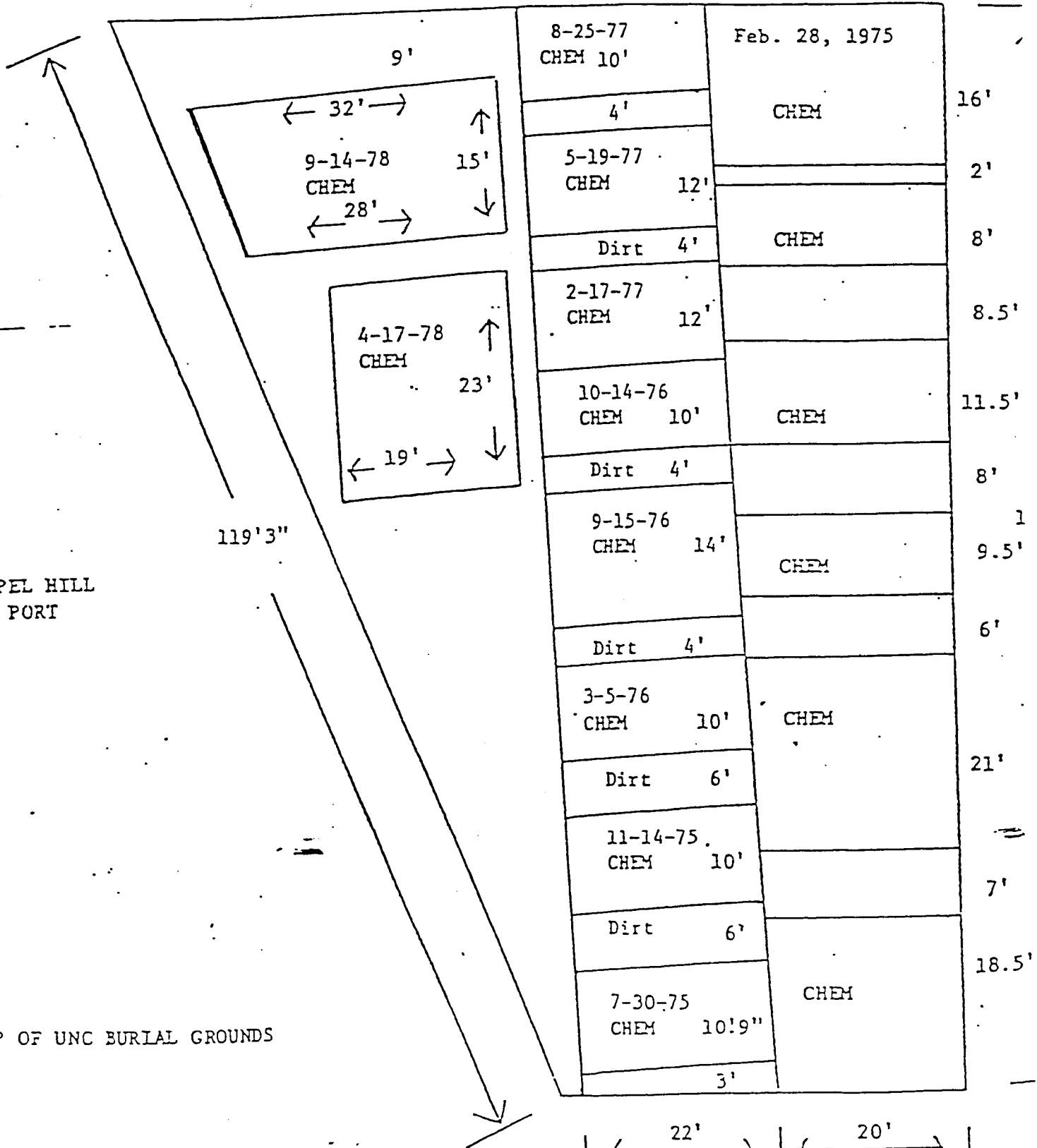


APPENDIX A

**Chemical Burial Locations
and List of Potentially Disposed Chemicals**



← 26'9" →



CHAPEL HILL AIR PORT

MAP OF UNC BURIAL GROUNDS

Scale: 1/16" = 1 ft.

← 22' → | ← 20' → |

← 44'1" →

T. C. ...

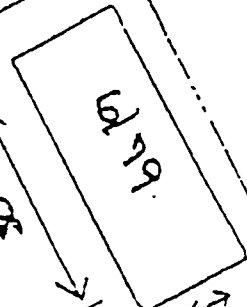
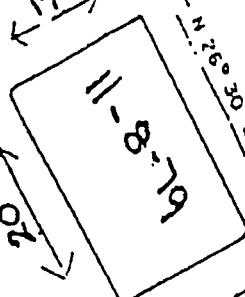
N 70° 27'
N 69° 33' 55" E.
N 61° 32' 36" E. 100.00'

EXISTING CHEMICAL V
DISPOSAL AREA

0.178 Acres

PROPOSED ADDITION TO
CHEMICAL WASTE DISPOSAL AREA

0.289 Acres



N 76° 30' 24" W. 92.65'

S 43° 09' 23" W. 230.89'
N 43° 09' 23" E. 565.81'

130.15'
N 72° 12' 27" E. 11.29'

1000'

1000'



CHEMICAL WASTES COLLECTED FROM LABORATORIES
ON CAMPUS FOR DISPOSAL

2 1 1 1979

Organic waste (unknown)
Chloride color reagent (containing mercury)

Acetic acid
Nitric acid
Sulfuric acid
Hydrochloric acid
Formaldehyde
Inorganic waste (unknown)

Acetone
Ascarite (solid)
Trimethyl chlorosilane
Potassium hydroxide

— Chloroform
Ethyl alcohol
Ether

Bromohexane
Iodine waste
Dyes

Acetic anhydride
Propionic acid
N-N-Dimethyl formamide
Butyl ether

Carbon tetrachloride
Hydrozine monohydrate
Phosphorus pentoxide (solid)
Ethyl acetate

Benzene
Xylene

Sodium chloride irrigation
Mercuric cyanide

Santovac 5 (vacuum pump fluid)
Isobutyl alcohol

Toluene
Cyclohexane

Sodium sulfate
Sodium bisulfite
Barium hydroxide
Sodium borate

Sodium bismuthate
Polyethylene glycol, 20,000

Iodomethane
Calcium chloride
E amino-n-caproic acid
Hydrozine hydrate

Mercury (atomic absorption standard) 1,000 ppm
2,4 Dichlorophenol

Silver waste
2-Propanol

Vacuum pump oil
Butanol lithium acetate

Benzaldehyde

Methanol

N-Heptane

iso-propylamine

Sodium borohydride

Oxalic acid

Ammonium hydroxide

1,2 Dichloro ethane

Ethyl hydrogen peroxide

Methyrene chloride

Phosphorus pentoxide

Mercuric nitrate

Perchloric acid 70%

Potassium cyanide

Chromic acid

Palladium

Bromine water

Pyridine

Arsenic (atomic absorption standard)
1,000 ppm

Bun (blood serum, mercury)

Hexane

Pentane

Dimethyl sulfoxide

Lithium acetate

Glycerin

Sodium dichromate

2-merpato ethanol

Silicone

Osmium tetroxide

Aniline

Picric acid

Bromobenzene

Biofluor

Hydroxide of hyamine

Choline bicarbonate

Propylene oxide

Ethylene glycol

Propane fuel cans ("empty")

1,4 Dioxane

APPENDIX B

Groundwater Analytical Data Summary



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-01 Date Sampled: 05/03/95	MW-01 07/28/95	MW-02 05/03/95	MW-02 07/28/95	MW-03 05/01/95	MW-03 07/27/95	MW-04 07/25/95
<u>Volatile Organics (ppb)</u>								
1,1,2,2-Tetrachloroethane	NS	<5000	1200	<500	<500	<5	<5	<5
1,1-Dichloroethane	700	<5000	<500	<500	<500	<5	<5	<5
1,2-Dichloroethane	0.38	<5000	2400	1600	1700	<5	<5	<5
1,2-Dichloroethane (Total)	70	<5000	<500	<500	<500	<5	<5	<5
2-Butanone	170	<10000	250J	<1000	<1000	<10	<10	<10
4-Methyl-2-pentanone	NS	<10000	380J	<1000	<1000	<10	<10	<10
Acetone	700	<10000	31000	<1000	<1000	18	<11	<10
Benzene	1	100000	79000	6800	7600	<5	<5	<5
Bromochloromethane	0.6	<5000	<500	<500	<500	<5	<5	<5
Carbon disulfide	700	<5000	<500	<500	<500	<5	<5	<5
Chlorobenzene	50	<5000	130J	<500	<500	<5	<5	<5
Chloroform	0.19	140000	130000	41000	40000	<5	<5	<5
Diethyl ether	NS	NA	240000	NA	38000	NA	2J	<10
Ethylbenzene	29	<5000	140J	<500	<500	<5	<5	<5
Methylene chloride	5	110000	100000	25000	27000	<5	<5	<5
Tetrachloroethene	0.7	<5000	<500	<500	<500	<5	<5	<5
Toluene	1000	<5000	600	<500	<500	<5	<5	<5
Trichloroethene	2.8	<5000	1700	<500	<500	<5	<5	<5
Vinyl chloride	0.015	<10000	<1000	<1000	<1000	<10	<10	<10
<u>Semi-Volatile Organics (ppb)</u>								
1,2-Dichlorobenzene	620	<50	NA	11	NA	<10	NA	NA
1,4-Dichlorobenzene	75	<50	NA	<10	NA	<10	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-01 Date Sampled: 05/03/95	MW-01 07/28/95	Sample ID: MW-02 Date Sampled: 05/03/95	MW-02 07/28/95	Sample ID: MW-03 Date Sampled: 05/01/95	MW-03 07/27/95	Sample ID: MW-04 Date Sampled: 07/25/95
<u>Semi-Volatile Organics (ppb) (cont)</u>								
4-Chloro-3-methylphenol	NS	<100	NA	<20	NA	<20	NA	NA
Benzoic acid	NS	<250	NA	<50	NA	<50	NA	NA
Diethylphthalate	5000	<50	NA	<10	NA	<10	NA	NA
Dimethylphthalate	NS	160	NA	<10	NA	<10	NA	NA
Phenol	300	290	NA	36	NA	<10	NA	NA
<u>Inorganics (ppm)</u>								
Alkalinity	NS	410	NA	840	NA	190	NA	NA
Aluminum	NS	NA	NA	NA	NA	NA	NA	NA
Arsenic	0.05	<0.010	NA	0.014	NA	<0.010	NA	NA
Barium	2.0	NA	NA	NA	NA	NA	NA	NA
Calcium	NS	390	NA	180	NA	43	NA	NA
Chromium	0.05	<0.010	NA	<0.010	NA	0.12	NA	NA
Copper	1.0	<0.025	NA	<0.025	NA	<0.025	NA	NA
Iron	0.3	5.0	NA	18	NA	5.6	NA	NA
Lead	0.015	<0.0030	NA	<0.0030	NA	0.0050	NA	NA
Magnesium	NS	160	NA	140	NA	11	NA	NA
Manganese	0.05	29	NA	11	NA	0.66	NA	NA
Mercury	0.0011	<0.0002	NA	<0.00020	NA	<0.0002	NA	NA
Nickel	0.1	0.070	NA	<0.040	NA	0.060	NA	NA
Potassium	NS	NA	NA	NA	NA	NA	NA	NA
Sodium	NS	NA	NA	NA	NA	NA	NA	NA
Thallium	NS	<0.010	NA	<0.010	NA	<0.010	NA	NA
TDS	1000**	3800	NA	1400	NA	380	NA	NA
Zinc	2.1	0.030	NA	<0.020	NA	0.030	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-04 Date Sampled: 01/31/96	MW-04 04/23/96	MW-05 07/26/95	MW-05 01/30/96	MW-05 04/23/96	MW-06 05/03/95	MW-06 07/27/95
<u>Volatile Organics (ppb)</u>								
1,1,2,2-Tetrachloroethane	NS	<2	<1	<5	<1	<1	<50	5J
1,1-Dichloroethane	700	<2	<1	<5	<1	<1	<50	<12
1,2-Dichloroethane	0.38	<2	<1	<5	<1	<1	<50	24
1,2-Dichloroethene (Total)	70	NA	NA	<5	NA	NA	<50	<12
2-Butanone	170	<10	<5	<10	<5	<5	<100	<25
4-Methyl-2-pentanone	NS	<10	<5	<10	<5	<5	<100	<25
Acetone	700	<10	<5	<16	<6	<10	<100	<28
Benzene	1	<2	<1	<5	<1	<1	460	610
Bromodichloromethane	0.6	<2	<1	<5	<1	<1	<50	<12
Carbon disulfide	700	<2	<1	1J	<1	<1	<50	<12
Chlorobenzene	50	<2	<1	<5	<1	<1	<50	7J
Chloroform	0.19	<2	<1	<5	<1	<1	1100	1600
Diethyl ether	NS	NA	<10	<10	NA	<10	NA	3900
Ethylbenzene	29	<2	<1	<5	<1	<1	<50	<12
Methylene chloride	5	<2	<1	<5	<1	<1	820	1100
Tetrachloroethene	0.7	<2	<1	<5	<1	<1	<50	<12
Toluene	1000	<2	<1	<5	<1	<1	<50	<12
Trichloroethene	2.8	<2	<1	<5	<1	<1	<50	6J
Vinyl chloride	0.015	<2	<1	<10	<1	<1	<100	25
<u>Semi-Volatile Organics (ppb)</u>								
1,2-Dichlorobenzene	620	NA	NA	NA	NA	NA	<10	NA
1,4-Dichlorobenzene	75	NA	NA	NA	NA	NA	<10	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard		MW-04	MW-05	MW-05	MW-05	MW-06	MW-06
	Sample ID:	Date Sampled:	04/23/96	07/26/95	01/30/96	04/23/96	05/03/95	07/27/95
<u>Semi-Volatile Organics (ppb) (cont)</u>								
4-Chloro-3-methylphenol	NS		NA	NA	NA	NA	<20	NA
Benzoic acid	NS		NA	NA	NA	NA	<50	NA
Diethylphthalate	5000		NA	NA	NA	NA	<10	NA
Dimethylphthalate	NS		NA	NA	NA	NA	<10	NA
Phenol	300		NA	NA	NA	NA	<10	NA
<u>Inorganics (ppm)</u>								
Alkalinity	NS		NA	NA	NA	NA	34	NA
Aluminum	NS		NA	NA	NA	NA	NA	NA
Arsenic	0.05		NA	NA	NA	NA	<0.010	NA
Barium	2.0		NA	NA	NA	NA	NA	NA
Calcium	NS		NA	NA	NA	NA	24	NA
Chromium	0.05		NA	NA	NA	NA	<0.010	NA
Copper	1.0		NA	NA	NA	NA	<0.025	NA
Iron	0.3		NA	NA	NA	NA	0.70	NA
Lead	0.015		NA	NA	NA	NA	<0.0030	NA
Magnesium	NS		NA	NA	NA	NA	5.7	NA
Manganese	0.05		NA	NA	NA	NA	1.5	NA
Mercury	0.0011		NA	NA	NA	NA	<0.00020	NA
Nickel	0.1		NA	NA	NA	NA	<0.040	NA
Potassium	NS		NA	NA	NA	NA	NA	NA
Sodium	NS		NA	NA	NA	NA	NA	NA
Thallium	NS		NA	NA	NA	NA	<0.010	NA
TDS	1000**		NA	NA	NA	NA	310	NA
Zinc	2.1		NA	NA	NA	NA	<0.020	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	MW-07		MW-09	MW-09	MW-11	MW-11	MW-11(Dup-01)
		Sample ID: 05/02/95	Date Sampled: 07/27/95	05/03/95	07/26/95	05/03/95	07/26/95	07/26/95
<u>Volatile Organics (ppb)</u>								
1,1,2,2-Tetrachloroethane	NS	<5	<10	<5	<5	<10	1J	1J
1,1-Dichloroethane	700	<5	<10	<5	<5	<10	2J	2J
1,2-Dichloroethane	0.38	23	26	<5	2J	50	64	65
1,2-Dichloroethene (Total)	70	<5	2J	<5	<5	<10	4J	4J
2-Butanone	170	<10	<20	<10	<10	<20	<10	<10
4-Methyl-2-pentanone	NS	<10	<20	<10	<10	<20	<10	<10
Acetone	700	21	<20	79	<10	<20	<36	<32
Benzene	1	120	58	<5	<5	200	310	310
Bromodichloromethane	0.6	<5	<10	<5	<5	<10	<5	<5
Carbon disulfide	700	<5	<10	<5	<5	<10	<5	<5
Chlorobenzene	50	6	3J	<5	<5	<10	8	8
Chloroform	0.19	71	46	9	8	140	160	160
Diethyl ether	NS	NA	650	NA	<10	NA	1200	1200
Ethylbenzene	29	<5	<10	<5	<5	<10	<5	<5
Methylene chloride	5	29	<12	<5	<5	<10	<2	<2
Tetrachloroethene	0.7	<5	<10	<5	<5	<10	<5	<5
Toluene	1000	<5	<10	<5	<5	<10	<5	<5
Trichloroethene	2.8	<5	3J	<5	<5	11	9	9
Vinyl chloride	0.015	12	10J	<10	<10	<20	15	15
<u>Semi-Volatile Organics (ppb)</u>								
1,2-Dichlorobenzene	620	<10	NA	<10	NA	<10	NA	NA
1,4-Dichlorobenzene	75	<10	NA	<10	NA	<10	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	Sample ID: MW-07		MW-09		MW-11		MW-11 (Dup-01)	
	NCAC 2L Groundwater Standard	Date Sampled: 05/02/95	05/03/95	07/26/95	05/03/95	07/26/95	05/03/95	07/26/95
Semi-Volatile Organics (ppb) (cont)								
4-Chloro-3-methylphenol	NS	<20	<20	NA	<20	NA	<20	NA
Benzoic acid	NS	<50	<50	NA	<50	NA	<50	NA
Diethylphthalate	5000	<10	<10	NA	<10	NA	<10	NA
Dimethylphthalate	NS	<10	<10	NA	<10	NA	<10	NA
Phenol	300	<11	<10	NA	<10	NA	<10	NA
Inorganics (ppm)								
Alkalinity	NS	530	230	NA	490	NA	NA	NA
Aluminum	NS	NA	NA	NA	NA	NA	NA	NA
Arsenic	0.05	0.013	<0.010	NA	<0.010	NA	<0.010	NA
Barium	2.0	NA	NA	NA	NA	NA	NA	NA
Calcium	NS	150	190	NA	180	NA	NA	NA
Chromium	0.05	0.010	0.040	NA	<0.010	NA	<0.010	NA
Copper	1.0	<0.025	0.038	NA	<0.025	NA	<0.025	NA
Iron	0.3	3.7	5.5	NA	1.0	NA	1.0	NA
Lead	0.015	0.0040	0.0050	NA	<0.0030	NA	<0.0030	NA
Magnesium	NS	40	9.1	NA	31	NA	31	NA
Manganese	0.05	3.0	0.39	NA	0.21	NA	0.21	NA
Mercury	0.0011	<0.0002	<0.00020	NA	<0.00020	NA	<0.0002	NA
Nickel	0.1	<0.040	0.040	NA	<0.040	NA	<0.040	NA
Potassium	NS	NA	NA	NA	NA	NA	NA	NA
Sodium	NS	NA	NA	NA	NA	NA	NA	NA
Thallium	NS	<0.010	<0.010	NA	<0.010	NA	<0.010	NA
TDS	1000**	760	200	NA	690	NA	690	NA
Zinc	2.1	0.31	0.060	NA	<0.020	NA	<0.020	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard		MW-12		MW-13		MW-14		MW-15	
	Sample ID: 05/03/95	Date Sampled: 07/25/95	05/02/95	07/26/95	08/17/95	04/17/96	07/20/95			
<u>Volatile Organics (ppb)</u>										
1,1,2,2-Tetrachloroethane	NS	<250	<5	<5	<2.5	NA	<2.5	<5	NA	<5
1,1-Dichloroethane	700	<250	<5	2J	<2.5	NA	<2.5	<5	NA	<5
1,2-Dichloroethane	0.38	320	44	70	81	NA	81	<5	NA	<5
1,2-Dichloroethene (Total)	70	<250	<5	4J	<2.5	NA	<2.5	<5	NA	<5
2-Butanone	170	<500	<10	<10	<50	NA	<50	<10	NA	<10
4-Methyl-2-pentanone	NS	<500	<10	<10	<50	NA	<50	<10	NA	<10
Acetone	700	<500	<10	<10	<50	NA	<50	<10	NA	<10
Benzene	1	1700	130	330	400	NA	400	2200	NA	2200
Bromodichloromethane	0.6	<250	<5	<5	<2.5	NA	<2.5	<5	NA	<5
Carbon disulfide	700	<250	<5	<5	<2.5	NA	<2.5	<5	NA	<5
Chlorobenzene	50	<250	<5	6	<2.5	NA	<2.5	<5	NA	<5
Chloroform	0.19	10000	120	130	3600	NA	3600	13000	NA	13000
Diethyl ether	NS	6100	NA	1600	1200	NA	1200	7800	NA	7800
Ethylbenzene	29	<250	<5	<5	<2.5	NA	<2.5	<5	NA	<5
Methylene chloride	5	4600	13	<7	1300	NA	1300	6900	NA	6900
Tetrachloroethene	0.7	<250	<5	<5	<2.5	NA	<2.5	<5	NA	<5
Toluene	1000	<250	<5	<5	<2.5	NA	<2.5	<5	NA	<5
Trichloroethene	2.8	<250	<12	13	13J	NA	13J	<5	NA	<5
Vinyl chloride	0.015	<500	<10	7J	<50	NA	<50	<10	NA	<10
<u>Semi-Volatile Organics (ppb)</u>										
1,2-Dichlorobenzene	620	<10	<10	NA	NA	<40	NA	NA	NA	NA
1,4-Dichlorobenzene	75	<10	<10	NA	NA	<40	NA	NA	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: Date Sampled:	MW-12 05/03/95	MW-12 07/25/95	MW-13 05/02/95	MW-13 07/26/95	MW-14 08/17/95	MW-14 04/17/96	MW-15 07/20/95
<u>Semi-Volatile Organics (ppb) (cont)</u>									
4-Chloro-3-methylphenol	NS		<20	NA	<20	NA	NA	<80	NA
Benzoic acid	NS		<50	NA	<50	NA	NA	<200	NA
Diethylphthalate	5000		<10	NA	<10	NA	NA	<40	NA
Dimethylphthalate	NS		<10	NA	<10	NA	NA	<40	NA
Phenol	300		<10	NA	<10	NA	NA	200	NA
<u>Inorganics (ppm)</u>									
Alkalinity	NS		520	NA	180	NA	NA	NA	NA
Aluminum	NS		NA	NA	NA	NA	NA	NA	NA
Arsenic	0.05		<0.010	NA	<0.010	NA	NA	NA	NA
Barium	2.0		NA	NA	NA	NA	NA	NA	NA
Calcium	NS		200	NA	56	NA	NA	NA	NA
Chromium	0.05		<0.010	NA	<0.010	NA	NA	NA	NA
Copper	1.0		<0.025	NA	<0.025	NA	NA	NA	NA
Iron	0.3		0.61	NA	3.0	NA	NA	NA	NA
Lead	0.015		<0.0030	NA	0.0040	NA	NA	NA	NA
Magnesium	NS		55	NA	15	NA	NA	NA	NA
Manganese	0.05		0.76	NA	0.82	NA	NA	NA	NA
Mercury	0.0011		<0.0002	NA	<0.00020	NA	NA	NA	NA
Nickel	0.1		<0.040	NA	<0.040	NA	NA	NA	NA
Potassium	NS		NA	NA	NA	NA	NA	NA	NA
Sodium	NS		NA	NA	NA	NA	NA	NA	NA
Thallium	NS		<0.010	NA	<0.010	NA	NA	NA	NA
TDS	1000**		910	NA	370	NA	NA	NA	NA
Zinc	2.1		<0.020	NA	<0.020	NA	NA	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID	MW-15 Date Sampled: 07/31/95	MW-16B 07/24/95	MW-16 07/27/95	MW-17 07/26/95	MW-17(Dup-02) 07/26/95	MW-18 07/25/95	MW-19 07/25/95
Volatile Organics (ppb)									
1,1,2,2-Tetrachloroethane	NS		<250	<5	<5	<5	<5	<5	<5
1,1-Dichloroethane	700		<250	<5	<5	<5	<5	<5	<5
1,2-Dichloroethane	0.38		410	<5	<5	<5	<5	<5	<5
1,2-Dichloroethene (Total)	70		<250	<5	<5	17	17	<5	<5
2-Butanone	170		<500	<10	<10	<10	<10	<10	<10
4-Methyl-2-pentanone	NS		<500	<10	<10	<10	<10	<10	<10
Acetone	700		330	<10	<10	<10	<10	<10	<16
Benzene	1		2100	<5	<5	3J	3J	<5	<5
Bromodichloromethane	0.6		<250	<5	<5	<5	<5	<5	2J
Carbon disulfide	700		<250	<5	<5	<5	<5	<5	<5
Chlorobenzene	50		<250	<5	<5	<5	<5	2J	<5
Chloroform	0.19		10000	<5	1J	<5	<5	<5	12
Diethyl ether	NS		6900	<10	6J	76	78	46	<10
Ethylbenzene	29		<250	<5	<5	<5	<5	<5	<5
Methylene chloride	5		6000	<5	<5	<5	<5	<5	<5
Tetrachloroethene	0.7		<250	<5	<5	<5	<5	<5	<5
Toluene	1000		<250	<5	<5	<5	<5	<5	<5
Trichloroethene	2.8		<250	<5	<5	<5	<5	<5	<5
Vinyl chloride	0.015		<500	<10	<10	8J	8J	<10	<10
Semi-Volatile Organics (ppb)									
1,2-Dichlorobenzene	620		NA	NA	NA	<10	<10	<10	<10
1,4-Dichlorobenzene	75		NA	NA	NA	3J	3J	<10	<10

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L	Sample ID:	MW-15	MW-16B	MW-16	MW-17	MW-17(Dup-02)	MW-18	MW-19
	Groundwater Standard	Date Sampled:	07/31/95	07/24/95	07/27/95	07/26/95	07/26/95	07/25/95	07/25/95
<u>Semi-Volatile Organics (ppb) (cont)</u>									
4-Chloro-3-methylphenol	NS		NA	NA	NA	1J	1J	<20	<20
Benzoic acid	NS		NA	NA	NA	<50	<50	<50	<50
Diethylphthalate	5000		NA	NA	NA	5J	5J	<10	<10
Dimethylphthalate	NS		NA	NA	NA	<10	<10	<10	<10
Phenol	300		NA	NA	NA	<10	<10	<10	<10
<u>Inorganics (ppm)</u>									
Alkalinity	NS		510	NA	370	520	520	760	390
Aluminum	NS		NA	NA	NA	NA	NA	NA	NA
Arsenic	0.05		NA	NA	NA	<0.010	<0.010	<0.010	<0.010
Barium	2.0		NA	NA	NA	NA	NA	NA	NA
Calcium	NS		170	100	100	350	340	190	29
Chromium	0.05		NA	NA	NA	<0.010	<0.010	<0.010	0.055
Copper	1.0		NA	NA	NA	<0.025	<0.025	<0.025	<0.025
Iron	0.3		<0.10	14	14	0.49J	1.3J	43	8.4
Lead	0.015		NA	NA	NA	<0.0030	<0.0030	<0.0030	<0.0030
Magnesium	NS		56	NA	NA	28	28	39	22
Manganese	0.05		1.8	1.1	1.1	4.4	4.3	4.0	0.47
Mercury	0.0011		NA	NA	NA	0.00040	<0.0002	<0.00020	<0.00020
Nickel	0.1		NA	NA	NA	<0.040	<0.040	<0.040	0.046
Potassium	NS		NA	NA	NA	NA	NA	NA	NA
Sodium	NS		NA	NA	NA	NA	NA	NA	NA
Thallium	NS		NA	NA	NA	<0.010	<0.010	<0.010	<0.010
TDS	1000**		750	440	440	0.012	2100J	870	660
Zinc	2.1		NA	NA	NA	0.20	0.20	<0.020	0.076

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-19A	MW-20	MW-20	MW-20	MW-21	MW-21	MW-21
		Date Sampled: 07/28/95	07/28/95	01/30/96	04/23/96	07/28/95	01/30/96	04/23/96
<u>Volatile Organics (ppb)</u>								
1,1,1,2,2-Tetrachloroethane	NS	<5	<5	<5	<5	<5	<5	<5
1,1-Dichloroethane	700	<5	<5	<5	<5	<5	<5	<5
1,2-Dichloroethane	0.38	<5	<5	<5	<5	<5	<5	<5
1,2-Dichloroethene (Total)	70	<5	NA	NA	NA	NA	NA	NA
2-Butanone	170	<10	<5	<5	<5	<5	<5	<5
4-Methyl-2-pentanone	NS	<10	<5	<5	<5	<5	<5	<5
Acetone	700	<10	<10	<8	<10	<10	<10	<6
Benzene	1	<5	<5	<5	<5	<5	<5	<5
Bromodichloromethane	0.6	<5	<5	<5	<5	<5	<5	<5
Carbon disulfide	700	<5	<5	<5	<5	<5	<5	<5
Chlorobenzene	50	<5	<5	<5	<5	<5	<5	<5
Chloroform	0.19	<5	<5	<5	<5	<5	<5	<5
Diethyl ether	NS	7	<10	NA	<10	<10	NA	<10
Ethylbenzene	29	<5	<5	<5	<5	<5	<5	<5
Methylene chloride	5	<5	<5	<5	<5	<5	<5	<5
Tetrachloroethene	0.7	<5	<5	<5	<5	<5	<5	<5
Toluene	1000	2J	<5	<5	<5	<5	<5	<5
Trichloroethene	2.8	<5	<5	<5	<5	<5	<5	<5
Vinyl chloride	0.015	<10	<10	<5	<10	<10	<5	<5
<u>Semi-Volatile Organics (ppb)</u>								
1,2-Dichlorobenzene	620	NA	NA	NA	NA	NA	NA	NA
1,4-Dichlorobenzene	75	NA	NA	NA	NA	NA	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	MW-19A		MW-20		MW-21		
		Sample ID: 07/28/95	Date Sampled:	07/28/95	01/30/96	07/28/95	01/30/96	04/23/96
<u>Semi-Volatile Organics (ppb) (cont.)</u>								
4-Chloro-3-methylphenol	NS	NA	NA	NA	NA	NA	NA	NA
Benzoic acid	NS	NA	NA	NA	NA	NA	NA	NA
Diethylphthalate	5000	NA	NA	NA	NA	NA	NA	NA
Dimethylphthalate	NS	NA	NA	NA	NA	NA	NA	NA
Phenol	300	NA	NA	NA	NA	NA	NA	NA
<u>Inorganics (ppm)</u>								
Alkalinity	NS	140	NA	NA	NA	14	NA	NA
Aluminum	NS	NA	NA	NA	NA	NA	NA	NA
Arsenic	0.05	NA	NA	NA	NA	NA	NA	NA
Barium	2.0	NA	NA	NA	NA	NA	NA	NA
Calcium	NS	37	NA	NA	NA	<5.0	NA	NA
Chromium	0.05	NA	NA	NA	NA	NA	NA	NA
Copper	1.0	NA	NA	NA	NA	NA	8.9	NA
Iron	0.3	3.6	NA	NA	NA	NA	NA	NA
Lead	0.015	NA	NA	NA	NA	NA	NA	NA
Magnesium	NS	7.1	NA	NA	NA	<5.0	NA	NA
Manganese	0.05	0.54	NA	NA	NA	0.17	NA	NA
Mercury	0.0011	NA	NA	NA	NA	NA	NA	NA
Nickel	0.1	NA	NA	NA	NA	NA	NA	NA
Potassium	NS	NA	NA	NA	NA	NA	NA	NA
Sodium	NS	NA	NA	NA	NA	NA	NA	NA
Thallium	NS	NA	NA	NA	NA	NA	NA	NA
TDS	1000**	74	NA	NA	NA	190	NA	NA
Zinc	2.1	NA	NA	NA	NA	NA	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-22 Date Sampled: 07/27/95	MW-23[MWCH3] 08/18/95	MW-23 01/30/96	MW-23 04/23/96	MW-24 02/06/96	MW-24 04/17/96	MW-25 01/24/96
Volatile Organics (ppb)								
1,1,2,2-Tetrachloroethane	NS	<10	<5	<1	<1	<1	NA	<1
1,1-Dichloroethane	700	<10	<5	<1	<1	<1	NA	<1
1,2-Dichloroethane	0.38	14	<5	<1	<1	<1	NA	<1
1,2-Dichloroethene (Total)	70	<10	<5	NA	NA	NA	NA	NA
2-Butanone	170	<20	<10	<5	<5	<5	NA	<5
4-Methyl-2-pentanone	0.6	<20	<10	<5	<5	<5	NA	<5
Acetone	700	<20	4J	<5	<8	60	NA	23
Benzene	1	46	<5	<1	<1	2	NA	<1
Bromodichloromethane	0.6	<10	<5	<1	<1	<1	NA	<1
Carbon disulfide	700	<10	<5	<1	<1	<1	NA	<1
Chlorobenzene	50	10	<5	<1	<1	<1	NA	<1
Chloroform	0.19	<10	<5	<1	<1	12	NA	<1
Diethyl ether	NS	500	<10	NA	<10	<10	NA	NA
Ethylbenzene	29	<10	<5	<1	<1	<1	NA	<1
Methylene chloride	5	<10	<5	<1	<1	8	NA	<1
Tetrachloroethene	0.7	<10	<5	<1	<1	<1	NA	<1
Toluene	1000	<10	<5	<1	<1	<1	NA	<1
Trichloroethene	2.8	3J	<5	<1	<1	<1	NA	<1
Vinyl chloride	0.015	<20	<10	<1	<1	<1	NA	<1
Semi-Volatile Organics (ppb)								
1,2-Dichlorobenzene	620	NA	NA	NA	NA	<500	<100	<1
1,4-Dichlorobenzene	75	NA	NA	NA	NA	<500	<100	<1

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-22	Date Sampled: 07/27/95	MW-23 [MWCH3]	MW-23	MW-23	MW-24	MW-24	MW-25
				08/18/95	01/30/96	04/23/96	02/06/96	04/17/96	01/24/96
<u>Semi-Volatile Organics (ppb) (cont)</u>									
4-Chloro-3-methylphenol	NS			NA	NA	NA	<1000	<200	NA
Benzoic acid	NS			NA	NA	NA	NA	<500	NA
Diethylphthalate	5000			NA	NA	NA	<500	<100	NA
Dimethylphthalate	NS			NA	NA	NA	<500	<100	NA
Phenol	300			NA	NA	NA	3400	470	NA
<u>Inorganics (ppm)</u>									
Alkalinity	NS			NA	NA	NA	NA	NA	NA
Aluminum	NS			NA	NA	NA	1.2	NA	NA
Arsenic	0.05			NA	NA	NA	<0.010	NA	NA
Barium	2.0			NA	NA	NA	0.33	NA	NA
Calcium	NS			NA	NA	NA	197	NA	NA
Chromium	0.05			NA	NA	NA	0.028	NA	NA
Copper	1.0			NA	NA	NA	<0.025	NA	NA
Iron	0.3			NA	NA	NA	1.5	NA	NA
Lead	0.015			NA	NA	NA	0.020	NA	NA
Magnesium	NS			NA	NA	NA	<5	NA	NA
Manganese	0.05			NA	NA	NA	0.088	NA	NA
Mercury	0.0011			NA	NA	NA	<0.0002	NA	NA
Nickel	0.1			NA	NA	NA	<0.04	NA	NA
Potassium	NS			NA	NA	NA	337	NA	NA
Sodium	NS			NA	NA	NA	135	NA	NA
Thallium	NS			NA	NA	NA	<0.010	NA	NA
TDS	1000**			NA	NA	NA	NA	NA	NA
Zinc	2.1			NA	NA	NA	1.7	NA	NA

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: Date Sampled:	MW-25	MW-26	MW-26	MW-28	MW-28
			01/30/96	01/30/96	02/12/96	01/24/96	01/30/96
<u>Volatile Organics (ppb)</u>							
1,1,1,2-Tetrachloroethane	NS		<1	<1	<1	<1	<1
1,1-Dichloroethane	700		<1	<1	<1	<1	<1
1,2-Dichloroethane	0.38		<1	<1	<1	<1	<1
1,2-Dichloroethene (Total)	70		NA	NA	NA	NA	NA
2-Butanone	170		<5	7	<5	<5	<5
4-Methyl-2-pentanone	NS		<5	<5	<5	<5	<5
Acetone	700		<1	<5	<41	9.9	<9
Benzene	1		<1	<1	<1	<1	<1
Bromodichloromethane	0.6		<1	<1	<1	<1	<1
Carbon disulfide	700		<1	<1	<1	<1	<1
Chlorobenzene	50		<1	<1	<1	<1	<1
Chloroform	0.19		<1	<1	<1	<1	<1
Diethyl ether	NS		NA	NA	<10	NA	NA
Ethylbenzene	29		<1	<1	<1	<1	<1
Methylene chloride	5		<5	<1	<1	<1	<1
Tetrachloroethene	0.7		<1	2	2	<1	<1
Toluene	1000		<1	<1	<1	<1	<1
Trichloroethene	2.8		<1	<1	<1	<1	<1
Vinyl chloride	0.015		<1	<1	<1	<1	<1
<u>Semi-Volatile Organics (ppb)</u>							
1,2-Dichlorobenzene	620		<10	NA	<10	<1	<10
1,4-Dichlorobenzene	75		<10	NA	<10	<1	<10

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L		MW-25		MW-26		MW-28	
	Groundwater	Standard	Sample ID:	Date Sampled:	Sample ID:	Date Sampled:	Sample ID:	Date Sampled:
<u>Semi-Volatile Organics (ppb) (cont.)</u>								
4-Chloro-3-methylphenol	NS		MW-25	04/23/96	MW-26	01/30/96	MW-28	01/30/96
Benzoic acid	NS	<20			NA	NA	NA	<20
Diethylphthalate	5000	NA			NA	NA	NA	NA
Dimethylphthalate	NS	<10			NA	NA	NA	<10
Phenol	300	<10			NA	NA	NA	<10
<u>Inorganics (ppm)</u>								
Alkalinity	NS	NA			NA	NA	NA	NA
Aluminum	NS	0.58			NA	NA	NA	0.23
Arsenic	0.05	<0.010			NA	NA	NA	<0.010
Barium	2.0	<0.20			NA	NA	NA	<0.20
Calcium	NS	5.3			NA	NA	NA	49.7
Chromium	0.05	<0.010			NA	NA	NA	<0.010
Copper	1.0	<0.025			NA	NA	NA	<0.025
Iron	0.3	0.32			NA	NA	NA	0.23
Lead	0.015	<0.00			NA	NA	NA	<0.0030
Magnesium	NS	<5.0			NA	NA	NA	12.5
Manganese	0.05	0.20			NA	NA	NA	0.022
Mercury	0.0011	<0.0002			NA	NA	NA	<0.0002
Nickel	0.1	<0.040			NA	NA	NA	<0.040
Potassium	NS	<5.0			NA	NA	NA	<5.0
Sodium	NS	10.8			NA	NA	NA	15.6
Thallium	NS	0.010			NA	NA	NA	<0.010
TDS	1000**	NA			NA	NA	NA	NA
Zinc	2.1	<0.20			NA	NA	NA	<0.20

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L	Sample ID:	MW-28	MW-30/MW-26 Duplicate
	Groundwater Standard	Date Sampled:	04/23/96	02/12/96
<u>Volatile Organics (ppb)</u>				
1,1,2,2-Tetrachloroethane	NS	<1	<1	<1
1,1-Dichloroethane	700	<1	<1	<1
1,2-Dichloroethane	0.38	<1	<1	<1
1,2-Dichloroethene (Total)	70	NA	NA	NA
2-Butanone	170	<5	<5	<5
4-Methyl-2-pentanone	NS	<5	<5	<5
Acetone	700	<10	<10	<48
Benzene	1	<1	<1	<1
Bromodichloromethane	0.6	<1	<1	<1
Carbon disulfide	700	<1	<1	<1
Chlorobenzene	50	<1	<1	<1
Chloroform	0.19	<1	<1	<1
Diethyl ether	NS	<10	<10	<10
Ethylbenzene	29	<1	<1	<1
Methylene chloride	5	<1	<1	<1
Tetrachloroethene	0.7	<1	<1	2
Toluene	1000	<1	<1	<1
Trichloroethene	2.8	<1	<1	<1
Vinyl chloride	0.015	<1	<1	<1
<u>Semi-Volatile Organics (ppb)</u>				
1,2-Dichlorobenzene	620	NA	NA	<10
1,4-Dichlorobenzene	75	NA	NA	<10

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Constituents	NCAC 2L Groundwater Standard	Sample ID: MW-28	Date Sampled: 04/23/96	MW-30/MW-26 Duplicate 02/12/96
<u>Semi-Volatile Organics (ppb) (cont)</u>				
4-Chloro-3-methylphenol	NS	NA		<20
Benzoic acid	NS	NA		NA
Diethylphthalate	5000	NA		<10
Dimethylphthalate	NS	NA		<10
Phenol	300	NA		<10
<u>Inorganics (ppm)</u>				
Alkalinity	NS	NA		NA
Aluminum	NS	NA		2.1
Arsenic	0.05	NA		<0.01
Barium	2.0	NA		<0.2
Calcium	NS	NA		35
Chromium	0.05	NA		<0.01
Copper	1.0	NA		<0.025
Iron	0.3	NA		2.7
Lead	0.015	NA		<0.003
Magnesium	NS	NA		11
Manganese	0.05	NA		0.16
Mercury	0.0011	NA		<0.0002
Nickel	0.1	NA		<0.04
Potassium	NS	NA		11.6
Sodium	NS	NA		22.9
Thallium	NS	NA		<0.01
TDS	1000**	NA		NA
Zinc	2.1	NA		0.14

Footnotes appear on last page.



Table 4-2. Summary of Groundwater Sample Analytical Results, May 1995 through April 1996, The University of North Carolina at Chapel Hill, Airport Road Waste Disposal Area, Chapel Hill, North Carolina.

Notes:	All boxed numbers in the table represent data above groundwater standards.
ppb	Sample MW-30/MW-26 Duplicate is a duplicate groundwater sample collected from monitor well MW-26.
ppm	Parts per billion equivalent to micrograms per liter.
NCAC 2L	Parts per million equivalent to milligrams per liter.
NS	North Carolina Administrative Code, Title 15A, Chapter 2L, Groundwater Quality Standards, February 8, 1994.
*	Numerical 15A NCAC 2L Standard has not been established, therefore, detectable concentrations of these substances in groundwater are considered to be in excess of North Carolina Water Quality Standards.
**	Proposed NCAC 2L Groundwater Standard, January 16, 1996.
J	Groundwater Standard for TDS is 1,000 ppm for Class GSA groundwater.
<	Estimated value.
NA	Constituent was not detected.
TDS	Not analyzed.
	Total dissolved solids.

