METROPOLITAN GOVERNMENT OF NASHVILLE AND DAVIDSON COUNTY, TENNESSEE

BELL ROAD BIKEWAY AND ROADWAY IMPROVEMENTS FROM SMITH SPRINGS ROAD TO BLACKWOOD DRIVE (APPROX. 4.42 L.M.) APRIL 2025

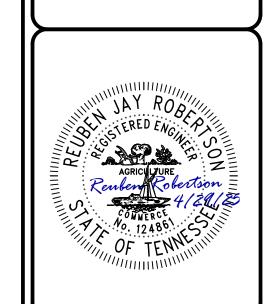


DRAWING INDEX

STA 233+48

20. PROPOSED LAYOUT STA 158+60 TO STA 167+40 21. PROPOSED LAYOUT STA 167+40 TO STA 178+00 22. PROPOSED LAYOUT STA 178+00 TO STA 188+6 23. PROPOSED LAYOUT STA 188+60 TO STA 199+00 24. PROPOSED LAYOUT STA 199+00 TO STA 207+60 25. PROPOSED LAYOUT STA 207+60 TO STA 218+40 PROPOSED LAYOUT STA 218+40 TO STA 229+40 27. PROPOSED LAYOUT STA 229+40 TO STA 233+48

COUNCIL DISTRICT: 13 COUNCIL MEMBER: RUSS BRADFORD



	PROJECT NUMBE	:R: NDT420
	DATE : 4-2025	SCALE: AS SHOWN
	DRAWN BY:	DESIGNED BY:
ı	JEP	ZDB

SHEET TITLE:

COVER SHEET

SHEET 1 of 27

LDA ENGINEERING

402 BNA DRIVE SUITE 403 NASHVILLE, TENNESSEE 37217 TELEPHONE: 877-754-8254 FAX: 865-573-1352

BEGIN PROJECT

THIS DOCUMENT AND THE IDEAS AND DESIGNS INCORPORATED HEREIN, AS AN INSTRUMENT OF PROFESSIONAL SERVICE, IS THE PROPERTY OF LDA ENGINEERING AND IS NOT TO BE USED, IN WHOLE OR IN PART, FOR ANY OTHER PROJECT WITHOUT THE WRITTEN AUTHORIZATION OF LDA ENGINEERING.

LOCATION MAP: SCALE: 1"=3000

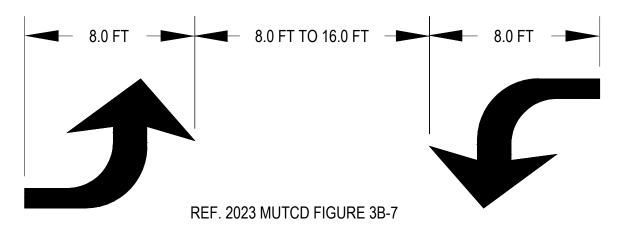
TYPICAL STOP LINE PLACEMENT AND CROSSWALK

MARKINGS

NOT TO SCALE

C - THROUGH LANE-USE ARROW A - STRAIGHT-TURN LANE ARROW 12.75 FT REF. 2023 MUTCD FIGURE 3B-21

B - TWO-WAY LEFT TURN LANE ARROW COMBINATION LAYOUT

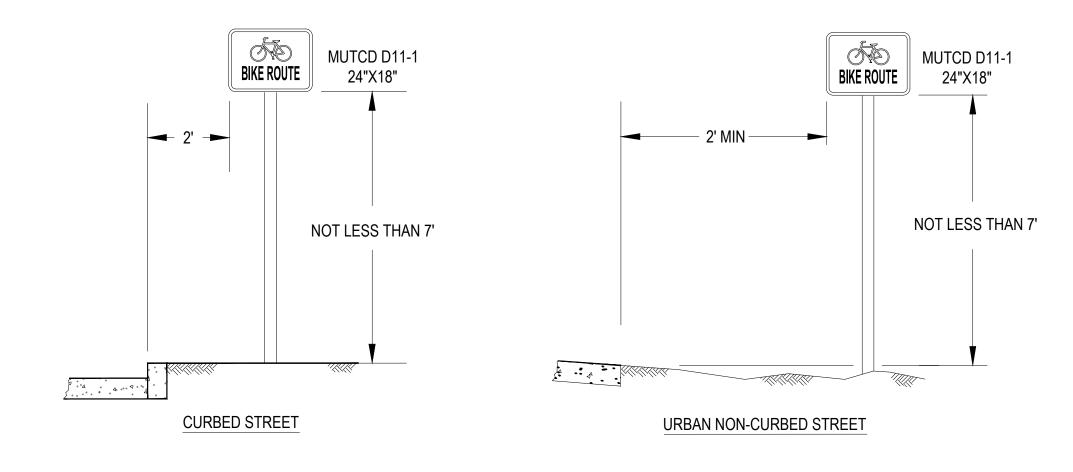


TURN ARROWS SHALL BE PLACED IN THE TURN LANES AT THE LOCATIONS SPECIFIED IN THE PLANS.

TURN LANE ARROW DETAIL NOT TO SCALE

**SPECIAL NOTES:

- ALL PAVEMENT MARKINGS AND SIGNAGE SHALL BE IN ACCORDANCE WITH THE CURRENT EDITION OF "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES" (2023 MUTCD)
- CONTRACTOR IS RESPONSIBLE FOR INSTALLATION OF ROADWAY MARKINGS AND SIGNS.
- BIKEWAY SIGNAGE SHALL BE PLACED PER DIRECTION OF THE FIELD ENGINEER.
- SHARROW AND BIKE LANE PAVEMENT MARKING SHALL BE PLACED PER DIRECTION OF METRO REPRESENTATIVE.
- SHARROW AND BIKE LANE PAVEMENT MARKING SHALL NOT BE PLACED IN FRONT OF DRIVEWAYS.
- BIKEWAY PROJECTS SHALL COORDINATE WITH METRO TRAFFIC DEPARTMENT.

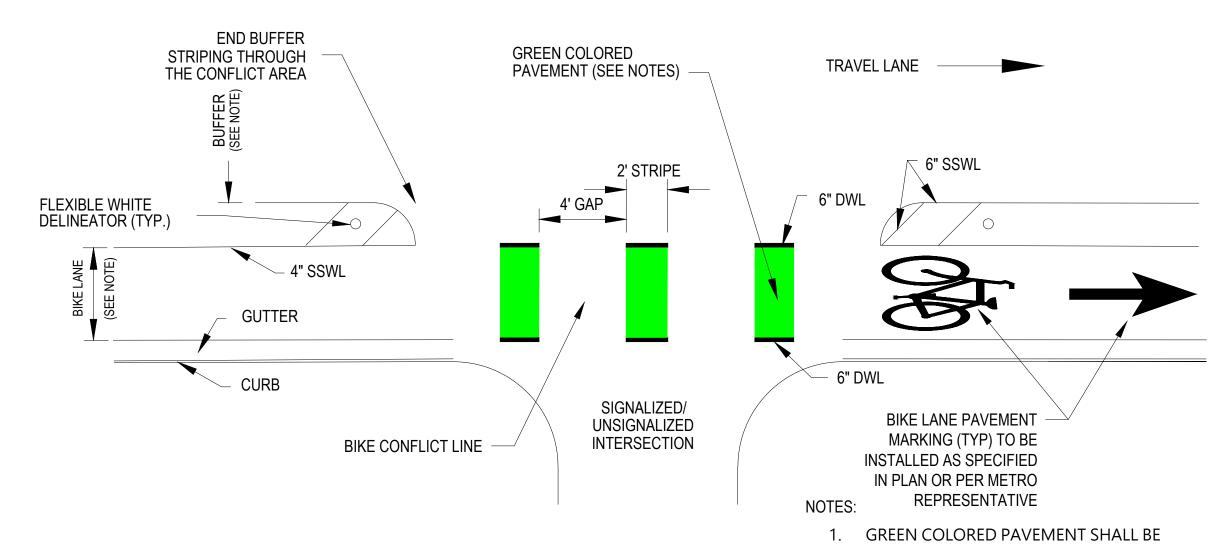


SIGN INSTALLATION NOTES:

- 1. ALL SIGNS SHALL BE INSTALLED IN THE APPROXIMATE LOCATIONS SHOWN ON PLAN SHEETS. ANY DEVIATION MUST BE APPROVED BY THE METROPOLITAN DEPARTMENT OF PUBLIC WORKS.
- 2. SIGNS SHALL BE INSTALLED IN STRICT ACCORDANCE WITH THE CURRENT EDITION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (2023 MUTCD), AND SHALL HAVE THE HEIGHT AND CLEARANCE SPECIFICATIONS SHOWN ON THIS SHEET.
- 3. ALL SIGNING EQUIPMENT AND INSTALLATION PROCEDURES SHALL COMPLY WITH THE T.D.O.T. STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, SECTION 713 - HIGHWAY SIGNING, AND WITH THE SPECIFICATIONS OF METROPOLITAN NASHVILLE AND DAVIDSON COUNTY.
- 4. IF A SECOND SIGN IS MOUNTED BELOW AN EXISTING SIGN, IT SHALL BE 7' ABOVE TOP OF CURB

HEIGHT AND LATERAL LOCATION OF SIGNS - TYPICAL INSTALLATIONS

NOT TO SCALE



REQUIRED AT ALL INTERSECTIONS

2. GREEN COLORED PAVEMENT SHALL FILL IN AREA NEXT TO DOTTED LONGITUDINAL LINE ACROSS CONFLICT ZONE (2023 MUTCD, SECTION 3H.06)

BIKE CONFLICT LINE (BCL) AT INTERSECTIONS

NOT TO SCALE

• BIKE LANE WIDTH AND BUFFER WIDTH SPECIFIED ON THE PLANS. BIKE LANE WIDTH DIMENSION SHOWN ON THE PLANS INCLUDES THE EXIST. GUTTER PAN IF APPLICABLE.

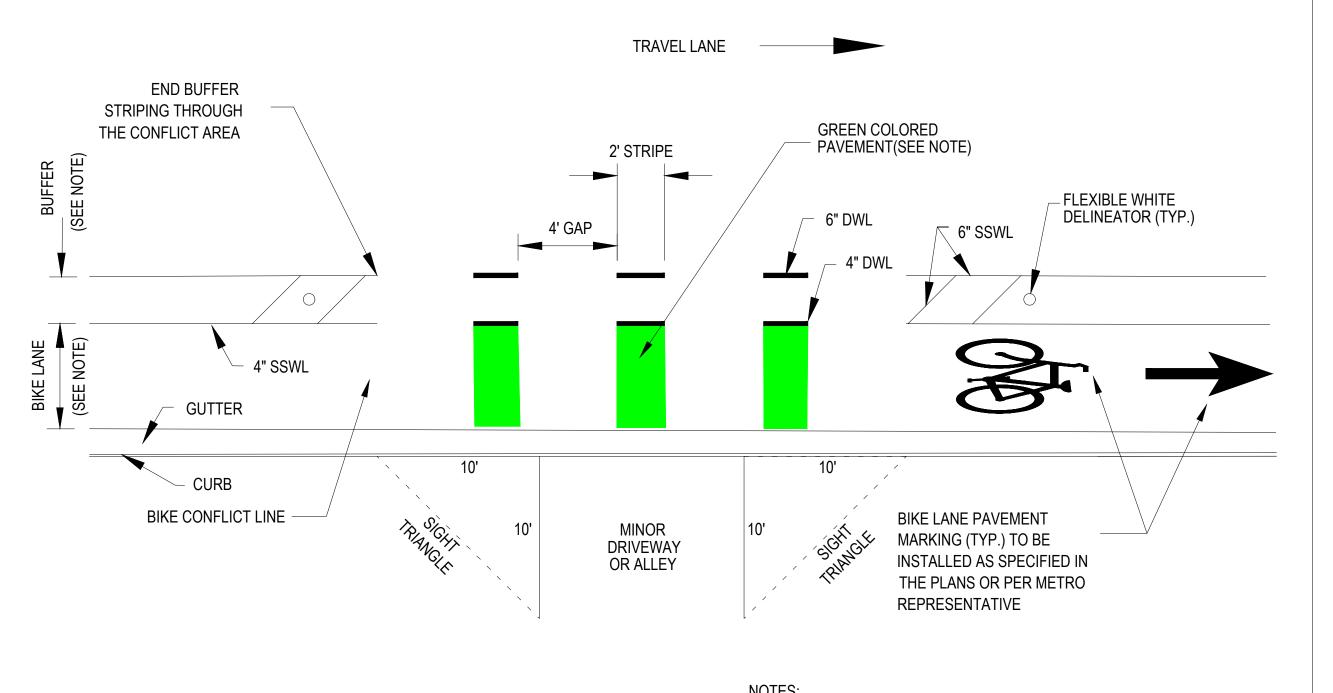
∘ 36" WHITE FLEXIBLE DELINEATOR POSTS TO BE INSTALLED WITHIN THE BUFFER AT 40' SPACING CONTRACTOR TO COORDINATE WITH MPW PRIOR TO INSTALLATION.

PROJECT NUMBER: NDT420 **DATE**: 4-2025 DESIGNED BY: DRAWN BY: SHEET TITLE:

TYPICAL DETAILS

SHEET 2 of 27

THIS DOCUMENT AND THE IDEAS AND DESIGNS INCORPORATED HEREIN, AS AN INSTRUMENT OF PROFESSIONAL SERVICE, IS THE PROPERTY OF LDA ENGINEERING AND IS NOT TO BE USED, IN WHOLE OR IN PART, FOR ANY OTHER PROJECT WITHOUT THE WRITTEN AUTHORIZATION OF LDA ENGINEERING.



GREEN COLORED PAVEMENT IS NOT REQUIRED AT DRIVEWAY LOCATIONS BUT MAY BE INSTALLED AS NEEDED (SEE PLANS) GREEN COLORED PAVEMENT SHALL FILL IN AREA NEXT TO DOTTED LONGITUDINAL LINE ACROSS CONFLICT ZONE (2023 MUTCD, SECTION 3H.06)

SIGHT TRIANGLE & BIKE CONFLICT LINE (BCL) DETAIL AT DRIVEWAYS/ALLEYS

BIKE LANE

BIKE LANE BUFFER PAVEMENT MARKINGS

NOT TO SCALE

VEHICLE TRAVEL LANE

6" SSWL

WIDTH VARIES (SEE PLANS)

TRAVEL LANE BIKE LANE SYMBOL 4" DSYL **BIKE BOX DETAIL** SECTION A-A TAPE, TYP. TYP.

24" STOP LINE (WHITE)

SOLID GREEN COLORED PAVEMENT SHALL BE

WHERE A BIKE BOX IS PROVIDED ACROSS

SIGNS TO BE PLACED IN ACCORDANCE WITH

4. IF SIDEWALKS ARE PRESENT, THEN SIGNS SHALL NOT OBSTRUCT THE PEDESTRIAN ACCESS ROUTE.

24" STOP LINE (WHITE) -

GREEN PAVEMENT

MULTIPLE LANES OF AN APPROACH, COUNTDOWN

CROSSWALKS ACROSS THE APPROACH ON WHICH

2023 MUTCD SECTION 9E.12 AND PER LOCATIONS

PEDESTRIAN SIGNALS SHALL BE PROVIDED FOR THE

REQUIRED FOR BIKE BOX INSTALLATIONS

THE BIKE BOX IS LOCATED.

SPECIFIED ON THE PLANS

- WHITE REFLECTIVE DELINEATOR POST, HOLES FOR BASE MOUNT

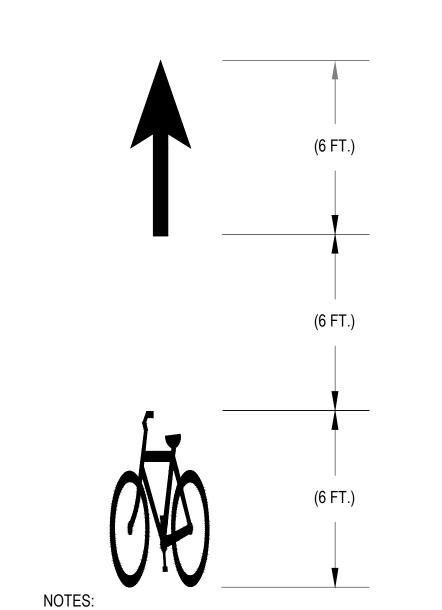
> SHOWN WITH TYPICAL REFLECTIVE TAPE APPLIED

POST IS RETAINED TO BASE WITH 2 PINS

- INSTALLATION TO BE COMPLETED IN ACCORDANCE WITH
- MANUFACTURER'S SPECIFICATIONS.
- DIMENSIONS, MATERIALS, AND ATTACHMENTS MAY VARY BETWEEN MANUFACTURERS.
- COLOR OF POST SHALL MATCH COLOR OF APPLICABLE EDGE LINE AS NOTED IN PLANS.
- SUGGESTED MANUFACTURERS INCLUDE: PEXCO DAVIDSON TRAFFIC CONTROL, SUPERIOR TRAFFIC CONTROL OR APPROVED BY METRO REPRESENTATIVE
- DELINEATORS SHALL BE SPACED 40' CENTER-TO-CENTER OR AS SHOWN IN THE PLANS
- CONTRACTOR TO COORDINATE WITH MPW PRIOR TO INSTALLATION.

36" FLEXIBLE DELINEATOR POST DETAIL

NOT TO SCALE



BEGIN GREEN PAVEMENT

50' MINIMUM BEFORE

STOP LINE

1. REFER TO MUTCD 2023 EDITION PART 9 FIGURE 9E-1 WORD, SYMBOL, AND ARROW PAVEMENT MARKINGS FOR BICYCLE LANES. REDUCED SIZE MARKINGS TO BE USED WHERE REQUIRED IN THE FIELD, SCALE AS NEEDED.

2. BIKE LANE PAVEMENT MARKING SYMBOLS SHALL BE INSTALLED AT 800' SPACING OR IMMEDIATELY FOLLOWING A CONFLICT ZONE AS SHOWN IN THE PLANS.

BIKE LANE PAVEMENT MARKING **DETAIL**

NOT TO SCALE

R10-11 24"X30"

R3-7BP

24"X12"

R10-6

24"X36"

R3-7BP

EXCEPT

BICYCLES

STOP

HERE ON **RED**

EXCEPT

MINOR STREET

INTERSECTION/

12'

CURB

- GUTTER

10' SPACE FOR CROSSWALK

TRAVEL LANE

BIKE LANE

ARROW

NOT TO SCALE

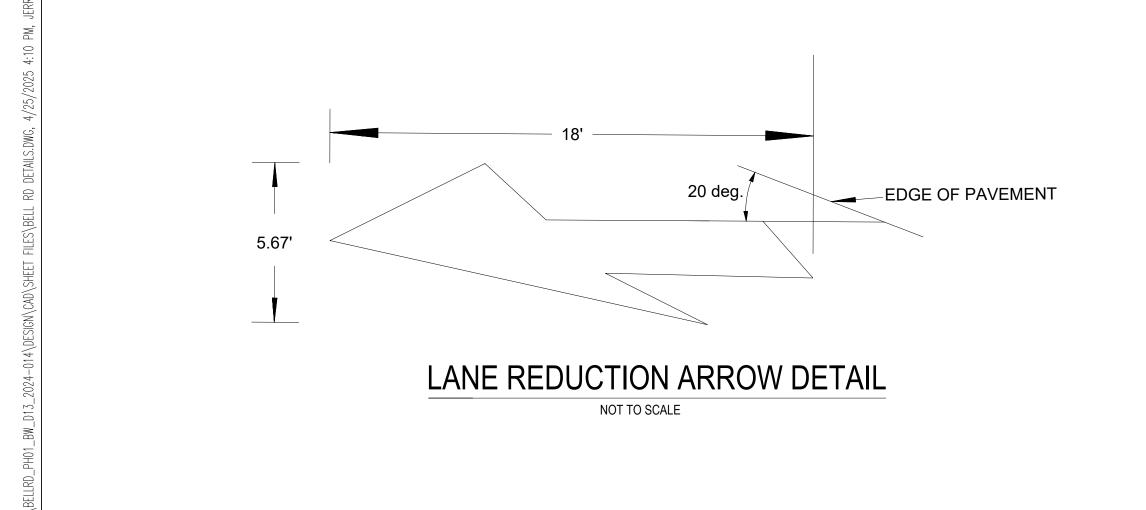
SYMBOL WITH-

4" SSWL

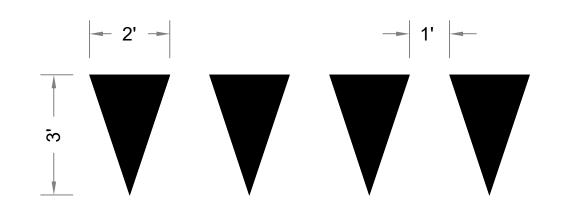
PROJECT NUMBER: NDT420 **DATE**: 4-2025 **DESIGNED BY:** DRAWN BY: SHEET TITLE:

TYPICAL DETAILS

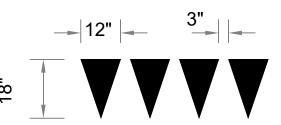
SHEET 3 OF 27



THIS DOCUMENT AND THE IDEAS AND DESIGNS INCORPORATED HEREIN, AS AN INSTRUMENT OF PROFESSIONAL SERVICE, IS THE PROPERTY OF LDA ENGINEERING AND IS NOT TO BE USED, IN WHOLE OR IN PART, FOR ANY OTHER PROJECT WITHOUT THE WRITTEN AUTHORIZATION OF LDA ENGINEERING.



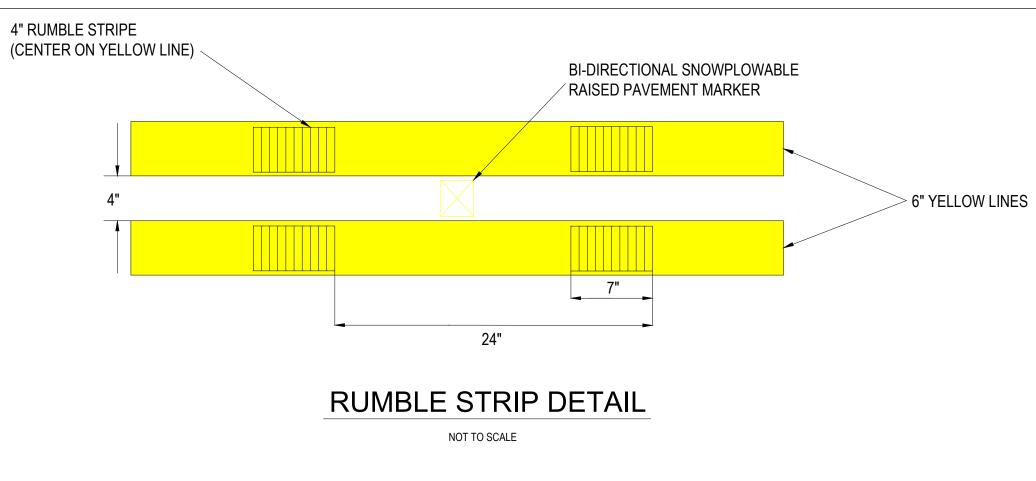
YIELD LINE FOR BIKE LANE



REFER TO MUTCD 2023 EDITION SECTION 3B.19 AND FIGURE 3B-16. FOR RECOMMENDED YIELD LINE LAYOUTS. ALSO SEE TDOT T-M-4A, SHEET 4

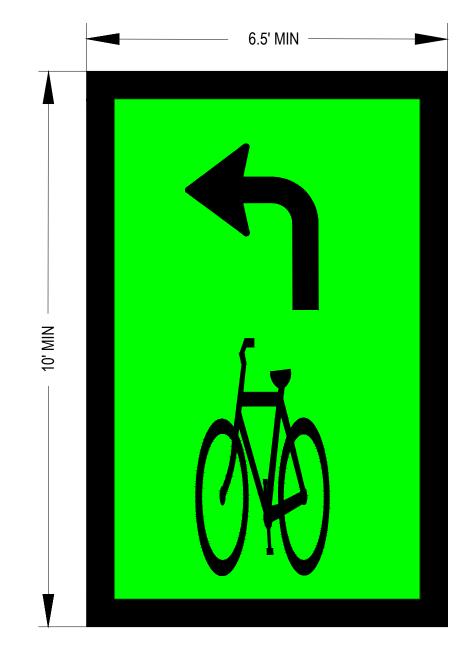
YIELD LINE DETAIL

NOT TO SCALE



RUMBLE STRIP INSTALLATION LOCATIONS			
SEGMENT	FROM	ТО	
1	STA 17+30	STA 61+05	
2	STA 69+50	STA 79+90	
3	STA 85+50	STA 102+30	
4	STA 133+25	STA 140+30	
5	STA 141+50	STA 146+80	
6	STA 147+20	STA 151+80	
7	STA 152+40	STA 153+60	
8	STA 173+80	STA 186+00	

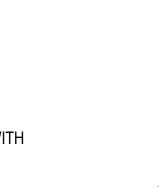
- RUMBLE STRIPE SHALL HAVE A DEPTH OF
- RAISED PAVEMENT MARKERS SHALL BE SPACED 80' CENTER TO CENTER UNLESS SPECIFIED OTHERWISE ON THE PLANS.



TWO STAGE TURN QUEUE DETAIL

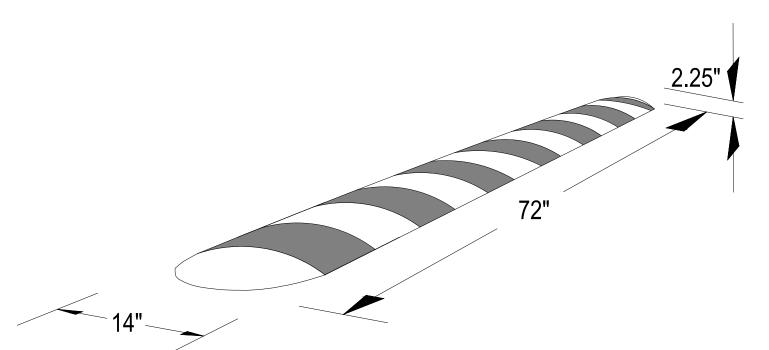
THIS DOCUMENT AND THE IDEAS AND DESIGNS INCORPORATED HEREIN, AS AN INSTRUMENT OF PROFESSIONAL SERVICE, IS THE PROPERTY OF LDA ENGINEERING AND IS NOT TO BE USED, IN WHOLE OR IN PART, FOR ANY OTHER PROJECT WITHOUT THE WRITTEN AUTHORIZATION OF LDA ENGINEERING.

NOT TO SCALE



NOTES:

- INSTALLATION SHALL BE COMPLETED IN ACCORDANCE WITH MANUFACURER'S SPECIFICATIONS (TREETOP PRODUCTS SKU 3ZB3035-BK OR SIMILAR).
- SPEED BUMPS SHALL BE INSTALLED AT 45-DEGREE ANGLE TOWARD DIRECTION OF TRAVEL AS SHOWN IN THE PLANS.
- SPEED BUMPS SHALL BE INSTALLED FLUSH TO THE GROUND WITH HARDWARE HOLES ON EITHER SIDE OF THE SPEED BUMP.



SPEED BUMP

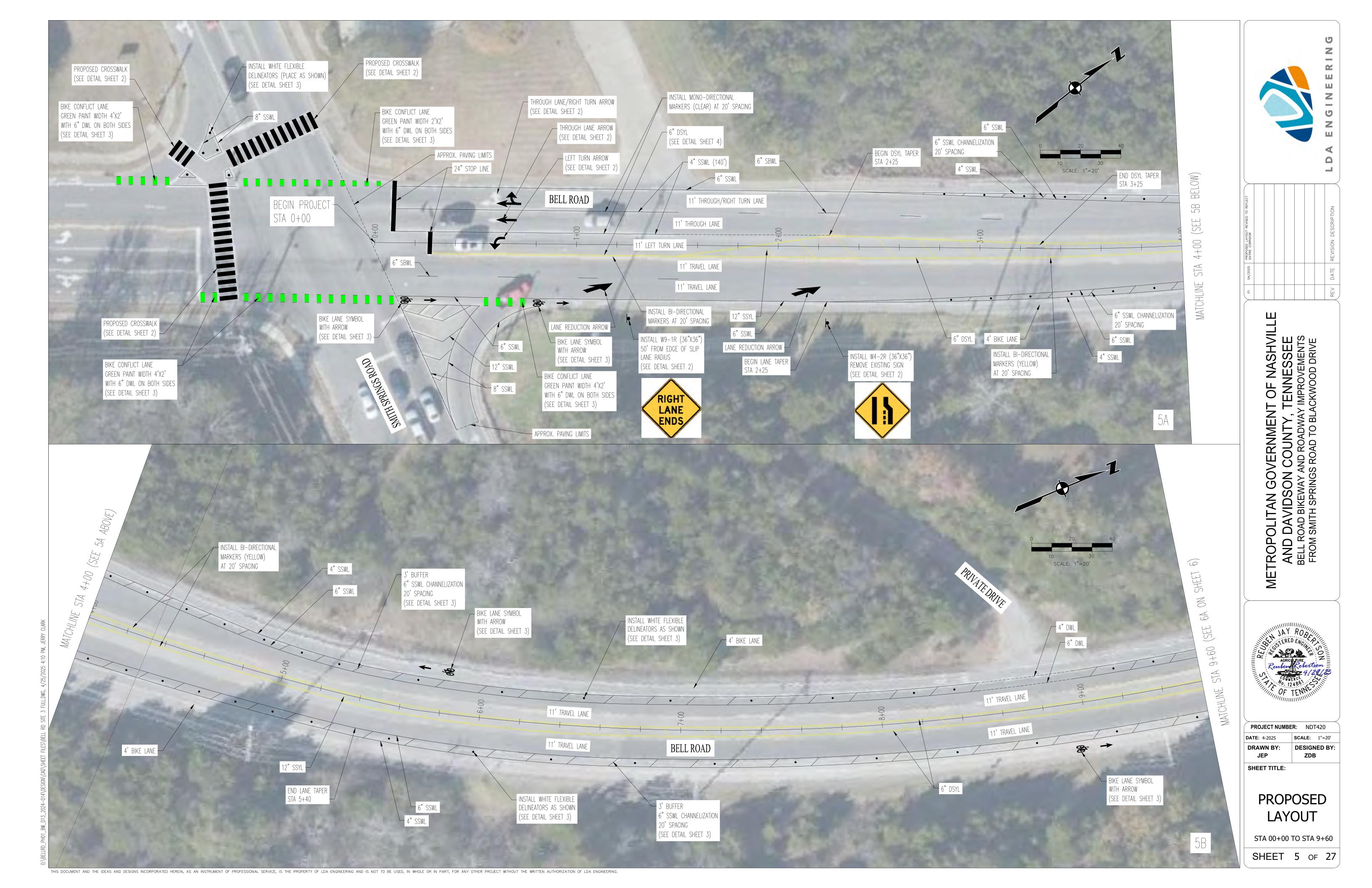
DETAIL NOT TO SCALE

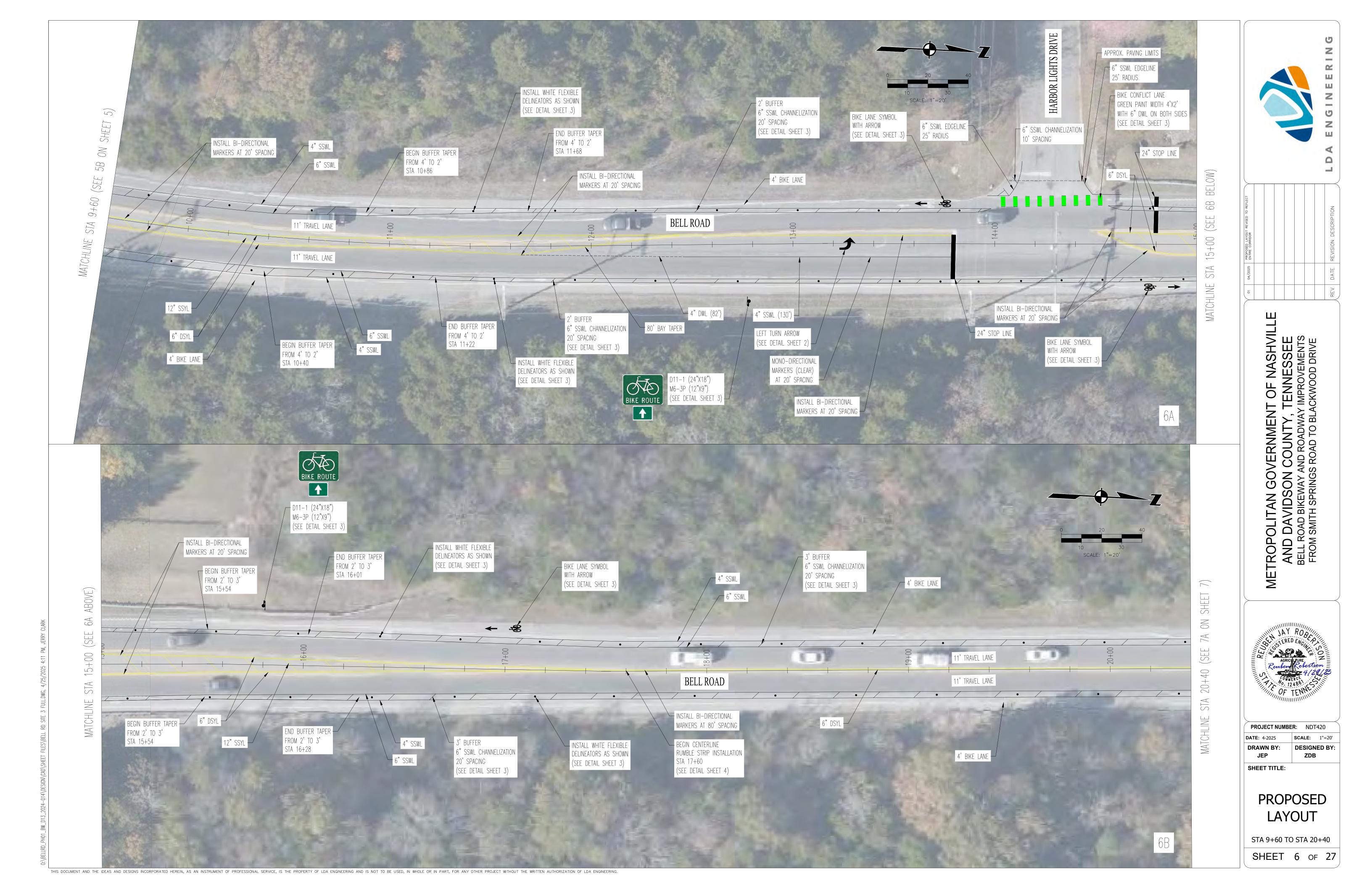
SHEET TITLE: TYPICAL DETAILS

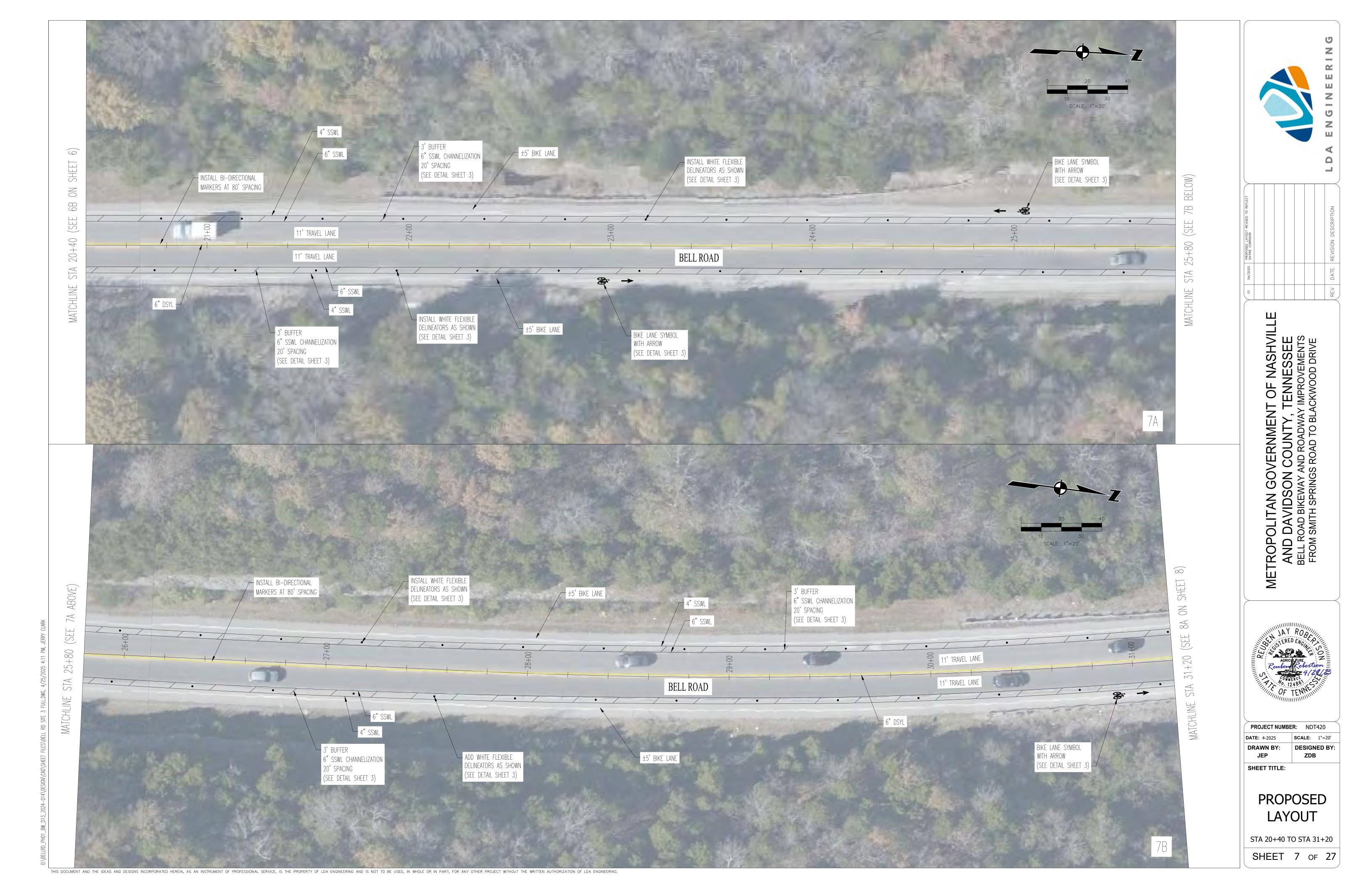
DATE: 4-2025

SHEET 4 of 27

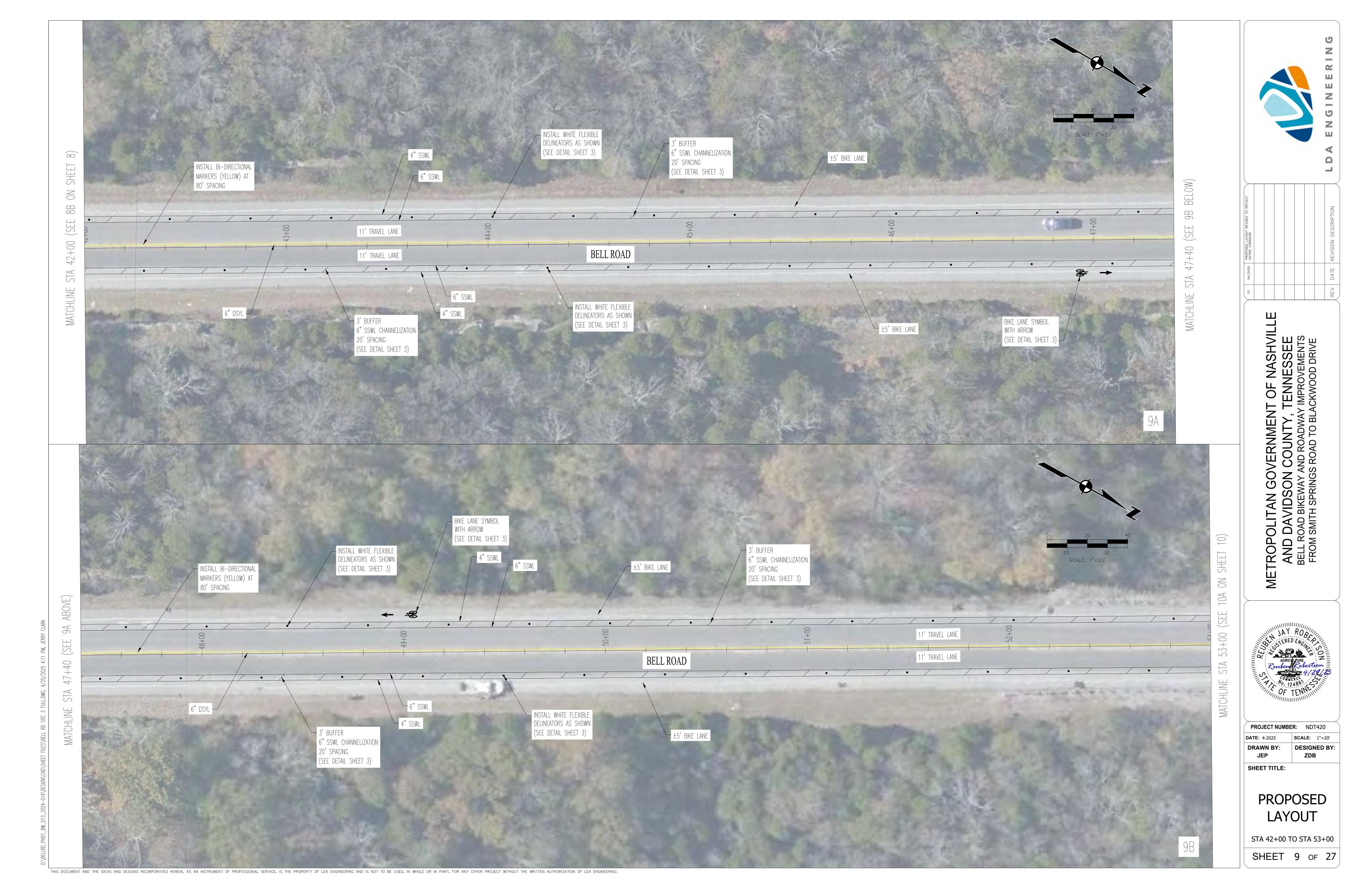
DESIGNED BY:



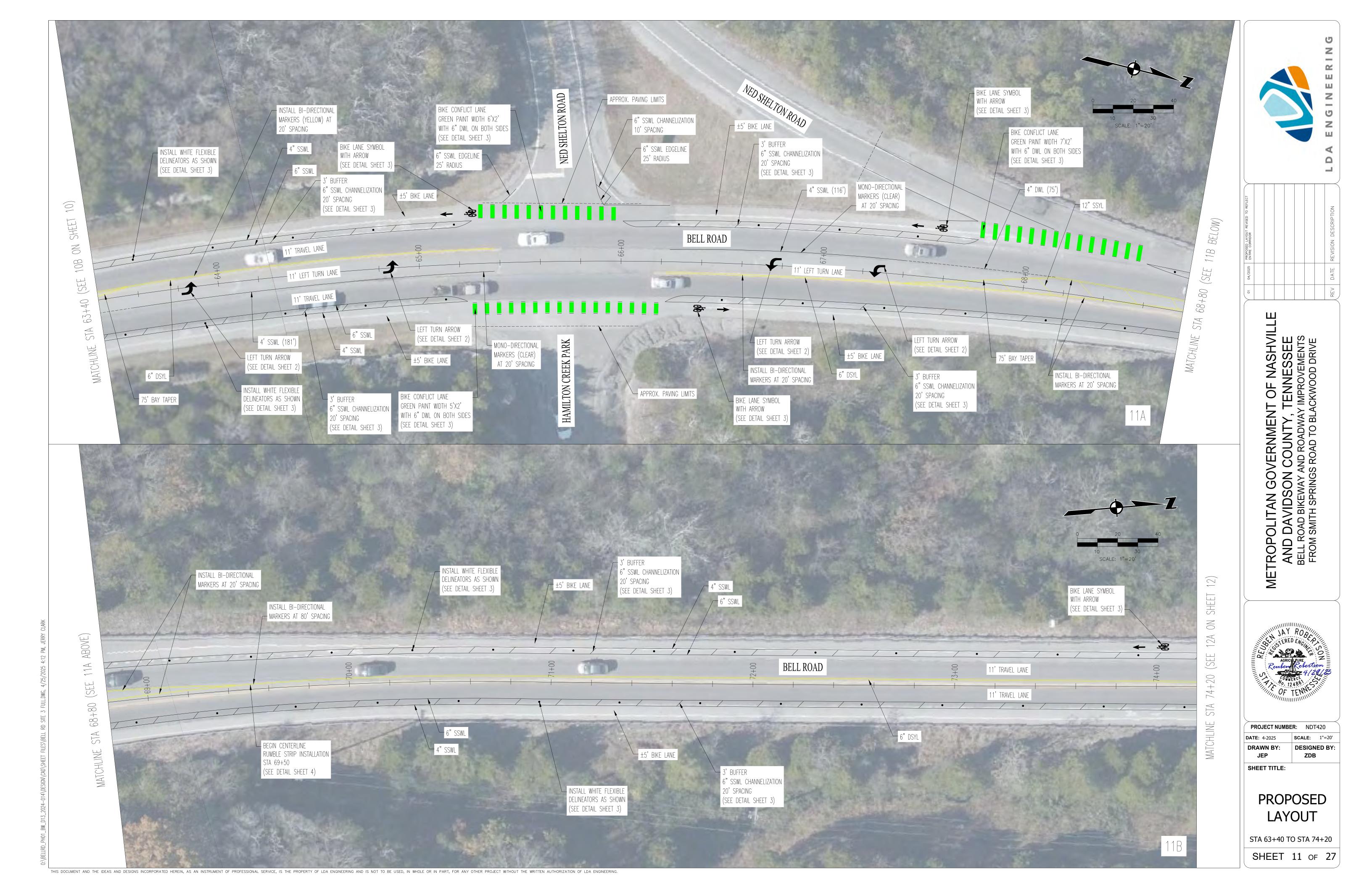


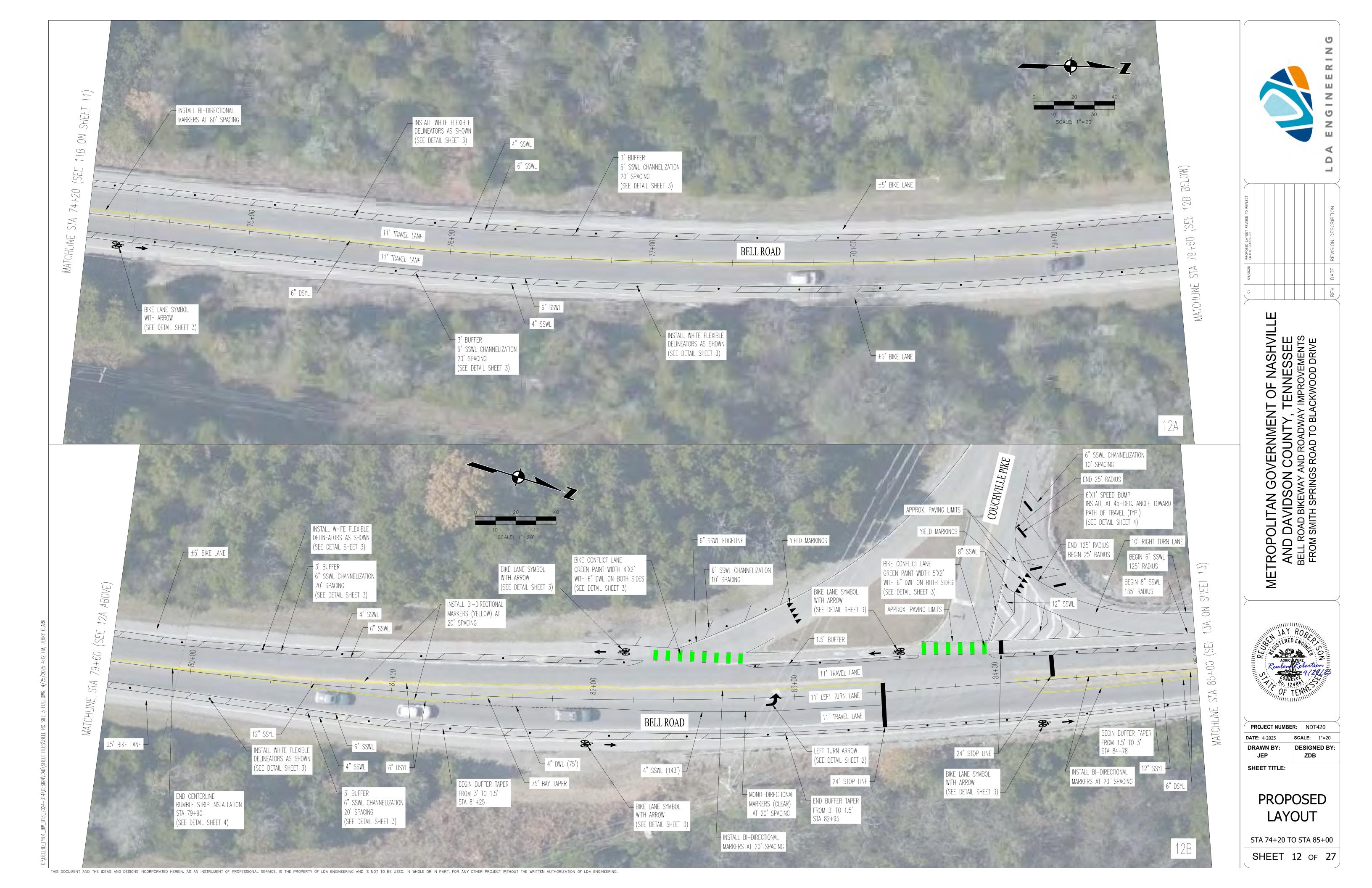


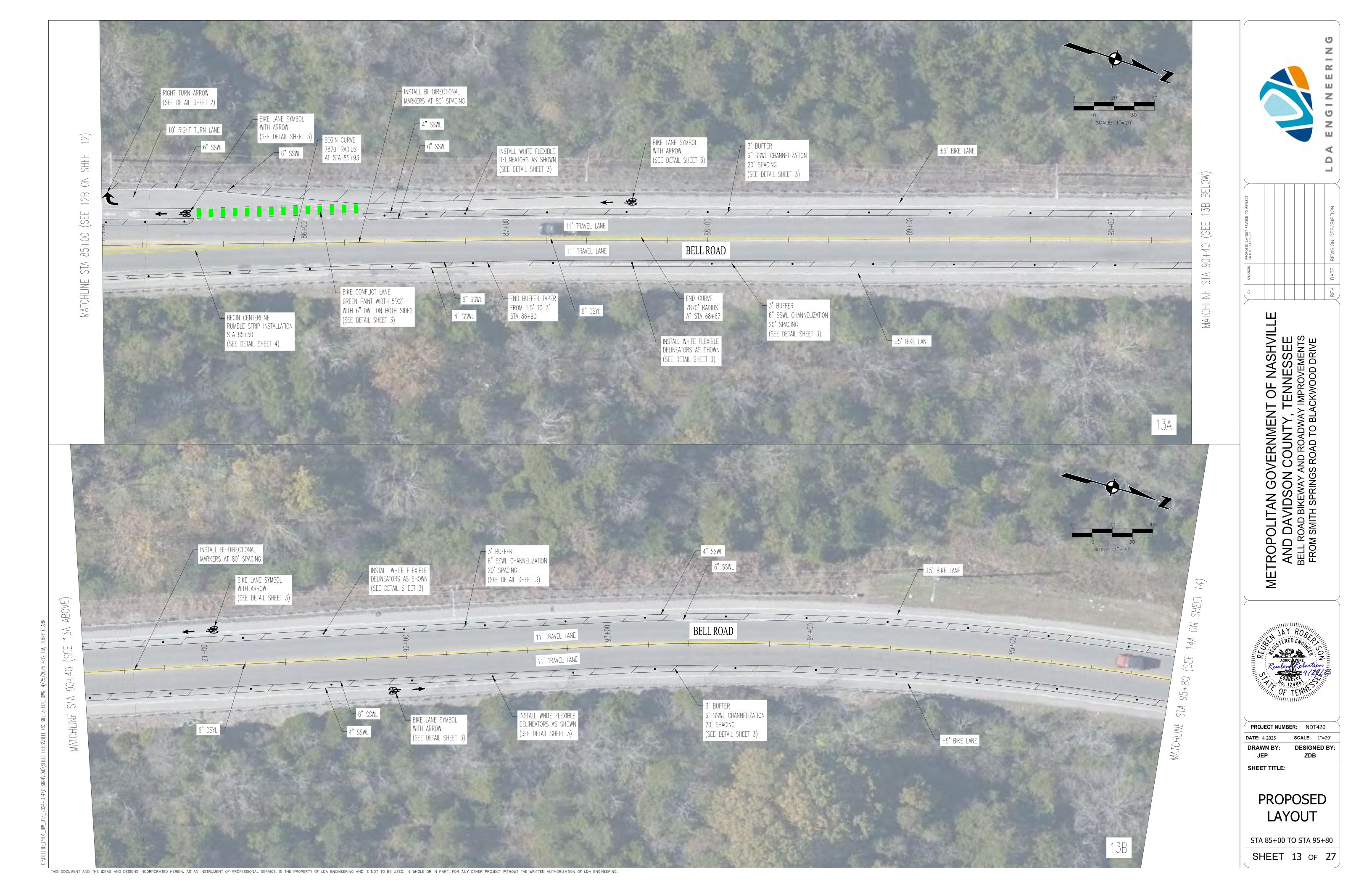


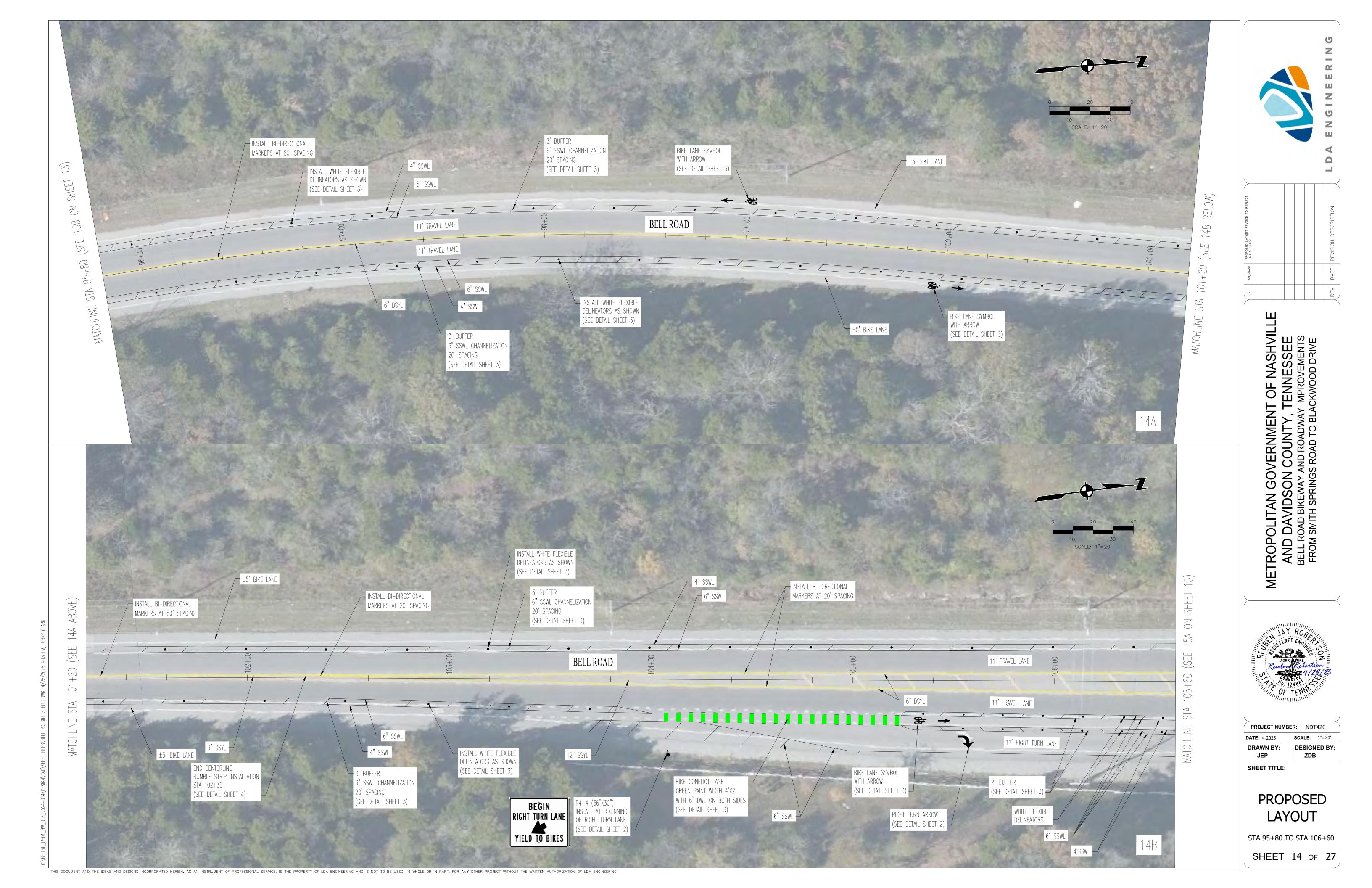


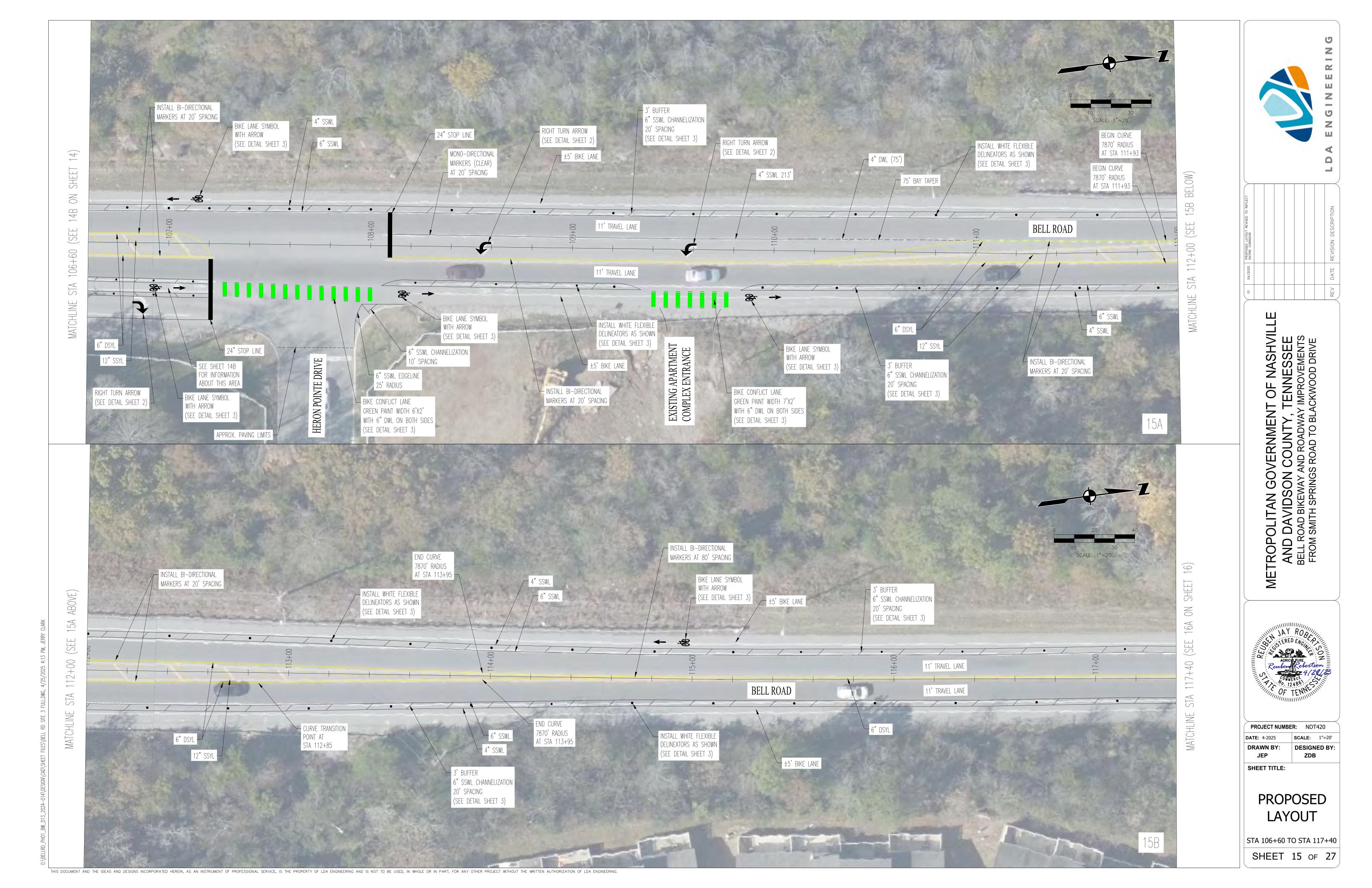


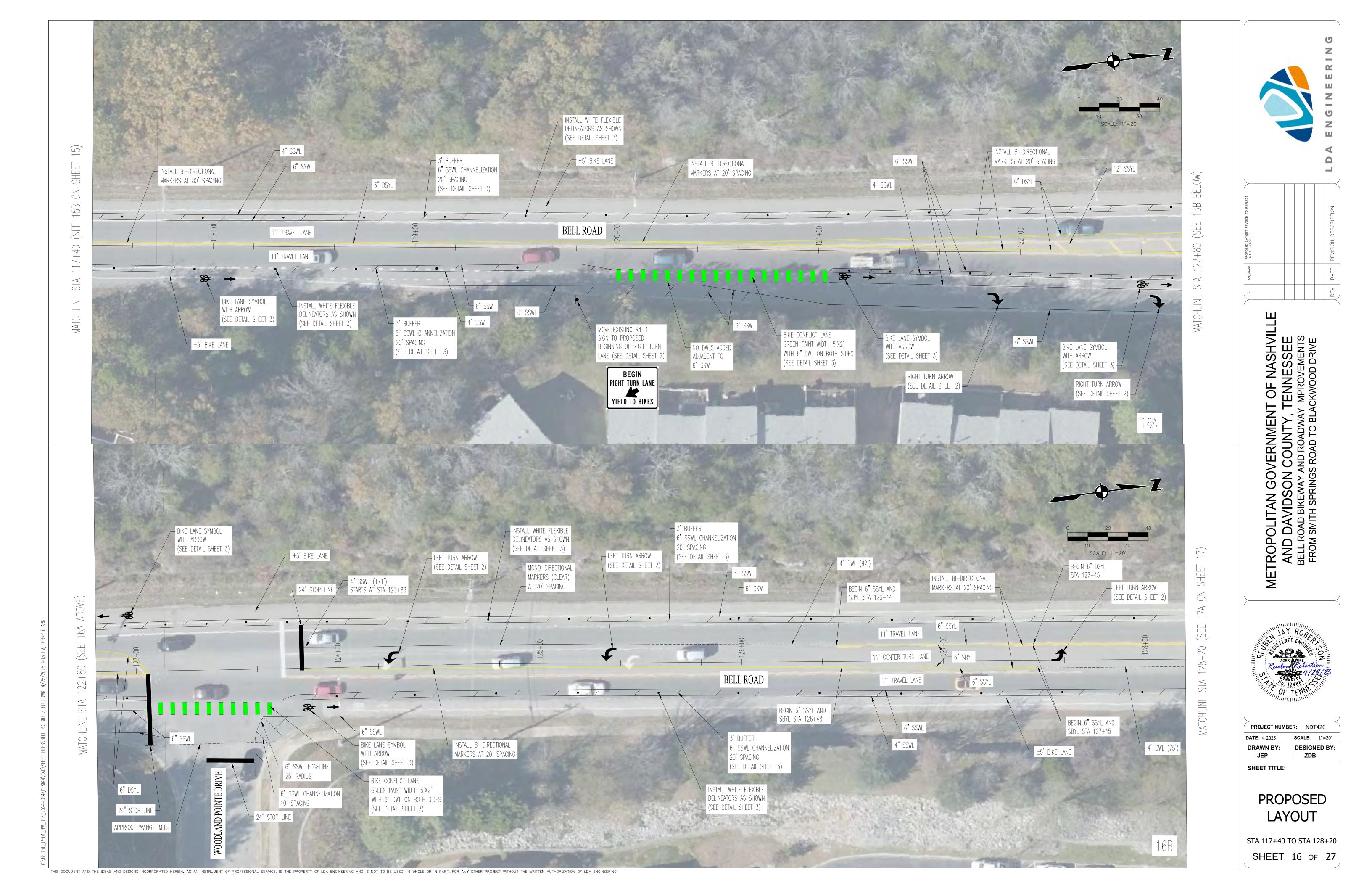


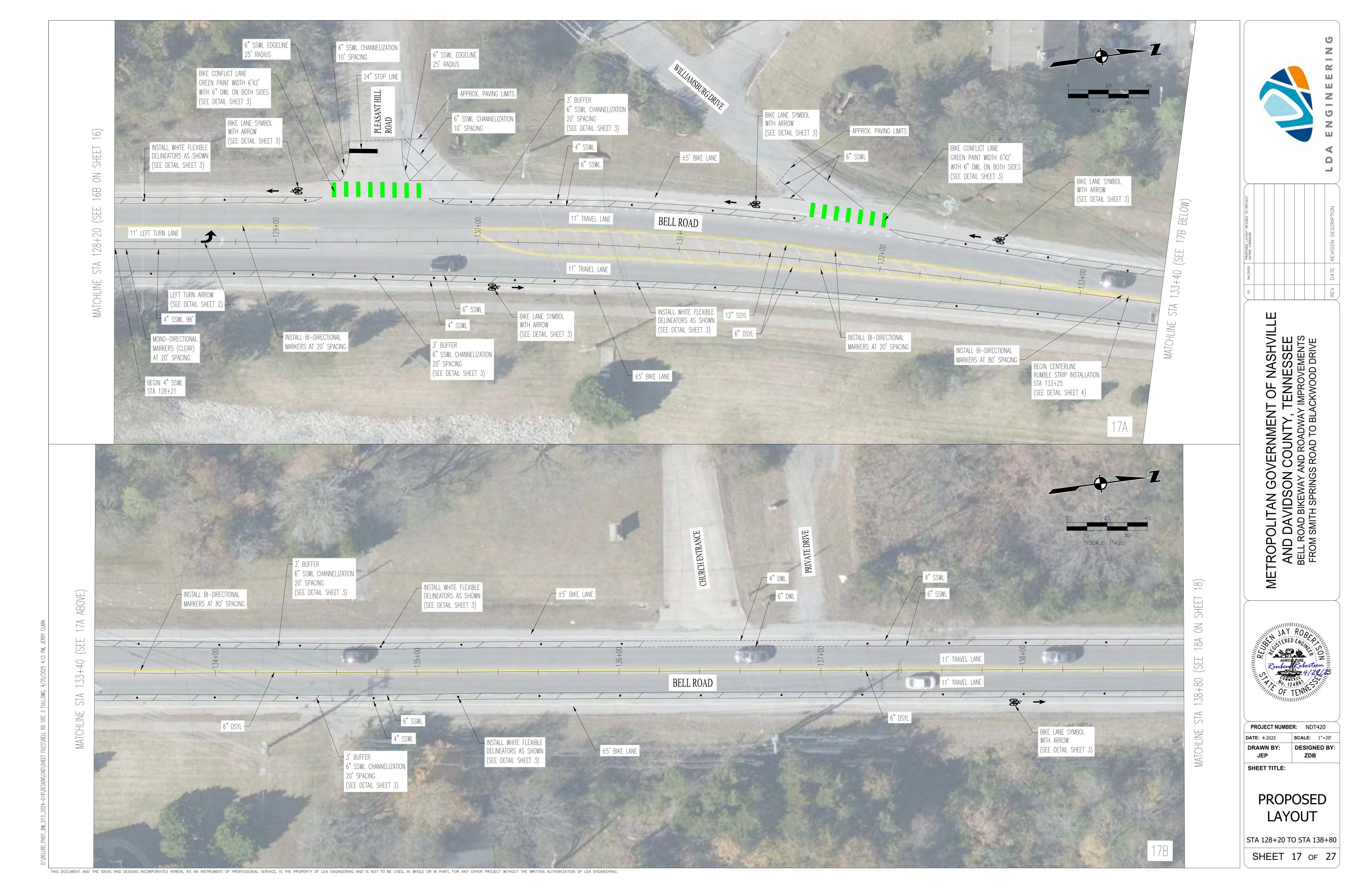


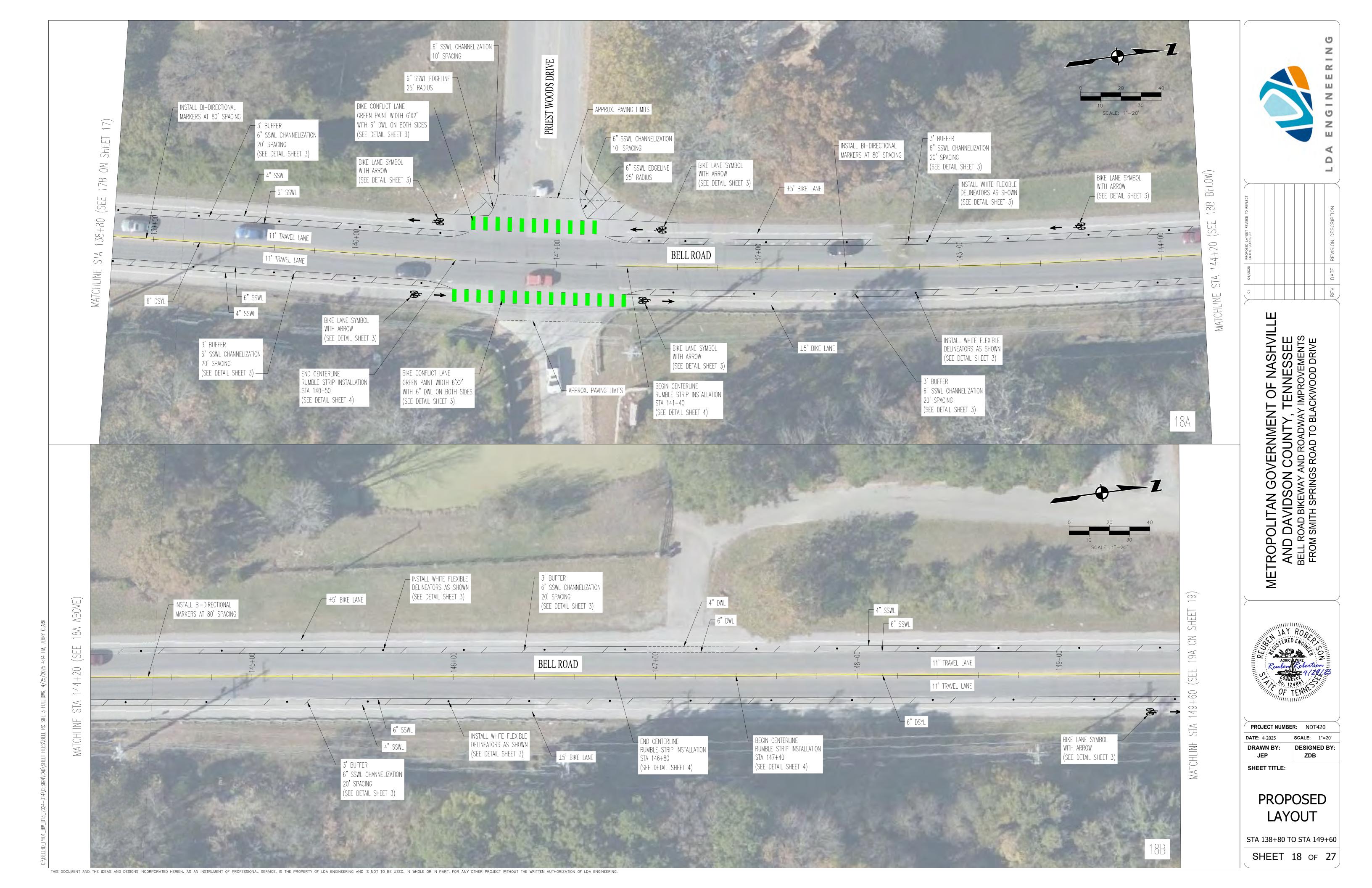




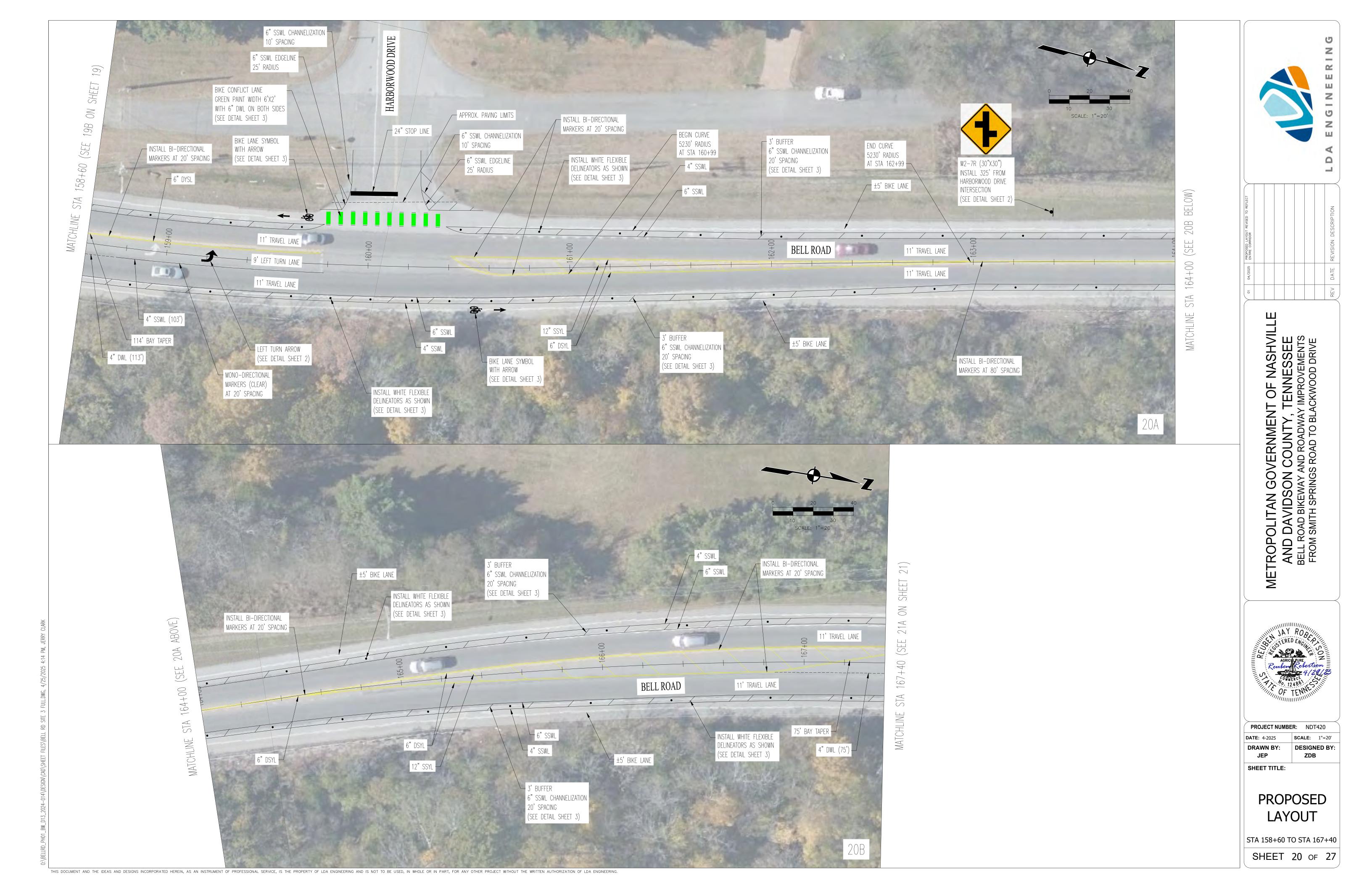












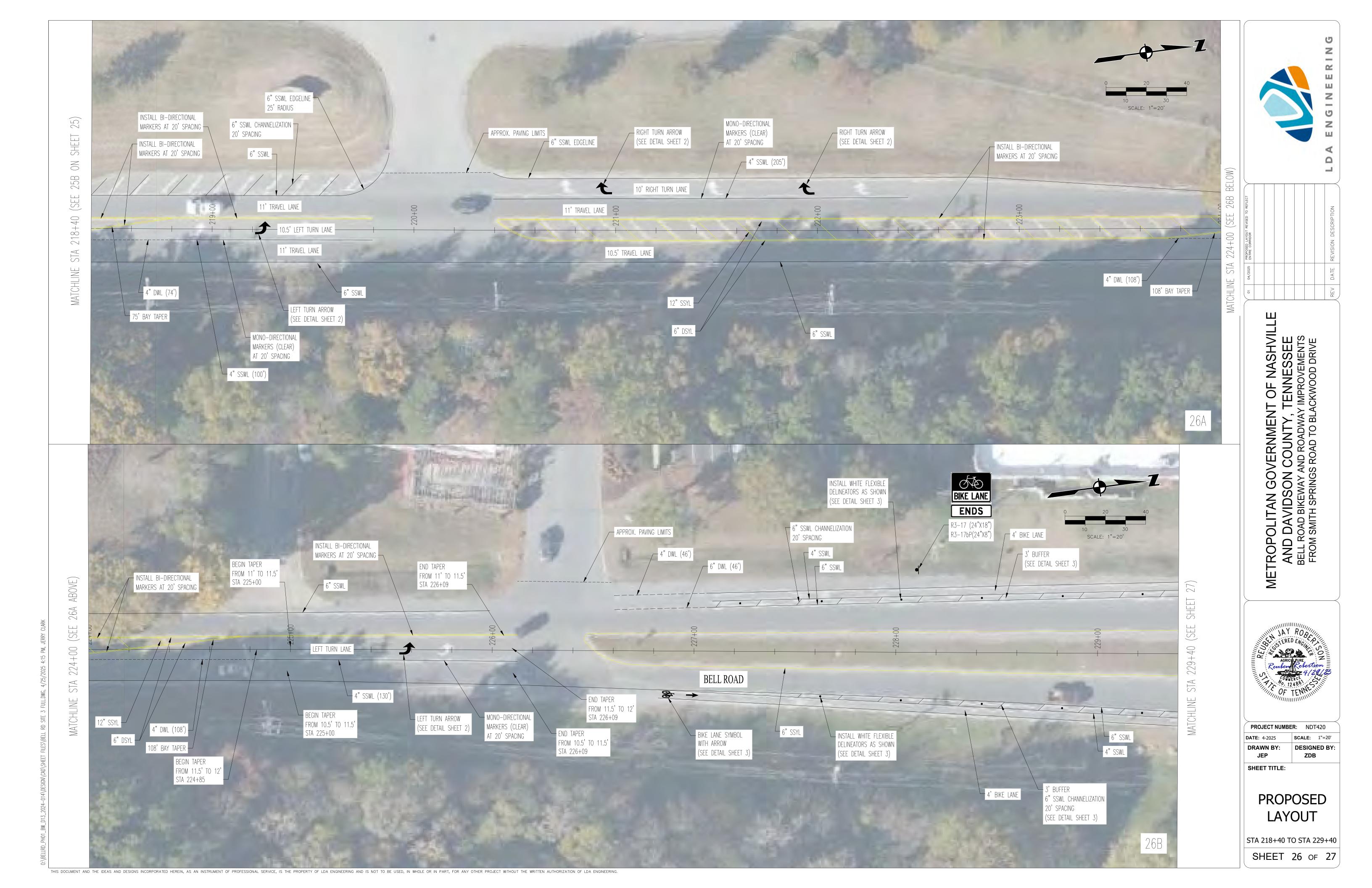


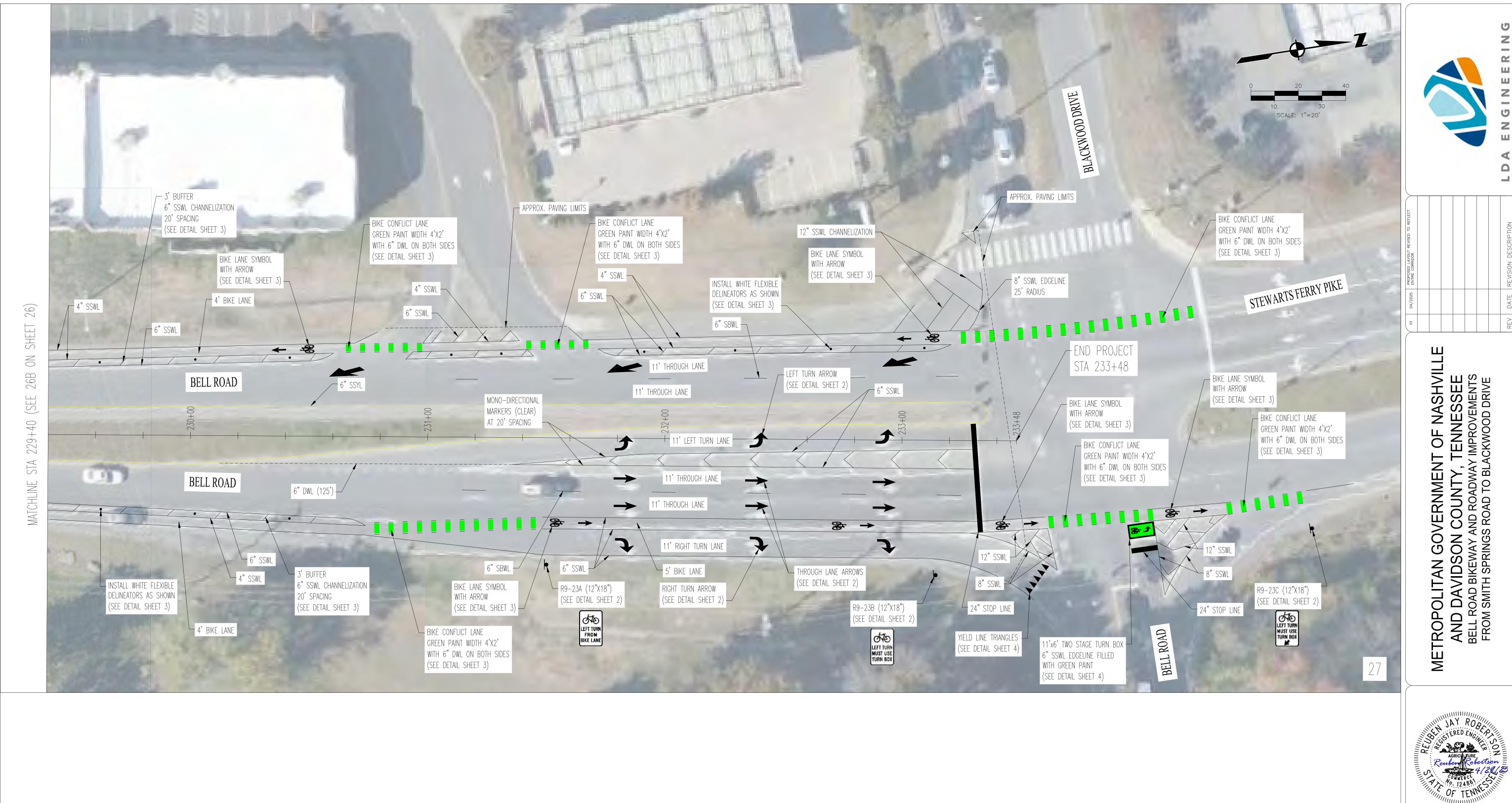












PROJECT NUMBER: NDT420 **DATE**: 4-2025 SCALE: 1"=20'

DESIGNED BY: DRAWN BY:

SHEET TITLE:

PROPOSED LAYOUT

STA 229+40 TO STA 233+48

SHEET 27 OF 27

THIS DOCUMENT AND THE IDEAS AND DESIGNS INCORPORATED HEREIN, AS AN INSTRUMENT OF PROFESSIONAL SERVICE, IS THE PROPERTY OF LDA ENGINEERING.