



GeoStrategies Inc. SC 0112-10-1010: 03/91

## SAMPLING DATA SUMMARY

SEP 27 '89 H.C.H.

Chevron Service Station #7127  
South Grantline Road  
Tracy, California

Report No. 7251-1

September 14, 1989



**GeoStrategies Inc.**

2140 WEST WINTON AVENUE  
HAYWARD, CALIFORNIA 94545

(415) 352-4800

September 14, 1989

Gettler-Ryan Inc.  
1992 National Avenue  
Hayward, California 94545

Attn: Mr. Jerry Mitchell

Re: SAMPLING DATA SUMMARY  
Chevron Service Station #7127  
South Grantline Road  
Tracy, California

Gentlemen:

This report presents the results of a file and document review conducted in order to summarize the sampling data that has been collected at the above referenced location (Plate 1).

**BACKGROUND**

At the request of Chevron U.S.A. Inc., EA Engineering, Science, and Technology, Inc. (EA) conducted a Soil Vapor Contaminant Assessment at the site on October 27, 1987. This survey measured concentrations of hydrocarbon constituents in soil vapor and reported them as Benzene, Toluene, Total Detected Hydrocarbons and peaks which registered prior to Benzene. The results of this investigation were presented in their report dated November 13, 1987.

On December 2, 1987, Kleinfelder Inc. was authorized by Chevron, USA to further evaluate site conditions. Kleinfelder originally proposed six soil borings to be drilled and completed as monitoring wells. This original scope of work was modified due to adverse drilling conditions encountered at the site. As a result, no monitoring wells were installed due to auger refusal prior to encountering groundwater. Seven borings were completed and soil samples were collected and analyzed for Total Petroleum Hydrocarbons calculated as gasoline (TPH-gas) and Benzene, Toluene, Ethylbenzene and Xylenes (BTEX). A water sample was also collected from a tap fed by a domestic well which is located on-site. These results were presented in Kleinfelder's report dated January 6, 1988.

## **GeoStrategies Inc.**

Gettler-Ryan Inc.  
September 14, 1989  
Page 2

Subsequent water samples were collected by Kleinfelder from the on-site domestic well at various sampling points and from the well itself during 1988. The results of these sampling events were reported in separate addendums dated January 19, 1988, February 8, 1988, February 12, 1988, March 31, 1988, April 18, 1988, April 28, 1988, and February 8, 1989. In addition, a summary report was issued on March 8, 1988, which summarized the sampling data obtained thus far.

In May, 1989, Gettler-Ryan Inc. (G-R) installed a carbon adsorption treatment system on the domestic well at the site due to concentrations of Benzene detected in water samples. Water samples have been collected weekly from the system effluent and analyzed for TPH and BTEX.

### **RESULTS OF PREVIOUS INVESTIGATIONS**

#### EA Engineering, Science, and Technology, Inc.

Soil gas samples were taken from 13 on-site and 2 off-site locations at depths ranging from 3 to 12 feet below existing grade. Sampling locations are shown on Plate 2. Concentrations of hydrocarbon constituents in soil vapor ranged from less than (<) 1 part per million (ppm) to 3,200 ppm Benzene, <1 to 5,200 ppm Toluene and <1 to 28,500 ppm Total Detected Hydrocarbons. A summary of this data as reported by EA, is presented in Table 1. Based on the results of this survey, EA concluded that there could possibly be floating product in the area of the tank field and the pump island and recommended installing five groundwater monitoring wells on-site.

#### Kleinfelder Inc.

Analytical results from the soil samples collected during drilling detected TPH in concentrations ranging from not detected (ND) to 2,300 ppm and Benzene in concentrations ranging from ND to 19 ppm. A summary of this data is presented in Table 2.

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Lithologic information obtained from boring logs indicate that the site is underlain by up to 20 feet of engineered fill. The fill is typically silty clays with gravel and gravelly silty sands. Bedrock, composed mainly of sandstones, shales and conglomerates underlies the fill. Kleinfelder was unable to install monitoring wells at the site due to auger refusal upon encountering bedrock (see attached boring logs for details). As a result, water samples were collected from a domestic well located on-site. A water sample collected December 21, 1987, from tap T-1 located near the domestic well contained 2 parts per billion (ppb) Benzene and was ND for all other constituents analyzed. A confirmation sample which detected 4 ppb Benzene was collected on January 5, 1988, from tap T-2 located adjacent to the well-head. The location of these sampling points is shown on Plate 4.

Positive Benzene results from the first samples taken prompted a reconnaissance effort regarding the domestic well. An interview between Kleinfelder and an adjacent property owner (Mr. Joseph Jess) indicated that the only other domestic well in the area was located approximately 300 yards upgradient of the site. This well was severely damaged during the 1980 earthquake which occurred along the Greenville Fault in Livermore. Mr. Jess stated that he acquired access to the well located on Chevron property via a prior station manager or owner approval. The only information regarding construction details of the on-site domestic well consisted of a verbal estimate given by Henning Brothers Drilling Company (Henning) of Modesto, California. Henning did not have any records of the well but had installed several wells in the area and believed the total depth to be about 90 feet with the bottom 20 feet screened. There is no permit on file with the Alameda County Flood Control and Water Conservation District, Zone 7.

Results from previous sampling rounds indicated varying concentrations of Benzene. Therefore, additional samples were collected between January 1988 and April 1989, at various locations along the well piping and at the well-head. Sampling locations T-1, T-2, T-3 and Well are shown on Plate 4. A schematic diagram of the well-head and sampling port is shown on Plate 5.

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September 14, 1989  
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Split samples collected from T-2 on January 8, 1988, reported Benzene concentrations of 1 and 1.1 ppb. February sampling of T-1 and the well-head drain cock (Well) were reported as ND. Subsequent sampling of the Well, T-2 and T-3 (T-3 is a spigot located at the nearest house on the water line servicing the area west-southwest of the site) in March, 1989 detected Benzene concentrations of 3.7, 2.7, and 1.4 ppb, respectively. However, split samples obtained at the same time and sent to a different laboratory for analysis all reported ND. April 1989 sampling reported Benzene in concentrations ranging from 2 ppb at T-3 to 7 ppb at the Well. Toluene and Xylenes were also detected. All groundwater analytical data collected by Kleinfelder has been summarized and is presented on Table 3.

## CARBON TREATMENT SYSTEM INSTALLATION

G-R began weekly sampling in May 1989, after installation of the carbon treatment system. Water samples were collected from sampling points A, B and C as shown on Plate 6, and from the Well (called point D by G-R). All samples were analyzed for TPH as gasoline and BTEX. These results are summarized on Table 4 and copies of the G-R sampling reports are attached.

If you have any questions, please call.

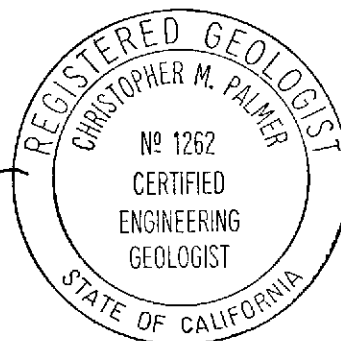
GeoStrategies Inc. by,

*Melissa L. Wann*

Melissa L. Wann  
Project Geologist

*Christopher M. Palmer*

Christopher M. Palmer  
Senior Geologist  
C.E.G. 1262 R.E.A. 285



MLW/CMP/kj

Attachments: Plate 1. Site Plan  
Plate 2. Soil Vapor Sampling Points Location Map  
Plate 3. Boring Location Map  
Plate 4. Well Sampling Port Location Map  
Plate 5. Wellhead Detail  
Plate 6. Treatment System Flow Diagram  
Exploratory Boring Logs  
Gettler-Ryan Sampling Reports

Report No. 7251-1

TABLE 1

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SUMMARY OF SOIL VAPOR MONITORING DATA  
CHEVRON SERVICE STATION #7127  
TRACY, CALIFORNIA

=====

SAMPLE LOCATION	SAMPLE DEPTH	PRIOR TO BENZENE(1) (ppm)	BENZENE (ppm)	TOLUENE (ppm)	DETECTED HYDROCARBONS (ppm)
V1	3	<5	<1	<1	<5
V1/B	5	3700	650	3200	7500
V1/C	8	18000	600	2800	20000
V2	5	130	<5	30	160
V3	3	10	5	10	30
V3/B	5	<5	1	10	15
V4	3	20000	3200	5200	28500
V4/B	5	120	130	1900	2000
V5	5	1	<1	<5	<5
V5/B	7	620	40	<1	750
V6	5	1150	540	160	7300
V7	5	1300	<5	<5	1400
V8	3	<1	<1	<1	<1
V8/B	8	<1	<1	<1	<1
V9	8	1	<1	<10	10
V10	8	<1	<1	<1	<1
V11	5	<1	<1	<1	<1
V12	8	<1	<1	<1	<1
V13	12	20	<1	<1	25
V14	8	<1	<1	<1	<1
V15	12	<1	<1	<1	<1
BLANK	NA	<0.1	<0.1	<0.1	NA
BLANK	NA	<0.1	<0.1	<0.1	NA
Detection Limit		0.5	0.5	0.5	1

=====

NA = Not Applicable  
ppm = parts per million

(1) Quantification based on the volt-second:ppm response ratio for benzene.  
Source: EA Engineering, Science, and Technology, Inc. report dated 11/13/87

(Note: See Plate 2 for sampling point locations.)

TABLE 2

SUMMARY OF SOILS ANALYTICAL DATA  
 CHEVRON SERVICE STATION #7127  
 TRACY, CALIFORNIA

SAMPLE ID	SAMPLE DEPTH*	BENZENE (ppm)	TOLUENE (ppm)	TOTAL XYLENES (ppm)	ETHYLBENZENE (ppm)	TPH (ppm)
B1-10	10	ND	ND	ND	ND	ND
B2-20	20	0.001	ND	4	0.003	0.8
B3-14	14	1.2	0.680	2	0.8	76
B4-15	15	19	85	140	28	2300
B5-5	5	0.076	0.007	0.030	0.002	0.5
B6-5	5	ND	ND	ND	ND	ND
B7-5	5	0.022	0.003	0.024	0.046	0.7

Detection

Limit	0.5	0.5	0.5	0.5	1
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TPH = Total Petroleum Hydrocarbons

\* Feet below ground surface

ppm = parts per million

Benzene, Toluene, Total Xylenes and Ethylbenzene concentrations converted from ppb to ppm.

SOURCE: Subsurface Environmental Investigation, January 6, 1988; Kleinfelder Inc.

(Note: See Plate 3 for boring locations.)

TABLE 3

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SUMMARY OF GROUND-WATER ANALYTICAL DATA  
CHEVRON SERVICE STATION #7127  
TRACY, CALIFORNIA

=====

SAMPLE DATE	SAMPLING POINT	BENZENE (ppb)	TOLUENE (ppb)	TOTAL XYLENES (ppb)	ETHYLBENZENE (ppb)	TPH (ppm)
12/21/87	T-1	2	ND	ND	ND	NT
01/05/88	T-2	4	ND	ND	ND	NT
01/08/88	T-2	1	ND	ND	ND	NT
01/08/88	T-2	1.1	ND	ND	ND	NT
01/21/88	Well	ND	ND	ND	ND	NT
02/19/88	T-1	ND	ND	ND	ND	ND
02/19/88	T-1	ND	ND	ND	ND	ND
02/19/88	Well	ND	ND	ND	ND	ND
02/19/88	TB	ND	ND	ND	ND	ND
03/14/89	Well #	3.7	0.8	NT	NT	ND
03/14/89	Well *	ND	ND	ND	NT	ND
03/14/89	T-2 #	2.7	0.4	NT	NT	ND
03/14/89	T-2 *	ND	ND	NT	NT	ND
03/14/89	T-3 #	1.4	0.4	NT	NT	ND
03/14/89	T-3 *	ND	ND	NT	NT	ND
03/14/89	TB *	ND	ND	NT	NT	ND
04/05/89	Well *	7	3	ND	NT	ND
04/05/89	Well #	6.4	2.3	1	NT	ND
04/05/89	T-2 *	6	3	3	NT	ND
04/05/89	T-2 #	5	1.5	0.7	NT	ND
04/05/89	T-3 *	2	ND	ND	NT	ND
04/05/89	T-3 #	2.3	0.6	ND	NT	ND
04/05/89	TB #	ND	ND	0.6	NT	ND
Detection Limit		0.5	0.5	0.5	0.5	1

=====

TB = Trip Blank

NT = not tested

ppm = parts per million

ppb = parts per billion

\* Analyzed by Med-Tox Associates, Inc.

# Analyzed by Clayton Environmental Consultants, Inc.

Well = samples collected from domestic well-head.

(Note: See Plate 4 for sampling point locations.)



TABLE 4

SUMMARY OF GROUND-WATER ANALYTICAL DATA AFTER TREATMENT  
CHEVRON SERVICE STATION #7127  
TRACY, CALIFORNIA

SAMPLE DATE	SAMPLING POINT	BENZENE (ppb)	TOLUENE (ppb)	TOTAL XYLENES (ppb)	ETHYLBENZENE (ppb)	TPH (ppm)
08/05/89	A	ND	ND	ND	ND	ND
08/05/89	B	ND	ND	ND	ND	ND
08/05/89	C	ND	ND	ND	ND	ND
08/05/89	Well	ND	ND	ND	ND	ND
08/05/89	TB	ND	ND	ND	ND	ND
08/11/89	A	ND	ND	ND	ND	ND
08/11/89	B	ND	ND	ND	ND	ND
08/11/89	C	ND	ND	ND	ND	ND
08/11/89	Well	ND	ND	ND	ND	ND
08/11/89	TB	ND	ND	ND	ND	ND
08/18/89	A	ND	ND	ND	ND	ND
08/18/89	B	ND	ND	ND	ND	ND
08/18/89	C	ND	ND	ND	ND	ND
08/18/89	Well	ND	ND	ND	ND	ND
08/18/89	TB	ND	ND	ND	ND	ND
08/25/89	A	ND	ND	ND	ND	ND
08/25/89	B	ND	ND	ND	ND	ND
08/25/89	C	ND	ND	ND	ND	ND
08/25/89	Well	ND	ND	ND	ND	ND
08/25/89	TB	ND	ND	ND	ND	ND
08/30/89	A	ND	ND	ND	ND	ND
08/30/89	B	ND	ND	ND	ND	ND
08/30/89	C	ND	ND	ND	ND	ND
08/30/89	Well	ND	ND	ND	ND	ND
08/30/89	TB	ND	ND	ND	ND	ND
Detection Limit		0.5	1	3	1	50

TB = Trip Blank

ppm = parts per million      ppb = parts per billion

Source: Gettler-Ryan Sampling Reports 5/89 through 8/89

Note: Well is also referred to as sample point D in G-R Sampling Reports.

(Note: See Plates 5 and 6 for sampling location.)

TABLE 4

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SUMMARY OF GROUND-WATER ANALYTICAL DATA AFTER TREATMENT  
CHEVRON SERVICE STATION #7127  
TRACY, CALIFORNIA

=====

SAMPLE DATE	SAMPLING POINT	BENZENE (ppb)	TOLUENE (ppb)	TOTAL XYLENES (ppb)	ETHYLBENZENE (ppb)	TPH (ppm)
08/05/89	A	ND	ND	ND	ND	ND
08/05/89	B	ND	ND	ND	ND	ND
08/05/89	C	ND	ND	ND	ND	ND
08/05/89	Well	ND	ND	ND	ND	ND
08/05/89	TB	ND	ND	ND	ND	ND
08/11/89	A	ND	ND	ND	ND	ND
08/11/89	B	ND	ND	ND	ND	ND
08/11/89	C	ND	ND	ND	ND	ND
08/11/89	Well	ND	ND	ND	ND	ND
08/11/89	TB	ND	ND	ND	ND	ND
08/18/89	A	ND	ND	ND	ND	ND
08/18/89	B	ND	ND	ND	ND	ND
08/18/89	C	ND	ND	ND	ND	ND
08/18/89	Well	ND	ND	ND	ND	ND
08/18/89	TB	ND	ND	ND	ND	ND
08/25/89	A	ND	ND	ND	ND	ND
08/25/89	B	ND	ND	ND	ND	ND
08/25/89	C	ND	ND	ND	ND	ND
08/25/89	Well	ND	ND	ND	ND	ND
08/25/89	TB	ND	ND	ND	ND	ND
08/30/89	A	ND	ND	ND	ND	ND
08/30/89	B	ND	ND	ND	ND	ND
08/30/89	C	ND	ND	ND	ND	ND
08/30/89	Well	ND	ND	ND	ND	ND
08/30/89	TB	ND	ND	ND	ND	ND
Detection Limit		50.	0.5	1.	1.	3.

=====

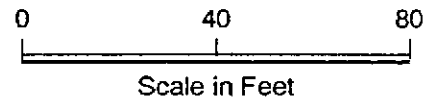
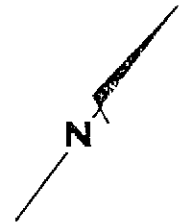
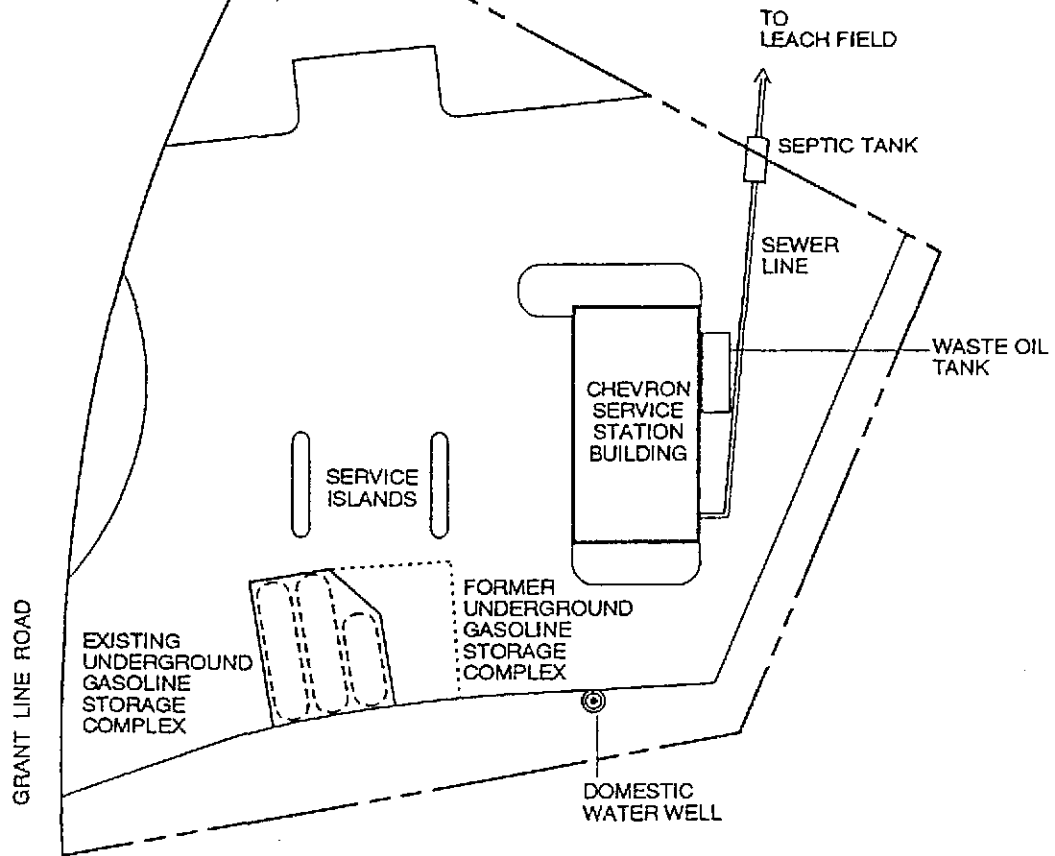
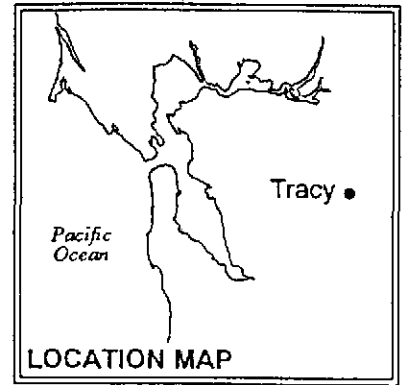
TB = Trip Blank

ppm = parts per million      ppb = parts per billion

Source: Gettler-Ryan Sampling Reports 5/89 through 8/89

Note: Well is also referred to as sample point D in G-R Sampling Reports.

(Note: See Plates 5 and 6 for sampling location.)



Base Map: Kleinfelder



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Site Plan  
 Chevron USA Service Station #7127  
 Grant Line Road  
 Tracy, California

PLATE

1

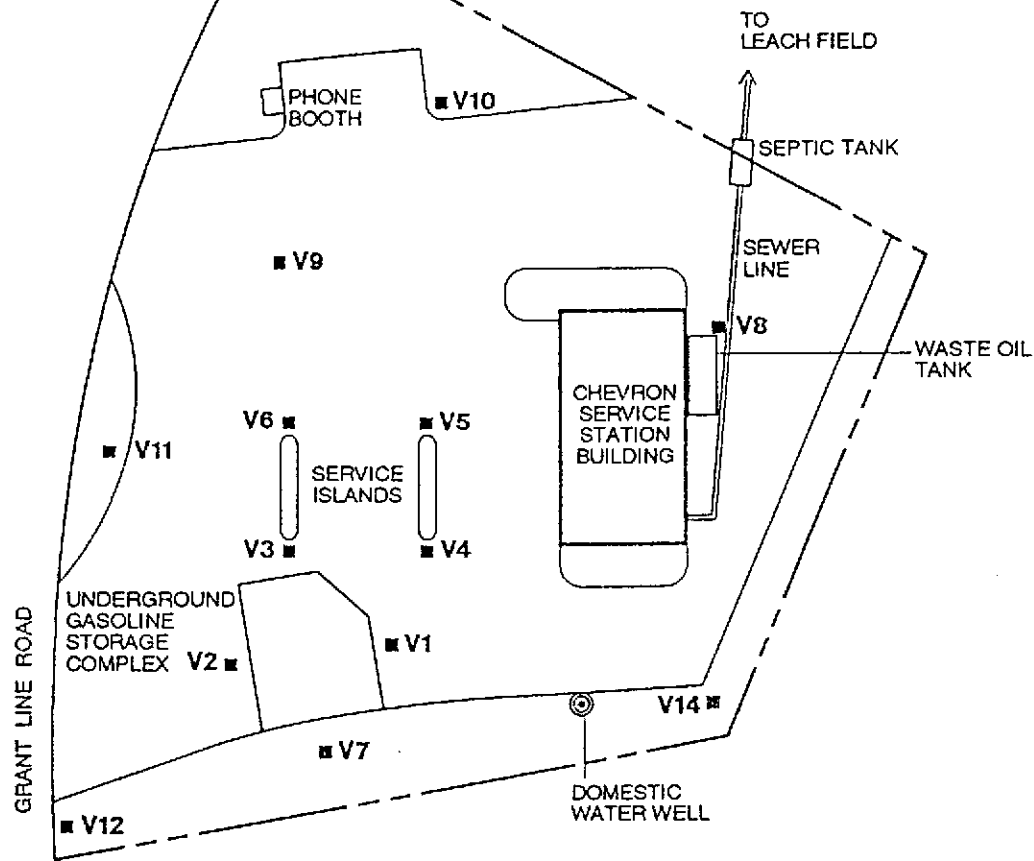
JOB NUMBER  
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REVIEWED BY RG/CEG  
*CLM* *ceg 1262*

DATE  
 8/89

REVISED DATE

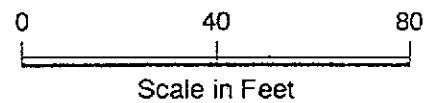
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**EXPLANATION**

- V15 Soil vapor sampling point location

Base Map: Kleinfelder and EA, Engineering and Science

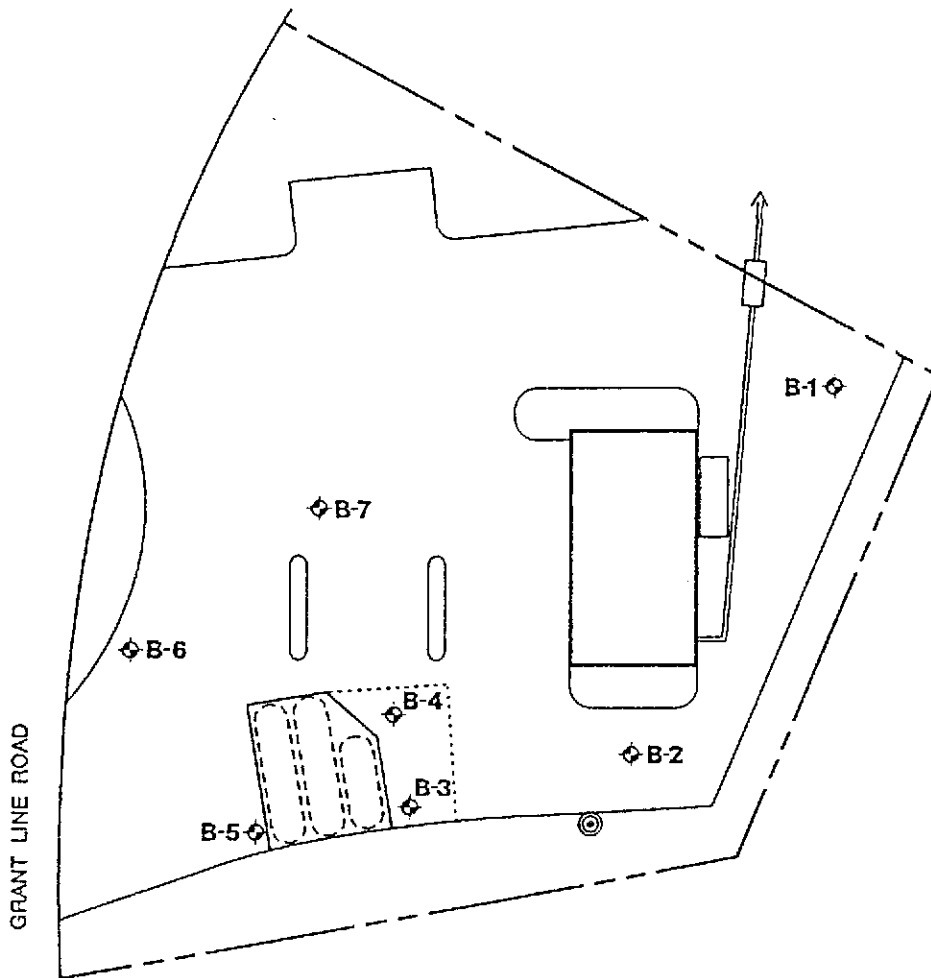


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Soil Vapor Sampling Points Location Map  
 Chevron USA Service Station #7127  
 Grant Line Road  
 Tracy, California

PLATE

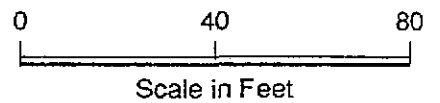
**2**



EXPLANATION

◊ B-1 Exploratory borehole location

Base Map: Kleinfelder



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Boring Location Map  
Chevron USA Service Station #7127  
Grant Line Road  
Tracy, California

PLATE

3

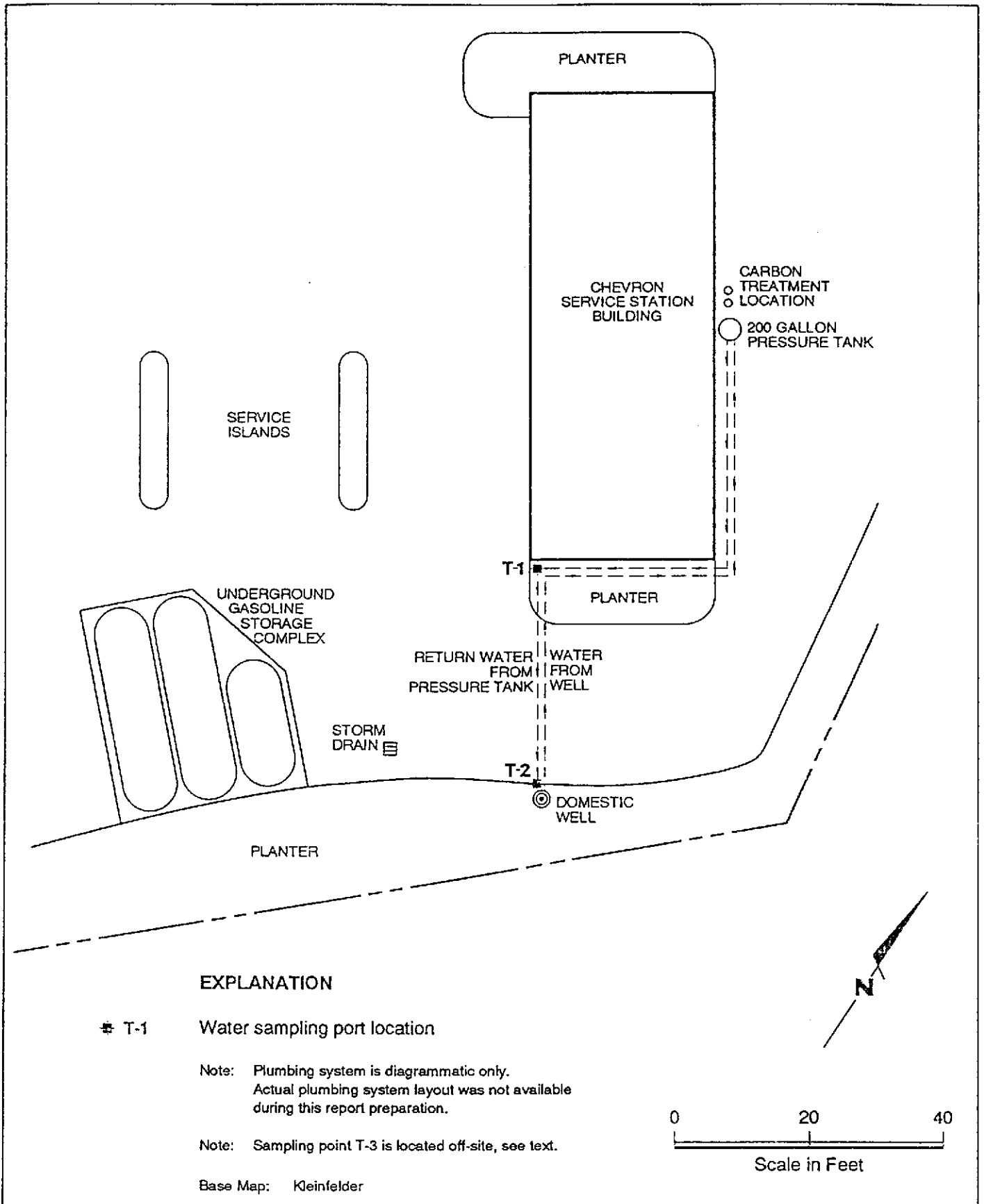
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DATE  
8/89

REVISED DATE

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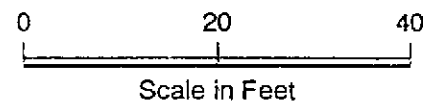
**EXPLANATION**

• T-1 Water sampling port location

Note: Plumbing system is diagrammatic only.  
Actual plumbing system layout was not available during this report preparation.

Note: Sampling point T-3 is located off-site, see text.

Base Map: Kleinfelder



GeoStrategies Inc.

**Well Sampling Port Location Map**  
Chevron USA Service Station #7127  
Grant Line Road  
Tracy, California

PLATE

**4**

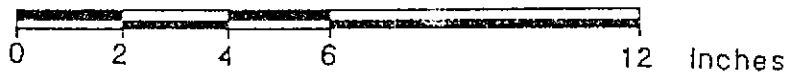
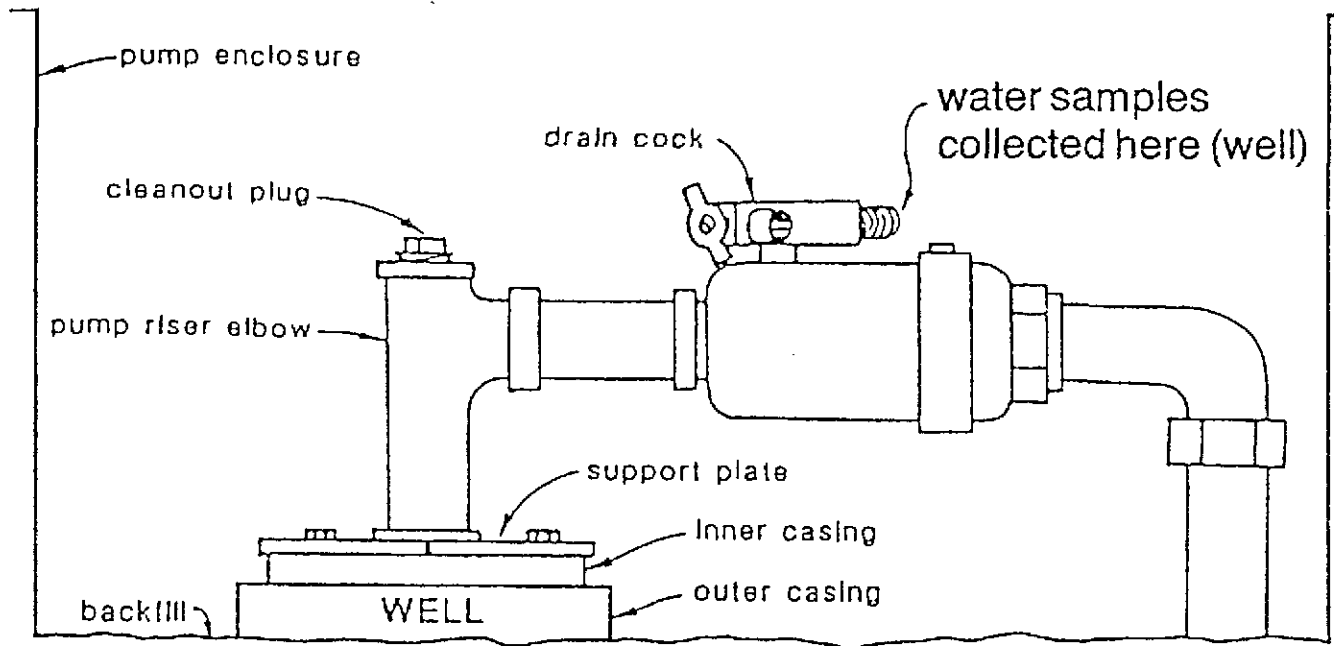
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*UMP/CEG/262*

DATE  
8/89

REVISED DATE

REVISED DATE



approximate scale

Detail by Kleinfelder



GeoStrategies Inc.

Wellhead Detail  
 Chevron USA Service Station #7127  
 Grant Line Road  
 Tracy, California

PLATE

5

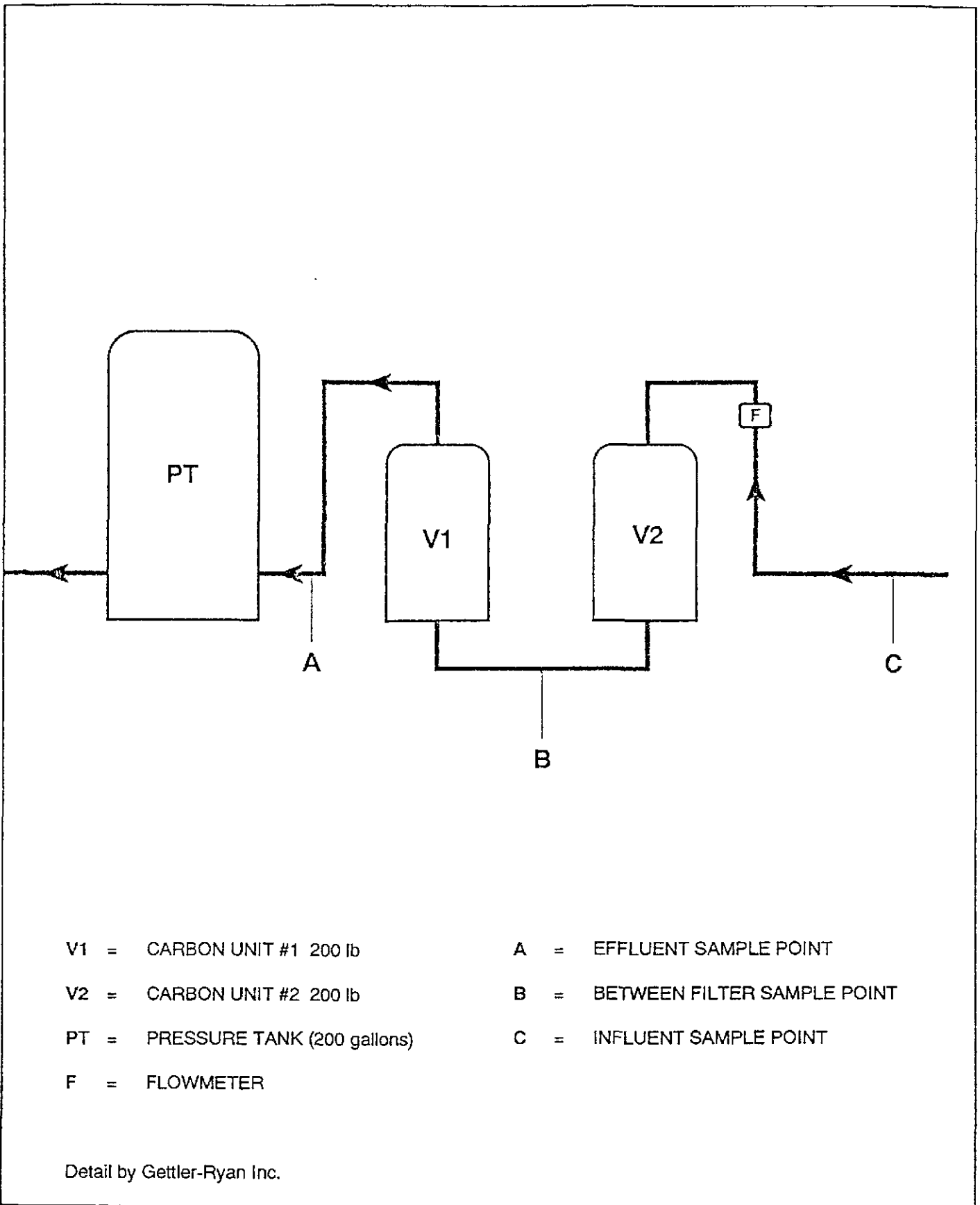
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DATE  
 8/89

REVISED DATE

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- |                                  |                                 |
|----------------------------------|---------------------------------|
| V1 = CARBON UNIT #1 200 lb       | A = EFFLUENT SAMPLE POINT       |
| V2 = CARBON UNIT #2 200 lb       | B = BETWEEN FILTER SAMPLE POINT |
| PT = PRESSURE TANK (200 gallons) | C = INFLUENT SAMPLE POINT       |
| F = FLOWMETER                    |                                 |

Detail by Gettler-Ryan Inc.



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Treatment System Flow Diagram  
 Chevron USA Service Station #7127  
 Grant Line Road  
 Tracy, California

PLATE

6













**GeoStrategies Inc.**

**EXPLORATORY BORING LOGS**

UNIFIED SOIL CLASSIFICATION SYSTEM

MAJOR DIVISIONS		LTR	DESCRIPTION	MAJOR DIVISIONS		LTR	DESCRIPTION		
COARSE GRAINED SOILS	GRAVEL AND GRAVELLY SOILS	GW	Well-graded gravels or gravel sand mixture, fine or no fines.	FINE GRAINED SOILS	SILTS AND CLAYS LL < 50	ML	Inorganic silts and very fine sands, rock flour, silt or clayey fine sands or clayey silts with slight plasticity.		
		GP	Poorly-graded gravels or gravel sand mixture, fine or no fines.			CL	Inorganic clays of low to medium plasticity, gravelly clays, sandy clays, silty clays, lean clays.		
		GM	Silty gravels, gravel-sand-clay mixtures.			OL	Organic silts and organic silt-clays of low plasticity.		
		GC	Clayey gravels, gravel-sand-clay mixtures.			HIGHLY ORGANIC SOILS	PI	Peat and other highly organic soils.	
	SAND AND SANDY SOILS	SW	Well-graded sands or gravelly sands, fine or no fines.		SILTS AND CLAYS LL > 50			MH	Inorganic silts, micaceous or diatomaceous fine or silty soils, elastic silts.
		SP	Poorly-graded sands or gravelly sands, fine or no fines.					CH	Inorganic clays of high plasticity, fat clays.
		SM	Silty sands, sand-silt mixtures.					OH	Organic clays of medium to high plasticity.
		SC	Clayey sands, sand-clay mixtures.						

-  Standard penetration split spoon sample
-  Modified California (Porter) sample
-  Shelby tube sample
-  Water level observed in boring
-  No recovery
- NFWE No free water encountered
- NOSC No odor, scent, or fluid cut
-  Blank casing
-  Screened Casing
-  Cement grout
-  Bentonite
-  Sand pack or gravel pack

NOTES: Blow count represents the number of blows of a 140-pound hammer falling 30 inches per blow required to drive a sampler through the last 12 inches of an 18-inch penetration.

The lines separating strata on the logs represent approximate boundaries only. The actual transition may be gradual. No warranty is provided as to the continuity of soil strata between borings. Logs represent the soil section observed at the boring location on the date of drilling only



CHEVRON USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

A1

PROJECT NO. 10-1782-01

BORING LOG LEGEND

Blow/ Ft.	Sample No.	USCS	Description	Well Const
0			Asphalt	
2		ML	Fill - SANDY SILT - light brown to brown, with some angular gravel, NOSC	
4				
22				
6		CL	Fill - SILTY CLAY - brownish gray, stiff, low plasticity, dry to moist, NOSC	
8				
65	B1 - 10			
10				
12		SM	Gravelly SILTY SAND - gray, very dense fine grained sand, well rounded gravel up to 1/4 inch present NOSC	
14				
46				
16				
18		CL	SILTY CLAY - gray, firm, low plasticity, moist, gravel up to 1/4 inch, NOSC	
20			Total Depth = 19 feet, 6 inches Logged By: Steve Fox Drilling Date: 12/7/87	
22				
24				
26				
28				
30				

B - 1



KLEINFELDER

CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

A2

PROJECT NO. 10-1782-01

BORING LOG B-1

Blow/ Ft.	Sample No	USCS	Descriptic	Well Const
0			Asphalt	
2		SM	Fill - SILTY SAND - tan, light brown, NOSC	
4		CL	Fill - SILTY CLAY - brownish gray, with angular gravel	
6	24			
8				
10	80	SM	GRAVELLY SILTY SAND - gray, very dense, fine gravelly sand, well rounded gravels up to 1/2 inch, NOSC	
12				
14	85			
16				
18		CL	SILTY CLAY - gray, firm, low plasticity, moist, well rounded gravel, slight odor.	
20	14	B2 - 20		
22			Total Depth = 19 feet, 6 inches Logged By: Steve Fox Drilling Date: 12/7/87	
24			Auger refusal at 19 feet, 6 inches	
26				
28				
30				

B - 2



KLEINFELDER

CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

A3

PROJECT NO. 10-1782-01

BORING LOG B-2

Blow/ Ft.	Sample No.	USCS	Description	Well Const
0			Asphalt	
2		CL	Fill - SILTY CLAY - tan	
4		CL	Fill - SILTY CLAY - grayish brown, very stiff, dry to moist - some gravel present -50 ppm tip reading	
6				
8				
10				
12				
14	B3- 14		- Auger refusal at 14 feet	
16			Total Depth = 14 feet Logged By: Steve Fox Drilling Date: 12/7/87	
18				
20				
22				
24				
26				
28				
30				

Depth (feet)

B-3



CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

A4

PROJECT NO. 10-1782-01

BORING LOG B-3

Blow/ Ft.	Sample No.	USCS	Description	Well Const
0			Asphalt	
2		SM	Fill - SILTY SAND - light brown tan, NOSC	
4		CL	Fill - SILTY CLAY - grey, stiff, low plasticity, moist, slight odor	
6	12		- tip reading of 25 ppm on drill cuttings	
8			- some sand present, slight odor	
10	51			
12				
14				
16	44	B4 - 15	SP - GRAVELLY SAND - gray, dense, sand fine grained, moist, gravels from 1/4 to 1/2 inch tip reading of over 2000 ppm	
18			Total Depth = 19 feet, 6 inches Logged By: Steve Fox Drilling Date: 12/7/87	
20				
22				
24				
26				
28				
30				

B - 4



**KLEINFELDER**

CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

**A5**

PROJECT NO. 10-1782-01

**BORING LOG B-4**

Depth (feet)	Blow/ Ft.	Sample N.	USCS	Description	Well Const.
	0				Asphalt
2			SM	Fill - SILTY SAND - tan, small amount of gravel, NOSC	
4			SM	SILTY SAND - gray, stiff, moist, fine-grained sand, possible fill, NOSC	
6	12	B5 - 5			
8				Total Depth = 5 feet, 8 inches Logged By: Steve Fox Drilling Date: 12/7/87	
10					
12					
14					
16					
18					
20					
22					
24					
26					
28					
30					

B - 5



CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE  
**A6**

PROJECT NO. 10-1782-01

BORING LOG B-5

Depth (feet)	Blow/ Ft.	Sample .	USCS	Description	Well Const
0				Asphalt	[Pattern]
2			SM	Fill - SILTY SAND, light brown, NOSC	
4			ML	SANDY SILT - gray, low plasticity, dry to moist, NOSC	
6	22	B6 - 5	ML	GRAVELLY SANDY SILT - gray, hard, low plasticity, moist, NOSC	
8				Auger refusal at 8 feet 9 inches	
10				Total Depth = 8 feet 9 inches Logged By: Steve Fox Drilling Date: 12/7/87	
12					
14					
16					
18					
20					
22					
24					
26					
28					
30					

B - 6



**KLEINFELDER**

CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

**A7**

PROJECT NO. 10-1782-01

**BORING LOG B-6**



Depth (feet)	Blow/Fl.	Sample No.	USCS	Description	Well Const
0				Asphalt	Well Const
2			SM	Fill - SILTY SAND, light brown, NOSC	
4			CL	Fill - SILTY CLAY with angular gravel greater than 1 inch, NOSC	
6	74	B7 - 5	SM	Gravelly SILTY SAND - gray, very dense, moist, NOSC	
8				Auger refusal at 8 feet, unable to collect sample	
10				Total Depth = 8 feet Logged By: Steve Fox Drilling Date: 12/7/87	
12					
14					
16					
18					
20					
22					
24					
26					
28					
30					

B - 7



CHEVRON, USA - STATION 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA

PLATE

A8

PROJECT NO. 10-1782-01

BORING LOG B-7

**GeoStrategies Inc.**

**GETTLER-RYAN INC.  
GROUNDWATER SAMPLING REPORTS**



June 13, 1989

## WATER TREATMENT SYSTEM SAMPLING REPORT

Reference: Chevron Service Station #7127  
Grantline/I-580  
Tracy, California

Sampling Date: May 24, 1989

This report presents the results of the Water treatment system sampling that took place on May 24, 1989, at the referenced location.

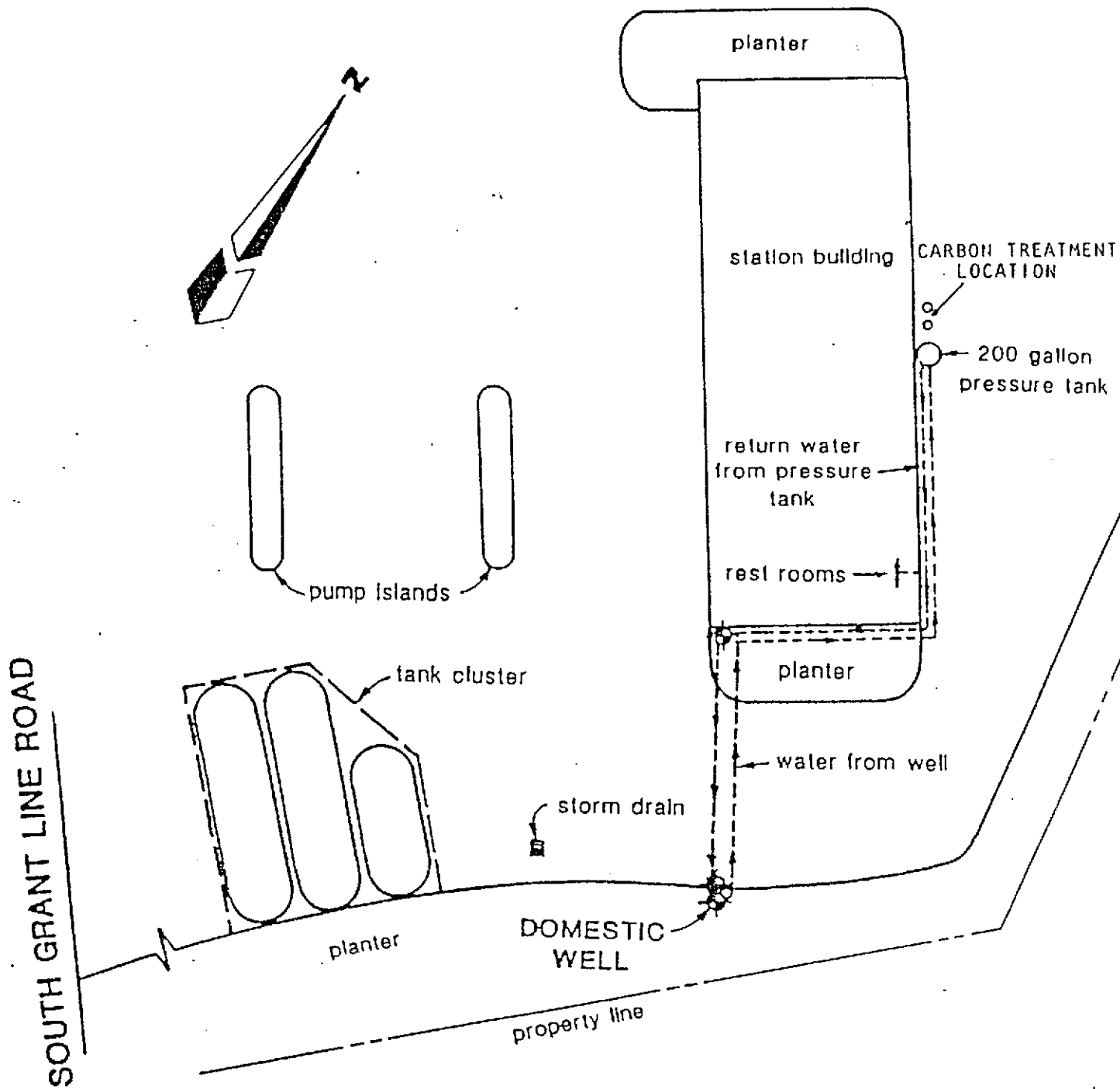
The treatment system samples were collected following a purge time sufficient to clear any residual contamination to order to obtain a representative sample. Proper sample technique assured all containers were filled, capped, and properly stored on blue ice for transport to the laboratory. In addition, pH, temperature and conductivity measurements were taken in the field from representative samples.

The samples were analyzed at International Technology Corporation - Santa Clara Valley Laboratory located at 2055 Junction Avenue, San Jose, California. The laboratory is assigned a California DHS-HMTL Certification number of 137. The results are presented as a Certified Analytical Report, a copy of which is attached to this report.

Chain of Custody documentation is attached to this report.

Tom Paulson  
Sampling Manager

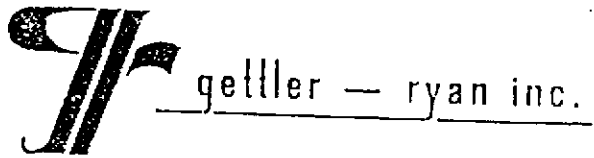
attachments



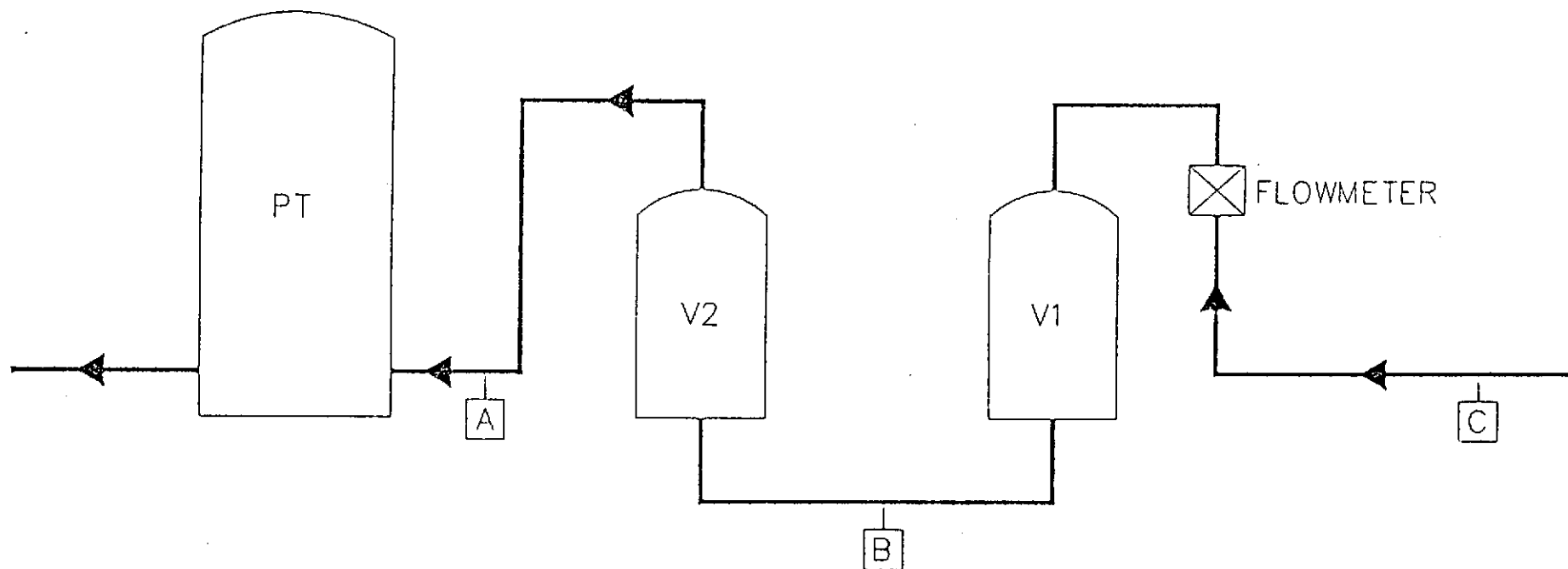
BASE MAP BY KLEINFELDER

0 10 20 30 feet  
approximate scale

NOTE: Plumbing system is diagrammatic only. Actual plumbing system layout was not available during this report preparation.



SITE PLAN  
CHEVRON U.S.A. STATION # 7127  
GRANT LINE ROAD  
TRACY, CALIFORNIA



V1 = CARBON UNIT #1 2001b  
 V2 = CARBON UNIT #2 2001b  
 PT = PRESSURE TANK

**A** = EFFLUENT SAMPLE POINT  
**B** = BETWEEN FILTER SAMPLE POINT  
**C** = INFLUENT SAMPLE POINT

GETTLER-RYAN INC.  
 1992 NATIONAL AVENUE  
 HAYWARD, CALIFORNIA

## PROCESS FLOW DIAGRAM

CHEVRON SERVICE STATION #7127  
 I-580/GRANTLINE ROAD  
 TRACY, CALIFORNIA



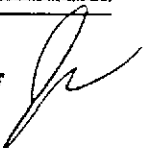
INTERNATIONAL  
TECHNOLOGY  
CORPORATION

# ANALYTICAL SERVICES

## CERTIFICATE OF ANALYSIS

Gettler-Ryan  
1992 National Avenue  
Hayward, CA 94545  
ATTN: Jerry Mitchell

Date: May 31, 1989

FILE COPY 

Work Order Number: S9-05-299

P.O. Number: 3251

This is the Certificate of Analysis for the following samples:

Client Project ID: GR #3251, Chevron, I 580/Grantline Rd.  
Tracy, CA  
Date Received by Lab: 5/24/89  
Number of Samples: 4  
Sample Type: Water

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

Reviewed and Approved



David A. Pichette  
Project Manager

DAP/jd  
1 Page Following - Table of Results

American Council of Independent Laboratories  
International Association of Environmental Testing Laboratories  
American Association for Laboratory Accreditation

Page: 1 of 1  
 Date: May 31, 1989  
 Client Project ID: GR #3251, Chevron, I 580/  
 Grantline Rd., Tracy, CA

IT ANALYTICAL SERVICES  
 SAN JOSE, CA

Work Order Number:  
 S9-05-299

Lab Sample ID	Client Sample ID	Sample Date	Date Analysis Completed	Sample Condition on Receipt
S9-04-299-01	A	5/24/89	5/25/89	Cool, pH $\leq$ 2
S9-04-299-02	B	5/24/89	5/25/89	Cool, pH $\leq$ 2
S9-04-299-03	C	5/24/89	5/25/89	Cool, pH $\leq$ 2
S9-04-299-04	Trip Blank	5/24/89	5/25/89	Cool, pH $\leq$ 2

Total Petroleum Hydrocarbons - Modified E.P.A. Methods 8015, 8020

ND = None Detected

Results - Micrograms per Liter

Lab Sample ID	Client Sample ID	Low Boiling Hydrocarbons (calculated as Gasoline)	Benzene	Toluene	Ethyl Benzene	Xylenes (total)
S9-04-299-01	A	ND	ND	ND	ND	ND
S9-04-299-02	B	ND	ND	ND	ND	ND
S9-04-299-03	C	ND	ND	ND	ND	ND
S9-04-299-04	Trip Blank	ND	ND	ND	ND	ND
Detection Limit		50.	0.5	1.	1.	3.

Gettler - Ryan Inc.

57-00-277

Chain of Custody

COMPANY Chevr USA #7727 JO 084  
 ENVIRONMENTAL DIVISION  
 JOB LOCATION I-5807 Grantline Rd  
 CITY Tracy CA PHONE NO. \_\_\_\_\_  
 AUTHORIZED Jerry Mitchell DATE 5-24-89 P.O. NO. 3251

SAMPLE ID	NO OF CONTAINERS	SAMPLE MATRIX	DATE/TIME SAMPLED	ANALYSIS REQUIRED	SAMPLE CONDITION LAB ID
A	3	Liquid	5-24-89 11:23	7 AC (Low) BISE	pk Cool
B	3	↓	↓ 11:38	↓	↓
C	3	↓	↓ 11:40	↓	↓
Trip	1	↓	5-22-89	↓	↓

RELINQUISHED BY: [Signature] 5-24-89 16:45 RECEIVED BY: \_\_\_\_\_

RELINQUISHED BY: \_\_\_\_\_ RECEIVED BY: \_\_\_\_\_

RELINQUISHED BY: \_\_\_\_\_ RECEIVED BY LAB: Josephine DeCarli 5/24/89 16:45

DESIGNATED LABORATORY: TT/SCY DHS #: 137

REMARKS: 48hr Rush Result due 5-26-89

DATE COMPLETED 5-24-89 FOREMAN [Signature]

ORIGINAL