



Chevron

April 25, 1994

Chevron U.S.A. Products Company
2410 Camino Ramon
San Ramon, CA 94583
P.O. Box 5004
San Ramon, CA 94583-0804

Marketing Department
Phone 510 842 9500

Ms. Jennifer Eberle
Alameda County Health Care Services
Department of Environmental Health
80 Swan Way, Room 200
Oakland, CA 94621

**Re: Former Gulf Service Station #0006
460 Grand Avenue, Oakland, CA**

Dear Ms. Eberle:

Enclosed is the Soil Excavation and Remediation Report dated March 11, 1994, prepared by our consultant Touchstone Developments for the above referenced site. This work was performed in accordance with the work plan dated October 27, 1993, prepared by our consultant Pacific Environmental Group.

Approximately 800 cubic yards of soil in the vicinity of the former underground waste oil tanks, pump islands, and oil-water separator was excavated and disposed of at appropriate off-site facilities. As indicated in the report, residual hydrocarbon concentrations remain in the soil along the northern and southern property boundaries as excavation was limited in these directions. Excavation was limited to the north by a retaining wall and to the south by Grand Avenue. All analytical data is summarized in Tables A, B, and C of the report.

Based on the data collected to date, it appears that no further soils work is warranted nor possible at this time. We are currently working with the property owner to develop a mutually agreeable timetable for the installation of additional wells as set forth in the ~~January 15~~, 1993, work plan by Pacific Environmental Group. *Feb 17*

If you have any questions or comments, please do not hesitate to call me at (510) 842-8134.

Sincerely,
CHEVRON U.S.A. PRODUCTS COMPANY



Mark A. Miller
Site Assessment and Remediation Engineer

Enclosure

cc: Mr. Rich Hiett, RWQCB - Bay Area
Mr. Jon Robbins - CHVPKV/V1156
Ms. B.C. Owen

94 APR 28 PM 1:06

HAZMAT
ALCO

Mr. John C. Gibson
Adams, Gibson & MacPhee
22 Battery Street, 10th Floor
San Francisco, CA 94111

File: GULF6 EX RPT1



SOIL EXCAVATION AND REMEDIATION REPORT

for

**Former Gulf Service Station No. 0006
460 Grand Avenue
Oakland, California**

Prepared for

**Chevron U.S.A. Products Company
2410 Camino Ramon
San Ramon, California 94583**

by

Touchstone Developments

March 11, 1994



March 11, 1994

Chevron U.S.A. Products Company
2410 Camino Ramon
San Ramon, California 94583

Attention: Mark Miller

Reference: Soil Excavation and Remediation Report
Former Gulf 0006
460 Grand Avenue
Oakland, California

Gentlemen:

INTRODUCTION

This report prepared by Touchstone Developments (TD) documents soil excavation and remediation activities performed at the above referenced location (Figure 1) as previously outlined in Pacific Environmental Group, Inc.'s Work Plan dated October 27, 1993. ✓ Soil excavation and remediation activities were performed on January 3, 1994 through January 21, 1994. Remedial efforts were directed at areas where soil contamination was identified from underground storage tank (UST) removal sampling as documented in Treadwell and Rollo, Inc.'s report dated January 29, 1991. During overexcavation activities another waste oil tank (Approximately 250 gallons) was discovered and removed on January 5, 1994 (Figure 1). ✓

SITE ACTIVITIES

Soil remediation involved the excavation and removal of suspected hydrocarbon contaminated soil in the vicinity of the former underground waste oil storage tanks, oil-water separator and pump islands (Figure 1). Excavation activities were performed by Golden West Builders of Livermore, California and a representative from TD was also on site to observe excavation activities and to collect soil samples from the excavation and associated stockpiles. Representatives Jennifer Eberle, Barney Chan and Susan Hugo from Alameda County Health Agency (ACHA) were present at various times our excavation sampling activities.

On January 5, 1995 a 250 gallon steel single wall waste oil tank was removed. ✓ Gary Collins from Oakland's Fire Department and Jennifer Eberle with ACHA were on site to ob-

serve the tank being removed and samples collected. Also present was Mark Miller representing Chevron U.S.A. Products Company.

Soil Sampling

Verification soil samples were collected from the excavation bottom and sidewalls at various depths. Soil samples were collected from the excavator bucket by removing the top few inches of soil and pushing a clean, six-inch-long (Two inches in diameter) brass sample tube into the soil until completely full. The ends of the tubes were covered with aluminum foil and sealed with plastic end caps. The samples were then labeled, placed in a cooler with ice, entered on a Chain-of-Custody form and transported to Superior Precision Analytical, Inc., a State-certified Laboratory located in Martinez, California.

Soil samples collected from the waste oil tank and oil-water separator excavations and associated stockpiles were analyzed for Total Petroleum Hydrocarbons (TPH) calculated as gasoline and diesel according to EPA Method 8015 (Modified), Benzene, Toluene, Ethylbenzene and Xylenes (BTEX) according to EPA Method 8020, Total Oil and Grease (TOG) according to EPA Method 5520F, Volatile Organic Compounds (VOCs) according to EPA Method 8010, Semi-volatile Organic Compounds according to EPA Method 8270 and ICAP Metals according to EPA Method 6010 (Additional metals were analyzed for some stockpile samples for disposal purposes). The soil samples collected from the pump island overexcavation and associated stockpiles were analyzed for TPH-gasoline and BTEX. One stockpile sample was additionally analyzed for Organic Lead for disposal purposes. Sample depths and analytical summaries are found in Tables A and B. Copies of the analytical laboratory reports and Chain-of-Custody forms are presented in Appendix A.

Four discrete stockpile samples were collected for approximately every 100 cubic yards of soil generated. The four samples were then composited in the laboratory and analyzed as one. These samples were collected by removing the top 10 to 14 inches of soil, then pushing a sample tube into the soil until completely full. The samples were sealed, labeled and handled as described above.

SOIL EXCAVATION AND REMEDIATION

The excavation in the vicinity of the former waste oil tanks was performed from January 3, 1994 through January 21, 1994. The excavation was approximately 51 feet long by 32 feet at the widest location and 8 feet in depth (Figure 1). Soil

samples designated WX-1 through WX-8 and WO-1 through WO-11 were collected from the waste oil tank overexcavation sidewalls at approximately 3 to 6 feet below grade as shown in Figures 2 and 3. Groundwater was encountered between 5 1/2 to 7 feet below grade in this excavation.

The excavation in the oil-water separator area was performed January 3, 1994. Final excavation dimensions were approximately 5 to 9 feet wide, 14 feet long and 7 feet in depth. Sidewall samples designated SM-1, SM-2 and SM-3 were collected at approximately 5 feet below grade and one bottom sample designated SM-B collected at approximately 7 feet below grade in this area as shown in Figures 2 and 3.

The pump island overexcavation was approximately 30 feet in width, 37 feet long and approximately 8 feet in depth along the eastern half of the excavation and as deep as approximately 12 feet along the western portion of the excavation. Sidewall samples were designated IX-1 through IX-22 and were collected from approximately 3 to 10 feet below grade. Samples IB-1 through IB-3 were collected from the excavation bottom approximately 7 to 9 feet below grade as shown in Figures 2 and 3. Groundwater was encountered at approximately 9 1/2 feet below grade in this excavation.

Stockpile Remediation

The soil stockpiles generated from the waste oil tank overexcavation activities were sampled (designated SP-2a-d and SP-3a-d) and represent approximately 350 cubic yards of soil. The soil stockpile originally represented by sample SP-1a-d from previous excavation activities (See TD report dated January 12, 1993) was also profiled for disposal and is included in the total volume estimate for disposal at Forward Landfill located in Stockton, California. Soils were transported by Stamco/Allwaste Trucking during January 1994 to Forward.

how
much?
doc.?

The soils generated from the pump island excavation were characterized by samples designated SP-4a-d through SP-8a-d and represent approximately 425 to 500 cubic yards. These stockpiles were aerated and resampled designated ASP-4a-d through ASP-8a-d. These stockpiles were then profiled for disposal at Redwood Landfill located in Novato, California. On January 27 and 31, 1994. 400 ppm

were they
dispersed?
yes

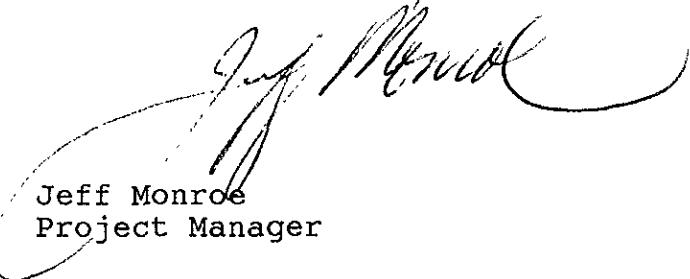
EXCAVATION COMPLETION

Upon excavation completion, clean imported material was used to backfill the excavation.

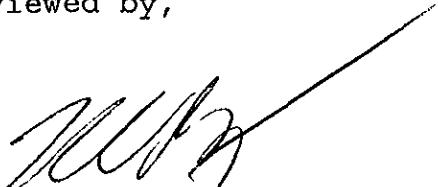
Page 4

If you have questions, please call me at (707) 538-8818.

Touchstone Developments by,


Jeff Monroe
Project Manager

Reviewed by,


Marc W. Seeley
CEG 1014

MWS/JLM/jlm

Figure 1: Site Plan

Figure 2: Site Plan with Excavation and Sample Locations in Progress

Figure 3: Final Excavation and Sample Locations

Figure 4: Aerated Stockpile and Sample Locations

Table A: Overexcavation Sample Summary

Table B: Stockpile Sample Summary

Appendix A: Analytical Reports and Chain-of-Custody Form

Table A: Analytical Summary for Over-excavation Samples (in ppm)

Waste Oil Tank Excavation Sampling Results

| Sample ID | Depth (FT) | TPH-gas | Benzene | Toluene | Ethyl Benzene | Xylenes | TPH-D | TOG | 8010 | 8270 | Metals |
|-----------|------------|---------|---------|---------|---------------|---------|----------|---------|------|------|--------|
| WX-1 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | ND ✓ | ✓ 2 ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WX-2 ✓ | 5.5 ✓ | ND ✓ | ND ✓ | ND | ND | ND ✓ | ✓ ND ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WX-3 ✓ | 3 ✓ | 30 ✓ | ND ✓ | ND | ND | 0.95 ✓ | ✓ 1300 ✓ | ✓ 970 ✓ | • ✓ | • ✓ | • |
| WX-4 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | ND ✓ | ✓ 470 ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WX-5 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | ND ✓ | ✓ 24 ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WX-6 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | ND ✓ | ✓ 3 ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WX-7 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | ND | ✓ 14 ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WX-8 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | ND ✓ | ✓ 2 ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WO-1 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | 0.008 ✓ | ✓ ND ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WO-2 ✓ | 6 ✓ | ND ✓ | ND ✓ | ND | ND | 0.011 ✓ | ✓ ND ✓ | ND ✓ | ND ✓ | ND ✓ | • |
| WO-3 ✓ | 6.5 ✓ | 170 ✓ | ND ✓ | ND | 0.36 | 0.34 ✓ | ✓ 4400 ✓ | ✓ 120 ✓ | ND ✓ | ND ✓ | • |
| WO-4 ✓ | 6.5 ✓ | 27 ✓ | ND ✓ | 0.007 | 0.064 | 0.18 ✓ | ✓ 130 ✓ | ✓ 210 ✓ | ND ✓ | ND ✓ | • |
| WO-5 ✓ | 5 ✓ | ND ✓ | ND ✓ | ND | ND | 0.005 ✓ | ✓ ND ✓ | ND ✓ | NA | NA | NA |
| WO-6 ✓ | 5 ✓ | 5* ✓ | ND ✓ | ND | ND | 0.011 ✓ | ✓ 17* ✓ | ND ✓ | NA | NA | NA |
| WO-7 ✓ | 5 ✓ | 16* ✓ | ND ✓ | 0.008 | ND | 0.066 ✓ | ✓ 51* ✓ | ND ✓ | NA | NA | NA |
| WO-8 ✓ | 4.5 ✓ | 10* ✓ | 0.005 ✓ | 0.007 | 0.007 | 0.031 ✓ | ✓ 200* ✓ | ND ✓ | NA | NA | NA |
| WO-9 ✓ | 5.5 ✓ | 49 ✓ | 0.077 ✓ | 0.71 | 0.99 | 6.43 ✓ | ✓ 10 ✓ | ND ✓ | • ✓ | ND ✓ | NA |
| WO-10 ✓ | 5 ✓ | 18 ✓ | ND ✓ | ND | 0.084 | 0.36 ✓ | ✓ 90 ✓ | ND ✓ | ND ✓ | ND ✓ | NA |
| WO-11 ✓ | 4.5 ✓ | ND ✓ | ND ✓ | ND | ND | 0.006 ✓ | ✓ 2 ✓ | ND ✓ | ND ✓ | ND ✓ | NA |

Pump Island Excavation Sampling Results

| Sample ID | Depth (FT) | TPH-gas | Benzene | Toluene | Ethyl Benzene | Xylenes |
|-----------|------------|---------|---------|---------|---------------|---------|
| IX-1 | 9 ✓ | ND ✓ | ND ✓ | ND | ND | ND |
| IX-2 | 7 ✓ | ND ✓ | ND ✓ | ND | ND | ND |
| IX-3 | 9 ✓ | ND ✓ | ND ✓ | ND | ND | ND |
| IX-4 | 6.5 ✓ | 18 ✓ | 0.97 ✓ | 2.2 | 0.4 | 2.5 |
| IX-5 | 8.5 ✓ | 1900 ✓ | 2 ✓ | 11 | 15 | 66 |
| IX-6 | 3 ✓ | 390 ✓ | 1.3 ✓ | 5.8 | 1.9 | 8.7 |
| IX-7 | 7 ✓ | 84 ✓ | 0.89 ✓ | 3.2 | 2.6 | 16 |
| IX-8 | 8 ✓ | 4 ✓ | 0.73 ✓ | 0.62 | 0.12 | 0.62 |
| IX-9 | 7 ✓ | ND ✓ | ND ✓ | ND | ND | 0.008 |
| IX-10 | 7 ✓ | ND ✓ | ND ✓ | ND | ND | ND |
| IX-11 | 5 ✓ | 3 ✓ | 0.6 ✓ | 0.24 | 0.087 | 0.5 |
| IX-12 | 9 ✓ | 2600 ✓ | 12 ✓ | 120 | 46 | 240 |
| IX-13 | 5.5 ✓ | 21 ✓ | 0.41 ✓ | 0.077 | 0.19 | 0.13 |
| IX-14 | 10 ✓ | 7 ✓ | 1 ✓ | 0.92 | 0.2 | 0.78 |
| IX-15 | 5 ✓ | 9 ✓ | 1.2 ✓ | 1.2 | 0.13 | 0.68 |
| IX-16 | 9.5 ✓ | 780 ✓ | 3.7 ✓ | 31 | 20 | 100 |
| IX-17 | 6 ✓ | 7 ✓ | 0.25 ✓ | 1.2 | 0.32 | 1.9 |
| IX-18 | 4 ✓ | 15 ✓ | 0.18 ✓ | 0.49 | 0.52 | 3.1 |
| IX-19 | 6.5 ✓ | ND ✓ | 0.11 ✓ | 0.01 | 0.055 | 0.029 |
| IX-20 | 5 ✓ | ND ✓ | ND ✓ | 0.006 | ND | 0.008 |
| IX-21 | 6 ✓ | 900 ✓ | 1.7 ✓ | 35 | 16 | 110 |
| IX-22 | 6 ✓ | 14 ✓ | 0.26 ✓ | 0.94 | 0.17 | 1.5 |

* = see certified analytical reports

NA = analysis not requested

ND = not detected

TPH-gas = Total petroleum hydrocarbons calculated as gasoline

TPH-D = Total petroleum hydrocarbons calculated as diesel

TOG = Total oil and grease

HITS

✓ hits left in place

highest hits:

1,300 TPHd WX-3

970 TOG WX-3

2,600 TPHg IX-12

12 benzene IX-12

3 bgs

9 bgs

Table B: Analytical Summary for Hoist & Sump Excavation Samples (in ppm)

Hoist Sampling Results

| Sample ID | Depth (FT) | TPH-gas | Benzene | Toluene | Ethyl Benzene | Xylenes | TPH-D | TOG | 8010 | 8270 | Metals |
|-----------|------------|---------|---------|---------|---------------|---------|-------|------|------|------|--------|
| H-N ✓ | 7 ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | * |
| H-S ✓ | 8 ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | * |

1-3-94

Oil-Water Separator Sampling Results

| Sample ID | Depth (FT) | TPH-gas | Benzene | Toluene | Ethyl Benzene | Xylenes | TPH-D | TOG | 8010 | 8270 | Metals |
|-----------|------------|---------|---------|---------|---------------|---------|-------|------|------|------|--------|
| SM-B ✓ | 7 ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | * |
| SM-1 ✓ | 5 ✓ | 1 ✓ | ND ✓ | ND ✓ | ND ✓ | 0.012 | 10 ✓ | ND ✓ | * | ND ✓ | * |
| SM-2 ✓ | 5 ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | 3 ✓ | ND ✓ | ND ✓ | ND ✓ | * |
| SM-3 ✓ | 5 ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | ND ✓ | 5 ✓ | ND ✓ | ND ✓ | ND ✓ | * |

1-3-94

Table C: Analytical Summary for Stockpile Samples (in ppm)

Stockpile Sampling Results

| Sample ID | TPH-gas | Benzene | Toluene | Ethyl Benzene | Xylenes | TPH-D | TOG | 8010 | 8270 | Metals |
|-----------|---------|---------|---------|---------------|---------|--------|--------|------|------|--------|
| SP-2a-d ✓ | 47 ✓ | ND ✓ | 0.093 | 0.26 | 1.9 | 1200 ✓ | 2500 ✓ | * | ND ✓ | * |
| SP-3a-d ✓ | 33 ✓ | ND ✓ | 0.065 | 0.54 | 0.17 | 220 ✓ | 100 ✓ | * | ND ✓ | * |
| SP-4a-d ✓ | 150 ✓ | ND ✓ | 3 | 3 | 20 | NA | NA | NA | NA | ND |
| SP-5a-d ✓ | 1300 ✓ | 0.8 ✓ | 30 | 21 | 120 | NA | NA | NA | NA | NA |
| SP-6a-d ✓ | 2600 ✓ | 1.8 ✓ | 86 | 40 | 230 | NA | NA | NA | NA | NA |
| SP-7a-d ✓ | 130* ✓ | ND ✓ | 2.2 | 2.9 | 20 | NA | NA | NA | NA | NA |
| SP-8a-d ✓ | 180* ✓ | ND ✓ | 1.4 | 3.5 | 27 | NA | NA | NA | NA | NA |

waste oil
1-5-94
Pump Island
1-20

20X STLC
ND Soluble Pb
ND org. Po

Aerated Stockpile Sampling Results

| Sample ID | TPH-gas | Benzene | Toluene | Ethyl Benzene | Xylenes |
|------------|---------|---------|---------|---------------|---------|
| SP-4a-d ✓ | 33 ✓ | ND ✓ | 0.096 | 0.086 | 1 |
| SP-5a-d ✓ | 88 ✓ | 0.006 ✓ | 0.19 | 0.19 | 2.4 |
| ASP-6a-d ✓ | 36 ✓ | ND ✓ | 0.11 | 0.067 | 0.72 |
| ASP-7a-d ✓ | 53 ✓ | ND ✓ | 0.059 | 0.23 | 1.8 |
| ASP-8a-d ✓ | 14 ✓ | 0.29 ✓ | 0.89 | 0.27 | 1.3 |

* = see certified analytical reports

NA = analysis not requested

ND = not detected

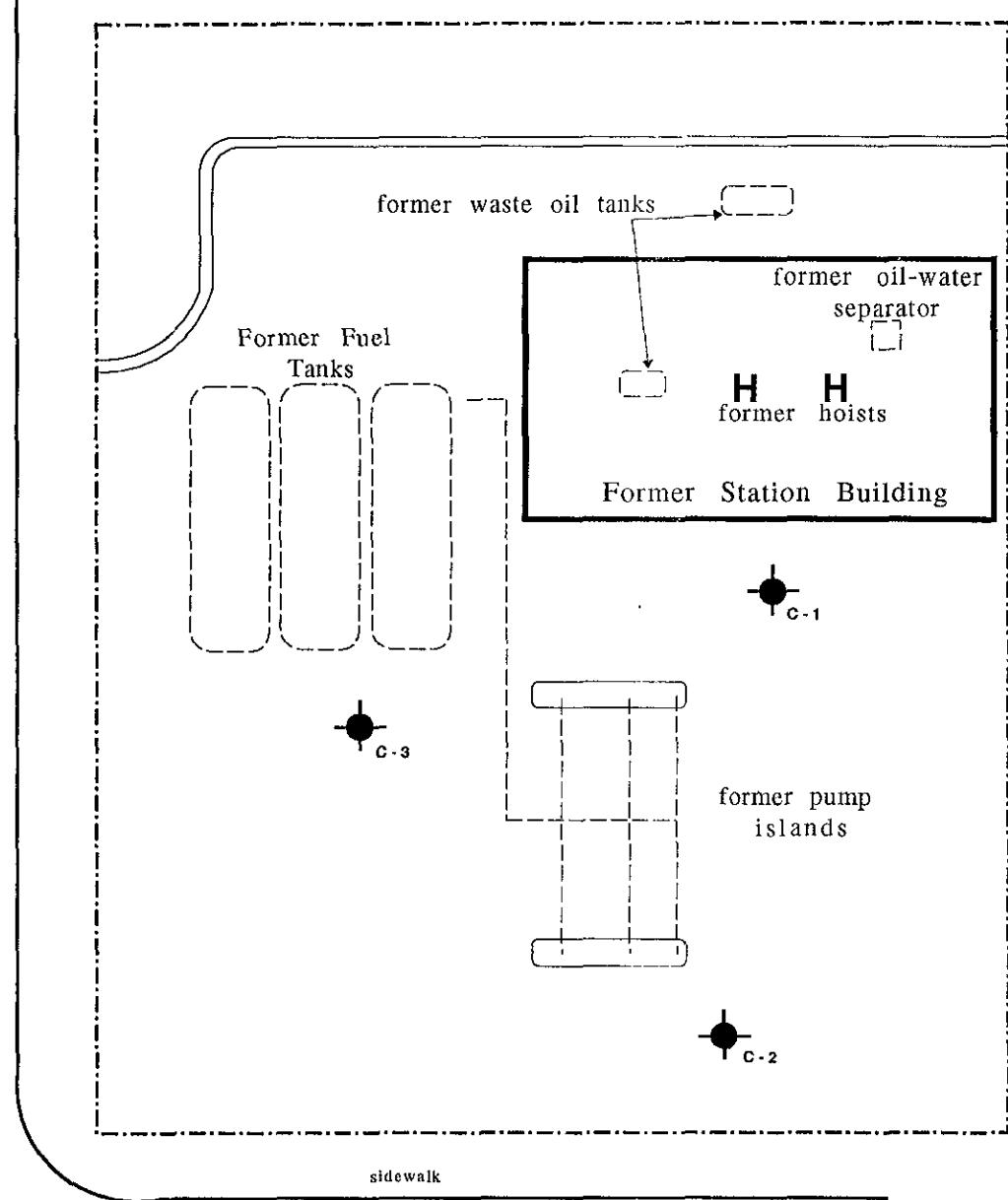
TPH-gas = Total petroleum hydrocarbons calculated as gasoline

TPH-D = Total petroleum hydrocarbons calculated as diesel

TOG = Total oil and grease

hits

Bellevue Avenue



scale 1" = 20'



**Touchstone
Developments**
Environmental Management

Site Plan
460 Grand Avenue
Oakland, California

LEGEND



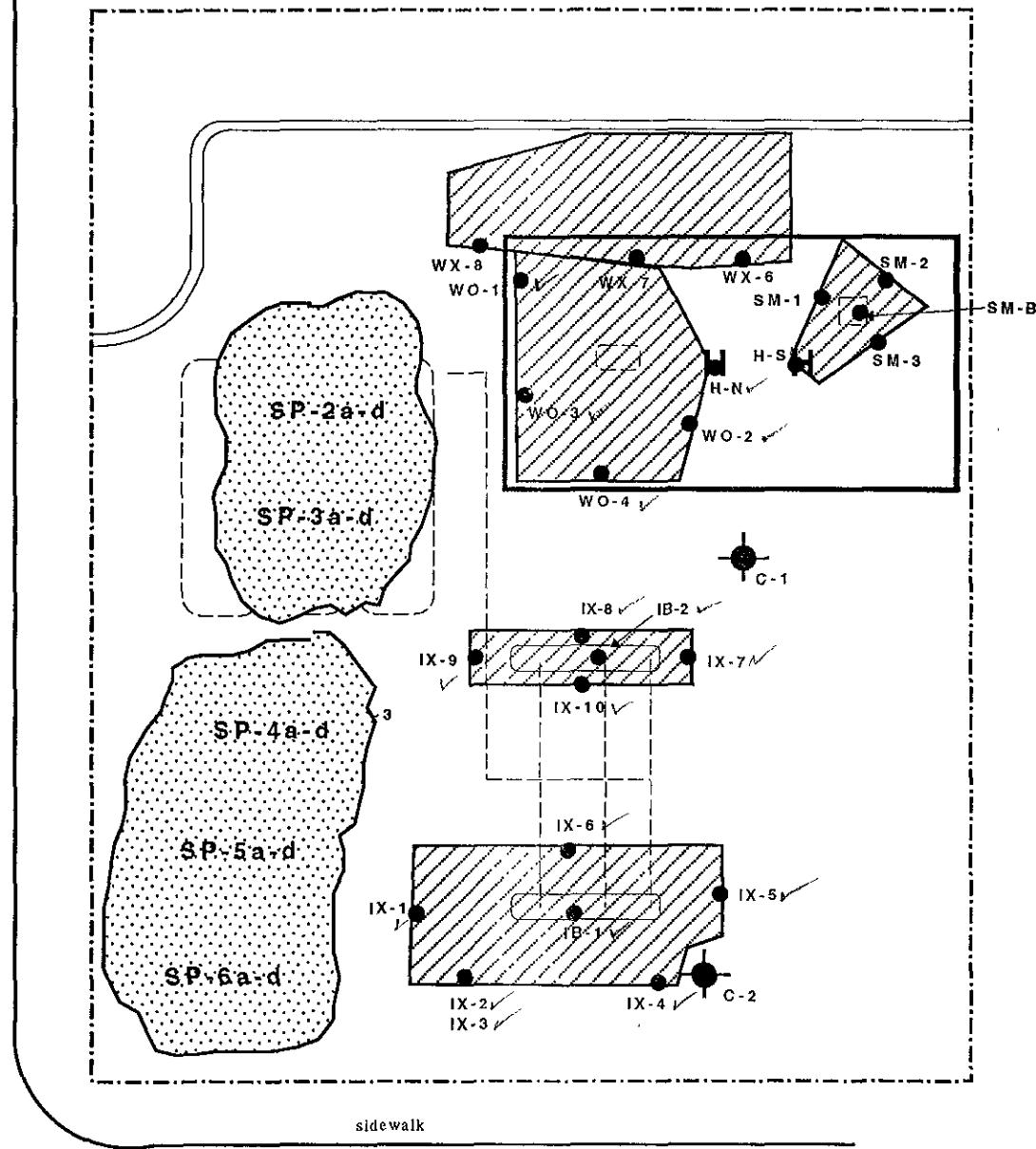
Figure 1

3-13-94

mjt

Project Number 0006-2

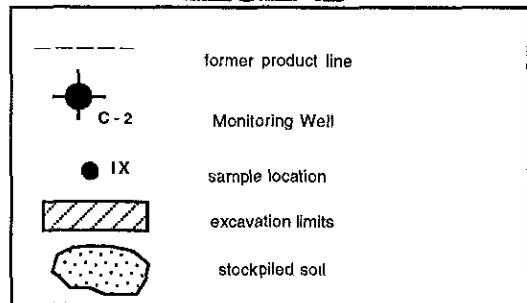
Bellevue Avenue



Grand Avenue

scale 1" = 20'

LEGEND



**Touchstone
Developments**
Environmental Management

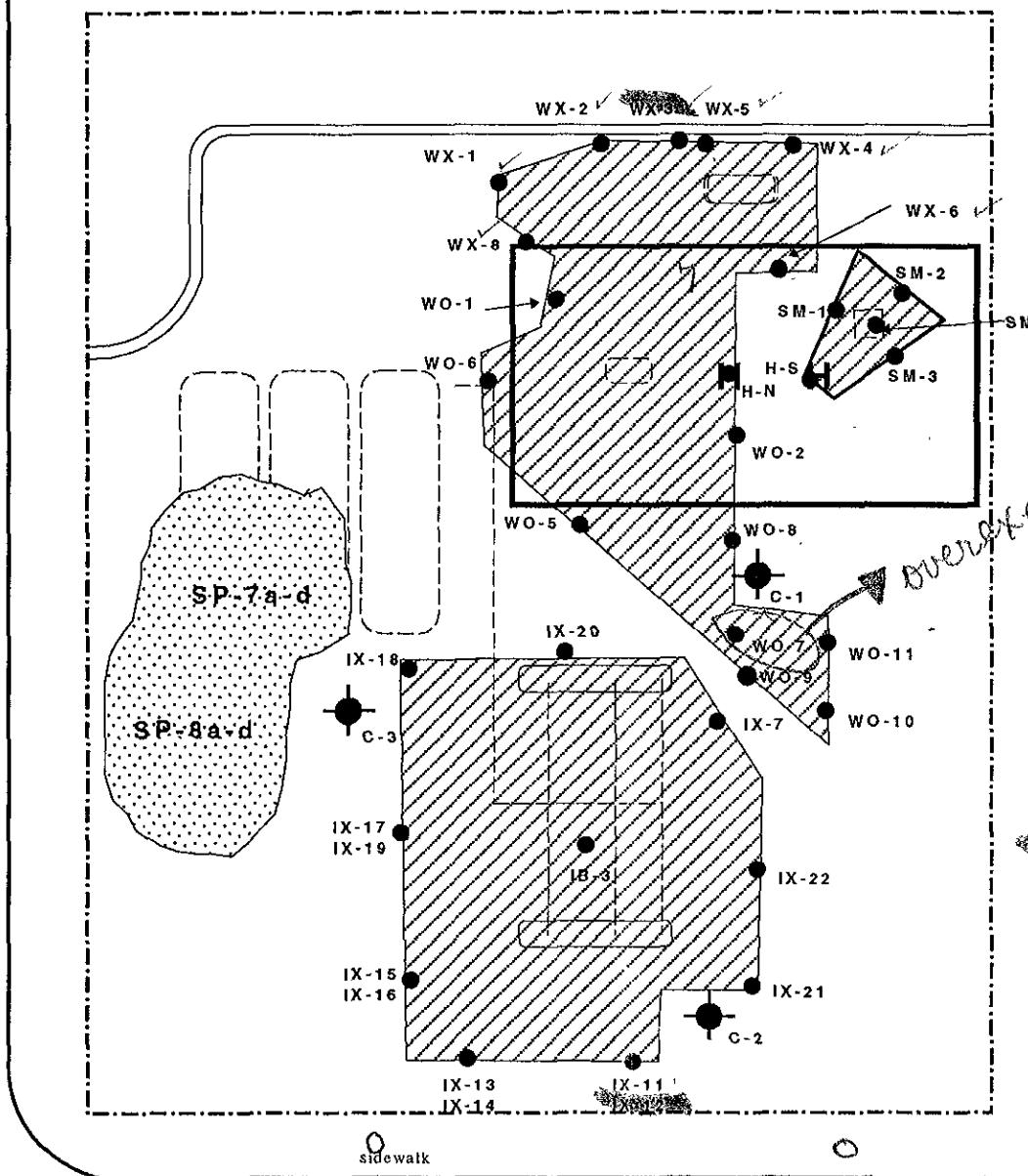
**Excavation & Sampling
in progress**
460 Grand Avenue
Oakland, California

Figure 2

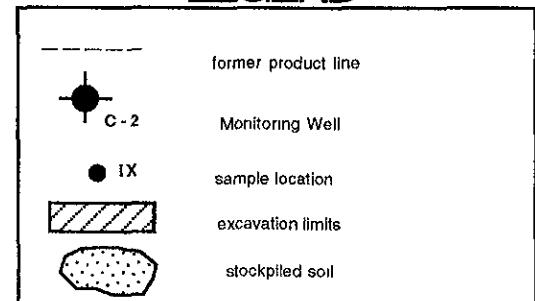
3-13-94 mjt

Project Number 0006-2

Bellevue Avenue



LEGEND



scale 1" = 20'



**Touchstone
Developments**
Environmental Management

**Final Excavation &
Sample Locations**
460 Grand Avenue
Oakland, California

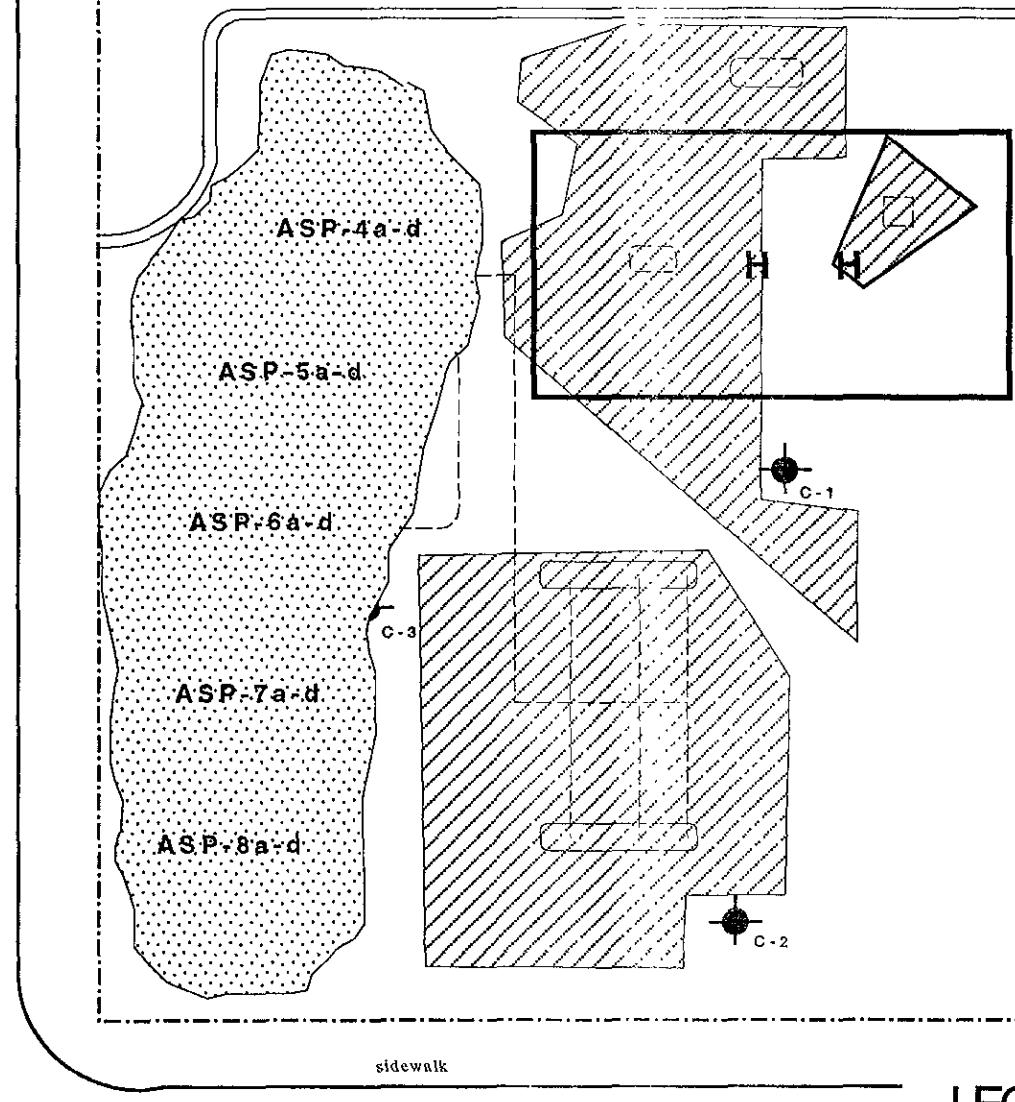
Figure 3

3-13-94

mjt

Project Number 0006-2

Bellevue Avenue

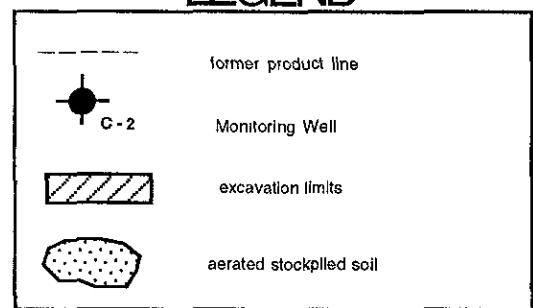


Grand Avenue



scale 1" = 20'

LEGEND



**Touchstone
Developments**
Environmental Management

Aerated Stockpile &
Sample Locations
460 Grand Avenue
Oakland, California

Figure 4

3-13-94 mjt

Project Number 0006-2

APPENDIX A:

Certified Analytical Reports and Chain-of-Custody forms



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 11-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

Chronology

Laboratory Number 15078

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------|
| WX-1 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 1 |
| WX-2 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 2 |
| WX-3 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 3 |
| WX-4 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 4 |
| WX-5 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 5 |
| WX-6 | 01/03/94 | 01/04/94 | / / | 01/10/94 | | 6 |
| WX-7 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 7 |
| WX-8 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 8 |
| SM-B | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 9 |
| SM-1 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 10 |
| SM-2 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 11 |
| SM-3 | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 12 |
| H-S | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 13 |
| H-N | 01/03/94 | 01/04/94 | / / | 01/07/94 | | 14 |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 11-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 1 | WX-1 | Soil |
| 15078- 2 | WX-2 | Soil |
| 15078- 3 | WX-3 | Soil |
| 15078- 4 | WX-4 | Soil |
| 15078- 5 | WX-5 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 1 15078- 2 15078- 3 15078- 4 15078- 5

| | | | | |
|-------------------------|-------|-------|-------|-------|
| Chloromethane/Vinyl Ch: | ND<10 | ND<10 | ND<10 | ND<10 |
| Bromomethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Chloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Trichlorofluoromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Dichloromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| t-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| c-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Chloroform: | ND<5 | ND<5 | ND<5 | ND<5 |
| ✓1,1,1-Trichloroethane: | ND<5 | ND<5 | 42 | ND<5 |
| Carbon tetrachloride: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Trichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| c-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloropropane: | ND<5 | ND<5 | ND<5 | ND<5 |
| t-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Bromodichloromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| ✓1,1,2-Trichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| ✓Tetrachloroethene: | ND<5 | ND<5 | 74 | ND<5 |
| Dibromochloromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Chlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Bromoform: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,2,2-Tetrachloroeth: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,3-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| ✓1,2-Dichlorobenzene: | ND<5 | ND<5 | 48 | ND<5 |
| 1,4-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 11-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
|-------------------|-----------------------|--------|

| | | |
|----------|------|------|
| 15078- 6 | WX-6 | Soil |
| 15078- 7 | WX-7 | Soil |
| 15078- 8 | WX-8 | Soil |
| 15078- 9 | SM-B | Soil |
| 15078-10 | SM-1 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 6 15078- 7 15078- 8 15078- 9 15078-10

| | | | | | |
|-------------------------|-------|-------|-------|-------|-------|
| Chloromethane/Vinyl Ch: | ND<10 | ND<10 | ND<10 | ND<10 | ND<10 |
| Bromomethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Chloroethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Trichlorofluoromethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Dichloromethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| t-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| c-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Chloroform: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,1-Trichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Carbon tetrachloride: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Trichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| c-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloropropane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| t-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Bromodichloromethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,2-Trichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Tetrachloroethene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Dibromochloromethane: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Chlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Bromoform: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,2,2-Tetrachloroeth: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,3-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,4-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 | ND<5 |
| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg | ug/Kg |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 11-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078-11 | SM-2 | Soil |
| 15078-12 | SM-3 | Soil |
| 15078-13 | H-S | Soil |
| 15078-14 | H-N | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078-11 15078-12 15078-13 15078-14

| | | | | |
|-------------------------|-------|-------|-------|-------|
| Chloromethane/Vinyl Ch: | ND<10 | ND<10 | ND<10 | - |
| Bromomethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Chloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Trichlorofluoromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Dichloromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| t-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| c-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Chloroform: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,1-Trichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Carbon tetrachloride: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Trichloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| c-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloropropane: | ND<5 | ND<5 | ND<5 | ND<5 |
| t-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Bromodichloromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,2-Trichloroethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Tetrachloroethene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Dibromochloromethane: | ND<5 | ND<5 | ND<5 | ND<5 |
| Chlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Bromoform: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,1,2,2-Tetrachloroeth: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,3-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,2-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| 1,4-Dichlorobenzene: | ND<5 | ND<5 | ND<5 | ND<5 |
| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg |



Superior Precision Analytical, Inc.

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HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010. Quality Assurance and Control Data - Soil

Laboratory Number 15078

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| Chloromethane/Vinyl Ch: | ND<10 | 10 | | | |
| Bromomethane: | ND<5 | 5 | | | |
| Chloroethane: | ND<5 | 5 | | | |
| Trichlorofluoromethane: | ND<5 | 5 | | | |
| 1,1-Dichloroethene: | ND<5 | 5 | 105/111 | 65-154 | 6% |
| Dichloromethane: | ND<5 | 5 | | | |
| t-1,2-Dichloroethene: | ND<5 | 5 | | | |
| 1,1-Dichloroethane: | ND<5 | 5 | | | |
| c-1,2-Dichloroethene: | ND<5 | 5 | | | |
| Chloroform: | ND<5 | 5 | | | |
| 1,1,1-Trichloroethane: | ND<5 | 5 | | | |
| Carbon tetrachloride: | ND<5 | 5 | | | |
| 1,2-Dichloroethane: | ND<5 | 5 | | | |
| Trichloroethene: | ND<5 | 5 | 96/95 | 73-161 | 1% |
| c-1,3-Dichloropropene: | ND<5 | 5 | | | |
| 1,2-Dichloropropane: | ND<5 | 5 | | | |
| t-1,3-Dichloropropene: | ND<5 | 5 | | | |
| Bromodichloromethane: | ND<5 | 5 | | | |
| 1,1,2-Trichloroethane: | ND<5 | 5 | | | |
| Tetrachloroethene: | ND<5 | 5 | | | |
| Dibromochloromethane: | ND<5 | 5 | | | |
| Chlorobenzene: | ND<5 | 5 | 111/109 | 92-136 | 2% |
| Bromoform: | ND<5 | 5 | | | |
| 1,1,2,2-Tetrachloroeth: | ND<5 | 5 | | | |
| 1,3-Dichlorobenzene: | ND<5 | 5 | | | |
| 1,2-Dichlorobenzene: | ND<5 | 5 | | | |
| 1,4-Dichlorobenzene: | ND<5 | 5 | | | |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 15078

Michael R. Vuong
Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 11-January-1994

ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC
by EPA Method SW-846 6010

Chronology

Laboratory Number 15078

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------|
| WX-1 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 1 |
| WX-2 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 2 |
| WX-3 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 3 |
| WX-4 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 4 |
| WX-5 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 5 |
| WX-6 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 6 |
| WX-7 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 7 |
| WX-8 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 8 |
| SM-B | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 9 |
| SM-1 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 10 |
| SM-2 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 11 |
| SM-3 | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 12 |
| H-S | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 13 |
| H-N | 01/03/94 | 01/04/94 | 01/06/94 | 01/07/94 | | 14 |



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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 11-January-1994

ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 1 | WX-1 | Soil |
| 15078- 2 | WX-2 | Soil |
| 15078- 3 | WX-3 | Soil |
| 15078- 4 | WX-4 | Soil |
| 15078- 5 | WX-5 | Soil |
| 15078- 6 | WX-6 | Soil |
| 15078- 7 | WX-7 | Soil |
| 15078- 8 | WX-8 | Soil |
| 15078- 9 | SM-B | Soil |
| 15078-10 | SM-1 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 1 15078- 2 15078- 3 15078- 4 15078- 5

| | | | | | | |
|------------|--------|--------|--------|-----|--------|--------|
| Cadmium ✓ | (Cd) : | ND<0.5 | ND<0.5 | 0.7 | ND<0.5 | ND<0.5 |
| Chromium ✓ | (Cr) : | 20 | 28 | 32 | 23 | 22 |
| Lead ✓ | (Pb) : | ND<5 | ND<5 | 12 | ND<5 | ND<5 |
| Nickel ✓ | (Ni) : | 28 | 26 | 42 | 25 | 28 |
| Zinc ✓ | (Zn) : | 35 | 32 | 55 | 33 | 32 |

Concentration: mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg

Laboratory Number: 15078- 6 15078- 7 15078- 8 15078- 9 15078-10

| | | | | | | |
|------------|--------|--------|------|------|-----|--------|
| Cadmium ✓ | (Cd) : | ND<0.5 | 0.6 | 0.6 | 0.7 | ND<0.5 |
| Chromium ✓ | (Cr) : | 23 | 29 | 37 | 55 | 33 |
| Lead ✓ | (Pb) : | ND<5 | ND<5 | ND<5 | 7 | ND<5 |
| Nickel ✓ | (Ni) : | 23 | 31 | 45 | 69 | 29 |
| Zinc ✓ | (Zn) : | 48 | 38 | 55 | 79 | 40 |

Concentration: mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg

metal
bits



TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONRÖE

Project 0006-1
Reported 11-January-1994

ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078-11 | SM-2 | Soil |
| 15078-12 | SM-3 | Soil |
| 15078-13 | H-S | Soil |
| 15078-14 | H-N | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078-11 15078-12 15078-13 15078-14

| | | | | | |
|----------------|--------|--------|-------|-------|-------|
| Cadmium | (Cd) : | ND<0.5 | 0.9 | 10.8 | 0.7 |
| Chromium | (Cr) : | 28 | 39 | 58 | 27 |
| Lead | (Pb) : | ND<5 | 7 | 10 | 6 |
| Nickel | (Ni) : | 30 | 36 | 74 | 51 |
| Zinc | (Zn) : | 47 | 53 | 83 | 51 |
| Concentration: | | mg/Kg | mg/Kg | mg/Kg | mg/Kg |



ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC
Quality Assurance and Control Data - Soil

Laboratory Number 15078

| Compound | Method | Blank (mg/Kg) | RL (mg/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|----------|--------|------------------|---------------|--------------------------|---------------|------------|
| Cadmium | (Cd) : | ND<0.5 | 0.5 | 94/92 | 75-125 | 2% |
| Chromium | (Cr) : | ND<5 | 5 | 92/93 | 75-125 | 1% |
| Lead | (Pb) : | ND<5 | 5 | 97/96 | 75-125 | 1% |
| Nickel | (Ni) : | ND<5 | 5 | 90/88 | 75-125 | 2% |
| Zinc | (Zn) : | ND<5 | 5 | 97/97 | 75-125 | 0% |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

mg/Kg = Parts per million (ppm)

QC File No. 15078

Mushal R. Verone

Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 01/09/94
Revised 01/12/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed Matrix |
|----------|-----------------------|----------|-----------------|
| 15078- 1 | WX-1 | 01/03/94 | 01/07/94 Soil |
| 15078- 2 | WX-2 | 01/03/94 | 01/07/94 Soil |
| 15078- 3 | WX-3 | 01/03/94 | 01/07/94 Soil |
| 15078- 4 | WX-4 | 01/03/94 | 01/10/94 Soil |
| 15078- 5 | WX-5 | 01/03/94 | 01/08/94 Soil |
| 15078- 6 | WX-6 | 01/03/94 | 01/08/94 Soil |
| 15078- 7 | WX-7 | 01/03/94 | 01/08/94 Soil |
| 15078- 8 | WX-8 | 01/03/94 | 01/08/94 Soil |
| 15078- 9 | SM-B | 01/03/94 | 01/08/94 Soil |
| 15078-10 | SM-1 | 01/03/94 | 01/08/94 Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 1 15078- 2 15078- 3 15078- 4 15078- 5 15078- 6 15078- 7 15078- 8 15078- 9 15078- 10

| | Concentration: | mg/kg | mg/kg | mg/kg | mg/kg |
|-----------------|----------------|---------|---------|---------|---------|
| Gasoline: | ND<1 | ND<1 | 30 | ND<1 | ND<1 |
| Benzene: | ND<.005 | ND<.005 | ND<0.05 | ND<.005 | ND<.005 |
| Toluene: | ND<.005 | ND<.005 | ND<0.05 | ND<.005 | ND<.005 |
| Ethyl Benzene: | ND<.005 | ND<.005 | ND<0.05 | ND<.005 | ND<.005 |
| Total Xylenes: | ND<.005 | ND<.005 | 0.95 | ND<.005 | ND<.005 |
| Diesel: | 2 | ND<1 | 1300 | 470 | 24 |
| Oil and Grease: | ND<50 | ND<50 | 970 | ND<50 | ND<50 |

Laboratory Number: 15078- 6 15078- 7 15078- 8 15078- 9 15078-10

| | Concentration: | mg/kg | mg/kg | mg/kg | mg/kg |
|-----------------|----------------|---------|---------|---------|---------|
| Gasoline: | ND<1 | ND<1 | ND<1 | ND<1 | 1 |
| Benzene: | ND<.005 | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Toluene: | ND<.005 | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Ethyl Benzene: | ND<.005 | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Total Xylenes: | ND<.005 | ND<.005 | ND<.005 | ND<.005 | 0.012 |
| Diesel: | 3 | 14 | 2 | ND<1 | 10 |
| Oil and Grease: | ND<50 | ND<50 | ND<50 | ND<50 | ND<50 |



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 01/09/94
Revised 01/12/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed Matrix |
|----------|-----------------------|----------|-----------------|
| 15078-11 | SM-2 | 01/03/94 | 01/08/94 Soil |
| 15078-12 | SM-3 | 01/03/94 | 01/08/94 Soil |
| 15078-13 | H-S | 01/03/94 | 01/08/94 Soil |
| 15078-14 | H-N | 01/03/94 | 01/08/94 Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078-11 15078-12 15078-13 15078-14

| | | | | |
|-----------------|---------|---------|---------|---------|
| Gasoline: | ND<1 | ND<1 | ND<1 | ND<1 |
| Benzene: | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Toluene: | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Ethyl Benzene: | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Total Xylenes: | ND<.005 | ND<.005 | ND<.005 | ND<.005 |
| Diesel: | 3 | 5 | ND<1 | ND<1 |
| Oil and Grease: | ND<50 | ND<50 | ND<50 | ND<50 |
| Concentration: | mg/kg | mg/kg | mg/kg | mg/kg |



ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 3 of 3
QA/QC INFORMATION
SET: 15078

TPH - mg

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:
Minimum Detection Limit in Soil: 50mg/kg

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:
Minimum Quantitation Limit for Diesel in Soil: 1mg/kg

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:
Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTXE
Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|-----------------|-----------------|-----|---------------|
| Gasoline: | 101/89 | 13% | 75-125 |
| Benzene: | 82/80 | 2% | 72-125 |
| Toluene: | 91/91 | 0% | 75-125 |
| Ethyl Benzene: | 90/92 | 2% | 75-125 |
| Total Xylenes: | 94/94 | 0% | 75-125 |
| Diesel: | 124/124 | 0% | 48-162 |
| Oil and Grease: | 84/83 | 1% | 75-125 |



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 06-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Laboratory Number 15078 | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------------------------|-------|
| WX-1 | 01/03/94 | 01/04/94 | 01/04/94 | 01/06/94 | | | 1 |
| WX-2 | 01/03/94 | 01/04/94 | 01/04/94 | 01/06/94 | | | 2 |
| WX-3 | 01/03/94 | 01/04/94 | 01/04/94 | 01/06/94 | | | 3 |
| WX-4 | 01/03/94 | 01/04/94 | 01/04/94 | 01/06/94 | | | 4 |
| WX-5 | 01/03/94 | 01/04/94 | 01/04/94 | 01/06/94 | | | 5 |
| WX-6 | 01/03/94 | 01/04/94 | 01/04/94 | 01/06/94 | | | 6 |
| WX-7 | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 7 |
| WX-8 | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 8 |
| SM-B | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 9 |
| SM-1 | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 10 |
| SM-2 | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 11 |
| SM-3 | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 12 |
| H-S | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 13 |
| H-N | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | | 14 |



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 06-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 1 | WX-1 | Soil |
| 15078- 2 | WX-2 | Soil |
| 15078- 3 | WX-3 | Soil |
| 15078- 4 | WX-4 | Soil |
| 15078- 5 | WX-5 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 1 15078- 2 15078- 3 15078- 4 15078- 5

| | | | | | |
|----------------------------|--------|---------|---------|--------|--------|
| bis(2-chloroethyl)ethane: | ND<330 | ND<3300 | ND<330 | ND<330 | ND<330 |
| aniline: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| phenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2-chlorophenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 1,3-dichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 1,4-dichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 1,2-dichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| benzyl alcohol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| bis-(2-chloroisopropyl): | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2-methylphenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| hexachloroethane: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| n-nitroso-di-n-propyl: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-methylphenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| nitrobenzene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| isophorone: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2-nitrophenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2,4-dimethylphenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| bis(2-chloroethoxy)met: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2,4-dichlorophenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 1,2,4-trichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| naphthalene: | ND<330 | ND<330 | 3600 | ND<330 | ND<330 |
| benzoic acid: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-chloroaniline: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| hexachlorobutadiene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-chloro-3-methylpheno: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2-methyl-naphthalene: | ND<330 | ND<330 | 5200 | ND<330 | ND<330 |
| hexachlorocyclopentadiene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2,4,6-trichlorophenol: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2,4,5-trichlorophenol: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg ug/Kg



TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
|-------------------|-----------------------|--------|

| | | |
|----------|------|------|
| 15078- 1 | WX-1 | Soil |
| 15078- 2 | WX-2 | Soil |
| 15078- 3 | WX-3 | Soil |
| 15078- 4 | WX-4 | Soil |
| 15078- 5 | WX-5 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 1 15078- 2 15078- 3 15078- 4 15078- 5

| | | | | | |
|-------------------------|---------|---------|----------|---------|---------|
| 2-chloronaphthalene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2-nitroaniline: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| acenaphthylene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| dimethylphthalate: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2,6-dinitrotoluene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| acenaphthene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 3-nitroaniline: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| 2,4-dinitrophenol: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| dibenzofuran: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 2,4-dinitrotoluene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-nitrophenol: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| fluorene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-chlorophenyl-phenyle: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| diethylphthalate: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-nitroaniline: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| 4,6-dinitro-2-methylph: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| n-nitrosodiphenylamine: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 4-bromo-phenyl-phenyle: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| hexachlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| pentachlorophenol: | ND<800 | ND<800 | ND<8000 | ND<800 | ND<800 |
| phenanthrene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| anthracene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| di-n-butylphthalate: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| fluoranthene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| benzidine: | ND<1700 | ND<1700 | ND<17000 | ND<1700 | ND<1700 |
| pyrene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| butylbenzylphthalate: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| 3,3'-dichlorobenzidine: | ND<660 | ND<660 | ND<6600 | ND<660 | ND<660 |
| benzo[a]anthracene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg ug/Kg



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 1 | WX-1 | Soil |
| 15078- 2 | WX-2 | Soil |
| 15078- 3 | WX-3 | Soil |
| 15078- 4 | WX-4 | Soil |
| 15078- 5 | WX-5 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 1 15078- 2 15078- 3 15078- 4 15078- 5

| | 15078- 1 | 15078- 2 | 15078- 3 | 15078- 4 | 15078- 5 |
|-------------------------|----------|----------|----------|----------|----------|
| chrysene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| bis(2-ethylhexyl)phtha: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| di-n-octylphthalate: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| benzo(b,k)fluoranthene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| benzo[a]pyrene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| indeno[1,2,3-cd]pyrene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| dibenzo[a,h]anthracene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |
| benzo[g,h,i]anthracene: | ND<330 | ND<330 | ND<3300 | ND<330 | ND<330 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg ug/Kg

-- Surrogate % Recoveries --

| | | | | | |
|-----------------------|----|----|----|----|-----|
| 2-fluorophenol: | 61 | 63 | 79 | 54 | 68 |
| phenol-d6: | 69 | 68 | 89 | 62 | 78 |
| nitrobenzene-d5: | 60 | 62 | 84 | 53 | 72 |
| 2-fluorobiphenyl: | 63 | 63 | 77 | 55 | 75 |
| 2,4,6-tribromophenol: | 85 | 83 | 99 | 78 | 104 |
| terphenyl-d14: | 68 | 68 | 79 | 54 | 76 |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 6 | WX-6 | Soil |
| 15078- 7 | WX-7 | Soil |
| 15078- 8 | WX-8 | Soil |
| 15078- 9 | SM-B | Soil |
| 15078-10 | SM-1 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 6 15078- 7 15078- 8 15078- 9 15078-10

| | | | | | |
|-----------------------------|--------|--------|--------|--------|--------|
| bis(2-chloroethyl)ethane: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| aniline: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| phenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-chlorophenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,3-dichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,4-dichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,2-dichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| benzyl alcohol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| bis-(2-chloroisopropyl): | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-methylphenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachloroethane: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| n-nitroso-di-n-propylamine: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-methylphenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| nitrobenzene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| isophorone: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-nitrophenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4-dimethylphenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| bis(2-chloroethoxy)ether: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4-dichlorophenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,2,4-trichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| naphthalene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| benzoic acid: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-chloroaniline: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachlorobutadiene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-chloro-3-methylphenoxy: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-methyl-naphthalene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachlorocyclopentadiene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4,6-trichlorophenol: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4,5-trichlorophenol: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg ug/Kg



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 6 | WX-6 | Soil |
| 15078- 7 | WX-7 | Soil |
| 15078- 8 | WX-8 | Soil |
| 15078- 9 | SM-B | Soil |
| 15078-10 | SM-1 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 6 15078- 7 15078- 8 15078- 9 15078-10

| | | | | | |
|-------------------------|---------|---------|---------|---------|---------|
| 2-chloronaphthalene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-nitroaniline: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| acenaphthylene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| dimethylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,6-dinitrotoluene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| acenaphthene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 3-nitroaniline: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| 2,4-dinitrophenol: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| dibenzofuran: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4-dinitrotoluene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-nitrophenol: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| fluorene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-chlorophenyl-phenyle: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| diethylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-nitroaniline: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| 4,6-dinitro-2-methylph: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| n-nitrosodiphenylamine: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-bromo-phenyl-phenyle: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| pentachlorophenol: | ND<800 | ND<800 | ND<800 | ND<800 | ND<800 |
| phenanthrene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| anthracene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| di-n-butylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| fluoranthene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| benzidine: | ND<1700 | ND<1700 | ND<1700 | ND<1700 | ND<1700 |
| pyrene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| butylbenzylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| 3,3'-dichlorobenzidine: | ND<660 | ND<660 | ND<660 | ND<660 | ND<660 |
| benzo[a]anthracene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg ug/Kg



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078- 6 | WX-6 | Soil |
| 15078- 7 | WX-7 | Soil |
| 15078- 8 | WX-8 | Soil |
| 15078- 9 | SM-B | Soil |
| 15078-10 | SM-1 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078- 6 15078- 7 15078- 8 15078- 9 15078-10

| | | | | | |
|-------------------------|--------|--------|--------|--------|--------|
| chrysene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| bis(2-ethylhexyl)phtha: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| di-n-octylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| benzo(b,k)fluoranthene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| benzo[a]pyrene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| indeno[1,2,3-cd]pyrene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| dibenzo[a,h]anthracene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |
| benzo[g,h,i]anthracene: | ND<330 | ND<330 | ND<330 | ND<330 | ND<330 |

| | | | | | |
|----------------|-------|-------|-------|-------|-------|
| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg | ug/Kg |
|----------------|-------|-------|-------|-------|-------|

-- Surrogate % Recoveries --

| | | | | | |
|-----------------------|----|----|----|----|----|
| 2-fluorophenol: | 53 | 54 | 54 | 60 | 54 |
| phenol-d6: | 60 | 63 | 62 | 67 | 62 |
| nitrobenzene-d5: | 56 | 55 | 55 | 65 | 59 |
| 2-fluorobiphenyl: | 57 | 60 | 61 | 66 | 59 |
| 2,4,6-tribromophenol: | 74 | 81 | 81 | 83 | 76 |
| terphenyl-d14: | 64 | 70 | 68 | 73 | 62 |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078-11 | SM-2 | Soil |
| 15078-12 | SM-3 | Soil |
| 15078-13 | H-S | Soil |
| 15078-14 | H-N | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078-11 15078-12 15078-13 15078-14

| | | | | |
|-----------------------------|--------|--------|--------|--------|
| bis(2-chloroethyl)ethane: | ND<330 | ND<330 | ND<330 | ND<330 |
| aniline: | ND<330 | ND<330 | ND<330 | ND<330 |
| phenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-chlorophenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,3-dichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,4-dichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,2-dichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 |
| benzyl alcohol: | ND<330 | ND<330 | ND<330 | ND<330 |
| bis-(2-chloroisopropyl): | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-methylphenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachloroethane: | ND<330 | ND<330 | ND<330 | ND<330 |
| n-nitroso-di-n-propylamine: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-methylphenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| nitrobenzene: | ND<330 | ND<330 | ND<330 | ND<330 |
| isophorone: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-nitrophenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4-dimethylphenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| bis(2-chloroethoxy)methane: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4-dichlorophenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| 1,2,4-trichlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 |
| naphthalene: | ND<330 | ND<330 | ND<330 | ND<330 |
| benzoic acid: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-chloroaniline: | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachlorobutadiene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-chloro-3-methylphenoxy: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-methyl-naphthalene: | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachlorocyclopentadiene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4,6-trichlorophenol: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4,5-trichlorophenol: | ND<800 | ND<800 | ND<800 | ND<800 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078-11 | SM-2 | Soil |
| 15078-12 | SM-3 | Soil |
| 15078-13 | H-S | Soil |
| 15078-14 | H-N | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078-11 15078-12 15078-13 15078-14

| | | | | |
|-------------------------|---------|---------|---------|---------|
| 2-chloronaphthalene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2-nitroaniline: | ND<800 | ND<800 | ND<800 | ND<800 |
| acenaphthylene: | ND<330 | ND<330 | ND<330 | ND<330 |
| dimethylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,6-dinitrotoluene: | ND<330 | ND<330 | ND<330 | ND<330 |
| acenaphthene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 3-nitroaniline: | ND<800 | ND<800 | ND<800 | ND<800 |
| 2,4-dinitrophenol: | ND<800 | ND<800 | ND<800 | ND<800 |
| dibenzofuran: | ND<330 | ND<330 | ND<330 | ND<330 |
| 2,4-dinitrotoluene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-nitrophenol: | ND<800 | ND<800 | ND<800 | ND<800 |
| fluorene: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-chlorophenyl-phenyle: | ND<330 | ND<330 | ND<330 | ND<330 |
| diethylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-nitroaniline: | ND<800 | ND<800 | ND<800 | ND<800 |
| 4,6-dinitro-2-methylph: | ND<800 | ND<800 | ND<800 | ND<800 |
| n-nitrosodiphenylamine: | ND<330 | ND<330 | ND<330 | ND<330 |
| 4-bromo-phenyl-phenyle: | ND<330 | ND<330 | ND<330 | ND<330 |
| hexachlorobenzene: | ND<330 | ND<330 | ND<330 | ND<330 |
| pentachlorophenol: | ND<800 | ND<800 | ND<800 | ND<800 |
| phenanthrene: | ND<330 | ND<330 | ND<330 | ND<330 |
| anthracene: | ND<330 | ND<330 | ND<330 | ND<330 |
| di-n-butylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 |
| fluoranthene: | ND<330 | ND<330 | ND<330 | ND<330 |
| benzidine: | ND<1700 | ND<1700 | ND<1700 | ND<1700 |
| pyrene: | ND<330 | ND<330 | ND<330 | ND<330 |
| butylbenzylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 |
| 3,3'-dichlorobenzidine: | ND<660 | ND<660 | ND<660 | ND<660 |
| benzo[a]anthracene: | ND<330 | ND<330 | ND<330 | ND<330 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15078-11 | SM-2 | Soil |
| 15078-12 | SM-3 | Soil |
| 15078-13 | H-S | Soil |
| 15078-14 | H-N | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15078-11 15078-12 15078-13 15078-14

| | | | | |
|-------------------------|--------|--------|--------|--------|
| chrysene: | ND<330 | ND<330 | ND<330 | ND<330 |
| bis(2-ethylhexyl)phtha: | ND<330 | ND<330 | ND<330 | ND<330 |
| di-n-octylphthalate: | ND<330 | ND<330 | ND<330 | ND<330 |
| benzo(b,k)fluoranthene: | ND<330 | ND<330 | ND<330 | ND<330 |
| benzo[a]pyrene: | ND<330 | ND<330 | ND<330 | ND<330 |
| indeno[1,2,3-cd]pyrene: | ND<330 | ND<330 | ND<330 | ND<330 |
| dibenzo[a,h]anthracene: | ND<330 | ND<330 | ND<330 | ND<330 |
| benzo{g,h,i}anthracene: | ND<330 | ND<330 | ND<330 | ND<330 |

| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg |
|----------------|-------|-------|-------|-------|
|----------------|-------|-------|-------|-------|

-- Surrogate % Recoveries --

| | | | | |
|-----------------------|----|----|----|----|
| 2-fluorophenol: | 65 | 63 | 64 | 63 |
| phenol-d6: | 73 | 69 | 70 | 70 |
| nitrobenzene-d5: | 70 | 68 | 65 | 66 |
| 2-fluorobiphenyl: | 70 | 68 | 65 | 68 |
| 2,4,6-tribromophenol: | 85 | 84 | 73 | 90 |
| terphenyl-d14: | 75 | 77 | 71 | 72 |



Superior Precision Analytical, Inc.

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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 15078

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|---------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| bis(2-chloroethyl)ethene: | ND<330 | 330 | | | |
| aniline: | ND<330 | 330 | | | |
| phenol: | ND<330 | 330 | | | |
| 2-chlorophenol: | ND<330 | 330 | | | |
| 1,3-dichlorobenzene: | ND<330 | 330 | | | |
| 1,4-dichlorobenzene: | ND<330 | 330 | | | |
| 1,2-dichlorobenzene: | ND<330 | 330 | | | |
| benzyl alcohol: | ND<330 | 330 | | | |
| bis-(2-chloroisopropyl): | ND<330 | 330 | | | |
| 2-methylphenol: | ND<330 | 330 | | | |
| hexachloroethane: | ND<330 | 330 | | | |
| n-nitroso-di-n-propyla: | ND<330 | 330 | 92/94 | 11-133 | 2% |
| 4-methylphenol: | ND<330 | 330 | | | |
| nitrobenzene: | ND<330 | 330 | | | |
| isophorone: | ND<330 | 330 | | | |
| 2-nitrophenol: | ND<330 | 330 | | | |
| 2,4-dimethylphenol: | ND<330 | 330 | | | |
| bis(2-chloroethoxy)met: | ND<330 | 330 | | | |
| 2,4-dichlorophenol: | ND<330 | 330 | | | |
| 1,2,4-trichlorobenzene: | ND<330 | 330 | 75/76 | 1-139 | 1% |
| naphthalene: | ND<330 | 330 | | | |
| benzoic acid: | ND<330 | 330 | | | |
| 4-chloroaniline: | ND<330 | 330 | | | |
| hexachlorobutadiene: | ND<330 | 330 | | | |
| 4-chloro-3-methylpheno: | ND<330 | 330 | 79/81 | 11-122 | 3% |
| 2-methyl-naphthalene: | ND<330 | 330 | | | |
| hexachlorocyclopentadi: | ND<330 | 330 | | | |
| 2,4,6-trichlorophenol: | ND<330 | 330 | | | |
| 2,4,5-trichlorophenol: | ND<800 | 800 | | | |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 15078

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| 2-chloronaphthalene: | ND<330 | 330 | | | |
| 2-nitroaniline: | ND<800 | 800 | | | |
| acenaphthylene: | ND<330 | 330 | | | |
| dimethylphthalate: | ND<330 | 330 | | | |
| 2,6-dinitrotoluene: | ND<330 | 330 | | | |
| acenaphthene: | ND<330 | 330 | 86/87 | 20-131 | 1% |
| 3-nitroaniline: | ND<800 | 800 | | | |
| 2,4-dinitrophenol: | ND<800 | 800 | | | |
| dibenzofuran: | ND<330 | 330 | | | |
| 2,4-dinitrotoluene: | ND<330 | 330 | 76/79 | 7-111 | 4% |
| 4-nitrophenol: | ND<800 | 800 | 85/92 | 1-118 | 8% |
| fluorene: | ND<330 | 330 | | | |
| 4-chlorophenyl-phenyle: | ND<330 | 330 | | | |
| diethylphthalate: | ND<330 | 330 | | | |
| 4-nitroaniline: | ND<800 | 800 | | | |
| 4,6-dinitro-2-methylph: | ND<800 | 800 | | | |
| n-nitrosodiphenylamine: | ND<330 | 330 | | | |
| 4-bromo-phenyl-phenyle: | ND<330 | 330 | | | |
| hexachlorobenzene: | ND<330 | 330 | | | |
| pentachlorophenol: | ND<800 | 800 | 96/97 | 1-119 | 1% |
| phenanthrene: | ND<330 | 330 | | | |
| anthracene: | ND<330 | 330 | | | |
| di-n-butylphthalate: | ND<330 | 330 | | | |
| fluoranthene: | ND<330 | 330 | | | |
| benzidine: | ND<1700 | 1700 | | | |
| pyrene: | ND<330 | 330 | 86/83 | 20-156 | 4% |
| butylbenzylphthalate: | ND<330 | 330 | | | |
| 3,3'-dichlorobenzidine: | ND<660 | 660 | | | |
| benzo[a]anthracene: | ND<330 | 330 | | | |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 15078

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| chrysene: | ND<330 | 330 | | | |
| bis(2-ethylhexyl)phtha: | ND<330 | 330 | | | |
| di-n-octylphthalate: | ND<330 | 330 | | | |
| benzo(b,k)fluoranthene: | ND<330 | 330 | | | |
| benzo[a]pyrene: | ND<330 | 330 | | | |
| indeno[1,2,3-cd]pyrene: | ND<330 | 330 | | | |
| dibenzo[a,h]anthracene: | ND<330 | 330 | | | |
| benzo[g,h,i]anthracene: | ND<330 | 330 | | | |
| 2-fluorophenol: | 68 | | | 25-121 | |
| phenol-d6: | 75 | | | 24-113 | |
| nitrobenzene-d5: | 67 | | | 23-120 | |
| 2-fluorobiphenyl: | 70 | | | 30-115 | |
| 2,4,6-tribromophenol: | 89 | | | 19-122 | |
| terphenyl-d14: | 77 | | | 18-137 | |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 15078

Amy J. Nogin

Senior Chemist
Account Manager

15078

Yes 842 8252

Fax copy of Lab Report and COC to Chevron Contact: No

Chain-of-Custody-Record

| | | | | |
|--|---------------------------|------------------------|-----------------------------|--------------|
| Chevron U.S.A. Inc. P.O. BOX 5004 San Ramon, CA 94583 FAX (415)842-9591 | Chevron Facility Number | 3006 | Chevron Contact (Name) | Mark W. New |
| | Facility Address | 460 Grand Ave. Oakland | (Phone) | 510 842 8134 |
| | Consultant Project Number | 0006-1 | Laboratory Name | Superior |
| | Consultant Name | Tudorstone Development | Laboratory Release Number | 3499660 |
| | Address | PO Box 8754 Santa Rosa | Samples Collected by (Name) | Jeff Monroe |
| | Project Contact (Name) | Jeff Monroe | Collection Date | 1-3-94 |
| (Phone) | 707 530 8818 | Fax Number | 5385812 | |

| Sample Number | Lab Sample Number | Number of Containers | Analyses To Be Performed | | | | | | | | | | | | Remarks | | | |
|---------------|-------------------|----------------------|--------------------------|-----|--------------|------|-----------|------|---------------------|-----------------|------------------------------|-------------------|-----------------------|------------------------------|----------------------------|---------------------------|-----------------------------|------------------------------------|
| | | | MATRIX | Air | Air Charcoal | Grab | Composite | Time | Sample Preservation | Ice (Yee or No) | STEX + TPH GAS (8020 + 8015) | TPH Diesel (8015) | Oil and Grease (5520) | Purgeable Halocarbons (8010) | Purgeable Aromatics (8020) | Purgeable Organics (8240) | Extractable Organics (8270) | Metals Cd,Cr,Pb,Zn,Ni (ICAP or AA) |
| WX-1 | 1SD | 1 | S | | | X | | | | | | | | | | | | |
| WX-2 | | 1 | | | | | | | | | | | | | | | | |
| WX-3 | | | | | | | | | | | | | | | | | | |
| WX-4 | | | | | | | | | | | | | | | | | | |
| WX-5 | | | | | | | | | | | | | | | | | | |
| WX-6 | | | | | | | | | | | | | | | | | | |
| WX-7 | | | | | | | | | | | | | | | | | | |
| WX-8 | | | | | | | | | | | | | | | | | | |
| SM-B | | | | | | | | | | | | | | | | | | |
| SM-1 | | | | | | | | | | | | | | | | | | |
| SM-2 | | | | | | | | | | | | | | | | | | |
| SM-3 | | | | | | | | | | | | | | | | | | |
| H-S | | | | | | | | | | | | | | | | | | |
| H-N | | | | | | | | | | | | | | | | | | |

Please initial:

Samples Stored in ice

Appropriate containers

Samples

MOA's willing

Comments:

| |
|----------------------------------|
| Turn Around Time (Circle Choice) |
| 24 Hrs. |
| 48 Hrs. |
| 5 Days |
| 10 Days |
| As Contracted |

| | | | | | |
|-----------------------------|--------------|-----------------|--|--------------|--------------|
| Relinquished By (Signature) | Organization | Date/Time 12:25 | Received By (Signature) | Organization | Date/Time |
| Jeff Monroe | TD | 1-4-94 | | | |
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time |
| | | | | | |
| Relinquished By (Signature) | Organization | Date/Time | Received For Laboratory By (Signature) | Organization | Date/Time |
| | | | Swanson | | 1/4/94 12:25 |



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 12-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Chronology | | Laboratory Number 30184 | | | | | |
|----------------|--|-------------------------|----------|-----------|----------|-------|-------|
| Identification | | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
| WO-1 | | 01/05/94 | 01/05/94 | 01/11/94 | 01/11/94 | | 13 |
| WO-2 | | 01/05/94 | 01/05/94 | 01/11/94 | 01/12/94 | | 14 |
| WO-3 | | 01/05/94 | 01/05/94 | 01/11/94 | 01/12/94 | | 15 |
| WO-4 | | 01/05/94 | 01/05/94 | 01/11/94 | 01/12/94 | | 16 |



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 12-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30184-13 | WO-1 | Soil |
| 30184-14 | WO-2 | Soil |
| 30184-15 | WO-3 | Soil |
| 30184-16 | WO-4 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30184-13 30184-14 30184-15 30184-16

| | | | | |
|-----------------------------|--------|--------|---------|---------|
| bis(2-chloroethyl)ethane: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| aniline: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| phenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2-chlorophenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 1,3-dichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 1,4-dichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 1,2-dichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| benzyl alcohol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| bis-(2-chloroisopropyl): | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2-methylphenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| hexachloroethane: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| n-nitroso-di-n-propylamine: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-methylphenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| nitrobenzene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| isophorone: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2-nitrophenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2,4-dimethylphenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| bis(2-chloroethoxy)methane: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2,4-dichlorophenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 1,2,4-trichlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| naphthalene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| benzoic acid: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-chloroaniline: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| hexachlorobutadiene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-chloro-3-methylphenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2-methyl-naphthalene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| hexachlorocyclopentadiene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2,4,6-trichlorophenol: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2,4,5-trichlorophenol: | ND<800 | ND<800 | ND<8000 | ND<8000 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg



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TOUCHSTONE DEVELOPMENTS (SR)
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Project 0006-1
Reported 12-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30184-13 | WO-1 | Soil |
| 30184-14 | WO-2 | Soil |
| 30184-15 | WO-3 | Soil |
| 30184-16 | WO-4 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30184-13 30184-14 30184-15 30184-16

| | | | | |
|-------------------------|---------|---------|----------|----------|
| 2-chloronaphthalene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2-nitroaniline: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| acenaphthylene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| dimethylphthalate: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2,6-dinitrotoluene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| acenaphthene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 3-nitroaniline: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| 2,4-dinitrophenol: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| dibenzofuran: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 2,4-dinitrotoluene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-nitrophenol: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| fluorene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-chlorophenyl-phenyle: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| diethylphthalate: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-nitroaniline: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| 4,6-dinitro-2-methylph: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| n-nitrosodiphenylamine: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 4-bromo-phenyl-phenyle: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| hexachlorobenzene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| pentachlorophenol: | ND<800 | ND<800 | ND<8000 | ND<8000 |
| phenanthrene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| anthracene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| di-n-butylphthalate: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| fluoranthene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| benzidine: | ND<1700 | ND<1700 | ND<17000 | ND<17000 |
| pyrene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| butylbenzylphthalate: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| 3,3'-dichlorobenzidine: | ND<660 | ND<660 | ND<6600 | ND<6600 |
| benzo[a]anthracene: | ND<330 | ND<330 | ND<3300 | ND<3300 |

Concentration: ug/Kg ug/Kg ug/Kg ug/Kg



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 12-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30184-13 | WO-1 | Soil |
| 30184-14 | WO-2 | Soil |
| 30184-15 | WO-3 | Soil |
| 30184-16 | WO-4 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30184-13 30184-14 30184-15 30184-16

| | | | | |
|-------------------------|--------|--------|---------|---------|
| chrysene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| bis(2-ethylhexyl)phtha: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| di-n-octylphthalate: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| benzo(b,k)fluoranthene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| benzo[a]pyrene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| indeno[1,2,3-cd]pyrene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| dibenzo[a,h]anthracene: | ND<330 | ND<330 | ND<3300 | ND<3300 |
| benzo[g,h,i]anthracene: | ND<330 | ND<330 | ND<3300 | ND<3300 |

| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg |
|----------------|-------|-------|-------|-------|
|----------------|-------|-------|-------|-------|

-- Surrogate % Recoveries --

| | | | | |
|-----------------------|----|----|-----|-----|
| 2-fluorophenol: | 75 | 68 | 101 | 82 |
| phenol-d6: | 84 | 75 | 105 | 92 |
| nitrobenzene-d5: | 74 | 66 | 106 | 87 |
| 2-fluorobiphenyl: | 74 | 64 | 103 | 83 |
| 2,4,6-tribromophenol: | 99 | 88 | 117 | 117 |
| terphenyl-d14: | 83 | 74 | 98 | 79 |



EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS
Quality Assurance and Control Data - Soil

Laboratory Number 30184

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-----------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| bis(2-chloroethyl)ethane: | ND<330 | 330 | | | |
| aniline: | ND<330 | 330 | | | |
| phenol: | ND<330 | 330 | 77/76 | 26-90 | 1% |
| 2-chlorophenol: | ND<330 | 330 | 83/82 | 11-120 | 1% |
| 1,3-dichlorobenzene: | ND<330 | 330 | | | |
| 1,4-dichlorobenzene: | ND<330 | 330 | 75/74 | 1-154 | 1% |
| 1,2-dichlorobenzene: | ND<330 | 330 | | | |
| benzyl alcohol: | ND<330 | 330 | | | |
| bis-(2-chloroisopropyl: | ND<330 | 330 | | | |
| 2-methylphenol: | ND<330 | 330 | | | |
| hexachloroethane: | ND<330 | 330 | | | |
| n-nitroso-di-n-propylamine: | ND<330 | 330 | 97/95 | 11-133 | 2% |
| 4-methylphenol: | ND<330 | 330 | | | |
| nitrobenzene: | ND<330 | 330 | | | |
| isophorone: | ND<330 | 330 | | | |
| 2-nitrophenol: | ND<330 | 330 | | | |
| 2,4-dimethylphenol: | ND<330 | 330 | | | |
| bis(2-chloroethoxy)ether: | ND<330 | 330 | | | |
| 2,4-dichlorophenol: | ND<330 | 330 | | | |
| 1,2,4-trichlorobenzene: | ND<330 | 330 | 69/69 | 1-139 | 0% |
| naphthalene: | ND<330 | 330 | | | |
| benzoic acid: | ND<330 | 330 | | | |
| 4-chloroaniline: | ND<330 | 330 | | | |
| hexachlorobutadiene: | ND<330 | 330 | | | |
| 4-chloro-3-methylphenoxy: | ND<330 | 330 | 80/77 | 11-122 | 4% |
| 2-methyl-naphthalene: | ND<330 | 330 | | | |
| hexachlorocyclopentadiene: | ND<330 | 330 | | | |
| 2,4,6-trichlorophenol: | ND<330 | 330 | | | |
| 2,4,5-trichlorophenol: | ND<800 | 800 | | | |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 30184

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| 2-chloronaphthalene: | ND<330 | 330 | | | |
| 2-nitroaniline: | ND<800 | 800 | | | |
| acenaphthylene: | ND<330 | 330 | | | |
| dimethylphthalate: | ND<330 | 330 | | | |
| 2,6-dinitrotoluene: | ND<330 | 330 | | | |
| acenaphthene: | ND<330 | 330 | 81/81 | 20-131 | 0% |
| 3-nitroaniline: | ND<800 | 800 | | | |
| 2,4-dinitrophenol: | ND<800 | 800 | | | |
| dibenzofuran: | ND<330 | 330 | | | |
| 2,4-dinitrotoluene: | ND<330 | 330 | 72/68 | 7-111 | 6% |
| 4-nitrophenol: | ND<800 | 800 | 85/82 | 1-118 | 4% |
| fluorene: | ND<330 | 330 | | | |
| 4-chlorophenyl-phenyle: | ND<330 | 330 | | | |
| diethylphthalate: | ND<330 | 330 | | | |
| 4-nitroaniline: | ND<800 | 800 | | | |
| 4,6-dinitro-2-methylph: | ND<800 | 800 | | | |
| n-nitrosodiphenylamine: | ND<330 | 330 | | | |
| 4-bromo-phenyl-phenyle: | ND<330 | 330 | | | |
| hexachlorobenzene: | ND<330 | 330 | | | |
| pentachlorophenol: | ND<800 | 800 | 105/104 | 1-119 | 1% |
| phenanthrene: | ND<330 | 330 | | | |
| anthracene: | ND<330 | 330 | | | |
| di-n-butylphthalate: | ND<330 | 330 | | | |
| fluoranthene: | ND<330 | 330 | | | |
| benzidine: | ND<1700 | 1700 | | | |
| pyrene: | ND<330 | 330 | 81/76 | 20-156 | 6% |
| butylbenzylphthalate: | ND<330 | 330 | | | |
| 3,3'-dichlorobenzidine: | ND<660 | 660 | | | |
| benzo[a]anthracene: | ND<330 | 330 | | | |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 30184

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| chrysene: | ND<330 | 330 | | | |
| bis(2-ethylhexyl)phtha: | ND<330 | 330 | | | |
| di-n-octylphthalate: | ND<330 | 330 | | | |
| benzo(b,k)fluoranthene: | ND<330 | 330 | | | |
| benzo[a]pyrene: | ND<330 | 330 | | | |
| indeno[1,2,3-cd]pyrene: | ND<330 | 330 | | | |
| dibenzo[a,h]anthracene: | ND<330 | 330 | | | |
| benzo[g,h,i]anthracene: | ND<330 | 330 | | | |
| 2-fluorophenol: | 74 | | | 25-121 | |
| phenol-d6: | 81 | | | 24-113 | |
| nitrobenzene-d5: | 78 | | | 23-120 | |
| 2-fluorobiphenyl: | 76 | | | 30-115 | |
| 2,4,6-tribromophenol: | 91 | | | 19-122 | |
| terphenyl-d14: | 80 | | | 18-137 | |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 30184

Cecilia G. Jaquin
Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 01/13/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed | Matrix |
|----------|-----------------------|----------|----------|--------|
| 30184- 1 | IX-1 | 01/05/94 | 01/06/94 | Soil |
| 30184- 2 | IX-2 | 01/05/94 | 01/07/94 | Soil |
| 30184- 3 | IX-3 | 01/05/94 | 01/07/94 | Soil |
| 30184- 4 | IX-4 | 01/05/94 | 01/07/94 | Soil |
| 30184- 5 | IX-5 | 01/05/94 | 01/07/94 | Soil |
| 30184- 6 | IX-6 | 01/05/94 | 01/10/94 | Soil |
| 30184- 7 | IB-1 | 01/05/94 | 01/10/94 | Soil |
| 30184- 8 | IB-2 | 01/05/94 | 01/10/94 | Soil |
| 30184- 9 | IX-7 | 01/05/94 | 01/10/94 | Soil |
| 30184-10 | IX-8 | 01/05/94 | 01/11/94 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30184- 1 30184- 2 30184- 3 30184- 4 30184- 5

| | | | | | |
|----------------|-------|-------|-------|-------|-------|
| Gasoline: | 18 | 1900 | 390 | 84 | 4 |
| Benzene: | 0.97 | 2.0 | 1.3 | 0.89 | 0.73 |
| Toluene: | 2.2 | 11 | 5.8 | 3.2 | 0.62 |
| Ethyl Benzene: | 0.40 | 15 | 1.9 | 2.6 | 0.12 |
| Total Xylenes: | 2.5 | 66 | 8.7 | 16 | 0.62 |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |

Laboratory Number: 30184- 6 30184- 7 30184- 8 30184- 9 30184- 10

| | | | | | |
|----------------|---------|---------|---------|-------|-------|
| Gasoline: | ND<1 | ND<1 | ND<1 | ND<1 | 1 |
| Benzene: | ND<.005 | ND<.005 | ND<.005 | 0.016 | 0.023 |
| Toluene: | ND<.005 | ND<.005 | ND<.005 | 0.013 | 0.21 |
| Ethyl Benzene: | ND<.005 | ND<.005 | ND<.005 | 0.017 | 0.056 |
| Total Xylenes: | 0.008 | ND<.005 | ND<.005 | 0.068 | 0.38 |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |



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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 01/13/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed | Matrix |
|----------|-----------------------|----------|----------|--------|
| 30184-11 | IX-9 | 01/05/94 | 01/06/94 | Soil |
| 30184-12 | IX-10 | 01/05/94 | 01/10/94 | Soil |
| 30184-13 | WO-1 | 01/05/94 | 01/10/94 | Soil |
| 30184-14 | WO-2 | 01/05/94 | 01/10/94 | Soil |
| 30184-15 | WO-3 | 01/05/94 | 01/10/94 | Soil |
| 30184-16 | WO-4 | 01/05/94 | 01/10/94 | Soil |
| 30184-17 | SP-4 (A-D) | 01/05/94 | 01/07/94 | Soil |
| 30184-18 | SP-5 (A-D) | 01/05/94 | 01/06/94 | Soil |
| 30184-19 | SP-6 (A-D) | 01/05/94 | 01/06/94 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30184-11 30184-12 30184-13 30184-14 30184-15

| | | | | | |
|-----------------|-------|---------|---------|---------|---------|
| Gasoline: | 1 | ND<1 | ND<1 | ND<1 | 170 |
| Benzene: | 0.005 | ND<.005 | ND<.005 | ND<.005 | ND<0.32 |
| Toluene: | 0.064 | ND<.005 | ND<.005 | ND<.005 | ND<0.32 |
| Ethyl Benzene: | 0.032 | ND<.005 | ND<.005 | ND<.005 | 0.36 |
| Total Xylenes: | 0.21 | ND<.005 | 0.008 | 0.011 | 0.34 |
| Diesel Range: | NA | NA | ND<1 | ND<1 | 4400 |
| Oil and Grease: | NA | NA | ND<50 | ND<50 | 120 |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |

Laboratory Number: 30184-16 30184-17 30184-18 30184-19

| | | | | |
|-----------------|---------|---------|-------|-------|
| Gasoline: | 27 | 150 | 1300 | 2600 |
| Benzene: | ND<.005 | ND<0.25 | 0.80 | 1.8 |
| Toluene: | 0.007 | 3.0 | 30 | 86 |
| Ethyl Benzene: | 0.064 | 3.0 | 21 | 40 |
| Total Xylenes: | 0.18 | 20 | 120 | 230 |
| Diesel Range: | 130 | NA | NA | NA |
| Oil and Grease: | 210 | NA | NA | NA |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg |



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C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 3 of 3
QA/QC INFORMATION
SET: 30184

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:

Minimum Detection Limit in Soil: 50mg/kg

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:

Minimum Quantitation Limit for Diesel in Soil: 1mg/kg

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:

Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTXE

Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|-----------------|-----------------|-----|---------------|
| Gasoline: | 124/116 | 7% | 70-130 |
| Benzene: | 112/109 | 3% | 70-130 |
| Toluene: | 109/106 | 3% | 70-130 |
| Ethyl Benzene: | 106/103 | 3% | 70-130 |
| Total Xylenes: | 111/107 | 4% | 70-130 |
| Diesel Range: | 106/111 | 5% | 75-125 |
| Oil and Grease: | 78/80 | 2% | 56-106 |

Senior Chemist



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

C E R T I F I C A T E O F A N A L Y S I S

LABORATORY NO.: 30184
CLIENT: TOUCHSTONE DEVELOPMENTS
CLIENT JOB NO.: 0006-1

DATE RECEIVED: 01/05/94
DATE REPORTED: 01/06/94
DATE SAMPLED : 01/05/93

ANALYSIS FOR TOTAL ORGANIC LEAD by DHS METHOD (LUFT MANUAL)

| LAB # | Sample Identification | Concentration (mg/Kg) |
|----------|-----------------------|-----------------------|
| 17 | SP-4 (A-D) | ND |

mg/kg - parts per million (ppm)
Method Detection Limit for Organic Lead in Soil : 2 mg/kg

QAQC Summary: MS/MSD Average Recovery : 104/103
Duplicate RPD : 1%

Richard Srna, Ph.D.

Laboratory Director

30184 Yes 510 842
 No 8252 Chain-of-Custody-Record

Fax copy of Lab Report and COC to Chevron Contact:

Chevron U.S.A. Inc.
 P.O. BOX 5004
 San Ramon, CA 94583
 FAX (415)842-9591

Chevron Facility Number 0006
 Facility Address 460 Grand Ave, Oakland
 Consultant Project Number COOP-1
 Consultant Name Touchstone Developments
 Address P Box 2554 Santa Rosa CA
 Project Contact (Name) Jeff Monroe
 (Phone) 7075388818 (Fax Number) 5388812

Chevron Contact (Name) Mark Miller
 (Phone) 510 842 8134
 Laboratory Name Syntex
 Laboratory Release Number 84 99660
 Samples Collected by (Name) Jeff Monroe
 Collection Date 1-5-93
 Signature Jeff Monroe

| Sample Number | Lab Sample Number | Number of Containers | Matrix S = Soil W = Water | Type G = Grab C = Composite D = Discrete | Time | Sample Preservation | Load (Yes or No) | Analyses To Be performed | | | | | | | | Remarks | |
|---------------|-------------------|----------------------|---------------------------------|---|-------|---------------------|------------------|---------------------------------|----------------------|--------------------------|-------------------------------|-------------------------------|------------------------------|--------------------------------|---|---------------------|-------------------------------------|
| | | | | | | | | BTEX + TPH GAS (8020 + 8015) | TPH Diesel (8015) | Oil and Grease (5520) | Purgeable Volatiles (8010) | Purgeable Aromatics (8020) | Purgeable Organics (8240) | Extractable Organics (8270) | Metals Cd, Cr, Pb, Zn, Ni (ICP or AA) | Organics Organic | |
| WD-3 | 15 | 1 | S | D | 14:20 | Yes | X | X | X | X | X | X | X | X | X | X | 3 24 hr TOG |
| WD-4 | 16 | 1 | | D | 14:22 | | X | X | X | X | | | | | | | only |
| SP-4a-d | 17 | 4 | | C | 14:00 | | | | | | | | | | | | 3 24 hr |
| SP-5a-d | 18 | 4 | | C | 14:10 | | | | | | | | | | | | THF |
| SP-6a-d | 19 | 4 | V | C | 14:15 | V | V | | | | | | | | | | Contracted for field analysis |

Please Initial: SS

Samples Stored in ice.

Appropriate containers

Samples preserved

VOA's without headspace

Comments:

40C

| | | | | | | |
|---|--------------|------------------|--|--------------------------|-----------|---|
| Relinquished By (Signature) <i>Jeff Monroe</i> | Organization | Date/Time 15:15 | Received By (Signature) <i>Jeff Monroe</i> | Organization | Date/Time | Turn Around Time (Circle Choices) |
| Relinquished By (Signature) <i>Jeff Monroe</i> | Organization | Date/Time 1-5-94 | Received By (Signature) <i>Jeff Monroe</i> | Organization | Date/Time | 24 Hrs. 48 Hrs. 5 Days 10 Days |
| Relinquished By (Signature) | Organization | Date/Time | Received For Laboratory By (Signature) <i>David Sykes</i> | Date/Time 3:15 1/5/94 | | As Contracted |



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 13-January-1994

ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC
by EPA Method SW-846 6010

Chronology

Laboratory Number 30184

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------|
| WO-1 | 01/05/94 | 01/05/94 | 01/07/94 | 01/10/94 | | 13 |
| WO-2 | 01/05/94 | 01/05/94 | 01/07/94 | 01/10/94 | | 14 |
| WO-3 | 01/05/94 | 01/05/94 | 01/07/94 | 01/10/94 | | 15 |
| WO-4 | 01/05/94 | 01/05/94 | 01/07/94 | 01/10/94 | | 16 |



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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 13-January-1994

ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30184-13 | WO-1 | Soil |
| 30184-14 | WO-2 | Soil |
| 30184-15 | WO-3 | Soil |
| 30184-16 | WO-4 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30184-13 30184-14 30184-15 30184-16

| | | | | | |
|----------------|--------|--------|-------|-------|--------|
| Cadmium ✓ | (Cd) : | ND<0.5 | 0.5 | 0.5 | ND<0.5 |
| Chromium ✓ | (Cr) : | 19 | 14 | 17 | 16 |
| Lead ✓ | (Pb) : | ND<5 | ND<5 | 6 | ND<5 |
| Nickel ✓ | (Ni) : | 29 | 24 | 30 | 29 |
| Zinc ✓ | (Zn) : | 45 | 31 | 46 | 41 |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

ANALYSIS FOR CADMIUM, CHROMIUM, LEAD, NICKEL, & ZINC Quality Assurance and Control Data - Soil

Laboratory Number 30184

| Compound | Method | Blank (mg/Kg) | RL (mg/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|----------|--------|------------------|---------------|--------------------------|---------------|------------|
| Cadmium | (Cd) : | ND<0.5 | 0.5 | 104/104 | 75-125 | 0% |
| Chromium | (Cr) : | ND<5 | 5 | 96/114 | 75-125 | 17% |
| Lead | (Pb) : | ND<5 | 5 | 101/103 | 75-125 | 2% |
| Nickel | (Ni) : | ND<5 | 5 | 103/101 | 75-125 | 2% |
| Zinc | (Zn) : | ND<5 | 5 | 101/100 | 75-125 | 1% |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

mg/Kg = Parts per million (ppm)

QC File No. 30184

1/13/94

Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 13-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

Chronology

Laboratory Number 30184

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|----------|-------|
| WO-1 | 01/05/94 | 01/05/94 | / | / | 01/07/94 | 13 |
| WO-2 | 01/05/94 | 01/05/94 | / | / | 01/07/94 | 14 |
| WO-3 | 01/05/94 | 01/05/94 | / | / | 01/07/94 | 15 |
| WO-4 | 01/05/94 | 01/05/94 | / | / | 01/07/94 | 16 |



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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 13-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

| Laboratory Number | Sample Identification | | | Matrix |
|-------------------|-----------------------|--|--|--------|
| 30184-13 | WO-1 | | | Soil |
| 30184-14 | WO-2 | | | Soil |
| 30184-15 | WO-3 | | | Soil |
| 30184-16 | WO-4 | | | Soil |

| RESULTS OF ANALYSIS | | | | |
|-------------------------|----------|----------|----------|----------|
| Laboratory Number: | 30184-13 | 30184-14 | 30184-15 | 30184-16 |
| Chloromethane/Vinyl Ch: | ND<10.0 | ND<10.0 | ND<10.0 | ND<10.0 |
| Bromomethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Chloroethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Trichlorofluoromethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,1-Dichloroethene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Dichloromethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| t-1,2-Dichloroethene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,1-Dichloroethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| c-1,2-Dichloroethene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Chloroform: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,1,1-Trichloroethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Carbon tetrachloride: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,2-Dichloroethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Trichloroethene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| c-1,3-Dichloropropene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,2-Dichloropropane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| t-1,3-Dichloropropene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Bromodichloromethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,1,2-Trichloroethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Tetrachloroethene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Dibromochloromethane: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Chlorobenzene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Bromoform: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,1,2,2-Tetrachloroeth: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,3-Dichlorobenzene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,2-Dichlorobenzene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| 1,4-Dichlorobenzene: | ND<5.0 | ND<5.0 | ND<5.0 | ND<5.0 |
| Concentration: | ug/Kg | ug/Kg | ug/Kg | ug/Kg |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010. Quality Assurance and Control Data - Soil

Laboratory Number 30184

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| Chloromethane/Vinyl Ch: | ND<10.0 | 10.0 | | | |
| Bromomethane: | ND<5.0 | 5.0 | | | |
| Chloroethane: | ND<5.0 | 5.0 | | | |
| Trichlorofluoromethane: | ND<5.0 | 5.0 | | | |
| 1,1-Dichloroethene: | ND<5.0 | 5.0 | 109/110 | 70-143 | 1% |
| Dichloromethane: | ND<5.0 | 5.0 | | | |
| t-1,2-Dichloroethene: | ND<5.0 | 5.0 | | | |
| 1,1-Dichloroethane: | ND<5.0 | 5.0 | | | |
| c-1,2-Dichloroethene: | ND<5.0 | 5.0 | | | |
| Chloroform: | ND<5.0 | 5.0 | | | |
| 1,1,1-Trichloroethane: | ND<5.0 | 5.0 | | | |
| Carbon tetrachloride: | ND<5.0 | 5.0 | | | |
| 1,2-Dichloroethane: | ND<5.0 | 5.0 | | | |
| Trichloroethene: | ND<5.0 | 5.0 | 96/95 | 79-132 | 1% |
| c-1,3-Dichloropropene: | ND<5.0 | 5.0 | | | |
| 1,2-Dichloropropane: | ND<5.0 | 5.0 | | | |
| t-1,3-Dichloropropene: | ND<5.0 | 5.0 | | | |
| Bromodichloromethane: | ND<5.0 | 5.0 | | | |
| 1,1,2-Trichloroethane: | ND<5.0 | 5.0 | | | |
| Tetrachloroethene: | ND<5.0 | 5.0 | | | |
| Dibromochloromethane: | ND<5.0 | 5.0 | | | |
| Chlorobenzene: | ND<5.0 | 5.0 | 114/112 | 92-132 | 2% |
| Bromoform: | ND<5.0 | 5.0 | | | |
| 1,1,2,2-Tetrachloroeth: | ND<5.0 | 5.0 | | | |
| 1,3-Dichlorobenzene: | ND<5.0 | 5.0 | | | |
| 1,2-Dichlorobenzene: | ND<5.0 | 5.0 | | | |
| 1,4-Dichlorobenzene: | ND<5.0 | 5.0 | | | |

Definitions:

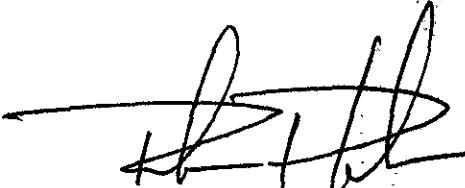
ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 30184


1/13/94
Senior Chemist
Account Manager

Fax*copy of Lab Report and COC to Chevron Contact: No

30 | 84

Samples

SIV 842 82-1

Chain-of-Custody-Record

Chevron U.S.A. Inc.
P.O. BOX 5004
San Ramon, CA 94583
FAX (415)842-9591

Chevron Facility Number 0006
Facility Address 460 Grand Ave., Oakland
Consultant Project Number 006-1
Consultant Name Technotest
Address P.O. Box 9153, Santa Clara, CA
Project Contact (Name) Terry Monroe
(Phone) 510 576 8812

Chevron Contact (Name) Mark Miller
(Phone) 510 542 8134
Inventory Name Sugars
Inventory Release Number 510 542 8160
Samples Collected by (Name) Terry Monroe
Collection Date 1-5-94

| Sample Number | Lab Sample Number | Number of Containers | Matrix S = Soil W = Water C = Air A = Charcoal | Type G = Grab C = Composite D = Discrete | Time | Sample Preservation | Iced (Yes or No) | Analyses To Be Performed | | | | | | | | Remarks |
|---------------|-------------------|----------------------|--|--|------|---------------------|------------------|--------------------------|----------------------|--------------------------|-------------------------------|-------------------------------|------------------------------|--------------------------------|--|----------|
| | | | | | | | | STEX (8020 + 8015) | TPH Diesel (8015) | Oil and Grease (8020) | Purgeable Volatiles (8010) | Purgeable Aromatics (8020) | Purgeable Organics (8240) | Extractable Organics (8270) | Metals Cd,Cr,Pb,Zn,Ni (ICAP or AA) | |
| TX-1 | 1 | S D | 12:10 | Yes X | | | | | | | | | | | | 24 hr |
| TX-2 | 2 | 1 | 12:12 | | | | | | | | | | | | | TA-T for |
| TX-3 | 3 | 1 | 12:15 | | | | | | | | | | | | | |
| TX-4 | 4 | 1 | 12:18 | | | | | | | | | | | | | IX-14 |
| TX-5 | 5 | 1 | 12:20 | | | | | | | | | | | | | IX-14 |
| TX-6 | 6 | 1 | 12:22 | | | | | | | | | | | | | IX-9 |
| TB-1 | 7 | 1 | 12:25 | | | | | | | | | | | | | |
| TB-2 | 8 | 1 | 12:30 | | | | | | | | | | | | | |
| TX-7 | 9 | 1 | 12:35 | | | | | | | | | | | | | |
| TX-8 | 10 | 1 | 12:38 | | | | | | | | | | | | | |
| TX-9 | 11 | 1 | 12:40 | | | | | | | | | | | | | |
| TX-10 | 12 | 1 | 12:45 | | | | | | | | | | | | | |
| WO-1 | 13 | V | 13:45 | | | | X | X | X | X | X | X | X | X | | 3-24hr |
| WO-2 | 14 | V | 13:47 | | | | X | X | X | X | X | X | X | X | | 3-24hr |

| | | | | | | |
|---|---------------------------|-----------------------------------|--|---------------------------------|-----------|---|
| Relinquished By (Signature) <u>Jeff Monroe</u> | Organization <u>JT</u> | Date/Time 1/5/94 <u>1-5-94</u> | Received By (Signature) | Organization | Date/Time | Turn Around Time (Circle Choice) |
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | 24 Hrs. 48 Hrs. 5 Days 10 Days |
| Relinquished By (Signature) | Organization | Date/Time | Received For Laboratory By (Signature) <u>Jeff Monroe</u> | Date/Time 3:15 <u>1/5/94</u> | | As Contracted |

Section I

Chain of Custody and Analysis Requestpage 1 of 1

From: Superior Precision Analytical, Inc.
 825 Arnold Drive Suite 114
 Martinez, CA 94553
 Phone No. (415) 229-1512 Fax No. (415) 229-1526
 Contact: Nancy
 P.O. No. 30184

Turn Around Time
 (circle one)
 Same Day 72 Hrs
 24 Hrs 5 Day
 48 Hrs 10 Day



Superior Precision Analytical, Inc.

P.O. Box 1545
 Martinez, California 94553

Work Subcontracted to: SF

Section II: Analysis Request

| Laboratory Sample Identification | Matrix | S = Soil A = Air W = Water | 8240 | 8270 | 8010 | 8050 | Client Sample Identification | Number of Containers | Preservative (yes or no) | DATE SAMPLED | Sampling Remarks |
|----------------------------------|--------|-------------------------------|------|------|------|------|------------------------------|----------------------|--------------------------|--------------|---|
| 1 30184-13 | S | X | | | | | W0-1 | 1 | N | 11/5/94 | <input checked="" type="checkbox"/> Chevron |
| 2 -14 | 1 | | | | | | -2 | | | | <input type="checkbox"/> Non-Chevron |
| 3 -15 | | | | | | | -3 | | | | |
| 4 -16 | 4 | | | | | | -4 | | | | |
| 5 | | | | | | | | | | | |
| 6 | | | | | | | | | | | |
| 7 | | | | | | | | | | | |
| 8 | | | | | | | | | | | |
| 9 | | | | | | | | | | | |
| 10 | | | | | | | | | | | |
| 11 | | | | | | | | | | | |
| 12 | | | | | | | | | | | |

Relinquished by Pettit
 Organization SPAN

Date/Time 11/5/94 1700
 Received by _____
 Organization _____

Date/Time

Lab please initial the following:

Samples Stored in Ice _____

Appropriate Containers _____

Samples Preserved _____

VOAs without Headspace _____

Comments _____

Relinquished by _____
 Organization _____

Date/Time _____
 Received by _____
 Organization _____

Date/Time

Relinquished by _____
 Organization _____

Date/Time _____
 Received by _____
 Organization _____

Date/Time



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-2
Reported 01/21/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed | Matrix |
|----------|-----------------------|----------|----------|--------|
| 30214-1 | IX-11 | 01/20/94 | 01/20/94 | Soil |
| 30214-2 | IX-12 | 01/20/94 | 01/21/94 | Soil |
| 30214-3 | IX-13 | 01/20/94 | 01/20/94 | Soil |
| 30214-4 | IX-14 | 01/20/94 | 01/20/94 | Soil |
| 30214-5 | IX-15 | 01/20/94 | 01/20/94 | Soil |
| 30214-6 | IX-16 | 01/20/94 | 01/21/94 | Soil |
| 30214-7 | IX-17 | 01/20/94 | 01/20/94 | Soil |
| 30214-8 | IX-18 | 01/20/94 | 01/21/94 | Soil |
| 30214-9 | IX-19 | 01/20/94 | 01/20/94 | Soil |
| 30214-10 | IX-20 | 01/20/94 | 01/20/94 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30214- 1 30214- 2 30214- 3 30214- 4 30214- 5

| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |
|-----------------|-------|-------|-------|-------|-------|
| Gasoline: | 2600 | 21 | 7400 | 9 | |
| Benzene: | 0.6 | 12 | 0.41 | 1 | 1.2 |
| Toluene: | 0.24 | 120 | 0.077 | 0.92 | 1.2 |
| Ethyl Benzene: | 0.097 | 46 | 0.19 | 0.2 | 0.13 |
| Total Xylenes: | 0.5 | 240 | 0.13 | 0.78 | 0.68 |
| Diesel Range: | NA | NA | NA | NA | NA |
| Oil and Grease: | NA | NA | NA | NA | NA |

Laboratory Number: 30214- 6 30214- 7 30214- 8 30214- 9 30214- 10

| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |
|-----------------|-------|-------|-------|-------|---------|
| Gasoline: | 780 | 7 | 15 | ND<1 | ND<1 |
| Benzene: | 3.7 | 0.25 | 0.18 | 0.11 | ND<.005 |
| Toluene: | 31 | 1.2 | 0.49 | 0.01 | 0.006 |
| Ethyl Benzene: | 20 | 0.32 | 0.52 | 0.055 | ND<.005 |
| Total Xylenes: | 100 | 1.9 | 3.1 | 0.029 | 0.008 |
| Diesel Range: | NA | NA | NA | NA | ND<1 |
| Oil and Grease: | NA | NA | NA | NA | ND<50 |



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-2
Reported 01/21/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed | Matrix |
|----------|-----------------------|----------|----------|--------|
| 30214-11 | WQ-5 | 01/20/94 | 01/20/94 | Soil |
| 30214-12 | WO-6 | 01/20/94 | 01/20/94 | Soil |
| 30214-13 | WO-7 | 01/20/94 | 01/20/94 | Soil |
| 30214-14 | WO-8 | 01/20/94 | 01/21/94 | Soil |
| 30214-15 | SP-7 A-D | 01/20/94 | 01/21/94 | Soil |
| 30214-16 | SP-8 A-D | 01/20/94 | 01/21/94 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30214-11 30214-12 30214-13 30214-14 30214-15

| | | | | | |
|-----------------|---------|---------|---------|-------|---------|
| Gasoline: | ND<1 | 5* | 16* | 10* | 130* |
| Benzene: | ND<.005 | ND<.005 | ND<.005 | 0.005 | ND<0.13 |
| Toluene: | ND<.005 | ND<.005 | 0.008 | 0.007 | 2.2 |
| Ethyl Benzene: | ND<.005 | ND<.005 | ND<.005 | 0.007 | 2.9 |
| Total Xylenes: | 0.005 | 0.011 | 0.066 | 0.031 | 20 |
| Diesel Range: | ND<1 | 17** | 51** | 200** | NA |
| Oil and Grease: | ND<50 | ND<50 | ND<50 | ND<50 | NA |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |

Laboratory Number: 30214-16

| | |
|-----------------|---------|
| Gasoline: | 180* |
| Benzene: | ND<0.13 |
| Toluene: | 1.4 |
| Ethyl Benzene: | 3.5 |
| Total Xylenes: | 27 |
| Diesel Range: | NA |
| Oil and Grease: | NA |
| Concentration: | mg/Kg |

* These hydrocarbons were in the range of gas but did not resemble a gasoline pattern. Chromatogram copies enclosed.

**These hydrocarbons were in the range of diesel but did not resemble a diesel pattern. Chromatogram copies enclosed.



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 3 of 3

QA/QC INFORMATION

SET: 30214

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:

Minimum Detection Limit in Soil: 50mg/kg

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:

Minimum Quantitation Limit for Diesel in Soil: 1mg/kg

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:

Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTxE

Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|-----------------|-----------------|-----|---------------|
| Gasoline: | 118/107 | 10% | 70-130 |
| Benzene: | 88/88 | 0% | 70-130 |
| Toluene: | 107/103 | 4% | 70-130 |
| Ethyl Benzene: | 100/100 | 0% | 70-130 |
| Total Xylenes: | 113/110 | 3% | 70-130 |
| Diesel Range: | 112/114 | 2% | 70-130 |
| Oil and Grease: | 82/80 | 2% | 50-125 |

Michael R. Vining
Senior Chemist

0 14.26 0 0 1,4-Dichlorobenzene P,PPD0 N/A

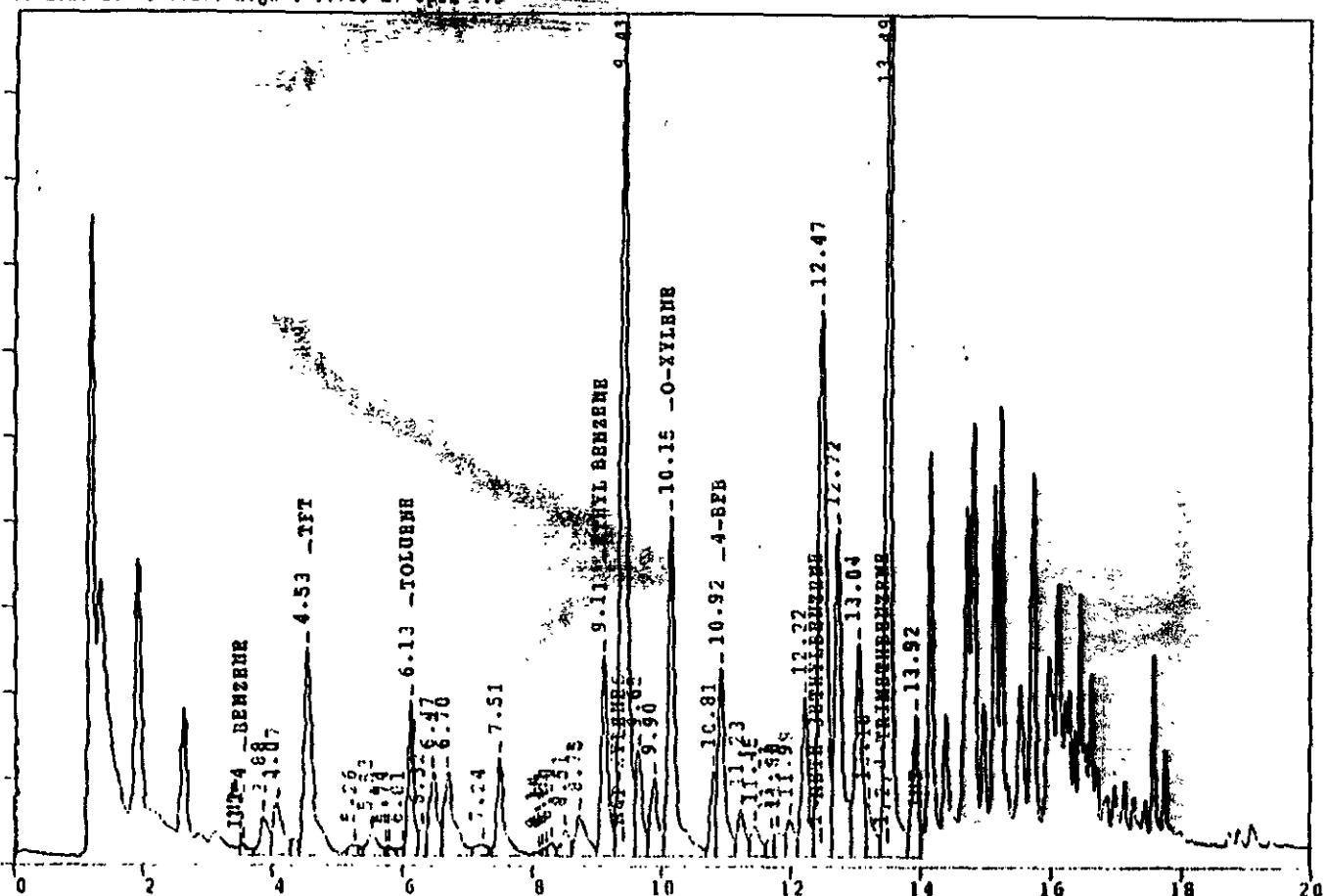
- +-
1) Surrogate : Trifluorotoluene (SS)= 95.99883 %
2) Total Xylenes =19.688.47
3) QC Check : Purge Efficiency (LQC) = 78.36572 %

Checked by dn Date _____

File=C:\CP\vhph\0120G4F.20R Date Printed=01-21-1994 Time= 02:03:27

Sample Name=SAS1-30214-15

0.0 to 20.0 min. Low Y=0.163 High Y=1.763 mV Scale 1.1



SAMPLE ID: SAS1-30214-15

DATA FILE: C:\CP\vhph\0120G4F.20R

RUN DATE: JAN 21, 1994 01:39:00

INSTRUMENT: GAS/BTXE

OPERATOR: dn

METHOD: C:\CP\VPH\GASFTR4.MET
CALIB.: C:\CP\VPH\GASFTR4.CAL
LIMS METHOD: vphbtqe
ANALYSIS METHOD: 8020
EXTRACTION METHOD: 5030

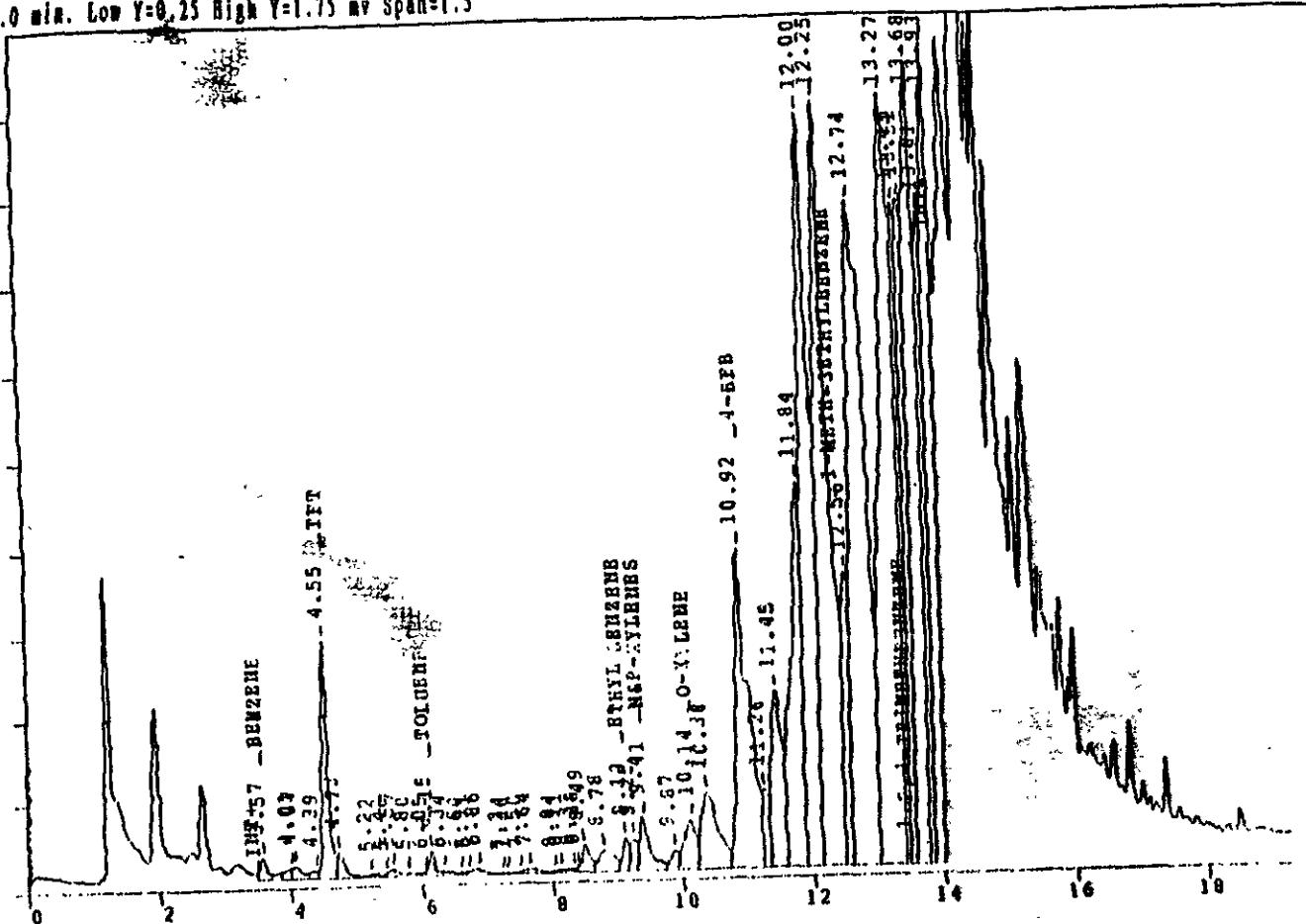
SAMPLE WT/VOL: .02
DILUTION: 1
INSTRUMENT SERIAL #: 2950A26786

| Ret Time (min) | Peak Name | Peak Area | Formula |
|-------------------|-----------------------|--------------|---------|
| 3.57 | BENZENE | 0 | N/A |
| 4.53 | TFT | 3544 | N/A |
| 6.14 | TOLUENE | 0 | N/A |
| 9.11 | ETHYL BENZENE | 0 | N/A |
| 9.40 | M&P-XYLEMES | 0 | N/A |
| 10.15 | O-XYLENE | 0 | N/A |
| 10.92 | 4-RFB | 2469 | N/A |
| 12.46 | 1-METHYL-3-ETHYLBENZE | 0 | N/A |

2) Total Xylenes = 31.1874
3) QC Check : Purge Efficiency (LQC) = 153.0705 %

Checked by _____ Date _____

File=C:\CP\vph\0121G4F.041 Date printed=01-21-1994 Time= 11:45:11
Sample Name=SAS1-30214-14
0.0 to 20.0 min. Low Y=0.25 High Y=1.75 mV Span=1.5



SAMPLE ID: SAS1-30214-14

DATA FILE: C:\CP\vph\0121G4F.041

RUN DATE: JAN 21, 1994 11:20:05

INSTRUMENT: GAS/GTxe
OPERATOR: dn

METHOD: C:\CP\VPH\GASFTR4.MET
CALIB.: C:\CP\VPH\GASFTR4.CAL
LIMS METHOD: vphbtqe
ANALYSIS METHOD: 8020
EXTRACTION METHOD: 5030

SAMPLE WT/VOL: .54
DILUTION: 1
INSTRUMENT SERIAL#: 2950A26786

| Ret Time (min) | Peak Name | Peak Area | Formula |
|-------------------|--------------------|-----------|---------|
| 3.57 | BENZENE | 0 | NA |
| 4.55 | TFT | 2682 | NA |
| 6.14 | TOLUENE | 0 | NA |
| 9.11 | ETHYL BENZENE | 0 | NA |
| 9.40 | M&P-XYLENES | 0 | NA |
| 10.15 | O-XYLENE | 0 | NA |
| 10.92 | 4-BFB | 7530 | NA |
| 12.46 | 1-METH-3ETHYLBENZE | 0 | NA |
| 13.48 | 1,2,4-TRIMETHBENZE | 0 | NA |
| 50.00 | GASINVERT | 0 | 142840 |

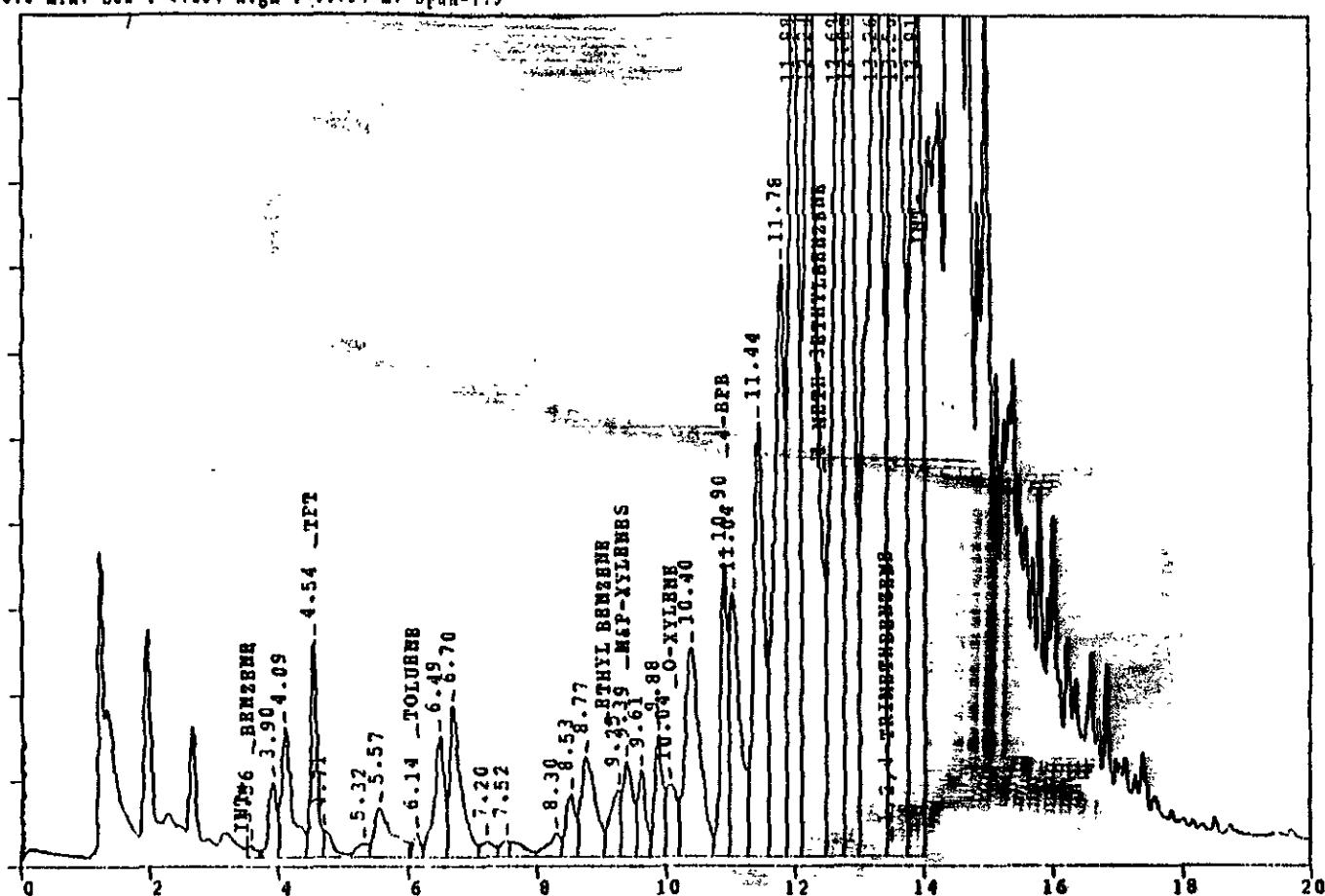
- 1) Surrogate : Trifluorotoluene (SS)= 83.4579 %
 2) Total Xylenes =65.98412
 3) QC Check : Purge Efficiency (LQC) = 95.56856 %

Checked by dn Date _____

File=C:\CP\vph\0120G4F.12R Date printed=01-20-1994 Time= 22:16:44

Sample Name=SAS1-30214-13

0.0 to 20.0 min. Low Y=0.234 High Y=1.754 mv Span=1.5



SAMPLE ID: SAS1-30214-13

DATA FILE: C:\CP\vph\0120G4F.12R

RUN DATE: JAN 20, 1994 21:52:14

INSTRUMENT: GAS/BTXE
OPERATOR: dn

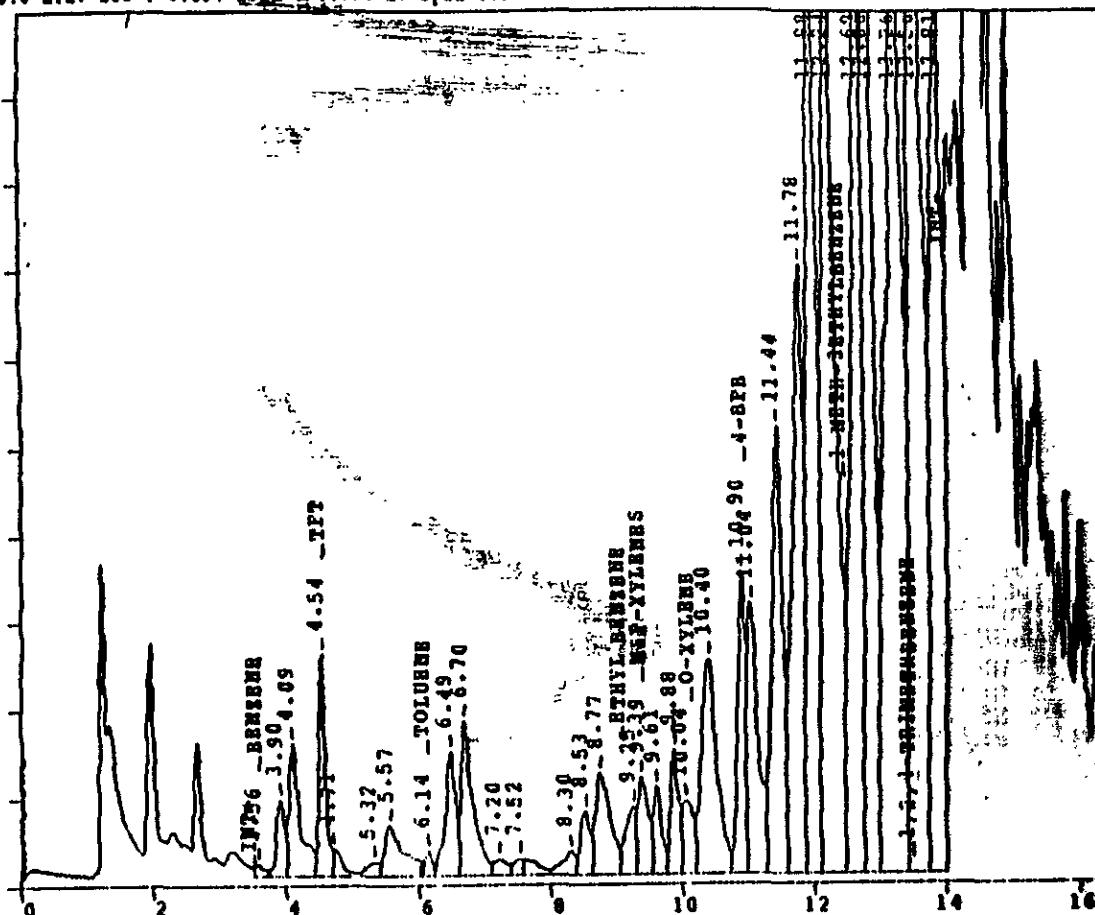
METHOD: C:\CP\VPH\GASFTR4.MET
CALIB.: C:\CP\VPH\GASFTR4.CAL
LIMS METHOD: vphbtqe
ANALYSIS METHOD: 8020
EXTRACTION METHOD: 5030

SAMPLE WT/VOL: .54
DILUTION: 1
INSTRUMENT SERIAL#: 2950A26786

| Ret Time (min) | Peak Name | Peak Area | Formula |
|-------------------|----------------------|-----------|---------|
| 3.57 | BENZENE | 0 | NA |
| 4.54 | TFT | 2603 | NA |
| 6.14 | TOLUENE | 0 | NA |
| 9.11 | ETHYL BENZENE | 0 | NA |
| 9.40 | M&P-XYLENES | 0 | NA |
| 10.15 | O-XYLENE | 0 | NA |
| 10.90 | 4-BFB | 3764 | NA |
| 12.46 | 1-METH-3ETHYLBENZE | 0 | NA |
| 13.48 | 1,2,4-TRIMETHYLBENZE | 0 | NA |
| 15.00 | GASINVERT | 0 | 221885 |

- 1) Surrogate : Trifluorotoluene (SS)= 83.4579 %
 2) Total Xylenes = 65.98412
 3) QC Check : Purge Efficiency (EQC) = 95.56856 %

Checked by dn Date _____
 File=C:\CP\vph\012004E.I2R Date printed=01-20-1994 Time= 22:16:44
 Sample Name=SAS1-30214-13
 0.0 to 20.0 min. Low Y=0.254 High Y=1.754 mV Span=1.5



SAMPLE ID: SAS1-30214-13

DATA FILE: C:\CP\vph\012004E.I2R

RUN DATE: JAN 20, 1994 21:52:14

INSTRUMENT: GAS/BTXE
OPERATOR: dn

METHOD: C:\CP\VPH\GASFTR4.MET
 CALIB.: C:\CP\VPH\GASFTR4.CAL
 LIMS METHOD: vphbtxe
 ANALYSIS METHOD: 8020
 EXTRACTION METHOD: 5030

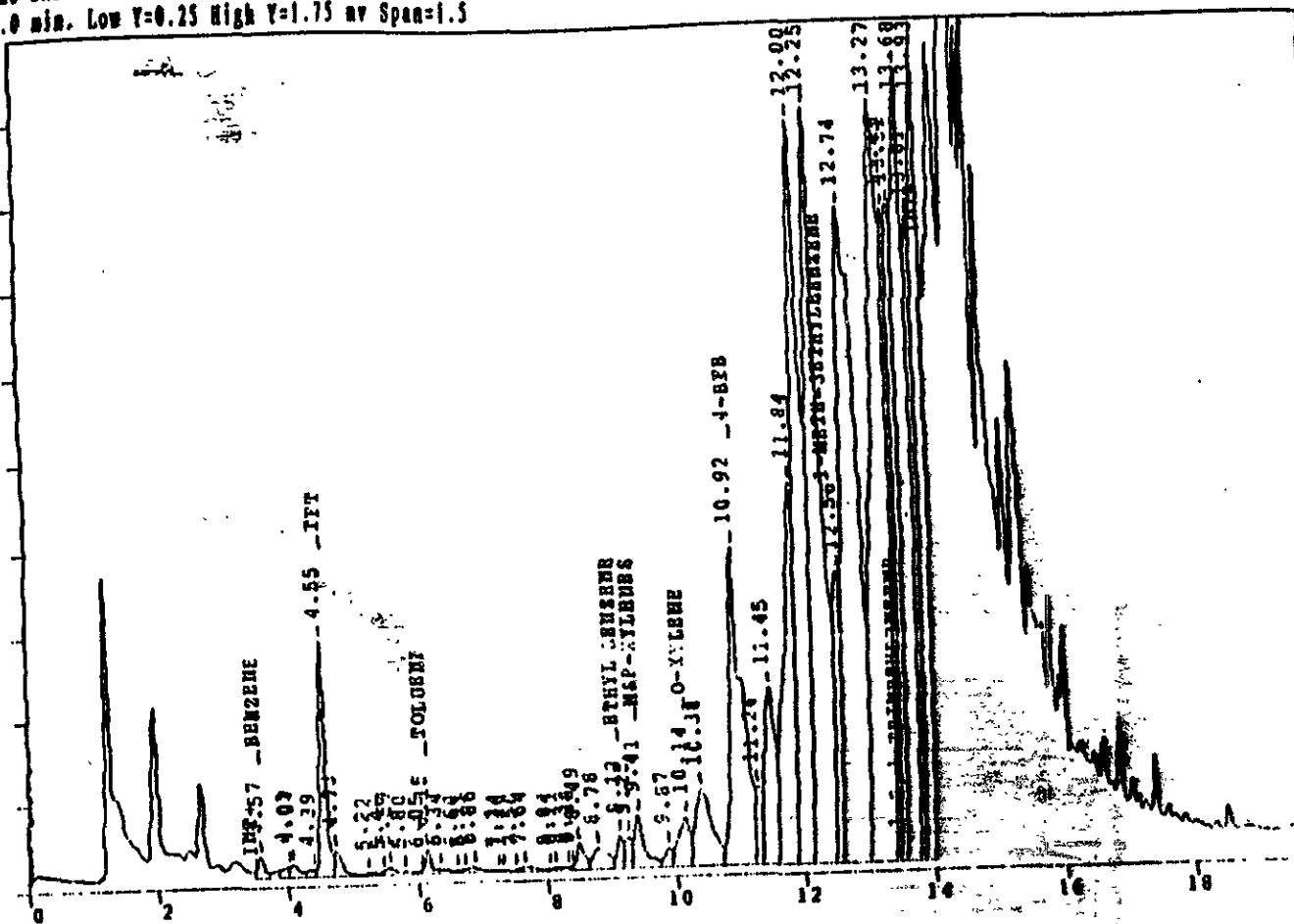
SAMPLE WT/VOL: .54
 DILUTION: 1
 INSTRUMENT SERIAL#:

| Ret Time (min) | Peak Name | Peak Area | Formula |
|-------------------|--------------------|--------------|---------|
| 3.57 | BENZENE | 0 | NA |
| 4.54 | TFT | 2603 | NA |
| 6.14 | TOLUENE | 0 | NA |
| 9.11 | ETHYL BENZENE | 0 | NA |
| 9.40 | M&P-XYLENES | 0 | NA |
| 10.15 | O-XYLENE | 0 | NA |
| 10.90 | 4-BFB | 3764 | NA |
| 12.46 | 1-METH-3ETHYLBENZE | 0 | NA |
| 13.48 | 1,2,4-TRIMETUBENZE | 0 | NA |

2) Total Xylenes = 31.1874
3) QC Check : Purge Efficiency (LQC) = 153.0705 %

Checked by _____ Date _____

File=C:\CP\vph\0121G4F.041 Date printed=01-21-1994 Time= 11:45:14.
Sample Name=SAS1-30214-14
0.0 to 20.0 min. Low Y=0.25 High Y=1.75 av Span=1.5



SAMPLE ID: SAS1-30214-14

RUN DATE: JAN 21, 1994 11:20:05

METHOD: C:\CP\VPH\GASFTR4.MET
CALIB.: C:\CP\VPH\GASFTR4.CAL
LIMS METHOD: vphbtqe
ANALYSIS METHOD: 8020
EXTRACTION METHOD: 5030

DATA FILE: C:\CP\vph\0121G4F.041

INSTRUMENT: GAS/BTQE
OPERATOR: dn

SAMPLE WT/VOL: .54
DILUTION: 1
INSTRUMENT SERIAL #: 2950A26786

| Ret Time (min) | Peak Name | Peak Area | Formula |
|-------------------|--------------------|-----------|---------|
| 3.57 | BENZENE | 0 | NA |
| 4.55 | TFT | 2682 | NA |
| 6.14 | TOLUENE | 0 | NA |
| 9.11 | ETHYL BENZENE | 0 | NA |
| 9.40 | M&P-XYLENES | 0 | NA |
| 10.15 | O-XYLENE | 0 | NA |
| 10.92 | 4-BFB | 7530 | NA |
| 12.46 | 1-METH-3ETHYLBENZE | 0 | NA |
| 13.48 | 1,2,4-TRIMETHBENZE | 0 | NA |
| 50.00 | GASINVERT | 0 | 142840 |

RUN # 5162
START

JAN 21, 1994 01:51:56

DF.022

009987

1.049

1.083

33.9952

33.9959

33.9955

33.9959

33.9954

33.9953

33.9952

33.9951

33.9950

33.9949

33.9948

33.9947

33.9946

33.9945

33.9944

33.9943

33.9942

33.9941

33.9940

33.9939

33.9938

33.9937

33.9936

33.9935

33.9934

33.9933

33.9932

33.9931

33.9930

33.9929

33.9928

33.9927

33.9926

33.9925

33.9924

33.9923

33.9922

33.9921

33.9920

33.9919

33.9918

33.9917

33.9916

33.9915

33.9914

33.9913

33.9912

33.9911

33.9910

33.9909

33.9908

33.9907

33.9906

33.9905

33.9904

33.9903

33.9902

33.9901

33.9900

STOP

33.415

SUPERIOR ANALYTICAL
TOTAL PETROLEUM HYDROCARBON ANALYSIS
JAN 21, 1994

#####REAL CHANNEL#####REAL CHANNEL#####
METHOD USED : M.TPH2.MET
THIS IS COLUMN 1

RUN NUMBER: 5162

BOTTLE NUMBER: 11

30124-13

GASOLINE ----- RT 3.6 TO 11

AREASUM = 811411. CONCENTRATION 64.325

KEROSENE----- RT 3.8 TO 21

AREASUM = 1240608. CONCENTRATION 38.1872

DIESEL RANGE C10-C24 -- RT 6.8 TO 26.5

AREASUM = 2656931. CONCENTRATION 100%

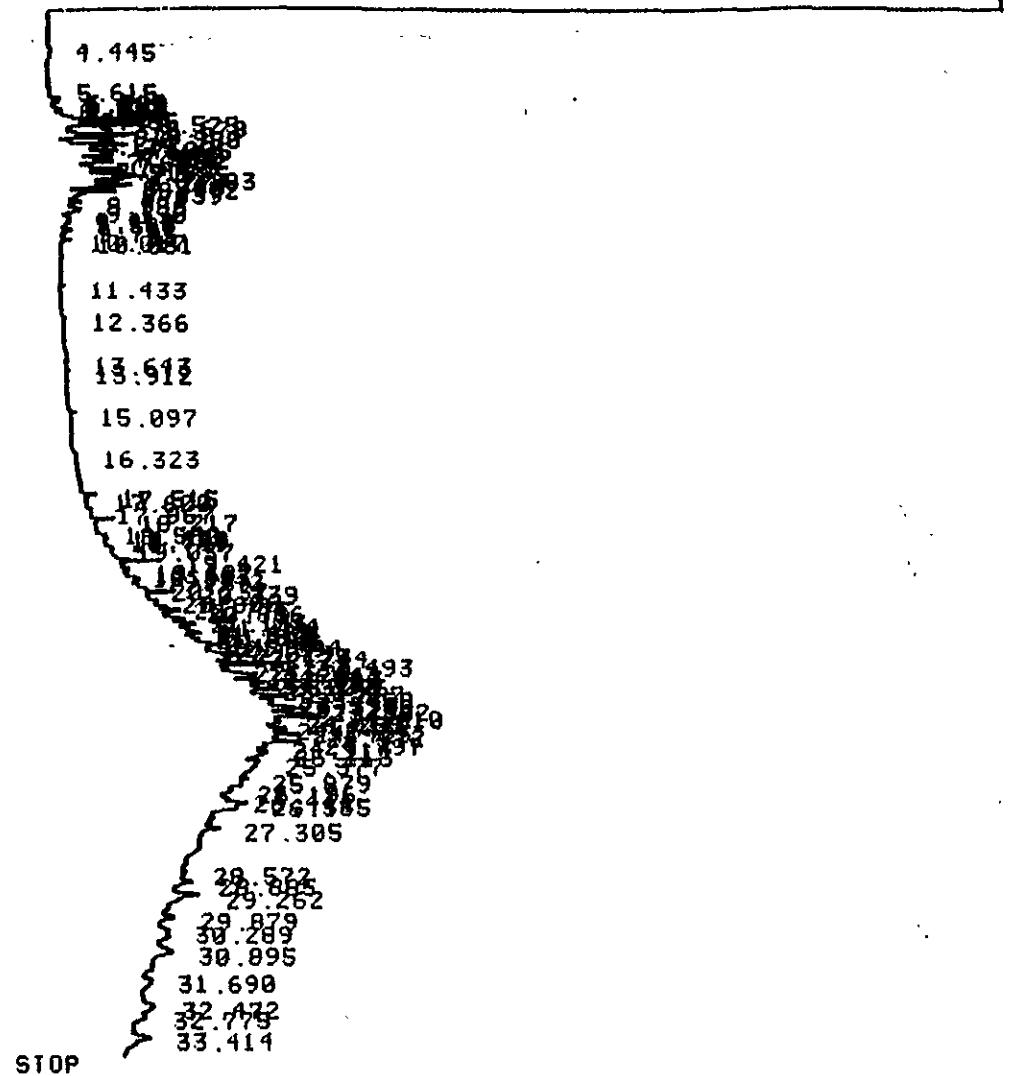
START

PF.021

009955

1.049

1.005



SUPERIOR ANALYTICAL
TOTAL PETROLEUM HYDROCARBON ANALYSIS
JAN 21, 1994

#####REAL CHANNEL#####REAL CHANNEL#####
METHOD USED : M:TPH2.MET
THIS IS COLUMN 1

RUN NUMBER: 5161

BOTTLE NUMBER: 10

30124-12

GASOLINE ----- RT 3.6 TO 11

AREASUM = 123558. CONCENTRATION 9.76627

KEROSENE----- RT 3.8 TO 21

AREASUM = 254924. CONCENTRATION 7.84054

DIESEL RANGE C10-C24 -- RT 6.8 TO 26.5

AREASUM = 907506. CONCENTRATION 17.3728

17PPM

RUN # 5163
START

JAN 21, 1994 02:31:11

BF.022

009987

1.019

1.007

2.664

1.568

1.9215

1.9215

1.9215

1.9215

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1.9215

1.9215

1.9215

1.9215

STOP

33.840 3.608 33.420

32.800 32.4182

33.840 3.608 33.420

32.800 32.4182

33.840 3.608 33.420

32.800 32.4182

33.840 3.608 33.420

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32.800 32.4182

33.840 3.608 33.420

32.800 32.4182

33.840 3.608 33.420

32.800 32.4182

33.840 3.608 33.420

32.800 32.4182

33.840 3.608 33.420

SUPERIOR ANALYTICAL
TOTAL PETROLEUM HYDROCARBON ANALYSIS
JAN 21, 1994

#####REAL CHANNEL#####REAL CHANNEL#####
METHOD USED : M:TPH2.MET
THIS IS COLUMN 1

RUN NUMBER: 5163

BOTTLE NUMBER: 12

30124-14

GASOLINE ----- RT 3.6 TO 11

AREASUM = 1100429. CONCENTRATION 87.345

KEROSENE----- RT 3.8 TO 21

AREASUM = 2437072. CONCENTRATION 75.0884%

DIESEL RANGE C10-C24 -- RT 6.8 TO 26.5

AREASUM = 9826637. CONCENTRATION 197.143

CONCENTRATION FACTOR = 2.

200 PPT

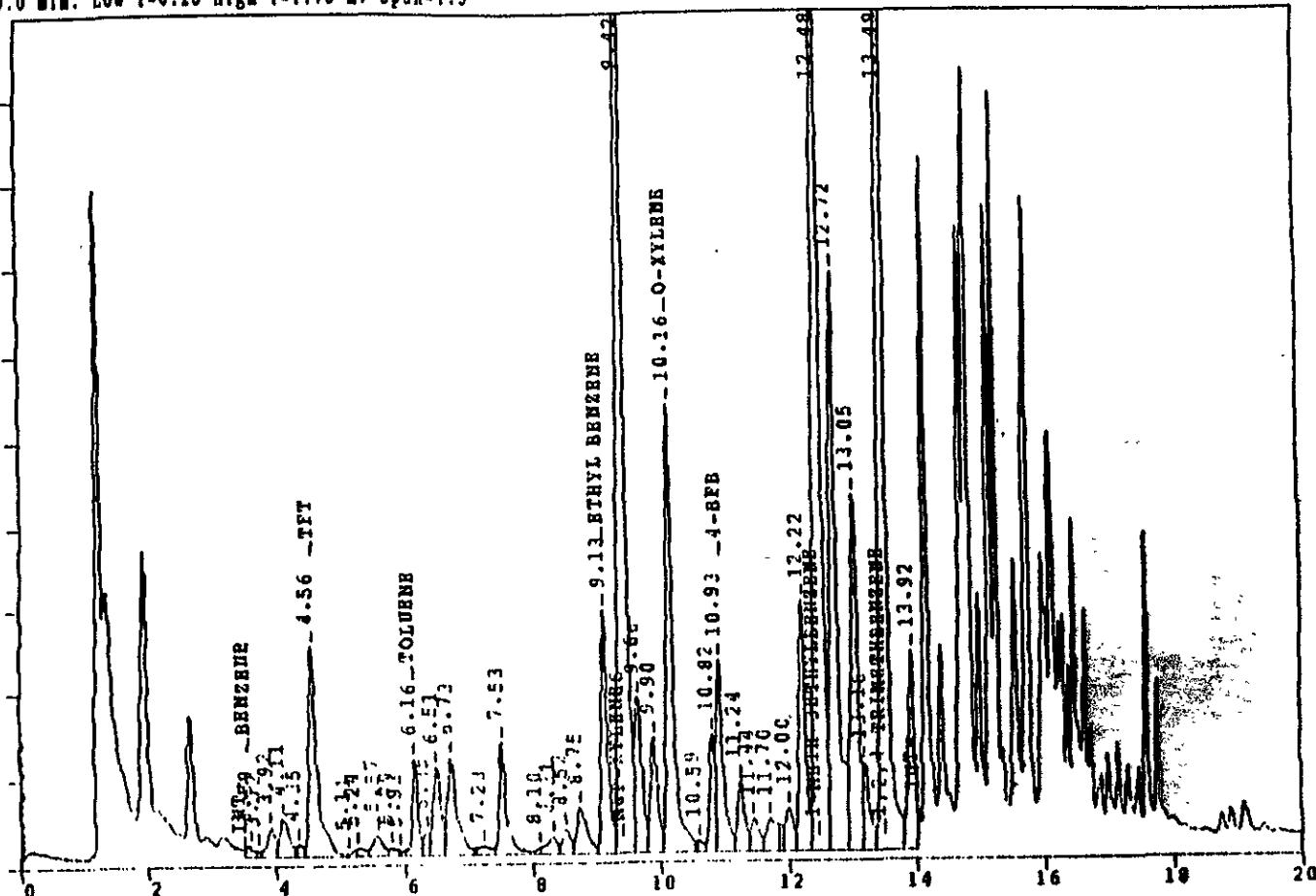
- 1) Surrogate : Trifluorotoluene (SS)= 96.73809 %
 2) Total Xylenes = 26959.34
 3) QC Check : Purge, Efficiency (LQC) = 77.70085 %

dn

Date

Checked by

File=C:\CP\vph\0120G4F.21R Date printed=01-21-1994 Time= 02:31:50
 Sample Name=SAS1-30214-16
 0.0 to 20.0 min. Low Y=0.26 High Y=1.76 mV Span=1.5



SAMPLE ID: SAS1-30214-16

DATA FILE: C:\CP\vph\0120G4F.21R

RUN DATE: JAN 21, 1994 02:07:15

INSTRUMENT: GAS/BTXE
 OPERATOR: dn

METHOD: C:\CP\VPH\GASFTR4.MET
 CALIB.: C:\CP\VPH\GASFTR4.CAL
 LIMS METHOD: vphbtqe
 ANALYSIS METHOD: 8020
 EXTRACTION METHOD: 5030

SAMPLE WT/VOL: .02
 DILUTION: 1
 INSTRUMENT SERIAL#: 2950A26786

| Ret Time (min) | Peak Name | Peak Area | Formula |
|-------------------|----------------------|-----------|---------|
| 3.57 | BENZENE | 0 | NA |
| 4.56 | TFT | 3234 | NA |
| 6.14 | TOLUENE | 0 | NA |
| 9.11 | ETHYL BENZENE | 0 | NA |
| 9.40 | M&P-XYLENES | 0 | NA |
| 10.15 | O-XYLENE | 0 | NA |
| 10.93 | 4-BFB | 2411 | NA |
| 12.46 | 1-METH-3ETHYLBENZE | 0 | NA |
| 13.48 | 1,2,4-TRIMETHYLBENZE | 0 | NA |
| 50.00 | GASINVERT | 0 | 93552 |

Fax copy of Lab Report and COC to Chevron Contact: Yes No 70214 8252 Chain-of-Custody-Record

Chevron U.S.A. Inc.
P.O. BOX 5004
San Ramon, CA 94583
FAX (415)842-9591

Chevron Facility Number 70214 0006
Facility Address 460 Grand Ave., Oakland
Consultant Project Number COC-6-2
Consultant Name Rockline Developments
Address P.O. Box 2554, Santa Rosa, CA
Project Contact (Name) Jeff Monroe
(Phone) 707-533-8618 (Fax Number) 5368812

Chevron Contact (Name) Mark Miller
(Phone) 510 842 8134
Laboratory Name Sigerson
Laboratory Release Number 8499660
Samples Collected by (Name) Jeff Monroe
Collection Date 1-20-94
Signature Jeff Monroe

| Sample Number | Lab Sample Number | Number of Containers | Matrix S = Soil A = Air W = Water C = Charcoal | Type G = Grab C = Composite D = Discrete | Time | Sample Preservation | Lead (Yes or No) | Analyses To Be Performed | | | | | | | Remarks | |
|---------------|-------------------|----------------------|--|---|-------|---------------------|------------------|---------------------------------|----------------------|--------------------------|---------------------------------|------------------------------|------------------------------|--------------------------------|--|----------|
| | | | | | | | | BTEX + TPH GAS (8020 + 8015) | TPH Diesel (8015) | Oil and Grease (8020) | Purgeable Halocarbons (8010) | Purgeable Aromatic (8240) | Purgeable Organics (8270) | Extractable Organics (8270) | Metals Cd, Cr, Pb, Zn, Ni (ICAP or AA) | |
| TX-11 | 1 | S | D | 9:30 | | NOS | X | | | | | | | | | |
| TX-12 | 1 | | | | 9:33 | | | | | | | | | | | Normal |
| TX-13 | 1 | | | | 9:34 | | | | | | | | | | | HT |
| TX-14 | | | | | 9:36 | | | | | | | | | | | |
| TX-15 | | | | | 9:45 | | | | | | | | | | | |
| TX-16 | | | | | 9:46 | | | | | | | | | | | 24 to 48 |
| TX-17 | | | | | 9:50 | | | | | | | | | | | |
| TX-18 | | | | | 9:53 | | | | | | | | | | | HR TAT |
| TX-19 | | | | | 9:56 | | | | | | | | | | | |
| TX-20 | | | | | 10:00 | | | X | X | | | | | | | |
| WD-5 | | | | | 11:14 | | | X | X | | | | | | | 24 to 48 |
| WD-6 | | | | | 11:15 | | | X | X | | | | | | | |
| WD-7 | | V | V | V | 11:30 | | V | X | X | | | | | | | HR TAT |
| WD-8 | | S | D | 11:31 | | NOS | V | V | V | | | | | | | |

Relinquished By (Signature)

Relinquished By (Signature)

Relinquished By (Signature)

Organization

Organization

Organization

Date/Time

Date/Time

Date/Time

Received By (Signature)

Received By (Signature)

Received By Laboratory By (Signature)

Organization

Organization

Organization

Date/Time

Date/Time

Date/Time

Turn Around Time (Circle Choice)

24 Hrs.

48 Hrs.

5 Days

10 Days

As Contracted



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-2
Reported 01/28/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed | Matrix |
|----------|-----------------------|----------|----------|--------|
| 30220- 1 | IB-3 | 01/21/94 | 01/25/94 | Soil |
| 30220- 2 | IX-21 | 01/21/94 | 01/28/94 | Soil |
| 30220- 3 | IX-22 | 01/21/94 | 01/25/94 | Soil |
| 30220- 4 | WO-9 | 01/21/94 | 01/26/94 | Soil |
| 30220- 5 | WO-10 | 01/21/94 | 01/26/94 | Soil |
| 30220- 6 | WO-11 | 01/21/94 | 01/27/94 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30220- 1 30220- 2 30220- 3 30220- 4 30220- 5

| | | | | | |
|-----------------|---------|-------|-------|-------|---------|
| Gasoline: | ND<1 | 900 | 14 | 49 | 18 |
| Benzene: | ND<.005 | 1.7 | 0.26 | 0.077 | ND<.005 |
| Toluene: | ND<.005 | 35 | 0.94 | 0.71 | ND<.005 |
| Ethyl Benzene: | ND<.005 | 16 | 0.17 | 0.99 | 0.084 |
| Total Xylenes: | ND<.005 | 110 | 1.5 | 6.4 | 0.36 |
| Diesel Range: | NA | NA | NA | 10 | 90 |
| Oil and Grease: | NA | NA | NA | ND<50 | ND<50 |
| Concentration: | mg/Kg | mg/Kg | mg/Kg | mg/Kg | mg/Kg |

Laboratory Number: 30220- 6

| | |
|-----------------|---------|
| Gasoline: | ND<1 |
| Benzene: | ND<.005 |
| Toluene: | ND<.005 |
| Ethyl Benzene: | ND<.005 |
| Total Xylenes: | 0.006 |
| Diesel Range: | 2 |
| Oil and Grease: | ND<50 |
| Concentration: | mg/Kg |



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C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 2 of 2
QA/QC INFORMATION
SET: 30220

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:

Minimum Detection Limit in Soil: 50mg/kg

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:

Minimum Quantitation Limit for Diesel in Soil: 1mg/kg

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:

Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTxE

Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|-----------------|-----------------|-----|---------------|
| Gasoline: | 116/110 | 5% | 70-130 |
| Benzene: | 106/101 | 5% | 70-130 |
| Toluene: | 107/103 | 4% | 70-130 |
| Ethyl Benzene: | 100/100 | 0% | 70-130 |
| Total Xylenes: | 115/113 | 2% | 70-130 |
| Diesel Range: | 117/116 | 1% | 70-130 |
| Oil and Grease: | 82/80 | 2% | 50-140 |

Asanah. Sal
Senior Chemist



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-2
Reported 28-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030 8010.

Chronology

Laboratory Number 30220

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|----------|-------|
| WO-9 | 01/21/94 | 01/21/94 | / | / | 01/26/94 | 4 |
| WO-10 | 01/21/94 | 01/21/94 | / | / | 01/26/94 | 5 |
| WO-11 | 01/21/94 | 01/21/94 | / | / | 01/26/94 | 6 |



TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-2
Reported 28-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30220- 4 | WO-9 | Soil |
| 30220- 5 | WO-10 | Soil |
| 30220- 6 | WO-11 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30220- 4 30220- 5 30220- 6

| | | | |
|-------------------------|-------|-------|-------|
| Chloromethane/Vinyl Ch: | ND<10 | ND<10 | ND<10 |
| Bromomethane: | ND<5 | ND<5 | ND<5 |
| Chloroethane: | ND<5 | ND<5 | ND<5 |
| Trichlorofluoromethane: | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethene: | ND<5 | ND<5 | ND<5 |
| Dichloromethane: | ND<5 | ND<5 | ND<5 |
| t-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 |
| 1,1-Dichloroethane: | ND<5 | ND<5 | ND<5 |
| c-1,2-Dichloroethene: | ND<5 | ND<5 | ND<5 |
| Chloroform: | ND<5 | ND<5 | ND<5 |
| 1,1,1-Trichloroethane: | ND<5 | ND<5 | ND<5 |
| Carbon tetrachloride: | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloroethane: | 28 | ND<5 | ND<5 |
| Trichloroethene: | ND<5 | ND<5 | ND<5 |
| c-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 |
| 1,2-Dichloropropane: | ND<5 | ND<5 | ND<5 |
| t-1,3-Dichloropropene: | ND<5 | ND<5 | ND<5 |
| Bromodichloromethane: | ND<5 | ND<5 | ND<5 |
| 1,1,2-Trichloroethane: | ND<5 | ND<5 | ND<5 |
| Tetrachloroethene: | ND<5 | ND<5 | ND<5 |
| Dibromochloromethane: | ND<5 | ND<5 | ND<5 |
| Chlorobenzene: | ND<5 | ND<5 | ND<5 |
| Bromoform: | ND<5 | ND<5 | ND<5 |
| 1,1,2,2-Tetrachloroeth: | ND<5 | ND<5 | ND<5 |
| 1,3-Dichlorobenzene: | ND<5 | ND<5 | ND<5 |
| 1,2-Dichlorobenzene: | ND<5 | ND<5 | ND<5 |
| 1,4-Dichlorobenzene: | ND<5 | ND<5 | ND<5 |

8010
list

Concentration: ug/Kg ug/Kg ug/Kg



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HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010. Quality Assurance and Control Data - Soil

Laboratory Number 30220

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| Chloromethane/Vinyl Ch: | ND<10 | 10 | | | |
| Bromomethane: | ND<5 | 5 | | | |
| Chloroethane: | ND<5 | 5 | | | |
| Trichlorofluoromethane: | ND<5 | 5 | | | |
| 1,1-Dichloroethene: | ND<5 | 5 | 143/135 | 78-158 | 6% |
| Dichloromethane: | ND<5 | 5 | | | |
| t-1,2-Dichloroethene: | ND<5 | 5 | | | |
| 1,1-Dichloroethane: | ND<5 | 5 | | | |
| c-1,2-Dichloroethene: | ND<5 | 5 | | | |
| Chloroform: | ND<5 | 5 | | | |
| 1,1,1-Trichloroethane: | ND<5 | 5 | | | |
| Carbon tetrachloride: | ND<5 | 5 | | | |
| 1,2-Dichloroethane: | ND<5 | 5 | | | |
| Trichloroethene: | ND<5 | 5 | 114/105 | 83-138 | 8% |
| c-1,3-Dichloropropene: | ND<5 | 5 | | | |
| 1,2-Dichloropropane: | ND<5 | 5 | | | |
| t-1,3-Dichloropropene: | ND<5 | 5 | | | |
| Bromodichloromethane: | ND<5 | 5 | | | |
| 1,1,2-Trichloroethane: | ND<5 | 5 | | | |
| Tetrachloroethene: | ND<5 | 5 | | | |
| Dibromochloromethane: | ND<5 | 5 | | | |
| Chlorobenzene: | ND<5 | 5 | 118/106 | 90-124 | 11% |
| Bromoform: | ND<5 | 5 | | | |
| 1,1,2,2-Tetrachloroeth: | ND<5 | 5 | | | |
| 1,3-Dichlorobenzene: | ND<5 | 5 | | | |
| 1,2-Dichlorobenzene: | ND<5 | 5 | | | |
| 1,4-Dichlorobenzene: | ND<5 | 5 | | | |

Definitions:

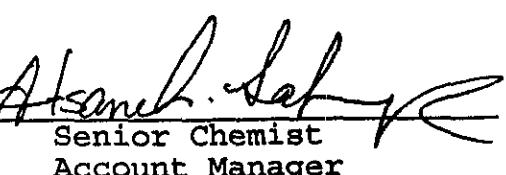
ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 30220


Alson L. Salazar
Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-2
Reported 25-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

Chronology

Laboratory Number 30220

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------|
| WO-9 | 01/21/94 | 01/21/94 | 01/24/94 | 01/25/94 | | 4 |
| WO-10 | 01/21/94 | 01/21/94 | 01/24/94 | 01/25/94 | | 5 |
| WO-11 | 01/21/94 | 01/21/94 | 01/24/94 | 01/25/94 | | 6 |

8



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-2
Reported 25-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30220- 4 | WO-9 | Soil |
| 30220- 5 | WO-10 | Soil |
| 30220- 6 | WO-11 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30220- 4 30220- 5 30220- 6

| | | | |
|--------------------------|---------|---------|--------|
| bis(2-chloroethyl)ethe: | ND<3300 | ND<3300 | ND<330 |
| aniline: | ND<3300 | ND<3300 | ND<330 |
| phenol: | ND<3300 | ND<3300 | ND<330 |
| 2-chlorophenol: | ND<3300 | ND<3300 | ND<330 |
| 1,3-dichlorobenzene: | ND<3300 | ND<3300 | ND<330 |
| 1,4-dichlorobenzene: | ND<3300 | ND<3300 | ND<330 |
| 1,2-dichlorobenzene: | ND<3300 | ND<3300 | ND<330 |
| benzyl alcohol: | ND<3300 | ND<3300 | ND<330 |
| bis-(2-chloroisopropyl): | ND<3300 | ND<3300 | ND<330 |
| 2-methylphenol: | ND<3300 | ND<3300 | ND<330 |
| hexachloroethane: | ND<3300 | ND<3300 | ND<330 |
| n-nitroso-di-n-propyla: | ND<3300 | ND<3300 | ND<330 |
| 4-methylphenol: | ND<3300 | ND<3300 | ND<330 |
| nitrobenzene: | ND<3300 | ND<3300 | ND<330 |
| isophorone: | ND<3300 | ND<3300 | ND<330 |
| 2-nitrophenol: | ND<3300 | ND<3300 | ND<330 |
| 2,4-dimethylphenol: | ND<3300 | ND<3300 | ND<330 |
| bis(2-chloroethoxy)met: | ND<3300 | ND<3300 | ND<330 |
| 2,4-dichlorophenol: | ND<3300 | ND<3300 | ND<330 |
| 1,2,4-trichlorobenzene: | ND<3300 | ND<3300 | ND<330 |
| naphthalene: | ND<3300 | ND<3300 | ND<330 |
| benzoic acid: | ND<3300 | ND<3300 | ND<330 |
| 4-chloroaniline: | ND<3300 | ND<3300 | ND<330 |
| hexachlorobutadiene: | ND<3300 | ND<3300 | ND<330 |
| 4-chloro-3-methylpheno: | ND<3300 | ND<3300 | ND<330 |
| 2-methyl-naphthalene: | ND<3300 | ND<3300 | ND<330 |
| hexachlorocyclopentadi: | ND<3300 | ND<3300 | ND<330 |
| 2,4,6-trichlorophenol: | ND<3300 | ND<3300 | ND<330 |
| 2,4,5-trichlorophenol: | ND<8000 | ND<8000 | ND<800 |

Concentration: ug/Kg ug/Kg ug/Kg



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-2
Reported 25-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30220- 4 | WO-9 | Soil |
| 30220- 5 | WO-10 | Soil |
| 30220- 6 | WO-11 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30220- 4 30220- 5 30220- 6

| | | | |
|-------------------------|---------|---------|---------|
| 2-chloronaphthalene: | ND<3300 | ND<3300 | ND<330 |
| 2-nitroaniline: | ND<8000 | ND<8000 | ND<800 |
| acenaphthylene: | ND<3300 | ND<3300 | ND<330 |
| dimethylphthalate: | ND<3300 | ND<3300 | ND<330 |
| 2,6-dinitrotoluene: | ND<3300 | ND<3300 | ND<330 |
| acenaphthene: | ND<3300 | ND<3300 | ND<330 |
| 3-nitroaniline: | ND<8000 | ND<8000 | ND<800 |
| 2,4-dinitrophenol: | ND<8000 | ND<8000 | ND<800 |
| dibenzofuran: | ND<3300 | ND<3300 | ND<330 |
| 2,4-dinitrotoluene: | ND<3300 | ND<3300 | ND<330 |
| 4-nitrophenol: | ND<8000 | ND<8000 | ND<800 |
| fluorene: | ND<3300 | ND<3300 | ND<330 |
| 4-chlorophenyl-phenyle: | ND<3300 | ND<3300 | ND<330 |
| diethylphthalate: | ND<3300 | ND<3300 | ND<330 |
| 4-nitroaniline: | ND<8000 | ND<8000 | ND<800 |
| 4,6-dinitro-2-methylph: | ND<8000 | ND<8000 | ND<800 |
| n-nitrosodiphenylamine: | ND<3300 | ND<3300 | ND<330 |
| 4-bromo-phenyl-phenyle: | ND<3300 | ND<3300 | ND<330 |
| hexachlorobenzene: | ND<3300 | ND<3300 | ND<330 |
| pentachlorophenol: | ND<8000 | ND<8000 | ND<800 |
| phenanthrene: | ND<3300 | ND<3300 | ND<330 |
| anthracene: | ND<3300 | ND<3300 | ND<330 |
| di-n-butylphthalate: | ND<3300 | ND<3300 | ND<330 |
| fluoranthene: | ND<3300 | ND<3300 | ND<330 |
| benzidine: | ND<1700 | ND<1700 | ND<1700 |
| pyrene: | ND<3300 | ND<3300 | ND<330 |
| butylbenzylphthalate: | ND<3300 | ND<3300 | ND<330 |
| 3,3'-dichlorobenzidine: | ND<6600 | ND<6600 | ND<660 |
| benzo[a]anthracene: | ND<3300 | ND<3300 | ND<330 |

Concentration: ug/Kg ug/Kg ug/Kg



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-2
Reported 25-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 30220- 4 | WO-9 | Soil |
| 30220- 5 | WO-10 | Soil |
| 30220- 6 | WO-11 | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30220- 4 30220- 5 30220- 6

| | | | |
|-------------------------|---------|---------|--------|
| chrysene: | ND<3300 | ND<3300 | ND<330 |
| bis(2-ethylhexyl)phtha: | ND<3300 | ND<3300 | ND<330 |
| di-n-octylphthalate: | ND<3300 | ND<3300 | ND<330 |
| benzo(b,k)fluoranthene: | ND<3300 | ND<3300 | ND<330 |
| benzo[a]pyrene: | ND<3300 | ND<3300 | ND<330 |
| indeno[1,2,3-cd]pyrene: | ND<3300 | ND<3300 | ND<330 |
| dibenzo[a,h]anthracene: | ND<3300 | ND<3300 | ND<330 |
| benzo[g,h,i]anthracene: | ND<3300 | ND<3300 | ND<330 |

| | | | |
|----------------|-------|-------|-------|
| Concentration: | ug/Kg | ug/Kg | ug/Kg |
|----------------|-------|-------|-------|

-- Surrogate % Recoveries --

| | | | |
|-----------------------|----|-----|----|
| 2-fluorophenol: | 80 | 89 | 63 |
| phenol-d6: | 84 | 91 | 68 |
| nitrobenzene-d5: | 78 | 86 | 64 |
| 2-fluorobiphenyl: | 95 | 101 | 77 |
| 2,4,6-tribromophenol: | 70 | 75 | 71 |
| terphenyl-d14: | 96 | 103 | 91 |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 30220

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-----------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| bis(2-chloroethyl)ethane: | ND<330 | 330 | | | |
| aniline: | ND<330 | 330 | | | |
| phenol: | ND<330 | 330 | | | |
| 2-chlorophenol: | ND<330 | 330 | 70/71 | 55-105 | 1% |
| 1,3-dichlorobenzene: | ND<330 | 330 | 70/73 | 60-111 | 4% |
| 1,4-dichlorobenzene: | ND<330 | 330 | 68/70 | 52-116 | 3% |
| 1,2-dichlorobenzene: | ND<330 | 330 | | | |
| benzyl alcohol: | ND<330 | 330 | | | |
| bis-(2-chloroisopropyl): | ND<330 | 330 | | | |
| 2-methylphenol: | ND<330 | 330 | | | |
| hexachloroethane: | ND<330 | 330 | | | |
| n-nitroso-di-n-propylamine: | ND<330 | 330 | 71/75 | 59-130 | 5% |
| 4-methylphenol: | ND<330 | 330 | | | |
| nitrobenzene: | ND<330 | 330 | | | |
| isophorone: | ND<330 | 330 | | | |
| 2-nitrophenol: | ND<330 | 330 | | | |
| 2,4-dimethylphenol: | ND<330 | 330 | | | |
| bis(2-chloroethoxy)ether: | ND<330 | 330 | | | |
| 2,4-dichlorophenol: | ND<330 | 330 | | | |
| 1,2,4-trichlorobenzene: | ND<330 | 330 | 63/65 | 45-119 | 3% |
| naphthalene: | ND<330 | 330 | | | |
| benzoic acid: | ND<330 | 330 | | | |
| 4-chloroaniline: | ND<330 | 330 | | | |
| hexachlorobutadiene: | ND<330 | 330 | | | |
| 4-chloro-3-methylpheno: | ND<330 | 330 | 75/78 | 50-120 | 4% |
| 2-methyl-naphthalene: | ND<330 | 330 | | | |
| hexachlorocyclopentadiene: | ND<330 | 330 | | | |
| 2,4,6-trichlorophenol: | ND<330 | 330 | | | |
| 2,4,5-trichlorophenol: | ND<800 | 800 | | | |



Superior Precision Analytical, Inc.

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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 30220

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| 2-chloronaphthalene: | ND<330 | 330 | | | |
| 2-nitroaniline: | ND<800 | 800 | | | |
| acenaphthylene: | ND<330 | 330 | | | |
| dimethylphthalate: | ND<330 | 330 | | | |
| 2,6-dinitrotoluene: | ND<330 | 330 | | | |
| acenaphthene: | ND<330 | 330 | 67/70 | 55-112 | 4% |
| 3-nitroaniline: | ND<800 | 800 | | | |
| 2,4-dinitrophenol: | ND<800 | 800 | | | |
| dibenzofuran: | ND<330 | 330 | | | |
| 2,4-dinitrotoluene: | ND<330 | 330 | 55/62 | 40-101 | 12% |
| 4-nitrophenol: | ND<800 | 800 | 63/69 | 1-157 | 9% |
| fluorene: | ND<330 | 330 | | | |
| 4-chlorophenyl-phenyle: | ND<330 | 330 | | | |
| diethylphthalate: | ND<330 | 330 | | | |
| 4-nitroaniline: | ND<800 | 800 | | | |
| 4,6-dinitro-2-methylph: | ND<800 | 800 | | | |
| n-nitrosodiphenylamine: | ND<330 | 330 | | | |
| 4-bromo-phenyl-phenyle: | ND<330 | 330 | | | |
| hexachlorobenzene: | ND<330 | 330 | | | |
| pentachlorophenol: | ND<800 | 800 | 62/65 | 1-144 | 5% |
| phenanthrene: | ND<330 | 330 | | | |
| anthracene: | ND<330 | 330 | | | |
| di-n-butylphthalate: | ND<330 | 330 | | | |
| fluoranthene: | ND<330 | 330 | | | |
| benzidine: | ND<1700 | 1700 | | | |
| pyrene: | ND<330 | 330 | 80/84 | 55-136 | 5% |
| butylbenzylphthalate: | ND<330 | 330 | | | |
| 3,3'-dichlorobenzidine: | ND<660 | 660 | | | |
| benzo[a]anthracene: | ND<330 | 330 | | | |



Superior Precision Analytical, Inc.

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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 30220

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| chrysene: | ND<330 | 330 | | | |
| bis(2-ethylhexyl)phta: | ND<330 | 330 | | | |
| di-n-octylphthalate: | ND<330 | 330 | | | |
| benzo(b,k)fluoranthene: | ND<330 | 330 | | | |
| benzo[a]pyrene: | ND<330 | 330 | | | |
| indeno[1,2,3-cd]pyrene: | ND<330 | 330 | | | |
| dibenzo[a,h]anthracene: | ND<330 | 330 | | | |
| benzo[g,h,i]anthracene: | ND<330 | 330 | | | |
| 2-fluorophenol: | 84 | | | 25-121 | |
| phenol-d6: | 87 | | | 24-113 | |
| nitrobenzene-d5: | 87 | | | 23-120 | |
| 2-fluorobiphenyl: | 98 | | | 30-115 | |
| 2,4,6-tribromophenol: | 83 | | | 19-122 | |
| terphenyl-d14: | 110 | | | 18-137 | |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 30220

Senior Chemist
Account Manager

~~URGENT~~ 7/15/94
Fax copy of Lab Report and COC to Chevron Contact: Yes

502657 Chain-of-Custody-Record

| | | |
|---|---|--|
| Chevron U.S.A. Inc. P.O. BOX 5004 San Ramon, CA 94583 FAX (415)842-9591 | Chevron Facility Number Facility Address Consultant Project Number Consultant Name Address Project Contact (Name) (Phone) | Chevron Contact (Name) (Phone) Laboratory Name Laboratory Release Number Samples Collected by (Name) Collection Date Signature |
| 0000 460 Ogilvie Ave Oakland 0000-3 Touchstone Developments PO Box 2534 Santa Rosa Jeff Monroe 707 578 8816 | | Mark Miller 510 842-8134 Superior 8499660 Jeff Monroe 7-21-94 Jeff Monroe |

| Sample Number | Lab Sample Number | Number of Containers | Matrix: S = Soil W = Water C = Charcoal | A = Air B = Composite | C = Grab D = Discrete | Time | Sample Preservation | Load (Yes or No) | Analyses To Be Performed | | | | | | Remarks | |
|---------------|-------------------|----------------------|--|--------------------------|--------------------------|-------|---------------------|------------------|---------------------------------|----------------------|--------------------------|----------------------------------|-------------------------------|------------------------------|--------------------------------|---|
| | | | | | | | | | STEX + TPH GAS (8020 + 8015) | TPH Diesel (8015) | Oil and Grease (8520) | Purgeable Hydrocarbons (8010) | Purgeable Aromatics (8020) | Purgeable Organics (8240) | Extractable Organics (8270) | Metals Ca, Cr, Pb, Zn, Ni (ICP or AA) |
| FB-3 | 15 | D | 10:27 | | | | | Yes | X | | | | | | | S day |
| IX-21 | | 1 | | | | 10:29 | | | | | | | | | | TAT |
| IX-22 | | 1 | | | | 10:30 | | | | | | | | | | |
| W-9 | | | | | | 10:32 | | | X | X | X | | | | | |
| W-10 | | | | | | 10:33 | | | | | | | | | | |
| W-11 | | V V | | | | 10:35 | | V | V | V | V | V | V | V | | |

Please initial:

Samp's stored in ice

Impacted at Walkers

Notes:

7/18/94

7/19/94

7/20/94

7/21/94

7/22/94

7/23/94

7/24/94

7/25/94

7/26/94

7/27/94

7/28/94

7/29/94

7/30/94

7/31/94

8/1/94

8/2/94

8/3/94

| | | | | | | |
|-----------------------------|--------------|-------------------|-------------------------|--------------|-----------|----------------------------------|
| Relinquished By (Signature) | Organization | Date/Time 12:45 | Received By (Signature) | Organization | Date/Time | Turn Around Time (Circle Choice) |
| Relinquished By (Signature) | Organization | Date/Time 1-21-94 | Received By (Signature) | Organization | Date/Time | 24 Hrs. |
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | 48 Hrs. |

- 6 Days
8 Days
10 Days
As Contracted



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 01/07/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed Matrix |
|----------|-----------------------|----------|-----------------|
| 15079- 1 | SP-2-a-d | 01/03/94 | 01/06/93 Soil |
| 15079- 2 | SP-3-a-d | 01/03/94 | 01/06/93 Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 1 15079- 2

| | | |
|-----------------|-----------|-----------|
| Gasoline: | *47 ✓ | *33 ✓ |
| Benzene: | ND<0.05 ✓ | ND<0.05 ✓ |
| Toluene: | 0.093 | 0.065 |
| Ethyl Benzene: | 0.26 | 0.054 |
| Total Xylenes: | 1.9 | 0.17 |
| Diesel: | 1200 ✓ | 220 ✓ |
| Oil and Grease: | 2500 ✓ | 100 ✓ |
| Concentration: | mg/kg | mg/kg |



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C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 2 of 2
QA/QC INFORMATION
SET: 15079

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:
Minimum Detection Limit in Soil: 50mg/kg

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:
Minimum Quantitation Limit for Diesel in Soil: 1mg/kg

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:
Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTxE
Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|-----------------|-----------------|-----|---------------|
| Gasoline: | 96/106 | 10% | 75-125 |
| Benzene: | 117/118 | 1% | 72-125 |
| Toluene: | 105/108 | 3% | 75-125 |
| Ethyl Benzene: | 109/113 | 4% | 75-125 |
| Total Xylenes: | 110/116 | 5% | 75-125 |
| Diesel: | 118/117 | 1% | 48-162 |
| Oil and Grease: | 83/86 | 4% | 75-125 |

* Does not match typical gasoline pattern.

Jay A. Neagan

Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 07-January-1994

ANALYSIS FOR CAM 17 METALS
California Administration Code Title 22, Paragraph 66700 & EPA Methods
SW-846 6010 & 7000 series.

| Chronology | Laboratory Number 15079 | | | | | |
|----------------|-------------------------|----------|-----------|----------|-------|-------|
| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
| SP-2 A-D | 01/03/94 | 01/04/94 | 01/05/94 | 01/06/94 | | 1 |



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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 07-January-1994

ANALYSIS FOR CAM 17 METALS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15079- 1 | SP-2 A-D | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 1

SNC

| | | |
|------------|--------|---------------------|
| Antimony | (Sb) : | ND<5 |
| Arsenic | (As) : | ND<1 |
| Barium | (Ba) : | 100 10 ⁰ |
| Beryllium | (Be) : | 0.6 .75 |
| Cadmium | (Cd) : | 0.8 1 |
| Chromium | (Cr) : | 18 5 |
| Cobalt | (Co) : | 8 .5 |
| Copper | (Cu) : | 23 25 |
| Lead | (Pb) : | 21 5 |
| Mercury | (Hg) : | ND<0.05 |
| Molybdenum | (Mo) : | ND<5 |
| Nickel | (Ni) : | 25 20 |
| Selenium | (Se) : | ND<1 |
| Silver | (Ag) : | ND<5 |
| Thallium | (Tl) : | ND<5 |
| Vanadium | (V) : | 28 24 |
| Zinc | (Zn) : | 67 250 |

Concentration: mg/Kg



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ANALYSIS FOR CAM 17 METALS
Quality Assurance and Control Data - Soil

Laboratory Number 15079

| Compound | Method | Blank (mg/Kg) | RL (mg/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|------------|--------|------------------|---------------|--------------------------|---------------|------------|
| Antimony | (Sb) : | ND<5 | 5 | 96/92 | 75-125 | 4% |
| Arsenic | (As) : | ND<1 | 1 | 111/119 | 75-125 | 7% |
| Barium | (Ba) : | ND<5 | 5 | 101/96 | 75-125 | 5% |
| Beryllium | (Be) : | ND<0.5 | 0.5 | 90/87 | 75-125 | 3% |
| Cadmium | (Cd) : | ND<0.5 | 0.5 | 102/98 | 75-125 | 4% |
| Chromium | (Cr) : | ND<5 | 5 | 93/89 | 75-125 | 4% |
| Cobalt | (Co) : | ND<5 | 5 | 99/93 | 75-125 | 6% |
| Copper | (Cu) : | ND<5 | 5 | 99/97 | 75-125 | 2% |
| Lead | (Pb) : | ND<5 | 5 | 101/96 | 75-125 | 5% |
| Mercury | (Hg) : | ND<0.05 | 0.05 | 88/93 | 75-125 | 6% |
| Molybdenum | (Mo) : | ND<5 | 5 | 101/99 | 75-125 | 2% |
| Nickel | (Ni) : | ND<5 | 5 | 98/94 | 75-125 | 4% |
| Selenium | (Se) : | ND<1 | 1 | 85/81 | 75-125 | 5% |
| Silver | (Ag) : | ND<5 | 5 | 105/100 | 75-125 | 5% |
| Thallium | (Tl) : | ND<5 | 5 | 98/91 | 75-125 | 7% |
| Vanadium | (V) : | ND<5 | 5 | 96/94 | 75-125 | 2% |
| Zinc | (Zn) : | ND<5 | 5 | 101/103 | 75-125 | 2% |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

mg/Kg = Parts per million (ppm)

QC File No. 15079

Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 10-January-1994

ANALYSIS FOR SOLUBLE LEAD
by California Administrative Code Title 22 & SW-846 Method 6010

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Laboratory Number 15079 | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------------------------|-------|
| SP-3 A-D | 01/03/94 | 01/04/94 | 01/06/94 | 01/10/94 | | | 2 |



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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 10-January-1994

ANALYSIS FOR SOLUBLE LEAD

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15079- 2 | SP-3 A-D | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 2

Soluble Lead (Pb): ND<0.5

Concentration: mg/L



Superior Precision Analytical, Inc.

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ANALYSIS FOR SOLUBLE LEAD Quality Assurance and Control Data - Extract

Laboratory Number 15079

| Compound | Method | | Spike | Limits | RPD |
|---------------------|--------|-----|--------------|--------|-----|
| | Blank | RL | Recovery (%) | (%) | (%) |
| Soluble Lead (Pb) : | ND<0.5 | 0.5 | 102/97 | 75-125 | 5% |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

mg/L = Parts per million (ppm)

QC File No. 15079



1/10/94

Karen Fisher

Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 07-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

Chronology

Laboratory Number 15079

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|----------|-------|
| SP-2 A-D | 01/03/94 | 01/04/94 | / | / | 01/06/94 | 1 |
| SP-3 A-D | 01/03/94 | 01/04/94 | / | / | 01/06/94 | 2 |



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-1
Reported 07-January-1994

HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15079- 1 | SP-2 A-D | Soil |
| 15079- 2 | SP-3 A-D | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 1 15079- 2

| | |
|-------------------------|-------|
| Chloromethane/Vinyl Ch: | ND<10 |
| Bromomethane: | ND<5 |
| Chloroethane: | ND<5 |
| Trichlorofluoromethane: | ND<5 |
| 1,1-Dichloroethene: | ND<5 |
| Dichloromethane: | ND<5 |
| t-1,2-Dichloroethene: | ND<5 |
| 1,1-Dichloroethane: | ND<5 |
| c-1,2-Dichloroethene: | ND<5 |
| Chloroform: | ND<5 |
| 1,1,1-Trichloroethane: | ND<5 |
| Carbon tetrachloride: | ND<5 |
| 1,2-Dichloroethane: | ND<5 |
| Trichloroethene: | ND<5 |
| c-1,3-Dichloropropene: | ND<5 |
| 1,2-Dichloropropane: | ND<5 |
| t-1,3-Dichloropropene: | ND<5 |
| Bromodichloromethane: | ND<5 |
| 1,1,2-Trichloroethane: | ND<5 |
| Tetrachloroethene: | 38 |
| Dibromochloromethane: | ND<5 |
| Chlorobenzene: | ND<5 |
| Bromoform: | ND<5 |
| 1,1,2,2-Tetrachloroeth: | ND<5 |
| 1,3-Dichlorobenzene: | ND<5 |
| 1,2-Dichlorobenzene: | 34 |
| 1,4-Dichlorobenzene: | ND<5 |

Concentration: ug/Kg ug/Kg

6
65
22

8010
Hito



Superior Precision Analytical, Inc.

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HALOGENATED VOLATILE ORGANICS by EPA SW-846 Methods 5030/8010.
Quality Assurance and Control Data - Soil

Laboratory Number 15079

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| Chloromethane/Vinyl Ch: | ND<10 | 10 | | | |
| Bromomethane: | ND<5 | 5 | | | |
| Chloroethane: | ND<5 | 5 | | | |
| Trichlorofluoromethane: | ND<5 | 5 | | | |
| 1,1-Dichloroethene: | ND<5 | 5 | 116/125 | 65-154 | 7% |
| Dichloromethane: | ND<5 | 5 | | | |
| t-1,2-Dichloroethene: | ND<5 | 5 | | | |
| 1,1-Dichloroethane: | ND<5 | 5 | | | |
| c-1,2-Dichloroethene: | ND<5 | 5 | | | |
| Chloroform: | ND<5 | 5 | | | |
| 1,1,1-Trichloroethane: | ND<5 | 5 | | | |
| Carbon tetrachloride: | ND<5 | 5 | | | |
| 1,2-Dichloroethane: | ND<5 | 5 | | | |
| Trichloroethene: | ND<5 | 5 | 101/106 | 73-161 | 5% |
| c-1,3-Dichloropropene: | ND<5 | 5 | | | |
| 1,2-Dichloropropane: | ND<5 | 5 | | | |
| t-1,3-Dichloropropene: | ND<5 | 5 | | | |
| Bromodichloromethane: | ND<5 | 5 | | | |
| 1,1,2-Trichloroethane: | ND<5 | 5 | | | |
| Tetrachloroethene: | ND<5 | 5 | | | |
| Dibromochloromethane: | ND<5 | 5 | | | |
| Chlorobenzene: | ND<5 | 5 | 117/126 | 92-136 | 7% |
| Bromoform: | ND<5 | 5 | | | |
| 1,1,2,2-Tetrachloroeth: | ND<5 | 5 | | | |
| 1,3-Dichlorobenzene: | ND<5 | 5 | | | |
| 1,2-Dichlorobenzene: | ND<5 | 5 | | | |
| 1,4-Dichlorobenzene: | ND<5 | 5 | | | |

Definitions:

ND = Not Detected

RPD = Relative Percent Difference

RL = Reporting Limit

ug/Kg = Parts per billion (ppb)

QC File No. 15079

Senior Chemist
Account Manager



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 06-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

Chronology

Laboratory Number 15079

| Identification | Sampled | Received | Extracted | Analyzed | Run # | Lab # |
|----------------|----------|----------|-----------|----------|-------|-------|
| SP-2-a-d | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | 1 |
| SP-3-a-d | 01/03/94 | 01/04/94 | 01/04/94 | 01/05/94 | | 2 |



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 06-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15079- 1 | SP-2-a-d | Soil |
| 15079- 2 | SP-3-a-d | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 1 15079- 2

| | | |
|--------------------------|---------|---------|
| bis(2-chloroethyl)ethe: | ND<3300 | ND<3300 |
| aniline: | ND<3300 | ND<3300 |
| phenol: | ND<3300 | ND<3300 |
| 2-chlorophenol: | ND<3300 | ND<3300 |
| 1,3-dichlorobenzene: | ND<3300 | ND<3300 |
| 1,4-dichlorobenzene: | ND<3300 | ND<3300 |
| 1,2-dichlorobenzene: | ND<3300 | ND<3300 |
| benzyl alcohol: | ND<3300 | ND<3300 |
| bis-(2-chloroisopropyl): | ND<3300 | ND<3300 |
| 2-methylphenol: | ND<3300 | ND<3300 |
| hexachloroethane: | ND<3300 | ND<3300 |
| n-nitroso-di-n-propyla: | ND<3300 | ND<3300 |
| 4-methylphenol: | ND<3300 | ND<3300 |
| nitrobenzene: | ND<3300 | ND<3300 |
| isophorone: | ND<3300 | ND<3300 |
| 2-nitrophenol: | ND<3300 | ND<3300 |
| 2,4-dimethylphenol: | ND<3300 | ND<3300 |
| bis(2-chloroethoxy)met: | ND<3300 | ND<3300 |
| 2,4-dichlorophenol: | ND<3300 | ND<3300 |
| 1,2,4-trichlorobenzene: | ND<3300 | ND<3300 |
| naphthalene: | ND<3300 | ND<3300 |
| benzoic acid: | ND<3300 | ND<3300 |
| 4-chloroaniline: | ND<3300 | ND<3300 |
| hexachlorobutadiene: | ND<3300 | ND<3300 |
| 4-chloro-3-methylpheno: | ND<3300 | ND<3300 |
| 2-methyl-naphthalene: | ND<3300 | ND<3300 |
| hexachlorocyclopentadie: | ND<3300 | ND<3300 |
| 2,4,6-trichlorophenol: | ND<3300 | ND<3300 |
| 2,4,5-trichlorophenol: | ND<8000 | ND<8000 |

Concentration: ug/Kg ug/Kg



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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 06-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15079- 1 | SP-2-a-d | Soil |
| 15079- 2 | SP-3-a-d | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 1 15079- 2

| | | |
|-------------------------|----------|----------|
| 2-chloronaphthalene: | ND<3300 | ND<3300 |
| 2-nitroaniline: | ND<8000 | ND<8000 |
| acenaphthylene: | ND<3300 | ND<3300 |
| dimethylphthalate: | ND<3300 | ND<3300 |
| 2,6-dinitrotoluene: | ND<3300 | ND<3300 |
| acenaphthene: | ND<3300 | ND<3300 |
| 3-nitroaniline: | ND<8000 | ND<8000 |
| 2,4-dinitrophenol: | ND<8000 | ND<8000 |
| dibenzofuran: | ND<3300 | ND<3300 |
| 2,4-dinitrotoluene: | ND<3300 | ND<3300 |
| 4-nitrophenol: | ND<8000 | ND<8000 |
| fluorene: | ND<3300 | ND<3300 |
| 4-chlorophenyl-phenyle: | ND<3300 | ND<3300 |
| diethylphthalate: | ND<3300 | ND<3300 |
| 4-nitroaniline: | ND<8000 | ND<8000 |
| 4,6-dinitro-2-methylph: | ND<8000 | ND<8000 |
| n-nitrosodiphenylamine: | ND<3300 | ND<3300 |
| 4-bromo-phenyl-phenyle: | ND<3300 | ND<3300 |
| hexachlorobenzene: | ND<3300 | ND<3300 |
| pentachlorophenol: | ND<8000 | ND<8000 |
| phenanthrene: | ND<3300 | ND<3300 |
| anthracene: | ND<3300 | ND<3300 |
| di-n-butylphthalate: | ND<3300 | ND<3300 |
| fluoranthene: | ND<3300 | ND<3300 |
| benzidine: | ND<17000 | ND<17000 |
| pyrene: | ND<3300 | ND<3300 |
| butylbenzylphthalate: | ND<3300 | ND<3300 |
| 3,3'-dichlorobenzidine: | ND<6600 | ND<6600 |
| benzo[a]anthracene: | ND<3300 | ND<3300 |

Concentration: ug/Kg ug/Kg



Superior Precision Analytical, Inc.

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TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-1
Reported 06-January-1994

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS

| Laboratory Number | Sample Identification | Matrix |
|-------------------|-----------------------|--------|
| 15079- 1 | SP-2-a-d | Soil |
| 15079- 2 | SP-3-a-d | Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15079- 1 15079- 2

| | | |
|-------------------------|---------|---------|
| chrysene: | ND<3300 | ND<3300 |
| bis(2-ethylhexyl)phtha: | ND<3300 | ND<3300 |
| di-n-octylphthalate: | ND<3300 | ND<3300 |
| benzo(b,k)fluoranthene: | ND<3300 | ND<3300 |
| benzo[a]pyrene: | ND<3300 | ND<3300 |
| indeno[1,2,3-cd]pyrene: | ND<3300 | ND<3300 |
| dibenzo[a,h]anthracene: | ND<3300 | ND<3300 |
| benzo[g,h,i]anthracene: | ND<3300 | ND<3300 |

| Concentration: | ug/Kg | ug/Kg |
|----------------|-------|-------|
|----------------|-------|-------|

-- Surrogate % Recoveries --

| | | |
|-----------------------|----|-----|
| 2-fluorophenol: | 73 | 87 |
| phenol-d6: | 81 | 94 |
| nitrobenzene-d5: | 77 | 102 |
| 2-fluorobiphenyl: | 79 | 92 |
| 2,4,6-tribromophenol: | 92 | 119 |
| terphenyl-d14: | 75 | 85 |



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 15079

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-----------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| bis(2-chloroethyl)ethane: | ND<330 | 330 | | | |
| aniline: | ND<330 | 330 | | | |
| phenol: | ND<330 | 330 | 74/74 | 26-90 | 0% |
| 2-chlorophenol: | ND<330 | 330 | 81/82 | 11-120 | 1% |
| 1,3-dichlorobenzene: | ND<330 | 330 | | | |
| 1,4-dichlorobenzene: | ND<330 | 330 | 78/79 | 1-154 | 1% |
| 1,2-dichlorobenzene: | ND<330 | 330 | | | |
| benzyl alcohol: | ND<330 | 330 | | | |
| bis-(2-chloroisopropyl): | ND<330 | 330 | | | |
| 2-methylphenol: | ND<330 | 330 | | | |
| hexachloroethane: | ND<330 | 330 | | | |
| n-nitroso-di-n-propylamine: | ND<330 | 330 | 93/94 | 11-133 | 1% |
| 4-methylphenol: | ND<330 | 330 | | | |
| nitrobenzene: | ND<330 | 330 | | | |
| isophorone: | ND<330 | 330 | | | |
| 2-nitrophenol: | ND<330 | 330 | | | |
| 2,4-dimethylphenol: | ND<330 | 330 | | | |
| bis(2-chloroethoxy)methane: | ND<330 | 330 | | | |
| 2,4-dichlorophenol: | ND<330 | 330 | | | |
| 1,2,4-trichlorobenzene: | ND<330 | 330 | 75/76 | 1-139 | 1% |
| naphthalene: | ND<330 | 330 | | | |
| benzoic acid: | ND<330 | 330 | | | |
| 4-chloroaniline: | ND<330 | 330 | | | |
| hexachlorobutadiene: | ND<330 | 330 | | | |
| 4-chloro-3-methylphenol: | ND<330 | 330 | 79/81 | 11-122 | 3% |
| 2-methyl-naphthalene: | ND<330 | 330 | | | |
| hexachlorocyclopentadiene: | ND<330 | 330 | | | |
| 2,4,6-trichlorophenol: | ND<330 | 330 | | | |
| 2,4,5-trichlorophenol: | ND<800 | 800 | | | |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 15079

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| 2-chloronaphthalene: | ND<330 | 330 | | | |
| 2-nitroaniline: | ND<800 | 800 | | | |
| acenaphthylene: | ND<330 | 330 | | | |
| dimethylphthalate: | ND<330 | 330 | | | |
| 2,6-dinitrotoluene: | ND<330 | 330 | | | |
| acenaphthene: | ND<330 | 330 | 86/87 | 20-131 | 1% |
| 3-nitroaniline: | ND<800 | 800 | | | |
| 2,4-dinitrophenol: | ND<800 | 800 | | | |
| dibenzofuran: | ND<330 | 330 | | | |
| 2,4-dinitrotoluene: | ND<330 | 330 | 76/79 | 7-111 | 4% |
| 4-nitrophenol: | ND<800 | 800 | 85/92 | 1-118 | 8% |
| fluorene: | ND<330 | 330 | | | |
| 4-chlorophenyl-phenyle: | ND<330 | 330 | | | |
| diethylphthalate: | ND<330 | 330 | | | |
| 4-nitroaniline: | ND<800 | 800 | | | |
| 4,6-dinitro-2-methylph: | ND<800 | 800 | | | |
| n-nitrosodiphenylamine: | ND<330 | 330 | | | |
| 4-bromo-phenyl-phenyle: | ND<330 | 330 | | | |
| hexachlorobenzene: | ND<330 | 330 | | | |
| pentachlorophenol: | ND<800 | 800 | 96/97 | 1-119 | 1% |
| phenanthrene: | ND<330 | 330 | | | |
| anthracene: | ND<330 | 330 | | | |
| di-n-butylphthalate: | ND<330 | 330 | | | |
| fluoranthene: | ND<330 | 330 | | | |
| benzidine: | ND<1700 | 1700 | | | |
| pyrene: | ND<330 | 330 | 86/83 | 20-156 | 4% |
| butylbenzylphthalate: | ND<330 | 330 | | | |
| 3,3'-dichlorobenzidine: | ND<660 | 660 | | | |
| benzo[a]anthracene: | ND<330 | 330 | | | |



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EPA SW-846 METHOD 8270 SEMIVOLATILE ORGANICS BY GC/MS Quality Assurance and Control Data - Soil

Laboratory Number 15079

| Compound | Method Blank (ug/Kg) | RL (ug/Kg) | Spike Recovery (%) | Limits (%) | RPD (%) |
|-----------------------------------|----------------------------|---------------|--------------------------|---------------|------------|
| polycyclic aromatic hydrocarbons: | | | | | |
| benzene: | ND<330 | 330 | | | |
| o-xylene: | ND<330 | 330 | | | |
| m-xylene: | ND<330 | 330 | | | |
| p-xylene: | ND<330 | 330 | | | |
| ethylbenzene: | ND<330 | 330 | | | |
| propylbenzene: | ND<330 | 330 | | | |
| isopropylbenzene: | ND<330 | 330 | | | |
| terephthalic acid: | ND<330 | 330 | | | |
| o-phthalimide: | ND<330 | 330 | | | |
| benzo[b]fluoranthene: | ND<330 | 330 | | | |
| benzo[a]anthracene: | ND<330 | 330 | | | |
| benzo[a]pyrene: | ND<330 | 330 | | | |
| benzo[ghi]perylene: | ND<330 | 330 | | | |
| benzo[a,h]anthracene: | ND<330 | 330 | | | |
| benzo[g,h,i]anthracene: | ND<330 | 330 | | | |
| fluorophenol: | 68 | | | 25-121 | |
| phenol-d6: | 75 | | | 24-113 | |
| toluene-d5: | 67 | | | 23-120 | |
| fluorobiphenyl: | 70 | | | 30-115 | |
| 4,6-tribromophenol: | 89 | | | 19-122 | |
| phenyl-d14: | 77 | | | 18-137 | |

Definitions:

N = Not Detected

RPD = Relative Percent Difference

L = Reporting Limit

ug/Kg = Parts per billion (ppb)

C File No. 15079

Dawn Whalen

Senior Chemist

Account Manager

Fax copy of Lab Report and COC to Chevron Contact: No

Yes
 No

100/7

Chain-of-Custody-Record

| | | | | |
|--|---------------------------|------------------------------------|-----------------------------|--------------|
| Chevron U.S.A. Inc. P.O. BOX 5004 San Ramon, CA 94583 FAX (415)842-9591 | Chevron Facility Number | 0006 | Chevron Contact (Name) | Mark Miller |
| | Facility Address | 460 Grand Ave. Oakland | (Phone) | 510.842.8134 |
| | Consultant Project Number | 0006- | Laboratory Name | Superior |
| | Consultant Name | Todd Stoen Delly | Laboratory Release Number | 8499660 |
| | Address | P.O. Box 2534 Santa Rosa Monroe | Samples Collected by (Name) | Jeff Monroe |
| | Project Contact (Name) | 707/5388818 | Collection Date | 1-3-94 |
| | (Phone) | (Fax Number) | Signature | Jeff Monroe |

Please initial: ✓

Samples Stored in ice ✓ 6

Appropriate contributes

VOA's *Science Report*

Comments:

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Remarks

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| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | Turn Around Time (Circle Choice) |
|-----------------------------|--------------|-----------|--|--------------|-----------|---|
| <i>John C. Morris</i> | DD | 12-25-94 | | | | <input checked="" type="radio"/> 24 Hrs. <input type="radio"/> 48 Hrs. <input type="radio"/> 5 Days <input type="radio"/> 10 Days <input type="radio"/> As Contracted |
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | |
| | | | | | | |
| Relinquished By (Signature) | Organization | Date/Time | Received For Laboratory By (Signature) | Organization | Date/Time | |
| | | | <i>Strangarol</i> | | 12-25-94 | |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

TOUCHSTONE DEVELOPMENTS
Attn: JEFF MONROE

Project 0006-2
Reported 01/20/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed Matrix |
|----------|-----------------------|----------|-----------------|
| 30209- 1 | ASP-4A-D | 01/19/94 | 01/19/94 Soil |
| 30209- 2 | ASP-5A-D | 01/19/94 | 01/19/94 Soil |
| 30209- 3 | ASP-6A-D | 01/19/94 | 01/19/94 Soil |

RESULTS OF ANALYSIS

Laboratory Number: 30209- 1 30209- 2 30209- 3

| | | | |
|----------------|---------|-------|---------|
| Gasoline: | 33 | 88 | 36 |
| Benzene: | ND<.005 | 0.006 | ND<.005 |
| Toluene: | 0.096 | 0.19 | 0.11 |
| Ethyl Benzene: | 0.086 | 0.19 | 0.067 |
| Total Xylenes: | 1.0 | 2.4 | 0.72 |
| Concentration: | mg/kg | mg/kg | mg/kg |



Superior Precision Analytical, Inc.

825 Arnold Drive, Suite 114 • Martinez, California 94553 • (510) 229-1512 / fax (510) 229-1526

C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 2 of 2
QA/QC INFORMATION
SET: 30209

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:
Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTXE
Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|----------------|-----------------|-----|---------------|
| Gasoline: | 124/117 | 6% | 70-130 |
| Benzene: | 118/110 | 7% | 70-130 |
| Toluene: | 113/107 | 5% | 70-130 |
| Ethyl Benzene: | 110/100 | 10% | 70-130 |
| Total Xylenes: | 118/108 | 9% | 70-130 |

Alfonso Salas
Senior Chemist

505

Fax copy of Lab Report and COC to Chevron Contact: No

Chain-of-Custody-Record

| | | |
|--|--|--|
| Chevron U.S.A. Inc. P.O. BOX 5004 San Ramon, CA 94583 FAX (415)842-9591 | Chevron Facility Number <u>0006</u> Facility Address <u>40 Grand Ave, Oakland</u> | Chevron Contact (Name) <u>Mark Miller</u> (Phone) <u>510 842 8134</u> |
| | Consultant Project Number <u>0006-7</u> | Laboratory Name <u>Superior</u> |
| | Consultant Name <u>Techstone Developments</u> | Laboratory Release Number <u>8494660</u> |
| | Address <u>P.O. Box 2534, San Jose, CA</u> | Samples Collected by (Name) <u>JCF Monroe</u> |
| | Project Contact (Name) <u>Vic F. Monroe</u> | Collection Date <u>1-19-94</u> |
| | (Phone) <u>407 538 8815</u> (Fax Number) <u>538 8812</u> | Signature <u>JCF Monroe</u> |

| Sample Number | Lab Sample Number | Number of Containers | Matrix S = Soil A = Air W = Water C = Charcoal | Type G = Grab C = Composite D = Distilled | Time | Sample Preservation | Isotd (Yes or No) | Analyses To Be Performed | | | | | Remarks | |
|---------------|-------------------|----------------------|--|--|-------|---------------------|-------------------|---------------------------------|----------------------|---------------------------------|--------------------------------|------------------------------|--------------------------------|---|
| | | | | | | | | BTEX + TPH GAS (8020 + 8015) | TPH Diesel (8015) | Purgeable Halocarbons (8010) | Purgeable Aromaticas (8020) | Purgeable Organics (8240) | Extractable Organics (8270) | Metals Cd,Cr,Pb,Zn,Ni (ICP or AA) |
| ASP-Ga-0 | 4 | S | C | G | 10:30 | Yes | X | | | | | | | |
| ASP-Sa-0 | ↓ | C | C | G | 10:35 | | ↓ | | | | | | | |
| ASP-Ga-0 | ↓ | ↓ | C | G | 10:40 | | ↓ | | | | | | | |

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| | | | | | | |
|-----------------------------|--------------|-----------------|---|-----------------------|--------------------|---|
| Relinquished By (Signature) | Organization | Date/Time 11:51 | Received By (Signature) 1-19-94 M. Glenn | Organization SUPERIOR | Date/Time 01/19/94 | Turn Around Time (Circle Choice) |
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | <input checked="" type="radio"/> 24 Hrs. <input type="radio"/> 48 Hrs. <input type="radio"/> 5 Days <input type="radio"/> 10 Days <input type="radio"/> As Contracted |
| Relinquished By (Signature) | Organization | Date/Time | Received For Laboratory By (Signature) | | Date/Time | |



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

TOUCHSTONE DEVELOPMENTS (SR)
Attn: JEFF MONROE

Project 0006-2
Reported 01/27/94

TOTAL PETROLEUM HYDROCARBONS

| Lab # | Sample Identification | Sampled | Analyzed Matrix |
|----------|-----------------------|----------|-----------------|
| 15158- 1 | ASP-7-A-D | 01/26/94 | 01/26/94 Soil |
| 15158- 2 | ASP-8-A-D | 01/26/94 | 01/27/94 Soil |

RESULTS OF ANALYSIS

Laboratory Number: 15158- 1 15158- 2

| | | |
|----------------|---------|-------|
| Gasoline: | 53 | 14 |
| Benzene: | ND<0.05 | 0.29 |
| Toluene: | 0.059 | 0.89 |
| Ethyl Benzene: | 0.23 | 0.27 |
| Total Xylenes: | 1.8 | 1.3 |
| Concentration: | mg/kg | mg/kg |



Superior Precision Analytical, Inc.

1555 Burke, Unit I • San Francisco, California 94124 • (415) 647-2081 / fax (415) 821-7123

C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 2 of 2
QA/QC INFORMATION
SET: 15158

NA = ANALYSIS NOT REQUESTED

ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT

mg/kg = parts per million (ppm)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:
Minimum Detection Limit in Soil: 50mg/kg

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:
Minimum Quantitation Limit for Diesel in Soil: 1mg/kg

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:
Minimum Quantitation Limit for Gasoline in Soil: 1mg/kg

EPA SW-846 Method 8020/BTXE
Minimum Quantitation Limit in Soil: 0.005mg/kg

| ANALYTE | MS/MSD RECOVERY | RPD | CONTROL LIMIT |
|----------------|-----------------|-----|---------------|
| Gasoline: | 93/96 | 3% | 75-125 |
| Benzene: | 111/113 | 2% | 72-125 |
| Toluene: | 109/112 | 3% | 75-125 |
| Ethyl Benzene: | 112/114 | 2% | 75-125 |
| Total Xylenes: | 111/113 | 2% | 75-125 |

Fax copy of Lab Report and COC to Chevron Contact: [REDACTED]

Yes
 No

15158

Chain-of-Custody—Record

| | | | | |
|--|--|-------------------------|-----------------------------|--------------|
| Chevron U.S.A. Inc. P.O. BOX 5004 San Ramon, CA 94583 FAX (415)842-9591 | Chevron Facility Number | 0006 | Chevron Contact (Name) | MARK MILLER |
| | Facility Address | 460 GRAND Ave, OAKLAND | (Phone) | 510-842-8134 |
| | Consultant Project Number | 0006-2 | Laboratory Name | Superior |
| | Consultant Name | TOUCHSTONE Developments | Laboratory Release Number | 8499660 |
| | Address | PO Box 2554, SMART ROAD | Samples Collected by (Name) | M. TANIBROWI |
| | Project Contact (Name) | Jeff Monroe | Collection Date | 1-26-94 |
| | (Phone) 707-538-8818 (Fax Number) 707-538-8812 | Signature | <i>Mark D. Miller</i> | |

COCC-3.DWG/07 01/11/CH

| | | | | | | |
|-----------------------------|--------------|---------------|--|--------------|-----------------|---|
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | Turn Around Time (Circle Choice) |
| <i>M. J. K.</i> | TD | 1-26-98 10:35 | | | | <input checked="" type="radio"/> 24 Hrs. <input type="radio"/> 48 Hrs. <input type="radio"/> 5 Days <input type="radio"/> 10 Days As Contracted |
| Relinquished By (Signature) | Organization | Date/Time | Received By (Signature) | Organization | Date/Time | |
| Relinquished By (Signature) | Organization | Date/Time | Reviewed For Laboratory By (Signature) | | Date/Time | |
| | | | <i>Thompson</i> | | 1/26/98 6:40 pm | |