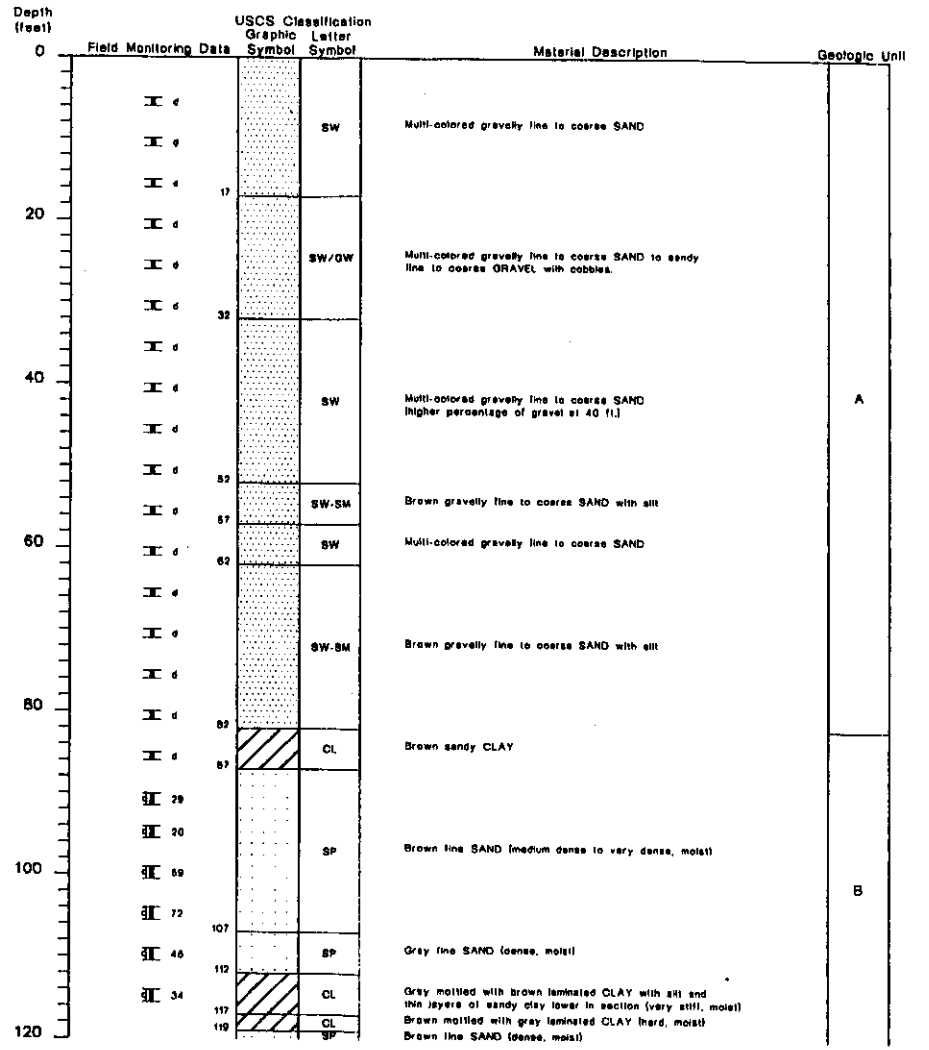
Geologic Profile
Boring CP-E1

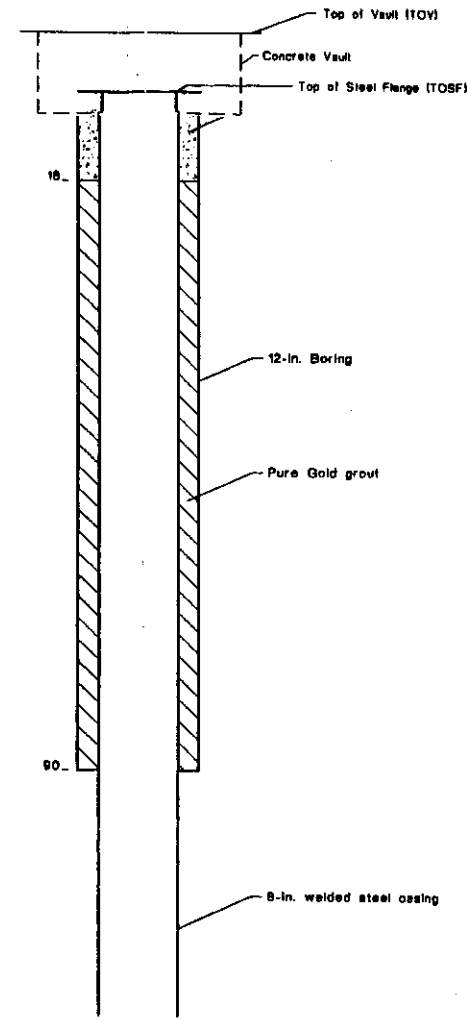


(Continued on next page)

(Continued on next page)

Pilot Extraction Well As-Built Diagram
CP-E1

1860.33 ft. MSL (TOV)
1864.06 ft. MSL (TOSF)



(Continued on next page)

Boring Log and Well Completion Diagram
For Extraction Well CP-E1

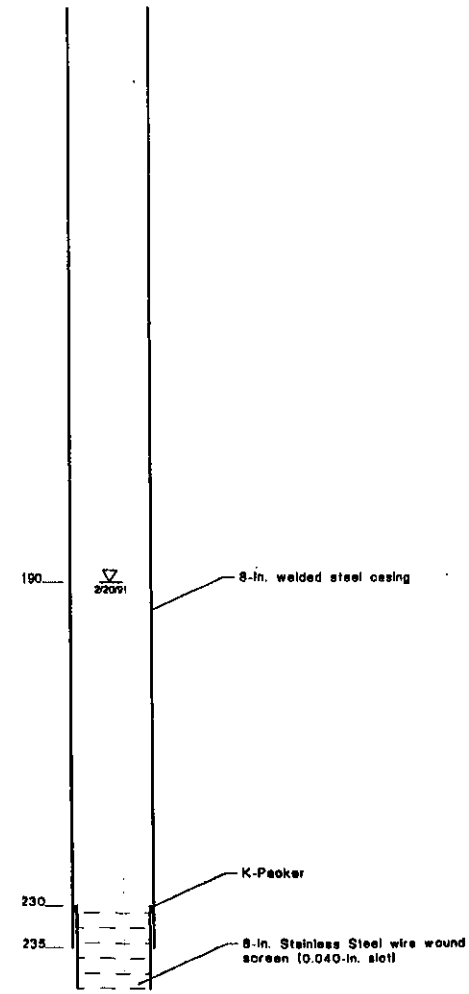
Figure D-1
(1 of 3)

Geologic Profile
Boring CP-E1

Depth (feet)	Field Monitoring Data	USCS Classification Graphic Symbol	USCS Classification Letter Symbol	Material Description	Geologic Unit
120		122	SP	See previous page	
		124	CL	Brown mottled with light-brown CLAY (hard, moist)	B
	55	127	ML	Yellowish-brown laminated SILT with fine sand (hard, moist)	
	120		SW-SM	Multi-colored fine to coarse SAND with silt and trace fine gravel (very dark, moist)	
	140	137			
140	105	142	SP	Brown fine to medium SAND (very dense, moist)	
	120	147	SW	Brown fine to coarse SAND with trace silt (very dense, moist)	
	140	152	SM	Brown silty fine to coarse SAND (very dense, moist)	
	130	157	SM	Brown gravelly, silty fine to coarse SAND (very dense, moist)	
160	100	162	SW	Multi-colored fine to coarse SAND with trace silt (very dense, wet)	
	100	167	SM	Brown silty fine to coarse SAND with trace gravel (very dense, moist to wet)	
	110	172	SW-SM	Brown fine to coarse SAND with silt (very dense, moist to wet)	
	120				
180	120				
	100		SW	Brown fine to coarse SAND with trace gravel (medium dense to very dense, moist to wet)	C
	80				
	40	196			
200	100	202	SW	Brown fine to coarse SAND with trace silt (very dense, moist)	
	100	207	SM	Brown silty fine to coarse SAND (very dense, moist to wet)	
	240		SW	Brown fine to coarse SAND with trace silt (very dense, moist to wet)	
	190	217			
220	a 170	221	SW-SM	Brown fine to coarse SAND with silt (very dense, moist)	
	220		SW	Brown fine to coarse SAND (very dense, moist)	
	a 160	232			
	a 260		SW-SM	Brown gravelly fine to coarse SAND with silt and cobbles at 245 ft (very dense, moist to wet)	
240					

(Continued on next page)

Pilot Extraction Well As-Built Diagram
CP-E1

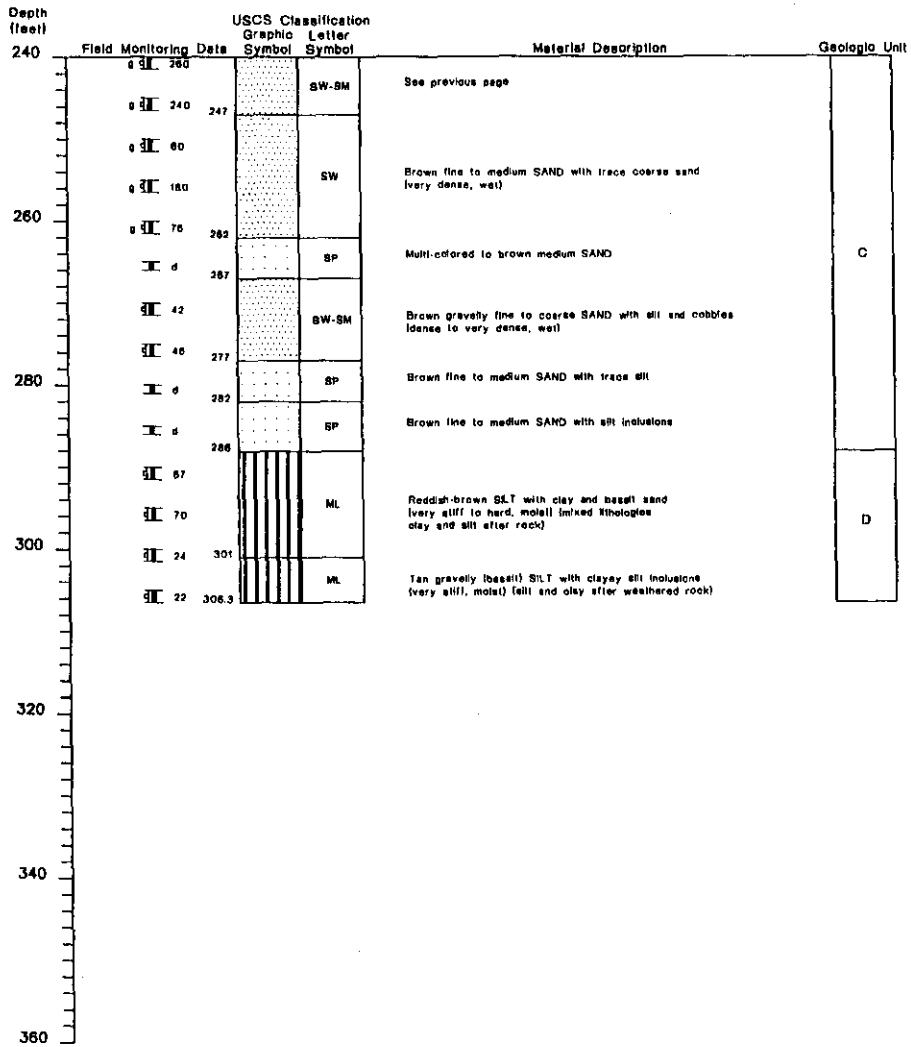


(Continued on next page)

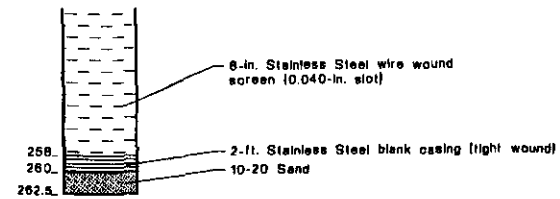
Boring Log and Well Completion Diagram
For Extraction Well CP-E1

Figure D-1
2 of 3

Geologic Profile
Boring CP-E1



Pilot Extraction Well As-Built Diagram
CP-E1



TDB = 262.5 ft.

Boring Log and Well Completion Diagram
For Extraction Well CP-E1

Figure D-1
3 of 3

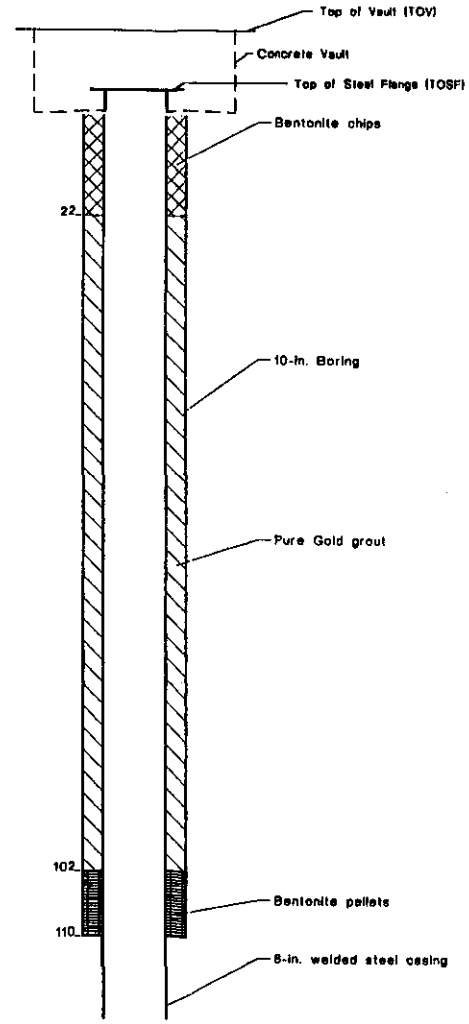
Geologic Profile
Boring CP-E2

Depth (feet)	Field Monitoring Data	USCS Classification Graphic Symbol	USCS Classification Letter Symbol	Material Description	Geologic Unit
0	d		SW	Multi-colored to brown gravelly fine to coarse SAND	A
	d, 5				
	d		GW	Multi-colored sandy fine to coarse GRAVEL with cobbles	
	d, 16				
20	d		SW	Multi-colored gravelly fine to coarse SAND with cobbles	
	d				
	d				
40	d				
	d, 46		GW	Multi-colored clean GRAVEL with trace of fine to coarse sand	
	d, 52		SW	Multi-colored gravelly fine to coarse SAND	
	d, 57		SM	Brown silty fine to coarse SAND	
60	d, 62		SW	Brown fine to medium SAND with trace coarse sand and gravel	
	d, 67		GW	Multi-colored clean fine to coarse GRAVEL with trace coarse sand	
	d, 72		SM	Brown gravelly silty fine to coarse SAND	
	d, 77		GW	Multi-colored sandy fine to coarse GRAVEL with cobbles	
80	d, 83		SW	Brown gravelly fine to coarse SAND with trace silt	
	d, 87		SW	Multi-colored gravelly fine to coarse SAND	
	d, 93		TB	Black massive BASALT	E
100	d				
	d, 107		SP	Yellow-brown gravelly (basalt) medium SAND (very dense, moist)	D
	135, 111		GM	Brown to tan silty fine to coarse basalt GRAVEL with trace clay (very dense, moist) (some sand higher in section)	
	130				
120					

(Continued on next page)

Pilot Extraction Well As-Built Diagram
CP-E2

1864.08 ft. MSL (TOV)
1857.88 ft. MSL (TOSF)

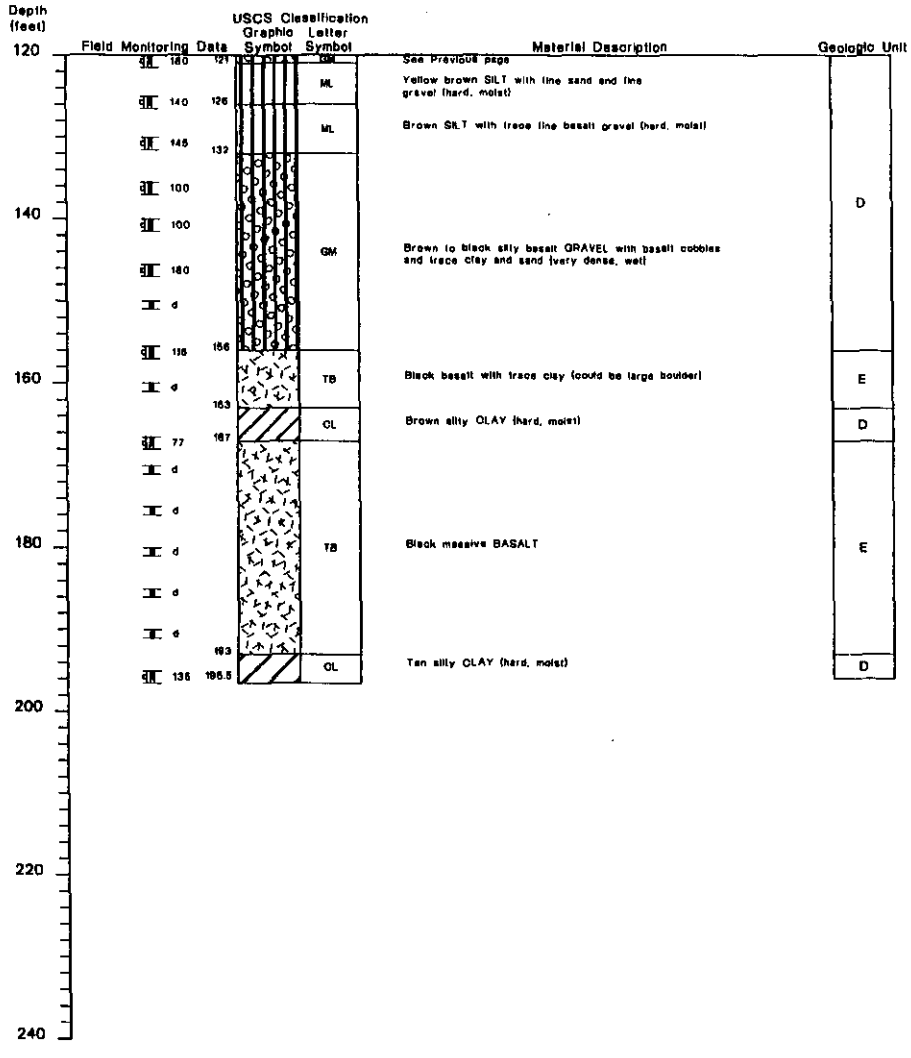


(Continued on next page)

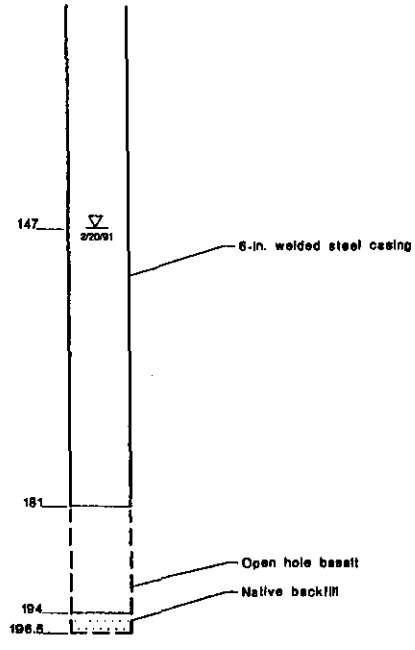
Boring Log and Well Completion Diagram
For Extraction Well CP-E2

Figure D-2
(1 of 2)

Geologic Profile
Boring CP-E2



Pilot Extraction Well As-Built Diagram
CP-E2

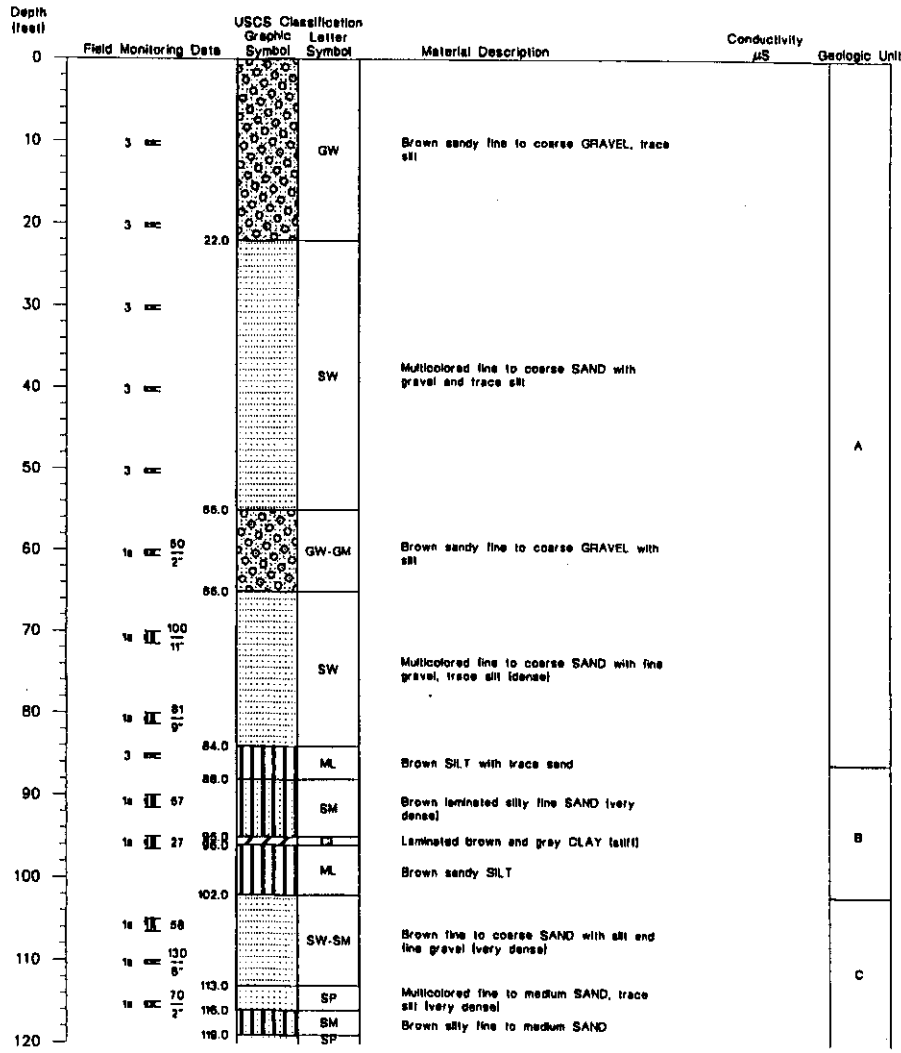


TDB = 196.5 ft.

Boring Log and Well Completion Diagram
For Extraction Well CP-E2

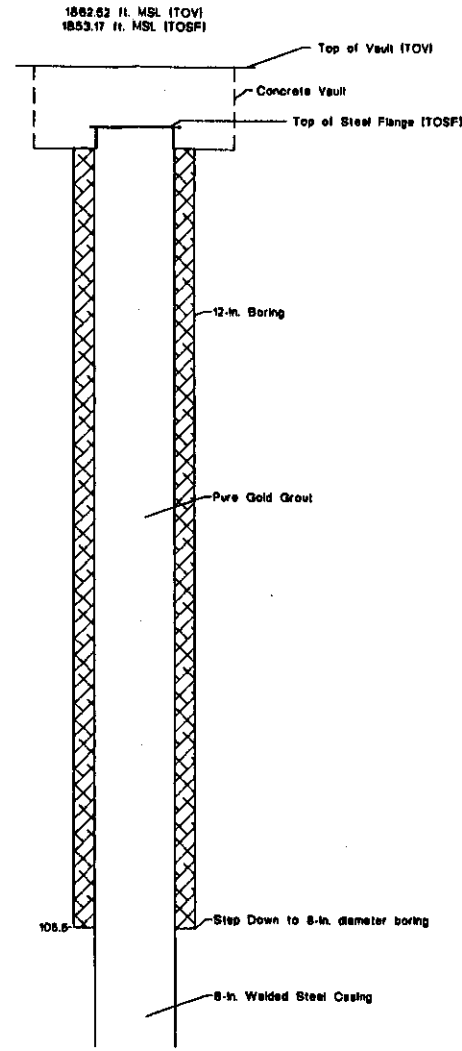
Figure D-2
2 of 2

Geologic Profile
Boring CP-E3



(Continued Next Page)

Extraction Well As-Built Diagram
CP-E3



Boring Log and Well Completion Diagram
For Extraction Well CP-E3

Figure D-3
(1 of 3)

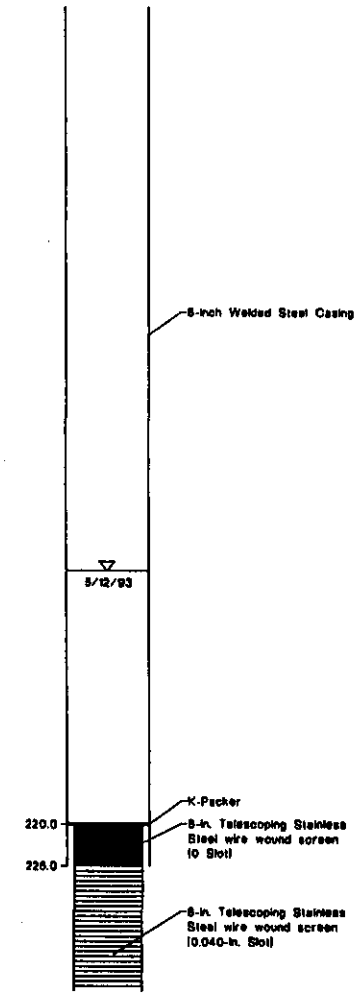
Geologic Profile
Boring CP-E3

Depth (feet)	Field Monitoring Data	USCS Classification Graphic Symbol	USCS Classification Letter Symbol	Material Description	Conductivity µS	Geologic Unit
120	1a 50/6"		SP	Brown fine to medium SAND, trace silt (very dense)		
	1a 20/6"					
130	1a 70/6"		SW	Brown fine to coarse SAND, trace silt (very dense)		
	1a 85/6"					
140	1a 105/2"		SM	Brown silty fine to medium SAND (very dense)		
	1a 100		SW	Brown fine to coarse SAND with fine gravel, trace silt (very dense)		
150	1a 60/2"					
	1a 100		SP	Brown fine to medium SAND, trace silt (very dense)		
160	1a 60/3"					
	1a 100/6"		SW-SM	Brown fine to coarse SAND with small nodules of silty sand (very dense)		
170	1a 100/6"		SP	Brown fine to medium SAND, trace silt		
	1a 50/1"		SP-SM	Brown fine to medium SAND with silt		
180	1a 50/3"		SM	Brown silty fine to medium SAND (very dense)		C
	1a 40/3"		SP-SM	Brown fine to medium SAND with silt (very dense)		
190	1a 110/10"					
	1a 60		SW-SM	Brown fine to coarse SAND with silt and trace fine gravel (very dense)		
200	1a 42		SW	Brown fine to coarse SAND, trace silt (dense)		
	1a 40/1"			Light gray-brown CLAY (hard)		
			SW	Brown fine to coarse SAND, trace silt (dense)		
210	1a 98					
	1a 63		SW-SM	Brown and multicolored fine to coarse SAND with silt, trace fine gravel, reddish brown clay nodules and silty fine to medium sand nodules	788	
220	1a 40					
	1a 100					
230	1a 90				421	
	1a 70/6"		SM	Brown silty fine to coarse SAND with fine gravel (very dense)		
240						

Depth scale: 129.0, 139.0, 142.0, 165.0, 164.0, 168.0, 174.0, 178.0, 182.0, 194.0, 199.0, 205.0, 208.0, 209.0, 234.0

(Continued Next Page)

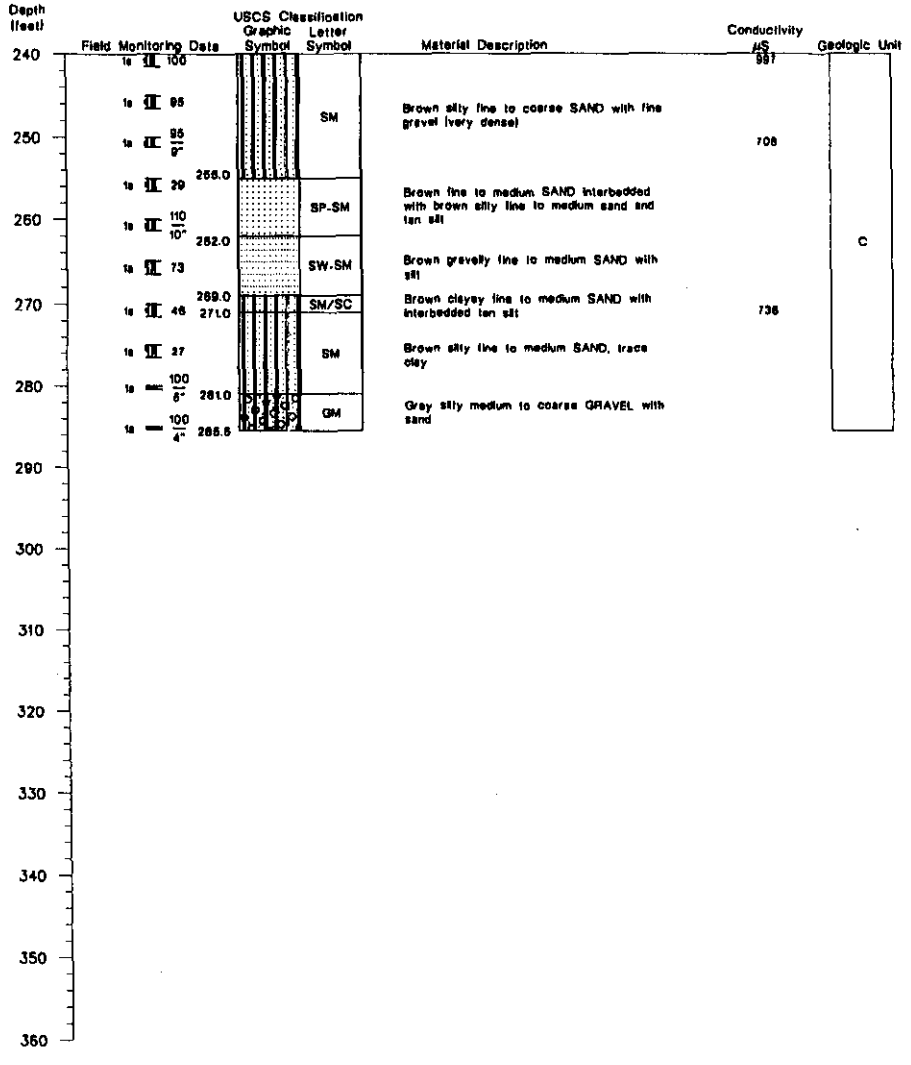
Extraction Well As-Built Diagram
CP-E3



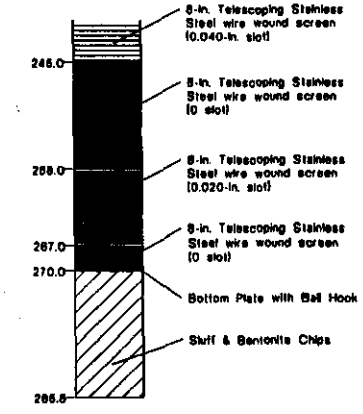
Boring Log and Well Completion Diagram
For Extraction Well CP-E3

Figure D-3
(2 of 3)

Geologic Profile
Boring CP-E3



Extraction Well As-Built Diagram
CP-E3

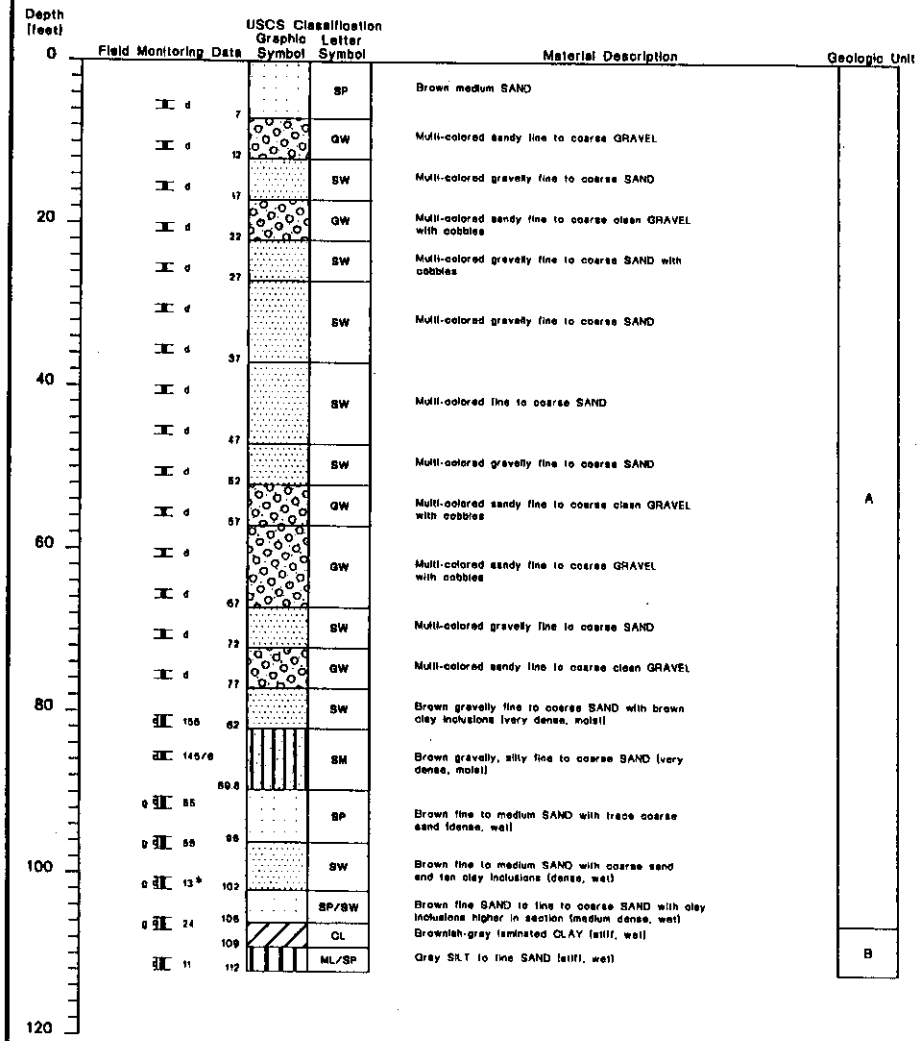


TBD 285.5 ft.
Depth to Water 189.0 ft. (BGS)

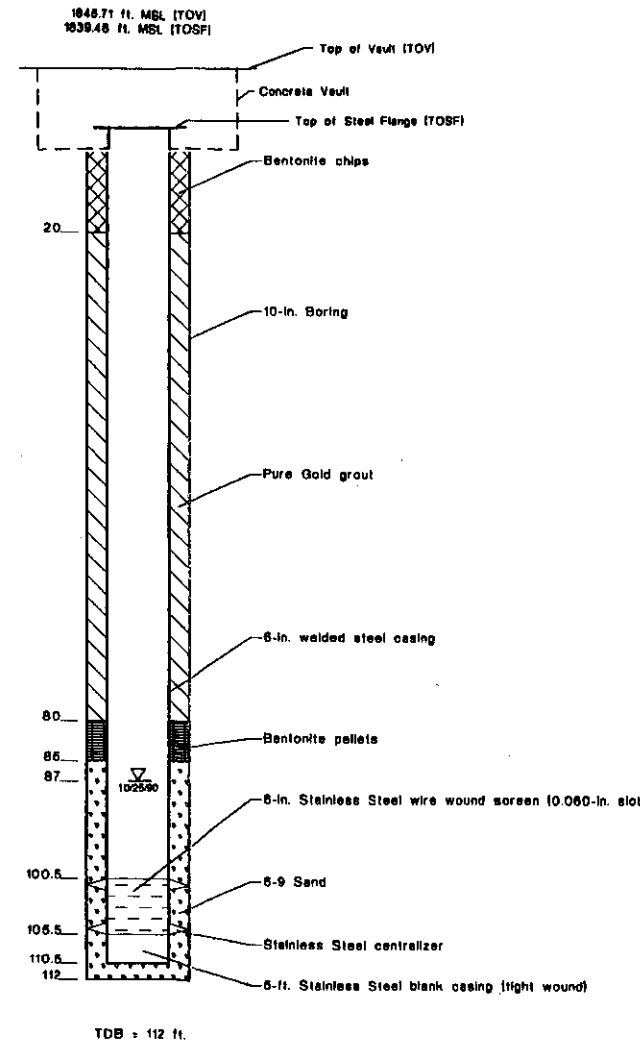
Boring Log and Well Completion Diagram
For Extraction Well CP-E3

Figure D-3
(3 of 3)

Geologic Profile
Boring CP-S1



Pilot Extraction Well As-Built Diagram
CP-S1

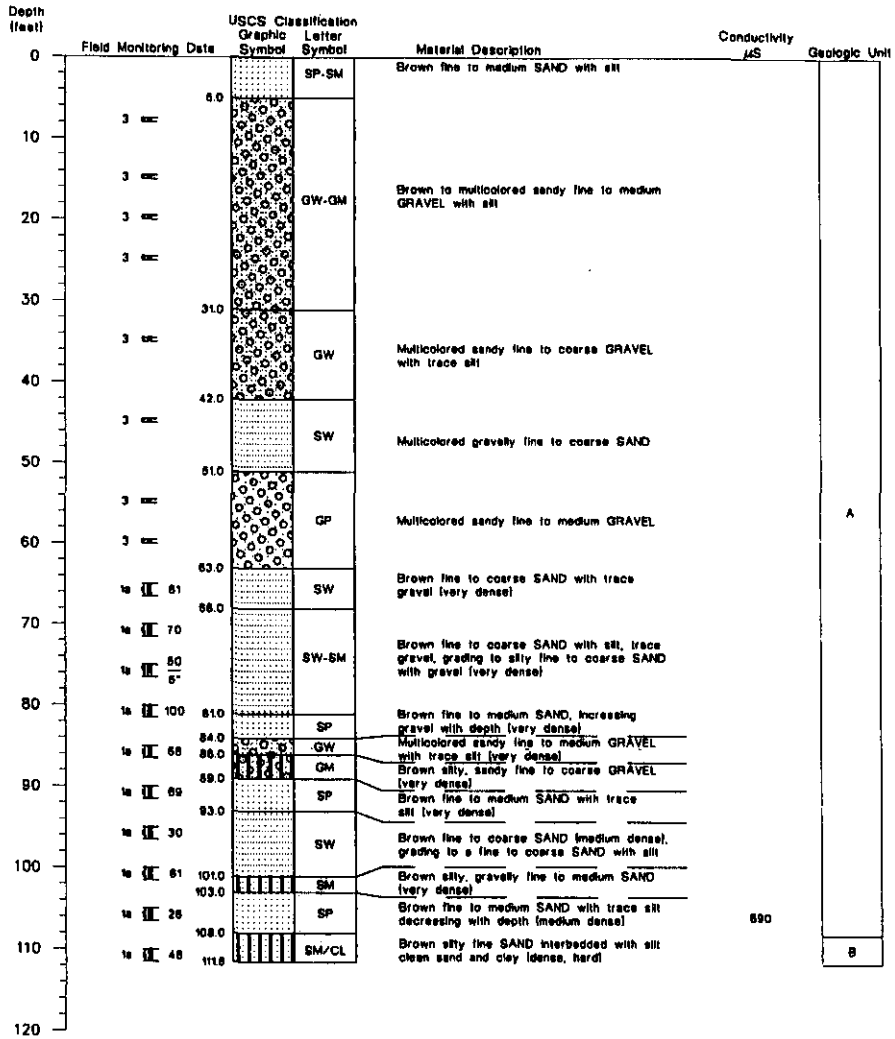


Boring Log and Well Completion Diagram
For Extraction Well CP-S1

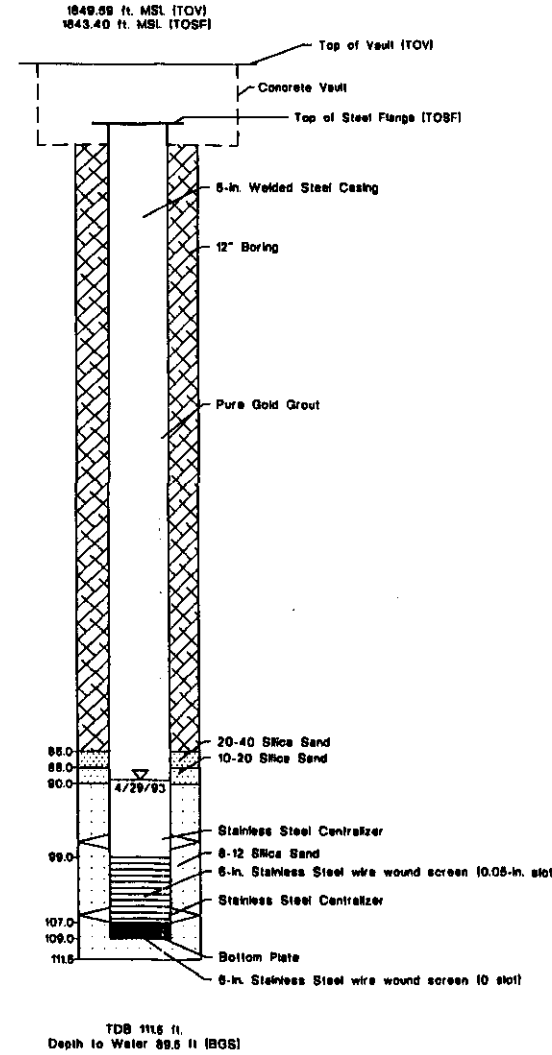
Figure D-4

134004.110 Spokane Co./Colbert Landfill/Operations & Maintenance Plan (M) 1/97

Geologic Profile
Boring CP-S4



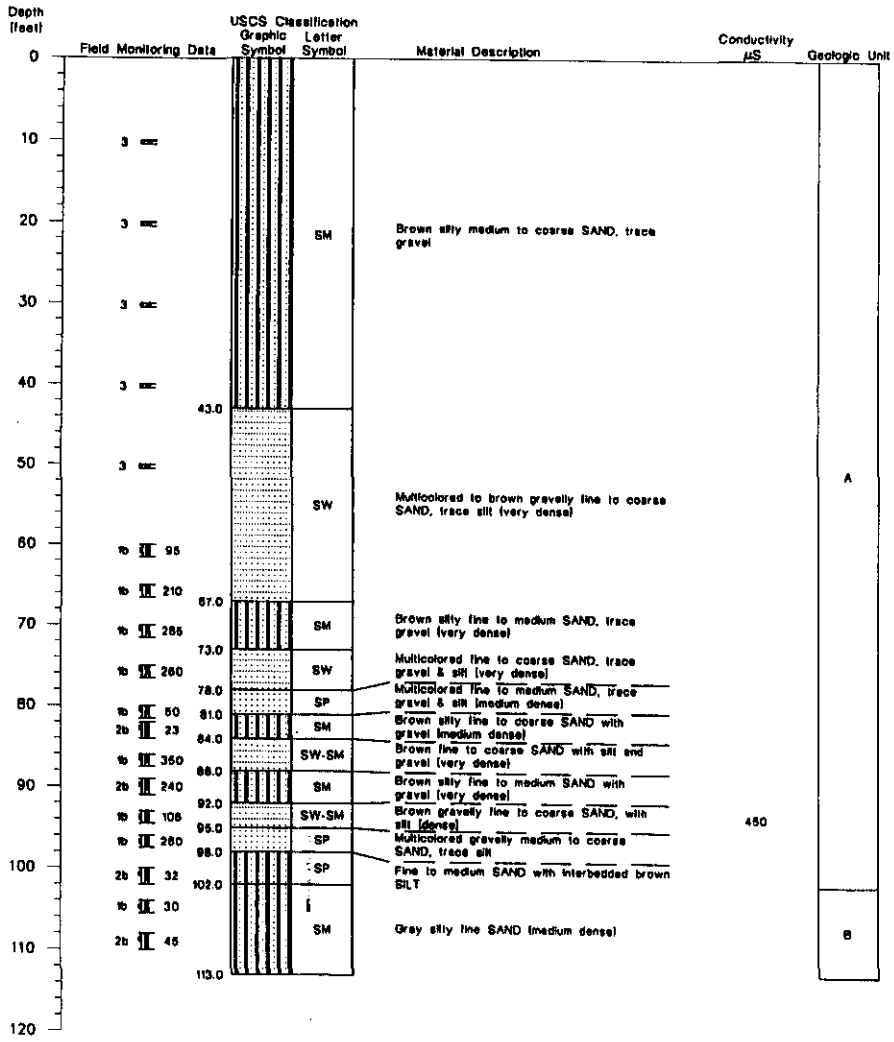
Extraction Well As-Built Diagram
CP-S4



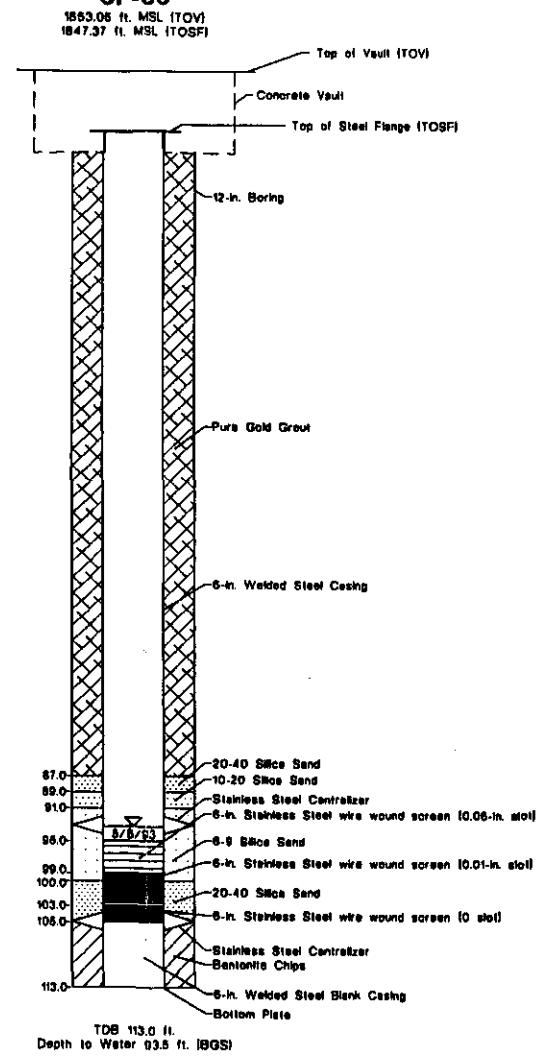
Boring Log and Well Completion Diagram
For Extraction Well CP-S4

Figure D-5

Geologic Profile
Boring CP-S5



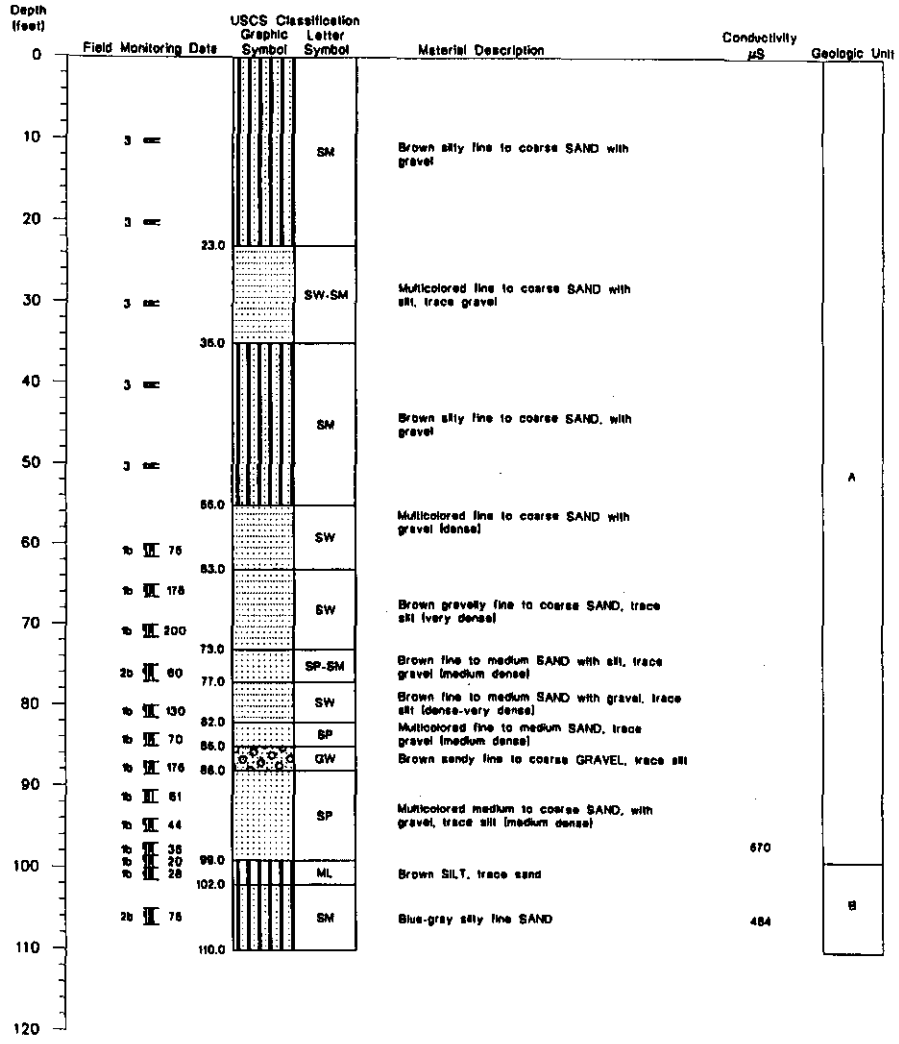
Extraction Well As-Built Diagram
CP-S5



Boring Log and Well Completion Diagram
For Extraction Well CP-S5

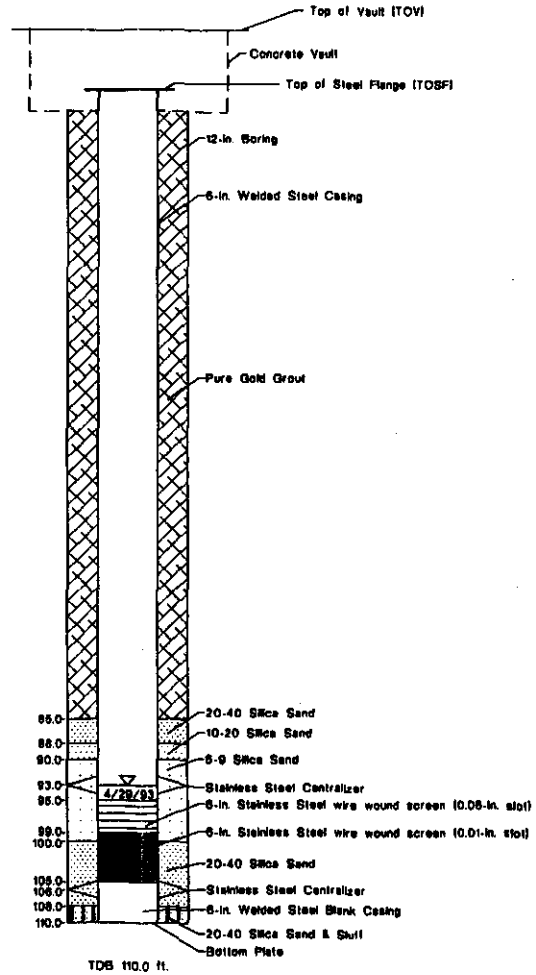
Figure D-6

Geologic Profile
Boring CP-S6



Extraction Well As-Built Diagram
CP-S6

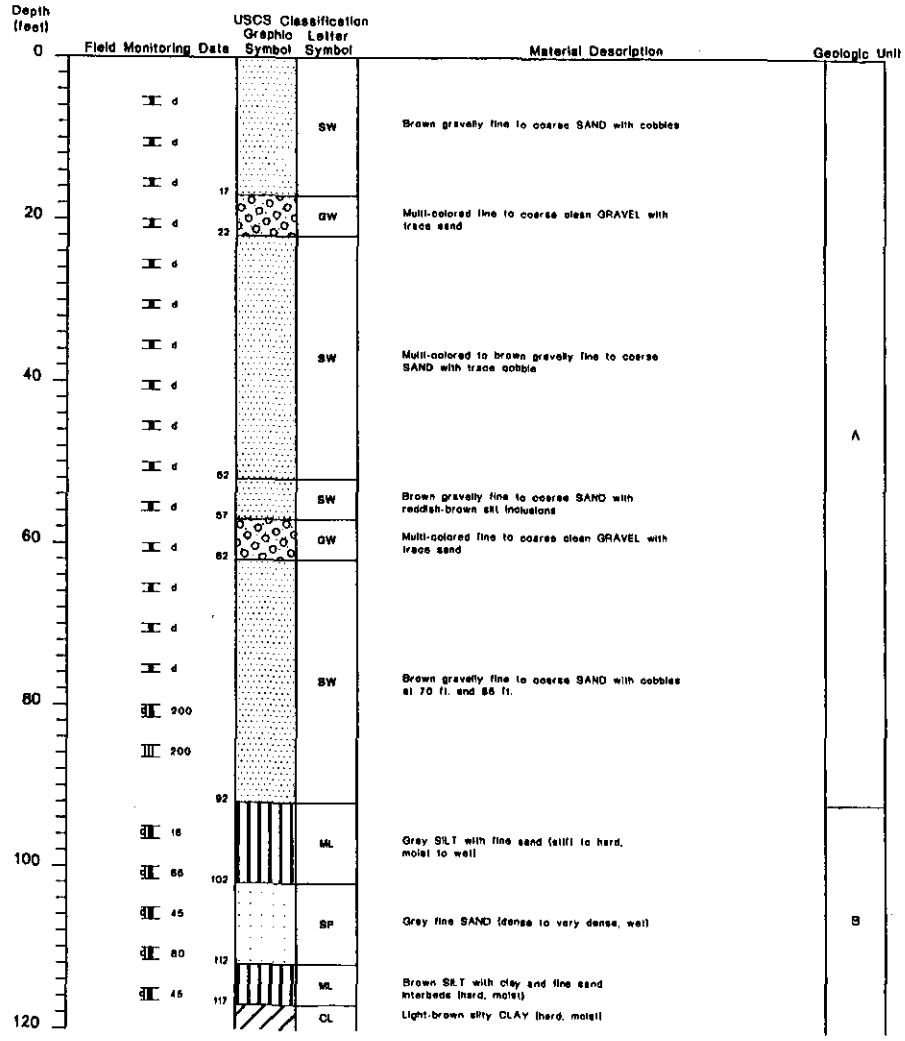
1853.25 ft. MSL (TOV)
1847.67 ft. MSL (TOSF)



Boring Log and Well Completion Diagram
For Extraction Well CP-S6

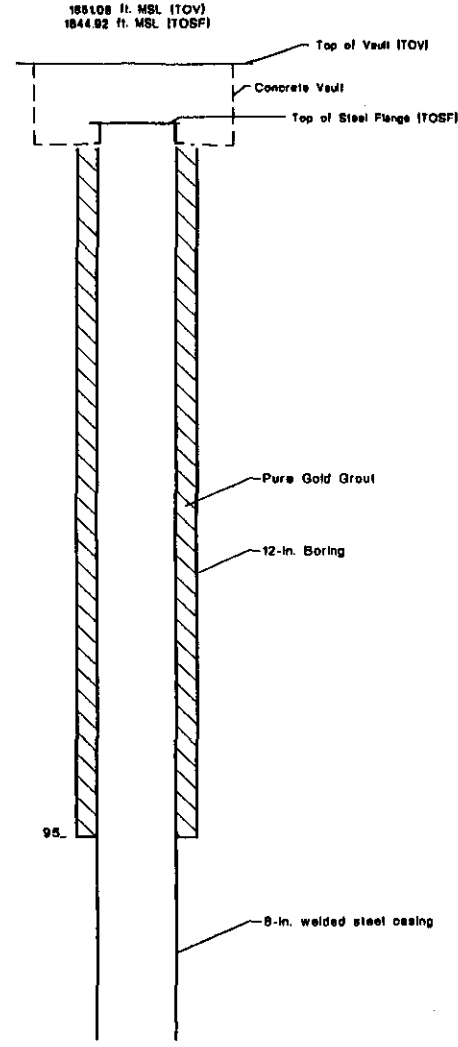
Figure D-7

Geologic Profile
Boring CP-W1



(Continued on next page)

Pilot Extraction Well As-Built Diagram
CP-W1



(Continued on next page)

Boring Log and Well Completion Diagram
For Extraction Well CP-W1

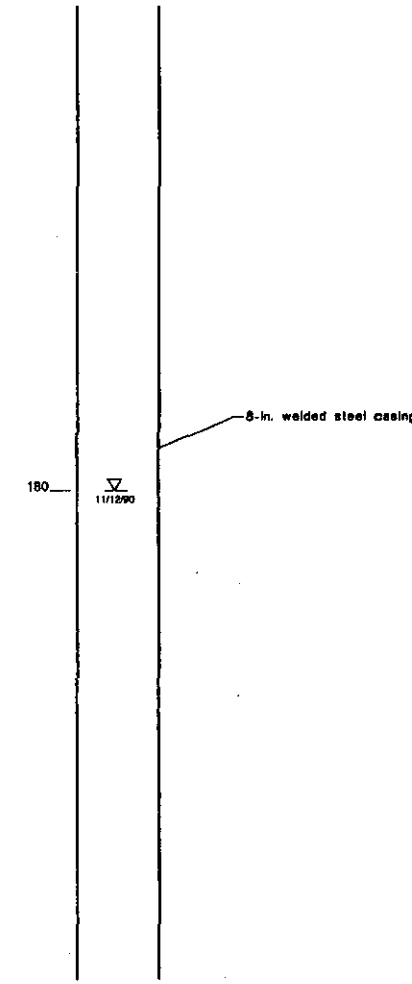
Figure D-8
(1 of 3)

Geologic Profile
Boring CP-W1

Depth (feet)	Field Monitoring Data		USCS Classification Graphic Symbol	USCS Classification Letter Symbol	Material Description	Geologic Unit
120	114			CL	See previous page	B
	64					
	60	132		CL	Brown mottled with gray-green laminated CLAY with very thin fine sand interbeds (hard, moist)	
	65	137				
140	80			CL	Brown CLAY with very thin silt layers (hard, moist)	
	85	147				
	120	152		SP	Gray fine SAND (very dense, wet)	
	100			CL	Gray to light-brown silty CLAY (hard, moist)	
160	110					
	150	167				
	130	172		SP	Gray fine SAND (very dense, wet)	
	102	177		SP-SM	Gray fine SAND with silt (very dense, wet)	
180	110			CL	Gray to brown CLAY with fine sand and silt interbeds (hard, wet)	
	175	184		SP	Brown fine to medium SAND with trace fine gravel (very dense, wet)	C
	195	187				
	195			SP	Gray to gray-brown fine SAND (very dense, wet)	
200	145	202				
	140			SW	Brown fine to coarse SAND with trace gravel and silt at 210 ft. (very dense, wet)	
	170	212				
	160			SP	Brown fine to medium SAND (very dense, wet)	
220	195	222				
	220			SW	Brown fine to coarse SAND (very dense, wet)	
	250	232				
	250	237		SP	Brown fine to medium SAND (very dense, wet)	
240				SW-SM	Brown gravelly fine to coarse SAND with silt (very dense, wet)	

(Continued on next page)

Pilot Extraction Well As-Built Diagram
CP-W1

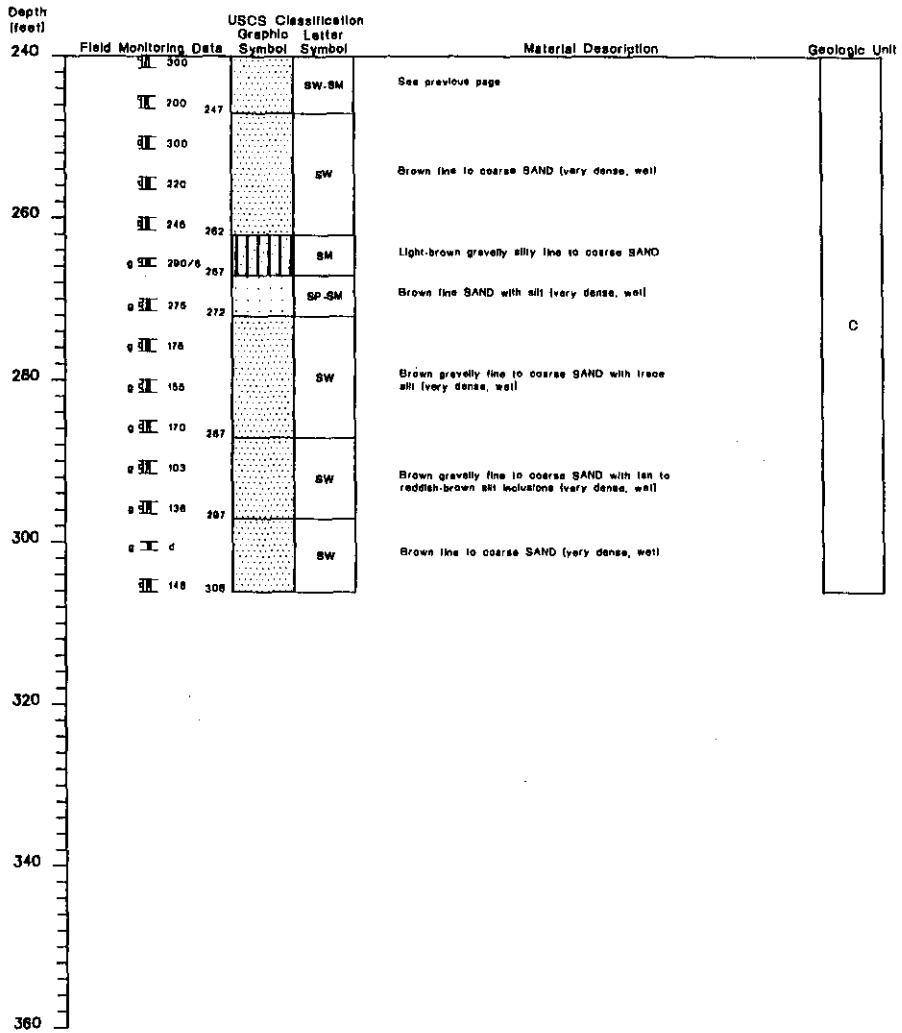


(Continued on next page)

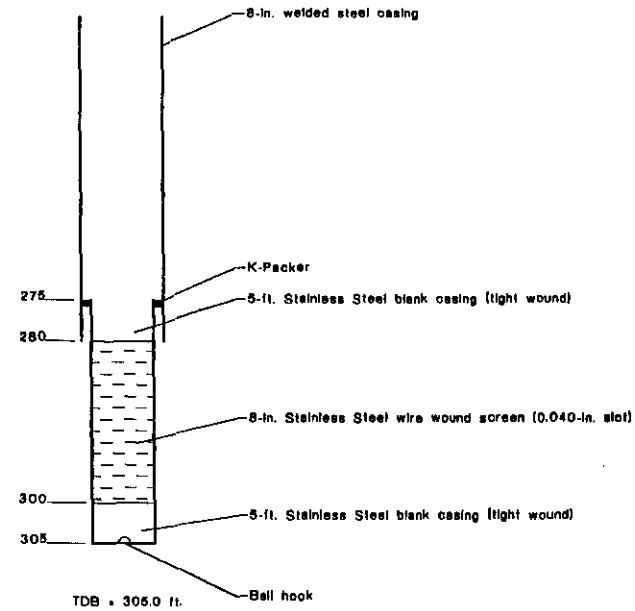
Boring Log and Well Completion Diagram
For Extraction Well CP-W1

Figure D-8
2 of 3

Geologic Profile
Boring CP-W1



Pilot Extraction Well As-Built Diagram
CP-W1



Boring Log and Well Completion Diagram
For Extraction Well CP-W1

Figure D-6
3 of 3

194004.110 Spokane Co./Colbert Landfill/Operations & Maintenance Plan (4) 1/97

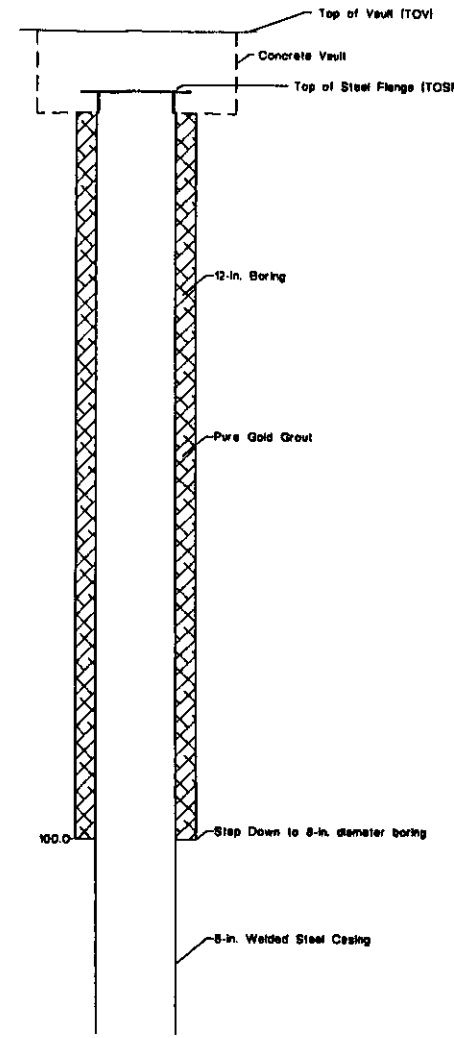
Geologic Profile
Boring CP-W2

Depth (feet)	Field Monitoring Data	USCS Classification Graphic Symbol	Letter Symbol	Material Description	Conductivity µS	Geologic Unit
0						
10						
20			SM	Brown silty fine to coarse SAND with fine gravel		
30	3					
	3					
	3					
			37.0			
40	3		SP/SW	Multicolored medium to coarse SAND with gravel, trace silt		
	3		43.0			
			SM	Brown silty gravelly medium to coarse SAND		A
			48.0			
50	3		SM	Brown silty fine to medium SAND with gravel		
			52.0			
	3		SW-SM	Brown gravelly, medium to coarse SAND with silt		
			57.0			
60	3		GP-GM	Brown sandy GRAVEL with silt		
			62.0			
	10	101	SP-SM	Brown fine to medium SAND with silt		
			66.0			
70	10	66	SP	Gravelly medium to coarse SAND, trace silt (medium dense)		
			71.0			
	10	60	SW	Multicolored medium to coarse SAND, trace gravel, trace silt		
			77.0			
80	10	83	SM	Gray to brown silty fine SAND (dense)		
	10	42	87.0			
90	10		CL	Gray silty CLAY with interbedded silty fine sand (very stiff)		
	10	26	97.0			
100	10	37	CL/SM	Blue gray CLAY interbedded with silty fine sand		
			102.0			
	10	22	SM	Gray silty fine SAND (loose)		B
			108.0			
110	10	76	ML/SM	Gray sandy SILT (hard)		
			112.0			
	10	86	CL	Brown / tan CLAY (hard)		
			117.0			
120			SM	Brown / gray silty fine SAND with clay (medium dense)		

(Continued Next Page)

Extraction Well As-Built Diagram
CP-W2

1848.36 ft. MSL (TOV)
1840.24 ft. MSL (TOSF)



Boring Log and Well Completion Diagram
For Extraction Well CP-W2

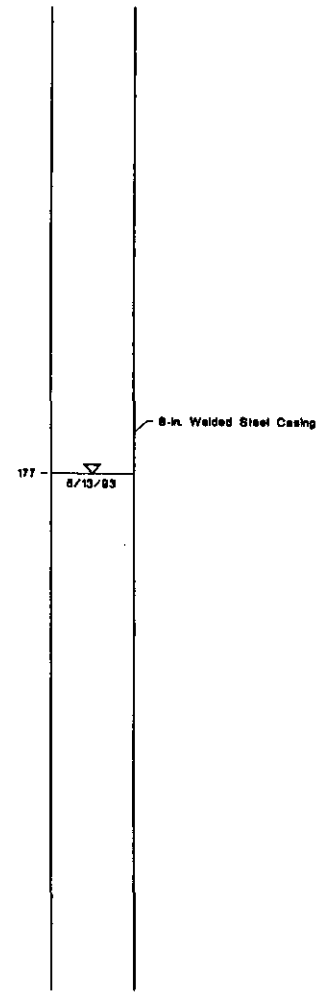
Figure D-9
(1 of 3)

Geologic Profile
Boring CP-W2

Depth (feet)	Field Monitoring Data	USCS Classification Graphic Symbol	Letter Symbol	Material Description	Conductivity µS	Geologic Unit
120	to 35		SM	Brown-gray silty fine SAND with clay (medium dense)		
		123.0	SM/CL	Tan silty fine SAND interbedded with tan silty clay		
		126.0				
130	to 85					
	to 110					
140	to 75		SM	Gray silty fine SAND (dense)		
	to 120					
150	to 200	152.0				B
	to 100		CL	CLAY (hard-very stiff)		
160	to 45	162.0				
	to 100		CL/SM	Green gray CLAY with interbedded gray silty fine sand (hard)		
		166.0				
170	to 70		CL	Green gray CLAY (hard)		
	to 160	176.0				
180	to 170		SP	Light brown fine to medium SAND with trace of green brown silt (very dense)		
		183.0				
	to 130/6"					
190	to 150/6"		SM	Tan to brown silty fine to medium SAND with interbedded clay, some organic material (dense to very dense)		
	to 200/6"					
		198.0				
200	to 200/6"		SP	Brown silty fine to medium SAND with thin layers of black organic material (very dense)		
		203.0	ML	Brown sandy SILT		
	to	206.0				
210	to		SP	Fine to medium SAND, trace silt (very dense)	381	C
		212.0				
	to					
220	to		SP-SM	Fine to medium SAND with silt (very dense)		
		223.0				
	to 200	226.0	SM	Brown silty fine to medium SAND (very dense)	382	
230	to 160		SP-SM	Brown fine to medium SAND with silt, trace clay (very dense)		
		232.0				
	to 160/6"		SW-SM	Brown fine to coarse SAND with silt, trace gravel (very dense)		
240		238.0	SP-SM	Fine to medium SAND with silt (very dense)		

(Continued Next Page)

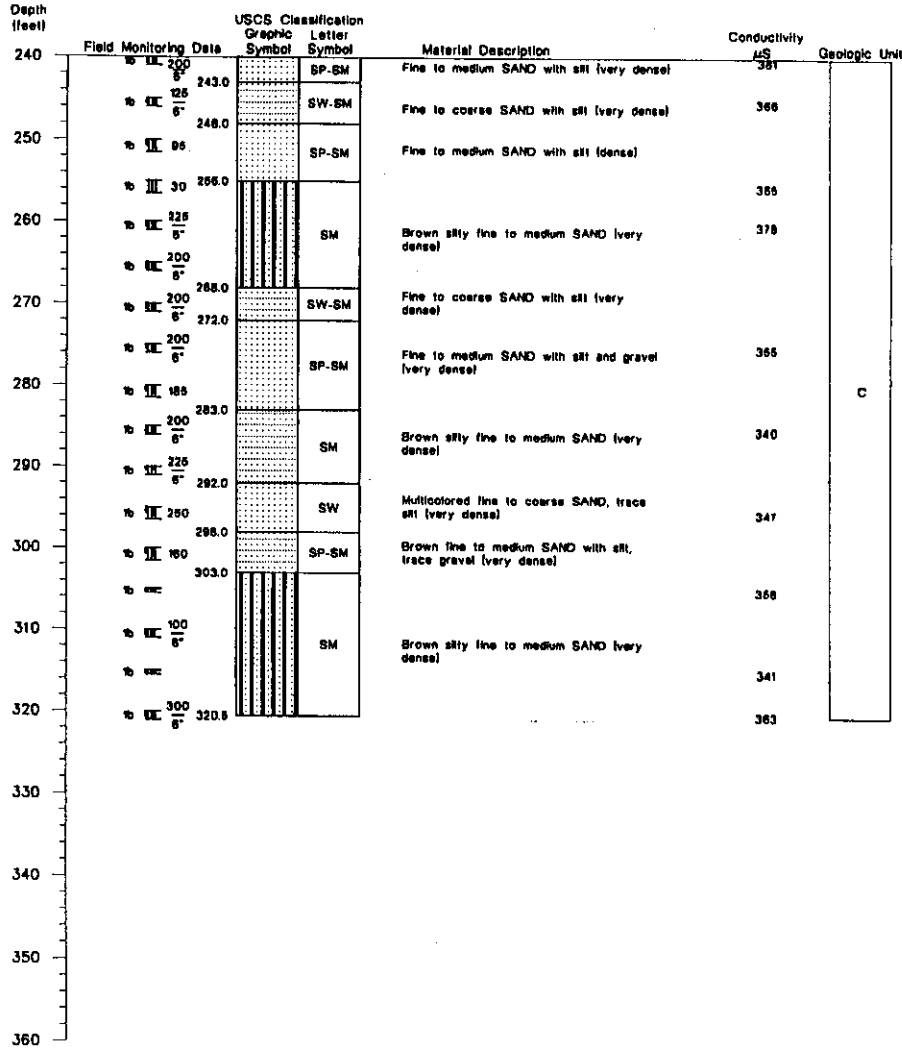
Extraction Well As-Built Diagram
CP-W2



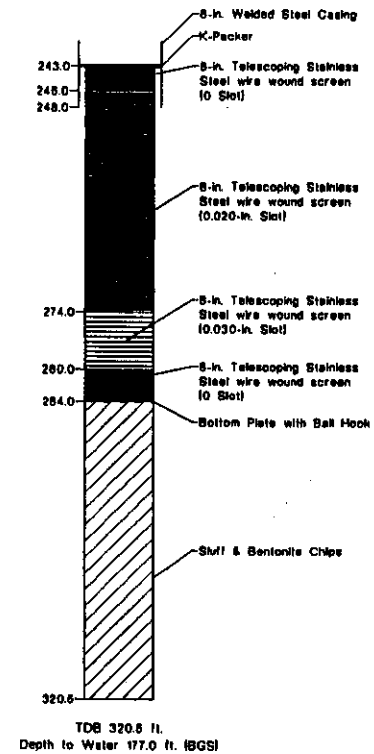
Boring Log and Well Completion Diagram
For Extraction Well CP-W2

Figure D-9
(2 of 3)

Geologic Profile
Boring CP-W2



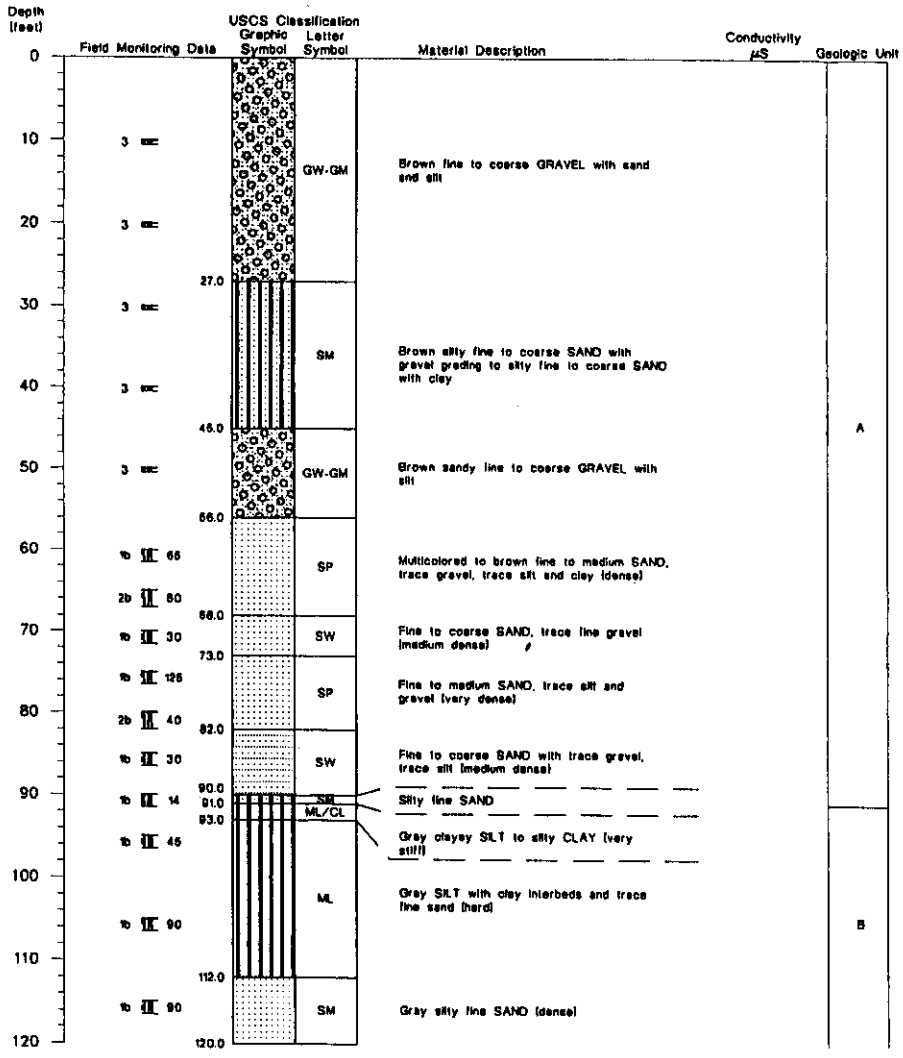
Extraction Well As-Built Diagram
CP-W2



Boring Log and Well Completion Diagram
For Extraction Well CP-W2

Figure D-9
(3 of 3)

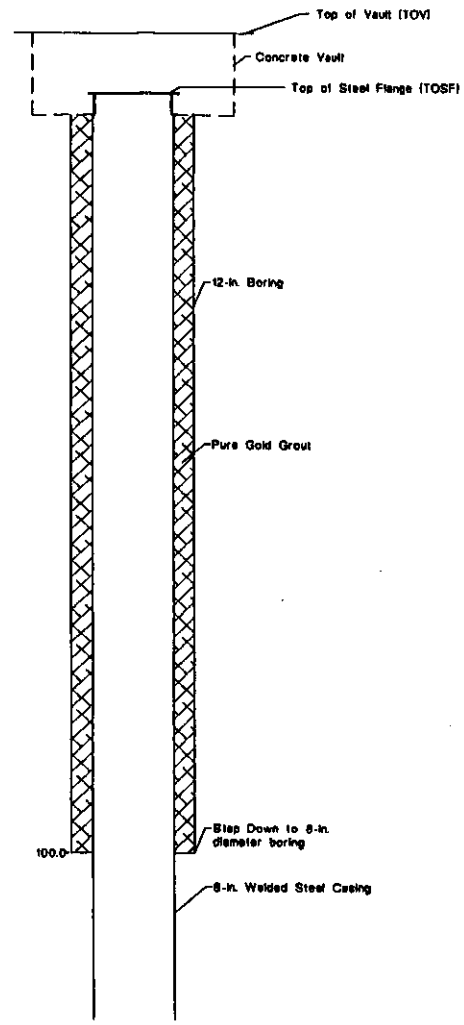
Geologic Profile
Boring CP-W3



(Continued Next Page)

Extraction Well As-Built Diagram
CP-W3

1847.81 ft. MSL (TOV)
1841.62 ft. MSL (TOSF)

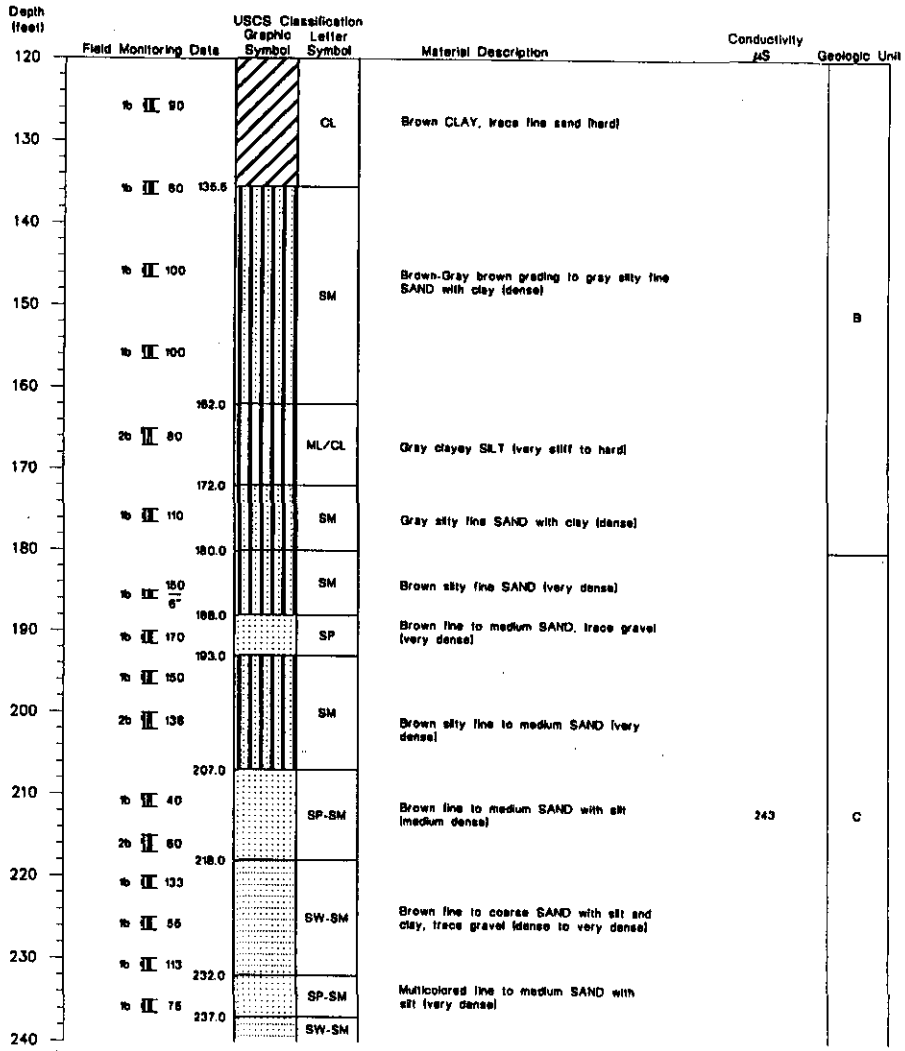


(Continued Next Page)

Boring Log and Well Completion Diagram
For Extraction Well CP-W3

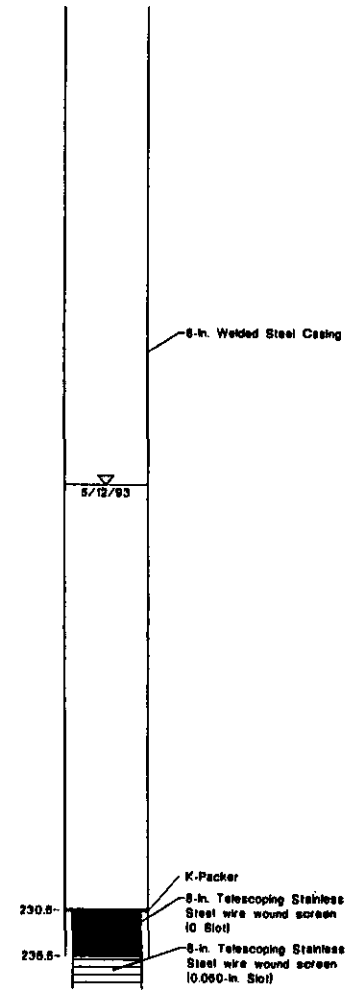
Figure D-10
(1 of 3)

Geologic Profile
Boring CP-W3



(Continued Next Page)

Monitoring Well As-Built Diagram
CP-W3

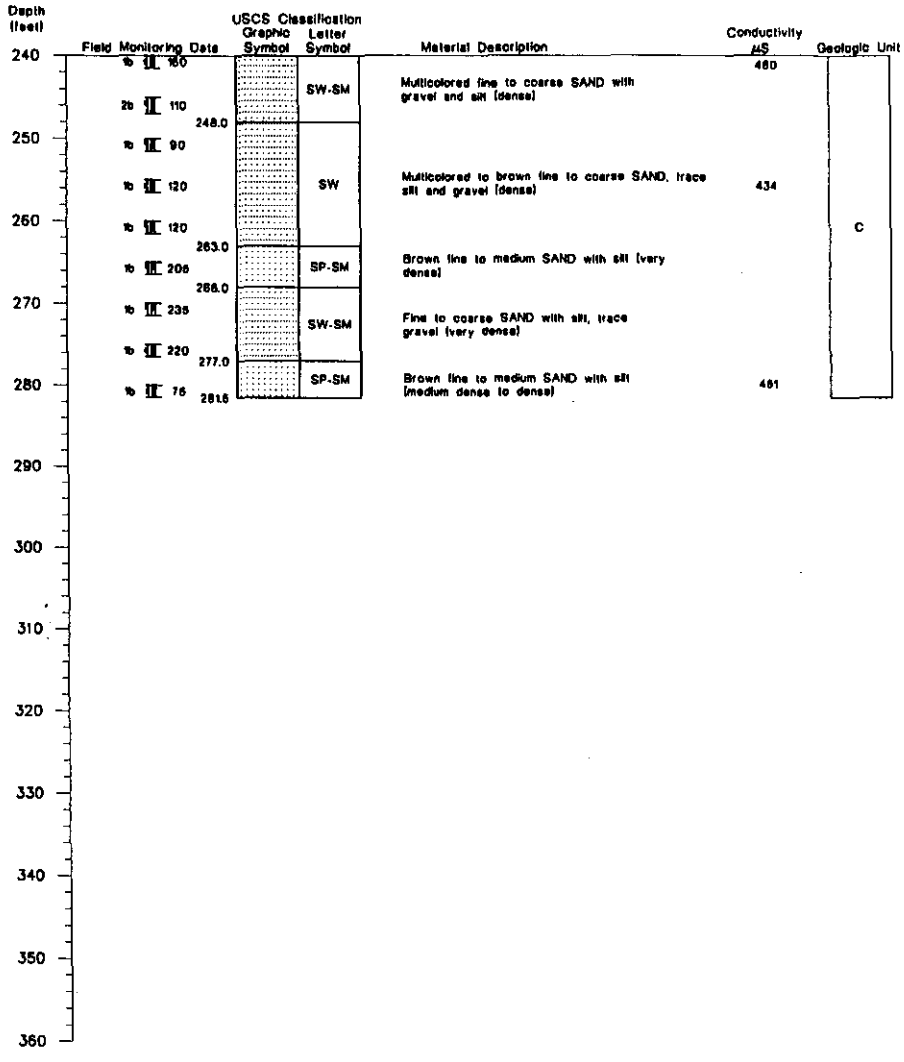


(Continued Next Page)

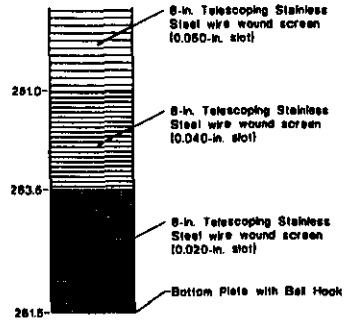
Boring Log and Well Completion Diagram
For Extraction Well CP-W3

Figure D-10
(2 of 3)

Geologic Profile
Boring CP-W3



Extraction Well As-Built Diagram
CP-W3



TDB = 281.5 ft.
Depth to Water 176.0 ft. (BGS)

Boring Log and Well Completion Diagram For Extraction Well CP-W3	Figure D-10 (3 of 3)