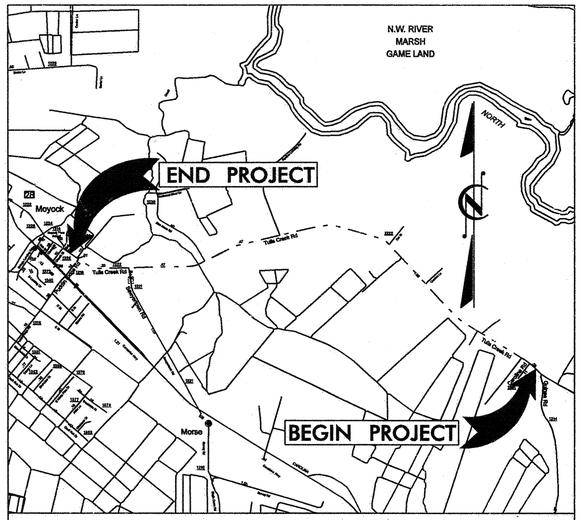


09/08/99

TIP PROJECT: R-4429C

CONTRACT: C201078

G:\Projects\20344\R-4429C\CADD\4429C_RDY_TSH.dgn
prf
4/10/2007

STATE	STATE PROJECT REFERENCE NO.	SHEET NO.	TOTAL SHEETS
N.C.	R-4429C	1	

STATE PROJ. NO.	F.A. PROJ. NO.	DESCRIPTION
34622.2.3		R/W, UTILITY
34622.3.5		CONSTR.

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

CURRITUCK COUNTY

***LOCATION:* SR 1222 (TULLS CREEK ROAD)**
FROM SR 1214 (GUINEA ROAD)
TO SR 1216 (PUDDIN RIDGE ROAD)

***TYPE OF WORK:* WIDENING, GRADING, PAVING,**
DRAINAGE AND UTILITIES

VICINITY MAP

BEGIN TIP PROJECT R-4429C
-L- POT Sta. 441+19.51

-L- Sta. 595+00.00 L.B.
-LREV- Sta. 595+00.00 L.A.

END TIP PROJECT R-4429C
-LREV- POT Sta. 610+08.84

DESIGN BY PARSONS BRINCKERHOFF
ENDS STA. 599+00.00

STA 599+00.00 TO 610+08.84
DESIGN BY NCDOT

GRAPHIC SCALES

DESIGN DATA

ADT 2005 = 3800

PROJECT LENGTH

LENGTH ROADWAY PROJECT = 3.199 MILES

LENGTH STRUCTURE PROJECT = 0.000 MILES

TOTAL LENGTH STATE PROJECT = 3.199 MILES

PB PARSONS BRINCKERHOFF
121 WEST TRADE STREET
SUITE 1950
CHARLOTTE, NC 28202

2006 STANDARD SPECIFICATIONS

RIGHT OF WAY DATE:
JANUARY 21, 2005

LETTING DATE:
JUNE 19, 2007

GREG HEINZ, P.E.
PROJECT ENGINEER

DAVID GOURLEY, P.E.
PROJECT DESIGN ENGINEER

HYDRAULICS ENGINEER

SEAL 23924
DANIEL H. BRIDGES

SIGNATURE: Daniel H. Bridges 4-10-07 P.E.

ROADWAY DESIGN ENGINEER

SEAL 29243
GREGORY C. HEINZ

SIGNATURE: Gregory C. Heinz 4-11-07 P.E.

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	1A
R/W SHEET NO.	

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

INDEX OF SHEETS

SHEET NO.	SHEET DESCRIPTION
1	TITLE SHEET
1A	INDEX OF SHEETS, GENERAL NOTES AND LIST OF STANDARDS
1B	CONVENTIONAL SYMBOLS
2 THRU 2B	TYPICAL SECTIONS
2C	DETAIL SHEET
3A THRU 3C	DRAINAGE SUMMARY SHEET
3D	SUMMARY OF EARTHWORK
3E	SUMMARY OF EXISTING ASPHALT PAVEMENT REMOVAL
4 THRU 17	PLAN SHEETS
18	PROFILE SHEET
EC-1 THRU EC-15	EROSION CONTROL PLANS
UT-1 THRU UT-16	UTILITY SHEETS
UO-1 THRU UO-15	UTILITIES BY OTHERS
X-1 THRU X-6	CROSS SECTIONS

GENERAL NOTES

GENERAL NOTES: ENGLISH 2006 SPECIFICATIONS
EFFECTIVE 07-18-06

GRADE LINE:
GRADING AND SURFACING OR RESURFACING AND WIDENING:

THE GRADE LINES SHOWN DENOTE THE FINISHED ELEVATION OF THE PROPOSED SURFACING AT GRADE POINTS SHOWN ON THE TYPICAL SECTIONS. WHERE NO GRADE LINES ARE SHOWN, THE PROFILES SHOWN DENOTE THE TOP ELEVATION OF THE EXISTING PAVEMENT ALONG THE CENTER LINE OF SURVEY ON WHICH THE PROPOSED RESURFACING WILL BE PLACED. GRADE LINES MAY BE ADJUSTED BY THE ENGINEER IN ORDER TO SECURE A PROPER TIE-IN.

CLEARING:

CLEARING ON THIS PROJECT SHALL BE PERFORMED TO THE LIMITS ESTABLISHED BY METHOD II
THE CONTRACTOR'S ATTENTION IS DIRECTED TO THE AREAS IN THE PLANS DESIGNATED SAFETY CLEARING. THE LIMITS ARE AS SHOWN AND THE CLEARING AND GRUBBING IS CONSIDERED A PART OF THE LUMP SUM ITEM FOR CLEARING AND GRUBBING.

SHOULDER CONSTRUCTION:

ASPHALT AND EARTH SHOULDER CONSTRUCTION ON THE HIGH SIDE OF SUPERELEVATED CURVES SHALL BE IN ACCORDANCE WITH STD. NO. 560.01.

SIDE ROADS:

THE CONTRACTOR WILL BE REQUIRED TO DO ALL NECESSARY WORK TO PROVIDE SUITABLE CONNECTIONS WITH ALL ROADS, STREETS, AND DRIVES ENTERING THIS PROJECT. THIS WORK WILL BE PAID FOR AT THE CONTRACT UNIT PRICE FOR THE PARTICULAR ITEMS INVOLVED.

DRIVEWAYS:

DRIVEWAYS SHALL BE CONSTRUCTED IN ACCORDANCE WITH DETAILS IN PLANS USING 3@900 MM RADII OR RADII AS SHOWN ON THE PLANS. LOCATIONS OF DRIVES WILL BE AS SHOWN ON THE PLANS OR AS DIRECTED BY THE ENGINEER.

TEMPORARY SHORING:

SHORING REQUIRED FOR THE MAINTENANCE OF TRAFFIC WILL BE PAID FOR AS "EXTRA WORK" IN ACCORDANCE WITH SECTION 104-7.

SUBSURFACE PLANS:

NO SUBSURFACE PLANS ARE AVAILABLE ON THIS PROJECT. THE CONTRACTOR SHOULD MAKE HIS OWN INVESTIGATION AS TO THE SUBSURFACE CONDITIONS.

UTILITIES:

UTILITY OWNERS ON THIS PROJECT ARE __SPRINT_____
_____DOMINION NC POWER_____
_____MEDIACOM_____
_____CURRITUCK CO. WATER DEPT._____

ANY RELOCATION OF EXISTING UTILITIES WILL BE ACCOMPLISHED BY OTHERS, EXCEPT AS SHOWN ON THE PLANS.

RIGHT-OF-WAY MARKERS:

ALL RIGHT-OF-WAY MARKERS ON THIS PROJECT SHALL BE PLACED BY OTHERS.

ROADWAY STANDARD DRAWINGS

THE FOLLOWING ROADWAY STANDARDS AS APPEAR IN "ROADWAY STANDARD DRAWINGS" HIGHWAY DESIGN BRANCH - N.C. DEPARTMENT OF TRANSPORTATION - RALEIGH, N.C., DATED JULY 18, 2006 AND THE LATEST REVISION THERETO ARE APPLICABLE TO THIS PROJECT AND BY REFERENCE HEREBY ARE CONSIDERED A PART OF THESE PLANS

STD NO.	TITLE
200.02	Method of Clearing - Method II
225.02	Guide for Grading Subgrade - Secondary and Local
225.06	Method of Grading Sight Distance at Intersections
300.01	Method of Pipe Installation - Method 'A'
310.10	Driveway Pipe Construction
560.01	Method of Shoulder Construction - High Side of Superelevated Curve - Method I
654.01	Pavement Repairs
840.00	Concrete Base Pad for Drainage Structures
840.34	Traffic Bearing Junction Box - for use with Pipes 42" and Under
840.35	Traffic Bearing Grated Drop Inlet - Cast Iron Double Frame and Grate
840.36	Traffic Bearing Grated Drop Inlet - Steel (840.37) Double Frame and Grate
840.37	Steel Grate and Frame
840.45	Precast Drainage Structure
840.66	Drainage Structure Steps

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	1B

Note: Not to Scale

****S.U.E. = Subsurface Utility Engineering***

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

CONVENTIONAL PLAN SHEET SYMBOLS

BOUNDARIES AND PROPERTY:

- State Line
- County Line
- Township Line
- City Line
- Reservation Line
- Property Line
- Existing Iron Pin — EIP
- Property Corner
- Property Monument — ECM
- Parcel/Sequence Number — 123
- Existing Fence Line
- Proposed Woven Wire Fence
- Proposed Chain Link Fence
- Proposed Barbed Wire Fence
- Existing Wetland Boundary — WLB
- Proposed Wetland Boundary — WLB
- Existing High Quality Wetland Boundary — HQ WLB
- Existing Endangered Animal Boundary — EAB
- Existing Endangered Plant Boundary — EPB

BUILDINGS AND OTHER CULTURE:

- Gas Pump Vent or U/G Tank Cap
- Sign — S
- Well — W
- Small Mine
- Foundation
- Area Outline
- Cemetery
- Building
- School
- Church
- Dam

HYDROLOGY:

- Stream or Body of Water
- Hydro, Pool or Reservoir
- River Basin Buffer — RBB
- Flow Arrow
- Disappearing Stream
- Spring
- Swamp Marsh
- Proposed Lateral, Tail, Head Ditch — FLOW
- False Sump

RAILROADS:

- Standard Guage — CSX TRANSPORTATION
- RR Signal Milepost — MILEPOST 35
- Switch — SWITCH
- RR Abandoned
- RR Dismantled

RIGHT OF WAY:

- Baseline Control Point
- Existing Right of Way Marker
- Existing Right of Way Line
- Proposed Right of Way Line — RW
- Proposed Right of Way Line with Iron Pin and Cap Marker — RW
- Proposed Right of Way Line with Concrete or Granite Marker — RW
- Existing Control of Access — CA
- Proposed Control of Access — CA
- Existing Easement Line — E
- Proposed Temporary Construction Easement — E
- Proposed Temporary Drainage Easement — TDE
- Proposed Permanent Drainage Easement — PDE
- Proposed Permanent Utility Easement — PUE

ROADS AND RELATED FEATURES:

- Existing Edge of Pavement
- Existing Curb
- Proposed Slope Stakes Cut — C
- Proposed Slope Stakes Fill — F
- Proposed Wheel Chair Ramp — WCR
- Curb Cut for Future Wheel Chair Ramp — CCFR
- Existing Metal Guardrail
- Proposed Guardrail
- Existing Cable Guiderail
- Proposed Cable Guiderail
- Equaility Symbol
- Pavement Removal

VEGETATION:

- Single Tree
- Single Shrub
- Hedge
- Woods Line
- Orchard
- Vineyard — Vineyard

EXISTING STRUCTURES:

MAJOR:

- Bridge, Tunnel or Box Culvert — CONC
- Bridge Wing Wall, Head Wall and End Wall — CONC WW

MINOR:

- Head and End Wall — CONC HW
- Pipe Culvert
- Footbridge
- Drainage Box: Catch Basin, DI or JB — CB
- Paved Ditch Gutter
- Storm Sewer Manhole — S
- Storm Sewer — S

UTILITIES:

POWER:

- Existing Power Pole
- Proposed Power Pole
- Existing Joint Use Pole
- Proposed Joint Use Pole
- Power Manhole — P
- Power Line Tower
- Power Transformer
- U/G Power Cable Hand Hole — HH
- H-Frame Pole
- Recorded U/G Power Line — P
- Designated U/G Power Line (S.U.E.*) — P

TELEPHONE:

- Existing Telephone Pole
- Proposed Telephone Pole
- Telephone Manhole — T
- Telephone Booth
- Telephone Pedestal — T
- Telephone Cell Tower
- U/G Telephone Cable Hand Hole — HH
- Recorded U/G Telephone Cable — T
- Designated U/G Telephone Cable (S.U.E.*) — T
- Recorded U/G Telephone Conduit — TC
- Designated U/G Telephone Conduit (S.U.E.*) — TC
- Recorded U/G Fiber Optics Cable — T FO
- Designated U/G Fiber Optics Cable (S.U.E.*) — T FO

WATER:

- Water Manhole — W
- Water Meter
- Water Valve
- Water Hydrant
- Recorded U/G Water Line — W
- Designated U/G Water Line (S.U.E.*) — W
- Above Ground Water Line — A/G Water

TV:

- TV Satellite Dish
- TV Pedestal — C
- TV Tower
- U/G TV Cable Hand Hole — HH
- Recorded U/G TV Cable — TV
- Designated U/G TV Cable (S.U.E.*) — TV
- Recorded U/G Fiber Optic Cable — TV FO
- Designated U/G Fiber Optic Cable (S.U.E.*) — TV FO

GAS:

- Gas Valve
- Gas Meter
- Recorded U/G Gas Line — G
- Designated U/G Gas Line (S.U.E.*) — G
- Above Ground Gas Line — A/G Gas

SANITARY SEWER:

- Sanitary Sewer Manhole
- Sanitary Sewer Cleanout
- U/G Sanitary Sewer Line — SS
- Above Ground Sanitary Sewer — A/G Sanitary Sewer
- Recorded SS Forced Main Line — FSS
- Designated SS Forced Main Line (S.U.E.*) — FSS

MISCELLANEOUS:

- Utility Pole
- Utility Pole with Base
- Utility Located Object
- Utility Traffic Signal Box — S
- Utility Unknown U/G Line — ?UTL
- U/G Tank; Water, Gas, Oil
- A/G Tank; Water, Gas, Oil
- U/G Test Hole (S.U.E.*)
- Abandoned According to Utility Records — AATUR
- End of Information — E.O.I.

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	2
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 38243 ENGINEER GREGORY P. THORPE

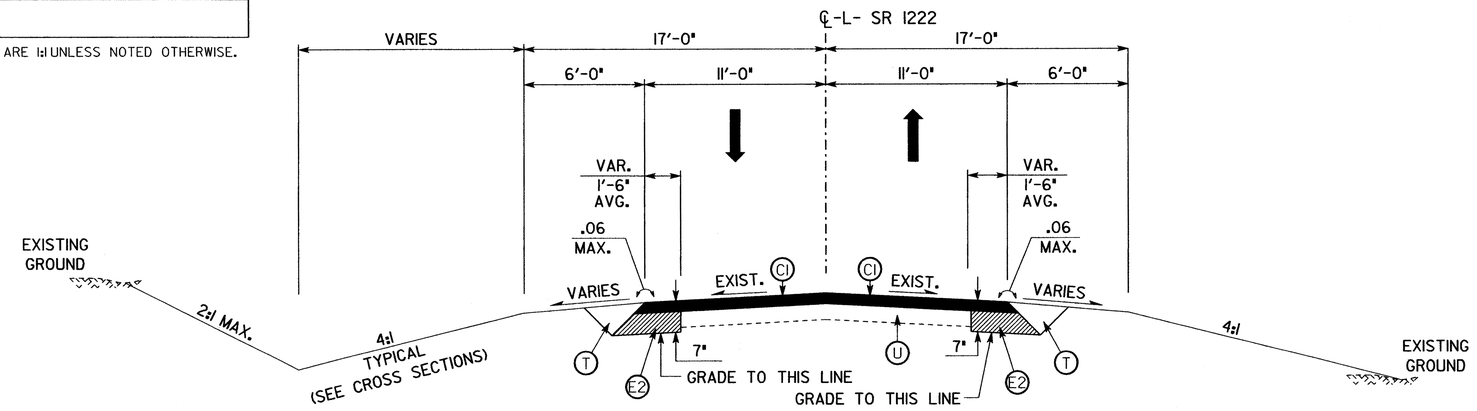
PAVEMENT DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 23485 ENGINEER WILLIAM B. HOBBS 05/04/07

PAVEMENT SCHEDULE

CI	PROP. APPROX. 1½" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 168 LBS PER SQ. YARD.
DI	PROP. APPROX. 2½" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE I19.0B, AT AN AVERAGE RATE OF 285 LBS PER SQ. YARD.
EI	PROP. APPROX. 4" ASPHALT CONCRETE BASE COURSE, TYPE B25.0B, AT AN AVERAGE RATE OF 456 LBS PER SQ. YARD.
E2	PROP. APPROX. 5.5" ASPHALT CONCRETE BASE COURSE, TYPE B25.0B, AT AN AVERAGE RATE OF 616 LBS PER SQ. YARD.
T	EARTH MATERIAL
U	EXISTING PAVEMENT

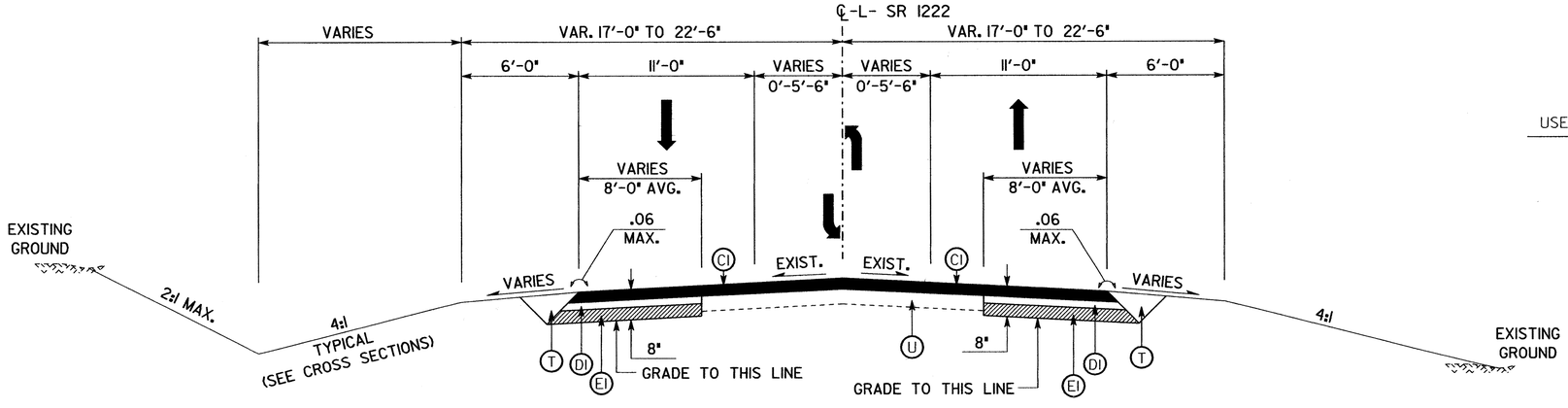
NOTE: ALL PAVEMENT EDGE SLOPES ARE 1:1 UNLESS NOTED OTHERWISE.



TYPICAL SECTION No. 1

USE TYPICAL SECTION NO. 1 FOR THE FOLLOWING:

-L- STA. 441+19.51 TO 535+90.00
-L- STA. 545+90.00 TO 561+20.00
-L- STA. 571+30.00 TO 583+20.00
-LREV- STA. 595+45.00 TO 600+00.00
-YREV- STA. 12+91.43 TO 14+60.99



TYPICAL SECTION No. 2

USE TYPICAL SECTION NO. 1 FOR THE FOLLOWING:

-L- STA. 535+90.00 TO 545+90.00
-L- STA. 561+20.00 TO 571+30.00
-L- STA. 583+20.00 TO 593+00.00
-LREV- STA. 593+00.00 to 595+45.00

dgn
prf
$$DATE$$

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	2A
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. HEINRICH

4-9-07

PAVEMENT DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 28485 ENGINEER WILLIAM B. HOBBS

4/13/07

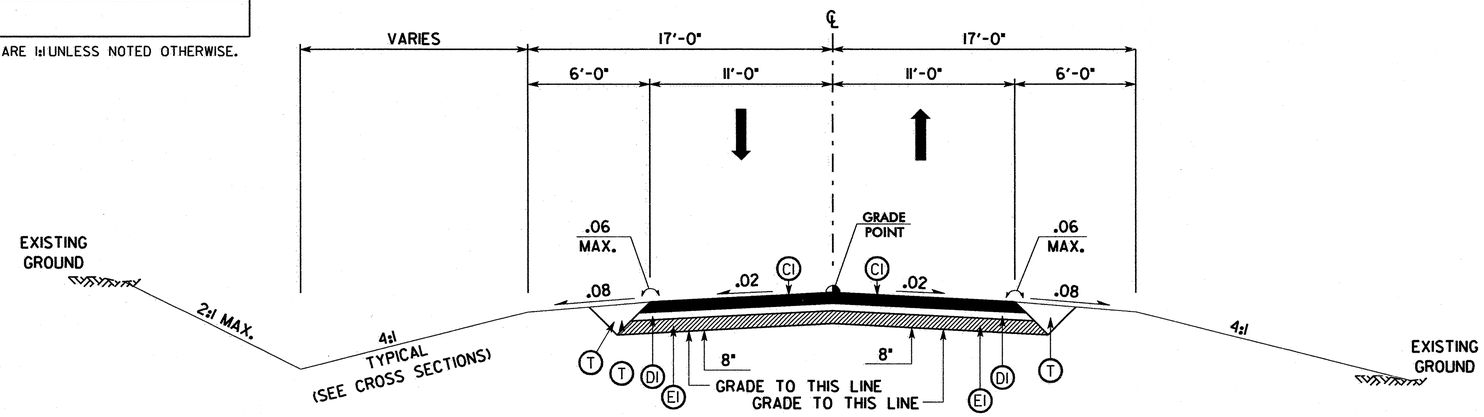
PAVEMENT SCHEDULE

CI	PROP. APPROX. 1½" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 168 LBS PER SQ. YARD.
DI	PROP. APPROX. 2½" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE I19.0B, AT AN AVERAGE RATE OF 285 LBS PER SQ. YARD.
EI	PROP. APPROX. 4" ASPHALT CONCRETE BASE COURSE, TYPE B25.0B, AT AN AVERAGE RATE OF 456 LBS PER SQ. YARD.
E2	PROP. APPROX. 5.5" ASPHALT CONCRETE BASE COURSE, TYPE B25.0B, AT AN AVERAGE RATE OF 627 LBS PER SQ. YARD.
T	EARTH MATERIAL
U	EXISTING PAVEMENT

NOTE: ALL PAVEMENT EDGE SLOPES ARE 1:1 UNLESS NOTED OTHERWISE.

USE TYPICAL SECTION NO. 3 FOR THE FOLLOWING:

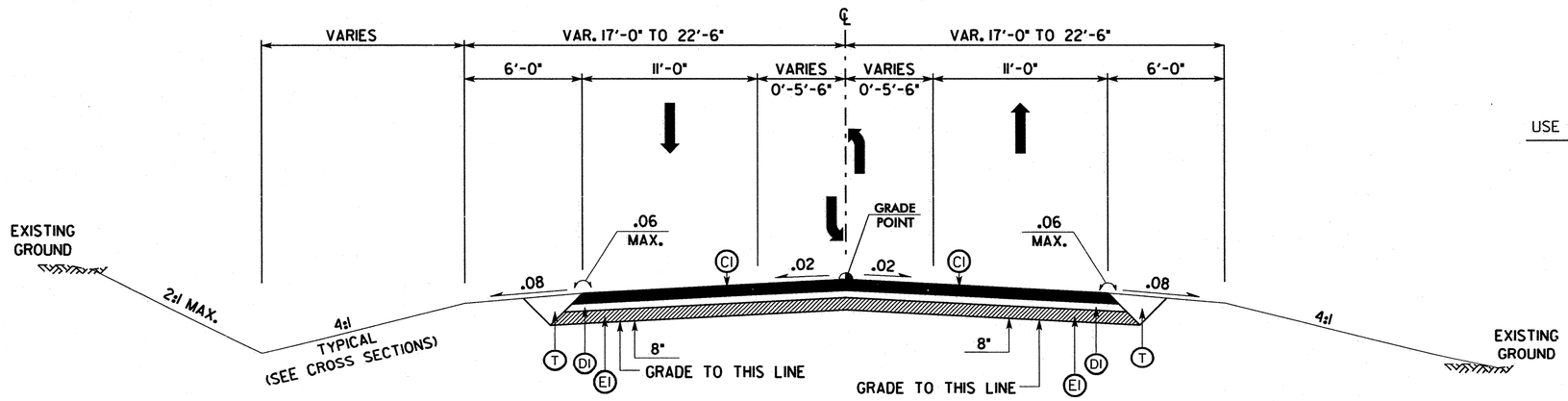
-LREV- STA. 599+00.00 TO 600+00.00
-LREV- STA. 609+00.00 TO 610+08.84
-YREV- STA. 10+00.00 TO 12+91.43



TYPICAL SECTION No. 3

USE TYPICAL SECTION NO. 4 FOR THE FOLLOWING:

-LREV- STA. 600+00.00 TO 609+00.00



TYPICAL SECTION No. 4

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4/10/2007

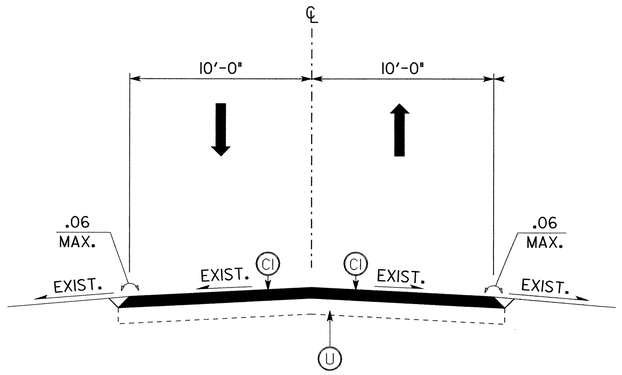
PROJECT REFERENCE NO.	SHEET NO.
R-4429C	2B
R/W SHEET NO.	
ROADWAY & PAVEMENT DESIGN ENGINEER	

NORTH CAROLINA PROFESSIONAL SEAL 23285 ENGINEER WILLIAM B. HOBBS
04/13/07

PAVEMENT SCHEDULE

CI	PROP. APPROX. 1½" ASPHALT CONCRETE SURFACE COURSE, TYPE S9.5B, AT AN AVERAGE RATE OF 168 LBS PER SQ. YARD.
DI	PROP. APPROX. 2½" ASPHALT CONCRETE INTERMEDIATE COURSE, TYPE I19.0B, AT AN AVERAGE RATE OF 285 LBS PER SQ. YARD.
EI	PROP. APPROX. 4" ASPHALT CONCRETE BASE COURSE, TYPE B25.0B, AT AN AVERAGE RATE OF 456 LBS PER SQ. YARD.
E2	PROP. APPROX. 5.5" ASPHALT CONCRETE BASE COURSE, TYPE B25.0B, AT AN AVERAGE RATE OF 627 LBS PER SQ. YARD.
T	EARTH MATERIAL
U	EXISTING PAVEMENT

NOTE: ALL PAVEMENT EDGE SLOPES ARE I:I UNLESS NOTED OTHERWISE.



USE TYPICAL SECTION NO. 5 FOR THE FOLLOWING:

-EYIO- STA. I3+06.45 TO I5+62.59

FOR CUL-DE-SAC ON -EYIO-, USE PAVEMENT DESIGN FOR TYPICAL SECTION NO. 3

TYPICAL SECTION No. 5

dgn
prf
$$DATE$$

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	2C

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

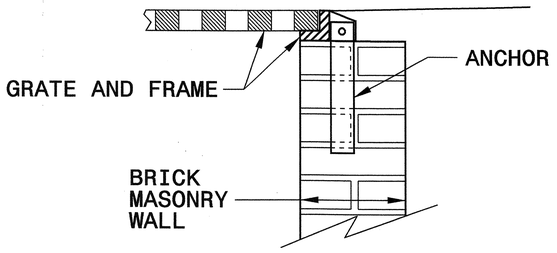
ENGLISH DETAIL DRAWING FOR

ANCHORAGE FOR FRAMES

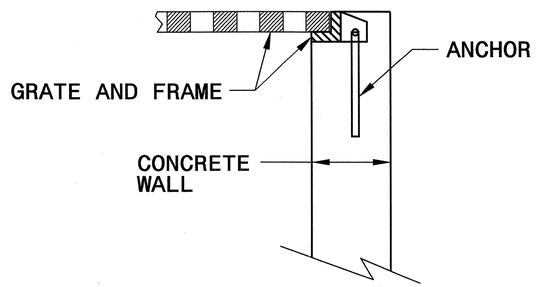
BRICK/CONCRETE/PRECAST CONCRETE

SHEET 1 OF 1

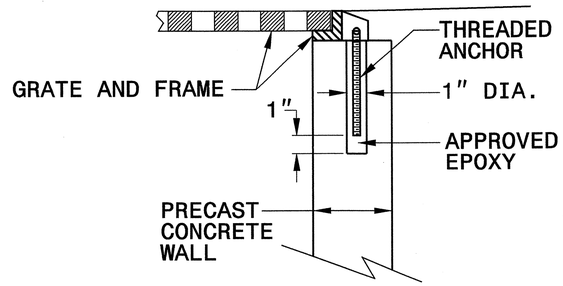
840D25



BRICK MASONRY CONSTRUCTION



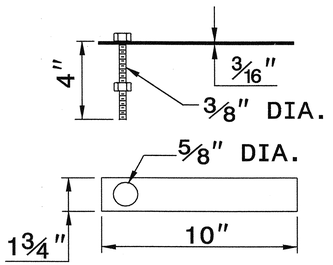
CONCRETE CONSTRUCTION



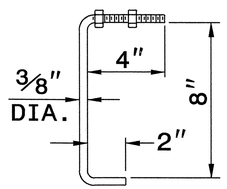
PRECAST CONCRETE CONSTRUCTION

DETAIL SHOWING ANCHORAGE OF FRAME FOR GRATED DROP INLET

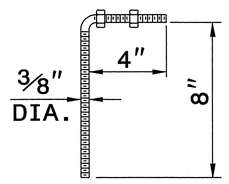
NOTE:
CONSTRUCT GRATED DROP INLET TO COINCIDE WITH NORMAL OR SUPERELEVATED SHOULDER OR PAVEMENT SLOPE.



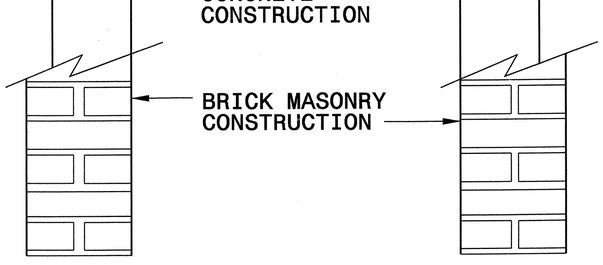
MASONRY ANCHOR
3/8" DIA. BOLT WITH PLATE



CONCRETE ANCHOR
3/8" DIA. BENT BAR



PRECAST CONCRETE ANCHOR
3/8" DIA. BENT BAR



FRAME AND GRATE INSTALLATION FOR NORMAL CROWN AND SUPERELEVATED SECTIONS

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

ENGLISH DETAIL DRAWING FOR

ANCHORAGE FOR FRAMES

BRICK/CONCRETE/PRECAST CONCRETE

SHEET 1 OF 1

840D25

NORTH CAROLINA PROFESSIONAL SEAL 022966 ENGINEER JOEL S. HOWERTON

4/26/07

PROJECT SERVICES UNIT
STANDARDS AND SPECIAL DESIGN
Office 919-250-4128 FAX 919-250-4119

SEE PLATE FOR TITLE

ORIGINAL BY:	2006 STD 840.25	DATE:	07/18/06
MODIFIED BY:	E.E. WARD	DATE:	9/25/06
CHECKED BY:		DATE:	
FILE SPEC.:			

01-MAR-2007 09:04
s:\contracts\contracts\special details\ericward\stds\06' stds to special details\840d25 anchorage for frames\0840d25.dgn
jhowerton AT PS212260

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	3

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

SUMMARY OF QUANTITIES

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS
ROADWAY SUMMARY OF QUANTITIES FOR CONTRACT - C201078

ItemNumber	Sec #	Quantity	Unit	Description
0000100000-N	800	Lump Sum		MOBILIZATION
0001000000-E	200	Lump Sum		CLEARING & GRUBBING .. ACRE(S)
0008000000-E	200	1	ACR	SUPPLEMENTARY CLEARING & GRUB-BING
0022000000-E	225	16,862	CY	UNCLASSIFIED EXCAVATION
0036000000-E	225	2,215	CY	UNDERCUT EXCAVATION
0156000000-E	250	1,190	SY	REMOVAL OF EXISTING ASPHALT PAVEMENT
0195000000-E	265	3,625	CY	SELECT GRANULAR MATERIAL
0196000000-E	270	3,865	SY	FABRIC FOR SOIL STABILIZATION
0318000000-E	300	812	TON	FOUNDATION CONDITIONING MATE-RIAL, MINOR STRS
0366000000-E	310	2,160	LF	15" RC PIPE CULVERTS, CLASS III
0372000000-E	310	552	LF	18" RC PIPE CULVERTS, CLASS III
0378000000-E	310	488	LF	24" RC PIPE CULVERTS, CLASS III
0384000000-E	310	160	LF	30" RC PIPE CULVERTS, CLASS III
0396000000-E	310	228	LF	42" RC PIPE CULVERTS, CLASS III
0995000000-E	340	772	LF	PIPE REMOVAL
1011000000-N	500	Lump Sum		FINE GRADING
1220000000-E	545	375	TON	INCIDENTAL STONE BASE
1245000000-E	SP	6.4	SMI	SHOULDER RECONSTRUCTION
1489000000-E	610	4,030	TON	ASPHALT CONC BASE COURSE, TYPE B25.0B
1498000000-E	610	1,340	TON	ASPHALT CONC INTERMEDIATE COURSE, TYPE I19.0B
1519000000-E	610	4,510	TON	ASPHALT CONC SURFACE COURSE, TYPE S9.5B
1560000000-E	620	510	TON	ASPHALT BINDER FOR PLANT MIX, GRADE PG 64-22
1693000000-E	654	110	TON	ASPHALT PLANT MIX, PAVEMENT REPAIR
2286000000-N	840	3	EA	MASONRY DRAINAGE STRUCTURES

ItemNumber	Sec #	Quantity	Unit	Description
2364000000-N	840	1	EA	FRAME WITH TWO GRATES, STD 840.16
2612000000-E	848	255	SY	6" CONCRETE DRIVEWAY
4589000000-N	SP	Lump Sum		GENERIC TRAFFIC CONTROL ITEM TRAFFIC CONTROL
4685000000-E	1205	33,816	LF	THERMOPLASTIC PAVEMENT MARKING LINES (4", 90 MILS)
4686000000-E	1205	21,135	LF	THERMOPLASTIC PAVEMENT MARKING LINES (4", 120 MILS)
4725000000-E	1205	10	EA	THERMOPLASTIC PAVEMENT MARKING SYMBOL (90 MILS)
4810000000-E	1205	54,951	LF	PAINT PAVEMENT MARKING LINES (4")
4900000000-N	1251	220	EA	PERMANENT RAISED PAVEMENT MARKERS
5325600000-E	1510	173	LF	6" WATER LINE
5325800000-E	1510	230	LF	8" WATER LINE
5326000000-E	1510	65	LF	10" WATER LINE
5326200000-E	1510	16,468	LF	12" WATER LINE
5540000000-E	1515	3	EA	6" VALVE
5546000000-E	1515	3	EA	8" VALVE
5552000000-E	1515	1	EA	10" VALVE
5558000000-E	1515	18	EA	12" VALVE
5571800000-E	1515	4	EA	8" TAPPING VALVE
5648000000-N	1515	15	EA	RELOCATE WATER METER
5649000000-N	1515	50	EA	RECONNECT WATER METER
5666000000-E	1515	1	EA	FIRE HYDRANT
5672000000-N	1515	6	EA	RELOCATE FIRE HYDRANT
6000000000-E	1605	1,440	LF	TEMPORARY SILT FENCE
6006000000-E	1610	75	TON	STONE FOR EROSION CONTROL, CLASS A
6009000000-E	1610	505	TON	STONE FOR EROSION CONTROL, CLASS B
6012000000-E	1610	175	TON	SEDIMENT CONTROL STONE

ItemNumber	Sec #	Quantity	Unit	Description
6015000000-E	1615	18.5	ACR	TEMPORARY MULCHING
6018000000-E	1620	650	LB	SEED FOR TEMPORARY SEEDING
6021000000-E	1620	2.75	TON	FERTILIZER FOR TEMPORARY SEED-ING
6030000000-E	1630	1,755	CY	SILT EXCAVATION
6036000000-E	1631	3,000	SY	MATTING FOR EROSION CONTROL
6042000000-E	1632	20	LF	1/4" HARDWARE CLOTH
6070000000-N	SP	1	EA	SPECIAL STILLING BASINS
6084000000-E	1660	17.5	ACR	SEEDING & MULCHING
6090000000-E	1661	200	LB	SEED FOR REPAIR SEEDING
6093000000-E	1661	0.5	TON	FERTILIZER FOR REPAIR SEEDING
6096000000-E	1662	450	LB	SEED FOR SUPPLEMENTAL SEEDING
6108000000-E	1665	13	TON	FERTILIZER TOPDRESSING

5/28/99

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bhobbs AT DICAD23563

COMPUTED BY: R. COMBS DATE: 12/5/2006

CHECKED BY: D. GOURLEY DATE: 12/6/2006

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	3A
R / W SHEET NO.	

PARSONS BRINCKERHOFF

LIST OF PIPES, ENDWALLS, ETC. (FOR PIPES 48" & UNDER)

PS214568

STATION	LOCATION (LT, RT, OR CL)'	STRUCTURE NO. FROM	STRUCTURE NO. TO	TOP ELEVATION	INVERT ELEVATION	INVERT ELEVATION	SLOPE CRITICAL	CLASS III R.C. PIPE (UNLESS NOTED OTHERWISE) SIZE 12"	15"	18"	24"	30"	36"	42"	48"	BITUMINOUS COATED C.S. PIPE TYPE B (UNLESS NOTED OTHERWISE) SIZE 12"	15"	18"	24"	30"	36"	42"	48"	15" SIDE DRAIN PIPE	18" SIDE DRAIN PIPE	24" SIDE DRAIN PIPE	ENDWALLS STD. 838.01, STD. 838.11, OR STD. 838.80 (UNLESS NOTED OTHERWISE) CU. YDS. R.C.P.	ENDWALLS CU. YDS. C.S.P.	QUANTITIES FOR DRAINAGE STRUCTURES PER EACH (0' THRU 5.0')	*TOTAL L.F. FOR PAY QUANTITY SHALL BE COL. 'A' + (1.3 X COL. 'B') LIN. FT. A: 5.0' THRU 10.0'	LIN. FT. B: 10.0' AND ABOVE	C.B. STD. 840.01 OR STD. 840.02	FRAME, GRATES, AND HOOD STANDARD 840.03 TYPE OF GRATE E	F	G	D.I. STD. 840.14 OR STD. 840.15	D.I. FRAME AND GRATE STD. 840.16	M.D.I. TYPE "A" STD. 840.17 OR 840.26	M.D.I. TYPE "B" STD. 840.18 OR 840.27	M.D.I. TYPE "D" STD. 840.19 OR 840.28	M.D.I. FRAME WITH GRATE STD. 840.20	M.D.I. FRAME WITH TWO GRATES STD. 840.22	M.D.I. (N.S.)FRAME WITH GRATE STD. 840.24	M.D.I. (N.S.)FRAME WITH TWO GRATES STD. 840.24	J.B. STD. 840.31 OR 840.32	MANHOLE STD. 840.51	M.H. STD. 840.51 OR 840.53	M.H. FRAME AND COVER STD. 840.54	CORR. STEEL ELBOWS NO. & SIZE	CONC. COLLARS CL. "B" C.Y. STD. 840.72	CONC. & BRICK PIPE PLUG, C.Y. STD. 840.71	PIPE REMOVAL LIN. FT.	REMARKS
-L- 443+51.19	LT	1			5.37	5.28			44																																		REMOVE 15" CMP
-L- 442+26.73	LT	1A			5.10	5.04			28																																		
-L- 443+51.82	RT	2			5.15	5.06			24																																		REMOVE 15" CMP
-L- 446+17.40	LT	3			6.56	6.24			24																																		REMOVE 15" CONCRETE PIPE
-L- 446+03.03	RT	4			6.23	6.06			44																																		REMOVE 15" CONCRETE PIPE
-L- 448+76.59	RT	5			7.25	7.15			24																																		REMOVE 15" CONCRETE PIPE
-L- 449+20.96	CL	6			4.00	3.50									52																											REMOVE 36" CONCRETE PIPE
-L- 449+42.53	RT	7			5.46	5.00			24																																		REMOVE 15" CONCRETE PIPE
-L- 450+95.00	RT	8			6.85	6.75			40																																		REMOVE 15" CONCRETE PIPE
-L- 451+60.00	RT	8A			6.97	6.90			28																																		REMOVE 15" CONCRETE PIPE
-L- 454+00.62	LT	9			6.57	6.43					72																															30	REMOVE 24" CMP
-L- 453+81.49	RT	10			7.44	7.37					24																																REMOVE 15" CONCRETE PIPE
-L- 454+31.76	RT	11			7.62	7.53			28																																		REMOVE 18" CMP
-L- 454+85.29	RT	12			7.79	7.72			24																																		REMOVE 18" CMP
-L- 454+92.39	LT	13			6.70	6.65					24																															22	REMOVE 24" CMP
-L- 455+40.48	RT	14			8.00	7.87			40																																		REMOVE 15" PLASTIC PIPE
-L- 457+50.15	RT	15			7.96	7.94			20																																		REMOVE 18" CMP
-L- 458+84.00	RT	15A			7.83	7.80			32																																		
-L- 459+92.00	LT	16			9.00	7.94			64																																		REMOVE 15" CMP
-L- 461+31.61	RT	17			7.58	7.56			20																																		REMOVE 15" CONCRETE PIPE
-L- 460+39.41	RT	17A			7.69	7.67			36																																		
-L- 461+59.49	RT	18			7.55	7.53			20																																		REMOVE 15" CONCRETE PIPE
-L- 461+87.62	RT	19			7.75	7.73			24																																		REMOVE 24" CONCRETE PIPE
-L- 463+52.78	RT	19A			7.93	7.87			60																																		
-L- 463+04.20	LT	20			8.78	8.59			36																																	34	REMOVE 15" CMP
-L- 463+77.24	LT	20A			8.30	8.25			32																																		
-L- 464+58.56	LT	21			7.87	7.74			24																																	24	REMOVE 15" CONCRETE PIPE
-L- 465+49.17	RT	22			7.99	7.91			32																																		REMOVE 12" CONCRETE PIPE
-L- 465+92.96	RT	23			7.84	7.80			20																																		REMOVE 12" CONCRETE PIPE
-L- 466+22.06	RT	24			7.78	7.70			28																																		REMOVE 12" CONCRETE PIPE
-L- 468+40.07	RT	24A			7.05	7.00			20																																		
-L- 469+60.60	RT	24B			6.90	6.87			36																																		
-L- 471+25.00	RT	25			6.45	6.42					24																																REMOVE 15" CONCRETE PIPE
-L- 472+95.93	CL	26			4.00	3.50									68																											REMOVE 36" CONCRETE PIPE
-L- 471+14.63	LT	26A			6.94	6.70			32																																		
-L- 469+19.12	LT	26B			7.15	7.12			28																																		
-L- 473+28.56	RT	27			6.47	6.28					24																																REMOVE 15" CONCRETE PIPE
-L- 473+33.21	LT	28			5.24	5.22					20																															20	REMOVE 15" CONCRETE PIPE
-L- 474+31.92	LT	29			5.34	5.32			20																																	20	REMOVE 15" CONCRETE PIPE
-L- 475+77.03	LT	30			5.54	5.52			24																																	21	REMOVE 15" PLASTIC PIPE
-L- 476+29.36	LT	31			5.59	5.57			24																																	21	REMOVE 15" CONCRETE PIPE
-L- 477+96.78	RT	32			7.13	6.88			64																																	22	REMOVE 15" CONCRETE PIPE
-L- 477+89.66	LT	33			5.75	5.72			24																																	20	REMOVE 15" CONCRETE PIPE
-L- 478+79.70	LT	34			5.94	5.87			24																																		REMOVE 15" PLASTIC PIPE
-L- 479+36.95	LT	35			6.15	6.07			24																																		REMOVE 15" PLASTIC PIPE
-L- 480+32.97	LT	36			6.25	6.22			28																																		REMOVE 15" PLASTIC PIPE
-L- 481+22.16	LT	37			6.35	6.32			24																																		REMOVE 15" CONCRETE PIPE
-L- 482+80.82	LT	38			5.96	5.92			24																																	20	REMOVE 15" CONCRETE PIPE
-L- 483+26.98	LT	39			5.85	5.78			24																																	20	REMOVE 15" CONCRETE PIPE
-L- 484+72.45	LT	40			5.49	5.47			20																																		REMOVE 15" CONCRETE PIPE
-L- 485+81.71	LT	41			5.48	5.39			20																																		REMOVE 15" CONCRETE PIPE
-L- 485+70.98	RT	42			4.69	4.66			24																																		REMOVE 15" CONCRETE PIPE
-L- 488+38.28	RT	42A			4.08	4.05					28																																
-L- 486+83.80	LT	43			5.25	5.21			24																																		REMOVE 18" CMP
-L- 487+77.96	LT	44			4.98	4.85			20																																	20	REMOVE 15" CMP
-L- 488+81.07	LT	45			4.47	4.38			24																																	20	REMOVE 15" CONCRETE PIPE
-L- 489+46.18	LT	46			4.22	4.08					32																																REMOVE 18" CMP
-L- 489+73.33	CL	47			4.00	3.00									52																											REMOVE 42" CONCRETE
-L- 491+22.52	LT	48			6.87	6.52			40																																	38	REMOVE 15" CMP
SHEET TOTALS									1412		248				172																											376	

ABBREVIATIONS

C.B.	CATCH BASIN
N.D.I.	NARROW DROP INLET
D.I.	DROP INLET
M.D.I.	MEDIAN DROP INLET
M.D.I.(N.S.)	MEDIAN DROP INLET (NARROW SLOT)
H.W.	HEADWALL
J.B.	JUNCTION BOX
M.H.	MANHOLE
T.B.D.I.	TRAFFIC BEARING DROP INLET
T.B.J.B.	TRAFFIC BEARING JUNCTION BOX

PS214568

COMPUTED BY:	R. COMBS	DATE:	4/28/2006
CHECKED BY:	D. GOURLEY	DATE:	5/1/2006

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	3B
R / W SHEET NO.	

PARSONS BRINCKERHOFF

LIST OF PIPES, ENDWALLS, ETC. (FOR PIPES 48" & UNDER)

STATION	LOCATION (LT, RT, OR CL)	STRUCTURE NO. FROM	STRUCTURE NO. TO	TOP ELEVATION	INVERT ELEVATION	INVERT ELEVATION	SLOPE CRITICAL	CLASS III R.C. PIPE (UNLESS NOTED OTHERWISE) 12"	15"	18"	24"	30"	36"	42"	48"	QUANTITIES FOR DRAINAGE STRUCTURES PER EACH (0' THRU 5.0')	PIPE REMOVAL LIN. FT.	REMARKS
-L- 491+90.29	LT	48A			7.00	6.96			32									
-L- 490+71.83	LT	48B			6.40	6.10			28									
-L- 494+69.07	LT	49			7.28	7.26			20									REMOVE 15" CMP
-L- 495+25.21	LT	50			7.34	7.31			24									REMOVE 18" CMP
-L- 495+82.77	LT	51			7.39	7.37			24									REMOVE 15" CMP
-L- 502+16.17	LT	52			3.25	3.22				24							24	REMOVE 15" CONCRETE PIPE
-L- 502+13.92	RT	53			6.59	6.45			20									REMOVE 15" CONCRETE PIPE
-L- 502+87.51	RT	54			6.17	6.04			24									REMOVE 15" CONCRETE PIPE
-L- 504+04.45	LT	55			3.06	3.03					28						25	REMOVE 24" CONCRETE PIPE
-L- 505+28.32	CL	56			3.00	2.50								56				REMOVE 42" CMP
-L- 515+04.27	LT	57			6.33	6.27			68								21	REMOVE 15" CONCRETE PIPE
-L- 520+41.85	LT	58			6.13	6.03			40								24	
-L- 519+92.76	RT	58A			6.47	6.43			28									
-L- 521+25.44	LT	59			5.91	5.81			40								25	REMOVE 12" CONCRETE PIPE
-L- 523+02.81	CL	60			4.50	4.00					76							REMOVE 24" CMP
-L- 522+99.25	RT	61			4.83	4.63						56						REMOVE 30" PLASTIC PIPE
-L- 522+99.25	LT	62			6.78	6.42				20								REMOVE 12" CONCRETE PIPE
-L- 526+79.82	RT	63			5.40	5.27			20									REMOVE 15" CONCRETE PIPE
-L- 527+51.03	RT	64			4.92	4.77			24									REMOVE 15" CONCRETE PIPE
-L- 527+96.88	RT	65			4.61	4.44			24									REMOVE 15" PLASTIC PIPE
-L- 528+75.15	RT	66			4.05	3.92			20								17	REMOVE 15" PLASTIC PIPE
-L- 530+89.69	CL	67			2.75	2.00					56							REMOVE 18" CONCRETE PIPE
-L- 533+46.79	LT	68			3.26	3.23					36							REMOVE 15" CONCRETE PIPE
-L- 541+70.90	LT	69			4.08	4.06				20							16	REMOVE 15" CONCRETE PIPE
-L- 542+37.64	LT	70			4.14	4.12				20							18	REMOVE 15" CONCRETE PIPE
-L- 543+71.60	LT	71			4.28	4.25				28							27	REMOVE 15" CONCRETE PIPE
-L- 544+84.21	LT	72			4.36	4.36				24							24	REMOVE 15" CONCRETE PIPE
-L- 547+11.37	LT	73			4.62	4.59			24								20	REMOVE 24" CMP
-L- 548+09.21	LT	74			4.72	4.69			24								21	REMOVE 15" CONCRETE PIPE
-L- 548+51.92	LT	75			4.76	4.74			16								15	REMOVE 15" CONCRETE PIPE
-L- 550+50.35	LT	76			4.97	4.93			40									REMOVE 15" CMP
-L- 556+22.10	RT	76A			5.10	5.05				24								
-Y8- 10+27.93	CL	77			2.48	1.76					64							REMOVE 15" CMP
-L- 565+14.88	LT	78			2.36	2.33					32							REMOVE 24" CMP
-L- 566+77.47	LCL	79																MODIFIED BY OTHERS
-L- 566+85.60	CL	80																MODIFIED BY OTHERS
-L- 569+50.24	RT	81			2.78	2.67			28								18	REMOVE 15" CONCRETE PIPE
-L- 572+12.74	RT	81A			3.95	3.90			28									
-L- 572+51.74	LT	82			4.03	3.92			60									REMOVE 15" CMP
-L- 573+67.91	LT	83			4.16	4.12			24								20	REMOVE 15" CONCRETE PIPE
-L- 576+77.27	RT	84			4.70	4.66			32									
-L- 580+89.58	LT	85			5.23	5.21			28									REMOVE 15" CONCRETE PIPE
-L- 584+78.46	RT	85A			5.74	5.71			24									
-L- 587+71.20	RT	86			5.27	5.20			24									REMOVE 15" CONCRETE PIPE
-L- 590+37.49	CL	87			2.25	1.75						48						REMOVE 24" CONCRETE PIPE
-L- 591+25.28	LT	88			5.20	4.90			16									REMOVE 12" CONCRETE PIPE
-L- 592+38.75	CL	89			3.50	3.00					48							REMOVE 24" CONCRETE PIPE
-L- 592+61.20	LT	90			5.65	5.60						24						REMOVE 30" CONCRETE
-L- 593+86.82	LT	91			6.20	6.05						32						REMOVE 30" CONCRETE
-L- 595+41.02	LT	92			6.00	5.85			24									REMOVE 15" CONCRETE PIPE
-L- 596+75.24	CL	93			3.00	2.40					56							REMOVE 24" CONCRETE PIPE
SHEET TOTALS									748	160	396	160		56		0	315	

Other column headings printed on the sheet (no entries on this sheet): SIZE; THICKNESS OR GAUGE; BITUMINOUS COATED C.S. PIPE TYPE B (UNLESS NOTED OTHERWISE) 12" .064, 15" .064, 18" .064, 24" .064, 30" .079, 36" .079, 42" .109, 48" .109; 15" SIDE DRAIN PIPE; 18" SIDE DRAIN PIPE; 24" SIDE DRAIN PIPE; ENDWALLS STD. 838.01, STD. 838.11, OR STD. 838.80 (UNLESS NOTED OTHERWISE) CU. YARDS R.C.P., C.S.P.; "TOTAL L.F. FOR PAY QUANTITY SHALL BE COL. 'A' + (1.3 X COL.'B')" LIN. FT. A 5.0' THRU 10.0', B 10.0' AND ABOVE; C.B. STD. 840.01 OR STD. 840.02; FRAME, GRATES, AND HOOD STANDARD 840.03 TYPE OF GRATE E F G; D.I. STD. 840.14 OR STD. 840.15; D.I. FRAME AND GRATE STD. 840.16; M.D.I. TYPE "A" STD. 840.17 OR 840.26; M.D.I. TYPE "B" STD. 840.18 OR 840.27; M.D.I. TYPE "D" STD. 840.19 OR 840.28; M.D.I. FRAME WITH GRATE STD. 840.20; M.D.I. FRAME WITH TWO GRATES STD. 840.22; M.D.I. (N.S.) FRAME WITH GRATE STD. 840.24; M.D.I. (N.S.) FRAME WITH TWO GRATES STD. 840.24; J.B. STD. 840.31 OR 840.32; MANHOLE STD. 840.51; M.H. STD. 840.51 OR 840.53; M.H. FRAME AND COVER STD. 840.54; CORR. STEEL ELBOWS NO. & SIZE; CONC. COLLARS CL. "B" C.Y. STD. 840.72; CONC. & BRICK PIPE PLUG, C.Y. STD. 840.71

ABBREVIATIONS

C.B.	CATCH BASIN
N.D.I.	NARROW DROP INLET
D.I.	DROP INLET
M.D.I.	MEDIAN DROP INLET
M.D.I.(N.S.)	MEDIAN DROP INLET (NARROW SLOT)
H.W.	HEADWALL
J.B.	JUNCTION BOX
M.H.	MANHOLE
T.B.D.I.	TRAFFIC BEARING DROP INLET
T.B.J.B.	TRAFFIC BEARING JUNCTION BOX

PS214568

COMPUTED BY:	R. COMBS	DATE:	4/28/2006
CHECKED BY:	D. GOURLEY	DATE:	5/1/2006

STATE OF NORTH CAROLINA
DIVISION OF HIGHWAYS

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	3C
R / W SHEET NO.	

PARSONS BRINCKERHOFF
100 YEARS

LIST OF PIPES, ENDWALLS, ETC. (FOR PIPES 48" & UNDER)

STATION	LOCATION (LT, RT, OR CL)	STRUCTURE NO. FROM	STRUCTURE NO. TO	TOP ELEVATION	INVERT ELEVATION	INVERT ELEVATION	SLOPE CRITICAL	CLASS III R.C.P. PIPE (UNLESS NOTED OTHERWISE) 12"	15"	18"	24"	30"	36"	42"	48"	BITUMINOUS COATED C.S. PIPE TYPE B (UNLESS NOTED OTHERWISE) 12" .064	15" .064	18" .064	24" .064	30" .079	36" .079	42" .109	48" .109	15" SIDE DRAIN PIPE	18" SIDE DRAIN PIPE	24" SIDE DRAIN PIPE	ENDWALLS STD. 838.01, STD. 838.11, OR STD. 838.80 (UNLESS NOTED OTHERWISE) CU. YARDS R.C.P.	C.S.P.	QUANTITIES FOR DRAINAGE STRUCTURES PER EACH (0' THRU 5.0')	"TOTAL L.F. FOR PAY QUANTITY SHALL BE COL. 'A' + (1.3 X COL. 'B')" LIN. FT. A 5.0' THRU 10.0'	B 10.0' AND ABOVE	C.B. STD. 840.01 OR STD. 840.02	FRAME, GRATES, AND HOOD STANDARD 840.03 TYPE OF GRATE E	F	G	D.I. STD. 840.14 OR STD. 840.15	D.I. FRAME AND GRATE STD. 840.16	M.D.I. TYPE "A" STD. 840.17 OR 840.26	M.D.I. TYPE "B" STD. 840.18 OR 840.27	M.D.I. TYPE "D" STD. 840.19 OR 840.28	M.D.I. FRAME WITH GRATE STD. 840.20	M.D.I. FRAME WITH TWO GRATES STD. 840.22	M.D.I. (N.S.) FRAME WITH GRATE STD. 840.24	M.D.I. (N.S.) FRAME WITH TWO GRATES STD. 840.24	J.B. STD. 840.31 OR 840.32	MANHOLE STD. 840.51	M.H. STD. 840.51 OR 840.53	M.H. FRAME AND COVER STD. 840.54	T.B.J.B. STD. 840.34	T.B.D.I. STD. 840.35 OR STD. 840.36	CORR. STEEL ELBOWS NO. & SIZE	CONC. COLLARS CL. "B" C.Y. STD. 840.72	CONC. & BRICK PIPE PLUG, C.Y. STD. 840.71	PIPE REMOVAL LIN. FT.	REMARKS
-LREV- 607+86.59	LT	94			6.01	6.06				20																																													
-LREV- 608+44.25	RT	95			6.19	6.24				20																																													
-LREV- 609+10.36	RT	96			6.35	6.50				20																																													
-YREV- 10+41.69	CL	97			4.93	5.10					72																																												
-YREV- 13+18.37	LT	98			5.16	5.18					20																																												
-YREV- 13+86.44	RT	99			5.10	4.50				24																																												41	REMOVE 18" CMP
-YREV- 14+16.73	RT	100		EX																									1																				1						INSTALL TBJB
-YREV- 14+16.73	RT	100	101		EX	3.50				16																																													
-YREV- 14+14.73	RT	101	102		3.40	3.40				44																			1																				1					40	INSTALL TBJB
-YREV- 14+12.56	RT	101																											1								1													1					
SHEET TOTALS									0	144	92																		3								1												2	1				81	
DRAINAGE TOTALS									2160	552	488	160		228															3								1												2	1				772	

ABBREVIATIONS	
C.B.	CATCH BASIN
N.D.I.	NARROW DROP INLET
D.I.	DROP INLET
M.D.I.	MEDIAN DROP INLET
M.D.I.(N.S.)	MEDIAN DROP INLET (NARROW SLOT)
H.W.	HEADWALL
J.B.	JUNCTION BOX
M.H.	MANHOLE
T.B.D.I.	TRAFFIC BEARING DROP INLET
T.B.J.B.	TRAFFIC BEARING JUNCTION BOX

6/4/99

COMPUTED BY: D. GOURLEY DATE: 04/04/2007
CHECKED BY: B. HOBBS DATE: 04/17/2007

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	3D

DIVISION OF HIGHWAYS
STATE OF NORTH CAROLINA

SUMMARY OF EARTHWORK

IN CUBIC YARDS

LOCATION	UNCLASSIFIED EXCAVATION	UNDERCUT	EMBANKMENT +%	BORROW	WASTE
–L– STA. 441+00.00 TO 471+00.00	2393	0	1256	0	1137
–L– STA. 471+00.00 TO 501+00.00	2435	0	2344	0	91
–L– STA. 501+00.00 TO 531+00.00	2159	0	1569	0	590
–L– STA. 531+00.00 TO 561+00.00	3158	0	2529	0	629
–L– STA. 561+00.00 TO 591+00.00	3413	0	1316	0	2097
–L– STA. 591+00.00 TO 599+00.00	1104	0	342	0	762
–LREV– STA. 599+00.00 TO 609+50.00	1699	0	1374	0	325
–L– STA. 591+00.00 TO 599+00.00	501	0	118	0	383
TOTAL R–4429C	16862	0	10848	0	6014
GRAND TOTAL R–4429C	16862	0	10848	0	6014

ESTIMATED UNDERCUT = 2215 CY

SELECT GRANULAR MATERIAL = 3625 CY

dgn
prt
$$DATE$$

5/9/06

DIVISION OF HIGHWAYS
STATE OF NORTH CAROLINA

SUMMARY OF EXISTING ASPHALT PAVEMENT REMOVAL

IN SQUARE YARDS

LINE	STATION	STATION	LOCATION LT/RT/CL	AREA SY
-L-	600+70.08	604+53.89	CL	868
-L-	602+86.35	603+45.34	RT	78
-EY10-	9+63.31	9+96.14	RT	23
-EY10-	10+08.58	10+61.97	CL	117
-EY10-	10+74.53	10+99.95	CL	64
-EY10-	11+23.00	11+97.66	RT	36
			SAY	1190

-EL-	-EL-	-EY6-
PI Sta 444+44.32	PI Sta 452+62.27	PI Sta 10+42.26
Δ = 9° 09' 34.9" (LT)	Δ = 0° 56' 42.2" (LT)	Δ = 1° 41' 25.1" (RT)
D = 3° 00' 00.0"	D = 0° 22' 40.9"	D = 2° 00' 00.0"
L = 305.32'	L = 250.00'	L = 84.52'
T = 152.99'	T = 125.00'	T = 42.26'
R = 1,909.86'	R = 15,156.62'	R = 2,864.79'

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	4
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. BEAM

HYDRAULICS ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 23924 ENGINEER DANIEL H. BROOKS

6-14-06

PB PARSONS BRINCKERHOFF

NAD 83

Begin Project Sta. 441+19.51

POT Sta. 440+67.85

PCSta. 442+91.34

PCSta. 10+00.00

BEGIN CONSTRUCTION -EY6- STA 10+00.00

PT Sta. 445+96.66

PT Sta. 10+84.52

PCSta. 451+37.26

-EL- POT STA 443+61.40

-EY6- POT STA 11+13.61

N48°25'15"W

N57°34'50"W

MATCHLINE STA. 453+00.00 SEE SHEET 5

① THOMAS J. HOUSTON DB 366 PG 797 926

② BRIAN E. HUDGINS DB 395 PG 874 920

③ BILLY J. WILLIAMS DB 353 PG 750 912

④ HARRY R. SEYMOUR DB 474 PG 039 906

⑤ SUSAN COLEMAN KAY DB 164 PG 159

⑥ CHARLES D. JARVIS DB 243 PG 711

⑦ KENNETH R. VAHLE, et ux DB 380 PG 640

⑧ GILBERT ANTHONY HAID, JR, et ux DB 445 PG 173

⑨ MICHEAL L. STINNETTE, JR, et ux DB 496 PG 454

⑩ BARRY JOESPH MELANSON DB 245 PG 692

DATUM DESCRIPTION

THE LOCALIZED COORDINATE SYSTEM DEVELOPED FOR THIS PROJECT IS BASED ON THE STATE PLANE COORDINATES ESTABLISHED BY OTHERS FOR MONUMENT "HYDRANT" WITH NAD 1983/95 STATE PLANE GRID COORDINATES OF NORTHING: 1010625.899 (ft) EASTING: 2860510.122 (ft)
THE AVERAGE COMBINED GRID FACTOR USED ON THIS PROJECT (GROUND TO GRID) IS: 1.0001084
THE N.C. LAMBERT GRID BEARING AND LOCALIZED HORIZONTAL GROUND DISTANCE FROM "HYDRANT" TO -L- STATION 440+67.85 IS N 64°46'07" W 17,017.0403 FT.
ALL LINEAR DIMENSIONS ARE LOCALIZED HORIZONTAL DISTANCES
VERTICAL DATUM USED IS NGVD 29

GRADE DITCHES AS FOLLOWS:

441+20 (TIE TO EXIST.) ← WATER FLOW ← 446+50 (GRADE BREAK) LEFT SIDE
441+20 (TIE TO EXIST.) ← WATER FLOW ← 448+60 (GRADE BREAK) RIGHT SIDE
446+50 (GRADE BREAK) → WATER FLOW → 449+20 (CROSS LINE) LEFT SIDE
448+60 (GRADE BREAK) → WATER FLOW → 449+20 (OUTLET DITCH) RIGHT SIDE
449+20 (CROSS LINE) ← WATER FLOW ← 464+50 (GRADE BREAK) LEFT SIDE
449+20 (OUTLET DITCH) ← WATER FLOW ← 455+45 (GRADE BREAK) RIGHT SIDE

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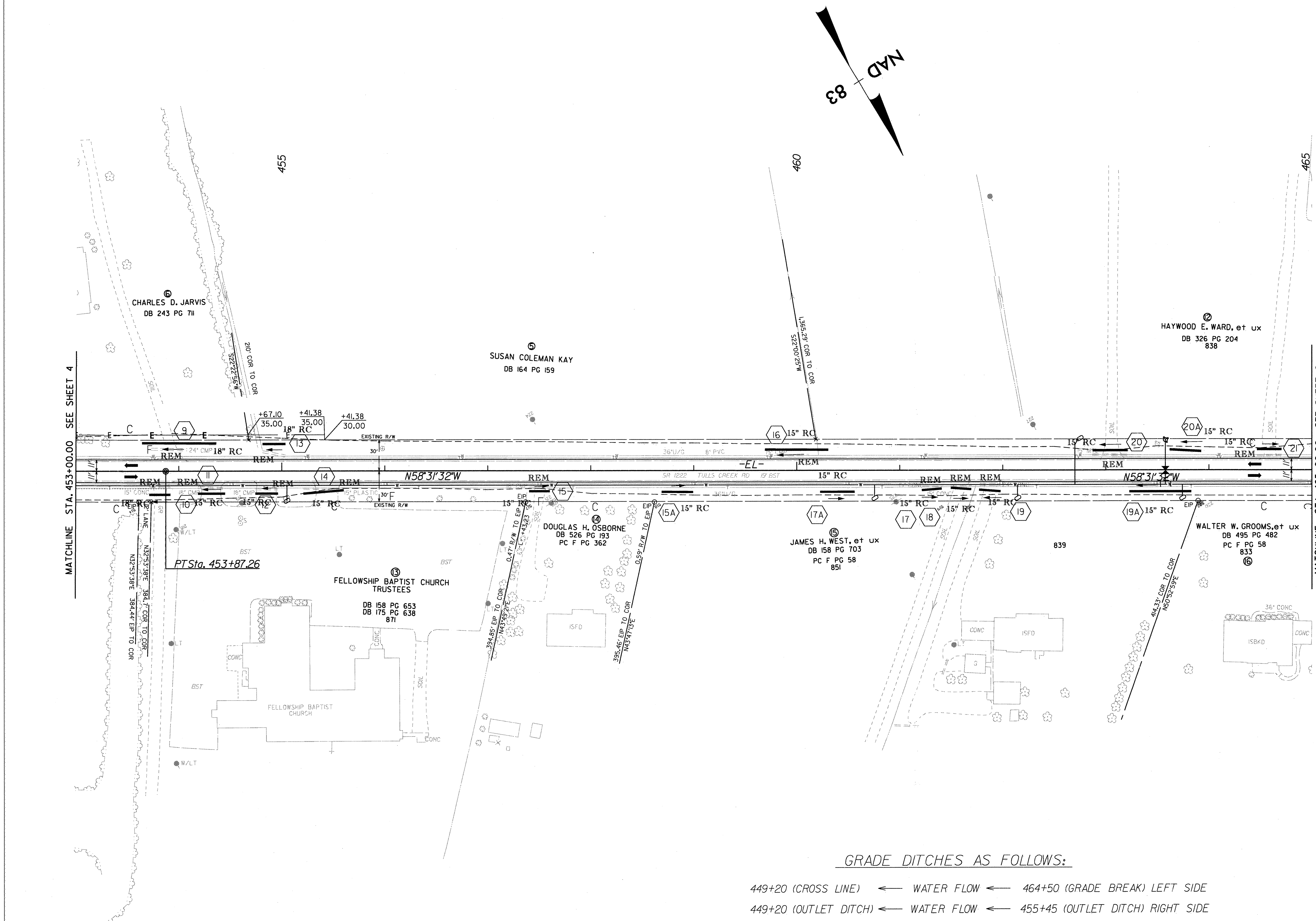
6/13/2006

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	5
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

HYDRAULICS ENGINEER

PARSONS BRINCKERHOFF



NAD 83
455
460
465
MATCHLINE STA. 453+00.00 SEE SHEET 4
MATCHLINE STA. 465+00.00 SEE SHEET 6
CHARLES D. JARVIS
DB 243 PG 711
SUSAN COLEMAN KAY
DB 164 PG 159
HAYWOOD E. WARD, et ux
DB 326 PG 204
838
FELLOWSHIP BAPTIST CHURCH TRUSTEES
DB 158 PG 653
DB 175 PG 638
871
DOUGLAS H. OSBORNE
DB 526 PG 193
PC F PG 362
JAMES H. WEST, et ux
DB 158 PG 703
PC F PG 58
851
WALTER W. GROOMS, et ux
DB 495 PG 482
PC F PG 58
833
839
FELLOWSHIP BAPTIST CHURCH
PT Sta. 453+87.26
N58°31'32"W
-EL-
SR 1222 TULLS CREEK RD
EXISTING R/W
REM
18" RC
15" RC
+67.10
35.00
+41.38
35.00
+41.38
30.00

GRADE DITCHES AS FOLLOWS:

449+20 (CROSS LINE) ⟵ WATER FLOW ⟵ 464+50 (GRADE BREAK) LEFT SIDE

449+20 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 455+45 (OUTLET DITCH) RIGHT SIDE

455+45 (GRADE BREAK) ⟶ WATER FLOW ⟶ 461+75 (OUTLET DITCH) RIGHT SIDE

464+50 (GRADE BREAK) ⟶ WATER FLOW ⟶ 472+95 (CROSS LINE) LEFT SIDE

461+75 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 464+00 (GRADE BREAK) RIGHT SIDE

464+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 472+95 (OUTLET DITCH) RIGHT SIDE

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6/13/2006

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	6
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 26343 ENGINEER GREGORY C. THOMAS

HYDRAULICS ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 23784 ENGINEER MICHAEL H. BRINKLEY

PB PARSONS BRINCKERHOFF

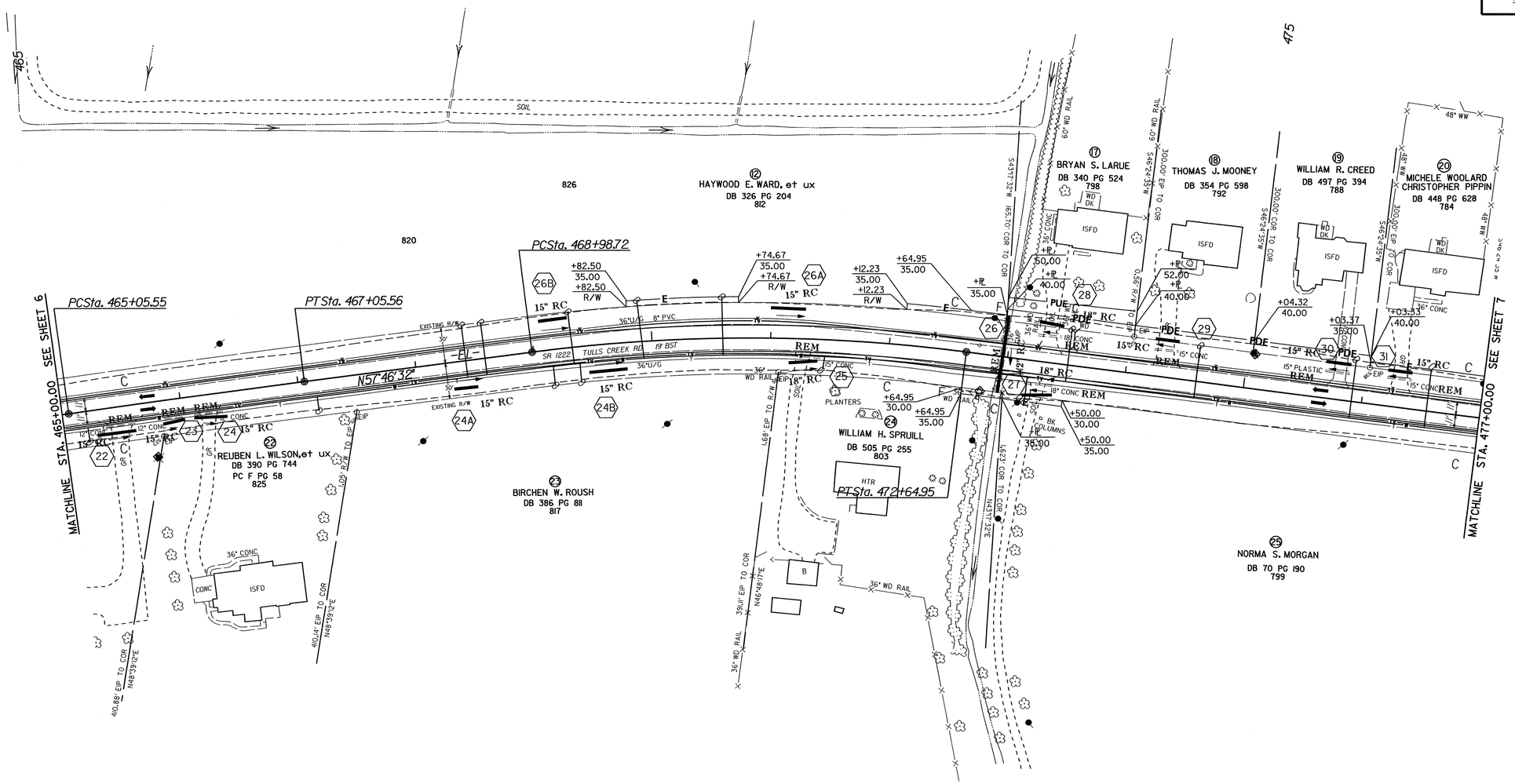
-EL-

PI Sta 466+05.56
△ = 0° 44' 59.8" (RT)
D = 0° 22' 29.9"
L = 200.00'
T = 100.00'
R = 15,279.79'

-EL-

PI Sta 470+82.84
△ = 14° 38' 58.0" (RT)
D = 4° 00' 00.0"
L = 366.24'
T = 184.12'
R = 1,432.39'

NAD 83



GRADE DITCHES AS FOLLOWS:

464+50 (GRADE BREAK) ⟶ WATER FLOW ⟶ 472+95 (CROSS LINE) LEFT SIDE
459+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 472+95 (OUTLET DITCH) RIGHT SIDE
472+95 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 478+00 (GRADE BREAK) RIGHT SIDE
472+95 (CROSS LINE) ⟵ WATER FLOW ⟵ 482+00 (GRADE BREAK) LEFT SIDE
478+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 489+70 (OUTLET DITCH) RIGHT SIDE

dgn
prf
$$DATE$$

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	7
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. GRAY
6-14-06

HYDRAULICS ENGINEER

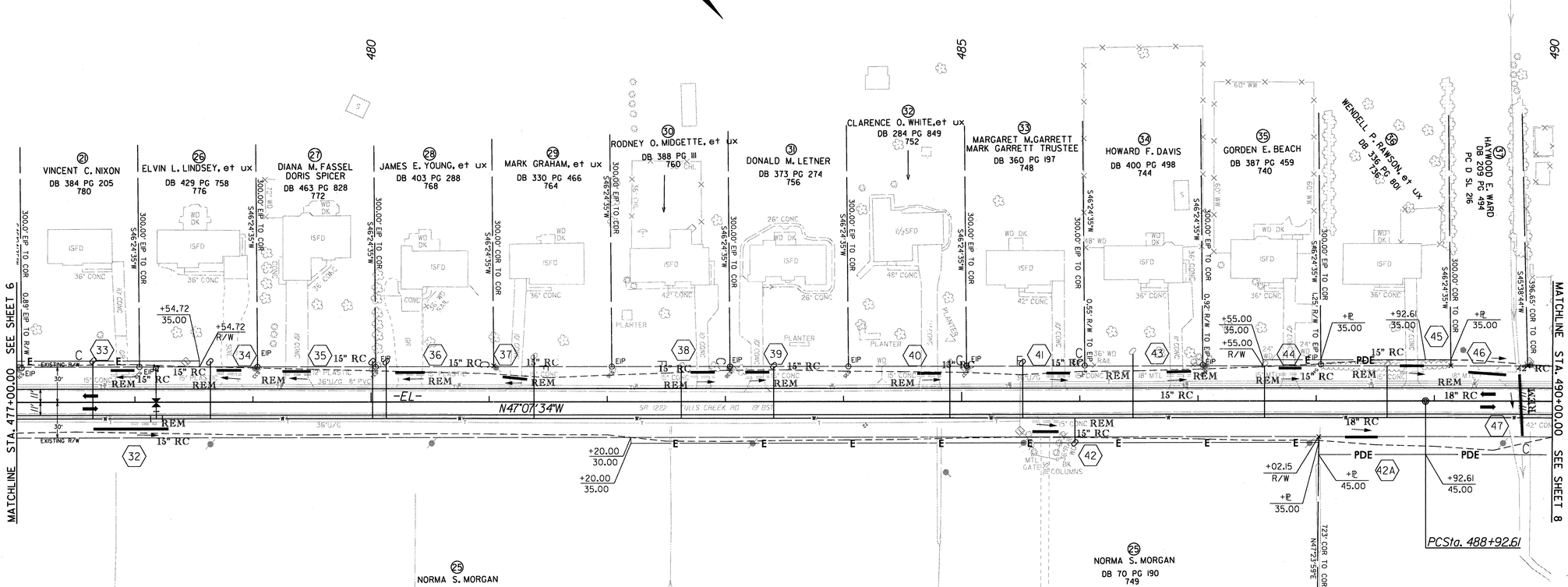
NORTH CAROLINA PROFESSIONAL SEAL 23924 ENGINEER DANIEL H. BRIDGMAN
6-14-06

PB PARSONS BRINCKERHOFF

-EL-

PI Sta 489+95.14
Δ = 0° 41' 00.6" (RT)
D = 0° 20' 00.0"
L = 205.05'
T = 102.53'
R = 17188.73'

NAD 83



GRADE DITCHES AS FOLLOWS:

472+95 (CROSS LINE) ⟵ WATER FLOW ⟵ 482+00 (GRADE BREAK) LEFT SIDE
482+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 489+70 (CROSS LINE) LEFT SIDE
478+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 489+70 (OUTLET DITCH) RIGHT SIDE
489+70 (CROSS LINE) ⟵ WATER FLOW ⟵ 497+00 (GRADE BREAK) LEFT SIDE
489+70 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 497+00 (GRADE BREAK) RIGHT SIDE

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6/13/2006

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	8
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. THOMAS
6-14-06

HYDRAULICS ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 23924 ENGINEER DANIEL H. BROADWAY
6-14-06

PB PARSONS BRINCKERHOFF

-EL-

PI Sta 495+11.19
Δ = 1° 02' 08.0" (LT)
D = 1° 00' 00.0"
L = 103.56'
T = 51.78'
R = 5,729.58'

NAD 83

490 495 500

WILLIAM H. SPRUILL
DB 272 PG 736
730

HAYWOOD E. WARD
DB 209 PG 494
722

HAYWOOD E. WARD, SR
DB 178 PG 568
714

HAYWOOD E. WARD, SR
DB 326 PG 204
714

S47°05'50"W 396.69' EIP TO COR

S47°01'26"W 306.61' EIP TO R/W

S46°42'27"W 300.00' EIP TO COR

S46°31'18"W 484.98' -L- TO R/W

MTL BLDG

ISBKD

ISFD

36" CMP

36" CMP

72" WD

SEE SHEET 7

MATCHLINE STA. 490+00.00

48B 48 48A 49 50 51

15" RC

EIP

36"U/G 8" PVC

15" MTL

REM

-EL-

N42°26'34"W

N43°28'42"W

SR 1222 TULLS CREEK RD 19' EST

+04.21
45.00

+28.64
50.00

+28.64
R/W

+R
50.00

PDE

EXISTING R/W

30'

SEE SHEET 9

MATCHLINE STA. 501+00.00

PT Sta. 490+97.67

PC Sta. 494+59.42

PT Sta. 495+62.97

SIDNEY E. LOWE, SR
DB 90 PG 97

SIDNEY E. LOWE, SR
DB 90 PG 97

SIDNEY E. LOWE, SR
DB 90 PG 97

GRADE DITCHES AS FOLLOWS:

489+70 (CROSS LINE) ⟵ WATER FLOW ⟵ 497+00 (GRADE BREAK) LEFT SIDE
489+70 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 497+00 (GRADE BREAK) RIGHT SIDE
497+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 505+30 (OUTLET DITCH) RIGHT SIDE
497+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 505+30 (CROSS LINE) LEFT SIDE

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6/15/2006

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	9
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER CHRISTOPHER C. PETERSON
3-1-07

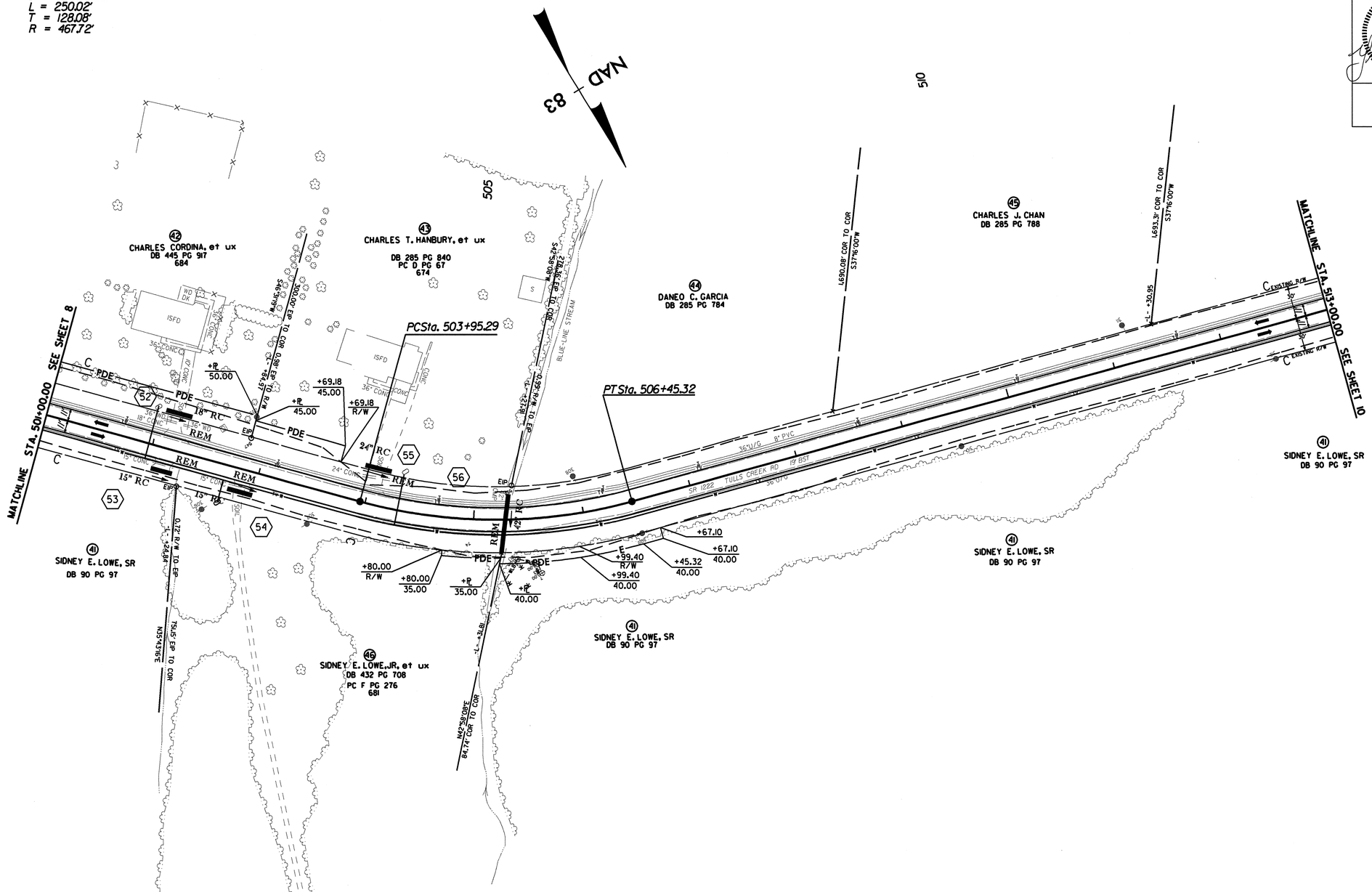
HYDRAULICS ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29924 ENGINEER DANIEL H. BROOKS
3-1-07

PB PARSONS BRINCKERHOFF

-EL-

PI Sta 505+23.37
Δ = 30° 37' 40.3" (LT)
D = 12° 15' 00.0"
L = 250.02'
T = 128.08'
R = 467.72'



GRADE DITCHES AS FOLLOWS:

497+00 (GRADE BREAK) → WATER FLOW → 505+30 (OUTLET DITCH) RIGHT SIDE
497+00 (GRADE BREAK) → WATER FLOW → 505+30 (CROSS LINE) LEFT SIDE
505+30 (CROSS LINE) ← WATER FLOW ← 517+00 (GRADE BREAK) LEFT SIDE
505+30 (OUTLET DITCH) ← WATER FLOW ← 517+00 (GRADE BREAK) RIGHT SIDE

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PROJECT REFERENCE NO.	SHEET NO.
R-4429C	10
R/W SHEET NO.	

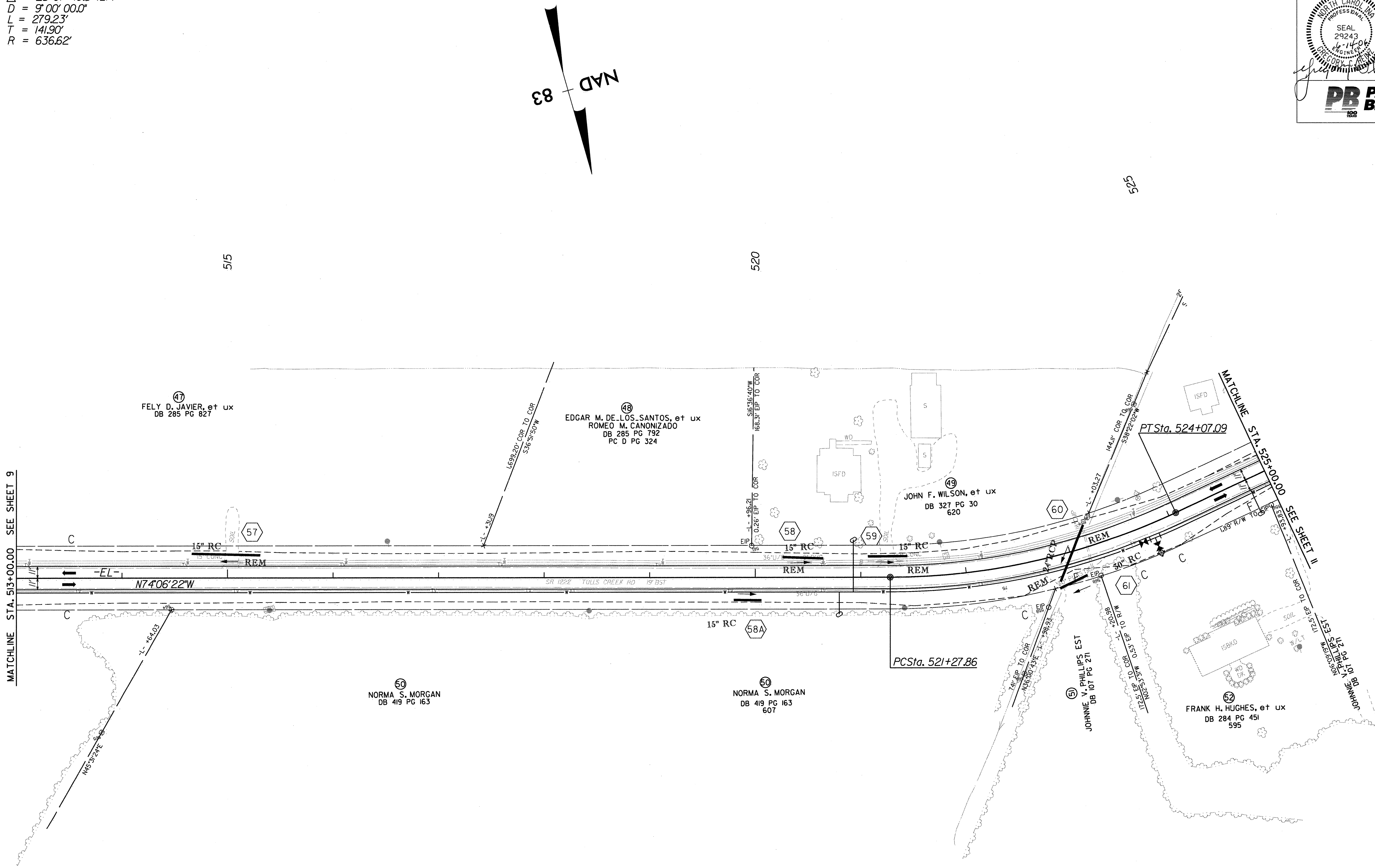
ROADWAY DESIGN ENGINEER — SEAL 29243, GREGORY ... ATKINS, 6-14-06

HYDRAULICS ENGINEER — SEAL 23924, DANIEL H. BRIDGES, 6-14-06

PARSONS BRINCKERHOFF

-EL-

PI Sta 522+69.75
Δ = 25° 07' 49.5" (LT)
D = 9° 00' 00.0"
L = 279.23'
T = 141.90'
R = 636.62'



GRADE DITCHES AS FOLLOWS:

517+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 523+10 (CROSS LINE) LEFT SIDE
517+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 522+80 (OUTLET DITCH) RIGHT SIDE
523+10 (CROSS LINE) ⟵ WATER FLOW ⟵ 525+40 (GRADE BREAK) LEFT SIDE
522+80 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 525+40 (GRADE BREAK) RIGHT SIDE

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6/13/2006

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	11
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER — NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. HEID — 3-1-07

HYDRAULICS ENGINEER — NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER DANIEL H. BRACKEN — 3-1-07

PB PARSONS BRINCKERHOFF

-EL-

PI Sta 530+98.75
Δ = 4° 42' 47.0" (LT)
D = 1° 00' 00.0"
L = 471.31'
T = 235.79'
R = 5,729.58'

NAD - 83

525 530 535

MATCHLINE STA. 525+00.00 SEE SHEET 10

MATCHLINE STA. 538+00.00 SEE SHEET 12

S80°45'49"W

PCSta. 528+62.96

Begin Taper Sta. 535+90.00

PTSta. 533+34.27

SR 1222 TULLS CREEK RD 19' BST

53 BEVERLY B. WOOD DB 406 PG 133 586

54 BESSIE JONES DB 211 PG 528

55 LINDA W. VICK DB 214 PG 235

56 I. N. WILSON, ESTATE DB 78 PG 006

57 JOYCE P. CREWS, et vir DB 372 PG 779 585

58 WENDELL G. PHILLIPS, et ux DB 372 PG 771 583

59 WANDA B. BAILEY DB 309 PG 481 PC E PG 378 579

61 JOHNNIE V. PHILLIPS EST DB 617 PG 271

62 63 64 65 66 67 68

GRADE DITCHES AS FOLLOWS:

523+10 (CROSS LINE)	← WATER FLOW ←	525+40 (GRADE BREAK) LEFT SIDE
522+80 (OUTLET DITCH)	← WATER FLOW ←	525+40 (GRADE BREAK) RIGHT SIDE
525+40 (GRADE BREAK)	→ WATER FLOW →	530+90 (OUTLET DITCH) RIGHT SIDE
525+40 (GRADE BREAK)	→ WATER FLOW →	530+90 (CROSS LINE) LEFT SIDE
530+90 (CROSS LINE)	← WATER FLOW ←	557+50 (GRADE BREAK) LEFT SIDE
530+90 (OUTLET DITCH)	← WATER FLOW ←	539+35 (SR 1231) RIGHT SIDE

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2/26/2007

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	12
R/W SHEET NO.	

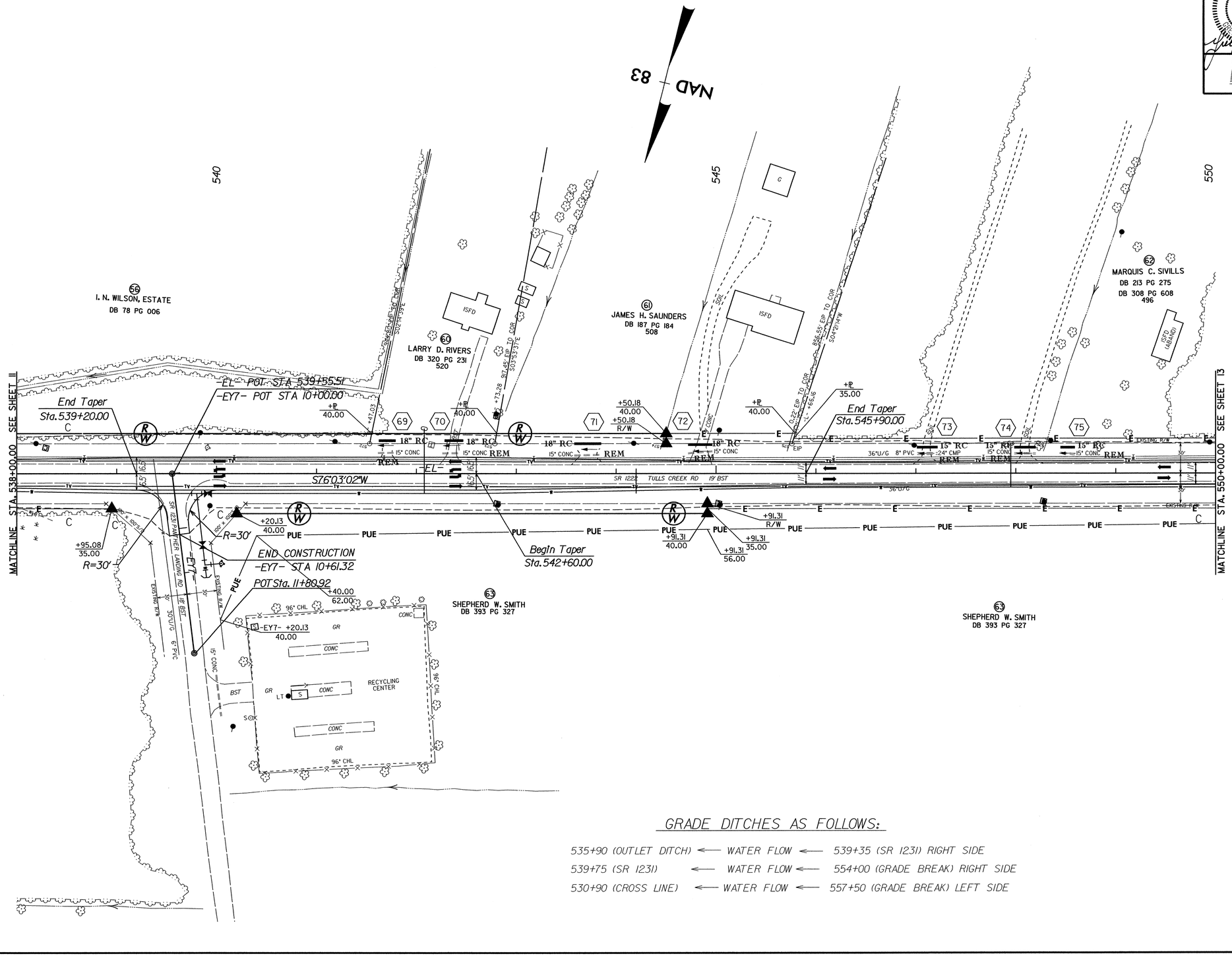
ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. GRAY

HYDRAULICS ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 20240 ENGINEER DANIEL H. BRINSON

PB PARSONS BRINCKERHOFF



GRADE DITCHES AS FOLLOWS:

535+90 (OUTLET DITCH) ← WATER FLOW ← 539+35 (SR 1231) RIGHT SIDE

539+75 (SR 1231) ← WATER FLOW ← 554+00 (GRADE BREAK) RIGHT SIDE

530+90 (CROSS LINE) ← WATER FLOW ← 557+50 (GRADE BREAK) LEFT SIDE

••dgn••
••prf••
$$DATE$$

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	13
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER

HYDRAULICS ENGINEER

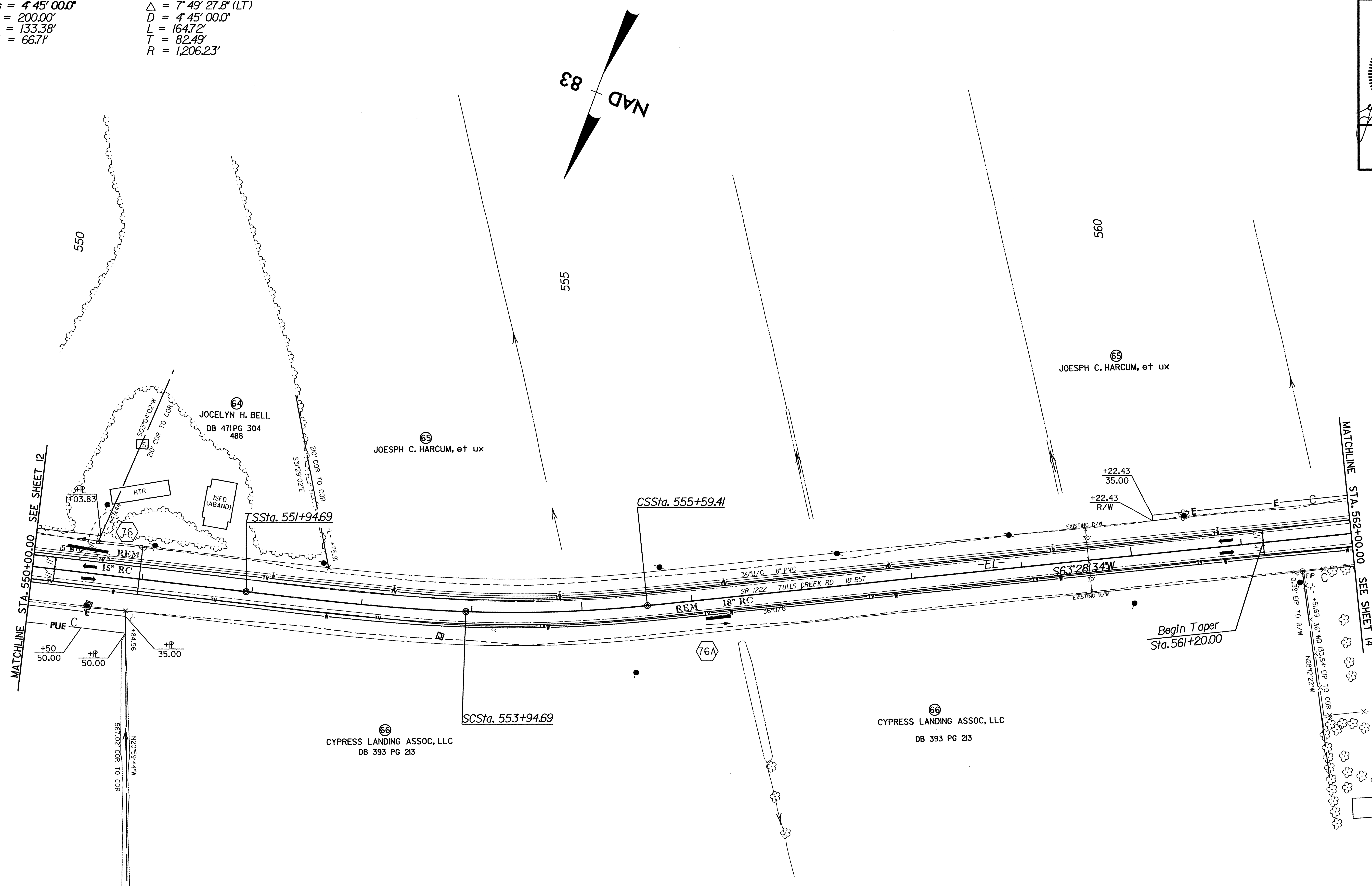
PARSONS BRINCKERHOFF

-EL-

PIs Sta 553+28.07
Θs = 4°45'00.0"
Ls = 200.00'
LT = 133.38'
ST = 66.71'

-EL-

PI Sta 554+77.18
Δ = 7°49'27.8" (LT)
D = 4°45'00.0"
L = 164.72'
T = 82.49'
R = 1,206.23'



GRADE DITCHES AS FOLLOWS:

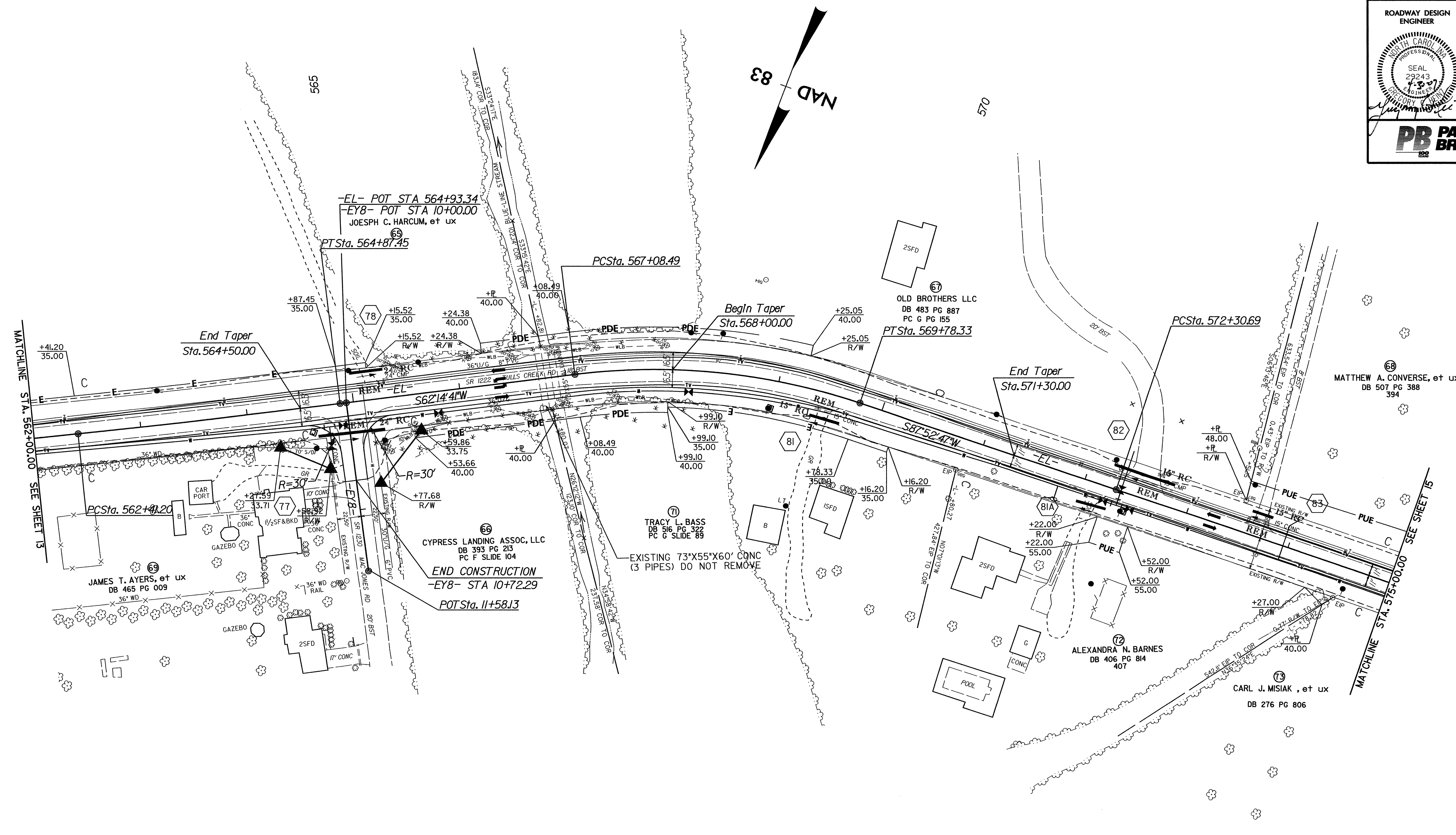
530+90 (CROSS LINE) ⟵ WATER FLOW ⟵ 557+50 (GRADE BREAK) LEFT SIDE
539+75 (SR 1231) ⟵ WATER FLOW ⟵ 554+00 (GRADE BREAK) RIGHT SIDE
557+50 (GRADE BREAK) ⟶ WATER FLOW ⟶ 566+80 (CROSS LINE) LEFT SIDE
554+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 566+80 (OUTLET DITCH) RIGHT SIDE

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	14
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER — SEAL 29243

HYDRAULICS ENGINEER — SEAL

PARSONS BRINCKERHOFF



NAD 83
565
570
575
MATCHLINE STA. 562+00.00 SEE SHEET 13
MATCHLINE STA. 575+00.00 SEE SHEET 15
-EL- POT STA 564+93.34
-EY8- POT STA 10+00.00
JOESPH C. HARCUM, et ux
65
PT Sta. 564+87.45
PC Sta. 567+08.49
End Taper
Sta. 564+50.00
Begin Taper
Sta. 568+00.00
PT Sta. 569+78.33
End Taper
Sta. 571+30.00
PC Sta. 572+30.69
OLD BROTHERS LLC
DB 483 PG 887
PC G PG 155
67
MATTHEW A. CONVERSE, et ux
DB 507 PG 388
394
68
S62°14'41"W
S87°52'47"W
SR 1222 BULLS CREEK RD
PC Sta. 562+41.20
R=30'
R=30'
CYPRESS LANDING ASSOC, LLC
DB 393 PG 213
PC F SLIDE 104
66
END CONSTRUCTION
-EY8- STA 10+72.29
POT Sta. 11+58.13
JAMES T. AYERS, et ux
DB 465 PG 009
69
TRACY L. BASS
DB 516 PG 322
PC G SLIDE 89
71
EXISTING 73"X55"X60" CONC
(3 PIPES) DO NOT REMOVE
ALEXANDRA N. BARNES
DB 406 PG 814
407
72
CARL J. MISIAK, et ux
DB 276 PG 806
73
GAZEBO
CAR PORT
2SFD
1SFD
POOL

-EL-	-EL-	-EL-
PI Sta 563+64.33	PI Sta 568+45.71	PI Sta 573+97.04
Δ = 1° 13' 52.4" (LT)	Δ = 25° 38' 05.6" (RT)	Δ = 0° 49' 54.2" (RT)
D = 0° 30' 00.0"	D = 9° 30' 00.0"	D = 0° 15' 00.0"
L = 246.24'	L = 269.84'	L = 332.69'
T = 123.13'	T = 137.22'	T = 166.35'
R = 11,459.16'	R = 603.11'	R = 22,918.31'

GRADE DITCHES AS FOLLOWS:

557+50 (GRADE BREAK) ⟶ WATER FLOW ⟶ 566+80 (CROSS LINE) LEFT SIDE

554+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 566+80 (OUTLET DITCH) RIGHT SIDE

566+80 (CROSS LINE) ⟵ WATER FLOW ⟵ 582+50 (GRADE BREAK) LEFT SIDE

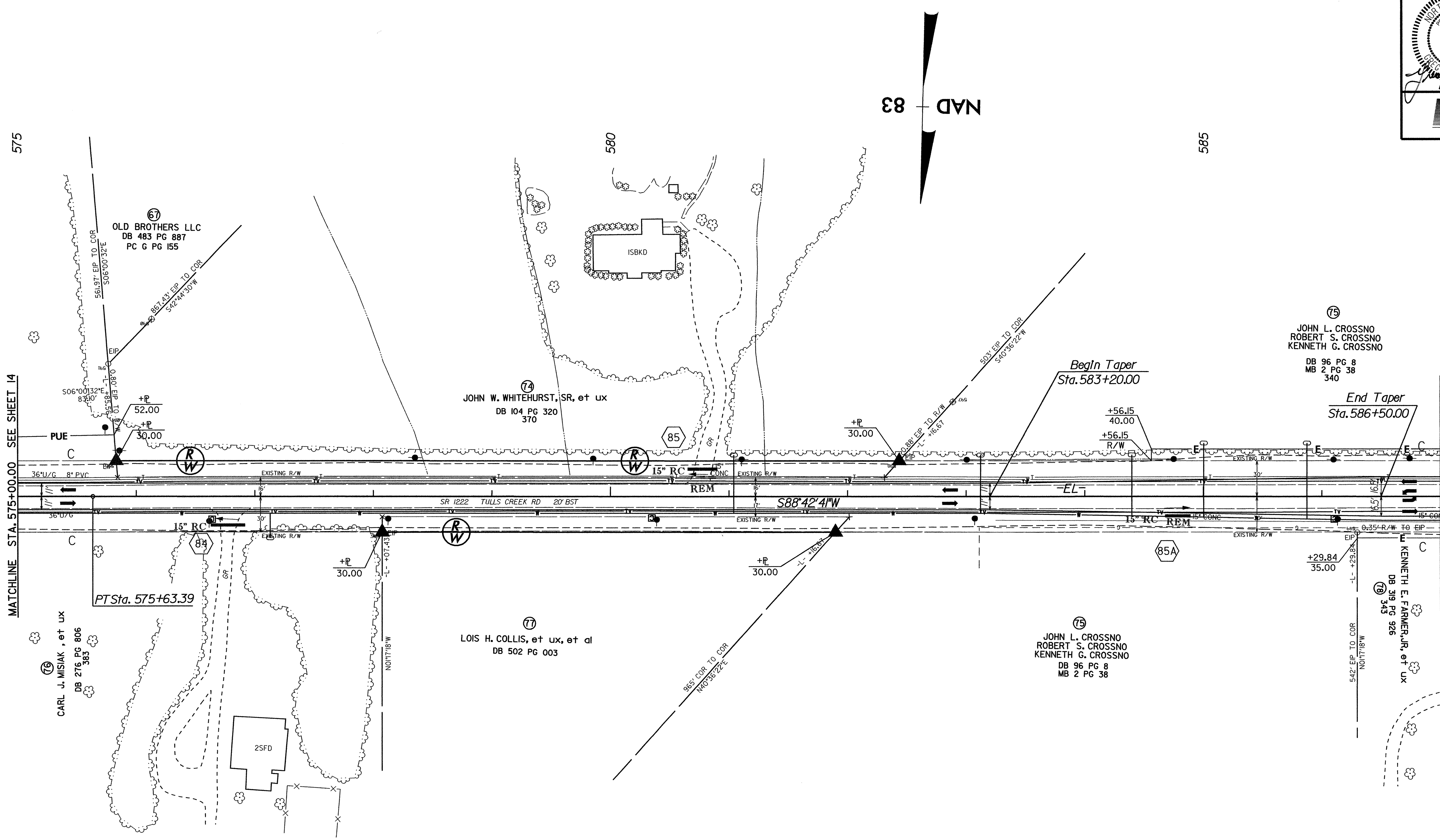
566+80 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 584+00 (GRADE BREAK) RIGHT SIDE

dgn
prf
$$DATE$$

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	15
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER	NORTH CAROLINA PROFESSIONAL SEAL 23924 ENGINEER

PARSONS BRINCKERHOFF



NAD 83
575
580
585
OLD BROTHERS LLC
DB 483 PG 887
PC G PG 155
JOHN W. WHITEHURST, SR, et ux
DB 104 PG 320
370
JOHN L. CROSSNO
ROBERT S. CROSSNO
KENNETH G. CROSSNO
DB 96 PG 8
MB 2 PG 38
340
Begin Taper
Sta. 583+20.00
End Taper
Sta. 586+50.00
MATCHLINE STA. 575+00.00 SEE SHEET 14
MATCHLINE STA. 587+00.00 SEE SHEET 16
SR 1222 TULLS CREEK RD 20' BST
S88°42'41"W
15" RC
REM
PUE
PT Sta. 575+63.39
LOIS H. COLLIS, et ux, et al
DB 502 PG 003
CARL J. MISIAK, et ux
DB 276 PG 806
383
KENNETH E. FARMER, JR., et ux
DB 319 PG 926
343
2SFD
1SBKD

GRADE DITCHES AS FOLLOWS:

566+80 (CROSS LINE) ⟵ WATER FLOW ⟵ 582+50 (GRADE BREAK) LEFT SIDE

566+80 (OUTLET DITCH) ⟵ WATER FLOW ⟵ 584+00 (GRADE BREAK) RIGHT SIDE

582+50 (GRADE BREAK) ⟶ WATER FLOW ⟶ 590+40 (CROSS LINE) LEFT SIDE

584+00 (GRADE BREAK) ⟶ WATER FLOW ⟶ 590+40 (OUTLET DITCH) RIGHT SIDE

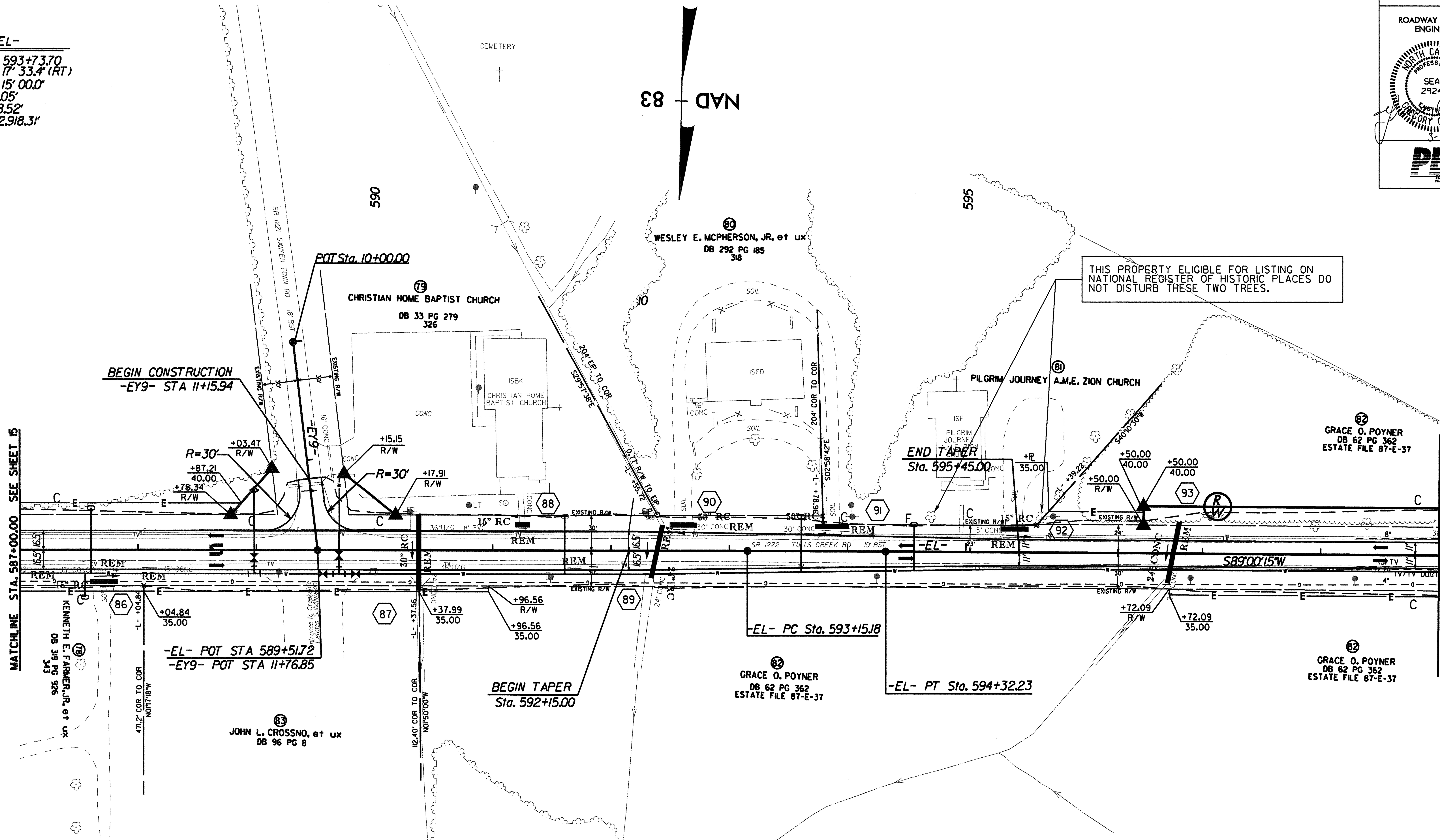
dgn
prf
$$DATE$$

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	16
R/W SHEET NO.	

ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
NORTH CAROLINA PROFESSIONAL SEAL 29243 ENGINEER GREGORY C. HEARN 3-1-07	NORTH CAROLINA PROFESSIONAL SEAL 23924 ENGINEER DANIEL H. BRIDGES 3-1-07

PARSONS BRINCKERHOFF

-EL-
PI Sta 593+73.70
Δ = 0° 17' 33.4" (RT)
D = 0° 15' 00.0"
L = 117.05'
T = 58.52'
R = 22,918.31'



GRADE DITCHES AS FOLLOWS:

582+50 (GRADE BREAK)	⟶	WATER FLOW	⟶	590+40 (CROSS LINE) LEFT SIDE
584+00 (GRADE BREAK)	⟶	WATER FLOW	⟶	590+40 (OUTLET DITCH) RIGHT SIDE
590+40 (CROSS LINE)	⟵	WATER FLOW	⟵	591+25 (GRADE BREAK) LEFT SIDE
590+40 (OUTLET DITCH)	⟵	WATER FLOW	⟵	591+75 GRADE BREAK) RIGHT SIDE
591+25 (GRADE BREAK)	⟶	WATER FLOW	⟶	592+45 (CROSS LINE) LEFT SIDE
591+75 (GRADE BREAK)	⟶	WATER FLOW	⟶	592+35 (OUTLET DITCH) RIGHT SIDE
592+35 (OUTLET DITCH)	⟵	WATER FLOW	⟵	594+00 (GRADE BREAK) RIGHT SIDE
592+45 (CROSS LINE)	⟵	WATER FLOW	⟵	594+00 (GRADE BREAK) LEFT SIDE
594+00 (GRADE BREAK)	⟶	WATER FLOW	⟶	596+80 (OUTLET DITCH) RIGHT SIDE
594+00 (GRADE BREAK)	⟶	WATER FLOW	⟶	596+80 (CROSS LINE) LEFT SIDE
596+80 (OUTLET DITCH)	⟵	WATER FLOW	⟵	600+00 (GRADE BREAK) RIGHT SIDE
596+80 (CROSS LINE)	⟵	WATER FLOW	⟵	600+00 (GRADE BREAK) LEFT SIDE

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2/26/2007

PROJECT REFERENCE NO.	SHEET NO.
R-4429C	17
R/W SHEET NO.	
ROADWAY DESIGN ENGINEER	

NORTH CAROLINA PROFESSIONAL SEAL 23485 ENGINEER WILLIAM B. HOBBS 04/26/07

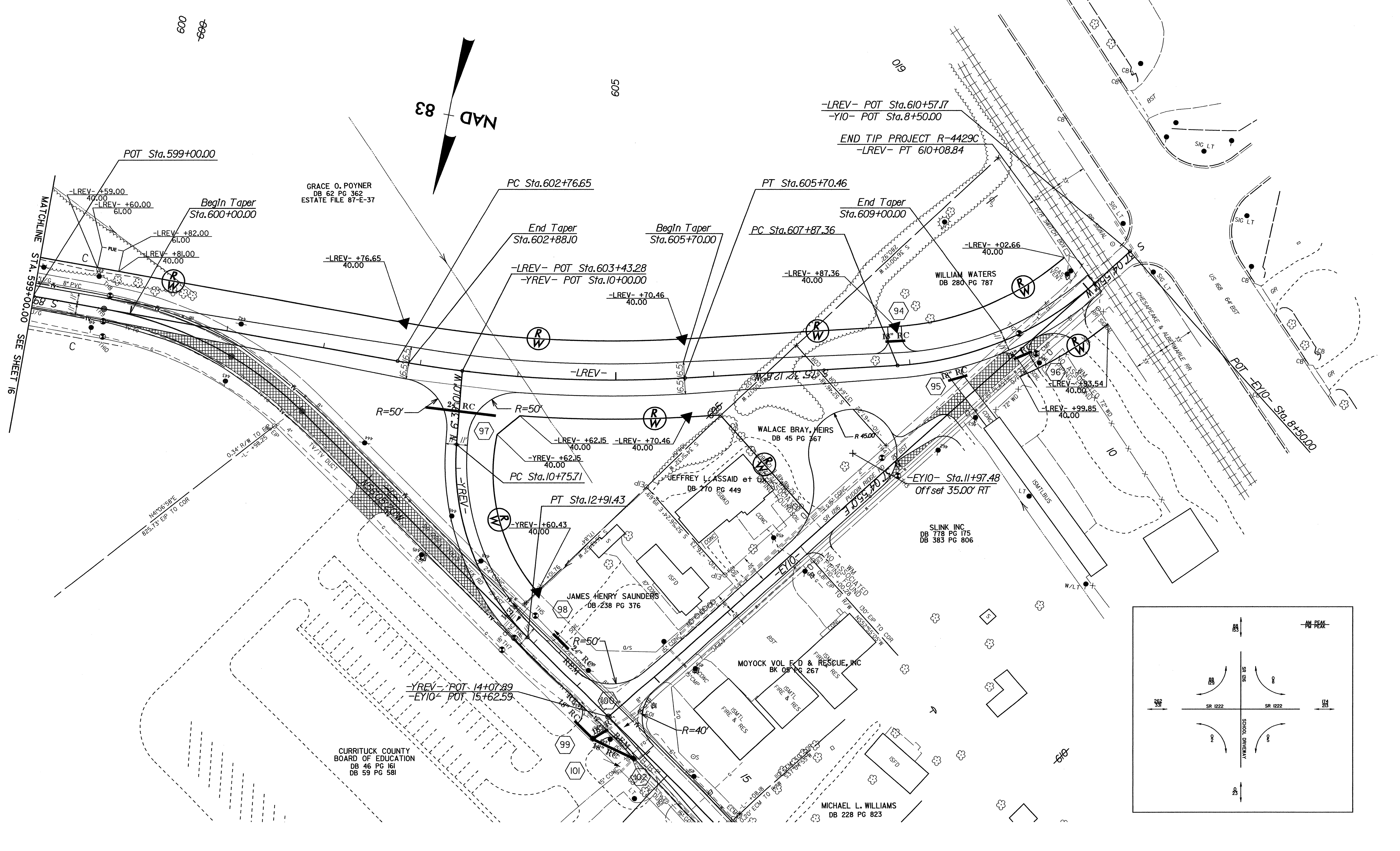
5/14/99

-LREV-

PI Sta 604+24.24	PI Sta 609+02.46
△ = 13° 28′ 02.0″ (LT)	△ = 38° 27′ 17.8″ (LT)
D = 4° 35′ 01.2″	D = 17° 21′ 44.5″
L = 293.81′	L = 221.48′
T = 147.58′	T = 115.10′
R = 1,250.00′	R = 330.00′

-YREV-

PI Sta 11+90.80
△ = 49° 26′ 19.7″ (LT)
D = 22° 55′ 05.9″
L = 215.72′
T = 115.09′
R = 250.00′



NAD 83
MATCHLINE STA. 599+00.00 SEE SHEET 16
POT Sta.599+00.00
Begin Taper Sta.600+00.00
PC Sta.602+76.65
End Taper Sta.602+88.10
-LREV- POT Sta.603+43.28
-YREV- POT Sta.10+00.00
Begin Taper Sta.605+70.00
PT Sta.605+70.46
PC Sta.607+87.36
End Taper Sta.609+00.00
-LREV- POT Sta.610+57.17
-Y10- POT Sta.8+50.00
END TIP PROJECT R-4429C
-LREV- PT 610+08.84
-EY10- Sta.11+97.48
Offset 35.00′ RT
PC Sta.10+75.71
PT Sta.12+91.43
-YREV- POT 14+07.89
-EY10- POT 15+62.59
POT -EY10- Sta.8+50.00
-LREV- +59.00 40.00
-LREV- +60.00 61.00
-LREV- +82.00 61.00
-LREV- +81.00 40.00
-LREV- +76.65 40.00
-LREV- +70.46 40.00
-LREV- +87.36 40.00
-LREV- +02.66 40.00
-LREV- +93.54 40.00
-LREV- +99.85 40.00
-LREV- +62.15 40.00
-LREV- +70.46 40.00
-YREV- +62.15 40.00
-YREV- +60.43 40.00
-LREV-
-YREV-
-EY10-
R=50′
R=50′
R=50′
R=40′
GRACE O. POYNER
DB 62 PG 362
ESTATE FILE 87-E-37
WILLIAM WATERS
DB 280 PG 787
WALACE BRAY, HEIRS
DB 45 PG 367
JEFFREY L. ASSAID et ux
DB 770 PG 449
JAMES HENRY SAUNDERS
DB 238 PG 376
SLINK INC.
DB 778 PG 175
DB 383 PG 806
MOYOCK VOL F D & RESCUE, INC
BK 05 PG 267
CURRITUCK COUNTY
BOARD OF EDUCATION
DB 46 PG 161
DB 59 PG 581
MICHAEL L. WILLIAMS
DB 228 PG 823
CHESAPEAKE & ALBEMARLE RR
US 168
N41°06′58″E
825.73′ EIP TO COR
0.34′ R/W TO EIP
94
95
96
97
98
99
100
101
102
600
605
610
AM PEAK
PM PEAK
SR 1222
SCHOOL DRIVEWAY

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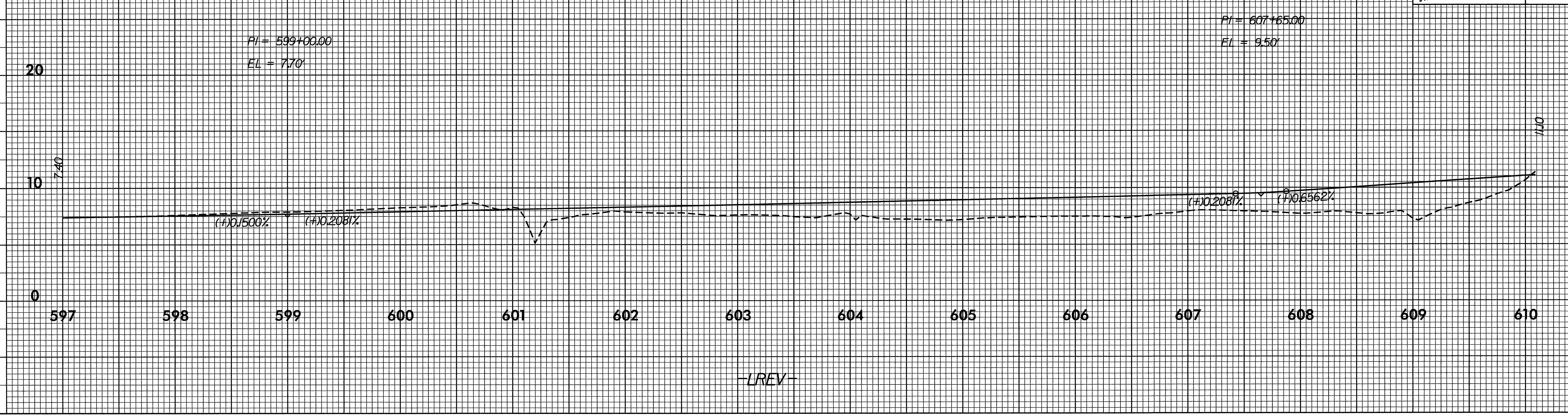
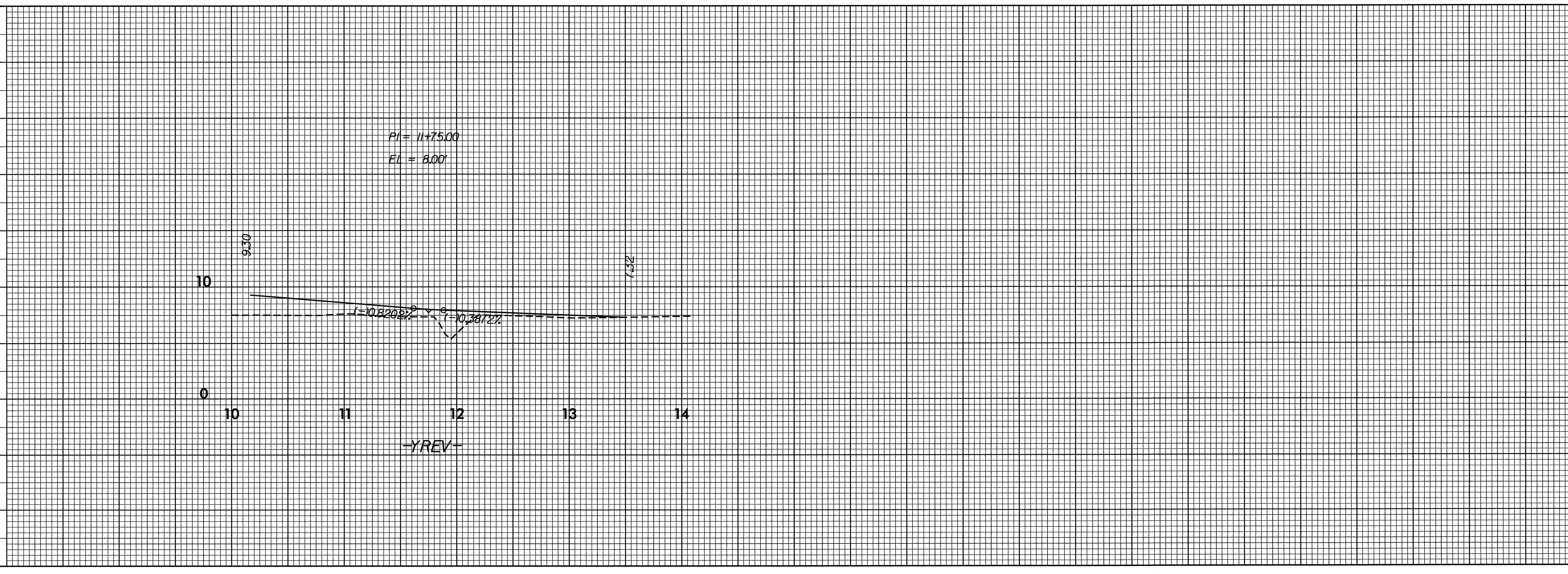
PROJECT REFERENCE NO.	SHEET NO.
R-4429C	18

ROADWAY DESIGN ENGINEER

NORTH CAROLINA PROFESSIONAL SEAL 23485 ENGINEER WILLIAM B. HOBBS

5/28/99





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