

Table 5.1 Department 26 RFI soil results summary; organic compounds

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCE µg/kg	1,2-DCE (total) µg/kg	Chloro-ethene µg/kg	TPH-Cs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chloro-benzenes µg/kg	Other µg/kg
0358	D26-BH01 :04	12/16/91	350/1242				1100						Methylene chloride - 7
0359	:7.5	12/16/91	0.5/1242	*	*	*		*	*	*	*	*	
0360	:09	12/16/91	0.5/1242										Methylene chloride - 10
0361	:14	12/16/91	50/1242				61						Methylene chloride - 7
0362	:19	12/16/91	0.5/1242	*	*	*		*	*	*	*	*	
0363	:24	12/16/91	0.34/1242										Methylene chloride - 7
0364	:29	12/16/91	86/1242	*	*	*	62	*	*	*	*	*	
0365	:34	12/16/91	240/1242				260						Acetone - 20
0366	:39	12/16/91	470/1242				520						Tetrachloroethane - 7
0367	:42	12/16/91	3700/1242	70	8		2500						Tetrachloroethene - 10
0368	Trip Blank	12/17/91	*				*						Methylene chloride - 19
0369	D26-BH02 :04	12/17/91	0.07/1242										
0370	:09	12/17/91	0.09/1242	*	*	*		*	*	*	*	*	
0371	:14	12/17/91											
0372	:19	12/17/91		*	*	*		*	*	*	*	*	
0373	:24	12/17/91											Acetone - 32
0374	:29	12/17/91	0.04/1242	*	*	*		*	*	*	*	*	
0375	:34	12/17/91	0.07/1242										Acetone - 7
0376	:39	12/17/91											Acetone - 19
0377	:42	12/17/91	0.06/1242	*	*	*		*	*	*	*	*	
0378	Equip. Rinse	12/17/91											Chloroform - 6
0379	Field Blank	12/17/91											
0380	Trip Blank	12/17/91*				*							
0381	D26-BH03 8.5	12/18/91	0.5/1242	*	*	*	5	*	*	*	*	*	
0382	:13.5	12/18/91	0.16/1242	*	*	*		*	*	*	*	*	
0383	:18.5	12/18/91	2.7/1242	*	*	*	7	*	*	*	*	*	
0384	:23.5	12/18/91	0.1/1242	*	*	*		*	*	*	*	*	
0385	:28.5	12/18/91	0.5/1242		7								Methylene chloride - 8 Acetone - 41
0386	:38.5	12/18/91	1.7/1242	*	*	*	20	*	*	*	*	*	
0387	:40.5	12/18/91	(1242)	6700	10								Acetone - 24
0388	Trip Blank	12/18/91	*				*						Methylene chloride - 19
0389	D26-BH04 :04	12/19/91											Acetone - 27
0390	:09	12/19/91											Acetone - 22
0391	:14	12/19/91											Acetone - 27
0392	:19	12/19/91			9								Acetone - 23
0393	:24	12/19/91	0.3/1242	*	*	*		*	*	*	*	*	
0394	:29	12/19/91	0.1/1242	*	*	*		*	*	*	*	*	
0395	:34	12/19/91			210								Acetone - 29
0396	:39	12/19/91	0.08/1242		270								Acetone - 29

Table 5.1 (continued)

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCE µg/kg	1,2-DCE (total) µg/kg	Chloro-ethene µg/kg	TPHCs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chloro-benzene µg/kg	Other µg/kg
0397	D26-BH04 :42	12/19/91	690/1242	*	*	*	600	*	*	*	*	*	
0398	Trip Blank	12/19/91		*			*						Acetone - 8
0399	D20-BH03 :04	2/19/91											
0400	:07	2/19/91											
0401	:11	2/19/91											Acetone - 6
0402	:19	2/19/91	1.7/1242										
0403	:24	2/19/91											Acetone - 7
0404	:29	2/19/91											Methylene chloride - 10
0405	:34	2/19/91											Methylene chloride - 8
0406	:38	2/19/91											Methylene chloride - 6
0407	:41	2/19/91											
0408	Trip Blank	2/19/91		*			*						
0409	Trip Blank	2/19/91		*			*						
0410	D20-BH04 :04	2/20/92											Methylene chloride - 14 Acetone - 27
0411	:09	2/20/92											
0412	:14	2/20/92											Acetone - 14
0413	:19	2/20/92											
0414	:24	2/20/92											Acetone - 13
0415	:29	2/20/92											Acetone - 11
0416	:34	2/20/92											Acetone - 13
0417	:37	2/20/92											Acetone - 26
0418	:41	2/20/92											Acetone - 61
0419	Equip Rinse	2/20/92											
0420	Trip Blank	2/21/92		*			*						
0421	Trip Blank	2/21/92		*			*						Methylene chloride - 7 Acetone - 13
0422	D20-BH05 :02	2/21/92											
0423	:04	2/21/92											
0424	:09	2/21/92											Acetone - 23
0425	:13	2/21/92											Acetone - 44
0426	:18	2/21/92											Methylene chloride - 12
0427	:24	2/21/92											Methylene chloride - 14
0428	:29	2/21/92											Methylene chloride - 10 Acetone - 20
0429	:34	2/21/92											Methylene chloride - 11 Acetone - 41
0430	:39	2/21/92		1	11								
0431	:41	2/21/92		4300	5								1,1,2-TCE - 2
0432	Trip Blank	2/21/92		*			*						Methylene chloride - 7

Table 5.1 (continued)

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCB µg/kg	1,2-DCE (total) µg/kg	Chloro-ethene µg/kg	TPHCs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chloro-benzenes µg/kg	Other µg/kg
0433	Trip Blank	2/21/92	*				*						
0434	D20-BH06 :02	2/22/92											
0435	:04	2/22/92											
0436	:07	2/22/92										Methylene chloride - 7 Acetone - 23	
0437	:09	2/22/92										Acetone - 130 2-Butanone - 14	
0438	:14	2/22/92											
0439	:19	2/22/92		2									
0440	:24	2/22/92										Acetone - 14	
0441	:29	2/22/92										Acetone - 16	
0442	:34	2/22/92											
0443	:37	2/22/92		3									
0444	:41	2/22/92		130	6							Acetone - 26	
0445	Trip Blank	2/22/92	*				*					Methylene chloride - 7	
0446	Trip Blank	2/22/92	*				*						
0447	D20-BH07 :02	2/22/92											
0448	:04	2/22/92										Acetone - 89	
0449	:06	2/22/92										Acetone - 280 2-Butanone - 39	
0450	:14	2/22/92										Acetone - 35	
0451	:18	2/22/92											
0452	:24	2/22/92											
0453	:29	2/22/92											
0454	:34	2/22/92											
0455	:37	2/22/92											
0456	:39	2/22/92											
0457	Trip Blank	2/22/92	*				*					Methylene chloride - 29 Acetone - 17	
0458	D20-BH08 :02	2/23/92							1			Methylene chloride - 12 Acetone - 54 2-Butanone - 11	
0459	Trip Blank	2/23/92	*				*					Methylene chloride - 22 Acetone - 7	
0460	Trip Blank	2/23/92	*				*						
0461	D20-BH08 :04	2/23/92										Methylene chloride - 9 Acetone - 47 2-Butanone - 13	
0462	:09	2/23/92										Methylene chloride - 10 Acetone - 22	
0463	:13	2/23/92										Acetone - 10	
0464	:19	2/23/92		2								Methylene chloride - 7 Acetone - 7	

Table 5.1 (continued)

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCB µg/kg	1,2-DCE (total) µg/kg	Chloro-ethene µg/kg	TPHCs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chloro-benzene µg/kg	Other µg/kg
0465	D20-BH08 :24	2/23/92		2	2								Methylene chloride - 7 Acetone - 9
0466	:28	2/23/92			2								Methylene chloride - 8 Acetone - 11
0467	:34	2/23/92											Methylene chloride - 15 Acetone - 22
0468	:38	2/23/92			2								Methylene chloride - 7 Acetone - 10
0469	:41	2/23/92	310/1242	5700	14								Methylene chloride - 6 Acetone - 12
0470	D26-BH05 :7.5	2/24/92	1.7/1242										
0471	:10.5	2/24/92	15./1242										
0472	:16.5	2/24/92	5.6/1242										
0473	:21.5	2/24/92	1.8/1242 0.18/1260	3									
0474	:28.5	2/24/92	0.35/1242		7								Methylene chloride - 5
0475	:31.5	2/24/92			4								Acetone - 21
0476	:35.5	2/24/92	0.1/1242		4								
0477	:39.5	2/24/92	0.4/1260	*	*	*		*	*	*	*	*	
0478	Trip Blank	2/24/92	*				*						
0479	D26-BH06 :8.5	2/25/92	360/1242	55	20								Acetone - 14
0480	:13.5	2/25/92	450/1242	94	12								Acetone - 10
0481	:18.5	2/25/92	530/1242	1200	32	7		2					Acetone - 8
0482	:21.5	2/25/92	260/1242	25K	260	12		3				2	
0483	:26.5	2/25/92	240/1242	500	1200								
0484	:32.5	2/25/92	660/1242	15	10	9							
0485	:37.5	2/25/92	47/1242	66	7	1							
0486	:40.5	2/25/92	10000/1242	200	2000	6						3	Acetone - 6
0487	Trip Blank	2/25/92	*				*						
0488	D26-BH08 :05	2/27/92	0.2/1242										
0489	:09	2/27/92											
0490	:14	2/27/92	0.6/1248										
0491	:17	2/27/92	0.1/1248										
0492	:24	2/27/92	0.3/1242										
0493	:29	2/27/92											
0494	:32	2/27/92											
0495	:39	2/27/92		3	35								
0496	:42	2/27/92	0.17/1242	6300	530								Tetrachloroethylene-5
0497	Trip Blank	2/27/92	*				*						
0498	D20-BH09 :04	2/28/92											
0499	:09	2/28/92											Acetone - 17

Table 5.1 (continued)

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCE µg/kg	1,2-DCE (total) µg/kg	Chloro-ethene µg/kg	TPHCs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chloro-benzene µg/kg	Other µg/kg
0500	D20-BH09 :14	2/28/92											
0501	:19	2/28/92											
0502	:24	2/28/92			41								
0503	:29	2/28/92			120								
0504	:34	2/28/92			38	40							
0505	:39	2/28/92	0.01/1242	130	110							Methylene chloride - 9	
0506	:42	2/28/92	4.1/1242	27	30								
0507	D20-BH10 :04	2/28/92										Methylene chloride - 14	
0508	:09	2/28/92	0.09/1242	2	14							Methylene chloride - 14 Acetone - 84 2-Butanone - 10	
0509	:14	2/28/92	0.06/1242	10	94	3						Acetone - 15 Methylene chloride - 4	
0510	:18	2/28/92			10	69						Methylene chloride - 4 Acetone - 15	
0511	:23	2/28/92			5	85	4					Acetone - 21 Methylene chloride - 4	
0512	:28	2/28/92				250	7					Methylene chloride - 4 Acetone - 22	
0513	:32	2/28/92				230						Methylene chloride - 4 Acetone - 25	
0514	:37	2/28/92			61	96						Methylene chloride - 16 Acetone - 35	
0515	:41	2/28/92	0.18/1221	66	49							Methylene chloride - 44 Acetone - 33	
0516	Trip Blank	2/28/92	*				*						
0517	Trip Blank	2/28/92	*				*						
0518	Equip Rinse	2/28/92	0.004/1242									Acetone - 17	
0519	D26-BH09 :04	2/29/92											
0520	:09	2/29/92											
0521	:14	2/29/92			370	590							
0522	:19	2/29/92	0.3/1242	11	36								
0523	:24	2/29/92			*	*	*		*	*	*	*	*
0524	:29	2/29/92				67							
0525	:34	2/29/92			4	42							
0526	:39	2/29/92			360	170						Tetrachloroethene-3	
0527	:42	2/29/92	0.25/1242	*	*	*		*	*	*	*	*	*
0528	Equip Rinse	2/29/92	0.001/1248									Acetone - 36	
0529	Field Blank	2/29/92										Chloroform - 18	
0530	Trip Blank	2/29/92	*				*						
0550	D26-BH07 :8.5	4/7/92	560/1248					1000					Acetone - 26 Methylene chloride-13
0551	:13.5	4/7/92	150/1242	*	*	*	*	*	*	*	*	*	*

Table 5.1 (continued)

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCB µg/kg	1,2-DCB (total) µg/kg	Chloro-ethene µg/kg	TPHCs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chloro-benzene µg/kg	Other µg/kg
0552	D26-BH07 :18.5	4/7/92	400/1242				8						
0553	:23.5	4/7/92	0.28/1242	*	*	*	*	*	*	*	*	*	*
0554	:28.5	4/7/92	2.3/1242		120	38							Acetone - 16 Methylene chloride - 35
0555	:32.5	4/7/92	1.4/1242	10	440		8						Methylene chloride - 16
0556	:38.5	4/7/92	4.2/1242	19	130								Methylene chloride - 8
0557	:40.5	4/7/92	270/1242	720	230		39						Acetone - 16
0558	Trip Blank	4/8/92	*				*						
0562	D26-BH10 :8.5	4/9/92	11/1248				26						Methylene chloride - 6 Acetone - 48
0563	:~13.5	4/9/92	3/1242	~*	*	*	*	*	*	*	*	*	*
0564	:18.5	4/9/92	390/1248			67	330						
0565	:23.5	4/9/92	7.3/1242	*	*	*	*	*	*	*	*	*	*
0566	:28.5	4/9/92	0.39/1242			52							
0567	:33.5	4/9/92	0.46/1242	*	*	*	*	*	*	*	*	*	
0568	:39.5	4/9/92	8.2/1242	*	*	*	*	*	*	*	*	*	
0569	:40.5	4/9/92	20/1242	2800	1100	180	*						Acetone - 29 Methylene chloride - 12
0570	Trip Blank	4/10/92	*				*						Methylene chloride - 18
0571	D26-BH11 :8.5	4/10/92	0.12/1248 0.29/1254 0.51/1260				85						Acetone - 20
0572	:13.5	4/10/92	0.15/1242	*	*	*	*	*	*	*	*	*	
0573	:23.5	4/10/92			6								Methylene chloride - 30 Acetone - 97
0574	:28.5	4/10/92	*	*	*	*	*	*	*	*	*	*	
0575	:33.5	4/10/92			68								Methylene chloride - 8
0576	:38.5	4/10/92	*	*	*	*	*	*	*	*	*	*	
0577	:41.5	4/10/92	0.095/1242	12000	190		120						Methylene chloride - 32 Acetone - 170 Tetrachloroethane - 31
0578	Equip Rinse	4/10/92		20									
0579	Field Blank	4/10/92		18									Chloroform - 5
0580	Trip Blank	4/11/92	*				*						Methylene chloride - 17
0581	D26-BH12 :8.5	4/11/92	0.21/1242	*	*	*	*	*	*	*	*	*	
0582	:13.5	4/11/92					39						Methylene chloride - 11 Acetone - 56
0583	:17.5	4/11/92	1.8/1242			9							Acetone - 19
0584	:23.5	4/11/92	*	*	*	*	*	*	*	*	*	*	
0585	:28.5	4/11/92	0.19/1242										
0586	:33.5	4/11/92		*	*	*	*	*	*	*	*	*	
0587	:38.5	4/11/92	0.099/1242										

Table 5.1 (continued)

Sample Number	Borehole Depth, ft	Date Collected	PCBs mg/kg	TCE µg/kg	1,2-DCE (total) µg/kg	Chloroethene µg/kg	TPHCs mg/kg	Benzene µg/kg	Toluene µg/kg	Ethyl benzene µg/kg	Xylene (total) µg/kg	Chlorobenzene µg/kg	Other µg/kg
0588	D26-BH12 :40.5	4/11/92	0.17/1242	*	*	*	*	*	*	*	*	*	*
0589	Trip Blank	4/11/92	*				*						Methylene chloride - 19
0590	D26-BH13: 04	6/3/92		6	4		9.4						Methylene chloride - 6 2-Butanone - 27 Acetone - 55
0591	:07	6/3/92	**	*	*	*	*	*	*	*	*	*	*
0592	:14	6/3/92		12	36								Methylene chloride - 6
0593	:18	6/3/92		72	200								
0594	:22	6/3/92		3100	3000								
0595	:27	6/3/92		6000	7000								
0596	:32	6/3/92		13000	9500								
0597	:39	6/3/92		16000	7700								
0598	:41	6/3/92		14000	3800								
0599	Equip Rinse	6/3/92											Methylene chloride - 5
0600	Field Blank	6/3/92											Methylene chloride - 5 Chloroform - 16
0601	Trip Blank	6/3/92	*			*							Methylene chloride - 21
0602	D26-BH14 :15	6/4/92		7	90								Methylene chloride - 22
0603	:20	6/4/92		110	820	29							Methylene chloride - 82 Acetone - 73
0604	:25	6/4/92		3	240								Methylene chloride - 26 Acetone - 53
0605	:31	6/4/92		1400	840								Methylene chloride - 100 Acetone - 160
0606	Trip Blank	6/4/92	*				*						Methylene chloride - 25
8664	D20-BH01 :05	6/5/91				*							
8665	:14	6/5/91				*							
8666	:28	6/5/91		32	110	*							
8667	:38.5	6/5/91				*							
8668	D20-BH02 :09	6/6/91		24	31	*							2-Butanone - 27
8669	:19	6/6/91		98	10	*							1,1,2-Trichloroethane - 61
8670	:24	6/6/91		2400	2500	*							1,2-Dichloroethane - 28 1,1,2-Trichloroethane - 260
8671	:39	6/6/91		2500	76	*							Tetrachloroethylene - 47 1,1,2-Trichloroethane - 270
8672	Equip. Rinse	6/6/91	*			*	*						
8673	Trip Blank	6/6/91	*			*	*						

All blank spaces represent non-detect.

All entries marked with an ** were not analyzed for.

All TPHC results represent heavy ends as diesel fuel.

PCB results: concentration/Aroclor type.

Trip blanks analyzed for VOCs only.

**Table 5.2 Department 26 RFI soil results summary,
metals exceeding threshold concentrations, mg/kg**

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0358	D26BH01:04	12/16/91								*		
0359	7.5	12/16/91	*	*	*	*	*	*	*	*	*	*
0360	09	12/16/91								*		
0361	14	12/16/91								*		
0362	19	12/16/91	*	*	*	*	*	*	*	*	*	*
0363	24	12/16/91	18.8							*		
0364	29	12/16/91	*	*	*	*	*	*	*	*	*	*
0365	34	12/16/91								*		
0366	39	12/16/91								*		
0367	42	12/16/91	30.4							*		
0368	Trip Blank	12/17/92	*	*	*	*	*	*	*	*	*	*
0369	D26BH02:04	12/17/91								*		
0370	09	12/17/91	*	*	*	*	*	*	*	*	*	*
0371	14	12/17/91								*		
0372	19	12/17/91	*	*	*	*	*	*	*	*	*	*
0373	24	12/17/91								*		
0374	29	12/17/91	*	*	*	*	*	*	*	*	*	*
0375	34	12/17/91								*		
0376	39	12/17/91	15.9					*		*	*	121
0377	42	12/17/91	*	*	*	*	*	*	*	*	*	*
0378	Equip. Rinse	12/17/91	u	u	u	u	35.8	u	*	u	u	43.5
0379	Field Blank	12/17/91	u	u	u	u	31.8	u	*	u	u	22.8
0380	Trip Blank	12/17/91	*	*	*	*	*	*	*	*	*	*
0381	D26BH03:8.5	12/18/91								*		
0382	13.5	12/18/91								*		
0383	18.5	12/18/91								*		
0384	23.5	12/18/91								*		
0385	28.5	12/18/91								*		
NS	33.5	12/18/91								*		
0386	38.5	12/18/91								*		
0387	40.5	12/18/91								*		
0388	Trip Blank	12/18/91	*	*	*	*	*	*	*	*	*	*

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0389	D26BH04:04	12/19/91							*			
0390	09	12/19/91							*			
0391	14	12/19/91							*			
0392	19	12/19/91							*			
0393	25	12/19/91							*			
0394	30	12/19/91										
0395	35	12/19/91										
0396	40	12/19/91										
0397	42	12/19/91										
0398	Trip Blank	12/19/91	*	*	*	*	*	*	*	*	*	*
0399	D20BH03:05	02/19/91										
0400	07	02/19/91										
0401	11	02/19/91	13.4									
0402	19	02/19/91							3470			
0403	24	02/19/91										
0404	29	02/19/91										
0405	34	02/19/91										
0406	38	02/19/91										
0407	41	02/19/91	47.4									
0408	Trip Blank	02/19/91	*	*	*	*	*	*	*	*	*	*
0409	Trip Blank	02/19/91	*	*	*	*	*	*	*	*	*	*
0410	D20BH04:04	02/20/92							2220			
0411	09	02/20/92										
0412	14	02/20/92										
0413	19	02/20/92							4210			
0414	24	02/20/92										
0415	29	02/20/92										
0416	34	02/20/92										
0417	37	02/20/92										
0418	41	02/20/92	19.7									
0419	Equip. Rinse	02/20/92					0.07	0.007	0.023			0.087
0420	Trip Blank	02/21/92	*	*	*	*	*	*	*	*	*	*
0421	Trip Blank	02/21/92	*	*	*	*	*	*	*	*	*	*

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0422	D20BH05:02	02/21/92										
0423	04	02/21/92										
0424	09	02/21/92										
0425	13	02/21/92										
0426	18	02/21/92										
0427	24	02/21/92										
0428	29	02/21/92										
0429	34	02/21/92										
0430	39	02/21/92										
0431	41	02/21/92	143						2100			
0432	Trip Blank	02/21/92	*	*	*	*	*	*	*	*	*	*
0433	Trip Blank	02/21/92	*	*	*	*	*	*	*	*	*	*
0434	D20BH06:02	02/22/92										
0435	04	02/22/92										
0436	07	02/22/92										
0437	09	02/22/92										
0438	14	02/22/92										
0439	19	02/22/92										
0440	24	02/22/92										
0441	29	02/22/92										
0442	34	02/22/92										
0443	37	02/22/92	24.2						1630			
0444	41	02/22/92	32.6						1230			
0445	Trip Blank	02/22/92	*	*	*	*	*	*	*	*	*	*
0446	Trip Blank	02/22/92	*	*	*	*	*	*	*	*	*	*
0447	D20BH07:02	02/22/92										
0448	04	02/22/92	21.7						1530			
0449	09	02/22/92										
0450	14	02/22/92										
0451	18	02/22/92										
0452	24	02/22/92										
0453	29	02/22/92										
0454	34	02/22/92										

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0455	D20BH07:37	02/22/92										
0456	39	02/22/92	24.4									
0457	Trip Blank	02/22/92	*	*	*	*	*	*	*	*	*	*
0458	D20BH08:02	02/23/92										
0459	Trip Blank	02/23/92	*	*	*	*	*	*	*	*	*	*
0460	Trip Blank	02/23/92	*	*	*	*	*	*	*	*	*	*
0461	D20BH08:04	02/23/92										
0462	09	02/23/92										
0463	13	02/23/92										
0464	19	02/23/92										
0465	24	02/23/92										
0466	28	02/23/92										
0467	34	02/23/92										
0468	38	02/23/92										
0469	41	02/23/92										
0470	D26BH05:7.5	02/24/92										
0471	10.5	02/24/92							1360			
0472	16.5	02/24/92										
0473	21.5	02/24/92							1860			
0474	28.5	02/24/92										
0475	31.5	02/24/92										
0476	35.5	02/24/92	22.3									
0477	39.5	02/24/92										
0478	Trip Blank	02/24/92	*	*	*	*	*	*	*	*	*	*
0479	D26BH06:8.5	02/25/92										
0480	13.5	02/25/92										
0481	18.5	02/25/92										
0482	21.5	02/25/92										
0483	26.5	02/25/92										
0484	32.5	02/25/92										
0485	37.5	02/25/92							7620			
0486	40.5	02/25/92	17.6							1280		
0487	Trip Blank	02/25/92	*	*	*	*	*	*	*	*	*	*

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Bc (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0488	D26BH08:05	02/27/92										
0489	09	02/27/92										
0490	14	02/27/92							2910			
0491	17	02/27/92										
0492	24	02/27/92										
0493	29	02/27/92										
0494	32	02/27/92										
0495	39	02/27/92										
0496	42	02/27/92			1.6							
0497	Trip Blank	02/27/92	*	*	*	*	*	*	*	*	*	*
0498	D20BH09:04	02/28/92										
0499	09	02/28/92										
0500	14	02/28/92										
0501	19	02/28/92										
0502	24	02/28/92										
0503	29	02/28/92										
0504	34	02/28/92	35.6									
0505	39	02/28/92							2440			
0506	42	02/28/92	15.9									
0507	D20BH10:04	02/28/92										
0508	09	02/28/92										
0509	14	02/28/92										
0510	18	02/28/92										
0511	23	02/28/92										
0512	28	02/28/92										
0513	32	02/28/92										
0514	37	02/28/92										
0515	41	02/28/92	20.3									
0516	Trip Blank	02/28/92	*	*	*	*	*	*	*	*	*	*
0517	Trip Blank	02/28/92	*	*	*	*	*	*	*	*	*	*
0518	Equip. Rinse	02/28/92					0.019		0.009			0.024
0519	D26BH09:04	02/29/92										
0520	09	02/29/92										

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0521	D26BH09:14	02/29/92										
0522	19	02/29/92										
0523	24	02/29/92										
0524	29	02/29/92										
0525	34	02/29/92										
0526	39	02/29/92										
0527	42	02/29/92	13.9									
0528	Equip. Rinse	02/29/92					0.023		0.004		0.066	
0529	Field Blank	02/29/92							0.023			
0530	Trip Blank	02/29/92	*	*	*	*	*	*	*	*	*	*
0550	D26BH07:8.5	04/07/92										
0551	13.5	04/07/92	*	*	*	*	*	*	*	*	*	*
0552	18.5	04/07/92										
0553	23.5	04/07/92	*	*	*	*	*	*	*	*	*	*
0554	28.5	04/07/92										
0555	32.5	04/07/92	*	*	*	*	*	*	*	*	*	*
0556	38.5	04/07/92										
0557	40.5	04/07/92	*	*	*	*	*	*	*	*	*	*
0558	Trip Blank	04/08/92	*	*	*	*	*	*	*	*	*	*
0562	D26BH10:8.5	04/09/92										
0563	13.5	04/09/92	*	*	*	*	*	*	*	*	*	*
0564	18.5	04/09/92										
0565	23.5	04/09/92	*	*	*	*	*	*	*	*	*	*
0566	28.5	04/09/92										
0567	33.5	04/09/92	*	*	*	*	*	*	*	*	*	*
0568	39.5	04/09/92										
0569	40.5	04/09/92	*	*	*	*	*	*	*	*	*	*
0570	Trip Blank	04/10/92	*	*	*	*	*	*	*	*	*	*
0571	D26BH11:8.5	04/10/92										
0572	13.5	04/10/92	*	*	*	*	*	*	*	*	*	*
0573	23.5	04/10/92										
0574	28.5	04/10/92	*	*	*	*	*	*	*	*	*	*
0575	33.5	04/10/92										

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
0576	D26BH11:38.5	04/10/92	*	*	*	*	*	*	*	*	*	*
0577	41.5	04/10/92										
0578	Equip. Rinse	04/10/92					0.191					0.015
0579	Field Blank	04/10/92					0.023		0.01	0.0006		0.007
0580	Trip Blank	04/11/92	*	*	*	*	*	*	*	*	*	*
0581	D26BH12:8.5	04/11/92	*	*	*	*	*	*	*	*	*	*
0582	13.5	04/11/92										452
0583	17.5	04/11/92	*	*	*	*	*	*	*	*	*	*
0584	23.5	04/11/92										
0585	28.5	04/11/92	*	*	*	*	*	*	*	*	*	*
0586	33.5	04/11/92										
0587	38.5	04/11/92	*	*	*	*	*	*	*	*	*	*
0588	40.5	04/11/92	20.6									
0589	Trip Blank	04/11/92	*	*	*	*	*	*	*	*	*	*
0590	D26BH13:04	06/03/92										
0591	07	06/03/92	*	*	*	*	*	*	*	*	*	*
0592	14	06/03/92										
0593	18	06/03/92	*	*	*	*	*	*	*	*	*	*
0594	22	06/03/92										
0595	27	06/03/92	*	*	*	*	*	*	*	*	*	*
0596	32	06/03/92										
0597	39	06/03/92	*	*	*	*	*	*	*	*	*	*
0598	41	06/03/92										
0599	Equip. Rinse	06/03/92					0.003					0.010
0600	Field Blank	06/03/92						0.003	0.16			0.008
0601	Trip Blank	06/03/92	*	*	*	*	*	*	*	*	*	*
0602	D26BH14:15	06/04/92							2090			
0603	20	06/04/92										
0604	25	06/04/92										
0605	31	06/04/92										
0606	Trip Blank	06/04/92	*	*	*	*	*	*	*	*	*	*
8664	D20BH01:05	06/05/91		*	3.58		*		*		*	*
8665	14	06/05/91		*	4.08		*		*		*	*

Table 5.2 (continued)

Sample Number	Location Depth, ft	Date Collected	As (13)	Be (7)	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Mn (1210)	Hg (0.7)	Ni (42)	Zn (118)
8666	D20BH01:28	06/05/91		*	2.77		*		*		*	*
8667	39	06/05/91	33.2	*	7.10		*		*		*	*
8668	D20BH02:09	06/05/91		*	2.60		*		*		*	*
8669	19	06/05/91		*	4.35		*		*		*	*
8670	24	06/05/91		*	2.94		*		*		*	*
8671	39	06/05/91	20.2	*	6.37		*	41.1	*		*	*
8672	Equip. Rinse	06/06/91										
8673	Trip Blank	06/06/91	*	*	*	*	*	*	*	*	*	*

* = items not analyzed for.

u = undetected

Note: Values which exceed twice the threshold concentration are shown in bold.

Threshold concentrations are shown in parenthesis below the element symbol.

Threshold concentrations were taken from Fleishhauer 1988.

Table 5.3 Analytical results from Plating Building RFI

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 1								
3	2,100	<5	1,500	<10	<10	<10	<10	<10
6	560	<5	1,200	---	---	---	---	---
9	26	<5	230	---	---	---	---	---
12	860	<5	970	---	---	---	---	---
15	69	<5	167	<10	<10	<10	<10	<10
18	1,200	<5	5,000	---	---	---	---	---
21	260	<5	2,500	---	---	---	---	---
24	2,900	<5	5,400	---	---	---	---	---
27	280	<5	820	<10	<10	<10	<10	<10
30	270	<5	680	---	---	---	---	---
33	34	<5	81	---	---	---	---	---
35 (refusal)	1,300	<5	3,100	<10	<10	<10	<10	<10
Boring No. 2								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 3								
3	4.7	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
37 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10
Boring No. 4								
3	100	<5	420	<10	<10	<10	<10	<10
6	330	<5	390	---	---	---	---	---
9	1,500	<5	1,200	---	---	---	---	---
12	80	<5	36	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1.1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	22	<10	<10	<10	<10	<10
37 (refusal)	<1	<5	59	---	---	---	---	---

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 5								
3	80	<5	50	<10	<10	<10	<10	<10
6	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---
12	940	<5	3,100	---	---	---	---	---
15	2,000	5.2	3,700	72	1,900	<10	<10	340
18	4,000	<5	10,000	---	---	---	---	---
21	8.7	<5	28	---	---	---	---	---
24	12	<5	49	---	---	---	---	---
27	330	<5	630	<10	18,000	<10	<10	4,800
30	700	<5	1,100	---	---	---	---	---
33	17	<5	62	---	---	---	---	---
36 (refusal)	320	<5	540	<1,000	46,000	<1,000	<1,000	3,900
Boring No. 6								
3	---	---	---	---	---	---	---	---
6	800	15	3,400	<10	<10	<10	<10	<10
9	26	<5	200	---	---	---	---	---
12	2,400	<5	4,500	---	---	---	---	---
15	120	<5	170	<10	<10	<10	<10	<10
18	29	<5	100	---	---	---	---	---
21	140	<5	410	---	---	---	---	---
24	1,000	<5	4,400	---	---	---	---	---
27	260	<5	860	<10	<10	<10	<10	<10
30	2,200	<5	2,700	---	---	---	---	---
33	410	<5	1,900	---	---	---	---	---
36	3,800	9	3,200	---	---	---	---	---
39 (refusal)	1,200	<5	1,200	12	88	21	<10	170

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 7								
3	4.6	<5	120	2,200	<10	<10	26	<10
6	<1	<5	240	---	---	---	---	---
9	11	<5	870	---	---	---	---	---
12	2.6	9.3	270	---	---	---	---	---
15	5.6	<5	2,800	1,400	36	<10	13	<10
18	4.6	5.4	560	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
39 (refusal)	<1	<5	<20	530	1,400	<10	<10	49
Boring No. 8								
3	<1	<5	64	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	---	---	---	---	---	---	---	---
12	---	---	---	---	---	---	---	---
15	<1	<5	3,600	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	45	<20	---	---	---	---	---
27	---	---	---	---	---	---	---	---
30	<1	19	<20	---	---	---	---	---
33	1,400	19	3,100	---	---	---	---	---
37 (refusal)	160	6.6	650	<10	1,300	19	<10	570

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 9								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	<10	<10	<10	<10	<10
33	<1	<5	<20	---	---	---	---	---
35 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10
Boring No. 10								
3	3.0	<5	70	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 11								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<200	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10
Boring No. 12								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
38 (refusal)	<1	<5	<20	<10	17	<10	<10	<10

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 13								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	13	520	---	---	---	---	---
12	<1	27	300	---	---	---	---	---
15	<1	5.0	280	<10	<10	<10	<10	2,100
18	<1	13	<20	---	---	---	---	---
21	<1	14	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<1,000	<1,000	<1,000	<1,000	1,200
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
37 (refusal)	<1	<5	<20	7,000	16,000	<10	<10	1,700
Boring No. 14								
3	<1	<5	<20	350	40	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	51,000	99	<10	170	13
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	20,000	970	<10	57	270
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
37 (refusal)	<1	<5	<20	44,000	<10	400	130	1,100

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 15								
3	<1	<5	<20	<50	110	<50	<50	<50
6	<1	<5	34	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10
Boring No. 16								
3	1.8	<5	850	<10	<10	<10	<10	<10
6	54	<5	960	---	---	---	---	---
9	5.7	<5	2,200	---	---	---	---	---
12	7.6	18	1,400	---	---	---	---	---
15	---	---	---	---	---	---	---	---
18	---	---	---	---	---	---	---	---
21	<1	7	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
39	<1	<5	<20	---	---	---	---	---
40 (refusal)	<1	15	200	<1,000	18,000	<1,000	<1,000	<1,000

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 17								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	26	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	5.2	<20	51	140	<10	<10	98
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
39 (refusal)	<1	<5	<20	<10	43	<10	<10	470
Boring No. 18								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	20	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	68	<10	<10	89
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	<10	700	11	<10	260
39 (refusal)	<1	<5	21	1,100	1,600	41	15	1,500

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 19								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10
Boring No. 20								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
38 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, $\mu\text{g}/\text{kg}$	TCE, $\mu\text{g}/\text{kg}$	VC, $\mu\text{g}/\text{kg}$	1,1,2,2-PCA, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$
Boring No. 22								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	150	<5	790	---	---	---	---	---
9	320	<5	130	---	---	---	---	---
12	12	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
22	1.5	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	160
30	2.7	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
38 (refusal)	<1	<5	<20	26	690	<1,000	<1,000	430
Boring No. 24								
3	---	---	---	300	330	<10	<10	140
6	<1	43	22	---	---	---	---	---
9	<1	46	2,000	---	---	---	---	---
12	<1	28	110	---	---	---	---	---
15	<1	22	25	890	10,000	<1,000	<1,000	1,700
18	<1	25	34	---	---	---	---	---
21	<1	23	<20	---	---	---	---	---
24	<1	21	<20	---	---	---	---	---
27	<1	5	<20	190	31,000	<10	<10	1,800
30	<1	<5	<20	---	---	---	---	---
33	<1	13	<20	---	---	---	---	---
36	<1	9	<20	---	---	---	---	---
39	7.2	102	22	---	---	---	---	---
41 (refusal)	9.5	92	<20	19,000	14,000,000	1,400	<10	11,000

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, µg/kg	TCE, µg/kg	VC, µg/kg	1,1,2,2-PCA, µg/kg	1,2-DCE, µg/kg
Boring No. 25								
3	470	9	430	<10	12	<10	<10	<10
6	1.3	17	<20	---	---	---	---	---
9	2,300	17	2,200	---	---	---	---	---
12	2,200	<5	1,400	---	---	---	---	---
15	340	<5	83	12	<10	<10	<10	<10
18	---	---	---	---	---	---	---	---
21	19	<5	32	---	---	---	---	---
23	6400	<5	12,000	---	---	---	---	---
24	94	<5	420	---	---	---	---	---
27	472	<5	60	<10	64	<10	<10	<10
30	6.4	<5	110	---	---	---	---	---
33	30	9	20	---	---	---	---	---
36	690	15	990	---	---	---	---	---
39	54	22	45	---	---	---	---	---
41 (refusal)	60	<5	89	<10	11	<10	<10	<10
Boring No. 26								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
37 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, $\mu\text{g}/\text{kg}$	TCE, $\mu\text{g}/\text{kg}$	VC, $\mu\text{g}/\text{kg}$	1,1,2,2-PCA, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$
Boring No. 27								
3	1.4	<5	45	<10	<10	<10	<10	<10
6	<1	<5	31	---	---	---	---	---
9	3.4	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
37 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10
Boring No. 28								
3	<1	<5	<20	<10	<10	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	---	---	---	---	---	---	---	---
27	<1	<5	<20	---	---	---	---	---
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
38 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, $\mu\text{g}/\text{kg}$	TCE, $\mu\text{g}/\text{kg}$	VC, $\mu\text{g}/\text{kg}$	1,1,2,2-PCA, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$
Boring No. 29								
3	---	---	---	---	---	---	---	---
6	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	<10	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36	<1	<5	<20	---	---	---	---	---
39 (refusal)	<1	<5	21	<10	<10	<10	<10	<10
Boring No. 30								
3	<1	<5	20	<10	21	<10	<10	39
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	19	1,000	<10	<10	680
18	<1	<5	<20	---	---	---	---	---
21	<1	6	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	1,600	22	<10	2,900
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	580	<10	<10	850

Table 5.3 (cont.)

Depth Interval, ft	PCBs, mg/kg	LTPH, mg/kg	HTPH, mg/kg	PCE, $\mu\text{g}/\text{kg}$	TCE, $\mu\text{g}/\text{kg}$	VC, $\mu\text{g}/\text{kg}$	1,1,2,2-PCA, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$
Boring No. 31								
3	<1	<5	<20	<10	<10	<10	<10	220
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	370	430	<10	<10	200
18	<1	<5	<20	---	---	---	---	---
21	<1	6	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	87	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	110	<10	<10	<10
Boring No. 32								
3	<1	<5	<20	28	42	<10	<10	<10
6	<1	<5	<20	---	---	---	---	---
9	<1	<5	<20	---	---	---	---	---
12	<1	<5	<20	---	---	---	---	---
15	<1	<5	<20	<10	310	<10	<10	<10
18	<1	<5	<20	---	---	---	---	---
21	<1	<5	<20	---	---	---	---	---
24	<1	<5	<20	---	---	---	---	---
27	<1	<5	<20	<10	<10	<10	<10	<10
30	<1	<5	<20	---	---	---	---	---
33	<1	<5	<20	---	---	---	---	---
36 (refusal)	<1	<5	<20	<10	<10	<10	<10	<10

--- = not analyzed

<5 = not detected at 5 mg/kg

Boring Nos. 21 and 23 were not completed due to a shallow obstruction.

Table 5.4 Plating Building soils results summary; total metals

Borehole#	Depth, ft	Total Metals, mg/kg								
		As	Ba	Cd	Cr	Pb	Hg	Se	Ag	Cn
57-06	4 to 6	4.11	135	2.67	13.1	11.0	<0.02	<0.10	0.46	<0.10
	1 to 3	2.16	156	3.78	19.5	12.0	<	<	0.30	<
57-05	4 to 6	3.74	136	3.81	20.2	11.7	<	<	0.32	<
	1 to 3	2.19	180	3.81	9.7	13.5	<	<	0.27	<
57-04	4 to 6	2.52	146	2.90	13.6	10.1	<	<	0.30	<
	1 to 3	1.66	181	2.69	12.7	11.2	<	<	0.27	<
57-02	7 to 9	2.98	156	2.86	17.8	17.0	<	<	1.28	<
	3 to 6	3.39	144	3.78	15.9	14.8	0.040	<	0.40	<
	1 to 3	4.56	144	4.46	25.6	230	0.040	<	0.50	<
57-01	3 to 7	7.93	63.3	3.08	20.9	14.8	0.028	<	0.94	0.33
	1 to 3	11.8	64.9	2.66	9.4	11.7	0.026	<	0.52	0.10
57-21	4 to 6	4.77	119	4.80	23.0	15.4	<	<	1.4	<
	1 to 3	2.34	162	3.9	24.0	14.9	<	<	<	<
57-12	4 to 6	3.03	145	4.4	26.2	18.1	<	<	0.89	<
	1 to 3	3.44	137	3.0	20.7	25.5	<	<	1.47	<
57-08	4 to 6	4.32	121	2.8	17.0	14.3	<	<	<	<
	1 to 3	1.52	24.2	0.9	3.6	3.1	<	<	<	<
57-10	4 to 6	3.86	134	3.7	16.2	8.92	<	<	0.60	<
	1 to 3	4.10	141	3.5	14.0	9.96	<	<	1.09	<
57-09	7 to 9	2.73	127	4.0	17.5	11.9	<	<	<	<
	4 to 6	3.33	147	3.7	16.0	22.8	<	<	<	<
	1 to 3	3.7	138	3.0	16.0	16.0	<	<	0.50	<
57-11	4 to 6	2.0	165	4.5	22.0	19.0	<	<	0.5	<
57-13	1 to 3	3.19	171	5.2	28.7	21.8	<	<	1.28	<
57-11	1 to 3	1.94	145	3.42	16.6	19.0	<	<	1.47	<
57-17	4 to 6	2.17	77.3	28.4	14.0	17.7	<	<	0.49	<

Table 5.4 (cont)

Borehole#	Total Metals, mg/kg									
	Depth, ft	As	Ba	Cd	Cr	Pb	Hg	Se	Ag	Cn
57-17	1 to 3	1.58	50.2	13.1	6.0	39.8	<	<	0.30	<
57-20	4 to 6	2.12	109	3.7	23.0	14.4	<	<	0.54	<
	1 to 3	3.83	122	3.7	23	11.4	<	<	0.50	<
57-19	4 to 6	12.6	154	4.3	19.5	19.0	<	<	0.50	<
	1 to 3	13.4	163	3.4	19.3	25.1	<	<	0.60	<
57-18	7 to 9	3.37	146	4.61	22.3	9.94	<	<	0.40	<
	4 to 6	2.62	203	4.46	21.5	17.0	<	<	0.50	<
	1 to 3	3.73	232	4.52	21.2	10.9	<	<	0.30	<
57-16	4 to 6	7.51	216	3.14	22	13.1	<	<	0.5	<
	1 to 3	7.96	160	3.39	17	12.3	<	<	0.6	<
57-15	13 to 15	6.99	205	2.73	17	14.1	<	<	0.6	<
	4 to 6	3.48	144	4.23	68	19	0.026	<	0.55	<
	1 to 3	2.31	122	6.71	158	12.8	0.043	<	0.6	0.18
57-14	7 to 9	2.59	172	6.9	25.1	230	<	<	1.00	<
	4 to 6	2.68	171	6.1	25.2	23.5	<	<	0.88	<
	1 to 3	2.59	153	4.7	20.4	17.4	<	<	0.55	<
57-13	4 to 6	1.48	99.8	3.3	18.3	6.85	<	<	<	<
	1 to 3	2.65	169	44	21.2	9.98	<	<	<	<

Table 5.5 Micropurge and bailer sample results

Well number	Micropurge, µg/L				Bailer, µg/L		Filter-Micro, µg/100 cm ²			Filter-Bailer, µg/100 cm ²
	No filter	0.45	0.20	0.10	No filter	0.45	0.45	0.20	0.10	
First Sampling Event										
192-L	2.6	ND	ND	ND	54	1.3	4.3	ND	ND	5.4
201-L	ND	0.23	ND	ND	ND	ND	ND	ND	ND	ND
44-L	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Second Sampling Event										
192-L	31	0.64	ND	ND	1500	23	3.5	ND	ND	120
201-L	0.19	ND	ND	ND	0.27	ND	1.2	ND	ND	ND
44-L	1.3	1.6	ND	ND	48	0.28	6	ND	ND	1.2
233	ND	0.2	ND	ND	5	0.18	2.2	ND	ND	ND
Third Sampling Event										
192-L	110	0.57	ND	ND	360	21	120	ND	ND	270
201-L	ND	7.8	0.71	0.18	74	2.9	8.6	1.3	ND	2.2
44-L	ND	0.2	0.67	ND	8.6	0.22	2.5	ND	ND	7.4
233	ND	ND	ND	ND	7.8	0.28	ND	ND	ND	4.3
233	ND	1	0.59	ND	7.2	1.1	6.6	ND	ND	2.7
Fourth Sampling Event										
192-L	88	ND	ND	ND	1100	0.8	37	2.2	ND	330
201-L	ND	0.38	ND	ND	1.5	ND	1.3	ND	ND	1.9
44-L	ND	ND	ND	ND	0.35	ND	ND	ND	ND	ND
233	1.7	2.4	ND	ND	80	0.7	28	ND	ND	8.3
233	ND	0.18	ND	ND	100	0.74	ND	ND	ND	9

ND = Non-Detect

Table 5.6 Well 44, 93, 94, and 201 groundwater PCB results

Well	Date	Contaminant	UDL	Concentration, µg/L
KC85-044	02/04/1987	Aroclor 1016	U	0.00000
		Aroclor 1016	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1260	U	0.00000
	10/31/1988	PCB (total)	U	0.10000
KC85-044	02/11/1989	Aroclor 1016	U	0.05000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.12000
		Aroclor 1242	U	0.07000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.11000
KC85-044	07/25/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC85-044 (cont.)	10/10/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	01/20/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	02/01/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/29/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC85-044 (cont.)	07/08/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	10/14/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	01/26/1994	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/08/1996	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC85-044 (cont.)	08/15/1996	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/18/1997	Aroclor 1016	U	0.10000
		Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
		Aroclor 1260	U	0.10000
09/11/1997	Aroclor 1016	U	0.10000	
	Aroclor 1221	U	0.10000	
	Aroclor 1232	U	0.10000	
	Aroclor 1242	U	0.10000	
	Aroclor 1248	U	0.10000	
	Aroclor 1254	U	0.10000	
	Aroclor 1260	U	0.10000	
	10/26/1988	PCB (total)		0.50000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-093	02/14/1989	Aroclor 1016	U	0.50000
		Aroclor 1221	U	1.00000
		Aroclor 1232	U	1.20000
		Aroclor 1242	U	0.70000
		Aroclor 1248	U	1.00000
		Aroclor 1254	U	1.00000
		Aroclor 1260	U	1.10000
	02/01/1990	Aroclor 1016	U	1.00000
		Aroclor 1221	U	1.00000
		Aroclor 1232	U	1.00000
		Aroclor 1242	U	1.00000
		Aroclor 1248	U	1.00000
		Aroclor 1254	U	1.00000
		Aroclor 1260	U	1.00000
		Aroclor 1262	U	1.00000
	04/25/1990	Aroclor 1016	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1260	U	0.00000
	07/18/1990	Aroclor 1016	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1260	U	0.00000
		Aroclor 1262	U	0.00000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-093 (cont.)	10/08/1990	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
		Aroclor 1260	U	0.10000
KC88-093 (cont.)	04/26/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
KC88-093 (cont.)	07/26/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
KC88-093 (cont.)	10/11/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-093 (cont.)	10/11/1991	Aroclor 1260	U	0.10000
	01/07/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/23/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	07/17/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.30000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	10/12/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-093 (cont.)	02/03/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/29/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	07/08/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
KC88-094-L	10/31/1988	PCB (total)	U	0.10000
	02/11/1989	Aroclor 1016	U	0.05000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.12000
		Aroclor 1242	U	0.07000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.11000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-094-L (cont.)	01/30/1990	Aroclor 1016	U	1.00000
		Aroclor 1221	U	1.00000
		Aroclor 1232	U	1.00000
		Aroclor 1242	U	1.00000
		Aroclor 1248	U	1.00000
		Aroclor 1254	U	1.00000
		Aroclor 1260	U	1.00000
		Aroclor 1262	U	1.00000
	04/24/1990	Aroclor 1016	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1260	U	0.00000
	07/18/1990	Aroclor 1016	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1260	U	0.00000
		Aroclor 1262	U	0.00000
	10/06/1990	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-094-L (cont.)	04/25/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	07/20/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	10/11/1991	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	01/07/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-094-L (cont.)	04/23/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	07/23/1992	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	02/03/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/29/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-094-L (cont.)	07/08/1993	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
KC88-094-U	04/25/1990	Aroclor 1016	U	0.00000
		Aroclor 1221	U	0.00000
		Aroclor 1232	U	0.00000
		Aroclor 1242	U	0.00000
		Aroclor 1248	U	0.00000
		Aroclor 1254	U	0.00000
		Aroclor 1260	U	0.00000
	07/19/1990	Aroclor 1016	U	1.00000
		Aroclor 1221	U	1.00000
		Aroclor 1232	U	1.00000
		Aroclor 1242	U	1.00000
		Aroclor 1248	U	1.00000
		Aroclor 1254	U	1.00000
		Aroclor 1260	U	1.00000
	02/03/1993	Aroclor 1016	U	1.00000
		Aroclor 1221	U	1.00000
		Aroclor 1232	U	1.00000
		Aroclor 1242	U	1.00000
		Aroclor 1248	U	1.00000
		Aroclor 1254	U	1.00000
		Aroclor 1260	U	1.00000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC88-094-U (cont.)	04/30/1993	Aroclor 1016	U	1.00000
		Aroclor 1221	U	1.00000
		Aroclor 1232	U	1.00000
		Aroclor 1242	U	1.00000
		Aroclor 1248	U	1.00000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
KC95-201	02/21/1996	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	08/14/1996	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.21000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000
	04/24/1997	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242	U	0.10000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.6 (cont)

Well	Date	Contaminant	UDL	Concentration, µg/L
KC95-201 (cont.)	09/16/1997	Aroclor 1016	U	0.10000
		Aroclor 1221	U	0.10000
		Aroclor 1232	U	0.10000
		Aroclor 1242		0.19000
		Aroclor 1248	U	0.10000
		Aroclor 1254	U	0.10000
		Aroclor 1260	U	0.10000

Table 5.7 95th Terrace soil boring data

Borehole #	Depth, ft	PCB / VOA	Results
1999 Shallow Soil Boring Data, mg/kg			
1	0 - 1.5	PCB	ND
2	0 - 1.5	PCB	ND
3	0 - 1.5	PCB	ND
4	0 - 1.5	PCB	ND
5	0 - 1.5	PCB	ND
6	0 - 1.5	PCB	ND
7	0 - 1.5	PCB	ND
8	0 - 1.5	PCB	ND
9	0 - 1.5	PCB	ND
10	0 - 1.5	PCB	ND
11	0 - 1.5	PCB	ND
12	0 - 1.5	PCB	ND
13	0 - 1.5	PCB	ND
14	0 - 1.5	PCB	ND
15	0 - 1.5	PCB	ND
16	0 - 1.5	PCB	ND
17	0 - 1.5	PCB	0.41
18	0 - 1.5	PCB	0.66

Table 5.7 (cont)

1998 Soil Boring Data, mg/kg				
	7	PCB		ND
	12	PCB		ND
	15	PCB		ND
	15	VOA	Methylene chloride	0.0051
			Toluene	0.0058
			Acetone	0.042
06	19	PCB		ND
	22	PCB		ND
	27	PCB		40
	32	PCB		ND
	37	PCB		674
	41	PCB		ND
	41	VOA	Methylene chloride	0.0063
			Acetone	0.12
			2 n-butanone	0.015
Well 233	5	PCB		2.70
	10	PCB		2.50
	15	PCB		0.55
	20	PCB		ND
	25	PCB		ND
	25	VOA	Acetone	0.074
1996 Soil Boring Data, mg/kg				
01	5	PCB		ND
	10	PCB		ND
	15	PCB		ND
	20	PCB		ND
	25	PCB		ND
	30	PCB		0.11
	35	PCB		ND
	40	PCB		ND
	45	PCB		ND
	45	VOA	Methylene Chloride	0.0051 ^a
	50	PCB		ND
	53	PCB		ND
	53	VOA	Methylene Chloride	0.011 ^b

Table 5.7 (cont)

1996 Soil Boring Data, mg/kg			
02	6	PCB	ND
	11	PCB	ND
	16	PCB	ND
	21	PCB	ND
	31	PCB	ND
	36	PCB	ND
	41	PCB	ND
	46	PCB	ND
	46	VOA	ND
	51	PCB	ND
03	54	PCB	ND
	54	VOA	ND
	6	PCB	ND
	11	PCB	ND
	16	PCB	ND
	21	PCB	ND
	26	PCB	ND
	31	PCB	ND
	36	PCB	1.5
	41	PCB	0.270
04	41	VOA	ND
	46	PCB	0.140
	49	PCB	6900
	49	VOA	ND
	5	PCB	ND
	10	PCB	ND
	15	PCB	ND
	20	PCB	ND
	25	PCB	ND
	30	PCB	ND

Table 5.7 (cont)

1996 Soil Boring Data, mg/kg			
05	05	PCB	ND
	10	PCB	ND
	15	PCB	ND
	20	PCB	ND
	25	PCB	ND
	30	PCB	ND
	35	PCB	ND
	40	PCB	ND
	40	VOA	ND
	45	PCB	ND
	47	PCB	ND
	47	VOA	ND
1993 Soil Boring Data, mg/kg			
AI15	6	PCB	<0.16
	9	PCB	<0.16
	15	PCB	<0.16
	18	PCB	<0.16
AI16	6	PCB	<0.16
	9	PCB	<0.16
	15	PCB	<0.16
	21	PCB	<0.16
	24	PCB	<0.16
	27	PCB	<0.16
	30	PCB	<0.16
	33	PCB	<0.16
	36	PCB	<0.16
AI17	39	PCB	<0.16
	6	PCB	<0.16
	24	PCB	<0.16
	27	PCB	0.25
	30	PCB	0.75
	33	PCB	<0.16
	36	PCB	<0.16
	39	PCB	<0.16
AI18	42	PCB	<0.16
	6	PCB	<0.16
	9	PCB	<0.16

Table 5.7 (cont)

1993 Soil Boring Data, mg/kg			
	15	PCB	<0.16
	21	PCB	<0.16
	24	PCB	<0.16
	30	PCB	<0.16
	33	PCB	<0.16
	36	PCB	<0.16
	39	PCB	<0.16
	42	PCB	<0.16
AI19	6	PCB	0.09
	9	PCB	<0.16
	15	PCB	<0.16
	21	PCB	<0.16
	24	PCB	0.09
	27	PCB	<0.16
	30	PCB	<0.16
	33	PCB	<0.16
	36	PCB	<0.16
	39	PCB	<0.16
AI45	5	PCB	ND
	10	PCB	ND
	15	PCB	160 ^c
	20	PCB	1300 ^c
	22	PCB	1800 ^c
AI46	5	PCB	23
	10	PCB	31
	15	PCB	2.7
	20	PCB	200
AI47	12	PCB	7.8
	12	PCB	ND
	16	PCB	1.0
	21	PCB	1.9
AI48	5	PCB	ND
	10	PCB	ND
	10	PCB	ND
	15	PCB	ND
	21	PCB	1.2
AI49	5	PCB	1.0
	10	PCB	ND

Table 5.7 (cont)

1993 Soil Boring Data, mg/kg			
	15	PCB	ND
	20	PCB	ND
	6	PCB	ND
AI50	12	PCB	ND
	20	PCB	1.2
	11	PCB	1.1
AI51	16	PCB	2.2
	20	PCB	1700 ^c
	5	PCB	46 ^c
AI52	9	PCB	9.0
	16	PCB	1.4
	20	PCB	29
	10	PCB	1.3
AI53	15	PCB	ND
	20	PCB	5.0
	5	PCB	2.0
AI54	10	PCB	1.1
	20	PCB	8.0
	5	PCB	ND
AI55	10	PCB	2.0
	15	PCB	18
	20	PCB	750 ^c
	7	PCB	ND
	18	PCB	ND
	23	PCB	ND
AI56	30	PCB	ND
	35	PCB	ND
	40	PCB	13
	45	PCB	2.3
	47.5	PCB	78
1993 Soil Boring Data, mg/kg			
AI57	9	PCB	1.5
	24	PCB	ND
	29	PCB	ND
	33	PCB	ND
	39	PCB	ND
	44	PCB	1300
	48	PCB	1.4

Table 5.7 (cont)

1993 Soil Boring Data, mg/kg			
	51.5	PCB	1.8
AI58	9	PCB	ND
	19	PCB	ND
	23	PCB	ND
	28	PCB	ND
	44	PCB	360
	49.5	PCB	2.4
AI59	9	PCB	ND
	20	PCB	ND
	30	PCB	2.2
	35	PCB	4.6
	40	PCB	260
	45.5	PCB	8300
AI60	9	PCB	3.9
	18	PCB	3.1
	25	PCB	1.2
	30	PCB	ND
	35	PCB	1.5
	45	PCB	78
AI61	4.5	PCB	ND
	12	PCB	ND
	17	PCB	NA
	23	PCB	ND
	27	PCB	ND
	33	PCB	ND
	37	PCB	ND
	42	PCB	ND
	45	PCB	ND
	7	PCB	ND
AI62	16	PCB	NA
	22	PCB	NA
	27	PCB	ND
	30	PCB	ND
	39	PCB	4.7
	41	PCB	120
	45	PCB	1.8
	4	PCB	ND
AI63	15	PCB	ND
	24	PCB	ND
	27	PCB	ND

Table 5.7 (cont)

1993 Soil Boring Data, mg/kg		
32	PCB	ND
44	PCB	ND
AI64	3.5	PCB
	10	PCB
	15	PCB
	20.5	PCB
	26.5	PCB
	31.5	PCB
	36.5	PCB
	41.5	PCB
	44.5	PCB
	5	PCB
AI65	9	PCB
	15	PCB
	19	PCB
	26	PCB
	30	PCB
	35	PCB
	40	PCB
AI66	46	PCB
	5	PCB
	10	PCB
	19	PCB
	24	PCB
	30	PCB
1993 Soil Boring Data, mg/kg		
AI66	40	PCB
	42	PCB
	44	PCB
	47	PCB
	50	PCB
AI67	4	PCB
	9	PCB
	13	PCB
	19	PCB
	24	PCB
	29	PCB
	34	PCB
	39	PCB
	44	PCB

Table 5.7 (cont)

1993 Soil Boring Data, mg/kg			
AI68	46	PCB	1.2
	48	PCB	ND
	2	PCB	ND
	7	PCB	19
	11	PCB	ND
	19	PCB	ND
	24	PCB	ND
	29	PCB	2.1
	34	PCB	ND
	39	PCB	ND
AI69	44	PCB	ND
	45	PCB	ND
	4	PCB	ND
	10	PCB	ND
	15	PCB	ND
	20	PCB	ND
	25	PCB	ND
	30	PCB	ND
	35	PCB	ND
	40	PCB	ND
AI70	42	PCB	ND
	44	PCB	ND
	46	PCB	ND
	5	PCB	ND
	10	PCB	ND
	15	PCB	ND
	20	PCB	ND
	30	PCB	ND
	35	PCB	ND
	40	PCB	ND
AI71	45	PCB	ND
	47	PCB	ND
	49	PCB	ND
	51	PCB	1.0
	52	PCB	18
	5	PCB	ND
	10	PCB	ND

Table 5.7 (cont)

1993 Soil Boring Data, mg/kg			
AI72	35	PCB	2.5
	40	PCB	7.9
	45	PCB	ND
	52	PCB	ND
	5	PCB	ND
	10	PCB	ND
	15	PCB	ND
	20	PCB	ND
	30	PCB	ND
	35	PCB	3.6
AI73	40	PCB	ND
	45	PCB	ND
	47	PCB	ND
	50	PCB	ND
	10	PCB	ND
	15	PCB	ND
	20	PCB	ND
	25	PCB	ND
	30	PCB	ND
	35	PCB	ND
AI74	40	PCB	ND
	45	PCB	ND
	10	PCB	ND
	30	PCB	ND
	35	PCB	ND
	40	PCB	1.5
	42	PCB	ND
	45	PCB	ND
	49	PCB	ND

VOA = volatile organic analysis

PCB = polychlorinated biphenyls

^a Analyte was found in associated blank as well as in the sample.^b Lab report cross reference.^c No data providedBH01=BHAIC95T9607-01
BH02=BHAIC95T9607-02BH04=BHAIC95T9610-01
BH05=BHAIC95T9610-02

BH03=BHAIC95T9607-03

Table 5.8 MVRSS RFI VOCs detected in groundwater

Sample Location	Sample Date	VOCs, $\mu\text{g/L}$			Semi-VOCs, $\mu\text{g/L}$	
		TCE MCL = 5	1,2-DCE MCL = 100	Chloroethene MCL = 2	di-n-Butyl phthalate MCL = NG	bis(2-Ethylhexyl) phthalate MCL = NG
TW01-U ¹	11/15/93	43	50	--	--	--
	11/19/93	32	45	--	--	--
	01/13/94	34	47	--	15	11
	04/15/94	26	30	--	--	--
TW01-L ¹	11/15/93	910	780	--	--	--
	11/19/93	820	880	--	--	--
	01/13/94	640	810	--	22	31
	04/15/94	110	220	--	--	--
TW02-U ¹	11/12/93	--	--	--	--	--
	11/19/93	11	--	--	--	--
	01/13/94	--	--	--	17	36
	04/15/94	--	--	--	--	--
TW02-L ¹	11/15/93	18	10	--	--	--
	11/19/93	5	10	--	--	--
	01/13/94	--	--	--	13	58
	04/15/94	--	--	--	--	--
TW03-U ^{1,2}	02/11/94	--	1000	--	23B	13B
	04/01/94	--	1100	--	17B	--
	04/22/94	23	1100	18	--	--
TW03-L ^{1,2}	02/11/94	460	700	--	17B	--
	04/01/94	290	750	--	15B	--
	04/22/94	530	1500	52	--	--
TW04-U ¹	03/25/94	--	--	--	--	--
	04/01/94	--	--	--	--	--
	04/15/94	NS	NS	NS	NS	NS
	04/19/94	NS	NS	NS	NS	NS
TW04-L ¹	03/24/94	--	--	--	--	--
	04/01/94	--	--	--	--	--
	04/15/94	--	--	--	--	--
	04/19/94	--	--	--	--	--
KC91-149-U ²	07/12/93	10	61	7	--	--
	01/18/94	--	510	49	--	--
	04/08/94	--	330	38	--	--
	07/22/94	--	190	24	12B	--
KC91-149-L ²	07/12/93	110	150	22	--	--
	01/18/94	40	140	18	--	--
	04/08/94	17	43	--	--	--
	07/22/94	87	150	13	--	--
KC91-155-U ²	07/13/93	--	--	--	NA	NA
	04/22/94	NS	NS	NS	--	--
	07/27/94	NS	NS	NS	--	--
KC91-155-L ²	07/13/93	--	--	--	NA	NA
	04/22/94	NS	NS	NS	NS	NS
	07/27/94	NS	NS	NS	NS	NS

Table 5.8 (continued)

Sample Location	Sample Date	VOCs, $\mu\text{g/L}$			Semi-VOCs, $\mu\text{g/L}$	
		TCE MCL = 5	1,2-DCE MCL = 100	Chloroethene MCL = 2	di-n-Butyl phthalate MCL = NG	bis(2-Ethylhexyl) phthalate MCL = NG
KC91-171-U ²	07/19/93	-	-	-	NA 27	NA 16
	04/22/94	-	-	-	-	-
	07/27/94	--	--	--	-	-
KC91-171-L ²	07/19/93	70	980	430	NA 26	NA
	04/22/94	36	3200	950	-	-
	07/27/94	23	2900	680	-	-
KC91-172-U ²	10/01/93	-	-	-	NA	NA
	01/31/94	-	-	-	-	-
	04/22/94	-	-	-	28	110
	07/29/94	-	--	--	-	43
KC91-172-L ²	10/01/93	-	-	-	NA	NA
	01/31/94	-	-	-	-	-
	04/22/94	-	-	-	28	13
	07/29/94	-	--	--	-	-
KC91-173-U ¹	07/19/93	-	-	-	NA	NA
	10/11/93	-	-	-	NA	NA
	07/08/94	-	-	-	NA	NA
KC91-173-L ¹	07/19/93	-	-	-	NA	NA
	10/11/93	-	-	-	NA	NA
	07/08/94	-	-	-	NA	NA
KC91-176-U ¹	01/14/94	-	-	-	-	13
	04/13/94	-	-	-	12	-
	07/12/94	-	-	-	-	-
KC91-176-L ¹	01/14/94	120	150	-	12	16
	04/13/94	62	89	-	15	34
	07/12/94	60	110	-	-	-
KC91-177-U ¹	01/14/94	-	-	-	13	23
	04/13/94	-	-	-	-	-
	07/12/94	-	-	-	-	12
KC91-177-L ¹	01/14/94	-	6	--	-	21
	04/13/94	-	6	--	-	-
	07/12/94	--	-	--	-	-

- = analyzed, not detected.

MCL = maximum contaminant level, $\mu\text{g/L}$.

NS = not sampled

NG = not given

B = detected in method blank

NA = not analyzed

¹ Discussed as related to Bldg. 54 and the MVRSS pits.² Discussed as related to the Test Cell Area.

Note: Values that equal or exceed the MCLs are shown in bold.

Table 5.9

Sample location	Date	TCE, µg/L	1,2-DCE, µg/L	Chloroethene, µg/L	1,1-DCE, µg/L	1,1-DCA, µg/L	1,1,1-TCA, µg/L	HBPHCs, mg/L	PCBs, µg/L	Other, µg/L
		MCL=5	MCL=100	MCL=2	MCL=7	MCL=NG	MCL=NG	MCL=NG	MCL=0.5	
KC84-09-U	07/14/92	--	--	--	--	--	--	NA	NA	--
	07/15/93	--	--	--	--	--	--	NA	NA	--
	07/08/94	--	--	--	--	--	--	NA	NA	--
KC84-09-M	07/15/93	--	--	--	--	--	--	NA	NA	--
	07/08/94	--	--	--	--	--	--	NA	NA	--
KC84-09-L	07/14/92	--	--	--	--	--	--	NA	NA	--
	07/15/93	--	--	--	--	--	--	NA	NA	--
	07/08/94	--	--	--	--	--	--	NA	NA	--
KC91-173-U	10/05/91	--	--	--	--	--	--	NA	NA	--
	04/15/92	--	--	--	--	--	--	--	NA	--
	01/22/93	--	--	--	--	--	--	NA	NA	--
	07/19/93	--	--	--	--	--	--	NA	NA	--
	10/11/93	--	--	--	--	--	--	NA	NA	--
	01/12/94	--	--	--	--	--	--	NA	NA	--
	07/08/94	--	--	--	--	--	--	NA	NA	--
KC91-173-L	10/05/91	--	--	--	--	--	--	NA	NA	--
	04/15/92	--	--	--	--	--	--	--	NA	--
	01/22/93	--	--	--	--	--	--	NA	NA	--
	07/19/93	--	--	--	--	--	--	NA	NA	--
	10/11/93	--	--	--	--	--	--	NA	NA	--
	01/12/94	--	--	--	--	--	--	NA	NA	--
	07/08/94	--	--	--	--	--	--	NA	NA	--

Table 5.9 (continued)

Sample location	Date	TCE, µg/L	1,2-DCE, µg/L	Chloroethene, µg/L	1,1-DCE, µg/L	1,1-DCA, µg/L	1,1,1-TCA, µg/L	HBPHCs, mg/L	PCBs, µg/L	Other, µg/L
		MCL=5	MCL=100	MCL=2	MCL=7	MCL=NG	MCL=NG	MCL=NG	MCL=0.5	
KC91-176-U	09/18/91	--	--	--	--	--	--	--	0.1	--
	09/27/91	--	--	--	--	--	--	--	--	--
	10/04/91	--	--	--	--	--	--	NA	NA	--
	04/14/92	--	--	--	--	--	--	NA	NA	--
	01/25/93	--	--	--	--	--	--	NA	NA	--
	07/21/93	--	--	--	--	--	--	NA	NA	--
	01/14/94	--	--	--	--	--	--	--	NA	13 bis(2-Ethylhexyl) phthalate
	04/13/94	--	--	--	--	--	--	--	--	12 di-n-Butyl phthalate
	07/12/94	--	--	--	--	--	--	--	NA	--
KC91-176-L	09/18/91	16	30	--	--	--	--	--	--	--
	09/27/91	33	45	--	--	--	--	--	--	--
	10/04/91	34	43	--	--	--	--	NA	NA	--
	04/14/92	35	61	--	--	--	--	NA	NA	--
	01/25/93	94	100	--	--	--	--	NA	NA	--
	07/21/93	35	64	--	--	--	--	NA	NA	--
	01/14/94	120	150	--	--	--	--	--	NA	16 bis(2-Ethylhexyl) phthalate 12 di-n-Butyl phthalate
	04/13/94	62	89	--	--	--	--	--	--	34 bis(2-Ethylhexyl) phthalate 15 di-n-Butyl phthalate
	07/12/94	60	110	--	--	--	--	--	NA	--

Table 5.9 (continued)

Sample location	Date	TCE, µg/L	1,2-DCE, µg/L	Chloroethene, µg/L	1,1-DCE, µg/L	1,1-DCA, µg/L	1,1,1-TCA, µg/L	HBPHCs, mg/L	PCBs, µg/L	Other, µg/L
		MCL=5	MCL=100	MCL=2	MCL=7	MCL=NG	MCL=NG	MCL=NG	MCL=0.5	
KC91-177-U	09/18/91	--	--	--	--	--	--	--	0.2	900 LBPHCs (MCL=NG)
	09/27/91	--	--	--	--	--	--	--	--	--
	10/04/91	--	--	--	--	--	--	NA	NA	--
	04/14/92	--	--	--	--	--	--	NA	NA	--
	01/25/93	--	--	--	--	--	--	NA	NA	--
	07/21/93	--	--	--	--	--	--	NA	NA	--
	01/14/94	--	--	--	--	--	--	NA	23 bis(2-Ethylhexyl) phthalate 13 di-n-Butyl phthalate	
	04/13/94	--	--	--	--	--	--	--	--	--
	07/12/94	--	--	--	--	--	--	NA	12 bis(2-Ethylhexyl) phthalate	
KC91-177-L	09/18/91	--	--	--	--	--	--	0.2	--	--
	09/27/91	--	--	--	--	--	--	--	--	--
	10/04/91	--	--	--	--	--	--	NA	NA	--
	04/14/92	--	--	--	--	--	--	NA	NA	--
	01/25/93	--	--	--	--	--	--	NA	NA	--
	07/21/93	--	--	--	--	--	--	NA	NA	--
	01/14/94	?	6	--	--	--	--	NA	21 bis(2-Ethylhexyl) phthalate	
	04/13/94	--	6	--	--	--	--	--	--	--
	07/12/94	--	--	--	--	--	--	NA	--	

-- = analyzed, not detected.

NA = not analyzed.

NG = not given.

MCL = maximum contaminant level, µg/L (May 1994)

1,1-DCE = 1,1-Dichloroethene

1,1-DCA = 1,1-Dichloroethane

1,1,1-TCA = 1,1,1-Trichloroethane

Note: Values exceeding the MCLs are shown in bold. All MDLs are below MCLs.

5.10 Organic analysis results of groundwater samples collected in the vicinity of the test cells

Sample location	Date	TCE, µg/L	1,2-DCE, µg/L	Chloroethene, µg/L	1,1-DCE, µg/L	1,1-DCA, µg/L	1,1,1-TCA, µg/L	HBPHCs, mg/L	PCBs, µg/L	Other, µg/L
		MCL=5	MCL=100	MCL=2	MCL=7	MCL=NG	MCL=NG	MCL=NG	MCL=0.5	
KC85-30	10/04/91	--	--	--	--	--	--	NA	NA	--
	01/07/92	--	--	--	--	--	--	NA	NA	--
	07/22/92	--	24	--	--	--	--	NA	NA	--
	10/12/92	--	--	--	--	--	--	NA	NA	--
	04/21/93	--	--	--	--	--	--	NA	NA	--
	07/22/93	--	--	--	--	--	--	NA	NA	--
	01/25/94	--	--	--	--	--	--	NA	NA	--
	07/18/94	--	--	--	--	--	--	NA	NA	--
KC91-149-U	10/07/92	--	12	--	--	--	--	NA	NA	--
	04/14/92	--	110	--	--	--	--	NA	NA	--
	01/13/93	--	100	--	--	--	--	NA	NA	--
	07/12/93	10	61	7	--	--	--	NA	NA	--
	01/18/94	--	510	49	--	--	--	--	NA	11 bis(2-Ethylhexyl) phthalate
	04/08/94	--	330	38	--	--	--	--	NA	--
	07/22/94	--	190	24	--	--	--	--	NA	12 di-n-Butyl phthalate
KC91-149-L	10/07/91	--	8	--	--	--	--	NA	NA	--
	04/14/92	--	28	--	--	--	--	NA	NA	--
	01/13/93	62	87	--	--	--	--	NA	NA	--
	07/12/93	110	150	22	--	--	--	NA	NA	--
	01/18/94	40	140	18	--	--	--	--	NA	--
	04/08/94	17	43	--	--	--	--	--	NA	--
	07/22/94	87	150	13	--	--	--	--	NA	--
KC91-155-U	10/04/91	--	--	--	--	--	--	NA	NA	--
	04/14/92	--	--	--	--	--	--	NA	NA	--
	01/26/93	--	--	--	--	--	--	NA	NA	--
	07/13/93	--	--	--	--	--	--	NA	--	--

5.10 (continued)

Sample location	Date	TCE, µg/L	1,2-DCE, µg/L	Chloroethene, µg/L	1,1-DCE, µg/L	1,1-DCA, µg/L	1,1,1-TCA, µg/L	HBPHCs, mg/L	PCBs, µg/L	Other, µg/L
		MCL=5	MCL=100	MCL=2	MCL=7	MCL=NG	MCL=NG	MCL=NG	MCL=NG	
KC91-155-L	10/04/91	--	--	--	--	--	--	NA	NA	--
	04/14/92	--	--	--	--	--	--	NA	NA	--
	01/26/93	--	--	--	--	--	--	NA	NA	--
	07/13/93	--	--	--	--	--	--	NA	--	--
KC91-171-U	10/13/91	--	--	--	--	--	--	NA	NA	--
	04/22/92	--	--	--	--	--	--	NA	NA	--
	01/29/93	--	13	--	--	--	--	NA	NA	25 4-Methyl-2-pentanone
	07/19/93	--	--	--	--	--	--	NA	NA	--
	04/22/94	--	--	--	--	--	--	--	NA	16 bis(2-Ethylhexyl) phthalate
	07/27/94	--	--	--	--	--	--	500	NA	27 di-n-Butyl phthalate
KC91-171-L	10/13/91	--	--	--	--	--	--	--	NA	--
	04/22/92	--	--	--	--	--	--	--	NA	--
	01/29/93	--	--	--	--	--	--	--	NA	--
	07/19/93	--	--	--	--	--	--	--	NA	--
	04/22/94	--	--	--	--	--	--	--	NA	26 di-n-Butyl phthalate
	07/27/94	--	--	--	--	--	--	--	NA	--
KC91-172-U	09/18/91	--	--	--	--	--	--	1	--	800 LBPHCs
	09/27/91	--	--	--	--	--	--	0.6	--	--
	10/11/91	--	--	--	--	--	--	NA	NA	--
	04/22/92	--	--	--	--	--	--	NA	NA	--
	01/26/93	--	--	--	--	--	--	NA	NA	--
	07/12/93	--	--	--	--	--	--	NA	--	--
	10/01/93	--	--	--	--	--	--	NA	NA	--
	01/31/94	--	--	--	--	--	--	8.0	NA	21 Ethylbenzene 19 Styrene 7 Chloroform
	04/22/94	--	--	--	--	--	--	NA	NA	110 bis(2-Ethylhexyl) phthalate 28 di-n-Butyl phthalate
	07/29/94	--	--	--	--	--	--	NA	NA	43 bis(2-Ethylhexyl) phthalate

5.10 (continued)

Sample location	Date	TCE, µg/L	1,2-DCE, µg/L	Chloroethene, µg/L	1,1-DCE, µg/L	1,1-DCA, µg/L	1,1,1-TCA, µg/L	HBPHCs, mg/L	PCBs, µg/L	Other, µg/L
		MCL=5	MCL=100	MCL=2	MCL=7	MCL=NG	MCL=NG	MCL=NG	MCL=0.5	
KC91-172-L	09/18/91	--	--	--	--	--	--	--	0.4	--
	09/27/91	--	--	--	--	--	--	--	--	--
	10/11/91	--	--	--	--	--	--	NA	NA	--
	04/22/92	--	--	--	--	--	--	NA	NA	--
	01/26/93	--	--	--	--	--	--	NA	NA	--
	07/12/93	--	--	--	--	--	--	NA	--	--
	10/01/93	--	--	--	--	--	--	NA	NA	--
	01/31/94	--	--	--	--	--	--	--	NA	--
	04/22/94	--	--	--	--	--	--	--	NA	13 bis(2-Ethylhexyl) phthalate 28 di-n-Butyl phthalate
	07/29/94	--	--	--	--	--	--	--	NA	--
OW-1	10/05/91	--	33	--	--	--	--	NA	NA	--
	04/22/93	--	55	--	--	--	--	NA	NA	46 Chlorobenzene
	07/22/93	--	73	--	--	--	--	NA	NA	50 Chlorobenzene
	01/25/94	--	76	--	--	--	--	NA	NA	74 Chlorobenzene
	04/22/94	--	130	--	--	--	--	--	NA	67 Chlorobenzene 18 bis(2-Ethylhexyl) phthalate
	07/25/94	--	100	--	--	--	--	--	NA	75 Chlorobenzene

-- = analyzed, not detected.

NA = not analyzed.

NG = not given.

MCL = maximum contaminant level, µg/L (May 1994).

1,1-DCE = 1,1-Dichloroethene

Note: Values exceeding the MCLs are shown in bold. All MDLs are below MCLs.

Table 5.11

VOCs, μg/kg	Location, depth in feet									
	BH01, 10	BH02, 38	BH03, 5	BH07, 24	BH07, 40	BH08, 5	BH08, 9	BH10, 5	BH10, 10	BH10, 14
Acetone										
Benzene							11			
Carbon disulfide										
Chloroethene				28	72					
1,2-Dichlorobenzene										
1,1-Dichloroethane		14								
1,1-Dichloroethene										
1,2-Dichloroethene (total)	17			99	550					
Ethylbenzene										
2-Hexanone			11					12		
4-Methyl-2-pentanone (MIBK)										
1,2,2-Tetrachloroethane										
Tetrachloroethene								21		22,000
1,1,1-Trichloroethane										
Trichloroethene	20				42					
Toluene										
Xylenes (total)										
VOCs, μg/kg	Location, ft									
	BH10, 24	BH10, 40	BH13, 39	TW03, 3	TW03, 15	TW03, 26	TW03, 39	BH14, 3	BH14, 16	
Benzene										
Carbon disulfide										1,000*
1,1-Dichloroethane	14	19								
1,2-Dichloroethene (total)	170	130	98		200	490	460			
2-Hexanone										
Toluene								16**		
Trichloroethene	64	56								
Vinyl chloride						46	46			

Table 5.11 (continued)

VOCs, μg/kg	Location, ft								
	BH10, 24	BH10, 40	BH13, 39	TW03, 3	TW03, 15	TW03, 26	TW03, 39	BH14, 3	BH14, 16
Acetone			120	110					
1,2-Dichlorobenzene									
1,1-Dichloroethene									
Ethylbenzene									
4-Methyl-2-pentanone (MIBK)									
1,2,2-Tetrachloroethane									
Tetrachloroethene	19	41							
1,1,1-Trichloroethane									1,000*
Xylenes (total)									
VOCs, μg/kg	Location, ft								
	BH14, 26	BH14, 39	BH15, 6	BH15, 13	BH15, 39	BH16, 3	BH16, 39	BH17, 4	
Acetone	65		110			51	55		
Benzene									
Carbon disulfide									
Chloroethene						23			
1,2-Dichlorobenzene									
1,1-Dichloroethane									
1,1-Dichloroethene									
1,2-Dichloroethene (total)		22	130	25	250				
Ethylbenzene									
2-Hexanone									
4-Methyl-2-pentanone (MIBK)									
1,2,2-Tetrachloroethane								11	
Tetrachloroethene									
Toluene									
1,1,1-Trichloroethane									
Trichloroethene						27			
Xylenes (total)									

Table 5.11 (continued)

VOCs, µg/kg	Location, ft								
	BH18, 13	BH18, 16	BH18, 23	BH18, 27	BH18, 39	BH19, 16	BH19, 39	BH20, 4	BH21, 41
Acetone									
Benzene									
Carbon disulfide									
Chloroethene									
1,2-Dichlorobenzene								23	
1,1-Dichloroethane		11	52		10				
1,1-Dichloroethene					7*				
1,2-Dichloroethene (total)	140	250	710	1400	160	51	89		150
Ethybenzene								28	
2-Hexanone									
4-Methyl-2-pentanone (MIBK)								35	
1,2,2-Tetrachloroethane									
Tetrachloroethene									
Toluene								14	
1,1,1-Trichloroethane									
Trichloroethene	46	18	630		9*	6*			41
Xylenes (total)								170	

All blank spaces represent no detection.

Note: All soil borings were sampled at a minimum of three intervals; one approximately 3 ft BGL, a second at the water table interface and a third at the bedrock-alluvium contact.

Only those intervals in which one or more positive hit(s) were reported are shown.

Only those constituents which reported one or more positive hit(s) are listed.

* Detected but below the MDL; therefore, result is an estimated concentration. This sample analyzed at medium level due to the presence of hydrocarbons.

* Amount present in method blank (16 µg/kg) was subtracted from on-column amount present in sample.

* Sample reanalyzed; 1st run (30 µg/kg) was outside quality control limits for surrogate recoveries.

Table 5.12

Sample Location	Sample Date	As	Cd	Cr	Cu	Ni	Pb	Zn	Hg	Mn
		MCL=0.05	MCL= 0.005	MCL=0.1	MCLG=1.3	MCL=0.1	AL=0.015	MCL=NG	MCL=0.002	MCL=NG
TW01-L	11/15/94	0.006	----	----	----	----	----	0.030	----	11.2
	11/19/94	0.006	----	----	----	----	----	0.025	----	12.8
TW01-U	11/15/94	0.008	----	----	----	----	----	0.046	----	3.84
	11/19/94	0.007	----	----	----	----	----	0.027	----	3.78
TW02-L	11/15/94	0.006	----	----	----	----	----	0.037	----	6.30
	11/19/94	----	----	----	----	----	----	----	----	3.03
TW02-U	11/12/94	----	----	----	----	----	----	0.027	----	1.48
	11/19/94	----	----	----	----	----	----	0.027	----	0.88
TW03-L	04/01/94	----	----	----	----	----	----	----	----	13.4
TW03-U	04/01/94	----	----	----	----	----	----	0.021	----	1.15
TW04-L	03/24/94	0.041	----	----	----	----	0.012	----	----	5.06
	04/01/94	0.051	----	----	----	----	----	0.023	----	5.53
TW04-U	03/25/94	----	----	----	----	----	----	----	----	1.71
	04/01/94	----	----	----	----	----	----	0.024	----	1.66
KC91-172-L	01/26/93 04/20/93	0.1 0.1	----	----	NA NA	NA NA	----	NA NA	----	NA NA
KC91-172-U	01/26/93 04/20/93	0.1 0.027	----	----	NA NA	NA NA	----	NA NA	----	NA NA
KC91-173-L	10/11/93 01/12/94	0.045 0.063	----	----	NA	NA	----	NA	----	2.7 NA
KC91-173-U	10/11/93 01/12/94	----	0.002	----	----	NA	----	0.1 NA	----	17.6 NA
KC91-176-L	04/20/93	----	----	----	NA	NA	----	NA	----	NA
KC91-176-U	04/20/93	----	----	----	NA	NA	----	NA	----	NA
KC91-177-L	04/20/93	0.1	----	----	NA	NA	----	NA	----	NA
KC91-177-U	04/20/93	0.3	----	----	NA	NA	----	NA	----	NA

Note: All MDLs are below MCLs, MCLGs, or ALs. Values exceeding the MCLs, MCLGs, or ALs are in bold.

---- = analyte not detected.
MCL = maximum contaminant level
MCLG = maximum contaminant level goal
AL = action limit
NS = not sampled
NA = not analyzed

Table 5.13

Sample location	Date	As, mg/L MCL=0.05	Cd, mg/L MCL=0.005	Cr, mg/L MCL=0.1	Cu, mg/L MCLG=1.3	Ni, mg/L MCL=0.1	Pb, mg/L AL=0.015	Zn, mg/L MCL=NG	Hg, mg/L MCL=0.002	Mn, mg/L MCL=NG
KC84-09-U	07/15/93	--	--	--	--	--	0.014	0.1	--	0.3
KC84-09-M	07/15/93	0.008	--	--	--	--	--	--	--	4.4
KC84-09-L	07/15/93	0.2	--	--	--	--	--	0.09	--	0.5
KC91-172-U	01/26/93	0.1	--	--	NA	NA	--	NA	--	NA
	04/20/93	0.027	--	--	NA	NA	--	NA	--	NA
KC91-172-L	01/26/93	0.1	--	--	NA	NA	--	NA	--	NA
	04/20/93	0.1	--	--	NA	NA	--	NA	--	NA
KC91-173-U	01/08/92	--	--	--	--	--	--	0.3	--	8.7
	01/22/93	--	--	--	NA	NA	--	NA	--	NA
	04/19/93	--	--	--	NA	NA	--	NA	--	NA
	07/19/93	0.015	--	--	0.042	--	--	0.1	--	17.4
	10/11/93	--	--	--	--	--	--	0.1	--	17.6
	01/12/94	--	0.002	--	--	NA	--	NA	--	NA
KC91-173-L	01/08/92	0.033	--	--	--	--	--	--	--	1.8
	01/22/93	0.041	--	--	NA	NA	--	NA	--	NA
	04/19/93	0.036	--	--	NA	NA	--	NA	--	NA
	07/19/93	0.030	0.003	--	0.017	--	--	0.2	--	3.8
	10/11/93	0.045	--	--	--	--	--	--	--	2.7
	01/12/94	0.063	--	--	NA	NA	--	NA	--	NA
KC91-176-U	09/18/91	0.011	--	--	--	--	0.058	0.028	--	--
	09/27/91	0.016	0.002	--	--	--	--	0.051	--	--
	01/25/93	0.011	0.004	--	NA	NA	--	NA	--	NA
	04/20/93	--	--	--	NA	NA	--	NA	--	NA

Table 5.13 (continued)

Sample location	Date	As, mg/L MCL=0.05	Cd, mg/L MCL=0.005	Cr, mg/L MCL=0.1	Cu, mg/L MCLG=1.3	Ni, mg/L MCL=0.1	Pb, mg/L AL=0.015	Zn, mg/L MCL=NG	Hg, mg/L MCL=0.002	Mn, mg/L MCL=NG
KC91-176-L	09/18/91	--	--	--	--	--	0.085	--	--	--
	09/27/91	--	--	--	--	--	--	0.027	--	--
	01/25/93	--	--	--	NA	NA	--	NA	--	NA
	04/20/93	--	--	--	NA	NA	--	NA	--	NA
KC91-177-U	09/18/91	0.342	--	--	--	--	0.086	0.035	--	--
	09/27/91	0.158	--	--	--	--	--	0.036	--	--
	01/25/93	0.2	0.009	--	NA	NA	--	NA	--	NA
	04/20/93	0.3	--	--	NA	NA	--	NA	--	NA
KC91-177-L	09/18/91	0.103	--	--	--	--	0.062	0.022	--	--
	09/27/91	0.111	0.002	--	--	--	0.123	0.022	--	--
	01/25/93	0.1	--	--	NA	NA	--	NA	--	NA
	04/20/93	0.1	--	--	NA	NA	--	NA	--	NA

NA = not analyzed

-- = analytic not detected

MCL = maximum contaminant level, mg/L (May 1994)

MCLG = maximum contaminant level goal, mg/L (May 1994)

AL = action level, mg/L (May 1994)

NG = not given

Note: Values exceeding the MCL, MCLG, or AL are shown in bold. All MDLs are below MCLs, MCLGs, and ALs.

Table 5.14

Analyte	MDL, µg/L	Concentration, µg/L
Aroclor 1242	1.0	12.0
Aroclor 1254	1.0	ND
Aroclor 1260	1.0	ND

ND = not detected at or above the MDL.

Table 5.15

Analyte	MDL, µg/L	Concentration, µg/L
Aroclor 1242	1.0	6.7
Aroclor 1254	1.0	ND
Aroclor 1260	1.0	ND

ND = not detected at or above the MDL.

Table 5.16

Analyte	MDL, mg/kg	Concentration, mg/kg
Aroclor 1242	1.0	5.3
Aroclor 1260	1.0	14.0

Table 5.17

Sample Number	Sample Location	Interval, ft	Date	TCE, µg/kg	1,2-DCE, µg/kg	Chloroethene, µg/kg	1,1-DCE, µg/kg	1,1,1-TCA, µg/kg	HBPHCs, mg/kg	PCBs, mg/kg	Other, µg/kg
	SB-07	1.5 to 4.0	11/02/87	--	--	--	--	47,000 J	NA	--	Toluene = 15,000 J
	SB-07	6.5 to 9.0	11/02/87	--	--	--	--	26,000 J	NA	--	--
	SB-07	34.5 to 37.0	11/02/87	--	--	--	--	34,000 J	NA	--	--
	SB-08	6.5 to 9.0	11/01/87	--	--	--	--	76,000 J	NA	--	--
	SB-08	11.5 to 14.0	11/01/87	--	--	--	--	--	NA	--	--
	SB-08	16.5 to 19.0	11/01/87	13,000 J	< 53,000	--	--	11,000 J	NA	--	Ethylbenzene = 100,000
	SB-08	21.5 to 24.0	11/01/87	--	30,000 J	--	--	--	NA	--	2-Butanone = 57,000 J
	SB-08	26.5 to 29.0	11/01/87	--	< 59,000	--	--	52,000	NA	--	--
	SB-08	31.5 to 34.0	11/01/87	--	--	--	--	19,000 J	NA	--	Toluene = 10,000 J
	SB-08	35.0 to 37.5	11/01/87	--	26,000 J	--	--	--	NA	--	--
3032	KC91-171	37.5 to 38.5	08/15/91	39	180	12	--	--	--	--	--
3034	KC91-172	8 to 9	08/16/91	--	--	--	--	--	1600	--	--
3035	KC91-172	12 to 13	08/16/91	--	--	--	--	--	1500	--	--
3037	KC91-172	20.5 to 21.5	08/16/91	--	--	--	--	--	--	--	Ethylbenzene = 26
3180	MSBH-25	7 to 8	01/17/91	--	--	--	--	47,000 J	NA	--	--
3239	MSBH-38	8 to 9	01/17/92	--	--	--	--	--	2200	--	--
3241	MSBH-38	11 to 12	01/17/92	--	--	--	--	--	540	--	--
3240	MSBH-38	37 to 38	01/17/92	--	25	--	--	--	--	--	--
3247	MSBH-39	3.5 to 4	01/18/92	--	--	--	--	--	--	--	--
3248	MSBH-39	8.5 to 9	01/18/92	--	--	--	--	--	--	--	--
3249	MSBH-39	37.5 to 38	01/18/92	--	41	--	--	--	--	--	--
3250	MSBH-39	23.5 to 24	01/18/92	--	--	--	--	--	--	--	--

Table 5.17 (continued)

Sample Number	Sample Location	Interval, ft	Date	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	1,1-DCE, $\mu\text{g}/\text{kg}$	1,1,1-TCA, $\mu\text{g}/\text{kg}$	HBPHCs, mg/kg	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
3251	MSBH-39	28.5 to 29	01/18/92	--	--	--	--	--	--	--	--
3252	MSBH-40	3.5 to 4	01/18/92	--	--	--	--	--	--	--	--
3253	MSBH-40	13.5 to 14	01/18/92	--	--	--	--	--	--	--	--
3254	MSBH-40	37.5 to 38	01/18/92	--	--	--	--	--	--	--	--
3256	MSBH-40	18.5 to 19	01/18/92	--	--	--	--	--	--	--	--
3257	MSBH-40	33.5 to 34	01/18/92	--	--	--	--	--	--	--	--
3255	MSBH-41	8.5 to 9	01/18/92	--	--	--	--	--	--	--	--
3259	MSBH-41	3 to 4	01/19/92	--	--	--	--	--	320	--	Benzene = 24
3260	MSBH-41	8 to 9	01/19/92	--	--	--	--	--	2800	--	Benzene = 1100
3262	MSBH-41	11 to 12	01/19/92	--	--	--	--	--	440	--	--
3263	MSBH-41	14 to 15	01/19/92	--	28	31	--	--	--	--	--
3264	MSBH-41	21.5 to 22.5	01/19/92	--	--	360	--	--	--	--	Benzene = 85 Toluene = 24
3265	MSBH-41	26.5 to 27.5	01/19/92	--	34	42	--	--	--	--	Benzene = 14
3266	MSBH-41	32 to 33	01/19/92	--	--	70	--	--	--	--	Benzene = 140 Toluene = 19
3261	MSBH-41	36.5 to 37.5	01/19/92	--	130	64	--	--	--	--	--
3276	MSBH-43	2 to 3	01/20/92	--	--	--	--	--	79	--	Xylenes (total) = 33
3277	MSBH-43	8 to 9	01/20/92	--	--	--	--	--	880	--	Xylenes (total) = 2000 Styrene = 1700
3285	MSBH-44	2.5 to 3.5	01/21/92	11	11	--	--	--	--	--	--
3288	MSBH-44	8 to 9	01/21/92	180	62	--	--	--	--	--	--
3286	MSBH-44	13 to 14	01/21/92	440	83	--	--	--	--	--	--

Table 5.17 (continued)

Sample Number	Sample Location	Interval, ft	Date	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	1,1-DCE, $\mu\text{g}/\text{kg}$	1,1,1-TCA, $\mu\text{g}/\text{kg}$	HBPHCs, mg/kg	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
3289	MSBH-44	16.5 to 17.5	01/21/92	34	25	-	-	-	-	-	-
2075a	BH91-06	10.5 to 11.0	10/04/91	--	--	5 J	--	--	NA	NA	Methylene chloride = 14 Xylene = 2 JB
2075b	BH91-06	23.5 to 24	10/04/91	--	69	27	-	-	NA	NA	2,6-Dimethylnonane = 10 J Unknown = 8.5 J
2075c	BH91-06	35.5 to 36.0	10/04/91	3 J	58	-	-	-	NA	NA	Xylenes = 5 BJ
2000	KC91-149	14 to 14.5	07/24/91	--	3 J	--	--	--	NA	NA	Methylene chloride = 12
2003	KC91-149	39.5 to 40	07/24/91	--	--	--	--	--	NA	NA	Methylene chloride = 10 B Acetone = 35 B Toluene = 2 J

-- = analyte not detected.

B = compound found in method blank.

< = less than.

J = value is estimated, meaning the value is between the method detection limit (MDL) and practical quantitation limit (PQL) where the analytical instrument can accurately quantify a sample concentration.

NA = not analyzed.

1,1-DCE = 1,1-Dichloroethene

Note: Locations and depths reporting no detections for all parameters analyzed for are not shown on table. Highly diluted samples are noted with < preceding the MDL.

Only those constituents which reported one or more positive hits are listed.

Table 5.18

Borehole No.	Depth, ft	HBPHCs, mg/kg
BH02	8	330 ^a
BH05	8	21 ^a
BH05	10	390 ^a
BH05	12	23 ^a
BH07	11	2700 ^a
BH07	14	1800 ^a
BH08	9	10 ^{a,b}
BH08	14	900 ^a
BH10	10	120 ^c
BH10	14	480 ^c
BH14	9	1100 ^c
BH14	11	260 ^c
BH14	16	490 ^c
BH16	9	56 ^c
BH16	12	1800 ^c
BH18	8	510 ^c
BH19	4	14 ^a
BH20	4	1200 ^c
BH21	4	10 ^a

^a Quantitation of the TPH fraction was achieved using No. 2 diesel fuel as a reference standard.

^b Chromatographic pattern could be weathered gasoline.

^c Listed as jet fuel under TPH. Results are quantified to JP-4 and/or JP-8 aviation fuel. Weathered (degraded) mixture of jet fuels.

Note: All soil borings were sampled at a minimum of three intervals; one approximately 3 ft BGL, a second at the water table interface and a third at the bedrock-alluvium contact.

Only those intervals in which one or more positive hit(s) were reported are shown.

Only those constituents which reported one or more positive hit(s) are listed.

Table 5.19

Sample Number	Sample Location	Interval, ft	Date	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	1,1-DCA, $\mu\text{g}/\text{kg}$	1,1-DCE, $\mu\text{g}/\text{kg}$	1,1,1-TCA, $\mu\text{g}/\text{kg}$	HBPHCs, mg/kg	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
3055	KC91-176	3 to 4	08/19/91	--	--	--	--	--	--	120	--	--
3056	KC91-176	7.5 to 8.5	08/19/91	--	--	--	--	--	--	--	--	--
3057	KC91-176	8.5 to 9.5	08/19/91	--	--	--	--	--	--	--	--	--
3058	KC91-176	38 to 39	08/19/91	--	--	--	--	--	--	--	--	--
3059	KC91-177	8.5 to 9.5	08/19/91	--	--	--	--	--	--	--	--	Tetrachloroethene = 36 Naphthalene = 1100 2-Methylnaphthalene = 370 Benzo(a)anthracene = 12,000 Benzo(k)fluoranthene = 6500 Indeno(1,2,3-cd)pyrene = 9700 Dibenz(a,h)anthracene = 380 Benzo(g,h,i)perylene = 10,000 Acenaphthene = 3900 Dibenzofuran = 1700 Fluorene = 3200 Anthracene = 4300 Pyrene = 14,000 Chrysene = 9800 Benzo(a)pyrene = 16,000
3060	KC91-177	11 to 12	08/19/91	--	--	--	--	--	--	1300	--	--
3061	KC91-177	17 to 18	08/19/91	--	--	--	--	--	--	--	--	--
3062	KC91-177	22.5 to 23.5	08/19/91	--	--	--	--	--	--	--	--	--
3063	KC91-177	38 to 39	08/19/91	--	--	--	--	--	--	--	--	--
3202	MSBH-31	5 to 6	11/01/91	--	--	--	--	--	--	--	--	--
3203	MSBH-31	9.5 to 10.5	11/01/91	--	--	--	--	--	--	--	--	--
3204	MSBH-31	39 to 39.5	11/01/91	--	--	--	--	--	--	--	--	--

Table 5.19 (continued)

Sample Number	Sample Location	Interval, ft	Date	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	1,1-DCA, $\mu\text{g}/\text{kg}$	1,1-DCE, $\mu\text{g}/\text{kg}$	1,1,1-TCA, $\mu\text{g}/\text{kg}$	HBPHCs, mg/kg	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
3205	MSBH-32	4.5 to 5.5	11/01/91	--	--	--	--	--	--	--	--	--
3206	MSBH-32	11 to 12	11/01/91	--	--	--	--	--	--	--	--	--
3207	MSBH-32	39 to 40	11/01/91	12	--	--	--	--	--	--	--	--
3208	MSBH-32	17.5 to 18.5	11/01/91	--	--	--	--	--	--	--	--	--
3209	MSBH-32	22 to 23	11/01/91	--	--	--	--	--	--	--	--	--
3210	MSBH-32	27.5 to 28.5	11/01/91	--	--	--	--	--	--	--	--	--
3212	MSBH-33	4.5 to 5.5	11/02/91	--	--	--	--	--	--	--	--	--
3213	MSBH-33	10 to 11	11/02/91	--	--	--	--	--	--	--	--	--
3214	MSBH-33	36.5 to 37.5	11/02/91	--	--	--	--	--	--	--	--	--

-- = analyte not detected.

TCE = trichloroethene

1,2-DCE = 1,2-dichloroethene

1,1-DCE = 1,1-dichloroethene

1,1-DCE = 1,1-dichloroethane

1,1,1-TCA = 1,1,1-trichloroethane

Note: Only those constituents which reported one or more positive hits are listed.

Table 5.20

Semivolatile Organic Compounds, $\mu\text{g}/\text{kg}$	Location, depth in feet														
	TW01, 4	BH02, 8	BH05, 10	BH07, 11	BH08, 14	BH10, 14	BH11, 4	BH14, 9	BH14, 11	BH14, 20	BH14, 26	BH15, 2	BH15, 6	BH15, 13	TW04, 4.5
Anthracene	65 ^a														
Benzo(<i>a</i>)anthracene	240 ^a						330								
Benzo(<i>b</i>)fluoranthene	190 ^a						550								
Benzo(<i>k</i>)fluoranthene	170 ^a														
Benzo(<i>g,h,i</i>)perylene	170 ^a														
Benzo(<i>a</i>)pyrene	150 ^a														
Di- <i>n</i> -Butyl phthalate															
Chrysene	250 ^a						380								
Dibenzo(<i>a,h</i>)anthracene	81 ^a														
bis(2-Ethylhexyl) phthalate	310 ^a						490	330	550	605	360	890	540		
Fluoranthene	580						800								370
Indeno(1,2,3- <i>cd</i>)pyrene	160 ^a														
2-Methylnaphthalene		1200	560	5000	880	390			1260						
Naphthalene			210 ^a												
Pentachlorophenol	310 ^a														
Phenanthrene	380						450								
Pyrene	620						840								400

* Detected, but below the MDL; therefore, result is an estimated concentration.

All blank spaces represent non-detects.

Note: All soil borings were sampled at a minimum of three intervals; one approximately 3 ft BGL, a second at the water table interface and a third at the bedrock-alluvium contact.

Only those intervals in which one or more positive hit(s) were reported are shown.

Only those constituents which reported one or more positive hit(s) are listed.

Table 5.21 Comparison of maximum concentrations of contaminants in soil found during the MVRSS RFI with action levels

Constituent	Location	Depth, ft	Max. Conc., mg/kg	Action Level, mg/kg
Organic Compounds				
Acetone	BH13	39	0.12	80,000 ^a
Benzene	MSBH-41	9	1.10	20 ^b
Carbon Disulfide	BH14	16	1	8,000 ^a
Chloroethylene	MSBH-41	22	0.36	0.04 ^c
1,2-Dichlorobenzene	BH20	4	0.023	7,000 ^d
1,1-Dichloroethane	BH18	23	0.052	8,000 ^e
1,1-Dichloroethene	BH18	39	0.007	10 ^b
1,2-Dichloroethene (total)	BH18	27	1.4	700 ^a
Ethylbenzene	SB08	19	100	8,000 ^d
2-Hexanone	BH08	9	0.012	ND
4-Methyl-2-pentanone (MIBK)	BH20	4	0.035	40,000 ^a
Tetrachloroethylene	BH10	14	22	800 ^f
Toluene	MSBH-41	22	0.024	200,000 ^a
1,1,1-Trichloroethane	SB08	29	52	ND
Trichloroethylene	MSBH-44	14	0.44	ND
Xylenes (total)	MSBH-43	9	2.0	200,000 ^d
TPH	MSBH-41	9	2800	100 ^g
Metals				
Arsenic (10.5) ^h	BH01	38	37.6	20 ^e
Cadmium (2.5)	KC91-176	39	43,400	40 ^e
Chromium (46)	BH10	5	112.4	400 ^e
Copper (34)	KC91-176	39	15,400	ND
Lead (46)	KC91-176	39	2,150	ND
Manganese (1210)	BH14	16	7050	400 ^a
Mercury (0.3)	BH14	26	4.73	20 ^a
Nickel (46)	BH12	10	57.9	2,000 ^a

Table 5.22

<u>Borehole</u>	<u>Interval</u>	<u>Concentration (ppm)</u>
	<u>depth (ft)</u>	
BH01	0 to 3.7	0.12
	8.7 to 11.2	0.22
	11.2 to 13.7	0.05
	18.7 to 23.7	3.10
	28.7 to 33.7	4.5
	33.7 to 38.5	58.0
BH08	1.5 to 2	60.0
	13.7 to 16.2	0.66
	16.2 to 18.7	0.70
BH10	1.2 to 3.8	0.80
	3.8 to 6.3	0.24
BH12	1.1 to 3.8	0.80
	3.8 to 6.3	0.24
	8.8 to 11.3	0.26
BH16	1.2 to 3.8	0.09

Concentrations in bold are those values found to exceed the clean-up standard of 10 ppm.

Table 5.23

<u>Borehole No.</u>	<u>Sample Interval Depth (ft)</u>	<u>Sample Number</u>	<u>PCB Concentration (ppm) Total Aroclors</u>
BH23	18.5 - 23.5	8540	29.*
	23.5 - 28.5	8541	1.0
	28.5 - 33.5	8542	0.83
	33.5 - 38.5	8543	0.63
BH24	18.5 - 23.5	8550	0.02
	23.5 - 28.5	8551	0.05
	28.5 - 33.5	8552	0.06
	33.5 - 38.5	8553	0.06
BH25	18.5 - 23.5	8536	1.9
	23.5 - 28.5	8537	7.6
	28.5 - 33.5	8538	3.6
	33.5 - 38.5	8539	30.*
BH26	18.5 - 23.5	8561	0.03
	23.5 - 28.5	8562	0.04U
	28.5 - 33.5	8563	0.04U
	33.5 - 38.5	8564	0.03
BH27	18.5 - 23.5	8554	0.09
	23.5 - 28.5	8555	0.04U
	28.5 - 33.5	8556	0.08
	33.5 - 38.5	8557	0.17
BH28	18.5 - 23.5	8566	0.04U
	23.5 - 28.5	8567	0.04U
	28.5 - 33.5	8568	0.04U
	33.5 - 38.5	8569	0.14
BH29	1.0 - 3.5	8570	15.*
	3.5 - 6.0	NS	NS
	6.0 - 8.5	NS	NS
	8.5 - 11.0	8573	2.2
BH30	11.0 - 13.5	8574	0.03
	1.0 - 3.5	8544	66.*
	3.5 - 6.0	8545	0.03
	6.0 - 8.5	8546	0.17
BH31	8.5 - 11.0	8547	0.24
	11.0 - 13.5	8548	0.13
	1.0 - 3.5	8575	0.06
	3.5 - 6.0	8576	0.04U
BH32	6.0 - 8.5	8577	0.11
	8.5 - 11.0	8578	0.56
	11.0 - 13.5	8579	0.16
	2.0 - 2.5	8531	68.*

Table 5.23 (continued)

<u>Borehole No.</u>	<u>Sample Interval Depth (ft)</u>	<u>Sample Number</u>	<u>PCB Concentration (ppm) Total Aroclors</u>
BH33	2.0 - 2.5	NT	NT
BH34	3.0 - 3.5	8528	0.17
	5.0 - 5.5	8533	4.4
BH35	3.0 - 3.5	8534	0.04U
	5.0 - 5.5	8535	0.04U
BH36	3.0 - 4.0	8583	0.50
BH37	3.0 - 4.0	8584	0.78
BH38	3.0 - 4.0	8582	9.5

PCB concentrations reported which exceed the cleanup guideline for migratable soils of 1 ppm (mg/kg) are indicated in bold print.

* PCB concentrations reported which exceed the cleanup guideline for non-migratable soils of 10 ppm (mg/kg) are indicated with an asterisk.

U - Undetectable. Compound was analyzed for but not detected. The value is the detection limit for the sample.

NS - No sample. Sample was not retrieved during collection in the field, due to encountering a layer of sand fill during drilling.

NT - No sample taken.

Table 5.24

Sample No.	Concentration, mg/kg	Description
CC-4B	1.6, Aroclor-1248	Area C, bottom
28C-4EW	ND	Location 28, one foot further east
28C-4EWA	14, Aroclor-1248	Location 28, re-sampled at the direction of AlliedSignal due to improper excavation
Concrete-1	44, Aroclor-1248	Taken from soil fragments on bottom of concrete slab, west of original excavation
GC-1C	ND	Composite sample of the footprint of the concrete slab*
Sludge-1	ND	Sample of sludge contained in the pipe that was under the concrete slab

Source, ERM (1992a)

* For clarity, this should have read "composite sample of the soil beneath the concrete slab after a foot of soil was removed".

Table 5.25

Sample Number	Borehole	Depth, ft	PCB, Aroclor 1242, mg/kg	VOCs, $\mu\text{g}/\text{kg}$						HBPnC, mg/kg	Metals, Threshold value, mg/kg			
				1,2-DCE (total)	TCE	Toluene	1,2-Di-chloro-benzene	Chloro-benzene	Chloro-ethene		Arsenic, 10.5	Zinc, 110	Copper, 34	Manganese, 1210
0004	BH01	20									20.3			
0012	BH02	19		11										
0016	BH02	40			12									
0021	BH03	18.5		68										1340
0025	BH03	37.5		27	11									
0028	BH04	5				15								
0031	BH04	17		85	29						19.9	149	108	
0035	BH04	39.5		42			52							
0039	BH05	15		30										
0042	BH05	23		210										
0050	BH06	16									16.8			1570
0054	BH06	40												
0056	BH07	5					120							
0059	BH07	16.5					85							
0063	BH07	39										160		
0069	BH08	16.5					190							
0072	BH08	35	1.0	NA	NA	NA	NA			NA	NA	NA	NA	NA
0073	BH08	39	1.6				210							
0078	BH09	15		84										
0082	BH09	39		28							12 ^a			
0087	BH10	17	3.6	72	22						6100 ^a			
0088	BH10	19	1.5	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

Table 5.25 (continued)

Sample Number	Borehole	Depth, ft	PCB, Aroclor 1242, mg/kg	VOCs, $\mu\text{g}/\text{kg}$						HBPHC, mg/kg	Metals, Threshold value, mg/kg			
				1,2-DCE (total)	TCE	Toluene	1,2-Di-chloro-benzene	Chloro-benzene	Chloro-ethene		Arsenic, 10.5	Zinc, 110	Copper, 34	Manganese, 1210
0089	BH10	21		160	53				41		280 ^a			
0092	BH10	33	1.0	88					48		1200 ^a			
0093	BH10	38	1.0	110	36		8				240 ^a			
0099	BH11	18		120	10									
0103	BH11	38		93										
0107	BH12	19		70							21.7			
0111	BH12	37		240										
0112	BH12	38		140	17									
0113	BH12	39	1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
0118	BH13	17					5							
0124	BH14 ^b	4.5		14	18									
0126	BH14	14		130	200		130	35	26					
0127	BH14	16.5		87	100		220	25	32	8				1670
0128	BH14	23		88			410	26	39	18				
0131	BH14	39		14										

NA = not analyzed

MDL = method detection limit

^a Quantitation of the TPH fraction was achieved using No. 2 diesel fuel as a reference standard.^b 19 $\mu\text{g}/\text{kg}$ of 2-Butanone (MEK) was detected in Borehole 14 at a depth of 4.5 ft.

c Detected but below the MDL; therefore, result is an estimate concentration.

Note: All blank spaces represent non-detects (ND).

Results from BH03 at 4.5 ft reported 15 $\mu\text{g}/\text{kg}$ of 1,1,2-Trichloro-1,2,2-trifluoroethane. This was the only concentration of this compound reported.

This table includes only samples in which detectable concentrations were reported. Samples in which all parameters were reported as non-detects are not shown. Complete analytical reports for all samples are provided in Appendix D and E.

Table 5.26

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
D/27-001	602841001	6,470	1,650	U
D/27-002	602841002	3,980	659	U
D/27-003	602841003	2,480	659	U
D/27-004	602841004	7,970	1,650	U
D/27-005	602841005	8,790	1,650	U
D/27-006	602841006	3,110	658	U
D/27-007	602841007	4,730	1,650	U
D/27-008	602841008	4,020	659	U
D/27-009	602841009	3,750	659	U
D/27-010	602841010	6,380	1,650	U
D/27-011	602841011	6,960	1,650	U
D/27-012	602841012	4,920	1,650	U
D/27-013	602841013	3,390	658	U
D/27-014	602841014	7,360	1,650	U
D/27-015	602841015	903	165	U
D/27-016	602841016	3,130	659	U
D/27-017	602841017	3,230	658	U
D/27-018	602841018	8,530	1,650	U
D/27-019	602841019	13,700	3,300	U potential mold flush area source
D/27-020	602841020	9,300	1,650	U
D/27-021	602841021	8,850	1,650	U
D/27-022	602841022	638	165	U
D/27-023	602841023	3,250	660	U
D/27-024	602841024	41,600	16,500	U potential mold flush area source
D/27-025	602841025	26,700	8,250	U potential mold flush area source
D/27-026	602841026	16,200	1,650	U potential mold flush area source
D/27-027	602841027	7,250	1,650	U
D/27-028	602841028	14,000	1,650	U potential mold flush area source
D/27-029	602841029	108,000	16,500	U potential mold flush area source
D/27-030	602841030	54,600	16,500	U potential mold flush area source
D/27-031	602841031	56,100	16,500	U potential mold flush area source
D/27-032	602841032	31,400	8,250	U potential mold flush area source
D/27-033	602841033	79,000	16,500	U potential mold flush area source
D/27-034	602841034	124,000	16,500	U potential mold flush area source
D/27-035	602841035	19,200	3,300	U potential mold flush area source
D/27-036	602841036	118,000	16,500	U potential mold flush area source
D/27-037	602841037	444,000	65,900	U potential mold flush area source
D/27-038	602841038	42,000	16,500	U potential mold flush area source
D/27-039	602841039	3,670	660	U
D/27-040	602841040	130,000	16,500	U potential mold flush area source
D/27-041	602844001	783,000	66,000	U potential mold flush area source
D/27-042	602844002	35,700	3,290	U potential mold flush area source
D/27-043	602844003	796,000	66,000	U potential mold flush area source
D/27-044	602844004	1,010,000	165,000	U potential mold flush area source
D/27-045	602844005	3,170,000	333,000	U potential mold flush area source
D/27-046	602844006	936,000	65,900	U potential mold flush area source
D/27-047	602844007	1,530,000	329,000	U potential mold flush area source
D/27-048	602844008	1,040,000	66,000	U potential mold flush area source

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
D/27-049	602844009	866,000	65,900 U	potential mold flush area source
D/27-050	602844010	1,000,000	66,000 U	potential mold flush area source
D/27-051	602844011	181,000	32,900 U	potential mold flush area source
D/27-052	602844012	225,000	32,900 U	potential mold flush area source
D/27-053	602844013	776,000	66,000 U	potential mold flush area source
D/27-054	602844014	459,000	33,000 U	potential mold flush area source
D/27-055	602844015	449,000	32,900 U	potential mold flush area source
D/27-056	602844016	46,400	33,000 U	potential mold flush area source
D/27-057	602844017	831,000	66,000 U	potential mold flush area source
D/27-058	602844018	393,000	32,900 U	potential mold flush area source
D/27-059	602844019	211,000	33,000 U	potential mold flush area source
D/27-060	602844020	496,000	33,000 U	potential mold flush area source
D/27-061	602844021	12,300	1,650 U	potential mold flush area source
D/27-062	602844022	46,400	16,500 U	potential mold flush area source
D/27-063	602844023	43,400	16,500 U	potential mold flush area source
D/27-064	602844024	1,180	330 U	
D/27-065	602844025	529,000	165,000 U	potential mold flush area source
D/27-066	602844026	244,000	33,000 U	potential mold flush area source
D/27-067	602844027	29,900	8,230 U	potential mold flush area source
D/27-068	602844028	32,400	8,240 U	potential mold flush area source
D/27-069	602844029	49,700	16,500 U	potential mold flush area source
D/27-070	602844030	14,300	1,650 U	potential mold flush area source
D/27-071	602844031	10,700	1,650 U	potential mold flush area source
D/27-072	602844032	8,610	1,650 U	
D/27-073	602844033	2,060	660 U	
D/27-074	602844034	7,770	1,650 U	
D/27-075	602844035	6,370	1,650 U	
D/27-076	602844036	17,300	1,650 U	potential mold flush area source
D/27-077	602844037	5,660	1,650 U	
D/27-078	602844038	3,530	659 U	
D/27-079	602844039	6,920	1,650 U	
D/27-080	602844040	10,900	1,650 U	potential mold flush area source
D/27-081	602847001	566	330 U	
D/27-082	602847002	14,100	330 U	potential mold flush area source
D/27-083	602847003	11,000	3,300 U	potential mold flush area source
D/27-084	602847004	2,810	1,650 U	
D/27-085	602847005	1,930	659 U	
D/27-086	602847006	4,260	3,300 U	
D/27-087	602847007	3,410	3,290 U	
D/27-088	602847008	7,350	3,300 U	
D/27-089	602847009	85,600	16,500 U	potential mold flush area source or Pit 47
D/27-090	602847010	1,540	660 U	
D/27-091	602847011	7,340	3,290 U	
D/27-092	602847012	9,430	3,290 U	
D/27-093	602847013	16,900	3,300 U	potential mold flush area source or Pit 47

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
D/27-094	602847014	13,400	3,300 U	potential mold flush area source or Pit 47
D/27-095	602847015	15,500	3,300 U	potential mold flush area source or Pit 47
D/27-096	602847016	10,100	3,300 U	potential mold flush area source or Pit 47
D/27-097	602847017	811	330 U	
D/27-098	602847018	102	33 U	
D/27-099 TT	602847019	49.9	33.0 U	
D/27-0100 TT	602847020	76.6	33.0 U	
1D/27-101 TT	602847021	115	33 U	
1D/27-102 TT	602847022	33 U	33 U	
1D/27-103 TT	602847023	50.1	33.0 U	
1D/27-104 TT	602847024	169	165 U	
1D/27-105 TT	602847025	204	165 U	
1D/27-106 TT	602847026	120	33 U	
1D/27-107 TT	602847027	93.9	33.0 U	
1D/27-108 BT	602847028	571	165 U	
1D/27-109 BT	602847029	9,720	3,300 U	
1D/27-110 BT	602847030	3,790	3,290 U	
1D/27-111 BT	602847031	10,100	3,300 U	along storm sewer leading from mold flush area
1D/27-112 BT	602847032	165 U	165 U	
1D/27-113 BT	602847033	503	330 U	
1D/27-114 BT	602847034	642	330 U	
1D/27-115 BT	602847035	64.5	33.0 U	
1D/27-116 BT	602847036	2,260	330 U	
1D/27-117 BT	602847037	1,590	330 U	
1D/27-118 TT	602847038	33 U	33 U	
1D/27-119	602847039	293	33 U	
1D/27-120	602847040	2,580	660 U	
1D/27-121 BT	602848001	48.9	126.0	
1D/27-122 BT	602848002	63.1	36.3	
1D/27-123 TT	602848003	93.6	33.0 U	
1D/27-124	602848004	53.9	33.0 U	
1D/27-125	602848005	168	33 U	
1D/27-126 BT	602848006	33 U	1,920	
1D/27-127	602848007	15,600	3,290 U	potential mold flush area source
1D/27-128	602848008	483	33 U	
1D/27-129	602848009	273	33 U	
1D/27-130	602848010	33 U	33 U	
1D/27-131	602848011	88.1	33.0 U	
1D/27-132	602848012	1,930	329 U	
1D/27-133	602848013	153	33 U	
1D/27-134	602848014	10,400	33 U	potential mold flush area source
1D/27-135	602848015	302	33 U	
1D/27-136	602848016	1,920	329 U	
1D/27-137	602848017	12,000	3,300 U	adjacent to Pit 22

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
1D/27-138	602848018	6,660	3,300 U	
1D/27-139	602848019	200	33 U	
1D/27-140	602848020	7,090	33 U	
1D/27-141	602848021	2,130	33 U	
1D/27-142	602848022	68.9	32.9 U	
1D/27-143	602848023	317	33 U	
1D/27-144	602848024	79.1	33.0 U	
1D/27-145	602848025	491	33 U	
1D/27-146	602848026	322	33 U	
1D/27-147	602848027	1,670	33 U	
1D/27-148	602848028	411	33 U	
1D/27-149	602848029	1,750	33 U	
1D/27-150	602848030	328	33 U	
1D/27-151	602848031	1,820	33 U	
1D/27-152	602848032	759	33 U	
1D/27-153	602848033	39.8	33.0 U	
1D/27-154	602848034	340	33 U	
1D/27-155	602848035	2,160	33 U	
1D/27-156	602848036	317	33 U	
1D/27-157	602848037	2,770	33 U	
1D/27-158	602848038	569	33 U	
1D/27-159	602848039	56.5	32.9 U	
1D/27-160	602848040	33 U	33 U	
1D/27-161 TT	602849001	256	33 U	
1D/27-162 BT	602849002	415	43	
1D/27-163 TT	602849003	33 U	33 U	
1D/27-164 TT	602849004	32.9 U	32.9 U	
1D/27-165 TT	602849005	103	33 U	
1D/27-166 SW1.0	602849006	32.9 U	32.9 U	
1D/27-167 BT	602849007	403	33 U	
1D/27-168 BT	602849008	60.1	32.9 U	
1D/27-169 BT	602849009	1,090	329 U	
1D/27-170 BT	602849010	2,070	329 U	
1D/27-171 BT	602849011	1,530	1,910	
1D/27-172 BT	602849012	114	33 U	
1D/27-173 BT	602849013	32.9 U	32.9 U	
1D/27-174 BT	602849014	382	37	
1D/27-175 BT	602849015	10,700	4,230	along storm sewer leading from mold flush area
1D/27-176 SW2.0	602849016	1,350	647	
1D/27-177	602849017	61.3	33.0 U	
1D/27-178 BT	602849018	33.8	32.9 U	
1D/27-179 BT	602849019	184	33 U	
1D/27-180 BT	602849020	98.2	33.0 U	
1D/27-181 BT	602849021	782	33 U	
1D/27-182 BT	602849022	6,110	3,300 U	
1D/27-183 TT	602849023	361	112	
1D/27-184	602849024	173	33 U	

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242 ug/kg	1,260 ug/kg	
1D/27-185	602849025	289	33 U	
1D/27-186	602849026	33 U	33 U	
1D/27-187	602849027	441	68	
1D/27-188	602849028	68.3	32.9 U	
1D/27-189	602849029	134	33 U	
1D/27-190 BT	602849030	334	33 U	
1D/27-191 TT	602849031	2,380	33 U	
1D/27-192 TT	602849032	165	33 U	
1D/27-193 TT	602849033	46.7	32.9 U	
1D/27-194 SW1.0	602849034	37.7	33.0 U	
1D/27-195 TT	602849035	167	354	
1D/27-196	602849036	2,210	329 U	
1D/27-197	602849037	36.5	32.9 U	
1D/27-198	602849038	55.6	32.9 U	
1D/27-199	602849039	1,310	33 U	
1D/27-200	602849040	1,900	33 U	
1D/27-201	602850001	1,880	33 U	
1D/27-202	602850002	884	33 U	
1D/27-203 BT	602850003	158	33 U	
1D/27-204 TT	602850004	1,420	33 U	
1D/27-205	602850005	2,380	33 U	
1D/27-206	602850006	2,370	33 U	
1D/27-207	602850007	171	33 U	
1D/27-208	602850008	1,980	33 U	
1D/27-209	602850009	924	33 U	
1D/27-210	602850010	5,740	33 U	
1D/27-211	602850011	196	33 U	
1D/27-212	602850012	1,600	33 U	
1D/27-213	602850013	2,740	33 U	
1D/27-214	602850014	8,620	33 U	
1D/27-215	602850015	588	33 U	
1D/27-216	602850016	5,580	33 U	
1D/27-217	602850017	3,400	33 U	
1D/27-218	602850018	4,530	33 U	
1D/27-219	602850019	501	33 U	
1D/27-220	602850020	647	33 U	
1D/27-221	602850021	447	33 U	
1D/27-222	602850022	644	33 U	
1D/27-223	602850023	186	33 U	
1D/27-224	602850024	33 U	33 U	
1D/27-225	602850025	2,560	33 U	
1D/27-226	602850026	426	33 U	
1D/27-227	602850027	298	33 U	
1D/27-228	602850028	392	33 U	
1D/27-229	602850029	219	33 U	
1D/27-230	602850030	8,290	3,300 U	
1D/27-231	602850031	927	33 U	
1D/27-232	602850032	2,180	33 U	

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
1D/27-233	602850033	3,140	33 U	
1D/27-234	602850034	512	33 U	
1D/27-235	602850035	2,170	33 U	
1D/27-236	602850036	223	33 U	
1D/27-237	602850037	205	33 U	
1D/27-238	602850038	468	33 U	
1D/27-239	602850039	456	33 U	
1D/27-240	602850040	3,280	33 U	
1D/27-241	602884001	3,380	33 U	
1D/27-242	602884002	406	33 U	
1D/27-243	602884003	33 U	33 U	
1D/27-244	602884004	114	33 U	
1D/27-245	602884005	177	33 U	
1D/27-246	602884006	76.8	33.0 U	
1D/27-247	602884007	65.1	33.0 U	
1D/27-248	602884008	327	33 U	
1D/27-249	602884009	439	33 U	
1D/27-250	602884010	179	33 U	
1D/27-251	602884011	1,250	33 U	
1D/27-252	602884012	2,100	33 U	
1D/27-253	602884013	117	33 U	
1D/27-254	602884014	638	33 U	
1D/27-255 FF	602884015	55.1	33.0 U	
1D/27-256	602884016	1,010	33 U	
1D/27-257	602884017	1,680	33 U	
1D/27-258	602884018	1,360	33 U	
1D/27-259	602884019	692	33 U	
1D/27-260	602884020	NA	NA	Location not accessible (temp. soil ramp)
1D/27-261	602884021	NA	NA	Location not accessible (temp. soil ramp)
1D/27-262	602884022	123	33 U	
1D/27-263	602884023	106	33 U	
1D/27-264 FF	602884024	36.7	32.9 U	
1D/27-265 FF	602884025	78.3	33.0 U	
1D/27-266 FF	602884026	39.9	32.9 U	
1D/27-267 FF	602884027	306	33 U	
1D/27-268 FF	602884028	235	33 U	
1D/27-269	602884029	NA	NA	Location not accessible (temp. soil ramp)
1D/27-270	602884030	247	33 U	
1D/27-271	602884031	33 U	33 U	
1D/27-272	602884032	69.1	33.0 U	
1D/27-273 FF	602884033	45.4	33.0 U	
1D/27-274	602884034	644	33 U	
1D/27-275	602884035	480	33 U	
1D/27-276 BT2.0	602884036	118	33 U	
1D/27-277 BT2.0	602884037	337	33 U	

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
1D/27-278	602884038	846	33 U	
1D/27-279	602884039	220	33 U	
1D/27-280	602884040	535	33 U	
1D/27-281	602886001	171	33 U	
1D/27-282 FF	602886002	37	33 U	
1D/27-283 FF	602886003	49	33 U	
1D/27-284 FF	602886004	91.4	33 U	
1D/27-285 BT2.0	602886005	97.6	33 U	
1D/27-286 BT2.0	602886006	534	356	
1D/27-287 FF	602886007	1,070	33 U	
1D/27-288	602886008	1,270	32.9 U	
1D/27-289	602886009	79.4	33 U	
1D/27-290	602886010	795	32.9 U	
1D/27-291 FF	602886011	89.9	32.9 U	
1D/27-292 FF	602886012	158	33 U	
1D/27-293 FF	602886013	161	33 U	
1D/27-294 BT2.0	602886014	48.9	32.9 U	
1D/27-295 BT2.0	602886015	790	494	
1D/27-296	602886016	10,500	33 U	near Pit 11
1D/27-297	602886017	195	33 U	
1D/27-298	602886018	247	33 U	
1D/27-299	602886019	10,500	33 U	near Pit 11
1D/27-300 FF	602886020	94.7	33 U	
1D/27-301 FF	602886021	110	32.2 U	
1D/27-302 BT2.0	602886022	589	32.6 U	
1D/27-303 BT2.0	602886023	196	32.6 U	
1D/27-304 BT2.0	602886024	1,380	32.6 U	
1D/27-305 BT2.0	602886025	2,220	32.2 U	
1D/27-306 BT2.0	602886026	399	32.7 U	
1D/27-307 BT2.0	602886027	616	32.5 U	
1D/27-308 BT2.0	602886028	319	32.1 U	
1D/27-309 BT2.0	602886029	2,430	32.9 U	
1D/27-310	602886030	2,040	32.7 U	
1D/27-311	602886031	103,000	321 U	around manhole excavation, storm sewers formerly connect to several pits and to drains at mold flush
1D/27-312	602886032	10,400	32.8 U	around manhole excavation, storm sewers formerly connect to several pits and to drains at mold flush
1D/27-313	602886033	361	32.3 U	
1D/27-314	602886034	8,500	32.7 U	
1D/27-315	602886035	7,360	32.8 U	
1D/27-316	602886036	4,540	32.6 U	
1D/27-317	602886037	5,460	32.9 U	
1D/27-318	602886038	4,520	32 U	
1D/27-319 SW1.0	602886039	525	32.7 U	

Table 5.26 (continued)

Sample Number	Lab ID	Aroclor		Comment
		1,242	1,260	
		ug/kg	ug/kg	
1D/27-320	602886040	8,700	32.2 U	
1D/27-321	602888001	3,040	32.9 U	
1D/27-322	602888002	131	32.9 U	
1D/27-323	602888003	663	33 U	
1D/27-324	602888004	90.5	33 U	
1D/27-325	602888005	963	32.9 U	
1D/27-326	602888006	171	32.9 U	
1D/27-327	602888007	495	32.9 U	
1D/27-328 SW1.0	602888008	145	33 U	
1D/27-329	602888009	4,000	33 U	
1D/27-330	602888010	549	32.9 U	
1D/27-331	602888011	4,030	32.9 U	
1D/27-332	602888012	322	32.9 U	
1D/27-333	602888013	3,890	33 U	
1D/27-334	602888014	1,510	32.9 U	
1D/27-335	602888015	1,430	32.9 U	
1D/27-336	602888016	1,970	32.9 U	
1D/27-337	602888017	3,990	33 U	
1D/27-338	602888018	938	33 U	
1D/27-339	602888019	1,090	33 U	
1D/27-340	602888020	3,730	32.9 U	
1D/27-341	602888021	9,840	32.9 U	
1D/27-342	602888022	8,540	33 U	
1D/27-343	602888023	5,200	33 U	
1D/27-344	602888024	1,720	32.9 U	

U - Not detected at this reporting limit

BT - Sample taken from bottom of trench (approx. 3 ft below grade*)

TT - Sample taken from top of trench (at top of existing grade*)

SW - Sample taken from trench sidewall (generally at 2.0 ft below grade* unless otherwise specified)

SW 1.0 - Sample taken for trench sidewall, depth below grade as specified

FF - Flowable fill (no soil at this location)

Table 5.27

Sample ID	Bay	Location	Result ug/10cm ²	Aroclor surface type	Lab Episode
			1242	1260	
				Aroclor	
		Uncleaned Walls			
003	Z31	4' n of Z-In; 16' high	3.3	nd (<1.0) wall	603127
006	Y31	15' s z-In; 12' high	4.7	nd (<1.0) wall	603127
009	X-31	16, s. of Y-In; 12' high	4.2	nd (<1.0) wall	603127
012	W31	15' s. of X-In; 18' ft. high	2.8	nd (<1.0) wall	603127
015	V31	34' s of W-In; 21' high	2.6	nd (<1.0) wall	603127
016	V31	12' e. of 34 In; 13' high	2.2	nd (<1.0) wall	603127
019	V32	20' e. of 32 In; 12' high	4.1	nd (<1.0) wall	603127
022	V33	16' e 33In; 9' high	5.9	nd (<1.0) wall	603128
023	V33	15' n. V-In; 16' high	2.2	nd (<1.0) wall	603128
026	W33	24' s. of X-In; 13' high	4.1	nd (<1.0) wall	603128
029	X33	16' s. of Y-In; 16' high	2.0	nd (<1.0) wall	603128
032	Y33	19' s. Z-In; 15' high	3.1	nd (<1.0) wall	603128
035	Z33	24' w. of 34-In; 12' high	4.6	nd (<1.0) wall	603128
038	Z32	24' e. of 32-In; 16' high	2.3	nd (<1.0) wall	603128
064	X32	6' s. of X-In, 6' high (east plenum)	5.6	nd (<1.0) wall	603182
066	Y33	7' s. of Z-In; 5' high (east wall)	5.6	nd (<1.0) wall	603182
069	W33	11' s of X-In; 6' high	5.7	nd (<1.0) wall	603182
		Uncleaned Roof Web (similar vertical surface to walls)			
007	X31	9' s. of Y-In; 13 w' of 32-In	1.3	nd (<1.0) web face	603127
014	V31	16' s. of W-In; 13' w of 32 In	9.9	nd (<1.0) web keyhole	603127
021	V33	15' n. of V-In; 14' w. 34-In	2.1	nd (<1.0) web face	603128
025	W33	21' s. of X-In; 12' e 33-In	1.6	nd (<1.0) web face	603128
031	Y33	18' s. of Z-In; 15' e. 33-In	1.8	nd (<1.0) web face	603128
037	Z32	13' n. of Z-In; 18' e. of 32-In	1.4	nd (<1.0) web face	603128
056	X32	24' s. of Y-In; 1'e ov 32-In	1.1	nd (<1.0) web face	603181

Table 5.28

Sample ID	Bay	Location	Result ug/10cm ²		surface type	Lab Episode
			1242	1260		
Uncleaned Ceilings (painted)						
002	Z31	3' n. of Z-In; 25' e. of 31 In	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603127
005	Y31	14' s. of Z-In; 15' w. of 32 In.	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603127
011	W31	7' s. of X-In; 18' w of 32-In	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603127
028	X33	10' s. of Y-In; 17' e. of 33-In	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603128
033	Z33	5' n. of Z-In; 23' e 33-In	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603128
047	W32	11' s of X-In; 6' e-32-In	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603181
063	Y32	23' s. of Z-line; 8' e 32-In	nd (<1.0)	nd (<1.0)	painted barrell ceiling	603182
Uncleaned Ceilings (bare concrete, 15 by 20 ft. area)						
018	V32	14' s of W-In; 11' e. of 32 In	12.8	9.4	unpainted barrell ceiling	603127
Crib01	V32	10' s of W-In; 2' e of 32-In	12.3	4.8	unpainted barrell ceiling	603268
Crib04	V32	12' s of W-In, 7' e fo 32 In	16.3	7.3	unpainted barrell ceiling	603268
Crib07	V32	4' s. of W-In; 5' e of 32-In	8.6	3.3	unpainted barrell ceiling	603268

Table 5.29
Pre-Cleaning Overhead Piping and Horizontal Surface Sampling
Former Department 27

Samp	Bay	Location	Result		surface type	Lab Episode
			ug/10cm ²	Aroclor		
			1242	1260		
Uncleaned Overhead Piping (Top Surface with Thickest Dust Layer Sampled)						
001	Z31	12' s. of AA; 14' e. of 31-In	77.6	nd (<1.0)	insulated pipe	603127
004	Y31	16' s. of Z-In; 16' w. of 32-In	91.3	nd (<1.0)	compressed air line	603127
008	X31	10' s of Y-In; 15' w. of 32-In	53.9	nd (<1.0)	chilled water (insulated)	603127
010	W31	16' s of X-In; 17' w of 32-In	128	nd (<1.0)	insulated pipe	603127
013	V31	15' s. of W-In; 13' w. of 32-In	128	nd (<1.0)	compressed air line	603127
017	V32	19' s. W-In; 8' e of 32 In	78.3	nd (<1.0)	steel sprinkler line	603127
020	V33	17' n. V-In; 11' w 34-In	80.6	nd (<1.0)	chilled water (insulated)	603127
024	W33	19' s. of X-In; 18' e. of 33-In	229	nd (<1.0)	steel fire line	603128
027	X33	8' s. of Y-In; 17' e. of 33 In	190	nd (<1.0)	chilled water (insulated)	603128
030	Y33	15' s of Z-In; 17' e. of 33-In	188	nd (<1.0)	compressed air line	603128
034	Z33	14' n. of Z-line; 11 w of 34 In	239	nd (<1.0)	steel sprinkler line	603128
036	Z32	11' n. of Z-In; 15 e. of 32-In	202	nd (<1.0)	insulated pipe	603128
039	W32	18' s. X-In; 2' e of 32-In	101	nd (<1.0)	steel fire line	603181
042	W32	15' s. of X-In; on 32-In.	103	nd (<1.0)	insulated line	603181
045	W32	13' s X-In; 14' e 32-In	110	nd (<1.0)	top of duct bank	603181
048	X32	25' s. of Y-In; 6' e of 32-In	99	nd (<1.0)	steel pipe	603181
051	X32	15' s. of Y-In; 14' e. of 32-In	104	nd (<1.0)	top of duct bank	603181
053	X32	15' s. of Y-In; 6' e. of 32-In.	85.2	nd (<1.0)	steel sprinkler line	603181
057	Y32	16' s. of Z-In; 6' e. of 32 In	92.2	nd (<1.0)	compressed air line	603182
060	Y32	9' s. of Z-In; 7' e. of 32-In	128	nd (<1.0)	insulated pipe	603182

Dust Collected from Top of Piping

Samp	Bay	Location	Result	surface type	Lab Episode	
			mg/kg			
			Aroclor			
001	W32	upper surfaces from piping	495	nd (<98)	miscellaneous piping	603187
002	X32	upper surfaces from piping	315	nd (<19.5)	miscellaneous piping	603187

Table 5.30

Pilot Test Cleaning
Former Department 27

Sample ID	Bay	Location	Result ug/10cm ²		surface type	Lab Episode
Pilot Clean Walls						
064 - no cleaning	X32	6' s. of X-In, 6' high (east plenum)	5.6	nd (<1.0)	wall	603182
065A - vacuum	X32	adjacent to 064	nd (<1.0)	nd (<1.0)	wall	603182
065B- vac and wipe	X32	adjacent to 065A	1.4	nd (<1.0)	wall	603182
072 - vac and wipe	X32	adjacent to 065B	1.7	nd (<1.0)	wall- duplicate	603182
066 - no cleaning	Y33	7' s. of Z-In; 5' high (east wall)	5.6	nd (<1.0)	wall	603182
067 - vacuum	Y33	adjacent to 066	nd (<1.0)	nd (<1.0)	wall	603182
068 - vac and wipe	Y33	adjacent to 067	2.3	nd (<1.0)	wall	603182
069 - no cleaning	W33	11' s of X-In; 6' high	5.7	nd (<1.0)	wall	603182
070 - vacuum	W33	adjacent to 069	nd (<1.0)	nd (<1.0)	wall	603182
071 - vac and wipe	W33	adjacent to 070	2.4	nd (<1.0)	wall	603182
Overhead Piping and Horizontal Surfaces Pilot Clean						
039 - no cleaning	W32	18' s. X-In; 2' e of 32-In	101	nd (<1.0)	steel fire line	603181
040 - vacuum	W32	adjacent to 039	3.3	nd (<1.0)	steel fire line	603181
041- vac and wipe	W32	adjacent to 040	3.8	nd (<1.0)	steel fire line	603181
042 - no cleaning	W32	15' s. of X-In; on 32-In.	103	nd (<1.0)	insulated line	603181
043 - vacuum	W32	adjacent to 042	2.2	nd (<1.0)	insulated line	603181
044 - vac and wipe	W32	adjacent to 043	1.7	nd (<1.0)	insulated line	603181
045 - no cleaning	W32	13' s X-In; 14' e 32-In	110	nd (<1.0)	top of duct bank	603181
046 - vacuum	W32	adjacent 045	2.4	nd (<1.0)	top of duct bank	603181
048 - no cleaning	X32	25' s. of Y-In; 6' e of 32-In	99	nd (<1.0)	steel pipe	603181
049 - vacuum	X32	adjacent to 048	5.9	nd (<1.0)	steel pipe	603181
050- vac and wipe	X32	adjacent to 049	7.6	nd (<1.0)	steel pipe	603181
051 - no cleaning	X32	15' s. of Y-In; 14' e. of 32-In	104	nd (<1.0)	top of duct bank	603181
052 - vacuum	X32	adjacent to 051	nd (<1.0)	nd (<1.0)	top of duct bank	603181
053 - no cleaning	X32	15' s. of Y-In; 6' e. of 32-In.	85.2	nd (<1.0)	steel sprinkler line	603181
054 - vacuum	X32	adjacent to 053	1.3	nd (<1.0)	steel sprinkler line	603181
055 - vac and wipe	X32	adjacent to 054	1.5	nd (<1.0)	steel sprinkler line	603181
057 - no cleaning	Y32	16' s. of Z-In; 6' e. of 32 In	92.2	nd (<1.0)	compressed air line	603182
058 - vacuum	Y32	adjacent to 057	4.2	nd (<1.0)	compressed air line	603182
059 - vac and wipe	Y32	adjacent to 058	4.9	nd (<1.0)	compressed air line	603182
060 - no cleaning	Y32	9' s. of Z-In; 7' e. of 32-In	128	nd (<1.0)	insulated pipe	603182
061 - vacuum	Y32	adjacent to 060	7	nd (<1.0)	insulated pipe	603182
062 - vac and wipe	Y32	adjacent to 061	6.6	nd (<1.0)	insulated pipe	603182

Uncleaned Ceilings (bare concrete suspected approx. 15 by 20 ft. area)

Crib01 - no cleaning	V32	10' s of W-In; 2' e of 32-In	12.3	4.8	unpainted barrel ceil	603268
Crib02 - vacuum	V32	adjacent to Crib01	14.6	5.6	unpainted barrel ceil	603268
Crib03- vac and wipe	V32	adjacent to Crib02	13.1	5.2	unpainted barrel ceil	603268
Crib04 - no cleaning	V32	12' s of W-In, 7' e fo 32 ln	16.3	7.3	unpainted barrel ceil	603268
Crib05 - vacuum	V32	adjacent to Crib04	13.4	5.5	unpainted barrel ceil	603268
Crib06 - vac and wipe	V32	adjacent to Crib05	13.3	5.6	unpainted barrel ceil	603268
Crib07 - no cleaning	V32	4' s. of W-In, 5' e of 32-In	8.6	3.3	unpainted barrel ceil	603268
Crib08 - vacuum	V32	adjacent to Crib07	7.2	2.8	unpainted barrel ceil	603268
Crib09 - vac and wipe	V32	adjacent to Crib08	12.1	4.6	unpainted barrel ceil	603268

Table 5.31
Post-Cleaning Overhead Horizontal Surface Wipe Samples (PCBs)
Vacated Space V31 to AA34

Bay V31 - Ceiling Sample Location and PCB Analytical Results

Sample #	Ft. N of V line	Ft. S of W line	Ft. E of 31 line	Ft. W of 32 line	Surface Type	(ug/100 scm)	Arochlor #	Pace Lab Report #
001		1	18		1-in. elec. conduit	1.2	1248	604240
002		14	25		1-in. elec. conduit	2.2	1248	604240
003		5	2		1-in. elec. conduit	3.2	1248	604205
004	Located in Bay W31				3 - 4 in. elec. conduit			
005	10		12		high volt. elec duct bank	1.6	1248	604240
006	19		13		high volt elec duct box	ND (<1.0)	1248/1260	604205
007		15	24		8 - 10 in. fire or similar	5.0	1248	604240
008	17		14		8 - 10 in. fire or similar	1.7	1248	604240
009		0		14	8 - 10 in. fire or similar	1.1	1248	604205
010		3	21		4-in. fire or similar	2.5	1248	604240
011		19	23		4-in. fire or similar	ND (<1.0)	1248/1260	604240
012		18	7		4-in. fire or similar	ND (<1.0)	1248/1260	604205
013		17	18		3-in. steel or similar	3.4	1248	604240
014		3	18		1.5 - 2-in. steel	5.6	1248	604240
015	18		15		1.5 - 2-in. steel	2.6	1248	604205
016	10		10		1.5 - 2-in. steel	1.5	1248	604240
017	Located in Bay W31				2 - 3 in. insulated line			
018		0		8	4 - 6 in. insulated line	ND (<1.0)	1248/1260	604240
019	Located in Bay W31				8 - 12 in. insulated line			
020		6	16		light fixture	ND (<1.0)	1248/1260	604205
021	19		16		light fixture	1.4	1248	604240
022		7	20		light unistrut	ND (<1.0)	1248/1260	604240
023		11	26		steel channel	6.0	1248	604205
					total samples			20

Table 5.32

Bus Duct Sampling
Former Department 27

Sample ID	Lab ID	Result	Aroclor	
		ug/100cm ²		Comments
V33 BUS-01	604732001	1.5	1248	
V33 BUS-02	604732002	1.9	1248	
V33 BUS-03	604732003	2.4	1248	
V33 BUS-04	604732004	2.9	1248	
W33 BUS-01	604732005	1.3	1248	
W33 BUS-02	604732006	1.7	1248	
W33 BUS-03	604732007	3.0	1248	
W33 BUS-04	604732008	3.5	1248	
X33 BUS-01	604732009	1.7	1248	
X33 BUS-02	604732010	2.9	1248	
X33 BUS-03	604732011	2.8	1248	
X33 BUS-04	604732012	4.6	1248	
Y33 BUS-01	604732013	5.9	1248	
Y33 BUS-02	604732014	12.7	1248	exceeds 10ug/100cm ²
Y33 BUS-03	604732015	8.5	1248	
Y33 BUS-04	604732016	5.8	1248	
Z33 BUS-01	604732017	ND < 1.0	1248	
Z33 BUS-02	604732018	2.1	1248	
Z33 BUS-03	604732019	1.1	1248	
Z33 BUS-04	604732020	1.3	1248	

Table 5.33

Sample Number	Sample Location	Interval, ft	Date	TCS, $\mu\text{g}/\text{kg}$	1,2-DCA, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	1,1-DCA, $\mu\text{g}/\text{kg}$	1,1-DCA, $\mu\text{g}/\text{kg}$	1,1,1-TCA, $\mu\text{g}/\text{kg}$	TPhC (heavy fraction), mg/kg	PCB, $\mu\text{g}/\text{kg}$	Other, $\mu\text{g}/\text{kg}$	Other, $\mu\text{g}/\text{kg}$	
3000	KC91-166	3-4	08/12/91	---	---	---	---	---	---	---	13.0	1,3-Dichlorobenzene	---	
3003	KC91-166	15.5-16.5	08/12/91	13.0	---	---	---	---	---	---	---	---	---	
3013	KC91-168	10-11	08/13/91	---	19.0	---	---	---	---	---	---	---	---	
3032	KC91-171	37.5-38.5	08/15/91	39.0	180.0	12.0	---	---	---	---	---	---	---	
3034	KC91-172	8-9	08/16/91	---	---	---	---	---	---	1600.0	---	---	---	
3035	KC91-172	12-13	08/16/91	---	---	---	---	---	---	1500.0	---	---	---	
3037	KC91-172	20.5-21.5	08/16/91	---	---	---	---	---	---	---	26.0	Ethylbenzene	---	
											450.0	Toluene	---	
3041	KC91-173	2.5-3.5	08/17/91	---	---	---	---	---	---	---	---	---	---	
3070	KC91-178	37-38	08/20/91	---	12.0	---	---	---	---	---	---	---	---	
3072	MSBII-01	3.5-4.5	10/08/91	---	---	---	---	---	---	85.0	---	---	---	
3073	MSBII-01	7-8	10/08/91	---	---	---	---	---	---	180.0	---	15.0	1,1,2,2-Tetrachloroethane	---
3078	MSBII-02	35-36	10/08/91	---	---	---	---	---	---	---	---	10.0	1,1,2,2-Tetrachloroethane	22.0
										87.0	t-Xylenes	Ethylbenzene	---	
3087	MSBII-05	12.5-13.5	10/09/91	---	---	---	---	---	---	290.0	---	---	---	
3092	MSBII-05	26-27	10/09/91	---	17.0	---	---	---	---	---	---	---	---	
3095	MSBII-06	2.5-3.5	10/10/91	20.0	---	---	---	---	---	360.0	---	---	---	
3098	MSBII-06	6-7	10/10/91	---	---	---	---	---	---	37.0	---	---	---	
3099	MSBII-06	11-12	10/10/91	---	---	---	---	---	---	310.0	---	---	---	
3104	MSBII-07	12-13	10/10/91	---	---	---	---	---	---	1100.0	---	---	---	
3101	MSBII-07	16.5-17.5	10/10/91	---	---	---	---	---	---	---	---	---	---	
3109	MSBII-08	21-22	10/10/91	---	75.0	29.0	---	---	---	---	---	---	---	
3110	MSBII-08	27-28	10/10/91	---	54.0	---	---	---	---	25.0	---	---	---	
3111	MSBII-08	31-32	10/10/91	---	24.0	---	---	---	---	---	---	---	---	
3108	MSBII-08	35.5-36.5	10/10/91	---	110.0	38.0	---	---	---	---	---	---	---	
3152	MSBII-19	3.5-4.5	10/15/91	---	---	---	---	---	---	---	48.0	t-Xylenes	---	
3158	MSBII-20	10-11	10/15/91	---	---	---	---	---	---	25.0	---	---	---	
3164	MSBII-21	8.5-9.5	10/16/91	---	---	---	---	---	---	1300.0	---	---	---	

Table 5.33 (continued)

Sample Number	Sample Location	Interval, ft	Date	TCE µg/kg	1,2-DCE µg/kg	Chloro-ethene µg/kg	1,1-DCE µg/kg	1,1-DCA µg/kg	1,1,1-TCA µg/kg	TPMC (heavy fraction) mg/kg	PCB mg/kg	Other µg/kg	Other µg/kg
3162	MSBH-21	10.5-11.5	10/16/91	---	---	---	---	---	---	49.0	---	---	---
3171	MSBH-23	10.5-11.5	10/16/91	---	---	---	---	---	---	32.0	---	---	---
3180	MSBH-25	7-8	10/17/91	---	---	---	---	---	---	440.0	---	---	---
3182	MSBH-26	3-4	10/29/91	---	---	---	---	---	---	27.0	---	---	---
3196	MSBH-29	18-19	10/31/91	---	---	---	---	---	---	10.0	---	---	---
3233	MSBH-37	12-13	01/16/92	---	---	---	---	---	---	2200.0	---	---	---
3239	MSBH-38	8-9	01/17/92	---	---	---	---	---	---	540.0	---	---	---
3241	MSBH-38	11-12	01/17/92	---	---	---	---	---	---	---	24.0 Benzene	---	---
3240	MSBH-38	37-38	01/17/92	---	25.0	---	---	---	---	320.0	2800.0	1100.0 Benzene	---
3259	MSBH-41	3-4	01/19/92	---	---	---	---	---	---	440.0	---	---	---
3260	MSBH-41	8-9	01/19/92	---	---	---	---	---	---	85.0 Benzene	24.0 Toluene	---	---
3262	MSBH-41	11-12	01/19/92	---	---	---	---	---	---	14.0 Benzene	140.0 Benzene	19.0 Toluene	---
3263	MSBH-41	14-15	01/19/92	---	28.0	31.0	---	---	---	79.0	33.0 t-Xylenes	2000.0 t-Xylenes	1700.0 Styrene
3264	MSBH-41	21.5-22.5	01/19/92	---	---	360.0	---	---	---	880.0	---	---	---
3265	MSBH-41	26.5-27.5	01/19/92	---	34.0	42.0	---	---	---	---	---	---	---
3266	MSBH-41	32-33	01/19/92	---	---	70.0	---	---	---	---	---	---	---
3261	MSBH-41	36.5-37.5	01/19/92	---	130.0	64.0	---	---	---	---	---	---	---
3276	MSBH-43	2-3	01/20/92	---	---	---	---	---	---	79.0	33.0 t-Xylenes	2000.0 t-Xylenes	1700.0 Styrene
3277	MSBH-43	8-9	01/20/92	---	---	---	---	---	---	880.0	---	---	---
3285	MSBH-44	2.5-3.5	01/21/92	11.0	11.0	---	---	---	---	---	---	---	---
3288	MSBH-44	8-9	01/21/92	180.0	62.0	---	---	---	---	---	---	---	---
3286	MSBH-44	13-14	01/21/92	440.0	83.0	---	---	---	---	---	---	---	---
3289	MSBH-44	16.5-17.5	01/21/92	34.0	25.0	---	---	---	---	---	---	---	---

--- = analyte not detected

Table 5.34

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, µg/kg	1,2-DCE (total), µg/kg	Chloroethene, µg/kg	Benzene, µg/kg	Toluene, µg/kg	Ethyl Benzene, µg/kg	Chlorobenzene, µg/kg	Xylene (total), µg/kg	PCBs, mg/kg	Other, µg/kg	
		Detection Limits											
		20	10	10	10	10	10	10	10	10	5	1,1,2-Trichloro-1,2,2-Trifluoroethane = 5 1,2-Dichlorobenzene = 5 1,3-Dichlorobenzene = 5 1,2-Dichloroethane-d4 = 5 All others = 10	
5	7: 7.5	16						78		183			
6	7: 13.5	460							10				
7	7: 18	777	13	67					11		MIBK = 30		
8	7: 23.5		11	22							1,1-DCA = 14		
9	7: 28.5	19											
15	9: 8.5	290						26					
16	9: 13.5	298											
17	9: 18.5	35											
21	8: 8.5		120	160									
22	8: 13.5	885	10,000					1100					
23	8: 18.5	3,867	36,000	12,000				3200		9,000	1,4/1254	MIBK = 3,500	
24	8: 22	3,374		14,000				1600		4,700	2,4/1254		
25	8: 47		750	51									
27	12: 47		34										
30	5: 13	6961	42	590	75			15	75	49		2-Butanone = 40 MIBK = 20 2-Hexanone = 11	
41	4: 13	717					15	96		550			
43	4: 47		70	220									
47	10: 18			124									
48	10: 23			400									
49	10: 45			85									

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE (total), $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Chlorobenzene, $\mu\text{g}/\text{kg}$	Xylene (total), $\mu\text{g}/\text{kg}$	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
58	2: 8	3,220	4,200	2,200			310	250	250	1,400	4.2/1260	Methylene chloride = 3,000 Acetone = 470 MIBK = 79 Chloroform = 250 2-Butanone = 51 1,1,2-Tetrachloroethane = 23 1,1-DCE = 13
59	2: 13	2,790	2,700	1,700		36	100	460	96	1,400	9.8/1260	Methylene chloride = 1,300 Acetone = 90 Chloroform = 96 MIBK = 220 1,1,2-TCA = 71 1,1,2-Tetrachloroethane = 35 2-Butanone = 18
60	2: 18	2,040	2,800	710		37	17	220	17	530	5.3/1260	MIBK = 100 Chloroform = 17 1,1,2-Tetrachloroethane = 15
61	2: 23		4,800	890		15	17	10		130		
62	2: 28		45	350	10							
64	2: 38		57	110	11					10		
65	2: 42		430	480								
66	2: 48		960	620	10							
70	3: 18		40	120								
71	3: 23		150	210								
72	3: 46		20	120								
73	1: 13			27								
74	1: 18		50	46								
75	1: 23		290	180								
76	1: 48		210	160								
77	11: 8		18									
78	11: 13	34.2	17									
79	11: 18		30									

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE (total), $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Chlorobenzene, $\mu\text{g}/\text{kg}$	Xylene (total), $\mu\text{g}/\text{kg}$	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
80	11: 23		120	160								
81	11: 28		47	150								
82	11: 33		80	890				14				MIBK = 44
83	11: 38		220	1,900	91							
84	11: 43		200	1,900	20							
85	11: 48		490	160								
86	15: 8	320						68		120		
87	15: 13	1,860	2,500	450		100	31	300	24	1,900		Chloroform = 24 1,1,2-Trichloroethane = 65 1,1,2,2-Tetrachloroethane = 44
88	15: 18	4,910	3,400	11,000		220	27	330		1,500		Chloroform = 24 1,1-DCE = 17 1,1-DCA = 17 1,1,2-TCA = 44 1,1,2,2-Tetrachloroethane = 41
89	15: 23	881	210	3,000	17	24		73	58	340		1,1-DCA = 17
90	15: 28	90.1	200	69				12		20		
91	15: 33	972	2,600	160		25		300	57	1,300		
92	15: 38		950	1,400						51		
93	15: 43		300	104						14		
94	15: 45		240	36				14				
95	16: 8	440	75	25								
96	16: 13	2,330	1,900	2,000		100	17	970		1,900		1,1,2-TCA = 32 1,1,2,2-Tetrachloroethane = 34
97	16: 18	5,030	540	2,400		130	25	1,100		2,500		1,1,2-TCA = 25 1,1,2,2-Tetrachloroethane = 69
98	16: 23	950	74	950	110	13		120		210		1,1-DCA = 11 1,1,2,2-Tetrachloroethane = 17
99	16: 28	89	40	22								
105	16: 33	280	1,200	66			11	40		160		

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, µg/kg	1,2-DCE (total), µg/kg	Chloroethene, µg/kg	Benzene, µg/kg	Toluene, µg/kg	Ethyl Benzene, µg/kg	Chlorobenzene, µg/kg	Xylene (total), µg/kg	PCBs, mg/kg	Other, µg/kg
106	16: 38	160	2,000	560		13	30					
107	16: 43		1,600	260						26		
108	16: 45	20	1,100	1,200				18		73		
111	17: 8	800	250	400							1.0/1260	
112	17: 13	240	22	1,900	20							
113	17: 18	3,500	72,000	3,000						2,000	3.3/1260	
114	17: 23	4,300	81,000	15,000						3,300	3.6/1260	
115	17: 28		42,000	7,600							1.2/1260	
116	17: 33	560	2,300	710		16	42	20		96		1,1,2-TCA = 130
117	17: 38	73.8	4,200				27	19		89		1,1-DCE = 650 1,1,2-TCA = 29
118	17: 43		2,000	810						26		
119	17: 48	196	5,200	330			14	26		91		
121	18: 9		72	43								
123	18: 19											1,1-DCA = 15
124	18: 24		110	10								
125	18: 29		120									
130	19: 4	230-H										
131	19: 9	15-L 1651-H		9,500			1,100	1,500		5,300	4.0/1254	
132	19: 14	6-L 75-H		9,400								
140	20: 5	28-H										
141	20: 9			14	19							
153	21: 24											Chloroethane = 100
161	22: 14		33	230								
162	22: 18		53	500								

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE (total), $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Chlorobenzene, $\mu\text{g}/\text{kg}$	Xylene (total), $\mu\text{g}/\text{kg}$	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
163	22: 23			150								
170	23: 9			54								
171	23: 12	225	33	51						1.0/1260		
172	23: 17			120	110							
191	25: 13	7-L 1900-H	12	3,500	24	200	28	1,200	200	2,800	1.0/1260	MIBK = 400 1,1,2-TCA = 11
192	25: 17	11-L 5100-H	110	45				13		22	2.4/1254 2.0/1260	
193	25: 24	12-L 1100-H	490	1,500	47	31		230	100	560		MIBK = 76 Carbon Disulfide = 26 (CS_2)
194	25: 27*	6-L 32-H										
197	25: 43*	31-H										
198	25: 45*	43-H										
216	26: 24			19								
217	26: 29			17								
222	27: 8	32-L		40								
223	27: 13	780-H 160-L	1900	1100		96				620		Tetrachloroethylene = 29
224	27: 18	2000-H 120-L	3900							1100	1.2/1260	
225	27: 21	2200-H 82-L	85	1000		21		270		410	1.4/1260	1,1,2,2-Tetrachloroethane = 16
226	27: 27	42-L	120	1600			330	19		940		
228	27: 38	6.6-L										
234	28: 28			20								
236	28: 46			200								
247	30: 3	37-H	11	15								
249	30: 14			90								

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE (total), $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Chlorobenzene, $\mu\text{g}/\text{kg}$	Xylene (total), $\mu\text{g}/\text{kg}$	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
250	30: 19		330	160								
251	30: 24		30	26								
252	30: 29	23-L										
254	30: 39	21-H										
255	30: 44	10-L										
256	30: 46	11-L										
259	31: 14	1400-H 180-L					14	360	28	1900	2.0/1260	
260	31: 18	71-L					14	180		740		
261	31: 22	1100-H 160-L		57		160	530	1900	330	8700		
262	31: 28	34-H 160-L										
263	31: 33	23-H										
265	31: 44	77-L										
268	32: 4	28-H										
269	32: 8	7-L										
272	32: 23			13								
274	32: 33	29-L										
279	33: 09			21								
280	33: 14			22							1-4 Dichlorobenzene = 112	
281	33: 18			66							1-4 Dichlorobenzene = 28	
282	33: 22		81	460	46						1-4 Dichlorobenzene = 51	
286	33: 42	26-H										
288	34: 03	75-H 7-L									1.9/1260	
289	34: 07	3200-H 37-L										

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE (total), $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Chlorobenzene, $\mu\text{g}/\text{kg}$	Xylene (total), $\mu\text{g}/\text{kg}$	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
290	34: 12	47-H						10		16		
291	34: 22	35-H										
292	34: 29	36-H		230	64							
293	34: 34			153	17							
302	35: 29			12								
303	35: 34			43								
304	36: 01	300-H										
305	36: 06	1700-H										
306	36: 10	23-H										
308	36: 21	23-H										
315	37: 24	62-H										
320	38: 09	34-H										2 Butanone (MEK) = 16
322	38: 18			43								
323	38: 24			480								
324	38: 28			520	45							
329	39: 09	125-H										
330	39: 12	250-H										
331	39: 19			590	210							
332	39: 23		76	1300	510	12						
333	39: 29		35	1200	770	14						
336	39: 41			280	23							
370	40: 49			50								1,1-DCA = 27
373	41: 29											1,1-DCA = 27
374	41: 44											1,1-DCA = 15
375	41: 49											

Table 5.34 (continued)

Sample Number	Borehole: Depth (ft)	TPH, mg/kg	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE (total), $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Chlorobenzene, $\mu\text{g}/\text{kg}$	Xylene (total), $\mu\text{g}/\text{kg}$	PCBs, mg/kg	Other, $\mu\text{g}/\text{kg}$
380	42: 09											1,4-dichlorobenzene = 5
381	42: 14							68		17		1,3-dichlorobenzene = 8 1,4-dichlorobenzene = 64
382	42: 18			25								1,4-dichlorobenzene = 8
383	42: 25			110	22							
385	42: 49			29								

Note: All blank spaces represent non-detect.

All intervals marked with an asterisk were not analyzed for VOCs.

TPH results; H = heavy and L = light. On sample numbers 1-119 only TPH - heavy were analyzed.

PCB results; concentration/aroclor type.

Sample intervals from which results reported did not exceed the detection limit are not shown.

Table 5.35

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
5	7: 7.5			9.36						
6	7: 13.5			11.9						
7	7: 18			11.8						
8	7: 23.5			8.34						
9	7: 28.5			8.42			318.9			
10	7: 33.5			8.42						
11	7: 38.5			9.25						
12	7: 43.5			8.5						
14	7: 46.5			6.69						
16	9: 13.5			11.5						
17	9: 18.5			12.5						
18	9: 45			13.9						
21	8: 8.5			9.42						
22	8: 13.5			10.1						
23	8: 18.5			9.0						
25	8: 47			10.6						
26	12: 8			9.2		23,400	3,930	22.0		
27	12: 47			11.9						
29	5: 8			9.99						

Table 5.35 (continued)

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
30	5: 13			7.70						
31	5: 23			9.07						
32	5: 28			11.5						
33	5: 33			9.56						
34	5: 38			9.86						
35	5: 43			8.77						
36	5: 48			15.3						
37	6: 13			11.7						
38	6: 18			8.9						
39	6: 50			16.9						
41	4: 13			10.0						
42	4: 18			6.98						
43	4: 47	31.7		11.5						
45	10: 5			4.09						
46	10: 13			11.5						
47	10: 18	13.9		10.4						
48	10: 23			8.5						
49	10: 45			15.5						
58	2: 8			8.4	339					

Table 5.35 (continued)

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
59	2: 13			9.9	159					
60	2: 18			10.1	190					
61	2: 23			11.5						
62	2: 28			12.2						
63	2: 33			3,440*						
64	2: 38			9.14						
65	2: 42			8.87						
66	2: 48	15.9		13.3						
67	TB									
68	3: 8			8.45						
69	3: 13			13.0						
70	3: 18	22.0		11.4						
71	3: 23			8.95	295					
72	3: 46	20.8	14.2	10,700*		33,090	4,460	29.7		
73	1: 13	15.9		9.8						
74	1: 18	18.8		10.8						
75	1: 23			11.7						
76	1: 48	38.7		10.4						
77	11: 8			6.63						

Table 5.35 (continued)

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
78	11: 13			10.6						
79	11: 18			10.7						
80	11: 23			8.5						
81	11: 28			5.35						
82	11: 33			2,760*		18,100				
83	11: 38			8.7						
84	11: 43			6.97						
85	11: 48			13.0						
86	15: 18			10.2			2,500			
87	15: 13			6.8						
88	15: 18	16.5	9.0	3,590		22,900	3,370	18.9		
89	15: 23			9.0						
90	15: 28			9.1						
91	15: 33			8.0						
92	15: 38			8.11						
93	15: 43			9.61						
94	15: 45			8.9						
95	16: 8		9.14	4,430		21,900	600	30.6		
96	16: 13			11.2						

Table 5.35 (continued)

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
97	16: 18			9.99						
98	16: 23			10.3			30,300	408		
99	16: 28			9.44						
105	16: 33			7.14						
106	16: 38			10.3						
107	16: 43			8.26						
108	16: 45			14.6						
111	17: 8			6.6						
112	17: 13			9.43						
113	17: 18			7.4						
114	17: 23			9.46						
115	17: 28			10.0						
116	17: 33			6.75						
117	17: 38			8.23						
118	17: 43			8.55						
119	17: 48			9.65						
120	18: 4						1,206			
123	18: 19						1,955			
124	18: 24					76				

Table 5.35 (continued)

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
142	20: 14					125				
152	21: 19	13.7								
158	21: 46	18.2								
162	22: 18				193					
171	23: 12				163					
177	23: 44	16.5					265			
178	23: 47	45.7								
212	26: 4	55.0								
214	26: 14	26.0								
215	26: 19	73.0								
216	26: 24	25.0								
217	26: 29	36.0								
218	26: 34	17.5								
220	26: 44	58.0								
232	28: 5			1.86		37.3				
237	29: 4					41.5				
239	29: 14									
247	30: 3									
258	31: 9						38.5			126

Table 5.35 (continued)

Sample Number	Borehole: Depth, ft	Arsenic (13)	Beryllium (7)	Cadmium* (1.5)	Chromium (120)	Copper (36)	Lead (38)	Mercury (0.7)	Nickel (42)	Zinc (118)
259	31: 14			3.1						146
260	31: 18									130
264	31: 36	334								
281	33: 18	19.4								
282	33: 22									
288	34: 03									
290	34: 12			2.53						183
306	36: 10									145
314	37: 19					44.2				
383	42: 25									123
385	42: 49	17.6								

*Laboratory indicated that an aluminum interference caused false positive results for cadmium up through sample #0119 (B. Smith, Pace Laboratories, Inc., personal communication to N. Korte, March 1992).

Threshold concentrations were taken from "Background Concentrations of Selected Elements in Unconsolidated Surficial Materials at the U. S. Department of Energy Kansas City Facility" (UNC/GJH-HMWP-3, February 1988).

Sample intervals from which results reported did not exceed the threshold concentration are shown as blank spaces.

Table 5.36

Depth, ft	Metal concentrations, mg/kg						PCBs, mg/kg
	Cadmium	Chromium	Copper	Lead	Nickel	Zinc	
SED							290
SED	118	4000	8500	2190	1630	2180	
0 - 1.5	<1	58	22	<20	43	83	2.9
1.5 - 3	<1	53	23	<20	32	82	
3 - 4.5	<1	52	26	<20	34	86	
4.5 - 6	<1	55	24	<20	35	88	
6 - 7.5	<1	53	24	<20	33	86	
7.5 - 9	<1	55	23	<20	34	84	
9 - 10.5	<1	55	24	<20	33	86	

Source: Fleischhauer et al. 1986.

SED = Refers to the sediment on the lagoon floor. This deposited sediment was readily distinguishable visually from the subsoil.

Table 5.37

Depth, ft	Metal concentrations, mg/kg						PCBs, mg/kg
	Cadmium	Chromium	Copper	Lead	Nickel	Zinc	
SED	370	10400	24000	2520	2710	1780	
SED							51
0 - 1.5	3	98	64	30	56	106	1.3
1.5 - 3	<1	55	24	<20	34	70	
3 - 4.5	<1	53	22	<20	32	74	
4.5 - 6	<1	51	22	<20	33	84	
6 - 7.5	<1	58	24	<20	39	92	
7.5 - 9	<1	55	23	<20	34	84	
9 - 10.5	<1	55	23	<20	35	87	

Source: Fleischhauer et al. 1986.

SED = Refers to the sediment on the lagoon floor. This deposited sediment was readily distinguishable visually from the subsoil.

Table 5.38

Sample Number	Location Depth, ft	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Xylene, $\mu\text{g}/\text{kg}$	1,1,1-TCA, $\mu\text{g}/\text{kg}$	PCBs, mg/kg
SD01	1: 0-1					190		11	15	
SD02	1: 1-2									2.2/1242 11/1260
SD03	2: 0-1									17/1242
SD04	2: 1-2					210		12	26	2.0/1242
SD05	3: 0-1									5.9/1242
SD06	3: 1-2									1.6/1242
SD08	4: 1-2					170			17	
SD21	11: 0-1		38							
SD23	12: 0-1		61							

Note: Detection limits; VOCs = 10 $\mu\text{g}/\text{kg}$ and PCBs = 1.0 mg/kg.

PCBs - concentration/AroclorTM type.

Sample intervals from which results reported did not exceed the detection limit are not shown.

Table 5.39

Sample Number	Location Depth, ft	TCE, $\mu\text{g}/\text{kg}$	1,2-DCE, $\mu\text{g}/\text{kg}$	Chloroethene, $\mu\text{g}/\text{kg}$	Benzene, $\mu\text{g}/\text{kg}$	Toluene, $\mu\text{g}/\text{kg}$	Ethyl Benzene, $\mu\text{g}/\text{kg}$	Xylene, $\mu\text{g}/\text{kg}$	1,1,1-TCE, $\mu\text{g}/\text{kg}$	PCBs, mg/kg	TPH, mg/kg	Other, $\mu\text{g}/\text{kg}$
6174	SB01: 01										53-H	
6177	SB01: 11										59-H	
6178	SB02: 01									3.0/1248		
6180	SB02: 08										39-H	
6182	SB03: 01										120-H	
6183	SB03: 04									5.8/1242 1.0/1254	24-H	
6184	SB03: 08									6.4/1242	48-H	
0389	SB05: 04									7.8/1242	20-H	
0390	SB05: 08											2-butanone = 13
0414	SB06: 01										20-H	
0416	SB06: 08										26-H	
0418	SB07: 01										72-H	
0419	SB07: 04									34/1242 2.5/1254	190-H	
0420	SB07: 08										28-H	

PCBs - concentration/Aroclor™ type.

H = heavy

Sample intervals from which results reported did not exceed the detection limit are not shown.

Table 5.40

Location	TCE	1,2-DCE	Chloroethene	Other
TW01-W		11		
TW01-W1				
TW02-W		5		
TW02-W1				
TW03-W				
TW03-W1				
TW04-W				
TW04-W1				
TW05-W		6		
TW05-W1		11	14	
TW06-W		5	24	
TW06-W1			61	
TW07-W		330	380	
TW07-W1		430	420	
TW08-W		21	44	
TW08-W1		21	76	
TW09-W	6	520	33	
TW09-W1	12	680	70	
TW10-W		98	52	
TW10-W1		99	36	1,1,2-trichloro-1,2,2-TFA 10
TW11-W				
TW11-W1	19	45		
TW12-W				
TW12-W1				
TW13-W				
TW13-W1				
TW14-W1	6	980	180	
TW15-W1	220	1300	110	
TW16-W1	910	1400	59	Chloroform 9
TW17-W1	1100	2300	180	Chloroform 11 1,1-DCE 8
TW18-W1	340	66		

Table 5.40 (continued)

Location	TCE	1,2-DCE	Chloroethene	Other
TW19-W1	96	12		
TW20-W1		6		
TW21-W1		2000	96	
TW22-W1	37	3500	150	1,1-DCE 6
TW23-W1	700	5000	26	
TW24-W1			13	
TW25-W1		8		
TW26-W1	1300	410	15	Benzene 9
TW27-W1	160	910	25	

W - water sample collected with peristaltic pump.

W1 - water sample collected with bailer.

All blanks indicate non-detects.

All sample concentrations in $\mu\text{g/L}$.

Table 5.41

<u>Sample Location</u>	<u>Date</u>	<u>1,1-DCA</u>	<u>Analyte, ug/L</u>	<u>1,2-DCE</u>	<u>TCE</u>	<u>Chloroethane</u>
KC90-136-U	10/17/90	-		-	-	-
	10/31/90	-		-	-	-
	11/08/90	-		-	-	-
	11/15/90	-		-	-	-
	01/24/91	-		-	-	-
KC90-136-L	10/17/90	-		-	-	-
	10/31/90	-		-	-	-
	11/08/90	-		-	-	-
	11/15/90	-		-	-	-
	01/24/91	-		-	-	-
KC90-137-U	10/25/90	8.0		-	-	-
	11/02/90	7.0		-	-	-
	11/07/90	7.0		-	-	-
	11/16/90	10.0		-	-	-
	01/28/91	10.0	7.0	-	-	-
KC90-137-L	10/25/90	-		-	-	-
	11/02/90	-		-	-	-
	11/07/90	-		-	-	-
	11/16/90	-		-	-	-
	01/28/91	-		-	-	-
KC90-138-U	10/19/90	-	7.0	-	-	-
	10/31/90	-		-	-	-
	11/06/90	-		-	-	-
	11/16/90	-		-	-	-
	01/25/91	-		-	-	-
KC90-138-L	10/19/90	22.0		-	-	11.0
	10/31/90	10.0		-	-	-
	11/06/90	13.0		-	-	10.0
	11/16/90	13.0		-	-	-
	01/25/91	13.0		-	-	-
KC90-139-U	10/19/90	-		-	-	-
	11/01/90	-		-	-	-
	11/07/90	-		-	-	-
	11/16/90	-		-	-	-
	01/21/91	-		-	-	-
KC90-139-L	10/19/90	-		-	13.0	-
	11/01/90	-		-	-	-
	11/07/90	-		-	-	-
	11/16/90	-		-	-	-
	01/21/91	-		-	-	-

Table 5.42

Sample		Interval, ft	Date	<u>Anaylte, ug/kg</u>		
Number	Location			Acetone	Methylene Chloride	PCBs
6100	KC90-136	11 - 12	10/5/90	-	-	-
6101	KC90-136	43.5 - 44.5	10/5/90	19	-	-
6102	KC90-137	7 - 8	10/5/90	-	-	-
6103	KC90-137	43 - 44	10/5/90	-	-	-
6106	KC90-138	7.5 - 8.5	10/6/90	-	-	-
6107	KC90-138	43.5 - 44.5	10/6/90	-	-	-
6108	KC90-139	7.5 - 8.5	10/6/90	-	-	-
6109	KC90-139	46.5 - 47.5	10/6/90	-	50	-
6112	KC90-140	7 - 8	10/7/90	-	67	-
6113	KC90-140	44.3 - 45.3	10/7/90	-	11	-
6116	KC90-141	6 - 7	10/8/90	-	-	-
6117	KC90-141	7 - 8	10/8/90	-	-	-
6118	KC90-141	43 - 44	10/8/90	-	-	-
6121	KC90-142	12 - 13	11/2/90	-	-	-
6122	KC90-142	42.5 - 43.0	11/2/90	-	-	-
6130	KC90-143	11 - 12	11/3/90	-	-	-
6131	KC90-143	42 - 43	11/3/90	-	-	-

- = Analyte not detected.

Table 5.43

Sample Number	Location	Interval (ft)	Date	Analyte (mg/kg)								
				Cu	Pb	Ni	Cd	Bc	As	Hg	Cr	Zn
6100	KC90-136	11 - 12	10/5/90	17.3	15.2	10.8	-	0.53	4.2	-	9.9	36.7
6101	KC90-136	43.5 - 44.5	10/5/90	22.8	12.5	28.5	2.0	0.46	-	-	23.1	176
6102	KC90-137	7 - 8	10/5/90	22.7	6.7	16.3	-	0.84	1.7	-	15.4	61.1
6103	KC90-137	43 - 44	10/5/90	30.3	16.5	22.8	0.87	0.53	3.2	-	19.7	86.4
6106	KC90-138	7.5 - 8.5	10/6/90	17.3	15.4	19.7	-	0.96	4.0	-	18.6	62.5
6107	KC90-138	43.5 - 44.5	10/6/90	53.7	15.0	24.8	2.8	0.52	2.9	-	17.6	130
6108	KC90-139	7.5 - 8.5	10/6/90	18.2	16.8	19.3	-	0.85	7.3	-	16.1	59.4
6109	KC90-139	46.5 - 47.5	10/6/90	36.9	17.5	20.7	-	0.57	4.2	0.03	13.1	92.2
6112	KC90-140	7 - 8	10/7/90	21.7	10.6	24.5	-	1.2	2.1	-	21.6	87.5
6113	KC90-140	44.3 - 45.3	10/7/90	26.3	12.0	26.2	-	0.48	41.4	-	15.7	89.0
6116	KC90-141	6 - 7	10/8/90	26.3	10.5	23.3	-	0.53	1.2	-	22.5	63.1
6117	KC90-141	7 - 8	10/8/90	20.6	22.3	21.5	-	0.53	6.8	-	21.6	59.1
6118	KC90-141	43 - 44	10/8/90	13.9	17.8	34.5	-	0.48	2.6	-	27.5	81.8
6121	KC90-142	12 - 13	11/2/90	25.8	12.7	13.3	-	0.60	3.9	0.03	13.3	74.7
6121*	KC90-142	12 - 13	11/2/90	28.1	6.5	29.6	-	0.59	-	-	65.0	75.0
6122	KC90-142	42.5 - 43.	11/2/90	17.0	19.3	23.5	-	0.50	3.6	0.04	13.2	62.2
6122*	KC90-142	42.5 - 43.5	11/2/90	16.7	9.0	36.7	0.93	0.31	-	-	54.5	82.4
6130	KC90-143	11 - 12	11/3/90	18.3	14.9	20.8	-	0.53	6.4	-	13.6	56.5
6131	KC90-143	42 - 43	11/3/90	19.7	10.9	27.2	-	0.44	2.9	0.03	18.0	69.3

* = Sample analysis reran.

- = Analyte not detected.

Sample Results in bold exceed KCP background range values.

Table 5.44
Subsurface Soil Sampling and Chemical Analysis Summary
Bannister Federal Complex Landfill

Boring No.	Sample No.	Depth (ft.)	VOCs	SVOCs	Chloride	Nitrate	Metals	Cyanide
SB-01	SB1	3-5	X	X			X	X
	SB2	8-10	X	X			X	X
	SB3	13-15	X b	X b			X b	X b
	SB4	18-20	X	X			X	X
	SB5	23-25	X a	X a			X a	X a
SB-02	SB1	3-5	X c	X c	X c	X c	X c	X c
	SB2	8-10	X	X			X	X
	SB3	13-15	X	X			X	X
	SB4	18-20	X	X			X	X
	SB5	23-25	X	X			X	X
	SB6	26 - 28						
SB-03A	SB1	3-5	X	X b			X	X b
	SB2	8-10	X b	X b			X b	X b
	SB3	13-15	X	X			X	X
	SB4	18-20	X	X			X	X
	SB5	23-25	X c	X c	X c	X c	X c	X c
MW KC95-01	SB1	3-5						
	SB2	8-10						
	SB3	11-13	X	X			X	X
	SB4	16-18	X	X			X	X
	SB5	23-25						
MW KC95-02	SB1	3-5						
	SB2	6-7	X	X			X	X
	SB3	13-15	X	X			X	X
	SB4	16-18	X	X			X	X
	SB5	23-25						
MW KC95-03L	SB1	3-5	X	X			X	X
	SB2	8-10	X	X			X	X
	SB3	13-15	X a	X a			X a	X a
	SB4	18-20	X	X			X	X
	SB5	23-25	X	X			X	X
	SB6	28-30	X	X			X	X
	SB7	31-33	X	X			X	X
	SB8	38-40	X	X			X	X
MW KC95-04	SB1	3-5	X	X			X	X
	SB2	8-10						
	SB3	13-15						
	SB4	18-20						
	SB5	23-25						
	SB6	28-30						
	SB7	33-35	X	X			X	X
	SB8	38-40	X	X			X	X
	SB9	43-45						
Subtotal			31	31	2	2	31	31

QA/QC Samples						
Field Duplicate and QA sample - a	4	4	0	0	4	4
MS/Duplicate- b	2	2	0	0	2	2
Rinsate - c	2	2	2	2	2	2
Trip Blanks	7	0	0	0	0	0
Subtotal QA/QC Samples	15	8	0	0	8	8

Total Field + QA/QC Samples	46	39	2	2	39	39
-----------------------------	----	----	---	---	----	----

VOCs = Volatile organic compounds
SVOCs = Semivolatile organic compounds
Metals = CLP

a = Field Duplicate/QC Sample
b = Matrix Spike/Matrix Spike Duplicate
c = Rinsate Blanks

Table 5.45

**Background Metal Concentrations and
Maximum Metal Concentrations in Soil Samples
Bannister Federal Complex Landfill**

CLP TAL Metals	Maximum Concentration in RI Soil Samples (mg/kg)	Background Concentration (mg/kg)	
		Typical Range in Missouri Soils*	Mean Concentration in Site Soils**
Aluminum	9,240	42,000 - 80,000	NA
Arsenic	8.1	6 - 12	7.2
Barium	203	600 - 1,500	NA
Beryllium	0.84	< 1 - 1.2	2.8
Cadmium	1.63	1 - 1.5	0.75
Calcium	27,500	< 700 - 38,000	NA
Chromium	59.1	25 - 80	66.6
Cobalt	24.3	6 - 14	NA
Copper	90.3	8 - 25	21.4
Iron	31,500	16,000 - 29,000	NA
Lead	32.2	12 - 80	23.8
Magnesium	2,980	3,800 - 12,000	NA
Manganese	2,990	< 300 - 1,200	655.9
Mercury	0.11	0.026 - 0.4	< 0.5
Nickel	37.7	15 - 50	25.2
Potassium	1,600	15,000 - 20,000	NA
Silver	2.12	NA	NA
Sodium	695	4,500 - 8,000	NA
Vanadium	31.8	60 - 125	NA
Zinc	130	56 - 560	85.2

* Tidball, 1984

** Fleischauer, 1988

NA = Data not available

Table 5.46

Hole No.	Depth (ft)	Trichloro- ethene	1,1,1-Trichloro- ethane	1,2-Dichloro- ethene	Trichloro- methane	Tetrachloro- ethene
7 ^b	N/A	50.000	0.163	20.800	<0.010	28.340
	2.5 to 4.0	0.51	<0.1	1.8	<0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	
	8.5 to 10.0	<0.1	<0.1	1.4	<0.1	
	12.5 to 14.0	5.4	<0.1	3.8	<0.1	
6	2.5 to 4.0	7.5	<0.1	4.7	<0.1	3.1
	4.5 to 6.0	0.24	<0.1	0.22	<0.1	<0.1
5	2.5 to 4.0	3.6	<0.1	3.5	<0.1	0.68
	4.5 to 6.0	11.4	<0.1	4.4	<0.1	2.7
4	2.5 to 4.0	<0.1	<0.1	<0.1	<0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	

Table 5.46 (continued)

Hole No.	Depth (ft)	Trichloro- ethene	1,1,1-Trichloro- ethane	1,2-Dichloro- ethene	Trichloro- methane	Tetrachloro- ethene
3	2.5 to 4.0	<0.1	<0.1	0.38	<0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	
2	2.5 to 4.0	<0.1	<0.1	<0.1	0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	
1 ^b	N/A	20.100	0.177	24.400	0.150	0.255
	2.5 to 4.0	<0.1	<0.1	<0.1	<0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	
	8.5 to 10.0	3.6	<0.1	5.4	<0.1	
	12.5 to 14.0	2.0	<0.1	1.9	<0.1	
8	2.5 to 4.0	<0.1	<0.1	<0.1	<0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	
9	2.5 to 4.0	<0.1	<0.1	<0.1	<0.1	
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	

Table 5.46 (continued)

Hole No.	Depth (ft)	Trichloro- ethene	1,1,1-Trichloro- ethane	1,2-Dichloro- ethene	Trichloro- methane	Tetrachloro- ethene
10	2.5 to 4.0	<0.1	<0.1	<0.1	<0.1	<0.1
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	<0.1
11	2.5 to 4.0	<0.1	<0.1	<0.1	<0.1	<0.1
	4.5 to 6.0	<0.1	<0.1	<0.1	<0.1	<0.1

^aug/g = 1000 ug/kg.^bWater sample.

NA = Not applicable; water sample.

Reference: Carrick 1984.

Table 5.47

Borehole number	Depth (ft)	Concentration (ug/g)					
		TCE	trans-1,2-DCE	1,1,2,2-Tetra- chloroethane	Tetrachloro- ethylene	Benzene	Methylene chloride
TC85-01	2.5 to 4	30	4.5	0.34	0.66	0.47	<0.3
	4.5 to 6	38	1.9	<0.3	1.3	<0.5	<0.3
	9.5 to 11	4.1	<0.3	<0.3	0.84	0.03	<0.3
	14.5 to 16						
	19.5 to 21	1.8	<0.3	<0.3	<0.3	<0.3	4.3
	24.5 to 26	7.6	<0.3	<0.3	1.3	<0.3	<0.3
	29.5 to 31	6.8	3.4	<0.3	<0.3	<0.3	<0.3
	34.5 to 36	12	5.4	<0.3	<0.3	<0.3	<0.3

Table 5.47 (continued)

Borehole number	Depth (ft)	Concentration (ug/g)					
		TCE	trans-1,2-DCE	1,1,2,2-Tetra- chloroethane	Tetrachloro- ethylene	Benzene	Methylene chloride
TC85-02	3 to 4.5	88	<0.3	<0.3	<0.3	<0.3	<0.3
	9.5 to 11	190	<0.3	<0.3	<0.3	<0.3	2.1
	14.5 to 16	27	<0.3	<0.3	<0.3	<0.3	<0.3
	19.5 to 21	290	<0.3	<0.3	<0.3	<0.3	<0.3
	24.5 to 26	16	<0.3	<0.3	<0.3	<0.3	<0.3
	29.5 to 31	3.4	<0.3	<0.3	<0.3	<0.3	<0.3
	34.5 to 36	32	<0.3	<0.3	<0.3	<0.3	0.2
	38 to 38.6	140	<0.3	<0.3	<0.3	<0.3	<0.3

Reference: Fleischhauer, Sturm, and Sewell 1987.

Table 5.48

Borehole number	Depth (ft)	Sample number	Concentration (ug/g)					
			TCE	trans-1,2-DCE	1,1,2,2-Tetra-chloroethane	Tetrachloroethylene	Methylene chloride	Benzene
CS85-01	1 to 1.7	MMC111	0.12	<0.02	0.25	0.04	<0.08	<0.03
CS85-02	1.3 to 2.2	MMC107	0.11	<0.02	<0.04	<0.05	<0.08	<0.33
	4.2 to 5	MMC108	<0.02	<0.02	<0.04	<0.05	<0.08	0.12
CS85-03	1.1 to 1.9	MMC109	<0.05	<0.02	0.06	0.05	<0.08	<0.33
	4.5 to 5.3	MMC110	0.14	<0.02	0.06	<0.05	<0.08	<0.33
CS85-04	1 to 2.5	MMC188	<0.3	<0.3	<0.3	<0.3	0.17	<1.8
	5 to 6.5	MMC191	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
CS85-05	5 to 6.5	MMC195	<0.3	<0.3	<0.3	<0.3	<0.3	<1.8
*These samples consisted mostly of fill with varying amounts of natural organic matter. The widely different sample matrices led to the variable detection limits reported by the laboratory.								

*These samples consisted mostly of fill with varying amounts of natural organic matter. The widely different sample matrices led to the variable detection limits reported by the laboratory.

Reference: Fleischhauer, Sturm, and Sewell 1987.

Table 5.49

Field ID	Date sampled	Depth (ft)	Volatiles				
			TCE	DCE	CE	1,1,1-TCA	Other
SB-1	10/30/87	1.5 to 4.0	2500	670	<200	<100	58J PCE
	10/30/87	6.5 to 9.0	700	82	<50	<25	23J PCE
	10/30/87	11.5 to 14.0	270	940	10J	<25	8J PCE
	10/30/87	16.5 to 19.0	14J	280	<50	<25	9J Tol
	10/30/87	21.5 to 24.0	9J	320	270	<25	ND
	10/30/87	26.5 to 29.0	10J	300	25J	<50	ND
	10/30/87	31.5 to 34.0	<50	810	83J	<50	ND
	10/30/87	35.0 to 37.5	920	230	14J	<50	11J PCE
SB-2	11/03/87	1.5 to 4.0	<5	<5	<10	41J	16J Tol:225 PCE
	11/03/87	6.5 to 9.0	<5	13J	<10	28J	14J PCE
	11/03/87	11.5 to 14.0	<5	37J	<10	22J	11J Tol
	11/03/87	16.5 to 19.0	<5	29J	<10	<5	11J Tol
	11/03/87	21.5 to 24.0	<5	10J	<10	93	ND
	11/03/87	26.5 to 29.0	<5	<5	<10	34J	ND
	11/03/87	31.5 to 34.0	<5	<5	<10	38J	ND
SB-3	11/01/87	1.5 to 4.0	<5	<5	<10	<5	ND
	11/01/87	6.5 to 9.0	<5	<5	<10	48J	ND
	11/01/87	11.5 to 14.0	<5	<5	<10	110	ND
	11/01/87	16.5 to 19.0	<5	<5	<10	67	ND
	11/01/87	21.5 to 24.0	<5	<5	<10	225	ND
	11/01/87	26.5 to 29.0	<5	<5	<10	92	ND
	11/01/87	31.5 to 34.0	<5	<5	<10	170	ND

Table 5.49 (continued)

Field ID	Date sampled	Depth (ft)	Volatiles				
			TCE	DCE	CE	1,1,1-TCA	Other
SB-4	10/30/87	1.5 to 4.0	<50	<50	<100	<50	ND
	10/30/87	6.5 to 9.0	<50	<50	<100	<50	ND
	10/30/87	11.5 to 14.0	<50	<50	<100	<50	ND
	10/30/87	16.5 to 19.0	<50	<50	<100	21J	ND
	10/30/87	21.5 to 24.0	<100	<50	<50	13J	ND
	10/30/87	26.5 to 29.0	<100	<50	<50	<50	ND
	10/30/87	31.5 to 34.0	<100	<50	<50	<50	ND
	10/30/87	34.0 to 36.0	<100	<50	<50	13J	ND
SB-5	10/29/88	1.5 to 4.0	<25	<25	<50	15J	ND
	10/29/88	6.5 to 9.0	<25	<25	<50	23J	ND
	10/29/88	11.5 to 14.0	2J	<25	<50	11J	ND
	10/29/88	16.5 to 19.0	7J	<25	<50	30	6J Tol
	10/29/88	21.5 to 24.0	17J	<25	<50	10J	5J Tol
	10/29/88	26.5 to 29.0	14J	<25	<50	6J	ND
	10/29/88	31.5 to 34.0	<25	<25	<50	10J	ND
	10/29/88	35.5 to 38.0	14J	<50	<100	49J	ND
SB-6	10/28/88	1.5 to 4.0	<50	<50	<100	17J	13J DCA
	10/28/88	6.5 to 9.0	<50	<50	<100	12J	13J DCA
	10/28/88	11.5 to 14.0	<25	<25	<50	6J	7J DCA
	10/28/88	16.5 to 19.0	<25	<25	<50	12J	ND
	10/28/88	21.5 to 24.0	<25	<25	<50	ND	ND
	10/28/88	26.5 to 29.0	<25	<25	<50	7J	ND
	10/28/88	31.5 to 34.0	<25	<25	<50	5J	ND
	10/28/88	36.5 to 39.0	<25	<25	<50	ND	ND

Table 5.49 (continued)

Field ID	Date sampled	Depth (ft)	Volatiles				
			TCE	DCE	CE	1,1,1-TCA	Other
SB-7	11/02/87	1.5 to 4.0	<5	<5	<10	47J	15J Tol
	11/02/87	6.5 to 9.0	<5	<5	<10	26J	ND
	11/02/87	11.5 to 14.0	Lab accident/sample data unavailable				
	11/02/87	16.5 to 19.0	<5	<5	<10	<5	ND
	11/02/87	21.5 to 24.0	<5	<5	<10	<5	ND
	11/02/87	26.5 to 29.0	<5	<5	<10	<5	ND
	11/02/87	31.5 to 34.0	<5	<5	<10	<5	ND
	11/02/87	34.5 to 37.0	<5	<5	<10	34J	ND
SB-8		1.5 to 4.0	No sample collected				
	11/01/87	6.5 to 9.0	<5	<5	<10	76	ND
	11/01/87	11.5 to 14.0	<5	<5	<10	<5	ND
	11/01/87	6.5 to 19.0	13J	<53	<10	11J	100 Ethyl benzene
	11/01/87	1.5 to 24.0	<5	30J	<10	<5	57J MEK
	11/01/87	6.5 to 29.0	<5	<59	<10	52	ND
	11/01/87	1.5 to 34.0	<5	<5	<10	19J	10J Tol
	11/01/87	35.0 to 37.5	<5	26J	<10	<5	ND

TCE = Trichloroethene
DCE = trans-1,2-Dichloroethene
CE = Chloroethene
J = Present below detection limit.
ND = Analyzed; not detected.

Tol = Toluene
TCA = Trichloroethene
Ben = Benzene
1,1,1-TCA = 1,1,1-Trichloroethane
MEK = 2-Butanone (methyl ethyl ketone)

Reference: DOE 1989b.

Table 5.50

Field ID	Date sampled	Depth (in.)	Volatiles					Other
			TCE	DCE	CE	1,1,1-TCA		
SS 1	11/02/87	12 to 30	<5	<5	<10	75	10J Tol	
SS 2	11/02/87	11 to 29	<5	<5	<10	22J	ND	
SS 2	11/02/87	29 to 42	<5	<5	<10	<5	ND	
SS 2	11/02/87	42 to 54	<5	<5	<10	19J	ND	
SS 3	11/03/87	18 to 36	<5	<5	<10	47J	21J Tol	
SS 4	11/01/87	09 to 27	<5	<5	<10	<5	ND	
SS 5	11/01/87	07 to 25	<5	<5	<10	<5	ND	
SS 5	11/01/87	25 to 43	<5	<5	<10	24J	10J Tol	
SS 5	11/01/87	43 to 55	44	<5	<10	<5	11J Tol	
SS 6	11/01/87	09 to 27	<5	<5	<10	<5	ND	
SS 7	10/31/87	10 to 19	<5	<5	<10	<5	ND	
SS 7	11/01/87	19 to 24	<5	<5	<10	<5	ND	
SS 9	11/03/87	26 to 40	36J	80	<10	34J	15J Tol	
SS 9	11/03/87	30 to 48	55	50J	<10	34J	15J Tol	
SS 10	10/30/87	10 to 28	<5	<5	<10	<5	ND	
SS 11	10/30/87	09 to 26	<5	<5	<10	<5	ND	

Table 5.50 (continued)

Field ID	Date sampled	Depth (in.)	Volatiles					Other
			TCE	DCE	CE	1,1,1-TCA		
SS 14	11/01/87	00 to 07	<5	<5	<10	<5	24J Tol	
SS 15	11/04/87	sump	930J	66000	<10	4700	3500 CHCl ₃ 26000 PCE 1800J Tol 550J CHB 1000J XYL	

Tol = Toluene
 CHCl₃ = Chloroform
 PCE = Tetrachloroethene
 CHB = Chlorobenzene
 XYL = Total xylene
 Reference: DOE 1989b.

NA = Not available
 J = Present below the detection limit.
 ND = Analyzed; not detected.
 NS = Coordinates not surveyed.

Table 5.51

Location	Date sampled	Depth (ft)	TCE	DCE	CE	1,1,1-TCA	Other	PCBs
KC87-69	12/09/87	6.0 to 8.5	<5	25J	<10	74	38J Tol	ND
KC87-69	12/09/87	11.0 to 13.5	14J	<5	<10	67	42J Tol	ND
KC87-69	12/09/87	16.0 to 18.5	14J	66	<10	13J	36J Tol 240 MEK,	ND
KC87-69	12/09/87	21.0 to 23.5	<5	80	<10	22J	17J Tol	ND
KC87-69	12/09/87	26.0 to 28.5	<5	100	<10	ND	14J Ben, 150 MEK, 10J TOL	ND
KC87-69	12/09/87	31.0 to 33.5	46J	120	<10	ND	200 MEK	ND
KC87-70	12/08/87	26.0 to 28.5	<5	<5	<10	ND	61 Tol, 730 MEK, 14J Ben	ND
KC87-70	12/08/87	31.0 to 33.5	<5	<5	<10	ND	50 Tol, 1900 MEK, 11J Ben	ND
KC87-71	11/30/87	26.0 to 28.5	<5	110	<10	190	ND	ND
KC87-71	11/30/87	31.0 to 33.5	<5	110	<10	ND	ND	ND
KC87-71	11/30/87	36.0 to 38.5	300	61	<10	ND	ND	ND
KC87-72	11/19/87	25.0 to 26.5	<5	<5	<10	ND	1.5 BHC-beta	ND
KC87-72	11/19/87	30.0 to 31.5	<5	<5	<10	ND	3.1 BHC-beta	ND
KC87-72	11/19/87	35.0 to 36.5	<5	<5	<10	ND	2.4 BHC-beta	ND
KC87-72	11/19/87	40.0 to 41.5	34J	<5	<10	ND	<0.6 BHC-beta	ND
KC87-73	11/17/87	9.5 to 11.0	<5	<5	<10	17J	ND	ND
KC87-73	11/17/87	19.5 to 21.0	<5	<5	<10	14J	ND	ND
KC87-74	11/23/87	6.0 to 8.5	<5	<5	<10	130	ND	37-1260
KC87-74	12/23/87	16.0 to 18.5	<5	<5	<10	12J	ND	ND
KC87-74	12/23/87	26.0 to 28.5	<5	<5	<10	270	ND	ND
KC87-74	11/23/87	36.0 to 38.5	<5	<5	<10	<5	ND	ND
KC87-74	11/23/87	41.0 to 43.5	<5	<5	<10	360	ND	ND

Table 5.51 (continued)

Location	Date sampled	Depth (ft)	TCE	DCE	CE	1,1,1-TCA	Other	PCBs
KC87-75	11/21/87	15.0 to 16.5	<5	<5	<10	<5	ND	120-1260
KC87-75	11/21/87	20.0 to 21.5	<5	<5	<10	<5	ND	ND
KC87-75	11/21/87	25.0 to 26.5	<5	<5	<10	<5	ND	67-1260
KC87-75	11/21/87	30.0 to 31.5	<5	<5	<10	<5	ND	ND
KC87-76	12/02/87	26.0 to 28.5	<5	<5	<10	30J	ND	ND
KC87-76	12/02/87	31.0 to 33.5	<5	<5	<10	30J	ND	ND
KC87-76	12/02/87	36.0 to 38.5	<5	<5	<10	20J	ND	ND
KC87-76	12/02/87	41.0 to 43.5	<5	<5	<10	34J	ND	ND

TCE = Trichloroethene

Tol = Toluene

DCE = trans-1,2-Dichloroethene

TCA = Trichloroethane

CE = Chloroethene

Ben = Benzene

J = Present below detection limit.

1,1,1-TCA = 1,1,1-Trichloroethane

ND = Analyzed; not detected.

MEK = 2-Butanone (methyl ethyl ketone)

Reference: DOE 1989b.

Table 5.52

Borehole ^a	Depth (ft) ^a	Analytes		Field	
		(ppm levels)		(ppm levels)	
		1,2-DCE (total)	TCE	PID measurements	Comments
02	10		0.50	38	b
02	18	1.07	3.76	23	
02	34	0.92	1.00	10	
02	36	0.90		6.5	
03	14		1.23	11	
03	16		0.61	90	c
03	21	0.99	3.11	30	
03	27	1.03		20	
03	34	0.50		60	
03	37	1.02	1.26	9	
04	24	0.52		10	
04	37	0.51	1.10	110	
06	03	0.50		20	
06	22	0.50	0.50	30	
06	26	0.50	0.50	25	
06	31	0.50	0.50	7	
07	05	2.04		70	
07	06	7.00		190	
07	14		78.88	320	

Table 5.52 (continued)

Borehole ^a	Depth (ft) ^a	Analytes		Field	
		(ppm levels)		(ppm levels)	
		1,2-DCE (total)	TCE	PID measurements	Comments
07	20		112.55	360	
07	23		250.88	360	
07	28		29.65	330	
07	34		944.52	220	
07	36		301.48	280	
08	25	0.80		0.5	
08	27	1.91	0.50	5	
08	33	1.00	0.69	60	
08	35	0.91	0.50	15	
08	37	0.91	0.99	5	
09	37		0.62	10	
10	27	1.59	2.43	80	
10	34	0.78	0.77	75	
10	37	0.80	1.00	30	

^a Only those sample results with values equal to or greater than the reported detection limits are shown.

^b This sample reportedly contained 0.79 ppm of 1,1,1-TCA.

^c This sample reportedly contained 2.35 ppm of acetone.

Table 5.53

Location	Depth (ft)	PCBs (total) (ppm)	THC (ppm)	VOAs (ppm)						
				Carbon tetra- chloride	Ethyl benzene	Methylene chloride	Tetra- chloro- ethene	Toluene	1,1,1- Trichloro- ethane	Tri- chloro- ethene (TCE)
BH01	8 to 10	0.87	1300				3.3			
	10 to 12	0.66	2900			0.077	0.73			0.093
	12 to 14	3.4	2900	0.028	0.240	0.043	7.2	0.570	0.330	12.0
	14 to 16	3.6	2700				9.9		9.7	230.0
	16 to 18	2.2	<100*				9.7		2.3	75.0
	18 to 22	0.34	320				1.8			29.0
	22 to 26	0.20	430			0.079	1.1			3.0
	26 to 30	0.26	330							
	30 to 34		220		0.005		0.005			0.034
	34 to 38		220							0.009
	38 to 41	1.9	960				1.2			
	7 to 9	1.0	3800	NR	NR	NR	NR	NR	NR	NR
	9 to 11	0.88	3900			0.006				0.017
BH02	11 to 13	0.47	4900			0.012				0.009
	13 to 15	2.6	390*			1.4*				0.88*
	15 to 17	1.2	2400		0.013		0.005			0.026
	17 to 19	0.16								
	19 to 23	0.07				0.012				0.054
	23 to 25		170			0.011				

* Concentrations from this interval were taken from the secondary laboratory replicate sample.

NR = These analyses were not run; field error.

Metals were analysed on two samples but results were not significant.

Table 5.54

Inorganic Analysis		Analyte (ppm levels)			
Borehole	Depth (ft)	Cadmium	Selenium	Silver	Thallium
				Action Limits (ppm)	
		1.5	0.1	0.1	1.5
01	03	1.60	0.11	0.48	
01	06		0.14	0.39	
01	09		0.11	0.36	
02	03	1.54		0.59	
03	03			0.41	
03	06	1.52	0.16	0.46	
03	09	1.73		0.42	
04	03		0.10	0.45	
04	06	1.76	0.10	0.51	
04	09			0.41	
05	03	1.59		0.36	
05	06	1.90		0.49	
05	09	1.50		0.46	
06	03		0.35	0.32	
06	06	1.76		0.59	
06	09	1.71		0.46	
07	03			0.27	
07	06			0.35	
07	09			0.37	
08	03		0.11	0.25	
08	06			0.34	
08	09			0.28	
09	03		0.25	0.30	
09	06			0.40	

Table 5.54 (continued)

Inorganic Analysis		Analyte (ppm levels)			
Borehole	Depth (ft)	Cadmium	Selenium	Silver	Thallium
		Threshold values			
09	09			0.40	
10A	03	3.05		0.52	4.7
10A	06	3.14		0.50	4.8
10A	09	3.05		0.49	3.8
11	03			0.35	
11	06			0.36	
11	09			0.29	
12	03			0.30	
12	06			0.38	
12	09			0.38	

Organic Analysis		Analyte (ppm levels)			
Borehole	Depth (ft)	PCBs (total)	TPH	VOAs	
				Acetone	Tetrachloroethene
02	03	N/A	17	3.78	
03 ^R	03 ^R	N/A	16		
05	03	N/A		2.70	0.936

R - Sample is replicate.

Table 5.55

Borehole number	Depth (ft)	Concentration ($\mu\text{g/g}$)					
		TCE	trans-1,2-DCE	1,1,2,2-Tetra- chloroethane	Tetrachloro- ethylene	Benzene	Methylene chloride
BL85-01	4.5 to 6	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
	9.5 to 11	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
	14.5 to 16	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
	19.5 to 21	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
BL85-02	4.5 to 6	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
	9.5 to 11	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
	14.5 to 16	<0.3	<0.3	0.48	0.49	<0.5	<1.8
	19.5 to 21	<0.3	<0.3	<0.3	<0.3	<0.5	2.8
BL85-03	4.5 to 6	<0.3	<0.3	<0.3	<0.3	0.07	0.4
	9.5 to 11	<0.3	<0.3	<0.3	<0.3	<0.5	0.4
	14.5 to 16	<0.3	<0.3	<0.3	<0.3	<0.5	0.1
	19.5 to 21	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8
BL85-04	4.5 to 6	<0.3	<0.3	<0.3	<0.3	<0.5	<0.3
	9.5 to 11	<0.3	<0.3	<0.3	<0.3	<0.5	<0.3
	14.5 to 16	<0.3	<0.3	<0.3	<0.3	<0.5	<0.3
	19.5 to 21	<0.3	<0.3	<0.3	<0.3	<0.5	<1.8

Reference: Fleischhauer, Sturm, and Sewell 1987.

Table 5.56

Borehole number	Depth (in.)	Concentration ($\mu\text{g/g}$)						
		Cd	Cu	Cr	As	Ni	Mn	Pb
BL85 - 01	6 to 18	<1.0	15	38	12	35	1210	<20
BL85 - 02	30 to 48	1.8	28	88	23	54	440	29
BL85 - 03	18 to 36	<1.0	20	28	<10	58	430	24
BL85 - 04	18 to 36	2.2	20	43	10	31	620	26
								70

Reference: Fleischhauer, Sturm, and Sewell 1987.

Table 5.57

Sample Number	Location	Depth, ft	Date Collected	As (13)*	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Hg (0.7)	Ni (42)	Zn (118)
2002	KC91-149	39.0 to 39.5	07/24/91							53.6	150
2005	KC91-150	14.5 to 15.0	07/24/91								186
2006	KC91-149	38.0 to 38.5	07/25/91		2.7						142
2009	KC91-151	21.5 to 22.0	07/26/91				37.2				
2010	KC91-151	38.5 to 39.0	07/26/91		1.7						
2014	KC91-152	41.0 to 41.5	07/28/91				43.1				
2017	KC91-153	42.0 to 42.5	07/30/91	52.4							129
2019	KC91-154	36.0 to 36.5	07/31/91	48.9							
2021	KC91-155	40.0 to 40.5	08/01/91	13.9							154
2041	BH91-03	40.0 to 40.5	08/07/91	19.2						42.7	140
2073	BH91-07	37.5 to 38.0	08/09/91		2.7						
2077	KC91-156	13.5 to 14.0	08/10/91	26.7							
2079	KC91-156	38.0 to 38.5	08/10/91	27.9			113			49.5	284

Table 5.57 (continued)

Sample Number	Location	Depth, ft	Date Collected	As (13)*	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Hg (0.7)	Ni (42)	Zn (118)
2081	KC91-157	13.0 to 13.5	08/11/91				36.2				
2083	KC91-157	37.0 to 37.5	08/11/91				79.0				
2085	KC91-158	14.0 to 14.5	08/12/91				36.2				
2087	KC91-158	39.5 to 40.0	08/12/91				134				164
2091	KC91-159	38.5 to 40.0	08/13/91	28.6	2.2					52.6	137
2107	BH91-08	39.0 to 39.5	08/20/91		2.2						
2124	BH91-11	39.5 to 40.0	08/21/91	13.0			46.9				
2132	BH91-12	36.0 to 36.5	08/22/91				42.6				146
2142	KC91-162	37.5 to 38.0	08/23/91				98.4				206
2153	KC91-163	39.5 to 40.0	08/24/91							43.7	
2177	BH92-01	13.5 to 14.0	03/25/92		1.6						
2186	BH92-02	25.5 to 26.0	03/26/92	20.8	1.8						
2188	BH92-02	40.0 to 40.5	03/26/92		2.0						

Table 5.57 (continued)

Sample Number	Location	Depth, ft	Date Collected	As (13) ^a	Cd (1.5)	Cr (120)	Cu (36)	Pb (38)	Hg (0.7)	Ni (42)	Zn (118)
2223	BH92-06	41.0 to 41.5	03/31/92		2.4						
2244	TW92-01	43.5 to 44.0	06/10/92	14.1			37.4				290
2250	TW92-02	43.5 to 44.0	06/10/92	24.4			48.8				332
2257	KC92-187	40.5 to 41.0	06/11/92					113			
2314	BH92-12	37.5 to 38.0	06/17/92	14.2							
2326	Test pit #3	2.5	03/18/93				157	81.0			155
2330	Test pit #4	2.5	03/18/93				136			206	133
2377	BH93-05	38.5 to 39.0	03/21/93	14.8							
2677	BH93-04	37.5 to 38.0	03/20/93		3.3						

^a Values in parentheses below the elements are soil-contamination thresholds.

Table 5.58

(ND=Not Detected; NA=Not Analyzed)

	Depth:	2 Feet ^{b,c}	4 Feet ^c	20 Feet ^c	22 Feet ^d
Matrix^a: (_g/kg): Soil / (_g/L): Water					
TCLP Leachate					
Mercury (ug/L)	NA ^e	ND	NA ^e	ND	
Barium (ug/L)	NA ^e	1090	NA ^e	2310	
Cadmium (ug/L)	NA ^e	ND	NA ^e	5.72	
Silver (ug/L)	NA ^e	ND	NA ^e	ND	
TPH Gasoline Range (mg/kg)	ND	NA ^e	NA ^e	NA ^e	
PCB (Arochlor 1242) (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	480;1.3	ND	
PCB (Arochlor 1248) (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	ND;ND	ND	
PCB (Arochlor 1260) (ug/kg);(ug/L)	ND;NA ^e	260;NA ^e	1400;1.9	ND	
Diesel Fuel (mg/kg)	ND	ND	NA ^e	ND	
Motor Oil (mg/kg)	ND	ND	NA ^e	510	
Volatile Organics					
Vinyl Chloride (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	13;350	230;NA ^e	
Methylene Chloride (ug/kg);(ug/L)	ND;NA ^e	6.6;NA ^e	5.8;ND	ND;NA ^e	
1,1-Dichloroethene (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	ND;8.0	10;NA ^e	
Tetrachloroethene (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	5.2;13	8.5;NA ^e	
Toluene (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	5.0;23	5.8;NA ^e	
Ethylbenzene (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	ND;ND	ND;NA ^e	
Xylene (Total) (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	12;12	8.5;NA ^e	
1,2-Dichloroethene (Total) (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	59;810	1100;NA ^e	
Freon 113 (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	24;ND	ND;NA ^e	
Acetone (ug/kg);(ug/L)	ND;NA ^e	ND;NA ^e	ND;ND	24;NA ^e	
1,4-Dichlorobenzene (ug/kg);(ug/L)	ND	ND	5.2;ND	ND;NA ^e	
Semivolatile Organics					
Phenanthrene (ug/kg)	NA ^e	ND	350	NA ^e	
Anthracene (ug/kg)	NA ^e	ND	ND	NA ^e	
Fluoranthene (ug/kg)	NA ^e	370	370	NA ^e	
Pyrene (ug/kg)	NA ^e	330	420	NA ^e	
Benzo(a)anthracene (ug/kg)	NA ^e	ND	ND	NA ^e	
Chrysene (ug/kg)	NA ^e	ND	ND	NA ^e	
Benzo(a)pyrene (ug/kg)	NA ^e	ND	ND	NA ^e	
Indeno(1,2,3-cd)pyrene (ug/kg)	NA ^e	ND	ND	NA ^e	
Benzo(g,h,i)perylene (ug/kg)	NA ^e	ND	ND	NA ^e	

^a The sample matrix, soil or water, is indicated by the units in parentheses following the named chemical. If both soil and water samples were analyzed, the data is separated by a semicolon.

^b Samples collected to characterize road bed material immediately beneath concrete pavement (water matrix not applicable).

^c Sample collected within Zone A at the depth indicated in the column heading (Zones A & B contiguous within sump walls).

^d Sample collected from well 209 boring at 22' depth (outside the sump near Zone C).

^e This analysis was deemed unnecessary based on site knowledge or inadvertently omitted from the laboratory request. Resampling was unnecessary in light of the balance of the data and the ongoing monitoring well sampling.

Table 5.59
Former Fuels Test Lab
(BD 50) GeoProbe Soil Sampling

BH1	Grassy Area west of gated, locked BD 50 storage area	5	05/16/2001	26	
		10			
		15			
		20			
		26			
BH2	Asphalt just south of grassy area, west of gated, locked BD 50 storage area	5	05/16/2001	33.5	Sampling sleeve broken, only ~5% recovery at 20'
		10			
		15			
		20			
		33			
BH3	Northernmost hole inside BD 50 locked, gated storage area	5	05/16/2001	27	
		10			
		15			
		20			
		27			
BH4	South hole inside locked, gated BD 50 storage area	5	05/16/2001	34	Oily sand from 4-10' below ground and strong odor in dark clay immediately below sand
		10			
		15			
		20			
		34			
BH5	South end of BD 50 parking area	5	05/17/2001	34	Oily looking sand from 4-4.5' below ground. 5' sample (clay) had strong odor; 10' sample (clay) had slight odor
		10			
		15			
		20			
		34			
		water			
BH6	15' southeast of BH4	5	05/17/2001	12	Oily looking sand from 4.5-5' below ground; strong odor from dark clay immediately below sand; 0% recovery from 7-11'; hit obstruction at 12'
		water			
BH7	15' north of BH4	5	05/17/2001	10	Oily sand from 4.7-5' below ground; strong odor from dark clay below sand
		10			
BH8	North side of GSA parking lot by day care center	5	05/17/2001	27	
		10			
		15			
		20			
		27			

Table 5.60
SOIL SAMPLE ANALYTICAL RESULTS
GSA - TCE, Building 50

Sample ID. Number	Date Sampled	Laboratory Analysis ¹				
		Vinyl Chloride	trans-1,2- Dichloroethene	CIS-1,2- Dichloroethene	Trichloroethene	Toluene
P1 11'-14'	1/25/02	ND ²	ND	ND	0.060	ND
P1 20'-22'	1/25/02	ND	ND	ND	0.393	ND
P2 20'-24'	1/25/02	0.0152	ND	ND	0.0436	ND
P2 32'-35'	1/25/02	ND	ND	ND	ND	ND
P3 10'-15'	1/25/02	ND	ND	ND	0.264	ND
P3 30'-35'	1/25/02	ND	0.0018	ND	ND	ND
P4 10'-15'	1/25/02	ND	ND	ND	1.102	ND
P4 30'-33'	1/25/02	ND	0.0038	ND	1.544	ND
P5 20'-25'	1/25/02	ND	ND	ND	0.139	ND
P6 10'-15'	1/25/02	ND	ND	ND	ND	ND
P6 20'-25'	1/25/02	ND	ND	ND	2.031	ND
P7 15'-20'	1/25/02	ND	ND	ND	0.0648	ND
P7 25'-30'	1/25/02	ND	ND	ND	0.137	ND
P8 20'-25'	1/25/02	ND	ND	ND	0.0917	ND
P9 20'-25'	1/25/02	ND	ND	ND	1.260	ND
MW3 20'-25'	2/12/02	0.0124	ND	0.1402	0.013	ND
MW3 30'-35'	2/12/02	0.0018	0.0028	0.0746	0.119	0.0010
MDNR ³		0.02	1.0	0.5	0.1	3.7

Notes:

¹ All concentrations are (ppm) parts per million (mg/L)

² ND - Where noted, indicates none detected above method detection limit

³ MDNR Allowable Levels based on non potable water

* Shaded areas = Analytes above cleanup levels

Table 5.61

**SOIL ANALYTICAL DATA
BUILDING #50 TCE INVESTIGATION
BANNISTER COMPLEX
KANSAS CITY, JACKSON COUNTY, MISSOURI**

October 24, 2002

	Sample Date	Depth	TCE
STARC			40
STARC Leaching to Groundwater			0.1
P-1 (0 to 5 ft.)	9/30/02	0 to 5 feet (ft.)	BRL (0.00200)
P-2 (0 to 5 ft.)	9/30/02	0 to 5 ft.	0.00510
P-3 (0 to 5 ft.)	9/30/02	0 to 5 ft.	BRL (0.00200)
P-4 (0 to 5 ft.)	9/30/02	0 to 5 ft.	BRL (0.00200)
P-5 (0 to 5 ft.)	9/30/02	0 to 5 ft.	BRL (0.00200)
P-5 (20 to 25 ft.)	9/30/02	20 to 25 ft.	0.0277
P-6 (5 to 10 ft.)	10/1/02	5 to 10 ft.	0.00740
P-6 (20 to 25 ft.)	10/1/02	20 to 25 ft.	0.0168
P-7 (0 to 5 ft.)	10/1/02	0 to 5 ft.	BRL (0.00200)
P-7 (15 to 20 ft.)	10/1/02	15 to 20 ft.	0.0261
P-8 (5 to 10 ft.)	10/1/02	5 to 10 ft.	BRL (0.00200)
P-8 (20 to 25 ft.)	10/1/02	20 to 25 ft.	BRL (0.00200)
P-9 (10 to 15 ft.)	10/1/02	10 to 15 ft.	0.0410
P-9 (15 to 20 ft.)	10/1/02	15 to 20 ft.	BRL (0.00200)
P-10 (0 to 5 ft.)	10/1/02	0 to 5 ft.	BRL (0.00200)
P-10 (20 to 25 ft.)	10/1/02	20 to 25 ft.	0.00350
P-11 (0 to 5 ft.)	10/1/02	0 to 5 ft.	BRL (0.00200)
P-11 (20 to 25 ft.)	10/1/02	20 to 25 ft.	BRL (0.00200)
P-12 (0 to 5 ft.)	10/1/02	0 to 5 ft.	BRL (0.00200)
P-12 (20 to 25 ft.)	10/1/02	20 to 25 ft.	BRL (0.00200)
P-13 (0 to 5 ft.)	10/1/02	0 to 5 ft.	BRL (0.00200)
P-13 (20 to 25 ft.)	10/1/02	20 to 25 ft.	BRL (0.00200)

Source: TestAmerica, Inc.; Missouri Department of Natural Resources (MDNR) Cleanup Levels For Missouri (CALM) Soil Target Concentrations (STARC), Scenario A, dated September 1, 2001.

Notes:

- 1) All soil concentrations reported in milligrams/kilogram (mg/kg) (same as parts per million (ppm)).
- 2) Below reporting limits (BRLs).
- 3) Shaded cells indicate levels above MDNR CALM STARC Leaching to Groundwater.

Table 5.62

**GROUNDWATER ANALYTICAL DATA
BUILDING #50 TCE INVESTIGATION
BANNISTER COMPLEX
KANSAS CITY, JACKSON COUNTY, MISSOURI**

October 24, 2002

	Sample Date	Depth to Groundwater	TCE
GTARC			0.005
P1 (GW)	10/1/02	8.24 feet below grade	BRL (0.00200)
P2 (GW)	10/1/02	8.68 feet below grade	2.17
P3 (GW)	10/1/02	9.26 feet below grade	0.00290
P4 (GW)	10/1/02	3.05 feet below grade	BRL (0.00200)

Source: TestAmerica, Inc.; Missouri Department of Natural Resources (MDNR) Cleanup Levels For Missouri (CALM) Groundwater Target Concentrations (GTARC), dated September 1, 2001.

Notes:

- 1) All groundwater concentrations reported in milligrams/liter (mg/l) (same as parts per million (ppm)).
- 2) Below reporting limit (BRL).
- 3) Shaded cells indicate levels above MDNR CALM GTARC.

Table 5.63

SAMPLE NUMBER:	SP1-3	SP1-21	SP2-3	SP2-23	SP3-3	SP3-25	SP4-3
SAMPLE DATE:	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004
LAB ID NUMBER:	228943-10	228943-11	228943-13	228943-14	228943-16	228943-17	228943-20
PARAMETER	UNITS						
VOLATILE ORGANICS (8260B)							
Acetone	mg/kg	ND(0.0058)	0.035	ND(0.0058)	0.044	0.016	0.054
Methylene chloride	mg/kg	0.013	0.017	0.012	0.019	0.016	0.012
Trichloroethene	mg/kg	ND(0.0058)	ND(0.0062)	ND(0.0058)	ND(0.0062)	ND(0.0061)	0.0083
							ND(0.0062)
SAMPLE NUMBER:	SP4A-21	SP5-3	SP5-3DUP	SP5-14	SP5-14DUP	SP6-3	SP6-26
SAMPLE DATE:	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004
LAB ID NUMBER:	228943-21	228943-22	228943-24	228943-25	228943-26	228943-4	228943-5
PARAMETER	UNITS						
VOLATILE ORGANICS (8260B)							
Acetone	mg/kg	0.052	0.14	0.048	0.045	0.081	0.079
Methylene chloride	mg/kg	0.016	0.016	0.013	0.014	0.019	0.020
Trichloroethene	mg/kg	ND(0.0060)	ND(0.0059)	ND(0.0060)	0.030	0.059	ND(0.0061)
							0.053
SAMPLE NUMBER:	SP7-3	SP7-25	SP8-3	SP8-25	STARC LEACHING TO GROUNDWATER¹		STARC SCENARIO A ¹
SAMPLE DATE:	7/28/2004	7/28/2004	7/28/2004	7/28/2004			
LAB ID NUMBER:	228943-1	228943-2	228943-7	228943-8			
PARAMETER	UNITS						
VOLATILE ORGANICS (8260B)							
Acetone	mg/kg	0.12	0.10	0.011	0.052	NT	2700 mg/kg
Methylene chloride	mg/kg	0.020	0.018	0.019	0.017	0.02 mg/kg	51 mg/kg
Trichloroethene	mg/kg	ND(0.0062)	ND(0.0063)	ND(0.0061)	ND(0.0066)	0.1 mg/kg	40 mg/kg

¹From "Table B1. Soil and Groundwater Target Concentrations (STARC and GTARC)" in the revision of September 1998 revision of Cleanup Levels for Missouri (CALM) published by MDNR.

Bold indicates reported concentration meets or exceeds leaching to groundwater screening levels.

mg/kg = milligrams per kilogram

ND(#) = Not Detected equal to or above the quantitative limit within parentheses

NT = No Target Concentration

Table 5.64

SAMPLE NUMBER:	SP1	SP2	SP2-DUP	SP3	SP4A	SP5	SP6
SAMPLE DATE:	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004	7/28/2004
LAB ID NUMBER:	228943-12	228943-15	228943-19	228943-18	228943-23	228943-27	228943-6
PARAMETER	UNITS						
VOLATILE ORGANICS (8260B)							
cis-1,2-Dichloroethene	mg/L	ND(0.0010)	ND(0.0010)	ND(0.0010)	0.073	0.11	0.018
Trichloroethene	mg/L	ND(0.0010)	ND(0.0010)	ND(0.0010)	19	3.6	0.22
Ethylbenzene	mg/L	ND(0.0010)	ND(0.0010)	ND(0.0010)	ND(0.10)	ND(0.020)	3.5
m&p Xylenes	mg/L	ND(0.0020)	ND(0.0020)	ND(0.0020)	ND(0.20)	0.013	ND(0.0020)
Hexachlorobutadiene	mg/L	0.0031	ND(0.0010)	ND(0.0010)	ND(0.10)	ND(0.020)	ND(0.040)
							ND(0.020)
SAMPLE NUMBER:	SP7	SP8	GROUNDWATER TARGET CONCENTRATIONS¹				
SAMPLE DATE:	7/28/2004	7/28/2004					
LAB ID NUMBER:	228943-3	228943-9					
PARAMETER	UNITS						
VOLATILE ORGANICS (8260B)							
cis-1,2-Dichloroethene	mg/L	0.014	ND(0.0010)	0.07 mg/L			
Trichloroethene	mg/L	0.42	0.0050	0.005 mg/L			
Ethylbenzene	mg/L	ND(0.0020)	0.0052	0.7 mg/L			
m&p Xylenes	mg/L	ND(0.0040)	0.00066	0.32 mg/L			
Hexachlorobutadiene	mg/L	ND(0.0020)	0.0023	0.001 mg/L			

¹From "Table B1. Soil and Groundwater Target Concentrations (STARC and GTARC)" in the revision of September 1998 revision of Cleanup Levels for Missouri (CALM) published by MDNR.

Bold indicates reported concentration meets or exceeds groundwater screening levels.

mg/L = milligrams per liter

ND(#) = Not Detected equal to or above the quantitative limit within parentheses

Table 5.65

Analyte	RR Tracks Primary	RR Tracks Duplicate	TL Surface Soil (Type 1)	DTL
Aroclor 1260	1.070	0.597	NA	1.11
Arsenic	4.8	5.4	3.89	NA
Barium	414	134	15,000	NA
Cadmium	5.8	2.1	16.8	NA
Chromium	83.4	98.9	74,600	NA
Lead	123	120	260	
TPH-DRO	1,010	1,490	NA	125,000
TPH-ORO	7,140	11,400	NA	124,000

NA – Not applicable

The USACE conducted a study of soil background concentrations in the Kansas City area documented in the *Blue Valley Industrial Corridor Soils Background Study Report, Brownfields Showcase Project*, February 2003. That report documented soil arsenic concentrations ranging from 0.647 to 18 mg/kg.

Table 5.66

T a b l e 4 . D e t e c t e d C o n c e n t r a t i o n s i n S o i l i n t h e V i c i n i t y o f B u i l d i n g 4

Analyte	Concentrations in mg/kg			
	SP18	SP19	SP20A	DTL
Arsenic	5.9	3.4	4.5	3.89
Barium	220	212	120	2,040
Cadmium	1.1	1.1	0.65	9.31

Analyte	Concentrations in mg/kg			
Chromium	23.2	23.0	21.4	74,600
Lead	11.4	12.3	6.3	3.74
Selenium	<1.6	<1.6	<1.6	6.27
Benzo(a)anthracene	0.0062	<0.0042	<0.0042	6.12
Benzo(b)fluoranthene	0.0132	<0.0042	<0.0042	6.19
Benzo(a)pyrene	0.005	<0.0042	<0.0042	0.620
Benzo(g,h,i)perylene	0.0044	<0.0042	<0.0042	1,720
Chrysene	0.0081	<0.0042	<0.0042	599
Fluoranthene	0.0233	<0.0042	<0.0042	2,280
Phenanthrene	0.0075	<0.0042	<0.0042	158
Pyrene	0.0178	<0.0042	<0.0042	1,500
Acetone	0.0287	0.0382	0.0208	4.2

Table 5.67

Analyte	Concentrations in µg/L			
Analyte	SP18	SP19	SP20A	DTL
Arsenic	1,090	695	493	10.0
Barium	3,960	11,400	5,480	2,000
Cadmium	413	251	146	5.0
Chromium	399	658	438	100
Lead	2,670	1,550	1,350	15.0
Selenium	192	192	16.0	50.0
Benzo(a)anthracene	<1.0	<1.0	1.1	0.103
Benzo(b)fluoranthene	<1.0	<1.0	1.7	0.0627
Chrysene	<1.0	<1.0	1.1	10.3
Fluoranthene	<1.0	1.1	3.6	164
Phenanthrene	<1.0	<1.0	3.2	75.0
Pyrene	<1.0	<1.0	2.3	96.1

Table 5.68

<u>Analysis (ppm)</u>					
		<u>Organics</u>		<u>Inorganics</u>	
Sample ID	Location	Depth (ft)	PCBs (total)	TPHC	Lead (Pb)
<u>Sanitary Sewer Lift Station</u>					
8037	1	0-0.5		470	
8038		0.5-1		300	
8039	2	0-0.5		320	
8040		0.5-1		520	
8041	3	0-0.5		490	39.2
8042		0.5-1		320	40.9
8043	4	0-0.5	0.06	1200	
8044		0.5-1		1800	

Table 5.69

Table 5.69 Underground Storage Tank History / Status

Tank #	Location	Installed	Capacity	Contents	Type	disposition	closure documentation	sample results / notes	contaminated soil removed
1	West Boiler House	1980	1,000	diesel	steel	removed 8/25/90	6/3/92 UST Closure Report to MDNR	tph 95 ppm @ 7.5' and 42 ppm @ 15'	see tank 23 / 24 note
2	Emergency Relocation Center	1943	2,000	water	steel	removed 8/21/86	10/29/86 letter DOE to MDNR		
3	East Power House	1962	500	diesel	steel	removed 9/26/89	6/3/92 UST Closure Report to MDNR	TPH 32 ppm @ 7.5' and 38 ppm @ 12.5'	see tank 32 / 33 note
4	East Power House	1973	800	Oil & water separator	concrete	abandoned in place 9/18/90	6/3/92 UST Closure Report to MDNR		
5	Building 75	1974	940	diesel	steel	removed 9/12/05 per MRBCA	9/26/05 UST Closure Report to MDNR / 6/31/06 NFA letter from MDNR	samples from excavation - 2 samples nd for TPH, samples #3 and #4 detected 81 and 6.9 ppm TPH, respectively	56.11 tons of material removed.
6	Building 15	1943	1,300	waste oil	concrete	filled and sealed with grout 9/18/90	6/3/92 UST Closure Report to MDNR	concrete tank in basement of Bldg 15	
7	Building 15	1982	5,000	acetone	steel	removed 4/12/90	6/3/92 UST Closure Report to MDNR		
8	Building 15	1982	5,000	DMF	steel	removed 4/20/90	6/3/92 UST Closure Report to MDNR	soil samples outside of the area excavated detectd <50 ppm TPH	1,640 tons of material removed
9	Building 15	1982	5,000	rinse water	steel	removed 4/23/90	6/3/92 UST Closure Report to MDNR		
10	Tank Farm	1943	10,000	waste oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
11	Tank Farm	1943	10,000	coolants	steel	removed 10 - 12/87	Tank Farm Closure Report	Contaminated soil down to ~15' bgs removed. Below ~15' bgs is saturated and is considered groundwater	
12	Tank Farm	1943	10,000	waste solvents	steel	removed 10 - 12/87	Tank Farm Closure Report	contamination and is addressed by the Groundwater Pump & Treat system	
13	Tank Farm	1943	10,000	waste solvents	steel	removed 10 - 12/87	Tank Farm Closure Report		
14	Tank Farm	1943	20,000	diesel	steel	removed 10 - 12/87	Tank Farm Closure Report		
15	Tank Farm	1943	20,000	diesel	steel	removed 10 - 12/87	Tank Farm Closure Report		
16	Plating Building	1983	6,000	conc spent acid	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
17	Plating Building	1983	2,500	dilute plating rinse water	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
18	Plating Building	1983	3,000	dilute plating rinse water	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
19	Plating Building	1983	1,000	dilute plating rinse water	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
20	Plating Building	1983	3,000	dilute plating rinse water	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
21	Plating Building	1983	2,500	dilute plating rinse water	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
22	Plating Building	1983	6,000	dilute plating rinse water	concrete	in use concrete vault with tank	n/a process wastewater sumps	n/a	n/a
23	West Boiler House	1943	250,000	#6 fuel oil	concrete	converted to containment 1986	6/3/92 UST Closure Report to MDNR	TPH contaminated soil remains beneath concrete tank bottom which has been converted to containment for new steel tanks	8,894 tons of contaminated material removed.
24	West Boiler House	1943	250,000	#6 fuel oil	concrete	converted to containment 1986	6/3/92 UST Closure Report to MDNR		
25	West Boiler House	1943	10,000	waste oil	concrete	removed			
26	West Boiler House	1943	1,000	waste oil		removed			
27	West Boiler House	1943	750	waste oil	concrete	11/16/89 cleaned lined as tile sump	6/3/92 UST Closure Report to MDNR	TPH 146 ppm @ 2.5' and 1440 ppm @ 3.2'	
28	West Boiler House	1943	750	waste oil	concrete	filled and sealed with grout	6/3/92 UST Closure Report to MDNR	TPH 32 ppm @ 2.0'	
29	BB-37 outside	1970	1,000	therminol	concrete	removed 1985	KCP 1977-1987 A Chronology of PCB Projects at the Kansas City Plant. Environmental Protection Department notebook. Allied-Signal, Inc.	4 samples collected after contaminated soil removed - 3 nd for PCBs and 1 sampled detyected 2.5 mg/kg.	Volume undetermined in records available. Reference Closure Documentation.
30	BB-36 outside	1970	10,000	therminol		removed 1985			
31	Emergency Relocation Center	1943	1,000	diesel	steel	removed 9/9/86	10/29/86 letter DOE to MDNR		
32	East Power House	1959	15,000	#6 fuel oil	steel	removed 9/26/89	6/3/92 UST Closure Report to MDNR	Areas of soil contamination > 100 ppm TPH removed.	1,216 tons of material removed
33	East Power House	1959	15,000	#6 fuel oil	steel	removed 9/26/89	6/3/92 UST Closure Report to MDNR		
34	Building 57	1943	26,000	waste oil	concrete	removed 9/26/95	PB Waste Oil Tank IM Report	Other PCB contaminated soil remains in the area	1,100 tons of PCB contaminated material removed
35	Test Cells	1943	10,000	waste oil	steel	removed 7 - 9/98	4/24/94 letter from DOE to MDNR see also Test Cell Tank IM Report	TPH was not detected in post excavation samples (reference Table 2.6.5B of the IM Report). <100 ppb total VOCs were	484 tons of RCRA regulated soil and 10 tons of non hazardous wastes were removed
36	Test Cells	1943	10,000	waste oil	steel	removed 7 - 9/98	4/24/94 letter from DOE to MDNR see also Test Cell Tank IM Report		

Table 5.69 Underground Storage Tank History / Status

Tank #	Location	Installed	Capacity	Contents	Type	disposition	closure documentation	sample results / notes	contaminated soil removed
37	Test Cells	1943	1,000	waste oil	steel	removed 7 - 9/98	4/24/94 letter from DOE to MDNR see also Test Cell Tank IM Report	detected in post excavation samples.	removed.
38	South Lagoon	1981	5,000	water	fiberglass	removed 9/18/86	non regulated UST		
39	South Lagoon	1981	5,000	water	fiberglass	removed 9/18/86	non regulated UST		
40	Building 46	n/a		not installed		design drawing shows test cells not completed no evidence of install	n/a	n/a	n/a
41	Building 46	n/a		not installed		design drawing shows test cells not completed no evidence of install	n/a	n/a	n/a
42	north of AA-37		500	gasoline	steel	removed 1985	Removed with Tanks 29 and 30.	see Tank 29 and 30 notes	see Tank 29 and 30
43	Tank Farm	1943	10,800	waste kerosene	steel	removed 10 - 12/87	Tank Farm Closure Report		
44	Tank Farm	1943	9,000	waste kerosene	steel	removed 10 - 12/87	Tank Farm Closure Report		
45	Tank Farm	1943	5,000	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
46	Tank Farm	1943	11,400	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
47	Tank Farm	1943	11,400	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
48	Tank Farm	1943	11,400	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
49	Tank Farm	1943	12,500	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
50	Tank Farm	1943	15,600	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
51	Tank Farm	1943	12,500	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
52	Tank Farm	1943	12,500	#6 fuel oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
53	Tank Farm	1943	11,400	parafin	steel	removed 10 - 12/87	Tank Farm Closure Report		
54	Tank Farm	1943	12,500	hydraulic oil	steel	removed 10 - 12/87	Tank Farm Closure Report		
55	Tank Farm	1943	20,700	gasoline	concrete	removed 10 - 12/87	Tank Farm Closure Report		
56	Tank Farm	1943	20,700	gasoline	concrete	removed 10 - 12/87	Tank Farm Closure Report		
57	Tank Farm	1943	20,700	gasoline	concrete	removed 10 - 12/87	Tank Farm Closure Report		
58	Tank Farm	1943	20,700	gasoline	concrete	removed 10 - 12/87	Tank Farm Closure Report		
59	Tank Farm	1943	20,700	gasoline	concrete	removed 10 - 12/87	Tank Farm Closure Report		
60	Tank Farm	1943	20,700	gasoline	concrete	removed 10 - 12/87	Tank Farm Closure Report		
61	Tank Farm	1943	20,000	water	steel	removed 10 - 12/87	Tank Farm Closure Report		
62	Tank Farm	1943	20,000	water	steel	removed 10 - 12/87	Tank Farm Closure Report		
63	Tank Farm	1943	20,000	water	steel	removed 10 - 12/87	Tank Farm Closure Report		
64	Tank Farm	1943	20,000	water	steel	removed 10 - 12/87	Tank Farm Closure Report		
65	Test Cells W lab	1943	18,000	water	concrete	n/a	n/a process wastewater sumps	n/a	n/a
66	Test Cells - trailers	1943	1,000	kerosene	steel	filled with sand emptied prior to 1974	Test Cell Tank IM Report – sampled – no contaminants	n/a	n/a
67	FY-12	1943	1,880	waste oil	steel	geo-physical survey did not i.d.	n/a - no evidence of installation	n/a	n/a
68	FY-12	1943	2,130	waste oil	steel	geo-physical survey did not i.d.	n/a - no evidence of installation	n/a	n/a
69	FY-12	1943	2,130	waste oil	steel	geo-physical survey did not i.d.	n/a - no evidence of installation	n/a	n/a
70	NARA		1,000	gasoline	steel	closed in place	see GSA MRBCA Closure NFA letter from MDNR 9/30/08		
71	Bldg 50 (west of Bldg in yard)	1956	10,000	waste oil	steel	removed 1985	6/3/2002 letter from MDNR	GSA unable to i.d. historic information	GSA unable to i.d. historic information
72	Bldg 50 (west of Bldg in yard)	1956	10,000	waste oil	steel	removed 1985	6/3/2002 letter from MDNR	GSA unable to i.d. historic information	GSA unable to i.d. historic information
73	Bldg 50 (west of Bldg in yard)	1956	10,000	waste oil	steel	removed 1985	6/3/2002 letter from MDNR	GSA unable to i.d. historic information	GSA unable to i.d. historic information
74	Bldg 50 (west of Bldg in yard)	1956	10,000	waste oil	steel	removed 1985	6/3/2002 letter from MDNR	GSA unable to i.d. historic information	GSA unable to i.d. historic information
75	Bldg 50 (west of Bldg in yard)	1956	10,000	waste oil	steel	removed 1985	6/3/2002 letter from MDNR	GSA unable to i.d. historic information	GSA unable to i.d. historic information

Table 5.69 (continued)

Table 5.69 Underground Storage Tank History / Status

Tank #	Location	Installed	Capacity	Contents	Type	disposition	closure documentation	sample results / notes	contaminated soil removed
76	Bldg 50 (west of Bldg in yard)	1956	10,000	waste oil	steel	removed 1985	6/3/2002 letter from MDNR	GSA unable to i.d. historic information	GSA unable to i.d. historic information
77	Bldg 4 (east side)		8,000	gasoline	steel	closed in place 1993	No Further Action Letter 2/17/94		
78	Bldg 1 (nw corner)		3,000	diesel	steel	removed 1999	No Further Action Letter 2/24/00		
79	Bldg 7 (south side)		1,000	unknown	steel	closed in place 2000	No Further Action Letter 5/15/01		
80	Bldg 17		500	heating oil	steel	removed 1993	MDNR approved with 11/23/93 letter		
81	Bldg 41	1956	6,000	oil/water separator	steel	closed in place 2005			

Table 5.70
MAXIMUM SOIL CONTAMINANT CONCENTRATIONS AT THE SWMUs OF CONCE
(0- to 15-foot interval)

TCE Still Site (SWMU 2)		
Contaminant of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,1-DCE	0.004	1.99
1,2-DCE	2.3	8520
2-Hexanone	0.003	NA
Acetone	0.028	94700
Carbon Disulfide	0.002	4.13
Chloroethene (Vinyl Chloride)	0.007	0.568
Chloroform	0.001	31
Dichloroethane	0.002	13.8
Methylene Chloride	0.36	511
Propylcyclohexane	40	NA
TCE	2500	135
Toluene	0.18	1890000
Xylene (total)	0.57	4830

Waste Transfer Spill Area and Abandoned Sump (SWMUs 3 and 37)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,1,1-Trichloroethane	1.5	16800
1,2-DCE	12	8520
Acetone	0.053	94700
Benzene	0.007	64
Carbon Disulfide	0.01	4.13
Chloroethene (Vinyl Chloride)	0.011	0.568
Cyclohexane	2.9	NA
Dichloroethane	0.035	13.8
Ethyl Benzene	3.4	932
Methylcyclohexane	0.019	NA
Methylene Chloride	0.19	511
PCB	1.49	172
TCE	0.84	135
Tetrachloroethene	34	236
Toluene	39	1890000
TPH	680	500
Xylene (total)	19	4830

Notes: Contaminants which are shaded are those which exceeded the health-based cleanup goals in the 0- to 15-foot depth interval.

Table 5.70 (continued)

**MAXIMUM SOIL CONTAMINANT CONCENTRATIONS AT THE SWMUS OF CONCERN
(0- to 15-foot interval)**

Classified Waste Trenches (SWMU 4)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-DCE	1.3	8520
Acetone	0.028	94700
Benzene	Trace	64
Carbon Disulfide	0.001	4.13
Chlorobenzene	0.008	323
Chloroethene (Vinyl Chloride)	0.06	0.568
Methylene Chloride	0.005	511
PCB	0.075	172
TCE	0.23	135
Tetrachloroethane	Trace	254
Tetrachloroethene	Trace	236
Toluene	0.005	1890000

Plating Building Area (SWMUs 9, 10, 11, 12)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-DCE	2.11	8520
PCB	2400	172
TCE	10	135
Tetrachloroethane	0.17	254
Tetrachloroethene	51	236
TPH	4500	500

Sales Building Site (SWMU 16)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-DCE	0.095	8520
TCE	0.014	135
Toluene	0.008	1890000
Xylene (total)	0.004	4830

Notes: Contaminants which are shaded are those which exceeded the health-based cleanup goals in the 0- to 15-foot depth interval.

Table 5.70 (continued)

**MAXIMUM SOIL CONTAMINANT CONCENTRATIONS AT THE SWMUS OF CONCERN
(0- to 15-foot interval)**

Building 54 and Maintenance Vehicle Repair Shop Sump (SWMUs 17 and 36)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2 DCE	0.2	8520
2-hexanone	0.011	NA
2-Methyl-naphthalene	0.56	NA
Acenaphthene	3.9	568000
Acetone	0.11	94700
Anthracene	4.3	2840000
Benzo(a)anthracene	12	1810
Benzo(a)pyrene	16	181
Benzo(b)flouranthene	0.17	1810
Benzo(g,h,i)perylene	10	NA
Benzo(k)fluoranthene	6.5	18100
bis(2-Ethylhexyl)phthalate	0.89	18900
Chrysene	9.8	181000
Dibenz(a,h)anthracene	0.38	181
Dibenzofuran	1.7	NA
Flouranthene	0.8	379000
Fluorene	3.2	379000
Indeno(1,2,3-cd)pyrene	9.7	1810
Naphthalene	1.1	37900
Pentachlorophenol	0.31	11000
Phenanthrene	0.45	NA
Pyrene	14	284000
Tetrachloroethene	22	236
TPH	480	500

Department 26 (Inside) (SWMU 31)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,1,1-Trichloroethane	0.061	16800
1,2-DCE	0.094	8520
Acetone	0.089	94700
Benzene	0.002	64
Chloroethene (Vinyl Chloride)	0.007	0.568
Methylene Chloride	0.022	511
PCB	560	172
TCE	1.2	135
Toluene	0.001	1890000
TPH	1100	500

Notes: Contaminants which are shaded are those which exceeded the health-based cleanup goals in the 0- to 15-foot depth interval.

Table 5.70 (continued)

**MAXIMUM SOIL CONTAMINANT CONCENTRATIONS AT THE SWMUs OF CONCERN
(0- to 15-foot interval)**

Department 27 (Inside) (SWMU 32)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-Dichlorobenzene	0.13	20800
1,2-DCE	0.13	8520
Chlorobenzene	0.035	323
Chloroethene (Vinyl Chloride)	0.026	0.568
Toluene	0.015	1890000
TCE	0.2	135

Oil House (SWMU 33)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,1,1-Trichloroethane	9.7	16800
1,2-DCE	0.013	8520
Acetone	0.024	94700
Carbon Tetrachloride	0.028	22.2
Dichloroethane	0.044	13.8
Ethyl Benzene	0.024	932
Methylene Chloride	1.4	511
PCB	3.6	172
TCE	230	135
Tetrachloroethene	9.9	236
Toluene	0.57	1890000
TPH	4900	500

Department 95 (SWMU 39)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-DCE	0.047	8520
Acetone	3.78	94700
Methylene Chloride	0.043	511
Tetrachloroethene	0.936	254
TPH	17	500

Aluminum Chip Handling Facility (SWMU 40)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-DCE	0.095	8520
TCE	0.014	135
Toluene	0.008	1890000
Xylene (total)	0.004	4830

Notes: Contaminants which are shaded are those which exceeded the health-based cleanup goals in the 0- to 15-foot depth interval.

Table 5.70 (continued)

**MAXIMUM SOIL CONTAMINANT CONCENTRATIONS AT THE SWMUs OF CONCERN
(0- to 15-foot interval)**

Department 20 Degreaser Pit (SWMU 41)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,2-DCE	0.37	8520
2-Hexanone	0.003	NA
Acetone	0.028	94700
Carbon Disulfide	0.002	4.13
Chloroethene (Vinyl Chloride)	0.007	0.568
Methylene Chloride	1	511
TCE	1.1	135
Toluene	0.18	1890000

Buried Tanks at Test Cells (N/A)		
Chemicals of Concern	Maximum Concentration (mg/kg)	Health Based Cleanup Goal (mg/kg)
1,1,1 Trichloroethane	76	16800
1,2-DCE	0.083	8520
2,6-Dimethylinonone	0.01	NA
2-Hexanone	0.012	NA
2-Methyl-naphthalene	1.26	NA
Benzene	1.1	64
bis(2-Ethylhexyl)phthalate	0.89	18900
Chloroethene (Vinyl Chloride)	0.031	0.568
Methylene Chloride	0.014	511
TCE	0.44	135
Toluene	0.016	1890000
TPH	2800	500
Xylene (total)	2	4830

Notes: Contaminants which are shaded are those which exceeded the health-based cleanup goals in the 0- to 15-foot depth interval.