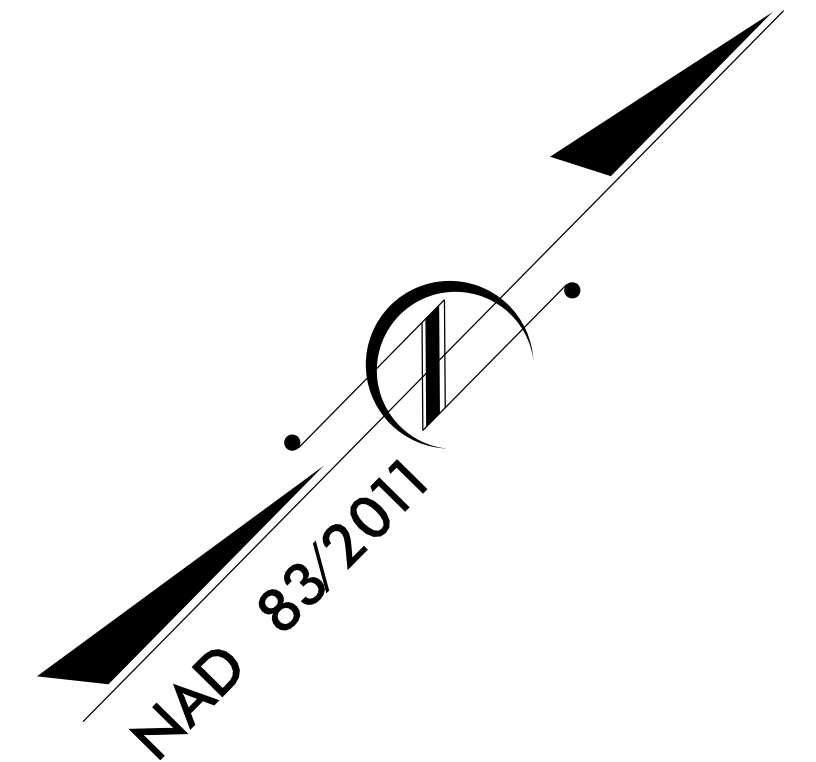


09/06/99

TIP PROJECT: BR-0108

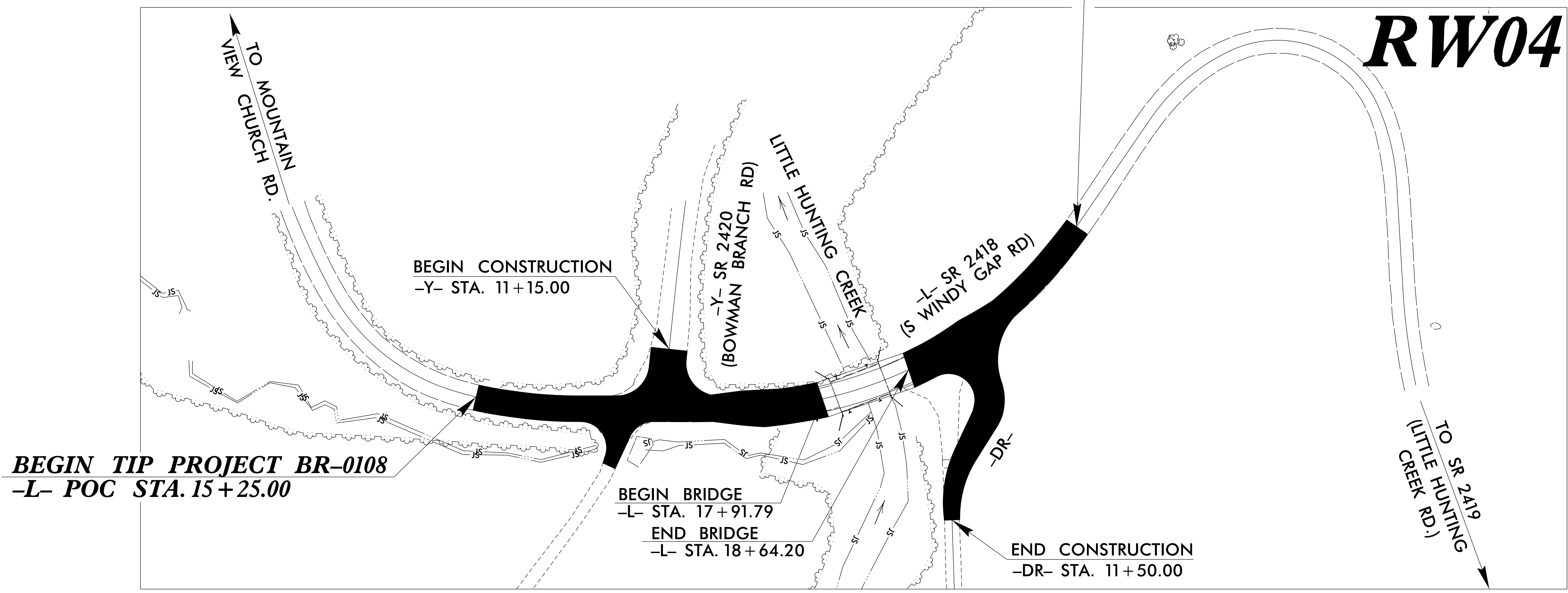
STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	BR-0108	RW01	6

STATE OF NORTH CAROLINA  
 DIVISION OF HIGHWAYS  
 SURVEY CONTROL, EXISTING CENTERLINES,  
 RIGHT OF WAY, EASEMENTS AND PROPERTY TIES  
**WILKES COUNTY**

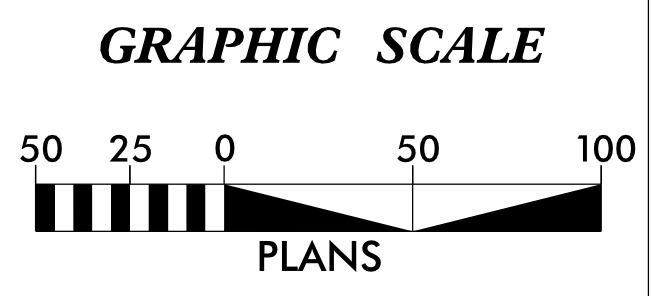


END TIP PROJECT BR-0108  
 -L- POT STA. 20+35.00

**RW04**



BEGIN TIP PROJECT BR-0108  
 -L- POC STA. 15+25.00



**DATUM DESCRIPTION**

THE LOCALIZED COORDINATE SYSTEM DEVELOPED FOR THIS PROJECT IS BASED ON THE STATE PLANE COORDINATES ESTABLISHED BY NCGS FOR MONUMENT "BR0108-1" WITH NAD 83/NA 2011 STATE PLANE GRID COORDINATES OF NORTHING: 864,961.2840(ft) EASTING: 1,417,044.6505(ft) ELEVATION: 1,163.988(ft) THE AVERAGE COMBINED GRID FACTOR USED ON THIS PROJECT (GROUND TO GRID) IS: 0.99993449 THE N.C. LAMBERT GRID BEARING AND LOCALIZED HORIZONTAL GROUND DISTANCE FROM "BR0108-1" TO -L- STATION IS

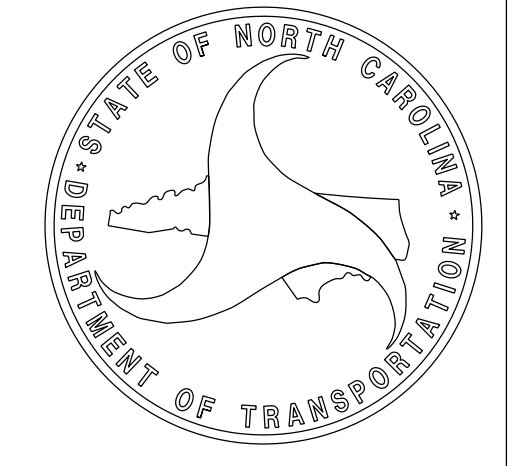
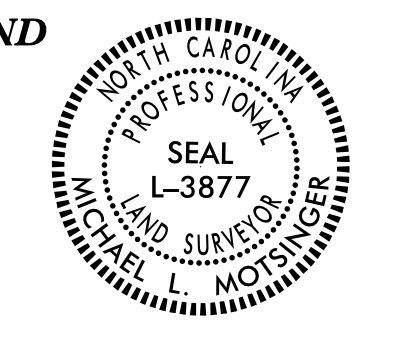
ALL LINEAR DIMENSIONS ARE LOCALIZED HORIZONTAL DISTANCES VERTICAL DATUM USED IS NAVD 88

Prepared in the Office of:

2018 STANDARD SPECIFICATIONS

RIGHT OF WAY DATE:           XX/XX/XXXX                LETTING DATE:           XX/XX/XXXX          

PROFESSIONAL LAND SURVEYOR

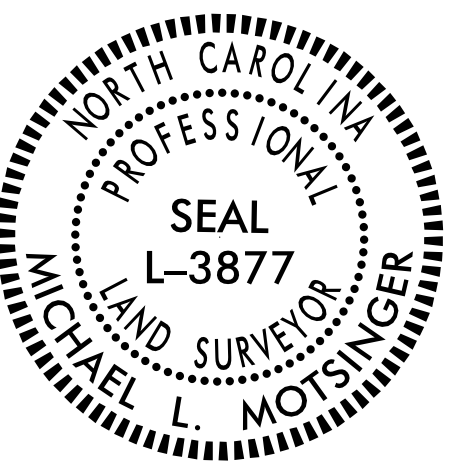


DocuSigned by:  
 Michael L. Motzinger  
 FID:89F7E232-0A1E-4000-8000-000000000000  
 SIGNATURE: \_\_\_\_\_ Date: 5/12/2021

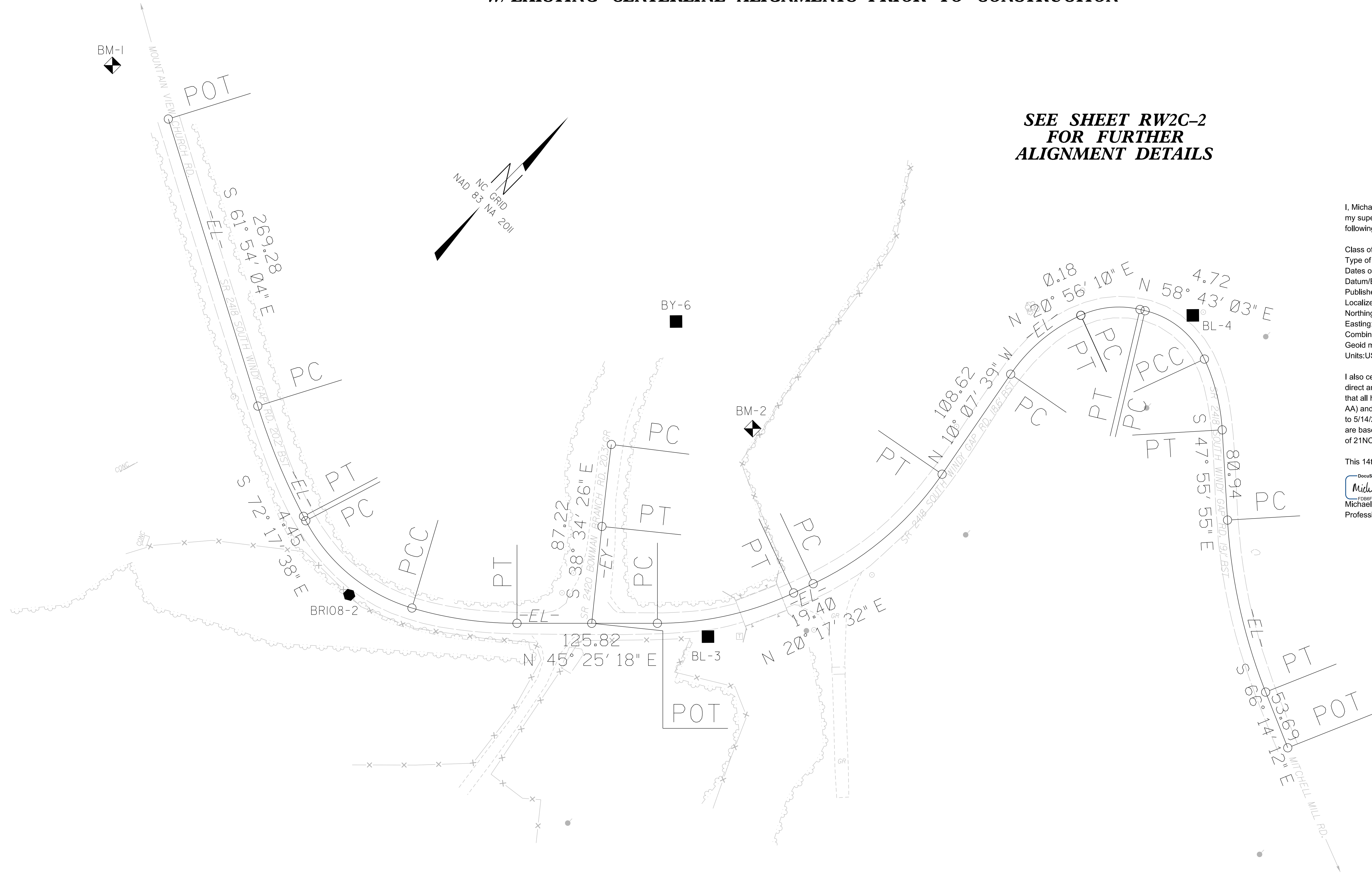
\$\$\$\$\$ SYSTEM \$\$\$\$\$\$  
 \$\$\$ DDN \$\$\$  
 \$\$\$ USERNAME \$\$\$

# SURVEY CONTROL SHEET

## W/ EXISTING CENTERLINE ALIGNMENTS PRIOR TO CONSTRUCTION

PROJECT REFERENCE NO. BR-0108	SHEET NO. RW2C-1
<b>Location and Surveys</b>	
PROJECT SURVEYOR	
	
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	

**SEE SHEET RW2C-2  
FOR FURTHER  
ALIGNMENT DETAILS**



I, Michael L. Motsinger, PLS, certify that the Project Control was verified under my supervision from an actual GPS survey made under my supervision and the following information was used to perform the survey:

Class of survey: **AA**  
 Type of GPS field procedure: [Static, OPUS, RTN]  
 Dates of survey: 5/10/2021 - 5/14/2021  
 Datum/Epoch: NAD 83 / NA 2011  
 Published/Fixed-control use: [Project Control if applicable, N/A for RTN]  
 Localized around: BR0108 - 1  
 Northing: 864961.2840  
 Easting: 1417044.6505  
 Combined grid factor: 0.99993449  
 Geoid model: G12NC  
 Units: US Survey Feet

I also certify that the Baseline Control for this project was completed under my direct and responsible charge from an actual survey made under my supervision; that all horizontal closures had a minimum ratio of precision of 1:20,000 (Class AA) and Vertical accuracy to Class A. Field work was performed from 5/10/2021 to 5/14/2021, and all coordinates are based on NAD 83/2011 and all elevations are based on NAVD 88; that this survey was performed to meet the requirements of 21NCAC 56.1600 as applicable.

This 14th day of May, 2021.

DocuSigned by:  
  
 Michael L. Motsinger  
 Professional Land Surveyor L-3877



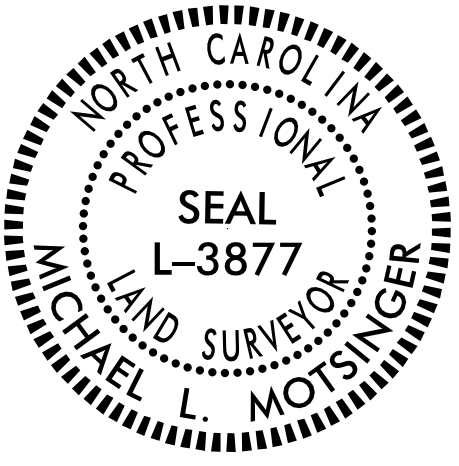
### NOTES:

1. PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
2. THE SURVEY CONTROL DATA FOR THIS PROJECT HAS BEEN COMPILED FROM VARIOUS SOURCES. IF FURTHER INFORMATION REGARDING PROJECT CONTROL IS NEEDED, PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.



# SURVEY CONTROL SHEET

## W/ EXISTING CENTERLINE ALIGNMENTS PRIOR TO CONSTRUCTION

PROJECT REFERENCE NO. BR-0108	SHEET NO. RW2C-2
<b>Location and Surveys</b>	
PROJECT SURVEYOR	
	
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	

BL	POINT	DESC.	NORTH	EAST	ELEVATION
1		BR108-1	864961.2840	1417044.6505	1163.99
2		BR108-2	864654.5484	1417706.9899	1117.95
3		BL-3	864853.5400	1417962.1820	1102.60
4		BL-4	865363.3960	1418069.7050	1124.65
5		BL-5	864620.1800	1418898.1960	1175.27

BY	POINT	DESC.	NORTH	EAST	ELEVATION
6		BY-6	865034.4620	1417743.7370	1121.44
400		BL-3	864853.5400	1417962.1820	1102.65

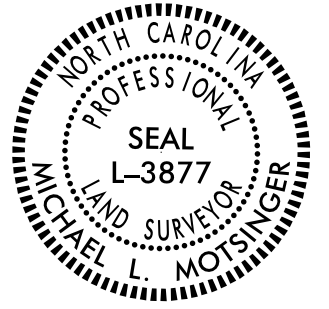
I, Michael L. Motsinger, PLS, certify that the Project Control was verified under my supervision from an actual GPS survey made under my supervision and the following information was used to perform the survey:

Class of survey: **AA**  
 Type of GPS field procedure: [Static, OPUS, RTN]  
 Dates of survey: 5/10/2021  
 Datum/Epoch: NAD 83 / NA 2011  
 Published/Fixed-control use: [Project Control if applicable, N/A for RTN]  
 Localized around: BR0108 - 1  
 Northing: 864961.2840  
 Easting: 1417044.6505  
 Combined grid factor: 0.99993449  
 Geoid model: G12NC  
 Units: US Survey Feet

I also certify that the Baseline Control for this project was completed under my direct and responsible charge from an actual survey made under my supervision; that all horizontal closures had a minimum ratio of precision of 1:20,000 (Class AA) and Vertical accuracy to Class A. Field work was performed from 5/10/2021 to 5/14/2021, and all coordinates are based on NAD 83/2011 and all elevations are based on NAVD 88; that this survey was performed to meet the requirements of 21NCAC 56.1600 as applicable.

This 14th day of May, 2021.

DocuSigned by:  
  
 Michael L. Motsinger  
 Professional Land Surveyor L-3877



\*\*\*\*\*  
 BM1 ELEVATION = 1151.07  
 N 864843 E 1417223  
 BL STATION 7+11.00 32' RIGHT  
 BENCH TIE SET IN 24" OAK  
 \*\*\*\*\*  
 \*\*\*\*\*  
 BM2 ELEVATION = 1099.28  
 N 865014 E 1417860  
 BL STATION 16+90.00 133' LEFT  
 BENCH TIE SET IN 30" ASH  
 \*\*\*\*\*

EL		N	E	BEARING	DIST	DELTA	D	L	T	R
POT		864844.355	1417292.439							
LINE				S 61°54'03.8" E	269.28					
PC		864717.523	1417529.985							
CURVE				S 67°05'51.0" E	106.93	10°23'34.4"(LT)	09°42'22.4"	107.07	53.68	590.30
PT		864675.911	1417628.483							
LINE				S 72°17'38.2" E	4.45					
PC		864674.557	1417632.722							
CURVE				N 84°50'21.5" E	123.09	45°44'00.6"(LT)	36°10'38.2"	126.42	66.79	158.38
PCC		864685.629	1417755.309							
CURVE				N 53°41'49.4" E	95.11	16°33'03.6"(LT)	17°20'27.4"	95.44	48.06	330.41
PT		864741.941	1417831.960							
LINE				N 45°25'17.6" E	125.82					
PC		864830.250	1417921.579							
CURVE				N 32°51'24.7" E	125.04	25°07'45.9"(LT)	19°56'12.1"	126.05	64.05	287.39
PT		864935.286	1417989.417							
LINE				N 20°17'31.8" E	19.40					
PC		864953.478	1417996.144							
CURVE				N 05°04'56.5" E	151.51	30°25'10.5"(LT)	19°50'32.2"	153.31	78.51	288.76
PT		865104.395	1418009.566							
LINE				N 10°07'38.8" W	108.62					
PC		865211.324	1417990.466							
CURVE				N 05°24'15.8" E	81.97	31°03'49.2"(RT)	37°25'56.9"	82.99	42.54	153.06
PT		865292.933	1417998.186							
LINE				N 20°56'10.4" E	0.18					
PC		865293.101	1417998.251							
CURVE				N 39°49'36.6" E	53.19	37°46'52.5"(RT)	69°44'58.7"	54.17	28.11	82.14
PT		865333.951	1418032.318							
LINE				N 58°43'02.9" E	4.72					
PC		865336.400	1418036.348							
CURVE				N 84°37'15.5" E	68.58	51°48'25.2"(RT)	72°59'28.1"	70.98	38.12	78.50
PCC		865342.829	1418104.630							
CURVE				S 58°42'13.5" E	65.36	21°32'36.9"(RT)	32°46'06.3"	65.74	33.27	174.85
PT		865308.878	1418160.478							
LINE				S 47°55'55.0" E	80.94					
PC		865254.647	1418220.564							
CURVE				S 57°05'03.7" E	157.78	18°18'17.3"(LT)	11°33'08.9"	158.45	79.91	495.96
PT		865168.910	1418353.012							
LINE				S 66°14'12.3" E	53.69					
POT		865147.277	1418402.147							


Y		N	E	BEARING	DIST	DELTA	D	L	T	R
PC		864915.369	1417779.776							
CURVE				S 37°59'41.2" E	73.90	01°09'29.6"(LT)	01°34'01.8"	73.90	36.95	3656.00
PT		864857.129	1417825.270							
LINE				S 38°34'25.9" E	87.22					
POT		864788.939	1417879.655							

**NOTES:**

1. PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
2. THE SURVEY CONTROL DATA FOR THIS PROJECT HAS BEEN COMPILED FROM VARIOUS SOURCES. IF FURTHER INFORMATION REGARDING PROJECT CONTROL IS NEEDED, PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.

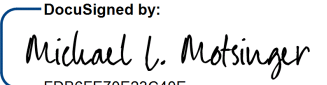
REVISIONS

# PROPOSED ALIGNMENT CONTROL SHEET

PROJECT REFERENCE NO. BR-0108	SHEET NO. RW2D-1
<b>Location and Surveys</b>	
PROJECT SURVEYOR	
	
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	

I, Michael L. Motsinger, PLS, certify that the data compiled came from available surveys/mapping performed by others and provided to me by NCDOT and do not certify to the accuracy or quality of the individual data sources.

This 14th day of May, 2021.

DocuSigned by:  
  
 Michael L. Motsinger  
 Professional Land Surveyor L-3877



L			
TYPE	STATION	NORTH	EAST
POT	10+00.00	864844.3552	1417292.4388
PC	12+69.28	864717.5232	1417529.9846
PCC	13+81.54	864674.3620	1417633.4267
PCC	15+08.38	864686.2311	1417756.4003
PT	16+02.58	864741.9410	1417831.9605
PC	17+23.36	864826.7140	1417917.9902
PT	20+33.60	865110.9151	1418008.4011
PC	21+35.60	865211.3243	1417990.4659
PCC	22+16.60	865291.1244	1417997.2290
PCC	23+53.62	865341.0220	1418109.2788
PT	24+14.38	865308.8777	1418160.4778
PC	24+95.47	865254.5429	1418220.6788
PT	26+53.62	865168.9729	1418352.8708
POT	27+07.46	865147.2772	1418402.1470

Y			
TYPE	STATION	NORTH	EAST
PC	10+00.00	864915.3695	1417779.7761
PT	10+73.90	864857.1286	1417825.2704
POT	11+61.13	864788.9386	1417879.6548

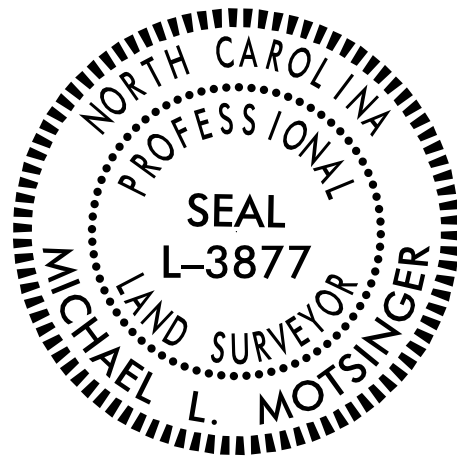
REVISIONS

I:\MAY-2021\133\Winston\_Ruths Computer\Bridges\Division\LowImpact\BR-0108\Right of Way\ToBeChecked\BR0108\_LS\_RW2D-1.dgn  
 M.L. Motsinger  
 AT LS-312635

**NOTES:**

1. PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
2. THE PROPOSED ALIGNMENT CONTROL DATA FOR THIS PROJECT HAS BEEN COMPILED FROM VARIOUS SOURCES. IF FURTHER INFORMATION REGARDING PROJECT CONTROL IS NEEDED, PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.

# RIGHT OF WAY CONTROL SHEET

PROJECT REFERENCE NO. BR-0108	SHEET NO. RW3E-1
<b>Location and Surveys</b>	
PROJECT SURVEYOR	
	
DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED	

I, Michael L. Motsinger, a Professional Land Surveyor in the state of North Carolina hereby certify to the best of my knowledge and belief that the following work item(s) (Base map Compilation, R/W Staking) performed under my responsible charge meet NCDOT Survey Standards as directed in the NCDOT Location & Surveys guidelines and procedures.

I further certify that the data compiled came from available surveys/mapping performed by others and provided to me by NCDOT and do not certify to the accuracy or quality of the individual data sources.

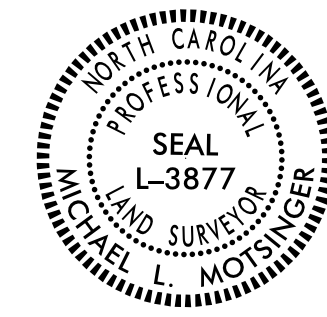
I further certify that the right of way and permanent easement points shown herein and outlined in the tables shown hereon (localized coordinates, station/offset) have been checked and are accurate representations of the right of way and permanent easement points depicted on the corresponding highway plans. I also certify that the right of way and permanent easement points shown herein have been field monumented under my supervision from existing survey control provided by others; that the depicted property data shown herein were surveyed by others; and these monuments denote the right of way and easement boundaries at the time of staking which may be subject to change due to right of way revisions (See deeds for final determination).

Witness my original signature, registration number and seal this 10th day of May, 2021.

DocuSigned by:  
*Michael L. Motsinger*  
FOB8F70E23C4DE  
-----  
Professional Land Surveyor

L-3877  
PLS #

Seal



### ROW MARKER IRON PIN AND CAP-E

ALIGN	STATION	OFFSET	NORTH	EAST	NOTES
L	18+20.00	60.00	864875.5601	1418028.5405	FELL IN CREEK, NOT SET
L	18+20.00	29.98	864889.7057	1418002.0676	FELL IN CREEK, NOT SET
L	19+40.00	60.00	865010.7628	1418070.8445	
L	19+40.00	25.57	865014.7387	1418036.6464	

### ROW MARKER PERMANENT EASEMENT-E

ALIGN	STATION	OFFSET	NORTH	EAST	NOTES
L	15+78.00	46.00	864690.2816	1417843.5880	
L	15+78.00	30.00	864702.4814	1417833.2377	
L	17+23.36	70.00	864776.8537	1417967.1221	
L	18+08.00	-46.00	864916.5464	1417930.0392	FELL IN CREEK, NOT SET
L	18+10.00	-29.87	864909.9855	1417944.8798	

### ROW MARKER PERMANENT EASEMENT-E

ALIGN	STATION	OFFSET	NORTH	EAST
Y	11+19.00	-15.00	864831.2258	1417865.1153

### NOTES:

1. IF FURTHER INFORMATION REGARDING PROJECT CONTROL IS NEEDED PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.
2. PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
3. RIGHT OF WAY MONUMENTATION ESTABLISHED \_\_\_\_\_ TO \_\_\_\_\_ .

REVISIONS

I:\MAY-2021\1346\Winston\Ruiths Computer\Bridges\Division\LowImpact\BR-0108\Right of Way\ToBeChecked\BR0108\_LS\_RW3E-1.dgn  
L:\motsinger\AT\LS-312635



Location and Surveys

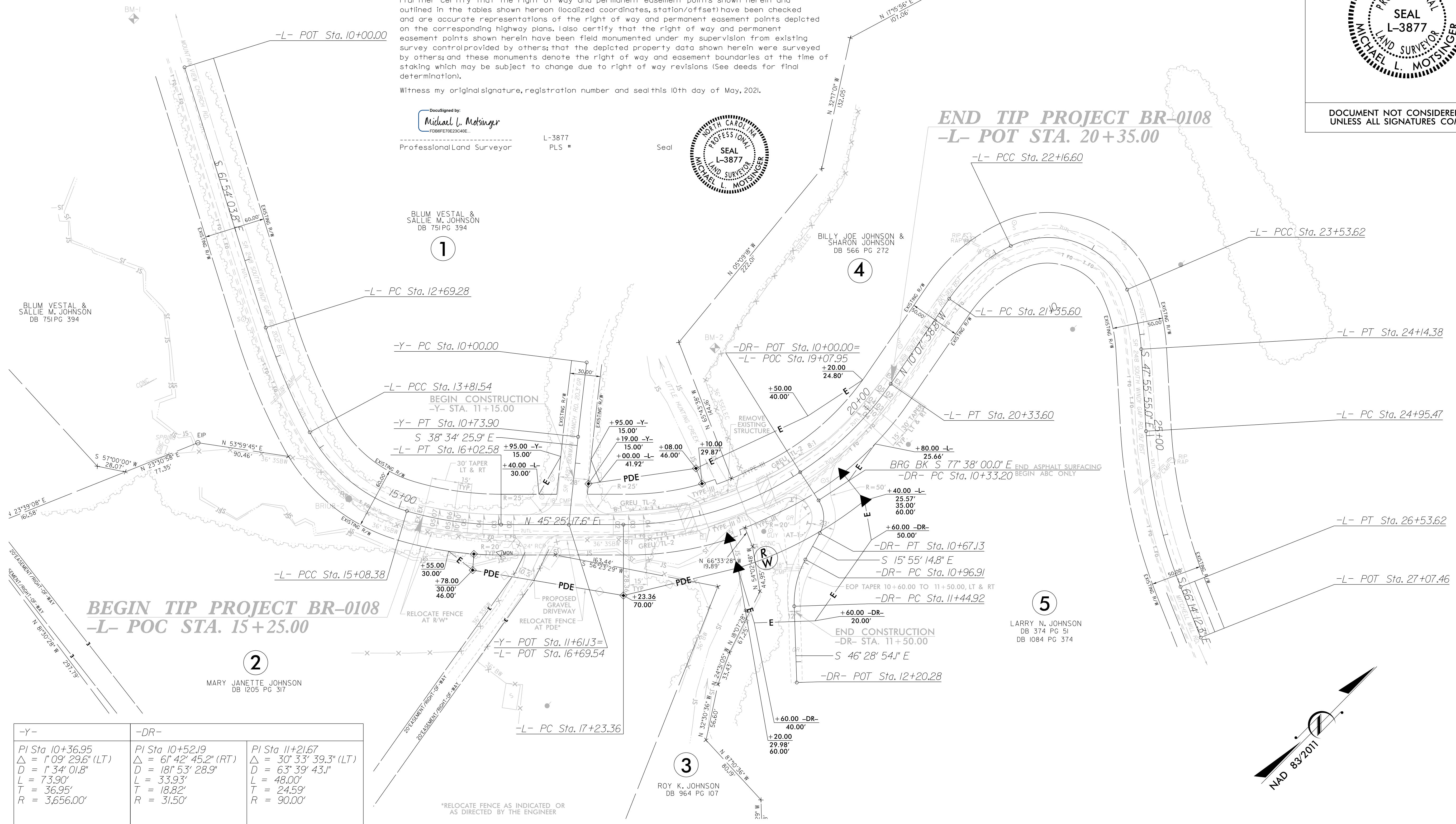
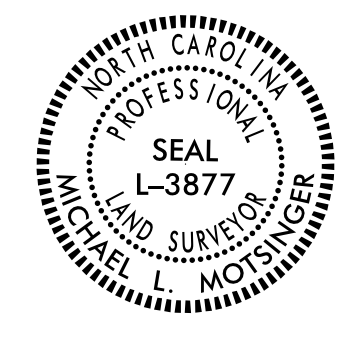
PROJECT SURVEYOR



DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED

I, Michael L. Motsinger, a Professional Land Surveyor in the state of North Carolina hereby certify to the best of my knowledge and belief that the following work item(s) (Base map Compilation, R/W Staking) performed under my responsible charge meet NCDOT Survey Standards as directed in the NCDOT Location & Surveys guidelines and procedures. I further certify that the data compiled came from available surveys/mapping performed by others and provided to me by NCDOT and do not certify to the accuracy or quality of the individual data sources. I further certify that the right of way and permanent easement points shown herein and outlined in the tables shown hereon (localized coordinates, station/offset) have been checked and are accurate representations of the right of way and permanent easement points depicted on the corresponding highway plans. Also certify that the right of way and permanent easement points shown herein have been field monumented under my supervision from existing survey control provided by others; that the depicted property data shown herein were surveyed by others; and these monuments denote the right of way and easement boundaries at the time of staking which may be subject to change due to right of way revisions (See deeds for final determination). Witness my original signature, registration number and seal this 10th day of May, 2021.

Designed by: Michael L. Motsinger, Professional Land Surveyor, L-3877, PLS #



-Y-	-DR-	PI Sta 11+21.67 Δ = 10° 09' 29.6" (LT) D = 1' 34' 01.8" L = 73.90' T = 36.95' R = 3,656.00'
-L-	PI Sta 10+36.95 Δ = 1° 09' 29.6" (LT) D = 1' 34' 01.8" L = 73.90' T = 36.95' R = 3,656.00'	PI Sta 10+52.19 Δ = 61° 42' 45.2" (RT) D = 18' 53' 28.9" L = 33.93' T = 18.82' R = 31.50'
		PI Sta 11+21.67 Δ = 30° 33' 39.3" (LT) D = 63° 39' 43.1" L = 48.00' T = 24.59' R = 90.00'

-L-	PI Sta 14+48.50 Δ = 45° 25' 16.9" (LT) D = 35' 48' 35.5" L = 126.84' T = 66.96' R = 160.00'	PI Sta 15+55.80 Δ = 16° 21' 17.2" (LT) D = 17' 21' 44.5" L = 94.20' T = 47.42' R = 330.00'	PI Sta 18+91.89 Δ = 55° 32' 56.4" (LT) D = 17' 54' 17.8" L = 81.02' T = 168.53' R = 320.00'	PI Sta 21+77.05 Δ = 29° 56' 36.5" (RT) D = 36° 57' 54.1" L = 81.02' T = 41.45' R = 155.00'	PI Sta 23+05.18 Δ = 92° 21' 34.5" (RT) D = 67° 24' 24.5" L = 137.02' T = 88.57' R = 85.00'	PI Sta 23+84.31 Δ = 19° 53' 32.6" (RT) D = 32' 44' 25.6" L = 60.76' T = 30.69' R = 175.00'	PI Sta 25+75.23 Δ = 18° 18' 17.3" (LT) D = 11' 34' 29.7" L = 158.14' T = 79.75' R = 495.00'
	SE = SEE PLANS RO = SEE PLANS DS = 30 MPH	SE = SEE PLANS RO = 60' DS = 30 MPH	SE = 0.04 RO = 60' DS = 30 MPH				

NOTES:

1. IF FURTHER INFORMATION REGARDING PROJECT CONTROL IS NEEDED PLEASE CONTACT THE LOCATION AND SURVEYS UNIT.
2. PROJECT CONTROL WAS ESTABLISHED USING GNSS, THE GLOBAL NAVIGATION SATELLITE SYSTEM.
3. RIGHT OF WAY MONUMENTATION ESTABLISHED \_\_\_\_\_ TO \_\_\_\_\_.



REVISIONS

Computer: Br-ridge\Drawings\Winston-Low\Impact\BR-0108\Right of Way\ToBeChecked\BR0108.LS.RW04.dgn  
Date: 2021/05/10 10:53 AM  
User: mmotsinger