Geologic Characterization Report

Appendix G 1986

ADMIN RECORD

91-0104

A-SW-000275

GEOLOGIC CHARACTERIZATION REPORT

APPENDIX G

COMPUTER GENERATED (LOGGER) 1986 LITHOLOGICAL LOGS

VOLUME 1 OF 2

For U.S. DOE-Rocky Flats Plant

JULY 31, 1991

EG&G ROCKY FLATS

ADMIN RECORD

REVIEWED FOR CLASSIFICATION/UI
By
Date 7/10/91

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 13 3	GROUND ELEVATION (FT)	5619 14	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	744891	AREA BUFFER EAST	CASING DIAMETER (IN)	2 10	GEOLOGIST	DAT	1-86
EAST	2093956	LOCATOR NUMBER 14	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	04/18/86	

REMARKS Mobile B-57, blade bit

Top of stainless steel casing 2 05'

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5619	0				NO SAMPLE
					5618	1				
					5617	2				
					5616	3				
				0/67	5615	4	04/18/86			
					5614	5				
					5613	6				
				13/13	5612	7			CL	SANDY CLAY, dark yellowish brown (10 YR 4/2), mod plast , some roots
					5611	8			GC	Clayey Gravel, matrix color is grayish orange (10 YR 7/4), angular to sub-angular, mod-well graded, max size 5 cm, some sand
				0/1					NO SAMPLE	Sample removed Aug 13, 1986 by Ward Host Sample sent to Chen & Associates
					5610	9			CL	CLAY (possibly well weathered claystone), is yellowish gray (5 YR 8/1) -
									CLAYSTONE	Top of Bedrock Yellowish gray (5YR 8/1) changing to grayish orange (10 YR 7/4), mod plast , bottom of interval has VF-FG sand, some calc material, some iron
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 13 3	GROUND ELEVATION (FT)	5619 14	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	744891	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	1-86
EAST	2093956	LOCATOR NUMBER U4	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	04/18/86	

REMARKS Mobile B-57, blade bit

Top of stainless steel casing 2 05'

CHEMICAL SAMPLE GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

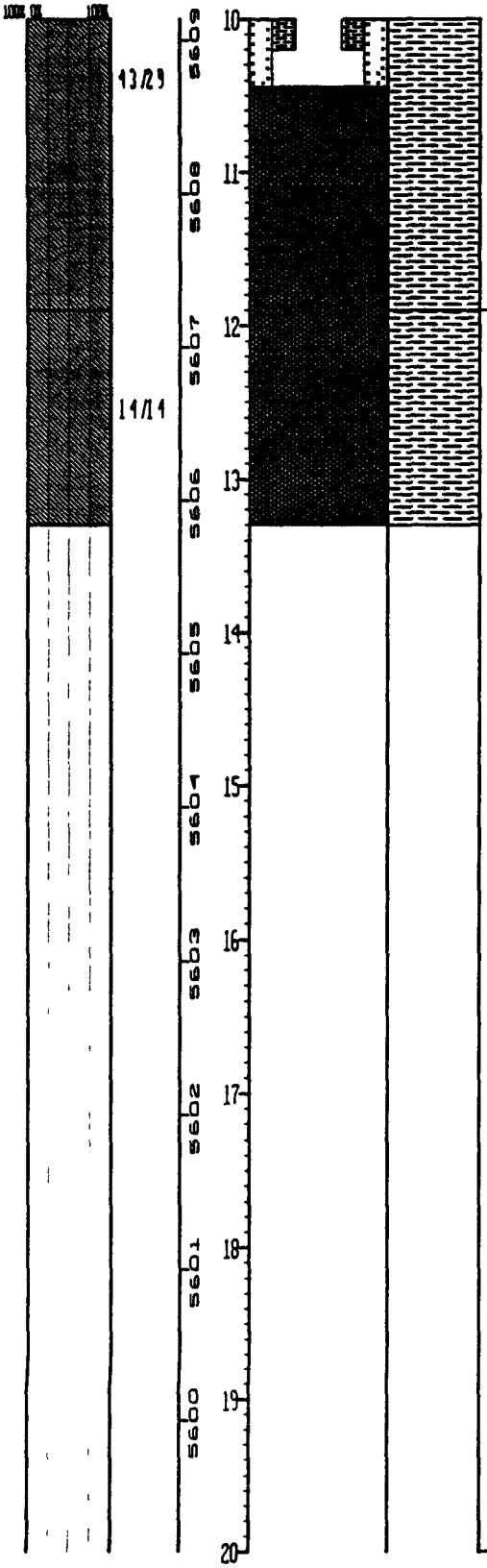
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



staining as mottles

CLAYSTONE Yellowish gray (5 YR 8/1), mod-high plast, some calc material, some iron staining as mottles, some sand

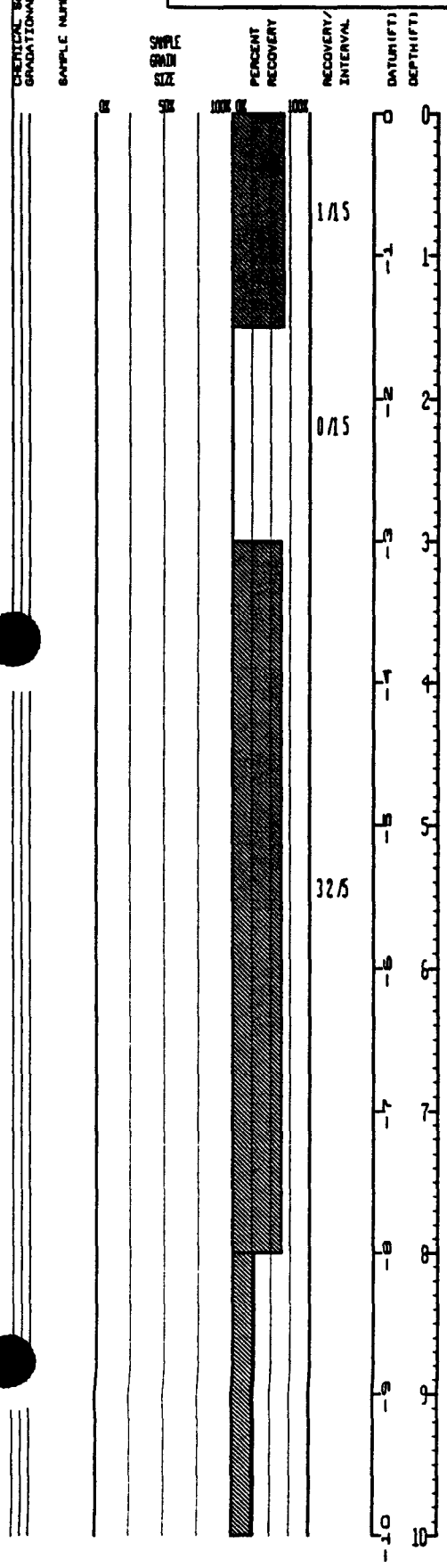
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 3	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST DAT	1-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED N/A	
REMARKS					

CHEMICAL SAMPLE GRADATIONAL SA... | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 7/1	0	CL	SANDY CLAY - dusky yellowish brown (10YR 2/2), mod - high plast, trace of gravel, trace of calc material
0/1 5	1	NO SAMPLE	Sample removed 8/13/86 by Ward Herst, sample sent to Chen & Assoc
0/0 5	2	NO SAMPLE	
	3		
	4		
	5		
	6		
	7		
	8		
	9		
	10		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN) 0	GEOLOGIST DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	

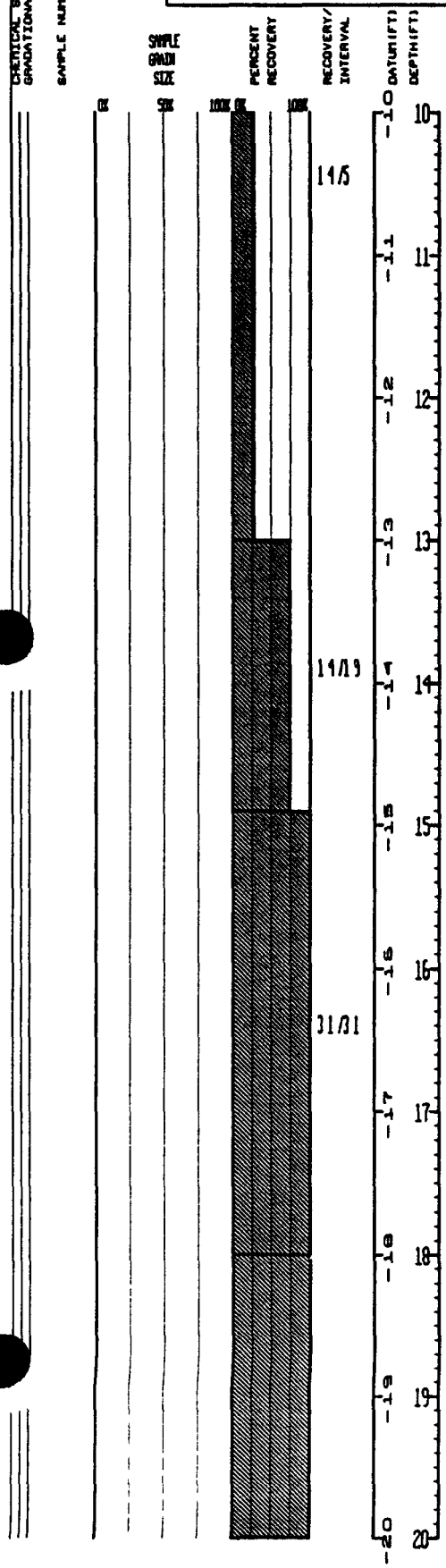
REMARKS



LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	CL	Top 3 in SANDY CLAY - dark yellowish brown (10YR 4/2), mod - poor plast , some roots, trace of gravel, sand is FG - MG Bottom of interval same as above, v pale orange (10YR 8/2), highly calcareous, some gravel
	NO SAMPLE	
	CLAYSTONE	Top of Bedrock Claystone, top 1 5 ft , approx 50% is Clay, light gray (N7), est mod plast , other interbedded 50% possibly Caliche, white (N9), some iron staining as mottles throughout
	CLAYSTONE	Calcareous Claystone, light gray (N7) grading to moderate yellowish brown (10YR 5/4) at base of interval, est mod plast , some iron staining, floury texture
	CLAYSTONE	Same as above yellowish brown (10YR 5/4) grading to light gray (N7) at base of interval, slightly calc

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN) 0	GEOLOGIST DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	

REMARKS

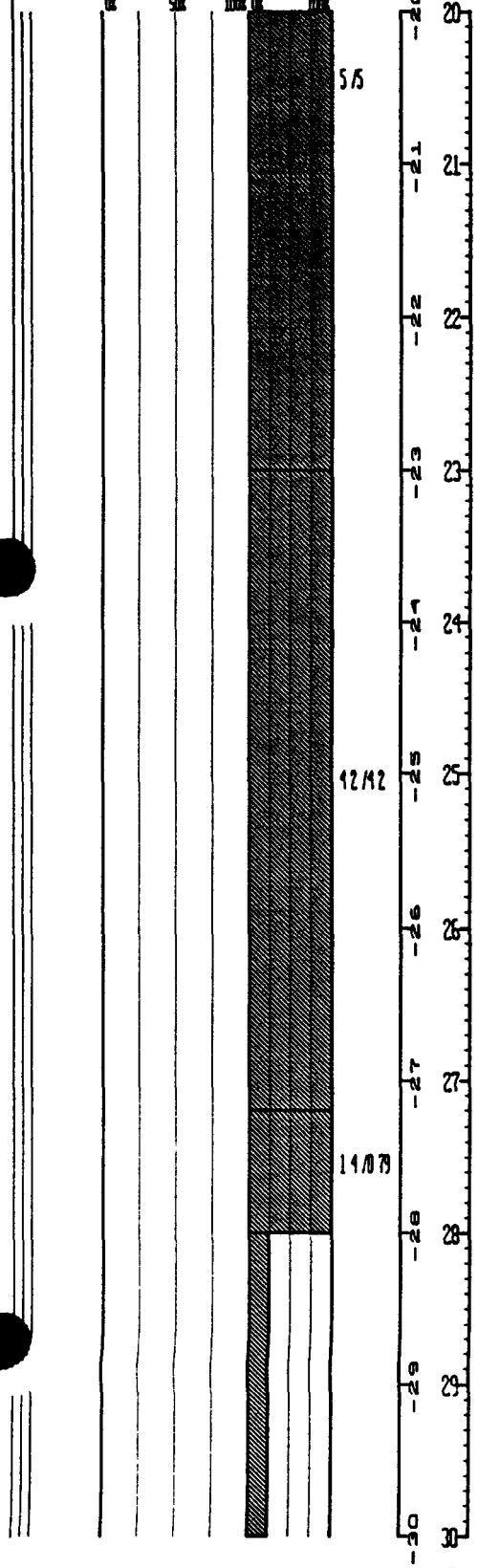


CLAYSTONE	Light gray (N7), est mod plast, some iron staining, floury texture
CLAYSTONE	Same as above light olive gray (5Y 6/1), trace carb material, trace of calc material, fairly consolidated texture
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT)	0	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN)	0	GEOLOGIST	DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE | PERCENT RECOVERY | RECOVERY / INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



CLAYSTONE	Olive gray (5Y 4/1), mod plast, some iron staining, floury texture
CLAYSTONE	Same as above, some VFG - FG sand
CLAYSTONE	Same as above grayish orange (10YR 7/4)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN) 0	GEOLOGIST DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	

REMARKS

CHEMICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SIMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OR	12/5	-30 30				
					-31 31				
					-32 32				
					-33 33			CLAYSTONE	Moderate yellowish brown (10YR 5/4), mod plast, some iron staining along fracture planes, floury texture
				11/25	-34 34				
					-35 35				
					-36 36			CLAYSTONE	Same as above
				14/25	-37 37				
					-38 38			CLAYSTONE	Same as above abundant iron staining at base of interval
				13/25	-39 39				
					-40 40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN) 0	GEOLOGIST DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	

REMARKS

CHEMICAL SAMPL GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 13/2.5; 14/2.5; 31/4.5

DATUM (FT) / DEPTH (FT): 0 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Yellowish gray (5Y 8/1), mod plast, trace of iron staining
CLAYSTONE	Same as above
CLAYSTONE	Pinkish gray (5YR 8/1), massive bedding, highly weathered, mod to poorly friable, some fractures at 45, 50, 65, 70 degrees, some iron staining, filling fractures, trace Mg staining as dendritic pattern, some silt

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT)	0	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN)	0	GEOLOGIST	DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	
REMARKS							

CHEMICAL SAMPLE/ GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

DATUM(FT) DEPTH(FT)

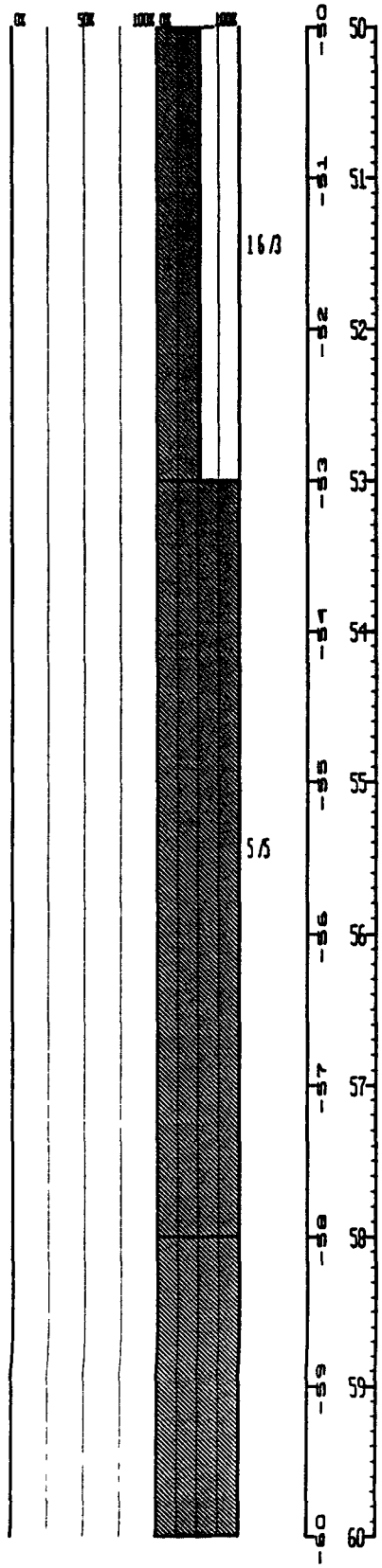
WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

	CLAYSTONE	Pinkish gray (5YR 8/1), massive bedding, highly weathered, mod to poorly friable, highly fractured, iron staining esp along fracture joints, trace of Mg staining, some VFG sand at base of interval, some silt
	CLAYSTONE	Same as above at approx 55 ft, increased silt content and iron staining for approx 6 in Bottom of interval is same as above
	CLAYSTONE	Same as above, fractures at 80 - 90 degrees



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 63	GROUND ELEVATION (FT)	0	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN)	0	GEOLOGIST	DAT	2-86A
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

CHEMICAL SAMPLE
GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRADATION SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

5/5

DATUM(FT)
DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

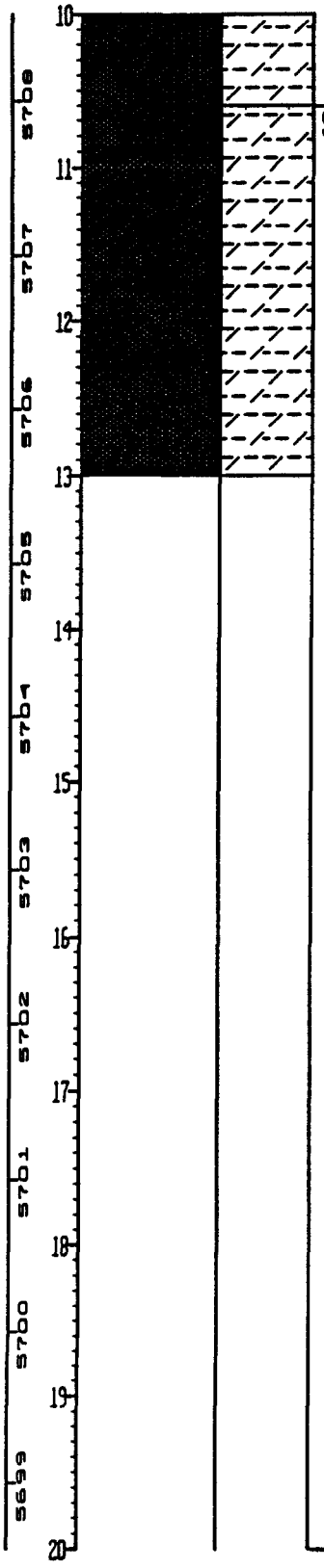
DESCRIPTION

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 13	GROUND ELEVATION (FT)	5718 57	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748753	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	2-86
EAST	2093910	LOCATOR NUMBER UB	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	04/22/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE GRADATIONAL SAM	SAMPLE NUMBER	SMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				05/05	5718	0			CL	First 0 5 ft Large cobble 13 X 8 cm, sub-rounded and dark yellowish brown SILTY CLAY (10 YR 4/2) Some roots, trace sand
				08/1		1			CALICHE	Changes rather abruptly to very pale orange (10 YR 8/2) Caliche Moderate to low plasticity Trace sand Trace gravel
					5717	2			NO SAMPLE	
					5716	3	04/22/86			
				0/59	5715	4				
					5714	5				
					5713	6				
					5712	7				
				11/08	5711	8			CL	Top of interval dark yellowish brown SILTY CLAY Some roots to very pale orange (10 YR 8/2) to white (N 9) (caliche) Some sand and gravel This interval is marked that it starts at 7 4 but looks suspiciously like soil from close to surface
					5710	9			SILTY CLAYSTONE	Top of Bedrock Same as above
				24/24	5709	10			SILTY CLAYSTONE	White to yellowish gray (N 9) to (5 YR 8/1), med to high plasticity Very calcareous (caliche)

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	13	GROUND ELEVATION (FT)	5718 57	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748753	AREA BUFFER EAST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	2-86
EAST	2093910	LOCATOR NUMBER	UB	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	04/22/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE GRADATIONAL SAM. | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



SILTY CLAYSTONE Light olive gray (5 Y 6/1) to dark yellowish orange (10 YR 6/6) Moderate to high plasticity Trace amounts of iron staining

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 28	GROUND ELEVATION (FT)	5670 76	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750501	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	3-86
EAST	2093773	LOCATOR NUMBER U10	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	04/23/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SIZE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		CR	100% CR	100%		0			CL	CLAY (top 6 in), grayish brown (5 YR 3/2), mod plast , some sand VFG-FG, some roots, trace of gravel 0 7 ft -1 8 ft some as above, moderate yellowish brown (10 YR 5/4), trace of calc material 1 8 ft -2 7 ft some as above, very light gray (N 8), some calcite, calcareous, some iron staining as mottles 2 7 ft -3 8 ft some as above, brownish gray (5 YR 4/1), some roots, surficial grass at 2 7 ft , no iron staining, non-calcareous
				3 8/1 5	5670					
				0 5/1 5	5669	2				
					5668					
					5667				CL	CLAY, dark yellowish brown (10 YR 4/2) grading to moderate yellowish brown (10 YR 5/2) grading to light brownish gray (5 YR 6/1), est mod plast , calcareous, some VFG-FG sand, some roots in top 3 in of interval, some iron staining as mottles
					5666	5				
				1 7/5	5665					
					5664					
					5663	8				
					5662				SANDY CLAYSTONE	Top of Bedrock VFG, very light gray (N 8), mod-low plast , iron staining as mottles
				1 5/2 5	5661	10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 28	GROUND ELEVATION (FT) 5670 76	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750501	AREA BUFFER EAST	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	3-86
EAST	2093773	LOCATOR NUMBER U10	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 04/23/86	
REMARKS Hollow Stem Auger					

DEPTH	CHEMICAL SAMPLE GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			CR	100% CR	15/25	5660	10				
			SDR	100%			11			SANDY SILTSTONE	VFG, moderate brown (5 YR 4/4), non-apparent bedding, well weathered, poorly friable, increased VFG-FG sand fraction at bottom of interval
						5659	12				
					1/1	5658	13			SANDY SILTSTONE	Same as above
						5657	14			SANDSTONE	Very pale orange (10 YR 8/2), non-apparent bedding, highly weathered, mod-highly friable, FG-MG, sub-angular-sub-rounded, well-mod sorted, slightly floury texture, some clay
					07/15	5656	15	04/23/86			
					04/05	5655				SANDSTONE	Same as above, consolidated texture
							16			NO SAMPLE	Sample removed by Ward Hurst, Aug 13, 1986 Sample sent to Chen & Associates
					0/2	5654	17				
						5653	18			SANDSTONE	Same as above slab shows 50 degree fractures filled w/iron staining, 10 degree laminar bedding and distorted bedding, possible slump structures, soft sed deformation
						5652	19				
					32/32	5651	20				

GEE209

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 28	GROUND ELEVATION (FT)	5670 76	PROJECT NUMBER	667 11	LOG OF BORING NUMBER	
NORTH 750501	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT		3-86
EAST 2093773	LOCATOR NUMBER U10	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	04/23/86		
REMARKS Hollow Stem Auger							

CHEMICAL SAMPLE / GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						20				
					5650	21				
				2/18	5649	22			SANDSTONE	Very pale orange (10 YR 8/2), possible distorted bedding, highly weathered, mod friability, VF6-F6, sub-angular-sub-rounded, mod-well sorted, some clay
				13/1	5648	23			CLAYSTONE	Light brownish gray (5 YR 6/1), non-apparent bedding (floury texture), well weathered, mod friable, abundant micro fractures, some iron staining along 70, 80, 10, 90 degree fractures, some carb material
				14/12	5647	24			CLAYSTONE	Some as above
				13/13	5646	25			CLAYSTONE	Some as above consolidated texture
				1/07	5645	26			CLAYSTONE	Some as above
				1/079	5644	27			SILTY CLAYSTONE	Pale yellowish brown (10YR 6/2), non-apparent bedding, well weathered, mod poorly friable, some iron staining as mottles
					5643	28				
					5642	29				
					5641	30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 18	GROUND ELEVATION (FT)	5636 6	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753439	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	4-86
EAST	2093878	LOCATOR NUMBER U13	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	04/21/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	100% 0% 100%	15/15	5636	0			CL	SANDY CLAY, dark yellowish brown (10 YR 4/2), mod plast , some gravel, some roots
						1			SC	Clayey Sand, very pale orange (10 YR 8/2), sub-angular-sub-rounded, poorly graded, increasing clay fraction at bottom 3 2 in of interval, sand is VFG-FG
				15/15	5635	2			SC	Same as above mod yellowish brown (10 YR 5/4), sand is FG-CG, slightly calc
					5634	3			CH	Clay, dark yellowish brown (10 YR 4/2), mod -high plast , some possible root holes (1-4 mm diameter) w/trace of desiccated carb material in holes, abundant iron staining filling micro-fractures, some roots, trace of gravel, some sand
				00/1	5633	4	04/01/86		NO SAMPLE	Removed Aug 13, 1986 by Ward Hurst Sample sent to Chen & Associates
					5632	5			NO SAMPLE	
				00/25	5631	6	04/23/86			
					5630	7			CL	CLAY, dark yellowish brown (10 YR 4/2), est mod plast , some sand MG-FG, v slightly calc
				18/15	5629	8				
					5628	9			GC	Clayey Gravel, dark yellowish brown (10 YR 4/2), sub-angular-sub-rounded, poorly graded, max size = 7 cm
				08/37	5627	10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	18	GROUND ELEVATION (FT)	5636 6	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753439	AREA BUFFER EAST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	4-86
EAST	2093878	LOCATOR NUMBER	U13	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	04/21/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPL
GRADATIONAL SA
SAMPLE NUMBER

SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0% 50%	100% 0% 100%		5626	10				
				11				
			5625		04/21/86			
		17/13		12			SC	Gravelly Clayey Sand, dark yellowish orange (10 YR 6/6), angular-sub-angular, mod graded, sand size = VFG-FG, max gravel size = 7 cm (at base of interval), iron staining as mottles
			5624					
		00/1	5623	13				NO SAMPLE
				14			SANDY CLAYSTONE	Top of Bedrock Sandy Claystone, light gray (N7) and grayish orange (10 YR 7/4), mod-high plast., sand is VFG-FG, trace of iron staining as mottles and nodules
			5622					
				15				
		40/4	5621					
				16				
			5620					
				17				
			5619					
				18				
			5618					
				19				
			5617	20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14		GROUND ELEVATION (FT)	5720 07	PROJECT NUMBER	667 11
NORTH	753697	AREA BUFFER EAST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA
EAST	2089803	LOCATOR NUMBER	013	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	04/21/86
REMARKS	Hollow Stem Auger	Cave From TD to 13 0'					

LOG OF BORING NUMBER

5-86

CRITICAL SAMPL
GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		04/12	5720	0			CH	Silty Clay, pale to dk yellowish brown (10 YR 4/2) Est plast mod to high Abundant roots and grass Trace of VFG sand
			5719	1				
			5718	2			GC	Clayey Gravel, no predom color Angular to sub-rounded Poorly graded Max size 6 cm Matrix dk yellowish brown (10 YR 4/2) Silty clay Trace sand VFG to VCG
		04/28	5717	3				
			5716	4				
		00/05						NO SAMPLE
		13/15	5715	5			CL	GRAVELLY CLAY, dk yellowish brown (10 YR 4/2) Est plast mod to high Some roots and grass Gravel angular to sub-angular Mod to well graded 6 cm Trace sand
			5714	6				
					02/01/87		CL	Clay, grayish orange to dk yellowish orange (10 YR 7/4 to 6/6) Est plast mod Some sand and gravel Sand VFG to granules, gravel to 1 cm
		11/2	5713	7				
			5712	8	01/01/87			
		00/14						NO SAMPLE
			5711	9			CLAYSTONE	Top of Bedrock As above Color dk yellowish brown (10 YR 4/2)
		05/06					CLAYSTONE	As above
				10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14	GROUND ELEVATION (FT)	5720 07	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753697	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	5-86
EAST	2089803	LOCATOR NUMBER 013	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	04/21/86	

REMARKS Hollow Stem Auger Cave from TD to 13 0'

CHEMICAL SAMPLE / GRADATIONAL SAMP	SAMPLE NUMBER	SAMPLE GRADI SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%							
				08/11	5710	10				NO SAMPLE
					5709	11			CLAYSTONE	Pale yellowish brown (10 YR 6/2) to dk yellowish orange (10 YR 6/6) Some silt Some iron oxide concretions
				05/09	5708	12			CLAYSTONE	Same as above
				12/12	5707	13				
					5706	14	09/08/86 ▽			
					5705	15				
					5704	16				
					5703	17				
					5702	18				
					5701	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14	GROUND ELEVATION (FT)	5806 1	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753590	AREA BUFFER NORTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	6-86
EAST	2086681	LOCATOR NUMBER N13	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/04/96	

REMARKS Hollow Stem Auger Cave from TD to 12 9'

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	0% 50%	100% 0% 100%	0 12 /0 12	sb6	0			CL	CLAY, pale yellowish brown (10 YR 6/2), moderate plasticity (est), some silt and roots
						04/01/97			
			0 /1 9	sb5	1				NO SAMPLE
				sb4	2				
					3			CL	CLAY, pale yellowish brown (10 YR 6/2), low to moderate plasticity, some silt and gravel, some plant debris in upper 0 3 ft
			1 5 /1 5	sb3					
			0 17 /0 17	sb2	4			CL	Same as above
								CL	Same as above
			0 3 /2	sb1	5				
				sb0	6				
			0 3 /1 6	5799	7			CL	CLAY as above with decrease in gravel fraction with depth
			0 2 /0 4	5798	8	01/01/97		CL	Same as above
									NO SAMPLE
			0 /2	5797	9				
					10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14	GROUND ELEVATION (FT)	5806 1	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753590	AREA BUFFER NORTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	6-86
EAST	2086681	LOCATOR NUMBER N13	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/04/86	

REMARKS Hollow Stem Auger Cave from TD to 12 9'

CHEMICAL SAMPLE GRADATIONAL SAM.	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%	0.6/1.25	5796	10			CH	Clay, light brownish gray (5 YR 6/1), moderately high plasticity, cobble at 10 0 ft , decrease in silt fraction with depth and color change below 11 25 ft to medium light gray (N6)
				0.2/0.75	5795	11			CLAYSTONE	Top of Bedrock Light brownish gray (5YR 6/1) decrease in silt fraction with depth and color change below 11 25 feet to medium light gray (N6)
				0.35/0.35	5794	12			CLAYSTONE	Same as above
				1.65/1.65	5793	13			CLAYSTONE	Same as above
					5792	14			CLAYSTONE	Same as above
					5791	15				Note No water encountered while drilling
					5790	16				
					5789	17				
					5788	18				
					5787	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 10	GROUND ELEVATION (FT)	5924 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752827	AREA LANDFILL	CASING DIAMETER (IN)	2 00	GEOLOGIST	LAA	7-86
EAST	2083977	LOCATOR NUMBER K12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/23/86	
REMARKS							

CHEMICAL SAMPLE GRADATIONAL SAM.	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%		5924			CH	Silty Clay, Dk yellowish brown (10 YR 4/2) Est plast mod to high Some grass and roots from surface Some gravel (avg size 2 5 cm) Trace sand, VFG to med grained
				13/12	5923				
					5922			CH	Same as above
				035/12	5921				
					5920			CH	Silty Clay, Dk yellowish orange (10 YR 6/6) to yellowish gray (5 Y 8/1) Plast mod to high
				115/12	5919			SILTY CLAYSTONE	Top of Bedrock Same as above
					5918			SILTY CLAYSTONE	Same as above More silt Bottom of interval has black discoloration in matrix Maybe organics (oil) (This box has a distinct odor, may be organics)
				22/12	5917				
				03/02	5916			SILTY CLAYSTONE	Same as above, some black carbonaceous material
				22/18	5915			SILTY CLAYSTONE	Same as above NOTE No water encountered while drilling

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause Fractured bed rock from 20-30'

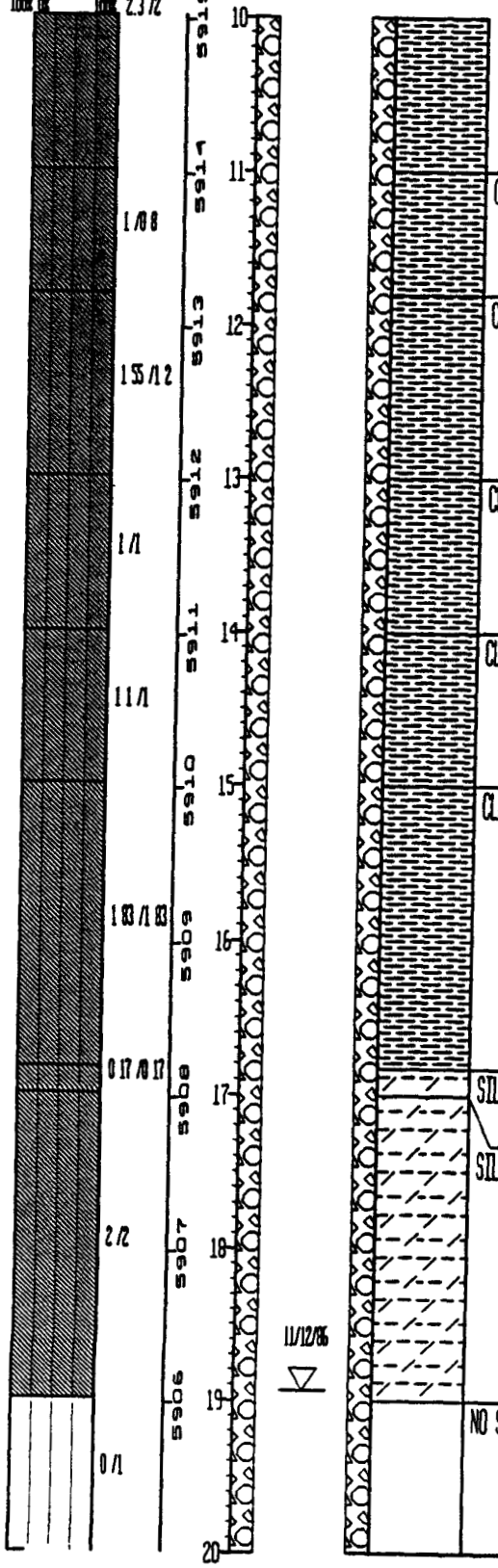
CHEMICAL SAMPLE
GRADATIONAL SAM
SAMPLE NUMBER

SAMPLE GRADI SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR	100% OR 100%	0.9/1	5925	0			CL	SANDY CLAY, moderate yellowish brown (10 YR 5/4), mod plast, some gravel (max size = 3 cm), some roots in top of interval
		0.9/1	5924	1			CLAYSTONE	Top of Bedrock Yellowish gray (5 Y 8/1), non-apparent bedding, well weathered, mod-poorly friable, some iron staining as mottles, trace of calc material at base of interval, trace of silt
		2.5/2	5923	2			CLAYSTONE	Same as above some calc material
		1.4/1	5922	3			CLAYSTONE	Same as above trace of calc material
		1.6/2	5921	4			CLAYSTONE	Same as above
		1.6/1.7	5920	5	11/10/86 ▽		CLAYSTONE	Same as above
		0.3/0.3	5919	6			CLAYSTONE	Same as above floury texture, no calc material, some silt
		2.3/2	5918	7			CLAYSTONE	Same as above
			5917	8				
			5916	9				
				10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause fractured bed rock from 20-30'

CHEMICAL SAMPLE GRADATIONAL SAM | SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% | PERCENT RECOVERY 100% 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5 Y 6/1), apparent massive bedding, well weathered, mod-highly friable, some iron staining as mottles, some silt, trace of Mg staining
CLAYSTONE	Same as above apparent horizontal bedding, trace of carb material, increased iron staining
CLAYSTONE	Same as above, increased silt fraction
CLAYSTONE	Carbonaceous, olive gray (5 Y 4/1), apparent horizontal laminar bedding, well weathered, mod friable, some silt, some iron staining as mottles, trace of horizontal coal seams (1 mm thick)
CLAYSTONE	Same as above
SILTY CLAYSTONE	Yellowish gray (5 Y 8/1), non-apparent bedding, well weathered, mod-high friability, trace of iron staining, trace of Mg staining
SILTY CLAYSTONE	Same as above, highly fractured at base of interval Very base of interval is carbonaceous and olive black (5 Y 2/1)
NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause fractured bed rock from 20-30'

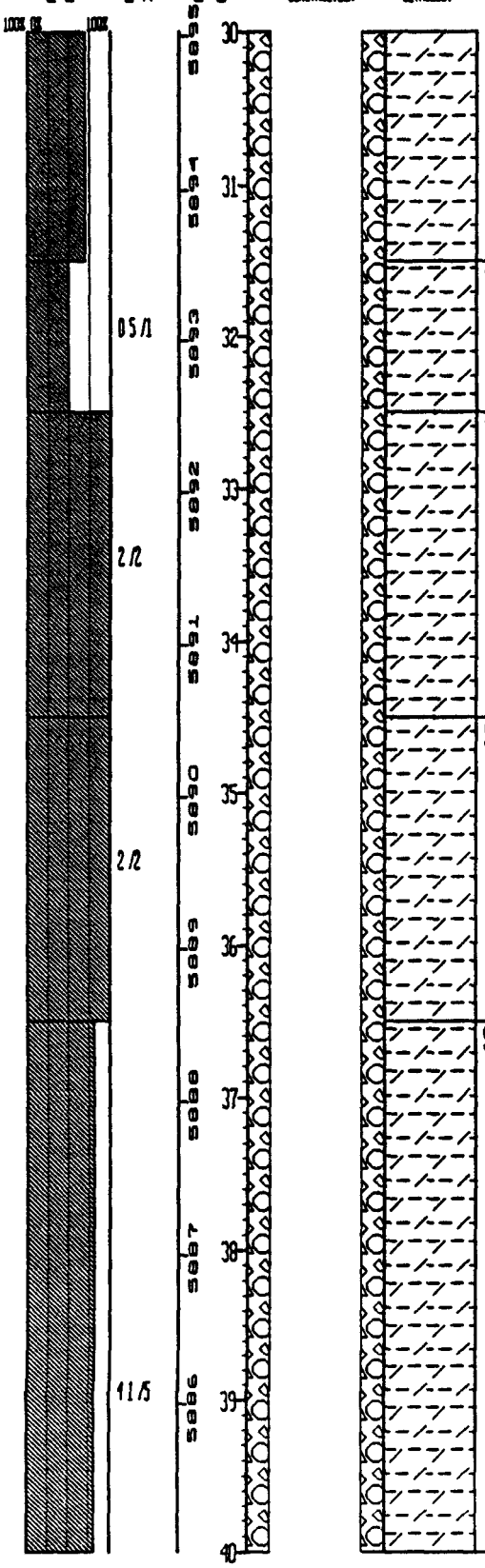
CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE | PERCENT RECOVERY | RECOVERY/ INTERVAL | DATUM(FT) DEPTH(FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

DEPTH (FT)	SAMPLE NUMBER	RECOVERY/ INTERVAL	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
20	sab5	03/15	SILTY CLAYSTONE	Light olive gray (5 Y 6/1), apparent massive bedding, highly weathered, mod-poorly friable, trace of carb material, trace of iron staining as mottles
21	sab4			
22	sab3		SILTY CLAYSTONE	Same as above some 90 degree and 75 degree fracturing showing slickensides, no iron staining
23	sab2			
24	sab1	23/5		
25	sab0			
26	sab9			
27	sab8		SILTY CLAYSTONE	Same as above no apparent fractures, trace of iron staining as mottles
28	sab7			
29	sab6	35/5		
30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause fractured bed rock from 20-30'

CHEMICAL SAMP GRADATIONAL S. SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% | PERCENT RECOVERY 100% 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Light olive gray (5 Y 6/1), non-apparent bedding, highly weathered, mod-poorly friable, some carb material, trace of iron staining as mottles
SILTY CLAYSTONE	Carbonaceous, olive gray (5 Y 4/1), at top of interval, olive black (5 Y 2/1) at middle of interval, non-apparent bedding, highly weathered, mod friable
SILTY CLAYSTONE	Light olive gray (5 Y 6/1), non-apparent bedding, highly weathered, mod friable, fractures at 85 degrees showing slickensides, some carb material
SILTY CLAYSTONE	Same as above bottom of interval is olive gray (5 Y 4/1)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause fractured bed rock from 20-30'

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0 6/0 79; 4 2/4 2; 5/5

DATUM (FT): 5885, 5884, 5883, 5882, 5881, 5880, 5879, 5878, 5877, 5876

DEPTH (FT): 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50

WELL OR PIEZOMETER CONSTRUCTION: 11/13/86

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

SILTY CLAYSTONE Olive gray (5 Y 4/1), non-apparent bedding, well weathered, mod-poorly friable, trace of carb material

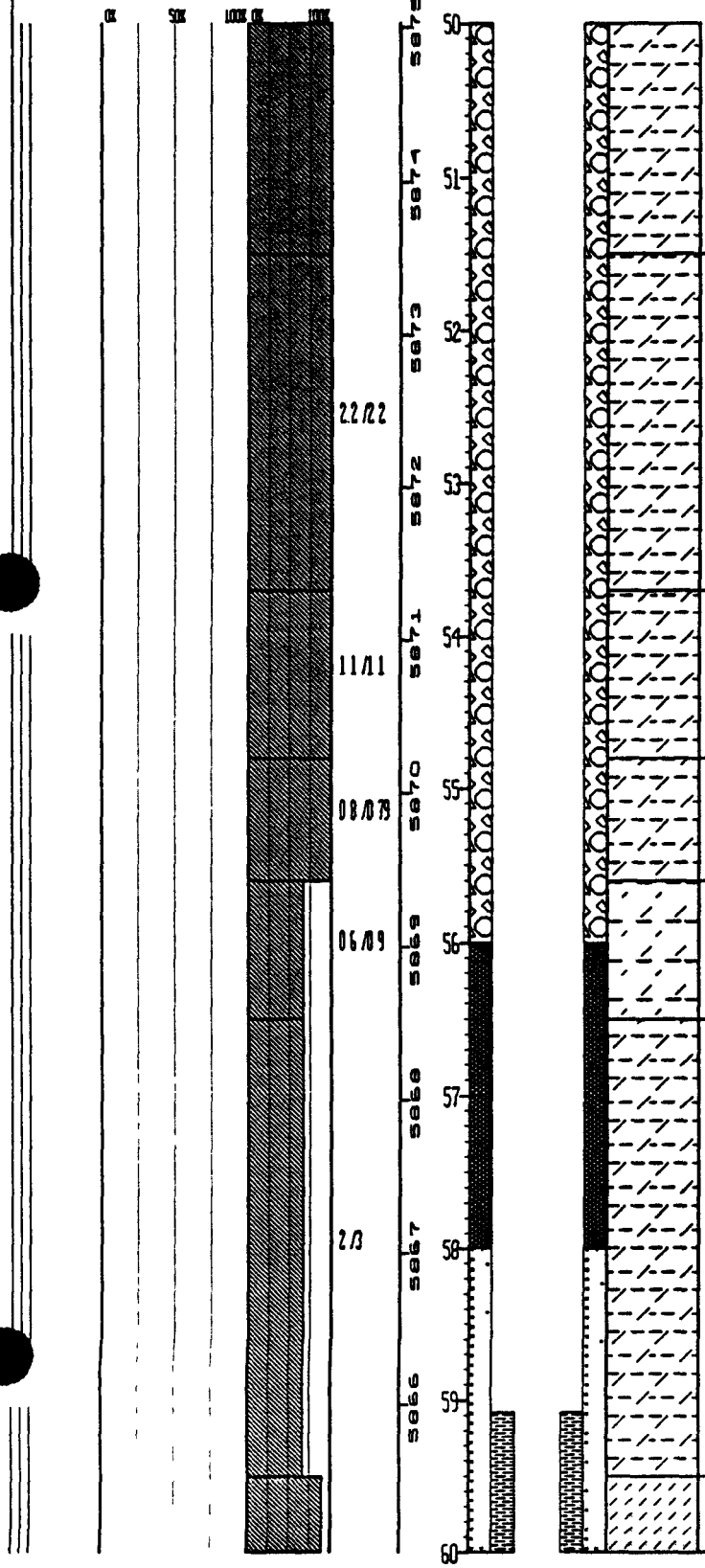
SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above, top of interval is fractured 60 degrees-70 degrees, increased silt fraction

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT) 5925 03	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause Fractured bed rock from 20-30'

CHEMICAL SAMPLE GRADATIONAL SAM | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

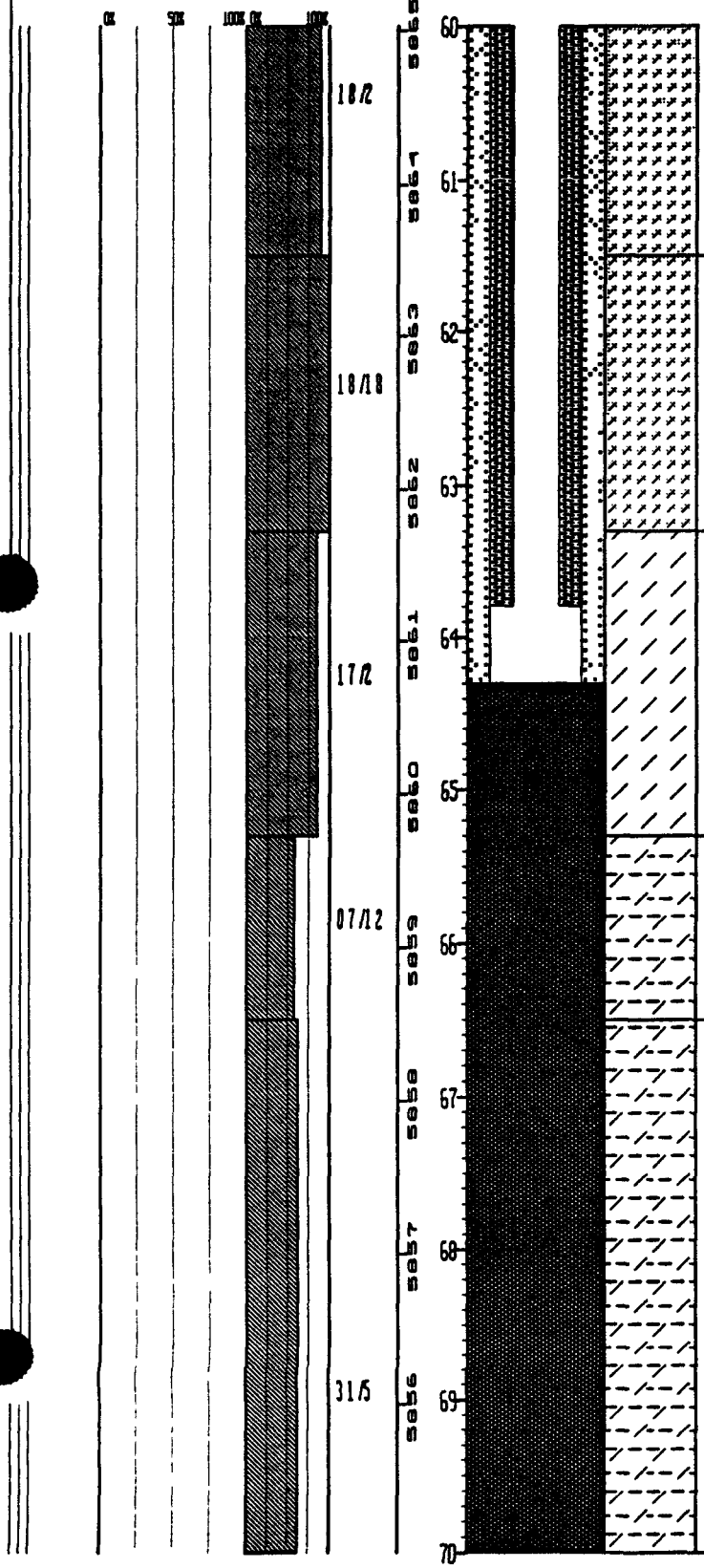


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Olive gray (5 Y 4/1), non-apparent bedding, highly weathered, mod-poorly friable, trace of carb , trace of iron staining, decreased silt fraction at base of interval
SILTY CLAYSTONE	Same as above, light olive gray (5 Y 6/1)
SILTY CLAYSTONE	Same as above
CLAYEY SILTSTONE	Olive gray (5 Y 4/1), non-apparent bedding, highly weathered, mod-poorly friable
SILTY CLAYSTONE	Olive gray (5 Y 4/1) at top of interval and light olive gray (5 Y 6/1) at bottom of interval, non-apparent bedding, highly weathered, mod friable, some carb material, trace of iron staining
SANDY SILTSTONE	VFG, light olive gray (5 Y 6/1), slab shows massive bedding w/possible burrowing, highly weathered, poorly friable, trace of carb material,

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause Fractured bed rock from 20-30'

CHEMICAL SAMPLE GRADATIONAL SAM. | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	trace of iron staining, some clay
SANDY SILTSTONE	VFG, light olive gray (5 Y 6/1), massive bedding, highly weathered, poorly friable, trace of carb material, trace of iron staining as mottles, some sand
SILTSTONE	Light olive gray (5 Y 6/1), non-apparent bedding, highly weathered, poorly friable, some clay at bottom of interval
SILTY CLAYSTONE	Olive gray (5 Y 4/1), non-apparent bedding, highly weathered, mod friable, some carb, trace of coal 1-2 mm
SILTY CLAYSTONE	Same as above, light olive gray (5 Y 6/1)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 71 5	GROUND ELEVATION (FT)	5925 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752817	AREA LANDFILL	CASING DIAMETER (IN)	2 IN	GEOLOGIST	DAT	8-86
EAST	2084001	LOCATOR NUMBER L12	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	10/23/86	

REMARKS Hollow Stem Auger/NC Core When drilling (with air and water) abundant bubbles surface in the adjacent pond near the rig When drilling stops, the bubbling stops Probable cause Fractured bed rock from 20-30'

CHEMICAL SAMPLE/ GRADATIONAL SAMP

SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

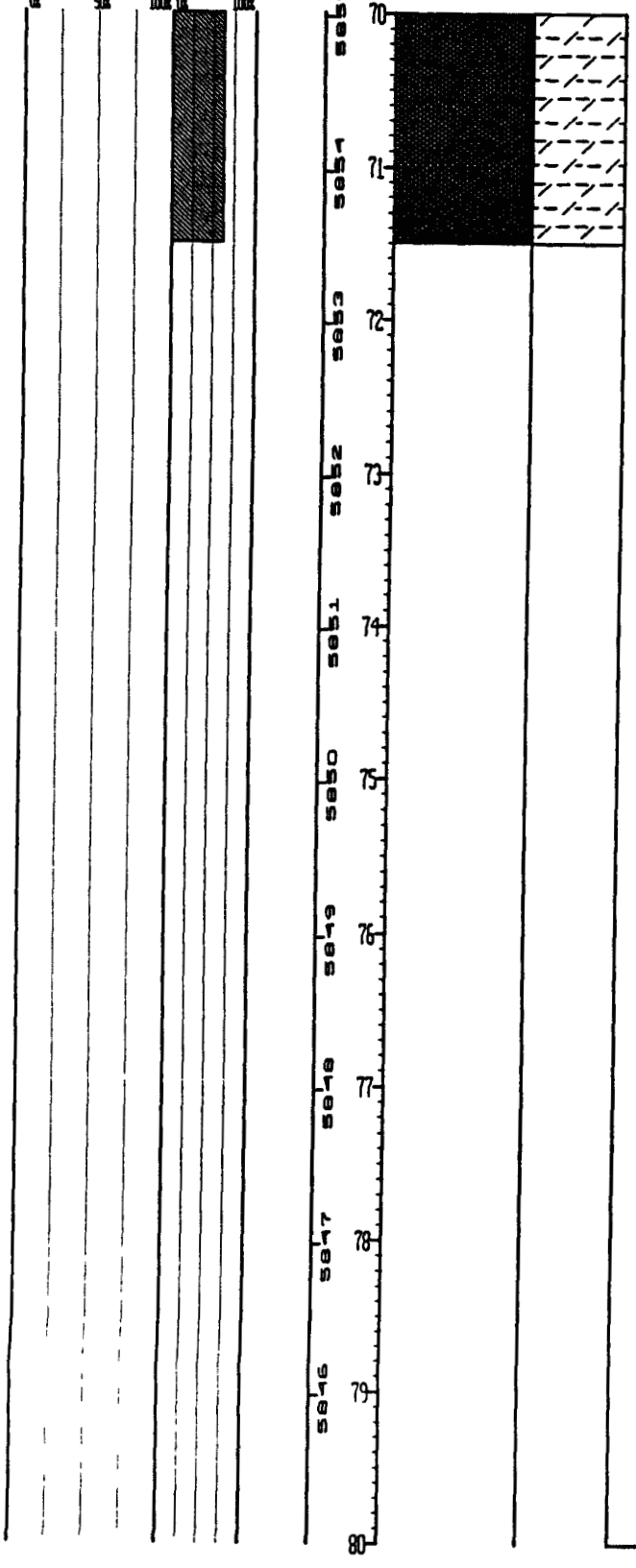
DATUM(FT) DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0.5/0.9	5996	0			GC	GRAVEL, predom med lt gray (N6) Angular to sub-angular Well graded Granules to 4 5 cm Some dry silty clay matrix, trace sand VFG to coarse Trace surface roots and grass
				0/0.6	5995	1				NO SAMPLE
					5994	2				NO SAMPLE
				0/3	5993	3				
					5992	4				
				0/1	5991	5				NO SAMPLE
				0.4/0.5	5990	6			GW	SAND AND GRAVEL, Gravel pred med gray (N5) Angular, mod sorted granules to 3 cm Sand grayish orange VFG to granules Mod well graded some silt & clay
				0.3/1.5	5989	7			GW	GRAVEL, Pred med dk gray (N4) Angular to sub-rounded Well graded granules to 3 5 cm Some silty clay matrix Some sand, VFG to coarse
				0/1	5988	8				NO SAMPLE
				0/0.83	5987	9				NO SAMPLE
						10			GC	Sandy Clayey Gravel, Color & angularity as above Poorly graded, to 2 5 cm Matrix very pale orange to grayish orange (10YR 8/4 to 7/2) Sand VFG to coarse Some silt

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149		GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	9-86
EAST	2082472	LOCATOR NUMBER	J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE GRADATIONAL SAM

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 6 /1 67	5986	10				
0 3 /1 5	5985	11			GC	Sandy Clayey Gravel, pred med gray (N5) Sub-angular to sub-rounded, mod grading Granules to 3 5 cm Matrix grayish orange (10YR 7/4) Est plasticity low
	5984	12				
0 /1 5	5983	13			NO SAMPLE	
0 /1	5982	14			NO SAMPLE	
0 45 /0 5	5981	15			GC	Same as above Angular to sub-rounded Well graded
0 /2	5980	16			NO SAMPLE	
	5979	17				
0 3 /1	5978	18			CL	SANDY SILTY CLAY, Dk yellowish orange (10YR 6/6) Est plast low Sand coarse to granules Mod graded, some gravel Sub-rounded to 1 5 cm
0 5 /0 7		19			CL	Same as above
0 /0 79	5977	20			NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149		GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11
NORTH	752191	AREA LANDFILL		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA
EAST	2082472	LOCATOR NUMBER	J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86

REMARKS Casing Driver, Hollow Stem Auger, NC Core

LOG OF BORING NUMBER

9-86

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	5976	20	NO SAMPLE	
	5975	21		
0/4	5974	22		
	5973	23		
	5972	24	CL	SILTY CLAY, Dk yellowish orange (10YR 6/6) Est plast low to mod, some sand VFG to coarse
0 3/3 5	5971	25		
	5970	26		
	5969	27		
			NO SAMPLE	
0/1 5	5968	28		
		29	NO SAMPLE	
0/0 9	5967			
		30		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%	0.8/0.6	5966	30			GC	Sandy Clayey Gravel, No predom gravel color, angular to sub-rounded to 1 5 cm Mod well graded Sand VFG to coarse
									CLAYSTONE	Top of Bedrock Grades to Claystone yellowish gray Est plast mod to high Some silt, trace silt Trace carb material
					5965	31				
									NO SAMPLE	
					5964	32				
					5963	33				
				0.6/5						
					5962	34				
					5961	35				
					5960	36				
					5959	37			NO SAMPLE	
					5958	38				
					5957	39				
				0.5						
						40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	149	GROUND ELEVATION (FT)	5956 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA	LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	9-86
EAST	2082472	LOCATOR NUMBER	J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%		5956 5955 5954 5953 5952 5951 5950 5949 5948 5947	40 41 42 43 44 45 46 47 48 49 50				
				1 7/3					CLAYSTONE	Between yellowish gray & light olive gray (5Y 8/1-6/1) Mod to highly weathered Mod friable Bedding not evident Iron staining common in matrix Black carbonaceous material & leaf prints visible
				1/2					CLAYSTONE	Same as above significant iron staining in vertical fractures Possible slickensides visible
				0/4					NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5956 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPL. GRADATIONAL SAM.	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%							
					5946	50				
					5945	51			CLAYSTONE	Lt olive gray (5Y 6/1) Mod weathered Mod to slightly friable Bedding not evident Iron staining in fractures
					5944	52				
					5943	53				
				06/55	5942	54				
					5941	55				
					5940	56				
					5939	57			SILTY CLAYSTONE	Lt olive gray to olive gray (5Y 5/1) mod weathered Slightly friable Massive bedding, heavy iron staining in vertical fractures Some CaCO3 mineralization in fractures
				18/12	5938	58				
									SILTY CLAYSTONE	Same as above, iron staining not as heavy, not as many fractures
					5937	59				
				11/12		60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT) 5996 39	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAM	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN) 4 3/4	DATE DRILLED 10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	0% 50% 100%	0% 100%							
			05/05	5936	60				
								SILTY CLAYSTONE	Olive gray (5Y 4/1) Possible horizontal bedding Mod weathered Slightly friable Some carb material
			1 75/1	5935	61			SILTY CLAYSTONE	Same as above
				5934	62			SILTY CLAYSTONE	Same as above
			04/35	5933	63				
				5932	64				
				5931	65				
			125/15	5930	66			SILTY CLAYSTONE	Same as above
				5929	67			SILTY CLAYSTONE	Same as above Some possible slickensides present in fracture
			12/2	5928	68				
					69			SILTY CLAYSTONE	Same as above No slickensides Less silty
			04/059	5927				CLAYSTONE	Olive gray (5Y 4/1) Mod weathered Slightly friable Bedding not evident Some silt Some carb material
					70				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	9956 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE
GRADATIONAL SA
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM(FT)
DEPTH(FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION

0% 50% 100% 0% 100%

1.6/2
0.5/0.4
0/2
0.8/3.5
0.5/1.5
1/1

5925 5925 5924 5923 5922 5921 5920 5919 5918 5917

70 71 72 73 74 75 76 77 78 79 80

SILTY CLAYSTONE Olive gray (5Y 4/1) Mod weathering, slightly friable Bedding not evident Some carb materials

NO SAMPLE

SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above Some possible vertical slickensides

CLAYSTONE Lt olive gray to olive gray (5Y 6/1 to 5Y 4/1) Massive bedding Mod weathered Slightly friable Possible slickensides

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE
GRADATIONAL SAM.
SAMPLE NUMBER

SAMPLE GRADN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		05/05	5916	80			CLAYSTONE	Brownish gray (5YR 4/1) Massive bedding Mod weathered Slightly to mod friable
		0/17	5915	81			NO SAMPLE	
		11/12	5914	82			CLAYSTONE	Same as above Slightly silty
		06/05	5913	83			CLAYSTONE	Same as above Trace carb material
		11/1	5912	84			CLAYSTONE	Same as above
		17/2	5911	85			CLAYSTONE	Same as above Slightly silty
		15/2	5910	86			SILTY CLAYSTONE	Same as above Some carb material Possible horizontal bedding
		18/2	5909	87			SILTY CLAYSTONE	Brownish gray (5YR 4/1), mod weathered, slightly friable, bedding possibly horizontal Some carb material (leaf prints)
			5908	88				
			5907	89				
				90				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	9-86
EAST	2082972	LOCATOR NUMBER J12	BOREHOLE DIAMETER (ID)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) / DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1.8 /2	90				
				1.7 /2	91			SILTY CLAYSTONE	Brownish gray (5YR 4/1) Mod weathered Slightly friable Bedding thin, wavy somewhat horizontal Soft sed deformation Some carbonaceous material present in layers
				0.7 /1	93			CLAYSTONE	Lt brownish gray (5YR 6/1) Mod weathered Slightly friable Abundant carb material in layers Some silt Matrix very slightly calcareous
				1 /1	94			CLAYSTONE	Same as above Some iron staining Not as carbonaceous toward bottom
				1.65 /3	95			CLAYSTONE	Brownish gray (5YR 4/1) Mod weathered Slightly friable Bedding not evident Trace carb material Some iron staining Leaf print visible
				0.9 /1	98			CLAYSTONE	Same as above More carb material
				0.65 /1	99			SILTY CLAYSTONE	Lt Brownish gray (5YR 6/1) Mod weathered Slightly friable Bedding not evident Trace carb material & iron staining
					100				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5936 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

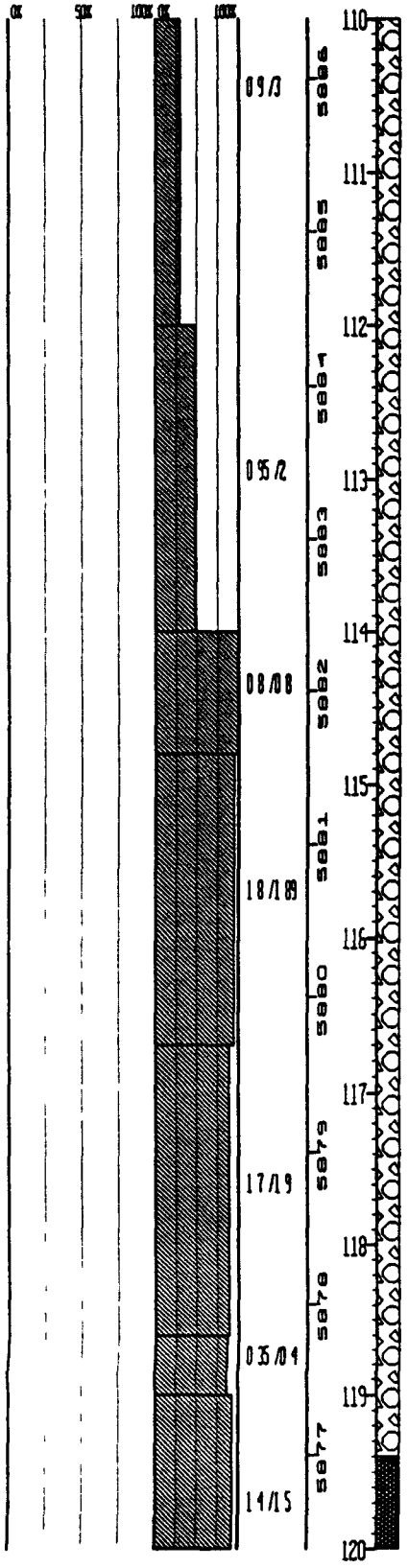
CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				18/2	100			SILTY CLAYSTONE	Lt brownish gray (5YR 6/1) to brownish gray (5Y 4/1) Mod weathered Slightly friable Bedding not evident Trace carb material & iron staining
				12.5/2	102			SILTY CLAYSTONE	Brownish gray (5YR 4/1) Mod weathered Slightly friable Bedding likely horizontal but not clearly evident Some mod yellowish brown coloring Trace of carb material
				05/05	104			SILTSTONE	Interbedded Siltstones and Claystones Color and weathering as above Thin wavy beds (approximately 1/2 to 1 cm thick) Some mod yellowish brown (10YR 5/4) layers also, trace of carb material
				15/13	105			SILTY CLAYSTONE	Color & weathering as above Bedding not evident Mod yellowish brown areas still visible Trace carb material
				0/18	106			NO SAMPLE	
				06/059	108			SILTY CLAYSTONE	Same as above
				08/08	109			SILTY CLAYSTONE	Brownish gray (5YR 4/1) Mod weathered, mod to slightly friable Bedding appears horizontal from weathering Some carb material looks like wood fragments some VFG sand in the carb areas
					110			SILTY CLAYSTONE	Same as above Slightly friable Some mod yellowish brown silty areas as in some above intervals

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	9-86
EAST	2082972	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CRITICAL SAMPLE
GRADATIONAL SAM

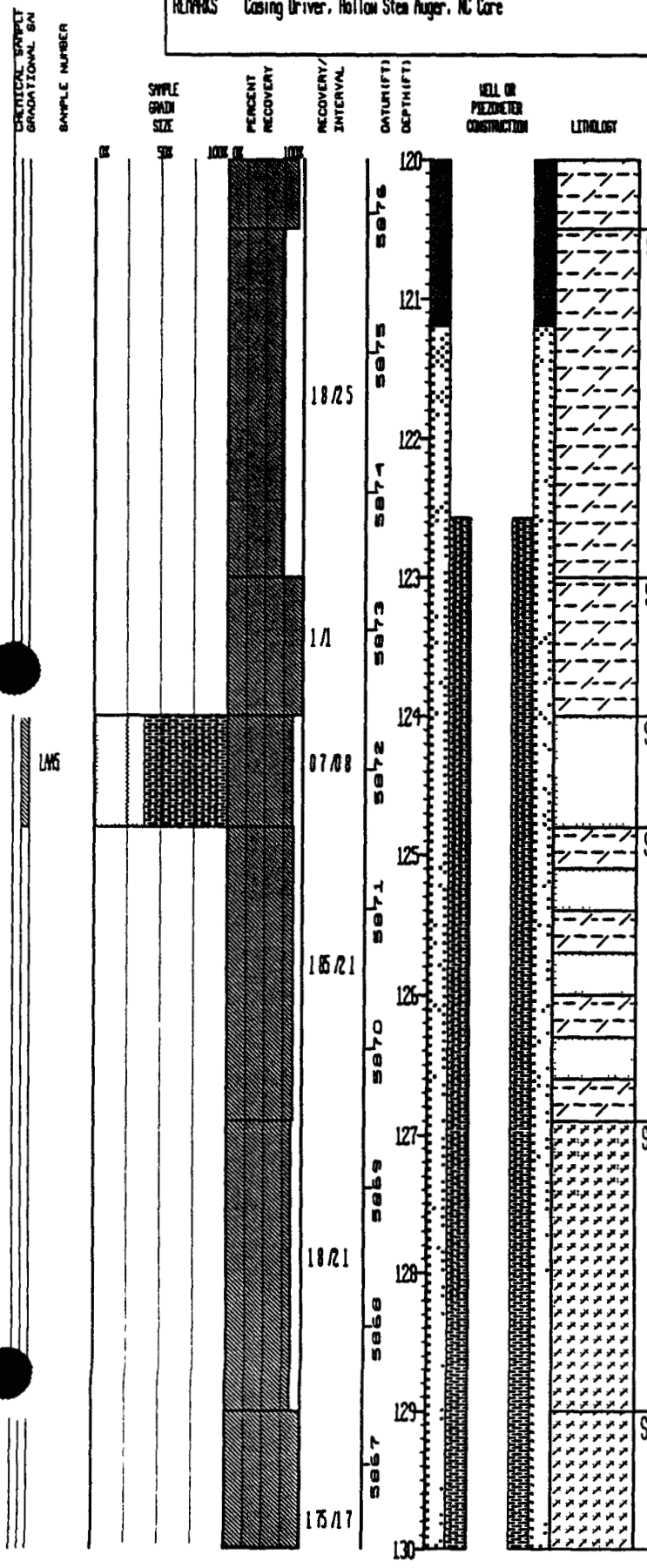
SAMPLE NUMBER



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Lt brownish gray to brownish gray (5YR 6/1 to 4/1) Highly weathered Mod to highly friable Some VFG sand in matrix Trace carb material
SILTY CLAYSTONE	Lt olive gray (5Y 6/1) Slightly to mod weathered Slightly friable Bedding not evident Looks like soft sed deformation Some carb material
SILTY CLAYSTONE	As above Some 50 degree fractures showing slickensides
SILTY CLAYSTONE	Same as above Slightly weathered Fractures also show slickensides
SILTY CLAYSTONE	Same as above
SILTY CLAYSTONE	Lt olive gray (5Y 6/1) Slightly to mod weathered Slightly friable Bedding not evident

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT) 5996 39	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	752191	AREA LANDFILL	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	9-86
EAST	2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN) 4 3/4	DATE DRILLED 10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Lt olive gray, slightly to mod weathered Slightly friable from weathering, bedding appears horizontal Can see faint cross-bedding in areas Some VFG sand
SILTY CLAYSTONE	Same as above, grades to sandstone Yellowish gray (5Y 8/1) Mod weathered, slightly friable Bedding appears horizontal, VFG sand Poorly graded (well sorted) Trace silt & clay
SANDSTONE	Same as above Sandstone, bedding slightly tilted
SILTY CLAYSTONE	Interbedded Silty Claystones and very fine grained sandstones as above Bedding appears horizontal Color, weathering and friability as above
SANDY SILTSTONE	Lt olive gray (5Y 6/1) Mod weathered, slightly friable Bedding thin laminar, predominantly horizontal Sand VFG well sorted Trace carb material
SANDY SILTSTONE	Lt olive gray (5Y 6/1) Slightly weathered Slightly friable Bedding thin laminar parallel then tilted after an unconformity Sand VFG, well sorted

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 149	GROUND ELEVATION (FT)	5996 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER	
NORTH 752191	AREA LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	9-86	
EAST 2082472	LOCATOR NUMBER J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86		

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) / DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR SDS	100% OR 100%	0 3 /0 3	130 / sa66			SANDY SILTSTONE	Lt olive gray (5Y 6/1) Slightly weathered slightly friable Thin laminar near horizontal bedding Sand VFG well sorted Trace of iron staining
					131 / sa65			NO SAMPLE	
				0 /2 8	132 / sa64				
					133 / sa63				
				0 15 /0 19	134 / sa62			SANDY SILTSTONE	Same as above
UNK				1 1 /2 1	135 / sa61			SILTSTONE	Same as above grading to claystone Lt olive gray Slightly weathered, slightly friable, bedding not evident
D2820				1 6 /1 79	136 / sa60			SILTY CLAYSTONE	Lt olive gray (5Y 6/1) Interbedded w/clayey siltstone Slightly weathered Slightly friable Thin laminar bedding predom horizontal Trace carb material
					137 / sa59				
				0 85 /1 1	138 / sa58			SILTY CLAYSTONE	Same as above Becomes more carbonaceous toward bottom
				0 8 /1	139 / sa57			SILTY CLAYSTONE	Lt olive gray (5Y 6/1) Slightly weathered, slightly friable Bedding not evident Some carb material Some iron staining
					140				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	149	GROUND ELEVATION (FT)	5956 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752191	AREA	LANDFILL	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	9-86
EAST	2082472	LOCATOR NUMBER	J12	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	10/02/86	

REMARKS Casing Driver, Hollow Stem Auger, NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						140			SILTY CLAYSTONE	Lt olive gray to olive gray (5Y 6/1 to 4/1) Mod weathered Slightly friable Bedding not evident Trace iron staining Trace carb material
				17/25	sa56	141				
					sa55	142				
					sa54					
									SILTY CLAYSTONE	Same as above Slightly less silty Slightly to mod friable
				1/15	sa53	143				
						144			SILTY CLAYSTONE	Same as above Slightly friable
				03/1	sa52					
						145			CLAYSTONE	Olive gray (5Y 4/1) Mod weathered, slightly friable Bedding not evident Some silt Some carb material
					sa51					
				175/2		146				
					sa50					
						147			CLAYSTONE	Same as above
					sa49					
				16/2		148				
					sa48					
						149				
					sa47					
						150				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 3	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) N/A	GEOLOGIST DAT	8-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) N/A	DATE DRILLED UNK	
REMARKS					

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 4/2; 0/1

DATUM (FT) 0 -1 -2 -3 -4 -5 -6 -7 -8 -9 -10

DEPTH (FT) 0 1 2 3 4 5 6 7 8 9 10

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	SANDY CLAY - moderate yellowish brown (10YR 5/4), mod to poor plast, sand is FG to MG, some roots and some gravel (max size = 7 cm)
NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 15	GROUND ELEVATION (FT)	5712 19	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753323	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	11-86
EAST	2090035	LOCATOR NUMBER R13	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	9/05/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE / GRADATIONAL BAR	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				2/2	5712	0			CH	Clay, pale brown, (5YR 5/2), high plasticity, some silt and roots
				1/1	5711	1				
					5710	2			GC	Clayey Gravel, dominantly light grey (N7), matrix is pale brown (5YR 5/2), sub-angular, moderately graded, max size, 4 cm , some silt, trace of roots
					5709	3			GC	1 cobble, very light gray (N7), rounded, approx 7 cm diam NOTE Lithology is inferred
				03/12	5708	4				
					5707	5				
					5706	6				
					5705	7				
				08/08	5704	8			CL	GRAVELLY CLAY, dark yellowish brown (10YR 4/2), moderate to low plasticity (est), some silt, trace of sand
				0/05					NO SAMPLE	
				05/1	5703	9			CL	CLAY, dark yellowish brown (10YR 4/2) moderate plasticity, some silt, color grades to yellowish grey (5 YR 7/2) below 9 5 ft
				05/05		10			CLAYSTONE	Top of Bedrock Dark yellowish brown (10YR 4/2) moderate plasticity, some silt, color

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 15	GROUND ELEVATION (FT)	5712 19	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	753123	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	11-86
EAST	2090035	LOCATOR NUMBER R13	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	9/05/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
										grades to yellowish gray (5 YR 7/2) below 9 5 Ft
				05/05	5702	10			CLAYSTONE	Same as above
				15/1	5701	11			SILTY SANDSTONE	Interval grades to Silty Sandstone, very light gray (N8), bedding not apparent, well weathered, moderate to slightly friable, very fine grained sand, abundant silt, iron staining both locally and on fractures
				15/15	5700	12			SILTY SANDSTONE	Same as above
				08/1	5699	13			SILTY SANDSTONE	Same as above
				1/1	5698	14			SILTY SANDSTONE	Same as above NOTE No water encountered while drilling
					5697	15				
					5696	16				
					5695	17				
					5694	18				
					5693	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16	GROUND ELEVATION (FT)	5777 88	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752345	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	12-86
EAST	2087891	LOCATOR NUMBER 012	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/06/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE	GRADATIONAL SAM	SAMPLE NUMBER	OR	SAMPLE GRAIN SIZE	SOIL OR	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
							11/2	5777	0			CL	SILTY CLAY, dark yellowish brown (10 YR 4/2), est plast mod Abundant surficial grass and root material Some VF to FG sand
								5776	1				
									2	10/13/86		CL	SILTY GRAVELLY CLAY, dark yellowish brown (10 YR 4/2), est plast mod Gravel angular to sub-rounded, mod well graded, (1 cm to 5 cm), some spotty iron staining More gravel toward bottom Trace root material
							19/2	5775	3	09/08/86			
								5774	4	09/26/86			
									5				NO SAMPLE
							0/17	5773					
							04/03	5772	6			GW	Clayey Gravel, cannot determine gravel color Mod well graded granules to 6 5 cm sub-angular to sub-rounded Matrix mod yellowish brown (10 YR 5/4) Some silt
							0/14	5771	7				NO SAMPLE
							07/06	5770	8			GC	Clayey Gravel, no predom gravel color Angular to sub-angular Poorly graded Max size 5 5 cm Matrix dark yellowish brown (10 YR 4/2) Some silt and VFG sand
												GC	Clayey Gravel, no predom gravel color sub-angular to rounded Mod well graded Granules to 6 cm Matrix grayish orange (10 YR 7/4) Est plasticity mod to high Some silt and sand VFG to VCG
							15/2	5769	9				
								5768	10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16	GROUND ELEVATION (FT)	5777 88	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752345	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	12-86
EAST	2087894	LOCATOR NUMBER 012	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/06/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPL GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				14/1	5767	10			GC	Clayey Gravel, no predom gravel color sub-angular to rounded Mod well graded Granules to 6 cm Matrix grayish orange (10 YR 7/4) Est plast mod , some silt and sand, VF6 to VCG
				14/1	5766	11			SILTY CLAYSTONE	Top of Bedrock Light olive gray (5 Y 6/1) to dark yellowish orange (10 YR 6/6) Est plast mod Possible highly weathered claystone Some iron staining
				15/2	5765	12			SILTY CLAYSTONE	Same as above
					5764	13				
				19/2	5763	14			CLAYSTONE	Light brownish gray (5 YR 6/1) to light brown (5 YR 5/6) Est plast mod to high Some iron staining and iron concretions Some carb material
					5762	15				
					5761	16				
					5760	17				
					5759	18				
					5758	19				
						20				

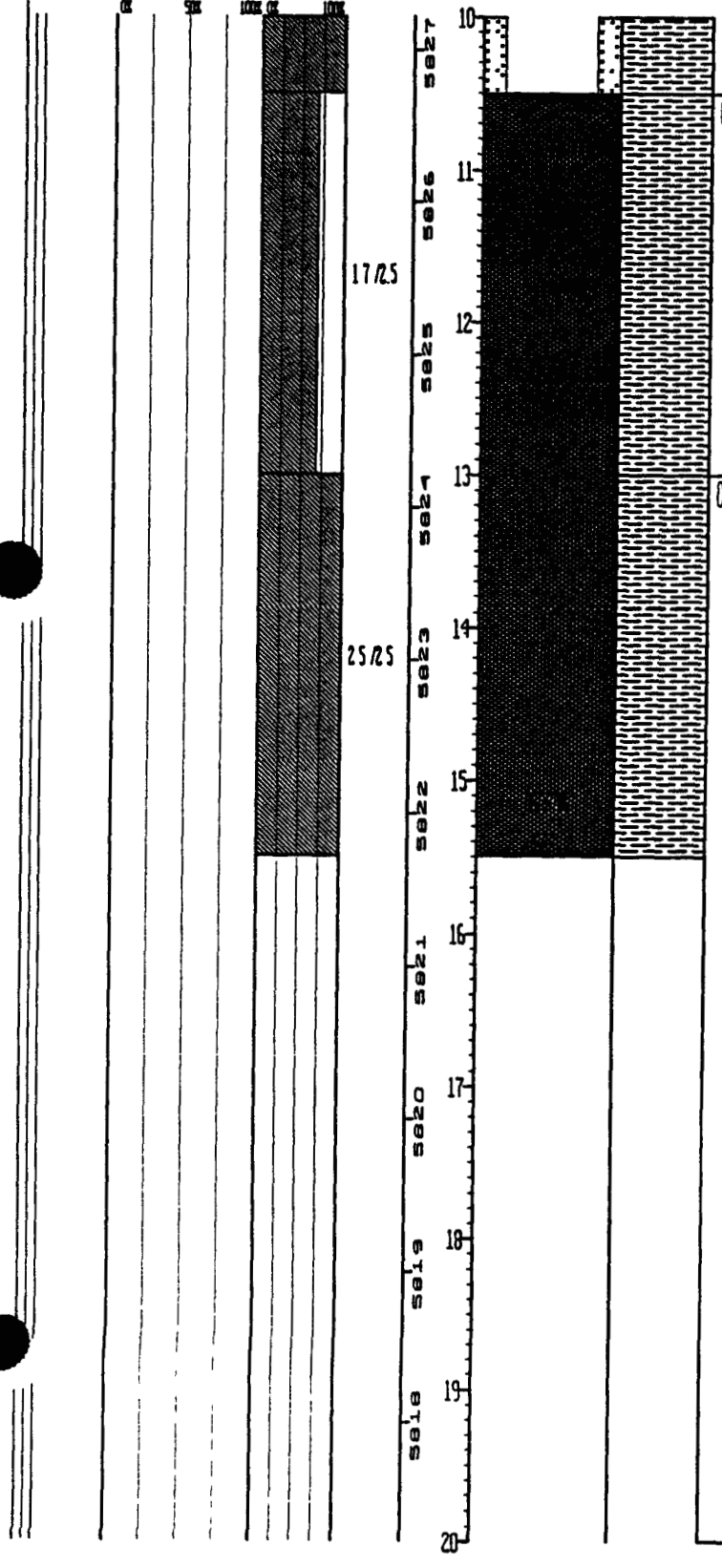
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 15 5	GROUND ELEVATION (FT)	5837 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751869	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	13-86
EAST	2086055	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/20/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE GRADATIONAL SAM.	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0%	100%	5837	0			CH	Clay, light brownish gray (5 YR 6/1), moderately high plasticity, some sand and gravel
				16/5	5836	1				
					5835	2				
					5834	3				
					5833	4				
					5832	5	08/20/86 ▽		CH	Same as above Two larger pebbles occur at approx 7 8 ft
				06/3	5831	6				
					5830	7				
					5829	8	11/26/86 ▽		CH	Clay, light gray (N 7), high plasticity, some silt, possibly highly weathered bedrock
				03/1	5828	9			CLAYSTONE	Top of Bedrock Light gray (N 7), high plasticity, some silt, possibly highly weathered bedrock
				15/15		10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 15 5	GROUND ELEVATION (FT)	5837 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751869	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	13-86
EAST	2086055	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/20/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE GRADATIONAL SAM. | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above
CLAYSTONE	Moderate yellowish brown (10 YR 5/4), moderate plasticity, some silt, some iron staining locally Silt fraction increases at 13 0 ft

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 43/47; 43/33; 34/25

DATUM (FT): 5844, 5843, 5842, 5841, 5840, 5839, 5838, 5837, 5836, 5835

DEPTH (FT): 0, 1, 2, 3, 4, 5, 6, 7, 8, 9, 10

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CH	Silty Clay, mod yellowish brown (10 YR 5/4) and light brownish gray mottled (5 YR 6/1) Some VFG sand, some gravel near surface, avg size 2 cm Trace CaCO3 in stringers Est plasticity mod to high
CH	Same as above Sand VFG to VCG Also has some root materials Some iron staining (spotty)
CH	Same as above Trace gravel, to 5 5 cm

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAI	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				05/05	5834	10				
						11			CL	SILTY CLAY, grayish orange (10 YR 7/4) to very light gray (N 8) Est plast low to mod
				22/2	5833				SILTY CLAYSTONE	Top of Bedrock Grayish orange (10 YR 7/4) to very light gray (N 8) Est plast low to mod
					5832	12				
						13			SILTY CLAYSTONE	Same as above
				33/4	5830	14				
					5829	15				
					5828	16	09/08/86			
				13/1	5827	17			SILTY CLAYSTONE	Pale yellowish brown (10 YR 6/2) Est plast low to mod Trace iron staining, trace carb material
						18			SILTY CLAYSTONE	Same as above
					5826		09/05/86			
						19				
					5825	20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMP GRADATIONAL S TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) 5824 5823 5822 5821 5820 5819 5818 5817 5816 5815

DEPTH (FT) 20 21 22 23 24 25 26 27 28 29 30

WELL OR PIEZOMETER CONSTRUCTION 09/09/86

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

RECOVERY/INTERVAL	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
19/5		
0/0 29	NO SAMPLE	
09/22	SILTY CLAYSTONE	Dark yellowish brown (10 YR 4/2) to brownish gray (5 YR 4/1) Est plast low to moderate
33/25	SILTY CLAYSTONE	Light brownish gray to brownish gray Highly weathered, mod to highly friable Bedding appears massive Some grayish orange (10 YR 7/4) siltier areas
25/25	SILTY CLAYSTONE	Same as above, trace iron staining

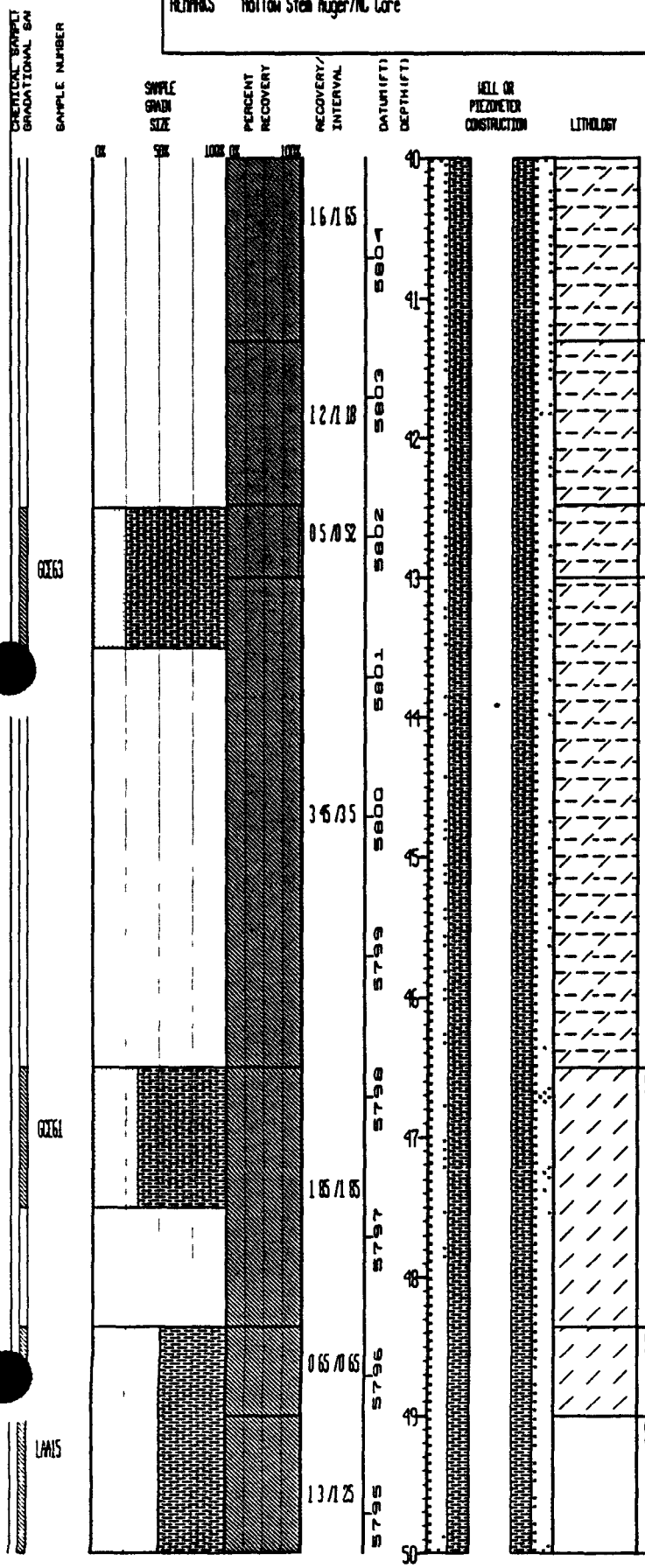
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085941	LOCATOR NUMBER NLL	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						30				
				0/1 05	sa14	31				NO SAMPLE
				0 9/0 95	sa13	32			SILTY CLAYSTONE	Light olive gray (5 Y 6/1), slightly weathered, slightly friable Bedding appears massive
				0 6/0 65	sa12	33			SILTY CLAYSTONE	Same as above
				1 9/1 85	sa11	34			SILTY CLAYSTONE	Same as above, silt fraction decreases in middle of interval, but increases again at bottom
					sa10	35				
				1 55/2 15	sa9	36			SILTY CLAYSTONE	Same as above
					sa8	37				
				0 6/0 5	sa7				SILTY CLAYSTONE	Same as above, some carbonaceous material (probably wood fragment)
				0/1 2	sa6	38				NO SAMPLE
				0 8/0 8		39			CLAYSTONE	Light olive gray (5 Y 6/1) Slightly weathered, slightly friable Bedding appears massive Trace iron staining around tiny pieces (VCG sized) of probable iron
					sa5	40			SILTY CLAYSTONE	Light olive gray (5 Y 6/1) Slightly weathered, slightly friable

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER	M11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

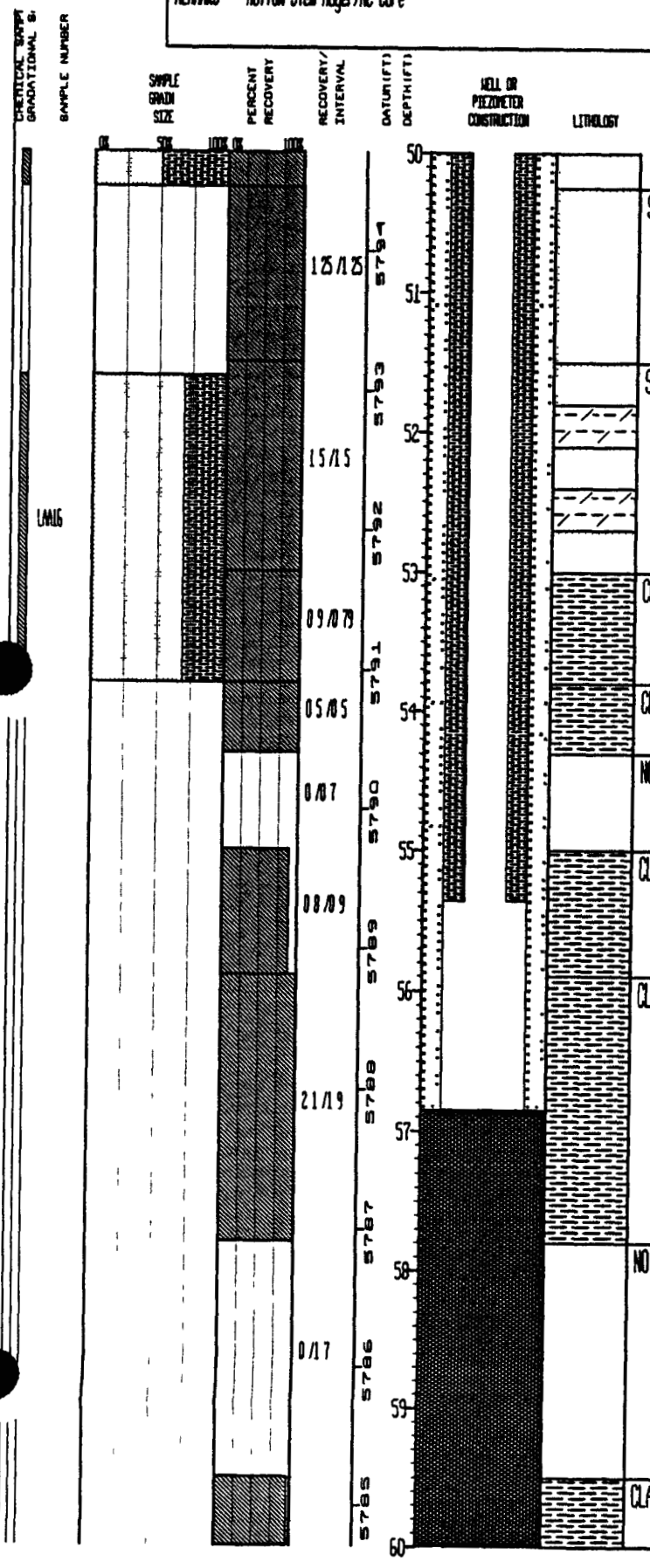
REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	Bedding appears massive
SILTY CLAYSTONE	Same as above Top 4 in of interval is olive black (5 Y 2/1) The rest is same as above Trace carb material Slightly siltier
SILTY CLAYSTONE	Yellowish gray (5 Y 8/1) Slightly weathered, slightly friable Massive bedding Some VFG sand
SILTY CLAYSTONE	Same as above Begins to show thin layered bedding (< 1 mm) toward bottom of interval Some carb material, probably wood fragments
SILTSTONE	Pinkish gray (5 YR 8/1) Slightly weathered, slightly friable Thin layered bedding (< 1 mm to 1 in), some VFG sand in layers Thin layers of carb material approx 1 to 2 mm One of these layers cuts through bedding at 50 degrees
SILTSTONE	Same as above
SANDSTONE	VFG w/abundant carb material

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER	M11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SANDSTONE	Pinkish gray (5 YR 8/1) Mod weathered, slightly to mod friable Thin layered bedding, some cross bedding, visible (horizontal to approx 25 degrees) Some carb material toward bottom of interval Some VFG sand Trace iron staining
SANDSTONE	Same as above interbedded with very thin layers of Silty Claystone One 4 in section of med grained Sandstone
CLAYSTONE	Brownish gray to olive gray (5YR 4/1 to 5Y 4/1), mod weathered, slightly friable, bedding not evident
CLAYSTONE	Same as above
NO SAMPLE	
CLAYSTONE	Brownish gray to olive gray (5 YR 4/1 to 5 Y 4/1), mod weathered, slightly friable, bedding not evident Some silt, trace VFG sand in very small bodies Trace iron staining
CLAYSTONE	Same as above, some silt
NO SAMPLE	
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE
GRADATIONAL BA
TH
SAMPLE NUMBER

SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR	100% OR 100%	13/15	5784	60				
		19/25	5783	61			SILTY CLAYSTONE	Brownish gray (5 YR 4/1) Mod weathered, mod friable Core too broken to determine bedding Trace iron staining
			5782	62				
				63				
		0/13	5781	64			NO SAMPLE	
			5780	65			SILTSTONE	Interbedded Siltstone and Silty Claystone, pinkish gray (5 YR 8/1) to olive gray (5 Y 4/1) Thin layers 1 mm to 5 mm Bedding horizontal to 30 degrees Mod weathered, slightly friable Some VFG sand in silt layers Some iron staining
		15/15	5779	66			SILTSTONE	Same as above
		19/19 5	5778	67				
			5777	68			SILTSTONE	Same as above
		17/17 5	5776	69				
			5775	70			SILTSTONE	Same as above

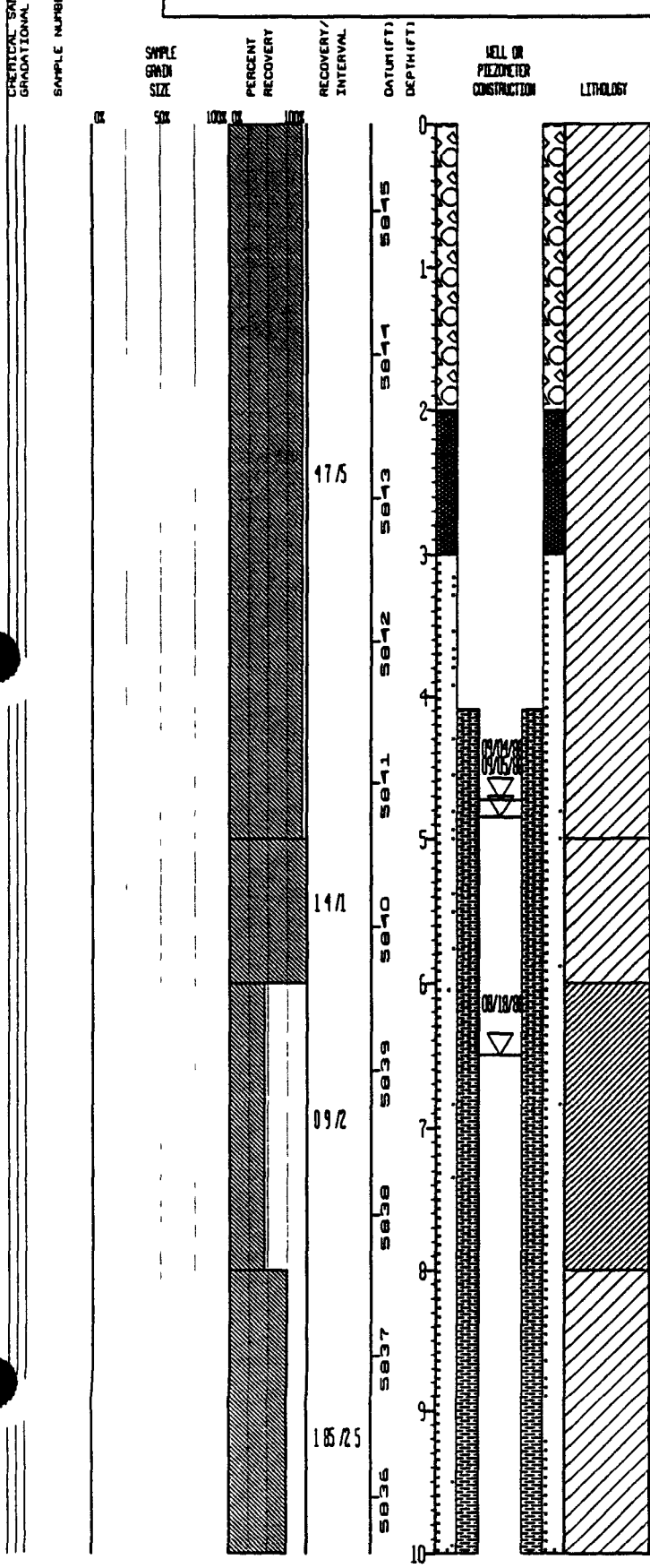
STATE PLANE COORDINATE		TOTAL DEPTH (FT)	74 5	GROUND ELEVATION (FT)	5844 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751868	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	14-86
EAST	2085841	LOCATOR NUMBER	N11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE
GRADATIONAL SA
SAMPLE NUMBER

SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0% 50%	100% 0% 100%	1.85/1.9	5774	70				
				71				
		1.8/1.9	5773	72			SILTY CLAYSTONE	Light olive gray to olive gray (5 Y 6/1 to 4/1) Slightly weathered, mod to slightly friable Bedding not evident Some carbonaceous material and leaf prints Silt lense 1 in X 2 in near top, grayish orange to med brown (10 YR 7/4 to 5 YR 2/4)
			5772	73				
		0.7/0.64	5771	74			SILTY CLAYSTONE	Same as above No silt lense
		0/0.55	5770	75			NO SAMPLE	
			5769	76				
			5768	77				
			5767	78				
			5766	79				
			5765	80				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 18	GROUND ELEVATION (FT)	5845 61	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751865	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	15-86
EAST	2085815	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/18/86	
REMARKS	Hollow Stem Auger						



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	SILTY CLAY, dusky yellowish brown (10 YR 2/2) Est plast moderate Root material exists in top 1 8 ft Some sand and gravel exist throughout interval Sand VFG to coarse Gravel from approx 1 cm to 5 5 cm Sub-angular to rounded Matrix slightly calcareous in localized areas
CL	GRAVELLY SILTY CLAY, dark yellowish brown (10 YR 4/2) Est plast moderate Gravel angular to sub-rounded Mod well graded 1 cm to 6 cm Some sand, VFG to coarse Some staining in matrix
CH	Silty Clay, brownish gray (5 YR 4/2) grading to dark yellowish brown (10 YR 4/2) Est plast mod to high Becomes gravelly toward bottom Angular to sub-angular Grading not visible in matrix Sand FG to granules Trace carb material
CL	GRAVELLY SILTY CLAY, dark yellowish brown (10 YR 4/2) Est plast moderate Gravel angular to sub-rounded Mod well graded Max size 5 cm Some sand VFG to VCG

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 18	GROUND ELEVATION (FT)	5845 61	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751865	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	15-86
EAST	2085815	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	08/18/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%							
				0 6/1	5835	10				
						11			CL	GRAVELLY SILTY CLAY, dark yellowish brown (10 YR 4/2) Est plast moderate Gravel angular to sub-rounded Mod well graded Max size 3 cm Some sand VFG to VCG
	LA43			0 5/1	5834	12			GC	Clayey Sandy Gravel Cannot determine gravel color Sub-angular to sub-rounded Mod well sorted to 4 5 cm Matrix dark yellowish brown (10 YR 4/2) to light gray (N 7) Est plast low to mod Sand VFG to coarse Some silt
				0 3/0 5	5833	13			SILTY CLAYSTONE	Top of Bedrock Light brownish gray (5 YR 6/1) Est plast mod to high
				0 6/0 8	5832	14			SILTY CLAYSTONE	Same as above
				1 3/1 7	5831	15			SILTY CLAYSTONE	Grayish brown (5 YR 3/2) Est plast moderate Trace carb material Trace VFG sand
				3/2 5	5830 5829 5828 5827 5826	16 17 18 19 20			SILTY CLAYSTONE	Pale yellowish brown (10 YR 6/2) Est plast mod Some iron staining throughout matrix Some black carb material

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT) 5864 74	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	16-86
EAST	2085263	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 08/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OR 100%	11/5	0			SC	Gravelly Clayey Sand, pale yellowish brown (10YR 6/2), angular to sub-angular, mod grading, max gravel size = 3 cm, some roots and grass at surface, slightly calc
					1			CL	GRAVELLY SANDY CLAY, (possibly highly weathered claystone - well consolidated), brownish gray (5YR 4/1), mod plast, max gravel size 5 cm, trace of iron staining as concretions (two approx 1 cm diameter) and mottles, trace of calcite in upper part of interval, increased sand fraction in bottom 2 in of interval
					2				
				1/1 5	3				
					4				
					5			SC	Gravelly Clayey Sand - grayish orange (10YR 7/4), sub-angular to sub-rounded, mod to well graded, FG - CG sand, max gravel size = 6 cm, some silt
				05/05	6			CL	SANDY CLAY - light olive gray (5Y 6/1), est mod plast, iron staining as nodules and mottles, trace of gravel, sand is FG - MG
				13/1	7			SANDY CLAYSTONE	Top of Bedrock Olive gray (5Y 4/1)
					8			SANDY CLAYSTONE	Same as above, light olive gray (5Y 6/1)
				2/2	9				
					10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT) 5864 74	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	16-86
EAST	2085263	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 08/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SA | SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
05/05	10	CLAYSTONE	Light olive gray (5Y 6/1), mod to high plast, trace of iron staining as mottles, floury texture
25/25	11–12	CLAYSTONE	Same as above, trace of calcite
35/35	13–16	CLAYSTONE	Top 1 ft same as above Bottom of interval same as above, yellowish gray (5Y 8/1), more consolidated texture
15/15	17–18	CLAYSTONE	Top 1 ft same as above Bottom of interval same as above, light gray (N7), floury texture
	18–20	CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT)	5864 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	16-86
EAST	2085263	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	08/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				3/5	5844	20				
					5843	21				
					5842	22				
					5841	23			CLAYSTONE	Olive gray (5Y 4/1), mod-high plast , some iron staining as mottles, trace carb material, floury texture
				1/3	5840	24				
					5839	25				
				0/0.1	5838	26			NO SAMPLE	
				21/21	5837	27			SILTY CLAYSTONE	Olive gray (5Y 4/1), bedding is non apparent, well weathered, mod friable, some iron staining as mottles, some carb material esp in top of interval, base of interval is highly fractured at undeterminable angles, trace of calc material in fractures, some white non calc mineralization
					5836	28				
					5835	29			SILTY CLAYSTONE	Same as above, floury texture at top of interval
						30				

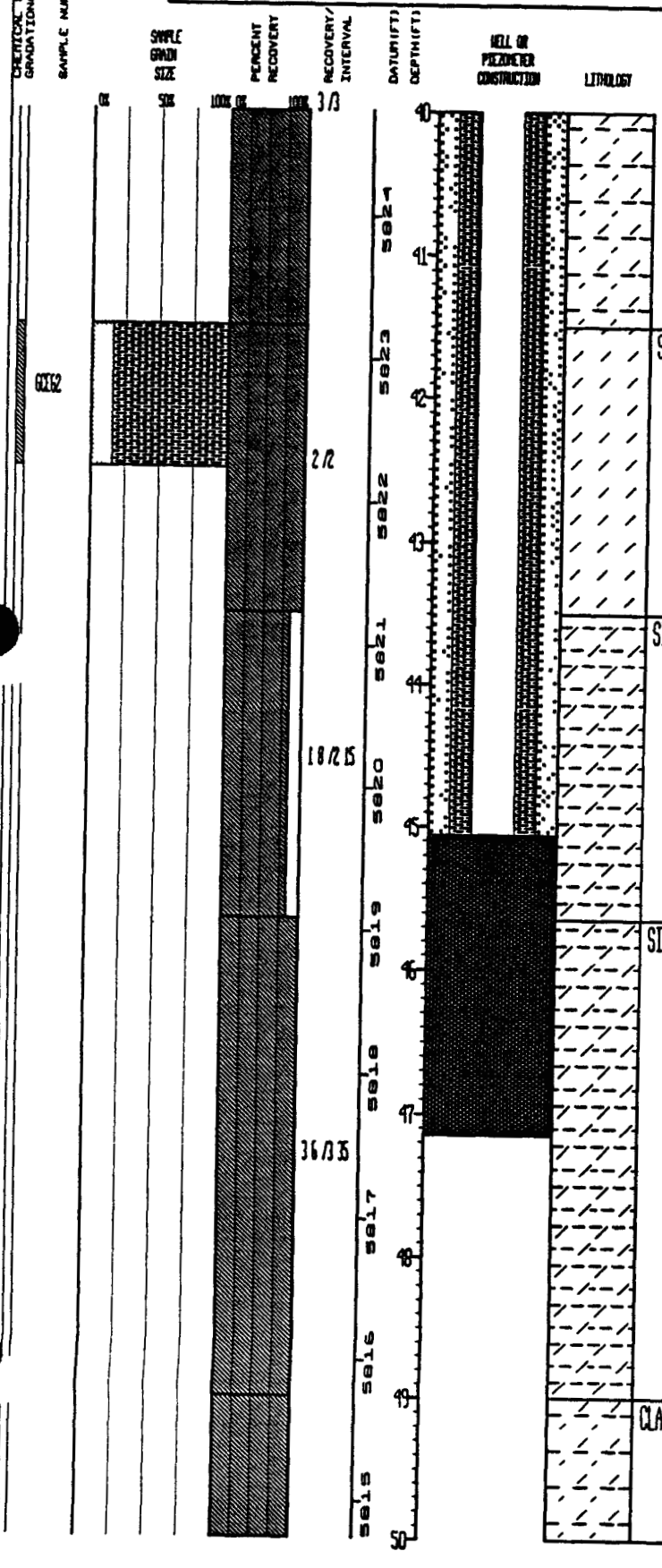
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT)	5864 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	16-86
EAST	2085263	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	08/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL BARP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				4 7 /4 7	5834	30				
						31				
					5833	32				
				8 8 /8 9	5832	33			CLAYSTONE	Olive gray (5Y 4/1), non-apparent bedding, highly weathered, mod friable, trace of carb material, core is broken up
					5831	34			NO SAMPLE	
				0 /1 2	5830	35				
				8 9 /8 6	5829				CLAYSTONE	Same as above, not broken core
						36			CLAYSTONE	Same as above
				2 4 /2 8 3	5828	37			CLAYEY SILTSTONE	Olive black (5Y 2/1), apparent horizontal laminar bedding, mod weathered, mod to poor friability, some carb material
					5827	38				
					5826	39			CLAYEY SILTSTONE	Same as above, some coal material, slab shows disturbed bedding, some possible burrows, thin interbeds of clay (horizontal, <1 mm)
				3 /3	5825	40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT) 5864 74	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	16-86
EAST	2085263	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 08/25/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY SANDSTONE	VFG to FG, light olive gray (5Y 5/2), massive bedding (from slab), well weathered, mod to poorly friable, mod to well sorted, sand fraction has higher FG near 43 5 ft
SILTY CLAYSTONE	Olive gray (5Y 4/1), non - apparent bedding, well weathered, mod friable, trace of iron staining as mottles, trace carb material, fracture at 60 degrees
SILTY CLAYSTONE	Same as above 70 degree fracture showing slickenslides
CLAYEY SILTSTONE	Light olive gray (5Y 6/1), non - apparent bedding, highly weathered, mod to poorly friable, some carb material, trace of iron staining as mottles At approx 50 ft increase of clay fraction At approx 52 ft decreased clay fraction Slab shows 60 degree fracture that has <1 mm

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT) 5864 74	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	16-86
EAST	2085263	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 08/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						50				coal seam, bedding appears to show possible drag or fracture, is possibly a slump structure Bedding on bottom of fracture is approx horizontally laminated, above fracture is distorted with clay and silt clasts Another fracture at 40 degrees with some organic material along fracture
					5814	51				
				51/5	5813	52				
					5812	53				
					5811	54				
				03/04					SILTY CLAYSTONE	Olive gray (5Y 4/1), non - apparent bedding, highly weathered, mod to poorly friable, some carb material, trace of iron staining as mottles
				09/11	5810	55			SILTY CLAYSTONE	Same as above
					5809	56			NO SAMPLE	
					5808	57				
				0/35	5807	58				
					5806	59				
					5805	60			CLAYEY SILTSTONE	Light olive gray (5Y 6/1), non - apparent bedding, highly weathered, mod - poorly friable, trace of carb material

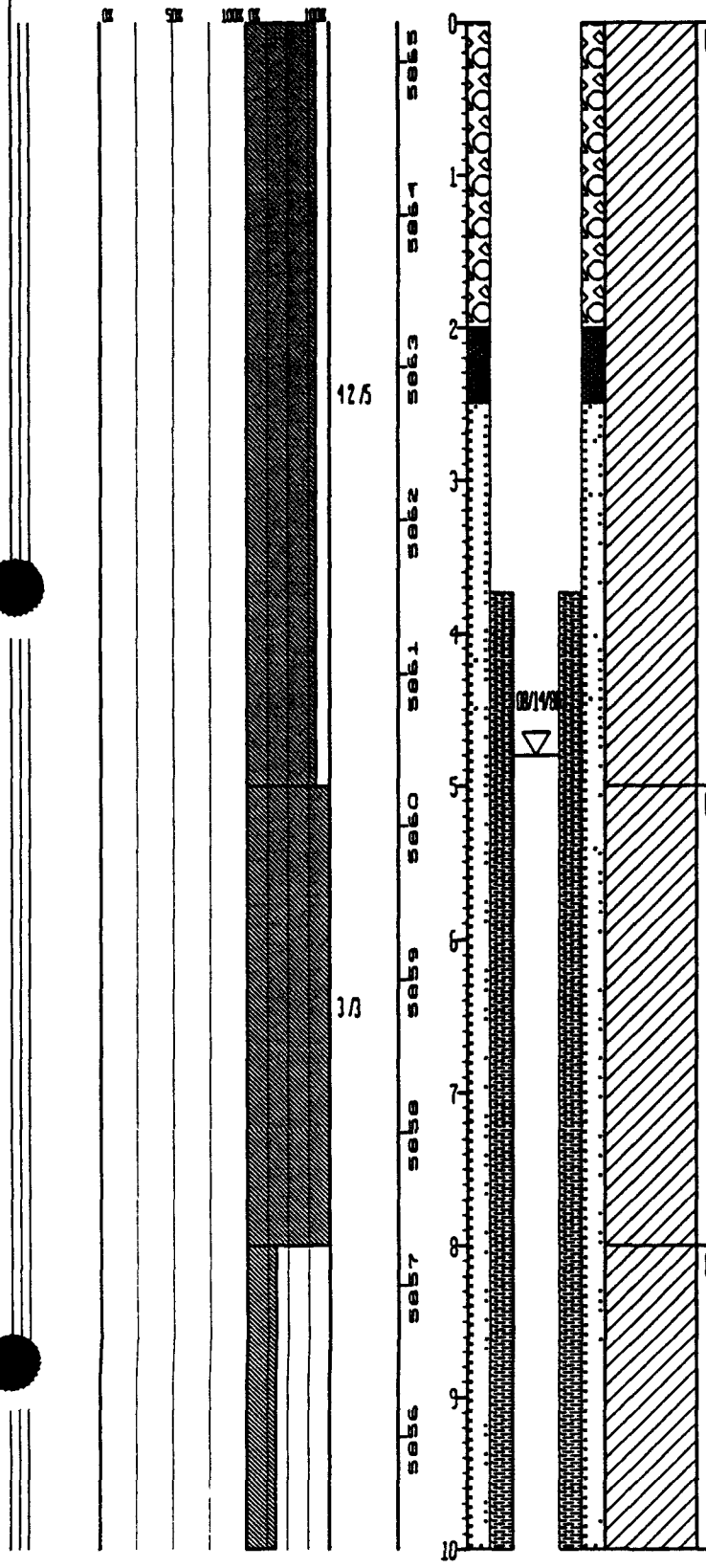
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 64	GROUND ELEVATION (FT)	5864 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751762	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	16-86
EAST	2085263	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	08/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRADI SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						60				
					5804					
						61			SILTY CLAYSTONE	Olive gray (5Y 4/1), apparent massive bedding, well weathered, mod friable, some carb material, floury texture at base of interval NOTE Well bore has 10-20 silica sand from 47 15' to 64'
				4 2/5	5803					
						62				
					5802					
						63				
					5801					
						64				
					5800					
						65				
					5799					
						66				
					5798					
						67				
					5797					
						68				
					5796					
						69				
					5795					
						70				

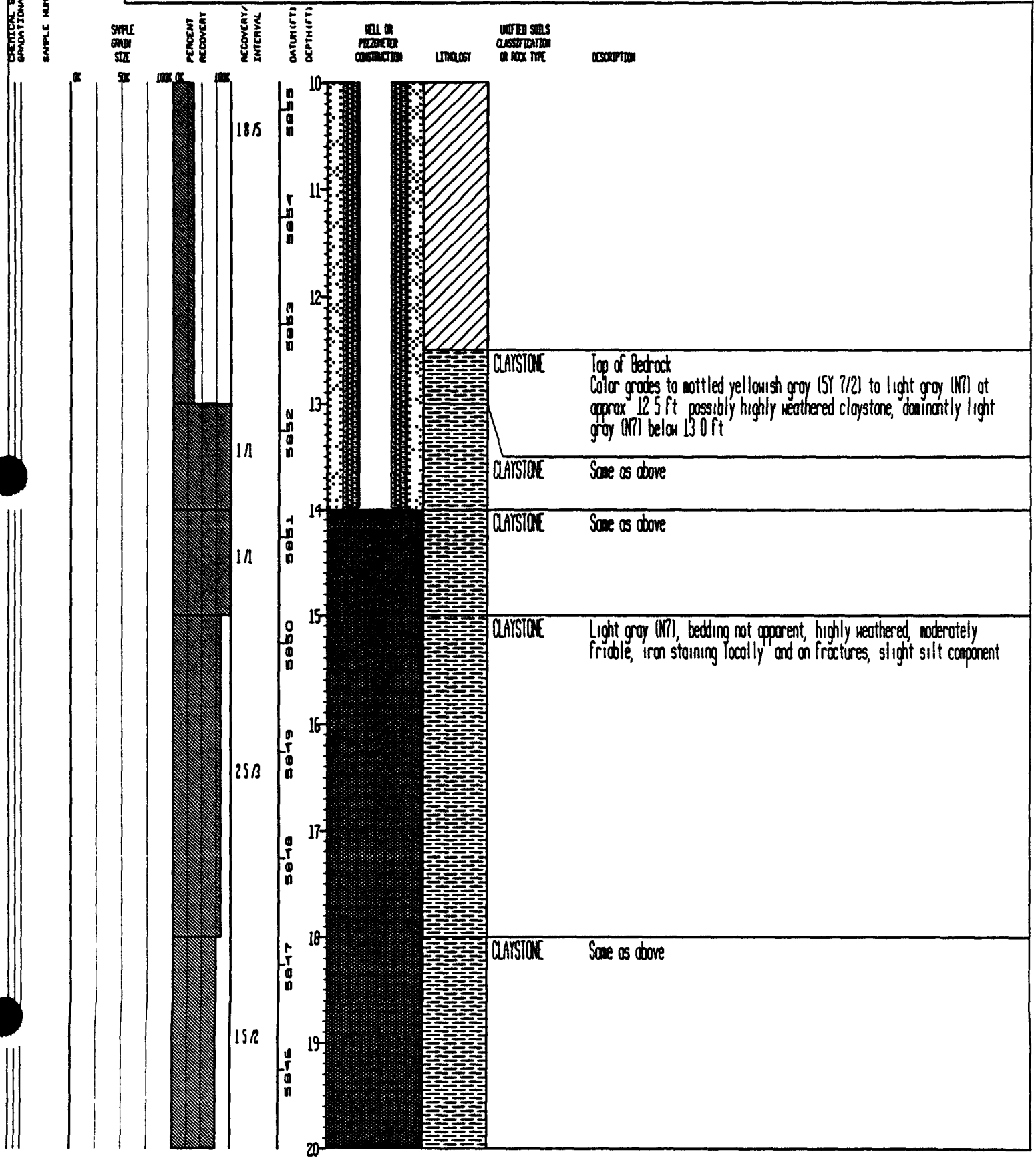
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 20	GROUND ELEVATION (FT) 5865 26	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751754	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	17-86
EAST	2085245	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 08/14/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMPLE GRADATIONAL SA. | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	CLAY - pale yellowish brown (10YR 6/2) to grayish brown (5YR 3/2), moderate plasticity (est), some gravel and sand, some silt, trace of roots in upper 0 5 ft Sand fraction increases from approx 2 ft to approx 12 5 ft CG and VCG
CL	Same as above, slightly calcareous in interval from approx 5 ft to 6 ft
CL	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 20	GROUND ELEVATION (FT)	5865 26	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751754	AREA SOLAR POND	CASING DIAMETER (IN)	2 00	GEOLOGIST	DCB	17-86
EAST	2085245	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/14/86	
REMARKS	Hollow Stem Auger						



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 10 5	GROUND ELEVATION (FT)	5882 82	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751534	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	TSD	18-86
EAST	2065834	LOCATOR NUMBER NLL	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/22/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					0			CL	SILTY CLAY - moderate brown (5YR 3/4), some roots, trace of fine to coarse sand, grades to a silty clay, dark yellowish brown (10YR 4/2), trace of roots and sand, trace of calcareous material and fine gravel, estimated plasticity = medium NOTE Core too mixed up to tell actual footage of core recovery
				5/5	1				
					2				
					3				
					4				
					5			CL	SILTY CLAY - pale yellowish brown (10YR 6/2), estimated medium to high plasticity, trace of limonite staining and calcite as mottles
					6				
					7			CH	Sandy Clay - fine, pale yellowish brown (10YR 6/2), estimated medium to high plasticity, abundant limonite staining (dark yellowish orange (10YR 6/6)), trace of organic material and roots NOTE Core too mixed up to tell actual footage of core recovery
				55/55	8			SANDY CLAYSTONE	Top of Bedrock Fine, pale yellowish brown (10YR 6/2), estimated medium to high plasticity, abundant limonite staining (dark yellowish orange (10YR 6/6)), trace of organic material and roots NOTE Core too mixed up to tell actual footage of core recovery NOTE No water encountered during drilling
					9				
					10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 10 5	GROUND ELEVATION (FT)	5882 82	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751534	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	TSD	18-86
EAST	2065834	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/22/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

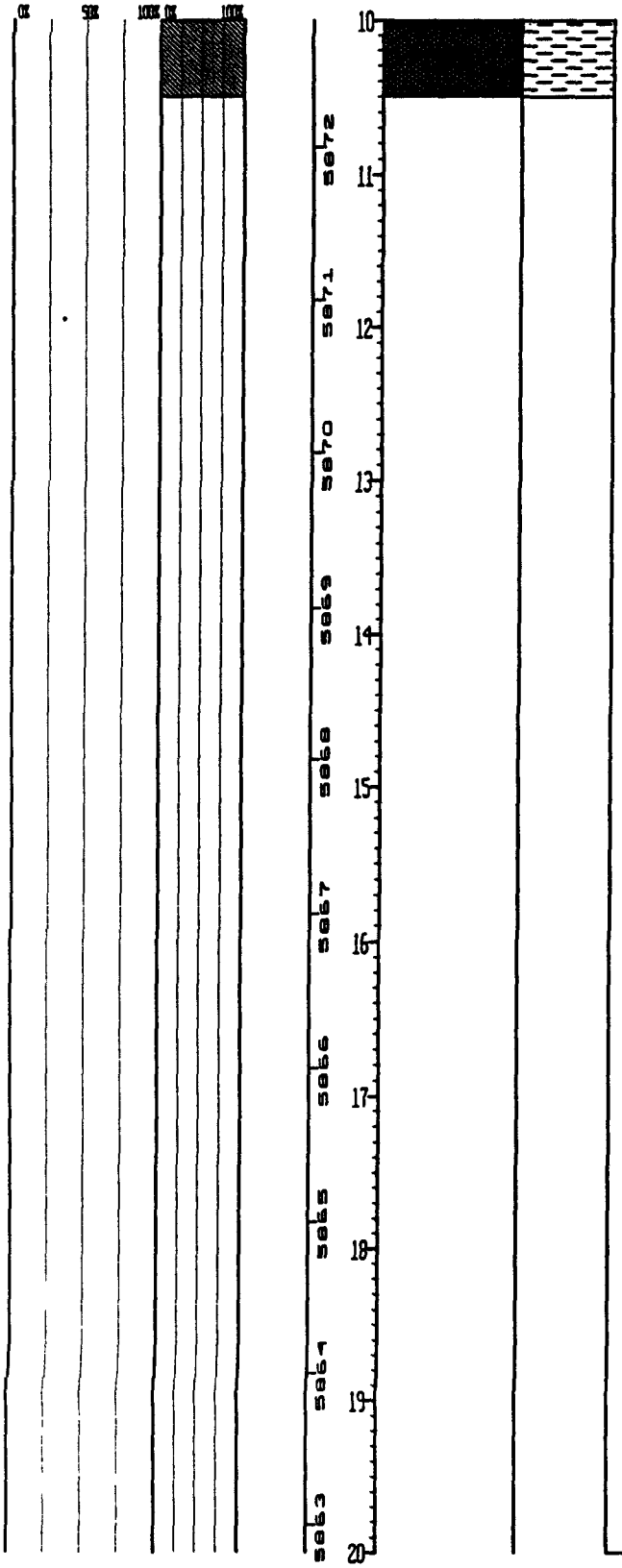
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16 5	GROUND ELEVATION (FT)	5931 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750943	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	19-86
EAST	2083238	LOCATOR NUMBER K10	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/11/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OK		50%	100% OK	100%	5931	0				NO SAMPLE
					5930	1				
					5929	2				
					5928	3				
					5927	4				
				0 /18	5926	5				
					5925	6				
					5924	7	09/11/86			
					5923	8				
					5922	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16 5	GROUND ELEVATION (FT)	5931 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750943	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	19-86
EAST	2083238	LOCATOR NUMBER K10	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/11/86	

REMARKS Hollow Stem Auger

CRITICAL SAMPLE / GRADATIONAL BA. DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0%	0/37	5921	10			NO SAMPLE	
		50%			5920	11				
					5919	12				
					5918	13				
				13/13	5917	14			CLAYSTONE	Light gray (N7), bedding not apparent, slightly friable, well weathered localized iron stains and dark calcareous fracture filing at approx 14 5 ft , slight silt component
					5916	15			CLAYSTONE	Same as above
				15/15	5915	16				
					5914	17				
					5913	18				
					5912	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22		GROUND ELEVATION (FT)	5960 47	PROJECT NUMBER	667 11
NORTH	751112	AREA SOLAR POND		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT
EAST	2084358	LOCATOR NUMBER	L11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/04/86
REMARKS	Hollow Stem Auger						

LOG OF BORING NUMBER

20-86

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0% 100%	1.7/2	5960	0			CH	Gravelly Sandy Clay - grayish orange (10YR 7/4), mod - high plast, sand is VFG-FG, max gravel size = 7 cm, some silt, some iron staining as mottles, some calc material, some roots
		50%		0/2	5958	2			NO SAMPLE	No Sample - a sample block is in the interval with only v coarse gravel, questionable representation of interval
				0.5/2.5	5956	4			GC	Sandy Clayey Gravel - matrix color is grayish orange (10YR 7/4) grading to moderate yellowish brown (10YR 5/4), angular to sub-angular, mod to poorly graded, max size = 6 cm, sand is FG to MG, some calc material
				0/1	5954	6			NO SAMPLE	
					5952	8			CONCRETE	Concrete
				0.2/.5	5951	10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT)	5950 47	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751112	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	20-86
EAST	2084358	LOCATOR NUMBER L11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/04/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0%	100% 02/5	5950	10				
					5949	11				
					5948	12				
				08/05					CLAYEY SANDSTONE	Top of Bedrock Dark yellowish orange, sub-angular to sub-rounded, poorly graded, sand is VFG - FG, abundant iron staining as mottles
					5947	13				NO SAMPLE
				0/17						
					5946	14				
				15/19	5945	15			SILTY CLAYSTONE	Yellowish gray (5Y 8/1) at top grading to pale yellowish brown (10YR 6/2), apparent massive bedding, highly weathered, mod - poorly friable, abundant carb material at base of interval (trace of carb material at top), some iron staining as mottles, top of interval shows sharp contact with sand (FG - MG), trace of sand at top of interval
						16				
				12/19	5944				SILTY CLAYSTONE	Same as above (base of interval) fracture at approx 80 degrees filled with calc material
					5943	17				
				14/15					SILTY CLAYSTONE	Same as above no apparent fractures
					5942	18				
						19				
				19/19	5941				SILTY CLAYSTONE	Same as above light olive gray (5Y 6/1), some carb material
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT)	5960 47	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751112	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	20-86
EAST	2084358	LOCATOR NUMBER L11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/04/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPL
GRADATIONAL SA
SAMPLE NUMBER

SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0% 50%	100% 0% 100%	0/21	5940 5939 5938 5937 5936 5935 5934 5933 5932 5931	20 21 22 23 24 25 26 27 28 29 30				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 78		GROUND ELEVATION (FT)	5991 11	PROJECT NUMBER	667 11
NORTH	750911	AREA PLANT NORTH		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB
EAST	2082503	LOCATOR NUMBER	J10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/14/86

REMARKS Hollow Stem Auger/NC Core

LOG OF BORING NUMBER

21-86

CHEMICAL SAMPL GRADATIONAL SA DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0/4; 0 7/4; 0 8/2 5

DATUM (FT): 5991, 5990, 5989, 5988, 5987, 5986, 5985, 5984, 5983, 5982

DEPTH (FT): 0, 1, 2, 3, 4, 5, 6, 7, 8, 9, 10

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
NO SAMPLE	
CL	GRAVELLY SANDY CLAY - light brown (5YR 5/6), low plasticity
CL	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 78	GROUND ELEVATION (FT)	5991 11	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750911	AREA PLANT NORTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	21-86
EAST	2082503	LOCATOR NUMBER J10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/14/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%							
					5981	10				
					5980	11			CL	Same as above
				07/25	5979	12				
					5978	13			CL	Same as above
				08/12	5977	14				
					5976	15			SANDY CLAYSTONE	Top of Bedrock Very light gray (N8), mottled dark yellowish orange (10YR 6/6), low to moderate plasticity, some silt, sand is disseminated throughout the majority of this interval with short intervals (<0 1 ft) of sand occuring locally
				02/05	5975	16			SANDY CLAYSTONE	Same as above
				19/25	5974	17				
					5973	18			SANDY CLAYSTONE	Same as above
				25/25	5972	19				
					5971	20				

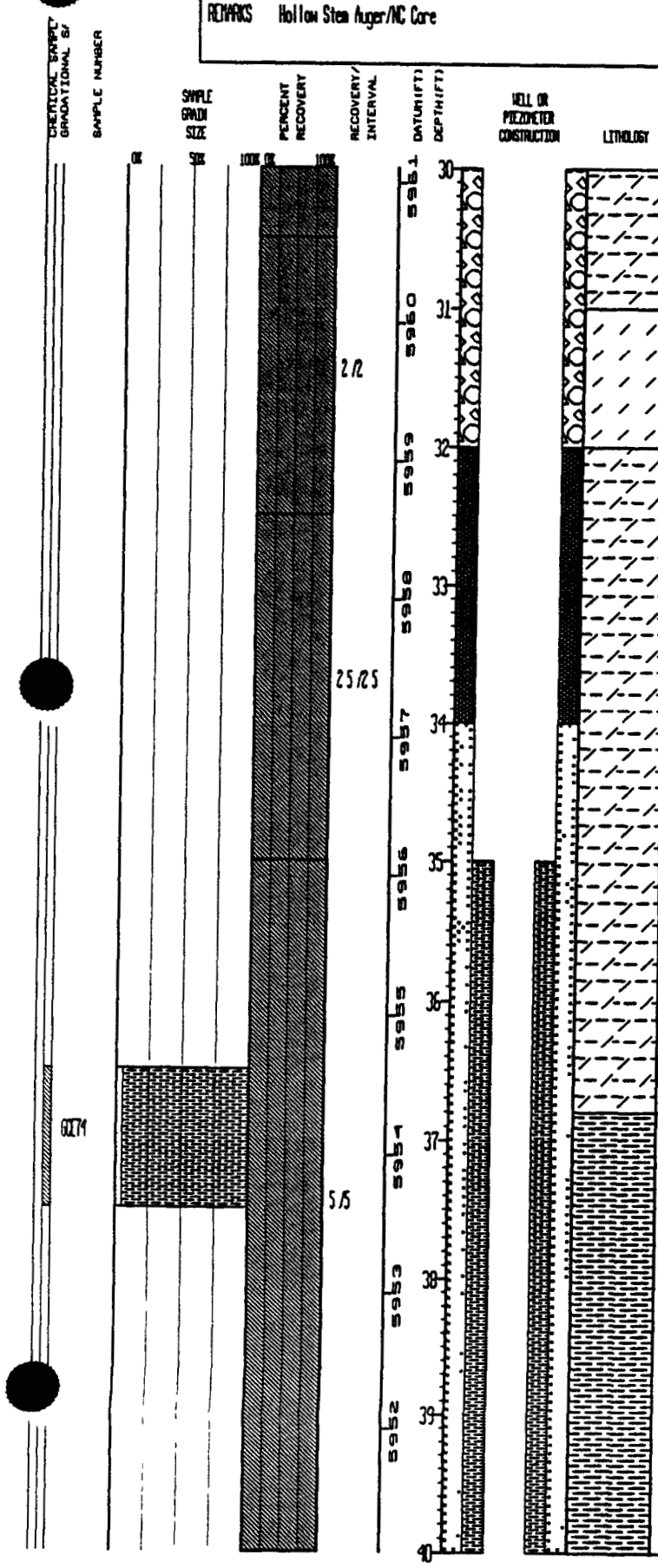
STATE PLANE COORDINATE		TOTAL DEPTH (FT)	78	GROUND ELEVATION (FT)	5991 11	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750911	AREA	PLANT NORTH	CASING DIAMETER (IN)	2 10	GEOLOGIST	DCB	21-86
EAST	2082503	LOCATOR NUMBER	J10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/14/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOIL	LOSS OR 100%							
				13/13	5971	20				
					5970	21			CLAYSTONE	Interval grades to claystone Very light gray (N8) to dark yellowish orange (10YR 6/6), iron staining, bedding not apparent, highly weathered, slightly friable, local occurences of dark mineralization (possibly a Mg oxide), slight silt fraction
				12/12	5969	22			CLAYSTONE	As above with a few sub-angular to sub-rounded gravel from approx 22 7 to 23 6 ft
					5968	23			CLAYSTONE	Same as above
				2.5/2.5	5967	24				
					5966	25				
					5965	26			CLAYSTONE	Same as above
				2.5/2.5	5964	27				
					5963	28			SILTY CLAYSTONE	Grayish orange (10YR 7/4), bedding not apparent, highly weathered, moderately friable, local iron staining and dark mineralization
				2.5/2.5	5962	29				
						30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 78	GROUND ELEVATION (FT) 5991 11	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750911	AREA PLANT NORTH	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	21-86
EAST	2082503	LOCATOR NUMBER J10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 11/14/86	

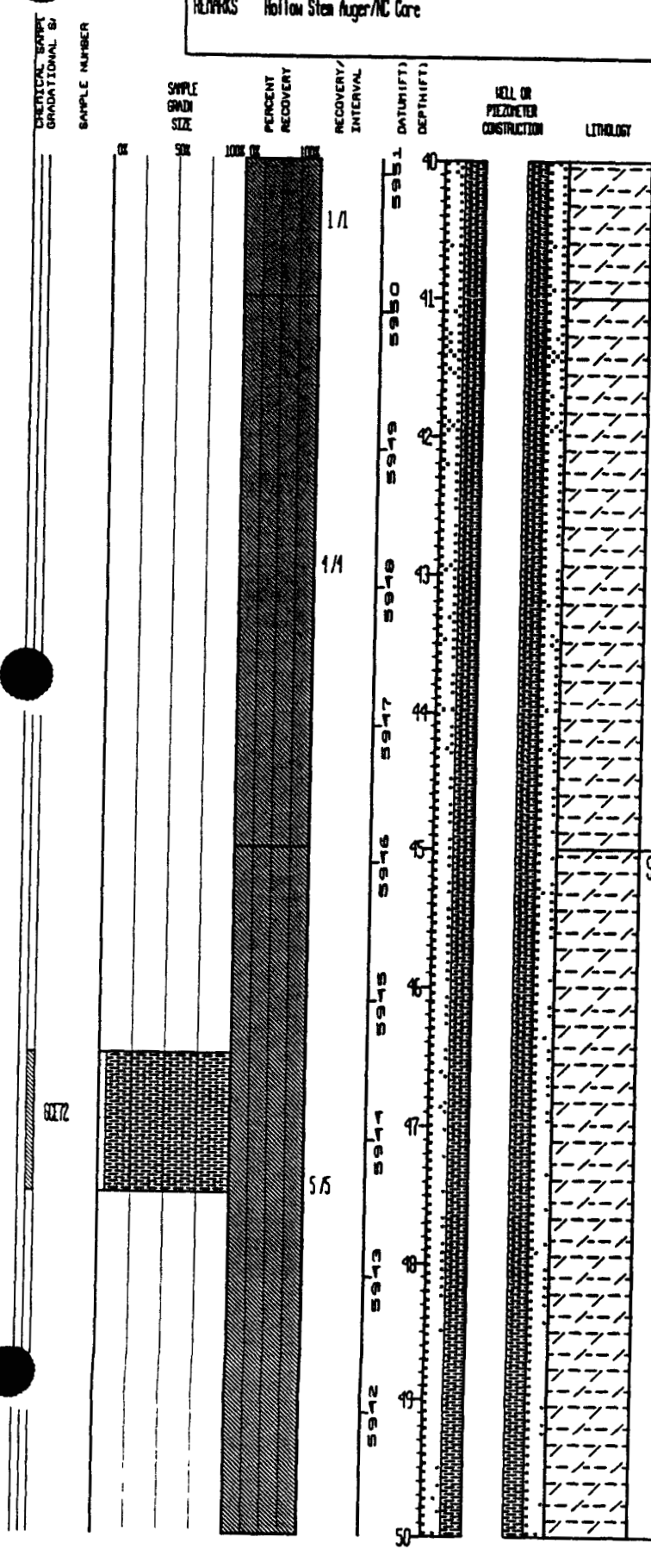
REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY SANDSTONE	Interval grades to silty sandstone at approx 31 ft Very light gray (N8) to grayish orange (10YR 7/4), bedding appears to be horizontal (based on core breaks), well weathered, slightly friable, local iron staining and dark mineralization (Mg oxides?) occurs on partings
SILTY CLAYSTONE	Interval grades to silty claystone Grayish orange (10YR 7/4), bedding not apparent, well weathered, slightly friable, dark mineralization occurs on a fracture face at approx 33 5 ft, abundant iron staining from approx 36 to 37 ft
CLAYSTONE	Interval grades to Claystone Medium light gray (N6), bedding appears to be horizontal (based on core breaks), weathered, slightly friable, significant silt fraction, localized occurences of dark mineralization, probably carbonaceous

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	78	GROUND ELEVATION (FT)	5991 11	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750911	AREA PLANT NORTH		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	21-86
EAST	2082503	LOCATOR NUMBER	J10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/14/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	As above
SILTY CLAYSTONE	As above
SILTY CLAYSTONE	Medium light gray (N6), thin, approx horizontal bedded to bedding not apparent, slightly friable, occasional intervals of v fine sand (typically < 0 2 ft thick), silt occurs disseminated throughout clay and as interfingering laminae At about 47 ft bedding on slabbed surface exhibits 10 degree dip

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 78	GROUND ELEVATION (FT)	5991 11	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750911	AREA PLANT NORTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	21-86
EAST	2082503	LOCATOR NUMBER J10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/14/86	

REMARKS Hollow Stem Auger/NC Core

SAMPLE NUMBER	CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%							
				05/05	5941	50			SILTY CLAYSTONE	As above
				1/1	5940	51			SILTY CLAYSTONE	As above
									SILTY SANDSTONE	Interval grades to silty sandstone, very light gray (N8), thin wavy bedding, slightly friable, very fine grained, well sorted
					5939	52			SILTSTONE	Very light gray (N8), bedding not apparent, slightly friable
				35/35	5938	53				
					5937	54				
					5936	55			SILTSTONE	Same as above
					5935	56				
					5934	57			SILTY CLAYSTONE	Light gray (N7), bedding is thin with slight dip to bedding not apparent, moderate to slight weathering, slightly friable, silt is disseminated throughout clay and as interfingering laminae, slight VFG sand fraction as beds <0 1 ft and disseminated locally
				5/5	5933	58				
					5932	59				
						60				

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STATE PLANE COORDINATE		TOTAL DEPTH (FT) 78	GROUND ELEVATION (FT) 5991 11	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750911	AREA PLANT NORTH	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	21-86
EAST	2082503	LOCATOR NUMBER J10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 11/14/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER: GCE73

SAMPLE GRAIN SIZE: 0% 50% 100%

PERCENT RECOVERY: 0% 100%

RECOVERY/INTERVAL: 0 5/0 5; 1 5/1 5; 3/3; 2/2; 2 5/2 5

DATUM (FT): 5931, 5930, 5929, 5928, 5927, 5926, 5925, 5924, 5923, 5922

DEPTH (FT): 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	As above with abundant VFG sand
SILTY CLAYSTONE	At 60 5 ft silty, sandy claystone unconformably overlies a claystone The unconformity is not borne out by the sequence at the top of the next box Silty claystone, light gray (N7), bedding is thin <2 cm with slight dip to not apparent, weathered, slight to moderate friability, some VFG sand, silt and sand core disseminated within the claystone and occur as discreet intervals
SILTSTONE	Interbedded siltstone and claystone Siltstone, light gray (N7) to med dark gray (N4), thin bedded < 2 mm, with slight dip, slightly weathered slightly friable, clay defines bedding planes, significant fraction of VFG sand, carbonaceous mineralization occurs on bedding planes
SILTSTONE	Same as above
CLAYSTONE	Medium gray (N5), bedding not apparent, slightly weathered, slightly friable, localized iron staining, some carbonaceous mineralization occurs on partings, moderate silt fraction
CLAYSTONE	As above
CLAYSTONE	As above with increase in silt fraction from approx 70 5 to 71 2 ft, silt/clay define bedding <2 mm thick Slickensides at approx 72 6 ft

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 78	GROUND ELEVATION (FT) 5991 11	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750911	AREA PLANT NORTH	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	21-86
EAST	2082503	LOCATOR NUMBER J10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 11/14/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

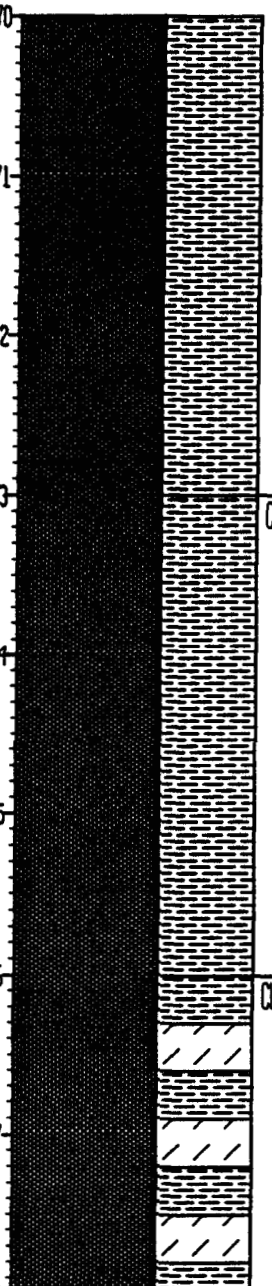
RECOVERY/INTERVAL: 3 5/3 5; 3/3; 2/2

DATUM (FT): 5921, 5920, 5919, 5918, 5917, 5916, 5915, 5914, 5913, 5912

DEPTH (FT): 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY



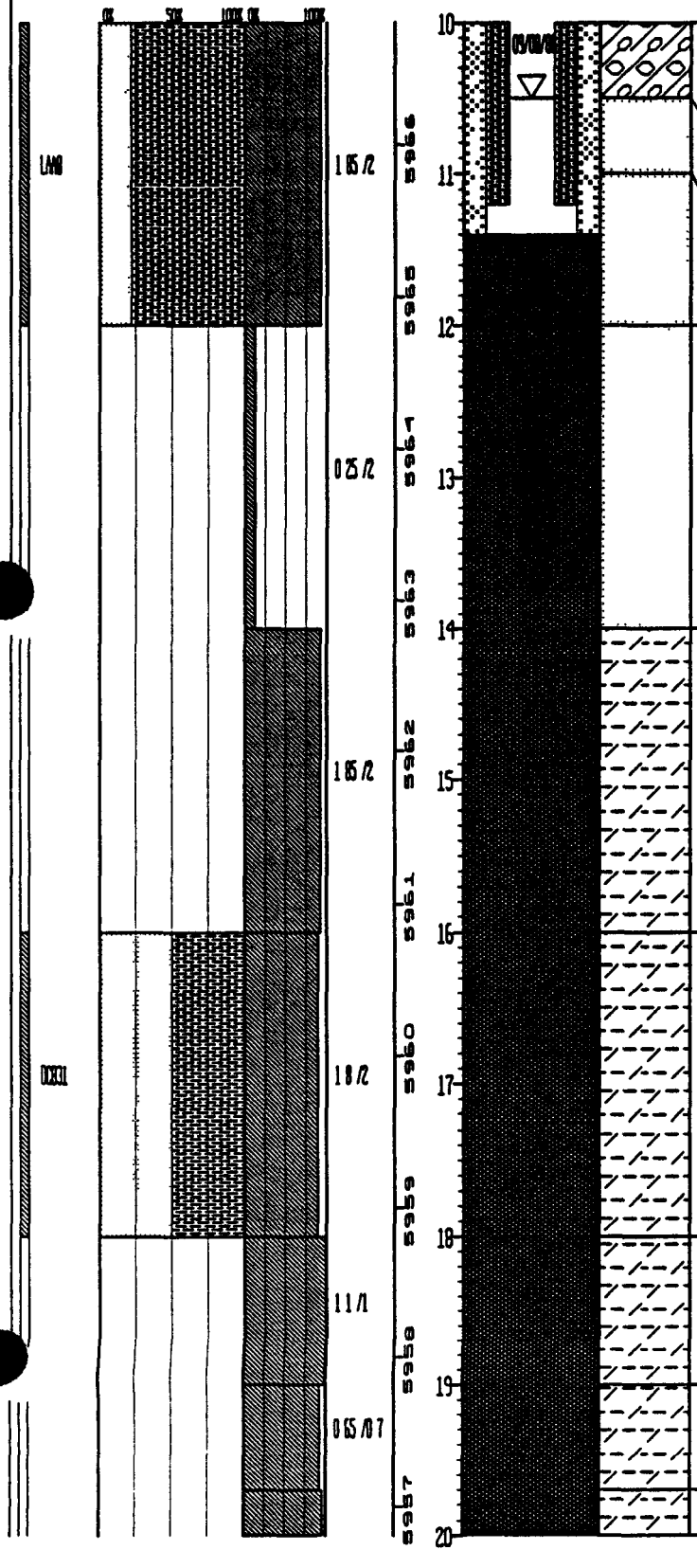
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	approx 22 degrees attitude
CLAYSTONE	Same as above
CLAYSTONE	Interbedded siltstone and claystone Silty claystone, light gray (N7) med dark gray (N4), thin bedded <2 mm, slight dip, slightly weathered, slightly friable, localized iron staining Note No water encountered during drilling

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 26	GROUND ELEVATION (FT)	5976 81	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750737	AREA SOLAR POND	CASING DIAMETER (IN)	2 10	GEOLOGIST	LAA	22-86
EAST	2084412	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/08/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SI	SAMPLE NUMBER	SAMPLE GRADN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1.5/3	5975	0			GC	Clayey Gravel - no predom color for gravel, angular to subrounded, mod well graded, granules to 4 cm Clay matrix dk yellowish brown (10YR 4/2), est plast low to mod, some silt and VFG sand
				0.2/0.4	5974	1			GC	Same as above Color change in matrix to moderate yellowish brown (10YR 5/4)
				0.4/1.6	5973	2			GW	Markers indicate a sample was removed here GRAVEL - grayish orange pink (10R 8/2) Looks like ground up single rock
				1.5/2	5971	5			GM	SANDY GRAVEL - med lt gray (N6), angular, mod to well graded to 5 5 cm, sandy caliche matrix, sand VFG to coarse
					5970	6	09/12/86			
				0.5/3	5969	7			CL	SANDY CLAY - grayish orange (10YR 7/4), plast low, sand VFG to V coarse, some gravel to 3 cm
					5968	8				
					5967	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 26	GROUND ELEVATION (FT) 5976 81	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750737	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	22-86
EAST	2084412	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/08/86	

REMARKS Hollow Stem Auger



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	Clayey Sand and Gravel - gravel predom med gray (N5), well graded granules to 5 cm, subangular to subrounded Sand VFG to granules (well graded), some silt
SANDSTONE	Top of Bedrock Very pale orange (10YR 8/2), VFG, some iron staining, well sorted
SANDSTONE	Very pale orange (10YR 8/2), VFG, some iron staining, well sorted
SANDSTONE	Marker indicates sample was removed here Same as above
SILTY CLAYSTONE	Very pale orange to dk yellowish orange (10YR 8/2 to 6/6), mod to high plast, some iron staining, trace calcite, carbonaceous material
SILTY CLAYSTONE	Very pale orange to dk yellowish orange (10YR 8/2 to 6/6), mod weathered, slightly to mod friable, bedding not evident, some VFG sand, some iron staining, trace carb material
SILTY CLAYSTONE	Same as above
SILTY CLAYSTONE	Same as above
SILTY CLAYSTONE	Very pale orange to dk yellowish orange (10YR 8/2 to 10YR 7/4), mod

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 26	GROUND ELEVATION (FT) 5976 81	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750737	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	22-86
EAST	2084412	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/08/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 25/1 3; 1 65/2; 1 1/1; 0/2

DATUM (FT): 5956, 5955, 5954, 5953, 5952, 5951, 5950, 5949, 5948, 5947

DEPTH (FT): 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

weathered, slightly to mod friable, some iron staining, some black carb material, some VFG sand

SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above

NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 4	GROUND ELEVATION (FT)	0	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA N/A	CASING DIAMETER (IN)	0	GEOLOGIST	DAT	22A-86
EAST	0	LOCATOR NUMBER N/A	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	N/A	
REMARKS							

GRAPHICAL SAMPLE GRADATIONAL SY	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		CR SD	100% CR 100%	01/01	0 0			CL	GRAVELLY CLAY - moderate brown (5YR 4/4), mod to low plast, some sand
				31/31	1 2 3			CL	CLAY - light olive gray (5Y 6/1), mod to low plast, some carb material becoming more abundant in lower 2 ft of interval, some iron staining as mottles, trace of calcite
				05/05	4			CL	Same as above less carb material
					5 6 7 8 9 10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST OCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5981	0			NO SAMPLE	
					5980	1				
					5979	2				
					5978	3				
					5977	4				
					5976	5				
				0 /12 6	5975	6				
					5974	7				
					5973	8				
					5972	9			Top of Bedrock	
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 S	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
										NO SAMPLE
				14/14	5971	10			CLAYSTONE	Light gray (N7) bedding not apparent, slightly weathered, slightly friable, caliche occurs as fracture filling, local iron staining, slight silt fraction
					5970	11				
					5969	12				
					5968	13				
				2/2	5967	14			CLAYSTONE	As above with iron staining on fractures and moderate amount of Mg oxide mineralization
					5966	15				
				1/1	5965	16			CLAYSTONE	As above
				03/03	5964	17			CLAYSTONE	As above
				17/17	5963	18			CLAYSTONE	As above
					5962	19			CLAYSTONE	As above
				18/18		20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	130 5	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5961	20				
				12/12	5960	21			CLAYSTONE	As above Slickensides at approx 21 9 ft, attitudes 50 degrees and 60 degrees, iron staining and possible Mg oxides on surface
					5959	22			CLAYSTONE	Same as above, carbonaceous mineralization (low grade coal) at approx 22 8 ft
				18/18	5958	23				
					5957	24			CLAYSTONE	Same as above, slickensides at approx 25 ft
				17/17	5956	25				
					5955	26			CLAYSTONE	Same as above
				15/15	5954	27				
					5953	28			CLAYSTONE	Same as above, slickensides at 28 2 ft and 28 6 ft attitudes approx 30 degrees
				16/16	5952	29				
						30			NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0/44; 18/18; 18/18; 14/14; 29/29

DATUM (FT): 5951, 5950, 5949, 5948, 5947, 5946, 5945, 5944, 5943, 5942

DEPTH (FT): 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light gray (N7) to yellowish gray (5Y 8/1), bedding not apparent, well weathered, slightly friable, slight silt fraction, some dark mineralization, probably carbonaceous, occasional iron stains and calcareous bodies <1 mm in diam
CLAYSTONE	As above
CLAYSTONE	As above, slabbed section exhibits multiple very fine healed fractures
CLAYSTONE	Light gray (N7), bedding not apparent, weathered, slightly friable, vertical fractures and approx 25 degree fractures with iron staining, slightly calcareous in places

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	130 5	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SA... DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%		5941	40				
					5940	41			CLAYSTONE	As above, exterior of core has a knotty appearance From 42 7 to 43 2 ft interval is highly weathered
				2.1/2.1	5939	42				
					5938	43			CLAYSTONE	Same as above
				1/2.9	5937	44				
					5936	45				
					5935	46			CLAYSTONE	Medium light gray (N6) to very light gray (N8), bedding not apparent, possible soft sediment deformation or bioturbation, well weathered, moderately friable, abundant carbonaceous mineralization, some iron staining
				1/1	5934	47			CLAYSTONE	Same as above
				1.3/1.3	5933	48				
					5932	49			CLAYSTONE	Medium gray (N6), bedding not apparent, well weathered, slightly friable, abundant iron staining on bedding plane partings and fractures, slickensides at approx 49 6 ft
				1.9/1.9		50				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	130 5	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%		5931	50			CLAYSTONE	As above, slickensides at approx 50 1 to 50 4 ft
				16/16	5930	51				
					5929	52			CLAYSTONE	As above, slickensides at approx 52 5 ft
				27/27	5928	53				
					5927	54				
									CLAYSTONE	Light olive gray (5Y 6/1), bedding not apparent, weathered, slightly friable, trace of silt, slickensides at approx 55 4 ft , slight amount of iron staining
				15/15	5926	55				
									NO SAMPLE	
				0/14	5925	56				
					5924	57			CLAYSTONE	Light gray (N7) to medium dark gray (N4), bedding not apparent, well weathered, slight to moderate friability, moderate silt fraction, slight iron staining and carbonaceous mineralization
				16/16	5923	58				
									CLAYSTONE	As above
					5922	59				
				2/2		60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	130 5	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5921	60				
					5920	61			CLAYEY SILTSTONE	Light gray (N7), bedding not apparent (massive?), slightly friable, iron stain at approx 62 ft with possible carbonaceous mineralization
				18/18	5919	62				
					5918	63			SILTY CLAYSTONE	Interval grades to a silty claystone at 62 7 ft as above, iron stains absent
				18/18	5917	64				
					5916	65			SILTSTONE	Light gray (N7), bedding not apparent (massive?), slightly friable, slight clay fraction, slight amount of carbonaceous mineralization
				15/15	5915	66			SILTSTONE	As above
				17/17	5914	67				
					5913	68			SILTSTONE	As above
				16/16	5912	69			CLAYSTONE	Dark gray (N3), bedding not apparent, weathered, slight to moderate friability, slight amount of iron staining, moderate silt fraction, slickensides at approx 68 5 ft
				12/12		70			CLAYSTONE	As above, some carbonaceous mineralization, slickensides at approx 69 8 ft

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	130 5	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	SIX	100% DR 100%		5911	70				
				5910	71			CLAYSTONE	As above
				5909	72				
			2 /5	5908	73				
				5907	74				
				5906	75				
				5905	76			CLAYSTONE	As above, slickensides at approx 77 0 ft
			19/19	5904	77				
				5903	78			CLAYSTONE	As above with an increase in the silt fraction from approx 77 4 ft to 80 5 ft and color grades to light gray (N7)
			2 /2	5902	79				
			1 1/1 1		80			CLAYSTONE	As above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST OCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

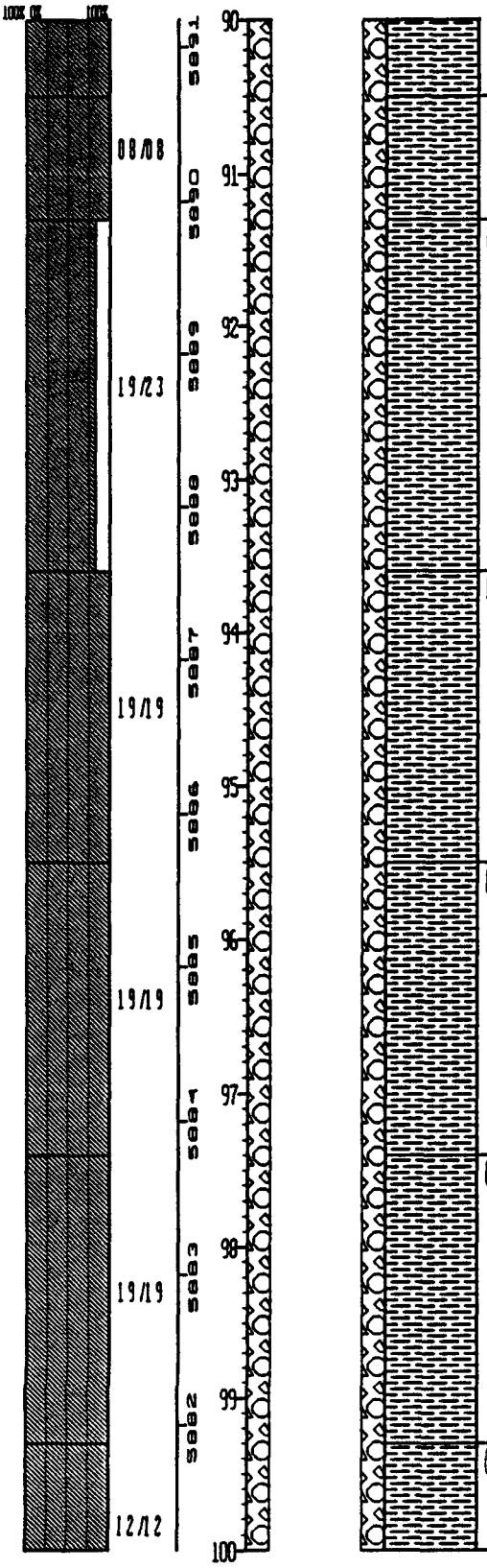
PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	5901	80				
05/05					CLAYSTONE	Light olive gray (5Y 6/1), bedding not apparent, slightly friable, occasional iron staining, moderate silt fraction
	5900	81			CLAYSTONE	As above
23/23	5899	82				
	5898	83				
					CLAYSTONE	As above Slickensides at approx 85 2 ft with 40 degree attitude
22/22	5897	84				
	5896	85				
					CLAYSTONE	As above, slickensides are absent Irregular body of VFG sand at approx 85 9 ft
19/19	5895	86				
	5894	87				
					CLAYSTONE	As above
18/18	5893	88				
	5892	89				
					CLAYSTONE	As above with irregular body of VFG sand at approx 89 5 ft
13/13		90				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



RECOVERY/INTERVAL	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
08/08	CLAYSTONE	As above with moderate amount of VFG sand at approx 90 6 ft
19/23	CLAYSTONE	As above
19/19	CLAYSTONE	As above
19/19	CLAYSTONE	As above, VFG sand is absent, occasional iron staining and carbonaceous mineralization, mineralized body at approx 96 ft, some white bladed to fibrous crystals (gypsum?) underlain by gray granular mass, Fe oxide and possible Mg oxide stains surround mineral body Fractures with faint slickensides at approx 97 ft and 99 1 ft
19/19	CLAYSTONE	As above
12/12	CLAYSTONE	Light olive gray (5Y 6/1), bedding not apparent, slightly friable, slight to moderate silt fraction, occasional iron staining and carbonaceous mineralization

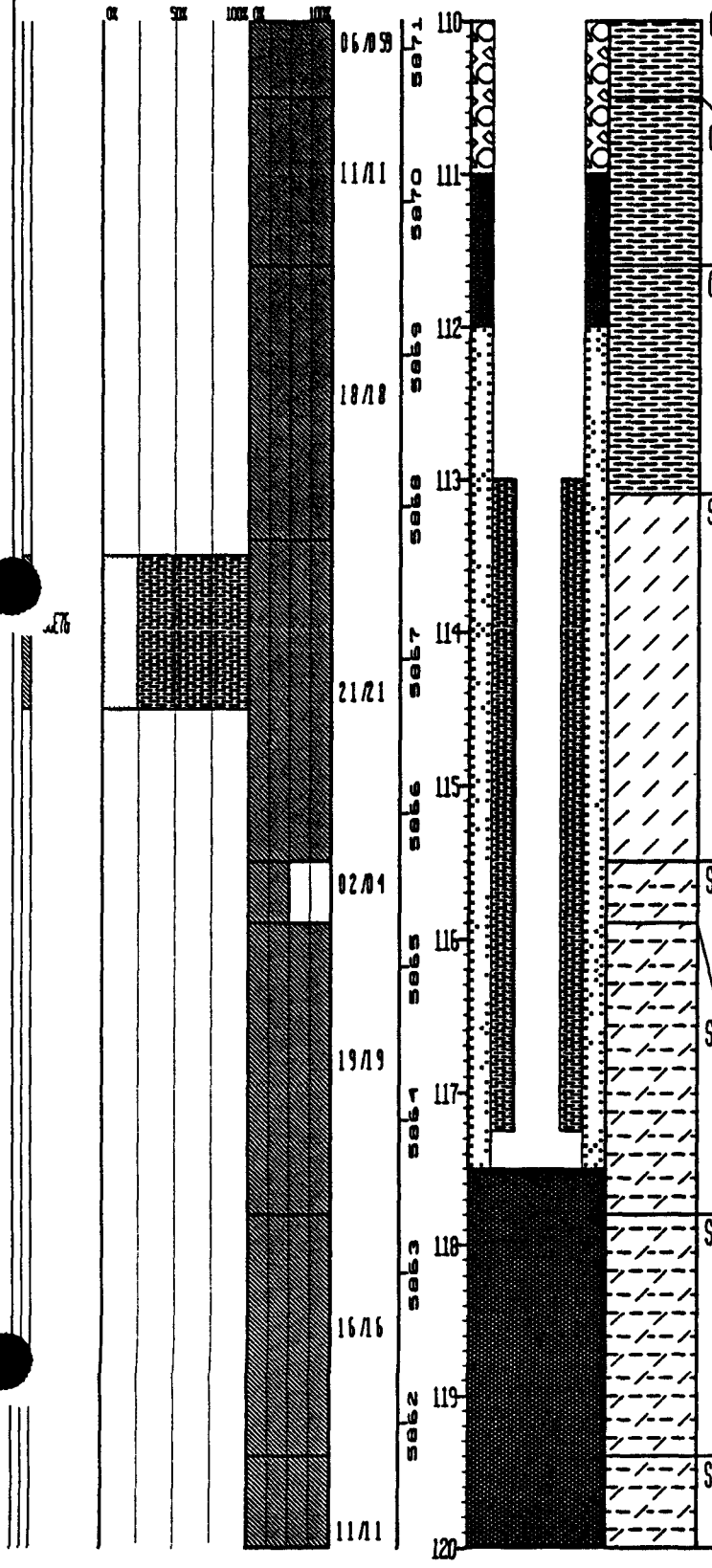
STATE PLANE COORDINATE		TOTAL DEPTH (FT)	130 5	GROUND ELEVATION (FT)	5981 18	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	23-86
EAST	2084259	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) / DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					100				
				18/18	101			CLAYSTONE	As above, lense of FG sand at approx 102 ft approx 2 in in thickness
					102				
				13/13	103			CLAYEY SILTSTONE	Interval grades to clayey siltstone at approx 102 5 ft Light olive gray (5Y 6/1), bedding is not apparent, slightly friable, slight fraction of VFG sand locally, occasional iron staining and carbonaceous mineralization
				19/19	104			CLAYEY SILTSTONE	As above, increase in clay fraction below 105 ft
	6275			2/2	105				
					106			SILTY CLAYSTONE	Light olive gray (5Y 6/1), bedding not apparent, weathered, slightly to moderately friable, occasional iron stains and carbonaceous mineralization
				0/24	107				
					108			NO SAMPLE	
					109				
					110				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5Y 6/1), bedding not apparent, slightly weathered, slightly friable, occasional carbonaceous mineralization, slight silt fraction, color varies to medium dark gray (N5)
CLAYSTONE	Same as above
CLAYSTONE	Same as above
SILTSTONE	Light gray (N7), bedding not apparent, slightly friable, occasional carbonaceous mineralizations
SILTY CLAYSTONE	Interval grades to silty claystone Light gray (N7) to medium gray (N5), bedding exhibits extensive bioturbation and soft sediment deformation, weathered, slightly friable, carbonaceous mineralization occurs on partings
SILTY CLAYSTONE	As above
SILTY CLAYSTONE	As above, thin stringers of coal <2 mm which appear to cross out bedding
SILTY CLAYSTONE	As above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

RECOVERY/INTERVAL	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	120		
0 6/0 59		SILTY CLAYSTONE	As above
	121	SILTY CLAYSTONE	As above, slickensides at approx 122 7 ft
1 8/1 8	122		
	123	SILTY CLAYSTONE	As above, bedding appears to have slight dip (based on core breaks)
2/2	124		
0 6/0 59	125	SILTY CLAYSTONE	As above
0 8/0 8	126	SILTY CLAYSTONE	As above
1 5/1 5	127	SILTY CLAYSTONE	As above
1 7/1 7	128	SILTY CLAYSTONE	As above
	129		
1/1	130	SILTY CLAYSTONE	As above

5861 5860 5859 5858 5857 5856 5855 5854 5853 5852

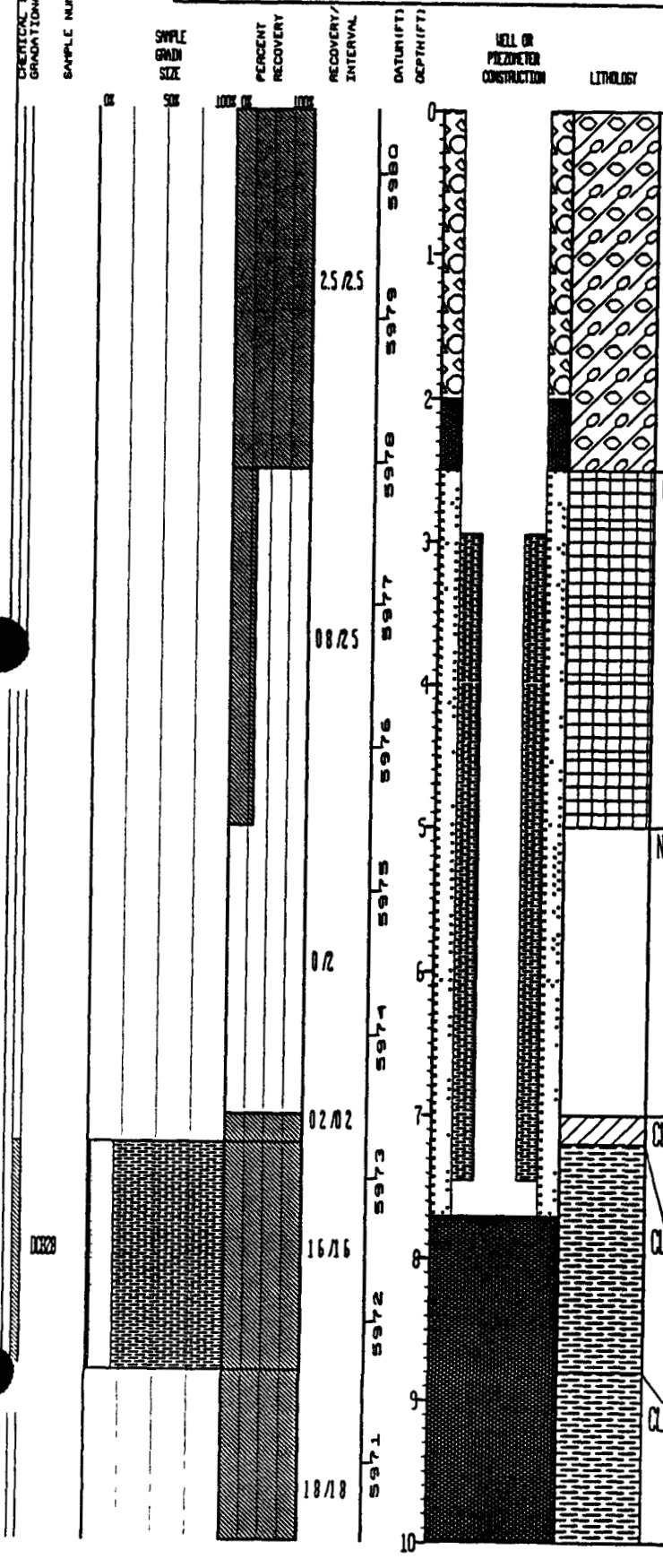
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 130 5	GROUND ELEVATION (FT) 5981 18	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	23-86
EAST	2084259	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/23/86	

REMARKS Hollow Stem Auger/NC Core Built well in NC rod no centralizers used

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	0% 50% 100%	0% 100%	1/1	5851	130				NOTE No water encountered while drilling
				5850	131				
				5849	132				
				5848	133				
				5847	134				
				5846	135				
				5845	136				
				5844	137				
				5843	138				
				5842	139				
					140				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 12	GROUND ELEVATION (FT) 5980 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750357	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	24-86
EAST	2084277	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/12/86	

REMARKS Hollow Stem Auger Cave from TD to 11 9



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	Clayey Gravel - light gray (N7), matrix is pale yellowish brown (10YR 6/2) to pale brown (5YR 5/2), angular to sub-rounded, poorly graded, max size 7 cm, some silt and trace of VFG sand
CALICHE	Caliche and Gravel - white (N9)
NO SAMPLE	
CL	GRAVELLY SANDY CLAY - light gray (N7) mottled dark yellowish orange (10YR 6/6), low to moderate plasticity, max gravel size is 5 cm, sand is VFG to CG
CLAYSTONE	Top of Bedrock Light gray (N7) to mottled dark yellowish orange (10YR 6/6), bedding not apparent, highly weathered, slightly to moderately friable, caliche as fracture filling, localized carbonaceous mineralization and iron staining
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	12	GROUND ELEVATION (FT)	5980 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750357	AREA	SOLAR POND	CASING DIAMETER (IN)	2 00	GEOLOGIST	DCB	24-86
EAST	2084277	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/12/86	

REMARKS Hollow Stem Auger Core from 10 to 11 9

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OR 100%	11/11	10 5970				
					11 5969			CLAYSTONE	Same as above
					12 5968				NOTE No water encountered while drilling
					13 5967				
					14 5966				
					15 5965				
					16 5964				
					17 5963				
					18 5962				
					19 5961				
					20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/17/86	

REMARKS MC Core Cave from TD to 84 60 ft

CHEMICAL SAMPLE DEPTH	GRADATIONAL SIZE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			GR SD	100% GR	100%					GC	SANDY GRAVEL - moderate orange pink (5YR 8/4), sub-angular to angular, mod to well graded, max size = 5 cm, sand is VFG - MG
										SC	Gravelly Clayey Sand - pale yellowish brown (10YR 6/2), angular to sub-angular, mod graded, sand is FG - CG, max gravel size = 4 cm, matrix is calcareous, some calcite, bottom of interval has possible black tar
					14/25	5974	0			GW	CALCAREOUS GRAVEL - very pale orange (10YR 8/2), angular to sub-angular, mod grading, max size = 8 cm, some possible iron staining, some MG - FG sand, trace of clay
						5973	1				
						5972	2				
					09/25	5971	3				
						5970	4				
						5969	5			GW	Same as above
					05/2	5968	6				
						5967	7			GW	Same as above
							8			CALICHE	Top of Bedrock White (N9), trace of gravel, trace of iron nodules
					13.5/25	5966	9			SANDY CLAYSTONE	VFG Sandy Claystone, very light gray (N8), non-apparent bedding, well weathered, mod friable, some iron staining as mottles, trace of calc material, trace of Mg staining, trace of iron concretions, sharp contact with above caliche
						5965	10			CLAYSTONE	Top 6 in same as above Bottom of interval Claystone, very light gray (N8), non-apparent bedding, well weathered, mod friable, some iron

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	89 6	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	25-86
EAST	2094831	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/17/86	

REMARKS NC Core Cove from TD to 89 60 ft

CHEMICAL SAMPLE / GRADATIONAL SA TH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OX	100% OX 100%	15/18	5964				staining as mottles, some silt, trace of Mg staining trace of calcite at approx 10 5 ft
				09/07	5963			CLAYSTONE	Same as above some calc material, abundant micro fractures
				06/06	5962			CLAYSTONE	Same as above
					5961			NO SAMPLE	
					5960				
					5959				
					5958				
					5957				
					5956				
					5955				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/17/86	

REMARKS NC Core Cave from TD to 84 60 ft

CHEMICAL SAMPLE GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						20			NO SAMPLE	
					5954					
						21				
					5953					
						22				
					5952					
						23				
					5951					
						24				
					5950					
						25				
					5949					
						26				
					5948					
				0 /29		27				
					5947					
						28				
					5946					
						29				
					5945					
						30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN)	2 00	GEOLOGIST	DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/17/86	

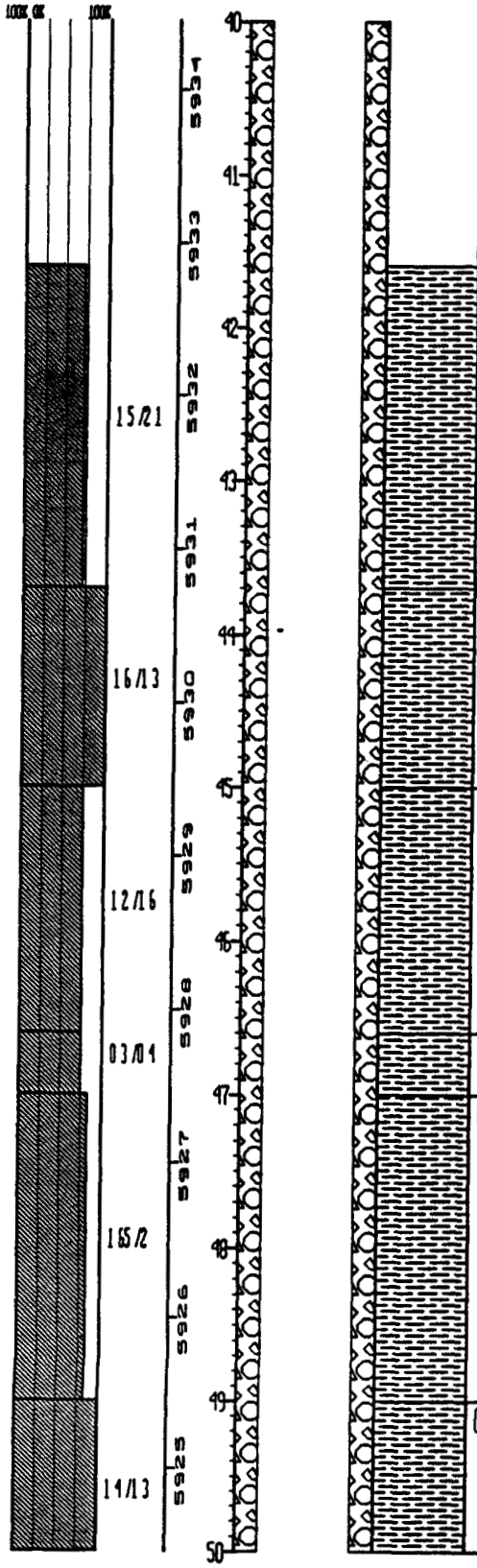
REMARKS NC Core Cove from TD to 84 60 ft

CHEMICAL SAMP / GRADATIONAL S / DEPTH	SAMPLE NUMBER	SAMPLE GRADATION SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%		5935 5936 5937 5938 5939 5940 5941 5942 5943 5944	30 31 32 33 34 35 36 37 38 39 40				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT) 5974 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/17/86	

REMARKS NC Core Cove from TD to 84 60 ft

CHEMICAL SAMP GRADATIONAL S DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

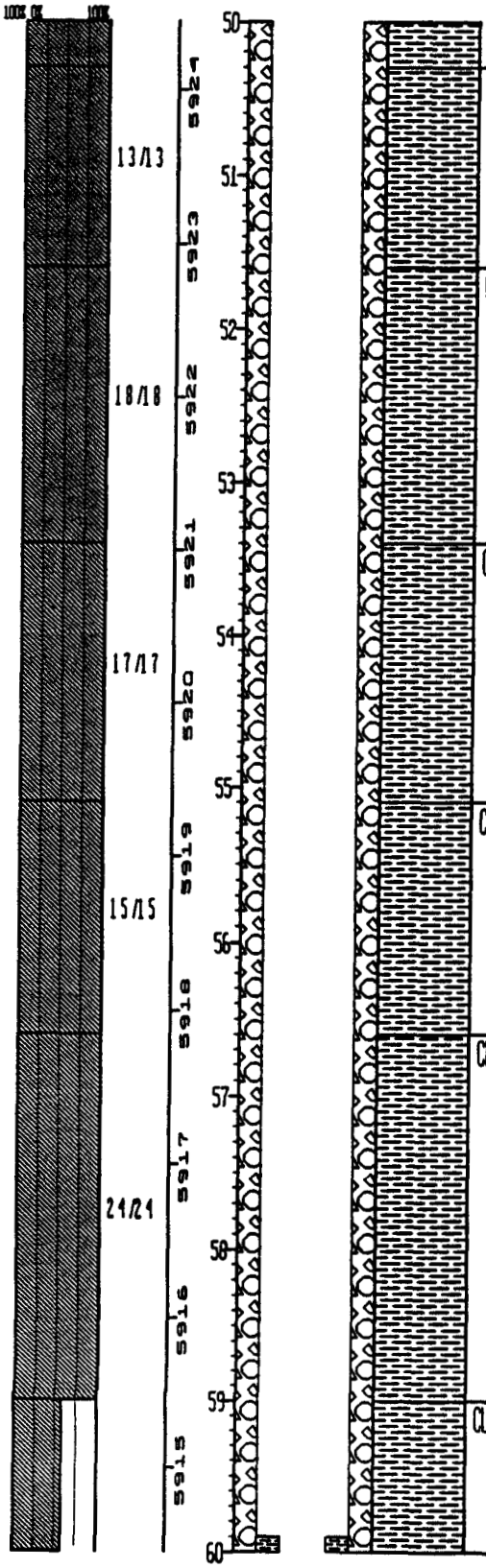


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
NO SAMPLE	
CLAYSTONE	Light gray (N7), non apparent bedding, well weathered mod - poorly friable, some iron staining as mottles increasing at base of interval, trace of silt
CLAYSTONE	Same as above some silt, trace iron staining NOTE core is covered with iron stained mud
CLAYSTONE	Top of interval same as above, fracture at 50 - 80 degrees Bottom 3 in of interval same as above, light brown (5YR 5/6), abundant iron as staining and concretions, floury texture
CLAYSTONE	Same as above
CLAYSTONE	Same as above consolidated texture Base of interval same as above, yellowish gray (5Y 8/1), iron staining as mottles
CLAYSTONE	Same as above Fractures at 45, 60, 70 degrees showing slickensides, iron staining along fracture faces

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT) 5974 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/17/86	

REMARKS NC Core Cove from TD to 84 60 ft

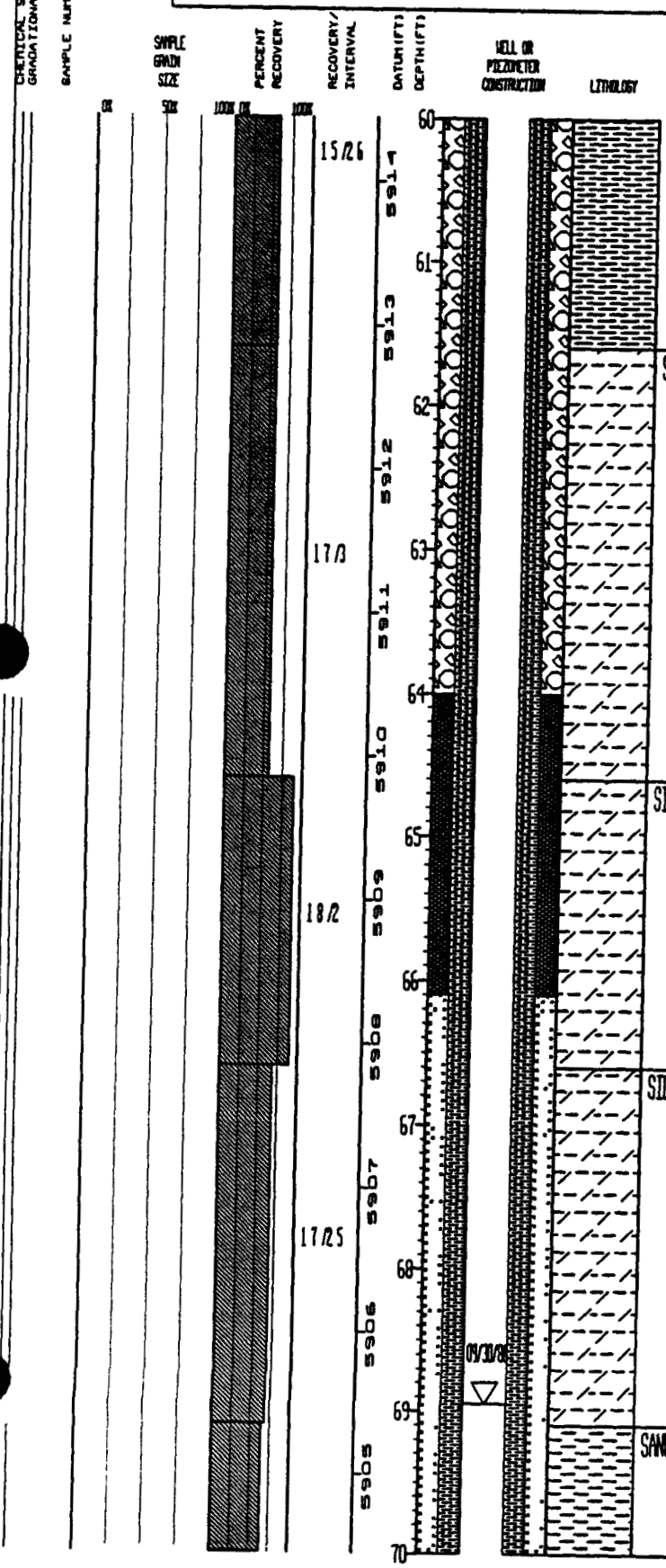
CHEMICAL SAMPLE / GRADATIONAL SA / DEPTH / SAMPLE NUMBER / SAMPLE GRAIN SIZE (0% 50% 100%) / PERCENT RECOVERY (0% 100%) / RECOVERY/INTERVAL / DATUM (FT) / DEPTH (FT) / WELL OR PIEZOMETER CONSTRUCTION / LITHOLOGY / UNIFIED SOILS CLASSIFICATION OR ROCK TYPE / DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5Y 6/1), massive bedding, well weathered, mod friable, some iron staining as mottles, 60, 70 degree fracture, base of interval has some fractures, trace of silt
CLAYSTONE	Same as above brownish gray (5YR 4/1), trace of carb material
CLAYSTONE	Same as above
CLAYSTONE	Same as above some carb material, coal seam (approx 2 - 4 mm), (horizontal), fracture at 50 degrees
CLAYSTONE	Same as above very highly weathered
CLAYSTONE	Same as above olive gray (5Y 4/1)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/17/86	

REMARKS NC Core Cave from TD to 84 60 ft



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Light olive gray (5Y 6/1), massive bedding with some horizontal laminar bedding, highly weathered, mod to poorly friable, some carb material, trace of iron staining as mottles, possible vertical fracturing
SILTY CLAYSTONE	Same as above higher silt fraction
SILTY CLAYSTONE	Same as above lower silt content
SANDY CLAYSTONE	(Or possible clay), moderate yellowish brown (10YR 5/4), bedding non-apparent, highly weathered, mod friable, sand is FG-CG, some gravel, max size = 7 cm, trace of calc material NOTE This interval seems to be out of place compared to above claystones

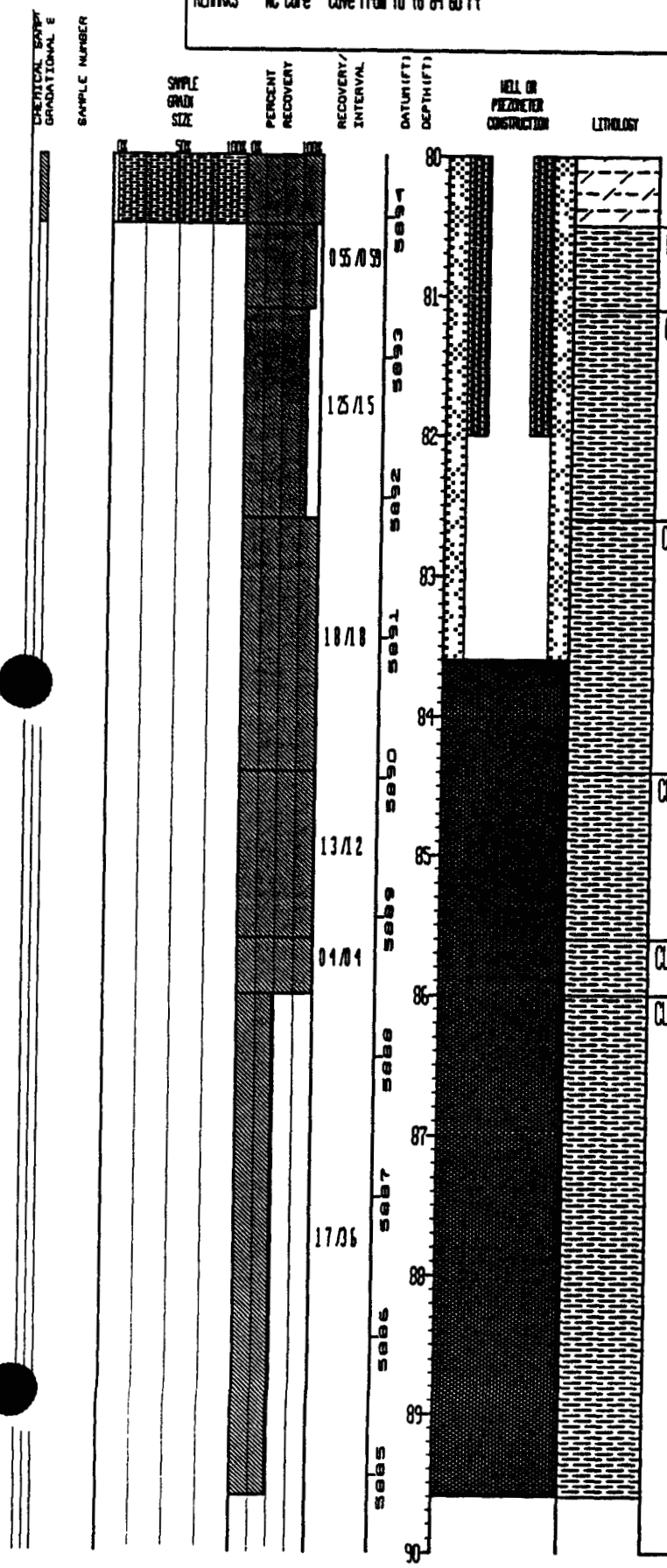
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN)	2 IN	GEOLOGIST	DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/17/86	

REMARKS NC Core Cove from 70 to 84 60 ft

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				16/25	sob4	70				
					sob3	71				
						72				NO SAMPLE
				0/24	sob2	73				
					sob1	74			CLAYSTONE	Olive gray (5Y 4/1), apparent massive bedding, highly weathered, mod - poorly friable, some silt, trace of carb material
				15/18	sob0	75	10/21/86			
					saa9	76	10/01/86		SILTY CLAYSTONE	Light olive gray (5Y 6/1), massive bedding, highly weathered, mod to poorly friable, trace of carb material
00329				19/18	saa8	77				
					saa7	78			SILTY CLAYSTONE	Same as above trace of iron staining as mottles, increased silt fraction at base of interval
				15/16	saa6	79				
00332				15/13	saa5	80			SILTY CLAYSTONE	Same as above decreased silt fraction at base of interval

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT) 5974 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	25-86
EAST	2084831	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/17/86	

REMARKS NC Core Cave from TD to 84 60 ft



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5Y 6/1), non - apparent bedding, well weathered, mod - poorly friable, some carb material
CLAYSTONE	Same as above abundant carb material, some iron staining as mottles
CLAYSTONE	Carbonaceous, olive black (5Y 2/1), laminar bedding at approx 15 degrees, well weathered, mod friable, some coal beds approx 1 mm - 5 mm, some silt
CLAYSTONE	Same as above olive gray (5Y 4/1), trace of iron staining as mottles
CLAYSTONE	Same as above less carb material
CLAYSTONE	Same as above increased silt at base of interval Note No water encountered during drilling

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	98	GROUND ELEVATION (FT)	5974.45	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	0	AREA	0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER	0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0%	0/1	5974	0				NO SAMPLE
		50%			5973	1			GC	GRAVEL - dominantly very light gray (N8) to white (N9), matrix is pale yellowish brown (10YR 6/2), sub-angular to sub-rounded, moderately graded, max size 7 cm, some clay, calcareous
				1/2	5972	2				
						3				
			100%		5971	4			GP	One small cobble with calcareous rind
				0 1/2	5970	5				
					5969	6			GP	One large gravel with calcareous rind
				0 1/1		7				
					5968	8			GP	Four medium to large gravels, white (N9) to medium gray (N5), sub-angular, poorly graded, max size 6 cm, silty clay coating on gravel is calcareous
				03/25	5967	9				
					5966	10				NO SAMPLE
				0/2	5965					

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 98	GROUND ELEVATION (FT) 5974 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST DCB	25-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	
REMARKS					

CHEMICAL SAMP GRADATIONAL S | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	5964	10		
0 4/2	5963	11	CL	Clay and Caliche - yellowish gray (5Y 8/1) and white (N9) respectively, moderate plasticity, one med size gravel at base of interval
	5962	12		
0 4/2	5961	13	CLAYSTONE	Top of Bedrock Light gray (N7), bedding not apparent, highly weathered, slightly friable, local iron staining, slight amount of Mg oxide mineralization
	5960	14		
2/2	5959	15	CLAYSTONE	Same as above, an isolated body of caliche approx 1 cm x 2 cm at approx 16 0 ft
	5958	16		
2/2	5957	17	CLAYSTONE	Same as above
	5956	18		
2/2	5955	19	CLAYSTONE	Same as above
		20		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 98	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	
REMARKS							

CHEMICAL SAMPL / GRADATIONAL SA DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OK		SOK	100% OK 100%	07/12	5954 5953	20 21				
				06/06	5952 5951	22 23			CLAYSTONE	Same as above
				19/19	5950 5949	24 25			CLAYSTONE	This interval overlaps with previous interval This interval is recorded from 21 3' to 23 10" Light gray (N7), bedding not apparent, moderately weathered, slightly friable, localized iron staining and carbonaceous mineralization
				25/25	5948 5947	26 27			CLAYSTONE	As above with color change to grayish orange (10YR 7/4) and light gray (N7), carb minerals absent, iron stains locally and on fractures
				17/17	5946 5945	28 29			CLAYSTONE	As above, interval grades to light gray (N7), iron staining on fractures, occasional carb mineralization
				09/18		30			CLAYSTONE	As above Two irregular bodies of calcareous mineralization occur at approx 29 6 ft

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	98	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA	0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER	0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

CHEMICAL SAMPL GRADATIONAL SA DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR SND	100% GR 100%	0 8/0 79	5944 30			CLAYSTONE	As above
					31			CLAYSTONE	As above, calcareous mineralization is absent
				1 75/1 75	5943 32			CLAYSTONE	As above, slickensides with iron staining at approx 31 4 ft, approx 60 degrees attitude
				1 85/1 85	5942 33			CLAYSTONE	As above
				0 8/0 79	5941 34			CLAYSTONE	As above, irregular calcareous body at 34 8 ft
					5940 35			CLAYSTONE	As above
				2 8/2 8	5939 36				
					5938 37				
					5937 38			CLAYSTONE	As above
				1 85/1 95	5936 39				
				0 /0 01	5935 40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	98	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA	0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER	0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 25 / 0 25	5934	40			NO SAMPLE	
									CLAYSTONE	Light gray (N7), bedding not apparent, slightly weathered, slightly friable, iron staining on fractures and locally
				1 55 / 1 55	5933	41			CLAYSTONE	As above
					5932	42			CLAYSTONE	As above
				1 8 / 1 8	5931	43				
					5930	44			CLAYSTONE	As above,
				1 5 / 1 5	5929	45				
				0 75 / 0 75	5928	46			CLAYSTONE	As above
					5927	47			CLAYSTONE	As above
				2 / 2	5926	48				
				1 85 / 1 85	5925	49			CLAYSTONE	Medium dark gray (N4), bedding not apparent, slightly weathered, slightly friable, local carbonaceous mineralization and iron staining typically on fractures, slickenside at approx 48 6 ft with approx 40 degree attitude
						50				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 98	GROUND ELEVATION (FT) 5974 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST DCB	25-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	
REMARKS					

CHEMICAL SAMP GRADATIONAL S DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT)

DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

Recovery/Interval	Datum (ft)	Depth (ft)	Unified Soils Classification or Rock Type	Description
0 7/0 9	5924	50	CLAYSTONE	As above
1/1	5923	51	CLAYSTONE	As above
1 95/1 95	5922, 5921	52, 53	CLAYSTONE	As above, slickensides at approx 53 ft, curvilinear surface
2 35/2 35	5920, 5919	54, 55, 56	CLAYSTONE	As above
0/0 2	5918		NO SAMPLE	
1 3/1 3	5917	57	CLAYSTONE	Medium light gray (N6), weathered, bedding not apparent to thin (<2 mm) with some soft sediment deformation, slightly friable, slight silt fraction occurs as discontinuous beds, local iron staining and carbonaceous mineralization
1 85/1 85	5916, 5915	58, 59	CLAYSTONE	As above
		60	CLAYSTONE	Medium light gray (N6), bedding not apparent, slightly friable, occasional

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	98	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA	0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER	0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

CHEMICAL SAMPLE / GRADATIONAL SA DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OR	100% OR 100%	2 35 /2 35	ss14				iron stain and carbonaceous mineralization, slight to moderate silt fraction
				2 /2	ss13 ss12 ss11			CLAYSTONE	Same as above
				2 /2 2	ss10 ss9 ss8			CLAYSTONE	Same as above, slickensides at approx 66 8 ft , attitude approx 60 degrees
				0 85 /0 3	ss7			CLAYSTONE	As above
				0 7 /0 69	ss6			SILTY CLAYSTONE	Interval grades to silty claystone below 67 5 ft , light gray (N7), bedding not apparent, slightly friable, slight to moderate VFG sand fraction
				1 7 /1 7	ss5			SILTY CLAYSTONE	As above

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	98	GROUND ELEVATION (FT)	5974 6	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA	0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER	0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

REMARKS

DEPTH	CHEMICAL SAMP GRADATIONAL S.	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0% 50%	100% 0% 100%		5894	70			SANDY SILTSTONE	Interval grades to sandy siltstone below 69 7 ft , light gray (N7), bedding not apparent to thin (<2 mm), soft sed deformation with moderate dip, slightly friable, increase in sand component with depth
		60277			2/31	5893	71				
						5892	72				
					08/08	5891	73			SANDSTONE	Light gray (N7), thin bedded (<2 mm), slight dip, slightly friable, moderate silt component
					0/019					NO SAMPLE	
					07/069	5890	74			SANDSTONE	As above
		60278			17/17	5889	75			CLAYEY SILTSTONE	Interval grades to Clayey Siltstone, light gray (N7) to medium light gray (N6), bedding not apparent, slightly friable, localized carbonaceous mineralization, slight VFG sand fraction
					0/16	5888	76			NO SAMPLE	
						5887	77				
					14/14	5886	78			SILTSTONE	Light gray (N7) to medium light gray (N6), thin bedded (<2 mm) interfingering clay laminae, bedding is distorted, possible soft sediment deformation or bioturbation, some carbonaceous mineralization and possible Mg oxides, slight VFG sand fraction
						5885	79				
							80			SILTSTONE	As above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 98	GROUND ELEVATION (FT)	5974 45	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	25-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	UNK	

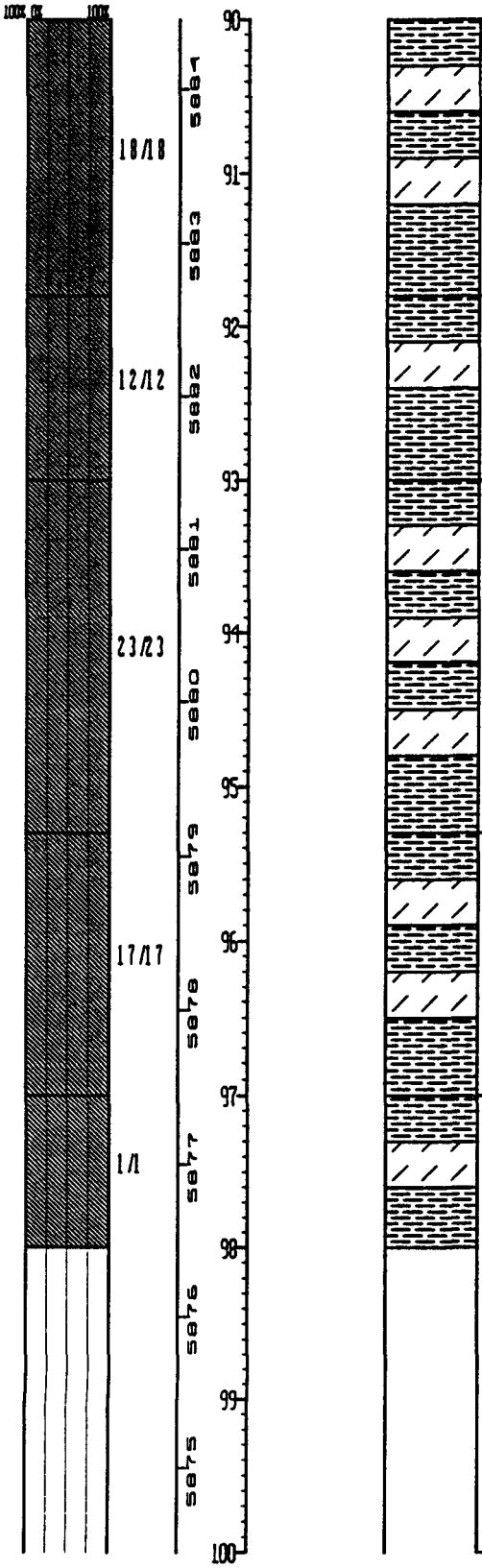
REMARKS

CHEMICAL SAMPL / GRADATIONAL SA DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				18/18	5894	80				
						81			CLAYSTONE	Medium dark gray (N4), bedding not apparent, slightly friable, abundant carbonaceous mineralization (discontinuous coal beds), slight to moderate silt fraction, slight VFG sand fraction
				18/18	5893	82				
					5892					
						83			CLAYSTONE	Light gray (N7), bedding not apparent, slightly friable, localized carbonaceous mineralization, moderate silt fraction
				165/165	5891	84				
					5890				CLAYSTONE	As above
						85				
				205/205	5889					
					5888	86				
									CLAYSTONE	As above
				13/13	5887	87				
						88			CLAYSTONE	As above Bedding becomes apparent from 88 0 to 89 5 ft , thin bedded (<2 cm), slight dip, interbedded silt and clay, which exhibit soft sed deformation
					5886					
				2/2		89				
					5885					
						90				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 98	GROUND ELEVATION (FT) 5974 45	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST DCB	25-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED UNK	

REMARKS

CHEMICAL SAMPLE DEPTH
GRADATIONAL SAMPLE DEPTH
SAMPLE NUMBER
SAMPLE GRAIN SIZE 0% 50% 100%
PERCENT RECOVERY 0% 100%
RECOVERY/INTERVAL
DATUM (FT)
DEPTH (FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION

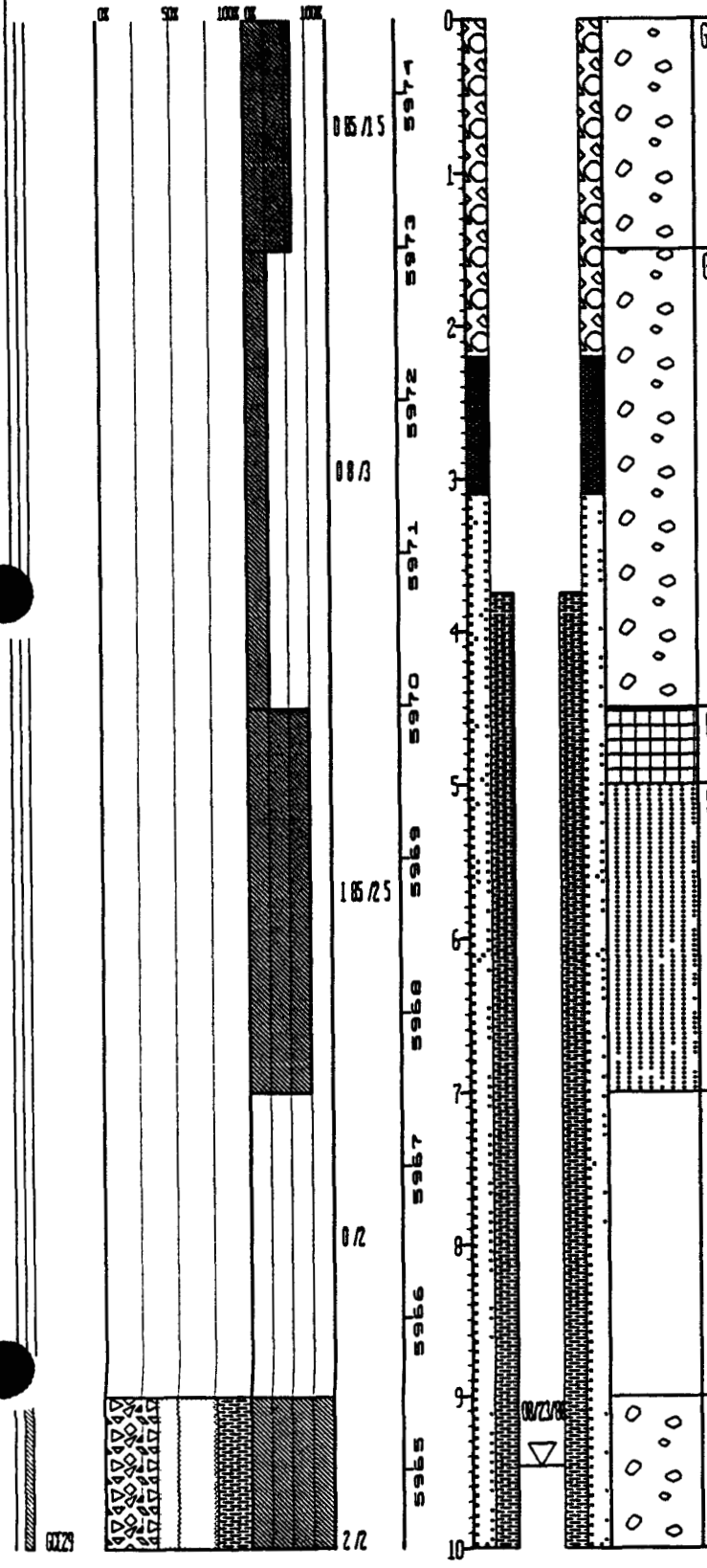


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	As above, bedding apparent at approx 90 6 ft <2 mm thick, steeply dipping, may be result of soft sed deformation
CLAYSTONE	As above
CLAYSTONE	As above
CLAYSTONE	As above
CLAYSTONE	As above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17	GROUND ELEVATION (FT) 5974 48	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	26-86
EAST	2084841	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 08/22/86	

REMARKS Hollow Stem Auger Cave From TD to 15 50'

CHEMICAL SAMPLE / GRADATIONAL SA. / SAMPLE NUMBER / SAMPLE GRAIN SIZE (0% 50% 100%) / PERCENT RECOVERY (0% 100%) / RECOVERY/INTERVAL / DATUM (FT) / DEPTH (FT) / WELL OR PIEZOMETER CONSTRUCTION / LITHOLOGY / UNIFIED SOILS CLASSIFICATION OR ROCK TYPE / DESCRIPTION

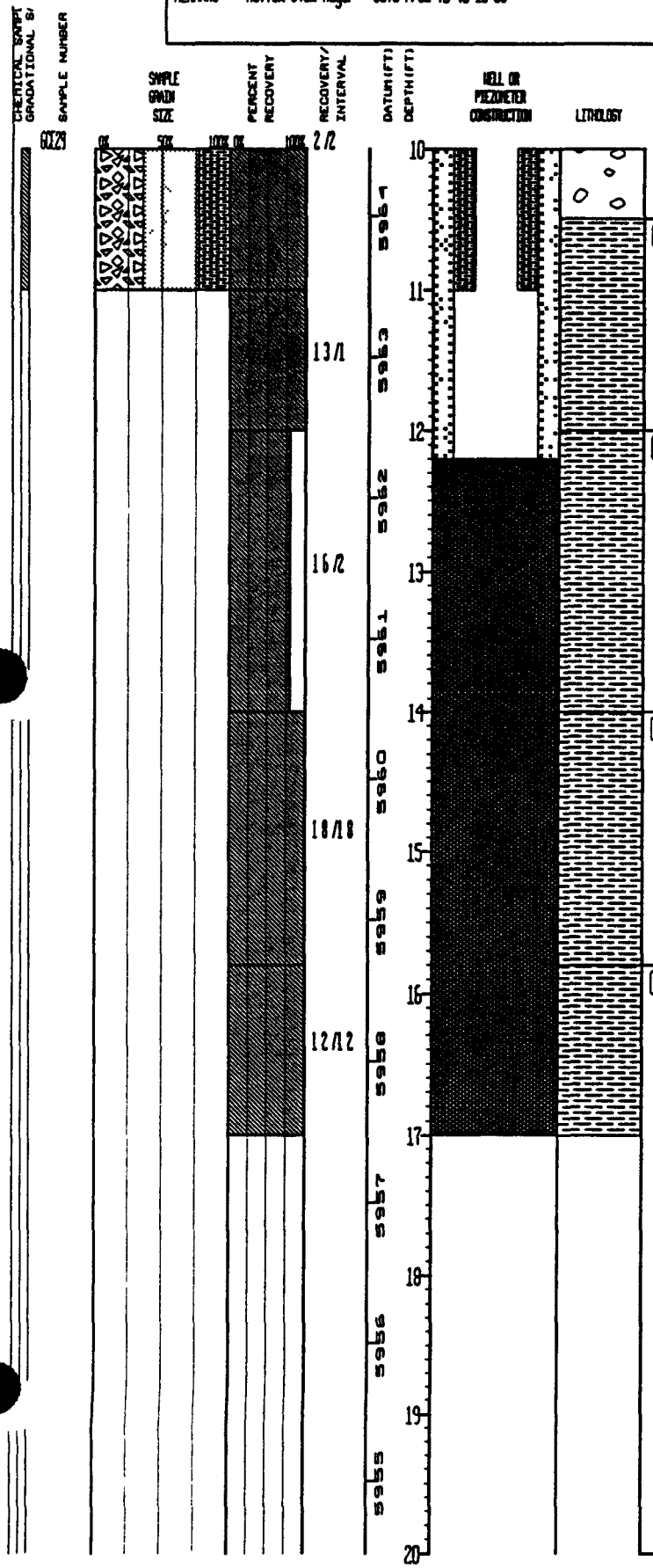


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GP	GRAVEL - medium gray (N6) and very light gray (N8), angular to sub-angular, moderately graded, max size 6 cm, some caliche, silt and trace of clay
GP	Same as above
CALICHE	White (N9), friable, trace of gravel
SP	Grayish orange (10YR 7/4), bedding not apparent, highly weathered, moderately friable, very fine to fine grained, poor to moderate sorting, significant amount of caliche, trace of silt and gravel
NO SAMPLE	
GP	GRAVEL - medium light gray (N6), sub-angular to sub-rounded, poorly graded, max size 6 cm, some caliche and sand

GCE29

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17	GROUND ELEVATION (FT)	5974 48	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750428	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	26-86
EAST	2084841	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/22/86	

REMARKS Hollow Stem Auger Cave from TD to 15 50'



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Top of Bedrock Mottled yellowish gray (5Y 8/1) and grayish orange (10YR 7/4), bedding not apparent, highly weathered, moderately friable, calcareous, caliche occurs as isolated bodies within rock, localized iron staining and possible Mg oxide mineralization
CLAYSTONE	As above
CLAYSTONE	Very light gray (N8), bedding not apparent, moderately weathered, slightly friable, trace of silt, local iron staining, slight Mg oxide mineralization
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5961 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SA DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
0 9/2	0–2	GC	Clayey Gravel - med gray (N5), angular to sub-rounded, well graded, granules to 6 5 cm Matrix sandy clay, mod brown (5YR 3/4), some sand VFG to VCG, some CaCO3
0 75/2	2–4	GC	Same as above, silty clay matrix, some sand
1 8/1 7	4–6	GC	GRAVEL in Caliche Matrix - gravel as above Matrix very pale orange to white (10YR 8/2 to N9), some silt and sand
0 11/1 3	6–7	GC	This interval consists of only a few pieces of sandy clayey gravel Not enough sample to characterize interval
0/1	7–8	NO SAMPLE	
0 4/0 8	8–9	GC	GRAVEL - med dk gray (N4), angular to sub-rounded, poorly graded, max size approx 5 cm, some sand and clay
1 7/2	9–10	CH	Clay - very lt gray (N8) to grayish orange (10YR 7/4), est plast mod to high, some gravel, granules to approx 3 cm, angular to sub-rounded, thin caliche area (approx 2 cm), trace sand and silt

Depth scale: 0, 1, 2, 3, 4, 5, 6, 7, 8, 9, 10

Well or piezometer construction: 09/18/86

Lithology: 5961, 5960, 5959, 5958, 5957, 5956, 5955, 5954, 5953, 5952

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5951 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 10	GEOLOGIST	LAA	27-86
EAST	2065239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE DEPTH / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0% 100%		5951	10				
				14/12		11			CH	Clay - very pale orange (10YR 8/2) to grayish orange (10YR 7/4), est plast mod to high, trace iron staining, trace white noncalcareous mineralization (Maybe slightly weathered claystone)
					5950	12			CLAYSTONE	Top of Bedrock Very pale orange (10YR 8/2) to grayish orange (10YR 7/4), est plast mod to high, trace iron staining, trace white noncalcareous mineralization
				0/18	5949	13			NO SAMPLE	Sample only consists of a few fragments of material (probably same as above) Not enough to characterize
					5948	14			CLAYSTONE	Pinkish gray (5YR 8/1) to dark yellowish orange (10YR 6/6), mod to highly friable, bedding not evident, trace carb material
				17/2	5947	15				
					5946	16			CLAYSTONE	Same as above Color change to very pale orange to pale yellowish brown (10YR 8/2 to 6/2), some carb material, trace of iron staining
				11/12	5945	17			CLAYSTONE	Same as above, trace silt
				15/16	5944	18			CLAYSTONE	Same as above, some iron staining, trace carb material
					5943	19			SILTY CLAYSTONE	Same as above, some carb material
				16.5/15	5942	20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPL GRADATIONAL S. TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0 4/1 5; 0 /3 05; 2.9/3 45; 0/3

DATUM (FT): 5941, 5940, 5939, 5938, 5937, 5936, 5935, 5934, 5933, 5932

DEPTH (FT): 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

SILTY CLAYSTONE Very pale orange (10YR 8/2) to grayish orange (10YR 7/4), highly weathered, mod friable, bedding not evident

NO SAMPLE

SILTY CLAYSTONE Very pale orange to dk yellowish orange (10YR 8/2 to 6/6), mod weathered, slightly friable, some iron staining, carb material in fractures, bedding not evident, trace CaCO3

NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE DEPTH | GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
0/3	30		
	31		
	32	CLAYSTONE	Grayish orange to lt brownish gray (10YR 7/4) to (5Y 6/1), mod weathered, mod friable, massive bedding, some silt, iron staining in fractures, trace carb material
1 7/2	33		
	34	NO SAMPLE	
0/2.9	35		
	36		
	37	SILTY CLAYSTONE	Very light gray (N8) to dk yellowish orange (10YR 6/6), mod weathered, slightly to mod friable, bedding appears horizontal, but slightly distorted, trace carb material and iron staining
1 55/2 1	38		
	39	NO SAMPLE	
0/1 35	40		

Datum (ft): 5931, 5930, 5929, 5928, 5927, 5926, 5925, 5924, 5923, 5922

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	157	GROUND ELEVATION (FT)	5961 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	730796	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	27-86
EAST	2085239	LOCATOR NUMBER	H10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL "SARP" GRADATIONAL S	DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0%	100% 0% 100%	37/35	sel2 sel3 sel4 sel5 sel6 sel7 sel8 sel9 sel20 sel21	40 41 42 43 44 45 46 47 48 49 50			SILTY CLAYSTONE	Lt brownish gray (5YR 6/1), mod weathered, mod to slightly friable, bedding not evident, trace CaCO3, carb material
					0/25					NO SAMPLE	
					14/15					SILTY CLAYSTONE	Same as above, some iron staining, some carb material
					16/18					SILTY CLAYSTONE	Same as above
										SILTY CLAYSTONE	Brownish gray (5YR 4/1), mod weathered, slightly to mod friable, bedding appears massive, some possible slickensides on fractures

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPL GRADATIONAL S/ TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 85/1 7; 1 35/1 5; 0/1 5; 1 7/1 7; 1 8/1 8; 0/0 79

DATUM (FT): 5911, 5910, 5909, 5908, 5907, 5906, 5905, 5904, 5903, 5902

DEPTH (FT): 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

SILTY CLAYSTONE Same as above, trace carb material

NO SAMPLE

SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above, some carb material

NO SAMPLE

SILTY CLAYSTONE Same as above Some mod yellowish brown (10YR 5/4) discoloration in matrix and small siltstone pebbles (rounded) in matrix

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAM	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CRITICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	0% 50% 100%	100% 0% 100%	1/12	60				
				61				
				62				
				63			SILTY CLAYSTONE	Lt olive gray (5Y 6/1), moderately weathered, mod to highly friable, bedding not evident, some carb material, trace iron staining, unknown white mineralization in fractures
			3/3	64				
				65				
				66			SILTY CLAYSTONE	Brownish gray (5YR 4/1), mod weathered, slightly to mod friable, bedding appears horizontal, some carb material, some grayish orange (10YR 7/4) discoloration, some very thin (threadlike) layers VFG sand
			2/2	67				
				68			SILTY CLAYSTONE	Same as above
			16/16	69				
				70			SILTY CLAYSTONE	Same as above, more common VFG sand layers
			17/18					

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 10	GEOLOGIST LMA	27-86
EAST	2085239	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0% 100%	17/18	sea1	70				
						71				SILTY CLAYSTONE Brownish gray (5YR 4/1), mod weathered, mod friable, bedding not evident, some CaCO3, trace carb material, some CaCO3, some lt brown (5YR 5/6) discoloration
				19/16	sea0	72				
				0/0 69	sea9	73				NO SAMPLE
										SILTY CLAYSTONE Same as above, no CaCO3 or discoloration
				18/18	sea8	74				
					sea7	75				
										SILTY CLAYSTONE Lt olive gray (5Y 6/1), mod weathered, mod friable, bedding appears horizontal, uneven, some carb material, trace iron staining
				29/25	sea6	76				
					sea5	77				
				0/0 5	sea4	78				NO SAMPLE
				04/03						CLAYEY SILTSTONE Yellowish gray (5Y 8/1), slightly weathered, slightly friable, slightly tilted uneven bedding, some VF6 sand
					sea3	79				CLAYEY SILTSTONE Same as above, trace carb material
				185/1 09						
					sea2	80				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	157	GROUND ELEVATION (FT)	5961 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	27-86
EAST	2085239	LOCATOR NUMBER	N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				18/18	80				
					81			CLAYEY SILTSTONE	Lt olive gray (5Y 6/1), slightly weathered, slightly friable, distorted bedding possibly due to soft sed deform, some VFG sand, some carb material
				04/05	82			CLAYEY SILTSTONE	Same as above
				09/1	83			SILTY CLAYSTONE	Brownish gray (5YR 4/1), mod weathered, mod friable, bedding not evident, trace carb material
				18/15	84			SILTY CLAYSTONE	Same as above, highly weathered, highly friable
				18/18	85			SILTY CLAYSTONE	Same as above, mod weathered, mod friable
				06/069	87			SILTY CLAYSTONE	Same as above
				06/08	88			SILTY CLAYSTONE	Same as above
				16/17	89			CLAYSTONE	Same as above, less silt
					90				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5951 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	27-86
EAST	2085239	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100%	17/15	90			CLAYSTONE	Brownish gray (5YR 4/1), mod weathered, mod friable, bedding appears massive, trace carb material, trace silt
				1/1	91			CLAYSTONE	Same as above, possible slickensides
				0/18	92			NO SAMPLE	
				2/2	93			CLAYSTONE	Same as above
				12/12	94			CLAYSTONE	Same as above These intervals overlap with first interval in next box (95 8 ft to 97 5 ft), described as silty claystone as below
				17/2	95			SILTY CLAYSTONE	Lt olive gray (5Y 6/1), slightly to mod weathered, slightly friable, bedding uneven horizontal, some very thin (<1 mm) layers silt and VFG sand, some carb material
					96			SILTY CLAYSTONE	Lt olive gray to olive gray (5Y 6/1) to 4/1), slightly weathered, slightly friable, bedding in thin layers, uneven horizontal, some silt in
					97				
					98				
					99				
					100				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5951 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

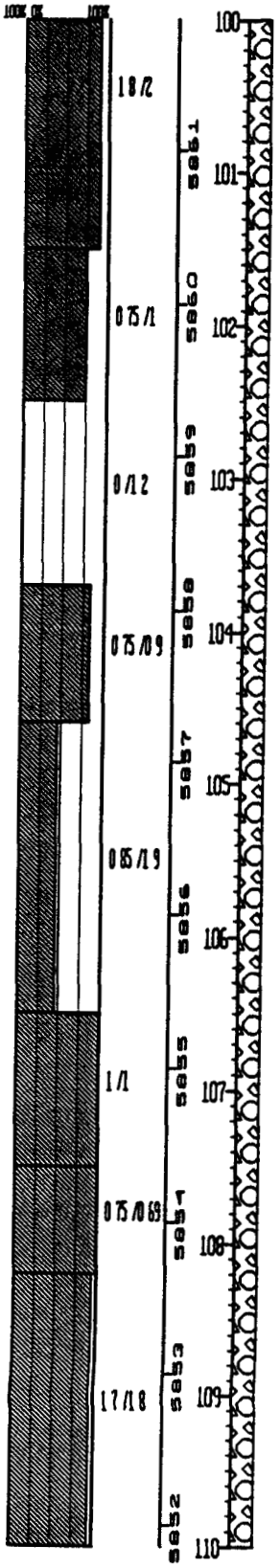
DATUM(FT) DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



thin layers (<1 mm) and VFG sand, trace carb material

SILTY CLAYSTONE Same as above

NO SAMPLE

SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above

SILTY CLAYSTONE Same as above, bedding slightly tilted

SILTY CLAYSTONE Same as above, bedding does not appear to be tilted, some carb material

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	27-86
EAST	2085239	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
0 7/0 5	110	SILTY CLAYSTONE	Lt olive gray to brownish gray (5Y 6/1) to (5YR 4/1), slightly weathered, slightly friable, distorted layered bedding, layers very thin (some less than 1 mm), some VFG sand, trace coarse
	111	NO SAMPLE	
0/4 3	112		
	113		
	114		
1 8/2.2	115	SILTY CLAYSTONE	Same as above, grades to claystone toward bottom, some slickensides in vertical features in claystone
	116		
	117	NO SAMPLE	
0/1 5	118		
1 8/1	119	SILTY CLAYSTONE	Lt olive gray to olive gray (5Y 6/1 to 4/1), slightly weathered, slightly friable, bedding not evident, trace carb material
0/0 5	120	NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5961 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	27-86
EAST	2085239	LOCATION NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL, GRAPH, GRADATIONAL & SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			16/2	5841 120			CLAYSTONE	Olive gray (5Y 4/1), slightly weathered, slightly friable, bedding appears massive, trace carb material, some possible slickensides in fractures
				5840 121				
				122			SILTY CLAYSTONE	Lt olive gray (5Y 6/1), slightly weathered, slightly friable, massive bedding, trace carb material
			17/2	5839 123				
				5838 124			SILTY CLAYSTONE	Same as above, less silty
			15/2	5837 125				
				5836 126			SILTY CLAYSTONE	Same as above, more silty
			12/1	5835 127				
			035/04				SILTY CLAYSTONE	Same as above
				5834 128			SANDY CLAYSTONE	Brownish gray (5YR 4/1), slightly weathered, slightly friable, massive bedding, some carb material, sand VFG, well sorted
			165/21	5833 129				
			03/05	5832 130			SANDY CLAYSTONE	Same as above, very thin coal layer approx 1 mm

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT) 5961 86	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

Recovery/Interval	Datum (FT)	Unified Soils Classification or Rock Type	Description
1.2/1.2	5831	CLAYEY SILTSTONE	Pinkish gray to lt olive gray (5YR 8/1 to 5Y 6/1), slightly weathered, slightly friable, bedding distorted, probably from soft sed deformation, some carb material at top, some VFG sand especially at top, traces of pale yellowish orange (10YR 8/6) silt
0.8/0.8	5830	SANDY SILTSTONE	Pinkish gray (5YR 8/1), mod weathered, mod friable, tilted, layered bedding approx 1 in thick layers, sand VFG, some clay
0/1.5	5829	NO SAMPLE	
0.8/0.8	5828	SANDY SILTSTONE	Same as above, grading to silty claystone
1.9/1.89	5827	SILTY CLAYSTONE	Olive gray (5Y 4/1), slightly weathered, slightly friable, bedding not evident, some small bodies of silt (approx 1 in in diam)
0.8/0.8	5825	SILTY CLAYSTONE	Same as above, with some siltier layers
0/1.8	5824	NO SAMPLE	
1/1	5823	SILTY CLAYSTONE	Same as above
	5822		

Depth scale: 130, 131, 132, 133, 134, 135, 136, 137, 138, 139, 140

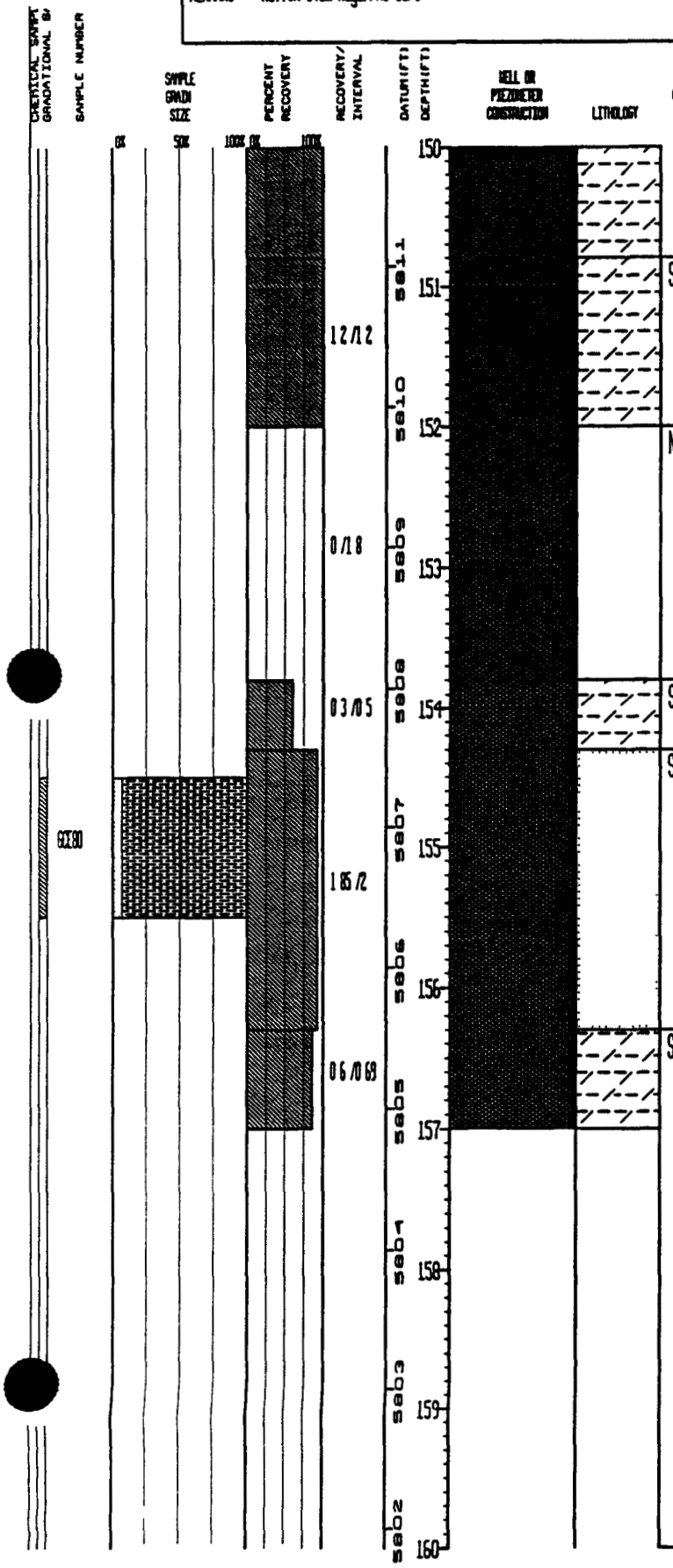
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5561 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	27-86
EAST	2085239	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						140			SILTY CLAYSTONE	Lt olive gray (5Y 6/1), slightly weathered, slightly friable, massive bedding
				17/17	se21	141				
				16/16	se20	142			SILTY CLAYSTONE	Same as above
									SILTY CLAYSTONE	Same as above, uneven layered bedding, some carb material
				13/15	se19	143				
					se18	144			SILTY CLAYSTONE	Same as above, some silt layers, very thin (<1 mm), trace spotty iron staining
				15/17	se17	145				
									SILTY CLAYSTONE	Same as above, interbedded in very fine layers with VFG sandstone (layers <1 mm), trace carb material
				16/18	se16	146				
					se15	147			SILTY CLAYSTONE	Same as above Some grayish orange (10YR 7/4) discolored silt in some areas
				9/2	se14	148				
					se13	149			SILTY CLAYSTONE	Same as above
				18/18	se12	150				

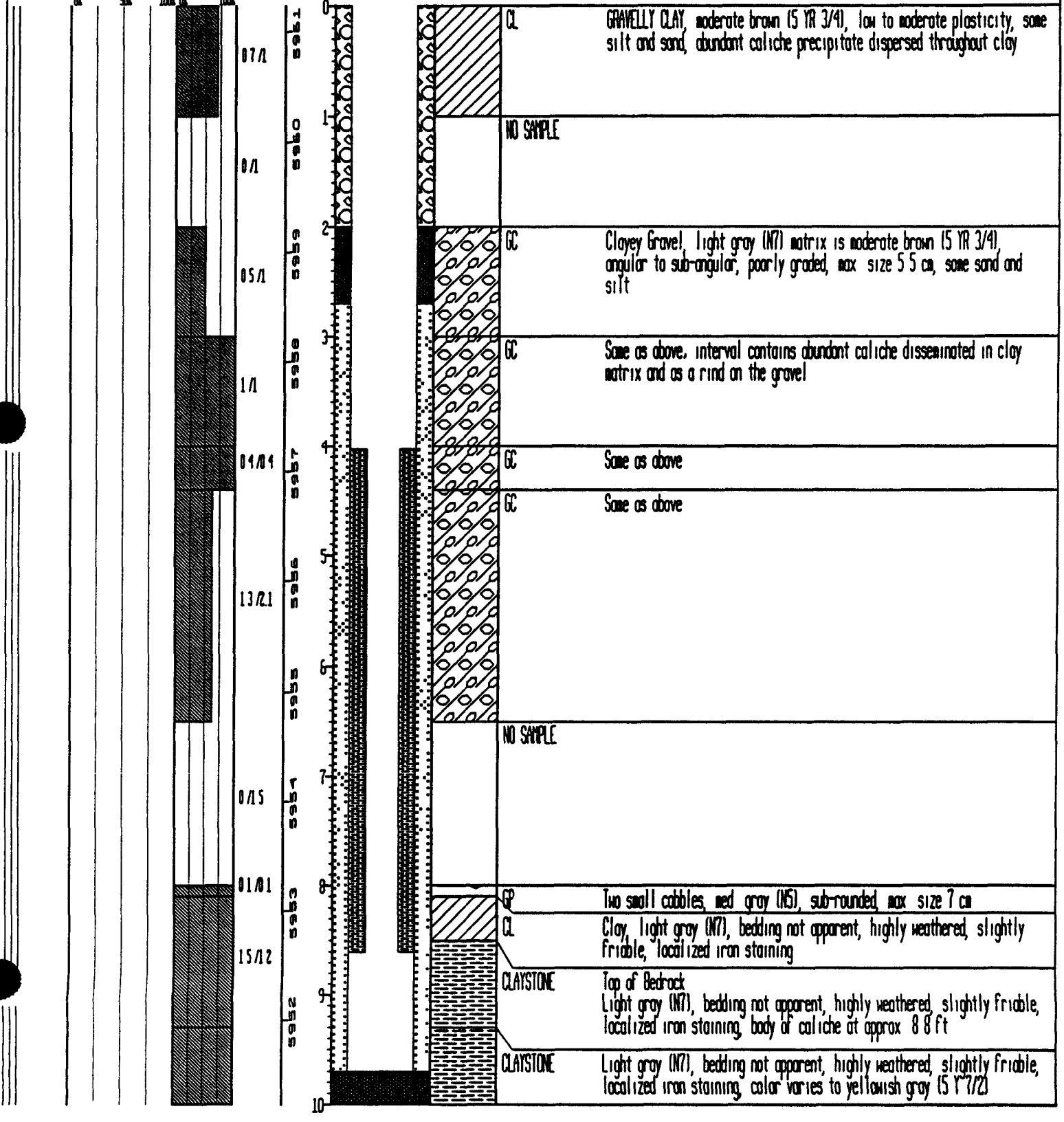
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 157	GROUND ELEVATION (FT)	5961 86	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750796	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	27-86
EAST	2085239	LOCATOR NUMBER M10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/18/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Brownish gray to pinkish gray (5YR 6/1 to 8/1), slightly weathered, slightly friable, bedding in thin layers, predominantly horizontal, some silt in thin layers <1 mm, some lt brown (5YR 5/6) discoloration, some carb material
NO SAMPLE	
SILTY CLAYSTONE	Same as above
SANDSTONE	Brownish gray (5YR 4/1) to mod yellowish brown to dusky red (10YR 5/4 to 10R 2/2), slightly to non-friable, bedding had been layered but is distorted probably from tectonic activity or slumping, contains healed fractures, trace carbs, some silt, sand VFG
SILTY CLAYSTONE	Lt brownish gray (5YR 6/1), slightly weathered, slightly friable, massive bedding, trace carbs

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	15 5	GROUND ELEVATION (FT)	5961 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750818	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	28-86
EAST	2065241	LOCATOR NUMBER	H10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/28/86	
REMARKS	Hollow Stem Auger							



STATE PLANE COORDINATE		TOTAL DEPTH (FT)	15 5	GROUND ELEVATION (FT)	5961 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750818	AREA SOLAR POND		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	28-86
EAST	2085241	LOCATOR NUMBER	M10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/28/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMP GRADATIONAL S | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
17/17	5951		
	5950	CLAYSTONE	Same as above
15/15	5949		
		CLAYSTONE	Same as above
15/15	5948		
	5947	CLAYSTONE	Same as above
08/08			
		CLAYSTONE	Same as above
07/07	5946		
	5945		
	5944		
	5943		
	5942		

Depth scale: 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20

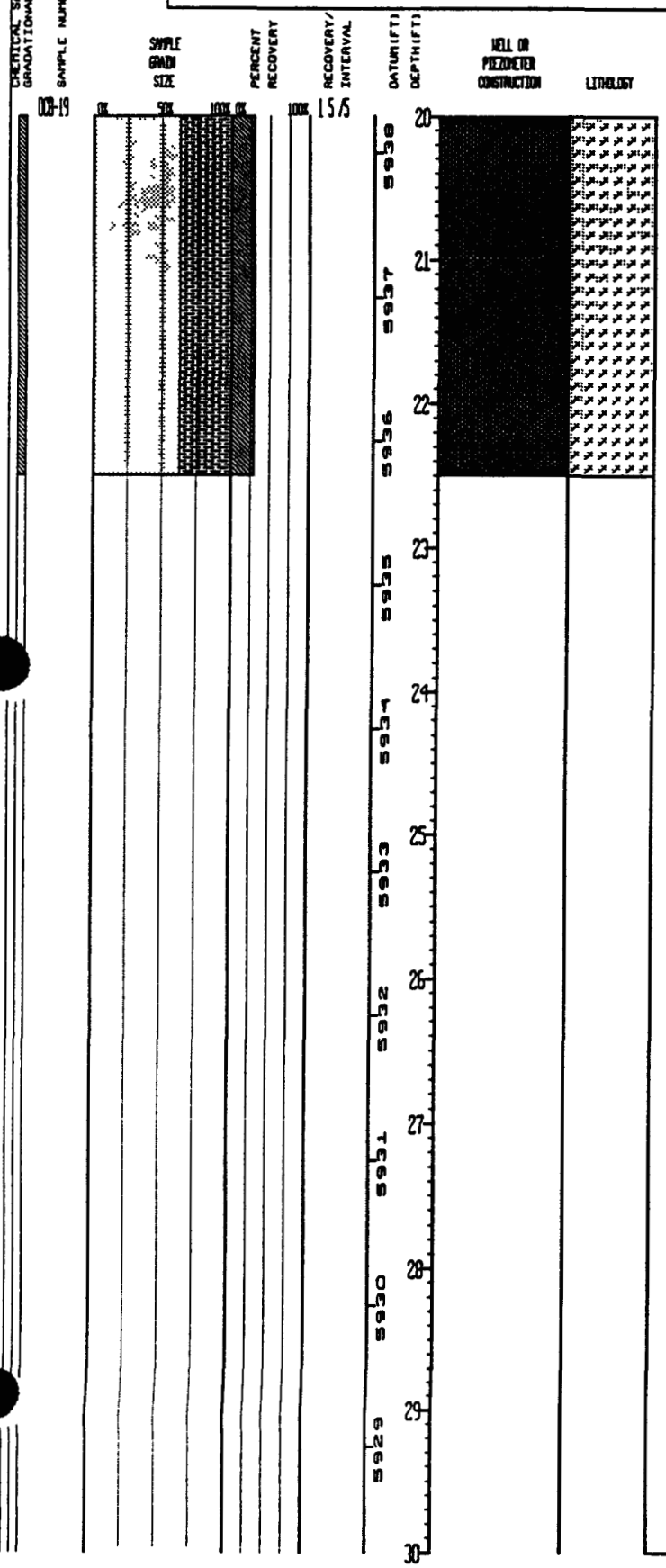
STATE PLANE COORDINATE		TOTAL DEPTH (FT)	22 5	GROUND ELEVATION (FT)	5958 26	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750612	AREA	SOLAR POND	CASING DIAMETER (IN)	2	GEOLOGIST	DCB	29-86
EAST	2085688	LOCATOR NUMBER	M10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/09/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%	0 7/2	5958	0			GW	GRAVEL, dominantly very light gray (N8), sub-angular, well graded, max size 5 5 cm , trace of clay - grayish brown (5 YR 3/2), some plant debris and silt
				0 5/0 5	5957	1				
				1 1/1 1	5956	2			GC	Clayey Gravel, light gray N7, clay matrix is grayish brown (5 YR 3/2), angular, poorly graded, max size is 6 5 cm , some silt
				0 /2 9	5955	3			CL	GRAVELLY CLAY, moderate brown (5 YR 4/4), low plasticity, some silt and VFG sand
					5954	4				NO SAMPLE
					5953	5				
					5952	6				
				1 /1	5951	7			CH	Silty Gravelly Clay, moderate yellowish brown (10 YR 5/4), moderately high plasticity, some gravel
				0 8/1	5950	8			CH	Clay, moderate yellowish brown (10 YR 5/4), moderately high plasticity, some silt and gravel
				0 8/1	5949	9			CLAYSTONE	Top of Bedrock Grayish orange (10 YR 7/4), moderate plasticity, some silt, bodies of caliche and stringers of same, silt content increases with depth
						10			CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	22 5	GROUND ELEVATION (FT)	5958 26	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750612	AREA	SOLAR POND	CASING DIAMETER (IN)	2	GEOLOGIST	DCB	29-86
EAST	2085688	LOCATOR NUMBER	N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/09/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		CR SIL 100% CR 100%		15/15	5948	10				
					5947	11			CLAYSTONE	Same as above
				15/15	5946	12				
	DCB-18			2/2	5945	13			SANDY SILTSTONE	Dark yellowish orange (10 YR 6/6), to very light gray (N8), bedding not apparent, moderately friable, irregular body of caliche at approx 14 3 ft', sand is VFG
					5944	14				
				15/15	5943	15			SANDY SILTSTONE	Dark yellowish orange (10 YR 6/6), to very light gray (N8), bedding not apparent, moderately friable, sand is VFG
					5942	16			SANDY SILTSTONE	Same as above
				15/15	5941	17				
	DCB 200				5940	18			SANDY SILTSTONE	Same as above, with weathered Fe-oxide concretion at 22 5 ft
					5939	19				
	DCB-19			15/5		20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22 5	GROUND ELEVATION (FT)	5958 26	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750612	AREA SOLAR POND	CASING DIAMETER (IN)	2	GEOLOGIST	DCB	29-86
EAST	2085688	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/09/86	
REMARKS	Hollow Stem Auger						



STATE PLANE COORDINATE		TOTAL DEPTH (FT)	16	GROUND ELEVATION (FT)	5956 21	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751091	AREA	SOLAR POND	CASING DIAMETER (IN)	2 10	GEOLOGIST	DCB	30-86
EAST	2084924	LOCATOR NUMBER	L11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/06/86	

REMARKS Hollow Stem Auger Cave from TD to 15 60'

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OK	1 5/2	5956	0			CL	CLAY, light brownish gray (5 YR 4/1), grades to very light gray (N8), moderate to low plasticity, calcareous, some roots and gravel in upper 1 5 ft , some silt in upper 2 0 ft
					5955	1				
				0 8/1	5954	2			CL	Same as above
									CLAYSTONE	Top of Bedrock Same as above
				0 9/1	5953	3			CLAYSTONE	Interval grades to highly weathered or incompletely indurated Claystone
					5952	4			CLAYSTONE	Very light gray (N8), bedding not apparent, highly weathered, slightly friable, occasional iron stains and bodies of caliche
				2/2	5951	5				
					5950	6			CLAYSTONE	Same as above
				2/2	5949	7				
					5948	8			CLAYSTONE	Same as above, with slight amount of Mg-oxide mineralization below 8 0 feet and iron stains occur on fractures, rock is more competent
				2/2	5947	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16	GROUND ELEVATION (FT)	5956 21	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH:	751094	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	30-86
EAST	2084924	LOCATOR NUMBER L11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/06/86	

REMARKS Hollow Stem Auger Cave from TD to 15 60'

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1/1	5946	10			CLAYSTONE	Very light gray, (N8), bedding not apparent, highly weathered, slightly friable, iron staining locally and on partings, Mg oxide mineralization occurs locally, slight silt fraction
				1/1	5945	11			CLAYSTONE	Same as above
				15/2	5944	12			CLAYSTONE	Same as above
					5943	13				
					5942	14			CLAYSTONE	Same as above NOTE No water encountered while drilling
				2/2	5941	15				
					5940	16				
					5939	17				
					5938	18				
					5937	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	22	GROUND ELEVATION (FT)	5964.21	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	751068	AREA	SOLAR POND	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	31-86
EAST	2084766	LOCATOR NUMBER	N11	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/02/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) / DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				2/2	5964			CL	SILTY CLAY, pale yellowish brown (10 YR 6/2), low to moderate plasticity, trace of roots and gravel
	DCB 13			11/2	5963			SANDSTONE	Top of Bedrock Very light gray (N8) to grayish orange (10 YR 7/4), bedding not apparent to apparent, soft sediment deformation, highly weathered, moderately friable, very fine grained, well sorted, calcareous fracture fillings
				01/01	5962			SANDSTONE	Same as above
				2/2	5961			SANDSTONE	Same as above
				05.5/06	5960			SANDSTONE	Same as above
				1/1	5959			SANDSTONE	Same as above
				2/2	5958			SANDSTONE	Same as above
					5957				
					5956				
					5955				
					10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT) 5964 21	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 0	GEOLOGIST DCB	31-86
EAST	2084766	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/02/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMPLE GRADATIONAL S

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) 5954 5953 5952 5951 5950 5949 5948 5947 5946 5945

DEPTH (FT) 10 11 12 13 14 15 16 17 18 19 20

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SANDSTONE	As above, calcareous fracture fillings are absent
NO SAMPLE	
SANDSTONE	Same as above, (reference interval 0 4 ft to 12 0 ft) Bedding apparent at approx 14 3 ft, slight dip structures not discernable, abundant iron staining
SANDSTONE	Same as above
SILTSTONE	Interval grades to Siltstone, grayish orange (10 YR 7/4), bedding not apparent, highly weathered, moderately friable, slight VFG sand component
SILTY CLAYSTONE	Interval grades to Silty Claystone at approx 16 2 ft, light grey (N7), bedding not apparent, well weathered, slightly friable, iron staining locally and on fractures
SILTY SANDSTONE	Dark yellowish orange (10 YR 6/6), bedding not apparent, highly weathered, moderately friable, abundant iron stains
SILTSTONE	Very light gray (N8), bedding not apparent, well weathered, slightly friable, slight VFG sand component, possible Mg-oxide mineralization, local iron staining, abundant iron staining below 19 5 ft, slight clay fraction NOTE No water encountered while drilling

CB 9

2/2

0/1

15/15

05/05

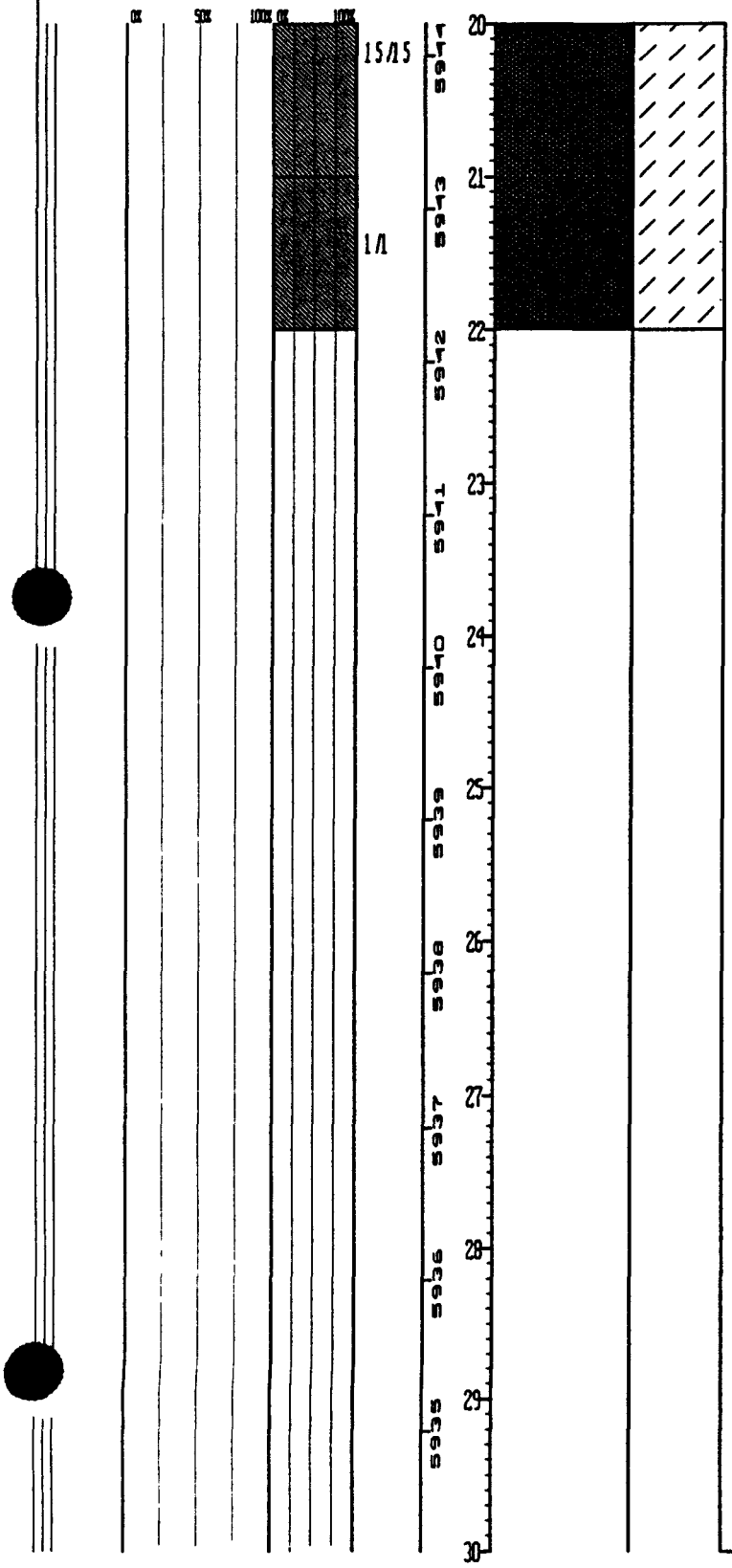
13/13

07/07

07/07

18/18

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	22	GROUND ELEVATION (FT)	5964.21	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	751068	AREA	SOLAR POND	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	31-86
EAST	2084766	LOCATOR NUMBER	M11	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/02/86	
REMARKS	Hollow Stem Auger							

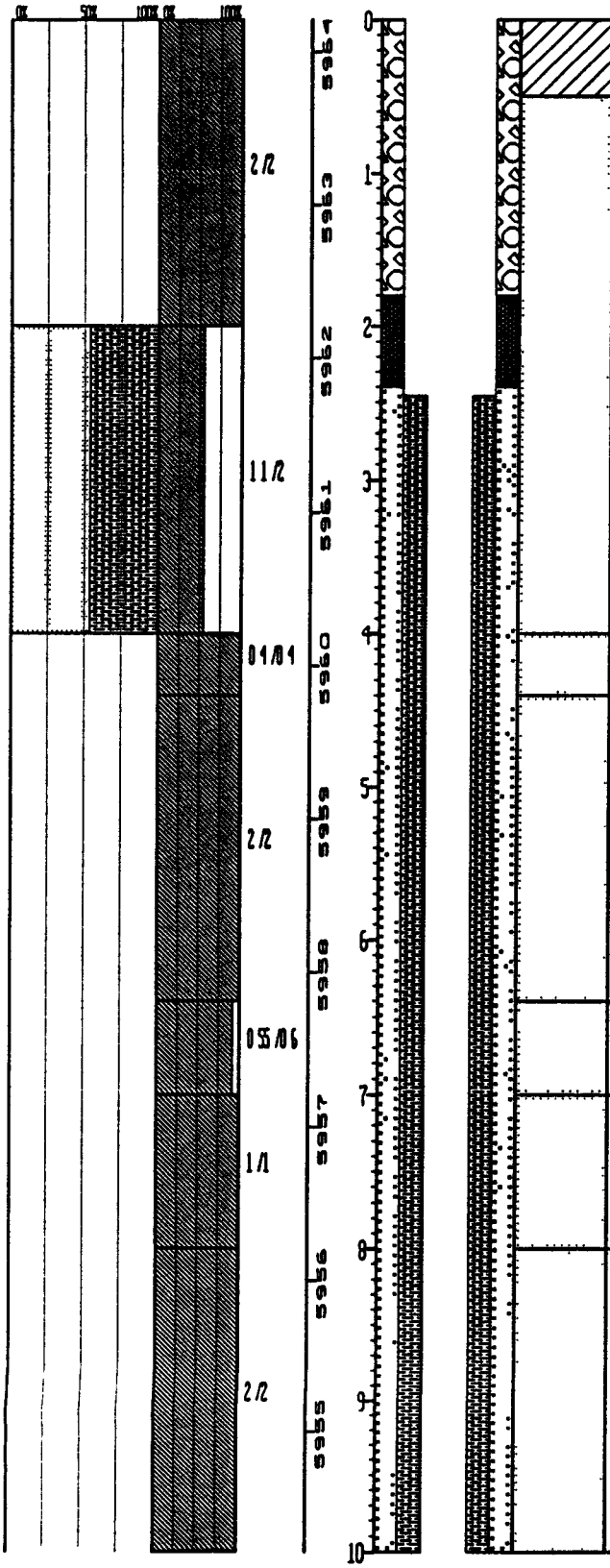


STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT) 5964 21	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 0	GEOLOGIST DCB	31-86
EAST	2084766	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/02/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH

SAMPLE NUMBER: DCB 13

SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

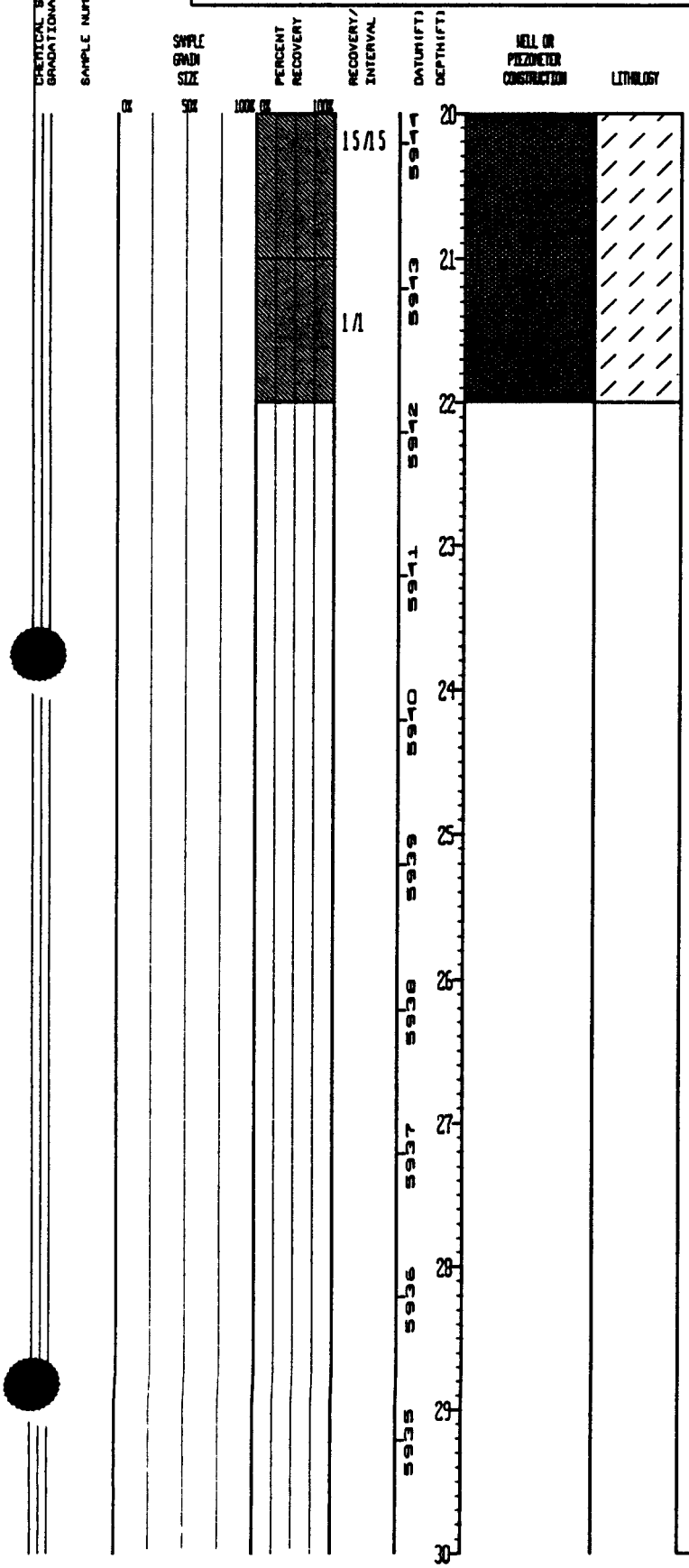


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	SILTY CLAY, pale yellowish brown (10 YR 6/2), low to moderate plasticity, trace of roots and gravel
SANDSTONE	Top of Bedrock Very light gray (N8) to grayish orange (10 YR 7/4), bedding not apparent to apparent, soft sediment deformation, highly weathered, moderately friable, very fine grained, well sorted, calcareous fracture fillings
SANDSTONE	Same as above
SANDSTONE	Same as above
SANDSTONE	Same as above
SANDSTONE	Same as above
SANDSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT)	5954 21	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	31-86
EAST	2084766	LOCATOR NUMBER N11	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/02/86	
REMARKS	Hollow Stem Auger						

SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			2/2	5951			SANDSTONE	As above, calcareous fracture fillings are absent
			0/1	5952			NO SAMPLE	
DCB 9			15/15	5951			SANDSTONE	Same as above, (reference interval 0 4 ft to 12 0 ft) Bedding apparent at approx 14 3 ft, slight dip structures not discernable, abundant iron staining
			05/05	5950			SANDSTONE	Same as above
			13/13	5949			SILTSTONE	Interval grades to Siltstone, grayish orange (10 YR 7/4), bedding not apparent, highly weathered, moderately friable, slight VFG sand component
			07/07	5948			SILTY CLAYSTONE	Interval grades to Silty Claystone at approx 16 2 ft, light grey (N7), bedding not apparent, well weathered, slightly friable, iron staining locally and on fractures
			07/07	5947			SILTY SANDSTONE	Dark yellowish orange (10 YR 6/6), bedding not apparent, highly weathered, moderately friable, abundant iron stains
			18/18	5946			SILTSTONE	Very light gray (N8), bedding not apparent, well weathered, slightly friable, slight VFG sand component, possible Mg-oxide mineralization, local iron staining, abundant iron staining below 19 5 ft, slight clay fraction NOTE No water encountered while drilling
				5945				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT)	5954.21	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	31-86
EAST	2084766	LOCATOR NUMBER M11	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/02/86	
REMARKS	Hollow Stem Auger						



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964 46	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1/1	5964	0			CL	SANDY GRAVELLY CLAY, pale yellowish brown (10 YR 6/2) Est plast mod Gravel angular to sub-angular Poorly graded Max size 3 5 cm Some root material
				0 6/1	5963	1			SANDSTONE	Top of Bedrock Very light gray to white (N 8-N 9) Some very thin CaCO3 stringers Sand well sorted, silt to VFG sand
	LMA11			1 75/2	5962, 5961	2, 3			SANDSTONE	As above, also has dark yellowish orange (10 YR 6/6) coloring
				1 85/2	5960, 5959	4, 5			SANDSTONE	As above, some CaCO3 in matrix Some black carb material
				1 7/1 5	5958, 5957	6, 7			SANDSTONE	Pinkish gray (5 YR 8/1) to dark yellowish orange (10 YR 6/6) Mod to highly weathered Mod to highly friable Bedding thin layered (approx 1-2 mm) Tilted approx 25 degrees Some carb material, iron staining Some CaCO3 in small fractures Trace clay
				1 85/1 8	5956	8, 9			SANDSTONE	Same as above
				1 65/1 2	5955	10			CLAYEY SILTSTONE	Very pale orange to dark yellowish orange (10 YR 8/2 to 10 YR 6/6) Mod weathered, mod friable Tilted layered bedding Some iron staining some carb material in fractures Some VFG sand Fracture angle = 90

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	135	GROUND ELEVATION (FT)	5964 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAW/DCB	32-86
EAST	2084745	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL, GRAIN, GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
										degrees Bedding angle = 20 degrees
				15/15	5954	10			CLAYEY SILTSTONE	Very light gray to dark yellowish orange (N 8 to 10 YR 6/6) Mod weathered, mod friable Layered tilted bedding (20 degrees) Some carb material in fractures Some CaCO3 Some iron staining Some VFG sand
					5953	11				
				15/18	5952	12			CLAYEY SILTSTONE	Same as above Bedding closer to horizontal
					5951	13				
				17/16	5950	14			CLAYEY SILTSTONE	Same as above Slightly weathered, slightly friable Bedding not evident
					5949	15				
				17/16	5948	16			CLAYEY SILTSTONE	Same as above
				17/18	5947	17			SILTY CLAYSTONE	Yellowish gray (5 Y 8/1) to dark yellowish orange (10 YR 6/6) Mod weathered, slightly friable Bedding not evident Some iron staining in fractures Trace carb material and CaCO3
					5946	18				
				16/12	5945	19			SILTY CLAYSTONE	Same as above Some pure silt areas Some very heavily iron stained areas
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964 46	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			18/2	5944, 5943	20, 21			SILTY CLAYSTONE	Light olive gray (5 Y 6/1) to dark yellowish orange (10 YR 6/6) Mod weathered Slightly to mod friable Some iron staining and carb material Some CaCO3 in areas Some small areas of pure silt (not in layers)
			18/19	5942, 5941	22, 23			SILTY CLAYSTONE	Same as above
			17/16	5940, 5939	24, 25			SILTY CLAYSTONE	Same as above
			16/15	5938	26			SILTY CLAYSTONE	Same as above
			0/4	5937, 5936, 5935	27, 28, 29, 30			NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964.46	PROJECT NUMBER 667.11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMP GRADATIONAL E DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

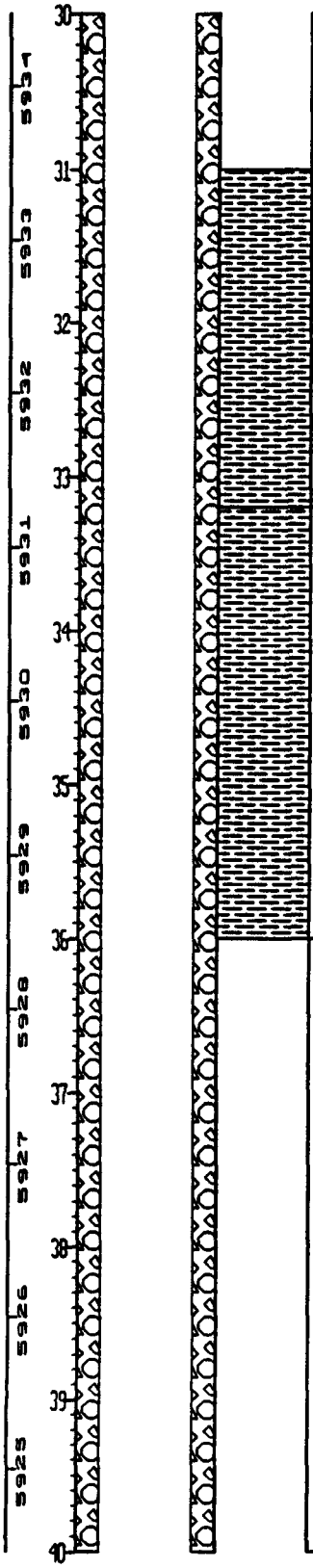
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light gray (N 7), bedding not apparent, weathered, slightly friable, iron staining on fractures, occasional carbonaceous mineralization
CLAYSTONE	Same as above
NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	135	GROUND ELEVATION (FT)	5964 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA	SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAW/DCB	32-86
EAST	2084746	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OX	100% OX	100%						
				0/3	5924	40				
					5923	41				
					5922	42				
					5921	43				
					5920	44				
				0.5/0.5	5919	45			CLAYSTONE	Light gray (N 7), bedding not apparent, weathered, slightly friable, iron staining on fractures
				1/1.5	5918	46			CLAYSTONE	Same as above
				0/1.3	5917	47			NO SAMPLE	
				0.7/0.7	5916	48			CLAYSTONE	Same as 45 0 to 47 0 ft Fracture angle = 90 degrees
					5915	49			CLAYSTONE	Same as above
				2/2		50				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	135	GROUND ELEVATION (FT)	5564 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA	SOLAR POND	CASING DIAMETER (IN)	2 00	GEOLOGIST	LAW/DCB	32-86
EAST	2084745	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	
REMARKS	Hollow Stem Auger/NC Core							

CHEMICAL SAMP/ GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0% 100%	2 /2	5514	50				
				1 /1	5513	51	09/22/86		CLAYSTONE	Same as above
				0 /1	5512	52			NO SAMPLE	
				17/17	5511	53			CLAYSTONE	Same as 45 0 to 47 0 ft Bedding not apparent to thin (< 2 mm) with slight dip, slight silt fraction occurs as individual strata w/in interval Fracture angle = 90 degrees
				18/18	5510	54			CLAYSTONE	Same as above Fracture angle = 80 degrees, bedding angle = 10 degrees
				03/05	5509	55			CLAYSTONE	Same as above
				0 /07	5508	56			NO SAMPLE	
				15/15	5507	57			CLAYSTONE	Medium gray (N 6), bedding not apparent to thin (< 2 mm) slight dip, weathered, slightly friable, slight silt fraction, iron staining occurs locally Bedding angle approx 5 degrees
					5506	58			CLAYSTONE	Same as above Slickensides at approx 60 6 ft, curvilinear surface
					5505	59				
						60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964 46	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMP GRADATIONAL DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
1 8/1 8	5904	60		
1/1	5903	61	CLAYSTONE	Same as above
0 8/0 79	5902	62	CLAYSTONE	Same as above Bedding not apparent and amount of iron staining diminishes below 62 8 ft, silt fraction is disseminated throughout
2 2/2 2	5901	63	CLAYSTONE	Same as above
	5900	64		
2/2	5899	65	CLAYSTONE	Same as above
	5898	66		
	5897	67	NO SAMPLE	
	5896	68		
0/4 5	5895	69		
		70		

WELL OR PIEZOMETER CONSTRUCTION: 10/13/86 ▽

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 1.35	GROUND ELEVATION (FT)	5964 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAW/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE/ GRADATIONAL SA*	SAMPLE NUMBER	SAMPLE GRADATION SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5894	70				
						71				
				0.5/0.5	5893				CLAYSTONE	Dark gray (N 3), bedding may be horizontal based on appearance of core breaks Weathered, slightly friable, carbonaceous, occasional bodies of coal
					5892	72			CLAYSTONE	Medium gray (N 5), bedding not apparent, weathered, slightly friable, moderate amount of carb mineralization, slight silt fraction
				0.3/2.5	5891	73				
					5890	74				
				0.7/1	5889	75			CLAYSTONE	Same as above
					5888	76			CLAYSTONE	Same as above Slickensides at 76 8 ft , 55 to 90 degrees
				1.5/1.5	5887	77			NO SAMPLE	
					5886	78				
				0/3	5885	79				
						80				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964 46	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMP GRADATIONAL S | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 2/0 4	5884	CLAYSTONE	Same as 72 0 to 77 0 ft
1 6/1 6	5883	CLAYSTONE	Same as above
1/1	5882	CLAYSTONE	Same as above, slickensides at approx 83 0 ft, curvilinear surface
0/1	5881	NO SAMPLE	
0 55/0 69	5880	CLAYSTONE	Same as 72 0 to 77 0 ft
2 3/2 3	5879, 5878	CLAYSTONE	Same as above Slickensides at approx 86 0 ft, attitude approx 80 degrees
0/1 2	5877	NO SAMPLE	
2 1/2 1	5876, 5875	SILTY CLAYSTONE	Light gray (N 7), thin (< 2 mm) horizontal bedding, slightly friable, moderate amount of carb mineralization

DEPTH (FT): 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	135	GROUND ELEVATION (FT)	5964 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAW/DCB	32-86
EAST	2084745	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	

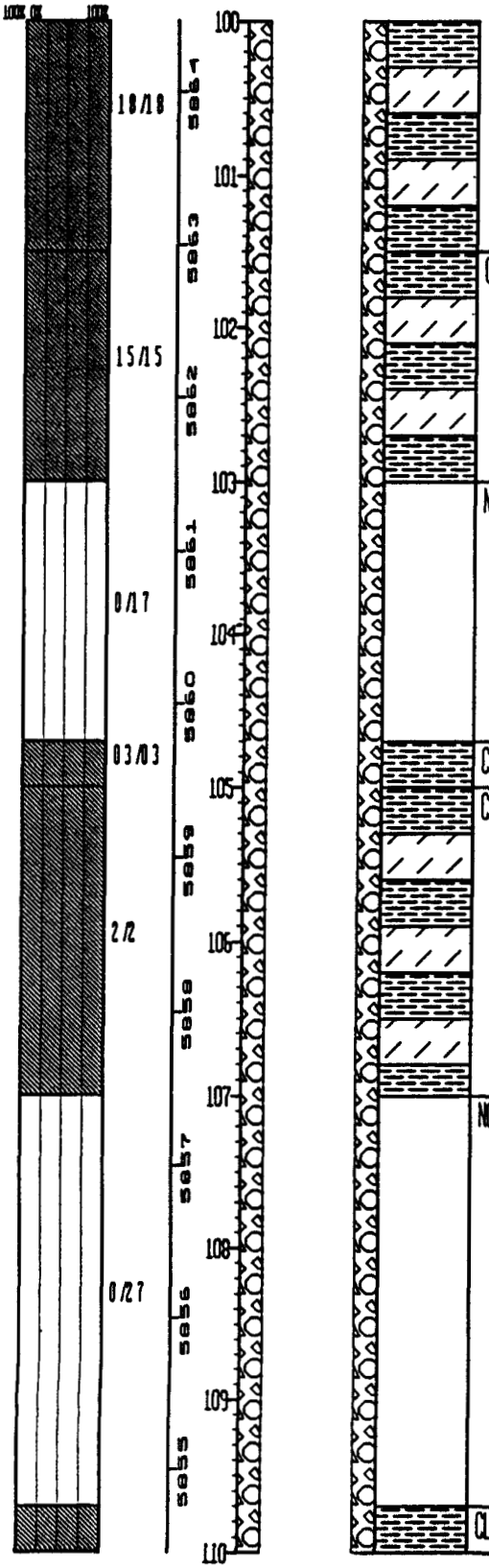
REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					90				
			17/17	5874				SILTY CLAYSTONE	Same as above, bedding exhibits soft sediment deformation, and silt fraction increases
				5873	91				
					92				NO SAMPLE
			0/18	5872					
				5871	93				
					94			SILTY CLAYSTONE	Same as above
			12/12	5870					
				5869	95			CLAYSTONE	Interbedded siltstone and claystone, very light gray (N 8) to medium dark gray (N 4), respectively thin bedded (approx 2 mm and less), slight dip, slightly friable
			2/2		96				
				5868					
				5867	97				NO SAMPLE
			0/24		98				
				5866					
					99				
			0.25/0.25	5865				CLAYSTONE	Medium light gray (N 6), thin bedded (< 2 mm), slight dip, slightly friable, interbedded siltstone occurs throughout interval, carb mineralization occurs on partings
					100				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	135	GROUND ELEVATION (FT)	5964 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER	L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger/NC Core

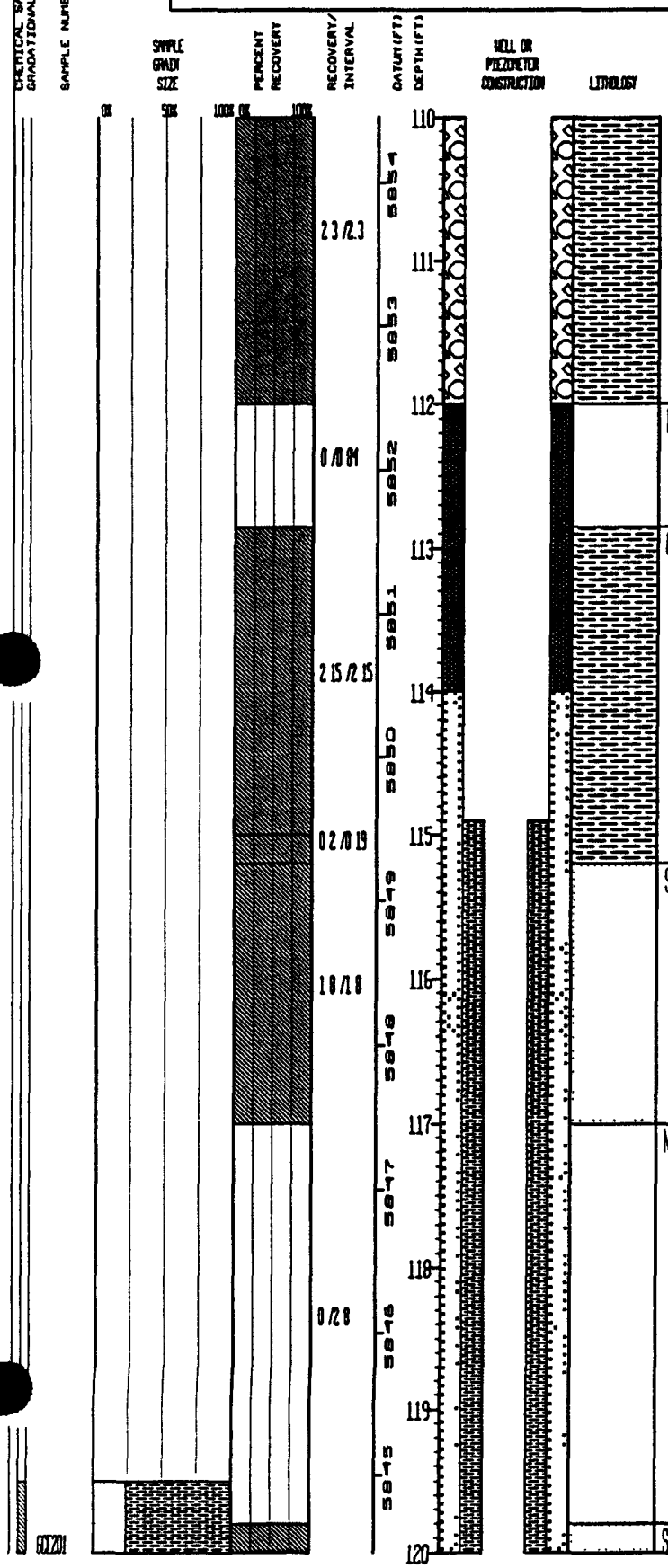
CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above
NO SAMPLE	
CLAYSTONE	Same as 99 7 to 101 5 ft
CLAYSTONE	Same as above
NO SAMPLE	
CLAYSTONE	Medium gray (N 5), bedding not apparent, slightly friable, moderate silt

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964 46	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	component Slickensides occur at approx 111 0 ft, attitude of approx 28 degrees
NO SAMPLE	
CLAYSTONE	Same as 109 7 to 112 0 ft Slickensides at 113 3 ft, badly broken, attitude cannot be accurately measured Interval grades to a Carbonaceous Claystone at approx 114 8 ft and the color changes to dark gray (N 3)
SANDSTONE	Bioturbated, slightly friable, VFG, well sorted, slight to moderate silt fraction
NO SAMPLE	
SANDSTONE	Same as 115 2 to 117 0 ft

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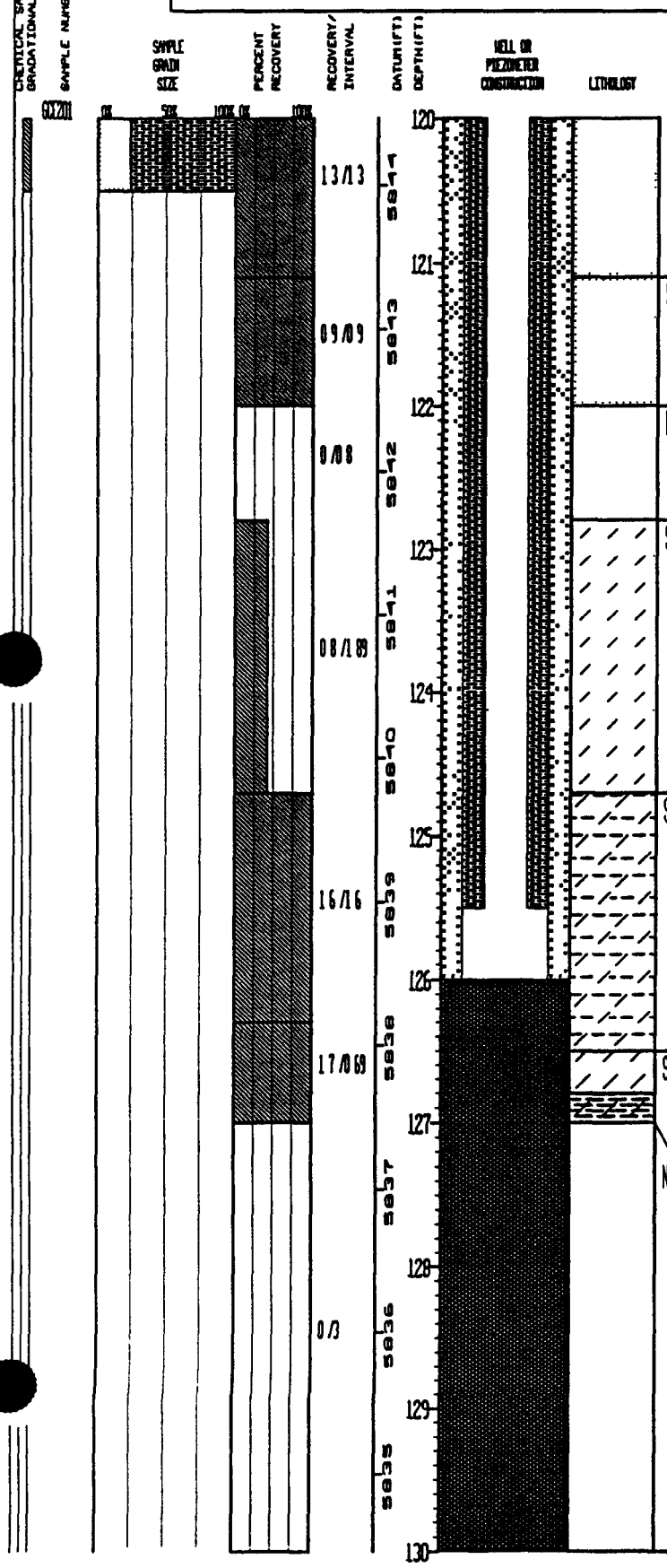
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT)	5964 46	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SANDSTONE	Same as 115 2 to 117 0 ft
SANDSTONE	Same as above Influx of silt approx 121 ft, bedding is thin (< 2 mm) and exhibits soft sediment deformation
NO SAMPLE	
SILTY SANDSTONE	Very light gray (N 8) to med dark gray (N 4), thin bedded (< or = 2 mm), interbedded clay/silt and sand exhibit soft sed deformation, dewatering structures, slumps, slightly friable, VFG sand, vertical burrows, occasional iron stains
SILTY CLAYSTONE	Medium gray (N 5), bedding not apparent, slightly friable, occasional iron stains, carb mineralization on partings
SILTSTONE	Interbedded Siltstone and Claystone and VFG Sandstone, light gray (N 7) to med light gray (N 6), bedding is typically < or = 2 mm, moderate dip, slightly friable, local iron staining Bedding angle = 20 degrees
NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 135	GROUND ELEVATION (FT) 5964 46	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	751068	AREA SOLAR POND	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA/DCB	32-86
EAST	2084745	LOCATOR NUMBER L10	BOREHOLE DIAMETER (IN) 7 1/4	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			2/2	5834, 5833	130–131			CLAYSTONE	Med dark gray (N 4), bedding not apparent, slightly friable, moderate silt fraction, carb mineralization on partings, occasional iron stains, silt fraction increases with depth
			0/15	5832, 5831	132–133			NO SAMPLE	
			15/15	5830, 5829, 5828, 5827, 5826, 5825	134–135			CLAYSTONE	Same as above

Depth scale: 130, 131, 132, 133, 134, 135, 136, 137, 138, 139, 140

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	16 8	GROUND ELEVATION (FT)	5949 28	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749563	AREA MOUND AREA		CASING DIAMETER (IN)	0	GEOLOGIST	DCB	33-86
EAST	2085000	LOCATOR NUMBER	M9	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/10/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) / DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0% 100%	17/17	5949			GC	Clayey Gravel, dominantly light gray (N7), clay matrix is light brownish gray (5YR 6/1), sub-angular to sub-rounded, poorly graded, max size 6 cm, some roots, matrix is calcareous
				13/31	5947			CL	GRAVELLY CLAY, pale yellowish brown (10YR 6/2), low to moderate plasticity, some silt, calcareous, color grades to dusky brown (5YR 2/2), from approx 4 6 ft to approx 6 0 ft
				14/2	5945			GC	Clayey Gravel, dominantly light gray (N7), clay matrix is pale brown (5YR 5/2), sub-angular, poorly graded, max size approx 2 5 cm
				16/16	5943			CLAYSTONE	Top of Bedrock Moderate yellowish brown (10YR 5/4), moderately low plasticity, trace of silt
				17/17	5941			CLAYSTONE	Mottled yellowish brown (10YR 5/4) to light gray (N7), bedding not apparent, highly weathered, slightly friable, local iron staining
					5940				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	16 8	GROUND ELEVATION (FT)	5949 28	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749963	AREA	MOUND AREA	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	33-86
EAST	2085000	LOCATOR NUMBER	M9	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/10/96	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		SW	100%	17/17	5939	10			CLAYSTONE	Same as above
					5938	11				
					5937	12			CLAYSTONE	As above with abundant iron staining from approx 11 8 ft to 13 6 ft
				19/19	5936	13				
					5935	14			CLAYSTONE	As above with slickensides at approx 14 8 ft, attitude 45 degrees
				18/18	5934	15				
					5933	16			CLAYSTONE	As above with some carbonaceous mineralization at approx 16 6 ft
				13/13	5932	17				
					5931	18				
					5930	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				13/13	0			CL	CLAY, light gray (N7), mod plasticity, some roots, trace of gravel (5 5 cm), trace of sand
				0/07	1				NO SAMPLE
				03/03	2			CL	Same as above, moderate yellowish brown (10 YR 5/4), some silt, trace of twigs, some iron staining as mottles, slightly calcareous
				15/17	3			CL	Same as above, no roots or twigs, calcareous material esp in bottom of interval
				0/3	4				NO SAMPLE
				17/24	7			CL	Same as above
					9				NO SAMPLE

SB01 SB02 SB03 SB04 SB05 SB06 SB07 SB08 SB09 SB10

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE / GRADATIONAL SAMPLE / SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0/2.6; 15/39; 18/21; 17/17

DATUM (FT): 5900, 5899, 5898, 5897, 5896, 5895, 5894, 5893, 5892, 5891

DEPTH (FT): 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	Clayey Gravel, matrix color is pale yellowish brown (10 YR 6/2), angular - sub-angular, mod graded, max size = 5 cm, some sand, trace of iron staining
SILTY CLAYSTONE	Top of Bedrock Grayish orange (10 YR 7/4), laminar bedding @ 12 degrees, well weathered, mod friable, some gravel in top 3 in of interval, some iron staining as mottles
CLAYSTONE	Light gray (N7), horizontally laminated, well weathered, mod friable, some iron staining, trace of silt
CLAYSTONE	Same as above Some silt, fractures at 70 degrees, trace of Mg

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
									staining
				17/28	5890			CLAYSTONE	Yellowish gray (5 Y 8/1), massive bedding, well weathered, mod friability, iron staining as mottles, trace of Mg staining, some fractures at approx 70 and 10 degrees
				2/2	5889				
					5888				
					5887				
					5886			CLAYSTONE	Same as above
				2/2	5885				
					5884				
					5883			CLAYSTONE	Same as above
				13/13	5882			CLAYSTONE	Same as above, light brownish gray (5 YR 4/1), some carb material, esp at bottom of interval, fracture @ 60 degrees
				18/2	5881				

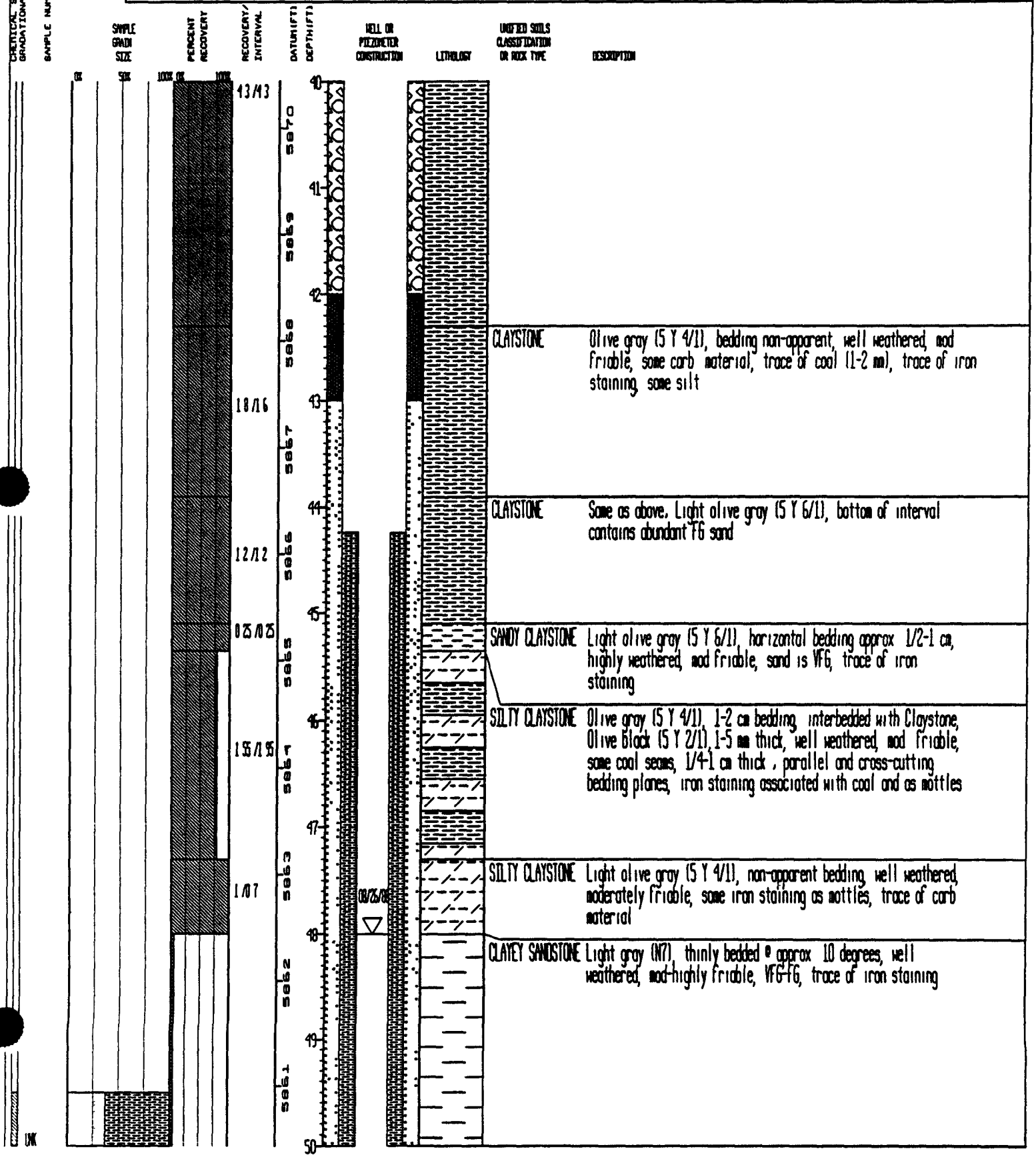
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMP / GRADATIONAL & DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OR	100% OR 100%	17/2	5880 30			CLAYSTONE	Same as above Fractures at 90 and 70 degrees
				12/1	5879 31			CLAYSTONE	Light gray (N7), massively bedded, highly weathered, mod friable, some iron staining as mottles and along fracture planes, some silt, some carb material, fractures at 90 to 70 degrees, trace of calc material
				06/06	5878 32			CLAYSTONE	Same as above. Yellowish gray (5 Y 8/1), approx 20 degree fractures, no calc
				18/2	5877 33			CLAYSTONE	Same as above. Light gray (N7), trace of 70 to 90 degree fractures
				17/14	5876 34			CLAYSTONE	Same as above
				1/1	5875 35			CLAYSTONE	Same as above. Fractures @ 20, 40, 85, and 60 degrees
				0/02	5874 36			NO SAMPLE	
					5873 37			CLAYSTONE	Same as above. Light olive gray (5 Y 6/1) at top of interval to olive black (5 Y 2/1) at bottom of interval, trace of iron staining
					5872 38				
					5871 39				
					40				

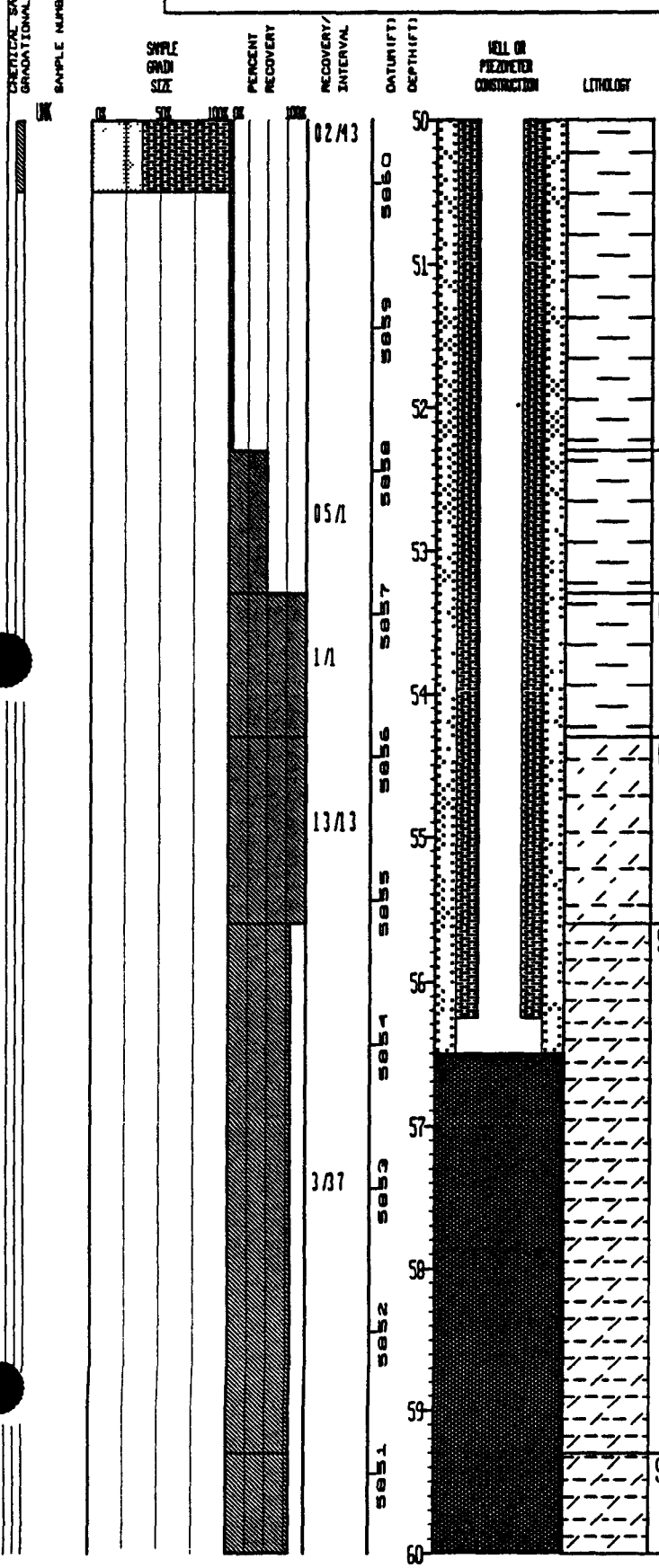
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT) 5910 44	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN) 2	GEOLOGIST DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN) 4 3/4	DATE DRILLED 08/28/86	

REMARKS Hollow Stem Auger/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYEY SANDSTONE	Same as above
CLAYEY SANDSTONE	Same as above possible hummocky cross stratification
CLAYEY SILTSTONE	Olive gray (5 Y 4/1), bedding non-apparent, highly weathered, mod friability, some VFG sand at bottom of interval, some iron staining as mottles, trace of carb material
SILTY CLAYSTONE	Olive gray (5 Y 4/1), non-apparent bedding, highly weathered, mod friability, iron staining as mottles, some VFG sand, at approx 51 ft, VFG-FG sand body, approx 3 in thick, bedding @ 5-10 degrees
SILTY CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPL GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1.3/1.6; 1.9/1.6; 1.9/1.8; 5/5; 0.6/0.89

DATUM (FT): 5850, 5849, 5848, 5847, 5846, 5845, 5844, 5843, 5842, 5841

DEPTH (FT): 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Olive gray (5 Y 4/1), non-apparent bedding, highly weathered, mod friable, trace of iron staining as mottles, trace of carb material
SILTY CLAYSTONE	Same as above
SANDSTONE	Approx 6 in of VFG Sandstone, light olive gray (5 Y 6/1), beds are 1-2 cm, interbedded with Claystone, olive gray (5 Y 4/1), approx 3 mm thick
SILTY CLAYSTONE	Same as above, increased silt fraction, (reference interval, 60 9 ft to 62 5 ft)
SILTY CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT) 5910 44	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN) 2	GEOLOGIST DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN) 4 3/4	DATE DRILLED 08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPL GRADATIONAL SA DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

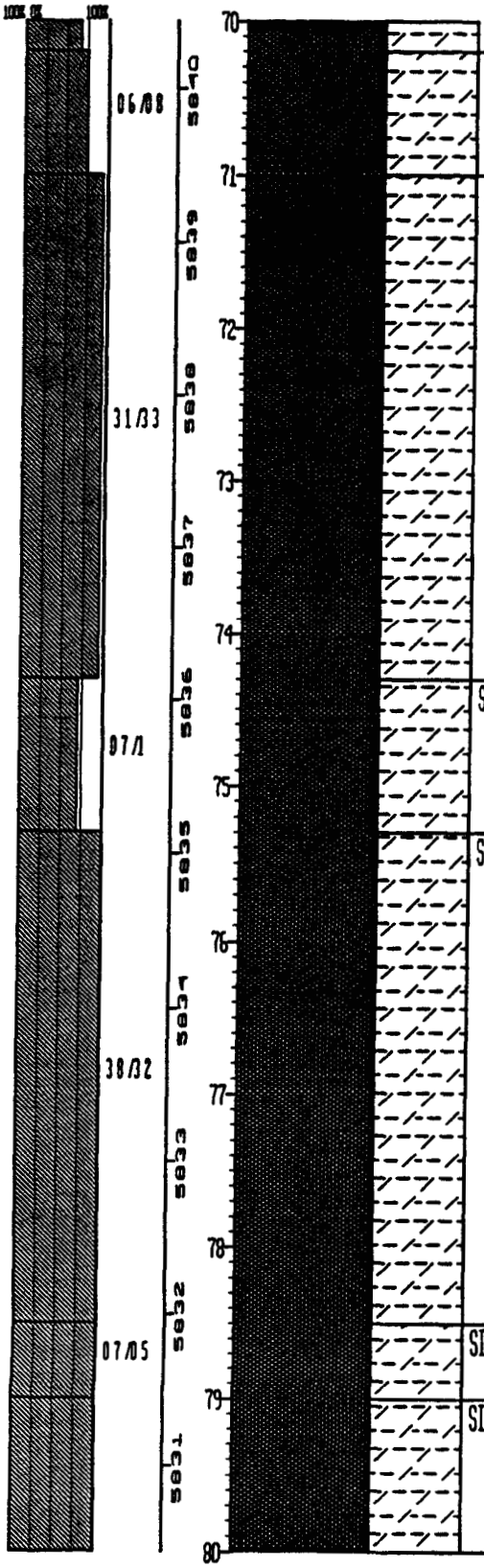
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



Unified Soils Classification or Rock Type	Description
SILTY CLAYSTONE	Light olive gray (5 Y 6/1), massive bedding, highly weathered, mod friability, trace of iron staining
SILTY CLAYSTONE	Same as above. Olive black (5 Y 2/1), trace of carb material
SILTY CLAYSTONE	Same as above. Olive gray (5 Y 4/1), trace of iron nodules
SILTY CLAYSTONE	Same as above. Top 1 ft of interval, brownish gray (5 YR 4/1), no iron staining or nodules Bottom 2 ft of interval. Same as above-yellowish gray (5 Y 8/1), increased silt fraction, some fine grained sand, especially in lenses
SILTY CLAYSTONE	Same as above. Olive gray (5 Y 4/1), decreased silt fraction, floury texture
SILTY CLAYSTONE	Same as above, bottom 2 ft of interval has consolidated texture

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL SAMPLE GRADATIONAL BAR	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				11/11	5930 80				
					81				
					5929				
					82				
					5928				
					83				
					5927			SILTY CLAYSTONE	Olive black (5 Y 2/1), non-apparent bedding, well weathered, mod friability, some carb material, some iron staining as mottles, some micro-fractured
				31/2.5	84				
					5926				
					85				
					5925				
				07/0.75	86			SILTY CLAYSTONE	Same as above. Floury texture, no iron staining, micro-fractures non-apparent
					5924				
				12/13	87			SILTY CLAYSTONE	Same as above. Olive gray (5 Y 4/1), increased silt fraction, consolidated texture, some VFG sand
					5923				
				18/1	88			SILTY CLAYSTONE	Same as above. Yellowish gray (5 Y 8/1)
					5922				
					89			SILTY SANDSTONE	VFG-fG, very light gray (N8), bedding from slab shows extensive vertical burrowing (2 1/2 in - 1/2 in long), bioturbated, thinly laminated, some cross-stratification, general bedding angle of 20 degrees, some horizontal clay interbeds (1/2 - 1 cm thick), well-mod weathered, mod-poor friability, sub-angular to sub-rounded, mod
					5921				
					90				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	5910 44	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750173	AREA EAST TRENCHES	CASING DIAMETER (IN)	2	GEOLOGIST	DAT	34-86
EAST	2086192	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	4 3/4	DATE DRILLED	08/28/86	

REMARKS Hollow Stem Auger/NC Core

CHEMICAL, GEOTECH, GRADATIONAL & SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			3/3	90				to well sorted, trace of carb material, some clay
UNK				91				
				92				SILTY SANDSTONE VFG-FG, very light gray (N8), bedding is non-apparent (coating on core), well-mod weathered, mod-poorly friable, sub-angular to sub-rounded, mod-well sorted, some carb material, some clay
			4/4	93				
				94				
				95				
			03/03	96				SILTY CLAYSTONE Dark greenish gray (5 GY 4/1), non-apparent bedding, highly weathered, mod friable, some carb material, trace iron staining as mottles and nodules
				97				SILTY CLAYSTONE Same as above
			37/37	98				
				99				
				100				

sa11 sa12 sa13 sa14 sa15 sa16 sa17 sa18 sa19 sa20

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 18	GROUND ELEVATION (FT)	5909 2	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750179	AREA- EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	35-86
EAST	2086218	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/19/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPL GRADATIONAL SA TH

SAMPLE NUMBER

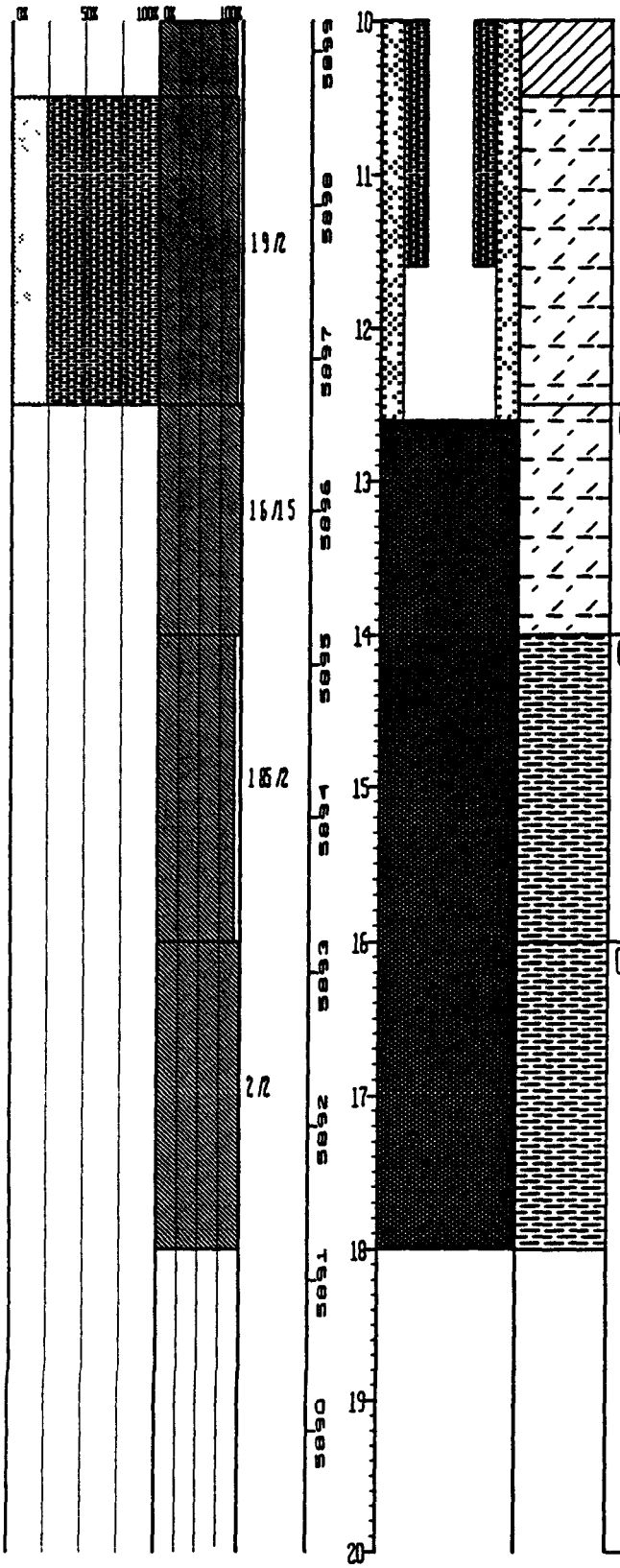
SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
1 5/2	5909 5908	0 1			CL	SILTY GRAVELLY CLAY, Very lt gray (N8) grading to mod yellowish brown (10 YR 5/4) Est plast mod to low Gravel angular to sub-rounded, mod well graded Granules to 2 5 cm Some sand, VFG Root material throughout interval
0 7/0 75	5907	2			CL	Same as above
0 /1	5906	3			NO SAMPLE	
0 8/0 6	5905	4	03/17/87		CL	SILTY GRAVELLY CLAY Pale yellowish brown (10 YR 6/2), Est plasticity low to mod Gravel angular to sub-rounded, mod to well graded Some sand, VFG to coarse
1 6/1 4	5904	5			CL	Same as above More VFG sand in matrix
1 25/2 75	5903 5902 5901	6 7 8	09/03/86		CL	SILTY GRAVELLY CLAY Dk yellowish brown (10 YR 4/2) to grayish brown (5 YR 3/2) Gravel mod to well graded Max size 3 0 cm Sub-angular to sub-rounded Some sand VFG to granules, trace root material Very slightly calcareous matrix
1 85/2	5900	9 10	09/03/86		CL	SANDY SILTY CLAY, Brownish gray (5 YR 4/1) Est plast low to mod, Sand VFG to granules, mostly VFG. Some gravel, max size measurable 2 cm Matrix slightly calcareous

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 18	GROUND ELEVATION (FT)	5909 2	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750179	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	35-86
EAST	2086218	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/19/86	
REMARKS	Hollow Stem Auger						

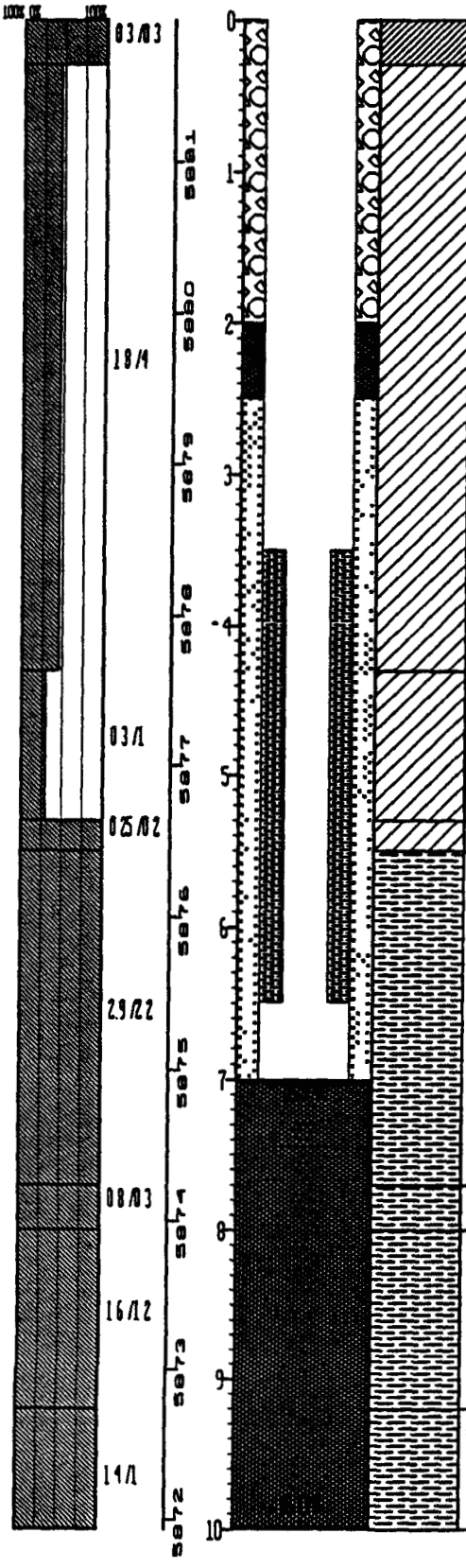
CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYEY SILTSTONE	Top of Bedrock Very Lt gray (N8) to dark yellowish orange (10 YR 6/6) Bedding not evident Highly weathered, mod to slightly friable, CaCO3 mineralization in some small discontinuous fractures Trace root material
CLAYEY SILTSTONE	Same as above Grading to Claystone, dk yellowish orange (10 YR 6/6) Highly weathered Slightly to mod friable, CaCO3 in fractures Some in matrix, bedding not evident Some iron staining Trace silt
CLAYSTONE	Very pale orange (10 YR 8/2) to dk yellowish orange (10 YR 6/6) Highly weathered, slightly friable CaCO3 in fractures and some in matrix Iron oxide nodule (2 5 cm) present Some iron staining Trace carb material
CLAYSTONE	Lt olive gray (5 Y 6/1) Mod weathered, bedding not evident Slightly friable Some iron staining in fractures Trace CaCO3, trace carb material

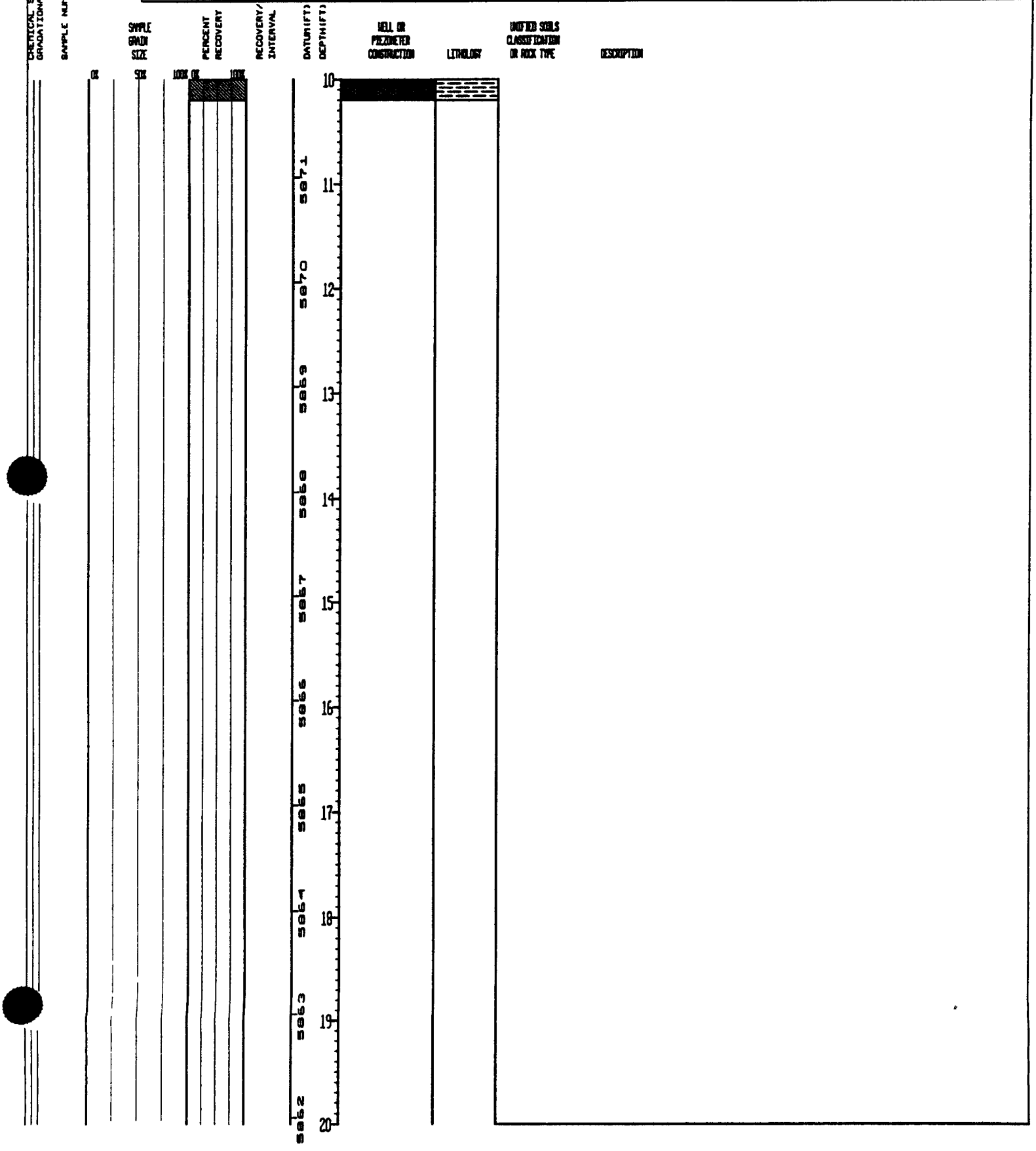
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 10 2	GROUND ELEVATION (FT)	5881 94	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750397	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	36-86
EAST	2086819	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/25/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMP GRADATIONAL & DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CH	Sandy Clay, Pale yellowish brown (10 YR 6/2), mod-high plast , some roots, trace of gravel, slightly calc
CL	SANDY CLAY, multicolored- grayish brown (5 YR 3/2), moderate yellowish brown (10 YR 5/4), light gray (NB), mod plast , some calc material, trace of gravel increasing to some gravel at bottom of interval, bottom 2 in with abundant iron staining and concretions, some iron staining in top part of interval
CL	Same as above, floury texture
CL	Same as above
CLAYSTONE	Top of Bedrock Light olive gray (5 Y 8/1), est mod plast , some calc material, some iron staining as mottles, trace of sand
CLAYSTONE	Same as above, slightly calcitic
CLAYSTONE	Same as above, yellowish gray (5 Y 8/1), some silt, some VFG sand, floury texture, increased iron staining
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 10 2	GROUND ELEVATION (FT)	5881 91	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750397	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	36-86
EAST	2086819	LOCATOR NUMBER N10	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/25/86	
REMARKS	Hollow Stem Auger						



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 13	GROUND ELEVATION (FT)	5792 02	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751563	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	37-86
EAST	2088862	LOCATOR NUMBER P11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/22/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRADATION SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1 15/12	5792	0			CH	Silty Clay, pale yellowish brown (10 YR 6/2), Est plast mod to high, some roots and grass, trace gravel, granule size
				1 75/1	5791	1				
					5790	2			CL	Same as above, with color change to dusky yellowish brown (10 YR 2/2) Trace roots
				02/1	5789	3			CH	Silty Clay, olive gray (5 Y 4/1) Est plast, mod-high, some sand VFG to FG
					5788	4				
				2 35/12	5787	5			CL	SANDY CLAY, olive gray (5 Y 4/1) and dark yellowish orange (10 YR 6/6) Mottling Est plast mod, sand VFG to CG, Trace gravel to 3 5cm, trace CaCO3
					5786	6				
				08/15	5785	7			CL	Same as above, lg piece of gravel 6 5cm
				08/15	5784	8			CLAYSTONE	Top of Bedrock Same as above, some CaCO3
									CLAYSTONE	Same as above, some CaCO3
				09/12	5783	9			CLAYSTONE	Same as above, no gravel
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 13	GROUND ELEVATION (FT)	5792 02	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751563	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	37-86
EAST	2098862	LOCATOR NUMBER P11	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/22/86	

REMARKS Hollow Stem Auger

CHEMICAL/GRADATIONAL SAMPLE NUMBER	SAMPLE GRADATION SIZE	PERCENT RECOVERY	RECOVERY/INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0 65 /2	10			CLAYSTONE	Yellowish gray (5 Y 8/1), Est plast mod, trace CaCO3
			0 1 /1	12			CLAYSTONE	Same as above with color change to light olive gray (5 Y 6/1) Trace carb material Note No water encountered during drilling

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14	GROUND ELEVATION (FT)	5728 13	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752826	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	38-86
EAST	2090281	LOCATOR NUMBER R12	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/08/86	
REMARKS	Hollow Stem Auger Cave from TD to 13 0'						

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OK	16/12	5728	0			CH	Silty Clay Dark yellowish brown (10YR 4/2), surface grass and roots present Moderately high plasticity Trace sand
					5727	1				
				0/18	5726	2			NO SAMPLE	
				13/12	5725	3			CL	Same as above Less roots and grass, some sub-rounded gravel, up to 2cm
					5724	4				
				16/12	5723	5			GC	Large cobbles and gravel in sandy clay matrix Gravel grayish red (10R 4/2) to medium gray (N5) Angular to sub-angular Moderately graded Sandy clay matrix, moderately yellowish brown (10YR 5/4) Moderate plasticity
					5722	6				
				18/12	5721	7			CLAYSTONE	Top of Bedrock Dusky yellowish brown (10YR 2/2) High plasticity, some silt, trace sand One large cobble at top (7 cm) Some iron staining Some thin carbonaceous layers
				02/12	5720	8			SILTY CLAYSTONE	Dark yellowish brown (10YR 4/2) Highly weathered Slightly friable Massive (?) bedding Some carbonaceous material
				15/12	5719	9			SILTY CLAYSTONE	Same as above
				06/06		10			SILTY CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14		GROUND ELEVATION (FT)	5728 13	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	752826	AREA BUFFER EAST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	38-86
EAST	2090281	LOCATOR NUMBER	R12	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/08/86	

REMARKS Hollow Stem Auger Cave From TD to 13 0'

CHEMICAL SAMPL GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) 5718 5717 5716 5715 5714 5713 5712 5711 5710 5709

DEPTH (FT) 10 11 12 13 14 15 16 17 18 19 20

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

0 7/1 3

0 9/0 7

0 65/0 65

0 5/0 35

0 9/1

CLAYEY SILTSTONE Dark yellowish brown (10YR 4/2) Highly weathered Slightly friable Massive bedding (?), some carbonaceous material Some iron stains

CLAYEY SILTSTONE Same as above

CLAYEY SILTSTONE Same as above, moderately friable

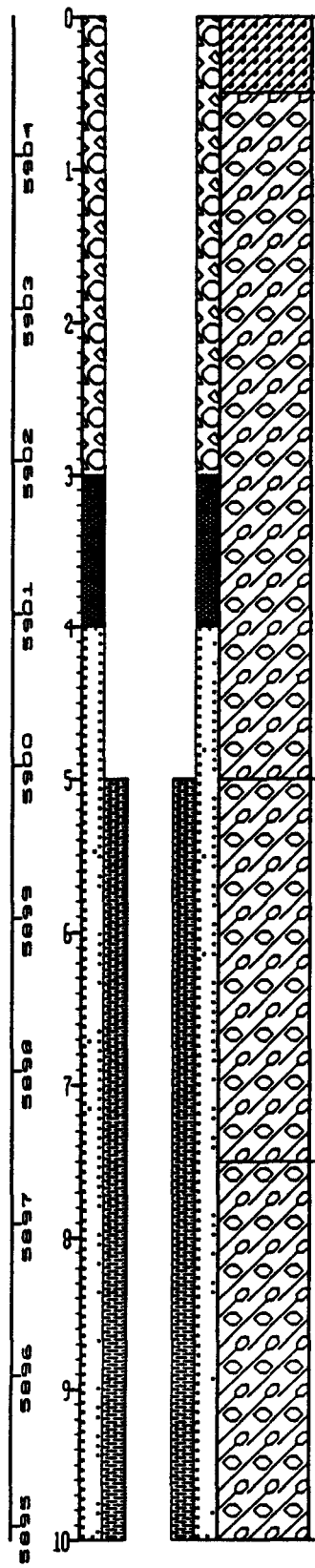
CLAYEY SILTSTONE Same as above

CLAYEY SILTSTONE Same as above, slightly friable
NOTE No water encountered while drilling

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37	GROUND ELEVATION (FT)	5904 91	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751291	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	39-86
EAST	2090696	LOCATOR NUMBER R11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/18/86	

REMARKS Hollow Stem Auger Cave From TD to 35 80'

CHEMICAL SAMP GRADATIONAL S DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



RECOVERY/INTERVAL	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 5/0 5	SC	Gravelly Clayey Sand, dark yellowish brown (10 YR 4/2), sub-angular-sub-rounded, mod graded, max gravel size= 3 5cm, some roots
0 8/4.5	GC	Calcareous Gravel, bottom is moderate yellowish brown (10 YR 5/4), top is pale yellowish brown (10 YR 6/2), angular-sub-angular, max size = 7cm, mod graded
0 6/2 5	GC	Calcareous Sandy Gravel, matrix color is light brown (5 YR 5/6), angular to sub-angular, mod grading, max size = 6cm, sand is mg-vcg, some clay
0 6/2 5	GC	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37	GROUND ELEVATION (FT)	5904 91	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751291	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	39-86
EAST	2090696	LOCATOR NUMBER R11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/18/86	

REMARKS Hollow Stem Auger Cave From TD to 35 80'

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			07/2	5894	10–11			GC	Calcareous Sandy Gravel, matrix color is light brown (5 Y 5/6), angular-sub-angular, mod grading, max size = 4 cm, sand is MG to VCG
			03/05	5893	11–12			SC	Clayey Sand, very pale orange (10 YR 8/2), angular to sub-angular, mod - poorly graded, trace of biotite (?)
DAT 10			11/43	5892, 5891, 5890, 5889	12–16			GC	SANDY GRAVEL, matrix color is light brown (5 Y 5/6), angular-sub-angular, mod to well graded, max size= 6 cm, some clay esp @ bottom of interval, slightly calc
			21/57	5888, 5887, 5886, 5885	16–20			GC	Same as above, trace of clay, v slightly calc

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37	GROUND ELEVATION (FT)	5904 91	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751291	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	39-86
EAST	2090696	LOCATOR NUMBER R11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/18/86	

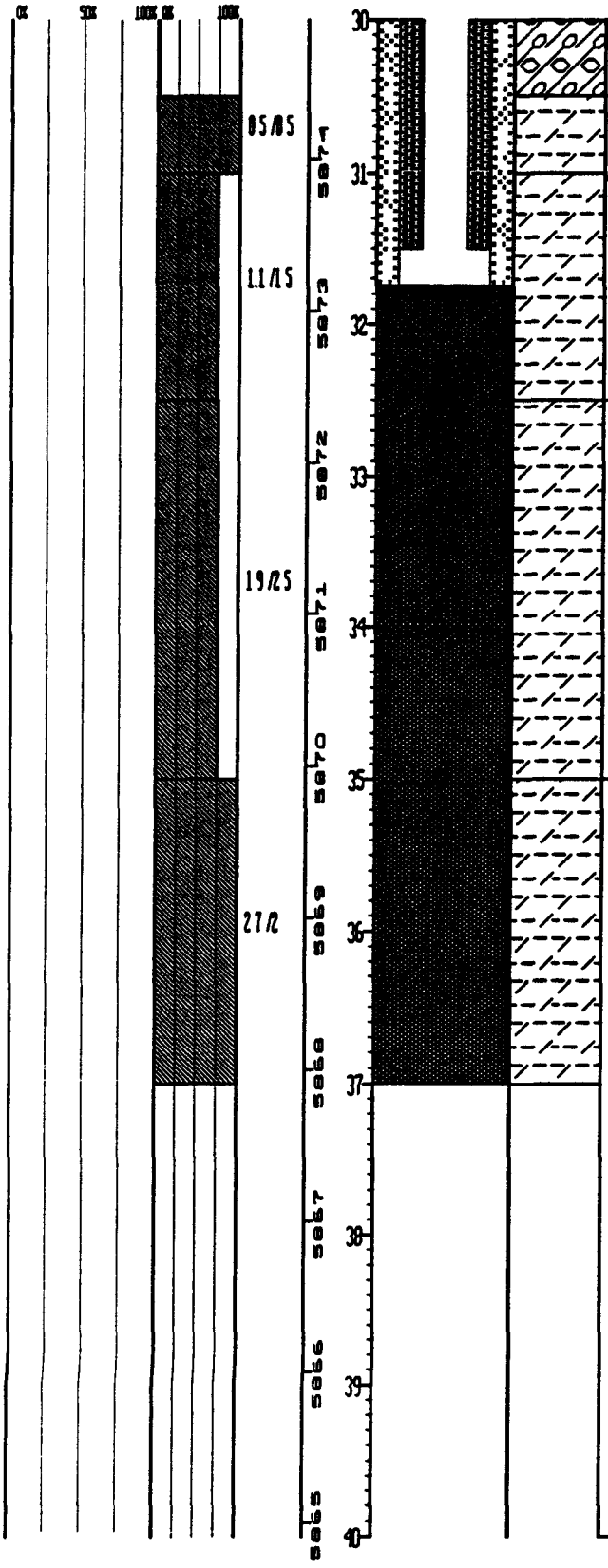
REMARKS Hollow Stem Auger Cave from TD to 35 80'

CHEMICAL SAMPLE / GRADATIONAL SP	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM (FT) / DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					20				
					21				
					22				
					23			GC	SANDY GRAVEL, matrix color is light brown (5 Y 5/6), angular-sub-angular, mod-well graded, max size= 6 cm, trace of clay
					24				
				12/5	25	09/11/86			
					26				
					27				
					28			GC	Clayey Gravel, very pale orange (10 YR 8/2), angular-sub-angular, mod grading, max size= 4 cm
				01/3	29				
					30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37		GROUND ELEVATION (FT)	5904 91	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751291	AREA BUFFER EAST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	39-86
EAST	2090696	LOCATOR NUMBER	R11	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	08/18/86	

REMARKS Hollow Stem Auger Cave from TD to 35 80'

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	Same as above
SILTY CLAYSTONE	Top of Bedrock Lt gray (N8) and grayish-orange (10 YR 7/4), mod to high plast, some very fine (VFG) sand
SILTY CLAYSTONE	Same as above, trace of carb material
SILTY CLAYSTONE	Brownish gray (5 YR 4/1) Mod-high plast, abundant carb material, some iron staining, with carb Bottom of interval same as above, olive black (5 Y 2/1)
SILTY CLAYSTONE	Same as above, olive gray (5 Y 4/1), trace carb material, trace of iron staining along fractures

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 B		GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11
NORTH	749615	AREA EAST TRENCHES		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB
EAST	2088502	LOCATOR NUMBER	P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86

REMARKS Casing driver/NC Core

LOG OF BORING NUMBER

40-86

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5941	0			NO SAMPLE	
					5940	1				
					5939	2				
				0/5						
					5938	3				
					5937	4				
					5936	5			NO SAMPLE	
					5935	6				
					5934	7				
				0/5						
					5933	8				
					5932	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OK		SOIL	100% OK	100%	5931	10				NO SAMPLE
					5930	11				
					5929	12				
					5928	13				
					5927	14				
				0 /10	5926	15				
					5925	16				
					5924	17				
					5923	18				
					5922	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA	EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2086502	LOCATOR NUMBER	P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core

CHEMICAL SAMPL GRADATIONAL SI	SAMPLE NUMBER	SAMPLE GRADI SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOR	100% OR	100%	0 /10				NO SAMPLE

5912 5913 5914 5915 5916 5917 5918 5919 5920 5921

20 21 22 23 24 25 26 27 28 29 30

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core

CHEMICAL SAMPT GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5911	30			NO SAMPLE	
					5910	31				
					5909	32				
					5908	33				
					5907	34				
				0 /10	5906	35				
					5905	36				
					5904	37				
					5903	38				
					5902	39				
						40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 4 5/5; 3/3; 0 5/0 5

DATUM (FT): 5881, 5880, 5879, 5878, 5877, 5876, 5875, 5874, 5873, 5872

DEPTH (FT): 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70

WELL OR PIEZOMETER CONSTRUCTION

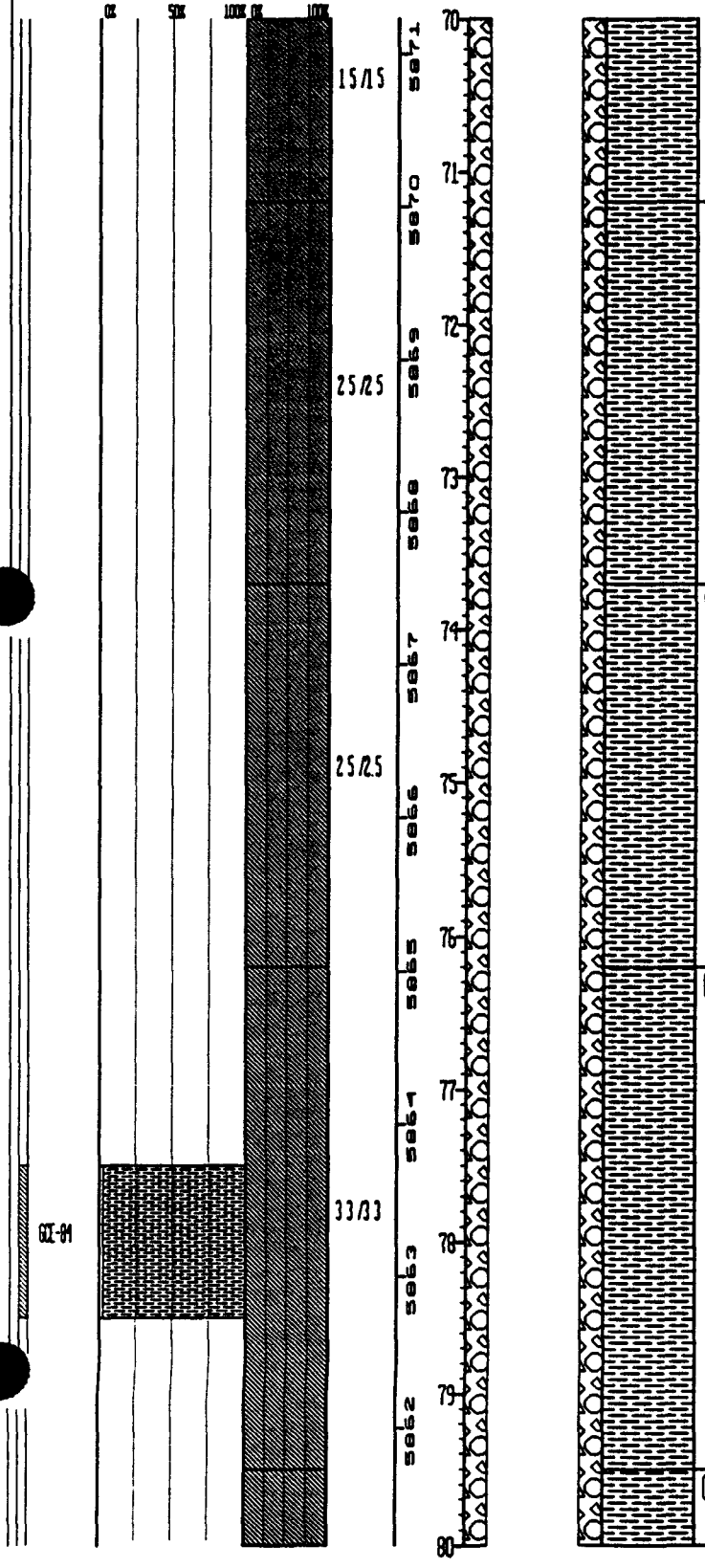
LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above, with slickensides at 61 5 ft, attitude approx 55 degrees Small iron nodules (< 5 mm diameter) occur at 63 5 to 63 9 ft Slickensides at approx 64 ft, curvilinear surface
CLAYSTONE	Same as above, with color changes to medium gray (N5) with some carbonaceous mineralization occurring locally Slickensides occur at approx 66 3 ft and 68 2 ft Color grades to medium light gray at approx 68 2 ft
CLAYSTONE	Same as above, with decrease in amount of carb mineralization below approx 69 ft
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core

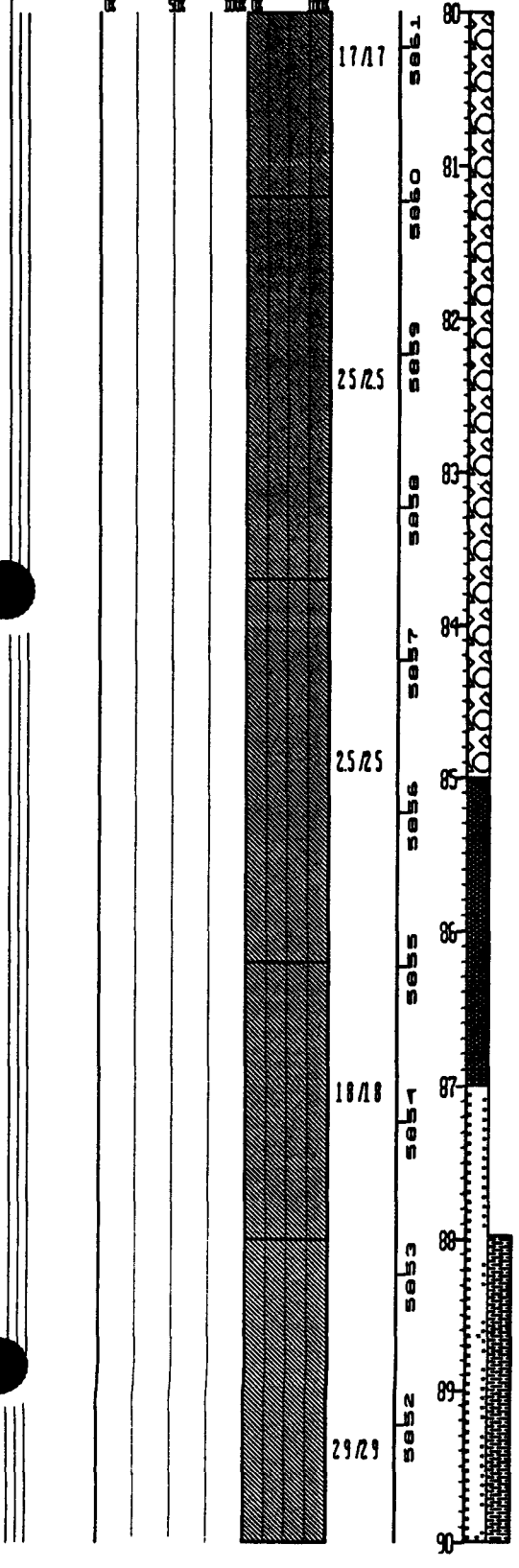
CHEMICAL SAMPL GRADATIONAL S/ DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above
CLAYSTONE	Same as above
CLAYSTONE	Same as above, Bedding may be horizontal based on appearance of core breaks and slab at 79 0 ft
CLAYSTONE	Same as above, Bedding appears to be 1cm in thickness, bedding features are irregular surfaces that may be erosional surfaces

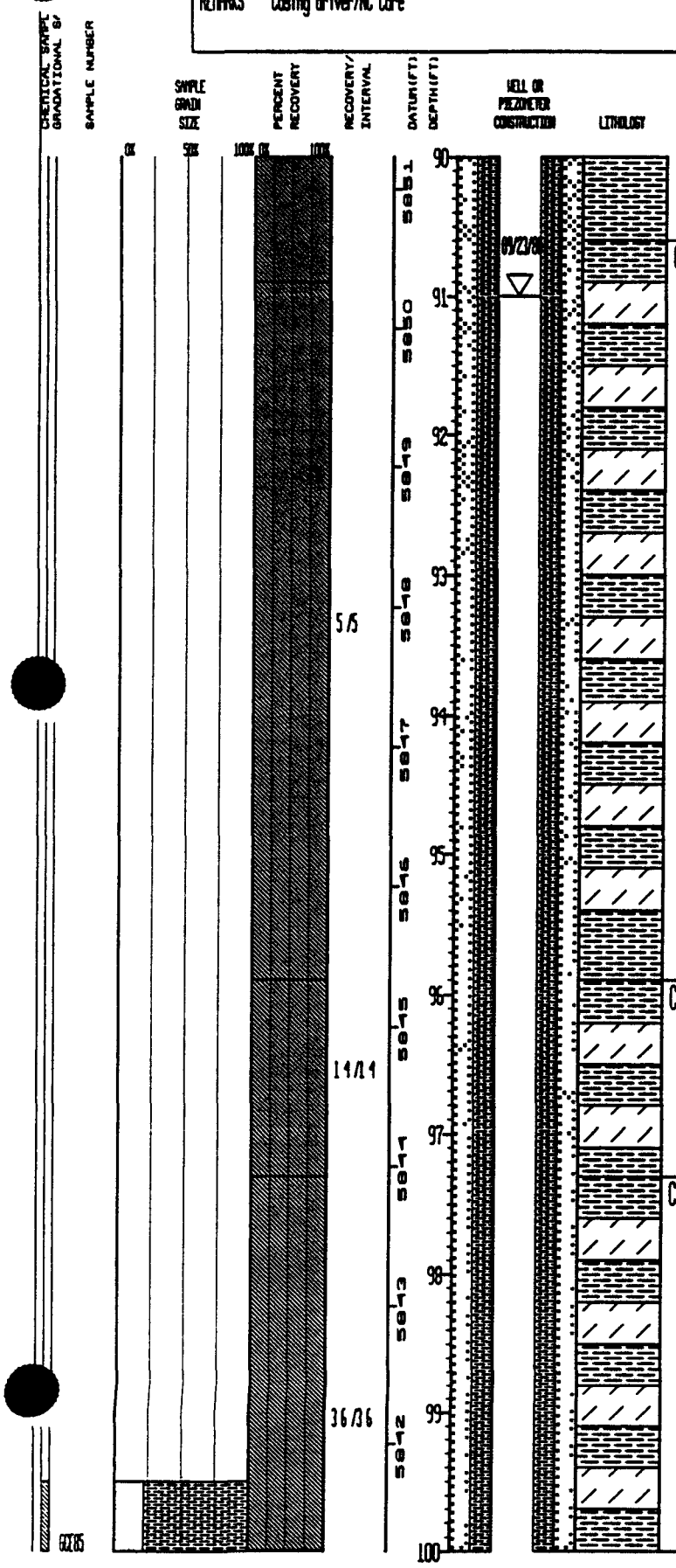
STATE PLANE COORDINATE		TOTAL DEPTH (FT)	124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA	EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088512	LOCATOR NUMBER	P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core



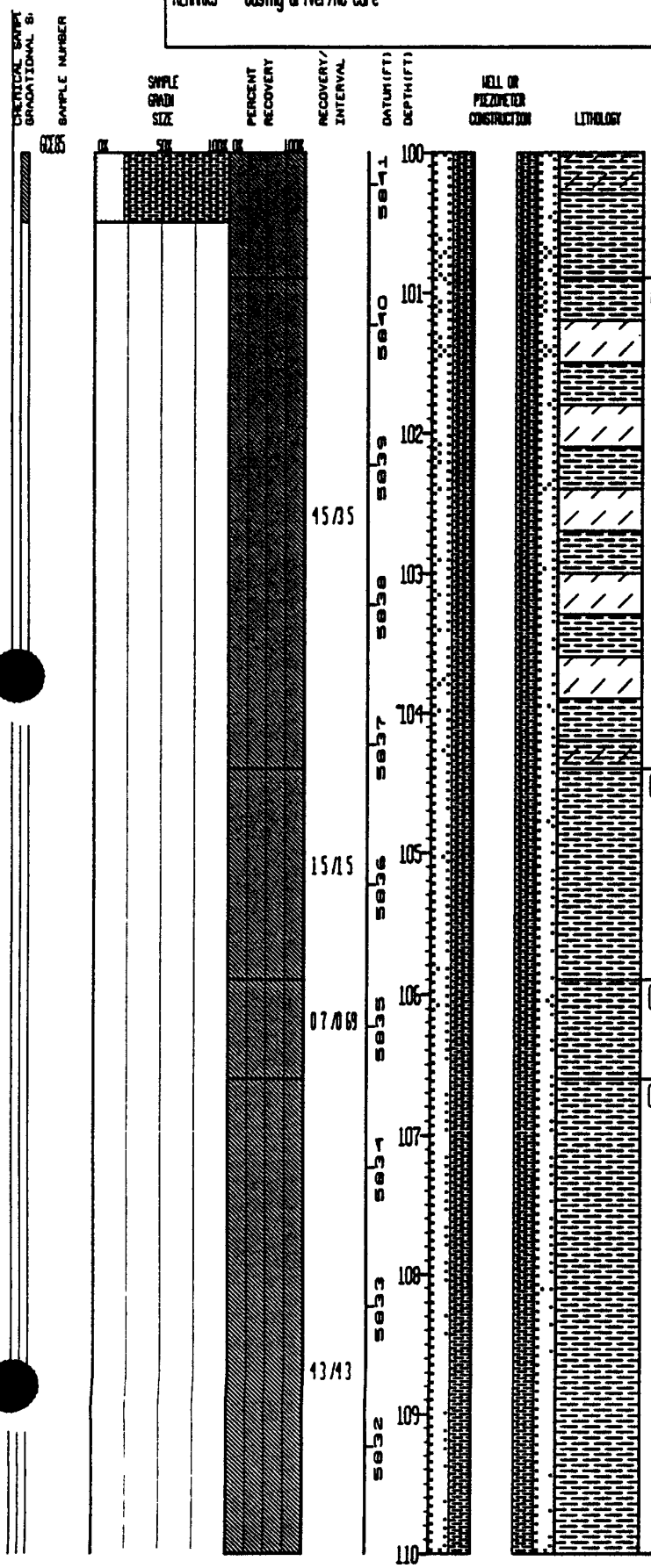
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above
CLAYSTONE	Medium dark gray (N4), bedding not apparent, weathered, slightly friable, local carb mineralization, slight to moderate silt component
CLAYSTONE	Same as above, color grades to very light gray (N8) at approx 87 ft and carb mineralization is absent, increase in silt fraction
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER:
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	
REMARKS	Casing driver/NC Core						



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT) 5941 23	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 09/23/86	

REMARKS Casing driver/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above
CLAYSTONE	Medium light gray (N6), bedding not apparent, weathered, slightly friable, moderate silt component, occasional carb mineralization
CLAYSTONE	Same as above
CLAYSTONE	Same as above, with slickensides at approx 110 ft, attitude approx 55 degrees

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 124 8	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2088502	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	

REMARKS Casing driver/NC Core

CRITICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						110				
					5931					
						111			CLAYSTONE	Same as above
					5930					
				2/2		112				
					5929					
						113			CLAYSTONE	Same as above, with faint slickensides at approx 114 ft attitude approx 55 degrees
					5928					
						114				
				3/3	5927					
						115				
					5926					
						116			CLAYSTONE	Same as above
				05/05	5925					
						117			CLAYSTONE	Same as above
					5924					
				26/26		118				
					5923					
						119			SANDY SILTSTONE	Very light gray (N8) to light gray (N7), bedding exhibits extensive soft sediment deformation and possible intraclasts, sand component is VFG, slightly friable
				12/12	5922					
						120				

0% 50% 100% OR 100%

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	124 0	GROUND ELEVATION (FT)	5941 23	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749615	AREA	EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	40-86
EAST	2086502	LOCATOR NUMBER	P9	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	09/23/86	
REMARKS	Casing driver/NC Core							

CHEMICAL &/OR GRADATIONAL SI	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	UNK			13/13					
				17/17				SILTSTONE	Interbedded Siltstone and Sandstone, very light gray (N8) to light gray (N7), thin bedded less than 5mm , soft sediment deformation occurs in this interval, slight to moderate friability, thin discontinuous coal beds, local iron staining
				16/16				SILTY CLAYSTONE	Light gray (N7), thin bedded (less than 2mm), slightly friable, occasional carb mineralization

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	44 8	GROUND ELEVATION (FT)	5940 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749613	AREA	EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	41-86
EAST	2088541	LOCATOR NUMBER	P9	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	08/18/86	

REMARKS Hollow Stem Auger Cave from TD to 44 70' Well built through casing advancer, no centralizers used

CHEMICAL &/OR GRADATIONAL S/	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 15 /0 15	5940	0			CL	Top 2in SILTY CLAY, dark yellowish brown (10 YR 4/2), mod plast, highly calcareous, some sand (VFG to MG), some roots, trace of gravel
				0 15 /0 05	5939	1			SP	2in -12in, Calcareous Gravelly Sand, matrix color is pinkish gray (5 YR 8/1), sub-angular-sub-rounded, mod-well graded, max gravel size= 5cm, sand is FG to MG, some clay some roots
				0 05 /1					GC	12in -1 65 ft, SANDY GRAVEL, dark reddish brown (10 R 3/4), angular-sub-angular, mod grading, max gravel size= 4cm, some clay
				0 15 /0 15	5938	2			GC	Top 2in, Same as above
									GC	Clayey Calcareous Gravel, mod orange pink (5 YR 8/4), angular-sub-angular, mod-poor grading, max gravel size= 5cm, abundant iron staining, some sand
				1 75 /1 05	5937	3				
					5936	4			GC	Same as above, some sand
				1 9 /2	5935	5				
					5934	6			GC	Same as above, max size= 7cm at base of interval, base of interval has little clay and is very pale orange (10 YR 8/2)
				1 8 /2	5933	7				
					5932	8			GC	Same as above, mod orange pink (5 YR 8/4), increased clay content
				1 4 /2	5931	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	41 8	GROUND ELEVATION (FT)	5940 03	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749613	AREA	EAST TRENCHES	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	41-86
EAST	2088541	LOCATOR NUMBER	P9	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	08/18/86	

REMARKS Hollow Stem Auger Cove from TD to 41 70' Well built through casing advancer, no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OR 100%	18/2	5930 10			GC	Calcareous Sandy Gravel, mod orange pink (5 YR 8/4), angular-sub-angular, max gravel size= 6 5cm, some clay
					5929 11				
					5928 12			CL	SANDY CLAY, light brown (5 YR 5/6), mod plast, some gravel, trace of Mg staining, some calc material
				15/2	5927 13				
					5926 14			GC	Clayey Sandy Gravel, matrix color is light brown (5 YR 6/4), sub-angular to sub-rounded, max gravel size= 8cm, some calc material
				14/2	5925 15				
					5924 16			GC	Same as above, increased clay fraction
				21/2	5923 17				
					5922 18			GC	Same as above
				17/2	5921 19				
					20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 41 8		GROUND ELEVATION (FT)	5940 03	PROJECT NUMBER	667 11
NORTH	749613	AREA EAST TRENCHES		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT
EAST	2088541	LOCATOR NUMBER P9		BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	08/18/86

LOG OF BORING NUMBER **41-86**

REMARKS Hollow Stem Auger Cave from TD to 41 70' Well built through casing advancer, no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OR 100%	19/2	5920	20			GC	Clayey Sandy Gravel, matrix color is light brown (5 YR 5/6), sub-angular to sub-rounded, mod-poorly graded, max gravel size= 6cm , sand is FG-MG-CG, top of interval has larger fraction of clay (approx 30%)
					5919	21				
				18/2	5918	22			GC	Same as above, increased clay and sand fraction
					5917	23				
				17/2	5916	24			GC	Same as above
					5915	25				
				17/2	5914	26			GC	Same as above, increased gravel fraction
					5913	27				
				18/2	5912	28			GC	Same as above, decreased gravel fraction
					5911	29				
						30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 44 8	GROUND ELEVATION (FT) 5940 03	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749613	AREA EAST TRENCHES	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	41-86
EAST	2088541	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 08/18/86	

REMARKS Hollow Stem Auger Cave from TD to 44 70' Well built through casing advancer, no centralizers used

CHEMICAL SAMPLE GRADATIONAL SA | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
04/15	30	CL	GRAVELLY CLAY, dark yellowish orange (10 YR 6/6), mod -poor plast , some sand, floury texture
0/07	31	NO SAMPLE	
03/029	32	GC	SANDY GRAVEL, grayish orange (10 YR 7/4), sub-angular-angular, mod grading, max size= 4cm , some clay, floury texture, sand is FG to CG
02/029		GC	Same as above, angular, with higher gravel fraction
1/05	33	GC	Same as above, angular-sub-angular, decreased gravel fraction
08/07		GC	Same as above
11/1	34	GC	Same as above, increased clay fraction, slightly consolidated
07/05	35	GC	Same as above, increased sand fraction, gravel is sub-angular to sub-rounded
1/15	36	GC	Same as above, angular to sub-angular
18/15	37	SC	Gravelly Clayey Sand, grayish orange (10 YR 7/4), mod grading, sand is VFG to MG, max gravel size = 3cm , bottom 1 ft of interval, sand is FG to MG
07/05	38	SC	Same as above, sand is FG to MG
06/1	39	SC	Top 2in Same as above, sand is MG to VCG Bottom of interval same as above, sand is VFG to FG, increased clay fraction

Well or piezometer construction: 08/18/86

Depth scale: 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 44 8	GROUND ELEVATION (FT) 5940 03	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749613	AREA EAST TRENCHES	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	41-86
EAST	2088541	LOCATOR NUMBER P9	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 08/18/86	

REMARKS Hollow Stem Auger Cave from TD to 44 70' Well built through casing advancer, no centralizers used

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 1/1 3; 0/0 4; 1/1 3; 0 5/0 5; 1 15/1.15; 0 15/0 14

DATUM (FT) / DEPTH (FT): 5900, 5899, 5898, 5897, 5896, 5895, 5894, 5893, 5892, 5891

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SC	Gravelly Clayey Sand, grayish orange (10 YR 7/4), sub-angular to sub-rounded, mod grading, sand is VFG to MG, max gravel size approx 7cm, some iron staining as mottles
NO SAMPLE	
SC	Same as above, increased gravel fraction
SC	Same as above
GC	Clayey Sandy Gravel, grayish orange (10 YR 7/4), sub-angular to sub-rounded, mod -highly graded, max size= 7cm, sand is FG to VCG, trace of iron staining
CLAYSTONE	Top of Bedrock Bottom 2 in, Claystone, very pale orange, non-apparent bedding, well weathered, mod friable, some Mg staining, trace of iron staining

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	35	GROUND ELEVATION (FT)	5954 34	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749568	AREA	EAST TRENCHES	CASING DIAMETER (IN)	0	GEOLOGIST	LAM	42-86
EAST	2087112	LOCATOR NUMBER	09	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/13/86	

REMARKS Hollow Stem Auger

CRITICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5954	0			NO SAMPLE	No sample found by ASI
				0/2	5953	1				
						2			GC	GRAVEL, Predom color med light gray (N6) Angular to sub-angular, well graded, granules to 6 cm, matrix white (N9) to very pale orange (10 YR 8/2) Caliche Some sand VFG
				0.5/1.3	5952	3				
					5951				GC	GRAVEL as above, matrix sandy clay and caliche, white (N9) to dk yellowish orange (10 YR 6/6) Est plast low to moderate Some sand VFG to VCG
				0.9/0.8		4				
					5950				GC	GRAVEL, some as above
				0.8/0.9		5				
					5949				GC	SANDY GRAVEL, Predom color med dk gray (N4) Well graded, granules to 4 5cm Angular to sub-rounded, Sand VFG to VCG, some clay, trace CaCO3
				0.9/0.9						
					5948	6			GC	Some as above, less sand and clay, gravel to 5cm
				0.7/0.6						
					5947	7			GC	GRAVEL, grayish red (5R 4/2), angular, poorly graded, 3cm to 6cm, some silty clay, trace CaCO3
				0.2/1.5						
					5946	8				
					5945	9			NO SAMPLE	
				0.1/3.5		10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	35	GROUND ELEVATION (FT)	5954 34	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749568	AREA	EAST TRENCHES	CASING DIAMETER (IN)	0	GEOLOGIST	LAM	42-86
EAST	2087112	LOCATOR NUMBER	09	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/13/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) / DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					10				
					11				
				0 8 /1 5	12			GC	Clayey Gravel, predom color med dk gray (N4) Angular to sub-rounded Well graded, granules to 4 5cm, Some sandy clay matrix, Dk yellowish orange (10 YR 6/6) Sand VFG to VCG Some CaCO3
				1 2 /1	13			GC	Clayey Gravel, same as above Silty clay, grayish orange (10 YR 7/4) matrix, Est plast low to mod, some sand VFG to VCG, trace CaCO3
				1 65 /2	14			GC	Sandy Clayey Gravel, gravel predom med gray (N5) Angular to sub-angular, well graded Granules to 6cm Sandy clay matrix, mod yellowish brown (10 YR 5/4), Est plast low, sand VFG to VCG Some silt, trace CaCO3
				0 55 /0 5	16			GC	Same as above
				0 /1	17			NO SAMPLE	
				1 15 /1	18			GC	Same as above
				0 /1 5	19			NO SAMPLE	
					20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 35	GROUND ELEVATION (FT)	5954 34	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749568	AREA EAST TRENCHES	CASING DIAMETER (IN)	0	GEOLOGIST	LAA	42-86
EAST	2087112	LOCATOR NUMBER 09	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/13/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE (0% 50% 100%)

PERCENT RECOVERY (0% 100%)

RECOVERY/INTERVAL: 12/13; 05/04; 16/13; 11/2; 0/2; 07/2; 15/2

DATUM (FT): 5934, 5933, 5932, 5931, 5930, 5929, 5928, 5927, 5926, 5925

DEPTH (FT): 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	Sandy Clayey Gravel, Cannot determine predom color Angular to sub-rounded Well graded granules to approx 4 cm, Matrix grayish orange to light brown (5YR 5/6), Estim plast low Sand VFG to VCG, some silt appears to have been wet when stored
SC	Gravelly Clayey Sand, Mod yellowish brown (10 YR 5/4) Est plast low, VFG to granules, mod graded gravel, sub-rounded, to 3 cm, some silt
SC	Same as above
GC	Clayey Sand and Gravel, grayish orange (10 YR 7/4 to 10 YR 5/4) Gravel sub-angular to rounded, well graded Granules to 4 5 cm, Sand mod well graded, VFG to VCG, some silt Trace iron staining
NO SAMPLE	
SW	GRAVELLY SAND, grayish orange (10 YR 7/4), sand mod well graded VFG to granules Gravel sub-angular to sub-rounded (0 75 cm to 5 5 cm), mod graded
SILTY CLAYSTONE	Top of Bedrock Interval grades to a very silty claystone Pinkish gray to very pale orange (5YR 8/1 to 10YR 8/2) Mod plast
SILTY CLAYSTONE	Pinkish gray (5YR 8/1) to dk yellowish orange (10 YR 6/6) Mod weathered, slightly to mod friable, bedding not evident, some iron staining

LAA-17

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 35	GROUND ELEVATION (FT) 5954 34	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749568	AREA EAST TRENCHES	CASING DIAMETER (IN) 0	GEOLOGIST LAA	42-86
EAST	2087112	LOCATOR NUMBER 09	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/13/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMP GRADATIONAL S DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
1 55/2	30		
	31	SILTY CLAYSTONE	Grayish orange (10 YR 7/4) to pinkish gray (5 YR 8/1) Mod weathered, mod friable, bedding not evident, some gravel and sand (probably from above), some iron staining
0 3/0 4			
	32	SILTY CLAYSTONE	Same as above, with no sand and gravel
1 1/1 6			
	33	NO SAMPLE	
0/2	34		
	35		
	36		
	37		
	38		
	39		
	40		

Depth scale: 5924, 5923, 5922, 5921, 5920, 5919, 5918, 5917, 5916, 5915

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT)	5970 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749417	AREA MOUND AREA	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	43-86
EAST	2085865	LOCATOR NUMBER M9	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/26/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 1 98' Cave from TD to 17 20'

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			100% OK	1/1	5970	0			GC	Clayey Gravel - dominantly light gray (N7), matrix is brownish gray (5YR 4/1), to white (N9), angular to sub-rounded, poorly graded, max size 6 5 cm , some roots and caliche, caliche rind occurs on some gravel
				0/2	5969	1				
						2				NO SAMPLE
				0 1/0 25	5968	3			CL	GRAVELLY CLAY - pale yellowish brown (10YR 6/2), moderate plasticity, some silt, calcareous
				0/0 75	5967					NO SAMPLE
				0 6/1	5966	4			CL	As above (reference interval 3 0 to 3 25 ft), trace of VFG sand
				0 35/0 35	5965	5			CL	As above
				0 15/0 15					CL	As above
				0/0 5						NO SAMPLE
				1/2	5964	6			CL	As above with increase in the gravel fraction with depth
					5963	7				
					5962	8			CL	SANDY CLAY - with gradational change to silty sand, some clay
				2/2	5961	9			SP	SILTY SAND - light brown (5YR 6/4), sub-angular to sub-rounded, poorly graded, medium grained to very fine grained, some clay, trace of gravel
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT)	5970 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749417	AREA MOUND AREA	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	43-86
EAST	2085865	LOCATOR NUMBER M9	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/26/86	
REMARKS	Hollow Stem Auger	Top of stainless steel casing 1 98'	Cave from TD to 17 20'				

CHEMICAL SAMPLE
GRADATIONAL SAM

SAMPLE NUMBER

DCB1

DCB14

SAMPLE GRADN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0% 50% 100%	0% 100%		5960	10				
		2 /2	5959	11			GC	Sandy Clayey Gravel - light gray (N7), sub-angular to sub-rounded, poorly graded, max size is 6 5 cm , some silt, matrix is grayish orange (10YR 7/4)
		18/18	5958	12			GC	Sandy Clayey Gravel - as above
		02/02	5957	13			GC	As above
		15/15	5956	14			GC	As above
		0 35/1	5955	15			ML	SANDY SILT - grayish orange (10YR 7/4), trace of gravel and clay, with a cobble at 17 0 ft
		15/15	5954	16	11/26/86		SANDSTONE	Top of Bedrock Mottled light gray (N8), to dark yellowish orange (10YR 6/6), iron stained, very fine grained, slight silt fraction, bedding not apparent, highly weathered, moderately friable
		05/05	5953	17	01/01/87		SILTY SANDSTONE	Very light gray (N8), with iron staining, dark yellowish orange (10YR 6/6), bedding not apparent, highly weathered, moderately friable, trace of dark mineralization (possible Mg oxides) on fracture
		15/15	5952	18			SILTY SANDSTONE	As above
			5951	19				
				20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 22	GROUND ELEVATION (FT) 5970 39	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749417	AREA MOUND AREA	CASING DIAMETER (IN) 2 ID	GEOLOGIST DCB	43-86
EAST	2085865	LOCATOR NUMBER M9	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 09/26/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 1 98' Cave from TD to 17 20'

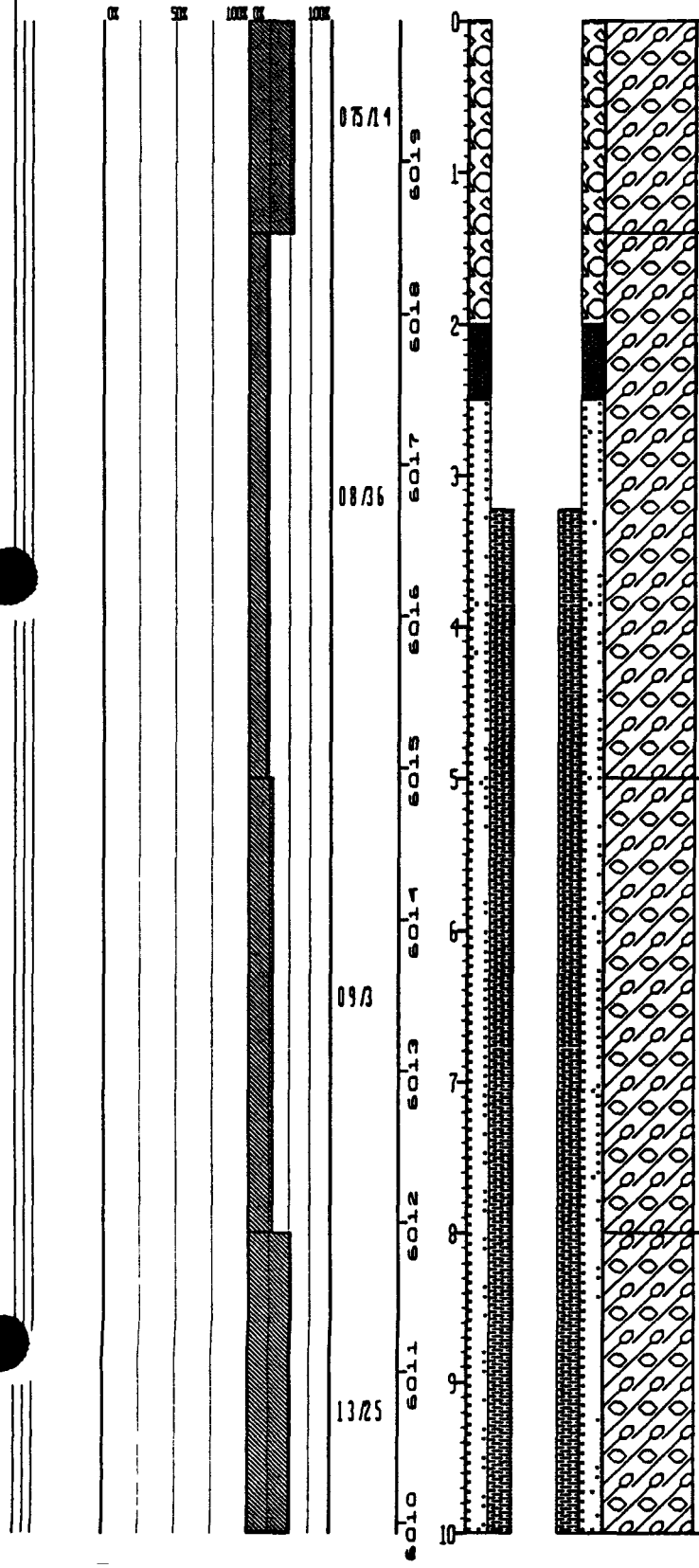
CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 8/0 79	5950	20		SILTY SANDSTONE	As above
1 2/1 2	5949	21	10/10/86	SANDSTONE	Very light gray (N8) to grayish orange (10YR 7/4), bedding not apparent, well weathered, slightly to moderately friable, very fine grained, well sorted, rounded to well rounded NOTE No water encountered while drilling
	5948	22			
	5947	23			
	5946	24			
	5945	25			
	5944	26			
	5943	27			
	5942	28			
	5941	29			
		30			

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 33	GROUND ELEVATION (FT) 6019 93	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749254	AREA PLANT WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	44-86
EAST	2082234	LOCATOR NUMBER J9	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 11/06/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 3 03' Well was built through 4" casing No centralizersused

CHEMICAL SAMPLE GRADATIONAL SAM H | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	GRAVEL, in sandy silty clay matrix - very broad range of colors in gravel, none predominant, angular to sub-rounded, well graded, maximum size visible 6 5 cm , clay matrix is moderate brown
GC	Same as above
GC	Same as above, sample more pulverized (matrix broken up)
GC	Same as above except color change in matrix to moderate yellowish brown (10YR 5/4)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 33	GROUND ELEVATION (FT)	6019 93	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749254	AREA PLANT WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	44-86
EAST	2082234	LOCATOR NUMBER J9	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/06/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 3 03' Well was built through 4" casing No centralizersused

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR SD	100% GR 100%	08/15 0/35 16/1 15/15 28/25	6009 6008 6007 6006 6005 6004 6003 6002 6001 6000	10 11 12 13 14 15 16 17 18 19 20			
								GC	GRAVEL in sandy silty clay matrix - gravel predominantly med dark gray, sub-angular to sub-rounded, matrix moderate yellowish brown with well graded sand
								NO SAMPLE	
								CL	SILTY CLAY - dark yellowish orange (10YR 6/6), moderate plasticity, some gravel (to 1 5 cm), some iron staining, some sand
								ML	Clayey Silt - dark yellowish orange (10YR 6/6) to very pale orange (10YR 8/2) to yellowish gray (5Y 8/1), trace carbonaceous material, trace iron staining
								ML	Clayey Silt - dark yellowish orange (10YR 6/6), some well sorted fine grained sand throughout, trace carbonaceous materials

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 33	GROUND ELEVATION (FT) 6019 93	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749254	AREA PLANT WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LMA	44-86
EAST	2082234	LOCATOR NUMBER J9	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 11/06/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 3 03' Well was built through 4" casing No centralizersused

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						20				
					5999	21			SC	Clayey Sand - dark yellowish orange to very pale orange (10YR 6/6 to 10YR 8/2), well graded, very fine grained to coarse grained, trace of very coarse grained, sub-angular to sub-rounded, sufficient clay content to create moderate to high plasticity
				2.0/2.5	5998	22				
					5997	23			GW	Clayey Sand and Gravel - light brown to very pale orange (5YR 5/6 to 10YR 7/4), gravel angular to sub-rounded, sand sub-angular to sub-rounded, well graded, fine sand to granules, fine gravel to pebbles, max size 2 5 cm , sufficient clay to create low plasticity, increased clay content, decreased gravel content at bottom of interval
				2.5/2.5	5996	24				
					5995	25				
					5994	26			SILTY CLAYSTONE	Top of Bedrock Dark yellowish orange (10YR 6/6) to yellowish gray (5Y 8/1), high plasticity, trace sand (Possibly highly weathered claystone) slightly friable to friable
				1.4/1	5993	27			SILTY CLAYSTONE	Same as above, trace of carbonaceous material
				1.8/1.5	5992	28				
					5991	29			SILTY CLAYSTONE	Yellowish gray (5Y 7/2), high plasticity, trace sand, trace white mineralization (unidentified), does not react with dilute HCl Possibly highly weathered claystone, slightly friable, horizontal to convoluted bedding
				1.7/2.5	5990	30				

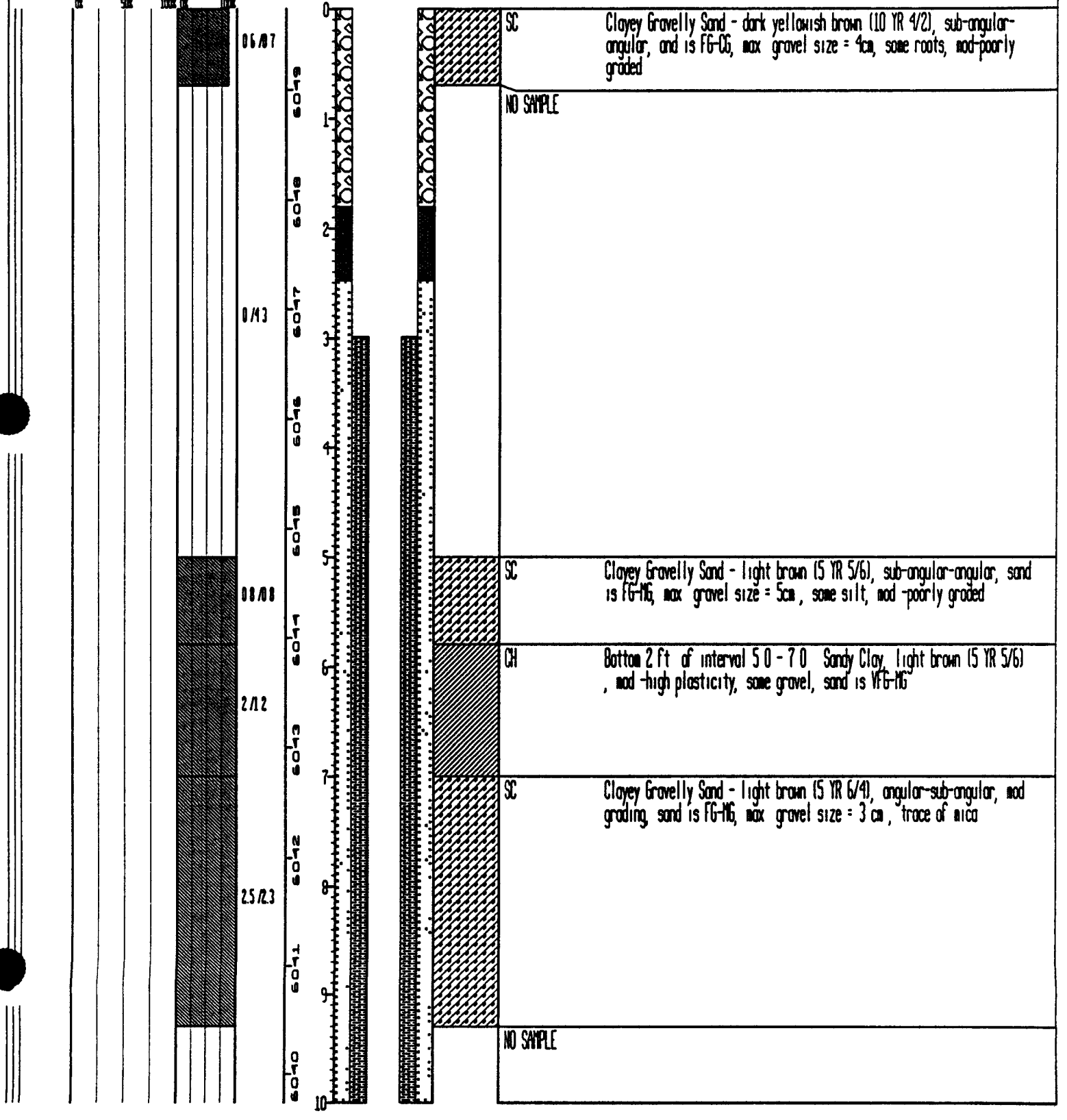
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 33	GROUND ELEVATION (FT)	6019 93	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749254	AREA PLANT WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	44-86
EAST	2082234	LOCATOR NUMBER J9	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/06/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 3 03' Well was built through 4" casing No centralizersused

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) / DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOIL	100% OR 100%	11/25	5989 30				
					5988 31			SILTY CLAYSTONE	Possibly highly weathered claystone, yellowish gray (5Y 7/2), high plasticity, trace sand, no HCl reaction If claystone, slightly friable, horizontal to convoluted bedding
					5987 32				NOTE No water encountered during drilling
					5986 33				
					5985 34				
					5984 35				
					5983 36				
					5982 37				
					5981 38				
					5980 39				
					40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 53 5	GROUND ELEVATION (FT)	6049 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	751316	AREA BUFFER WEST	CASING DIAMETER (IN)	2 1 0	GEOLOGIST	DAT	45-86
EAST	2079469	LOCATOR NUMBER 610	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/02/86	
REMARKS	Casing Driver						

CHEMICAL SAMPLE
GRADATIONAL SA
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM(FT)
DEPTH(FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION



SC	Clayey Gravelly Sand - dark yellowish brown (10 YR 4/2), sub-angular-angular, and is FG-CG, max gravel size = 4cm, some roots, mod-poorly graded
NO SAMPLE	
SC	Clayey Gravelly Sand - light brown (5 YR 5/6), sub-angular-angular, sand is FG-MG, max gravel size = 5cm, some silt, mod -poorly graded
CH	Bottom 2 ft of interval 5 0 - 7 0 Sandy Clay, light brown (5 YR 5/6), mod -high plasticity, some gravel, sand is VFG-MG
SC	Clayey Gravelly Sand - light brown (5 YR 6/4), angular-sub-angular, mod grading, sand is FG-MG, max gravel size = 3 cm, trace of mica
NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 53 5		GROUND ELEVATION (FT)	6049 74	PROJECT NUMBER	667 11
NORTH	750316	AREA BUFFER WEST		CASING DIAMETER (IN)	2 1 0	GEOLOGIST	DAT
EAST	2079469	LOCATOR NUMBER	610	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/02/86
REMARKS	Casing Driver						

LOG OF BORING NUMBER

45-86

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRADI SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0%	100%	0 /12				
		50%			6039				
					6038				
					6037				
					6036				
					6035				
					6034				
					6033				
					6032				
					6031				
					6030				

10 11 12 13 14 15 16 17 18 19 20

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 53 5	GROUND ELEVATION (FT)	6049 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750316	AREA BUFFER WEST	CASING DIAMETER (IN)	2 I D	GEOLOGIST	DAT	45-86
EAST	2079469	LOCATOR NUMBER 610	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/02/86	
REMARKS	Casing Driver						

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0 4/2 5; 0/4 5; 2 3/1 9

DATUM (FT): 6029, 6028, 6027, 6026, 6025, 6024, 6023, 6022, 6021, 6020

DEPTH (FT): 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30

WELL OR PIEZOMETER CONSTRUCTION

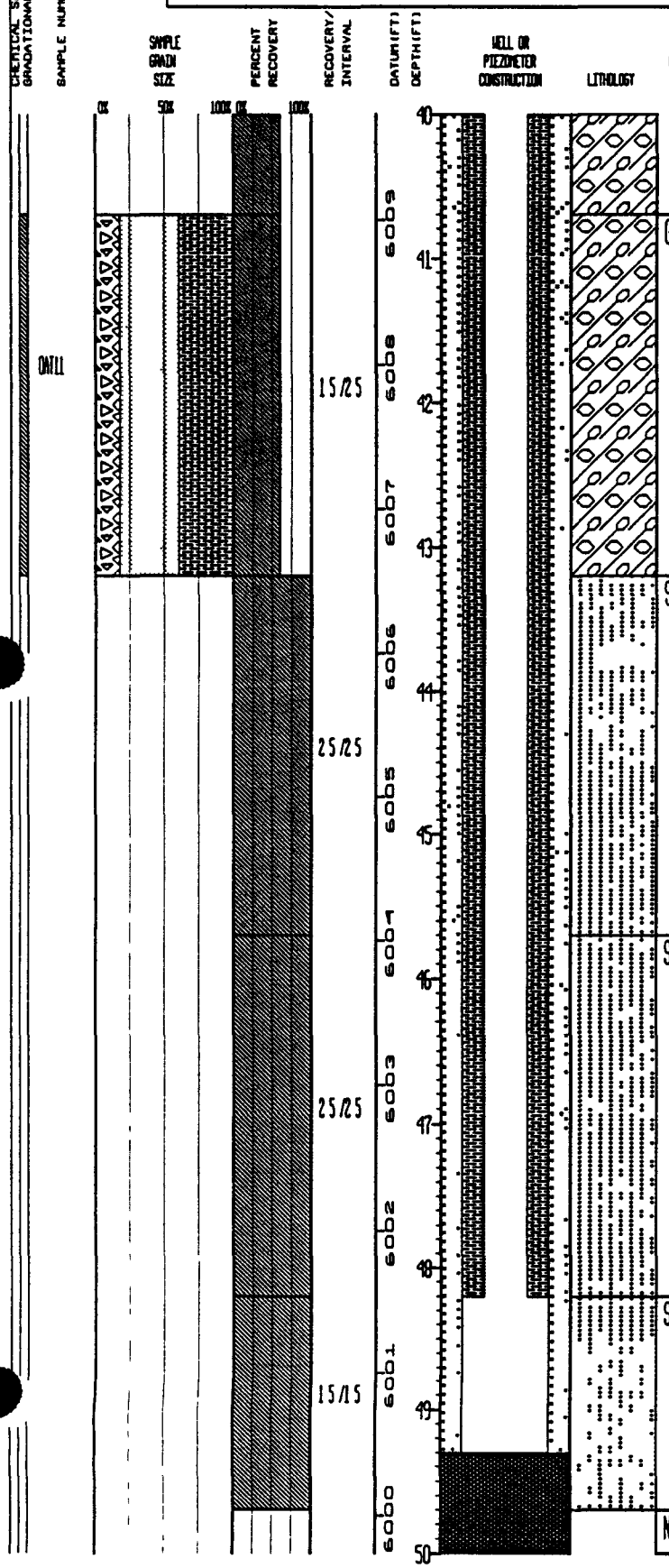
LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SC	Clayey Gravelly Sand - light brown (5 YR 6/4), angular-sub-angular, mod graded, sand is FG-MG, max gravel size = 3cm, trace of mica
NO SAMPLE	
SC	Same as above very pale orange (10 YR 8/2), mod -poorly graded, sand is FG-CG

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 53 5	GROUND ELEVATION (FT)	6049 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750316	AREA BUFFER WEST	CASING DIAMETER (IN)	2 I 0	GEOLOGIST	DAT	45-86
EAST	2079469	LOCATOR NUMBER 610	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/02/86	
REMARKS	Casing Driver						

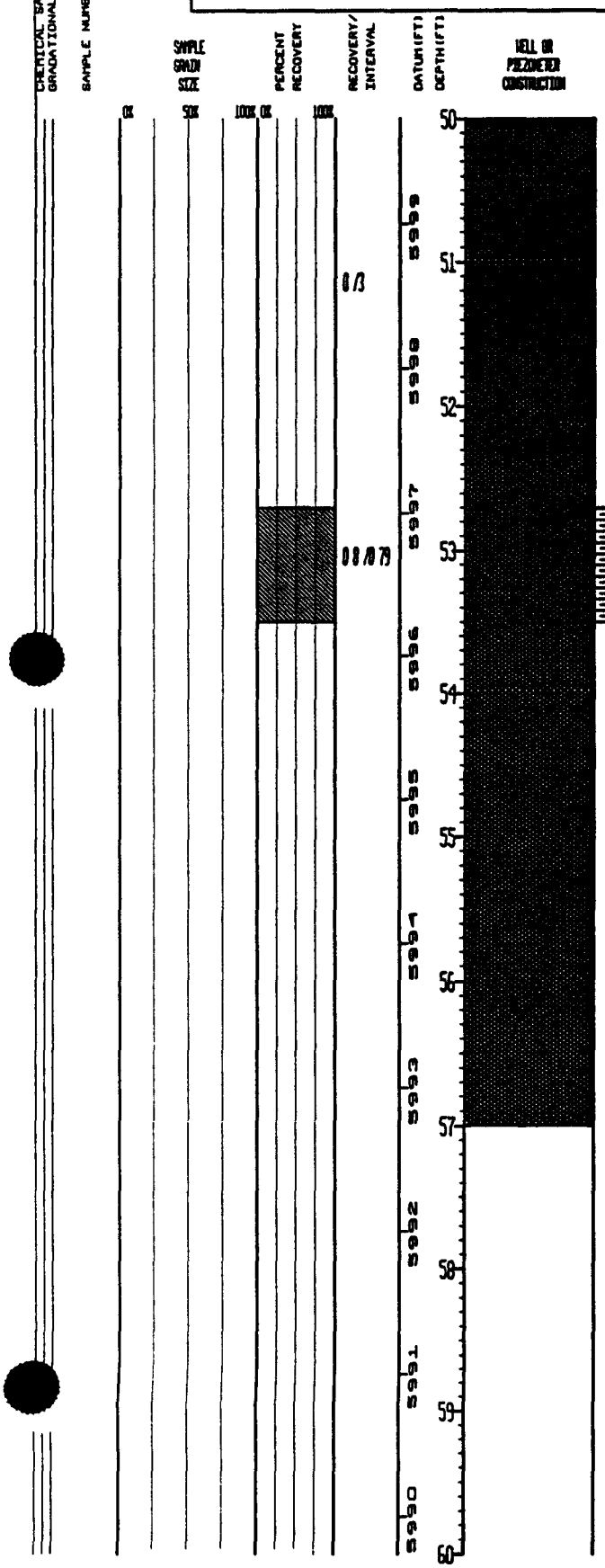
CHEMICAL, WATER, GRADATIONAL, S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1/1	6010 6011 6012 6013 6014 6015 6016 6017 6018 6019	30 31 32 33 34 35 36 37 38 39 40			SC	Clayey Gravelly Sand - very pale orange (10 YR 8/2), angular-sub-angular, sand is FG-MG, max gravel size = 3cm , mod -poorly graded, trace of iron staining
				2.5/2					SC	Same as above bottom of interval - fraction of gravel is higher
				04/07					GM	SANDY GRAVEL, dark yellowish orange (10 YR 6/6), angular - sub-angular, mod -well graded, max size = 7cm Sand is MG-CG, trace of clay
				18/13					GC	Clayey Sandy Gravel - light brown (5 YR 5/6), sub-angular to sub-rounded, mod-well graded, max size = 8cm
				15/25					GC	Same as above angular to sub-angular

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 53.5	GROUND ELEVATION (FT)	6049.74	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	750316	AREA BUFFER WEST	CASING DIAMETER (IN)	2.10	GEOLOGIST	DAT	45-86
EAST	2079469	LOCATOR NUMBER 610	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/02/86	
REMARKS	Casing Driver						



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GC	Clayey Sandy Gravel - light brown (5 Y 5/6), sub-angular - angular, mod graded, max size = 4cm
SP	GRAVELLY SAND, dark yellowish orange (10 YR 6/6), sub-angular - sub-rounded, mod -poorly graded, max gravel size is 3cm, sand is MG-VCG, some clay
SP	Same as above trace of clay, bottom of interval contains some possible well weathered chert
SP	Same as above dark yellowish orange (10 YR 6/6) and pinkish gray (5 YR 8/1), some clay
NO SAMPLE	Top of Bedrock

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 53 5	GROUND ELEVATION (FT)	6049 74	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750316	AREA BUFFER WEST	CASING DIAMETER (IN)	2 I 0	GEOLOGIST	DAT	45-86
EAST	2079469	LOCATOR NUMBER 610	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/02/86	
REMARKS	Casing Driver						



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Very pale orange (10 YR 8/2), non-apparent bedding, well weathered, moderately friable, some silt, some iron staining as mottles, trace of Mg staining

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6081	0			NO SAMPLE	
					6080	1				
					6079	2				
					6078	3				
					6077	4				
				0/10	6076	5				
					6075	6				
					6074	7				
					6073	8				
					6072	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	

REMARKS Casing Driver/NC Core Cave from TD to 165 00'

CHEMICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						10			NO SAMPLE	
					6071	11				
					6070	12				
					6069	13				
					6068	14				
				0 /10	6067	15				
					6066	16				
					6065	17				
					6064	18				
					6063	19				
					6062	20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

CHEMICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6061	20			NO SAMPLE	
					6060	21				
					6059	22				
					6058	23				
					6057	24				
				0 /10	6056	25				
					6055	26				
					6054	27				
					6053	28				
					6052	29				
						30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	165 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST		CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER	F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'						

CHEMICAL WARFARE GRADATIONAL GA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 /10	6042 6043 6044 6045 6046 6047 6048 6049 6050 6051				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						40				NO SAMPLE
					6041	41				
					6040	42				
					6039	43				
					6038	44				
				0 /10	6037	45				
					6036	46				
					6035	47				
					6034	48				
					6033	49				
					6032	50				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER:
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				6031	50			NO SAMPLE	
				6030	51				
				6029	52				
				6028	53				
				6027	54				
			0 /10	6026	55				
				6025	56				
				6024	57				
				6023	58				
				6022	59				
					60	10/09/86			

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

CHEMICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						60			NO SAMPLE	
					6021	61				
					6020	62				
					6019	63				
					6018	64				
				0 /10	6017	65				
					6016	66				
					6015	67				
					6014	68				
					6013	69				
					6012	70				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6011	70			NO SAMPLE	
					6010	71				
					6009	72				
					6008	73				
					6007	74				
				0 /10	6006	75				
					6005	76				
					6004	77				
					6003	78				
					6002	79				
						80				

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11
NORTH 750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB
EAST 2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86
REMARKS Casing Driver/NC Core	Cave from TD to 165 00'				

LOG OF BORING NUMBER

46-86

CHEMICAL SAMP GRADATIONAL S DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						80				NO SAMPLE
					6001	81				
					6000	82				
					5999	83				
					5998	84				
				0/10	5997	85				
					5996	86				
					5995	87				
					5994	88				
					5993	89				
					5992	90				

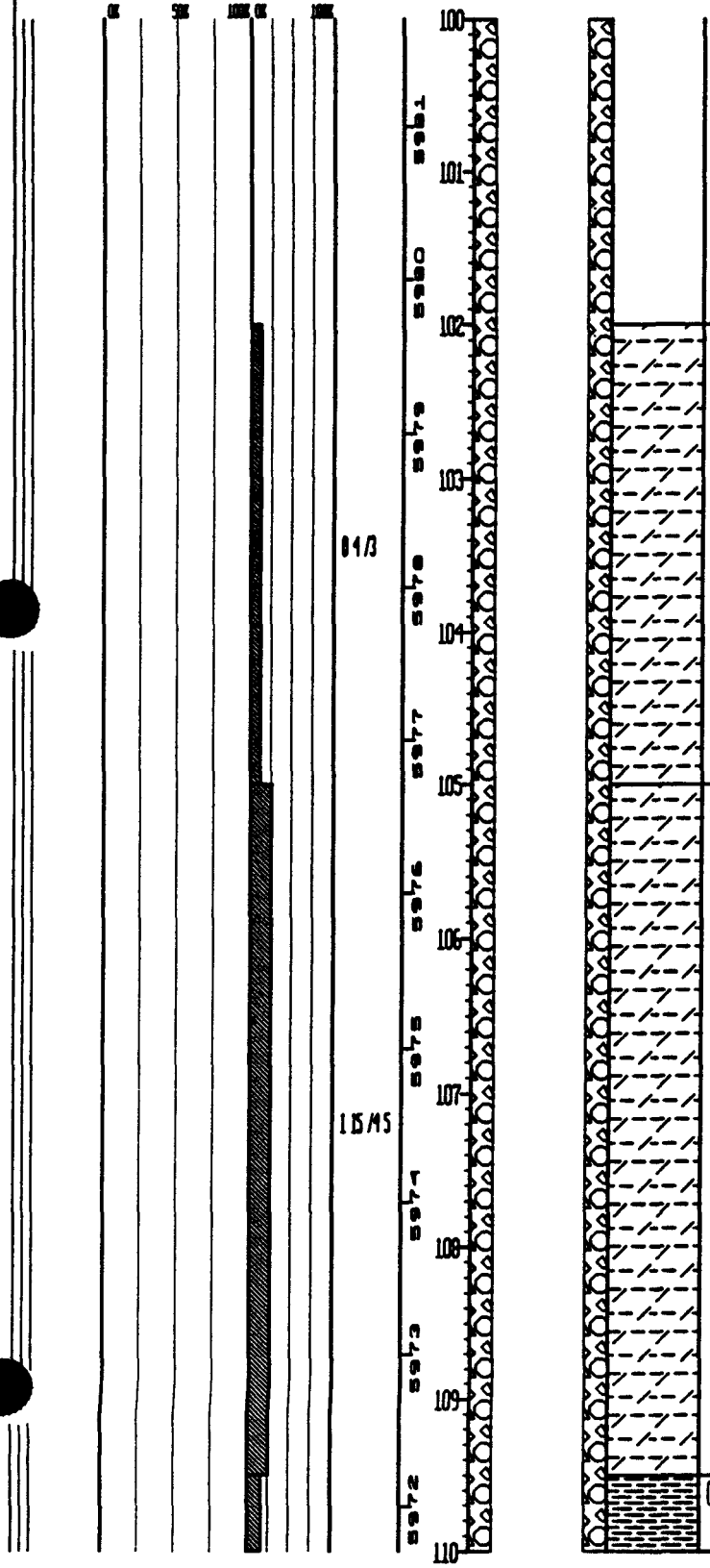
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	

REMARKS Casing Driver/NC Core Cave from TD to 165 00'

CHEMICAL SAMP GRADATIONAL DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 /1	5991	90			NO SAMPLE	Top of Bedrock
					5990	91			NO SAMPLE	
					5989	92				
					5988	93				
					5987	94				
					5986	95				
				0 /11	5985	96				
					5984	97				
					5983	98				
					5982	99				
						100				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

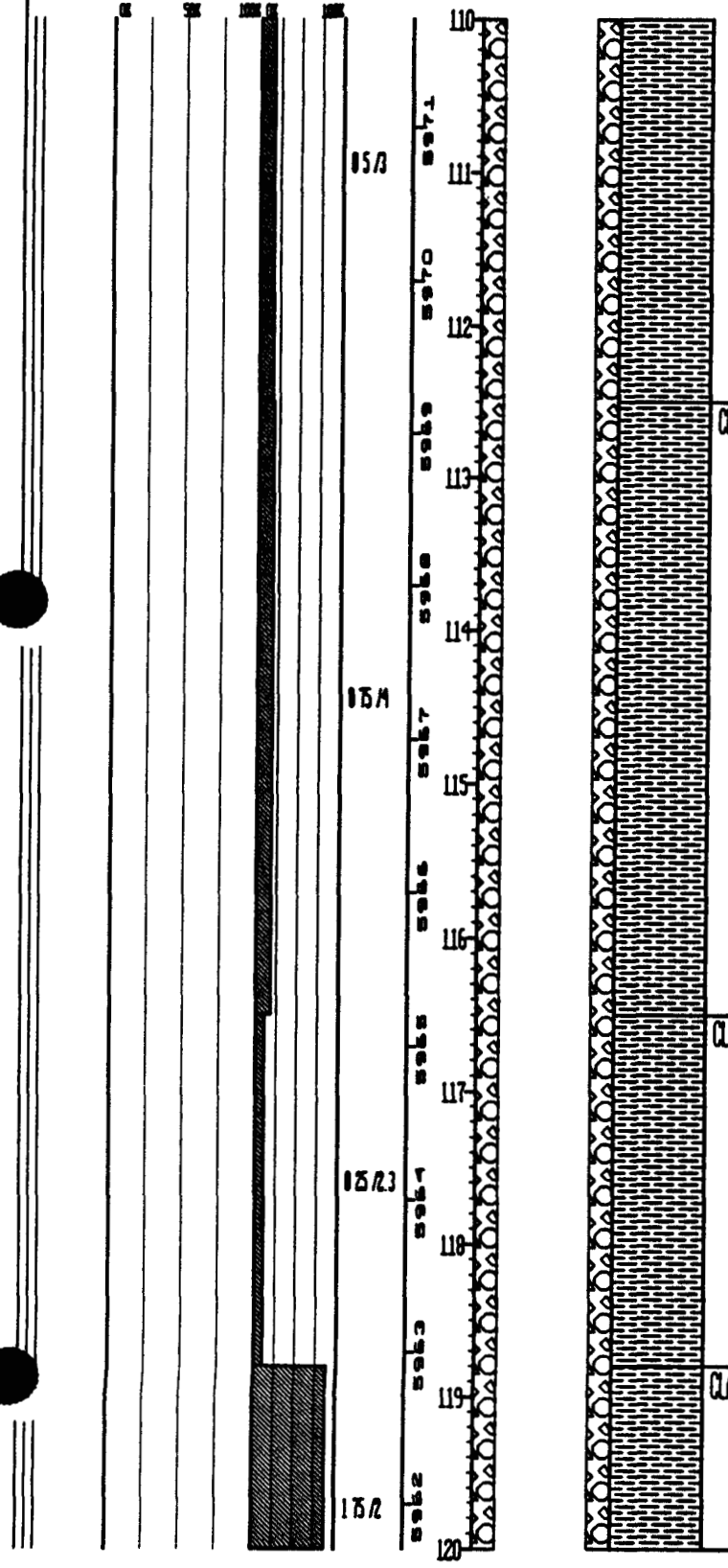
CHEMICAL SAMP GRADATIONAL E DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Light olive gray (5 Y 6/1), bedding not apparent (massive?), weathered, moderately friable, a discrete body of fine sand occurs in the upper 0 2 ft of this interval, iron stains occur on fractures
SILTY CLAYSTONE	Same as above Slickensides occur at approx 105 4 ft and the silt fraction decreases
CLAYSTONE	Grayish orange (10 YR 7/4), bedding not apparent, highly weathered, slightly friable, localized iron staining and possible Mg oxides

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5		GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA: BUFFER WEST		CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER	F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'						

CHEMICAL DATA GRADATIONAL & DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

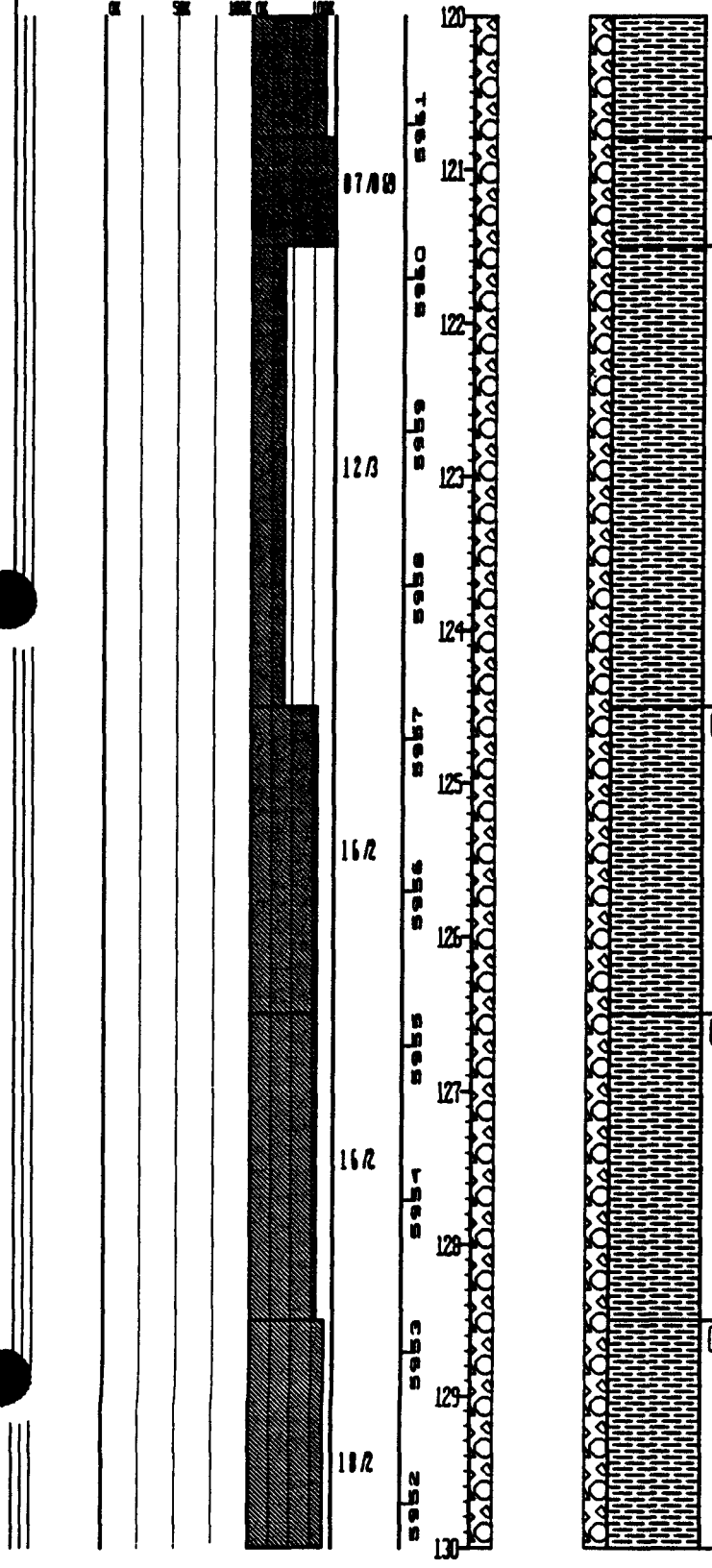


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5 Y 6/1), highly weathered, highly friable, abundant intraclasts, sub-rounded, moderate yellowish brown (10 YR 5/4)
CLAYSTONE	Light olive gray, slightly weathered, bedding not apparent (massive?), localized iron staining and iron staining on fractures Gradational color change with depth grayish orange (10 YR 7/4) and silt content increases
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	

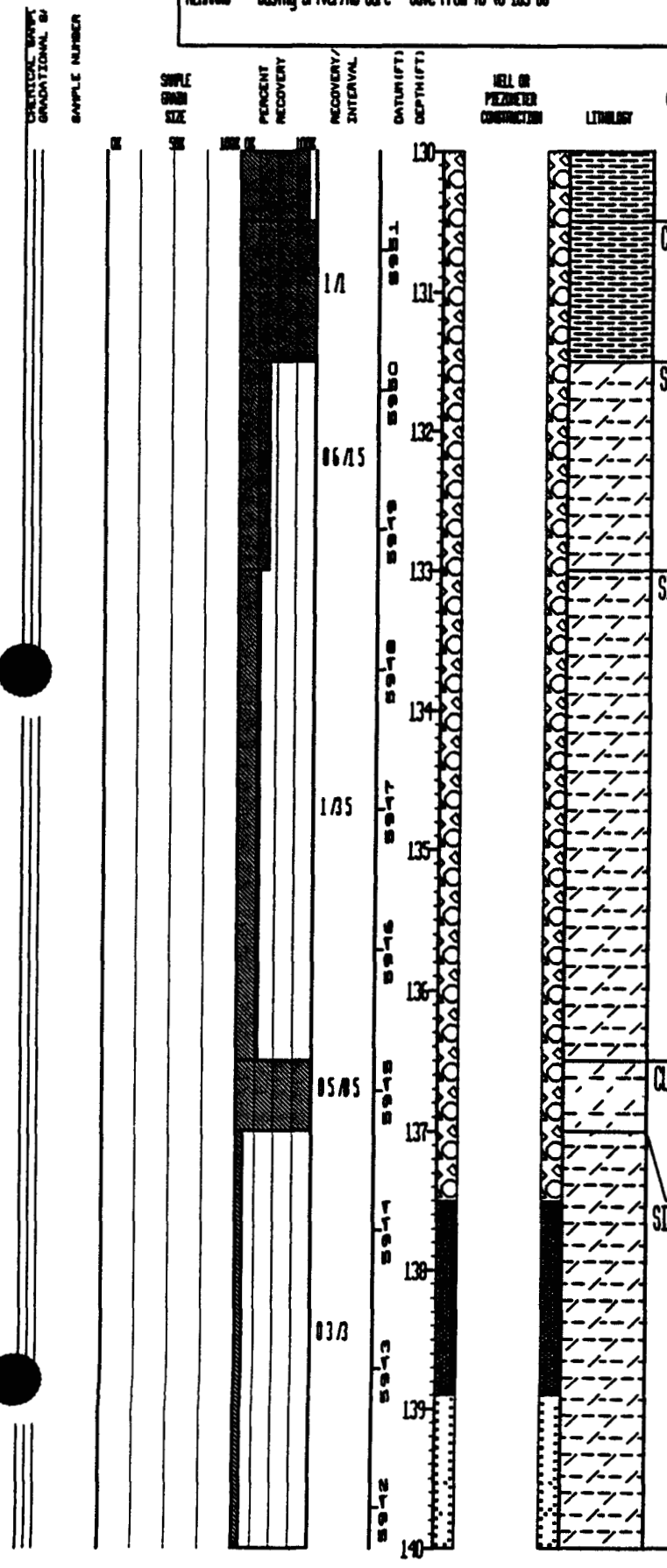
REMARKS Casing Driver/NC Core Cave from TD to 165 00'

CHEMICAL SAMPLE GRADATIONAL DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50%) | PERCENT RECOVERY (100% 0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Same as above
CLAYSTONE	Light gray (N 7), bedding not apparent, highly weathered, slightly friable to highly friable, somewhat calcareous (exhibits very weak reaction with dilute HCl)
CLAYSTONE	Same as above
CLAYSTONE	Medium gray (N 5), shaley bedding approx 1mm thick apparent in upper 0 4 ft of this interval, slightly weathered, weak reaction with dilute HCl, slightly friable
CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5		GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750854	AREA BUFFER WEST		CASING DIAMETER (IN)	5	GEOLOGIST	DCB	46-86
EAST	2078284	LOCATOR NUMBER F10		BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'						



CLAYSTONE	Slickensides occur at approx 131 ft, angle is approx 28 degrees
SILTY CLAYSTONE	Interval grades to a Silty Claystone at approx 131 5 ft, medium gray (N 5), bedding not apparent, slightly weathered
SILTY CLAYSTONE	Same as above
CLAYEY SILTSTONE	0 3 ft thick interval of Clayey Siltstone below 136 5 and the calcareous nature of the rock diminishes and is all together absent below 137 ft Bedding becomes apparent below 137 ft approx 1mm thick, possible bioturbation, carbonaceous mineralization occurs on bedding partings
SILTY CLAYSTONE	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5	GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER:	
NORTH	750854	AREA BUFFER WEST	CASING DIAMETER (IN)	5	GEOLOGIST	DCB		46-86
EAST	2078284	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	4.25	DATE DRILLED	10/09/86		
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'						

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE: 0% 50% 100%

PERCENT RECOVERY: 0% 100%

RECOVERY/INTERVAL: 1.5/1.5; 1.2/1.2; 0.7/0.8; 0.7/1.2; 0.3/1.0; 0.55/.5

DATUM (FT): 5941, 5940, 5939, 5938, 5937, 5936, 5935, 5934, 5933, 5932

DEPTH (FT): 140, 141, 142, 143, 144, 145, 146, 147, 148, 149, 150

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTSTONE	Interval grades to Siltstone at approx 140 ft, medium gray (N 5), slightly friable
SILTSTONE	Same as above, with localized bodies of carbonaceous mineralization
SILTSTONE	Same as above
CLAYSTONE	Medium gray (N 5), bedding not apparent, probably horizontal based on core breaks, contact with overlying Siltstone is gradational, weathered, moderately friable, carbonaceous mineralization occurs along core breaks possible plant detritus?
CLAYSTONE	Same as above
SILTSTONE	Light olive gray (5 Y 6/1), bedding not apparent (massive?), slightly weathered, slightly friable

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5		GROUND ELEVATION (FT)	6881 71	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750654	AREA BUFFER WEST		CASING DIAMETER (IN)	5	GEOLOGIST	BCB	46-86
EAST	2078284	LOCATOR NUMBER F10		BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86	
REMARKS	Casing Driver/NC Core	Cave from 70 to 165 00'						

CHEMICAL, WATER, GRADATIONAL &	SAMPLE NUMBER	SIMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					150				
					151				
				07/08	152			SILTSTONE	Same as above
					153			SILTSTONE	Same as above
				1.15/1.8	154			CLAYSTONE	Gradational change at 154 1 ft to Claystone, light olive gray (5 Y 6/1), bedding not apparent, weathered, moderately friable
				05/05	155			CLAYEY SILTSTONE	Gradational change to Clayey Siltstone at 154 5, light olive gray (5 Y 6/1), bedding not apparent, may be horizontal, based on core breaks, slightly weathered, slightly friable
				1.15/2	156				
				1.15/3	157			SILTY CLAYSTONE	Gradational change to a Silty Claystone at 156 5 ft, light olive gray (5 Y 6/1), bedding not apparent, weathered, moderately friable
				09/1				SILTSTONE	Gradational change to Siltstone, light gray (N8), horizontal bedding 1mm thick, slightly weathered, slightly friable, a trace of very fine sand occurs in this interval
				05/1	158			SILTY CLAYSTONE	A Gradational change occurs at approx 157 8 ft Interval grades to a Silty Clay then a Claystone by 158 8 ft
				13/17	159			CLAYSTONE	Light gray (N 7), bedding not apparent (massive?), slightly friable, carbonaceous mineralization occurs on bedding planes
					160				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 166 5		GROUND ELEVATION (FT)	6081 71	PROJECT NUMBER	667 11
NORTH	750851	AREA BUFFER WEST		CASING DIAMETER (IN)	5	GEOLOGIST	DCB
EAST	2078284	LOCATOR NUMBER	F10	BOREHOLE DIAMETER (IN)	4 25	DATE DRILLED	10/09/86
REMARKS	Casing Driver/NC Core	Cave from TD to 165 00'					

LOG OF BORING NUMBER: 46-86

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				03/03	sa21 160			SILTSTONE	Gradational change to Siltstone occurs at approx 160 5 ft , very light gray (N8), bedding not apparent (massive?), slightly friable, carbonaceous mineralization apparent on core breaks
				07/03	161				
				1/05	sa20			SILTSTONE	Same as above
				05/05	162			SILTSTONE	Same as above
					sa19			CLAYSTONE	Gradational change to Claystone occurs at approx 162 0 ft Claystone, light gray (N7), bedding may be horizontal based on core breaks, weathered, moderately friable, some silty strata occurs in this interval which extends to 166 5 ft
					163			CLAYSTONE	Same as above
					sa18				
					164				
				11/11	sa17				
					165				
					sa16				
					166				
					sa15				
					167				
					sa14				
					168				
					sa13				
					169				
					sa12				
					170				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well
Cave from TD to 95' Water encountered at 92' during drilling

CHEMICAL SAMPLE DEPTH
GRADATIONAL SA
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM (FT)
DEPTH (FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION

0% 50% 100% 0% 100%

0/10

6082 6081 6080 6079 6078 6077 6076 6075 6074 6073 6072

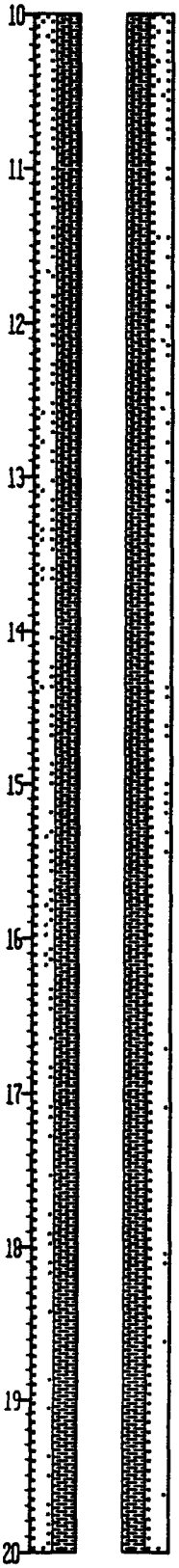
0 1 2 3 4 5 6 7 8 9 10

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT) 6082	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 10/27/86	

REMARKS Well construction is the only information available for this well

Cave from TD to 95' Water encountered at 92' during drilling

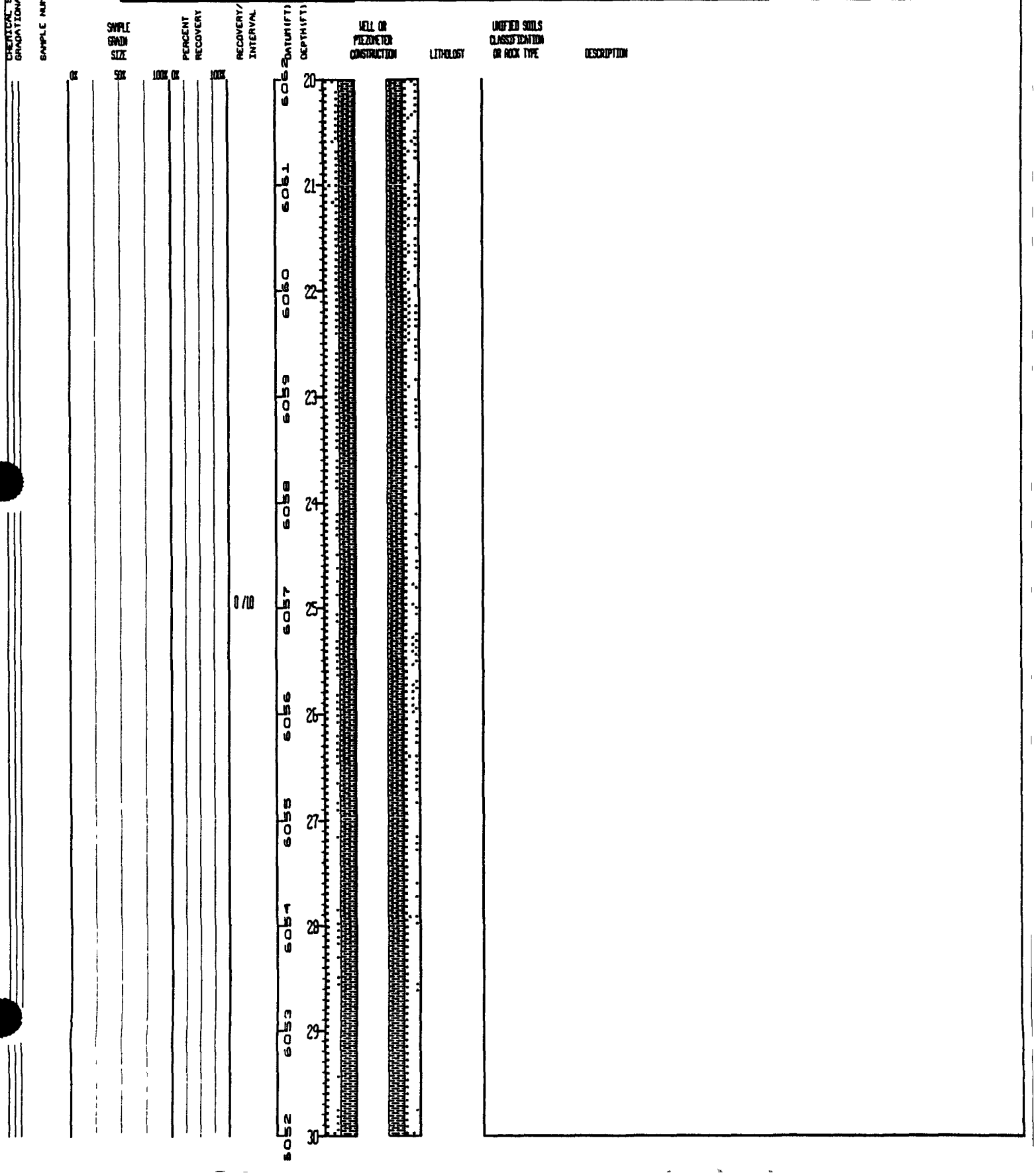
CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 /10	6072	10				
					6071	11				
					6070	12				
					6069	13				
					6068	14				
					6067	15				
					6066	16				
					6065	17				
					6064	18				
					6063	19				
					6062	20				



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

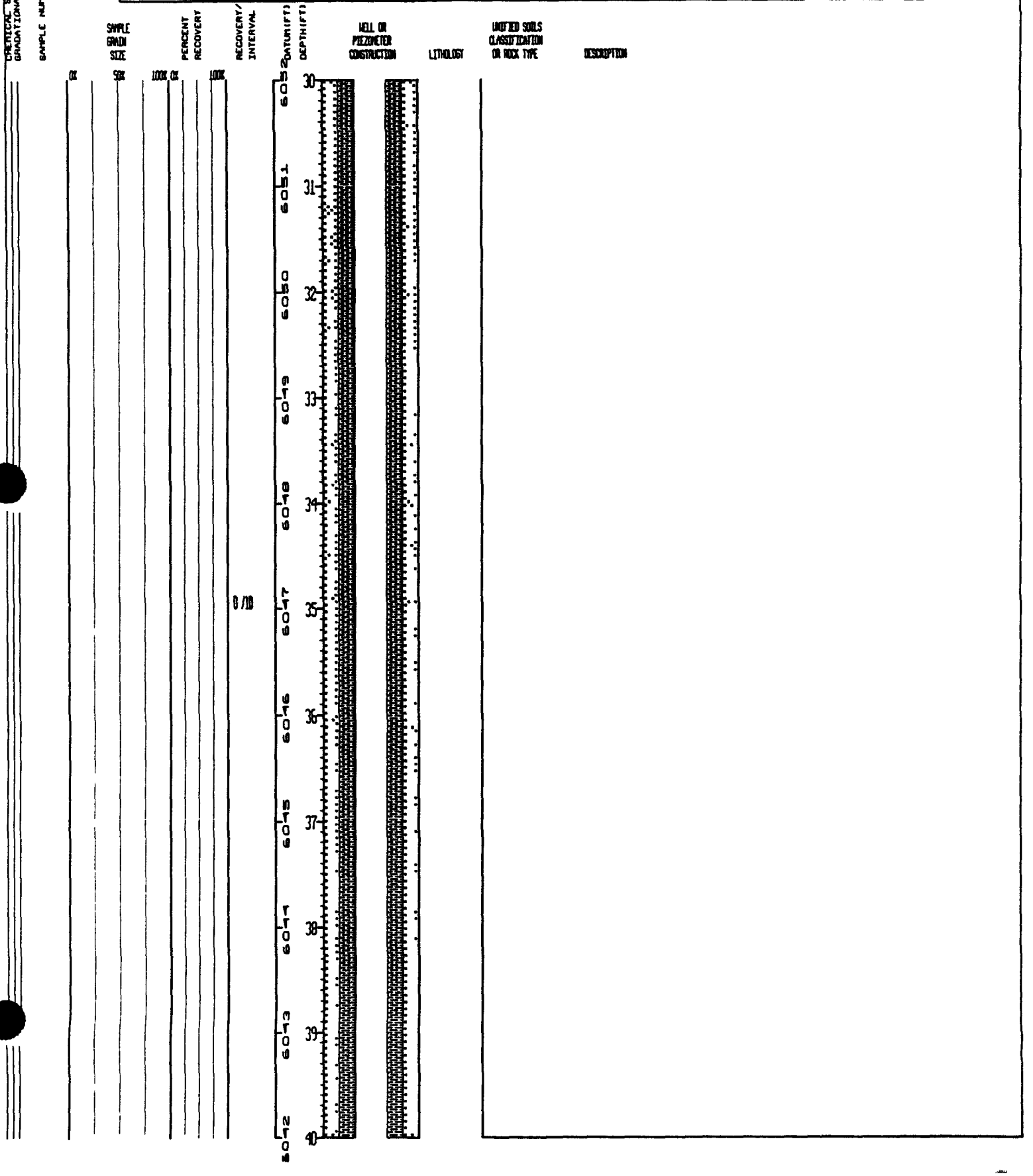
REMARKS Well construction is the only information available for this well

Cave from TD to 95' Water encountered at 92' during drilling



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well
Cave from TD to 95' Water encountered at 92' during drilling



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well

Cave from TD to 95' Water encountered at 92' during drilling

CHEMICAL &/OR GRADATIONAL S

SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

DATUM(FT)

DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

0% 100% 0% 100%

0 /10

6042 6041 6040 6039 6038 6037 6036 6035 6034 6033 6032

40 41 42 43 44 45 46 47 48 49 50

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well

Cave from TD to 95' Water encountered at 92' during drilling

CHEMICAL SAMPLE DEPTH
GRADATIONAL SIZE
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM(FT)
DEPTH(FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION

0% 50% 100% 0% 100%

0/10

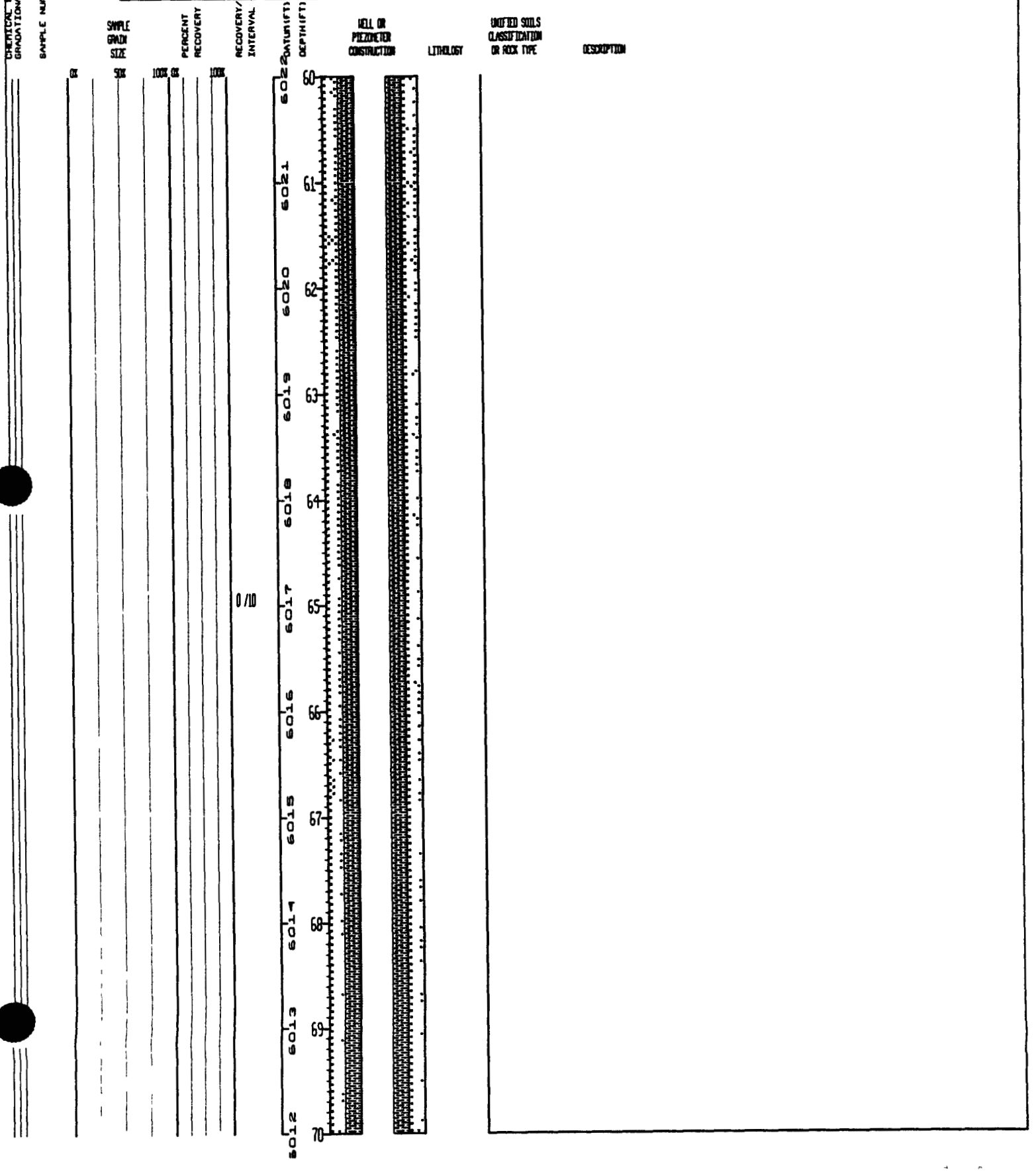
6032 6031 6030 6029 6028 6027 6026 6025 6024 6023 6022

50 51 52 53 54 55 56 57 58 59 60

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER	F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well

Cove from TD to 95' Water encountered at 92' during drilling



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well
Cave from TD to 95' Water encountered at 92' during drilling

CHEMICAL SAMP
GRADATIONAL S
TH
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM(FT)
DEPTH(FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION

0% 50% 100% 0% 100%

0/10

6012 6011 6010 6009 6008 6007 6006 6005 6004 6003 6002

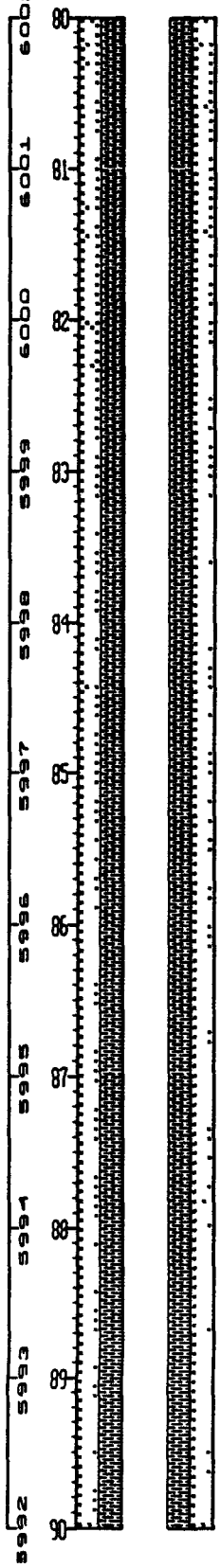
70 71 72 73 74 75 76 77 78 79 80

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER	F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well

Cave from TD to 95' Water encountered at 92' during drilling

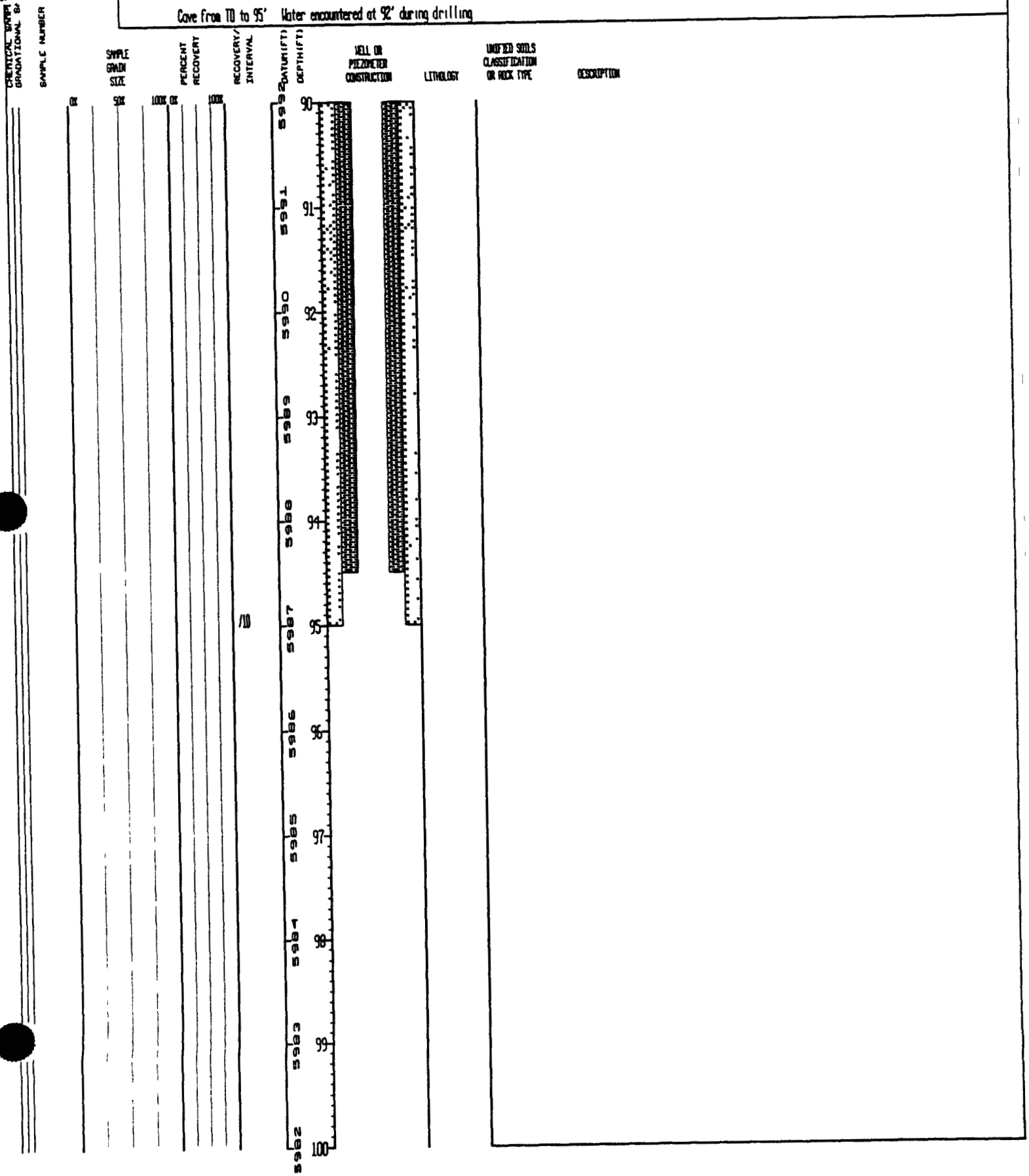
CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0 /10	6002	80				
				6001	81				
				6000	82				
				5999	83				
				5998	84				
				5997	85				
				5996	86				
				5995	87				
				5994	88				
				5993	89				
				5992	90				



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 100	GROUND ELEVATION (FT)	6082	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	750824	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	47-86
EAST	2078289	LOCATOR NUMBER F10	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/27/86	

REMARKS Well construction is the only information available for this well

Cave from TD to 95' Water encountered at 92' during drilling



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6096	0				NO SAMPLE
					6095	1				
					6094	2				
					6093	3				
					6092	4				
				0 /10	6091	5				
					6090	6				
					6089	7				
					6088	8				
					6087	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6086	10			NO SAMPLE	
					6085	11				
					6084	12				
					6083	13	11/19/86			
					6082	14				
				0 /10	6081	15				
					6080	16				
					6079	17				
					6078	18				
					6077	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SA TH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						20			NO SAMPLE	
					6076					
						21				
					6075					
						22				
					6074					
						23				
					6073					
						24				
					6072					
				0 /10		25				
					6071					
						26				
					6070					
						27				
					6069					
						28				
					6068					
						29				
					6067					
						30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL &/OR GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0%	50%	100% 0%	100% 0 /10	6057 6058 6059 6060 6061 6062 6063 6064 6065 6066 30 31 32 33 34 35 36 37 38 39 40				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE/ GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 /10	6047 6048 6049 6050 6051 6052 6053 6054 6055 6056				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL &/OR GRADATIONAL &/OR DEPTH	SAMPLE NUMBER	SAMPLE GRAB SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OK								NO SAMPLE
		50%	100% OK							
			100%	0 /10						
					6046	50				
						51				
					6045	52				
						53				
					6044	54				
					6043					
					6042	55				
					6041	56				
					6040	57				
					6039	58				
					6038	59				
					6037	60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6086 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2070287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOIL	100% OR	100%	0/11	12/11/86			NO SAMPLE

6027 6028 6029 6030 6031 6032 6033 6034 6035 6036

60 61 62 63 64 65 66 67 68 69 70

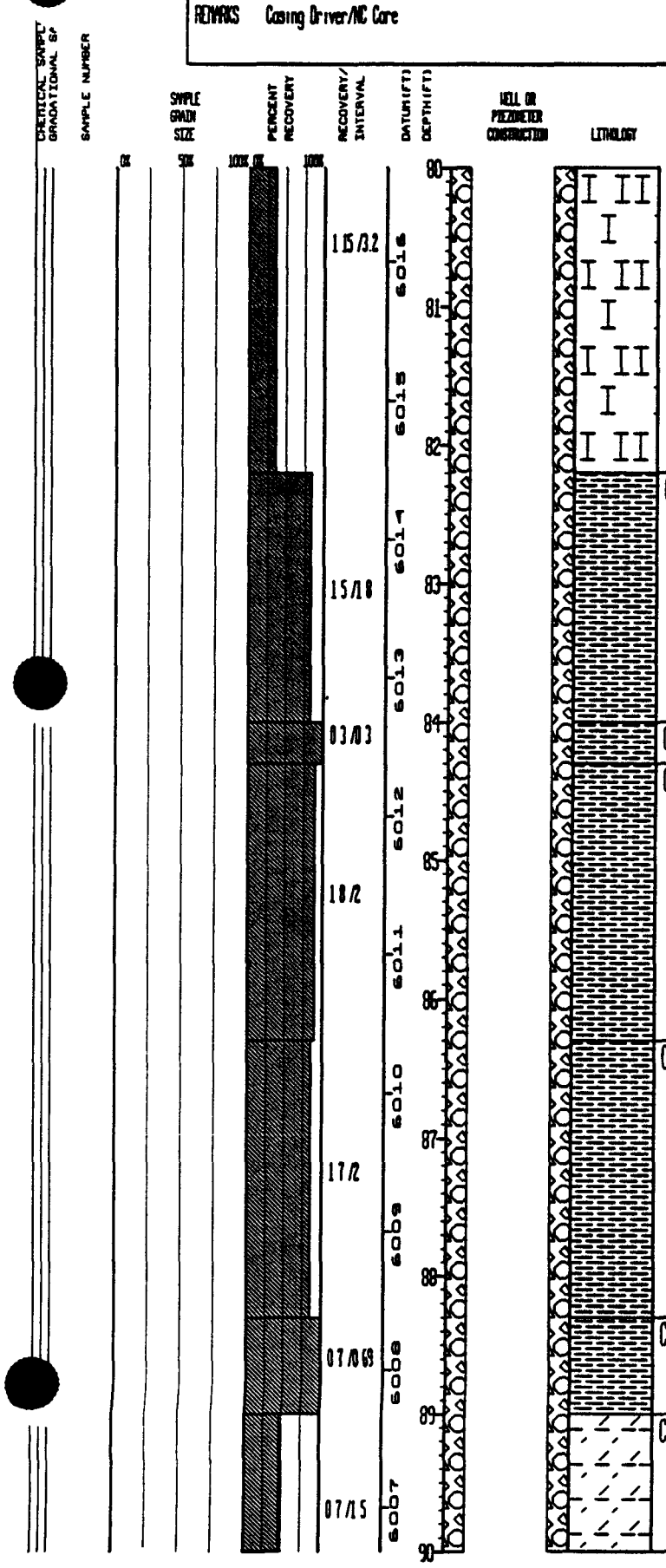
STATE PLANE COORDINATE	TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6056 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER	
NORTH 749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86	
EAST 2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86		

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OK	100% OK	100%	6026 6025 6024 6023 6022 6021 6020 6019 6018 6017	70 71 72 73 74 75 76 77 78 79 80			NO SAMPLE	Top of Bedrock
				0.6/5					SILTY CLAYSTONE	Light olive gray (5Y 6/1), bedding non-apparent, well weathered, mod friable, some iron staining and Mg staining in dendritic form
								I I II	IRONSTONE	Light brown (5YR 5/6), massive bedding, contact is not apparent from core, mod weathered, low friability, very dense and heavy, some possible Mg staining and nodules (<1 mm), some iron nodules (<1 mm)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT) 6096 68	PROJECT NUMBER 667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/13/86	

REMARKS Casing Driver/NC Core



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Yellowish gray (5Y 8/1) (in top 4 in and bottom 3 in of interval) and light gray (N7) (in middle of interval), massive bedding, mod friability, iron staining along fractures, fractures are horizontal - near horizontal and 70 - 90 degrees, Mg staining along fractures, fractures most abundant in top 4 in
CLAYSTONE	Same as above, light gray (N7)
CLAYSTONE	Same as above, light brownish gray (5YR 6/1)
CLAYSTONE	Same as above
CLAYSTONE	Same as above
CLAYEY SILTSTONE	Yellowish gray (5Y 8/1), massive bedding, mod - low friability, well sorted

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE / GRADATIONAL SIZ	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		CR SIZE	100% CR 100%	2/2	6086	90				
					6085	91				SILTY CLAYSTONE Light brownish gray (5YR 6/1), massive bedding, mod to well weathered, mod to poorly friable, trace iron staining, trace carb material
				15/15	6084	92				
					6083	93				SILTY CLAYSTONE Same as above, light olive gray (5Y 6/1), less silt fraction, mod friability, some iron staining as mottles and in fractures approx 70 degrees
				03/03	6082	94				SILTY CLAYSTONE Same as above
				18/18	6081	95				SILTY CLAYSTONE Same as above
					6080	96				
				2/2	6079	97				SILTY CLAYSTONE Same as above
					6078	98				
				09/09	6077	99				SILTY CLAYSTONE Same as above, increased silt fraction
					6076	100				SILTY CLAYSTONE Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT) 6096 68	PROJECT NUMBER 667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA / DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 5/5; 1 8/2; 2/2; 1/1; 0 8/0 8

DATUM (FT): 5996, 5995, 5994, 5993, 5992, 5991, 5990, 5989, 5988, 5987

DEPTH (FT): 100, 101, 102, 103, 104, 105, 106, 107, 108, 109, 110

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

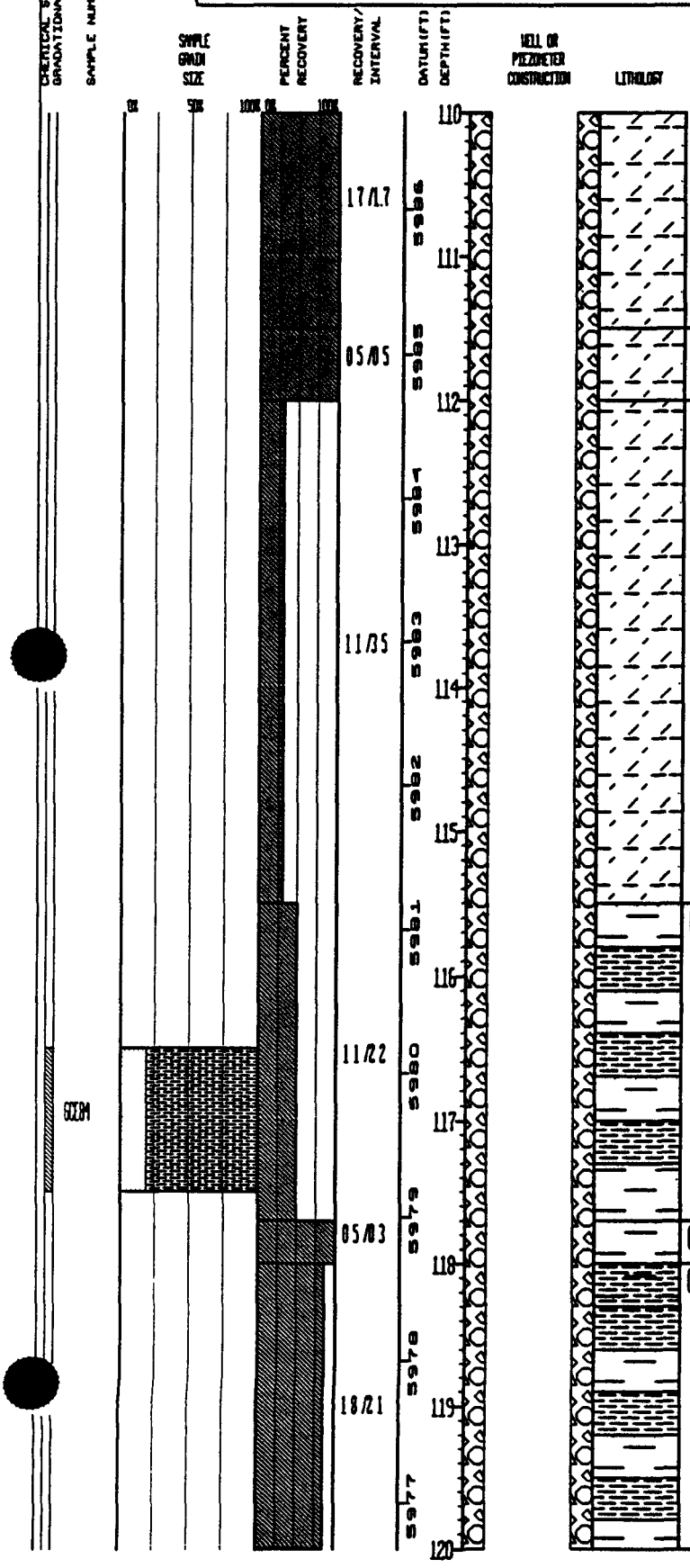
CLAYEY SILTSTONE Light olive gray (5Y 6/1), massive bedding, moderately weathered, mod friable, iron staining along fractures, increased clay fraction at bottom of interval

CLAYEY SILTSTONE Same as above, some carb material

CLAYEY SILTSTONE Same as above, olive gray (5Y 4/1), greater silt fraction, some VFG sand, horizontal bedding

CLAYEY SILTSTONE Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212		GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER	F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core							



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYEY SILTSTONE	Same as above, increased amount of carb material
CLAYEY SILTSTONE	Light olive gray (5Y 6/1), laminar horizontal bedding, highly weathered, mod friable, some carb material, some iron staining as mottles
CLAYEY SILTSTONE	Same as above
CLAYEY SANDSTONE	Light olive gray (5Y 6/1), highly weathered, mod friable, VFG - FG, mod sorted, claystone is interbedded (approx 1 cm - 2 cm) and is as "mottles" within sandstone, some iron staining as mottles, some carb material, some silt
CLAYEY SANDSTONE	Same as above
CLAYEY SANDSTONE	Same as above Slabbed core shows horizontal laminar bedding, soft sediment deformation, abundant carb material along bedding planes, small iron nodules in beds containing abundant massive (ie 1-2 cm) clay beds

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 9/2 1; 1/5; 0 3/0 3; 1 7/2

DATUM (FT): 5976, 5975, 5974, 5973, 5972, 5971, 5970, 5969, 5968, 5967

DEPTH (FT): 120, 121, 122, 123, 124, 125, 126, 127, 128, 129, 130

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYEY SANDSTONE	Light olive gray (5Y 6/1), highly weathered, mod friable, horizontal laminar bedding, VFG - FG, interbedded claystone beds, some iron staining, some carb material
SILTY CLAYSTONE	Yellowish gray (5Y 8/1), massively bedded, highly weathered, mod friable, trace of iron staining
SILTY CLAYSTONE	Same as above
SILTY CLAYSTONE	Same as above Slabbed core shows approx 1-2 cm beds of claystone with a "grainy textured" claystone between beds (not sandy)
CLAYEY SILTSTONE	Yellowish gray (5Y 8/1), massively bedded, mod to poorly friable, trace of carb, core is broken up indicating possible fractures

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER	
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86	
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86		
REMARKS	Casing Driver/NC Core							

CHEMICAL SAMPLE GRADATIONAL SAM

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 13/13; 17/13.9; 17/2; 18/2.3; 0.5/0.69; 13/13; 2/2

DATUM (FT): 5966, 5965, 5964, 5963, 5962, 5961, 5960, 5959, 5958, 5957

DEPTH (FT): 130, 131, 132, 133, 134, 135, 136, 137, 138, 139, 140

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYEY SILTSTONE	Yellowish gray (5Y 8/1), massive bedding, mod to poorly friable, trace of carb material
CLAYEY SILTSTONE	Same as above light olive gray (5Y 6/1), trace of carb material
CLAYEY SILTSTONE	Same as above, some carb material in top 5 in, some sand at bottom of interval
SILTY SANDSTONE	Yellowish gray (5Y 8/1), highly weathered, mod to low friability, VFG - FG
SILTY SANDSTONE	Same as above
CLAYEY SILTSTONE	Yellowish gray (5Y 8/1), highly weathered, mod to low friability, massive bedding, trace carb material

GCE85

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6056 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					140				
	S956				141				CLAYEY SILTSTONE Yellowish gray (5Y 8/1), highly weathered, mod to low friability, massive bedding, trace carb material
				14/17					
	S955				142				
	S954				143				CLAYEY SILTSTONE Same as above
				18/25					
	S953				144				
	S952				145				CLAYEY SILTSTONE Same as above abundant carb material in middle of section
	S951			18/2					
	S950				146				
				05/05	147				CLAYEY SILTSTONE Same as above
	S949								CLAYEY SILTSTONE Same as above
				13/13	148				
	S948				149				CLAYEY SILTSTONE Same as above light olive gray (5Y 6/1)
	S947			18/25	150				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					150				
					151			SILTY SANDSTONE	VFG - FG, yellowish gray (5Y 8/1), and light olive gray (5Y 6/1), laminar bedding at approx 30 degrees, soft sed deformation, mod - highly weathered, mod friability, mod sorted, some clay, trace carb material, trace iron staining
	6026			06/12	5946	11/20/86			
					152				
					153			SANDY SILTSTONE	Light olive gray (5Y 6/1), massive bedding with some laminar beds of sand, highly weathered, mod friable, sand is VFG - FG, mod sorted
				13/13	5944				
					154			SILTY CLAYSTONE	Yellowish gray (5Y 8/1), massive bedding, highly weathered, some carb material in top 6 in of interval, trace in bottom, trace of iron staining
				16/2	5942				
					155				
					156			SILTY CLAYSTONE	Same as above
				13/17	5940				
					157				
					158			SILTY CLAYSTONE	Same as above
				01/08	5938				
					159			SILTY CLAYSTONE	Same as above
				10/2	5937				
					160				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT) 6096 68	PROJECT NUMBER 667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1/2.2; 0.8/0.8; 1.9/2; 1.6/7

DATUM (FT): 5936, 5935, 5934, 5933, 5932, 5931, 5930, 5929, 5928, 5927

DEPTH (FT): 160, 161, 162, 163, 164, 165, 166, 167, 168, 169, 170

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5Y 6/1), non-apparent bedding, highly weathered, mod friability, trace carb material, some silt
CLAYSTONE	Same as above, trace of VFG sand
CLAYSTONE	Same as above, some sand as laminae
CLAYSTONE	Same as above olive gray (5Y 4/1), no sand

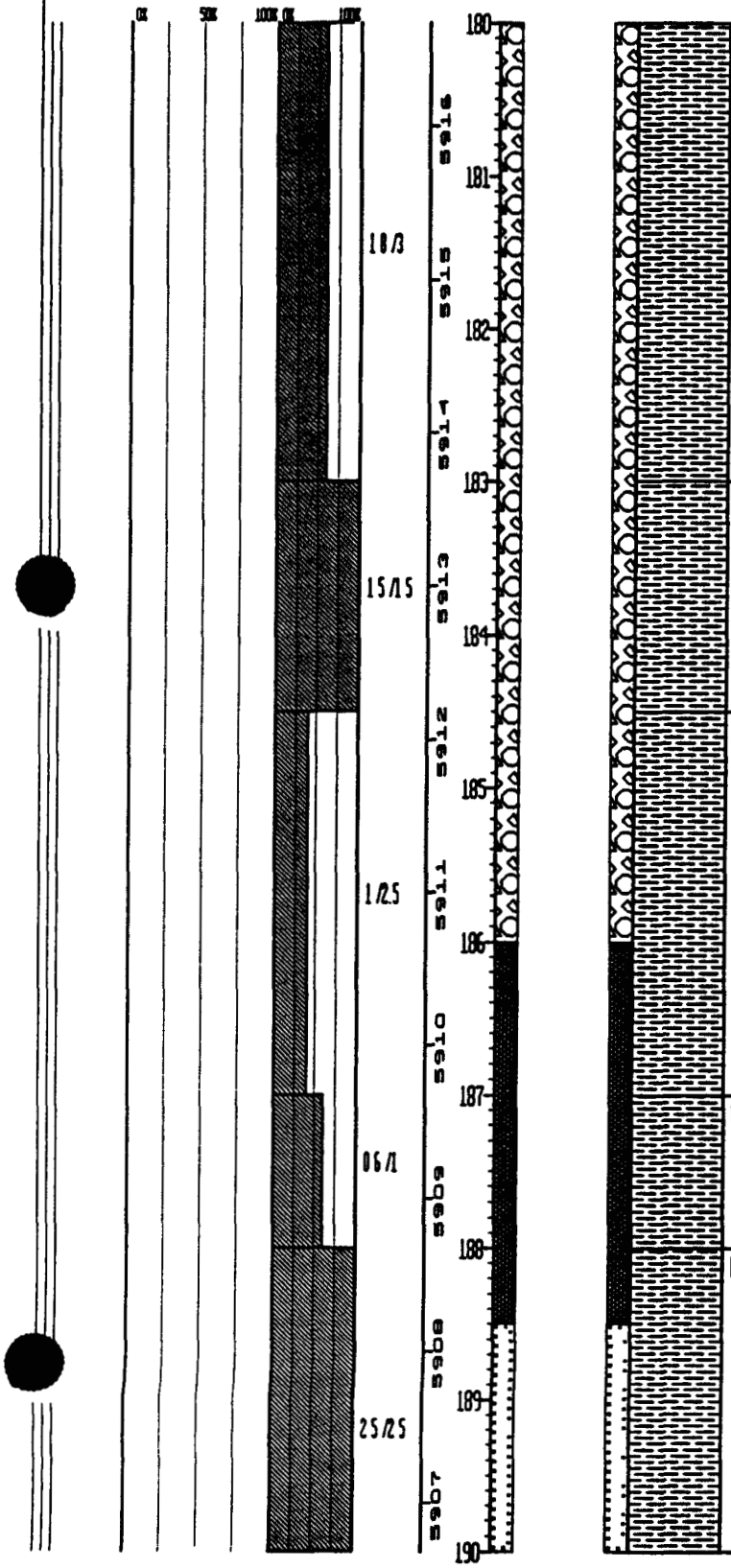
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT)	6056 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	749989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DNT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE/ GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1/1	170				
					171				
					172			CLAYSTONE	Olive gray (5Y 6/1), non-apparent bedding, highly weathered, mod friability, some carb material, trace of silt, trace of iron staining, floury texture
				07/1	173			CLAYSTONE	Same as above
					174			CLAYSTONE	Same as above some silt
				18/2	175				
					176			CLAYSTONE	Same as above consolidated texture, fracture at 60 degrees
				18/2	177				
					178			CLAYSTONE	Top of interval same as above, light olive gray (5Y 6/1) Bottom of interval same as above, olive gray (5Y 4/1) and olive black (5Y 2/1), abundant carb material, fractures at 85-90 degrees and approx 30 degrees
				18/2	179				
					180				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT) 6096 68	PROJECT NUMBER 667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SAM | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

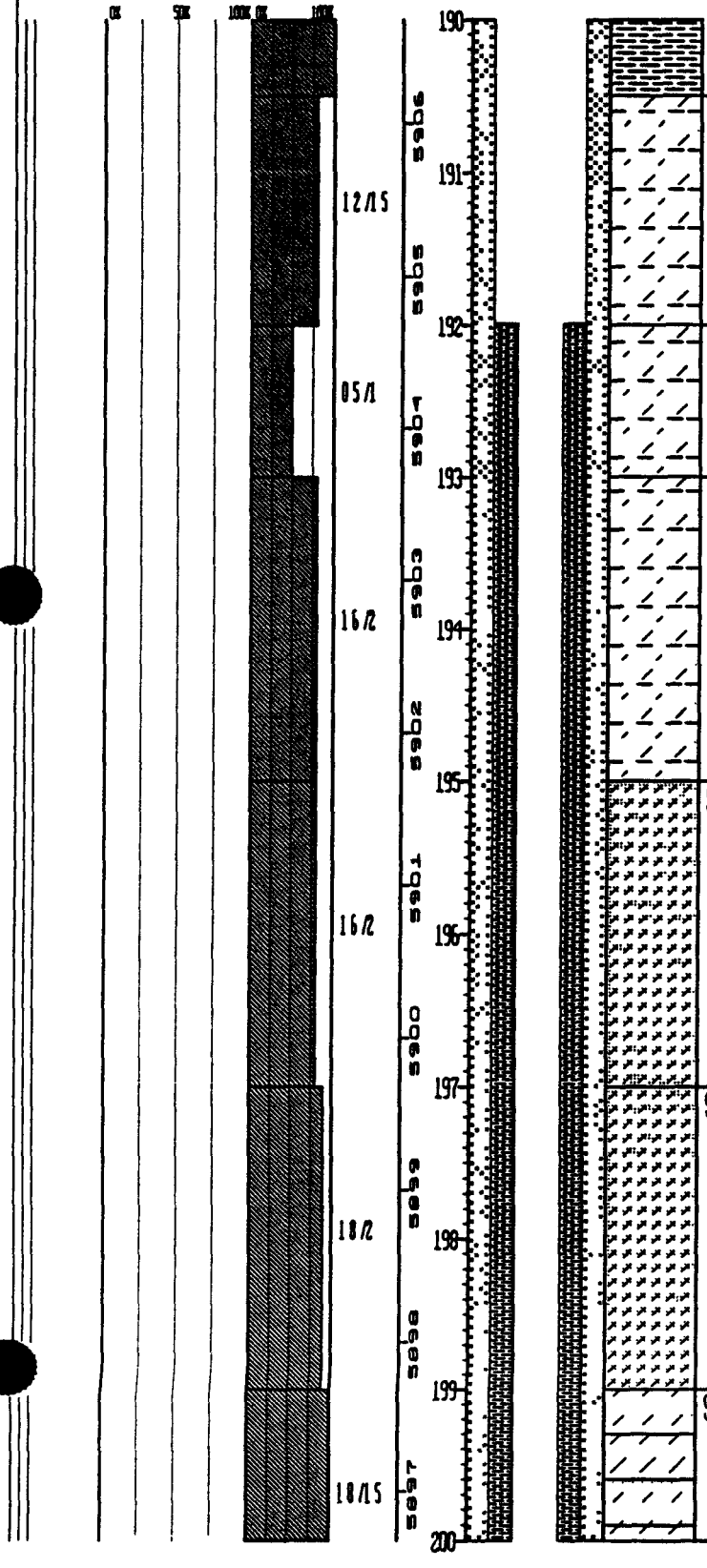


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Light olive gray (5Y 6/1), bedding non-apparent, highly weathered, mod friable, some carb material, trace iron staining, 60 and 70 degree fractures
CLAYSTONE	Same as above bottom of interval is olive gray (5Y 4/1)
CLAYSTONE	Same as above portions of interval have a floury texture
CLAYSTONE	Same as above
CLAYSTONE	Same as above bottom 6 in of interval is light olive gray (5Y 6/1), trace of silt

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT) 6096 68	PROJECT NUMBER 667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/13/86	

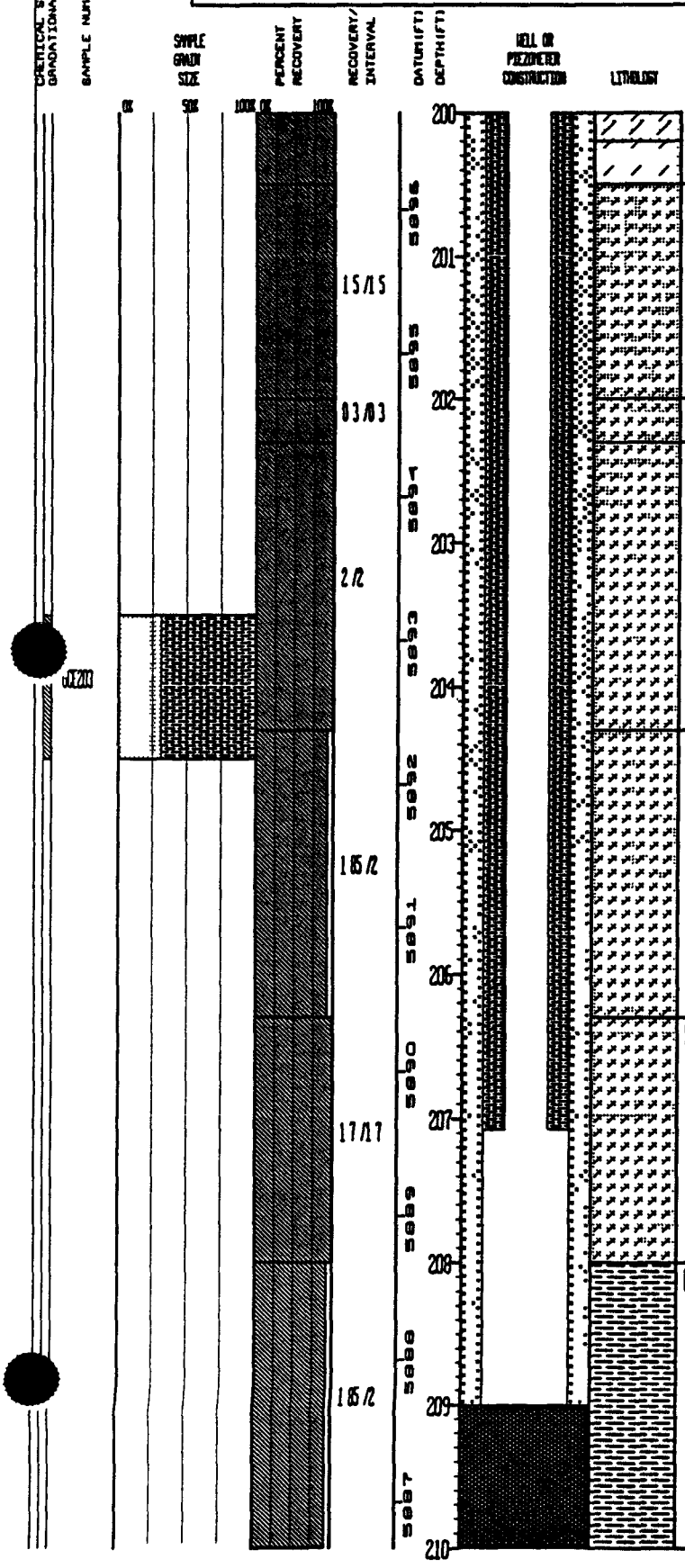
REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



Unified Soils Classification or Rock Type	Description
CLAYEY SILTSTONE	Yellowish gray (5Y 8/1), non-apparent bedding, highly weathered, mod to low friability, some carb material
CLAYEY SILTSTONE	Same as above some iron staining, numerous hairline fractures
CLAYEY SILTSTONE	Same as above bottom of interval has VFG - FG sand lenses and soft sed deformation
SANDY SILTSTONE	Yellowish gray (5Y 8/1) and light olive gray (5Y 6/1), convoluted bedding with 2 types of abundant sand lenses (1) VFG, well sorted, 3 cm - 1/2 cm, and (2) FG-VFG, abundant carb material, 1 cm - 1/4 cm) and clay scour pieces, highly to mod weathered, mod to low friability, trace of iron staining, trace of carb
SANDY SILTSTONE	Same as above Bottom 2 in of interval decreased amount of silt, horizontal laminar bedding, VFG -FG sand
SILTY SANDSTONE	Light olive gray (5Y 6/1), horizontal laminar bedding with some massive bedding at 200 ft and some interbeds of siltstone, highly weathered, mod friable, VFG - FG, mod sorted, sand is sub-angular to sub-rounded, some carb material along bedding planes, trace of possible SS sills

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212		GROUND ELEVATION (FT)	6096 68	PROJECT NUMBER	667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD		CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	48-86
EAST	2078287	LOCATOR NUMBER	F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/13/86	
REMARKS	Casing Driver/NC Core							



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SANDY SILTSTONE	Light olive gray (5Y 6/1), possibly horizontal laminar bedding, highly weathered, mod to poorly friable, VFG to FG sand, trace of carb and iron staining, trace of sand lenses and sills
SANDY SILTSTONE	Same as above
SANDY SILTSTONE	Same as above bottom 6 in of interval was slabbed, increase of sand content, possible convoluted bedding and bioturbation
SANDY SILTSTONE	Same as above decreasing sand content at end of interval
SANDY SILTSTONE	Same as above
CLAYSTONE	Carbonaceous claystone, olive gray (5Y 4/1) and olive black (5Y 2/1), massive bedding, highly weathered, mod friable, fracture at 60 degrees

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 212	GROUND ELEVATION (FT) 6096 68	PROJECT NUMBER 667 1	LOG OF BORING NUMBER
NORTH	748989	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	48-86
EAST	2078287	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/13/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (FT)	Unified Soils Classification or Rock Type	Description
1 1/2	210–212	CLAYSTONE	Carbonaceous claystone, olive gray (5Y 4/1) and olive black (5Y 2/1), massive bedding, highly weathered, mod friable Note No water encountered during drilling

Depth scale: 210, 211, 212, 213, 214, 215, 216, 217, 218, 219, 220

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74	GROUND ELEVATION (FT)	6096 92	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748964	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	49-86
EAST	2078288	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/16/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

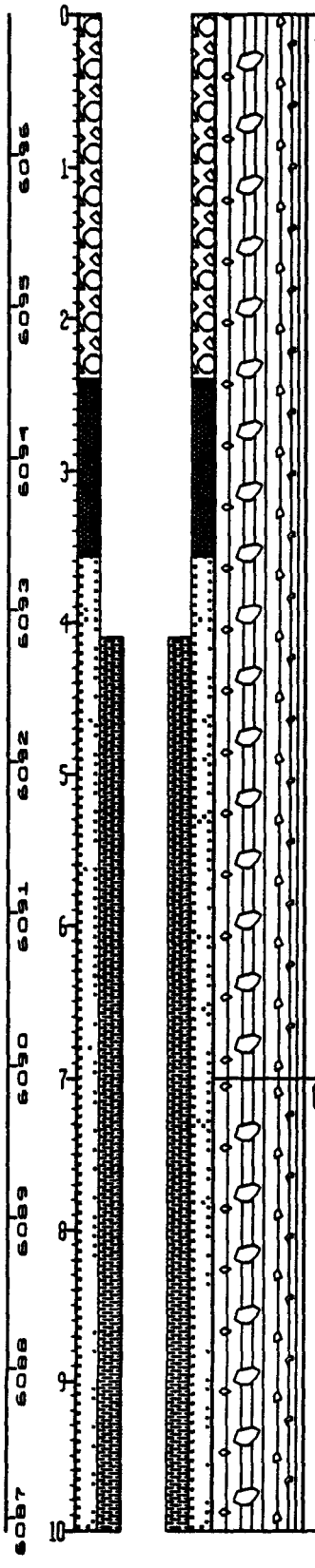
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GM	0 - 7 0' Cuttings GRAVEL moderate brown (5YR 4/4), silty, abundant quartzite, micaceous, 2% gravel limonite coated, dry
GM	7 0 - 13 0' Cuttings GRAVEL same as above with no limonite coatings, dry

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74	GROUND ELEVATION (FT)	6096 92	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748964	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	49-86
EAST	2078288	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/16/86	

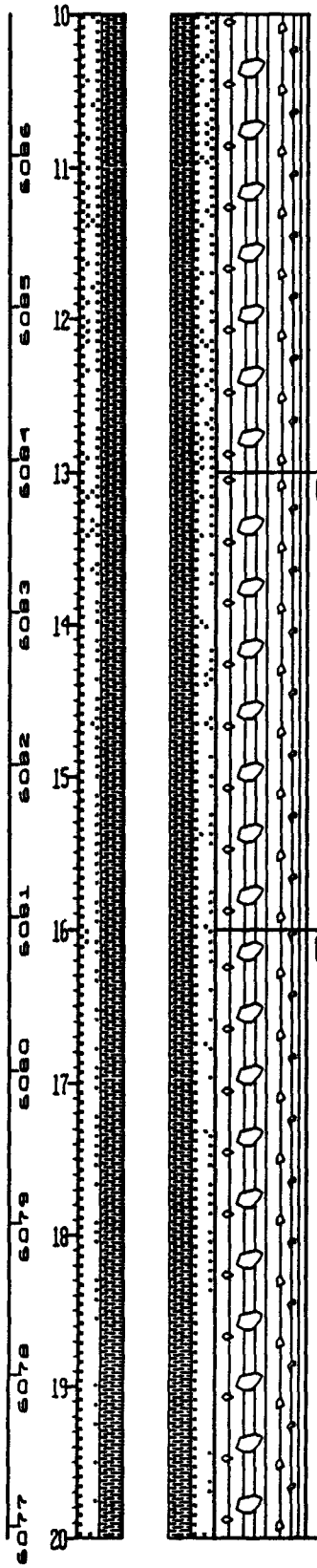
REMARKS Casing Driver NOTE Not logged by ASI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

N/A /6

N/A /3

DEPTH (FT)	DATUM (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
13	6086	GM	13 0 - 16 0' Cuttings GRAVEL moderate brown (5YR 4/4), silty, sandy, poorly sorted, sub-angular, 20-30% fines, damp
16	6083	GM	16 0 - 26 0' Cuttings GRAVEL moderate brown (5YR 4/4), silty, sandy, 10% silt, 30% sand, poorly sorted, sub-angular, moist



STATE PLANE COORDINATE		TOTAL DEPTH (FT)	74	GROUND ELEVATION (FT)	6096 92	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748964	AREA	WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	49-86
EAST	2078288	LOCATOR NUMBER	F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/16/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				N/A /18	6076	20				
					6075	21				
					6074	22				
					6073	23				
					6072	24				
					6071	25				
					6070	26			GP	26 0 - 32 0' Cuttings GRAVEL moderate brown (5YR 4/4), silty, abundant boulders, 5% silt, moist
					6069	27				
					6068	28				
				N/A /6	6067	29				
						30				

STATE PLANE COORDINATE
NORTH 748964
EAST 2078288

TOTAL DEPTH (FT) 74
AREA WEST SPRAY FIELD
LOCATOR NUMBER F8

GROUND ELEVATION (FT) 6096 92
CASING DIAMETER (IN) 2 ID
BOREHOLE DIAMETER (IN) 5 5/8

PROJECT NUMBER 667 11
GEOLOGIST T GULLIVER
DATE DRILLED 10/16/86

LOG OF BORING NUMBER:

49-86

REMARKS Casing Driver NOTE Not logged by ASI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE / GRADATIONAL SAMPLE | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Datum (ft)	Depth (ft)	USCS	Description
		30		
	6066	31		
	6065	32	GP	32 0 - 38 0' Cuttings GRAVEL same as above, silt 5%, sand 10%, moist
	6064	33		
	6063	34		
N/A /6	6062	35		
	6061	36		
	6060	37		
	6059	38	GP	38 0 - 40 0' Cuttings GRAVEL same as above, fines <1%, dry
N/A /2	6058	39		
	6057	40		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74	GROUND ELEVATION (FT)	6096 92	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749964	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	49-86
EAST	2078288	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/16/86	

REMARKS Casing Driver NOTE Not logged by MSI Information from HYDRO-SEARCH, Inc log

CHEMICAL, PHYS., GRADATIONAL &	SAMPLE NUMBER	SAMPLE GRADI SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			OK		6056	40			GM	40 0 - 49 0' Cuttings GRAVEL moderate brown (5YR 4/4), silty, sandy, poorly sorted, sub-angular, silt 20%, sand 20-30%, moist
			100% OK		6055	41				
					6054	42				
					6053	43				
					6052	44				
				N/A /9	6051	45				
					6050	46				
					6049	47				
					6048	48				
				N/A /1	6047	49			SP	49 0 - 50 0' Cuttings SAND light brown (5YR 5/6), fine grained, well sorted, sub-rounded, damp
						50				

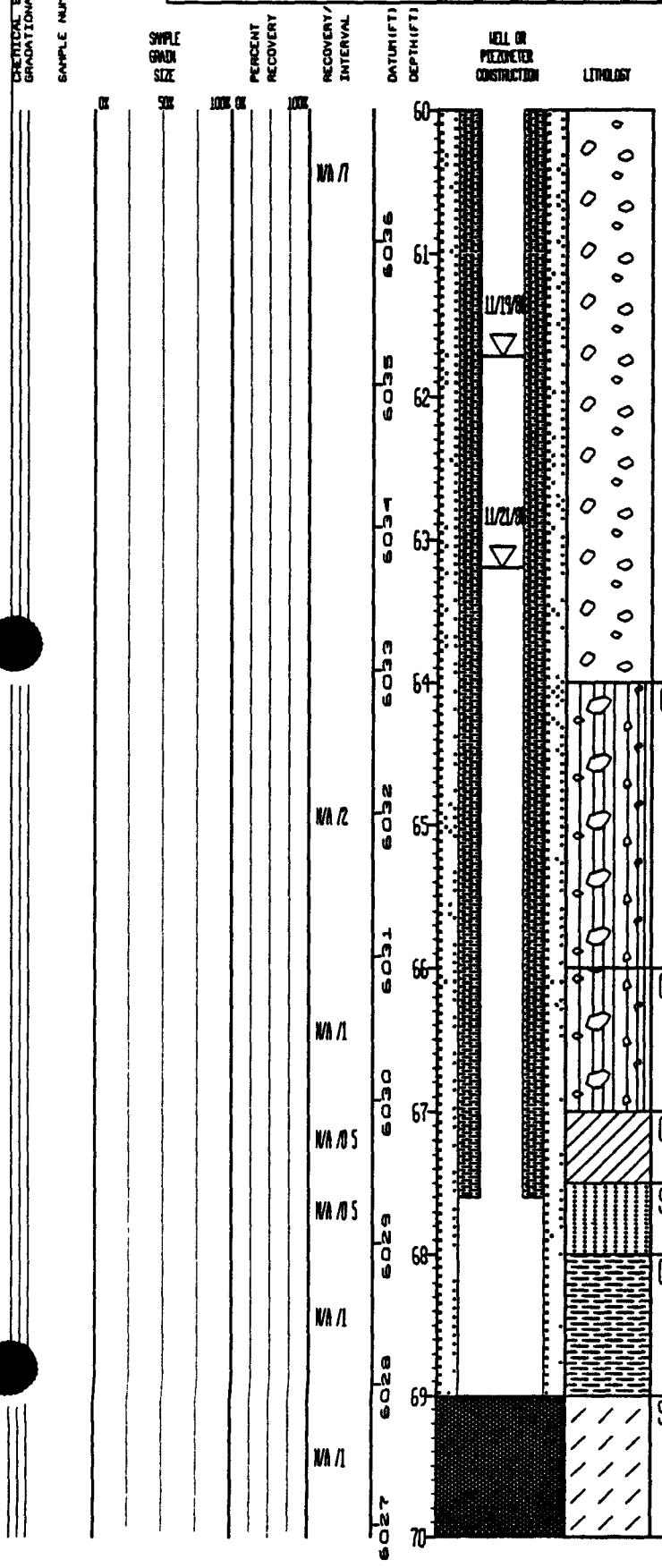
STATE PLANE COORDINATE	TOTAL DEPTH (FT) 74	GROUND ELEVATION (FT)	6096.92	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH 748964	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	49-86
EAST 2078288	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/16/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRADATION SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						50			GM	50.0 - 56.0' Cuttings GRAVEL moderate brown (5YR 4/4), sandy, silty, gravel 10-20%, sand 20-30%, poorly sorted, sub-angular, moist
					6046	51				
					6045	52	10/16/86 ▽			
				N/A /6	6044	53				
					6043	54				
					6042	55				
					6041	56			GP	56.0 - 57.0' Cuttings GRAVEL moderate brown (5YR 4/4), coarse, sandy gravel, moderately well sorted, rounded, wet
				N/A /1	6040	57			GP	57.0 - 64.0' Cuttings GRAVEL moderate brown (5YR 4/4), silty, sandy, silt 10%, coarse to medium grained sand, 20-30%, sub-rounded, wet
					6039	58				
					6038	59				
					6037	60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74	GROUND ELEVATION (FT)	6096 92	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748964	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	49-86
EAST	2078288	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/16/86	

REMARKS Casing Driver NOTE Not logged by MSI Information from HYDRO-SEARCH, Inc log



GM	64 0 - 66 0' Cuttings GRAVEL moderate brown (5YR 4/4), sandy, silty, fine to medium grained sand 20%, silt 30%, wet
GM	66 0 - 67 0' Cuttings, GRAVEL moderate brown (5YR 4/4), silty, sandy, 20% gravel, 30% medium grained sand, poorly sorted, very wet
CL	67 0 - 67 5' Cuttings CLAY moderate brown (5YR 4/4), sandy, silty, plastic, soft, wet
SP	67 5 - 68 0' Cuttings SAND moderate brown (5YR 4/4), gravelly, silty 5%, wet
CLAYSTONE	Top of Bedrock, (Laramie Formation) 68 0 - 69 0' Cuttings Claystone light olive gray (5Y 5/2), subplastic, damp
SILTSTONE	69 0 - 70 0' Cuttings Siltstone light olive gray (5Y 5/2), subplastic, damp

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 74	GROUND ELEVATION (FT) 6096 92	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748964	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 2 ID	GEOLOGIST T GULLIVER	49-86
EAST	2078288	LOCATOR NUMBER F8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 10/16/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
						70			CLAYSTONE	70 0 - 74 0' Claystone medium gray (N5), laminated, damp
					6026	71				
				N/A /4	6025	72				
					6024	73				
					6023	74				
					6022	75				
					6021	76				
					6020	77				
					6019	78				
					6018	79				
					6017	80				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT) 6121 98	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 0	GEOLOGIST T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 10/07/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE / GRADATIONAL SAMPLE DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6121	0			GP	0 -12 0' Cuttings Gravel moderate brown (5YR 4/4), granite and quartzite pebbles, cobbles and boulders, <2% sand and silt, iron coated surfaces, poorly sorted, dry
					6120	1				
					6119	2				
					6118	3				
					6117	4				
				0 /12	6116	5				
					6115	6				
					6114	7				
					6113	8				
					6112	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121 98	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE GRADATIONAL SA DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT)

DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
	10		
	11		
	12	GP	12 0 - 14 0' Cuttings Gravel same as above, damp
0/2	13		
	14	SP	14 0 - 15 0' Cuttings Sand moderate brown (5YR 4/4), very fine grained, 1% mica, moderate sorting, sub-angular, unconsolidated, damp
0/1			
	15	GP	15 0 - 25 0' Cuttings Gravel moderate brown (5YR 4/4), granite and quartzite pebbles, cobbles and boulders, some boulders >2' in diameter, 1-2% sand and silt, poorly sorted, unconsolidated, dry
	16		
	17		
	18		
	19		
0/10	20		

6111 6110 6109 6108 6107 6106 6105 6104 6103 6102

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT) 6121.98	PROJECT NUMBER 657.11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 0	GEOLOGIST T. GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 10/07/86	

REMARKS Casing Driver NOTE Not logged by NSI Information from Hydro-Search, Inc. log

CRITICAL SAMPLE DEPTH	GRADATIONAL BA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			GR	100%	0 /10	6101	20				
			SIZE	100% GR		6100	21				
				100%		6099	22				
						6098	23				
						6097	24				
					0 /0 5	6096	25			GP	25.0 - 25.5' Cuttings Gravel moderate brown (5YR 4/4), granitic pebbles, sandy, silty, poorly sorted, unconsolidated, damp
						6095	26			GP	25.5 - 75.0' Cuttings Gravel moderate brown (5YR 4/4), granitic pebbles and cobbles with some light gray (N7) quartzite cobbles, 1-5% sand and silt, poorly sorted, unconsolidated, damp
						6094	27				
						6093	28				
						6092	29				
							30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121.98	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER C7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by MSI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE / GRADATIONAL SAMPLE

SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

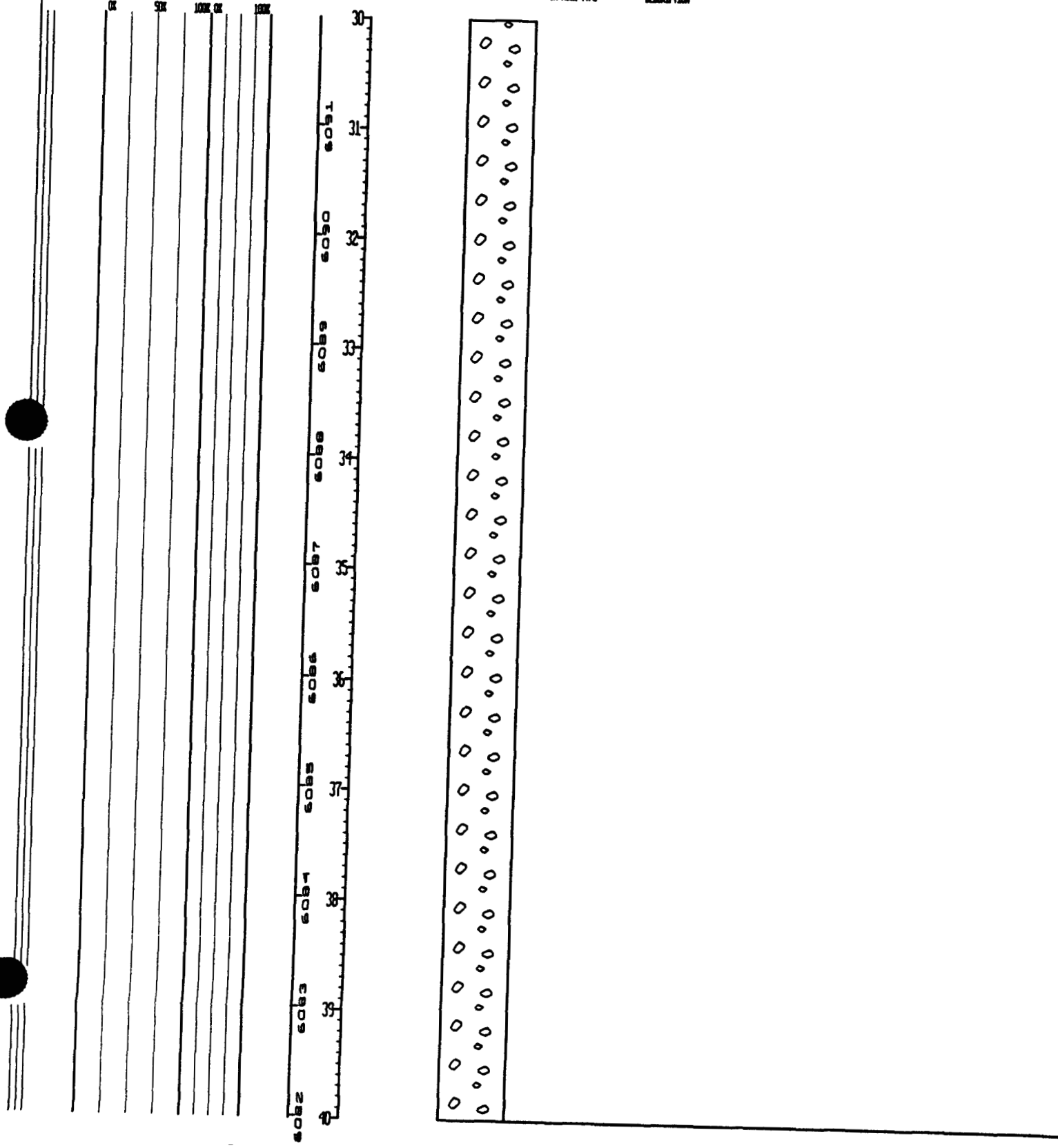
DATUM(FT) DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

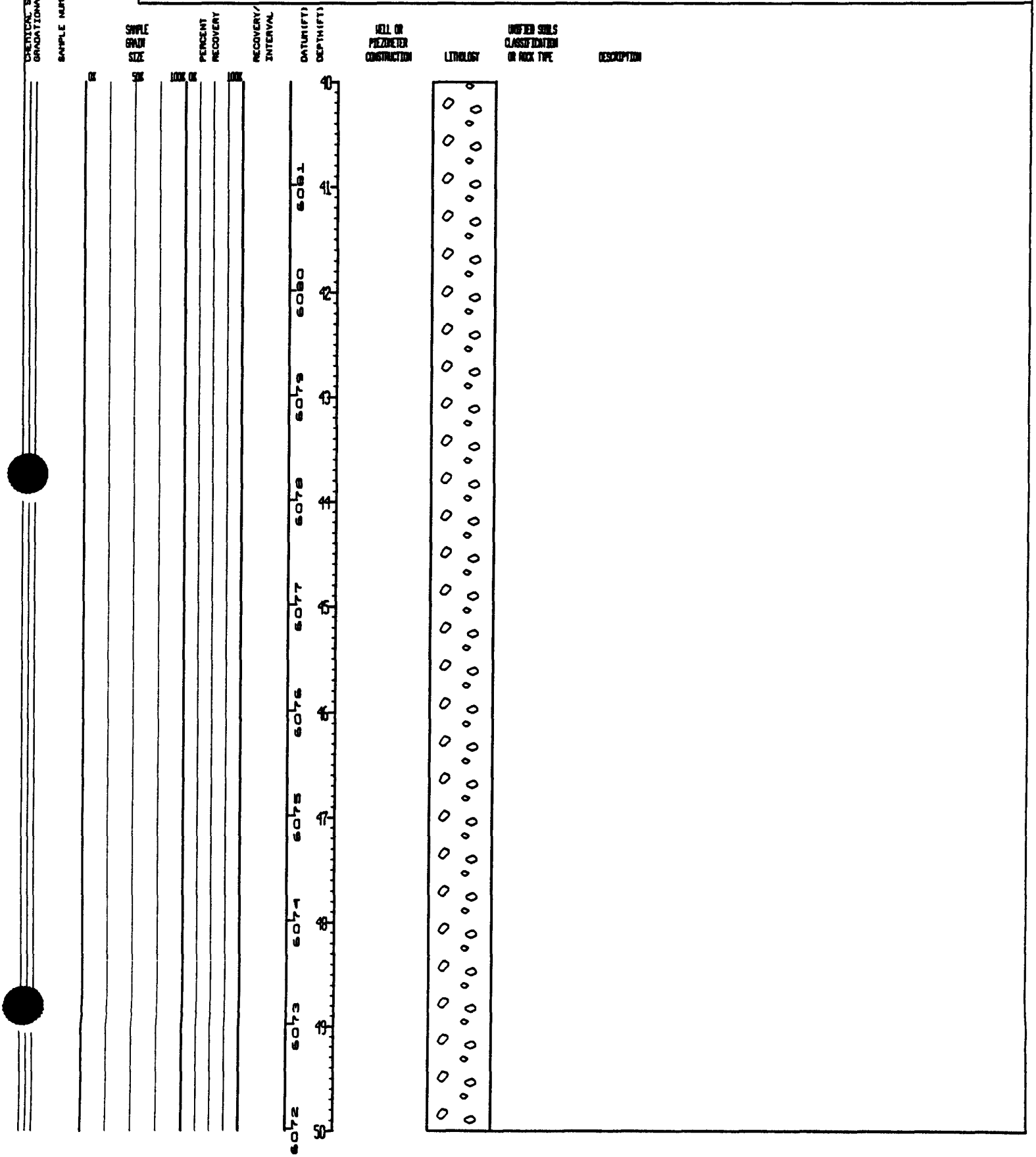
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121.98	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT) 6121 98	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 0	GEOLOGIST T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 10/07/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE 0% 50% 100%	PERCENT RECOVERY 0% 100%	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0/49 5		50				
					6071	51				
					6070	52				
					6069	53				
					6068	54				
					6067	55				
					6066	56				
					6065	57				
					6064	58				
					6063	59				
					6062	60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121 98	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

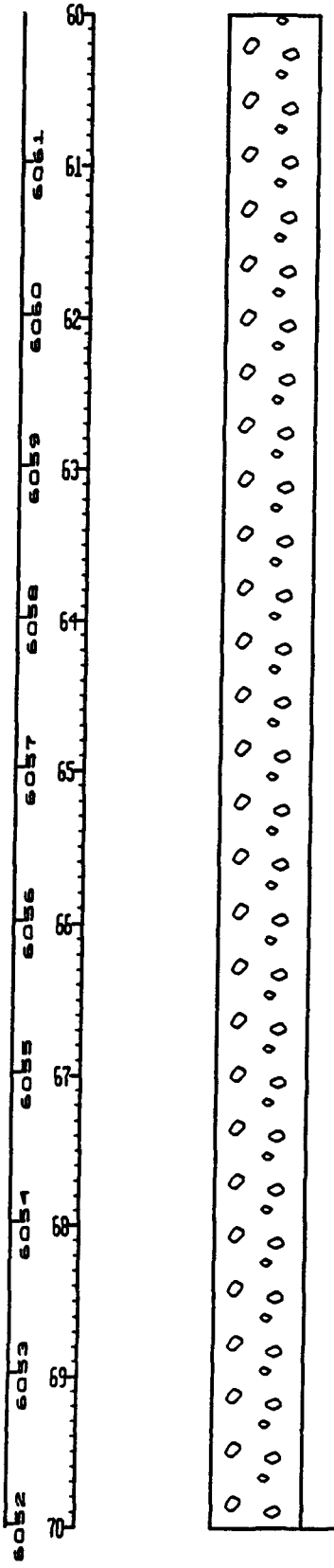
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



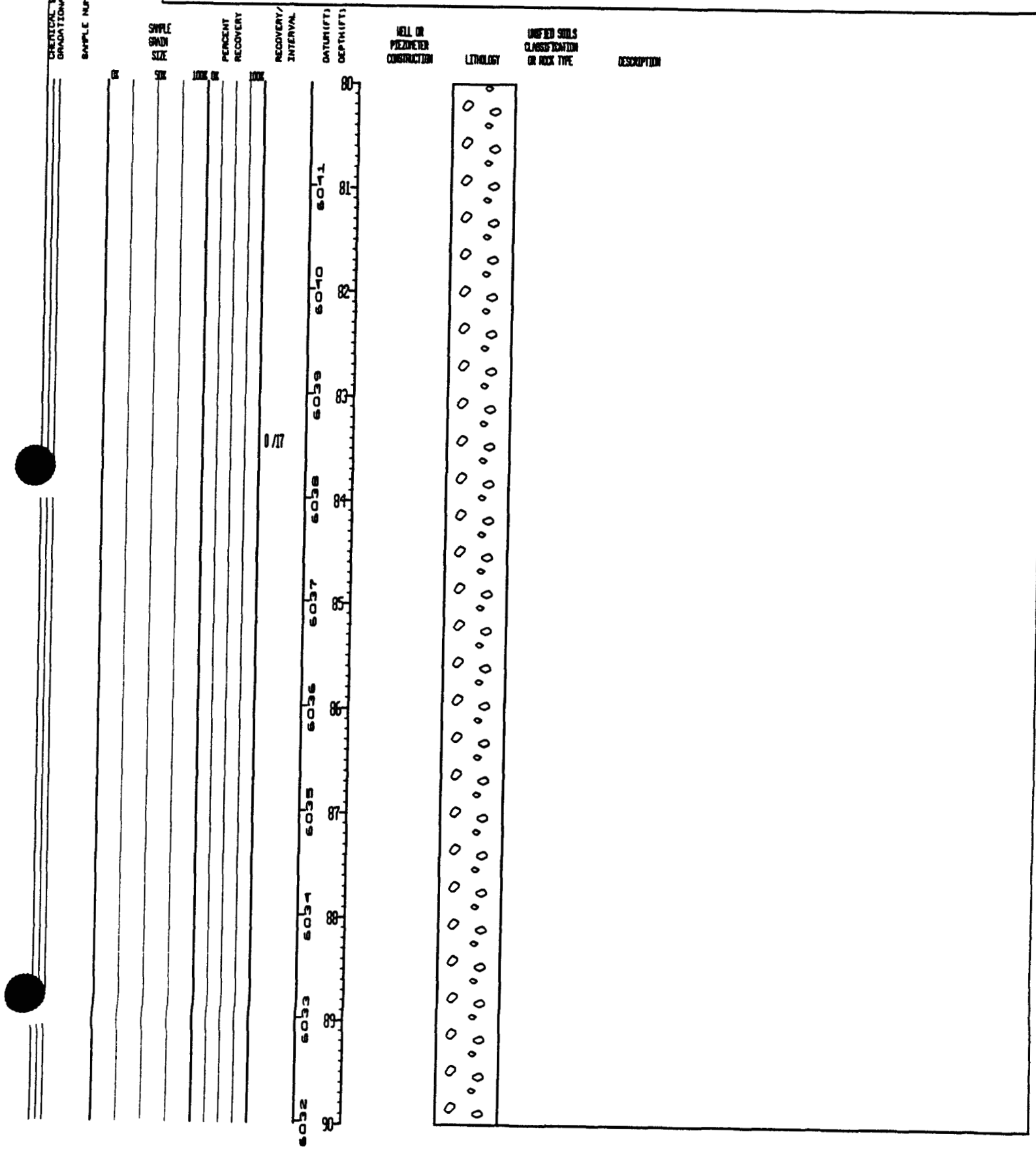
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121.98	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER C7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by AGI Information from Hydro-Search, Inc log

CHEMICAL/PHYSICAL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR 50%	100% OR 100%		6051	70				
					6050	71				
					6049	72				
					6048	73				
					6047	74				
					6046	75			GP	75.0 - 92.0' Cuttings Gravel moderate brown (5YR 4/4), granitic pebbles and cobbles, 20% medium to coarse grained sand and silty sand, poorly sorted, sub-angular, unconsolidated, damp
					6045	76				
					6044	77				
					6043	78				
					6042	79				
						80				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121 98	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by MSI Information from Hydro-Search, Inc log



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT) 6121 98	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN) 0	GEOLOGIST T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 10/07/86	

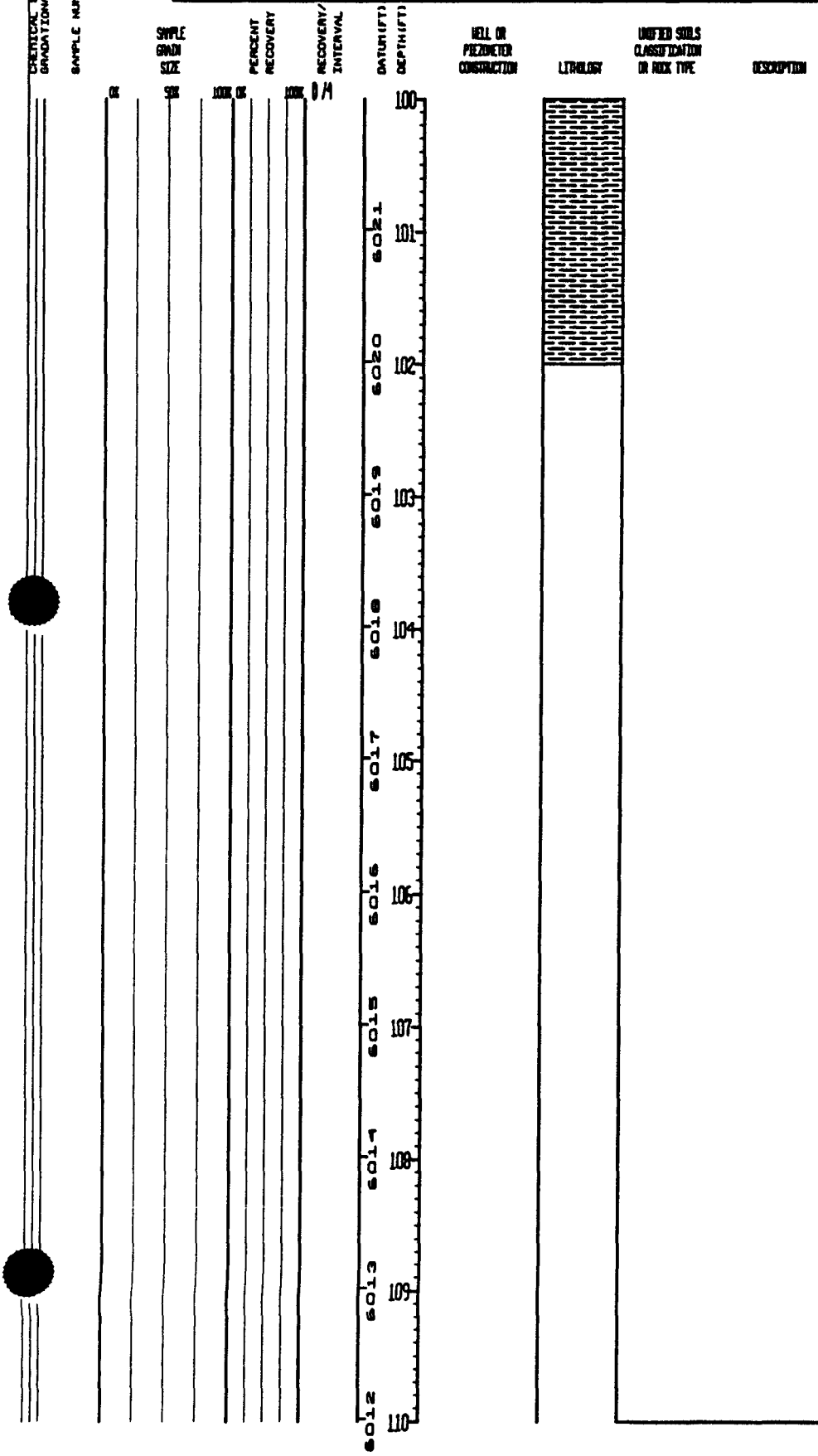
REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE GRADATIONAL SAMPLE DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
	90		
	91		
	92	GP	92 0 - 98 0' Cuttings Gravel same as above, wet
	93		
	94		
0/6	95		
	96		
	97		
	98	CLAYSTONE	98 0 - 102 0' Cuttings Claystone very light gray (N8), plastic, laminated, moist
	99		
0/4	100		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 102	GROUND ELEVATION (FT)	6121.98	PROJECT NUMBER	667.11	LOG OF BORING NUMBER
NORTH	747783	AREA WEST SPRAY FIELD	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	50-86
EAST	2077299	LOCATOR NUMBER E7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	10/07/86	

REMARKS Casing Driver NOTE Not logged by ASI Information from Hydro-Search, Inc log



STATE PLANE COORDINATE	TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER	
NORTH 749575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER		51-86
EAST 2076136	LOCATOR NUMBER DB	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86		
REMARKS CASING DRIVER NOTE AGI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG Cave from TD to 8 5'							

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%	N/A /5	6142 6141 6140 6139 6138 6137 6136 6135 6134 6133	0 1 2 3 4 5 6 7 8 9 10			GW	0 - 5 0' Cuttings GRAVEL moderate brown (5YR 4/4), sandy, 10-20% sand, poorly sorted, limonitic, dry
									GW	5 0 - 17 0' Cuttings GRAVEL same as above, abundant quartzite boulders, dry

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER	
NORTH 748575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER		51-86
EAST 2076136	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86		

REMARKS CASING DRIVER NOTE AGI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Cove from TD to 8 5'

CHEMICAL SAMPLE DEPTH
GRADATIONAL BY
SAMPLE NUMBER

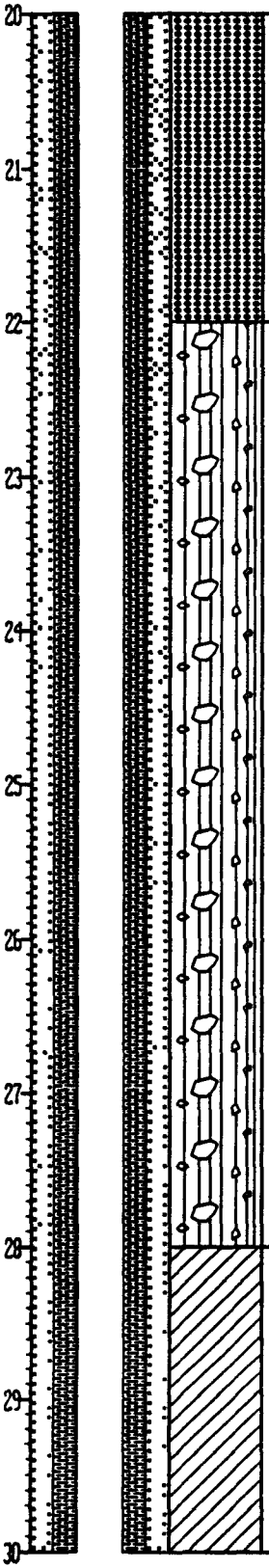
SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CR SIZE	100% CR 100%		6132 6131 6130 6129 6128 6127 6126 6125 6124 6123	10 11 12 13 14 15 16 17 18 19 20			GM	17 0 - 20 0' Cuttings GRAVEL moderate brown (5YR 4/4), sandy, silty, 10% sand, 20-30% gravel, damp
		WA /12						
		WA /3						

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT) 6142 29	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748575	AREA BUFFER WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER D8	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 10/22/86	

REMARKS CASING DRIVER NOTE ASI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG

Cave From TD to 8 5'

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



RECOVERY/INTERVAL	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
N/A /2	SW	20 0 - 22 0' Cuttings Sand and Gravel moderate brown (5YR 4/4), poorly sorted, sub-angular, gravel 40%, damp
N/A /6	GM	22 0 - 28 0' Cuttings GRAVEL moderate brown (5YR 4/4), sandy, silty, 10-20% sand, poorly sorted, sub-angular, moist
N/A /2	CL	28 0 30 0' Cuttings CLAY moderate brown (5YR 4/4), 10-20% gravel, plastic, wet

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER	
NORTH 749575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER		51-86
EAST 2076136	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86		

REMARKS CASING DRIVER NOTE ASI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Cave from TD to 8 5'

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6112 30			SM	30 0 - 32 0' Cuttings SAND moderate brown (5YR 4/4), 5% gravel, silty, poorly sorted, sub-angular, wet
				N/A /2	6111 31				
					6110 32			ML	32 0 - 38 0' Cuttings SILT moderate brown (5YR 4/4), sandy, gravelly, 20% sand, moderate sorting, sub-rounded, 20-30% gravel, damp
					6109 33				
					6108 34				
				N/A /6	6107 35				
					6106 36				
					6105 37				
					6104 38			SP	38 0 - 45 0' Cuttings SAND light brown (5YR 5/6), fine grained, 5% gravel, moderate sorting, sub-rounded, dry
					6103 39				
					40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86	

REMARKS CASING DRIVER NOTE ASI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG

Cave from TD to 8 5'

CHEMICAL SAMPLE GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

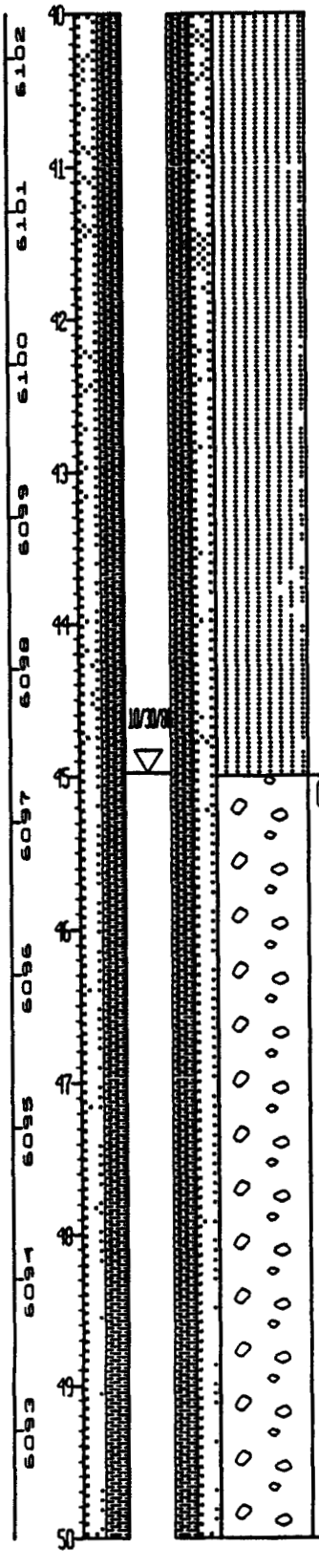
DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



N/A /7

N/A /10

GP 45 0 - 50 5' Cuttings Boulder Gravel pale yellowish brown (10YR 6/2), abundant quartzite and quartz sandstone, dry

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	642 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86	

REMARKS CASING DRIVER NOTE ASI OHD NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Cave from TD to 8 5'

CHEMICAL SAMPL GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				N/A /10	6092	50	10/21/86			
					6091	51				
					6090	52				
					6089	53				
					6088	54				
					6087	55	10/21/86		GM	55 0 - 74 0' Cuttings Boulder Gravel same as above, silty, damp
					6086	56				
					6085	57				
					6084	58				
					6083	59				
						60				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749575	AREA BUFFER WEST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER	08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86	

REMARKS CASING DRIVER NOTE ASI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Core from TD to 8 5'

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SIX	100% OR	100%						
				N/A /19	6082	60				
					6081	61				
					6080	62				
					6079	63				
					6078	64				
					6077	65				
					6076	66				
					6075	67				
					6074	68				
					6073	69				
						70				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86	

REMARKS CASING DRIVER NOTE ASI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Cove from TD to 8 5'

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					70 6072				
					71 6071				
					72 6070				
					73 6069				
					74 6068			CL	74 0 - 78 5' Cuttings CLAY moderate brown (5YR 4/4), sandy, silty, subplastic, damp
					75 6067				
					76 6066				
				NA /4 5	77 6065				
					78 6064			CLAYSTONE	Top of Bedrock 78 5 - 81 0' Cuttings Claystone light brown (5YR 5/6), silty, damp
					79 6063				
				NA /2 5	80				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER DB	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86	

REMARKS CASING DRIVER NOTE AGI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Cave from TD to 8 5'

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OK	100% OK	100%	6062	80				
					6061	81			SILTSTONE	81 0 - 94 0' Cuttings Siltstone light olive brown (5YR 5/6), minor claystone, damp
					6060	82				NOTE No water encountered while drilling
					6059	83				
					6058	84				
					6057	85				
					6056	86				
					6055	87				
				NA /13	6054	88				
					6053	89				
						90				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 94	GROUND ELEVATION (FT)	6142 29	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748575	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	T GULLIVER	51-86
EAST	2076136	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/22/86	

REMARKS CASING DRIVER NOTE AGI DID NOT LOG THIS WELL THIS IS A HYDRO-SEARCH, INC LOG
Cave from TD to 8 5'

CHEMICAL SAMPLE / GRADATIONAL SA / SAMPLE NUMBER

SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0% 50% 100%	0% 100%		6052	90				
			6051	91				
			6050	92				
			6049	93				
			6048	94				
			6047	95				
			6046	96				
			6045	97				
			6044	98				
			6043	99				
				100				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE / GRADATIONAL SA / DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) / DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	OX	SOIL	100% OX	100%	0/10				NO SAMPLE

6142 6141 6140 6139 6138 6137 6136 6135 6134 6133

0 2 5 7 8 10

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT) 6142 22	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE / GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6132	10			NO SAMPLE	
					6131	11				
					6130	12				
					6129	13				
					6128	14				
				0 /10	6127	15				
					6126	16				
					6125	17				
					6124	18				
					6123	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT) 6142 22	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	52-86
EAST	2076132	LOCATOR NUMBER DB	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/20/86	
REMARKS	Casing Driver/NC Core				

CHEMICAL SAMPLE GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6122	20				NO SAMPLE
					6121	21				
					6120	22				
					6119	23				
					6118	24				
				0/10	6117	25				
					6116	26				
					6115	27				
					6114	28				
					6113	29				
						30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154		GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11
NORTH	748607	AREA BUFFER WEST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA
EAST	2076132	LOCATOR NUMBER	DB	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86
REMARKS	Casing Driver/NC Core						

LOG OF BORING NUMBER

52-86

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6112	30				NO SAMPLE
					6111	31				
					6110	32				
					6109	33				
					6108	34				
				8 /18	6107	35				
					6106	36				
					6105	37				
					6104	38				
					6103	39				
						40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	52-86
EAST	2076132	LOCATOR NUMBER	DB	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMP/ GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OK		SOIL	LOOK OK	LOOK	6102	40				NO SAMPLE
					6101	41				
					6100	42				
					6099	43				
					6098	44				
				0 /10	6097	45				
					6096	46				
					6095	47				
					6094	48				
					6093	49				
						50				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL, GRAIN GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OK	100% OK	100%	0 /10				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMP GRADATIONAL !	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6082	60			NO SAMPLE	
					6081	61				
							12/11/86			
					6080	62				
					6079	63				
					6078	64				
				8 /10	6077	65				
							12/15/86			
					6076	66				
					6075	67	12/12/86			
					6074	68				
					6073	69				
						70				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL, GRAIN SIZE & GRADATIONAL ANALYSIS	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OR	100% OR	100%	6072				NO SAMPLE
					6071				
					6070				NO SAMPLE Top of Bedrock
				0/8	6069				
					6068				
					6067				
					6066				
					6065				
					6064				SILTY CLAYSTONE Dk yellowish orange to very pale orange, mod weathered, mod friable, evidence of tilted layered bedding but core too broken to measure angle accurately, trace carb material
					6063				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154		GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11
NORTH	748607	AREA BUFFER WEST		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA
EAST	2076132	LOCATOR NUMBER	08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86

REMARKS Casing Driver/NC Core

LOG OF BORING NUMBER

52-86

CHEMICAL SAMP GRADATIONAL DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT)

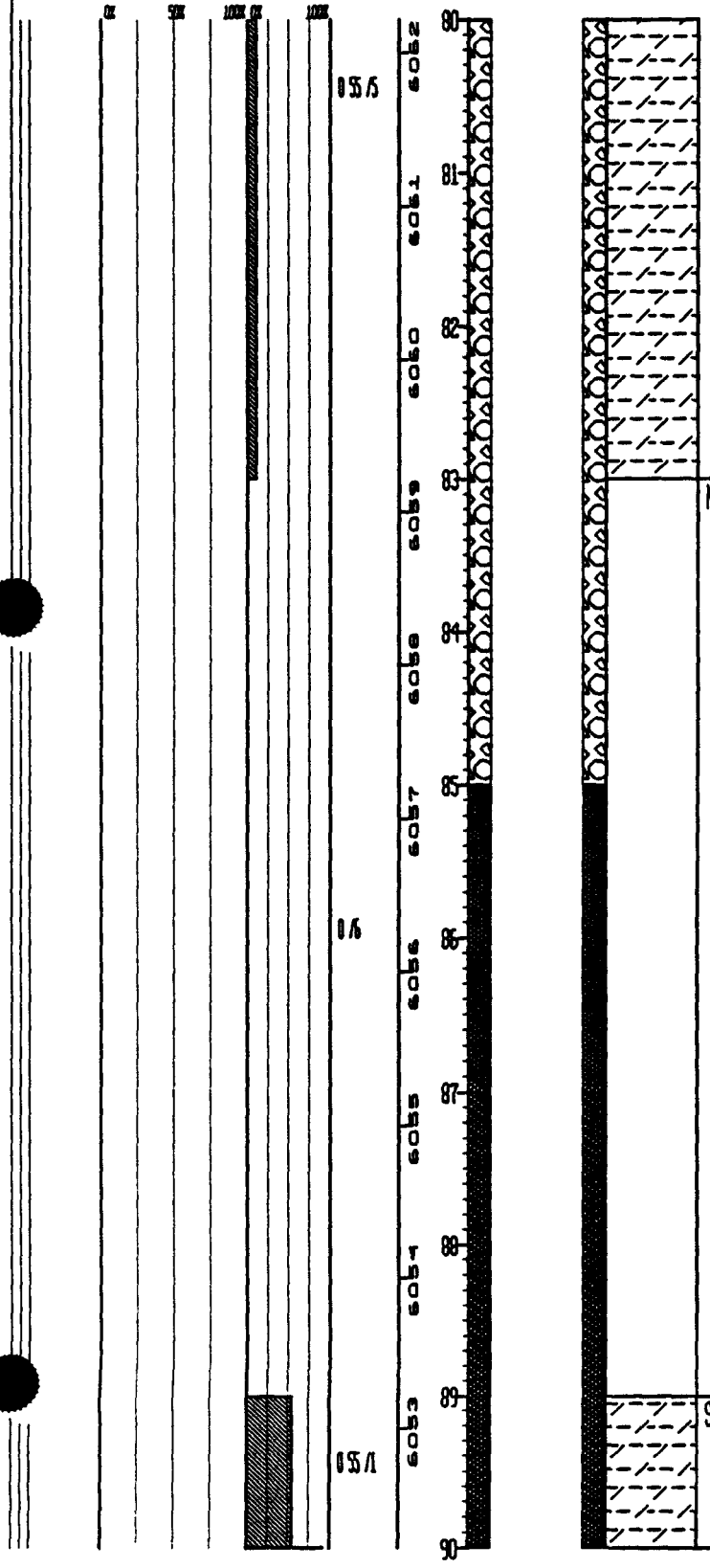
DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



NO SAMPLE

SILTY CLAYSTONE Very pale orange to dk yellowish orange (10YR 8/2 to 6/6), moderately weathered, slightly to moderately friable, black dendritic mineralization common, possibly Mg staining, bedding not evident

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPL GRADATIONAL S TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

DATUM (FT) DEPTH (FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
1 05/2	6052	90	SILTY CLAYSTONE	Very pale orange (10YR 8/2) to dark yellowish orange (10YR 6/6), bedding not evident, moderately weathered, slightly to mod friable, dendritic mineralization common, possibly Mg, weathering indicates possible tilted bedding 30 to 40 degrees from horiz
	6051	91		
1/1	6050	92	SILTY CLAYSTONE	Same as above, color change to very pale orange and dk yellowish orange (10YR 7/4 to 8/2), very silty at top of interval, less black mineralization (now trace)
0 65/0 69	6049	93	SILTY CLAYSTONE	Same as above, color very pale orange and dark yellowish orange (10YR 8/2 and 6/6), less silt, more black mineralization
1 1/1	6048	94	SILTY CLAYSTONE	Same as above, fractures have some distinctive dendritic mineralization (black) again
	6047	95	NO SAMPLE	
0/3 3	6046	96		
	6045	97		
0 4/1	6044	98	CLAYSTONE	Very pale orange to dk yellowish orange (10YR 8/2 to 6/6), mod weathered, mod friable, bedding not evident, heavy mineralization (possibly Mg as above) in fractures, trace of silt
	6043	99	CLAYSTONE	As above, becoming silty toward bottom, color change to pinkish gray (5YR 8/1), weathering indicates possible tilted bedding (40 degrees)
		100		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE GRADATIONAL SA TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 55/2.5; 0 4/5; 0/2; 0 7/3

DATUM (FT): 6042, 6041, 6040, 6039, 6038, 6037, 6036, 6035, 6034, 6033

DEPTH (FT): 100, 101, 102, 103, 104, 105, 106, 107, 108, 109, 110

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

SANDSTONE — Very lt gray (N8), mod weathered, non-friable, bedding appears layered but not clear, sand fine to med grained, well sorted

NO SAMPLE

SILTY CLAYSTONE — Predominantly grayish orange (10YR 7/4), moderately weathered, slightly friable, bedding appears tilted approx 40 degrees, trace of iron staining (may be from drilling process)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	

REMARKS Casing Driver/NC Core

SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	OX	100% OX	100% 07/3	6032	110				
				6031	111				
			03/05	6030	112			SILTY CLAYSTONE	Grayish orange (10YR 7/4), mod weathered, slightly friable from weathering, bedding appears tilted at approx 50 degrees
				6029	113			SILTY CLAYSTONE	Same as above, color change to yellowish orange (5Y 8/1) and dk yellowish orange (10YR 6/6) (Yellowish orange may be iron staining) Trace carb material
			05/2.5	6028	114				
				6027	115			SILTY CLAYSTONE	Same as above, tilted bedding
			11/15	6026	116			SILTY CLAYSTONE	Same as above, bedding not evident mod weathered, moderately friable
			15/2	6025	117				
A7			19/2	6024	118			SANDSTONE	Very pale orange to grayish orange (10YR 8/2 to 7/4), slightly to mod weathered, slightly friable, layered bedding tilted to approx 50 degrees, VFG sand, some clay, trace black carb material
				6023	119				
					120				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT) 6142 22	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0 9/3	6022 6021 6020	120 121 122			SANDSTONE	Very pale orange to grayish orange (10YR 8/2 to 7/4), moderately weathered, mod friable, layered bedding, VFG sand, some silt, trace clay
			0 7/1	6019	123			SILTSTONE	Very pale orange to grayish orange (10YR 8/2 to 7/4), mod weathered, slightly friable, layered bedding, tilted to 50 degrees, have one healed fracture approx 27 degrees (opposite bedding angle), some iron staining and black mineralization, some VFG sand
GCE91			1.7/2	6018 6017	124 125			SILTSTONE	Same as above
			1 5/2	6016 6015	126 127			SILTSTONE	Same as above
				6014 6013	128 129 130			SILTSTONE	Same as above, begins grading to siltstone, olive gray (5Y 4/1), layered with the above siltstone through this interval

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT) 6142 22	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN) 5 5/8	DATE DRILLED 11/20/86	

REMARKS Casing Driver/NC Core

CHEMICAL SAMP GRADATIONAL S TH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL

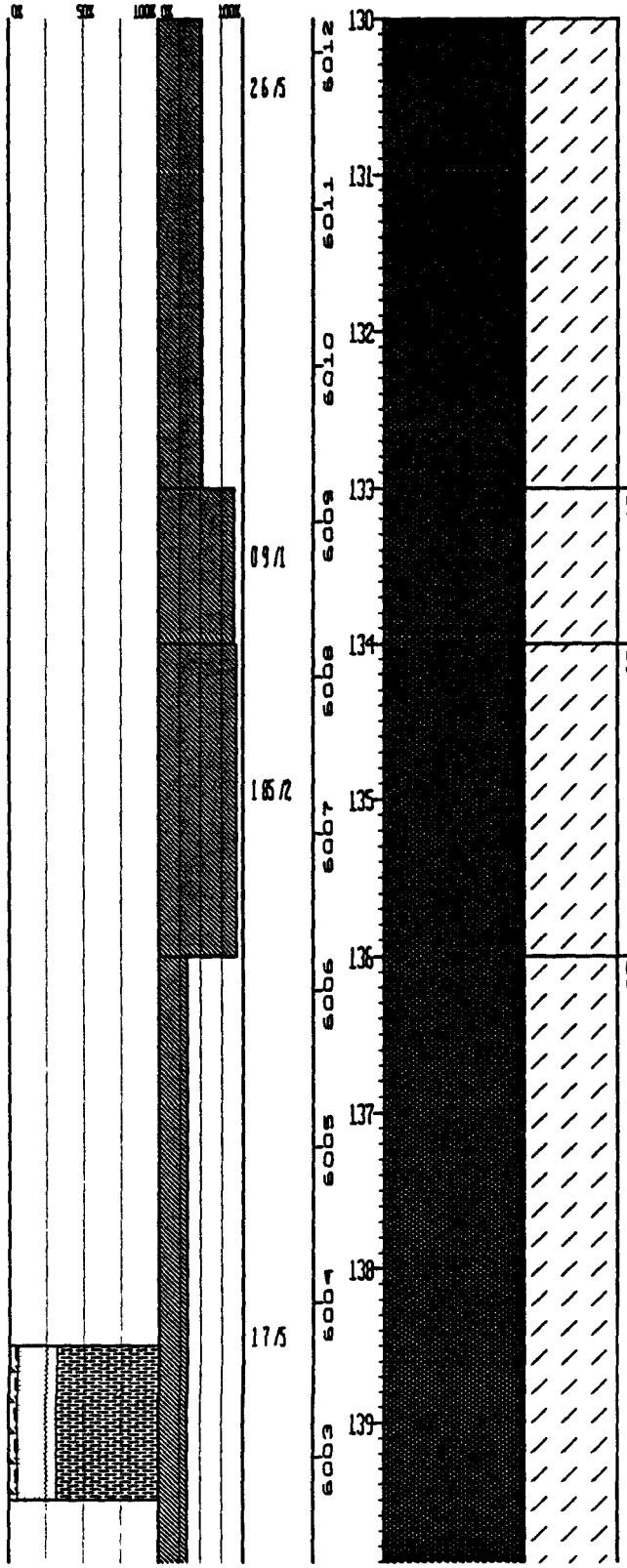
DATUM(FT) DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTSTONE	Olive gray (5Y 5/1), mod weathered, slightly friable, interval too broken up to determine bedding, some black carb material, leaf prints visible
SILTSTONE	Same as above, layered bedding 50 degree tilt, some dk yellowish brown coloring (10YR 6/6) at bottom of interval
SILTSTONE	Olive gray (5Y 4/1) and very lt gray (N8), slightly to mod weathered, slightly friable, tilted layered bedding, very FG sand in thin layers with the silt, some black carb material, sand layers are calcitic

I92

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMP GRADATIONAL S | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
	140		
	141	SILTSTONE	With VFG siltstone layers, olive gray (5Y 4/1) and very lt gray (N8), mod weathered, slightly friable, bedding in layers, not as distinct as upper intervals, some soft sed deformation, trace carb material
1.5/2	142		
	143	SILTSTONE	Same as above, less VFG sand, some discoloration in matrix, grayish orange (10YR 7/4)
1.75/1.5	144		
0.5/0.5		SILTSTONE	Olive gray (5Y 4/1), slightly weathered, slightly friable, bedding not evident, trace carb material, some VFG sand
	145	SILTSTONE	Same as above
1.4/1.5	146		
		SILTSTONE	Same as above
	147		
0.8/2.5	148		
	149	SILTSTONE	Same as above, bedding not evident, some dk yellowish brown discoloration (10YR 6/6)
0.8/1	150		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 154	GROUND ELEVATION (FT)	6142 22	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748607	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	52-86
EAST	2076132	LOCATOR NUMBER 08	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	11/20/86	
REMARKS	Casing Driver/NC Core						

CHEMICAL SAMPLE GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1 5/2; 0 9/2

DATUM (FT) 5992 5991 5990 5989 5988 5987 5986 5985 5984 5983

DEPTH (FT) 150 151 152 153 154 155 156 157 158 159 160

WELL OR PIEZOMETER CONSTRUCTION

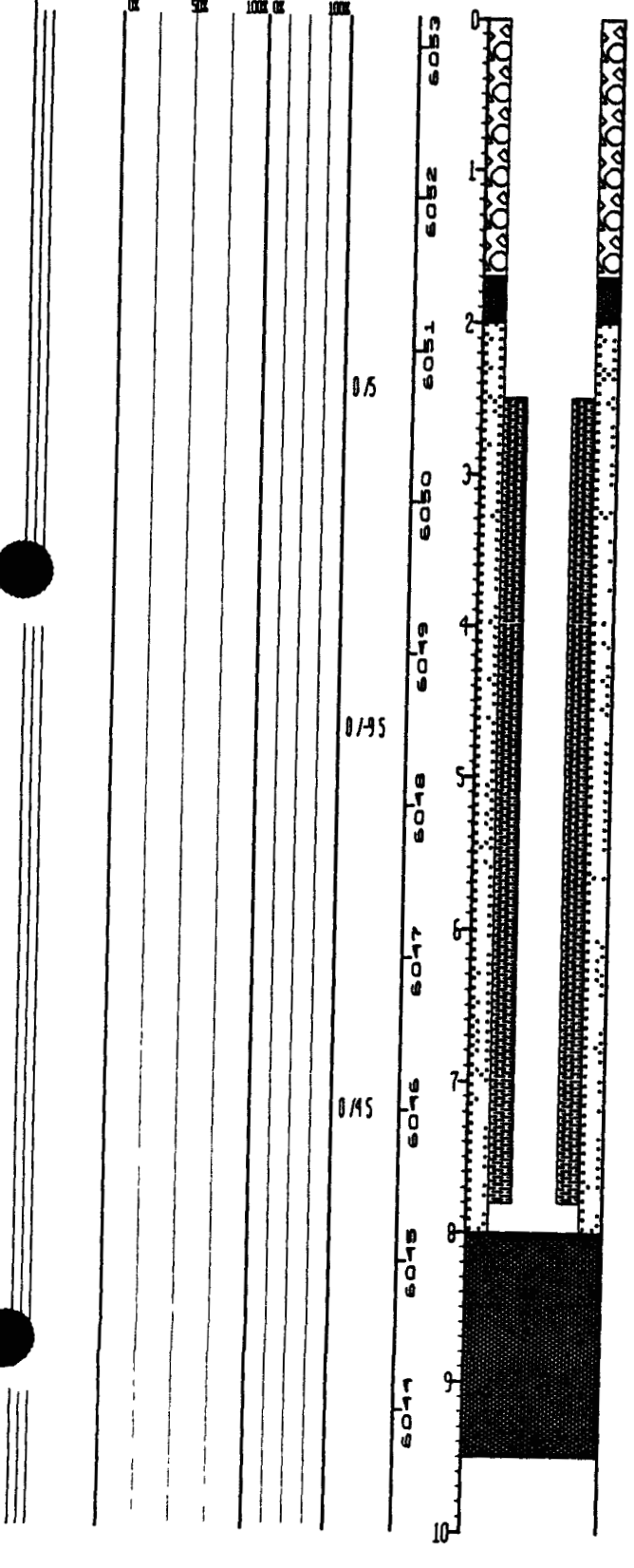
LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTSTONE	Olive gray (5Y 4/1), slightly weathered, slightly friable, some VFG sand, trace carb material, bedding not evident
SILTSTONE	Same as above, very well defined highly cabonaceous area at bottom of interval, brownish black (5YR 2/1), bedding still appears to be dipping steeply

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 9 5	GROUND ELEVATION (FT)	6053 2	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745998	AREA BUFFER WEST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	N/A	53-86
EAST	2078065	LOCATOR NUMBER I5	BOREHOLE DIAMETER (IN)	5 5/8	DATE DRILLED	10/29/86	

REMARKS Well construction is the only information available for this well

No water encountered during drilling



STATE PLANE COORDINATE		TOTAL DEPTH (FT)	89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST		CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078320	LOCATOR NUMBER	F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

CRITICAL DEPT GRADATIONAL 6	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50%	100% 0% 100%	0 /10	6094 6095 6096 6097 6098 6099 6100 6101 6102 6103	0 1 2 3 4 5 6 7 8 9 10				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078320	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

CHEMICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6093	10			NO SAMPLE	
					6092	11				
					6091	12				
					6090	13				
					6089	14				
				0 /10	6088	15				
					6087	16				
					6086	17				
					6085	18				
					6084	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT) 6103 39	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST	CASING DIAMETER (IN) 0	GEOLOGIST DCB	54-86
EAST	2078320	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				6083	20			NO SAMPLE	
				6082	21				
				6081	22				
				6080	23				
				6079	24				
			0 /10	6078	25				
				6077	26				
				6076	27				
				6075	28				
				6074	29				
					30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078320	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

CHEMICAL SAMPLE GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					6073	30			NO SAMPLE	
					6072	31	09/22/86			
					6071	32				
					6070	33				
					6069	34				
				0 /10	6068	35				
					6067	36			NO SAMPLE	Top of Bedrock
					6066	37				
					6065	38				
					6064	39				
						40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745291	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078020	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cove from TD to 89 60' Built well in NC rods, no centralizers used

CHEMICAL GRAIN GRADATIONAL 6	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				0 /10 6	6063 6062 6061 6060 6059 6058 6057 6056 6055 6054	40 41 42 43 44 45 46 47 48 49 50				NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST		CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078320	LOCATOR NUMBER	F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	CX SIX	100% CX 100%	5/5	6053 6052 6051 6050 6049 6048 6047 6046 6045 6044	50 51 52 53 54 55 56 57 58 59 60			CLAYSTONE	Light gray (N7), bedding not apparent, weathered, slightly friable, iron stains occur locally and on partings
			3 9/3 9					CLAYSTONE	Color grades grayish orange (10YR7/4) at approx 56 ft, highly weathered zone at approx 57 - 57 4 ft, dark yellowish brown (10YR5/4) with small light colored xtalline deposits Slickensides at approx 59 ft, attitude approx 80 degrees
								CLAYSTONE	Same as above

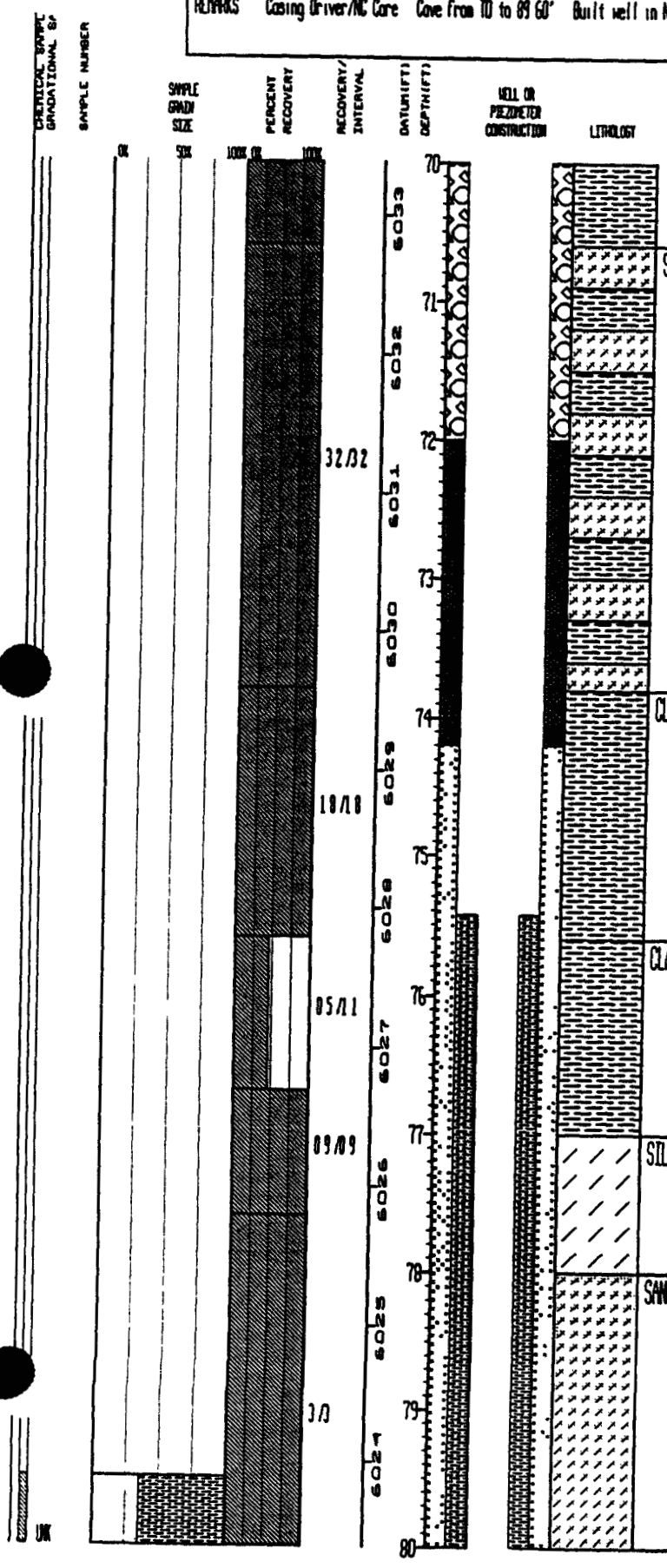
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078320	LOCATOR NUMBER FS	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			11/11	6043	60				
					61			CLAYSTONE	Mottled grayish orange (10YR7/4) to light gray (N7), bedding not apparent, weathered, slightly friable, iron staining locally and on partings, slight s fraction Slickensides at approx 60 2 ft, attitude approx 70 degrees Sm bodies of calcareous mineralization at approx 62 5 ft Increase in silt fraction from approx 64 ft to approx 65 8 ft Two ferric concretions at approx 65 6 ft approx 4 5 cm diam
				6042	62				
				6041	63				
			5/5	6040	64				
				6039	65				
				6038	66				
				6037	67			CLAYSTONE	Same as above
			31/31	6036	68				
				6035	69			CLAYSTONE	Med light gray (N6), bedding not apparent (massive?), slightly friable, occasional iron stains, slight silt fraction
			19/19	6034	70				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078320	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cave from TD to 89 60' Built well in NC rods, no centralizers used

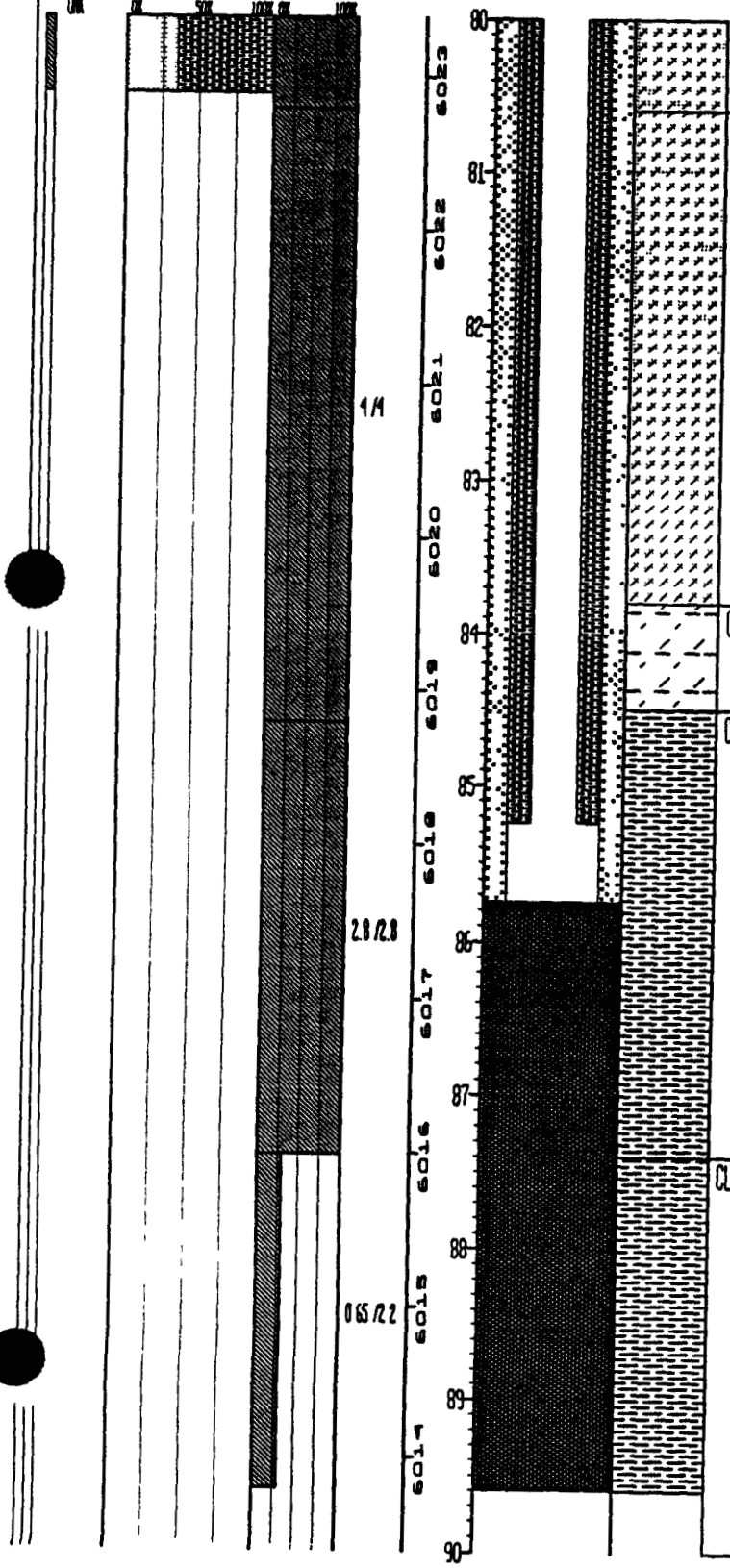


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SANDY SILTSTONE	Light gray (N7), thin bedded (where apparent), slightly friable, moderate VFG sand fraction, iron staining on fractures and some strata Interbedded with claystone at 71 5 ft, light gray (N7), bedding not apparent, slightly friable, moderate silt fraction, occasional iron staining Interbedded with sandy siltstone at 72 ft light gray (N7), bedding not apparent, slightly friable, moderate VFG sand fraction, local iron staining Interbedded with silty claystone at 72 6 ft, light gray (N7), bedding not apparent, slightly friable, occasional iron staining
CLAYSTONE	Light gray (N7), bedding not apparent, slightly friable, iron staining locally and on partings, slight silt fraction
CLAYSTONE	Same as above
SILTSTONE	Light gray (N7), bedding is faint but appears to be thin (< 2 mm) and horizontal, slightly friable, slight VFG sand component as interfingering beds
SANDY SILTSTONE	Light gray (N7), thin bedded (< 2 mm), roughly horizontal with soft sediment deformation, slightly friable, VFG sand occurs as individual strata occasional iron stain and carb mineralization

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 89 6	GROUND ELEVATION (FT)	6103 39	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745294	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	DCB	54-86
EAST	2078020	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/22/86	

REMARKS Casing Driver/NC Core Cove from TD to 89 60' Built well in NC rods, no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SA | SAMPLE NUMBER | SAMPLE GRAIN SIZE | PERCENT RECOVERY | RECOVERY/ INTERVAL | DATUM(FT) | DEPTH(FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



SANDY SILTSTONE Same as above

CLAYEY SILTSTONE Light gray (N7), thin bedded (< 2 mm), slightly friable, occasional iron staining

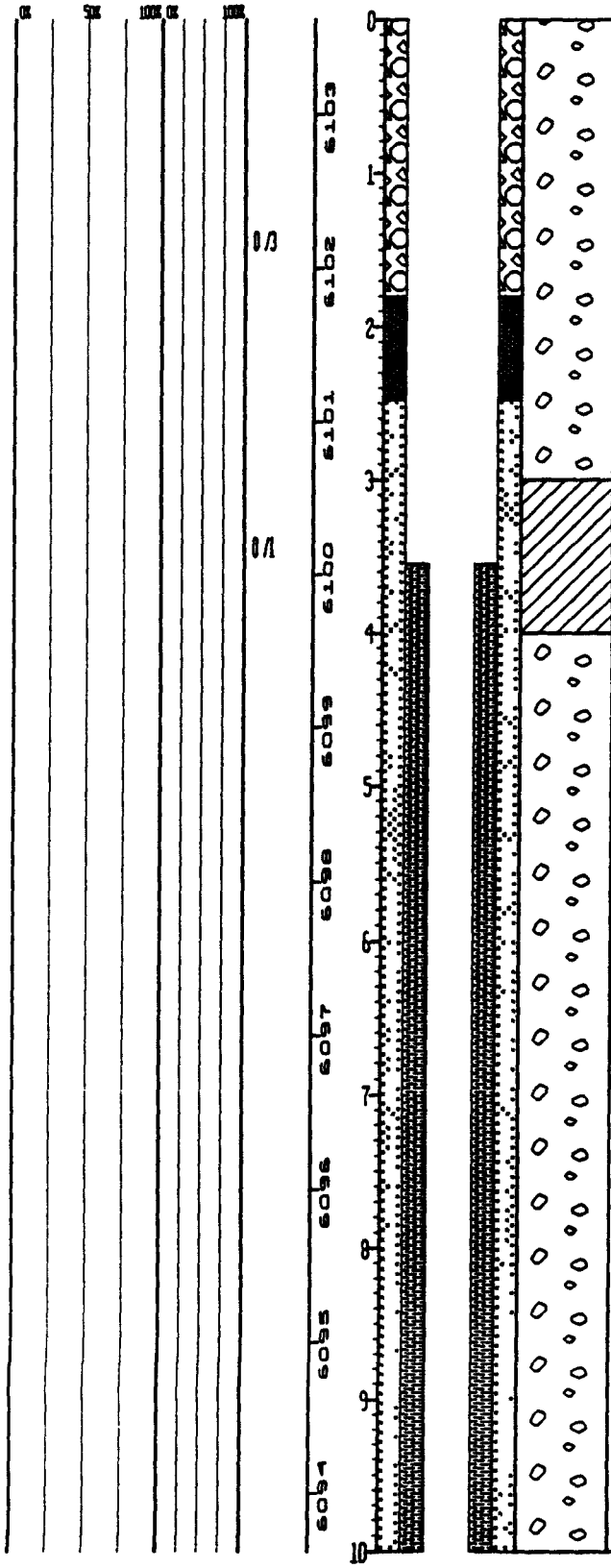
CLAYSTONE Light gray (N7), bedding not apparent to thin (< 2 mm) where observable, slightly friable, slight to moderate silt fraction, local iron staining

CLAYSTONE Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	36 5	GROUND ELEVATION (FT)	6103 62	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745261	AREA BUFFER WEST		CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	55-86
EAST	2078021	LOCATOR NUMBER	F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/29/86	

REMARKS Casing Driver Note Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPL
GRADATIONAL SA
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM(FT)
DEPTH(FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION



GP	0 - 3 0' Cuttings Boulders quartzite, dry (Description should be Gp/Gw)
CL	3 0 - 4 0' Cuttings Clay light brown (5YR 5/4), silty, semi-plastic, unconsolidated, damp
GP	4 0 - 26 0' Cuttings Gravel moderate brown (5YR 4/4), granite and quartzite pebbles, cobbles and boulders with coarse to very fine grained sand, poorly sorted, unconsolidated, damp

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	36 5	GROUND ELEVATION (FT)	6103 62	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	74526 1	AREA BUFFER WEST		CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	55-86
EAST	2078021	LOCATOR NUMBER	F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/29/86	

REMARKS Casing Driver Note Not logged by NSI Information from Hydro-Search, Inc log

CHEMICAL SAMPL
GRADATIONAL BY

SAMPLE NUMBER

SAMPLE GRAIN SIZE

PERCENT RECOVERY

RECOVERY/ INTERVAL

DATUM(FT)

DEPTH(FT)

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

0% 50% 100% 0% 100%

0 /12

6093 6092 6091 6090 6089 6088 6087 6086 6085 6084

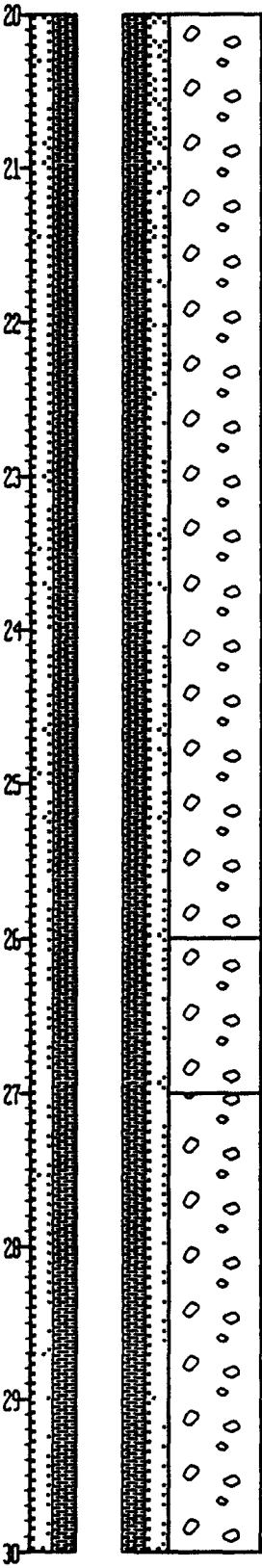
10 11 12 13 14 15 16 17 18 19 20

06/08/87

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 36 5	GROUND ELEVATION (FT) 6103 62	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	745261	AREA BUFFER WEST	CASING DIAMETER (IN) 0	GEOLOGIST T GULLIVER	55-86
EAST	2078321	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/29/86	

REMARKS Casing Driver Note Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE 0% 50% 100% | PERCENT RECOVERY 0% 100% | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

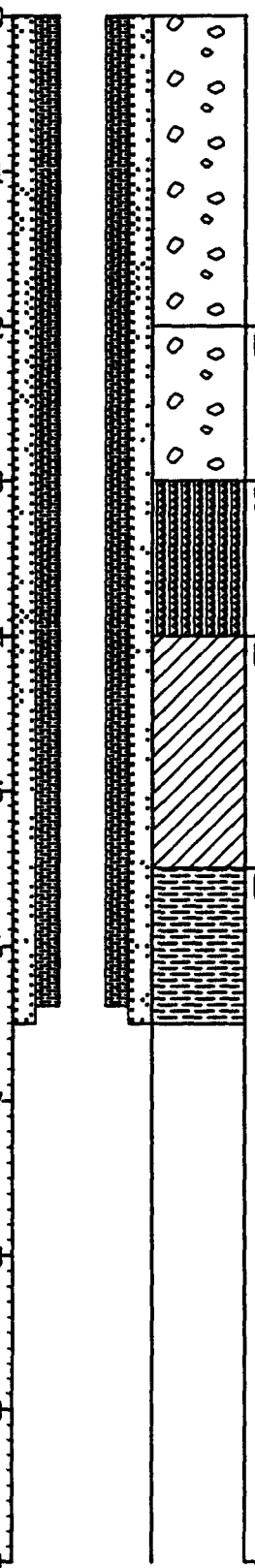


Depth (ft)	Recovery/Interval	Datum (ft)	Unified Soils Classification or Rock Type	Description
26	0/1	6077	GP	26 0 - 27 0' Cuttings Gravel moderate brown (5YR 4/4), granitic pebbles and cobbles with very fine grained silty sand, poorly sorted, unconsolidated, damp
27	0/5	6074	GP	27 0 - 32 0' Cuttings Boulders granitic and quartzite, damp (Description should be Gp/Gw)

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 36 5	GROUND ELEVATION (FT)	6103 62	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	745261	AREA BUFFER WEST	CASING DIAMETER (IN)	0	GEOLOGIST	T GULLIVER	55-86
EAST	2078321	LOCATOR NUMBER F5	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/29/86	

REMARKS Casing Driver Note Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



Recovery/Interval	Depth (ft)	Unified Soils Classification or Rock Type	Description
	30–32		
0/1	32–33	GP	32 0 - 33 0' Cuttings Boulder granitic, damp (Description should be Gp/Gw)
0/1	33–34	SM	33 0 - 34 0' Cuttings Sand pale yellowish brown (10 YR 5/2) to pale brown (5YR 5/2), very fine grained to very coarse grained, silty, poorly sorted, rounded, damp
0/1 5	34–35	CL	34 0 - 35 5' Cuttings Clay moderate brown (10YR 4/4), sandy, very fine grained, quartzite, gravel at base, plastic, moist
0/1	35–36	CLAYSTONE	35 5 - 36 5' Cuttings Claystone light olive gray (5Y 5/2) and dusky yellow (5Y 6/4), silty, plastic, moist NOTE No water encountered during drilling

Depth scale: 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40

Datum (ft): 6073, 6072, 6071, 6070, 6069, 6068, 6067, 6066, 6065, 6064

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17	GROUND ELEVATION (FT) 5977 16	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	741073	AREA BUFFER SOUTH	CASING DIAMETER (IN)	GEOLOGIST T GULLIVER	56-86
EAST	2080208	LOCATOR NUMBER W7	BOREHOLE DIAMETER (IN)	DATE DRILLED 09/26/86	

REMARKS Casing Driver Note Not logged by ASE Information from Hydro-Search, Inc log

CHEMICAL &/OR GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SIZE	100% OR	100%	5977	0			GP	0 - 7 0' Cuttings Boulders granite and quartzite. (1% sand. dry (Description should be gp/gw)
				0/1	5976	1				
					5975	2				
					5974	3				
					5973	4				
					5972	5				
					5971	6				
					5970	7			ML	7 0 - 9 0' Cuttings Silt moderate brown (5YR 3/4), clayey, sandy, poorly sorted, unconsolidated, non-plastic, moist
				0/2	5969	8				
				0/1	5968	9			CLAYSTONE	9 0 - 10 0' Cuttings Claystone light olive gray (5Y 5/2) to moderate brown (5YR 4/4), plastic, moist
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17	GROUND ELEVATION (FT)	5977 16	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747073	AREA BUFFER SOUTH	CASING DIAMETER (IN)		GEOLOGIST	T GULLIVER	56-86
EAST	2080208	LOCATOR NUMBER H7	BOREHOLE DIAMETER (IN)		DATE DRILLED	09/26/86	

REMARKS Casing Driver Note Not logged by ASI Information from Hydro-Search, Inc log

CHEMICAL SAMPLE GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					5967	10			SILTSTONE	10 0 - 17 0' Cuttings Light olive gray (5Y 5/2) to moderate brown (5YR 4/4), well sorted, dry
					5966	11				
					5965	12				
					5964	13				
				0/7						
					5963	14				
					5962	15				
					5961	16				
					5960	17				
					5959	18				
					5958	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 12	GROUND ELEVATION (FT)	5950 77	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747559	AREA BUFFER SOUTH	CASING DIAMETER (IN)	0	GEOLOGIST	LAM	57-86
EAST	2081572	LOCATOR NUMBER 17	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/15/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOIL	100% OR	0/6	5950	0				NO SAMPLE
					5949	1				
						2				
					5948	3				
					5947	4				
					5946	5				
					5945	6				
					5944	7				SILTY CLAYSTONE Top of Bedrock Dark yellowish orange (10 YR 6/6) and yellowish gray (mottled) Est plasticity as moderate, some VFG to VCG sand and gravel toward top of interval
				18/3	5943	8				
					5942	9				SILTY CLAYSTONE Lt olive gray to grayish orange (10 YR 7/4), est plasticity low to moderate, trace carbonaceous material, trace CaCO3 towards bottom of interval
					5941	10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	12	GROUND ELEVATION (FT)	5958 77	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747559	AREA BUFFER SOUTH		CASING DIAMETER (IN)	0	GEOLOGIST	LAM	57-86
EAST	2081572	LOCATOR NUMBER	I7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/15/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE DEPTH
GRADATIONAL SIZE
SAMPLE NUMBER
SAMPLE GRAIN SIZE
PERCENT RECOVERY
RECOVERY/ INTERVAL
DATUM(FT)
DEPTH(FT)
WELL OR PIEZOMETER CONSTRUCTION
LITHOLOGY
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE
DESCRIPTION

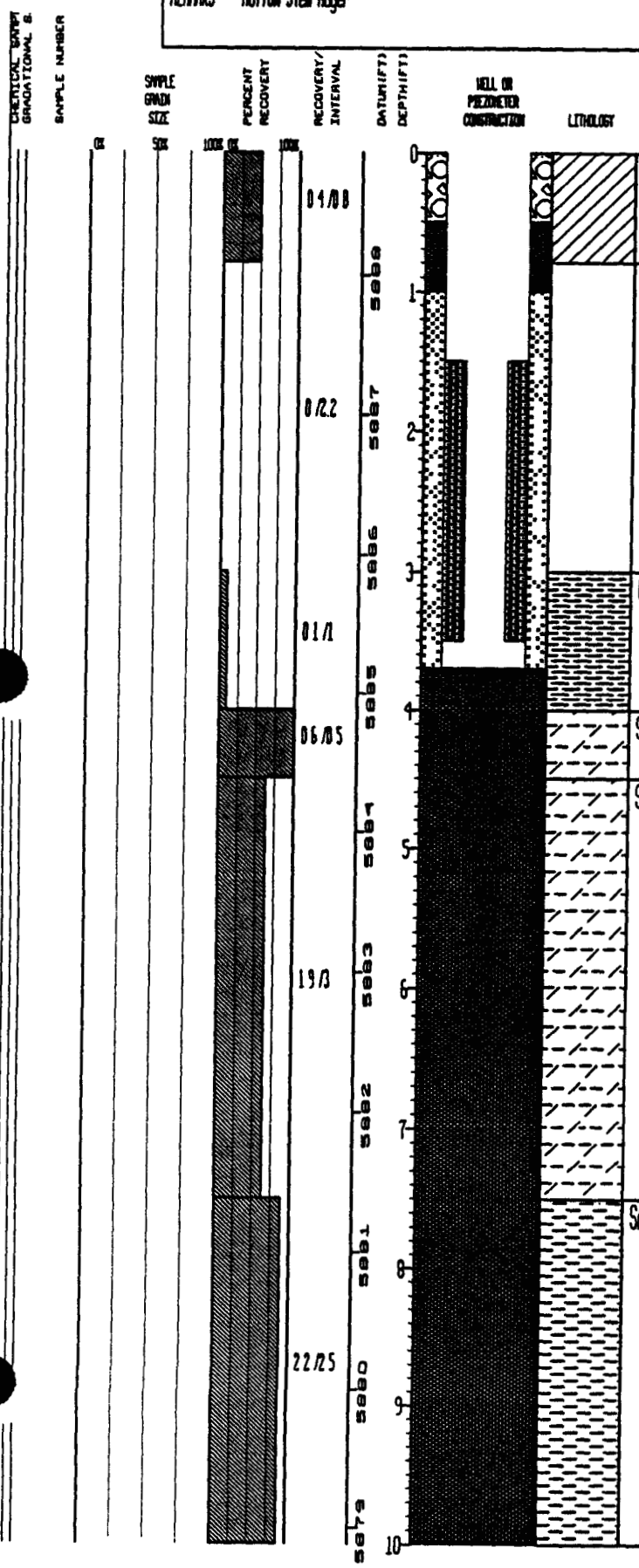
0% 50% 100% 0% 100%

36/3

5940 5939 5938 5937 5936 5935 5934 5933 5932 5931

10 11 12 13 14 15 16 17 18 19 20

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 10		GROUND ELEVATION (FT)	5888 89	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747104	AREA BUFFER SOUTH		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	58-86
EAST	2083423	LOCATOR NUMBER	K7	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/10/86	
REMARKS	Hollow Stem Auger							



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	SILTY CLAY, Dk yellowish brown (10 YR 4/2) Estim plasticity low to moderate, some sand VFG to coarse, some gravel Granules to 4cm subrounded Some surficial root material
NO SAMPLE	
CLAYSTONE	Top of Bedrock Lt olive gray (5 Y 6/1) to grayish orange (10 YR 7/4) Est plasticity moderate Some silt (Sample very small, difficult to describe)
SILTY CLAYSTONE	Yellowish gray (5 Y 8/1) Est plasticity moderate Trace CaCO3
SILTY CLAYSTONE	Same as above Some iron staining
SANDY CLAYSTONE	Pale yellowish brown (10 YR 6/2) Est plasticity low to moderate, Sand VFG to silt sized Some carb material Some iron staining Note No water encountered during drilling

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 32 5	GROUND ELEVATION (FT)	5914 32	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747772	AREA 881 HILLSIDE	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	59-86
EAST	2084257	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/22/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPL GRADATIONAL S/ | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 5/0 5	5914	0		CL	SILTY CLAY - dk yellowish brown (10YR 4/2) to dk yellowish orange (10YR 6/6), some grass and root material
1 1/1 5	5913	1		CH	Silty Clay - dark yellowish brown (10YR 4/2) to dark yellowish orange (10YR 6/6), some VFG sand, trace gravel (small), est plast, mod to high
1.7/3	5912, 5911, 5910	2, 3, 4		CL	SANDY CLAY - dark yellowish brown (6YR 6/2), est plasticity moderate, sand VFG, some silt, trace root material, matrix calcareous, some gravel
0 4/2.5	5909, 5908, 5907	5, 6, 7	09/22/86 ▽	CL	Same as above, some lt brown (5YR 5/6) coloring, matrix mildly calcareous
2 1/2 5	5906, 5905	8, 9, 10		SANDY CLAYSTONE	Top of Bedrock Same as above, color change grayish orange to dk yellowish orange (10YR 7/4 to 6/6), calcite stringers

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 32 5	GROUND ELEVATION (FT) 5914 32	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747772	AREA 881 HILLSIDE	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAA	59-86
EAST	2084257	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/22/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMPLE / GRADATIONAL / DEPTH | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION

Recovery/Interval	Datum (FT)	Unified Soils Classification or Rock Type	Description
	5904	SILTY CLAYSTONE	Yellowish gray to dk yellowish orange (10YR 7/4 to 10YR 6/6), est plast mod to high, some sand VFG to coarse
1 5/2.5	5903		
	5902		
0 6/0 5		SILTY CLAYSTONE	Same as above
	5901	SILTY CLAYSTONE	Same as above
0 6/2	5900		
	5899	CLAYSTONE	Pale yellowish brown (10YR 6/2), highly weathered, mod to highly friable, bedding not evident, some iron staining, some carb material, trace CaCO3
2/2.5	5898		
	5897		
		CLAYSTONE	Same as above
1 2/1 5	5896		
0 85/1	5895	SILTY CLAYSTONE	Yellowish gray to lt olive gray (5Y 6/1 to 5Y 8/1), highly weathered, mod friable, some iron staining, some darker gray areas (possibly more pure clay), trace carb material

Depth scale: 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	32 5	GROUND ELEVATION (FT)	5914 32	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747772	AREA	881 HILLSIDE	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	59-86
EAST	2094257	LOCATOR NUMBER	L7	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/22/86	
REMARKS	Hollow Stem Auger							

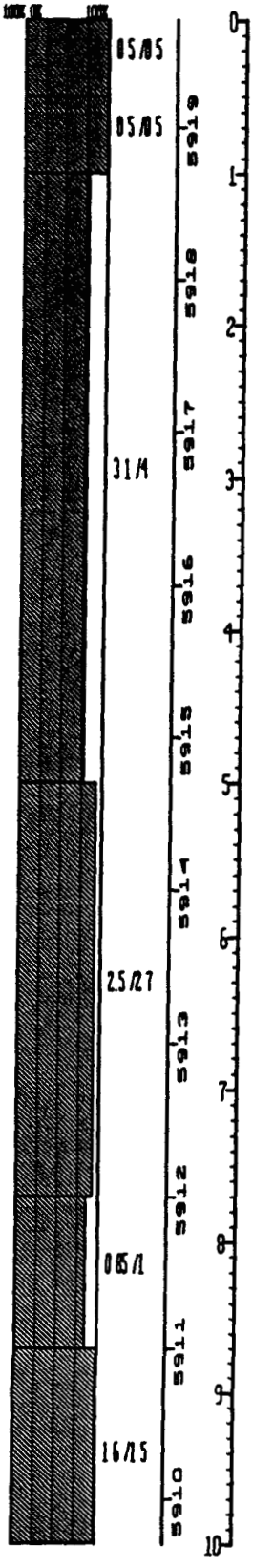
CHEMICAL, GRAIN GRADATIONAL, S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		CL SIL LOAM CL LOAM						SANDSTONE	Yellowish gray (5Y 8/1), mod to highly weathered, mod to highly friable, bedding not evident, some iron staining, trace carbonaceous material, some silt, sand VFG
LAMS				2.5/2.5	5914 5913 5912 5911 5910 5909 5908 5907 5906 5905 20 21 22 23 24 25 26 27 28 29 30			CLAYEY SILTSTONE	Pinkish gray (5YR 8/1) to dk yellowish orange (10YR 6/6), highly weathered, mod friable, bedding not evident, some iron staining, some CaCO3
				1.9/2.5				SANDSTONE	Yellowish gray (5Y 8/1), mod weathered, mod to highly friable, bedding not evident, some silt, mildly calcareous
				0.35/1.5				SILTY CLAYSTONE	Grayish orange to moderate yellowish brown (10YR 5/4) to (10YR 7/4), highly weathered, mod friable, some iron staining
				0.4/1				SILTY CLAYSTONE	Same as above, grading to claystone, lt brownish gray (5YR 6/1), highly weathered, mod friable, bedding not evident, some iron staining, some silt, trace carb material
				0.9/2.5					

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 32 5	GROUND ELEVATION (FT)	5914 32	PROJECT NUMBER	667 11	LOG OF BORING NUMBER	
NORTH 747772	AREA 881 HILLSIDE	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	59-86	
EAST 2084257	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/22/86		
REMARKS Hollow Stem Auger							

CHEMICAL SAMPLE / GRADATIONAL SAM	SAMPLE NUMBER	SIMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOIL	100% OR	100%		30			CLAYSTONE	Lt brownish gray (5YR 6/1), highly weathered, and friable, bedding not evident, some silt, some iron staining, trace carb material
				13/2.5	5881	31				
					5883	32				
					5882	33				
					5881	34				
					5880	35				
					5879	36				
					5878	37				
					5877	38				
					5876	39				
					5875	40				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37 7	GROUND ELEVATION (FT) 5919 7	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747758	AREA 881 HILLSIDE	CASING DIAMETER (IN) 0	GEOLOGIST LAA	60-86
EAST	2084294	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/19/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	SILTY CLAY, grayish brown (5 YR 3/2), Est plasticity low-moderate, Some gravel, granules to 2cm Some surficial grass, some root material, trace sand VFG to VCG
CL	Same as above
CL	SILTY SANDY CLAY, grayish brown (5 YR 3/2), Est plast low-mod, sand VFG to VCG, mod well graded, some gravel granules to 2 cm, some roots towards top Color change at approx middle of interval to mod yellowish brown (10 YR 5/4), less gravel, mod calcitic
CL	SANDY CLAY, grayish orange (10 YR 7/4), Est plasticity low-mod, VFG sand well sorted, some carb material, trace gravel at bottom
CL	SANDY GRAVELLY CLAY, grayish-orange (10 YR 7/4) to yellowish gray (5 Y 8/1) Est plast low-mod, sand VFG to VCG, gravel granules to 2cm
CL	CLAY, grayish-orange (10 YR 7/4) to yellowish gray (5 Y 8/1), and some dark yellowish orange (10 YR 6/6) Est plast mod, some sand, trace silt, trace gravel and trace carb material
CLAYSTONE	Top of Bedrock Grayish-orange (10 YR 7/4) to yellowish gray (5 Y 8/1), and some dark

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37 7	GROUND ELEVATION (FT)	5919 7	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747758	AREA 881 HILLSIDE	CASING DIAMETER (IN)	0	GEOLOGIST	LAM	60-86
EAST	2084294	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	09/19/86	

REMARKS Hollow Stem Auger

CHEMICAL SAMPLE GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
					10				yellowish orange (10 YR 6/6) Est plast mod, some sand, trace silt, trace gravel and trace carb material
				17/25	11			CLAYSTONE	Yellowish gray (5 Y 8/1) to dark yellowish orange (10 YR 6/6), Est plast mod, trace iron staining
				05/07	13			CLAYSTONE	Same as above
				13/18	14			CLAYSTONE	Lt olive gray (5 Y 6/1), highly weathered, mod friable, bedding not evident, some iron staining, some CaCO3 in areas
				19/25	16			CLAYSTONE	Same as above
				1/12	18			CLAYSTONE	Same as above, some silt, highly friable, less CaCO3
				14/13	19			CLAYEY SILTSTONE	Yellowish gray (5 Y 8/1) to dark yellowish orange (10 YR 6/6), highly weathered, mod friable, some iron-staining
					20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37 7	GROUND ELEVATION (FT) 5919 7	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747758	AREA 881 HILLSIDE	CASING DIAMETER (IN) 0	GEOLOGIST LAA	60-86
EAST	2084294	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/19/86	
REMARKS	Hollow Stem Auger				

CHEMICAL SAMPLE / GRADATIONAL SAMPLE / SAMPLE NUMBER: GCE210

SAMPLE GRAIN SIZE: 0% 50% 100%

PERCENT RECOVERY: 0% 100%

RECOVERY/INTERVAL: 1/0.5; 1.8/2; 2.6/2.5; 3/2.5; 1.9/2.5

DATUM (FT): 5899, 5898, 5897, 5896, 5895, 5894, 5893, 5892, 5891, 5890

DEPTH (FT): 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYEY SILTSTONE	Yellowish gray (5 Y 8/1) to dark yellowish orange (10 YR 6/6), highly weathered, mod friable, some iron staining
SILTSTONE	Yellowish-gray (5 Y 8/1), highly weathered, mod friable, bedding not evident, Some CaCO3, trace carb material
SILTSTONE	Same as above, with trace iron staining
SILTSTONE	Same as above, Some Clay
SILTY CLAYSTONE	Lt olive gray (5 Y 6/1) to gray yellowish orange (10 YR 6/6), highly to mod weathered, mod friable, bedding not evident, some iron staining in fractures, some carb material, trace CaCO3

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 37 7	GROUND ELEVATION (FT) 5919 7	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	747758	AREA 881 HILLSIDE	CASING DIAMETER (IN) 0	GEOLOGIST LAA	60-86
EAST	2084294	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN) 0	DATE DRILLED 09/19/86	
REMARKS Hollow Stem Auger					

CHEMICAL SAMPLE GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 1/1; 0 7/1 5; 2 5/2.5; 2 5/2 5

DATUM (FT) / DEPTH (FT): 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

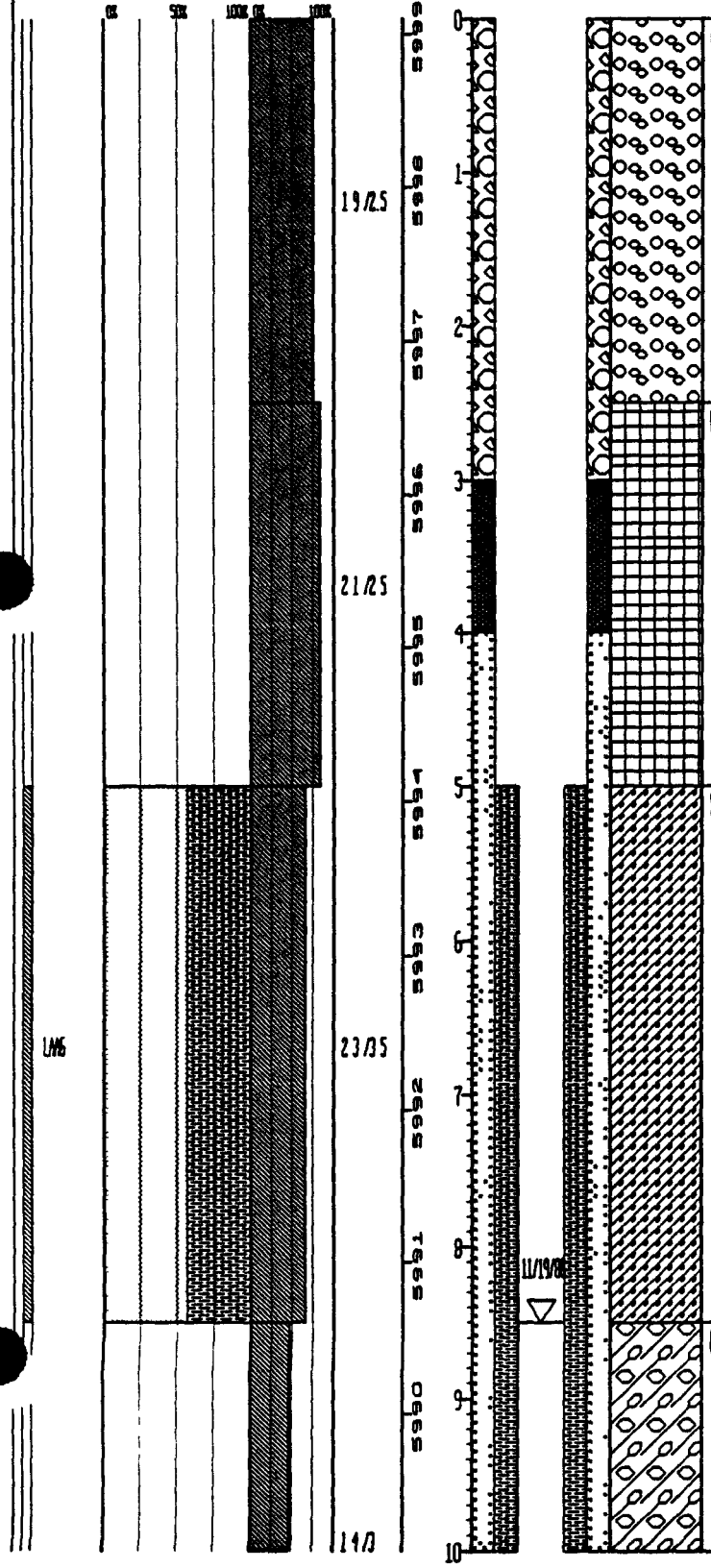
UNIFIED SOILS CLASSIFICATION OR ROCK TYPE

DESCRIPTION

Unified Soils Classification or Rock Type	Description
SILTY CLAYSTONE	Pale yellowish brown (10 YR 6/2), mod -highly weathered, mod friable, bedding not evident, heavy iron staining in fractures, some carb material in fractures, trace CaCO3
SILTY CLAYSTONE	Same as above with color change to light brownish gray (5 YR 6/1)
SILTY CLAYSTONE	Same as above, becomes very silty towards bottom
SILTY CLAYSTONE	Same as above NOTE No water encountered while drilling

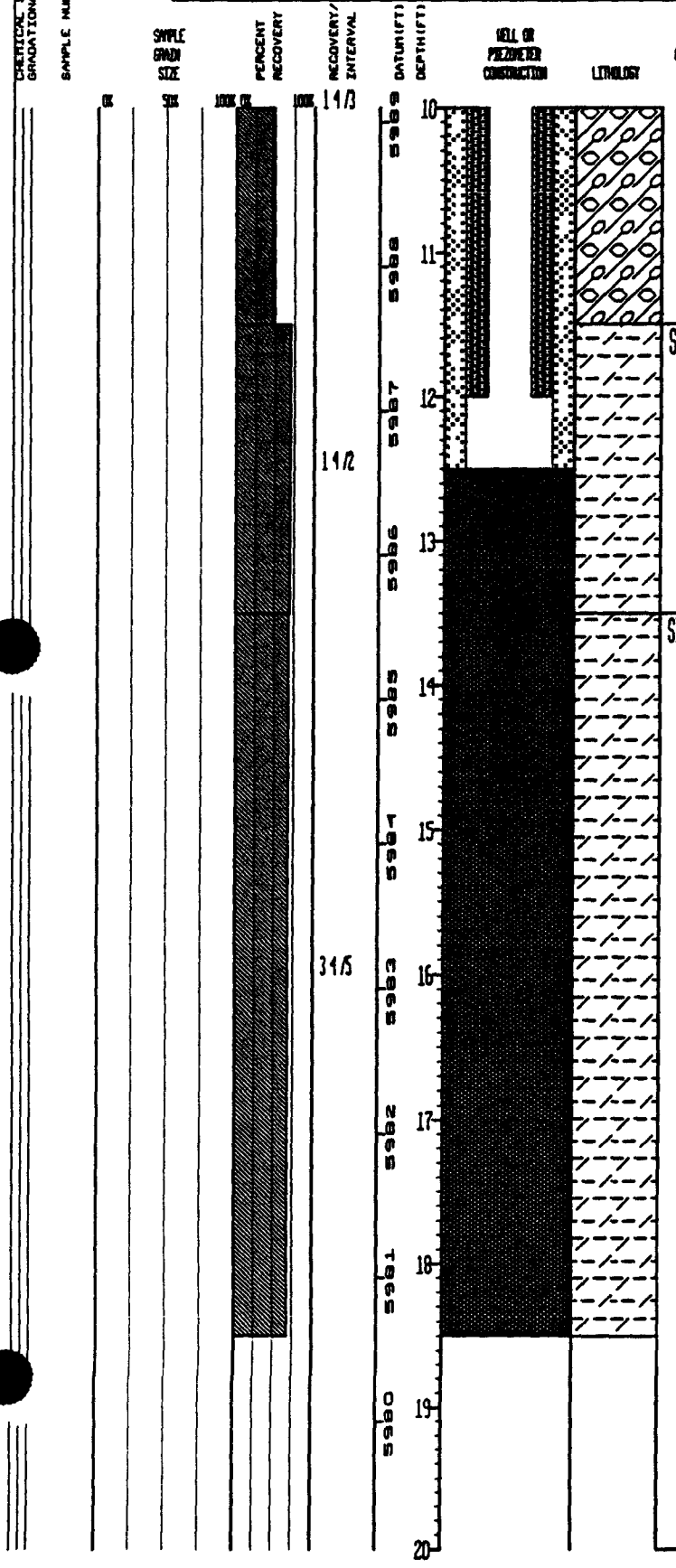
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 18 5	GROUND ELEVATION (FT)	5999 1	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749198	AREA 881 HILLSIDE	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	61-86
EAST	2083717	LOCATOR NUMBER K9	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/19/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE GRADATIONAL SAMPLE | SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
GW	SAND AND GRAVEL - pale yellowish brown (10YR 6/2) to lt olive gray (5Y 6/1), sand VFG to granules, well graded, sub-angular to sub-rounded Gravel angular to sub-angular, max size approx 3 cm, some silt, some asphalt, calcitic, trace grass and roots at surface, becomes gravelly caliche toward bottom, gravel larger to 6 cm
CALICHE	White (N9) and sandy clay, yellowish gray (5Y 8/1), plasticity (est) low to mod, some sand med grained to VCG, some iron staining
SC	Clayey Sand - yellowish gray (5Y 8/1) to olive gray (5Y 4/1) to dk yellowish orange (10YR 6/6), sand FG to VCG, sub-angular to rounded, mod well sorted, some gravel to 2 cm, sub-rounded, traces of asphalt, some areas calcitic
GC	Sandy Clayey Gravel - no predom gravel color, angular to sub-rounded, mod to well sorted, max size 5 5 cm, sand F to C grained, clay dk yellowish orange (10YR 6/6)

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	18 5	GROUND ELEVATION (FT)	5999 1	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749198	AREA	881 HILLSIDE	CASING DIAMETER (IN)	2 00	GEOLOGIST	LAM	61-86
EAST	2083717	LOCATOR NUMBER	K9	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	11/19/86	
REMARKS	Hollow Stem Auger							

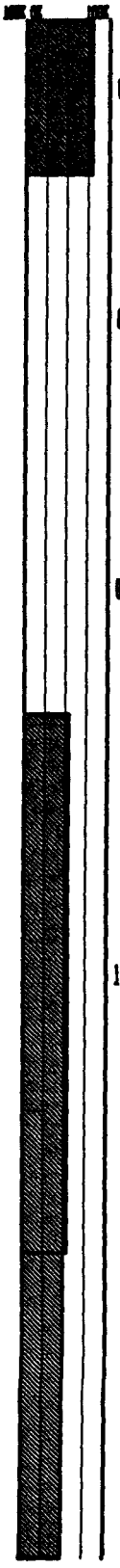


UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
SILTY CLAYSTONE	Top of Bedrock Grayish orange (10YR 7/4 to yellowish gray (5YR 8/1), est plasticity mod to high, trace sand VFG to coarse
SILTY CLAYSTONE	Grayish orange (10YR 7/4) to yellowish gray (5Y 8/1), highly weathered, mod friable, bedding not evident, some iron staining and carbonaceous material

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 30 5	GROUND ELEVATION (FT) 5993	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA- 881 HILSIDE	CASING DIAMETER (IN) 0	GEOLOGIST DAT	61-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED N/A	

REMARKS

CHEMICAL SAMPLE / GRADATIONAL SAMPLE NUMBER | SAMPLE GRAIN SIZE (0% 50% 100%) | PERCENT RECOVERY (0% 100%) | RECOVERY/INTERVAL | DATUM (FT) | DEPTH (FT) | WELL OR PIEZOMETER CONSTRUCTION | LITHOLOGY | UNIFIED SOILS CLASSIFICATION OR ROCK TYPE | DESCRIPTION



RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
0 8/1	5993	0	GC	Clayey Gravel - matrix color dk yellowish brown (10YR 4/2), angular to sub-angular, mod to well graded, max size = 4 5 cm, some sand, trace of calcite
	5992	1	NO SAMPLE	
0/2	5991	2		
	5990	3	NO SAMPLE	
0/1 5	5989	4		
	5988	5	CALICHE	Top of Bedrock Top 1 ft is caliche, bluish white 5B 9/1), trace of clay
1 9/3 5	5987	6		
	5986	7	CLAYSTONE	Very lt gray (N8), mod to high plast, some iron staining as mottles, trace of calcite
	5985	8	CLAYSTONE	As above, lt olive gray (5Y 6/1), abundant calcite in bottom 3 in of interval
	5984	9		
	5983	10		

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 30 5	GROUND ELEVATION (FT) 5993	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 881 WELLSIDE	CASING DIAMETER (IN) 0	GEOLOGIST DAT	61-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED N/A	

REMARKS

CHEMICAL SAMPLE / GRADATIONAL SA.	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
OR		SOR	LOOK OR	LOOK						
				2.5/5	5983	10				
					5982	11				
					5981	12				
					5980	13			CLAYSTONE	Lt olive gray (5Y 6/1), mod to high plast, iron staining as mottles, trac of calcite
				1.9/2.5	5979	14				
					5978	15				
					5977	16			CLAYSTONE	Same as above, trace of carb material
				1.8/2.5	5976	17				
					5975	18			CLAYSTONE	Same as above, iron staining in fractures, trace of silt
				0.9/1	5974	19			CLAYSTONE	Same as above, grayish yellow (5Y 8/4), trace of very fine grained sand
				0.8/1.5	5973	20				

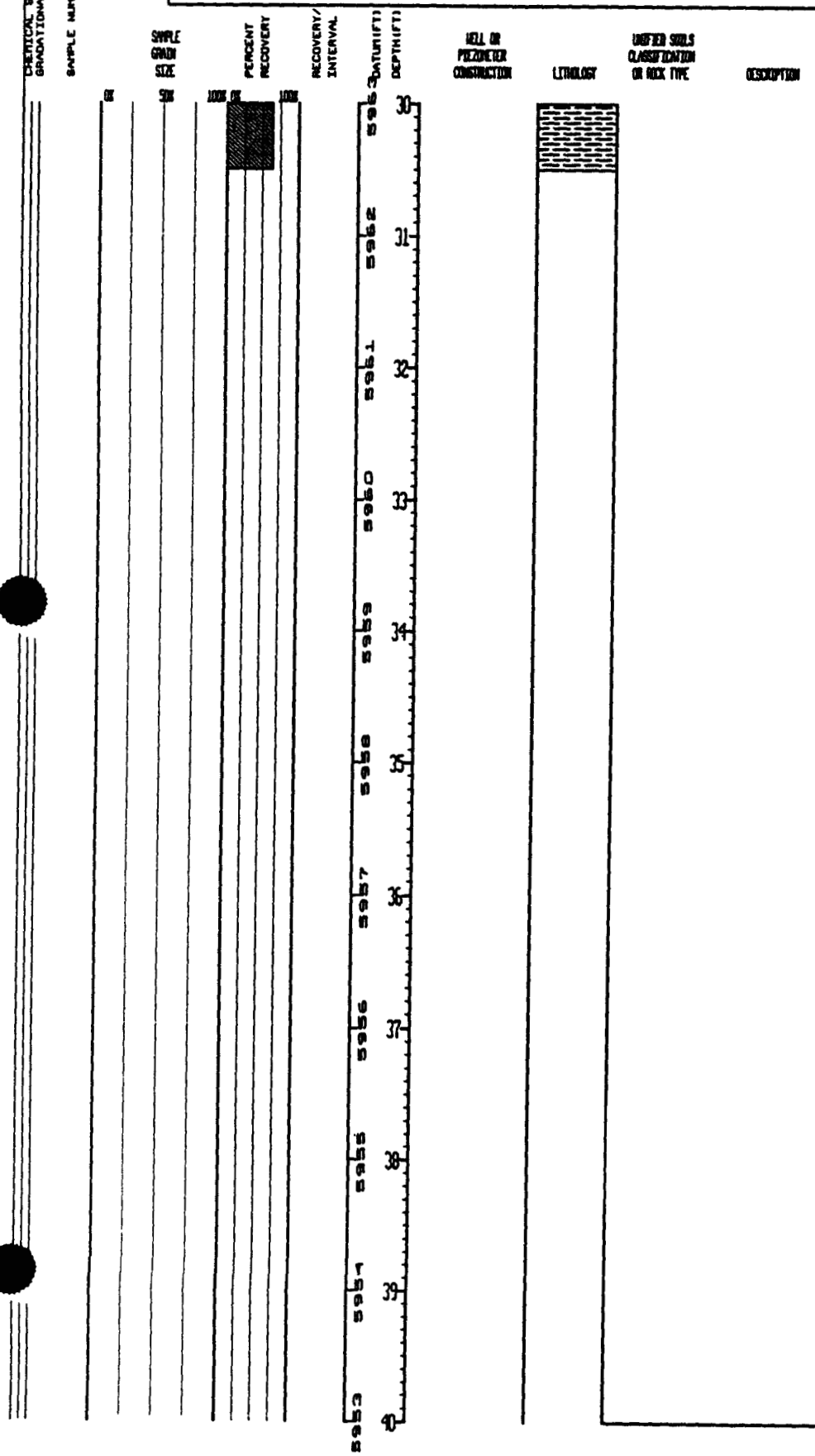
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 30 5	GROUND ELEVATION (FT)	5993	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA 881 HILLSIDE	CASING DIAMETER (IN)	0	GEOLOGIST	DAT	61-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	N/A	

REMARKS

CHEMICAL SAMPL GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1/1 5	5972	21			CLAYSTONE	Yellowish gray (5Y 8/1), mod to high plast, some silt, some iron staining, some Mg staining, floury texture
				1 5/1	5971	22			CLAYSTONE	Lt brownish gray (5YR 6/1), mod plast, trace of silt, trace of iron staining as mottles
					5970	23			CLAYSTONE	Same as above
				12/2 5	5969	24				
					5968	25				
					5967	26			CLAYSTONE	Top of interval same as above, grayish orange (10YR 7/4), trace of carb material Bottom of interval same as above, lt olive gray (5Y 6/1), flour texture
				16/2 5	5966	27				
					5965	28			CLAYSTONE	Same as above, some iron staining as mottles and along horizontal fractures
				16/2 5	5964	29				
					5963	30				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 30 5	GROUND ELEVATION (FT)	5993	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	0	AREA 881 HOLSIDE	CASING DIAMETER (IN)	0	GEOLOGIST	DAT	61-86A
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN)	0	DATE DRILLED	N/A	

REMARKS



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 59 3	GROUND ELEVATION (FT) 5897 54	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	748156	AREA 903 PAD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	62-86
EAST	2085717	LOCATOR NUMBER MB	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/25/86	

REMARKS Hollow Stem Auger 35 5' - 37' is bentonite & 37' - 59 3' is Portland Type I cement

CHEMICAL SAMPLE / GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRADATION SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR SND	100% GR	03/05	5897			GC	GRAVELLY SAND, dusky yellowish brown (10 YR 2/2), sub-angular - sub-rounded, max gravel size = 3cm, some roots, some clay
					5896			CL	SANDY CLAY, dark yellowish brown (10 YR 4/2), mod plasticity, some gravel (max size = 3cm), sand is FG-MG, trace of roots Bottom of interval same as above, grayish orange (10 YR 7/4), increased amount of sand, some silt, trace of roots, some calc material in possible fractures
				34/43	5895				
					5894				
					5893				
					5892			CL	Same as above Calc material in fractures is more abundant
				14/27	5891				
					5890				
					5889			CL	Same as above trace of calc material as mottles, no apparent fractures, sand fraction is larger, trace of gravel
				22/28	5888				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 59 3	GROUND ELEVATION (FT)	5897 54	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748156	AREA 903 PAD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	62-86
EAST	2085717	LOCATOR NUMBER M8	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger 35 5' - 37' is bentonite & 37' - 59 3' is Portland Type I cement

CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
DAT 5			2.5/2.5	5887, 5886, 5885	10, 11, 12			CL	SANDY CLAY, dark yellowish brown (10 YR 4/2), mod plast, some silt, sand is FG-MG
			0.5/1.2	5884	13			SW	GRAVELLY SAND, light brown (5 YR 5/6), angular-sub-angular, mod-well graded, max size gravel = 7cm, some silt
			0.5/0.5	5883	14			CL	CLAY, grayish orange (10 YR 7/4), mod plast, some iron staining as mottles, some silt, trace of gravel
			1.5/0.8		15			CL	GRAVELLY SANDY CLAY, moderate yellowish brown (10 YR 5/4), mod-high plasticity, max gravel size = 2cm, sand is FG-CG, some silt, possible Mg-staining and concretions
			1/2.5	5882, 5881, 5880	16, 17			CL	Same as above
			1/2.5	5879, 5878	18, 19, 20			SC	Clayey Gravelly Sand, moderate yellowish brown (10 YR 5/4), sub-angular to sub-rounded, mod-well graded, max gravel size = 5cm, trace of possible Mg-staining and concretions, sand is MG-CG, trace of iron staining as mottles

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 59 3	GROUND ELEVATION (FT) 5897 54	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749156	AREA 903 PAD	CASING DIAMETER (IN) 2 ID	GEOLOGIST DAT	62-86
EAST	2085727	LOCATOR NUMBER MB	BOREHOLE DIAMETER (IN) 7 25	DATE DRILLED 09/25/86	

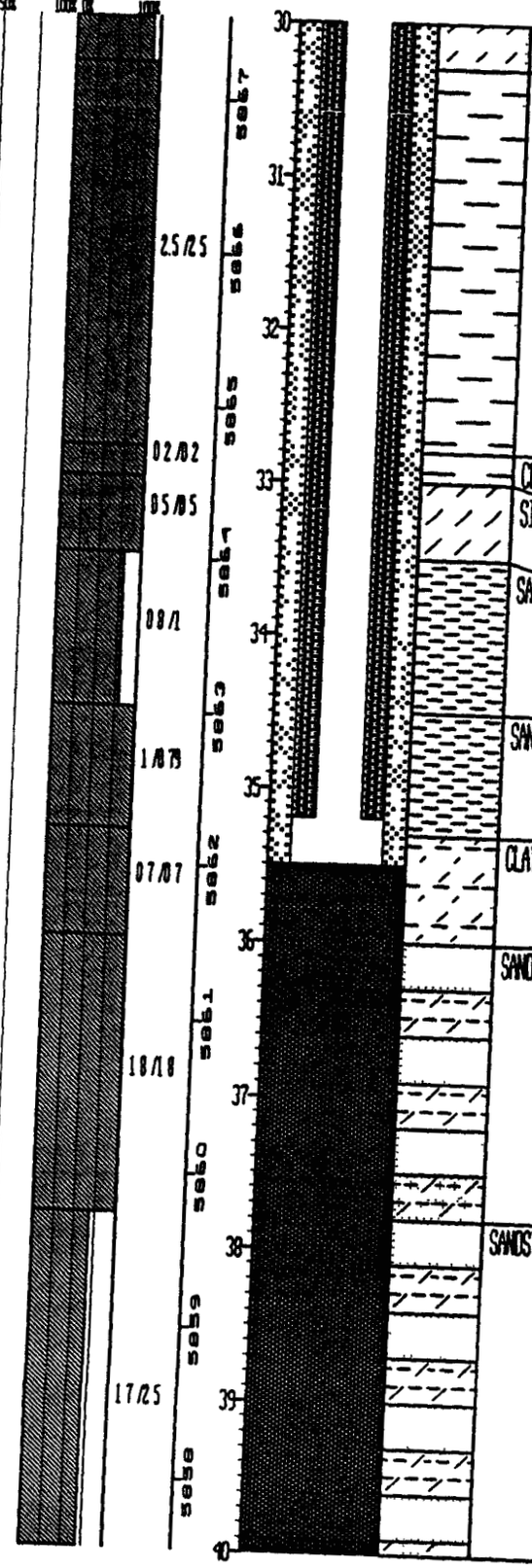
REMARKS Hollow Stem Auger 35 5' - 37' is bentonite & 37' - 59 3' is Portland Type I cement

CHEMICAL, MINPCT, GRADATIONAL, BA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR SND	MINS FR MINS			20				
				1 1/1.7	5875	21			SC	Clayey Gravelly Sand, moderate yellowish brown (10 YR 5/4), sub-angular to sub-rounded, mod well graded, max gravel size = 7cm, sand is MG-VCG, trace of possible Mg staining on concretions
				0 5 /0 75	5874	22			CLAYSTONE	Top of Bedrock Grayish orange (10 YR 7/4), est mod plast, some iron staining as mottles, some gravel, trace of possible gypsum
				2.5 /2.5	5873	23			CLAYSTONE	Same as above, some 1 mm-2 cm VFG-FG sand lenses, very light gray (N8), trace of iron concretions at bottom of interval
					5872	24				
					5871	25	09/25/86 ▽		SILTY SANDSTONE	VFG-FG, pale yellowish orange (10 YR 8/6) and light gray (N8), sub-angular - sub-rounded, poorly graded, abundant iron staining, trace of possible Mg staining
				1.2 /1.7	5870	26				
				0 0 /0 75	5869	27			SILTY SANDSTONE	Same as above Increased competency, some clay
					5868	28			SILTY SANDSTONE	Same as above
				2.3 /2.5	5867	29				
					5866	30				

DAT 6

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 59 3	GROUND ELEVATION (FT)	5897 54	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748156	AREA 903 PAD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DMT	62-86
EAST	2085717	LOCATOR NUMBER MB	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger 35 5' - 37' is bentonite & 37' - 59 3' is Portland Type I cement



CLAYEY SANDSTONE Pale yellowish orange (10 YR 8/6) and light gray (N8), gradational contact between soil and rock, sub-angular to sub-rounded, highly weathered, mod friable, VCG-FG, well sorted, iron staining as mottles

CLAYEY SANDSTONE Same as above (Top 3 in)

SILTSTONE Light olive gray (5Y 6/1), sharp contact, non-apparent bedding, highly weathered, moderate to poorly friable

SANDY CLAYSTONE Pale yellow orange (10 YR 8/6) and light gray (N8), non-apparent bedding (floury texture), highly weathered, mod friable, abundant iron staining, some Mg staining

SANDY CLAYSTONE Same as above Mg staining shows dendritic pattern

CLAYEY SILTSTONE Light olive gray (5Y 6/1), massive bedding, highly weathered, mod-poorly friable, abundant iron staining as mottles

SANDSTONE Thin interbedding of VFG-FG Sandstone, (bedding is 1 mm-1 cm), very pale orange (10YR 8/2), highly weathered, mod friable, well sorted
Interbedded with Silty Claystone, (bedding is 5-3cm), med light gray (N6), well weathered, mod friable, iron staining throughout as mottles and along bedding planes

SANDSTONE Same as above trace of carb material

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 59 3	GROUND ELEVATION (FT)	5897 54	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748156	AREA 903 PAD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	62-86
EAST	2085717	LOCATOR NUMBER MB	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger 35 5' - 37' is bentonite & 37' - 59 3' is Portland Type I cement

CHEMICAL &/OR GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
DAT 7			18/25	sea7 sea6 sea5	40 41 42			SILTY SANDSTONE	Yellowish gray (5Y 8/1), gradational contact, highly weathered, mod friable VFG-FG, mod -well sorted, abundant iron staining as mottles, carb material, some interbedding of Clayey Siltstones (less than 1 mm), some clay
			28/25	sea4 sea3	43 44 45			SILTY SANDSTONE	Slabbed core shows interbedding of sandstones and claystones, light olive gray (5Y 6/1)
			25/25	sea2 sea1 sea0	46 47			SILTY SANDSTONE	Same as above
			25/22	sea9 sea8	48 49 50			SILTY CLAYSTONE	Light olive gray (5Y 4/1), non-apparent bedding, well weathered, mod friability, some iron staining as mottles, fractures approx 35 degrees

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 59 3	GROUND ELEVATION (FT)	5897 54	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748156	AREA 903 PAD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DAT	62-86
EAST	2085717	LOCATOR NUMBER M8	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger 35 5' - 37' is bentonite & 37' - 59 3' is Portland Type I cement

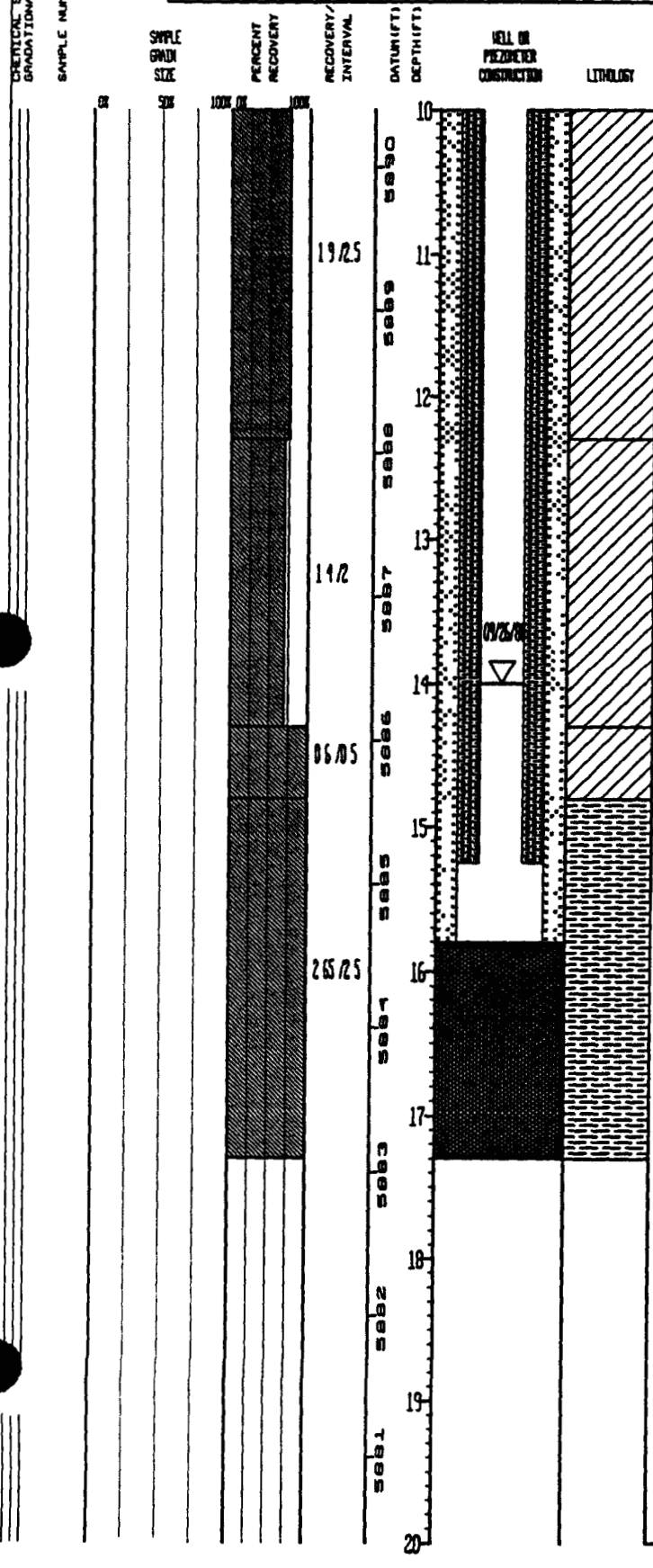
CHEMICAL SAMPLE GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			0 3/0 29	5847	50			SILTY SANDSTONE	Very pale orange (10 YR 8/2), well weathered, mod-low friability, VFG-FG, well-mod sorted, some iron staining
			2 1/2 5	5846, 5845	51, 52			SILTY SANDSTONE	Same as above. Slab shows wavy bedding, micro slump structures, soft sediment deformation, possible burrowing
			0 9/1 2	5844	53			SILTY SANDSTONE	Same as above, FG-MG, trace of carb material
			1 7/1 3	5843	54, 55			SILTY SANDSTONE	Same as above, grayish orange (10 YR 8/2), mod high friability, trace of clay
DAT 8			1 8/2 5	5842, 5841, 5840	56, 57			SILTY SANDSTONE	Same as above, some clay
			1 4/1 5	5839, 5838	58, 59, 60			SILTY SANDSTONE	Same as above, increased clay content in bottom 4 in of interval

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	17 3	GROUND ELEVATION (FT)	5908 4	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749145	AREA	903 PAD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	63-86
EAST	2085753	LOCATOR NUMBER	NB	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/26/86	

REMARKS Hollow Stem Auger

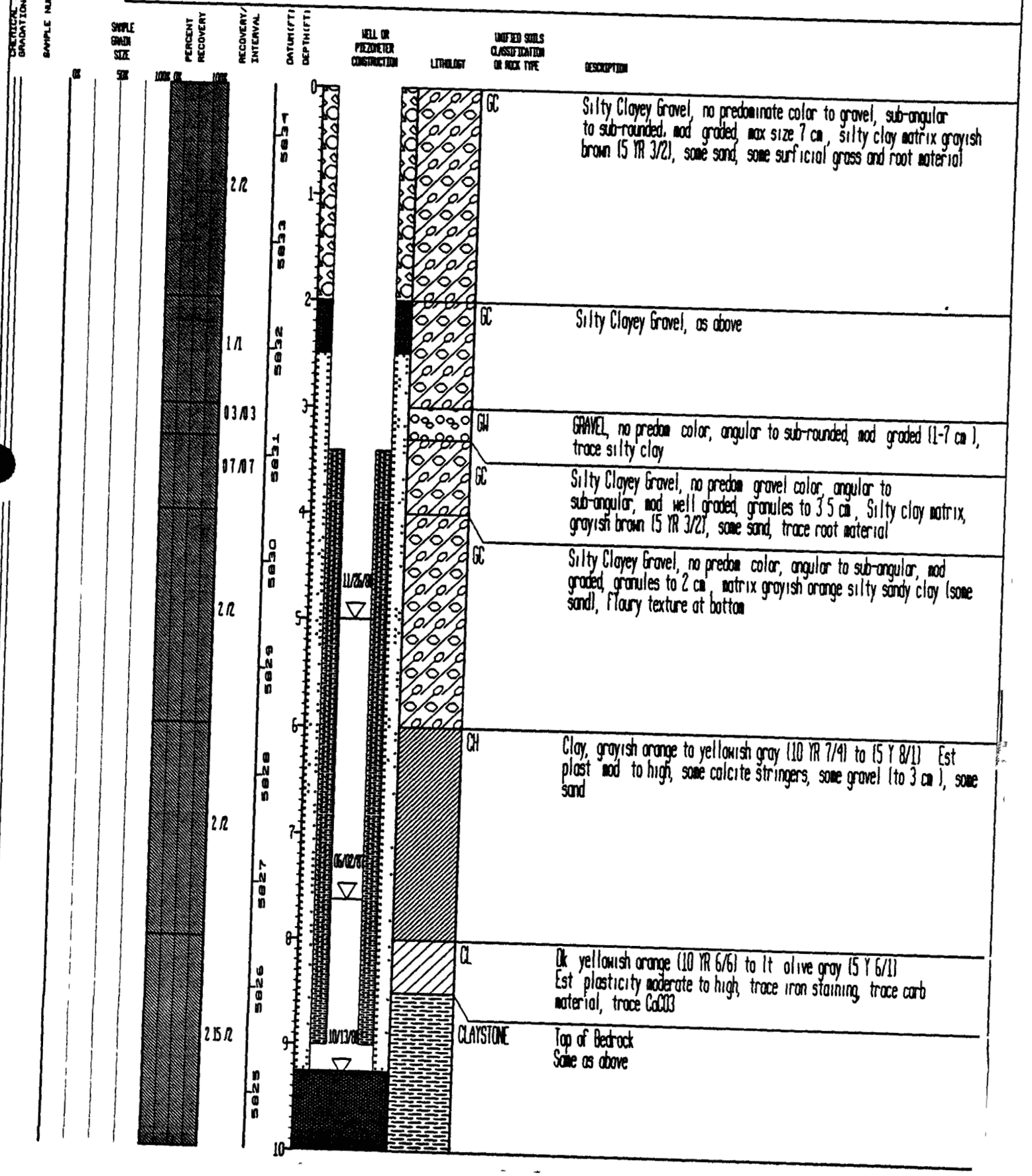
CHEMICAL SAMPL GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRADI SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				05/05	5900			CL	GRAVELLY SILTY CLAY, Dusty yellowish brown (10 YR 2/2), Est plast moderate, gravel angular to sub-rounded, fine to 2 cm, some sand, some surficial root material
				025/03	5899			CH	Sandy Clay, Mod yellowish brown (10 YR 5/4), Est plast mod to high, sand VFG to med grained, some gravel approx 1 cm
				13/2	5896			CL	GRAVELLY CLAY, Top 5 in mod yellowish brown (10 YR 5/4), Est moderate plasticity, gravel angular to sub-rounded small to 4 5 cm, some silt
					5895			CH	Grades to Silty Clay, moderate yellowish brown (10 YR 5/4) Est plast med to high, some sand, VFG
				24/15	5894			CL	SANDY CLAY, Mod yellowish brown (10 YR 5/4), Est plast moderate, sand VFG to FG, well sorted, trace root material
				11/25	5892			CL	Same as above
					5891				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17 3	GROUND ELEVATION (FT)	5900 4	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	748145	AREA 903 PAD	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	63-86
EAST	2085753	LOCATOR NUMBER MB	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/26/86	
REMARKS	Hollow Stem Auger						



CL	SANDY CLAY, Moderate yellowish brown (10 YR 5/4), Est plast moderate, sand VFG to FG, well sorted, trace carb material towards bottom of interval
CL	Same as above, trace fine gravel to approx 1 cm
CL	SANDY GRAVELLY CLAY, Very pale orange (10 YR 8/2), lt brown (5 YR 6/4) to dark yellowish orange (10 YR 6/6) Est plast moderate, gravel angular to sub-rounded, mod well graded to 6 cm, sand VFG to coarse
CLAYSTONE	Top of Bedrock Very pale orange to dk yellowish orange (10 YR 6/6), Est plast mod to high, some silt, trace sand, CaCO3 in stringers and throughout matrix

STATE PLANE COORDINATE	TOTAL DEPTH (FT) 14	GROUND ELEVATION (FT) 5834 48	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH 749586	AREA BUFFER SOUTH	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAM	64-86
EAST 2085601	LOCATOR NUMBER M7	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 09/10/86	
REMARKS Hollow Stem Auger				



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 14		GROUND ELEVATION (FT)	5834 48	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747686	AREA BUFFER SOUTH		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	64-86
EAST	2085601	LOCATOR NUMBER	M7	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/10/86	
REMARKS	Hollow Stem Auger							

CHEMICAL SAMPLE GRADATIONAL SA

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 12/1; 11/1; 04/03; 15/17

DATUM(FT): 5824, 5823, 5822, 5821, 5820, 5819, 5818, 5817, 5816, 5815

DEPTH(FT): 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20

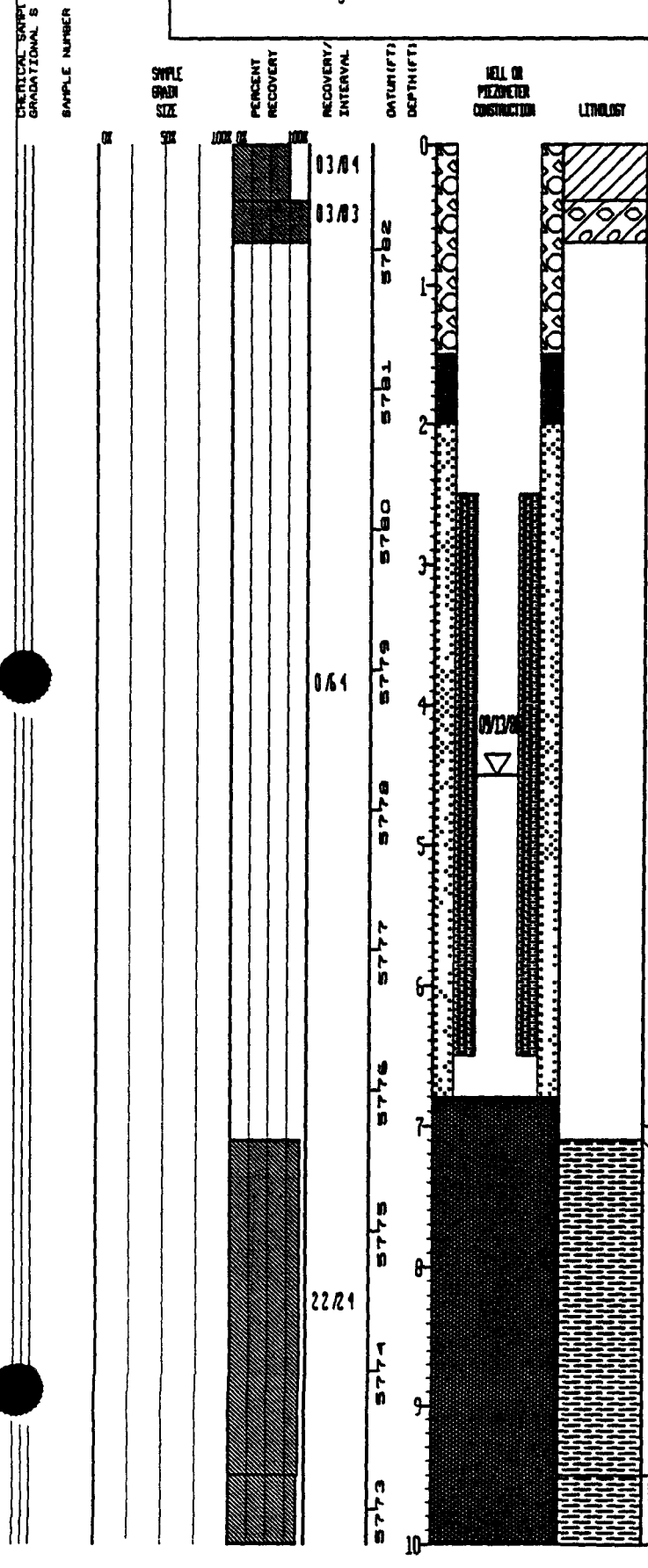
WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CLAYSTONE	Grayish orange (10 YR 7/4) to lt olive gray (5 Y 6/1) Est plast mod to high, trace carb material, trace CaCO3
CLAYSTONE	Same as above Predom lt olive gray (5 Y 6/1) Trace iron staining
CLAYSTONE	Same as above
CLAYSTONE	Same as above, also has dk yellowish orange coloring Note No water encountered during drilling

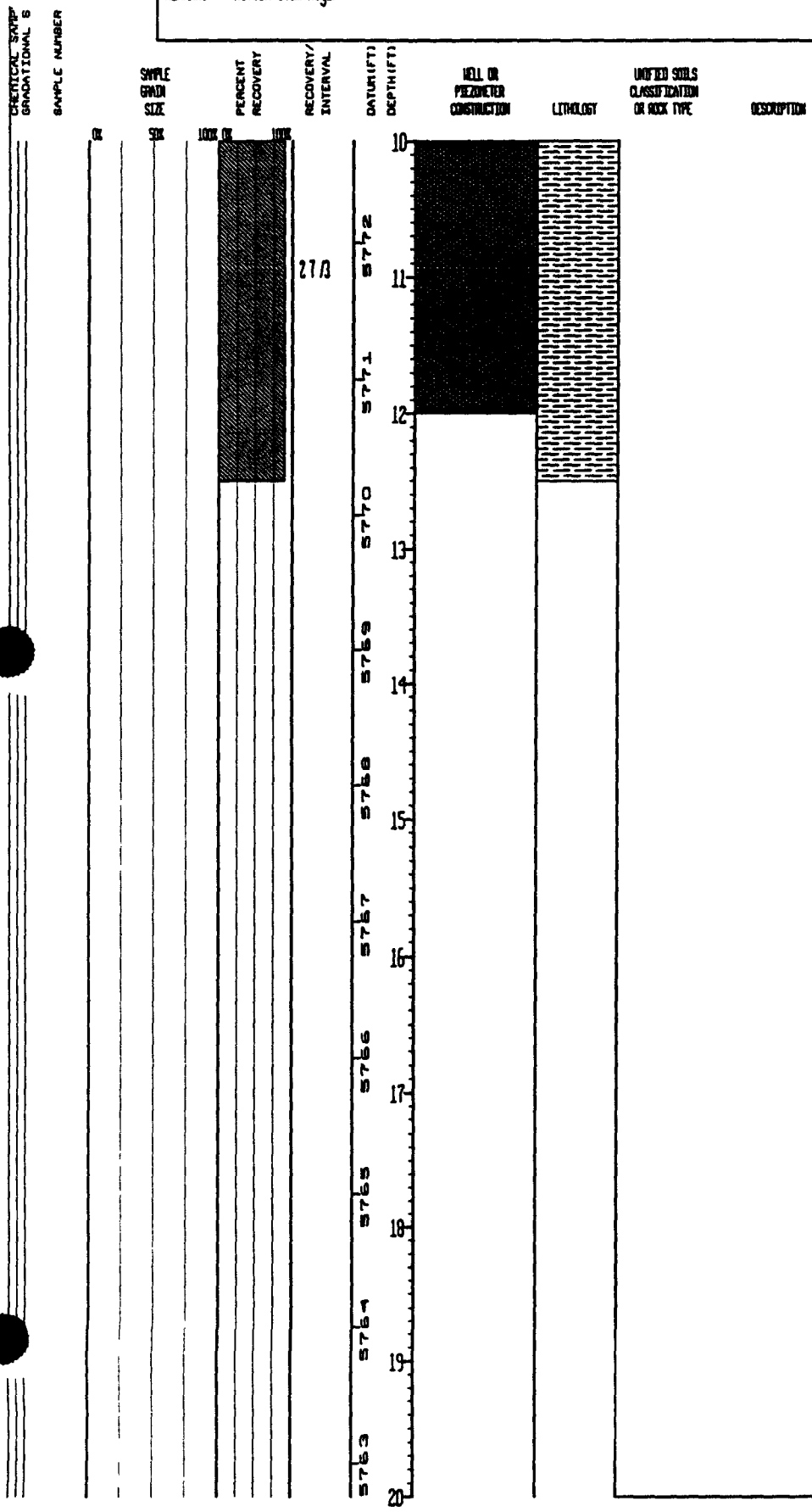
STATE PLANE COORDINATE		TOTAL DEPTH (FT) 12 5	GROUND ELEVATION (FT)	5782 75	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747888	AREA BUFFER SOUTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	65-86
EAST	2087493	LOCATOR NUMBER 07	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/13/86	

REMARKS Hollow Stem Auger



UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
CL	SANDY CLAY, Dk yellowish brown (10 YR 4/2), Est plast low to mod, sand VFG to coarse, Mod to well sorted Some surficial root material
GC	Clayey Sand, As above, fine to med grained
NO SAMPLE	
NO SAMPLE	Top of Bedrock
CLAYSTONE	Lt brownish gray (5 YR 6/1), Est plast mod, some sand and gravel at top of interval becomes siltier as you go down, some black carb material Trace iron staining, gravel fine to 1 cm
CLAYSTONE	Lt olive gray (5 Y 6/1) No bedding evident, highly weathered, highly friable, silty towards bottom of interval Some iron staining in

STATE PLANE COORDINATE		TOTAL DEPTH (FT)	12 5	GROUND ELEVATION (FT)	5782 75	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747888	AREA BUFFER SOUTH		CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	65-86
EAST	2087493	LOCATOR NUMBER	07	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/13/86	
REMARKS	Holoow Stem Auger							



STATE PLANE COORDINATE		TOTAL DEPTH (FT) 12	GROUND ELEVATION (FT)	5685 12	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	74664	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LMA	66-86
EAST	2091255	LOCATOR NUMBER S6	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/13/86	
REMARKS	Holoow Sten Auger						

CHEMICAL SAMPLE / GRADATIONAL SAMPLE	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY / INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		CK	100% CK	100%	5685	0			CL	SANDY CLAY - Dk yellowish brown (10 YR 4/2), Est plast moderate, sand VFG to med grained, some gravel upper end of interval, sub-angular (1 to 2 cm) Some root material Some silt
				16/16	5684	1				
					5683	2			NO SAMPLE	
					5682	3				
				0/52	5681	4	09/13/86			
					5680	5				
					5679	6			NO SAMPLE	Top of Bedrock
					5678	7			CLAYSTONE	Grayish orange (10 YR 7/4) to lt olive gray (5 Y 6/1) Est plast mod to high Trace CaCO3, silt and sand (VFG) Trace carb material Becomes siltier towards bottom of interval
				32/22	5677	8				
					5676	9			SILTY CLAYSTONE	Grayish orange (10 YR 7/4) to pale yellowish brown (10 YR 6/2) Est plast mod, some iron staining and concretions towards bottom, traces of CaCO3
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 12	GROUND ELEVATION (FT)	5685 12	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	746641	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAM	66-86
EAST	2091255	LOCATOR NUMBER SS	BOREHOLE DIAMETER (IN)	7 25	DATE DRILLED	09/13/86	

REMARKS Holoow Sten Auger

CRITICAL SAMPLE DEPTH / GRADATIONAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	GR SND	100% GR 100%	1 9 /3	5675 5674 5673 5672 5671 5670 5669 5668 5667 5666	10 11 12 13 14 15 16 17 18 19 20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 3 7	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST LAA	66-86B
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED N/A	

REMARKS No Weston Log available

CHEMICAL SAMPL GRADATIONAL SA DEPTH

SAMPLE NUMBER

SAMPLE GRAIN SIZE 0% 50% 100%

PERCENT RECOVERY 0% 100%

RECOVERY/INTERVAL: 0 3/0 6; 0 2/0 3; 0 8/0 8; 0 7/1; 0/1

DATUM (FT) / DEPTH (FT): 0, 1, 2, 3, 4, 5, 6, 7, 8, 9, 10

WELL OR PIEZOMETER CONSTRUCTION

LITHOLOGY

UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
ML	Clayey Silt - grayish brown (5YR 3/2), est plast none to low, some gravel, sub-rounded to 4 cm, some roots
GW	GRAVEL - subrounded, mod sorted to 4 5 cm, some clayey silt (as above), trace roots
CL	SILTY CLAY - grayish brown (5YR 3/2), est plast, low to mod, some gravel (granule size), some sand, VFG to VCG, trace roots
CL	SANDY CLAY - grayish brown (5YR 3/2), est plast low, sand VFG to VCG, some silt, some gravel esp at lower end to 3 5 cm, sand and gravel well graded, trace roots
NO SAMPLE	

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16 5	GROUND ELEVATION (FT) 5796 26	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	749710	AREA BUFFER EAST	CASING DIAMETER (IN) 2 ID	GEOLOGIST LAM	67-86
EAST	2090363	LOCATOR NUMBER R8	BOREHOLE DIAMETER (IN) 7 5	DATE DRILLED 09/16/86	

REMARKS Hollow Stem Auger Well built through casing advancer, no centralizers used

CHEMICAL SAMPLE / GRADATIONAL SA. DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) / DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				06/06	5796 / 0			CH	Silty Clay - dk yellowish brown (10YR 4/2), est plast mod to high, some gravel (2 5 cm), some grass and root material
				1/09	5795 / 1			CH	Same as above, trace root material, trace sand
					5794 / 2			CL	SANDY CLAY - very pale orange (10YR 8/2), est plast moderate, sand VFG, some gravel (to 2 5 cm), trace root material
				12/15	5793 / 3	09/16/86 ▽			
					5792 / 4				
					5791 / 5			CL	SILTY SANDY CLAY - very pale orange (10YR 8/2), est plast moderate, sand VFG to coarse, trace gravel, appears to have been watery when put in box, has conformed to shape of box
				14/15	5790 / 6				
				05/06	5789 / 7			CL	Same as above
					5788 / 8			GC	Clayey Sand and Gravel - very pale orange (10YR 8/2), very well graded, VFG sand to lg gravel (to 6 cm), sub-rounded, core was watery as above interval
				15/25	5787 / 9				
					10			GC	Same as above

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 16 5	GROUND ELEVATION (FT)	5796 26	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749710	AREA BUFFER EAST	CASING DIAMETER (IN)	2 ID	GEOLOGIST	LAA	67-86
EAST	2090363	LOCATOR NUMBER 88	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/16/86	

REMARKS Hollow Stem Auger Well built through casing advancer, no centralizers used

CHEMICAL GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT) DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
	LM10			13/2.5	10 5786				Sample interval consists of a few pieces of sandy clay, not enough to accurately characterize interval
				01/11	15 5781				Top of Bedrock Sample interval consists of a few pieces of sandy clay, not enough to accurately characterize interval
					20 5777				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 9	GROUND ELEVATION (FT)	5880 75	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747175	AREA BUFFER SOUTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	L PIVONKA	68-86
EAST	2083570	LOCATOR NUMBER K7	BOREHOLE DIAMETER (IN)	7 1/4	DATE DRILLED	09/10/86	

REMARKS Hollow Stem Auger NOTE Not logged by NSI Information from HYDRO-SEARCH, Inc log

CHEMICAL SAMPLE/ GRADATIONAL SA	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0% 50% 100%	0% 100%							
				07/09	5880	0			GM	GRAVEL dusky yellowish brown (10YR 2/2), granitic pebbles and cobbles, some sand and silt, poorly sorted, unconsolidated, moist
				01/11	5879	1	09/10/86		GP	Cuttings Cobbles quartzite, wet
				08/08	5878	2			GM	GRAVEL dark yellowish brown (10YR 4/2), granite and quartzite pebbles and cobbles with sand and silt, poorly sorted, unconsolidated, wet
				17/12	5877	3			CLAYSTONE	Top of Bedrock Claystone pale yellowish brown (10YR 6/2), silty, some iron staining, weathered, moist
					5876	4				
					5875	5				
					5874	6				
					5873	7			CLAYSTONE	Claystone same as above, moist
				2/2	5872	8				
					5871	9				
						10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17	GROUND ELEVATION (FT)	5921 19	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747788	AREA 881 HILLSIDE	CASING DIAMETER (IN)	2 10	GEOLOGIST	DCB	69-86
EAST	2084272	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/24/86	
REMARKS	Hollow Stem Auger						

CHEMICAL/ GEOTECHNICAL SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT) DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
			05/05	5921			CL	CLAY, brownish gray (5 YR 4/1), moderate plasticity, some silt and plant debris
			11/11	5920			CL	CLAY, moderate yellowish brown (10 YR 5/4), moderate plasticity, some silt and VFG sand, calcareous
			11/11	5916			CL	As above, with mottling, brownish gray (5 YR 4/1), some gravel and roots
			1/1	5915			CL	Interval grades to CLAY, moderate yellowish brown (10 YR 5/4), moderate plasticity, some silt, trace of gravel
			1/1	5914			CL	Same as above
			1/1	5913			CL	Same as above
				5912	09/24/86			NO SAMPLE

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17	GROUND ELEVATION (FT)	5921 19	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	747788	AREA 881 HILLSIDE	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	69-86
EAST	2084272	LOCATOR NUMBER L7	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/24/86	
REMARKS	Hollow Stem Auger						

CHEMICAL SAMPLE GRADATIONAL S TH	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		0%	100% 0%	100%						
				0/35	5911	10				
					5910	11				
					5909	12				
				02/02					CL	Lt olive gray (5 YR 6/1), bedding not apparent, highly weathered, moderately friable, some iron staining
				03/06	5908	13			CL	SANDY CLAY, moderate yellowish brown (10 YR 5/4) to light brown (5 YR 5/6), low plasticity, some gravel
				02/02						
				01/01					NO SAMPLE	
									CL	As above (reference interval 12 6 to 13 3 ft)
				06/06	5907	14			CL	Light olive gray (5 Y 6/1), with mottled iron stains, dark yellowish orange (10 YR 6/6), bedding not apparent, highly weathered, moderately friable, some to trace of silt Color grades to very light gray (N8), with iron staining localized bodies of caliche. (less than 3 cm occurs in this interval)
					5906	15				
					5905	16			CLAYSTONE	Top of Bedrock Very light gray (N8), mottled by iron staining to dark yellowish orange (10 YR 6/6), bedding not apparent, highly weathered, moderately friable, some silt
				35/25	5904	17				
					5903	18				
					5902	19				
						20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17 4	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST DAT	69-86A1
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED N/A	

REMARKS

CHEMICAL SAMP GRADATIONAL S	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		OK	100% OK	0.5/1.7	0	0			CL	SANDY CLAY - dark yellowish brown (10YR 4/2), mod plast, trace of iron staining, some roots, trace of gravel
		SOIL	100% OK	2.8/3.3	-1	1			CL	CLAY - dark yellowish brown (10YR 4/2), est mod plast, some gravel, some sand Bottom 2 ft of interval same as above, grayish orange (10YR 7/4), calcareous
				1.1/1.	-2	2			CL	Top 4 in SANDY CLAY, dark yellowish brown (10YR 4/2), est mod plast, trace of iron staining, some roots, trace of gravel Bottom of interval same as above, grayish orange (10YR 7/4), trace of carb material, no gravel, no roots
				1/1.	-3	3			CL	Same as above, trace of gravel
				0.9/1.	-4	4			CL	Same as above, some carb material
				1.25/1.	-5	5			CL	Same as above
				1/1.	-6	6			CL	Same as above
					-7	7				
					-8	8				
					-9	9				
					-10	10				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 17 4	GROUND ELEVATION (FT) 0	PROJECT NUMBER 667 11	LOG OF BORING NUMBER
NORTH	0	AREA 0	CASING DIAMETER (IN) 0	GEOLOGIST DAT	69-86A1
EAST	0	LOCATOR NUMBER 0	BOREHOLE DIAMETER (IN) 0	DATE DRILLED N/A	
REMARKS					

CHEMICAL SAMP GRADATIONAL S DEPTH	SAMPLE NUMBER	SAMPLE GRAIN SIZE (0% 50% 100%)	PERCENT RECOVERY (0% 100%)	RECOVERY/ INTERVAL	DATUM (FT)	DEPTH (FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
				1/1	-10	10			CH	Gravelly Sandy Clay - moderate yellowish brown (10YR 5/4), mod to high plast, sand is FG - CG, max gravel size = 6 cm, gravel and sand is sub-angular to sub-rounded
				1/1	-11	11			CL	Same as above
				0.9/0.9	-12	12			CL	Same as above
				0/2.4	-13	13			NO SAMPLE	
				0/2.1	-14	14				
					-15	15			NO SAMPLE	
					-16	16				
					-17	17				
					-18	18				
					-19	19				
					-20	20				

STATE PLANE COORDINATE		TOTAL DEPTH (FT) 13	GROUND ELEVATION (FT)	5929 79	PROJECT NUMBER	667 11	LOG OF BORING NUMBER
NORTH	749517	AREA BUFFER SOUTH	CASING DIAMETER (IN)	2 ID	GEOLOGIST	DCB	70-86
EAST	2081993	LOCATOR NUMBER I7	BOREHOLE DIAMETER (IN)	7 5	DATE DRILLED	09/25/86	

REMARKS Hollow Stem Auger Top of stainless steel casing 2.00'

CHEMICAL SAMPLE GRADATIONAL SAM	SAMPLE NUMBER	SAMPLE GRAIN SIZE	PERCENT RECOVERY	RECOVERY/ INTERVAL	DATUM(FT)	DEPTH(FT)	WELL OR PIEZOMETER CONSTRUCTION	LITHOLOGY	UNIFIED SOILS CLASSIFICATION OR ROCK TYPE	DESCRIPTION
		GR SND	100% GR 100%	0 5 /0 5	5928	0			CL	CLAY, dark yellowish brown (10 YR 5/4), low to moderate plasticity, some silt and plant detritus
				1 5 /1 5	5927	1			GC	GRAVEL, dominantly light gray (N7), angular to sub-angular, poorly graded max size 5cm, Some silt and clay
				0 85 /0 85	5926	2			CL	GRAVELLY CLAY, dark yellowish brown (10 YR 5/4), low to moderate plasticity, some silt
				0 /1 15	5925	3	09/25/86		NO SAMPLE	
				0 5 /0 5	5924	4			CL	GRAVELLY SILTY CLAY, light gray (N7), dominantly dark yellowish orange (10 YR 6/6), low plasticity, abundant iron staining
				0 /0 5	5923	5			NO SAMPLE	
				2 /2	5922	6			GC	Clayey Gravel, dominantly medium gray (N5), matrix is light gray (N7), angular to sub-rounded, poorly graded, max size 6 cm, local iron staining
				2 /2	5921	7			CLAYSTONE	Top of Bedrock Light olive gray (5 Y 6/1), moderately high plasticity, some silt
				2 /2	5920	8			CLAYSTONE	Light brownish gray (5 YR 6/1), bedding not apparent, highly weathered, highly to moderately friable, localized iron staining, color grades to medium dark gray at approx 10 5 ft
						9				
						10				