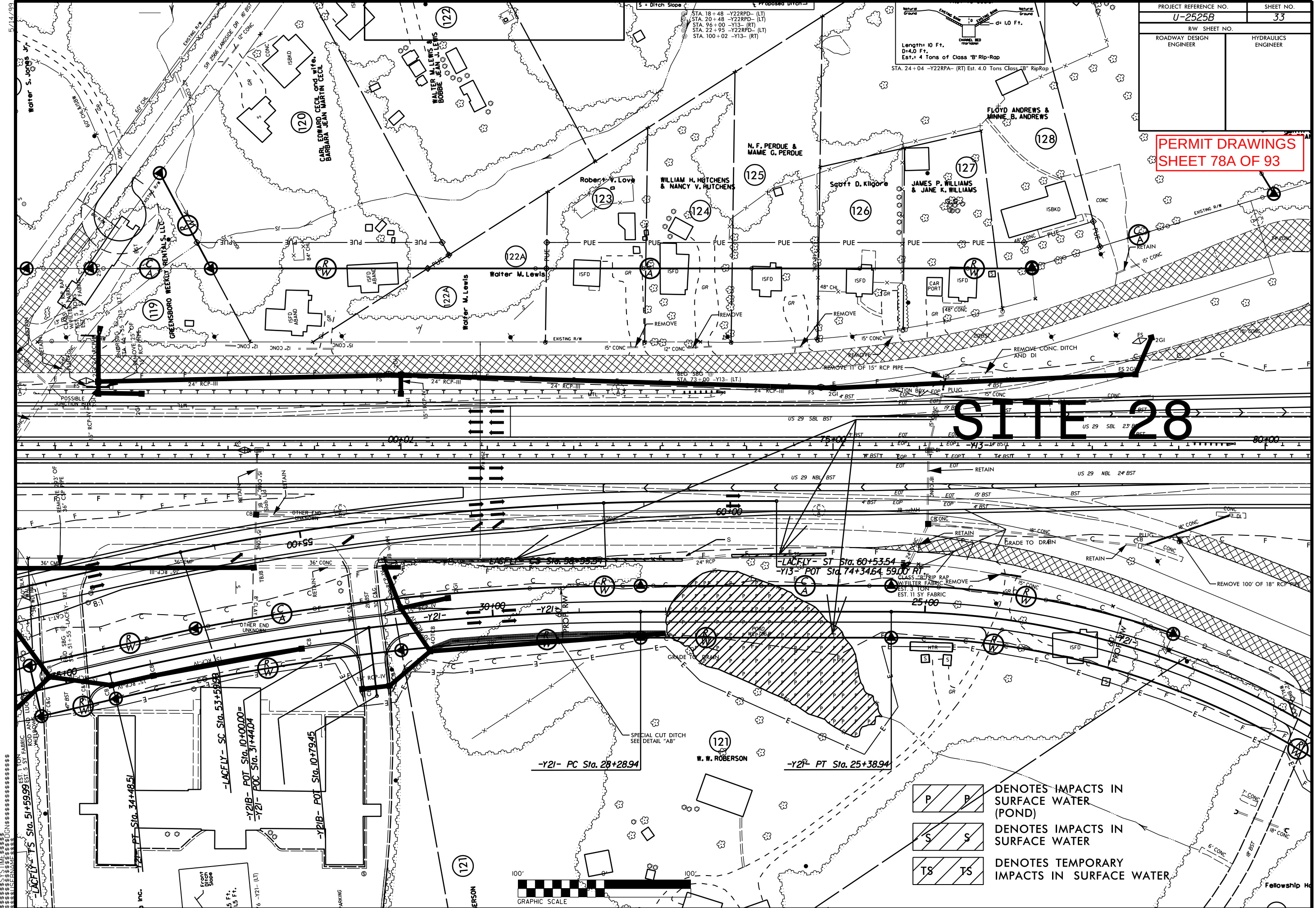


PROJECT REFERENCE NO.	SHEET NO.
U-2525B	33
R/W SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

PERMIT DRAWINGS
SHEET 78A OF 93

SITE 28

- DENOTES IMPACTS IN SURFACE WATER (POND)
- DENOTES IMPACTS IN SURFACE WATER
- DENOTES TEMPORARY IMPACTS IN SURFACE WATER



PROJECT REFERENCE NO.	SHEET NO.
U-2525B	33
R/W SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

PERMIT DRAWINGS
SHEET 78B OF 93

PROJECT REFERENCE NO.	SHEET NO.
U-2525B	33
R/W SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER

TRUSTEES OF NEW LIFE CHAPEL
AND THEIR SUCCESSORS IN OFFICE

PRELIMINARY
DO NOT DIS

DO NOT DIS

SITE 29

BOBBY R. SUMMERS

(151)

Grealdine M. Bishop

(149)

Darrel J. Trapp

(147)

Ronald E. Stanley

CHRISTOPHER W. STANLEY &
RHONDA A. STANLEY

-Y24- POT Sta. 10+00.00

GEORGE V. BETTY O. TROGDON

DOUGLAS J. EDWARDS

JOSEPH T. MABE &
TREBA D. MABE

MARION BISHOP, JR.

JERRY WADE SHOE

-Y29- POT Sta. 16+80.92
-Y28- POT Sta. 12+00.61

-Y22RPA- PT Sta. 27+34.06

SANDRA O. DEAN &
REBECCA O. HAWKS

MARION BISHOP, JR.

JOSEPH T. MABE &
TREBA D. MABE

-Y22RPA- SC Sta. 24+33.25

Arnold Brinkley

(146)



NORTH CAROLINA DEPARTMENT
OF TRANSPORTATION

-Y22RPA- SRS Sta. 22+33.25

BRENDIA I. GERRINGER

(144)

BRENDIA I. GERRINGER

CLASS "B" RIP RAP
W/FILTER FABRIC
EST. 1 TON
EST. 5 SY FABRIC

-Y22RPA- CS Sta. 20+23.25

-Y22LPA- CS Sta. 20+56.20

-Y22LPA- ST Sta. 22+56.20
-Y13- POT Sta. 85+21.99 5900 LF

-Y22- POT Sta. 21+09.12 =
-Y22LPA- POT Sta. 10+00.00

NOTE: SYSTEM DRAINAGE PIPES THAT ARE LOCATED INSIDE
OF THE PROP. LOOPS ARE TO BE LAID BENEATH THE
PROP. CURB AND GUTTER.

COLLAR AND EXTEND

ROD AND LUG
WELBOWS

CLASS "B" RIP RAP
W/FILTER FABRIC
EST. 1 TON
EST. 5 SY FABRIC

RETAIN

RETAIN

RETAIN

RETAIN

RETAIN

Conv. DI To JB

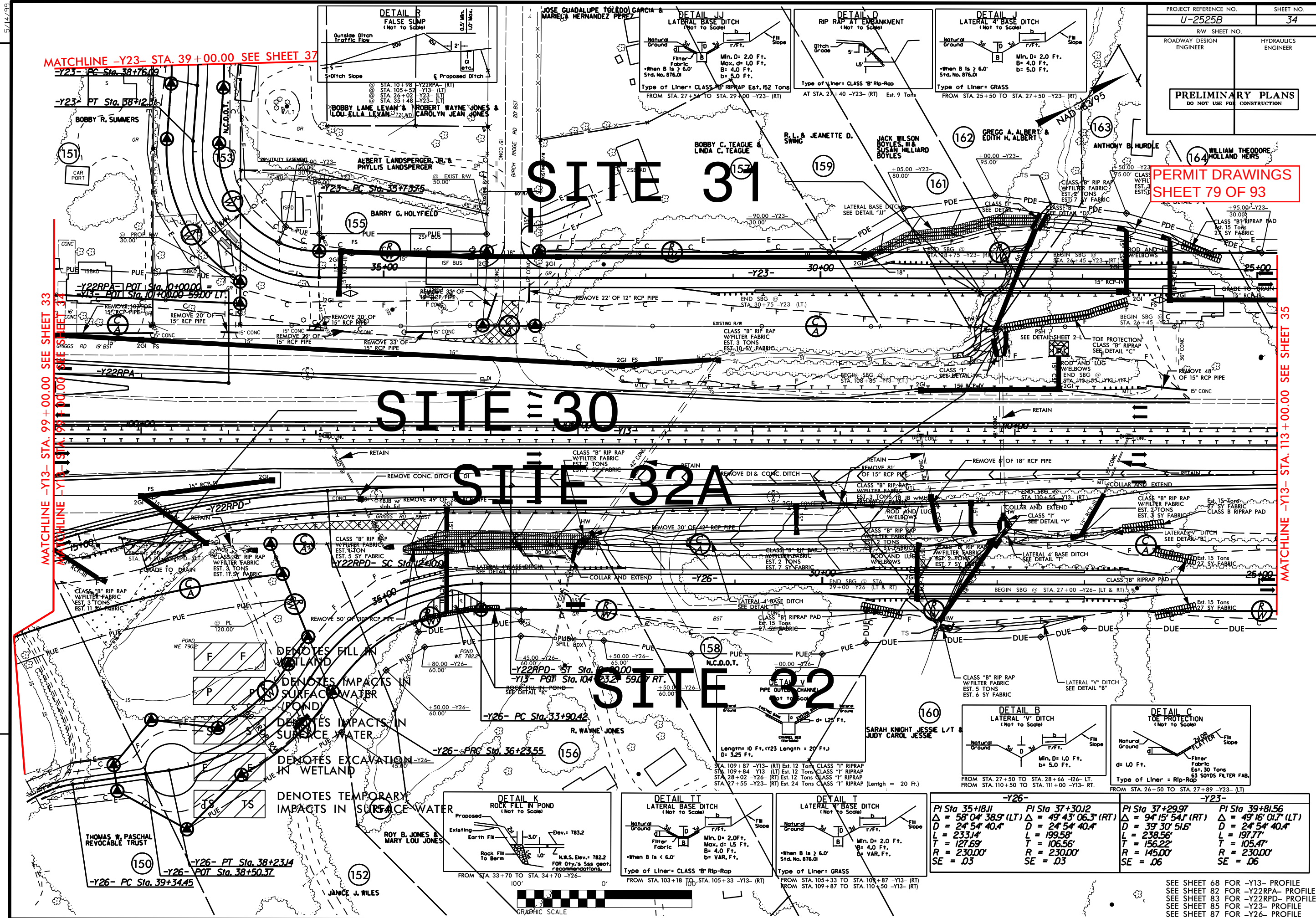
CONC

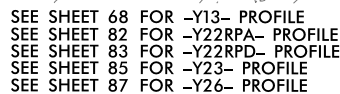
2GI

15" CONC

GR

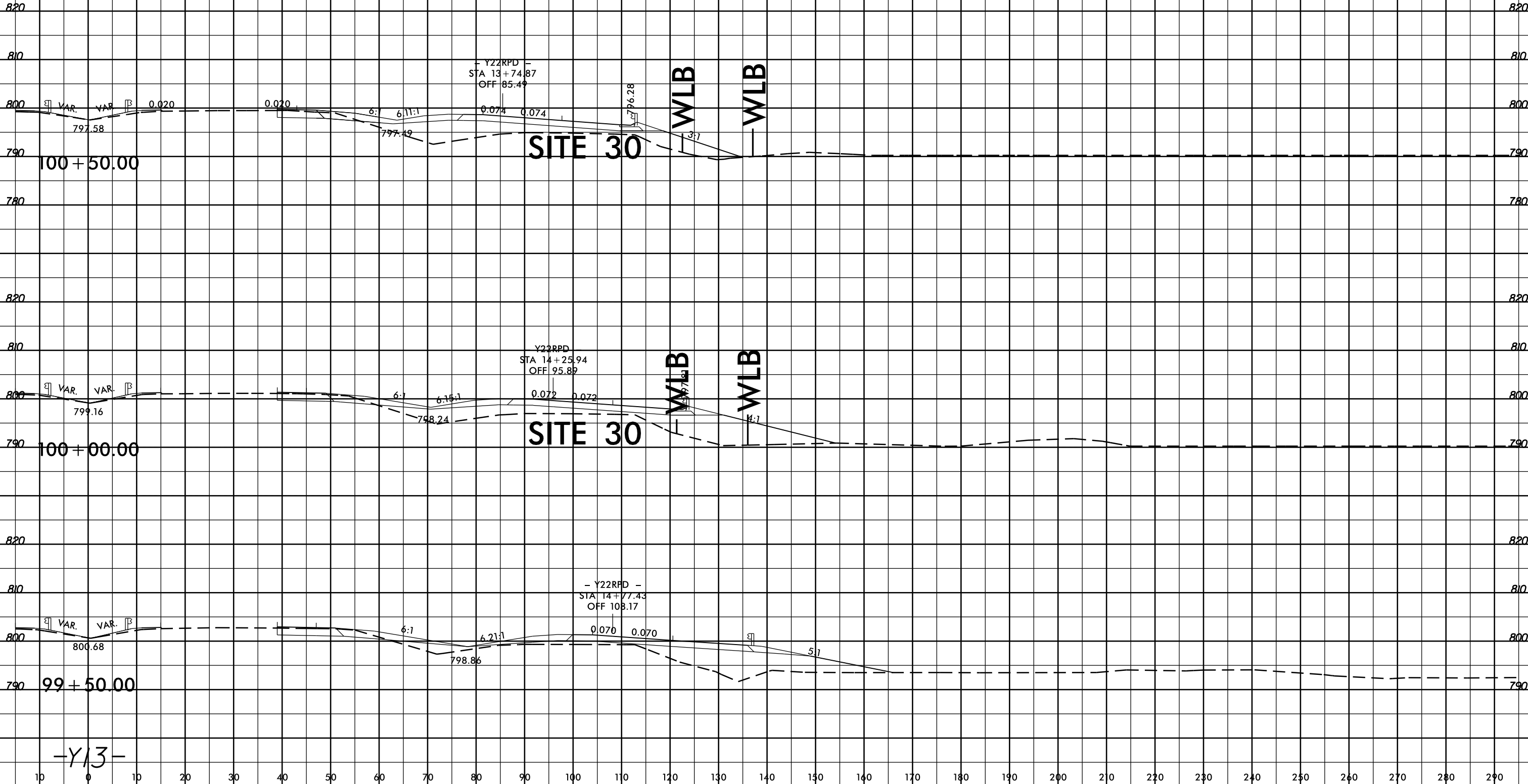
ws/Slab Ed.





8/23/99

PERMIT DRAWINGS
SHEET 81 OF 93



SYTIME
DRAWN
USER

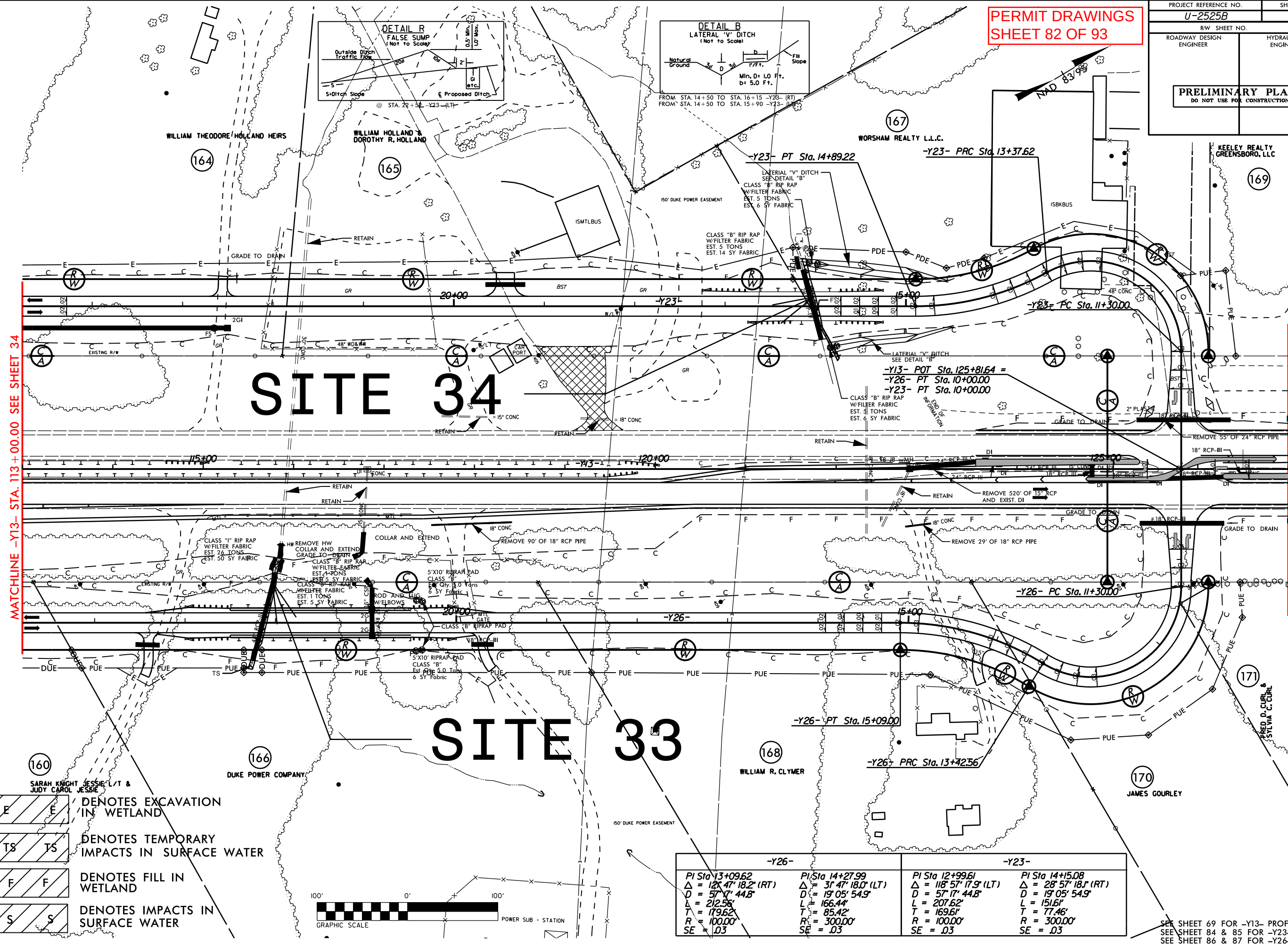
-Y13-

5/14/99

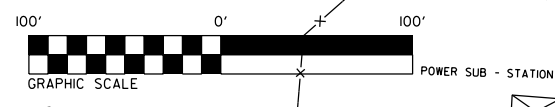
REVISIONS
03-19-13 R/W REVISION (DWG) - REVISED THE PROPERTY OWNER NAME ON PARCEL 168 (KENNETH C. CLYMER) TO WILLIAM R. CLYMER.
REVISED THE PROPERTY OWNER NAME ON PARCEL 169 (CHARLES A. KEELEY) TO KEELEY REALTY GREENSBORO, LLC.

PERMIT DRAWINGS
SHEET 82 OF 93

PROJECT REFERENCE NO.	SHEET NO.
U-2525B	35
R/W SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
PRELIMINARY PLANS DO NOT USE FOR CONSTRUCTION	



- DENOTES EXCAVATION IN WETLAND
- DENOTES TEMPORARY IMPACTS IN SURFACE WATER
- DENOTES FILL IN WETLAND
- DENOTES IMPACTS IN SURFACE WATER



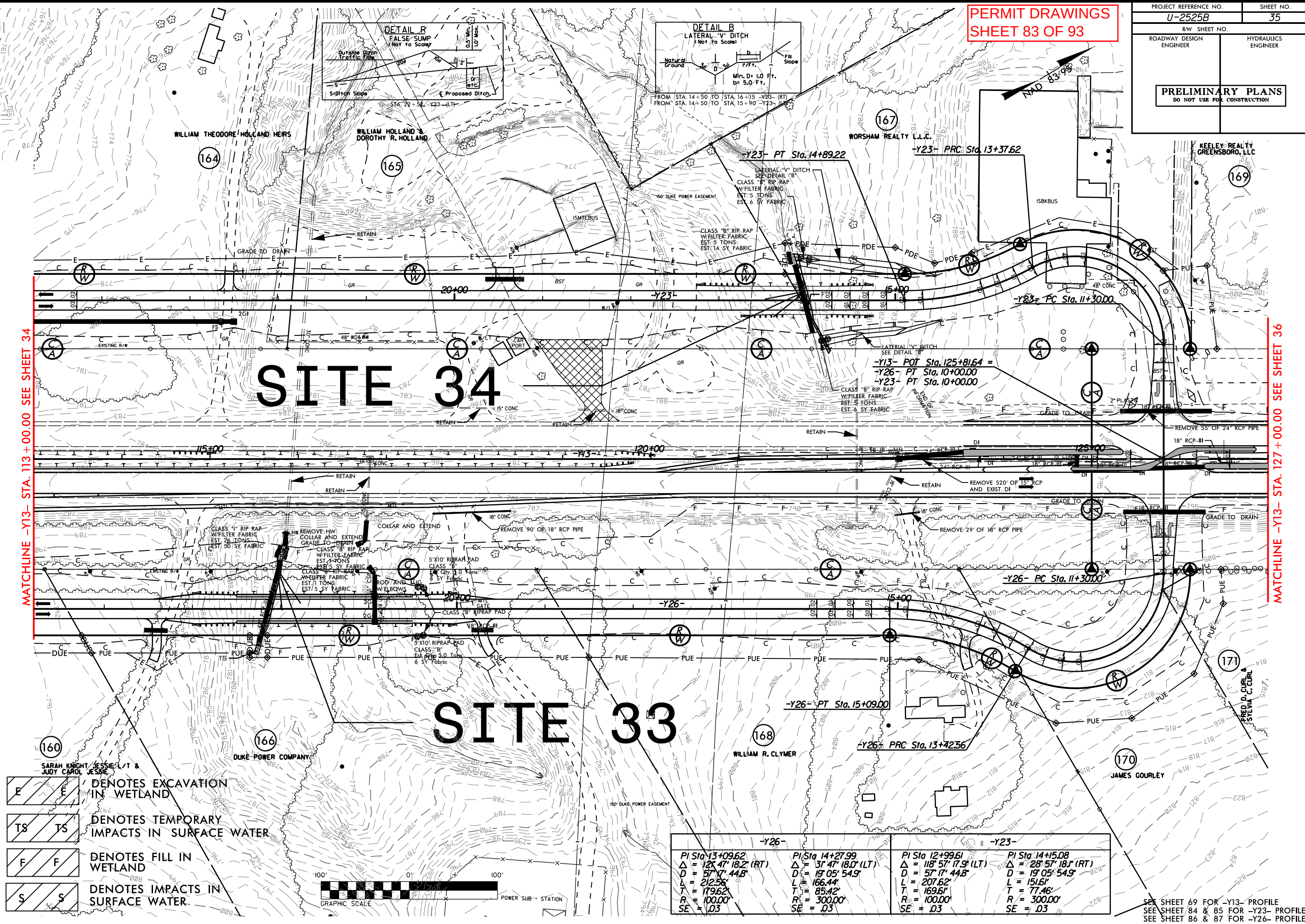
-Y26-	-Y26-	-Y23-	-Y23-
PI Sta 13+09.62 Δ = 12° 47' 18.2" (RT) D = 57' 17" 44.8" L = 212.58' T = 119.62' R = 100.00' SE = .03	PI Sta 14+27.99 Δ = 31° 47' 18.0" (LT) D = 19' 05' 54.9" L = 166.44' T = 85.42' R = 300.00' SE = .03	PI Sta 12+99.61 Δ = 118° 57' 17.9" (LT) D = 57' 17" 44.8" L = 207.62' T = 169.61' R = 100.00' SE = .03	PI Sta 14+15.08 Δ = 28° 57' 18.1" (RT) D = 19' 05' 54.9" L = 151.61' T = 77.46' R = 300.00' SE = .03

SEE SHEET 69 FOR -Y13- PROFILE
SEE SHEET 84 & 85 FOR -Y23- PROFILE
SEE SHEET 86 & 87 FOR -Y26- PROFILE

MATCHLINE -Y13- STA. 113+00.00 SEE SHEET 34

MATCHLINE -Y13- STA. 127+00.00 SEE SHEET 36

REVISIONS



DETAIL AB
SPECIAL CUT DITCH

6'-0"

0'

1:1

14'-0"

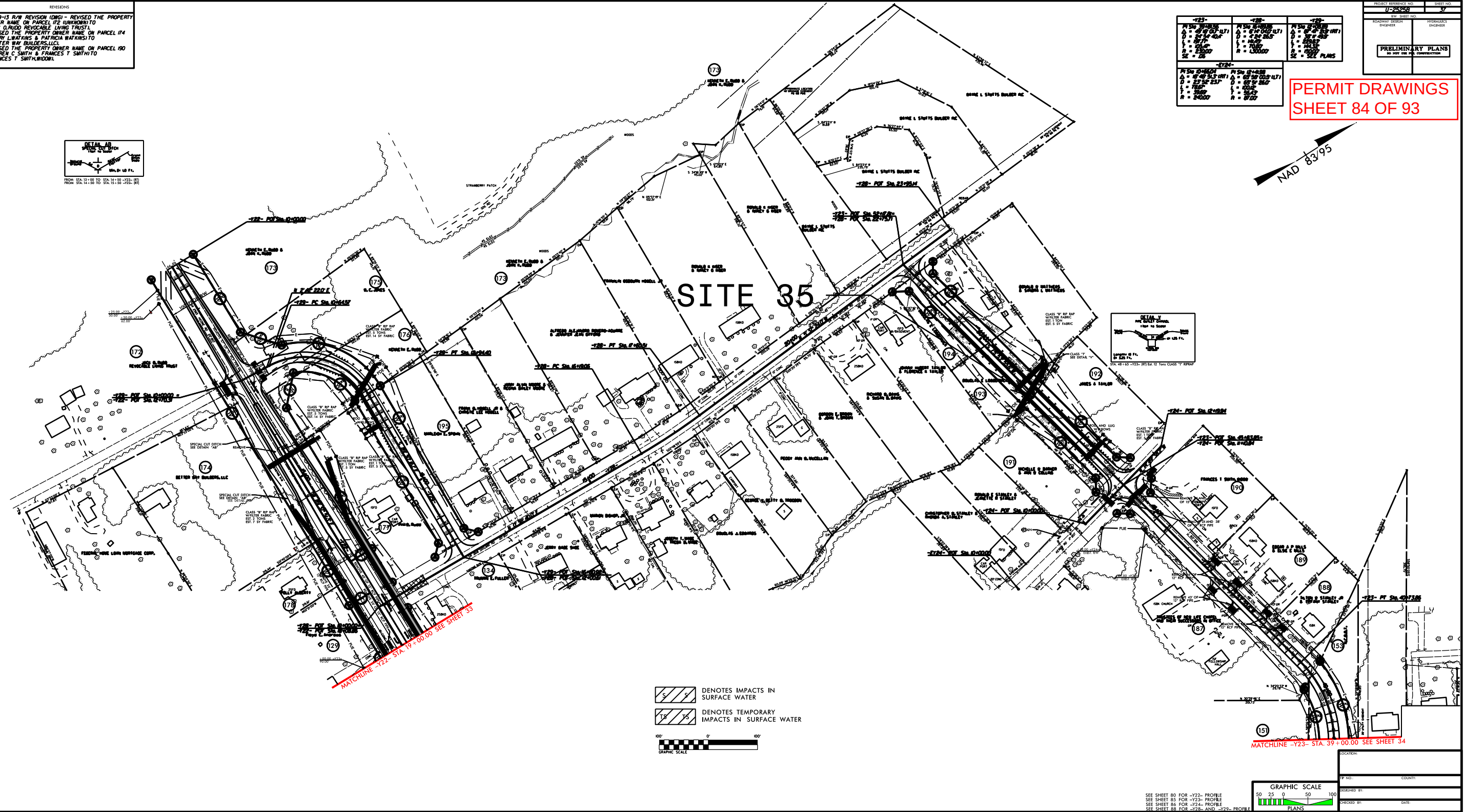
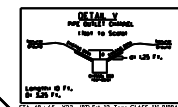
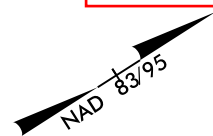
Min. 8' LG Fl.

FROM STA. 13+00 TO STA. 14+50 -Y22- (RT)
FROM STA. 14+50 TO STA. 15+50 -Y22- (RT)

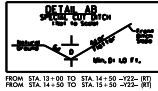
[illegible]

PROJECT REFERENCE NO.		SHEET NO.	
U-2525B		37	
DRAWING SHEET NO.			
ROADWAY DESIGN ENGINEER		HYDRAULICS ENGINEER	
PRELIMINARY PLANS DO NOT USE FOR CONSTRUCTION			

PERMIT DRAWINGS
SHEET 84 OF 93



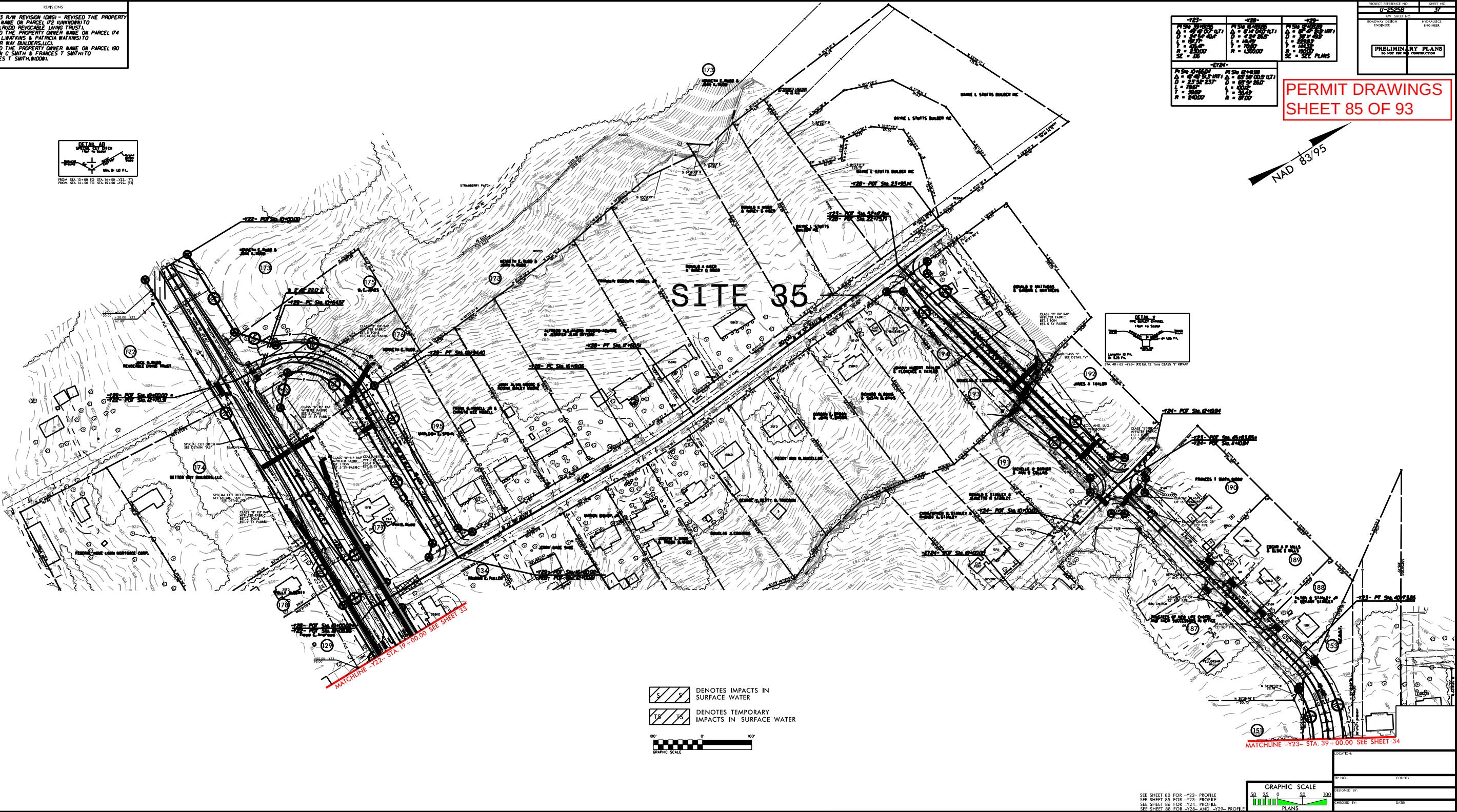
REVISIONS
03-19-13 R/W REVISION (000) - REVISED THE PROPERTY OWNER NAME ON PARCEL 172 (UNKNOWN) TO JACK D. RUDD REVOCABLE LIVING TRUST.
REVISED THE PROPERTY OWNER NAME ON PARCEL 174 (TERRY L. WATKINS & PATRICIA WATKINS) TO BETTER WAY BUILDERS, LLC.
REVISED THE PROPERTY OWNER NAME ON PARCEL 190 (WARREN C. SMITH & FRANCES T. SMITH) TO FRANCES T. SMITH, WOODHILL.



STATION	VERTICAL CURVE DATA	VERTICAL CURVE DATA	VERTICAL CURVE DATA
173	PT. OF VERTICAL CURVE Δ = 1.50% L = 100.00' PVI = 173+00.00' ELEVATION = 100.00'	174	PT. OF VERTICAL CURVE Δ = 1.50% L = 100.00' PVI = 174+00.00' ELEVATION = 100.00'
175	PT. OF VERTICAL CURVE Δ = 1.50% L = 100.00' PVI = 175+00.00' ELEVATION = 100.00'	176	PT. OF VERTICAL CURVE Δ = 1.50% L = 100.00' PVI = 176+00.00' ELEVATION = 100.00'
177	PT. OF VERTICAL CURVE Δ = 1.50% L = 100.00' PVI = 177+00.00' ELEVATION = 100.00'	178	PT. OF VERTICAL CURVE Δ = 1.50% L = 100.00' PVI = 178+00.00' ELEVATION = 100.00'

PROJECT REFERENCE NO. 172-0000	SHEET NO. 85
ROADWAY DESIGN ENGINEER	PROJECT ENGINEER
PRELIMINARY PLANS NO POST AND NO CONSTRUCTION	

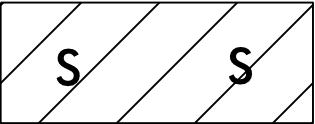
PERMIT DRAWINGS
SHEET 85 OF 93



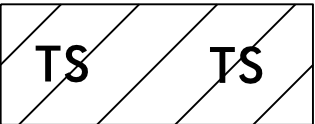
SEE SHEET 80 FOR -172- PROFILE	DESIGNED BY:	COUNTY:
SEE SHEET 81 FOR -173- PROFILE	CHECKED BY:	DATE:
SEE SHEET 82 FOR -174- PROFILE		
SEE SHEET 83 FOR -175- AND -176- PROFILE		

PROJECT REFERENCE NO.	SHEET NO.
U-2525B	37
R/W SHEET NO.	
ROADWAY DESIGN ENGINEER	HYDRAULICS ENGINEER
PRELIMINARY PLANS DO NOT USE FOR CONSTRUCTION	

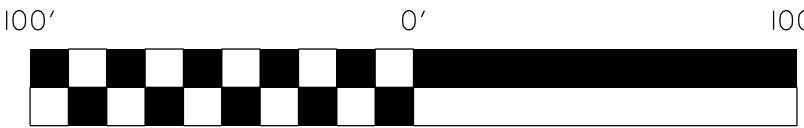
PERMIT DRAWINGS
SHEET 86 OF 93



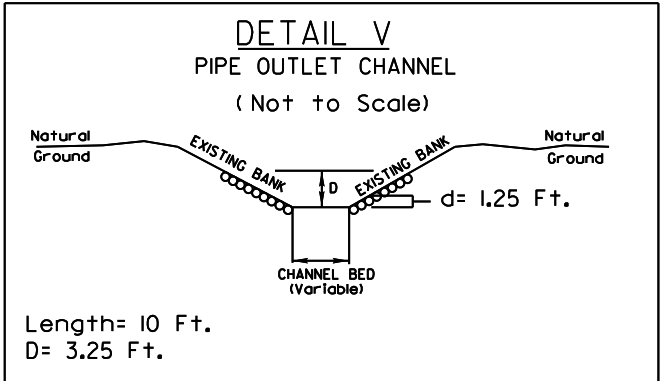
DENOTES IMPACTS IN
SURFACE WATER



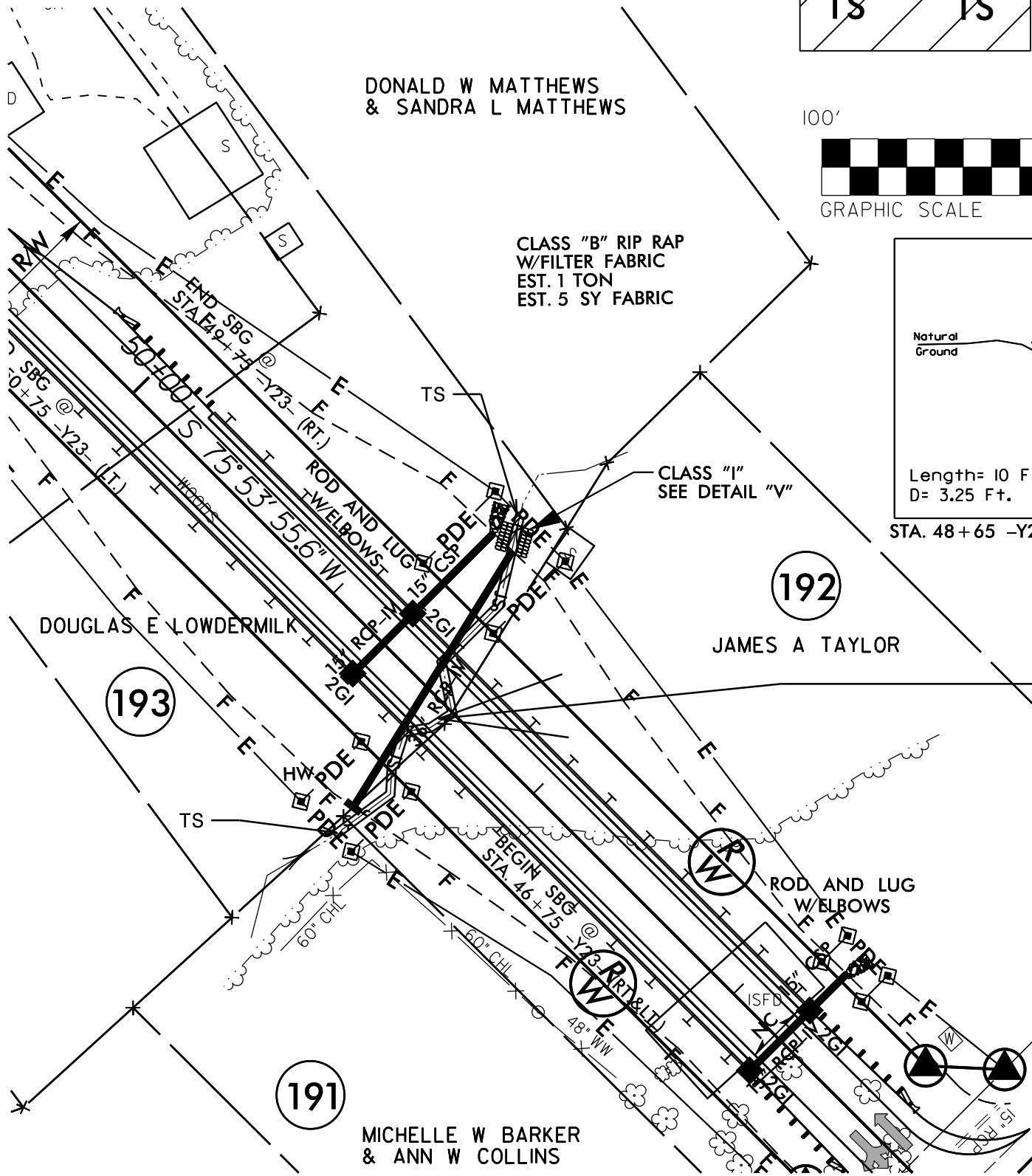
DENOTES TEMPORARY
IMPACTS IN SURFACE WATER



GRAPHIC SCALE



STA. 48+65 -Y23- (RT) Est. 12 Tons CLASS "I" RIPRAP



SITE 35

03-19-13 R/W REVISION (ONG) - REVISED THE PROPERTY OWNER NAME ON PARCEL 168 (KENNETH C. CLYMER TO WILLIAM R. CLYMER).
REVISED THE PROPERTY OWNER NAME ON PARCEL 169 (CHARLES A. KEELEY TO KEELEY REALTY GREENSBORO, LLC).

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
1	27+25 -Y3RPA- (RT) TO 47+94 -L- (LT)	30" RCP	0.57		0.04			0.09		1684		
1A	24+84 -Y3RPA- (LT) 12+26 -Y3RPA- (LT)		0.03									
1B	37+76 -L- (LT) TO 38+18 -L- (LT)		0.01									
2	24+84 -Y3RPD- (LT)	24" RCP	0.05			<0.01						
3	38+87 -L- (LT) TO 40+30 -L- (LT)		0.12									
3A	41+86 -L- (RT) TO 43+15 -L- (LT)		0.03									
3B	44+26 -L- (LT) TO 44+86 -L- (LT)		0.02									
3C	46+46 -L- (LT) TO 47+70 -L- (RT)		0.25		0.02	0.02						
SUBTOTALS:			1.08		0.06	0.03		0.09		1684		

PERMIT DRAWINGS
SHEET 87 OF 93

NOTE: Rounded totals are based upon sum of actual impacts.
Also, Site 1 has 332 linear feet of intermittent stream at 1:1 mitigation; 1352 linear feet of perennial stream at 2:1 mitigation.

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

GUILFORD COUNTY
WBS - 34821.1.1 (U-2525B)

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
4	48+65 -L-	2 @ 9' X 9' RCBC	0.02					0.10	0.04	394	153	
	Bank Stabilization									98		
5	59+31 -L- (RT) TO	66" RCP, 24" RCP, &						0.09	<0.01	1117	20	
	81+35 -L- (LT)	42" RCP										
	Restoration							0.04		481		1307
5A	66+14 -L- (LT) TO		0.08									
	68+72 -L- (LT)											
5B	70+32 -L- (LT) TO		0.02									
	71+59 -L- (LT)											
6	21+56 -Y4 RPB-(LT) TO		0.03					0.01		138	10	
	22+00 -Y4 RPB- (RT)											
6A	22+11 -RPB-(RT) TO		0.05			<0.01						
	22+75 -RPB-(RT)											
7	77+25 -L-(LT) TO		1.29		0.05	0.03						
	25+57 -RPC-(RT)											
8	93+50 -L- TO		0.83			0.09						
	95+95 -L-(LT)											
SUBTOTALS:			2.32		0.05	0.12		0.24	0.04	2228	183	1307

PERMIT DRAWINGS

SHEET 88 OF 93

Revised 10/15/13

NOTE: Rounded totals are based upon sum of actual impacts.

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

GUILFORD COUNTY
WBS - 34821.1.1 (U-2525B)

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
8A	33+23 -EY4-				<0.01							
9	95+78 -L- (LT) TO 102+77 -L-(RT)	15" RCP	2.01			0.15		0.03	<0.01	462	10	
9A	101+78 -L- (LT) TO 102+19 -L-(LT)	42" RCP						<0.01		84		
10	113+64 -L- (LT) TO 117+08 -L-(RT) Bank Stabilization	2 @ 7' X 8' RCBC			<0.01			0.03	<0.01	212	29	
10A	114+23 -L- (RT) TO 115+15 -L-(RT)		0.02			0.02						
10B	115+19 -L- (LT) TO 116+17 -L-(RT)		0.03		<0.01	<0.01						
10C	116+15 -L- (LT) TO 117+08 -L-(RT)		0.25		0.04							
11	123+22 -L- (LT) TO 127+94 -L-(RT) Bank Stabilization		0.33							18		
SUBTOTALS:			2.64		0.05	0.17		0.06	<0.01	873	39	

PERMIT DRAWINGS

SHEET 89 OF 93

Revised 10/15/13

NOTE: Rounded totals are based upon sum of actual impacts.

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

GUILFORD COUNTY
WBS - 34821.1.1 (U-2525B)

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
12	156+90 -L-	66" RCP						0.03	<0.01	286	22	
	Bank Stabilization									30		
13	174+72 -L- (RT)	DUAL BRIDGES	0.02			0.01		0.01		*169	7	
	Bank Stabilization									10		
14	182+76 -L-	48" RCP						0.03	<0.01	347	35	
	Bank Stabilization									10		
15	189+55 -L-	60" RCP						0.03	<0.01	292	26	
	Bank Stabilization									20		
16	195+35 -L-	66" RCP	<0.01					0.05	<0.01	382	43	
	Bank Stabilization									12		
17	14+26 -Y10A- (RT)	15" RCP						<0.01	<0.01	51	20	
18	218+00 -L- TO	2 @ 7' X 8' RCBC	0.03			0.01		0.03	<0.01	241	10	
	219+51 -L- (RT)											
	POND							0.04				
	Bank Stabilization									30		
	Restoration								<0.01		10	386
19	230+21 -L- (RT) TO				0.14							
	230+83 -L- (LT)											
20	239+57 -L- (LT) TO	2 @ 8' X 8' RCBC						0.09	<0.01	520	39	
	245+33 -L- (RT)											
	Relocation							0.06	<0.01	295	10	362
SUBTOTALS:			0.05		0.14	0.02		0.46	0.03	2695	222	748

PERMIT DRAWINGS

SHEET 90 OF 93

NOTE: Rounded totals are based upon sum of actual impacts.

*SITE 13 - Has 32 feet of non-migitable stream impact.

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

GUILFORD COUNTY
WBS - 34821.1.1 (U-2525B)

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
20A	239+59 -L- (LT) TO							0.04	<0.01	236	29	
	241+22 -L- (LT)											
20B	11+05 -LCD- (RT) TO		0.02					<0.01		29		
	11+57 -LCD-											
21	16+35 -Y13LPD-	24" RCP	0.34			0.04		0.03	<0.01	374	10	
22	17+40 -Y13RPB- (RT) TO		0.03									
	17+81 -Y13RPB- (RT)											
22A	16+67 -Y13RPB- (LT) TO	36" RCP	0.02					0.01	<0.01	142	10	
	17+13 -Y13RPB- (LT)											
	Bank Stabilization									10		
22B	17+21 -Y13RPB- (LT) TO		0.01									
	17+46 -Y13RPB- (LT)											
23	16+35 -Y4A- (RT)	18" RCP	0.02				<0.01					
24	36+00 -Y4-	36" RCP	0.19				0.02					
25	33+80 -Y11- (RT)	24" RCP							<0.01	12	10	
	Bank Stabilization									12		
26	29+38 -Y13RPC-	60" RCP						0.03	<0.01	319	11	
	Bank Stabilization									12		
SUBTOTALS:			0.62			0.04	0.03	0.11	0.01	1146	70	

PERMIT DRAWINGS
SHEET 91 OF 93

NOTE: Rounded totals are based upon sum of actual impacts.

SITE 20A requires 1:1 mitigation.

SITE 23 & 24 Have <0.01 ac. of Temp. Fill in Wetlands in Hand Clearing areas for erosion control measures.

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

GUILFORD COUNTY
WBS - 34821.1.1 (U-2525B)

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
27	50+09-LACFLY- (RT)TO 51+53-LACFLY- (LT)	54" RCP	0.10					0.01	<0.01	215	10	
28	31+25 -Y21- (RT) TO 27+81-Y21- (RT) POND	30" RCP						0.03		461		
								0.58				
29	22+88 -Y22RPA- Bank Stabilization	30" RCP & 18" RCP						0.02	<0.01	290	4	
										10		
30	13+63 -Y22 RPD- TO 15+35 -Y22 RPD-	15" RCP W/ 2GI	0.03		<0.01							
31	16+35 -Y23- Bank Stabilization	66" RCP						0.03	<0.01	191	27	
										21		
32	34+30 -Y26- (LT)	12" RCP						0.03				
32A	28+37 -Y26- Bank Stabilization	48" RCP						0.01	<0.01	151	25	
										28		
33	22+14 -Y26- Bank Stabilization	48" RCP						0.01	<0.01	115	10	
										17		
34	16+03 -Y23-	24" RCP	<0.01									
SUBTOTALS:			0.14		<0.01			0.74	<0.01	1499	76	

NOTE: Rounded totals are based upon sum of actual impacts.

PERMIT DRAWINGS
SHEET 92 OF 93

NC DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS

GUILFORD COUNTY
WBS - 34821.1.1 (U-2525B)

WETLAND PERMIT IMPACT SUMMARY												
Site No.	Station (From/To)	Structure Size / Type	WETLAND IMPACTS					SURFACE WATER IMPACTS				
			Permanent Fill In Wetlands (ac)	Temp. Fill In Wetlands (ac)	Excavation in Wetlands (ac)	Mechanized Clearing in Wetlands (ac)	Hand Clearing in Wetlands (ac)	Permanent SW impacts (ac)	Temp. SW impacts (ac)	Existing Channel Impacts Permanent (ft)	Existing Channel Impacts Temp. (ft)	Natural Stream Design (ft)
35	48+53 -Y23- Bank Stabilization	36" RCP						<0.01	<0.01	120	17	
										10		
	THIS SHEET	SUBTOTALS:						<0.01	<0.01	130	17	
SUBTOTALS OF ALL OTHER:			6.85	0.00	0.31	0.38	0.03	1.70	0.09	10125	590	2055
TOTALS:			6.85	0.00	0.31	0.38	0.03	1.72	0.10	10255	607	2055

PERMIT DRAWINGS
 SHEET 93 OF 93
 Revised 10/15/13

NOTE: Rounded totals are based upon sum of actual impacts.

NC DEPARTMENT OF TRANSPORTATION
 DIVISION OF HIGHWAYS

 GUILFORD COUNTY
 WBS - 34821.1.1 (U-2525B)

SHEET
 4/8/2013