APPENDIX B

B-1 RESULTS OF SOIL VAPOR ANALYSES

B-2 CHAIN-OF-CUSTODY FORMS

B-3 DAILY OPENING, CLOSING, AND CONTINUING CALIBRATION VERIFICATION REPORTS

APPENDIX B-1

RESULTS OF SOIL VAPOR ANALYSES

MAR 1 7 2003

HP LABS

March 10, 2003

Mr. Leo Williamson
Geofon
22632 Golden Springs Drive
Suite 270
Diamond Bar, CA 91765

SUBJECT: DATA REPORT – JET PROPULSION LAB – 4800 OAK GROVE DRIVE – PASADENA, CA - GEOFON PROJECT #04-4428.10

HP Labs Project # GF022403L6

Mr. Williamson:

Please find enclosed a data report for the above referenced location. Soil vapor samples were analyzed on-site in DOHS certified mobile laboratory (CERT #1561).

Project Summary

Soil vapor from 36 points was analyzed for:

- volatile halogenated hydrocarbons by EPA Method 8260
- volatile aromatic hydrocarbons (BTEX) by EPA Method 8260

The samples were received on-site in appropriate containers with appropriate labels, seals, and chain-of-custody documentation.

Project Narrative

The results for all analyses and required QA/QC analyses are summarized in the enclosed tables. All calibrations, blanks, surrogates, and spike recoveries fulfill quality control criteria. No data qualifiers (flags) apply to any of the reported data.

HP Labs appreciates the opportunity to provide analytical services to Geofon on this project. If you have any questions relating to this data or report, please do not hesitate to contact us.

Sincerely,

Blayne Hartman, for
Ms. Tamara Davis
Lab Director

148 S. Vinewood Street • Escondido, CA 92029 • Phone (760) 735-3208 • Fax (760) 735-2469
432 N. Cedros Avenue • Solana Beach, CA 92075 • Phone (858) 793-0401 • Fax (858) 793-0404
2373 208th Street Suite F-1 • Torrance, CA 90501 • Phone (310) 782-2929 • Fax (310) 782-2798

GEOFON PROJECT # 04-4428.10
JET PROPULSION LABORATORY
4800 OAK GROVE DRIVE
PASADENA, CA

HP Labs Project #GF022403-L6
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER
VOLATILE HALOGENATED AND AROMATIC HYDROCARBONS (EPA Method 8260) ANALYSES OF SOIL VAPOR
SOIL VAPOR DATA IN UG/L-VAPOR

	AMBIENT BLANK	SVW33-VPD-001	SVW33-VPE-002	SVW33-VPF-003	SVW4-VPB-004	SVW4-VPD-005	SVW17-VPC-006	SVW17-VPC-006	SVW32-VPH-007	SVW32-VPH-008 DUP
DATE	02/24/03	02/24/03	02/24/03	02/24/03	02/24/03	02/24/03	02/24/03	02/24/03	02/24/03	02/24/03
ANALYSIS TIME	6:32	7:23	7:48	8:13	8:38	9:03	9:28	10:18	9:53	10:43
SAMPLING DEPTH (feet)	--	85	105	120	20	56	36	36	155	155
VOLUME WITHDRAWN (cc)	--	400	480	540	140	284	204	204	680	740
VOLUME INJECTED	20	20	20	20	20	20	20	5	20	20
DILUTION FACTOR	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.2	0.05	0.05
CARBON TETRACHLORIDE	nd	nd	17	19	nd	nd	nd	--	nd	nd
CHLOROETHANE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
CHLOROFORM	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
1,1-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	1.8	--	nd	nd
1,2-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	15	--	nd	nd
1,1-DICHLORO ETHENE	nd	nd	2.1	2.0	nd	nd	nd	--	nd	nd
CIS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
TRANS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
DICHLOROMETHANE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
TETRACHLORO ETHENE	nd	nd	nd	nd	nd	nd	4.5	--	nd	nd
1,1,1,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
1,1,2,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
1,1,1-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
1,1,2-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
TRICHLORO ETHENE	nd	nd	nd	nd	4.5	nd	3.3	--	nd	nd
VINYL CHLORIDE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
TRICHLOROFLUOROMETHANE (FR11)	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
DICHLORODIFLUOROMETHANE (FR12)	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	nd	nd	3.0	1.4	nd	nd	nd	--	nd	nd
BENZENE	nd	nd	nd	nd	nd	nd	XXXX	140	nd	nd
CHLOROBENZENE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
ETHYLBENZENE	nd	nd	nd	nd	nd	nd	1.9	--	nd	nd
TOLUENE	nd	nd	nd	nd	nd	nd	1.2	--	nd	nd
m&p-XYLENES	nd	nd	nd	nd	nd	nd	7.4	--	nd	nd
o-XYLENE	nd	nd	nd	nd	nd	nd	nd	--	nd	nd
SURROGATES (75-125% RECOVERY)										
DIBROMODIFLUOROMETHANE	102%	103%	108%	110%	107%	108%	92%	101%	106%	106%
1,2-DICHLOROETHANE-d4	112%	109%	110%	118%	114%	113%	100%	109%	109%	115%
4 BROMOFLUORO BENZENE	99%	106%	101%	101%	100%	101%	92%	108%	105%	109%

ND INDICATES NOT DETECTED AT A DETECTION LIMIT OF 1.0 UG/L-VAPOR FOR EACH COMPOUND

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

GEOFON PROJECT # 04-4428.10
JET PROPULSION LABORATORY
4800 OAK GROVE DRIVE
PASADENA, CA

HP Labs Project #GF022403-L6
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER
VOLATILE HALOGENATED AND AROMATIC HYDROCARBONS (EPA Method 8260) ANALYSES OF SOIL VAPOR
SOIL VAPOR DATA IN UG/L-VAPOR

	AMBIENT BLANK	SVW37-VPJ-009	SVW27-VPA-010	SVW27-VPB-011	SVW27-VPC-012	SVW27-VPD-013	SVW27-VPE-014	SVW27-VPF-015	SVW27-VPG-016	SVW27-VPI-017	SVW27-VPI-018 DUP
DATE	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03	02/25/03
ANALYSIS TIME	7:55	8:27	8:53	9:18	9:43	10:07	10:32	11:48	11:23	12:14	12:39
SAMPLING DEPTH (feet)	--	185	20	35	60	85	100	120	140	180	180
VOLUME WITHDRAWN (cc)	--	800	140	200	300	400	460	540	620	780	840
VOLUME INJECTED	20	20	20	20	20	20	20	20	20	20	20
DILUTION FACTOR	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05
CARBON TETRACHLORIDE	nd	nd	nd	nd	nd	nd	nd	nd	18	2.1	3.5
CHLOROETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
CHLOROFORM	nd	nd	nd	nd	nd	nd	nd	nd	nd	1.0	nd
1,1-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,2-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	2.6	nd	nd
CIS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRANS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
DICHLOROMETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TETRACHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	1.7	nd	nd
1,1,1,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,1-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRICHLORO ETHENE	nd	1.2	nd	nd	nd	nd	nd	nd	nd	1.8	1.3
VINYL CHLORIDE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRICHLOROFLUOROMETHANE (FR11)	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
DICHLORODIFLUOROMETHANE (FR12)	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	nd	nd	nd	nd	nd	nd	nd	nd	3.1	nd	nd
BENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
CHLOROBENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
ETHYLBENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TOLUENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
m&p-XYLENES	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
o-XYLENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
SURROGATES (75-125% RECOVERY)											
DIBROMODIFLUOROMETHANE	110%	108%	105%	117%	98%	109%	112%	118%	119%	117%	117%
1,2-DICHLOROETHANE-d4	111%	112%	110%	119%	104%	116%	114%	123%	125%	118%	123%
4 BROMOFLUORO BENZENE	104%	105%	106%	105%	94%	106%	112%	108%	113%	111%	118%

ND INDICATES NOT DETECTED AT A DETECTION LIMIT OF 1.0 UG/L-VAPOR FOR EACH COMPOUND

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

GEOFON PROJECT # 04-4428.10
JET PROPULSION LABORATORY
4800 OAK GROVE DRIVE
PASADENA, CA

HP Labs Project #GF022403-L6
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER
VOLATILE HALOGENATED AND AROMATIC HYDROCARBONS (EPA Method 8260) ANALYSES OF SOIL VAPOR
SOIL VAPOR DATA IN UG/L-VAPOR

	AMBIENT BLANK	SVW38-VPE-019	SVW38-VPF-020	SVW38-VPJ-021	SVW39-VPA-022	SVW39-VPC-023	SVW39-VPD-024	SVW39-VPE-025	SVW39-VPF-026	SVW39-VPI-027	SVW39-VPI-028 DUP
DATE	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03	02/26/03
ANALYSIS TIME	6:45	7:25	7:51	8:16	8:42	9:08	9:35	10:01	10:27	10:53	11:20
SAMPLING DEPTH (feet)	--	95	110	170	20	50	70	85	100	130	130
VOLUME WITHDRAWN (cc)	--	440	500	740	140	260	340	400	460	580	640
VOLUME INJECTED	20	20	20	20	20	20	20	20	20	20	20
DILUTION FACTOR	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05
CARBON TETRACHLORIDE	nd	nd	nd	nd	nd	nd	nd	1.3	2.2	1.0	1.0
CHLOROETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
CHLOROFORM	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,2-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
CIS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRANS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
DICHLOROMETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TETRACHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,1,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,1-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRICHLORO ETHENE	nd	nd	nd	1.3	nd	nd	nd	1.4	4.9	17	11
VINYL CHLORIDE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRICHLOROFLUOROMETHANE (FR11)	nd	nd	nd	1.1	nd	nd	nd	nd	nd	nd	nd
DICHLORODIFLUOROMETHANE (FR12)	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	nd	nd	1.1	1.2	nd	nd	nd	11	13	2.6	2.9
BENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
CHLOROBENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
ETHYLBENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
TOLUENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
m&p-XYLENES	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
o-XYLENE	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd	nd
SURROGATES (75-125% RECOVERY)											
DIBROMODIFLUOROMETHANE	112%	89%	90%	93%	88%	96%	97%	95%	91%	96%	92%
1,2-DICHLOROETHANE-d4	120%	97%	98%	101%	96%	101%	102%	103%	96%	102%	98%
4 BROMOFLUORO BENZENE	106%	92%	89%	94%	85%	93%	97%	91%	88%	95%	93%

ND INDICATES NOT DETECTED AT A DETECTION LIMIT OF 1.0 UG/L-VAPOR FOR EACH COMPOUND

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

GEOFON PROJECT # 04-4428.10
JET PROPULSION LABORATORY
4800 OAK GROVE DRIVE
PASADENA, CA

HP Labs Project #GF022403-L6
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER
VOLATILE HALOGENATED AND AROMATIC HYDROCARBONS (EPA Method 8260) ANALYSES OF SOIL VAPOR
SOIL VAPOR DATA IN UG/L-VAPOR

	AMBIENT BLANK	SVW35-VPE-029	SVW35-VPI-030	SVW36-VPB-031	SVW36-VPC-032	SVW26-VPF-033	SVW26-VPG-034	SVW26-VPH-035	SVW26-VPH-036 DUP
DATE	02/27/03	02/27/03	02/27/03	02/27/03	02/27/03	02/27/03	02/27/03	02/27/03	02/27/03
ANALYSIS TIME	7:44	8:15	8:41	9:07	9:33	9:58	10:24	10:49	11:14
SAMPLING DEPTH (feet)	--	80	140	35	55	115	140	160	160
VOLUME WITHDRAWN (cc)	--	380	620	200	280	520	620	700	760
VOLUME INJECTED	20	20	20	20	20	20	20	20	20
DILUTION FACTOR	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05
CARBON TETRACHLORIDE	nd	nd	nd	2.7	2.4	1.3	1.7	1.0	1.0
CHLOROETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
CHLOROFORM	nd	nd	nd	1.2	1.2	nd	1.2	nd	nd
1,1-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,2-DICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
CIS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRANS-1,2-DICHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
DICHLOROMETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
TETRACHLORO ETHENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,1,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2,2-TETRACHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,1-TRICHLORO ETHANE	nd	nd	nd	2.7	2.5	nd	nd	nd	nd
1,1,2-TRICHLORO ETHANE	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRICHLORO ETHENE	nd	nd	nd	12	11	nd	1.2	nd	nd
VINYL CHLORIDE	nd	nd	nd	nd	nd	nd	nd	nd	nd
TRICHLOROFLUOROMETHANE (FR11)	nd	nd	nd	nd	nd	nd	nd	nd	nd
DICHLORODIFLUOROMETHANE (FR12)	nd	nd	nd	nd	nd	nd	nd	nd	nd
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	nd	nd	3.9	nd	nd	nd	nd	nd	nd
BENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
CHLOROBENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
ETHYLBENZENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
TOLUENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
m&p-XYLENES	nd	nd	nd	nd	nd	nd	nd	nd	nd
o-XYLENE	nd	nd	nd	nd	nd	nd	nd	nd	nd
SURROGATES (75-125% RECOVERY)									
DIBROMODIFLUOROMETHANE	88%	92%	89%	95%	99%	93%	94%	96%	101%
1,2-DICHLOROETHANE-d4	94%	90%	92%	104%	106%	99%	101%	105%	102%
4 BROMOFLUORO BENZENE	89%	95%	93%	103%	103%	95%	94%	98%	92%

ND INDICATES NOT DETECTED AT A DETECTION LIMIT OF 1.0 UG/L-VAPOR FOR EACH COMPOUND

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

APPENDIX B-2

CHAIN-OF-CUSTODY FORMS

GEOFON
INCORPORATED
22632 GOLDEN SPRINGS DR., SUITE 270
DIAMOND BAR, CA 91765 • (909) 396-7662 • FAX (909) 396-1455

CHAIN-OF-CUSTODY RECORD

PROJECT FILE

GEOFON LAB COORDINATOR: LEO WILLIAMSON	LAB COORDINATOR'S PHONE: 909-396-7662	LAB COORDINATOR'S FAX: 909-396-1455	LABORATORY SERVICE ID: GF023403-L6	LABORATORY CONTACT: MARKE BURKE	MAIL REPORT (COMPANY NAME): GEOFON INC
PROJECT NAME: JPL #2	PROJECT LOCATION: QUARTERLY SVE MONITORING	PROJECT NUMBER: 04-4418.10	LABORATORY PHONE: 858-793-0401	LABORATORY FAX: 858-793-0404	RECIPIENT NAME: LEO WILLIAMSON
PROJECT CONTACT: LEO WILLIAMSON	PROJECT PHONE NUMBER: 714-920-8438	PROJECT FAX: N/A	LABORATORY ADDRESS: 432 N. CEDROS AVE		ADDRESS: 22632 GOLDEN SPRINGS
PROJECT ADDRESS: 4800 OAKGROVE DR	CITY, STATE AND ZIPCODE: PASADENA CA 91108	CLIENT: USNAVY SWDIV	CITY, STATE AND ZIPCODE: SOLANA BEACH CA 92075		CITY, STATE AND ZIPCODE: DIAMOND BAR CA 91
PROJECT MANAGER: ASLAN [illegible]	PROJECT MANAGER'S PHONE: 909-396-7662	PROJECT MANAGER'S FAX: 909-396-1455			

Analyses performed by 8260

Item	Sample Identifier	Matrix	Date	Time	Preserved	# of Cont.	QC Level	T.A.T.	Analyses 8010/8020							Comments
1	SVW33-VPD-001	AIR	2/24/03	0700	NONE	1*	3	NORM	X							1* 60 cc SYRINGE
2	SVW33-VPE-002			0720					X							
3	SVW33-VPF-003			0742					X							
4	SVW4-VPB-004			0805					X							
5	SVW4-VPD-005			0827					X							
6	SVW17-VPC-006			0850					X							
7	SVW32-VPH-007			0920					X							
8	SVW32-VPH-008 DUPLICATE			0942					X							DUPLICATE
9																
10																

SAMPLES COLLECTED BY: [signature]

COURIER AND AIR BILL NUMBER

RELINQUISHED BY: [signature]

RECEIVED BY: [signature]

DATE	TIME	
2-24-03	10:00	9001

COOLER TEMPERATURE UPON RECEIPT

SAMPLE'S CONDITION UPON RECEIPT

Distribution: White - Laboratory (To be returned with Analytical Report); Goldenrod - Project File; Yellow - Project Data Manager

GEOFON
INCORPORATED
22632 GOLDEN SPRINGS DR., SUITE 270
DIAMOND BAR, CA 91765 • (909) 396-7662 • FAX (909) 396-1455

CHAIN-OF-CUSTODY RECORD

PROJECT FILE

GEOFON LAB COORDINATOR: LED WILLIAMSON	LAB COORDINATOR'S PHONE: 909-396-7662	LAB COORDINATOR'S FAX: 909-396-1455	LABORATORY SERVICE ID: GF022403-66	LABORATORY CONTACT: MARK BURKE	MAIL REPORT (COMPANY NAME): GEOFON INC
PROJECT NAME: TPI #2	PROJECT LOCATION: QUARTERLY SVE MONITORING	PROJECT NUMBER: 04-4428-10	LABORATORY PHONE: 858-793-0401	LABORATORY FAX: 858-793-0404	RECIPIENT NAME: LED WILLIAMSON
PROJECT CONTACT: LED WILLIAMSON	PROJECT PHONE NUMBER: 714-920-8438	PROJECT FAX: N/A	LABORATORY ADDRESS: 432 N. CEDROS AVE		ADDRESS: 22632 GOLDEN SPRINGS DR
PROJECT ADDRESS: 4300 OAK GROVE DR	CITY, STATE AND ZIPCODE: PASADENA CA 91108	CLIENT: US NAVY SWDIV	CITY, STATE AND ZIPCODE: SOLANA BEACH CA 92075		CITY, STATE AND ZIPCODE: DIAMOND BAR CA 9176
PROJECT MANAGER: ASR AR FAHEEM	PROJECT MANAGER'S PHONE: 909-396-7662	PROJECT MANAGER'S FAX: 909-396-1455			

Item	Sample Identifier	Matrix	Date	Time	Preserved	# of Cont	QC Level	T.A.T	Analyses 8260							Comments
1	SVW27-VPI-009	AIR	2/25/03	0805	NONE	1*	3	NORM	X							1* 60cc SYRINGE
2	SVW27-VPA-010			0825					X							
3	SVW27-VPB-011			0847					X							
4	SVW27-VPC-012			0910					X							
5	SVW27-VPD-013			0932					X							
6	SVW27-VPE-014			0954					X							
7	SVW27-VPF-015			1017					X							
8	SVW27-VPG-016			1040					X							
9	SVW27-VPI-017			1102					X							
10	SVW27-VPI-018 DUPLICATE			1124					X							DUPLICATE

SAMPLES COLLECTED BY: [signature]

COURIER AND AIR BILL NUMBER:

RELINQUISHED BY	RECEIVED BY	DATE	TIME	COOLER TEMPERATURE UPON RECEIPT / SAMPLE'S CONDITION UPON RECEIPT
[signature]	[signature]	2-25-03	1200	Good

Distribution: White - Laboratory (To be returned with Analytical Report); Goldenrod - Project File; Yellow - Project Data Manager

GEOFON INCORPORATED

22632 GOLDEN SPRINGS DR., SUITE 270
DIAMOND BAR, CA 91765 • (909) 396-7662 • FAX (909) 396-1455

CHAIN-OF-CUSTODY RECORD

PROJECT FILE

GEOFON's LAB COORDINATOR: LEO WILLIAMSON	LAB COORDINATOR'S PHONE: 909-396-7662	LAB COORDINATOR'S FAX: 909-396-1455	LABORATORY SERVICE ID: GF02.2403-16	LABORATORY CONTACT: MARK BURKE	MAIL REPORT (COMPANY NAME): GEOFON INC
PROJECT NAME: TPI #2	PROJECT LOCATION: QUARTERLY SVE MONITORING	PROJECT NUMBER: 04-4429-10	LABORATORY PHONE: 858-793-0401	LABORATORY FAX: 858-793-0404	RECIPIENT NAME: LEO WILLIAMSON
PROJECT CONTACT: LEO WILLIAMSON	PROJECT PHONE NUMBER: 714-970-8438	PROJECT FAX: N/A	LABORATORY ADDRESS: 432 AVENIDAS AVE		ADDRESS: 22632 GOLDEN SPRINGS DR
PROJECT ADDRESS: 4801 OAKRIDGE DR	CITY, STATE AND ZIPCODE: FULLERTON CA 91108	CLIENT: US NAVY SOUTHDIV	CITY, STATE AND ZIPCODE: SOLANA BEACH 92075		CITY, STATE AND ZIPCODE: DIAMOND BAR CA 91765
PROJECT MANAGER: ASEAD FAHMY	PROJECT MANAGER'S PHONE: 909-396-7662	PROJECT MANAGER'S FAX: 909-396-1455			

Item	Sample Identifier	Matrix	Date	Time	Preserved	# of Cont.	QC Level	T.A.T.	Analyses 8260	Comments
1	SVW38-VPE-019	AIR	2/26/03	0700	NONE	1*	3	NORM	X	1* 60cc SYRINGE
2	SVW38-VPE-020			0722					X	
3	SVW38-VPI-021			0744					X	
4	SVW39-VPA-022			0806					X	
5	SVW39-VPC-023			0830					X	
6	SVW39-VPD-024			0852					X	
7	SVW39-VPE-025			0915					X	
8	SVW39-VPF-026			0937					X	
9	SVW39-VPI-027			1000					X	
10	SVW39-VPI-028 DUPLICATE			1022					X	DUPLICATE

SAMPLES COLLECTED BY:

RELINQUISHED BY:

COURIER AND AIR BILL NUMBER:

RECEIVED BY:

DATE: 2-26-03

TIME: 1240

COOLER TEMPERATURE UPON RECEIPT:

SAMPLE'S CONDITION UPON RECEIPT: Good

Distribution: White - Laboratory (To be returned with Analytical Report); Goldenrod - Project File; Yellow - Project Data Manager

GEOFON INCORPORATED

22632 GOLDEN SPRINGS DR., SUITE 270
DIAMOND BAR, CA 91765 • (909) 396-7662 • FAX (909) 396-1455

CHAIN-OF-CUSTODY RECORD

PROJECT FILE

GEOFON LAB COORDINATOR: LEO WILLIAMSON	LAB COORDINATOR'S PHONE: 909-396-7662	LAB COORDINATOR'S FAX: 909-396-1455	LABORATORY SERVICE ID: GEO2403-16	LABORATORY CONTACT: MARK BURKE	MAIL REPORT (COMPANY NAME): GEOFON INC
PROJECT NAME: IRL #2	PROJECT LOCATION: QUARTERLY GW MONITORING	PROJECT NUMBER: 04-4428.10	LABORATORY PHONE: 858-793-0401	LABORATORY FAX: 858-793-0404	RECIPIENT NAME: LEO WILLIAMSON
PROJECT CONTACT: LEO WILLIAMSON	PROJECT PHONE NUMBER: 714-920-9138	PROJECT FAX: N/A	LABORATORY ADDRESS: 432 N. CEDROS AVE		ADDRESS: 22632 GOLDEN SPRINGS
PROJECT ADDRESS: 4800 OAK GROVE DR	CITY, STATE AND ZIPCODE: PASADENA CA 91105	CLIENT: US NAVY SWDIV	CITY, STATE AND ZIPCODE: SOLANA BEACH CA 92075		CITY, STATE AND ZIPCODE: DIAMOND BAR CA 9176
PROJECT MANAGER: ANNE RAMSEY	PROJECT MANAGER'S PHONE: 909-396-7662	PROJECT MANAGER'S FAX: 909-396-1455			

Item	Sample Identifier	Matrix	Date	Time	Preserved	# of Cont.	QC Level	T.A.T	Analyses 8260	Comments
1	SVW33-VPE-029	AIR	2/17/05	0755	NONE	1*	3	NORM	X	1* 60cc SYRINGE
2	SVW33-VPI-030			0815					X	
3	SVW36-VPB-031			0837					X	
4	SVW36-VPC-032			0900					X	
5	SVW26-VPF-033			0922					X	
6	SVW26-VPG-034			0944					X	
7	SVW26-VPH-035			1007					X	
8	SVW26-VPH-036 DUPLICATE			1030					X	DUPLICATE
9										
10										

SAMPLES COLLECTED BY:

RELINQUISHED BY:

COURIER AND AIR BILL NUMBER:

RECEIVED BY: [signature]

DATE: 2-17-05 TIME: 1200

COOLER TEMPERATURE UPON RECEIPT:

SAMPLE'S CONDITION UPON RECEIPT: Good

Distribution: White - Laboratory (To be returned with Analytical Report); Goldenrod - Project File; Yellow - Project Data Manager

APPENDIX B-3

DAILY OPENING, CLOSING, AND CONTINUING CALIBRATION VERIFICATION REPORTS

QA/QC CALIBRATION DATA

DATE: 02/24/03
HP Labs Project #GF022403-L6
LAB-6

SUPPLY SOURCE: CONTINUING CALIBRATION (OPENING) SUPELCO LOT #LSS-690
SUPPLY SOURCE: QUALITY CONTROL (CLOSING) SUPELCO LOT #LSS-687
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER

	OPENING STANDARD			2ND SOURCE (1ug/L) CLOSING		
COMPOUND	MASS	RESULT	%DIFF	MASS	RESULT	%DIFF
CARBON TETRACHLORIDE	50	54.0	8.0%	1.0	1.08	8.0%
CHLOROFORM	50	51.6	3.2%	1.0	1.07	7.0%
1,1-DICHLORO ETHANE	50	51.5	3.0%	1.0	1.13	13.0%
1,2-DICHLORO ETHANE	50	53.2	6.4%	1.0	1.15	15.0%
1,1-DICHLORO ETHENE	50	48.9	2.2%	1.0	1.12	12.0%
CIS-1,2-DICHLORO ETHENE	50	50.6	1.2%	1.0	1.05	5.0%
TRANS-1,2-DICHLORO ETHENE	50	50.9	1.8%	1.0	1.09	9.0%
DICHLOROMETHANE	50	51.5	3.0%	1.0	1.11	11.0%
TETRACHLORO ETHENE	50	49.9	0.2%	1.0	1.05	5.0%
1,1,1,2-TETRACHLORO ETHANE	50	52.6	5.2%	1.0	1.01	1.0%
1,1,2,2-TETRACHLORO ETHANE	50	54.8	9.6%	1.0	1.21	21.0%
1,1,1-TRICHLORO ETHANE	50	53.6	7.2%	1.0	1.09	9.0%
1,1,2-TRICHLORO ETHANE	50	51.5	3.0%	1.0	1.12	12.0%
TRICHLORO ETHENE	50	50.7	1.4%	1.0	1.07	7.0%
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	50	49.7	0.6%	1.0	1.07	7.0%
BENZENE	50	49.6	0.8%	1.0	1.10	10.0%
CHLOROBENZENE	50	50.5	1.0%	1.0	1.03	3.0%
ETHYLBENZENE	50	48.4	3.2%	1.0	0.99	1.0%
TOLUENE	50	50.0	0.0%	1.0	1.03	3.0%
m&p-XYLENES	100	97.5	2.5%	2.0	1.93	3.5%
o-XYLENE	50	47.7	4.6%	1.0	0.97	3.0%

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

QA/QC CALIBRATION DATA

DATE: 02/25/03
HP Labs Project #GF022403-L6
LAB-6

SUPPLY SOURCE: CONTINUING CALIBRATION (OPENING) SUPELCO LOT #LSS-690
SUPPLY SOURCE: QUALITY CONTROL (CLOSING) SUPELCO LOT #LSS-687
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER

	OPENING STANDARD			2ND SOURCE (1ug/L) CLOSING		
COMPOUND	MASS	RESULT	%DIFF	MASS	RESULT	%DIFF
CARBON TETRACHLORIDE	50	57.2	14.4%	1.0	1.16	16.0%
CHLOROFORM	50	56.5	13.0%	1.0	1.20	20.0%
1,1-DICHLORO ETHANE	50	57.3	14.6%	1.0	1.22	22.0%
1,2-DICHLORO ETHANE	50	56.9	13.8%	1.0	1.19	19.0%
1,1-DICHLORO ETHENE	50	54.5	9.0%	1.0	1.20	20.0%
CIS-1,2-DICHLORO ETHENE	50	55.1	10.2%	1.0	1.11	11.0%
TRANS-1,2-DICHLORO ETHENE	50	55.3	10.6%	1.0	1.19	19.0%
DICHLOROMETHANE	50	56.5	13.0%	1.0	1.25	25.0%
TETRACHLORO ETHENE	50	54.5	9.0%	1.0	1.20	20.0%
1,1,1,2-TETRACHLORO ETHANE	50	55.1	10.2%	1.0	1.16	16.0%
1,1,2,2-TETRACHLORO ETHANE	50	58.3	16.6%	1.0	1.28	28.0%
1,1,1-TRICHLORO ETHANE	50	57.0	14.0%	1.0	1.16	16.0%
1,1,2-TRICHLORO ETHANE	50	56.4	12.8%	1.0	1.15	15.0%
TRICHLORO ETHENE	50	54.1	8.2%	1.0	1.12	12.0%
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	50	53.9	7.8%	1.0	1.15	15.0%
BENZENE	50	54.9	9.8%	1.0	1.19	19.0%
CHLOROBENZENE	50	53.3	6.6%	1.0	1.15	15.0%
ETHYLBENZENE	50	52.5	5.0%	1.0	1.12	12.0%
TOLUENE	50	52.5	5.0%	1.0	1.22	22.0%
m&p-XYLENES	100	103.0	3.0%	2.0	2.31	15.5%
o-XYLENE	50	50.7	1.4%	1.0	1.08	8.0%

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

QA/QC CALIBRATION DATA

DATE: 02/26/03
HP Labs Project #GF022403-L6
LAB-6

SUPPLY SOURCE: CONTINUING CALIBRATION (OPENING) SUPELCO LOT #LSS-690
SUPPLY SOURCE: QUALITY CONTROL (CLOSING) SUPELCO LOT #LSS-687
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER

	OPENING STANDARD			2ND SOURCE (1ug/L) CLOSING		
COMPOUND	MASS	RESULT	%DIFF	MASS	RESULT	%DIFF
CARBON TETRACHLORIDE	50	55.4	10.8%	1.0	0.88	12.0%
CHLOROFORM	50	53.6	7.2%	1.0	0.90	10.0%
1,1-DICHLORO ETHANE	50	55.2	10.4%	1.0	0.96	4.0%
1,2-DICHLORO ETHANE	50	52.4	4.8%	1.0	0.96	4.0%
1,1-DICHLORO ETHENE	50	54.0	8.0%	1.0	1.00	0.0%
CIS-1,2-DICHLORO ETHENE	50	50.9	1.8%	1.0	0.85	15.0%
TRANS-1,2-DICHLORO ETHENE	50	52.2	4.4%	1.0	0.89	11.0%
DICHLOROMETHANE	50	52.7	5.4%	1.0	1.03	3.0%
TETRACHLORO ETHENE	50	52.8	5.6%	1.0	0.92	8.0%
1,1,1,2-TETRACHLORO ETHANE	50	54.2	8.4%	1.0	0.96	4.0%
1,1,2,2-TETRACHLORO ETHANE	50	51.8	3.6%	1.0	1.02	2.0%
1,1,1-TRICHLORO ETHANE	50	53.8	7.6%	1.0	0.87	13.0%
1,1,2-TRICHLORO ETHANE	50	49.1	1.8%	1.0	1.05	5.0%
TRICHLORO ETHENE	50	51.0	2.0%	1.0	0.89	11.0%
TRICHLOROFLUOROMETHANE (FR11)	50	61.3	22.6%	1.0	1.25	25.0%
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	50	54.8	9.6%	1.0	0.85	15.0%
BENZENE	50	52.8	5.6%	1.0	1.01	1.0%
CHLOROBENZENE	50	51.0	2.0%	1.0	0.97	3.0%
ETHYLBENZENE	50	50.2	0.4%	1.0	0.93	7.0%
TOLUENE	50	51.2	2.4%	1.0	1.02	2.0%
m&p-XYLENES	100	99.3	0.7%	2.0	1.94	3.0%
o-XYLENE	50	48.2	3.6%	1.0	0.97	3.0%

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

QA/QC CALIBRATION DATA

DATE: 02/27/03
HP Labs Project #GF022403-L6
LAB-6

SUPPLY SOURCE: CONTINUING CALIBRATION (OPENING) SUPELCO LOT #LSS-690
SUPPLY SOURCE: QUALITY CONTROL (CLOSING) SUPELCO LOT #LSS-687
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER

	OPENING STANDARD			2ND SOURCE (1ug/L) CLOSING		
COMPOUND	MASS	RESULT	%DIFF	MASS	RESULT	%DIFF
CARBON TETRACHLORIDE	50	48.8	2.4%	1.0	0.96	4.0%
CHLOROFORM	50	47.9	4.2%	1.0	0.86	14.0%
1,1-DICHLORO ETHANE	50	50.6	1.2%	1.0	0.94	6.0%
1,2-DICHLORO ETHANE	50	50.3	0.6%	1.0	0.98	2.0%
1,1-DICHLORO ETHENE	50	47.8	4.4%	1.0	0.93	7.0%
CIS-1,2-DICHLORO ETHENE	50	46.5	7.0%	1.0	0.91	9.0%
TRANS-1,2-DICHLORO ETHENE	50	47.9	4.2%	1.0	0.93	7.0%
DICHLOROMETHANE	50	49.6	0.8%	1.0	0.96	4.0%
TETRACHLORO ETHENE	50	47.8	4.4%	1.0	0.91	9.0%
1,1,1,2-TETRACHLORO ETHANE	50	49.5	1.0%	1.0	0.95	5.0%
1,1,2,2-TETRACHLORO ETHANE	50	47.4	5.2%	1.0	0.98	2.0%
1,1,1-TRICHLORO ETHANE	50	47.3	5.4%	1.0	0.93	7.0%
1,1,2-TRICHLORO ETHANE	50	48.6	2.8%	1.0	0.97	3.0%
TRICHLORO ETHENE	50	45.3	9.4%	1.0	0.93	7.0%
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	50	46.7	6.6%	1.0	0.90	10.0%
BENZENE	50	47.1	5.8%	1.0	0.93	7.0%
CHLOROBENZENE	50	47.1	5.8%	1.0	0.96	4.0%
ETHYLBENZENE	50	44.8	10.4%	1.0	0.86	14.0%
TOLUENE	50	41.6	16.8%	1.0	0.91	9.0%
m&p-XYLENES	100	87.9	12.1%	2.0	1.80	10.0%
o-XYLENE	50	44.4	11.2%	1.0	0.87	13.0%

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS

SOIL GAS INITIAL LCS STANDARD REPORT (CALIBRATION VERIFICATION)

LAB: Lab 6
SUPPLY SOURCE: SUPELCO LOT #LSS-690
INSTRUMENT: AGILENT 6850 GC / 5973 MASS SPECTROMETER

COMPOUND	CAL DATE	MASS	RT	RESULT	%DIFF
CARBON TETRACHLORIDE	2/14/2003	50	8.5	49.5	1.1%
CHLOROFORM	2/14/2003	50	8.1	49.6	0.8%
1,1-DICHLORO ETHANE	2/14/2003	50	7.4	51.2	2.4%
1,2-DICHLORO ETHANE	2/14/2003	50	8.6	54.4	8.8%
1,1-DICHLORO ETHENE	2/14/2003	50	6.4	48.9	2.2%
CIS-1,2-DICHLORO ETHENE	2/14/2003	50	7.9	50.4	0.8%
TRANS-1,2-DICHLORO ETHENE	2/14/2003	50	7.1	50.8	1.6%
DICHLOROMETHANE	2/14/2003	50	6.8	49.0	2.0%
TETRACHLORO ETHENE	2/14/2003	50	10.8	50.5	1.0%
1,1,1,2-TETRACHLORO ETHANE	2/14/2003	50	11.7	51.6	3.2%
1,1,2,2-TETRACHLORO ETHANE	2/14/2003	50	12.7	53.6	7.2%
1,1,1-TRICHLORO ETHANE	2/14/2003	50	8.4	49.7	0.6%
1,1,2-TRICHLORO ETHANE	2/14/2003	50	10.6	52.4	4.8%
TRICHLORO ETHENE	2/14/2003	50	9.2	53.4	6.8%
1,1,2-TRICHLOROTRIFLUOROETHANE (FR113)	2/14/2003	50	6.3	55.7	11.4%
BENZENE	2/14/2003	50	8.7	47.7	4.6%
ETHYLBENZENE	2/14/2003	50	11.7	45.3	9.4%
TOLUENE	2/14/2003	50	10.3	46.3	7.4%
m&p-XYLENES	2/14/2003	100	11.7	89.2	10.8%
o-XYLENE	2/14/2003	50	12.2	44.8	10.4%

ANALYSES PERFORMED ON-SITE IN CA DOHS MOBILE LABORATORY (CERT #1561)
ANALYSES PERFORMED BY: MARK BURKE
DATA REVIEWED BY: TAMARA DAVIS