STATE OF VERMONT
AGENCY OF TRANSPORTATION
MATERIALS & RESEARCH SECTION
SUBSURFACE INFORMATION

BORING NUMBER: B304b
SHEET 1 of 5
DATE STARTED: 6/27/13
DATE COMPLETED: 7/01/13

PROJECT NAME: Newport City STP 134-3(22)
SITE NAME: Route 191 Landslide
STATION: -
OFFSET: -
VTSPG: N 888287.70 ft E 1721197.05 ft

PROJECT NUMBER: GAI 133-87312
SITE NUMBER: -
GROUND ELEVATION: 800.75 ft
GROUNDWATER DEPTH: 31.8 ft 7/01/13
PROJECT PIN NUMBER: -

BORING CREW: New Hampshire Boring
DRILLER: Bub Thompson
LOGGER: Helena Hollauer
BORING RIG: CME-750

BORING TYPE: WASH BORE
SAMPLE TYPE: SPLIT BARREL
HAMMER TYPE: ROPE & CATHEAD
CHECKED BY:

DEPTH (ft)	SYMBOL	CLASSIFICATION OF MATERIALS (Descrptlon)	WELL DIAGRAM	BLOWS PER 6 IN (N VALUE)	M.C. (%)	AASHTO GRAVEL (%)	AASHTO SAND (%)	AASHTO FINES (%)	LL (%)	PI (%)
		Top of Well Elevation: 803.26 ft								
		S1: 0,0 ft - 0,33 ft, Topsoil and root mat, [Top 4"], Rec. = 1,25 ft 0,33 ft - 2,0 ft, A-1-b, medium brown, slightly moist, medium dense, fine to medium SAND, some silt, trace gravel, (FILL), (SM), [Bottom 7"].		2-5-9-10 (14)						
		S2: 5,0 ft - 7,0 ft, A-1-b, medium brown, slightly moist, medium dense, fine to medium SAND, some silt, trace gravel, 1" seam of gray clayey silt, (FILL), (SM),. Rec. = 1,5 ft		4-13-29-30 (42)						
		S3: 10,0 ft - 12,0 ft, A-2-4, gray-brown, moist, medium dense, fine to coarse SAND, some silt, little gravel, (FILL), (SM),. Rec. = 1,0 ft		4-9-7-9 (16)	15.1	14.8	51.7	33.5		
		S4: 15,0 ft - 17,0 ft, A-4, gray and gray-brown, moist, dense, alternating seams and pockets of fine to medium sandy SILT and silty fine to medium SAND, trace gravel, trace roots, (SM),. Rec. = 1,5 ft		14-22-27-33 (49)						
		S5: 20,0 ft - 22,0 ft, A-4, gray and gray-brown, moist, dense, alternating seams and pockets of fine to medium sandy SILT and silty fine to medium SAND, trace gravel, possible mixing of FILL and NATIVE soil, (SM),. Rec. = 1,17 ft		15-19-16-21 (35)						

LOG OF BORING & WELL NEWPORT.GPJ VT AOT.GDT 8/13/14

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		S6: 25,0 ft - 27,0 ft, A-4, gray and gray-brown (mottled), wet, medium dense, alternating seams and pockets of fine to medium sandy SILT and silty fine to medium SAND, trace gravel, trace roots, (SM),. Rec. = 1,17 ft		11-11-5-5 (16)						
		S7: 30,0 ft - 32,0 ft, A-4, gray and gray-brown (mottled), moist, medium dense, alternating seams and pockets of fine to medium sandy SILT and silty fine to medium SAND, trace gravel, trace roots, (ML),. Rec. = 0,83 ft		11-9-8-6 (17)	15.0	5.3	44.3	50.4		
		S8: 35,0 ft - 37,0 ft, A-4, dark brown-gray, wet, loose, SILT some organics (roots, peat fibers), trace wood, trace gravel, trace fine to coarse sand, trace clay, buried wetands TOPSOIL, (ML-OL),. Rec. = 0,17 ft 37,0 ft, Note: 3" split spoon used from 37 ft to EOB.		3-2-7-10 (9)						
		S9: 40,0 ft - 42,0 ft, A-4, brown-gray, moist, medium dense, fine to medium sandy SILT, trace gravel (very weathered subangular phyllite and rounded gravel), trace clay, (ML),. Rec. = 1,17 ft		19-16-10-9* (26)	12.9	11.0	34.2	54.8		
		S10: 45,0 ft - 47,0 ft, A-1-a, gray and brown, wet, dense, fine to coarse sandy GRAVEL, rounded with angular rock fragments, (GP),. Rec. = 0,67 ft		25-24-24-28* (48)						

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		S11: 50,0 ft - 52,0 ft, A-4, dark gray, moist, very dense, silty fine to medium SAND, little gravel, trace coarse sand, (SM),. Rec. = 0,58 ft		18-29-29-42* (58)	8.5	24.7	36.6	38.7		
		S12: 55,0 ft - 57,0 ft, A-4, dark gray, moist, very dense, silty fine to medium SAND, some gravel, (SM),. Rec. = 1,33 ft		17-33-30-68* (63)						
		S13: 60,0 ft - 62,0 ft, A-6, dark gray, moist, hard, silty CLAY, little gravel (rounded), (CL). PP = 1,5, 2,5, 2,25, 3,5 tsf Tv = 4,5 tsf, Rec. = 1,67 ft 64,0 ft, Soil heaved overnight from 65 ft to 64 ft.		19-36-46-34* (82)	23.4	12.9	1.2	85.9	39	16
		S14: 65,0 ft - 67,0 ft, A-7-6, dark gray, slightly moist, hard, silty CLAY, varved with fine sand, (CL). PP = 3,5, 4,5, 4,25, 4,25 tsf Tv = 8 tsf, Rec. = 1,67 ft		35-29-34-50* (63)						
		S15: 70,0 ft - 72,0 ft, A-7-6, dark gray, slightly moist, hard, silty CLAY, varved with fine sand, (CL),. Rec. = 1,83 ft		24-27-30-40* (57)	28.0				41	18

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HAMMER TYPE: ROPE & CATHEAD
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		S16: 75,0 ft - 77,0 ft, A-4, dark gray, slightly moist, hard, fine to medium silty SAND, little gravel (rounded), (SM),. Rec. = 1,83 ft		25-40-44-48* (84)						
		S17: 80,0 ft - 82,0 ft, A-4, dark gray, slightly moist, hard, fine to medium silty SAND, little gravel (rounded), (SM),. Rec. = 1,83 ft		20-37-40-44* (77)	11.5	14.3	36.8	48.9		
		S18: 85,0 ft - 86,5 ft, A-4, dark gray, slightly moist, hard, silty fine to medium SAND, trace gravel (rounded), (SM),. Rec. = 1,5 ft		49-85-100/6"* (R)						
		S19: 90,0 ft - 91,5 ft, A-4, dark gray, slightly moist, hard, SILT, some fine sand, trace gravel, (ML),. Rec. = 1,5 ft		63-70-90/6"* (R)						
		S20: 95,0 ft - 97,0 ft, A-4, dark gray, slightly moist, hard, SILT, some fine sand, little clay, trace gravel, (ML),. Rec. = 1,67 ft		30-40-29-46* (69)	14.0	5.5	27.3	67.2		

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		S21: 100,0 ft - 100,5 ft, A-4, dark gray, very dense, SILT, few pockets of silty clay, possible slide zone, [Top 6"],. Rec. = 1,17 ft 100,5 ft - 102,0 ft, A-7-6, medium brown, slightly moist, silty CLAY, slightly varved. (CH) [Bottom 8"]. 103,0 ft - 104,0 ft, Driller indicated color change in the wash.		15-19-36-41* (55)						
		S22: 105,0 ft - 107,0 ft, A-7-6, brown-gray, moist, hard, CLAY, trace fine sand layers, fissured, (CH-MH),. Rec. = 1,25 ft 108,0 ft, Suspected transition to varved clay.		21-27-43-40* (70)	31.5				62	31
		S23: 110,0 ft - 112,0 ft, A-7-5, brown-gray, moist, hard, silty CLAY, little fine sand layers, varved, (CH-MH). PP = 0,7, 1,5 tsf, Rec. = 0,67 ft		7-12-21-24* (33)	29.6	12.0	0.9	87.1		
		S24: 115,0 ft - 117,0 ft, A-7-5, brown-gray, moist, hard, silty CLAY, trace fine sand layers, varved, (CH-MH), thicker sand varves (approx. 0,5" thick) in the top of spoon. PP = 1,9 tsf, Rec. = 1,5 ft		12-16-21-23* (37)	38.1				60	29
		117,0 ft - 119,0 ft, A-7-5, U1: Shelby tube attempted, (Rec. 2,3 ft) 300 psi for 0-12" 1000 psi for 12-24"			36.7	0.0	1.2	98.8	54	23
		Hole stopped @ 119.0 ft								

Notes:
- * 3" spoon used below 37ft, N-Values should not be used for design.
- 2" well screen set 87 to 98,5 ft, Sand pack from 87 to 98,5 ft, Bentonite chips from 85 to 87 ft and 98,5 to 105,5 ft, Grouted from 85 ft to ground surface.

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