

**NORTH CAROLINA DEPARTMENT OF TRANSPORTATION  
GEOTECHNICAL UNIT BORING LOG**

**NORTH CAROLINA DEPARTMENT OF TRANSPORTATION  
DIVISION OF HIGHWAYS  
GEOTECHNICAL UNIT CORE BORING REPORT**

PROJECT NO: 8.2572901	PROJECT ID: B-3690	COUNTY: Randolph	GEOLOGIST: J.K. STICKNEY
SITE DESCRIPTION: Bridge 163 over Brush Creek on SR 2641	BORING LOCATION (STA): 18+18.25	DRILLER: R.S. HINSON	DRILL MACHINE: CME-550
BORING NO: B4-B	PERSONNEL: DH RSH,JKS,	CORE SIZE: NXWL	DATE STARTED: 08/27/02
COLLAR ELEV: 409.38	DRILL MACHINE: CME-550	DATE COMPLETED: 08/27/02	
TOTAL DEPTH: 33.25	DRILL EQUIP: NXWL/NXCAS/		

PROJECT NO 8.2572901		ID B-3690		COUNTY RANDOLPH		GEOLOGIST JAY K. STICKNEY						
SITE DESCRIPTION BRIDGE#163 OVER BRUSH CREEK ON SR 2641						GND WATER						
BORING NO B4-B		NORTHING 0.00		EASTING 0.00		0 HR 5.00ft						
ALIGNMENT L		BORING LOCATION 18+25.000		OFFSET 9.90ft RT		24 HR N/A						
COLLAR ELEV 409.38ft		TOTAL DEPTH 33.25ft		START DATE 8/27/02		COMPLETION DATE 08/27/02						
DRILL MACHINE CME-550				DRILL METHOD NW CAS/NXWL		HAMMER TYPE AUTOMATIC						
SURFACE WATER DEPTH				DEPTH TO ROCK 5.70ft		Log B4-B, Page 1 of 1						
ELEV	DEPTH	BLOW CT			PEN (ft)	BLOWS PER FOOT				SAMPLE NO	LOG	SOIL AND ROCK DESCRIPTION
		6in	6in	6in		0	25	50	75			
409.38												Ground Surface
	4.40	25	75	0.9								0-3.2' RESIDUAL
												3.2' -4.5' WEATHERED ROCK
												4.5' - 5.7' ROCK. TRICONE REFUSAL AT BASE
												5.7' -33.25' ROCK
												TRICONE REFUSAL AT 5.7', CORE TO END OF HOLE AT 33.25

ELEV. (FT)	DEPTH (FT)	DRILL RATE (MIN/1.0 FT)	RUN NO.	REC % (FT)	RQD % (FT)	SAMPLE NO.	FIELD CLASSIFICATION AND REMARKS
403.68	5.7	2.86	1	78.5%	39%		5.7' to 10' Moderate to moderately severely weathered moderately hard close fractured crystalline rock with cleavage parallel 70 degree dip joints. Rock is light-colored and fine grained, possibly metamorphosed welded tuff.
400.88	8.5	3.07	2	92%	84%		
395.88	13.5	1.7	3	100%	78%		10' to 24' Hard, very slightly weathered with close to moderately close spaced fractured crystalline rock. Joints are cleavage parallel with 70 degree dip.
390.88	18.5	2.16	4	97.9%	91.6%		
386.08	23.3	1.4	5	88.4%	23%		24' to 29' Moderately hard, very close fractured, slightly more weathered, crystalline rock. Possibly metamorphosed welded tuff.
380.88	28.5	1.75	6	86.3%	75.8%		29' to 32.6' Hard, fresh crystalline rock with moderately close spaced cleavage parallel, 70 degree dip fractures. Rock may be metamorphosed tuffaceous volcanic.
376.13	33.25						

NOTES