



* DESIGN TRAFFIC DATA

NET LENGTH OF ROADWAY	0.000	MILES
NET LENGTH OF BRIDGES	0.028	MILES
NET LENGTH OF PROJECT	0.028	MILES
LENGTH OF EXCEPTIONS	0.000	MILES
GROSS LENGTH OF PROJECT	0.028	MILES

	ENGINEER OF RECORD
C. 27609	CONCEPTUAL PLANS
	NOT FOR CONSTRUCTION

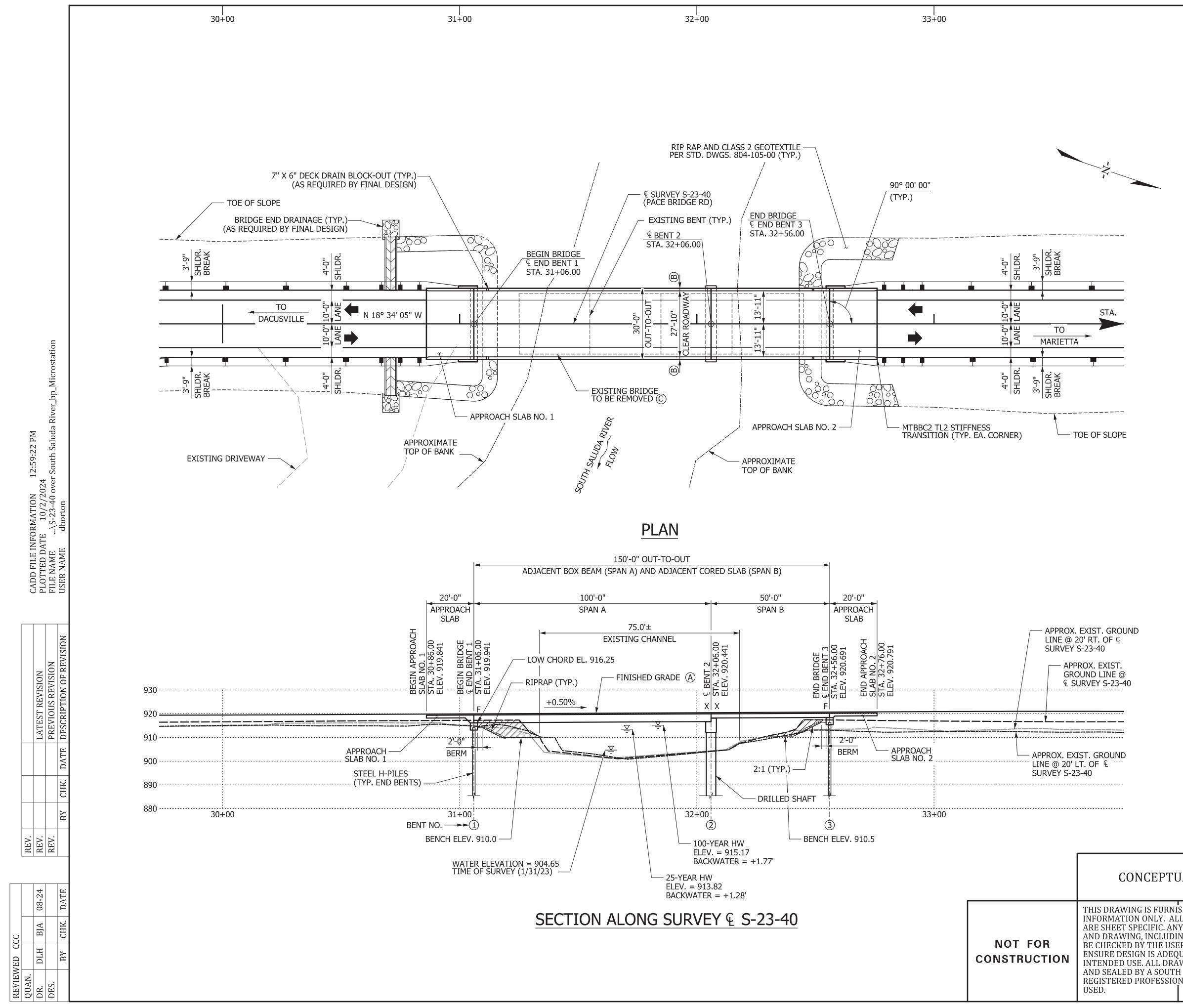
APPROXIMA	TE LOCATION OF BRIDGE IS
LATITUDE	35°- 00' - 45" N
LONGITUDE	82°- 34' - 15" W

DESIGN REFERENCE FOR THESE PLANS IS THE:

LVB

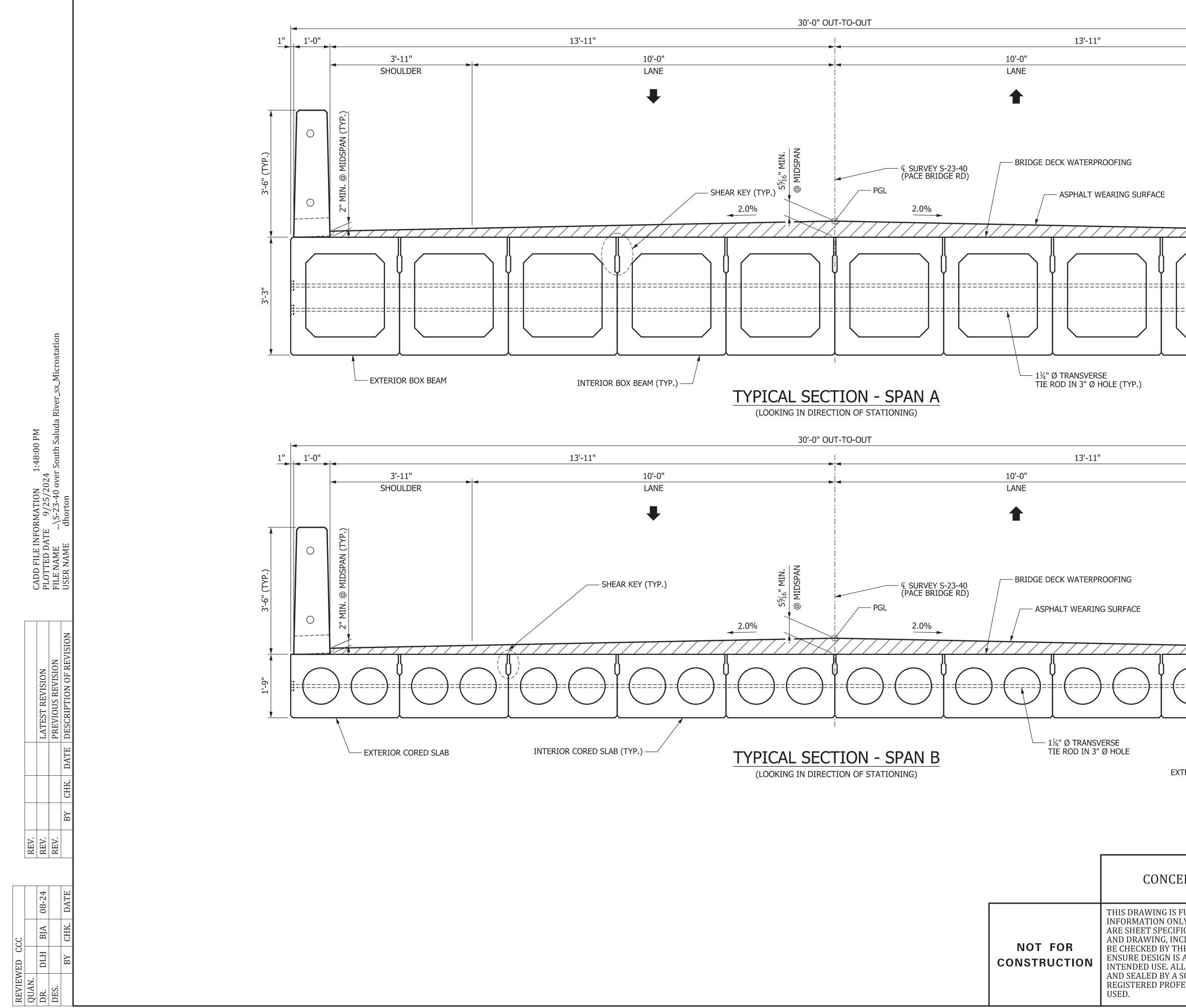
SUPPLEMENTAL DESIGN CRITERIA FOR

LOW VOLUME BRIDGE REPLACEMENT PROJECTS



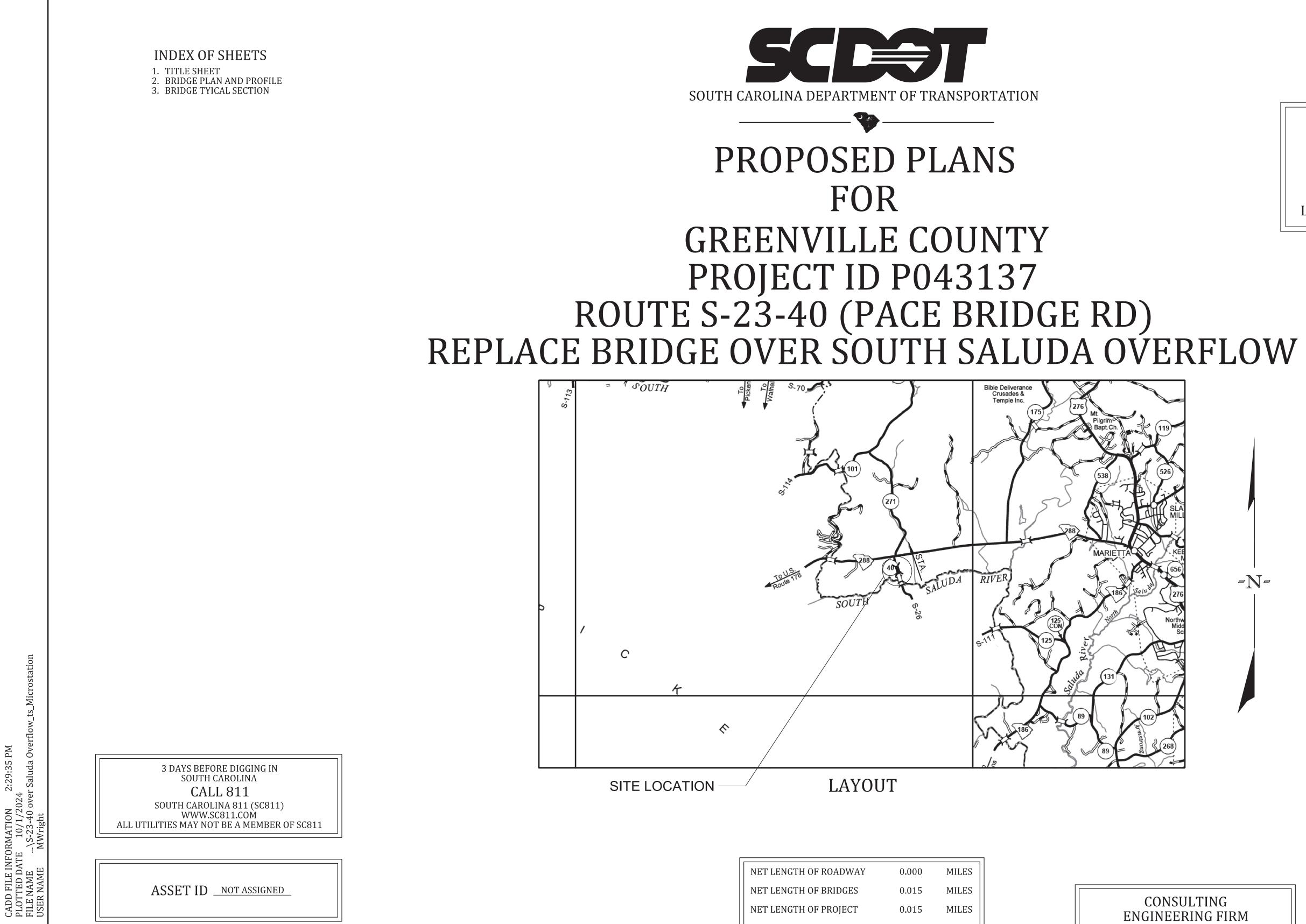
ΡM

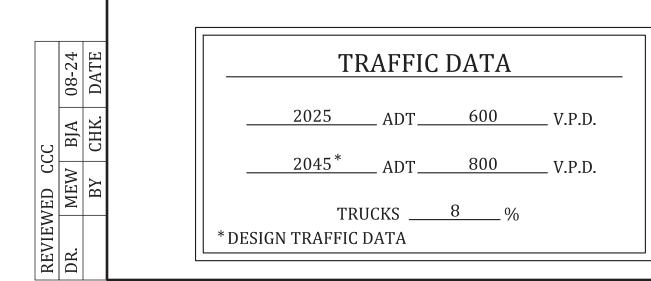
			BRIDGE PLANS ID P041160	SHEET 2
	NOTEC			
(A)	NOTES: PROPOSED PROFILE SET SC			
	THE HYDRAULIC REQUIREM INCLUDES 1'-0" MASH BARR			
) (REMOVE AND DISPOSE OF E			
, in the second s	SIMPLE CONCRETE SLAB BR ACCORDANCE WITH SECTIO SPECIFICATIONS.	IDGE AND APPUR	TENANCES IN	
	F - DENOTES FIXED BEARIN	IG		
	X - DENOTES EXPANSION B			
	= EXCAVATE HATCHED ARE	A		
	CONTROL	<u>POINTS</u>		
	ELEVATION =	= 916.75 8 E 1529808.50		
	CP8 ELEVATION = N 1160363.49	= 916.50 9 E 1529632.64		
	BRDG NL			
		← € SURVEY (PACE BR]		
	0.020 FT./FT.	0.020 FT./F	-T	
	TYPICAL THROU	GHOUT BRIDGE		
	SUPERELEVA		TCH	
	VERTICAL C			
	PVI = 29+60.00	PVI = 33+5	0.00	
	ELEV. 919.21 V.C. = 135'	ELEV. 921.1 V.C. = 135'	0	
	-0.50% +0.5	50% -0.50%		
	HYDROLOGY D	DATA		
	D.A. = 98.4 SQ. MIL Q_25 = 9,590 CFS			
	$VELOCITY_25 = 9.4$ AREA FURNISHED U Q_100 = 13,600 CFS	$JNDER_{25} = 810.0$	6 SQ. FT.	
	$VELOCITY_100 = 11$ AREA FURNISHED U	1.5 FPS	.1 SO. FT.	
			12 0 2.1 11	
	Q = 18,300 CFS PROBABILITY < 0.2	%		
AL PLANS	HNTB	HNTB CORP SC License No. 26 4000 Center at N Raleigh, N.C. 276	55 Iorth Hills Street, Suite 500),
HED FOR L DIMENSIONS SHOWN (USE OF THIS DESIGN		OUTH CARO ENT OF TRA	LINA NSPORTATION	1
I OSE OF THIS DESIGN IG DIMENSIONS, MUST R'S ENGINEER TO JATE FOR THE	BRIDGE	PLAN AN	ID PROFILE	
WINGS MUST BE SIGNED CAROLINA JAL ENGINEER WHEN	S-23-40 REPLACEMF) (PACE BRIDGE ENT OVER SOUT	RD) BRIDGE H SALUDA RIVER	
	COUNTY: GREENVILLE		ROUTE: S-23-40	



	CONCEP'
NOT FOR ONSTRUCTION	THIS DRAWING IS FUE INFORMATION ONLY. ARE SHEET SPECIFIC. AND DRAWING, INCLU BE CHECKED BY THE U ENSURE DESIGN IS AD INTENDED USE. ALL D AND SEALED BY A SOU REGISTERED PROFESS USED.

THICK CORED SLAB			BRIDGE PLANS ID P041160	SHEET 3
CAST. IN-PLACE MASH BUCK-OUT (TYP.) TX ST DECK ORAIN EXTERIOR BOX BEAM	→			
TERIOR CORED SLAB	BARRIER PARAPET (TYP.) 2" DIA. CONDUIT (TYP.) 7" x 6" DECK DRA			
TERIOR CORED SLAB				
CAST-IN-PLACE MASH BARAPET (TYP.) 2" DIA. CONDUIT (TYP.) 3" x 6" DECK DRAIN BLOCK-OUT (TYP.) 3" X 6" DECK DRAIN SLOCK-OUT (TYP.) 3" X 6" DECK DRAIN SLOCK-DRAIN SL	EXTERIOR BOX BEAM -			
EPTUAL PLANS HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609	SHOULDER CAST-IN-PLACE MASH BARRIER PARAPET (TYP.) 2" DIA. CONDUIT (TYP.)			
EPTUAL PLANS HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609				
EPTUAL PLANS FINIS SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609	TERIOR CORED SLAB			
	EPTUAL PLANS		C License No. 265 200 Center at North Hills Street, Suite 50)0,
SOUTH CAROLINALY. ALL DIMENSIONS SHOWNIC. ANY USE OF THIS DESIGNCLUDING DIMENSIONS, MUSTHE USER'S ENGINEER TOADEQUATE FOR THEL DRAWINGS MUST BE SIGNEDSOUTH CAROLINA'ESSIONAL ENGINEER WHENSOUTH CAROLINA	IC. ANY USE OF THIS DESIGN CLUDING DIMENSIONS, MUST HE USER'S ENGINEER TO ADEQUATE FOR THE L DRAWINGS MUST BE SIGNED SOUTH CAROLINA	DEPARTMENT BRIDGE T S-23-40 (PA	YPICAL SECTION	





ΡM

29.35



NET LENGTH OF ROADWAY	0.000	MILES
NET LENGTH OF BRIDGES	0.015	MILES
NET LENGTH OF PROJECT	0.015	MILES
LENGTH OF EXCEPTIONS	0.000	MILES
GROSS LENGTH OF PROJECT	0.015	MILES

NOTE: EXCEPT AS MAY OTHERWISE BE SPECIFIED ON THE PLANS OR IN THE SPECIAL PROVISIONS, ALL MATERIALS AND WORKMANSHIP ON THIS PROJECT SHALL CONFORM TO THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION AND THE STANDARD DRAWINGS FOR ROAD CONSTRUCTION IN EFFECT AT THE TIME OF LETTING.



	ENGINEER OF RECORD
N.C. 27609	CONCEPTUAL PLANS
	NOT FOR
	CONSTRUCTION



APPROXIMA	TE LOCATION OF BRIDGE IS
LATITUDE	<u>35°-00' - 48" N</u>
LONGITUDE	82°- 34' - 16" W

-N-

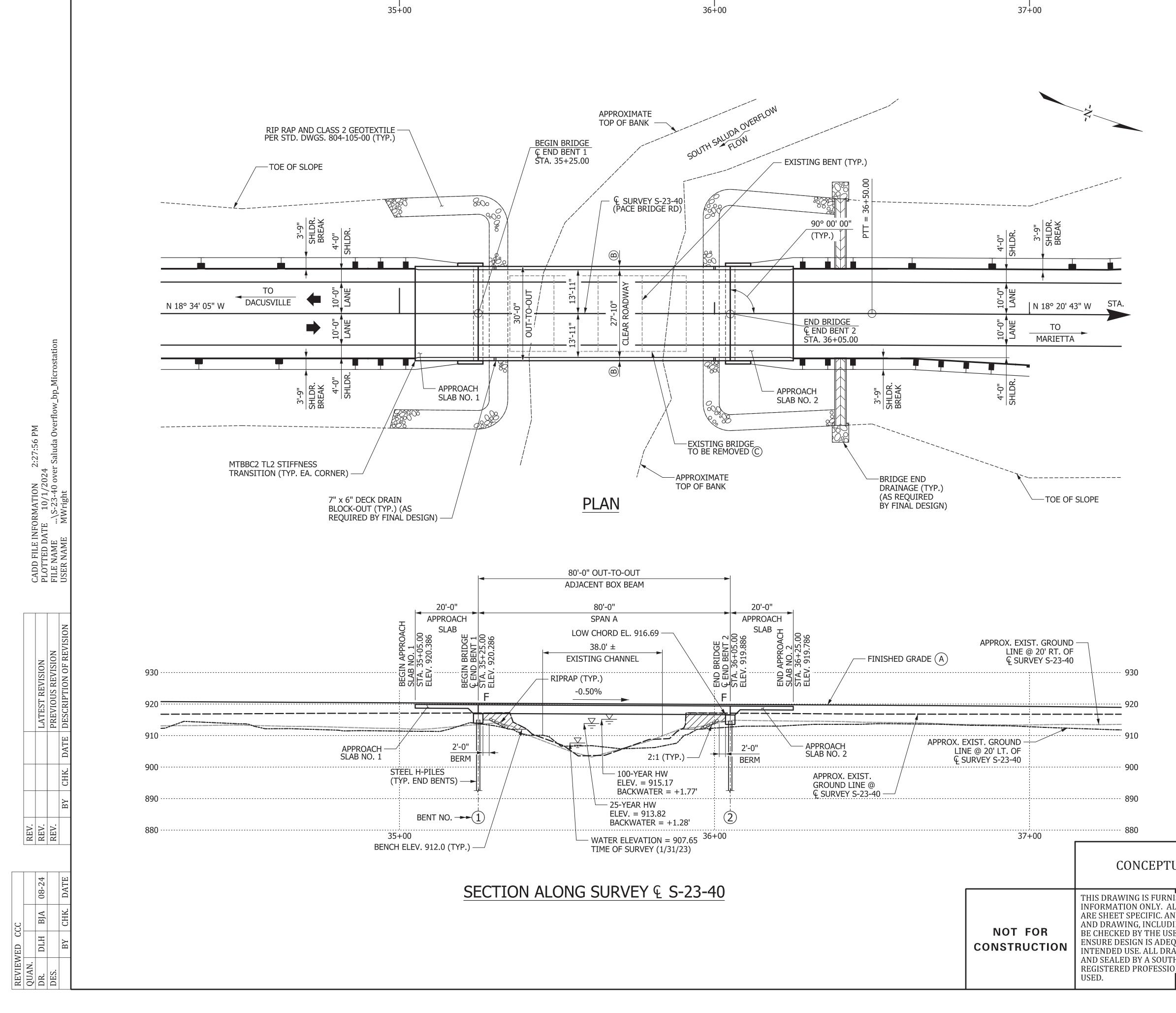
SUPPLEMENTAL DESIGN CRITERIA FOR LOW VOLUME BRIDGE REPLACEMENT PROJECTS

DESIGN REFERENCE FOR THESE PLANS IS THE:

LVB

BRIDGE PLANS ID SHEET

P043137



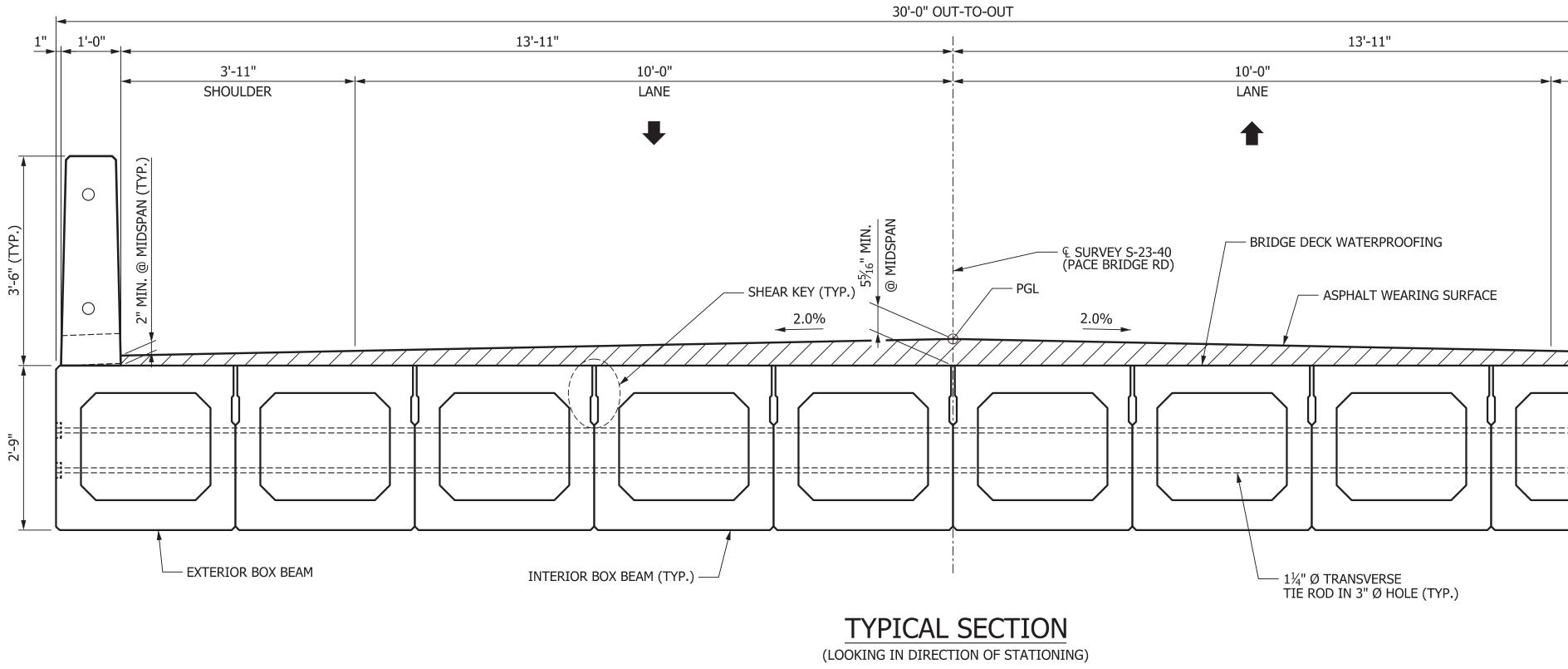
BJA 08-24

			BRIDGE PLANS ID	SHEET 2
		L	P043137	
	NOTES:			
A	PROPOSED PROFILE SET SO THE HYDRAULIC REQUIREME			
B	INCLUDES 1'-0" MASH BARRI	IER PARAPET AND	1" SLAB EXTENSION.	
C	REMOVE AND DISPOSE OF E SIMPLE CONCRETE SLAB BRI ACCORDANCE WITH SECTIO SPECIFICATIONS.	[DGE AND APPUR]	TENANCES IN	
	F - DENOTES FIXED BEARING	G		
	= EXCAVATE HATCHED AREA	A		
	<u>CONTROL</u>	. POINTS		
	CP8 ELEVATION = N 1160363.49 BRDG NL	916.50 E 1529632.64		
	CP9	016 70		
	ELEVATION = N 1160955.98 BRDG NL	E 1529406.37		
	-	◄─── € SURVEY (PACE BRII)		
	0.020 FT./FT.	0.020 FT./FT	г.	
	TYPICAL THROUG		<u>TCH</u>	
	VERTICAL C	JRVE DATA		
	PVI = 33+50.00	PVI = 37+00		
	ELEV. 921.16 V.C. = 135'	ELEV. 919.41 V.C. = 135'		
	+0.50% -0.50	% -1.37%	_	
		/0 1.57%		
	HYDROLOGY D			
	D.A. = 98.4 SQ. MIL Q_25 = 9,590 CFS VELOCITY_25 = 9.4			
	AREA FURNISHED UI $Q_{100} = 13,600 \text{ CFS}$	$NDER_{25} = 810.6$	SQ. FT.	
	VELOCITY_100 = 11 AREA FURNISHED U		1 SQ. FT.	
	OVERTOPPING	FLOOD		
	Q = 18,300 CFS PROBABILITY < 0.29	%		
	NOTE: HYDROLOGY FOR THE ENTIRE SO			
UAL PLANS	HNTB	HNTB CORPC SC License No. 26 4000 Center at N Raleigh, N.C. 2760	5 orth Hills Street, Suite 500),
ISHED FOR LL DIMENSIONS SHOWN NY USE OF THIS DESIGN		OUTH CARO NT OF TRA	LINA NSPORTATION	J
ING DIMENSIONS, MUST ER'S ENGINEER TO QUATE FOR THE	BRIDGE	PLAN AN	D PROFILE	
AWINGS MUST BE SIGNED TH CAROLINA	S-23-40			
DNAL ENGINEER WHEN	COUNTY: GREENVILLE	UVER SUUTH S	ROUTE: S-23-40	

				ВΥ
	REV	REV	REV	
		08-24		DATE
CC		BJA		CHK.
VED C		DLH		ВΥ
REVIEWED CCC	QUAN.	DR.	DES.	

CADD FILE INFORMATION 2:28:50 PM PLOTTED DATE 10/1/2024 FILE NAME ...\S-23-40 over Saluda Overflow_sx_Microst USER NAME MWright

LATEST REVISIONPREVIOUS REVISIONDATEDATEDESCRIPTION OF REVI



13'-11"			► 1'-0" 1"	
1		3'-11" SHOULDER		
IDGE DECK WATERPROOFII	NG	CAST-IN-PLACE MASH BARRIER PARAPET (TYP.) — 2" DIA. CONDUIT (TYP.) —	0	
ASPHALT WEARIN	IG SURFACE	7" x 6" DECK DRAIN BLOCK-OUT (TYP.) –		
— 1¼" Ø TRANSVERSE TIE ROD IN 3" Ø HOLE (TYP.)	EXTERIOR BOX BEAM —		
	CONCI	EPTUAL PLANS	HNTB	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609
	THIS DRAWING IS INFORMATION ON ARE SHEET SPECIF	FURNISHED FOR LY. ALL DIMENSIONS SHOWN TIC. ANY USE OF THIS DESIGN	SO	SC License No. 265 4000 Center at North Hills Street, Suite 500,
NOT FOR CONSTRUCTION	THIS DRAWING IS INFORMATION ON ARE SHEET SPECIF AND DRAWING, IN BE CHECKED BY TH ENSURE DESIGN IS	FURNISHED FOR LY. ALL DIMENSIONS SHOWN TC. ANY USE OF THIS DESIGN CLUDING DIMENSIONS, MUST HE USER'S ENGINEER TO ADEQUATE FOR THE LL DRAWINGS MUST BE SIGNED	SO DEPARTME BRIDGE	SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609 UTH CAROLINA

BRIDGE PLANS ID SHEET

3

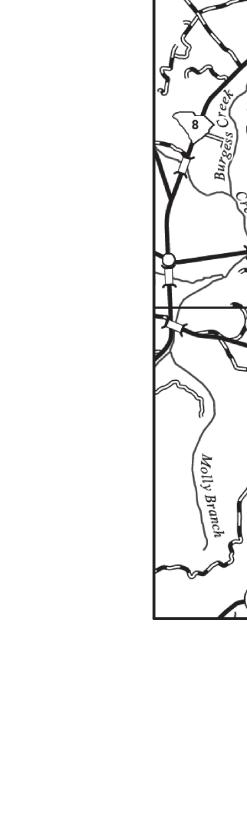
P043137



TITLE SHEET
 BRIDGE PLAN AND PROFILE

BRIDGE PLAN AND PROFIL
 BRIDGE TYICAL SECTION

PROPOSED PLANS FOR PICKENS COUNTY PROJECT ID P043138 ROUTE S-39-26 (PACE BRIDGE RD) REPLACE BRIDGE OVER TRIBUTARY TO SOUTH SALUDA RIVER

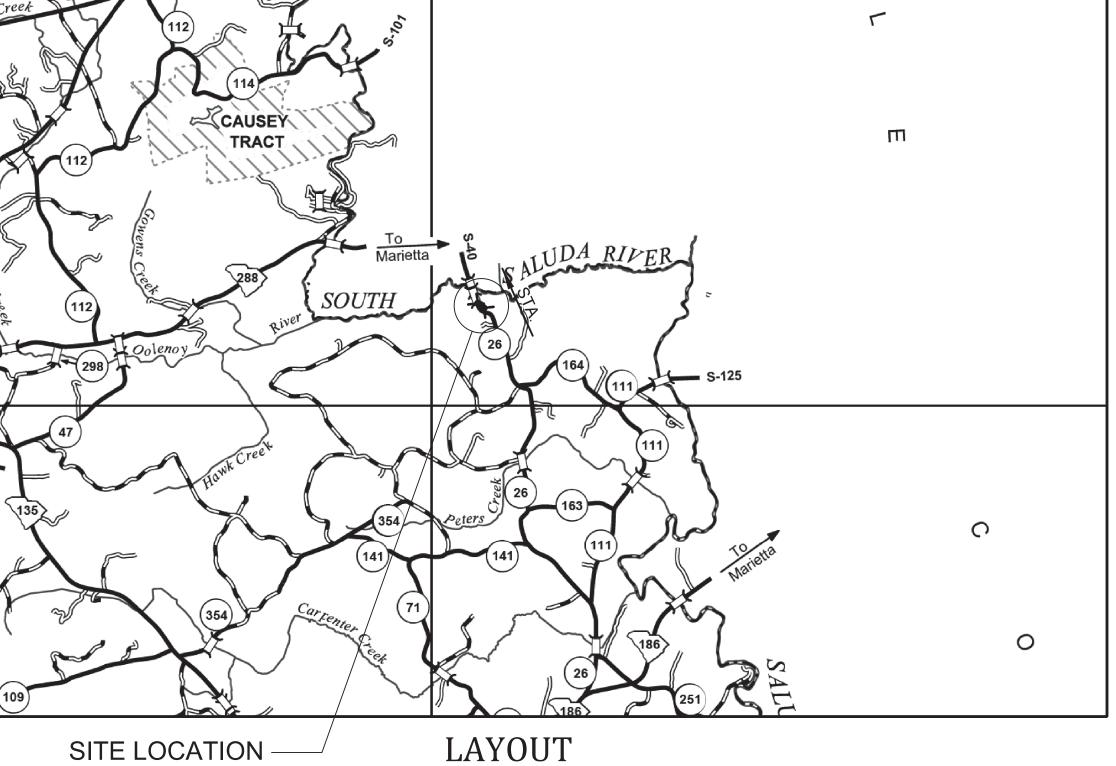


ΓŲ SOUTH CAROLINA CALL 811 CADD FILE INFORMATION PLOTTED DATE 9/20/2024 FILE NAME ...\S-39-26 Trib SOUTH CAROLINA 811 (SC811) WWW.SC811.COM ALL UTILITIES MAY NOT BE A MEMBER OF SC811 ASSET ID NOT ASSIGNED TRAFFIC DATA 24 <u>2025</u> ADT <u>600</u> V.P.D. $\triangleleft |$ REVIEWED CCC DR. MEW <u>2045*</u> ADT <u>800*</u> V.P.D. TRUCKS <u>8</u>% * DESIGN TRAFFIC DATA

3 DAYS BEFORE DIGGING IN

to





NET LENGTH OF ROADWAY	0.000	MILES
NET LENGTH OF BRIDGES	0.013	MILES
NET LENGTH OF PROJECT	0.013	MILES
LENGTH OF EXCEPTIONS	0.000	MILES
GROSS LENGTH OF PROJECT	0.013	MILES

NOTE: EXCEPT AS MAY OTHERWISE BE SPECIFIED ON THE PLANS OR IN THE SPECIAL PROVISIONS, ALL MATERIALS AND WORKMANSHIP ON THIS PROJECT SHALL CONFORM TO THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION AND THE STANDARD DRAWINGS FOR ROAD CONSTRUCTION IN EFFECT AT THE TIME OF LETTING.



-N-

BRIDGE PLANS ID	SHEET
P043138	1

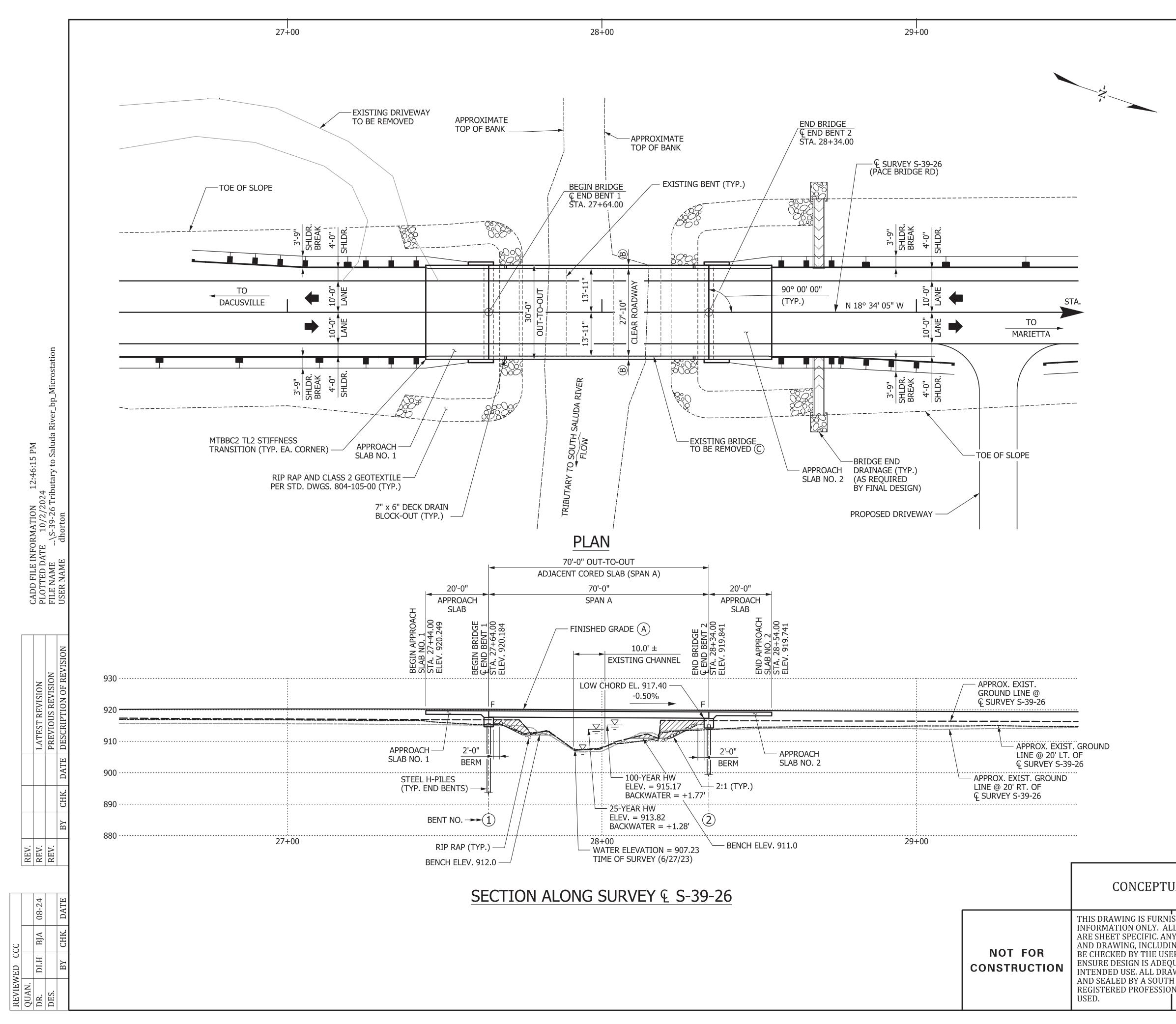
DESIGN REFERENCE FOR THESE PLANS IS THE:

LVB

SUPPLEMENTAL DESIGN CRITERIA FOR LOW VOLUME BRIDGE REPLACEMENT PROJECTS

Approximate Location of Bridge is			
Latitude _ Longitude _	35°-00'-41" N		
	82°-34'-13" W		

RM	ENGINEER OF RECORD
leigh, N.C. 27609	CONCEPTUAL PLANS
	NOT FOR CONSTRUCTION



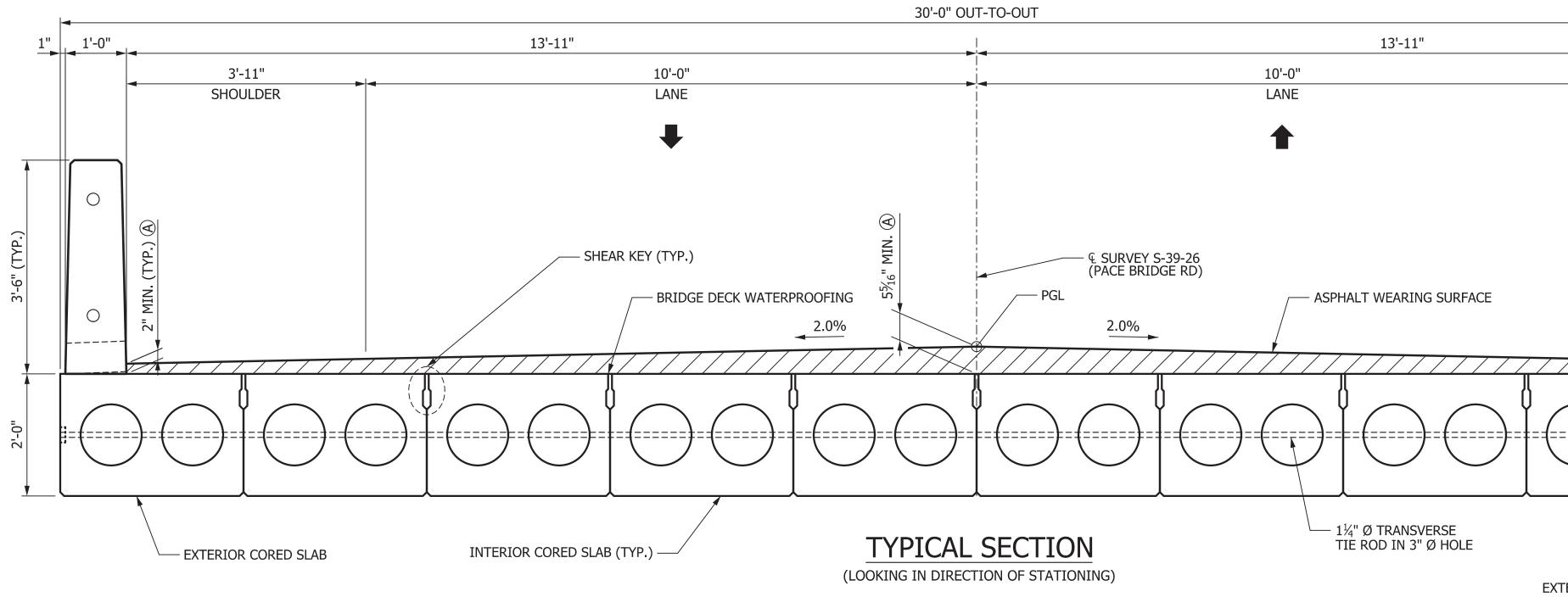
		BRIDGE PLANS ID	SHEET
NC	TES:	P043138	2
(A) PR	DPOSED PROFILE SET SO THAT THE LOW CHO E HYDRAULIC REQUIREMENTS, SET FORTH BY		
(B) INC	CLUDES 1'-0" MASH BARRIER PARAPET AND 1"	SLAB EXTENSION.	
SIN AC	MOVE AND DISPOSE OF EXISTING 28'-0" x 45'- 1PLE CONCRETE SLAB BRIDGE AND APPURTEN CORDANCE WITH SECTION 202.4.2 OF THE ST ECIFICATIONS.	ANCES IN	
	DENOTES FIXED BEARING		
	EXCAVATE HATCHED AREA		
	CONTROL POINTS CP7 ELEVATION = 916.75 N 1159752.28 E 1529808.50 BRDG NL CP8 ELEVATION = 916.50 N 1160363.49 N 1160363.49 E 1529632.64 BRDG NL 		
	TYPICAL THROUGHOUT BRIDGE CUPERELEVATION SKET(VERTICAL CURVE DATA PVI = 27+10.00 ELEV. 920.46 V.C. = 135' PVI = 29+60.00 ELEV. 919.21 V.C. = 135' PVI = 29+60.00 ELEV. 919.21 V.C. = 135' V.C. = 136' V.C. = 106' V.C. = 106' V.C. = 106' V.C. = 106' V.C. = 106' V.C. = 10	. FT. Q. FT. PING FLOOD IS	
AL PLANS		55 orth Hills Street, Suite 500	р,
	Raleigh, N.C. 2760		
SHED FOR L DIMENSIONS SHOWN (USE OF THIS DESIGN NG DIMENSIONS, MUST	SOUTH CARO DEPARTMENT OF TRA		۱
R'S ENGINEER TO UATE FOR THE WINGS MUST BE SIGNED			
CAROLINA NAL ENGINEER WHEN	S-39-26 (PACE BRIDGE REPLACEMENT OVER TRIBUTARY T		IVER

COUNTY: PICKENS

ROUTE: S-39-26

		LATEST REVISION	PREVIOUS REVISION	BY CHK. DATE DESCRIPTION OF REVI
		LATES	PREVIC	DESCRI
				DATE
				CHK.
				ВΥ
	REV.	REV.	REV.	
		BJA 08-24		CHK. DATE
/ED CCC		BJA		CHK.
		M		ВΥ
EVIEWED C		MEV		

CADD FILE INFORMATION 2:39:24 PM PLOTTED DATE 9/20/2024 FILE NAME ...\S-39-26 Tributary to Saluda River_sx_Micros USER NAME dhorton

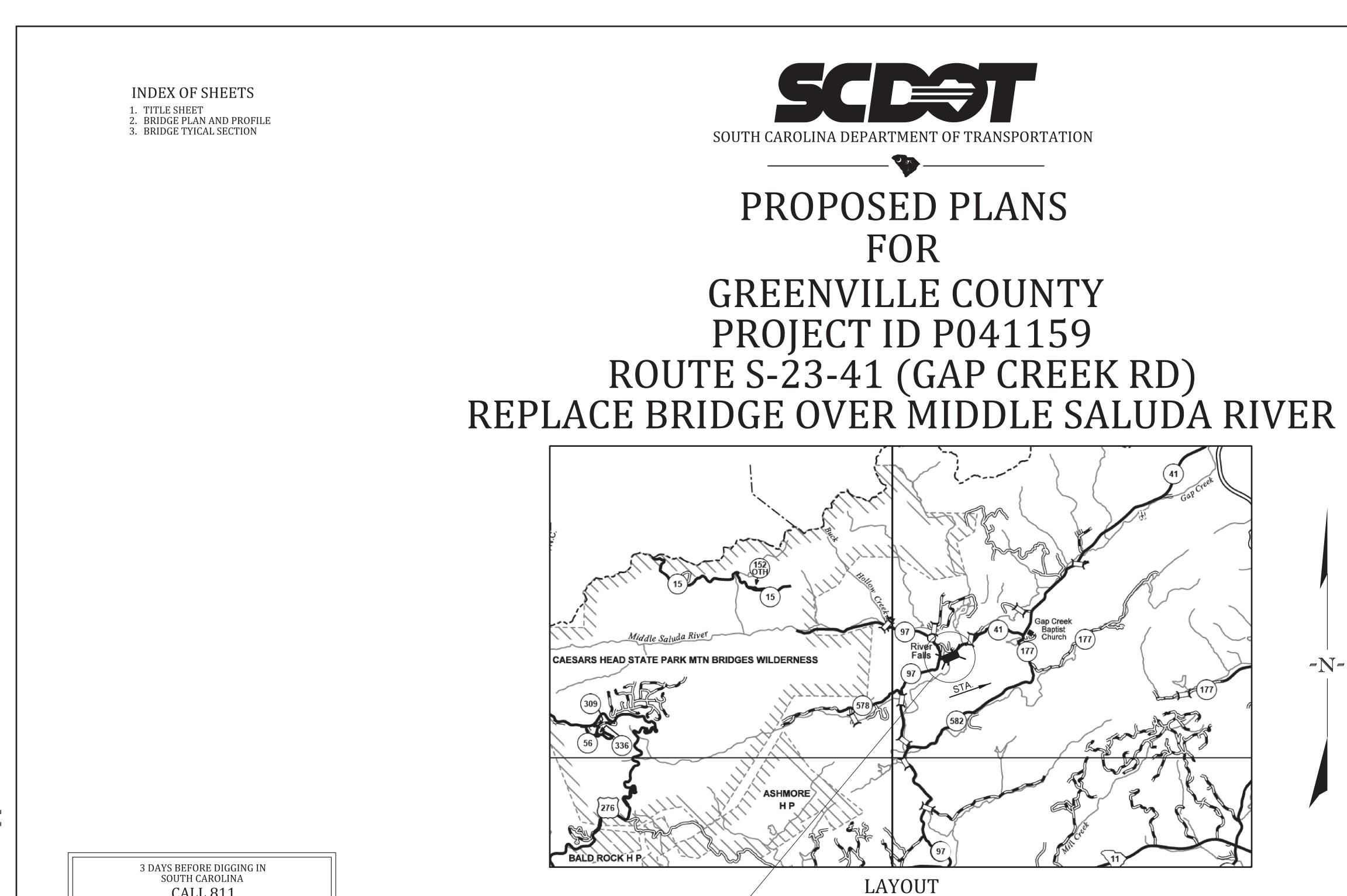


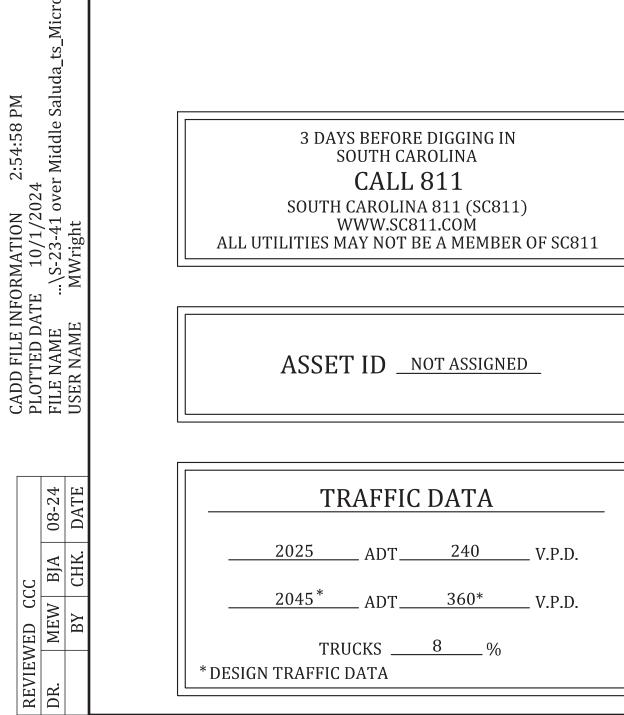
NOTES:

A DUE TO BE MAY NOT OCC ORDER TO MA

	CONCEP
NOT FOR CONSTRUCTION	THIS DRAWING IS FUE INFORMATION ONLY. ARE SHEET SPECIFIC. AND DRAWING, INCLU BE CHECKED BY THE U ENSURE DESIGN IS AD INTENDED USE. ALL D AND SEALED BY A SOU REGISTERED PROFESS USED.

	BRIDGE PLANS ID SHEET
	P043138 3
	1'-0" 1"
3'-11"	
SHOULDER	
	\circ
CAST-IN-PLACE MASH BARRIER PARAPET (TYP.)	
2" DIA. CONDUIT (TYP.)	
7" x 6" DECK DRA BLOCK-OUT (TYP	AIN ?.)
\sim	\sim
)-{}-{	·==)==(======)==[
OR CORED SLAB ——/	
1 CAMBER AND THE VERTICAL	L CURVE ORDINATES, THE MINIMUM THICKNESS
	THICKNESS WILL NEED TO BE ADJUSTED IN Y THICKNESS ACROSS THE BRIDGE.
UAL PLANS	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500.
UAL PLANS	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609
IISHED FOR	SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609 SOUTH CAROLINA
ISHED FOR LL DIMENSIONS SHOWN NY USE OF THIS DESIGN	SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609
ISHED FOR ILL DIMENSIONS SHOWN NY USE OF THIS DESIGN ING DIMENSIONS, MUST SER'S ENGINEER TO	SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609 SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION
ISHED FOR LL DIMENSIONS SHOWN NY USE OF THIS DESIGN DING DIMENSIONS, MUST SER'S ENGINEER TO QUATE FOR THE AWINGS MUST BE SIGNED	SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609 SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION BRIDGE TYPICAL SECTION
UAL PLANS	SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609 SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION







SITE LOCATION

0.000	MILES
0.019	MILES
0.019	MILES
0.000	MILES
0.019	MILES
	0.019 0.019 0.000

NOTE: EXCEPT AS MAY OTHERWISE BE SPECIFIED ON THE PLANS OR IN THE SPECIAL PROVISIONS, ALL MATERIALS AND WORKMANSHIP ON THIS PROJECT SHALL CONFORM TO THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION AND THE STANDARD DRAWINGS FOR ROAD CONSTRUCTION IN EFFECT AT THE TIME OF LETTING.

BRIDGE PLANS ID	SHEET
P041159	1

DESIGN REFERENCE FOR THESE PLANS IS THE:

LVB

SUPPLEMENTAL DESIGN CRITERIA FOR LOW VOLUME BRIDGE REPLACEMENT PROJECTS

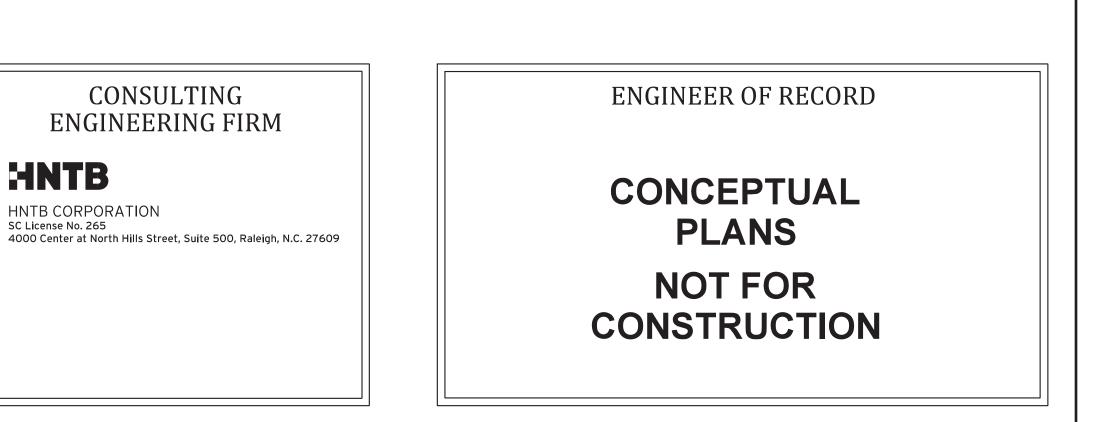
Approximate Location of Bridge is			
Latitude	35°-07'-13" N		
Longitude	82°-32'-15" W		

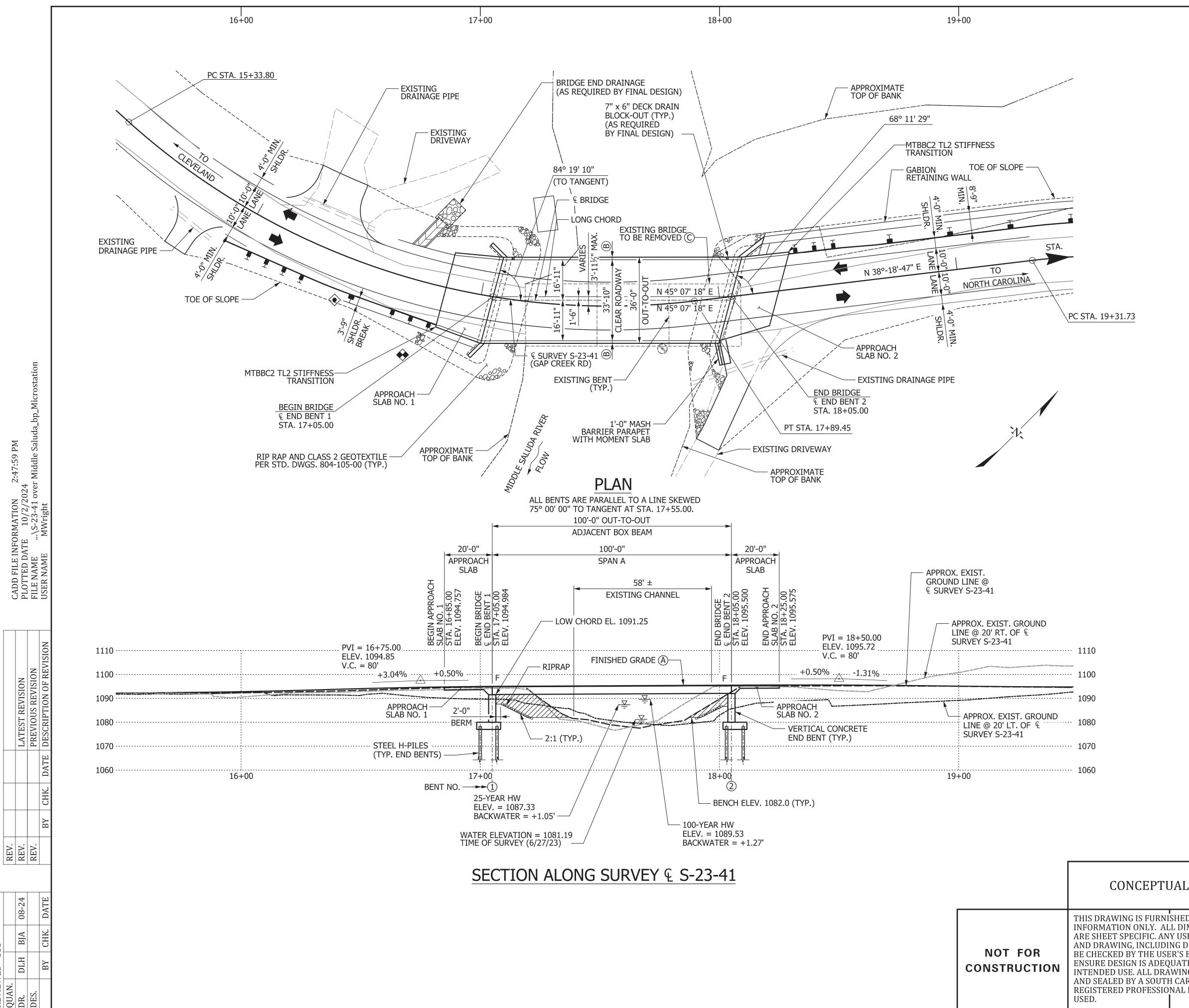
-N-

HNTB

SC License No. 265

HNTB CORPORATION

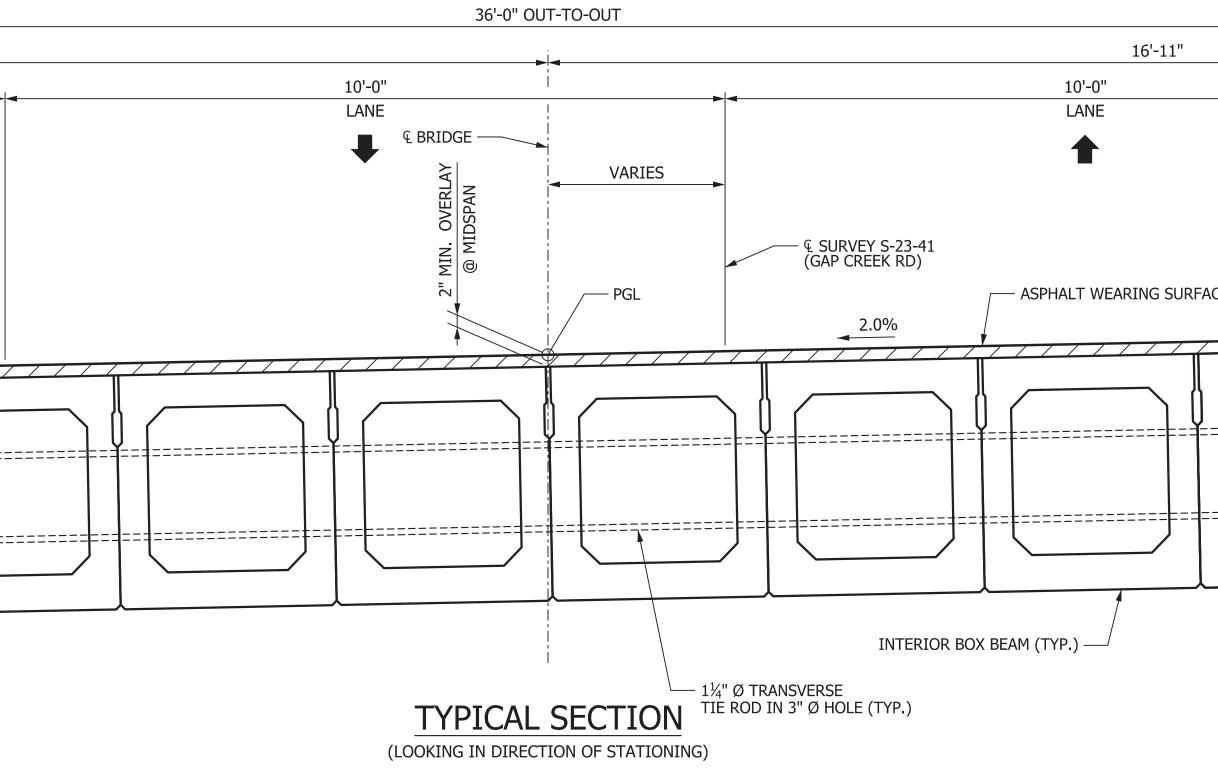




		08-24		DATE	
CC		BJA		CHK.	
VED C(DLH		ВΥ	
REVIEWED CCC	QUAN.	DR.	DES.		

			BRIDGE PLANS ID	SHEET
			P041159	2
	NOTES:			
(F	PROPOSED PROFILE SET SO THAT TH THE HYDRAULIC REQUIREMENTS, SET			
Œ) INCLUDES 1'-0" MASH BARRIER PARA	PET A	ND 1" SLAB EXTENSIC	N.
	REMOVE AND DISPOSE OF EXISTING SIMPLE CONCRETE SLAB BRIDGE AND ACCORDANCE WITH SECTION 202.4.2 SPECIFICATIONS.) app	URTENANCES IN	
	F - DENOTES FIXED BEARING			
	= EXCAVATE HATCHED AREA			
	CONTROL POIN	TS		
	CP5 ELEVATION = 1093.52 N 1199384.95 E 15400 BRDG NL		7	
	CP6 ELEVATION = 1093.89 N 1199627.10 E 15402 BRDG NL		1	
			EY S-23-41 REEK RD)	
	0.020 FT./FT. 0.02	20 FT.	/FT	
	TYPICAL THROUGHOUT BI			
	VERTICAL CURVE	DAT	<u>A</u>	
	ELEV. 1094.85 ELEV	= 184 /. 109 = 80		
	+3.04% +0.50%	-1.319	%	
	HORIZONTAL CURVE			
	P.I. = $16+69.96$ P.I. = 19 $\Delta = 48^{\circ}-49'-31'' (LT)$ $\Delta = 14$ $D = 19^{\circ}-05'-55''$ $D = 19$ $T = 136.17'$ $T = 36$ $L = 255.65'$ $L = 73$ $E = 4.80'$ $E = 3.7$ $R = 300.00'$ $R = 30$	°-00'-)°-05'- 5.87' 5.37' 71'	50 -45" (RT) -55"	
	HYDROLOGY DATA D.A. = 20.8 SQ. MILES Q_25 = 3,030 CFS VELOCITY_25 = 8.6 FPS AREA FURNISHED UNDER_25 Q_100 = 4,460 CFS VELOCITY 100 = 9.4 FPS	= 67	0.0 SQ. FT.	
	AREA FURNISHED UNDER_100 OVERTOPPING FLOO Q = 7,500 CFS PROBABILITY <0.2%		95.0 SQ. FT.	
L PLANS	SC License	No. 26 er at N	orth Hills Street, Suite 500),
D FOR MENSIONS SHOWN SE OF THIS DESIGN	SOUTH CA DEPARTMENT OF T			1
DIMENSIONS, MUST ENGINEER TO 'E FOR THE IGS MUST BE SIGNED	BRIDGE PLAN	AN	ID PROFILE	
ROLINA ENGINEER WHEN	S-23-41 (GAP CRE REPLACEMENT OVER M		E SALUDA RIVER	
	COUNTY: GREENVILLE		ROUTE: S-23-41	

CADD FILE INFORMATION 2:56:20 PM PLOTTED DATE 10/1/2024 FILE NAME\S-23-41 over Middle Saluda_sx_Microstation USER NAME MWright	VAIRES (4'-0" MIN.) SHOULDER T" x 6" DECK DRAIN BLOCK-OUT BRIDGE DECK WATERPROOFING 2.0%	
REVIEWED CCCQUAN.QLAN.DLHBJADR.DLHBJA08-24DES.BYCHK.DATEDATEDES.DFDFDFDFDFS.BYCHK.DATEDF <td>EXTERIOR BOX BEAM</td> <td></td>	EXTERIOR BOX BEAM	



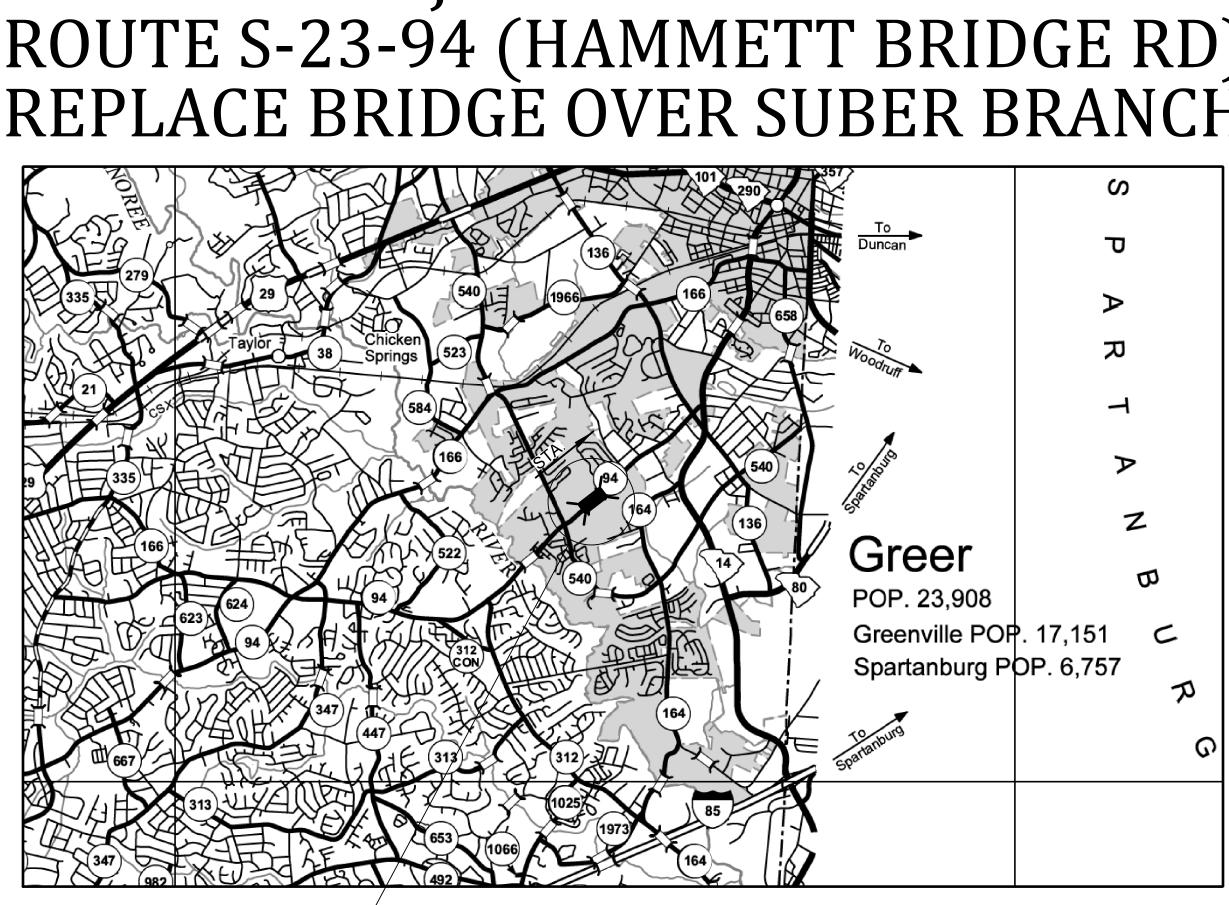
	P041159 3
16'-11"	1'-0" 1"
10'-0" LANE	VAIRES (4'-0" MIN.)
	0
	CAST-IN-PLACE MASH BARRIER PARAPET (TYP.)
RVEY S-23-41 CREEK RD)	2" DIA. CONDUIT (TYP.)
ASPHALT WEARING SURFACE	
====== <mark>}</mark>	=======================================
	=======================================
	EXTERIOR BOX BEAM —
INTERIOR BOX BEAM (TYP.) ——/	
DLE (TYP.)	
CONCEPTUAL PLANS	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Detailet N.C. 27(00)
THIS DRAWING IS FURNISHED FOR	Raleigh, N.C. 27609 SOUTH CAROLINA
INFORMATION ONLY. ALL DIMENSIONS SHOW ARE SHEET SPECIFIC. ANY USE OF THIS DESIGN AND DRAWING, INCLUDING DIMENSIONS, MUS BE CHECKED BY THE USER'S ENGINEER TO	T DEFARTMENT OF TRANSFORTATION
CONSTRUCTION ENSURE DESIGN IS ADEQUATE FOR THE INTENDED USE. ALL DRAWINGS MUST BE SIGN AND SEALED BY A SOUTH CAROLINA	IED S-23-41 (GAP CREEK RD) BRIDGE
REGISTERED PROFESSIONAL ENGINEER WHEN USED.	S-23-41 (GAP CREEK RD) BRIDGE REPLACEMENT OVER MIDDLE SALUDA RIVER COUNTY: GREENVILLE ROUTE: S-23-41
• •	· · · ·

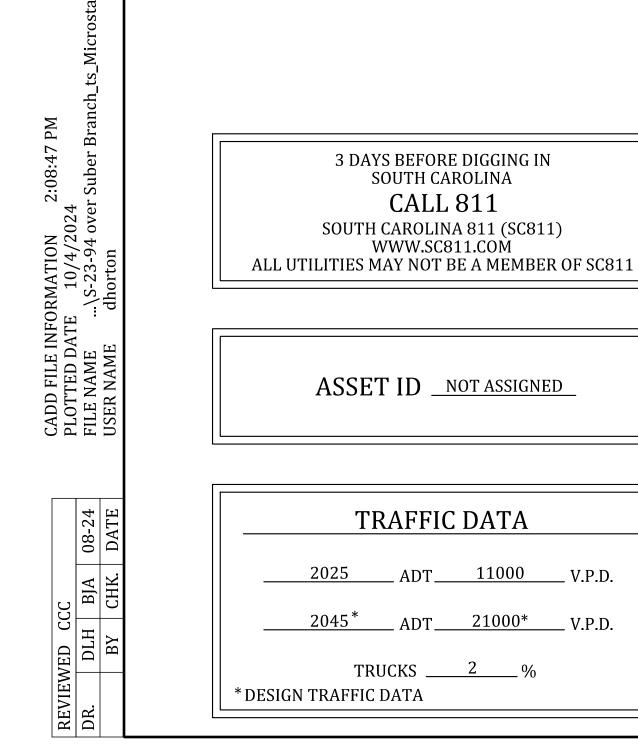
BRIDGE PLANS ID SHEET



1. TITLE SHEET

2. BRIDGE PLAN AND PROFILE **3. BRIDGE TYICAL SECTION**







PROPOSED PLANS FOR **GREENVILLE COUNTY** PROJECT ID P041163 ROUTE S-23-94 (HAMMETT BRIDGE RD) REPLACE BRIDGE OVER SUBER BRANCH

LAYOUT

SITE LOCATION

NET LENGTH OF ROADWAY	0.000	MILES
NET LENGTH OF BRIDGES	0.020	MILES
NET LENGTH OF PROJECT	0.020	MILES
LENGTH OF EXCEPTIONS	0.000	MILES
GROSS LENGTH OF PROJECT	0.020	MILES

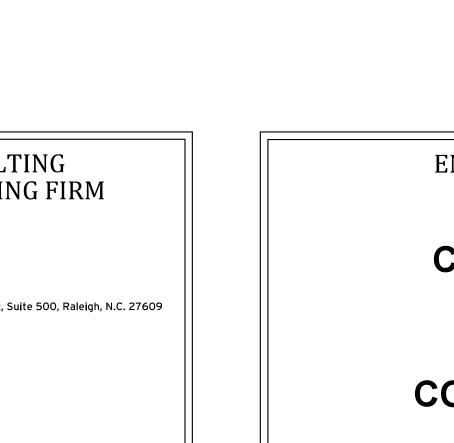
NOTE: EXCEPT AS MAY OTHERWISE BE SPECIFIED ON THE PLANS OR IN THE SPECIAL PROVISIONS, ALL MATERIALS AND WORKMANSHIP ON THIS PROJECT SHALL CONFORM TO THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION AND THE STANDARD DRAWINGS FOR ROAD CONSTRUCTION IN EFFECT AT THE TIME OF LETTING.

CONSULTING **ENGINEERING FIRM** HNTB

HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609



ENGINEER OF RECORD



-N-

Approxin	nate Location of Bridge is	
Latitude .	34°-54'-15" N	_
Longitude	82°-15'-09" W	-

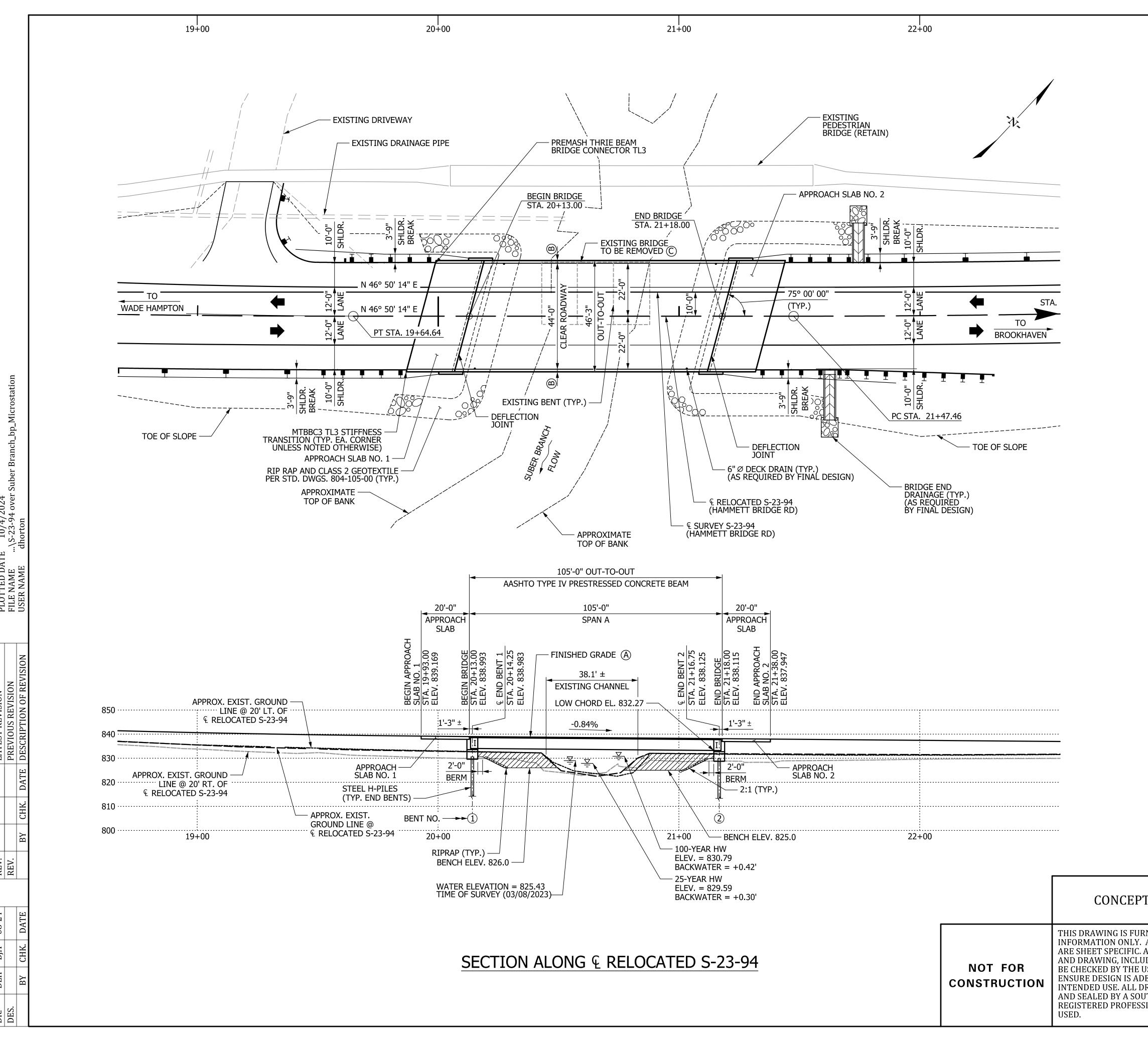
BRIDGE PLANS ID

P041163

SHEET

Γ.		
	Approxi	mate Loc
	Latitude	34
	Longitude	82

Approxim	ate Location of Bridge is
Latitude _	34°-54'-15" N
Longitude _	82°-15'-09" W
-	



ΡM 02 07 CADD FILE INFORMATION 2: PLOTTED DATE 10/4/2024 FILE NAME ...\S-23-94 over S USER NAME dhorton 2

LATEST REVISION PREVIOUS REVISION DESCRIPTION OF REV REV REV REV

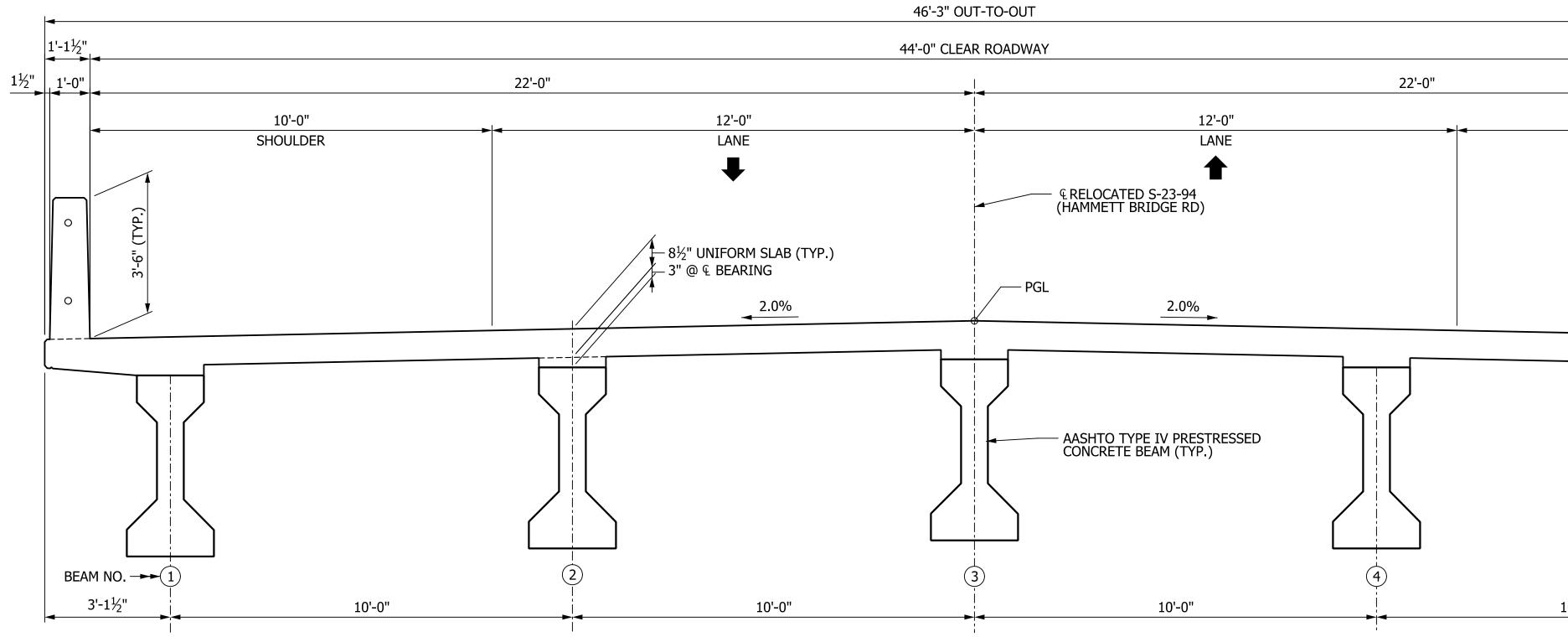
BJA 08-24 CCC REVIEWED CCC QUAN. DR. DLH DES.

			BRIDGE PLANS	ID	SHEET
			P041163		2
	NOTEC				
(A) PROPOSED PROFILE SET SO THE HYDRAULIC REQUIREM			IES	
(B INCLUDES 1'-0" MASH BARR			TENS	SION.
	$\widehat{\mathbb{C}}$ remove and dispose of e	EXISTING 27-	6" x 45'-0" 3-SPAI		
	SIMPLE CONCRETE SLAB BR ACCORDANCE WITH SECTIC SPECIFICATIONS.	IDGE AND AP	PURTENANCES IN		
	I - DENOTES INTEGRAL END) BENT			
	= EXCAVATE HATCHED ARE	A			
	<u>CONTROL</u>	<u>POINTS</u>			
	CP6 ELEVATION = N 1119348.42 BRDG NL		.36		
	CP7	- 921 70			
	ELEVATION = N 1119647.95 BRDG NL	= 831.78 5 E 1624366	.28		
	CP8 ELEVATION = N 1120073.12		.54		
	BRDG NL	0_ 102 1			
			OCATED S-23-94 4ETT BRIDGE RD)		
	0.020 FT./FT.	0.020 F	T./FT.		
	TYPICAL THROU	GHOUT BRID	GE		
	SUPERELEVAT	TION S	KETCH		
	VERTICAL C	URVE DA	TA		
	PVI = 18+10.00 ELEV. 840.69	ELEV. 83	35.00		
	V.C. = 390'	V.C. = 3			
	-0.84	.%	31%0		
	HORIZONTAL	CURVE D	ATA		
	P.I. = $18+37.37$ $\Delta = 2^{\circ} 15' 03'' (LT)$ D = $0^{\circ} 53' 03''$				
	$D = 0^{\circ} 53' 03''$ T = 127.30' L = 254.57'	1 = 129.7	/		
	E = 1.25' R = 6,480.00'	E = 1.30'			
	$\frac{\text{HYDROLOGY D}}{\text{DA} = 3.32 \text{ SO MIL}}$				
	D.A. = 3.32 SQ. MIL Q_25 = 1,030 CFS VELOCITY_25 = 4.7				
	AREA FURNISHED U Q_100 = 1,490 CFS	$NDER_{25} = 3$	54 SQ. FT.		
	VELOCITY_100 = 4. AREA FURNISHED U		232 SQ. FT.		
	$\frac{OVERTOPPIN}{Q = 7,550 \text{ CFS}}$	<u>g flood</u>	-		
	Q = 7,550 CFS PROBABILITY < 0.2	%			
ΓUAL PLANS	HNTB so	INTB CORP(C License No. 26 000 Center at N aleigh, N.C. 276	65 Iorth Hills Street, Suit	e 500	,
NISHED FOR ALL DIMENSIONS SHOWN ANY USE OF THIS DESIGN	SOU' DEPARTMEN	TH CARO Γ OF TRA		ION	[
DING DIMENSIONS, MUST JSER'S ENGINEER TO EQUATE FOR THE	BRIDGE PI	LAN AN	ID PROFI	LE	
RAWINGS MUST BE SIGNED TH CAROLINA IONAL ENGINEER WHEN			GE RD) BRIDGE JBER BRANCH		
IONAL ENGINEEK WIEN	COUNTY: GREENVILLE		ROUTE: S-2	3-94	

	R	R	R	
		08-24		DATE
CC		BJA		CHK.
VED CO		ΡLΗ		ВΥ
REVIEWED CCC	QUAN.	DR.	DES.	

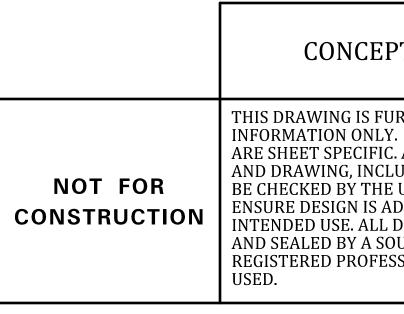
		FILEN	USER
	LATEST REVISION	PREVIOUS REVISION	BY CHK. DATE DESCRIPTION OF REVISION
			DATE
			CHK.
			ВΥ
KEV.	REV.	REV.	

DD FILE INFORMATION 2:08:09 PM DTTED DATE 10/4/2024 E NAME ...\S-23-94 over Suber Branch_sx_Microstation ER NAME dhorton



TYPICAL SECTION

(LOOKING IN DIRECTION OF STATIONING)

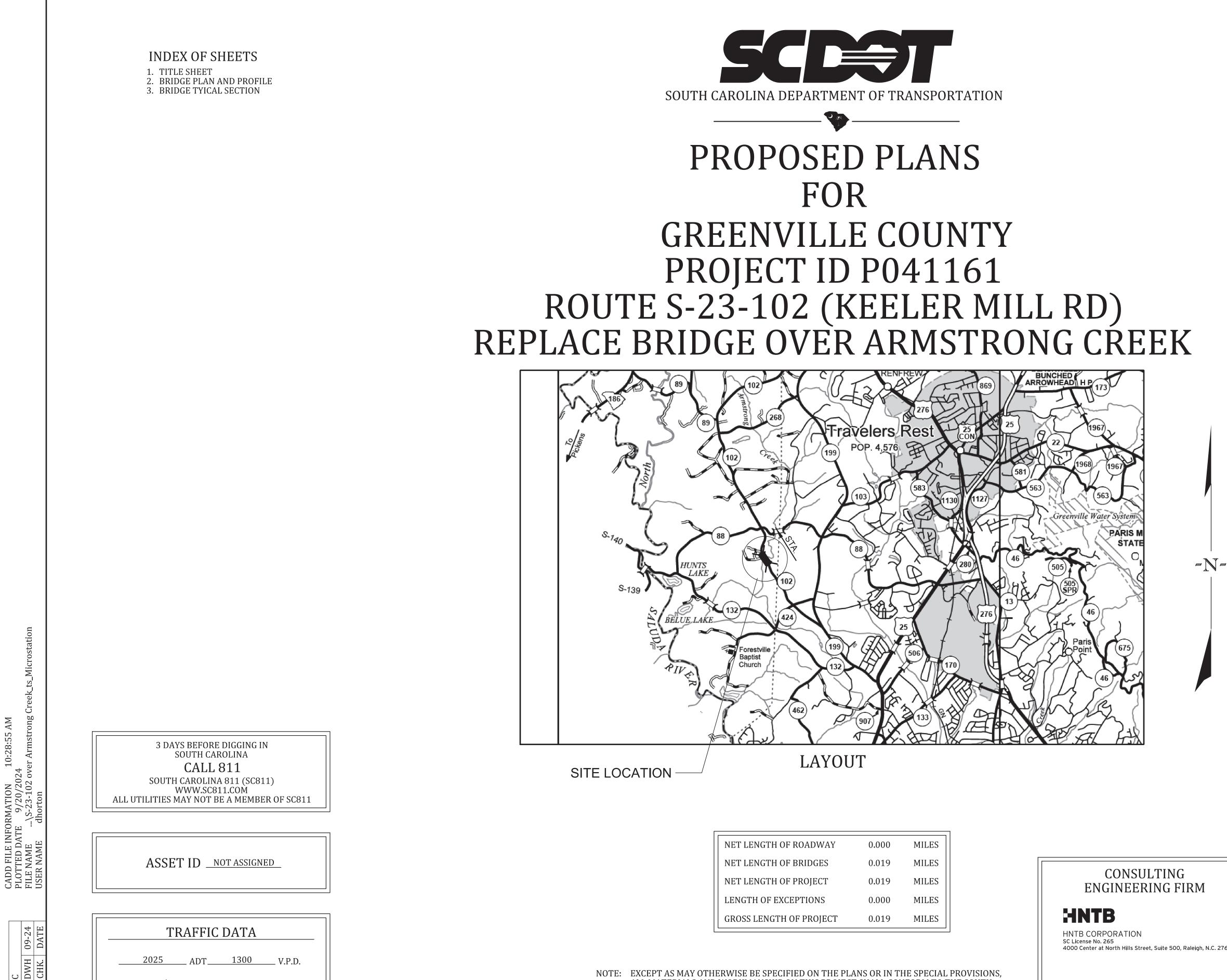


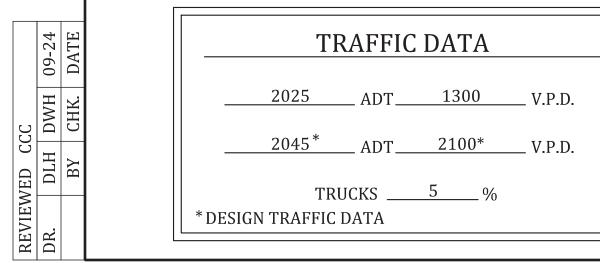
10'-0"	
SHOULDER MASH BARRIER PARAPET (TYP.) - 2" DIA. CONDUIT (TYP. CONST. JT. (TYP. CONTINUOUS ³ / ₄ " "Δ" DRIP — GROOVE RUNNING ENTIRE LENGTH OF BRIDGE (TYP.)	
'-0" •	3'-1½"
PTUAL PLANS	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609
RNISHED FOR ALL DIMENSIONS SHOWN ANY USE OF THIS DESIGN UDING DIMENSIONS, MUST USER'S ENGINEER TO DEQUATE FOR THE	SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION BRIDGE TYPICAL SECTION
DRAWINGS MUST BE SIGNED OUTH CAROLINA SSIONAL ENGINEER WHEN	S-23-94 (HAMMETT BRIDGE RD) BRIDGE REPLACEMENT OVER SUBER BRANCH COUNTY: GREENVILLE ROUTE: S-23-94

BRIDGE PLANS ID SHEET

3

P041163





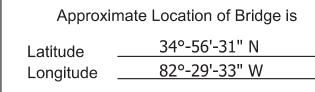


NET LENGTH OF ROADWAY	0.000	MILES
NET LENGTH OF BRIDGES	0.019	MILES
NET LENGTH OF PROJECT	0.019	MILES
LENGTH OF EXCEPTIONS	0.000	MILES
GROSS LENGTH OF PROJECT	0.019	MILES

ALL MATERIALS AND WORKMANSHIP ON THIS PROJECT SHALL CONFORM TO THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION AND THE STANDARD DRAWINGS FOR ROAD CONSTRUCTION IN EFFECT AT THE TIME OF LETTING.



ENGINEER OF RECORD



ſ			_
	Approxir	nate Location of Bridge is	
	Latitude	34°-56'-31" N	
	Longitude	82°-29'-33" W	

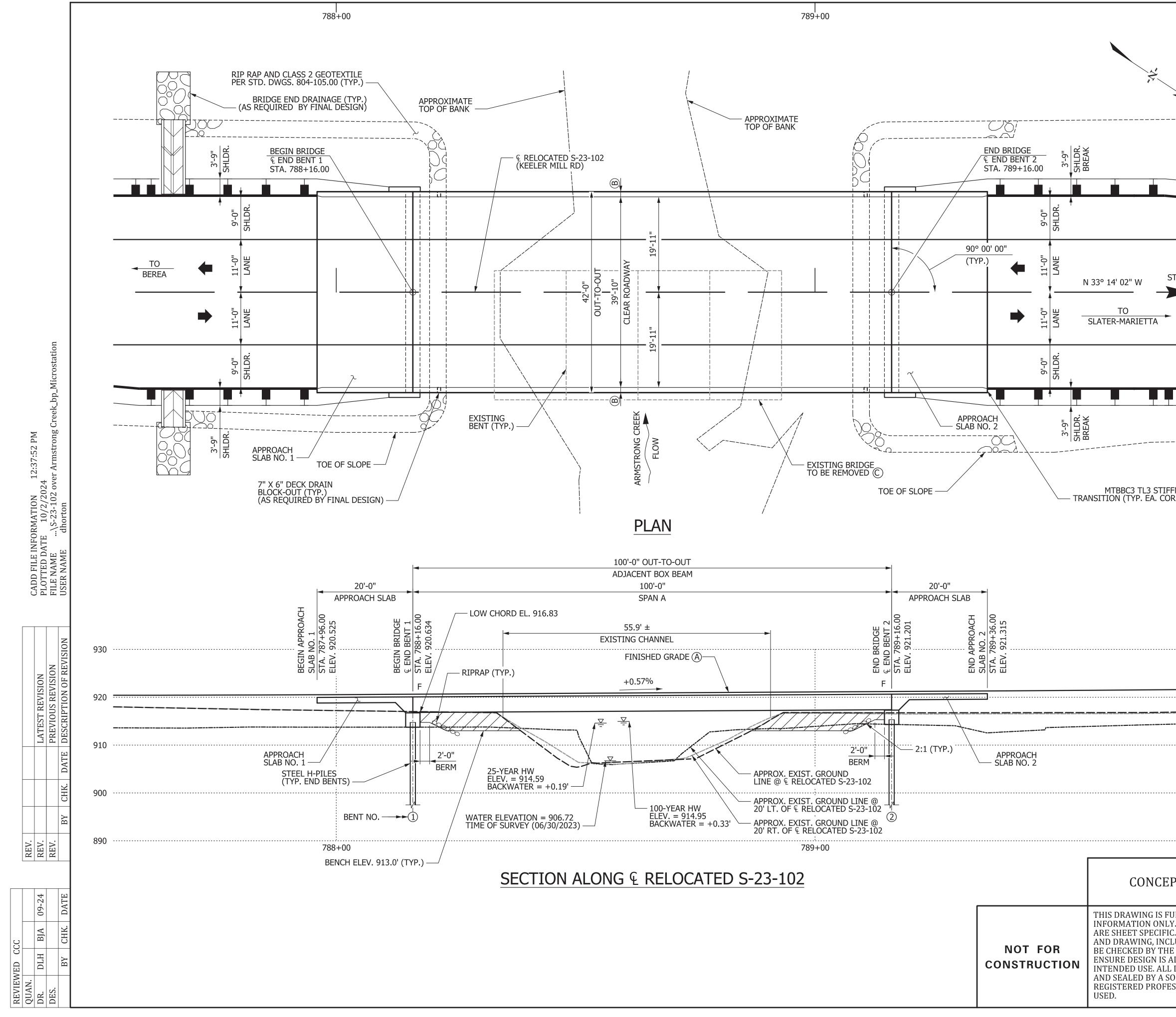
BRIDGE PLANS ID

P041161

SHEET

Approx	imate Location of Br
Latitude	34°-56'-31"
Longitude	82°-29'-33"

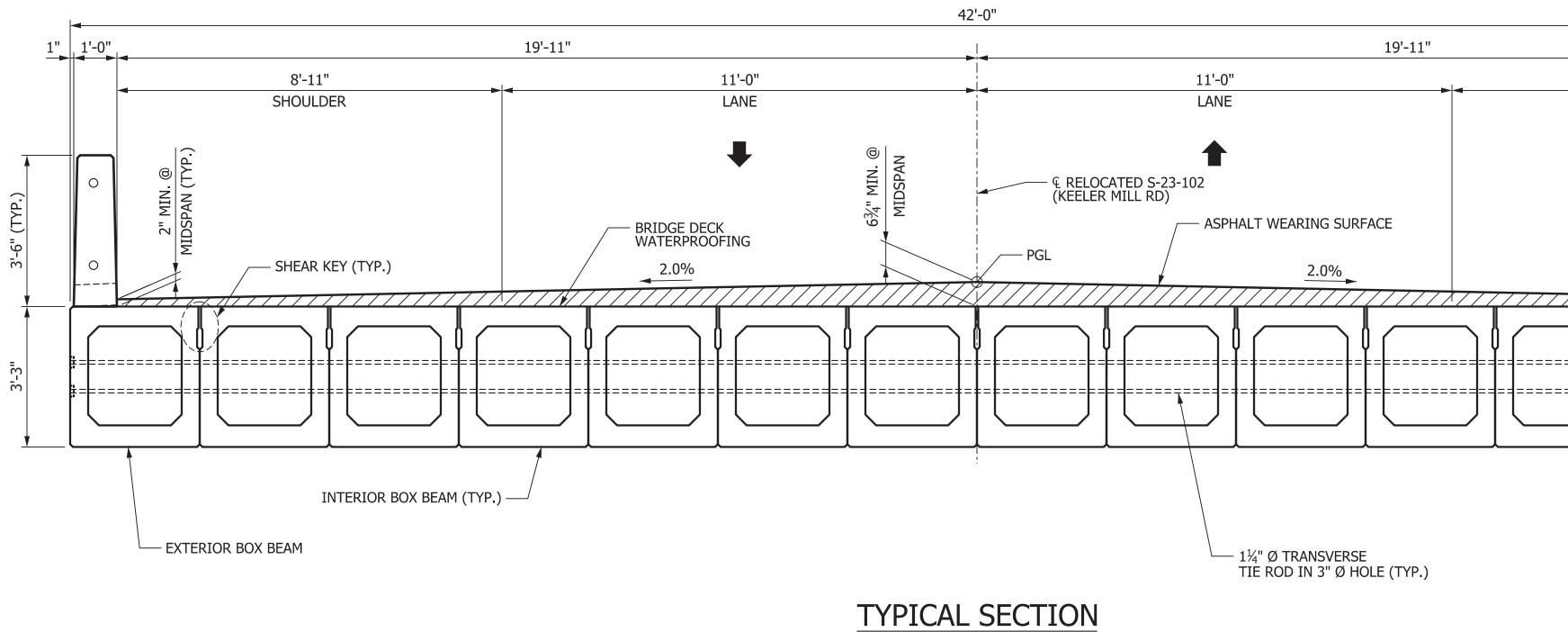
igh,	N.C.	2760	



		BRIDGE PLANS ID P041161	SHEET 2
	ROPOSED PROFILE SET SO THAT THE LOW HE HYDRAULIC REQUIREMENTS, SET FORT		
B II	NCLUDES 1'-0" MASH BARRIER PARAPET AN	ID 1" SLAB EXTENSION	
Š	EMOVE AND DISPOSE OF EXISTING 27-'6" > IMPLE CONCRETE SLAB BRIDGE AND APPU	RTENANCES IN	
	CCORDANCE WITH SECTION 202.4.2 OF TH PECIFICATIONS.	IE STANDARD	
— F	- DENOTES FIXED BEARING		
=	EXCAVATE HATCHED AREA		
	CONTROL POINTS		
STA.	CP 6 ELEVATION = 920.22		
	N 1134122.78 E 1552781. W/CAP	0A	
	CP 7 ELEVATION = 924.19		
	N 1134611.81 E 1552423. W/CAP	50	
		LOCATED S-23-102 LER MILL RD)	
	0.020 FT./FT. 0.020 F		
	<u></u>	··// · · · ►	
FNESS			
RNER)			
	SUPERELEVATION S	KEICH	
		T A	
	VERTICAL CURVE DA		
	VPI = 786+30.00 VPI = 792 ELEV. 919.58 ELEV. 923	.04	
	V.C. = 350' V.C. = 600		
	-3.00% +0.57% +6.	01%	
	HYDROLOGY DATA		
	D.A. = 3.85 SQ. MILES Q_25 = 1,120 CFS		
	VELOCITY_25 = 3.0 FPS AREA FURNISHED UNDER_25 = 22 Q_100 = 1,630 CFS	5 SQ. FT.	
	$VELOCITY_{100} = 3.8 FPS$ AREA FURNISHED UNDER_100 = 1	55 SO. FT.	
	OVERTOPPING FLOOD		
	Q = 8,370 CFS PROBABILITY <0.2%		
	HNTB CORPO SC License No. 20		
PTUAL PLANS	4000 Center at N Raleigh, N.C. 276	lorth Hills Street, Suite 500),
URNISHED FOR	SOUTH CARO		
Y. ALL DIMENSIONS SHOWN C. ANY USE OF THIS DESIGN	DEPARTMENT OF TRA	NSPORTATION	1
LUDING DIMENSIONS, MUST E USER'S ENGINEER TO ADEQUATE FOR THE	BRIDGE PLAN AN	ID PROFILE	
, DRAWINGS MUST BE SIGNED OUTH CAROLINA	S-23-102 (KEELER MILL	RD) BRIDGE	
SSIONAL ENGINEER WHEN	REPLACEMENT OVER ARM	STRONG CREEK ROUTE: S-23-102)
		1001E-3-72-10	<u>_</u>

		LATEST REVISION	PREVIOUS REVISION	BY CHK. DATE DESCRIPTION OF REVIS	
				DATE	
				CHK.	
				ВΥ	
	REV.	REV.	REV.		
		BJA 09-24		CHK. DATE	
CCC		BJA		CHK.	
		DLH		ВҮ	
REVIEWED	QUAN.	DR.	DES.		

CADD FILE INFORMATION 10:33:17 AM PLOTTED DATE 9/20/2024 FILE NAME ...\S-23-102 over Armstrong Creek_sx_Micros USER NAME dhorton



19'-11	"			
)" E	> <	S'-11" DULDER		
	BAF	ST-IN-PLACE MASH RRIER PARAPET (TYP.) -	- •	
PHALT WEARING SURFACE	2"	DIA. CONDUIT (TYP.) –		
2.0%		7" X 6" DECK DRAIN – BLOCK-OUT (TYP.)		
			======================================	
		EXTERIOR BOX BEAM —		
$-1\frac{1}{4}$ " Ø TRANSVERSE	N N N N N N N N N N N N N N N N N N N			
TIE ROD IN 3" Ø HOLE (TYP)			
	CONCEPTUAI	L PLANS	HNTB	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609
	THIS DRAWING IS FURNISHE INFORMATION ONLY. ALL DI ARE SHEET SPECIFIC. ANY US	MENSIONS SHOWN		UTH CAROLINA NT OF TRANSPORTATION
NOT FOR CONSTRUCTION	AND DRAWING, INCLUDING I BE CHECKED BY THE USER'S ENSURE DESIGN IS ADEQUAT INTENDED USE. ALL DRAWIN	DIMENSIONS, MUST ENGINEER TO `E FOR THE		TYPICAL SECTION
	AND SEALED BY A SOUTH CA REGISTERED PROFESSIONAL USED.	ROLINA		(KEELER MILL RD) BRIDGE NT OVER ARMSTRONG CREEK
			COUNTY: GREENVILLE	ROUTE: S-23-102

BRIDGE PLANS ID SHEET

3

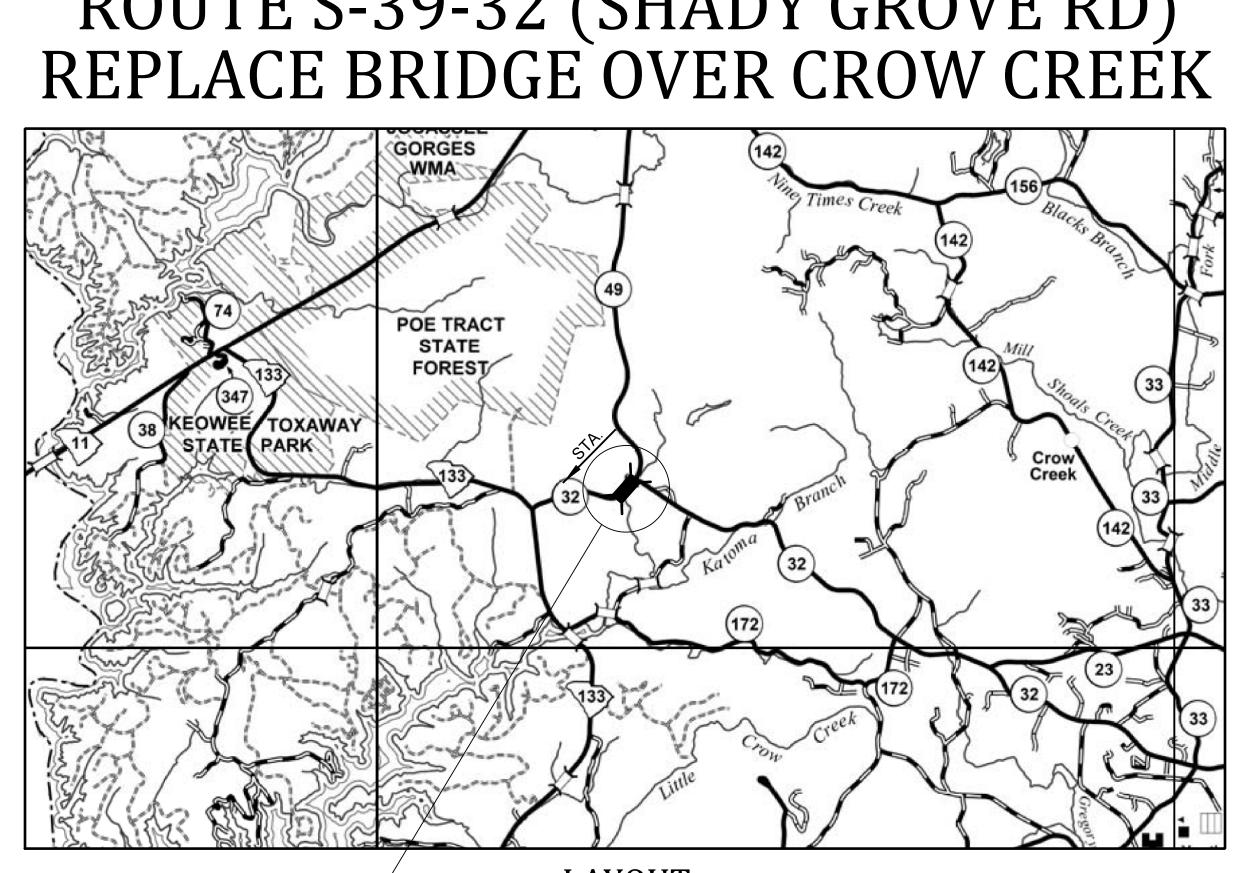
P041161

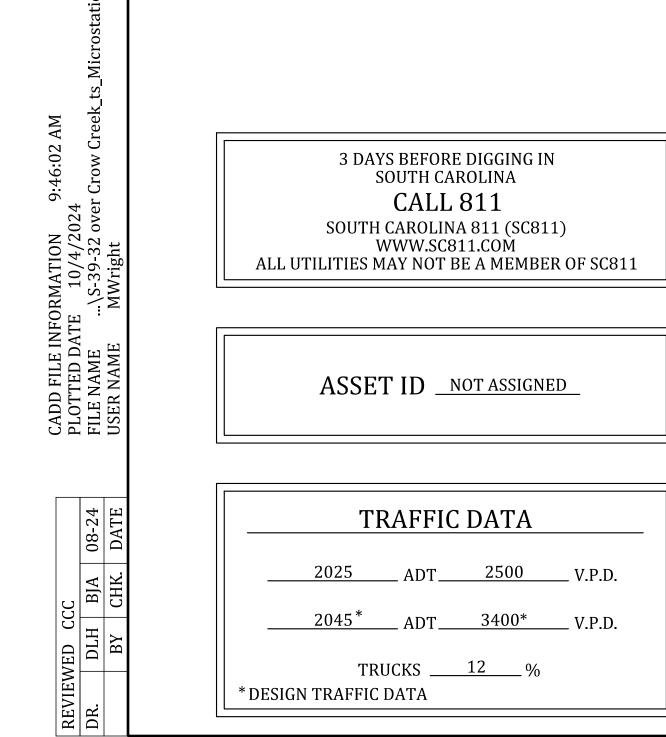
(LOOKING IN DIRECTION OF STATIONING)



1. TITLE SHEET

2. BRIDGE PLAN AND PROFILE 3. BRIDGE TYICAL SECTION







PROPOSED PLANS FOR PICKENS COUNTY PROJECT ID P041168 ROUTE S-39-32 (SHADY GROVE RD) REPLACE BRIDGE OVER CROW CREEK

SITE LOCATION

LAYOUT

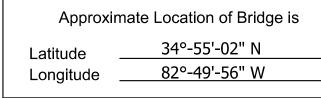
NET LENGTH OF ROADWAY	0.000	MILES
NET LENGTH OF BRIDGES	0.028	MILES
NET LENGTH OF PROJECT	0.028	MILES
LENGTH OF EXCEPTIONS	0.000	MILES
GROSS LENGTH OF PROJECT	0.028	MILES

NOTE: EXCEPT AS MAY OTHERWISE BE SPECIFIED ON THE PLANS OR IN THE SPECIAL PROVISIONS, ALL MATERIALS AND WORKMANSHIP ON THIS PROJECT SHALL CONFORM TO THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION AND THE STANDARD DRAWINGS FOR ROAD CONSTRUCTION IN EFFECT AT THE TIME OF LETTING.



CONCEPTUAL PLANS NOT FOR CONSTRUCTION

ENGINEER OF RECORD

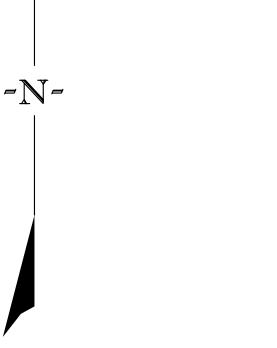


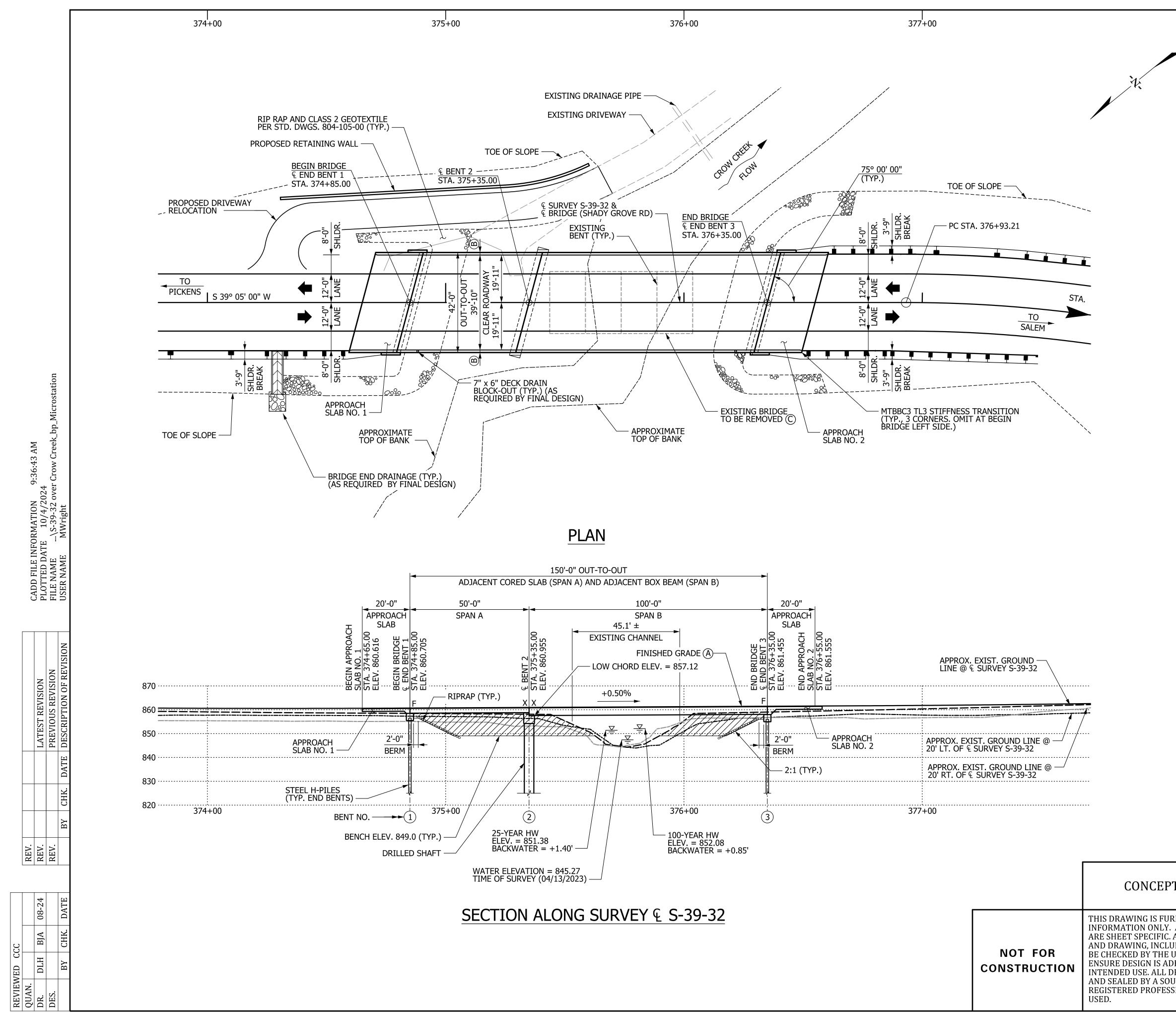
Approxim	ate Location of Bridge is
Latitude _	34°-55'-02" N

BRIDGE PLANS ID

P041168

SHEET





CCC

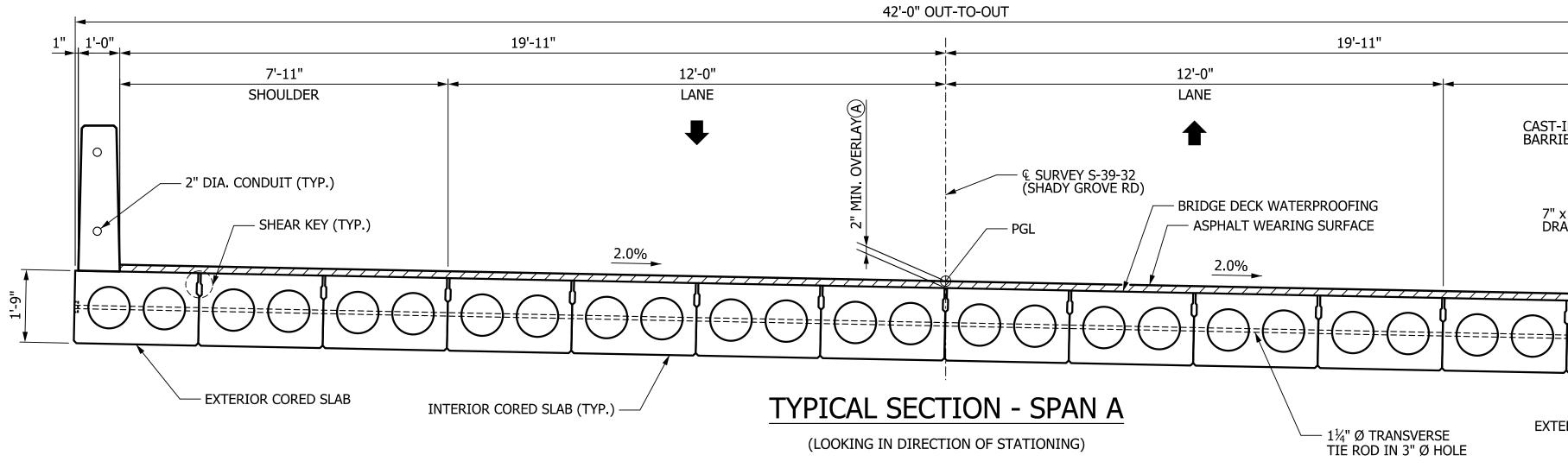
			BRIDGE PLANS ID	SHEET		
			P041168	2		
	NOTES:					
(A) PROPOSED PROFILE SET SO THAT THE LOW CHORD SATISFIES THE HYDRAULIC REQUIREMENTS, SET FORTH BY THE RFP.						
B INCLUDES 1'-0" MASH BARRIER PARAPET AND 1" SLAB EXTENSION.						
	 REMOVE AND DISPOSE OF EXISTING 27-'6" x 60'-0" 4-SPAN SIMPLE CONCRETE SLAB BRIDGE AND APPURTENANCES IN ACCORDANCE WITH SECTION 202.4.2 OF THE STANDARD SPECIFICATIONS. 					
	F - DENOTES FIXED BEARING					
	X - DENOTES EXPAN	ISION BEARING				
	= EXCAVATE HATCH	IED AREA				
	CONTROL CP9 ELEVATION =	857.80				
	N 1127025.39 BRDG NL	E 1450801.60				
	CP10 ELEVATION = N 1126674.29 BRDG NL	= 867.14 9 E 1450418.41				
		← € SURVEY S (SHADY GRO				
_	0.020 FT./FT.	0.020 FT./FT.		E 04		
_	0.030 FT./FT.	0.030 FT./FT.				
_	0.040 FT./FT.	0.040 FT./FT.				
	STA. 3/6+93.21					
S	UPERELEVAT	ION SKET	CH			
]	VERTICAL C					
	PVI = 373+50.00) PVI = 377+55.0	00			
	ELEV. 860.03 V.C. = 260'	ELEV. 862.05 V.C. = 160'				
	-2.14% +0.50)% +2.08%				
	HORIZONTAL	CURVE DATA				
		.5' 22" (RT)				
	D = 10° C T = 388.3 L = 682.5	33'				
	L = 682.5 E = 119.2 R = 572.9	20'				
L	HYDROLOGY D					
	D.A. = 3.23 SQ. MIL Q_25 = 778 CFS VELOCITY_25 = 4.0					
	$Q_{100} = 1,180 \text{ CFS}$	NDER_25 = 970 SQ.	FT.			
	VELOCITY_ $100 = 4.3$	7 FPS NDER_100 = 870 SQ	. FT.			
	OVERTOPPIN	g flood				
	Q = 6,550 CFS PROBABILITY < 0.29	%				
TUAL PLANS		B HNTB CORPO SC License No. 26 4000 Center at N Raleigh, N.C. 2760	55 Iorth Hills Street, Suite 500	D,		
RNISHED FOR ALL DIMENSIONS SHOWN ANY USE OF THIS DESIGN		SOUTH CARO MENT OF TRA	LINA NSPORTATION	J		
JDING DIMENSIONS, MUST JSER'S ENGINEER TO DEQUATE FOR THE DRAWINGS MUST BE SIGNED			ID PROFILE	E		
JTH CAROLINA SIONAL ENGINEER WHEN		-32 (SHADY GROVE -ACEMENT OVER C				
	COUNTY: PICKENS		ROUTE: S-39-32			

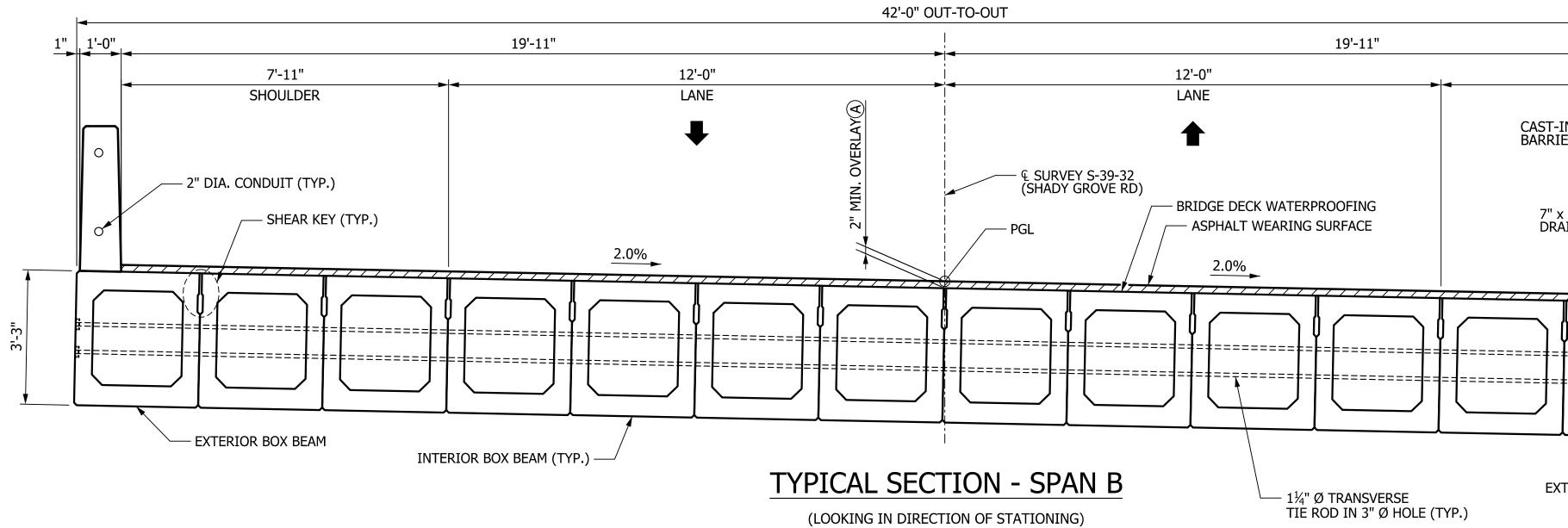
	REV.	REV.	REV.	
		08-24		DATE
REVIEWED CCC		DLH BJA		CHK. DATE
		DLH		ВΥ
	QUAN.	DR.	DES	

CADD FILE INFORMATION 9:47:09 AM PLOTTED DATE 10/4/2024 FILE NAME ...\S-39-32 over Crow Creel USER NAME MWright

LATEST REVISION PREVIOUS REVISION DESCRIPTION OF REV

DATE





19'-11" ECK WATERPROOFING T WEARING SURFACE	7'-11" SHOULDER CAST-IN-PLACE MASH BARRIER PARAPET (TYP.)		
19'-11" ECK WATERPROOFING T WEARING SURFACE	7'-11" SHOULDER CAST-IN-PLACE MASH BARRIER PARAPET (TYP.) 7" x 6" DECK DRAIN BLOCK-OUT		
	CONCEPTUAL PLANS	HNTB CORPORATION SC License No. 265 4000 Center at North Hills Street, Suite 500, Raleigh, N.C. 27609	
NOT FOR CONSTRUCTION	THIS DRAWING IS FURNISHED FOR INFORMATION ONLY. ALL DIMENSIONS SHOWN ARE SHEET SPECIFIC. ANY USE OF THIS DESIGN AND DRAWING, INCLUDING DIMENSIONS, MUST BE CHECKED BY THE USER'S ENGINEER TO ENSURE DESIGN IS ADEQUATE FOR THE INTENDED USE. ALL DRAWINGS MUST BE SIGNED AND SEALED BY A SOUTH CAROLINA REGISTERED PROFESSIONAL ENGINEER WHEN USED.	SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION BRIDGE TYPICAL SECTION S-39-32 (SHADY GROVE RD) BRIDGE REPLACEMENT OVER CROW CREEK COUNTY: PICKENS	

BRIDGE PLANS ID

P041168

SHEET

3