SIGNAL HEAD PLACEMENT TO ACCOMMODATE PHASE IV INITIAL INTERIM TRAFFIC PATTERN AT THE FOLLOWING INTERSECTIONS:

-L- AND -Y5- (SR 1635, McCRIMMON PKWY.)
(SEE SIGNAL PLANS AND SHEET TCP-58)
-L- AND -Y6- (PARKSIDE VALLEY DR.)
(SEE SIGNAL PLANS AND SHEET TCP-59).
-L- AND -Y9- (SR 1639, KIT CREEK RD.)
(SEE SIGNAL PLANS AND SHEET TCP-62).
-L- AND -Y10- (DEVELOPMENT DR.)
(SEE SIGNAL PLANS AND SHEET TCP-64).
-L- AND -Y12- (SR 1978, HOPSON RD.)
(SEE SIGNAL PLANS AND SHEET TCP-66).
-L- AND -Y13- (NC 54)
(SEE SIGNAL PLANS AND SHEET TCP-70).

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 11-3-06

SEAL
NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 15876 MICHAEL T. REPPA

PHASE III PHASING AND OVERVIEW

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — TRAFFIC ENGINEERING BRANCH — STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

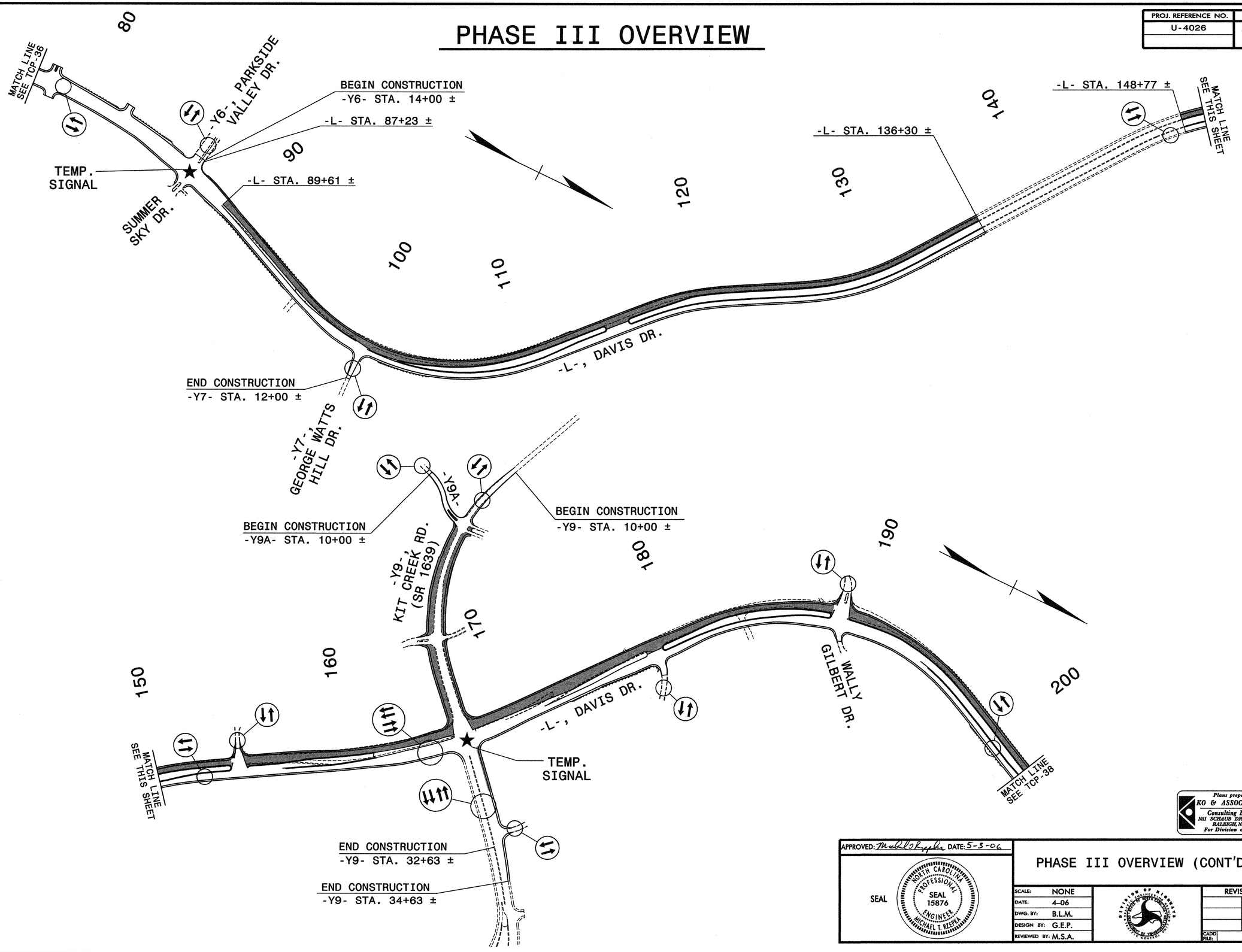
REVISIONS

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11/03/2006 09:28:37 AM

PHASE III OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-37



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KO & ASSOCIATES, P.C.
Consulting Engineers
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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE III OVERVIEW (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

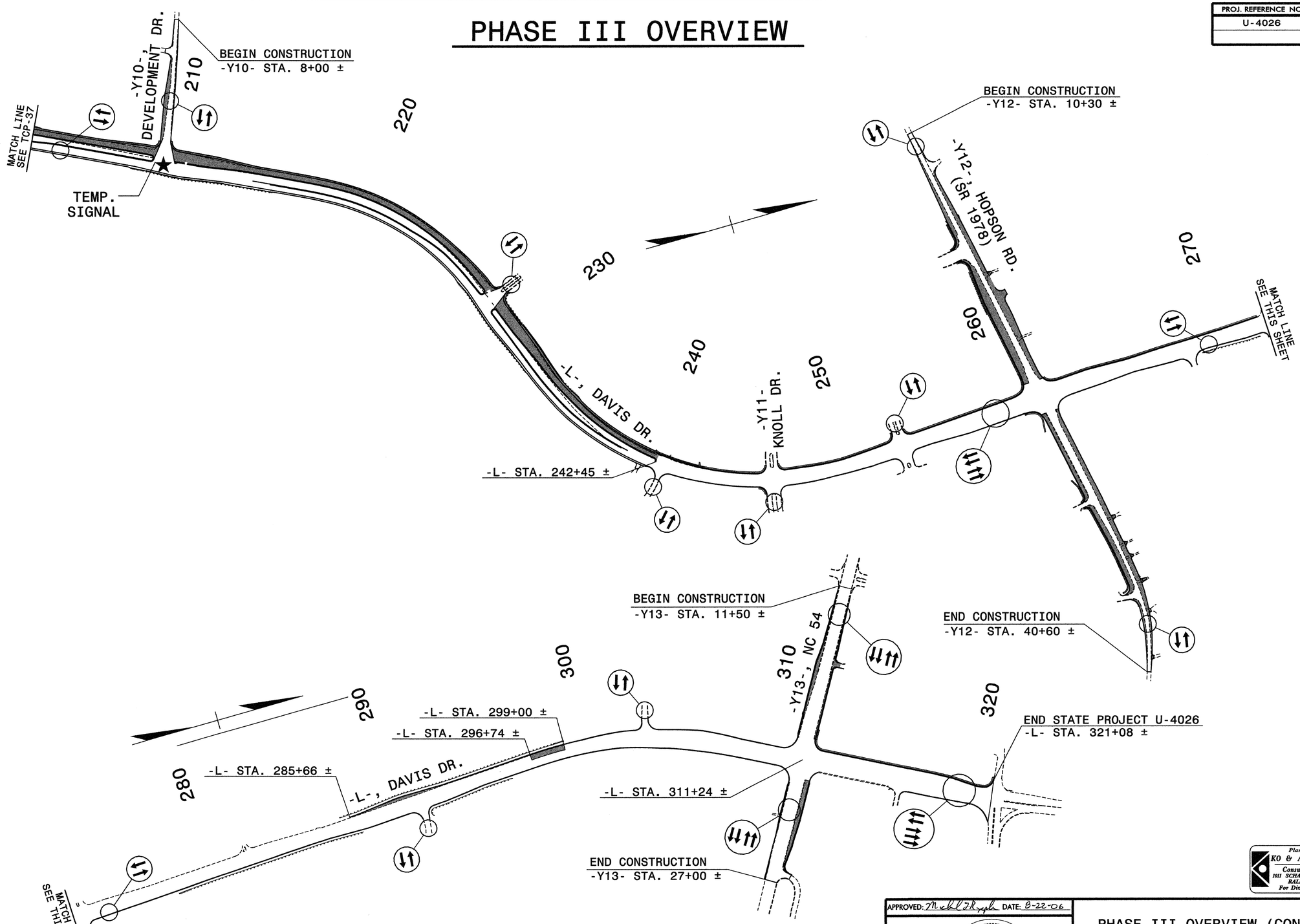
REVISIONS

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04/05/2006 02:58:50 PM

PHASE III OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-38



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For Division of Highways

APPROVED: Michael T. Rzepka DATE: 8-22-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE III OVERVIEW (CONT'D.)

SCALE:	NONE
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

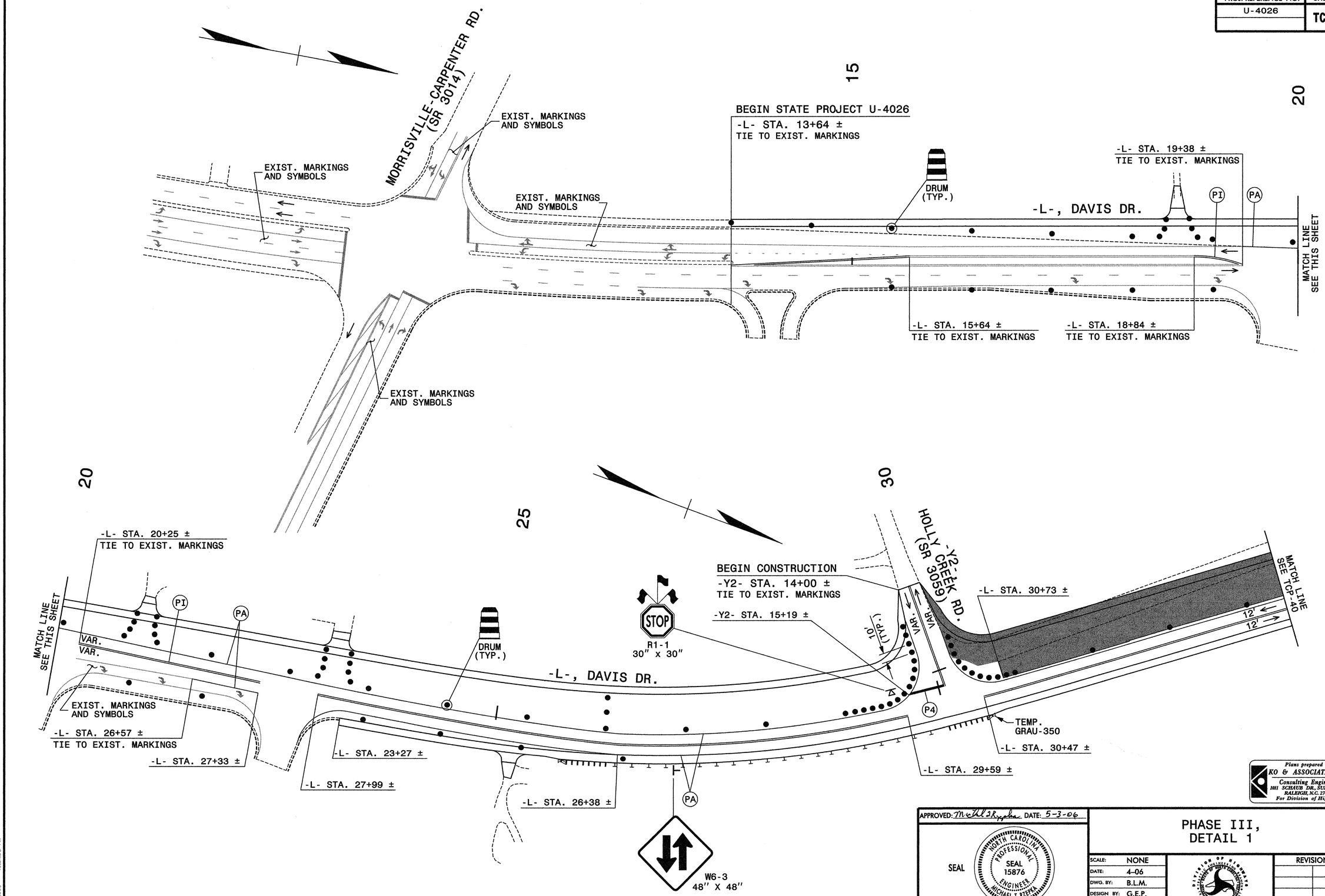
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-39



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For Division of Highways

APPROVED: Michael T. Kopka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KOPKA

PHASE III, DETAIL 1

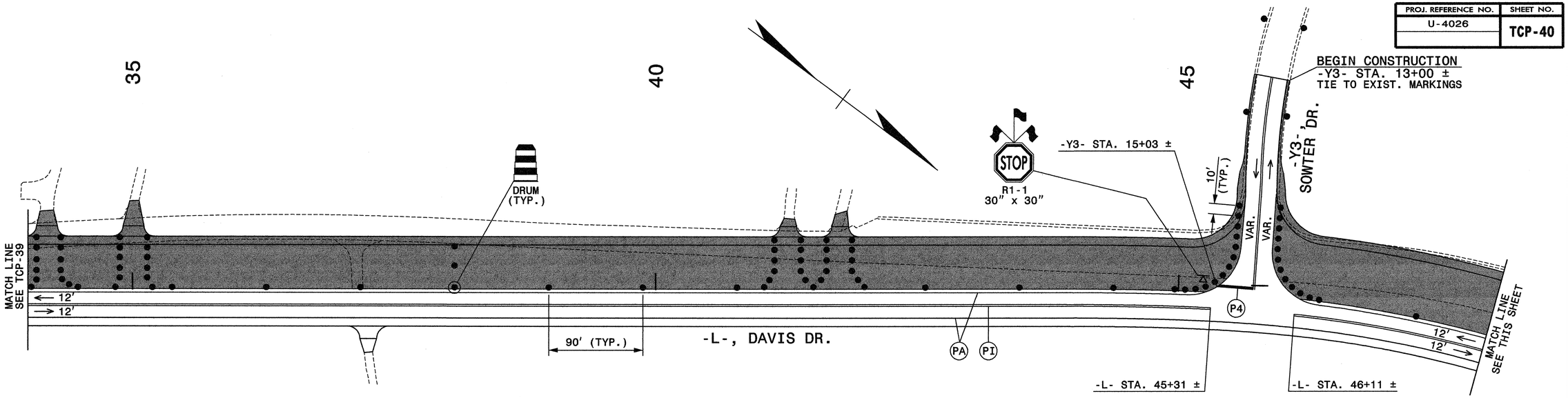
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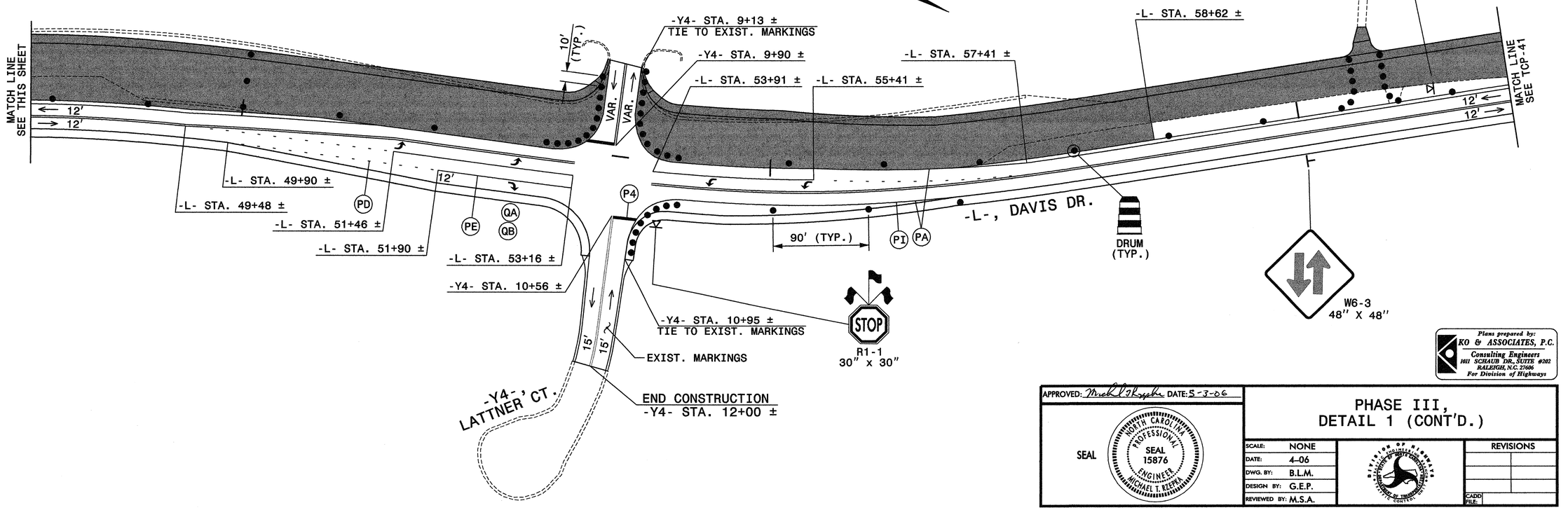
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-40





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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kozpka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE III, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

REVISIONS	
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04/05/2006 03:02:41 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-41

BEGIN CONSTRUCTION
-Y5- STA. 19+35 ±

-Y5-
McCRIMMON PKWY.
(SR 1635)

MATCH LINE
SEE THIS SHEET

EXIST. MARKINGS

-Y5-, McCRIMMON PKWY.
(SR 1635)

90' (TYP.)

END CONSTRUCTION
-Y5- STA. 36+65 ±

DRUM
(TYP.)

EXIST. MARKINGS
AND SYMBOLS

-L- STA. 67+82 ±

10'
(TYP.)

-L-, DAVIS DR.

TYPE III BARRICADE
(TYP.)

EXIST. MARKINGS
AND SYMBOLS

-L- STA. 74+22 ±
TIE TO EXIST. MARKINGS

MATCH LINE
SEE TCP-40

12'
12'
12'
12'
12'
12'

PA
PI
PD
PE
PV
PI
PA
QA
QC
QB

-L- STA. 62+50 ±
-L- STA. 63+36 ±
-L- STA. 65+49 ±
R=1052'
-L- STA. 68+02 ±
TIE TO EXIST. MARKINGS

EXIST. MARKINGS
AND SYMBOLS

EXIST. MARKINGS
AND SYMBOLS

90' (TYP.)

MATCH LINE
SEE TCP-42

-Y5-, McCRIMMON PKWY.
(SR 1635)

MATCH LINE
SEE THIS SHEET

65
70
20
30
35
25
75

P:\TRAFFIC\U-4026\002 V8 Files\PLANS\PH303.dgn
04/05/2006 03:02:49 PM

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Consulting Engineers
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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL
NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIZZUKA

PHASE III, DETAIL 1 (CONT'D.)

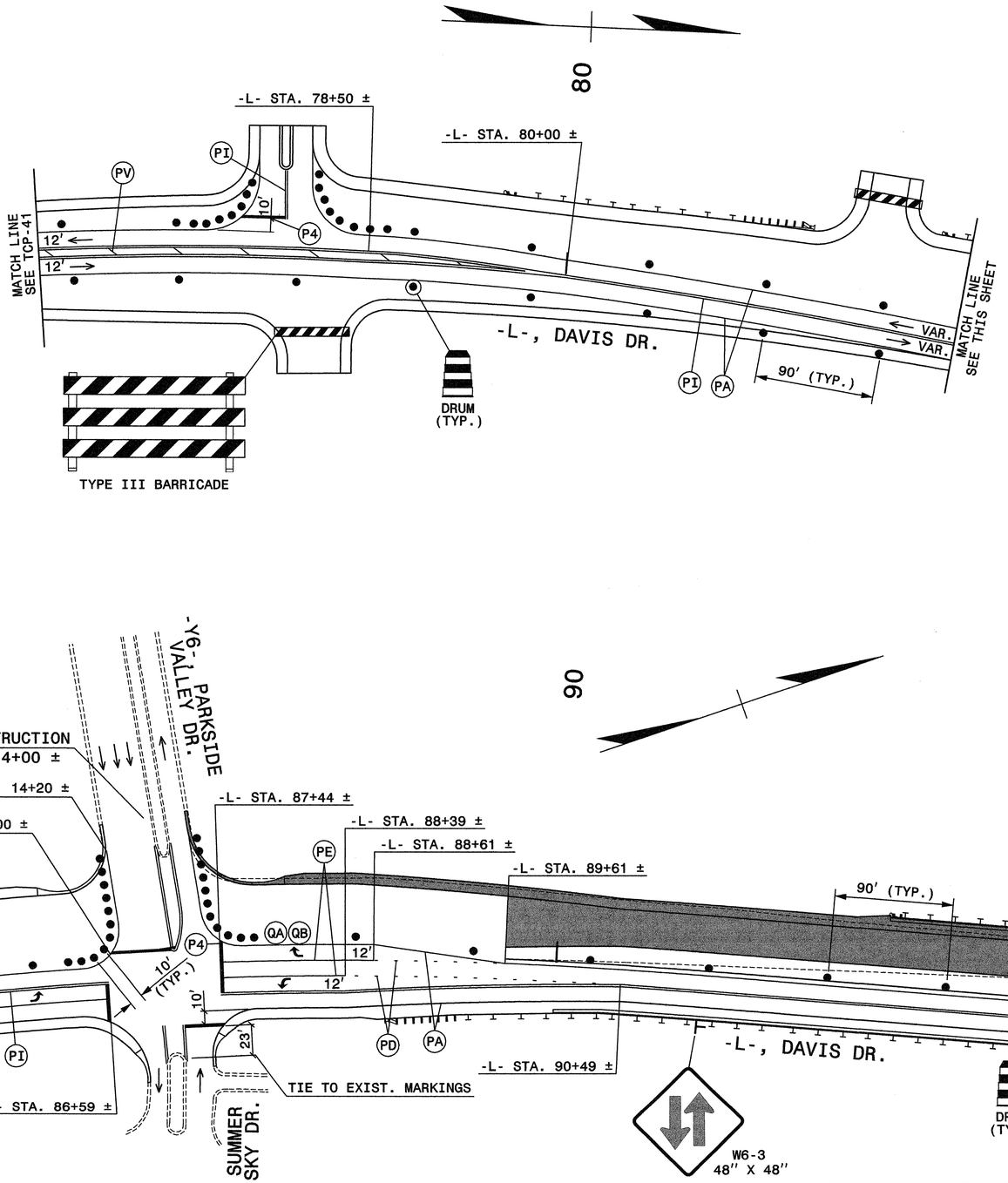
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS
TRAFFIC ENGINEERING BRANCH
TRAFFIC ENGINEERING DESIGN UNIT

REVISIONS

CADD FILE:

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-42



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Klepfer DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T KLEPFER

PHASE III, DETAIL 1 (CONT'D.)

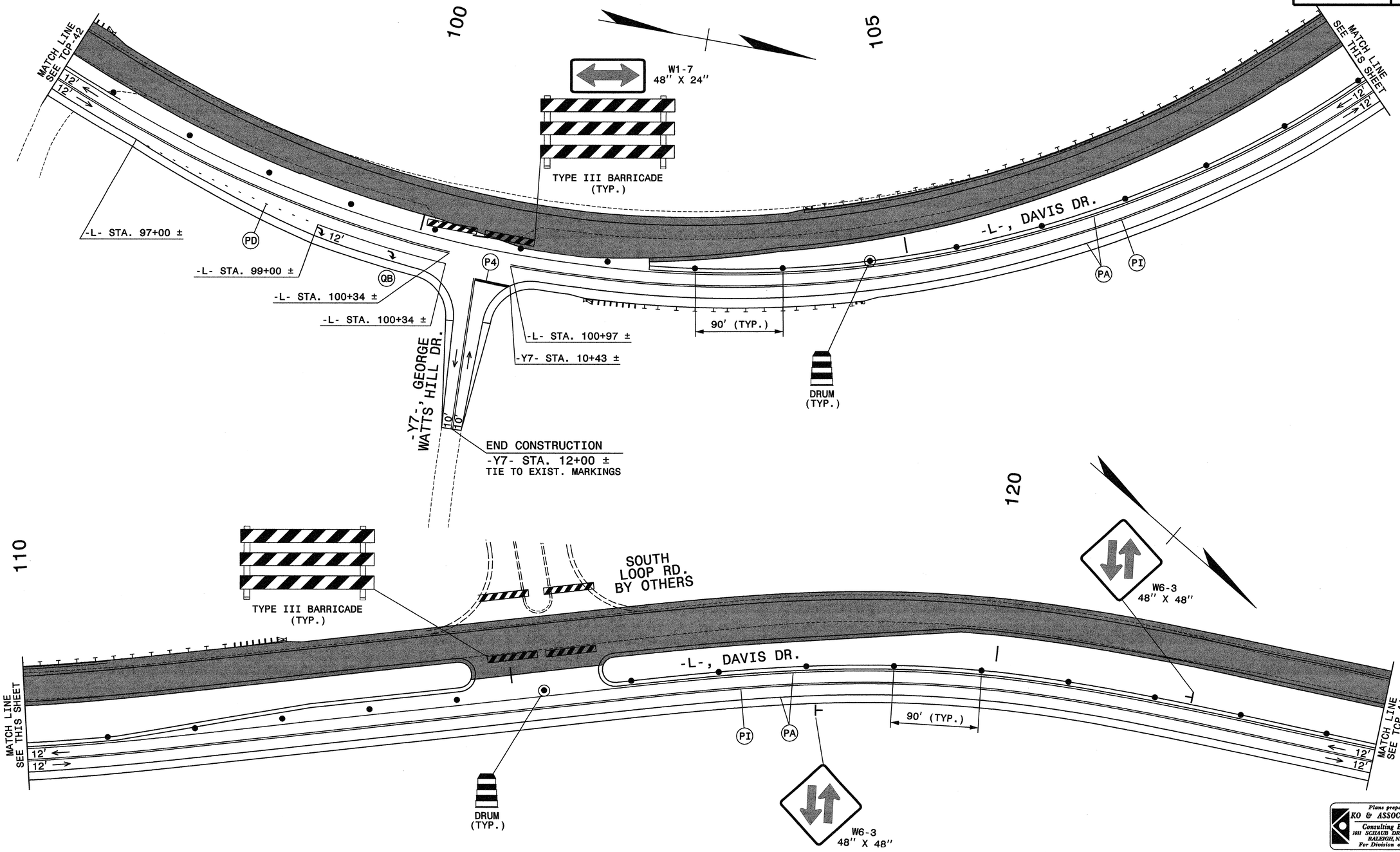
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL UNIT

REVISIONS	
CADD FILE:	

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04/05/2006 03:50:53 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-43



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RITPKA

PHASE III, DETAIL 1 (CONT'D.)

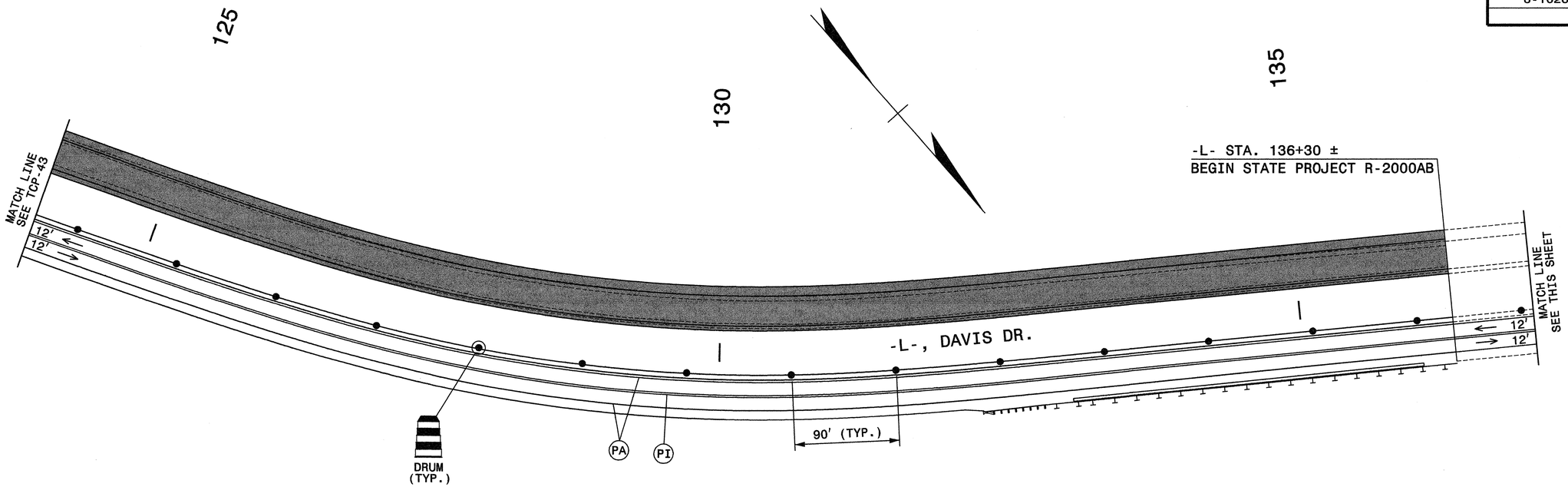
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

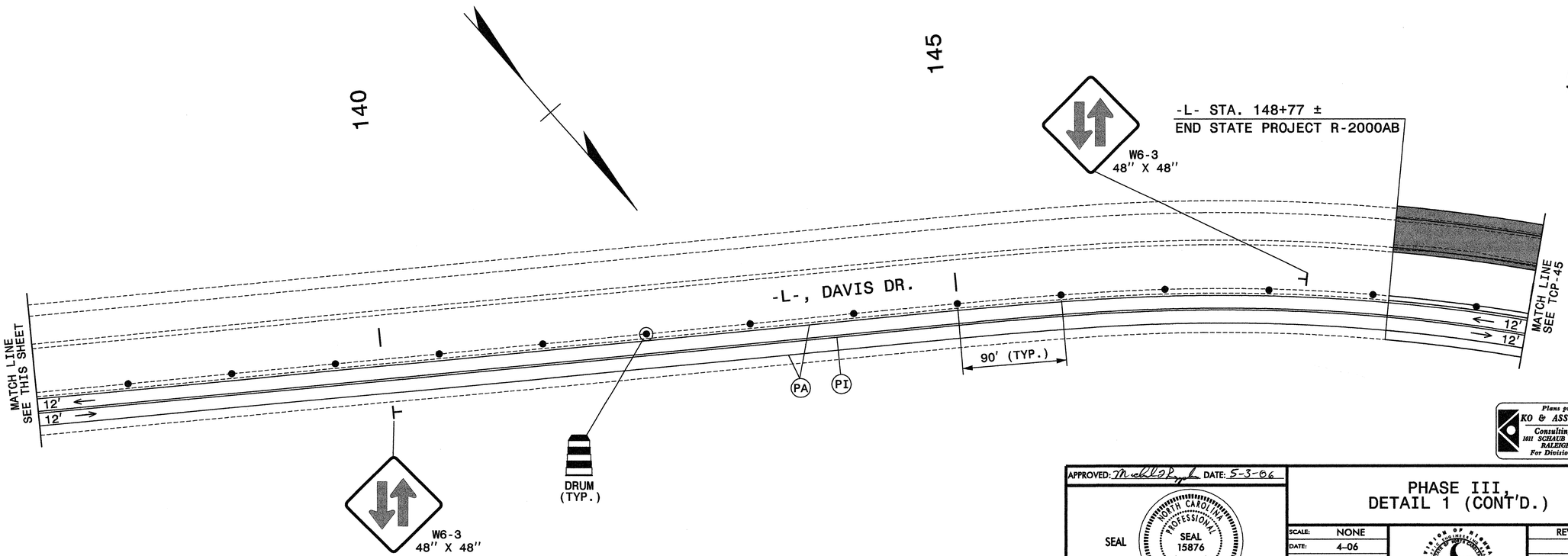
DIVISION OF HIGHWAYS STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-1026	TCP-44





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Keeper DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KEEPER

PHASE III, DETAIL 1 (CONT'D.)

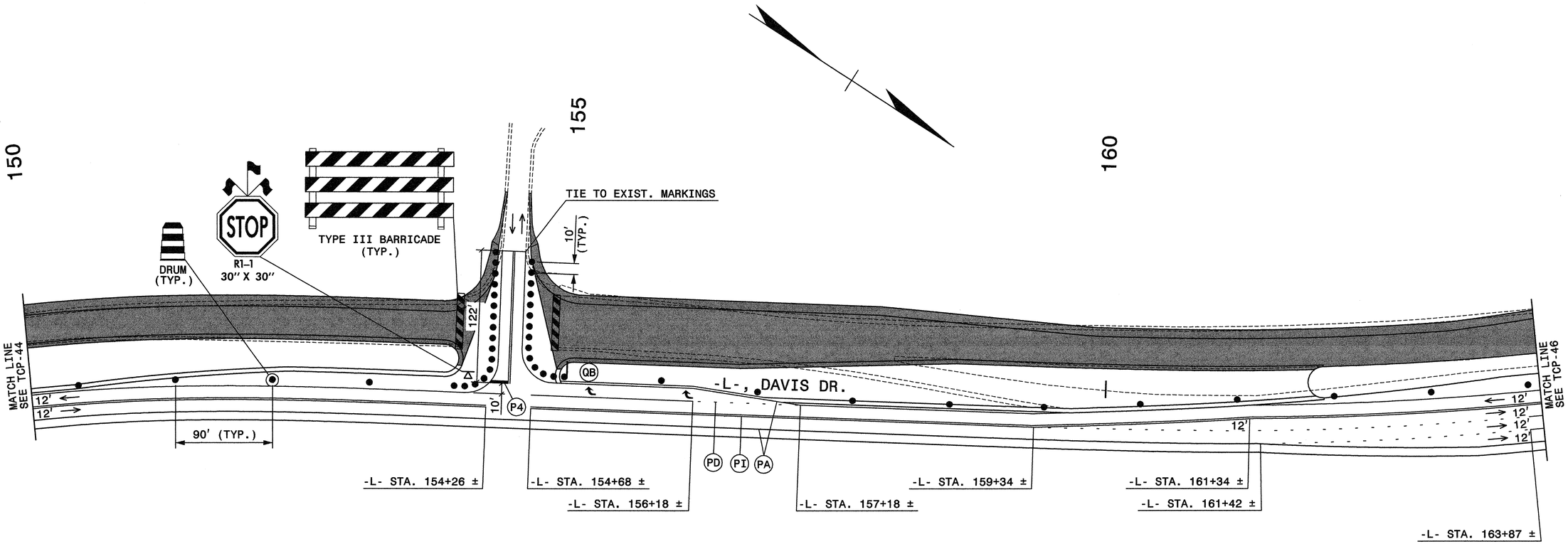
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC ENGINEERING DEPARTMENT OF TRANSPORTATION TRAFFIC CONTROL UNIT

REVISIONS	
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04/05/2006 03:28:33 PM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-45



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1611 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T Kiepke DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KIEPKE

PHASE III, DETAIL 1 (CONT'D.)

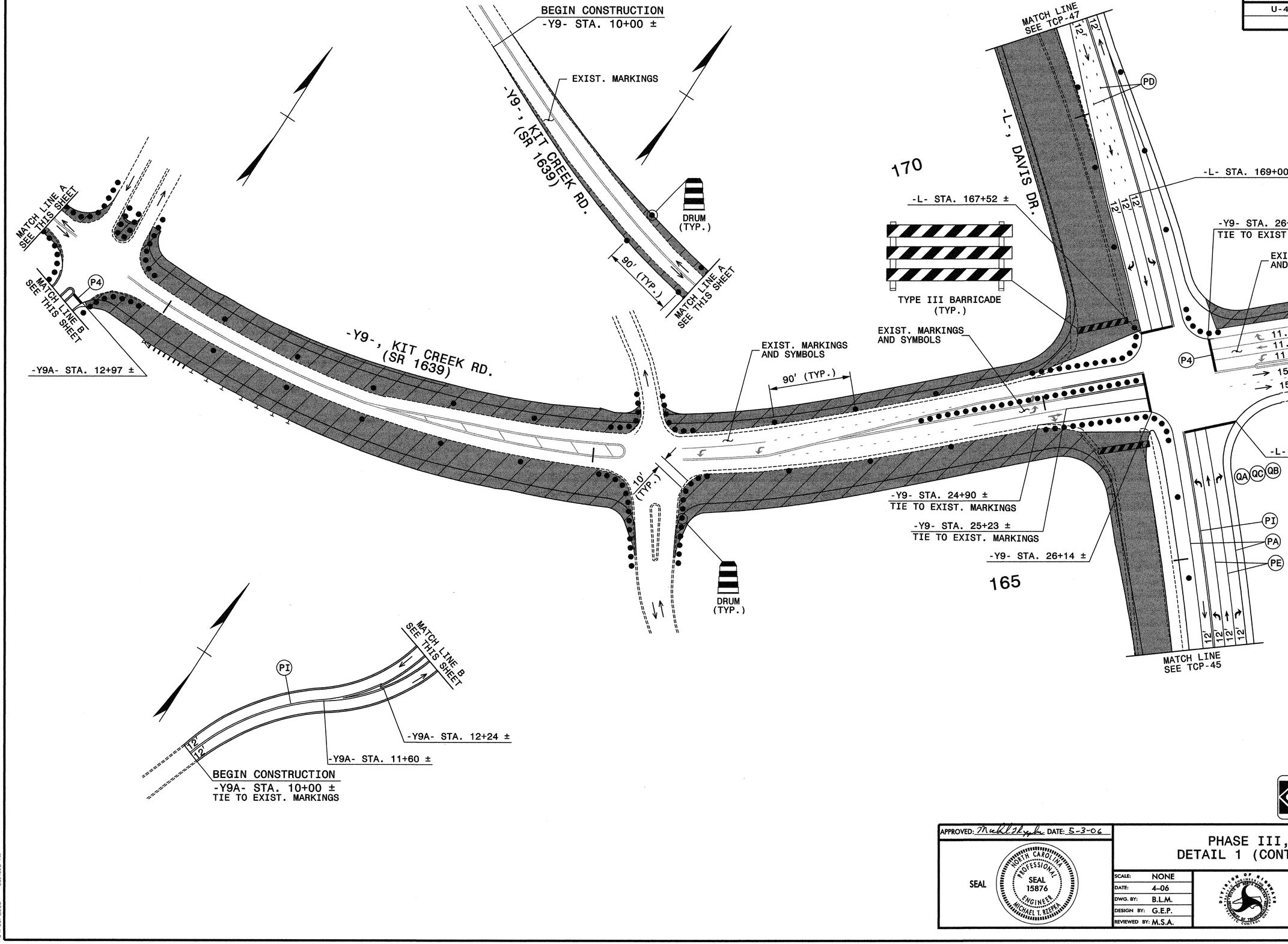
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION — TRAFFIC CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-46



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04/06/2006 08:40:08 AM

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T Klepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T KLEPKA

PHASE III, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — STATEWIDE PROJECT DEVELOPMENT BRANCH — PREPARED BY TRAFFIC ENGINEERING BRANCH

REVISIONS	
CADD FILE:	

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-47

175

180

185

DRUM (TYP.)

-L- STA. 178+21 ±

-L- STA. 178+86 ±

MATCH LINE SEE TCP-46

-L-, DAVIS DR.

MATCH LINE SEE THIS SHEET

12'

12'

12'

12'

12'

12'

12'

12'

QA

P4

10'

PA

PI

PV

PD

PE

90' (TYP.)

-L- STA. 171+72 ±

-L- STA. 174+95 ±

-L- STA. 179+56 ±

W1-7
48" X 24"

VAR.

VAR.

18'

58'

TIE TO EXIST. MARKINGS

TYPE III BARRICADE (TYP.)

PHIL SHARP DR.

190

195

TIE TO EXIST. MARKINGS

10' (TYP.)

-L- STA. 189+59 ±

-L- STA. 191+09 ±

-L- STA. 192+09 ±

28'

104'

VAR.

VAR.

TYPE III BARRICADE (TYP.)

STOP

R1-1
30" X 30"

10'

10'

P4

48'

23'

VAR.

VAR.

WALLY GILBERT DR.

TIE TO EXIST. MARKINGS

-L-, DAVIS DR.

12'

12'

12'

12'

12'

12'

12'

12'

PV

PI

PA

-L- STA. 195+60 ±

90' (TYP.)

W6-3
48" X 48"

W6-3
48" X 48"

DRUM (TYP.)

MATCH LINE SEE THIS SHEET

MATCH LINE SEE TCP-48

QB

QA

PE

PD

-L- STA. 188+69 ±

-L- STA. 187+08 ±

-L- STA. 187+40 ±

-L- STA. 185+39 ±

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael K. Spahr DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIEPMA

PHASE III, DETAIL 1 (CONT'D.)

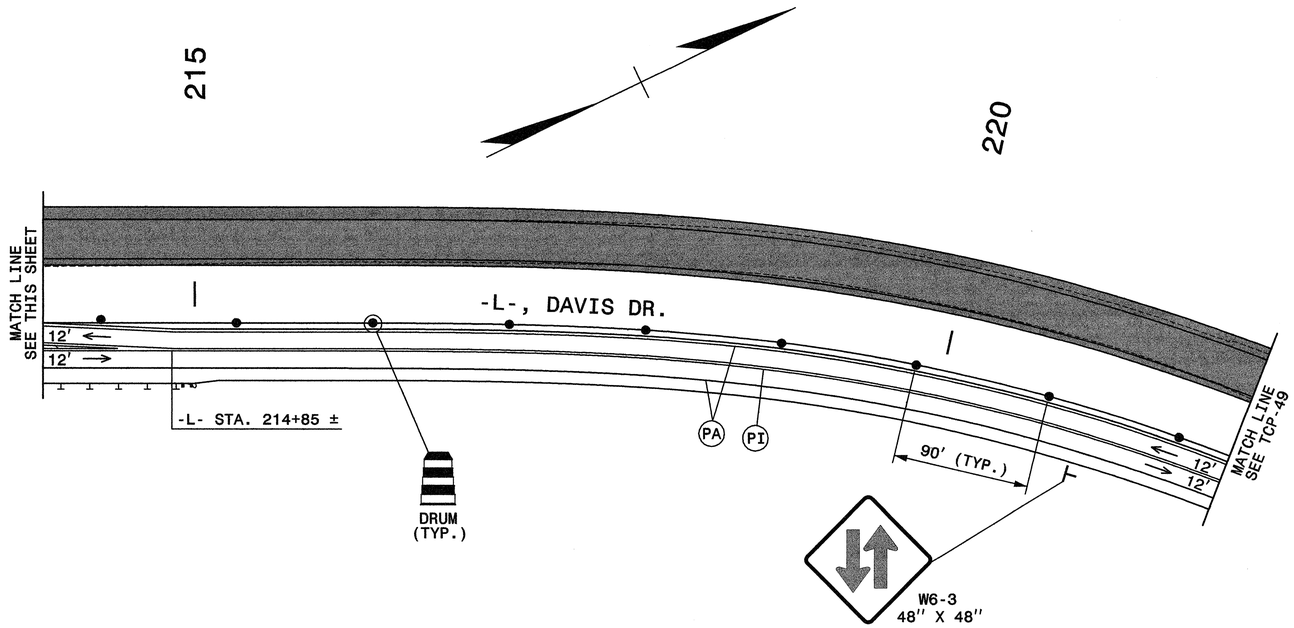
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

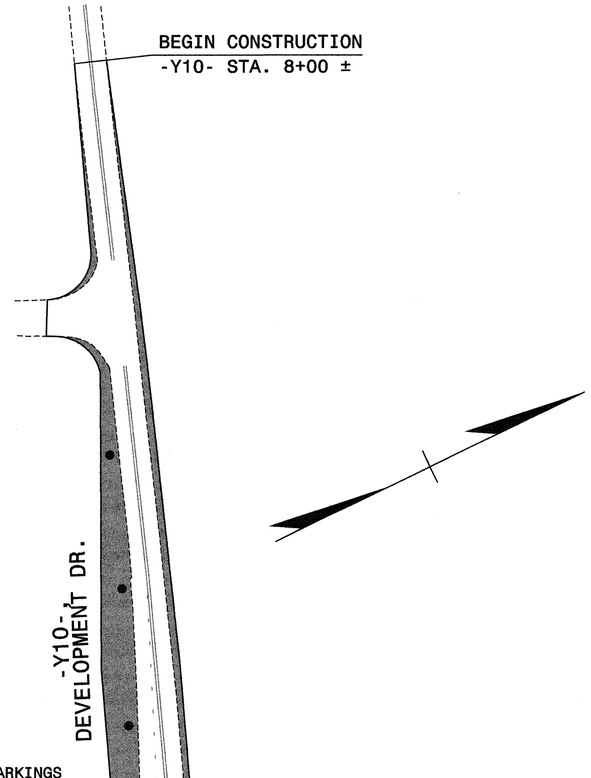
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH

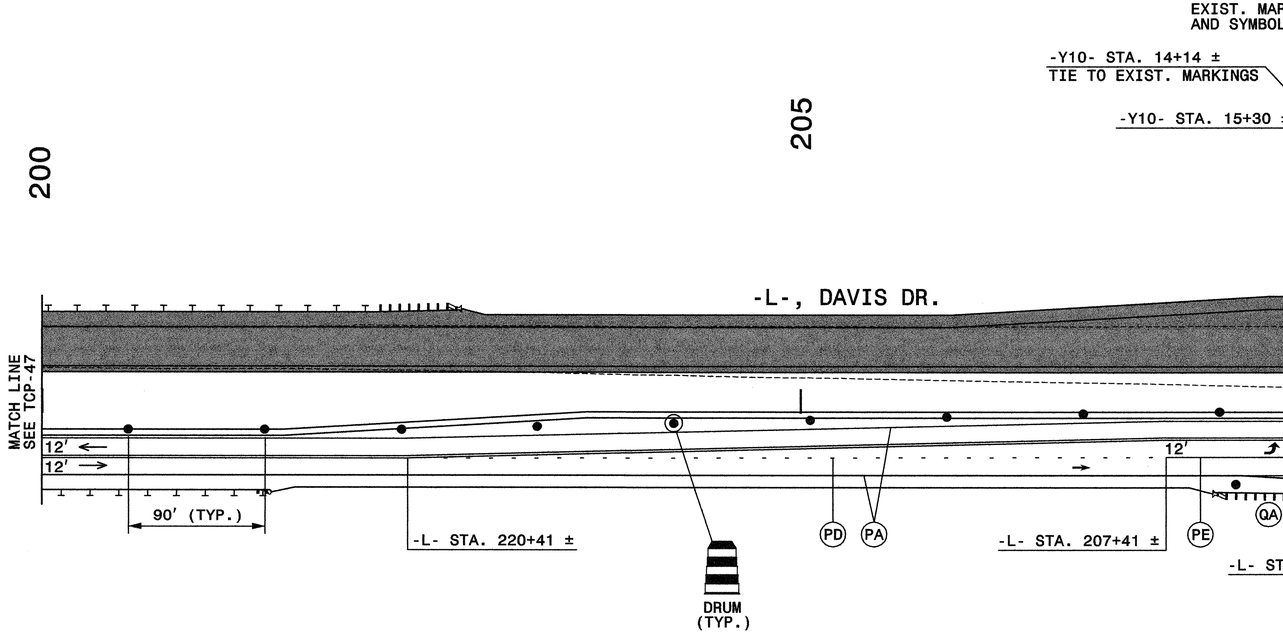
REVISIONS	
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04/06/2006 09:56:47 AM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-48







Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael S Bygden DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KIENKE

PHASE III, DETAIL 1 (CONT'D.)

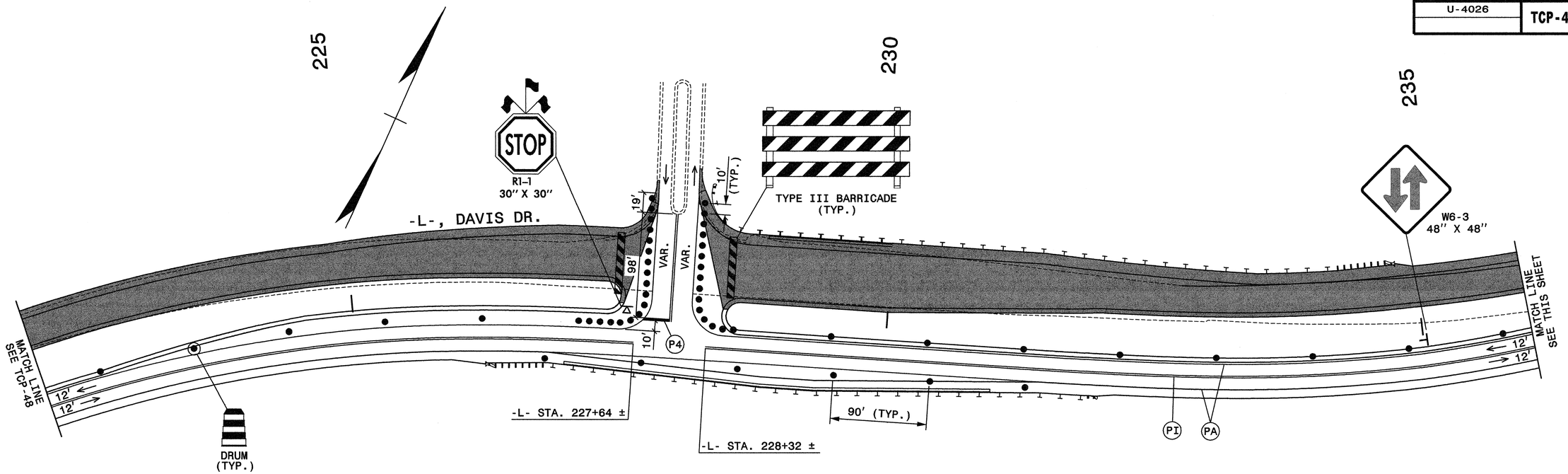
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

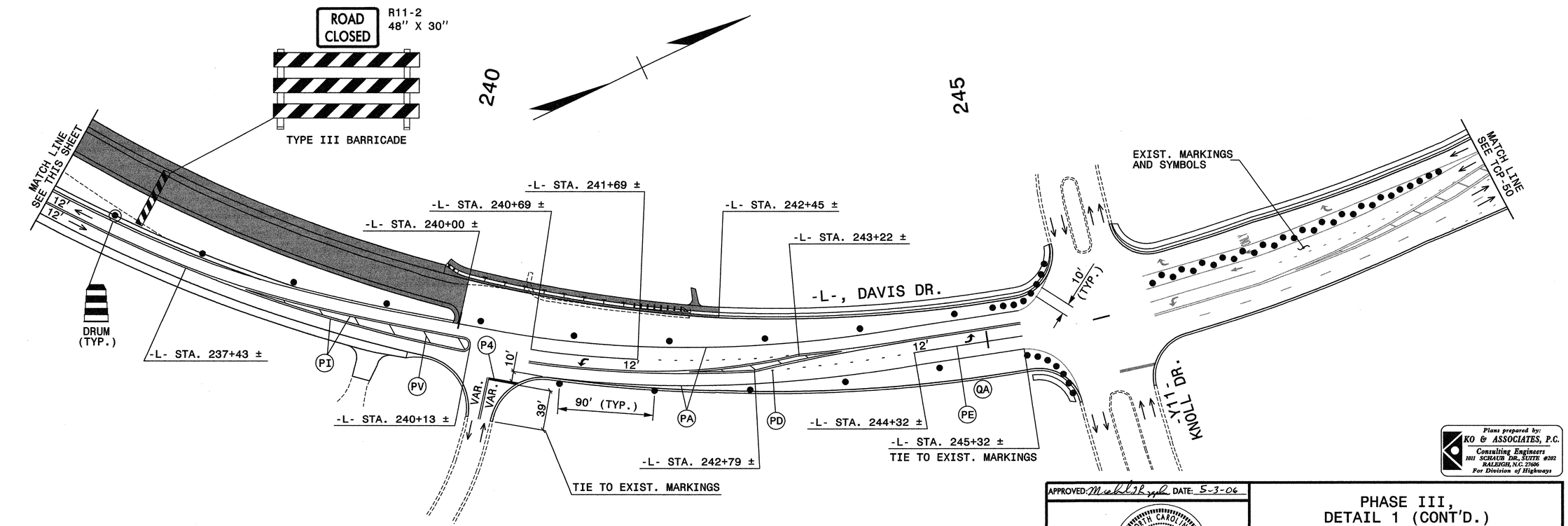
DIVISION OF HIGHWAYS — TRAFFIC ENGINEERING BRANCH — TRAFFIC CONTROL UNIT — DEPARTMENT OF TRANSPORTATION

REVISIONS	
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04/06/2006 09:11:26 AM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-49





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Klepfer DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KLEPFER

PHASE III, DETAIL 1 (CONT'D.)

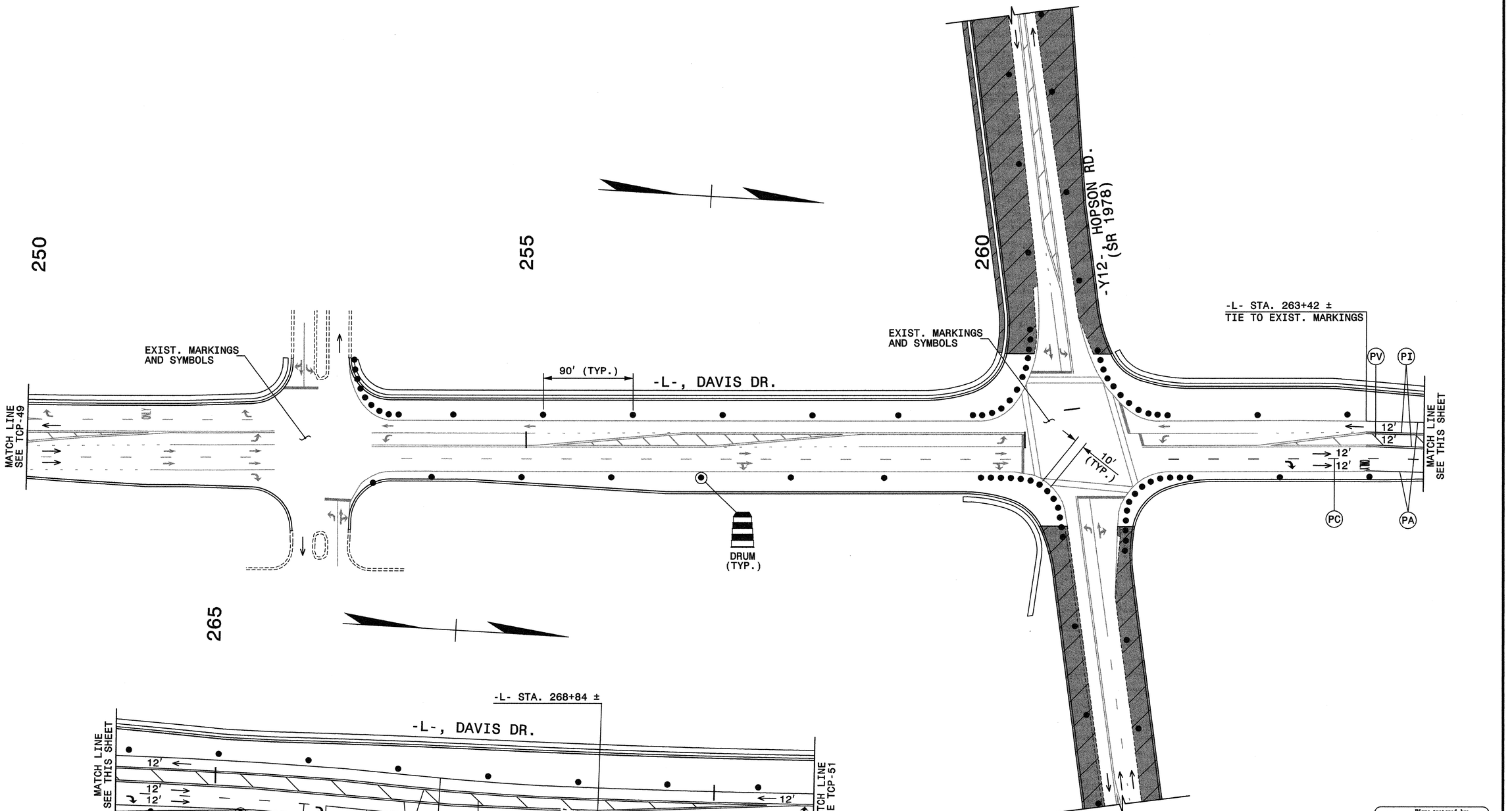
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS

REVISIONS	
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04/06/2006 09:17:51 AM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-50



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR. SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE III, DETAIL 1 (CONT'D.)

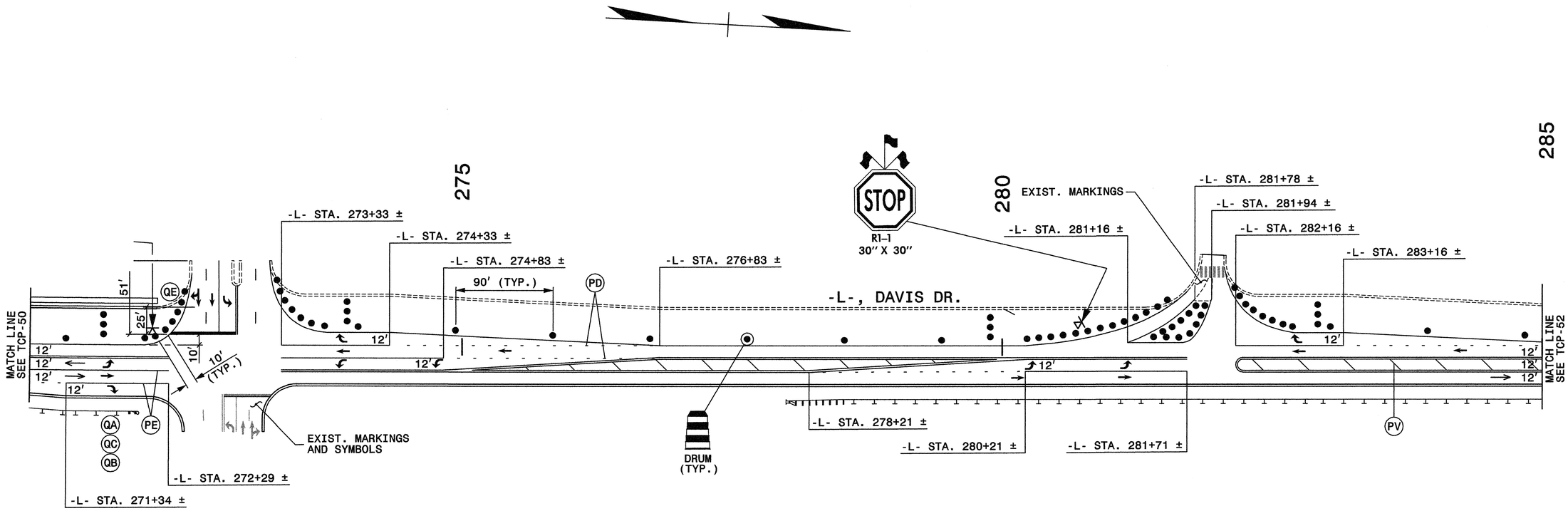
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC ENGINEERING CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-51



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04/06/2006 09:55:54 AM

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kiepke DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KIEPKE

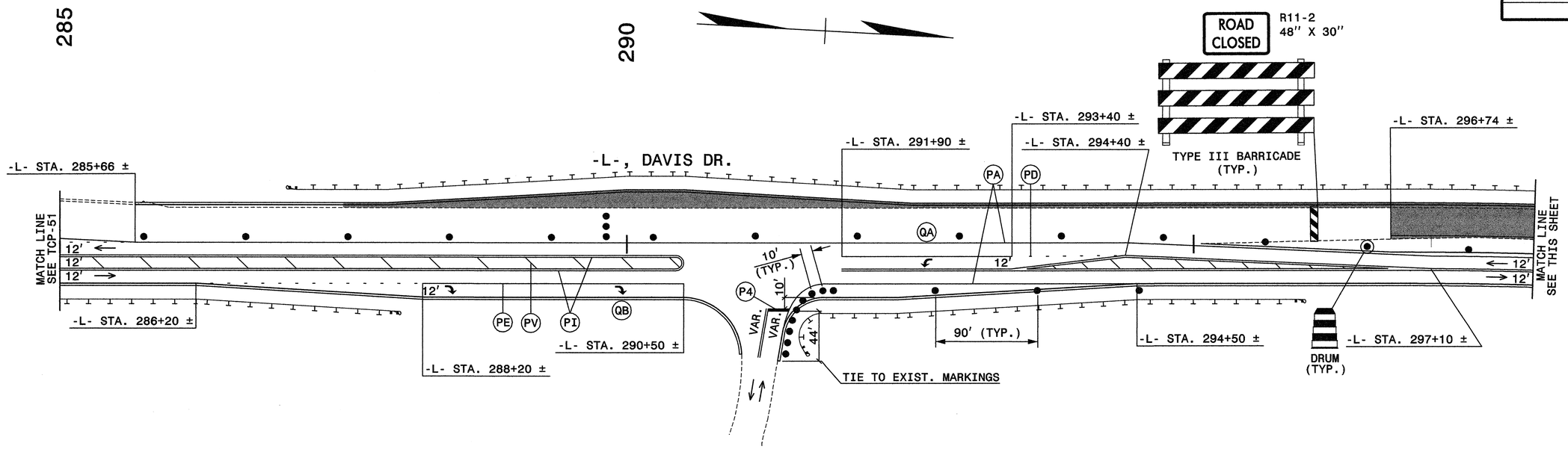
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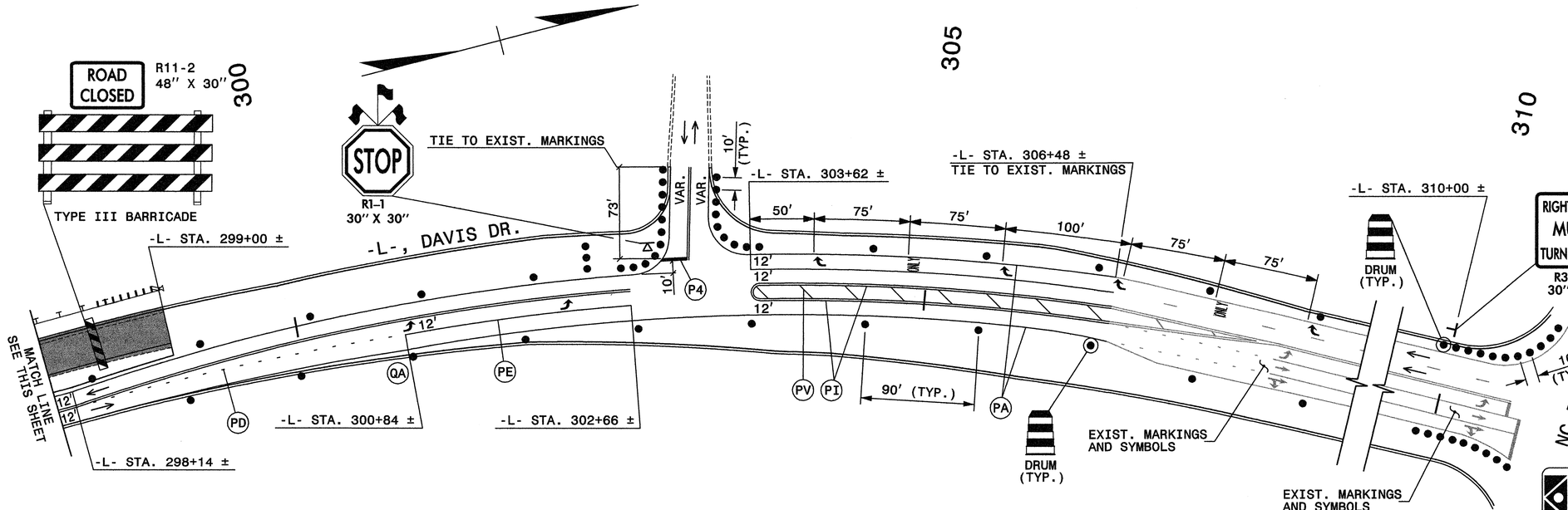
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — TRAFFIC ENGINEERING BRANCH — TRAFFIC CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-52





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE III, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA — DEPARTMENT OF TRANSPORTATION — TRAFFIC ENGINEERING BRANCH

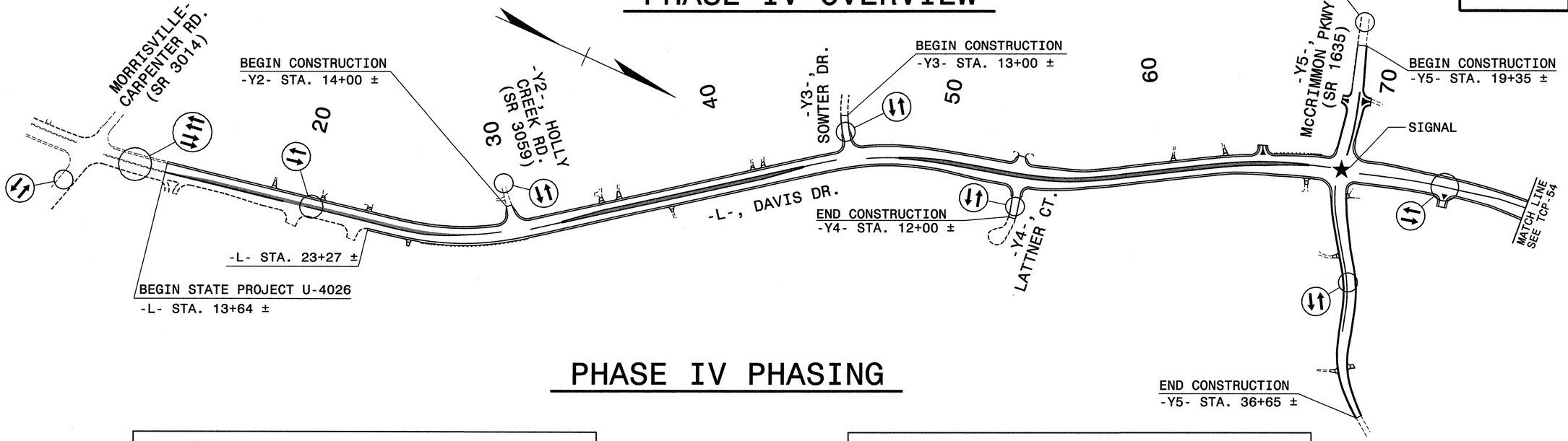
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-53

PHASE IV OVERVIEW



PHASE IV PHASING

COMPLETE THE WORK REQUIRED OF PHASE IV, STEP 1 FROM 6:00 A.M. FRIDAY TO 7:00 A.M. SUNDAY. (SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 1: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, AND/OR POLICE IN ONE CONTINUOUS OPERATION, INSTALL REMAINING INTERIM PAVEMENT MARKING LINES AND SYMBOLS AND MARKERS TO SHIFT DAVIS DR. TRAFFIC INTO THE TEMPORARY ALIGNMENT FROM -L- STA. 10+78 ± TO -L- STA. 321+08 ±. (SEE SHEETS TCP-56 THROUGH TCP-70).

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, PLACE INTERIM PAVEMENT MARKING LINES AND SYMBOLS ON THE FOLLOWING:

-Y5- (SR 1635, McCRIMMON PKWY.) AS SHOWN ON SHEET TCP-58.
-Y9- (SR 1639, KIT CREEK RD.) AS SHOWN ON SHEETS TCP-61 AND TCP-62.
-Y10- (DEVELOPMENT DR.) AS SHOWN ON SHEET TCP-64.
-Y12- (SR 1978, HOPSON RD.) AS SHOWN ON SHEETS TCP-66 AND TCP-67.
-Y13- (NC 54) AS SHOWN ON SHEET TCP-70.

REMOVE LANE CLOSURE AND ACTIVATE TEMPORARY TRAFFIC SIGNALS AT THE FOLLOWING INTERSECTIONS:

-L- AND -Y5- (SR 1635, McCRIMMON PKWY.)
(SEE SIGNAL PLANS AND SHEET TCP-58).
-L- AND -Y6- (PARKSIDE VALLEY RD.)
(SEE SIGNAL PLANS AND SHEET TCP-59).
-L- AND -Y9- (SR 1639, KIT CREEK RD.)
(SEE SIGNAL PLANS AND SHEET TCP-62).
-L- AND -Y10- (DEVELOPMENT DR.)
(SEE SIGNAL PLANS AND SHEET TCP-64).
-L- AND -Y12- (SR 1978, HOPSON RD.)
(SEE SIGNAL PLANS AND SHEET TCP-66).
-L- AND -Y13- (NC 54)
(SEE SIGNAL PLANS AND SHEET TCP-70).

STEP 2: COMPLETE CONSTRUCTION OF -L- (DAVIS DR.) MEDIAN CURB AND GUTTER, DRAINAGE, CONCRETE ISLANDS AND MEDIAN FROM -L- STA. 13+64 ± TO -L- STA. 321+08 ±. (SEE SHEETS TCP-56 THROUGH TCP-70)

USING ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9, CONSTRUCT PROPOSED 4' MONO. CONC. ISLAND ON -Y5- (SR 1635, McCRIMMON PKWY.), -Y9- (SR 1639, KIT CREEK RD.), -Y10- (DEVELOPMENT DR.), -Y12- (SR 1978, HOPSON RD.), AND -Y13- (NC 54) AS SHOWN IN ROADWAY DESIGN PLANS.

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

PLACE THE FINAL LAYER OF SURFACE COURSE ON PROPOSED SOUTHBOUND AND NORTHBOUND -L- (DAVIS DR.) MEDIAN LANES FROM -L- STA.13+64 ± TO -L- STA. 321+08 ±. USE ROADWAY STANDARD DRAWING 1101.02, SHEET 1 OF 9 WHEN PAVING INTERFERES WITH TRAFFIC FLOW.

COMPLETE THE WORK REQUIRED OF PHASE IV, STEP 3 FROM 7:00 A.M. SATURDAY TO 7:00 A.M. SUNDAY. (SEE SPECIAL PROVISIONS AND LIQUIDATED DAMAGES)

STEP 3: USING ROADWAY STANDARD DRAWING 1101.02,SHEET 1 OF 9, AND/OR POLICE IN ONE CONTINUOUS OPERATION, SHIFT SOUTHBOUND AND NORTHBOUND DAVIS DR. TRAFFIC FROM THE OUTSIDE TO INSIDE LANES FROM -L- STA. 10+78 ± TO -L- STA. 321+08 ±.

STEP 4: WITH DAVIS DR. OUTSIDE LANES CLOSED TO TRAFFIC, PLACE THE FINAL LAYER OF SURFACE COURSE ON PROPOSED SOUTHBOUND AND NORTHBOUND -L- (DAVIS DR.) OUTSIDE LANES INCLUDING PAVEMENT MARKING LINES AND SYMBOLS AND MARKERS FROM -L- STA. 13+64 ± TO -L- STA. 321+08 ±.

STEP 5: USING ROADWAY STANDARD DRAWING 1101.02, SHEET 3 OF 9, PLACE THE FINAL LAYER OF SURFACE COURSE ON ALL -Y- LINES INCLUDING PAVEMENT MARKING LINES AND SYMBOLS AND MARKERS (SEE SHEETS PMP-2 THROUGH PMP-17).

REMOVE LANE CLOSURE AT END OF EACH WORKDAY.

ACTIVATE PROPOSED SIGNALS AT THE FOLLOWING LOCATIONS:

-L- AND -Y5- (SR 1635, McCRIMMON PKWY.)
(SEE SIGNAL PLANS).
-L- AND -Y6- (PARKSIDE VALLEY RD.)
(SEE SIGNAL PLANS).
-L- AND -Y9- (SR 1639, KIY CREEK RD.)
(SEE SIGNAL PLANS).
-L- AND -Y10- (DEVELOPMENT DR.)
(SEE SIGNAL PLANS).
-L- AND -Y12- (SR 1978, HOPSON RD.)
(SEE SIGNAL PLANS).
-L- AND -Y13- (NC 54)
(SEE SIGNAL PLANS).

STEP: 6 REMOVE ALL TRAFFIC CONTROL DEVICES.

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR. SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael Kozyra DATE: 11-2-06

SEAL
NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T KOZYRA

PHASE IV PHASING AND OVERVIEW

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

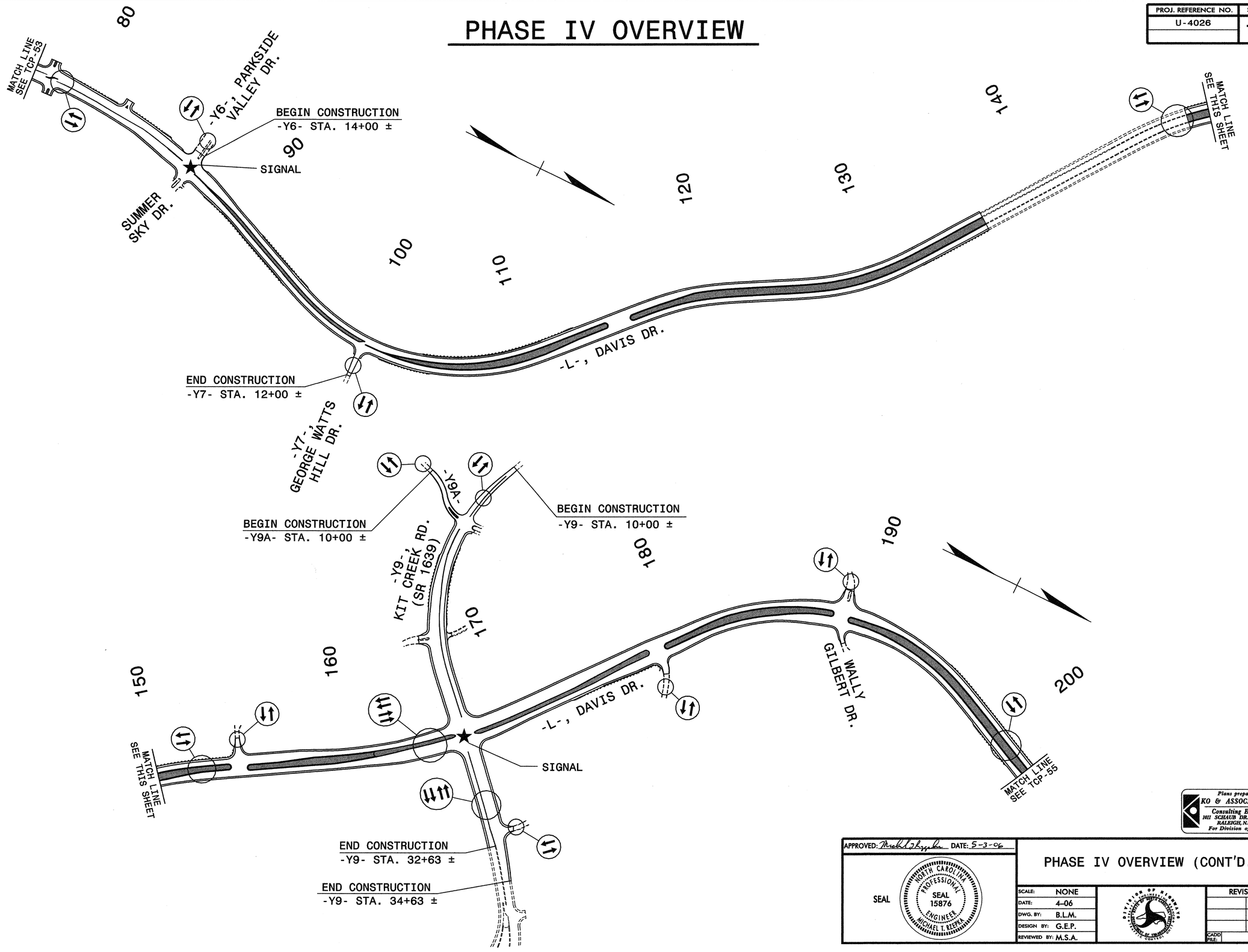
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH

REVISIONS	
CADD FILE:	

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11/02/2006 03:39:09 PM

PHASE IV OVERVIEW

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-54



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: _____ DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV OVERVIEW (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

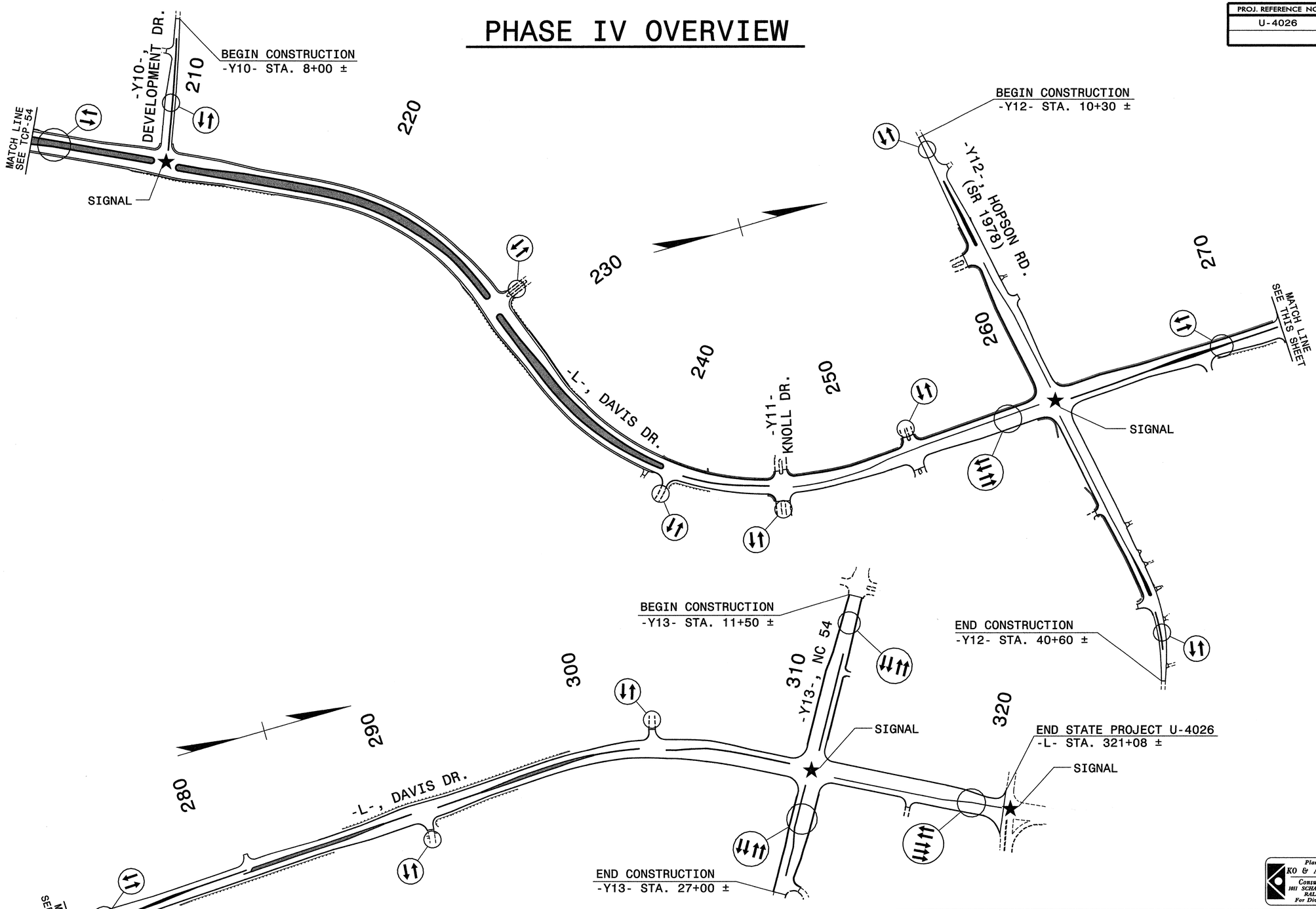
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH

REVISIONS	
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04/06/2006 10:06:04 AM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-55

PHASE IV OVERVIEW



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Kzeyka DATE: 8-22-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KZEYKA

PHASE IV OVERVIEW (CONT'D.)

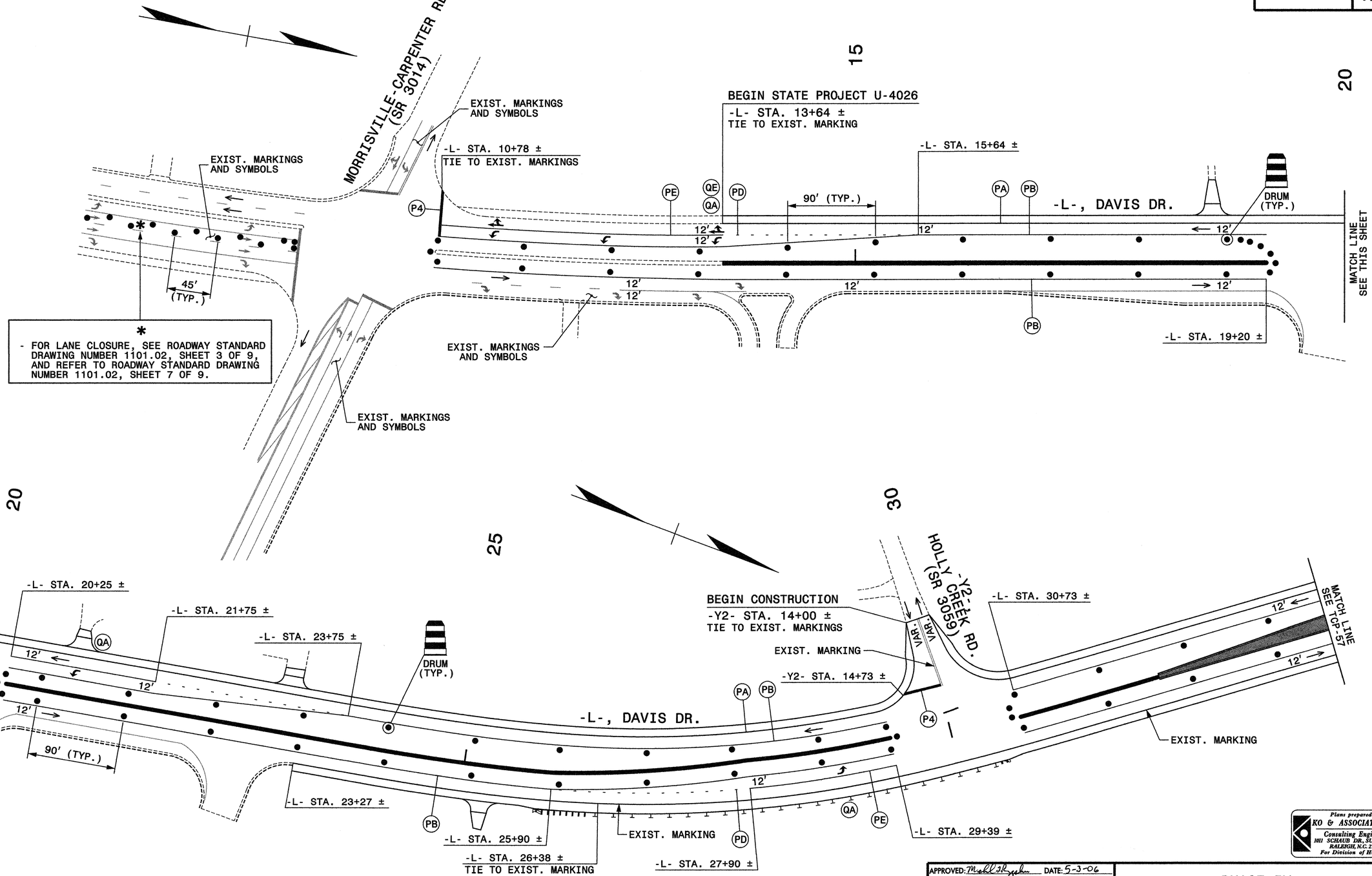
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA — DEPARTMENT OF TRANSPORTATION — TRAFFIC ENGINEERING BRANCH

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-56



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05/03/2006 01:35:40 PM

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: _____ DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.
CADD FILE:	

DIVISION OF HIGHWAYS — STATE OF NORTH CAROLINA — DEPARTMENT OF TRANSPORTATION

REVISIONS

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-57

35 40 45

BEGIN CONSTRUCTION
-Y3- STA. 13+00 ±

-Y3- SOWTER DR.

15' 15'

EXIST. MARKINGS

-Y3- STA. 13+90 ±
TIE TO EXIST. MARKING

-Y3- STA. 14+57 ±

-L- STA. 46+00 ±

-L- STA. 46+50 ±

-L- STA. 48+00 ±

-L- STA. 47+97 ±

PE

QB

QI

P4

PB PA

90' (TYP.)

DRUM
(TYP.)

MATCH LINE
SEE TCP-56

12'

12'

EXIST. MARKING

-L-, DAVIS DR.

PB PD

12'

12'

12'

12'

12'

MATCH LINE
SEE THIS SHEET

EXIST. MARKING

-L- STA. 41+58 ±

-L- STA. 43+58 ±

-L- STA. 45+09 ±

50 55 60

PC PD PA PB

-L- STA. 49+97 ±

QI

-Y4- STA. 9+13 ±
TIE TO EXIST. MARKINGS

EXIST.
MARKING

-L- STA. 54+06 ±

-L- STA. 55+10 ±

-L- STA. 56+70 ±

31'

10'

P4

12'

12'

12'

MATCH LINE
SEE THIS SHEET

12'

12'

EXIST. MARKING

-L- STA. 49+90 ±

PD

12'

PE

QB

-L- STA. 51+90 ±

-L- STA. 53+02 ±

-L-, DAVIS DR.

90' (TYP.)

DRUM
(TYP.)

10'
(TYP.)

W1-6R
48" X 24"

15' 15'

EXIST. MARKINGS

-Y4- LATTNER CT.

END CONSTRUCTION
-Y4- STA. 12+00 ±

TYPE III BARRICADE
(TYP.)

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH N. CONWAY

REVISIONS	
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04/06/2006 11:22:51 AM

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-58

EXIST. MARKINGS

BEGIN CONSTRUCTION
-Y5- STA. 19+35 ±
TIE TO EXIST. MARKINGS

MATCH LINE SEE THIS SHEET

-Y5- STA. 20+30 ±

-Y5- STA. 21+51 ±

-Y5- STA. 21+83 ±

DRUM (TYP.)

-Y5- STA. 23+35 ±

-Y5- STA. 24+38 ±

-Y5- STA. 24+42 ±

-Y5- STA. 24+54 ±

-Y5-, McCRIMMON PKWY. (SR 1635)

-L- STA. 68+83 ±

-L- STA. 70+22 ±

-Y5- STA. 32+65 ±

-Y5-, McCRIMMON PKWY. (SR 1635)

-Y5- STA. 34+27 ±

END CONSTRUCTION
-Y5- STA. 36+65 ±
TIE TO EXIST. MARKINGS

-Y5- STA. 35+90 ±

EXIST. MARKINGS

10' (TYP.)

-L-, DAVIS DR.

MATCH LINE SEE TCP-57

EXIST. MARKING

-L- STA. 63+36 ±
TIE TO EXIST. MARKING

-L- STA. 64+83 ±

-L- STA. 65+45 ±

-L- STA. 66+86 ±

-L- STA. 67+87 ±

-Y5- STA. 25+89 ±

-Y5- STA. 27+90 ±

-Y5- STA. 25+70 ±

-Y5- STA. 25+99 ±

-L- STA. 72+22 ±

-L- STA. 73+70 ±

-L- STA. 75+70 ±

-L- STA. 75+53 ±

MATCH LINE SEE TCP-59

-Y5-, McCRIMMON PKWY. (SR 1635)

-Y5- STA. 28+20 ±

-Y5- STA. 28+90 ±

MATCH LINE SEE THIS SHEET

65 70 25 30 35

PC PV PA PB PE PD PI P4 QA QC QB

12' 10'

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

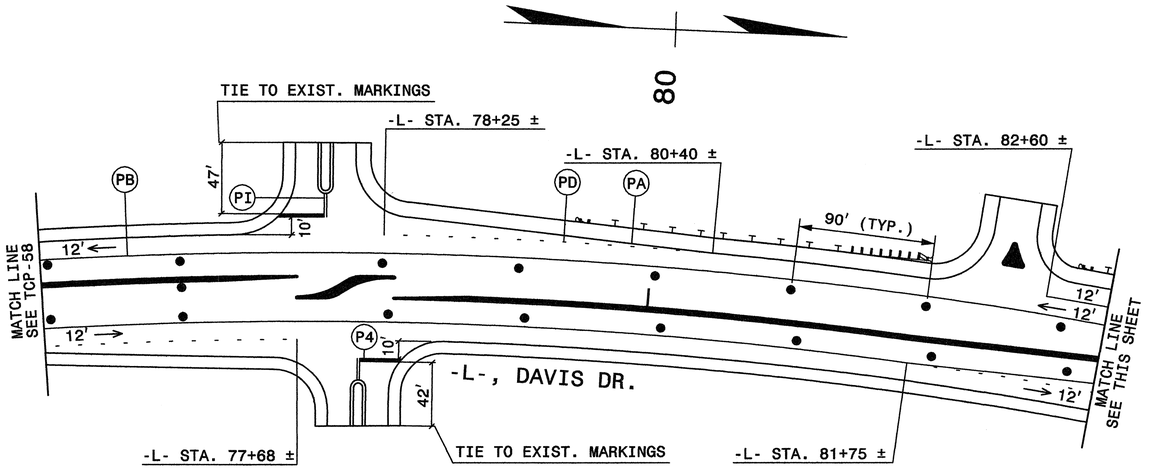
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

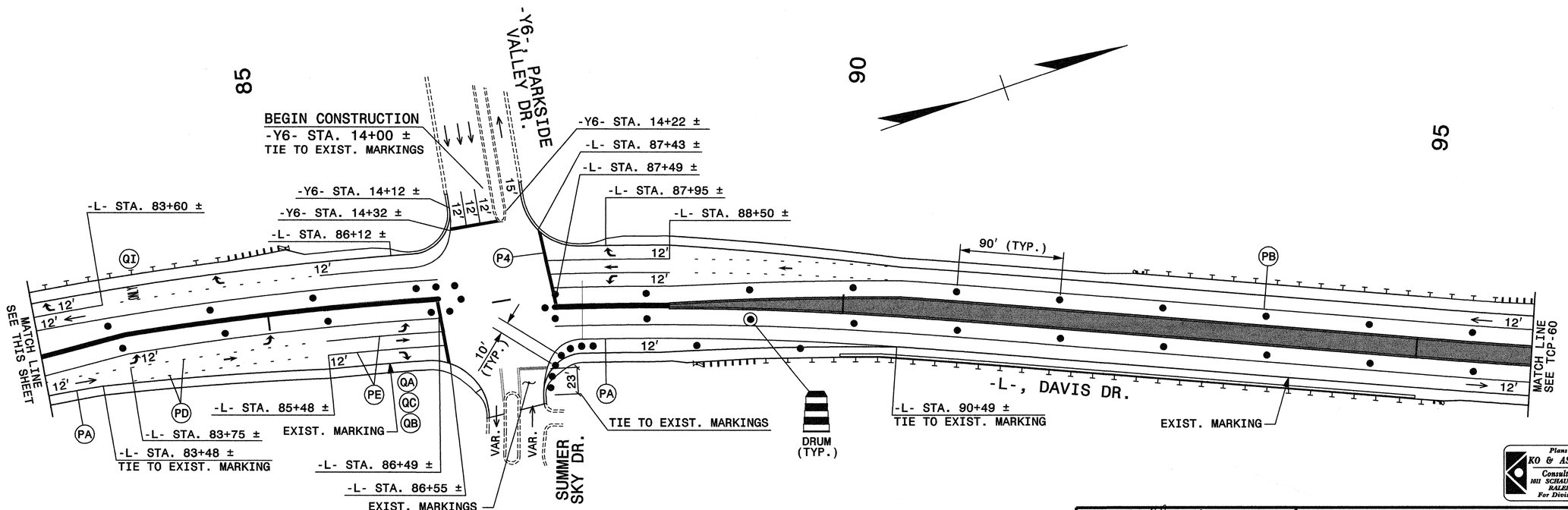
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-59





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KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KEEPER

PHASE IV, DETAIL 1 (CONT'D.)

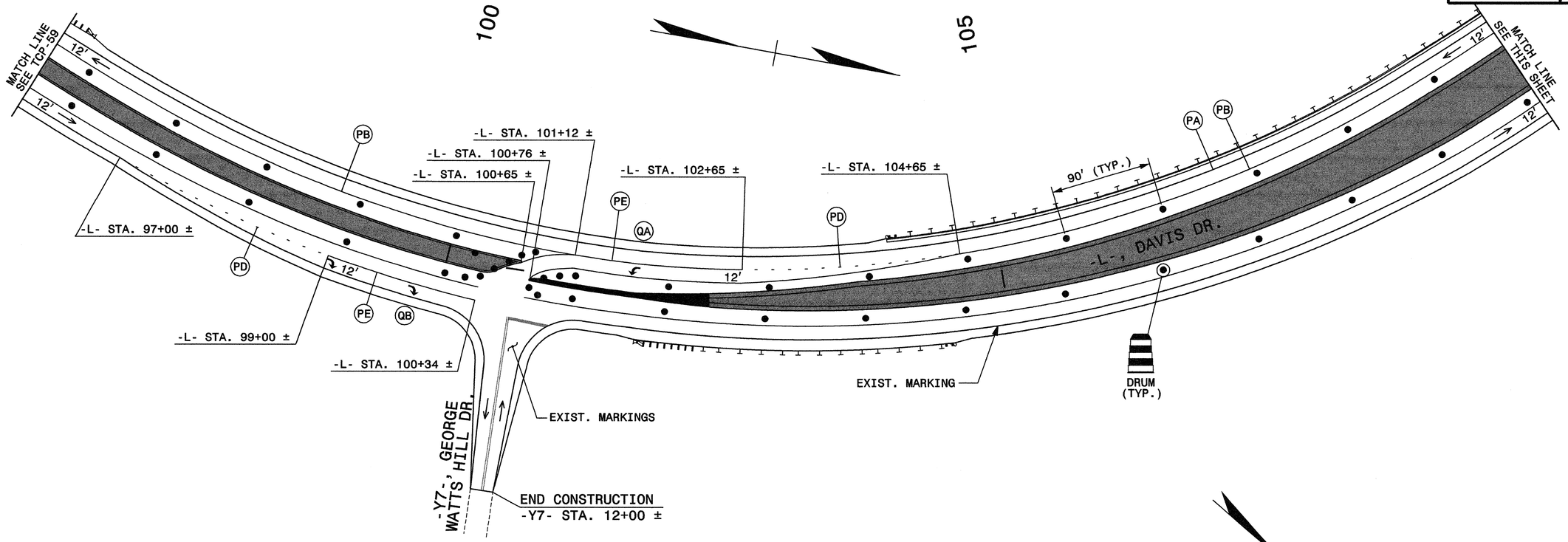
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

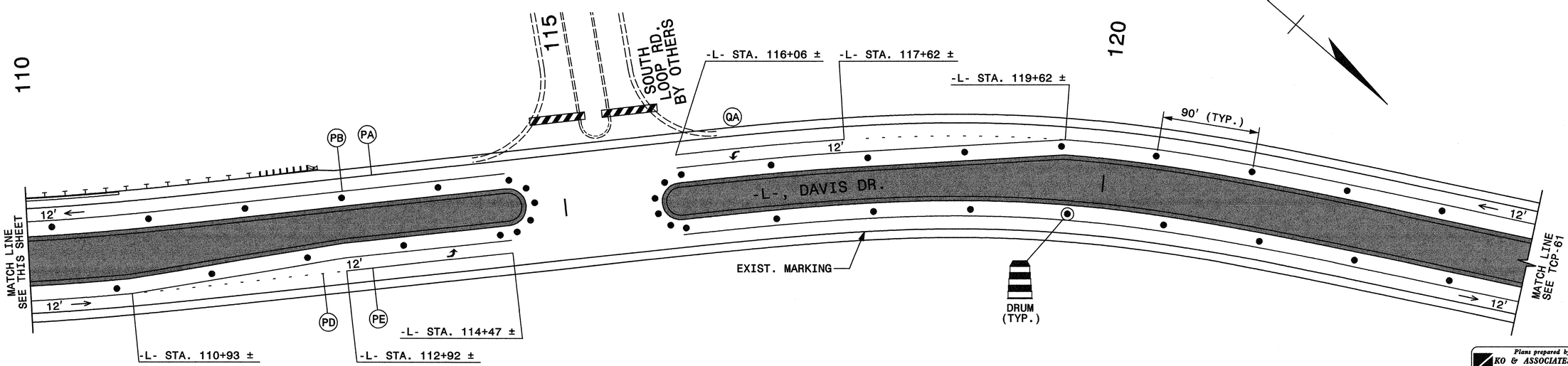
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC ENGINEER

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-60





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

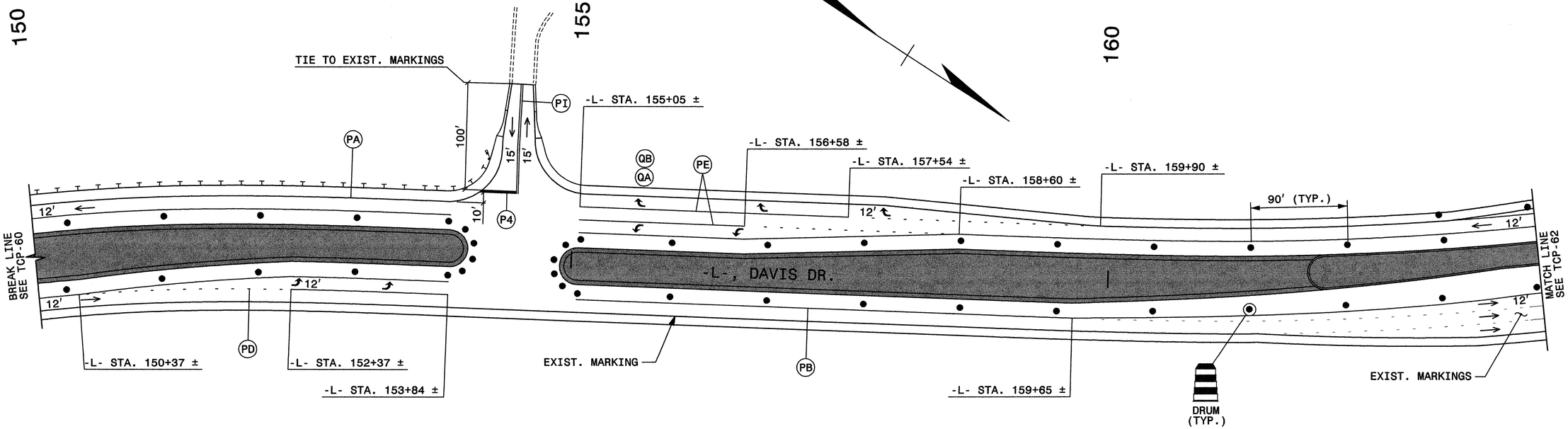
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

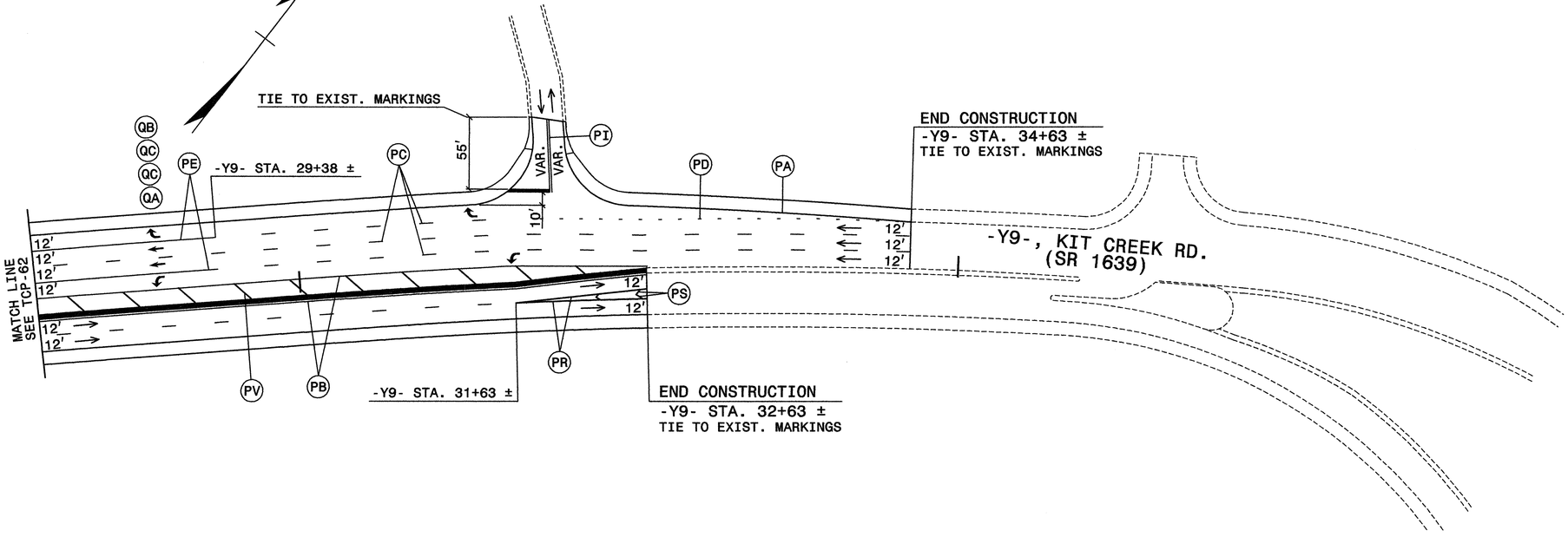
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-61





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR. SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH

REVISIONS	
CADD FILE	

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-62

BEGIN CONSTRUCTION
-Y9- STA. 10+00 ±
TIE TO EXIST. MARKINGS

-Y9- STA. 10+67 ±

-Y9-, KIT CREEK RD. (SR 1639)

-Y9- STA. 12+70 ±

MATCH LINE A SEE THIS SHEET

-Y9- STA. 13+66 ±

-Y9- STA. 14+56 ±

MATCH LINE B SEE THIS SHEET

EXIST. MARKINGS

-Y9- STA. 16+09 ±

-Y9- STA. 16+56 ±

-Y9-, KIT CREEK RD. (SR 1639)

-Y9- STA. 18+20 ±

-Y9- STA. 18+95 ±

-Y9- STA. 20+37 ±

TIE TO EXIST. MARKINGS

-Y9- STA. 21+03 ±

-Y9- STA. 22+96 ±

-Y9- STA. 25+23 ±

-L- STA. 167+60 ±

MATCH LINE SEE TCP-63

EXIST. MARKING
-L- STA. 170+60 ±
TIE TO EXIST. MARKING

-L- STA. 170+10 ±

170

DRUM (TYP.)

90' (TYP.)

-Y9- STA. 26+88 ±

MATCH LINE SEE TCP-61

-Y9- STA. 27+18 ±

-L- STA. 166+38 ±

EXIST. MARKINGS AND SYMBOLS

-Y9- STA. 25+46 ±

-L-, DAVIS DR.

165

MATCH LINE SEE TCP-61

MATCH LINE B SEE THIS SHEET

EXIST. MARKINGS

BEGIN CONSTRUCTION
-Y9A- STA. 10+00 ±

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-05

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

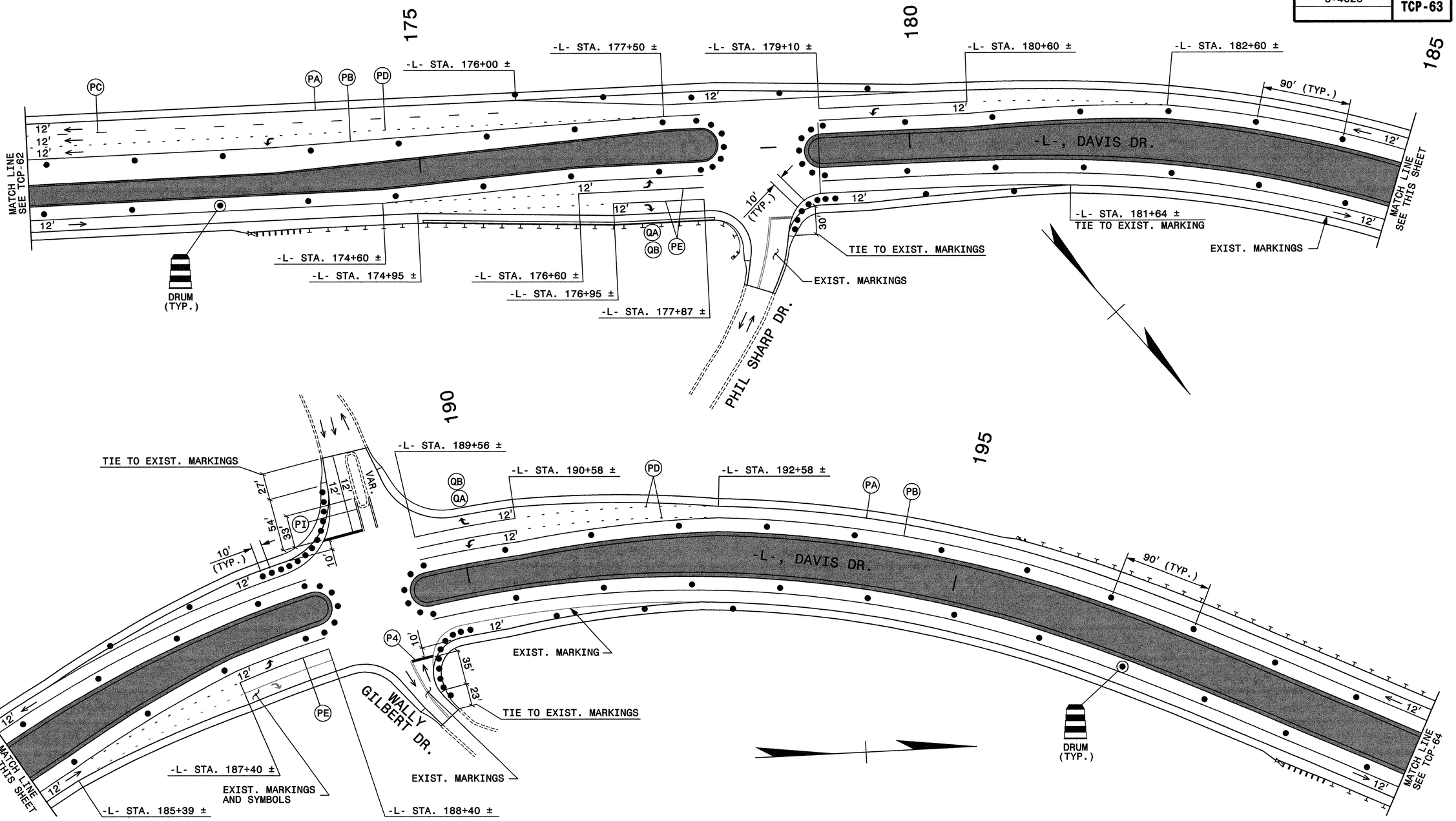
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS
TRAFFIC ENGINEERING BRANCH
TRAFFIC ENGINEER

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-63



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Consulting Engineers
1011 SCHAUB DR. SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIZZUKA

PHASE IV, DETAIL 1 (CONT'D.)

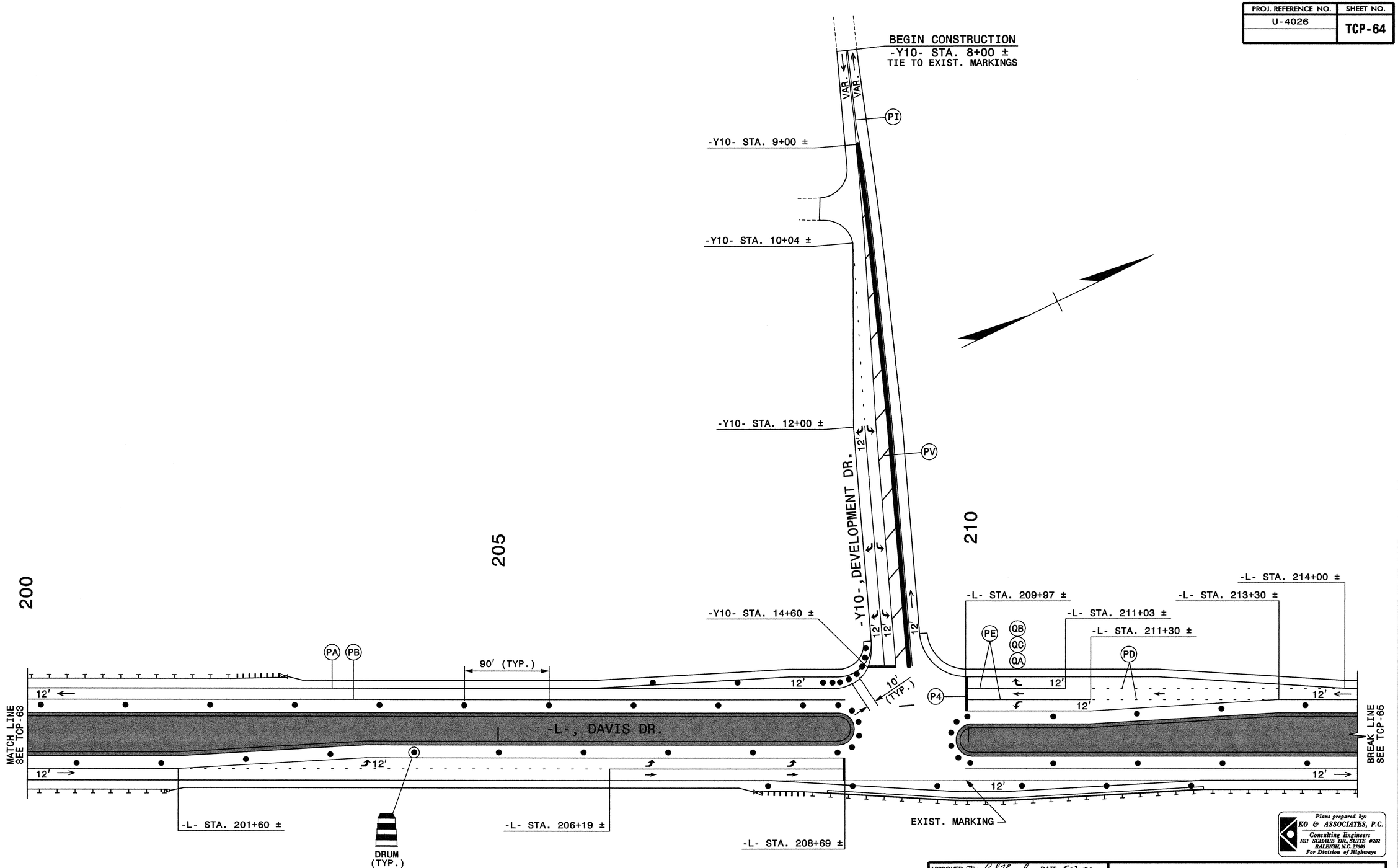
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-64



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Rzepka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

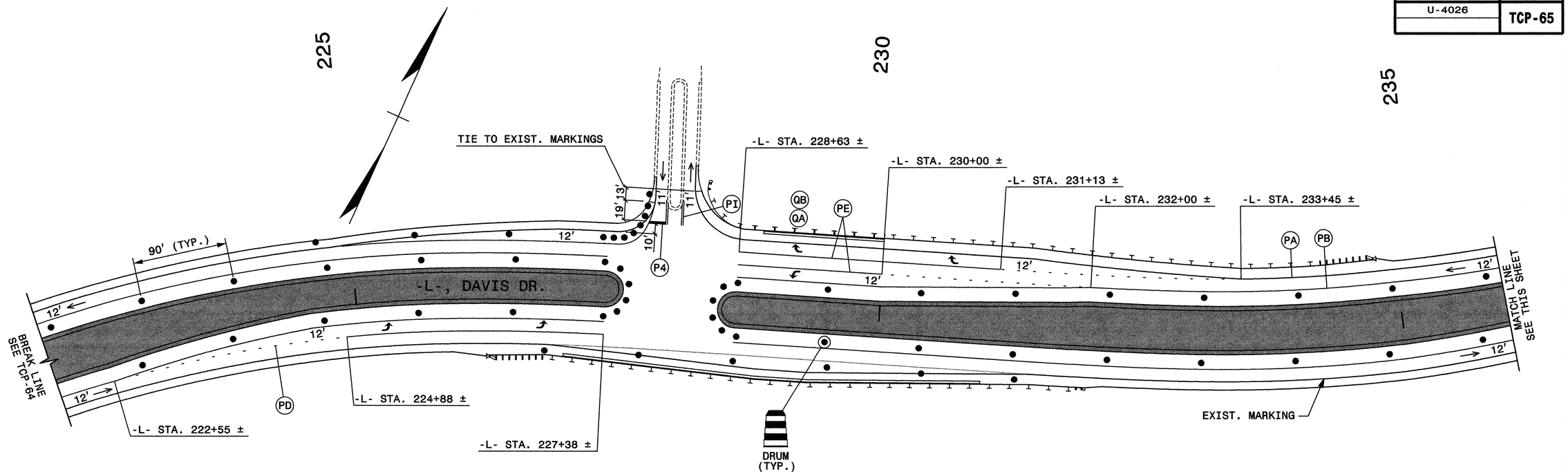
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REVIEWED BY:	M.S.A.

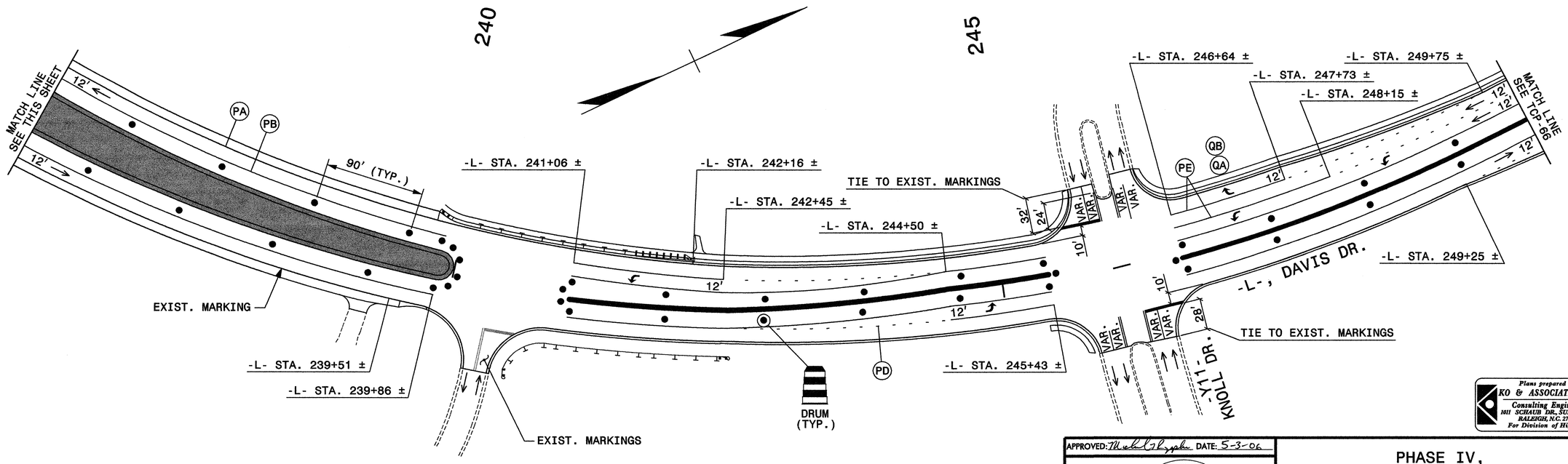
DIVISION OF HIGHWAYS — TRAFFIC ENGINEERING BRANCH — TRAFFIC ENGINEERING BY TRANSPORTATION CORRIDOR OFFICIAL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-65





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIEPMA

PHASE IV, DETAIL 1 (CONT'D.)

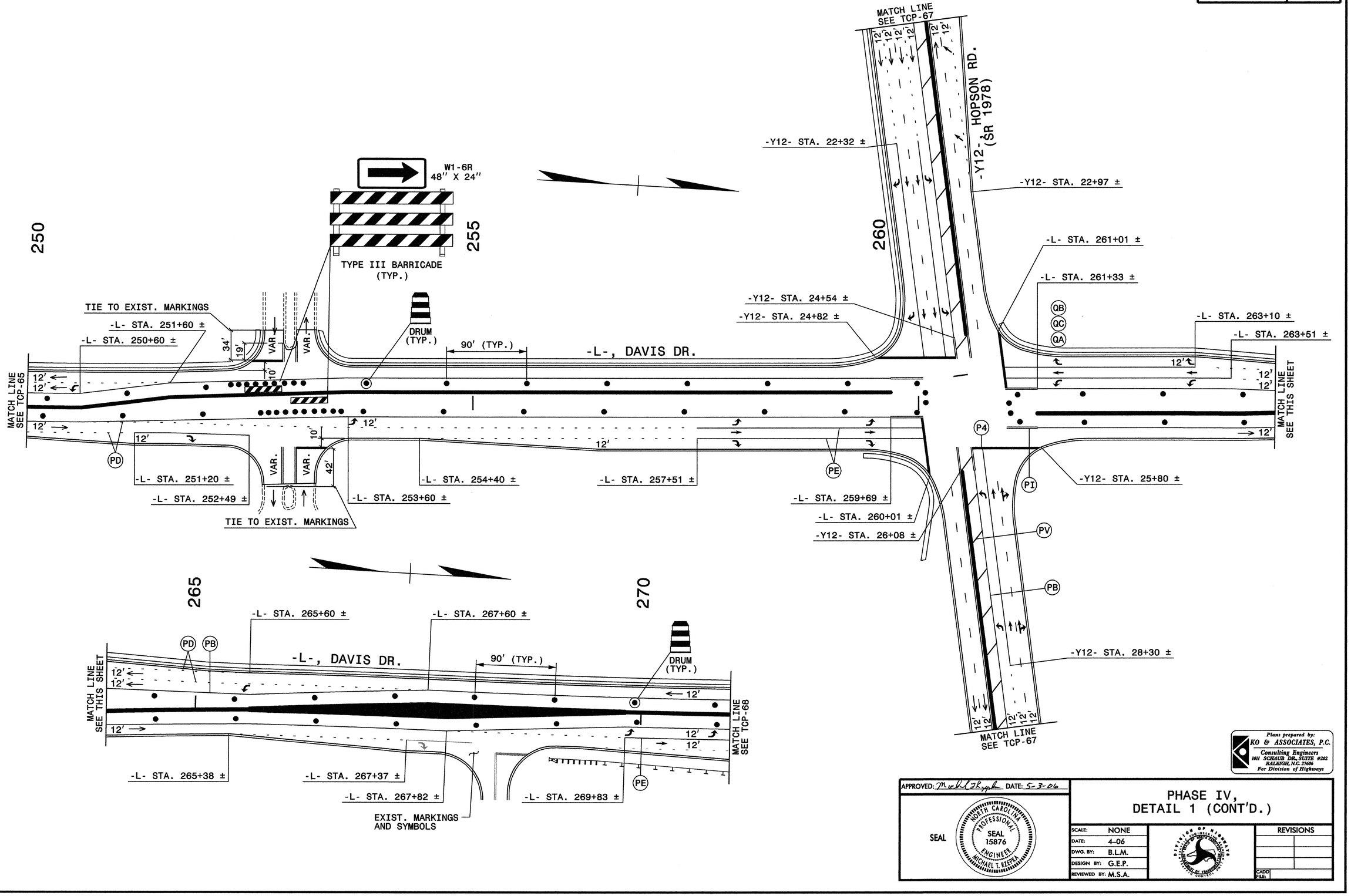
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS — TRAFFIC ENGINEERING BRANCH — TRAFFIC ENGINEERING DESIGN UNIT

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-66



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T Reppa DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. REPPA

PHASE IV, DETAIL 1 (CONT'D.)

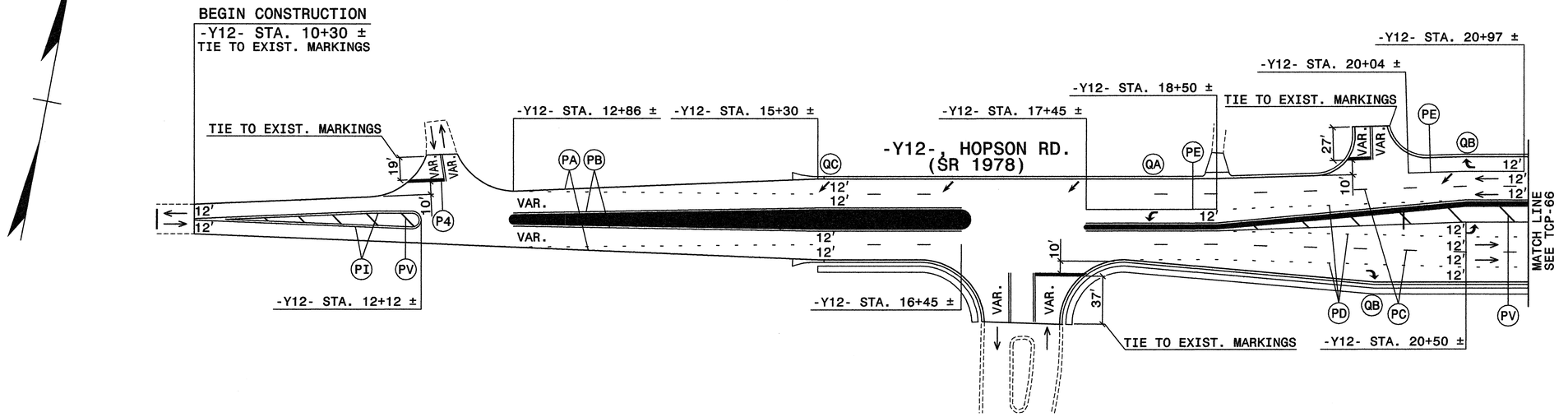
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DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

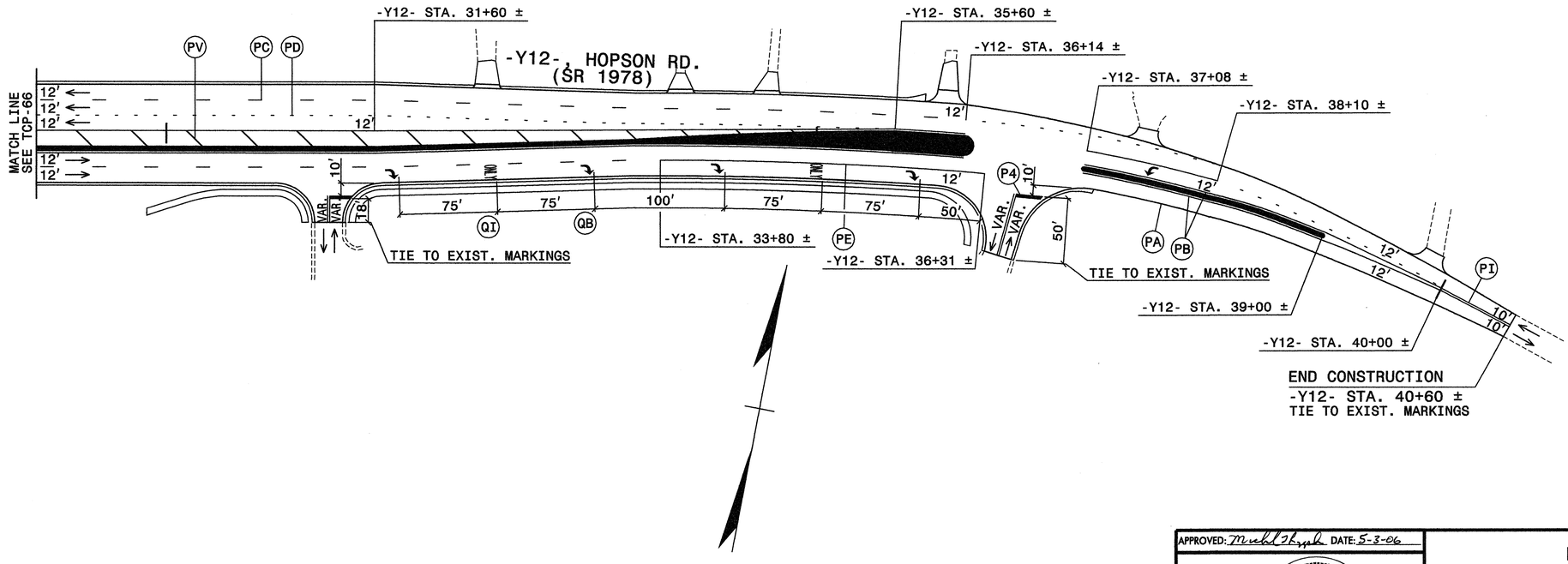
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC SIGNAL UNIT

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-67





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04/06/2006 09:35:46 AM

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Ryan DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIEPMA

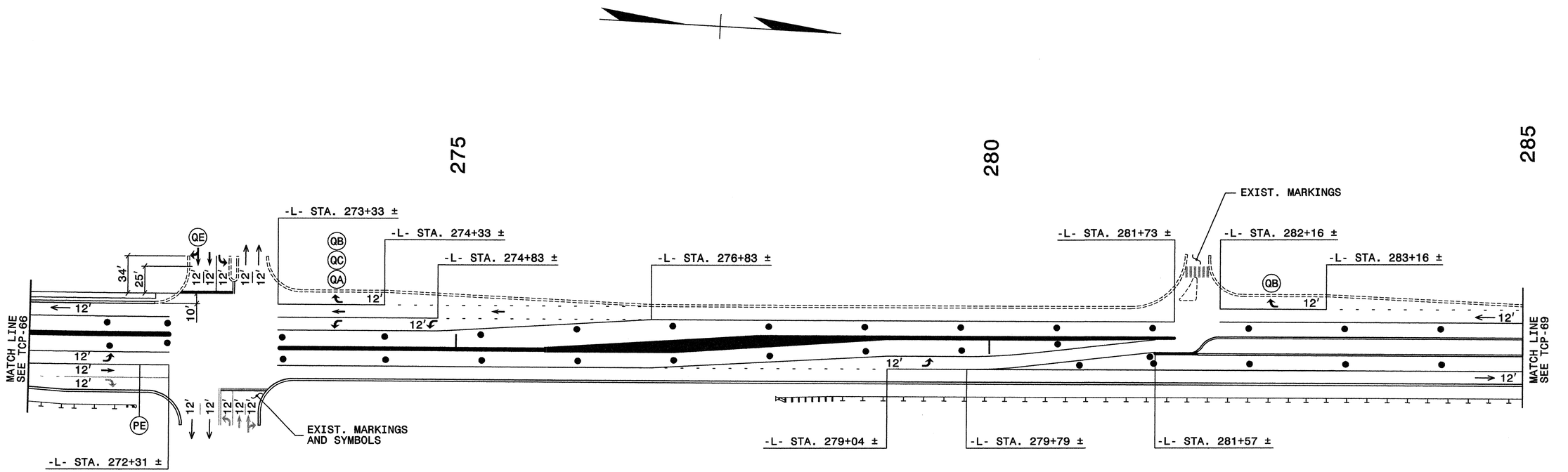
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DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS
STATEWIDE PLANNING BRANCH
TRAFFIC ENGINEERING BRANCH
NCDOT

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-68



Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael T. Ripka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RIPKA

PHASE IV, DETAIL 1 (CONT'D.)

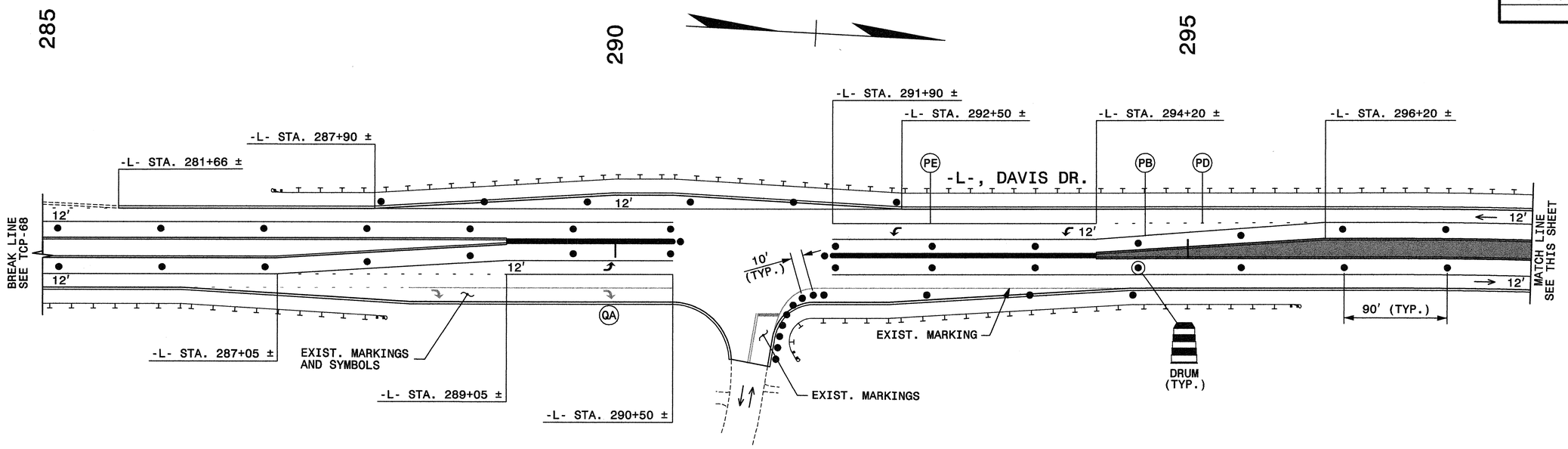
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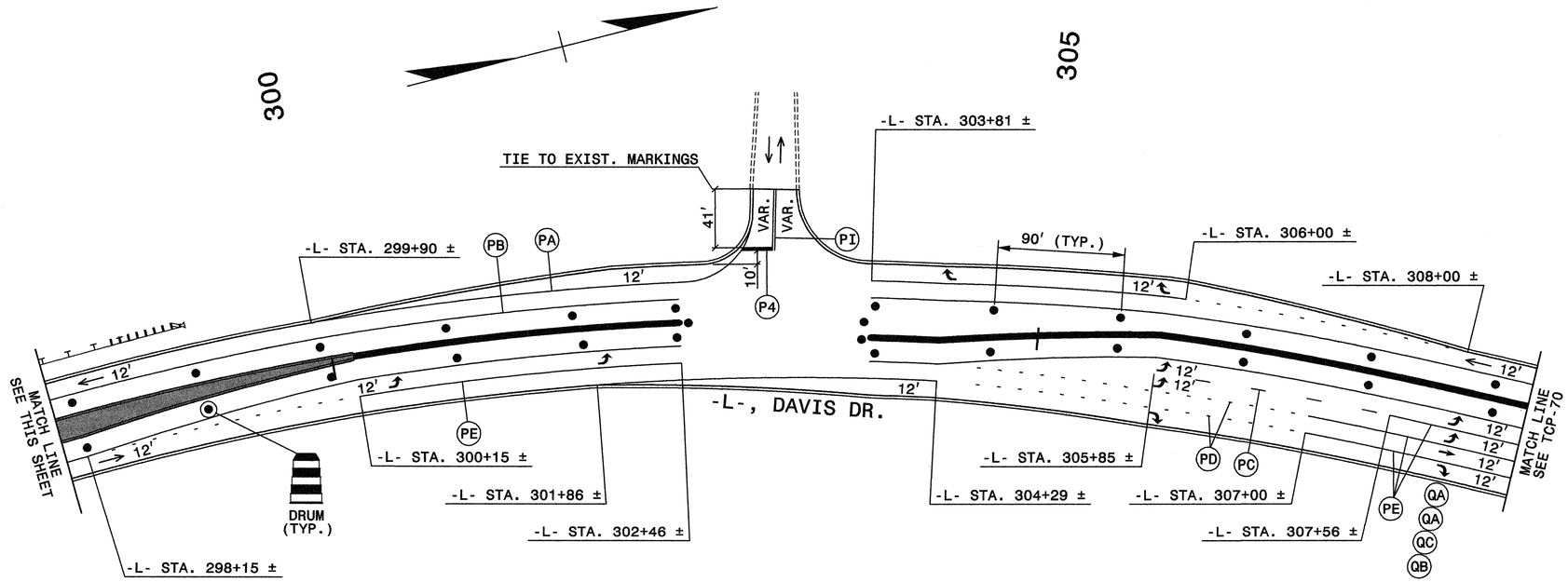
DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL

REVISIONS	
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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-69





Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: [signature] DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. REPPA

PHASE IV, DETAIL 1 (CONT'D.)

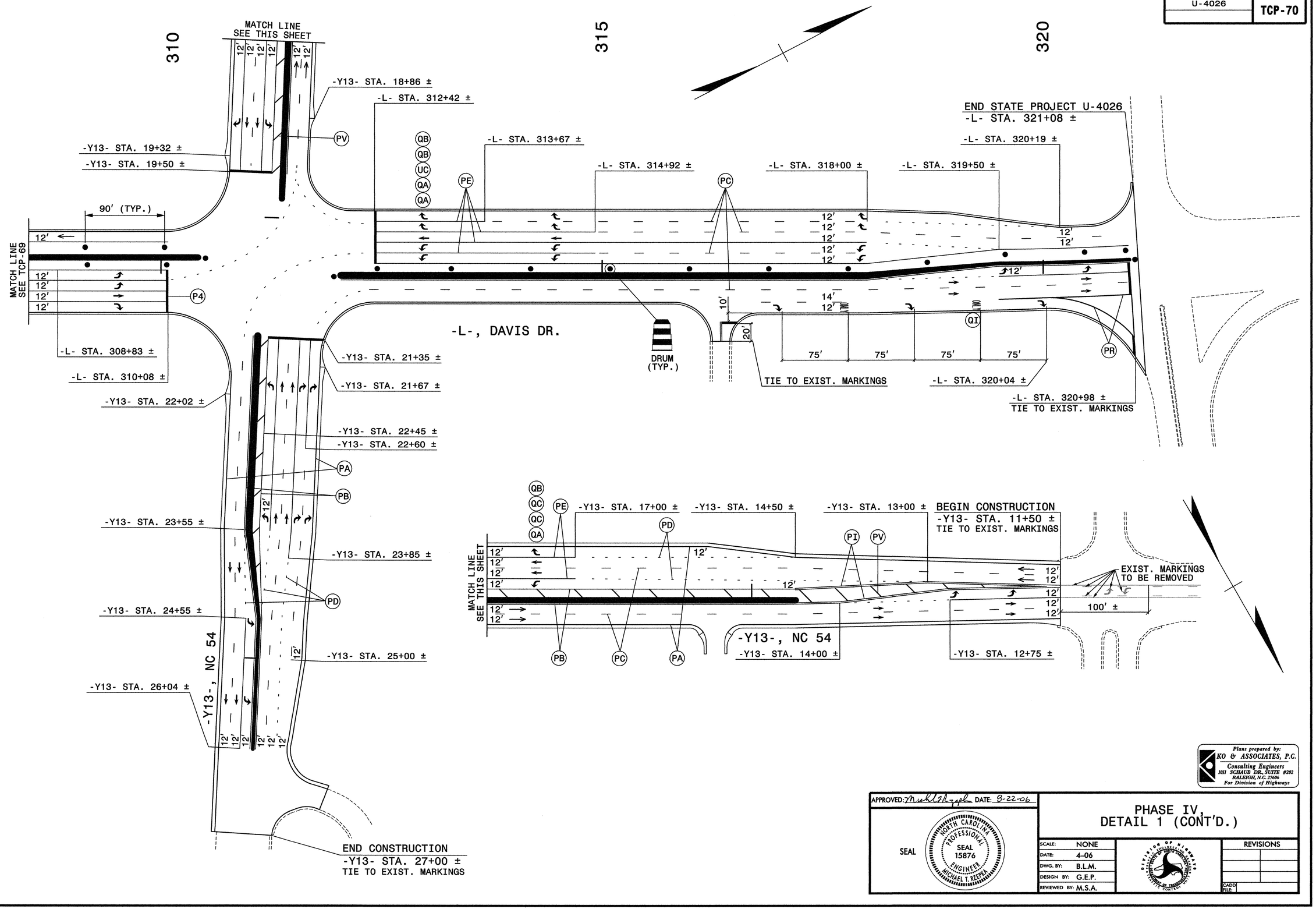
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DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC CONTROL UNIT

REVISIONS	
CADD FILE:	

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PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-70



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08/22/2006 11:18:21 AM

Plans prepared by:
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RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael Rzepka DATE: 8-22-06

SEAL
NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. RZEPKA

PHASE IV, DETAIL 1 (CONT'D.)

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

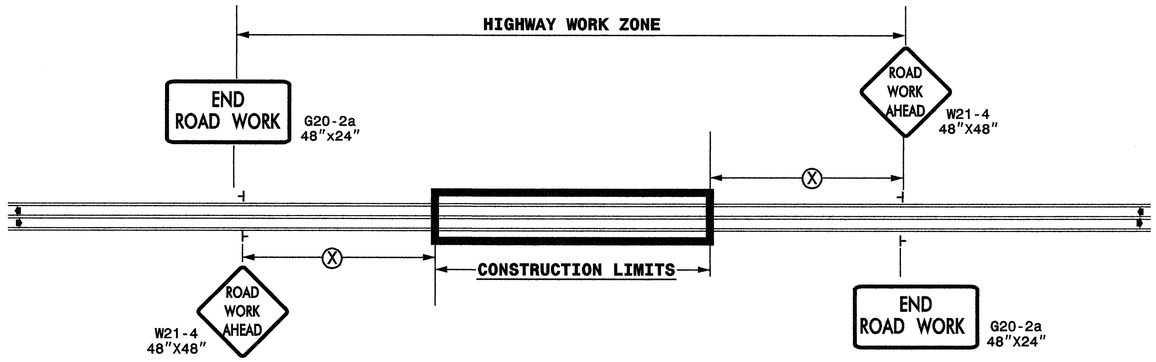
DIVISION OF HIGHWAYS — TRAFFIC ENGINEERING BRANCH — N.C. DEPARTMENT OF TRANSPORTATION

REVISIONS

CADD FILE:

PROJ. REFERENCE NO.	SHEET NO.
U-4026	TCP-71

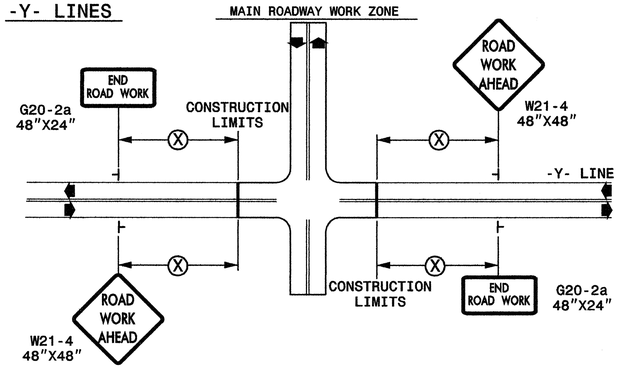
TWO-WAY UNDIVIDED & URBAN FREEWAYS (L-LINES)



POSTED SPEED LIMIT (M.P.H.)	RECOMMENDED MINIMUM SIGN SPACING (X)
≤ 50	500'
≥ 55	1000'

STATE OF NORTH CAROLINA
DEPT. OF TRANSPORTATION
DIVISION OF HIGHWAYS
RALEIGH, N.C.

ROADWAYS INTERSECTING ALONG 2 WAY UNDIVIDED WORK ZONE (Y-LINES)



DETAIL DRAWING FOR
TWO-WAY UNDIVIDED
WORK ZONE WARNING SIGNS

GENERAL NOTES

- USE FLUORESCENT ORANGE SHEETING (TYPE VII OR IX) ON ALL ADVANCED WORK ZONE SIGNS.
- DO NOT INSTALL ADVANCE WARNING SIGNS MORE THAN 3 DAYS PRIOR TO BEGINNING OF WORK.
- SIGNS SHOWN ARE REQUIRED FOR WORK ZONES THAT WILL REMAIN IN EFFECT OVERNIGHT. FOR SHORT-TERM DAILY MAINTENANCE TYPE OPERATIONS, THIS SIGNING APPLICATION IS OPTIONAL; MAY USE ONLY APPLICABLE ROADWAY STANDARD DRAWINGS INSTEAD. HOWEVER, IF THIS SIGNING APPLICATION IS USED, SIGNS MAY BE PORTABLE MOUNTED.
- ALL SIGN SPACING DIMENSIONS ARE APPROXIMATE, FIELD ADJUST AS NECESSARY OR AS DIRECTED.
- USE 3LB STEEL U-CHANNEL POST OR 4" X 4" WOOD POST FOR ALL WORK ZONE SIGNS. 3LB STEEL U-CHANNEL POSTS MUST MEET THE REQUIREMENTS OF STANDARD SPECIFICATION SECTION 1094-1(B). MAY BE GALVANIZED STEEL, OR MAY BE PAINTED GREEN BY THE POST MANUFACTURER. SQUARE STEEL TUBING POSTS HAVING EQUIVALENT STRENGTH OF THE 3 LB STEEL U-CHANNEL POST ARE ALSO ACCEPTABLE FOR USE. ERECT SIGNS PER ROADWAY STANDARD DRAWING 1110.01. PAYMENT FOR WOOD POSTS, 3LB STEEL U-CHANNEL AND SQUARE STEEL TUBING POSTS WITH SIGNS WILL BE MADE ACCORDING TO STANDARD SPECIFICATION "WORK ZONE SIGNS" SECTION 1110.
- WHEN NECESSARY, USE SPLICING IN ACCORDANCE WITH ROADWAY STANDARD DRAWING NO. 1110.01. REMOVE ENTIRE POST WHEN REMOVING SIGNS WITH SPLICED POSTS.
- DO NOT BACK BRACE SIGN SUPPORTS.

LEGEND

- ⊢ STATIONARY SIGN
- DIRECTION OF TRAFFIC FLOW

Plans prepared by:
KO & ASSOCIATES, P.C.
Consulting Engineers
1011 SCHAUB DR., SUITE #202
RALEIGH, N.C. 27606
For Division of Highways

APPROVED: Michael Kzpka DATE: 5-3-06

SEAL

NORTH CAROLINA PROFESSIONAL SEAL 15876 ENGINEER MICHAEL T. KZEPKA

DETAIL DRAWING FOR TWO-WAY UNDIVIDED AND URBAN FREEWAYS ADVANCED WORK ZONE WARNING SIGNS

SCALE:	NONE
DATE:	4-06
DWG. BY:	B.L.M.
DESIGN BY:	G.E.P.
REVIEWED BY:	M.S.A.

DIVISION OF HIGHWAYS TRAFFIC ENGINEERING BRANCH TRAFFIC ENGINEERING CONTROL UNIT

REVISIONS

CADD FILE

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