INTERNATIONAL TECHNOLOGY CORPORATION

Pacific Environmental Group, Inc.
1601 Civic Center Drive
Suite 202
Santa Clara, CA 95050

December 27, 1988

ATTN: John Adams

Following are the results of analyses on the samples described below.

Project:	330-41.01
Lab Numbers:	S8-12-199-01 and S8-12-199-02
Number of Samples:	2
Sample Type:	Soil
Date Received:	12/19/88
Analyses Requested:	Low Boiling Hydrocarbons, High Boiling Hydrocarbons, Oil & Grease, Volatile Organics, Semi-Volatile Organics

The method of analysis for low boiling hydrocarbons is taken from EPA Methods 8015, 8020 and 5030. The sample is examined using the purge and trap technique. Final detection is by gas chromatography using a flame ionization detector as well as a photoionization detector. The result for total low boiling hydrocarbons is calculated as gasoline and includes benzene, toluene, ethyl benzene and xylenes.

The method of analysis for high boiling hydrocarbons in soil involves extracting the sample with acetone. The mixture is partitioned with hexane and the resulting extract is examined by gas chromatography using a flame ionization detector.

The method of analysis for oil and grease in soil is taken from EPA Method 3550 and Standard Methods Section 503E. The sample is extracted with repeated portions of 50:50 methylene chloride:acetone using a horn-type sonicator. The extract is dried with sodium sulfate and treated with silica gel to remove polar compounds. Following evaporation, oil and grease is determined gravimetrically.

The method of analysis for semi-volatile organics is taken from E.P.A. Methods 625 and 8270. Final detection is by gas chromatography/mass spectrometry.

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
ATTN: John Adams

December 27, 1988
Page 2

The analysis for volatile organics was performed by Anametrix, Inc. Results of their analyses are enclosed. The sample identifications are as follows:

IT Santa Clara Valley Laboratory Number	Anametrix Identification	Sample Identification
S8-12-199-Ø1	8812124-Ø1	WO-1 7'
S8-12-199-Ø2	8812124-Ø2	WO-2 1Ø'

Fred Rouse

FR/gg

6 Pages Following - Tables of Results

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
ATTN: John Adams

December 27, 1988

Project: 330-41.01

Sample Identification: WO-1 7'

Lab Number: S8-12-199-01

Date Analysis Completed: 12/20/88

ND = None Detected

Results
Semi-Volatile Organic Compounds
(Milligrams per Kilogram)

Compound	Detected	Detection Limit
Phenol	ND	410.
Bis(2-chloroethyl)ether	ND	410.
2-Chlorophenol	ND	410.
1,3-Dichlorobenzene	ND	410.
1,4-Dichlorobenzene	ND	410.
Benzyl alcohol	ND	410.
1,2-Dichlorobenzene	ND	410.
2-Methylphenol	ND	410.
Bis(2-chloroisopropyl)ether	ND	410.
4-Methylphenol	ND	410.
N-Nitroso-di-n-propylamine	ND	410.
Hexachloroethane	ND	410.
Nitrobenzene	ND	410.
Isophorone	ND	410.
2-Nitrophenol	ND	410.
2,4-Dimethylphenol	ND	410.
Benzoic acid	ND	2,000.
Bis(2-chloroethoxy)methane	ND	410.
2,4-Dichlorophenol	ND	410.
1,2,4-Trichlorobenzene	ND	410.
Naphthalene	ND	410.
4-Chloroaniline	ND	410.
Hexachlorobutadiene	ND	410.
4-Chloro-3-methylphenol	ND	410.
2-Methylnapthalene	ND	410.
Hexachlorocyclopentadiene	ND	410.
2,4,6-Trichlorophenol	ND	410.
2,4,5-Trichlorophenol	ND	2,000.
2-Chloronaphthalene	ND	410.
2-Nitroaniline	ND	2,000.
Dimethylphthalate	ND	410.
Acenaphthylene	ND	410.
3-Nitroaniline	ND	2,000.
Acenaphthene	ND	410.
2,4-Dinitrophenol	ND	2,000.
4-Nitrophenol	ND	2,000.
Dibenzofuran	ND	410.

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
ATTN: John Adams

December 27, 1988

Project: 330-41.01

Lab Number: S8-12-199-01
Sample Identification: WO-1 7'

	Results		
	Parts per Million - dry soil basis		
Total Petroleum Hydrocarbons	Detected	Detection Limit	Calculated as
Low Boiling Hydrocarbons	11.	5.	Gasoline
Benzene	None	0.05	—
Toluene	None	0.1	—
Ethyl benzene	None	0.1	—
Xylenes	0.3	0.3	—
High Boiling Hydrocarbons	370.*	100.	Diesel
High Boiling Hydrocarbons	4,800.	700.	Oil
Oil and Grease	4,500.	20.	—

*Chromatographic pattern of compounds detected and calculated as diesel does not match that of the diesel standard used for calibration.

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
ATTN: John Adams

December 27, 1988

Project: 330-41.01

Sample Identification: WO-1 7'

Lab Number: S8-12-199-01

Date Analysis Completed: 12/20/88

ND = None Detected

Results (continued)
Semi-Volatile Organic Compounds
(Milligrams per Kilogram)

Compound	Detected	Detection Limit
2,4-Dinitrotoluene	ND	410.
2,6-Dinitrotoluene	ND	410.
Diethylphthalate	ND	410.
4-Chlorophenylphenyl ether	ND	410.
Fluorene	ND	410.
4-Nitroaniline	ND	2,000.
4,6-Dinitro-o-cresol	ND	2,000.
N-Nitrosodiphenylamine	ND	410.
4-Bromophenyl-phenyl ether	ND	410.
Hexachlorobenzene	ND	410.
Pentachlorophenol	ND	2,000.
Phenanthrene	ND	410.
Anthracene	ND	410.
Di-n-butylphthalate	ND	410.
Fluoranthene	ND	410.
Pyrene	ND	410.
Butylbenzylphthalate	ND	410.
3,3'-Dichlorobenzidine	ND	800.
Benzo(a)anthracene	ND	410.
Bis(2-ethylhexyl)phthalate	ND	410.
Chrysene	ND	410.
Di-n-octylphthalate	ND	410.
Benzo(b)fluoranthene	ND	410.
Benzo(k)fluoranthene	ND	410.
Benzo(a)pyrene	ND	410.
Indeno-(1,2,3-c,d,)pyrene	ND	410.
Dibenzo(a,h)anthracene	ND	410.
Benzo(g,h,i)perylene	ND	410.
N-Nitrosodimethylamine	ND	410.
1,2-Diphenylhydrazine	ND	410.
Benzidine	ND	410.

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
ATTN: John Adams

December 27, 1988

Project: 330-41.01

Lab Number: S8-12-199-02
Sample Identification: WO-2 10'

	Results		
	Parts per Million - dry soil basis		
Total Petroleum Hydrocarbons	Detected	Detection Limit	Calculated as
Low Boiling Hydrocarbons	None	5.	Gasoline
Benzene	None	0.05	—
Toluene	None	0.1	—
Ethyl benzene	None	0.1	—
Xylenes	None	0.3	—
High Boiling Hydrocarbons	None	10.	Diesel
High Boiling Hydrocarbons	None	10.	Oil
Oil and Grease	None	20.	—

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
ATTN: John Adams

December 27, 1988

Project: 330-41.01

Sample Identification: WO-2 10'

Lab Number: S8-12-199-02

Date Analysis Completed: 12/20/88

ND = None Detected

Results
Semi-Volatile Organic Compounds
(Milligrams per Kilogram)

Compound	Detected	Detection Limit
Phenol	ND	0.87
Bis(2-chloroethyl)ether	ND	0.87
2-Chlorophenol	ND	0.87
1,3-Dichlorobenzene	ND	0.87
1,4-Dichlorobenzene	ND	0.87
Benzyl alcohol	ND	0.87
1,2-Dichlorobenzene	ND	0.87
2-Methylphenol	ND	0.87
Bis(2-chloroisopropyl)ether	ND	0.87
4-Methylphenol	ND	0.87
N-Nitroso-di-n-propylamine	ND	0.87
Hexachloroethane	ND	0.87
Nitrobenzene	ND	0.87
Isophorone	ND	0.87
2-Nitrophenol	ND	0.87
2,4-Dimethylphenol	ND	0.87
Benzoic acid	ND	4.0
Bis(2-chloroethoxy)methane	ND	0.87
2,4-Dichlorophenol	ND	0.87
1,2,4-Trichlorobenzene	ND	0.87
Naphthalene	ND	0.87
4-Chloroaniline	ND	0.87
Hexachlorobutadiene	ND	0.87
4-Chloro-3-methylphenol	ND	0.87
2-Methylnapthalene	0.9	0.87
Hexachlorocyclopentadiene	ND	0.87
2,4,6-Trichlorophenol	ND	0.87
2,4,5-Trichlorophenol	ND	4.0
2-Chloronaphthalene	ND	0.87
2-Nitroaniline	ND	4.0
Dimethylphthalate	ND	0.87
Acenaphthylene	ND	0.87
3-Nitroaniline	ND	4.0
Acenaphthene	ND	0.87
2,4-Dinitrophenol	ND	4.0
4-Nitrophenol	ND	4.0
Dibenzofuran	ND	0.87

IT/Santa Clara Valley Lab to
Pacific Environmental Group, Inc.
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December 27, 1988
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Project: 330-41.01

Sample Identification: WO-2 10'

Lab Number: S8-12-199-02

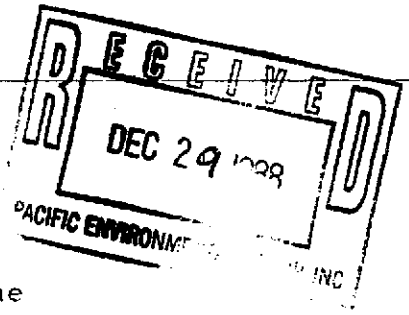
Date Analysis Completed: 12/20/88

ND = None Detected

Results (continued)
Semi-Volatile Organic Compounds
(Milligrams per Kilogram)

Compound	Detected	Detection Limit
2,4-Dinitrotoluene	ND	0.87
2,6-Dinitrotoluene	ND	0.87
Diethylphthalate	ND	0.87
4-Chlorophenylphenyl ether	ND	0.87
Fluorene	ND	0.87
4-Nitroaniline	ND	4.0
4,6-Dinitro-o-cresol	ND	4.0
N-Nitrosodiphenylamine	ND	0.87
4-Bromophenyl-phenyl ether	ND	0.87
Hexachlorobenzene	ND	0.87
Pentachlorophenol	ND	4.0
Phenanthrene	ND	0.87
Anthracene	ND	0.87
Di-n-butylphthalate	ND	0.87
Fluoranthene	ND	0.87
Pyrene	ND	0.87
Butylbenzylphthalate	ND	0.87
3,3'-Dichlorobenzidine	ND	1.7
Benzo(a)anthracene	ND	0.87
Bis(2-ethylhexyl)phthalate	ND	0.87
Chrysene	ND	0.87
Di-n-octylphthalate	ND	0.87
Benzo(b)fluoranthene	ND	0.87
Benzo(k)fluoranthene	ND	0.87
Benzo(a)pyrene	ND	0.87
Indeno-(1,2,3-c,d,)pyrene	ND	0.87
Dibenzo(a,h)anthracene	ND	0.87
Benzo(g,h,i)perylene	ND	0.87
N-Nitrosodimethylamine	ND	0.87
1,2-Diphenylhydrazine	ND	0.87
Benzidine	ND	0.87
Tentatively Identified Compounds as Hydrocarbons	22.	2.8

ANAMETRIX INC
Environmental & Analytical Chemistry



1961 Concourse Drive, Suite E
San Jose, CA 95131
(408) 432-8192 • Fax (408) 432-8198

Sis Dreesmann
IT Corporation
2055 Junction Avenue
San Jose, CA 95131

December 21, 1988
Work Order Number 8812124
Date Received 12/19/88
Project No. S8-12-199

Dear Ms. Dreesmann:

Two soil samples were received for analysis of volatiles by GC/MS, using the following EPA method(s):

ANAMETRIX I.D.	SAMPLE I.D.	METHOD(S)
8812124-01	S8-12-199-01A	8240
-02	" 02A	"

RESULTS

See enclosed data sheets, Pages 2 thru 3.

EXTRA COMPOUNDS

See enclosed data sheet, Page 4.

QUALITY ASSURANCE REPORTS

See enclosed data sheet, Page 5.

NOTE: 1) Amounts reported are net values, i.e. corrected for method blank contamination.
2) The following footnote is applicable to method 624/8240 only:

ND : Not detected at or above the practical quantitation limit for the method.

If there is any more that we can do, please give us a call. Thank you for using ANAMETRIX, INC.

Sincerely,

ANAMETRIX, INC.

Burt Sutherland

Burt Sutherland
Laboratory Director

BWS/lm

ORGANIC ANALYSIS DATA SHEET - EPA METHOD 624/8240
ANAMETRIX, INC. (408) 432-8192

Sample I.D.	: S8-12-199-01A	Anametrix I.D.	: 8812124-01 Wo-i 7
Matrix	: SOIL	Analyst	: TC
Date sampled	: 12-16-88	Supervisor	: PG
Date analyzed	: 12-20-88	Date released	: 12-21-88
Dilut. factor	: NONE	Instrument ID	: F1

CAS #	Compound Name	Detection Limit (ug/Kg)	Amount Found (ug/Kg)
74-87-3	* Chloromethane	10	ND
75-01-4	* Vinyl Chloride	10	ND
74-83-9	* Bromomethane	10	ND
75-00-3	* Chloroethane	10	ND
75-69-4	* Trichlorofluoromethane	5	ND
75-35-4	* 1,1-Dichloroethene	5	ND
76-13-1	# Trichlorotrifluoroethane	5	ND
67-64-1	**Acetone	20	ND
75-15-0	**Carbondisulfide	5	ND
75-09-2	* Methylene Chloride	5	ND
156-60-5	* Trans-1,2-Dichloroethene	5	ND
75-34-3	* 1,1-Dichloroethane	5	ND
78-93-3	**2-Butanone	20	ND
156-59-2	* Cis-1,2-Dichloroethene	5	ND
67-66-3	* Chloroform	5	ND
71-55-6	* 1,1,1-Trichloroethane	5	ND
56-23-5	* Carbon Tetrachloride	5	ND
71-43-2	* Benzene	5	ND
107-06-2	* 1,2-Dichloroethane	5	ND
79-01-6	* Trichloroethene	5	ND
78-87-5	* 1,2-Dichloropropane	5	ND
75-27-4	* Bromodichloromethane	5	ND
110-75-8	* 2-Chloroethylvinylether	5	ND
108-05-4	**Vinyl Acetate	10	ND
10061-02-6	* Trans-1,3-Dichloropropene	5	ND
108-10-1	**4-Methyl-2-Pentanone	10	ND
108-88-3	* Toluene	5	ND
10061-01-5	* cis-1,3-Dichloropropene	5	ND
79-00-5	* 1,1,2-Trichloroethane	5	ND
127-18-4	* Tetrachloroethene	5	ND
591-78-6	**2-Hexanone	10	ND
124-48-1	* Dibromochloromethane	5	ND
108-90-7	* Chlorobenzene	5	ND
100-41-4	* Ethylbenzene	5	ND
1330-20-7	**Total Xylenes	5	8
100-42-5	**Styrene	5	ND
75-25-2	* Bromoform	5	ND
79-34-5	* 1,1,2,2-Tetrachloroethane	5	ND
541-73-1	* 1,3-Dichlorobenzene	5	ND
106-46-7	* 1,4-Dichlorobenzene	5	ND
95-50-1	* 1,2-Dichlorobenzene	5	ND

CAS #	Surrogate Compounds	Limits	% Recovery
17060-07-0	1,2-Dichloroethane-d4	75-135%	86%
2037-26-5	Toluene-d8	70-135%	114%
460-00-4	p-Bromofluorobenzene	52-132%	57%

* A Method 624 priority pollutant compound (Federal Register, 10/26/84)
** A compound on the U.S. EPA CLP Hazardous Substance List (HSL)
\# A compound added by Anametrix, Inc.

ORGANIC ANALYSIS DATA SHEET - EPA METHOD 624/8240
ANAMETRIX, INC. (408) 432-8192

Sample I.D.	: S8-12-199-02A	Anametrix I.D.	: 8812124-02 WO-2 15'
Matrix	: SOIL	Analyst	: JC
Date sampled	: 12-16-88	Supervisor	: PG
Date analyzed	: 12-20-88	Date released	: 12-21-88
Dilut. factor	: NONE	Instrument ID	: F1

CAS #	Compound Name	Detection Limit (ug/Kg)	Amount Found (ug/Kg)
74-87-3	* Chloromethane	10	ND
75-01-4	* Vinyl Chloride	10	ND
74-83-9	* Bromomethane	10	ND
75-00-3	* Chloroethane	10	ND
75-69-4	* Trichlorofluoromethane	5	ND
75-35-4	* 1,1-Dichloroethene	5	ND
76-13-1	# Trichlorotrifluoroethane	5	ND
67-64-1	**Acetone	20	ND
75-15-0	**Carbondisulfide	5	ND
75-09-2	* Methylene Chloride	5	ND
156-60-5	* Trans-1,2-Dichloroethene	5	ND
75-34-3	* 1,1-Dichloroethane	5	ND
78-93-3	**2-Butanone	20	ND
156-59-2	* Cis-1,2-Dichloroethene	5	ND
67-66-3	* Chloroform	5	ND
71-55-6	* 1,1,1-Trichloroethane	5	ND
56-23-5	* Carbon Tetrachloride	5	ND
71-43-2	* Benzene	5	ND
107-06-2	* 1,2-Dichloroethane	5	ND
79-01-6	* Trichloroethene	5	ND
78-87-5	* 1,2-Dichloropropane	5	ND
75-27-4	* Bromodichloromethane	5	ND
110-75-8	* 2-Chloroethylvinylether	5	ND
108-05-4	**Vinyl Acetate	10	ND
10061-02-6	* Trans-1,3-Dichloropropene	5	ND
108-10-1	**4-Methyl-2-Pentanone	10	ND
108-88-3	* Toluene	5	ND
10061-01-5	* cis-1,3-Dichloropropene	5	ND
79-00-5	* 1,1,2-Trichloroethane	5	ND
127-18-4	* Tetrachloroethene	5	ND
591-78-6	**2-Hexanone	10	ND
124-48-1	* Dibromochloromethane	5	ND
108-90-7	* Chlorobenzene	5	ND
100-41-4	* Ethylbenzene	5	ND
1330-20-7	**Total Xylenes	5	ND
100-42-5	**Styrene	5	ND
75-25-2	* Bromoform	5	ND
79-34-5	* 1,1,2,2-Tetrachloroethane	5	ND
541-73-1	* 1,3-Dichlorobenzene	5	ND
106-46-7	* 1,4-Dichlorobenzene	5	ND
95-50-1	* 1,2-Dichlorobenzene	5	ND

CAS #	Surrogate Compounds	Limits	% Recovery
17060-07-0	1,2-Dichloroethane-d4	75-135%	90%
2037-26-5	Toluene-d8	70-135%	98%
460-00-4	p-Bromofluorobenzene	52-132%	121%

* A Method 624 priority pollutant compound (Federal Register, 10/26/84)
** A compound on the U.S. EPA CLP Hazardous Substance List (HSL)
\# A compound added by Anametrix, Inc.

ORGANICS ANALYSIS DATA SHEET - TENTATIVELY IDENTIFIED COMPOUNDS
ANAMETRIX, INC. (408) 432-8192

Sample I.D.	: S8-12-199-01A	Anametrix I.D.	: 8812124-01
Matrix	: SOIL	Analyst	: TC
Date Sampled	: 12-16-88	Supervisor	: PG
Analyzed VOA	: 12-20-88	Date Released	: 12-21-88
Dilution VOA	: NONE		
Analyzed SV	: NA		
Dilution SV	: NA		

	CAS #	Scan#	Volatile Fraction Compound Name	Det. Limit ppb	Amt. Found ppb
1	108-67-8	982	1,3,5-trimethylbenzene	5	50
2	95-63-6	1035	1,2,4-trimethylbenzene	5	30
3	25340-17-4	1061	diethylbenzene	5	20
4	25155-15-1	1070	methyl(1-methylethyl)benzene	5	30
5	1758-88-9	1113	2-ethyl-1,4-dimethylbenzene	5	30
6				5	
7				5	
8				5	
9				5	
10				5	

	CAS #	Scan#	Semivolatile Fraction Compound Name	Det. Limit ppb	Amt. Found ppb
1				10	
2				10	
3				10	
4				10	
5				10	
6				10	
7				10	
8				10	
9				10	
10				10	
11				10	
12				10	
13				10	
14				10	
15				10	
16				10	
17				10	
18				10	
19				10	
20				10	

Tentatively identified compounds are significant chromatographic peaks (TICs) other than priority pollutants. TIC spectra are compared with entries in the National Bureau of Standards mass spectral library. Identification is made by following US EPA guidelines and acceptance criteria. TICs are quantitated by using the area of the nearest internal standard and assuming a response factor of one (1). Values calculated are ESTIMATES ONLY.

ORGANIC ANALYSIS DATA SHEET - EPA METHOD 624/8240
ANAMETRIX, INC. (408) 432-8192

Sample I.D.	: METHOD BLANK	Anametrix I.D.	: 1CB1220V000
Matrix	: SOIL	Analyst	: TC
Date sampled	: NA	Supervisor	: PG
Date analyzed	: 12-20-88	Date released	: 12-21-88
Dilut. factor	: NONE	Instrument ID	: F1

CAS #	Compound Name	Detection Limit (ug/Kg)	Amount Found (ug/Kg)
74-87-3	* Chloromethane	10	ND
75-01-4	* Vinyl Chloride	10	ND
74-83-9	* Bromomethane	10	ND
75-00-3	* Chloroethane	10	ND
75-69-4	* Trichlorofluoromethane	5	ND
75-35-4	* 1,1-Dichloroethene	5	ND
76-13-1	# Trichlorotrifluoroethane	5	ND
67-64-1	**Acetone	20	ND
75-15-0	**Carbondisulfide	5	ND
75-09-2	* Methylene Chloride	5	6
156-60-5	* Trans-1,2-Dichloroethene	5	ND
75-34-3	* 1,1-Dichloroethane	5	ND
78-93-3	**2-Butanone	20	ND
156-59-2	* Cis-1,2-Dichloroethene	5	ND
67-66-3	* Chloroform	5	ND
71-55-6	* 1,1,1-Trichloroethane	5	ND
56-23-5	* Carbon Tetrachloride	5	ND
71-43-2	* Benzene	5	ND
107-06-2	* 1,2-Dichloroethane	5	ND
79-01-6	* Trichloroethene	5	ND
78-87-5	* 1,2-Dichloropropane	5	ND
75-27-4	* Bromodichloromethane	5	ND
110-75-8	* 2-Chloroethylvinylether	5	ND
108-05-4	**Vinyl Acetate	10	ND
10061-02-6	* Trans-1,3-Dichloropropene	5	ND
108-10-1	**4-Methyl-2-Pentanone	10	ND
108-88-3	* Toluene	5	ND
10061-01-5	* cis-1,3-Dichloropropene	5	ND
79-00-5	* 1,1,2-Trichloroethane	5	ND
127-18-4	* Tetrachloroethene	5	ND
591-78-6	**2-Hexanone	10	ND
124-48-1	* Dibromochloromethane	5	ND
108-90-7	* Chlorobenzene	5	ND
100-41-4	* Ethylbenzene	5	ND
1330-20-7	**Total Xylenes	5	ND
100-42-5	**Styrene	5	ND
75-25-2	* Bromoform	5	ND
79-34-5	* 1,1,2,2-Tetrachloroethane	5	ND
541-73-1	* 1,3-Dichlorobenzene	5	ND
106-46-7	* 1,4-Dichlorobenzene	5	ND
95-50-1	* 1,2-Dichlorobenzene	5	ND

CAS #	Surrogate Compounds	Limits	% Recovery
17060-07-0	1,2-Dichloroethane-d4	75-135%	104%
2037-26-5	Toluene-d8	70-135%	104%
460-00-4	p-Bromofluorobenzene	52-132%	110%

* A Method 624 priority pollutant compound (Federal Register, 10/26/84)
** A compound on the U.S. EPA CLP Hazardous Substance List (HSL)
\# A compound added by Anametrix, Inc.