

Table 32. Descriptions of sediments sampled along Hinton Creek and other tributaries to the First Broad River - continued.

Block	Station number	Sample number	Material sampled	Depth of sample below surface of flood plain (feet)	Screening characteristics										Minerals in concentrate																																														
					Plus 1/4 inch			Minus 1/4 - plus 1/8 inch			Minus 1/8 inch		Weight of concentrate (grams)	Sieve fraction		Monazite		Ilmenite		Rutile		Zircon		Garnet		Kyanite		Sillimanite		Magnetite	Hematite	Staurolite	Tourmaline	Amphibole, pyroxene, biotite	Epidote	Quartz	Others																								
					Volume ratio	Composition (percent)	Maximum intermediate dimension (inches)	Volume ratio	Composition (percent)	Sand Volume ratio	Silt and clay Abundance	Mesh		Percent of concentrate	Percent of concentrate	Pounds per cubic yard	Percent of concentrate	Pounds per cubic yard	Percent of concentrate	Pounds per cubic yard	Percent of concentrate	Pounds per cubic yard	Percent of concentrate	Pounds per cubic yard	Percent of concentrate	Pounds per cubic yard	Percent of concentrate	Pounds per cubic yard	Percent of concentrate									Pounds per cubic yard																							
																																							Percent of concentrate																						
																																							Percent of concentrate																						
D	15	52-CS-838	Riffle gravel	0	20	70 gar-hirgrn, 20 pag, 10 gty, tr. calc-silicate	2 1/2	1	60 hirgrn, 30 pag, 10 gty	9		57.0	45	63	1		17	-	-	-	-		39		-	-	1		-	-	-	-	tr	-	5																										
												100	33	1		13	-	-	-	-		11		-	-	1		-	-	-	-	2	-	5																											
												170	4	tr		3	-	-	-	-		1		-	-	tr		-	-	-	-	tr	-	tr																											
												Total		2	0.2	33	3.8	-	-	-	-		51	5.8	-	-	tr	0.2	tr	-	-	-	2	-	10																										
	16	52-CS-837	Riffle gravel	4 1/2	20	75 gar-hirgrn, 20 pag, 5 gty	6	2	40 hirgrn, 40 pag, 20 gty	7		57.0	45	68	2		48	-	-	-	-		10		-	-	tr		-	-	-	-	-	-	7																										
												100	29	1		17	-	-	-	-		4		-	-	1		-	-	-	-	tr	-	6																											
												170	3	tr		2	-	-	-	-		1		-	-	tr		-	-	-	-	-	-	tr																											
												Total		3	0.3	67	7.6	tr	-	-	-	1	0.1	15	1.7	-	-	1	0.1	tr	-	-	-	tr	-	13																									
	17	52-CS-836	Riffle gravel	8	22	60 gar-hirgrn, 25 pag, 15 gty	6	2	70 hirgrn, 20 pag, 10 gty	8		51.5	45	37	1		13	-	-	-	-		22		-	-	-		-	-	-	-	-	1	tr																										
												100	56	3		32	-	-	-	-		18		-	-	2		-	-	-	-	-	tr	1																											
												170	7	1		5	-	-	-	-		1		-	-	tr		-	-	-	-	-	-	tr																											
												Total		5	0.5	50	5.1	tr	-	-	-	tr	-	41	4.2	-	-	2	0.2	tr	-	-	-	-	1	1																									
	18	52-CS-832	Bank silt	7	-	-	-	-	-	14	20	95.2	45	22	1		11	-	-	-	-		9		-	-	-		-	-	-	-	1	-	tr																										
												100	60	3		36	-	-	-	-		12		-	-	1		-	-	-	-	tr	2	tr	4																										
												170	18	2		11	-	-	-	-		1		-	-	tr		-	-	-	-	tr	1	tr	1																										
												Total		6	1.2	58	11.6	1	0.2	3	0.6	22	4.4	-	-	1	0.2	tr	-	-	-	-	tr	4	tr	5																									
		52-CS-833	Bank gravel	5 1/2	7	40 hirgrn, 40 pag, 20 gty	3	4	35 hirgrn, 35 pag, 30 gty	9	12	50.0	45	54	1		28	-	-	-	-		24		-	-	tr		-	-	-	-	tr	-	1																										
												100	40	4		25	-	-	-	-		8		-	-	tr		-	-	-	-	tr	1	-	2																										
												170	6	1		4	-	-	-	-		1		-	-	tr		-	-	-	-	-	tr	tr	tr																										
												Total		6	0.7	57	6.7	tr	-	-	-	tr	-	33	3.9	-	-	tr	-	tr	-	-	-	1	tr	3																									
		52-CS-834	Bank silt	3	-	-	-	-	-	4	30	27.3	45	43	1		18	-	-	-	-		22		-	-	tr		-	-	-	-	1	-	1																										
												100	51	3		26	-	-	-	-		10		-	-	1		-	-	-	-	2	-	8																											
												170	6	1		4	-	-	-	-		1		-	-	tr		-	-	-	-	-	-	tr																											
												Total		5	0.3	48	2.8	tr	-	-	-	tr	-	33	1.9	-	-	1	0.06	tr	-	-	-	1	3	-	9																								
		52-CS-835	Riffle gravel	9	20	60 gar-hirgrn, 30 pag, 10 gty	6	3	50 pag, 30 hirgrn, 20 gty	9		22.1	45	57	2		15	-	-	-	-		28		-	-	2		-	-	-	-	2	tr	6																										
												100	39	1		19	-	-	-	-		12		-	-	1		-	-	-	-	tr	2	1	2																										
												170	4	tr		3	-	-	-	-		1		-	-	tr		-	-	-	-	tr	-	tr																											
												Total		3	0.1	37	1.6	tr	-	-	-	tr	-	41	1.8	-	-	3	0.1	tr	-	-	-	tr	4	1	8																								
	19	52-CS-831	Riffle gravel	5 1/2	16	40 gty, 30 gar-hirgrn, 30 pag, tr. aplite	4	4	50 gty, 25 pag, 25 hirgrn	9		79.7	45	59	1		35	-	-	-	-		17		-	-	-		-	-	-	-	1	1	2																										
												100	35	2		14	-	-	-	-		7		-	-	-		-	-	-	-	tr	1	tr	9																										
												170	4	1		3	-	-	-	-		tr		-	-	tr		-	-	-	-	tr	tr	tr	tr																										
												Total		4	0.6	52	8.3	1	0.2	2	0.3	24	3.8	-	-	1	0.2	2	-	-	-	-	tr	2	1	11																									
	20	52-CS-830	Riffle gravel	6	20	30 gar-hirgrn, 30 pag, 30 pag, 10 gty, tr. calc-silicate	4 1/2	2	50 pag, 25 hirgrn, 25 gty	9		219.6	32	21	-		2	-	-	-	-		19		-	-	-		-	-	-	-	-	-	-	-																									
												45	39	1		12	-	-	-	-		25		-	-	-		-	-	-	-	tr	tr	tr	1																										
												100	35	1		17	-	-	-	-		8		-	-	tr		-	-	-	-	tr	3	tr	6																										
												170	5	1		2	-	-	-	-		1		-	-	tr		-	-	-	-	tr	tr	tr	1																										
												Total		3	1.3	33	14.5	tr	-	-	-	tr	-	53	23.2	-	-	tr	-	tr	-	-	-	tr	3	tr	8																								
E	21	52-CS-857	Riffle gravel	4 1/2	17	50 gar-hgrn, 30 pag, 20 gty	4	2	40 gty, 40 hgrn, 20 pag	15		47.2	32	23	-		2	-	-	-	-		21		-	-	-		-	-	-	-	-	-	-	-																									
												45	31	1		4	-	-	-	-		11		-	-	tr		-	-	-	-	3	-	8																											
												100	41	2		14	-	-	-	-		14		-	-	1		-	-	-	-	4	1	4																											
												170	4	1		3	-	-	-	-		tr		-	-	tr		-	-	-	-	tr	tr	tr	tr																										
												Total		4	0.4	23	2.2	1	0.09	1	0.09	46	4.3	-	-	1	0.09	1	3	-	-	7	1	12																											
	22	52-CS-856	Riffle gravel	3 1/2	19	60 gar-hgrn, 30 pag, 10 gty, tr. ky	3	1	40 gty, 40 hgrn, 20 pag	8		106.9	45	56	9		15	-	-	-	-		22		-	-	-		-	-	-	-	4	1	4																										
												100	37	3		14	-	-	-	-		7		-	-	1		-	-	-	-	tr	3	tr	8																										
												170	6	1		3	-	-	-	-		tr		-	-	tr		-	-	-	-	tr	tr	tr	1																										
												Total		13																																															