

	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-1 (9/01)	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Cascade Drilling
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 15'	START : 9/7/01 END : 9/7/01 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)		STANDARD PENETRATION TEST RESULTS 6"-6"-6" (N)	CORE DESCRIPTION
INTERVAL (FT)	RECOVERY (IN)		
Headspace	PID (ppm)		SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
0-0.5' 0.5'-16' 5 10 15 16'-20' 20	1.3 1.1 1.1 1.0 0.9	Water level	Asphalt (3") and Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, moist Soil sample collected at 6 feet Well graded sand (SW) ranging from medium to fine grained, brown, saturated Water sample collected at 19 feet BORING TERMINATED AT DEPTH OF 20 FEET
25 30 35 40			Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips

	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-2 (9/01)	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Cascade Drilling
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 15'	START : 9/10/01 END : 9/10/01 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)	RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION
		Headspace PID (ppm)	6"-6"-6" (N)	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
5	0-0.75' 0.75'-16'	0.3 0.3		Asphalt (3") & Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, moist
10		0.4		
15	16'-20'	0.6	Water level	Well graded sand (SW) ranging from medium to fine grained, brown, saturated
20		28.0		Soil sample collected at 18 feet Water sample collected at 19 feet BORING TERMINATED AT DEPTH OF 20 FEET
25				Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips
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35				
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-3 (9/01)	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Cascade Drilling
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 15'	START : 9/7/01 END : 9/7/01 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)	RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION
		Headspace PID (ppm)	6"-6"-6" (N)	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
5	0-0.75' 0.75'-3' 3'-3.5' 3.5'-16'	1.3 1.4		Poorly graded coarse gravel (GM) black, dry Well graded sand (SW) ranging from medium to fine grained, brown, moist Silty sand layer (SM) with small fragments of charred wood, moist, black Well graded sand (SW) ranging from medium to fine grained, brown, moist
10		0.8		
15	16'-20'	0.8	Water level	Well graded sand (SW) ranging from medium to fine grained, gray, saturated
20		0.5		Water sample collected at 19 feet BORING TERMINATED AT DEPTH OF 20 FEET
25				Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-4 (9/01)	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Cascade Drilling
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 12'	START : 9/7/01 END : 9/7/01 LOGGER : Patrick Heins

	DEPTH BELOW SURFACE (FT)	INTERVAL (FT)	RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION
			Headspace PID (ppm)	6"-6"-6" (N)	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
5	0-0.25' 0.25'-14'		1.1		Concrete
10			1.0		Well graded sand (SW) ranging from medium to fine grained, brown, moist
15			1.2	Water level	
	14'-16'		2.4		Well graded sand (SW) ranging from medium to fine grained, gray, saturated Water sample collected at 15 feet BORING TERMINATED AT DEPTH OF 16 FEET
20					Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips
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30					
35					
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-5 (9/01)	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Cascade Drilling
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 12'	START : 9/10/01 END :9/10/01 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)		RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION				
	Headspace	PID (ppm)				TEST RESULTS	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.		
								6"-6"-6" (N)	
5	0-0.75' 0.75'-2.5'	7.1	0.1	Asphalt	Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, moist				
10	2.5'-11'	0.1	0.1	Water level	Well graded sand (SW) ranging from medium to fine grained, gray, moist with wood fib Well graded sand (SW) ranging from medium to fine grained, gray, saturated				
15	11'-12' 12'-16'	0.1	0.1		Water sample collected at 15 feet BORING TERMINATED AT DEPTH OF 16 FEET				
20					Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips				
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35									
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-6 (9/01)	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Cascade Drilling
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 15'	START : 9/10/01 END : 9/10/01 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)			STANDARD PENETRATION TEST RESULTS 6"-6"-6" (N)	CORE DESCRIPTION SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.			
	RECOVERY (IN)	Headspace	PID (ppm)					
						RECOVERY (IN)		
						RECOVERY (IN)		
0-4'	8"	1.5		Poorly graded coarse gravel (GM) brown, dry				
4'-5'		0.8		Silty sand (SM) perdominatly fine grained, brown, moist				
5'-19'		1.1		Well graded sand (SW) ranging from medium to fine grained, brown, moist				
10		0.7	Water level	Well graded sand (SW) ranging from medium to fine grained, brown, saturated				
15		1.7						
19'-20'				Silty sand (SM) perdominatly fine grained, brown, moist Water sample collected at 19'				
20				BORING TERMINATED AT DEPTH OF 20 FEET				
25				Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips				
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35								
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-01	SHEET 1 OF 1
<h2 style="margin: 0;">SOIL BORING LOG</h2>			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION :	DRILLING CONTRACTOR : <u>Geo Tech Inc.</u>
DRILLING METHOD AND EQUIPMENT USED <u>Geoprobe</u>	
WATER LEVELS <u>11'</u>	START : <u>8/29/02</u> END : <u>8/29/02</u> LOGGER : <u>Patrick Heins</u>

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)		RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS 6"-6"-6" (N)	CORE DESCRIPTION SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
	Headspace	PID (ppm)			
	Headspace	PID (ppm)			
5	0-8" 8"-2.2' 2.2'-6'	0.3			Asphalt Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, dry
10	6'-12'	0.3			Well graded sand (SW) ranging from medium to fine grained, brown, moist
15	12'-16'	0.4		Water level	Well graded sand (SW) ranging from medium to fine grained, brown, saturated
20		0.4			Water sample collected at 15 feet BORING TERMINATED AT DEPTH OF 16 FEET
25					Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-07	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Geo Tech Inc.
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 14'	START : 8/29/02 END : 8/29/02 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)	RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION
		Headspace PID (ppm)	6"-6"-6" (N)	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
5	0-0.5' 0.5'-1' 1'-5' 5'-16'	0 0		Asphalt Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, moist
10		0.1		Well graded sand (SW) ranging from medium to fine grained, brown, saturated
15		0.5	Water level	Water sample collected at 15 feet BORING TERMINATED AT DEPTH OF 16 FEET
20				Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips
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35				
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-11	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Geo Tech Inc.
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 14'	START : 8/30/02 END : 8/30/02 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)	RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION
		Headspace PID (ppm)	6"-6"-6" (N)	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.
5	0-0.5' 0.5'-5'	0.4		Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, dry
10	5'-12'	0.6		Well graded sand (SW) ranging from medium to fine grained, brown, moist
15	12'-16'	1.2		Soil sample collected at 11 feet Well graded sand (SW) ranging from medium to fine grained, brown, saturated
		4.0	Water level	Water sample collected at 15 feet. Pumped dry 3 times during purging. BORING TERMINATED AT DEPTH OF 16 FEET
20				Soil sampled continuously for logging purposes Abandoned by backfill with bentonite chips
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	PROJECT NUMBER 161844.A0.ZZ	BORING NUMBER GP-12	SHEET 1 OF 1
SOIL BORING LOG			

PROJECT : Northwest Pipe Company	LOCATION : Portland, Oregon
ELEVATION : _____	DRILLING CONTRACTOR : Geo Tech Inc.
DRILLING METHOD AND EQUIPMENT USED Geoprobe	
WATER LEVELS 14'	START : 8/30/02 END : 8/30/02 LOGGER : Patrick Heins

DEPTH BELOW SURFACE (FT)	INTERVAL (FT)		RECOVERY (IN)	STANDARD PENETRATION TEST RESULTS	CORE DESCRIPTION				
	Headspace	PID (ppm)				6"-6"-6" (N)	SOIL NAME, USCS GROUP SYMBOL, COLOR, MOISTURE CONTENT, RELATIVE DENSITY, OR CONSISTENCY, SOIL STRUCTURE, MINERALOGY.		
								TEST RESULTS	
								6"-6"-6" (N)	
5	0-0.5' 0.5'-4'	0.4			Poorly graded coarse gravel (GM) brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, dry Well graded sand (SW) ranging from medium to fine grained, brown, moist				
10	4'-11'	0.2			Well graded sand (SW) ranging from medium to fine grained, brown, moist				
15	11'-16'	2.4			Well graded sand (SW) ranging from medium to fine grained, brown, saturated				
		19.3		Water level	Soil sample collected at 13 feet Water sample collected at 15 feet BORING TERMINATED AT DEPTH OF 16 FEET				
20					Soil sampled continuously for logging purposes				
25					Abandoned by backfill with bentonite chips				
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35									
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