

**FINAL  
CONTAMINATION SCREENING EVALUATION REPORT  
VOLUME 3 OF 3**

**PROJECT DEVELOPMENT AND ENVIRONMENT STUDY  
US 19 (SR 55)  
FROM SOUTH OF US 98 TO CR 488  
CITRUS COUNTY**

**Work Program Item Segment No: 405822 1  
Federal-Aid Program No: 1852 007 P**

**The proposed project involves improving US 19 (SR 55) to a six-lane divided facility from US 98 to Turkey Oak Drive, and improvements to the CR 488 intersection in Citrus County. The total length of the project is approximately 18.8 miles.**



Prepared for:

**Florida Department of Transportation  
District Seven  
11201 North McKinley Drive  
Tampa, Florida 33612-6456**

**May 2004**

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Prepared for:

**Florida Department of Transportation  
District Seven  
11201 North McKinley Drive  
Tampa, Florida 33612-6456**

Prepared by:

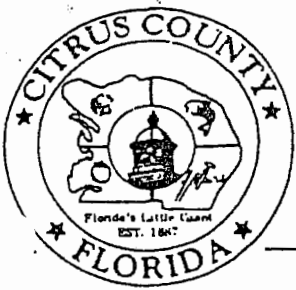
**PSI, Inc.  
5801 Benjamin Center Dr., Suite 112  
Tampa, Florida 33634**

**May 2004**

**APPENDIX D**

**REGULATORY DOCUMENTATION**

**Site No. 2 U-haul Rentals**  
9472 S. Suncoast Boulevard  
Homosassa, Florida 32650  
FDEP I.D. No. 098503149



# Board of County Commissioners

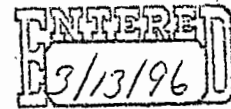
## Department of Public Safety

285 South Kensington Avenue, Lecanto, Florida 34461

(352) 726-1400 Fax (352) 726-1001

2

March 11, 1996



Ed Priest  
9472 S. Suncoast Blvd.  
Homosassa, Florida 34448

Ref. Fac. 098503149  
Priest's Chevron  
9472 S. Suncoast Blvd.  
Homosassa, Florida 34448

Ed Priest,

On 3/4/96 a representative of the Department of Public Safety conducted a Closure Inspection at the above referenced facility. This inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to Chapter 62-761, Florida Administrative Code (F.A.C.), which regulate underground stationary storage tank systems. A copy of the completed inspection form is attached.

Should you have any questions, please contact me at (904)726-1400.

Sincerely,

David E. Chronister  
Environmental Specialist III  
Department of Public Safety

DEC/jlb

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STORAGE TANKS PROGRAM

285 S. Kensington Avenue

Lecanto, Florida 34461

(352) 726-1400



State of Florida  
 Department of Environmental Regulation  
**Pollutant Storage Tank System  
 Inspection Report Form**

Facility ID #: 098503149 County: CITRUS  
 Facility Name: PRIEST'S CHEVRON  
 Facility Location: 9472 S. SUNCOAST BLVD. HOMASADA, FL. 34448  
 Facility Contact: ED PRIEST Phone: (352) 382-1198  
 Owner: ED PRIEST Phone: (352) 382-3030  
 Owner Address: 9472 S. SUNCOAST BLVD. HOMASADA, FL. 34448  
 Owner Contact: ED PRIEST Owner Change Date: \_\_\_\_\_  
 Latitude: 28° 43' 23" Longitude: 82° 32' 00" Fac. Type: A

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
4	5000	EMPTY	XX/80	U	C	B	B	B
5	5000	EMPTY	XX/80	U	C	B	B	B

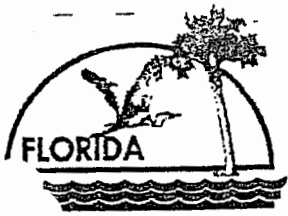
Comments: TANKS REMOVED BY OWNER. 0.1% LEL BOTH TANKS AFTER RINSE. PIPING TO BE CAPED. FINAL DISPOSITION OF TANKS TO BE DETERMINED. COPY CITRUS COUNTY WITH DISPOSITION OF TANKS, AND CLOSURE REPORT.

<b>Inspection Type: (Choose One)</b> <input type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input checked="" type="checkbox"/> Closure <input type="checkbox"/> Reinspection	<b>Site Information: (All that apply)</b> <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
---	--

DER District or Local Program CITRUS COUNTY PUBLIC SAFETY - STORAGE TANK PROGRAM

DAVID E. CHRONISTER  
 Inspector Name (Print):  
[Signature] 3/4/86  
 Inspector's Signature & Date

[Signature]  
 Contact Name (Print):  
 Contact's Signature & Date



# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

April 5, 2000

Mr. James A. Peterson  
PO Box 560  
Homosassa Springs, FL 34447

Re: Larry's Auto Sales  
FDEP Facility # 099202408  
Discharge Date: June 27, 1992

Dear Mr. Peterson:

The Florida Department of Environmental Protection is required to direct the cleanup of petroleum contamination sites in priority order and by preapproval of the scope and cost of all work that is funded by the State. The priority order for cleanup is determined pursuant to the Petroleum Cleanup Site Priority Ranking Rule, Chapter 62-771, Florida Administrative Code.

Each site eligible for cleanup funding assistance is scored according to this system. The above site has received a score of 30. Each eligible site is ranked in relation to all other eligible sites. Ranking and funding are performed by the DEP quarterly in February, May, August, and November of each year. Currently funding is available for all sites with a priority score of 50 or greater. Therefore, funding is not available this year for continued rehabilitation at your site.

If you believe our records are in error or have any questions, please contact me at 850/224-2599.

Sincerely,

Brian King  
USTM Operations Manager

BK/as  
Enclosure: PCT printout  
cc: Southwest District DEP Office  
File

**Site No. 3    Cumberland Farms #1006**  
8078 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098503049  
EPA I.D. No. FLD984225037





3

**ENVIRONMENTAL COMPLIANCE SERVICES, INC.**

April 18, 2001

ECS Project #60166

Ms. Betsy Skinner  
Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

**Remedial System Installation Proposal**  
**Cumberland Farms #1006**  
**Homosassa, Florida**  
**FDEP Facility ID #98503049**

Dear Ms. Skinner:

This letter and enclosures document the estimated costs for installing the Florida Department of Environmental Protection (FDEP) approved air-sparging (AS) and soil vapor extraction (SVE) remedial system at the above referenced facility. All anticipated installation costs, and their back-up documentation, has been included in this proposal.

Environmental Compliance Services, Inc. (ECS) proposes to perform the installation, utilizing a construction crew consisting of three ECS people (construction supervisor, upper level technician and mid-level technician) and one professional for project management oversight. ECS estimates that the installation will require approximately 10 days to complete, not including travel time/mobilization. A detailed schedule of work effort and personnel is attached. A breakdown of daily personnel and per diem/lodging charges is attached in this submittal as well.

Three quotes were solicited for all large dollar services or supplies to ensure competitive pricing. Based upon a review of the quotes received, ECS selected: Groundwater Protection to perform the AS and SVE well installation, BISCO to supply the equipment and Akins Electric to provide electrical services. For the remaining services or supplies one bid was solicited. Copies of all quotes have been enclosed with this proposal.

Prior to remedial system construction activities, ECS proposes to have an onsite meeting with the site owner, operator and vendors/subcontractors. Subsequently, the air sparging wells will be installed in accordance with the FDEP approved Remedial Action Plan. The 15 air sparging wells will be installed using hollow stem augers to approximately 10 feet below land surface. Investigative derived waste (IDW) generated during the well installation will be containerized in 55-gallon steel drums. The costs for the drums has

RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
01 APR 25 AM 10:33  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER

588 Silver Street  
Agawam, MA 01001  
413-789-3530  
Fax 413-789-2776

157 Old Guilford Road #6  
Brattleboro, VT 05301  
802-257-1195  
Fax 802-257-1603

18 Shepherd Street  
Brighton, MA 02135  
617-782-4417  
Fax 617-254-5939

1209 Tech Blvd., Suite 202  
Tampa, FL 33619  
813-612-5900  
Fax 813-612-5910

74 Boston Post Road  
Madison, CT 06443  
203-245-3322  
Fax 203-245-3494



**ENVIRONMENTAL COMPLIANCE SERVICES, INC.**

not been included in this submittal. Sampling, manifesting, transporting and disposal of the drums generated during the well installation will be submitted as a change order.

An additional mobilization for baseline sampling has also been included in this proposal. During remedial system start-up testing activities, two SVE effluent air samples will be collected, one approximately one-hour after SVE system start-up and one upon completion of the baseline groundwater sampling event. The collected air samples will be analyzed for hydrocarbon concentrations by EPA Method 18. Following the baseline sampling event, the remedial system will be shut down and carbon usage calculations performed to determine the most efficient method of soil vapor treatment. The baseline groundwater sampling will consist of depth to water measurements, purging and sampling monitoring wells MW-2, MW-3, MW-5, MW-6, MW-7, MW-8, MW-9, MW-11, MW12, MW-19, MW-21 and MW-16D for EPA Method 602, 8310, and FLPRO analysis. The proposed costs for analytical sampling is provided in the attached laboratory cost breakdown form. The results of the baseline-sampling event will be presented in the startup report.

Following completion of the remedial system installation and start-up testing, ECS will submit a RA Startup Report to the FDEP to document system installation activities and events. If you need additional information or have any questions please contact Jim Cheze or myself at (813) 612-5900.

Sincerely,  
**Environmental Compliance Services, Inc.**

Marc E. Eichenholtz, P.G.  
Principal Geologist

Sam Philpot  
Construction Manager

C: Dan Felton - ECS

Enclosures: FDEP Template Cost Worksheet  
FDEP Preapproval Program Spreadsheet  
Vendor and Subcontractor Quotes

# Template Cost Worksheet

FDEP Contract #:

Contractor: Environmental Compliance Services, Inc

FDEP/LP Site Mgr: Betsy Skinner

Work Order #:

WO Description: Install

Date: 04.13.01

Facility Id #: 098503049

Site Name: Cumberland Farms# 1006 Homosassa FL

	Allowed Cost	Number of People	Number of Items Needed	Sub Markup	Total Cost of Items
<b>Section A: Packaged Work Scopes</b>					
1 Pumping Test or Liquid Ring Pumping Test	\$2,471.99				\$0.00
Includes: setup, take down, test time, equipment kit, permit hrs, NPOES application fee, per diem					
Excludes: mobilization, analytical cost, well installation, effluent treatment or disposal costs, permit fees					
2 VES Pilot Test	\$1,656.06				\$0.00
Includes: setup, take down, test time, equipment kit, permit hrs, per diem					
Excludes: mobilization, analytical cost, well installation, permit fees					
3 Sparging & VES Pilot Test	\$2,576.09				\$0.00
Includes: setup, take down, test time, equipment kit, permit hrs, per diem					
Excludes: mobilization, analytical cost, well installation, permit fees					
4 Monthly O&M Visit	\$684.72				\$0.00
Includes: routine O&M, all monthly sampling time, equipment kit, water levels, per diem					
Excludes: mobilization, analytical cost, telemetry cost					
<b>Section A Subtotal:</b>					<b>\$0.00</b>
<b>Section B: Office Activities, Part I</b>					
1 Proposal Preparation	\$443.32		1		\$443.32
2 File Review	\$482.26				\$0.00
3 Permits (1/2 permit for additional permits and per property for off site access)	\$604.07		1		\$604.07
4 Site Health & Safety Plan	\$282.57		1		\$282.57
<b>Section B Subtotal:</b>					<b>\$1,329.96</b>
<b>Section C: Field Activities (all activities include equipment kit, vehicle, per diem)</b>					
1 Mobilization (to and from site) (2 persons)	\$672.67		9		\$6,054.03
2 Mobilization (to and from site) (1 person)	\$361.82		3		\$1,085.46
3 Drilling Setup (one time use per event, setup and take down)	\$460.05		1		\$460.05
4 Soil Boring for Soil Screening (≤ 10 ft; with or without soil lab sample)	\$188.38				\$0.00
Soil Boring for Soil Screening (> 10 ft to ≤ 30 ft; with or without soil lab sample)	\$282.56				\$0.00
Soil Boring for Soil Screening (> 30 ft; with or without soil lab sample)	\$376.75				\$0.00
7 Well Installation, single cased (≤ 20 ft; including split spoons)	\$392.50				\$0.00
8 Well Installation, single cased (> 20 ft to ≤ 40 ft; including split spoons)	\$588.75				\$0.00
9 Well Installation, single cased (> 40 ft; including split spoons) (case by case)					\$0.00
10 Well Installation, double cased (≤ 40 ft; including split spoons)	\$1,177.50				\$0.00
11 Well Installation, multiple cased (> 40 ft; including split spoons) (case by case)					\$0.00
12 Recovery Well Installation (≤ 40 ft)	\$785.00				\$0.00
13 Recovery Well Installation (> 40 ft) (case by case)					\$0.00
14 Air Sparging Well Installation (≤ 40 ft)	\$294.38		15		\$4,415.70
15 Soil Vapor Extraction Well Installation (≤ 40 ft)	\$196.25		8		\$1,570.00
16 Air Sparging Well and/or Vapor Extraction Well Installation (> 40 ft) (case by case)					\$0.00
17 Well Abandonment (per well)	\$71.37				\$0.00
18 Recovery Well Abandonment (per well)	\$190.71				\$0.00
19 Well Sampling with Water Level (per well)	\$189.26		12		\$2,271.12
20 Water Level Only (per well not sampled)	\$18.51		1		\$18.51
21 Slug Testing (per well, includes analysis)	\$525.45				\$0.00
22 Utility Clearance (included in drilling setup)	\$0.00				\$0.00
23 Area Survey	\$785.00				\$0.00
Includes: on-site water levels, area use and map, potable well survey					
24 Half Day Field Oversight (2 persons max.)	(indicate here)				\$0.00
25 Whole Day Field Oversight (2 persons max.)	(indicate here)				\$0.00
<b>Section C Subtotal:</b>					<b>\$15,874.87</b>
<b>Section D: Other Field Work</b>					
1 Other Field Work	(indicate here)				\$0.00
2 Other Field Work	(indicate here)				\$0.00
<b>Section D Subtotal:</b>					<b>\$0.00</b>
<b>Section E: Other Equipment Rental Cost(s)</b>					
1 Other Equipment	(indicate here)				\$0.00
2 Other Equipment	(indicate here)				\$0.00
<b>Section E Subtotal:</b>					<b>\$0.00</b>

# Template Cost Worksheet

Work Order #:   
 Facility Id #: 098503049

WO Description: Install   
 Site Name: Cumberland Farms# 1006 Homosassa FL.

Date: 04.13.01

	Allowed Cost	Number of People	Number of Items Needed	Sub Markup	Total Cost of Items
<b>Section F: In-house Service Cost(s)</b>					
1 Laboratory					\$0.00
2 Drilling					\$0.00
3 Construction	\$46,183.20				\$46,183.20
4 Other (indicate here)					\$0.00
<b>Section F Subtotal:</b>					<b>\$46,183.20</b>

<b>Section G: Subcontractor Cost(s)</b>					
1 Laboratory	MW-2,3,5,6,7,8,9,11,12,19,21,16D	PEL	\$3,600.00	10.00%	\$3,960.00
2 Drilling		Groundwater protect	\$5,925.00	10.00%	\$6,517.50
3 Construction		Akins Electric	\$4,925.00	10.00%	\$5,417.50
4 Disposal		(indicate selected sub)		10.00%	\$0.00
5 Other		Equip. Rental/Services	\$6,191.31	10.00%	\$6,810.44
6 Non-Capital Equipment and/or Materials Purchase		Miscellaneous	\$14,157.34	10.00%	\$15,573.04
7 Capital Equipment Purchase (max \$2,500 markup)		Bisco	\$30,297.78	10.00%	\$32,797.78
8 PAC Remediation System (max \$2,500 markup)				10.00%	\$0.00
<b>Section G Subtotal:</b>					<b>\$71,076.26</b>

<b>Section H: Office Activities, Part II</b>					
1 Level 1 General or NPDES Report	(Indicate here)	\$233.42			\$0.00
2 Level 2 General Report	(Indicate here)	\$474.55			\$0.00
3 Level 3 General Report	(indicate here)	\$693.02			\$0.00
4 Level 4 General Report	(Indicate here)	\$1,577.20			\$0.00
5 O&M Quarterly Report		\$1,360.78			\$0.00
6 O&M Annual Report		\$2,510.86			\$0.00
7 Remedial Action Plan (gw or soil design)		\$11,862.12			\$0.00
8 Remedial Action Plan (gw & soil design)		\$13,294.78			\$0.00
9 Level 1 Limited Scope Remedial Action Plan or RAP Modification		\$1,158.59			\$0.00
10 Level 2 Limited Scope Remedial Action Plan or RAP Modification		\$2,268.29			\$0.00
11 Level 3 Limited Scope Remedial Action Plan or RAP Modification		\$4,024.27			\$0.00
12 Level 4 RAP Modification		\$6,647.39			\$0.00
13 As-built Drawings (P.E. sealed red line modifications)		\$510.87	1		\$510.87
14 Construction Drawings and Specifications		\$2,809.98	1		\$2,809.98
15 Bid Package, Solicitation and Evaluation		\$1,585.06	1		\$1,585.06
16 RA Startup Report (includes as-builts and drawing modifications)		\$1,462.71	1		\$1,462.71
17 Level 1 Natural Attenuation Plan		\$893.02			\$0.00
18 Level 2 Natural Attenuation Plan with Modeling		\$2,619.47			\$0.00
19 Natural Attenuation or Post Remediation Monitoring Quarterly Report		\$438.35			\$0.00
20 Natural Attenuation or Post Remediation Monitoring Semi-Annual Report		\$893.02			\$0.00
21 Level 1 Natural Attenuation or Post Remediation Monitoring Annual Report		\$1,095.21			\$0.00
22 Level 2 Natural Attenuation Monitoring Annual Report		\$1,810.74			\$0.00
23 Well Abandonment Report		\$202.19			\$0.00
<b>Section H Subtotal:</b>					<b>\$6,368.62</b>

**Cost Share Information**

FDEP Cost Share	100.00%
Applicant/Owner Cost Share	0.00%
<b>Total</b>	<b>100.00%</b>

**Standard Invoice Schedule**

Invoice	Amount	Documentation Required for Invoice
A Packages	\$0.00	
B Field Activities	\$91,499.86	
C Remedial Equip.	\$32,797.78	Vendor's Invoices
D Office Activities	\$2,451.98	
E Retainage	\$14,083.29	
<b>Total</b>	<b>\$140,832.91</b>	

**Work Order Totals**

<b>Work Order Total:</b>	<b>\$140,832.91</b>
<b>Subtotal (less retainage):</b>	<b>\$126,749.62</b>
<b>Retainage: 10%</b>	<b>\$14,083.29</b>
<b>Cost Share Work Order Totals</b>	
<b>FDEP Total:</b>	n/a
<b>FDEP Subtotal:</b>	n/a
<b>FDEP Retainage:</b>	n/a

Table 1

Materials/Subcontractors  
 Cumberland Farms #1006  
 Homosassa, FL

Template Section #	Item or Material	Vendor/Sub	Cost	Use Rationale for Selection
<b>Drilling</b>				
G2	Well Install	Huss Drilling	\$6,525.00	Well install
G2	Well Install	Custom Drilling	\$8,758.00	Well install
G2	Well Install	Groundwater pro.	\$5,925.00	Well install
		<b>G2 subtotal</b>	<b>\$5,925.00</b>	
<b>Electrician</b>				
G3	electrical installation	Akins Electric	\$4,925.00	electrical install
G3	electrical installation	J.H.Ham Electric	\$6,850.00	electrical install
G3	electrical installation	Aron Electric		electrical install
		<b>G3 subtotal</b>	<b>\$4,925.00</b>	
<b>System Equipment</b>				
G7	remedial equipment	Nepco	\$31,072.79	equipment, storage tank, shipping, tax
G7	remedial equipment	Enviro supply	\$41,931.40	equipment, storage tank, shipping, tax
G7	remedial equipment	Bisco	\$30,297.78	equipment, storage tank, shipping, tax
		<b>G7 subtotal</b>	<b>\$30,297.78</b>	
<b>Rental Equipment/Services</b>				
G5	Backhoe, compactor	United rentals	\$2,043.00	Dig, saw cut edges compact
G5	Barricades	Bob's Barricades	\$134.51	Traffic control / safety
G5	Concrete cutters approx.	True-line	\$4,013.80	concrete cutting and removal for trenches(806 ft)
G5				
		<b>G5 subtotal</b>	<b>\$6,191.31</b>	



### Storage Tank Facility Compliance Inspection Report

Facility ID 8503049 County 09 CITRUS Inspection Date 9/6/00  
 Facility Name CUMBERLAND FARMS 1006 Facility Type A-RETAIL  
 Latitude 28°44'40" Longitude 82°33'27" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection.

# USTs Inspected	<u>3</u>	# ASTs Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a <i>Discharge Project</i>		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	<u>SEE PAGE 2</u>	
	<u>FOR COMMENTS.</u>	

Financial Responsibility - Verify owner's coverage. Select *Insurance* or *Other*, and provide *Mechanism*, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: SELF

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOR - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS CNTY ENV. HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>CLAUDE W. THOMAS</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> 9/6/00 Inspector Signature & Date	<u>Claude W. Thomas</u> Facility Representative Signature & Date

Facility Name: CUMB. FARMS 1006 Facility ID: 8503049 Date: 9/6/00

Site	Description / Inspector's Comments
Comments	Main Release detection Method is
	S.I.R. By USTman all Tanks
	Passing last month available for
	Review June 2000.
	Sumps and dispenser liners are
	visually checked monthly by C.TEC
	+ Associates and conditions are
	noted on inspection report. At the
	time of this inspection all 3
	sumps were dry and clean and the
	dispenser lines were dry with some
	accumulated debris.
	The Lines and Line Leak Detectors were
	tested by Down Under 6/12/00
	all passed.
	The RDRL was on hand in the facility
	The Fill Boxes were marked as per API 1637
	The Monitor Wells were left open to
	serve as Contamination assessment
	wells.

8985  
CONTAMINATION ASSESSMENT REPORT SUMMARY SHEET

Facility Name: Cumberland Farms #1006 Reimbursement Site   
 Location: 8078 S. Sun Coast Blvd., Homosassa State Contract Site   
 EDI #: 090836 FAC I.D. #: 098503044 Others:   
 Date Reviewed: 12/1/88 Local Government: \_\_\_\_\_

(1) Source of spill: overflow Date of spill: ?

(2) Type of product: gasoline group gallons lost \_\_\_\_\_ kerosene group gallons lost \_\_\_\_\_  
 leaded \_\_\_\_\_  kerosene \_\_\_\_\_  
 unleaded regular \_\_\_\_\_  diesel \_\_\_\_\_  
 unleaded premium \_\_\_\_\_  JP-4 jet fuel \_\_\_\_\_  
 gasohol \_\_\_\_\_  Jet A fuel \_\_\_\_\_

(3) Description of IRA (if any): pumping and baiting via existing wells on a weekly basis  
 Free product removal: 2580 (gals)  
 Soil removals: \_\_\_\_\_ (cubic yds)  
 Soil incineration: \_\_\_\_\_ (cubic yds)

(4) Free product still present?  (yes/no) Maximum apparent product thickness: 23 (ft)

(5) Maximum groundwater contaminant levels (ppb): Total VOA: 5695 benzene: 1440 EDB: BDL  
 lead: 260 MTBE: 1175 other: Pb-260

(6) Brief lithologic description: clayey sand

(7) Areal and vertical extent of soils contamination defined?  (yes/no) Highest current soil concentration (OVA: \_\_\_\_\_ ppm) or (EPA Method 5030/8020: \_\_\_\_\_ ppb)

(8) Lower aquifer contaminated? (yes/no) Depth of vertical contamination: \_\_\_\_\_

(9) Date of last complete round of groundwater sampling: 3/88 Date of last soil sampling: \_\_\_\_\_

(10) QAPP approved?  (yes/no) Date: 02/18/88

(11) Direction (e.g. NNW) of surficial groundwater flow: SE (Figure 5 on page 7) } initial CAP

(12) Average depth to groundwater: 4 (ft)

(13) Observed range of seasonal groundwater fluctuations: ? (ft)

See current information

(14) Estimated rate of groundwater flow: 0.038 (ft/day)

(15) Hydraulic gradient across site: .002 (ft/ft)

(16) Aquifer characteristics:

	Value	Units	Method
Hydraulic conductivity	<u>4</u>	<u>ft/day</u>	_____
Storage coefficient	<u>.5</u>	_____	_____
Aquifer thickness	<u>16</u>	<u>ft</u>	_____
Effective soil porosity	<u>.25</u>	_____	_____
Transmissivity	<u>300</u>	<u>ft/day</u>	<u>pump test</u>

(17) Other remarks: \_\_\_\_\_



this can be used for all data



1/24/10

CONTAMINATION ASSESSMENT REPORT SUMMARY SHEET

Facility Name: CUMBERLAND FARMS # 1006 Reimbursement Site   
 Location: 8078 S. SUNCOAST BLVD. HOMOSASSA State Contract Site   
 ESI #: 090836 FAC I.D. #: 098503049 Other:   
 Date Reviewed: 3/5/90 Local Government: CITRUS (COUNTY)

09

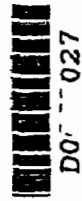
MIKE WOOD

- (1) Source of spill: OVERFILL Date of spill: UNKNOWN
- (2) Type of product: gasoline group gallons lost            kerosene group            gallons lost
- leaded UNKNOWN  kerosene             
 unleaded regular UNKNOWN  diesel             
 unleaded premium UNKNOWN  JP-4 jet fuel             
 gasohol             Jet A fuel
- (3) Description of IRA (if any): PUMPING AND PAIVING EXISTING WELLS ON A WEEKLY BASIS. STORAGE TANKS AND LINES REMOVED AND REPLACED.  Free product removal: 500 (gals)  
 Soil removal:            (cubic yds)  
 Soil incineration:            (cubic yds)
- (4) Free product still present? (yes)no Maximum apparent product thickness: ? (ft)
- (5) Maximum groundwater contaminant levels (ppb): Total VOA: 5695 benzene: 1440 EOB: BDL  
 lead: 8.0 MTBE: 117.5 others:
- (6) Brief lithologic description: SAND AND QUARTZ, CLAY LAYER AT APPROX. 20'
- (7) Areal and vertical extent of soils contamination defined? (yes/no) (no)  
 Highest current soil concentration (OVA: 10000 ppm) or (EPA Method 5030/8020:            ppm)
- (8) Lower aquifer contaminated? (yes/no) (no) Depth of vertical contamination: 14'  
 RAP # 15 3/29/89
- (9) Date of last complete round of groundwater sampling: 3/15/88 Date of last soil sampling: 2/21/89
- (10) OAPP approved? (yes)no Date: 2/18/88
- (11) Direction (e.g. NWS) of surficial groundwater flow: SE (Figure 5 on page 1)
- (12) Average depth to groundwater: 4 (ft)
- (13) Observed range of seasonal groundwater fluctuations: 2-4 (ft)
- (14) Estimated rate of groundwater flow: 0.038 (ft/day) DARCY'S LAW
- (15) Hydraulic gradient across site: 0.002 (ft/ft)

(16) Aquifer characteristics:

	Value	Units	Method
Hydraulic conductivity	<u>4</u>	<u>ft/d</u>	<u>CALCULATED</u>
Storage coefficient	<u>.5</u>	<u>0%</u>	<u>ESTIMATED</u>
Aquifer thickness	<u>16</u>	<u>ft</u>	<u>ESTIMATED</u>
Effective soil porosity	<u>.25</u>	<u>0%</u>	<u>ESTIMATED</u>
Transmissivity	<u>0.4</u>	<u>ft<sup>2</sup>/d</u>	<u>CALCULATED</u>
	<u>300</u>	<u>ft<sup>2</sup>/d</u>	<u>Pump test</u>

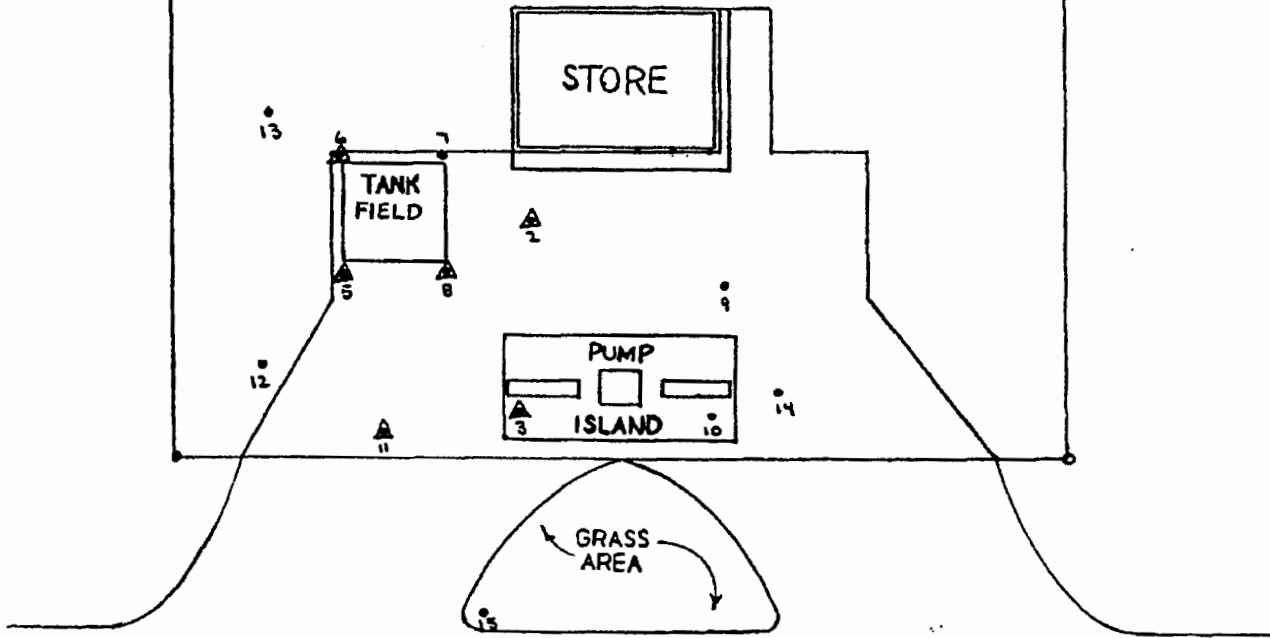
(17) Other remarks:           



# GENERAL SITE PLAN

● - MONITOR WELL

▲ - MONITOR WELL w/ FREE PRODUCT



AMBERLAND FARMS  
US 19 JOB 3078  
HOMOCASSA, FL



**Petroleum Products Services, Inc.**

Petroleum Handling Systems  
1413 50th Street North  
Tampa, Florida 33613  
813-277-7111

DATE: 4-13-88

SCALE: 1" = 40'-0"

DRAWN BY: KEITH TOWNSEL

CHECKED BY:

**GENERAL SITE PLAN**

- - MONITOR WELL
- ▲ - MONITOR WELL w/ FREE PRODUCT

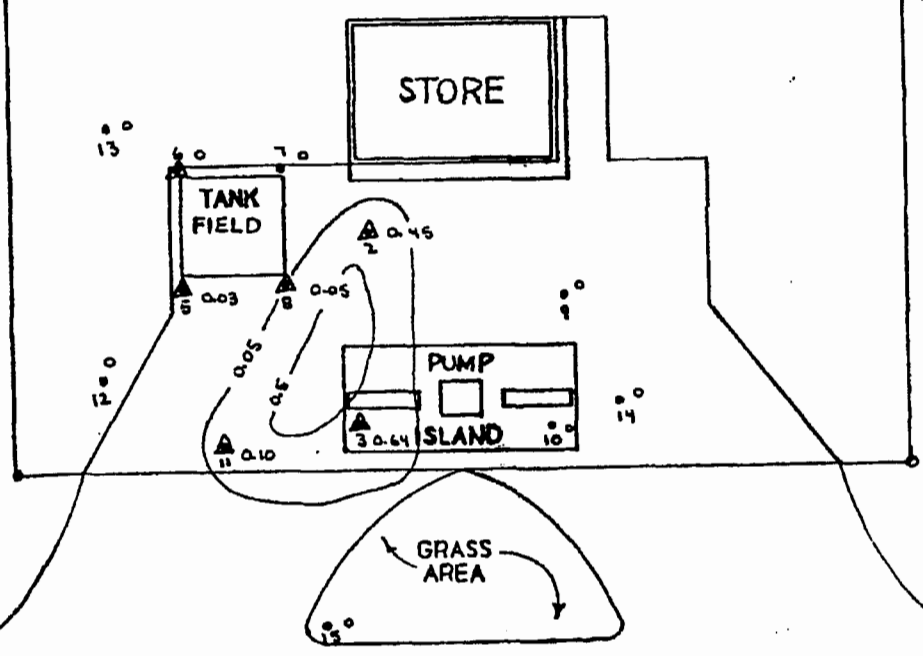
**Product Isopach**  
 \* Smallest accumulation of free product recorded in monitor wells.

0.05'

GI - varies

\* Thicknesses represent expected accumulation in a two inch monitor well.

9/15/87



IMBERLAND FARMS  
 JOB 3078  
 19  
 HOMOSASSA, FL



**Petroleum Products Services, Inc.**  
 Petroleum Handling Systems  
 11413 48th Street North  
 Clearwater, Florida 34626  
 877-7747

DATE: 4-13-88 SCALE: 1" = 40'-0"  
 DRAWN BY: KEITH TOWNSEL  
 CHECKED BY:

# GENERAL SITE PLAN

● - MONITOR WELL

▲ - MONITOR WELL w/ FREE PRODUCT

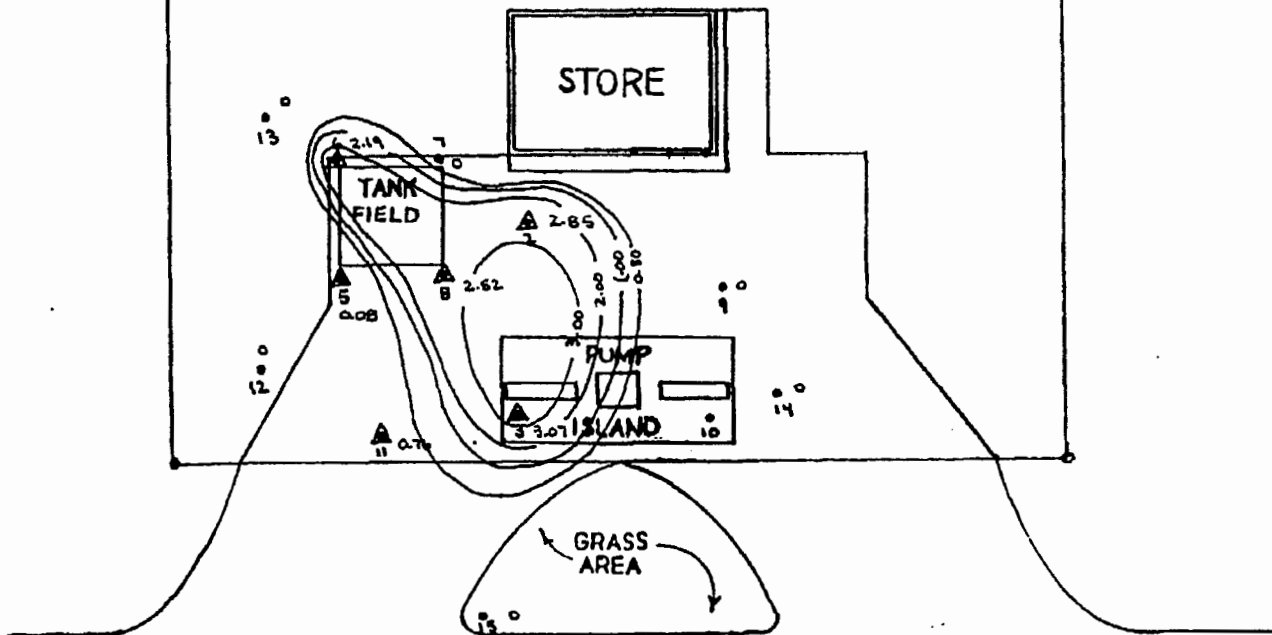
Product ISOPACH

\* Largest accumulation of free product recorded in monitor wells

2.00'

C.I. varies

5/28/87



WBERLAND FARMS  
JOB 3078  
U.S. 19  
HOMOSASSA, FL



**Petroleum Products Services, Inc.**

Petroleum Handling Systems  
11413 4th Street North  
Clearwater, Florida 33808

877-7747

DATE: 4-13-88

SCALE: 1" = 40'-0"

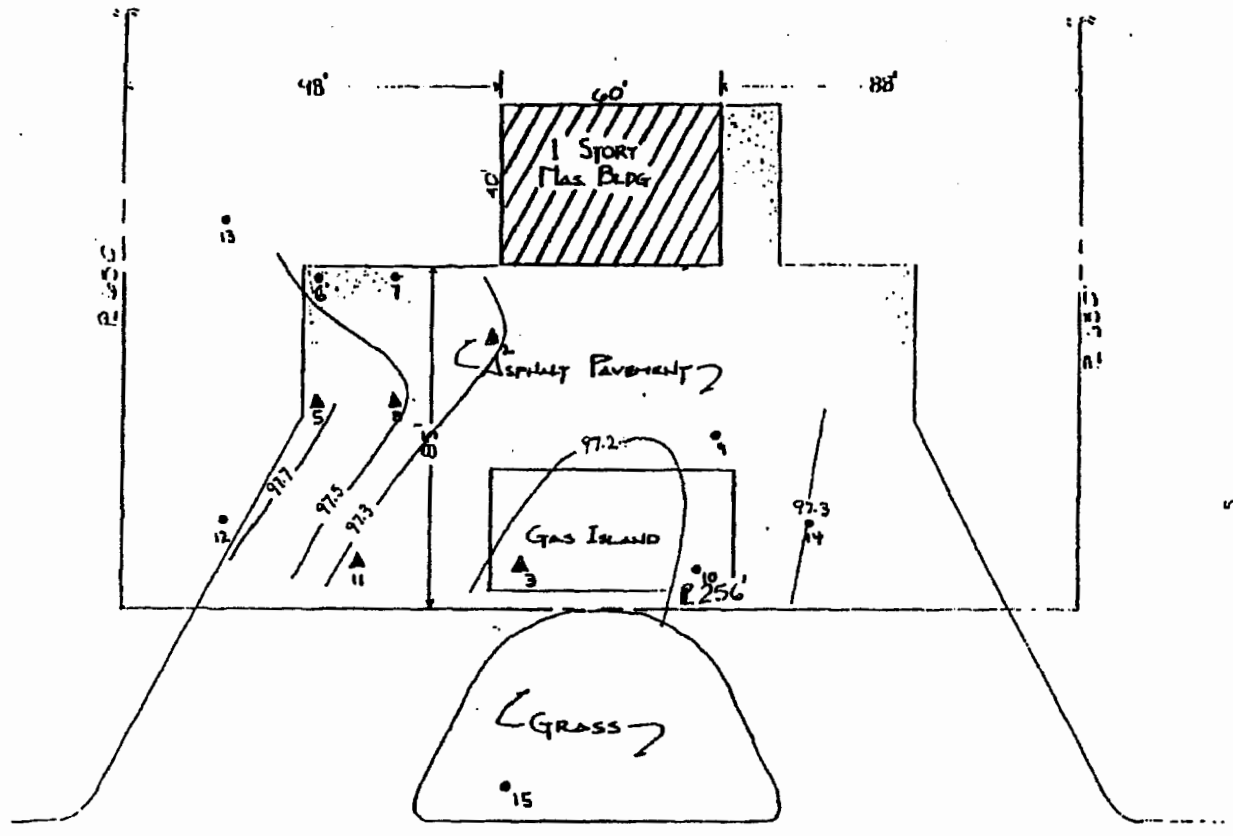
DRAWN BY:

KEITH TOWNSEL

CHECKED BY:

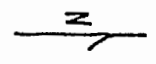
\_\_\_\_\_

GROUNDWATER GRADIENT



Routes 219/98

# SITE PLAN



08  
COMMERCIAL PARTS



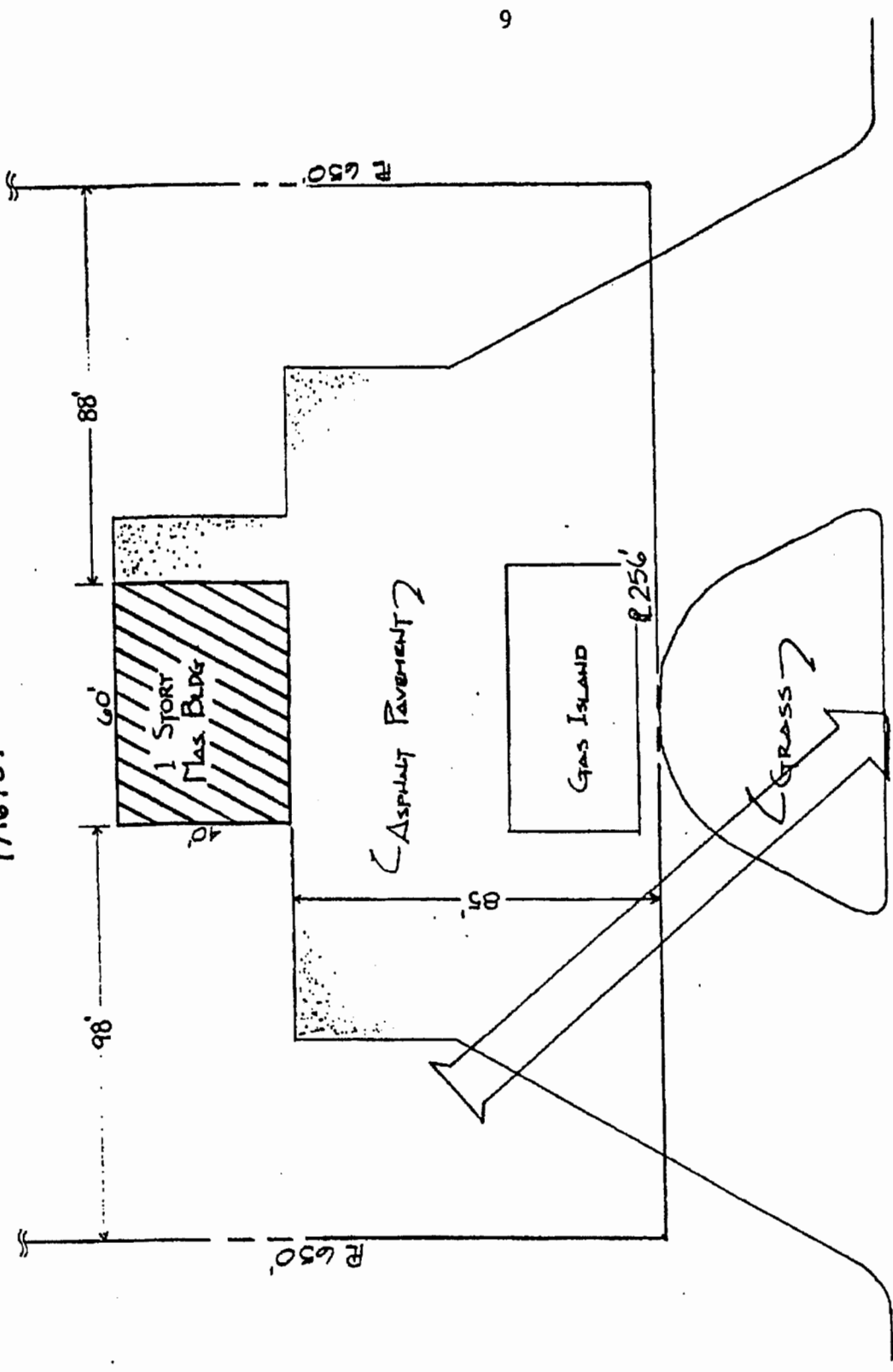
City Services, Inc.

DATE: 12 30 87

SCALE: 1/4" = 1'-0"

DRAWN BY:

Groundwater Direction from Fig 4  
7/16/87



ROUTES 219 & 98

# SITE PLAN

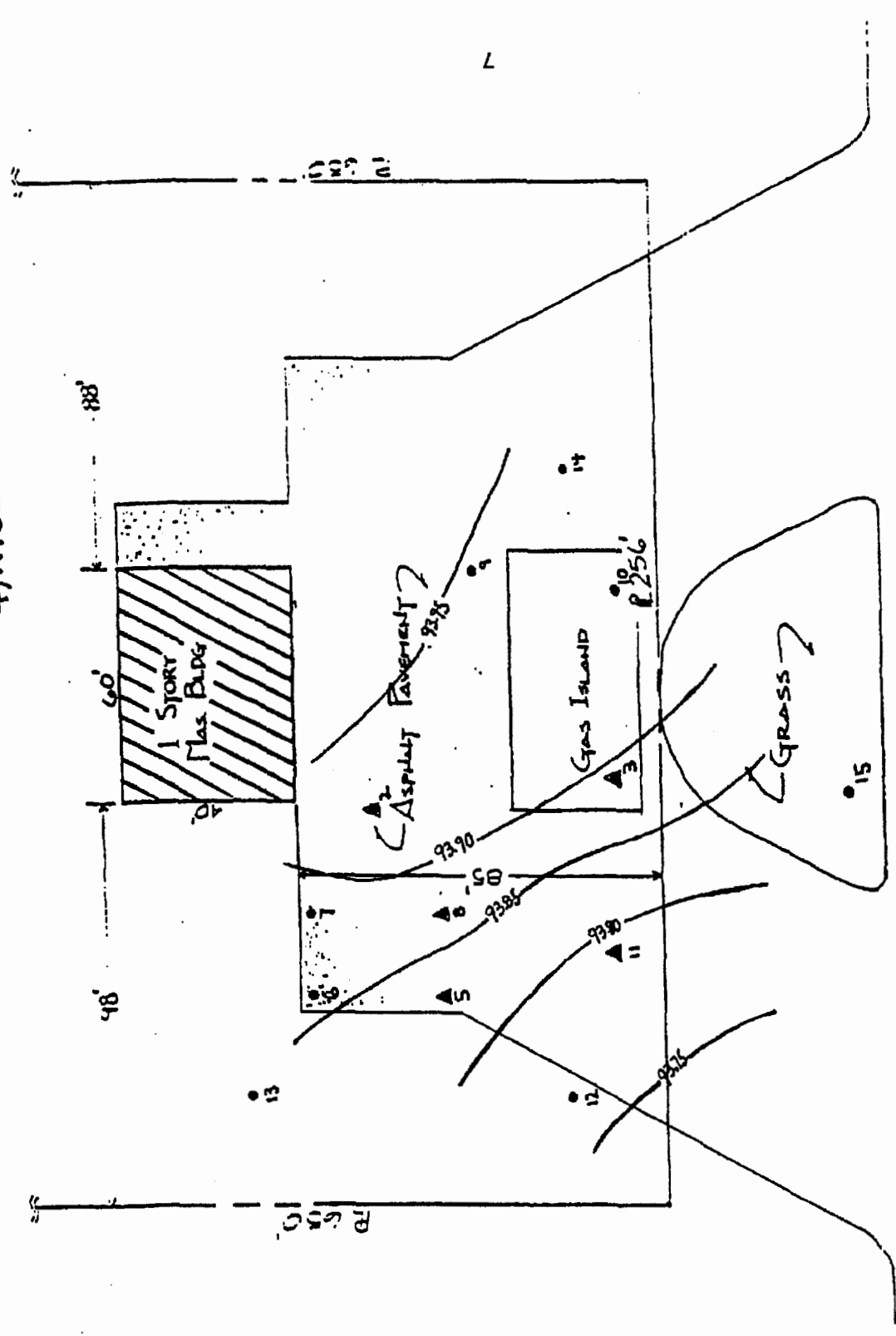
DATE: 12-30-87 SCALE: NONE  
DRAWN BY: SAU  
ECKER

Products Services, Inc.  
Systems



JOB CUMBERLAND FARMS  
HOMECASSA FLORIDA

Fig 5: After Table 2  
4/14/88



Routes 2 19/98

# SITE PLAN

JOB CUMRELAND FARMS  
THIOSASSA, MISSISSIPPI

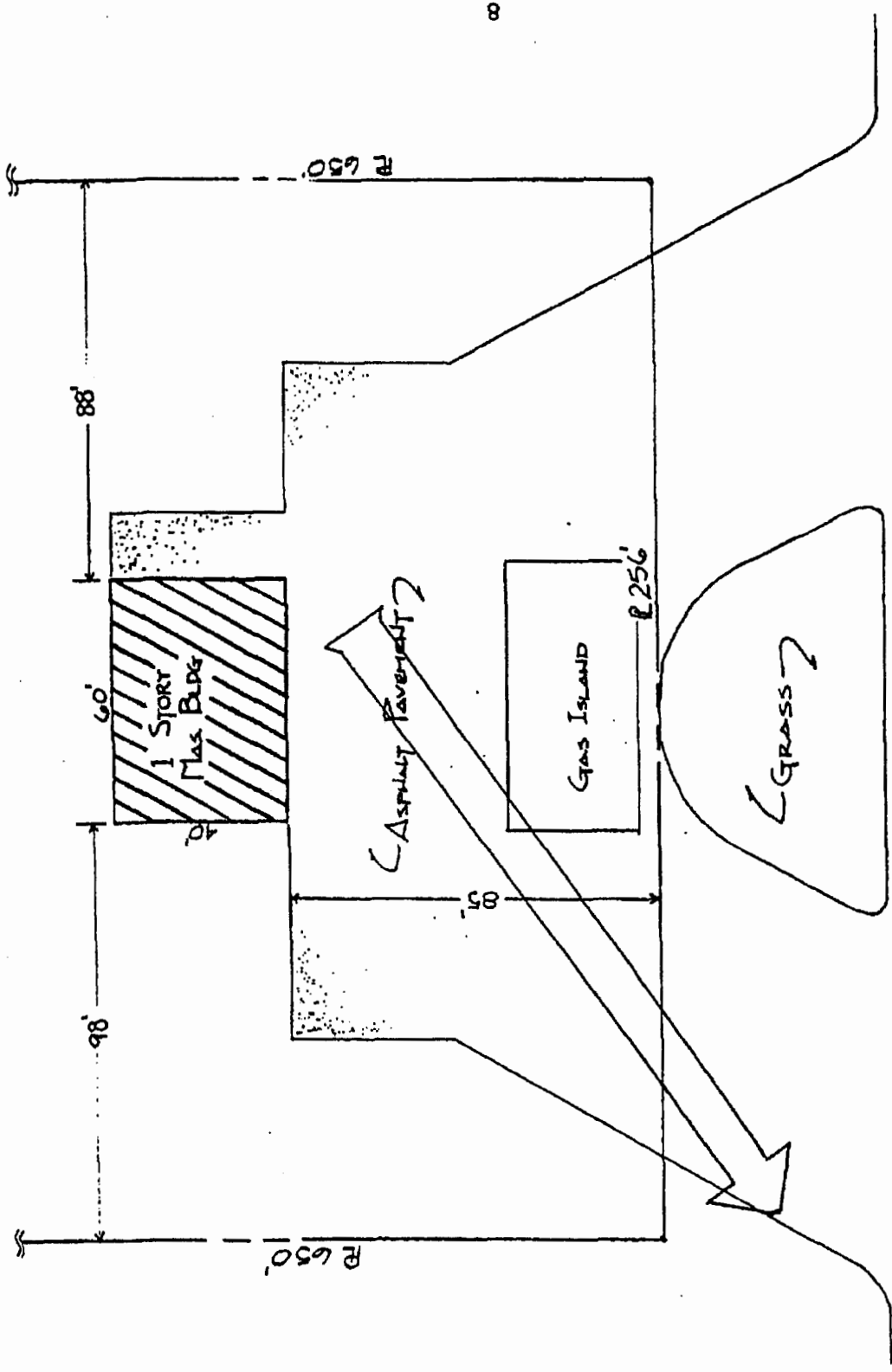


PLANNING CONSULTANTS

DATE: 12-30-87  
SCALE: None  
DRAWN BY: CRE



Grounds of Miami University  
 from D.S. 4/4/88



Routes 219 & 98

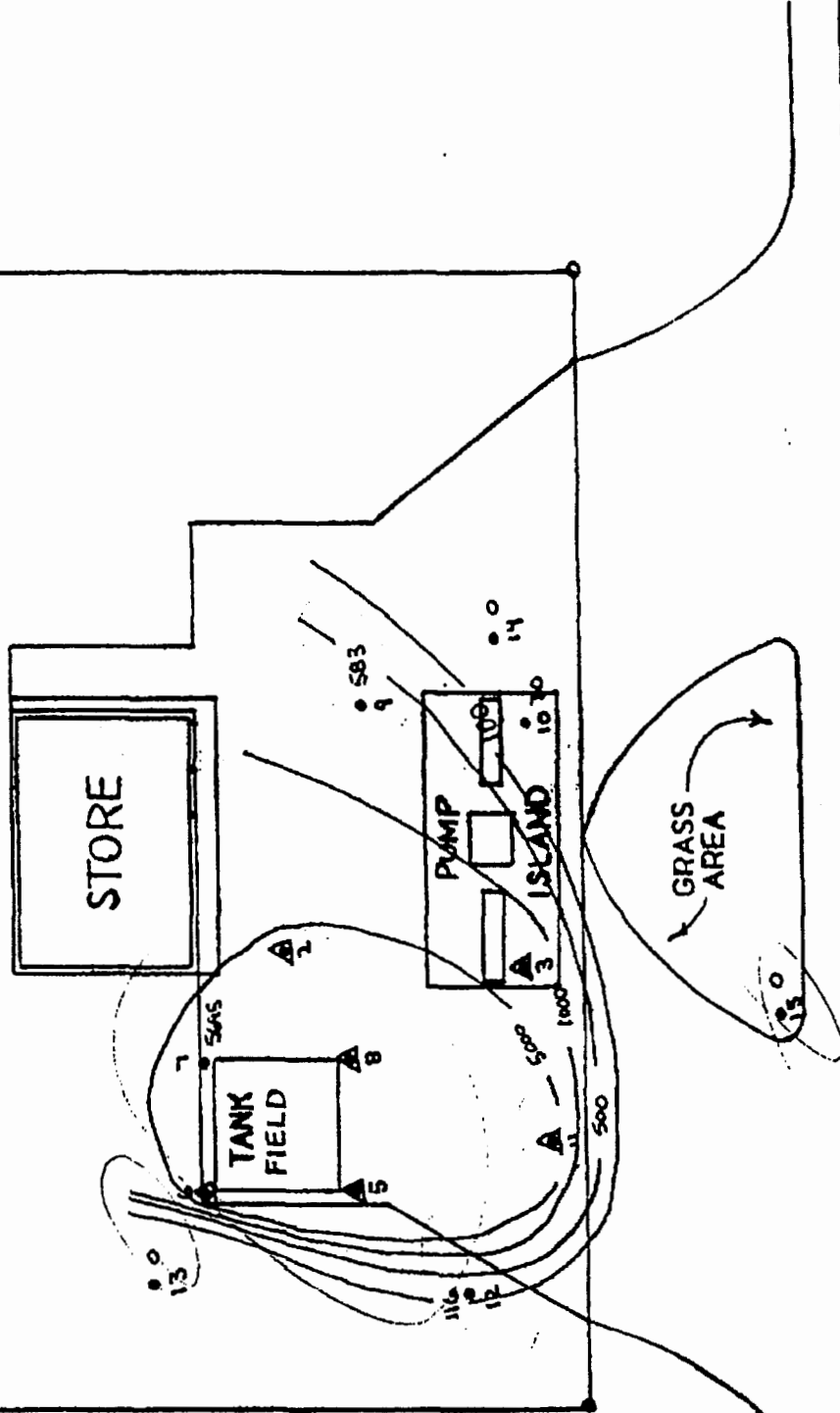
# SITE PLAN

DATE: 12-30-87	SCALE: NONE
DRAWN BY: SAU	
<b>Products Services, Inc.</b> Petroleum System Cleanwater	20 5
<b>CUMBERLAND FARMS</b> FLORIDA	20 5

EXTENT AND CONCENTRATION OF GROUNDWATER CONTAMINATION

GENERAL SITE PL

- - MONITOR WELL
- ▲ - MONITOR WELL w/ FREE PRODUCT



**Key**  
 Total [VOA] in ug/l  
 CI - varies  
 100 ug/l  
 100 ug/l - constant  
 VOA

DATE: 4-13-88 SCALE: 1" = 40'-0"  
 DRAWN BY: KEITH TOWNSEL  
 CHECKED BY:

**Petroleum Products Services, Inc.**  
 Petroleum Handling Systems  
 11413 46th Street North  
 Clearwater, Florida 33598  
 577-7777



CUMBERLAND FARMS  
 US 19  
 JOB 3078  
 HOMOSASSA, FL

GENERAL SITE PL

● - MONITOR WELL

▲ - MONITOR WELL w/ FREE PRODUCT

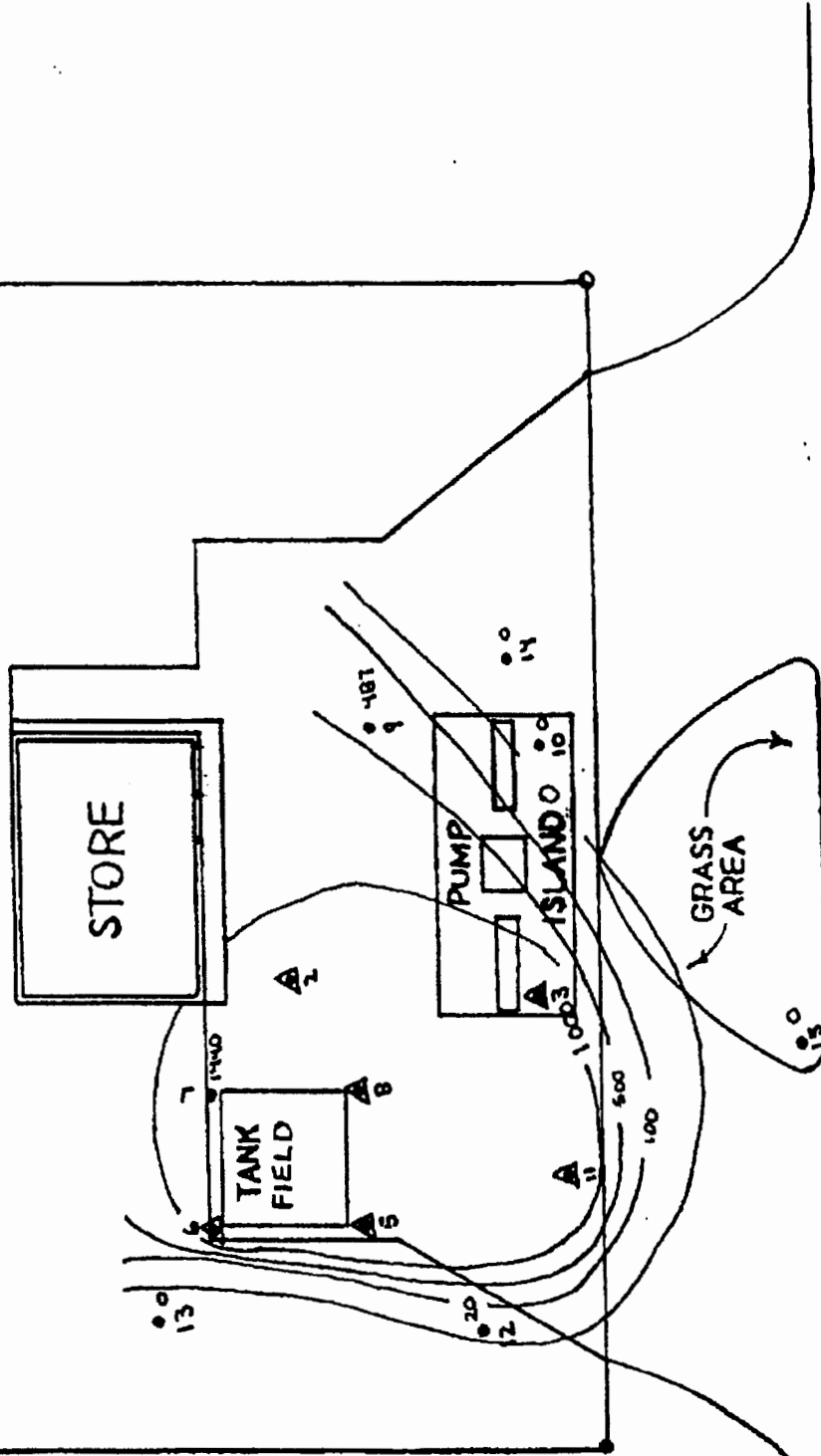
[Benzene]

CI- veins

100

100 yd/A - contour

BENZENE



DATE: 4-13-88 SCALE: 1" = 40'-0"  
 DRAWN BY: KEITH TOWNSEL  
 CHECKED BY:

**Petroleum Products Services, Inc.**  
 Petroleum Handling Systems  
 11413 6th Street North  
 Clearwater, Florida 33528  
 813-771-7147



**CUMBERLAND FARMS**  
 US 19 JOB 3078  
 HOMOSASSA, FL

GENERAL SITE PL

● - MONITOR WELL

▲ - MONITOR WELL w/ FREE PRODUCT

NE

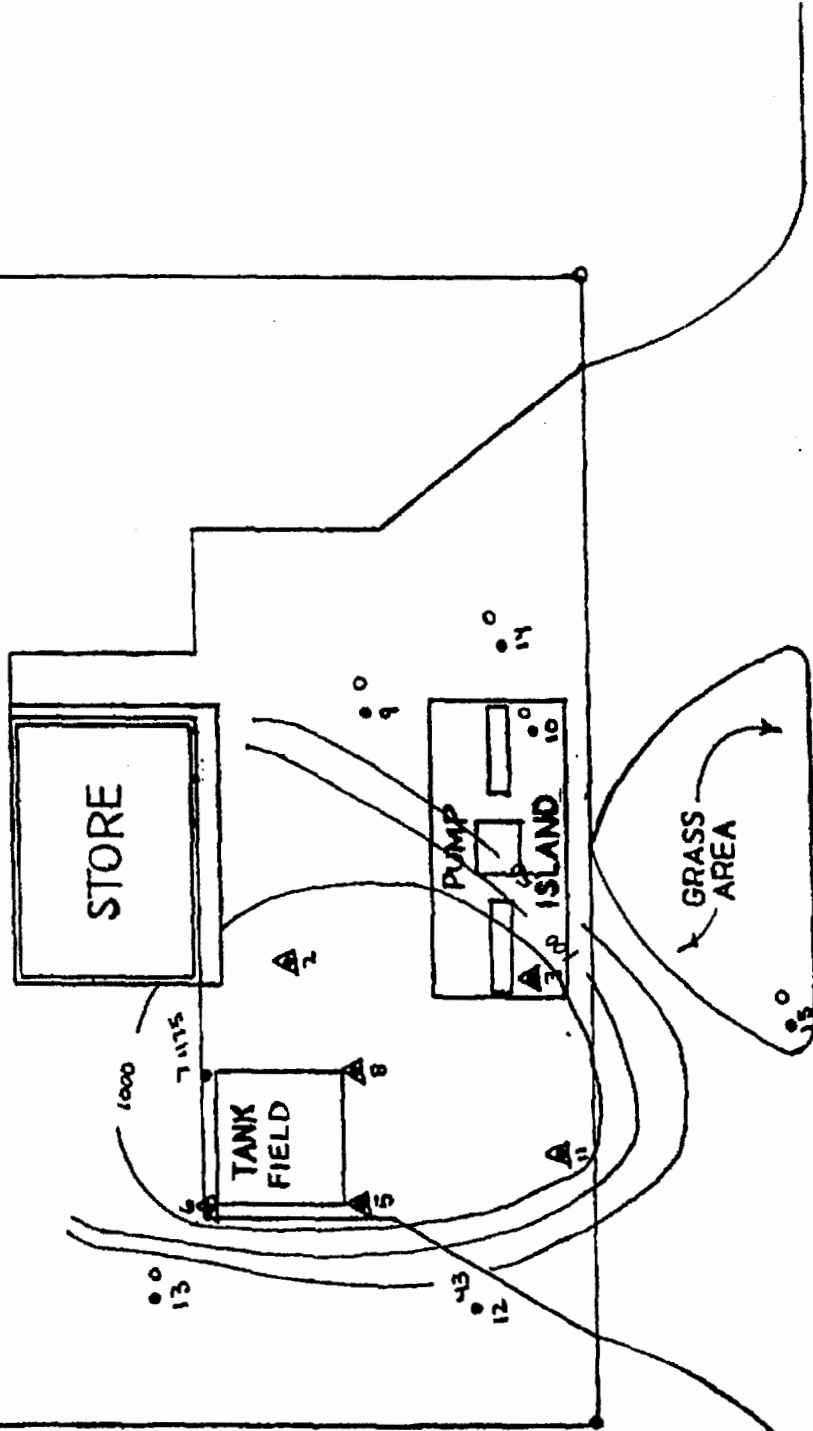
[MTBE] ug/l

CI - varies

50

50 ug/l - contour

MTBE



DATE: 4-13-88 SCALE: 1" = 40'-0"

DRAWN BY: KEITH TOWNSEL

CHECKED BY:

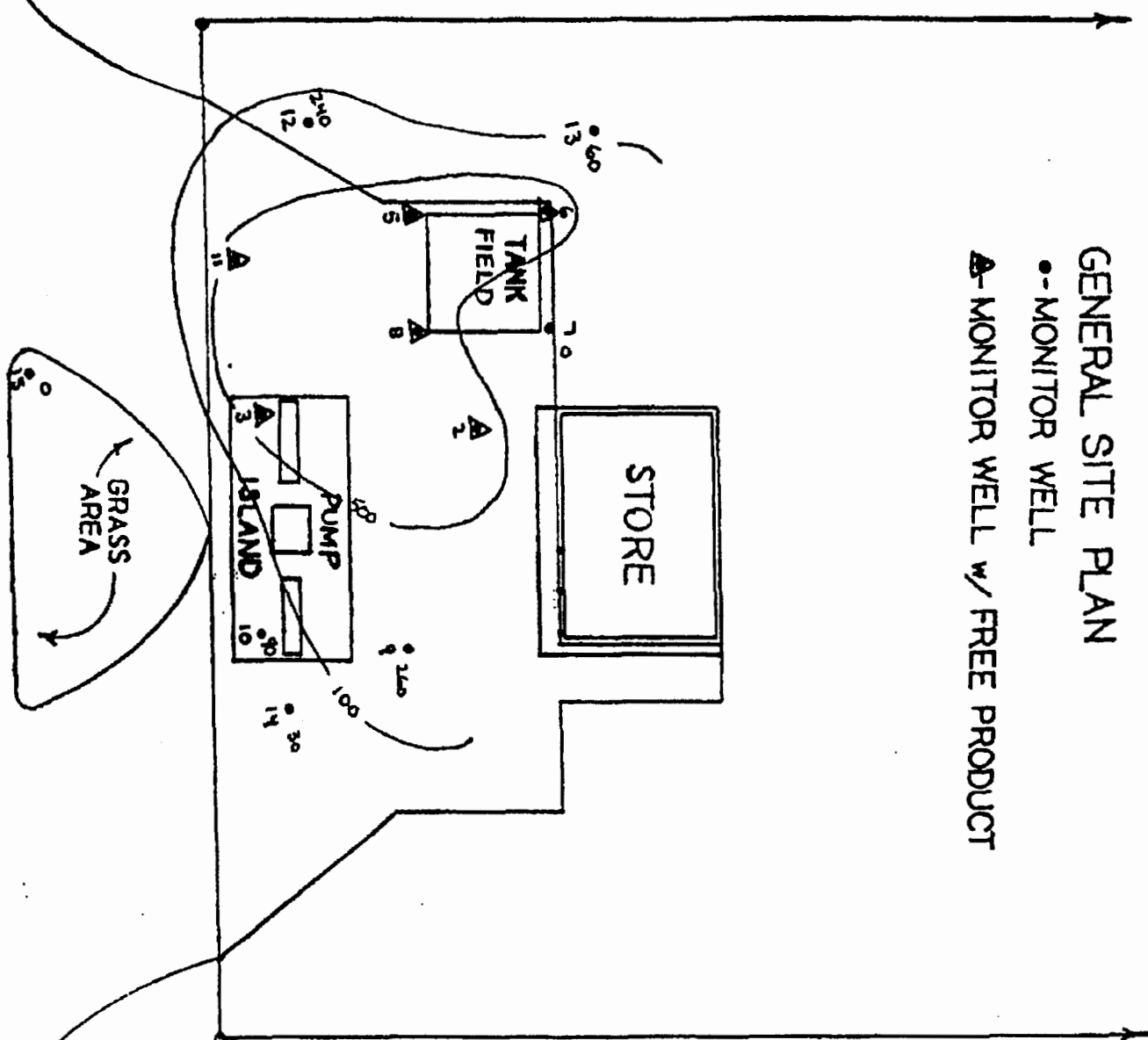


**Petroleum Products Services, Inc.**  
 Petroleum Handling Systems  
 11413 4th Street North  
 Clearwater, Florida 33529  
 57-7187

**CUMBERLAND FARMS**  
 U.S. 19 JOB 3078  
 HOMOSASSA, FL

# GENERAL SITE PLAN

- - MONITOR WELL
- ▲ - MONITOR WELL w/ FREE PRODUCT



**KEY**  
 [Pb] 0g/g  
 CI - varies  
 100 ug/g - contour  
 LEAD

CUMBERLAND FARMS  
 JOB 3078  
 10/10/88



**Petroleum Products Services, Inc.**  
 Petroleum Handling Systems  
 1413 29th Street West  
 Irving, Texas 75039  
 571-3719

DATE: 4-13-88 SCALE: 1" = 40'-0"  
 DRAWN BY: KEITH TOWNSEL  
 CHECKED BY:

POTABLE WELL SURVEY

POTABLE WELLS

$\frac{1}{4}$  MILE RADIUS

CUMBERLAND FARMS, HOMOSASSA

● - denotes potable well

1" = 75'

(KEY ATTACHED)

NORTH

ED1  
SITE

S. SUNCOAST HIGHWAY (US HWY 19)

4

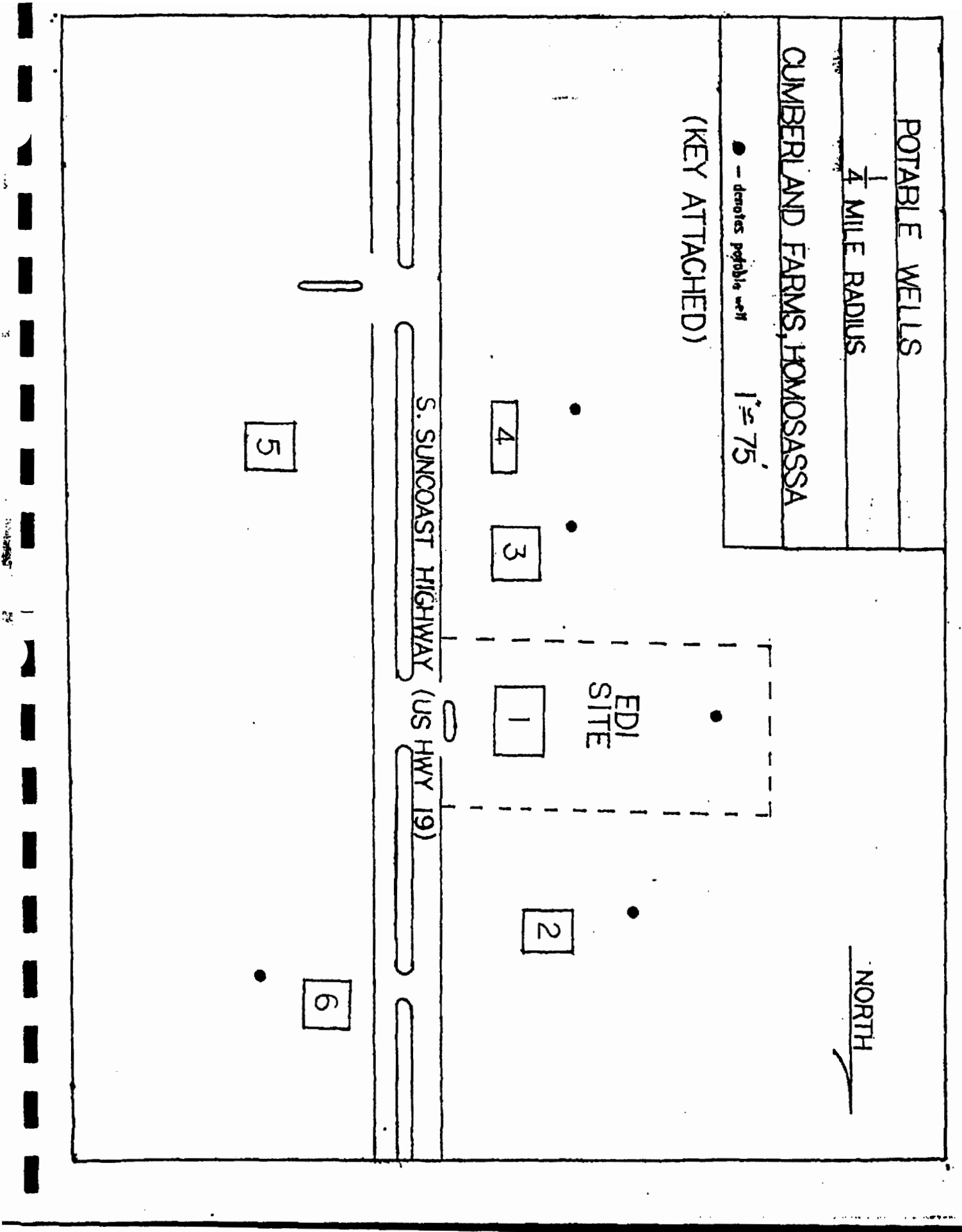
3

1

2

5

6





LIST OF POTABLE WELLS WITHIN SURVEYED AREA

1. Cumberland Farms Convenience Store
2. Forest Ranger Station
3. Private Residence
4. Real Estate Office
5. Sugarmill Woods Sales Office (see enclosure for wells on site)
6. Real Estate Office

2.0 SUPPLEMENTAL CONTAMINATION ASSESSMENT TASKS

2.1 RESPONSE TO COMMENTS #1 AND #2

The extent of free product was determined by gauging and bailing all of the site monitoring wells using hand held interface probes and bailers. Probes and bailers were decontaminated before moving to the next well. The gauging data is tabulated on the Water Table Elevation Calculation Sheet, presented as Attachment 2. The extent of free product, as determined by observed bailer thicknesses, is shown in Figure 1, and summarized in Table 2.1.

---

TABLE 2.1  
Cumberland Farms #1006  
8078 Suncoast Blvd., Homosassa, FL  
FREE PRODUCT THICKNESS SUMMARY

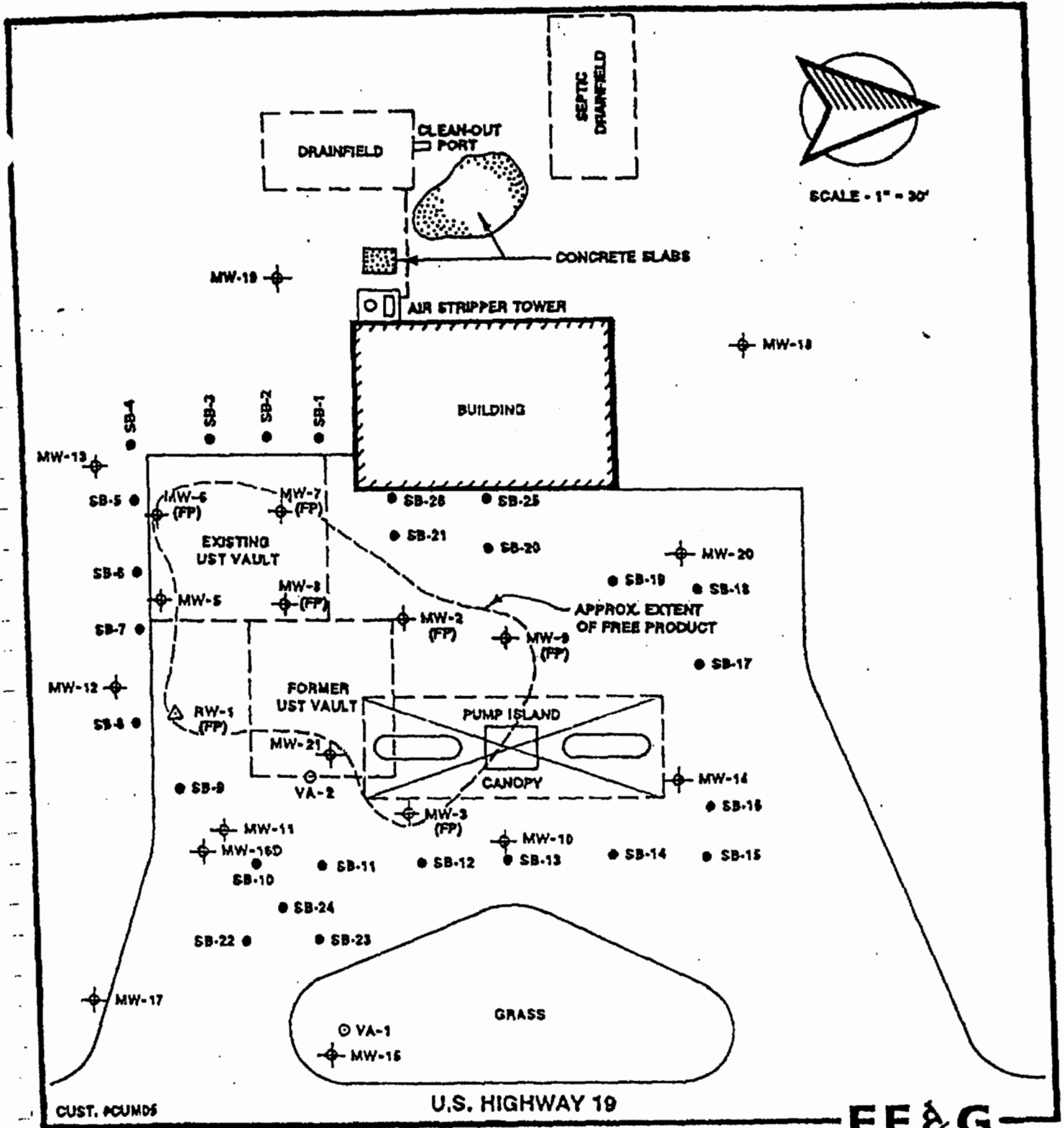
---

<u>Well</u>	<u>Free Product Thickness (inches)</u>
MW-2	sheen only
MW-3	sheen only
MW-6	sheen only
MW-7	sheen only
MW-8	0.25
MW-9	0.50
RW-1	0.50

wells gauged 09/14/94

---

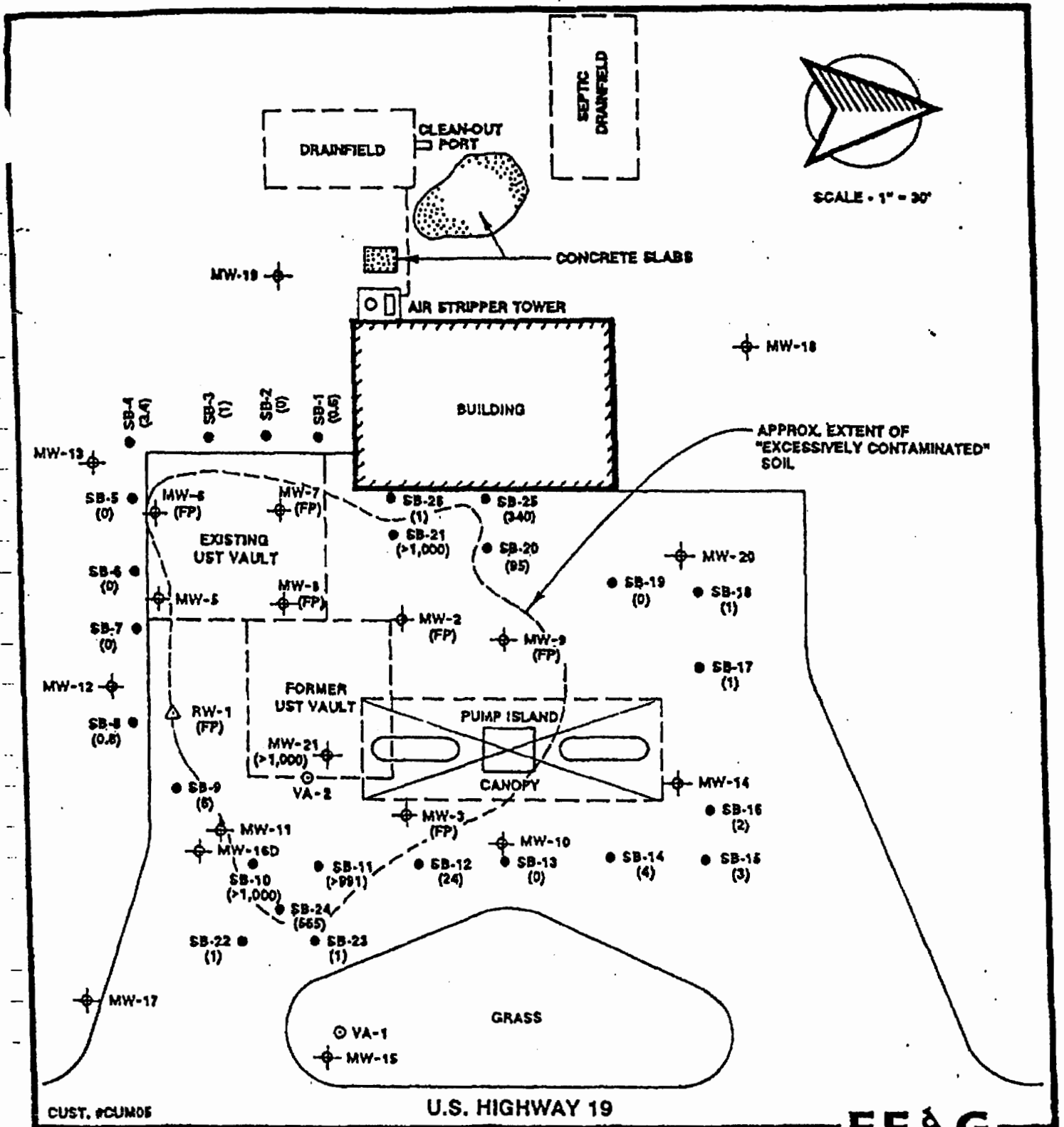
Free product recovery, in accordance with Chapter 62/17-770.300(1), F.A.C., has been resumed at the subject site.



**FIGURE 1: EXTENT OF FREE PRODUCT**  
**CUMBERLAND FARMS #1006**  
**8078 U.S. HIGHWAY 19**  
**HOMOSASSA, FLORIDA**

- LEGEND**
- ⊕ MW-1: MONITORING WELL
  - ⊙ VA-1: VERTICAL ASSESSMENT WELL
  - △ RW-1: RECOVERY WELL
  - SB-1: SOIL BORING LOCATION
  - (FP): FREE PRODUCT IN WELL

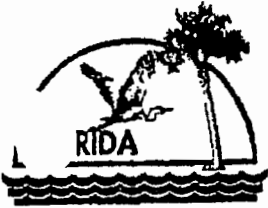
**EE&G**  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663  
 PREPARED BY:kw  
 REVISED: 10-28-94



**FIGURE 2: EXTENT OF "EXCESSIVELY CONTAMINATED" SOIL**  
**CUMBERLAND FARMS #1006**  
**8078 U.S. HIGHWAY 19**  
**HOMOSSA, FLORIDA**

**EE & G**  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663  
 PREPARED BY: kw  
 REVISED: 10-26-94

- LEGEND**
- ⊕ MW-1: MONITORING WELL
  - ⊙ VA-1: VERTICAL ASSESSMENT WELL
  - △ RW-1: RECOVERY WELL
  - SB-1: SOIL BORING LOCATION
  - (24): OVA READINGS (NET) IN PPM
  - (FP): FREE PRODUCT IN WELL



# Department of Environmental Protection

Lawton Chiles  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Virginia B. Wetherell  
Secretary

August 27, 1998

Mr. Timothy Dowell  
Cumberland Farms, Inc.  
777 Denham Street  
Canton, MA 02021-9118

Re: Cumberland Farms # 1006  
FDEP Facility # **098503049**  
Discharge Date: March 16, 1987

Dear Mr. Dowell:

The Site Priority Ranking Rule, Chapter 62-771, Florida Administrative Code, establishes a scoring system the Department uses to assign priority scores to petroleum contaminated sites. The scoring system is based upon the potential threat to public health, safety, and welfare; drinking water supplies; and the environment.

Each site eligible for cleanup funding assistance is scored according to this system. The above site has received a score of **49**. Each eligible site is ranked in relation to all other eligible sites. Ranking and funding are performed by the DEP quarterly in February, May, August, and November of each year. A letter will be sent to the registered site owner indicating the facility's score and rank following the next quarterly ranking. Thereafter, all program sites receive an annual ranking letter in November.

If you have any questions or comments on your site's score or rank, please contact me at the letterhead address, Mail Station 4545 or call 850/487-3299.

Sincerely,

Grace Rivera  
Environmental Specialist III  
Petroleum Cleanup Section

GR/as  
Enclosure: PCT printout

cc: Southwest District DEP Office  
File

*"Protect, Conserve and Manage Florida's Environment and Natural Resources"*

*Printed on recycled paper.*

Facility Discharge Tasks raYr Codes Media pOll History Reports exit  
 ----- Petroleum Contamination Tracking -----

Facility Name and Address: /8503049 CUMBERLAND FARMS #1006 8078 S SUNCOAST BLVD (US HWY 1 HOMOSASSA Florida	Manager: Facility Cleanup Status: ONGO Highest Discharge Score: 60 Discharge Record: 1 of 2	Role:
--	--	-------

Cleanup Info: INACTIVE	Info Source: E-EDI Lead Agency: BWC -BUREAU OF WASTE Clean Required: R-CLEANUP REQUIRE	Discharge Score: 49 Score Effective Date: 27-AUG-1998 Rank: 1856 of 12650 on 04-AUG-1998
---------------------------	--	--

Discharge Info:	Discharge Date: 16-MAR-1987 Combined With:	Inspection Date: 04-JUN-1987 Cleanup Status/Date: RAP /09-JAN-1995
-----------------	---	---

Eligibility and Application Info:	Application Received	Cleanup Program		----- Determination -----		
		Lead	Lead	Status	Letter Sent	Redetermined?
v	16-MAR-1987	E	R	E	18-AUG-1987	N

The line below contains a 'v' to indicate more data. Press the UP or DOWN arrow.  
 Count: 1 v <Replace>

Facility ID#: 098503049  
 Site Name: Cumberland Farms #1006  
 Site Address: 8078 S. Suncoast Boulevard Pt. 19  
 Latitude: 28 46 17 Longitude: 82 33 15 map Expert  
 Topo Quad: \_\_\_\_\_ Lat/Long Ver: \_\_\_\_\_ 8/25/98

Site Priority Ranking

Criteria:	Yes	No	Points
<u>Explosion Hazard:</u>			
Free product or volatilized petroleum products at or above 20% of the Lower Explosive Limit (LEL) in existing utility conduits or vaults, buildings or other inhabited confined spaces (60 points).	_____	<u>X</u>	<u>0</u>
Ignitable free product on surface waters or impoundments (60 points).	_____	<u>X</u>	<u>0</u>
<u>Treat to Uncontaminated Drinking Water Supplies:</u>			
Uncontaminated municipal or community well fields of greater than 100,000 gallons per day permitted capacity with a well within 1/2 mile of the site (30 points).	_____	<u>X</u>	<u>0</u>
SI DWDB HRS	<u>✓</u>	<u>N</u>	
ditionally:			
a. If the well field's 1 foot draw down contour is known to encompass the site regardless of the well field's distance from the site (20 points).	_____	<u>X</u>	<u>0</u>
b. If the well field is located down gradient of the site (15 points).	_____	<u>X</u>	<u>0</u>
Uncontaminated private wells constructed prior to date of contamination discovery, or uncontaminated public water system well field with less than 100,000 gallons per day permitted capacity with a well within 1/4 mile of the site (20 points).	<u>✓</u>	_____	<u>20</u>
SI DWDB HRS	<u>Y</u>	<u>Y</u>	<u>2</u>
ditionally:			
a. If the well field's 1 foot draw down contour is known to encompass the site regardless of the well field's distance from the site (10 points). <i>well on site</i>	<u>✓</u>	_____	<u>10</u>
b. If the well field is located down gradient of the site (5 points).	<u>✓</u>	_____	<u>5</u>
Uncontaminated surface water body used as a public water system supply within 1/2 mile of the site (10 points).	_____	<u>X</u>	<u>0</u>

PWS 6090828 not < 2mi  
 Q = 1,000,000 U < .01  
 T = 250,000 r = .000606  
 S = .0001

Yes                      No                      Points

Migration Potential:

Free Product Characteristics (select only one)

- a. Recent spills or free product found in wells/boreholes (4 points) except free product of 2 inches or more in 2 or more wells/boreholes (6 points).                           6
- b. Recent product loss or wells/groundwater contaminated but no free product (2 points).                           0

Product Type (select only one):

- a. Light petroleum product (kerosene, gasoline, aviation fuel and similar petroleum products) with water soluble additives or enhancers (MTBE, ethanol and similar substances) (3 points).                           0
- b. Light petroleum product with no additives or enhancers (2 points).                           2
- c. Heavy petroleum product (fuel oil, diesel and similar petroleum products) (1 point).                           0

Environmental Setting:

- Site located in G-1 aquifer (4 points).                           0
- Site located in a G-2 aquifer (2 points).                           2
- Site located in high recharge/permeability geological area (4 points).                           4
- Site located within 1/2 mile of an Outstanding Florida Water (1 point).                           0

Total Points:        49

Discharge Date(s):        March 16, 1987

Rescore Request by:       

Score based on conditions as of:        8/25/98

        
Signature

        
Date      8/25/98





# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

FEB 07 2001

**CERTIFIED MAIL  
RETURN RECEIPT REQUESTED**

Mr. Phil Levreault  
Cumberland Farms, Inc.  
777 Debham Street  
Canton, MA 02021

RECEIVED  
FEB 08 2001

BY:.....

Subject: Remedial Action Plan Approval Order  
Cumberland Farms #1006  
8078 South Sun Coast Blvd.  
Homosassa, Citrus County  
FDEP Facility ID# 098503049

Dear Mr. Sheehan:

The Bureau of Petroleum Storage Systems has reviewed the Remedial Action Plan (RAP) dated January 9, 2001 (received January 16, 2001, along with supplemental information dated through January 31, 2001 (received through February 5, 2001), submitted for the petroleum product discharges discovered on March 16, 1987 and May 29, 1996 at this site. We found all the documents submitted to date to be adequate to meet the RAP requirements of Rule 62-770.700, Florida Administrative Code (F.A.C.). The Department of Environmental Protection (Department) has determined that the actions proposed in this RAP, provide reasonable assurance that the concentrations of petroleum products' contaminants of concern at the site will be reduced to the levels specified in Chapter 62-770, F.A.C. Pursuant to Rule 62-770.700(8), F.A.C., the Department approves the RAP as described in this RAP Approval Order (Order). The operation of the active remediation system should be initiated within 120 days, as required by Rule 62-770.700(10), F.A.C.

You are also required to submit to the Department record drawings (as-built drawings) of the treatment system within 120 days of initiating operation of the active remediation system(s). These drawings must be certified by a professional engineer.

Legal Issues

The Department's Order shall become final unless a timely petition for an administrative proceeding (hearing) is filed under Sections 120.569 and 120.57, Florida Statutes (F.S.), within 21 days of receipt of this Order. The procedures for petitioning for a hearing are set forth below.

*"Protect, Conserve and Manage Florida's Environment and Natural Resources"*  
Visit Our Internet Site At: [www.dep.state.fl.us/dwm/bureaus/bpss.htm](http://www.dep.state.fl.us/dwm/bureaus/bpss.htm)  
Printed on recycled paper.

Persons affected by this Order have the following options:

If you choose to accept the above decision by the Department about the Remedial Action Plan you do not have to do anything. This Order is final and effective as of the date on the top of the first page of this Order.

If you disagree with the decision, you may do one of the following:

- (1) File a petition for administrative hearing with the Department's Office of General Counsel within 21 days of receipt of this Order, or
- (2) File a request for an extension of time to file a petition for hearing with the Department's Office of General Counsel within 21 days of receipt of this Order. Such a request should be made if you wish to meet with the Department in an attempt to informally resolve any disputes without first filing a petition for hearing.

Please be advised that mediation of this decision pursuant to Section 120.573, F.S., is not available.

#### How to Request an Extension of Time to File a Petition for Hearing

For good cause shown, pursuant to Rule 62-110.106(4), F.A.C., the Department may grant a request for an extension of time to file a petition for hearing. Such a request must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Phil Levreault, shall mail a copy of the request to Phil Levreault list at the time of filing. Timely filing a request for an extension of time tolls the time period within which a petition for administrative hearing must be made.

#### How to File a Petition for Administrative Hearing

A person whose substantial interests are affected by this Order may petition for an administrative hearing under Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Phil Levreault, shall mail a copy of the petition to Phil Levreault at the time of filing. Failure to file a petition within this time period shall waive the right of anyone who may request an administrative hearing under Sections 120.569 and 120.57, F.S.

Pursuant to Section 120.54(5)(b)4.a., F.S. (1998, Supp.), and Rule 28-106.201, F.A.C., a petition for administrative hearing shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the name, address, and telephone number of the petitioner's representative, if any, the site owner's name and address, if different from the petitioner, the FDEP facility number, and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) An explanation of how each petitioner's substantial interests are or will be affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by the petitioner, or a statement that there are no disputed facts;
- (e) A statement of the ultimate facts alleged, including a statement of the specific facts the petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Department's action or proposed action.

This Order is final and effective as of the date on the top of the first page of this Order. Timely filing a petition for administrative hearing postpones the date this Order takes effect until the Department issues either a final order pursuant to an administrative hearing or an order responding to supplemental information provided pursuant to meetings with the Department.

#### Judicial Review

Any party to this Order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within 30 days after this Order is filed with the clerk of the Department (see below).

The FDEP Facility Number for this site is 098503049. Please use this identification on all future correspondence with the Department.

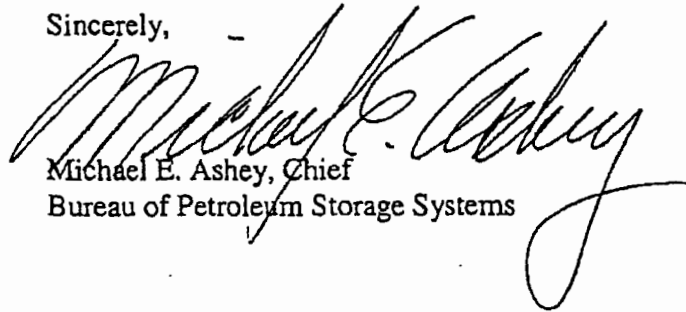
For your information, the Department's approval of the RAP should not be construed that we have agreed to the costs described in the plan for funding under the preapproval program. Our review of the RAP at this time is to evaluate technical feasibility, effectiveness, compliance with required levels of groundwater treatment and air emissions concerns, and general cost-effectiveness of the proposed remediation strategy. If subsequent costs are going to be paid from the Inland Protection Trust Fund, the site manager assigned to this site at the Bureau of

Petroleum Storage Systems will evaluate the approved RAP strategy and negotiate with your designated contractor the allowable cleanup cost to implement the approved RAP.

Questions

Any questions regarding the Department's review of your Remedial Action Plan should be directed to Betsy Skinner at (850) 413-6722. Questions regarding legal issues should be referred to the Department's Office of General Counsel at (850) 488-9314. Contact with any of the above does not constitute a petition for administrative hearing or request for an extension of time to file a petition for administrative hearing.

Sincerely,



Michael E. Ashe, Chief  
Bureau of Petroleum Storage Systems

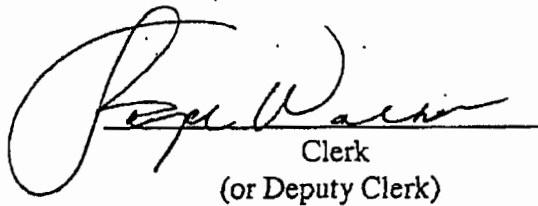
MEA/bs

cc: Mr. Kevin C. Sheehan, P.E., Environmental Compliance Services, Inc.  
1209 Tech Blvd., Suite 202, Tampa, FL 33619

File

**FILING AND ACKNOWLEDGMENT**

FILED, on this date, pursuant to  
§120.52 Florida Statutes, with the  
designated Department Clerk, receipt  
of which is hereby acknowledged.

  
Clerk  
(or Deputy Clerk)

2/7/01  
Date

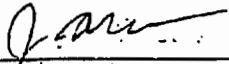
P.E. CERTIFICATION

Remedial Action Plan for Cumberland Farms #1006, located at 8078 South Sun Coast Blvd.,  
Hamosassa, Citrus County, FDEP Facility ID# 0985203049.

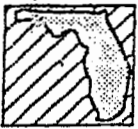
I hereby certify that in my professional judgment, the components of this Remedial Action Plan satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the engineering design features incorporated in this plan provide reasonable assurances of achieving the objectives stated in Chapter 62-770, F.A.C., for active remediation. However, I have not evaluated and do not certify aspects of this plan that are outside my area of expertise (including, but not limited to, electrical, mechanical, and structural features).

X I personally completed this review.

\_\_\_ This review was conducted by \_\_\_\_\_  
working under my direct supervision.

  
\_\_\_\_\_  
James Treadwell, P.E.  
Professional Engineer #47005  
Petroleum Cleanup Section 1

2/6/2001  
Date



**CTEC** Earth Resources and  
& Environmental Services  
ASSOCIATES, INC.

P.O. Box 271  
Pinellas Park, FL 33780  
(813) 573-4471  
FAX (813) 572-7831

Line Upgrade Report for  
Sump and Dispenser Liner Installation  
Cumberland Farms Facility #1006  
8078 South Suncoast Boulevard  
Homossasa, Citrus County, Florida  
FDEP Facility #098503049

September 17, 1997

Prepared by:

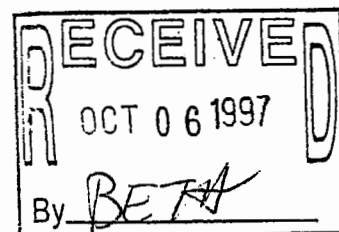
CTEC & Associates, Inc.  
11443 43rd Street North  
Clearwater, Florida 33762

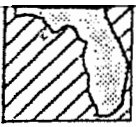
Prepared for:

Cumberland Farms, Inc.  
777 Dedham Street  
Canton, Massachusetts 02021-9118

Submitted to:

Mr. David Chronister  
Citrus County Fire Prevention Bureau  
285 South Kensington  
Lecanto, Florida 34461





September 17, 1997

Mr. David Chronister  
 Citrus County Fire Prevention Bureau  
 285 South Kensington  
 Lecanto, Florida 34461

RE: Cumberland Farms Facility #1006  
 FDEP Facility #098503049

Dear Mr. Chronister:

We have been authorized by Cumberland Farms, Inc., to submit to your office this Line Upgrade Report for dispenser and sump liner installation at the above-referenced facility. A summary of the assessment conducted during these activities, and our recommendations for further assessment, follows.

The sump and dispenser excavation activities were initiated on August 20, 1997, with the removal of concrete and pavement around the sump area of the tankpit. On August 21, 1997, the area was excavated, and soil samples were collected from sumps and connecting lines at depths of two and three feet. On August 26, 1997 the area under the dispensers was excavated and soil samples were also collected at depths of two and three feet. All samples were stored in 16 ounce Mason jars, covered with aluminum foil, sealed with the threaded rim section of the jar lid, labeled with the sample number and depth, and allowed to stabilize for approximately five minutes. After stabilization, each sample was screened for hydrocarbon vapor concentrations with an OVA-FID organic trace gas analyzer. Concentrations exceeding 10,000 ppm were detected under both dispensers (Table 1; Figure 1).

Table 1  
 OVA-FID Analysis of Soil Samples Collected  
 During Liner Installation Procedures

<u>Sample #</u>	<u>Depth</u>	<u>OVA Reading (Un-Filtered)</u>	<u>OVA Reading (Filtered)</u>	<u>OVA Reading (Adjusted)</u>
1	2'	100 ppm	ND	100 ppm
	3'	150 ppm	10 ppm	140 ppm
2	2'	38 ppm	N/A	38 ppm
	3'	4,500 ppm	50 ppm	4,450 ppm
3	2'	300 ppm	30 ppm	270 ppm
	3'	380 ppm	35 ppm	345 ppm
4	2'	50 ppm	N/A	50 ppm
	3'	80 ppm	N/A	80 ppm
5	2'	200 ppm	35 ppm	165 ppm
	3'	250 ppm	25 ppm	225 ppm
6	2'	800 ppm	40 ppm	760 ppm
	3'	95 ppm	N/A	95 ppm

Table 1 (Continued)  
OVA-FID Analysis of Soil Samples Collected  
During Liner Installation Procedures

<u>Sample #</u>	<u>Depth</u>	<u>OVA Reading (Un-Filtered)</u>	<u>OVA Reading (Filtered)</u>	<u>OVA Reading (Adjusted)</u>
7	2'	180 ppm	20 ppm	160 ppm
	3'	150 ppm	20 ppm	130 ppm
8	2'	200 ppm	20 ppm	180 ppm
	3'	200 ppm	30 ppm	170 ppm
9	2' - 3'	>10,000 ppm	100 ppm	>9,900 ppm
10	2' - 3'	>10,000 ppm	80 ppm	>9,920 ppm

---

ND = Not detected  
ND = Not analyzed  
ppm = Parts per million

After the installation of the liners, the sump and dispenser areas were backfilled with the excavated soil. The remaining soil was stockpiled on site, and samples were collected and shipped to Toxikon Laboratories in West Palm Beach for "pre-burn" analysis. Upon receipt of analytical results, the soil stockpile (approximately 1.5 cy) will be transported to a thermal facility.

Tank and line tightness testing was conducted on September 2, 1997, after all lines were reconnected. All components tested tight (Appendix A).

Because excessively contaminated soil was encountered in both excavated areas, it is recommended that closure activities be considered complete, and that the on-going assessment and remediation continue.

Please feel free to direct any questions or requests for clarification to my attention at the letterhead address or telephone number. Thank you for your assistance in this matter, and we look forward to hearing from you soon.

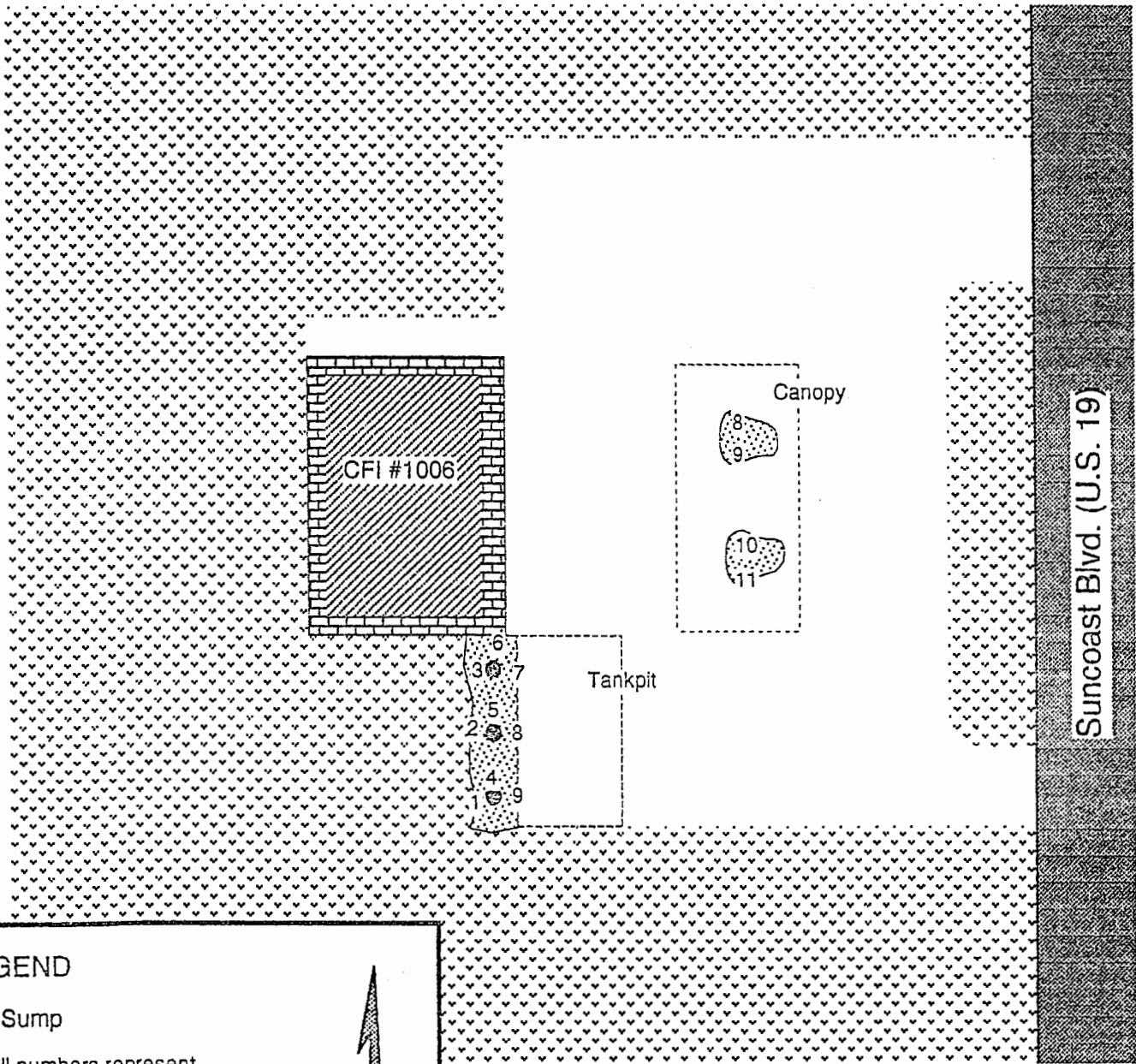
Sincerely,  
CTEC & Associates, Inc.



Moha P. Johnson, P.G.  
Senior Geologist

cc: Mr. Tim Dowell, Project Manager  
Cumberland Farms, Inc.





**CUMBERLAND FARMS, INC.**  
**FACILITY #1006**

**SITE MAP SHOWING SOIL**  
**SAMPLE LOCATIONS**

Location: 8078 S. Suncoast Blvd., Homosassa, Citrus County, Florida

Samples collected 8/21 and 8/26/97

**TEC** Environmental Consultants  
 P.O. Box 271  
 Pinellas Park, Florida 33780-0271

Drafted by:  
 Mona Johnson - 9/18/97

**FIGURE 1**



# Closure Assessment Form

Owners of storage tank systems that are replacing, removing or closing in place storage tanks shall use this form to demonstrate that a storage system closure assesment was performed in accordance with Rule 17-761 or 17-762, Florida Administrative Code. Eligible Early Detection Incentive (EDI) and Reimbursement Program sites do not have to perform a closure assessment.

Please Print or Type  
Complete All Applicable Blanks

1. Date: 9-11-97
2. DER Facility ID Number: 098503049      3. County: Citrus
4. Facility Name: Cumberland Farms Facility # 1006
5. Facility Owner: Cumberland Farms, Inc.
6. Facility Address: 8078 So. Suncoast Blvd., Homosassa
7. Mailing Address: 777 Bidham Street, Canton, Massachusetts 02021-9118
8. Telephone Number: (617) 828-4900      9. Facility Operator: CFE
10. Are the Storage Tank(s): (Circle one or both)    A. Aboveground    or    B Underground
11. Type of Product(s) Stored: Unleaded gasoline
- 1/A 12. Were the Tank(s): (Circle one)    A. Replaced    B. Removed    C. Closed in Place    D. Upgraded (aboveground tanks only)
13. Number of Tanks Closed: '98' upgrade      14. Age of Tanks: \_\_\_\_\_

## Facility Assessment Information

- | Yes                                 | No                       | Not Applicable                      |   |
|-------------------------------------|--------------------------|-------------------------------------|---|
| <input checked="" type="checkbox"/> | <input type="checkbox"/> |                                     | 1. Is the facility participating in the Florida Petroleum Liability Insurance and Restoration Program (FPLIRP)?   |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> |                                     | 2. Was a Discharge Reporting Form submitted to the Department?<br>If yes, When: <u>5/27/96</u> Where: <u>Citrus County</u>  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> |                                     | 3. Is the depth to ground water less than 20 feet?  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            | 4. Are monitoring wells present around the storage system?<br>If yes, specify type: <input checked="" type="checkbox"/> Water monitoring <input type="checkbox"/> Vapor monitoring  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            | 5. Is there free product present in the monitoring wells or within the excavation?  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            | 6. Were the petroleum hydrocarbon vapor levels in the soils greater than 500 parts per million for gasoline?<br>Specify sample type: <input type="checkbox"/> Vapor Monitoring wells <input checked="" type="checkbox"/> Soil sample(s) |
| <input type="checkbox"/>            | <input type="checkbox"/> | <input checked="" type="checkbox"/> | 7. Were the petroleum hydrocarbon vapor levels in the soils greater than 50 parts per million for diesel/kerosene?<br>Specify sample type: <input type="checkbox"/> Vapor Monitoring wells <input type="checkbox"/> Soil sample(s)      |
| <input type="checkbox"/>            | <input type="checkbox"/> | <input checked="" type="checkbox"/> | 8. Were the analytical laboratory results of the ground water sample(s) greater than the allowable state target levels?<br>(See target levels on reverse side of this form and supply laboratory data sheets)                           |
| <input type="checkbox"/>            | <input type="checkbox"/> | <input checked="" type="checkbox"/> | 9. If a used oil storage system, did a visual inspection detect any discolored soil indicating a release?   |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            | 10. Are any potable wells located within 1/4 of a mile radius of the facility?  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            | 11. Is there a surface water body within 1/4 mile radius of the site? If yes, indicate distance: <u>~ 1/2 mile.</u>   |

tailed drawing or sketch of the facility that includes the storage system location, monitoring wells, buildings, storm drains, sample locations, dispenser locations must accompany this form.

If a facility has a pollutant storage tank system that has both gasoline and kerosene/diesel stored on site, both EPA Method 602 and EPA Method 610 must be performed on the ground water samples obtained.

Amount of soils removed and receipt of proper disposal.

If yes is answered to any one of questions 5-9, a Discharge Reporting Form 17-761.900(1) indicating a suspected release shall be submitted to the Department within one working day.

A copy of this form and any attachments must be submitted to the Department's district office in your area and to the locally administered program office under contract with the Department within 60 days of completion of tank removal or filling a tank with an inert material.

James R. Paul For CFC  
 Signature of Owner

9/11/97  
 Date

Mon. Johnson, CTEC, Agent for CFC  
 Signature of Person Performing Assessment

9-11-97  
 Date

Sr. Geologist, CTEC, Agent for CFC  
 Title of Person Performing Assessment

State Ground Water Target Levels That Affect A  
 Pollutant Storage Tank System Closure Assessment

State ground water target levels are as follows:

For gasoline (EPA Method 602):

- a. Benzene 1 ug/l
- b. Total VOA 50 ug/l
  - Benzene
  - Toluene
  - Total Xylenes
  - Ethylbenzene
- c. Methyl Tertiary Butyl Ether (MTBE) 50 ug/l

2. For kerosene/diesel (EPA Method 610):

- a. Polynuclear Aromatic Hydrocarbons (PAHS)  
 (Best achievable detection limit, 10 ug/l maximum)



# Storage Tank Registration Form

Please Print or Type - Review Instructions Before Completing Form

1. DER Facility ID Number: 098503049 2. Facility Type: A  
 3. New Registration  New Owner Data  Facility Revision  Tank Revision   
 4. County and Code of tank(s) location: CITRUS 09

5. Facility Name: CUMBERLAND FARMS #1006  
 Tank(s) Address: 8078 SOUTH SEAWOAST BLVD.  
 City/State/Zip: HOMOSSASH FL. 34446  
 On Site Manager/Contact: STORE MANAGER On Site Telephone: (352) 382-0560  
 6. Financial Responsibility Type: B

7a. Tank(s) Owner: Cumberland Farms, Inc. Account Owner Number: \_\_\_\_\_  
 Owner Mailing Address: 777 Dedham Street  
 City/State/Zip: CANTON, MA. 02021  
 Contact Person: Richard Longton Telephone: 617-828-4900

7b. New Owner Signature/Change Date: \_\_\_\_\_ / \_\_\_\_ / \_\_\_\_  
 Location (optional) Latitude: \_\_\_\_° \_\_\_\_' \_\_\_\_" Longitude: \_\_\_\_° \_\_\_\_' \_\_\_\_" Section \_\_\_\_ Township \_\_\_\_ Range \_\_\_\_

Complete One Line For Each Tank At This Facility (Use Codes - See Instructions)

Complete 9 - 16 for tanks in use; 9 - 19 for tanks out of use

9	10	11	12	13	14	15	16	17	18	19
1	8000	B	4-87	U	FAM	CJK	H,Z	U		
2	8000	B	4-87	U	FAM	CJK	H,Z	U		
3	8000	B	4-87	U	FAM	CJK	H,Z	U		

20. Reiser, Richard R. <sup>2-SIR</sup> DPR# PCO-054948  
 Certified Contractor\* Department of Professional Regulation License Number\*

\*For new tank installation or tank removal

To the best of my knowledge and belief all information submitted on this form is true, accurate and complete.

L. Theroux Agent  
 name & title of owner or authorized person  
Construction Supervisor  
 Northwest District  
 160 Governmental Center  
 Pensacola, Florida 32501-5794  
 904-463-2300

R. J. Theroux  
 Signature

9-2-98  
 Date

- Retail station
- Residence
- Fuel user/non-retail
- Inland bulk petroleum storage
- Industrial plant
- Federal government
- State government
- Local government
- County government
- Collection station
- Inland bulk chemical storage
- Chemical user
- Agricultural
- Indian land
- Coastal bulk petroleum or chemical storage
- Marine fueling facility
- Other, please specify

**9 - FINANCIAL RESPONSIBILITY**

A. State Program - Third party liability/State contractor (FPLIPA/AIG).

B. State Program - Third party liability/Self insurance with other carrier; other federal financial responsibility mechanism.

C. Other coverage meeting federal financial responsibility requirements.

D. None

**#9 - TANK ID NUMBER**  
(number sequentially, 1,2,3; or provide specific identifying name or number, 6 characters, maximum)

**#10 - TANK SIZE IN GALLONS**

**11 - CONTENT**

- Leaded gasoline
- Unleaded gasoline
- Gasohol
- Vehicular diesel
- Aviation gasoline
- Jet fuel
- Fuel - emergency generator
- Fuel - generator or pump
- Kerosene
- Waste oil
- Fuel oil; on-site heat use only; all USTs or ASTs <30K gals
- Fuel oil; distribution, or on-site heat use ASTs > 30K gals
- Nav & lubc oil
- Pesticide
- Ammonia compound
- Chlorine compound
- Hazardous substance (CERCLA)
- Mineral acid
- Grades 5 & 6, bunker "C" residual oils
- Petroleum-base additive
- Other, miscellaneous petroleum-base product

**12 - INSTALLATION DATE (mmVyy)**

**#13 - TANK PLACEMENT**

A = Aboveground tank  
U = Underground tank

C = Aboveground Compression Vessel  
D = Underground Compression Vessel

**14 - TANK CONSTRUCTION - choose one primary construction and all other codes that apply; primary is inner tank construction for double wall tanks**

Primary Construction:

- C. Steel
- D. Unknown
- E. Fiberglass
- F. Fiberglass-coat steel
- X. Concrete
- Y. Polyethylene
- Z. Other DER approved tank material

Overfill/Spill:

- A. Ball check valve
- N. Flow shut-off
- O. Tight fit
- M. Spill containment bucket
- P. Level gauges, high-level alarms
- Q. Other DER approved protection method

Corrosion Protection:

- G. Cathodic protection - sacrificial anode
- H. Cathodic protection - impressed current

Secondary Containment:

- I. Double wall construction: single material; outer tank material same as inner tank material
- F. Double wall construction: dual material; outer tank constructed of concrete, approved synthetic material or tank "jacket"
- J. Synthetic liner in tank excavation
- K. Concrete, synthetic material, and/or offsite clays beneath AST and in containment area
- E. Other DER approved secondary containment system

Miscellaneous attributes:

- E. Internal lining
- L. Compartmented
- U. Field erected tank

**15 - PIPING CONSTRUCTION - choose one primary construction and all other codes that apply; primary is inner pipe construction for double wall piping**

Primary Construction:

- B. Steel or galvanized metal
- C. Fiberglass
- N. Approved synthetic material
- Y. Unknown
- Z. Other DER approved piping material

Corrosion Protection:

- D. External protective coating
- E. Cathodically protected with sacrificial anode or impressed current

Secondary Containment:

- F. Double wall construction: single material; outer pipe material same as inner pipe material
- M. Double wall construction: dual material; outer pipe constructed of approved synthetic material or pipe "jacket"
- G. Synthetic liner or box/trench liner in piping excavation or pipe containment area

Miscellaneous attributes:

- A. Aboveground, no contact with soil
- I. Suction piping system
- J. Pressurized piping system
- K. Dispenser liners
- L. Bulk product system
- H. Airport/seaport hydrant system

**16 - LEAK DETECTION METHODS - choose all that apply**

Site/general:

- A. Automatically sampled wells
- C. Groundwater monitoring plan
- N. Groundwater monitoring system
- I. Not required - see rule for exemptions
- Y. Unknown
- B. Manually sampled wells
- D. SPCC Plan
- O. Vapor monitoring system
- X. None
- Z. Other DER approved monitoring method

Tank monitoring:

- E. Interstitial space - tank/liner
- F. Interstitial space - double wall tank
- L. Automatic tank gauging
- M. Manual tank gauging

Piping monitoring:

- G. In-line detector, auto shut off
- H. In-line flow restrictor
- J. Interstitial space - piping/liner
- K. Interstitial space - double wall piping

**17 - TANK STATUS &/or TANK DISPOSAL**

Primary closed in place - UST filled with sand, concrete or other inert material; AST rendered unusable and removed from the site

Construction modified to non-regulated status (Skid tank or tank enclosed in building)

Unmaintained tank - not in use or to be used, and not properly disposed

Temporarily out-of-service

In-service

**#18 - GALLONS LEFT**  
in out-of-service tank

**#19 - LAST USED DATE (mmVyy)**  
or date of permanent closure



# Underground Storage Tank Installation and Removal Form For Certified Contractors

Underground Storage Systems Contractor as defined in Section 489.105, Florida Statutes (certified contractors as defined in Section 62-761.200, Florida Administrative Code) shall use this form to certify that the installation, replacement or removal of the storage tank system(s) located at the address listed below was performed in accordance with Department Reference Standards.

## General Facility Information

- DEP Facility Identification No.: 098503049
- Facility Name: Camdenland Farms Telephone: (352) 382-0560
- Street Address (physical location): 8078 SOUTH SUN COAST BLVD.  
HOMOSSENTON, FL. 34446
- Owner Name: Camdenland Farms, Inc. Telephone: (417) 828-4900
- Owner Address: 777 Dedham Street, Canton MA 02021
- Number of Tanks: a. Installed at this time 0 b. Removed at this time 0
- Tank(s) Manufactured by: 98 Upgrade
- Date Work Initiated: 8-19-97 9. Date Work Completed: 9-2-97

## Underground Pollutant Tank Installation Checklist

Please certify the completion of the following installation requirements by placing an (X) in the appropriate box.

- The tanks and piping are corrosion resistant and approved for use by State and Federal Laws.
- Excavation, backfill and compaction completed in accordance with NFPA (National Fire Protection Association) 30(96), API (American Petroleum Institute) 1615, PEI (Petroleum Equipment Institute) RP100-94 and the manufacturers' specifications.
- Tanks and piping protected and installed in accordance with NFPA 30(96), API 1615, PEI/RP100-94 and the manufacturers' specifications.
- Steel tanks and piping are cathodically protected in accordance with NFPA 30(96), API 1632, UL (Underwriters Laboratory) 1746, STI (Steel Tank Institute) R892-89 and the manufacturers' specifications.
- Tanks and piping tested for tightness after installation in accordance with NFPA 30(96) and PEI RP100-94.
- Monitoring well(s) or other leak detection devices installed and tested in accordance with Section 62-761.640, Florida Administrative Code (F.A.C.)
- Spill and overflow protection devices installed in accordance with Section 62-761.500, F.A.C.
- Secondary containment installed for tanks and piping as applicable in accordance with Section 62-761.500, F.A.C.

Please Note: The numbers following the abbreviations (e.g. API 1615) are publication or specification numbers issued by these institutions.

## Underground Pollutant Tank Removal Checklist

- Leak assessment performed in accordance with Section 62-761.800, F.A.C.
- Underground tank removed and disposed of as specified in API 1604 in accordance with Section 62-761.800, F.A.C. N/A

### Certification

I hereby certify and attest that I am familiar with the facility that is registered with the Florida Department of Environmental Protection; that to the best of my knowledge and belief, the tank installation, replacement or removal at this facility was conducted in accordance with Chapter 489 and Section 376.303, Florida Statutes and Chapter 62-761, Florida Administrative Code (and its adopted reference sources form publications and standards of the National Fire Protection Association (NFPA), the American Petroleum Institute (API), the National Association of Corrosion Engineers (NACE), American Society for Testing and Materials (ASTM); Petroleum Equipment Institute (PEI); Steel Tank Institute (STI); Underwriters Laboratory (UL); and the tank and integral piping manufacturers' specifications; and that the operations on the checklist were performed accordingly.

Reiselt, Richard R.  
(Type or Print)

PC-054948  
PSSSC Number

Certified Pollutant Tank Contractor Name  
Pollutant Storage Systems Contractor License Number (PSSC)

R. D. Merand ASST  
Certified Tank Contractor Signature

9-2-97  
Date

Scott Wild  
(Type or Print)

9-2-97  
Date

Field Supervisor Name

R. D. Merand ASST  
Field Supervisor Signature

9-2-97  
Date

The owner or operator of the facility must register the tanks with the Department upon completion of the installation. The installer must submit this form no more than 30 days after the completion of installation to the Department of Environmental Protection at the address printed at the top of page one.

PETROLEUM CONTAMINATION  
INITIAL REMEDIAL ACTION REPORT FORM

An Initial Remedial Action report, summarizing the initial remedial action (IRA), should be prepared to satisfy the requirements of Chapters 17-770.630(1)14; 17-773.500(1)(a)4; and 17-773.500(2)(a)4, Florida Administrative Code, (FAC). This form may be used for the IRA report. The report should be sent to the appropriate local program and:

Florida Department of Environmental Regulation  
Bureau of Waste Cleanup  
Engineering Support Section  
2600 Blair Stone Road  
Tallahassee, FL 32399-2400

I. FACILITY NAME: Cumberland Farms Facility #1006  
Facility Address: 8078 S. Suncoast Blvd., Homosassa  
DER Facility Number (if applicable): 098503049  
Date IRA Initiated: 8/20/97 Date IRA Completed: 9/2/97

II. FREE PRODUCT RECOVERY N/A

A. Type(s) of Product Discharged: \_\_\_\_\_

B. Quantity

1. Estimated Gallons Lost: \_\_\_\_\_

2. Gallons Recovered: \_\_\_\_\_ through \_\_\_\_\_ (date)

3. Attach Exhibit Indicating Amount of Product Recovered, Dates and Cumulative Totals.

C. Attach a Scaled Site Plan, Indicating the Locations and Product Thickness in Wells, Boreholes, Excavations, or Utility Conduits and Wells Utilized for Recovery of Free Product.

D. Method of Product Recovery: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

E. Type of Discharge During Product Recovery: \_\_\_\_\_  
\_\_\_\_\_



F. Type of Treatment, i.e., Oil/Water Separator: \_\_\_\_\_

G. Attach Written Proof of Proper Disposal of Recovered Product: \_\_\_\_\_

### III. SOIL EXCAVATION

NOTE: Soil shall be defined as excessively contaminated using the procedure stated in Chapter 17-770.200(2), FAC. Representative soil sampling shall be performed as close to the time of excavation as possible, but at no time shall exceed three (3) months prior to the start of excavation. Stockpiled soils greater than thirty (30) days on site waiting for treatment and disposal, must be re-sampled immediately prior to disposal to assure soils are still excessively contaminated.

If soil sampling data indicates that the amount of soil that is excessively contaminated exceeds 1500 cubic yards, treatment of all excessively contaminated soil at the site shall be addressed in a remedial action plan, and no soil IRA activities shall be performed except for the removal of soils in the immediate vicinity of the tanks.

Only soil above the ambient water table at the time of excavation can be considered as excessively contaminated soil.

Unless the established weight per unit volume of 1.4 tons/cubic yard (as referenced in FAC Rule 17-775) is used for the excavated soil, the weight per unit volume must be determined by a field test (in which an accurately measured volume of soil is weighed) at the time of excavation.

A. Volume of Contaminated Soil Excavated in Cubic Yards:

1 1/2 . Dimensions Including Depth of Excavation(s):  
Tank pit - 35' x 10' x 3'      Dispensers - (2) 10' x 10' x 3'

NOTE: Attach written proof from the Department in the form of an Alternate Procedure Approval Order authorizing excavating over 1500 cubic yards if applicable. Authorization must be prior to the excavation of soils.

B. Type(s) of Product in Soil: Unleaded gasoline

- C. Depth (ft) to Groundwater at the Time of Excavation(s): \_\_\_\_\_
- D. Did Dewatering (i.e. groundwater depression) Occur at Time of Excavation?: No
- E. Type of Instrument and Method Used to Determine Excessive Soil Contamination: OVA-FID (Sensidyne)
- F. Attach a table that compares the OVA-FID readings taken with charcoal filter verses readings without filter. Include vertical depths for each sample.
- G. Using the OVA procedure for defining excessively contaminated soil as referenced in Rule 17-770.200(2), FAC, include a scaled site plan with the information listed below:
1. Location of excavation, old tank farm, dispensers, and product lines, present tank farm, and all soil samples. The corresponding OVA-FID readings for each soil sample (with charcoal filter and without) and its depth must be given.
  2. Sampling Procedure is as follows:  
  
Start sampling in a location where it is suspected that excessively contaminated soil exists. Sample from the first soil boring outward in a grid pattern, at five (5) to ten (10) foot intervals, until the perimeter of the excessively contaminated soil plume is defined. Vertical sampling should be performed starting approximately at the initial area of contamination and continued at three (3) foot intervals, or fraction thereof, until a depth approximately one (1) foot above the water table is reached.
- H. Copies of Laboratory Analyses for Pre Treatment Soil Samples as Required in Chapter 17-775.410(3), Table II, FAC Must be Attached.
- I. Were Tanks Replaced at this Site?: No

IV. SOIL TREATMENT AND DISPOSAL

Method of Treatment of Excessively Contaminated Soil: Transportation to a thermal facility upon receipt of analyses.

B. For Off Site Treatment and Disposal at Permitted STTF, Land Farms, or Landfills Attach Documentation From the Treatment Facility Which Confirms the Weight or Volume of Soil Treated and Date Received.

For Other Treatment and Disposal Methods (i.e. On-Site Land Farming, Bioremediation), Attach Post Treatment Laboratory Analyses for Each 250-300 Cubic Yards of Treated Soil in Accordance With Chapter 17-775.400 and the "Guidelines for Assessment and Remediation of Petroleum Contaminated Soils", Edition February 1991 or Most Current Revision.

For Mobile Thermal Treatment Units, Attach Laboratory Analysis per Chapter 17-775(5), FAC.

C. Method of Disposal of Contaminated Soil and Indicate Recipient and Address: Thermal treatment (upon receipt of analytical results).

V. ADDITIONAL COMMENTS: \_\_\_\_\_

Mona P. Jackson, CTEC, Agent for CFE  
Person Completing Form

Mona P. Jackson 9/18/97 CTEC, Agent for CFE  
Signature, Date Title, Affiliation

Appendix A

Results of Tank and Line Tightness Testing  
Conducted September 2, 1997

# DOWN UNDER TANK TESTING OF FLORIDA, INC.

2052 VISTA DRIVE  
NORTH PALM BEACH, FL 33409  
OFFICE (561) 691-9333  
FAX (561) 627-2623

## FX TESTER - LEAK DETECTOR TEST RESULTS

### INVOICE ADDRESS:

CUMBERLAND FARMS, INC.  
777 DEBHAM STREET  
CANTON, MA.  
02021

### TEST LOCATION:

CUMBERLAND FARMS #1006  
8078 SUN COAST HWY.  
HOMOSASSA, FL

CONTACT: RICHARD ETZOLD  
PHONE: 617-928-4900 X3378

CONTACT:  
PHONE:

CUSTOMER P.O.#: TEST DATE: 09/03/97 START: 07:00 END: 11:30

TYPE	SERIAL NUMBER	PRODUCT	RES. ML.	OPENING TIME	TEST LEAK RATE	HOLDING PSI	METERING PSI	PASS/FAIL
PLD	40287-0720	S/UL	60	3	3	20	NONE	FAIL
	02571-6302	R/UL	60	3	3	12	12	PASS
	ILLEGIBLE	UL+	60	3	3	18	12	PASS

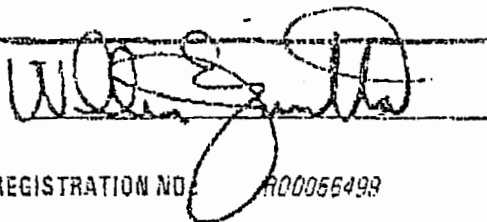
### TEST OF NEWLY INSTALLED (REPLACEMENT FOR FAILED) LEAK DETECTOR

FX1V	810896-1552	S/UL	60	3	3	14	8	PASS
------	-------------	------	----	---	---	----	---	------

ADDITIONAL INFORMATION: TEST OF 4 LEAK DETECTOR(S) USING THE RED JACKET FX TESTER

THE S/UL LEAK DETECTOR HAD FAILED AND WAS REPLACED WITH A NEW ONE. ALL THE LEAK DETECTORS ARE NOW FUNCTIONING PROPERLY.

CERTIFIED TECHNICIAN:



DUTT JOB #: 3-443

CERTIFIED TECHNICIAN LICENSE/REGISTRATION NO: R00066499

2052 VISTA DRIVE  
NORTH PALM BEACH, FL. 33408  
OFFICE (561) 691-9333  
FAX (561) 627-2623

**AES PLT-100R - HYDROSTATIC PRODUCT LINE TEST RESULTS**

**INVOICE ADDRESS:**

CUMBERLAND FARMS, INC.  
777 DEDHAM STREET  
CANTON, MA.  
02021

**TEST LOCATION:**

CUMBERLAND FARMS #1006  
9076 SUN COAST HWY.  
HOMESASSA, FL

**CONTACT:** RICHARD ETZOLD

**PHONE:** 617-623-4300 X3378

**CONTACT:**

**PHONE:**

**CUSTOMER P.O.#:**

**TEST DATE:** 09/03/97

**START:** 07:00

**END:** 11:30

PRODUCT	START VOLUME (ML)	END VOLUME (ML)	VOLUME DIFF. (GPH)	PUMP TYPE	TEST PRESSURE (PSI)	PASS/FAIL
SIBL	210	200	.010	STP	50	PASS
RJUL	200	192	.008	STP	50	PASS
ULF-	194	150	.014	STP	50	PASS

**CONFIRMATION TEST IF FIRST TEST FAILED**

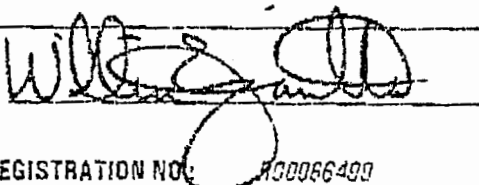
**ADDITIONAL INFORMATION:** TEST OF 3 PRODUCT LINE(S) USING THE AES PLT-100R (HYDROSTATIC PRESSURE TEST).

THE PRODUCT LINES ARE TIGHT. LEAK DETECTOR TEST RESULTS ATTACHED.

**URGENT LOCAL STANDARDS DICTATE THAT FOR UNDERGROUND PIPING, THE MAXIMUM ALLOWABLE LEAK/GAIN RATE OVER THE PERIOD OF ONE HOUR IS .05 GALLONS.**

*These tests are in accordance with EPA regulation 40 CFR, Parts 280 and 281 which requires the use of a test system with the probability of detection of 95% and a probability of false alarm of 5%.*

**CERTIFIED TECHNICIAN:**



**BUILT JOB #:** 3-443

**CE ED TECHNICIAN LICENSE/REGISTRATION NO:** 130086400

2062 VISTA DRIVE  
NORTH PALM BEACH, FL. 33408  
OFFICE (561) 691-9333  
FAX (561) 627-2623

**USTEST 2000/P (UNDERFILL) and 2000/U (ULLAGE) TANK TEST RESULTS**

**VOICE ADDRESS:**

CUMBERLAND FARMS, INC.  
777 DEGHAM STREET  
CANTON, MA.  
02021

**TEST LOCATION:**

CUMBERLAND FARMS #1005  
8078 SUN COAST HWY.  
HOMOSASSA, FL

**CONTACT:** RICHARD ETZOLD

**PHONE:** 617-828-4900 X3378

**CONTACT:**

**PHONE:**

**TOWER P.D.#:**

**TEST DATE:** 09/03/97

**START:** 07:00

**END:** 11:00

TANK #	CAPACITY	PRODUCT	UNDERFILL TEST RESULTS	UNDERFILL TEST LEAK RATE	ULLAGE TEST
1	10000	SJUL	PASS	.01	PASS
2	10000	RJUL	PASS	.02	PASS
3	10000	ULI-	PASS	.02	PASS

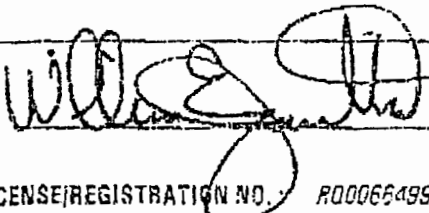
**ADDITIONAL INFORMATION:** TEST OF 3 TANK(S) USING THE USTEST 2000/P (UNDERFILL) AND 2000/U (ULLAGE) ULLAGE TEST SYSTEM, USING POSITIVE PRESSURE.

THE TANKS ARE TIGHT. PRODUCT LINE TEST RESULTS ATTACHED.

**RECENT LOCAL STANDARDS DICTATE THAT FOR UNDERGROUND FUEL TANKS, THE MAXIMUM ALLOWABLE LEAK/GAIN RATE OVER THE PERIOD OF ONE HOUR IS .05 GALLONS.**

*These tests are in accordance with EPA regulation 40 CFR, Parts 280 and 281 which requires the use of a test system with the probability of detection of 95% and a probability of false alarm of 5 %.*

**CERTIFIED TECHNICIAN:**



**DUIT JOB #:** 3-443

**CERTIFIED TECHNICIAN LICENSE/REGISTRATION NO.:** R00066499

# DOWN UNDER TANK TESTING OF FLORIDA, INC.

2062 VISTA DRIVE  
NORTH PALM BEACH, FL. 33408  
OFFICE (561) 691-9333  
FAX (561) 627-2623

## PRECISION TANK TIGHTNESS TEST - SITE INFORMATION

### INVOICE ADDRESS:

CUMBERLAND FARMS, INC.  
777 DEOHAM STREET  
CANTON, MA.  
02021

### TEST LOCATION:

CUMBERLAND FARMS #1066  
8078 SUN COAST HWY.  
HOMOSASSA, FL

CONTACT: RICHARD ETZOLD  
PHONE: 617-828-4900 X3378

CONTACT:  
PHONE:

CUSTOMER P.O.#:

TEST DATE: 09/03/97

START: 07:50

END: 11:30

TANK #	CAPACITY	PRODUCT TYPE	PRODUCT LEVEL	INCHES OF H2O/TANK	TANK TYPE	TANK DIAMETER	DEPTH TO GROUNDWATER
1	10000	S/U/L	76.95	0.00	STEEL	96"	74"
	10000	R/U/L	77.72	0.00	STEEL	96"	74"
-	10000	U/L+	74.67	0.00	STEEL	96"	74"

### REASON FOR TESTING:

POST CONSTRUCTION AFTER INSTALLATION OF CONTAINMENT UPGRADES

### ADDITIONAL INFORMATION:

THE ABOVE INFORMATION WAS COLLECTED AT THE TEST LOCATION DURING THE TIME OF THE TEST, OR PROVIDED BY A SITE REPRESENTATIVE. IF ANY OF THIS INFORMATION IS FOUND TO BE INCORRECT, THE TEST RESULTS MAY BE AFFECTED AND/OR CONSIDERED INVALID. ALL DISCREPANCIES SHOULD BE BROUGHT TO THE ATTENTION OF THE TEST COMPANY FOR FURTHER EVALUATION.

CERTIFIED TECHNICIAN:



DUTT JOB #: 3-443

CERTIFIED TECHNICIAN LICENSE #



## 1.0 INTRODUCTION

EE&G, Inc., was retained by Cumberland Farms, Inc., to perform supplemental Contamination Assessment (CA) tasks in accordance with Chapter 62/17-770, Florida Administrative Code (F.A.C.), at Cumberland Farms Store #1006, 8078 Suncoast Boulevard, Homosassa, Citrus County, Florida. The FDER facility ID number for this site is #098503049.

Technical Review Section

### 1.1 BACKGROUND

Supplemental CA activities were conducted at the above referenced site in response to a CARA review letter issued by the FDEP/Tallahassee Technical Review Section on August 2, 1994 (please see Attachment 1), which requested responses to nine (9) specific comments.

### 1.2 SCOPE OF WORK

Three (3) additional groundwater monitoring wells were installed and sampled. All site monitoring wells were gauged to verify groundwater flow direction and establish the extent of free product. A soil vapor survey was conducted to establish the extent of "excessively contaminated" soil. Construction details of all site monitoring wells were determined. A summary of remedial activities performed at the site is provided.

2.0 SUPPLEMENTAL CONTAMINATION ASSESSMENT TASKS

2.1 RESPONSE TO COMMENTS #1 AND #2

The extent of free product was determined by gauging and bailing all of the site monitoring wells using hand held interface probes and bailers. Probes and bailers were decontaminated before moving to the next well. The gauging data is tabulated on the Water Table Elevation Calculation Sheet, presented as Attachment 2. The extent of free product, as determined by observed bailer thicknesses, is shown in Figure 1, and summarized in Table 2.1.

---

TABLE 2.1  
Cumberland Farms #1006  
8078 Suncoast Blvd., Homosassa, FL  
FREE PRODUCT THICKNESS SUMMARY

---

<u>Well</u>	<u>Free Product Thickness (inches)</u>
MW-2	sheen only
MW-3	sheen only
MW-6	sheen only
MW-7	sheen only
MW-8	0.25
MW-9	0.50
RW-1	0.50

wells gauged 09/14/94

---

Free product recovery, in accordance with Chapter 62/17-770.300(1), F.A.C., has been resumed at the subject site.

### 2.3.1 SHALLOW MONITORING WELLS

Borings for water table wells MW-20 and 21 were advanced to total depths of twelve (12) feet below grade with eight (8) inch hollow stem augers using a truck mounted drilling rig. The borings were completed as wells using two (2) inch Schedule 40 PVC pipe set to the total depth of each well. Intervals of machine slotted (0.010" slot size) PVC extended from the bottom of the well to a depth of about two (2) feet below grade, followed by two (2) inch PVC solid riser to the surface. The annular volumes were back filled with graded 20/30 sand to approximately one (1) foot above the screened intervals. Six (6) inch layers of bentonite were placed above the sand, and the remaining annular volumes were filled with grout.

### 2.3.2 VERTICAL ASSESSMENT WELL

The boring for vertical assessment well VA-2 was advanced to approximately twenty-two (22) feet below grade using ten (10) inch hollow stem augers. Four (4) inch blank PVC casing was set in place and cemented with grout. A three and five eighths (3-5/8) inch tricone bit was then used to advance a borehole to a total depth of twenty-nine (29) feet below grade. The hole was circulated clean and the drilling assembly pulled out and laid down. Two (2) inch PVC was set to the total depth of the well. A screened interval of machine slotted (0.010" slot size) PVC extended from the bottom of the well to a depth of about twenty-four (24) feet below grade, followed by two (2) inch PVC solid riser to the surface. The annular volume was back filled using a

"tremmie" pipe. Graded 20/30 sand was used to a depth of approximately one (1) foot above the screened interval. A one (1) foot layer of bentonite pellets was placed above the sand, and the remaining annular volume was filled with grout.

### 2.3.3 SOIL DISPOSAL PROFILE ANALYSIS

As indicated in Table 2.2, soil samples collected from the boring for MW-21 were found to be "excessively contaminated" according to Chapter 62/17-770.200(2), F.A.C. For this reason, all of the soil/cuttings resulting from the installation of MW-21 and adjacent vertical extent well VA-2 were containerized in fifty-five (55) gallon drums for subsequent disposal. A composite sample was collected from the drums of cuttings, placed in the appropriate containers (please see Attachment 4), and transported in an iced cooler to the Toxikon, Inc., laboratory in West Palm Beach, Florida, for disposal profile analyses by EPA methods 8010, 8020, 9073, and for total RCRA metals Arsenic, Barium, Cadmium, Chromium, Lead, Mercury, Selenium and Silver. The results of these analyses are summarized in Table 2.3.3. The complete results of the disposal profile analyses are presented in Attachment 5 (Toxikon Work Order 94-09-169).



1209 TECH BOULEVARD, SUITE 202  
TAMPA, FL 33619  
813-612-5900  
FAX: 813-612-5910  
WWW.ECSMARIN.COM

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**Quarterly Remedial Action System Status Report  
Year 2, Quarter 3 (March 2003 to May 2003)  
Cumberland Farms #1006  
8078 South Suncoast Blvd.  
Homosassa, Florida  
FDEP Facility ID #098503049**

**June 30, 2003**

Prepared for:  
**Ms. Betsy Skinner  
Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, Florida 32399**

Prepared by:  
**ECSMarin  
1209 Tech Blvd., Suite 202  
Tampa, FL 33619  
Project # 60166.30**



1209 TECH BOULEVARD, SUITE 202  
TAMPA, FL 33619  
813-612-5900  
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WWW.ECSMARIN.COM

June 30, 2003

ECS Project #60166.30

Ms. Betsy Skinner  
Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, Florida 32399

**Quarterly Remedial Action System Status Report  
Year 2, Quarter 3 (March 2003 to May 2003)  
Cumberland Farms #1006  
8076 South Suncoast Blvd.  
Homosassa, FL  
FDEP Facility ID. #098503049**

Dear Ms. Skinner:

Environmental Compliance Services, Inc., d.b.a. ECSMarin, has prepared the following Quarterly Remedial Action System Status Report to document remedial system performance and site rehabilitation activities performed at the above referenced facility between March 2003 and May 2003, during the third quarter of year two of remedial system operations. The remedial system was activated for full time operation on May 21, 2002.

### ***1.0 Introduction***

The remedial system at the referenced facility consists of an air-sparge (AS) unit and a soil vapor extraction (SVE) unit that operate concurrently to recover petroleum hydrocarbons from the groundwater and soil beneath the facility. The AS unit, which supplies compressed air to sixteen sparge wells (SW-1 through SW-16), volatilizes and promotes aerobic biodegradation of petroleum hydrocarbon impacted groundwater, while the SVE unit, consisting of nine horizontal extraction wells (SVE-1 through SVE-9), recovers volatilized petroleum hydrocarbons from the vadose zone. SVE off-gas vapors are treated by granular activated carbon prior to discharge to the atmosphere. The site map is shown on **Figure 1**. A remedial system equipment summary is presented on **Table 1**.

### ***2.0 Maintenance Summary***

Routine operation and maintenance (O&M) visits were conducted monthly during the reporting period. Additional site visits were conducted as needed. The following

summarizes the routine site visit activities as well as supplemental O&M site visits to address performance issues that arose during the reporting period.

- **March 11, 2003:** The remedial system was not operational upon arrival due to an overload condition on the SVE motor variable frequency drive (VFD). Hour readings from the AS compressor and the SVE blower were recorded. The oxidizer was disconnected and replaced by a 2000-lb carbon vessel. The oxidizer could not be removed from the site due to the size of the truck required for transportation. The system was reactivated.
- **March 13, 2003:** A different transportation company was used to remove and ship the oxidizer from the site.
- **March 24, 2003:** The remedial system was operational upon arrival. Remedial system readings and SVE influent and Effluent vapor samples collected. System was operational upon departure.
- **April 11, 2003:** The system was operational upon arrival. Remedial system readings and air samples collected. System was operational upon departure.
- **May 12, 2003:** The system was down upon arrival to an overload condition on the SVE motor variable frequency (VFD). Remedial system readings and air samples collected. System was operational on departure.
- **May 14, 2003:** System was operational upon arrival. Quarterly groundwater sampling was conducted with samples collected from MW-2, MW-3, MW-5, and MW-8.

### ***3.0 Recovery Performance Data***

System operational data is presented in **Table 2**, and a remedial system performance summary is presented in **Table 3**. For the period of February 27, 2003 to May 12, 2003, the AS and SVE were operational for approximately 86.6 percent and 78.1 percent of the period, respectively. System down time was attributable to power losses. Approximately 80 gallons of water was entrained by the SVE laterals during the reporting period.

Based upon the sum of individual flow rates (**Table 4**), the AS system operated at total flow rates between an estimated 73.8 and 81.1 standard cubic feet per minute (scfm) during the period. AS well pressure and flow data are presented in **Table 4**.

Over the period, the SVE system operated at total extraction flow rates between approximately 169 and 202 scfm (**Table 2**). The SVE blower airflow rates were determined through manual measurements of the discharge flow or from the summed flow measurements of individual wells. SVE manifold and wellhead vacuum data are presented in **Table 5**.

To evaluate mass recovery and emission rates, carbon influent and effluent vapor samples were collected monthly for analysis by EPA Method 18. Based upon the influent total light petroleum hydrocarbon (TPH) concentrations and the calculated vapor recovery rates, an estimated 156.8 pounds of contaminant mass were recovered from February 14 through May 14, 2003 (**Table 6**). Copies of the vapor analytical reports are presented in **Appendix A**.

On March 24, 2003, dissolved oxygen (DO) and vacuum/pressure influence data were collected from some of the monitoring wells located in the vicinity of the AS/SVE network to evaluate remedial system influence (**Table 7**).

#### ***4.0 Water Table Elevation Data***

In conjunction with the quarterly groundwater sampling event on May 14, 2003, site monitoring wells were gauged for depth to water with an electronic, water table interface probe. The depth to water readings and corresponding groundwater elevation data are presented in **Table 8**. As shown on **Figure 2**, groundwater in the upper surficial aquifer beneath the site flows generally to the north-northwest of the facility.

#### ***5.0 Site Rehabilitation Data***

To monitor the site rehabilitation progress, groundwater samples were collected from the designated quarterly sampling monitoring wells MW-2, MW-3, MW-5, MW-8, and MW-21 on May 14, 2003. The samples were analyzed for dissolved petroleum hydrocarbons by EPA Methods 8021 (BTEX/MTBE), 8310 (PAHs), and TPH by FL-PRO. A copy of the laboratory analytical report and monitoring well purge logs from the quarterly sampling event are presented in **Appendix B**.

The groundwater analytical results are summarized in **Table 9**, and a benzene concentration contour map from the quarterly sampling event is shown on **Figure 5**. The analytical results indicate that the benzene, ethylbenzene, and total xylenes concentrations in all of the designated quarterly monitoring wells and the toluene concentration in MW-3 exceed the Natural Attenuation Default Concentrations (NADCs), established under Chapter 62-777 of the Florida Administrative Code (FAC). A comparison between the February 13, 2003 and May 14, 2003 analytical results indicates a decreasing trend in total VOA concentrations in MW-2, MW-5, MW-8 and MW-21 (24, 7.3, 5.3, and 16 percent reductions, respectively), while the total VOA concentration in MW-3 has increased by 17 percent.

#### ***6.0 Summary and Recommendations***

This quarterly report documents AS/SVE remedial system performance and site rehabilitation efforts for the period of March 2003 to May 2003. Over the period, the remedial system achieved an operational status of approximately 78.1 percent for the SVE system and approximately 86.6 percent for the AS system. The system down time was attributed to power loss. The system operated continuously through the end of the reporting period.


During the period, the SVE system recovered approximately 156.8 pounds of petroleum hydrocarbons. The SVE system also recovered approximately 80 gallons of water from the SVE laterals.



The analytical results from the May 14, 2003 sampling event indicated that all five monitoring wells sampled yielded dissolved hydrocarbon concentrations above the NADCs, established under Chapter 62-777 of the FAC. A decreasing trend in total VOA concentrations was observed in MW-2, MW-5, MW-8 and MW-21 since the February 13, 2002 sampling event, but no significant change in the areal extent of hydrocarbon impacts has occurred over this period.

Based upon the findings of this report, ECSMarin believes that the remedial system is effectively rehabilitating the site. ECSMarin recommends continuing remedial system operations to aid site rehabilitation efforts. Please contact me at (813) 612-5900 ext. 207 with any questions or comments regarding this report.

Sincerely,  
**Environmental Compliance Services, Inc.**



James T. Cheze  
Project Manager

cc: D. Polleys – Cumberland Farms, Inc.

**TABLES**

## TABLE 1: REMEDIAL SYSTEM SUMMARY

**Facility Name:** Cumberland Farms #1006  
**Facility Address:** 8078 South Suncoast Blvd., Homosassa, FL  
**FDEP#** 098503049  
**Startup Date:** 5/21/02

<b>Groundwater Recovery</b>	
Recovery Well ID#	NA
Screen Interval	
Drawdown	
Design Flow Rate (GPM)	
Design Influent Concentration	
Effluent Polishing Type	
Gallery Design Size	
Other (e.g. FP Recovery, Pretreat)	165-gallon secondary holding tank for knockout
<b>Permits</b> (e.g. NPDES, consumptive use)	
NA	
<b>Soil Treatment</b>	
VES Well ID#	SVE -1 through SVE-9
Screen Interval	5 ft. of horizontal screen
Design Flow Rate	30 cfm/well maximum (based on 8 wells)
Off Gas Treatment	propane gas powered thermal oxidizer
Other	variable speed blower
<b>Air Sparging</b>	
Sparging Well ID#	SW-1 through SW-16
Screen Interval	8 - 10 ft bls
Design Flow Rate	5 cfm/well @ 7 psi (based on 15 wells)
<b>Equipment &amp; Specifications</b>	
SVE blower	15HP, Baldor Electric, 3-phase, 230-460V, variable speed Roots Universal, 70-250 scfm
Moisture separator	80-gallon, Brunner, with transfer pump
Transfer Pump	1HP, Goulds Pump, 3-phase, 230V, 10gpm @ 50'TDH
AS blower	10HP, Toshiba International, 3-phase, 230/460V, Becker KDT 3.140, 75 scfm @ 7.5 psi
Control Panel (Brand & List components)	NEMA 4, SVE variable speed drive controller, amp & hour meters
Surge Protection (Mfg & Type)	
Other	
Telemetry (Mfg)	
	Phone #:

### SYSTEM REPAIR HISTORY

Date	Part Replaced or Modification
8-15-02 & 8-16-02	Removed 2,000 pound vapor phase carbon vessel and installed a propane powered thermal oxidizer for SVE off-gas treatment
3-11-03 & 3-13-03	Removed thermal oxidizer and reinstalled 2,000 pound vapor phase carbon vessel

**TABLE 2: SYSTEM OPERATIONAL DATA**

Facility Name: Cumberland Farms #1006

8078 South Suncoast Blvd., Homosassa, FL

Facility ID#: 098503049

Site Visit Date	Time	SVE System Readings						AS System Readings						Catbox Readings				
		Hour Meter	Amp Meter	V1-100 Moisture Separator (in H <sub>2</sub> O)	VI-101 Pre-Blower (in H <sub>2</sub> O)	TI-101 Blower Effluent (° F)	PI-101 Blower Effluent (in H <sub>2</sub> O)	Flow Rate (scfm)	Hour Meter	Amp Meter	PI-201 Blower Effluent (psi)	TI-201 Blower Effluent (° F)	Flow Rate (scfm)	Hour Meter	Stack Temp (° F)	LP Tank Level (% full)	Left LP Feed Pressure (in H <sub>2</sub> O)	Right LP Feed Pressure (in H <sub>2</sub> O)
1/24/02	17:20	6.6		14.5	20	90	2	225	4.4		7.4	130	49.8					
5/21/02	11:00	6.6	9.0	16	22	110	4	225	4.4	36.0	6.0	140	46.7					
5/28/02	14:00	24.8							21.4									
6/1/02	13:40	24.8							21.4									
6/4/02	14:00	26.1	14.0	15	21	105	5	225	22.2	24.0	5.5	140	64.5					
6/11/02	11:00	192.9	15.0	16	24	105	4	225	189.2	23.0	4.1	140	61.2					
6/25/02	9:45	212.2		12	18	105	4	225	208.4		7	135	64.4					
9/3/02	11:00	215.7		5					211.0					10,581.4	767	80		
9/4/02	9:00	231.0		19	35	100			211.0					10,598.4	770			
9/11/02	10:20	401.4	15.0	28	30	100			211.0					10,765.4	1100			
9/24/02	11:15	430.5						225	211.0	22.0	8.0	130		10,793.8	900	80	15	6
10/1/02	12:25	433.4							211.0					10,793.8				
10/23/02	12:00	563.5	15.0	24	28	105	30	225	277.9	23.5	6.0	137	66.5	10,922.0	663	78	15	6.5
11/13/02	13:55	701.0							346.8					11,061.5				
11/21/02	15:40	707.5	15.0	14	19	85		175	347.4	24.5	7.4	127	73.8	11,068.2	625	75	15	6
12/13/02	15:10	855.0	15.5	39	50	105	>30	294	445.0	25.0	7.0	120	75.6	763	80	15	6	6
12/17/02	9:00	928.4							519.2					11,288.0				
12/24/02	9:00	1,094.5							550.2					11,319.6				
1/28/03	14:55	1,102.9	14.0	82	85	110		294	558.0	26.0	7.6	115	71.6	11,328.6	816	80	15	6
2/14/03	9:00	1,300.5	6.0	25	32	70		193	755.9	25.5	7.9	110	78.2	11,525.3	710	40	15	6
2/27/03	10:00	1,614.7		36		95	>30		1,069.6	25.0	5.2	125	77.8	11,826.9	845	50	15	6
3/11/03	9:30	1,901.0	2.0						1,138.0	28.0								
3/24/03	14:30	2,221.0	2.0	30	35	105	1	155	1,457.0	24.0	4.9	130	81					
4/11/03	12:30	2,655.0	6.0	30	36	85	bad gauge	200	1,889.0	24.0	6.0	120	75					
5/12/03	15:15	3,002.0	7.0	30	37	115	>30	179	2,234.0	23.5	4.6	140	74					

Note: 1. Blank cells indicate data not recorded or applicable at time of site visit.

**TABLE 3: SYSTEM PERFORMANCE SUMMARY**

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

Site Visit Date	Days Between Site Visits	Days Since Startup	AS			SVE			Thermal Oxidizer (T.O.)			Flowmeter Reading (gallons)	Gallons Recovered Between Visits	System Status		
			Motor Hour Meter Reading (hours)	Total Treatment Days	Total Operation Time (%)	Motor Hour Meter Reading (hours)	Total Treatment Days	Total Operation Time (%)	Motor Hour Meter Reading (hours)	Total Treatment Days	Total Operation Time (%)			AS	SVE	T.O.
1/24/02	-	-	4.4	-	-	6.6	-	-	-	-	-	9,998,415	-	3	3	-
5/21/02	-	-	4.4	0.2	-	6.6	0.3	-	-	-	-	9,998,410	-	2	2	-
5/28/02	7	7	21.4	0.9	12.7%	24.8	1.0	14.8%	-	-	-	-	-	3	3	-
6/1/02	4	11	21.4	0.9	8.1%	24.8	1.0	9.4%	-	-	-	-	-	3	3	-
6/4/02	3	14	22.2	0.9	6.6%	26.1	1.1	7.8%	-	-	-	9,998,410	-	2	2	-
6/11/02	7	21	189.2	7.9	37.5%	182.9	8.0	38.3%	-	-	-	9,998,410	-	1	1	-
6/25/02	14	35	208.4	8.7	24.8%	212.2	8.8	25.3%	-	-	-	9,998,440	30	3	3	-
9/3/02	70	105	211.0	8.8	8.4%	215.7	9.0	8.6%	0.00	0.00	-	9,998,440	-	2	3	2
9/4/02	1	106	211.0	8.8	8.3%	231.0	9.6	9.1%	0.71	0.71	70.8%	-	-	1	3	1
9/11/02	7	113	211.0	8.8	7.8%	401.4	16.7	14.8%	7.67	7.67	95.6%	-	-	2	3	2
9/24/02	13	126	211.0	8.8	7.0%	430.5	17.9	14.2%	8.85	8.85	42.1%	9,998,440	-	3	3	3
10/1/02	7	133	211.0	8.8	6.6%	433.4	18.1	13.6%	8.85	8.85	31.6%	-	-	2	2	2
10/23/02	22	155	277.9	11.6	7.5%	563.5	23.5	15.1%	14.19	14.19	28.4%	-	-	2	2	2
11/13/02	21	176	346.8	14.5	8.2%	701.0	29.2	16.6%	20.00	20.00	28.2%	-	-	3	3	3
11/21/02	8	184	347.4	14.5	7.9%	707.5	29.5	16.0%	20.28	20.28	25.7%	-	-	2	2	2
12/13/02	22	206	445.0	18.5	9.0%	855.0	35.6	17.3%	-	-	-	9,998,490	50	2	2	2
12/17/02	4	210	518.2	21.6	10.3%	928.4	38.7	18.4%	28.44	28.44	28.0%	-	-	2	2	2
12/24/02	7	217	550.2	22.9	10.6%	1,094.5	45.6	21.0%	30.76	30.76	27.5%	-	-	2	2	2
1/28/03	35	252	558.0	23.3	9.2%	1,102.9	46.0	18.2%	31.13	31.13	21.2%	9,998,590	100	2	2	2
2/14/03	17	269	755.9	31.5	11.7%	1,300.5	54.2	20.1%	39.33	39.33	24.0%	-	-	2	2	2

**TABLE 3: SYSTEM PERFORMANCE SUMMARY**

Facility Name: Cumberland Farms #1006 Facility ID#: 098503049  
 8078 South Suncoast Blvd., Homosassa, FL

Site Visit Date	Days Between Site Visits	Days Since Startup	AS			SVE			Thermal Oxidizer (T.O.)			Flowmeter Reading (gallons)	Gallons Recovered Between Visits	System Status		
			Motor Hour Meter Reading (hours)	Total Treatment Days	Total Operation Time (%)	Motor Hour Meter Reading (hours)	Total Treatment Days	Total Operation Time (%)	Motor Hour Meter Reading (hours)	Total Treatment Days	Total Operation Time (%)			AS	SVE	T.O.
2/27/03	13	282	1,069.6	44.6	15.8%	1,614.7	67.3	23.9%	11,826.9	51.90	29.3%	-	-	1	1	
3/11/03	12	294	1,138.0	47.4	16.1%	1,901.0	79.2	26.9%						2	2	3
3/24/03	13	307	1,457.0	60.7	19.8%	2,221.0	92.5	30.1%						1	1	
4/11/03	18	325	1,889.0	78.7	24.2%	2,655.0	110.8	34.0%				9,998,670	80	1	1	
5/12/03	31	356	2,234.0	93.1	26.1%	3,002.0	125.1	35.1%				9,998,670	0	2	2	
			Period Average/Total:			86.6%			78.1%						80	

**Notes**

- 1) The remedial system was activated on 5-21-02. Thermal Oxidizer activated 9-3-02.
- 2) "-" denotes reading not collected.
- 3) Treatment System Status Codes:

Code #	Arrive	Depart
1	on	on
2	off	on
3	off	off
4	on	off

**TABLE 4: AIR SPARGE WELL DATA**

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

WELL NO.	SW-1		SW-2		SW-3		SW-4		SW-5		SW-6	
	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow
DIAMETER	2"		2"		2"		2"		2"		2"	
WELL DEPTH	10'		10'		10'		10'		10'		10'	
SCREEN INTERVAL	8 - 10'		8 - 10'		8 - 10'		8 - 10'		8 - 10'		8 - 10'	
Date	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow
1/24/02	1.0	3.4	<0.5	3.0	1	3.8	<0.5	3.0	<0.5	2.8	2.0	3.7
5/21/02	<0.5	3.4	<0.5	2.8	<0.5	3.0	<0.5	2.8	<0.5	3.0	<0.5	3.4
6/1/02	<0.5	4.3	<0.5	4.3	<0.5	3.8	<0.5	4.0	<0.5	4.1	<0.5	3.9
6/4/02	<0.5	4.1	<0.5	4.1	<0.5	3.8	<0.5	4.1	<0.5	3.8	<0.5	3.9
6/11/02	<0.5	4.2	<0.5	3.9	<0.5	4.2	<0.5	3.9	<0.5	3.8	<0.5	4.3
6/25/02	1.0	3.9	<0.5	4.1	0.5	4.0	<0.5	4.2	<0.5	3.8	2.0	4.0
10/1/02	<0.5	4.0	<0.5	4.3	<0.5	4.3	<0.5	5.2	<0.5	4.0	<0.5	5.2
10/23/02	<0.5	3.8	<0.5	4.4	<0.5	4.8	<0.5	4.8	<0.5	3.8	<0.5	5.8
11/21/02	3.5	4.5	<0.5	4.5	1.0	4.5	<0.5	4.8	<0.5	4.4	<0.5	4.7
12/13/02	3.0	4.8	<0.5	5.0	<0.5	4.7	<0.5	5.0	<0.5	4.4	<0.5	4.8
1/28/03	2.0	4.6	<0.5	5.2	<0.5	4.6	<0.5	4.8	<0.5	4.8	1.0	4.4
2/14/03	2.5	5.6	<0.5	5.2	1.5	5.0	<0.5	5.2	<0.5	5.0	3.0	4.2
2/27/03	<0.5	6.5	<0.5	4.2	<0.5	5.0	<0.5	4.2	<0.5	4.2	<0.5	3.8
3/24/03	<0.5	6.0	<0.5	4.5	<0.5	5.0	<0.5	4.8	<0.5	4.5	<0.5	4.2
4/11/03		6.0		4.2		5.0		4.4		4.2		4.0
5/12/03	<0.5	6.0	<0.5	4.2	<0.5	5.1	<0.5	4.2	<0.5	4.2	<0.5	3.5

**TABLE 4: AIR SPARGE WELL DATA**

**Facility Name:** Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
**Facility ID#:** 098503049

WELL NO. DIAMETER (in.) WELL DEPTH (ft bls) SCREEN INTERVAL (ft)	SW-7			SW-8			SW-9			SW-10			SW-11			SW-12		
	Date	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	Pressure	Flow	
																		2"
1/24/02	<0.5	3.3	2.9	<0.5	2.9	<0.5	3.0	<0.5	3.2	3.0	3.2	<0.5	3.1	<0.5	3.0	<0.5	3.0	
5/21/02	<0.5	3.0	2.9	<0.5	2.9	<0.5	3.2	<0.5	2.5	3.5	2.5	<0.5	3.1	<0.5	3.0	<0.5	3.0	
6/1/02	<0.5	4.0	3.8	<0.5	3.8	<0.5	3.7	<0.5	2.1	<0.5	2.1	<0.5	3.7	<0.5	3.8	<0.5	3.8	
6/4/02	<0.5	4.2	4.0	<0.5	4.0	<0.5	3.7	<0.5	3.9	3.5	3.9	<0.5	3.9	<0.5	4.0	<0.5	4.0	
6/11/02	<0.5	4.2	3.8	<0.5	3.8	<0.5	4.2	<0.5	10.0	<0.5	10.0	<0.5	3.9	<0.5	3.9	<0.5	3.9	
6/25/02	<0.5	3.8	4.0	<0.5	4.0	1.5	3.7	1.5	3.5	5.0	3.5	<0.5	3.8	<0.5	4.1	<0.5	4.1	
10/1/02	<0.5	4.1	4.0	<0.5	4.0	<0.5	3.9	<0.5	4.0	3.0	4.0	<0.5	4.0	<0.5	5.0	<0.5	5.0	
10/23/02	<0.5	3.8	3.8	<0.5	3.8	<0.5	3.5	<0.5	2.8	3.0	2.8	<0.5	3.8	<0.5	3.8	<0.5	3.8	
11/21/02	1.5	4.2	4.8	<0.5	4.8	4.0	4.0	4.0	4.4	2.0	4.4	<0.5	4.9	<0.5	4.8	<0.5	4.8	
12/13/02	<0.5	5.2	5.0	<0.5	5.0	2.5	4.8	2.5	3.8	4.0	3.8	<0.5	4.6	<0.5	4.8	<0.5	4.8	
1/28/03	1.0	4.8	5.0	<0.5	5.0	3.5	5.0	3.5	4.0	4.0	4.0	<0.5	4.6	<0.5	5.4	<0.5	5.4	
2/14/03	1.5	5.4	5.0	<0.5	5.0	4.5	4.6	4.5	4.0	4.5	4.0	<0.5	5.0	1.0	4.8	1.0	4.8	
2/27/03	<0.5	6.2	4.6	<0.5	4.6	<0.5	6.8	<0.5	5.2	<0.5	5.2	<0.5	4.6	<0.5	4.4	<0.5	4.4	
3/24/03	<0.5	6.0	6.1	<0.5	6.1	<0.5	6.8	<0.5	5.8	<0.5	5.8	<0.5	4.8	<0.5	4.5	<0.5	4.5	
4/11/03		4.4	6.6		6.6		5.8		4.6		4.6		4.4		4.6		4.6	
5/12/03	<0.5	6.0	5.0	<0.5	5.0	<0.5	5.5	<0.5	3.5	<0.5	3.5	<0.5	4.5	<0.5	4.5	<0.5	4.5	



**TABLE 4: AIR SPARGE WELL DATA**

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

WELL NO.	SW-13			SW-14			SW-15			SW-16		
	Pressure	Flow	Screen Interval	Pressure	Flow	Screen Interval	Pressure	Flow	Screen Interval	Pressure	Flow	Screen Interval
1/24/02	<0.5	3.1	2" - 10"	<0.5	3.0	2" - 10"	<0.5	3.3	2" - 10"	<0.5	3.0	2" - 10"
5/21/02	<0.5	3.0	2" - 10"	<0.5	2.8	2" - 10"	<0.5	3.0	2" - 10"	<0.5	3.0	2" - 10"
6/1/02	<0.5	3.7	2" - 10"	<0.5	4.0	2" - 10"	<0.5	3.7	2" - 10"	<0.5	3.9	2" - 10"
6/4/02	<0.5	4.1	2" - 10"	<0.5	4.3	2" - 10"	<0.5	4.5	2" - 10"	<0.5	4.1	2" - 10"
6/11/02	<0.5	4.0	2" - 10"	<0.5	4.1	2" - 10"	<0.5	4.2	2" - 10"	<0.5	3.8	2" - 10"
6/25/02	<0.5	4.5	2" - 10"	<0.5	4.6	2" - 10"	<0.5	4.2	2" - 10"	<0.5	4.2	2" - 10"
10/1/02	<0.5	5.0	2" - 10"	<0.5	5.0	2" - 10"	<0.5	4.3	2" - 10"	<0.5	4.1	2" - 10"
10/23/02	<0.5	4.0	2" - 10"	<0.5	5.0	2" - 10"	<0.5	4.6	2" - 10"	<0.5	4.0	2" - 10"
11/21/02	<0.5	4.6	2" - 10"	0.5	4.7	2" - 10"	2.5	5.0	2" - 10"	<0.5	5.0	2" - 10"
12/13/02	<0.5	4.2	2" - 10"	<0.5	5.0	2" - 10"	<0.5	4.8	2" - 10"	<0.5	4.7	2" - 10"
1/28/02	<0.5	4.6	2" - 10"	<0.5	4.8	2" - 10"	<0.5	5.0	2" - 10"	<0.5	5.0	2" - 10"
2/14/03	2.0	4.0	2" - 10"	<0.5	5.2	2" - 10"	1.0	4.8	2" - 10"	<0.5	5.2	2" - 10"
2/27/03	<0.5	4.8	2" - 10"	<0.5	4.6	2" - 10"	<0.5	4.3	2" - 10"	<0.5	4.4	2" - 10"
3/24/03	<0.5	4.8	2" - 10"	<0.5	4.8	2" - 10"	<0.5	4.2	2" - 10"	<0.5	4.3	2" - 10"
4/11/03		4.6	2" - 10"		4.2	2" - 10"		4.2	2" - 10"		4.2	2" - 10"
5/12/03	<0.5	5.0	2" - 10"	<0.5	4.3	2" - 10"	<0.5	4.1	2" - 10"	<0.5	4.2	2" - 10"

Notes:  
 1) Flow in scfm  
 2) Pressure in PSI  
 3) Blank cell denote reading unavailable

**TABLE 5: SVE WELL DATA**

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

WELL NO.	SVE-1		SVE-2		SVE-3		SVE-4		SVE-5		SVE-6	
	Manifold	Well	Manifold	Well	Manifold	Well	Manifold	Well	Manifold	Well	Manifold	Well
DIAMETER	4'		4'		4'		4'		4'		4'	
WELL DEPTH	2'		2'		2'		2'		2'		2'	
SCREEN INTERVAL	5'		5'		5'		5'		5'		5'	
Vacuum (in WC)												
Date	Manifold	Well	Manifold	Well	Manifold	Well	Manifold	Well	Manifold	Well	Manifold	Well
1/24/02	6		5		5		7		6		9	
5/21/02			14		12		12		0		15	
5/28/02												
6/1/02			10-15		10-15		10-15		10-15		15-17	
6/4/02			12		12		12		13		16	
6/11/02												
6/25/02	10		5-10		5-10		10		10		10-15	
9/4/02			16		20		18		18		20	
9/11/02			19		20		20		21		20	
9/24/02												
10/1/02			20		20		19		20		21	
10/23/02			20		20		0		20		24	
11/21/02	10-15		10-15		10-15				10-15		10-15	
12/13/02	28		30		24		29		28		31	
12/17/02												
12/24/02												
1/28/03	10		10		10		10		10		15	
2/14/03	10	3.6	10	6.0	10	0.18	10	3.8	10	3.2	10	6.6
2/27/03	12-18		10-15		30		10-20		10		10	
3/24/03	12		13		6		14		12		8	
4/11/03	12		15		25		10		10		10	
5/12/03	10		12		5		8		9		16	

**TABLE 5: SVE WELL DATA**

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

WELL NO.	SVE-7			SVE-8			SVE-9		
	Manifold	Well	Well	Manifold	Well	Well	Manifold	Well	Well
DIAMETER (in.)	4"			4"			4"		
WELL DEPTH (ft bis)	2'			2'			2'		
SCREEN INTERVAL (ft)	5'			5'			5'		
	Vacuum (in WC)								
Date	Manifold	Well	Manifold	Well	Well	Manifold	Well	Well	Well
1/24/02	7		8						
5/21/02	14		15			12			
5/28/02	10-15		15-17			10-15			
6/1/02	13		14			11			
6/11/02									
6/25/02	10		10			5-10			
9/4/02	17		20			16			
9/11/02	19		19			20			
9/24/02									
10/1/02	20		20			20			
10/23/02	20		20			20			
11/21/02	10-15		10-15			10-15			
12/13/02	30		29			32			
12/17/02									
12/24/02									
1/28/03	8		10			10			
2/14/03	10	4.6	10	6.2			4.0		
2/27/03	12		35			15-20			
3/24/03	14		28			22			
4/11/03	12		20			20			
5/12/03	10		28			30			

- Notes:
- 1) Vacuum readings in Inches of water column
  - 2) Blank cells denote data unavailable.
  - 3) SVE wells are horizontal wells.

**TABLE 6: SVE SYSTEM ANALYTICAL AND MASS RECOVERY SUMMARY**

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

Date	SVE Mass Recovery										
	Concentration (mg/m <sup>3</sup> )					Flow rate (scfm)	Total Mass Contaminant Flow rate (lb/day)	Hour Meter Reading (hours)	Total Operational Time Between Sampling (days)	Total Mass Between Visits (lbs)	Total Mass to Date (lbs)
	Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE						
1/24/02 <sup>(1)</sup>	120	130	33	219	<1.0	2,500	175	39.3	2.1	-	-
1/24/02 <sup>(2)</sup>	150	180	33	201	<1.0	2,800	225	56.5	6.6	-	-
5/21/02	155	270	36	361	<10	3,020	225	61.0	6.6	0	-
5/28/02	NR	NR	NR	NR	NR	NR	NR	-	24.8	-	-
6/4/02	162	308	53	419	87	8,300	225	167.6	26.1	0.81	92.9
6/11/02	156	706	173	704	14	7,310	225	147.6	192.9	6.95	1,095.4
6/25/02	106	331	45	525	19	5,570	225	112.5	212.2	0.80	1,292.8
9/24/02	2	4	<1	8	2	240	225	4.8	430.5	9.10	533.6
10/23/02	25	73	10	170	<1	2,080	225	42.0	563.5	5.54	1,956.2
11/21/02	25	52	6	91	19	1,610	175	25.3	707.5	6.00	2,158.1
12/13/02	NR	NR	NR	NR	NR	NR	NR	-	855.0	-	2,158.1
1/28/03	8	12	1	19	<1	718	294	18.9	1,102.9	16.48	2,522.2
2/14/03	4	7	<1	12	<1	265	193	4.6	1,300.5	8.23	2,618.9
3/24/03	2	9	1	32	1	251	155	3.5	1,614.7	13.09	2,671.8
4/11/03	<1	2	<1	14	<1	85	200	1.5	1,901.0	11.93	2,701.7
5/12/03	8	12	2	55	140	595	179	9.6	2,221.0	13.33	2,775.7

**TABLE 6: SVE SYSTEM ANALYTICAL AND MASS RECOVERY SUMMARY**

Facility ID#: 098503049

Facility Name: Cumberland Farms #1006  
8078 South Suncoast Blvd., Homosassa, FL

Date	SVE Mass Emissions										Total Mass to Date (lbs)
	Concentration (mg/m <sup>3</sup> )			Flow rate (scfm)	Total Mass Contaminant Flow rate (lb/day)	Hour Meter Reading (hours)	Total Operational Time Between Sampling (days)	Total Mass Between Visits (lbs)	Total Mass to Date (lbs)		
	Benzene	Toluene	Ethyl-benzene							Total Xylenes	
5/21/02	<1	<1	<1	<2	<1	225	0.0	6.6	0	-	-
5/28/02	NR	NR	NR	NR	NR	NR	-	24.8	-	-	-
6/4/02	<1	<1	1	<2	<1	225	3.0	26.1	0.81	1.2	1.2
6/11/02	82	342	61	423	12	225	73.9	192.9	6.95	267.1	268.4
6/25/02	160	467	107	703	24	225	218.1	212.2	0.80	117.4	385.8
9/24/02	<1	<1	<1	<2	2	225	2.0	430.5	9.10	1,000.9	1,386.7
10/23/02	<1	<1	<1	<2	<1	225	0.9	563.5	5.54	8.1	1,394.8
11/21/02	<1	<1	<1	<2	<1	175	2.0	707.5	6.00	8.9	1,403.7
12/13/02	NR	NR	NR	NR	NR	NR	-	855.0	-	-	1,403.7
1/28/03	<1	<1	<1	2	<1	294	1.1	1,102.9	16.48	25.5	1,429.2
2/14/03	<1	<1	<1	<2	<1	193	0.5	1,300.5	8.23	6.4	1,435.6
3/24/03	<1	<1	<1	<2	<1	155	0.4	1,614.7	13.09	5.9	1,441.6
4/11/03	2	<1	<1	<2	4	200	2.2	1,901.0	11.93	15.5	1,457.0
5/12/03	20	18	1	2	31	179	11.8	2,221.0	13.33	93.6	1,550.6

**Notes:**

- 1) Concentrations listed in milligrams per cubic meter. Values rounded to the nearest whole number. If concentration less than the detection limit, then the detection limit was listed.
- 2) Two samples collected on 1-24-02 for off-gas determination. Sample # (1) was collected at 1:10 p.m. with only the SVE operating. Sample # (2) was collected at 5:40 p.m. with both the AS/SVE operating.
- 3) Total xylenes = m-Xylene, p-Xylene + o-Xylene concentrations
- 4) TPHs = Total Light Petroleum Hydrocarbons
- 5) scfm = standard cubic feet per minute
- 6) lb/day = pounds per day
- 7) NR = system not running
- 8) \* - \* denotes data is unavailable or insufficient for calculation
- 9) The total mass contaminant flow rate recovered/emitted values were calculated by multiplying the TPH concentration by the flow rate, and assumes a 24 hour period of operation at that value.
- 10) The total mass recovered/emitted between visits was calculated by multiplying the total operational time between sampling events (in days) by the average total mass contaminant flow rate (in lbs/day) value observed between the current and previous sampling event.

**TABLE 7: VACUUM INFLUENCE/DISSOLVED OXYGEN DATA**

**Facility Name:** Cumberland Farms # 1006  
 8078 South Suncoast Blvd., Homosassa, FL  
**Facility ID#:** 098503049

WELL NO.	MW-2		MW-3		MW-5		MW-6		MW-7		MW-8	
	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)
	2"	12'	2"	12'	4"	8'	4"	8'	4"	9'	4"	0'-9'
	2'-12'	2'-12'	2'-12'	2'-12'	0'-8'	0'-8'	0'-8'	0'-8'	0'-9'	0'-9'	0'-9'	0'-9'
Date	Vacuum	DO	Vacuum	DO	Vacuum	DO	Vacuum	DO	Vacuum	DO	Vacuum	DO
5/21/02		0.13		0.11		0.15		0.16		0.13		0.16
5/28/02		0.20		0.11		0.93		1.49				0.21
6/4/02		0.10				0.27		0.17				
6/11/02		0.25				0.29		0.34				
6/25/02												B
2/14/03	2.6 P	5.49	2.2 P	0.25	0.12	0.31	5.79	0.01	0.35	0.06	2.18	
3/24/03	0.5P	0.52			0.20	0.35 B		0.13	0.30	1.60	0.63	

WELL NO.	MW-9		MW-10		MW-11		MW-12		MW-16D		MW-21	
	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)	DIAMETER (in.)	WELL DEPTH (ft bis)
	2"	blocked	2"	12'	2"	10'	2"	10'	2"	25'	2"	12'
	NA	NA	2'-12'	2'-12'	2'-10'	2'-10'	2'-10'	20'-25'	2'-12'	2'-12'		
Date	Vacuum	DO	Vacuum	DO	Vacuum	DO	Vacuum	DO	Vacuum	DO	Vacuum	DO
5/21/02				0.11		0.12		0.12		0.12		0.12
5/28/02				0.35		0.43		0.41				
6/4/02				0.15		0.20		0.18				
6/11/02				0.22		0.21		0.15				
6/25/02												
2/14/03	0.47		0.00	5.66	2.0 P	0.27					1.4 P	0.27
3/24/03												

- Notes:**
- 1) Vacuum readings in inches of water column
  - 2) DO = Dissolved Oxygen, readings in milligrams per liter (mg/L)
  - 3) Blank cells indicate data not recorded
  - 4) P = Pressure
  - 5) B = Bubbles

TABLE 8: GROUNDWATER ELEVATION SUMMARY

Facility Name: Cumberland Farms #1006  
8078 South Suncoast Blvd., Homosassa, FL

Facility ID#: 098503049

WELL NO.	MW-2			MW-3			MW-5			MW-6			MW-7			MW-8		
	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
		2"		2"	4"		4"	4"		4"		4"	4"		4"		4"	
		12'		12'	8'		8'	8'		8'		8'	8'		8'		8'	
		2' - 12'		2' - 12'	0' - 8'		0' - 8'	0' - 8'		0' - 8'		0' - 8'	0' - 8'		0' - 8'		0' - 8'	
		98.53		98.76	98.52		98.52	98.85		98.85		98.89	98.58		98.89		98.58	
DATE	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
11/1/94	94.99	3.54		94.87	3.89		94.94	3.58		94.96	3.89		94.88	4.01		94.89	3.69	
3/21/00	92.28	6.25		92.24	6.52		92.30	6.22		92.27	6.58		92.26	6.63		91.11	7.47	
9/13/00	93.51	5.02		93.51	5.25		93.16	5.36		93.53	5.32		93.91	4.98		93.50	5.08	
10/9/01	94.13	4.40		94.13	4.63		94.15	4.37		94.15	4.70		94.15	4.74		94.13	4.45	
1/24/02	93.22	5.31		93.22	5.54		93.24	5.28		93.26	5.59		93.24	5.65		93.23	5.35	
5/21/02																		
5/28/02	91.94	6.59		91.91	6.85		91.97	6.55		91.95	6.90					91.31	7.27	
6/4/02	91.93	6.60		91.86	6.90		91.92	6.60		91.90	6.95					91.39	7.19	
6/11/02	91.81	6.72				0.16	91.87	6.65		91.85	7.00					0.05		
6/25/02	92.92	5.61					93.18	5.34		93.14	5.71					0.03		
11/21/02	94.18	4.35		94.11	4.65	0.00	94.14	4.38		94.17	4.68		94.07	4.82	0.00	94.00	4.58	0.00
2/13/03	94.04	4.49		93.97	4.79		93.96	4.56		94.04	4.81		94.08	4.81		94.05	4.53	
5/14/03	93.68	4.85		93.79	4.97		93.82	4.70		93.80	5.05		93.81	5.08		93.86	4.72	

# TABLE 8: GROUNDWATER ELEVATION SUMMARY

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL

Facility ID#: 098503049

WELL NO.	MW-9			MW-10			MW-11			MW-12			MW-13			MW-14			
	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	
DIAMETER (in.)		2"			2"			2"			2"			2"			2"		
WELL DEPTH (ft bis)		unknown			12'			10'			10'			8'			8'		
SCREEN INTERVAL (ft)		NA			2' - 12'			2' - 10'			2' - 10'			2' - 8'			2' - 8'		
TOC ELEVATION		98.48			98.84			98.73			98.05			98.87			98.94		
DATE																			
11/1/94	94.84	3.64		94.88	3.96		94.93	3.80		94.95	3.10		94.85	4.02		94.79	4.15		
3/21/00				92.28	6.56		92.31	6.42		92.23	5.82		92.27	6.60		92.19	6.75		
9/13/00		blocked		93.51	5.33		93.55	5.18					93.53	5.34		92.42	6.52		
10/9/01		blocked		94.19	4.65		94.19	4.54					94.13	4.74		94.06	4.88		
1/24/02		blocked		93.21	5.63		93.27	5.46		93.23	4.82		93.25	5.62					
5/21/02																			
5/28/02		blocked		91.93	6.91		91.95	6.78											
6/4/02		blocked		91.89	6.95		92.07	6.66		91.91	6.14								
6/11/02		blocked		91.84	7.00		91.79	6.94		91.93	6.12								
6/25/02																			
11/21/02		blocked		94.09	4.75		94.28	4.45					94.17	4.70		94.01	4.93		
2/13/03		blocked		93.95	4.89		94.07	4.66					94.07	4.80		93.89	5.05		
5/14/03		Dry		93.77	5.07		93.91	4.82					93.80	5.07		Could not open			



**TABLE 8: GROUNDWATER ELEVATION SUMMARY**

**Facility Name:** Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
**Facility ID#:** 098503049

WELL NO.	MW-15			MW-16D			MW-17			MW-18			MW-19			MW-20			
	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	
DIAMETER (in.)				2"			2"			2"			2"			2"			2"
WELL DEPTH (ft bgs)				25'			10'			10'			12'			10'			12'
SCREEN INTERVAL (ft)				20' - 25'			2' - 10'			2' - 10'			2' - 12'			2' - 10'			2' - 12'
TOC ELEVATION				98.36			98.57			98.21			99.31			98.82			98.82
DATE																			
11/1/94	94.87	2.90		94.94	3.52		94.93	3.64		94.91	4.30		94.98	4.33		94.85	3.97		
3/21/00	92.28	5.49		92.27	6.09		92.30	6.27		92.25	6.96		92.26	7.05		92.15	6.67		
9/13/00	93.52	4.25		93.50	4.86		93.55	5.02		93.48	5.73		93.58	5.73		93.48	5.34		
10/9/01	94.19	3.58		94.14	4.22		94.19	4.38		94.11	5.10		93.35	5.96		94.14	4.68		
1/24/02				93.23	5.13		93.27	5.30											
5/21/02																			
5/28/02				91.92	6.44														
6/4/02				91.94	6.42														
6/11/02				91.86	6.50														
6/25/02																			
11/21/02	94.15	3.62		94.09	4.27		94.18	4.39		94.19	5.02		94.09	4.73		94.09	4.73		
2/13/03	94.02	3.75		93.95	4.41		94.09	4.48		94.05	5.16		94.12	5.19		93.94	4.88		
5/14/03	93.82	3.95		93.74	4.62		93.88	4.69		93.71	5.50		93.79	5.52		93.73	5.09		

**TABLE 8: GROUNDWATER ELEVATION SUMMARY**

**Facility Name:** Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
**Facility ID#:** 098503049

WELL NO.	MW-21			VA-1			VA-2			RW-1		
	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
DIAMETER (in.)		2"		2"			2"			8"		
WELL DEPTH (ft bls)		12'		20'			29'			15.42'		
SCREEN INTERVAL (ft)		2' - 12'		15' - 20'			24' - 29'			unknown		
TOC ELEVATION		98.75		97.89			98.89			96.50		
DATE												
11/1/94	94.88	3.87		94.85	3.04		94.85	4.04				
3/21/00	92.23	6.52		92.28	5.61		92.27	6.62		92.24	4.26	
9/13/00	93.48	5.27		93.51	4.38		93.50	5.39				
10/9/01	94.15	4.60	0.06	94.15	3.74		94.09	4.80		91.75	4.75	
1/24/02	93.27	5.48	*				93.30	5.59				
5/21/02			*									
5/28/02			0.03									
6/4/02			*									
6/11/02			0.25									
6/25/02			0.01									
11/21/02	94.13	4.62	0.00	94.11	3.78		94.08	4.81				
2/13/03	93.94	4.81	*	93.98	3.91		94.03	4.86				
5/14/03	93.75	5.00		93.77	4.12		93.77	5.12				

- Notes:
1. DTW = Depth to water, ELEV = water table elevation and FP = liquid phase hydrocarbon thickness. All readings in feet.
  2. \* \* \* denotes that liquid phase hydrocarbons were present, but not recorded.
  3. Blank cells indicate data not collected/available.

# TABLE 9: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY

Facility Name: Cumberland Farms #1006  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

Location	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Total VOA	MTBE	TRPHs	Naphthalene	1-Methyl Naphthalene	2-Methyl Naphthalene	Acenaphthylene
MW-2	3/22/00	13,000	2,200	4,000	6,000	25,200	ND		340			
	10/9/01	6,200	590	2,900	4,520	14,210	300	14,000	490	100	180	36
	11/21/02	5,500	135	2,180	2,615	10,430	703	14,900	548	162	166	114
	2/13/03	4,860	81	1,740	1,566	8,247	696	13,000	389	71	105	97
	5/14/03	3,280	68.8	1,220	1,699.3	6,268	1,020	24,000	126	38.5	29.6	18
MW-3	9/13/00	1,300	1,400	1,800	6,300	10,800	<100	9,500	450		170	
	10/9/01	2,100	4,800	2,100	10,700	19,700	190	21,000	350	74	140	24
	11/21/02	2,560	1,720	2,220	8,549	15,049	93	11,500	641	110	212	140
	2/13/03	2,250	3,830	1,940	10,920	18,940	201	27,500	612	103	207	176
	5/14/03	1,870	4,920	2,110	13,950	22,850	105	63,000	394	77.9	162	147
MW-5	2/10/94	969	1,420	527	5,420	8,336	1,470					
	3/22/00	890	140	510	1,248	2,778	1,200		740			
	10/9/01	1,800	190	1,200	2,000	5,190	1,500	29,000	300	84	140	18
	11/21/02	1,310	60	1,650	1,517	4,537	373	24,900	512	135	179	110
	2/13/03	1,030	90	1,720	1,937	4,777	361	24,000	496	97	160	139
MW-6	5/14/03	1,010	67.8	1,750	1,600.7	4,429	986	32,000	462	155	150	85.5
	3/22/00	ND	ND	ND	ND	ND	ND		5			
MW-7	10/9/01	3	2	8	11	24	6	2,000	16	4	9	1
	9/13/00	470	180	1,200	4,370	6,220	100	13,000	480		170	
MW-8	10/9/01	460	65	1,900	6,300	8,725	41	29,000	600	170	340	56
	9/13/00	15,800	2,700	3,800	9,900	32,200	6,300	24,000	590		260	
	10/9/01	13,000	980	2,600	8,500	25,080	5,900	22,000	740	140	260	53
	11/21/02	5,570	605	863	7,900	14,938	1,180	20,500	600	167	250	164
	2/13/03	2,160	257	463	5,933	8,813	1,820	22,100	401	110	186	148
5/14/03	1,830	130	493	5,889	8,342	1,730	36,000	607	141	245	296	

**TABLE 9: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

Facility Name: Cumberland Farms #1006  
8078 South Suncoast Blvd., Homosassa, FL

Facility ID#: 098503049

Location	Sample Date	Benzene	Toluene	Ethyl-benzene	Total Xylenes	Total VOA	MTBE	TRPHs	Naphthalene	1-Methyl Naphthalene	2-Methyl Naphthalene	Acenaphthylene
MW-10	2/10/94	<1	<1	<1	<1	<1	1					
	3/22/00	ND	ND	ND	ND	ND	ND		ND			
MW-11	2/10/00	<1	<1	70	673	743	66					
	3/22/00	ND	6	ND	4	10	ND		39			
	10/9/01	7	2	28	26	63	2	3,400	4	3	4	<0.20
MW-12	2/10/00	<1	<1	<1	<1	<1	<1					
	3/22/00	ND	ND	ND	ND	ND	ND		ND			
	1/24/02	<1.0	<1.0	<1.0	<2.0	-	<1.0	<590	<0.20	<0.20	<0.20	<0.20
MW-13	2/10/00	<1	<1	<1	<1	<1	<1					
	3/22/00	ND	3	ND	9	13	ND		ND			
MW-14	2/10/00	<1	<1	<1	<1	<1	<1					
MW-15	2/10/00	<1	<1	<1	<1	<1	<1					
	3/22/00	ND	ND	ND	ND	ND	ND		ND			
	2/10/00	<1	<1	<1	8	8	<1					
MW-16D	3/22/00	ND	6	ND	152	158	ND		10			
	10/9/01	<1.0	<1.0	1	13	14	<1.0	<500	<0.20	<0.20	<0.20	<0.20
	2/10/00	<1	<1	<1	<1	<1	<1					
MW-17	3/22/00	ND	ND	ND	ND	ND	ND		ND			
	2/10/00	<1	<1	<1	<1	<1	<1					
MW-18	3/22/00	ND	ND	ND	ND	ND	ND		ND			
	2/10/00	<1	<1	<1	<1	<1	<1					
MW-19	3/22/00	ND	ND	ND	25	25	ND		10			
	1/24/02	<1.0	<1.0	<1.0	<2.0	-	<1.0	1,200	<0.20	<0.20	<0.20	<0.20
	10/18/94	<1	<1	<1	<1	<1	<1					
MW-20	3/22/00	ND	ND	ND	ND	ND	ND		ND			

**TABLE 9: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

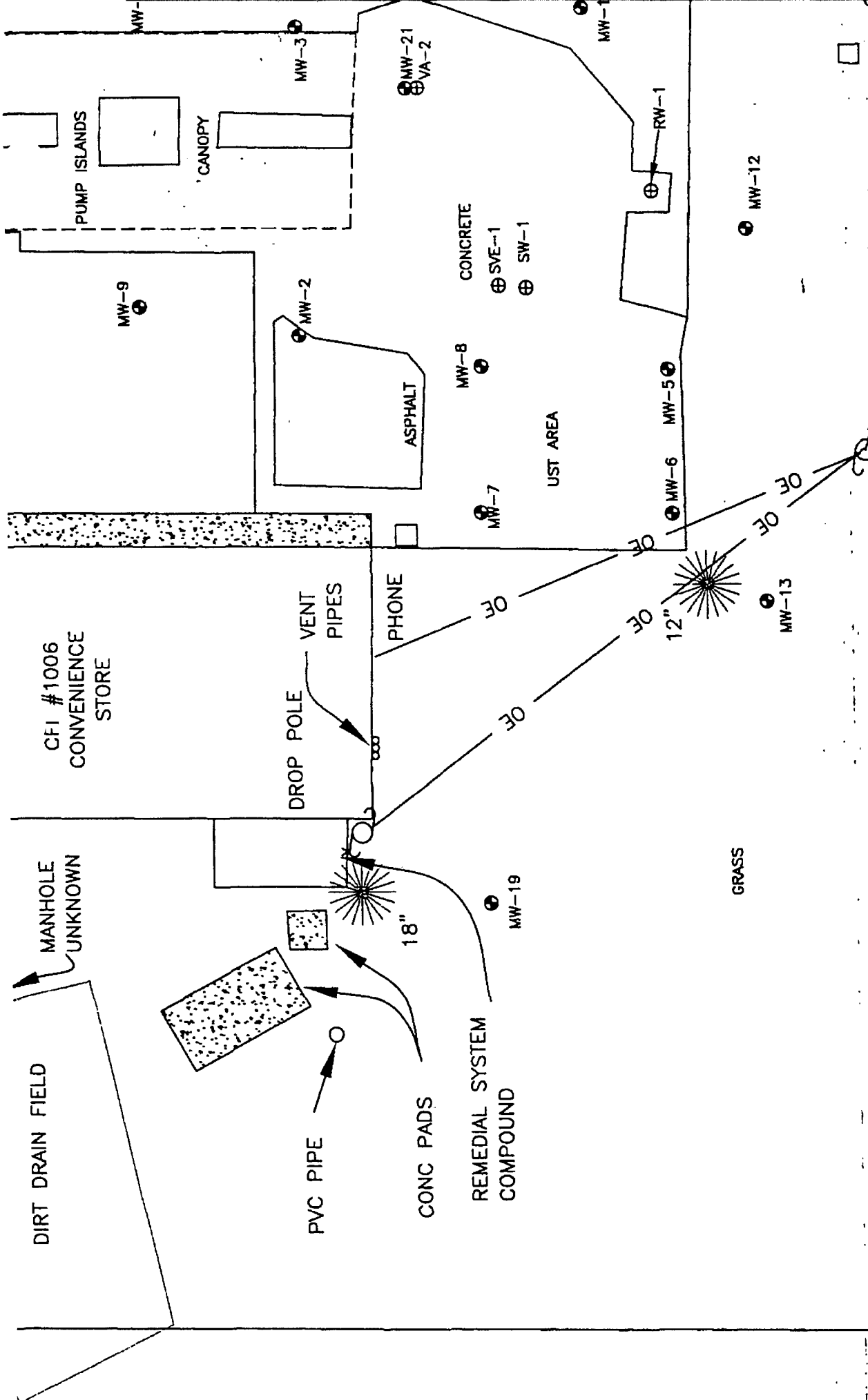
Facility Name: Cumberland Farms #1008  
 8078 South Suncoast Blvd., Homosassa, FL  
 Facility ID#: 098503049

Sample Location	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Total VOA	MTBE	TRPHs	Naphthalene	1-Methyl Naphthalene	2-Methyl Naphthalene	Acenaphthylene
MW-21	10/18/94	23,300	34,500	2,940	18,200	78,940	4,370		658	171	353	
	9/13/00	32,500	4,700	4,400	7,900	49,500	2,700	27,000	730		350	
	11/21/02	33,500	5,150	4,190	8,379	51,419	1,100	9,600	550	154	194	169
	2/13/03	28,100	3,430	2,800	6,286	40,716	957	13,600	540	91	176	161
	5/14/03	23,700	2,080	3,160	5,358	34,298	792	29,000	474	76.9	229	295
VA-1	2/10/00	<1	<1	<1	<1	<1	<1					
	3/22/00	ND	ND	ND	ND	ND	ND		ND			
VA-2	10/18/94	11	15	3	9	37	5					
	3/23/00	ND	5	ND	3	9	ND		ND			
RW-1	3/22/00	1,100	ND	690	1,360	3,150	ND		467			

**Notes:**

1. Results in micrograms per liter (ug/l)
2. Data prior to September 2000 was obtained from the analytical summary tables of previous reports.
3. After March 2000, all values >0.5 ug/l have been rounded to the nearest whole number. Values <0.5 ug/l have been rounded to the nearest tenth.
4. "-" denotes no detection limit or state target level for this summed value.
5. A blank cell indicates the parameter was not analyzed.
6. Total VOA equals the sum of benzene, toluene, ethylbenzene and total xylene compounds (o-xylene and pm-xylene).
7. Laboratory detection limits are listed for all parameters yielding below laboratory detection limit results after March 2000.

**FIGURES**

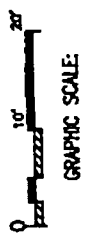


**LEGEND**

- MONITORING WELL
- ⊕ AIR SPARGE WELL
- ⊕ HORIZONTAL SVE WELL
- ||||| PIPING & TRENCHING

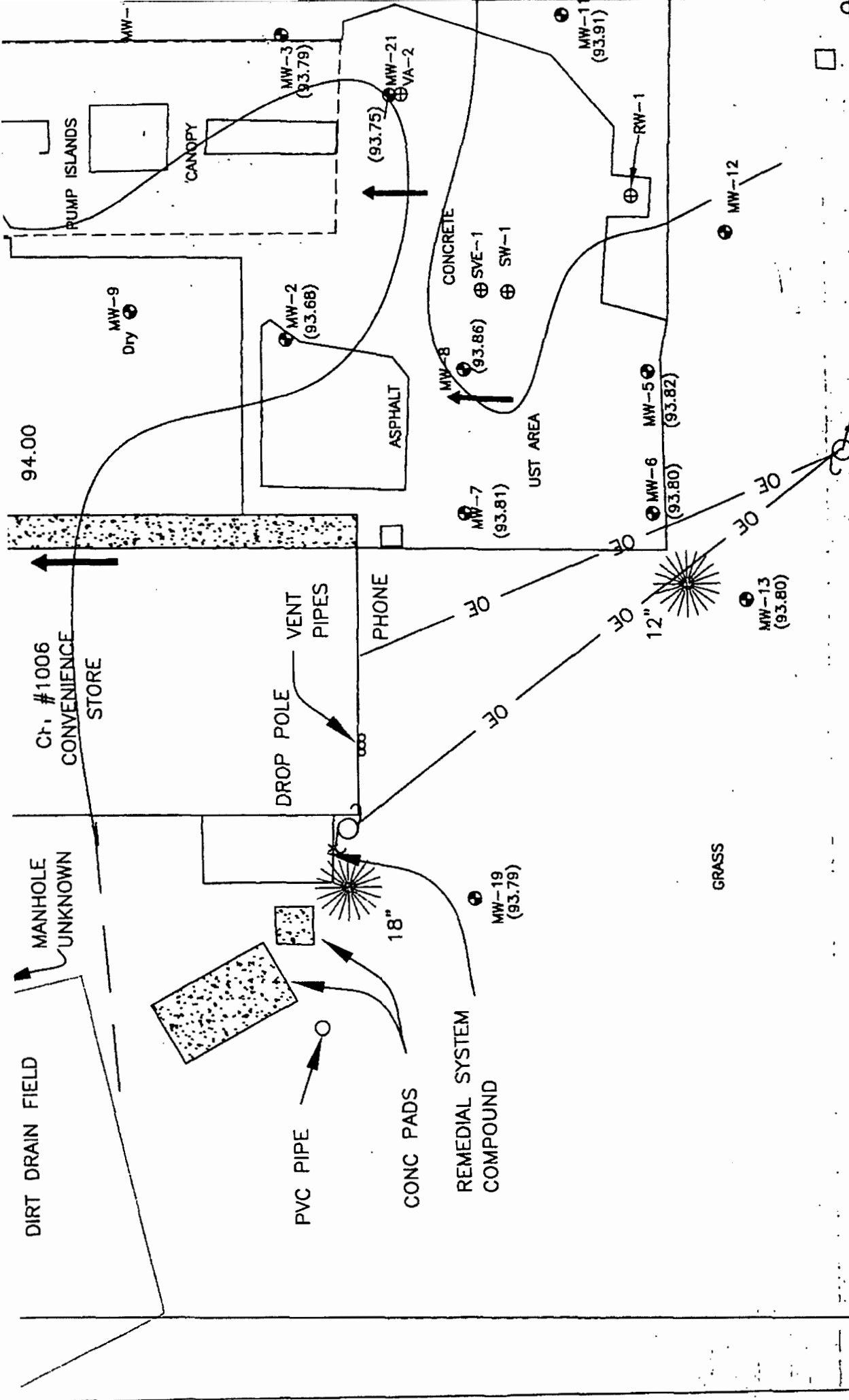


**ECS MARIN**  
 1200 Tech Blvd., Suite 202 • Tampa, FL 33610  
 Phone: 813-412-6600 Fax: 813-412-6910



PROJECT

TITLE



PROJECT: \_\_\_\_\_ TITLE: WATER

**COCS MARIN**

1206 Tech Blvd., Suite 202 • Tampa, FL 33610  
 Phone: 813-612-6000 Fax: 813-412-6010

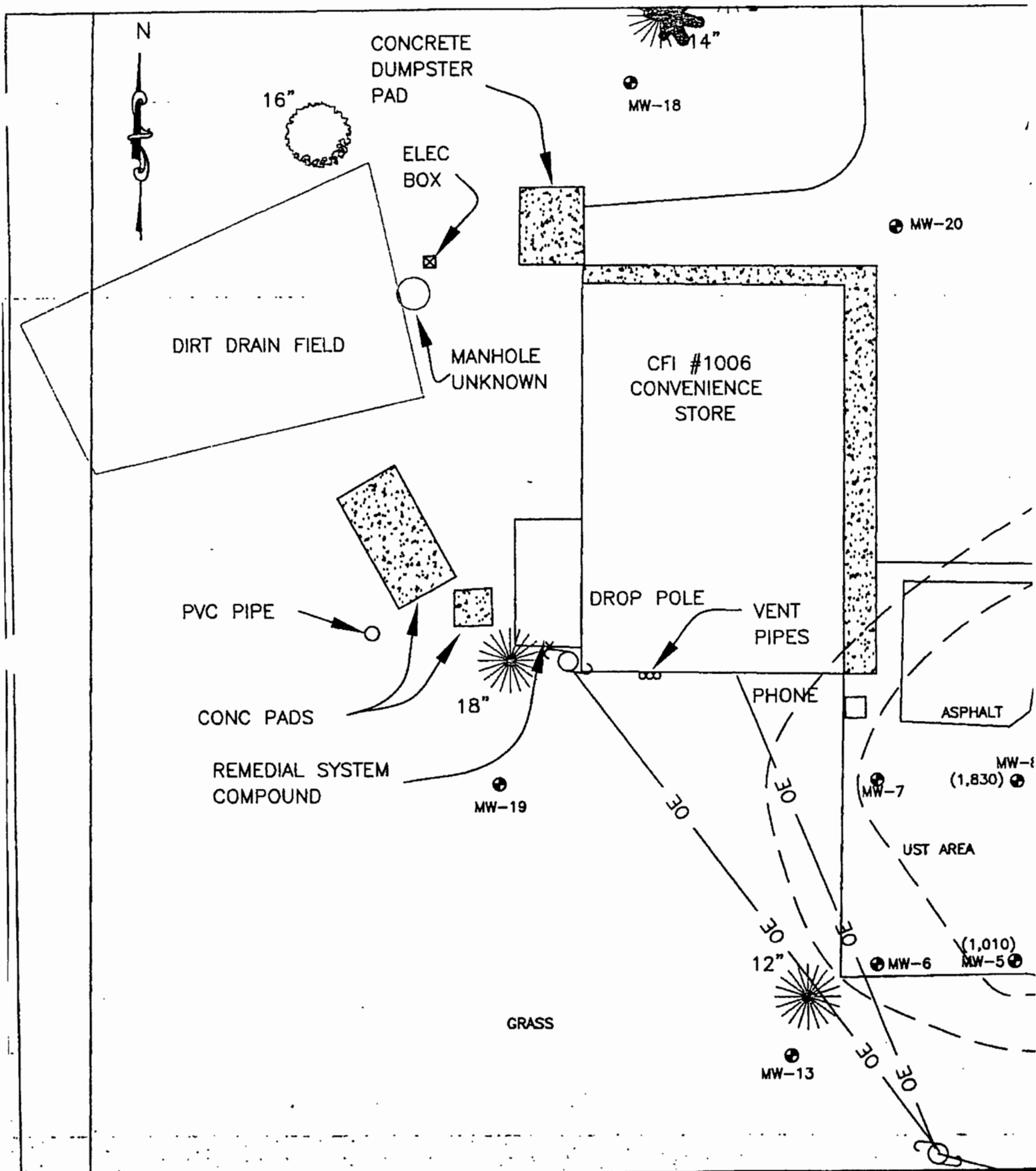
GRAPHIC SCALE: 0 10' 20'

**LEGEND**

- MONITORING WELL
- ⊗ AIR SPARGE WELL
- ⊕ HORIZONTAL SVE WELL
- ||||| PIPING & TRENCHING

(94.06) WATERTABLE ELEVATION IN FEET  
 WATERTABLE ELEVATION CONTOUR  
 ESTIMATED WATERTABLE ELEVATION CONTOUR  
 DIRECTION OF GROUNDWATER FLOW  
 (NM) NOT MEASURED  
 (97.03°) NOT APPLICABLE DUE TO SCREEN DEPTH





**LEGEND**

- MONITORING WELL
- ⊠ AIR SPARGE WELL
- ⊡ HORIZONTAL SVE WELL
- ||||| PIPING & TRENCHING
- (1,030) BENZENE CONCENTRATION IN ug/l
- BENZENE CONCENTRATION CONTOUR
- - - BENZENE CONCENTRATION CONTOUR ESTIMATED



1209 Tech Blvd., Suite 202 • Tampa, FL  
 Phone: 813-612-6900 Fax: 813-612-691

**Site No. 4 U.S. Fish & Wildlife Service - Chassahowitzka**  
7798 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098626575

4

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query

**Facility ID#:** 8626575

**Name:** Us Fish & Wildlife Serv Chassahowitzka  
7798 S Suncoast Blvd  
Homosassa Springs, FL 32646

**Contact:** Us Fish & Wildlife Service

**Phone:** 352-563-2088

**District:** SWD

**County:** Citrus

**Type:** F-Federal Governme

**Status:** Open

**Latitude:** 28:44:54.0000

**Longitude:** 82:33:19.0000

**LL Method:** AGPS-Autonomous

**Account Owner:** Us Fish & Wildlife Service

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
3	1000	Unleaded Gas	02/01/1991	ABOVE	In Service	C X A O M P R	B A I	F Q
1	1000	Leaded Gas	07/01/1978	UNDER	Removed			
2	1000	Leaded Gas	07/01/1978	UNDER	Removed			

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**



Storage Tank Facility Compliance Inspection Report

Facility ID 8626575 County 09/CITRUS Inspection Date 7/12/2001  
 Facility Name US FISH & WILDLIFE SERVICE Facility Type F-Fed Gov  
 Latitude 28° 44' 54" Longitude 82° 33' 19" # USTs      # ASTs 1

Check box for type of inspection performed and attach appropriate form(s). Provide or correct latitude/longitude when appropriate.

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Discharge Inspection/Evaluation	TDI	
Compliance Inspection (DRF received)	TCDI		Installation Inspection	TIN	
Compliance Inspection (Complaint received)	TCPI		Closure Inspection	TXI	
Compliance Re-Inspection	TCR				

Rule Cite	Description / Inspector's Comments
	SEE PAGE #2
	FOR COMMENTS.

Financial Responsibility – Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: EXEMPT

None \_\_\_\_\_

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE – Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name – Please Print	<u>Bob B. Quarkas</u> Facility Representative Name – Please Print
<u>Mark Sumner</u> 7/12/01 Inspector Signature & Date	<u>Bob B. Quarkas</u> Facility Representative Signature & Date

Facility Name: US FISH + Wildlife Facility ID: 8626575 Date: 7/12/2001

Rule Cite	Description / Inspector's Comments
	Release detection is a monthly visual check of the tank and its interstice. these are documented and the conditions observed are noted.
	Tank is contained in a concrete shell (conduit). the interstice is checked with a stick and it is dry.
	Tank is equipped with a spill bucket and a level gauge.
	A photograph of the tank has been added to the file.

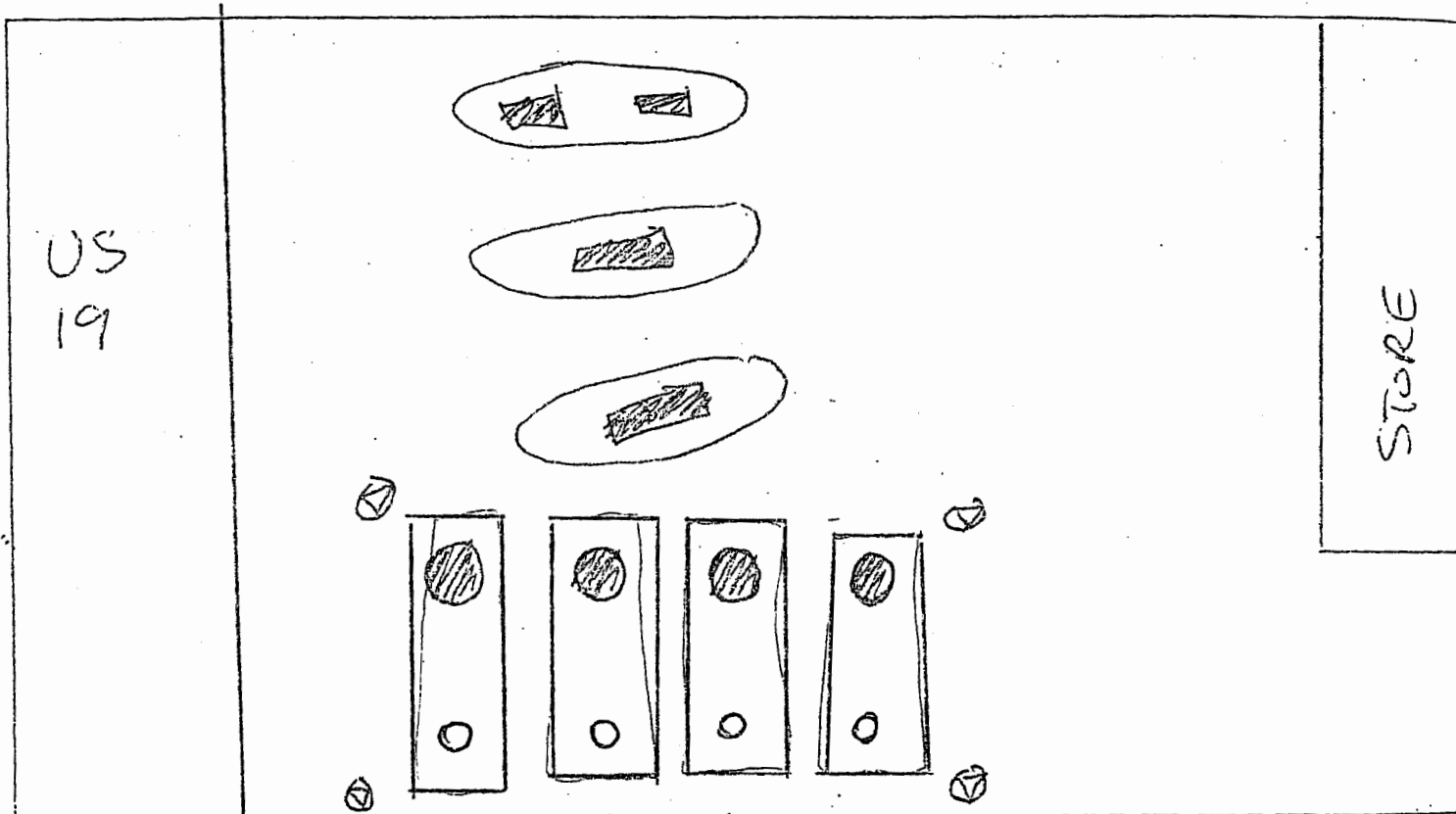
**Site No. 5    Circle K #7497**  
6775 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098625853  
EPA I.D. No. FLD984254169

SITE NAME: CIRCLE K 7497

DRESS: 6775 S Suncoast

FDEP NUMBER: 8625853

NORTH



KEY:		COMPLIANCE WELLS		DISPENSERS
		TANKS		DRIVES/HIGHWAY
		SUMPS		POTABLE WELLS
		FILLS		STRUCTURES
		VENTS		OTHER MW'S

DRAWING REVIEWED AND UPDATED

INSPECTORS INITIAL AND DATE	<u>CMS 9/19/00</u>			



# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

**D.E.P.**

David B. Struhs  
Secretary

APR 19 2001  
Southwest District Tampa

**CERTIFIED MAIL**  
**RETURN RECEIPT REQUESTED**

Mr. Steve Belin  
Circle K Stores, Inc.  
5650 Breckenridge Park Drive, Suite #300  
Tampa, FL 33610

Subject: Site Rehabilitation Completion Order  
Circle K #7497  
6775 South Suncoast Blvd (US 19)  
Homosassa Springs, Citrus County, Florida  
FDEP Facility ID #098625853

APR 16 2001

Dear Mr. Belin:

The Bureau of Petroleum Storage Systems has reviewed the Site Assessment Report (SAR) and No Further Action Proposal (NFAP) dated January 12, 2001 (received January 16, 2001), and the Monitoring Well Abandonment Report dated April 3, 2001 (received April 5, 2001), prepared and submitted by ATC Associates, Inc., for the petroleum product discharge discovered on September 20, 1988 at this site. Documentation submitted with the NFAP confirms that criteria set forth in Rule 62-770.680(1), Florida Administrative Code (F.A.C.), have been met. The NFAP is hereby incorporated by reference in this Site Rehabilitation Completion Order (Order). Therefore, you are released from any further obligation to conduct site rehabilitation at the site for petroleum product contamination associated with the discharge listed above, except as set forth below.

In the event concentrations of petroleum products' contaminants of concern increase above the levels approved in this Order, or if a subsequent discharge of petroleum or petroleum product occurs at the site, the Department of Environmental Protection (Department) may require site rehabilitation to reduce concentrations of petroleum products' contaminants of concern to the levels approved in the NFAP or otherwise allowed by Chapter 62-770, F.A.C.



Stores, Inc., shall mail a copy of the request to Mr. Steve Belin, Circle K Stores, Inc., at the time of filing. Failure to file a petition within this time period shall waive the right of anyone who may request an administrative hearing under Sections 120.569 and 120.57, F.S.

Pursuant to Section 120.54(5)(b)4.a., F.S. (1998, Supp.), and Rule 28-106.201, F.A.C., a petition for administrative hearing shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the name, address, and telephone number of the petitioner's representative, if any, the site owner's name and address, if different from the petitioner, the FDEP facility number, and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) An explanation of how each petitioner's substantial interests are or will be affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by the petitioner, or a statement that there are no disputed facts;
- (e) A statement of the ultimate facts alleged, including a statement of the specific facts the petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Department's action or proposed action.

This Order is final and effective as of the date on the top of the first page of this Order. Timely filing a petition for administrative hearing postpones the date this Order takes effect until the Department issues either a final order pursuant to an administrative hearing or an order responding to supplemental information provided pursuant to meetings with the Department.

#### Judicial Review

Any party to this Order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within 30 days after this Order is filed with the clerk of the Department (see below).


The FDEP Facility Number for this site is 098625853. Please use this identification on all future correspondence with the Department.

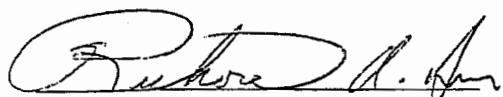
P.G. CERTIFICATION

No Further Action Proposal for Circle K #7497, 6775 South Suncoast Blvd, Homosassa Springs, Citrus County, FDEP Facility ID #098625853.

I hereby certify that in my professional judgment, the components of this No Further Action Proposal satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the conclusions in this report provide reasonable assurances that the objectives stated in Chapter 62-770, F.A.C., have been met.

I personally completed this review.

This review was conducted by James Fillmore   
working under my direct supervision.



Richard A. Dunn, P.G. #1509  
WRS Senior Geologist  
Petroleum Cleanup Section 5  
Bureau of Petroleum Storage Systems

4/10/2001  
Date

**Site No. 11 Kwik Stop (Citgo - Binal Food Mart)**  
5445 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098841370



# Agenda

# Florida Department of Environmental Protection

(11)

## Kwik Stop

Hashmukh Patel as Owner and

Ketan Shah as Operator

August 2, 2001

### INTRODUCTION:

The responsibilities of the Florida Department of Environmental Protection  
The responsibilities of the Citrus County Health Department

### SIGNIFICANT EVENTS:

1. As of 10/12/00 this Facility had three, 8,000 gallon, underground bare-steel petroleum storage tanks (USTs) with impressed current cathodic protection. The tanks were installed in July of 1988. The associated double-walled piping is constructed with synthetic materials. All three tank systems contain vehicular fuel petroleum products. The method of release detection for the USTs is monthly 0.2 gph leak tests conducted by Veeder-Root TLS-350 Automatic Tank Gauging (ATG) systems. The pressurized double-walled piping interstice is monitored by electronic sensors located in the STP sumps.
2. A compliance inspection conducted by Citrus County personnel on 10/12/00 indicated that the facility was non-compliant on several issues:
  - a. Documentation was not available to show that the Veeder-Root TLS-350 was being placed in test mode on a monthly basis.
  - b. Documentation was not available to show that the impressed current cathodic protection system was being inspected at intervals not exceeding two months.
3. On June 27, 2001 Citrus County issued a Warning Letter to Hashmukh Patel with a copy to Mr. Ketan Shah setting an enforcement meeting for August 2, 2001.



**NONCOMPLIANCE ISSUES:**

1. Rule 62-761.600(1)(d), F.A.C., requires that the release detection method or combination of methods used at a facility shall be performed at least once a month, but not exceeding 35 days, to determine if a release from the storage tank system has occurred. Rule 62-761.610(1)(a), F.A.C. requires that all release detection methods meet the performance standards contained in Rule 62-761.640, F.A.C. The performance standards for Automatic Tank Gauging (ATG) systems are contained in Rule 62-761.640(3)(c)2.a., F.A.C., and require that they be placed in test mode at least once every 30 days.
2. Rule 62-761.700(1)(b)2.b., F.A.C., requires that storage tank systems with impressed current cathodic protection shall be inspected at intervals not exceeding two months. Evidence of proper functioning shall be current output, normal power consumption, a signal indicating normal operation, or satisfactory electrical state of the protected structure. Rule 62-761.710(3)(d), F.A.C., requires that cathodic protection inspection records be kept for the life of the storage tank system..

**RESOLUTION OF VIOLATIONS:**

1. Immediately begin placing the Veeder-Root TLS-350 in test mode on a monthly basis. Documentation of the results of these monthly tests must be retained for a period of two years.
2. Immediately begin performing inspections of the impressed current cathodic protection system. The results of these inspections must be properly recorded and retained for the life of the storage tank system(s).
3. Correct any additional issues that are still open with Citrus County.
4. Pay all Departmental penalties and fees.

**SETTLEMENT OF DEPARTMENT ENFORCEMENT ACTION:**

Discussion of Consent Order  
Discussion of penalties and fees

**SUMMARY OF AGREEMENTS:**

Discussion of time frames for compliance  
Verification procedures and documentation



# Penalties

# Florida Department of Environmental Protection

## PENALTY COMPUTATION WORKSHEET

Violator's Name: Mr. Hashmukh Patel (Owner) and Mr. Ketan Shah (Operator)

Identify Violator's Facility: Kwik Stop, DEP ID #09/8841370

Name of Department Staff Responsible for the Penalty Computations: Jon H. Reeder

### PART I - Class A Penalty Determinations

	Violation Type	Potential for Harm	Extent of Deviation	Matrix Amount	Adjustment	Total
1.	Failure to perform required monthly release detection as required by Rule 62-761.600(1)(d), F.A.C.	Moderate	Unresolved	\$2,000 to \$5,000		\$2,000 to \$5,000
		Moderate	Resolved	\$500 to \$2,000		\$500 to \$2,000
2.	Failure to perform required impressed current cathodic protection inspections as required by Rule 62-761.700(1)(b)2.b., F.A.C.	Minor	Unresolved	\$200 to \$500		\$200 to \$500
		Minor	Resolved	\$100 to \$500		\$100 to \$500
3.	Department fees					\$100

**Total Penalty Range and Fees for all Violations: \$700 – \$5,600**

- STORAGE TANK PROGRAM  
 CHAPTER 62-761 F. A. C.  
 PENALTY ASSESSMENT MATRIX

EXTENT OF DEVIATION

P  
O  
T  
E  
N  
T  
I  
A  
L  
  
F  
O  
R  
  
H  
A  
R  
M

Violation Type	Unresolved	Resolved
Significantly Not In Compliance: <u>Type A</u> (MAJOR)	\$10,000 to \$5,000	\$5,000 to \$2,000
Significantly Not In Compliance: <u>Type B</u> (MODERATE)	\$5,000 to \$2,000	\$2,000 to \$500
Minor Out of Compliance (MINOR)	\$500 to \$200	\$500 to \$100

#8841370

**ANDREW BELL, INC.**

Petroleum Equipment Services

June 20, 1997

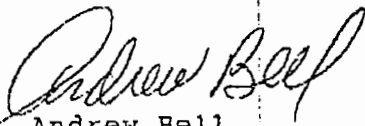
Citrus County Dept. of Public Safety  
285 S Kensington Avenue  
Lecanto, FL 34461

Attn: David E. Chronister

Dear Mr. Chronister

Enclosed please find the report and test results for Binal Food Mart, 5445 Suncoast Blvd., Homosassa, FL. If you should have any questions, please feel free to contact me.

Sincerely,



Andrew Bell

AB/kc  
Encls.



ANDREW BELL 407-298-6799

# W. E. Moore Environmental Consultant, Inc.

W. E. Moore  
President  
7651 Havenford Ct.  
Orlando, FL 32818

Telephone 407-292-6799  
Fax 407-298-0622

## AUGER BORING REPORT

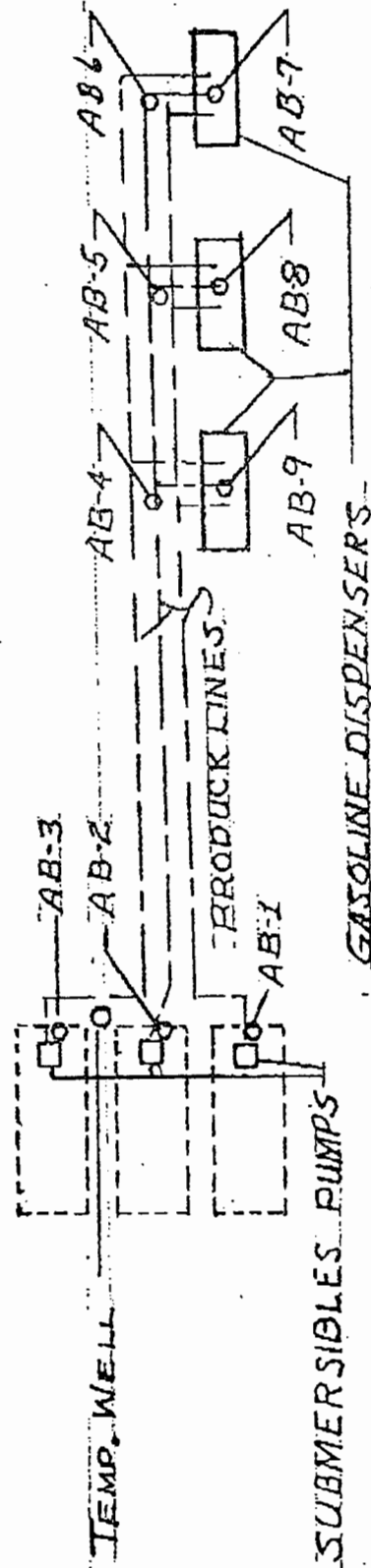
April 18, 1997

Location: Binal Food Mart, 5445 Suncoast Blvd., Homosassa, FL

Reading was obtained from a 16 oz. jar half-filled with a head space using HNU 101 FID instrument.

AB1 1 ft. 4 ppm	AB2 1 ft. 130 ppm
AB1 2 ft. 0 ppm	AB2 2 ft. 190 ppm
AB1 3 ft. 0 ppm	AB2 3 ft. 240 ppm
AB3 1 ft. 4 ppm	AB4 1 ft. 0 ppm
AB3 2 ft. 5 ppm	AB4 2 ft. 0 ppm
AB3 3 ft. 440 ppm	AB4 3 ft. 0 ppm
AB5 1 ft. 0 ppm	AB6 1 ft. 0 ppm
AB5 2 ft. 0 ppm	AB6 2 ft. 0 ppm
AB5 3 ft. 0 ppm	AB6 3 ft. 0 ppm
AB7 1 ft. 0 ppm	AB8 1 ft. 0 ppm
AB7 2 ft. 0 ppm	AB8 2 ft. 0 ppm
AB7 3 ft. 0 ppm	AB8 3 ft. 0 ppm
AB9 1 ft. 0 ppm	
AB9 2 ft. 0 ppm	
AB9 3 ft. 0 ppm	

TEXACO FOOD MART



TEXACO FOOD MART 5445 SUNCORST BLDG. HOMOSASSA, FL.		DRAWN BY W.E.M.
SCALE: N.T.S.	APPROVED BY:	REVISED
DATE: 4-28-97	LOCATION: MAP OF ALGER BORING & SUBMERSIBLE PUMPS & GASOLINE DISPENSERS	
DRAWING NUMBER		DRAWING NUMBER

**Site No. 14 Quick Save Discount Beverage**  
5366 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098503115



# Department of Environmental Protection

14

Jeb Bush  
Governor

Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

David B. Struhs  
Secretary

September 12, 2000

Ms. Diana Lumpkins  
Sunny Days Plaza  
5390 South Suncoast Blvd.  
Homosassa, FL 34446

Re: Quick Save Discount Beverages  
5366 South Suncoast Blvd.  
Homosassa, Citrus County, Florida  
FDEP Facility ID #098503115

SITE 14

Dear Ms. Lumpkins:

Michelle Allard of the Bureau of Petroleum Storage Systems has reviewed the Site Assessment Report (SAR), dated April 21, 2000 (received April 26, 2000), submitted by Streamline Environmental, Inc., for the discharge discovered on December 20, 1999 at the above referenced site. The Department found all the documents submitted to date to be adequate to meet the contamination assessment requirements of Sections 62-770.600 and 62-770.630, Florida Administrative Code (F.A.C.). Therefore, you must now submit a Remedial Action Plan (RAP) in accordance with Section 62-770.700, F.A.C. The Department concurs that, due to the limited extent of contamination, the RAP may be limited in scope.

Please send a copy of the approved SAR document(s) to Mr. Ken Weber of the Southwest Florida Water Management District within thirty (30) days of receiving this approval letter.

Please submit the RAP addressed to me within ninety (90) days of receipt of this request, as required by Section 62-770.700(1), F.A.C. If you have any questions concerning this review, please contact me at (813) 744-6100, ext. 427.

Sincerely,

Leslie E. L. Pedigo  
Environmental Specialist III  
Tanks Program  
Division of Waste Management

LELP

cc: Craig Smith, Streamline Environmental, Inc.  
Mark Sumner, Citrus County Health Department  
Michelle Allard, FDEP-BPSS, Petroleum Cleanup Section 5  
Tom Conrardy, FDEP-BPSS, Petroleum Cleanup Section 3  
"More Protection, Less Process"



Storage Tank Facility Compliance Inspection Report

Facility ID 8503115 County 09/CITRUS Inspection Date 9/11/00  
 Facility Name QUICK SAVE DISCOUNT BEV. Facility Type A-RETAIL  
 Latitude 28°47'00" Longitude 82°35'43" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>14</u>	# ASTs Inspected	
------------------	-----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>610(1)(a)</u>	<u>The SIA Release detection method that is used at this facility does not meet the performance standards in Rule 62-761.640 as required.</u>	
<u>.700(1)(b)2a</u>	<u>The impressed current cathodic protection for the piping has not led its soil to structure potential tested within the last 12 months.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: C & I Effective Date: 5/11/00 Expiration Date: 5/11/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS CNTX ENV. HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMMER</u> Inspector Name - Please Print	<u>DILIP PATEL</u> Facility Representative Name - Please Print
<u>Mark Summer</u> <u>9/11/00</u> Inspector Signature & Date	<u>D. Patel</u> Facility Representative Signature & Date

Facility Name: QUICKSAVE DISC. BEV. Facility ID: 8503115 Date: 9/11/00

<u>Site</u>	<u>Description / Inspector's Comments</u>
COMMENTS	Release detection is S.I.R. By
	SOUTH EASTERN LIQUID ANALYZERS.
	All have <del>been</del> been passing since last
	inspection.
	The dispenser lines are visually checked
	monthly by owner, and conditions
	are noted in log book. There is some
	wetting in the Reg. UL liner, but no
	accumulated liquid. The plus/premium
	liners were dry.
	ALL TANKS were tightness tested
	1/17/00 with Horner EZ73 by Precision
	Petroleum all passed.
	Lines were tightness tested 1/17/00
	with Horner EZ7 product line test by Precision
	Petroleum all passed.
	2000 - 2001 placard is displayed.
	Cathodic protection impressed current
	readings are logged monthly and currently
	read 17 Volts 0.5 Amps. The Soil
	to Structure was last tested 8/99 it
	was due again 8/2000.
	The tanks were internally lined
	in February 1992. Be aware that
	they must be internally inspected
	by February 2002.

**Memorandum**

**Florida Department of  
Environmental Protection**

TO: Michael Bland  
Bureau of Petroleum Storage Systems  
Petroleum Cleanup Section 4  
Mail Station 4580

FROM: Leslie Pedigo *LP*  
Southwest District

DATE: April 28, 2000

SUBJECT: Site Assessment Report  
Quick Save Discount Beverages  
5366 South Suncoast Boulevard  
Homosassa, Citrus County, Florida  
DEP Facility ID #098503115

BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
MAY 01 2000  
PETROLEUM CLEANUP  
SECTION 4

RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
MAY -1 11:3:43  
SIT  
DOCU

Enclosed please find the above referenced SAR for your review and comments. Since this site is currently not eligible for one of the cleanup programs, please send your comments to me

Thanks for your assistance!

LP

Enclosure

D.E.P.

APR 26 2000

Southwest District Tampa

**SITE ASSESSMENT REPORT  
QUICK SAVE DISCOUNT BEVERAGE  
5366 S. SUNCOAST BOULEVARD  
HOMOSASSA, FLORIDA 34446**

**BUREAU OF PETROLEUM  
STORAGE SYSTEMS**

MAY 01 2000

**PETROLEUM CLEANUP  
SECTION 4**

**FDEP ID NO. 98503115**

*Prepared For:*

**QUICK SAVE DISCOUNT BEVERAGES  
5366 S. SUNCOAST BOULEVERD  
HOMOSASSA, FLORIDA 34446**

**RECEIVED**  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
MAY - 1 PM 3:43  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER

*Prepared By:*

**STREAMLINE ENVIRONMENTAL  
519 NORTH HOWARD AVENUE  
TAMPA, FLORIDA 33606**

**APRIL 2000**



**STREAMLINE PROJECT NO. 000206**

*Craig R. Smith*  
Craig R. Smith, P G  
Florida Registration No 1641

4-21-2000



## TABLE OF CONTENTS

EXECUTIVE SUMMARY . . . . .	1
1 0 INTRODUCTION . . . . .	3
2 0 SITE DESCRIPTION . . . . .	4
2 1 SITE LOCATION . . . . .	4
2 2 SITE LAYOUT . . . . .	4
2 3 TANK HISTORY . . . . .	4
2 4 DISCOVERY OF CONTAMINATION . . . . .	4
2 5 UTILITIES . . . . .	4
2 6 STORM WATER DRAINAGE . . . . .	5
2 7 SURFACE WATER HYDROLOGY . . . . .	5
2 8 ADJACENT PROPERTY LAND USE . . . . .	5
3 0 REGIONAL HYDROGEOLOGY . . . . .	6
4 0 CONTAMINATION ASSESSMENT ACTIVITIES . . . . .	7
4 1 VADOSE ZONE INVESTIGATION . . . . .	7
4 1 1 Soil OVA Analysis . . . . .	7
4 1 2 Soil Sampling for Laboratory Analysis . . . . .	7
4 2 GROUNDWATER INVESTIGATION . . . . .	8
4 2 1 Monitoring Well Installation . . . . .	8
4 2 2 Groundwater Flow Direction . . . . .	8
4 2 3 Groundwater Sampling and Analysis . . . . .	9
4 3 SITE GEOLOGY . . . . .	9
4 4 CONTAMINANT TRANSPORT MECHANISMS . . . . .	10
4 5 AQUIFER CLASSIFICATION . . . . .	10
4 6 POTABLE WELL SURVEY . . . . .	10
4 7 AQUIFER TESTING . . . . .	10
5 0 CONCLUSIONS . . . . .	12

## LIST OF FIGURES

- 1 SITE LOCATION MAP
- 2 SITE LAYOUT PLAN
- 3 BORING LOCATION PLAN
- 4 MONITORING WELL LOCATION PLAN
- 5 GROUNDWATER ELEVATION MAP - 2/29/2000
- 6 GROUNDWATER ELEVATION MAP - 4/4/2000
- 7 BENZENE CONCENTRATION MAP
- 8 TVOA CONCENTRATION MAP
- 9 GEOLOGIC CROSS-SECTION
- 10 POTABLE WELL LOCATION MAP

## LIST OF TABLES

- 1 SOIL OVA DATA
- 2 SOIL ANALYTICAL DATA
- 3 GROUNDWATER ELEVATION DATA
- 4 GROUNDWATER ANALYTICAL DATA
- 5 MONITORING WELL CONSTRUCTION DETAILS
- 6 AQUIFER TESTING RESULTS

## LIST OF APPENDICES

- A PHASE II ANALYTICAL RESULTS
- B SOIL BORING LOGS
- C LABORATORY ANALYTICAL REPORT
- D SAMPLE COLLECTION FORMS
- E SLUG TEST DATA
- F POTABLE WELL SURVEY

## LIST OF ACRONYMS AND ABBREVIATIONS

ASTM	American Society of Testing and Materials
ATRP	Abandoned Tank Restoration Program
bls	below land surface
CAR	Contamination Assessment Report
CompQAP	Comprehensive Quality Assurance Plan
EPA	U S Environmental Protection Agency
FAC	Florida Administrative Code
FDEP	Florida Department of Environmental Protection
FID	Flame Ionization Detector
ft	foot or feet
ft/day	feet per day
GCTL	Groundwater Cleanup Target Level
IRA	Initial Remedial Action
mg/L	milligrams per liter
MOP	Monitoring Only Plan
MTBE	methyl-tertiary-butyl ether
NFA	No Further Action
OVA	Organic Vapor Analyzer
PAH's	polynuclear aromatic hydrocarbons
ppm	parts per million
PVC	polyvinly chloride
SAR	Site Assessment Report
SCTL	Soil Cleanup Target Level
SWFWMD	Southwest Florida Water Management District
TRPH	total recoverable petroleum hydrocarbons
TVOA	total volatile organic aromatics
USCS	Unified Soils Classification System
UST	underground storage tank
ug/L	micrograms per liter

## EXECUTIVE SUMMARY

### Tank History

Four, 4,000 gallon capacity USTs, each containing unleaded gasoline, were installed on the property in 1977. The steel tanks have since been upgraded and have internal lining, cathodic protection, and spill containment. The steel, suction piping system is cathodically protected.

### Discovery of Contamination

Petroleum contamination was first detected at the facility during Phase II Environmental Site Assessment activities conducted in December, 1999. As part of the phase II investigation, groundwater samples were collected from the four compliance wells surrounding the tank pit area. Laboratory analysis of the samples found concentrations of petroleum constituents (benzene, ethylbenzene, toluene and total xylenes) that exceed Groundwater Cleanup Target Levels (GCTLs). A Discharge Reporting Form (DRF) was submitted to the FDEP in response to the discovery of contamination. In addition, pressure testing of the petroleum system was conducted, which identified no leaks. As such the source of contamination was probably a small spill. In addition, because the study found little MTBE, the spill was probably old.

### Soils Investigation

Ten soil borings were performed to delineate the extent of petroleum impacts in the vadose zone. Soil gas survey results found no excessively contaminated soils (OVA reading > 500 ppm). One sample was collected for laboratory analysis from the area of highest OVA readings. No evidence of adverse petroleum impacts was detected in the soil sample analyzed.

### Groundwater Flow Direction

Two rounds of water table elevation data were collected during the study. Depth to water ranged from 9 to 10 ft below land surface. The surface of the water table is too flat to contour. Regionally, groundwater flows west to the Gulf of Mexico. No significant vertical hydraulic gradient was found.

### Groundwater Investigation

Prior to the site assessment, four shallow monitoring wells were located in the area of the tank pit. Streamline installed four additional permanent shallow wells (14 ft total depth) and one double-cased deep well (30 ft total depth). Two of the source area wells (MW-1 and MW-4) were tested for the entire kerosene analytical group. The remaining wells were sampled for EPA Method 602 and 610 parameters, and FLPRO only.

Groundwater sampling results found concentrations of volatile organic compounds (Benzene and Ethylbenzene) that exceed Groundwater Cleanup Target Levels in 2 wells. Contaminants were not detected in the deep well installed into the Upper Floridan Aquifer. The contaminated area is approximately 50 ft by 50 ft by 10 ft thick.

### Hydrogeology

The shallow geology at the site consists of primarily fine grained sand and slightly silty sand from land surface to approximately 18 ft below land surface (bls). Sandy clay to clayey sand was found between 18 and 20 ft bls. Fossiliferous limestone was found from 20 ft bls to maximum boring depth of 30 ft

### Water Well Survey

Area residents and businesses, including the subject property, rely on groundwater for their drinking water. Although the Southwest Florida Water Management District had little information on wells in the immediate site vicinity, an area reconnaissance identified water wells at nearly all residences in the vicinity. The nearest water well to the source area is located approximately 200 ft to the west.

### Conclusions and Recommendations

The results of the Site Assessment indicate that groundwater in the surficial aquifer has been impacted by petroleum hydrocarbons, and that the level of impact exceeds the groundwater cleanup target levels. However, the magnitude and extent of impacts appears to be limited and rate of migration appears to be very slow. As such, a Remedial Action Plan should be prepared to determine the most practical and cost-effective remediation strategy for the site. Because the size of the contaminated area is relatively small, an Alternative Remedial Action (such as short term air sparging and soil vapor extraction) may be effective at reducing contaminant levels to within Natural Attenuation levels.

## **1.0 INTRODUCTION**

Streamline Environmental was retained by Quick Save Discount Beverages to perform a Site Assessment Report (SAR) of petroleum contamination at the subject property. The assessment was initiated because groundwater impacts were discovered at the site during a phase II environmental site assessment

The facility ID number for the facility is 98503115

## **2.0 SITE DESCRIPTION**

### **2.1 SITE LOCATION**

The subject property is located in Citrus County at the physical address of 5366 S Suncoast Blvd in Homosassa, Florida. Geographically, the site is located in Section 35, Township 19 South, Range 18 East. A Topographic Site Location Map is included as **Figure 1**.

### **2.2 SITE LAYOUT**

The subject property is a gas and convenience store centrally located in the Sunny Days Shopping Plaza. The property has approximate dimensions of 190 ft by 500 ft. The Sunny Days Plaza building is rectangular-shaped with approximate dimensions of 420 ft by 40 ft. An asphalt parking lot borders the east side of the plaza building. The USTs and fuel dispensers are located in the parking lot approximately 50 ft west of the plaza building. A Site Layout Plan is included as **Figure 2**.

### **2.3 TANK HISTORY**

Four, 4,000 gallon capacity USTs, each containing unleaded gasoline, were installed on the property in 1977. The steel tanks have since been upgraded and have internal lining, cathodic protection, and spill containment. The steel, suction piping system is cathodically protected.

### **2.4 DISCOVERY OF CONTAMINATION**

Petroleum contamination was first detected at the facility during Phase II Environmental Site Assessment activities in December, 1999. As part of the phase II investigation, groundwater samples were collected from the four compliance wells surrounding the tank pit area. Laboratory analysis of the samples found concentrations of petroleum constituents (benzene, ethylbenzene, toluene and total xylenes) that exceed Groundwater Cleanup Target Levels (GCTLs). Pertinent data from the phase II assessment are included in **Appendix A**.

A Discharge Reporting Form (DRF) was submitted to the FDEP in response to the discovery of contamination. In addition, pressure testing of the petroleum system was conducted, which identified no leaks. As such the source of contamination was probably a small spill. In addition, because the study found no MTBE, the spill was probably very old.

### **2.5 UTILITIES**

Water is supplied to the property by a private water well located approximately 100 feet west of the subject building. All sewage is pumped to a private waste water treatment plant located adjacent to the west of the study area. Overhead electrical lines enter the

property from the west and supply electricity to the subject building. Underground telephone utilities run north and south along Hwy 19. Sewer lines are not present within the impacted area.

## **2.6 STORM WATER DRAINAGE**

No storm water drains were identified on the property. Storm water runs off the parking lot and infiltrates into the permeable sandy soils.

## **2.7 SURFACE WATER HYDROLOGY**

Petroleum contamination at the subject property is not anticipated to be impacting with any surface water bodies. Review of the USGS Topographic map, Homosassa Quadrangle revealed that the nearest surface water body to the subject property is located over one mile to the southwest.

## **2.8 ADJACENT PROPERTY LAND USE**

Land use in the site vicinity is commercial. Adjacent properties are described below and shown on Figure 2.

### North

The subject property is bordered to the north by Palace Road. An undeveloped lot is located on the north side of Palace Road.

### South

Oak Ridge Drive borders the southern property boundary. Land on the south side of Oak Ridge Drive contains the Oak Ridge Center retail plaza.

### East

The subject property is bordered to the east by Highway 19 (U.S. 55). Homosassa Printing, Warehouse Storage, and R&R Used Auto are located on the east side of Hwy 19.

### West

A small gravel road borders the western subject property boundary. Homosassa Tire, a small sewage treatment plant, and Bob's Garage are located on the west side of the road.



### 3.0 REGIONAL HYDROGEOLOGY

In general, there are three hydrostratigraphic units underlying much of Citrus County. These include the surficial water table aquifer, an underlying discontinuous confining unit, and the Floridan Aquifer system.

Plio-Pleistocene Age Sands comprise much of the surficial aquifer across the county. These deposits consist of sand and shell sand, which range in thickness from 2 to more than 50 ft. Scott (1981) reports that the average Plio-Pleistocene Age deposits are 25 ft thick in the vicinity of the site. The Plio-Pleistocene Age deposits are not generally an important source of water because high quality potable water can be obtained from underlying limestone units.

Throughout much of Citrus County the surficial sands are underlain by blue-gray clays and interbedded marine sands of the Hawthorn Group of middle to late Miocene Age. Where present, these units serve as a regional confining layer, restricting the vertical migration of groundwater between the surficial aquifer and the underlying confined carbonate aquifer. The thickness of the Hawthorn Group in the vicinity of the site ranges from between 0 to 50 feet (Scott and MacGill, 1981). Due to the confining characteristics of the Hawthorn Group, the area of the subject property is within a zone of generally "no recharge" to the Floridan Aquifer. However, where the Hawthorn Group is not present, recharge to the Floridan Aquifer may occur.

Beneath the surficial aquifer and confining unit sediments, carbonate deposits are encountered which comprise the Floridan aquifer system. The top of the Floridan aquifer system is generally considered to be the Eocene Age Ocala Formation (Scott, 1992). The characteristic karst features of the Ocala Formation can be seen in many of the area springs.

## **4.0 CONTAMINATION ASSESSMENT ACTIVITIES**

All sampling and decontamination procedures were performed in accordance with Streamline Environmental's FDEP approved Quality Assurance Plan No 930289.

### **4.1 VADOSE ZONE INVESTIGATION**

Ten soil borings were installed in the vadose zone in the vicinity of the UST system for the purpose of delineating the extent of petroleum hydrocarbon contamination in the soil. Boring and sampling methods, boring placement rationale, and organic vapor analysis (OVA) results are discussed in this section.

#### **4.1.1 Soil OVA Analysis**

Soil screening and sampling was performed on February 16, 2000. All soil borings were installed using a decontaminated stainless-steel bucket auger. A concrete coring machine was utilized as necessary to penetrate the concrete and asphalt surface cover. Soil samples were collected at approximately 2 ft depth intervals and placed in clean half-full 16 ounce glass jars for Organic Vapor Analysis (OVA) analysis. The water table was encountered in most soil borings at a depth of 8 ft below land surface (bls). Soil samples were analyzed using a field-calibrated Porta-Fid OVA according to FAC Chapter 62-770 guidelines for assessment and remediation of petroleum impacted soil. The OVA was calibrated at the beginning and end of each sampling day. Each soil sample was screened for the presence of methane/ethane using a fresh activated charcoal filter. Soil boring logs are included in Appendix B. All soil borings were backfilled immediately after completion, and the surface cover (concrete or asphalt) was restored. The bucket auger was properly decontaminated between each sampling location.

Soil boring locations were chosen with regard to potential sources of petroleum discharge including the UST area, product piping, and fuel dispensers. Soil borings B-1 through B-6 were located immediately adjacent to the UST area. Soil borings B-7 through B-10 were placed around the fuel dispensers and product piping. Soil boring locations are shown on Figure 3.

The results of the vadose zone investigation found no excessively contaminated soil (net OVA reading > 500 ppm) in the vicinity of the USTs or fuel dispensers. The highest OVA readings were at 8 ft depth from borings B2 and B3, which had 19 ppm and 76 ppm respectively. Both of these samples were collected from the capillary fringe of the water table. Soil OVA results are tabulated on Table 1.

#### **4.1.2 Soil Sampling for Laboratory Analysis**

One soil sample was collected (February 16, 2000) for laboratory analysis from a depth of 70 ft bls at the location of B-3. This location was selected based on OVA readings. The

sample was analyzed by SunLabs, Inc (CompQAP No. 970077) for EPA method 8021, 8100, and FLPRO parameters. Laboratory results are summarized on **Table 2**. The laboratory report is included in **Appendix C**. As shown, petroleum compounds were not detected in the sample, with the exception of 5.4 mg/kg TRPH. This level is well below the soil cleanup target level of 340 mg/kg.

## **4.2 GROUNDWATER INVESTIGATION**

### **4.2.1 Monitoring Well Installation**

Prior to the SA, the site had four shallow monitoring wells in the area of the tank pit which served to comply with the State leak detection requirements. In addition, four additional permanent shallow wells (MW-5 through MW-8, 14 ft total depth) and one double-cased deep well (DW-1, 30 ft total depth) were installed by National Environmental Services Company (NESCO) using a truck-mounted drill rig and decontaminated hollow stem auger. Well locations are shown in **Figure 4**.

Each of the shallow wells consisted of 2-inch diameter PVC and included a 10 ft section of 0.01" slotted well screen. A 5 ft well screen was used for the deep well. A 20/30 grade sand filter pack was placed around the screened interval of each well annulus to approximately 1 ft above the screened intervals. An additional 2 ft of 30/65 fine sand was placed above the 20/30 sand filter packs and the wells annuli were grouted to land surface. The wells were completed at land surface with 8-inch diameter steel manhole covers that were secured in 24-inch square concrete pads. Boring logs including well completion diagrams are included in **Appendix B**.

After installation, all wells were developed until the water ran clear and free of sediment using a decontaminated submersible pump. The development water and soil cuttings were screened for contamination using an OVA prior to spreading onsite. Contamination was not detected in any of the investigation derived wastes.

### **4.2.2 Groundwater Flow Direction**

The top-of-casing of each well was surveyed to a relative site benchmark. Depth to water measurements were collected from each well on February 29 and April 4, 2000. Groundwater elevation data are summarized on **Table 3**. Water table elevation maps are included as **Figures 5 and 6**. As shown, the water table surface is too flat to contour. However, regionally groundwater flows west towards the Gulf of Mexico. Comparison of water table elevation data from the shallow wells and the deep well indicate no downward vertical hydraulic gradients. In fact, the deep well had the highest water table elevation of all the wells for each measurement event.

### 4.2.3 Groundwater Sampling and Analysis

#### Purging

Prior to sampling, each well was purged a minimum of five well volumes using a decontaminated Teflon™ bailer in order to obtain representative groundwater samples. In addition, each well was checked for the presence of free-floating hydrocarbon. Free floating hydrocarbon was not encountered in any of the wells.

#### Sampling

Groundwater samples were collected on February 29, 2000 using a decontaminated Teflon™ bailer and transferred to laboratory supplied, pre-preserved containers. All samples were packed on ice in a cooler and transported to Sun Laboratories, Inc. for analysis. Two of the source area wells (MW-1 and MW-4) were tested using a broad range of parameters including EPA Methods 601, 602, 610, FLPRO, Lead and EDB. The remaining wells were sampled for EPA Method 602 and 610 parameters, and FLPRO only. Proper chain of custody was maintained. Groundwater sampling collection forms with purgewater volume calculations are included in **Appendix D**.

#### Results

Sampling results found concentrations of petroleum constituents that exceed GCTLs at monitoring wells MW-1 and MW-4. The most elevated petroleum concentrations were found in the groundwater sample collected from monitoring well MW-1, which had 900 micrograms per liter (ug/L) benzene and 1400 ug/L ethylbenzene. MW-1 also had low levels of several polynuclear aromatic hydrocarbons. The groundwater sample collected from MW-4 had 12 ug/L benzene and 33 ug/L ethylbenzene. MW-4 also had 8 ug/L chlorobenzene and 5.5 ug/L MTBE. With the exception of the low levels of petroleum range organics and semi-volatile organics detected in MW-5, petroleum constituent concentrations were all below laboratory detection limits in the remaining monitoring wells. Groundwater analytical results are summarized on **Table 4**. The laboratory report including chain of custody is included in **Appendix C**.

Based on the average concentration of TRPH in MW-1, MW-4, and MW-5 (2533 ug/L), an estimated area of impact of 50 ft by 50 ft by 10 ft thickness, and a porosity of 0.4, the mass of hydrocarbons in the groundwater is estimated at less than 2 pounds.

### 4.3 SITE GEOLOGY

The shallow geology at the site consists of primarily fine grained sand and slightly silty sand from land surface to approximately 18 ft below land surface (bls). Sandy clay to clayey sand was encountered from approximately 18 to 20 ft bls. Limestone was encountered from 20 ft to maximum boring depth of 30 ft. Depth to water ranged from approximately 9 to 10 ft bls.

#### **4.4 CONTAMINANT TRANSPORT MECHANISMS**

Data indicate that the primary contaminant transport mechanism is natural horizontal and vertical hydraulic gradients within the surficial aquifer. The results of the study found no evidence of preferential contaminant transport pathways.

#### **4.5 AQUIFER CLASSIFICATION**

The surficial aquifer in Citrus County is classified as G-II according to the Southwest Florida Water Management District (SWFWMD, 1988). G-II aquifers are defined as non-single source aquifers that have total dissolved solids (TDS) concentrations in groundwater less than 10,000 mg/L.

#### **4.6 POTABLE WELL SURVEY**

A potable water well survey was conducted for a 0.25 mile radius surrounding the site to determine locations of area water wells. The well survey included a visual reconnaissance of the site vicinity and a potable well listing provided by the SWFWMD. The well permit listing is included in Appendix F. Although the permit listing identified no public supply or other wells within 0.5 mile of the property, results of the area reconnaissance indicated that all businesses and residents in the immediate site vicinity utilize private water wells for their drinking water supplies. In addition, all the drinking water wells appear to be constructed in the Floridan Aquifer. A Potable Water Well location map is included as Figure 10.

The nearest water well to the subject property is the one that services the plaza, which is located approximately 200 ft west of the impacted area.

#### **4.7 AQUIFER TESTING**

Slug tests were performed in monitoring wells MW-5, MW-6 and MW-8 to estimate the aquifer parameters of hydraulic conductivity (K), transmissivity (T), and linear velocity (V) in the surficial aquifer. Slug tests were performed using the "slug out" method developed by Bouwer and Rice (1976) and Bouwer (1989). Field procedures utilized a bailer to lower the water table in the wells. Water table rise was recorded manually using an electronic water level indicator, stop watch, and tape recorder.

##### Hydraulic Conductivity

The slug test data were analyzed using AQTESOLV™ (Geraghty & Miller, 1989) based on methods developed by Bouwer and Rice (1976 and 1989). This method follows the general equation

$$Q = 2\pi KL \frac{y}{\ln(Re/rw)}$$

Where,

Q = flow rate into the well  
K = hydraulic conductivity  
L = screen length  
y = drawdown  
Re = effective radius over which y is dissipated (length)  
rw = borehole diameter

Slug testing results are summarized on **Table 6**. Slug test data and time-drawdown curves are included in **Appendix E**. Average hydraulic conductivity was calculated to be  $2.31 \times 10^{-5}$  ft/sec (2.0 ft/day).

Transmissivity

Transmissivity values were calculated using the equation  $T = Kb$  (Freeze and Cherry, 1979)

Where,            T = Transmissivity (m<sup>2</sup>/sec)  
                      K = Hydraulic Conductivity (m/sec)  
                      b = Aquifer Thickness (m)

Based on an estimated surficial aquifer thickness of 10 ft, average transmissivity was calculated to be  $2.31 \times 10^{-5}$  ft<sup>2</sup>/sec (2 ft<sup>2</sup>/day)

Linear Velocity

Linear velocity was calculated using the equation  $V = K/n(i)$  (Freeze and Cherry, 1979)

Where,            V = Linear velocity (m/sec)  
                      K = Hydraulic Conductivity (m/sec)  
                      n = Porosity (unitless)  
                      i = hydraulic gradient (unitless)

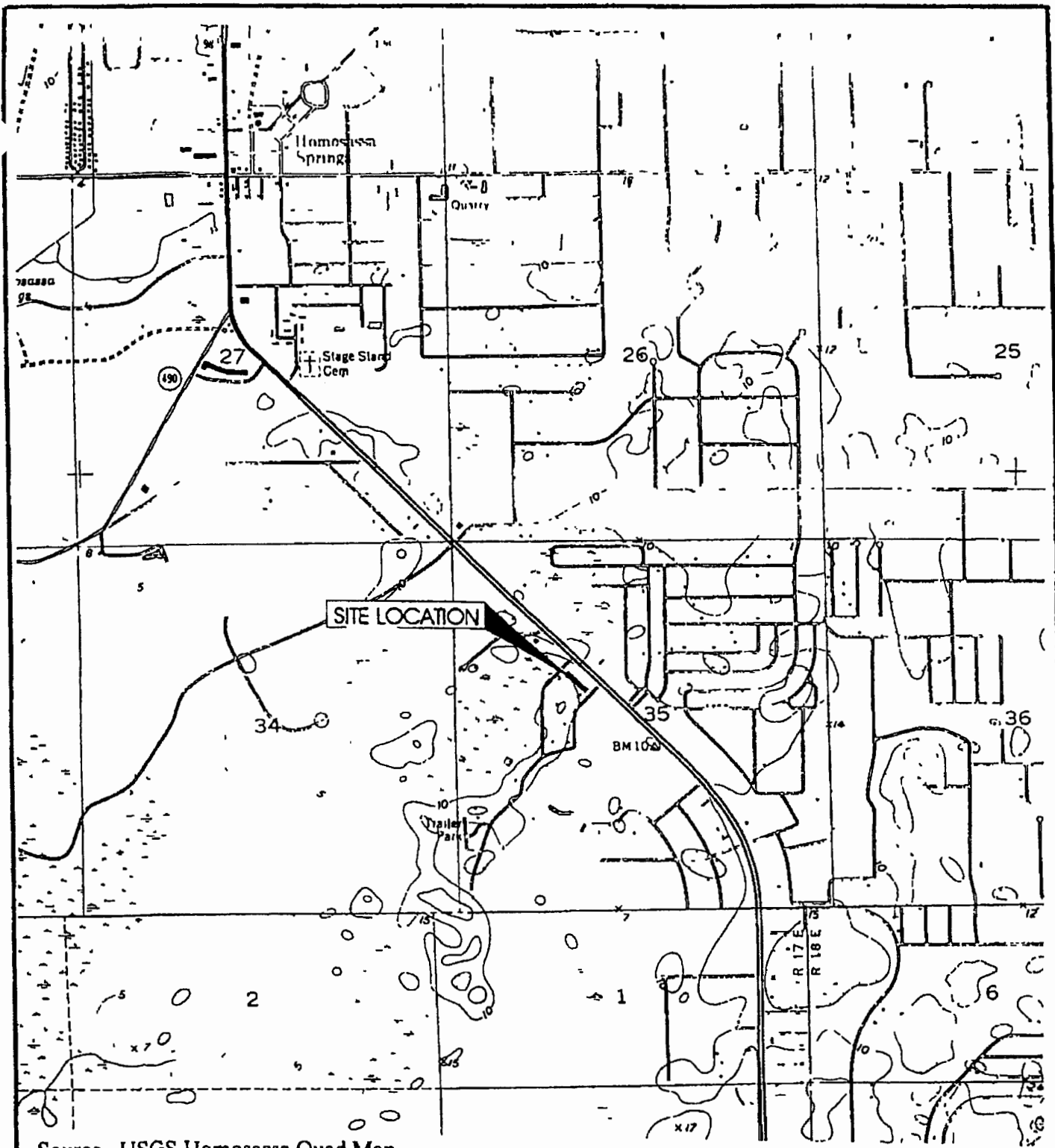
Based on an estimated porosity of 0.4 (Freeze and Cherry, 1979) and a gradient of 0.001 ft/ft, the average groundwater flow velocity is  $6.4 \times 10^{-8}$  ft/sec (0.005 ft/day). Please note that the actual hydraulic gradient used in the calculation is approximate only and not site specific because the water table is essentially flat.

## **5.0 CONCLUSIONS**

The results of the contamination assessment indicate that petroleum compounds in the groundwater of the surficial aquifer exceed GTCLs for benzene and ethylbenzene in two of the compliance wells. Although the water table is essentially flat (i.e. low migration potential), potable water wells are located within 200 ft of the area of impact. As such, a Remedial Action Plan should be prepared followed by remediation. However, because the area of impact is limited, an Alternative Remedial Action may be warranted.

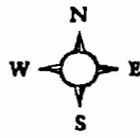
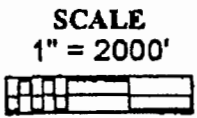
**FIGURES**





SITE LOCATION

Source USGS Homosassa Quad Map



**FIGURE 1  
SITE LOCATION MAP**

Quick Save Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida

DATE	3/16/00	FILE	Map	BY	LTF
------	---------	------	-----	----	-----

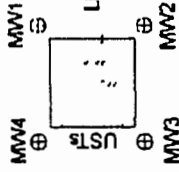
P A L A C E R O A D

GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

ASHALT  
PARKING  
LOT



GRASS

GRASS

GRASS

HWY 19 (U S 55)

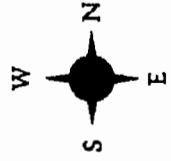
O A K R I D G E D R I V E

FIGURE 2  
SITE LAYOUT PLAN

Quicksave Discount Beverages  
5366 S Suncoast Blvd.  
Homosassa, Florida

DATE 2/15/00 FILE SITE BY LTF

APPROXIMATE SCALE  
1 INCH = 50 FEET



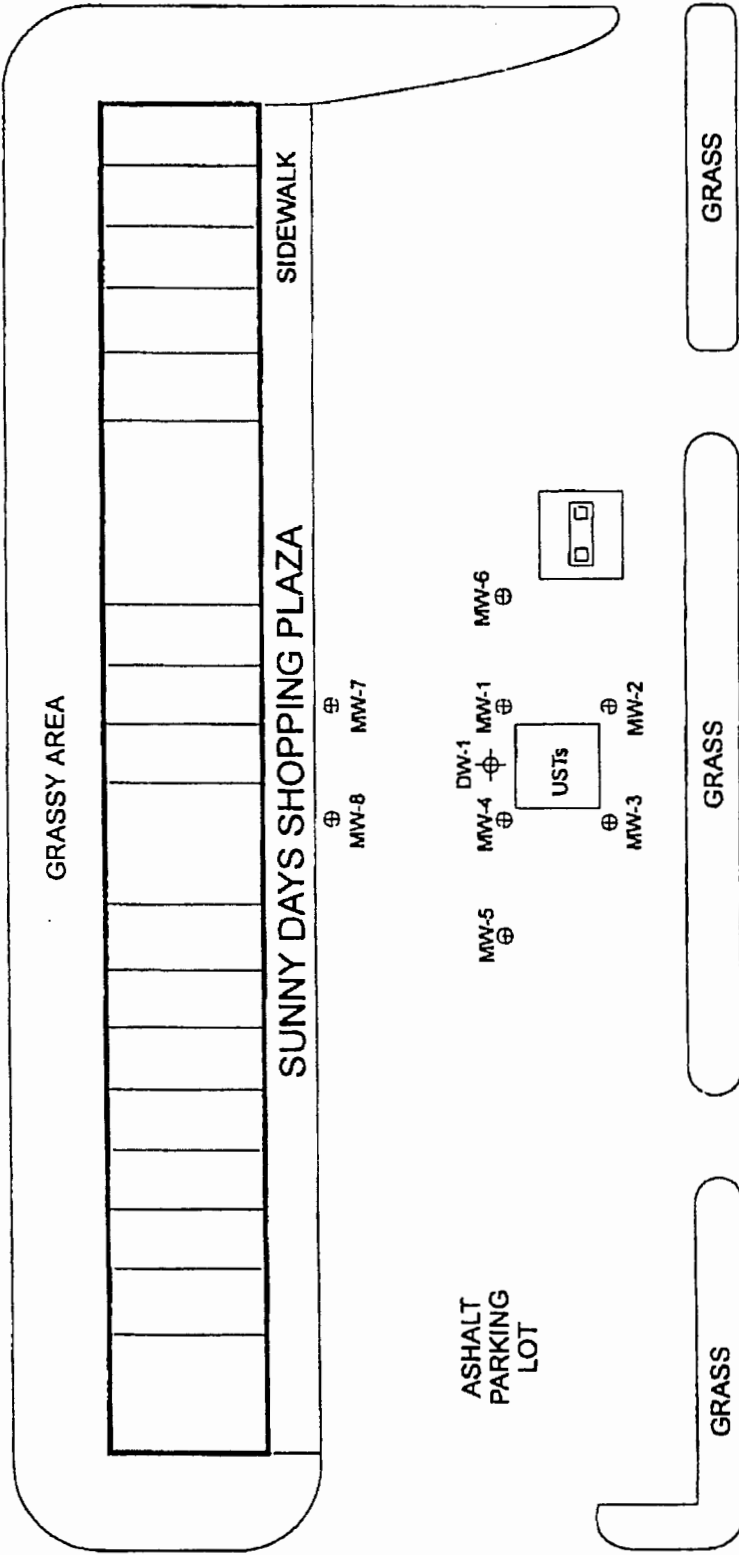
LEGEND

MW1 ⊕ = COMPLIANCE WELL LOCATION

STREAMLINE  
ENVIRONMENTAL

P A L A C E R O A D

O A K R I D G E D R I V E



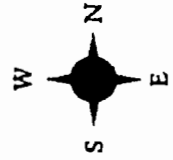
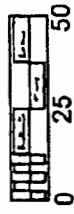
HWY 19 (U S 55)

FIGURE 4  
MONITORING WELL LOCATION PLAN

Quicksave Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida

DATE 2/16/08 FILE, Site BY LTF

APPROXIMATE SCALE  
1 INCH = 50 FEET



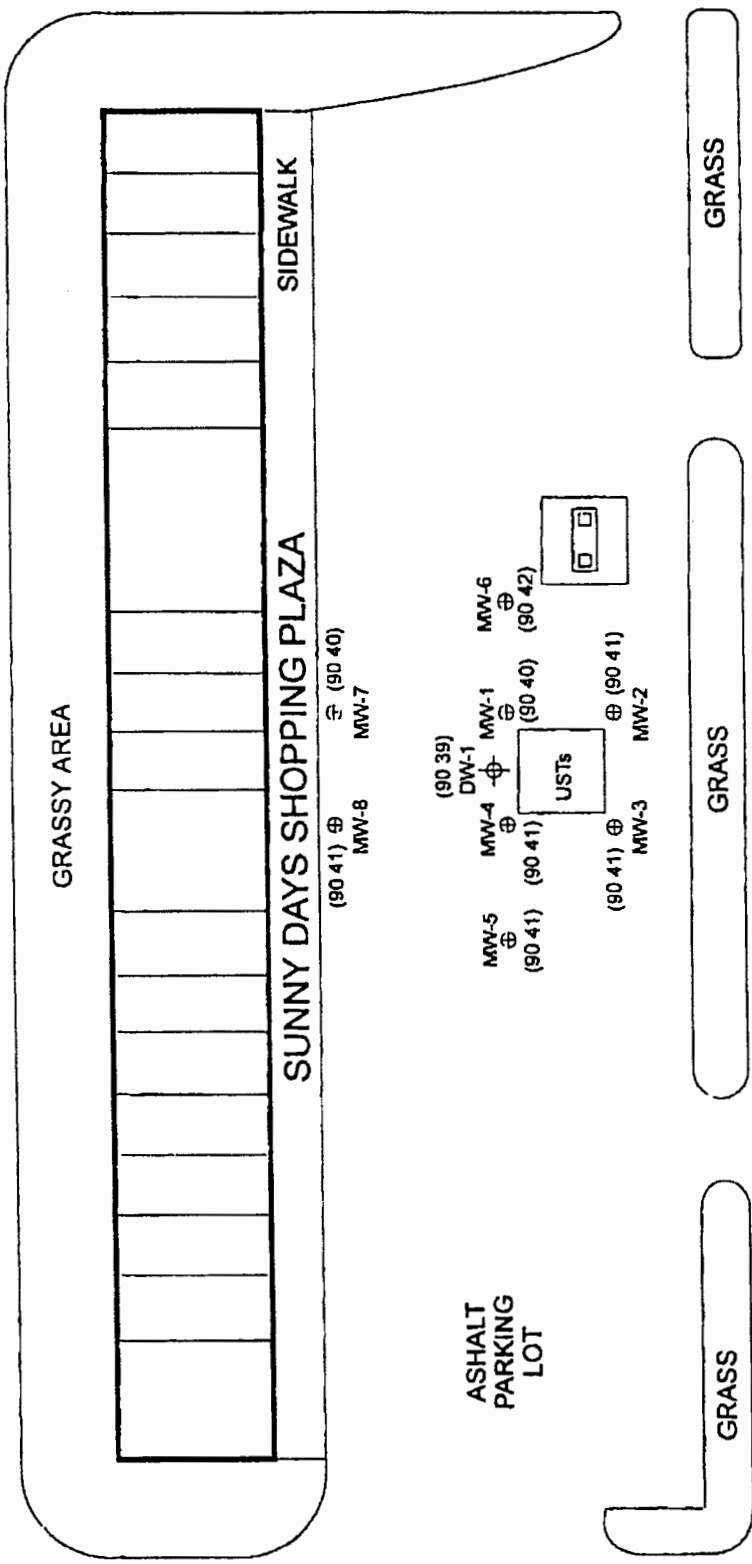
LEGEND

- ⊕ MW-1 = MONITORING WELL LOCATION
- ⊕ DW-1 = DEEP MONITORING WELL LOCATION



P A L A C E R O A D

O A K R I D G E D R I V E



HWY 19 (U S 55)

**FIGURE 6**  
**GROUNDWATER ELEVATION MAP- 4/4/2000**  
 Quicksave Discount Beverages  
 5366 S Suncoast Blvd  
 Homosassa, Florida

DATE 4/17/00 FILE SJC BY LTF

**LEGEND**  
 ⊕ MW-1 = MONITORING WELL LOCATION  
 ⊕- DW-1 = DEEP MONITORING WELL LOCATION

APPROXIMATE SCALE  
 1 INCH = 50 FEET

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**STREAMLINE ENVIRONMENTAL**

P A L L A C E R O A D

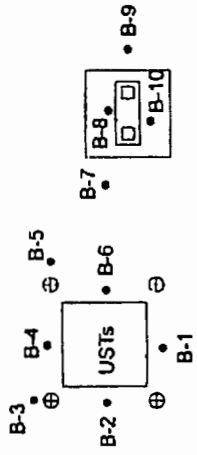
GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

O A K R I D G E D R I V E

ASHALT  
PARKING  
LOT



GRASS

GRASS

GRASS

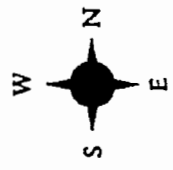
HWY 19 (U S 55)

**FIGURE 3**  
**BORING LOCATION PLAN**

Quicksave Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida

DATE: 2/16/00 FILE: Site BY: LTF

APPROXIMATE SCALE  
1 INCH = 50 FEET



**LEGEND**

- ⊕ = COMPLIANCE WELL LOCATION
- B-2 • = SOIL BORING LOCATION



P A L A C E R O A D

GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

O A K R I D G E D R I V E

ASHALT  
PARKING  
LOT

MW-8 (90 21) ⊕  
MW-7 (90 22) ⊕

MW-5 (90 25) ⊕  
MW-4 (90 21) ⊕  
MW-1 (90 25) ⊕  
DW-1 (90 18) ⊕  
MW-6 (90 22) ⊕  
USTs  
MW-3 (90 21) ⊕  
MW-2 (90 21) ⊕

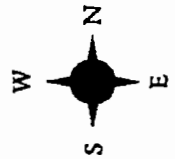
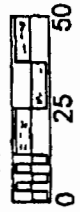
GRASS

GRASS

HWY 19 (U S 55)

GRASS

APPROXIMATE SCALE  
1 INCH = 50 FEET



**LEGEND**

⊕ MW-1 = MONITORING WELL LOCATION

⊕- DW-1 = DEEP MONITORING WELL LOCATION

FIGURE 5

GROUNDWATER ELEVATION MAP-2/29/2000

Quicksave Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida

DATE 2/16/00

FILE Site

BY LTF

**STREAMLINE**  
ENVIRONMENTAL

P A L A C E R O A D

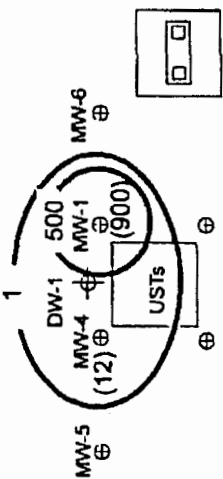
GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

O A K R I D G E D R I V E

ASHALT  
PARKING  
LOT



GRASS

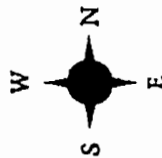
GRASS

GRASS

HWY 19 (U S 55)

APPROXIMATE SCALE

1 INCH = 50 FEET



LEGEND

(900) = BENZENE CONCENTRATION (ug/L)

— = BENZENE CONCENTRATION CONTOUR

FIGURE 7  
BENZENE CONCENTRATION MAP

Quicksave Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida

DATE 4/17/00

FILE Site

BY JTF

**STREAMLINE**  
ENVIRONMENTAL

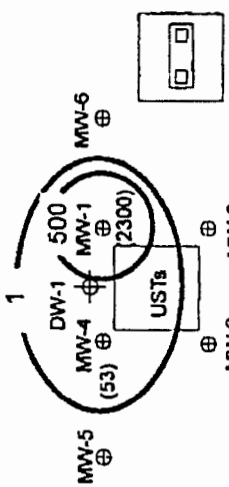
P A L A C E R O A D

GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

ASHALT  
PARKING  
LOT



GRASS

GRASS

GRASS

HWY 19 (U S 55)

O A K R I D G E D R I V E

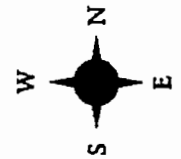
FIGURE 8  
TVOA CONCENTRATION MAP

Quicksave Discount Beverages  
5366 S Suncoast Blvd.  
Homosassa, Florida

DATE 4/17/00 FILE SIZE BY LTF

SCALE

1 INCH = 50 FEET



LEGEND

(2300) = TOTAL VOLATILE AROMATICS (TVOA, ug/L)

— = TVOA CONCENTRATION CONTOUR





P A L A C E R O A D.

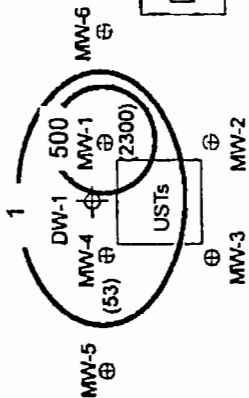
GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

ASHALT  
PARKING  
LOT

MW-8 MW-7



GRASS

GRASS

GRASS

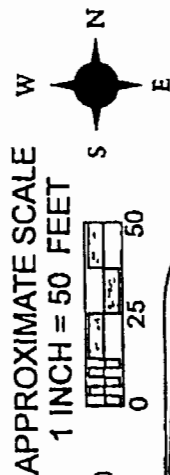
HWY 19 (U S 55)

O A K R I D G E D R I V E

FIGURE 8  
TVOA CONCENTRATION MAP

Quicksave Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida

DATE: 4/17/00 FILE: SITE BY: LTF



LEGEND

(2300) = TOTAL VOLATILE AROMATICS - (TVOA, ug/L)

— = TVOA CONCENTRATION CONTOUR

STREAMLINE ENVIRONMENTAL

MW-8 ⊕ MW-7 ⊕

CROSS-SECTION LINE  
A ⊕ MW-5 ⊕ MW-4 ⊕ DW-1 ⊕ MW-1 ⊕ MW-6 ⊕ B

USTs

MW-3 ⊕ MW-2 ⊕

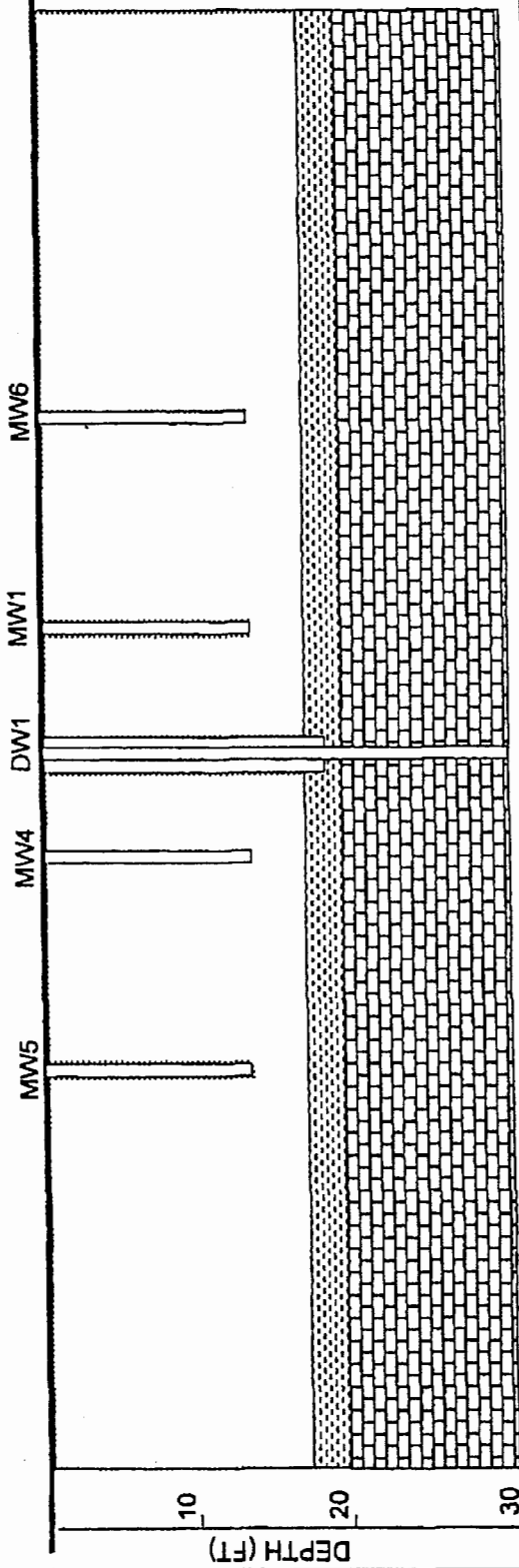
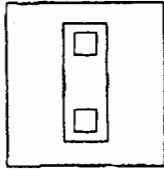
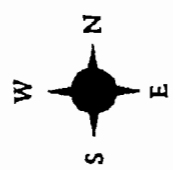


FIGURE 9  
GEOLOGIC CROSS SECTION

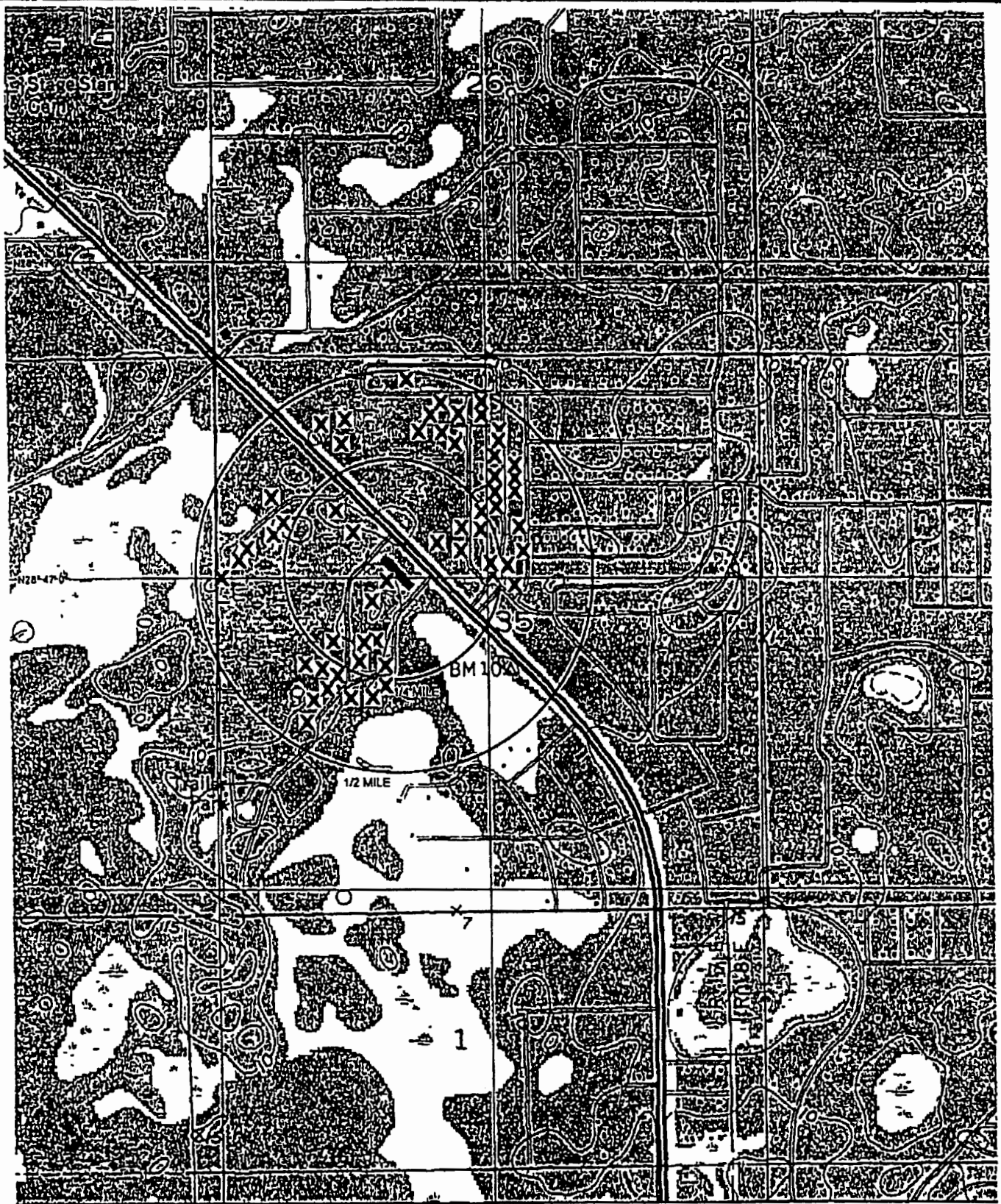
Quicksave Discount Beverages  
5366 S Suncoast Blvd  
Homosassa, Florida



DATE 2/16/00 FILE Site BY, LTF

- LEGEND**
- Tan to orange fine sand with trace silt
  - Gray to blue-gray sandy clay to clayey sand
  - Tan fossiliferous limestone





X = ESTIMATED WATER WELL LOCATION

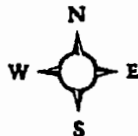


FIGURE 10  
POTABLE WELL LOCATION MAP

Quick Save Discount Beverages  
5366 S Suncoast Blvd, Homosassa

DATE 4/17/00 FILE well BY CRS

**STREAMLINE**  
ENVIRONMENTAL

**TABLES**

**TABLE 1  
SOIL OVA DATA  
DISCOUNT BEVERAGES**

Location	Depth (ft)	Total OVA Response	Filtered OVA Response	Net OVA Response
B-1	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-2	2	0	0	0
	4	0	0	0
	6	0	0	0
	8*	23	4	19
B-3	2	0	0	0
	4	0	0	0
	6	0	0	0
	8*	80	4	76
B-4	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-5	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-6	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-7	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-8	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-9	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0
B-10	2	0	0	0
	4	0	0	0
	6	0	0	0
	8	0	0	0

\* = wet sample

**NOTES**

All readings measured in parts per million, ppm

Net OVA reading = Total reading - Filtered reading

**TABLE 2  
SOIL ANALYTICAL DATA  
DISCOUNT BEVERAGES**

PARAMETER	UNITS	REGULATORY STANDARDS (1)	REGULATORY STANDARDS (2)	B3.7
<b>VOLATILE ORGANIC COMPOUNDS</b>				
MTBE	mg/kg	3200	0.2	BDL
Benzene	mg/kg	1.1	0.007	BDL
Toluene	mg/kg	380	0.5	BDL
Ethylbenzene	mg/kg	1100	0.6	BDL
Total Xylenes	mg/kg	5900	0.2	BDL
<b>POLYNUCLEAR AROMATIC HYDROCARBONS</b>				
Acenaphthene	mg/kg	1900	2.1	BDL
Acenaphthylene	mg/kg	1100	27	BDL
Anthracene	mg/kg	18000	2500	BDL
Benzo(a)anthracene	mg/kg	1.4	3.2	BDL
Benzo(a)pyrene	mg/kg	0.1	8	BDL
Benzo(b)fluoranthene	mg/kg	1.4	10	BDL
Benzo(g,h,i)perylene	mg/kg	2300	32000	BDL
Benzo(k)fluoranthene	mg/kg	15	25	BDL
Chrysene	mg/kg	140	77	BDL
Dibenzo(a,h)anthracene	mg/kg	0.1	30	BDL
Fluoranthene	mg/kg	2900	1200	BDL
Fluorene	mg/kg	2200	160	BDL
Indeno(1,2,3-c,d)pyrene	mg/kg	1.5	28	BDL
Naphthalene	mg/kg	40	1.7	BDL
1-Methylnaphthalene	mg/kg	68	2.2	BDL
2-Methylnaphthalene	mg/kg	80	6.1	BDL
Phenanthrene	mg/kg	2000	250	BDL
Pyrene	mg/kg	2200	880	BDL
<b>FLORIDA PETROLEUM RANGE ORGANICS</b>				
Petroleum Range Organics	mg/kg	340	340	5.4

NOTES \* = Unregulated Compound

(1) = FDEP 62-770, Table IV Selected Soil Cleanup Target Levels (for direct exposure based on residential use assumptions)

(2) = FDEP 62-770, Table IV Selected Soil Cleanup Target Levels (for ground water resource protection / recovery)

**TABLE 3**  
**GROUNDWATER ELEVATION DATA**  
**DISCOUNT BEVERAGES**

Location	TOC* Elevation (ft)	2/29/2000		4/4/2000	
		Depth to Water (ft)	Water Table Elevation (ft)	Depth to Water (ft)	Water Table Elevation (ft)
MW-1	100 00	9 75	90 25	9 60	90 40
MW-2	99 83	9 62	90 21	9 42	90 41
MW-3	99 40	9 19	90 21	8 99	90 41
MW-4	99 60	9 39	90 21	9 19	90 41
MW-5	99 59	9 34	90 25	9 18	90 41
MW-6	100 17	9 95	90 22	9 75	90 42
MW-7	100 39	10 35	90 22	9 99	90 40
MW-8	100 39	10 18	90 21	9 98	90 41
MW-1D	99 99	9 81	90 18	9 60	90 39
NOTE	* Top of casing (TOC) elevations surveyed to assumed vertical datum				

**TABLE 5**  
**MONITORING WELL CONSTRUCTION DETAILS**  
**DISCOUNT BEVERAGES**

Well	TOC Elevation (ft)	Total Depth (ft)	Screen Length (ft)	Slot Size (in)	Sand Pack	Seal
MW1	100 00	14 00	unknown	0 01	20/30	30/65 Sand
MW2	99 83	14 00	unknown	0 01	20/30	30/65 Sand
MW3	99 40	14 00	unknown	0 01	20/30	30/65 Sand
MW4	99 60	14 13	unknown	0 01	20/30	30/65 Sand
MW5	99 59	14 00	10	0 01	20/30	30/65 Sand
MW6	100 17	14 00	10	0 01	20/30	30/65 Sand
MW7	100 57	14 00	10	0 01	20/30	30/65 Sand
MW8	100 39	14 00	10	0 01	20/30	30/65 Sand
MW-1D	99 99	30 00	5	0 01	20/30	30/65 Sand
NOTES	* Top of casing (TOC) elevations surveyed to assumed vertical datum					



**TABLE 6**  
**AQUIFER TESTING RESULTS**  
**DISCOUNT BEVERAGES**

Location	Hydraulic Conductivity (ft/sec)	Transmissivity (ft <sup>2</sup> /sec)	Linear Velocity (ft/sec)
MW5	8.78E-06	8.78E-05	2.93E-09
MW6	3.75E-05	3.75E-04	1.25E-07
MW8	6.08E-05	6.08E-04	2.03E-07
Average	2.31E-05	2.31E-04	6.40E-08

TO: Leslie Pedigo  
Southwest District Office

FROM: Tom Conrardy, PE *TC*  
Professional Engineer Administrator  
Bureau of Petroleum Storage Systems

DATE: July 16, 2001

SUBJECT: Quick Save Discount Beverages  
5366 South Suncoast Boulevard  
Homosassa, Citrus County, Florida,  
FDEP Facility No. 098503115  
Limited Remedial Action Plan

---

I have reviewed the RAP Addendum dated May 21, 2001 which responded to my comments on the Limited Scope RAP referenced above. The response to comments is acceptable and I recommend approval of the Limited Scope RAP. Attached is my professional engineer certification for you to attach to the RAP Approval Order. Please contact me if you have any questions at (850) 488-3935 or e-mail me.

Attachment

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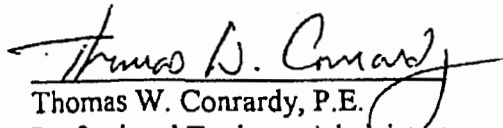
P.E. CERTIFICATION

Remedial Action Plan for Quick Save Discount Beverages, located at 5366 South Suncoast Boulevard, FDEP Facility ID# 098503115.

I hereby certify that in my professional judgment, the components of this Remedial Action Plan satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the engineering design features incorporated in this plan provide reasonable assurances of achieving the objectives stated in Chapter 62-770, F.A.C., for active remediation. However, I have not evaluated and do not certify aspects of this plan that are outside my area of expertise (including, but not limited to, electrical, mechanical, and structural features).

X I personally completed this review.

\_\_\_ This review was conducted by \_\_\_\_\_  
working under my direct supervision.

  
Thomas W. Conrardy, P.E.  
Professional Engineer Administrator  
Petroleum Cleanup Section Three

7/16/04  
Date

## EXECUTIVE SUMMARY

### Tank History

Four, 4,000 gallon capacity USTs, each containing unleaded gasoline, were installed on the property in 1977. The steel tanks have since been upgraded and have internal lining, cathodic protection, and spill containment. The steel, suction piping system is cathodically protected.

### Discovery of Contamination

Petroleum contamination was first detected at the facility during Phase II Environmental Site Assessment activities in December, 1999. As part of the phase II investigation, groundwater samples were collected from the four compliance wells surrounding the tank pit area. Laboratory analysis of the samples found concentrations of petroleum constituents (benzene, ethylbenzene, toluene and total xylenes) that exceed Groundwater Cleanup Target Levels (GCTLs). A Discharge Reporting Form (DRF) was submitted to the FDEP in response to the discovery of contamination. In addition, pressure testing of the petroleum system was conducted, which identified no leaks. As such the source of contamination was probably a small spill. In addition, because the study found little MTBE, the spill was probably old.

### Soils Investigation

Ten soil borings were performed to delineate the extent of petroleum impacts in the vadose zone. Soil gas survey results found no excessively contaminated soils (OVA reading > 500 ppm). One sample was collected for laboratory analysis from the area of highest OVA readings. No evidence of adverse petroleum impacts was detected in the soil sample analyzed.

### Groundwater Flow Direction

Two rounds of water table elevation data were collected during the study. Depth to water ranged from 9 to 10 ft below land surface. The surface of the water table is too flat to contour. Regionally, groundwater flows west to the Gulf of Mexico. No significant vertical hydraulic gradient was found.

### Groundwater Investigation

Prior to the site assessment, four shallow monitoring wells were located in the area of the tank pit. Streamline installed four additional permanent shallow wells (14 ft total depth) and one double-cased deep well (30 ft total depth). Two of the source area wells (MW-1 and MW-4) were tested for the entire kerosene analytical group. The remaining wells were sampled for EPA Method 602 and 610 parameters, and FLPRO only.

Groundwater sampling results found concentrations of volatile organic compounds (Benzene and Ethylbenzene) that exceed Groundwater Cleanup Target Levels in 2 wells. Contaminants were not detected in the deep well installed into the Upper Floridan Aquifer. The contaminated area is approximately 50 ft by 50 ft by 10 ft thick.

### Hydrogeology

The shallow geology at the site consists of primarily fine grained sand and slightly silty sand from land surface to approximately 18 ft below land surface (bls). Sandy clay to clayey sand was found between 18 and 20 ft bls. Fossiliferous limestone was found from 20 ft bls to maximum boring depth of 30 ft


### Water Well Survey

Area residents and businesses, including the subject property, rely on groundwater for their drinking water. Although the Southwest Florida Water Management District had little information on wells in the immediate site vicinity, an area reconnaissance identified water wells at nearly all residences in the vicinity. The nearest water well to the source area is located approximately 200 ft to the west.

### Conclusions and Recommendations

The results of the Site Assessment indicate that groundwater in the surficial aquifer has been impacted by petroleum hydrocarbons, and that the level of impact exceeds the groundwater cleanup target levels. However, the magnitude and extent of impacts appears to be limited and rate of migration appears to be very slow. As such, a Remedial Action Plan should be prepared to determine the most practical and cost-effective remediation strategy for the site. Because the size of the contaminated area is relatively small, an Alternative Remedial Action (such as short term air sparging and soil vapor extraction) may be effective at reducing contaminant levels to within Natural Attenuation levels.

TO: Leslie Pedigo  
Southwest District Office

FROM: Tom Conrardy, PE   
Professional Engineer Administrator  
Bureau of Petroleum Storage Systems

DATE: July 16, 2001

SUBJECT: Quick Save Discount Beverages  
5366 South Suncoast Boulevard  
Homosassa, Citrus County, Florida,  
FDEP Facility No. 098503115  
Limited Remedial Action Plan

---

I have reviewed the RAP Addendum dated May 21, 2001 which responded to my comments on the Limited Scope RAP referenced above. The response to comments is acceptable and I recommend approval of the Limited Scope RAP. Attached is my professional engineer certification for you to attach to the RAP Approval Order. Please contact me if you have any questions at (850) 488-3935 or e-mail me.

Attachment

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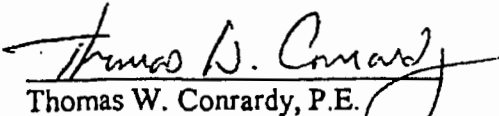
P.E. CERTIFICATION

Remedial Action Plan for Quick Save Discount Beverages, located at 5366 South Suncoast Boulevard, FDEP Facility ID# 098503115.

I hereby certify that in my professional judgment, the components of this Remedial Action Plan satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the engineering design features incorporated in this plan provide reasonable assurances of achieving the objectives stated in Chapter 62-770, F.A.C., for active remediation. However, I have not evaluated and do not certify aspects of this plan that are outside my area of expertise (including, but not limited to, electrical, mechanical, and structural features).

X I personally completed this review.

\_\_\_\_\_ This review was conducted by \_\_\_\_\_  
working under my direct supervision.

  
Thomas W. Conrardy, P.E.  
Professional Engineer Administrator  
Petroleum Cleanup Section Three

7/16/04  
Date

# 26496

**D.E.P.**  
FEB 19 2002  
Southwest District Tampa

**QUARTER TWO  
GROUNDWATER MONITORING REPORT  
QUICK SAVE DISCOUNT BEVERAGE  
5366 S. SUNCOAST BOULEVARD  
HOMOSASSA, FLORIDA 34446**

**FDEP ID NO. 98503115**

*Prepared For:*

**QUICK SAVE DISCOUNT BEVERAGES  
5366 S. SUNCOAST BOULEVARD  
HOMOSASSA, FLORIDA 34446**

**RECEIVED**  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
02 MAR -4 AM 10: 25  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER

*Prepared By:*

**STREAMLINE ENVIRONMENTAL  
519 NORTH HOWARD AVENUE  
TAMPA, FLORIDA 33606**

**BUREAU OF PETROLEUM,  
STORAGE SYSTEMS**  
02 MAR -4 PM 12: 01  
PETROLEUM CLEANUP SECTION 3

**FEBRUARY 2002**




**STREAMLINE PROJECT NO. 000206**



## PROFESSIONAL CERTIFICATION

This Quarterly Groundwater Monitoring Report for Quick Save Discount Beverages has been prepared by a Professional Geologist registered in the State of Florida.



Prepared by:  
Gabrielle M. Enos, P.G. #605  
Senior Geologist

Date: 2/18/02

## TABLE OF CONTENTS

1.0	INTRODUCTION.....	1
2.0	GROUNDWATER MONITORING.....	1
2.1	Groundwater Flow Direction.....	2
2.2	Groundwater Quality.....	2
3.0	CONCLUSIONS.....	3

## LIST OF FIGURES

- 1 SITE LOCATION MAP
- 2 SITE LAYOUT PLAN
- 3 GROUNDWATER ELEVATION MAP -- 1/9/02
- 4 BTEX CONCENTRATIONS IN GROUNDWATER
- 5 PAH CONCENTRATIONS IN GROUNDWATER

## LIST OF TABLES

- 1 GROUNDWATER ELEVATION DATA
- 2 GROUNDWATER ANALYTICAL DATA
- 3 VARIANCE MONITORING DATA

## LIST OF APPENDICES

- A. LABORATORY ANALYTICAL REPORT -- 1/9/02
- B. GROUNDWATER SAMPLING DATA SHEETS

## 1.0 INTRODUCTION

The subject property is located in Citrus County at the physical address of 5366 South Suncoast Blvd. in Homosassa, Florida. Geographically, the site is located in Section 35, Township 19 South, Range 18 East. A Topographic Site Location Map is included as **Figure 1**.

The subject property is a gas and convenience store centrally located in the Sunny Days Shopping Plaza. The property has approximate dimensions of 190 ft by 500 ft. The Sunny Days Plaza building is rectangular-shaped with approximate dimensions of 420 ft by 40 ft. An asphalt parking lot borders the east side of the plaza building. The USTs and fuel dispensers are located in the parking lot approximately 50 ft east of the plaza building. A Site Layout Plan is included as **Figure 2**.

A Site Assessment Report (SAR) for Quick Save Discount Beverages (facility ID No. 98503115) was completed by Streamline Environmental, Inc. in April, 2000. The Florida Department of Environmental Protection (FDEP) approved the SAR and the recommendation for a Remedial Action Plan (RAP) of limited scope in a letter dated September 12, 2000. The RAP, recommending enhancement of oxygen in the aquifer through injection of Oxygen Releasing Compound<sup>®</sup> (ORC<sup>®</sup>), was approved by the FDEP in correspondence dated July 19, 2001. The RAP Implementation was detailed in the first quarterly report dated November 21, 2001. This report details the results of the second quarterly sampling event following injection of the ORC<sup>®</sup>.

## 2.0 GROUNDWATER MONITORING

The second quarterly sampling event was conducted on January 9, 2002. All sampling was conducted in accordance with Streamline's FDEP approved Comprehensive Quality Assurance Plan (CompQAP #930289).

## **2.1 Groundwater Flow Direction**

Water level measurements were obtained from onsite wells on January 9, 2002. Elevation data previously collected at the site indicated an extremely flat water table. Data from the second sampling event confirms that the water table is flat, with only a 0.23 ft change in head measured in the shallow wells. Elevation data measured at well MW-1D is slightly lower than that measured in the majority of the shallow wells, indicating a slight downward vertical gradient. Groundwater elevations are shown on **Figure 3**, and summarized on **Table 1**.

## **2.2 Groundwater Quality**

Groundwater quality was evaluated through the collection and analysis of samples from wells MW-1, MW-2, MW-4, MW-6 and MW-7 for BTEX by EPA 8021 and polynuclear aromatic hydrocarbons (PAHs) using EPA 8310. Additionally, samples from wells MW-2, MW-5, MW-6 and MW-7 were analyzed for TDS and pH. All samples were submitted to *SunLabs, Inc.* for analysis.

Current groundwater analytical data, summarized on **Table 2**, indicate that groundwater in excess of Groundwater Cleanup Target Levels (GCTLs) is present at well MW-1. Parameters of concern were not detected in any of the remaining wells at concentrations above the laboratory method detection limits (MDL's). Benzene was detected in well MW-1 at a concentration of 270 micrograms per liter ( $\mu\text{g/L}$ ), and ethylbenzene was detected at a concentration of 590  $\mu\text{g/L}$ . Toluene, total xylenes and MTBE were also detected at in the samples collected from well MW-1, although the concentrations did not exceed the applicable GCTL's. Toluene was detected at a concentration of 3.0  $\mu\text{g/L}$ , while total xylenes were detected at 8.5  $\mu\text{g/L}$ . The MTBE concentration was 12  $\mu\text{g/L}$ .

PAH's detected at well MW-1 include acenaphthene (46  $\mu\text{g/L}$ ), acenaphthylene (42  $\mu\text{g/L}$ ), naphthalene (110  $\mu\text{g/L}$ ) and 1-methylnaphthalene (72  $\mu\text{g/L}$ ). BTEX and PAH concentrations are shown on **Figures 4 and 5**, respectively.

TDS concentrations indicate that the injection of ORC<sup>®</sup> has increased dissolved solids in the shallow aquifer. However, concentrations remain below the secondary drinking water standard of 500 mg/L established in Chapter 62-550 Florida Administrative Code (FAC). TDS concentrations have not decreased appreciably in any of the wells sampled. This result is probably due to the lack of groundwater flow in the injection zone across the site. The pH levels in wells MW-5, MW-6 and MW-7 remain outside the drinking water standard range of 6.5 – 8.5 pH units. However, the pH level at MW-5 has remained significantly higher than the baseline number established prior to the ORC<sup>®</sup> injection. Groundwater variance parameters are summarized on Table 3. The complete laboratory analytical report is contained in Appendix A. Groundwater sampling data sheets for the second quarterly event are contained in Appendix B.

### 3.0 CONCLUSIONS

The data obtained during the second quarterly sampling event indicate that while the ORC<sup>®</sup> injection initially aided in enhancing the natural attenuation of BTEX and PAH compounds, concentrations at well MW-1 have risen during the last quarter. Contaminant concentrations at well MW-4 have decreased below laboratory MDL's, and concentrations at the other wells have remained below MDL's. Additional monitoring will help in identifying if the ORC<sup>®</sup> injection was sufficient to reduce contaminant concentrations, or if additional enhancement of subsurface oxygen levels may be necessary.

Groundwater monitoring will continue at the Discount Beverage site in accordance with the approved RAP.

**TABLES**

TABLE 1.

**GROUNDWATER ELEVATION DATA  
QUICKSAVE DISCOUNT BEVERAGES**

Location	TOC Elevation (ft)	10/16/2001		1/9/2002	
		Depth to Water (ft)	Water Table Elevation (ft)	Depth to Water (ft)	Water Table Elevation (ft)
MW-1	99.89	8.28	91.61	8.98	90.91
MW-2	99.99	8.38	91.61	9.12	90.87
MW-3	99.49	7.87	91.62	8.61	90.88
MW-4	99.64	8.02	91.62	8.76	90.88
MW-5	99.59	7.95	91.64	8.67	90.92
MW-6	100.17	8.55	91.62	9.31	90.86
MW-7	100.39	8.97	91.42	9.70	90.69
MW-8	100.39	8.78	91.61	9.51	90.88
MW-1D	99.99	8.43	91.56	9.17	90.82

NOTE: \* Top of casing (TOC) elevations surveyed to assumed vertical datum



TABLE 2. GROUNDWATER ANALYTICAL DATA  
QUICKSAVE DISCOUNT BEVERAGES

PARAMETER	UNITS	GCTL	MW1	MW2	MW3	MW4	MW5	MW6	MW7	
VOLATILE ORGANIC COMPOUNDS (EPA METHOD 8021)										
MTBE	ug/L	50	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
Benzene	ug/L	1	900	<0.9	<0.9	<0.9	<0.9	<0.9	<0.9	<0.9
Toluene	ug/L	40	<1.2	<1.2	<1.2	<1.2	<1.2	<1.2	<1.2	<1.2
Ethylbenzene	ug/L	30	1400	<0.9	<0.9	<0.9	<0.9	<0.9	<0.9	<0.9
Total Xylenes	ug/L	20	<2.2	<2.2	<2.2	<2.2	<2.2	<2.2	<2.2	<2.2
Total VOA	ug/L	--	2300	<0.9	<0.9	<0.9	<0.9	<0.9	<0.9	<0.9
POLYNUCLEAR AROMATIC HYDROCARBONS (EPA METHOD 8310)										
Acenaphthene	ug/L	20	34	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Acenaphthylene	ug/L	210	46	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Anthracene	ug/L	2100	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Benzo(a)anthracene	ug/L	0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2
Benzo(a)pyrene	ug/L	0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2
Benzo(b)fluoranthene	ug/L	0.2	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Benzo(g,h,i)perylene	ug/L	210	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Benzo(k)fluoranthene	ug/L	0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
Chrysene	ug/L	4.8	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Dibenz(a,h)anthracene	ug/L	0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2
Fluoranthene	ug/L	280	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Fluorene	ug/L	280	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Indeno(1,2,3-c,d)pyrene	ug/L	0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2
Naphthalene	ug/L	20	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
1-Methylnaphthalene	ug/L	20	16	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
2-Methylnaphthalene	ug/L	20	17	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Phenanthrene	ug/L	210	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Pyrene	ug/L	210	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0

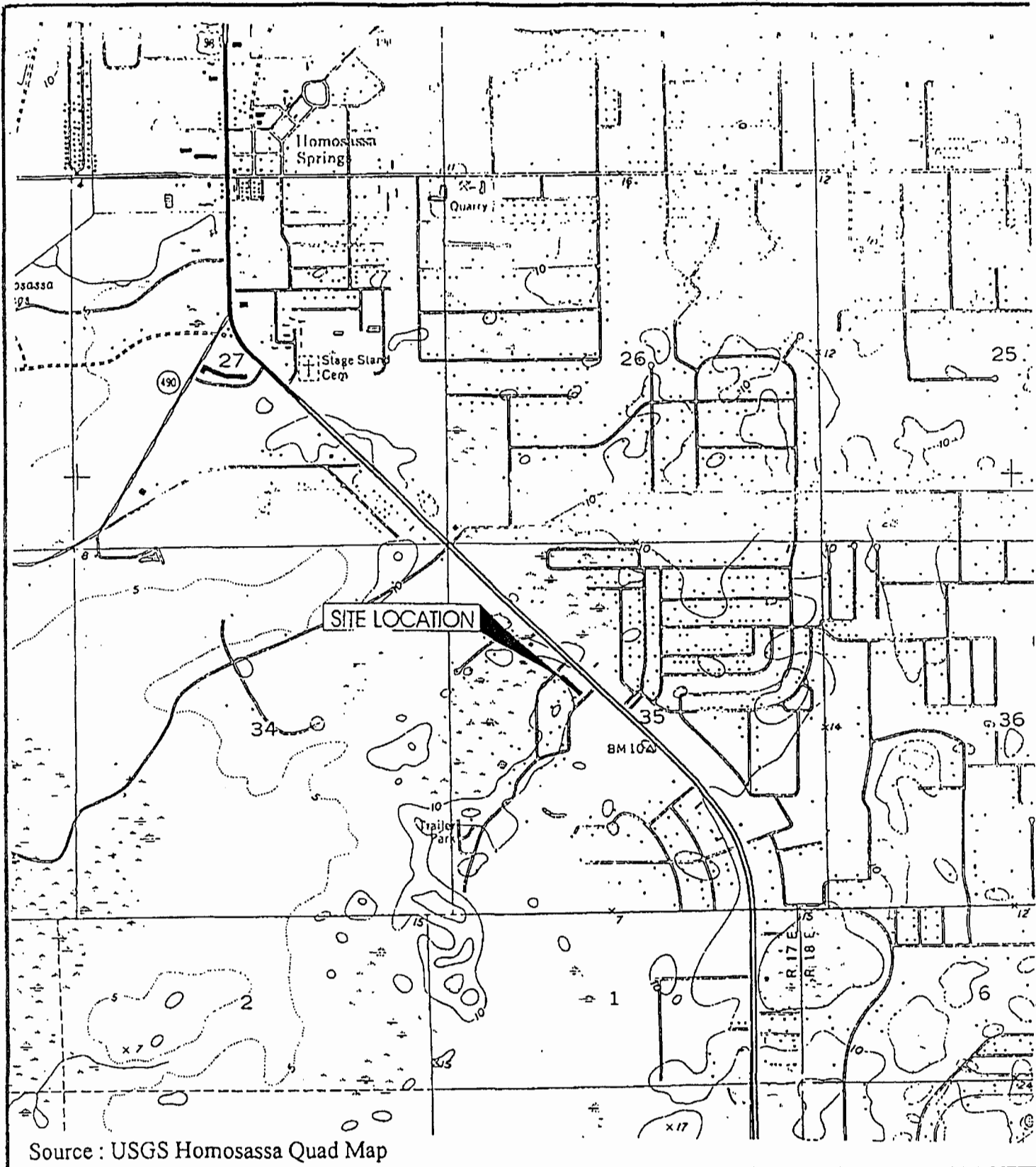
NOTES: <sup>1</sup> GCTL = Groundwater Cleanup Target Levels, FAC 62-777

TABLE 3. GROUNDWATER VARIANCE MONITORING  
QUICKSAVE DISCOUNT BEVERAGES

PARAMETER	UNITS	STANDARD	MW1	MW2	MW3	MW4	MW5	MW6	MW7	MW8	MW9	MW10							
TDS	mg/L	500	330	180	250	250	220	49	19	32	30	63	86	93	81	130	130	110	120
pH	std. units	6.5-8.5	6.39	6.83	7.1	7.4	6.47	6.93	1.98	5.2	5.0	4.29	4.7	5.0	4.31	4.7	4.9	4.27	9.32

NOTES: <sup>1</sup> STANDARD = Secondary Drinking Water Standard established in 62-550 FAC

**FIGURES**

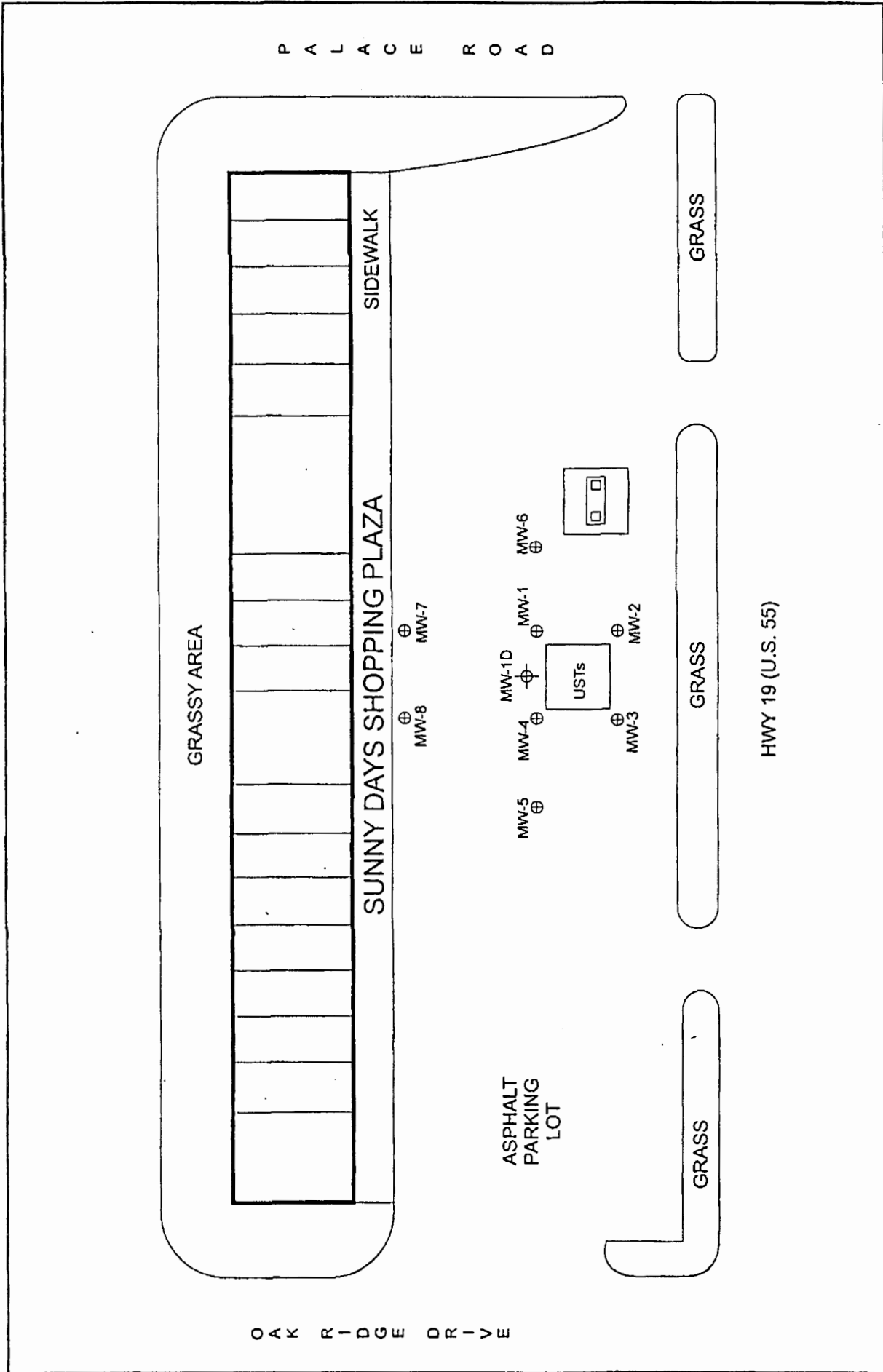


SCALE  
1" = 2000'

**STREAMLINE**  
ENVIRONMENTAL

**FIGURE 1**  
**SITE LOCATION MAP**  
Quick Save Discount Beverages  
5366 S. Suncoast Blvd.  
Homosassa, Florida

DATE: 3/16/00	FILE: Map	BY: LTF
---------------	-----------	---------



**LEGEND**

- ⊕ MW-1 = MONITORING WELL LOCATION
- ⊕- MW-1D = DEEP MONITORING WELL LOCATION

**APPROXIMATE SCALE**  
 1 INCH = 50 FEET

**FIGURE 2**  
**SITE LAYOUT PLAN**  
 Quicksave Discount Beverages  
 5366 S. Suncoast Blvd.  
 Homosassa, Florida

DATE: 2/16/00 FILE: Site BY: LTF

W  
 N  
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 E

STREAMLINE ENVIRONMENTAL

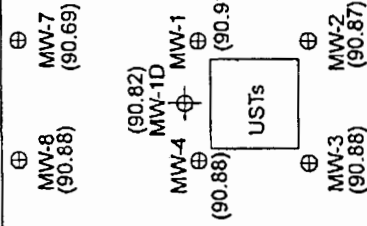
P A L A C E R O A D

GRASSY AREA

SUNNY DAYS SHOPPING PLAZA

SIDEWALK

ASPHALT  
PARKING  
LOT



GRASS

GRASS

GRASS

HWY 19 (U.S. 55)

O A K R I D G E D R I V E

**FIGURE 3**  
**GROUNDWATER ELEVATION MAP - January 9, 2002**  
 Quicksave Discount Beverages  
 5366 S. Suncoast Blvd.  
 Homosassa, Florida

DATE: 2/15/02 FILE: Site BY: LTF

**APPROXIMATE SCALE**  
 1 INCH = 50 FEET

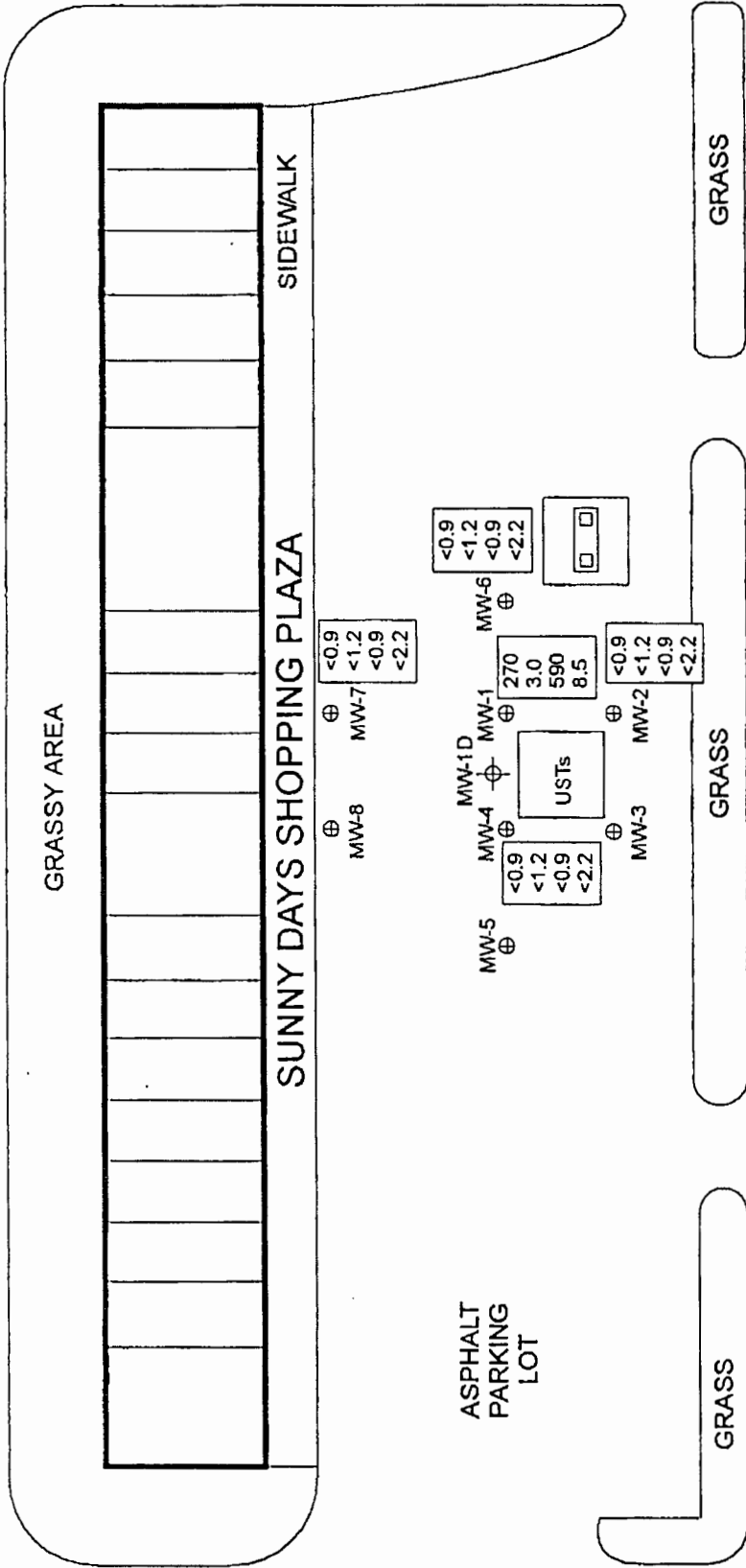
**LEGEND**

- ⊕ MW-1 = MONITORING WELL LOCATION
- ⊕- MW-1D = DEEP MONITORING WELL LOCATION (91.62)
- ⊕ (91.62) = RELATIVE GROUNDWATER ELEVATION (FT)

W N  
 S E

**STREAMLINE ENVIRONMENTAL**

P A L A C E R O A D



O A K R I D G E D R I V E

ASPHALT  
PARKING  
LOT

SUNNY DAYS SHOPPING PLAZA

GRASSY AREA

GRASS

GRASS

GRASS

HWY 19 (U.S. 55)

APPROXIMATE SCALE  
1 INCH = 50 FEET

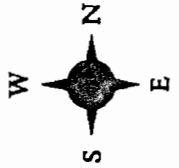
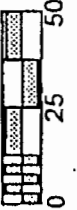


FIGURE 4  
BTEX CONCENTRATIONS IN GROUNDWATER  
January 9, 2002

Quicksave Discount Beverages  
5366 S. Suncoast Blvd.  
Homosassa, Florida

DATE: 2/15/02

FILE: GWBTEX

BY: GME

LEGEND

⊕ MW-1 = MONITORING WELL LOCATION

⊕ MW-1D = DEEP MONITORING WELL LOCATION

110

<math><12</math>

180

<math><22</math>

Benzene

Toluene

Ethylbenzene

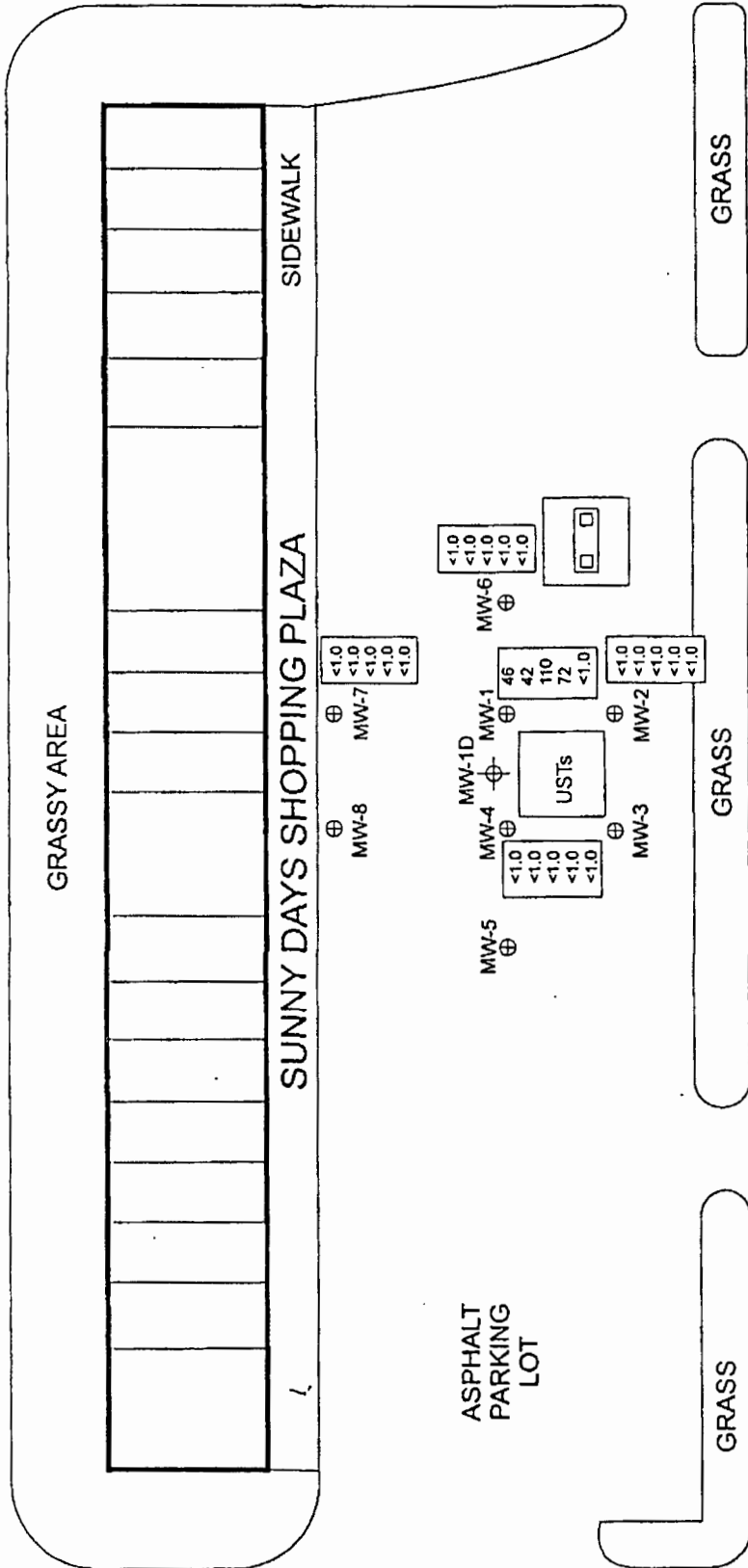
Total Xylenes

all data in ug/L

STREAMLINE  
ENVIRONMENTAL

OAK RIDGE DRIVE

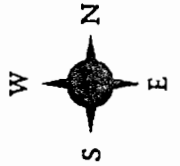
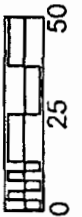
PALACE ROAD



HWY 19 (U.S. 55)

APPROXIMATE SCALE

1 INCH = 50 FEET



**FIGURE 5**  
**PAH CONCENTRATIONS IN GROUNDWATER**

January 9, 2002  
 Quicksave Discount Beverages  
 5366 S. Suncoast Blvd.  
 Homosassa, Florida

DATE: 2/9/02 FILE: GWBTEX BY: GME

**LEGEND**

- ⊕ MW-1 = MONITORING WELL LOCATION
- ⊕- MW-1D = DEEP MONITORING WELL LOCATION

all data in ug/L

13	Acenaphthene
5.1	Acenaphthylene
30	Naphthalene
19	1-Methylnaphthalene
17	2-Methylnaphthalene





**Site No. 17 Sprint - Florida**  
4465 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 099046287



### Storage Tank Facility Compliance Inspection Report

Facility ID 9046287 County 09 CITRUS Inspection Date 11/3/00  
 Facility Name SPRINT FLORIDA (HOMOSASSA) Facility Type C-USER  
 Latitude 28°47'49" Longitude 82°34'28" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ATSS Inspected	1
------------------	------------------	---

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

\* "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
Comments	Release Detection (RD) Continuous Monitoring of the tank interstice by a pneumatic sensor, and the tank and its piping are visually checked monthly. The sensor is checked monthly by SPRINT staff, and annually by HSA Technical Services. An RDRR and placard are on display at the facility. There were NO signs of leaks on the tank exterior or the piping.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

\_\_\_ Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: Self (letter)

\_\_\_ None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u>	<u>352-827-5295</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u>	<u>Cathy Stephens</u>
Inspector Name - Please Print	Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>11/3/00</u>	<u>Cathy Stephens</u> <u>11-3-00</u>
Inspector Signature & Date	Facility Representative Signature & Date



This data is current as of: 03-NOV-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 9046287	District: SWD
Name: SPRINT FLORIDA	County: Citrus
4465 S Suncoast Blvd	Type: Fuel User/Non-Retail
Homosassa, FL 32646-7500	Status: Open
Contact: Lewis Petteway } <i>cms</i>	Latitude: 28:47:49.0000 } <i>cms</i>
Phone: 352-368-8760	Longitude: 82:34:28.0000 } <i>cms</i>
	LL Method: AGPS

**Account Owner Information**

Name: Sprint Florida  
 Po Box 165000 M/S Flapka0206  
 Attn: Jennifer Scarpino  
 Altamonte Springs, FL 32716-5000  
 Phone: 407-889-1531

**Tank Owner Information**

Name: Sprint Florida  
 Po Box 165000 M/S Flapka0206  
 Attn: Jennifer Scarpino  
 Altamonte Springs, FL 32716-5000  
 Phone: 407-889-1531

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
2	2000	Diesel-Emergen Gen	09/01/1998	ABOVE	U	C✓ A✓ R✓ M✓ O✓ <del>X</del> P✓	B✓ A✓ I✓	D✓ F✓ Q✓ I✓
1	2500	Diesel-Emergen Gen	03/01/1990	UNDER	A			

*cms*

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).  
 No OPEN violations found!

**Site No. 18 Texaco #242031372 (aka Sunrise Food Mart #10)**  
4450 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098736154  
EPA I.D. No. FLD984190561



Storage Tank Facility Compliance Inspection Report

Facility ID 8736154 County 09 CITRUS Inspection Date 3/28/01  
 Facility Name SUNRISE FOOD MART #10 Facility Type A-RETAIL  
 Latitude 28°47'51" Longitude 82°34'35" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>3</u>	# ATSS Inspected	
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Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

\* "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>510(1)(b)1</u>	<u>Shear valves not installed per 62-761.500(4)(c) (rigidly anchored independently of the dispenser). for the Weston product piping in all gas dispensers.</u>	
<u>700(1)(c)1</u>	<u>Water and or Regulated Substances not removed from Reg UL and diesel STPSumps and Diesel &amp; #5 Gas dispenser lines.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: C & F Effective Date: 9/7/00 Expiration Date: 9/7/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C-MARK SUMNER</u> Inspector Name - Please Print	<u>D J B A...</u> Facility Representative Name - Please Print
<u>[Signature]</u> 3/28/01 Inspector Signature & Date	<u>[Signature]</u> 3/28/01 Facility Representative Signature & Date

Facility Name: Sunrise Food Mart 10 Facility ID: 8736154 Date: 3/28/04

Cite	Description / Inspector's Comments
	All 3 fills are equipped with flow slot off valves, the spill buckets are dry, and the fills were marked per Api 1637, but are worn off and now can not be identified.
	The 4 monitor wells are still open since the clean up has been finished all 4 wells must be properly closed.
	Premium UL STP sump is dry the SW fib. piping is equipped with a Veeva root electronic line leak detector.
	Reg UL sump has ~ 18 inches of liquid. This must be removed and properly disposed of as PCW. The SW fib. piping is equipped with a Veeva root electronic line leak detector.
	Diesel STP sump has ~ 3 inches of liquid. recommend having this removed along with the liquid in Reg UL STP sump. the SW fib piping is equipped with a Veeva root electronic line leak detector.
	#1/2 Dispense Line is dry and all piping is equipped with bleed valves. However, the Premium Valve is Not anchored.

Facility Name: Sunrise Food Mart 10 Facility ID: 8736154 Date: 3/28/01

Cite	Description / Inspector's Comments
	Diesel dispenser line has $\approx$ 1 inch of liquid. The piping is equipped a scear valve. The liquid in the bottom of the line should be removed and properly disposed of.
	#3/4 Dispenser Line is dry and piping is equipped with scear valves. However the scear valve for the premium line is Not Anchored.
	#5 Dispenser Line is wet <del>with</del> with $\approx$ 3 inches of liquid This should be removed and properly disposed of. The piping is equipped with scear valves, however the premium valve is NOT Anchored.
	placard is current and the RDRL is on file
	Monthly visual checks for the str sumps and dispenser lines are <del>checked</del> done and the conditions observed are noted.
	one passing test per tank and per line per month has been kept from the Uccder Root <del>MS</del> .

Facility Name: Sun Rise Food Mart Facility ID: 8736154 Date: 3/28/01

Cite	Description / Inspector's Comments
	Release Detection is a vendor root TLS 350R CSLD a print out for the T1, T2, T3, Q1, Q2, Q3 Alarm history and most recent Tank end line tests has been added to the file.
	A Site diagram of the facility has been added to the file.
	Photographs taken of the overall site, the liquid in the sumps, and dispenser lines, and the steel valves that are not mounted.
	Assessment wells were painted during the inspection per 600 2d.
	fills were painted per Api 1637 during the inspection.





COMPLIANCE SERVICES, INC.

P.O. BOX 1647  
VALRICO, FL. 33594-1647

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May 1, 2001

Mr. C. Mark Sumner  
Citrus County Health Department  
Environmental Health Section  
3600 W. Sovereign Path, Suite 125  
Lecanto, Fl. 34461

RE: Sunrise Food Mart #10—ID#09/8736154

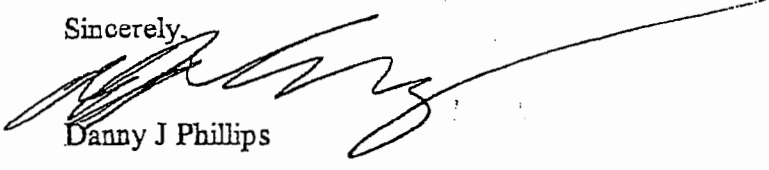
Dear Mr. Sumner,

This letter is in reply to your correspondence of March 29, 2001 concerning the recent compliance inspection at the subject facility. Attached for your review are the following items:

1. A copy of the manifest for removal of liquids from the dispenser liners and piping sumps.
2. A copy of a work order showing repair and proper anchoring of the shear valves.

If you have any questions, please contact me at 813/684-8029.

Sincerely,

  
Danny J Phillips

Attach.

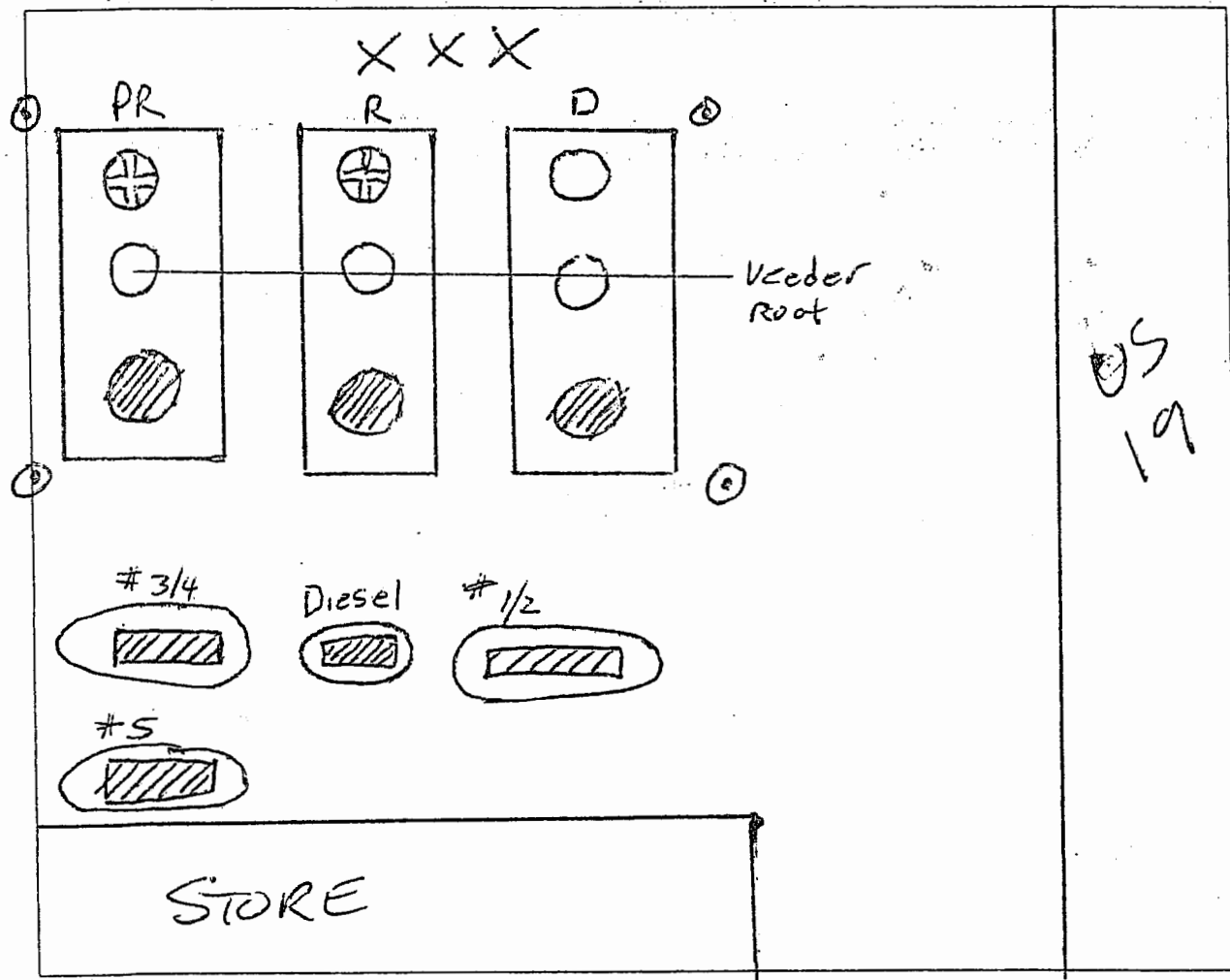
FACILITY SITE SKETCH

SITE NAME: Sunrise Food Mart #10

ADDRESS: 4450 S Suncoast

FDEP NUMBER: 8736154

NORTH



KEY: D-DIESEL: R-REGULAR UNLEADED: PL-PLUS UNLEADED: PR-PRIEMUN UNLEADED

COMPLIANCE WELLS:

TANKS:

GAS FILLS:

DIESEL FILLS: or

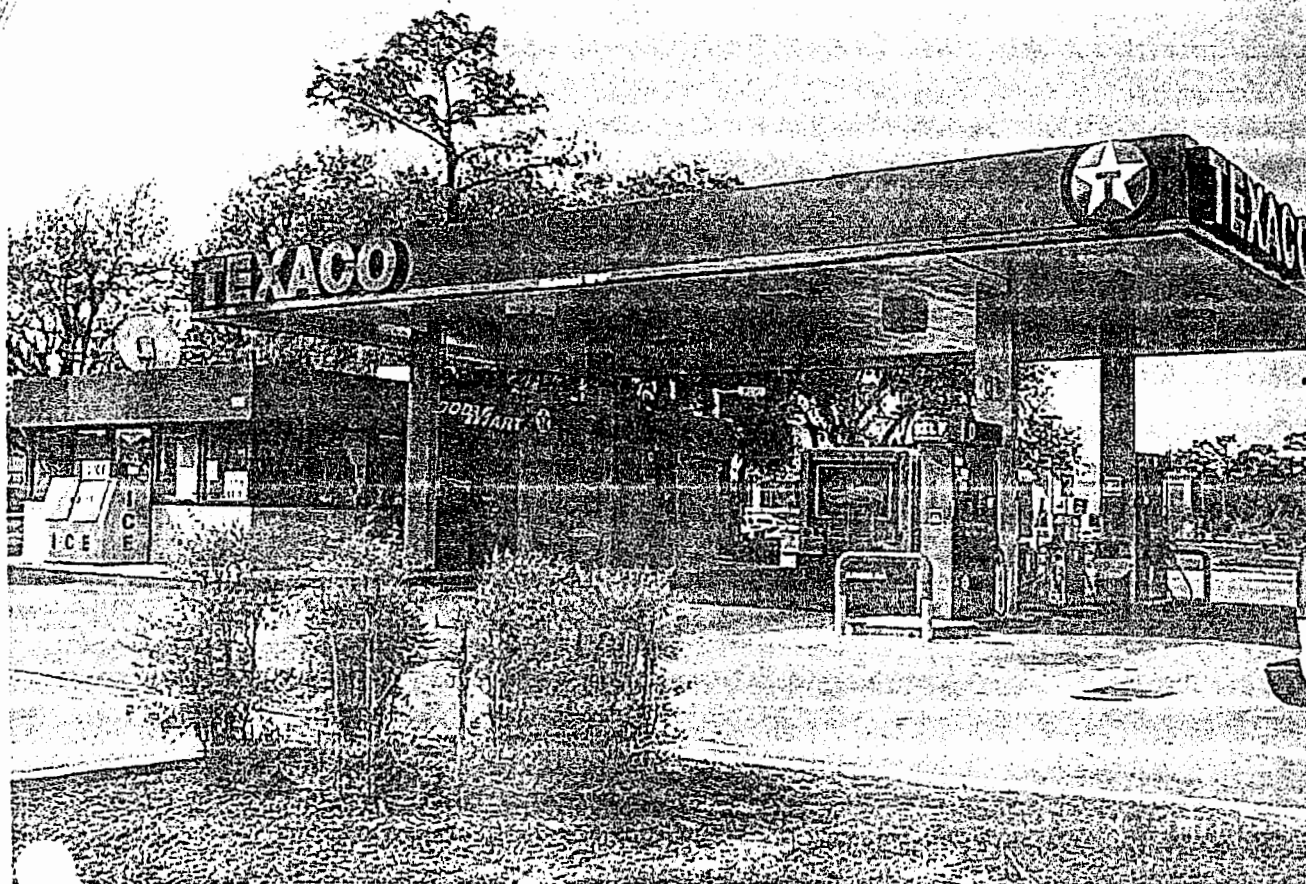
DISPENSERS:

SUMPS:

VENTS: X

INSPECTOR INITIAL & DATE

CMS 3/28/01



SUNRISE Food Mart 10

8736154

EMS



# ENVIRO-LOGICAL SOLUTIONS, INC.

April 23, 2003

Ms. Melike Altun  
Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, FL 32399-2400

**RE: SEMI-ANNUAL REMEDIATION STATUS REPORT**  
Former Tenneco 285-08  
4450 South Suncoast Blvd.  
Homosassa, Florida 32646  
FDEP FAC ID #: 098736154  
PFP Work Order #: 2000-00-4192

RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
2003 APR 25 A 10:47  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER

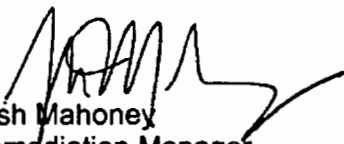
Dear Ms. Altun:


On behalf of El Paso Tennessee Pipeline Company (EPTP), Enviro-Logical Solutions, Inc. (ELS) is pleased to submit this Semi-annual Remediation Status Report to the Florida Department of Environmental Protection (FDEP). Enclosed please find two copies of the report for the above referenced former Tenneco site. Please review the submitted data, recommendations, and attached supporting documentation and advise ELS of your review findings.

If you have any questions or comments, please call the undersigned at (813) 963-0811.

Sincerely,

**ENVIRO-LOGICAL SOLUTIONS, INC.**

  
Josh Mahoney  
Remediation Manager

  
Thomas K. Cook, P.G.  
Vice President, Remediation

JPM/TKC/jab

cc: Michael Taylor, El Paso Tennessee Pipeline Company  
Jeff Stegman, Equiva Services, LLC.  
Sean O'Brien, American Petroleum Investments, Inc.  
Enviro-Logical Solutions, Inc.

# **SEMI-ANNUAL REMEDIAL STATUS REPORT**

**FORMER TENNECO 285-08  
4450 SOUTH SUNCOAST BOULEVARD  
HOMOSASSA, FLORIDA  
FDEP FACILITY NO. 098736154**

*Prepared for*

**Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400**

*Prepared by*

**Enviro-Logical Solutions, Inc.  
13135 North Dale Mabry Highway  
Tampa, Florida 33618**

**April 2003**

## TABLE OF CONTENTS

	<u>Page</u>
1.0 SEMI-ANNUAL OVERVIEW OF REMEDIAL ACTION .....	1
1.1 Facility Name and Address.....	1
1.2 Remedial System Summary .....	1
1.3 Groundwater Elevation Summary .....	2
1.4 Summary of Groundwater Analytical Results.....	2
1.5 Air Sparge System Performance Summary .....	2
1.6 Horizontal Soil Vapor Extraction System Performance Summary .....	3
1.7 Recommendations .....	4
1.8 Signatures of Environmental Professionals .....	5
2.0 MONTHLY SITE VISIT SUMMARY.....	6

## TABLES

1. Remedial System Summary
2. Groundwater Elevation Summary
3. Milestone Groundwater Analytical Summary
4. Air Sparge System Performance Summary
5. Dissolved Oxygen Levels
6. Horizontal Vapor Extraction System Performance Summary

## FIGURES

### Site Map Legend

1. Site Map
2. Remedial Well Locations
3. Relative Groundwater Elevation Contours – March 27, 2003
4. Dissolved Petroleum Hydrocarbons-March 27, 2003

## APPENDIX

- I. FDEP SAMPLING AND FIELD EQUIPMENT CALIBRATION LOGS
- II. LABORATORY ANALYTICAL REPORTS
- III. FDEP MILESTONE REDUCTION CHARTS

## 1.0 SEMI-ANNUAL OVERVIEW OF REMEDIAL ACTION

This report summarizes the remedial activities conducted at this site from August 2002 through March 2003.

### 1.1 Facility Name and Address

Name: Former Tenneco 285-08  
Address: 4450 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP #: 098736154

### 1.2 Remedial System Summary

The Remedial Action Plan (RAP) for this site was approved by the Florida Department of Environmental Protection (FDEP) on February 18, 1999. Enviro-Logical Solutions, Inc. (ELS) signed a Pay for Performance (PFP) Agreement, Work Order #2000-00-4192 with FDEP on September 1, 1999. The system startup occurred on October 26, 1999. Two Remedial Action Plan Modifications (RAPMOD) have been submitted for this site. The first RAPMOD, approved by the FDEP on January 8, 2001, allowed the injection of FyreZyme, an FDEP approved Innovative Technology bioenhancer. The second RAPMOD, approved by the FDEP on June 12, 2002, allowed the injection of hydrogen peroxide as a supplemental oxygen source as well as the use of CW-3R as a temporary treatment well. Table 1 is a summary of the design information and system repair/modification history. Figure 1 depicts the site layout.

The remedial system consists of five air sparge wells (AS-1 to AS-5) and a soil vapor extraction (SVE) system. The SVE system consists of four horizontal vapor extraction wells (HVEW-1 to HVEW-4). As outlined in the May 31, 2002 RAPMOD, low flow biosparging has been conducted in CW-3 during the past remedial period. Figure 2 depicts the current remedial system layout. Refer to the RAPMOD report and approval letter for design details and monitoring schedule. Please refer to the system "as-builts" submitted on November 23, 1999, for additional construction information.

### 1.3 Groundwater Elevation Summary

Table 2 is a summary of the historical groundwater elevation data recorded at this site. Prior to groundwater sampling, groundwater elevations are typically collected from all onsite-monitoring wells. These data, along with the top of casing elevations, are used to calculate the volume of water to be purged from wells before sampling. Figure 3 depicts the relative water table elevation contours on March 27, 2003. The groundwater flow direction on March 27, 2003 was generally to the west-northwest.

### 1.4 Summary of Groundwater Analytical Results

Key monitoring wells CW-1R and CW-3R were sampled several times during the past monitoring period for benzene, toluene, ethyl benzene, total xylenes (BTEX) and methyl tert-butyl ether (MTBE). Table 3 summarizes the historical groundwater analytical data. FDEP groundwater sampling and field equipment calibration logs for sampling events conducted between August 2002 and March 2003 are presented in Appendix I. Copies of the Laboratory Analytical Reports are contained in Appendix II. Figure 4 depicts the most recent dissolved hydrocarbon concentrations in groundwater. All sampling during this period was conducted according to the FDEP's groundwater sampling protocol effective April 10, 2002.

Although groundwater concentrations continue to decrease at this location, Key monitoring well CW-3R continues to exceed established Cleanup Target Levels (CTLs) for benzene, total xylenes, and MTBE. The concentration reduction trend in CW-3R continues to decrease. Key monitoring well CW-1R has groundwater dissolved hydrocarbon concentration below established CTLs. Overall, a greater than 90% reduction in BTEX/MTBE concentrations has been achieved in the two Key monitoring wells. Appendix III contains the FDEP Milestone Reduction charts for this location.

### 1.5 Air Sparge System Performance Summary

Table 4 is a summary of the Air Sparge System Performance. As approved in the May 2002 RAPMOD, ELS continues to utilize CW-3R as a temporary low-flow biosparging point. Currently, the air sparge system is operating on a timer, allowing operation for one hour on and the five hours off. The intermittent nature of this remedial scheme should help limit the formation of



preferential air pathways in the subsurface. The air flow rate into CW-3R over the past remedial period has varied from 3 to 5 standard cubic feet per minute (scfm) as pressures varying from 3 to 10 pounds per square inch gauge (psig).

Dissolved oxygen (DO) levels were also recorded from selected monitoring wells. Table 5 summarizes the DO data. Typically, DO levels of 2.0 milligrams per liter (mg/L) or higher indicates an environment in which petroleum hydrocarbons can be aerobically degraded by an in-situ heterotrophic biomass. DO levels in CW-3R have continued to rise over the past six months, to almost 6.0 mg/L in March 2003. It appears that intermittent biosparging directly into this well is an efficient method of introducing DO into the subsurface surrounding the underground storage tanks. Due to the continued elevation of the DO levels from biosparging, no hydrogen peroxide (H<sub>2</sub>O<sub>2</sub>) injections have been performed. ELS will continue to evaluate the remedial effectiveness of the current strategy and will initiate H<sub>2</sub>O<sub>2</sub> injections per the RAPMOD requirements should it be deemed necessary.

#### **1.6 Horizontal Soil Vapor Extraction System Performance Summary**

Table 6 lists the Horizontal Soil Vapor Extraction system performance data. Soil vapor extraction has not been conducted at this site since the February 2002 restart. From that time ELS has set the remedial system to operate in a biosparge mode with biosparge flow rates averaging less than 4 scfm per biosparge well.

No effluent air treatment has been required since the June 2000 sampling event that found vapor phase BTEX/MTBE and Total Petroleum Hydrocarbon (TPH) concentrations below required emission levels. In the Semi-Annual Report (10/99 to 4/00), ELS made recommendations to stop effluent vapor treatment. The FDEP agreed with the recommendations and in August 2000 off-gas treatment was discontinued.

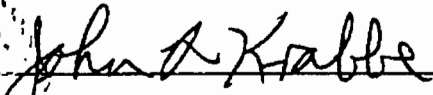
#### **1.7 Conclusions and Recommendations**

ELS will continue operation and maintenance of the existing remediation system until the site can be entered into Post Active Remediation Monitoring. Sampling of the Key and Perimeter and selected other monitoring wells will be conducted in May 2003 to assess remediation progress. ELS will update the FDEP via email about the results of this sampling event. ELS is

in the process of preparing a pilot test proposal for your review. ArcheaSolutions, Inc. has prepared a pilot test proposal for ELS to perform injections of a bioenhancer called Arkea into CW-3R. Mr. Bruce Thurby of ArcheaSolutions, Inc. made a presentation to the FDEP earlier this year. ArcheaSolutions, Inc. has applied for approval of their technology under the Innovative Technology Program. ELS will contact Mr. Rick Ruscito as we complete this pilot test proposal to ensure that we follow the proper monitoring and permitting procedures. The proposal will be submitted to your attention shortly under a separate cover letter.

### 1.8 Signatures of Environmental Professionals

Prepared by:   
Josh Mahoney  
Remediation Manager

Reviewed by:   
John L. Krabbe, P.E.  
Engineering Manager  
FL License Number 33507

## 2.0 MONTHLY SITE VISIT SUMMARY

### August 12, 2002

- Remedial system down upon arrival. Breaker tripped on the power pole reset and compressor restarted.
- Performed a 24 hour intermittent sparge test in CW-3R.
- Performed O&M on the remedial equipment.
- Collected DTW and DO levels from selected monitoring wells.
- Resumed biosparging into AS-1 and AS-2 prior to leaving the site. SVE system is off.

### September 6, 2002

- Remedial system down upon arrival. Breaker tripped on the power pole reset and compressor restarted.
- Performed O&M on the remedial equipment.
- Sample Key wells for BTEX/MTBE
- Collected DTW and DO levels from selected monitoring wells.
- Resumed biosparging into AS-1 and AS-3 prior to leaving the site. SVE system is off.

### November 5, 2002

- Remedial system up and running.
- Performed O&M on the remedial equipment.
- Setup for intermittent biosparging exclusively in CW-3R. Set timer for 1-hour on/4 hours off operation. SVE system is off.
- Collected DTW and DO levels from selected monitoring wells.

### December 3, 2002

- Remedial system up and running.
- Performed O&M on the remedial equipment.
- Collected DTW and DO levels from selected monitoring wells.
- Sample CW-3R for BTEX/MTBE
- Resumed intermittent biosparging into CW-3R. SVE system off.

### January 9, 2003

- Remedial system up and running.
- Performed O&M on the remedial equipment.
- Collected DTW and DO levels from selected monitoring wells.
- Resumed intermittent biosparging into CW-3R. SVE system off.

**February 4, 2003**

- Remedial system up and running.
- Performed O&M on the remedial equipment.
- *Collected DTW and DO levels from selected monitoring wells.*
- Resumed intermittent biosparging into CW-3R. SVE system off.

**March 27, 2003**

- Remedial system up and running.
- Performed O&M on the remedial equipment.
- Collected DTW and DO levels from selected monitoring wells.
- Sample CW-3R for BTEX/MTBE.
- Resumed intermittent biosparging into CW-3R. SVE system off.

**TABLES**

## TABLE 1: REMEDIAL SYSTEM SUMMARY

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#** 098736154  
**Startup Date:** October 26, 1999

<b>Groundwater Recovery / Multi-Phase Extraction</b>	Not Applicable	
Recovery Well / MPE ID#		
Screen Interval		
Drawdown		
Design Flow Rate		
Design Influent Concentration		
Effluent Polishing Type		
Gallery Design Size		
Other (e.g. FP Recovery, Pretreat)		
<b>Permits</b> (e.g. NPDES, consumptive use)	UIC Injection for Fyrezyme; UIC Variance for H202	
<b>Soil Treatment</b>		
VES / MPE Well ID#	HVEW-1, HVEW-2, HVEW-3, HVEW-4	
Screen Interval	36' to 40' Horizontal Screen Interval	
Design Flow Rate	design flow rate for the vapor system is 26 acfm per well	
Off Gas Treatment	None as of 7/8/02	
Other		
<b>Air Sparging / Biosparging</b>		
Sparging Well ID#	AS-1, AS-2, AS-3, AS-4, AS-5	
Screen Interval	(23'-25'), (26'-28'), (26'-28'), (23'-25'), (13'-15')	
Design Flow Rate	total design flow rate for the air sparge system is estimated to be 20 cfm	
<b>Equipment &amp; Specifications</b> (i.e. tower, blower, flowmeter, pumps) Specify usage, type, mfg, and design specifications.		<b>Availability</b>
Blower	Roots Dresser 36URAI	
Compressor Model	CompAir Model 25 PURS	
Control Panel	NEMA 4	
(Brand & List components)		
Surge Protection (Mfg & Type)		
Other		
Telemetry (Mfg)	CIM 5000	Phone #:352-628-7290
<b>SYSTEM REPAIR HISTORY</b>		
<b>Date</b>	<b>Part Replaced or Modification</b>	
	1/17/00 Replaced Flowmeter on AS system	
	5/24/00 Replaced oil/air separator on the compressor.	
	5/24/00 Repaired effluent air sparge line ( cracked PVC)	
	2/1/02 Replaced remedial trailer.	
	7/8/02 Replaced flowmeter on AS system.	
	8/12/02 Replaced air/oil separator on the compressor.	

## TABLE 2: GROUNDWATER ELEVATION SUMMARY

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154

All measurements in feet  
 unless noted otherwise  
 NA = Not Applicable

ELEV = Relative Water  
 Table Elevation  
 DTW = Depth to Water  
 DTNAPL = Depth to Non-  
 Aqueous Phase Liquid

WELL NO.	DIA METER (inches)	MW-1			MW-2			MW-3			MW-4			MW-5W					
		ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL			
		92.78	5.70	NA	92.75	5.30	NA	92.78	5.43	NA	92.74	6.22	NA	92.75	5.25	NA	92.74	5.54	NA
8/15/87	14	92.94	5.55	NA	92.80	5.25	NA	92.84	5.37	NA	92.83	6.13	NA	92.80	5.20	NA	92.80	5.48	NA
8/7/89	4-14	92.54	5.95	NA	91.43	6.62	NA	92.51	5.70	NA	92.41	6.55	NA	92.50	5.50	NA	91.43	6.85	NA
10/26/99	98.49	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
1/5/00		92.54	5.85	NA	92.40	5.65	NA	92.70	5.51	NA	93.08	5.80	NA	92.60	5.40	NA	92.59	5.69	NA
1/17/00		92.81	5.88	NA	92.15	5.90	NA	92.06	6.15	NA	93.20	5.76	NA	90.83	7.17	NA	92.17	6.11	NA
2/16/00		NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
4/17/00		92.59	5.90	NA	NA	NA	NA	92.51	5.70	NA	92.51	8.45	NA	NA	NA	NA	NA	NA	NA
5/17/00		92.37	6.12	NA	91.30	6.75	NA	92.30	5.81	NA	92.18	6.80	NA	92.73	5.27	NA	92.12	6.16	NA
8/24/00		91.86	6.83	NA	91.65	6.40	NA	91.37	6.84	NA	92.55	6.41	NA	90.16	7.84	NA	91.28	7.00	NA
9/14/00		93.61	4.88	NA	93.35	4.70	NA	93.09	5.12	NA	92.77	6.19	NA	91.81	6.19	NA	92.80	5.48	NA
9/21/00		94.79	3.70	NA	94.44	3.61	NA	94.09	4.12	NA	93.20	5.76	NA	93.89	4.11	NA	94.28	4.00	NA
9/28/00		92.59	5.90	NA	93.05	5.00	NA	93.01	5.20	NA	NA	NA	NA	93.08	4.94	NA	93.13	5.15	NA
10/4/00		92.38	6.10	NA	91.68	6.37	NA	91.81	6.40	NA	91.96	7.00	NA	91.00	7.00	NA	93.03	5.25	NA
10/9/00		92.09	6.40	NA	92.43	5.62	NA	92.48	5.75	NA	91.71	7.25	NA	92.65	5.35	NA	92.66	5.62	NA
1/20/01		NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
1/23/01		91.48	7.00	NA	91.90	6.15	NA	91.91	8.30	NA	NA	NA	NA	91.98	6.02	NA	91.94	6.34	NA
2/7/01		NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
7/20/01		NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
10/30/01		91.91	6.58	NA	91.83	6.12	NA	91.96	6.25	NA	NA	NA	NA	92.00	6.00	NA	91.98	6.30	NA
11/12/01		92.89	5.80	NA	92.35	5.70	NA	92.71	5.50	NA	NA	NA	NA	93.10	4.90	NA	92.88	5.60	NA
2/27/02		92.63	5.86	NA	93.05	5.00	NA	93.09	5.12	NA	NA	NA	NA	93.10	4.90	NA	93.08	5.20	NA
5/14/02		92.27	6.22	NA	92.07	5.98	NA	92.68	5.55	NA	92.66	6.30	NA	92.25	5.75	NA	92.23	6.05	NA
6/13/02		92.14	6.35	NA	91.83	6.12	NA	92.53	5.68	NA	92.52	6.44	NA	92.10	5.90	NA	92.13	6.15	NA
7/8/02		92.17	6.32	NA	92.20	5.85	NA	92.71	5.50	NA	92.69	6.27	NA	92.30	5.70	NA	92.11	6.17	NA
8/12/02		91.49	7.00	NA	91.15	6.90	NA	91.73	6.48	NA	91.89	7.27	NA	89.95	8.05	NA	90.81	7.47	NA
9/6/02		93.44	5.05	NA	93.13	4.92	NA	93.83	4.38	NA	93.71	5.25	NA	83.32	4.68	NA	93.48	4.80	NA
11/5/02		NA	NA	NA	NA	NA	NA	93.85	4.36	NA	93.70	5.26	NA	NA	NA	NA	NA	NA	NA
12/3/02		NA	NA	NA	NA	NA	NA	94.11	4.10	NA	93.46	5.50	NA	NA	NA	NA	NA	NA	NA
1/9/03		NA	NA	NA	NA	NA	NA	93.18	5.05	NA	92.88	6.10	NA	NA	NA	NA	NA	NA	NA
2/4/03		NA	NA	NA	NA	NA	NA	93.41	4.80	NA	93.11	5.85	NA	NA	NA	NA	NA	NA	NA
3/27/03		92.78	5.71	NA	92.19	5.66	NA	93.21	5.00	NA	92.91	6.05	NA	NA	NA	NA	NA	NA	NA



# TABLE 2: GROUNDWATER ELEVATION SUMMARY

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154

All measurements in feet  
 unless noted otherwise  
 NA = Not Applicable

ELEV = Relative Water  
 Table Elevation  
 DTW = Depth to Water  
 DTNAPL = Depth to Non-  
 Aqueous Phase Liquid

WELL NO.	CW-1			CW-2			CW-3			CW-4			MW-NE			MW-SE		
	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL
	4			4			4			4			2			2		
	10			10			10			10			12			14		
	98.12			98.09			98.29			98.44			98.32			98.11		
DATE	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL
5/2/87	93.02	5.10	NA	92.82	5.27	NA	92.88	5.40	NA	92.79	5.65	NA	92.92	6.40	NA	92.92	6.40	NA
8/15/87	93.14	4.98	NA	92.84	5.25	NA	93.88	4.41	NA	92.86	5.58	NA	93.02	6.30	NA	93.43	4.68	NA
6/7/89	91.66	6.46	NA	92.54	5.55	NA	92.73	5.56	NA	92.49	5.95	NA	92.87	6.65	NA	93.08	5.05	NA
10/26/88	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
1/5/00	92.62	5.50	NA	92.79	5.30	NA	92.74	5.55	NA	92.64	5.80	NA	92.72	6.60	NA	92.11	6.00	NA
1/17/00	92.15	5.97	NA	91.96	6.13	NA	92.28	6.00	NA	92.16	6.28	NA	93.11	6.21	NA	92.22	5.89	NA
2/18/00	92.87	5.25	NA	NA	NA	NA	92.74	5.55	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
4/17/00	92.52	5.80	0.50	92.64	5.45	NA	92.59	5.70	NA	92.54	5.90	NA	92.81	6.51	NA	92.11	6.00	NA
5/17/00	91.62	6.50	0.50	91.69	6.40	NA	92.04	6.25	NA	92.84	5.60	NA	92.34	6.88	NA	91.88	6.42	NA
8/24/00	92.92	5.20	1.50	92.84	5.25	NA	92.87	5.42	NA	92.84	5.60	NA	93.88	5.44	NA	93.35	4.76	NA
9/14/00	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	94.18	4.26	NA	94.50	3.61	NA
9/21/00	93.62	4.50	NA	93.92	4.17	NA	93.68	4.61	NA	94.18	4.26	NA	95.26	4.06	NA	94.50	3.61	NA
9/28/00	93.32	4.80	NA	93.18	4.90	NA	93.19	5.10	NA	93.09	5.35	NA	93.32	6.00	NA	93.71	4.40	NA
10/4/00	92.47	5.65	NA	92.19	5.90	NA	92.41	5.88	NA	92.74	5.70	NA	94.20	5.12	NA	93.26	4.85	NA
10/8/00	92.87	5.45	NA	92.48	5.60	NA	92.85	5.44	NA	92.72	5.72	NA	93.00	6.32	NA	93.01	5.10	NA
1/2/01	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
1/23/01	NA	6.04	NA	92.09	6.00	NA	6.28	NA	NA	91.54	6.90	NA	92.02	7.30	NA	92.19	5.92	NA
2/7/01	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
7/20/01	Well Abandoned			Well Abandoned			Well Abandoned			Well Abandoned			Well Abandoned			Well Abandoned		
10/30/01				92.14	5.95	NA				91.96	6.48	NA	92.04	7.28	NA	92.21	5.90	NA
11/12/01				93.09	5.00	NA				93.33	5.11	NA	94.92	4.40	NA	93.01	5.10	NA
2/27/02				93.11	4.98	NA				93.09	5.35	NA	93.04	8.28	NA	93.18	4.85	NA
5/14/02				92.69	5.40	NA				92.87	5.77	NA	92.32	7.00	NA	92.43	5.68	NA
6/13/02				92.54	5.55	NA				92.58	5.88	NA	92.12	7.20	NA	92.27	5.84	NA
7/8/02				92.63	5.48	NA				92.69	5.75	NA	92.80	7.12	NA	92.11	6.00	NA
8/12/02				91.28	6.80	NA				91.32	7.12	NA	91.95	7.37	NA	91.49	6.62	NA
9/6/02				93.73	4.36	NA				93.76	4.66	NA	93.32	6.00	NA	93.49	4.62	NA
11/5/02				93.74	4.35	NA				93.72	4.72	NA	NA	NA	NA	NA	NA	NA
12/3/02				93.27	4.82	NA				93.74	4.70	NA	NA	NA	NA	NA	NA	NA
1/9/03				92.84	5.25	NA				93.07	5.37	NA	NA	NA	NA	NA	NA	NA
2/4/03				93.03	5.06	NA				93.24	5.20	NA	NA	NA	NA	NA	NA	NA
3/27/03				92.53	5.56	NA				93.48	4.96	NA	NA	NA	NA	NA	NA	NA

**TABLE 2: GROUNDWATER ELEVATION SUMMARY**

Facility Name: Former Tenneco 285-08  
 Facility Address: 4450 S. Suncoast Blvd., Homosassa FL  
 Facility ID#: 098736154

All measurements in feet  
 unless noted otherwise  
 NA = Not Applicable

ELEV = Relative Water Table Elevation  
 DTW = Depth to Water  
 DTNAPL = Depth to Non-Aqueous Phase Liquid

WELL NO.	CW-1R			CW-3R			ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	
	DIAMETER (inches)	WELL DEPTH	SCREEN INTERVAL	DIAMETER (inches)	WELL DEPTH	SCREEN INTERVAL										
	2	10	3 to 7	2	10	3 to 7										
	99.82			100.55												
DATE	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	ELEV	DTW	DTNAPL	DTNAPL
5/2/87	Not Installed			Not Installed												
8/15/87	Not Installed			Not Installed												
6/7/89	Not Installed			Not Installed												
10/26/89	Not Installed			Not Installed												
1/5/00	Not Installed			Not Installed												
1/17/00	Not Installed			Not Installed												
2/16/00	Not Installed			Not Installed												
4/17/00	Not Installed			Not Installed												
5/17/00	Not Installed			Not Installed												
8/24/00	Not Installed			Not Installed												
8/14/00	Not Installed			Not Installed												
8/21/00	Not Installed			Not Installed												
8/28/00	Not Installed			Not Installed												
10/4/00	Not Installed			Not Installed												
10/9/00	Not Installed			Not Installed												
1/2/01	Not Installed			Not Installed												
1/23/01	Not Installed			Not Installed												
2/7/01	Not Installed			Not Installed												
7/2/01	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
10/30/01	93.82	6.00	NA	94.50	8.05	NA	94.50	8.05	NA	94.50	8.05	NA	94.50	8.05	NA	NA
11/12/01	94.22	5.40	NA	94.95	5.60	NA	94.95	5.60	NA	94.95	5.60	NA	94.95	5.60	NA	NA
2/27/02	94.32	5.30	NA	95.17	5.38	NA	95.17	5.38	NA	95.17	5.38	NA	95.17	5.38	NA	NA
5/14/02	93.88	5.74	NA	94.73	5.82	NA	94.73	5.82	NA	94.73	5.82	NA	94.73	5.82	NA	NA
8/13/02	93.75	5.87	NA	94.65	5.90	NA	94.65	5.90	NA	94.65	5.90	NA	94.65	5.90	NA	NA
7/8/02	94.10	5.52	NA	94.70	5.85	NA	94.70	5.85	NA	94.70	5.85	NA	94.70	5.85	NA	NA
8/12/02	93.24	6.38	NA	92.00	8.55	NA	92.00	8.55	NA	92.00	8.55	NA	92.00	8.55	NA	NA
8/6/02	85.05	4.57	NA	96.17	4.38	NA	96.17	4.38	NA	96.17	4.38	NA	96.17	4.38	NA	NA
11/5/02	95.02	4.60	NA	95.78	4.76	NA	95.78	4.76	NA	95.78	4.76	NA	95.78	4.76	NA	NA
12/3/02	94.48	5.16	NA	94.73	5.82	NA	94.73	5.82	NA	94.73	5.82	NA	94.73	5.82	NA	NA
1/8/03	93.61	6.01	NA	93.78	6.77	NA	93.78	6.77	NA	93.78	6.77	NA	93.78	6.77	NA	NA
2/4/03	93.72	5.80	NA	93.38	7.17	NA	93.38	7.17	NA	93.38	7.17	NA	93.38	7.17	NA	NA
3/27/03	93.60	6.02	NA	92.90	7.85	NA	92.90	7.85	NA	92.90	7.85	NA	92.90	7.85	NA	NA

**TABLE 3: MILESTONE GROUNDWATER ANALYTICAL SUMMARY**

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154  
**System Startup Date:** 10/26/99

**BDL = Below Detection Limits**  
**NA = Not Applicable**  
**Analytical Results in ppb (µg/L)**  
**CTL = Cleanup Target Levels**

Location	Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	MTBE
GROUNDWATER KEY MONITORING WELL ANALYTICAL SUMMARY						
Groundwater Cleanup Target Levels (µg/L)		1	40	30	20	50
CW-1	8/7/99	155	5.0	790	665	35
	2/16/00	4.1	3.4	17	48	7.6
	5/17/00	17	28	114	5,240	<100
	8/24/00	3.41	<10	95	960	<10
	10/9/00	1.3	1.8	43	270	<1.0
	1/24/01	400	350	10	360	150
	7/20/2001*	1.0	2.0	10	38	2.0
CW-1R	10/30/01	<1.0	<1.0	<1.0	<1.0	28
	11/12/01	<1.0	<1.0	5.4	7.3	27
	2/27/02	<1.0	<1.0	7.0	5.9	1.7
	5/14/02	<1.0	<1.0	<1.0	<1.0	<1.0
	7/8/02	<1.0	<1.0	3.4	1.8	<1.0
	9/6/02	<1.0	<1.0	<1.0	<1.0	<1.0
	11/5/02	<1.0	<1.0	<1.0	<1.0	<1.0
CW-3	8/7/99	1,100	50	750	450	5,050
	2/16/00	100	<50	200	240	<50
	5/17/00	658	32	472	390	86
	8/24/00	270	<100	560	260	8,200
	10/9/00	170	17	790	270	220
	1/24/01	180	<50	210	<50	7,700
	7/20/2001*	103	27	150	117	2,480
CW-3R	10/30/01	130	7.6	29	85	680
	11/12/01	320	<50	<50	150	1,300
	2/27/02	360	35.2	15	90.9	287
	5/14/02	430	46	<5.0	87	610
	7/8/02	64	7.0	8.5	34	78
	9/6/02	110	13	2.7	15	170
	11/5/02	800	300	<100	100	<100
	12/3/02	560	230	<100	160	660
	3/27/03	370	37	<5.0	160	330
Baseline Average Key Wells		628	26	770	558	2,543
Average on 11/5/02		33	Below CTL	Below CTL	18	40
% Percent Reduction on 11/5/02		95%	100%	100%	97%	98%

**TABLE 3: MILESTONE GROUNDWATER ANALYTICAL SUMMARY**

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154  
**System Startup Date:** 10/26/99

**BDL = Below Detection Limits**  
**NA = Not Applicable**  
**Analytical Results in ppb (ug/L)**  
**CTL = Cleanup Target Levels**

Location	Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	MTBE
GROUNDWATER PERIMETER MONITORING WELL ANALYTICAL SUMMARY						
CW-2	6/7/99	69	1.0	<1.0	4.0	9.0
	8/24/00	<1.0	<1.0	<1.0	<1.0	<1.0
	10/9/00	<1.0	<1.0	<1.0	<1.0	<1.0
CW-4	6/7/99	48	<1.0	2.0	6.0	18
	8/24/00	<1.0	<1.0	<1.0	<1.0	<1.0
	10/9/00	<1.0	<1.0	<1.0	<1.0	<1.0
MW-4	6/7/99	<1.0	<1.0	<1.0	<1.0	4.0
	10/9/00	<1.0	<1.0	<1.0	<1.0	2.2
MW-SE	6/7/99	<1.0	<1.0	<1.0	<1.0	<1.0
	10/9/00	<1.0	<1.0	<1.0	<1.0	<1.0

Note: In calculating the average concentration of Key Monitoring Wells, the reported detection limit is utilized for concentrations reported as below method detection limits (< less than).

\* Note = 7/2001 sampling data of Key wells collected by state contractor Earth Tech on behalf of FDEP.

## TABLE 4: AIR SPARGE SYSTEM PERFORMANCE SUMMARY

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154  
**Startup Date:** 10/26/99

NA= Not Applicable/Data not available  
 scfm= standard cubic feet per minute  
 psig= pounds per square inch gauge

Site Visit Date	Days Between Site Visits	Days Since Startup	Air Flow (scfm)	Calculated Air Flow (acfm)	Pressure (psig)	Active Sparge Wells	Estimated air flow per well (scfm)
1/17/00	0	83	11	NA	7	AS-1,2,3,4,5	2.2
2/18/00	30	113	11	7.6	7	AS-1,2,3,4,5	2.2
3/23/00	38	149	11	7.3	8	AS-1,2,3,4,5	2.2
4/17/00	25	174	11	7.3	8	AS-1,2,3,4,5	2.2
5/24/00	37	211	11	8.0	6	AS-1,2,3,4,5	2.2
6/2/00	9	220	13	9.4	6	AS-1,2,3,4,5	2.6
7/5/00	33	253	NA	NA	NA	AS-1,2,3,4,5	NA
7/12/00	7	260	10	6.1	10	AS-1,2,3,4,5	2.0
8/24/00	43	303	10	7.6	5	AS-1,2,3,4,5	2.0
8/14/00	21	324	10	3.4	30	AS-1,2,3,4,5	2.0
9/21/00	7	331	18	8.3	18	AS-1,2,3,4,5	3.6
9/28/00	7	338	12	7.3	10	AS-1,2,3,4,5	2.4
10/4/00	6	344	18	8.4	14	AS-1,2,3,4,5	3.2
10/9/00	5	349	12	9.1	5	AS-1,2,3,4,5	2.4
11/15/00	37	386	12	7.3	10	AS-1,2,3,4,5	2.4
12/19/00	34	420	12	7.3	10	AS-1,2,3,4,5	2.4
1/2/01	14	434	NA	NA	NA	NA	NA
1/23/01	21	455	NA	NA	NA	NA	NA
2/6/01	14	469	NA	NA	NA	NA	NA
10/30/01	266	735	NA	NA	NA	NA	NA
11/12/01	13	748	NA	NA	NA	NA	NA
2/27/02	107	855	8	4.9	10	AS-1,3	4.0
5/14/02	76	931	12	7.3	10	AS-1,3	6.0
6/13/02	30	961	12	7.3	10	AS-1,3	6.0
7/8/02	25	986	12.0	9.1	5	AS-1,3	6.0
8/6/02	60	1046	3.0	2.0	8.0	CW-3R	2.0
11/5/02	60	1106	4.0	2.4	10	CW-3R	2.4
12/3/02	28	1134	5.0	3.0	10	CW-3R	3.0
1/9/03	37	1171	4	3.4	3	CW-3R	3.4
2/4/03	26	1197	4	3.2	4	CW-3R	3.2
3/27/03	51	1248	5	3.6	6	CW-3R	3.6

## TABLE 5: DISSOLVED OXYGEN LEVELS

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154  
**Startup Date:** 10/26/99

NR= No Record  
 Results in ppm ( mg/L)

Date	MW-1	MW-2	MW-3	MW-4	CW-1	CW-2	CW-3	CW-4	MW-NW	MW-NE	MW-SW	MW-SE	Average DO Level
1/5/00	4.95	0.70	0.51	0.61	2.27	NR	NR	1.00	1.10	0.31	0.56	0.71	1.27
1/17/00	0.71	0.40	2.88	0.57	NR	NR	NR	NR	0.39	0.75	0.86	0.61	0.90
3/23/00	3.00	0.36	0.60	0.50	0.51	1.00	0.90	0.71	1.16	0.81	0.61	0.75	0.91
4/17/00	0.81	NR	1.00	1.86	NR	0.71	0.59	0.39	NR	NR	NR	NR	0.89
5/17/00	1.11	1.00	0.70	0.77	NR	0.61	0.86	0.60	0.56	0.50	0.4	0.31	0.67
8/24/00	0.52	0.21	0.35	0.18	NR	NR	NR	NR	0.19	0.42	0.36	0.28	0.31
9/14/00	2.22	0.53	2.53	0.92	NR	NR	NR	NR	0.31	0.18	0.22	0.75	0.96
9/21/00	2.61	0.61	3.00	1.18	0.36	0.51	0.77	0.30	0.61	0.37	1.10	0.12	0.96
9/28/00	0.83	0.45	1.31	NR	0.45	0.41	0.49	1.28	0.21	1.21	0.49	0.42	0.69
10/4/00	2.71	1.16	1.00	2.00	0.31	0.17	0.16	0.51	2.11	1.00	0.85	0.37	1.03
10/9/00	0.63	0.36	1.21	1.33	0.21	0.48	0.54	1.34	0.22	0.28	0.32	0.29	0.60
11/17/00	NR	NR	NR	NR	2.07	NR	3.36	NR	NR	NR	NR	NR	2.72
5/14/02	0.31	0.42	0.39	0.26	0.28	0.36	0.54	0.32	0.22	1.36	0.24	0.26	0.41
6/13/02	0.28	0.38	0.3	0.2	0.22	0.32	0.38	0.28	0.19	0.3	1.19	0.24	0.36
7/8/02	NR	NR	NR	NR	2.11	NR	1.77	NR	NR	NR	NR	NR	1.94
8/12/02	0.37	0.8	0.71	0.42	0.86	0.71	1.05	0.55	0.27	0.36	0.21	0.3	0.55
8/13/02	NR	NR	4.44	3.87	NR	1.27	7.16	NR	NR	NR	NR	NR	4.19
9/6/02	NR	NR	0.28	0.26	0.19	0.26	0.26	0.24	NR	NR	NR	NR	0.25
11/5/02	NR	NR	0.28	0.24	0.24	0.24	1.3	0.22	NR	NR	NR	NR	0.42
12/3/02	NR	NR	0.20	0.13	0.55	0.47	2.61	0.42	NR	NR	NR	NR	0.73
1/9/03	NR	NR	0.2	0.22	0.47	0.28	3.61	0.26	NR	NR	NR	NR	0.84
2/11/03	NR	NR	0.77	0.91	0.83	0.3	6.03	0.26	NR	NR	NR	NR	1.52
3/27/03	1.42	0.34	2.63	NR	0.96	0.86	5.96	0.71	NR	NR	NR	NR	1.84

### TABLE 6: HORIZONTAL VAPOR EXTRACTION SYSTEM PERFORMANCE SUMMARY

**Facility Name:** Former Tenneco 285-08  
**Facility Address:** 4450 S. Suncoast Blvd., Homosassa FL  
**Facility ID#:** 098736154  
**Startup Date:** 10/26/99

NA= Not applicable; Data not available  
 scfm = standard cubic feet per minute  
 In. water= inches of water, vacuum


























Site Visit Date	Days Between Site Visits	Days Since Startup	Air Flow (scfm)	System Pressure (in. water)	Active HVEW Location	Well Head Pressures			
						HVEW-1	HVEW-2	HVEW-3	HVEW-4
1/17/00	0	0	NA	-14.0	1,2,3,4	-13	-13	-12	-11
2/18/00	30	30	232	-20.0	1,2,3,4	-20	-20	-17	-20
3/23/00	38	66	232	-25.0	1,2,3,4	-20	-21	-20	-20
4/17/00	25	91	215	-33.0	1,2,3,4	-20	-20	-20	-18
5/24/00	37	128	215	-35.0	1,2,3,4	-21	-20	-21	-20
6/2/00	9	137	248	-35.0	1,2,3,4	-20	-20	-18	-20
7/5/00	33	170	NA	NA	1,2,3,4	NA	NA	NA	NA
7/12/00	7	177	150	-38.0	1,2,3,4	NA	NA	NA	NA
8/24/00	43	220	150	-40.0	1,2,3,4	NA	NA	NA	NA
9/14/00	21	241	NA	-40.0	1,2,3,4	NA	NA	NA	NA
9/21/00	7	248	140	-46.0	1,2,3,4	NA	NA	NA	NA
9/28/00	7	255	NA	-45.0	1,2,3,4	NA	NA	NA	NA
10/4/00	8	261	180	-45.0	1,2,3,4	NA	NA	NA	NA
10/9/00	5	266	NA	-45.0	1,2,3,4	NA	NA	NA	NA
11/15/00	37	303	170	-48.0	1,2,3,4	NA	NA	NA	NA
12/19/00	34	337	200	-60.0	1,2,3,4	NA	NA	NA	NA
1/2/01	14	351	SVE system turned off.						
1/23/01	21	372	SVE system turned off.						
2/6/01	14	386	SVE system turned off.						
10/30/01	266	652	SVE system turned off.						
11/12/01	13	665	SVE system turned off.						
2/27/02	107	772	SVE system turned off.						
5/14/02	76	848	SVE system turned off.						
6/13/02	30	878	SVE system turned off.						
7/8/02	25	903	SVE system turned off.						
8/12/02	35	938	SVE system turned off.						
9/6/02	25	963	SVE system turned off.						
11/5/02	60	1023	SVE system turned off.						
12/3/02	28	1051	SVE system turned off.						
1/9/03	37	1088	SVE system turned off.						
2/11/03	33	1121	SVE system turned off.						
3/27/03	44	1165	SVE system turned off.						

## FIGURES

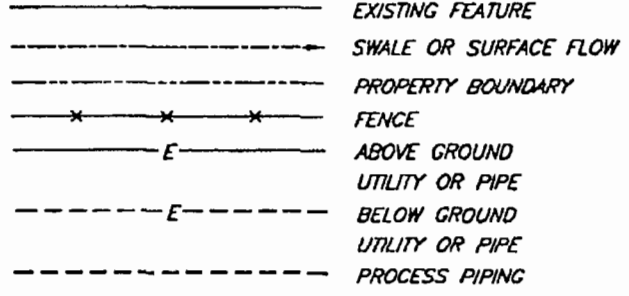


DATE: 11/2/01

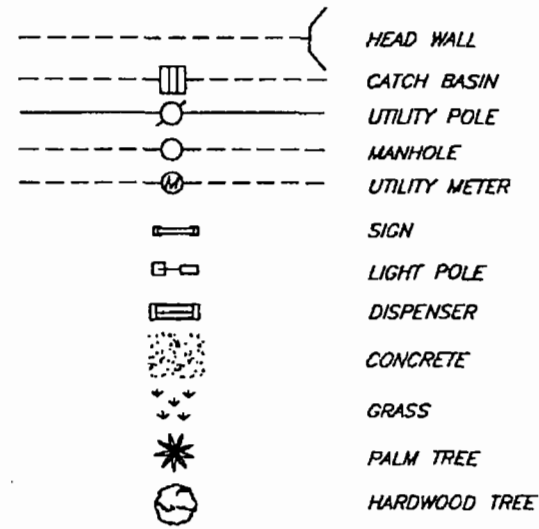
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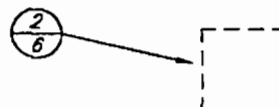
- MW-1  MONITORING/COMPLIANCE WELL
- MW-1  ABANDONED MONITORING WELL
- DW-1  DEEP MONITORING WELL
- TMW-1  TEMPORARY MONITORING WELL
- GMW-1  DIRECT PUSH MONITORING WELL
- RW-1  RECOVERY WELL
- VEW-1  VAPOR EXTRACTION WELL
- HVEW-1  HORIZONTAL VAPOR EXTRACTION WELL
- HWMP-1  HORIZONTAL WELL MONITORING POINT
- MPE-1/VEP-1  MULTI-PHASE EXTRACTION OR VACUUM ENHANCED PUMPING RECOVERY WELL
- AS-1/BS-1  AIR SPARGE/BIOSPARGE WELL
- IW-1  INJECTION WELL
- PZ-1  PIEZOMETER
- SB-1  SOIL BORING
- GS-1  GORE-SORBER
- GP-1  DIRECT PUSH SAMPLING
- CPT-1  CONE PENETROMETER TEST
- PB-1  PILOT BORING
- MIP-1  MEMBRANE INTERFACE PROBE
- TP-1  TEST PIT
- VP-1/BV-1  VAPOR/BIOVENT POINT
- O-1  OXYGEN PROBE
-  KEY MONITORING WELL
-  PERIMETER MONITORING WELL
-  PUBLIC SUPPLY WELL
- NA NOT APPLICABLE
- NM NO MEASUREMENT
- ND NOT DETECTED
- NS NOT SAMPLED
- NI NOT INSTALLED
- BDL BELOW DETECTION LIMITS

- ppm PARTS PER MILLION
- ppb PARTS PER BILLION
- mg/L MILLIGRAMS PER LITER
- ug/L MICROGRAMS PER LITER

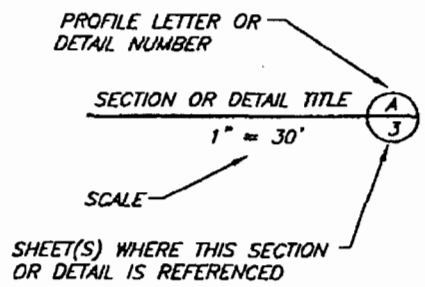


- LETTER ON UTILITY OR PIPE DENOTES SERVICE
- |    |             |    |                               |
|----|-------------|----|-------------------------------|
| E  | ELECTRICAL  | PW | POTABLE WATER                 |
| T  | TELEPHONE   | SS | SANITARY SEWER                |
| NG | NATURAL GAS | SW | STORMWATER SEWER              |
| SP | SAMPLE PORT | F  | FUEL OIL, GASOLINE, OR DIESEL |



 AREA WITHIN PHANTOM BORDER IS SHOWN IN DETAIL 2 ON SHEET "6"

 CUT SECTION IS SHOWN IN PROFILE AA



**ENVIRO-LOGICAL SOLUTIONS, INC.**  
 13135 N. DALE MABRY HIGHWAY  
 TAMPA, FLORIDA 33618  
 (813) 963-0811

SITE MAP LEGEND

DWG DATE: 7/24/02

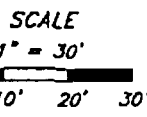
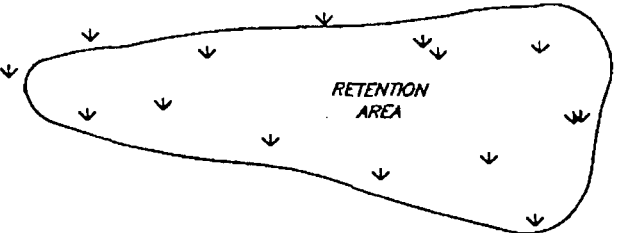
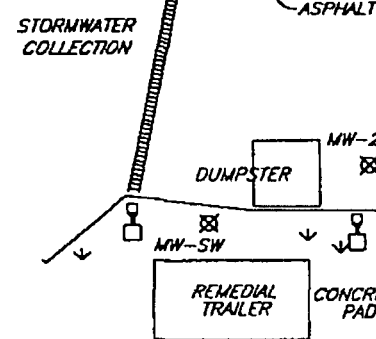
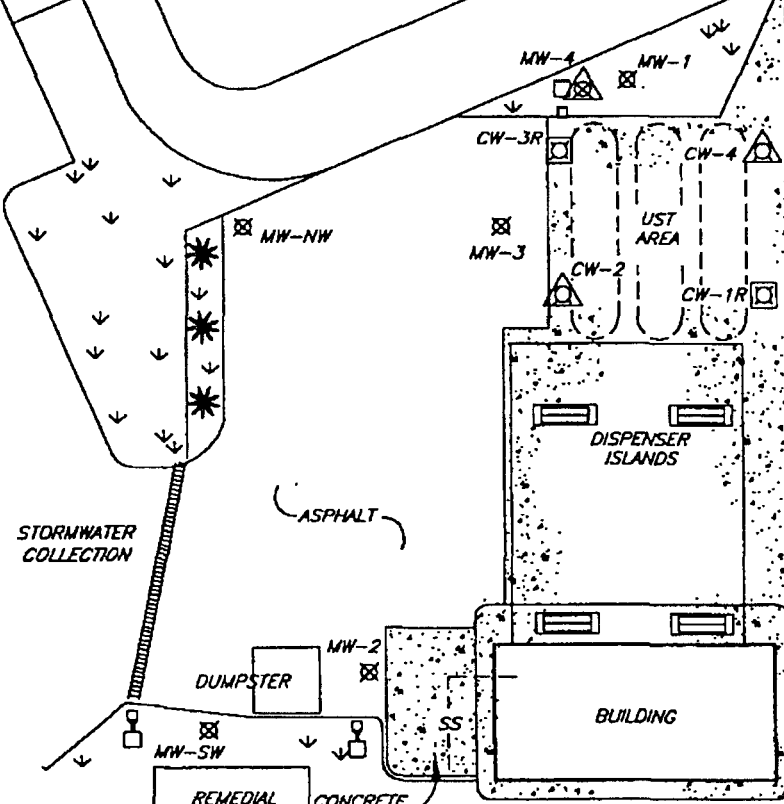
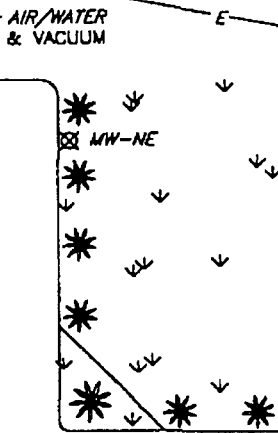
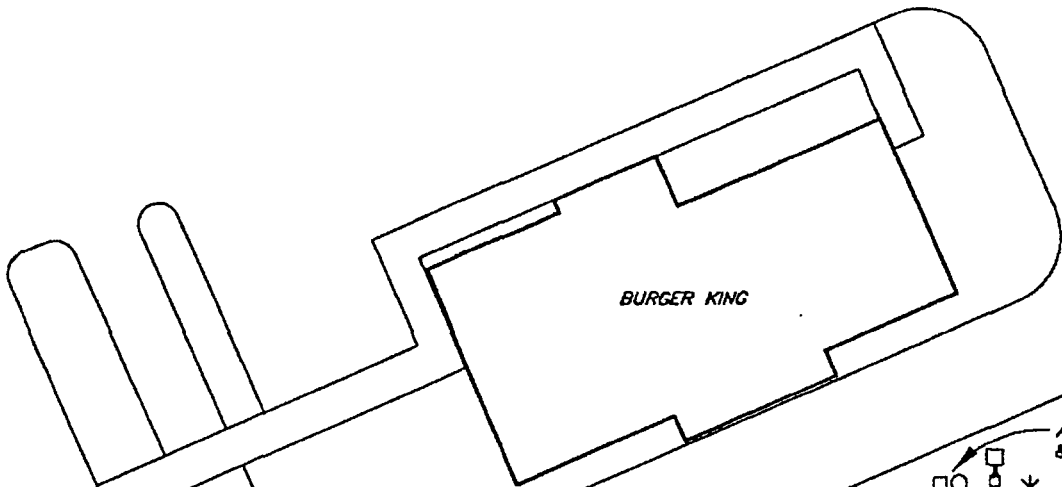
M:\CAD\DWG\PROJECTS\235-08\SITE\SITE2\SITE

LTF

DRAFTED BY:

CHECKED BY:

DESIGNED BY:



NOTE: REFER TO SITE MAP LEGEND FOR ADDITIONAL INFORMATION.



**ENVIRO-LOGICAL SOLUTIONS, INC.**  
 13135 N. DALE MABRY HIGHWAY  
 TAMPA, FLORIDA 33618  
 (813) 963-0811

**SITE LOCATION**  
 FORMER TENNECO #285-08  
 4450 SOUTH SUNCOAST BLVD.  
 HOMOSSA SPRINGS, FL 32646  
 FDEP #098736154

**TITLE**  
 FIGURE I  
 SITE MAP

DWG DATE: 2/13/03

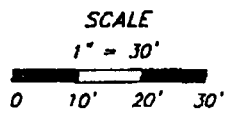
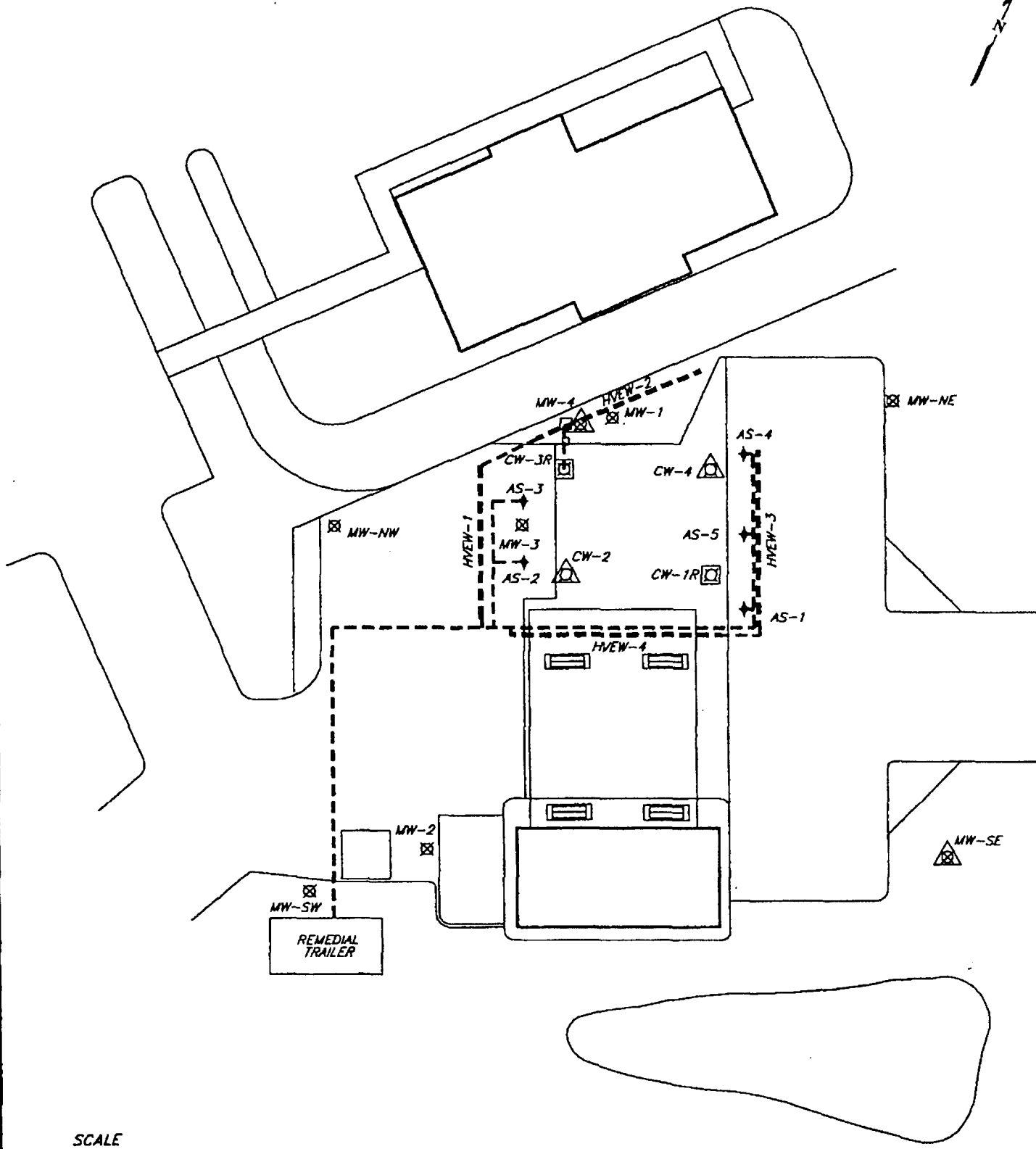
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DRAFTED BY: LTF

APPROVED BY:

CHECKED BY:

DESIGNED BY:



NOTE: REFER TO SITE MAP LEGEND FOR ADDITIONAL INFORMATION.



**ENVIRO-LOGICAL SOLUTIONS, INC.**  
 13135 N. DALE MABRY HIGHWAY  
 TAMPA, FLORIDA 33618  
 (813) 963-0811

**SITE LOCATION**  
 FORMER TENNECO #285-08  
 4450 SOUTH SUNCOAST BLVD.  
 HOMOSASSA SPRINGS, FL 32646  
 FDEP #098736154

**TITLE**  
 FIGURE 2  
 REMEDIAL WELL LOCATIONS

DWG DATE: 2/13/03

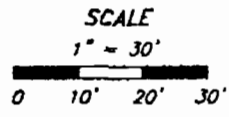
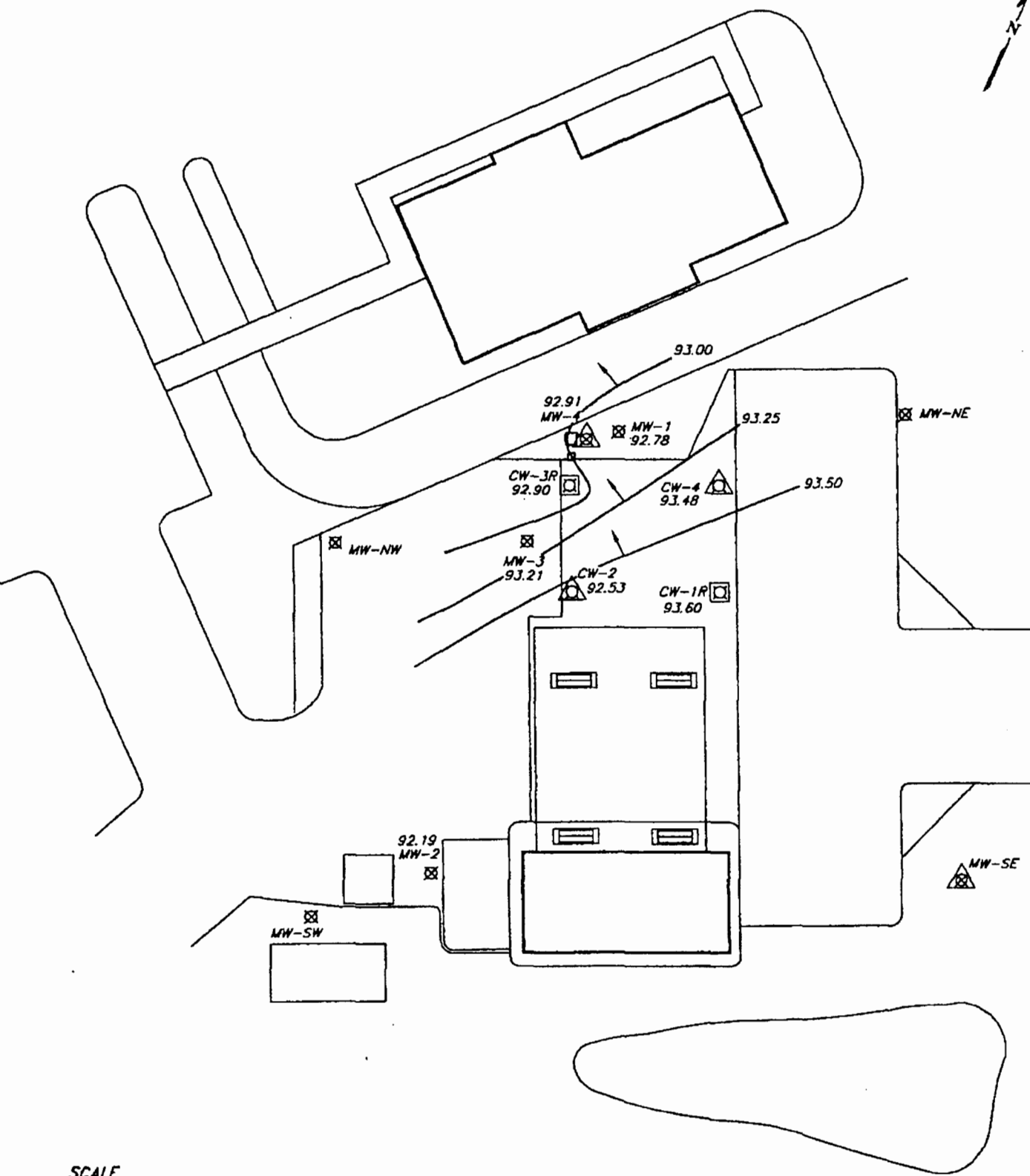
CAD FILE: M:\CAD\DWG\PROJECTS\8-285\SITE\SITE\WTEL-27-03

DRAFTED BY: LTF

APPROVED BY:

CHECKED BY:

DESIGNED BY:



NOTE: REFER TO SITE MAP LEGEND FOR ADDITIONAL INFORMATION.



**ENVIRO-LOGICAL SOLUTIONS, INC.**  
 13135 N. DALE MABRY HIGHWAY  
 TAMPA, FLORIDA 33618  
 (813) 963-0811

**SITE LOCATION**  
 FORMER TENNECO #285-08  
 4450 SOUTH SUNCOAST BLVD.  
 HOMOSSA SPRINGS, FL 32646  
 FDEP #098736154

**TITLE**  
 FIGURE 3  
 RELATIVE GROUNDWATER  
 ELEVATION CONTOURS  
 MARCH 27, 2003

DWG DATE: 2/13/03

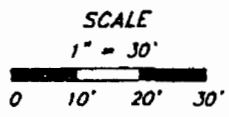
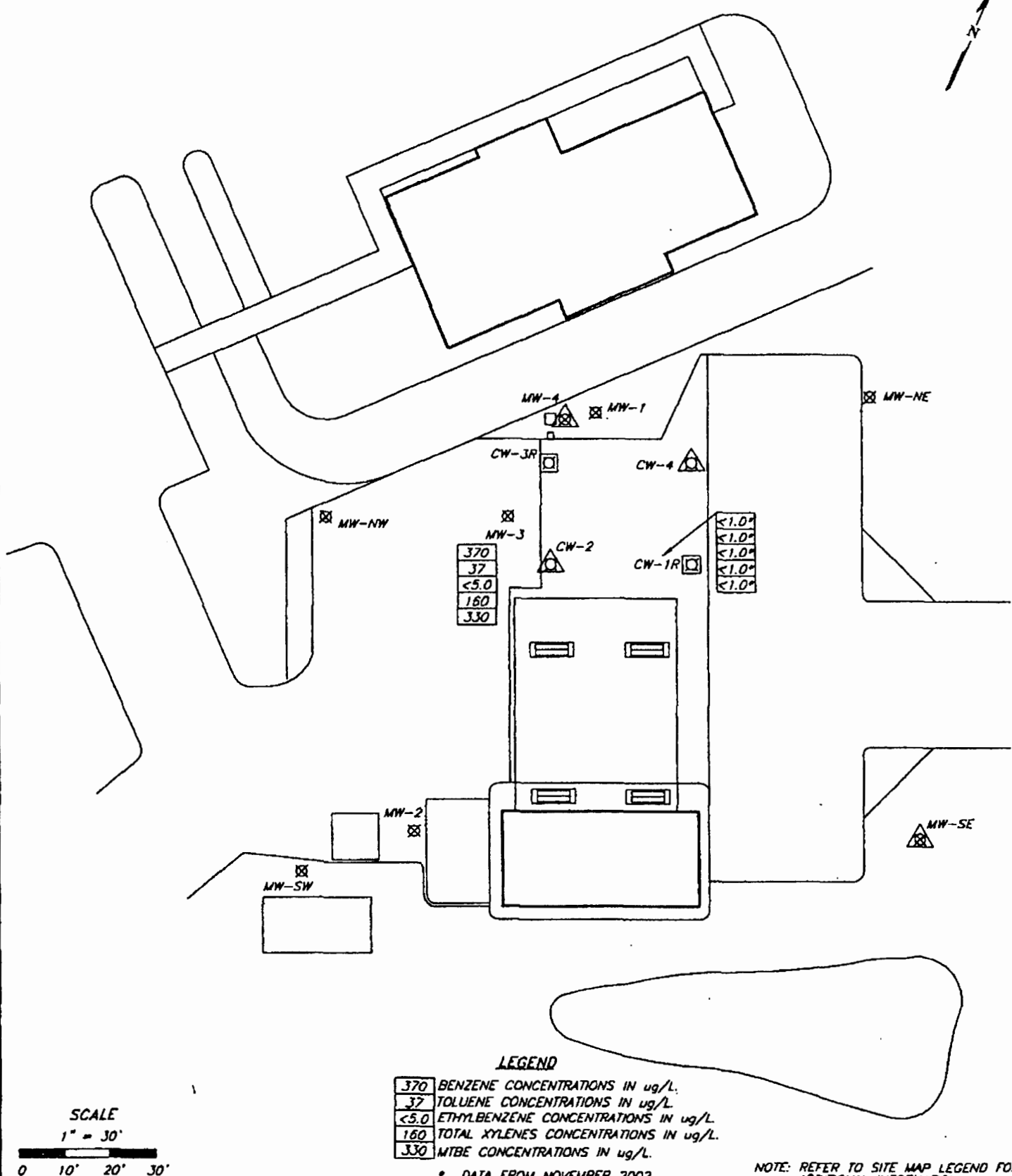
CAD FILE# M:\CAD\DWG\PROJECTS\6-28\ASITE\SITE\PETJ-27-03

DRAFTED BY: LTF

APPROVED BY:

CHECKED BY:

DESIGNED BY:



**LEGEND**

370	BENZENE CONCENTRATIONS IN ug/L.
37	TOLUENE CONCENTRATIONS IN ug/L.
<5.0	ETHYLBENZENE CONCENTRATIONS IN ug/L.
160	TOTAL XYLENES CONCENTRATIONS IN ug/L.
330	MTBE CONCENTRATIONS IN ug/L.

\* DATA FROM NOVEMBER 2002.

NOTE: REFER TO SITE MAP LEGEND FOR ADDITIONAL INFORMATION.



**ENVIRO-LOGICAL SOLUTIONS, INC.**  
13135 N. DALE MABRY HIGHWAY  
TAMPA, FLORIDA 33618  
(813) 963-0811

**SITE LOCATION**  
FORMER TENNECO #285-08  
4450 SOUTH SUNCOAST BLVD.  
HOMOSASSA SPRINGS, FL 32646  
FDEP #098736154

**TITLE**  
FIGURE 4  
DISSOLVED PETROLEUM  
HYDROCARBONS  
MARCH 27, 2003

**Site No. 19 Amoco #182 (#6322)**  
4205 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098945300  
EPA I.D. No. FLD984212639



State of Florida  
DEPARTMENT OF ENVIRONMENTAL REGULATION

## Interoffice Memorandum

TO: Tim Bahr, TRS to GJW  
2/2/94  
FROM: Jim LeBar, ESS  
SUBJECT: Additional Assessment @ Amoco # 6322  
(098945300)  
DATE: 1-27-94

I am requesting a quick review of this site for a determination on whether additional assessment (i.e. groundwater wells & soil borings) is needed. The site is in its third year of remediation and Amoco just decided to remove all the tanks on site in order to speed up the cleanup. However, the company destroyed most of the site's key wells during this work and put the contaminated soils back in the hole. I am asking for any recommendations as to where such replacement wells (if any) should be installed. Any comment?

D0071949



Storage Tank Facility Compliance Inspection Report

Facility ID 8945300 County 09 CITRUS Inspection Date 7/3/01  
 Facility Name AMOCO #182 Facility Type A-RETAIL  
 Latitude 28°48'22" Longitude 82°34'33" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ASTs Inspected	<u>2</u>
------------------	------------------	----------

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite 62-761 Description / Inspector's Comments Code

<u>600(1)(h)</u>	<u>With sensor LI in alarm the North tank intostice is no longer being monitored. Correct the alarm condition and continue to monitor tank intostice.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: C+I Effective Date: 8/1/00 Expiration Date: 7/31/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Paula Hibbard</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>7/3/01</u> Inspector Signature & Date	<u>Paula Hibbard</u> Facility Representative Signature & Date



Facility Name: Amoco #182 Facility ID: 8945300 Date: 7/3/2001

1 Cite Description / Inspector's Comments

	* 2001/2002 placard + RDRL are on Display at the facility.
	* The dispenser lines and piping sump are visually inspected monthly and the conditions are noted on the log.
	* Release detection is a Veeder Root TLS-350 with sensors L1 in North tank interstice L2 in South tank interstice L3 in piping sump. Sensor L1 is in alarm and the liquid in the North tank interstice must be removed. (see attached printout.
	* Fills are colored per API 637 and the spill bucket has ~1/4 inch of liquid.
	* Piping sump is dry and the pipe interstices are open to the sump.
	* The STPS are not equipped with line leak detectors (not required on ASTS)
	* Tanks are starting to rust. Recommend repainting.

Facility Name: Amoco #182 Facility ID: 8945300 Date: 7/3/01

Cite	Description / Inspector's Comments
	* Unable to access the dispenser lines as operator had no key.
	* 26 wells were observed on the site these wells are for use in the ongoing site assessment and clean up.
	* a photograph of the two ASTs has been added to the file.

July 9, 2001

Mr. Steve Weeks  
Quality Petroleum  
P.O. Box 33802  
Lakeland, FL 33802

**RE: ID # 098945300**  
Amoco #182  
4205 S. Suncoast Blvd.  
Homosassa Springs, FL 34446

Dear Mr. Weeks:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Attached are the 62-761, FAC, compliance inspection results for the above named facility. The inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to 62-761, FAC. Alleged violations are noted below.

Due to the alleged violations noted, this facility may not be operating in compliance with Chapter 62-761, FAC. Review the violations referenced below. Submit a response in writing within fourteen (14) days which provides a schedule for correcting the noted violations. Be advised that failure to take corrective action may result in enforcement action and the assessment of penalties.

---

**CITRUS COUNTY HEALTH DEPARTMENT**

**ENVIRONMENTAL HEALTH SECTION  
STORAGE TANK INSPECTION PROGRAM**

3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316

62-761.600(1)(h), FAC – Interstitial monitoring is not being performed for the secondarily contained portion(s) of the storage tank system(s). Any component of a storage tank system with secondary containment shall have an interstitial monitoring method meeting the requirements of Rule 62-761.640(3)(a), FAC.

**Suggested Corrective Action:** Correct the alarm in the North tank to allow monitoring of the interstice(s) at least monthly as required.

Note that unless otherwise indicated, the schedule for corrective action is 30 days. Any item for which insufficient information was provided to determine compliance status is followed by an asterisk (\*) and must also be addressed.

If you have any questions concerning this letter please call the Storage Tank Inspection Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

enclosure(s)  
CMS/file



1. data is current as of: 21-JUN-2001

Bureau of Petroleum Storage Systems  
Facility Inspection Cover Page

Facility Information

ID#: 8945300	District: SWD
Name: AMOCO #182	County: Citrus
4205 S Suncoast Blvd	Type: Retail Station
Homosassa Springs, FL 34446	Status: Open
Contact: STEVE WEEKS	Latitude: 28:48:22.0000
Phone: --863 687-2682 } CMS	Longitude: 82:34:33.0000 } CMS
	LL
	Method: AGPS

Account Owner Information

Name: Quality Petroleum Corp  
 Po Box 3889  
 Lakeland, FL 33802  
 Phone: 863-687-2682

Tank Owner Information

Name: Quality Petroleum Corp  
 Po Box 3889  
 Lakeland, FL 33802  
 Phone: 863-687-2682

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
--------	------	---------	-----------	-----------	--------	-------	------	---------

5	12000	Vehicular Diesel	03/01/1994	ABOVE	U	I L M P N	C F J K <del>X</del>	F H 1 K 2 4 3 S
6	12000	Unleaded Gas	03/01/1994	ABOVE	U	I L M P N	C F J K <del>X</del>	F H 1 K 4 3 S
1	8000	Vehicular Diesel	07/01/1972	UNDER	B			
2	10000	Unleaded Gas	07/01/1985	UNDER	B			
3	10000	Unleaded Gas	07/01/1972	UNDER	B			
	10000	Unleaded Gas	07/01/1972	UNDER	B			

} CMS.

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

N OPEN violations found!

Mc Recent Insurance Document

FR Type	Effective Date	Expiration Date	Company Name
INSURANCE	04/29/1994	08/01/2000	COMMERCE & INDUSTRY

End of Data for Facility #: 8945300

**Site No. 20 Walgreens #4217 (aka Larry's Auto Sales)**  
4029 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 099202408  
EPA I.D. No. FLR000231132



# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

July 20, 2000

MR. JAMES PETERSON  
PETERSON, JAMES A  
PO BOX 560  
HOMOSASSA SPRINGS, FL 34447

Re: LARRYS AUTO SALES  
4029 S SUNCOAST BLVD  
HOMOSASSA SPRINGS, FL 34447  
FDEP Identification # 099202408

Dear MR. PETERSON:

This letter is in regard to the status of the cleanup of your site. This site is eligible for State funding assistance for the clean up of the reported petroleum contamination. The Florida Department of Environmental Protection (Department) is required by statute to preapprove the scope of work and cost for the cleanup of a petroleum contaminated site if State funds will be used to pay for that cleanup (Section 376.30711(1)(b), Florida Statutes (F.S.)). The Department is further required to clean up petroleum contaminated sites in priority order as established by the Petroleum Cleanup Site Priority Ranking Rule, Chapter 62-771, Florida Administrative Code.

This site has been assigned a priority score of 30. Currently funding is available for all sites with a priority score of 30 or greater. Therefore funding is available for work on this site under the Preapproval Program. In the Preapproval Program the Department works directly with the contractor of your choice to determine the scope and cost for cleanup work. The Department promptly pays the contractor directly, upon completion of the work.

You should indicate your choice of contractor by completing and returning the enclosed "Contractor Designation Form" (CDF.) If you do not want to designate a contractor, or would prefer that the State manage the cleanup of your site, complete the enclosed CDF and designate "State" as the contractor. Please note that the "Real Property Owner" should complete this form. If you would prefer that we coordinate our efforts with your representative, then please indicate this person on the "Real Property Owner Designated Contact" line.

If you have previously submitted a Contractor Designation Form, we are requiring that you complete the revised form because it includes important program information. Please take a few minutes to read and understand the information presented on the form because it may affect the cleanup of your site. Please note that the enclosed form is the latest version of the Contractor Designation Form. We do not accept previous versions of this form.

*"Protect, Conserve and Manage Florida's Environment and Natural Resources"*

*Printed on recycled paper*



Letter requesting contractor designation  
July 20, 2000  
Page two

The real property owner's signature must be notarized and the original form returned to my attention, Mail Station 4545 at the letterhead address. If you have any questions regarding this form or if you have comments on your site's score or rank, please contact me at (850) 921-9210.

Sincerely,  


Erik Swanson  
Environmental Specialist III  
Petroleum Cleanup Section 2

Enclosure: Contractor Designation Form

**Site No. 24 Fina Station (Jay's 66 Service)**  
3951 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098503076



Florida Department of Environmental Regulation  
Twin Towers Office Building • 3600 Blair Stone Road • Tallahassee, Florida 32399-2400

DCA Form #	17-761.500(1)
Form Title	Discharge Reporting Form
Effective Date	December 10, 1990
DCA Application No.	if used in by DCA

# Discharge Reporting Form

Use this form to notify the Department of Environmental Regulation of:

- Results of tank tightness testing that exceed allowable tolerances within ten days of receipt of test result.
- Petroleum discharges exceeding 25 gallons on pervious surfaces as described in Section 17-761.460 F.A.C. within one working day of discovery.
- Hazardous substance (CERCLA regulated), discharges exceeding applicable reportable quantities established in 17-761.460(2) F.A.C., within one working day of the discovery.
- Within one working day of discovery of suspected releases confirmed by: (a) released regulated substances or pollutants discovered in the surrounding area, (b) unusual and unexplained storage system operating conditions, (c) monitoring results from a leak detection method or from a tank closure assessment that indicate a release may have occurred, or (d) manual tank gauging results for tanks of 550 gallons or less, exceeding ten gallons per weekly test or five gallons averaged over four consecutive weekly tests.

Mail to the DER District Office in your area listed on the reverse side of this form

PLEASE PRINT OR TYPE  
Complete all applicable blanks

1. DER Facility ID Number: 098503076 2. Tank Number: 1-4 3. Date: 8/13/93

4. Facility Name: Fina Station

Facility Owner or Operator: Whetstone Oil Co

Facility Address: 3951 South Suncoast Blvd, Homosassa Springs, FL 34448

Telephone Number: (904) 638-1150 County: Citrus

Mailing Address: P.O. Box 1257, Crystal River, FL 32623-1257

5. Date of receipt of test results or discovery: 8/13/93 month/day/year

6. Method of initial discovery. (circle one only)
- |   |                                    |   |
|---|------------------------------------|---|
| <input checked="" type="radio"/> A. Liquid detector (automatic or manual) | D. Emptying and inspection.        | F. Vapor or visible signs of a discharge in the vicinity. |
| <input type="radio"/> B. Vapor detector (automatic or manual)             | E. Inventory control.              | G. Closure: _____ (explain)                               |
| <input type="radio"/> C. Tightness test (underground tanks only).         | <u>NW compliance well has seep</u> | H. Other: _____   |

7. Estimated number of gallons discharged: unknown

8. What part of storage system has leaked? (circle all that apply) A. Dispenser B. Pipe C. Fitting D. Tank E. Unknown  
\* Leak Detector on Gas Tank

9. Type of regulated substance discharged. (circle one)
- |   |                     |                   |   |
|---|---------------------|-------------------|---|
| <input type="radio"/> A. leaded gasoline              | D. vehicular diesel | L. used/waste oil | V. hazardous substance includes pesticides, ammonia, chlorine and derivatives (write in name or Chemical Abstract Service CAS number) |
| <input checked="" type="radio"/> B. unleaded gasoline | F. aviation gas     | M. diesel         | Z. other (write in name) _____  |
| <input type="radio"/> C. gasohol                      | G. jet fuel         | O. nonfluo oil    |   |

10. Cause of leak. (circle all that apply) O Ring on Leak Detector

<input type="radio"/> A. Unknown	<input checked="" type="radio"/> C. Loose connection	E. Puncture	G. Spill _____	I. Other (specify) _____
<input type="radio"/> B. Split	D. Corrosion	F. Installation failure	H. Overfill	

11. Type of financial responsibility. (circle one)

<input checked="" type="radio"/> A. Third party insurance provided by the state insurance contractor	C. Not applicable	<u>FPL # 7626602</u>
<input type="radio"/> B. Self-insurance pursuant to Chapter 17-769.500 F.A.C.	D. None	

12. To the best of my knowledge and belief all information submitted on this form is true, accurate, and complete.

Michael G. Whetstone  
Printed Name of Owner, Operator or Authorized Representative

Michael G. Whetstone  
Signature of Owner, Operator or Authorized Representative



State of Florida  
DEPARTMENT OF ENVIRONMENTAL REGULATION

For Routing To Other Than The Addressee	
To: _____	Location _____
To: _____	Location _____
To: _____	Location _____
From _____	Date _____

# Interoffice Memorandum

TO: Paula Noblitt, Southwest District Office

THROUGH: Tim Bahr, Technical Review Section *B*  
Bureau of Waste Cleanup

FROM: Jorge R. Caspary, Technical Review Section *JPC*  
Bureau of Waste Cleanup

DATE: March 27, 1991

SUBJECT: No Further Action Proposal  
Mason's Concrete Ready Mix, Inc.  
Crystal River Plant, Citrus County.  
DER File No. 90-1804

-----

Based on my review of the Contamination Assessment Reports (CARs) prepared by Dames and Moore and Law Environmental for the above referenced facility, I concur with the consultant's "No Further Action Proposal" recommendation for the petroleum related contamination.

Supplemental work to determine the source, degree and extent of the elevated pH values in the soil and groundwater is recommended.

If you have any questions, please contact me at Suncom 278-0190.



D0061492

PLRIP

REIMBURSEMENT ELIGIBILITY REVIEW CHECKLIST/ROUTING SLIP

Site FINA- WHEATSTONE DL Fac.# 098503076 Proj. Manager B. Tummy

Latitude 28 153151 Longitude 82 52132

INITIALS

DATE

STATE

[Signature] 1/26/94 Inspection Date 8/24/93

[Signature] 1/26/94 Review Documentation (Use Documentation List and Reimbursement Eligibility Worksheet)

[Signature] 1/26/94 Prepare Letter or Final Order (Check appropriate line)

- 1. Insufficient Documentation (Generic.3)
- 2. Eligible (Generic.5, enclose Estimate Form and Reimbursement Application Form)
- 3. Ineligible (Generic.6)

[Signature] 2/3/94 Review Letter (Check each line after verification of information)

- 1. Proper Addressee
- 2. Facility Name
- 3. Facility Address
- 4. DER Facility Number (if no number, see Supervisor)
- 5. CC: All Other Applicants
- 6. CC: District Inspector
- 7. CC: Local Program (if applicable)
- 8. Switch "P" to "E", or "I" on file

INELIGIBLE ORDERS ONLY

- 1. Switch "P" to "I" on file

Signature

Bureau Chief (Ineligible Orders Only-Gen.6)

Project Manager (Insufficient Documentation-Gen.3)

[Signature] 2/3/94 Eligible signature stamp (Gen.5) and Mail Copies (Nora)

MAPPER Update

File Copy of Letter or Final Order to Log Out)

Ineligible (STI048) Data Entry

ELIGIBLE

- 1. Eligible (STI048) Data Entry
- 2. Mailing List update

Return to File Room

**NEW FILE**



# UNIFIED ENVIRONMENTAL SERVICES, INC.



January 10, 1994

Mr. Bill Truman  
F.D.E.P.-Petroleum Insurance Section  
Tallahassee, Florida

RE: Discharge Reporting Form/Letter of Intent  
Whetstone Oil Company  
Fina Station  
3951 S. Suncoast Blvd.  
Homosassa Springs, Florida  
F.D.E.P. # 098509076

RECEIVED  
 D.E.P.  
 29 JAN 26 PM 2:07  
 STORAGE TANK  
 REGULATION


Dear Mr. Truman:

Enclosed is the Discharge Reporting Form for the facility referenced above. Upon a compliance inspection, performed by UES on August 13, 1993, a heavy petroleum sheen (~0.25 inch thickness) was observed in the northwest compliance well. Included is a monitor well inspection form for the facility.

A State of Florida certified tank and line tightness test was completed by Tankology for the facility, with no leak observed. Copies of the test results are included.

The owner intends to place the site in State of Florida administered cleanup, under FLIPA Policy # 7628602. This data was submitted to the Southwest District in August 1993.

If there should be any questions, please feel free to contact me at the telephone number listed below or Mr. Mike Whetstone at (904)628-1150.

Sincerely,  
  
 Keith McDonald  
 Hydrogeologist

ENCLOSURES

cc: Mr. Mike Whetstone  
 Mr. Dick Sossna (Citrus County)



DER Form #	17-761.480(2)
Form Title	Discharge Reporting Form
Effective Date	December 10, 1990
DER Application No.	Filed in by DER

# Discharge Reporting Form

Use this form to notify the Department of Environmental Regulation of:

- Results of tank tightness testing that exceed allowable tolerances within ten days of receipt of test result.
- Petroleum discharges exceeding 25 gallons on pervious surfaces as described in Section 17-761.480 F.A.C. within one working day of discovery.
- Hazardous substance (CERCLA regulated), discharges exceeding applicable reportable quantities established in 17-761.480(2) F.A.C., within one working day of the discovery.
- Within one working day of discovery of suspected releases confirmed by: (a) released regulated substances or pollutants discovered in the surrounding area, (b) unusual and unexplained storage system operating conditions, (c) monitoring results from a leak detection method or from a tank closure assessment that indicate a release may have occurred, or (d) manual tank gauging results for tanks of 550 gallons or less, exceeding ten gallons per weekly test or five gallons averaged over four consecutive weekly tests.

Mail to the DER District Office in your area listed on the reverse side of this form

PLEASE PRINT OR TYPE  
Complete all applicable blanks

1. DER Facility ID Number: 098503076 2. Tank Number: 1-4 3. Date: 8/13/93

4. Facility Name: Fina Station

Facility Owner or Operator: Whetstone Oil Co

Facility Address: 3951 South Suncoast Blvd, Homosassa Springs, FL 34448

Telephone Number: (904) 628-1150 County: CITRUS

Mailing Address: P.O. Box 1257, Crystal River, FL 32623-1257

5. Date of receipt of test results or discovery: 8/13/93 month/day/year

6. Method of initial discovery. (circle one only)
- |   |                             |   |
|---|-----------------------------|---|
| <input checked="" type="radio"/> A. Liquid detector (automatic or manual) | D. Emptying and inspection. | F. Vapor or visible signs of a discharge in the vicinity. |
| B. Vapor detector (automatic or manual)                                   | E. Inventory control.       | G. Closure: _____ (explain)                               |
| C. Tightness test (underground tanks only).                               | H. Other: _____             |   |
- NW compliance well has been*

7. Estimated number of gallons discharged: Unknown

8. What part of storage system has leaked? (circle all that apply) A. Dispenser B. Pipe C. Fitting D. Tank E. Unknown  
\* LEAK DETECTOR ON GAS TANK

9. Type of regulated substance discharged. (circle one)
- |   |                     |                   |   |
|---|---------------------|-------------------|---|
| A. leaded gasoline                                    | D. vehicular diesel | L. used/waste oil | V. hazardous substance includes pesticides, ammonia, chlorine and derivatives (write in name or Chemical Abstract Service CAS number) _____ |
| <input checked="" type="radio"/> B. unleaded gasoline | F. aviation gas     | M. diesel         | Z. other (write in name) _____  |
| C. gasohol  | G. jet fuel         | O. nonlubo oil    |   |

10. Cause of leak. (circle all that apply)
- |            |  |                                |             |                |                          |
|------------|--|--------------------------------|-------------|----------------|--------------------------|
| A. Unknown | <input checked="" type="radio"/> C. Loose connection | <u>O Ring on Leak Detector</u> | E. Puncture | G. Spill _____ | I. Other (specify) _____ |
| B. Split   | D. Corrosion   | F. Installation failure        | H. Overfill |                |                          |

11. Type of financial responsibility. (circle one)
- |  |                   |                      |
|--|-------------------|----------------------|
| <input checked="" type="radio"/> A. Third party insurance provided by the state insurance contractor | C. Not applicable | <u>FPL # 7626602</u> |
| B. Self-insurance pursuant to Chapter 17-769.500 F.A.C.  | D. None           |                      |

12. To the best of my knowledge and belief all information submitted on this form is true, accurate, and complete.

Michael G. Whetstone  
Printed Name of Owner, Operator or Authorized Representative

Michael G. Whetstone  
Signature of Owner, Operator or Authorized Representative

DATE AUG. 24, 1993

DER Facility # 12098

Facility Name F.I.N. HAROLDIA

Facility Address 3451 S. SUNCOAST BLVD HAROLDIA, FL 34446

Contact Person/Telephone MIKE WILKINSON

Latitude 28° 53' 51" N Longitude 82° 52' 33" W

REGISTRATION NO. 02671150  
ISSUE DATE APR 11 85

For the items below that may indicate non-compliance or gross negligence, please explain in detail and provide supporting documentation.

- I. Compliance with Chapter 376.3072, Florida Statutes and Chapter 17-769, F.A.C.
1. Was any contamination discovered prior to January 1, 1989? If yes, explain.  
 YES  NO  UNKNOWN
2. Petroleum Liability Insurance Program Affidavit form completed? If yes, give notarized.  
 YES  NO  UNKNOWN
3. Is the site insured by FPLIPA? If not, supply the carrier insured with or of type of financial responsibility mechanism used.  
 YES  NO  UNKNOWN
4. Restoration Coverage Notice of Eligibility issued? If yes, give effective date.  
 YES  NO  UNKNOWN
5. Has site access ever been denied?  
 YES  NO  UNKNOWN
6. Has a Storage Tank Program compliance inspection ever been performed for this facility? If yes, give the date of the most recent inspection and supply a copy.  
 YES  NO  UNKNOWN
7. Has the suspected petroleum storage system component responsible for the disc been removed from service within 3 days of discovery? If no, explain.  
 YES  NO  UNKNOWN
8. Have steps to obtain cleanup services been initiated within 3 days of the disc discovery? If no, explain.  
 YES  NO  UNKNOWN

II. Information Required for Site Scoring and Ranking

9. Is there evidence of a contamination problem? If yes, explain in comment section.  
 YES  NO
- If yes to 9, check one:
- a. Two or more monitoring wells/boreholes show >2" free product.  
 YES  NO
- b. Only 1 monitoring well shows >2" free product or monitoring wells show <2" free product or petroleum sheen.  
 YES  NO



c. Monitoring wells are contaminated but contain no free product (hydrocarbon).  
CONTAINS SHEEN  
d. Soil contamination and/or free product less.

Check one:

- 
- 
- 

10. Contamination Product Type
- a. Light petroleum (kerosene, gasoline, aviation fuel, etc.)
  - OR
  - b. Heavy petroleum (fuel oil, diesel or similar petroleum products)
  - c. Unknown or other

Check those that apply:

- 
- 
- 
- 
- 

11. Potable water
- a. Within 1/2 mile: large wells >100,000 gpd
    - 1. Indicate direction: \_\_\_\_\_
    - 2. Estimate distance: \_\_\_\_\_
  - b. Within 1/4 mile: small wells <100,000 gpd
    - 1. Indicate direction: \_\_\_\_\_
    - 2. Estimate distance: \_\_\_\_\_
  - c. Surface water body used as a public water system.
12. Indicate below proximity to population centers (restaurant, shopping center, house, etc.)
- a. < 500 feet: Indicate distance: WEST 150 FT. SOUTHEAST 100 FT.
  - b. > 500 feet: Estimate distance: \_\_\_\_\_

Please indicate how the site scoring and sampling information was determined. HRS #  
FIELD INSPECTION

Comments: AREA IS ON CITY WATER  
DISCHARGE REPORTING FORM RECEIVED 8/31/93  
TANK & LINE TIGHTNESS TEST TO BE MADE WITHIN 20 DAY  
PERMITS FOR 8/27/93 TANK NEARBY DRAINAGE  
TANK, LINE & LEAK DETECTOR TESTED OK 8/27/93

RICHARD T. SOSNA  
Compliance Inspector

8/31/93  
Inspection Date

DER District: \_\_\_\_\_ (or) Local Program: CITRUS COUNTY  
FIRE PREVENTION



### Storage Tank Facility Compliance Inspection Report

Facility ID 8503076 County 09 CITRUS Inspection Date 12/12/2000  
 Facility Name FINA STATION (HOMOSASSA) Facility Type A-RETAIL  
 Latitude 28°48'15" Longitude 82°34'34" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>4</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

\* "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
610(4)(a)2.	Single Walled pressurized piping equipped with mechanical line leak detectors has not been tightness tested annually.	
640(3)(d)	Line leak detectors have not had an annual test of <del>the</del> operation in accordance with manufacturer's requirements.	

Financial Responsibility - Verify owner's coverage. Select *Insurance* or *Other*, and provide *Mechanism*, if appropriate.  
 Insurance Carrier: C&I Effective Date: 4/24/2000 Expiration Date: 4/24/2001  
 Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_  
 None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement  
 A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u>	<u>352-527-5289</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u>	<u>James N. King</u>
Inspector Name - Please Print	Facility Representative Name - Please Print
<u>Mark S. [Signature]</u> <u>12/12/2000</u>	<u>James N. King</u>
Inspector Signature & Date	Facility Representative Signature & Date

Facility Name: FINA STATION Facility ID: 8503076 Date: 12/12/2000


Cite	Description (Inspector's Comments)
	Release detection is SIR by TOTAL
	SIR first report from 10/2000
	results Diesel - PASS
	PLUS - INC.
	* unlead - fail *
	Prem - INC
	The investigation for the failed Unleaded
	revealed poor sticking procedures
	* Send copy of 11/2000 report to
	Citrus tank office * future fails or
	2 consecutive inconclusives may require
	tank tightness testing.
	previous SIR vendor S E Liquid Analyzers
	Discontinued 9/2000
	Dispenser lines and STP'S are visually
	checked monthly, and the results are recorded
	in log book
	Diesel dispenser was wet
	Gas # 3/4 had 1/2 inch of liquid.
	Gas # 5/6 + 7/8 both dry
	All 4 STP'S have had soil removed from
	around them, and the flex connectors are
	covered with bats.
	4 monitor wells still open marked as Asses
	due to discharge 8/13/1993
	placard is displayed and RDRL is on file

**Memorandum**

**Florida Department of  
Environmental Protection**

---

TO: File

From: Leslie Pedigo   
Environmental Specialist III  
FDEP-SWD Storage Tank Section

Date: December 14, 1999

Subject: Discharge Report Dated April 7, 1999  
Homosassa Fina  
3951 South Suncoast Boulevard  
Homosassa, Citrus County, Florida  
FDEP ID #098503076

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The discharge reported April 7, 1999 was in response to contaminated soil discovered during the upgrade of the dispensers with dispenser liners. Visual staining and odors were noted. Since the site already had reported contamination (August 13, 1993), confirmation soil samples were not collected for analysis. The August 13, 1993 DRF was filed in response to a ¼ inch of product being discovered in the northwest monitoring well, the well closest to the dispensers. This discharge is eligible for FPLRIP and a site assessment has not been completed. It appears that the contamination noted on the April 7, 1999 DRF and April 20, 1999 Closure report is a "rediscovery" of the contamination documented in the August 13, 1993 DRF. The April 7, 1999 DRF will not be entered into PCT.

LELP

cc: Michael Bland, FDEP-BPSS

**CLOSURE ASSESSMENT REPORT  
DISPENSER PAN UPGRADE**

**FACILITY ID 098503076  
HOMOSASSA FINA  
3951 SOUTH SUNCOAST BOULEVARD  
HOMOSASSA, FLORIDA**

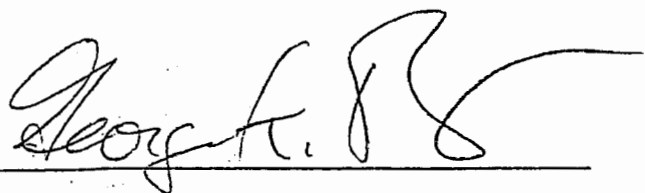
**Prepared for:  
J & J Equipment Company  
Brooksville, Florida**

**Prepared by:  
Creative Environmental Solutions, Inc.  
Brooksville, Florida**

**April 20, 1999**

## FLORIDA PROFESSIONAL GEOLOGIST CERTIFICATION

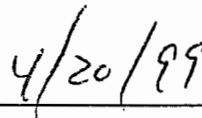
This closure assessment report for the dispenser pan upgrades at Facility ID 098503076 (Homosassa Fina), located at 3951 South SunCoast Blvd., Homosassa, Florida, has been reviewed by George K. Foster of Creative Environmental Solutions, Inc. (CES), Brooksville, Florida, and appears to comply with the current standards and practices in the field of geology in the State of Florida. CES's professional services have been performed using the degree of care and skill ordinarily exercised under similar circumstances by other professionals practicing in this field. The certification of geologic work contained herein applies only to the original sealed document(s), and specifically does not pertain to any copies of this document or any portion thereof including mylars, linen, sepia or other materials which can be changed by the entity or entities with whom such document(s) are filed. No other warranty, expressed or implied, is made as to the professional advice in this report.



George K. Foster, PG 403

President/Principal

CES



Date of signature

## **INTRODUCTION**

The Homosassa Fina is located at 3951 South SunCoast Boulevard in Homosassa, Citrus County, Florida. For purposes of storage tank registration, the facility has been assigned ID 098503076. A location map and site plan are attached. This closure assessment was for the three unleaded gasoline dispensers and the diesel dispenser on the west side of the store building. Dispenser pans were placed under all four dispensers and the system was returned to service.

According to FDEP officials in Tampa, the site has previously documented contamination and is enrolled in the PLIRP cleanup program. FDEP reported that the site received a score of 6 based on site conditions.

## **IDENTIFICATION OF CONTRACTORS**

J and J Equipment Company of Brooksville, Florida conducted all construction activities. This Closure Assessment was conducted by Creative Environmental Solutions, Inc. of Brooksville.

## **SUMMARY OF CLOSURE ASSESSMENT PROCEDURES**

All assessment activities were conducted on March 29, 1999. After the dispensers were removed and before the new dispenser pans were installed, soil borings were advanced to depths of a least 4 ft beneath each dispenser. Soil samples were collected from each boring at one foot intervals and screened in the field for organic vapor concentrations with an organic vapor analyzer. No soil samples were returned to the laboratory for testing. No groundwater samples were collected.

## **RESULTS OF ASSESSMENT**

Strong soil vapors were encountered in all of the soil borings from grade to the top of the water table. Saturated soil was found in the boring beneath the diesel dispenser. The water table is present beneath the site at a depth of approximately 4 ft. The soil screening results are attached. The highest OVA reading obtained was 1,000+ ppm.

## **CONCLUSIONS**

The closure assessment demonstrated that the soil and groundwater have been impacted. Additional assessment is warranted for this site.

**Site No. 25 Island Foods #518 (Shell)**  
3900 S. Suncoast Boulevard (US 19 and 8<sup>th</sup> Street)  
Homosassa, Florida  
FDEP I.D. No. 098503163





Storage Tank Facility Compliance Inspection Report

Facility ID 8503163 County 09 CITRUS Inspection Date 1/19/2001  
 Facility Name ISLAND FOODS Facility Type A-RETAIL  
 Latitude 28°48'19" Longitude 82°34'37' L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ATSS Inspected	<u>2</u>
------------------	------------------	----------

Compliance Inspection (Annual)	TCI	Installation Inspection	TIN
Compliance Inspection (DRF received)	TCDI	Closure Inspection	TXI
Compliance Inspection (Complaint received)	TCPI	Compliance Re-Inspection	TCR <u>X</u>
Discharge Evaluation ("short form")	TDI	** Record the results of the TDI in a Discharge Project	

"Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	A Ball Valve has been installed so that the tank interstice can be checked for liquid monthly.	
	Be sure the tank interstice is added to your monthly inspection sheet	
	Please send a copy of next month visual check for this system to DOH	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

X Insurance Carrier: CIT Effective Date: 10/1/00 Expiration Date: 10/1/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted

CITRUS ENVIRONMENTAL HEALTH Storage Tank Program Office <u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>352-527-5295</u> Storage Tank Program Office Phone Number <u>BARBARA F. DANIELS</u> Facility Representative Name - Please Print
<u>[Signature]</u> <u>1/19/01</u> Inspector Signature & Date	<u>[Signature]</u> Facility Representative Signature & Date



25

# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

June 18, 2002

Mr. Eugene E. Ray  
Handex of Florida  
111 Kelsey Lane, Suite E  
Tampa, Florida 33619-

Subject: Natural Attenuation Monitoring Plan Approval-Site Assessment Approval  
Island Food Store #518  
3900 South Suncoast Blvd.  
Homosassa Springs, Citrus County  
FDEP Facility ID# 098503163

Dear Mr. Ray:

The Bureau of Petroleum Storage Systems has completed the review of the Site Assessment Report and Natural Attenuation Monitoring Plan dated May 15, 2002, received May 17, 2002, and the Site Assessment Reports dated October 10, 1991, December 8, 2000, January 8, 2001, July 25, 2001, and February 12, 2002, submitted for the discharge discovered on October 22, 1984 at this site. We found all the documents submitted to date to be adequate to meet the site assessment requirements of Rule 62-770.600, Florida Administrative Code (F.A.C.). Pursuant to Rule 62-770.690, Florida Administrative Code (F.A.C.), the Department of Environmental Protection (Department) approves the Natural Attenuation Monitoring Plan.

The monitoring wells to be sampled, the sampling parameters, and the sampling frequency for the one year are as follows:

<u>Monitoring Wells</u>	<u>Contaminants of Concern</u>	<u>Frequency</u>
MW-1, MW-2, MW-3 and MW- 8	BTEX, MTBE, & PAHs	Quarterly

The approved Remedial Action by Natural Attenuation monitoring period is one year. The sampling frequency will be evaluated following the submittal of the annual report to determine whether additional sampling may be appropriate.

If concentrations of contaminants of concern in any of the designated wells increase above the action levels listed below, a verbal authorization request should be submitted to the Department so the well or wells can be resampled no later than 30 days after the initial positive results are known. If the results of the resampling confirm the initial sampling results, then a verbal

*"More Protection, Less Process"*

Visit Our Internet Site At: [www.dep.state.fl.us/waste/catagories/pcp/default.htm](http://www.dep.state.fl.us/waste/catagories/pcp/default.htm)

*Printed on recycled paper.*

Mr. Eugene Ray  
June 18, 2002  
Page two

authorization request to prepare a summary report, which includes a proposal as described in Rule 62-770.690(7)(f) F.A.C., should be submitted to the Department.

Contaminated wells:

MW's-1, 2, & 3: 400  $\mu\text{g/l}$  Naphthalene; default Natural Attenuation Monitoring levels for all other constituents per Chapter 62-777 F.A.C.,

Perimeter Well:

MW-8: Cleanup Target Levels

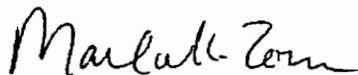
If the applicable No Further Action criteria in Rule 62-770.680, F.A.C., are met during the monitoring period (for at least the last two sampling events), the final deliverable report will serve as the Site Rehabilitation Completion Report required in Rule 62-770.690(8), F.A.C. Please note, the method detection limits for Carcinogenic Polycyclic Aromatic Hydrocarbons must be at or below cleanup target levels prior to site rehabilitation. If the applicable No Further Action criteria in Rule 62-770.680, F.A.C., are not met following one year of monitoring, then the final deliverable report should include a recommendation for the next course of action, as described in Rule 62-770.690(7)(g), F.A.C.

Please send a copy of the approved SAR document to Ken Weber of the Southwest Florida Water Management District within 30 days of receiving this approval letter.

The FDEP Facility Number for this site is 098503163. Please use this identification on all future correspondence with the Department.

If you should have any questions concerning the review or the needed proposal, please contact me at 850-877-1133 ext. 27 or at the letterhead address, Mail Station 4590, or by E-mail at [mzorn@ene.com](mailto:mzorn@ene.com).

Sincerely,



Marla K. Zorn  
Site Manager  
Ecology & Environment, Inc. Petroleum  
Cleanup Section 6  
Bureau of Petroleum Storage Systems



Rebecca Marx  
FDEP Section Leader  
Petroleum Cleanup Section 6  
Bureau of Petroleum Storage Systems

Mr. Eugene Ray  
June 18, 2002  
Page three

Reviewed by:



William Newmyer, P.G.  
Professional Geologist  
Ecology & Environment, Inc.  
Petroleum Cleanup Section 6  
Bureau of Petroleum Storage Systems

6/20/02  
Date

/mkz

cc: Robin Ryan, Island Food Stores LTD, 9551 Baymeadows Road #1, Jacksonville, Florida  
32256  
File

14370

25



**HANDEX**<sup>®</sup>  
Practical Environmental Solutions

May 15 2002

TEAM 6

MAY 20 2002

Ecology & Environment

RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER  
02 MAY 17 PM 2:16

Ms. Marla Zorn  
Florida Department of Environmental Protection  
Petroleum Cleanup Section 6, Mail Station 4590  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

**Reference:** General Site Assessment Report  
Island Food Store # 518  
3900 South Suncoast Boulevard, Homosassa Springs, Florida  
FDEP Facility ID No.: 098503163  
Handex No: 122034.004  
Work Order No: 2002-96-1300

Dear Ms. Zorn:

Handex of Florida, Inc. (Handex) is pleased to provide you with this report of the work completed at the above referenced site under the pre-approval work order 2002-96-1300. A copy of the workorder is included in **Appendix A**.

**GROUNDWATER SAMPLING**

On April 25, 2002, groundwater samples were collected from monitoring wells MW-1 through MW-10 and DW-1 and were delivered to Xenco Labs of Tampa, Florida for analysis. The groundwater samples collected from each well were analyzed for EPA Method 8021 (BTEX + MTBE) parameters and the groundwater samples collected from MW-1, MW-2, MW-5, MW-8, and DW-1 were also analyzed for EPA Method 8310 (PAHs) parameters. The groundwater sample collected from MW-2 was also analyzed for FL PRO, as requested. The monitoring well locations are depicted on **Figure 1**.

The groundwater sampling event was conducted in accordance with Handex's approved Comprehensive Quality Assurance Plan on file with the FDEP in Tallahassee, Florida. The analytical results from this recent sampling event and recent historical groundwater analytical data are summarized on **Table 1** and are depicted on **Figure 2**. A copy of the groundwater laboratory analytical report for the sampling event conducted on April 25, 2002 is included in **Appendix B** and the field groundwater sampling forms are included in **Appendix C**.

As shown on **Table 1** and depicted on **Figure 2**, concentrations of benzene, 1-methyl-naphthalene, and 2-methyl-naphthalene above the applicable Chapter 62-777, F.A.C., Table 1 Groundwater Cleanup Target Levels (GCTLs) for these constituents were recently detected in

Ms. Marla Zorn  
Island Food Store #518 General SA Report  
May 15, 2002

the groundwater sample collected from monitoring well MW-2. The remaining groundwater sampled collected on April 25, 2002 did not reveal hydrocarbon concentrations above the applicable Chapter 62-777, F.A.C., Table 1 GCTLs.

#### **GROUNDWATER FLOW DIRECTION**

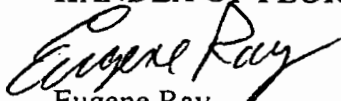
On April 25, 2002, depth-to-groundwater measurements were collected from the sampled wells only. The groundwater data collected on April 25, 2002 are summarized on **Table 2** and were used to construct a groundwater elevation contour map (**Figure 3**). As depicted on **Figure 3**, the groundwater flow direction of the surficial aquifer was calculated to be in general a westerly direction beneath the site on April 25, 2002. The westerly groundwater flow direction is consistent with the previous flow direction documented beneath this site in November of 2001.

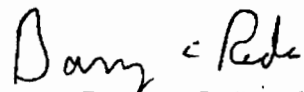
#### **RESULTS & RECOMMENDATION**

As summarized on **Table 1** and depicted on **Figure 2**, the petroleum hydrocarbon concentrations have, for the most part, shown a decreasing trend across the Island Food Store #518 site. Based on the groundwater data presented in this report, Handex recommends the implementation of a quarterly groundwater monitoring program at this location for a period of one year. Handex proposes to sample MW-1 and MW-3 for 8021 (BTEX + MTBE) parameters and MW-2 for 8021 (BTEX + MTBE) and 8310 (PAHs) parameters during each of the four proposed quarters.

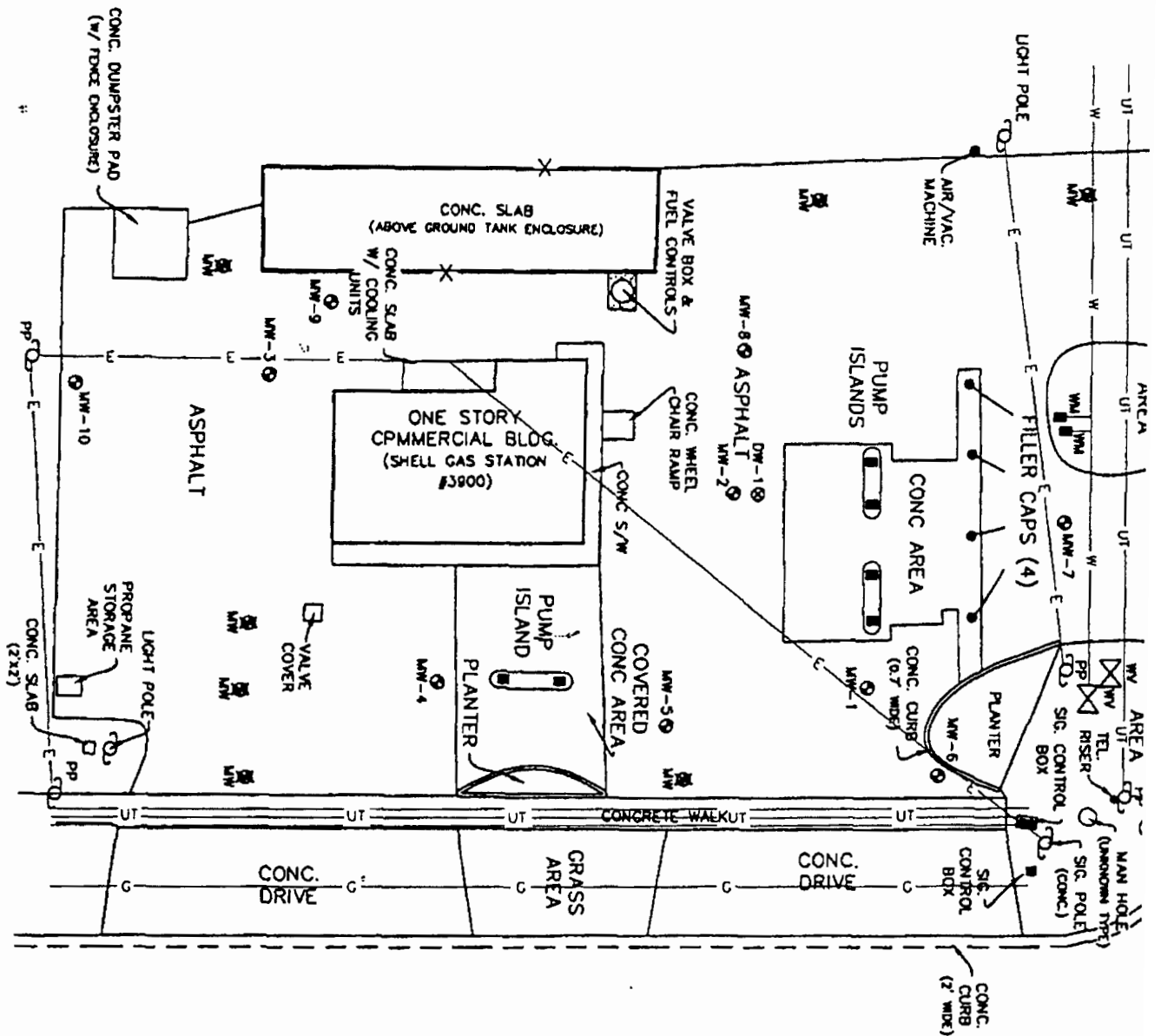
If these recommendations are agreeable with the FDEP, Handex will generate a cost proposal to *conduct the proposed scope of work*. If you have any questions regarding the information contained in this report or require additional information, please do not hesitate to contact the undersigned at (813) 626-4646.

Respectfully submitted,  
**HANDEX OF FLORIDA, INC.**

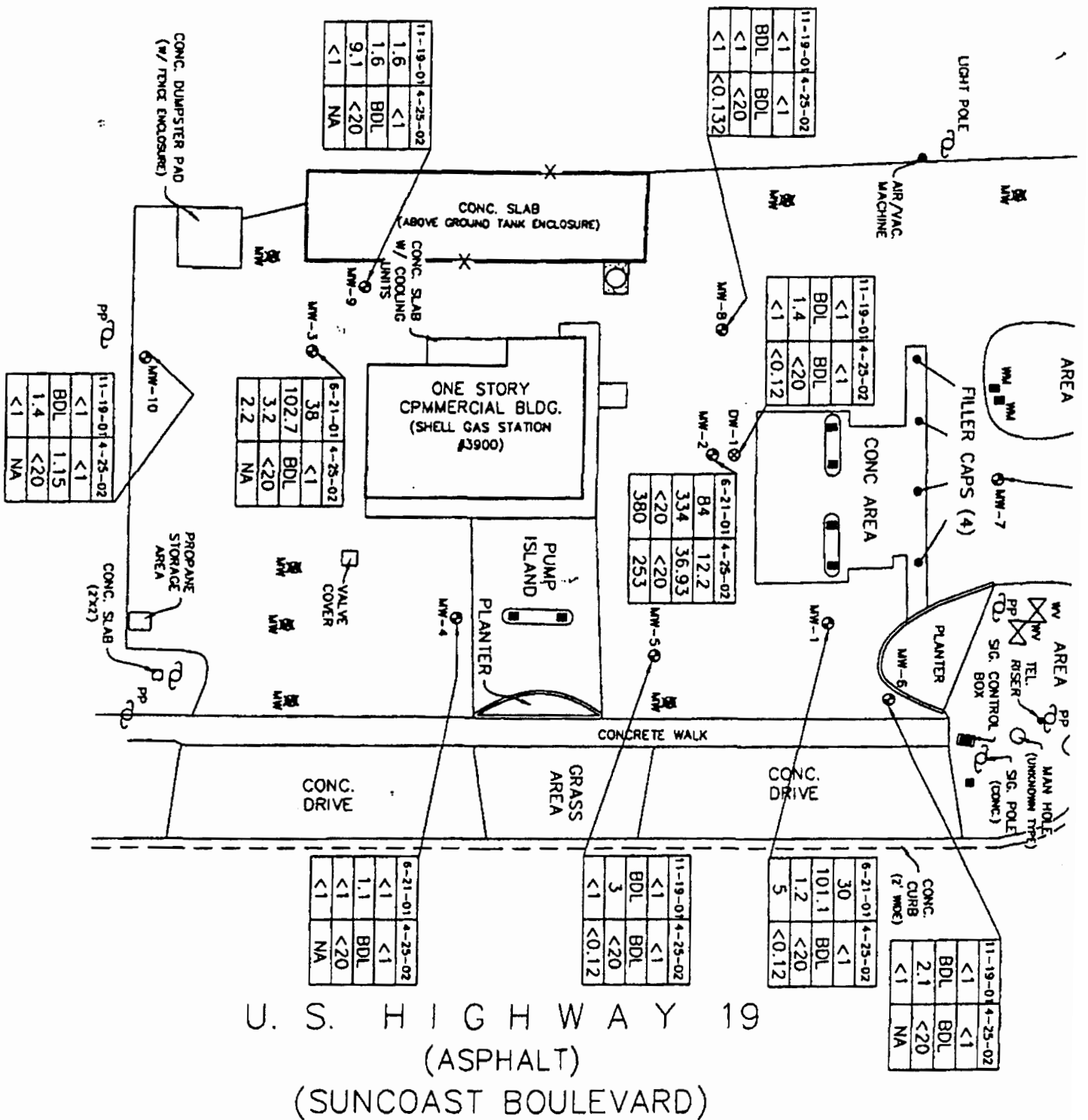
  
Eugene Ray  
Project Hydrogeologist

  
Barry Reda, P.G. # 2060  
Project Manager

cc: Mark Contos, Island Food Stores, Inc., 4315 Pablo Oaks Court, Suite 2, Jacksonville, Florida 32224



U. S. H I G H W A Y 19  
 (ASPHALT)  
 (SUNCOAST BOULEVARD)



11-19-01	4-25-02
<1	<1
BDL	BDL
<1	<20
<1	<0.132

11-19-01	4-25-02
1.6	<1
1.6	BDL
9.1	<20
<1	NA

11-19-01	4-25-02
<1	<1
BDL	BDL
1.4	<20
<1	<0.12

6-21-01	4-25-02
84	12.2
334	36.93
<20	<20
380	253

6-21-01	4-25-02
38	<1
102.7	BDL
3.2	<20
2.2	NA

11-19-01	4-25-02
<1	<1
BDL	1.15
1.4	<20
<1	NA

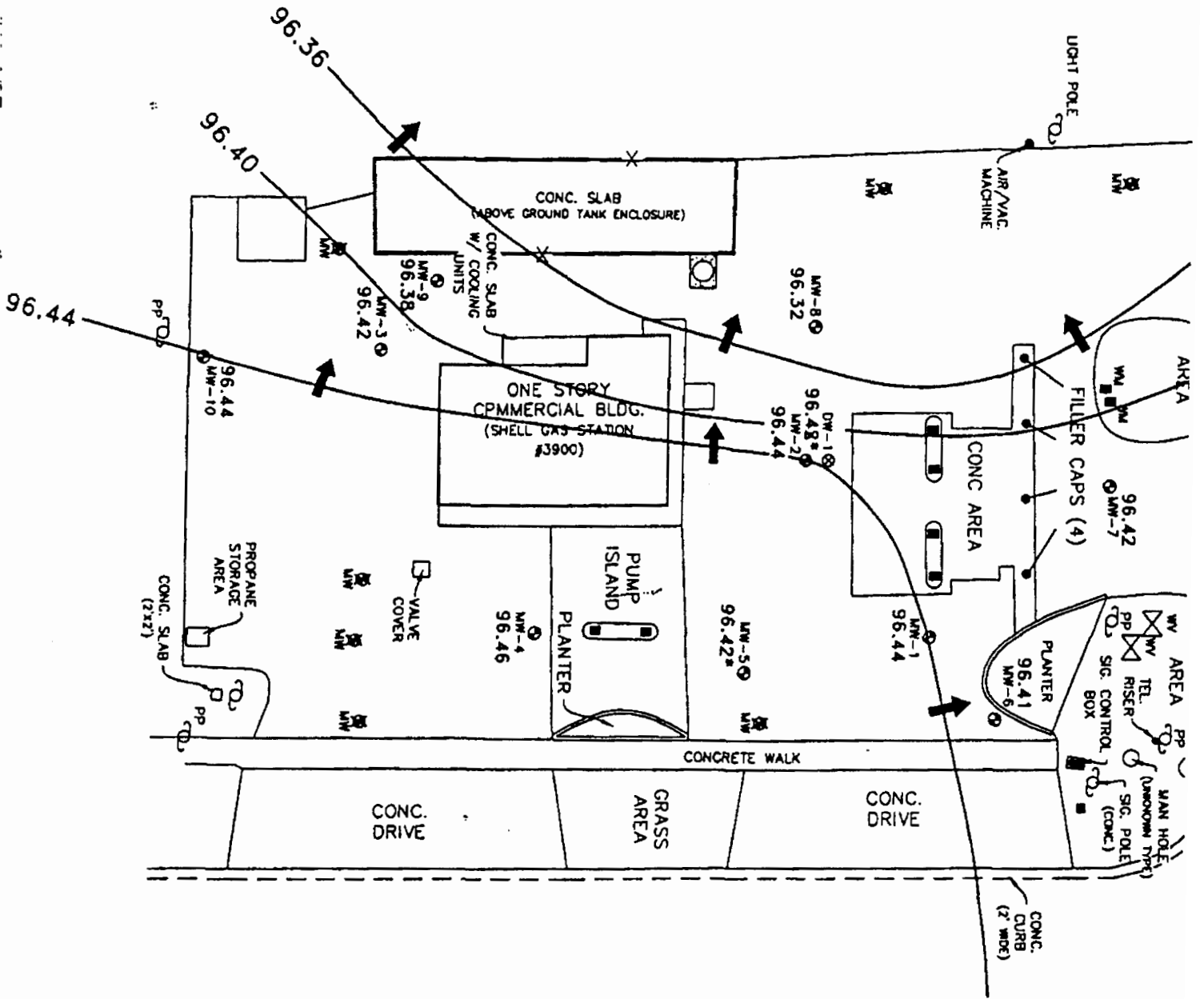
11-19-01	4-25-02
<1	<1
BDL	BDL
2.1	<20
<1	NA

6-21-01	4-25-02
30	<1
101.1	BDL
1.2	<20
5	<0.12

11-19-01	4-25-02
<1	<1
BDL	BDL
3	<20
<1	<0.12

6-21-01	4-25-02
<1	<1
1.1	BDL
<1	<20
<1	NA





U. S. H I G H W A Y 19  
 (ASPHALT)  
 (SUNCOAST BOULEVARD)

**TABLES**

**TABLE 1 - GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

Site Name: Island Food Store #518 Facility ID #: 98503163  
 Site Address: 3900 S. Suncoast Boulevard Handex Project #: 122034.004  
 Homosassa Springs, Florida

Sample Location	Date	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	Total BTEX	MTBE	EDB	Naphthalene	1-Methyl-Naphthalene	2-Methyl-Naphthalene	FL PRO (mg/l)	Total Lead	Total PAH
SB-2	5/10/01	57	<20	1200	28	1285	<20	NA	NA	NA	NA	NA	NA	NA
SB-3	5/10/01	21	2.1	38	7	68.1	7	NA	NA	NA	NA	NA	NA	NA
SB-5	5/10/01	3.2	<1	14	4.2	21.4	2.3	NA	NA	NA	NA	NA	NA	NA
SB-11	5/10/01	110	1	<1	1.9	112.9	24	NA	NA	NA	NA	NA	NA	NA
SB-13	5/10/01	<1	<1	<1	<1	BDL	<1	NA	NA	NA	NA	NA	NA	NA
SB-15	5/10/01	<1	<1	<1	<1	BDL	<1	NA	NA	NA	NA	NA	NA	NA
SB-17	5/10/01	<1	<1	<1	<1	BDL	3	NA	NA	NA	NA	NA	NA	NA
SB-19	5/10/01	<1	<1	<1	<1	BDL	8.1	NA	NA	NA	NA	NA	NA	NA
SB-21	5/10/01	<1	<1	<1	<1	BDL	4.2	NA	NA	NA	NA	NA	NA	NA
SB-23	5/10/01	<1	<1	<1	<1	BDL	2	NA	NA	NA	NA	NA	NA	NA
SB-25	5/10/01	<1	<1	<1	<1	BDL	2.6	NA	NA	NA	NA	NA	NA	NA
MW-1	6/21/01	30	56	2.7	12.4	101.1	1.2	0.060	5	1.7	2.7	0.11	<5	2.8
MW-1	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	<0.12	<0.12	<0.12	NA	NA	BDL
MW-2	6/21/01	84	110	89	51	334	<20	0.28	380	170	270	6	5	140
MW-2	04/25/02	12.2	<1	22.9	1.83	36.93	<20	NA	253	104	115	3.74	NA	BDL
MW-3	6/21/01	38	48	2.5	14.2	102.7	3.2	0.064	2.2	<1.5	<1.5	1.4	12	BDL
MW-3	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	NA	NA	NA	NA	NA	NA
MW-4	6/21/01	<1	<1	<1	1.1	1.1	<1	NA	<1	<1.5	<1.5	0.68	NA	BDL
MW-4	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	NA	NA	NA	NA	NA	NA
GCTL		1	40	30	20	20	50	0.02	20	20	20	5	15	

Notes: All Concentrations in ug/l unless otherwise noted  
 BDL = All components contributing to the summed value were below their respective detection limits  
 Total BTEX = Sum of benzene, toluene, ethylbenzene, and total xylenes  
 Total PAHs = Total of all EPA Method 610 constituents excluding Naphthalene and 1 + 2-Methylnaphthalene  
 GCLTs = Chapter 62-777, F.A.C., Table I, Groundwater Cleanup Target Levels  
 EDB = Ethylene Dibromide or 1,2-dibromoethane  
 FL PRO = Total Recoverable Petroleum Hydrocarbons  
 EDB = Ethylene Dibromide  
 NA = Parameter Not Analyzed  
 MTBE = Methyl-tert-butyl-ether

**TABLE 1 - GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

Site Name: Island Food Store #518 Facility ID #: 98503163  
 Site Address: 3900 S. Suncoast Boulevard Handex Project #: 122034.004  
 Homosassa Springs, Florida

Sample Location	Date	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	Total BTEX	MTBE	EDB	Naphthalene	1-Methyl-Naphthalene	2-Methyl-Naphthalene	FL PRO (mg/l)	Total Lead	Total PAH
MW-5	11/19/01	<1	<1	<1	BDL	BDL	3.0	<0.010	<1	<1.5	<1.5	NA	NA	BDL
MW-5	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	<0.12	<0.12	<0.12	NA	NA	BDL
MW-6	11/19/01	<1	<1	<1	BDL	BDL	2.1	<0.010	<1	<1.5	<1.5	NA	NA	BDL
MW-6	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	NA	NA	NA	NA	NA	NA
MW-7	11/19/01	<1	<1	<1	BDL	BDL	1.5	<0.010	<1	<1.5	<1.5	NA	NA	BDL
MW-7	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	NA	NA	NA	NA	NA	NA
MW-8	11/19/01	<1	<1	<1	BDL	BDL	<1	<0.010	<1	<1.5	<1.5	NA	NA	BDL
MW-8	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	<0.132	<0.132	<0.132	NA	NA	BDL
MW-9	11/19/01	1.6	<1	<1	BDL	1.6	9.1	<0.010	<1	<1.5	<1.5	NA	NA	BDL
MW-9	04/25/02	<1	<1	<1	BDL	BDL	<20	NA	NA	NA	NA	NA	NA	BDL
MW-10	11/19/01	<1	<1	<1	BDL	BDL	1.0	<0.010	<1	<1.5	<1.5	NA	NA	BDL
MW-10	04/25/02	<1	1.15	<1	BDL	1.15	<20	NA	NA	NA	NA	NA	NA	BDL
DW-1	11/19/01	<1	<1	<1	BDL	BDL	1.4	<0.010	<1	<1.5	<1.5	NA	NA	BDL
DW-1	4/25/02	<1	<1	<1	BDL	BDL	<20	NA	<0.12	<0.12	<0.12	NA	NA	BDL
<b>GCTL</b>		<b>1</b>	<b>40</b>	<b>30</b>	<b>20</b>		<b>50</b>	<b>0.02</b>	<b>20</b>	<b>20</b>	<b>20</b>	<b>5</b>		<b>15</b>

**Notes:** All Concentrations in ug/l unless otherwise noted  
 BDL = All components contributing to the summed value were below their respective detection limits  
 Total BTEX = Sum of benzene, toluene, ethylbenzene, and total xylenes  
 Total PAHs = Total of all EPA Method 610 constituents excluding Naphthalene and 1 + 2-Methylnaphthalene  
 GCL Ts = Chapter 62-777, F.A.C., Table I, Groundwater Cleanup Target Levels  
 EDB = Ethylene Dibromide or 1,2-dibromoethane  
 FL PRO = Total Recoverable Petroleum Hydrocarbons

EDB = Ethylene Dibromide  
 NA = Parameter Not Analyzed  
 MTBE = Methyl-tert-butyl-ether

### TABLE 2 - GROUNDWATER ELEVATION TABLE

Site Name: Island Food Store #518  
 Site Address: 3900 South Suncoast Blvd.  
 Homosassa, Springs, Florida

Facility ID#: 098503163  
 Handex Project #: 122034.004

WELL NUMBER	MW-1	MW-2	MW-3	MW-4	MW-5
DIAMETER	2-inch	2-inch	2-inch	2-inch	2-inch
WELL DEPTH	12 ft	12 ft	12 ft	12 ft	12 ft
SCREEN INT.	2-12 ft	2-12 ft	2-12 ft	2-12 ft	2-12 ft
TOC ELEV (Feet)	100.00	100.42	100.55	100.69	100.26

DATE	ELEV	DTW	LPH	ELEV	DTW	LPH	ELEV	DTW	LPH	ELEV	DTW	LPH
06/21/2001	95.95	4.05	NM	95.99	4.43	NM	95.94	4.61	NM	95.97	4.72	NM
11/19/2001	96.81	3.19	NM	96.84	3.58	NM	96.80	3.75	NM	96.83	3.86	NM
12/27/2001	96.62	3.38	NM	96.66	3.76	NM	96.62	3.93	NM	96.66	4.03	NM
04/25/2002	96.44	3.56	NM	96.44	3.98	NM	96.42	4.13	NM	96.46	4.23	NM

WELL NUMBER	MW-6	MW-7	MW-8	MW-9	MW-10
DIAMETER	2-inch	2-inch	2-inch	2-inch	2-inch
WELL DEPTH	12 ft	12 ft	12 ft	12 ft	12 ft
SCREEN INT.	2-12 ft	2-12 ft	2-12 ft	2-12 ft	2-12 ft
TOC ELEV (Feet)	99.80	99.50	100.22	100.48	99.82

DATE	ELEV	DTW	LPH	ELEV	DTW	LPH	ELEV	DTW	LPH	ELEV	DTW	LPH
06/21/2001	NI	NI	NI	NI	NI	NI	NI	NI	NI	NI	NI	NI
11/19/2001	96.77	3.03	NM	95.92	3.58	NM	96.47	3.75	NM	96.62	3.86	NM
12/27/2001	96.66	3.14	NM	96.62	2.88	NM	96.64	3.58	NM	96.61	3.87	NM
04/25/2002	96.41	3.39	NM	96.42	3.08	NM	96.32	3.90	NM	96.38	4.10	NM

ELEV = Elevation  
 DTW = Depth to Water  
 NI = Well Not Installed

LPH = Liquid Phase Hydrocarbons  
 TOC = Top of Casing  
 NM = Not Measured

**TABLE 2 - GROUNDWATER ELEVATION TABLE**

Site Name: Island Food Store #518 Facility ID#: 098503163  
 Site Address: 3900 South Suncoast Blvd. Handex Project #: 122034.004  
 Homosassa, Springs, Florida

WELL NUMBER	DW-1
DIAMETER	2-inch
WELL DEPTH	29 ft
SCREEN INT.	24-29 ft
TOC ELEV (Feet)	100.22

DATE	ELEV	DTW	LPH																	
06/21/2001	NI	NI	NI																	
11/19/2001	96.84	3.38	NM																	
12/27/2001	96.63	3.59	NM																	
04/25/2002	96.48	3.74	NM																	

ELEV = Elevation  
 DTW = Depth to Water  
 NI = Well Not Installed  
 LPH = Liquid Phase Hydrocarbons  
 TOC = Top of Casing  
 NM = Not Measured

**APPENDICES**

**APPENDIX A  
WORK ORDER**



Petroleum Preapproval Program Work Order 122034.004

Work Order Number: 3528 2002-96-1300 Cost Center #: 37450404555 Category: 087888 FY 01-02  
 FDEP Facility ID#: 098503163 Score: 39 Contract #: PUC - 001  
 Site Name: Island Food Store #518 Eligibility: Priority Score  
 Address (Street, City): 3900 South Suncoast Blvd., Homosassa Springs County: Citrus  
 Contractor Name: Handex of Florida CID #: 00156  
 Contractor Address: 111 Kelsey Lane, Suite E, Tampa FEID #: 59-2814845  
 Contractor Representative: Eugene E. Ray Phone #: (813) 626-4646 ext.  
 FDEP Site Manager: Marla K. Zorn Phone #: (850)877-1133 ext. 27  
 Cleanup Phase: SA  
 Cleanup Activity: SSA

*received March 19*

Work Order Description: (Attach Proposal)  
 Reference the February 27, 2002 Deliverable Review - Proposal Request Letter, the March 8, 2002 cost proposal, and noted changes. Groundwater sampling per the attached sampling table. Deliverable will be a General SAR with updated tables.

Deliverable 1: _____	Due Date 1: _____
Deliverable 2: _____	Due Date 2: _____
Deliverable 3: _____	Due Date 3: _____
Deliverable 4: _____	Due Date 4: _____
Deliverable 5: _____	Due Date 5: _____

Final Deliv.: General / SA Report Final Due Date: May 30, 2003  
 Period of Service: \_\_\_\_\_ Contractor Representative Signature Date \_\_\_\_\_ To \_\_\_\_\_ November 26, 2003

Amount (incl. retainage): \$5,369.17 Retainage (Event Total): \_\_\_\_\_

This WORK ORDER is not in effect until signed by all parties. The FDEP will not pay any amount of this WORK ORDER until the original signed copy has been returned to the FDEP. The FDEP will not pay for any portion of the scope of work that has not been performed as of the date of the invoice.

**Performance of this work order shall be governed by the terms of the preapproval umbrella contract (PUC) listed above.**

FDEP Site Manager: _____	Date: <u>4/2/02</u>
FDEP Manager: _____	Date: <u>4/5/02</u>
Cost Center Administrator: _____	Date: <u>4/8/02</u>
Contractor Representative: _____	
Contractor Representative: _____	
second contractor signature is optional) _____	

FDEP Use Only: _____	Technical Review: _____	Initials: <u>QIBIV</u>	Date: <u>4/2/02</u>
	Fiscal Review: _____	Initials: <u>JV</u>	Date: <u>4/2/02</u>

Petroleum Preapproval Program Work Order Template

First Event

Work Order #: 2002-96-1300  
 Facility Id #: 098503163  
 Contractor #: 156  
 Date: 3/26/02

FDEP/LP Site Mgr: Marla K. Zorn  
 Site Name: Island Food Store #518  
 Contractor Name: Handex of Florida  
 FDEP Contract #: PUC

Cost Share Information  
 FDEP Share: 100.  
 Applicant/Owner Share: 0.  
 Total: 100.

Work Description:

Template	Comments / Notes	Allowed Cost	Original		Change		Template 1 Cost
			Number of Items	Item Cost	Change Amount	Change Costs	
<b>Section A: Packaged Work Scopes</b>							
Pumping Test or Multiphase Pilot Test		\$2,471.99		\$0.00		\$0.00	\$2,471.99
VES Pilot Test		\$1,656.06		\$0.00		\$0.00	\$1,656.06
Sparging & VES Pilot Test		\$2,576.09		\$0.00		\$0.00	\$2,576.09
Monthly O&M Visit		\$684.72		\$0.00		\$0.00	\$684.72
		<b>Section A Subtotals:</b>		<b>\$0.00</b>		<b>\$0.00</b>	<b>\$4,388.86</b>
<b>Section B: Office Activities, Part 1</b>							
Proposal Preparation		\$443.32	1	\$443.32		\$0.00	\$443.32
File Review		\$482.26		\$0.00		\$0.00	\$482.26
Permits		\$604.07		\$0.00		\$0.00	\$604.07
Site Health & Safety Plan		\$282.57		\$0.00		\$0.00	\$282.57
		<b>Section B Subtotals:</b>		<b>\$443.32</b>		<b>\$0.00</b>	<b>\$443.32</b>
<b>Section C: Field Activities</b>							
Mobilization (2 persons)		\$672.67	1	\$672.67		\$0.00	\$672.67
Mobilization (1 person)		\$361.82		\$0.00		\$0.00	\$361.82
Drilling Setup (w/ utility clearance)		\$460.05		\$0.00		\$0.00	\$460.05
SB for Soil Screening (< 10 ft)		\$188.38		\$0.00		\$0.00	\$188.38
SB for Soil Screening (> 10 ft to < 30 ft)		\$282.56		\$0.00		\$0.00	\$282.56
SB for Soil Screening (> 30 ft)		\$376.75		\$0.00		\$0.00	\$376.75
Well Install (< 20 ft)		\$392.50		\$0.00		\$0.00	\$392.50
Well Install (> 20 ft to < 40 ft)		\$588.75		\$0.00		\$0.00	\$588.75
Well Install (> 40 ft)				\$0.00		\$0.00	
Well Install, double cased (< 40 ft)		\$1,177.50		\$0.00		\$0.00	\$1,177.50
Well Install, multiple cased (> 40 ft)				\$0.00		\$0.00	
Recovery Well Install (< 40 ft)		\$785.00		\$0.00		\$0.00	\$785.00
Recovery Well Install (> 40 ft)				\$0.00		\$0.00	
Air Sparging Well Install (< 40 ft)		\$294.38		\$0.00		\$0.00	\$294.38
Soil VE Well Install (< 40 ft)		\$196.25		\$0.00		\$0.00	\$196.25
AS and/or VE Well Install (> 40 ft)				\$0.00		\$0.00	
Well Abandonment (per well)		\$71.37		\$0.00		\$0.00	\$71.37
Recovery Well Abandonment (per well)		\$190.71		\$0.00		\$0.00	\$190.71
Well Sampling (per well)		\$189.26	11	\$2,081.86		\$0.00	\$2,081.86
Water Level Only (per well not sampled)		\$18.51		\$0.00		\$0.00	\$18.51
Slug Testing (per well, w/analysis)		\$525.45		\$0.00		\$0.00	\$525.45
Area Survey		\$785.00		\$0.00		\$0.00	\$785.00
		<b>Section C Subtotals:</b>		<b>\$2,754.53</b>		<b>\$0.00</b>	<b>\$2,754.53</b>
<b>Section C1: Free Product Field Activities</b>							
Piezometer Install (< 10 ft)		\$192.85		\$0.00		\$0.00	\$192.85
Piezometer Install (> 10 ft to < 20 ft)		\$289.28		\$0.00		\$0.00	\$289.28
Piezometer Install (> 20 ft to < 40 ft)		\$385.70		\$0.00		\$0.00	\$385.70
Piezometer Install (> 40 ft)				\$0.00		\$0.00	
Well or Free Product Gauging (per well)		\$15.98		\$0.00		\$0.00	\$15.98
Free Product Gauging & Bailing (per well)		\$94.02		\$0.00		\$0.00	\$94.02
Piezometer Abandonment		\$94.02		\$0.00		\$0.00	\$94.02
		<b>Section C1 Subtotals:</b>		<b>\$0.00</b>		<b>\$0.00</b>	<b>\$0.00</b>
<b>Section D: Other Field Work</b>							
Other Field Work				\$0.00		\$0.00	\$0.00
Other Field Work				\$0.00		\$0.00	\$0.00
		<b>Section D Subtotals:</b>		<b>\$0.00</b>		<b>\$0.00</b>	<b>\$0.00</b>
<b>Section E: Other Equip. Rental Cost(s)</b>							
Other Equipment				\$0.00		\$0.00	\$0.00
Other Equipment				\$0.00		\$0.00	\$0.00
		<b>Section E Subtotals:</b>		<b>\$0.00</b>		<b>\$0.00</b>	<b>\$0.00</b>

Petroleum Preapproval Program Work Order Template

First Event

Work Order #: 2002-96-1300

Facility Id #: 098503163

Site Name: Island Food Store #518

Date: 3/26/02

Template	Comments / Notes	Allowed Cost	Original		Change		Template T Cost
			Number of Items	Item Cost	Change Amount	Change Costs	
<b>Section F: In-house Service Cost(s)</b>							
Laboratory				\$0.00		\$0.00	\$0
Drilling				\$0.00		\$0.00	\$0
Direct Push				\$0.00		\$0.00	\$0
Construction				\$0.00		\$0.00	\$0
Other				\$0.00		\$0.00	\$0
<b>Section F Subtotals:</b>				<b>\$0.00</b>		<b>\$0.00</b>	<b>\$0</b>
<b>Section G: Subcontractor Cost(s)</b>		<b>Sub Markup = 10.00%</b>	<b>Unit Cost</b>	<b># Units</b>		<b>Do not include markup</b>	
Laboratory	Xenco Labs		\$1,392.50		\$1,531.75	\$0.00	\$1,531
Laboratory					\$0.00	\$0.00	\$0
Laboratory					\$0.00	\$0.00	\$0
Mobile Lab					\$0.00	\$0.00	\$0
Drilling					\$0.00	\$0.00	\$0
Direct Push					\$0.00	\$0.00	\$0
Construction					\$0.00	\$0.00	\$0
Non-Capital Equip. and/or Materials					\$0.00	\$0.00	\$0
Disposal					\$0.00	\$0.00	\$0
Other					\$0.00	\$0.00	\$0
<b>Section G Subtotals:</b>				<b>\$1,531.75</b>		<b>\$0.00</b>	<b>\$1,531</b>
<b>Section G1: Remedial System Purchase</b>							
Remediation System Costs				\$0.00		\$0.00	\$0
PAC Remediation System Costs				\$0.00		\$0.00	\$0
<b>Remedial System Subtotals:</b>				<b>\$0.00</b>		<b>\$0.00</b>	<b>\$0</b>
<b>Section H: Office Activities, Part II</b>							
General / SA Report							
Field Work Costs (Secs A - D) =	Field Work	x Multiplier					
Letter / NPDES Report	\$3,197.85	20%	\$639.57	1	\$639.57	\$0.00	\$639
D&M Quarterly Report			\$233.42		\$0.00	\$0.00	\$0
D&M Annual Report			\$1,360.78		\$0.00	\$0.00	\$0
Remedial Action Plan (gw or soil)			\$2,510.86		\$0.00	\$0.00	\$0
Remedial Action Plan (gw & soil)			\$11,862.12		\$0.00	\$0.00	\$0
Level 1 LSRAP or RAP Modification			\$13,294.78		\$0.00	\$0.00	\$0
Level 2 LSRAP or RAP Modification			\$1,158.59		\$0.00	\$0.00	\$0
Level 3 LSRAP or RAP Modification			\$2,268.29		\$0.00	\$0.00	\$0
Level 4 RAP Modification			\$4,024.27		\$0.00	\$0.00	\$0
As-built Drawings (P.E. red lined)			\$6,647.39		\$0.00	\$0.00	\$0
Construction Drawings and Specs			\$510.87		\$0.00	\$0.00	\$0
Bid Package Solicitation/Evaluation			\$2,809.98		\$0.00	\$0.00	\$0
RA Startup Report (w/as-built)			\$1,585.06		\$0.00	\$0.00	\$0
Level 1 Natural Attenuation Plan			\$1,062.71		\$0.00	\$0.00	\$0
Level 2 Natural Attenuation Plan with Modeling			\$893.02		\$0.00	\$0.00	\$0
NA or Post RA Monitoring Quarterly Report			\$2,619.47		\$0.00	\$0.00	\$0
NA or Post RA Semi-Annual Report			\$438.35		\$0.00	\$0.00	\$0
Level 1 NA or Post RA Monitoring Annual Report			\$893.02		\$0.00	\$0.00	\$0
Level 2 NA Monitoring Annual Report			\$1,095.21		\$0.00	\$0.00	\$0
Well Abandonment Report			\$1,810.74		\$0.00	\$0.00	\$0
Initial Map & Table Generation			\$202.19		\$0.00	\$0.00	\$0
			\$1,540.66		\$0.00	\$0.00	\$0
<b>Section H Subtotals:</b>				<b>\$639.57</b>		<b>\$0.00</b>	<b>\$639</b>

Deliverables

Due Date	Deliverable / Documentation
Interim Deliverable	
Final Deliverable #	1 General / SA Report
Final Deliverable Due	5/15/02
End of Service to:	11/11/02

This Event Template Totals

	Original	Change	Total
Event Total:	\$5,369.17	\$0.00	\$5,369.
Subtotal (less retainage):	\$5,369.17	\$0.00	\$5,369.
Retainage:	0%	\$0.00	\$0.

Cumulative Work Order Totals (less Retainage)

Invoice	Previous	This Event	Total
Events	n/a	\$4,729.60	\$4,729.60
Remedial Systems	n/a	\$0.00	\$0.00
Final Deliverable	n/a	\$639.57	\$639.57
Retainage	n/a	\$0.00	\$0.00
Order Total		\$5,369.17	\$5,369.17

This Event Template Invoice Totals (less Retainage)

Invoice	Original	Change	Total
# 1 1st Event	\$4,729.60	\$0.00	\$4,729.
# 7 Remedial Systems	\$0.00	\$0.00	\$0.
# 8 Final Deliverable	\$639.57	\$0.00	\$639.
# 9 Retainage	\$0.00	\$0.00	\$0.
Event Template Total	\$5,369.17	\$0.00	\$5,369.

**Petroleum Preapproval Program  
Sampling Parameter Table**

Work Order #: 2002-96-1300  
 Facility Id #: 098503163  
 Contractor #: 156  
 Date: 3/26/02

FDEPLP Site Mgr: Maria K. Zorn  
 Site Name: Island Food Store #518  
 Contractor Name: Handex of Florida  
 FOEP Contract #: PUC

Groundwater Sample Locations	Number of Sampling Events	Analytical Parameters (enter total no. of samples for each method)								<Specify Other>	
		EPA 8021	BTEX+MTBE, TBA, DIPE, ETBE, TAME EPA 8260	PAHs EPA 8310	EDB EPA 504	TRPHs FL-PRO	Lead	KAG/GAG**			
Event 1											
MW-1	1	1		1							
MW-2	1	1		1							
MW-3	1	1									
MW-4	1	1									
MW-5	1	1		1							
MW-6	1	1									
MW-7	1	1									
MW-8	1	1									
MW-9	1	1									
MW-10	1	1									
DW-1	1	1									
<b>No. Samples</b>		11	0	5	0	1	0	0	0	0	
<b>Cost per Sample</b>		\$60.00	\$150.00	\$127.50	\$0.00	\$95.00	\$0.00	\$0.00	\$0.00	\$0.00	
<b>Subtotal</b>		\$660.00	\$0.00	\$637.50	\$0.00	\$95.00	\$0.00	\$0.00	\$0.00	\$0.00	

**Total Laboratory Cost:** \$1,392.50

**APPENDIX B**  
**GROUNDWATER ANALYTICAL**

# Analytical Report 222290

for

**HANDEX of Florida**

**Project Manager: Gene Ray**

**ISLAND FOOD STORE 518**

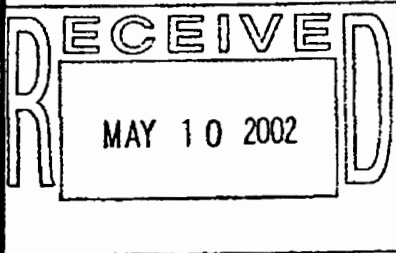
**122634.004.03040.UPA**

**08-MAY-02**



**2618 South Falkenburg, Riverview, FL 33569 Ph:(813) 620-2000 Fax:(813) 620-2033**

Houston - Dallas - San Antonio - Austin - Tampa - Miami - Latin America





08-MAY-02

Project Manager: Gene Ray  
HANDEX of Florida  
111 Kelsey Lane, Suite "E"  
Tampa, FL 33619

Reference: XENCO Report No: 222290  
ISLAND FOOD STORE 518  
Project Address: HOMOSASSA

Gene Ray :

We are reporting to you the results of the analyses performed on the samples received under the project name referenced above and identified with the XENCO Chain of Custody Numbered 222290 . All results being reported under this Chain of Custody apply to the samples analyzed and properly identified with a Laboratory ID number.

All the results for the quality control samples were reviewed. Also, all parameters for data reduction and validation were reviewed. In view of this, we are able to release the analytical data for this report within acceptance criteria for accuracy, precision, completeness or properly flagged.

The validity and integrity of this report will remain intact as long as it is accompanied by this letter and reproduced in full, unless written approval is granted by XENCO Laboratories. This report will be filed for at least 5 years in our archives after which time it will be destroyed without further notice, unless otherwise arranged with you. The samples received, and described as recorded in COC No. 222290 will be filed for 60 days, and after that time they will be properly disposed without further notice, unless otherwise arranged with you. We reserve the right to return to you any unused samples, extracts or solutions related to them if we consider so necessary (e.g., samples identified as hazardous waste, sample sizes exceeding analytical standard practices, controlled substances under regulated protocols, etc).

We thank you for selecting XENCO Laboratories to serve your analytical needs. If you have any questions concerning this report, please feel free to contact us at any time.

Respectfully,

A handwritten signature in black ink, appearing to read "St Tafuni", is written over a horizontal line.

Steven Tafuni

Laboratory Manager

*Recipient of the Prestigious Small Business Administration Award of Excellence in 1994.*

*Certified and approved by numerous States and Agencies.*

*A Small Business and Minority Status Company that delivers SERVICE and QUALITY*

Houston - Dallas - San Antonio - Austin - Tampa - Miami - Latin America



# Certificate of Analysis Summary 222290

HANDEX of Florida, Tampa, FL  
Project Name: ISLAND FOOD STORE 518

Project ID: 122634.004.03040.UPA  
Contact: Gene Ray  
Project Location: HOMOSASSA  
Quote Number:  
Fax Number: 813-626-1898

Date Received in Lab: Fri Apr-26-02 07:06 AM  
Report Date: 08-MAY-02  
Project Manager: Steven S. Tafuni

Analysis Requested	Lab ID:	222290-001	222290-002	222290-003	222290-004	222290-005	222290-006
	Field ID: Depth: Matrix: Sampled:	MW-1 WATER APR-25-02 13:05	MW-2 WATER APR-25-02 11:32	MW-3 WATER APR-25-02 10:25	MW-4 WATER APR-25-02 14:55	MW-5 WATER APR-25-02 14:15	MW-6 WATER APR-25-02 12:25
BTEX-MTBE by EPA 8021	Extracted: Analyzed: Units:	MAY-03-02 23:12 MAY-04-02 01:24 ug/L RL U 1.00	MAY-03-02 23:14 MAY-04-02 01:44 ug/L RL 12.2 1.00	MAY-03-02 23:16 MAY-04-02 02:05 ug/L RL U 1.00	MAY-03-02 23:18 MAY-04-02 02:25 ug/L RL U 1.00	MAY-03-02 23:20 MAY-04-02 02:46 ug/L RL U 1.00	MAY-03-02 23:22 MAY-04-02 03:07 ug/L RL U 1.00
Benzene		U 1.00	U 1.00	U 1.00	U 1.00	U 1.00	U 1.00
Toluene		U 1.00	U 1.00	U 1.00	U 1.00	U 1.00	U 1.00
Ethylbenzene		U 1.00	22.9 1.00	U 1.00	U 1.00	U 1.00	U 1.00
m,p-Xylenes		U 2.00	U 2.00	U 2.00	U 2.00	U 2.00	U 2.00
o-Xylene		U 1.00	1.83 1.00	U 1.00	U 1.00	U 1.00	U 1.00
MTBE		U 20.0	U 20.0	U 20.0	U 20.0	U 20.0	U 20.0
Xylenes, Total		U	1.83	U	U	U	U
Total BTEX		U	36.9	U	U	U	U
<b>FLPRO</b>			APR-26-02 00:00 APR-29-02 18:09 mg/L RL				
FL-PRO Petroleum Hydrocarbons			3.74 0.100				

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Steven Tafuni  
Laboratory Manager





# Certificate of Analysis Summary 222290

HADEX of Florida, Tampa, FL  
Project Name: ISLAND FOOD STORE 518

Project ID: 122634.004.03040.LUPA

Contact: Gene Ray

Project Location: HOMOSASSA

Quote Number:

Fax Number: 813-626-1898

Date Received in Lab: Fri Apr-26-02 07:06 AM

Report Date: 08-MAY-02

Project Manager: Steven S. Tafuni

Analysis Requested	Lab ID:		Field ID:		Depth:		Matrix:		Sampled:		Extracted:		Analyzed:		Units:	
	222290-001	MW-1	222290-002	MW-2	222290-003	MW-3	222290-004	MW-4	222290-005	MW-5	222290-006	MW-6	222290-006	MW-6	222290-006	MW-6
PAHs by EPA 8310	WATER	APR-25-02 13:05	WATER	APR-25-02 11:32	WATER	APR-25-02 10:25	WATER	APR-25-02 14:55	WATER	APR-25-02 14:15	WATER	APR-25-02 12:25	WATER	APR-29-02 08:30	WATER	APR-29-02 19:48
Acenaphthene	U	0.110	U	12.1	U	12.1	U	12.1	U	0.110	U	0.110	U	0.110	U	0.110
Acenaphthylene	U	0.110	U	12.1	U	12.1	U	12.1	U	0.110	U	0.110	U	0.110	U	0.110
Anthracene	U	0.170	U	18.7	U	18.7	U	18.7	U	0.170	U	0.170	U	0.170	U	0.170
Benzo(a)anthracene	U	0.096	U	10.6	U	10.6	U	10.6	U	0.096	U	0.096	U	0.096	U	0.096
Benzo(a)pyrene	U	0.140	U	15.4	U	15.4	U	15.4	U	0.140	U	0.140	U	0.140	U	0.140
Benzo(g,h,i)perylene	U	0.260	U	28.6	U	28.6	U	28.6	U	0.260	U	0.260	U	0.260	U	0.260
1-Methylnaphthalene	U	0.120	104	13.2	U	13.2	U	13.2	U	0.120	115 D	66.0	U	0.120	U	0.120
2-Methylnaphthalene	U	0.120	U	66.0	U	66.0	U	66.0	U	0.120	U	66.0	U	0.120	U	0.120
Benzo(k)fluoranthene	U	0.084	U	9.24	U	9.24	U	9.24	U	0.084	U	9.24	U	0.084	U	0.084
Benzo(b)fluoranthene	U	0.084	U	9.24	U	9.24	U	9.24	U	0.084	U	9.24	U	0.084	U	0.084
Chrysene	U	0.130	U	14.3	U	14.3	U	14.3	U	0.130	U	14.3	U	0.130	U	0.130
Dibenz(a,h)Anthracene	U	0.048	U	5.28	U	5.28	U	5.28	U	0.048	U	5.28	U	0.048	U	0.048
Fluoranthene	U	0.130	U	14.3	U	14.3	U	14.3	U	0.130	U	14.3	U	0.130	U	0.130
Fluorene	U	0.150	U	16.5	U	16.5	U	16.5	U	0.150	U	16.5	U	0.150	U	0.150
Indeno(1,2,3-c,d)Pyrene	U	0.140	U	15.4	U	15.4	U	15.4	U	0.140	U	15.4	U	0.140	U	0.140
Naphthalene	U	0.120	253 D	66.0	U	66.0	U	66.0	U	0.120	U	66.0	U	0.120	U	0.120

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Steven Tafuni  
Laboratory Manager



# Certificate of Analysis Summary 222290

HANDEX of Florida, Tampa, FL

Project Name: ISLAND FOOD STORE 518

Project ID: 122634.004.03040.UPA

Contact: Gene Ray

Project Location: HOMOSASSA

Quote Number:

Fax Number: 813-626-1898

Date Received in Lab: Fri Apr-26-02 07:06 AM

Report Date: 08-MAY-02

Project Manager: Steven S. Tafuni

Analysis Requested	Lab ID:	222290-001	222290-002	222290-003	222290-004	222290-005	222290-006
	Field ID:	MW-1	MW-2	MW-3	MW-4	MW-5	MW-6
Depth:							
Matrix:							
Sampled:							
Extracted:							
Analyzed:							
Units:							
Phenanthrene		APR-25-02 13:05	APR-25-02 11:32	APR-25-02 10:25	APR-25-02 14:55	APR-25-02 14:15	APR-25-02 12:25
		APR-29-02 08:30	APR-29-02 08:30			APR-29-02 08:30	
Pyrene		APR-29-02 18:30	MAY-01-02 11:05			APR-29-02 19:48	
		ug/L	ug/L			ug/L	
		RL	RL			RL	
		U 0.100	U 11.0			U 0.100	
		U 0.120	U 13.2			U 0.120	

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Steven Tafuni  
Laboratory Manager



# Certificate of Analysis Summary 222290

HANDEX of Florida, Tampa, FL  
Project Name: ISLAND FOOD STORE 518

Project ID: 122634.004.03040.UPA  
Contact: Gene Ray  
Project Location: HOMOSASSA  
Quote Number:  
Fax Number: 813-626-1898

Date Received in Lab: Fri Apr-26-02 07:06 AM  
Report Date: 08-MAY-02  
Project Manager: Steven S. Tafuni

Analysis Requested	Lab ID:	Field ID:	Depth:	Matrix:	Sampled:	Extracted:	Analyzed:	Units:
	222290-007 MW-7	222290-008 MW-8	222290-009 MW-9	222290-010 MW-10	222290-011 DW-1	222290-010 MW-10	222290-011 DW-1	222290-011 DW-1
BTEX-MTBE by EPA 8021	WATER APR-25-02 13:20 MAY-03-02 23:26 MAY-04-02 04:08 ug/L	WATER APR-25-02 11:50 MAY-03-02 23:28 MAY-04-02 04:29 ug/L	WATER APR-25-02 11:00 MAY-03-02 23:30 MAY-04-02 04:50 ug/L	WATER APR-25-02 09:45 MAY-03-02 23:32 MAY-04-02 05:10 ug/L	WATER APR-25-02 12:20 MAY-03-02 23:34 MAY-04-02 05:31 ug/L	RL	RL	RL
Benzene	U	U	U	U	U	U	U	U
Toluene	U	U	U	U	U	U	U	U
Ethylbenzene	U	U	U	U	U	U	U	U
m,p-Xylenes	U	U	U	U	U	U	U	U
o-Xylene	U	U	U	U	U	U	U	U
MTBE	U	U	U	U	U	U	U	U
Xylenes, Total	U	U	U	U	U	U	U	U
Total BTEX	U	U	U	1.15	U	U	U	U

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Laboratory Manager



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HANDEX of Florida, Tampa, FL  
Project Name: ISLAND FOOD STORE 518

Project ID: 122634.004.03040.UPA  
Contact: Gene Ray  
Project Location: HOMOSASSA  
Quote Number:  
Fax Number: 813-626-1898

Date Received in Lab: Fri Apr-26-02 07:06 AM  
Report Date: 08-MAY-02  
Project Manager: Steven S. Tafuni

Analysis Requested	Lab ID:	Field ID:	Depth:	Matrix:	Sampled:	222290-007 MW-7	222290-008 MW-8	222290-009 MW-9	222290-010 MW-10	222290-011 DW-1
	Extracted:	Analyzed:	Units:	WATER	WATER	WATER	WATER	WATER	WATER	WATER
PAHs by EPA 8310				APR-25-02 13:20	APR-25-02 11:50	APR-25-02 11:00	APR-25-02 09:45	APR-29-02 08:30	APR-25-02 12:20	APR-29-02 21:07
Acenaphthene				ug/L	ug/L			RL	ug/L	RL
Acenaphthylene				U	U			U	U	U
Anthracene				U	U			U	U	U
Benzo(a)anthracene				U	U			U	U	U
Benzo(a)pyrene				U	U			U	U	U
Benzo(b)fluoranthene				U	U			U	U	U
Benzo(k)fluoranthene				U	U			U	U	U
Chrysene				U	U			U	U	U
Dibenz(a,h)Anthracene				U	U			U	U	U
Fluoranthene				U	U			U	U	U
Fluorene				U	U			U	U	U
Indeno(1,2,3-c,d)Pyrene				U	U			U	U	U
Naphthalene				U	U			U	U	U

*Steven Tafuni*  
Steven Tafuni  
Laboratory Manager

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# Certificate of Analysis Summary 222290

HANDEX of Florida, Tampa, FL  
Project Name: ISLAND FOOD STORE 518

Project ID: 122634.004.03040.UPA  
Contact: Gene Ray  
Project Location: HOMOSASSA  
Quote Number:  
Fax Number: 813-626-1898

Date Received in Lab: Fri Apr-26-02 07:06 AM  
Report Date: 08-MAY-02  
Project Manager: Steven S. Tafuni

Analysis Requested	Lab ID: Field ID: Depth: Matrix: Sampled:	222290-007 MW-7 WATER APR-25-02 13:20	222290-008 MW-8 WATER APR-25-02 11:50	222290-009 MW-9 WATER APR-25-02 11:00	222290-010 MW-10 WATER APR-25-02 09:45	222290-011 DW-1 WATER APR-25-02 12:20
PAHs by EPA 8310	Extracted: Analyzed: Units:	APR-29-02 08:30 APR-29-02 20:28 ug/L RL U 0.110	APR-29-02 08:30 APR-29-02 20:28 ug/L RL U 0.132			APR-29-02 08:30 APR-29-02 21:07 ug/L RL U 0.100
Phenanthrene Pyrene						U 0.120

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Steven Tafuni  
Laboratory Manager



**BS / BSD Recoveries**

**Project Name: ISLAND FOOD STORE 518**

Work Order #: 222290  
 Lab Batch ID: 623665 Sample: 352352-1-BLK Batch #: 1  
 Project ID: 122634.004.03040.UPA  
 Matrix: Water

Units: ug/L

**BLANK/BLANK SPIKE / BLANK SPIKE DUPLICATE RECOVERY STUDY**

Analytes	Blank Sample Result [A]	Spike Added [B]	Blank Spike Result [C]	Blank Spike %R [D]	Spike Added [E]	Blank Spike Duplicate Result [F]	Blk. Spk Dup. %R [G]	RPD %	Control Limits %R	Control Limits %RPD	Flag
BTEX-MTBE by EPA 8021											
Benzene	<1.00	100	102	102	100	104	104	2	70-125	25	
Toluene	<1.00	100	103	103	100	104	104	1	70-125	25	
Ethylbenzene	<1.00	100	103	103	100	105	105	2	71-129	25	
m,p-Xylenes	<2.00	200	214	107	200	214	107	0	70-125	25	
o-Xylene	<1.00	100	106	106	100	109	109	3	71-133	25	
MTBE	<20.0	100	110	110	100	110	110	0	71-133	25	

Units: mg/L

**BLANK/BLANK SPIKE / BLANK SPIKE DUPLICATE RECOVERY STUDY**

Analytes	Blank Sample Result [A]	Spike Added [B]	Blank Spike Result [C]	Blank Spike %R [D]	Spike Added [E]	Blank Spike Duplicate Result [F]	Blk. Spk Dup. %R [G]	RPD %	Control Limits %R	Control Limits %RPD	Flag
FLPRO											
FLPRO	<0.100	1.00	0.780	78	1.00	0.836	84	7	65-135	25	

Relative Percent Difference RPD =  $200 * |(D-G)/(D+G)|$   
 Blank Spike Recovery [D] =  $100 * (C/B)$   
 Blank Spike Duplicate Recovery [G] =  $100 * (F)/E$   
 All results are based on MDL and Validated for QC Purposes



**BS / BSD Recoveries**

**Project Name: ISLAND FOOD STORE 518**

Work Order #: 222290

Project ID: 122634.004.03040.UPA

Lab Batch ID: 623589 Sample: 352214-1-BLK

Batch #: 1

Matrix: Water

Units: ug/L

BLANK/BLANK SPIKE / BLANK SPIKE DUPLICATE RECOVERY STUDY											
PAHs by EPA 8310 Analytes	Blank Sample Result [A]	Spike Added [B]	Blank Spike Result [C]	Blank Spike %R [D]	Spike Added [E]	Blank Spike Duplicate Result [F]	Blk. Spk Dup. %R [G]	RPD %	Control Limits %R	Control Limits %RPD	Flag
Acenaphthene	<0.110	0.500	0.463	93	0.500	0.439	88	6	38-146	25	
Acenaphthylene	<0.110	0.500	0.414	83	0.500	0.398	80	4	17-172	25	
Anthracene	<0.170	0.500	0.330	66	0.500	0.312	62	6	37-146	25	
Benzo(a)anthracene	<0.096	0.500	0.478	96	0.500	0.483	97	1	52-169	25	
Benzo(a)pyrene	<0.140	0.500	0.481	96	0.500	0.482	96	0	47-143	25	
Benzo(g,h,i)perylene	<0.260	0.500	0.518	104	0.500	0.587	117	12	16-210	25	
1-Methylnaphthalene	<0.120	0.500	0.480	96	0.500	0.454	91	5	60-130	25	
2-Methylnaphthalene	<0.120	0.500	0.472	94	0.500	0.446	89	5	60-130	25	
Benzo(k)fluoranthene	<0.084	0.500	0.470	94	0.500	0.476	95	1	27-176	25	
Benzo(h)fluoranthene	<0.084	0.500	0.478	96	0.500	0.487	97	1	27-176	25	
Chrysene	<0.130	0.500	0.499	100	0.500	0.509	102	2	72-138	25	
Dibenz(a,h)Anthracene	<0.048	0.500	0.485	97	0.500	0.491	98	1	70-134	25	
Fluoranthene	<0.130	0.500	0.491	98	0.500	0.477	95	3	15-152	25	
Fluorene	<0.150	0.500	0.448	90	0.500	0.423	85	6	31-159	25	
Indeno(1,2,3-c,d)Pyrene	<0.140	0.500	0.501	100	0.500	0.523	105	5	5-198	25	
Naphthalene	<0.120	0.500	0.481	96	0.500	0.451	90	6	25-172	25	
Phenanthrene	<0.100	0.500	0.498	100	0.500	0.478	96	4	46-157	25	
Pyrene	<0.120	0.500	0.560	112	0.500	0.543	109	3	28-172	25	

Relative Percent Difference RPD =  $200 * (D-G) / (D+G)$

Blank Spike Recovery [D] =  $100 * (C) / (B)$

Blank Spike Duplicate Recovery [G] =  $100 * (F) / (E)$

All results are based on MDL and Validated for QC Purposes



51 Madison, San Antonio, TX 78238 210-509-3334  
 5308 Wurzbach Rd, Ste 104, San Antonio, TX 78238 210-509-3334  
 11078 Morrison Ln, Ste D, Dallas, TX 75229 972-481-9999

5757 N.W. 158th Street, Miami Lakes, FL 33014 305-823-8500  
 2618 South Falkenburg Rd, Riverview, FL 33569 813-820-2000

Serial #: 145512

Company: Hansen of Florida (PN) 626-4646  
 Project Name-State: Previously done at XENCO  
 Island Food Store 517  
 Site/Location: Home SA  
 Project ID: 12263402103040 GFA  
 Proj. Manager (PM): Gene Raky  
 Fax Results to: PM and / or  
 e-mail Final Report to: Home SA  
 Fax No: (713) 626-4548

Invoice to:  Accounting  Invoice with Final Report  Invoice must have a P.O. Bill to:

Quote No: P.O. No: 1860 (PA-98)  Call for a P.O.

Reg Program: CLP AFCEE TRRP DW UST Other:

Special DLs (GW DW TRRP QAPP MDLs See Lab PM Included Call PM)  
 Specifications: Level I II III IV Custom with Raw Data EDD Dry Basis

Sampler Name: Administrative Signature: [Signature]

Sample ID	Sampling Date	Time	Depth	Matrix	Composite	# Containers	Container Size	Container Type	Preservatives
MW1	1/25/02	13:55	6	W	X	3			
MW2	1/25/02	11:30				4			
MW3	1/25/02	10:25				2			
MW4	1/25/02	11:45				2			
MW5	1/25/02	14:05				3			
MW6	1/25/02	12:25				2			
MW7	1/25/02	13:30				2			
MW8	1/25/02	11:50				3			
MW9	1/25/02	11:00				2			
MW10	1/25/02	9:45				3			
DW1	1/25/02	13:30				3			

Relinquished by (Initials and Sign): [Signature]  
 Date & Time: 1/25/02  
 Relinquished to (Initials and Sign): [Signature]  
 Date & Time: 1/25/02  
 Lab: [Signature]

Sample ID	TPH by TX1005	BTEX-MTBE by 8021	BTEX by 8021	PAHs by 8270	Metals by 6010 or 6020	VOCs by 8021	SVOCs by 8270	FL Preburn or Revised Preburn	TAT 5h 12h 24h 48h 3d 5d 7d 10d 14d 21d	Hold: Analysis Disposal	Remarks
1	X	X	X	X							
2	X	X	X	X							
3	X	X	X								
4	X	X	X								
5	X	X	X	X							
6	X	X	X								
7	X	X	X								
8	X	X	X	X							
9	X	X	X								
10	X	X	X	X							

Lab Only: 222290 - T

TAT: 5h 12h 24h 48h 3d 5d 7d 10d 14d 21d. Standard TAT is Quote Specific, please circle your required TAT.

From: \_\_\_\_\_ Rcv by: \_\_\_\_\_ Date: \_\_\_\_\_

Addr: PAH above mg/L W, mg/Kg S Highest Hit \_\_\_\_\_

Total Containers per COC: 28 Cooler Temp: 4°C

Specific Fax Due Date: 4-26-02 07:52  Rush Preliminary Results Cost Approved

Rush Data Package cost preapproved

Rush Charges are Pre-Approved upon Requesting them. All Terms Apply

Preservatives: Various (V), HCl pH<2 (H), H2SO4 pH<2 (S), HNO3 pH<2 (N), Asbc Acid&NaOH (A), ZnAc&NaOH (Z), (Cool, <4°C) (C), None (NA), See Label (L), Other (O)



**APPENDIX C**  
**GROUNDWATER SAMPLING FORMS**

## Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>Island Food Store 518</u>	SITE LOCATION: <u>HANSAFSA</u>
WELL NO: <u>MW1</u>	DATE: <u>4/25/02</u>

### PURGING DATA

WELL DIAMETER (in): <u>2"</u>	TOTAL WELL DEPTH (ft): <u>12.0</u>	STATIC DEPTH TO WATER (ft): <u>3.56</u>	WELL CAPACITY (gal/ft): <u>.12</u>
1 WELL VOLUME (gal) = (TOTAL WELL DEPTH - DEPTH TO WATER) X WELL CAPACITY = $= (12.0 - 3.56) \times .12 = 8.44 \times .12 = 1.35$			

PURGE METHOD: <u>PERCUTIC</u>		PURGE INITIATED AT: <u>1235</u>		PURGE ENDED AT: <u>1300</u>		TOTAL VOL. PURGED (gal): <u>6.75</u>					
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
1240	1.35	1.35	.27	4.92	6.56	26.9	.937	8.86	43	TINTED	MODERATE
1245	1.35	2.7	.27	4.87	6.69	27.0	.733	8.45	81	LT TINT	MODERATE
1250	1.35	4.05	.27	4.86	6.65	26.8	.731	9.02	123	LT TINT	MODERATE
1255	1.35	5.4	.27	4.90	6.65	26.5	.729	8.93	105	LT TINT	MODERATE
1300	1.35	6.75	.27	4.92	6.70	26.7	.730	8.95	340		

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT)/ AFFILIATION: <u>ALAN MCCOY / HANDY</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S): <u>GRAB</u>	SAMPLING INITIATED AT: <u>1300</u>
SAMPLING ENDED AT: <u>1305</u>	DUPLICATE: Y <input checked="" type="checkbox"/> N <input type="checkbox"/>
FIELD DECONTAMINATION: Y <input type="checkbox"/> N <input checked="" type="checkbox"/>	FIELD-FILTERED: Y <input type="checkbox"/> N <input checked="" type="checkbox"/>

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
2	CG	60ml	HCL			8021
1	AG	1L				8310

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

## Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>ISLAND FOOD #518</u>	SITE LOCATION: <u>HOMOSASSA SPRING</u>
WELL NO.: <u>MW2</u>	SAMPLE ID: _____
DATE: <u>25 April 03</u>	

### PURGING DATA

WELL DIAMETER (in): <u>2"</u>	TOTAL WELL DEPTH (ft): <u>          </u>	STATIC DEPTH TO WATER (ft): <u>          </u>	WELL CAPACITY (gal/ft): <u>16</u>
$1 \text{ WELL VOLUME (gal)} = (\text{TOTAL WELL DEPTH} - \text{DEPTH TO WATER}) \times \text{WELL CAPACITY}$ $= (12.0 - 3.9) \times 16 = 8.02 \times 16 = 1.28$			

PURGE METHOD: <u>Percistatic</u>			PURGE INITIATED AT: <u>1116</u>			PURGE ENDED AT: <u>1130</u>			TOTAL VOL. PURGED (gal): <u>          </u>		
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
<u>1116</u>	<u>-</u>	<u>-</u>	<u>( )</u>	<u>3.98</u>							
<u>1120</u>	<u>1.28</u>	<u>1.28</u>	<u>( )</u>	<u>3.99</u>	<u>6.81</u>	<u>28.79</u>	<u>1.19</u>	<u>1.01</u>	<u>1.5</u>	<u>clear</u>	<u>strag</u>
<u>1224</u>	<u>1.28</u>	<u>2.56</u>	<u>( )</u>	<u>4.00</u>	<u>6.83</u>	<u>28.20</u>	<u>1.17</u>	<u>.98</u>	<u>1.08</u>	<u>"</u>	<u>"</u>
<u>1128</u>	<u>1.28</u>	<u>3.84</u>	<u>( )</u>	<u>4.01</u>	<u>6.82</u>	<u>27.94</u>	<u>1.15</u>	<u>.99</u>	<u>1.01</u>	<u>clear</u>	<u>strag</u>
<u>1130</u>	<u>.75</u>	<u>4.28</u>	<u>( )</u>	<u>4.01</u>	<u>6.82</u>	<u>27.91</u>	<u>1.13</u>	<u>.99</u>	<u>1.0</u>	<u>clear</u>	<u>strag</u>

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT) / AFFILIATION: <u>PEL HANDER</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S): <u>GAB</u>	SAMPLING INITIATED AT: <u>1132</u>
SAMPLING ENDED AT: _____	
FIELD DECONTAMINATION: <input checked="" type="checkbox"/> N	FIELD-FILTERED: <input checked="" type="checkbox"/> Y
DUPLICATE: <input checked="" type="checkbox"/> Y	

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
<u>2</u>	<u>CG</u>	<u>40mL</u>	<u>HCl</u>			<u>8021</u>
<u>1</u>	<u>AG</u>	<u>1LT</u>	<u>-</u>			<u>8310</u>
<u>1</u>	<u>AG</u>	<u>1LT</u>	<u>H2SO4</u>			<u>FL PRO</u>

REMARKS: \_\_\_\_\_

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>ISLAND FISH STORE #18</u>	SITE LOCATION: <u>Homosassa</u>
WELL NO.: <u>MW 3</u>	SAMPLE ID: _____
DATE: <u>4/25/02</u>	

### PURGING DATA

WELL DIAMETER (in): <u>2"</u>	TOTAL WELL DEPTH (ft): <u>12.0</u>	STATIC DEPTH TO WATER (ft): <u>4.13</u>	WELL CAPACITY (gal/ft): <u>0.16</u>
-------------------------------	------------------------------------	---	-------------------------------------

1 WELL VOLUME (gal) = (TOTAL WELL DEPTH - DEPTH TO WATER) X WELL CAPACITY =  
 $(12.0 - 4.13 = 7.87) \times 0.16 = 1.25$

PURGE METHOD: <u>PERISTALTIC</u>		PURGE INITIATED AT: <u>9:55</u>		PURGE ENDED AT: <u>10:20</u>		TOTAL VOL. PURGED (gal): _____					
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
9:59	1.25	1.25	.31	4.78	6.77	26.3	7.01	8.56	10	TINTED	MODER
10:04	1.25	2.5	.25	4.85	6.88	26.1	7.98	8.81	10	TINTED	MODER
10:09	1.25	3.75	.25	4.82	6.84	26.0	8.48	9.03	10	TINTED	MODER
10:14	1.25	5.0	.25	4.86	6.82	25.8	8.49	8.90	10	TINTED	MODER
10:20	1.25	6.25	.20	4.87	6.86	25.7	8.23	9.60	10	LT TINT	MODER

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT)/ AFFILIATION: <u>Arian Mundy / H&amp;W DEP</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S): <u>GRAB</u>	SAMPLING INITIATED AT: <u>10:20</u>
SAMPLING ENDED AT: <u>10:25</u>	DUPLICATE: <u>Y (N)</u>
FIELD DECONTAMINATION: <u>Y (N)</u>	FIELD-FILTERED: <u>Y (N)</u>

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
2	CG	400ml	HCL			8021

REMARKS: \_\_\_\_\_

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <b>ISLAND FOOD</b>	SITE ID: <b>S18</b>	SITE LOCATION: <b>HOMOSASSA SPRING</b>	
WELL NO.: <b>MW4</b>	SAMPLE ID:	DATE: <b>25 APR 11</b>	

### PURGING DATA

WELL DIAMETER (in): <b>4.25</b>	TOTAL WELL DEPTH (ft): <b>12.00</b>	STATIC DEPTH TO WATER (ft): <b>4.23</b>	WELL CAPACITY (gal/ft): <b>.16</b>
$1 \text{ WELL VOLUME (gal)} = (\text{TOTAL WELL DEPTH} - \text{DEPTH TO WATER}) \times \text{WELL CAPACITY}$ $= (12.00 - 4.23) \times .16 = 7.77 \times .16 = 1.24$			

PURGE METHOD: <b>GRAB</b>			PURGE INITIATED AT: <b>1435</b>			PURGE ENDED AT: <b>1455</b>			TOTAL VOL. PURGED (gal): <b>5</b>		
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
1435	<del>1.25</del>			4.23							
1440	1.25	1.25		4.27	6.97	29.43	830	.98	120.0	cloudy	slight
1445	1.25	2.50		4.27	6.99	28.73	835	.94	114.0	"	"
1450	1.25	3.75		4.29	6.91	28.61	847	.89	106.0	"	"
1455	1.25	5.00		4.29	6.92	28.22	849	.84	102.5	cloudy	slight

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT) / AFFILIATION: <b>REB NAIDEX</b>	SAMPLER(S) SIGNATURE(S):
SAMPLING METHOD(S): <b>GRAB</b>	SAMPLING INITIATED AT: <b>1455</b>
FIELD DECONTAMINATION: <input checked="" type="checkbox"/> N	FIELD-FILTERED: <input checked="" type="checkbox"/> Y
DUPLICATE: <input checked="" type="checkbox"/> Y	

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
2	CG	40ml	HCl			8021

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

## Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <b>ISLAND FOOD # 518</b>	SITE LOCATION: <b>HOMOSASSA SPRING</b>
WELL NO.: <b>MWS</b>	SAMPLE ID:
DATE: <b>25 APR 81</b>	

### PURGING DATA

WELL DIAMETER (in): <b>2"</b>	TOTAL WELL DEPTH (ft): <b>12.0</b>	STATIC DEPTH TO WATER (ft): <b>3.84</b>	WELL CAPACITY (gal/ft): <b>16</b>
$1 \text{ WELL VOLUME (gal)} = (\text{TOTAL WELL DEPTH} - \text{DEPTH TO WATER}) \times \text{WELL CAPACITY} =$ $= (12.0 - 3.84) \times 16 = 8.16 \times 16 = 1.3$			

PURGE METHOD: <b>GRAB</b>			PURGE INITIATED AT: <b>1355</b>			PURGE ENDED AT: <b>1415</b>			TOTAL VOL. PURGED (gal): <b>6</b>		
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
<b>1355</b>	—	—	—	<b>3.84</b>	<b>6.83</b>				<b>77.6</b>		
<b>1400</b>	<b>1.5</b>	<b>1.5</b>		<b>3.86</b>	<b>7.83</b>	<b>27.85</b>	<b>1.03</b>	<b>1.99</b>	<b>77.6</b>	<b>CLOUDY</b>	<b>NONE</b>
<b>1405</b>	<b>1.5</b>	<b>3.0</b>		<b>3.86</b>	<b>6.81</b>	<b>27.82</b>	<b>1.05</b>	<b>1.00</b>	<b>41.8</b>	<b>CLOUDY</b>	<b>SLIGHT</b>
<b>1410</b>	<b>1.5</b>	<b>4.5</b>		<b>3.87</b>	<b>6.83</b>	<b>27.80</b>	<b>1.06</b>	<b>1.01</b>	<b>39.9</b>	<b>CLOUDY</b>	<b>SLIGHT</b>
<b>1415</b>	<b>1.5</b>	<b>6.0</b>		<b>3.88</b>	<b>6.83</b>	<b>27.77</b>	<b>1.06</b>	<b>0.99</b>	<b>37.2</b>	<b>CLOUDY</b>	<b>SLIGHT</b>

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT) / AFFILIATION: <b>DETO HANDEX</b>	SAMPLER(S) / SIGNATURE(S):
SAMPLING METHOD(S): <b>GRAB</b>	SAMPLING INITIATED AT: <b>1415</b>
FIELD DECONTAMINATION: <input checked="" type="checkbox"/> Y <input type="checkbox"/> N	FIELD-FILTERED: <input type="checkbox"/> Y <input checked="" type="checkbox"/> N
DUPLICATE: <input type="checkbox"/> Y <input checked="" type="checkbox"/> N	

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (ml)	FINAL pH	
<b>2</b>	<b>CG</b>	<b>40 ml</b>	<b>NCl</b>			<b>8021</b>
<b>1</b>	<b>AG</b>	<b>1L</b>				<b>8310</b>

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

## Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>ESUND FOOD STORE SIX</u>	SITE LOCATION: <u>MANOATSA</u>
WELL NO: <u>MW6</u>	DATE: <u>4-25-02</u>

### PURGING DATA

WELL DIAMETER (in): <u>2 1/4</u>	TOTAL WELL DEPTH (ft): <u>12.0</u>	STATIC DEPTH TO WATER (ft): <u>3.39</u>	WELL CAPACITY (gal/ft): <u>.12</u>
----------------------------------	------------------------------------	---	------------------------------------

1 WELL VOLUME (gal) = (TOTAL WELL DEPTH - DEPTH TO WATER) X WELL CAPACITY =

$$= (12.0 - 3.39) \times .12 = 8.61 \times .12 = 1.37$$

PURGE METHOD:				PURGE INITIATED AT: <u>1155</u>	PURGE ENDED AT: <u>1220</u>	TOTAL VOL. PURGED (gal): <u>6.85</u>					
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
1200	1.37	1.37	.27	4.65	6.55	26.6	.788	9.48	110	LTINT	NONE
1205	1.37	2.74	.27	4.82	6.52	26.5	.796	9.50	48	LTINT	NONE
1210	1.37	4.11	.27	4.87	6.52	26.5	.809	9.52	13	LTINT	NONE
1215	1.37	5.48	.27	4.90	6.51	26.5	.823	9.45	6		
1220	1.37	6.85	.27	4.88	6.42	26.2	.830	9.60	43		

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT) / AFFILIATION: <u>Alan Moody / HAD4</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S): <u>GRAB</u>	SAMPLING INITIATED AT: <u>1230</u>
FIELD DECONTAMINATION: Y <input checked="" type="checkbox"/>	FIELD-FILTERED: Y <input checked="" type="checkbox"/>
SAMPLING ENDED AT: <u>1225</u>	
DUPLICATE: Y <input checked="" type="checkbox"/>	

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
3	GG	40mL	HCl			8021

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: ISLAND FOOD #518	SITE LOCATION: HOMOSASSA SPRING
WELL NO.: MW7	DATE: 25 APRIL

### PURGING DATA

WELL DIAMETER (in): 2"	TOTAL WELL DEPTH (ft): 12.0	STATIC DEPTH TO WATER (ft): 3.08	WELL CAPACITY (gal/ft): .16
$1 \text{ WELL VOLUME (gal)} = (\text{TOTAL WELL DEPTH} - \text{DEPTH TO WATER}) \times \text{WELL CAPACITY} =$ $= (12.0 - 3.08) \times .16 = 8.92 \times .16 = 1.42$			

PURGE METHOD: GRINDERS			PURGE INITIATED AT: 1300			PURGE ENDED AT:			TOTAL VOL. PURGED (gal):		
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
1300	—	—	—	3.08	—	—	—	—	—	—	—
1305	1.5	1.5	—	3.10	6.82	(circled)	1691	1.39	140.0	cloudy	—
1310	1.5	3.0	—	3.11	6.85		1689	1.11	50.7	cloudy	—
1315	1.5	4.5	—	3.10	6.85		1690	1.08	31.1	cloudy	—
1320	1.5	6.0	—	3.10	6.82		1687	1.13	29.6	cloudy	—

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT): RHO HANDEX	SAMPLER(S) SIGNATURE(S): <i>RHO HANDEX</i>
SAMPLING METHOD(S): GRAB	SAMPLING INITIATED AT: 1320
FIELD DECONTAMINATION: <input checked="" type="checkbox"/> N	FIELD-FILTERED: <input checked="" type="checkbox"/> Y
DUPLICATE: <input checked="" type="checkbox"/> Y	<input checked="" type="checkbox"/> N

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
2	CG	40ml	HCl			8021

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.



# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>FLAND FOOD STORE 518</u>	SITE LOCATION: <u>HOMOSESSA</u>
WELL NO.: <u>MW8</u>	DATE: <u>4/25/02</u>

### PURGING DATA

WELL DIAMETER (in): <u>2"</u>	TOTAL WELL DEPTH (ft): <u>12.0</u>	STATIC DEPTH TO WATER (ft): <u>3.90</u>	WELL CAPACITY (gal/ft): <u>.16</u>
-------------------------------	------------------------------------	---	------------------------------------

1 WELL VOLUME (gal) = (TOTAL WELL DEPTH - DEPTH TO WATER) X WELL CAPACITY =  

$$= (12.0 - 3.90) \times .16 = 8.1 \times .16 = 1.29$$

PURGE METHOD: <u>PERISTALTIC</u>		PURGE INITIATED AT: <u>1110</u>		PURGE ENDED AT: <u>1142</u>		TOTAL VOL. PURGED (gal):					
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
1115	1.29	1.29		4.92	6.57	29.2	.534	8.42	150	TAN	SLIGHT
1119	2.58	.32		7.42	6.89	29.4	.607	8.32	190	TAN	SLIGHT
1126	3.87	.18		7.02	6.62	29.2	.689	8.27	210	TAN	SLIGHT
1134	5.16	.16		6.85	7.29	29.1	.590	9.16	230	TAN	SLIGHT
1142	6.45	.16		6.62	7.3	29.2	.592	9.23	260	TAN	SLIGHT

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT)/ AFFILIATION: <u>Alan Neely / [Signature]</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S):	SAMPLING INITIATED AT: <u>1145</u>
SAMPLING ENDED AT: <u>1150</u>	DUPLICATE: Y <input type="checkbox"/> N <input checked="" type="checkbox"/>
FIELD DECONTAMINATION: Y <input checked="" type="checkbox"/> N <input type="checkbox"/>	FIELD-FILTERED: Y <input checked="" type="checkbox"/> N <input type="checkbox"/>

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
3	CG	1/2	HCL			8021
1	AG	1/2				8310

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>ISLAND FORD STAGE 518</u>	SITE LOCATION: <u>HOMOSASSA</u>
WELL NO: <u>MW9</u>	SAMPLE ID: _____
DATE: <u>4/25/02</u>	

### PURGING DATA

WELL DIAMETER (in): <u>2.0</u>	TOTAL WELL DEPTH (ft): <u>12.0</u>	STATIC DEPTH TO WATER (ft): <u>4.10</u>	WELL CAPACITY (gal/ft): <u>176</u>
$\text{WELL VOLUME (gal)} = (\text{TOTAL WELL DEPTH} - \text{DEPTH TO WATER}) \times \text{WELL CAPACITY}$ $= (12.0 - 4.10) \times 176 = 7.9 \times 176 = 1.26$			

PURGE METHOD: <u>PERISTALTIC</u>			PURGE INITIATED AT: <u>1035</u>			PURGE ENDED AT: <u>1055</u>			TOTAL VOL. PURGED (gal): <u>7.56</u>		
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
1039	1.26	2.52	.31	4.98	6.60	25.2	.716	9.11	0	TINTED	SLIGHT
1045	1.26	3.78	.31	4.95	6.81	25.5	.570	9.29	0	TINTED	SLIGHT
1047	1.26	5.04	.31	5.02	7.0	25.6	.561	9.46	10	TINTED	SLIGHT
1051	1.26	6.3	.31	4.47	7.01	25.7	.561	9.47	0	TINTED	SLIGHT
1055	1.26	7.56	.31	4.95	7.01	25.7	.560	9.66	10	TINTED	SLIGHT

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT)/ AFFILIATION: <u>Ann Mickey / EPA</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S): <u>GRAB</u>	SAMPLING INITIATED AT: <u>1055</u>
SAMPLING ENDED AT: <u>1100</u>	DUPLICATE: Y <input type="checkbox"/> N <input checked="" type="checkbox"/>
FIELD DECONTAMINATION: Y <input type="checkbox"/> N <input checked="" type="checkbox"/>	FIELD-FILTERED: Y <input type="checkbox"/> N <input checked="" type="checkbox"/>

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
2	CG	40ml	HCL			8021

REMARKS: \_\_\_\_\_

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <u>ISLAND FOOD STORE S18</u>	SITE LOCATION: <u>HERNANDO</u>
WELL NO: <u>MW10</u>	DATE: <u>4/25/02</u>

### PURGING DATA

WELL DIAMETER (in): <u>2"</u>	TOTAL WELL DEPTH (ft): <u>12.0</u>	STATIC DEPTH TO WATER (ft): <u>3.38</u>	WELL CAPACITY (gal/ft): <u>.16</u>
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1 WELL VOLUME (gal) = (TOTAL WELL DEPTH - DEPTH TO WATER) X WELL CAPACITY =  
 $(12.0 - 3.38) \times .16 = 8.62 \times .16 = 1.37$

PURGE METHOD: <u>PERISTALTIC</u>	PURGE INITIATED AT: <u>920</u>	PURGE ENDED AT: <u>939</u>	TOTAL VOL. PURGED (gal): <u>1.37</u>
----------------------------------	--------------------------------	----------------------------	--------------------------------------

TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
924	1.37	⤴	⤴	3.74	6.30	24.5	.619	8.23	509	LT TRT	NON
927	1.37			3.78	6.52	24.4	.609	8.29	189	LT TRT	NON
931	1.37			3.79	6.54	24.4	.611	8.20	51	CLEAR	NON
935	1.37			3.75	6.59	24.4	.613	8.22	39	CLEAR	NON
939	1.37			3.77	6.60	24.5	.615	8.24	.29	CLEAR	NON

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT) / AFFILIATION: <u>Andrew Hardy</u>	SAMPLER(S) SIGNATURE(S): <u>[Signature]</u>
SAMPLING METHOD(S): <u>GRAB</u>	SAMPLING INITIATED AT: <u>940</u>
SAMPLING ENDED AT: <u>945</u>	Duplicate: Y <input checked="" type="checkbox"/> N <input type="checkbox"/>
FIELD DECONTAMINATION: Y <input checked="" type="checkbox"/> N <input type="checkbox"/>	FIELD-FILTERED: Y <input checked="" type="checkbox"/> N <input type="checkbox"/>

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
2	CG	40mL	HCl			P021

REMARKS:

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

# Florida Department of Environmental Protection GROUNDWATER SAMPLING LOG

SITE NAME: <b>ISLAND FEED # 518</b>	SITE LOCATION: <b>HOMOSASSA SPRINGS</b>
WELL NO: <b>DW1</b>	SAMPLE ID: _____ DATE: <b>25 APR 10</b>

### PURGING DATA

WELL DIAMETER (in): <b>2"</b>	TOTAL WELL DEPTH (ft): <b>29.0</b>	STATIC DEPTH TO WATER (ft): <b>3.74</b>	WELL CAPACITY (gal/ft): <b>.16</b>
$1 \text{ WELL VOLUME (gal)} = (\text{TOTAL WELL DEPTH} - \text{DEPTH TO WATER}) \times \text{WELL CAPACITY} =$ $= (29.0 - 3.74) \times .16 = 25.26 \times .16 = 4.0$			

PURGE METHOD: <b>25% STATIC</b>			PURGE INITIATED AT: <b>1115</b>		PURGE ENDED AT: _____		TOTAL VOL. PURGED (gal): <b>12</b>				
TIME	VOLUME PURGED (gal)	CUMUL VOLUME PURGED (gal)	PURGE RATE (gpm)	DEPTH TO WATER (ft)	pH	TEMP. (°C)	COND. (µmhos)	DISSOLVED OXYGEN (mg/L)	TURBIDITY (NTUs)	COLOR	ODOR
<b>1115</b>	—	—		<b>3.74</b>							
	<b>4.0</b>	<b>4.0</b>		<b>3.76</b>	<b>7.14</b>	<b>28.02</b>	<b>8910</b>	<b>.47</b>	<b>5.0</b>	<b>CLEAR</b>	<b>SLIGHT</b>
	<b>4.0</b>	<b>8.0</b>		<b>3.77</b>	<b>7.39</b>	<b>27.99</b>	<b>8999</b>	<b>1.00</b>	<b>.9</b>	<b>"</b>	<b>"</b>
<b>1220</b>	<b>4.0</b>	<b>12.0</b>		<b>3.77</b>	<b>7.37</b>	<b>27.96</b>	<b>8966</b>	<b>.98</b>	<b>1.1</b>	<b>CLEAR</b>	<b>SLIGHT</b>

WELL CAPACITY (Gallons per Foot): 0.75" = 0.02; 1" = 0.04; 1.25" = 0.06; 2" = 0.16; 3" = 0.37; 4" = 0.65; 5" = 1.02; 6" = 1.47; 12" = 5.88

### SAMPLING DATA

SAMPLED BY (PRINT) AFFILIATION: <b>Peter Halder</b>	SAMPLER(S) SIGNATURE(S):
SAMPLING METHOD(S): <b>GRAIS</b>	SAMPLING INITIATED AT: <b>1220</b> SAMPLING ENDED AT: _____
FIELD DECONTAMINATION: <b>(Y)</b> N	FIELD-FILTERED: Y <b>(N)</b> DUPLICATE: Y <b>(N)</b>

SAMPLE CONTAINER SPECIFICATION			SAMPLE PRESERVATION			INTENDED ANALYSIS AND/OR METHOD
NO.	MATERIAL CODE	VOLUME	PRESERVATIVE USED	TOTAL VOLUME ADDED IN FIELD (mL)	FINAL pH	
<b>2</b>	<b>CG</b>	<b>40ml</b>	<b>HCl</b>			<b>8021</b>
<b>1</b>	<b>AG</b>	<b>1LT</b>				<b>8310</b>

REMARKS: \_\_\_\_\_

MATERIAL CODES: AG = AMBER GLASS; CG = CLEAR GLASS; PE = POLYETHYLENE; O = OTHER (SPECIFY)

NOTE: The above do not constitute all of the information required by Chapter 62-160, F.A.C.

**Site No. 26 Texaco #721**  
3861 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098503124

SMITH BROS.  
Oil Company, Inc.

P.O. BOX 1339  
BARTOW, FLORIDA 33831  
863-533-3163



January 19, 2000

Mr. C. Mark Sumner  
Environmental Specialist II  
Citrus County Health Department  
Environmental Health Section  
Storage Tank Inspection Program  
3600 West Sovereign Path, Suite 125  
Lecanto, FL 34461

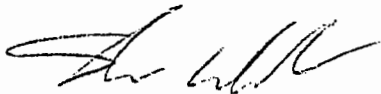
Re: Texaco #721  
FDEP 8503124  
3861 Suncoast Blvd.  
Homosassa Springs, FL

Dear Mr. Sumner:

In response to your letter of December 3, 1999 the following is provided:

- 1) Copy of site plan and report from Handex indicating that the monitoring wells might be used for contamination assessment. The wells will be properly closed if they are not utilized for contamination assessment and we will notify you upon completion.

Sincerely,

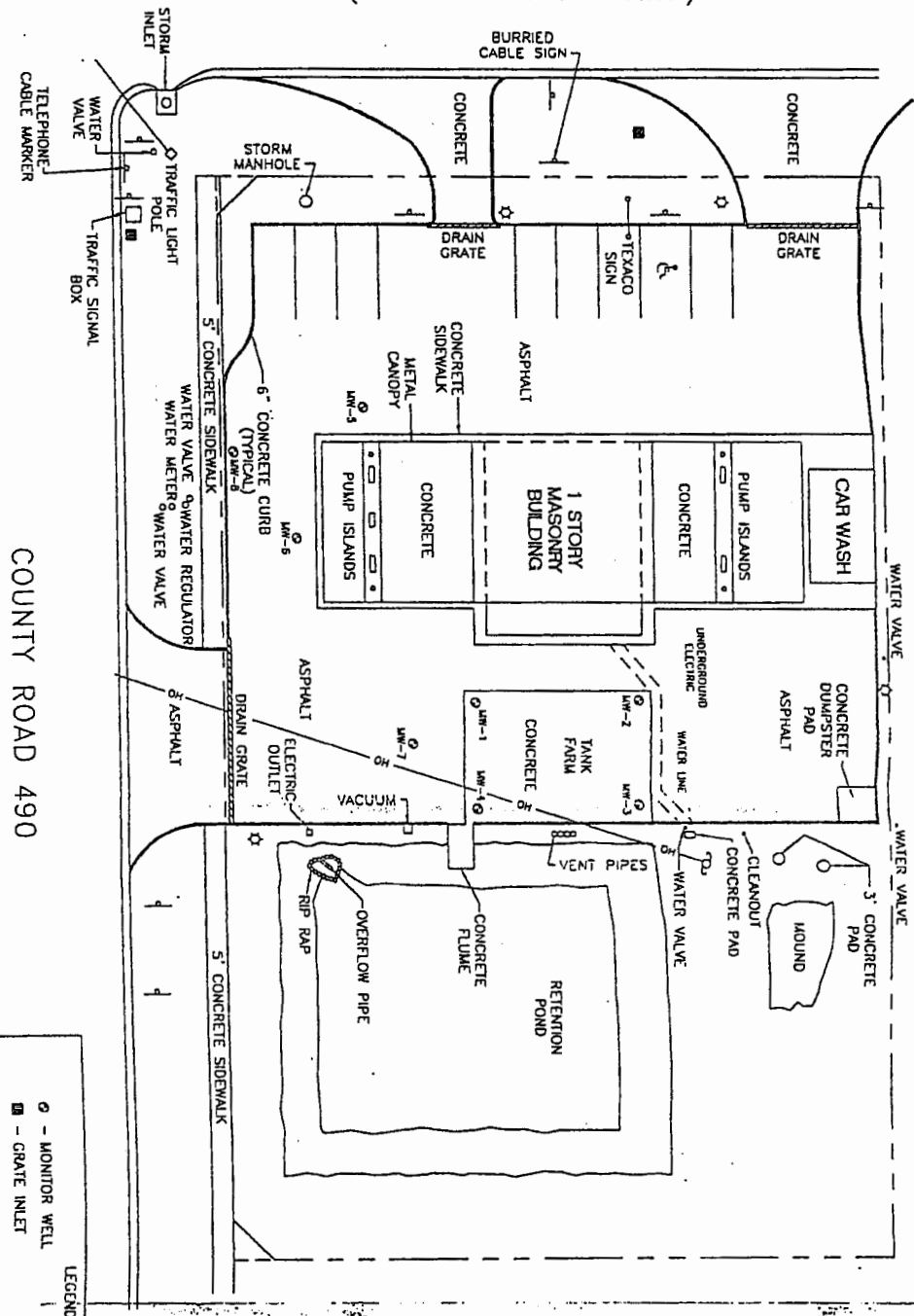


Steve Weeks

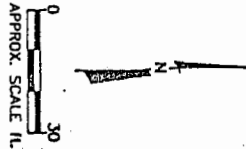
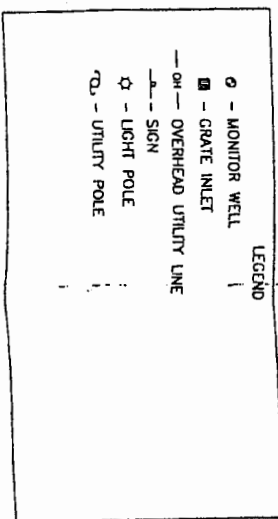


SUNCOAST BOULEVARD  
(U.S. HIGHWAY 19 NORTH)

112181-04



COUNTY ROAD 490



HASC REPORTING PROJ. LHM 10/11

TRF. 5/10/07/08/10/09/11/12/13/14/15/16/17/18/19/20/21/22/23/24/25/26/27/28/29/30/31/32/33/34/35/36/37/38/39/40/41/42/43/44/45/46/47/48/49/50/51/52/53/54/55/56/57/58/59/60/61/62/63/64/65/66/67/68/69/70/71/72/73/74/75/76/77/78/79/80/81/82/83/84/85/86/87/88/89/90/91/92/93/94/95/96/97/98/99/100



QUALITY PETROLEUM #721  
3861 SUNCOAST BOULEVARD  
HOMOSASSA SPRINGS, FLORIDA

FIGURE 1  
SITE PLAN





November 24, 1999

Mr. Tom Stodd, P.G.  
Florida Department of Environmental Protection  
2600 Blirstone Road  
Tallahassee, FL

RE: Multi-Phase Extraction Overpurge Letter Report  
Quality # 721  
3861 Suncoast Blvd.  
Homosassa Springs, Florida  
FDEP Facility No. 098503124  
Work Order No. 2000-00-4067-0  
Handex Project No. 112181-04

Dear Mr. Stodd:

Handex of Florida, Inc. (Handex) is pleased to present this report detailing the work completed pursuant to the above referenced work order and subsequent change order, copies of which are included in Appendix A. A site plan is included as Figure 1.

On September 21, 1999, Handex submitted a notice of intent (NOI) (along with the \$100 permit fee) to the Florida Department of Environmental Protection (FDEP) Southwest District to discharge treated groundwater to an adjacent storm sewer at this location. On September 28, 1999, Handex received the NPDES Permit (Permit No. FLG910887) to discharge the groundwater to an adjacent storm sewer at the Quality #721 site. On November 12, 1999, discharge monitoring reports (DMRs) for all days of discharge were submitted to the FDEP. A copy of the NOI, the NPDES permit, and the DMRs are included in Appendix B.

On August 17, 1999, quiescent groundwater samples were collected from monitoring wells MW-1, MW-2, MW-3, MW-6, and MW-8 and were sent to Envirolab Inc., to be analyzed for total lead. This sampling event was conducted to determine if the hydrocarbons on site resulted from a leaded fuel discharge as defined in the NPDES permit guidelines. A copy of the laboratory analytical report is included in Appendix C and copies of the field groundwater sampling forms are included in Appendix D.

As shown on Table 1 and depicted on Figure 2, the groundwater samples collected from MW-1, MW-2, MW-3, MW-6, and MW-8 on August 17, 1999, revealed low concentrations of total lead. As a result, the effluent stream produced during the overpurge event was not analyzed for total lead.

On October 11<sup>th</sup>, 1999, prior to the initiation of the overpurge event, groundwater samples were collected from MW-6 and MW-8 and sent to Envirolab Inc. to be analyzed for EPA Method 602 (BTEX + MTBE) and EPA 8310 parameters. A copy of the laboratory groundwater analytical report is included in Appendix C. Field groundwater sampling forms are included in Appendix D. The groundwater sampling results from this event and previous sampling events are summarized on Table 1 and Table 1A and depicted on Figure 2.

On October 11<sup>th</sup>, October 12<sup>th</sup>, October 13<sup>th</sup>, and October 14<sup>th</sup>, 1999, Handex conducted a 72-hour overpurge on monitoring wells MW-6 and MW-8, using multiphase extraction technology. Pumping began at 12:30pm on October 11, 1999, and ended at 12:30pm on October 14, 1999. The recovered groundwater was treated on-site using a skid mounted portable diffuser aerator and carbon polishing. A system influent and effluent sample was collected daily and analyzed for EPA Method 602 (BTEX + MTBE), and 8310 parameters as required by the NPDES Permit No. FLG910887. The effluent stream was also analyzed daily for pH using a field meter. The results of the two system sampling events are summarized on Table 2 and copies of the laboratory analytical reports are included in Appendix C.

The MPX treatment unit operated continuously during this event and the total volume of groundwater treated and discharged to the storm sewer during this test was measured to be 5,920 gallons (Table 3).

On October 27, 1999, groundwater samples were collected from monitoring wells MW-6 and MW-8 and sent to Envirolab Inc., to be analyzed for EPA method 602 (BTEX + MTBE) and 8310 parameters. A copy of the laboratory groundwater analytical report is included in Appendix C and copies of the field groundwater sampling forms are included in Appendix D. The groundwater sampling results from this event and previous sampling events are summarized on Table 1 and Table 1A and depicted on Figure 2.

As depicted on Figure 2, the total volatile aromatic (VOA) concentration at MW-6 increased from 28.4 micrograms per liter (ug/l) on October 11, 1999 to 35.6 ug/l on October 27, 1999. The naphthalene concentration at MW-6 decreased from 200 ug/l on October 11, 1999 to 130 ug/l on October 27, 1999. The VOA concentration at MW-8 remained near below or near the method detection limits during the most recent period of monitoring. The naphthalene concentration at MW-8 decreased from 33 ug/l on October 11, 1999 to < 1.0 ug/l on October 27, 1999.

Depths to groundwater were measured in all site monitoring wells during the site visit on October 27, 1999. The groundwater elevation data collected on October 27, 1999, which are summarized on Table 4, were used to construct a groundwater elevation contour map

(Figure 3). As depicted on Figure 3, the surficial groundwater flow direction was calculated to be in a west/southwest direction beneath the site on October 27, 1999.

As shown on Table 1, the dissolved hydrocarbon concentrations at MW-8 are currently below the groundwater target cleanup levels listed in Table I of Chapter 62-777 F.A.C.. The total VOA concentration at MW-6 after the overpurge has remained consistent with the total VOA concentration measured before the implementation of the 72-hour overpurge event. Based on the groundwater data presented in this report, Handex recommends the implementation of a monitoring only program (MOP) for two quarters, as authorized under the existing work-order # 2000-00-4068-0. The hydrocarbon concentrations at MW-6 and MW-8 will be evaluated during the two quarters to determine if the overpurge event was successful at reducing the hydrocarbon concentrations in these wells over the long term.

Handex appreciates the opportunity to assist the FDEP on this project. If you have any questions regarding this sampling event or require additional information, please do not hesitate to contact the undersigned at (813) 626-4646.

Sincerely,  
HANDEX OF FLORIDA, INC.

*Cory Henderson*

Cory Henderson  
Project Hydrogeologist

*Barry c Reda*

Barry Reda P. G.  
Project Manager

cc: Steve Weeks, Quality Petroleum, Inc.

**Site No. 28 Citrus Oldsmobile Pontiac (aka Sunset Oldsmobile)**  
3029 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098733790



# Department of Environmental Protection

Jeb Bush  
Governor

Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

David B. Struhs  
Secretary

April 14, 2000

Mr. Paul Weisner  
Citrus Oldsmobile Pontiac  
3029 South Suncoast Blvd.  
Homosassa, FL 34448

**Re: Citrus Oldsmobile Pontiac  
3029 South Suncoast Boulevard  
Homosassa, Citrus County, Florida  
Facility ID #098733790**

Dear Mr. Weisner:

Paul Gruzlovic of the Bureau of Petroleum Storage Systems has reviewed the Site Assessment Report (SAR), dated October 22, 1999 (received November 5, 1999), prepared and submitted by Unified Environmental Services, Inc., for the discharge discovered on December 15, 1998 at this site. The Department has determined that the request for a No Further Action (NFA) status for this site is not appropriate at this time. In order to meet the requirements of Chapter 62-770, Florida Administrative Code (F.A.C.), the following comments need to be addressed:

- (1) Boring logs were not submitted for the soil borings that were completed in the area of the former USTs. The boring logs (OVA readings, lithology, and moisture content listed on the logs) should be submitted to the Department. In addition, the sampling interval was listed as greater than two feet for several of the OVA data presented in Table 1. The actual depths that the OVA readings were collected should be included on the OVA summary table and the boring logs.
- (2) A water sampling log for the groundwater samples obtained from the temporary well in the former gasoline UST area was not submitted with the report. As stated in Rule 62-770.400(2)(c), Florida Administrative Code (F.A.C.), water sampling logs are required to be submitted to the Department

"More Protection, Less Process"

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for each well that is sampled. The water sampling log should be submitted to the Department.

- (3) A site location map (portion of a USGS quadrangle) was not included in the report illustrating the location of the site. A site location map should be submitted to the Department.
- (4) The site plan (Figure 1) was not scaled and the location of soil boring SB-2 appeared to be incorrect. A revised and scaled site plan should be submitted to the Department.
- (5) No site plan was included in the SAR that illustrated the locations of the soil borings and temporary wells completed during the UST closure assessment. Although the UST closure report included in the SAR referred to Figure 1 as the boring and well location map, this figure was not included in the SAR. Figure 1 (UST closure report) should be provided to the Department.
- (6) No explanation was provided in the text of the report, the laboratory report, or the laboratory chain of custody as to how the volatile organic aromatic (VOA) soil samples were collected during the UST closures. It appears the sample collection method utilized for the VOA samples may have been EPA Method 5030 and not EPA Method 5035. The VOA soil samples submitted to the laboratory should have been collected utilizing EPA Method 5035, as stated in the Department's July 15, 1998 memorandum for soil sample collection. Documentation should be provided from the laboratory to show that the samples were collected and analyzed using EPA Method 8021/5035.
- (7) Arsenic was detected above the Department's direct exposure criteria in the waste oil UST soil sample, but was not sampled as part of the August 1999 sampling activities. In addition, the laboratory report for the soil samples collected during the UST closures was incomplete. A complete copy of the laboratory report included in the UST closure report should be provided to the Department.
- (8) The SAR indicated that one potable well was located on-site. A map should have been provided showing the location of the well and any other private potable wells located within 0.25 mile or any public supply potable wells located within 0.5

mile. A potable well summary table should also have been included in the SAR listing the potable well construction information. A potable well survey map and well construction table should be submitted to the Department.

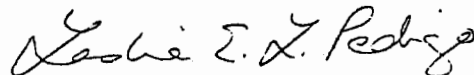
The direction of groundwater flow was not determined as part of the site assessment activities and no wells were installed downgradient of the two source areas. Before any additional assessment work is completed, Comment's 1 through 8 listed above should be addressed and a response should be submitted to the Department. After reviewing the response, the Department will make a determination as to what specific supplemental site assessment activities will have to be completed before NFA status can be approved for the December 15, 1998 discharge.

Please note, applicable portions of the Site Assessment Report Addendum must be signed and sealed by a registered professional Engineer or a registered Professional Geologist authorized by Chapters 471 or 472, F.S.

Please provide two copies of the results of the supplemental assessment to me within sixty (60) days of receipt of this request.

The Department requests that written notification be provided at least three days prior to performing all future sampling events. If you have any questions concerning this review, please contact me at (813) 744-6100, ext. 427 or Paul Gruzlovic at (850) 921-9036.

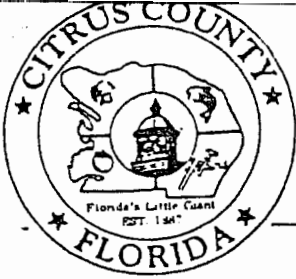
Sincerely,



Leslie E.L. Pedigo  
Environmental Specialist III  
Tanks Program  
Division of Waste Management

LELP

cc: Keith McDonald, Unified Environmental Services, Inc.  
Mark Sumner, Citrus County Health Department  
Paul Gruzlovic, FDEP-BPSS



# Board of County Commissioners

## Department of Public Safety

285 South Kensington Avenue, Lecanto, Florida 34461

(352) 726-1606 ————— Fax (352) 726-1001

Mr. Harold Hall  
3029 S. Suncoast Blvd.  
Homosassa, Fl. 34448

Ref: Closure Assessment Report  
Citrus Oldsmobile Pontiac  
3029 S. Suncoast Blvd.  
Homosassa, Fl. 34448  
098733790

Mr. Hall:

The Citrus County Public Safety-Storage Tanks Program has completed its review of the Closure Report dated December, 1998 (received April 26, 1999) submitted by Unified Environmental for the above-referenced facility. The analytical results were found to be in excess of state target levels.

The concentration of contaminants require that a site assessment as defined in Chapter 62-770, Florida Administrative Code, be initiated within thirty days. A Site Assessment Report (SAR) must be prepared and submitted to the Florida Department of Environmental Protection within nine (9) months of date of discovery of contamination. Two copies of the SAR must be sent to Ms. Laurel Culbreth, Florida Department of Environmental Protection 3804 Coconut Palm Dr., Tampa, Fl. 33619-8318.

If this facility may be eligible for restoration coverage under the Florida Petroleum Liability and Restoration Insurance Program (FPLRIP), then the initiation of the SAR may be temporarily postponed until the determination of your eligibility is made. If you are determined to be eligible for FPLRIP, then the Department's Bureau of Petroleum Storage Systems in Tallahassee will provide direction on when to proceed with the SAR. If you are denied eligibility, you will be required to initiate the SAR upon notification of the denial.

If you have any questions, please contact Laurel Culbreth at (813) 744-6100 ext. 414.

Sincerely,

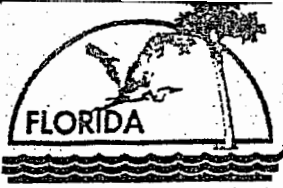
David E. Chronister  
Environmental Specialist III

---

STORAGE TANKS PROGRAM  
285 S. Kensington Avenue  
Lecanto, Florida 34461  
(352) 726-1400



**Site No. 29 Chevron Sprint #6184 (aka Li'l Champ Food Store #184)**  
2275 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098503086  
EPA I.D. No. FLD984193714



# 29

# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

**CERTIFIED MAIL**  
**RETURN RECEIPT REQUESTED**

Ms. Sandy Metz  
Lil' Champ, Inc.  
Post Office Box 23180  
Jacksonville, Florida 32241

DEC 4 2000  
D.E.P.  
DEC 06 2000  
Southwest District Tampa

Subject: Rescission of Site Rehabilitation Completion Order dated March 27, 1995  
Lil' Champ #184  
2275 Suncoast Boulevard  
Homosassa, Citrus County  
FDEP Facility ID# 098503086

Dear Ms. Metz:

The Bureau of Petroleum Storage Systems has reviewed the Summary of Phase II Environmental Assessment Findings Report dated February 1, 1999 (received October 26, 2000), prepared by ECT Consulting & Technology, Inc., and the letter submitted for this site requesting the rescission of the Department's March 27, 1995 Site Rehabilitation Completion Order (SRCO). The data provided in the report indicate that groundwater and soil contamination above the Department's cleanup target levels specified in Chapter 62-770, Florida Administrative Code (F.A.C.), still exist at this site. The Department's March 27, 1999 SRCO provided that "[i]f a subsequent discharge of petroleum or petroleum product occurs at the site, the Department may require site rehabilitation in order to reduce contaminant concentrations to the levels approved through review of the NFAP or otherwise allowed by Chapter 62-770, F.A.C. It is hereby ordered that the SRCO issued by the Department on March 27, 1995 is rescinded. Therefore, supplemental assessment and/or remediation activities must be completed in order to meet the requirements of Chapter 62-770, F.A.C.

Site conditions indicate that the increase in contaminant concentrations is not due to any subsequent discharge; therefore, further cleanup activities associated with the March 12, 1992 and October 8, 1997 discharges at this site will remain eligible for funding assistance for allowable and reasonable costs under the Pollution Liability Insurance Restoration Program (PLRIP). This site's score is 60, which means that funding is currently available to continue.

*"Protect, Conserve and Manage Florida's Environment and Natural Resources"*

A person whose substantial interests are affected by this Order may petition for an administrative hearing under Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Lil' Champ, Inc., shall mail a copy of the petition to Lil' Champ, Inc. at the time of filing. Failure to file a petition within this time period shall waive the right of anyone who may request an administrative hearing under Sections 120.569 and 120.57, F.S.

Pursuant to Section 120.54(5)(b)4.a., F.S. (1998, Supp.), and Rule 28-106.201, F.A.C., a petition for administrative hearing shall contain the following information:

- a) The name, address, and telephone number of each petitioner, the name, address, and telephone number of the petitioner's representative, if any, the site owner's name and address, if different from the petitioner, the FDEP facility number, and the name and address of the facility;
- b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- c) An explanation of how each petitioner's substantial interests are or will be affected by the Department's action or proposed action;
- d) A statement of the material facts disputed by the petitioner, or a statement that there are no disputed facts;
- e) A statement of the ultimate facts alleged, including a statement of the specific facts the petitioner contends warrant reversal or modification of the Department's action or proposed action;
- f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the Department's action or proposed action; and
- g) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Department's action or proposed action.

This Order is final and effective as of the date on the top of the first page of this Order. Timely filing a petition for administrative hearing postpones the date this Order takes effect until the Department issues either a final order pursuant to an administrative hearing or an order responding to supplemental information provided pursuant to meetings with the Department.

#### Judicial Review

Any party to this Order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth

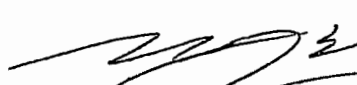
P.G. CERTIFICATION

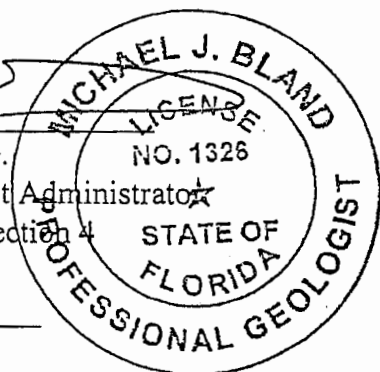
Rescission of March 27, 1995 Site Rehabilitation Completion Order for Lil' Champ #184, 2275 Suncoast Boulevard, Homosassa, Citrus County, DEP Facility #098503086

I hereby certify that in my professional judgment, the components of this request for the rescission of the March 27, 1995 Site Rehabilitation Completion Order satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the conclusions in the Summary of Phase II Environmental Assessment Findings Report provide reasonable assurances that the objectives stated in Chapter 62-770, F.A.C., have been met.

X I personally completed this review.

\_\_\_ This review was conducted by xxxxxxxx, working under my direct supervision.

  
Michael J. Bland, P.G.  
Professional Geologist Administrator  
Petroleum Cleanup Section 4  
Date 11/30/00



MICHAEL J. BLAND  
LICENSE  
NO. 1326  
STATE OF  
FLORIDA  
PROFESSIONAL GEOLOGIST



29

# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

**CERTIFIED MAIL**  
**RETURN RECEIPT REQUESTED**

DEC 4 2000

Ms. Sandy Metz  
Lil' Champ, Inc.  
Post Office Box 23180  
Jacksonville, Florida 32241

Subject: Rescission of Site Rehabilitation Completion Order dated March 27, 1995  
Lil' Champ #184  
2275 Suncoast Boulevard  
Homosassa, Citrus County  
FDEP Facility ID# 098503086

Dear Ms. Metz:

The Bureau of Petroleum Storage Systems has reviewed the Summary of Phase II Environmental Assessment Findings Report dated February 1, 1999 (received October 26, 2000), prepared by ECT Consulting & Technology, Inc., and the letter submitted for this site requesting the rescission of the Department's March 27, 1995 Site Rehabilitation Completion Order (SRCO). The data provided in the report indicate that groundwater and soil contamination above the Department's cleanup target levels specified in Chapter 62-770, Florida Administrative Code (F.A.C.), still exist at this site. The Department's March 27, 1999 SRCO provided that "[i]f a subsequent discharge of petroleum or petroleum product occurs at the site, the Department may require site rehabilitation in order to reduce contaminant concentrations to the levels approved through review of the NFAP or otherwise allowed by Chapter 62-770, F.A.C. It is hereby ordered that the SRCO issued by the Department on March 27, 1995 is rescinded. Therefore, supplemental assessment and/or remediation activities must be completed in order to meet the requirements of Chapter 62-770, F.A.C.

Site conditions indicate that the increase in contaminant concentrations is not due to any subsequent discharge; therefore, further cleanup activities associated with the March 12, 1992 and October 8, 1997 discharges at this site will remain eligible for funding assistance for allowable and reasonable costs under the Pollution Liability Insurance Restoration Program (PLRIP). This site's score is 60, which means that funding is currently available to continue

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cleanup activities at this time. Please complete the attached Contractor Designation Form if one has not already been submitted and return it to Leila Shuffler at the letterhead address, Mail Station 4540 so that cleanup activities can proceed.

### Legal Issues

The Department's Order shall become final unless a timely petition for an administrative proceeding (hearing) is filed under Sections 120.569 and 120.57, Florida Statutes (F.S.), within 21 days of receipt of this Order. The procedures for petitioning for a hearing are set forth below.

Persons affected by this Order have the following options:

If you choose to accept the above decision by the Department about the Phase II Environmental Assessment Findings Report you do not have to do anything. This Order is final and effective as of the date on the top of the first page of this Order.

If you disagree with the decision, you may do one of the following:

1. File a petition for administrative hearing with the Department's Office of General Counsel within 21 days of receipt of this Order;

OR

2. File a request for an extension of time to file a petition for hearing with the Department's Office of General Counsel within 21 days of receipt of this Order. Such a request should be made if you wish to meet with the Department in an attempt to informally resolve any disputes without first filing a petition for hearing.

Please be advised that mediation of this decision pursuant to Section 120.573, Florida Statutes (F.S.), is not available.

### How to Request an Extension of Time to File a Petition for Hearing

For good cause shown, pursuant to Rule 62-110.106(4), F.A.C., the Department may grant a request for an extension of time to file a petition for hearing. Such a request must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Lil' Champ, Inc., shall mail a copy of the request to Lil' Champ, Inc. at the time of filing. Timely filing a request for an extension of time tolls the time period within which a petition for administrative hearing must be made.

### How to File a Petition for Administrative Hearing

A person whose substantial interests are affected by this Order may petition for an administrative hearing under Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Lil' Champ, Inc., shall mail a copy of the petition to Lil' Champ, Inc. at the time of filing. Failure to file a petition within this time period shall waive the right of anyone who may request an administrative hearing under Sections 120.569 and 120.57, F.S.

Pursuant to Section 120.54(5)(b)4.a., F.S. (1998, Supp.), and Rule 28-106.201, F.A.C., a petition for administrative hearing shall contain the following information:

- a) The name, address, and telephone number of each petitioner, the name, address, and telephone number of the petitioner's representative, if any, the site owner's name and address, if different from the petitioner, the FDEP facility number, and the name and address of the facility;
- b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- c) An explanation of how each petitioner's substantial interests are or will be affected by the Department's action or proposed action;
- d) A statement of the material facts disputed by the petitioner, or a statement that there are no disputed facts;
- e) A statement of the ultimate facts alleged, including a statement of the specific facts the petitioner contends warrant reversal or modification of the Department's action or proposed action;
- f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the Department's action or proposed action; and
- g) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Department's action or proposed action.

This Order is final and effective as of the date on the top of the first page of this Order. Timely filing a petition for administrative hearing postpones the date this Order takes effect until the Department issues either a final order pursuant to an administrative hearing or an order responding to supplemental information provided pursuant to meetings with the Department.

#### Judicial Review

Any party to this Order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth

Ms. Sandy Metz  
Page four of four

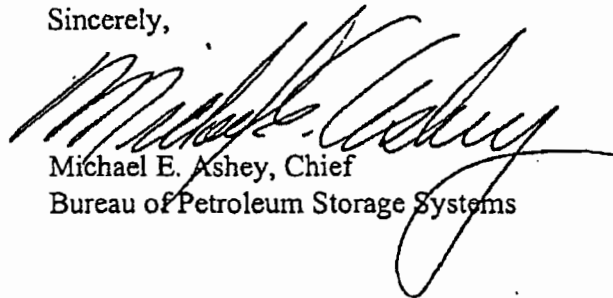
Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within 30 days after this Order is filed with the clerk of the Department (see below).

The FDEP Facility Number for this site is 098503086. Please use this identification on all future correspondence with the Department.

Questions

Any questions regarding the Department's review of your Phase II Environmental Assessment Findings Report should be directed to Michael J. Bland at (850) 921-9024. Questions regarding legal issues should be referred to the Department's Office of General Counsel at (850) 488-9314. Contact with any of the above does not constitute a petition for administrative hearing or request for an extension of time to file a petition for administrative hearing.

Sincerely,



Michael E. Ashe, Chief  
Bureau of Petroleum Storage Systems

MEA/mjb

FILING AND ACKNOWLEDGMENT  
FILED, on this date, pursuant to  
§120.52 Florida Statutes, with the  
designated Department Clerk, receipt  
of which is hereby acknowledged.

Diane Krafft      12-4-2000  
Clerk                      Date  
(or Deputy Clerk)

c: Theresa Fischer, ECT, 4110 Southpoint Drive, Jacksonville, Florida 32216  
Leslie Pedigo, FDEP Southwest District Office



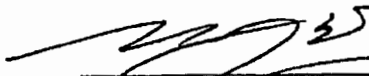
P.G. CERTIFICATION

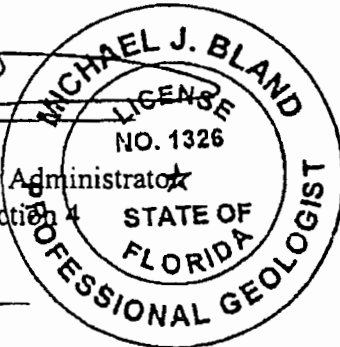
Rescission of March 27, 1995 Site Rehabilitation Completion Order for Lil' Champ #184, 2275 Suncoast Boulevard, Homosassa, Citrus County, DEP Facility #098503086

I hereby certify that in my professional judgment, the components of this request for the rescission of the March 27, 1995 Site Rehabilitation Completion Order satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the conclusions in the Summary of Phase II Environmental Assessment Findings Report provide reasonable assurances that the objectives stated in Chapter 62-770, F.A.C., have been met.

I personally completed this review.

This review was conducted by xxxxxxxx, working under my direct supervision.

  
Michael J. Bland, P.G.  
Professional Geologist Administrator  
Petroleum Cleanup Section 4  
Date 11/30/00



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## Lube Cube®

**Lube Cube® Oil Tanks:** The best solution for storage of new and used lubrication oils. Lube Cube tanks have provided reliable storage of flammable and combustible liquids for more than 10 years.

### Lube Cubes Offer:

- lower installed costs than underground tanks,
- better space utilization than cylindrical aboveground tanks
- lower operating costs than 55 gallon drums
- Rectangular shape allows up to 20% more storage volume in a given space than comparable cylindrical tanks

Lube Cubes are designed for easy and convenient installation:

- Indoors
- In service bays
- Basements
- Outdoors next to buildings

All tanks are UL 142 listed and meet fire code requirements, including NFPA 30, for flammable and combustible liquid storage

Lube Cubes are available:

- As either single or double-wall tanks (Double-wall tanks are UL listed as integral secondary containment and therefore do not require dikes for leak containment.)
- Available nationally, from seven manufacturing facilities
- Standard sizes from 60 to 20,000 gallons

Standard Features:

- UL 142 listed
- Skid mounted for easy installation
- Shop primed exterior
- NPT fittings with PVC plugs
- Single-wall – 5 (plus emergency vent opening)
- Double-wall – above fittings (plus emergency vent and inspection opening)
- Lifting lugs

Options:



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draw

instal

dimes

print ver

- Industrial epoxy coating (red standard)
- Special colors, coatings and interior linings available upon request
- Seven (7) gallon spill box
- Custom sizes
- Stainless steel construction
- Interior coatings
- Equipment packages
- Compartments available
- Custom dimensions and equipment packages available upon request

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# Department of Environmental Protection

b Bush  
ernor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400  
Petroleum Preapproval Program

RECEIVED  
DEPARTMENT OF ENVIRONMENTAL PROTECTION  
SECRETARY  
OCT - 8 PM 1:41  
BUREAU OF PETROLEUM STORAGE SYSTEMS DOCUMENT MANAGEMENT CENTER

## CONTRACTOR DESIGNATION FORM

This Contractor Designation supersedes all previous designations for this site made by the Real Property Owner or Responsible Party whose signature appears below.

\* Please read this entire form carefully. It contains important information regarding the cleanup of your site. This is a two-page form. Be sure to review and complete both pages.

1. The Florida Department of Environmental Protection (Department) is required by statute to preapprove the scope of work and cost for the cleanup of a petroleum contaminated site if state funds will be used to pay for that cleanup (Section 376.30711(1)(b), Florida Statutes (F.S.)).
2. The Real Property Owner or Responsible Party must use this form to designate a contractor that meets certain criteria (Sections 376.30711(2)(b)-(c), F.S.) for the Department to work with on their site. In addition, if the Department should coordinate its actions with your representative, you can use this form to designate such an
3. If the Real Property Owner is not the person responsible for completing the cleanup, then the Responsible Party should complete this form and submit it along with a copy of the legal agreement that details their cleanup
4. Please fill out this form completely and carefully. The form will be returned if there is any omission, error or correction in any of the required information, including the notary portion of the form. This will delay the cleanup of
5. The Real Property Owner or Responsible Party may designate a new contractor at any time. However, this may also create a delay in the cleanup of your site. Also, the Real Property Owner or Responsible Party may be liable for payment for any work that the new contractor must perform in order to assume the site cleanup if the Department previously paid for such work. If a new contractor is designated, then any work in progress will be completed by the contractor to whom the work was awarded unless that contractor is being replaced for documented poor performance or it voluntarily agrees (in writing) to forgo the remaining work. A new designation does not take effect until this completed form is accepted and approved by the Department.
6. Pursuant to Florida Law, "It is unlawful for a site owner or operator, or his or her designee, to receive any remuneration, in cash or in kind, directly or indirectly, from a rehabilitation contractor performing site cleanup activities..." under the preapproval program (Section 376.30711(6) F.S.)
7. Please return the form with original signatures (copies cannot be accepted) to Mail Station 4540 in the Bureau of Petroleum Storage Systems at the letterhead address. If this form is not returned within 30 days or should you choose not to return it, then we will assume that you do not intend to designate a contractor or an alternative point of contact. If you choose not to designate a contractor, the Department will select one for you. If you have any questions, please call (850) 487-3299. Thank you for your cooperation.

### Part 1- Real Property Owner/Responsible Party Identification (all information is required):

a. FDEP Facility ID#: 098503086

b. Name of Real Property Owner or Responsible Party: The Pantry, Inc.

c. Please Indicate (see paragraph 3 above): Real Property Owner  Responsible Party

d. Street Address of Real Property 2275 S. Suncoast Blvd. Homosassa, FL 34448

e. Current Business Name (if any): LIL CHAMP # 6184 dba Sprint (#184)

f. Mailing Address for Real Property Owner or Responsible Party Identified in Part 1.b

8930 Western Way, Suite 4 Jacksonville, FL 32256

Attn. Ms. Sandy Metz

Phone: (904)464-7274

### CONTRACTOR DESIGNATION FORM (continued)

This is page two of a two-page form. Be sure to review and complete both pages.

Please read this entire form carefully. It contains important information regarding the cleanup of your site. \*

#### Part 2 - Contractor Designation (all information is required):

List the name, address and contact person for the firm you wish to designate to perform the necessary cleanup of petroleum contamination at the facility listed in Part 1.

- a. Contractor Name: Environmental Consulting & Technology
- b. Contractor Address: 3701 NW 98th St.  
Gainesville, FL 32606
- c. Contact Person at Contractor: Pam McElroy
- d. Phone Number for Contact Person: (352) 332-0444

#### Part 3 - Real Property Owner or Responsible Party Designated Contact (this information is optional)

Use this section to designate an alternative point of contact to act on behalf of the person named in Part 1.b. This person will serve as your representative regarding the cleanup of your site and receive all further notices on your behalf. Do not list the contact person for the contractor. If you do not wish to designate an alternative point of contact, then leave this part blank.

- a. Contact Name: Ms. Sandy Metz
- b. Contact Address: 8930 Western Way, Suite 4  
Jacksonville, FL 32256
- c. Contact Phone: (904)464-7274
- d. Relationship of Contact to Real Property Owner or Responsible Party: #Error

#### Part 4 - Certification by Real Property Owner or Responsible Party (all information is required):

This part must be signed in the presence of a notary public.

By signing below you are certifying that you have read and understood all of the information on both pages of this form and that all of the above information is true and correct to the best of your knowledge. The name in this part must match that listed in part 1.b.

- a. FDEP Facility ID # (must be the same as Part 1.a): 098503086
- b. Name of Real Property Owner or Responsible Party: The Pantry, Inc.
- c. Signature of person named above: Ms. Sandy Metz *Sandy Metz*
- d. Title of person named above (if owner is a business) Manager, Environmental Compliance Administration

#### Notarization of Signature of Real Property Owner or Responsible Party (required)

State of FLORIDA County of DUVAL

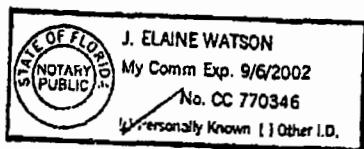
Sworn to and subscribed before me by Sandy Metz this 4th day of OCTOBER, 2001

Personally known

Produced Identification ( ) Type of ID: \_\_\_\_\_ (if produced identification)

Notary's Signature J. Elaine Watson My Commission Expire 9/6/2002

Notary's Public, State of FLORIDA Commission Number (if applicable) CC 770346



**THE PANTRY, INC.**  
GROUP COBRA

October 5, 2001

**Ms. Leila Shuffler**  
Bureau of Petroleum Storage Systems  
Mail Station 4540  
2600 Blair Stone Road  
Tallahassee, FL 32399-2400

---

THE PANTRY, INC.

---

8930 WESTERN WAY, SUITE 4  
JACKSONVILLE, FLORIDA 32256  
904 464-7200

RE: Contractor Designation Form  
Lil' Champ #6184  
2275 S. Suncoast Blvd., Homosassa, FL 34448  
FDEP Facility ID #098503086

Dear Ms. Shuffler,

Enclosed please find an executed Contractor Designation Form (CDF) naming Environmental Consulting & Technology as the designated contractor for the above referenced site.

If you should have any questions, please contact me at (904) 464-7274 or at [smetz@lil-champ.com](mailto:smetz@lil-champ.com)

Respectfully,



**Sandy Metz**  
Manager, Environmental Compliance Administration

SEM/pab

Enclosures (1)

cc: Pam McElroy, Environmental Consulting & Technology  
Mark Sumner, Citrus County Health Department  
Betty Sekimonyo, STB Environmental  
SEM correspondence file  
Site file

**RECEIVED**  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
01 OCT - 8 PM 1:4  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER



Environmental Consulting & Technology, Inc.

November 28, 2000

D.E.P.  
DEC 01 2000

Southwest District Tampa

Ms. Leslie Pedigo  
Florida Department of Environmental Protection  
Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

Re: Lil' Champ Food Store No. 184  
2275 South Suncoast Blvd.  
Homasassa, Citrus County, Florida 32649  
FDEP Facility I.D. No.: 098503086

Dear Ms. Pedigo:

Environmental Consulting & Technology, Inc. (ECT), on behalf of Lil' Champ Food Stores, Inc., respectfully requests your assistance in the retraction of the December 29, 1998 Discharge Reporting Form (DRF) and the rescission of the March 27, 1995 Site Rehabilitation Completion Order (SRCO) for the above referenced site. This correspondence has been developed based upon Mr. Michael Bland's response to my initial e-mail to Mr. Lewis Comman dated October 26, 2000. ECT has conducted a thorough file review for this site and has determined that the site has three discharges as follows:

- March 12, 1992 - A county inspector discovered elevated vapor readings in a monitoring well(s) and a Discharge Notification Form was filed. The site was deemed eligible for reimbursement under FPLRIP on September 17, 1993. On March 27, 1995, the Florida Department of Environmental Protection (FDEP) approved a Contamination Assessment Report (CAR), a CAR Addendum and No Further Action (NFA) proposal and issued an SRCO.
- October 8, 1997 - Vapors were detected during an upgrade. Neither soil nor groundwater samples were collected for confirmatory laboratory analysis. This discharge was denied eligibility on October 20, 1997 because "...there is no indication that the discharge reported on October 8, 1997 is not the same contamination that was discovered on March 12, 1992 and was determined to be eligible...". This discharge was combined with the March 12, 1992 discharge even though that particular discharge was awarded a SRCO in 1995.

4110 Southpoint  
Boulevard  
Jacksonville, FL  
32216

(904)  
296-0544

FAX (904)  
296-2473

- December 29, 1998 – Mr. Greg Self, then of ECT and on behalf of Lil' Champ Food Stores, filed this DRF based on the results of soil and groundwater analytics. ECT developed a report, dated February 1, 1999, documenting the results of field activities performed at the site. The report documented elevated levels of toluene, ethylbenzene and xylenes in the groundwater. On February 18, 1999, ECT submitted the results of tank tightness tests (passed) to Mr. Dave Chronister of Citrus County. The letter also requested that this discharge be retracted because the soil and groundwater contamination was associated with the previous discharge reported in 1992. ECT requested clarification on this matter again from Mr. Chronister in a letter dated July 18, 1999.

A thorough review of the files for the referenced site indicates that the SRCO was never rescinded for the first discharge. Based on the reason for the denial of eligibility for the second discharge, the SRCO should have been rescinded. Additionally, the contaminant concentration distribution in the groundwater analytical reports included in ECT's February 1, 1999 report are indicative of an older spill (elevated ethylbenzene and xylenes concentrations, no benzene or MTBE concentrations).

In December 1999, you submitted a Memorandum to Mr. Cornman indicating that this last discharge should not be retracted because this would allow a contaminated site to go unreported. ECT respectfully disagrees with this assessment since the historical information for this site indicates the SRCO should have been rescinded after the second discharge was reported in October 1997. It is ECT's professional opinion that the December 29, 1999 discharge be retracted and the March 27, 1995 SRCO be rescinded.

ECT greatly appreciates your attention to this matter. I have included copies of documentation referenced in this correspondence to ease the review of this site's file. If I can be of further assistance in your evaluation of this matter, please call me at (904) 296-0544.

Sincerely,

**ENVIRONMENTAL CONSULTING & TECHNOLOGY, INC.**

*Teresa A. Fischer*

Teresa A. Fischer  
Project Manager

Attachments

cc: Mr. Michael Bland, P.G., Florida Department of Environmental Protection  
2600 Blair Stone Road, M.S. 4545, Tallahassee, Florida 32399-2400



**Site No. 33 Hudson Tire (aka Palmer Tire & Automotive)**  
1650 S. Suncoast Boulevard  
Homosassa, Florida  
FDEP I.D. No. 098733058



CITRUS COUNTY

DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway

Lecanto, Florida 32661-8099

(904) 746-4223

33

In reply, refer to:

May 19, 1993

Mr. William Thornhill  
West Coast Tire Inc.  
14725 N. Florida Ave.  
Tampa, Florida 33613

RE: Pollutant Storage Tank Closure Assessment

Dear Mr. Thornhill,

The pollutant storage tank closure assessment for the facility reference below was received on May 17, 1993.

DER Facility #098733058

Thornhill Tire & Auto  
1650 S. Suncoast Blvd.  
Homosassa, Florida 34448

Since no excessive contamination was found at the tank closure, there will be no further assessment required at this time.

If you have any questions, please call Fire Prevention at (904)746-1335.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

cc: Mr. Dave Norris  
Norris Tank & Pump  
9242 W. Melanie Lane  
Crystal River, Florida 34428

RTS/jlb

Norris Tank & Pump Services, Inc.

9242 W. Melanie Lane  
Crystal River, FL 32629

May 11, 1993

Citrus Co. Fire Prevention Bureau  
1300 S. Lecanto Hwy.  
Lecanto, FL 32661

Attention: Dick Sosna

Reference:  
Palmer's Goodyear  
1650 S. Suncoast Blvd.  
Homosassa, FL 34448

Dear Dick:

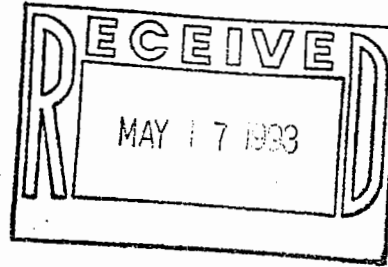
Enclosed you will find certified contractors form, tank disposal manifest, and oil waste manifest.

This letter is to also confirm your report that no visual signs of contamination was found during removal of the underground waste oil tank.

Thank you,



David H. Norris





# Underground Storage Tank Installation and Removal Form For Certified Contractors

Pollutant Storage System Specialty Contractors as defined in Section 489.113, Florida Statutes (Certified contractors as defined in Section 17-761.200, Florida Administrative Code) shall use this form to certify that the installation, replacement or removal of the storage tank system(s) located at the address listed below was performed in accordance with Department Reference Standards.

## General Facility Information

1. DER Facility Identification No.: 09/8733058
2. Facility Name: PALMENS GOODYEAR Telephone: (904) 795-7600
3. Street Address (physical location): 1650 - S. SUNCOAST BLVD.  
HOMOSASSA, FL. 34118
4. Owner Name: THORNHILL TIRE & AUTO Telephone: (813) 961-6469
5. Owner Address: 14725 - N. FL. AVE. TAMPA, FL. 33613
6. Number of Tanks: a. Installed at this time \_\_\_\_\_ b. Removed at this time 1
7. Tank(s) Manufactured by: UNKNOWN
8. Date Work Initiated: 5/3/93 9. Date Work Completed: 5/3/93

## Underground Pollutant Tank Installation Checklist

Please verify the completion of the following installation requirements by placing an (X) in the appropriate box.

1. All tanks and piping are corrosion resistant and approved for use by State and Federal Laws.
2. Excavation, backfill and compaction completed in accordance with NFPA (National Fire Protection Association) 30(87), API (American Petroleum Institute) 1615, PEI (Petroleum Equipment Institute) RP100-87 and the manufacturers' specifications.
3. Tanks and piping pretested and installed in accordance with NFPA 30(87), API 1615, PEI/RP100(87) and the manufacturers' specifications.
4. Steel tanks and piping are cathodically protected in accordance with NFPA 30(87), API 1632, UL (Underwriters Laboratory) 1746, STI (Steel Tank Institute) R892-89 and the manufacturer's specifications.
5. Tanks and piping tested for tightness after installation in accordance with NFPA 30(87) and PEI/RP100-87.
6. Monitoring well(s) or other leak detection devices installed and tested in accordance with Section 17-761.640, Florida Administrative Code (F.A.C.)
7. Spill and overflow protection devices installed in accordance with Section 17-761.500, F.A.C.
8. Secondary containment installed for tanks and piping as applicable in accordance with Section 17-761.500, F.A.C.

Please Note: The numbers following the abbreviations (e.g. API 1615) are publication or specification numbers issued by these institutions.

## Underground Pollutant Tank Removal Checklist

1. Closure assessment performed in accordance with Section 17-761.800, F.A.C.
2. Underground tank removed and disposed of as specified in API 1604 in accordance with Section 17-761.800, F.A.C.

### Certification

I hereby certify and attest that I am familiar with the facility that is registered with the Florida Department of Environmental Regulation; that to the best of my knowledge and belief, the tank installation, replacement or removal at this facility was conducted in accordance with Chapter 489 and Section 376.303, Florida Statutes and Chapter 17-761, Florida Administrative Code (and its adopted reference sources from publications and standards of the National Fire Protection Association (NFPA), the American Petroleum Institute (API), the National Association of Corrosion Engineers (NACE), American Society for Testing and Materials (ASTM); Petroleum Equipment Institute (PEI); Steel Tank Institute (STI), Underwriters Laboratory (UL); and the tank and integral piping manufacturers' specifications; and that the operations on the checklist were performed accordingly.

**NORRIS TANK & PUMP SERVICE, INC.**

9242 W. MELANIE LANE

CRYSTAL RIVER, FL 34428

(Type or Print)

Certified Pollutant Tank Contractor Name

Pollutant Storage System Specialty Contractor License Number (PSSSC)

PCC 050776

PSSSC Number

*David H. Norris*

Certified Tank Contractor Signature

5/6/93

Date

DAVID H. NORRIS

(Type or Print)

Field Supervisor Name

5/6/93

Date

*David H Norris*

Field Supervisor Signature

5/6/93

Date

The owner or operator of the facility must register the tanks with the Department at least 10 days before the installation. The installer must submit this form no more than 30 days after the completion of installation to the Department of Environmental Regulation at the address printed at the top of page one.

NORRIS TANK & PUMP SERVICE, INC

9242 W. MELANIE LANE  
CRYSTAL RIVER, FL 34428  
563-2447 1-800-932-3905  
State Certificate #PCC050776

TANK DISPOSAL MANIFEST

DATE: 5/6/93

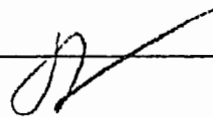
1.) JOB LOCATION: PALMERS Goodyear  
1650 - S. Suncoast Blvd  
HOMOSASSA, FL. 34448

2.) TANK DESCRIPTION (NUMBER & SIZE): \_\_\_\_\_  
1 - 550 gal  
\_\_\_\_\_  
\_\_\_\_\_

3.) DELIVERED BY: NORRIS-TANK & Pump SER.

4.) DISPOSAL SITE: TAMPA SCRAP  
TAMPA, FL.

5.) ACCEPTED BY (PERSON): \_\_\_\_\_  
(COMPANY): \_\_\_\_\_



# CERTIFIED MANIFEST

MANIFEST/INVOICE#

IN \_\_\_\_\_

OUT \_\_\_\_\_

FDL984168609

PCC046053

## GENERATOR INFORMATION

NAME OF GENERATOR <b>PALMERS GOODYEAR</b>	DATE <b>5-6-93</b>
ADDRESS <b>1650 S. Suncoast Blvd.</b>	PHONE <b>1-800-932-3905</b>
CITY <b>HOMOSASSA</b>	STATE/ZIP <b>FL. 34448</b>
CONTACT PERSON <b>Norris Tank &amp; Pump (Dave Norris)</b>	TYPE WASTE <b>WASTE OIL Sludge</b>

## TRANSPORTER/DISPOSER INFORMATION

CERTIFICATION: THIS IS TO CERTIFY THE ABOVE AND BELOW DESCRIBED MATERIALS HAVE BEEN PICKED UP AND WILL BE TRANSPORTED, TREATED AND DISPOSED OF IN A MANNER PURSUANT TO ALL FEDERAL, STATE AND LOCAL LAWS AND GUIDELINES.

*Dave Norris*  
DRIVER SIGNATURE

## INVOICE INFORMATION

TOTAL GALLONS	D.O.T. SHIPPING NAME	PRICE PER GALLON	UN NUMBER	TOTAL PRICE
OIL WASTE	<b>27-GAL.</b>			
WASTE WATER				
DRUMS				
MISC.				
MISC.				
MISC.				

CASH	C.O.D.	CHARGE	ON/ACCT.	RETURNED	PD. OUT	CUSTOMER P.O. NUMBER
------	--------	--------	----------	----------	---------	----------------------

BY MY SIGNATURE BELOW I ACKNOWLEDGE AND AGREE TO THE PROVISIONS ABOVE, AND FURTHER ACKNOWLEDGE THAT I HAVE READ AND AGREE TO THE PROVISIONS AND TERMS SET FORTH ON THE REVERSE SIDE OF THIS MANIFEST.

<u><i>Joe Samon</i></u>	<b>CONST. MANAGER</b>	<b>5-6-93</b>
SIGNATURE	TITLE	DATE

**NORRIS & SAMON PUMP SERVICE, INC.**  
2620 20th Avenue North  
St. Petersburg, FL 33713  
(813) 327-4481

**UNDERGROUND STORAGE TANK  
CLOSURE INSPECTION FORM**

Yes	No	Unk	N/A
-----	----	-----	-----

**REGISTRATION AND NOTIFICATION** 17-761.400 & 450 FAC: Comments: \_\_\_\_\_

- |  |    |                                     |                          |                          |                          |
|--|----|-------------------------------------|--------------------------|--------------------------|--------------------------|
| 1. All of the facility's tanks properly registered; .400                   | 1. | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| 2. Proper notification made 30 days prior to tank(s) closure; .450 (1) (a) | 2. | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| 3. Proper notice given 24 hours prior to storage tank(s) closure; 450 (4)  | 3. | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

**II. CLOSURE PROCEDURES/STATUS:** 17.761.800 Comments: \_\_\_\_\_

- |   |     |                                     |                          |                          |                                     |
|---|-----|-------------------------------------|--------------------------|--------------------------|-------------------------------------|
| 4. Certified contractor performed the tank removal(s); .740 (2)                       | 4.  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |
| 5. Storage tank(s) properly closed and removed from the site; (2) (d)                 | 5.  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |
| 6. Storage tank(s) properly closed and filled in place; (2) (d)                       | 6.  | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 7. Storage tank(s) properly closed within 90 days of discovery; (2) (a)               | 7.  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |
| 8. All liquid & sludge removed from the tank(s); (2) (d)                              | 8.  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |
| 9. Storage tanks properly purged or inerted prior to transport; (2) (d)               | 9.  | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |
| 10. All piping capped and/or removed;   | 10. | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |
| 11. All monitoring wells left in place for contamination assessment purposes; (2) (f) | 11. | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 12. All monitoring wells have been properly abandoned; .800 (2) (f)                   | 12. | <input type="checkbox"/>            | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 13. A closure assessment was properly performed; .800 (3),                            | 13. | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/>            |

**III. DISCHARGE REPORTING** 17-761.460, F.A.C.: Comments: \_\_\_\_\_

- |  |     |                          |                                     |                          |                                     |
|--|-----|--------------------------|-------------------------------------|--------------------------|-------------------------------------|
| 14. Evidence of contamination or a discharge reported (Explain in comments) 460 (1), (2) and (3) | 14. | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 15. Discharge Reporting Form (DRF) submitted; 460 (2)  | 15. | <input type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

**IV. DISCHARGE RESPONSE:** Comments: \_\_\_\_\_

- |   |     |                          |                                     |                          |                                     |
|---|-----|--------------------------|-------------------------------------|--------------------------|-------------------------------------|
| 16. Free product present; (Explain in comments)                     | 16. | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 17. Free product being removed; 17-761.800 (3) (d) & 17-761.820 (2) | 17. | <input type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

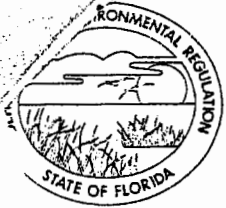
Comments: TANK SLUDGE PUMPED INTO DRUM FOR HANDLING  
NO VISUAL EVIDENCE OF SOIL CONTAMINATION



State of Florida

Department of Environmental Regulation

Pollutant Storage Tank System  
Inspection Report Form



Facility ID #: 098733058 County: CITRUS  
 Facility Name: THORN HILL TIRE & AUTO CARE  
 Facility Location: 1650 S. SUNCOAST BLVD  
 Facility Contact: 4090344 FL 32676 Phone: 715-7600  
 Owner: WEST COAST TIRE INC Phone: \_\_\_\_\_  
 Owner Address: 14725 N. FLORIDA AVE TAMPA FL 33613-1823  
 Owner Contact: WILLIAM THORNHILL Owner Change Date: \_\_\_\_\_  
 Latitude: \_\_\_\_\_ Longitude: \_\_\_\_\_ Fac. Type: C

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
1	550	L	09/84	U	C	B	N/A	B.

Comments: ① TANK EXCAVATED REMOVED & PUMPED DRY BY NORES PUMP & TANK 5/3/93  
 ② TANK TO BE HAULED OFF FOR SCRAP.

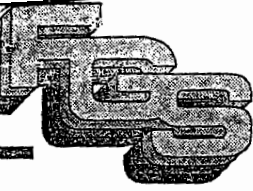
\* COPY OF CLOSURE REPORT TO BE SENT TO CITRUS COUNTY FIRE PREVENTION

Inspection Type: (Choose One) <input type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input checked="" type="checkbox"/> Closure <input type="checkbox"/> Reinspection	Site Information: (All that apply) <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input checked="" type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
--	--

DER District or Local Program CITRUS COUNTY FIRE PREVENTION  
RICHARD T. SOSNA  
 Inspector Name (Print):  
Richard T. Sosna 5/3/93  
 Inspector's Signature & Date

DAVID H. MORRIS  
 Contact Name (Print):  
David H. Morris  
 Contact's Signature & Date

**Site No. 37 Ferman of Citrus County (aka Crystal Chevrolet)**  
1035 S. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098518705  
EPA I.D. No. FLD981866478



**INC.**

111 South Armenia Avenue  
Tampa, Florida 33609  
(813) 874-8204  
FAX (813) 874-7842

600 South Barracks Street  
Suite 210  
Pensacola, Florida 32501  
(904) 438-8133  
FAX (904) 438-8199

RECEIVED  
OCT 24 1994  
Citrus County  
Fire Prevention

October 20, 1994

Mr. Dick Sosna  
Citrus County Fire Prevention Bureau  
1300 South Lecanto Highway  
Lecanto, Florida 32661

**RE: Results of Recent Groundwater Sampling, Crystal Chevrolet, 1101 South Suncoast Boulevard, Crystal River, Florida, FDEP FAC No. 098518705**

Dear Mr. Sosna:

Pursuant to your response letter dated August 4, 1994, FGS Inc. (FGS) resampled permanent monitoring well MW-1 to evaluate current groundwater quality conditions in the immediate vicinity of a former 6,000-gallon gasoline UST. As you know, this UST was removed from the ground in February, 1994. The results of the UST closure were submitted in July 1994.

Sampling was performed on September 16, 1994 by an FGS field technician in accordance with FGS' FDEP-approved Comprehensive Quality Assurance Plan (CompQAP #890395G). Samples were placed on wet ice and transported to PC&B Laboratories of Oviedo, Florida (Florida DHRS Lab #E83239) for analysis by EPA Method 602 (volatile organic aromatics).


The results of analytical testing did not indicate that dissolved petroleum-related compounds were present above corresponding method detection limits. The groundwater sample collected from permanent monitoring well MW-1 on June 7, 1994 also did not detect the presence of petroleum-related compounds above corresponding method detection limits. Analytical results from the September 16, 1994 sampling event are summarized in Table 1. The laboratory data package is also provided.

Mr. Dick Sosna  
Citrus County Fire Prevention Bureau  
October 20, 1994  
Page 2

Based on the results of groundwater testing from MW-1, FGS recommends that a No Further Action Proposal (NFAP) be approved for this site. If you have any questions or require additional information, please do not hesitate to contact me at (813) 874-8204.

Sincerely,

FGS, Inc.



Andrew B. Long, P.G.  
Project Manager

attachment

cc: Steven A. Uiterwyk - Ferman Motor Car Company

**TABLE 1**  
**SUMMARY OF GROUNDWATER ANALYTICAL RESULTS**  
**CRYSTAL CHEVROLET**  
**CRYSTAL RIVER, FLORIDA**

Chemical Compound	Guidance Concentration or State Standard (µg/L)	Method Detection Limit (µg/L)	MM-1 (9/16/94)	EQ-916C (9/16/94)	Trip Blank (9/16/94)
Benzene	1.0 <sup>(a)</sup>	1.0	<1.0	<1.0	<1.0
Ethylbenzene	2.0 <sup>(b)</sup>	1.0	<1.0	<1.0	<1.0
Toluene	24.0 <sup>(b)</sup>	1.0	<1.0	<1.0	<1.0
Total Xylenes	50.0 <sup>(b)</sup>	1.0	<1.0	<1.0	<1.0
Total VOAs	50.0 <sup>(c)</sup>	1.0	<1.0	<1.0	<1.0
MTBE	50.0 <sup>(c)</sup>	5.0	<5.0	<5.0	<5.0

NOTES: All concentrations reported in micrograms per liter (µg/L)

EQ-916C is an equipment blank

Total Xylenes = Sum of concentrations of m-, o-, and p-xylenes  
 Total VOAs = Sum of concentrations of benzene, ethylbenzene, toluene, and total xylenes  
 MTBE = Methyl Tert Butyl Ether

Footnotes defining 1989 Florida Groundwater Guidance Concentrations

- (a) Florida Primary Drinking Water Standard (Florida Administrative Code 17-550.310-320)
- (b) Recommended Protective Concentration: Toxicant Profiles, Center for Biomedical and Toxicological Research, Florida State University, 1985-1988
- (c) Florida Administrative Code 17-770.730 target levels for groundwater remediation.



**PC&B Environmental Laboratories, Inc.**

210 Park Road, Oviedo, Florida 32765  
Phone: 407-359-7194 Fax: 407-359-7197

September 20, 1994

Andrew Long  
FGS, INC.  
111 South Armenia Avenue  
Tampa, FL 33609

Dear Mr. Long:

Enclosed are the results of the analysis of your samples received September 17, 1994.

Our laboratory is certified by the Florida DHRS (Lab #E83239) and operates under an FDER approved Comprehensive Quality Assurance Plan (#900134G). All data were determined in accordance with published procedures (EPA-600/4-79-020), Methods for Chemical Analysis of Water and Wastes, Revised March 1983 and/or Standard Methods for the Examination of Water and Wastewater 17th Edition 1989 and/or Test Methods for Evaluating Solid Waste (EPA-SW-846, Revised November 1989), unless stated otherwise in our CompQAPP under method modifications.

If you have any questions, please do not hesitate to give me a call.

Sincerely,

Declan Cowley  
Laboratory Director



# PC&B Environmental Laboratories, Inc.

210 Park Road, Oviedo, Florida 32765  
Phone: 407-359-7194 Fax: 407-359-7197

September 20, 1994

CLIENT: FGS, INC.  
111 South Armenia Avenue  
Tampa, Fl 33609

CONTACT: Andrew Long  
813-874-8204

PROJECT NAME: Crystal Chevy  
PROJECT NUMBER: G94-480.15

REFERENCE: Work Order Number 9409166

Lab Sample Number	Matrix	Client ID	Date/Time Sampled	
9409166-01	Water	MW-1	09-16-94	1511
9409166-02	Water	RB-916C	09-16-94	1457
9409166-03	Water	EQ-916C	09-16-94	1501
9409166-04	Water	Trip	NA	NA

## Parameters

2 EPA 602 Volatile Organics

Declan Cowley  
Laboratory Director

Environmental Laboratories, Inc.  
Park Road  
Oviedo FL 32765  
PHONE : 407-359-7194

VOLATILE AROMATICS

CLIENT NAME : FGS, INC.  
PROJECT NAME : CRYSTAL CHEVY  
PROJECT NUMBER : G94-480.15  
DATE RECEIVED : 09-17-94  
PROTOCOL : EPA 624 MODIFIED

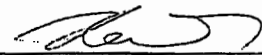
Job Reference Number	9409166-1	9409166-3	9409166-4
Sample ID	MW-1	EQ-916C	TRIP BLANK
Sampled	09-16-94	09-16-94	09-16-94
Date Extracted	N/A	N/A	N/A
Date Analyzed	09-19-94	09-19-94	09-19-94
Confirmed	GCMS	GCMS	GCMS
Matrix	WATER	WATER	WATER
Benzene	1.0 U	1.0 U	1.0 U
Toluene	1.0 U	1.0 U	1.0 U
Ethylbenzene	1.0 U	1.0 U	1.0 U
Chlorobenzene	1.0 U	1.0 U	1.0 U
m + p-Xylenes	1.0 U	1.0 U	1.0 U
o-Xylene	1.0 U	1.0 U	1.0 U
1,3-Dichlorobenzene	1.0 U	1.0 U	1.0 U
1,2-Dichlorobenzene	1.0 U	1.0 U	1.0 U
1,4-Dichlorobenzene	1.0 U	1.0 U	1.0 U
MTBE	5.0 U	5.0 U	5.0 U

Result Units	ug/l	ug/l	ug/l
% Moisture	NA	NA	NA
Dilution Factor	1	1	1

U = indicates the compound was analysed for, but not detected at the specified value.

CompQAP #900134G/E83239/83353

REVIEWED BY :





VOLATILE ORGANICS

MATRIX SPIKE RESULTS

MATRIX : WATER  
 ANALYSIS DATE : 09-19-94

LAB SAMPLE # : 9409165-3

COMPOUND	AMOUNT SPIKED	SAMPLE RESULT	MS RESULT	MS % RECOVERY
1,1-Dichloroethene	50.0	0.0	50.0	100
Trichloroethene	50.0	0.0	39.0	78
Benzene	50.0	0.0	56.0	112
Toluene	50.0	0.0	39.0	78
Chlorobenzene	50.0	0.0	48.0	96

COMMENTS :

MATRIX SPIKE QUALITY CONTROL LIMITS

	WATER			SOIL		
	LOWER	UPPER	RPD	LOWER	UPPER	RPD
1,1-Dichloroethene	61	145	14	59	172	22
Trichloroethene	71	120	14	62	137	24
Benzene	76	127	11	66	142	21
Toluene	76	125	13	59	139	21
Chlorobenzene	75	130	13	60	133	21

# PC&B Laboratories, Inc.

210 Park Road, Oviedo, FL 32765  
 407-359-7194 (FAX) 407-359-7197

## Chain of Custody

Work Order: No. 05830

Date: 9-16-94 Page 1 of 1

9409164

COMPANY			ADDRESS			ANALYSIS REQUEST															
F65																					
SAMPLED BY: Andy Thomas			SIGN: Andy Thomas			PHONE NO: 874-8204															
#	SAMPLE ID.	DATE/TIME	MATRIX	NUMBER OF CONTAINERS																	
1	MW-P	9-16-94 1511	W	600																	
2	RB-916C	1457	W																		
3	EQ-916C	1501	W																		
4	Trap		W																		
5																					
6																					
7																					
8																					
9																					
10																					
11																					
12																					
13																					
RELINQUISHED BY		DATE/TIME	RECEIVED BY		DATE/TIME	PROJECT INFORMATION															
1: Andy Thomas			1: Paula Pagan		9-17-94	PROJECT NAME: Crystal Chevy															
2: [Signature]			2: [Signature]			PROJECT #: 94-980.15															
3: [Signature]			3: [Signature]			SITE ADDRESS:															
PROJECT-MANAGER:						SHIPPED:						SAMPLE RECEIPT									
INVOICE TO: Andy Long						VIA						Total No. of Containers									
PROJECT-MANAGER:						Chain of Custody Seals						Rec'd Good Condition/Cold									
INVOICE TO: Andy Long						PO#:						SHIPPED:									
SPECIAL INSTRUCTIONS/COMMENTS:						3 Day T.A.T.						HO110 RB-916C									

**Site No. 39 Circle K #7489**  
400 S. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503167  
EPA I.D. No. FLD984254144

39

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query

**Facility ID#:** 8503167**Name:** Circle K #7489

400 S Suncoast Blvd

Crystal River, FL 32629- 5499

**Contact:** Steve Belin**Phone:** 813-689-8161**District:** SWD**County:** Citrus**Type:** A-Retail Station**Status:** Open**Latitude:** 28:51:22.0000**Longitude:** 82:34:49.0000**LL Method:** AGPS-Autonomous GPS**Account Owner:** Circle K Stores Inc

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1R1	9684	Unleaded Gas	09/01/1997	UNDER	In Service	E A N O M I	C F J K	H K F L 2 3 4
2R1	9684	Unleaded Gas	09/01/1997	UNDER	In Service	E A N O M I	C F J K	H K F L 2 3 4
1	10000	Unleaded Gas	09/01/1984	UNDER	Removed			
2	10000	Unleaded Gas	09/01/1984	UNDER	Removed			
3	10000	Unleaded Gas	09/01/1984	UNDER	Removed			
4	10000	Vehicular Diesel	09/01/1984	UNDER	Removed			

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**



Storage Tank Facility Compliance Inspection Report

Facility ID 8503167 County 09 CITRUS Inspection Date 9/19/00

Facility Name CIRCLE K 7489 Facility Type A-RETAIL

Latitude 28°51'22" Longitude 82°34'49" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>2</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
Comments	Release detection is continuous monitoring of the double walled tank and pipe interstitial spaces and the pipe sump and dispersal liners by an encompass ATG system. The sumps and liners are also checked monthly by ATC Associates, and conditions are noted in their reports.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: Self

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS CNTY ENV. HEALTH</u> Storage Tank Program Office	<u>352-527-5255</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Francis Francis</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>9/19/00</u> Inspector Signature & Date	<u>Francis Francis</u> Facility Representative Signature & Date

#	Description / Inspector's Comments
Comments:	2000-2001 placard <del>ms</del> and RDRCL are on display in facility.
	The Sensors in tank interstice and STR Sumps were checked 12/12/99 by AAA Tank Testers. Due for retest 12/12/00
	Regular UL tank was Tightness Tested 10-1-99 by AAA tank testers. Lines and leak detectors were all tested 10-1-99 by AAA Tank Testers. LLD are due for retest 10/1/2000
	Conditions noted All dispenser lines were dry. Premium Sump IS dry Reg UL Sump has ~ 5-6 inches of liquid have Sump pumped out and provide records of its proper disposal.

**Site No. 40 H & H Motors (NationsBank)**  
400 US Highway 19 S.  
Crystal River, Florida  
FDEP I.D. No. 098732090

#40

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query

---

**Facility ID#:** 8732090

**Name:** H&H Motors Inc

400 Hwy 19 S

Crystal River, FL 32629- 4825

**Contact:** Head, James H

**Phone:** 904-795-3174

**District:** SWD

**County:** Citrus

**Type:** C-Fuel User/Non-Retail

**Status:** Closed

**Latitude:** 28:52:44.0000

**Longitude:** 82:34:50.0000

**LL Method:** UNVR-Unverified

**Account Owner:** Dunbar, Barbara

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1	1000	Unleaded Gas	09/01/1980	UNDER	Removed			

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**



Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query**Facility ID#:** 8732090**Name:** H&H Motors Inc

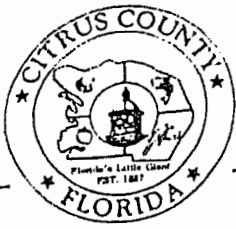
400 Hwy 19 S

Crystal River, FL 32629- 4825

**Contact:** Head, James H**Phone:** 904-795-3174**District:** SWD**County:** Citrus**Type:** C-Fuel User/Non-Retail**Status:** Closed**Latitude:** 28:52:44.0000**Longitude:** 82:34:50.0000**LL Method:** UNVR-Unverified**Account Owner:** Dunbar, Barbara

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1	1000	Unleaded Gas	09/01/1980	UNDER	Removed			

**\*\*\*Note:****Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**



CITRUS COUNTY

# DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway  
Lecanto, Florida 32661-8099  
(904) 746-4223

In reply, refer to:

June 22, 1992

Mr. James H. Head  
H & H Motors, Inc.  
400 Hwy. 19 South  
Crystal River, Florida 32625-4825

Ref. Fac. # 09873209  
H & H Motors, Inc.

Dear Mr. Head,

Attached are the 17-761 Florida Administrative Code Compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-761, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank system. Also please see comments on front page of inspection report.

If you have any questions concerning this matter, feel free to call upon me.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

RTS/jf

cc: Mr. Ken Smith  
Remdial Contractors Group  
P.O. Box 255  
Homosassa, Florida 32687



State of Florida  
 Department of Environmental Regulation  
**Pollutant Storage Tank System  
 Inspection Report Form**

Facility ID #: 098732090 County: CITRUS  
 Facility Name: H & H Motors, Inc  
 Facility Location: 400 Hwy 19 So CRYSTAL RIVER, FL 32629-4825  
 Facility Contact: HARVEY HEAD Phone: (904) 795 3174  
 Owner: H & H Motors, Inc Phone: \_\_\_\_\_  
 Owner Address: 400 Hwy 19 So CRYSTAL RIVER, FL 32629-4825  
 Owner Contact: HARVEY HEAD Owner Change Date: \_\_\_\_\_  
 Latitude: 28: 52: 44" N Longitude: 82: 34: 50" W Fac. Type: C

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
1	2000	B	6/80	U	C	B	NONE	TS

Comments: <sup>CITRUS ENVIRONMENTAL 549 S Hwy 31 441 32174</sup>  
 (1) TANK PUMPS OUT 6/4/92 (SEABOARD/MARION OIL REFINERY)  
 (2) TANK EXCAVATED & REMOVED 6/18/92 BY REMEDIAL CONTRACTORS GROUP  
 (904) 621-1663 P.O. Box 255 HOMOESTEAD, FL 32687  
 (3) TANK ~~REMOVED~~ INERTED BY DRY ICE & TRANSPORTED TO TAMPA SCRAP  
 BY HARPER & SPINNEY 6/19/92

\* COPY OF CLOSURE REPORT TO BE SENT TO CITRUS COUNTY FIRE PREVENTION

Inspection Type: (Choose One) <input type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input checked="" type="checkbox"/> Closure <input type="checkbox"/> Reinspection	Site Information: (All that apply) <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input checked="" type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
--	--

DER District or Local Program CITRUS COUNTY FIRE PREVENTION  
 Inspector Name (Print): RICHARD T. SOSNA Contact Name (Print): JAMES H HEAD  
 Inspector's Signature & Date: [Signature] 6/18/92 Contact's Signature & Date: [Signature]



Date: 2/1/85

### UNDERGROUND STORAGE TANK CLOSURE INSPECTION FORM

Yes	No	Unk	N/A
-----	----	-----	-----

**I. REGISTRATION AND NOTIFICATION** 17-761.400 & 450 FAC: Comments: \_\_\_\_\_

1. All of the facility's tanks properly registered; .400	1.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Proper notification made 30 days prior to tank(s) closure; .450 (1) (a)	2.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Proper notice given 24 hours prior to storage tank(s) closure; 450 (4)	3.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

**II. CLOSURE PROCEDURES/STATUS:** 17.761.800 Comments: \_\_\_\_\_

4. Certified contractor performed the tank removal(s); .740 (2)	4.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Storage tank(s) properly closed and removed from the site; (2) (d)	5.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Storage tank(s) properly closed and filled in place; (2) (d)	6.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
7. Storage tank(s) properly closed within 90 days of discovery; (2) (a)	7.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8. All liquid & sludge removed from the tank(s); (2) (d)	8.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9. Storage tanks properly purged or inerted prior to transport; (2) (d)	9.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10. All piping capped and/or removed;	10.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11. All monitoring wells left in place for contamination assessment purposes; (2) (f)	11.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
12. All monitoring wells have been properly abandoned; .800 (2) (f)	12.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
13. A closure assessment was properly performed; .800 (3),	13.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

**III. DISCHARGE REPORTING** 17-761.460, F.A.C.: Comments: \_\_\_\_\_

14. Evidence of contamination or a discharge reported (Explain in comments) 460 (1), (2) and (3)	14.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
15. Discharge Reporting Form (DRF) submitted; 460 (2)	15.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

**IV. DISCHARGE RESPONSE:** Comments: \_\_\_\_\_

16. Free product present; (Explain in comments)	16.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
17. Free product being removed; 17-761.800 (3) (d) & 17-761.820 (2)	17.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Comments: NO SOIL CONTAMINATION  
WATER SAMPLE TAKEN FOR LAB ANALYSIS



STATE OF FLORIDA  
DEPARTMENT OF HEALTH AND REHABILITATIVE SERVICES

5-1

STATE UNDERGROUND PETROLEUM ENVIRONMENTAL RESPONSE  
S.U.P.E.R. ACT SITE INVESTIGATION

I. Site Identification

Track Number (6-digits, first 2 digits are county #) \_\_\_\_\_ or

Facility Number (9-digits) 09-8732090

PLIRP Site  ATRP Site \_\_\_\_\_ HRS CPHU Initiated \_\_\_\_\_

(If the site has no DER Early Detection Incentive track number, record the DER Storage Tank Inventory facility number and check appropriate type of investigation- Petroleum Liability and Insurance Restoration Program, Abandoned Tank Restoration Program, or HRS County Public Health Unit)

Business/Site Name H + H Motors

Business/Site Address 400 Hwy 19-S

Business/Site city & County Crystal River - Citrus

II. Site vicinity

Number of large public wells within 1/2 mile \_\_\_\_\_   
(Potable wells producing >100,000 Gallons Per Day)

Number of private or small public wells w/in 1/4 mile \_\_\_\_\_   
(Any potable well producing <100,000 GPD)

Usage of small public well(s) \_\_\_\_\_

(Choices- NA, Food Outlet/Service/Processor, Trailer Park, Apartments, School, Other.)

Number of irrigation water wells w/in 1/2 mile \_\_\_\_\_

Surface water used for potable purposes w/in 1/2 mile \_\_\_\_\_   
(Answer Yes or No, include compass direction (eg. NW, SSE) if Yes)

III. Mapping

Initial investigation site map attached \_\_\_\_\_ Yes  or  
(Locates site and all wells sampled with a legend of wells)

Follow-up investigation site map attached \_\_\_\_\_ Yes \_\_\_\_\_ No \_\_\_\_\_  
(Locates all wells sampled that have not been previously mapped)

MAPPING MUST BE DONE ON 7.5 MINUTE TOPOGRAPHIC QUADRANGLE MAPS SO THAT COMPUTER MAPPING CAN BE COMPLETED BY HRS ENVIRONMENTAL EPIDEMIOLOGY (HSEE)! IF QUAD POINT RESOLUTION IS POOR, ALSO INCLUDE A CITY STREET MAP.

IV. Water Sampling

Number of potable water wells sampled this series 1  
(A series is an initial sampling or quarterly/annual re-sampling of wells surrounding a site)

Date(s) of this sampling series 6/12/96 Series # 1

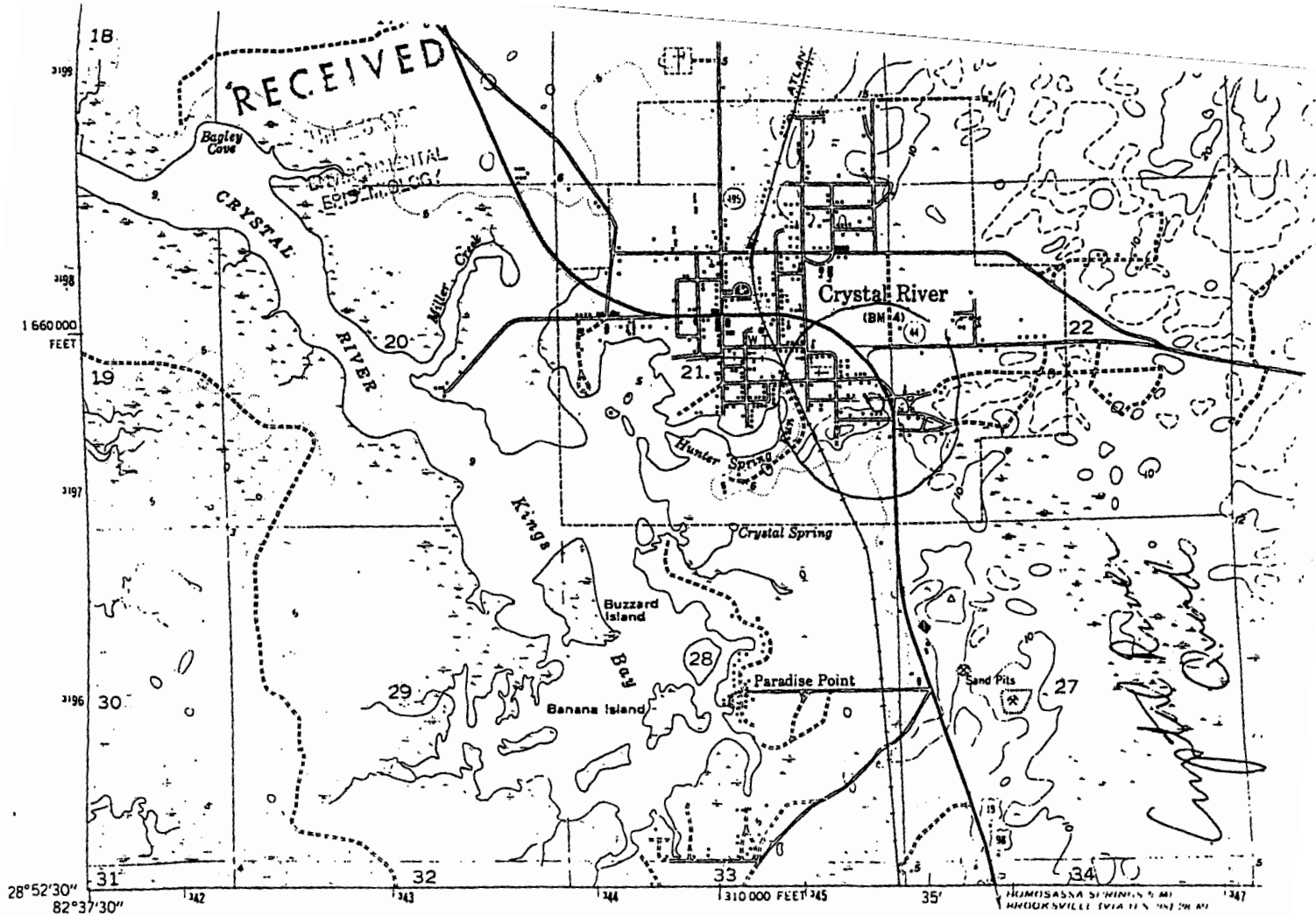
Pipe permeation sample collection this visit Yes \_\_\_\_\_ No \_\_\_\_\_

Julie Peterson  
Signature of Investigator

Gail Peterson  
Printed/Typed Name

6/12/96  
Date(s) of Investigation

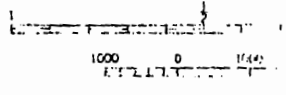
RECEIVED  
ENVIRONMENTAL EPIDEMIOLOGY  
HRS



1076101  
444115W

Mapped, edited, and published by the Geological Survey  
Control by USGS and USC&GS  
Topography from aerial photographs by Kelsch plotter  
Aerial photographs taken 1951. Field check 1953-1954  
Topography from USC&GS Chart 1258 (1:80 000)

098732890



DOTTED LINE

## **IMAGE QUALITY**

**AS YOU REVIEW THE NEXT GROUP OF IMAGES, PLEASE NOTE THAT THE ORIGINAL DOCUMENTS WERE OF POOR QUALITY.**

**Site No. 41 Edward Jones Investments (aka Chevron - Raddie Jones)**  
216 S. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098518721





CITRUS COUNTY

DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway  
Lecanto, Florida 32661-8099  
(904) 746-4223

In reply, refer to:

March 24, 1992

Mr. Raddie Jones  
Jones Resturant  
216 S. Suncoast Blvd.  
Crystal River, Florida 32629

Ref. Fac. # 098518721  
Chevron - Raddie Jones

Dear Mr. Jone,

Attached are the 17-761 Florida Administrative Code Compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-761, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank system. Also please see comments on front page of inspection report.

If you have any questions concerning this matter, feel free to call upon me.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

RTS/jf

Attachments: Storage Tank Registration Form

FACILITY ID #: 078518721  
 FACILITY NAME: CHEVRON-RADDIE JONES  
 FACILITY LOCATION: US 19 S, CRYSTAL RIVER  
 FACILITY CONTACT: RADDIE JONES  
 OWNER ADDRESS: PO BOX 1256, OCALA, FL, 32678-1256  
 OWNER CONTACT: TOM VAWI

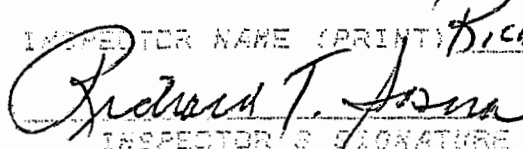
COUNTY: CITRUS  
 PHONE: (904) 629-0361  
 PHONE: (904) 629-0361  
 OWNER CHANGE DATE 00/00/00

LATITUDE: 28-53-50 LONGITUDE: 82-35-05 FAC TYPE: RETAIL STATION

TANK #	SIZE	CONTENT	INSTALL DATE	UNDER OR ABOVE	TANK TYPE	INTEGRAL PIPING	MONITORING SYSTEM	TA BT
1	2000	A	XX/64	U	C	C	Y	B
2	2000	B	XX/64	U	C	C	Y	B
3	1000	B	XX/64	U	C	C	Y	B
4	1000	B	XX/64	U	C	C	Y	B

COMMENTS: TANKS REMOVED FROM GROUND IN 1988 PRIOR  
 TO WITNESSED CLOSURE REPORTS WERE REQUIRED  
 CONTAMINATED SOIL REMOVED J & J EQUIPMENT - CONTRACTOR  
 REIMBURSEMENT UNDER EOI - DELTA ENVIRONMENTAL

INSPECTION TYPE (CHOOSE ONE):  
 ROUTINE  
 INSTALL  
 ABANDONED  
 DISCHARGE  
 CLOSURE  
 REINSPECT  
 SITE INFORMATION (ALL THAT APPLY):  
 NEAR PUB WELL  
 CONTAMINATED  
 COMPLAINT  
 ACID TANKS  
 REPAIRED  
 UPGRADED  
 TEST & ~~REP~~  
 HAZARD NAT

UNDER DISTRICT OR LOCAL PROGRAM: CITRUS COUNTY FIRE PREVENTION  
 INSPECTOR NAME (PRINT): RICHARD T. SOSNA CONTACT NAME (PRINT):  
  
 INSPECTOR'S SIGNATURE & DATE CONTACT'S SIGNATURE & DATE

Next inspection - NOT REQUIRED  
 TANKS REMOVED

TECHNICAL SUPPORT AND ENFORCEMENT CASES  
TECHNICAL REVIEW ROUTING SLIP (attach to report)

Site Name: Charrison (Rddie Jones) Crystal River  
Reimbursement Project Manager: Mac (Graw) → [Signature]  
File #: 09-0711 DER Fac ID #: 098518221 Send to Tod Allend

- Report (Check applicable report name)
- CAR Addendum  RAP  CAR/RAP  IRA Proposal
  - Quarterly Status Letter  Completion Report
  - Monitoring Only  Annual Report  No Further Action
  - IRA Written Notification  Risk Assessment
  - Other \_\_\_\_\_
- District Enforcement Case - 1 copy to District, 1 copy to technical support
- Technical Support (RAP, Completion Report, IRA Proposals, Annual Report-if unusual) - copy to Don Ehlenbeck
- Assessment Section (No Further Action, Risk Assessment, Monitoring Only)-copy to Jim Crane

Person Responsible for Review: \_\_\_\_\_

I. Comments

INITIALS DATE

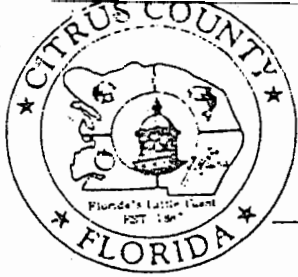
- [Signature] 7/25/89 Person Responsible for review prepares comments memo and sends to reimbursement project manager
- \_\_\_\_\_ Reimbursement Project Manager prepares draft comments
  - \_\_\_\_\_ Generic 21 (Technical Comments)
  - \_\_\_\_\_ Generic 22 (Quarterly Status/Annual Reports)
- \_\_\_\_\_ Supervisor Review
- \_\_\_\_\_ Send Comments (cc: district office, local program)
- \_\_\_\_\_ Prepare all appropriate Data Entry Sheets
- \_\_\_\_\_ Data Entry
- \_\_\_\_\_ File copy of Comments to Technical Log Keeper to log out
- \_\_\_\_\_ File Comments (Stapled to Front of Report)

II. Approvals

- TB 7/25/89 Person Responsible for Review Sends Approval Recommendation to Reimbursement Project Manager
- DD 8/11 Reimbursement Project Manager Drafts Approval Order
  - Generic 26 - RAP Approval Order plus cost estimate cover sheet & form
  - Generic 27, 28 - Site Completion Order
  - Generic 27 - No Further Action Order
  - Generic 25 - Monitoring Only Approval Order
  - Generic 24 - CAR/RAP Option Approval for Sites Switching to State Cleanup
- IRA 8/10 Supervisor Review
- CAF 8/10 Administrator Review
- Row 8/21/89 Division Director Signature
- DD 8/22 Send Approval Order (cc: district office, local program)
- 8/22 Prepare Data Entry Sheet
- \_\_\_\_\_ Data Entry
- DD 8/22 Copy of Approval to Technical Log Keeper to log out
- 8/22 File Approval Order (Stapled to Front of Report)



**Site No. 43 National Guard Armory**  
8551 W. Seven Rivers Drive  
Crystal River, Florida  
FDEP I.D. No. 098943703  
EPA I.D. No. FLD982132193



Board of County Commissioners  
Department of Public Safety

(43)

285 South Kensington Avenue, Lecanto, Florida 34461

(352) 726-1606 Fax (352) 726-1001

April 1, 1998

National Guard Armory  
P.O. Box 1003  
St. Augustine, Fl. 32085-100

Ref. Fac. 098943703  
National Guard Armory  
8551 W. Seven Rivers Drive  
Crystal River, Fl. 34429

Dear Mr. Grimes:

On 3/27/98 a representative of the Department of Public Safety conducted a compliance inspection at the above referenced facility. This inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to Chapter 62-761 Florida Administrative Code (F.A.C), which regulate underground stationary storage tank systems. A copy of the completed inspection form is attached.

Should you have any questions, please contact me at (352) 726-1400.

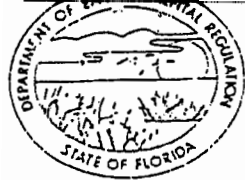
Sincerely,

David E. Chronister  
Environmental Specialist III  
Department of Public Safety

DEC/bf

---

STORAGE TANKS PROGRAM  
285 S. Kensington Avenue  
Lecanto, Florida 34461  
(352) 726-1400



Department of Environmental Regulation  
 Pollutant Storage Tank System  
 Inspection Report Form

Facility ID #: 098943703 County: CITRUS  
 Facility Name: NATIONAL GUARD ARMORY  
 Facility Location: 8551 W. SEVEN RIVERS DR. CAUSEWAY BLVD, FL. 34429  
 Facility Contact: STEVEN BAMBER Phone: (352) 995-0362  
 Owner: FLORIDA DEPT. OF MILITARY AFFAIRS Phone: \_\_\_\_\_  
 Owner Address: P.O. BOX 1008 9/6 DAVID B. GRIMES ST. AUGUSTINE FL. 32085-100  
 Owner Contact: DAVID B. GRIMES Owner Change Date: \_\_\_\_\_  
 Latitude: 28° 48' 19" Longitude: 82° 34' 33" Fac. Type: F

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
<u>1</u>	<u>4000</u>	<u>D</u>	<u>3/88</u>	<u>U</u>	<u>AEM</u>	<u>C</u>	<u>B</u>	

Comments: (1) PROVIDE COPIES TO CITRUS CO. OF THE FOLLOWING: STORAGE TANK REG. FORM, TRAILER FORM, CLOSURE ASSESSMENT FORM, CLOSURE REPORT

Inspection Type: (Choose One) <input type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input checked="" type="checkbox"/> Closure <input type="checkbox"/> Reinspection	Site Information: (All that apply) <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
--	---

DER District or Local Program CITRUS COUNTY PUBLIC SAFETY - STORAGE TANKS PROGRAM  
DAVID E. CHRONISTER Inspector Name (Print):  
[Signature] 3/27/98 Inspector's Signature & Date  
DAVID GRIMES Contact Name (Print):  
[Signature] 3/27/98 Contact's Signature & Date



### UNDERGROUND STORAGE TANK CLOSURE INSPECTION FORM

Yes	No	Unk	N/A
-----	----	-----	-----

**REGISTRATION AND NOTIFICATION** 17-761.400 & 450 FAC: Comments: \_\_\_\_\_

1. All of the facility's tanks properly registered; .400	1.	/			
2. Proper notification made 30 days prior to tank(s) closure; .450 (1) (a)	2.	/			
3. Proper notice given 24 hours prior to storage tank(s) closure; .450 (4)	3.	/			

**II. CLOSURE PROCEDURES/STATUS:** 17.761.800 Comments: \_\_\_\_\_

4. Certified contractor performed the tank removal(s); .740 (2) <i>F.E.S.</i>	4.	/			
5. Storage tank(s) properly closed and removed from the site; (2) (d)	5.	/			
6. Storage tank(s) properly closed and filled in place; (2) (d)	6.				/
7. Storage tank(s) properly closed within 90 days of discovery; (2) (a)	7.				/
8. All liquid & sludge removed from the tank(s); (2) (d)	8.	/			
9. Storage tanks properly purged or inerted prior to transport; (2) (d)	9.	/			
10. All piping capped and/or removed.	10.	/			
11. All monitoring wells left in place for contamination assessment purposes; (2) (f) <i>DESTROYED</i>	11.				/
12. All monitoring wells have been properly abandoned; .800 (2) (f)	12.				/
13. A closure assessment was properly performed; .800 (3), <i>AEROSOL</i>	13.	/			

**III. DISCHARGE REPORTING** 17-761.460, F.A.C.: Comments: *n/a*

14. Evidence of contamination or a discharge reported (Explain in comments) 460 (1), (2) and (3)	14.		/		/
15. Discharge Reporting Form (DRF) submitted; 460 (2)	15.				/

**IV. DISCHARGE RESPONSE:** Comments: *n/a*

16. Free product present; (Explain in comments)	16.		/		/
17. Free product being removed; 17-761.800 (3) (d) & 17-761.820 (2)	17.				/

Comments: *F.E.S. PERFORMED REMOVAL OF UST. TANK APPEARED IN GOOD COND. - NO*

*VISIBLE HOLES etc... NO SOIL CONTAM. DISCOVERED w/ OVA OR VISUAL. WATER SAMPLE RESULTS*

*PENDING TANK CLEANED/CRUSHED AND PUT IN A ROLL OFF*

**Site No. 46 Citrus County – Crystal Aero Group**  
882 Linburgh Drive  
Crystal River, Florida  
FDEP I.D. No. 098503043





# Department of Environmental Protection

Lawton Chiles  
Governor

Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

Virginia B. Wetherell  
Secretary

JUN 07 1995

Mr. Gary W. Kuhl, P.E., Director  
Citrus County Public Works  
1300 South Lecanto Highway  
Post Office Box 167  
Lecanto, FL 32661

BUREAU OF WASTE CLEANUP

JUN 12 1995

RE: Citrus County-Crystal Aero Group  
Crystal River Airport  
882 North Lindbergh Drive  
Crystal River, Citrus County, Florida  
DEP Facility ID #098503043  
OGC Case #93-4646

TECHNICAL REVIEW SECTION

Dear Mr. Kuhl:

Michael Bland of the Bureau of Waste Cleanup has reviewed the Contamination Assessment Report (CAR) Addendum and No Further Action Proposal (NFAP) dated April 19, 1995 (received April 21, 1995) submitted by EnviroAssessments, Inc. for this site. Documentation submitted with the NFAP confirms that criteria set forth in Section 62-770.630(3), Florida Administrative Code (F.A.C.), have been met. The NFAP is hereby incorporated by reference in this Order. Therefore, you are released from any further obligation to conduct site rehabilitation at the site, except as set forth below.

If a subsequent discharge of petroleum or petroleum product occurs at the site, the Department may require site rehabilitation in order to reduce contaminant concentrations to the levels approved through review of the NFAP or otherwise allowed by Chapter 62-770, F.A.C.

Additionally, you are required to properly abandon all monitoring wells except compliance wells required by Chapter 62-761, F.A.C., for release detection. The wells must be abandoned in accordance with the requirements of Rule 62-532.500(4), F.A.C.

Persons whose substantial interests are affected by this Site Rehabilitation Completion Order have a right to challenge the Department's decision. Such a challenge may include filing a petition for an administrative determination (hearing) as described in the following paragraphs. However, pursuant to Chapter 62-103, F.A.C., you may request an extension of time to file the Petition. All requests for extensions of time or petitions for administrative determinations must be filed

"... to Conserve and Manage Florida's Environment and Natural Resources"

Printed on recycled paper.

D0062923

directly with the Department's Office of General Counsel at the address given below within twenty-one (21) days of receipt of this notice (do not send them to the Bureau of Waste Cleanup).

Notwithstanding the above, a person whose substantial interests are affected by this Site Rehabilitation Completion Order may petition for an administrative proceeding (hearing) in accordance with Section 120.57, Florida Statutes (F.S.). The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, within twenty-one (21) days of receipt of this notice. Failure to file a petition within this time period shall constitute a waiver of any right such persons have to request an administrative determination (hearing) pursuant to Section 120.57, F.S.

The Petition shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the Department file number (DEP facility number), and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by each petitioner, if any;
- (e) A statement of facts which each petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of which rules or statutes each petitioner contends required reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by each petitioner, stating precisely the action each petitioner wants the Department to take with respect to the Department's action or proposed action.

This Site Rehabilitation Completion Order is final and effective on the date of receipt of this Order unless a petition (or time extension) is filed in accordance with the preceding paragraph. Upon the timely filing of the petition, this Order will not be effective until further order of the Department.

When the Order is final, any party to the Order has the right to seek judicial review of the Order pursuant to Section 120.68, F.S., by filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules of Appellate Procedure, with the clerk of the Department in the Office of General Counsel, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400; and by filing a copy of the Notice of Appeal, accompanied by the applicable filing fees, with the appropriate District Court of Appeal. The Notice of

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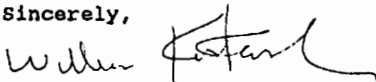
Appeal must be filed within thirty (30) days from the date the Final Order is filed with the clerk of the Department.

Please send a copy of the approved CAR document(s) to Mr. Ken Weber of the Southwest Florida Water Management District within thirty (30) days of receiving this Site Rehabilitation Completion Order.

The DEP Facility Number for this site is 098503043. Please use this identification on all future correspondence with the Department.

Any questions you may have on the technical aspects of this Site Rehabilitation Completion Order should be directed to Laurel Culbreth at (813) 744-6100, ext. 427 or Michael Bland at (904) 921-9986. Contact with the above named person does not constitute a petition for administrative determination.

Sincerely,

  
for Richard D. Garrity, Ph.D.

Director of District Management

RDG/lcp

cc: Anna M. Miller, EnviroAssessments, Inc.  
Citrus County Fire Prevention Bureau  
Michael Bland, FDEP-BWC  
Laurel Culbreth, FDEP-SWD  
Maura Sweeney, FDEP-SWD

---

Memorandum

Environmental Protection

TO: Laurel Culbreth, Southwest District Office

FROM: Michael J. Bland, Technical Review Section  
Bureau of Waste Cleanup *MJB*

DATE: May 30, 1995

SUBJECT: Citrus County - Crystal Aero Group  
Crystal River Airport  
882 North Lindbergh Drive  
Crystal River, Citrus County  
DEP Facility #098503043

---

I have completed the review of the Contamination Assessment Report (CAR) Addendum and No Further Action Proposal (NFAP), dated April 19, 1995 (received April 24, 1995 [received April 21, 1995 at the Southwest District]), prepared and submitted by EnviroAssessments, for this site and recommend that the CAR be approved and a No Further Action Order issued to the responsible party.

If you should have any questions concerning this review, please contact me at 291-9986.

---

**Site No. 47 Citrus County Public Works - Airport**  
882 Lindbergh Drive  
Crystal River, Florida  
FDEP I.D. No. 098945469



### Storage Tank Facility Compliance Inspection Report

Facility ID 8945469 County 09 CITRUS Inspection Date 7/6/01  
 Facility Name CITRUS CNTY PUBLIC WORKS APT. Facility Type I County  
 Latitude 28°52'17" Longitude 82°34'35" # USTs 2 # ASTs     

Check box for type of inspection performed and attach appropriate form(s). Provide or correct latitude/longitude when appropriate.

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Discharge Inspection/Evaluation	TDI	
Compliance Inspection (DRF received)	TCDI		Installation Inspection	TIN	
Compliance Inspection (Complaint received)	TCPI		Closure Inspection	TXI	
Compliance Re-Inspection	TCR				

Rule Cite                      Description / Inspector's Comments

	<u>See Page 2</u>
	<u>for comments.</u>

Financial Responsibility – Verify owner's coverage. Select *Insurance* or *Other*, and provide *Mechanism*, if appropriate.

\_\_\_ Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: Self

\_\_\_ None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes     No     CWOE – Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name – Please Print	<u>Mary Ellen Weimert</u> Facility Representative Name – Please Print
<u>Mark S</u> <u>7/6/01</u> Inspector Signature & Date	<u>Mary Ellen Weimert</u> Facility Representative Signature & Date

Facility Name: CITRUS COUNTY Public Works Facility ID: 8945469 Date: 7/6/01

Rule Cite Description / Inspector's Comments

	Release detection is a <del>pressure</del> <sup>CMS</sup> Veeder Root
	TLS 350 CSCD, PULD. Both tanks
	and lines are tested continuously.
	all tank test results are kept in
	file at the office.
	a print out of the last tank & line
	test results have been added to the
	file.
	The dispenser's lines and the STP
	sumps have been visually inspected
	monthly and the conditions observed
	have been documented monthly.
	All three dispenser lines are dry.
	Both the STP sumps are dry.
	The fills are marked per Api 1637.
	They are both equipped with flow shutoff.
	The spill buckets are dry & clean.
	The monitor wells have been properly abandoned.



data is current as of: 21-JUN-2001

Bureau of Petroleum Storage Systems  
Facility Inspection Cover Page

Facility Information

ID#: 8945469	District: SWD
Name: CITRUS CNTY-PUBLIC WORKS AIRPORT	County: Citrus
822 N Lingberg Dr	Type: County Government
Crystal River, FL	Status: Open
Contact: John Crump Public Works } CMS	Latitude: 28:52:17.0000 } CMS
Phone: 352-527-7626	Longitude: 82:34:35.0000 } CMS
	LL AGPS
	Method:

Account Owner Information

Name: Citrus Cnty Dept Of Public Works  
 Po Box 215  
 Lecanto, FL 34460  
 Phone: 352-746-6868

Tank Owner Information

Name: Citrus Cnty Dept Of Public Works  
 Po Box 215  
 Lecanto, FL 34460  
 Phone: 352-746-6868

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
1	10000	Unleaded Gas	12/01/1989	UNDER	U	A F M N P O	C K J	L G 2 4
2	10000	Vehicular Diesel	12/01/1989	UNDER	U	A F M O N P	C K J	G L 2 4

} CMS

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!

ost Recent Insurance Document



47

D.E.P.  
JUL 14 1999  
Southwest District Tampa

**Sump Replacement Closure Summary**  
for  
**Citrus County**  
**Crystal River Airport**  
Facility ID #098945469

FLORIDA DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
JUL 14 1999  
SOUTHWEST DISTRICT  
TAMPA

*Prepared for:*

**Citrus County Public Works**  
1300 S Lecanto Highway  
Lecanto, FL 32661-9014

*Prepared by:*



**Tampa Bay Engineering, Inc.**  
18167 US 19 North, Suite 550  
Clearwater, FL 33764

May 1999

TBE Project No. 00084-001-01

## Table of Contents

<i>Section</i>	<i>Title</i>	<i>Page</i>
1	INTRODUCTION & BACKGROUND .....	1
2	SYSTEM UPGRADE AND ASSESSMENT ACTIVITIES	
	System Upgrades .....	2
	Monitoring Well Closures .....	2
	Soil Assessment .....	2
3	CONCLUSIONS .....	5

### APPENDICES

<i>Appendix</i>	<i>Title</i>
A	FIGURES
	Figure 1 - Site Map/Sampling Locations
	Figure 2 - OVA Log
B	LABORATORY ANALYSIS (SOIL)

## Section 1

## INTRODUCTION &amp; BACKGROUND

This report summarizes fuel storage system upgrades and assessment activities at Citrus County's Crystal River Airport. Work was conducted by TBE and Norris & Samon Pump Service, Inc. in March-April 1999.

The site is currently occupied by the Crystal River Airport which is owned and operated by Citrus County. Two storage tanks are located on site as summarized below:

Contents	Above/Below Ground	Size
Unleaded Gas	Below Ground	10,000gallon
Diesel	Below Ground	10,000 gallon

All assessment activities were performed by TBE personnel using procedures outlined in TBE's Comprehensive Quality Assurance Plan (CompQAP) No. 920334G and FDEP's *Storage Tank System Closure Assessment Requirements*, revised April 1998.

## Section 2

### SYSTEM UPGRADE AND ASSESSMENT ACTIVITIES

#### System Upgrades

System upgrades included the following:

- (1) Overfill prevention valves were installed within the existing tank fill risers. Modifications were made to the risers and drop tubes to accommodate the installation of the valves.
- (2) Portions of the concrete pad and backfill were removed to install tank sumps at both USTs. Environ tank sumps were then installed around the submersible turbine pumps (STP's) and the excavation area was restored with clean excavated backfill. New manhole rings and covers were installed above the two tank sumps and the concrete pad was restored.
- (3) The existing mechanical line leak detectors at each submersible pump were removed and replaced with Veeder Root electronic line leak detectors. Veeder Root Mag 1 tank probes were installed within the existing risers. The existing Gasboy was then upgraded to accommodate the Veeder Root systems.

#### Monitoring Well Abandonment

Four existing monitoring wells are scheduled to be properly closed with grout this month.

#### Soil Assessment

During installation of the tank sumps, TBE personnel collected pairs of soil samples next to each submersible pump for Organic Vapor Analysis (OVA) screening. Each soil sample was transferred to a 16-ounce mason jar, covered with aluminum foil, and screened with a Foxboro Model 128 GC Organic Vapor Analyzer (OVA), equipped with a flame-ionization detector. Petroleum-related OVA concentrations were then computed as the difference between the total OVA concentration and OVA concentration collected with a charcoal filtered probe. As shown in Appendix A, OVA concentrations up to 25 parts per million (ppm) were found in the area of the unleaded UST.

One soil sample from the unleaded gasoline tank sump excavation area with the highest OVA reading was collected and transported along with custody documentation to Savannah Laboratories for analysis per EPA methods 8021, 8310, and FL-PRO. Results are summarized below and laboratory reports included in Appendix C.

**Soil Analysis Summary**  
Sample Date: March 30, 1999

Constituent	Units	Detect Limit	Soil Cleanup Target Levels*	Unleaded UST
Benzene	ug/kg	5.2	7	ND
Ethylbenzene	ug/kg	5.2	400	ND
Toluene	ug/kg	5.2	400	ND
Total Xylenes	ug/kg	5.2	300	ND
MTBE	ug/kg	52	200	ND
Acenaphthene	ug/kg	54	4,000	ND
Acenaphthylene	ug/kg	22	22,000	ND
Anthracene	ug/kg	4.3	2,000,000	ND
Benzo(a)anthracene	ug/kg	4.0	1,400	9.6
Benzo(a)pyrene	ug/kg	4.0	100	13
Benzo(b)fluoranthene	ug/kg	4.0	1,400	16
Benzo(g,h,i)perylene	ug/kg	11	2,300,000	ND
Benzo(k)fluoranthene	ug/kg	4.0	15,000	6.4
Chrysene	ug/kg	4.0	80,000	11
Dibenzo(a,h)anthracene	ug/kg	11	100	ND
Fluoranthene	ug/kg	10	550,000	21
Fluorene	ug/kg	11	87,000	ND
Indeno(1,2,3-c,d)pyrene	ug/kg	10	1,500	12
Naphthalene	ug/kg	22	1,000	ND
Phenanthrene	ug/kg	4.0	120,000	12
Pyrene	ug/kg	10	570,000	19
TRPH	mg/kg	12	340	ND

ug/l = micrograms per liter (ppb)    mg/kg = milligrams per kilogram (ppm)    ND = no detection

\* lower of Direct Exposure 1 and Leachability Table V

As shown above, no soil sample constituents exceeded Chapter 62-761 FAC targets for those constituents analyzed. Therefore, no groundwater sampling/analysis was required.

**Section 4**

**CONCLUSIONS**

1. System upgrades including installation of overfill protection, STP sumps, line leak detectors, and tank gauges has been completed at the Crystal River Airport.
2. A single soil sample from the unleaded gasoline STP sump excavation revealed no constituents exceeding Chapter 62-761 FAC targets.
3. No additional assessment appears warranted for this site.

## SOIL ORGANIC VAPOR ANALYSIS SUMMARY

Unleaded Tank		Sample Date: March 30, 1999		
Depth (ft)	Odor (y/n)	OVA Results (ppm)		
		Unfiltered	Filtered	Petroleum Related Vapors
1	no	0	-	0
2	no	0	-	0
3	no	60	40	20
4	no	45	20	25
5	no	10	10	0
6	no	90	100	0

*Note: 6-foot depth is top of tank (soil was moist)*

Diesel Tank		Sample Date: March 30, 1999		
Depth (ft)	Odor (y/n)	OVA Results (ppm)		
		Unfiltered	Filtered	Petroleum Related Vapors
1	no	0	-	0
2	no	0	-	0
3	no	0	-	0
4	no	5	5	0
5	no	0	-	0
6	no	45	40	5

*Note: 6-foot depth is top of tank (soil was moist)*

**OVA Log  
Figure 2**



**Appendix B**  
**LABORATORY ANALYSIS (SOIL)**  
**& MANIFEST**

LOG NO: B9-50947  
 Received: 31 MAR 99  
 Reported: 12 APR 99

Mr. Steve Howarth  
 Tampa Bay Engineering, Inc.  
 18167 U.S. 19, North Suite 550  
 Clearwater, FL 34624

Project: Crystal River/00084-001-00  
 Sampled By: Client  
 Code: 114090412

REPORT OF RESULTS

Page 1

LOG NO	SAMPLE DESCRIPTION , SOLID OR SEMISOLID SAMPLES	DATE/ TIME SAMPLED
50947-1	UNLEADED-4'	03-30-99/1145
PARAMETER	50947-1	
Purgeable Aromatics (8021)		
Benzene, ug/kg dw		<5.2
Ethylbenzene, ug/kg dw		<5.2
Toluene, ug/kg dw		<5.2
Xylenes, ug/kg dw		<5.2
Total Volatile Organic Aromatics, ug/kg dw		<5.2
1-yl Tert Butyl Ether (MTBE), ug/kg dw		<52
L Analyzed		04.03.99

LOG NO: B9-50947  
 Received: 31 MAR 99  
 Reported: 12 APR 99

Mr. Steve Howarth  
 Tampa Bay Engineering, Inc.  
 18167 U.S. 19, North Suite 550  
 Clearwater, FL 34624

Project: Crystal River/00084-001-00  
 Sampled By: Client  
 Code: 114090412

REPORT OF RESULTS

Page 2

LOG NO	SAMPLE DESCRIPTION , SOLID OR SEMISOLID SAMPLES	DATE/ TIME SAMPLED
50947-1	UNLEADED-4'	03-30-99/1145
PARAMETER	50947-1	
Polynuclear Aromatics (8310)		
Acenaphthene, ug/kg dw		<54
Acenaphthylene, ug/kg dw		<22
Anthracene, ug/kg dw		<4.3
Benzo(a)anthracene, ug/kg dw		9.6
Benzo(a)pyrene, ug/kg dw		13
Benzo(b)fluoranthene, ug/kg dw		16
Benzo(g,h,i)perylene, ug/kg dw		<11
Benzo(k)fluoranthene, ug/kg dw		6.4
Chrysene, ug/kg dw		11
Dibenzo(a,h)anthracene, ug/kg dw		<11
Fluoranthene, ug/kg dw		21
Fluorene, ug/kg dw		<11
Indeno(1,2,3-cd)pyrene, ug/kg dw		12
Naphthalene, ug/kg dw		<22
Phenanthrene, ug/kg dw		12
Pyrene, ug/kg dw		19
2-Methylnaphthalene, ug/kg dw		<22
1-Methylnaphthalene, ug/kg dw		<22
Date Extracted		04.02.99
Date Analyzed		04.05.99
Petroleum Range Organics (FL-PRO)		
Petroleum Hydrocarbons , mg/kg dw		<12
Date Extracted		04.05.99
Date Analyzed		04.08.99
Percent Solids		92

LOG NO: B9-50947  
 Received: 31 MAR 99  
 Reported: 12 APR 99

Mr. Steve Howarth  
 Tampa Bay Engineering, Inc.  
 18167 U.S. 19, North Suite 550  
 Clearwater, FL 34624

Project: Crystal River/00084-001-00  
 Sampled By: Client  
 Code: 114090412

REPORT OF RESULTS

Page 3

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR SOLID/SEMISOLID	DATE/ TIME SAMPLED		
50947-2	Method Blank			
50947-3	Accuracy (%Rec)			
50947-4	Precision (%RPD)			
PARAMETER		50947-2	50947-3	50947-4
Purgeable Aromatics (8021)				
Benzene, ug/kg dw		<5.0	88 %	2.3 %
Ethylbenzene, ug/kg dw		<5.0	---	---
Toluene, ug/kg dw		<5.0	96 %	1.0 %
enes, ug/kg dw		<5.0	---	---
al Volatile Organic Aromatics, ug/kg dw		<5.0	---	---
Methyl Tert Butyl Ether (MTBE), ug/kg dw		<50	---	---
Date Analyzed		04.03.99	04.03.99	---

LOG NO: B9-50947  
 Received: 31 MAR 99  
 Reported: 12 APR 99

Mr. Steve Howarth  
 Tampa Bay Engineering, Inc.  
 18167 U.S. 19, North Suite 550  
 Clearwater, FL 34624

Project: Crystal River/00084-001-00  
 Sampled By: Client  
 Code: 143690412

REPORT OF RESULTS

Page 4

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR SOLID/SEMISOLID	DATE/ TIME SAMPLED		
50947-2	Method Blank			
50947-3	Accuracy (%Rec)			
50947-4	Precision (%RPD)			
PARAMETER		50947-2	50947-3	50947-4
Polynuclear Aromatics (8310)				
Acenaphthene, ug/kg dw		<50	66 %	4.6 %
Acenaphthylene, ug/kg dw		<20	---	---
Acenaphthene, ug/kg dw		<4.0	---	---
Benzo(a)anthracene, ug/kg dw		<4.0	---	---
Benzo(a)pyrene, ug/kg dw		<4.0	---	---
Benzo(b)fluoranthene, ug/kg dw		<4.0	---	---
Benzo(g,h,i)perylene, ug/kg dw		<10	---	---
Benzo(k)fluoranthene, ug/kg dw		<4.0	---	---
Chrysene, ug/kg dw		<4.0	80 %	6.2 %
Dibenzo(a,h)anthracene, ug/kg dw		<10	---	---
Fluoranthene, ug/kg dw		<10	---	---
Fluorene, ug/kg dw		<10	69 %	0 %
Indeno(1,2,3-cd)pyrene, ug/kg dw		<10	---	---
Naphthalene, ug/kg dw		<20	61 %	0 %
Phenanthrene, ug/kg dw		<4.0	---	---
Pyrene, ug/kg dw		<10	75 %	8.0 %
2-Methylnaphthalene, ug/kg dw		<20	---	---
1-Methylnaphthalene, ug/kg dw		<20	---	---
Date Extracted		04.02.99	04.02.99	---
Date Analyzed		04.05.99	04.05.99	---
Petroleum Range Organics (FL-PRO)				
Petroleum Hydrocarbons , mg/kg dw		<10	81 %	15 %
Date Extracted		04.05.99	04.05.99	---
Date Analyzed		04.06.99	04.06.99	---

LOG NO: B9-50947  
Received: 31 MAR 99  
Reported: 12 APR 99

Mr. Steve Howarth  
Tampa Bay Engineering, Inc.  
18167 U.S. 19, North Suite 550  
Clearwater, FL 34624

Project: Crystal River/00084-001-00  
Sampled By: Client  
Code: 114090412

REPORT OF RESULTS

Page 5

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR SOLID/SEMISOLID	DATE/	TIME SAMPLED
0947-2	Method Blank		
0947-3	Accuracy (%Rec)		
0947-4	Precision (%RPD)		

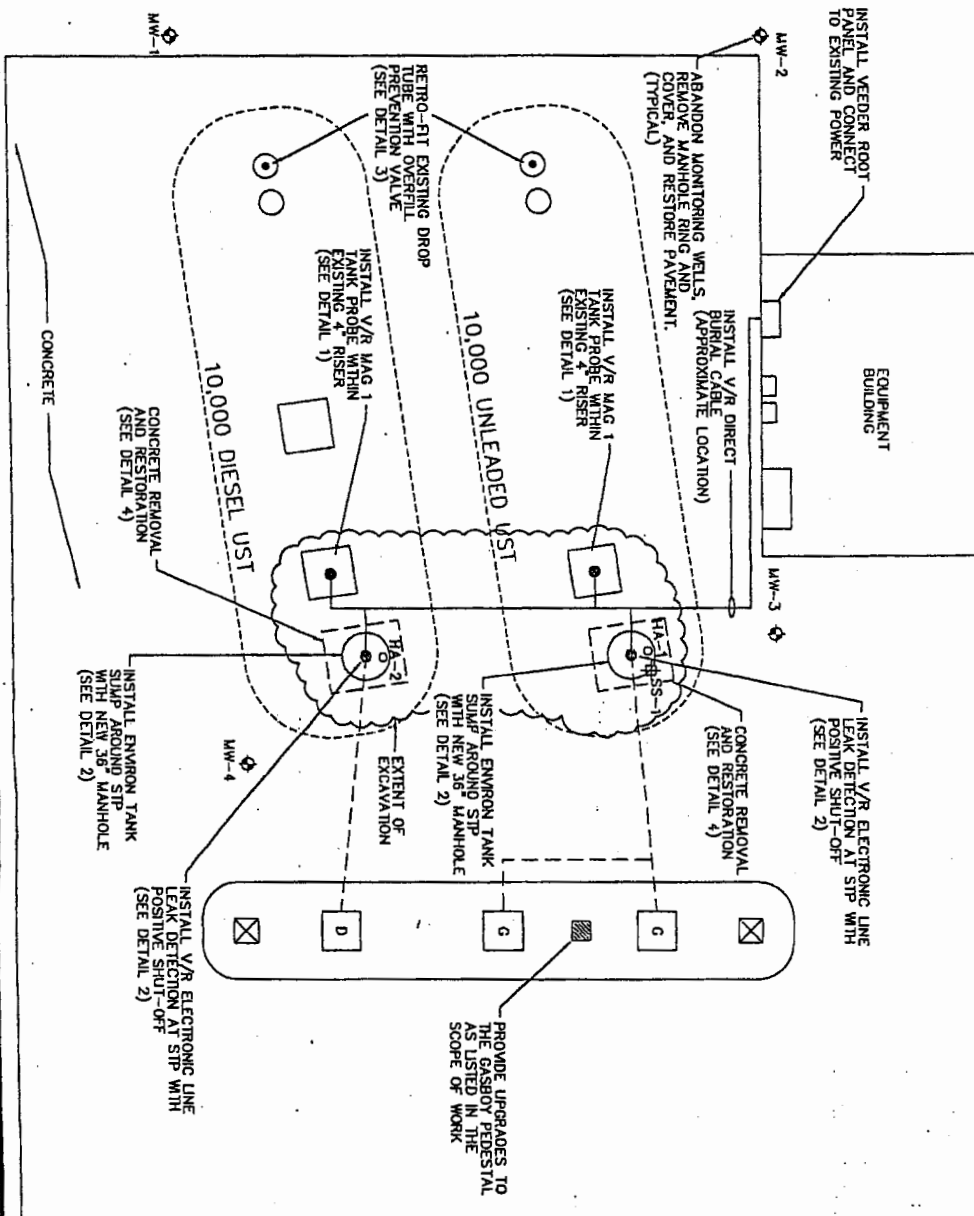
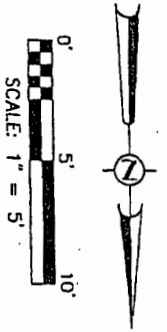
  

PARAMETER	50947-2	50947-3	50947-4
-----------	---------	---------	---------

Methods: EPA SW-846, Update III.  
DOH Certification #'s: 84385, E84282, 81291, E81005

  
Michael F. Valder, Project Manager





**LEGEND**

SS-1  $\oplus$  SOIL SAMPLE FOR LABORATORY ANALYSIS (MARCH 31, 1999)

HA-1  $\circ$  HAND AUGER BORING FOR OVA SCREENING (MARCH 31, 1999)

FIGURE 1	<b>FUEL SYSTEM UPGRADES CRYSTAL RIVER AIRPORT</b>	<b>CITRUS COUNTY</b>	Project Mgr. JSC/SPH Checked/OC SPH CADD By DWK	TEE Proj. # 2008-001-00 Scale: 1"=5' Date: 11-10-98
	<b>SITE MAP</b>	TAMPA BAY ENGINEERING, INC. 18187 U.S. Hwy 19 North, Suite 530 Clearwater, Florida 34614 (813) 531-2600 Fax (813) 531-2681 E-Mail: tbay@tdigital.net		



**Site No. 48 A-1 Alarm Company**  
735 N. Suncoast Boulevard  
Crystal River, Florida  
ERNS I.D. Nos. 343840 and 203454

NATIONAL RESPONSE CENTER - PUBLIC REPORT

# 48

Incident Report # 203454

INCIDENT DESCRIPTION

\*Report taken by: MST3 WILKERSON at 13:40 on 18-OCT-93  
Incident Type: FIXED  
Incident Cause: EQUIPMENT FAILURE  
Affected Area:  
The incident was discovered on 01-AUG-93 at 00:00 local time.  
Affected Medium: LAND CONCRETE

SUSPECTED RESPONSIBLE PARTY

Name: BL CHILDS  
Organization: A-1 ALARM CO Address: 735 NORTH SUNCOAST BLVD  
CRYSTAL RIVER, FL  
PRIMARY Phone: (904)7955179  
Type of Organization: PRIVATE ENTERPRISE

INCIDENT LOCATION

735 NORTH SUNCOAST BLVD County: CITRUS City: CRYSTAL RIVER State: FL

RELEASED MATERIAL(S)

CHRIS Code: OLB Official Material Name: OIL, MISC: LUBRICATING  
Also Known As:  
Qty Released: 0 UNKNOWN AMOUNT Qty in Water: 0 UNKNOWN AMOUNT  
CHRIS Code: OMT Official Material Name: OIL, MISC: MOTOR  
Also Known As:  
Qty Released: 0 UNKNOWN AMOUNT Qty in Water: 0 UNKNOWN AMOUNT

DESCRIPTION OF INCIDENT

CALLER STATES THAT THE RESPONSIBLE PARTY HAS SEVERAL CONTAINERS OF OIL LEAKING INSIDE THE WAREHOUSE

INCIDENT DETAILS

Building ID:  
Type of Fixed Object: UNKNOWN  
Power Generating Facility: UNKNOWN  
Generating Capacity:  
Type of Fuel:  
NPDES:  
NPDES Compliance: UNKNOWN

DAMAGES

Fire Involved: NO Fire Extinguished: UNKNOWN  
INJURIES: Hospitalized: Empl/Crew: Passenger:  
FATALITIES: Empl/Crew: Passenger: Occupant:

Damages:

<u>Closure Type</u>	<u>Description of Closure</u>	<u>Length of Closure</u>	<u>Direction of Closure</u>
Air:	N		
Road:	N		M Ar
Waterway:	N		
Track:	N		

---

REMEDIAL ACTIONS

NONE

Release Secured: UNKNOWN Release Rate: Estimated Release Duration:

---

WEATHER

---

ADDITIONAL AGENCIES NOTIFIED

Federal:

State/Local:

State/Local On Scene:

State Agency Number:

---

NOTIFICATIONS BY NRC

U.S. EPA IV		MR MILITSCHER
18-OCT-93	13:47	
MSO TAMPA		PO FRANKLIN
18-OCT-93	13:47	

---

ADDITIONAL INFORMATION

---

\*\*\* END INCIDENT REPORT # 203454 \*\*\*

NATIONAL RESPONSE CENTER - PUBLIC REPORT

Incident Report # 203454

INCIDENT DESCRIPTION

\*Report taken by: MST3 WILKERSON at 13:40 on 18-OCT-93  
Incident Type: FIXED  
Incident Cause: EQUIPMENT FAILURE  
Affected Area:  
The incident was discovered on 01-AUG-93 at 00:00 local time.  
Affected Medium: LAND CONCRETE

---

SUSPECTED RESPONSIBLE PARTY

Name: BL CHILDS  
Organization: A-1 ALARM CO Address: 735 NORTH SUNCOAST BLVD  
CRYSTAL RIVER, FL  
PRIMARY Phone: (904)7955179  
Type of Organization: PRIVATE ENTERPRISE

---

INCIDENT LOCATION

735 NORTH SUNCOAST BLVD County: CITRUS City: CRYSTAL RIVER State: FL

---

RELEASED MATERIAL(S)

CHRIS Code: OLB Official Material Name: OIL, MISC: LUBRICATING  
Also Known As:  
Qty Released: 0 UNKNOWN AMOUNT Qty in Water: 0 UNKNOWN AMOUNT  
CHRIS Code: OMT Official Material Name: OIL, MISC: MOTOR  
Also Known As:  
Qty Released: 0 UNKNOWN AMOUNT Qty in Water: 0 UNKNOWN AMOUNT

---

DESCRIPTION OF INCIDENT

CALLER STATES THAT THE RESPONSIBLE PARTY HAS SEVERAL CONTAINERS OF OIL LEAKING INSIDE THE WAREHOUSE

---

INCIDENT DETAILS

Building ID:  
Type of Fixed Object: UNKNOWN  
Power Generating Facility: UNKNOWN  
Generating Capacity:  
Type of Fuel:  
NPDES:  
NPDES Compliance: UNKNOWN

---

DAMAGES

Fire Involved: NO Fire Extinguished: UNKNOWN  
INJURIES: Hospitalized: Empl/Crew: Passenger:  
FATALITIES: Empl/Crew: Passenger: Occupant:

Damages:

<u>Closure Type</u>	<u>Description of Closure</u>	<u>Length of Closure</u>	<u>Direction of Closure</u>
Air:	N		
Road:	N		M Ar
Waterway:	N		
Track:	N		

---

REMEDIAL ACTIONS

NONE

Release Secured: UNKNOWN Release Rate: Estimated Release Duration:

---

---

WEATHER

---

---

ADDITIONAL AGENCIES NOTIFIED

Federal:

State/Local:

State/Local On Scene:

State Agency Number:

---

NOTIFICATIONS BY NRC

U.S. EPA IV		MR MILITSCHER
18-OCT-93	13:47	
MSO TAMPA		PO FRANKLIN
18-OCT-93	13:47	

---

ADDITIONAL INFORMATION

---

\*\*\* END INCIDENT REPORT # 203454 \*\*\*

---

NATIONAL RESPONSE CENTER - PUBLIC REPORT

Incident Report # 343840

INCIDENT DESCRIPTION

\*Report taken by: MST3 RUTHERFORD at 18:13 on 25-MAY-96  
Incident Type: PLATFORM  
Incident Cause: OTHER  
Affected Area:  
The incident occurred on 25-MAY-96 at 16:30 local time.  
Affected Medium: WATER GULF OF MEXICO

---

SUSPECTED RESPONSIBLE PARTY

Name: AMY PITRE  
Organization: CHEVRON Address: PO BOX 646  
VENICE, LA 70091  
PRIMARY Phone: (504)5346680  
Type of Organization: PRIVATE ENTERPRISE

---

INCIDENT LOCATION

STATE LEASE#2557 County: MAIN PASS State: LA Latitude: 29 Degrees 17' 5" N  
Longitude: 89 Degrees 5' 55" W

---

RELEASED MATERIAL(S)

CHRIS Code: OIL Official Material Name: OIL: CRUDE  
Also Known As:  
Qty Released: 4 GALLON(S) Qty in Water: 4 GALLON(S)

---

DESCRIPTION OF INCIDENT

PLATFORM/FLARE SCRUBBER DEVELOPED A LEAK

---

INCIDENT DETAILS

Platform Rig Name:  
Platform Letter:  
Location Area ID:  
Location Block ID:  
OCSG Number:  
OCSF Number:  
State Lease Number:  
Pier Dock Number:  
Berth Slip Number:

---

DAMAGES

Fire Involved: NO Fire Extinguished: UNKNOWN  
INJURIES: Hospitalized: Empl/Crew: Passenger:  
FATALITIES: Empl/Crew: Passenger: Occupant:

Damages:

<u>Closure Type</u>	<u>Description of Closure</u>	<u>Length of Closure</u>	<u>Direction of Closure</u>
Air:	N		
Road:	N		M Ar
Waterway:	N		
Track:	N		

---

REMEDIAL ACTIONS

USED SORBENTS TO RECOVER

Release Secured: UNKNOWN Release Rate: Estimated Release Duration:

---

WEATHER

---

ADDITIONAL AGENCIES NOTIFIED

Federal:

State/Local:

State/Local On Scene:

State Agency Number:

---

NOTIFICATIONS BY NRC

LA DEPT OF ENV QUAL		?????
25-MAY-96	00:00	(504)2958418
MSO NEW ORLEANS		PO HATCHER
25-MAY-96	18:17	
DOI/OEPC - R6		?????
25-MAY-96	00:00	(505)7661059
LA STATE POLICE		?????
25-MAY-96	00:00	(504)9221588
NOAA RPTS RGN VI (1ST CLASS BB)		?????
25-MAY-96	00:00	(202)2672165

---

ADDITIONAL INFORMATION

SHEEN SIZE:1250 FT X 50 FT/COLOR:BROWN

---

\*\*\* END INCIDENT REPORT # 343840 \*\*\*

**Site No. 50 Crystal River Firestone**

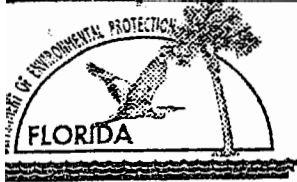
990 N. Suncoast Boulevard

Crystal River, Florida

FDEP I.D. Nos. 099200504 and 099600003

EPA I.D. No. FLD0398894340





Storage Tank Facility Compliance Inspection Report

Facility ID 9200504 County 09 CITRUS Inspection Date 2/2/01  
 Facility Name CRYSTAL RIVER FIRESTONE Facility Type C-USER  
 Latitude 28°52'30" Longitude 82°34'49" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ATSS Inspected	1
------------------	------------------	---

Compliance Inspection (Annual)	TCI		Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	X
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
62-761 450(1)(a)2	Verbal or written notice not provided prior to tank closure.	
50(1)(a)3	48 hour notification not provided.	
800(4)(b)5	written certification not provided that there was no discharge from the system.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Mailed to OWNER</u> Facility Representative Name - Please Print
<u>[Signature]</u> <u>2/2/01</u> Inspector Signature & Date	<u>[Signature]</u> Facility Representative Signature & Date

Facility Name: CRYSTAL RIVER FIRESTONE Facility ID: 920504 Date: 2/2/01

Cite	Description / Inspector's Comments
	The 750 <sup>g</sup> New/lube oil tank was removed and replaced with a 500 gallon AST for the new/lube oil.
	It is unknown what was done with the old AST as the Citrus County Environmental Health Section was not present during removal. The new tank has been installed on the <sup>same</sup> concrete pad that the old tank was on.
	A picture was taken of the new tank, and the concrete pad at the base of the new tank.
	It appears the old piping has been used with the new tank.
	There is some staining of the concrete around the new tank (where old tank used to be) See photograph
	A filled out registration form is included with this inspection to be signed and sent to Tallahassee to show the tank has been removed from facility.

**Site No. 51 Ewell Concrete (aka Masons Concrete of Crystal River)**  
1041 N. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098520455  
EPA I.D. No. FLD982169955



State of Florida  
DEPARTMENT OF ENVIRONMENTAL REGULATION

For Routing To Other Than The Addressee	
To: _____	Location: _____
To: _____	Location: _____
To: _____	Location: _____
From: _____	Date: _____

# Interoffice Memorandum

TO: Paula Noblitt, Southwest District Office

THROUGH: Tim Bahr, Technical Review Section *B*  
Bureau of Waste Cleanup

FROM: Jorge R. Caspary, Technical Review Section *JPC*  
Bureau of Waste Cleanup

DATE: March 27, 1991

SUBJECT: No Further Action Proposal  
Mason's Concrete Ready Mix, Inc.  
Crystal River Plant, Citrus County.  
DER File No. 90-1804

-----

Based on my review of the Contamination Assessment Reports (CARs) prepared by Dames and Moore and Law Environmental for the above referenced facility, I concur with the consultant's "No Further Action Proposal" recommendation for the petroleum related contamination.

Supplemental work to determine the source, degree and extent of the elevated pH values in the soil and groundwater is recommended.

If you have any questions, please contact me at Suncom 278-0190.



D0061492

LAW OFFICES  
LAWRENCE J. MARCHBANKS, P. A.  
SANCTUARY CENTRE TOWER E  
4800 NORTH FEDERAL HIGHWAY  
SUITE 101 E  
BOCA RATON, FLORIDA 33431

THOMAS D. DAIELLO  
DANA C. FERRELL  
DONALD M. HOMER  
SUZANNE M. LEIDER  
LAWRENCE J. MARCHBANKS  
STEPHEN R. PHILLIPS  
JAMES R. WEBB

TELEPHONE (407) 384-6509  
WEST PALM BEACH (407) 832-5032  
BROWARD (305) 760-4311  
TELEFAX (407) 750-9624

February 28, 1991

Ms. Paula Noblitt  
Environmental Specialist II  
Florida Department of Environmental Regulation  
4520 Oak Fair Boulevard  
Tampa, Florida 33610-7347

Re: Mason's Concrete Ready Mix, Inc.  
D.E.R. File No: 90-1804, Citrus County


Dear Ms. Noblitt:

This will acknowledge receipt of your proposed Consent Order under cover of February 12, 1991. I am in the process of reviewing the Consent Order and contamination assessment plans with Mason's Concrete's environmental engineers and I should be able to furnish you with a detailed response, if necessary, shortly.

It is my hope that it will not be necessary to negotiate an extensive consent order, since the matters cited in D.E.R.'s Warning Notice of July 5, 1990, have been voluntarily rectified. Specifically addressing those matters:

1. Alleged unauthorized discharge of petroleum products to the ground.

In accordance with the provisions of Rule 17-770.300(7), F.A.C., Mason's Concrete has completed the remedial action outlined in this firm's letter to you of October 19, 1990. The procedure was overseen and the results verified by Dames & Moore, Mason's Concrete's environmental engineers. The results were confirmed by Law Environmental, Inc.,

  
D0061490

Ms. Paula Noblitt  
Page Two  
February 28, 1991

an independent environmental engineering firm recommended by the Citrus County State Attorney's Office. For your information, I have enclosed copies of the final reports issued by both Dames & Moore and Law Environmental, Inc. Please note that Law Environmental, Inc. was retained at the request of the Citrus County State Attorney's Office for the express purpose of providing an independent review of Dames & Moore's investigation, tests and findings. As such, Law Environmental, Inc. was granted complete discretion in its investigation.

2. Alleged unauthorized discharge of process water to the ground and into an unlined pond.

Mason's Concrete has taken remedial action to minimize the discharge of process water resulting from overflow of its existing water clarifier pending approval of its application for an industrial wastewater processing permit. Mr. Mark Lefebvre of Dames & Moore has previously consulted you regarding a permit for a permanent industrial wastewater recycle system. At your recommendation, however, the permit application has not been submitted. Mason's Concrete and Dames & Moore are prepared to immediately submit the permit application and implement a permanent remedy notwithstanding continuing negotiation of a consent order.

3. Alleged unauthorized discharge of boiler blow-down water to the ground.

Mason's Concrete has taken measures to abate the direct discharge of hot boiler blow-down into the ground by constructing a 4' x 4' concrete pad and berm at the discharge site. Mason's Concrete intends to permanently alleviate this condition as part of its industrial wastewater recycle system.

Ms. Paula Noblitt  
Page Three  
February 28, 1991

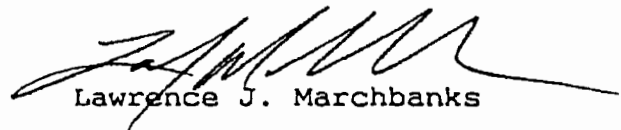
4. Alleged unauthorized discharge of truck wash-down water to the ground and into an unlined pond.

In compliance with D.E.R.'s Warning Notice of July 5, 1990, Mason's Concrete has ceased using hazardous materials (phosphoric acid) in its truck wash-down. The truck wash procedure will also be fully remedied as part of Mason's Concrete's industrial wastewater recycle system.

All of the matters addressed in D.E.R.'s Warning Notice have either been remedied or will be remedied in Mason's Concrete industrial wastewater processing plan. This plan will also address the Department's concerns over stormwater runoff maintenance, as deemed necessary after consultation between the Department and Mason's Concrete's environmental engineers. Since the application for a wastewater processing permit is ready for prompt filing, Mason's Concrete sees no need to delay a permanent solution to these matters by negotiation of a consent order.

Mr. Michael Glowacz of Dames & Moore will meet with you to discuss the contents of this letter in greater detail and, hopefully, resolve the Department's concerns informally.

Very truly yours,



Lawrence J. Marchbanks

LJM/nn

enclosures



State of Florida  
DEPARTMENT OF ENVIRONMENTAL REGULATION

Per Routing To Other Than The Addressee	
To	Location
To	Location
To	Location
From	Case

# Interoffice Memorandum

TO: Paula Noblitt, Southwest District Office

THROUGH: Tim Bahr, Technical Review Section  
Bureau of Waste Cleanup *B*

FROM: Jorge R. Caspary, Technical Review Section *JRC*  
Bureau of Waste Cleanup

DATE: March 27, 1991

SUBJECT: No Further Action Proposal  
Mason's Concrete Ready Mix, Inc.  
Crystal River Plant, Citrus County.  
DER File No. 90-1804

-----

Based on my review of the Contamination Assessment Reports (CARs) prepared by Dames and Moore and Law Environmental for the above referenced facility, I concur with the consultant's "No Further Action Proposal" recommendation for the petroleum related contamination.

Supplemental work to determine the source, degree and extent of the elevated pH values in the soil and groundwater is recommended.

If you have any questions, please contact me at Suncom 278-0190.

  
D0061492



**Site No. 52 Florida Pest Control & Chemical Company**  
2020 N. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098623298



CITRUS COUNTY

DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway  
Lecanto, Florida 32661-8099  
(904) 746-4223

In reply, refer to:

November 8, 1991

Mr. Dale Godshall  
Florida Pest Control  
202 S. Hwy. 19  
Crystal River, Florida 32627

Ref. Fac. # 098623298  
Florida Pest Control

Dear Mr. Godshall,

The Analytical results submitted by Gary Dounson & Associates, Inc., as part of storage tank removal at the referenced facility showed levels of Petroleum Hydro-Carbons in the water which are greater than state allowable levels. There was no contamination levels found in the soil. A discharge reporting form was filed with Dept. of Environmental Regulations by Gary Dounson & Associates.

You are advised to initiate clean-up action at this facility pursuant to Chapter 17-770 Florida Administrative Code (attached). A Contamination Assessment Report should be submitted by 04-30-92 per rule 17-770.660 Florida Administrative Code. All reports should be forwarded to the D.E.R. Southwest District, 4520 Oak Fair Blvd., Tampa, Florida 33610. Att: Nancy Evans, or Telephone at (813)623-5561.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

Attachments: 17-770

cc: Nancy Evans D.E.R. Southwest District  
Gary Dounson



# Florida Department of Environmental Regulation

Twin Towers Office Bldg. • 2600 Blair Stone Road • Tallahassee, Florida 32399-2400

Form Title	Discharge Reporting Form
Effective Date	December 10, 1990
DER Application No.	311 (Filed in SW DER)

## Discharge Reporting Form

SW - 1 1991

Use this form to notify the Department of Environmental Regulation of:

**SOUTHWEST DISTRICT  
TAMPA**

- Results of tank tightness testing that exceed allowable tolerances within ten days of receipt of test result.
- Petroleum discharges exceeding 25 gallons on pervious surfaces as described in Section 17-761.460 F.A.C. within one working day of discovery.
- Hazardous substance (CERCLA regulated) discharges exceeding applicable reportable quantities established in 17-761.460(2) F.A.C., within one working day of the discovery.
- Within one working day of discovery of suspected releases confirmed by: (a) released regulated substances or pollutants discovered in the surrounding area, (b) unusual and unexplained storage system operating conditions, (c) monitoring results from a leak detection method or from a tank closure assessment that indicate a release may have occurred, or (d) manual tank gauging results for tanks of 550 gallons or less, exceeding ten gallons per weekly test or five gallons averaged over four consecutive weekly tests.

Mail to the DER District Office in your area listed on the reverse side of this form

PLEASE PRINT OR TYPE  
Complete all applicable blanks

1. DER Facility ID Number: 098623298 2. Tank Number: 1 3. Date: 10/30/91

4. Facility Name: Florida Pest Control & Chemical Co.

Facility Owner or Operator: Florida Pest Control & Chemical Co.

Facility Address: 2020 Hwy. 19, South, Crystal River

Telephone Number: (904) 795-3614 County: Citrus

Mailing Address: 116 NW 16th Ave., Gainesville, FL 32629

5. Date of receipt of test results or discovery: 10/30/91 month/day/year

6. Method of initial discovery. (circle one **only**)

- |   |                             |   |
|---|-----------------------------|---|
| A. Liquid detector (automatic or manual)    | D. Emptying and Inspection. | F. Vapor or visible signs of a discharge in the vicinity. |
| B. Vapor detector (automatic or manual)     | E. Inventory control.       | G. Closure: _____ (explain)                               |
| C. Tightness test (underground tanks only). |                             | H. Other: <u>EPA 602 Test Results</u>                     |

7. Estimated number of gallons discharged: Unknown

8. What part of storage system has leaked? (circle all that apply) A. Dispenser B. Pipe C. Fitting D. Tank **(E) Unknown**

9. Type of regulated substance discharged. (circle one)

- |                              |                     |                   |   |
|------------------------------|---------------------|-------------------|---|
| A. leaded gasoline           | D. vehicular diesel | L. used/waste oil | V. hazardous substance includes pesticides, ammonia, chlorine and derivatives (write in name or Chemical Abstract Service CAS number) _____ |
| <b>(B) unleaded gasoline</b> | F. aviation gas     | M. diesel         | Z. other (write in name) _____  |
| C. gasohol                   | G. jet fuel         | O. new/lube oil   |   |

10. Cause of leak. (circle all that apply)

- |                    |                     |                         |                   |                          |
|--------------------|---------------------|-------------------------|-------------------|--------------------------|
| <b>(A) Unknown</b> | C. Loose connection | E. Puncture             | G. Spill _____    | I. Other (specify) _____ |
| B. Split           | D. Corrosion        | F. Installation failure | H. Overfill _____ |                          |

11. Type of financial responsibility. (circle one)

- |   |                   |
|---|-------------------|
| A. Third party insurance provided by the state insurance contractor | C. Not applicable |
| B. Self-insurance pursuant to Chapter 17-769.500 F.A.C.             | <b>(D) None</b>   |

12. To the best of my knowledge and belief all information submitted on this form is true, accurate, and complete.

D..R. Sapp, Jr., Owner  
Printed Name of Owner, Operator or Authorized Representative

Signature of Owner, Operator or Authorized Representative



## Florida Department of Environmental Regulation

Twin Towers Office Bldg. • 2600 Blair Stone Road • Tallahassee, Florida 32399-2400  
Lawton Chiles, Governor Carol M. Browner, Secretary

October 30, 1992

Mr. D.R. Sapp  
Florida Pest Control & Chemical Company  
116 Northwest 16th Avenue  
Gainesville, Florida 32602

RE: Florida Pest Control & Chemical Company  
2020 U.S. Highway 19 South  
Crystal River, Florida  
DER Facility #098623298

Dear Mr. Sapp:

The Bureau of Waste Cleanup has reviewed the Contamination Assessment Report (CAR) Addendum and No Further Action Proposal (NFAP), dated October 12, 1992 (received October 26, 1992), submitted for this site. Documentation submitted with the NFAP confirms that criteria set forth in Rule 17-770.630(3), Florida Administrative Code (F.A.C.), have been met. The NFAP is hereby incorporated by reference in this Order. Therefore, you are released from any further obligation to conduct site rehabilitation at the site, except as set forth below.

If a subsequent discharge of petroleum or petroleum product occurs at the site, the Department may require site rehabilitation in order to reduce contaminant concentrations to the levels approved through review of the NFAP or otherwise allowed by Chapter 17-770, F.A.C.

Additionally, you are required to properly abandon all monitoring wells except compliance wells required by Chapter 17-761, F.A.C., for release detection. The wells must be abandoned in accordance with the requirements of Rule 17-532.500(4), F.A.C.

Persons whose substantial interests are affected by this Site Rehabilitation Completion Order have the right to challenge the Department's decision. Such a challenge may include filing a petition for an administrative determination (hearing) as described in the following paragraphs. However, pursuant to Chapter 17-103, F.A.C., you may request an extension of time to file the Petition. All requests for extensions of time or petitions for administrative determinations must be filed directly with the Department's Office of General Counsel at the

02  
D0061150

Mr. D.R. Sapp  
October 30, 1992  
Page Two

address given below within twenty-one (21) days of receipt of this notice (do not send them to the Bureau of Waste Cleanup).

Notwithstanding the above, a person whose substantial interests are affected by this Site Rehabilitation Completion Order may petition for an administrative proceeding (hearing) in accordance with Section 120.57, Florida Statutes (F.S.). The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, within twenty-one (21) days of receipt of this notice. Failure to file a petition within this time period shall constitute a waiver of any right such person may have to request an administrative determination (hearing) under Section 120.57, F.S.

The Petition shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the Department file number (DER facility number), and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by each petitioner, if any;
- (e) A statement of facts which each petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of which rules or statutes each petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by each petitioner, stating precisely the action each petitioner wants the Department to take with respect to the Department's action or proposed action.

This Site Rehabilitation Completion Order is final and effective on the date of receipt of this Order unless a petition (or time extension) is filed in accordance with the preceding paragraphs. Upon the timely filing of a petition, this Order will not be effective until further order of the Department.

When the Order is final, any party to the Order has the right to seek judicial review of the Order pursuant to Section 120.68, F.S., by filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules of Appellate Procedure, with the Clerk of the Department in the Office of General Counsel, 2600 Blair Stone

Mr. D.R. Sapp  
October 30, 1992  
Page Three

Road, Tallahassee, Florida 32399-2400; and by filing a copy of the Notice of Appeal, accompanied by the applicable filing fees, with the appropriate District Court of Appeal. The Notice of Appeal must be filed within thirty (30) days from the date the Final Order is filed with the Clerk of the Department.

Please send a copy of the approved CAR document(s) to Ken Weber of the Southwest Florida Water Management District within thirty (30) days of receiving this Site Rehabilitation Completion Order.

The DER Facility Number for this site is 098623298. Please use this identification on all future correspondence with the Department.

Any questions you may have on the technical aspects of this Site Rehabilitation Completion Order should be directed to Michael J. Bland at (904) 488-0190. Contact with the above named person does not constitute a petition for administrative determination.

Sincerely,



John M. Ruddell, Director  
Division of Waste Management

JMR/mjb

cc: Gary Dounson, Gary Dounson & Associates - Gainesville  
Dick Sosna, Citrus County Fire Prevention Bureau

**Site No. 56 Palms ACE Hardware**  
1321 SE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 099101562



# Florida Department of Environmental Protection

Lawton Chiles  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Virginia B. Wetherell  
Secretary

-CERTIFIED MAIL-RETURN RECEIPT-

October 29, 1993

*Handwritten initials and date: 10/29/93*

Mr. Walter Bunts  
W. & L. B. Corporation  
Post Office Box 666  
Crystal River, Florida 32623

RE: Ace Hardware  
1321 Southeast Highway 19, Crystal River, Florida  
DEP Facility #099101562 *(CL0 Solo Station)*

Dear Mr. Bunts:

Subject: Application for Eligibility for Restoration Coverage  
Under the Abandoned Tank Restoration Program

The Florida Department of Environmental Protection (DEP) has reviewed documents you submitted as application for eligibility for Restoration Coverage under the requirements of the Abandoned Tank Restoration Program (ATRP), Chapter 17-769.800, Florida Administrative Code (F.A.C.). Based upon this information which you have provided, the subject facility is ineligible for participation in the ATRP for the following reason(s):

"Eligibility in the Abandoned Tank Restoration Program is restricted to those sites that have documented contamination from an abandoned petroleum storage system pursuant to Section 17-769.800(3)(a), F.A.C."

A person whose substantial interests are affected by this Order of Ineligibility may petition for an administrative proceeding (hearing) in accordance with Section 120.57, Florida Statutes (F.S.). The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, with 21 days of receipt of this Notice. Petitioner shall mail a copy of the petition to the applicant at the address indicated above at the time of filing. Failure to file a petition within this time period shall constitute a waiver of any right such person may have to request an administrative determination (hearing) under Section 120.57, F.S.

The petition shall contain the following information: (a) The name, address, and telephone number of each petitioner, the applicant's name and address, the Department Facility Identification Number and county in which the project is proposed;



Mr. Walter Bunts  
October 29, 1993  
Page Two

(b) A statement of how and when each petitioner received notice of the Department's action or proposed action; (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action; (d) A statement of the proposed action; (d) A statement of the material facts disputed by petitioner, if any; (e) A statement of facts which petitioner contends warrant reversal or modification of the Department's action or proposed action; (f) A reversal or modification of the Department's action or proposed action; and (g) A statement of the relief sought by petitioner, stating precisely the action petitioner wants the Department to take with respect to the Department's action or proposed action.

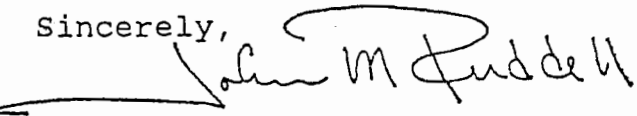
If a petition is filed, the administrative hearing process is designed to formulate agency action. Accordingly, the Department's final action may be different from the position taken by it in this Notice. Persons whose substantial interests will be affected by any decision of the Department with regard to the application have the right to petition to become a party to the proceeding. The petition must conform to the requirements specified above, as set forth in Chapter 17-103 and 28-5, F.A.C., and must be filed (received) with the Department's Office of General Counsel, 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, within 21 days of receipt of this Notice. Failure to petition within the allowed time frame constitutes a waiver of any right such person has to request a hearing under Section 120.57, F.S., and to participate as a party to this proceeding. Any subsequent intervention will only be at the approval of the presiding officer upon motion filed pursuant to Rule 22I-6, F.A.C.


The application is available for public inspection during the normal business hours, 8:00 a.m. to 5:00 p.m., Monday through Friday, except legal holidays, at the office of the Petroleum Insurance Administrator at the above address.

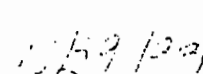
If you have questions regarding this or the pollution liability insurance program, please contact William E. Truman, Petroleum Insurance Administrator at 904/488-0876.

FILING AND ACKNOWLEDGEMENT  
FILED, on this date, pursuant to S120.52  
Florida Statutes, with the designated Department Clerk, receipt of which is hereby acknowledged.

Sincerely,

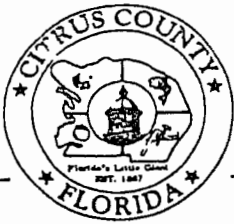
  
John M. Ruddell, Director  
Division of Waste Management

  
Clerk

  
Date

JMR/awp

cc: Nancy Evans - Southwest Florida District Office



CITRUS COUNTY

DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway

Lecanto, Florida 32661-8099

(904) 746-4223

In reply, refer to:

April 5, 1991

Mr. Walter Bunts  
Ace Hardware  
1321 S.E. Hwy. 19  
Crystal River, Florida 32623

Ref. Fac.# Unregistered  
Ace Hardware

Dear Mr. Bunts,

Attached are the 17-761 Florida Administrative Code Compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-761, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank system. Also please see comments on front page of inspection report.

If you have any questions concerning this matter please call us at (904)746-1335.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

RTS/jf

cc: Robert Youakim  
State Wide Environmental Tank Services, Inc.  
5040 Waterside Drive  
Port Richey, Florida 34688



State of Florida  
Department of Environmental Regulation  
**Pollutant Storage Tank System  
Inspection Report Form**

Facility ID No.: UNREGISTERED County: CITRUS  
 Facility Name: ACE HARDWARE  
 Facility Location: 1321 S.E. Hwy 19 Crystal River FL 32623  
 Operator: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Owner: WALTER BUNTY Phone: (904) 951 4590  
 Latitude 28° 53' 03" N Longitude 82° 34' 59" W Section \_\_\_\_\_ Township \_\_\_\_\_ Range \_\_\_\_\_

Tank #	Size	Contents	Installation Date	U/A or In-Contact	Tank Construction	Integral Piping	Monitoring System	Tank Status
1	4000	J	Xx/Kx	U	C	B	Y	B
2	4000	J	Xx/Kx	U	C	B	Y	B
3	4000	J	Xx/Kx	U	C	B	Y	B
4	4000	J	Xx/Kx	U	C	B	Y	B

Comments:  
 (1) TANKS EXCAVATED & PULLED 3/19/91 BY (STATEWIDE ENVIRONMENTAL TANK SERVICES, INC.)  
 (2) SOIL SAMPLES WERE NOT EXCESSIVE & WERE WITHIN THE ACCEPTABLE RANGE, BY JOHN F. EVENHOUSE ASW ENVIRONMENTAL CONSULTANTS  
 (3) TANKS TO BE HAULED OF TO TAMPA SCRAP, HOOKER POINT TAMPA, FLA.  
 (4) WATER SAMPLES TAKEN & SENT TO LAB FOR ANALYSIS. RESULT 4/5/91 O.K. PER LAB  
 (5) COPY OF CLOSURE REPORT TO BE SENT TO CITRUS COUNTY FIRE PREVENTION  
 John F. Evenhouse - ASW Environmental Consultants (813) 968-7702

<b>Inspection Type:</b> <input type="checkbox"/> Complaint Response <input type="checkbox"/> Initial <input type="checkbox"/> EDI <input type="checkbox"/> Public Well Field <input type="checkbox"/> Reinspection <input type="checkbox"/> Installation <input checked="" type="checkbox"/> Tank Removal <input type="checkbox"/> Unregistered	<b>Facility Information:</b> <input checked="" type="checkbox"/> Abandoned <input type="checkbox"/> Aboveground <input type="checkbox"/> Govt.-Federal <input type="checkbox"/> Govt.-Other <input type="checkbox"/> Non-retail <input type="checkbox"/> Retail <input type="checkbox"/> Retrofit (M. or O.) <input type="checkbox"/> Retrofit (L. or R.)
---	---

DER District: SOUTHWEST Local Program: CITRUS COUNTY FIRE PREVENTION  
 Inspector's Signature & Date: Richard T. Sosna 3/19/91  
 Facility Contact's Signature & Date: WEB

Violations must be corrected by: next routine inspection  or by:  1 N/A day yr

**Site No. 58 Texaco Lube Express**  
1100 (1050) S. Suncoast Boulevard  
Crystal River, Florida  
FDEP/EPA I.D. No. None

\$58

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

**Facility ID#:** 9801103**Name:** Texaco Express Lube

1050 Sw Hwy 19

Crystal River, FL 32629

**Contact:****Phone:** 352-795-4788**District:** SWD**County:** Citrus**Type:** C-Fuel User/Non-Retail**Status:** Closed**Latitude:** 28:53:11.0000**Longitude:** 82:35:05.0000**LL Method:** AGPS-Autonomous GPS

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monitc
1	600	New/Lube Oil	02/01/1991	ABOVE	NonRegul Construct	C	A	I
2	600	New/Lube Oil	02/01/1991	ABOVE	NonRegul Construct	C	A	I
3	500	Waste Oil	02/01/1991	ABOVE	NonRegul Construct	C	A	I

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query

---

**Facility ID#:** 9201295

**Name:** Nick Nicholas Ford  
4020 N Suncoast Blvd  
Crystal River, FL 32629

**Contact:** Nicholas, Nick**Phone:** --**District:** SWD**County:** Citrus**Type:** C-Fuel User/Non-Retail**Status:** Closed**Latitude:** 28:55:45.0000**Longitude:** 82:36:57.0000**LL Method:** UNVR-Unverified**Account Owner:** Signet Investment

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1	500	Unknown/Not Reported		UNDER	Removed			

**\*\*\*Note:***WASTE OIL*

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query

---

**Facility ID#:** 8518715

**Name:** Gulf Coast Ford Inc  
2440 Nw Hwy 19  
Crystal River, FL 34428- 6321

**Contact:** Nick Nicholas & Bill Buckner**Phone:** 352-795-7371**District:** SWD**County:** Citrus**Type:** C-Fuel User/Non-Retail**Status:** Open**Latitude:** 28:55:12.0000**Longitude:** 82:36:40.0000**LL Method:** AGPS-Autonomous GPS**Account Owner:** Nicholas, Nick & Taylor L E

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
5	2000	Unleaded Gas	12/01/1997	ABOVE	In Service	C O P R K	B K A I	F Q 4
1	6000	Unleaded Gas	07/01/1971	UNDER	Removed			
1R1	3000	Unleaded Gas	05/01/1987	UNDER	Removed			
2	6000	Leaded Gas	07/01/1971	UNDER	Removed			
3	3000	Leaded Gas	07/01/1971	UNDER	Removed			
4	3000	Leaded Gas	07/01/1971	UNDER	Removed			

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

**Site No. 59 Southdown, Inc. (Florida Mining & Materials Corp.-Crystal River)**  
1021 S. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. Nos. 098518701 and 099800142





### Storage Tank Facility Compliance Inspection Report

Facility ID 8518701 County 09 CITRUS Inspection Date 12/7/00  
 Facility Name SOUTH DAWN inc Facility Type C USER  
 Latitude 28°53'13" Longitude 82°34'58" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection	# USTs Inspected	# ATSS Inspected	1
--	------------------	------------------	---

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	Release Detection is a monthly visual check of the tank, its containment wall, and the associated piping. The results are noted in the log sheets.	
	Containment area has been coated	
	Drain valve is closed & locked	
	~ 2 inches of rain water in containment	
	Some corrosion on exterior of tank is visible	

Financial Responsibility – Verify owner's coverage. Select *Insurance* or *Other*, and provide *Mechanism*, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_  
 Other Coverage meeting federal financial responsibility requirements. Mechanism: Self 2/28/00 2/28/01  
 None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u>	<u>352-527-5295</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u>	<u>JAMES H. SHUART</u>
Inspector Name – Please Print	Facility Representative Name / Please Print
<u>Mark Sumner</u> 12/7/2000	<u>[Signature]</u>
Inspector Signature & Date	Facility Representative Signature & Date

**Site No. 60 Florida Power Corporation - Whetstone Oil Unit #5**  
1017 S. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 099101846

**Site No. 61 Fina - Crystal River**  
1017 SE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503199



UNIFIED  
ENVIRONMENTAL SERVICES, INC.



Project No. 93-0095

*Rec'd  
2/3/94*

INITIAL REMEDIAL ACTION REPORT  
for

Crystal River Fina  
1017 U.S. Highway 19  
Crystal River, Florida

F.D.E.P. # 098503199  
September 1993

Prepared For:

Whetstone Oil Company  
Mr. Mike Whetstone

Prepared By:

*Keith McDonald*  
Keith McDonald  
Hydrogeologist



# UNIFIED ENVIRONMENTAL SERVICES, INC.



## Introduction

At the request of Whetstone Oil Company, Unified Environmental Services, Inc. (UES) performed screening of the soils after the removal of petroleum affected soils had occurred. A surface discharge of approximately 35 gallons of diesel fuel discharged from a hose that failed during the fueling of a transport truck. On September 1, 1993, the discharge was immediately recovered by Whetstone Oil Company through the use of sand. This discharge did occur on an asphalt area of the site and minor retrofitting of the fueling system was performed to prevent future accidents of this type.

UES obtained soil samples from the the path of runoff and on each side to assure all petroleum affected soils had been removed. All soil screening activities were performed in accordance with the criteria established in Florida Administrative Code, Chapter 17-770.200. Excessively contaminated and contaminated soils were removed and stockpiled in a truck and placed in a covered area for later removal to a thermal treatment facility, after preburn analyses was accomplished. This report discusses the findings of these investigative activities.

## Discharge Source/Soil Removal Activities

On September 1, 1993, during the routine fueling of a small transporter, a hose utilized to deliver the fuel from an aboveground tank to the transporter ruptured and approximately 35 gallons of virgin diesel was released before the valve could be shut off. A large portion of this diesel was trapped in the outer skirt of the transporter tank and was latter recovered and placed back into the aboveground diesel tank. A portion of the spill, approximately 20 gallons spilled onto the asphalt the transporter was parked on and migrated downhill on the asphalt to the north. A Discharge Reporting Form for the incident is presented in Attachment A.

Whetstone Oil Company, upon learning of the spill within 2 hours, placed clean sand on top of the diesel on the asphalt. This sand was allowed to absorb the diesel and was placed the same day into a small dump truck and placed in a covered barn to prevent runoff.

## Preburn Analyses/Soil Disposal

On September 17, 1993, a UES hydrogeologist observed the soil on the truck and obtained one composite soil sample for E.P.A. Method 8010/8020/9073 and the 8-RCRA Metals. This soil sample was obtained and analyzed under UES 's approved Comprehensive QA Plan No.



**UNIFIED**  
**ENVIRONMENTAL SERVICES, INC.**



920085G. Results of the soil analyses is presented in Attachment B and analytes typically observed in diesel were detected.

On October 29, 1993, the transportation and disposal of 3.05 tons of petroleum affected soils was performed. These soils were transported to C.A. Meyer in Orlando, Florida for thermal destruction. A copy of the soil manifest is provided in Attachment C.

### Soil Screening Activities

On September 17, 1993, UES performed seven soil borings with screening accomplished with a calibrated Foxboro Model 108, Organic Vapor Analyzer (OVA). During use of the OVA, both an activated charcoal and particle filter were placed over the pump intake to discern between the presence of hydrocarbons and methane gases. The soil borings were accomplished with a 2.75 inch diameter, stainless steel hand auger. Decontamination was accomplished with a soap/water mixture followed by a cleanwater rinse. Figure 1 also presents the locations of the soil borings and Table 1 presents a summary of the soil screening results.

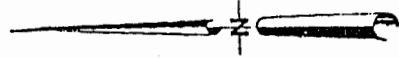
As seen by Table 1, all soils screened exhibited less than 10 parts per million (ppm) to a depth of approximately 3 feet, where limestone was encountered. The cleanup activities performed by Whetstone Oil Company appear to have been effective.

### Groundwater Quality

An adjacent compliance well located along the northeast corner of the underground tank area is poorly constructed and located in an area where surface runoff may enter the well. This well was previously sampled by UES on August 13, 1993, for E.P.A. Method 602 and 610 analytes. Five well volumes of groundwater was removed from the well with a 1.5 inch diameter, stainless steel bailer, in accordance with the criteria established in UES 's approved Comprehensive Quality Assurance Plan No. 920085G.

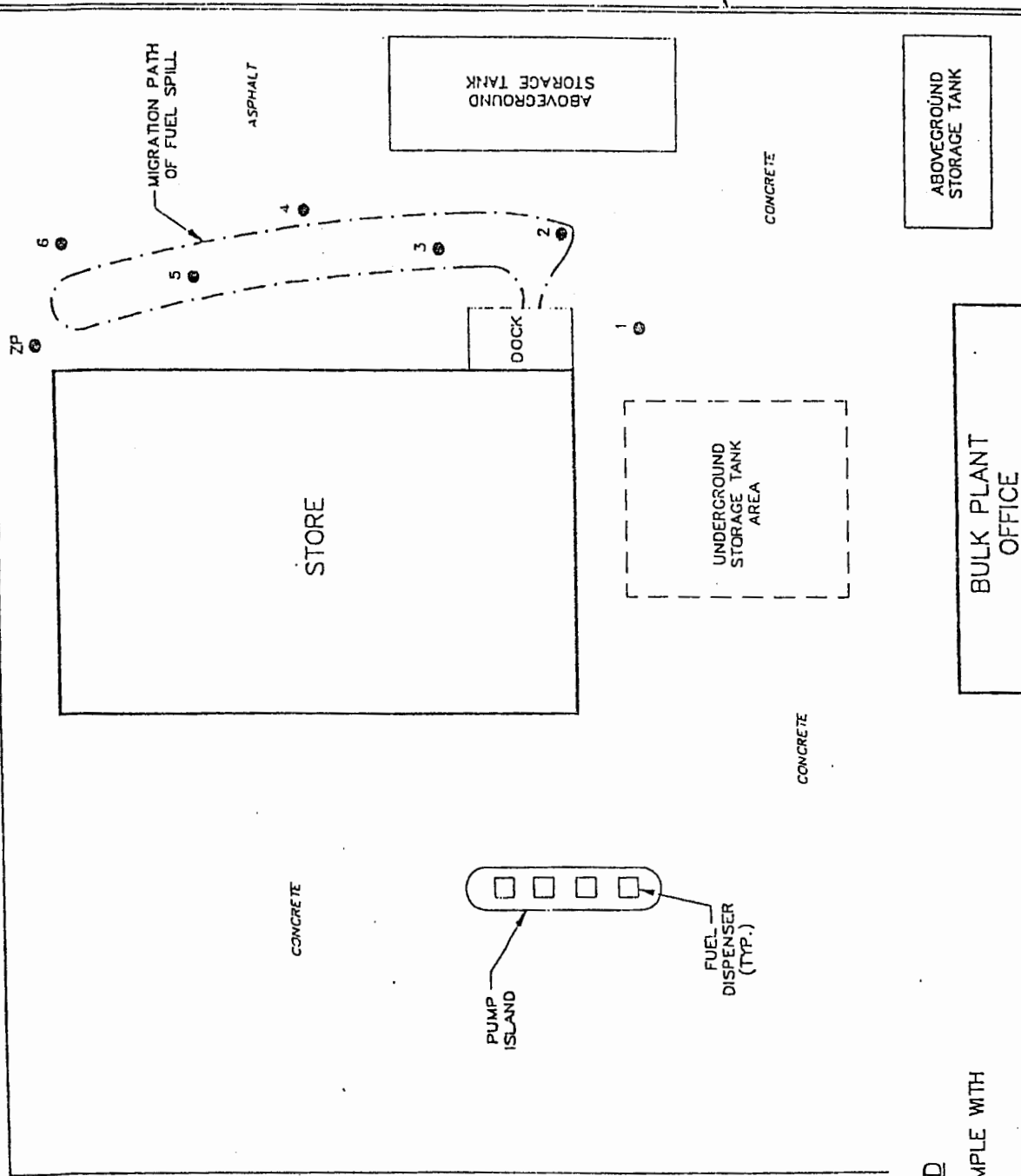
Results of the groundwater samples are presented in Appendix D. As seen by the laboratory analytical reports, this well exhibited benzene and Total Volatile Organic Aromatics and Naphthalene in excess of the State of Florida's criteria.

Due to the poor construction and upon approval from the Citrus County/F.D.E.P. representative this well was abandoned by a State of Florida water well driller. A copy of the abandonment report for this well is provided in Appendix E.



U.S. HIGHWAY 19 NORTH

Scale: N.T.S.



LEGEND

- SOIL BORING/SAMPLE WITH OVA SCREEN

**SITE PLAN**  
 WHETSTONE OIL COMPANY  
 CRYSTAL RIVER FINA  
 1017 U.S. HIGHWAY 19  
 CRYSTAL RIVER, FLORIDA

Figure : 1
Project No. : 93-0095
Date : 9/28/93
Drawn By : ECW
Checked By : WKM

**UNIFIED ENVIRONMENTAL SERVICES, INC.**



Table 1

Crystal River Fina  
1017 U.S Highway 19  
Crystal River, Florida

SUMMARY OF SOIL SCREENING RESULTS  
parts per million

<u>Sample No.</u>	<u>Depth</u>	<u>Hydrocarbon</u>	<u>Methane</u>
1	0-3	~5	<1
2	0-3	<5	<1
3	0-3	~8	<1
4	0-3	~8	<10
5	0-3	<10	<1
6	0-3	<10	<1
7	0-3	<10	<1

Note: All results are expressed in parts per million. Methane values have been removed from the hydrocarbon values. Depth is given in feet.

**Site No. 62 Exxon #5132 - Crystal River/Exxon Car Wash (aka White Rose  
Cleaners)**





SOUTHWEST DISTRICT  
STORAGE TANKS PROGRAM

## SITE INSPECTION REPORT

DATE: 11/2/00

FACILITY ID# 8503053

NAME OF SITE: EXXON 5132

SITE ADDRESS/LOCATION: 800US 19

CITY: CRYSTAL RIVER COUNTY: CITRUS

REASON FOR VISIT: Received letter + registration form from EL Williams requesting that the tanks be placed out of service.

PERSONS CONTACTED: NANCY KNIGHT

PERSONS PRESENT: C. MARK SUMNER

SUMMARY REPORT: All 4 (four) USTs were stuck to see if the product had been removed so that the out of service requirements could be met.

RESULTS = PLUS unleaded has 4  $\frac{1}{8}$  inches.

PREMIUM UL has 2  $\frac{1}{2}$  inches.

Regular unleaded has 3  $\frac{1}{2}$  inches.

CONVERSATION RECORD: Diesel has 4  $\frac{1}{2}$  inches.

for tanks to be out of service they must be empty "this means no more than one inch in depth of regulated substance remains"

OTHER ACTION REQUIRED: Tanks must be emptied

SIGNED: Mark Sumner

TITLE: E. S. II



**Storage Tank Facility Compliance Inspection Report**

Facility ID 8503053 County 09 CITRUS Inspection Date 9/20/00  
 Facility Name EXXON 5132 CRISTAL RIVER Facility Type A-RETAIL  
 Latitude 28°53'21" Longitude 82°35'06" L/L Method AGPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>4</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

\* "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>400(2)(a)6</u>	<u>The 2000/2001 placard is not displayed at the facility.</u>	
<u>510(1)(b)1</u>	<u>The shear valves are not securely mounted.</u>	
<u>510(1)(c)</u>	<u>It is unknown if a closure assessment was performed when system was upgraded.</u>	
<u>510(2)(d)</u>	<u>The dip boot on the premium line is torn and portions of the STPS are in contact with the soil and therefore not protected from corrosion.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: CIT Effective Date: 4/15/00 Expiration Date: 4/15/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

Yes   
  No   
  CWOE - Compliance without Enforcement

<u>CITRUS CNTY ENV. HEALTH</u>	<u>352-527-5295</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u>	
Inspector Name - Please Print	Facility Representative Name - Please Print
<u>Mark SUMNER 9/20/00</u>	<u>No Representative Available</u>
Inspector Signature & Date	Facility Representative Signature & Date

Facility Name: EXXON 5132 Facility ID: 8503053 Date: 9/20/00

Rule Cite 62-761 Description / Inspector's Comments

1.	<u>600(1)(b)</u>	IT IS UNKNOWN IF AN R D R L HAS BEEN DEVELOPED FOR THIS SYSTEM.
2.	<u>640(3)(b)</u>	IT IS UNKNOWN IF INVENTORY CONTROL IS MAINTAINED FOR THIS SINGLE WALLED VEHICULAR SYSTEM.
3.	<u>610(1)(a)</u>	IT IS UNKNOWN IF THE CATEGORY A SYSTEM HAS RELEASE DETECTION AND THAT THE METHOD MEETS ITS PERFORMANCE STANDARD.
3.	<u>600(2)(a)</u>	IT IS UNKNOWN IF THE UST SYSTEM HAS RELEASE DETECTION AS NO RECORDS WERE AVAILABLE AT THE TIME OF THE INSPECTION.
4.	<u>640(3)(d)</u>	IT IS UNKNOWN IF THE MECHANICAL LINE LEAK DETECTORS THAT ARE CONNECTED TO SINGLE WALLED PRESSURIZED PIPING IN CONTACT WITH SOIL HAVE BEEN TESTED ANNUALLY AS REQUIRED.
70	<u>710(1)</u>	RELEASE DETECTION RECORDS WERE NOT MADE AVAILABLE WITHIN 5 WORKING DAYS.
185	<u>800(4)(a) &amp; (b)</u>	IT IS UNKNOWN IF A CLOSURE ASSESSMENT WAS PERFORMED FOR THE REMOVAL OF THE USED OIL TANK ON 4-22-99.
196	<u>800(4)(d)</u>	A CLOSURE ASSESSMENT HAS NOT BEEN SUBMITTED FOR THE USED OIL TANK WITHIN 60 DAYS OF THE CLOSURE ACTIVITY AS REQUIRED.

Facility Name: EXXON 5132 Facility ID: 8503053 Date: 9/20/00

Findings

Description / Inspector's Comments

<u>Findings</u>	<u>Description / Inspector's Comments</u>
<p>Comments.</p> <p>Observations</p>	<p>The 4 STPs are equipped with mechanical line leak detectors, and the soil had been excavated from around them. The soil has <del>been</del> piled in around the excavation and portions of the 4 STPs are now in contact with the soil. The swing joints have had zip boots installed to protect them from corrosion, however the boot is torn on the premium pipe.</p>
	<p>The 4 fill boxes are all equipped with spill buckets and have been painted as per API 1637. The paint has faded and it is recommended to repaint the fills as per API 1637.</p>
	<p>Tank levels at the time of inspection</p>
	<p>① Diesel 46 <math>\frac{3}{8}</math> inches.</p>
	<p>② Regular UL 3 <math>\frac{3}{4}</math> inches.</p>
	<p>③ Premium UL 28 <math>\frac{5}{8}</math> inches.</p>
	<p>④ Plus UL 4 <math>\frac{1}{8}</math> inches.</p>
	<p>The 4 monitor wells were bailed results were                  SE well 3' 10" TO water NO sheen or odor                  NW well 3' 10" TO water NO sheen or odor                  SW well 3' 8" TO water NO sheen or odor                  NE well 3' 2" TO water NO sheen or odor</p>

Facility Name: EXXON 5132

Facility ID: 8503053

Date: 9/20/00

Rule/Cite	Description / Inspector's Comments
<p>Comments &amp; Observations:</p>	<p>Diesel Dispenser has 18-20 inches of Diesel in the dispenser lines, however no leaks were observed at the time of this inspection. Remove the liquid from the lines, and check for any leaks when system is put back into <del>service</del> service. The shear valve is installed and mounted properly.</p>
	<p># 3/4 Gas Dispenser. has a dry liner, but all 3 shear valves are not tightly mounted</p>
	<p># 1/2 Gas Dispenser has a dry liner, but all three shear valves are not tightly mounted.</p>
	<p>The facility was closed at the time of the inspection, but the <del>the</del> tanks have not been registered as Temporarily out of service nor do they meet out of service requirements.</p>



**E.L. WILLIAMS, INC.**

1212 W. Livingston St.  
Orlando, FL 32805  
(407) 422-2437

DATE: February 13, 1997

**FAX TRANSMISSION HEADER**

TO: David Christen

FROM: James Williams

NUMBER OF PAGES SENT: 24  
(INCLUDING THIS PAGE)

IF PROBLEMS OCCUR AT RECEIVING END PLEASE CALL: 407-422-2437

L. WILLIAMS, INC. (ORLANDO) FAX #407-841-2652

MESSAGE:

*C. R. EXON  
098503053*

MONITORING WELL SAMPLING REPORT

6

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center

800 US 119, Crystal River, FL

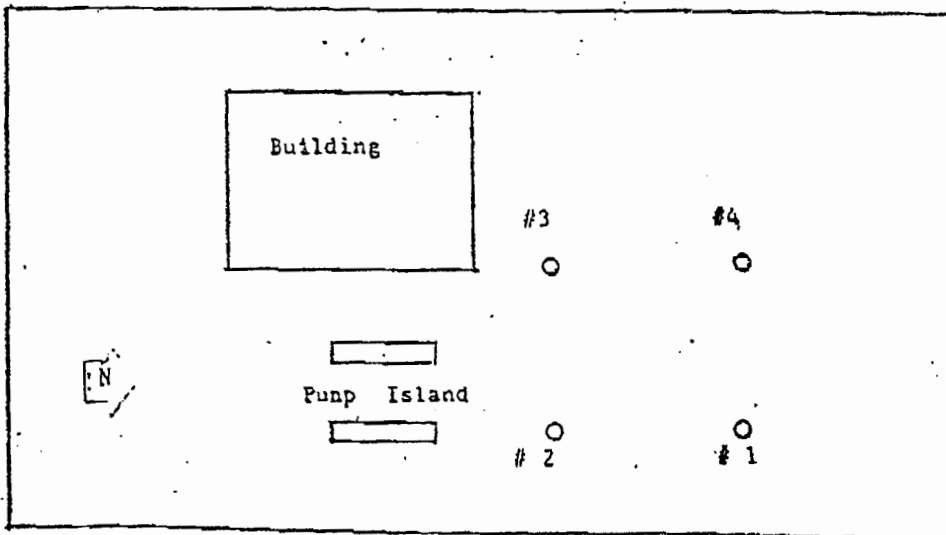
OWNER: Williams Oil

Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 1-29-95 TIME: 11:15

RESULTS WELL 1 WELL 2 WELL 3 WELL 4 WELL 5 WELL 6 WELL 7

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'8"	4'9"	4'9"	4'4"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	70 PPM	0 PPM	0 PPM	0 PPM			
SAMPLE COLLECTED	-	-	-	-			



US 19 South

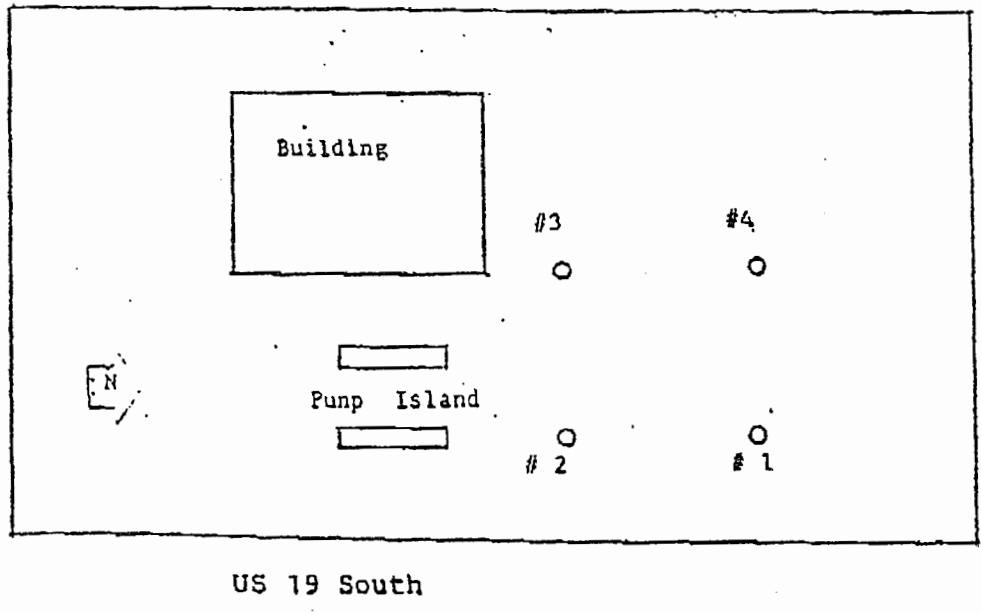
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 2-19-95 TIME: 2:15

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'7"	4'8"	4'8"	4'4"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	72 PPM	0 PPM	0 PPM	0 PPM			
SAMPLE COLLECTED	-	-	-	-			





MONITORING WELL SAMPLING REPORT

6

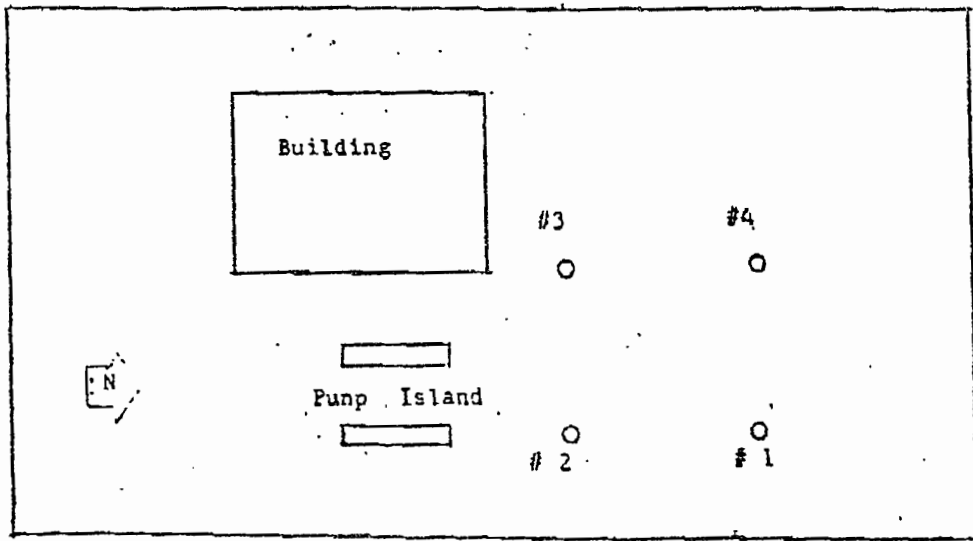
W. E. Moore  
7651 Havenford Ct.  
Orlando, FL 32818  
407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 3-28-95 TIME: 2:15

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 7 1/2"	4' 8"	4' 8"	4' 5"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	96 PPM	5 PPM	10 PPM	12 PPM			
SAMPLE COLLECTED	-	-	-	-			



US 19 South

11

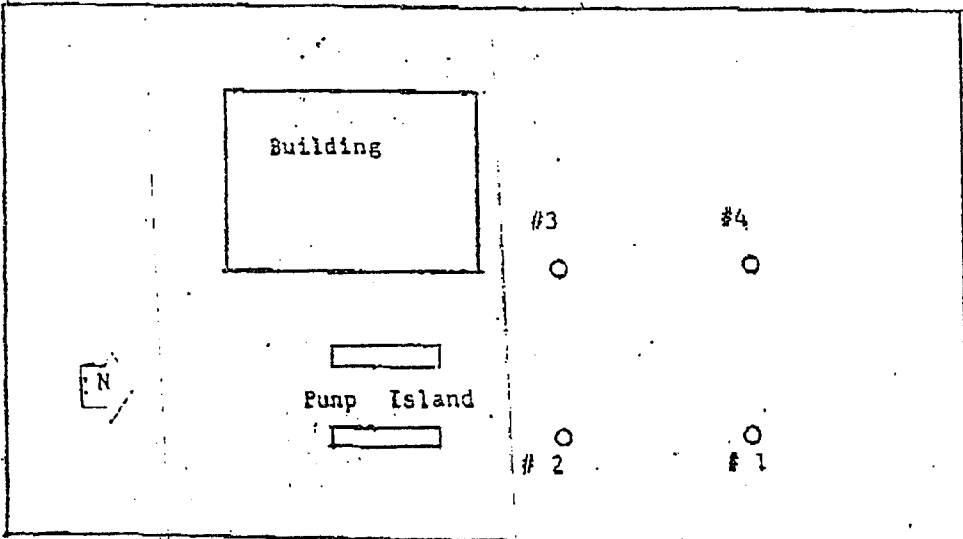
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 4-30-95 TIME: 1:50

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 8 1/2"	4' 9"	5' 2"	4' 7"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	130 PPM	20 PPM	10 PPM	14 PPM			
SAMPLE COLLECTED	-	-	-	-			



US 19 South,

MONITORING WELL SAMPLING REPORT

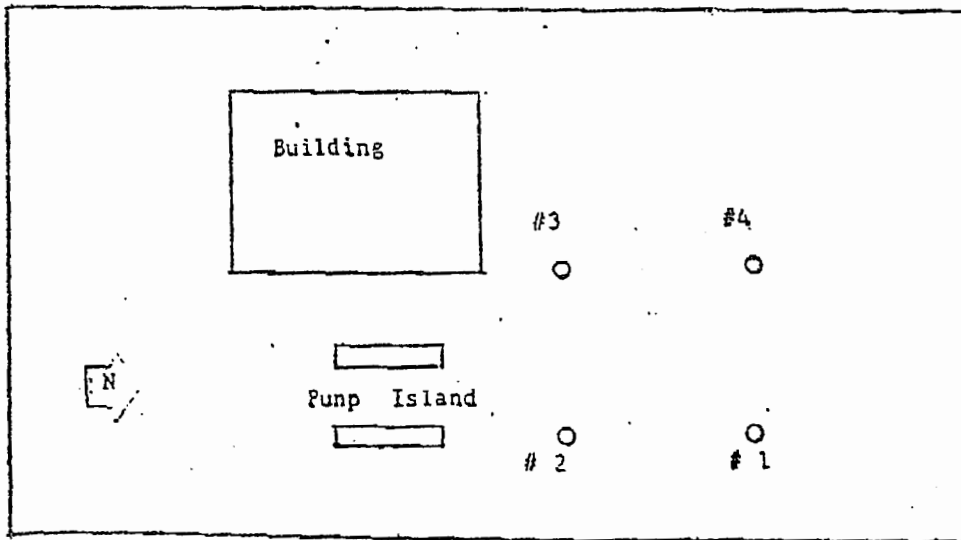
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 5-21-95 TIME: 2:30

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'4"	4'6"	4'9"	4'4"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	176 PPM	34 PPM	23 PPM	16 PPM			
SAMPLE COLLECTED	-	-	-	-			



US 19 South

7

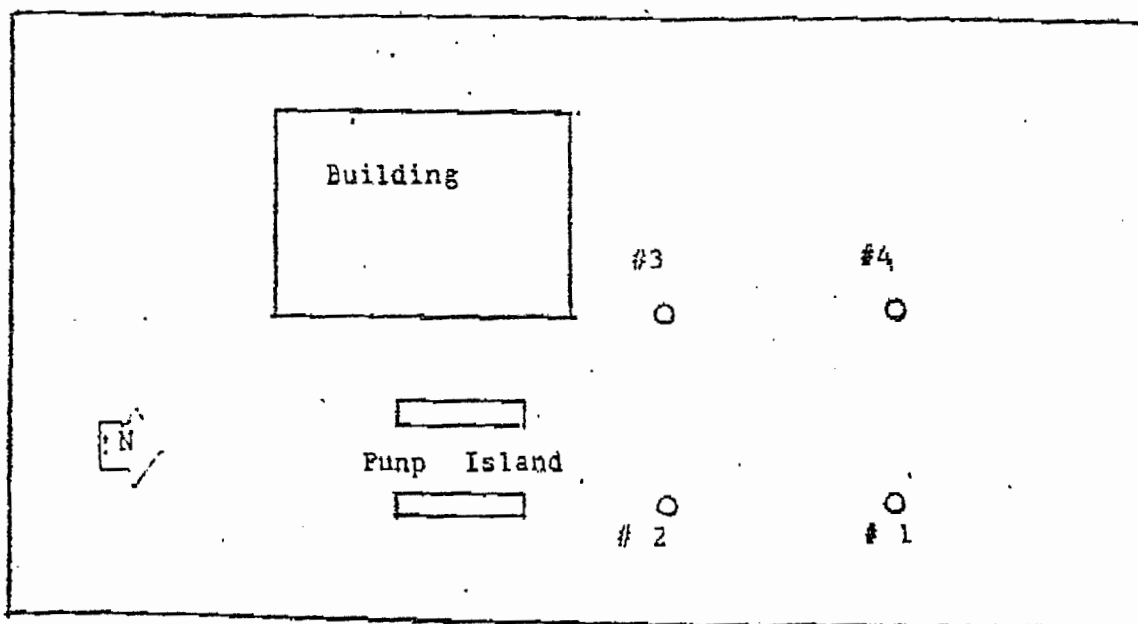
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 6-28-95 TIME: 2:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'2"	4'4"	4'8"	4'3"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	220 ppm	44 ppm	36 ppm	18.8 ppm			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

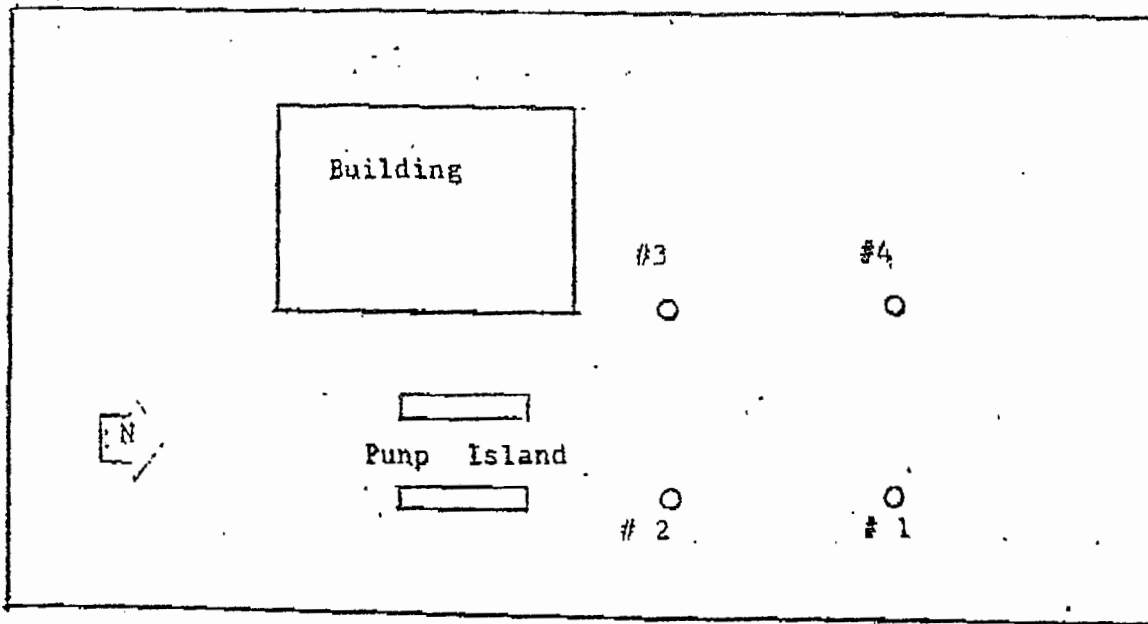
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 7-28-95 TIME: 11:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'2"	4'4"	4'6"	4'3"			
APPEARANCE	good	good	good	good			
PRODUCT DETECTION	26 PPM	18 PPM	16 PPM	9 PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

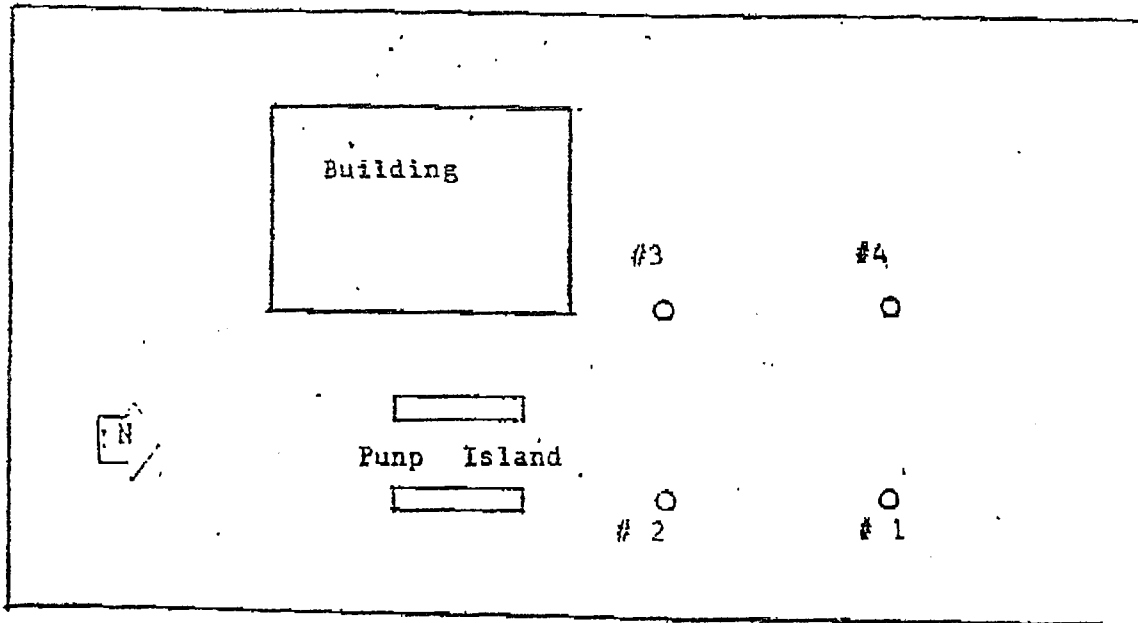
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 8-30-95 TIME: 10:50

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 2 1/2"	4' 4"	4' 4"	4' 3"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	22 PPM	15.8 PPM	11 PPM	5 PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

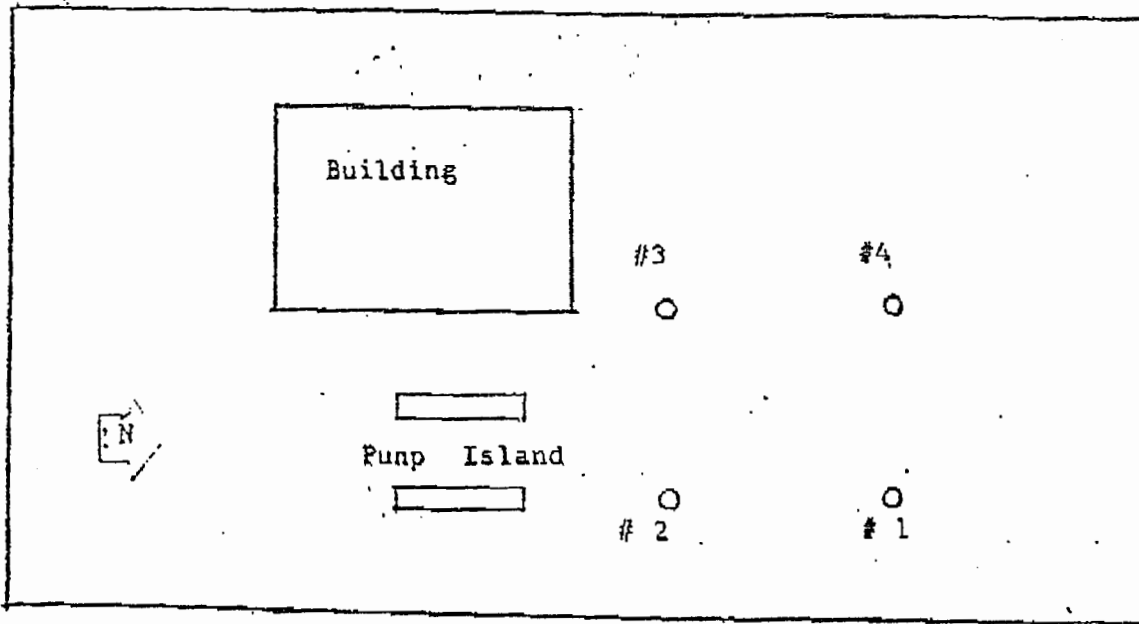
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 10-30-95 TIME: 1:30

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	3' 11"	4' 9"	5' 1"	4' 7"			
APPEARANCE	good	good	good	good			
PRODUCT DETECTION	22 PPM 0	8.8 PPM	10 PPM	9.6 PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

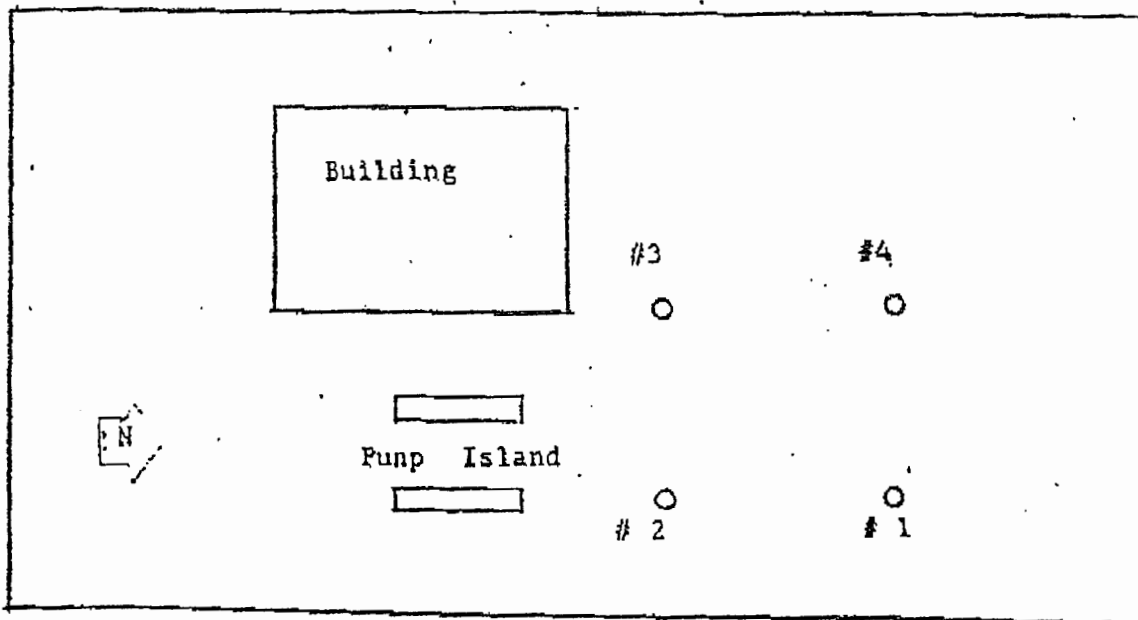
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 11-26-95 TIME: 12:15

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	3'10"	4'11"	5'3"	4'9"			
APPEARANCE	Good	-	-	-			
PRODUCT DETECTION	24 PPM	9 PPM	20 PPM	10 PPM			
SAMPLE COLLECTED							



US 19 South



MONITORING WELL SAMPLING REPORT

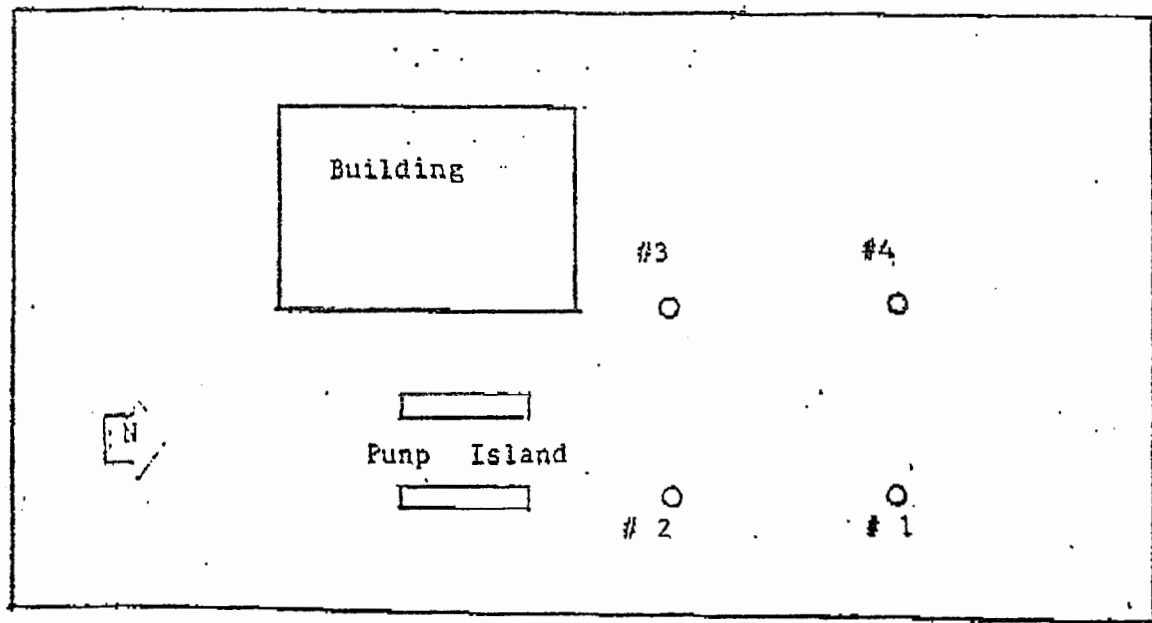
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 12-31-95 TIME: 1:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 4"	4' 6"	4' 4"	4' 6"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	15 PPM	18 PPM	4 PPM	6 PPM			
SAMPLE COLLECTED	-	-	-	-			



US 19 South

MONITORING WELL SAMPLING REPORT

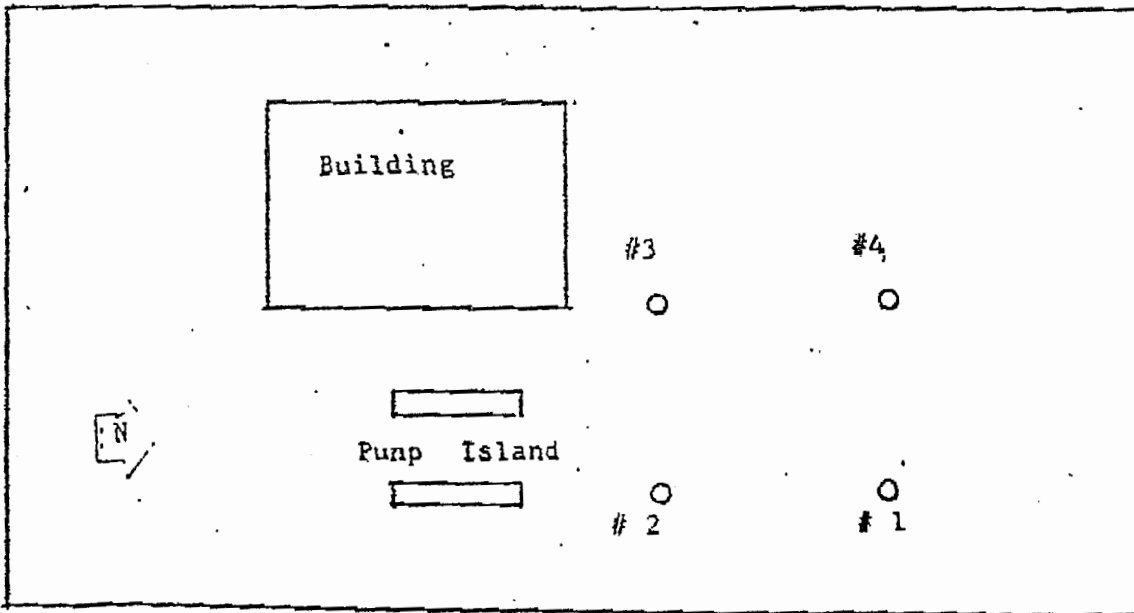
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 1-28-96 TIME: 3:43

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 9"	4' 11"	4' 11"	4' 11"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	6 ppm	34 ppm	0 ppm	0 ppm			
SAMPLE COLLECTED							



US 19 South

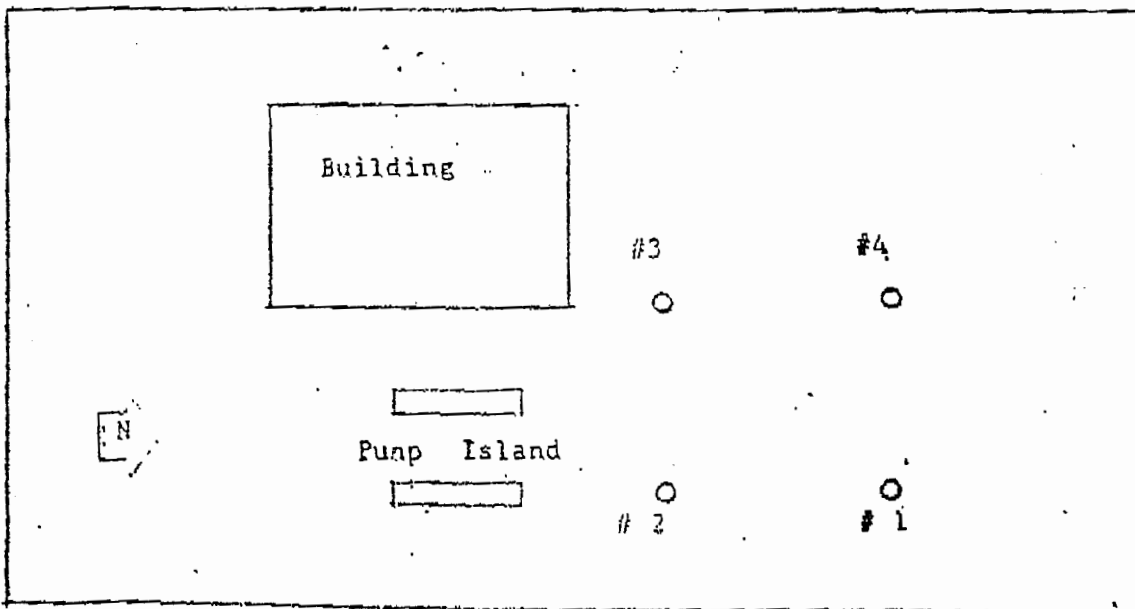
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 2-29-96 TIME: 5:40

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 8"	4' 10"	5'	4' 10"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	6.5 PPM	5 PPM	4 PPM	4.1 PPM			
SAMPLE COLLECTED							



US 19 South

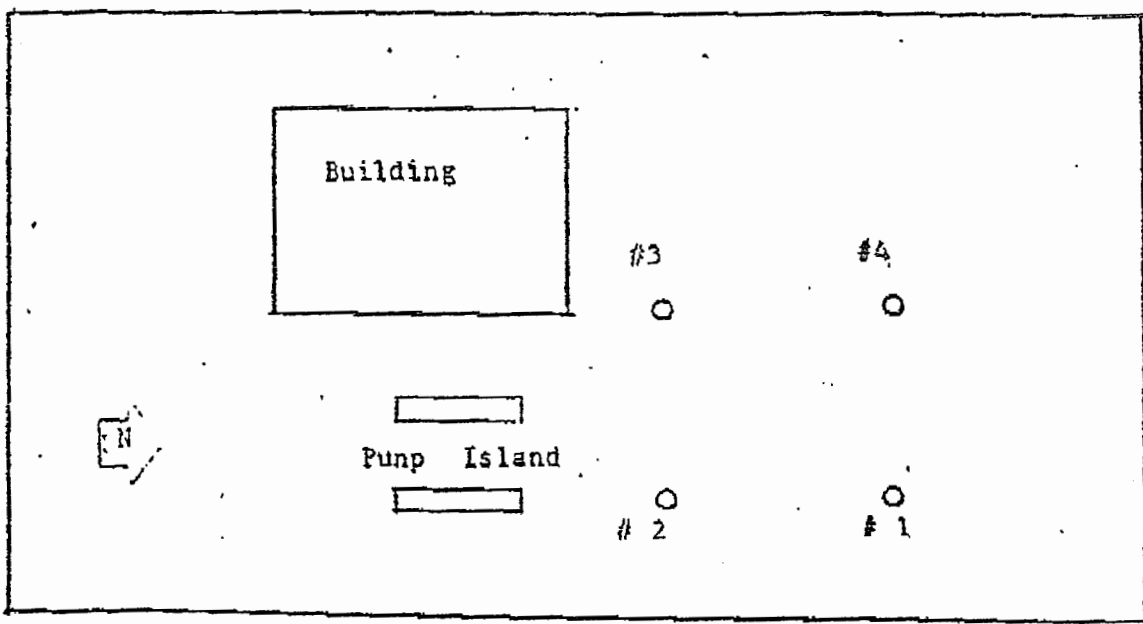
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 3-26-96 TIME: 12:14

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 7"	4' 9"	5' 3"	4' 9"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	6.6 ppm	4.8 ppm	6.4 ppm	6.3 ppm			
SAMPLE COLLECTED							



US 19 South

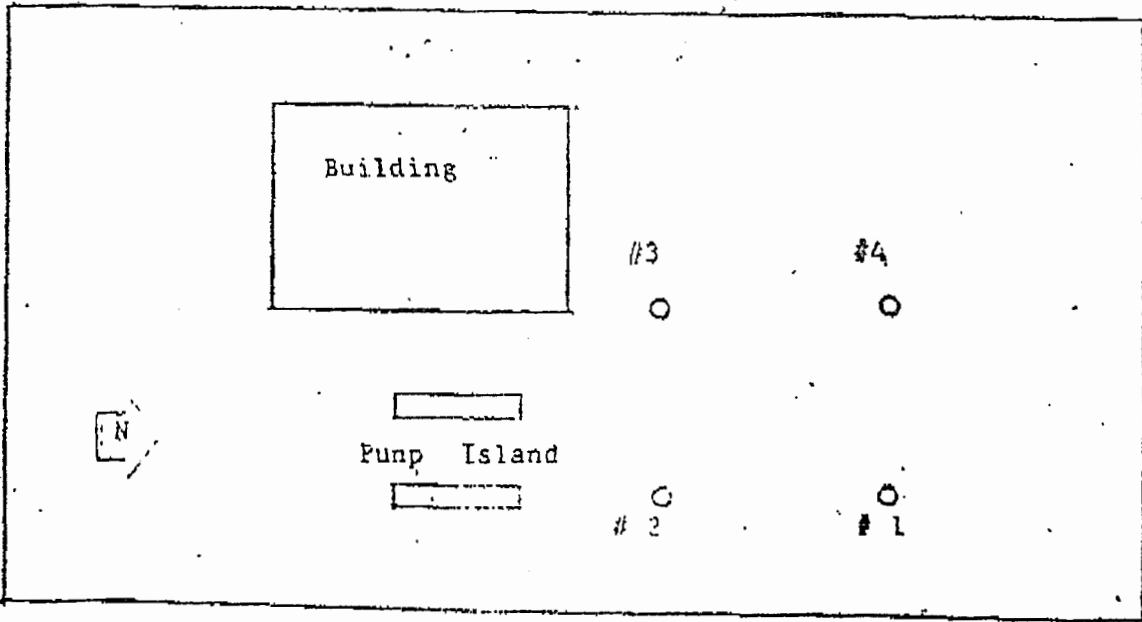
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 4-29-96 TIME: 12:50

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 6"	4' 8"	5' 3"	4' 8"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	6.9 PPM	4.8 PPM	6 PPM	6.5 PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

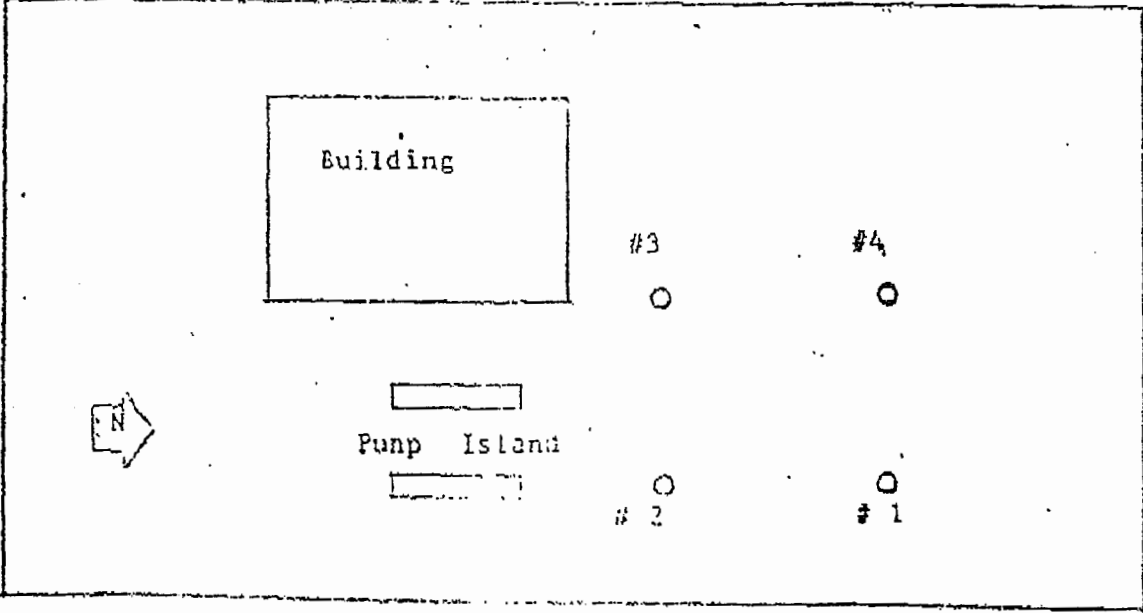
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 5-31-74 TIME: 3:00

RESULTS      WELL 1      WELL 2      WELL 3      WELL 4      WELL 5      WELL 6      WELL 7

WELL WATER LEVEL	4' 7"	4' 8"	4' 8" <del>5' 9"</del>	4' 8"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	<del>0</del>	<del>0</del>	<del>0</del>	<del>0</del>			
SAMPLE COLLECTED							



US 19 South

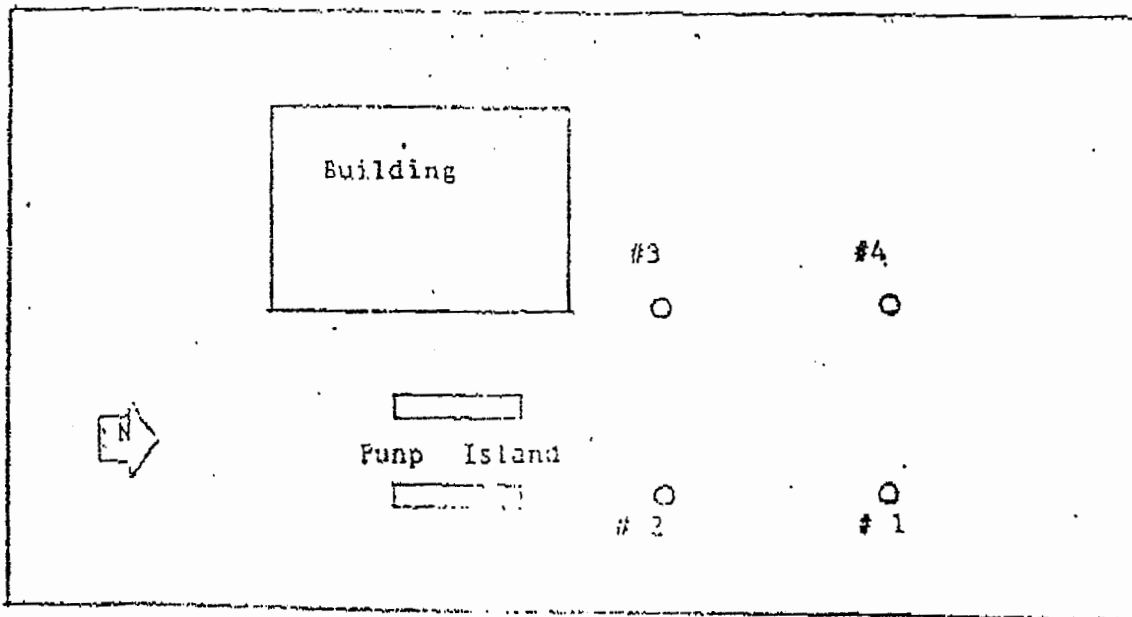
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 5-31-76 TIME: 3:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 7"	4' 8"	4' 8" <del>5' 9"</del>	4' 8"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	<del>0</del>	<del>0</del>	<del>0</del>	<del>0</del>			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

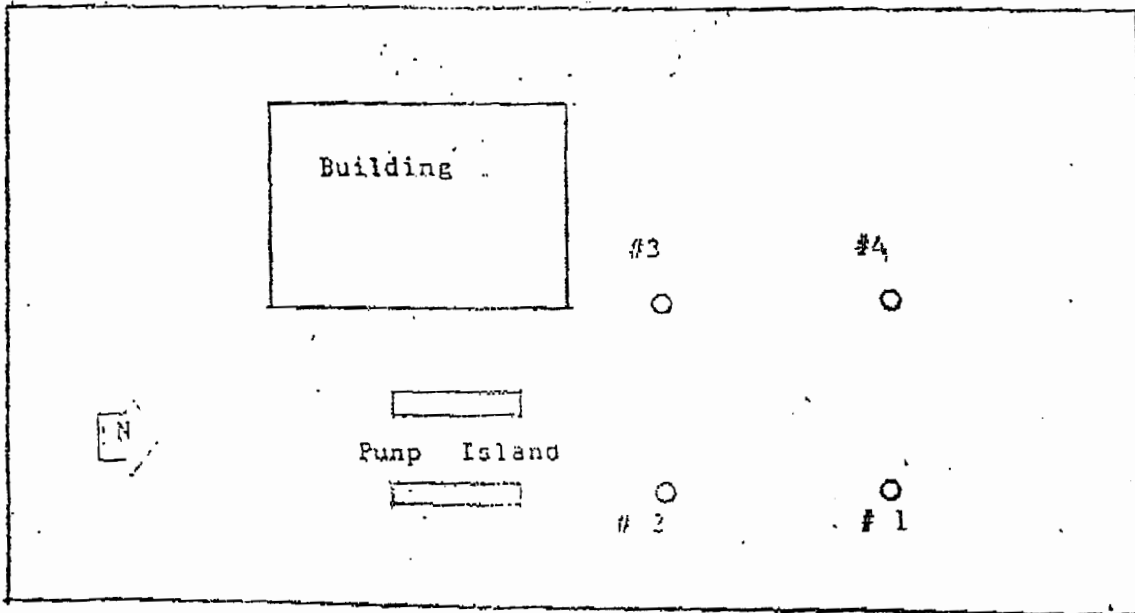
LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 6-30-96 TIME: 3:45

RESULTS WELL 1 WELL 2 WELL 3 WELL 4 WELL 5 WELL 6 WELL 7

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4' 7"	4' 7"	5' 2"	4' 10"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	Open	Open	Open	Open			
SAMPLE COLLECTED							



US 19 South



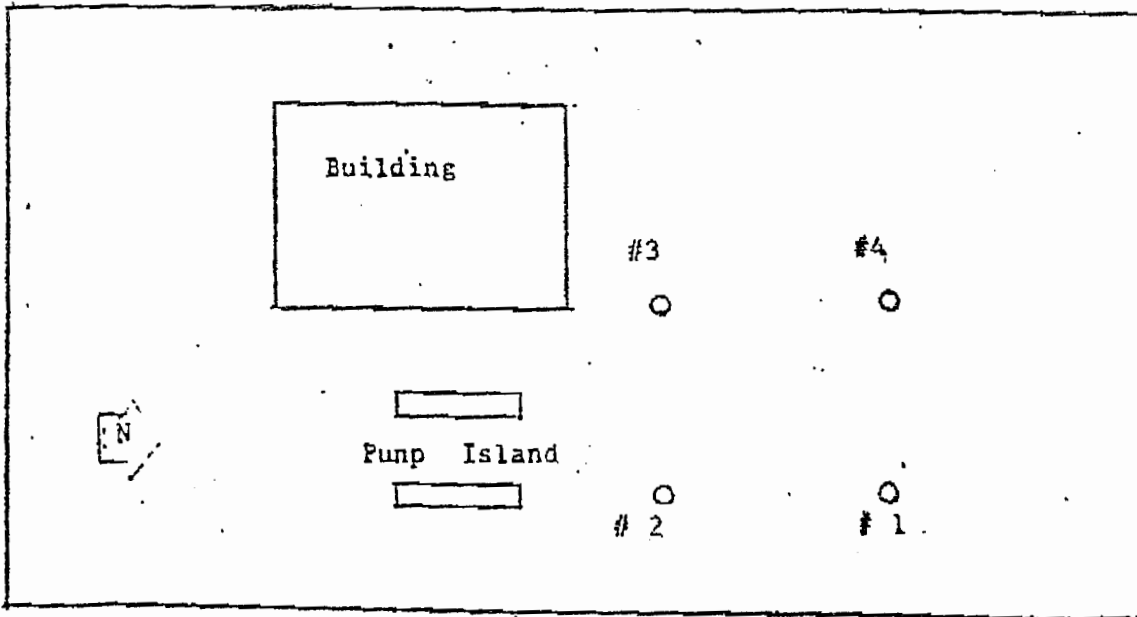
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 7-29-96 TIME: 4:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'8"	4'8"	5'3"	4'11"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	⊖	⊖	⊖	⊖			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

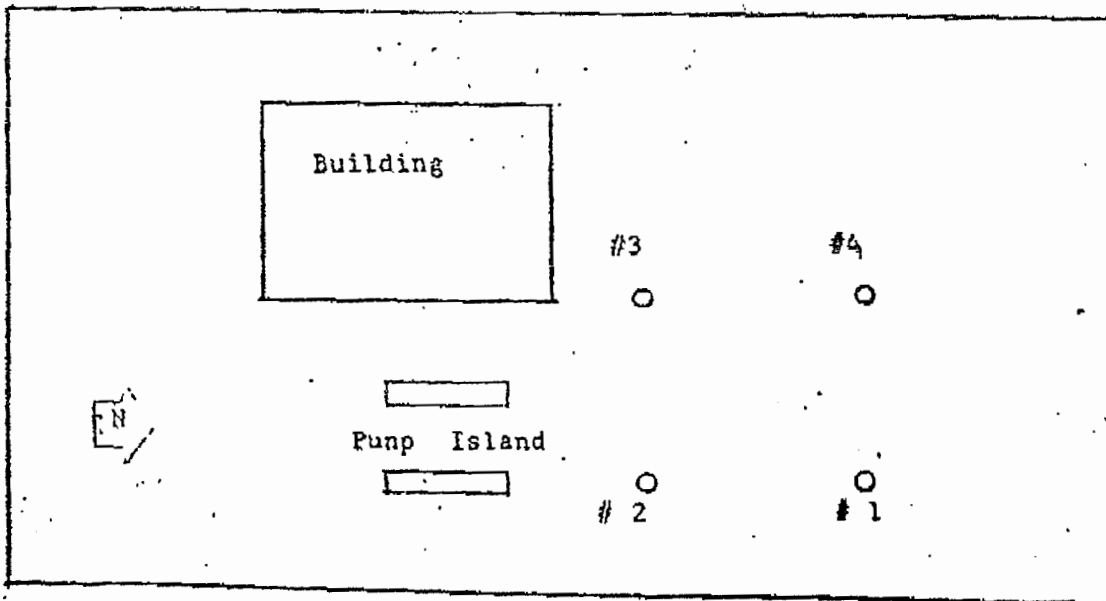
W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 8-29-96 TIME: 11:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'7"	4'8"	4'8"	4'8"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	0 PPM	0 PPM	0 PPM	0 PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center

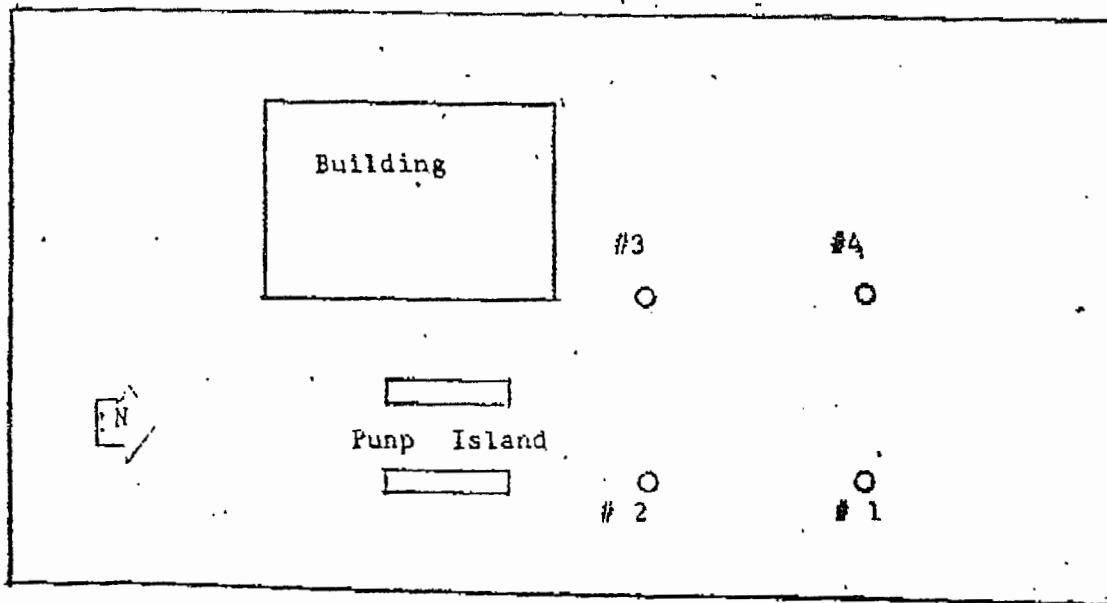
800 US 119, Crystal River, FL

OWNER: Williams Oil

Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 9-30-96 TIME: 1:30

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'6"	4'7"	4'7"	4'6"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	0 PPM	0 PPM	0 PPM	0 PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

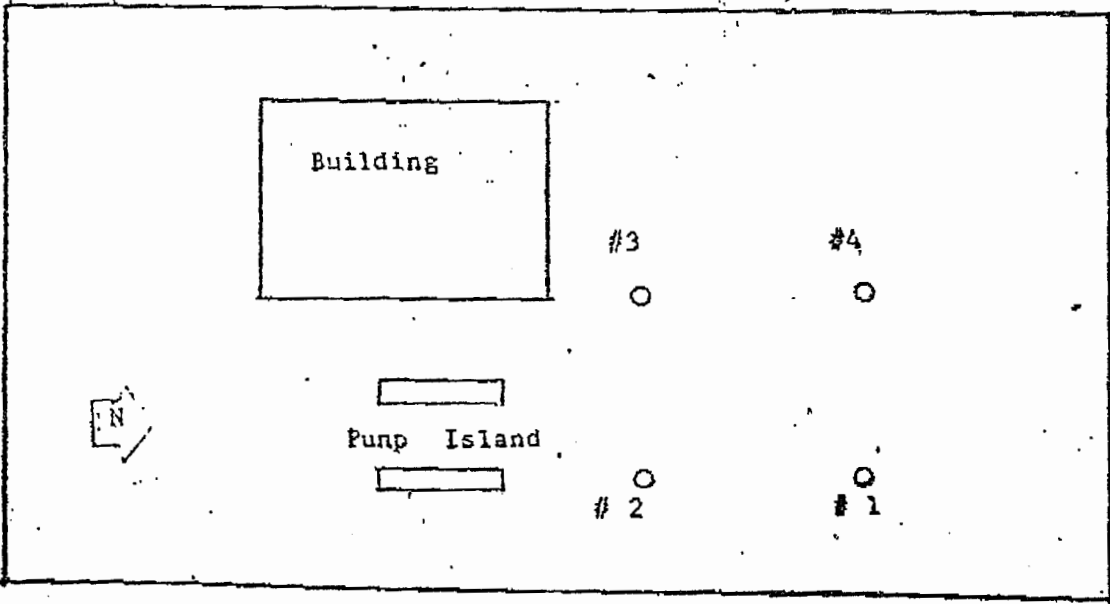
6

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 10-30-96 TIME: 10:30

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'7"	4'8"	4'8"	4'7"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	0PPM	0PPM	0PPM	0PPM			
SAMPLE COLLECTED							



US 19 South

MONITORING WELL SAMPLING REPORT

12/29/96

W. E. Moore  
7651 Havenford Ct.  
Orlando, FL 32818  
407-292-6799

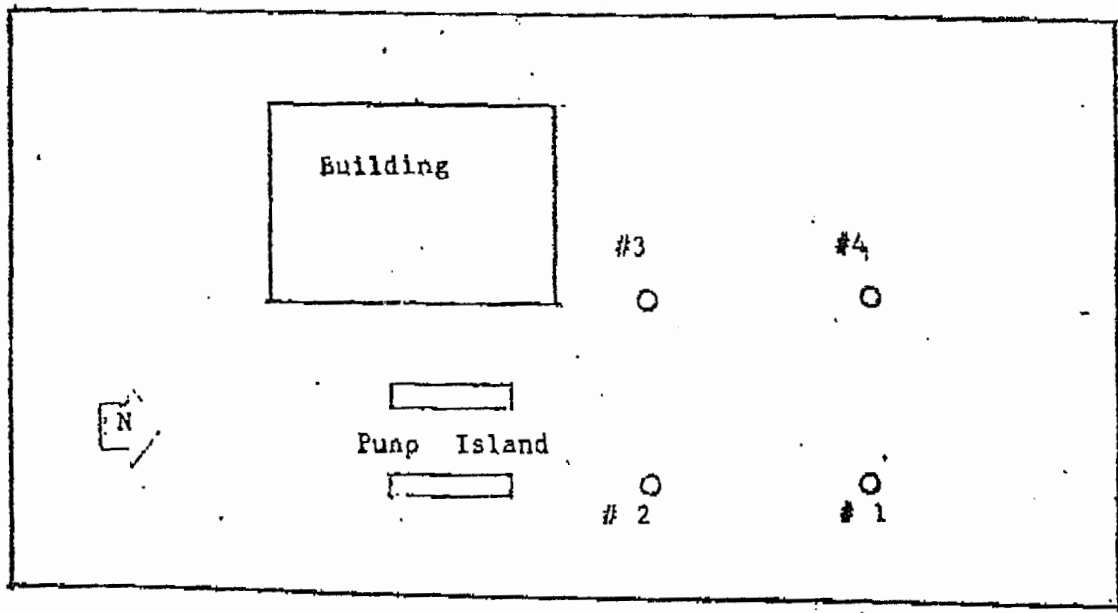
LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL

OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

SAMPLE DATE: 11-29-96 TIME: 4:00

RESULTS WELL 1 WELL 2 WELL 3 WELL 4 WELL 5 WELL 6 WELL 7

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'6"	4'7"	4'7"	4'6"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	0 PPM	0 PPM	0 PPM	0 PPM			
SAMPLE COLLECTED							



US 19 South

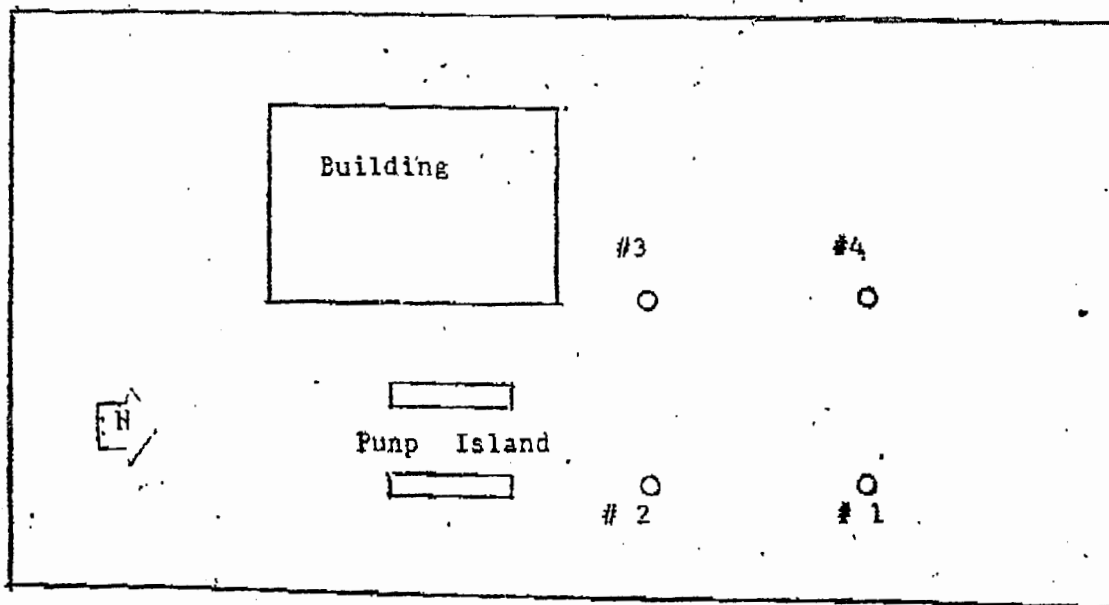
MONITORING WELL SAMPLING REPORT

W. E. Moore  
 7651 Havenford Ct.  
 Orlando, FL 32818  
 407-292-6799

LOCATION: Exxon Service Center  
800 US 119, Crystal River, FL  
 OWNER: Williams Oil  
Sleepy Hollow Rd., Leesburg, FL

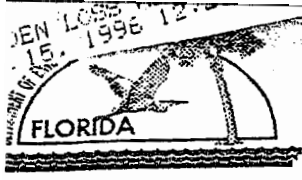
SAMPLE DATE: 12-30-96 TIME: 3:00

RESULTS	WELL 1	WELL 2	WELL 3	WELL 4	WELL 5	WELL 6	WELL 7
WELL WATER LEVEL	4'5"	4'6"	4'6"	4'5"			
APPEARANCE	Good	Good	Good	Good			
PRODUCT DETECTION	0 PPM	0 PPM	0 PPM	0 PPM			
SAMPLE COLLECTED							



US 19 South

**Site No. 64 Texaco #24-203-0051**  
310 SE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503151  
EPA I.D. No. FLD984174227



### Storage Tank Facility Compliance Inspection Report

Facility ID 8503151 County 09 CITRUS Inspection Date 12/5/2000  
 Facility Name TEXACO #24-203-0051 Facility Type A-RETAIL  
 Latitude 28°53'34" Longitude 82°35'04" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>4</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>62-761</u>		
<u>820(1)(a)(b)(c)</u>	Records were not available for the investigation and results for the PLLD shutdown for Q1 11/13/2000, 11/7/2000, + 10/18/2000. for Q2 11/13/2000, + 7/13/2000, Q3 11/13/2000, Q4 11/29/2000, 8/11/2000, + 8/5/2000	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: C + E Effective Date: 1/1/00 Expiration Date: 1/1/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Chris FOLKAY</u> Facility Representative Name - Please Print
<u>Mark Su</u> <u>12/5/2000</u> Inspector Signature & Date	<u>[Signature]</u> <u>12/5/00</u> Facility Representative Signature & Date



Facility Name: TEXACO 242030051 Facility ID: 8503151 Date: 12/5/00

<u>Remarks</u>	<u>Description / Inspector's Comments</u>
Comments.	Release detection is a Veevaer root
	TLS 350 CSLD ATG (An alarm history
	report is attached in file). The single
	walled pipe is tested by PLC's
	continuously. (please provide records
	for the investigations for failed PLC
	tests)
	Monthly visual checks of the disposal
	lines are done by EnviroTrac, and
	conditions are noted on their report.
	Swing Joints are cathodically protected
	last structure to soil potential test
	done 4/24/2000 by TANKNOLOGY next
	test due 4/24/2001.
	The monitor wells are still open as part
	of assessment for site rehabilitation.
	All 4 Disposal lines were dry.
	2000/2001 placard + RDRL are on display
	at the facility.

This data is current as of: 06-NOV-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

Facility Information

ID#: 8503151	District: SWD
Name: TEXACO #24-203-0051	County: Citrus
310 Se Hwy Us 19	Type: Retail Station
Crystal River, FL 32629	Status: Open
Contact: George Johnston	Latitude: 28:53:34.0000
Phone: 407-263-7005	Longitude: 82:35:04.0000
TONY Attwell	LL Method: AGPS
813-971-2693	

Account Owner Information

Name: Motiva Enterprises Llc  
 650 S North Lake Blvd #450  
 Attn: Catherine Fields  
 Altamonte Springs, FL 32701  
 Phone: 407-263-7029

Tank Owner Information

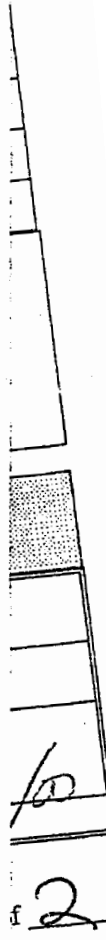
Name: Motiva Enterprises Llc  
 650 S North Lake Blvd #450  
 Attn: Catherine Fields  
 Altamonte Springs, FL 32701  
 Phone: 407-263-7029

Tank # Size Content Installed Placement Status Const Pipe Monitor

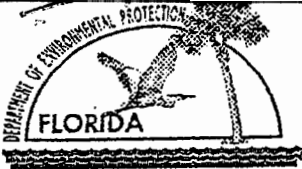
1	10000	Unleaded Gas	07/01/1983	UNDER	U	A E M O	C K E J	G L 4
2	10000	Unleaded Gas	07/01/1983	UNDER	U	A E M O	C K E J	G L 4
3	10000	Unleaded Gas	07/01/1983	UNDER	U	A E M O	C K E J	G L 4
4	10000	Vehicular Diesel	07/01/1983	UNDER	U	A E M O	C K E J	G L 4
5	550	Waste Oil	07/01/1965	UNDER	B			

*CMS*

Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).



**Site No. 65 Texaco #24-203-1357**  
59 SE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503064



### Storage Tank Facility Compliance Inspection Report

Facility ID 8503064 County 09 CITRUS Inspection Date 4/3/01

Facility Name TEXACO #24-203-1357 Facility Type A-RETAIL

Latitude 28°53'37" Longitude 82°35'03" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>2</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI		Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI	<input checked="" type="checkbox"/>	Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	3/30/01 ~20 gal of UL GAS WAS SPILLED during an over fill incident. Flapper valve shut off flow & the driver disconnected the hose and the fuel left in the hose was released to the parking lot concrete pad. When the manager arrived at 6:25am he found slean on the puddles from rain and used Absorbent Pats to clean up the liquid.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: Continental/Casualty Effective Date: 1/1/01 Expiration Date: 1/1/02

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C-MARK SUMNER</u> Inspector Name - Please Print	<u>Toni M. Atwell</u> Facility Representative Name - Please Print
<u>[Signature]</u> <u>4/3/01</u> Inspector Signature & Date	<u>[Signature]</u> <u>4/3/01</u> Facility Representative Signature & Date

Rule Cite	Description / Inspector's Comments
	The absorbent pads were wrapped in plastic and will be properly disposed of. * Please send the manifest for the proper disposal of the absorbent.*
	The <del>concrete</del> concrete area including the asphalt behind the vent was affected due to the rain. No slick was seen in the storm water run off on US 19.
	The clean up was handled by Envirotec. They arrived ~ 10:30 AM. Clean up took ~ 3 hours.
	At this <del>time</del> time 9:45 AM 4/3/2001 no product was seen at the area. No staining was seen on the concrete. The absorbent material was wrapped in plastic awaiting proper disposal.

This data is current as of: 04-APR-2001

Bureau of Petroleum Storage Systems  
Facility Inspection Cover Page

Facility Information

ID#: 8503064	District: SWD
Name: TEXACO STATION #101708	County: Citrus
59 Us 19 S	Type: Retail Station
Crystal River, FL 32629-4808	Status: Open
Contact: -- <i>N/A</i>	Latitude: 28:53:37.0000
Phone: --	Longitude: 82:35:03.0000
	LL AGPS
	Method: AGPS

*CMS*

Account Owner Information

Name: Motiva Enterprises Llc  
 650 S North Lake Blvd #450  
 Attn: Catherine Fields  
 Altamonte Springs, FL 32701  
 Phone: 407-654-6897

Tank Owner Information

Name: Motiva Enterprises Llc  
 650 S North Lake Blvd #450  
 Attn: Catherine Fields  
 Altamonte Springs, FL 32701  
 Phone: 407-654-6897

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
4	8000	Unleaded Gas	02/01/1996	UNDER	U	E I M O N P	C F K J	L K 2 4 G F
5	8000	Unleaded Gas	02/01/1996	UNDER	U	E I M O N P	C F K J	L K 2 4 G F
1	10000	Unleaded Gas	07/01/1980	UNDER	B			
2	10000	Unleaded Gas	07/01/1980	UNDER	B			

*CMS*

**Site No. 67 Capital City Bank (aka Barnett Bank)**  
101 SE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 099400262



CITRUS COUNTY  
FIRE PREVENTION DIVISION

1300 S. Lecanto Hwy.  
Lecanto, Fl. 34461  
(904)746-1335 \* Office  
(904)746-0766 \* Fax

February 7, 1994

Certified Mail

Barnett Bank  
P.O. Box 4099  
Jacksonville, Fl. 32201

Att: Richard Withers

Ref. Unregistered  
Former Barnett Bank  
101 S.E. Hwy. 19  
Crystal River, Fl. 34429

Richard Withers,

The department has completed its review of the contamination findings in the letter dated January 26, 1994 submitted by Environmental Science & Engineering. Copies of inspection report, discharge reporting form and FPLIRP checklist are attached.

At this time a contamination assessment as defined in Chapter 17-770, F.A.C. should be initiated within 30 days and a Contamination Assessment Report (CAR) must be prepared and submitted within six months from the date contamination was found. Two copies of the report should be submitted to Ms. Laurel Lucado, Department of Environmental Protection, 3804 Coconut Palm Drive, Tampa, Florida 33619.

If you have any questions concerning this letter, feel free to contact Ms. Laurel Lucado at (813)744-6100 Ext. 427.

Thanking you in advance,

Richard T. Sosna  
Tanks Program Supervisor  
Citrus County Fire Prevention

Attachments:

CC: Laurel Lucado - FDEP, Tampa  
Leslie Pedigo - FDEP, Tampa  
Bill Truman - FDEP, Tallahassee  
Tom Lowery - Environmental Science & Engineering, Inc.



State of Florida

Department of Environmental Regulation

Pollutant Storage Tank System  
Inspection Report Form



Facility ID #: UNREGISTERED County: CITRUS  
 Facility Name: FORMER BARNETT BANK  
 Facility Location: 101 S.E. HWY 19 CRYSTAL RIVER, FL. 34429  
 Facility Contact: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Owner: BARNETT BANK Phone: \_\_\_\_\_  
 Owner Address: P.O. Box ~~4099~~ 4099 JACKSONVILLE, FL. 32201  
 Owner Contact: RICHARD WITHERS Owner Change Date: \_\_\_\_\_  
 Latitude: 28° 53' 50" N Longitude: 82° 35' 04" W Fac. Type: ABANDONED

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
Y	Y	Y	Y	<sup>U</sup> ASSUMED	C	Y	Y	B

Comments: TANKS REMOVED FROM SITE 1983

\* ATTACHMENTS: PLUPP CHECK LIST & DISCHARGE REPORTING FORM

<p>Inspection Type: (Choose One)</p> <input type="checkbox"/> Routine <input checked="" type="checkbox"/> Discharge (DRF) <input type="checkbox"/> Installation <input type="checkbox"/> Closure. <input type="checkbox"/> Abandoned <input type="checkbox"/> Reinspection	<p>Site Information: (All that apply)</p> <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Repaired <input type="checkbox"/> Contaminated <input type="checkbox"/> Upgraded <input type="checkbox"/> Complaint <input checked="" type="checkbox"/> Both UST & AST <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Hazardous Materials
--	--

DER District or Local Program CITRUS COUNTY FIRE PREVENTION  
RICHARD T. SOSNA  
 Inspector Name (Print): \_\_\_\_\_ Contact Name (Print): \_\_\_\_\_  
Richard T. Sosna  
 Inspector's Signature & Date \_\_\_\_\_ Contact's Signature & Date \_\_\_\_\_

Next Inspection AT CLOSURE

**Site No. 68 Big Lots (aka Kmart)**  
146 SE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098626550

CITRUS COUNTY FIRE PREVENTION BUREAU

1300 S. LECANTO HWY.  
LECANTO, FLORIDA 32661

Officer:  
William M. (Mike) Connell

(904) 746-1335

Date: September 27, 1990

Name: Ms. Gerri Pereira  
Company: K-Mart  
Street: 146 S.E. Hwy 19  
State: Crystal River, Florida 32629


DER FAC # 098626550  
Establishment: K-Mart  
Address: 146 S.E. Hwy. 19  
Crystal River, Florida 32629

Dear: Ms. Pereira,

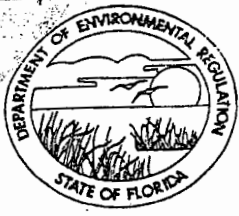
Attached are the 17-61 Florida Administrative Code compliance inspection results for the above named facility. Please review the noncompliance items checked in the "No" column and explained at the bottom of the attached inspection checklist. For any item checked "UNK" (unknown) please review and explain the deficiency. Please submit a response within 14 days which provides a schedule for correcting the noted deficiencies. Only if no's or unknowns are checked, see comments on front page of inspection report.

If you have any questions concerning this letter, please call us at (904)746-1335.

Sincerely,

  
Richard T. Sosna  
Fuel Tank Inspector

kk



State of Florida  
Department of Environmental Regulation

# Pollutant Storage Tank System Inspection Report Form

Facility ID No.: 098626550 County: CITRUS  
 Facility Name: K-MART  
 Facility Location: 146 S.E. HWY 19 CRYSTAL RIVER, FL. 32629  
 Operator: GERRI PEREIRA Phone: 795 4040  
 Owner: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Latitude 28° 53' 35" N Longitude 82° 35' 08" W Section \_\_\_\_\_ Township \_\_\_\_\_ Range \_\_\_\_\_

Tank #	Size	Contents	Installation Date	U/A or In-Contact	Tank Construction	Integral Piping	Monitoring System	Tank Status
<u>1</u>	<u>1000</u>	<u>L</u>	<u>1/1/80</u>	<u>U</u>	<u>C</u>	<u>C</u>	<u>B</u>	<u>B</u>
<u>2</u>	<u>250</u>	<u>L</u>	<u>4/89</u>	<u>A</u>	<u>Z</u>	<u>A</u>	<u>I</u>	<u>U</u>

Comments:  
 (1) TANK #1 REMOVED & EXCAVATED IN 1988 SOIL TEST  
SHOWED NO CONTAMINATION  
 (2) STORE WILL BE CLOSING NOV. 1990 NEW STORE WILL  
NOT HAVE AUTO CENTER

Inspection Type: <input type="checkbox"/> Complaint Response <input checked="" type="checkbox"/> Initial <input type="checkbox"/> EDI <input type="checkbox"/> Public Well Field	<input type="checkbox"/> Reinspection <input type="checkbox"/> Installation <input type="checkbox"/> Tank Removal <input type="checkbox"/> Unregistered	Facility Information: <input checked="" type="checkbox"/> Abandoned <input type="checkbox"/> Aboveground <input type="checkbox"/> Govt.-Federal <input type="checkbox"/> Govt.-Other	<input type="checkbox"/> Non-retail <input type="checkbox"/> Retail <input type="checkbox"/> Retrofit (M. or O.) <input type="checkbox"/> Retrofit (L. or R.)
--	--	--	--

District: SOUTHWEST  
Richard T. Sona 9/25/80  
 Inspector's Signature & Date

Local Program: CITRUS COUNTY FIRE PREVENTION  
 Facility Contact's Signature & Date  
NOT APPLICABLE

Violations must be corrected by: next routine inspection  or by:  mo /  day /  yr

**Site No. 69 Circle K #2814**  
16 NE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098518709  
EPA I.D. No. FLD984254136



Storage Tank Facility Compliance Inspection Report

Facility ID 8518709 County 09 CITRUS Inspection Date 7/19/00

Facility Name CIRCLE K 2814 Facility Type A-RETAIL

Latitude 28°53'42" Longitude 82°35'06" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>3</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	Release detection IS SIR by UST Man Industries inc.	
	ALL pass since 6-99 to 7-2000	
	Visual monitoring of the double wall pipes at the pump and dispenser lines by ATC Associates. with conditions noted on monthly check sheet.	
	2000/2001 placard + RDEL on display at the facility.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_  
 Other Coverage meeting federal financial responsibility requirements. Mechanism: Self  
 None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  
 Yes     No     CWOE - Compliance without Enforcement  
 A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS CNTY ENV. HEALTH</u>	<u>352-527-5295</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u>	<u>FRANCES FRANCO</u>
Inspector Name - Please Print	Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>9/19/00</u>	<u>Frances Franconi</u>
Inspector Signature & Date	Facility Representative Signature & Date

Cite                      Description / Inspector's Comments

Comments	The Tanks, Lines, and Line Leak
	detectors were tested by AAA
	Tank Testers all passed
	Tanks tested 8/3/98 Due 8/3/2001
	LLD tested 7/22/2000 Due 7/22/2001
	Lines tested 7/22/2000
	<del>Sacrificial anode Cathodic protection</del>
	<del>System had its structure to soil</del>
	<del>survey performed by Tanknology</del>
	<del>on 10-20-98</del>
	Conditions noted at time of inspection,
	all Dispenser lines were dry.
	Reg UL + plus UL Sumps were dry
	Premium sump ~ 1-2 inches of liquid.
	Cathodic protection system is factory
	installed <del>at a separate location</del> Sacrificial
	Anode not impressed current. please
	confirm when the structure to soil
	test was performed.

**ORIGINAL**

**RECEIVED BY**

**JAN 3 2003**

**TEAM 5**



**Remedial Action Plan  
Circle K Store #2814  
FDEP Facility No. 098518709  
FDEP Work Order No. 2003-95-1309**

DEPARTMENT OF PETROLEUM  
STORAGE SYSTEMS  
REGULATORY DIVISION

JAN 03 03 A 11: 29

**RECEIVED**  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION

Prepared For:

Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400



**REMEDIAL ACTION PLAN**

Circle K Store #2814  
16 NE Highway 19  
Crystal River, Florida  
ATC Project No. 16564.0405  
FDEP Facility No. 098518709  
FDEP Work Order No. 2003-95-1309

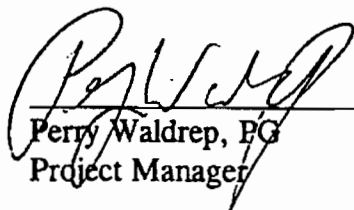
December 2002

Prepared For:

Ms. Bevin K. Hankley  
Florida Department of Environmental Protection  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

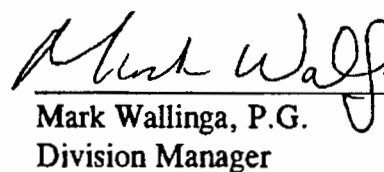
**ATC ASSOCIATES INC.**

Prepared by:

  
Perry Waldrep, P.G.  
Project Manager

**ATC ASSOCIATES INC.**

Reviewed by:

  
Mark Wallinga, P.G.  
Division Manager

---

## PROFESSIONAL ENGINEERING CERTIFICATION

---

### REMEDIAL ACTION PLAN

Circle K Store #2814  
16 NE U.S. Highway 19  
Crystal River, Florida  
FDEP Facility No. 098518709  
ATC Project No. 16563.0405  
FDEP Work Order No. 2003-95-1309

December 27, 2002

The engineering information in this document was prepared by and/or under the direct supervision of a Florida licensed Professional Engineer. The engineer certifies that the document conforms to currently accepted engineering practices pursuant to Chapter 471 of the Florida Statutes.



Eric Kromann, P.E.  
Florida PE Registration # 54917  
Date: 12/27/02

## TABLE OF CONTENTS

	PAGE
1.0 INTRODUCTION.....	1
2.0 BACKGROUND INFORMATION .....	1
3.0 SITE ASSESSMENT SUMMARY.....	2
3.1 Potable Well Survey.....	2
3.2 Utility Survey.....	2
3.3 Geologic Profile.....	2
3.4 Soil Screening .....	2
3.5 Aquifer Characterization .....	3
3.6 Groundwater Chemistry .....	3
4.0 REMEDIAL ACTION ALTERNATIVE SELECTION.....	4
5.0 RECOMMENDED REMEDIAL ACTION .....	6
5.1 Vapor Recovery System Design.....	7
5.2 Vapor Recovery System Vapor Phase Treatment .....	7
5.3 Construction .....	8
6.0 ESTIMATED PROJECT LIFE .....	9
7.0 MONITORING AND MAINTENANCE .....	9
7.1 Vapor Recovery System .....	9
7.2 Groundwater Monitoring .....	10
7.3 Soil Sampling.....	10
7.4 Reporting.....	10
8.0 ESTIMATED CONSTRUCTION COSTS.....	10
9.0 REMARKS .....	11
10.0 PAY FOR PERFORMANCE EVALUATION .....	11

## TABLES

Table 1	Summary of Soil Screening Results
Table 2	Soil Analytical Summary
Table 3	Groundwater Elevation Table
Table 4	Groundwater Analytical Summary
Table 5	Equipment Summary
Table 6	Estimated System Construction Costs

## FIGURES

Figure 1	Site Plan
Figure 2	Organic Vapor Concentration Map 0-2 Feet
Figure 3	Dissolved Benzene Concentration Map - September 17, 18, 2002
Figure 4	Dissolved Naphthalene Concentration Map - September 17, 18, 2002
Figure 5	Vacuum Recovery Well Locations and Radii of Influence
Figure 6	Vacuum Recovery Process Flow and Instrumentation Diagram
Figure 7	Proposed Vapor Recovery Well Construction Detail
Figure 8	Infiltration Gallery Details
Figure 9	Proposed Trenching Layout

## APPENDICES

Appendix A	Site Eligibility Documents & CAR Approval Documents
Appendix B	Estimated Mass of Contaminated Soil and Groundwater
Appendix C	RAP Summary Sheet
Appendix D	Infiltration Gallery Sizing
Appendix E	Vacuum Blower Sizing
Appendix F	Transfer Pump Design Calculations
Appendix G	Air Stripper Sizing
Appendix H	Vapor Phase Treatment Specifications
Appendix I	Control Specifications
Appendix J	Project Life Estimate
Appendix K	Cost Details

**REMEDIAL ACTION PLAN  
CIRCLE K # 2814  
16 NE U.S. HIGHWAY 19  
CRYSTAL RIVER, FLORIDA  
FDEP FACILITY NO. 098518709**

**1.0 INTRODUCTION**

ATC Associates Inc. (ATC) has prepared a Remedial Action Plan (RAP) for Circle K No. 2814 (site), located at 16 NE U.S. Highway 19, Citrus County, Florida. This report will present a cost effective and technically feasible remedial design to address the on-site soil and groundwater petroleum contamination identified in the Contamination Assessment Report (CAR) and CAR Addendum submitted by ATEC Associates, Inc in March and September 1995, respectively, and subsequent site assessment activities. This RAP document has been prepared in accordance with the Florida Department of Environmental Protection (FDEP) Petroleum Cleanup Pre-Approval Work Order 2003-95-1309 and Chapter 62-770, Florida Administrative Code (FAC).

**2.0 BACKGROUND INFORMATION**

The site is located at the intersection of NE 1<sup>st</sup> Terrace and 16 NE U.S. Highway 19 in Crystal River, Citrus County, Florida, in the southeast quadrant of Section 21, Township 18 South, Range 17 East of the United States Geological Survey (USGS) Crystal River, Florida Quadrangle Map. The elevation at the site is approximately 10 feet above mean sea level (msl).

The site is currently a gasoline and retail convenience store with three underground storage tanks (USTs). The Circle K property is rectangular in shape. As shown in **Figure 1**, the facility consists of a single building, a UST pit and a single canopy fuel island located in the eastern portion of the site. The western portion of the site is vacant. The UST pit is covered with concrete, with the surrounding areas covered with asphalt or unpaved. The site is bordered to the north and west by shopping centers, to the south by NE 1<sup>st</sup> Terrace and to the east by U.S. Highway 19.

As reported in the Contamination Assessment Report (CAR), stormwater runoff appears to flow toward a drainage gutter along the west side of U.S. Highway 19, which drains to a small retention pond. Stormwater is also able to recharge the shallow surficial aquifer through the unpaved areas on the west side of the site.

A Professional Land Survey (PLS) was prepared by Van Norman & Associates, Inc., of Crystal River, FL in September 2001 as part of a previous Preapproval Work Order. A site plan is provided as **Figure 1**.

According to the CAR, a Discharge Notification Form (DRF) was submitted on November 1, 1988. According to the DRF, the discharge was due to an overflow of the UST system. The site was accepted into the Early Detection Incentive (EDI) Program on January 22, 1990. FDEP correspondence approving EDI and reimbursed cleanup are presented in Appendix A.

A TEC completed a contamination assessment for the site, and their CAR was submitted to the FDEP in March 1995. A TEC also submitted a CAR Addendum in September 1995. The FDEP issued a letter approving the CAR and Addenda on February 2, 1996 (attached as part of Appendix A). A TEC performed supplemental site assessment activities and submitted a Level 3 Site Assessment Report (November 2000), a Level 4 Site Assessment Report (December 2001) and a General Site Assessment Report (June 2002).

### **3.0 SITE ASSESSMENT SUMMARY**

Information presented in Section 3 was taken from the aforementioned CAR, the CAR Addenda prepared by A TEC and the subsequent assessment reports submitted by A TEC. The data from the September 2002 groundwater sampling, which is part of the RAP Work Order, were presented to the FDEP in a Groundwater Sampling Report dated October 23, 2002.

#### **3.1 Potable Well Survey**

A TEC conducted a potable well survey, which was reported in the General Site Assessment Report dated June 19, 2002. One public supply well was located within a one-half mile radius of the site. No private or small potable water wells were identified within a ¼-mile radius of the site.

#### **3.2 Utility Survey**

Utility locations are shown on Figure 1.

#### **3.3 Geologic Profile**

The CAR states that the site geology consisted of fine-grained sand, clayey sand and sandy clay to a depth of approximately 10 to 14 feet below land surface (bls). A limestone unit is present beneath the unconsolidated sediments and extends to at least 28 feet bls. Several voids were encountered in the limestone unit. No data was obtained below 28 feet bls.

#### **3.4 Soil Screening**

As noted in the CAR, A TEC performed soil assessment activities at the site in 1995 and identified excessively contaminated soil (Organic Vapor Analyzer (OVA) readings) in excess of 500 parts per million (ppm) in the vicinity of the dispenser island.

During the assessment activities performed by A TEC in 2000, 2001 and 2002, A TEC installed soil borings and monitoring wells, took OVA readings from each and submitted five soil samples for laboratory analyses (one on 10/24/00 and four on 11/7/01). The soil assessment identified elevated OVA readings from the soil samples collected from the vadoze zone (see Table 1 and

Figure 2). Petroleum contaminants above the soil cleanup target levels established in Chapter 62-777, FAC, were detected in three of the soil samples analyzed by the laboratory (see Table 2). Based on the results of the OVA screening and the laboratory analyses, it appears that soils exhibiting OVA concentrations greater than 500 parts per million (ppm) at the site are petroleum contaminated.

The estimate mass of contamination in soil is calculated in **Appendix B**.

### **3.5 Aquifer Characterization**

Groundwater levels range from approximately 3.05 to 6.30 feet bls with seasonal variation (Table 3). The groundwater flow direction appears to be towards the north and northwest. As reported in the CAR, the average hydraulic gradient at the site is 0.019 foot. The CAR reported an average hydraulic conductivity for the zone from 3.5 to 13.5 feet bls of 30.76 feet per day based on single well aquifer tests.

### **3.6 Groundwater Chemistry**

A summary of the groundwater chemistry data collected for the site is presented in Table 4. The approximate extent of the dissolved benzene plume is shown on **Figure 3** and the naphthalene plume is shown on **Figure 4**. The estimated mass of contamination in groundwater is calculated in **Appendix B**.

#### **4.0 REMEDIAL ACTION ALTERNATIVE SELECTION**

The following alternatives were considered as potential technologies for obtaining site closure:

- Submersible pump groundwater recovery and treatment;
- Vapor extraction;
- Dual phase extraction;
- Soil Excavation;
- Chemical Oxidation;
- Air sparging in conjunction with soil vapor extraction; and
- Air sparging in conjunction with vacuum recovery.

##### **Submersible pump groundwater recovery and treatment**

Experience in the remediation of petroleum-contaminated sites indicates that groundwater recovery using submersible pumps may not be the most cost-effective or expedient technology. Remediation projects using submersible pumps have historically had a very long project life (much longer than most models predict). Additionally, the use of groundwater recovery alone as a remedial strategy does not address all phases of the contaminated media (i.e., contaminated soil). Groundwater recovery may be effective for hydraulic control of the dissolved petroleum contaminant plume if other remedial technologies cannot be applied due to vertical or horizontal site restrictions.

ATC does not recommend submersible pump groundwater recovery.

##### **Vapor Extraction (VE)**

A VE system can be used to remediate the vadose and groundwater fluctuation zones. At sites where dissolved phase contaminants are present, an additional remediation method must be used. VE is not effective at sites with high water table elevations. The groundwater will cover the exposed well screen, reducing or possibly stopping the VE airflow.

Possible remedial benefits of adding vacuum enhancement to a groundwater recovery system are the potential remediation of the vadose and groundwater fluctuation zones. This enhancement overcomes some of the inherent limitations in groundwater recovery as a remedial method. However, as stated above, groundwater recovery at this site is not considered cost effective due to the potential for an extended project life.

##### **Dual phase extraction (DPE)**

Dual phase extraction (DPE) as remedial strategy would potentially remediate the vadose, the groundwater fluctuation zones, and the zone of groundwater contamination simultaneously. A



large amount of air and water are extracted from the DPE wells, creating drawdown and exposing the adsorbed contaminants to vapor phase extraction. This technology uses expensive capital equipment (often an oil-sealed liquid ring vacuum pump). Additionally, maintenance costs on a DPE system are higher than systems using other technologies. Due to the construction of a liquid ring pump, oil can be ejected from the vapor stream if vacuum levels drop below the required operating conditions (typically 14" to 18" Hg).

ATC has experienced success remediating sites with DPE, however the general consensus with the FDEP is that DPE is not generally as effective as AS/VE. Therefore, whenever possible, ATC will propose AS/VE instead of DPE.

### **Soil Excavation**

Soil excavation (and subsequent off-site thermal treatment) is one of the most effective ways to reduce the source area at a petroleum-contaminated site, provided the source area is accessible to excavation activities. Soil excavation within the vadose zone and smear zone reduces the amount of source material present within the subsurface. This reduction in source material reduces the amount of adsorbed contaminants, which can desorb into the aqueous phase thus stopping the continual migration of contaminants from the soil matrix into the surrounding aquifer. Although soil excavation does reduce the amount of soil source material present at a contaminated site, it does not address the dissolved phase contaminants already present in the aqueous phase. It should also be noted that soil excavation is costly, especially if a large amount of soil needs removal and treatment.

Typically construction de-watering with discharge to storm water facilities is conducted in conjunction with a soil excavation to address the dissolved phase petroleum hydrocarbons. Generally, a short-term NPDES permit is required to discharge the recovered water. If certain contaminants such as lead are present, an NPDES-permitted discharge is not feasible.

Soil excavation is not recommended for this site since some of the source material is underneath the fuel / piping system and due to the presence of dissolved phase contaminants.

### **Chemical Oxidation**

Chemical oxidation of hydrocarbons appears to be an effective technology for remediating hydrocarbon contamination. This technology is highly exothermic and can damage underground pipes, tanks, and utilities. Since this site is an active gasoline station, chemical oxidation is not an appropriate remedial technology.

Remedial Action Plan  
Circle K # 2814  
Crystal River, Florida  
ATC Project No. 16564.0405  
FDEP Facility No. 098518709

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#### Air sparging in conjunction with soil vapor extraction (AS/VE)

Air sparging (AS) in conjunction with soil vapor extraction (VE) was also considered as an alternative. AS technology can be used in a variety of geological and hydrogeological settings, as well as at sites with varying concentrations and aerial distributions of petroleum contaminants. The primary remedial processes promoted by AS are in-situ stripping of dissolved hydrocarbons with sufficiently high Henry's Law constants, enhanced aerobic biodegradation of dissolved phase contaminants due to increased dissolved oxygen levels, and volatilization of adsorbed phase constituents. At petroleum-impacted sites, the primary contaminants are volatile organic aromatic (VOA) compounds such as BTEX and naphthalene. The VOA and lighter PAH (naphthalene) compounds are highly amenable to remediation by AS and VE processes due to their volatility, strip ability and aerobic biodegradability characteristics.

A VE system is typically used in conjunction with AS to remediate the vadose and groundwater fluctuation zones as well as to recover vapors generated during AS. Similar to AS, the primary remedial processes promoted by VE are stripping, volatilization and biodegradation. VE is not effective at sites with high water table elevations. The groundwater will cover the exposed well screen, reducing or possibly stopping the VE airflow. This renders the VE system ineffective and can allow a pressure buildup from the AS system.

Due to the high water table conditions at this site, AS/VE is not considered effective. In addition, air sparging is not considered feasible due to the presence of limestone at a relatively shallow depth (10 to 14 feet bls).

#### Vacuum Recovery (AS/VR)

Vacuum recovery (VR) is similar to VE except a vacuum blower capable of higher vacuums is used. The blower will have sufficient vacuum to extract water and air from the VR wells, allowing airflow in the event of high water table. Additionally, since this system is expected to extract groundwater, a method of treatment (liquid phase carbon or an air stripper) is required.

A RAP Summary is attached as Appendix C.

### 5.0 RECOMMENDED REMEDIAL ACTION

ATC recommends that soil and groundwater remediation at this site be performed by a VR system. VR will be implemented to extract groundwater from the saturated zone and soil vapors from the vadose and groundwater fluctuation zones and soils exposed as a result of groundwater withdrawal.

### **5.1 Vapor Recovery System Design**

A VR system consisting of five vapor recovery wells is proposed for this site. The locations of the proposed vapor recovery wells are provided in **Figure 5** and the process flow diagram is illustrated in **Figure 6**. A radius of influence of 25 feet per well was assumed for the design. The assumed 25 feet radius of influence was based on ATC's experience with sites with similar geologic and aquifer characteristics.

The vapor recovery wells will be installed to total depths of 12 feet bls and screened from 3 to 12 feet bls (**Figure 7**). The depth of the proposed vapor recovery wells was selected based on the shallow nature of the dissolved petroleum contamination (i.e., the depth to water is generally three to six feet bls and dissolved petroleum contamination has not been detected in the vertical extent well, which is 30 feet deep). All vapor recovery well points will be operated simultaneously during the vapor recovery process. A Roots URAI 711 blower (or equivalent) will be used to extract water and air. Air is expected to be withdrawn from each well at a rate of approximately 50 standard cubic feet per minute (scfm). Water is expected to be withdrawn from each well at a rate of approximately two gallons per minute (gpm). Recovered groundwater will be treated using a low profile air stripper to remove dissolved petroleum constituents prior to discharge to an on-site infiltration gallery (**Appendix D**). The discharge water will be transferred from the air stripper to the infiltration gallery via a transfer pump. The proposed infiltration gallery details are depicted on **Figure 8**.

Each piping run will be equipped with quick connect ports to insert an assembly utilizing a vacuum gauge and a flow meter. The line sizing and VR design calculations are presented in **Appendix E**. The transfer pump sizing and calculations are provided in **Appendix F**. The air stripper design calculations and specifications are presented in **Appendix G**. The remediation equipment including the vacuum pump and the air stripper will be placed within a fenced compound on the west side of the site. The proposed treatment system will be trailer mounted and thus an equipment layout will not be provided until prepared by the vendor.

Purchasing the equipment will be more cost effective than leasing the equipment due to the anticipated cleanup time (refer to Section 6.0). A summary of the equipment specifications is presented in **Table 5**.

### **5.2 Vacuum Recovery System Vapor Phase Treatment**

The initial estimated average Hazardous Air Pollutant (HAP) effluent discharged into the atmosphere is approximately 54.62 lbs/day. This calculation is based upon converting the average OVA reading from the vadose zone soils within the plume to a vapor hydrocarbon concentration. The calculation is provided in **Appendix H**. The FDEP guideline limit for vapor

emissions is 13.7 pounds of HAP per day. Therefore, vapor phase treatment will be required at this site. A granulated activated carbon (GAC) adsorption system is proposed as the most appropriate offgas treatment technique. A thermal incinerator or catalytic oxidation unit is not recommended because of the higher operating costs (monthly lease and electrical or propane fees) and numerous maintenance problems.

The proposed GAC system consists of a 2,000-pound vessel. Design of the GAC system was based on estimated influent total hydrocarbon concentrations in conjunction with the estimated loading rate. The initial 2,000 lbs vessel of carbon is expected to be spent in approximately seven days (as calculated in **Appendix H**). Organic vapor concentrations will be monitored with an OVA on a daily basis during start-up and a weekly basis for the first month of system operation. Air samples will be collected to evaluate HAP recovery. The samples will be analyzed for BTEX, MTBE and TPH via EPA Method 18. One air sample will be collected from the untreated air at start-up. Subsequent air samples will be collected from the untreated air and the GAC treated air at each regularly scheduled O&M visit until the HAP recovery rate falls below 13.7 pounds per day. Carbon will be replaced on an as needed basis, based on OVA measurements and chemistry analysis taken from "after carbon" sample ports. The carbon vessels will be removed when the daily emission is less than 13.7 pounds of hydrocarbons per day based on the untreated air influent sample analysis, with a minimum of 30 days off-gas treatment (see Section 7.1).

### **5.3 Construction**

The major phases of construction include: installation of the five vapor recovery wells; trenching and system piping; plumbing connections and installation of vault boxes for the vapor recovery well heads; installation of the equipment pad and fenced enclosure; piping/plumbing of all skid mounted equipment; installation of the infiltration gallery; coordinating the temporary power pole and meter installation; electrical connections for all motorized equipment; and start-up services. The proposed Trenching Layout is presented as **Figure 9**. The proposed construction activities should be completed within approximately 12 working days. Petroleum contaminated soil (based on OVA/FID field screening) encountered during construction activities (i.e. during trenching) will be disposed of at a licensed treatment facility if it is not suitable for re-use as backfill material. Record drawings will be submitted upon completion of system construction. Please note, Withlachochee River Electric Cooperative (WREC) will supply power. ATC contacted WREC in order to determine if three-phase power was available to the site. At the time of report preparation, no response has been received. Control panel specifications are provided within **Appendix I**.

## **6.0 ESTIMATED PROJECT LIFE**

The "mixed tank" model (continuously mixed tank reactor) was used to estimate the project life for groundwater remediation with VR. The mixed tank model assumes that contaminated water is pumped from a well-mixed aquifer at the same rate that clean water is entering. The model results and assumptions used are presented in **Appendix J**. The model predicts dissolved benzene levels will reach Chapter 62-777, FAC Table V cleanup levels in approximately 130 days. The most elevated petroleum constituent concentration detected at the site is naphthalene, however, a project life based on naphthalene could not be estimated because the coefficients were not available. Therefore, ATC projects a minimum project life of one year for this site. Please note that this model assumes that all contaminated groundwater removed from the aquifer is replaced by "clean" water and that there is no continual source material contributing contaminants into the aquifer system. Any contaminants contained within the surficial aquifer system, especially the smear zone, that have not been identified can act as a continual source into the aquifer and thus extend cleanup times beyond the mixed tank model predictions. It must also be noted that since a pilot study was not performed, groundwater and air flow rates could vary appreciably, thus altering the project life estimate. ATC proposes that a one-year project life be used for this site.

## **7.0 MONITORING AND MAINTENANCE**

Remediation system start-up is expected to be conducted within two weeks of completing construction activities. Monitoring and sampling will be performed by trained personnel in accordance with the procedures outlined in ATC's FDEP approved Comprehensive Quality Assurance Plan (#890174G). During remediation, groundwater levels will be measured in the monitoring wells quarterly. Operation and maintenance site visits will be conducted weekly for the first month and monthly thereafter. Proposed operation and maintenance (O&M) activities are summarized in the following subsections.

### **7.1 Vapor Recovery System**

Air samples from the VR system will be collected as outlined in Section 5.2. Once HAP recovery levels have been reduced to acceptable discharge levels (after a minimum of 30 days of operation), notification of the removal of the air treatment will be submitted to the FDEP.

Water effluent samples from the air stripper will be collected during start-up and monthly, thereafter, for analysis of BTEX/MTBE (EPA Method 8021) and PAHs (EPA Method 8310). Total influent water samples will be collected monthly for the first quarter and quarterly thereafter for analysis of BTEX/MTBE and PAHs.

*Remedial Action Plan  
Circle K # 2814  
Crystal River, Florida  
ATC Project No. 16564.0405  
FDEP Facility No. 098518709*

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O&M will be performed in conjunction with VR system sampling. The O&M activities will include but not be limited to: checking for line leaks; adjusting flow rates for the vapor recovery wells; and running a general maintenance check. Collection of vacuum and

OVA/FID readings at select monitoring points will be performed quarterly to evaluate effectiveness of the remediation system.

### **7.2 Groundwater Monitoring**

Quarterly sampling of select monitoring wells will be performed to monitor the progress of remediation of dissolved petroleum constituents. Monitoring wells MW-13 (upgradient), MW-6, MW-8R and MW-11 (source), MW-12 and MW-7R (downgradient) will be sampled and analyzed for BTEX/MTBE and PAHs via EPA Methods 8021 and 8310, respectively. ATC will collect groundwater samples from all on-site monitoring wells at the completion of one year of system operation for analysis of BTEX/MTBE and PAHs.

### **7.3 Soil Sampling**

Three confirmatory soil samples will be collected in areas previously identified as having soil contamination above SCTLs or greater than 500 ppm OVA readings. Soil samples will be analyzed for BTEX/MTBE, PAHs, and TRPHs to determine if the petroleum constituent concentrations in the vadose and groundwater fluctuation zone soils are below the Chapter 62-777, FAC SCTLs.

### **7.4 Reporting**

Quarterly status reports will be submitted to the FDEP in the form of quarterly operation & maintenance reports. The reports will summarize the remedial activities conducted during the reporting period and will include site data presented on the FDEP Remedial Action O&M Reporting tables.

## **8.0 ESTIMATED CONSTRUCTION COSTS**

The estimated system construction costs are summarized in **Table 6**, and cost details are provided in **Appendix K**.

*Remedial Action Plan  
Circle K # 2814  
Crystal River, Florida  
ATC Project No. 16564.0405  
FDEP Facility No. 098518709*

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## **9.0 REMARKS**

The recommendation, findings, or specifications contained in this report represent our professional opinions. These opinions were arrived at in accordance with currently accepted hydrogeologic and engineering practices at this time and location. Other than this, no warranty is implied or intended.

## **10.0 PAY FOR PERFORMANCE EVALUATION**

ATC elects not to perform the proposed remedial actions on a pay for performance basis since the significant portion of the dissolved plume has migrated off-site.

**TABLES**



TABLE 1  
SUMMARY OF SOIL SCREENING RESULTS  
CIRCLE K # 2814  
TAMPA, FLORIDA  
ATC PROJECT NO. 16564.0405

Sample Number	Sample Depth (ft)	OVA/FID Reading (ppm)		
		Unfiltered	Filtered	Corrected
SB-16	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	1,400	ND	1,400
	4 - 5	1,030	ND	1,030
SB-9	0 - 1	8	NA	8
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	400	100	300
SB-11	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	10	ND	10
	3 - 4	30	ND	30
SB-13	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	30	NA	NA
	3 - 4	700	35	665
SB-15	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	25	NA	NA
	3 - 4	1400	45	1355
SB-17	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	50	ND	50
	3 - 4	7000	200	6800
SB-18	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	15	ND	15
SB-23	0 - 1	1200	25	1175
	1 - 2	1900	120	1780
	2 - 3	2000	100	1900
	3 - 4	2800	300	2500
SB-24	0 - 1	ND	NA	ND
	1 - 2	10	ND	10
	2 - 3	10	ND	10
	3 - 4	200	35	165

All results are reported in parts per million (ppm).

Sample depth reported in approximate feet below land surface.

All measurements were made using an organic vapor analyzer equipped with a flame-ionization detector (OVA/FID).

Filtered samples were passed through an activated carbon filter prior to measurement.

Corrected readings are reported as the difference between the unfiltered and filtered readings.

NA = Not analyzed.

ND = Not detected.

**TABLE 1**  
**SUMMARY OF SOIL SCREENING RESULTS**  
**CIRCLE K #2814**  
**CRYSTAL RIVER, FLORIDA**  
**ATC PROJECT NO. 16564.0405**

Sample Number	Sample Depth (ft)	OVA/FID Reading (ppm)		
		Unfiltered	Filtered	Corrected
SB-28	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-29	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	110	ND	110
SB-30	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-31	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-32	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
SB-33	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-34	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-35	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-36	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND

All results are reported in parts per million (ppm).

Sample depth reported in approximate feet below land surface.

All measurements were made using an organic vapor analyzer equipped with a flame-ionization detector (OVA/FID).

Filtered samples were passed through an activated carbon filter prior to measurement.

Corrected readings are reported as the difference between the unfiltered and filtered readings.

NA = Not analyzed.

ND = Not detected.

TABLE I  
SUMMARY OF SOIL SCREENING RESULTS  
CIRCLE K # 2814  
TAMPA, FLORIDA  
ATC PROJECT NO. 16564.0405

Sample Number	Sample Depth (ft)	OVA/FID Reading (ppm)		
		Unfiltered	Filtered	Corrected
SB-37	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	50	30	20
SB-38	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	ND	NA	ND
	3 - 4	ND	NA	ND
SB-39	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	10	ND	10
	3 - 4	150	ND	150
SB-40	0 - 1	ND	NA	ND
	1 - 2	ND	NA	ND
	2 - 3	500	5	495
	3 - 4	>10,000	200	>9,800
MW-7R	0 - 2	ND	NA	ND
	2 - 4	600	140	460
	4 - 6	800	200	600
	6 - 8	300	100	200
	8 - 10	150	100	50
	10 - 12	80	50	30
MW-8R	0 - 2	60	ND	60
	2 - 4	40	40	ND
	4 - 6	3,000	200	2,800
	6 - 8	1,800	250	1,550
	8 - 10	750	200	550
	10 - 12	250	30	220
MW-15	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	ND	NA	ND
	6 - 8	5	ND	5
	8 - 10	ND	NA	ND
	10 - 12	ND	NA	ND

All results are reported in parts per million (ppm).

Sample depth reported in approximate feet below land surface.

All measurements were made using an organic vapor analyzer equipped with a flame-ionization detector (OVA/FID).

Filtered samples were passed through an activated carbon filter prior to measurement.

Corrected readings are reported as the difference between the unfiltered and filtered readings.

NA = Not analyzed.

ND = Not detected.

**TABLE I**  
**SUMMARY OF SOIL SCREENING RESULTS**  
**CIRCLE K #2814**  
**CRYSTAL RIVER, FLORIDA**  
**ATC PROJECT NO. 16564.0405**

Sample Number	Sample Depth (ft)	OVA/FID Reading (ppm)		
		Unfiltered	Filtered	Corrected
MW-16	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	ND	NA	ND
	6 - 8	ND	NA	ND
	8 - 10	ND	NA	ND
	10 - 12	ND	NA	ND
MW-17	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	400	225	175
	6 - 8	450	275	1,550
	8 - 10	700	200	500
	10 - 12	900	150	750
MW-18	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	500	50	450
	6 - 8	450	30	420
	8 - 10	800	200	600
	10 - 12	550	100	450
MW-19	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	20	10	10
	6 - 8	70	20	50
	8 - 10	100	30	70
	10 - 12	90	40	50
MW-20*	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	10	ND	10
	6 - 8	10	ND	10
	8 - 10	20	5	15
	10 - 12	100	50	50
DW-1	0 - 2	ND	NA	ND
	2 - 4	ND	NA	ND
	4 - 6	10	ND	10
	6 - 8	10	ND	10
	8 - 10	20	5	15
	10 - 12	100	50	50

\* Logged from drill cuttings

All results are reported in parts per million (ppm).

Sample depth reported in approximate feet below land surface.

All measurements were made using an organic vapor analyzer equipped with a flame-ionization detector (OVA/FID).

Filtered samples were passed through an activated carbon filter prior to measurement.

Corrected readings are reported as the difference between the unfiltered and filtered readings.

NA - Not analyzed.

ND - Not detected.







**TABLE 3: GROUNDWATER ELEVATION TABLE**

Facility Name: **Circle K #2814**      Facility ID#: **098518709**      All Measurements = Feet  
 No Data = Blank

Well No.	MW-7	MW-8	MW-9D	MW-10	MW-11	MW-12
Diameter	2"	2"	2"	2"	2"	6"
Well Depth	12'	13'	28.5'	12'	12.5'	12'
Screen Interval	2'-12'	3'-13'	23.5'-28.5'	2'-12'	2.5'-12.5'	2'-12'
TOC Elevation	9.58	9.86	10.25	11.03	10.21	9.56

DATE	DTW	ELEV	FP	DTW	ELEV	FP	DTW	ELEV	FP	DTW	ELEV	FP	DTW	ELEV	FP
12/15/94	4.37	5.21													
01/03/95	4.52	5.06		5.29	4.96		5.27	5.76		4.69	5.52		4.49	5.07	
01/20/95	3.73	5.85		4.16	6.09		3.88	7.15		3.88	6.33		3.92	5.64	
02/28/95	4.41	5.17		4.68	5.57		4.80	6.23		4.46	5.75		4.46	5.10	
08/24/95	3.58	6.00		4.14	6.11		3.76	7.27		3.66	6.55		3.83	5.73	
09/07/00							3.15	7.88		3.15	7.06		3.34	6.22	
11/13/01							4.57	6.46		4.48	5.73		5.82	3.74	
05/07/02							5.13	5.90		4.79	5.42		4.96	4.60	
09/17/02							3.93	7.10		3.77	6.44		3.99	5.57	







**TABLE 4: GROUNDWATER ANALYTICAL SUMMARY**

Facility Name: **Circle K #2814**

Facility ID#: **098518709**

Not Detected = ND  
 Not Sampled = NS  
 Analytical Results = ppb  
 (except for TRPH = ppm)

Sample Location	Sample Date	Total										Total		Dis.	
		Benzene	Toluene	Ethyl Benzene	Xylenes	VOA	MTBE	Naphthalene	2meth. Naph.	1meth. Naph.	TRPH	Lead	Lead	Lead	
MW-1	12/15/1994	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	<3.73	NS		
	08/24/95	<0.4	<0.4	<0.4	<1.2	<2.4	<5	NS	NS	NS	NS	NS	NS		
MW-2	12/15/1994	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	4.30	NS		
MW-3	12/15/1994	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	<3.73	NS		
	08/24/95	<0.4	<0.4	1.50	1.80	3.30	9.00	NS	<1	<1	NS	NS	NS		
MW-4	12/15/94	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	<3.73	NS		
	8/24/1995	<0.4	<0.4	<0.4	<1.2	<2.4	<5	NS	NS	NS	NS	NS	NS		
MW-5	12/15/94	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	<3.73	NS		
MW-6	12/15/94	211.60	28.90	185.70	22.60	448.80	104.80	NS	NS	NS	NS	35.90	NS		
	08/24/95	112.00	14.00	187.00	17.00	330.00	68.00	NS	NS	NS	NS	NS	NS		
	09/07/00	143	13	150	12	318	20	494	133	79	NS	NS	NS		
	05/07/02	NS	NS	NS	NS	NS	NS	NS	NS	NS	0.6	NS	NS		
	09/17/02	48.6	<1	103	5	156.6	9	434	135	74	NS	12	NS		
MW-7	12/15/94	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	59.40	NS		
	08/24/95	<0.4	2.10	8.00	25.50	35.60	<0.5	NS	NS	NS	NS	NS	NS		
MW-7R	11/13/2001	<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS		
	9/17/2002	<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	NS	NS		
MW-8	12/15/94	23.50	<0.4	75.50	<1.35	99.00	<0.51	NS	NS	NS	NS	11.90	NS		
	08/24/95	24.00	3.00	67.00	9.00	103.00	<2.5	NS	NS	NS	NS	NS	NS		
MW-8R	11/13/01	<0.5	<1	<1	<1	<3.5	<5	12	9	15	NS	<10	NS		
	05/07/02	NS	NS	NS	NS	NS	NS	NS	NS	NS	2.5	NS	NS		
	09/18/02	<0.5	<1	<1	<1	<3.5	<5	31	37	36	NS	NS	NS		
MW-9D	01/03/95	<0.76	<0.4	0.67	<1.35	0.67	1.43	NS	NS	11.90	NS	11.90	NS		
	08/24/95	<0.4	<0.4	<0.4	<1.2	<2.4	6.00	NS	NS	NS	NS	NS	NS		
MW-10	01/03/95	<0.76	<0.4	<0.39	<1.35	<2.9	<0.51	NS	NS	NS	NS	<3.73	NS		
	08/24/95	<0.4	<0.4	<0.4	<1.2	<2.4	<5	NS	NS	NS	NS	NS	NS		
	09/07/00	<0.5	<1	<1	<1	<3.5	<5	NS	NS	NS	NS	NS	NS		
	05/07/02	NS	NS	NS	NS	NS	NS	<1	<1	<1	NS	NS	NS		
	09/17/02	<0.5	<1	<1	<1	<3.5	<5	NS	NS	NS	NS	<10	NS		

### TABLE 4: GROUNDWATER ANALYTICAL SUMMARY

Not Detected = ND  
 Not Sampled = NA  
 Analytical Results = ppb  
 (except TRPH = ppm)

Facility Name: Circle K #2814      Facility ID#: 098518709

Location	Sample		Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Naphthalene	2meth. Naph.	1meth. Naph.	TRPH	Total Lead	Dis. Lead
	Date													
MW-11	1/3/1995		11.41	17.04	103.20	13.28	144.93	<0.51	NS	NS	NS	NS	81.00	NS
	8/24/1995		8.00	5.00	99.00	11.00	123.00	<12.5	NS	NS	NS	NS	NS	NS
	9/7/2000		8.9	2	49	<1	59.9	<5	229	65	28	NS	NS	<10
MW-12	5/7/2002		NS	NS	NS	NS	NS	NS	NS	NS	NS	0.8	NS	NS
	9/17/2002		6.3	3	<1	6	15.3	<5	234	<1	<1	NS	<10	NS
	1/3/1995		9.94	5.69	6.44	10.97	33.04	135.10	NS	NS	NS	NS	72.40	NS
MW-13	8/24/1995		23.00	3.00	12.00	9.00	47.00	52.00	NS	NS	NS	NS	NS	NS
	9/7/2000		7	1	5	9	22	9	NS	NS	NS	NS	NS	<10.
	5/7/2002		NS	NS	NS	NS	NS	NS	3	18	9	<0.4	NS	NS
MW-14	9/17/02		2.5	<1	<1	6	8.5	6	NS	NS	NS	NS	<10	NS
	2/28/1995		1.47	3.48	7.68	0.73	13.36	<0.51	NS	NS	NS	NS	143.00	NS
	8/24/1995		<1	1.00	15.00	5.00	21.00	<12.5	NS	NS	NS	NS	NS	NS
MW-15	9/7/2000		<0.5	<1	<1	<1	<3.5	<5	NS	NS	NS	NS	NS	<10
	5/7/2002		NS	NS	NS	NS	NS	NS	2	19	7	NS	NS	NS
	9/18/2002		<0.5	<1	<1	<1	<3.5	<5	NS	NS	NS	NS	<10	NS
MW-16	8/24/1995		0.70	0.80	7.30	2.70	11.50	5.00	NS	NS	NS	NS	NS	NS
	9/7/2000		<0.5	<1	<1	<1	<3.5	<5	NS	NS	NS	NS	NS	NS
	5/7/2002		NS	NS	NS	NS	NS	NS	<1	<1	<1	NS	NS	NS
MW-17	9/17/2002		<0.5	<1	<1	<1	<3.5	<5	NS	NS	NS	NS	<10	NS
	11/13/2001		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	9/18/2002		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
MW-18	11/13/2001		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	9/18/2002		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	11/13/2001		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
MW-19	9/17/2002		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	11/13/2001		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	9/17/2002		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
MW-20	11/13/2001		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	9/17/2002		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS
	11/13/2001		<0.5	<1	<1	<1	<3.5	<5	<1	<1	<1	NS	<10	NS



**Table 5**  
**Equipment Summary**  
**Circle K #2814**  
**ATC Project No. 05.16564.0405**

<u>Vacuum Recovery System</u>	
Manufacturer	Roots
Model	412 RAM-VJ
Minimum Required Flow	250 scfm
Minimum Required Vacuum	15.0 " Hg vacuum
Motor HP	25
Voltage / Phase	230 V / 3 Ph
XP / TEFC	XP
Anscillary Equipment	Specifications
Vacuum Indicator	0 - 30 " Hg vacuum gauge
Temperature Indicator	0 - 250 deg F temperature gauge
In-Line Particle Filter	4"
Moisture Separator	Rotron MS350B or Larger
Transfer Pump	Myers QP-10
Transfer Pump Motor HP	1.0 (do not use fractional HP motors - no cost savings)
XP / TEFC	TEFC
Air Flow Indicator	Rotron 550606, 70 - 350 scfm, 3"
Totalizer	1.5" Mastermeter
Portable Flow Indicator	Dwyer VFC-EC-122. 5 - 50 scfm
Hose Sets	Spiralite 160, 2"

<u>Air Stripper</u>	
Manufacturer	Nepcco
Model	Turbotray 242
Minimum Required Flow	15 gpm
Motor HP	3 HP
Voltage / Phase	230 V / 3 Ph
XP / TEFC	TEFC (Class I, Div II)
Transfer Pump	Myers QP-10
Transfer Pump Motor HP	1.0 (do not use fractional HP motors - no cost savings)
XP / TEFC	TEFC
Anscillary Equipment	Multilevel float switches, blower inlet silencer, blower pressure gauge, blower pressure switch, manual drain valve, check valve, brass gate valve, brass sample ports.

<u>Vapor Treatment</u>	
Equipment	Vapor Phase Carbon
Carbon Load (Per Vessel)	2,000 lbs
Inlet / Outlet Size & Type	4" Male Camlock
Total Number	2

System Enclosure

Enclosed trailer, minimum 7,000 lb gross vehicle weight, dual axles, electric brakes, double rear door, 36" side door

Maintenance & Miscellaneous

1-Year supply of oil, belts, filter elements, filter bags, to be included for all items. Must include shipping & disposal of used items & oil.  
 (2) copies of system manual must be provided

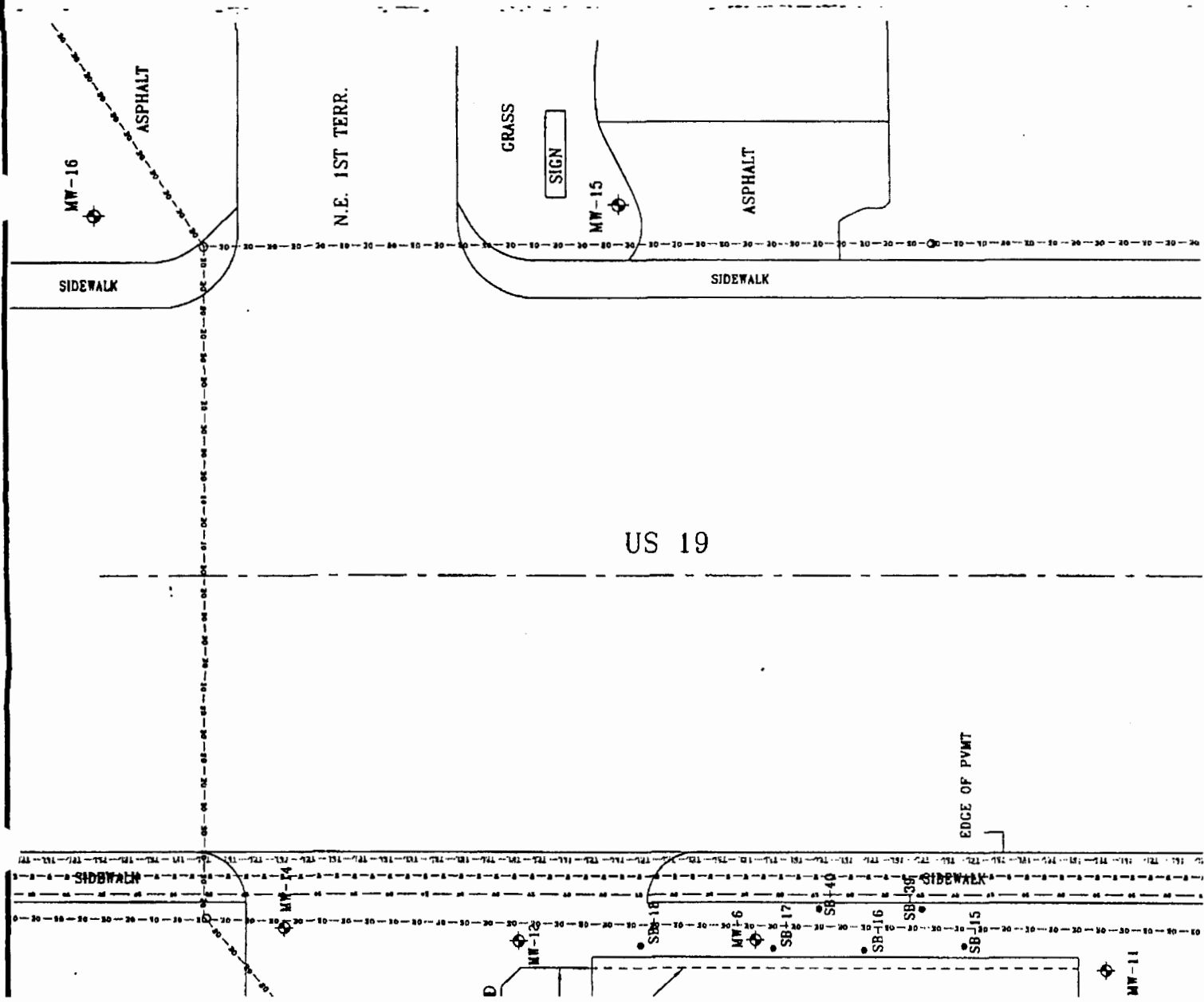
**Table 6**  
**Estimated System Construction Costs**  
**Circle K #2814**  
**Tampa, Florida**  
**ATC Project No. 05.16564.0405**

<u>Item</u>	<u>Estimated Cost</u>
<b>Equipment</b>	
Vacuum Pump and Appurtances	\$ 29,250.00
Vacuum Header Assemblies / Hose Connections	\$ 5,000.00
Air Stripper	\$ 19,500.00
Vapor Phase Carbon Cost	\$ 10,000.00
Main Control Panel	\$ 7,500.00
Trailer Enclosure	\$ 8,500.00
<b>Subcontractors</b>	
Vacuum Well Installation	\$ 4,000.00
Electrical	\$ 5,000.00
System Construction	\$ 30,800.00
<b>ATC Services</b>	
Engineering Services	\$ 2,078.00
Well Installation Oversight	\$ 4,157.00
System Construction Oversight	\$ 12,613.00
System Startup & Reporting	\$ 3,687.00
<b>Total</b>	<b>\$ 142,085.00</b>

**FIGURES**



LEGEND	
◆	MONITORING WELL LOCATION
⊙	ABANDONED MONITORING WELL
⊗	MISSING MONITORING WELL
⊖	DEEP MONITORING WELL LOCATION
●	SOIL BORING LOCATION
—○—	OVERHEAD ELECTRIC LINE
—T—	TELEPHONE LINE
—W—	WATER LINE
—S—	SANITARY SEWER LINE



US 19

N.E. 1ST TERR.

ASPHALT

GRASS

SIGN

ASPHALT

MW-16

MW-15

SIDEWALK

SIDEWALK

EDGE OF PVMT

SIDEWALK

SIDEWALK

MW-12

MW-13

MW-14

MW-17

MW-16

MW-15

MW-11

D

S

SB-18

SB-17

SB-16

SB-15

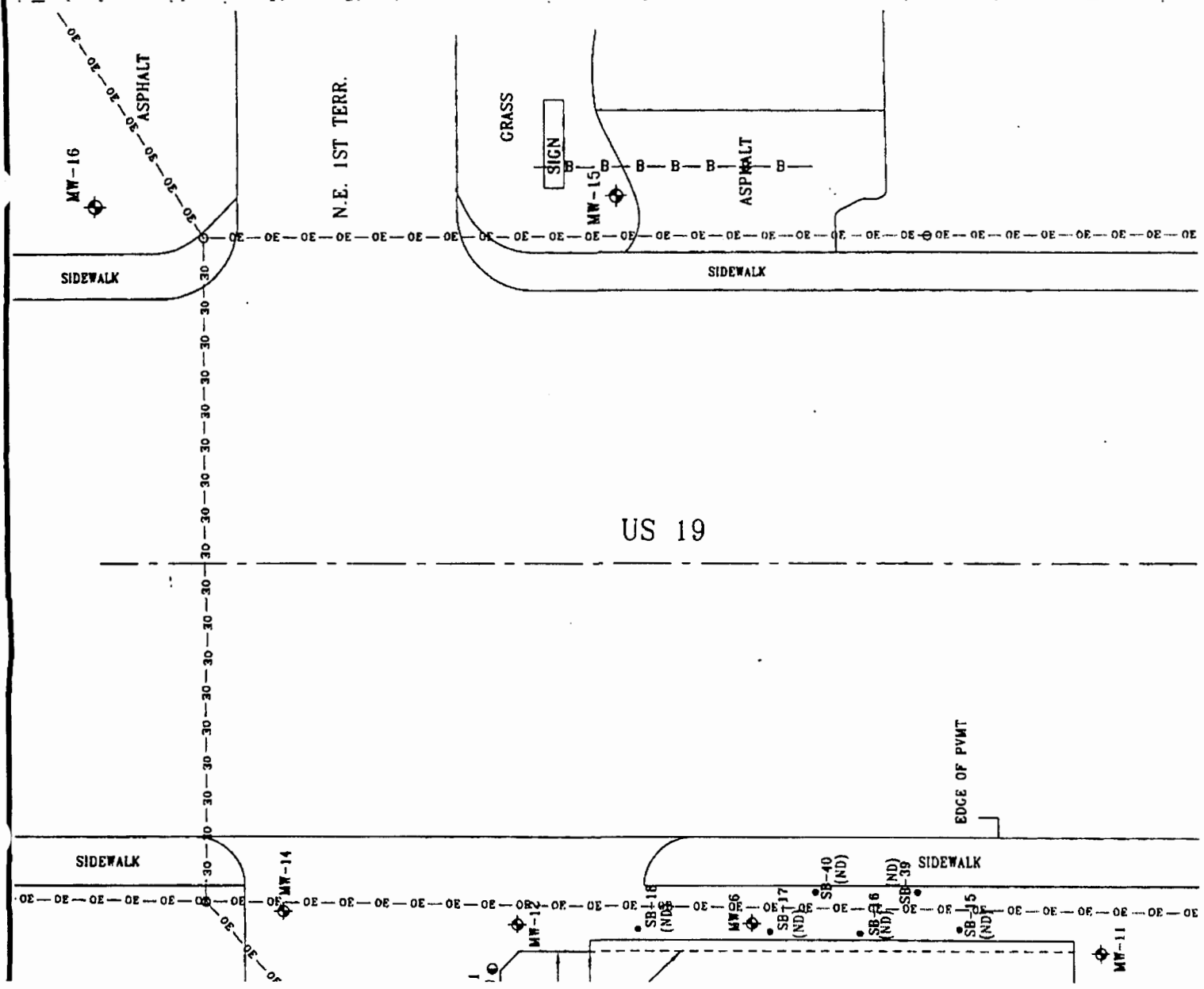
SB-14

SB-13

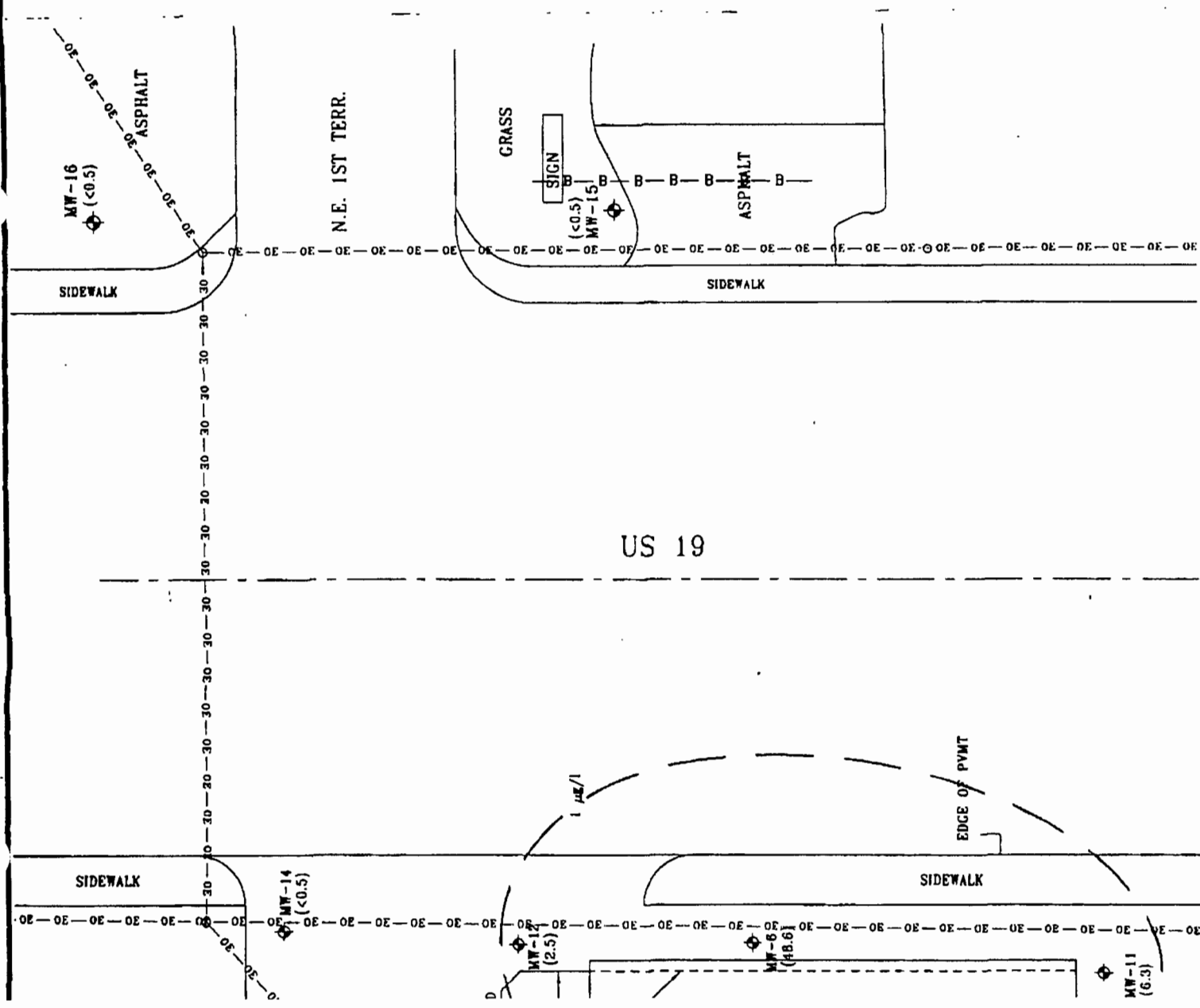
SB-12

SB-11

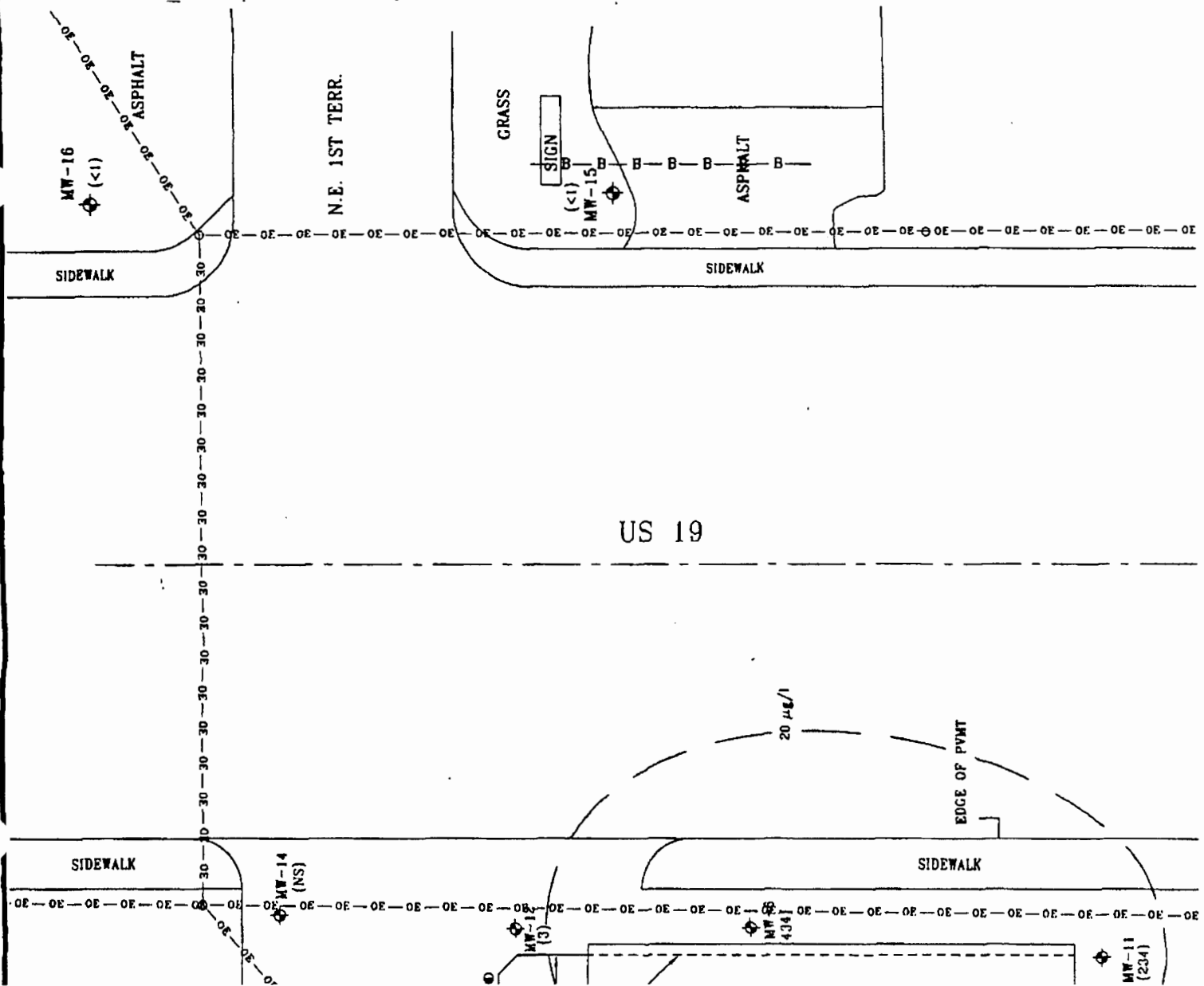
LEGEND	
◆	MONITORING WELL LOCATIONS
⊙	ABANDONED MONITORING WELL
⊗	MISSING MONITORING WELL
—○—	OVERHEAD ELECTRIC LINE
•	SOIL BORING LOCATION
●	DEEP MONITORING WELL



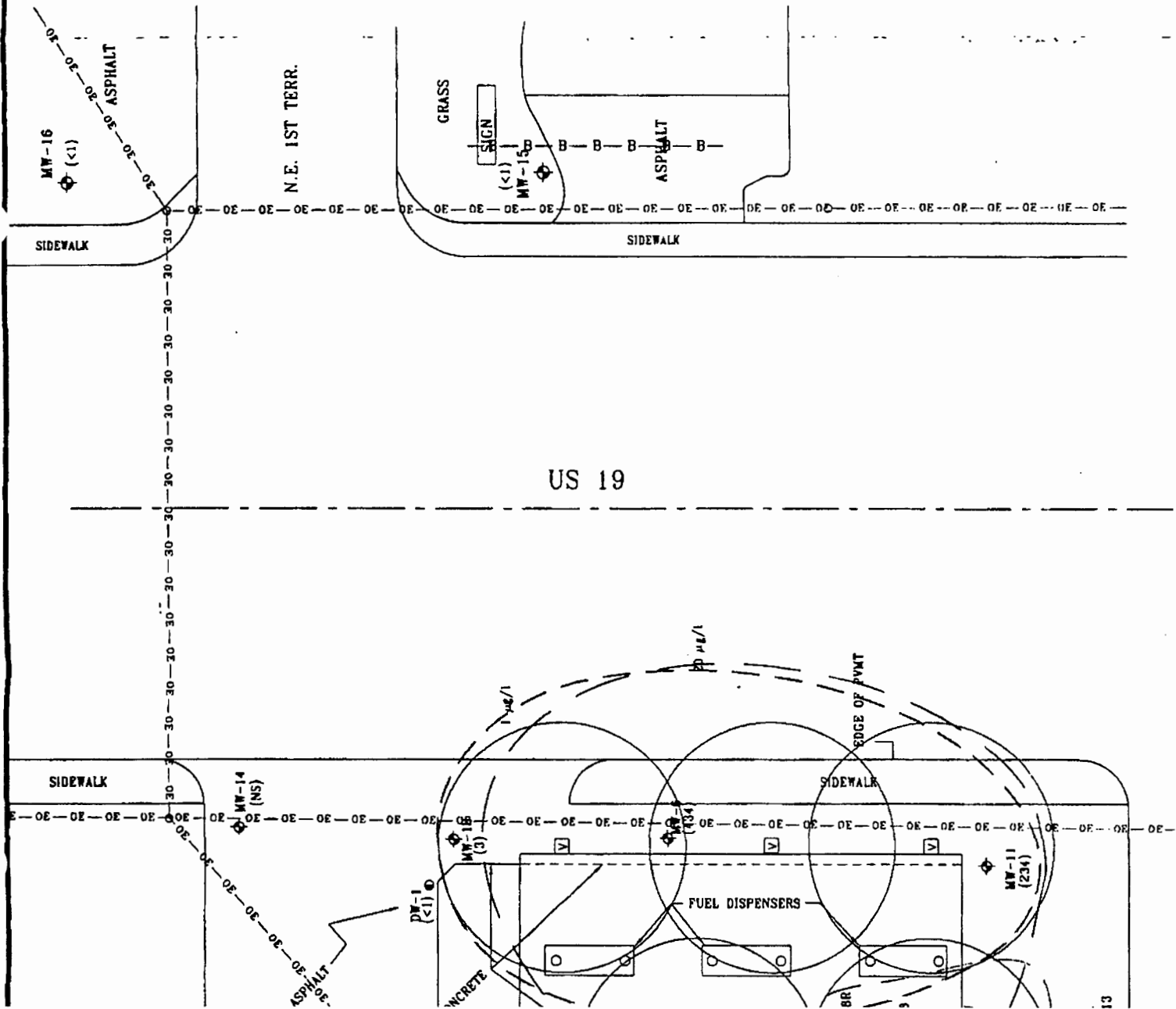
LEGEND	
◆	MONITORING WELL LOCATIONS
⊙	ABANDONED MONITORING WELL
⊗	MISSING MONITORING WELL
—○—	OVERHEAD ELECTRIC LINE
- - -	BENZENE PLUME
(6.3)	TOTAL BENZENE CONCENTRATIONS IN $\mu\text{g}/\text{l}$
◆	DEEP MONITORING WELL LOCATIONS
(NS)	NOT SAMPLED



LEGEND	
◆	MONITORING WELL LOCATIONS
⊙	ABANDONED MONITORING WELL
⊗	MISSING MONITORING WELL
—○—	OVERHEAD ELECTRIC LINE
- - -	NAPHTHALENE PLUME
(2)	TOTAL NAPHTHALENE CONCENTRATIONS IN $\mu\text{g}/\text{l}$
(NS)	NOT SAMPLED



LEGEND	
◆	MONITORING WELL LOCATIONS
⊙	ABANDONED MONITORING WELL
⊗	MISSING MONITORING WELL
—○—	OVERHEAD ELECTRIC LINE
---	NAPHTHALENE PLUME
(2)	TOTAL NAPHTHALENE CONCENTRATIONS IN $\mu\text{g}/\text{l}$
⊞	PROPOSED VACUUM RECOVERY WELL AND RADIUS OF INFLUENCE



2" HOSE SET (10' LENGTH) QTY:2  
 HOSE SETS TO BE SHIPPED IN BULK WITH LOOSE CAMLOCKS AND HOSE CLAMPS

TYPICAL OF 5

4" EXHAUST STACK

B 101  
 VACUUM BLOWER

FT 101

PDI 101

PP 101

MAIN CONTROL PANEL

1/2" SAMPLE PORT

P 101

AIR/WATER SEPARATOR T 101

AIR STRIPPER B 101

B-201

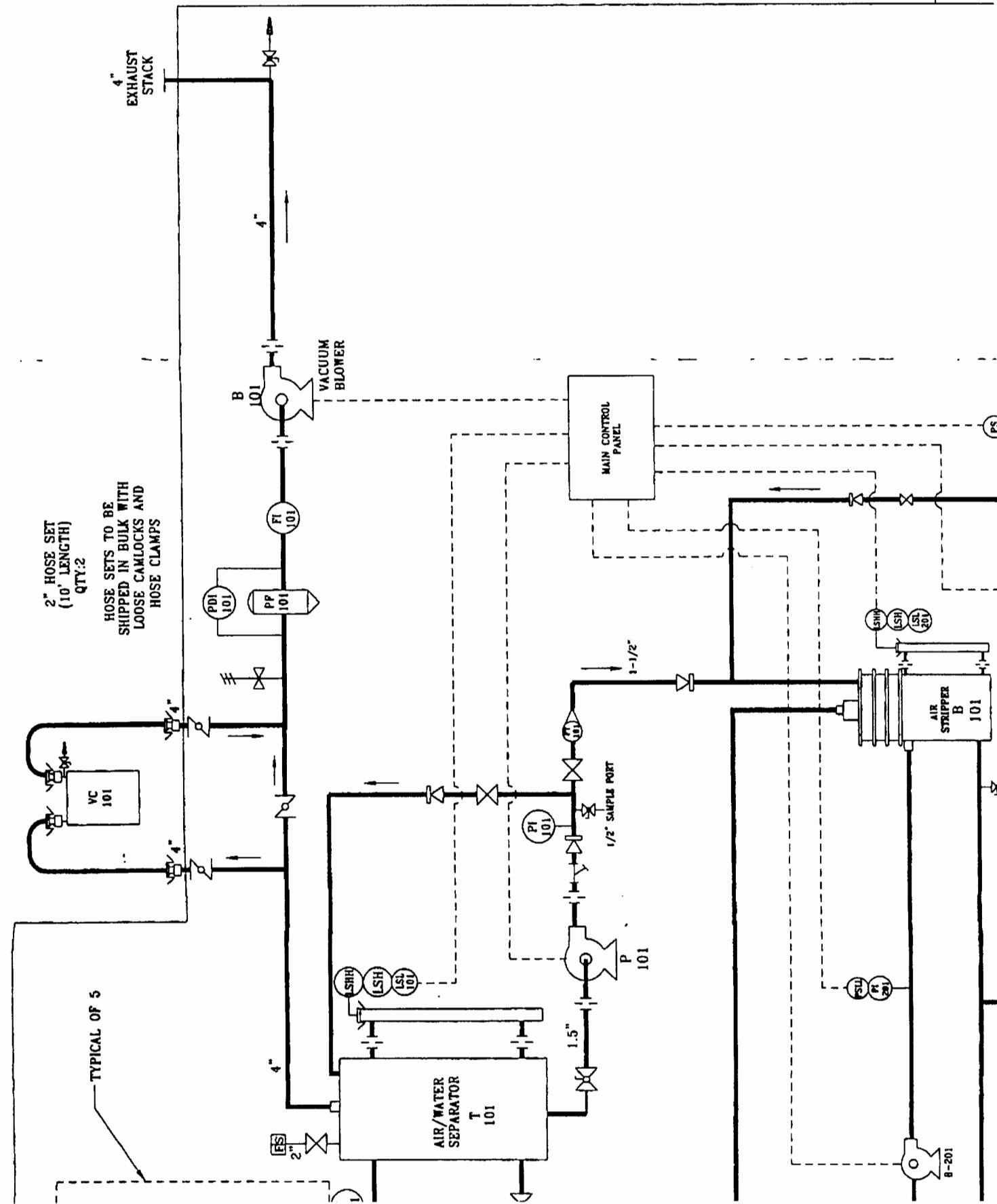
25 SPARE BAGS FOR BAG FILTER  
 INFILTRATION GALLERY HIGH LEVEL PROBE

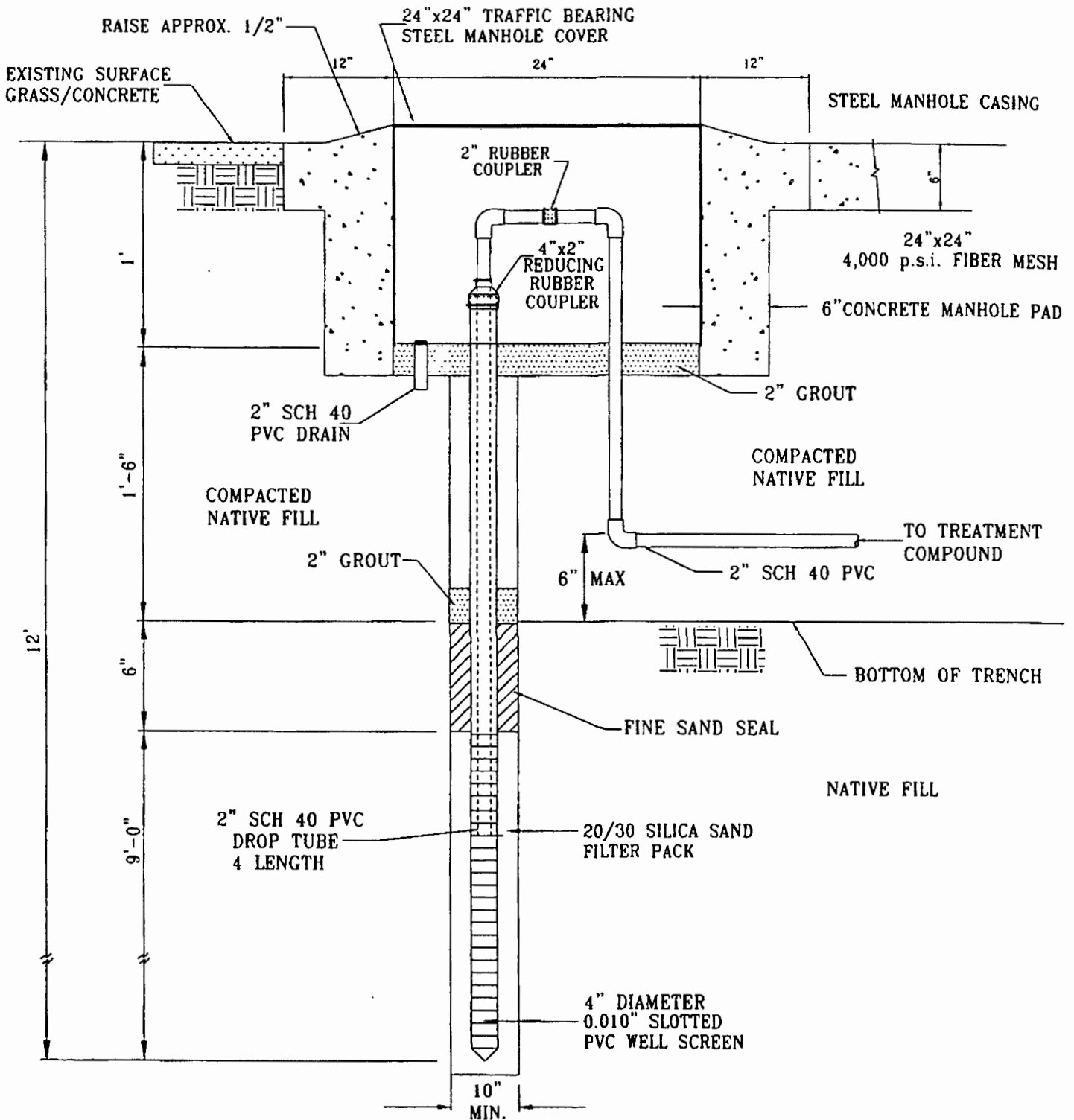
(1) 1-1/2" PART P CAMLOCKS

1-1/2" HOSE SET (20' LENGTH)

HOSE SETS TO BE SHIPPED IN BULK WITH LOOSE CAMLOCKS AND HOSE CLAMPS

ENCLOSURE WALL





**PROPOSED VAPOR RECOVERY WELL DETAIL**  
**UR-1 THROUGH UR-5**  
**SECTION VIEW**  
 NOT TO SCALE



5801 Benjamin Center Drive  
 Suite 101  
 Tampa, Florida 33634  
 (813) 880-8960  
 (813) 880-8754 FAX

Associates Inc.

**PROPOSED VAPOR RECOVERY WELL**  
**CONSTRUCTION DETAIL**  
**CIRCLE K STORE #2814**  
**16 NE US HIGHWAY 19**  
**CRYSTAL RIVER, FLORIDA**

PROJECT NO.:  
 05-16564.0405

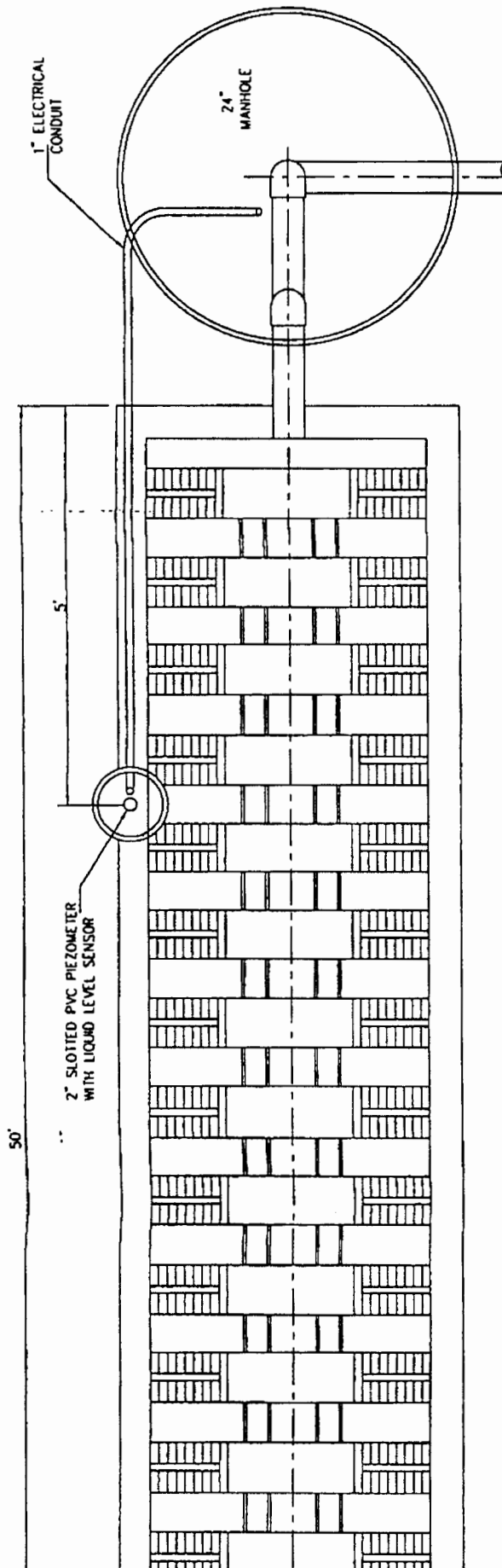
SCALE:  
 NOT TO SCALE

DATE: 12-27-02

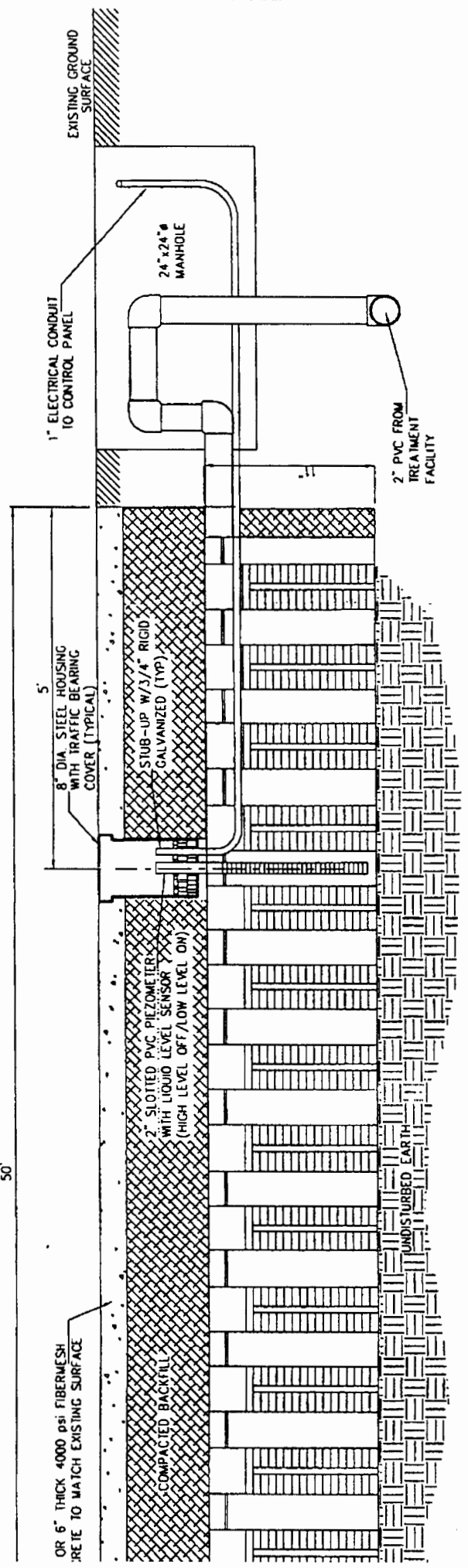
FIGURE NO.: 7

DRAWN BY: SAM

CHECKED BY: P.W.

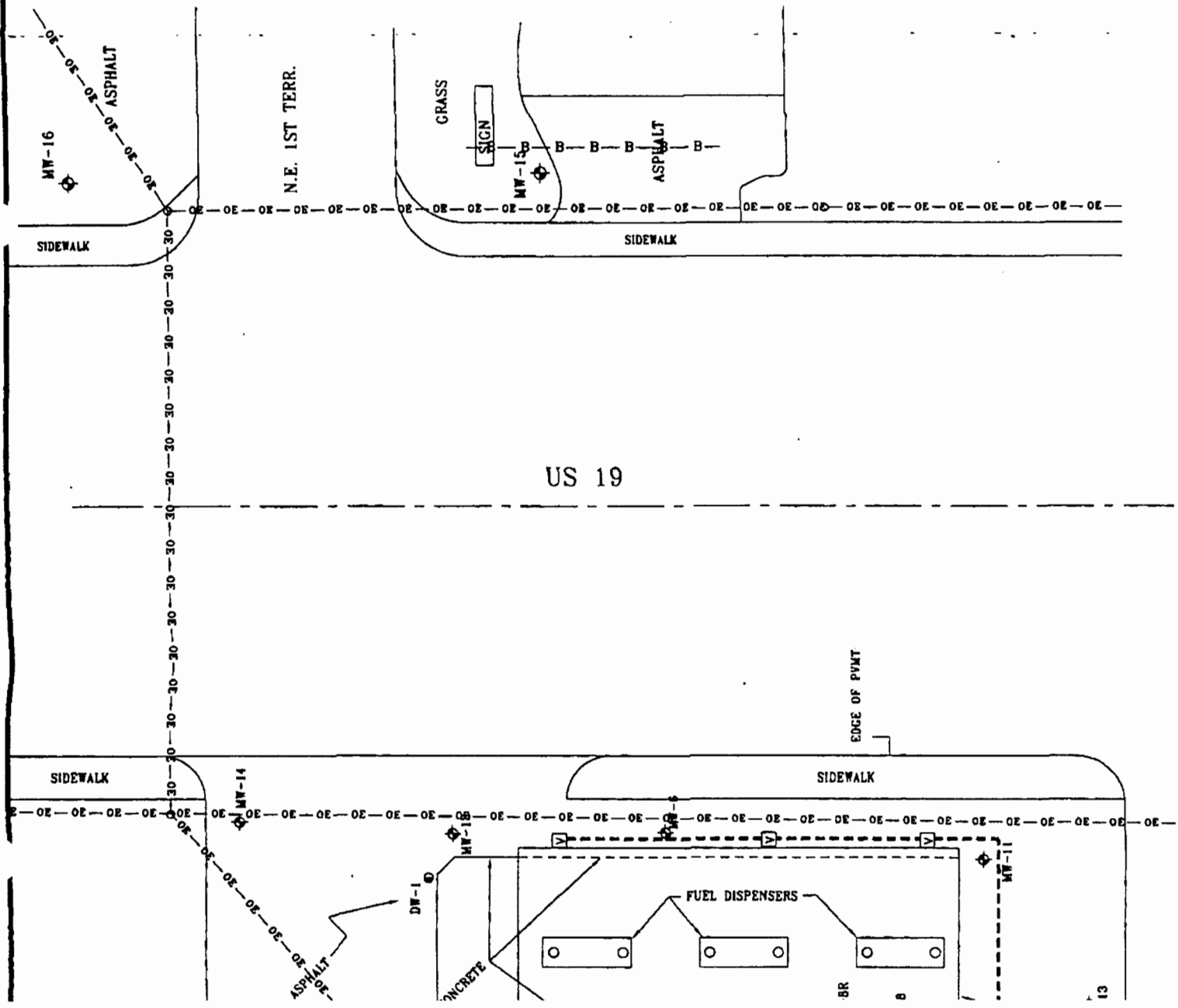


PLAN VIEW  
N.T.S.





LEGEND	
◆	MONITORING WELL LOCATIONS
⊙	ABANDONED MONITORING WELL
⊗	MISSING MONITORING WELL
-○-	OVERHEAD ELECTRIC LINE
- - -	PROPOSED TRENCHING LINES



**Site No. 70 Touch of Quality Cleaners**  
471 Kings Bay Plaza (NE First Terrace)  
Crystal River, Florida  
FDEP I.D. Nos. 099502006 and 098944869  
EPA I.D. No. FLD982118788



70

# CITRUS COUNTY FIRE PREVENTION BUREAU

1300 S. LECANTO HWY.  
LECANTO, FLORIDA 32661

Officer:  
William M. (Mike) Connell

(904) 746-1335

Date: September 28, 1990

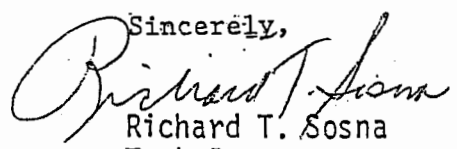
Name: Mr. Russ Powell  
Company: Touch of Quality Cleaners  
Street: 471 Kings Bay Plaza  
State: Crystal River, Florida 32629

DER FAC # 098944869  
Establishment: Touch of Quality  
Address: 471 Kings Bay Plaza  
Crystal River, Florida  
32629

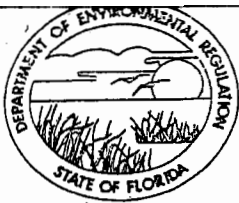
Dear: Mr. Powell,

Attached are the 17-61 Florida Administrative Code compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-61, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank systems.

If you have any questions concerning this letter please call us at (904) 746-1335.

Sincerely,  
  
Richard T. Sosna  
Tank Inspector

jf



State of Florida  
Department of Environmental Regulation  
**Pollutant Storage Tank System  
Inspection Report Form**

F. ID No.: 098944869 County: CITRUS  
 Facility Name: TOUCH OF QUALITY CLEANERS  
 Facility Location: 471 ~~HE 18~~ HIGHWAY CRYSTAL RIVER, FL 30029  
 Operator: KINGS BAY PLAZA Phone: 795-2871  
 Owner: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Latitude 28° 53' 49" N Longitude 82° 35' 10" W Section \_\_\_\_\_ Township \_\_\_\_\_ Range \_\_\_\_\_

Tank #	Size	Contents	Installation Date	U/A or In-Contact	Tank Construction	Integral Piping	Monitoring System	Tank Status
<u>1</u>	<u>1000</u>	<u>M</u>	<u>X/81</u>	<u>U</u>	<u>C</u>	<u>C</u>	<u>T</u>	<u>U</u>

Comments: TANK HOLDS BOILER GENERATOR DIESEL  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
RWS Power

<b>Inspection Type:</b> <input type="checkbox"/> Complaint Response <input checked="" type="checkbox"/> Initial <input type="checkbox"/> EDI <input type="checkbox"/> Public Well Field <input type="checkbox"/> Reinspection <input type="checkbox"/> Installation <input type="checkbox"/> Tank Removal <input type="checkbox"/> Unregistered	<b>Facility Information:</b> <input type="checkbox"/> Abandoned <input type="checkbox"/> Aboveground <input type="checkbox"/> Govt.-Federal <input type="checkbox"/> Govt.-Other <input checked="" type="checkbox"/> Non-retail <input type="checkbox"/> Retail <input type="checkbox"/> Retrofit (M. or O.) <input type="checkbox"/> Retrofit (L. or R.)
---	---

DER District: SOUTHWEST  
Richard T. Lane 9/27/90  
 Inspector's Signature & Date

Local Program: CITRUS COUNTY FIRE PREVENTION  
[Signature]  
 Facility Contact's Signature & Date

Violations must be corrected by: next routine inspection  or by:  9 / 27 / 91  
 mo day yr

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query**Facility ID#:** 8944869**Name:** Touch Of Quality Cleaners  
471 Ne 1st Ter  
Crystal River, FL 32629- 4250**Contact:** Powell Russ**Phone:** 904-795-7871**District:** SWD**County:** Citrus**Type:** C-Fuel User/Non-Retail**Status:** Open**Latitude:** 28:53:49.0000**Longitude:** 82:35:10.0000**LL Method:** UNVR-Unverified**Account Owner:** Powell, Russ

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1	1000	Fuel Oil-Onsite Heat	07/01/1981	UNDER	In Service	C	C	I

**\*\*\*Note:****Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query**Facility ID#:** 9502006**Name:** Touch Of Quality Cleaners (Moved)

471 Kings Bay Plaza

Crystal River, FL 34429- 4717

**Contact:** Russell Powell**Phone:** 352-795-7871**District:** SWD**County:** Citrus**Type:** 6-Dryclean-Related Ot**Status:** Closed**Latitude:** 28:53:30.9730**Longitude:** 82:35:11.7960**LL Method:** ADDM-Address Matchir**Account Owner:** Touch Of Quality Cleaners

Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1		Tetrachloroethylene		ABOVE	Removed			

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

Florida Department of Environmental Protection  
Bureau of Petroleum Storage Systems  
Storage Tank Facility Query

---

**Facility ID#:** 9502003

**Name:** Touch Of Quality Cleaners  
3956 Suncoast Blvd  
Homosassa, FL 34448- 2601

**Contact:** Russell Powell

**Phone:** 352-796-7965

**District:** SWD

**County:** Citrus

**Type:** 3-Dry Drop-Off

**Status:** Closed

**Latitude:** 28:47:23.3520

**Longitude:** 82:34:02.9064

**LL Method:** ADDM-Address Matching

**Account Owner:** Touch Of Quality Cleaners

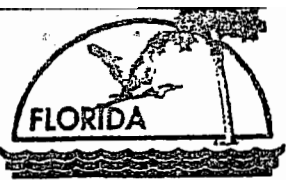
Tank #	Size	Content	Installed	Placement	Status	Construction	Piping	Monito
1		Tetrachloroethylene		ABOVE	Removed			

**\*\*\*Note:**

**Construction, Piping, and Monitoring Info not shown for CLOSED tanks  
(Status A: Closed in Place, B: Removed from the site).**

**Site No. 75 Former Fox Automotive Service (Fina - Franks)**  
Suncoast Boulevard and SR 44  
Crystal River, Florida  
FDEP I.D. No. 098503061





# Department of Environmental Protection

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

Gov. Jeb Bush  
Governor

May 24, 1999

Kathy George  
Bria Family Trust  
4917 Booth Rd  
Plant City, FL 33565

Re: Fina-Frank's  
FDEP Facility # 098503061  
Discharge Date: December 1, 1988


Dear Kathy George:

The Florida Department of Environmental Protection is required to direct the cleanup of petroleum contamination sites in priority order and to preapprove the scope and cost of all work that is funded by the State. The priority order for cleanup is determined pursuant to the Petroleum Cleanup Site Priority Ranking Rule, Chapter 62-771, Florida Administrative Code.

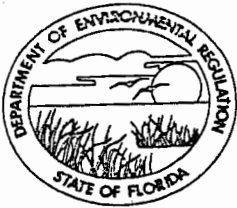
This site has been assigned a priority score of 55. Currently funding is available for all sites with a priority score of 50 or greater. Therefore, funding is available for work on this site under the Preapproval Program. In the Preapproval Program the Department works directly with the contractor of your choice to determine the scope and cost for cleanup work. Payment is made by the Department promptly upon completion of the work. You should indicate your choice of contractor by completing and returning the enclosed "Contractor Designation/Point of Contact Designation". If you would prefer the state to manage the cleanup of your site, complete the enclosed CDF and designate the state as the contractor. Please note that this form is designed to be completed by the "Real Property Owner". If you would prefer that we coordinate our efforts with your representative, then please indicate this person on the "Real Property Owner Designated Contact" line. If you have previously submitted a Contractor Designation form, you do not have to return the enclosed one.

The real property owner's signature must be notarized and the original form returned to Rebecca Marx, Mail Station 4545 at the letterhead address. She may be reached at (850) 921-9050.

If you have any questions or comments on your site's score or rank, please contact me at (850) 487-3299 or Mail Station 4545 at the letterhead address.

Sincerely,  
  
Grace Rivera  
Environmental Specialist III

GR  
Enclosure: Contractor Designation/Point of Contact Designation blank form  
cc: Southwest District  
File



State of Florida  
Department of Environmental Regulation

# Pollutant Storage Tank System Inspection Report Form

Facility ID No.: 098503061 County: CITRUS  
 Facility Name: FINA-FRANK'S  
 Facility Location: US 19 # 1244 CRYSTAL RIVER, FL. 32629  
 Operator: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Owner: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Latitude 28° 53' 53" N, Longitude 82° 50' 13" W, Section \_\_\_\_\_ Township \_\_\_\_\_ Range \_\_\_\_\_

Tank #	Size	Contents	Installation Date	U/A or In-Contact	Tank Construction	Integral Piping	Monitoring System	Tank Status
1	4000	XL 168	B	U	C	C	I	B
2	4000	Xx168	B	U	C	C	I	B
3	4000	Xx168	B	U	C	C	I	B
4	4000	Xx168	B	U	C	C	I	B
5	550	Xx170	K	U	C	C	I	B
6	550	Xx170	L	U	C	C	I	B

Comments: TANKS WERE REMOVED IN 1989 SOIL SAMPLES WERE  
SATISFACTORY

<b>Inspection Type:</b> <input type="checkbox"/> Complaint Response <input checked="" type="checkbox"/> Initial <input type="checkbox"/> EDI <input type="checkbox"/> Public Well Field <input type="checkbox"/> Reinspection <input type="checkbox"/> Installation <input checked="" type="checkbox"/> Tank Removal <input type="checkbox"/> Unregistered	<b>Facility Information:</b> <input checked="" type="checkbox"/> Abandoned <input type="checkbox"/> Aboveground <input type="checkbox"/> Govt.-Federal <input type="checkbox"/> Govt.-Other <input type="checkbox"/> Non-retail <input checked="" type="checkbox"/> Retail <input type="checkbox"/> Retrofit (M. or O.) <input type="checkbox"/> Retrofit (L. or R.)
--	--

DER District: SOUTHWEST.

Local Program: CITRUS COUNTY FIRE PREVENTION

Inspector's Signature & Date

Facility Contact's Signature & Date

Violations must be corrected by: next routine inspection  or by:     /    /     
 mo / day / yr



# Department of Environmental Regulation Inspection Form — UST Compliance Section

Facility # 048503061  
Date 9/20/90

**REGISTRATION/NOTIFICATION:**

1. Facility has properly registered all applicable tanks on site? 17-61.050(1)(a).
2. Current Registration placard is properly displayed? 376.303(1)(b), F.S.
3. Proper notification has been made for the following: 17-61.050(1)(b)
  4. abandonment
  5. facility sale
  6. retrofitting
  7. tank test failure
  8. discharges
  9. monitoring response

	Yes	No	Unk	N/A
1				✓
2				
3				
4				
5				
6				
7				
8				
9				

**II. TANK STATUS:**

10. Tank Designated Out of Service: 17-61.050(3)(b)1.:
  11. inventory + monitoring records kept or
  12. secured against tampering
13. Tanks properly abandoned? 17-61.050(3)(c)
  14. in place or
  15. removed

10	✓			
11				✓
12	✓			
13	✓			
14				✓
15	✓			

**III. OPERATION AND MAINTENANCE:**

16. The schedule for retrofitting has been met? 17-61.060(2)(c) & (3)(b)2.
  17. overfill protection
  18. piping and/or
  19. tanks
20. Structure-to-soil potential test schedules for sacrificial anode protected systems are being met?
  21. tanks 17-61.060(2)(d)1.a.
  22. piping 17-61.060(3)(b)1.b.
23. Impressed current protected systems are continuously energized and metered?
  24. tanks 17-61.060(2)(d)1.b.
  25. piping 17-61.060(3)(b)1.c.

16				✓
17				
18				
19				
20				
21				
22				
23				
24				
25				

**IV. INVENTORY REQUIREMENTS:**

26. Daily inventory records maintained? 17-61.050(4)(c)2.a.
  27. water
  28. product
  29. meter readings
30. Inventory reconciliation is performed? 17-61.050(4)(c)2.b.
  31. each 5 consecutive readings
  32. once a week
  33. alternate procedure
34. Significant loss/gain investigation 17-61.050(4)(c)3.
  35. performed
  36. found source of discrepancy, and/or
  37. followed up with precision testing? 17-61.050(4)(c)

26				✓
27				
28				
29				
30				
31				
32				
33				
34				
35				
36				
37				



# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

MAR 4 2002

**CERTIFIED MAIL**  
**RETURN RECEIPT REQUESTED**

Mr. Martin T. Hogan  
Shamrock Ventures, Inc.  
2401 Fountainview  
Suite 801  
Houston, Texas 77057

Subject: Site Rehabilitation Completion Order  
Franks Fina  
310 Northeast US Highway 19  
Crystal River, Citrus County  
FDEP Facility ID# 098503061  
Discharge Date: December 1, 1988 (EDI)

Dear Mr. Hogan:

The Bureau of Petroleum Storage Systems has reviewed the Site Rehabilitation Completion Report (SRCR) dated and received February 1, 2002, and the Monitoring Well Abandonment Report dated February 26, 2002 (received February 28, 2002), prepared by ATC Associates, Inc., for this site. Documentation submitted with the SRCR confirms that criteria set forth in Rule 62-770.680(1), Florida Administrative Code (F.A.C.), have been met. The SRCR is hereby incorporated by reference in this Site Rehabilitation Completion Order (Order). Therefore, you are released from any further obligation to conduct site rehabilitation at the site for petroleum product contamination associated with the discharge listed above, except as set forth below.

In the event concentrations of petroleum products' contaminants of concern increase above the levels approved in this Order, or if a subsequent discharge of petroleum or petroleum product occurs at the site, the Department of Environmental Protection (Department) may require site rehabilitation to reduce concentrations of petroleum products' contaminants of concern to the levels approved in the SRCR or otherwise allowed by Chapter 62-770, F.A.C.

### Legal Issues

The Department's Order shall become final unless a timely petition for an administrative proceeding (hearing) is filed under Sections 120.569 and 120.57, Florida Statutes (F.S.), within 21 days of receipt of this Order. The procedures for petitioning for a hearing are set forth below.

Persons affected by this Order have the following options:

If you choose to accept the above decision by the Department about the Site Rehabilitation Completion Report you do not have to do anything. This Order is final and effective as of the date on the top of the first page of this Order.

If you disagree with the decision, you may do one of the following:

- (1) File a petition for administrative hearing with the Department's Office of General Counsel within 21 days of receipt of this Order; or
- (2) File a request for an extension of time to file a petition for hearing with the Department's Office of General Counsel within 21 days of receipt of this Order. *Such a request should be made if you wish to meet with the Department in an attempt to informally resolve any disputes without first filing a petition for hearing.*

Please be advised that mediation of this decision pursuant to Section 120.573, F.S., is not available.

### How to Request an Extension of Time to File a Petition for Hearing

For good cause shown, pursuant to Rule 62-110.106(4), F.A.C., the Department may grant a request for an extension of time to file a petition for hearing. Such a request must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Shamrock Ventures, Inc., shall mail a copy of the request to Shamrock Ventures, Inc. at the time of filing. Timely filing a request for an extension of time tolls the time period within which a petition for administrative hearing must be made.

### How to File a Petition for Administrative Hearing

A person whose substantial interests are affected by this Order may petition for an administrative hearing under Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000,

within 21 days of receipt of this Order. Petitioner, if different from Shamrock Ventures, Inc., shall mail a copy of the request to Shamrock Ventures, Inc. at the time of filing. Failure to file a petition within this time period shall waive the right of anyone who may request an administrative hearing under Sections 120.569 and 120.57, F.S.

Pursuant to Section 120.54(5)(b)4.a., F.S., and Rule 28-106.201, F.A.C., a petition for administrative hearing shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the name, address, and telephone number of the petitioner's representative, if any, the site owner's name and address, if different from the petitioner, the FDEP facility number, and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) An explanation of how each petitioner's substantial interests are or will be affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by the petitioner, or a statement that there are no disputed facts;
- (e) A statement of the ultimate facts alleged, including a statement of the specific facts the petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Department's action or proposed action.

This Order is final and effective as of the date on the top of the first page of this Order. Timely filing a petition for administrative hearing postpones the date this Order takes effect until the Department issues either a final order pursuant to an administrative hearing or an order responding to supplemental information provided pursuant to meetings with the Department.

#### Judicial Review

Any party to this Order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within 30 days after this Order is filed with the clerk of the Department (see below).

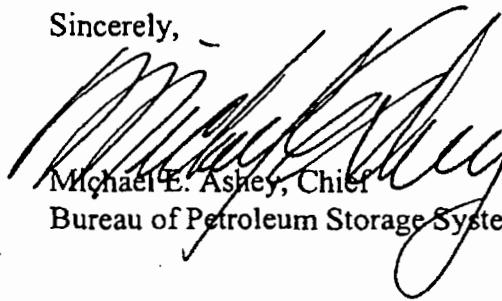
Mr. Martin T. Hogan  
Page four

The FDEP Facility Number for this site is 098503061. Please use this identification on all future correspondence with the Department.

Questions

Any questions regarding the Department's review of your Site Rehabilitation Completion Report should be directed to Laura J. Mooney at (850) 921-0846. Questions regarding legal issues should be referred to the Department's Office of General Counsel at (850) 488-9314. Contact with any of the above does not constitute a petition for administrative hearing or request for an extension of time to file a petition for administrative hearing.

Sincerely,



Michael E. Ashley, Chief  
Bureau of Petroleum Storage Systems

MEA/ljm

cc: Laurel Culbreth, FDEP Southwest District Office  
Mr. Kevin Stites, ATC Associates, Inc., 5801 Benjamin Center Drive, Suite 101, Tampa,  
Florida 33634  
File

**FILING AND ACKNOWLEDGMENT**

FILED, on this date, pursuant to  
§120.52 Florida Statutes, with the  
designated Department Clerk, receipt  
of which is hereby acknowledged.

Joanie Diestelhorst  
Clerk

3/4/02  
Date

P.G. CERTIFICATION

Site Rehabilitation Completion Report for Franks Fina, 310 Northeast US Highway 19, Crystal River, Citrus County, FDEP Facility ID# 098503061.

I hereby certify that in my professional judgment, the components of this Site Rehabilitation Completion Report satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the conclusions in this report provide reasonable assurances that the objectives stated in Chapter 62-770, F.A.C., have been met.

I personally completed this review.

This review was conducted by Laura J. Mooney *ljm*  
working under my direct supervision.



*Diane Pickett*  
Diane Pickett, P.G.  
Professional Geologist  
Petroleum Cleanup Section 3

2/25/02  
Date



**Site No. 76 Chevron (Sunmart #22)**  
639 NE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503047



Storage Tank Facility Compliance Inspection Report

Facility ID 8503047 County 09 CITRUS Inspection Date 10/6/00  
 Facility Name CHEVRON Facility Type A-RETAIL  
 Latitude 28° 53' 59" Longitude 82° 35' 17" L/L Method AGPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>3</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	<u>Comments. X Release Detection:</u>	
	<u>① SIR Reports By teledata:</u>	
	<u><del>12/29/99</del> 1/99 to 8/2000</u>	
	<u>3/99 no reports closed.</u>	
	<u>2/99 Tank 1 &amp; 2 INK. Reopening</u>	
	<u>1/2000 ALL INC. Not enough Data. (closed 1/2 mark)</u>	
	<u>7/2000 ALL INC. Not enough Data. (closed 1/2 mark)</u>	
	<u>ALL OTHERS ALL PASSING.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: FPLIPA Effective Date: 12/29/99 Expiration Date: 12-31-00

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS CNTY ENV HEALTH</u>	<u>352-527-5295</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. Mark Sumner</u>	<u>Carol E. Ford</u>
Inspector Name - Please Print	Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>10/6/00</u>	<u>Carol E. Ford</u>
Inspector Signature & Date	Facility Representative Signature & Date

Facility Name: CHEVRON

Facility ID: 8503047

Date: 10/6/00

Date	Description / Inspector's Comments
Comments	* Release Detection Conts
	② Lines and Line leak detectors were tested 2/2000 By Down undd tank testers all passed
	③ Dispenser lines are checked monthly by HY TECH ENVIRONMENTAL and any conditions are noted on log sheet.
	④ Tanks were tested in 1998 and are due again in 2001
	* Conditions noted at time of inspection:
	① Pills were marked per API 1637
	② ALL 4 Dispenser lines were dry.
	③ the Soil has been removed around the STPs and the Swing Joints are wrapped.
	④ The 4 Monitor wells are open, they are marked as assessment due to PLIRP status.
	⑤ placard is displayed at facility.
	* Recommendations
	① have the position of the Slear valves checked and be sure they are mounted tightly.

October 12, 2000

Mr. Carl Exford  
Central Florida Petroleum  
P.O. Box 1110  
Brandon, FL 33509

RE: ID # 098503047  
Chevron  
639 N.E. Hwy. 19  
Crystal River, FL 34429

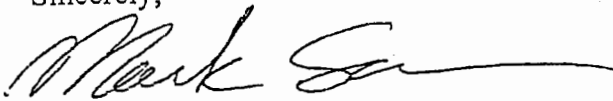
Dear Mr. Exford:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Enclosed, please find a copy of the Storage Tank Facility Compliance Inspection Report for the inspection recently performed at the above named facility. Please refer to this report for comments regarding the inspection.

If there are any questions concerning this matter, you may contact the Storage Tank Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

Enclosure(s)

CMS/file

---

## CITRUS COUNTY DEPARTMENT OF HEALTH

ENVIRONMENTAL HEALTH DIVISION  
STORAGE TANKS INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316



This data is current as of: 06-OCT-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 8503047	District: SWD
Name: CHEVRON	County: Citrus
639 Ne Hwy 19	Type: Retail Station
Crystal River, FL 34429	Status: Open
Contact:	Latitude: 28:53:59.0000
Phone: 352-795-3130	Longitude: 82:35:17.0000
	LL Method: AGPS

} CMS

**Account Owner Information**

Name: Central Fl Petroleum Dist Lc  
 Po Box 1110  
 Brandon, FL 33509-1110  
 Phone: 813-681-4279

**Tank Owner Information**

Name: Central Fl Petroleum Dist Lc  
 Po Box 1110  
 Brandon, FL 33509-1110  
 Phone: 813-681-4279

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
--------	------	---------	-----------	-----------	--------	-------	------	---------

1R1	10000	Unleaded Gas	06/01/1987	UNDER	U	A F <del>X</del> M O	C K J	S H 4
2R1	10000	Unleaded Gas	06/01/1987	UNDER	U	A F <del>X</del> M O	C K J	S H 4
3R1	10000	Unleaded Gas	06/01/1987	UNDER	U	A F <del>X</del> M O	C K J	S H 4
1	6000	Leaded Gas	07/01/1963	UNDER	B			
2	6000	Unleaded Gas	07/01/1963	UNDER	B			
3	6000	Unleaded Gas	07/01/1963	UNDER	B			

} CMS

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).



Department of  
Environmental Protection

Lawton Chiles  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Virginia B. Wetherell  
Secretary

November 30, 1994

Mr. Bill Hanley  
Central Florida Oil Company  
Post Office Box 428  
Ocala, Florida 34478-0428

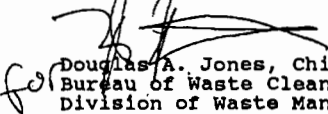
SUBJECT: Sunmart #22  
U.S. Highway 19  
Crystal River, Citrus County  
FDEP Facility ID #098503047

Dear Mr. Hanley:

The Department has completed a contamination assessment at this site in accordance with its eligibility for the Early Detection Incentive Program created by the State Underground Petroleum Environmental Response Act. The results of the assessment indicate that the site meets the criteria in Section 62-770.600(5), Florida Administrative Code (FAC), which are used to determine when "no further action" is necessary at a petroleum contamination site. No additional assessment or cleanup will be conducted by the Department or its contractors. If a new discharge of petroleum or petroleum product occurs, you will be responsible for all corrective actions required by Chapter 62-761, 62-762 and 62-770, FAC.

Please contact Rebecca Lockenbach at 904/487-3299 or the above address if you have any questions about this site.

Sincerely,

  
Douglas A. Jones, Chief  
Bureau of Waste Cleanup  
Division of Waste Management

DAJ/r11

cc: Suzanne Schomer, RUST  
Ken Weber, SWFWMD  
Nancy Evans, FDEP, Tampa

"Protect, Conserve and Manage Florida's Environment and Natural Resources"

Printed on recycled paper.

  
D0062931

**Site No. 77 BP Shop (aka Giant #107/Co-Op Oil Company #3)**  
662 NE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503139



### Storage Tank Facility Compliance Inspection Report

Facility ID 8503139 County 09 CITRUS Inspection Date 10/27/00

Facility Name GIANT # 107 Facility Type A-RETAIL

Latitude 28°54'00" Longitude 82°35'58" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected 5 # ASTs Inspected

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project	

"Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<del>610(4)(a)2</del>		
<u>610(4)(a)2</u>	IT IS UNKNOWN IF THE SINGLE WALLED PRESSURIZED PIPING THAT IS EQUIPPED WITH MECHANICAL LINE LEAK DETECTORS HAS BEEN TIGHTNESS TESTED ANNUALLY.	
<u>640(3)(d)</u>	IT IS UNKNOWN IF THE MECHANICAL LINE LEAK DETECTORS HAVE HAD THEIR ANNUAL TEST OF OPERATION.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.  
 Insurance Carrier: C&I Effective Date: 1/9/00 Expiration Date: 1/9/01  
 Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_  
 None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  
 Yes  No  CWOE - Compliance without Enforcement  
A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>JERRY ROBERTS</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>10/27/00</u> Inspector Signature & Date	<u>Jerry Roberts</u> <u>Oct 27, 00</u> Facility Representative Signature & Date



Facility Name: Grant #107 Facility ID: 850339 Date: 10/27/00

F Cite 62-761 Description / Inspector's Comments

<p>400(1)(b)2a</p>	<p>The Components of the Storage tank System that are Cathodically protected have not been tested annually as required.</p>
	<p style="text-align: center;">* Comments *</p>
<p>→</p>	<p>Release detection is SIK By USTMan records reviewed from 10/99 → 9/2000 6/2000 was inconclusive on pieuman, all others pass no fails no Consc. inc.</p>
<p>→</p>	<p>System also equipped with a Veeva Rot TLS 250 not used for Release detection.</p>
<p>→</p>	<p>placard is current, The RDRL is on file, and the dispenser lines are visually inspected monthly.</p>
<p>→</p>	<p>During this inspection it was noted that all Gas dispenser liners were dry, and that diesel #12, 13, &amp; had ~ 1-3 inches of liquid. *(please provide documentation of the liquid removal)*</p>
<p>→</p>	<p>The monitor wells appear to have been closed, But *(please provide verification)* if not closed wells will have to be properly abandoned.</p>



**FRS  
ENVIRONMENTAL  
REMEDICATION, INC.**

**ORIGINAL**

• UST Management • Hazardous Waste Management • Environmental Remediation • Environmental Construction  
PCC058819 • CGC060059

June 6, 2003

FDEP  
Attn: Barbara Suderman  
WRS Site Manager  
Petroleum Cleanup Section 5  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

**RECEIVED BY**

**JUN 09 2003  
TEAM 5**

BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER

2003 JUN -9 A 10:58 AM

**RECEIVED**  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION

**RE: Giant Oil #107 PFP Milestone Verification Report  
662 US Highway 19 NE, Crystal River, Citrus County, Florida  
FDEP Facility I.D. No. 098503139 - PFP Work Order 2003-95-1162  
FRS Project No. RE90498.07**

Dear Ms. Suderman:

FRS Environmental Remediation, Inc. (FRS) has recently completed groundwater sampling activities at the referenced facility (Figures 1 and 2). On April 24, 2003, FRS personnel collected groundwater samples from Key Wells MW-3, MW-21, MW-22 and CW-3 for laboratory analysis in accordance with EPA Methods 8021 (BTEX/MTBE) and 8310. On May 22, 2003, FRS personnel obtained groundwater samples from replacement monitor well MW-9R for laboratory analysis in accordance with EPA Methods 8021 (BTEX/MTBE) and 8310. The sample date was within 30 days of the April 24, 2003 sample event and per prior discussions with FDEP, the sample results can be utilized for milestone purposes.

On April 24, 2003, FRS personnel were unable to locate monitor well MW-9 as it had apparently been paved over with asphalt. Subsequent attempts to locate the well were unsuccessful and therefore, FRS replaced the well. On May 20, 2003, FRS personnel supervised Preferred Drilling Solutions, Inc. during the installation of replacement well MW-9R (see Figure 2). The shallow well was installed to a depth of approximately 12.0 feet below land surface (BLS) utilizing a hollow stem auger attached to a truck mounted drill rig. The well was constructed of 2-inch inner diameter schedule 40 flush-joint PVC with a ten (10) foot screened section slotted at 0.010 inches. A 20/30 grade silica sand filter pack was poured into the annular space between the bore hole and the screen. A fine sand seal was placed above the 20/30 sand pack, and cement grout was poured on top of the fine sand seal to ensure that surface infiltration does not preferentially flow down the bore hole. The top of the well was completed at grade with a locking expandable cap and enclosed in a protective steel manhole mounted in a 2' x 2' concrete pad (monitoring well construction detail included as Attachment A). Organic vapor analysis of soil samples was performed on soil samples obtained at 2.0 feet and 4.0 feet below land surface as the depth to groundwater was approximately 4.0 feet. The results of the analysis revealed organic vapor readings of 128 parts per million (ppm) at 2.0 feet and 230.0 ppm at 4.0 feet. A brown, fine to medium grain sand was observed at these

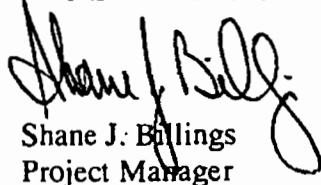
sampling intervals followed by limestone from 6.0 to 12.0 feet. A boring log is provided in Attachment B.

The laboratory results indicated that the Giant Oil #107 facility has met Milestone Number 3 (50% reduction), Milestone #4 (75% reduction) and Milestone #5 (90% reduction) as established in the Pay-for-Performance Agreement. The laboratory analytical results are illustrated on Figure 3. The laboratory analytical report and chain of custody form has been included as Attachment C. Groundwater sample logs are provided in Attachment D.

Laboratory analytical results were compared to baseline data for the two (2) contaminant categories as outlined on page 2 of 6 on Attachment A of Work Order #2003-95-1162. These categories consist of the BTEX/MTBE group (i.e., the sum of the concentrations of benzene, toluene, ethylbenzene, xylenes and MTBE) and the total naphthalenes group (i.e., the sum of the concentrations of naphthalene, 1-methylnaphthalene and 2-methylnaphthalene). The baseline date of July 1, 2002 and the associated data were outlined in FRS' report submitted to the FDEP on August 22, 2002 and approved by the FDEP on September 25, 2002 (letter provided in Attachment E). Monitor well MW-30 had previously been proposed for use as a Key Well, however, due to low concentrations of contamination, it was removed from the list of Key Wells (letter provided in Attachment E). Subsequently, Amendment #2003-95-1162-2 was issued in November 2002 outlining the current Key Well list (Attachment E). The laboratory analytical results and percent reductions for each contaminant category are summarized in Table 1.

FRS will submit an invoice for Milestone Numbers 3, 4 and 5 under a separate cover and upon approval of this document by the FDEP. If you have any questions or comments concerning this information, please contact our office at (813) 246-4961.

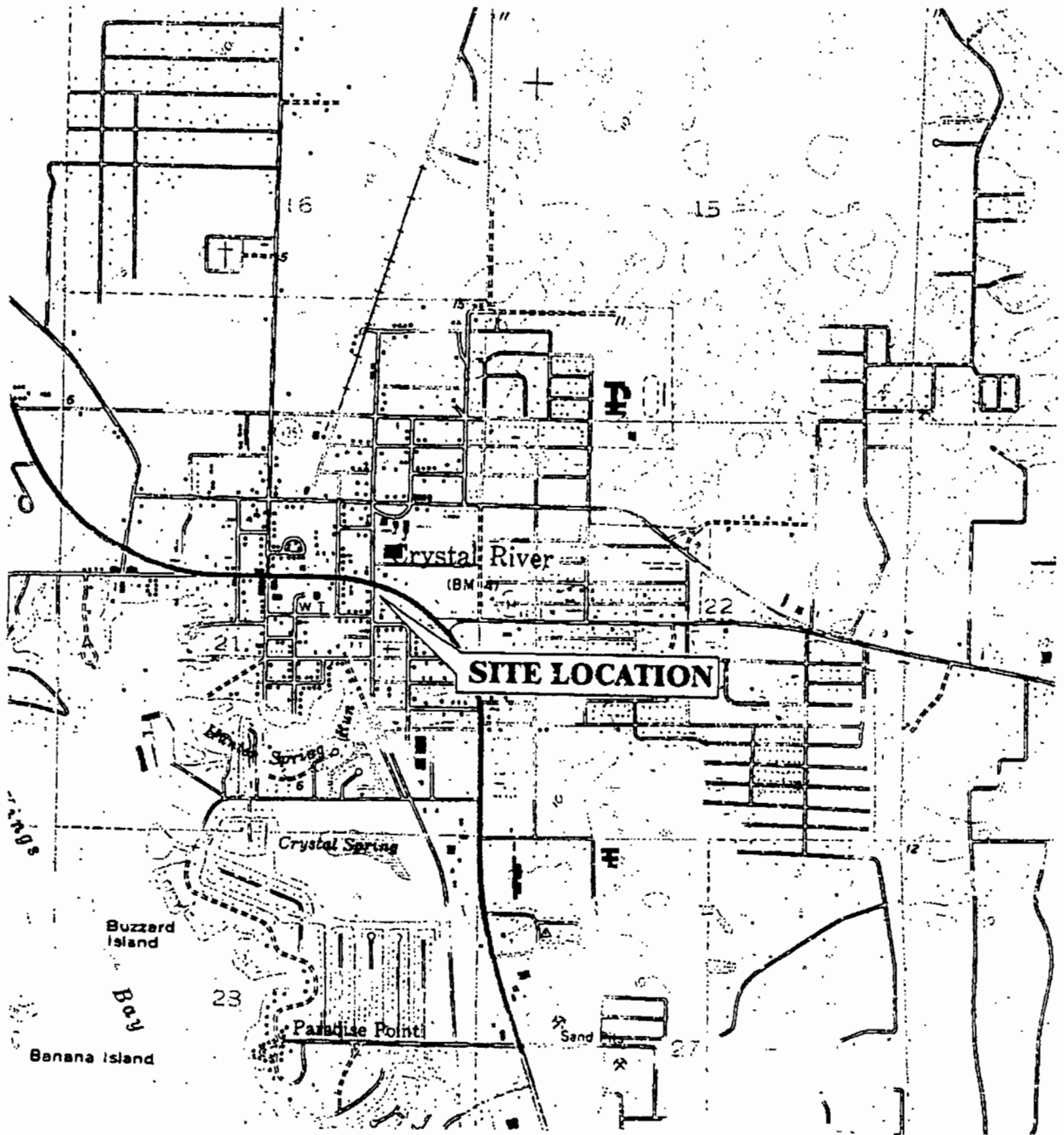
Sincerely,  
FRS Environmental Remediation, Inc.

  
Shane J. Billings  
Project Manager

**FIGURES**

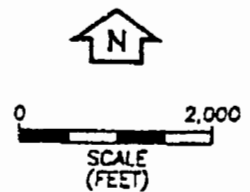
RE90498.03

FIGURE 1  
SITE LOCATION MAP  
GIANT OIL # 107  
CRYSTAL RIVER, FLORIDA



SECTION: 21  
TOWNSHIP: 18 SOUTH  
RANGE: 17 EAST

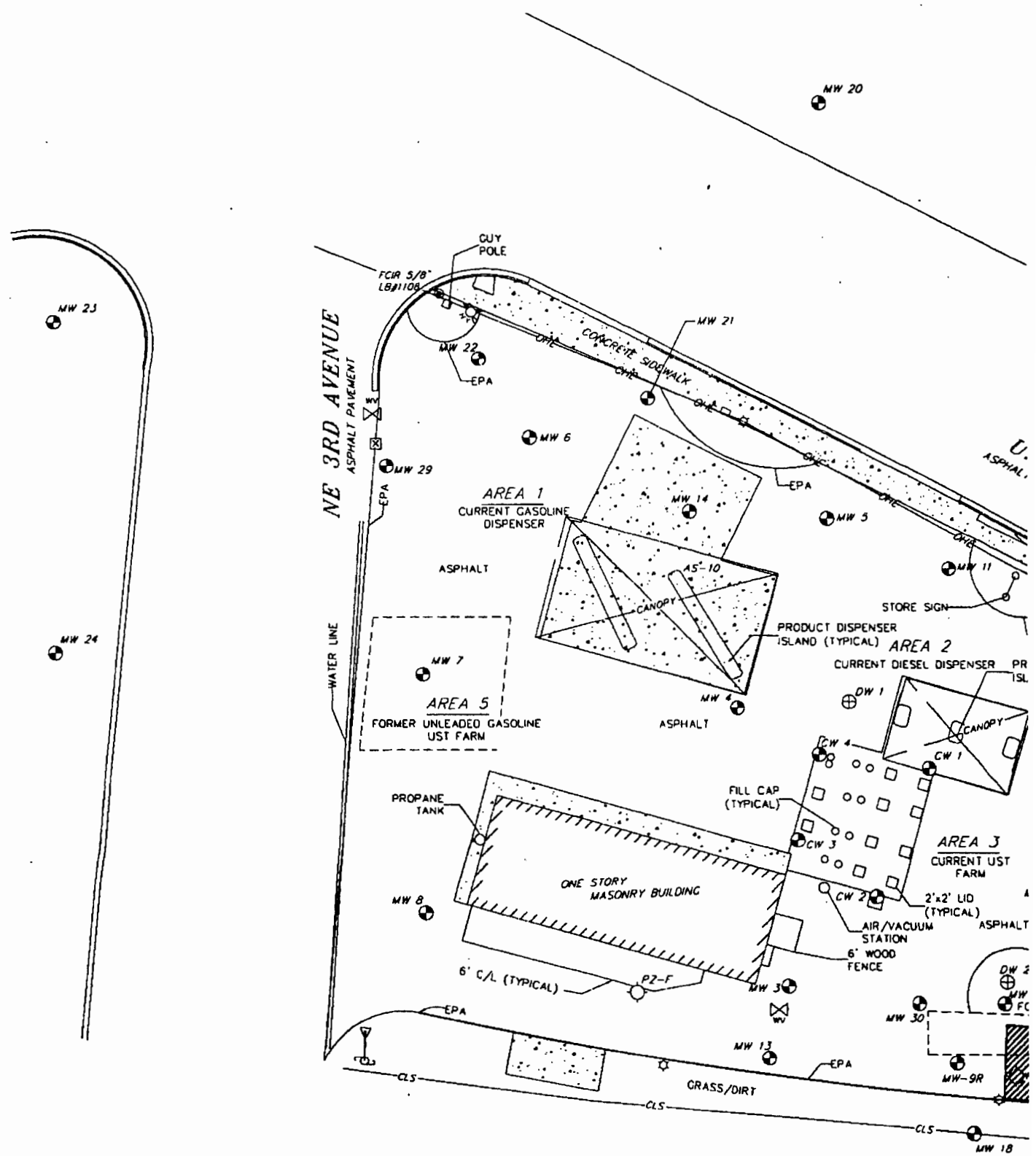
SOURCE: CRYSTAL RIVER, FL. QUADRANGLE  
DATE: 1954  
PHOTOREVISED: 1988



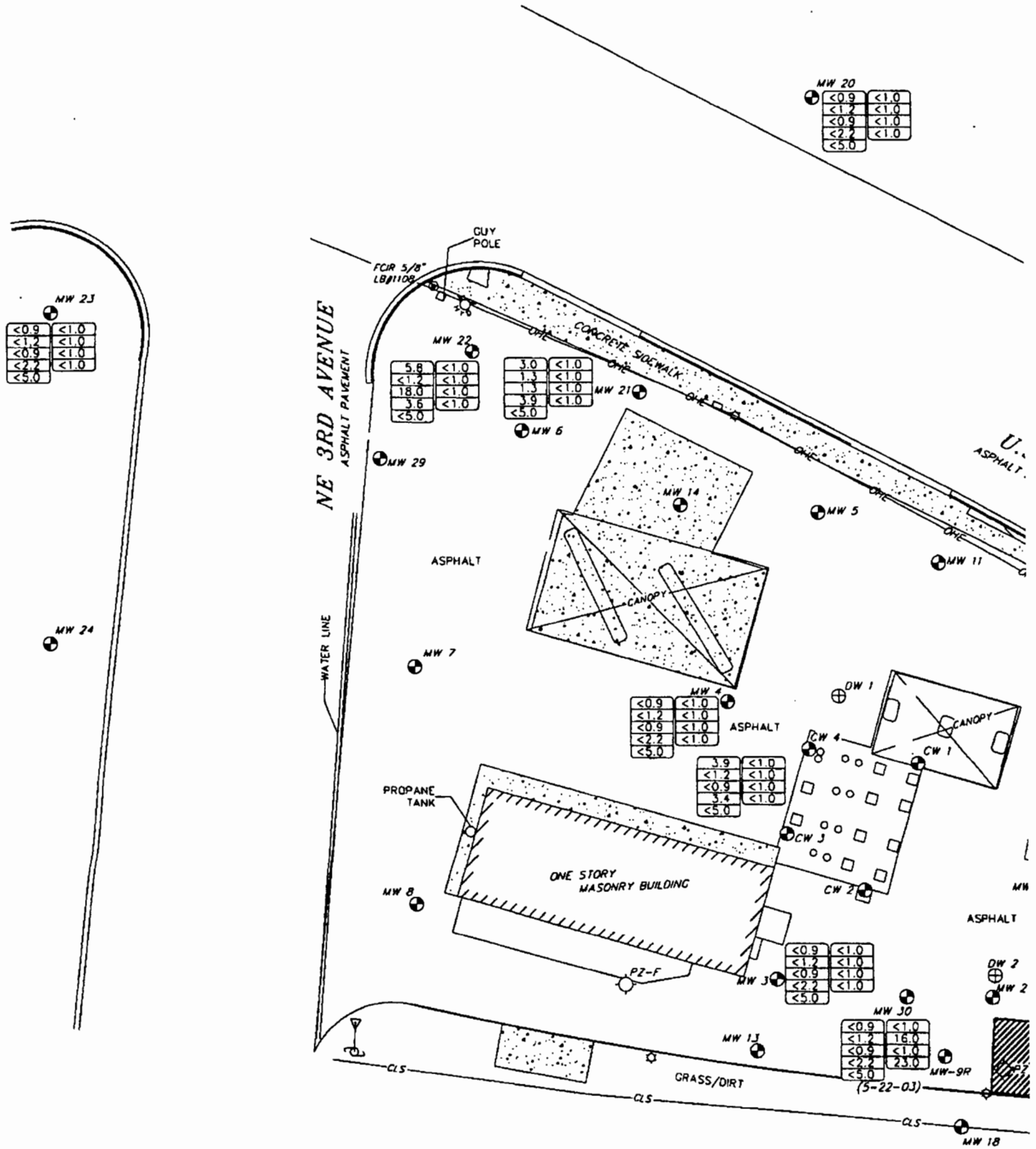
SITE-MAP-12-09-99

FRS

FIGURE 2  
 SITE LAYOUT MAP  
 GIANT OIL #107  
 CRYSTAL RIVER, FLORIDA



**FIGURE 3**  
**GROUNDWATER QUALITY MAP (4-24-03+5-22-03)**  
**GIANT OIL #107**  
**CRYSTAL RIVER, FLORIDA**



**TABLE**



**TABLE 1: MILESTONE REDUCTION SUMMARY**

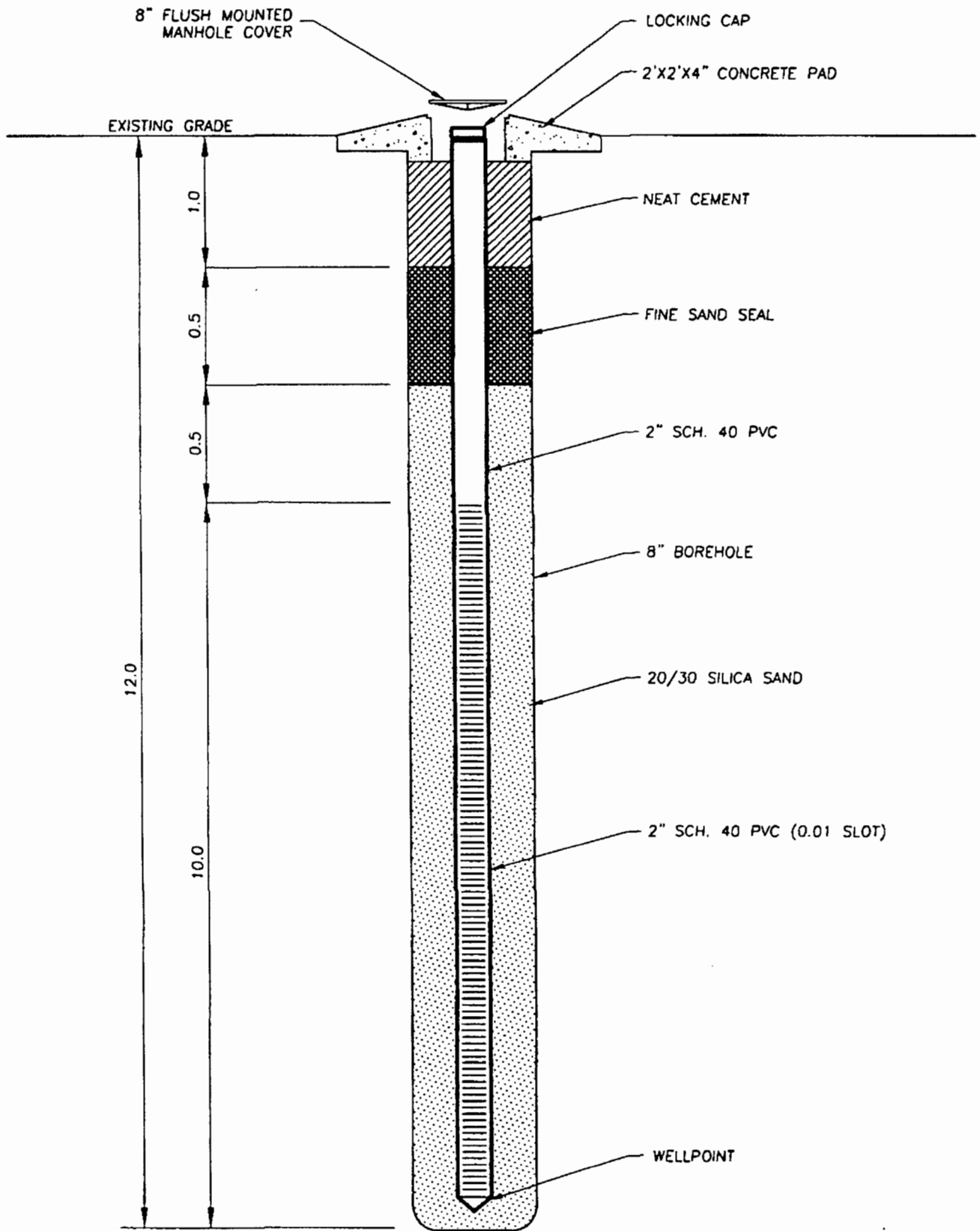
Facility Name: Giant Oil #107  
 Facility ID #: 98503139

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	MTBE	BTEX + MTBE	Naphthalene	1-Methyl Naphthalene	2-Methyl Naphthalene	Total Naphthalenes
MW-3	Cleanup Level	1.0	40.0	30.0	20.0	50.0	141.0	20.0	20.0	20.0	60.0
	3/7/1995	BDL				BDL		2,065.0			
	10/27/1999	BDL	BDL	BDL	BDL	BDL	BDL	21.6	562.0	529.0	1,112.6
	7/1/2002	<1.0	<1.0	<1.0	<1.0	1.4	1.4	27.0	150.0	93.0	270.0
Percent Reduction	4/24/2003	<0.9	<1.2	<0.9	<2.2	<5.0	<0.9	<1.0	<1.0	<1.0	<1.0
		<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS
MW-9	10/27/1999	BDL	BDL	BDL	6.0	BDL	6.0	61.1	677.0	443.0	1,181.1
	7/1/2002	<1.0	<1.0	<1.0	<1.0	2.0	2.0	1.2	480.0	760.0	1,241.2
	5/22/2003	<0.9	<1.2	<0.9	<2.2	<5.0	<0.9	<1.0	16.0	<1.0	16.0
Percent Reduction		<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS	<GCTLS
MW-21	7/6/2000	5,192.0	1,847.0	3,404.0	9,308.0	99.8	19,850.8	408.0	102.0	83.1	593.1
	7/1/2002	2,800.0	84.0	1,000.0	890.0	60.0	4,834.0	920.0	230.0	440.0	1,590.0
	4/24/2003	3.0	1.3	1.3	3.9	<5.0	9.5	<1.0	<1.0	<1.0	<1.0
	Percent Reduction	99.9	<GCTLS	<GCTLS	<GCTLS	<GCTLS	102.8	<GCTLS	<GCTLS	<GCTLS	<GCTLS
MW-22	7/6/2000	938.0	50.9	2,150.0	638.0	BDL	3,776.9	827.0	728.0	311.0	1,866.0
	7/1/2002	490.0	9.4	1,500.0	354.0	<1.0	2,353.4	790.0	140.0	350.0	1,280.0
	4/24/2003	5.8	<1.2	18.0	3.6	<5.0	27.4	<1.0	<1.0	<1.0	<1.0
	Percent Reduction	99.0	<GCTLS	<GCTLS	<GCTLS	<GCTLS	105.1	<GCTLS	<GCTLS	<GCTLS	<GCTLS
CW-3	3/7/1995	BDL				4.1		84.4			
	10/27/1999	7.9	BDL	2.7	BDL	BDL	10.6	46.0	BDL	BDL	BDL
	7/1/2002	360.0	8.9	160.0	45.6	110.0	684.5	20.0	79.0	120.0	219.0
	4/24/2003	3.9	<1.2	<0.9	3.4	<5.0	7.3	<1.0	<1.0	<1.0	<1.0
Percent Reduction		99.2	<GCTLS	<GCTLS	<GCTLS	<GCTLS	124.6	<GCTLS	<GCTLS	<GCTLS	<GCTLS

**ATTACHMENT A  
MONITORING WELL CONSTRUCTION DETAIL**

MONITORING WELL CONSTRUCTION DETAIL (MW-9R)  
GIANT OIL #107  
CRYSTAL RIVER, FLORIDA

RE90498.03



N.T.S.

WELL(2)-12-99

**ATTACHMENT B  
BORING LOG**

# BORING LOG I

BORING NO. MW-9R

FRS PROJECT NO.: RE90498.07

PROJECT NAME:	Giant Oil #107	DATE & TIME BEGAN/FINISHED:	5/20/03
LOCATION:	Crystal River, Florida	TOTAL DEPTH:	12.00' BLS
CLIENT NAME:	FDEP	SURFACE ELEVATION:	
GEOLOGIST:	Sam Esser	DRILLING METHOD:	Hollow Stem Auger
DRILLING CONTRACTOR:	Preferred Drilling Solutions, Inc.	GROUNDWATER DEPTH:	~4.0' BLS

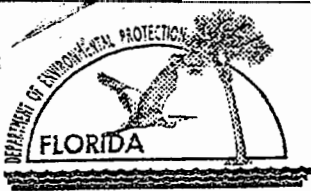
GEOLOGICAL DESCRIPTION		TOTAL PETROLEUM HYDROCARBON VAPOR CONCENTRATION (PPM)			
Depth (Ft)	Materials Description Notes/Observations	Sample Depth (Ft)	Total Hydrocarbons	C <sub>1</sub> to C <sub>3</sub> (Filtered)	Non-Methane Hydrocarbons (>C <sub>4</sub> )
0-1.0	Asphalt and limestone fill.				
1.0-2.0	Brown to tan, fine- to medium-grained sand.	2.0	128.0	0	128.0
2.0-6.0	Brown, medium-grain sand. Water table at approximately 4.0 feet.	4.0	230.0	0	230.0
6.0-12.0	Limestone.				

**NOTES:**

(1) "Total" hydrocarbons reading is the measurement of total organic vapors. C<sub>1</sub> to C<sub>3</sub> hydrocarbons reading is the measurement of methane, ethane, and propane drawn through a carbon filter. The non-methane hydrocarbon reading is the difference between the two readings.

BLS Below Land Surface  
 NR No Reading  
 BDL Below Detection Limits  
 HSA Hollow Stem Auger  
 FAMSL Feet Above Mean Sea Level

**Site No. 78 Citgo Food Mart #4**  
707 NE Suncoast Boulevard (@ NE Third Avenue)  
Crystal River, Florida  
FDEP I.D. No. 098732510



Storage Tank Facility Compliance Inspection Report

Facility ID 8732510 County 09 CITRUS Inspection Date 2/28/01  
 Facility Name CITGO FOOD MART #4 Facility Type A-RETAIL  
 Latitude 28°53'59" Longitude 82°32'24" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>3</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>62-761</u>		
<u>700(1)(c)1</u>	Liquid in the dispenser liner # 1/2 is above the piping connection and has not been removed.	
	<u>* Comments *</u>	
	At the dispensers all piping is equipped with steel valves. Dispenser # 3/4 has a dry line. Dispenser lines # 1, 2 has ~ 18 inches of liquid. This must be removed and treated as Petroleum Contact Material (send invoice to CCHI)	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: CCHI Effective Date: 12/31/00 Expiration Date: 12/30/01

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u>	<u>352-527-5289</u>
Storage Tank Program Office	Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u>	
Inspector Name - Please Print	Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>2/28/01</u>	<u>Henry Parkhurst</u>
Inspector Signature & Date	Facility Representative Signature & Date

Facility Name: CITGO FOOT MART #4 Facility ID: 8732510 Date: 2/28/01

Cite	Description / Inspector's Comments
	TANKS Tightness tested by tanknology (512) 459-1459 3/10/00 Next test due 3/10/2003 (ALL 3 PASSED)
	Lines & Line Leak detectors were tested by Tanknology 3/10/00. All Passed. Next tests are due by 3/10/2001.
	Current registration is paid and on display.
	The dispenser lines are visually inspected monthly and the conditions observed are noted on the log sheets. The RDRL is listed on each monthly log sheet.
	Tank Release detection is on AUTO ST. KJR 4 ATG a printout of the current tank status, Alarm Report, & Leak test time report has been added to the file.
	The fills are marked per API 1637 SPS are equipped with LLD, the soil has been removed from around the pumps and the swing joints have been protected from corrosion.
	Photos taken of facility & braided in the dispenser lines.



February 28, 2001

Mr. Brad Weiniski  
K.E. Allen Inc.  
210 E. North Ave.  
Lake Wales, FL 33853-3218

**RE:** DEP FAC #098732510  
Citgo Food Mart #4  
707 US Hwy. 19  
Crystal River, FL 32629

Dear Mr. Weiniski:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Attached are the 62-761, FAC, compliance inspection results for the above named facility. The inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to 62-761, FAC. Alleged violations are noted below.

Due to the alleged violations noted, this facility may not be operating in compliance with Chapter 62-761, FAC. Review the violations referenced below. Submit a response in writing within fourteen (14) days which provides a schedule for correcting the noted violations. Be advised that failure to take corrective action may result in enforcement action and the assessment of penalties.

---

**CITRUS COUNTY HEALTH DEPARTMENT**

**ENVIRONMENTAL HEALTH SECTION  
STORAGE TANK INSPECTION PROGRAM**

3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316

62-761.700(1)(c)1, FAC – There is water or other liquid present in the dispenser liner(s) for the storage tank system(s). Spill containment devices, dispenser liners, and piping sumps shall be maintained to provide access for monthly examination and water removal as necessary. Water collected in spill containment devices, or in piping sumps and dispenser liners that is above the opening of the integral piping connection, or any regulated substances collected in these storage tank system components shall be removed and be either reused or disposed of properly. **Suggested Corrective Action:** Remove any liquid from the dispenser liner(s), and either reuse or properly dispose of it.

Note that unless otherwise indicated, **the schedule for corrective action is 30 days.** Any item for which insufficient information was provided to determine compliance status is followed by an asterisk (\*) and must also be addressed.

If you have any questions concerning this letter please call the Storage Tank Inspection Program at (352) 527-5295.

Sincerely,

A handwritten signature in black ink, appearing to read "Mark Sumner", followed by a horizontal line extending to the right.

C. Mark Sumner  
Environmental Specialist II

enclosure(s)  
CMS/file



This data is current as of: 29-NOV-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

Facility Information

ID#: 8732510	District: SWD
Name: CITGO FOOD MART #4	County: Citrus
707 Us Hwy 19	Type: Retail Station
Crystal River, FL 32629	Status: Open
Contact: <del>Darrell Haley Avery Sumner</del>	Latitude: 28:53:59.0000
Phone: 352-563-0910	Longitude: 82:32:24.0000
<b>BRAD WEINISKI</b>	LL Method: AGPS
<b>863-257-4676</b>	

Account Owner Information

Name: K E Allen Inc  
 210 E North Ave  
 Lake Wales, FL 33853-3218  
 Phone: 941-676-8307

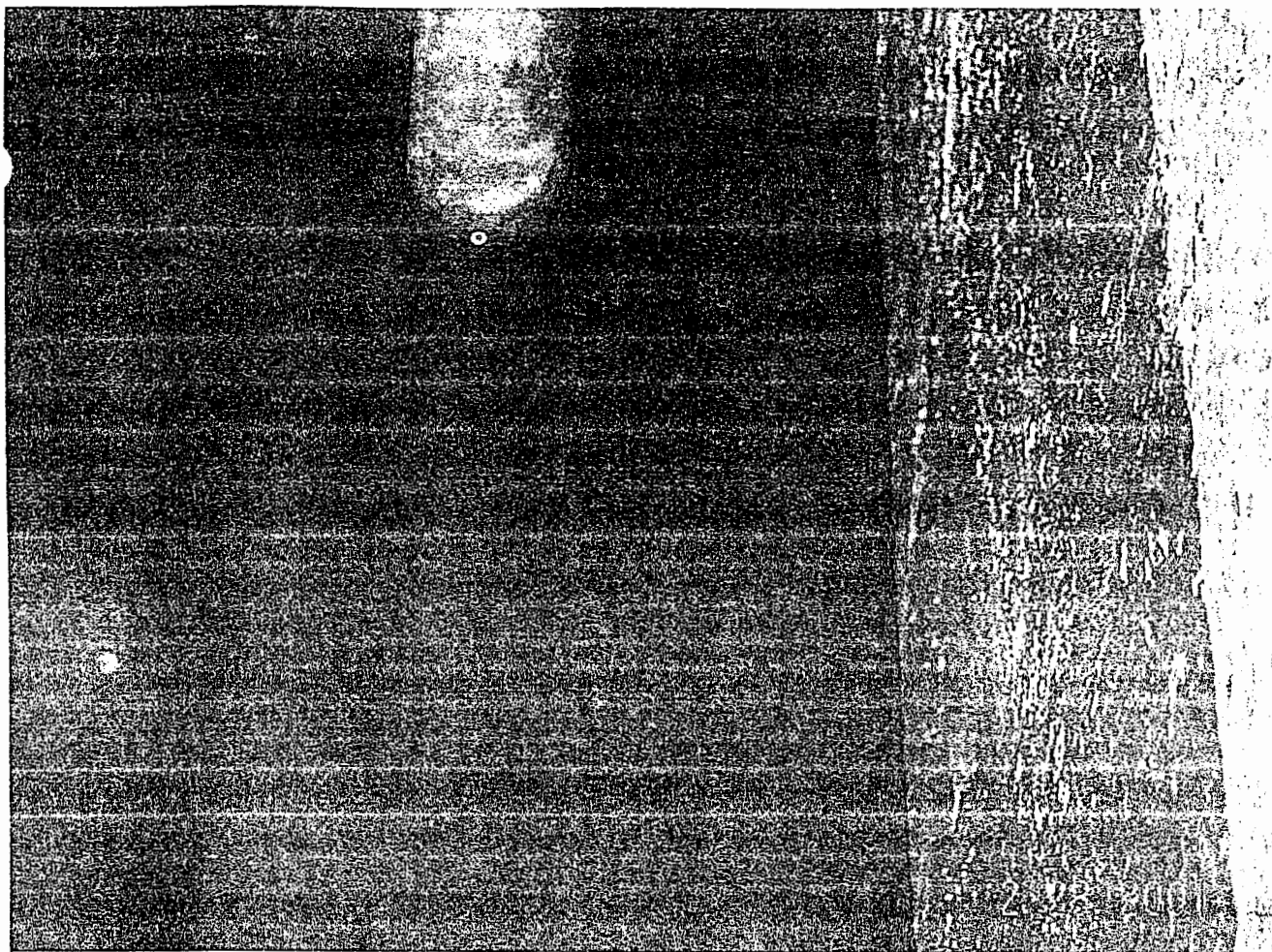
Tank Owner Information

Name: K E Allen Inc  
 210 E North Ave  
 Lake Wales, FL 33853-3218  
 Phone: 941-676-8307

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
1	8000	Leaded Gas	04/01/1987	UNDER	U	A F M O	C J K	4 H L
2	8000	Unleaded Gas	04/01/1987	UNDER	U	A F M O	C J K	4 H L
3	8000	Unleaded Gas	04/01/1987	UNDER	U	A F M O	C J K	4 H L

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!





# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

David B. Struhs  
Secretary

**CERTIFIED MAIL**  
**RETURN RECEIPT REQUESTED**

OCT 31 2002

Mr. Brad Weinischke  
Mid-State Energy, Inc.  
210 E. North Avenue  
Lake Wales, FL 33853-3299

Subject: Site Rehabilitation Completion Order  
Citgo Food Mart No. 4  
707 U.S. Hwy. 19  
Crystal River, Citrus County  
FDEP Facility ID# 09-8732510 (PLRIP)

Dear Mr. Weinischke:

The Bureau of Petroleum Storage Systems has reviewed the Site Assessment Report (SAR) and No Further Action Proposal (NFAP) dated June 12, 2002 (received June 21, 2002), prepared and submitted by Edwards & Belyea Environmental, Inc. for the petroleum product discharge discovered on September 1, 1998 at this site. Documentation submitted with the NFAP confirms that criteria set forth in Rule 62-770.680(1), Florida Administrative Code (F.A.C.), have been met. The NFAP is hereby incorporated by reference in this Site Rehabilitation Completion Order (Order). Therefore, you are released from any further obligation to conduct site rehabilitation at the site for petroleum product contamination associated with the discharge listed above, except as set forth below.

- (1) In the event concentrations of petroleum products' contaminants of concern increase above the levels approved in this Order, or if a subsequent discharge of petroleum or petroleum product occurs at the site, the Department of Environmental Protection (Department) may require site rehabilitation to reduce concentrations of petroleum products' contaminants of concern to the levels approved in the NFAP or otherwise allowed by Chapter 62-770, F.A.C.

### Legal Issues

The Department's Order shall become final unless a timely petition for an administrative proceeding (hearing) is filed under Sections 120.569 and 120.57, Florida Statutes (F.S.), within 21 days of receipt of this Order. The procedures for petitioning for a hearing are set forth below.

Persons affected by this Order have the following options:

If you choose to accept the above decision by the Department about the No Further Action Proposal you do not have to do anything. This Order is final and effective as of the date on the top of the first page of this Order.

If you disagree with the decision, you may do one of the following:

- (1) File a petition for administrative hearing with the Department's Office of General Counsel within 21 days of receipt of this Order; or
- (2) File a request for an extension of time to file a petition for hearing with the Department's Office of General Counsel within 21 days of receipt of this Order. Such a request should be made if you wish to meet with the Department in an attempt to informally resolve any disputes without first filing a petition for hearing.

Please be advised that mediation of this decision pursuant to Section 120.573, F.S., is not available.

### How to Request an Extension of Time to File a Petition for Hearing

For good cause shown, pursuant to Rule 62-110.106(4), F.A.C., the Department may grant a request for an extension of time to file a petition for hearing. Such a request must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Mid-State Energy, Inc., shall mail a copy of the request to Mid-State Energy, Inc., at the time of filing. Timely filing a request for an extension of time tolls the time period within which a petition for administrative hearing must be made.

### How to File a Petition for Administrative Hearing

A person whose substantial interests are affected by this Order may petition for an administrative hearing under Sections 120.569 and 120.57, F.S. The petition must contain the information set forth below and must be filed (received) in the Department's Office of General Counsel at 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, within 21 days of receipt of this Order. Petitioner, if different from Mid-State Energy, Inc., shall mail a copy of the request to Mid-State Energy, Inc. at the time of filing. Failure to file a petition

within this time period shall waive the right of anyone who may request an administrative hearing under Sections 120.569 and 120.57, F.S.

Pursuant to Section 120.54(5)(b)4.a., F.S., and Rule 28-106.201, F.A.C., a petition for administrative hearing shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the name, address, and telephone number of the petitioner's representative, if any, the site owner's name and address, if different from the petitioner, the FDEP facility number, and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) An explanation of how each petitioner's substantial interests are or will be affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by the petitioner, or a statement that there are no disputed facts;
- (e) A statement of the ultimate facts alleged, including a statement of the specific facts the petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of the specific rules or statutes the petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by the petitioner, stating precisely the action petitioner wishes the Department to take with respect to the Department's action or proposed action.

This Order is final and effective as of the date on the top of the first page of this Order. Timely filing a petition for administrative hearing postpones the date this Order takes effect until the Department issues either a final order pursuant to an administrative hearing or an order responding to supplemental information provided pursuant to meetings with the Department.

#### Judicial Review

Any party to this Order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth Boulevard, Mail Station 35, Tallahassee, Florida 32399-3000, and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate district court of appeal. The notice of appeal must be filed within 30 days after this Order is filed with the clerk of the Department (see below).

Please send a copy of the approved assessment document to Ken Weber of the Southwest Florida Water Management District within 30 days of receiving this Order.

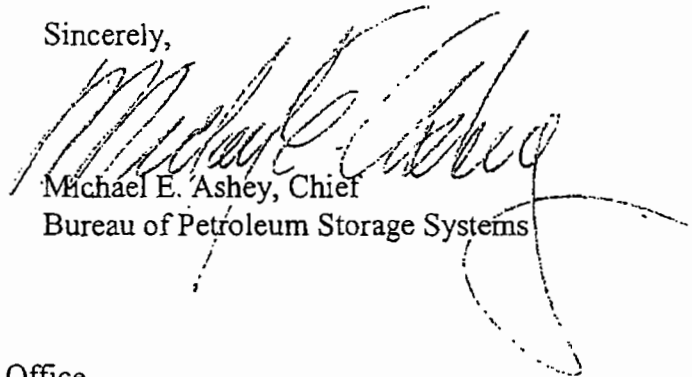
Mr. Brad Weinischke  
Page four

The FDEP Facility Number for this site is 09-8732510. Please use this identification on all future correspondence with the Department.

Questions

Any questions regarding the Department's review of your No Further Action Proposal should be directed to Danny Callahan at (850) 245-8916. Questions regarding legal issues should be referred to the Department's Office of General Counsel at (850) 245-2278. Contact with any of the above does not constitute a petition for administrative hearing or request for an extension of time to file a petition for administrative hearing.

Sincerely,



Michael E. Ashe, Chief  
Bureau of Petroleum Storage Systems

MEA/dgc

cc: Laurel Culbreth, FDEP SW District Office  
Mr. Frank Cowan, Edwards & Belyea Environmental, Inc., P.O. Box 18403, Tampa, FL 33679-8403  
File

FILING AND ACKNOWLEDGMENT  
FILED, on this date, pursuant to  
§120.52 Florida Statutes, with the  
designated Department Clerk, receipt  
of which is hereby acknowledged.

Diana Kraeft  
Clerk  
(or Deputy Clerk)

10-31-02  
Date



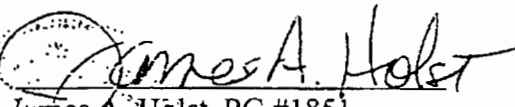
P.G. CERTIFICATION

Templated Site Assessment Report (TSAR) and No Further Action Proposal (NFAP) without conditions dated June 12, 2002 (received June 21, 2002) prepared and submitted by Edwards & Belyea Environmental, Inc. for the Citgo Food Mart No. 4 site, 707 U.S. Highway 19, Crystal River, Citrus County, Florida, FDEP Facility ID# 09 8732510.

I hereby certify that in my professional judgment, the components of this No Further Action Proposal satisfy the requirements set forth in Chapter 62-770, Florida Administrative Code (F.A.C.), and that the conclusions in this report provide reasonable assurances that the objectives stated in Chapter 62-770, F.A.C., have been met.

X personally completed this review.

\_\_\_\_\_ This review was conducted by \_\_\_\_\_  
working under my direct supervision.

  
James A. Holst, PG #1851  
Professional Geologist II  
Petroleum Cleanup Section 4  
10/30/02  
Date



**HANDEX**<sup>®</sup>

Practical Environmental Solutions

RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
2003 APR 20 A 11:34

BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
OPERATIONS MANAGEMENT  
CENTER

April 29, 2003

Mr. Michael Webb, P.E.  
Florida Department of Environmental Protection  
Petroleum Cleanup Section, Mail Station 4530  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Re: **Second Semi-Annual Natural Attenuation Monitoring Report**  
Quality Amoco #85  
806 Northeast US Highway 19  
Crystal River, Citrus County, Florida  
**FDEP Facility ID #: 098503098**  
**FDEP Work Order #: 2002-93-0352**  
**Handex Project: 111432.009**

BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
03 APR 30 PM 11:59  
PETROLEUM CLEANUP SECTION 3

Dear Mr. Webb:

Handex of Florida, Inc. (Handex) has completed the second semi-annual groundwater sampling event at the above-referenced site as outlined in Florida Department of Environmental Protection (FDEP) pre-approval work order number 2002-93-0352-0. This is the second deliverable associated with the work order. The following is a summary of activities conducted for this monitoring period. A site plan of the facility is presented as **Figure 1**. A copy of the work order is presented in **Appendix A**.

### GROUNDWATER QUALITY MONITORING

Groundwater samples were collected on March 11, 2003 from monitoring wells MW-10 and MW-11. Groundwater samples were analyzed by ELAB of Ormond Beach, Florida using United States Environmental Protection Agency (USEPA) Method 8021 for total volatile organic aromatics (VOAs) including methyl tert-butyl ether (MTBE). Laboratory analyses reported benzene and MTBE above Groundwater Cleanup Target Levels (GCTLs) as outlined in Table 1, Chapter 62-777, Florida Administrative Code (F.A.C.) in the groundwater sample collected from MW-11. Laboratory analyses reported benzene above its GCTL, in the groundwater sample collected from MW-10. Other compounds analyzed in the groundwater samples collected from MW-10 and MW-11 were reported below laboratory detection limits (BDL) or below GCTLs. A groundwater concentration map is presented as **Figure 2**. Groundwater analytical data are summarized in **Table 1**. Copies of the laboratory analytical report and groundwater sampling logs are presented in **Appendix B**.

Mr. Michael Webb, P.E.  
Quality Amoco #85  
FDEP Facility ID #: 098503098  
April 29, 2003

Page 2

## WATER-TABLE ELEVATION MONITORING

In conjunction with the collection of groundwater samples, water table measurements were collected from existing site monitoring wells on March 11, 2003. Liquid phase hydrocarbons (LPH) were not detected. **Figure 3** is a contoured water table elevation map depicting the groundwater flow direction on March 11, 2003. Water table elevation data are presented in **Table 2**.

### SUMMARY

The results of the March 11, 2003 sampling event reported the benzene concentration in MW-10 and MW-11 above its GCTL. The MTBE concentration was reported above its GCTL in MW-11. Other compounds analyzed in the groundwater samples collected from MW-10 and MW-11 were reported BDL or below GCTLs.

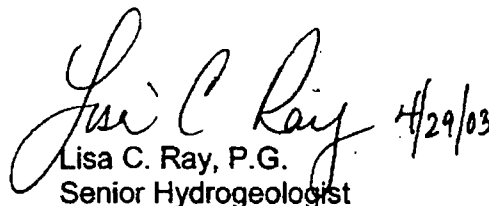
Based upon the current distribution of hydrocarbon impacted groundwater, groundwater flow direction, and proximity to a City of Crystal River public supply well, Handex recommends that one monitoring well be installed downgradient of MW-11 in the concrete area south of the service bay. Because it has been nearly two years since comprehensive groundwater sampling has been performed, Handex recommends a full round of sampling of the site wells following well installation. At that time, Handex will make an assessment concerning the need to supplement natural attenuation monitoring (NAM) with an alternative remedial strategy. This deliverable concludes the work under the present work order. Upon FDEP approval, Handex will submit a proposal for the recommended next scope of work.

As always it is a pleasure working with the Florida Department of Environmental Protection. If you have questions or comments concerning the report please feel free to contact the undersigned at (352) 735-1800.

Respectfully submitted,

**HANDEX OF FLORIDA, INC.**

  
Sajjad M. Din  
Hydrogeologist  
[sdin@handexmail.com](mailto:sdin@handexmail.com)

 4/29/03  
Lisa C. Ray, P.G.  
Senior Hydrogeologist  
[lray@handexmail.com](mailto:lray@handexmail.com)

cc: Mr. Steve Weeks, Quality Petroleum, P.O. Box 3889, Lakeland, Florida, 33802  
Project File 111432.009

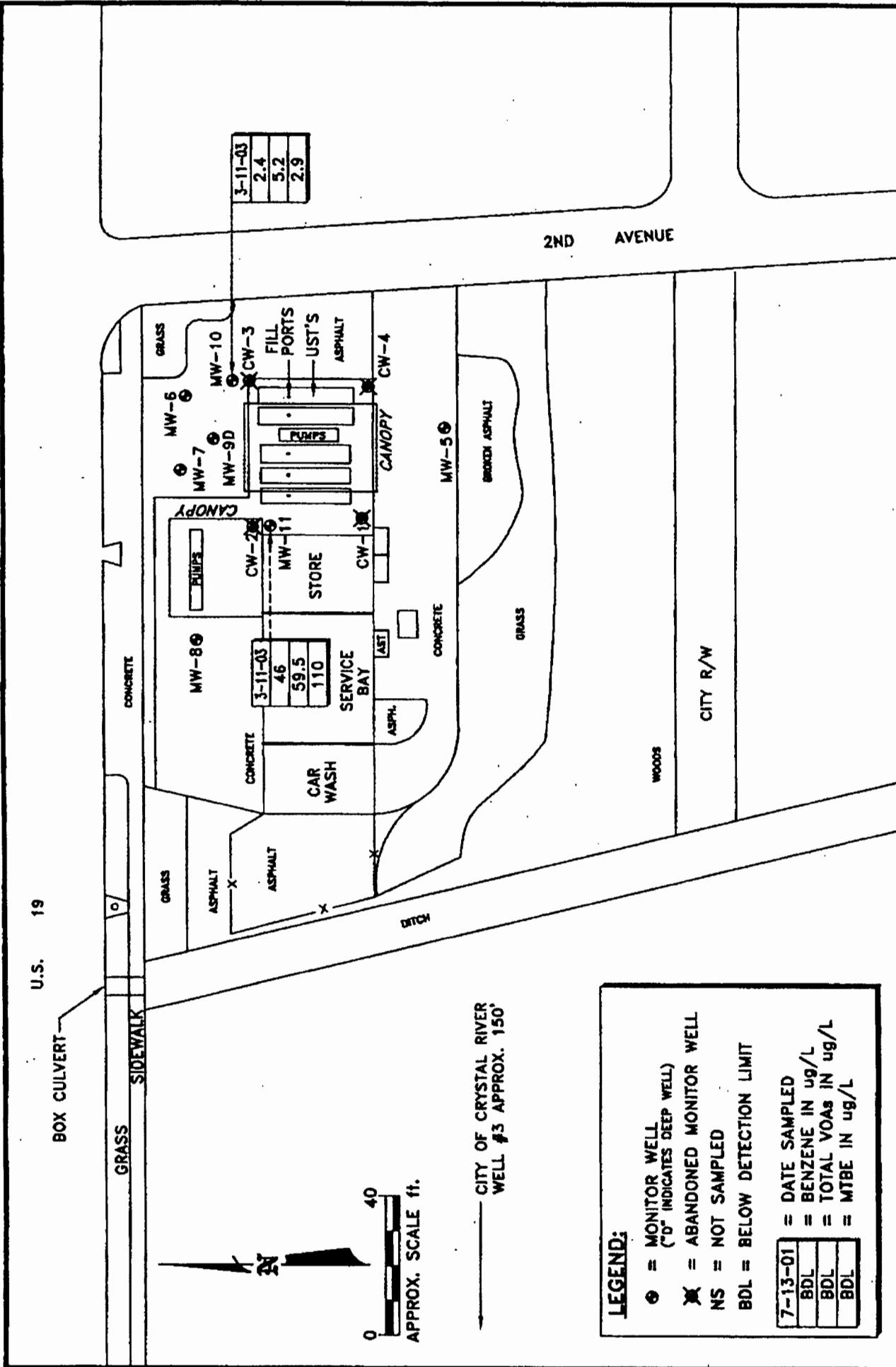


## FIGURES



FIGURE 2  
GROUNDWATER  
CONCENTRATION MAP

QUALITY PETROLEUM/AMOCO #85  
806 N.E. U.S. 19  
CRYSTAL RIVER, FLORIDA  
4-22-03



**LEGEND:**

- ⊙ = MONITOR WELL  
(“0” INDICATES DEEP WELL)
- ⊗ = ABANDONED MONITOR WELL
- NS = NOT SAMPLED
- BDL = BELOW DETECTION LIMIT

7-13-01	= DATE SAMPLED
BDL	= BENZENE IN ug/L
BDL	= TOTAL VOAS IN ug/L
BDL	= MTBE IN ug/L



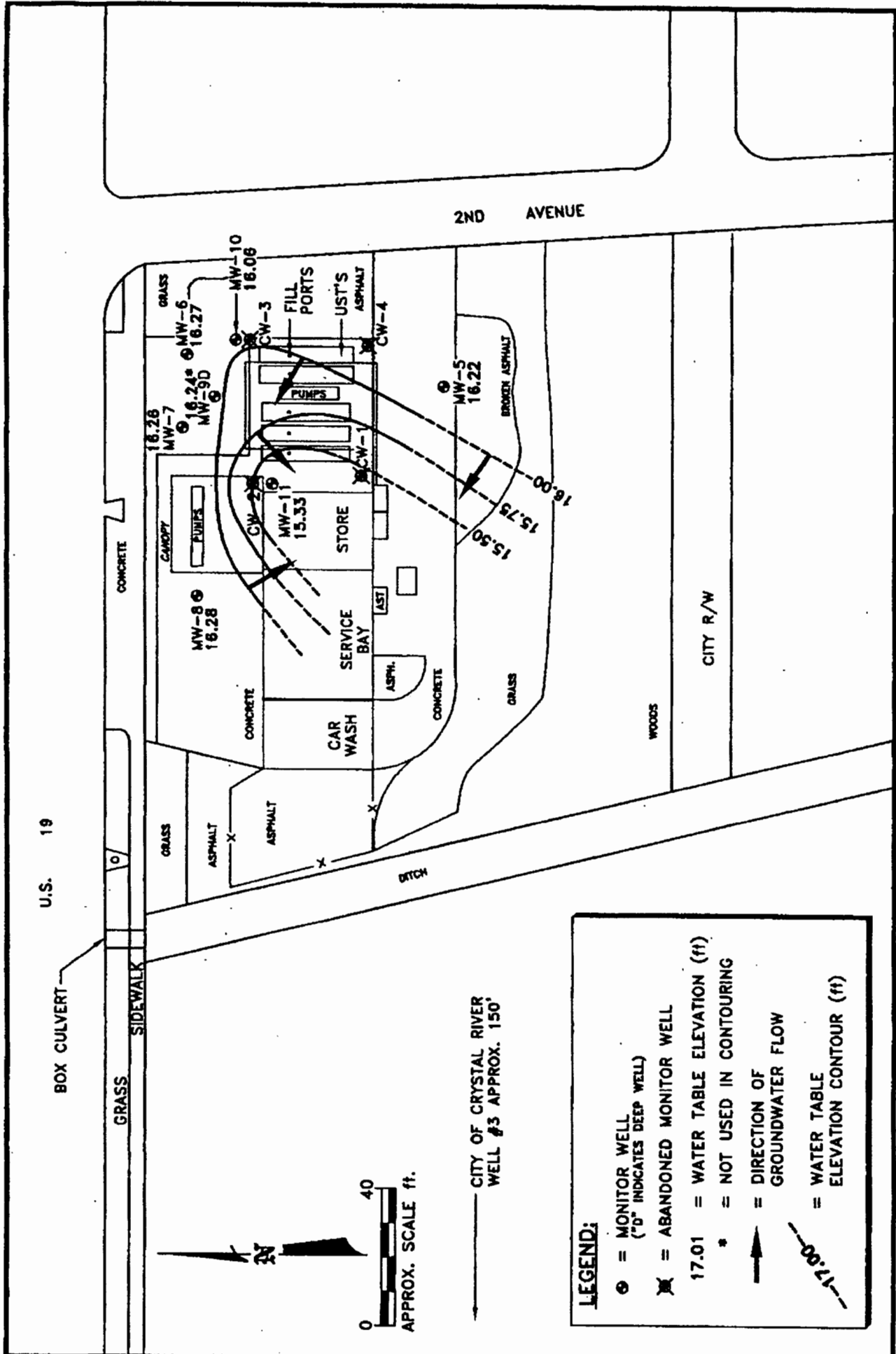


FIGURE 3  
WATER TABLE  
CONTOUR MAP  
MARCH 11 2003

QUALITY PETROLEUM/AMOCO #85  
806 N.E. U.S. 19  
CRYSTAL RIVER, FLORIDA  
4-22-03



## **TABLES**



**TABLE 1: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

Facility Name: QUALITY AMOCO #85

Facility ID#: 098503098

Not Sampled = NS  
 Analytical Results = ppb  
 Not Installed = NI

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Total Naphthalenes	Total PAHs	Total Lead	Dissolved Lead	Total VOH	EDB
CW-1	02/20/1990	BDL	BDL	BDL	BDL	BDL	44.00	NS	NS	BDL	BDL	NS	0.02
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	1.40	NS	NS	NS	NS	NS	NS
	10/09/1996	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	03/31/1997	BDL	BDL	BDL	BDL	BDL	89.00	NS	NS	NS	NS	NS	NS
	10/16/1997	BDL	BDL	BDL	BDL	BDL	1.90	NS	NS	NS	NS	NS	NS
	04/08/1998	BDL	BDL	BDL	BDL	BDL	1.80	NS	NS	NS	NS	NS	NS
	10/21/1998	BDL	BDL	BDL	BDL	BDL	3.6	NS	NS	NS	NS	NS	NS
	04/02/1999	<0.5	<0.5	<0.5	<0.5	BDL	1.5	NS	NS	NS	NS	NS	NS
	10/01/1999	<0.5	<0.5	<0.5	<0.5	BDL	2.6	NS	NS	NS	NS	NS	NS
CW-2	02/20/1990	54.0	3.20	1.70	14.00	72.90	240.00	NS	NS	0.03	0.06	NS	BDL
	12/11/1992	1.0	BDL	BDL	BDL	1.00	32.00	BDL	BDL	NS	NS	NS	NS
	04/10/1996	1.6	4.50	1.10	7.00	14.20	25.00	NS	NS	NS	NS	NS	NS
	10/09/1996	12.0	1.00	0.90	1.60	15.50	12.00	NS	NS	NS	NS	NS	NS
	03/31/1997	14.0	1.00	BDL	2.10	17.10	23.00	NS	NS	NS	NS	NS	NS
	10/16/1997	6.1	BDL	BDL	1.89	7.89	13.00	NS	NS	NS	NS	NS	NS
	10/16/1997	10.0	0.68	0.58	2.11	13.37	24.00	NS	NS	NS	NS	NS	NS
	04/08/1998	4.4	0.61	0.50	4.0	9.51	21	NS	NS	NS	NS	NS	NS
	10/21/1998	4.2	0.65	BDL	2.38	7.23	41	NS	NS	NS	NS	NS	NS
	04/02/1999	1.7	<0.5	<0.5	<0.5	1.7	17	NS	NS	NS	NS	NS	NS
10/01/1999	19	<0.5	0.87	1.52	21.39	16	NS	NS	NS	NS	NS	NS	
CW-3	02/20/1990	6.9	BDL	BDL	5.10	12.00	88.00	NS	NS	0.01	BDL	NS	BDL
	12/11/1992	290.0	6.00	22.00	31.00	349.00	25.00	BDL	BDL	NS	NS	NS	NS
	04/10/1996	34.0	1.70	2.60	6.60	44.90	16.00	NS	NS	NS	NS	NS	NS
	10/09/1996	4.5	2.40	1.60	2.80	11.30	14.00	NS	NS	NS	NS	NS	NS
	03/31/1997	12.0	1.20	0.80	2.30	16.30	5.20	NS	NS	NS	NS	NS	NS
	10/16/1997	5.9	1.3	1	4.80	13	8.3	NS	NS	NS	NS	NS	NS
	04/08/1998	33.0	2.9	1.6	5.59	43.09	48	NS	NS	NS	NS	NS	NS
	10/21/1998	61	4.1	15	7.20	87.3	56	NS	NS	NS	NS	NS	NS
	04/02/1999	35	1.5	3.2	5.23	44.93	23	NS	NS	NS	NS	NS	NS
	10/01/1999	3.1	0.69	0.82	2.68	7.29	3.3	NS	NS	NS	NS	NS	NS

# TABLE 1: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY

Facility Name: QUALITY AMOCO #85

Facility ID#: 098503098

Not Sampled = NS  
 Analytical Results = ppb  
 Not Installed = NI

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Total Naphthalenes	Total PAHs	Total Lead	Dissolved Lead	Total VOH	EDB
CW-4	02/20/1990	1.5	6.10	BDL	2.50	10.10	28.00	NS	NS	0.01	BDL	NS	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	2.00	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	2.40	NS	NS	NS	NS	NS	NS
	10/09/1996	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	03/31/1997	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	04/02/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	10/01/1999	<0.5	<0.5	<0.5	<0.5	BDL	1.9	NS	NS	NS	NS	NS	NS
MW-5	02/20/1990	BDL	2.80	BDL	3.00	5.80	300.00	NS	NS	0.01	BDL	NS	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	1.40	NS	NS	NS	NS	NS	NS
	10/09/1996	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	03/31/1997	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	04/02/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	10/01/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
MW-6	04/05/2000	<0.50	<0.50	<0.50	BDL	BDL	1.20	NS	NS	NS	NS	NS	NS
	09/29/2000	<1.0	<1.0	<1.0	BDL	BDL	<1.0	NS	NS	NS	NS	NS	NS
	07/13/2001	<1.0	<1.0	<1.0	BDL	BDL	<1.0	NS	NS	NS	NS	NS	NS
	02/20/1990	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	0.01	BDL	BDL	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	10/09/1996	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
03/31/1997	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	
04/02/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	
10/01/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	
09/29/2000	<1.0	<1.0	<1.0	BDL	BDL	BDL	<1.0	NS	NS	NS	NS	NS	
07/13/2001	<1.0	<1.0	<1.0	BDL	BDL	BDL	<1.0	NS	NS	NS	NS	NS	



# TABLE 1: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY

Facility Name: QUALITY AMOCO #85

Facility ID#: 098503098

Not Sampled = NS  
Analytical Results = ppb  
Not Installed = NI

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Total Naphthalenes	Total PAHs	Total Lead	Dissolved Lead	Total VOH	EDB
MW-9D	02/20/1990	1.3	1.80	BDL	5.40	8.50	BDL	NS	NS	BDL	BDL	BDL	BDL
	12/11/1982	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	0.80	BDL	1.20	2.00	1.00	NS	NS	NS	NS	NS	NS
	10/09/1996	5.2	BDL	BDL	BDL	5.20	3.10	NS	NS	NS	NS	NS	NS
	03/31/1997	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	10/16/1987	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	04/08/1998	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	10/21/1998	BDL	BDL	BDL	BDL	BDL	1.20	NS	NS	NS	NS	NS	NS
	04/02/1999	<0.5	<0.5	<0.5	<0.5	BDL	<0.5	NS	NS	NS	NS	NS	NS
	10/01/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
MW-10	09/29/2000	<1.0	<1.0	<1.0	BDL	BDL	<1.0	NS	NS	NS	NS	NS	NS
	07/13/2001	<1.0	<1.0	<1.0	BDL	BDL	<1.0	NS	NS	NS	NS	NS	NS
	07/13/2001	16	<5.0	25	BDL	41	<5.0	NS	NS	NS	NS	NS	NS
	12/14/2001	11	1.8	6.0	2.3	21.1	<1.0	NS	NS	NS	NS	NS	NS
MW-11	06/14/2002	<1.0	0.4	<1.0	0.5	0.9	1.5	NS	NS	NS	NS	NS	NS
	09/27/2002	4.5	0.9	1.5	2.8	9.7	6.0	NS	NS	NS	NS	NS	NS
	03/11/2003	2.4	0.4	0.6	1.8	5.2	2.9	NS	NS	NS	NS	NS	NS
	07/13/2001	19	5.3	9.3	6.9	40.5	<1.0	NS	NS	NS	NS	NS	NS
	12/14/2001	25	2.6	1.2	10.6	39.4	65	NS	NS	NS	NS	NS	NS
MW-11	06/14/2002	14	3.2	1.2	4.3	22.7	51	NS	NS	NS	NS	NS	NS
	09/27/2002	23	2.8	8.0	16	49.8	64	NS	NS	NS	NS	NS	NS
	03/11/2003	46	3.8	1	8.7	59.5	110	NS	NS	NS	NS	NS	NS

## Table 2 GROUNDWATER ELEVATION TABLE

Facility Name: **QUALITY AMOCO 85**

Facility ID#: \_\_\_\_\_

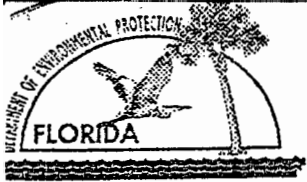
98503098

All Measurements = Feet  
No Data = Blank

Well No.	Diameter (Inches)	Well Depth	Screen Interval	TOC Elevation	CW-1			CW-2			CW-3			CW-4			MW-5			MW-6		
					ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
02/20/1990					15.56	4.44		15.41	4.53		15.65	3.76					15.52	3.75		14.82	4.85	
12/11/1992					15.45	4.55		15.22	4.72		15.18	4.23		15.52	3.84		15.79	3.48		15.42	4.25	
04/10/1996					15.98	4.02		15.89	4.05		15.91	3.50		15.96	3.40		15.92	3.35		15.95	3.72	
10/09/1996					17.35	2.65		16.92	3.02		16.83	2.58		17.16	2.20		17.12	2.15		16.93	2.74	
03/31/1997					16.20	3.80		16.09	3.85		16.06	3.35		16.30	3.06		16.22	3.05		16.17	3.50	
10/16/1997					15.05	4.95		15.83	4.11		15.89	3.52		16.18	3.18		16.16	3.11		15.97	3.70	
04/08/1998					16.45	3.55		16.42	3.52		16.37	3.04		16.57	2.79		16.41	2.86		16.43	3.24	
10/16/1998																						
10/21/1998					15.98	4.02		15.76	4.18		15.89	3.52		16.34	3.02		16.13	3.14		15.85	3.82	
04/02/1999					15.68	4.32		15.54	4.40		15.83	3.58		16.18	3.18		15.81	3.46		14.70	4.97	
10/01/1999					16.83	3.17		16.78	3.16		16.80	2.61		17.04	2.32		17.01	2.26		16.81	2.86	
04/05/2000																	15.46	3.81		14.72	4.95	
09/29/2000																	14.82	4.45		14.63	5.04	
07/13/2001																	17.22	2.05		17.26	2.41	
12/14/2001																	15.97	3.30		15.80	3.87	
06/14/2002																	16.47	2.80		16.49	3.18	
09/27/2002																	17.42	1.85		17.36	2.31	
03/11/2003																	16.22	3.05		16.27	3.40	



**Site No. 79 Amoco #185**  
806 NE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503098



Storage Tank Facility Compliance Inspection Report

Facility ID 8503098 County 09 CITRUS Inspection Date 7/3/01  
 Facility Name Amoco #185 Facility Type A-RETAIL  
 Latitude 28°53'59" Longitude 82°35'26" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>5</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

"Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	<u>SEE PAGES # 2 + 3</u>	
	<u>FOR COMMENTS.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: C & I Effective Date: 8/1/00 Expiration Date: 7/31/2001

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>LISA J. MILLER</u> Facility Representative Name - Please Print
<u>[Signature]</u> <u>7/3/01</u> Inspector Signature & Date	<u>[Signature]</u> Facility Representative Signature & Date



Facility Name: Amoco #185

Facility ID: 8503098 Date: 7/3/01

Description / Inspector's Comments

*	2001-2002 Plcard is on hand. along with an RDRL
*	The dispenser lines and the Cathodic rectified readings are checked & documented monthly.
*	The Soil to Structure Test was last done by AAA Tank Testers on 11/8/2000 test is next due 11/8/2001.
*	ALL 5 TANKS were tightness tested by HyTech Petroleum 12-13-99. all passed. Next test is due by 12-13-02.
*	Release detection is S.I.R. by Simmas version 5.7 L.M. All SIR Reports have been passing since last year except Diesel and Premium UL were inconclusive August 2000.
*	Current Rectified Readings as of 7/3/2001 are 22 Volts & 0.5 Amps.

3

Facility Name: Amoco # 185 Facility ID: 8503098 Date: 7/3/01

Description / Inspector's Comments

\* Dispenser Line Conditions.  
 #① Dry, #② Dry w/some Accumulated Sand.  
 #③/④ Dry. #⑤ Dry. #⑥ Dry.  
 #①/② Dry, #③/④(2) Dry. #⑤/⑥ Dry.

\* All Piping has a Check Valve installed beneath the dispenser.

\* All fills are Marked per Api 1637.  
 Diesel Spill bucket is wet with less than one inch of accumulated liquid.  
 Premium UL Spill bucket is dry.  
 Both Reg. UL spill buckets are dry.  
 Mid grade UL Spill bucket is dry.  
 All fills are equipped with flow shut off drop tubes.

\* There were ten observation wells located at this site 4 have been properly closed 2/2/2000, however six wells remain open.

\* An over all site photo was taken and added to the file.



# HANDEX<sup>®</sup>

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ENVIRONMENTAL PROTECTION

2003 APR 29 A 11:34

BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
OPERATIONAL MANAGEMENT  
CENTER

April 29, 2003

Mr. Michael Webb, P.E.  
Florida Department of Environmental Protection  
Petroleum Cleanup Section, Mail Station 4530  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Re: **Second Semi-Annual Natural Attenuation Monitoring Report**  
Quality Amoco #85  
806 Northeast US Highway 19  
Crystal River, Citrus County, Florida  
FDEP Facility ID #: 098503098  
FDEP Work Order #: 2002-93-0352  
Handex Project: 111432.009

BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
03 APR 30 PM 11:59  
PETROLEUM CLEANUP SECTION 3

Dear Mr. Webb:

Handex of Florida, Inc. (Handex) has completed the second semi-annual groundwater sampling event at the above-referenced site as outlined in Florida Department of Environmental Protection (FDEP) pre-approval work order number 2002-93-0352-0. This is the second deliverable associated with the work order. The following is a summary of activities conducted for this monitoring period. A site plan of the facility is presented as **Figure 1**. A copy of the work order is presented in **Appendix A**.

### GROUNDWATER QUALITY MONITORING

Groundwater samples were collected on March 11, 2003 from monitoring wells MW-10 and MW-11. Groundwater samples were analyzed by ELAB of Ormond Beach, Florida using United States Environmental Protection Agency (USEPA) Method 8021 for total volatile organic aromatics (VOAs) including methyl tert-butyl ether (MTBE). Laboratory analyses reported benzene and MTBE above Groundwater Cleanup Target Levels (GCTLs) as outlined in Table 1, Chapter 62-777, Florida Administrative Code (F.A.C.) in the groundwater sample collected from MW-11. Laboratory analyses reported benzene above its GCTL, in the groundwater sample collected from MW-10. Other compounds analyzed in the groundwater samples collected from MW-10 and MW-11 were reported below laboratory detection limits (BDL) or below GCTLs. A groundwater concentration map is presented as **Figure 2**. Groundwater analytical data are summarized in **Table 1**. Copies of the laboratory analytical report and groundwater sampling logs are presented in **Appendix B**.

### WATER-TABLE ELEVATION MONITORING

In conjunction with the collection of groundwater samples, water table measurements were collected from existing site monitoring wells on March 11, 2003. Liquid phase hydrocarbons (LPH) were not detected. **Figure 3** is a contoured water table elevation map depicting the groundwater flow direction on March 11, 2003. Water table elevation data are presented in **Table 2**.

### SUMMARY

The results of the March 11, 2003 sampling event reported the benzene concentration in MW-10 and MW-11 above its GCTL. The MTBE concentration was reported above its GCTL in MW-11. Other compounds analyzed in the groundwater samples collected from MW-10 and MW-11 were reported BDL or below GCTLs.

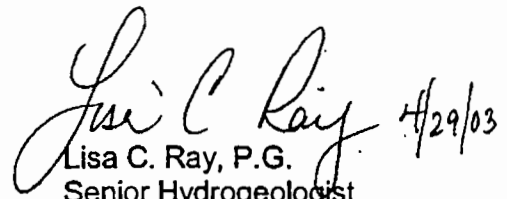
Based upon the current distribution of hydrocarbon impacted groundwater, groundwater flow direction, and proximity to a City of Crystal River public supply well, Handex recommends that one monitoring well be installed downgradient of MW-11 in the concrete area south of the service bay. Because it has been nearly two years since comprehensive groundwater sampling has been performed, Handex recommends a full round of sampling of the site wells following well installation. At that time, Handex will make an assessment concerning the need to supplement natural attenuation monitoring (NAM) with an alternative remedial strategy. This deliverable concludes the work under the present work order. Upon FDEP approval, Handex will submit a proposal for the recommended next scope of work.

As always it is a pleasure working with the Florida Department of Environmental Protection. If you have questions or comments concerning the report please feel free to contact the undersigned at (352) 735-1800.

Respectfully submitted,

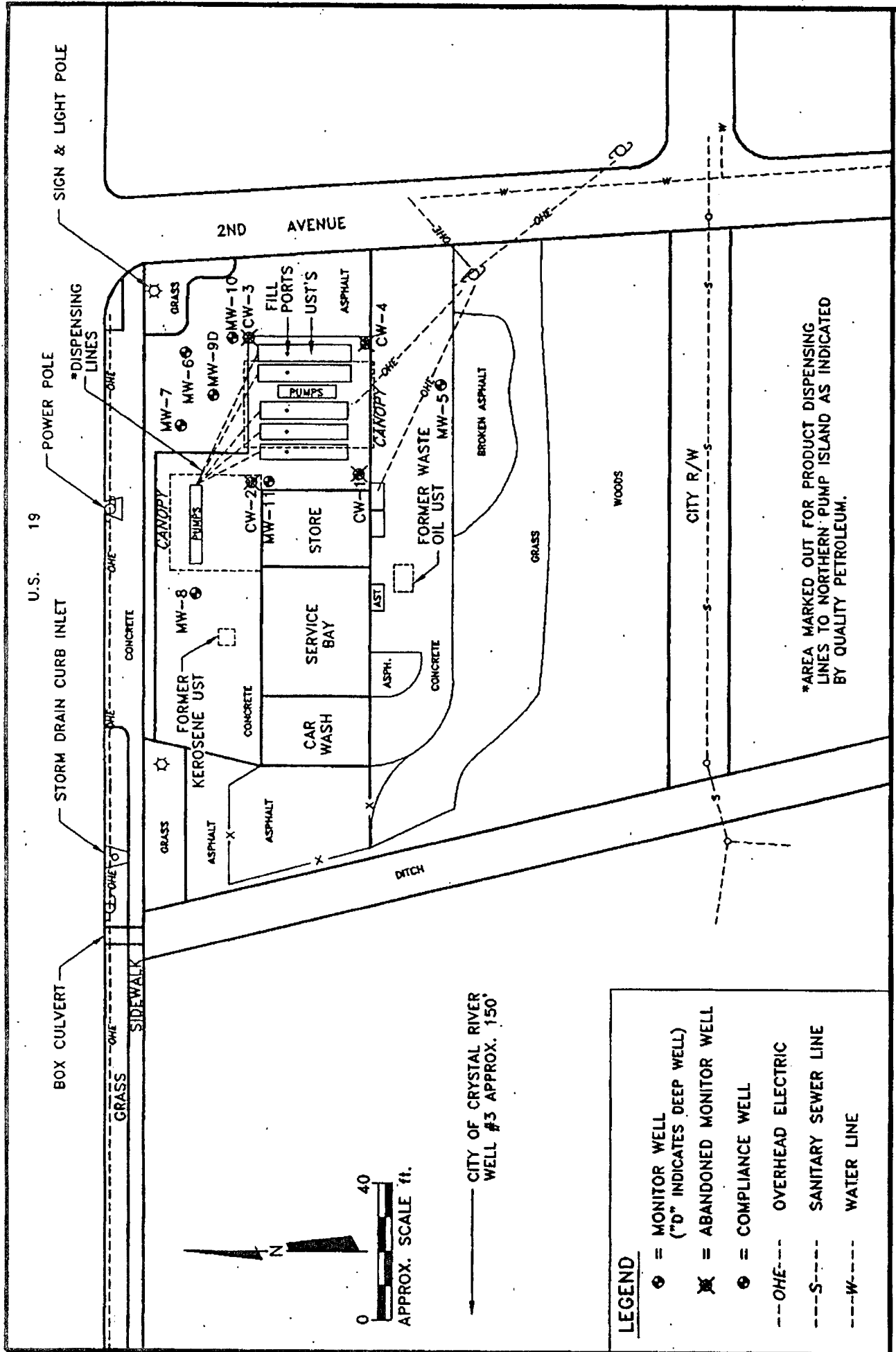
HANDEX OF FLORIDA, INC.

  
Sajjad M. Din  
Hydrogeologist  
[sdin@handexmail.com](mailto:sdin@handexmail.com)

 4/29/03  
Lisa C. Ray, P.G.  
Senior Hydrogeologist  
[lray@handexmail.com](mailto:lray@handexmail.com)

cc: Mr. Steve Weeks, Quality Petroleum, P.O. Box 3889, Lakeland, Florida, 33802  
Project File 111432.009

## FIGURES



U.S. 19



CITY OF CRYSTAL RIVER  
WELL #3 APPROX. 150'

**LEGEND**

- ⊕ = MONITOR WELL ("D" INDICATES DEEP WELL)
- ⊗ = ABANDONED MONITOR WELL
- ⊙ = COMPLIANCE WELL
- OHE--- OVERHEAD ELECTRIC
- S--- SANITARY SEWER LINE
- W--- WATER LINE

\*AREA MARKED OUT FOR PRODUCT DISPENSING LINES TO NORTHERN PUMP ISLAND AS INDICATED BY QUALITY PETROLEUM.

QUALITY PETROLEUM/AMOCO #85  
806 N.E. U.S. 19  
CRYSTAL RIVER, FLORIDA

FIGURE 1  
SITE PLAN



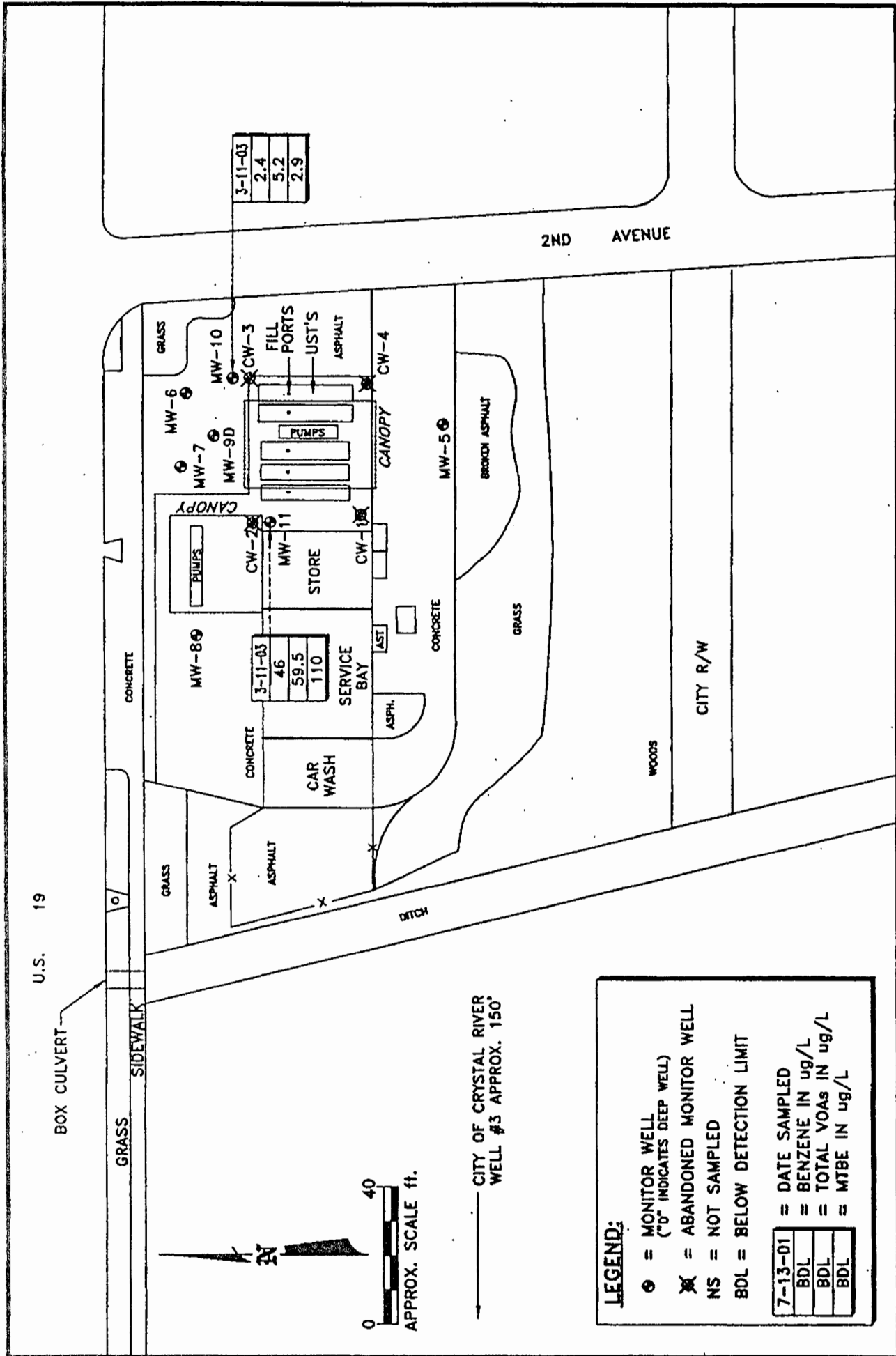


FIGURE 2  
GROUNDWATER  
CONCENTRATION MAP

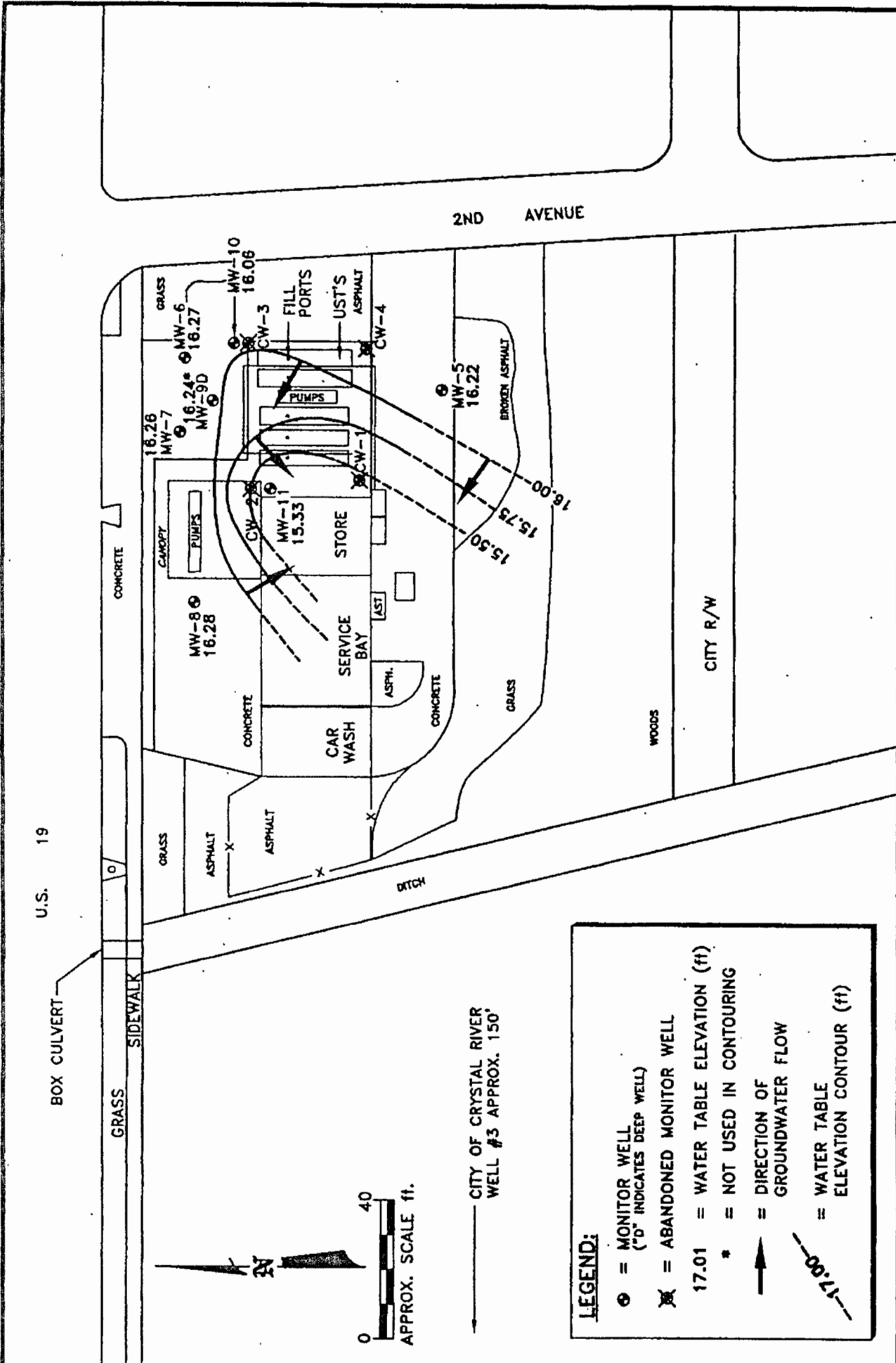
QUALITY PETROLEUM/AMOCO #85  
806 N.E. U.S. 19  
CRYSTAL RIVER, FLORIDA  
4-22-03

**LEGEND:**

- ⊙ = MONITOR WELL ("0" INDICATES DEEP WELL)
- ⊗ = ABANDONED MONITOR WELL
- NS = NOT SAMPLED
- BDL = BELOW DETECTION LIMIT

7-13-01	= DATE SAMPLED
BDL	= BENZENE IN ug/L
BDL	= TOTAL VOAS IN ug/L
BDL	= MTBE IN ug/L





U.S. 19

BOX CULVERT

GRASS SIDEWALK

2ND AVENUE

CITY R/W

**LEGEND:**

- ⊕ = MONITOR WELL ("D" INDICATES DEEP WELL)
- ⊗ = ABANDONED MONITOR WELL
- 17.01 = WATER TABLE ELEVATION (ft)
- \* = NOT USED IN CONTOURING
- = DIRECTION OF GROUNDWATER FLOW
- 17.00--- = WATER TABLE ELEVATION CONTOUR (ft)

CITY OF CRYSTAL RIVER WELL #3 APPROX. 150'

0 40  
APPROX. SCALE ft.

FIGURE 3  
WATER TABLE  
CONTOUR MAP  
MARCH 11 2003

QUALITY PETROLEUM/AMOCO #85  
805 N.E. U.S. 19  
CRYSTAL RIVER, FLORIDA  
4-22-03





## TABLES

**TABLE 1: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

Facility Name: QUALITY AMOCO #85

Facility ID#: 098503098

Not Sampled = NS  
 Analytical Results = ppb  
 Not Installed = NI

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Total Naphthalenes	Total PAHs	Total Lead	Dissolved Lead	Total VOH	EDB
CW-1	02/20/1990	BDL	BDL	BDL	BDL	BDL	44.00	NS	NS	BDL	BDL	NS	0.02
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	1.40	NS	NS	NS	NS	NS	NS
	10/09/1996	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	03/31/1997	BDL	BDL	BDL	BDL	BDL	89.00	NS	NS	NS	NS	NS	NS
	10/16/1997	BDL	BDL	BDL	BDL	BDL	1.90	NS	NS	NS	NS	NS	NS
	04/08/1998	BDL	BDL	BDL	BDL	BDL	1.80	NS	NS	NS	NS	NS	NS
	10/21/1998	BDL	BDL	BDL	BDL	BDL	3.6	NS	NS	NS	NS	NS	NS
	04/02/1999	<0.5	<0.5	<0.5	<0.5	BDL	1.5	NS	NS	NS	NS	NS	NS
	10/01/1999	<0.5	<0.5	<0.5	<0.5	BDL	2.6	NS	NS	NS	NS	NS	NS
CW-2	02/20/1990	54.0	3.20	1.70	14.00	72.90	240.00	NS	NS	0.03	0.06	NS	BDL
	12/11/1992	1.0	BDL	BDL	BDL	1.00	32.00	BDL	BDL	NS	NS	NS	NS
	04/10/1996	1.6	4.50	1.10	7.00	14.20	25.00	NS	NS	NS	NS	NS	NS
	10/09/1996	12.0	1.00	0.90	1.60	15.50	12.00	NS	NS	NS	NS	NS	NS
	03/31/1997	14.0	1.00	BDL	2.10	17.10	23.00	NS	NS	NS	NS	NS	NS
	10/16/1997	6.1	BDL	BDL	1.89	7.89	13.00	NS	NS	NS	NS	NS	NS
	10/16/1997	10.0	0.68	0.58	2.11	13.37	24.00	NS	NS	NS	NS	NS	NS
	04/08/1998	4.4	0.61	0.50	4.0	9.51	21	NS	NS	NS	NS	NS	NS
	10/21/1998	4.2	0.65	BDL	2.38	7.23	41	NS	NS	NS	NS	NS	NS
	04/02/1999	1.7	<0.5	<0.5	<0.5	1.7	17	NS	NS	NS	NS	NS	NS
10/01/1999	19	<0.5	0.87	1.52	21.39	16	NS	NS	NS	NS	NS	NS	
CW-3	02/20/1990	6.9	BDL	BDL	5.10	12.00	88.00	NS	NS	0.01	BDL	NS	BDL
	12/11/1992	290.0	6.00	22.00	31.00	349.00	25.00	BDL	BDL	NS	NS	NS	NS
	04/10/1996	34.0	1.70	2.60	6.60	44.90	16.00	NS	NS	NS	NS	NS	NS
	10/09/1996	4.5	2.40	1.60	2.80	11.30	14.00	NS	NS	NS	NS	NS	NS
	03/31/1997	12.0	1.20	0.80	2.30	16.30	5.20	NS	NS	NS	NS	NS	NS
	10/16/1997	5.9	1.3	1	4.80	13	8.3	NS	NS	NS	NS	NS	NS
	04/08/1998	33.0	2.9	1.6	5.59	43.09	48	NS	NS	NS	NS	NS	NS
	10/21/1998	61	4.1	15	7.20	87.3	56	NS	NS	NS	NS	NS	NS
	04/02/1999	35	1.5	3.2	5.23	44.93	23	NS	NS	NS	NS	NS	NS
	10/01/1999	3.1	0.69	0.82	2.68	7.29	3.3	NS	NS	NS	NS	NS	NS

# TABLE 1: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY

Facility Name: QUALITY AMOCO #85

Facility ID#: 098503098

Not Sampled = NS  
 Analytical Results = ppb  
 Not Installed = NI

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Total Naphthalenes	Total PAHs	Total Lead	Dissolved Lead	Total VOH	EDB
CW-4	02/20/1990	1.5	6.10	BDL	2.50	10.10	28.00	NS	NS	0.01	BDL	NS	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	2.00	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	2.40	NS	NS	NS	NS	NS	NS
	10/09/1996	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	03/31/1997	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	04/02/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	10/01/1999	<0.5	<0.5	<0.5	<0.5	BDL	1.9	NS	NS	NS	NS	NS	NS
MW-5	02/20/1990	BDL	2.80	BDL	3.00	5.80	300.00	NS	NS	0.01	BDL	NS	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	1.40	NS	NS	NS	NS	NS	NS
	10/09/1996	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	03/31/1997	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	04/02/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	10/01/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
04/05/2000	<0.50	<0.50	<0.50	BDL	BDL	BDL	1.20	NS	NS	NS	NS	NS	NS
09/29/2000	<1.0	<1.0	<1.0	BDL	BDL	BDL	<1.0	NS	NS	NS	NS	NS	NS
07/13/2001	<1.0	<1.0	<1.0	BDL	BDL	BDL	<1.0	NS	NS	NS	NS	NS	NS
MW-6	02/20/1990	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	0.01	BDL	BDL	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	10/09/1996	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	03/31/1997	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	04/02/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	10/01/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
09/29/2000	<1.0	<1.0	<1.0	BDL	BDL	BDL	<1.0	NS	NS	NS	NS	NS	
07/13/2001	<1.0	<1.0	<1.0	BDL	BDL	BDL	<1.0	NS	NS	NS	NS	NS	



**TABLE 1: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY**

Facility Name: QUALITY AMOCO #85      Facility ID#: 098503098      Not Sampled = NS  
 Analytical Results = ppb      Not Installed = N/

Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Total Naphthalenes	Total PAHs	Total Lead	Dissolved Lead	Total VOH	EDB
MW-9D	02/20/1990	1.3	1.80	BDL	5.40	8.50	BDL	NS	NS	BDL	BDL	BDL	BDL
	12/11/1992	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS
	04/10/1996	BDL	0.80	BDL	1.20	2.00	1.00	NS	NS	NS	NS	NS	NS
	10/09/1996	5.2	BDL	BDL	BDL	5.20	3.10	NS	NS	NS	NS	NS	NS
	03/31/1997	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	10/16/1997	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	04/08/1998	BDL	BDL	BDL	BDL	BDL	BDL	NS	NS	NS	NS	NS	NS
	10/21/1998	BDL	BDL	BDL	BDL	BDL	1.20	NS	NS	NS	NS	NS	NS
	04/02/1999	<0.5	<0.5	<0.5	<0.5	BDL	<0.5	NS	NS	NS	NS	NS	NS
	10/01/1999	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
MW-10	07/13/2001	16	<5.0	25	BDL	41	<5.0	NS	NS	NS	NS	NS	NS
	12/14/2001	11	1.8	6.0	2.3	21.1	<1.0	NS	NS	NS	NS	NS	NS
	06/14/2002	<1.0	0.4	<1.0	0.5	0.9	1.5	NS	NS	NS	NS	NS	NS
	09/27/2002	4.5	0.9	1.5	2.8	9.7	6.0	NS	NS	NS	NS	NS	NS
MW-11	03/11/2003	2.4	0.4	0.6	1.8	5.2	2.9	NS	NS	NS	NS	NS	NS
	07/13/2001	19	5.3	9.3	6.9	40.5	<1.0	NS	NS	NS	NS	NS	NS
	12/14/2001	25	2.6	1.2	10.6	39.4	65	NS	NS	NS	NS	NS	NS
	06/14/2002	14	3.2	1.2	4.3	22.7	51	NS	NS	NS	NS	NS	NS
MW-11	09/27/2002	23	2.8	8.0	16	49.8	64	NS	NS	NS	NS	NS	NS
	03/11/2003	46	3.8	1	8.7	59.5	110	NS	NS	NS	NS	NS	NS

**Table 2 GROUNDWATER ELEVATION TABLE**

Facility Name: QUALITY AMOCO 85 Facility ID#: 98503098  
 All Measurements = Feet  
 No Data = Blank

Well No.	Diameter (Inches)	Well Depth	Screen Interval	TOC Elevation	CW-1	CW-2	CW-3	CW-4	MW-5	MW-6		
DATE	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
02/20/1990	15.56	4.44		15.41	4.53		15.65	3.76		15.52	3.75	
12/11/1992	15.45	4.55		15.22	4.72		15.18	4.23		15.79	3.48	
04/10/1996	15.98	4.02		15.89	4.05		15.91	3.50		15.92	3.35	
10/09/1996	17.35	2.65		16.92	3.02		16.83	2.58		17.12	2.15	
03/31/1997	16.20	3.80		16.09	3.85		16.06	3.35		16.22	3.05	
10/16/1997	15.05	4.95		15.83	4.11		15.89	3.52		16.16	3.11	
04/08/1998	16.45	3.55		16.42	3.52		16.37	3.04		16.41	2.86	
10/16/1998												
10/21/1998	15.98	4.02		15.76	4.18		15.89	3.52		16.13	3.14	
04/02/1999	15.68	4.32		15.54	4.40		15.83	3.58		15.81	3.46	
10/01/1999	16.83	3.17		16.78	3.16		16.80	2.61		17.01	2.26	
04/05/2000										15.46	3.81	
09/29/2000										14.82	4.45	
07/13/2001										17.22	2.05	
12/14/2001										15.97	3.30	
06/14/2002										16.47	2.80	
09/27/2002										17.42	1.85	
03/11/2003										16.22	3.05	

## GROUNDWATER ELEVATION TABLE

Table 2

All Measurements = Feet  
No Data = Blank

Facility Name: QUALITY AMOCO 85

Facility ID#: 98503098

Well No.	MW-7	MW-8	MW-9D	MW-10	MW-11							
Diameter (Inches)	4	4	4	2	2							
Well Depth	12.00	12.00	30.00	15.00	15.00							
Screen Interval	2 to 12	2 to 12	25 to 30	2 to 15	2 to 15							
TOC Elevation	20.13	20.03	19.89	19.42	19.33							
DATE	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
02/20/1990	15.42	4.71		14.80	5.09							
12/11/1992	15.32	4.81		15.30	4.59							
04/10/1996	15.96	4.17		15.89	4.00							
10/09/1996	16.92	3.21		16.89	3.00							
03/31/1997	16.23	3.90		16.34	3.55							
10/16/1997												
04/08/1998	16.41	3.72		16.43	3.46							
10/16/1998	16.15	3.98		15.86	4.03							
10/21/1998	16.08	4.05		15.80	4.09							
04/02/1999	15.91	4.22		15.55	4.34							
10/01/1999	17.03	3.10		16.79	3.10							
04/05/2000	15.28	4.85		14.95	4.94							
09/29/2000	14.61	5.52		14.47	5.42							
07/13/2001	17.18	2.95		17.29	2.60		17.01	2.41		16.29	3.04	
12/14/2001	15.93	4.20		15.58	4.31		15.33	4.09		14.75	4.58	
06/14/2002	16.63	3.50		16.46	3.43		16.22	3.20		15.58	3.75	
09/27/2002	17.48	2.65		17.27	2.62		17.02	2.40		16.37	2.96	
03/11/2003	16.26	3.87		16.24	3.65		16.06	3.36		15.33	4.00	

**Site No. 80 City of Crystal River Water Tower**  
524 NE First Avenue  
Crystal River, Florida  
FDEP I.D. No. 098628468





CITRUS COUNTY

DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway  
Lecanto, Florida 32661-8099  
(904) 746-4223

In reply, refer to:

December 4, 1990

Mr. Bernie Hilgenberg  
City of Crystal River  
123 N.W. Hwy. 19  
Crystal River, Florida 32629

Ref. Fac.# 098628468  
Crystal River Well & 1 Water Tank

Dear Mr. Hilgenberg,

Attached are the 17-61 Florida Administrative Code compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-61, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank system's. Also see comments on front page of inspection report.

If you have any questions concerning this letter, please feel free to call us at (904)746-1135.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector

RTS/jf



State of Florida  
Department of Environmental Regulation

# Pollutant Storage Tank System Inspection Report Form

Facility ID No.: 097628468 County: CITRUS  
 Facility Name: CRYSTAL RIVER WWTW #1 WATER TANK  
 Facility Location: 555 NE. 15 AVENUE CRYSTAL RIVER, FL 32624  
 Operator: BERNIE HILGAN BERG Phone: 795 4316  
 Owner: CITY OF CRYSTAL RIVER Phone: \_\_\_\_\_  
 Latitude 28° 53' 55" N. Longitude 82° 35' 30" W. Section \_\_\_\_\_ Township \_\_\_\_\_ Range \_\_\_\_\_

Tank #	Size	Contents	Installation Date	U/A or In-Contact	Tank Construction	Integral Piping	Monitoring System	Tank Status
1	1000	J	XX/XX	U	C	B	ET	A
4	5000	J	XX/XX	U	C	B	ET	A

Comments: TANKS FILLED W/ CONCRETE 1983  
ABANDONED. CLOSURE REPORT WAS NOT REQUIRED AT  
THIS TIME.

<b>Inspection Type:</b> <input type="checkbox"/> Complaint Response <input checked="" type="checkbox"/> Initial <input type="checkbox"/> EDI <input type="checkbox"/> Public Well Field <input type="checkbox"/> Reinspection <input type="checkbox"/> Installation <input type="checkbox"/> Tank Removal <input type="checkbox"/> Unregistered	<b>Facility Information:</b> <input checked="" type="checkbox"/> Abandoned <input type="checkbox"/> Aboveground <input type="checkbox"/> Govt.-Federal <input checked="" type="checkbox"/> Govt.-Other <input type="checkbox"/> Non-retail <input type="checkbox"/> Retail <input type="checkbox"/> Retrofit (M. or O.) <input type="checkbox"/> Retrofit (L. or R.)
---	--

DER District: SOUTHWEST  
Richard T. [Signature]  
 Inspector's Signature & Date

Local Program: CITRUS COUNTY FIRE PREVENTION  
 \_\_\_\_\_  
 Facility Contact's Signature & Date

Violations must be corrected by: next routine inspection  or by:  \_\_\_ mo \_\_\_ day \_\_\_ yr

**Site No. 81 Dixie Automotive**  
846 NE Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098842217



CITRUS COUNTY

# DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway  
Lecanto, Florida 32661-8099  
(904) 746-4223

In reply, refer to:

November 22, 1991

Mr. Ed Austin  
Penninsular Motor Club  
P.O. Box 31087  
Tampa, Florida 33631-31087

Ref. Fac. # 098842217  
Dixie Automotive  
846 US 19 N.  
Crystal River, Florida 32629

Dear Mr. Austin,

Attached are the 17-761 Florida Administrative Code Compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-761, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank system. Also please see comments on front page of inspection report.

If you have any questions concerning this matter, feel free to call upon me.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

RTS/jf

FACILITY ID #: 098842217  
 FACILITY NAME: DIXIE AUTOMOTIVE  
 FACILITY LOCATION: 648 US 19 N, CRYSTAL RIVER  
 FACILITY CONTACT: PENINSULAR MOTOR CLUB  
 PHONE: (813) 872-5040  
 ADDRESS: PG BOX 31087, TAMPA, FL, 33631-3087  
 OWNER CONTACT: ED AUSTIN

COUNTY: CITRUS  
 PHONE: (813) 872-5040  
 OWNER CHANGE DATE 00/00/00

LATITUDE: 28-54-03 LONGITUDE: 82-36-02 FAC TYPE: NON-RETAIL BUSINESS

TANK #	SIZE	CONTENT	INSTALL DATE	UNDER OR ABOVE	TANK TYPE	INTEGRAL PIPING	MONITORING SYSTEM	TAN STA
1	3000	A	XX/XX	U	D	Y	Y	B
2	3000	A	XX/XX	U	D	Y	Y	B
3	3000	B	XX/XX	U	D	Y	Y	B
4	3000	B	XX/XX	U	D	Y	Y	B
5	350	L	XX/XX	A	C	Y	X	B
6	250	Z	XX/XX	A	C	Y	X	B

COMMENTS: 0 2 = WATER

- ② TANKS 1, 2, 3 & 4 EXCAVATED & REMOVED FROM SITE 11/88  
 PER EDI CHECK LIST OF KAREN VANN 11/2/88
- TANKS 5 & 6 REMOVED FROM SITE 6/91
- ④ GARBAGE REMOVED FROM BACK OF STATION 8/91
- ③ COPY OF STORAGE TANK NOTIFICATION FORM 17-61.090 (3) ATTACHED
- ⑥ COPY OF EDI CHECK LIST ATTACHED

INSPECTION TYPE (CHOOSE ONE)  
 ROUTINE       DISCHARGE  
 INSTALL       CLOSURE  
 ABANDONED       REINSPECT

SITE INFORMATION (ALL THAT APPLY)  
 NEAR PUB WELL       REPAIRED  
 CONTAMINATED       UPGRADED  
 COMPLAINT       UST & AST  
 ACID TANKS       HAZARD MAT

DER DISTRICT OR LOCAL PROGRAM: CITRUS COUNTY FIRE PREVENTION

INSPECTOR NAME (PRINT) RICHARD T. SOSNA CONTACT NAME (PRINT) \_\_\_\_\_  
Richard T. Sosna 11/20/91  
 INSPECTOR'S SIGNATURE & DATE CONTACT'S SIGNATURE & DATE



# Gannett Fleming

GANNETT FLEMING, INC.  
Suite 150  
7751 Belfort Parkway  
Jacksonville, FL 32256  
Office: (904) 332-9400  
Fax: (904) 332-9337  
www.gannettfleming.com

May 12, 2003  
File No.: 41771.001

Mr. Tim Foster  
Florida Department of Environmental Protection  
Petroleum Cleanup Team I  
Bureau of Petroleum Storage Systems  
2600 Blair Stone Road, MS 4540  
Tallahassee, Florida 32399-2400

Re: General/SA Report  
AAA-Dixie Automotive  
846 US HWY 19 North  
Crystal River, Florida  
FDEP Facility No. 098842217  
Work Order No. 2003-91-0786-0

RECEIVED  
DEPARTMENT OF ENVIRONMENTAL PROTECTION  
2003 MAY 14 A 10:51  
BUREAU OF PETROLEUM STORAGE SYSTEMS DOCUMENT MANAGEMENT CENTER

Dear Mr. Foster:

On behalf of AAA Insurance Company, Gannett Fleming, Inc. is submitting this General/SA Report to document groundwater conditions for the AAA Dixie Automotive facility in Crystal River, Florida. The work was completed as outlined in the Petroleum Preapproval Program Work Order No. 2003-91-0786-0. A copy of the approved work order is provided as Appendix A. The activities described herein were conducted during the April 24, 2003, site visit.

### Site Location and Description

AAA Insurance Company's Dixie Automotive facility is located on the south side of U.S. Highway 19, approximately 0.5 miles west of SR 44 in Crystal River, Citrus County, Florida. The site occupies the lot between U.S. Highway 19 and the City of Crystal River's Water Supply Tower No. Three. The site's latitude is approximately 28 degrees, 54 minutes, 0 seconds North, and the longitude is approximately 82 degrees, 35 minutes, 0 seconds West. The site is shown on the U.S. Geological Survey (USGS) Crystal River, Florida 7.5 minute quadrangle in Section 21, Township 18 South, Range 17 East. Figure 1 shows the site location, topography, and surface drainage features. Figure 2 shows the site layout.

**Gannett Fleming**

Mr. Tim Foster  
Florida Department of Environmental Protection  
May 12, 2003

-2-

The site is currently inactive and formerly operated as a gas station. The site has been built up from the surrounding area which is predominantly flat marsh and wetlands. The property adjacent to the site is currently undeveloped with a creek located to the east.

**Groundwater Level Determination**

Water level measurements were recorded for each of the 4 groundwater monitoring wells. Each water level was measured to the nearest 0.01 inch using an electric water level meter (Table 1). Information from water level determination activities show groundwater to be flowing east-southeast (Figure 3).

**Groundwater Monitoring Well Sampling**

The 4 existing groundwater monitoring wells were sampled for BTEX and MTBE by EPA Method No. 8021B, PAHs by EPA Method No. 8310, total Pb by EPA Method No. 6010, and TRPHs by the FL-PRO method. Each well was purged and sampled using the slow-flow technique as described in the Standard Operating Procedures, 4<sup>th</sup> Edition, for the Florida Petroleum Preapproval Program (SOPs). Field measurements were recorded during purging of each well as required in the SOPs. Each sample was collected in laboratory-supplied containers, placed on ice, and transported to ELABS, Inc. for the above analysis. Groundwater sampling datasheets are provided in Appendix B.

Analytical results show benzene is the only constituent present above groundwater cleanup criteria as determined by Chapter 62-777 F.A.C. Benzene was detected in MW-3 at a concentration of 1.9 µg/L (micrograms per liter). Table 2 and Figure 4 show the analytical results for the suite of groundwater monitoring wells sampled during the site visit. The laboratory analytical results are provided in Appendix C.

**Conclusions and Recommendations**

Based on hydrologic information, minimal groundwater contaminant impact, and the absorptive/cleansing nature of the surrounding environment (wetland) we recommend entering the facility into a Monitoring Only Program. A subsequent proposal and cost estimate detailing the program will be provided upon approval of this report.

**Gannett Fleming**

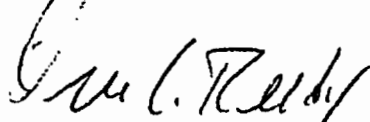
Mr. Tim Foster  
Florida Department of Environmental Protection  
May 12, 2003


-3-

It has been a pleasure working with you on this project and if you have any questions, please contact us at (904) 332-9400.

Sincerely,

GANNETT FLEMING, INC.

  
Oren C. Reedy, C.P.S.S.  
Project Soil Scientist

  
Fredric L. Pirkle, Ph.D., P.G.  
Project Geologist

Enclosures

Cc: Mr. Harold Lorentson, AAA Insurance Company







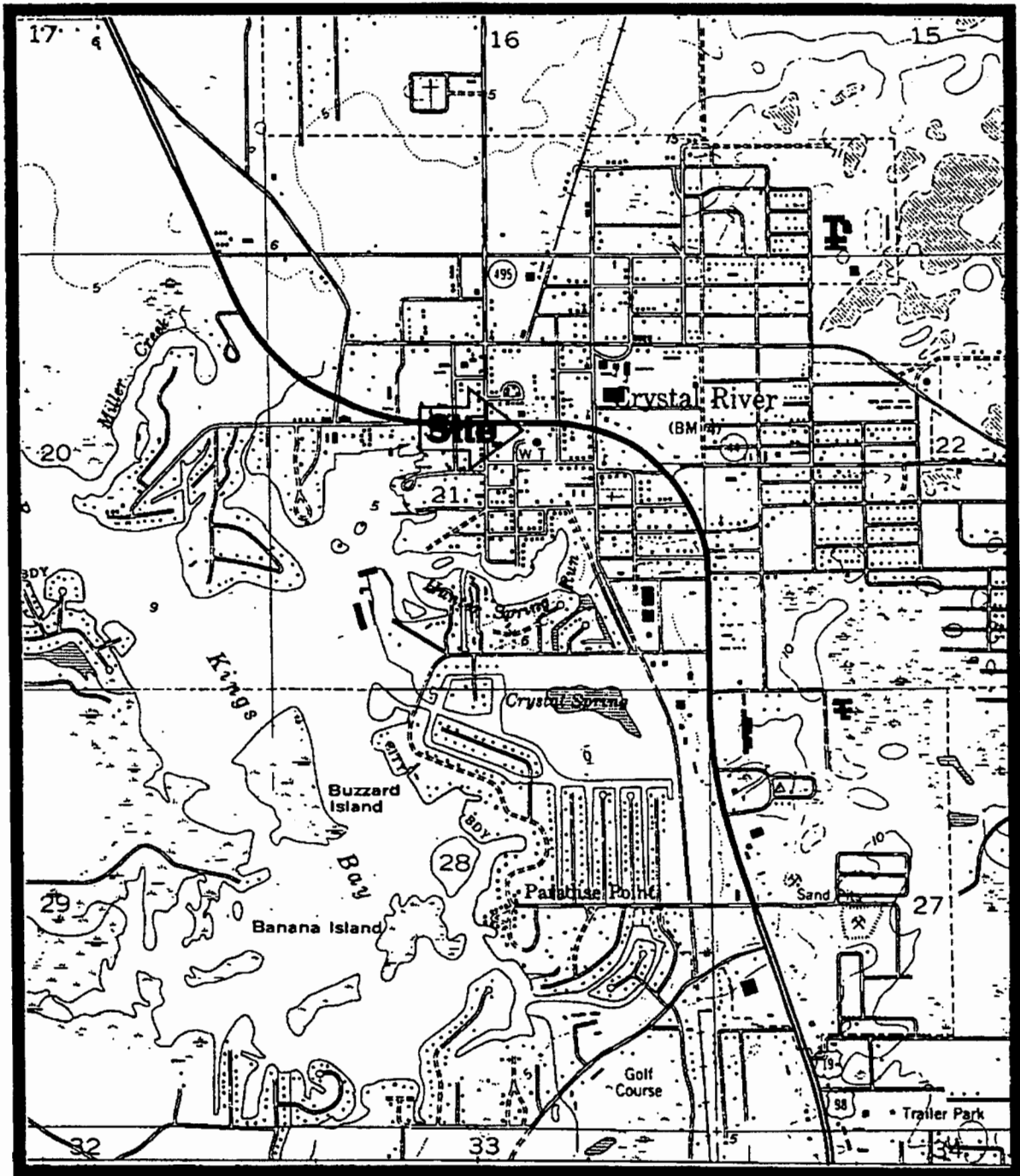
## TABLE 2: GROUNDWATER MONITORING WELL ANALYTICAL SUMMARY

**Facility Name:** AAA Dixie Automotive      **Facility ID#:** 98842217      **Not Sampled = NS**  
**Work Order No.** 2003-91-0786-0      **Analytical Results = ppb**

Location	Sample Date	Benzene	Toluene	Ethyl-benzene	Total Xylenes	Total VOA	MTBE	EDB	Total Lead	TRPHs	Naphthalene	Chromium	1-Meth	2-Meth	Other
MW-1	7/19/2002	<1	<1	<1	<1	<1	<1	<0.02	19	990	4	NS	10	10	
	4/24/2003	0.9	<1	0.9	1.4	3.3	<1	NS	<5	890	<1	NS	<1.5	<1.5	
MW-2	7/19/2002	<1	<1	1	<1	<1	<1	<0.02	<10	1600	21	NS	12	5	
	4/24/2003	0.7	<1	2.4	3.2	6.3	<1	NS	<5	136/700	<1	NS	<1.5	<1.5	
MW-3	7/19/2002	<1	<1	1	NS	<1	NS	<0.02	14	<200	<10	12	<10	<10	
	4/24/2003	1.9	0.4	<1	0.8	2.7	1.7	NS	<5	160	<1	NS	<1.5	<1.5	
MW-4	10/23/2002	<1	<1	1	NS	<1	NS	<0.02	30	3800	<10	<10	<10	<10	
	4/24/2003	<1	<1	<1	<1	<1	<1	NS	2.4	160/600	<1	NS	<1.5	<1.5	
Welland	10/23/2002	<1	<1	<1	NS	<100	NS	NS	<10	<200	<10	<10	<10	<10	
TW-8	1/29/1991	<1	<1	<1	<1	<10	<10	NS	NS	NS	NS	NS	NS	NS	
TW-10	1/29/1991	<1	1	<1	<1	1	NS	NS	<5	<0.2 ppm	NS	NS	NS	NS	
MW-1	2/13/1991	NS	NS	NS	NS	NS	NS	NS	10	NS	NS	NS	NS	NS	
MW-2	2/13/1991	<0.6	5	<0.9	<0.9	5	<0.9	NS	<5	NS	NS	NS	NS	NS	
MW-3	2/13/1991	<6	<10	<9	<9	<6	<9	NS	<5	NS	NS	NS	NS	NS	
MW-1	6/19/1991	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-2	6/19/1991	<0.6	<1	<0.9	<0.9	<0.6	2	NS	NS	NS	NS	NS	NS	NS	
MW-3	6/19/1991	<1.2	<2	<1.8	<1.8	<1.2	<1.8	NS	NS	NS	NS	NS	NS	NS	
MW-1	9/5/1991	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-2	9/5/1991	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-3	9/5/1991	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-1	12/2/1991	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-2	12/2/1991	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-3	12/2/1991	<3	<5	<4.5	<4.5	<3	<4.5	2	NS	NS	NS	NS	NS	NS	
MW-1	2/20/1992	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-2	2/20/1992	<0.6	<1	<0.9	<0.9	<0.6	<0.9	NS	NS	NS	NS	NS	NS	NS	
MW-3	2/20/1992	<3	<5	<4.5	<4.5	<3	<4.5	NS	NS	NS	NS	NS	NS	NS	

Note: Samples collected from 1/29/91 through 2/20/92 were obtained by Halliburton NUS Environmental Corporation.

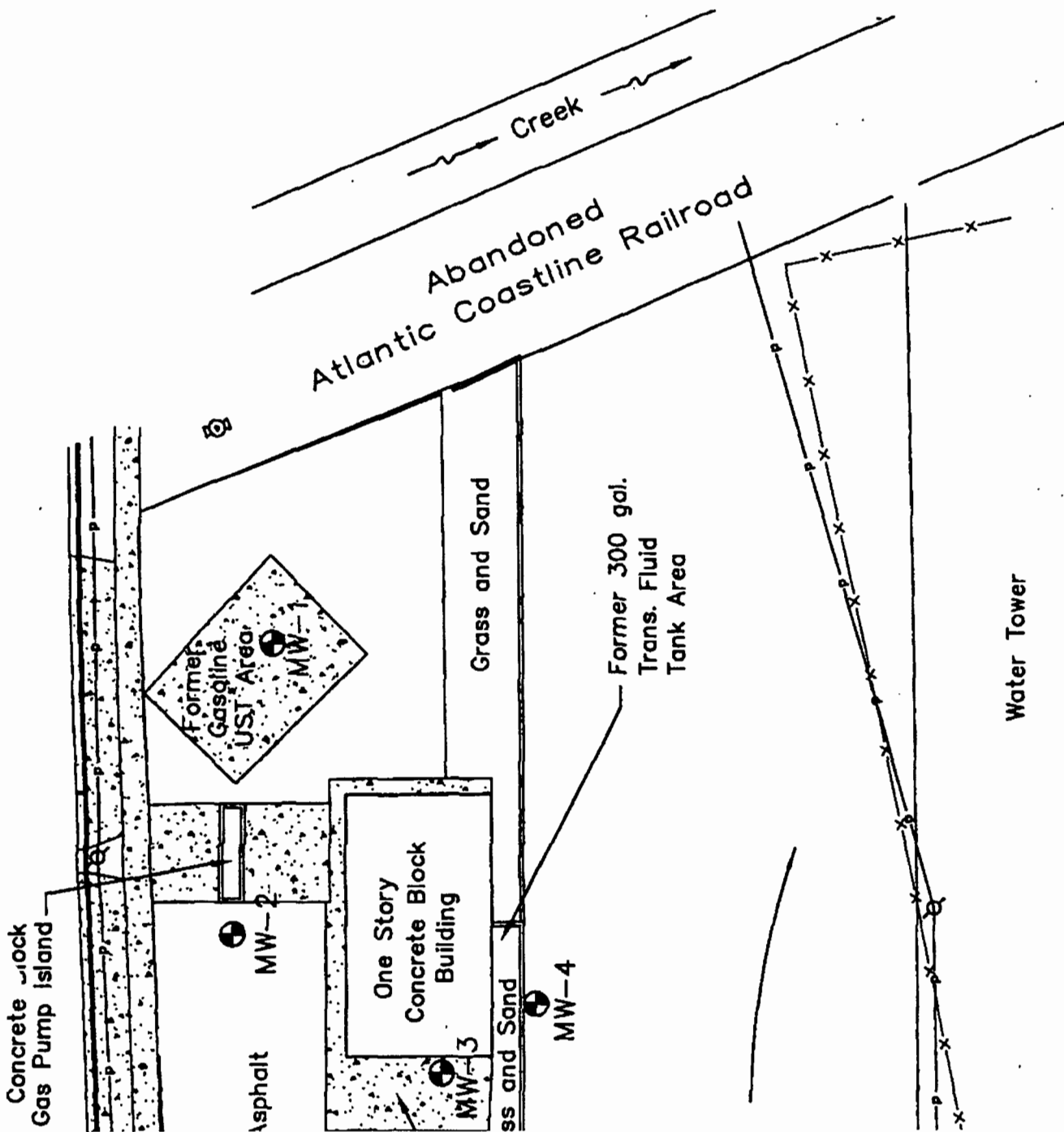
AAA-DIXIE AUTOMOTIVE  
FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION  
846 US HWY 19 NORTH  
CRYSTAL RIVER, FLORIDA



SCALE 1"=2000'

U.S.G.S. 7.5 MINUTE QUADRANGLE  
CRYSTAL RIVER, FLORIDA

LOCATION MAP



Concrete Rock Gas Pump Island

Asphalt

MW-2

One Story Concrete Block Building

MW-3

Grass and Sand

ss and Sand

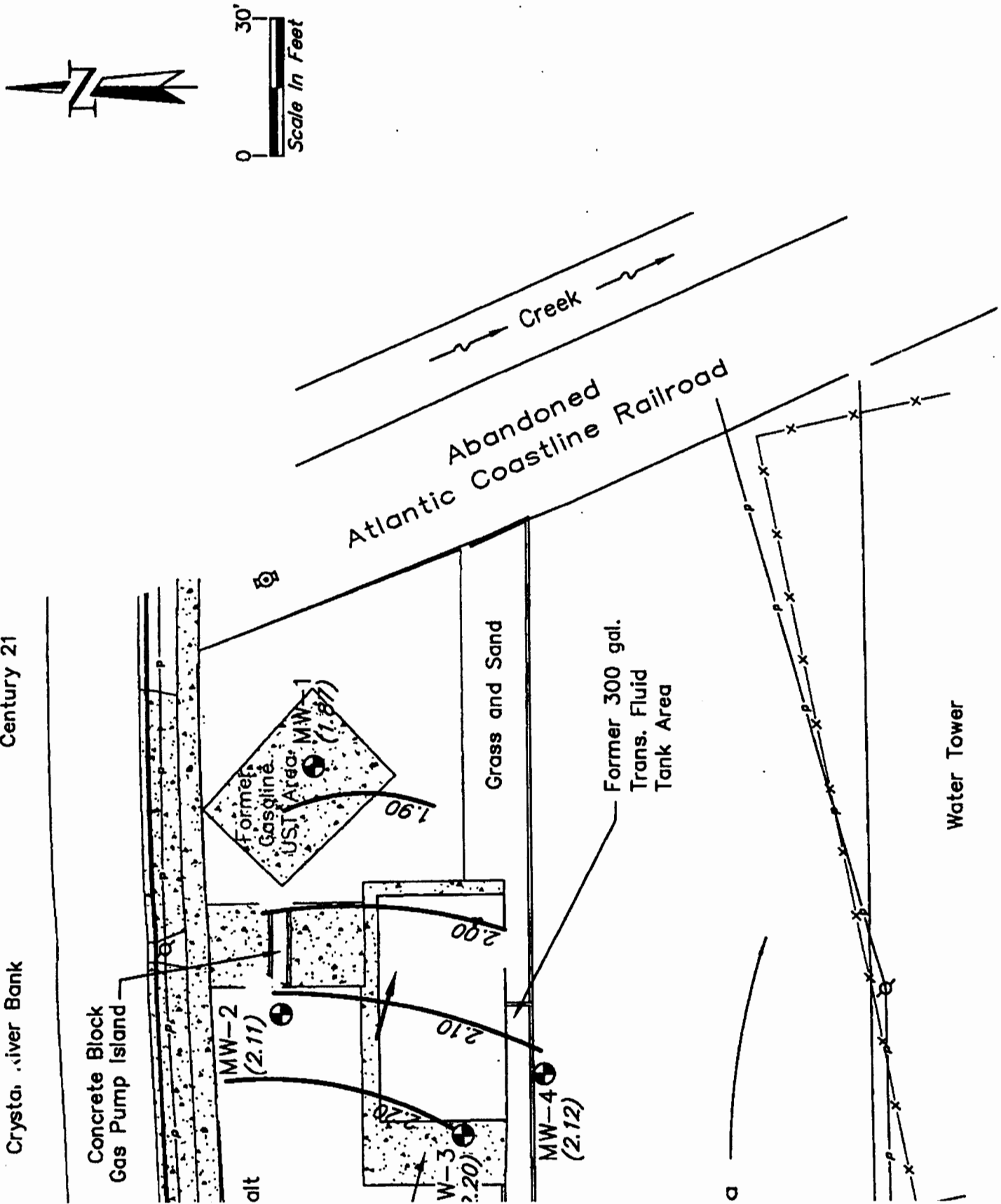
MW-4

Former 300 gal. Trans. Fluid Tank Area

Abandoned Atlantic Coastline Railroad

Creek

Water Tower

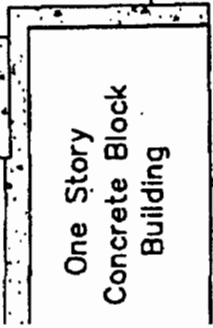
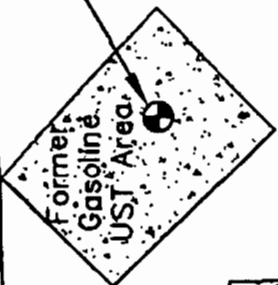




rete Block  
ump Island

MW-1

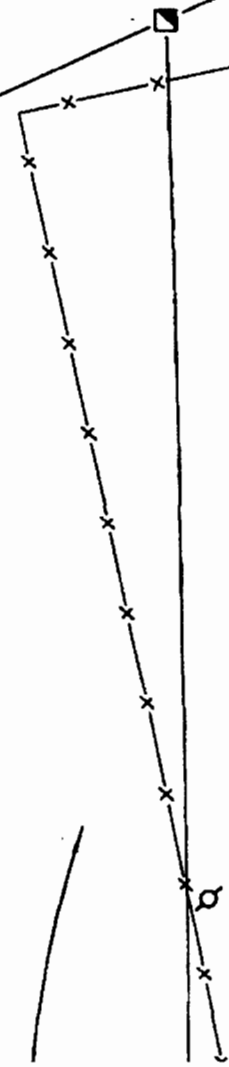
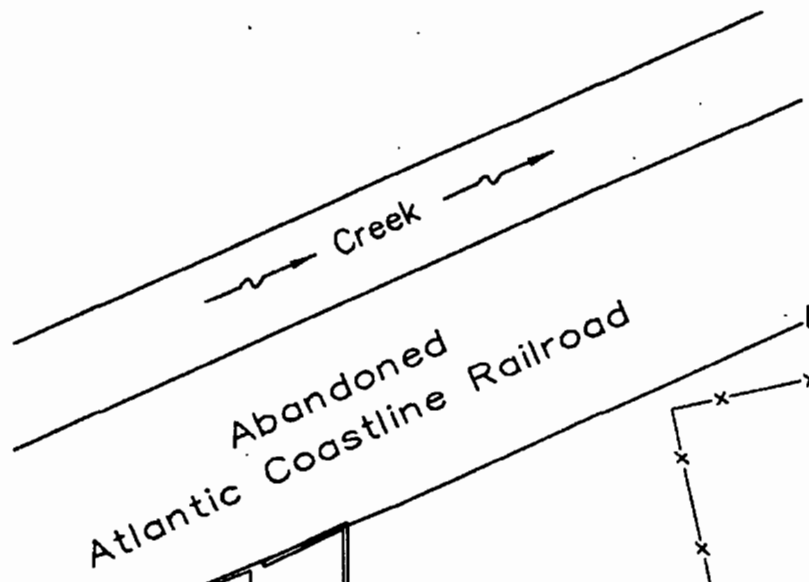
TRPH	890
BENZ	0.9
MTBE	<1
XYLE	1.4
Pb	<5
ETHY	0.9



Grass and Sand

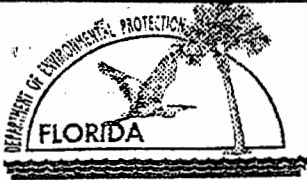
MW-4

TRPH	160
MTBE	<1
Pb	2.4



- EX
- PH- Total Recoverable Petroleum Hydrocarbons
  - VZ- Benzene
  - SE- Methyl Tert-Butyl Ether
  - TY- Ethylbenzene
  - IL- Toluene

**Site No. 82 Sprint Florida**  
35 NE Fifth Street  
Crystal River, Florida  
FDEP I.D. No. 099101357



### Storage Tank Facility Compliance Inspection Report

Facility ID 9101357 County 09 CITRUS Inspection Date 11/3/00  
 Facility Name SPRINT FLORIDA (CRY RUR) Facility Type C-USER  
 Latitude 28°53'57" Longitude 82°35'35" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ASTs Inspected	1
------------------	------------------	---

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	Release Detection is a continuous monitoring of the tank interstice by a permeator sensor, and the tank and its piping are visually checked monthly. The sensor is checked monthly by Sprint, and annually by HSA Technical Services. An RDRL and current placed are on display at the facility. There were no signs of leaks on the tank exterior or the piping.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: \_\_\_\_\_ Effective Date: \_\_\_\_\_ Expiration Date: \_\_\_\_\_

Other Coverage meeting federal financial responsibility requirements. Mechanism: self (lets from CEO)

None \_\_\_\_\_

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Lathy Stephens</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> 11/3/00 Inspector Signature & Date	<u>[Signature]</u> 11-3-00 Facility Representative Signature & Date



November 13, 2000

Ms. Cathy Stephens  
Sprint Environmental Health and Safety  
555 Lake Border Dr.  
Apopka, FL 32703

RE: DEP FAC #099101357  
Sprint Florida  
Crystal River, FL

Dear Ms. Stephens:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Enclosed, please find a copy of the Storage Tank Facility Compliance Inspection Report for the inspection recently performed at the above named facility. Please refer to this report for comments regarding the inspection.

If there are any questions concerning this matter, you may contact the Storage Tank Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

Enclosure(s)

CMS/file

---

**CITRUS COUNTY DEPARTMENT OF HEALTH**

ENVIRONMENTAL HEALTH DIVISION  
STORAGE TANKS INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316



This data is current as of: 03-NOV-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 9101357	District: SWD
Name: SPRINT FLORIDA	County: Citrus
35 Ne 5th St	Type: Fuel User/Non-Retail
Crystal River, FL 32629-4163	Status: Open
Contact: Lewis Peteway } <i>cms</i>	Latitude: 28:53:57.0000 } <i>cms</i>
Phone: 352-368-8760 } <i>cms</i>	Longitude: 82:35:35.0000 } <i>cms</i>
	LL Method: AGPS

**Account Owner Information**

Name: Sprint Florida  
 Po Box 165000 M/S Flapka0206  
 Attn: Jennifer Scarpino  
 Altamonte Springs, FL 32716-5000  
 Phone: 407-889-1531

**Tank Owner Information**

Name: Sprint Florida  
 Po Box 165000 M/S Flapka0206  
 Attn: Jennifer Scarpino  
 Altamonte Springs, FL 32716-5000  
 Phone: 407-889-1531

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
2	1000	Diesel-Emergen Gen	07/01/1998	ABOVE	U	A ✓ X M ✓ C ✓ R ✓ O ✓ P ✓	A ✓ B ✓ I ✓	Q ✓ D ✓ F ✓ 1 ✓
1	1000	Diesel-Emergen Gen	06/01/1980	ABOVE	B			

*cms*

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!

**Site No. 84 Chevron - Kwik Stop**  
118 NW Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503048

This data is current as of: 04-JAN-2001

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

Facility Information

ID#: 8503048	District: SWD
Name: CHEVRON-KWIK STOP	County: Citrus
118 Nw Hwy 19	Type: Retail Station
Crystal River, FL 32629-3931	Status: Open
Contact: Rajendra Patel } <i>cms</i>	Latitude: 28:53:58.0000 } <i>cms</i>
Phone: 352-563-5770 } <i>cms</i>	Longitude: 82:35:40.0000 } <i>cms</i>
	LL Method: AGPS

Account Owner Information

Name: Patel, Rajendra & Chandrika  
 118 Nw Us Hwy 19  
 Crystal River, FL 34428  
 Phone: 352-563-5770

Tank Owner Information

Name: Patel, Rajendra & Chandrika  
 118 Nw Us Hwy 19  
 Crystal River, FL 34428  
 Phone: 352-563-5770

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
1R1	8035	Unleaded Gas	06/01/1987	UNDER	U	F M O N P	C F K J	K L H3 15
2R1	8035	Unleaded Gas	06/01/1987	UNDER	U	F M O N P	C F K J	K L H3 15
3R1	8035	Unleaded Gas	06/01/1987	UNDER	U	F M O N P	C F K J	K L H3 15
1	10000	Leaded Gas		UNDER	B			
2	3000	Gasohol		UNDER	B			
3	3000	Gasohol		UNDER	B			
4	4000	Gasohol		UNDER	B			





# Department of Environmental Protection

Jeb Bush  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400  
December 10, 2002

David B. Struhs  
Secretary

Mr. David Rogers, P.G.  
Terra Tech Enterprises, Inc.  
14156 River Road  
Pensacola, FL 32507

Subject: **Site Park Response**  
Chevron Quick Stop  
118 NW Highway 19  
Crystal River, Citrus County, FL  
FDEP Facility ID# 09-8503048

Dear Mr. Rogers:

The Bureau of Petroleum Storage Systems has reviewed the letter dated December 4, 2002 (received December 9, 2002), regarding the Bureau Chief's decision to not approve the source removal project at this facility.

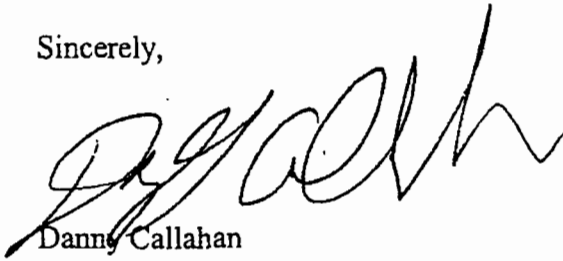
Once again, prior to Program funding and procedure changes, the Department approved a Limited Scope Remedial Action Plan (LSRAP) for this facility on December 24, 2001 consisting of source removal operations in conjunction with planned dispenser upgrades. Since this time, all source removal operations in excess of \$75,000.00 now have to go through the Bureau Chief, Mr. Mike Ashley for final approval due to current Program funding issues.

The site information for this facility was reviewed by Mr. Ashley (cost proposal / work order submitted by Terra-Tech Enterprises, Inc.) and was deemed ineligible since no significant eminent threat to public health or safety is present at this facility. Mr. Ashley reviews all of the available data (reports) for each site in this situation to make his determination. His answer for this site is final (will not be funded by the Department) until fiscal issues are resolved to allow the work to proceed under the Preapproval Program. However, the facility owner does have the option to proceed with his planned dispenser upgrades at his own expense.

Mr. David Rogers, P.G.  
Terra Tech Enterprises, Inc.  
Page No. 2

If you should have any questions, please contact me at 850-245-8916, at the letterhead address, Mail Station 4580, or at my E-mail address.

Sincerely,

A handwritten signature in black ink, appearing to read 'D. Callahan', written in a cursive style.

Danny Callahan  
Environmental Specialist II  
Petroleum Cleanup Section 4  
Bureau of Petroleum Storage Systems  
E-mail: **Dan.Callahan@dep.state.fl.us**

/dgc

cc: Mr. Rajendra Patel, 118 NW U.S. Hwy 19, Crystal River, FL 34428  
File



December 4, 2002

RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION

BUREAU OF PETROLEUM  
STORAGE SYSTEMS-9 A 10:45

Mr. Danny Callahan  
Environmental Specialist  
FL Department of Environmental Protection  
MS 4580  
2600 Blair Stone Rd.  
Tallahassee, FL 32399-2400

DEC 9 2002  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
PETROLEUM CLEANUP  
SECTION 4

Re: Response to FDEP Correspondence Dated October 28, 2002  
Chevron Kwik Stop  
118 NW US Highway 19  
Crystal River, Citrus County, FL  
FDEP Facility ID# 098503048

Dear Mr. Callahan:


This correspondence has been prepared in response to the FDEP correspondence dated October 28, 2002 sent to Mr. Rajendra Patel (site owner). A copy of the correspondence is attached. The last sentence of the third paragraph states " Only soil contamination is present at this facility with no groundwater impact or migration potential present." Please note the following comments:

- 1) Only one sampling event of all site monitoring wells has been conducted at the site. This event occurred in January of 2001.
- 2) Three groundwater samples collected from around the dispenser area during the Geoprobe investigation in September of 2000 had compounds detected above the applicable groundwater target levels.
- 3) The depth to groundwater at the facility is very shallow (approximately 3 to 5 feet).
- 4) Soils around the dispenser island are significantly contaminated.

It is my professional opinion, based on over eighteen year of experience conducting assessment and remediation activities at petroleum contaminated sites in Florida, that groundwater has been impacted and the potential for further groundwater impact and subsequent migration is highly likely. Experience also indicates that the longer the time period prior to implementing cleanup activities, the more costly the project is. I would like the Department to reconsider Mr. Ashley's ineligible determination. This is a chance to remediate and close a site in a cost effective and timely manner.

If you have any questions, Please contact me at (850) 492-0913 or email [drterra@mindspring.com](mailto:drterra@mindspring.com).

Sincerely,

  
David M. Rogers, P.G.  
President

CC: Mr. Rajendra Patel



**LIMITED SCOPE REMEDIAL ACTION PLAN  
MODIFICATION**

*Approved  
DCT/STK  
12/19/01*

**BUREAU OF PETROLEUM  
STORAGE SYSTEMS**

**DEC 6 2001**

**PETROLEUM CLEANUP  
SECTION 4**

**CHEVRON KWIK STOP  
118 NW U.S. HIGHWAY 19**

**CRYSTAL RIVER, CITRUS COUNTY, FLORIDA**

**FDEP Facility ID #098503048**

**Work Order #2001-94-0216-0**

**RECEIVED  
DEPARTMENT OF  
ENVIRONMENTAL PROTECTION  
01 DEC -6 PM 2:49  
BUREAU OF PETROLEUM  
STORAGE SYSTEMS  
DOCUMENT MANAGEMENT  
CENTER**

**Prepared for:  
FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION  
2600 Blair Stone Road  
Tallahassee, Florida 32399**

**Prepared by:  
TERRA TECH ENTERPRISES, INC.  
14156 River Road  
Pensacola, Florida 32507**

**NOVEMBER, 2001**

*David M. Rogers, P.G.*  
David M. Rogers, P.G.  
FLORIDA  
PROFESSIONAL GEOLOGIST

*Joseph Farry, P.E.*  
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11/03/01  
FLORIDA  
REGISTERED PROFESSIONAL ENGINEER

## TABLE OF CONTENTS

<b>SECTION 1</b>	<b>INTRODUCTION</b>
<b>SECTION 2</b>	<b>SITE DESCRIPTION</b>
<b>SECTION 3</b>	<b>SUMMARY OF SITE ASSESSMENTS</b>
3.1	Assessment Activities and Level 4 Reports
3.2	Contaminant Mass Calculations
<b>SECTION 4</b>	<b>LIMITED SCOPE REMEDIAL ACTION PLAN</b>
4.1	Remedial Actions
4.2	Cleanup Time Frame Estimates
4.3	Monitoring and Reporting
4.4	Cleanup Cost Estimates and Comparisons
<b>SECTION 5</b>	<b>CONCLUSIONS</b>
FIGURES 1 - 16	
TABLE 1 - 4	
APPENDIX A	CORRESPONDENCE
APPENDIX B	CONTAMINANT MASS CALCULATIONS

## SECTION 1

### INTRODUCTION

This Limited Scope Remedial Action Plan Modification (LSRAP MOD) has been prepared by Terra Tech Enterprises, Inc. (TTE) for the Chevron Kwik Stop located at 118 Northwest U.S. Highway 19, Crystal River, Citrus County, Florida (Figures 1, 2 & 3). TTE is conducting this phase of work under the Florida Department of Environmental Protection (FDEP) Petroleum Preapproval Program Work Order Number 2001-95-0216-0. The LSRAP MOD has been prepared as directed by FDEP staff. A Level 3 Limited Scope Remedial Action Plan (LSRAP) which proposed soil vapor extraction as the remedial technology was submitted to the FDEP on August 23, 2001. The LSRAP was conditionally approved by the FDEP in correspondence received September 22, 2001. Based on new FDEP soil source removal guidelines (Soil Source Removal Guidelines for Petroleum Cleanup Preapproval Program Sites – September 3, 2001) which were put into effect after submittal of the LSRAP, a modification to the existing LSRAP for utilization of source removal as the primary remediation method was requested by FDEP staff. In addition, the site owner has indicated that his dispensers will be upgraded during 2002 and source removal activities can be scheduled to coincide with this work. The site has been assigned a Priority Ranking Score of 61.

For  
SUSE  
\*INL  
Rev

Dispers  
Upgrade  
2002

Following is a brief summary of site chronological events as ascertained from the available information researched. Pertinent correspondence is include within Appendix A.

6/87: The three existing underground storage tanks (USTs) were reportedly installed in 1987. The tank registration form indicates the three tanks are constructed of fiberglass-clad steel and are used for the storage of unleaded gasoline.

discharge data 6/29/9

6/17/96: Environmental Audit conducted by Affordable Environmental Audits, Inc. Groundwater analysis indicated 6 ug/L of Ethylbenzene and 48 ug/L of total Xylenes were detected in the sample from the southeast compliance well and 12 ug/L Ethylbenzene and 276 ug/L total Xylenes were detected in the northwest compliance well.

6/25/96: Discharge Reporting Form submitted to the FDEP for the facility.

6/26/96: Florida Petroleum Restoration Insurance Program Claim submitted for the facility.

7/10/96: FDEP Notice of Eligibility.

PLUR  
DISCH

7/31/96: FDEP correspondence regarding deductible requirements.

8/16/96: Lines tested and passed.

9/97: Original lines replaced with fiberglass lines. Impacted soils detected with an OVA during replacement activities. Closure Assessment completed by Environmental Evaluations, Inc.

6/25/98: STB Environmental conducts Super Act Investigation and site inspection.

12/2/98: FDEP correspondence indicating site had a ranking score of 61.

5/22/00: FDEP correspondence requesting a proposal from TTE.

8/07/00: Work Order 2001-00-6541-0 was executed.

8/9/00: Drilling and sampling notification given to FDEP.

8/24/00: Revised drilling and sampling notification given to FDEP.

9/5-7/00: Direct push borings SB-1 through SB-20 and soil sampling completed. Obtained 10 groundwater samples from direct push borings. Sampled two compliance wells. Area survey conducted. County file review conducted.

10/11/00: Level 4 General Report submitted to the FDEP.

10/23/00: FDEP correspondence, Deliverable Review received by TTE. Correspondence requested additional maps and City well information.

10/30/00: TTE submits Deliverable Review Response to the FDEP.

11/5/00: FDEP correspondence, Deliverable Review and Proposal Request received by TTE. Correspondence approves Level 4 Report and request proposal for the next phase of work.

12/15/00: Work Order 2001-91-0069-0 executed. This work order was for drilling of 8 hand-augered borings in potential source areas, soil sampling and analysis, installation of 6 water table monitoring wells and one deep well, groundwater sampling of the new wells and preparation of a Level 4 General Report using the Template Site Assessment Report form.

12/20/00: Drilling and sampling notification given to FDEP.

1/23-27/01: Hand augered borings B-1 through B-8 completed with OVA screening and laboratory sampling. MW-1 through MW-6 and DW-1 installed and sampled.

*August 2001*

2/08/01: Professional Land Survey (PLS) completed by Spectra Engineering & Research, Inc.

2/15/01: Field notes, laboratory analytical reports, boring logs, and PLS submitted to the FDEP by TTE.

3/21/01: Level 4 General Report submitted to the FDEP by TTE.

5/15/01: FDEP correspondence, Deliverable Review received by TTE. Correspondence indicates the Level 4 Report had conditionally satisfied the approved work order subject to responding to the Geologist Review. The correspondence also indicated that the site was ready to go into remediation and requested that a detailed proposal be submitted to the FDEP to address soil remediation at the facility.

5/31/01: Preapproval Cost Proposal submitted to the FDEP for groundwater monitoring, soil vapor extraction Pilot Testing and Preparation of a Remedial Action Plan (Soil Design).

6/11/01: FDEP Staff contacted TTE regarding proposal. FDEP staff indicated that pilot testing was not necessary and a Level 3 LSRAP should be prepared based on utilizing soil vapor extraction as the remedial technology without pilot testing recommended by TTE to assess the feasibility of using this approach.

6/25/01: Work Order 2001-94-0216-0, directing TTE to prepare a LSRAP using Soil Vapor Extraction (SVE) as the remediation technology, executed.

8/23/01: LSRAP (SVE) submitted to the FDEP.

9/22/01: FDEP correspondence Deliverable Review (LRAP) and Level 3 limited Scope Remedial Action Plan Review received by TTE. Correspondence indicates that the deliverable was **conditionally satisfied** pending responses to P.E. review. New source removal guidelines were included with correspondence.

10/15/01: TTE submits review responses to the FDEP. This correspondence indicates that, based on the new source removal guidelines, the site appears to be an adequate candidate for source removal.

Source Removal

## SECTION 2 SITE DESCRIPTION

The site is located in Section 21, Township 18 South, Range 17 East in Crystal River, Citrus County, Florida, as shown on the U.S. Geological Survey (USGS) 7.5 minute topographic map of the Crystal River, Florida Quadrangle (Figure 1).

The site is currently a retail fuel dispensing facility and convenience store. Figure 2 is a site map showing the location of the store building, the UST and dispenser areas, compliance wells, utilities and other associated features. Compliance well CW-NE is 9.60 feet in depth, CW-NW is 7.40 feet in depth, CW-SE is 8.70 feet in depth, and CW-SW is 6.20 feet in depth. All compliance wells are 2-inch diameter and screened to the surface.

Land use in the area is primarily commercial and residential. Figure 3 illustrates surrounding land uses.

Site utilities identified are shown on Figure 2 and includes overhead electric and underground electric, water, sewer, and telephone lines.

Public and private water supply wells were investigated by conducting area reconnaissance; and by contacting and conducting file searches at the Citrus County Environmental Health Department, and STB Environmental (contracted by FDEP to perform Super Act Investigations). One public supply well (City of Crystal River Well) was identified within a ¼ mile radius of the site as is located approximately 1000 feet to the east-southeast. Another public supply well (City of Crystal River Well) is located approximately 1.1 miles to the northeast of the site. Well locations are illustrated on Figure 1. Mr. Keith Mullins / US Filter (contracted to operate the City of Crystal River Water Treatment Plant) was contacted regarding the depth and production of the City Well located within ¼ mile of the site. He indicated that the well is cased to a depth of 84' BLS where it intersects a naturally occurring limestone cavern of unknown depth. The permitted production capacity for the well is 285,000 GPD. However, the well is currently used for standby purposes only.

The nearest surface water body to the site, Kings Bay, is located approximately 800 to 1,000 feet southwest of the site.

## SECTION 3

### SUMMARY OF SITE ASSESSMENTS

Previously conducted site assessments include a Level 4 Report submitted to the FDEP on October 11, 2000 by TTE; and an additional Level 4 Report submitted to the FDEP by TTE on March 21, 2001.

#### 3.1 Assessment Activities and Level 4 Reports

1. One public supply well was identified within a 1/4 mile radius of the site.
2. Subsurface utilities identified at the site include water, sewer, electric, and telephone lines.
3. The nearest surface water body to the site is Kings Bay, located approximately 800 to 1,000 feet southwest of the site.
4. Lithologic sequences identified during the advancement of soil borings and monitoring wells include approximately 9 to 10 feet of fine to medium grained quartz sand (SW) overlying limestone to a depth of at least 25' BLS.
5. OVA/FID soil screening results and soil analytical data indicate contaminated soils are present in the immediate vicinity of the dispenser island. The extent of soils contamination has been adequately defined in all directions.
6. The depth to groundwater on September 6, 2000 ranged from 3.61 feet to 4.10 feet. The direction of groundwater flow as measured on this date was to the west-southwest with a hydraulic gradient of approximately 0.004 ft/ft. The depth to groundwater on January 27, 2001 ranged from 4.94 feet to 5.50 feet. The direction of flow was to the north-northwest with an average hydraulic gradient of approximately 0.013 ft/ft. It is unknown at this time if tidal influences affect groundwater flow patterns at the site.
7. Groundwater samples collected on September 6 & 7, 2000 during advancement of geoprobe borings, indicated groundwater with dissolved contaminant levels above applicable target levels were present in the vicinity of the dispenser island. Based on the results of the geoprobe investigation six water table monitoring wells (MW-1 through MW-6) and one deep well (DW-1) were installed at the site. Groundwater samples collected on January 27, 2001 from monitoring wells MW-1 through MW-6 and DW-1 indicated that only lead, detected in MW-1 (0.229 mg/L), exceeded the applicable target levels during this sampling event. The discrepancy is thought to be a result of sampling only the surface of the water table during

*Lithology*

*DJW  
3.6-4.1  
or  
4.9-5.5  
SAN 01*

the geoprobe investigation as compared with sampling the entire screened interval of the monitoring wells.

8. A review of all the data indicates that the contaminated soils identified around the dispenser island are a continuing potential source of groundwater impact.

Assessment data is summarized on Tables 1 through 4, and Figures 1 through 13.

### 3.2 Contaminant Mass Calculations

Contaminant mass in the Vadose Zone was estimated using the following method:

1. The arithmetic average of TPH concentrations was determined from previous soil sampling data (Avg = 152 ppm from Table 2).
2. The area inside the zero TPH concentration line was determined (an elliptical shape was assumed from Figure 14 Area = 1,458 square feet).
3. To calculate the volume, the average TPH concentration (152 ppm) was multiplied by the area within the zero TPH concentration line (Area = 1,458 square feet). This value is then multiplied by the average thickness of the contamination (T = 4 feet).
4. The volume of contamination was multiplied by the soil density ( $\rho = 65 \text{ Kg/ft}^3$ ).
5. The result of this calculation was then converted from units of mg to pounds by multiplying by  $2.2 \times 10^{-6}$ .

Based on these calculations, the contaminant mass is as follows:

$$\text{Mass} = 152 \text{ ppm} \times 1,458 \text{ ft}^2 \times 4 \text{ ft} \times 65 \text{ Kg/ft}^3 \times 2.2 \times 10^{-6} = 126 \text{ pounds}$$

Contaminant Mass Calculations are presented in Appendix B.



## SECTION 4

### LIMITED SCOPE REMEDIAL ACTION PLAN

#### 4.1 Remedial Actions

Proposed remedial actions will consist of soil excavation of an approximately 50' X 25' X 6 - 7' deep area as illustrated on Figure 15 (including anticipated caving). This includes impacted areas identified during assessment phases and removal of one to two feet of the smear zone. Required permits will be obtained prior to initiating excavation activities. All OSHA requirements will be followed during site activities. During excavation activities, soils will be sampled and screened in the field in accordance with Chapter 62-770, F.A.C. Excavation will continue until OVA readings are <50 PPM. Confirmatory soil laboratory analytical data will be obtained by collecting composite soil samples from the bottom and each of the excavation side walls. The soil samples will be analyzed for BTEX + MTBE, PAHs, and FL-PRO (based on previous sampling results).

Prior to backfilling the excavation area, a horizontal, 6-inch diameter slotted PVC well screen is proposed to be installed as shown on Figures 15 and 16. The well screen will be installed below the water table and can be utilized in the future, if necessary to meet target levels, for air and/or liquid injection or groundwater recovery.

The excavation areas will be backfilled with clean fill to the original grade. The clean select backfill material will be placed in the excavation in maximum loose lifts not to exceed 12 inches. The material will be compacted to a minimum of 90 percent of the maximum dry density as determined by ASTM D 698. In-place field density testing will be conducted in accordance with ASTM D 2922 and applicable OSHA regulations. The area will be resurfaced with concrete.

*part of upgrade*  
The piping from the tank area to the dispensers and a portion of the sites water supply line will have to be replaced as a result of excavation activities. No other underground structures have been identified which will affect the proposed remedial strategy.

Contaminated soils removed during excavation activities will be transported and disposed of at a licensed thermal treatment facility. Pre-burn soil samples will be collected and provided to the treatment facility in accordance with applicable regulations. It is estimated that a maximum of 500 tons (approximately 325 cubic yards) of contaminated soils will be transported from the site for thermal treatment.

500 TONS MAX  
325 YDS<sup>3</sup>

1 week

#### 4.6 Cleanup Time Frame Estimates

It is expected to take approximately one week to complete the excavation program. It is estimated that groundwater target levels will be maintained and a Site Rehabilitation Completion Report will be submitted within one year of post soil source removal monitoring.

#### 4.7 Monitoring and Reporting

Proposed monitoring will include interim monitoring until source removal activities have been completed to verify the contamination is not migrating and post source removal monitoring to assure source removal activities were successful and applicable target levels have been met. The proposed remedial strategy is expected to result in the groundwater meeting applicable Target Levels or Natural Attenuation Monitoring default levels. The proposed monitoring program will consist of quarterly sampling of MW-1, MW-2, MW-3 and MW-4. The designated wells will be sampled and analyzed for BTEX + MTBE.

+ P6 ? - 1<sup>st</sup> Qtr, P6

Once source removal activities are completed, it is considered appropriate for the site to fall under the provisions of Chapter 62.770.690 – Natural Attenuation. As stated in Chapter 62-770.690 (7) 2. (b) "The monitoring period shall be a minimum of one year, unless two consecutive sampling events have indicated that the applicable cleanup target levels have been met, in which case the requirements of paragraph (8) shall apply" (paragraph (8) requires submittal of a Site Rehabilitation Completion Report (SRCR)).

Quarterly reports will be prepared and submitted to the Department to document the success of the remedial program.

#### 4.8 Cleanup Cost Estimates and Comparisons

Following is a cost estimate comparison for implementation of the LSRAP (SVE System) versus source removal. A cost estimate will be provided in the Preapproval Program format following approval of this LSRAP MOD.

## SVE SYSTEM IMPLEMENTATION

### EQUIPMENT

Extraction Blower & Moisture Separator	\$5,000.00
Vapor Phase Carbon Unit (Lease - \$2,000.00/month x 1 month)	2,000.00
Control System	<u>1,200.00</u>
Total	\$8,200.00

### INSTALLATION

VEWs	\$10,000.00
Trenching and Piping - including materials	15,000.00
Compound	5,000.00
Electrical	1,200.00
Permitting	<u>1,500.00</u>
Total	\$32,700.00

### START-UP, MONITORING AND MAINTENANCE (1 Year)

System Start-up	\$2,500.00
Electrical Usage	2,000.00
System O & M & Reporting	<u>22,000.00</u>
Total	\$26,500.00

### MONITORING AND MAINTENANCE (Year 2)

O & M & Reporting	\$20,000.00
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**TOTAL ESTIMATED COST** **\$87,400.00**

*Pr. Hy  
close  
H*

## SOURCE (SOIL) REMOVAL IMPLEMENTATION

Permitting, Health & Safety Plan, Oversight	\$10,000.00
Product and Water Piping Replacement	\$8,000.00
Excavation / Stockpiling / Loading	\$25,000.00

*500 TONS  
325 YDS<sup>3</sup>*

Backfill / Compacting / surfacing	\$17,000.00
Load / Transport / Soils Treatment	\$27,000.00
Confirmation Sampling	\$300.00
<u>Two Year</u> Monitoring & Reporting (pre and post source removal)	<u>\$24,000.00</u>
	<i>only 1 Year probably</i>
<b>TOTAL ESTIMATED COSTS</b>	<b>\$111,300.00</b> <i>~ 100,</i>

In accordance with the new source removal guidelines, The cost for source removal is less than 25% greater than the proposed in-situ method and has a greater chance of success.

## SECTION 5

### CONCLUSIONS

As directed by FDEP staff a LSRAP MOD has been prepared for the site. Proposed remedial actions will consist of soil excavation of an approximately 50' X 25' X 6 - 7' deep area (including anticipated caving). This includes impacted areas identified during assessment phases and removal of one to two feet of the smear zone. Required permits will be obtained prior to initiating excavation activities. All OSHA requirements will be followed during site activities. During excavation activities, soils will be sampled and screened in the field in accordance with Chapter 62-770, F.A.C. Excavation will continue until OVA readings are <50 PPM. Confirmatory soil laboratory analytical data will be obtained by collecting composite soil samples from the bottom and each of the excavation side walls. The soil samples will be analyzed for BTEX + MTBE, PAHs, and FL-PRO.

Prior to backfilling the excavation area, a horizontal, 6-inch diameter slotted PVC well screen is proposed to be installed. The well screen will be installed below the water table and can be utilized in the future, if necessary to meet target levels, for air and/or liquid injection or groundwater recovery.

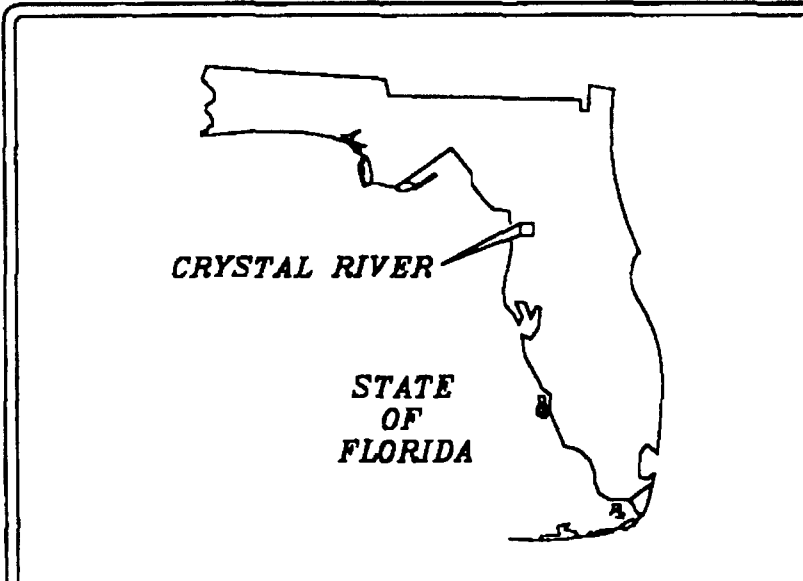
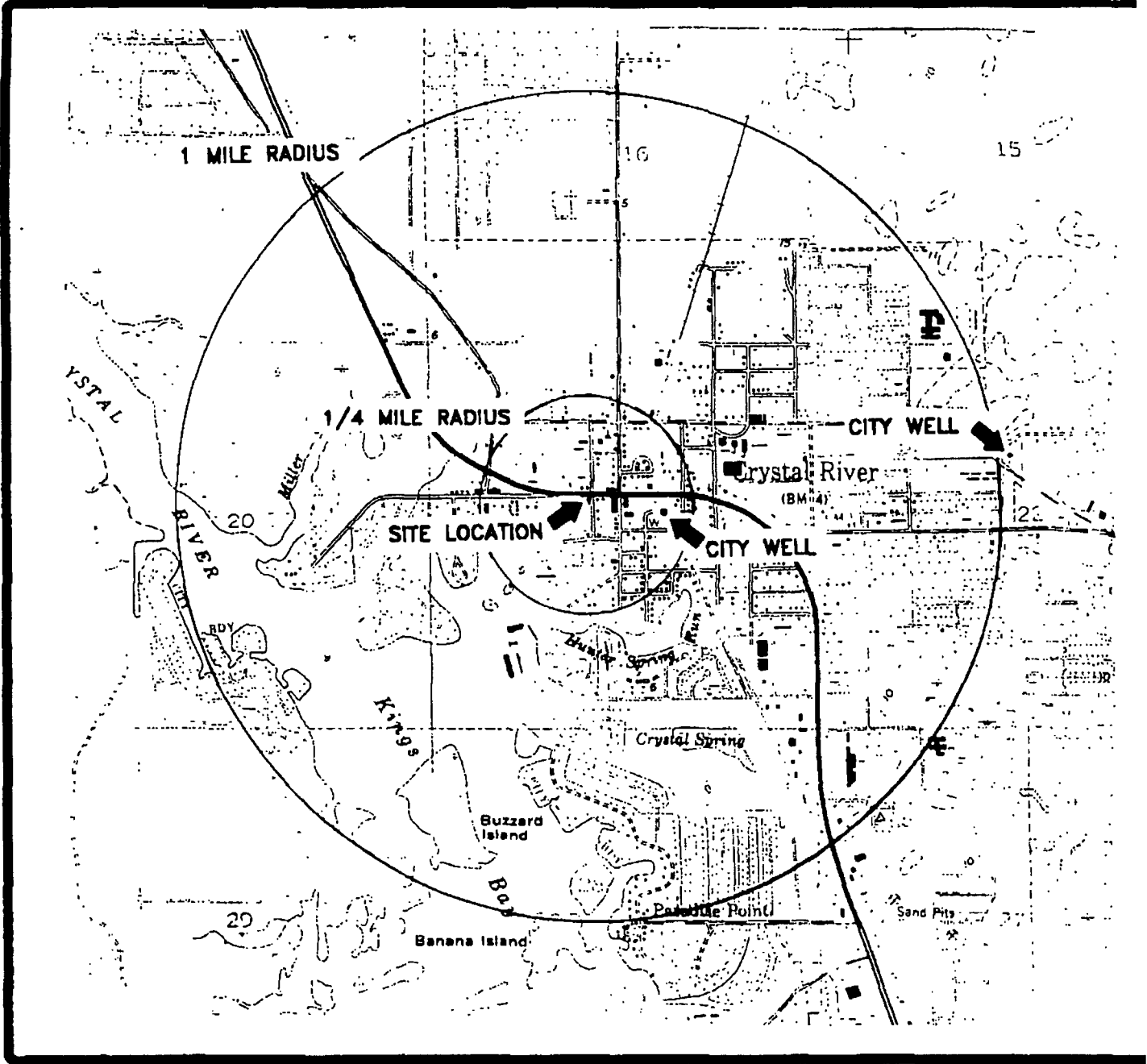
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**FIGURES 1 - 16**

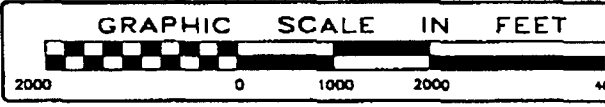


**CRYSTAL RIVER**

**STATE  
OF  
FLORIDA**

U.S.G.S. SOURCE QUADRANGLE:  
**CRYSTAL RIVER QUADRANGLE**

TOWNSHIP: <b>18</b>	<b>SOUTH</b>	RANGE: <b>17</b>	<b>EAST</b>	SECTION: <b>21</b>
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**TERRA TECH ENTERPRISES, INC.**  
CONSULTING and TECHNOLOGIES



**NORTH**

PREPARED FOR:  
**F. D. E. P.**

SITE ADDRESS:  
**CHEVRON KWIK STOP  
118 NORTH WEST HWY  
CRYSTAL RIVER, FL**

FIGURE TITLE:  
**SITE LOCATION MAP**

DRAWN BY:  
**V. Snyder**

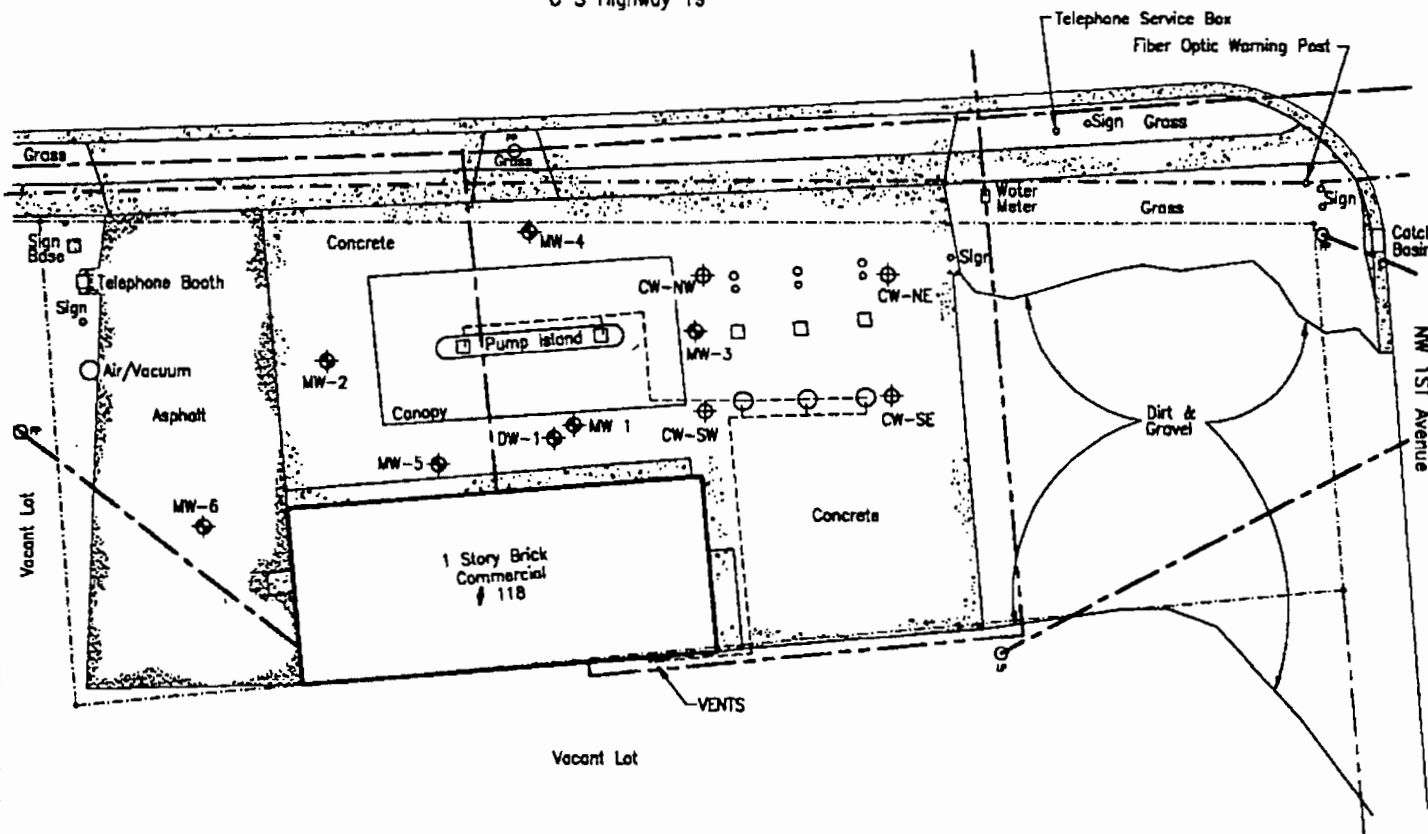
DATE DRAWN:  
**10/7/00**

JOB NUMBER:  
**ADE-Kwik**

FIGURE NUMBER:  
**1**



U S Highway 19

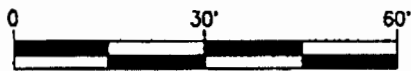


Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING
- ELECTRIC LINE
- - - WATER LINE
- · - · - FIBEROPTIC LINE
- · · · · PRODUCT / VENT LINES

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
118 NORTH HWY 19  
CRYSTAL RIVER, FL

DRAWN BY:

V. Snyder

DATE DRAWN:

3/19/01

JOB NUMBER:

ADE-Kwik

FIGURE NUMBER:

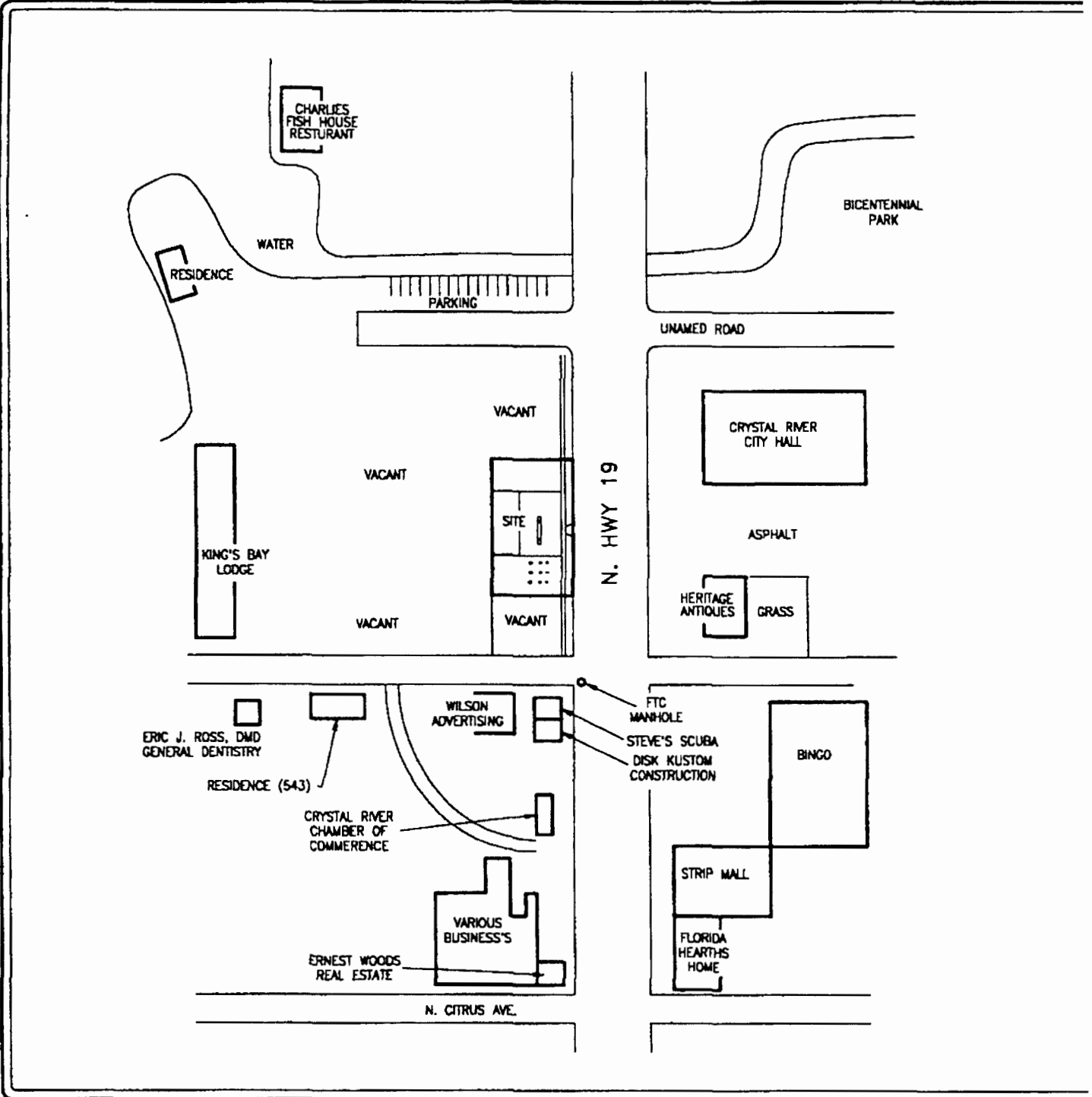
2

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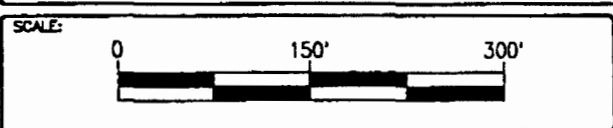
**NORTH**

FIGURE TITLE:

SITE MAP



**LEGEND**



PREPARED FOR:  
F. D. E. P.

DRAWN BY:  
V. Snyder

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SITE ADDRESS:  
CHEVRON KWIK STOP  
118 NORTH WEST HWY 19  
CRYSTAL RIVER, FL

DATE DRAWN:  
10/6/0

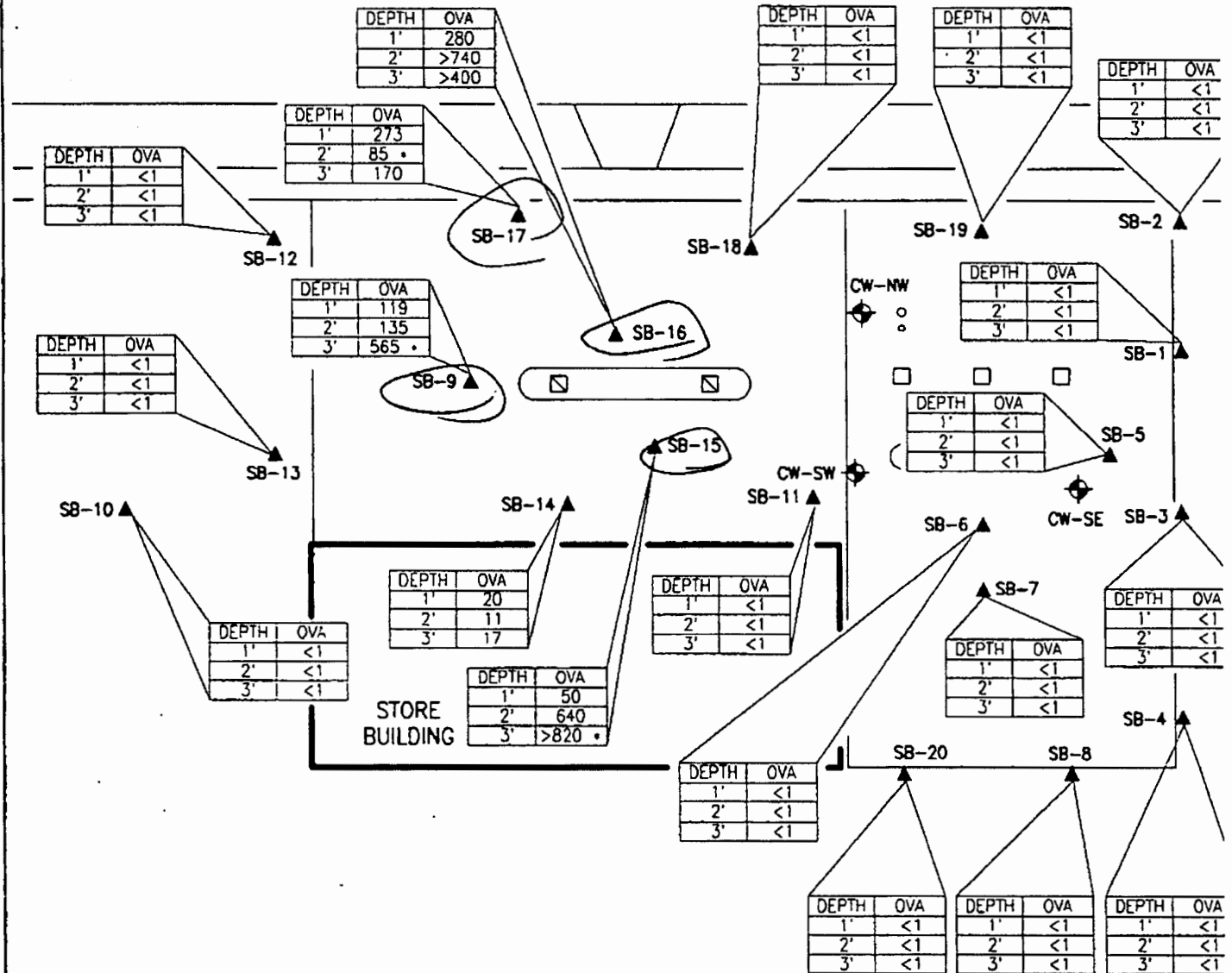
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FIGURE TITLE: **ADJACENT LAND USE MAP**

FIGURE NUMBER: 3

# N.W. HWY 19

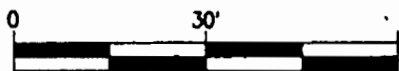


**LEGEND**

- ▲ SOIL BORING
- ◆ MONITORING WELL
- ☐ DISPENSER
- FILL PORT
- SUBMERSIBLE PUMP

OVA RESULTS IN PARTS PER MILLINO (ppm)  
 \* DENOTES LAB SAMPLE TAKEN

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
 118 NORTH WEST HWY 19  
 CRYSTAL RIVER, FL

DRAWN BY:

V. Snyder

DATE DRAWN:

10/6/00

JOB NUMBER:

ADE-Kwi

**NORTH**

**TERRA TECH ENTERPRISES, INC.**  
 CONSULTING and TECHNOLOGIES

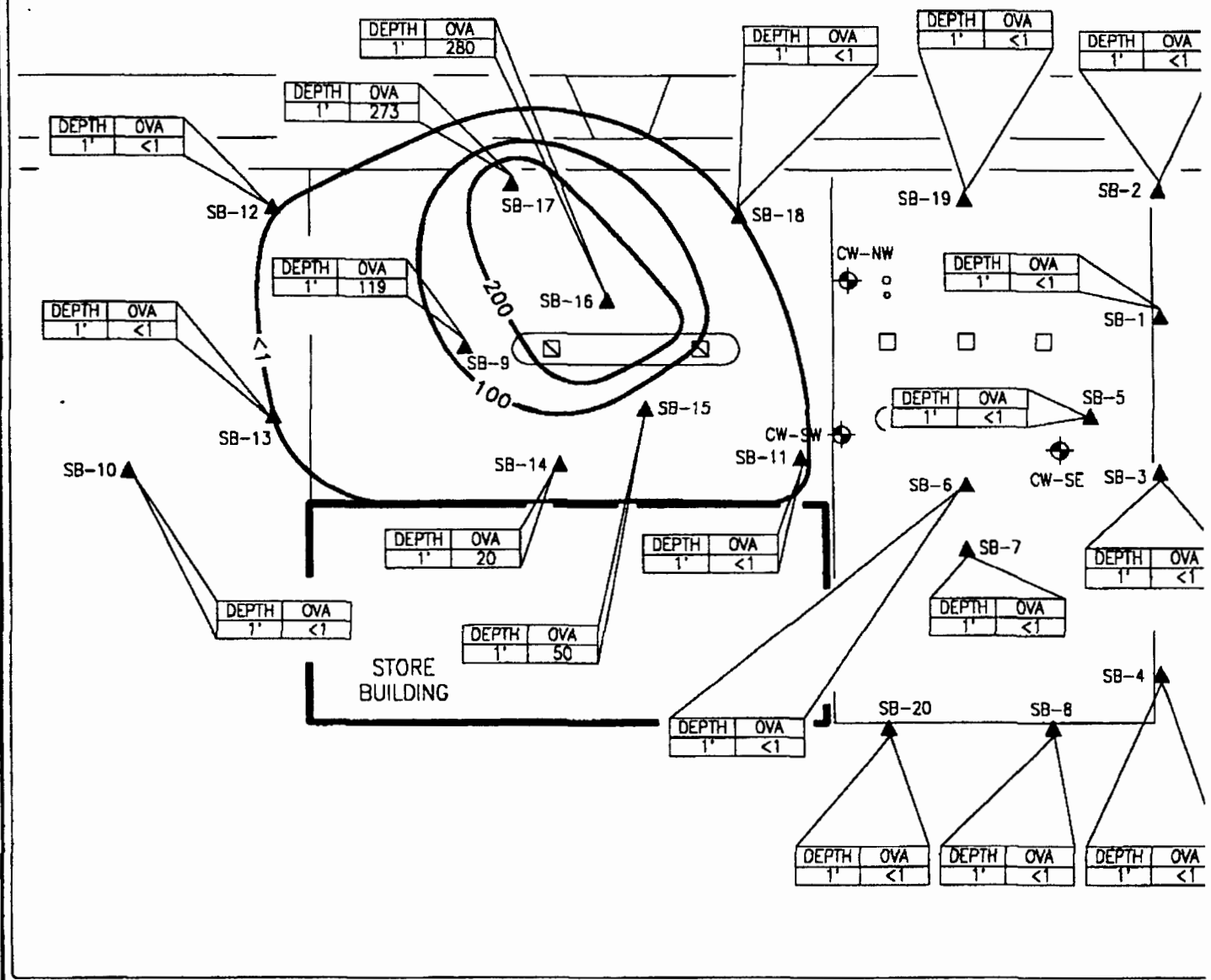
FIGURE TITLE:

Geoprobe Boring Location / OVA Soil Screening Results (Sept. 6&7, 2000)

FIGURE NUMBER:

4

N.W. HWY 19



**LEGEND**

- ▲ SOIL BORING
- ⊕ MONITORING WELL
- 200 — OVA CONTOUR (ppm)

OVA RESULTS IN PARTS PER MILLINO (ppm)  
 \* DENOTES LAB SAMPLE TAKEN

---

**SCALE:** 0 30'

**PREPARED FOR:** F. D. E. P.

**SITE ADDRESS:** CHEVRON KWIK STOP  
118 NORTH WEST HWY 19  
CRYSTAL RIVER, FL

**DRAWN BY:** V. Snyder

**DATE DRAWN:** 10/27/00

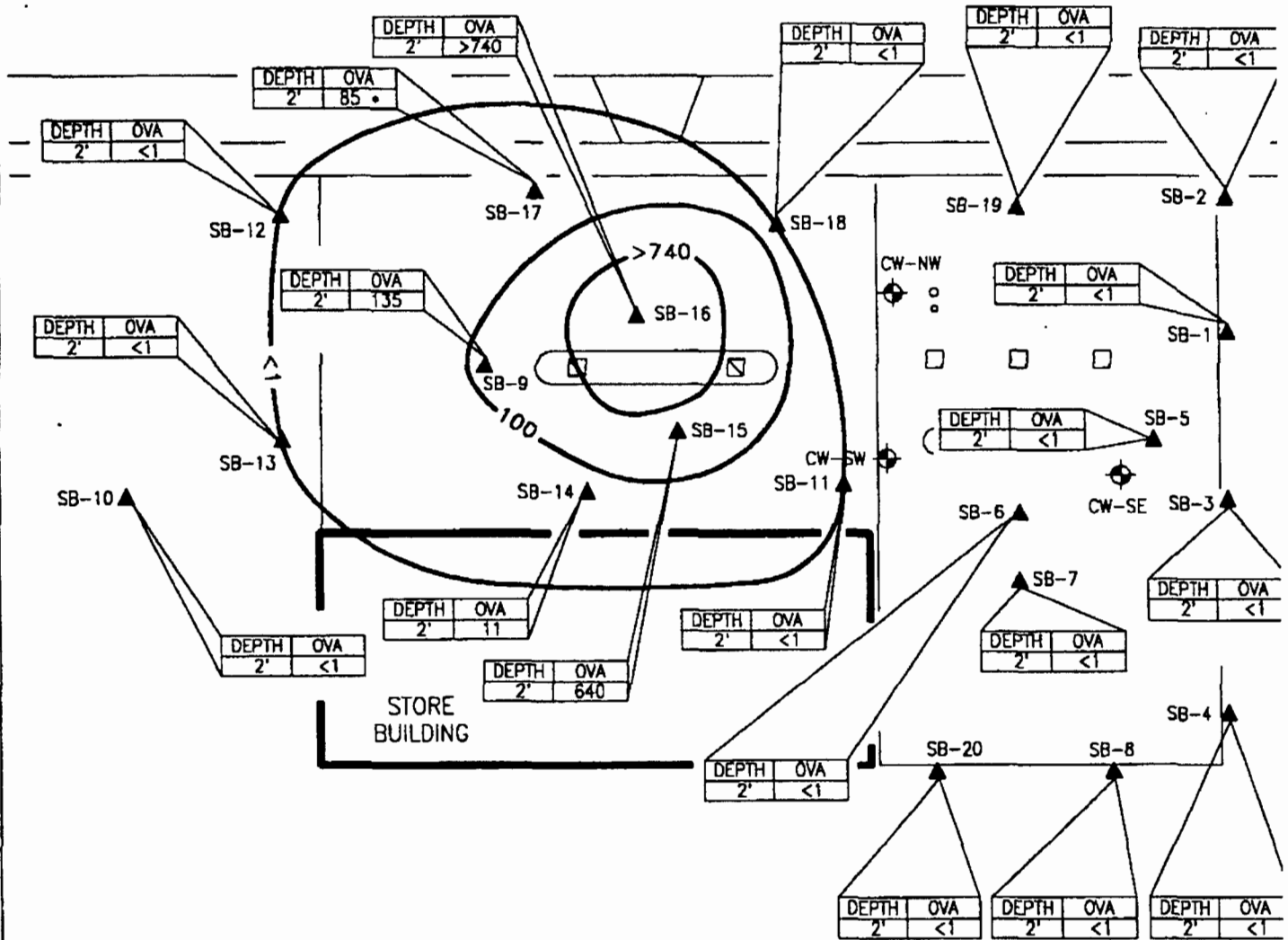
**JOB NUMBER:** ADE-Kwil

**FIGURE TITLE:** Geoprobe Boring Location / OVA Soil Screening Results @ 1'BLS (Sept. 6&7, 2000)

**FIGURE NUMBER:** 4a

**NORTH**

N.W. HWY 19



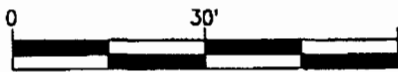
**LEGEND**

- ▲ SOIL BORING
- ◆ MONITORING WELL

— 200 — OVA CONTOUR (ppm)

OVA RESULTS IN PARTS PER MILLINO (ppm)  
 • DENOTES LAB SAMPLE TAKEN

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
 118 NORTH WEST HWY 19  
 CRYSTAL RIVER, FL

DRAWN BY:

V. Snyder

DATE DRAWN:

10/27/00

JOB NUMBER:

ADE-Kwik

**TERRA TECH ENTERPRISES, INC.**  
 CONSULTING and TECHNOLOGIES

**NORTH**

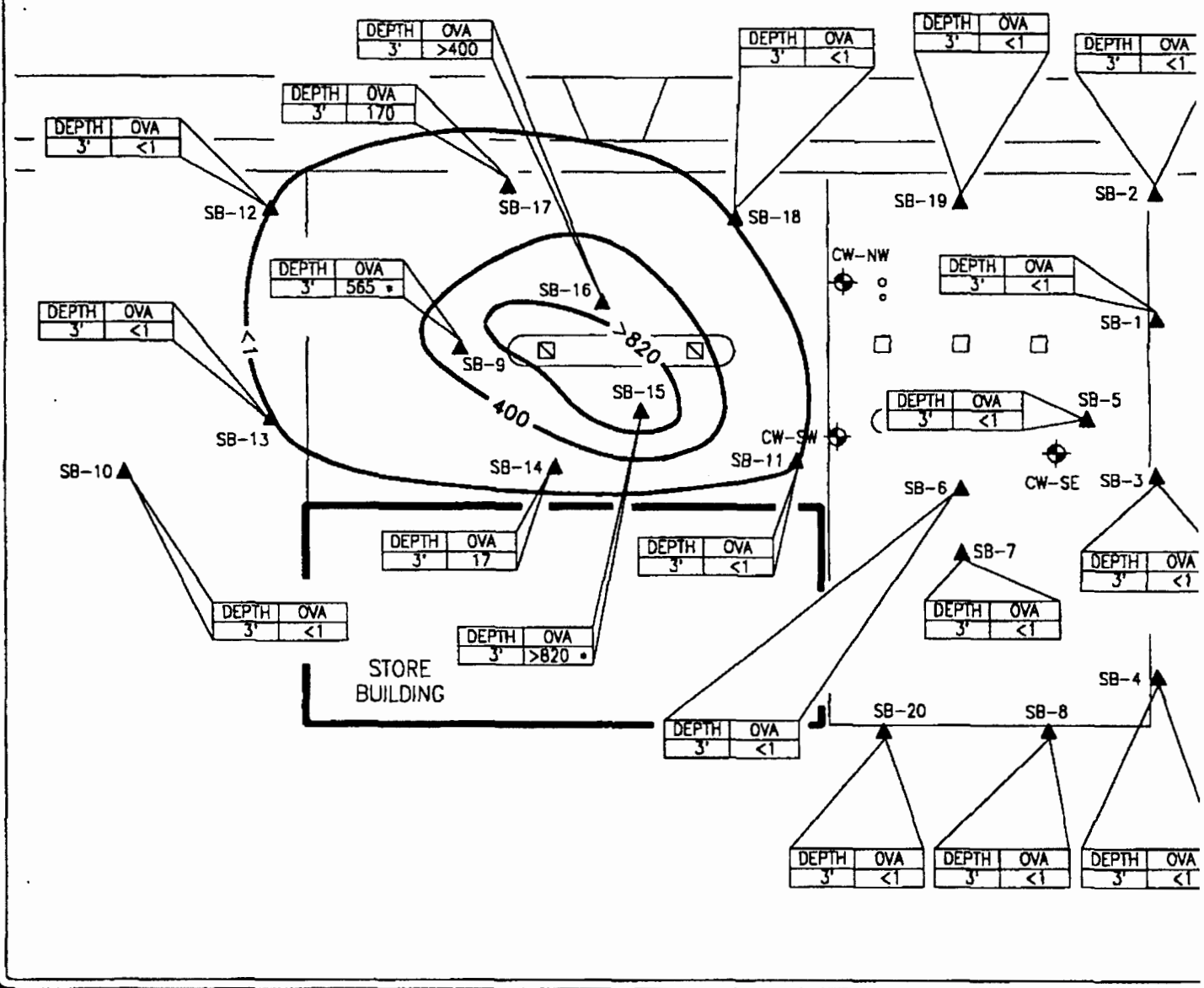
FIGURE TITLE:

Geoprobe Boring Location / OVA Soil Screening Results @ 2' BLS (Sept. 6&7, 2000)

FIGURE NUMBER:

4b

N.W. HWY 19



**LEGEND**

- ▲ SOIL BORING
- ⊕ MONITORING WELL
- 200 — OVA CONTOUR (ppm)

OVA RESULTS IN PARTS PER MILLINO (ppm)  
 • DENOTES LAB SAMPLE TAKEN

**SCALE:** 0 30'

**PREPARED FOR:** F. D. E. P.

**SITE ADDRESS:** CHEVRON KWIK STOP  
 118 NORTH WEST HWY 19  
 CRYSTAL RIVER, FL

**DRAWN BY:** V. Snyder

**DATE DRAWN:** 10/27/00

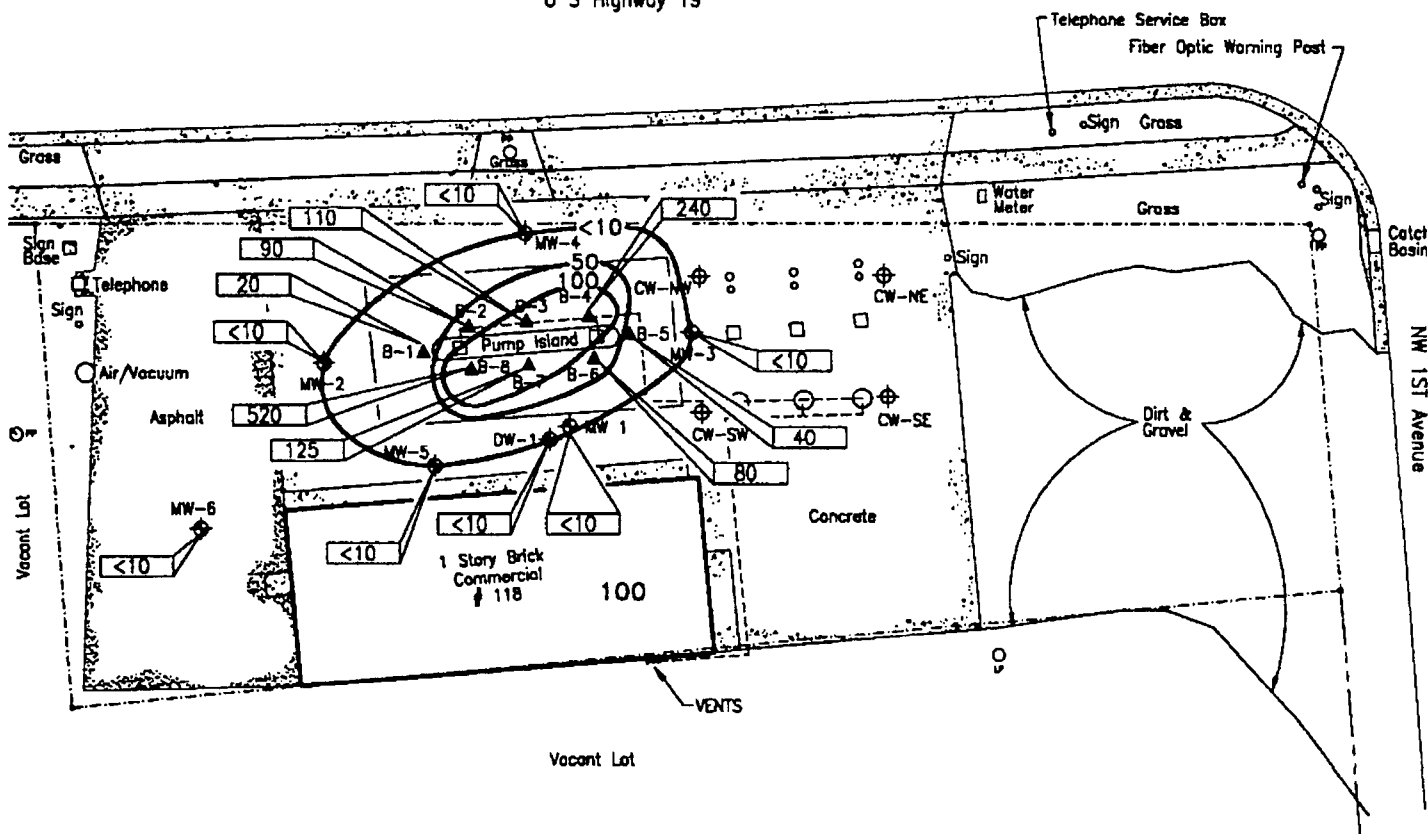
**JOB NUMBER:** ADE-Kwi

**FIGURE TITLE:** Geoprobe Boring Location / OVA Soil Screening Results @ 3'BLS (Sept. 6&7, 2000)

**FIGURE NUMBER:** 4c

**NORTH**

U S Highway 19



Adapted from Spectra Engineering & Research, Inc. PLS

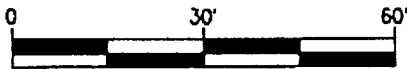
**LEGEND**

- ⊕ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

NOTE:  
ALL RESULTS REPORTED IN PARTS PER MILLINO (PPM)  
SAMPLE DATE JANUARY 23, 2001

—100—  
OVA CONTOUR PPM

SCALE:

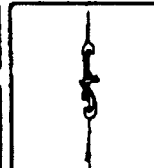


PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
118 NORTH HWY 19  
CRYSTAL RIVER, FL



**NORTH**

DRAWN BY:

V. Snyder

DATE DRAWN:

3/19/01

JOB NUMBER:

ADE-Kwik

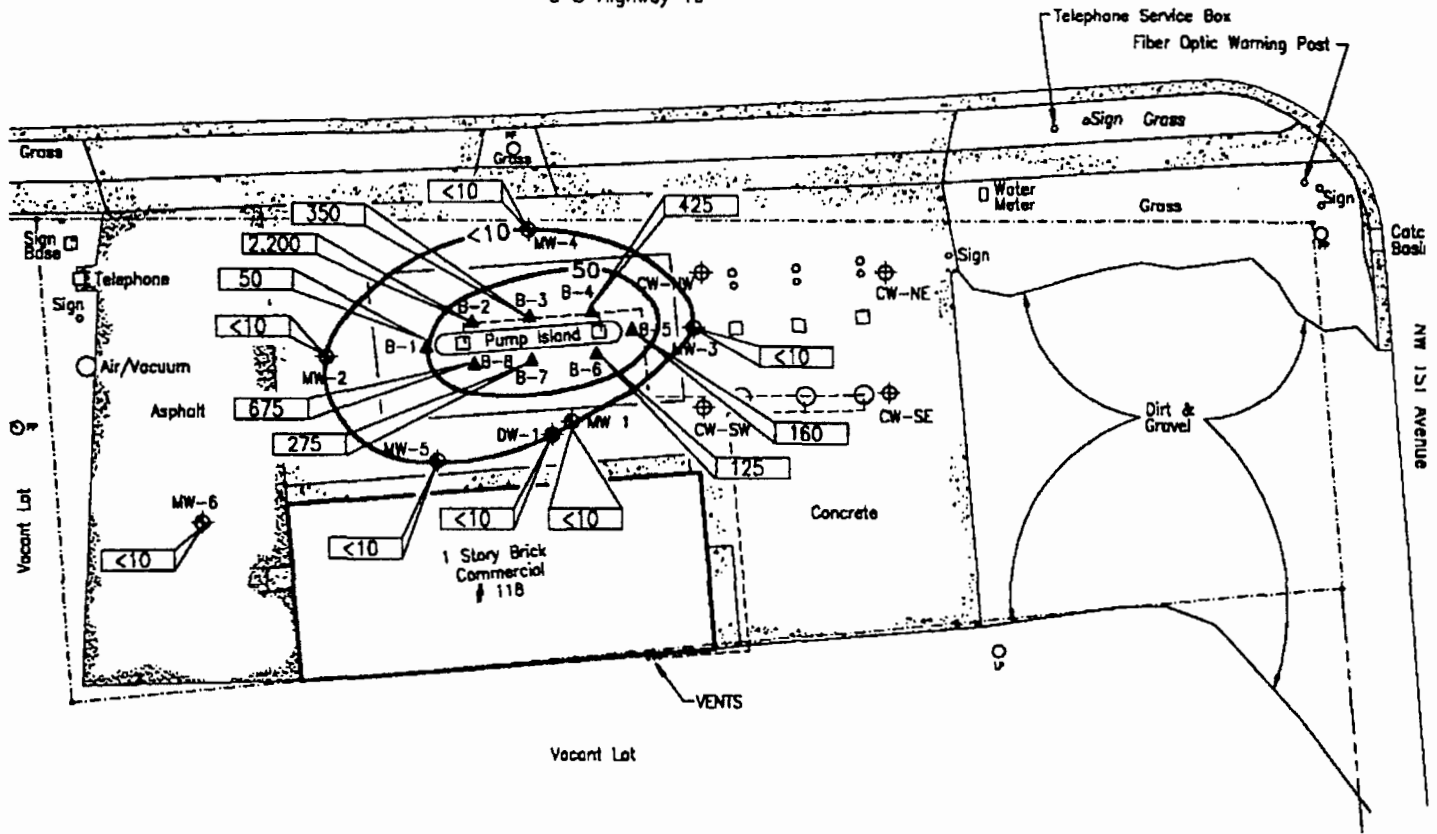
FIGURE TITLE:

SOIL BORING LOCATION / OVA SOIL SCREENING RESULTS @ 1' BLS

FIGURE NUMBER:

5a

U S Highway 19



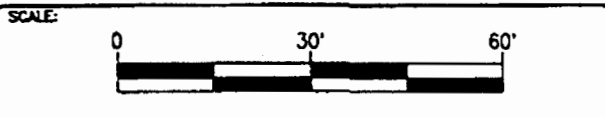
Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

NOTE:  
ALL RESULTS REPORTED IN PARTS PER MILLINO (PPM)  
SAMPLE DATE JANUARY 23, 2001

— 50 —  
OVA CONTOUR PPM



PREPARED FOR:  
F. D. E. P.



DRAWN BY:  
V. Snyder

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CONSULTING and TECHNOLOGIES

SITE ADDRESS:  
CHEVRON KWIK STOP  
118 NORTH HWY 19  
CRYSTAL RIVER, FL

DATE DRAWN:  
3/19/01

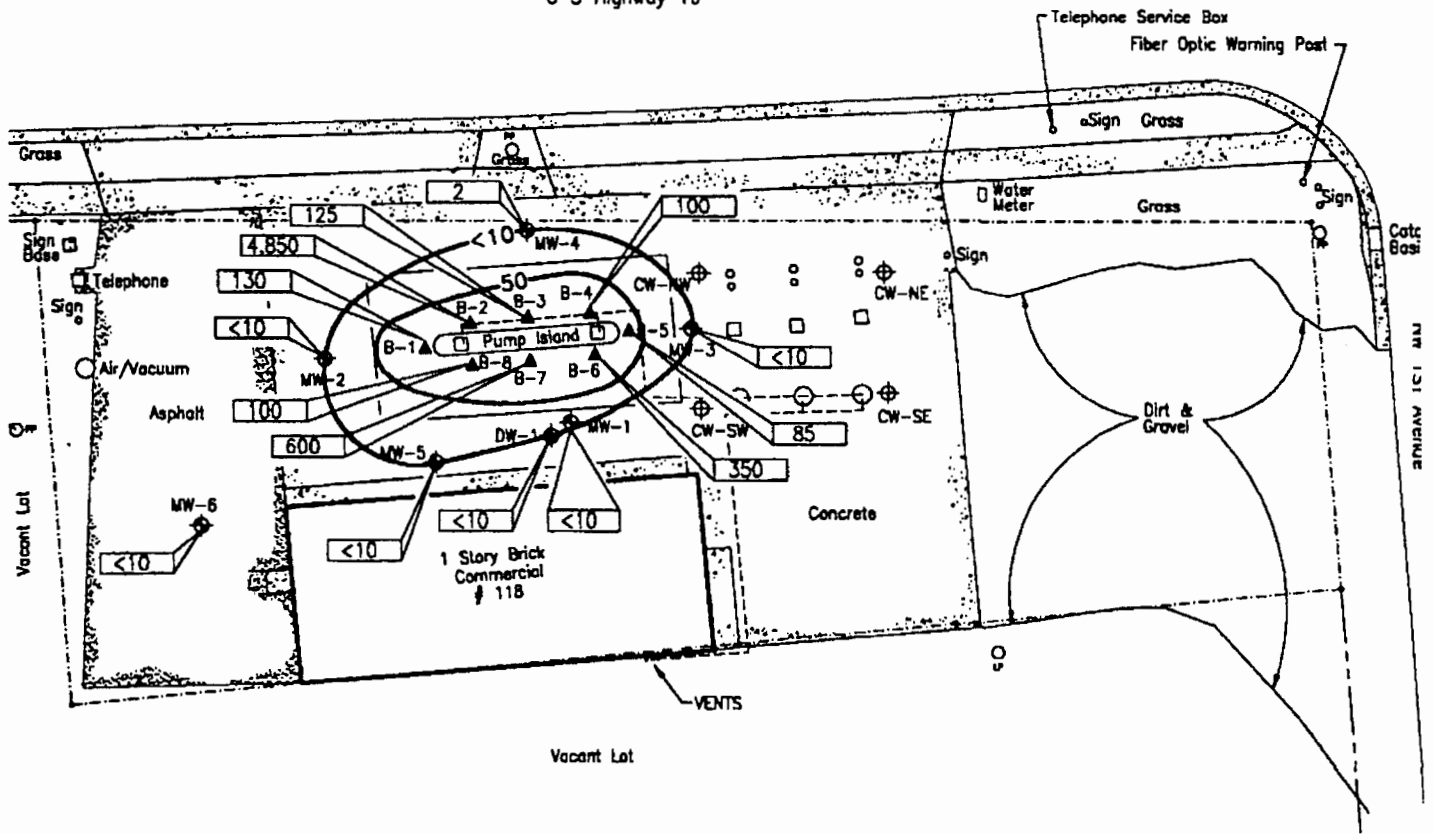
JOB NUMBER:  
ADE-Kwik

FIGURE TITLE: SOIL BORING LOCATION / OVA SOIL SCREENING RESULTS @ 2' BLS

FIGURE NUMBER:  
5b



U S Highway 19



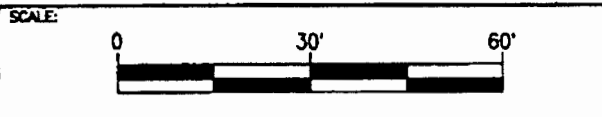
Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

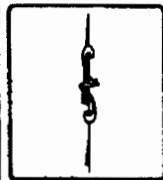
- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

NOTE:  
ALL RESULTS REPORTED IN PARTS PER MILLINO (PPM)  
SAMPLE DATE JANUARY 23, 2001

— 50 —  
OVA CONTOUR PPM



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V. Snyder

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118 NORTH HWY 19  
CRYSTAL RIVER, FL

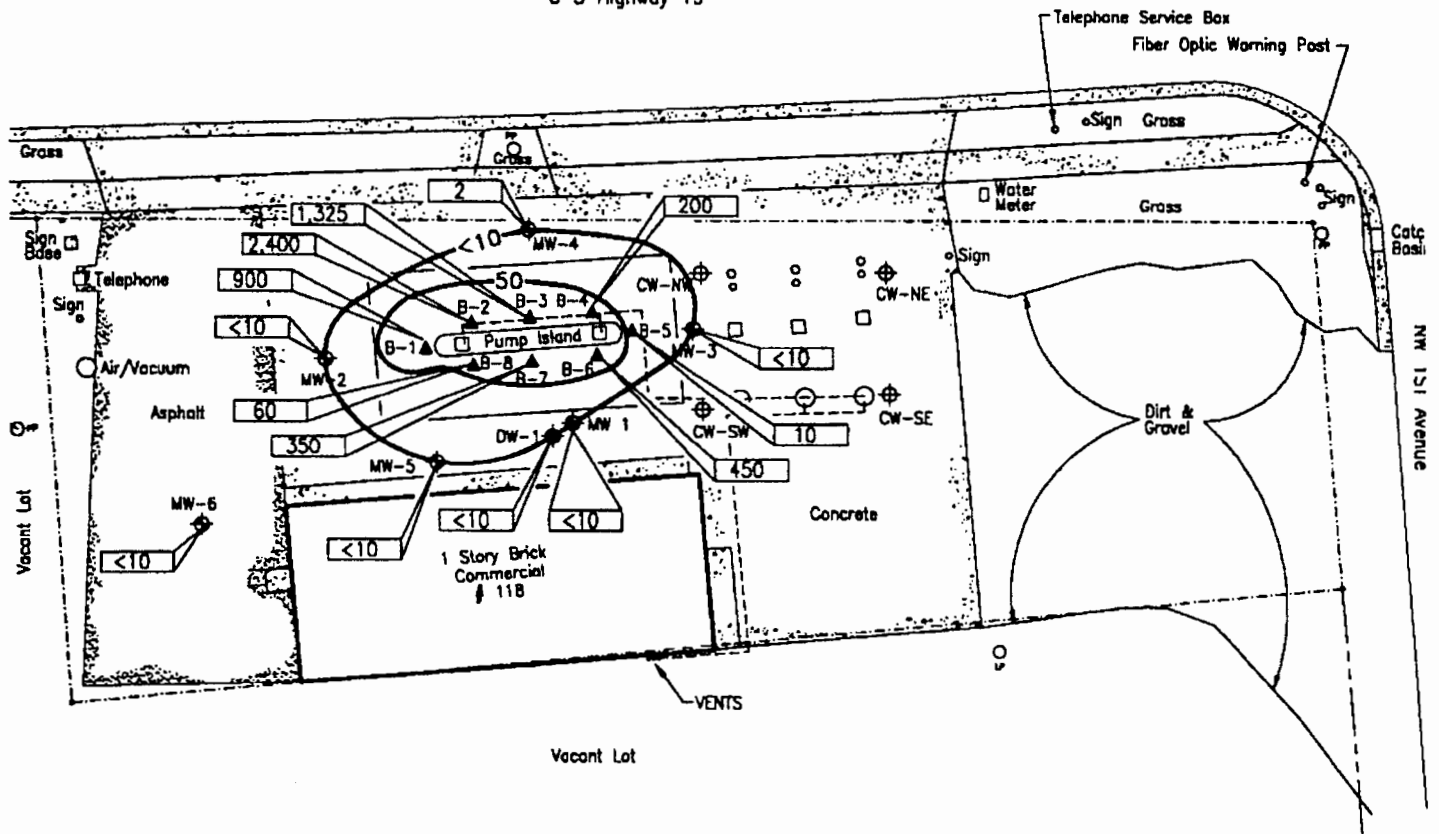
DATE DRAWN:  
3/19/01

JOB NUMBER:  
ADE-Kwik

FIGURE TITLE: SOIL BORING LOCATION / OVA SOIL SCREENING RESULTS @ 3' BLS

FIGURE NUMBER:  
5c

U S Highway 19



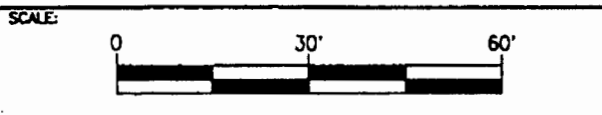
Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

- ⊕ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

NOTE:  
ALL RESULTS REPORTED IN PARTS PER MILLINO (PPM)  
SAMPLE DATE JANUARY 23, 2001

— 50 —  
OVA CONTOUR PPM



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F. D. E. P.



DRAWN BY:  
V. Snyder

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CHEVRON KWIK STOP  
118 NORTH HWY 19  
CRYSTAL RIVER, FL

**NORTH**

DATE DRAWN:  
3/19/01

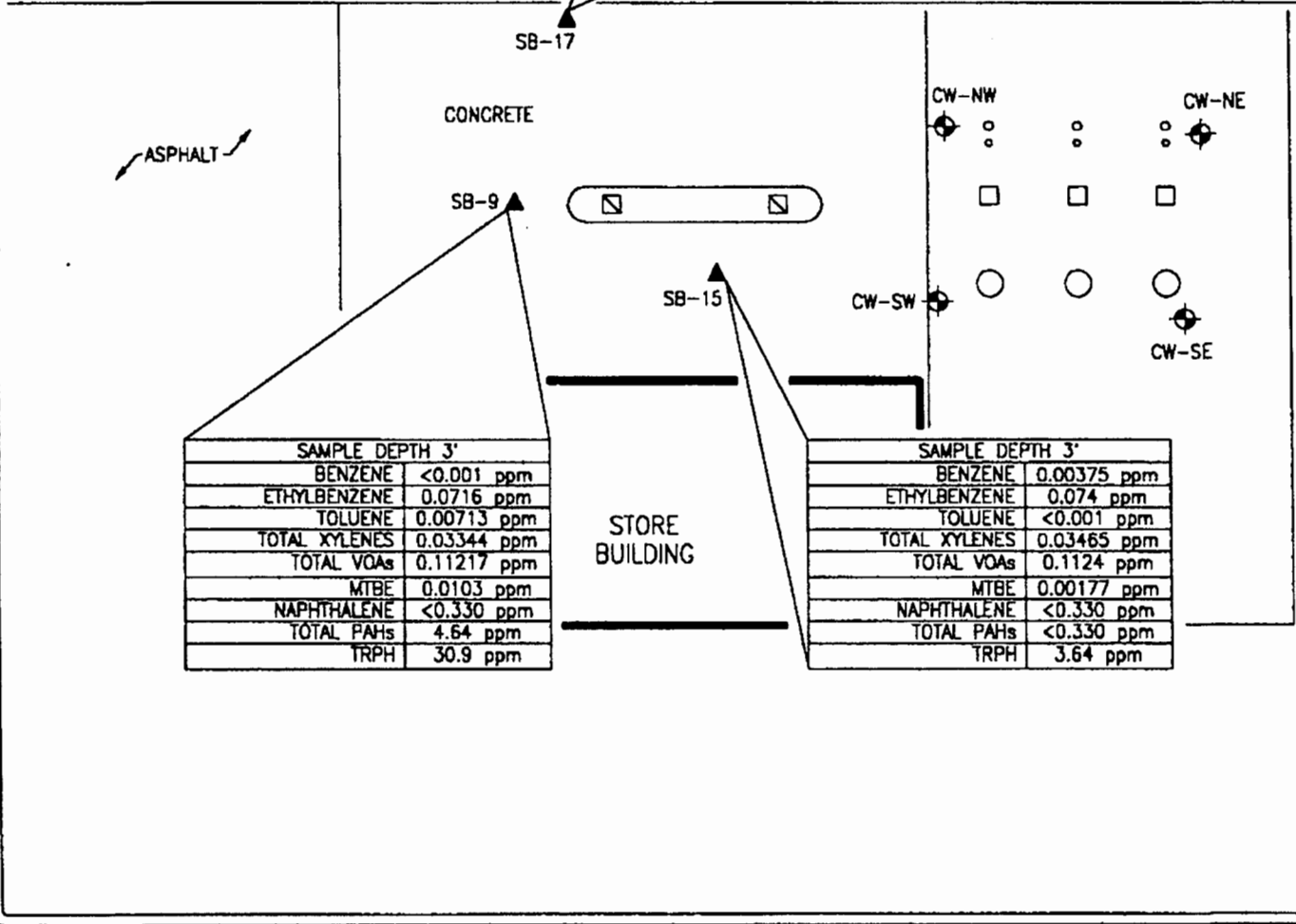
JOB NUMBER:  
ADE-Kwik

FIGURE TITLE:  
SOIL BORING LOCATION / OVA SOIL SCREENING RESULTS @ 4' BLS

FIGURE NUMBER:  
5d

ppm = mg/kg

SAMPLE DEPTH 2'	
BENZENE	<0.001 ppm
ETHYLBENZENE	0.0052 ppm
TOLUENE	0.00202 ppm
TOTAL XYLENES	0.01823 ppm
TOTAL VOAs	0.02545 ppm
MTBE	0.00116 ppm
NAPHTHALENE	<0.330 ppm
TOTAL PAHs	<0.330 ppm
TRPH	2.8



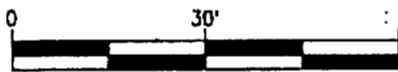
SAMPLE DEPTH 3'	
BENZENE	<0.001 ppm
ETHYLBENZENE	0.0716 ppm
TOLUENE	0.00713 ppm
TOTAL XYLENES	0.03344 ppm
TOTAL VOAs	0.11217 ppm
MTBE	0.0103 ppm
NAPHTHALENE	<0.330 ppm
TOTAL PAHs	4.64 ppm
TRPH	30.9 ppm

SAMPLE DEPTH 3'	
BENZENE	0.00375 ppm
ETHYLBENZENE	0.074 ppm
TOLUENE	<0.001 ppm
TOTAL XYLENES	0.03465 ppm
TOTAL VOAs	0.1124 ppm
MTBE	0.00177 ppm
NAPHTHALENE	<0.330 ppm
TOTAL PAHs	<0.330 ppm
TRPH	3.64 ppm

**LEGEND**

- ▲ SOIL BORING / SOIL SAMPLE LOCATION
- ⊕ MONITORING WELL
- ☐ DISPENSER
- FILL PORT
- SUBMERSIBLE PUMP

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
118 NORTH WEST HWY 19  
CRYSTAL RIVER, FL

DRAWN BY:

V. Snyder

DATE DRAWN:

10/7/00

JOB NUMBER:

ADE-Kwik

**NORTH**

FIGURE NUMBER:

6

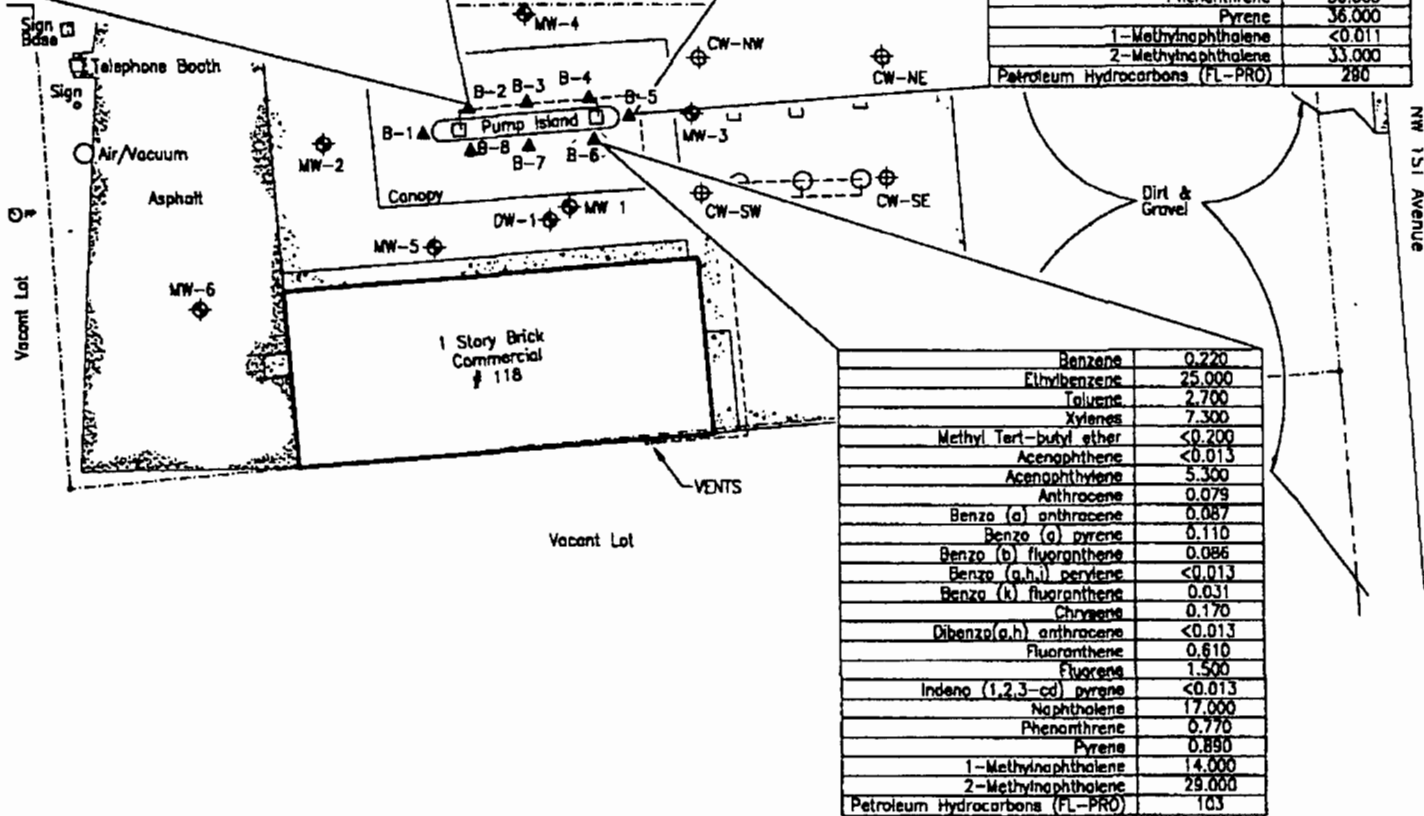
FIGURE TITLE:

SOIL SAMPLING ANALYTICAL RESULTS (September 6&7, 2000)

**TERRA TECH ENTERPRISES, INC.**  
CONSULTING and TECHNOLOGIES

Benzene	1.000
Ethylbenzene	91.000
Toluene	11.000
Xylenes	260.000
Methyl Tert-butyl ether	0.730
Acenaphthene	<0.011
Acenaphthylene	<0.011
Anthracene	0.400
Benzo (a) anthracene	0.320
Benzo (a) pyrene	0.400
Benzo (b) fluoranthene	0.370
Benzo (a,h,i) perylene	0.340
Benzo (k) fluoranthene	0.140
Chrysene	0.730
Dibenzo(a,h) anthracene	0.230
Fluoranthene	4.600
Fluorene	3.300
Indeno (1,2,3-cd) pyrene	0.140
Naphthalene	57.000
Phenanthrene	2.800
Pyrene	5.200
1-Methylnaphthalene	37.000
2-Methylnaphthalene	110.000
Petroleum Hydrocarbons (FL-PRO)	480

Benzene	0.063
Ethylbenzene	2.200
Toluene	<0.310
Xylenes	1.800
Methyl Tert-butyl ether	<0.200
Acenaphthene	81.000
Acenaphthylene	<0.011
Anthracene	8.500
Benzo (a) anthracene	14.000
Benzo (a) pyrene	10.000
Benzo (b) fluoranthene	12.000
Benzo (a,h,i) perylene	5.100
Benzo (k) fluoranthene	9.000
Chrysene	14.000
Dibenzo(a,h) anthracene	0.670
Fluoranthene	54.000
Fluorene	<0.011
Indeno (1,2,3-cd) pyrene	3.700
Naphthalene	<0.011
Phenanthrene	30.000
Pyrene	36.000
1-Methylnaphthalene	<0.011
2-Methylnaphthalene	33.000
Petroleum Hydrocarbons (FL-PRO)	280



Benzene	0.220
Ethylbenzene	25.000
Toluene	2.700
Xylenes	7.300
Methyl Tert-butyl ether	<0.200
Acenaphthene	<0.013
Acenaphthylene	5.300
Anthracene	0.079
Benzo (a) anthracene	0.087
Benzo (a) pyrene	0.110
Benzo (b) fluoranthene	0.086
Benzo (a,h,i) perylene	<0.013
Benzo (k) fluoranthene	0.031
Chrysene	0.170
Dibenzo(a,h) anthracene	<0.013
Fluoranthene	0.610
Fluorene	1.500
Indeno (1,2,3-cd) pyrene	<0.013
Naphthalene	17.000
Phenanthrene	0.770
Pyrene	0.890
1-Methylnaphthalene	14.000
2-Methylnaphthalene	29.000
Petroleum Hydrocarbons (FL-PRO)	103

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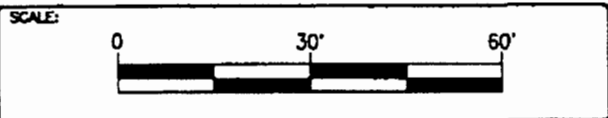
**LEGEND**

- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

NOTE:  
ALL RESULTS REPORTED IN mg/Kg

**SAMPLE DEPTH**

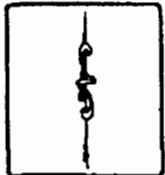
- B-2 @ 3'
- B-5 @ 4'
- B-6 @ 4'



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118 NORTH HWY 19  
CRYSTAL RIVER, FL



**NORTH**

DRAWN BY:  
V. Snyder

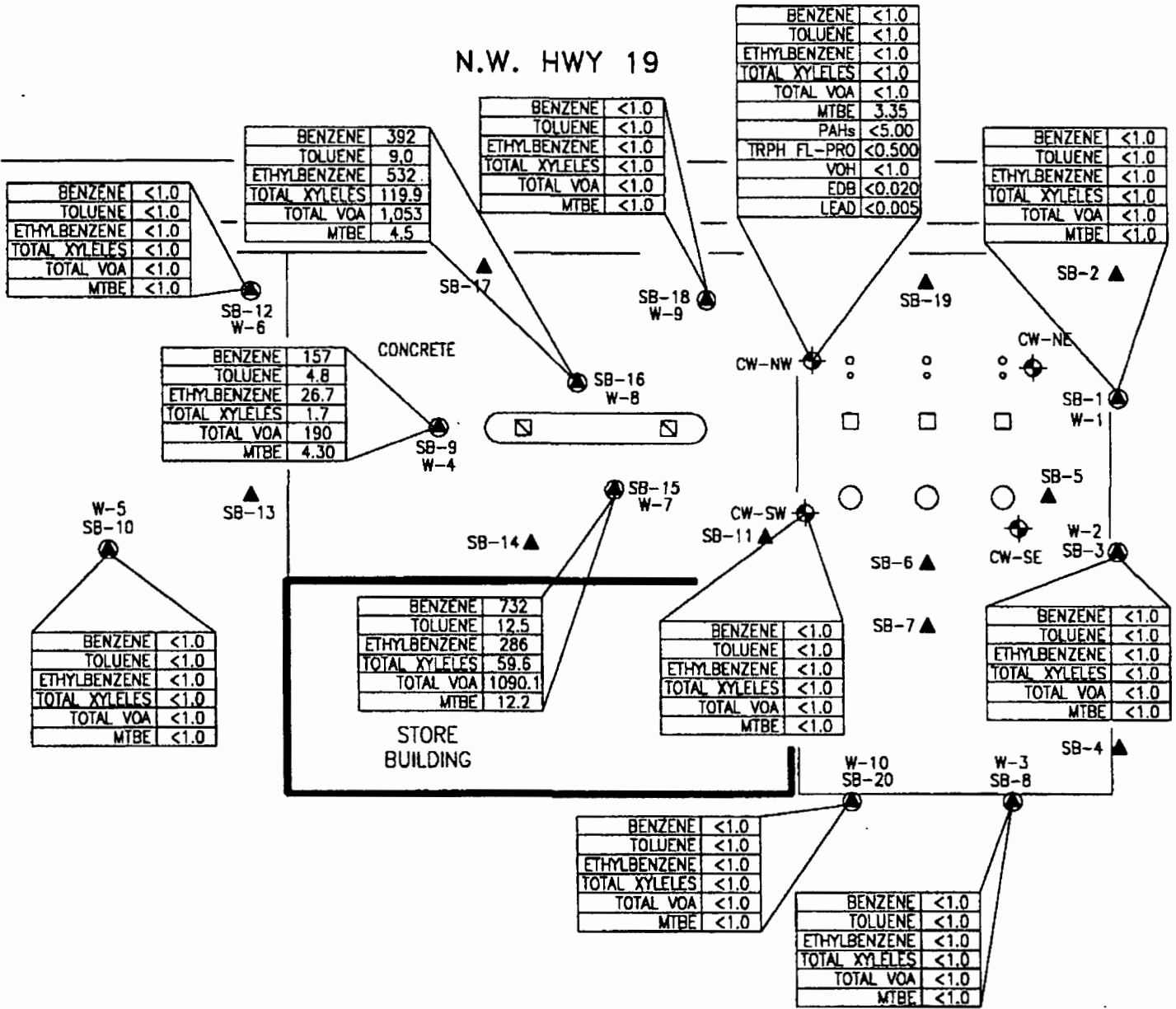
DATE DRAWN:  
3/19/01

JOB NUMBER:  
ADE-Kwik

FIGURE TITLE:  
**SOIL SAMPLING ANALYTICAL RESULTS (January 23, 2001)**

FIGURE NUMBER:  
7

N.W. HWY 19

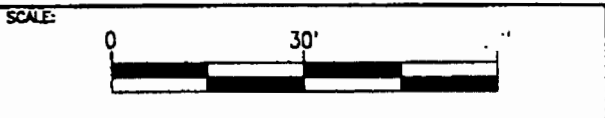


**LEGEND**

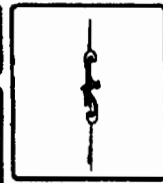
- ◆ MONITORING WELL
- ⊠ DISPENSER
- FILL PORT
- SUBMERSIBLE PUMP
- ▲ SOIL BORING
- ⊙ SOIL BORING / GROUNDWATER SAMPLE LOCATION

ALL RESULTS REPORTED IN ug/L  
EXCEPT LEAD & TRPH FL-PRO mg/L

W-1 TO W-5 SAMPLED ON 9/6/00  
W-6 TO W-10, CW-NW, SW,  
SAMPLED 9/7/00



PREPARED FOR:  
F. D. E. P.



DRAWN BY:  
V. Snyder

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118 NORTH WEST HWY 19  
CRYSTAL RIVER, FL

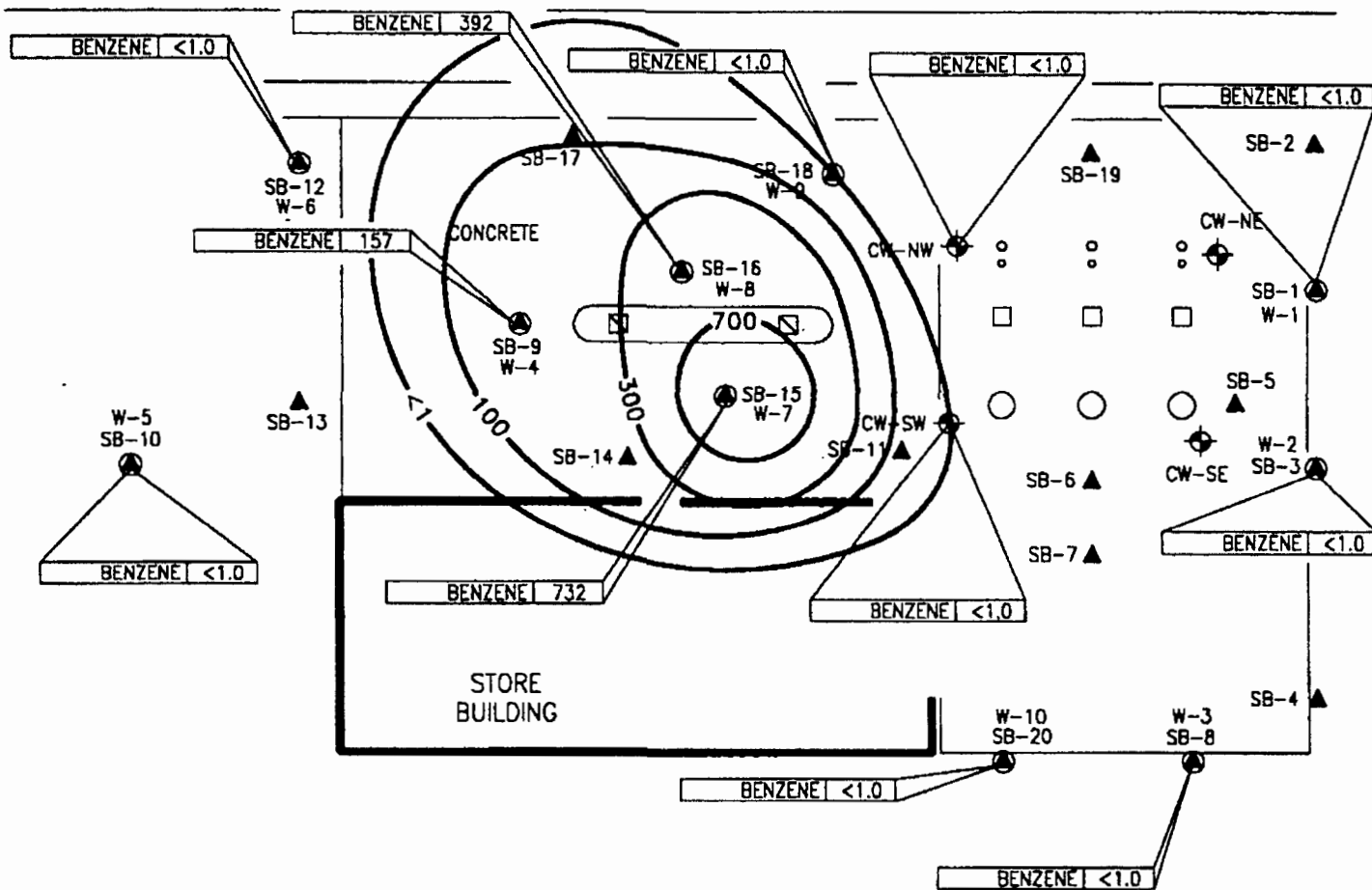
DATE DRAWN:  
10/7/00

JOB NUMBER:  
ADE-Kwik

FIGURE TITLE: **GROUNDWATER SAMPLING RESULTS (September 6&7, 2000)**

FIGURE NUMBER:  
8

N.W. HWY 19



**LEGEND**

◆ MONITORING WELL

▲ SOIL BORING

⊕ SOIL BORING / GROUNDWATER SAMPLE LOCATION

— 10 — BENZENE CONTOUR (ug/L)

ALL RESULTS REPORTED IN ug/L

W-1 TO W-5 SAMPLED ON 9/6/00  
W-6 TO W-10, CW-NW, SW,  
SAMPLED 9/7/00

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
118 NORTH WEST HWY 19  
CRYSTAL RIVER, FL

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V. Snyder

DATE DRAWN:

10/7/00

JOB NUMBER:

ADE-Kwik

FIGURE NUMBER:

8a

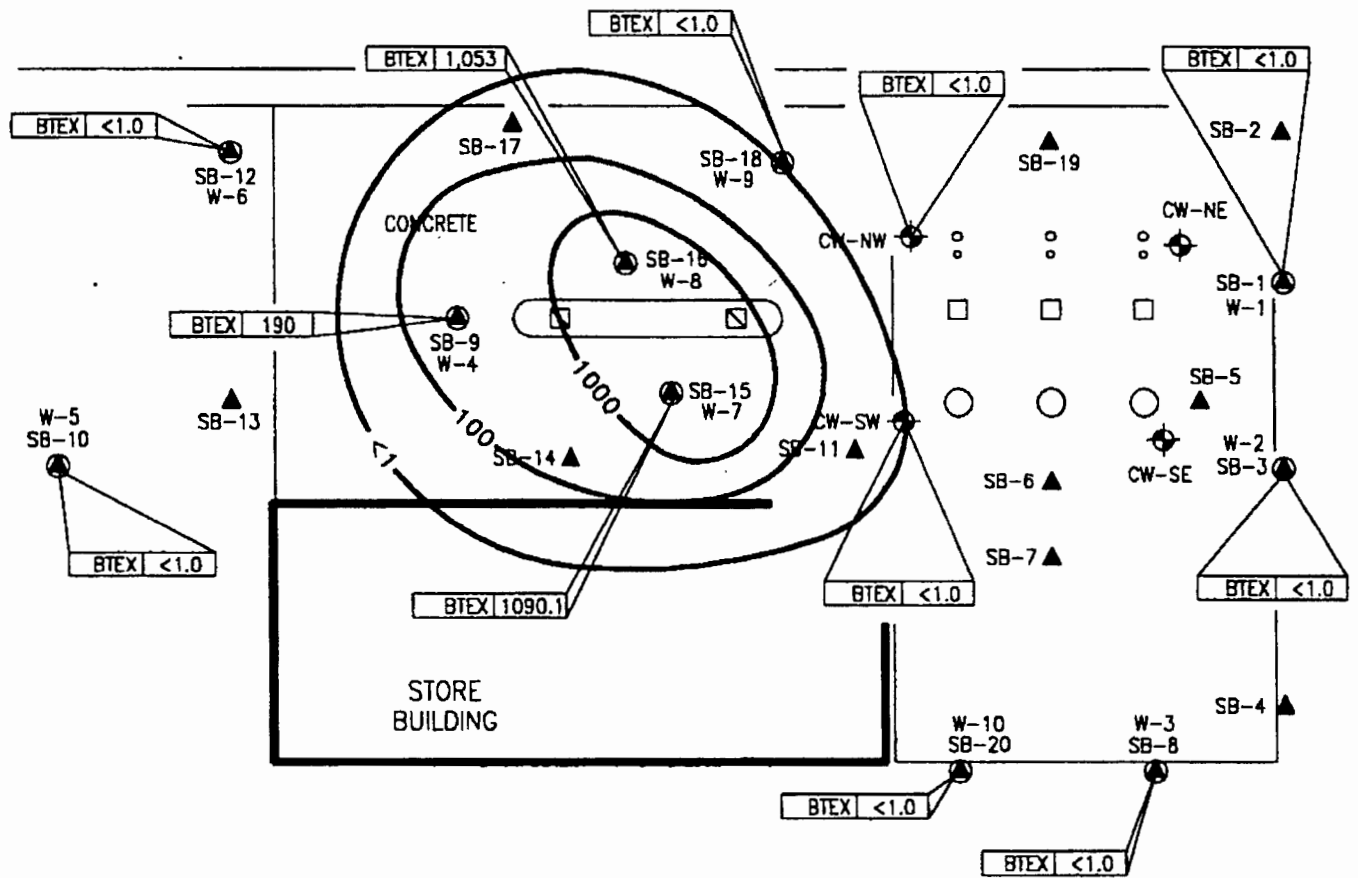
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NORTH

FIGURE TITLE:

BENZENE CONTOUR MAP (September 6 & 7 2000)

N.W. HWY 19



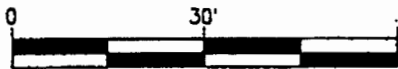
**LEGEND**

- ◆ MONITORING WELL
- ◻ DISPENSER
- FILL PORT
- SUBMERSIBLE PUMP
- ▲ SOIL BORING
- ⊙ SOIL BORING / GROUNDWATER SAMPLE LOCATION
- 10 — BTEX CONTOUR (ug/L)

ALL RESULTS REPORTED IN ug/L

W-1 TO W-5 SAMPLED ON 9/6/00  
 W-6 TO W-10, CW-NW, SW,  
 SAMPLED 9/7/00

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
 118 NORTH WEST HWY 19  
 CRYSTAL RIVER, FL



**NORTH**

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DATE DRAWN:

10/27/00

JOB NUMBER:

ADE-Kwik

FIGURE NUMBER:

8b

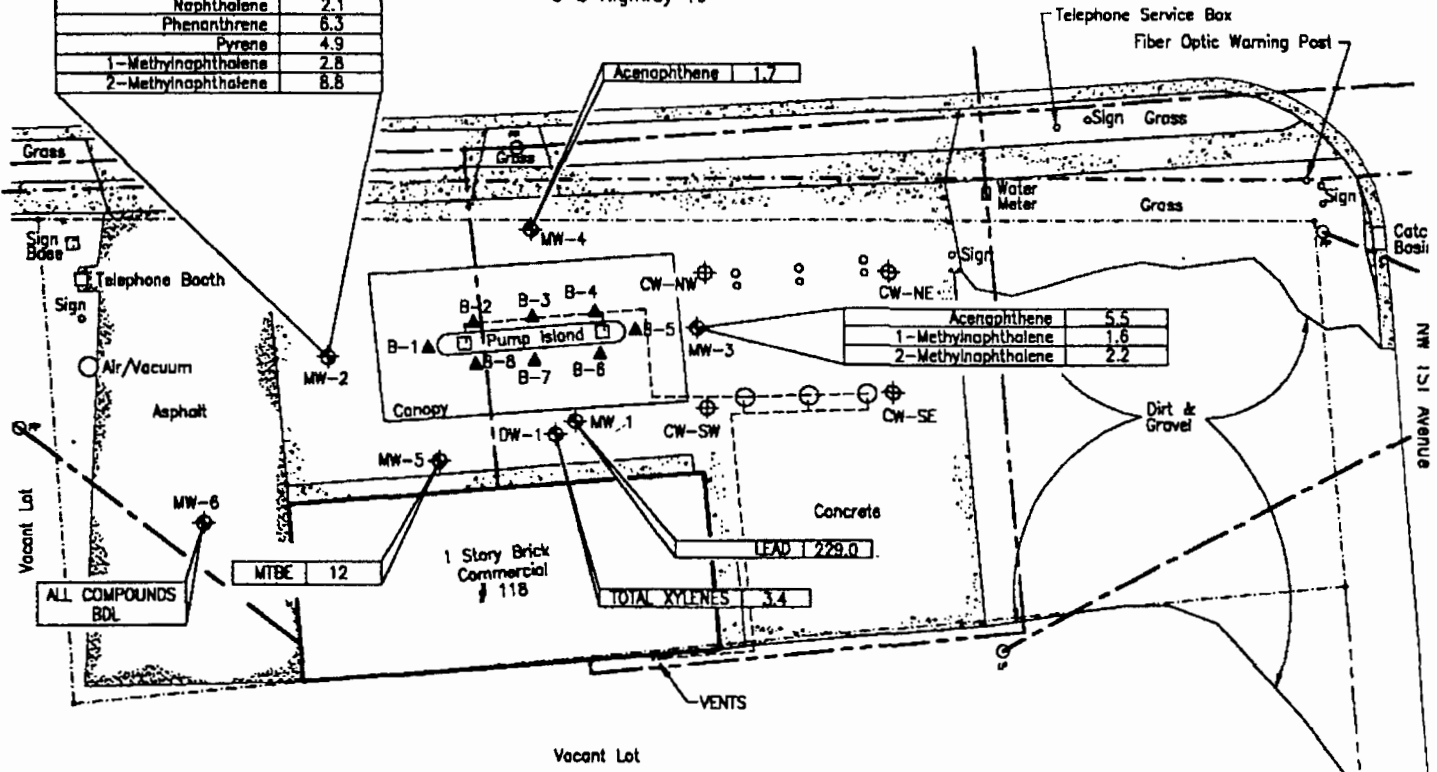
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FIGURE TITLE:

**BTEX CONTOUR MAP (September 6 & 7, 2000)**

Acenaphthene	11
Benzo (a) anthracene	1.2
Benzo (a) pyrene	1.0
Benzo (b) fluoranthene	1.3
Benzo (k) fluoranthene	0.76
Chrysene	1.3
Dibenzo(a,h) anthracene	0.69
Fluoranthene	7.1
Indeno (1,2,3-cd) pyrene	0.50
Naphthalene	2.1
Phenanthrene	6.3
Pyrene	4.9
1-Methylnaphthalene	2.8
2-Methylnaphthalene	8.8

U S Highway 19



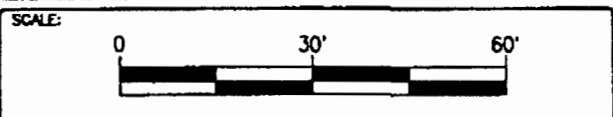
Acenaphthene	5.5
1-Methylnaphthalene	1.6
2-Methylnaphthalene	2.2

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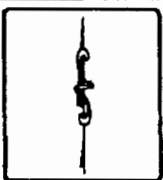
**LEGEND**

- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

NOTE:  
 MTBE - METHYL-TERT-BUTYL-ETHER  
 ALL RESULTS REPORTED IN ug/L



PREPARED FOR:  
 F. D. E. P.



DRAWN BY:  
 V. Snyder

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 118 NORTH HWY 19  
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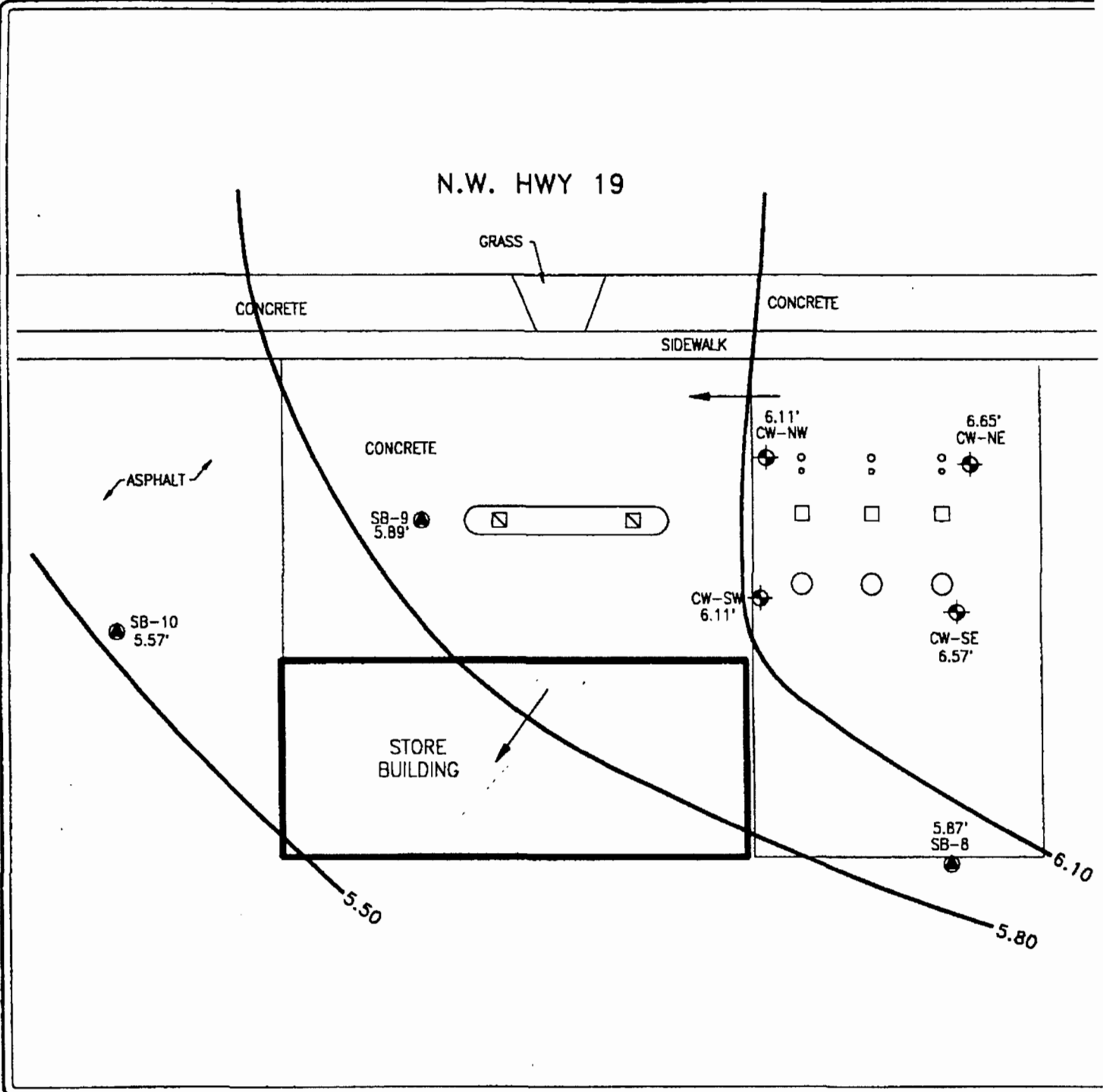
DATE DRAWN:  
 3/19/01

JOB NUMBER:  
 ADE-Kwik

FIGURE TITLE:  
**GROUNDWATER SAMPLING RESULTS, Detected Compounds (January 27, 2001)**

FIGURE NUMBER:  
 9



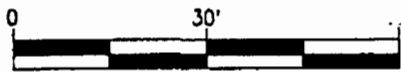


**LEGEND**

- SOIL BORING / PIEZOMETER
- ◆ MONITORING WELL
- DISPENSER
- FILL PORT
- SUBMERSIBLE PUMP

- GROUNDWATER FLOW DIRECTION
- 5.50— GROUNDWATER ELEVATION CONTOUR (ft.)

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

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118 NORTH WEST HWY 19  
CRYSTAL RIVER, FL

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V. Snyder

DATE DRAWN:

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JOB NUMBER:

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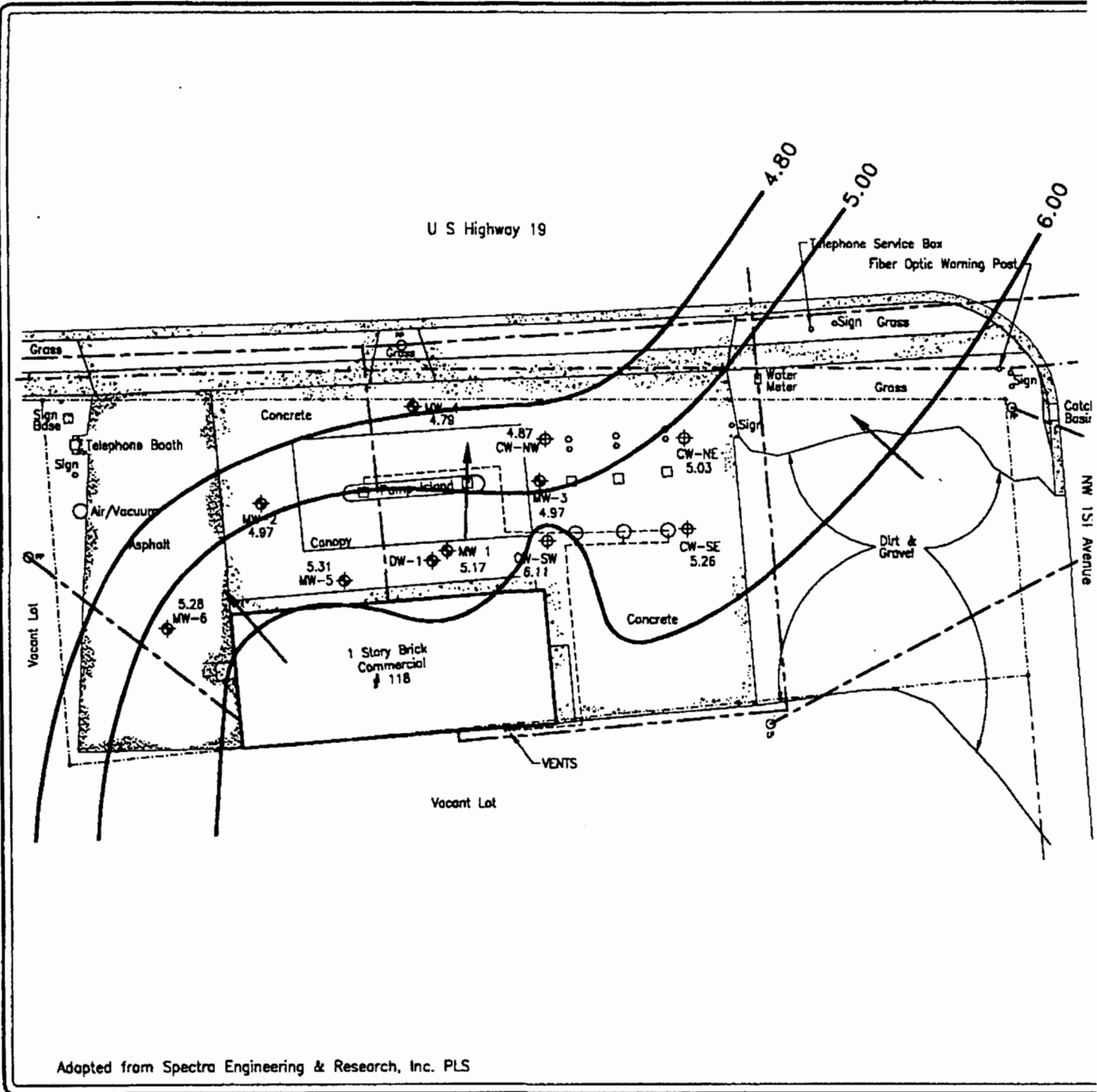
**NORTH**

FIGURE TITLE:

GROUNDWATER FLOW MAP (September 6, 2000)

FIGURE NUMBER:

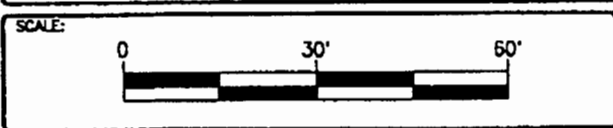
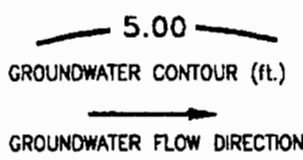
10



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**LEGEND**

- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING



PREPARED FOR:  
**F. D. E. P.**



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**V. Snyder**

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118 NORTH HWY 19  
CRYSTAL RIVER, FL**

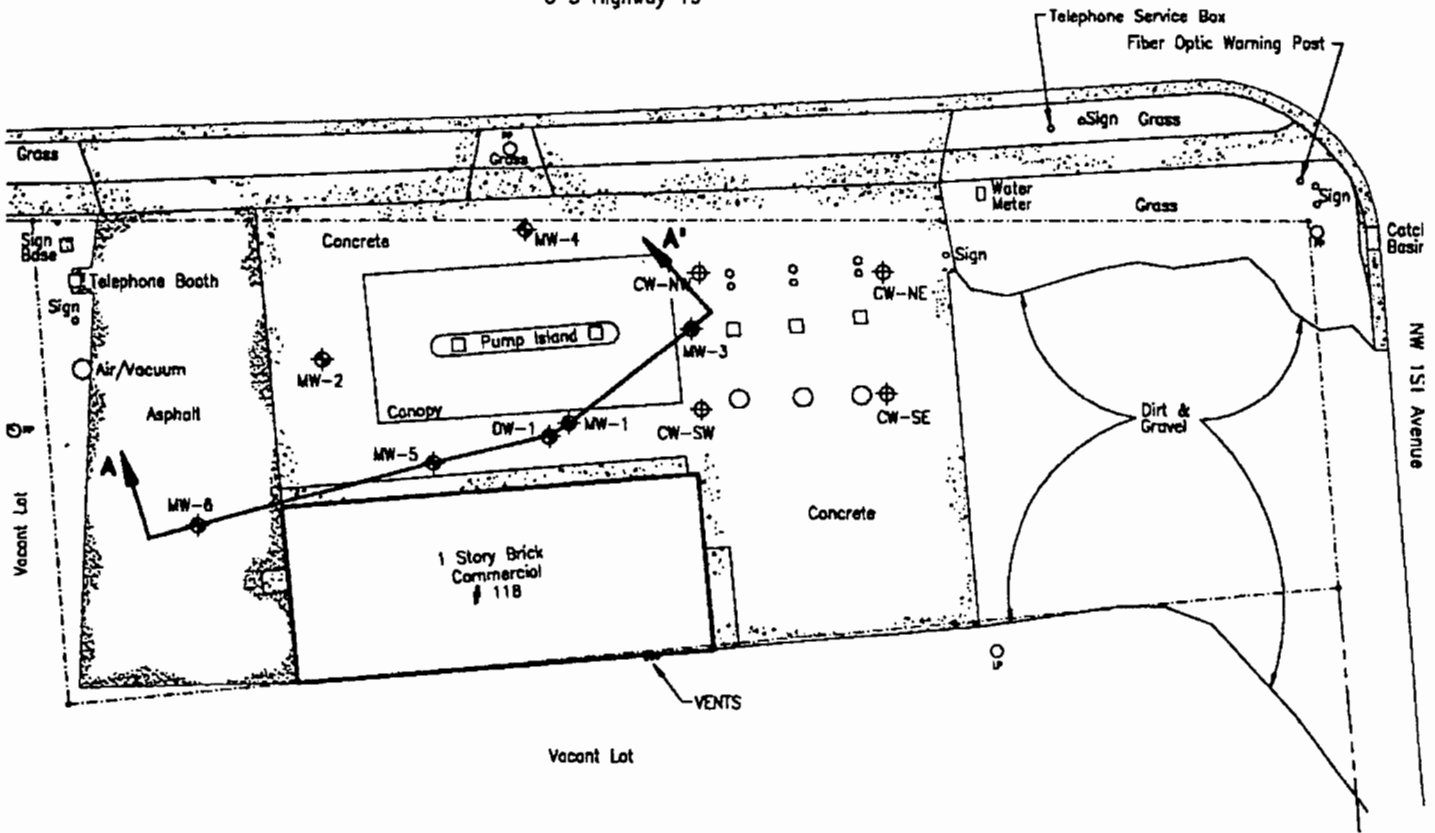
DATE DRAWN:  
**3/19/01**

JOB NUMBER:  
**ADE-Kwik**

FIGURE TITLE: **GROUNDWATER FLOW DIRECTION MAP (January 27, 2001)**

FIGURE NUMBER:  
**11**

U S Highway 19



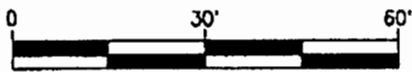
Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

- ◆ MONITORING WELL
- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

A - A' LINE OF CROSS SECTION

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

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 118 NORTH HWY 19  
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V. Snyder

DATE DRAWN:

3/20/01

JOB NUMBER:

ADE-Kwik

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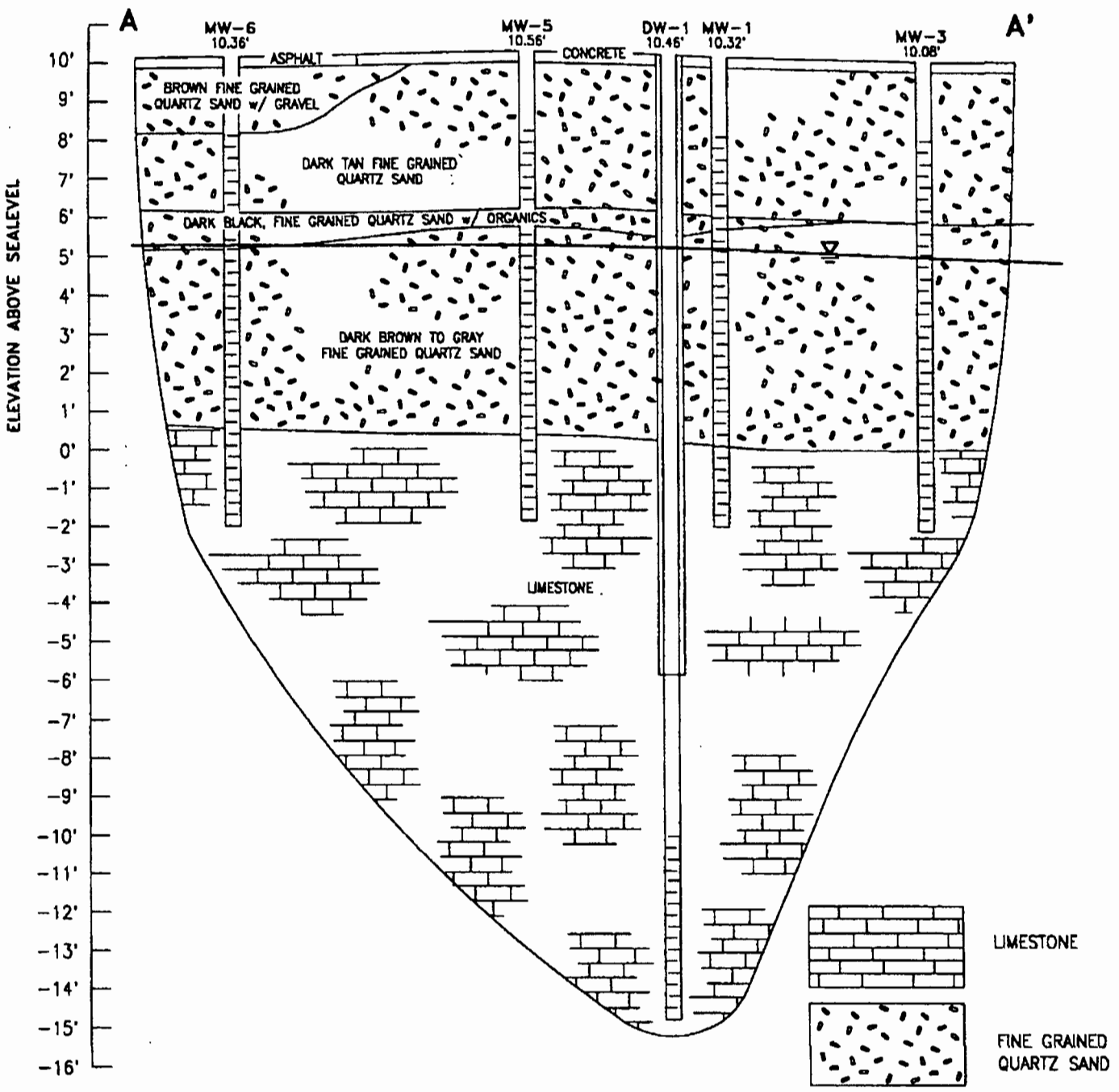
**NORTH**

FIGURE TITLE:

**GEOLOGIC CROSS SECTION**

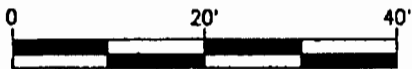
FIGURE NUMBER:

12



**LEGEND**

SCALE:



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DATE DRAWN:

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**NORTH**

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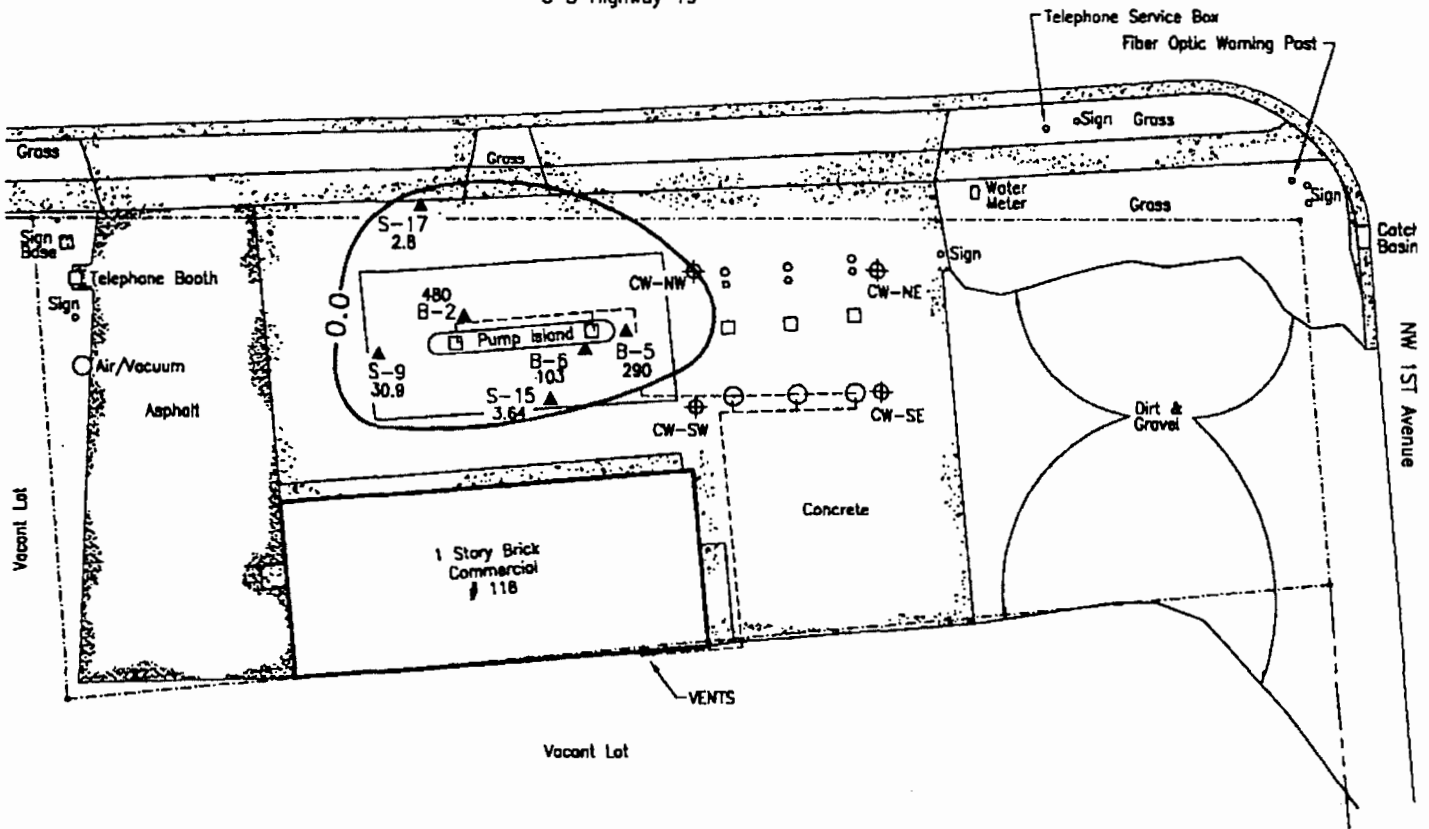
FIGURE TITLE:

**GEOLOGIC CROSS SECTION A - A'**

FIGURE NUMBER:

13

U S Highway 19



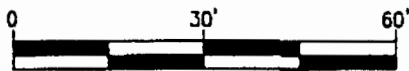
Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

- ⊕ COMPLIANCE WELL
- ▲ SOIL BORING

— 0.0 — TPH CONTOUR  
 103 TPH IN mg/Kg

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
 118 NORTH HWY 19  
 CRYSTAL RIVER, FL

DRAWN BY:

V. Snyder

DATE DRAWN:

8/21/01

JOB NUMBER:

ADE-Kwik

**TERRA TECH ENTERPRISES, INC.**  
 CONSULTING and TECHNOLOGIES

**NORTH**

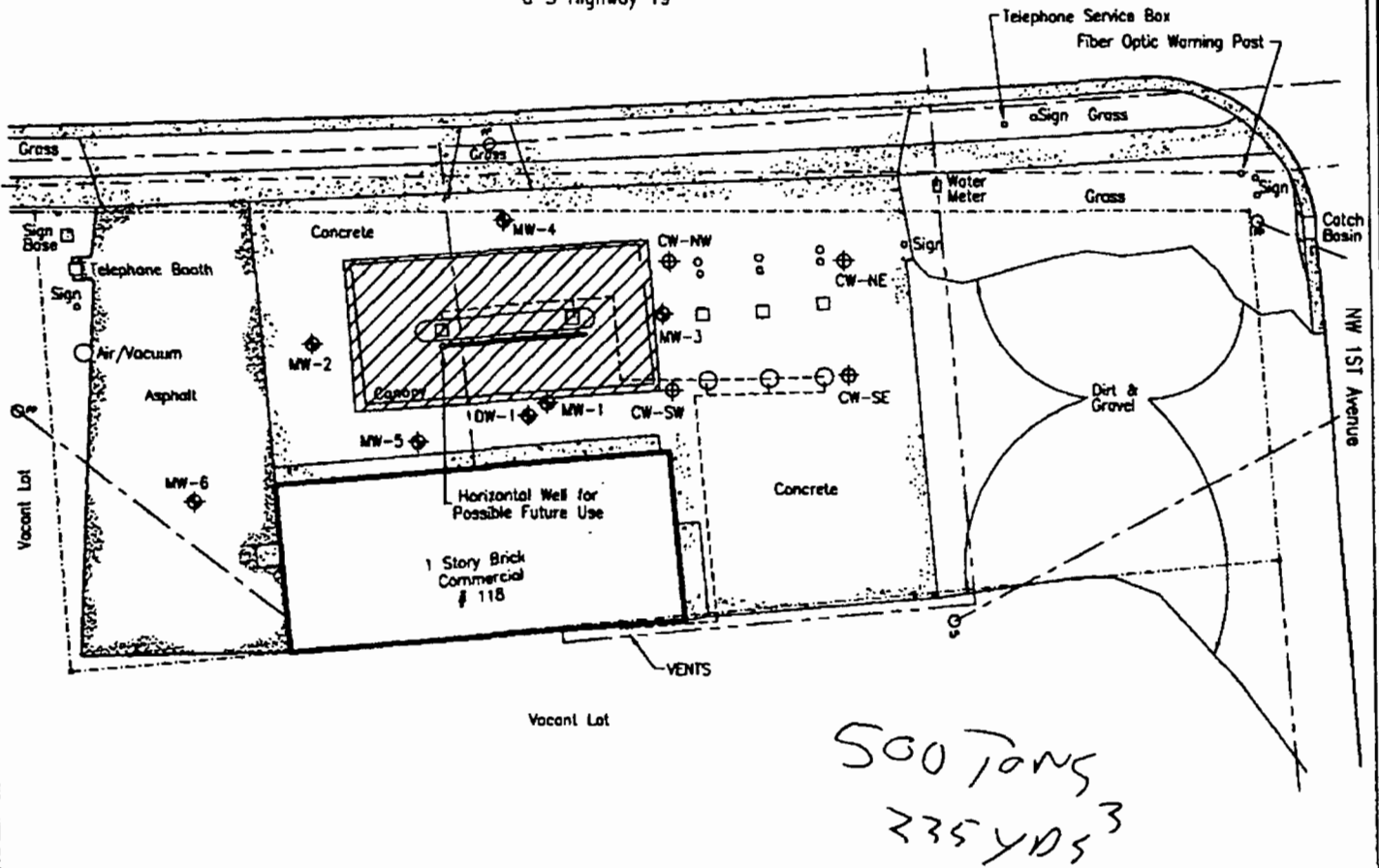
FIGURE TITLE:

TPH Concentration Map Utilized for Contaminant Mass Calculations

FIGURE NUMBER:

14

U S Highway 19



Adapted from Spectra Engineering & Research, Inc. PLS

**LEGEND**

◆ MONITORING WELL

⊕ COMPLIANCE WELL

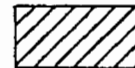
▲ SOIL BORING

----- ELECTRIC LINE

----- WATER LINE

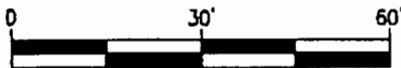
----- FIBEROPTIC LINE

----- PRODUCT / VENT LINES



EXCAVATION AREA  
SURFACE TO 6'-7' 1/2"

SCALE:



PREPARED FOR:

F. D. E. P.

SITE ADDRESS:

CHEVRON KWIK STOP  
118 NORTH HWY 19  
CRYSTAL RIVER, FL



**NORTH**

DRAWN BY:

V. Snyder

DATE DRAWN:

11/28/01

JOB NUMBER:

ADE-Kwik

**TERRA TECH ENTERPRISES, INC.**  
CONSULTING and TECHNOLOGIES

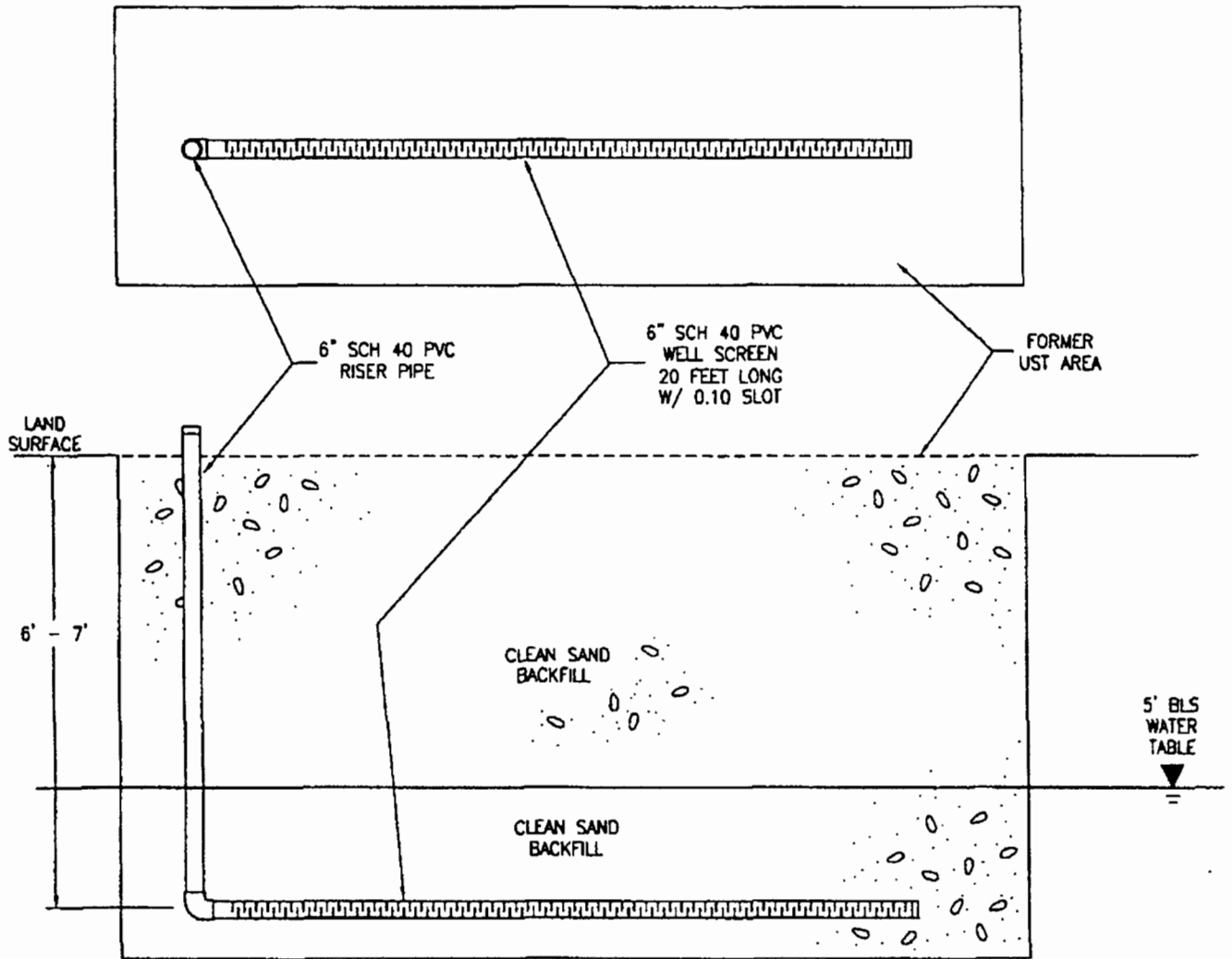
FIGURE TITLE:

**PROPOSED EXCAVATION AREA**

FIGURE NUMBER:

15

PLAN VIEW



SIDE VIEW

LEGEND

SCALE:

NOT TO SCALE

PREPARED FOR:

F. D. E. P.

DRAWN BY:

V. Snyder

SITE ADDRESS:

CHEVRON KWIK STOP  
118 NORTH HWY 19  
CRYSTAL RIVER, FLORIDA

DATE DRAWN:

11/28/01

JOB NUMBER:

ADE-Kwik

NORTH

FIGURE TITLE:

HORIZONTAL WELL DETAILS

FIGURE NUMBER:

16

TERRA TECH ENTERPRISES, INC.  
CONSULTING and TECHNOLOGIES





**TABLES 1 - 4**

TABLE 1: SOIL SCREENING SUMMARY

Facility Name: CHEVRON KWIK STOP

Facility ID# 098503048

SAMPLE				OVA SCREENING RESULTS			COMMENTS
BORING NO.	DATE COLLECTED	DEPTH TO WATER	SAMPLE INTERVAL (FBLs)	TOTAL READING (ppm)	CARBON FILTERED (ppm)	NET READING (ppm)	
SB-1	09/06/00	4'	1'	<1	<1	<1	
SB-1	09/06/00	4'	2'	<1	<1	<1	
SB-1	09/06/00	4'	3'	<1	<1	<1	
SB-2	09/06/00	4'	1'	<1	<1	<1	
SB-2	09/06/00	4'	2'	<1	<1	<1	
SB-2	09/06/00	4'	3'	<1	<1	<1	
SB-3	09/06/00	4'	1'	<1	<1	<1	
SB-3	09/06/00	4'	2'	<1	<1	<1	
SB-3	09/06/00	4'	3'	<1	<1	<1	
SB-4	09/06/00	4'	1'	<1	<1	<1	
SB-4	09/06/00	4'	2'	<1	<1	<1	
SB-4	09/06/00	4'	3'	<1	<1	<1	
SB-5	09/06/00	4'	1'	<1	<1	<1	
SB-5	09/06/00	4'	2'	<1	<1	<1	
SB-5	09/06/00	4'	3'	<1	<1	<1	
SB-6	09/06/00	4'	1'	<1	<1	<1	
SB-6	09/06/00	4'	2'	<1	<1	<1	
SB-6	09/06/00	4'	3'	<1	<1	<1	
SB-7	09/06/00	4'	1'	<1	<1	<1	
SB-7	09/06/00	4'	2'	<1	<1	<1	
SB-7	09/06/00	4'	3'	<1	<1	<1	
SB-8	09/06/00	4'	1'	<1	<1	<1	
SB-8	09/06/00	4'	2'	<1	<1	<1	
SB-8	09/06/00	4'	3'	<1	<1	<1	
SB-9	09/06/00	4'	1'	120	2	118	
SB-9	09/06/00	4'	2'	140	5	135	
SB-9	09/06/00	4'	3'	630	65	565	Lab sample (M)
SB-10	09/06/00	4'	1'	<1	<1	<1	
SB-10	09/06/00	4'	2'	<1	<1	<1	
SB-10	09/06/00	4'	3'	<1	<1	<1	
SB-11	09/06/00	4'	1'	<1	<1	<1	
SB-11	09/06/00	4'	2'	<1	<1	<1	
SB-11	09/06/00	4'	3'	<1	<1	<1	
SB-12	09/07/00	4'	1'	<1	<1	<1	
SB-12	09/07/00	4'	2'	<1	<1	<1	
SB-12	09/07/00	4'	3'	<1	<1	<1	
SB-13	09/07/00	4'	1'	<1	<1	<1	
SB-13	09/07/00	4'	2'	<1	<1	<1	
SB-13	09/07/00	4'	3'	<1	<1	<1	
SB-14	09/07/00	4'	1'	68	48	20	
SB-14	09/07/00	4'	2'	24	13	11	
SB-14	09/07/00	4'	3'	19	2	17	

**TABLE 1: SOIL SCREENING SUMMARY (Continued)**

Facility Name: CHEVRON KWIK STOP

Facility ID# 098503048

SAMPLE				OVA SCREENING RESULTS			
BORING NO.	DATE COLLECTED	DEPTH TO WATER	SAMPLE INTERVAL (FBLs)	TOTAL READING (ppm)	CARBON FILTERED (ppm)	NET READING (ppm)	COMMENTS
SB-15	09/07/00	4'	1'	70	20	50	
SB-15	09/07/00	4'	2'	940	300	640	
SB-15	09/07/00	4'	3'	>1000	180	>820	Lab sample (H)
SB-16	09/07/00	4'	1'	680	400	280	
SB-16	09/07/00	4'	2'	>1000	260	>740	
SB-16	09/07/00	4'	3'	>1000	600	>400	
SB-17	09/07/00	4'	1'	280	7	273	
SB-17	09/07/00	4'	2'	125	40	85	Lab sample (L)
SB-17	09/07/00	4'	3'	400	230	170	
SB-18	09/07/00	4'	1'	<1	<1	<1	
SB-18	09/07/00	4'	2'	<1	<1	<1	
SB-18	09/07/00	4'	3'	<1	<1	<1	
SB-19	09/07/00	4'	1'	<1	<1	<1	
SB-19	09/07/00	4'	2'	<1	<1	<1	
SB-19	09/07/00	4'	3'	<1	<1	<1	
SB-20	09/07/00	4'	1'	<1	<1	<1	
SB-20	09/07/00	4'	2'	<1	<1	<1	
SB-20	09/07/00	4'	3'	<1	<1	<1	
B-1	01/23/01	5'	1'	50	30	20	
B-1	01/23/01	5'	2'	90	40	50	
B-1	01/23/01	5'	3'	150	20	130	
B-1	01/23/01	5'	4'	1000	100	900	
B-2	01/23/01	5'	1'	110	20	90	
B-2	01/23/01	5'	2'	2300	100	2200	
B-2	01/23/01	5'	3'	5000	150	4850	Lab sample (H)
B-2	01/23/01	5'	4'	2500	100	2400	
B-3	01/23/01	5'	1'	140	30	110	
B-3	01/23/01	5'	2'	400	50	350	
B-3	01/23/01	5'	3'	300	175	125	
B-3	01/23/01	5'	4'	1500	175	1325	
B-4	01/23/01	5'	1'	280	40	240	
B-4	01/23/01	5'	2'	500	75	425	
B-4	01/23/01	5'	3'	150	50	100	
B-4	01/23/01	5'	4'	300	100	200	
B-5	01/23/01	5'	1'	80	40	40	
B-5	01/23/01	5'	2'	200	40	160	
B-5	01/23/01	5'	3'	125	40	85	
B-5	01/23/01	5'	4'	40	30	10	Lab sample (L)



TABLE 2: SOIL ANALYTICAL SUMMARY

Facility Name: CHEVRON KWIK STOP

Facility ID#: 098503048

Boring No.	Sample		Net OVA Reading (ppm)	Laboratory Analyses										Comments							
	Date Collected	Depth to Water (ft)		Sample Interval (ft)	Benzene (ppm)	Ethylbenzene (ppm)	Toluene (ppm)	Total Xylenes (ppm)	Total VOAs (ppm)	MTBE (ppm)	Naphthalenes (ppm)	Total PAHs (ppm)	TRPH (ppm)								
SB-15 (H)	9/7/00	4'	>820	0.00375	0.074	<0.001	0.03465	0.1124	0.00177	<0.330	<0.330	3.64	*Phenanthrene (1.19). Fluoranthene (0.81). Benzo(a)anthracene (0.42). Benzo(b)fluoranthene (0.55). Benzo(a)pyrene (0.39). Pyrene (0.89). Chrysene (0.39)								
SB-9 (M)	9/6/00	4'	565	<0.001	0.0716	0.00713	0.03344	0.11217	0.0103	<0.330	4.84*	30.9									
SB-17 (L)	9/7/00	4'	125	<0.001	0.0052	0.00202	0.01823	0.02545	0.00116	<0.330	<0.330	2.8	*Anthracene (0.4). Benzo (a) anthracene (0.32). Benzo (a) pyrene (0.4). Benzo (b) fluoranthene (.37). Benzo (g,h,i) perylene (0.34). Benzo (k) fluoranthene (0.14). Chrysene (0.73). Dibenzo (a,h) anthracene (0.23). Fluoranthene (4.6). Fluorene (3.3). Indeno (1.2.3-cd) pyrene (0.14). Phenanthrene (2.8). Pyrene (5.2)								
B-2 (H)	1/23/01	5'	4850	1	91	11	260	363	0.73	204	18.97*	480									
B-5 (L)	1/23/01	5'	10	0.063	2.2	<0.31	1.8	4.063	<0.2	33	277.97*	290	*Acenaphthene (81). Anthracene (8.5). Benzo (a) anthracene (14). Benzo (a) pyrene (10). Benzo (b) fluoranthene (12). Benzo (g,h,i) perylene (5.1). Benzo (k) fluoranthene (9). Chrysene (14). Dibenzo (a,h) anthracene (0.67). Fluoranthene (54). Indeno (1.2.3-cd) pyrene (3.7). Phenanthrene (30). Pyrene (36)								
B-6 (M)	1/23/01	5'	450	0.22	25	2.7	7.3	35.22*	<0.2	60	9.633*	103	*Acenaphthylene (5.3). Anthracene (0.079). Benzo (a) anthracene (0.087). Benzo (a) pyrene (0.11). Benzo (b) fluoranthene (.086). Benzo (k) fluoranthene (0.031). Chrysene (0.17). Fluoranthene (0.61). Fluorene (1.5). Phenanthrene (0.77). Pyrene (0.89)								
Methylenes												Sum of Methylenes	1	Methylenetetralene	2	Methylenetetralene	Sum of all other PAHs	Sum of all other PAHs	Sum of all other PAHs	Sum of all other PAHs	Sum of all other PAHs

# TABLE 3: GROUNDWATER ANALYTICAL SUMMARY

Below Detection Limits = BDL  
 Not Sampled = NS  
 Analytical Results = ug/L

Facility Name: CHEVRON KWIK STOP      Facility ID#: 98503048

Sample Location	Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Naphthalenes	TRPH FL-PRO(mg/L)	PAHs	EDB	Lead	VOHs
MW-1	1/27/01	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	229.0	BDL
MW-2	1/27/01	BDL	BDL	BDL	BDL	BDL	BDL	13.70	BDL	36.05			
MW-3	1/27/01	BDL	BDL	BDL	BDL	BDL	BDL	3.8	BDL	5.5			

### TABLE 3: GROUNDWATER ANALYTICAL SUMMARY

Below Detection Limits = BDL  
 Not Sampled = NS  
 Analytical Results = ug/L

Facility Name: CHEYRON KWIK STOP      Facility ID#: 98503048

Sample Location	Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Naphthalenes	TRPH FL-PRO(mg/L)	PAHs	EDB	Lead	VOHs
MW-4	1/27/01	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	1.7			
MW-5	1/27/01	BDL	BDL	BDL	BDL	BDL	12	BDL	BDL				
MW-5	1/27/01	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL				

### TABLE 3: GROUNDWATER ANALYTICAL SUMMARY

Below Detection Limits = BDL  
 Not Sampled = NS  
 Analytical Results = ug/L

Facility Name: CHEVRON KWK STOP      Facility ID#: 98503048

Sample Location	Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Naphthalenes	FL-PRO(mg/L)	TRPH	PAHs	EDB	Lead	VOHs
DW-1	1/27/01	BDL	BDL	BDL	3.4	3.4	BDL	BDL	BDL	BDL	BDL			



### TABLE 3: GROUNDWATER ANALYTICAL SUMMARY

Below Detection Limits = BDL  
 Not Sampled = NS  
 Analytical Results = ug/L

Facility Name: CHEYRON KWIK STOP Facility ID#: 98503048

Sample Location	Sample Date	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Total VOA	MTBE	Naphthalenes	TRPH FL-PRO(mg/L)	VOH	EDB	Lead
W-1	9/6/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
W-2	9/6/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
W-3	9/6/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
W-4	9/6/00	157	4.8	26.7	1.7	190	4.30					
W-5	9/6/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
W-6	9/7/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
W-7	9/7/00	732	12.5	286	59.6	1090.1	12.2					
W-8	9/7/00	392	9.0	532	119.9	1053	4.5					
W-9	9/7/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
W-10	9/7/00	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
CW-NW	9/7/00	BDL	BDL	BDL	BDL	BDL	3.35	BDL	BDL	BDL	BDL	BDL
CW-SW	9/7/00	BDL	BDL	BDL	BDL	BDL	BDL					

TABLE 4: GROUNDWATER ELEVATION TABLE

Facility Name: CHEVRON KWIK STOP

Facility ID#: 098503048

All Measurements - Feet  
No Data - Blank

\*ELEVATIONS CALCULATED WITH TTE TOC SURVEY

WELL NO. DIAMETER WELL DEPTH SCREEN INTERVAL TOC ELEVATION	CW-NE		CW-NW		CW-SE		CW-SW		MW-1		MW-2	
	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP	ELEV	DTW	FP
9/6/00	6.65*	3.61	0.00	6.11*	3.91	0.00	6.11*	3.89	0.00	5.17	5.15	4.97
1/27/01	5.03	5.06	0.00	4.87	5.24	0.00	6.11	4.94	0.00			5.29

TABLE 4: GROUNDWATER ELEVATION TABLE (Continued)

Facility Name: CHEVRON KWIK STOP

Facility ID#: 098603048

All Measurements - Feet  
No Data - Blank

WELL NO.	MW-3	MW-4	MW-5	MW-6	DW-1													
DIAMETER	2"	2"	2"	2"	2"													
WELL DEPTH	12'	12'	12'	12'	12'													
SCREEN INTERVAL	2-12'	2-12'	2-12'	2-12'	2-12'													
TOC ELEVATION	10.08	10.01	10.56	10.36	10.46													
DATE																		
1/27/01	ELEV 4.97	ELEV 4.79	ELEV 5.31	ELEV 5.28	ELEV 4.96	DTW 5.11	DTW 5.22	DTW 5.25	DTW 5.08	DTW 5.50	FP 0.00	FP 0.00	FP 0.00	FP 0.00	FP 0.00	DTW 5.50	ELEV 4.96	FP 0.00

**Site No. 86 Charlie's Fish House, Inc.**  
224 N. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. Nos. 098503046 and 099046097



Storage Tank Facility Compliance Inspection Report

Facility ID 8503046 County 09 CITRUS Inspection Date 10/10/00  
 Facility Name CHARLIES FISH HOUSE Facility Type V-MARINE  
 Latitude 28°53'56" Longitude 82°35'45" L/L Method AGPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection	# USTs Inspected	# ATSS Inspected	1
--	------------------	------------------	---

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description/ Inspector's Comments	Code
Comments	Release detection is a visual check of the tank, Containment wall, Dispenser lines, and above ground piping. Done monthly by employees. Conditions are noted on the inspection sheets. Containment wall has been coated. Drain valve has been kept closed. Piping is equipped with an IMS anti-siphon valve. Continue to try to keep leaves out of wall and dispenser lines.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.  
 Insurance Carrier: ACORD Effective Date: 8/30/99 Expiration Date: 12/30/00  
 Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_  
 None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement  
 A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS CNTY ENV HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. Mark Sumner</u> Inspector Name - Please Print	<u>CHARLES KOHNEHL</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>10/10/00</u> Inspector Signature & Date	<u>Charles Kohnehl</u> <u>10-10-00</u> Facility Representative Signature & Date

October 12, 2000

Mr. Kofmehl  
Charlie's Fish House  
P.O. Box 395  
Crystal River, FL 32623

RE: ID # 098503046  
Charlie's Fish House  
224 Hwy. 19 North  
Crystal River, FL 32623

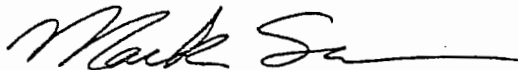
Dear Mr. Kofmehl:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Enclosed, please find a copy of the Storage Tank Facility Compliance Inspection Report for the inspection recently performed at the above named facility. Please refer to this report for comments regarding the inspection.

If there are any questions concerning this matter, you may contact the Storage Tank Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

Enclosure(s)

CMS/file

---

**CITRUS COUNTY DEPARTMENT OF HEALTH**

ENVIRONMENTAL HEALTH DIVISION  
STORAGE TANKS INSPECTION PROGRAM

3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316



This data is current as of: 04-OCT-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 8503046	District: SWD
Name: CHARLIES FISH HOUSE INC	County: Citrus
224 Hwy 19 N	Type: Marine Fueling Facility/Coastal
Crystal River, FL 32629-4233	Status: Open
Contact: Brownlee Jackson	Latitude: 28:53:56.0000
Phone: 904-795-2468	Longitude: 82:35:45.0000
	LL Method: AGPS

} cms

**Account Owner Information**

Name: Whetstone Oil Co  
 Po Box 1257  
 Crystal River, FL 34423-1237  
 Phone: 352-795-3464

**Tank Owner Information**

Name: Whetstone Oil Co  
 Po Box 1257  
 Crystal River, FL 34423-1237  
 Phone: 352-795-3464

**Tank # Size Content Installed Placement Status Const Pipe Monitor**

2	2000	Vehicular Diesel	02/01/1990	ABOVE	U	C	B	4
						K	D	Q
							A	
							I	
							K	
1	1000	Leaded Gas		UNDER	A			

} cms

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!

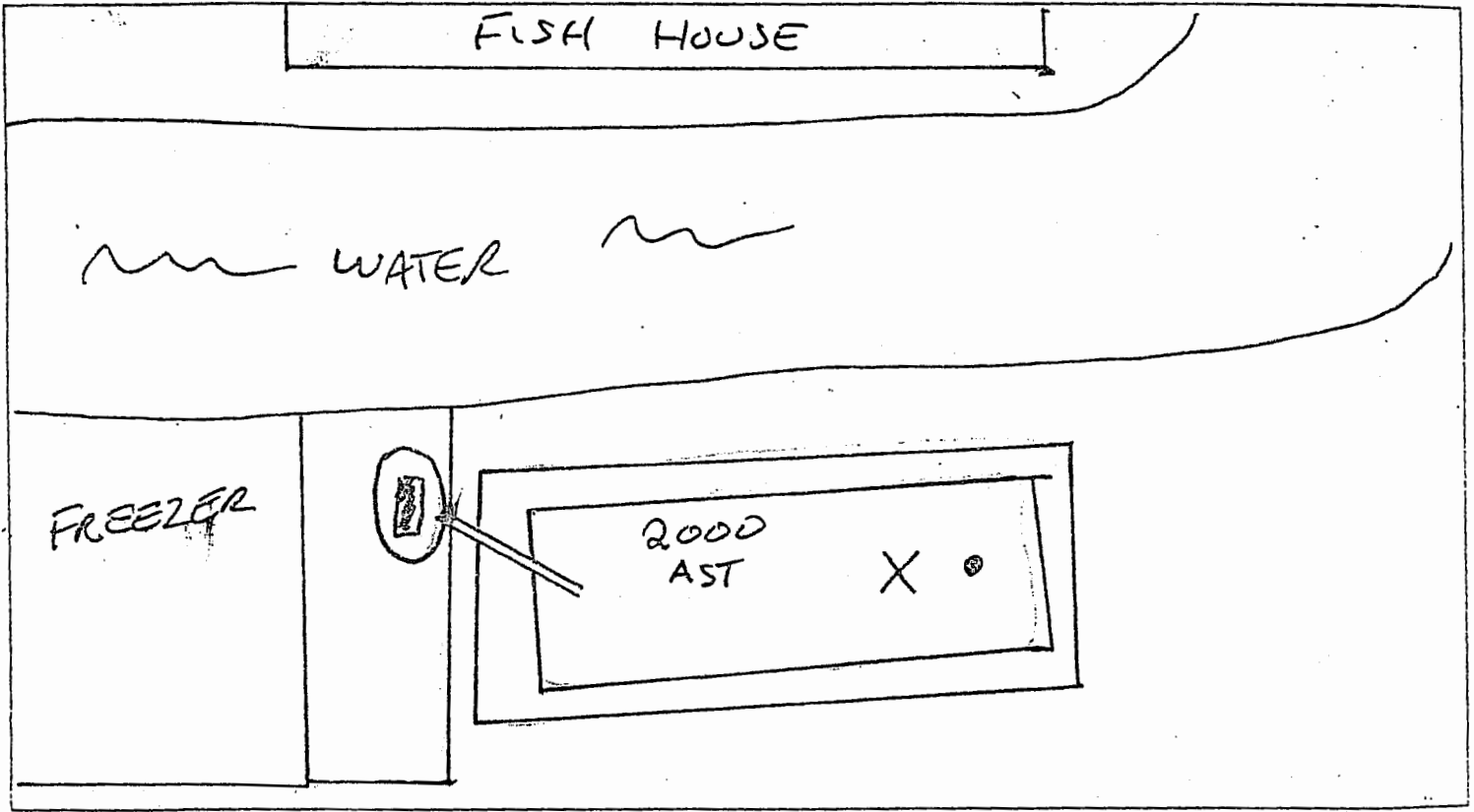
FACILITY SITE SKETCH

SITE NAME: CHARLIES FISH HOUSE

DRESS: 224 HWY 19 N

FDEP NUMBER: 8503046

NORTH



KEY:		COMPLIANCE WELLS		DISPENSERS
		TANKS		DRIVES/HIGHWAY
		SUMPS		POTABLE WELLS
		FILLS		STRUCTURES
		VENTS		OTHER MW'S

DRAWING REVIEWED AND UPDATED

INSPECTORS INITIAL AND DATE

CMS 10/10/02



**Site No. 87 Pete's Pier Dockside (aka Knox Bait House)**  
558 NW Third Avenue  
Crystal River, Florida  
FDEP I.D. No. 098503111



**OCALA**  
OFFICE BOX 523  
OCALA, FLORIDA 34478  
PHONE (904) 867-5211  
FAX (904) 867-0135

**PANAMA CITY**  
POST OFFICE BOX 16584  
PANAMA CITY, FLORIDA 32406  
PHONE (904) 872-0055  
FAX (904) 872-2338

## SUMMARY REPORT

**Knox Bait House**  
**558 N.W. 3rd Avenue**  
**Crystal River, Florida**

BTEX Environmental Consultants, Inc. was contracted by First National Bank of Northwest Florida to remove and destroy or otherwise properly dispose of one underground fuel storage tank. The storage tank previously contained unleaded gasoline. The storage tank is located on the attached figures. Work was initiated on October 25, 1995 when the tank was located and unearthed for subsequent storage tank removal. BTEX collected soil samples from the area surrounding the storage tank. Head space analysis of the samples was performed in order to determine the organic vapor concentrations within the soil. All organic vapor analysis was performed using a Thermo Environmental Instruments, Inc. Organic Vapor Meter (OVM). This model OVM is capable of detecting Volatile Organic Aromatics (VOA) in the range of 1 ppm to 5000 ppm. The OVM uses a photo ionization detector (PID). Standard manufacturer's operating procedures were followed in determining the organic vapor content of the soil samples. All necessary calibrations were made according to manufacturer's recommendations in accordance with Quality Assurance Requirements required by Chapter 62-160 of the Florida Administrative Code (FAC) entitled "Quality Assurance" and in accordance with BTEX's Comprehensive Quality Assurance Plan (CompQAP) #920147G (last annual review approved October 28, 1994), as filed with the Quality Assurance Section of the Florida Department of Environmental Protection (FDEP) in Tallahassee.

The samples were placed in glass jars covered with aluminum foil and sealed for the prescribed period of time. The locations of the soil samples are presented in the attached figures. OVA results are also attached. Chapter 62-770.200(2) FAC entitled "Petroleum Contamination Site Cleanup Criteria" defines a reading in excess of 50 parts per million (ppm) as excessively contaminated by constituents of the kerosene analytical group and readings greater than 500 ppm as excessive for the gasoline analytical group. Groundwater was encountered at depths of approximately three (3) feet below land surface. Once the tank was pumped free of the contents and degassed the ends were cut out and the sludge was removed. The tank was surveyed for holes or leaks. The tank appeared to have corrosion pits but no corrosion holes were seen to penetrate the tank. The tank was removed as scrap steel. A Lower Explosion Limit (LEL)

Page 2

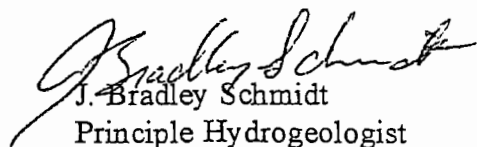
RE: Knox Bait House

November 6, 1995

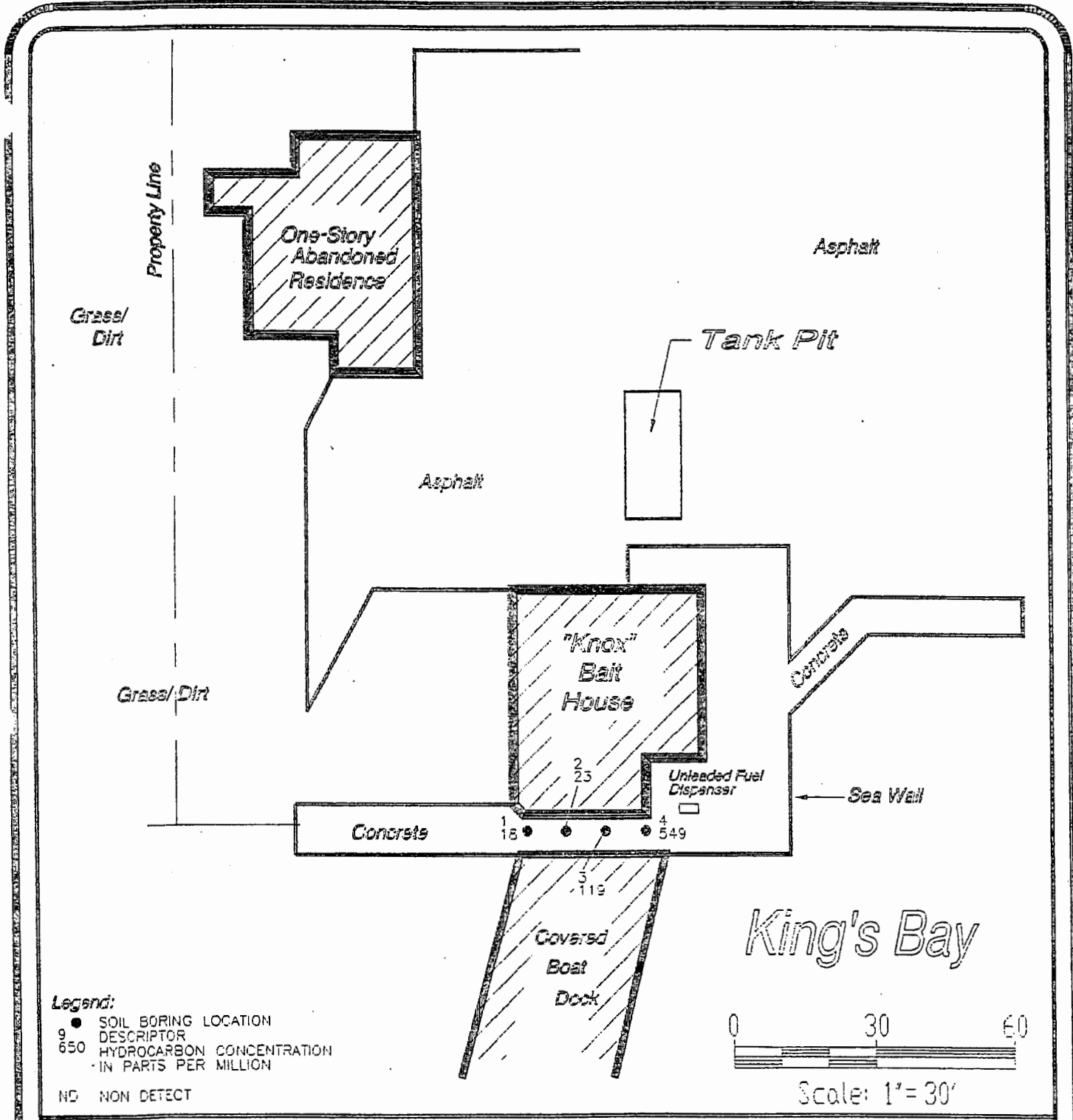
meter was used to detect any explosive conditions due to fumes which may have been present in the tanks before they were scraped. Groundwater data and soil sampling data which was obtained during the underground storage tank removal indicates the presence of hydrocarbon contamination in the soils and groundwater. Soil samples that were taken range from 2 parts per million to over 549 parts per million. The OVM readings are attached in a table form and can be keyed into the location map that is also attached. A groundwater sample was not taken because the tank was adjacent to an area that was previously determined to be contaminated. Samples were taken along product lines and under the dispenser. High organic vapor readings were encountered under the dispenser area, indicating a release associated with this tank system has taken place.

The Storage Tank Registration Form, Underground Storage Tank Removal Form for Certified Contractors, and a Closure Assessment Form were prepared for the owner's signature and filing with the Southwest District of the Florida Department of Environmental Protection (FDEP) in Tampa. A Discharge Notification Form (DNF) has already been sent to the Southwest District of the FDEP and is included for your records.

Sincerely,

  
J. Bradley Schmidt  
Principle Hydrogeologist

JBS/ps



**Legend:**  
 ● SOIL BORING LOCATION  
 9 DESCRIPTOR  
 650 HYDROCARBON CONCENTRATION  
 IN PARTS PER MILLION  
 ND NON DETECT

0 30 60  
 Scale: 1" = 30'

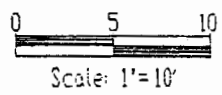
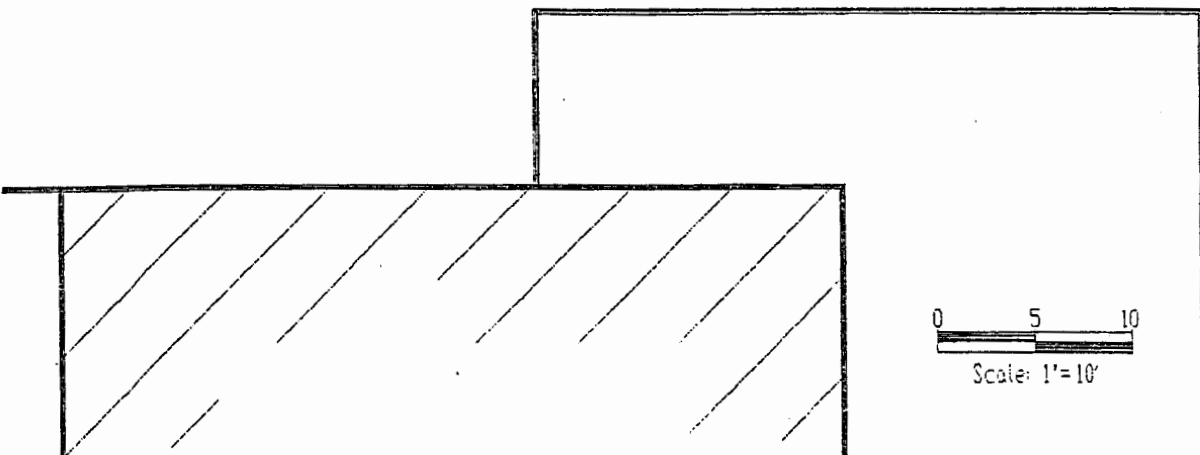
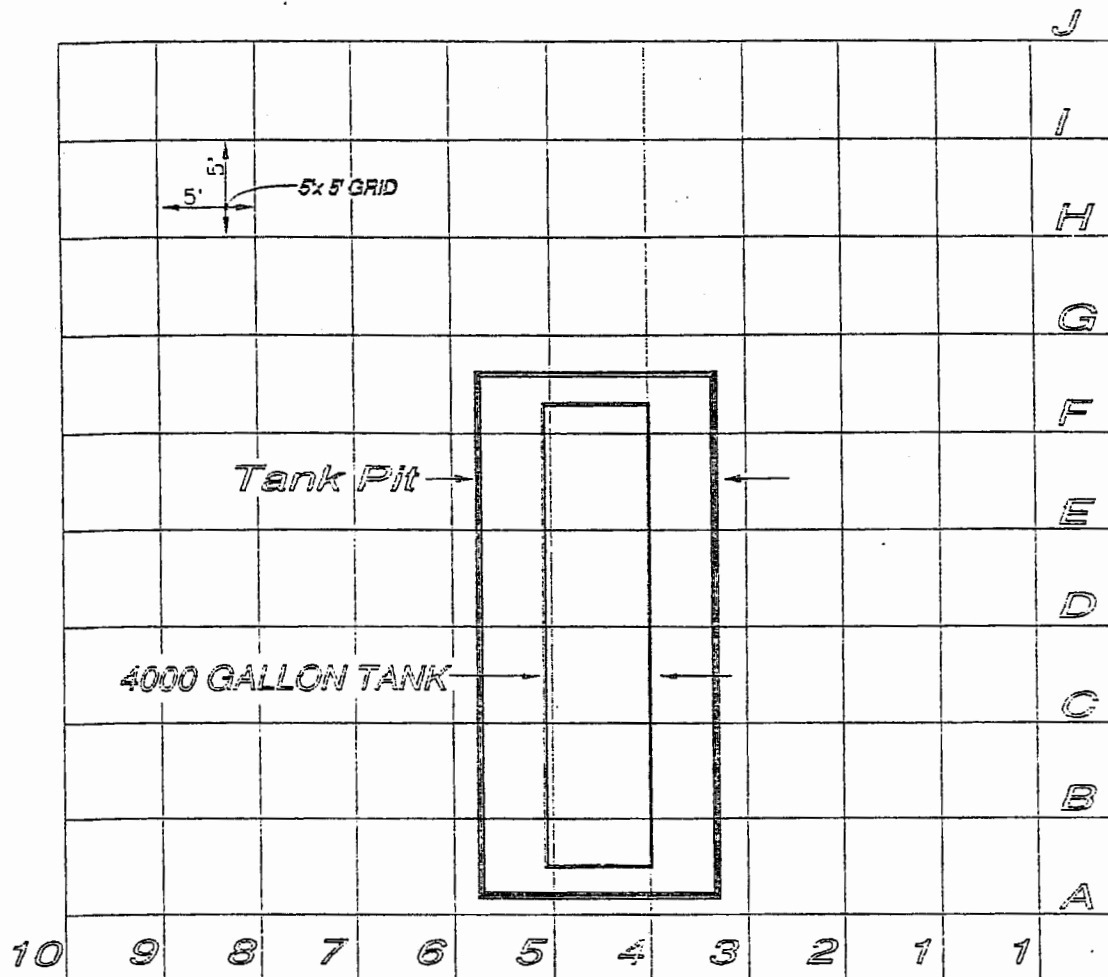
**SOIL BORING LOCATIONS  
 KNOX BAIT HOUSE**

File Name: Knox3C.dwg  
 Date: 4 November 1995  
 Drawn By: P. M. Moors  
 Checked By: J.A. Dunaway



4701 North East 36th Avenue  
 Post Office Box 523  
 Ocala, Florida 34479  
 Telephone (904) 867-8860  
 Telefax: (904) 867-0135





**TANK PULL SOILS SCREENING GRID  
KNOX BAIT HOUSE**

File Name: Knox3D.dwg  
 Date: 4 November 1995  
 Drawn By: P. M. Moore  
 Checked By: J.A. Dunaway



4701 North East 96th Avenue  
 Post Office Box 523  
 Ocala, Florida 34479  
 Telephone (904) 867-8860  
 Telefax: (904) 867-0135



**LOCATION: 558 NORTHWEST 3RD STREET**  
**SITE: KNOX BAIT HOUSE**  
**DATE: OCTOBER 25 1995**

OVM/PID READINGS				
Soil	Depth	Ambient	ppm	Net
B6	Pump	90	648	558
I5	4'	6	8	2
I7	4'	6	8	2
C8	3.5'	6	20	14
F7	3'	6	14	8
G4	3'	6	8	2
D4	2.5'	6	63	57
B4	3'	6	16	10
B8	3'	6	175	169
Boring 1	0.5'	8	26	18
Boring 2	0.5'	2	25	23
Boring 3	0.5'	2	121	119
Boring 4	0.5'	2	551	549



**Florida Department of Environmental Regulation**  
 Twin Towers Office Bldg. • 2600 Blair Stone Road • Tallahassee, Florida 32399-2400

DER Form #	17-781.900(2)
Form Title	Storage Tank Registration Form
Effective Date	December 10, 1990
DER Application No.	(Filed in by DER)

# Storage Tank Registration Form

Please Print or Type - Review Instructions Before Completing Form

1. DER Facility ID Number: 098503111      2. Facility Type: V  
 3. New Registration     New Owner Data     Facility Revision     Tank(s) Revision   
 4. County and Code of tank(s) location: CITRUS / \_\_\_\_\_

5. Facility Name: KNOX BAIT HOUSE  
 Tank(s) Address: 558 NORTHWEST 3RD AVENUE  
 City/State/Zip: CRYSTAL RIVER, FLORIDA 32629  
 Contact Person: FIRST NATIONAL BANK OF NW FLORIDA      Telephone: (904) 769-3207  
 6. Financial Responsibility Type: \_\_\_\_\_

7a. Tank(s) Owner: FIRST NATIONAL BANK OF NORTHWEST FLORIDA  
 Owner Mailing Address: 101 EAST 23RD STREET  
 City/State/Zip: PANAMA CITY, FLORIDA 32402  
 Contact Person: MR. DONALD ADAMS      Telephone: 904 ) 769-3207

7b. New Owner Signature/Change Date: \_\_\_\_\_ / \_\_\_\_/\_\_\_\_/\_\_\_\_

8. Location (optional)    Latitude: 28°53'77"    Longitude 82°35'41"    Section \_\_\_\_\_    Township \_\_\_\_\_    Range \_\_\_\_\_

**Complete One Line For Each Tank At This Facility (Use Codes - See Instructions)**

Complete 9 - 16 for tanks in use; 9 - 19 for tanks out of use

9	10	11	12	13	14	15	16	17	18	19
3	4000	A	XX/84	U	C	B	NONE	B	0	10/95

20. SCOTT L. SUMNER      DPR# PCC051690  
 Certified Contractor\*      Department of Professional Regulation License Number\*

\*For new tank installation or tank removal

To the best of my knowledge and belief all information submitted on this form is true, accurate and complete.

Scott Sumner - Agent  
 name & title of owner or authorized person

[Signature]  
 Signature

11-6-95  
 Date

<b>#2 - FACILITY TYPE</b>			G. State government	M. Agricultural
A. Retail station		H. Local government	N. Indian land	
B. Residence		I. County government	T. Coastal bulk petroleum or chemical storage	
C. Fuel user/non-retail		J. Collection station	V. Marine fueling facility	
D. Inland bulk petroleum storage		K. Inland bulk chemical storage	Z. Other; please specify	
E. Industrial plant		L. Chemical user		
F. Federal government				

---

<b>#6 - FINANCIAL RESPONSIBILITY</b>		<b>#9 - TANK ID NUMBER</b> (Number sequentially, 1,2,3; or provide specific identifying name or number; 6 characters, maximum)
A. State Program - Third party liability; State contractor (FPLPA/IGA).		
B. State Program - Third party liability; Self insurance with other carrier; other federal financial responsibility mechanism.		
C. Other coverage meeting federal financial responsibility requirements.		
D. None		<b>#10 - TANK SIZE IN GALLONS</b>

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<b>#11 - CONTENT</b>		
A. Leaded gasoline	H. Fuel - generator or pump	R. Ammonia compound
B. Unleaded gasoline	K. Kerosene	S. Chlorine compound
C. Gasohol	L. Waste oil	T. Hazardous substance (CERCLA)
D. Vehicular diesel	M. Fuel oil - on-site heat use only, all USTs or ASTs < 30K gals	U. Mineral acid
E. Aviation gasoline	N. Fuel oil: distribution, or on-site heat use ASTs > 30K gals	V. Grades 5 & 6, bunker 'C' residual oils
F. Jet fuel	O. New & lube oil	W. Petroleum-base additive
G. Fuel - emergency generator	Q. Pesticide	X. Other, miscellaneous petroleum-base product

---

<b>#12 - INSTALLATION DATE (mm/yy)</b>	<b>#13 - TANK PLACEMENT</b>	A = Aboveground tank U = Underground tank	C = Aboveground Compression Vessel D = Underground Compression Vessel
--	-----------------------------	--	--

---

**#14 - TANK CONSTRUCTION - choose one primary construction and all other codes that apply; primary is inner tank construction for double wall tanks**

<b>Primary Construction:</b>	C. Steel	X. Concrete
	D. Unknown	Y. Polyethylene
	E. Fiberglass	Z. Other DER approved tank material
	F. Fiberglass-clad steel	
<b>Overfill/Spill:</b>	A. Ball check valve	M. Spill containment bucket
	N. Flow shut-off	P. Level gauges, high-level alarms
	O. Tight fill	Q. Other DER approved protection method
<b>Corrosion Protection:</b>	G. Cathodic protection - sacrificial anode	H. Cathodic protection - impressed current
<b>Secondary Containment:</b>	I. Double wall construction: single material; outer tank material same as inner tank material	
	R. Double wall construction: dual material; outer tank constructed of concrete, approved synthetic material or tank "jacket"	
	J. Synthetic liner in tank excavation	
	K. Concrete, synthetic material, and/or offsite clays beneath AST and in containment area	
	S. Other DER approved secondary containment system	
<b>Miscellaneous attributes:</b>	B. Internal lining	U. Field erected tank
	L. Compartmented	

---

**#15 - PIPING CONSTRUCTION - choose one primary construction and all other codes that apply; primary is inner pipe construction for double wall piping**

<b>Primary Construction:</b>	B. Steel or galvanized metal	Y. Unknown
	C. Fiberglass	Z. Other DER approved piping material
	N. Approved synthetic material	
<b>Corrosion Protection:</b>	D. External protective coating	
	E. Cathodically protected with sacrificial anode or impressed current	
<b>Secondary Containment:</b>	F. Double wall construction: single material; outer pipe material same as inner pipe material	
	M. Double wall construction: dual material; outer pipe constructed of approved synthetic material or pipe "jacket"	
	G. Synthetic liner or box/trench liner in piping excavation or pipe containment area	
<b>Miscellaneous attributes:</b>	A. Aboveground, no contact with soil	K. Dispenser liners
	I. Suction piping system	L. Bulk product system
	J. Pressurized piping system	H. Airport/seaport hydrant system

---

**#16 - LEAK DETECTION METHODS - choose all that apply**

<b>Site/general:</b>	A. Automatically sampled wells	B. Manually sampled wells
	C. Groundwater monitoring plan	D. SPCC Plan
	N. Groundwater monitoring system	O. Vapor monitoring system
	I. Not required - see rule for exemptions	X. None
	Y. Unknown	Z. Other DER approved monitoring method
<b>Tank monitoring:</b>	E. Interstitial space - tank/liner	L. Automatic tank gauging
	F. Interstitial space - double wall tank	M. Manual tank gauging
<b>Piping monitoring:</b>	G. In-line detector, auto shut off	J. Interstitial space - piping/liner
	H. In-line flow restrictor	K. Interstitial space - double wall piping

---

<b>#17 - TANK STATUS &amp;/or TANK DISPOSAL</b>	<b>#18 - GALLONS LEFT in out-of-service tank</b>
A. Properly closed in place - UST filled with sand, concrete or other inert material; AST rendered unusable	
B. Removed from the site	
* A or B: Closure Assessment required after 12/10/90 (UST); 03/12/91 (AST) - EDI sites excluded	<b>#19 - LAST USED DATE (mm/yy) or date of permanent closure</b>
F. Unmaintained tank - not in use or to be used, and not properly disposed	
T. Temporarily out-of-service	
U. In-service	





# Underground Storage Tank Installation and Removal Form For Certified Contractors

Pollutant Storage System Specialty Contractors as defined in Section 489.113, Florida Statutes (Certified contractors as defined in Section 17-761.200, Florida Administrative Code) shall use this form to certify that the installation, replacement or removal of the storage tank system(s) located at the address listed below was performed in accordance with Department Reference Standards.

## General Facility Information

1. DER Facility Identification No.: 098503111
2. Facility Name: KNOX BAIT HOUSE Telephone: (904) 769-3207
3. Street Address (physical location): 558 NORTHWEST 3RD STREET  
CRYSTAL RIVER, FL. 32629
4. Owner Name: FIRST NATIONAL BANK NORTHWEST FLORIDA Telephone: (904) 769-3207
5. Owner Address: 101 EAST 23RD STREET, PANAMA CITY, FLORIDA 32402
6. Number of Tanks: a. Installed at this time \_\_\_\_\_ b. Removed at this time 1-4000 gal. removed
7. Tank(s) Manufactured by: UNKNOWN
8. Date Work Initiated: 10/25/95 9. Date Work Completed: 11/3/95

## Underground Pollutant Tank Installation Checklist

Please certify the completion of the following installation requirements by placing an (X) in the appropriate box.

1. The tanks and piping are corrosion resistant and approved for use by State and Federal Laws.
2. Excavation, backfill and compaction completed in accordance with NFPA (National Fire Protection Association) 30(87), API (American Petroleum Institute) 1615, PEI (Petroleum Equipment Institute) RP100-87 and the manufacturers' specifications.
3. Tanks and piping pretested and installed in accordance with NFPA 30(87), API 1615, PEI/RP100(87) and the manufacturers' specifications.
4. Steel tanks and piping are cathodically protected in accordance with NFPA 30(87), API 1632, UL (Underwriters Laboratory) 1746, STI (Steel Tank Institute) R892-89 and the manufacturer's specifications.
5. Tanks and piping tested for tightness after installation in accordance with NFPA 30(87) and PEI/RP100-87.
6. Monitoring well(s) or other leak detection devices installed and tested in accordance with Section 17-761.640, Florida Administrative Code (F.A.C.)
7. Spill and overflow protection devices installed in accordance with Section 17-761.500, F.A.C.
8. Secondary containment installed for tanks and piping as applicable in accordance with Section 17-761.500, F.A.C.

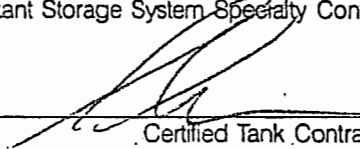
**Please Note:** The numbers following the abbreviations (e.g. API 1615) are publication or specification numbers issued by these institutions.

## Underground Pollutant Tank Removal Checklist

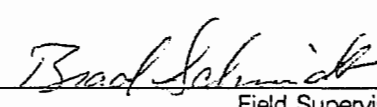
1. Closure assessment performed in accordance with Section 17-761.800, F.A.C.
- Underground tank removed and disposed of as specified in API 1604 in accordance with Section 17-761.800, F.A.C.

## Certification

I hereby certify and attest that I am familiar with the facility that is registered with the Florida Department of Environmental Regulation; the best of my knowledge and belief, the tank installation, replacement or removal at this facility was conducted in accordance with Chapter 4, Section 376.303, Florida Statutes and Chapter 17-761, Florida Administrative Code (and its adopted reference sources from publications and standards of the National Fire Protection Association (NFPA), the American Petroleum Institute (API), the National Association of Corrosion Engineers (NACE), the American Society for Testing and Materials (ASTM); Petroleum Equipment Institute (PEI); Steel Tank Institute (STI); Underwriters Laboratory (UL) and the tank and integral piping manufacturers' specifications; and that the operations on the checklist were performed accordingly.

\_\_\_\_\_  
 SCOTT SUMNER PCC051690  
 (Type or Print)  
 Certified Pollutant Tank Contractor Name  
 Pollutant Storage System Specialty Contractor License Number (PSSSC)  
 \_\_\_\_\_  
  
 Certified Tank Contractor Signature

\_\_\_\_\_  
 PCC051690  
 PSSSC Number  
 \_\_\_\_\_  
 11-6-95  
 Date

\_\_\_\_\_  
 BRAD SCHMIDT  
 (Type or Print)  
 Field Supervisor Name  
 \_\_\_\_\_  
  
 Field Supervisor Signature

\_\_\_\_\_  
 Date  
 \_\_\_\_\_  
 11.6.95  
 Date

The owner or operator of the facility must register the tanks with the Department at least 10 days before the installation. The installer must submit this form no more than 30 days after the completion of installation to the Department of Environmental Regulation at the address printed at the top of page one.



# Closure Assessment Form

Owners of storage tank systems that are replacing, removing or closing in place storage tanks shall use this form to demonstrate that a storage system closure assessment was performed in accordance with Rule 17-761 or 17-762, Florida Administrative Code. Eligible Early Detection Incentive (EDI) and Reimbursement Program sites do not have to perform a closure assessment.

Please Print or Type  
Complete All Applicable Blanks

1. Date: Friday, November 3, 1993
2. DER Facility ID Number: 098503111      3. County: Citrus
4. Facility Name: Knox Bait House
5. Facility Owner: William H. Page
6. Facility Address: 558 Northwest 3rd Avenue, Crystal River, Fl.
7. Mailing Address: 558 Northwest 3rd Avenue, Crystal River, Fl.
8. Telephone Number: 904 - 563-1040      9. Facility Operator: William H. Page
10. Are the Storage Tank(s): (Circle one or both)    A. Aboveground    or     B. Underground
11. Type of Product(s) Stored: Unleaded gasoline
12. Were the Tank(s): (Circle one)    A. Replaced     B. Removed    C. Closed in Place    D. Upgraded (aboveground tanks only)
13. Number of Tanks Closed: 1. Removed      14. Age of Tanks: 11 yrs. (installed 1982)

## Facility Assessment Information

- | Yes                                 | No                                  | Not Applicable                      |   |
|-------------------------------------|-------------------------------------|-------------------------------------|---|
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            |                                     | 1. Is the facility participating in the Florida Petroleum Liability Insurance and Restoration Program (FPLIRP)?   |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            |                                     | 2. Was a Discharge Reporting Form submitted to the Department?<br>If yes, When: <u>10/27/95</u> Where: <u>Tallahassee/Tampa</u>   |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            |                                     | 3. Is the depth to ground water less than 20 feet?  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/>            | 4. Are monitoring wells present around the storage system?<br>If yes, specify type: <input type="checkbox"/> Water monitoring <input type="checkbox"/> Vapor monitoring   |
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/>            | 5. Is there free product present in the monitoring wells or within the excavation?  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/>            | 6. Were the petroleum hydrocarbon vapor levels in the soils greater than 500 parts per million for gasoline?<br>Specify sample type: <input type="checkbox"/> Vapor Monitoring wells <input checked="" type="checkbox"/> Soil sample(s)       |
| <input type="checkbox"/>            | <input type="checkbox"/>            | <input checked="" type="checkbox"/> | 7. Were the petroleum hydrocarbon vapor levels in the soils greater than 50 parts per million for diesel/kerosene?<br>Specify sample type: <input type="checkbox"/> Vapor Monitoring wells <input checked="" type="checkbox"/> Soil sample(s) |
| <input type="checkbox"/>            | <input type="checkbox"/>            | <input checked="" type="checkbox"/> | 8. Were the analytical laboratory results of the ground water sample(s) greater than the allowable state target levels?<br>(See target levels on reverse side of this form and supply laboratory data sheets)                                 |
| <input type="checkbox"/>            | <input type="checkbox"/>            | <input checked="" type="checkbox"/> | 9. If a used oil storage system, did a visual inspection detect any discolored soil indicating a release?   |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/>            | 10. Are any potable wells located within 1/4 of a mile radius of the facility?  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/>            | 11. Is there a surface water body within 1/4 mile radius of the site? If yes, indicate distance: <u>less than 5'</u>  |

DER Form #	17-761.900(8)
Form Title	Closure Assessment Form
Effective Date	December 10, 1990
DER Application No.	(Filed in by DER)

12. A detailed drawing or sketch of the facility that includes the storage system location, monitoring wells, buildings, storm drains, sample locations, and dispenser locations must accompany this form.
13. If a facility has a pollutant storage tank system that has both gasoline and kerosene/diesel stored on site, both EPA Method 602 and EPA Method 610 must be performed on the ground water samples obtained.
14. Amount of soils removed and receipt of proper disposal.
15. If yes is answered to any one of questions 5-9, a Discharge Reporting Form 17-761.900(1) indicating a suspected release shall be submitted to the Department within one working day.
16. A copy of this form and any attachments must be submitted to the Department's district office in your area and to the locally administered program office under contract with the Department within 60 days of completion of tank removal or filling a tank with an inert material.

*Donald C. Adams, Jr.*

Donald C. Adams, Jr., Senior Vice President  
 First National Bank Northwest Florida, holder of Summary Judgement of foreclosure on property

*11-13-95*

Date

*Brad Schmit*

Signature of Person Performing Assessment

*11-6-95*

Date

*Hydrogeologist*

Title of Person Performing Assessment

### State Ground Water Target Levels That Affect A Pollutant Storage Tank System Closure Assessment

State ground water target levels are as follows:

- |  |   |
|--|---|
| <ol style="list-style-type: none"> <li>1. For gasoline (EPA Method 602):           <ol style="list-style-type: none"> <li>a. Benzene 1 ug/l</li> <li>b. Total VOA 50 ug/l               <ul style="list-style-type: none"> <li>- Benzene</li> <li>- Toluene</li> <li>- Total Xylenes</li> <li>- Ethylbenzene</li> </ul> </li> <li>c. Methyl Test-Butyl Ether (MTBE) 50 ug/l</li> </ol> </li> </ol> | <ol style="list-style-type: none"> <li>2. For kerosene/diesel (EPA Method 610):           <ol style="list-style-type: none"> <li>a. Polynuclear Aromatic Hydrocarbons (PAHS)<br/>               (Best achievable detection limit, 10 ug/l maximum)</li> </ol> </li> </ol> |
|--|---|



Florida Department of Environmental Regulation  
Twin Towers Office Bldg. • 2600 Blair Stone Road • Tallahassee, Florida 32399-2400

DER Form #	17-761.902(1)
Form Title	Discharge Reporting Form
Effective Date	December 10, 1990
DER Application No.	Filed in by CER

# Discharge Reporting Form

Use this form to notify the Department of Environmental Regulation of:

1. Results of tank tightness testing that exceed allowable tolerances within ten days of receipt of test result.
2. Petroleum discharges exceeding 25 gallons on pervious surfaces as described in Section 17-761.460 F.A.C. within one working day of discovery.
3. Hazardous substance (CERCLA regulated), discharges exceeding applicable reportable quantities established in 17-761.460(2) F.A.C., within one working day of the discovery.
4. Within one working day of discovery of suspected releases confirmed by: (a) released regulated substances or pollutants discovered in the surrounding area, (b) unusual and unexplained storage system operating conditions, (c) monitoring results from a leak detection method or from a tank closure assessment that indicate a release may have occurred, or (d) manual tank gauging results for tanks of 550 gallons or less, exceeding ten gallons per weekly test or five gallons averaged over four consecutive weekly tests.

Mail to the DER District Office in your area listed on the reverse side of this form

PLEASE PRINT OR TYPE  
Complete all applicable blanks

1. DER Facility ID Number: 098503111 2. Tank Number: 1 3. Date: 10/27/95
4. Facility Name: KNOX BAIT HOUSE  
Facility Owner or Operator: First National Bank of Northwest Florida  
Facility Address: 558 NW 3rd Avenue  
Telephone Number: (904) 769-3207 County: Citrus  
Mailing Address: 101 EAST 23rd Street, Panama City, FL 32402
5. Date of receipt of test results or discovery: 10/27/95 month/day/year
6. Method of initial discovery. (circle one only)
 

A. Liquid detector (automatic or manual)	D. Emptying and inspection.	F. Vapor or visible signs of a discharge in the vicinity.
B. Vapor detector (automatic or manual)	E. Inventory control.	G. Closure: <u>Spills</u> (explain)
C. Tightness test (underground tanks only).	H. Other: _____	
7. Estimated number of gallons discharged: Unknown
8. What part of storage system has leaked? (circle all that apply) A. Dispenser  B.  Pipe C. Fitting D. Tank E. Unknown
9. Type of regulated substance discharged. (circle one)
 

<input checked="" type="checkbox"/> A. leaded gasoline	D. vehicular diesel	L. used/waste oil	V. hazardous substance includes pesticides, ammonia, chlorine and derivatives (write in name or Chemical Abstract Service CAS number) _____
B. unleaded gasoline	F. aviation gas	M. diesel	Z. other (write in name) _____
C. gasohol	G. jet fuel	Q. new/tube oil	
10. Cause of leak. (circle all that apply)
 

<input checked="" type="checkbox"/> A. Unknown	C. Loose connection	E. Puncture	G. Spill _____	I. Other (specify) _____
B. Spill	D. Corrosion	F. Installation failure	H. Overfill	
11. Type of financial responsibility. (circle one)
 

A. Third party insurance provided by the state insurance contractor	C. Not applicable
B. Self-insurance pursuant to Chapter 17-769.500 F.A.C.	D. None
12. To the best of my knowledge and belief all information submitted on this form is true, accurate, and complete.

JAMES A. Dunaway  
Printed Name of Owner, Operator or Authorized Representative

[Signature]  
Signature of Owner, Operator or Authorized Representative



# Department of Environmental Protection

Lawton Chiles  
Governor

Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

Virginia B. Wetherell  
Secretary

JUL 06 1995

Mr. William Page  
Knox Bait House  
558 N.W. 3rd Ave.  
Crystal River, FL 34429

Re: Knox Bait House  
558 N.W. 3rd Ave.  
Crystal River, Florida  
Facility ID #098503111

Dear Mr. Page:

On June 15, 1995, representatives of the Southwest District office conducted a compliance inspection at the above referenced facility. This inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to Chapter 62-761, Florida Administrative Code (F.A.C.), which regulates underground stationary storage tank systems. During this inspection, possible non-compliance items were noted and recorded on the enclosed compliance inspection form.

Therefore, this facility may currently not be operating in compliance with Chapter 17-762, F.A.C. Standards. Any non-compliance items should be corrected.

Petroleum contamination was discovered during an environmental audit conducted by BTEX Environmental Consultants, Inc. in April, 1995. If it is determined, upon closure of the three unmaintained tanks, that the contamination is from these tanks, you may want to submit the enclosed ATRP form. If the contamination is not from the unmaintained tanks a contamination assessment must be initiated.

Please send a copy of the environmental audit conducted by BTEX to this office.

Mr. William Page  
Knox Bait House

Page 2

Contact me at (813) 744-6100, ext. 367, if you have any questions.

Sincerely,

*Nancy E. Knight*

Nancy E. Knight  
Storage Tank Program  
Division of Waste Management

NK

Enclosures

## SUGGESTED CORRECTIVE ACTIONS

### KNOX BAIT HOUSE

FACILITY ID# 098503111

1. There are three errors in the storage tank registration:
  - One underground storage tank was discovered during the inspection that has not been registered.
  - The 4,000 gallon unleaded fuel tank is listed in the storage tank registration data base as containing leaded fuel. The content code of "A" must be changed to "B" on the storage tank registration form (STRF).
  - The two 1000 gallon tanks are listed as being removed, while they are actually still on site. The tank status code of "B" needs to be changed to "F" on the STRF.

The owner of any in-service, out of service or unmaintained storage tank system that has a capacity of more than 110 gallons shall register the storage tank system with the Department on the DEP Form 62-761.900(2) (62-761.400, F.A.C.). A STRF needs to be completed and signed to add the newly found tank to your inventory and to correct the contents of the 4,000 gallon tank and to correct the disposition of the two 1,000 gallon tanks. A copy of this form is enclosed for your convenience. Send the original registration form to Tallahassee and forward a copy to this office by July 20, 1995. (See item #1 on the enclosed inspection form.)

2. Inventory records have not been completed since March 1993. All records required to be kept pursuant to this Chapter shall, unless otherwise specified in the text of those rules, be maintained for two years and shall be available for inspection by the Department at the facility. If records are not kept at the facility, they shall be available at the facility or other location acceptable to the Department upon five working days notice. Records of the following are required:

- (a) Measurements and reconciliation of inventory;
- (b) Results of examinations of monitoring wells and other release detection systems;
- (c) Dates of upgrading or replacement of existing storage tank systems;
- (d) Results of maintenance examinations of storage tank systems;
- (e) Results of all tightness tests of storage tank systems;
- (f) Results of tests of integral piping;
- (g) Description and dates of repairs;
- (h) Closure assessment reports if the location continues as a facility;
- (i) Release detection system performance claims as specified in Rule 62-761.600(1)(c), F.A.C.; and
- (j) Certification of Financial Responsibility on form 62-761.900(3). (62-761.710, F.A.C.)



## SUGGESTED CORRECTIVE ACTIONS

### KNOX BAIT HOUSE

FACILITY ID# 098503111

Send the a copy of the March and April 1994, monitoring well records to this office by July 20, 1995. (See item #10 on the enclosed inspection form.)

3. No inventory was kept of the 4000 gallon unleaded fuel tank. Owners or operators shall maintain inventory records for each tank that contains vehicular fuel. Inventory records shall be reconciled weekly (62-761.720(1), F.A.C.). Losses or gains from each recording period shall be averaged (62-761.720(2) F.A.C.). Begin conducting inventory measurements immediately. Send a copy of the inventory for the last two weeks of June to this office by July 20, 1995. (See item #22 on the enclosed inspection form.)

4. There are two 1,000 gallon tanks and one, newly discovered tank that have not been used since 1984. Owners of unmaintained storage tank systems must permanently close the systems within 90 days of the effective date of this rule or of the discovery of the existence of the unmaintained storage tank system (62-761.800(2)(a), F.A.C.). The tanks must be properly closed in accordance with Rule 62-761.800(2), F.A.C. by July 31, 1995. A closure assessment must be conducted in accordance with 62-761.800(3), F.A.C. and the Department's "Pollutant Storage Tank Closure Assessment Requirements". This document is enclosed for your reference. (Please see item #53 on the enclosed inspection form.)

STATE OF FLORIDA  
 DEPARTMENT OF ENVIRONMENTAL PROTECTION  
 POLLUTANT STORAGE TANK SYSTEM  
 INSPECTION REPORT FORM - COVER PAGE

PAGE: 1 OF 2  
 PRINTED: 06/13/95

FACILITY ID #: 098503111  
 FACILITY NAME: KNOX BAIT HOUSE  
 FACILITY LOCATION: 558 NW 3RD AVE, CRYSTAL RIVER  
 FACILITY CONTACT: PAGE WILLIAM  
 OWNER: KNOX BAIT HOUSE  
 OWNER ADDRESS: 558 NW 3RD AVE, CRYSTAL RIVER, FL, 32629-4004  
 OWNER CONTACT: WILLIAM PAGE  
 LATITUDE: 28-53-77 LONGITUDE: 82-35-41  
 LAST UST COMPLIANCE DATE: 11/18/93  
 CONTAMINATION DATA AVAILABLE: NONE

COUNTY: CITRUS

PHONE: (904) 795-2771  
 PHONE: (904) 795-2771

OWNER CHANGE DATE: 05/06/86  
 FAC TYPE: MARINE FACILITY  
 LAST AST COMPLIANCE DATE: 00/00/00

TANK #	SIZE	CONTENT	INSTALL DATE	UNDER OR ABOVE	TANK TYPE	INTEGRAL PIPING	MONITORING SYSTEM	TANK STAT
1	1000	A	04 64	U	C	B	Y	BF
2	1000	A	09 64	U	C	B	Y	BF
	4000	A	06 84	U	C	B	Y	U
	1000	D	XX 82	A	D	C	Y	B

INSPECTION TYPE (ALL THAT APPLY)  
 ROUTINE  
 INSTALL  
 ABANDONED  
 DISCHARGE  
 CLOSURE  
 REINSPECT

SITE INFORMATION (ALL THAT APPLY)  
 NEAR PUB WELL  
 CONTAMINATED  
 COMPLAINT  
 ACID TANKS  
 REPAIRED  
 UPGRADED  
 UST & AST  
 HAZARD MAT

DEP DISTRICT OR LOCAL PROGRAM: SWD - DEP

INSPECTOR NAME (PRINT) Nancy Knight

CONTACT NAME (PRINT) William Page

Nancy E. Knight 6/15/95  
 INSPECTOR'S SIGNATURE & DATE

[Signature]  
 CONTACT'S SIGNATURE & DATE

STATE OF FLORIDA  
DEPARTMENT OF ENVIRONMENTAL PROTECTION  
POLLUTANT STORAGE TANK SYSTEM  
INSPECTION REPORT FORM - COVER PAGE

PAGE: 2 OF 2  
PRINTED: 06/13/95

FACILITY ID #: 098503111  
FACILITY NAME: KNOX BAIT HOUSE  
FACILITY LOCATION: 558 NW 3RD AVE, CRYSTAL RIVER  
FACILITY CONTACT: PAGE WILLIAM

COUNTY: CITRUS

PHONE: (904) 795-2771

COMMENTS:

NW monitor well 0 ppm, NE 0 ppm

SE monitor well unfiltered flaming out at 4,000  
filtered going off scale

SW monitor well unfiltered 10 ppm

baled SE well - no sheen, no odor

1" of product found in unknown tank

no shear valve in dispenser

No inventory was being conducted on the 4,000 gal  
unleaded tank. No product was going into or out of this tank.

Monitoring well records were ~~kept~~ <sup>reviewed</sup> from Nov 93  
to Jun 95 except for March & April, 1994 which  
could not be found.



UNDERGROUND STORAGE TANK  
 COMPLIANCE INSPECTION FORM

Yes	No	Unk	N/A
-----	----	-----	-----

REGISTRATION/NOTIFICATION: Comments: Current placard displayed one tank discovered during inspection 1" product in it

1. Facility has registered all applicable tanks on site; 17-761.400	1.	✓			
2. Current registration placard is properly displayed; 17-761.410(6)	2.	✓			
Proper notification has been made for the following; 17-761.450:					
3. Proper closure (30 days prior); (1) (a)	3.				✓
4. Change of ownership (30 days after); (1) (b)	4.				✓
5. Upgrading, replacement or installation (10 days prior.); (1) (c)	5.				✓
6. Change of tank status (in service/out of service), (within 30 days); (1) (d)	6.				✓
7. Change of facility status (e.g. substances stored), (within 30 days); (1) (e)	7.				✓
8. Change of method of financial responsibility (within 30 days); (3)	8.				✓
9. Start of closure, upgrades or installation (24 hr. verbal or written); (4)	9.				✓

II. RECORD KEEPING: Comments: No inventory records, 2 months missing of monitoring well records

10. All records were maintained for two (2) years and were available for inspection within five (5) working days; 17-761.710 (1)	10.		✓		
11. Some but not all records were maintained for two (2) years and were available for inspection within five (5) working days; 17-761.710 (1)	11.	✓			

III. REPORTING/DISCHARGE RESPONSE/REPAIRS: Comments: DRF filed - rec'd 6/8/95; previously reported to Citrus Co. Haz. Mat. on day of discovery

Proper reporting requirements been met for the following; 17-761.460:

12. Results of tightness test; (1)	12.				✓
13. Any spill, overflow, or other discharge within one working day of discovery; (2)	13.	✓			
14. Suspected releases within one working day of discovery; (3) (a), (b)	14.	✓			
15. Confirmed releases (positive response of a release detection device) within one working day of discovery; (3) (c)	15.				✓
The owner or the operator of the system which has discharged has:					
16. Taken it out-of-service; 17-761.700 (1), had it repaired or replaced; .700, or properly closed it; .820 (1)	16.				✓
17. Removed any regulated substances from the system; 17-761.820 (1)	17.	✓			✓
18. Tightness tested all repaired components before placing them back in service; 17-761.700 (6)	18.				✓
19. Had repairs or replacements performed by a certified contractor; 489.105 (3)	19.				✓
20. Had tightness tests performed by registered tank tester; 17-761.200	20.				✓
21. Begun initial corrective actions for a release; 17-761.820 (2) emptied tank	21.	✓			✓

IV. INVENTORY REQUIREMENTS: Comments: No inventory records

22. All inventory requirements maintained in accordance with 17-761.720 (1)	22.		✓		
23. Some, but not all inventory requirements maintained in accordance with 17-761.720 (1)	23.		✓		

V. PERFORMANCE STANDARDS/CATHODIC PROTECTION Comments: \_\_\_\_\_

Storage tank criteria; 17-761.500, .520 and .550:

24. Facility meets applicable storage tank standards; (1)	24.	✓			
25. Systems meet siting requirements; (4)	25.				✓
26. Tank(s) equipped with spill containment; (5) (b)	26.	✓			
27. Tank(s) equipped with overflow protection; (5) (b)	27.				✓
28. Facility meets construction upgrading schedule; 17-761.510	28.				✓

Posted  
 7/11/95  
 NEK



Name: SNOK Salt House  
 Facility ID #: 09850311  
 Date: 15 Jun 95

UNDERGROUND STORAGE TANK  
 COMPLIANCE INSPECTION FORM

Yes	No	Unk	N/A
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PERFORMANCE STANDARDS/CATHODIC PROTECTION Continued

Dispenser does not have shear valve.

Piping criteria: 17-761.500:

29. New piping has secondary containment; (2)	29.				✓
30. Dispensers are upgraded with properly installed and maintained liners; (6)	30.				✓
31. Facility meets construction upgrading schedule; 17-761.510 (6)	31.				✓
Cathodic Protection/Certified Contractors /Tightness Testing					
32. Cathodic protection system provides continuous protection; 17-761.730 (1)-(4)	32.				✓
33. PSSSC conducted all storage tank repairs, installations or removals; 17-761.740 (1)-(9)	33.				✓
34. Test performed by a D.P.R.-registered tester; 17-761.740	34.				✓

VI. RELEASE DETECTION/MONITORING WELLS Comments: \_\_\_\_\_

35. New petroleum or hazardous substance storage tanks provided with an approved release detection system upon installation; 17-761.600 (3)	35.				✓
36. All release detection systems meet general release standards; 17-761.600	36.	✓			
37. Release detection systems are monitored for a discharge at least every 30 days; 17-761.600 (5)	37.	✓			
38. Groundwater monitoring wells are properly sampled and meet the requirements of 17-761.640 (1)	38.	✓			
39. Vapor monitoring wells are properly sampled and meet the requirements of 17-761.640 (2)	39.				✓
An approved release detection system is provided for:					
40. Existing hazardous substance storage tanks; 17-761.560	40.				✓
41. Existing vehicular fuel storage tanks; 17-761.610	41.				✓
42. Other existing regulated substance storage tanks; 17-761.620	42.	✓			
43. Integral piping provided with secondary containment; 17-761.630	43.				✓
44. Integral piping without secondary containment; 17-761.640 (8)	44.	✓			

OUT-OF-SERVICE STATUS Comments: \_\_\_\_\_

1" product found in newly discovered tank

45. Storage systems have been emptied of regulated substances; 17-761.200 (26)	45.	✓			
Out-of-Service storage tank systems have; 17-761.800:					
46. Corrosion protection properly maintained; (1) (a) (1)	46.				✓
47. Release detection system monitored for evidence of a discharge at least every six months; (1) (a) (2)	47.				✓
48. Vent lines open, ancillary equipment secured; (1) (b)	48.				✓
49. Been upgraded or replaced before returning to service; (1) (c)	49.				✓
50. Been tested tight before returning to service; (1) (c)	50.				✓
51. Been out-of-service for no more than two years; (1) (d)	51.				✓
52. Been out-of-service for no more than 12 months (unprotected bare steel systems); (2) (b)	52.				✓
53. Proper closure for an unmaintained tank; (2)	53.		✓		CHT
54. Had a closure assessment properly performed; (3)	54.				✓

VIII. VARIANCE Comments: \_\_\_\_\_

55. Facility applied for Alternate Procedure (Explain in comment) 17-761.850	55.				✓
--	-----	--	--	--	---

IX. Other Comments: \_\_\_\_\_

56. Any other violations noted during inspection (Explain in comments)	56.				✓
--	-----	--	--	--	---



Florida Department of Environmental Regulation  
Twin Towers Office Bldg. • 2600 Blair Stone Road • Tallahassee, Florida 32399-2400

DEP Form #	ENVIRONMENT
Form Title	Discharge Reporting Form
Effective Date	October 10, 1995
DEP Approval No.	(Filed in by DEP)

## Discharge Reporting Form

Use this form to notify the Department of Environmental Regulation of:

- Results of tank tightness testing that exceed allowable tolerances within ten days of receipt of test result.
- Freon discharges exceeding 25 gallons on pervious surfaces as described in Section 17-761.460 F.A.C. within one working day of discovery.
- Hazardous substance (CERCLA regulated), discharges exceeding applicable responsible quantities established in 17-761.460(2) F.A.C. within one working day of the discovery.
- Within one working day of discovery of suspected releases confirmed by: (a) released regulated substances or pollutants discovered in the surrounding area, (b) unusual and unexplained storage system operating conditions, (c) monitoring results from a leak detection method or from a tank closure assessment that indicate a release may have occurred, or (d) manual tank gauging results for tanks of 550 gallons or less, exceeding ten gallons per weekly test or five gallons averaged over four consecutive weekly tests.

Mail to the DEP District Office in your area listed on the reverse side of this form

PLEASE PRINT OR TYPE  
Complete all applicable blanks

- DEP Facility ID Number: 098503111 2. Tank Number: 1 3. Date: 10/27/95
- Facility Name: Knox Bait House  
Facility Owner or Operator: First National Bank of Northwest Florida  
Facility Address: 558 NW 3rd Avenue  
Telephone Number: (904) 769-3207 County: Citrus  
Mailing Address: 101 EAST 23rd Street, Panama City, FL 32402
- Date of receipt of test results or discovery: 10/27/95 month/day/year
- Method of initial discovery. (circle one only)  
A. Liquid detector (automatic or manual)    D. Emptying and inspection.  
B. Vapor detector (automatic or manual)    E. Inventory control.  
C. Tightness test (underground tanks only).    F. Vapor or visible signs of a discharge in the vicinity.  
G. Closure: Soils (explain)  
H. Other: \_\_\_\_\_
- Estimated number of gallons discharged: Unknown
- What part of storage system has leaked? (circle all that apply)    A. Dispenser    B. Pipe    C. Fitting    D. Tank    E. Unknown
- Type of regulated substance discharged. (circle one)  
A. leaded gasoline    D. vehicular diesel    L. used/waste oil    V. hazardous substance includes pesticides, ammonia, chlorine and derivatives (write in name or Chemical Abstract Service CAS number)  
B. unleaded gasoline    F. aviation gas    M. diesel  
C. gasohol    G. jet fuel    N. new/used oil    Z. other (write in name) \_\_\_\_\_
- Cause of leak. (circle all that apply)  
A. Unknown    C. Loose connection    E. Functure    G. Spill    I. Other (specify) \_\_\_\_\_  
B. Spill    D. Corrosion    F. Installation failure    H. Overfill
- Type of financial responsibility. (circle one)  
A. Third party insurance provided by the state insurance contractor    C. Not applicable  
B. Self-insurance pursuant to Chapter 17-768.500 F.A.C.    D. None
- To the best of my knowledge and belief all information submitted on this form is true, accurate, and complete.

JAMES A. DANAWAY  
Printed Name of Owner, Operator or Authorized Representative

[Signature]  
Signature of Owner, Operator or Authorized Representative

**Site No. 90 City of Crystal River Public Works**  
1000 NW Sixth Avenue  
Crystal River, Florida  
FDEP I.D. No. 098518728



*Recd  
9/9/94*

CONTAMINATION ASSESSMENT REPORT ADDENDUM

for

CITY OF CRYSTAL RIVER  
MAINTENANCE GARAGE  
1000 N.W. SIXTH AVENUE  
CRYSTAL RIVER, FLORIDA  
FDER Facility ID #098518728 ← *FIVE*

August, 1994

for submittal to:

Florida Department of Environmental Protection  
Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

prepared for:

City of Crystal River  
Department of Public Works  
123 N.W. Highway 19  
Crystal River, FL 34428

prepared by:

EE&G, INC.  
11300 43rd Street North  
Clearwater, Florida 34622

EE&G Project Number: 40347-0003

*William H. Goulet 8-29-94*  
William H. Goulet, P.G.



## 1.0 INTRODUCTION

EE&G, Inc., formerly Enviropact Consultants, Inc. (Enviropact) was retained by the City of Crystal River, Florida, to perform supplemental Contamination Assessment (CA) tasks in accordance with Florida Administrative Code (FAC) Chapter 17-770 (Petroleum Contamination Site Cleanup Criteria) at the City of Crystal River Public Works Facility/Maintenance Garage, 1000 N.W. Sixth Avenue, Crystal River, Citrus County, Florida. The FDER facility ID number for this site is #098518728.

### 1.1 BACKGROUND

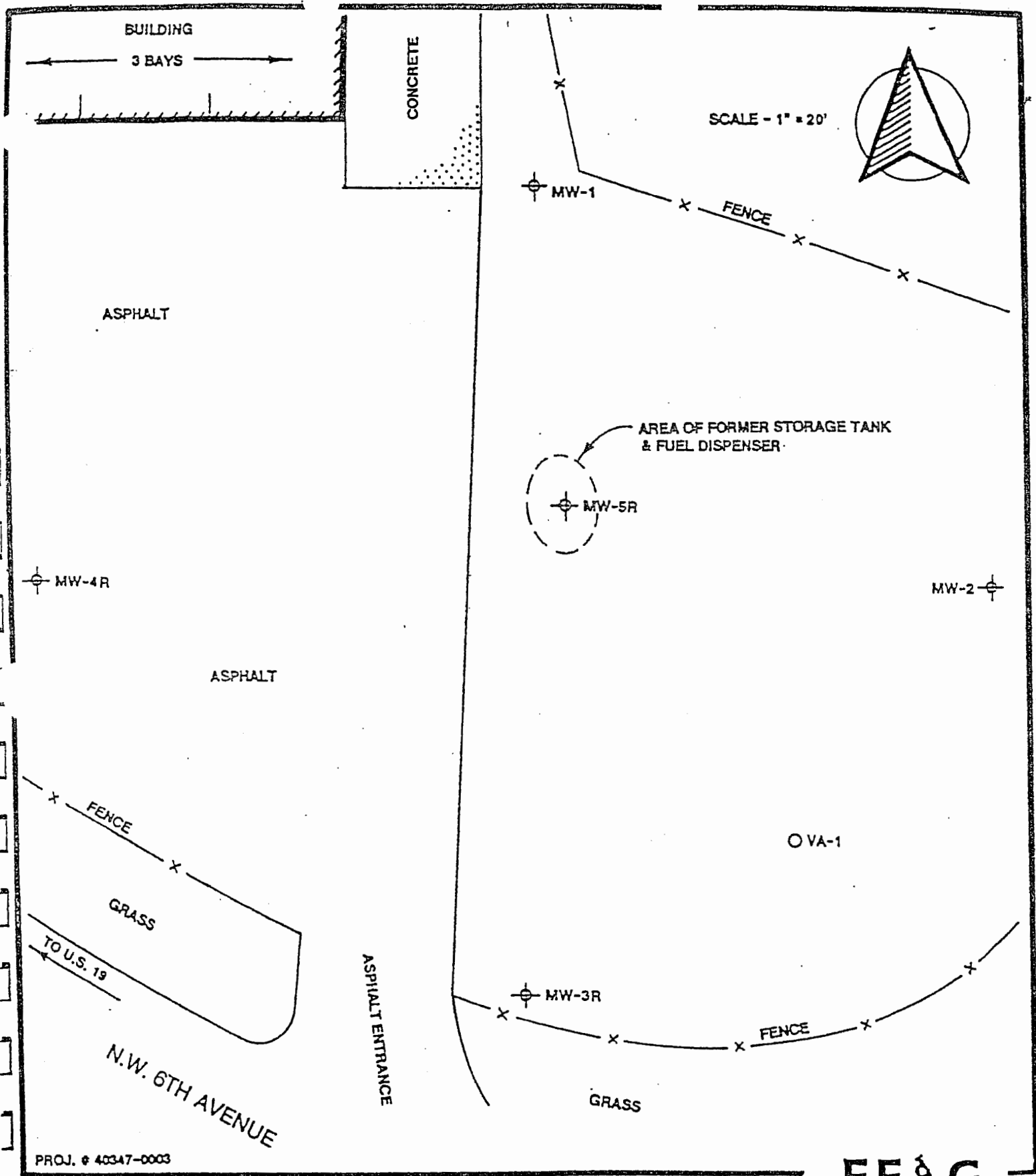
Enviropact performed a Contamination Assessment of the subject facility, and submitted a Contamination Assessment Report Addendum (CARA) to the FDER in February, 1992. The CARA identified "excessively contaminated" soil in the vicinity of the former UST vault at the subject site, and recommended removal of this soil as an Initial Remedial Action (IRA) activity. Following a review of the CAR Addendum document, in a letter dated March 6, 1992 (please see Attachment 1), the FDER recommended performing the proposed soil IRA, and collecting another round of groundwater samples from the existing monitoring wells. Key monitoring wells destroyed during soil removal activities would have to be replaced.

## 2.0 INITIAL REMEDIAL ACTION

On July 6-7, 1993, approximately six hundred seventy-nine (679) tons, or four hundred eighty-five (485) cubic yards, of "excessively contaminated" soil, as defined by FAC Chapter 17-770.200(2), was removed from the subject facility as an IRA activity. Concurrent with soil removal, six thousand three hundred (6,300) gallons of petroleum contaminated water was pumped from a eight by ten by six (8 X 10 X 6) foot deep sump excavated in the area of monitoring well MW-5 (please see Figure 1, Site Plan).

The soils were transported to the KLEENSOIL International, Inc., facility at 13838 Harlee Road in Palmetto, Florida, for thermal treatment. The water was pumped into a tanker truck and disposed of at Tim's Oil Recovery (HOWCO) in St. Petersburg, Florida.

An IRA report form with supporting documentation (site plan, copies of laboratory analyses of soil sample disposal profile analyses, summary of headspace analyses utilized to identify "excessively contaminated" soils, copies of transport/disposal manifests) was submitted to FDEP for review, and approved by the Bureau of Waste Cleanup on August 26, 1993 (please see Attachment 2).



**FIGURE 1: SITE PLAN**  
 CITY OF CRYSTAL RIVER  
 1000 N.W. 6TH AVENUE  
 CRYSTAL RIVER, FLORIDA

**LEGEND:**  
 ⊕ MW-1: MONITORING WELL  
 ○ VA-1: VERTICAL ASSESSMENT WELL

**EE&G**  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663  
 PREPARED BY: kw  
 DATE: 7-21-93  
 REVISED: 7-21-94

### 3.0 SUPPLEMENTAL CONTAMINATION ASSESSMENT

#### 3.1 MONITORING WELL INSTALLATION

Two (2) monitoring wells, MW-4 and MW-5, were destroyed during the IRA event. A third well, MW-3, was damaged and could not be sampled. On June 16, 1994, MW-3, 4 and 5 were replaced with new wells MW-3R, 4R and 5R installed at approximately the same locations.

The wells were installed by National Petroleum Testing Consultants, Inc. (NPTC), of Largo, Florida, using a truck mounted drilling rig equipped with eight (8) inch hollow stem augers. The well installations were initiated by using hand operated post hole diggers to a depth of approximately four (4) feet below grade. This allowed buried utilities to be safely identified. The water table was encountered approximately three (3) feet below grade.

Hollow stem augers were then used to advance borings to a total depth of twelve (12) feet below grade. Monitoring wells consisting of two (2) inch Schedule 40 PVC pipe were installed. Ten (10) foot long screened intervals extend from the well bottoms to two (2) feet below grade. The annulus of each well was filled with clean 20/30 silica sand to a depth of one (1) foot above the screened interval. A six (6) inch layer of bentonite was placed above the sand. The remaining annular volume was filled with neat Portland cement grout. The wells were completed with locking caps and traffic bearing eight (8) inch steel manhole covers. Well

completion diagrams for MW-3R, 4R and 5R are presented in Attachment 3.

### 3.2 SUPPLEMENTAL SOIL ASSESSMENT

Supplemental soil assessment in accordance with FAC 17-770.200(2), was performed in conjunction with the monitoring well installation event. Soil samples were collected from each monitoring well boring at one and one half (1.5) and three (3) feet below grade, and placed in sixteen (16) ounce glass jars, which were then sealed with aluminum foil. Any volatile compounds present in the soil were allowed to "degas" into the headspace of the jar. A Foxboro Century Model 128 Organic Vapor Analyzer (OVA) instrument was then employed to measure the level of hydrocarbon vapor in the headspace of the jar.

The OVA utilized for the headspace analyses was fitted with a charcoal filter. The filter was intended to allow discrimination between suspected petroleum hydrocarbons and naturally occurring methane in the soil vapors. With the filter removed, the FID measured the sum of all hydrocarbons in the soil vapor in parts per million (ppm). With the filter in place, only methane was measured, as petroleum hydrocarbons were removed by the filter.

The level of suspected petroleum hydrocarbons in the soil vapor was obtained by subtracting the filtered reading from the unfiltered reading for each sampling location. The unfiltered, filtered and

total headspace readings obtained from each sampling location are summarized in Table 3.2.

TABLE 3.2  
 City of Crystal River Maintenance Garage  
 1000 N.W. Sixth Avenue, Crystal River, Florida  
 SUMMARY OF SOIL HEADSPACE ANALYSES

<u>location</u>	<u>depth (BGS)</u>	Headspace Readings (parts per million)			<u>total</u>	<u>odor</u>
		<u>w/o filter</u>	<u>w/filter</u>			
MW-3R	1.5'	0	-	0	none	
	3.0'	0	-	0	none	
MW-4R	1.5'	200	200	0	none	
	3.0'	100	100	0	none	
MW-5R	1.5'	520	320	200	strong	
	3.0'	>1000	>1000	---	strong	

Foxboro 128 OVA (FID)  
 all samples analyzed on site 06/16/94

On the basis of the headspace readings and odors, all of the drill cuttings (soil) from MW-5R were containerized in two (2) 17H-55 DOT drums.

### 3.2.1 DISPOSAL PROFILE ANALYSES

A composite sample was collected from the drums of drill cuttings (soil) from MW-5R, placed in the appropriate sample containers (please see Attachment 4) and transported to the GEOS, Inc., laboratory in Tampa, Florida, for disposal profile analyses by EPA methods 8010, 8020, 9073, and for total metals Arsenic, Barium, Cadmium, Chromium, Lead, Mercury, Selenium and Silver. The results of these analyses are summarized in Table 3.2.1. The complete

results of the disposal profile analyses are presented in GEOS, Inc., laboratory report #T4-07-083 (please see Attachment 5).

---

TABLE 3.2.1  
City of Crystal River Maintenance Garage  
1000 N.W. Sixth Avenue, Crystal River, Florida  
SUMMARY OF DISPOSAL PROFILE ANALYSES

---

<u>Analyte</u>	<u>Drum Composite</u>
EPA method 8010 Halogenated Volatile Organics, all	<100 ug/kg
EPA method 8020 Methyl-Tert-Butyl-Ether	960 ug/kg
Benzene	<100 ug/kg
Toluene	1,060 ug/kg
Ethylbenzene	1,070 ug/kg
Xylenes, total	5,600 ug/kg
EPA method 9073 Total Recoverable Hydrocarbons	250 mg/kg
RCRA metals	
Barium, total	29.5 mg/kg
Chromium, total	40 mg/kg

sample collected 07/07/94  
GEOS, Inc., Laboratory Report #T4-07-083

---

### 3.3 SUPPLEMENTAL GROUNDWATER ASSESSMENT

On July 7, 1994, groundwater samples were collected from all site monitoring wells, including the replacement wells. A field cleaned equipment blank was also collected. The groundwater samples and blanks were placed in the appropriate sample containers with preservative (please see Attachment 4) and transported in an iced cooler under Chain of Custody to the GEOS, Inc., laboratory in Tampa, Florida, where they were analyzed for Purgeable Aromatics

(with MTBE) detectable by EPA method 602, and Polynuclear Aromatic Hydrocarbons detectable by EPA method 610. All sampling was performed in accordance with the EE&G approved Comp QAPP 93-0189G.

The results of the groundwater sample analyses are summarized in Table 3.3. The complete results of the groundwater sample analyses (GEOS, Inc. Laboratory Report #T4-07-083), along with copies of the field sampling worksheets and Chain of Custody form, are presented in Attachment 5.

TABLE 3.3  
City of Crystal River Maintenance Garage  
1000 N.W. Sixth Avenue, Crystal River, FL  
SUMMARY OF GROUNDWATER ANALYTICAL DATA

Analyte	MW-1	MW-2	MW-3R	MW-4R	MW-5R	VA-1
EPA 602						
MTBE	<5	<5	5.4	8.0	3,780	<5
Benzene	<1	<1	<1	<1	4,160	<1
Toluene	<1	<1	<1	<1	5,550	<1
Ethylbenzene	<1	<1	<1	<1	1,460	<1
Xylenes, total	<1	<1	<1	<1	7,200	<1
Total VOAs	<1	<1	<1	<1	18,370	<1
EPA 610						
Naphthalene	<10	<10	<10	<10	430	<10
1-Methyl Naphthalene	<10	<10	<10	<10	140	<10
2-Methyl Naphthalene	<10	<10	<10	<10	240	<10
Total Naphthalenes	<10	<10	<10	<10	810	<10

all values in ug/L  
samples collected 07/07/94  
GEOS, Inc., Laboratory Report #T4-07-083

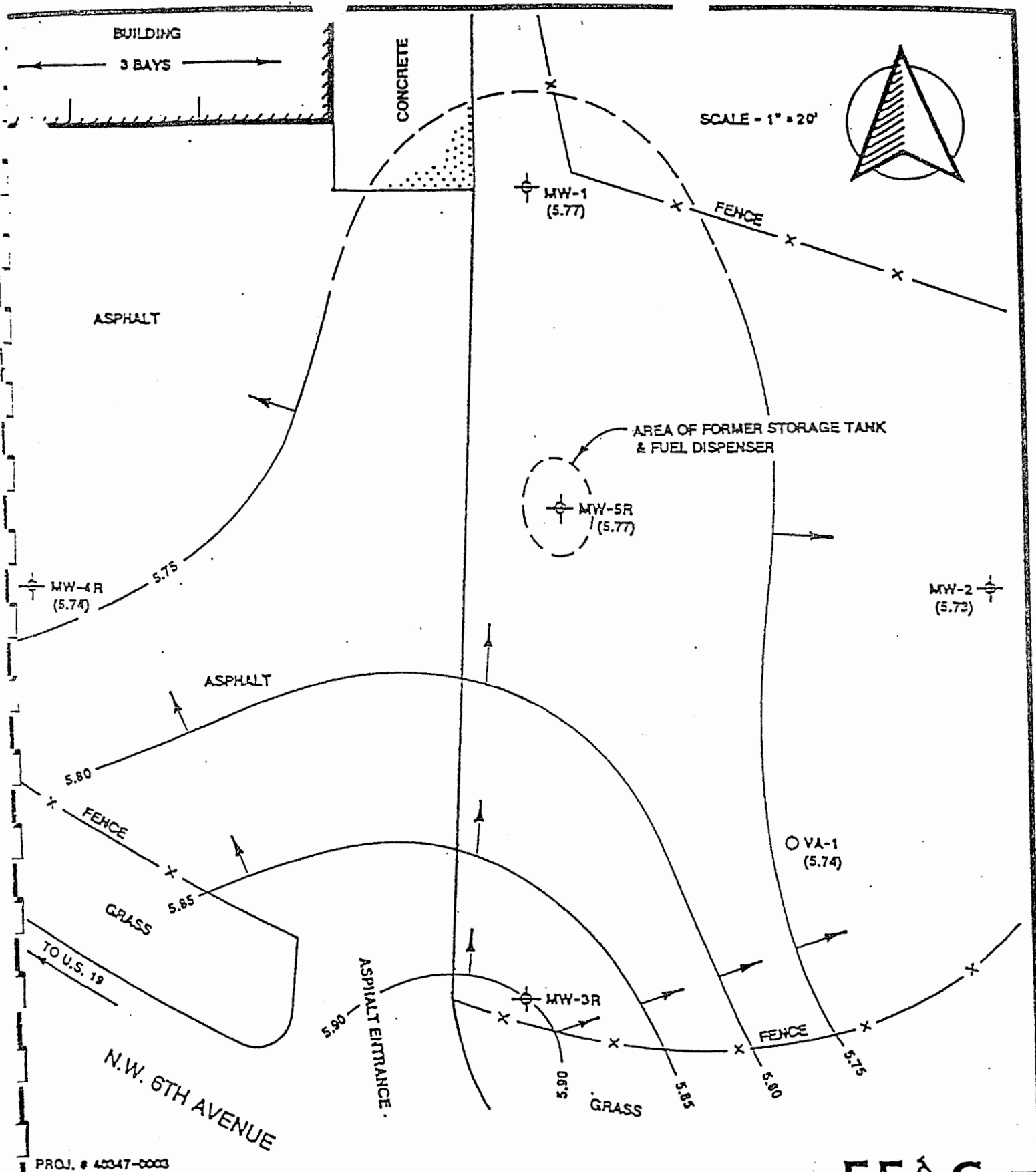


### 3.4 GROUNDWATER FLOW DIRECTION

Following installation, replacement wells MW-3R, 4R and 5R were surveyed using a rod and level, and tied into the existing casing elevation survey by backshooting MW-2. Depth to water measurements in all wells were obtained during the July 7, 1994, groundwater sampling event. These data were combined to obtain groundwater elevations in each well (please see Water Table Elevation Calculation Sheet in Attachment 6).

The water table elevations were plotted on the Site Plan and contoured (please see Figure 2, Groundwater Elevation Contour Map). Groundwater appears to flow radially away from a local high in the area of MW-3R. This is very similar to the pattern of groundwater flow depicted in the Groundwater Elevation Contour Map presented in the 1992 CARA submittal.

It should be reiterated that tidal influence on groundwater flow at the subject site was shown by data presented in Section 2.5 of the 1992 CARA submittal. Water levels in wells were found to fluctuate by as much as 0.70 feet over a 24-hour period.



**FIGURE 2: GROUNDWATER ELEVATION CONTOUR MAP**  
 CITY OF CRYSTAL RIVER  
 100 N.W. 6TH AVENUE  
 CRYSTAL RIVER, FLORIDA

**EE & G**  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663

**LEGEND:**  
 ⊕ MW-1: MONITORING WELL  
 ○ VA-1: VERTICAL ASSESSMENT WELL  
 — 5.85 — : GROUNDWATER ELEVATION (IN FEET ABOVE MSL)

PREPARED BY: kw  
 DATE: 7-21-93  
 REVISED: 7-21-94

#### 4.0 CONCLUSIONS AND RECOMMENDATIONS

Methyl-Tert-Butyl-Ether (MTBE), Benzene, total VOAs and total Naphthalenes were found to be present in the samples collected from MW-5R above FAC 17-770.730(5)(a)2 target levels. With the exception of low levels of MTBE detected in samples collected from MW-3R (5.4 ug/L) and MW-4R (8.0 ug/L), no compounds detectable by the analytical methodologies employed were found to be present above detection limits in any of the other groundwater samples analyzed, or in the equipment blank.

EE&G suggests that a short-term groundwater recovery strategy or limited scope Remedial Action Plan (RAP) be formulated for the subject site, pursuant to the FDEP Engineering Support Section September 10, 1993, ESS-9 Guidelines document. Short-term groundwater recovery and treatment would be performed in an effort to achieve No Further Action or Monitoring Only (NFA/MO) criteria.



# City of Crystal River

123 North West Highway 19 // Crystal River, Florida 34428 // Telephone (904) 795-4216

August 13, 1993

*Rec'd  
8/16/93*

Mr. Richard Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention Bureau  
1300 South Lecanto Highway  
Lecanto, FL 32661

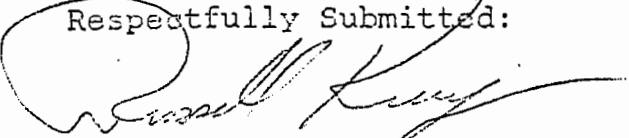
RE: Initial Remedial Action Report  
City of Crystal River-Public Works Facility  
1000 Northwest 6th Avenue  
Crystal River, Florida  
FDEP Facility I.D. #09852728  
*09852728*

Enclosed please find a copy of the completed Initial Remedial Action Report for the above referenced facility. This report is being submitted in an effort to satisfy the requirements of Chapters 17-770.630(1)14; 17-773.500[1](a)4; and 17-773.500[2](a)4 Florida Administrative Code.  
For clarification on any technical matters relating to the IRA, please notify:

Enviropact/Evans Environmental, Inc.  
11300 43rd Street North  
Clearwater, FL 34622  
Attn: Darrin McAllister - Project Manager

Also, we would appreciate a copy of all correspondences relating to the IRA activities performed on site and the subsequent review and approval process.

Respectfully Submitted:



Russell Kreager  
Public Works Director

PETROLEUM CONTAMINATION  
INITIAL REMEDIAL ACTION REPORT FORM

An Initial Remedial Action report, summarizing the initial remedial action (IRA), should be prepared to satisfy the requirements of Chapters 17-770.630(1)14; 17-773.500(1)(a)4; and 17-773.500(2)(a)4, Florida Administrative Code, (FAC). This form may be used for the IRA report. The report should be sent to the appropriate local program or:

Florida Department of Environmental Regulation  
Bureau of Waste Cleanup  
Engineering Support Section  
2600 Blair Stone Road  
Tallahassee, FL 32399-2400

I. FACILITY NAME: City of Crystal River - Public Works Facility  
Facility Address: 1000 northwest 6th Ave., Crystal River, Florida  
DER Facility Number (if applicable): 09852728  
Date IRA Initiated: 7/6/93 Date IRA Completed: 7/7/93

II. FREE PRODUCT RECOVERY

A. Type(s) of Product Discharged: N/A

B. Quantity

1. Estimated Gallons Lost: N/A
2. Gallons Recovered: N/A through N/A (date)
3. Attach Exhibit Indicating Amount of Product Recovered, Dates and Cumulative Totals.

C. Attach a Scaled Site Plan, Indicating the Locations and Product Thickness in Wells, Boreholes, Excavations, or Utility Conduits and Wells Utilized for Recovery of Free Product.

D. Method of Product Recovery: N/A  
\_\_\_\_\_  
\_\_\_\_\_

E. Type of Discharge During Product Recovery: N/A  
\_\_\_\_\_

F. Type of Treatment, i.e., Oil/Water Separator: N/A

---

G. Attach Written Proof of Proper Disposal of Recovered Product: N/A

---

### III. SOIL EXCAVATION

NOTE: Soil shall be defined as excessively contaminated using the procedure stated in Chapter 17-770.200(2), FAC. Representative soil sampling shall be performed as close to the time of excavation as possible, but at no time shall exceed three (3) months prior to the start of excavation. Stockpiled soils greater than thirty (30) days on site waiting for treatment and disposal, must be re-sampled immediately prior to disposal to assure soils are still excessively contaminated.

If soil sampling data indicates that the amount of soil that is excessively contaminated exceeds 1500 cubic yards, treatment of all excessively contaminated soil at the site shall be addressed in a remedial action plan, and no soil IRA activities shall be performed except for the removal of soils in the immediate vicinity of the tanks.

Only soil above the ambient water table at the time of excavation can be considered as excessively contaminated soil.

Unless the established weight per unit volume of 1.4 tons/cubic yard (as referenced in FAC Rule 17-775) is used for the excavated soil, the weight per unit volume must be determined by a field test (in which an accurately measured volume of soil is weighed) at the time of excavation.

A. Volume of Contaminated Soil Excavated in Cubic Yards: 485.5 yd<sup>3</sup>. Dimensions Including Depth of Excavation(s): Due to the shape of the excavation, a "best fit" circle (with a 37 foot radius) was used to estimate area (area = 0.7854 x D<sup>2</sup>). Average depth of excavation was three (3) feet below land surface.

NOTE: Attach written proof from the Department in the form of an Alternate Procedure Approval Order authorizing excavating over 1500 cubic yards if applicable. Authorization must be prior to the excavation of soils.

B. Type(s) of Product in Soil: Diesel Fuel (vehicular)

---

- C. Depth (ft) to Ambient Groundwater at the Time of Excavation(s): 3.5 feet below land surface
- D. Did Dewatering (i.e. groundwater depression) Occur at Time of Excavation?: NO
- E. Type of Instrument and Method Used to Determine Excessive Soil Contamination: Foxboro Century 128 OVA (FID) - headspace analyses as prescribed in FAC 17-770.200(2) - 50 ppm criteria utilized for defining "excessively contaminated" soils.
- F. Attach a table that compares the OVA-FID readings taken with charcoal filter verses readings without filter. Include vertical depths for each sample.
- G. Using the OVA procedure for defining excessively contaminated soil as referenced in Rule 17-770.200(2), FAC, include a scaled site plan with the information listed below:
1. Location of excavation, old tank farm, dispensers, and product lines, present tank farm, and all soil samples. The corresponding OVA-FID readings for each soil sample (with charcoal filter and without) and its depth must be given.
  2. Sampling Procedure is as follows:  
  
Start sampling in a location where it is suspected that excessively contaminated soil exists. Sample from the first soil boring outward in a grid pattern, at five (5) to ten (10) foot intervals, until the perimeter of the excessively contaminated soil plume is defined. Vertical sampling should be performed starting approximately at the initial area of contamination and continued at three (3) foot intervals, or fraction thereof, until a depth approximately one (1) foot above the water table is reached.
- H. Copies of Laboratory Analyses for Pre Treatment Soil Samples as Required in Chapter 17-775.410(3), Table II, FAC Must be Attached.
- I. Were Tanks Replaced at this Site?: NO

IV. SOIL TREATMENT AND DISPOSAL

A. Method of Treatment of Excessively Contaminated Soil: Thermal Treatment (Rotary Kiln)

---

B. For Off Site Treatment and Disposal at Permitted STTF, Land Farms, or Landfills Attach Documentation From the Treatment Facility Which Confirms the Weight or Volume of Soil Treated and Date Received.

For Other Treatment and Disposal Methods (i.e. On-Site Land Farming, Bioremediation), Attach Post Treatment Laboratory Analyses for Each 250-300 Cubic Yards of Treated Soil in Accordance With Chapter 17-775.400 and the "Guidelines for Assessment and Remediation of Petroleum Contaminated Soils", Edition February 1991 or Most Current Revision.

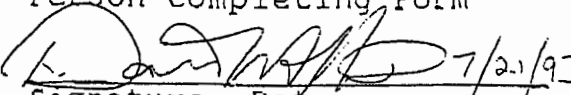
For Mobile Thermal Treatment Units, Attach Laboratory Analysis per Chapter 17-775(5), FAC.

C. Method of Disposal of Contaminated Soil and Indicate Recipient and Address: KLEENSOIL, International, Inc. 13838 Harlee Road, Palmetto, Florida 34221

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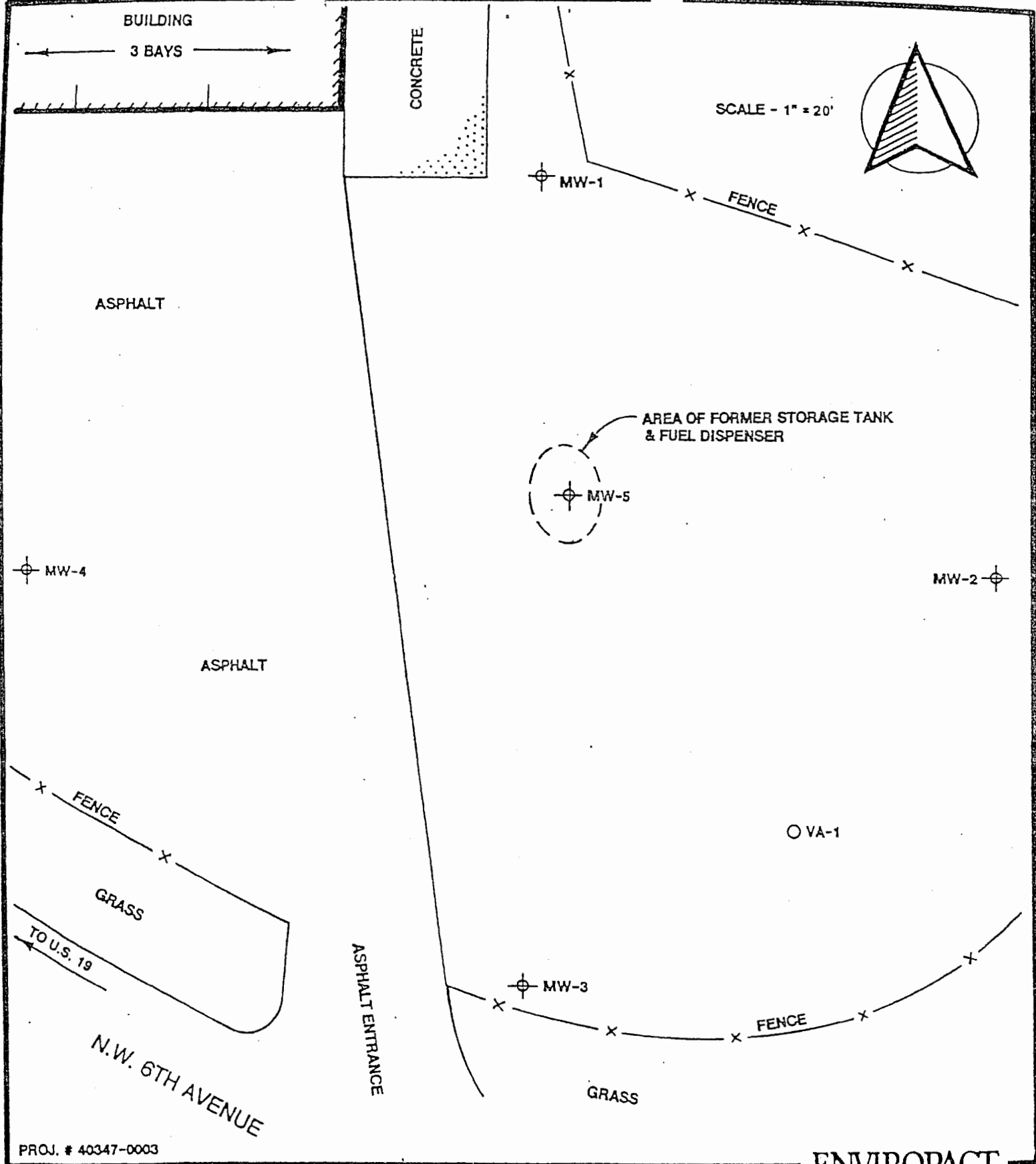
V. ADDITIONAL COMMENTS: Six thousand three hundred (6300) gallons of petroleum contaminated water was pumped from an 8'x10'x6' deep "sump" excavated in the area of monitoring well MW-5. Water was pumped directly into a tanker truck on site and disposed of at Tims Oil Recovery (HOWCO) of St. Petersburg, FL' (Manifest attached)

Darrin McAllister  
Person Completing Form

  
Signature, Date

7/21/93 Project Manager - Enviropact/Evans Environmental  
Title, Affiliation





PROJ. # 40347-0003

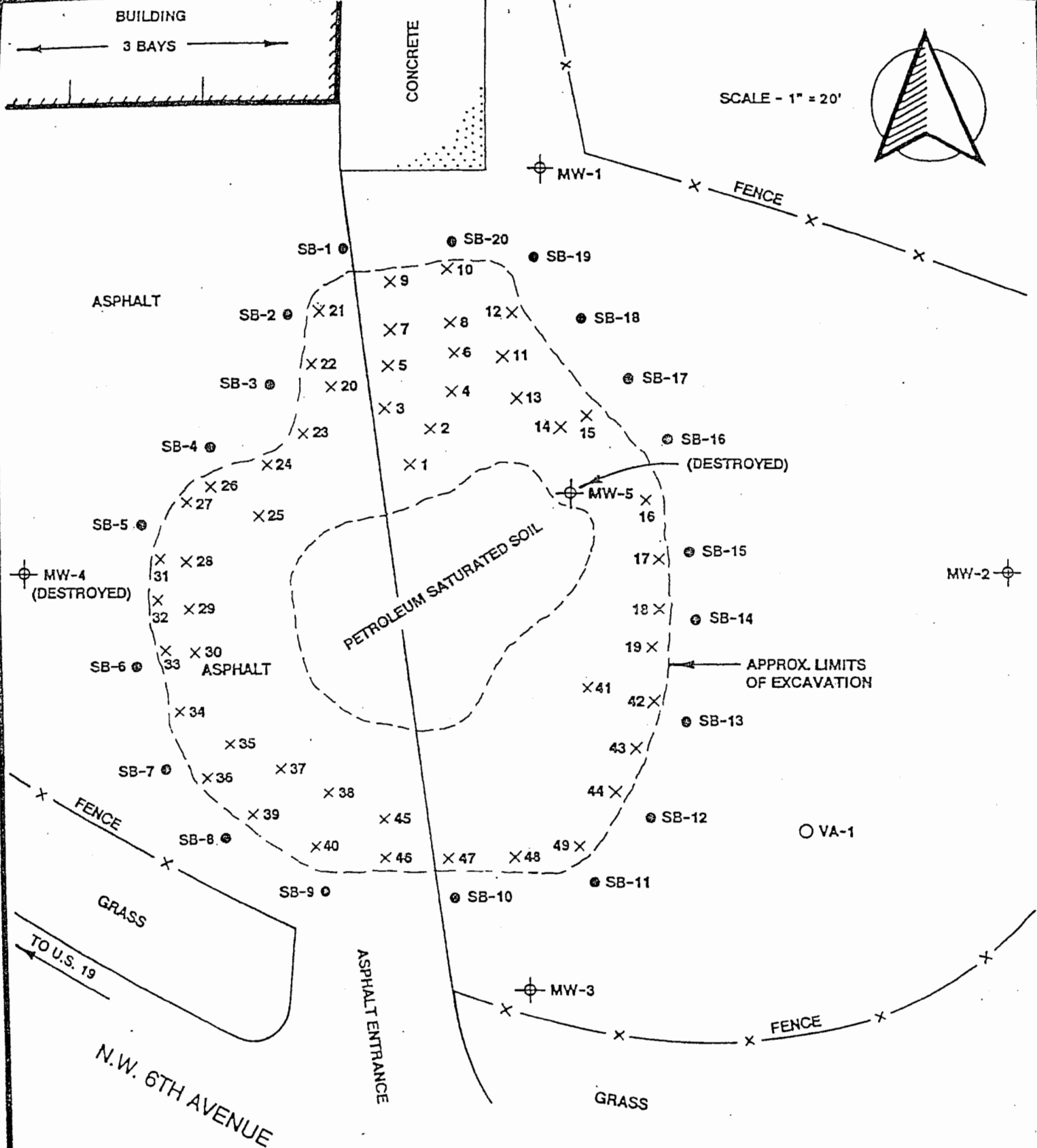
**ENVIROPACKT**

11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663

PREPARED BY: kw  
 DATE: 7-21-93

**FIGURE 1: SITE PLAN**  
**CITY OF CRYSTAL RIVER**  
**1 N.W. 6TH AVENUE**  
**CRYSTAL RIVER, FLORIDA**

**LEGEND:**  
 ⊕ MW-1: MONITORING WELL  
 ○ VA-1: VERTICAL ASSESSMENT WELL



PROJ. # 40347-0003

**ENVIROPACT**

**FIGURE 2: LIMITS OF SOIL IRA EXCAVATION (JULY 6-7, 1993)**

**CITY OF CRYSTAL RIVER  
1 ) N.W. 6TH AVENUE  
CRYSTAL RIVER, FLORIDA**

11300 43rd Street North  
Clearwater, Florida 34622-4900  
(813) 573-9663

PREPARED BY: kw  
DATE: 7-21-93

- LEGEND:**
- ⊕ MW-1: MONITORING WELL
  - VA-1: VERTICAL ASSESSMENT WELL
  - SB-1: SOIL BORING LOCATION
  - X2: SOIL SAMPLE LOCATION

City of Crystal River - Public Works Facility  
 1000 Northwest 6th Avenue, Crystal River, FL  
 SUMMARY OF IRA ACTIVITY SOIL HEADSPACE ANALYSES

<u>location</u>	<u>depth</u>	<u>w/o filter</u>	<u>w/filter</u>	<u>total</u>	<u>odor</u>
1	1.5'	>1000	100	>900	strong
2	1.5'	>1000	0	>1000	strong
3	1.5'	850	200	650	strong
4	1.5'	>1000	0	>1000	strong
5	1.5'	600	0	600	strong
6	1.5'	>1000	200	>800	strong
7	1.5'	200	120	80	strong
8	1.5'	120	40	80	strong
9	1.5'	35	10	25	none
10	1.5'	40	0	40	slight
11	1.5'	60	0	60	slight
12	1.5'	20	0	20	none
13	1.5'	800	200	600	strong
14	1.5'	350	20	330	strong
15	1.5'	10	0	10	none
16	1.5'	0	0	0	none
17	1.5'	10	0	10	none
18	1.5'	0	0	0	none
19	1.5'	30	0	30	slight
20	1.5'	130	40	90	moderate
21	1.5'	20	10	10	none
22	1.5'	0	0	0	none
23	1.5'	25	10	15	none
24	1.5'	10	0	10	none
25	1.5'	70	0	70	slight
26	1.5'	100	20	80	moderate
27	1.5'	30	0	30	none
28	1.5'	100	0	100	slight
29	1.5'	250	100	150	strong
30	1.5'	320	150	170	strong
31	1.5'	10	0	10	none
32	1.5'	30	0	30	none
33	1.5'	10	10	0	none
34	1.5'	120	100	20	none
35	1.5'	400	220	180	strong
36	1.5'	100	80	20	none
37	1.5'	250	100	150	strong
38	1.5'	420	200	220	strong
39	1.5'	0	0	0	none

all readings in parts per million (ppm)  
 (continued)

City of Crystal River - Public Works Facility  
 1000 Northwest 6th Avenue, Crystal River, FL  
 SUMMARY OF IRA ACTIVITY SOIL HEADSPACE ANALYSES  
 (continued- page 2)

<u>location</u>	<u>depth</u>	<u>w/o filter</u>	<u>w/filter</u>	<u>total</u>	<u>odor</u>
40	1.5'	100	60	40	none
41	1.5'	220	80	140	strong
42	1.5'	0	0	0	none
43	1.5'	0	0	0	none
44	1.5'	20	0	20	none
45	1.5'	100	20	80	slight
46	1.5'	0	0	0	none
47	1.5'	0	0	0	none
48	1.5'	0	0	0	none
49	1.5'	0	0	0	none
SB-1	1'	>1000	>1000	0	none
	2'	>1000	>1000	0	none
SB-2	1'	800	800	0	none
	2'	850	850	0	none
SB-3	1'	80	80	0	none
	2'	100	100	0	none
SB-4	1'	0	0	0	none
	2'	0	0	0	none
SB-5	1'	0	0	0	none
	2'	0	0	0	none
SB-6	1'	0	0	0	none
	2'	0	0	0	none
SB-7	1'	0	0	0	none
	2'	0	0	0	none
SB-8	1'	0	0	0	none
	2'	180	180	0	none
SB-9	1'	0	0	0	none
	2'	0	0	0	none

all readings in parts per million (ppm)  
 (continued)

City of Crystal River - Public Works Facility  
 1000 Northwest 6th Avenue, Crystal River, FL  
 SUMMARY OF IRA ACTIVITY SOIL HEADSPACE ANALYSES  
 (continued- page 3)

<u>location</u>	<u>depth</u>	<u>w/o filter</u>	<u>w/filter</u>	<u>total</u>	<u>odor</u>
SB-10	1'	60	60	0	none
	2'	120	120	0	none
SB-11	1'	0	0	0	none
	2'	20	20	0	none
SB-12	1'	0	0	0	none
	2'	600	600	0	none
SB-13	1'	0	0	0	none
	2'	10	10	0	none
SB-14	1'	0	0	0	none
	2'	20	20	0	none
SB-15	1'	0	0	0	none
	2'	0	0	0	none
SB-16	1'	0	0	0	none
	2'	0	0	0	none
SB-17	1'	0	0	0	none
	2'	0	0	0	none
SB-18	1'	0	0	0	none
	2'	0	0	0	none
SB-19	1'	0	0	0	none
	2'	0	0	0	none
SB-20	1'	0	0	0	none
	2'	0	0	0	none

all readings in parts per million (ppm)  
 Foxboro Century 128 OVA (FID)  
 all analyses performed on site 7/6-7/93



# City of Crystal River

123 North West Highway 19 // Crystal River, Florida 32629 // Telephone (904) 795-4216

## SPECIFICATIONS REMOVAL OF CONTAMINATED SOIL

BID #92-14

JOHN LETTOW, DIRECTOR  
FACILITY MAINTENANCE  
CITY HALL  
668 N.W. FIRST AVENUE  
CRYSTAL RIVER, FL 34428

## SITE:

Public Works Facility, D.E.R. I.D. #09852728, located at 1000 N.W. Sixth Avenue, Crystal River, Florida. Attachment #1 includes maps which indicate the extent of plume and explains groundwater elevation which is tidally influenced.

## REGULATIONS:

The Contractor shall provide a copy of their Department of Environmental Regulations approved license along with a copy of insurance and a list of other cities to which work was provided.

The Contractor shall follow all requirements set by F.A.C. Chapter 17-770 and 17-775.

## SCOPE OF WORK:

Contractor to provide all equipment for the removal, treatment and backfill of approximately 800 tons of contaminated soil at the subject facility.

Prior to the initiation of backfilling activities, the Contractor shall pump standing water from the excavation. No backfilling may occur before the completion of pumping activities.

Contractor shall remediate the soil via thermal treatment (incineration) as specified in the F.A.C. Chapter 17-775. The stationary or mobil thermal treatment unit to be used must be disclosed to the City before any work begins, and must be permitted in accordance with F.A.C. Chapter 17-775.300.

Contractor shall provide documentation that any waste hauler used is approved and licensed by the Department of Environmental Regulation.

Soil shall be treated to meet or exceed the clean soil standards set forth in F.A.C. Chapter 17-775.400. Treatment certificates and clean soil analytical. Results shall be provided to the City before final payment is made.

Thermally treated soils native to the subject site and meeting clean soil standards may be used as backfill. If imported soil is to be used at the subject site as backfill, such soil shall be tested according to F.A.C. Chapter 17-775.410. The City reserves the right to reject the use of any soil based on said analytical data.

All soil used in the backfilling process shall be compacted to a minimum of 90% relative compaction.

An Environmental Consultant will be on site during all work to provide oversight and inspection on behalf of the City of Crystal River.

Attachment #2 contains preburn analytical results for the subject site.

PERFORMANCE BOND:

A Performance Bond will be required for the total amount of the project or provide an irrevocable letter of credit or cash from a bank.

BID PROPOSAL

Fee per ton for initial 800 tons including required laboratory analysis mobilization fees, permitting fees, etc. \_\_\_\_\_per ton

Cost per ton for treatment of additional soil over 800 tons. \_\_\_\_\_per ton

Cost for excavation backfilling and compaction based on 800 yard excavation \_\_\_\_\_per ton

TOTAL COST \$ \_\_\_\_\_

Miscellaneous fees (such as disposal of contaminated water and costs for equipment and labor). \_\_\_\_\_

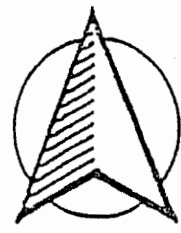
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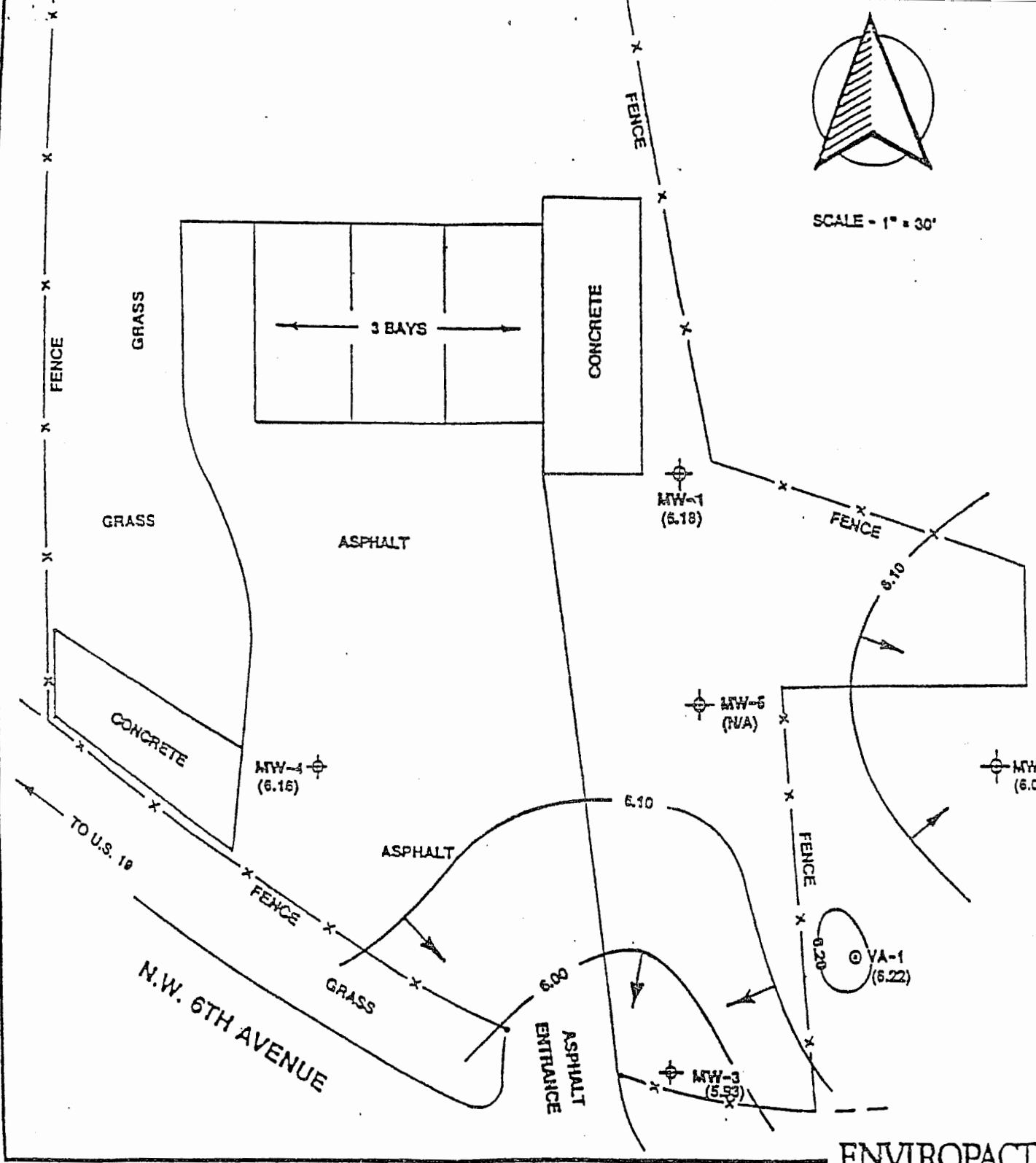
Copies of the Contamination Assessment Report and Contamination Assessment Report Addendum may be viewed by appointment at the City of Crystal River City Hall, 668 N.W. 1st Avenue, Crystal River, FL 34428.

Any questions regarding these bid specifications, call John Lettow at 904-795-4216.





SCALE - 1" = 30'



ENVIROPACK

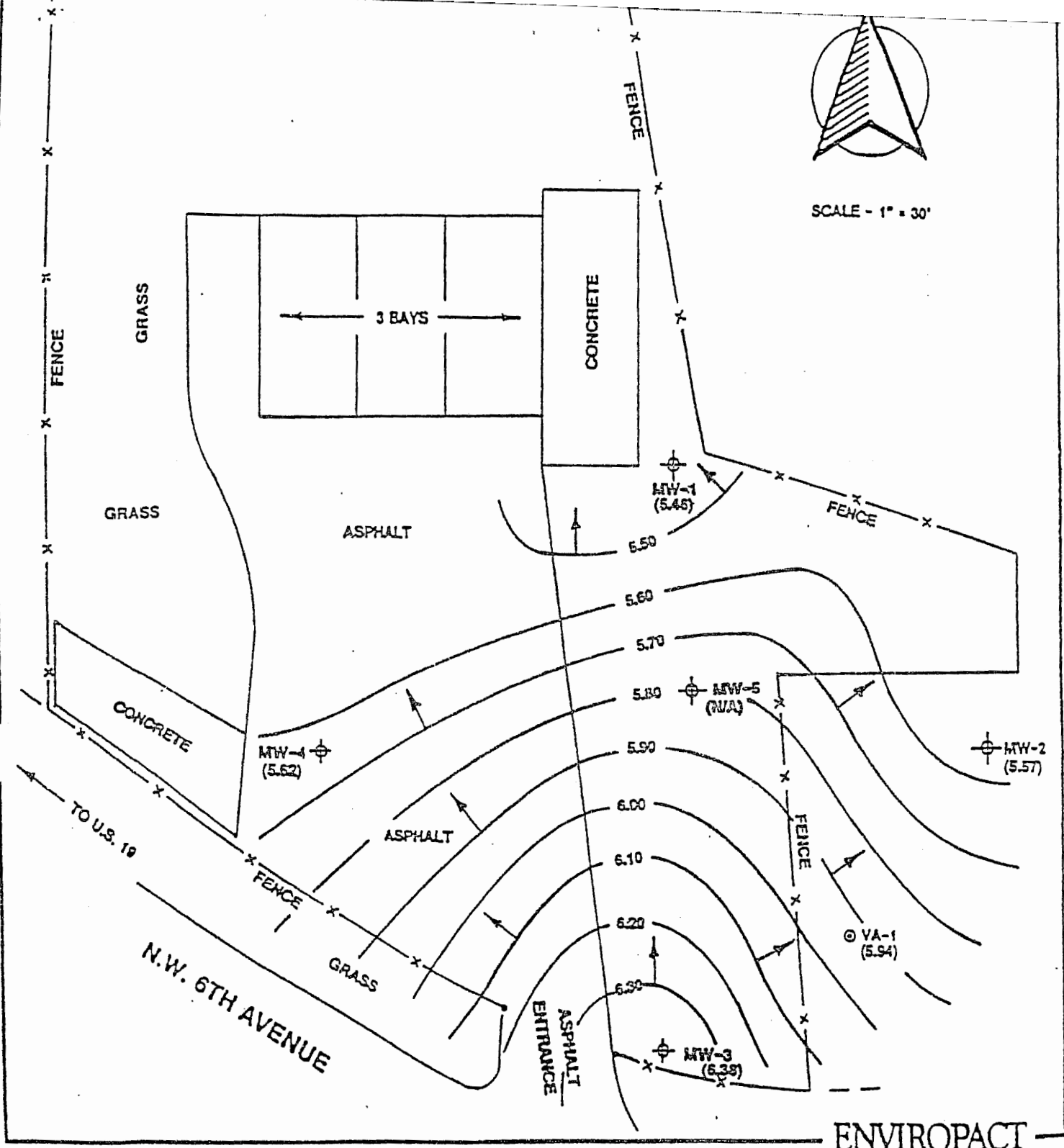
**FIGURE 2: GROUNDWATER ELEVATION CONTOUR MAP**  
**CITY OF CRYSTAL RIVER**  
**1000 N.W. 6TH AVENUE**  
**CRYSTAL RIVER, FLORIDA**

DATA FROM:  
 9/17/91 - CASING ELEVATION SURVEY  
 9/17/91 - GAUGING EVENT

11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663

**LEGEND**

- MW-1: MONITOR WELL
- 6.10 — GROUNDWATER ELEVATION (FT. ABOVE MSL)
- : DIRECTION OF GROUNDWATER FLOW



**FIGURE 1: GROUNDWATER ELEVATION CONTOUR MAP**  
**CITY OF CRYSTAL RIVER**  
**1000 N.W. 6TH AVENUE**  
**CRYSTAL RIVER, FLORIDA**

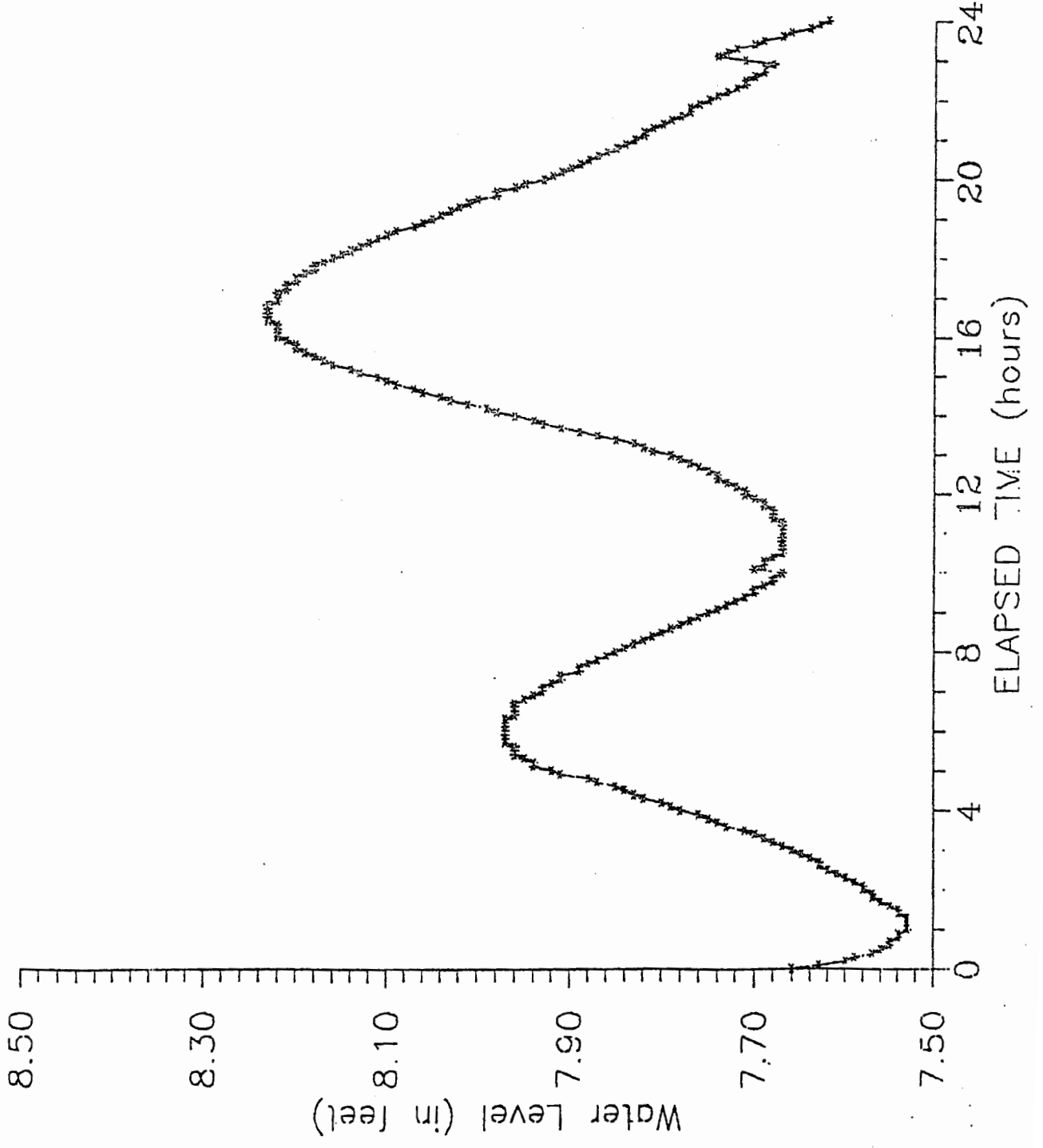
DATA FROM:  
 8/17/91 - CASING ELEVATION SURVEY  
 3/25/91 - GAUGING EVENT

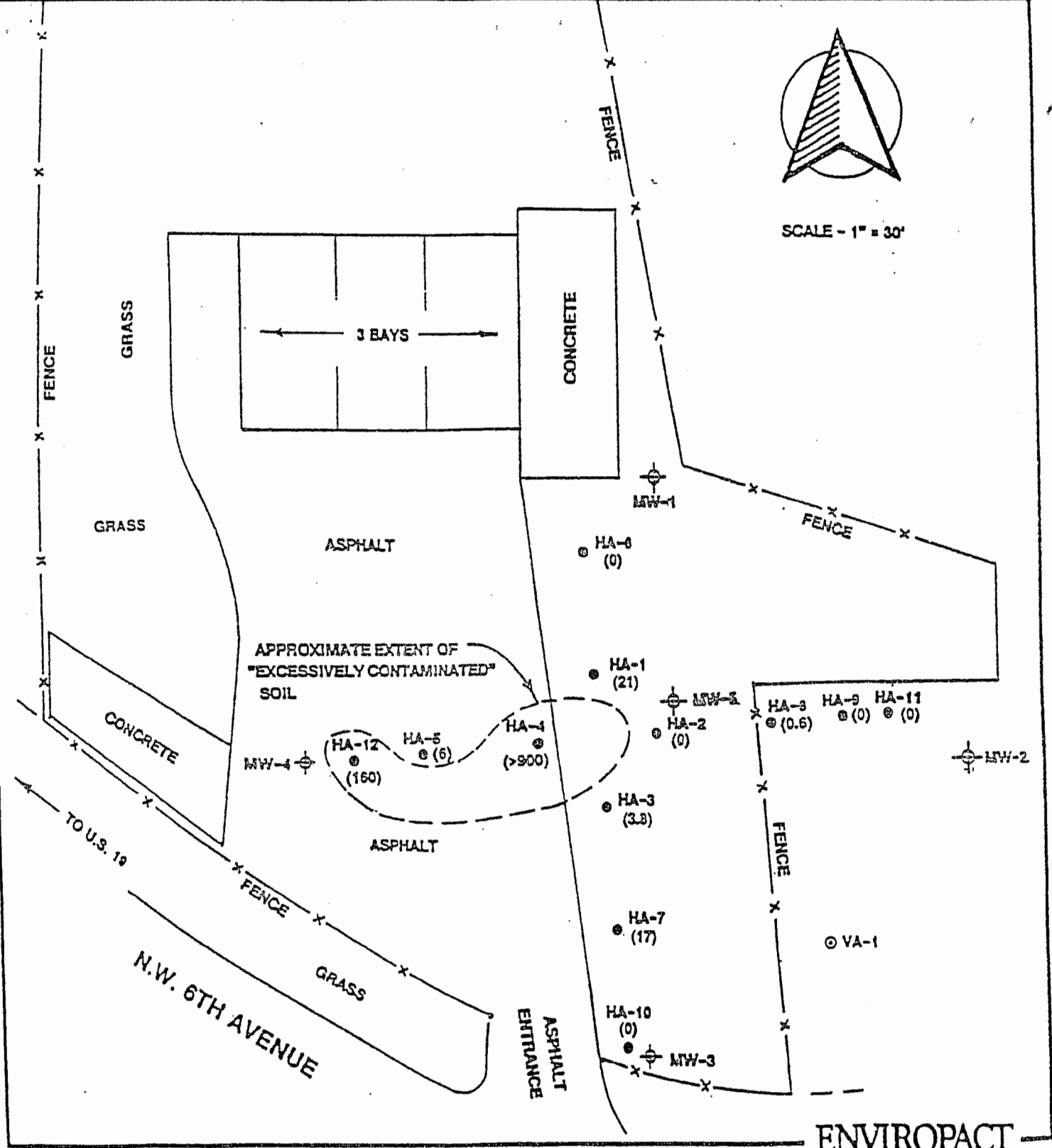
**ENVIROPACT**  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663

**LEGEND**

- ⊕ MW-1: MONITOR WELL
- 6.10 —: GROUNDWATER ELEVATION (FT. ABOVE MSL)
- : DIRECTION OF GROUNDWATER FLOW

Figure 3  
CITY OF CRYSTAL RIVER PUBLIC WORKS FACILITY  
24 Hour Tidal Fluctuation in MW-2





**FIGURE 4: SOIL HEADSPACE READINGS, SURFACE**  
**CITY OF CRYSTAL RIVER**  
**1000 N.W. 6TH AVENUE**  
**CRYSTAL RIVER, FLORIDA**

**ENVIROPACT**  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663

- LEGEND**
- HA-1: HAND AUGER
  - ⊕ MW-1: MONITOR WELL
  - (3.8) : HEADSPACE READING (PPM)

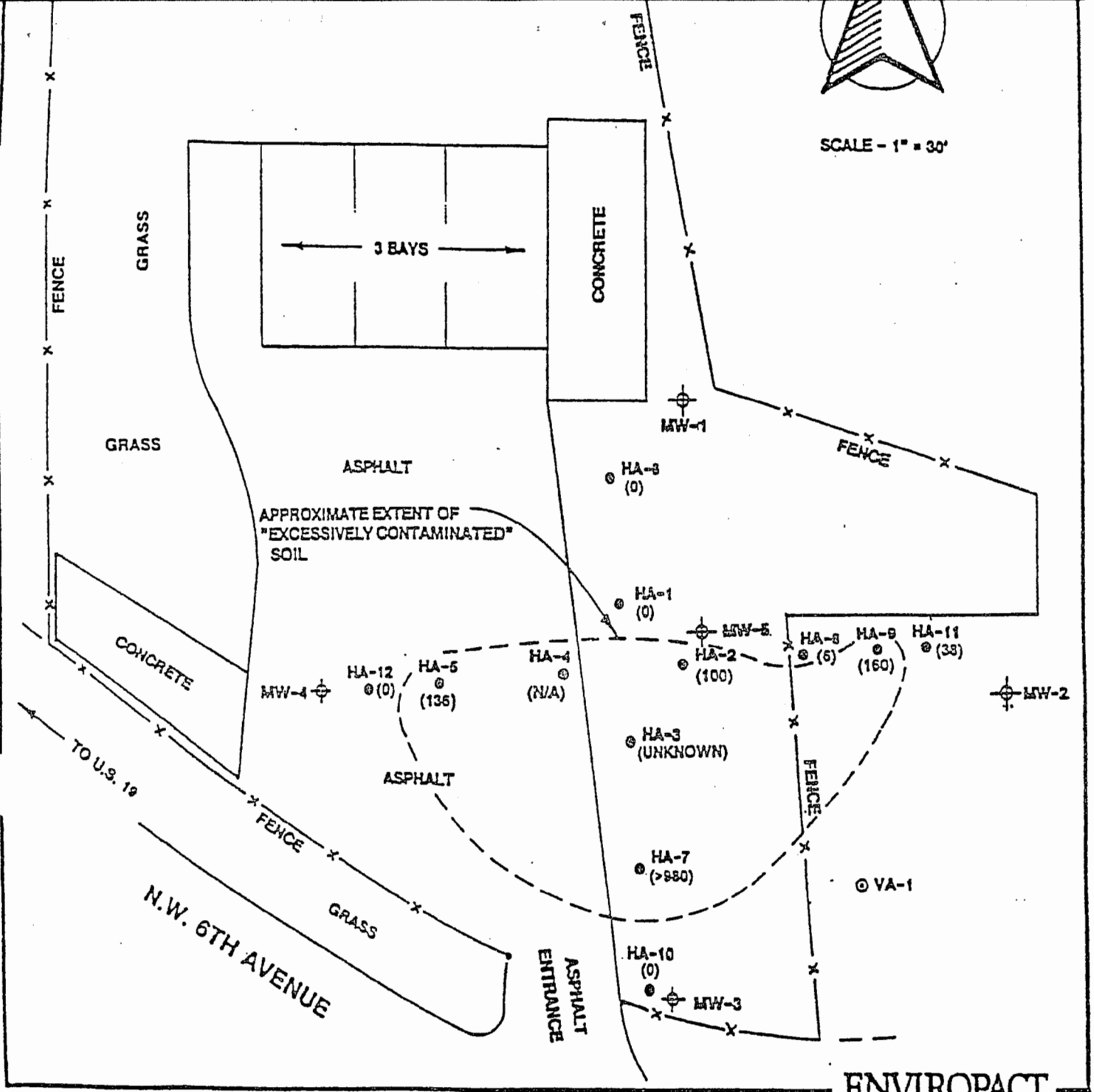
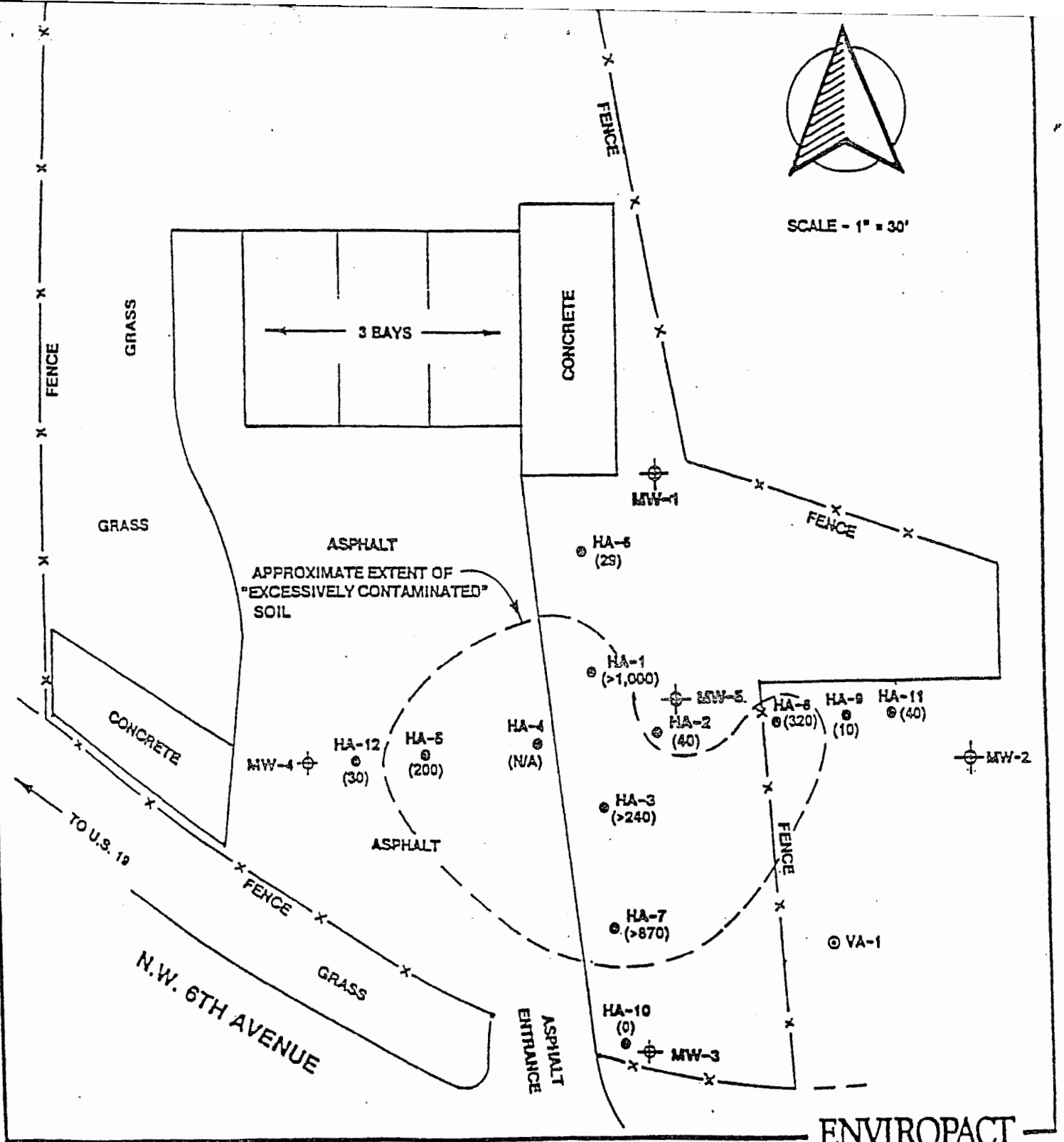


FIGURE 5: SOIL HEADSPACE READINGS, 2' DEPTH  
 CITY OF CRYSTAL RIVER  
 1000 N.W. 6TH AVENUE  
 CRYSTAL RIVER, FLORIDA

ENVIROPACT  
 11300 43rd Street North  
 Clearwater, Florida 34622-4900  
 (813) 573-9663

- LEGEND
- HA-1: HAND AUGER
  - ⊕ MW-1: MONITOR WELL
  - (38) : HEADSPACE READING (PPM)

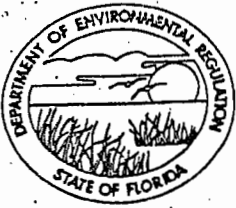


**ENVIROPACT**

**FIGURE 6: SOIL HEADSPACE READINGS, 3'-4' DEPTH  
CITY OF CRYSTAL RIVER  
1000 N.W. 6TH AVENUE  
CRYSTAL RIVER, FLORIDA**

11300 43rd Street North  
Clearwater, Florida 34622-4900  
(813) 573-9663

**LEGEND**  
 ● HA-1: HAND AUGER  
 ⊕ MW-1: MONITOR WELL  
 (40): HEADSPACE READING (PPM)



State of Florida  
Department of Environmental Regulation

# Pollutant Storage Tank System Inspection Report Form

Facility ID No.: 098578728 County: CITRUS  
 Facility Name: CITY OF CRYSTAL RIVER PUBLIC WORKS  
 Facility Location: 1000 N.W. 6<sup>TH</sup> AVE CRYSTAL RIVER, FL 32629  
 Operator: PUBLIC WORKS Phone: \_\_\_\_\_  
 Owner: JOHN LETTOW Phone: 795-4216  
 Latitude 28° 54' 25" N. Longitude 82° 36' 17" W. Section \_\_\_\_\_ Township \_\_\_\_\_ Range \_\_\_\_\_

Tank #	Size	Contents	Installation Date	U/A or In-Contact	Tank Construction	Integral Piping	Monitoring System	Tank Status
1	4600	J	5/79	U	C	B	Y	B
2	4000	J	5/79	U	C	B	Y	B

Comments: ① TANKS WERE EXCAVATED & REMOVED OCT 6, 1989.  
 ② CONTAMINATION WAS FOUND IN SOIL & GROUND WATER  
 ③ CONTAMINATED SOIL WAS RETURNED TO EXCAVATION PER DEP INSTRUCTIONS. FOR REMEDIATION LATER. SAMPLE MONITOR WELLS WERE INSTALLED TO CHECK GROUND WATER.  
 ④ ENVURO PACT IS NOW WRITING UP CONTAMINATION ASSESSMENT REPORT.  
 ⑤ TANKS HAVE NOT BEEN REPLACED  
 ⑥ IRA WAS WRITTEN UP OCT 13, 1989

<b>Inspection Type:</b> <input type="checkbox"/> Complaint Response <input type="checkbox"/> Initial <input type="checkbox"/> EDI <input type="checkbox"/> Public Well Field <input type="checkbox"/> Reinspection <input type="checkbox"/> Installation <input checked="" type="checkbox"/> Tank Removal <input type="checkbox"/> Unregistered	<b>Facility Information:</b> <input type="checkbox"/> Abandoned <input type="checkbox"/> Aboveground <input type="checkbox"/> Govt.-Federal <input checked="" type="checkbox"/> Govt.-Other <input type="checkbox"/> Non-retail <input type="checkbox"/> Retail <input type="checkbox"/> Retrofit (M. or O.) <input type="checkbox"/> Retrofit (L. or R.)
---	---

DER District: SOUTH WEST  
Richard T. [Signature] 3/22/91  
 Inspector's Signature & Date

Local Program: CITRUS COUNTY FIRE PREVENTION  
[Signature]  
 Facility Contact's Signature & Date

Violations must be corrected by: next routine inspection  or by:  NA mo NA day NA yr

**REGISTRATION/NOTIFICATION:**

- 1. Facility has registered all applicable tanks on site 17-761.400
- 2. Current registration placard is properly displayed 17-761.410(6)

Proper notification has been made for the following, 17-761.450:

- 3. Abandonment and closure (30 days prior) (1)(a)
- 4. Change of ownership (30 days after) (1)(b)
- 5. Retrofitting, replacement or installation (10 days prior) (1)(c)
- 6. Change of tank status (in service/out of service) (1)(d)
- 7. Change of facility status (e.g. substances stored) (1)(e)
- 8. Change of method of financial responsibility (within 30 days) (3)

**II. RECORD KEEPING:**

The following records were maintained for two (2) years and were available for inspection within five (5) working days; 17-761.710(1)

- 9. Demonstration of financial responsibility 17-761.480 and 710(j)
- 10. Measurements and reconciliations of inventory (a)
- 11. Results from checks of release detection systems every 30 days (b)
- 12. All records including dates of upgrading or replacement of existing storage tank systems (c)
- 13. Results of maintenance examination of storage tank systems (d)
- 14. Results of tightness tests of entire system
- 15. Description and dates of repairs (g)
- 16. Closure assessment reports if continuing as a facility (h)
- 17. Performance claims of release detection equipment 17-761.600(1)(c) and 710(j) - (i)
- 18. Records of maintenance of cathodic protection systems 17-761.730
- 19. Results of internal tank inspections 17-761.510.2(c)

**III. REPORTING/DISCHARGE RESPONSE:**

- 20. Tank System tightness Test Failure within 10 days 17-761.460(1)
- 21. Suspected or Confirmed Discharge within one day 17-761.460(3)
- 22. System component repaired to prevent further discharge 17-761.700(1)-(6)
- 23. Initiated initial corrective actions (for a release) 17-770.300

**IV. INVENTORY REQUIREMENTS:**

The following information was recorded in inventory records on a minimum of a weekly basis; 17-761.720(1)

- 24. The type of vehicular fuel(1)(a)
- 25. Physical inventory performed(1)(b)
- 26. Inputs and outputs of vehicular fuel(1)(c)
- 27. Amount of water in the tank(1)(d)
- 28. Average of losses/gains provided for a significant loss gain determination: 17-761(2)
- 29. Performed significant loss/gain investigation and follow up with precision testing if applicable 17-761(2)

	Yes	No	Unk	N/A
1.				✓
2.				✓
3.	✓			
4.				✓
5.				✓
6.	✓			
7.				✓
8.				✓
9.				✓
10.				✓
11.				✓
12.				✓
13.				✓
14.				✓
15.				✓
16.				✓
17.				✓
18.				✓
19.				✓
20.				✓
21.	✓			✓
22.	✓			✓
23.				✓
24.				✓
25.				✓
26.				✓
27.				✓
28.				✓
29.				✓

**DRAFT**





DATE 3/22/91  
 DER Facility # 099518728  
 Facility Name CITY OF ORLANDO RIVER PUBLIC WORKS  
 Facility Address 1800 N.W. 60 AVE. ORLANDO RIVER, FL. 32629  
 Contact Person/Telephone JOAN LETTOW  
 Latitude \_\_\_\_\_ Longitude \_\_\_\_\_

For the items below that may indicate non-compliance or gross negligence, please explain in detail and provide supporting documentation.

- | YES                                 | NO                                  | UNKNOWN                  | I. Compliance with Chapter 376.3072, Florida Statutes and Chapter 17-769, F.A.C.  |
|-------------------------------------|-------------------------------------|--------------------------|---|
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | 1. Was any contamination discovered prior to January 1, 1989? If yes, explain.<br>_____   |
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | 2. Petroleum Liability Insurance Program Affidavit form completed? If yes, give notarized.<br>_____   |
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | 3. Is the site insured by FPLIPA? If not, supply the carrier insured with, or other type of financial responsibility mechanism used.<br>_____   |
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | 4. Restoration Coverage Notice of Eligibility Issued? If yes, give effective date.<br>_____   |
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | 5. Has site access ever been denied? _____  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/> | 6. Has a Storage Tank Program compliance inspection ever been performed for this facility? If yes, give the date of the most recent inspection and supply a copy<br><u>3/22/91</u>              |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>            | <input type="checkbox"/> | 7. Has the suspected petroleum storage system component responsible for the disc been removed from service within 3 days of discovery. If no, explain.<br>_____                                 |
| <input type="checkbox"/>            | <input checked="" type="checkbox"/> | <input type="checkbox"/> | 8. Have steps to obtain cleanup services been initiated within 3 days of the disc discovery? If no, explain.<br><u>PER DER INSTRUCTIONS</u><br><u>MONITOR ONLY SEE INCIDENT REPORT ATTACHED</u> |

II. Information Required for Site Scoring and Ranking

- |                                     |                          |  |
|-------------------------------------|--------------------------|--|
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | 9. Is there evidence of a contamination problem? If yes, explain in comment section                            |
| If yes to 9, check one:             |                          |  |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | a. Two or more monitoring wells/boreholes show >2" free product.   |
| <input type="checkbox"/>            | <input type="checkbox"/> | b. Only 1 monitoring well shows >2" free product or monitoring wells show <2" free product or petroleum sheen. |

**Site No. 93 Li'l Champ Food Store #111**  
1943 NW Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 098503083



Storage Tank Facility Compliance Inspection Report

Facility ID 8503083 County 09 CITRUS Inspection Date 1/16/2001  
 Facility Name LIL CHAMP FOOD STORE III Facility Type A-RETAIL  
 Latitude 28°55'34" Longitude 82°36'52" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>2</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	Both Dispenser liners are dry.	
	Both STP Sumps have $\approx$ one inch of liquid. The level is still below the pipe interstice. Once it reaches the pipe it must be pumped out and properly disposed off.	
	Records is current + RDRL is on file.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: Gulf UNDERWRITERS Effective Date: 7/24/00 Expiration Date: 12/30/2002

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

CITRUS ENVIRONMENTAL HEALTH 352-527-5715  
 Storage Tank Program Office    Storage Tank Program Office Phone Number

C. MARK SUMNER    Robert F. Aramburg  
 Inspector Name - Please Print    Facility Representative Name - Please Print

[Signature] 1/16/01    [Signature] 1/16/01  
 Inspector Signature & Date    Facility Representative Signature & Date

Facility Name: Lil Camp III Facility ID: 8503083 Date: 1/16/2001

e Cite	Description / Inspector's Comments
	Release detection is SIR by USTMan version 95-2A. Records checked from NOV 99 to NOV 2000. All pass except 3/2000 Reg ul tank INC, and 4/2000 plus ul tank INC.
	The Sumps and the dispenser lines are checked monthly by SEI INC, and conditions observed are noted in the log.
	Both tanks were tested 7/20/99 by Down Under and passed. They are due again by 7/2002. The tanks were internally lined in 5/1992 and must be internally inspected by 5/2002.
	<del>Both tanks</del> leak detectors were tested 7/14/00 by Down Under both passed. They are due again by 7/14/2001.
	Piping is DW and the interstice is open at the sumps allowing it to be monitored monthly by SEI INC.
	Fills c/c marked per Api 1637 No flow shut off.
	Photo of overall site was taken.

January 26, 2001

Mr. Brent Puzak  
Lil Champ Food Stores Inc.  
P.O. Box 23180  
Jacksonville, FL 32241

RE: ID # 098503083  
Lil Champ Food Store #111  
1943 N.W. US Hwy. 19  
Crystal River, FL 32629

Dear Mr. Puzak:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Enclosed, please find a copy of the Storage Tank Facility Compliance Inspection Report for the inspection recently performed at the above named facility. Please refer to this report for comments regarding the inspection.

If there are any questions concerning this matter, you may contact the Storage Tank Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

Enclosure(s)

CMS/file

---

**CITRUS COUNTY DEPARTMENT OF HEALTH**

ENVIRONMENTAL HEALTH DIVISION  
STORAGE TANKS INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316



This data is current as of: 06-NOV-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 8503083	District: SWD
Name: LIL CHAMP FOOD STORE #111	County: Citrus
1943 Nw Us Hwy 19	Type: Retail Station
Crystal River, FL 32629	Status: Open
Contact: Lil Champ Stores Inc	Latitude: 28:55:34.0000
Phone: 904-464-7219 } <i>cms</i>	Longitude: 82:36:52.0000 } <i>cms</i>
	LL Method: AGPS

**Account Owner Information**

Name: Lil Champ Inc  
 Po Box 23180  
 Attn: Brent Puzak  
 Jacksonville, FL 32241-3180  
 Phone: 904-464-7219

**Tank Owner Information**

Name: Lil Champ Inc  
 Po Box 23180  
 Attn: Brent Puzak  
 Jacksonville, FL 32241-3180  
 Phone: 904-464-7219

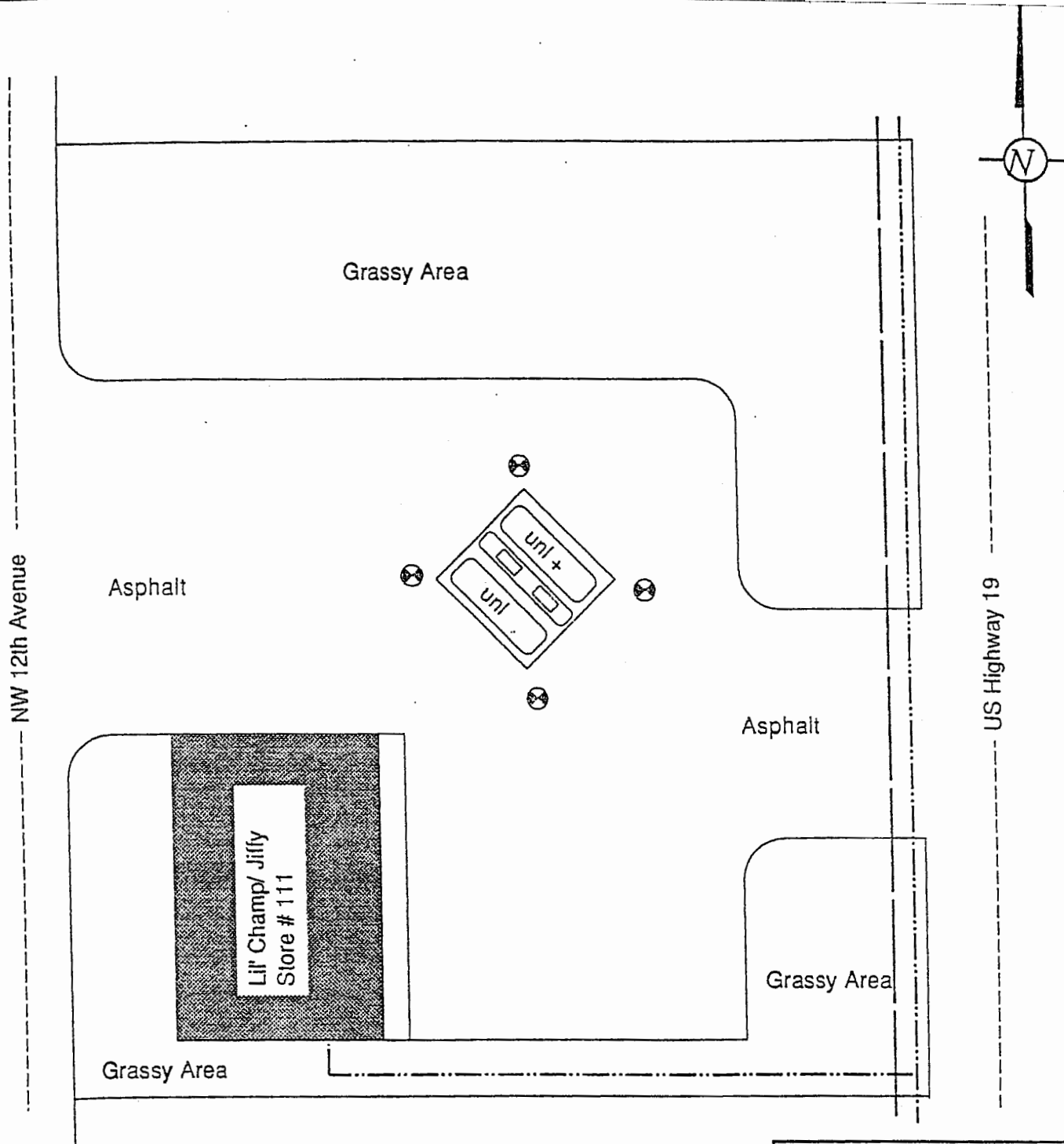
Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
1	8000	Unleaded Gas	08/01/1978	UNDER	U	A B M O C	C F J K	H K 24 S
2	8000	Unleaded Gas	08/01/1978	UNDER	U	A B M O C	C F J K	H K 24 S

} *cms.*

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!

ST.	J DATE:	5/19/92	JPC
DRAWN BY:	LAST REV DATE:		
CHECKED BY:	DRAWN BY:		
APPROVED BY:			
DRAWING No.:	PROJECT No.:	MA102465	TAS971
INITIATOR:	PROJECT MGR:	JPC	JPC
STORER:	ARCHIVED:		



- EXPLANATION**
- MONITORING WELL
  - - - OVERHEAD POWER LINES
  - - - DRAINAGE DITCH



**FIGURE 1:**  
Site Plan

**Location:**  
Jiffy Store #111  
1943 US HWY 19  
Crystal River, Florida

**INTERNATIONAL TECHNOLOGY CORPORATION**  
*Responsive to the Needs of Environmental Management*





ENVIRONMENTAL  
SERVICES  
INC.

May 18, 1990

Mr. Richard Sosna  
Fire Marshal  
1300 S. Lecanto Hwy.  
Lecanto, Fl. 32661

RE: Vapor Scan at Huntley Jiffy Store # 111, 1943 NW Hwy. 19  
Crystal River, Fl.

Dear Mr. Sosna:

On May 16, 1990 a representative of IT Corporation mobilized to Huntley Jiffy store number 111 in Crystal River to perform an organic vapor scan of the four existing compliance wells, in response to your request. A Foxboro model 128GC organic vapor analyzer (OVA) was used to scan for the presence of volatile organic vapors within the compliance wells at the above referenced site. This type of OVA is a flame ionization detector (FID). None of the compliance wells contained any volatile organic vapors (OVA readings of 0). The wells were also found to have no detectable hydrocarbon odor.

It was previously reported that a hydrocarbon odor existed in the water from the tank-pit wells during a compliance visit early this year. However, no vapor monitoring device was used during that visit and only a manual inspection of the ground water was performed.

If you have any further questions, please don't hesitate to call us at (904) 867-0377.

Sincerely,

A handwritten signature in cursive script that reads 'Chris Callegari'.

Chris Callegari  
Hydrogeologist

cc

Robert Arenburgh (Huntley Jiffy Stores Inc.)

# FIELD ACTIVITY DAILY LOG

PROJECT NAME Huntley T.E.C., # 111

PROJECT NO. 595447

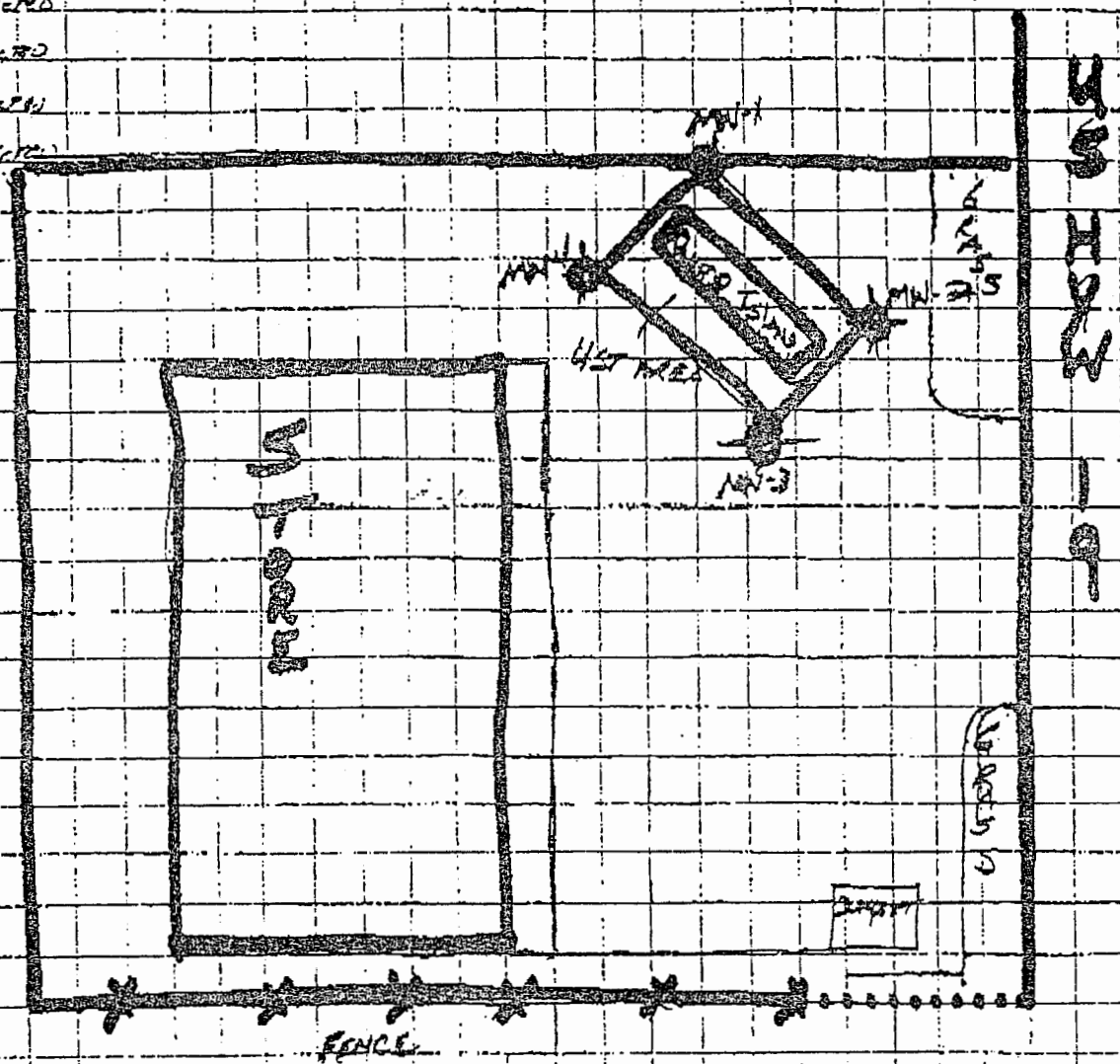
FIELD ACTIVITY SUBJECT: Search for abandoned wells with OVA

DESCRIPTION OF DAILY ACTIVITIES AND EVENTS:

OVC READINGS

- MW-1 = Not Detected
- MW-2 = Not Detected
- MW-3 = Not Detected
- MW-4 = Not Detected

NORTH ↑



NOTE\* All wells were checked using a Foxboro Model 129 GC OVA TITE WELLS were also checked for Boiler tube and NONE was encountered.

VISITORS ON SITE:

CHANGES FROM PLANS AND SPECIFICATIONS, AND OTHER SPECIAL ORDERS AND IMPORTANT DECISIONS.

WEATHER CONDITIONS:  
Hot 90° Light Wind Mostly Sunny  
Cloud Development

IMPORTANT TELEPHONE CALLS:

IT PERSONNEL ON SITE:

SIGNATURE [Signature]

DATE: 5/16/98

# Discharge Notification Form

Form 17-1.218(3)

STATE OF FLORIDA  
DEPARTMENT OF ENVIRONMENTAL REGULATION  
NORTHEAST DISTRICT  
3426 BILLS ROAD  
JACKSONVILLE, FLORIDA 32207

Use this form to notify the Department of Environmental Regulation of:

1. Results of tank testing which reveal a discharge within 3 working days of testing.
2. Discharges exceeding 100 gallons on pervious surfaces as described in Section 17 G1.05(4)(b) within 3 working days of discovery.
3. Positive response of a detection device, monitoring well test of sample or laboratory report within 3 working days of discovery.

Mail to the DER District Office in your district.

PLEASE PRINT OR TYPE  
Put "X" where answer is unknown.

1. Facility Number: 98503083 2. Tank Number: \_\_\_\_\_ 3. Date: 3/15/90

4. Facility Name: Hunt-Hair Sifts #111

Facility Operator: Hunt-Hair Sifts, Florida Sifts, Inc.

Facility Address: 1943 NW Hwy 19 Crystal River, FL 32629

Telephone Number: (904) 777-4540 County: Citrus

Mailing Address: 1943 NW Hwy 19

5. Date of test or discovery: 3/14/90 month/day/year

6. Method of initial discovery. (circle one only)
- |  |  |
|--|--|
| A. Automatic detector in ground, monitoring well, or containment.      | D. Emptying and inspection.                          |
| B. NFPA 329 test (underground tanks only).                             | E. Inventory control.                                |
| <input checked="" type="radio"/> C. Manual test of monitoring well(s). | F. Odor or visible signs at facility or in vicinity. |
|  | G. Other: _____ (explain)                            |

7. Estimated number of gallons lost: N/A

8. What part of the storage system is leaking? (circle all that apply) A. Dispenser B. Pipe C. Fitting D. Tank  E. Unknown

9. If a tank is leaking, circle the choices which describe the type.
- |                   |                                 |                                     |
|-------------------|---------------------------------|-------------------------------------|
| A. Aboveground    | D. Underground                  | H. Sacrificial anode type           |
| B. Factory welded | E. Bare or asphalt-coated steel | I. Impressed current type           |
| C. Field erected  | F. Fiberglass-clad steel        | J. Double walled                    |
|                   | G. Fiberglass                   | M. Other or Unknown _____ (explain) |

10. Type of pollutant discharged. (circle one)
- |  |   |
|--|---|
| A. Leaded Gasoline.                      | E. Aviation fuel.   |
| B. Unleaded gasoline.                    | <input checked="" type="radio"/> Y. Other <u>No. Test yet</u> (explain) |
| C. Gasohol or alcohol-enriched gasoline. | Z. Unknown _____ (explain)  |

11. Cause of leak. (circle all that apply)
- |   |                     |                         |
|---|---------------------|-------------------------|
| <input checked="" type="radio"/> A. Unknown | <u>Piping</u>       | <u>Tank</u>             |
|   | B. Split            | G. Split                |
|   | C. Loose connection | J. Installation failure |
|   | D. Other _____      | H. Corrosion            |
|   |                     | I. Puncture             |
|   |                     | P. Other _____          |

12. TO THE BEST OF MY KNOWLEDGE AND BELIEF ALL INFORMATION SUBMITTED ON THIS FORM IS TRUE, ACCURATE, AND COMPLETE.

Robert F. Aronovich  
Name of Owner, Operator or Authorized Representative

[Signature]  
Signature of Owner, Operator, or Authorized Representative

KEEP A COPY OF THIS FORM FOR YOUR RECORDS.



# Florida Department of Environmental Regulation

Southwest District

3804 Coconut Palm

Tampa, Florida 33619

Lawton Chiles, Governor

813-744-6100

Carol M. Browner, Secretary

DEC 0 2 1992

Ms. Marcia Glick  
Lil' Champ/Jiffy Food Stores  
9143 Phillips Highway  
Suite 200  
Jacksonville, FL 32256



RE: Jiffy Food Store #111  
1943 U.S. Highway 19  
Crystal River, Citrus County, Florida  
DER Facility ID #098503083

Dear Ms. Glick:

Michael Bland of the Bureau of Waste Cleanup has reviewed the Contamination Assessment Report (CAR) and No Further Action Proposal (NFAP) dated September 1992 (received September 30, 1992) submitted for this site. Documentation submitted with the NFAP confirms that criteria set forth in Section 17-770.630(3), Florida Administrative Code (F.A.C.), have been met. The NFAP is hereby incorporated by reference in this Order. Therefore, you are released from any further obligation to conduct site rehabilitation at the site, except as set forth below.

If a subsequent discharge of petroleum or petroleum product occurs at the site, the Department may require site rehabilitation in order to reduce contaminant concentrations to the levels approved through review of the NFAP or otherwise allowed by Chapter 17-770, F.A.C.

Additionally, you are required to properly abandon all monitoring wells except compliance wells required by Chapter 17-761, F.A.C., for release detection. The wells must be abandoned in accordance with the requirements of Rule 17-532.500(4), F.A.C.

Persons whose substantial interests are affected by this Site Rehabilitation Completion Order have a right to challenge the Department's decision. Such a challenge may include filing a petition for an administrative determination (hearing) as described in the following paragraphs. However, pursuant to Chapter 17-103, F.A.C., you may request an extension of time to file the Petition. All requests for extensions of time or petitions for administrative determinations must be filed directly with the Department's Office of General Counsel at the address given below within twenty-one (21) days of receipt of this notice (do not send them to the Bureau of Waste Cleanup).

Ms. Marcia Glick  
Lil' Champ/Jiffy Food Stores

DEC 02 1992


Page 3

Please send a copy of the approved CAR documents(s) to Mr. Ken Weber of the Southwest Florida Water Management District within thirty (30) days of receiving this Site Rehabilitation Completion Order.

The DER Facility Number for this site is 098503083. Please use this identification on all future correspondence with the Department.

Any questions you may have on the technical aspects of this Site Rehabilitation Completion Order should be directed to Laurel Lucado at (813) 744-6100, ext. 427. Contact with the above named person does not constitute a petition for administrative determination.

Sincerely,



John M. Ruddell, Director  
Division of Waste Management

JMR/lls

cc: William J. Kotziers, P.G., IT Corporation  
Richard T. Sosna, Citrus County Fire Prevention Division  
Michael Bland, FDER-BWC  
Laurel Lucado, FDER-SWD

**Site No. 94 Judy Cressey**  
2051 NW Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. No. 099202341



Ms. Judy A. Cressey  
March 17, 1994  
Page Two

address given below within twenty-one (21) days of receipt of this notice (do not send them to the Bureau of Waste Cleanup).

Notwithstanding the above, a person whose substantial interests are affected by this Site Rehabilitation Completion Order may petition for an administrative proceeding (hearing) in accordance with Section 120.57, Florida Statutes (F.S.). The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at 2600 Blair Stone Road, Tallahassee, Florida 32399-2400, within twenty-one (21) days of receipt of this notice. Failure to file a petition within this time period shall constitute a waiver of any right such person may have to request an administrative determination (hearing) under Section 120.57, F.S.

The Petition shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the Department file number (DEP facility number), and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by each petitioner, if any;
- (e) A statement of facts which each petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of which rules or statutes each petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by each petitioner, stating precisely the action each petitioner wants the Department to take with respect to the Department's action or proposed action.

This Site Rehabilitation Completion Order is final and effective on the date of receipt of this Order unless a petition (or time extension) is filed in accordance with the preceding paragraphs. Upon the timely filing of a petition, this Order will not be effective until further order of the Department.

When the Order is final, any party to the Order has the right to seek judicial review of the Order pursuant to Section 120.68, F.S., by filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules of Appellate Procedure, with the Clerk of the Department in the Office of General Counsel, 2600 Blair Stone



Ms. Judy A. Cressey  
March 17, 1994  
Page Three

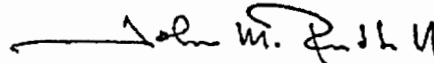
Road, Tallahassee, Florida 32399-2400; and by filing a copy of the Notice of Appeal, accompanied by the applicable filing fees, with the appropriate District Court of Appeal. The Notice of Appeal must be filed within thirty (30) days from the date the Final Order is filed with the Clerk of the Department.

Please send a copy of the approved CAR document(s) to Ken Weber of the Southwest Florida Water Management District within thirty (30) days of receiving this Site Rehabilitation Completion Order.

The DEP Facility Number for this site is 099202341. Please use this identification on all future correspondence with the Department.

Any questions you may have on the technical aspects of this Site Rehabilitation Completion Order should be directed to Michael J. Bland at (904) 921-9986. Contact with the above named person does not constitute a petition for administrative determination.

Sincerely,



John M. Ruddell, Director  
Division of Waste Management

JMR/mjb

cc: Jim Edwards, Imperial Testing Laboratories - Lakeland  
Dick Sosna, Citrus County Fire Prevention Bureau



Florida Department of  
**Environmental Protection**

Lawton Chiles  
Governor

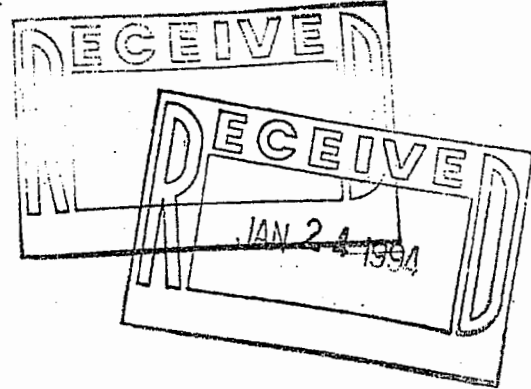
Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Virginia B. Wetherell  
Secretary

January 14, 1994

Ms. Judy A. Cressey  
3971 North Timucua Point  
Crystal River, Florida 34428

RE: Cressey Property  
2051 Northwest U.S. 98  
Crystal River, Florida  
DEP Facility #099202341



Dear Ms. Cressey:

The Bureau of Waste Cleanup has reviewed the Contamination Assessment Report (CAR) and No Further Action Proposal (NFAP), dated November 8, 1993 (received November 12, 1993), submitted for this site. In order to meet the requirements of Chapter 17-770, Florida Administrative Code (F.A.C.), the following comment needs to be addressed:

- (1) The NFAP cannot be approved at this time because the total lead concentration detected in the groundwater sample collected from MW-1 exceeds the Department's target cleanup concentration of 50 ppb. As such, MW-1 should be sampled and analyzed for total and dissolved lead to confirm the 9/1/93 groundwater samples analytical results and so that this review can be completed and a decision reached on the type of action that is warranted based on comprehensive data.

The DEP Facility Number for this site is 099202341. Please use this identification on all future correspondence with the Department.

Please provide the results of the supplemental assessment to me within sixty (60) days of receipt of this request. If additional time is needed, a time extension request should be submitted, in accordance with Rule 17-770.800(6), F.A.C. If you should have any questions concerning this review, please contact me at (904) 921-9986.

Please note, all supplemental contamination assessment related documents should be signed and sealed by a registered professional in accordance with Rule 17-770.500, F.A.C. The

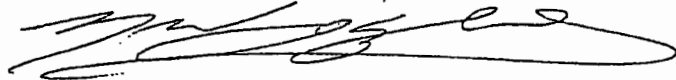
Ms. Judy A. Cressey

January 14, 1994

Page Two

certification should be made by a registered professional who is able to demonstrate competence in the subject area(s) addressed within the sealed document.

Sincerely,



Michael J. Bland, P.G.  
Technical Review Section  
Bureau of Waste Cleanup

/mjb

cc: Jim Edwards, Imperial Testing Laboratories - Lakeland  
Dick Sosna, Citrus County Fire Prevention Bureau

Bureau of Waste Cleanup

NOV 12 1993

Technical Review Section

**CONTAMINATION ASSESSMENT REPORT**

2051 N.W. Highway US 98  
Crystal River, Florida  
DER Facility No. 099202341

Prepared for  
Ms. Judy A. Cressey

Prepared by  
**IMPERIAL TESTING LABORATORIES**  
3905 Kidron Road  
Lakeland, Florida 33811

November 1993  
Project No. 2877  
2877.CAR



# Imperial Testing Laboratories

3905 KIDRON ROAD • LAKELAND, FLORIDA 33811 • TELEPHONE: (813) 647-2877  
FAX (813) 647-2978

November 8, 1993

Mr. Tim Bahr  
Department of Environmental Protection  
Bureau of Waste Cleanup  
Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, FL 32399

Bureau of Waste Cleanup

NOV 12 1993

Technical Review Section

Re: Contamination Assessment Report for  
Judy A. Cressey  
2051 N.W. Highway US 98  
Crystal River, Florida  
Facility #099202341

Gentlemen:

A letter dated March 8, 1993 from the FDEP was received by Ms. Cressey which required a contamination assessment be initiated and completed and which notified her of this site's eligibility for reimbursement of clean up costs under the Abandoned Tank Restoration Program.

The underground storage tanks were removed from this site and a closure assessment performed. Imperial Testing Laboratories (ITL) personnel monitored the tank removal and conducted the closure assessment and did not detect any excessively contamination soils within the tank excavation. However, a petroleum odor and sheen on the water present in the excavation prompted the filing of a discharge notification and Abandoned Tank Restoration Program application as directed by the Citrus County Tank Inspector, Richard Sosna.

Soil samples were taken from nine (9) soil borings and four (4) monitor wells installed by ITL to assess the extent of soil and groundwater contamination at the site. The location of the borings and monitor wells are depicted on Figure 1. The boring and monitor well logs are attached as Appendix A. The soil samples were tested for evidence of petroleum soil contamination utilizing a Porta Fid II Organic Vapor Analyzer (OVA) according to methods given in FDEP FAC 17-770. None of the soil boring or monitor well OVA results showed any indication of petroleum soil contamination. The OVA measurement logs are attached as Appendix B.

Mr. Tim Bahr  
Department of Environmental Protection  
Page 2  
November 8, 1993

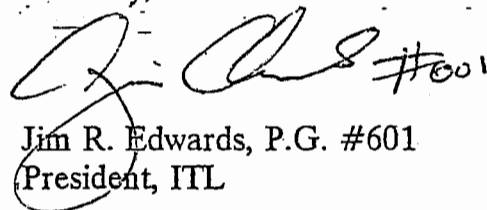
The summary of the permanent monitor wells construction details and the groundwater elevations measured in them on September 20, 1993 are given in Table 1. The field survey notes and water level measurement records are attached as Appendix C. The groundwater elevations given in Table 1 were utilized to construct a groundwater elevation contour map in order to determine the groundwater flow directions at the site. This data is depicted on Figure 1 and shows both monitor wells 2 and 4 to be downgradient of the former tank field and a general groundwater flow direction of south to south-southeast.

Groundwater samples were taken from the four monitor wells during the month of September, 1993 and analyzed for gasoline parameters per 17-770. All of the EPA Methods 601 and 602 results were below detectable limits. One lead analysis indicated slightly above the 50 ppb standard. However, this is believed to be associated with the turbid sample from this well. Unrepresentative elevated lead analysis results associated with the dissolution of soil bearing lead by field acidification of unavoidably turbid groundwater samples is a common finding during 17-770 contamination assessments. The groundwater quality analysis results are attached as Appendix D and the quality assurance documentation is attached as Appendix E.

Based on the Department's guideline document "No Further Action and Monitoring Only Guidelines for Petroleum Contaminated Sites" this site meets all of the criteria for a "No Further Action" classification. A well inventory was not done since the site meets the "No Further Action" criteria even if wells are present. On behalf of Ms. Cressey we respectfully request a classification of this site as "No Further Action".

Please feel free to contact us if there are any questions regarding this submittal.

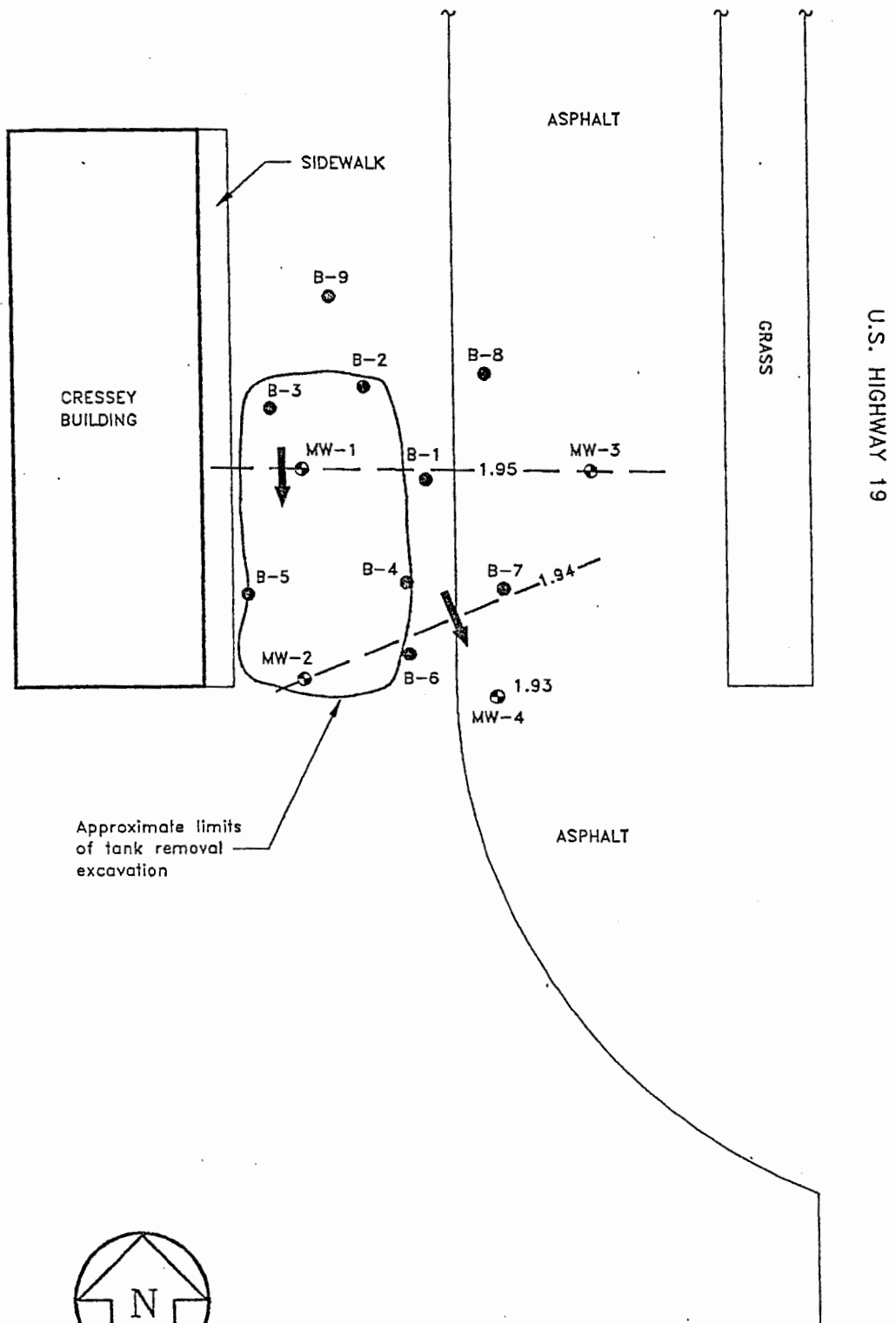
Sincerely,

 #601 11/8/93  
Jim R. Edwards, P.G. #601  
President, ITL

JRE/mwl  
cc: DEP - 2  
Client  
File - 3

attachments: Figure 1  
Table 1

2877car



Approximate limits of tank removal excavation



0 20  
 Scale in Feet

LEGEND

- ⊙ MONITOR WELL
- SOIL BORING
- - - GROUNDWATER CONTOURS
- ➔ GROUNDWATER FLOW DIRECTION
- (1.95) GROUNDWATER ELEVATION
- ALL ELEVATIONS IN FEET ABOVE NGVD

FIGURE 1 - Groundwater elevation contours and flow direction 9/20/93

JUDY A. CRESSEY  
 2051 HIGHWAY 19 NORTHWEST  
 CRYSTAL RIVER, FL  
 Facility No. 099202341  
 ITL Project #2877

Imperial Testing Laboratories

Mr. Tim Bahr  
Department of Environmental Protection  
Page 4  
November 8, 1993

Attachment

TABLE 1 - SUMMARY OF PERMANENT MONITOR WELLS						
Install Date	Well No.	Well Depth	Casing Depth	MP Elevation	Groundwater Depth	Groundwater Elevations
8/30/93	1	11	2	7.24	5.29	1.95
8/30/93	2	11	2	7.45	5.51	1.94
8/30/93	3	11	2	7.00	5.05	1.95
9/16/93	4	12	2	6.52	4.59	1.93

All measurements in feet  
Water level Measurements taken 9/20/93

MP (measuring point) elevations based on assumed elevations of 7 feet above NGVD for the MW-3 MP estimated from the USGS 7.5 minute "Crystal River" Quadrangle on which the subject site is depicted.





State of Florida  
 Department of Environmental Regulation  
**Pollutant Storage Tank System  
 Inspection Report Form**

Facility ID #: UNREGISTERED 099202341 County: CITRUS  
 Facility Name: JUDY CRESSY PROPERTY  
 Facility Location: 2051 N.W. HWY 19 CRYSTAL RIVER, FL 32629  
 Facility Contact: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Owner: JUDY CRESSY Phone: (904) 795-0261  
 Owner Address: 3971 N TIMUCUA PT. CRYSTAL RIVER, FL 34428  
 Owner Contact: \_\_\_\_\_ Owner Change Date: \_\_\_\_\_  
 Latitude: 27° 54' 43" N Longitude: 82° 36' 31" W Fac. Type: A

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
1	2000	A	XIX/XX	U	C	B	NONE	TS
2	2000	A	XX/XX	U	C	B	NONE	TS
3	2000	A	XX/XX	U	C	B	NONE	TS

Comments: (1) TANKS PUMPED OUT BY JAN'S OIL 6/29/92  
 (2) TANKS EXCAVATED & PULLED 6/29/92 & 6/30/92 BY NORRIS TANK & PUMP  
 (3) SOIL SAMPLES BY IMPERIAL TESTING LABS. 6/29/92 & 6/30/92 NO SOIL CONTAMINATION  
 WATER SAMPLES TAKEN FOR WATER ANALYSIS SHOWN ON WATER  
 INDICATES WATER CONTAMINATION

\* COPY OF CLOSURE REPORT TO BE SENT TO CITRUS COUNTY FIRE PREVENTION

Inspection Type: (Choose One) <input type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input checked="" type="checkbox"/> Closure <input type="checkbox"/> Reinspection	Site Information: (All that apply) <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input checked="" type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
--	--

DER District or Local Program: CITRUS COUNTY FIRE PREVENTION

Inspector Name (Print): RICHARD T. SUSNA  
 Inspector's Signature & Date: [Signature] 6/30/92

Contact Name (Print): NORRIS ALLEN JR.  
 Contact's Signature & Date: [Signature]



UNDERGROUND STORAGE TANK  
CLOSURE INSPECTION FORM

Facility I.D.#: UNREGISTERED  
Date: 6/25/92  
099202341

Yes	No	Unk	N/A
-----	----	-----	-----

REGISTRATION AND NOTIFICATION 17-761.400 & 450 FAC: Comments: \_\_\_\_\_

1.	All of the facility's tanks properly registered; .400	1.				<input checked="" type="checkbox"/>
2.	Proper notification made 30 days prior to tank(s) closure; .450 (1) (a)	2.	<input checked="" type="checkbox"/>			
3.	Proper notice given 24 hours prior to storage tank(s) closure; 450 (4)	3.	<input checked="" type="checkbox"/>			

II. CLOSURE PROCEDURES/STATUS: 17.761.800 Comments: \_\_\_\_\_

4.	Certified contractor performed the tank removal(s); .740 (2)	4.	<input checked="" type="checkbox"/>			
5.	Storage tank(s) properly closed and removed from the site; (2) (d)	5.	<input checked="" type="checkbox"/>			
6.	Storage tank(s) properly closed and filled in place; (2) (d)	6.				<input checked="" type="checkbox"/>
7.	Storage tank(s) properly closed within 90 days of discovery; (2) (a)	7.	<input checked="" type="checkbox"/>			
8.	All liquid & sludge removed from the tank(s); (2) (d)	8.	<input checked="" type="checkbox"/>			
9.	Storage tanks properly purged or inerted prior to transport; (2) (d)	9.				<input checked="" type="checkbox"/>
10.	All piping capped and/or removed;	10.	<input checked="" type="checkbox"/>			
11.	All monitoring wells left in place for contamination assessment purposes; (2) (f)	11.				<input checked="" type="checkbox"/>
12.	All monitoring wells have been properly abandoned; .800 (2) (f)	12.				<input checked="" type="checkbox"/>
13.	A closure assessment was properly performed; .800 (3),	13.	<input checked="" type="checkbox"/>			

III. DISCHARGE REPORTING 17-761.460. F.A.C.: Comments: \_\_\_\_\_

14.	Evidence of contamination or a discharge reported (Explain in comments) 460 (1), (2) and (3)	14.		<input checked="" type="checkbox"/>		
15.	Discharge Reporting Form (DRF) submitted; 460 (2)	15.				<input checked="" type="checkbox"/>

IV. DISCHARGE RESPONSE: Comments: \_\_\_\_\_

16.	Free product present; (Explain in comments)	16.		<input checked="" type="checkbox"/>		
17.	Free product being removed; 17-761.800 (3) (d) & 17-761.820 (2)	17.				<input checked="" type="checkbox"/>

Comments: NO SOIL CONTAMINATION  
WATER SAMPLE TAKEN FOR LAB ANALYSIS  
SHEEN ON WATER INDICATES WATER CONTAMINATION

**Site No. 97 Gulf Coast Ford (aka Nick Nicholas Ford)**  
4020 N. Suncoast Boulevard (@State Park Road)  
Crystal River, Florida  
FDEP I.D. Nos. 098518715 and 099201295  
EPA I.D. No. FLD981745383



UNIFIED

ENVIRONMENTAL SERVICES, INC.



Project No. 92-0050

#97

INITIAL REMEDIAL ACTION  
and  
TANK CLOSURE ASSESSMENT REPORT  
for

Gulf Coast Ford-South Parcel  
4020 N Suncoast Blvd.  
Crystal River, Florida

F.D.E.R.# Unregistered  
May 1992

Prepared For:

Mr. Nick Nicholas  
Owner

Prepared By:

Keith McDonald  
Hydrogeologist



**UNIFIED**  
**ENVIRONMENTAL SERVICES, INC.**



### Introduction

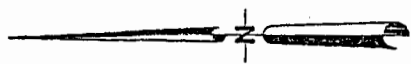
At the request of J&J Equipment, Inc., Unified Environmental Services, Inc., performed the closure assessment of an abandoned waste oil tank. The site previously existed as a Chevron fuel station and utilized the waste oil tank for automotive repair and maintenance activities. The present owner never utilized any of the petroleum tanks on the facility. Additionally, Mr. Nick Nicholas requested that the old underground, gasoline tank area be investigated for evidence of a petroleum discharge. Four soil borings and screening was accomplished in the old underground tank area by a UES hydrogeologist and excessively contaminated soils encountered. All petroleum storage tanks have been inactive on the south parcel of the property since at least 1986, when the gasoline tanks were excavated.

After closure of the waste oil tank, initial remedial actions (IRA) were scheduled to remove and treat the excessively contaminated soils encountered in the old gasoline, underground tank area. These activities resulted in the removal of approximately 191 tons of excessively contaminated soils. Prior to backfilling, bubbling of the old gasoline tank area occurred for approximately 3 days, until no petroleum odor was observed. Soil borings and groundwater sampling and analyses performed approximately 3 days later confirmed the absence of any further petroleum affected soils or groundwater. Two, temporary groundwater wells were previously installed in the old tank area, prior to backfilling, and groundwater analyses confirmed the absence of any analytes exceeding the criteria established in Florida Administrative Code, Chapter 17-770. The owner of the property has applied to the Abandoned Tank Restoration Program for financial assistance. This report discusses the findings of these investigative activities.

### Tank Removal Activities

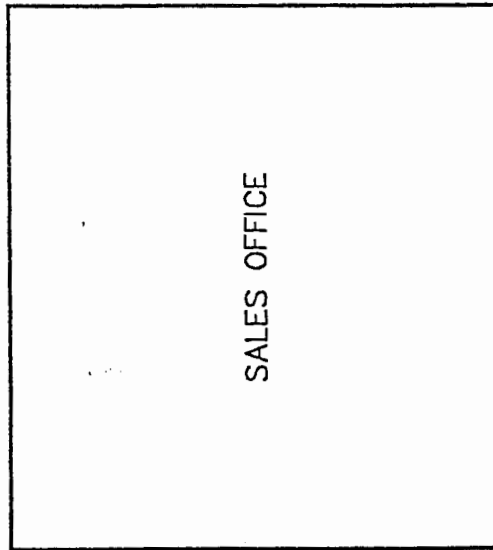
On May 5, 1992, J&J Equipment, Inc. performed the removal of one 550 gallon, steel waste oil tank. The tank had remained inactive since 1986. Prior to the waste oil tank removal, the remaining product was removed. A copy of the product manifest can be found in Appendix A and a site plan illustrating the waste oil tank area is illustrated on Figure 1. No evidence of overspill protection or a network of compliance wells was observed.

Upon removal, the tank was inspected for signs of structural breach. Signs of rusting and pitting was evident, but no signs of breach in the structural integrity was observed. The tank was transported to Tampa Scrap for recycling. A photograph of the old waste oil tank area is presented in Appendix B.



Scale: N.T.S.

ASPHALT

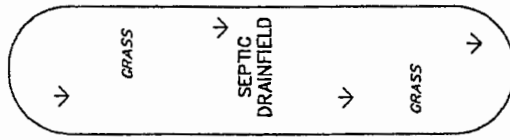


SALES OFFICE

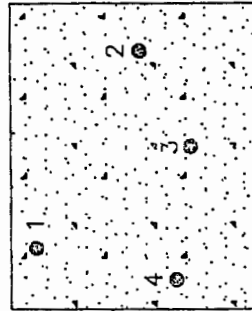


550 GAL. WASTE OIL TANK

ASPHALT



NORTH PARCEL



OLD UNDERGROUND STORAGE TANK AREA

ASPHALT

LEGEND

● SOIL BORING WITH OVA SCREEN

N. SUNCOAST BLVE.

SITE PLAN  
GULF COAST FORD - SOUTH PARCEL  
4020 N. SUNCOAST BLVD.  
CRYSTAL RIVER, FLORIDA

Figure : 1

Project No. : 92-0050

Date : MAY 11, 1992

Drawn By : ECW

Checked By : WKM

**UNIFIED ENVIRONMENTAL SERVICES, INC.**



Prior to the removal of the waste oil tank, in 1986, four, steel, 4000 gallon, gasoline tanks were excavated and removed from the facility. Figure 1 illustrates the old tank area. The old tanks utilized the suction type of system to feed petroleum, via underground, steel, product lines, to two dispensers located on the south side of the sales office building, approximately 15 feet away.

#### Soil Screening Activities (Phase 1)

On May 5, during the removal of the abandoned waste oil tank, approximately 0.037 cubic yards of oil affected soils were observed around the fill port. The affected soils appeared to be restricted to immediately around the fill port and were observed from approximately 0.50-1.0 feet in depth. No other evidence of a discharge from the old waste oil tank was observed. Screening of the soils in the old waste oil tank area, with a calibrated Foxboro, Model 108, Organic Vapor Analyzer (OVA) indicated that less than 10 parts per million of hydrocarbons were present.

Four soil borings were installed in the old, underground tank, gasoline tank area also on May 5, 1992, to determine the presence of petroleum affected soils. A 2.75 inch diameter, stainless steel hand auger was utilized to perform the four soil borings and a calibrated, Foxboro, Model 108, OVA was utilized to screen the soils in accordance with the criteria established in Florida Administrative Code, Chapter 17-770.200. Due to previous backfilling with concrete debris in the gasoline tank area, borings 1-3 resulted in termination at approximately 4 feet in depth. No hydrocarbons were encountered at these first three borings. Soil boring no. 4 did extend to groundwater at approximately 7 feet in depth, with hydrocarbons concentrations at approximately 1000 parts per million and methane detected at approximately 80 parts per million (ppm). Photographs of these soil borings are also presented in Appendix B. A discharge reporting form was immediately filed with the Southwest District of the F.D.E.R..

### INITIAL REMEDIAL ACTION

#### Soil Sampling/Preburn Analyses

On July 12, 1992, a UES hydrogeologist performed three soil borings and obtained soil samples under Comp. QA No. 9200085G. Photographs of the soil borings are presented in Appendix C.



Three soil samples were obtained for pre-burn analyses for TRPH, 8020 and the 8 RCRA Metals. A copy of the preburn analytical reports can be found in Appendix C. All soil samples were obtained in accordance with the criteria established in F.A.C. Chapter 17-775.

#### Soil Excavation

On July 20, 1992, Initial Remedial Action (IRA) was initiated at the old gasoline, underground petroleum tank area. A trackhoe was utilized to excavate the soils, with a backhoe utilized to transport the soils to a visquene area for temporary stockpiling. Screening of the soils was performed continuously during the soil excavation activity. Photographs of the soil excavation and stockpile are presented in Appendix D.

Excavation continued on July 21, 1992, for excessively contaminated petroleum affected soils. After excavation of excessively contaminated soils was complete, the soils were transported off site for thermal treatment.

#### Groundwater Aeration

On July 20, 1992, after excavation of soils was complete, a bubbling unit (BU) was placed into the old underground, gasoline tank area and allowed to operate overnight. A petroleum sheen had been observed on the old tank area groundwater and made OVA interpretation of the soils difficult, if not impossible. By allowing the groundwater concentrations to decrease by the BU and enhanced aeration, determination of soils that were excessively contaminated could more easily assessed the next day.

A groundwater sample was obtained the following morning (7/21/92), prior to further excavation and analyzed for E.P.A. Method 8020 analytes. Tank area groundwater samples were obtained by placing a stainless steel bailer into the tank area groundwater and pulling the bailer across the middle of the excavated area. Results of the groundwater analyses indicated that benzene was present at approximately 29.3 parts per billion (ppb) and Total Volatile Organic Aromatics (Total VOA's) were present at approximately 58.8 ppb. These groundwater concentrations still exceeded the criteria established in F.A.C. Chapter 17-770 for benzene and Total VOA's at 1.0 and 50.0 ppb, respectively.





Excavation of all excessively contaminated soils continued on July 21, 1992. After all encountered petroleum, excessively contaminated soils were removed from the old gasoline tank area and the BU was again placed into the tank area and allowed to operate overnight. Again, on the following morning (7/22/92) another groundwater sample was obtained from the old tank area for E.P.A. Method 602 analysis. Results of the groundwater analyses indicated that all E.P.A. Method 602 constituents were within the criteria established in F.A.C. Chapter 17-770. Copies of the laboratory analytical report for the July 21 and 22 tank area groundwater analyses are presented in Appendix E.

#### Temporary Well Installation

During backfilling of the old gasoline tank area on July 23-24, two, 2 inch diameter, Schedule 40, PVC, monitor wells were installed. These wells can be easily removed and backfilled. Each well is equipped with approximately 10 feet of 0.010 inch slotted screen, 2 feet of solid riser attached with stainless steel screws and a coupling and a traffic bearing manhole. The well head is equipped with a watertight, locking plug and has been grouted inside the manhole in the annular space, to approximately 1.5 feet, below land surface. Groundwater was encountered during the soil excavation at approximately 7 feet below land surface. Photographs of the wells are presented in Appendix F.

#### Groundwater Quality Confirmation

On July 23 and 24, 1992, during the backfilling of the old tank area, groundwater samples were obtained from the old underground tank area for analyses. Results of the groundwater analyses on July 23, 1992 for E.P.A. Method 602 analytes confirmed the groundwater quality to be within the criteria established in F.A.C. Chapter 17-770. Methyl Tert Butyl Ether (MTBE) was detected at approximately 1.72 ppb, with all other analytes within the State of Florida's criteria. The groundwater analyses obtained on July 24, 1992, from the old tank area for E.P.A. Method 602 and 610 analytes also indicated that further remediation had occurred and all analytes tested were below detectable levels and within the criteria established in F.A.C. Chapter 17-770. Copies of these analytical reports can be found in Appendix G.

Typically, several days are allowed to pass before groundwater analyses are obtained from a newly installed well, to allow for equilibrium to establish. Photographs of the well installations are presented in Appendix F. Approximately 5 days after the installation of the two, temporary monitor wells in the old



# UNIFIED ENVIRONMENTAL SERVICES, INC.



TABLE 1

Gulf Coast Ford-South Parcel  
4020 N. Suncoast Blvd.  
Crystal River, Florida

SUMMARY OF OVA RESULTS  
(parts per million)

<u>DEPTH</u>	<u>NORTH</u>	<u>EAST</u>	<u>SOUTH</u>	<u>WEST</u>	<u>CENTER</u>
0-1	<10	<10	<10	<10	<10
1-2	<10	<10	<10	<10	<10
2-3	<10	<10	<10	<10	<10
3-4	<10	<10	<10	<10	<10
4-5	<10	<10	<10	<10	~25
5-6	~30	~30	~30	~45	~300
6-7	~550	~420	~380	~600	~850
7-8	~800	~600	~1200	~4000	~6500
8-9	~150	~100	~250	~440	~480
9-10	<50	<50	<50	<50	<50

Note: Depth is given in feet.  
OVA values have had methane removed, through the use of an activated charcoal filter.



# UNIFIED ENVIRONMENTAL SERVICES, INC.



gasoline tank area, groundwater analyses for E.P.A. Method 602 analytes was obtained. Results of the analyses indicated that all tested analytes were again within the criteria established in F.A.C. Chapter 17-770. A copy of the temporary monitor well laboratory analytical report can be also found in Appendix G, with the locations of the wells illustrated on Figure 1.

## Soil Screening Results

During excavation of the soils on July 20 and 21, 1992, screening of the soils was performed continuously, utilizing a Foxboro, Model 108, OVA. Results of the soil screening revealed that the petroleum affected soils were between 5-7 feet in depth, and encompassed an area approximately 45x35 feet in diameter. Soil values ranged in hydrocarbon values between approximately 6500 ppm at the water table approximately 7-8 feet in depth and decreased to less than 50 ppm at approximately 5 feet in depth. Table 1 summarizes the OVA values observed in the old gasoline tank area.

Four soil borings to approximately 4 feet in depth were performed at the previously existing fuel island locations and to approximately 8 feet in depth, in the old underground, gasoline tank area on July 24, 1992. Screening of the soils at these borings revealed that no indication of a discharge was observed and all OVA values were less than 5 ppm.

## Soil Disposal/Remediation

Because prior soil samples on July 12, 1992 had been obtained and analyzed from the old gasoline tank area, removal of the excavated, excessively contaminated soil from the facility was expediated. Immediately after excavation of the soils, on July 21, 1992, approximately 190.90 tons of excessively contaminated soils were transported to an F.D.E.R. approved thermal incineration facility. A copy of the disposal manifest can be found in Appendix H.

## Discharge Reporting/Closure Assessment/IRA Report Form

Enclosed in Appendix I are copies of the Discharge Reporting Form, Closure Assessment Form and IRA report form.

## Conclusions

Based on the observed groundwater and soil quality after removal of the excessively contaminated soils and confirmation of groundwater quality through several groundwater analyses, the site poses a low environmental risk.



CITRUS COUNTY

# DEPARTMENT OF DEVELOPMENT SERVICES

1300 South Lecanto Highway

Lecanto, Florida 32661-8099

(904) 746-4223

In reply, refer to:

July 27, 1992

Mr. Dennis Morgan  
Nick Nicholas Ford  
2901 Hwy. 44  
Inverness, Florida 32650

Ref. Fac. # 098518715  
Gulf Coast Ford - South Parsel  
US Hwy. 19 & State Park Road  
Crystal River, Florida 32629

Dear Mr. Morgan,

Attached are the 17-761 Florida Administrative Code Compliance inspection results for the above named facility. Our inspector did not indicate violations of Chapter 17-761, F.A.C. at the time of his inspection. We appreciate your firm's attention regarding environmental regulations, for pollutant storage tank system. Also please see comments on front page of inspection report.

If you have any questions concerning this matter, feel free to call upon me.

Sincerely,

Richard T. Sosna  
Fuel Tank Inspector  
Citrus County Fire Prevention

RTS/jf

Attachments: FLIRPA Check list

cc: Keith McDonald - Unified Environmental



State of Florida  
 Department of Environmental Regulation  
**Pollutant Storage Tank System  
 Inspection Report Form**

Facility ID #: 098 518715 County: CITRUS  
 Facility Name: NICK NICHOLAS FORD (GOLF-COURT FORD)  
 Facility Location: US 19 & STATE ROAD RD. JUST OFF RIVER 32679  
 Facility Contact: \_\_\_\_\_ Phone: 775 7371  
 Owner: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Owner Address: \_\_\_\_\_  
 Owner Contact: NICK NICHOLAS DENNISON Owner Change Date: \_\_\_\_\_  
 Latitude: 28° 57' 59" N Longitude: 82° 29' 11" W Fac. Type: WAS A

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
1	6000	B	x/71	U	C	C	Y	B
2	6000	A	x/71	U	C	C	Y	B
3	3000	A	x/71	U	C	C	Y	B
4	3000	A	x/71	U	C	C	Y	B
5	3000	B	5/87	U	AF	U	B	U

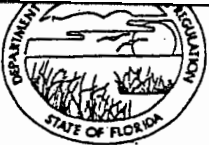
2 NORTH PARCEL

SOUTH PARCEL

Comments: (1) TANKS #1, 2, 3 & 4 REMOVED FROM SITE 486 (NO CLOSURE REQUIRED)  
 (2) SOIL SAMPLES TAKEN JUNE 15, 1992 BY UNIFIED ENVIRONMENTAL WITH EXCESSIVE CONTAMINATION FOUND IN SOIL.  
 (3) 130 CU YDS OF SOIL REMOVED 7/20/92 & (3) TEMPORARY WELLS INSTALLED AFTER WATER WAS TREATED BY BUBBLER SYSTEM  
 COPY OF CLOSURE REPORT TO BE SENT TO CITRUS COUNTY FIRE PREVENTION

Inspection Type: (Choose One) <input type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input checked="" type="checkbox"/> Closure <input type="checkbox"/> Reinspection	Site Information: (All that apply) <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
--	---

DER District or Local Program: CITRUS COUNTY FIRE PREVENTION  
 Inspector Name (Print): KEVIN T. SUND Contact Name (Print): DENNIS MORGAN  
 Inspector's Signature & Date: [Signature] 7/24/92 Contact's Signature & Date: [Signature]



UNDERGROUND STORAGE TANK  
CLOSURE INSPECTION FORM

Date: \_\_\_\_\_

Yes	No	Unk	N/A
-----	----	-----	-----

**REGISTRATION AND NOTIFICATION** 17-761.400 & 450 FAC: Comments: \_\_\_\_\_

1. All of the facility's tanks properly registered; .400	1.				
2. Proper notification made 30 days prior to tank(s) closure; .450 (1) (a)	2.				
3. Proper notice given 24 hours prior to storage tank(s) closure; .450 (4)	3.				

**II. CLOSURE PROCEDURES/STATUS:** 17.761.800 Comments: \_\_\_\_\_

4. Certified contractor performed the tank removal(s); .740 (2)	4.				
5. Storage tank(s) properly closed and removed from the site; (2) (d)	5.				
6. Storage tank(s) properly closed and filled in place; (2) (d)	6.				
7. Storage tank(s) properly closed within 90 days of discovery; (2) (a)	7.				
8. All liquid & sludge removed from the tank(s); (2) (d)	8.				
9. Storage tanks properly purged or inerted prior to transport; (2) (d)	9.				
10. All piping capped and/or removed;	10.				
11. All monitoring wells left in place for contamination assessment purposes; (2) (f)	11.				
12. All monitoring wells have been properly abandoned; .800 (2) (f)	12.				
13. A closure assessment was properly performed; .800 (3),	13.				

**III. DISCHARGE REPORTING** 17-761.460, F.A.C.: Comments: \_\_\_\_\_

14. Evidence of contamination or a discharge reported (Explain in comments) 460 (1), (2) and (3)	14.				
15. Discharge Reporting Form (DRF) submitted; 460 (2)	15.				

**IV. DISCHARGE RESPONSE:** Comments: \_\_\_\_\_

16. Free product present; (Explain in comments)	16.				
17. Free product being removed; 17-761.800 (3) (d) & 17-761.820 (2)	17.				

Comments: CONTAMINATED SOIL REMOVED FROM SITE & TRUCKED  
TO C.A MEYER IN CLERMONT, FL. 7/21/92 FOR BURNING.



# UNIFIED ENVIRONMENTAL SERVICES, INC.



Project # 93-0049

D.E.P.  
FEB 22 1994  
SOUTH FLORIDA DISTRICT  
TAMPA

## CONTAMINATION ASSESSMENT REPORT

for

Gulf Coast Ford-South Parcel  
Old Gasoline and Waste Oil Tank Area  
4020 North Suncoast Boulevard  
Crystal River, Citrus County, Florida

F.D.E.R. # 099201295

January 1994

Prepared For:

Gulf Coast Ford

Prepared By:  
*Keith McDonald*  
Keith McDonald  
Reg. Fl. Geologist  
P.G. #001523

1-28-94



# UNIFIED ENVIRONMENTAL SERVICES, INC.



## TABLE OF CONTENT

<u>SECTION</u>	<u>PAGE No.</u>
1.0 INTRODUCTION-----	1
1.1 Site History-----	1
Figure 1 (Site Vicinity Map)-----	2
2.0 ASSESSMENT METHODOLOGY-----	3
2.1 Monitor Well Installation-----	3
Figure 2 (Site Plan)-----	4
2.2 Soil Boring Methodology-----	5
2.3 Soil Screening Methodolgy-----	5
Figure 3 (Typical Monitor Well Detail)-----	6
Figure 4 (Temporary Monitor Well Detail)-----	7
Figure 5 (Soil Boring Plan)-----	8
2.4 Groundwater Sampling-----	9
2.5 Surface Water/Potable Well Survey-----	9
2.6 Utility Survey-----	10
3.0 CONTAMINATION ASSESSMENT RESULTS-----	10
3.1 Site Geology-----	10
3.2 Free Product Occurrence-----	10
3.3 Horizontal Dissolved Hydrocarbon Plume-----	10
Table 1 (Summary of Groundwater Analyses)-----	11
Figure 6 (Groundwater Dissolved Map)-----	12
Table 2 (Summary of Soil Screening)-----	13
3.4 Soil Contamination Estimate-----	14





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## Table of Content

Content	Page No.
3.5 Groundwater Elevations-----	14
4.0 CONCLUSIONS-----	14
Figure 7 (Groundwater Direction Map: 7/1/93)-----	15
Figure 8 (Groundwater Direction Map: 9-17-93)-----	16
5.0 REFERENCES-----	17



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## 1.0 INTRODUCTION

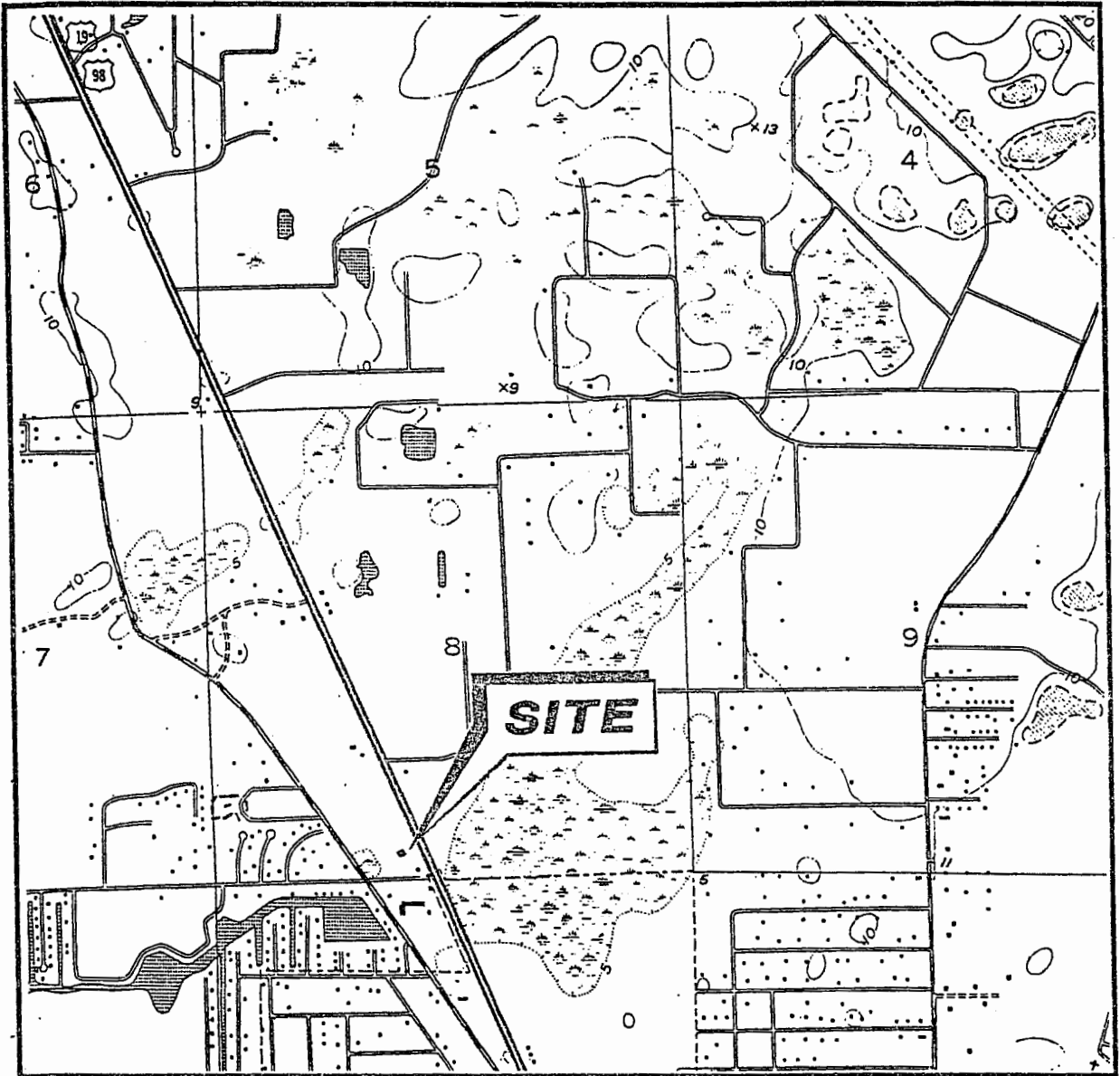
At the request of Gulf Coast Ford, Unified Environmental Services, Inc. (UES) has performed a Contamination Assessment Report for petroleum hydrocarbons, at a previous Chevron facility, located at 4020 North Suncoast Boulevard (Hwy. 19), in Crystal River, Citrus County, Florida. Figure 1 illustrates a Site Vicinity Map for the facility. On May 5, 1993, the result of soil borings in the old gasoline tank area revealed the presence of excessively contaminated soils. A low quantity (0.037 yd) of waste oil affected soils was also observed and removed from around the fill port for the waste oil tank, located approximately 35 feet west of the old gasoline tank area. A Discharge Reporting Form was submitted to the onsite Citrus County/F.D.E.P. representative.

Initial Remedial Action (IRA) activities were performed on the gasoline affected soils on July 20, 1992, with 191 tons of excessively contaminated soils excavated and thermally treated. The excavation was allowed to aerate for two days prior to backfilling. Two temporary wells were installed in the excavation during the backfilling activities, with groundwater analyses results indicating groundwater quality for E.P.A. Method 602 and 610 analytes were within the criteria established in Florida Administrative Code, Chapter 17-770.

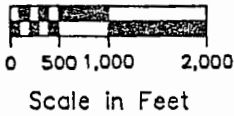
UES supervised the installation of three, permanent, monitor wells to determine the horizontal extent of groundwater contamination. Groundwater samples were obtained by a UES representative and analyzed under Comprehensive Quality Assurance No. 920085G. Analyses was conducted on the groundwater samples for the gasoline group group of parameters, as defined in Florida Administrative Code, Chapter 17-770. The well located adjacent to the previous waste oil tank was also sampled for the gasoline group of parameters as well as E.P.A. Method 625 and 4-RCRA Metals. UES also accomplished the hand auger of eight (8) auger borings in the vicinity of the UST area and dispenser islands to determined if any hydrocarbon contaminated soil existed. Soil screening was accomplished by a UES hydrogeologist, utilizing an Organic Vapor Analyzer, per the criteria set forth in F.A.C. Chapter 17-770.200. This report discusses in detail the investigative methodology and results of findings from the Contamination Assessment.

## 1.1 SITE HISTORY

The facility had operated as a full service gasoline station for automotive vehicles for approximately 15 years, until 1986, when J&J Equipment, Inc. performed the tank removal. Three (3), underground storage tanks (UST's), single-walled, bare steel were



SEC. 8, TWN. 8 SOUTH, RNG. 17 EAST



REFERENCE: U.S.G.S. "CRYSTAL RIVER" FLORIDA QUADRANGLE.  
MAP PHOTOREVISED 1988.

**SITE VICINITY MAP**  
GULF COAST FORD - SOUTH PARCEL  
4020 N. SUNCOAST BLVD.  
CRYSTAL RIVER, FLORIDA

Figure : 1  
Project No. : 93-0049  
Date : 10/29/93  
Drawn By : ECW  
Checked By : WKM

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previously in operation and contained 4,000 gallons of gasoline. Single-walled, steel piping existed from the tanks to the dispensers, with the tanks not being equipped with overspill/overflow protection. The system was the suction type, with the pump dispensers located approximately 40 feet to the southeast of the tanks. Figure 2 illustrates a Site Plan for the previously existing facility.

On May 5, 1992, during the removal and closure assessment of the existing waste oil tank, four soil borings were accomplished at the old gasoline tank area. Excessively contaminated soils were encountered at the south quadrant of the old gasoline tank area. Also, waste oil affected soils (0.037 cubic yard) were encountered at the existing waste oil tank fill port area from approximately 0.50-1.0 feet in depth. Groundwater depth at the site is approximately 7 feet. The Citrus County inspector agreed that the extent of the waste oil affected soils was minimal. A copy of the Discharge Reporting Form for the old gasoline tank area is presented in Appendix A.

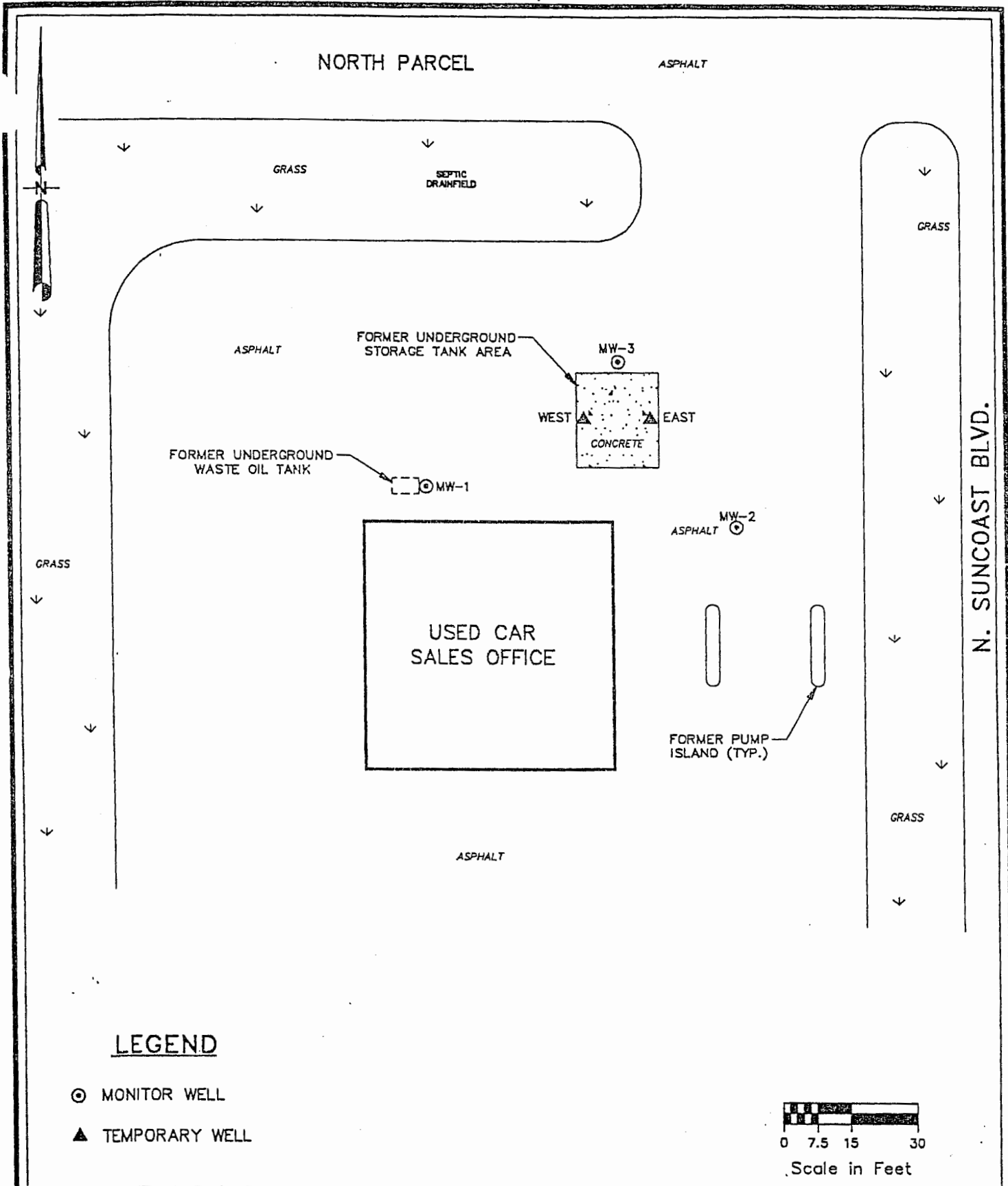
Application to the Abandoned Tank Restoration Program was sought, with eligibility by the F.D.E.P. on January 26, 1993. A copy of the eligibility letter can be found in Appendix B.

## 2.0 ASSESSMENT METHODOLOGY

### 2.1 MONITOR WELL INSTALLATION

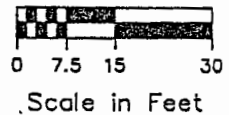
On May 26, 1993, three permanent monitor wells (MW) were installed by Hydrologic Florida, Inc. to delineate the possible horizontal extent of groundwater contamination. Two, (2) temporary monitor wells (East, West) previously existed in the previous gasoline UST area from the IRA activities. Monitor well (MW-1) was installed adjacent to the former waste oil tank and approximately 30 feet to the west of the former gasoline tank. Monitor well no. 2 was installed approximately 20 feet to the southeast and monitor well no. 3 was installed approximately 5 feet to the north of the former gasoline tank area. Figure 2 illustrates a Site Plan, illustrating the well locations. The methodology for the installation of all wells utilized to obtain groundwater data is presented below.

The three monitor wells installed on May 26, 1993, are constructed of two (2) inch diameter, Schedule 40 PVC, and consist of ten (10) feet of 0.010 inch slotted screen and two (2) feet of solid riser. Groundwater was encountered approximately seven (7) feet in depth below land surface (BLS). The wells were installed by utilizing a 6.25 inch diameter, O.D. hollow-stem auger and rotary drilling



**LEGEND**

- ⊙ MONITOR WELL
- ▲ TEMPORARY WELL



**SITE PLAN**  
**GULF COAST FORD - SOUTH PARCEL**  
**4020 N. SUNCOAST BLVD.**  
**CRYSTAL RIVER, FLORIDA**

Figure : 2  
 Project No. : 93-0049  
 Date : 10/29/93  
 Drawn By : ECW  
 Checked By : WKM

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procedures. All down hole equipment was steam cleaned and clean gloves were utilized between each well. The annular space in the borehole was packed with a 6/20 quartz, clean, well sorted sand to approximately one (1) foot above the well screen. A bentonite seal was placed above the sand pack for approximately 0.50 feet and the remaining annular space was grouted to the surface. The well was completed with a locking expansion plug and a traffic bearing manhole. The well was developed until the development water was clear. Figure 3 illustrates a Typical Monitor Well Detail.

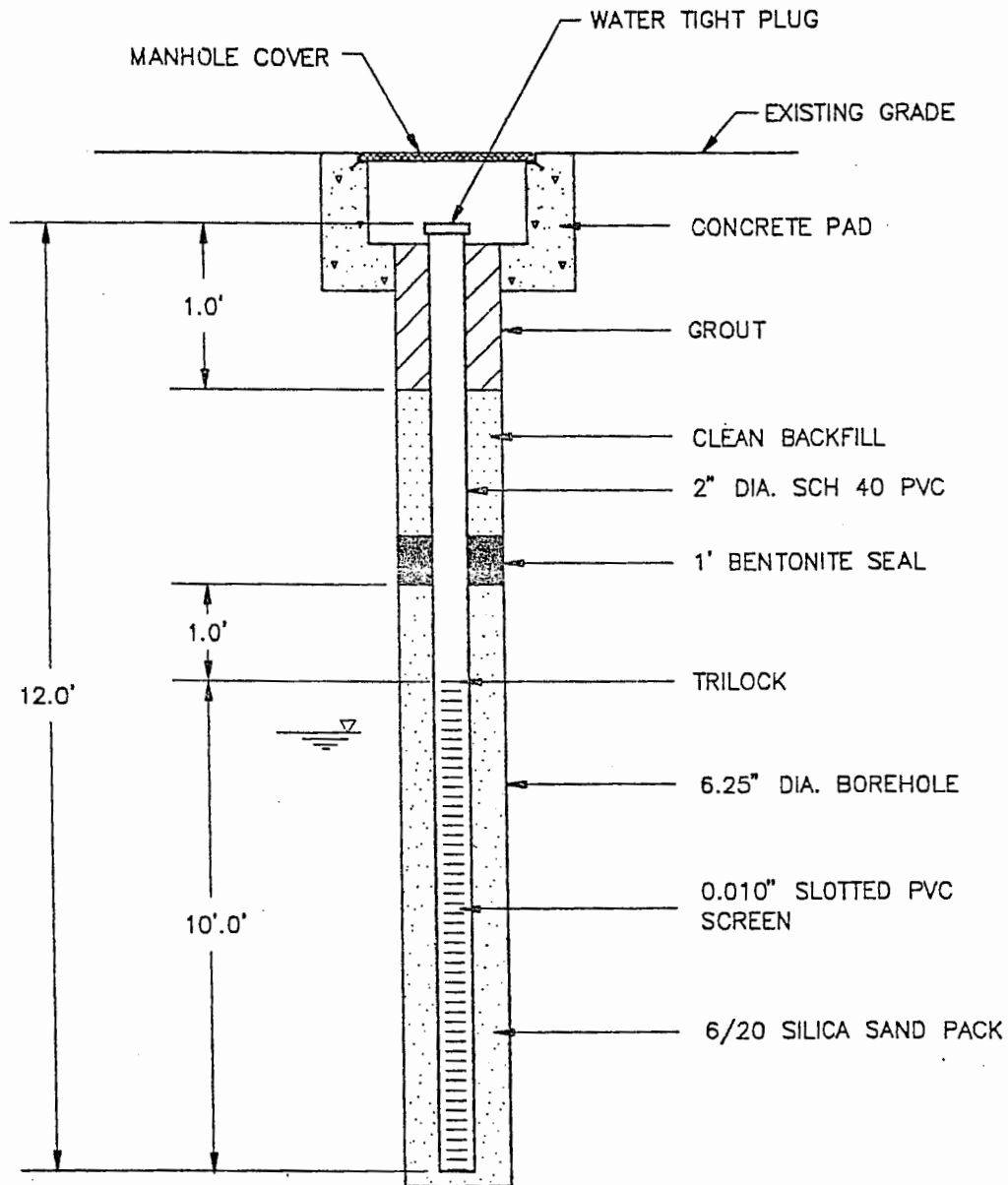
On July 23, 1992, two temporary monitor wells were installed in the previous gasoline tank area soil excavation to allow for groundwater quality correlation. The wells are constructed of PVC well screen approximately 5 feet in length, two inches in diameter, with three feet of solid riser. The borhole was created with a 2 foot wide, trackhoe bucket, during the IRA activities, with the well inserted in the excavation approximately 2 feet into the groundwater. Natural backfill, clean sand was utilized to fill the hole, with the wells held in place by a rope. The top of casing of the temporary wells were then placed into a traffic bearing manhole, with a concrete grout placed from land surface to approximately 2 feet in depth. A water tight plug was placed on top the well. Figure 4 presents a temporary monitor well detail.

## 2.2 SOIL BORING METHODOLOGY

On May 26, 1993, eight (8) soil borings (SB) were drilled. The soil borings were accomplished with a 2.75 inch diameter, stainless steel hand auger. Decontamination between soil borings was accomplished with a soap/water scrub and clean water rinse. Soil samples were obtained at one foot intervals from land surface to approximately 7 feet in depth. Figure 5 presents a soil boring plan. The auger borings were utilized to determine the site geology and to obtain soil samples for OVA analysis.

## 2.3 SOIL SCREENING METHODOLOGY

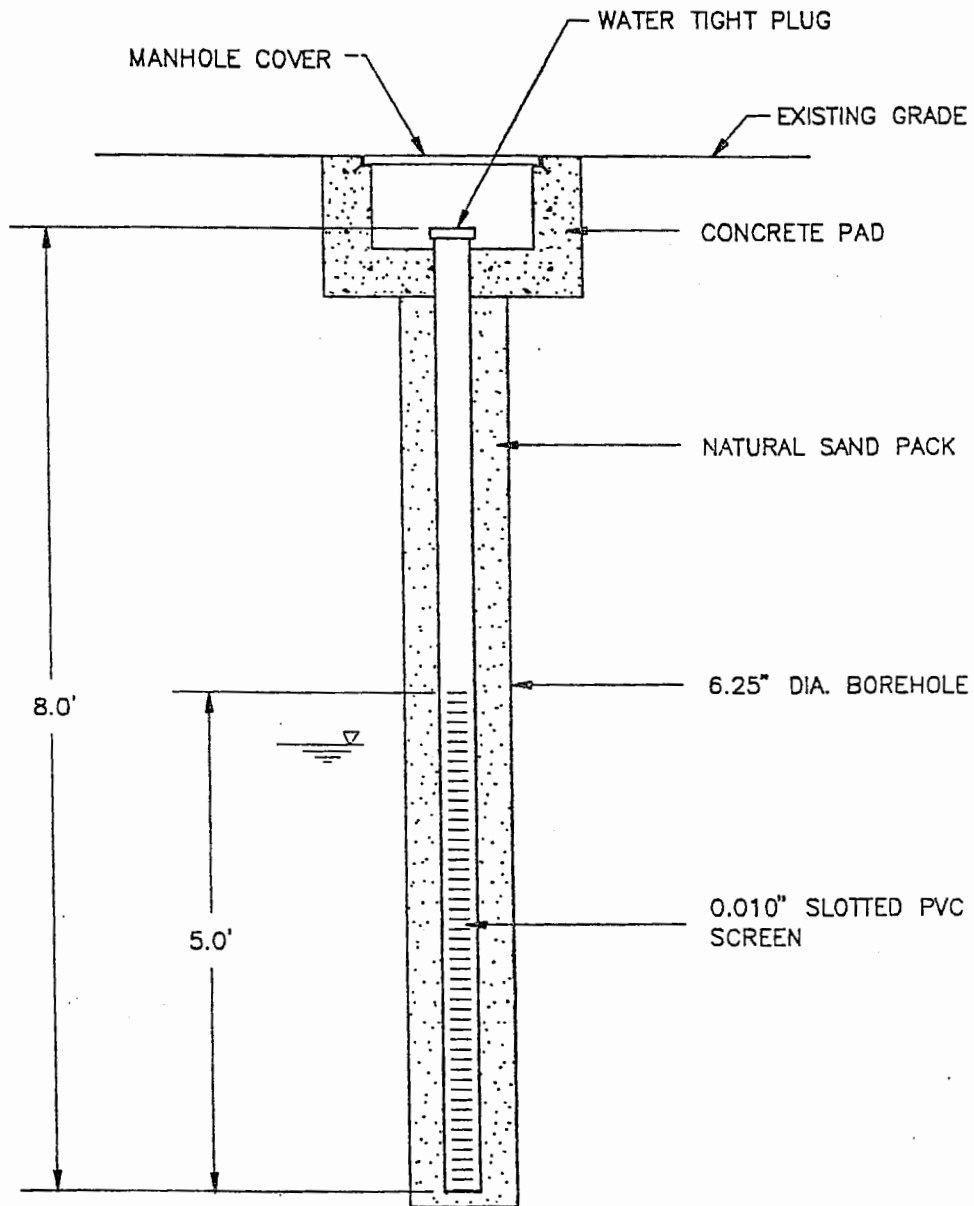
During drilling of the soil borings and installation of the permanent monitor wells, the soil cuttings were continuously screened with a Foxboro, Model 108, Organic Vapor Analyzer (OVA). During the drilling activities, grab soil samples were obtained at 2 foot intervals and placed in 500 ml, glass jars and immediately covered with aluminum foil. The OVA was calibrated prior to use with standard gases (methane-95ppm and zero air) to assure proper soil screening values. Periodically, an activated charcoal filter was placed on the OVA pump intake to discern between the presence of hydrocarbons and methane. Decontamination of the soil jars was



**TYPICAL MONITOR WELL DETAIL**  
 GULF COAST FORD - SOUTH PARCEL  
 4020 N. SUNCOAST BLVD.  
 CRYSTAL RIVER, FLORIDA

Figure : 3  
 Project No. : 93-0049  
 Date : 10/29/93  
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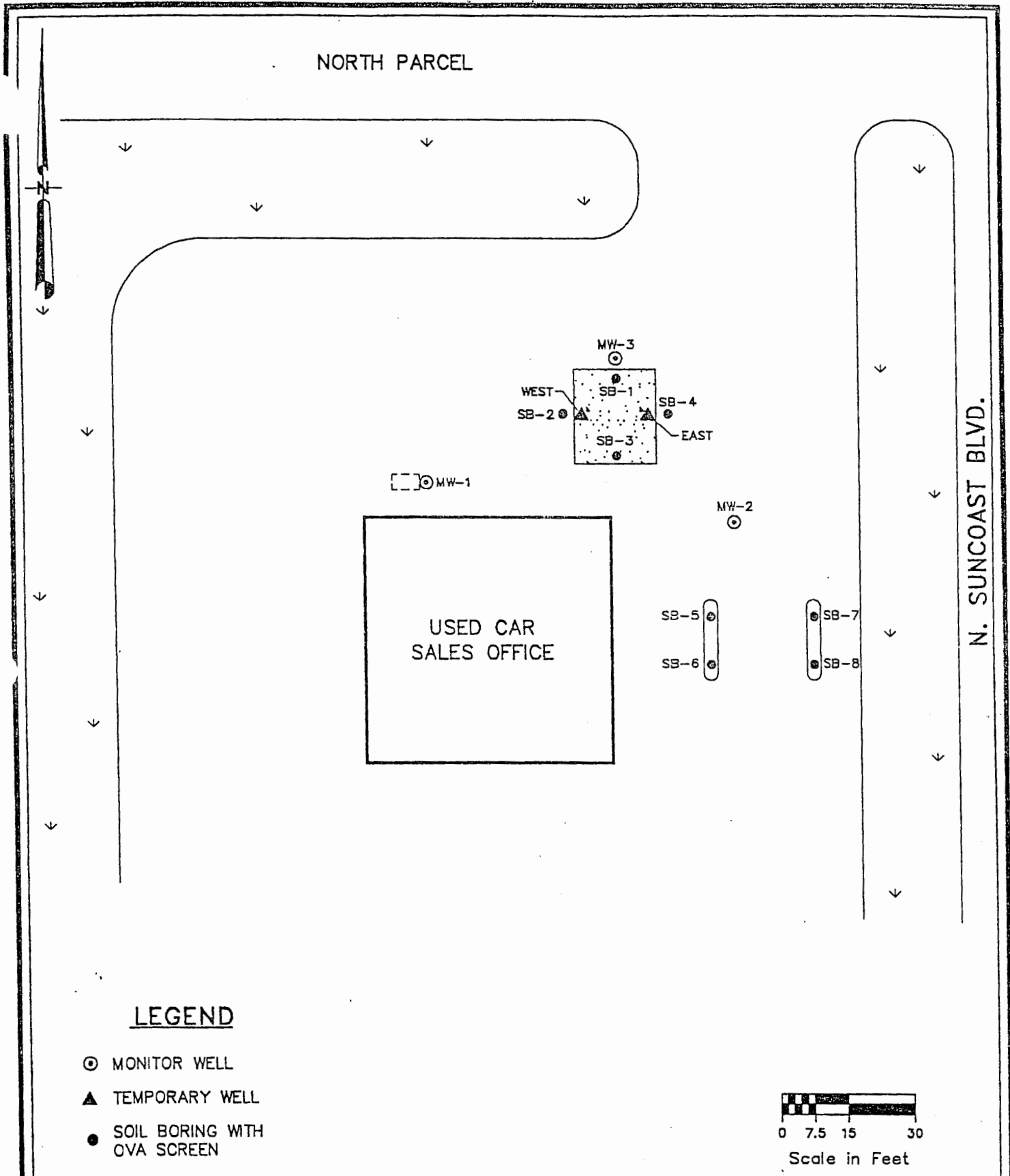


TEMPORARY WELL DETAIL  
 GULF COAST FORD - SOUTH PARCEL  
 4020 N. SUNCOAST BLVD.  
 CRYSTAL RIVER, FLORIDA

Figure : 4  
 Project No. : 93-0049  
 Date : 10/25/93  
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 Checked By : WKM

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**SOIL BORING PLAN**  
**GULF COAST FORD - SOUTH PARCEL**  
**4020 N. SUNCOAST BLVD.**  
**CRYSTAL RIVER, FLORIDA**

Figure : 5
Project No. : 93-0049
Date : 10/29/93
Drawn By : ECW
Checked By : WKM

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accomplished using a mixture of detergent and potable water with potable water being the final rinse. All soil screening was accomplished in accordance with the criteria established in Florida Administrative Code, Chapter 17-770.200.

## 2.4 GROUNDWATER SAMPLING

UES obtained a groundwater samples and analyzed the sample in accordance with EPA procedures and in accordance with UES's approved Comprehensive Quality Assurance Plan, no. 920085G. Appendix C contains a copy of the approved FDER QA Sheet. Prior to obtaining groundwater samples, the well was purged at least five (5) well volumes and allowed to recharge, to assure the collection of a representative groundwater sample.

The groundwater samples were immediately placed on ice and delivered to the laboratory for analyses. Groundwater analyses from MW-1 was performed for E.P.A. Method 601,602,504.1,239.2, 625 and four metal analyses (Ar.Cd, Cr, Pb). MW's 2-3 were sampled for E.P.A. Method 601,602,504.1 and 239.2 analyses and the east and west temporary wells were sampled for E.P.A. Method 602 analyses. A 1.5 inch diameter, stainless steel hand bailer was utilized to purgé the five well volumes and obtain the groundwater samples.

## 2.5 SURFACE WATER/POTABLE WELL SURVEY

As seen by Figure 1, the site is located approximately 700 feet, northeast of a canal that leads to the Gulf Of Mexico. The Gulf of Mexico is located approximately 0.75 mile east of the facility. A wetlands area is located to the east of Highway 19, approximately 200 feet.

Potable water and waste water disposal is provided to Gulf Coast Ford via a potable well and septic tank. The potable well and septic tank are approximately 400 feet to the northwest of the old gasoline tank area. The Crystal River Water Department has water and waste water lines within 0.10 mile of the site and plans to transfer these utilities to the Gulf Coast Ford South Parcel are in progress. No other potable wells were observed within a one-quarter mile radius of the site by a field reconnaissance survey performed on May 26, 1993, by a UES hydrogeologist.



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## 2.6 UTILITY SURVEY

The existence of underground utilities at the facility was determined by obtaining site plans of existing utilities. Local utility companies were contacted and clearance was obtained of existing utilities. No utilities were observed that would serve as conduit for hydrocarbon migration.

## 3.0 CONTAMINATION ASSESSMENT RESULTS

### 3.1 SITE GEOLOGY

During all monitor well drilling activities, soil samples were collected and field analyzed to determine site lithology. Figure 5 illustrates the location of the soil borings. Drillers logs are provided in Appendix D. As indicated from land surface to approximately 5 feet in depth, a fine grained quartz sand was encountered. Underlying this, a fine grained well sorted quartz sand, with some clay and limestone was encountered to a depth of approximately 8 feet. Limestone was encountered at approximately 8-12 feet, with sand lenses observed. The Crystal River Limestone encountered consisted of a soft texture, white appearance with abundant marine fossils. The Crystal River Formation is part of the Ocala Group and is of late Eocene Age.

### 3.2 FREE PRODUCT OCCURRENCE

No free product has been observed at the facility.

### 3.3 HORIZONTAL DISSOLVED HYDROCARBON PLUME

The analytical reports for the wells can be found in Appendix E. All of the testing of the five wells indicated that the concentrations were within the criteria outlined in F.A.C. Chapter 17-770, with the exception of dissolved lead. Dissolved lead was detected at 0.110 and .653 parts per million in monitor wells no. 2 and 3, respectively. The State of Florida allowable limit is 0.05 parts per million. Table 1 presents a summary of the groundwater analytical data and Figure 6 presents a groundwater plume map for the facility.

No indication of groundwater impact from waste oil was observed from groundwater analyses of the gasoline group of constituents, E.P.A. Method 625 and four RCRA Metal analyses. The previously



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TABLE 1

Gulf Coast Ford  
4020 N. Suncoast Blvd.  
Crystal River, Citrus County, Florida

SUMMARY OF GROUNDWATER ANALYSES  
(parts per billion)

Location	BEN.	T.VOA	MTBE	601	EDB	PB	AR	CD	CR	625
Temp-WEST	<1	<5	<5	--	--	--	--	--	--	---
Temp-EAST	<1	<1	<1	--	--	--	--	--	--	---
MW-1	<1	<1	<1	<1	<.02	.03	.11	.02	.15	<1
MW-2	<1	<1	<1	<1	<.02	.11	--	--	--	---
MW-3	<1	<1	<1	<1	<.02	.66	--	--	--	---

NOTE:

All results are expressed in parts per billion (ppb), with the exception of the metal analyses. Metals are expressed in parts per million.

BEN-Benzene, T.VOA-Total Volatile Organic Aromatics,

EDB-Ethylene Dibromide.

MTBE-Methyl Tert Butyl Ether

PB-Lead

AR-Arsenic

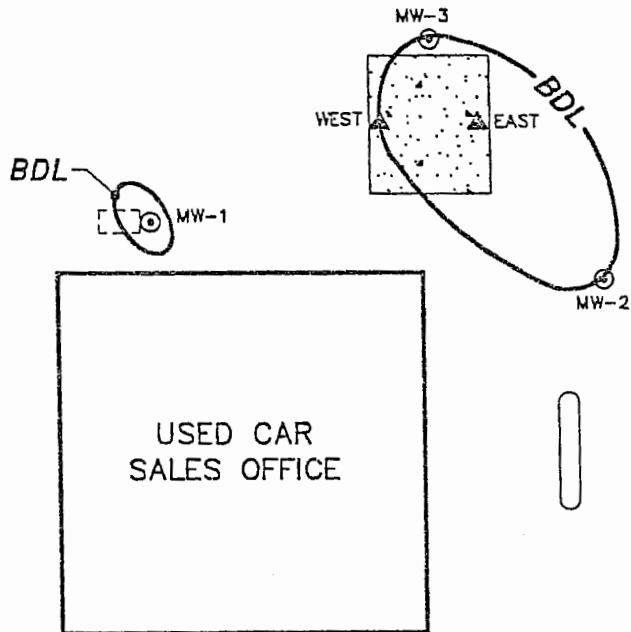
CD-Cadmium

CR-Chromium

601- E.P.A. Method 601 analyses (SOLVENTS)

625- E.P.A. Method 625 analyses (Base Neutrals/Acid Extractable)

NORTH PARCEL



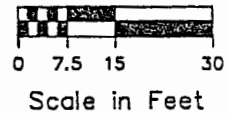
**LEGEND**

⊙ MONITOR WELL

▲ TEMPORARY WELL

— BDL GROUNDWATER PLUME CONTOUR

BDL = BELOW DETECTABLE LIMITS



**GROUNDWATER PLUME MAP**  
CRYSTAL RIVER FORD - SOUTH PARCEL  
4020 N. SUNCOAST BLVD.  
CRYSTAL RIVER, FLORIDA

Figure : 6  
Project No. : 93-0049  
Date : 10/29/93  
Drawn By : ECW  
Checked By : WKM

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TABLE 2

Gulf Coast Ford  
4020 N. Suncoast Blvd.  
Crystal River, Citrus County, Florida

## SUMMARY OF SOIL SCREENING (parts per million)

Sample Location	Depth	Hydrocarbon	Methane
MW-1	0-12	<1	<3
MW-2	0-12	<1	<1
MW-3	0-12	<1	<1
SB-1	0-7	<10	<1
SB-2	0-7	<10	<1
SB-3	0-7	<10	<1
SB-4	0-7	<10	<1
SB-5	0-7	<10	<1
SB-6	0-7	<10	<1
SB-7	0-7	<10	<1
SB-8	0-7	<10	<1

Note: All results are expressed in parts per million and were obtained with a calibrated, Foxboro, Model 108, Organic Vapor Analyzer. Depth is given in feet.



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observed waste oil affected soils had been documented in the Closure Assessment as being restricted to the 0.50-1.0 feet in depth. Groundwater depth is approximately 7 feet.

## 3.4 SOIL CONTAMINATION ESTIMATE

The screening of the soils was accomplished to approximately 12 feet in depth to the north, south and west (MW1-3) of the old gasoline tank area and to approximately 7 feet in depth in soil borings no. 1-8. Screening of the soils in all soil screening episodes revealed that no hydrocarbon contaminated petroleum affected soils were encountered. Previously, 191 tons of excessively and contaminated soils were removed and disposed during the IRA activities. Table 2 presents a summary of the soil screening results and Figure 5 presents the locations of the soil borings.

## 3.5 GROUNDWATER ELEVATIONS

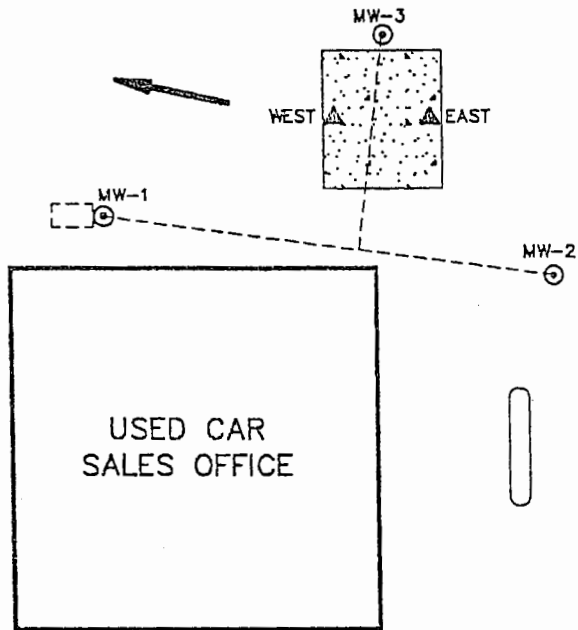
On July 1 and September 17, 1993, groundwater elevations were obtained. The top of casings had previously been surveyed to a common benchmark and depth to groundwater was obtained from monitor wells no. 1-3, with the data presented in tabular form on the figures. As seen by Figures 7 and 8, the groundwater flow direction varies and flowed to the west and southwest, for the respective dates. Hydraulic gradient ( $i$ ) was calculated by utilizing the hydraulic difference between MW 1 and 2. The distance is approximately 70 feet, with a hydraulic difference of 0.03 feet. With  $i=g/d$ , a hydraulic gradient of 0.0004 ft/ft was estimated. With the close proximity to the canal to the west and a wetlands to the east, shallow aquifer conditions may be influenced tidal and precipitation.

## 4.0 CONCLUSIONS

Groundwater quality impact appears to be low, with dissolved lead detected above allowable concentrations. Petroleum contaminated soils or free product were observed to not exist. Groundwater flow directions appears to be to the west-southwest, with a hydraulic gradient of approximately 0.0004 ft/ft. Due to presence of low level dissolved lead in the groundwater, it is recommended that a Monitoring Only Plan (MOP) be implemented for one year.

NORTH PARCEL

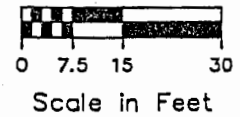
N. SUNCOAST BLVD.



**LEGEND**

- ⊙ MONITOR WELL
- ▲ TEMPORARY WELL
- ← GROUNDWATER FLOW DIRECTION

WELL No.	SURVEY DATA (FT)	DEPTH TO WATER (FT)	CORRECTED DEPTH TO WATER (FT.)
MW-1	9.63	6.83	2.80
MW-2	8.61	5.74	2.87
MW-3	9.28	6.45	2.83



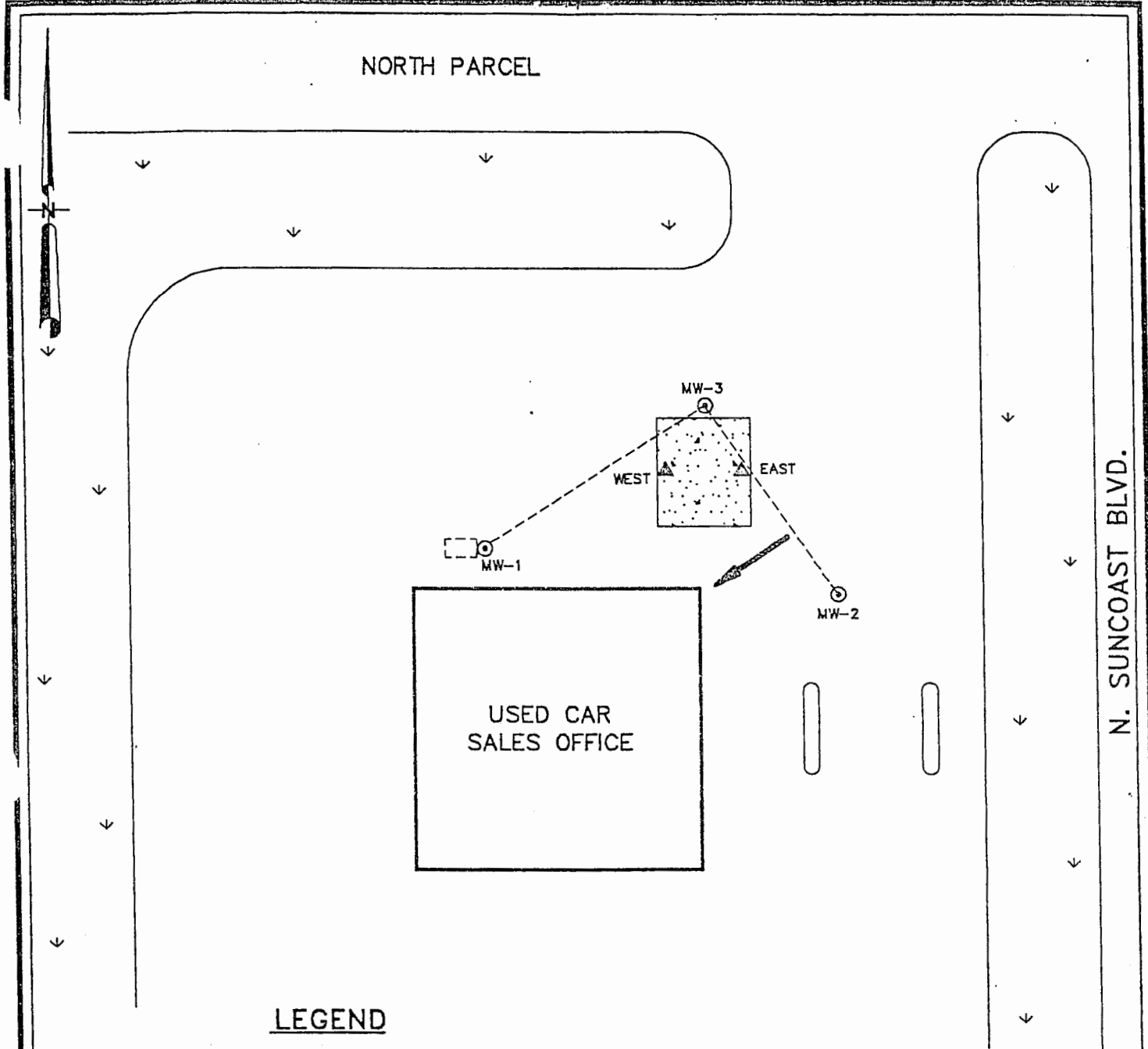
**GROUNDWATER CONTOUR MAP**  
 (JULY 1, 1993)  
 GULF COAST FORD - SOUTH PARCEL  
 4020 N. SUNCOAST BLVD.  
 CRYSTAL RIVER, FLORIDA

Figure : 7.  
 Project No. : 93-0049  
 Date : 10/29/93  
 Drawn By : ECW  
 Checked By : WKM

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NORTH PARCEL



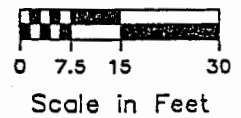
LEGEND

⊙ MONITOR WELL

▲ TEMPORARY WELL

← GROUNDWATER FLOW DIRECTION

WELL No.	SURVEY DATA (FT)	DEPTH TO WATER (FT)	CORRECTED DEPTH TO WATER (FT.)
MW-1	9.63	7.05	2.78
MW-2	8.61	6.08	2.53
MW-3	9.28	6.76	2.52



**GROUNDWATER CONTOUR MAP**  
 (SEPTEMBER 17, 1993)  
 GULF COAST FORD - SOUTH PARCEL  
 4020 N. SUNCOAST BLVD.  
 CRYSTAL RIVER, FLORIDA

Figure : 8  
 Project No. : 93-0049  
 Date : 10/29/93  
 Drawn By : ECW  
 Checked By : WKM

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Monitor wells no.1-3 are recommended for Quarterly E.P.A. Method 602 and 239.2 groundwater analyses. Listed below are the sampling and reporting schedule for this MOP recommendation.

1st Quarter: Sample- 3/28/94  
2nd Quarter: Sample- 6/28/94  
3rd Quarter: Sample- 7/29/94  
4th Quarter: Sample 12/28/94  
Yearly report: Submittal on 1/28/95

## 5.0 REFERENCES

Environmental Geology and Hydrogeology of the Ocala Area, Florida  
1991, FGS, Lane and Hoenstine

Hydrogeologic Framework: Special Publication No. 32, 1991,  
F.D.E.R., F.G.S., F.D.N.R.

Applied Hydrogeology, 1989, Fetter Jr.



Storage Tank Facility Compliance Inspection Report

Facility ID 8518715 County 09/CITRUS Inspection Date 9/13/00  
 Facility Name GULF COAST FORD Facility Type C-USER  
 Latitude 28°55'12" Longitude 82°36'40" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ATSS Inspected	<u>1</u>
------------------	------------------	----------

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

"Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
COMMENTS	Release detection is a monthly visual check of the tank, its interstice, the integral piping, and the dispenser liner. Be sure any conditions noted during the monthly checks are recorded in the log. at the time of this inspection there was ~ 8-10 inches of liquid <del>in the</del> in the dispenser lines.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.  
 Insurance Carrier: C+I Effective Date: 1/24/2000 Expiration Date: 1/24/2001  
 Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_  
 None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  
 Yes  No  CWOE - Compliance without Enforcement  
 A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS CNTY. ENV. HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Rosa Harper</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> <u>9/13/00</u> Inspector Signature & Date	<u>Rosa Harper</u> <u>9-13-00</u> Facility Representative Signature & Date

Facility Name: GULF COAST FORD Facility ID: 8518715 Date: 9/13/00

Site	Description / Inspector's Comments
Comments CONT.	Have the liquid removed within 7 days and if it has any signs of contamination (example sleet) be sure it is properly disposed of.
	The tank interstice is monitored continuously by a "pop up" float gauge that indicates no liquid in the interstitial space.
	The integral pipe is all above ground and is protected from siphon by a <del>manometer</del> solenoid valve mounted on top of the tank.
	fill area is painted in accordance with API 1637 and is equipped with a spill bucket.
	An RDR is on file at the facility.

September 13, 2000

Mr. Dennis Morgan  
Nick Nicholas Ford  
P.O. Box 639  
Inverness, FL 34451

RE: ID # 098518715  
Gulf Coast Ford  
2440 N.W. Hwy 19  
Crystal River, FL 34428

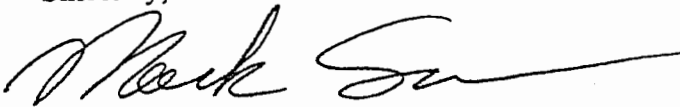
Dear Mr. Morgan:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Enclosed, please find a copy of the Storage Tank Facility Compliance Inspection Report for the inspection recently performed at the above named facility. Please refer to this report for comments regarding the inspection.

If there are any questions concerning this matter, you may contact the Storage Tank Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

Enclosure(s)

CMS/file

---

**CITRUS COUNTY DEPARTMENT OF HEALTH**

ENVIRONMENTAL HEALTH DIVISION  
STORAGE TANKS INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316



This data is current as of: 12-SEP-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 8518715	District: SWD
Name: GULF COAST FORD INC	County: Citrus
2440 Nw Hwy 19	Type: Fuel User/Non-Retail
Crystal River, FL 34428-6321	Status: Open
Contact: Nick Nicholas & Bill Buckner	Latitude: 28:55:12.0000
Phone: 352-795-7371	Longitude: 82:36:40.0000
	LL Method: AGPS

*CMS*

**Account Owner Information**

Name: Nicholas, Nick & Taylor L E  
 Po Box 639  
 Inverness, FL 34451-639  
 Phone: 904-726-1231

**Tank Owner Information**

Name: Nicholas, Nick & Taylor L E  
 Po Box 639  
 Inverness, FL 34451-639  
 Phone: 904-726-1231

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
5	2000	Unleaded Gas	12/01/1997	ABOVE	U	C P O R	A I K B	F Q 4
1	6000	Unleaded Gas	07/01/1971	UNDER	B		K	
1R1	3000	Unleaded Gas	05/01/1987	UNDER	B			
2	6000	Leaded Gas	07/01/1971	UNDER	B			
3	3000	Leaded Gas	07/01/1971	UNDER	B			
4	3000	Leaded Gas	07/01/1971	UNDER	B			

*CMS*

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!



UNIFIED  
ENVIRONMENTAL SERVICES, INC.



May 1, 1999

Ms. Nancy Knight  
FDEP-Tanks Section  
Tampa, Florida

RE: Groundwater Quality Assessment  
Gulf Coast Ford  
2440 North Suncoast Boulevard  
Crystal River, Florida  
FDEP# 098518715

Dear Ms. Knight:

At the request of Mr. Nicholas, another groundwater sample was obtained from the temporary well in the former underground gasoline tank area that previously exhibited 16 parts per billion of benzene in December 1997. On February 5, 1999, the groundwater was purged five well volumes from the temporary well and sampled under UES approved Comprehensive Quality Assurance Plan No. 920085. Results of the EPA Method 602 groundwater analyses from the temporary well indicates below detectable levels and clean groundwater for tested analytes. Enclosed is Attachment A is a copy of the February 1999 groundwater analytical reports.

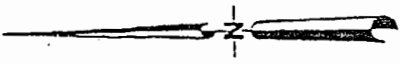
Based on the findings of the soil and groundwater testing and based on current groundwater quality at the previous area of concern, a No Further Action status is requested for the former underground tank area and facility.

Please contact me with any questions at the telephone number listed below.

Respectfully Submitted,

Keith McDonald  
Reg. Fl. Geologist  
P.G.# 001523

cc: Mr. Nick Nicholas-GC Ford



Scale: N.T.S.

REPAIR

SALES

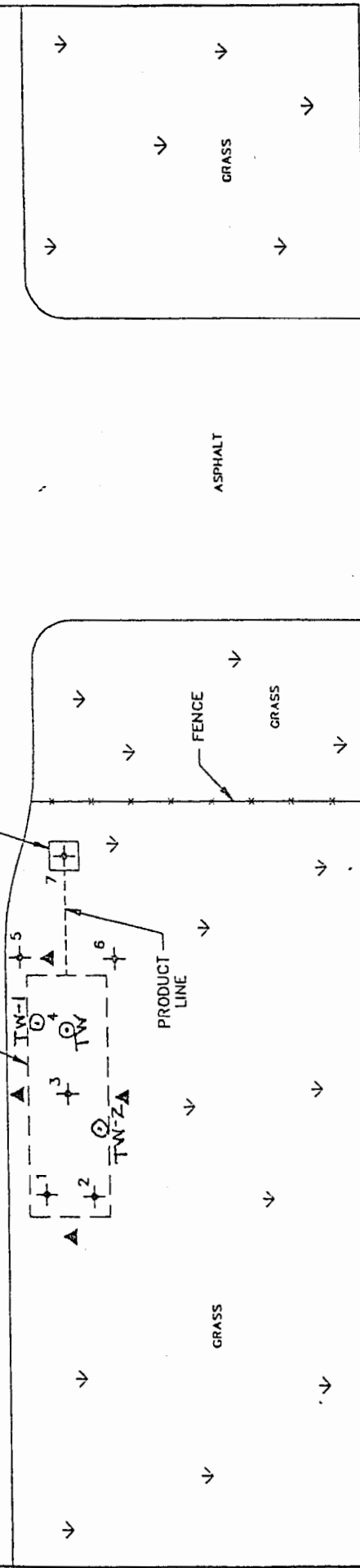
LEGEND

- ▲ COMPLIANCE WELL
- ⊕ SOIL SAMPLE WITH OVA SCREEN
- ⊙ TEMPORARY WELL

ASPHALT

ASPHALT

FORMER 3,000 GAL. FUEL GASOLINE UST FUEL DISPENSER



SITE PLAN  
 GULF COAST FORD  
 U.S. HIGHWAY 27/19  
 CRYSTAL RIVER, FLORIDA

Figure : 1

Project No. : 97-0044

Date : 01/05/97

Drawn By : SEW

Checked By : WKM

**UNIFIED ENVIRONMENTAL SERVICES, INC.**



**Alpha Analytics, Inc.**  
**(407)-382-5742**

EP 1. METHOD 602

Client project: Gulf Coast Fo

UST Area

Client I.D.	MW-1	Equip Blank	Method Blank
Alpha I.D.	9902013-1	9902013-2	9902013-3
Date Sampled	2/5/99	2/5/99	NA
Date Analyzed	2/11/99	2/11/99	2/11/99
Dilution Factor	1	1	1
Matrix	Liquid	Liquid	Liquid
Units (ppb)	ug/L	ug/L	ug/L
Benzene	1.0 U	1.0 U	1.0 U
Toluene	1.0 U	1.0 U	1.0 U
Chlorobenzene	1.0 U	1.0 U	1.0 U
Ethylbenzene	1.0 U	1.0 U	1.0 U
Total xylenes	1.0 U	1.0 U	1.0 U
1,2-Dichlorobenzene	1.0 U	1.0 U	1.0 U
1,3-Dichlorobenzene	1.0 U	1.0 U	1.0 U
1,4-Dichlorobenzene	1.0 U	1.0 U	1.0 U
MTBE	1.0 U	1.0 U	1.0 U
Total BTEX	1.0 U	1.0 U	1.0 U

The qualifier "U" denotes that the analyte was not present at the limit of detection shown. Because of interferences sometimes present in environmental samples, the limit may be higher than the published "Method Detection Limit", which was written for pure water. Most often, a higher detection limit will directly reflect a dilution factor.





Project No. 97-0044

TANK CLOSURE ASSESSMENT REPORT  
AND  
LIMITED CONTAMINATION ASSESSMENT REPORT  
for

Gulf Coast Ford  
2440 North SunCoast Boulevard  
Crystal River, Florida

F.D.E.P.# 098518715  
December 1997

Prepared For:

Mr. Nick Nicholas  
Owner

Prepared By:  
*Keith McDonald*  
Keith McDonald  
Reg. Fl. Geologist

2-10 -98



### Introduction

At the request of the J&J Equipment, Inc, on December 22, 1997, Unified Environmental Services, Inc. (UES) performed soil screening during the removal of an underground, gasoline tank located at 2440 North SunCoast Boulevard (Hwy. 19) in Crystal River, Citrus County, Florida. Screening of the soils at the former dispenser and tank area was performed at one intervals in depth. One temporary well was also installed and sampled for gasoline constituents.

After analyses of the groundwater was received, low level benzene was detected above site rehabilitation levels. In response to this and after discussion with Citrus County and the FDEF in Tampa, Florida, additional activities were requested. Two temporary wells and groundwater analyses for EPA Method 602 and 610 constituents was accomplished and one composite soil sample for Fl Pro Total Petroleum Hydrocarbons was obtained. All environmental activities were accomplished under UES 's approved ComQAPP No. 920085. This report dicusses the findings of these investigative activities.

### Tank Removal Activities

On December 22, 1997, the removal of one 3000 gallon, underground, single-walled steel tank that utilized suction was accomplished by J&J Equipment, Inc. The tank appeared to be in excellent structural condition. The tank was cleaned onsite and disposed as scrap steel. A copy of the tank removal form, registration, tank disposal and product disposal manifest are provided in Attachment A.

### Soil Screening Activity

On December 22, 1997, the tank closure assessment activities involved boring and screening the soils at one foot intervals in depth at the dispensers, product line and tank area to the groundwater. This activity was performed by a UES Professional Geologist, utilizing a 3.5 inch diameter, stainless steel hand auger and a calibrated, Foxboro, Model 108, Organic Vapor Analyzer (OVA). During use of the OVA, both a particle and activated charcoal filter were placed over the OVA pump intake, to discern between the presence of hydrocarbons and methane gases. Soils were placed into two separate 16 oz. glass mason jars and immediately covered with aluminum foil. Decontamination between soil samples was accomplished with a soap/water scrub and clean water rinse. A Citrus County/FDEF representative was present for these activities.



Results of the screening episode can be found in Table 1 and Figure 1 illustrates a site plan and the soil boring locations. As seen by the OVA results, no excessively contaminated soils were observed. The greatest soil screening value observed was 2 parts per million located at soil boring no. 4, where the product line, vent line and fill entered the tank. Groundwater was encountered at approximately 7 feet in depth.

#### Groundwater Quality

Following the removal of the underground tank, one 2 inch diameter, temporary monitor well was installed at soil sample location no. 4. The well consist of 5 feet of 0.010 inch slotted screen and 5 feet of riser. The well was sand packed, developed and sampled for EPA Method 802 constituents.

Results of the groundwater analyses are presented in Attachment B. Benzene was detected at 16 parts per billion and Total Volatiles were detected at 357 parts per billion. Regulatory site rehabilitation levels for benzene and Total Volatiles are 1 and 50 parts per billion, respectively.

#### Closure Assessment/Discharge Reporting Form

Enclosed in Attachment C is a copy of the Closure Assessment and Discharge Reporting Forms for the facility.

#### LIMITED CONTAMINATION ASSESSMENT

In response to the detected low level groundwater quality impact from hydrocarbons, two additional temporary monitor wells were installed. The additional wells also consisted of 5 feet of 0.010 inch slotted screen and 5 feet of solid riser. The annular space in the borehole was sand packed and the wells developed on January 7, 1998. The wells are grouted at land surface and have water-tight plugs. During installation of the two additional wells, the soils were screened with the OVA and one composite soil sample obtained for FL PRO Total Petroleum Hydrocarbon analyses. The composite soil sample was obtained from temporary well location no. 1, between 4-7 feet in depth. Also wellhead elevations and depth to groundwater was obtained on January 8, 1998, from the wells prior to purging and sampling. Presented below are the findings of these investigative activities.



TABLE 1

Texaco Food Mart  
 7593 W. Grover/Cleveland Blvd.  
 Homossassa, Florida

SUMMARY OF OVA RESULTS  
 (parts per million)

<u>Soil Sample</u>	<u>Depth</u>	<u>Total Value</u>	<u>Methane</u>	<u>Hydrocarbons</u>
1	0-6	Tank	-----	-----
1	6-7	~5	~5	<1
2	0-6	Tank	-----	-----
2	6-7	<1	<1	<1
3	0-6	Tank	-----	-----
3	6-7	<1	<1	<1
4	0-6	Tank	-----	-----
4	6-7	~11	~9	~2
5	0-7	<1	<1	<1
6	0-7	<1	<1	<1
7	0-7	<1	<1	<1
TMW-1	0-7	<1	<1	<1
TMW-2	0-7	<1	<1	<1

NOTE: Depth is presented in feet below land surface, with the greatest value observed in the sample interval presented.

TMW: Temporary Monitor Well.

LEGEND

- ▲ COMPLIANCE WELL
- ⊕ SOIL SAMPLE WITH OVA SCREEN
- ⊙ TEMPORARY WELL

REPAIR

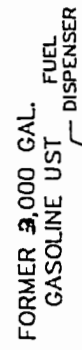
SALES

Scale: N.T.S.

ASPHALT

ASPHALT

FORMER 3,000 GAL. GASOLINE UST FUEL DISPENSER



ASPHALT

FENCE

PRODUCT LINE

GRASS

GRASS

GRASS

Figure : 1

Project No. : 97-0044
Date : 01/05/97
Drawn By : SEW
Checked By : WKM

**UNIFIED ENVIRONMENTAL SERVICES, INC.**

SITE PLAN  
 GULF COAST FORD  
 U.S. HIGHWAY 27/19  
 CRYSTAL RIVER, FLORIDA



### Soil Quality

Results of the soil screening with the OVA are presented on Table 1 and Figure 1 presents the location of the two additional temporary wells. All soil screening values for the two additional wells indicated less than 1 part per million of hydrocarbons were present. The composite soil sample analyses obtained from temporary well no. 1 indicates 9.1 part per million of Total Petroleum Hydrocarbons. A copy of the soil sample (ss-1) analyses is presented in Attachment D.

### Groundwater Quality

Results of the groundwater quality analyses indicates that all EPA Method 610 constituents are below detectable levels. Temporary well no. 2 also exhibited below detectable levels for EPA Method 602 constituents. Temporary well no. 1 exhibited 11 parts per billion of Toluene and 8 parts per billion of Total Xylenes. Results of the groundwater analyses can also be found in Attachment D.

### Conclusions

Low level groundwater quality impact was initially observed during Closure Assessment. Due to aeration, dilution, dispersion and natural biodegradation, subsequent groundwater quality analyses via two additional wells indicates acceptable site rehabilitation levels have been achieved. Soil quality indicates acceptable levels. No human receptor were observed within a 0.50 mile radius of the site. A No Further Action status is requested for the site.



Postmark: Fax Note 7672

To: David Chawister  
Company: \_\_\_\_\_  
Location: \_\_\_\_\_  
Fax #: \_\_\_\_\_  
Telephone #: \_\_\_\_\_

No. of Pages: 1-6-98  
From: Nick Nicholas  
Company: \_\_\_\_\_  
Location: \_\_\_\_\_  
Fax #: \_\_\_\_\_  
Telephone #: \_\_\_\_\_

Today's Date: 1-6-98 Time: 10

Dept. Charge: \_\_\_\_\_  
Telephone #: \_\_\_\_\_

Original Disposition:  Destroy  Return  Call for pickup

*Received  
W/tee 1:30pm*



**Florida Department of Environmental Regulation**  
Twin Towers Office Bldg. • 2600 West Stone Road • Tallahassee, Florida 32399-2400

DER Form # 17-761.8000  
Form Title: Discharge Reporting Form  
Revision Date: December 10, 1989  
DER Application No. \_\_\_\_\_ of and by DER

## Discharge Reporting Form

- Use this form to notify the Department of Environmental Regulation of:
- Results of tank tightness testing that exceed allowable tolerances within ten days of receipt of test result.
  - Potential discharges exceeding 25 gallons on pervious surfaces as described in Section 17-761.450 F.A.C. within one working day of discovery.
  - Hazardous substances (CERCLA regulated), discharges exceeding applicable reportable quantities established in 17-761.450(2) F.A.C., within one working day of the discovery.
  - Within one working day of discovery of suspected releases confirmed by: (a) released regulated substances or pollutants discovered in the surrounding area, (b) unusual and unexplained storage system operating conditions, (c) monitoring results from a leak detection method or from a tank closure assessment that indicate a release may have occurred, or (d) manual tank gauging results for tanks of 550 gallons or less, exceeding ten gallons per weekly test or five gallons averaged over four consecutive weekly tests.

Mail to the DER District Office in your area listed on the reverse side of this form

PLEASE PRINT OR TYPE  
Complete all applicable blanks

1. Facility ID Number: 098518715 2. Tank Number: 1 3. Date: 1-5-98

Facility Name: Gulf Coast Ford

Facility Owner or Operator: Nick Nicholas

Facility Address: 2440 N. Suncoast Blvd, Crystal River, FL 34428

Telephone Number: (352) 26-1231 County: Citrus

Mailing Address: P.O. Box 639, IVERNESS, FL 34451-0639

Date of receipt of test results or discovery: 1-2-98 month/day/year

Method of initial discovery, (circle one only)

A. Liquid detector (automatic or manual)    D. Emptying and inspection.    F. Vapor or visible signs of a discharge in the vicinity.

B. Vapor detector (automatic or manual)    E. Inventory control.     Closure: GW Results (explain)

C. Tightness test (underground tanks only).    H. Other: \_\_\_\_\_

Estimated number of gallons discharged: \_\_\_\_\_

What part of storage system has leaked? (circle all that apply)    A. Dispenser    B. Pipe    C. Fitting    D. Tank     E. Unknown

Type of regulated substance discharged, (circle one)

A. leaded gasoline    D. vehicular diesel    L. used/waste oil    V. hazardous substance includes pesticides, ammonia, chlorine and derivatives (write in name or Chemical Abstract Service CAS number) \_\_\_\_\_

B. unleaded gasoline    F. aviation gas    M. diesel    Z. other (write in name) \_\_\_\_\_

C. gasohol    G. jet fuel    Q. nonflube oil

Cause of leak, (circle all that apply)

A. Unknown    C. Loose connection    E. Puncture    G. Spill    I. Other (specify) \_\_\_\_\_

B. Spill    D. Corrosion    F. Installation failure    H. Overfill

Type of financial responsibility, (circle one)

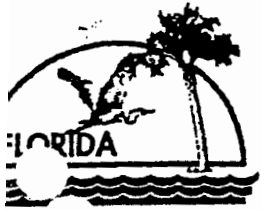
A. Third party insurance provided by the state insurance contractor    C. Not applicable

B. Insurance pursuant to Chapter 17-769.500 F.A.C.    D. None

To the best of my knowledge and belief all information submitted on this form is true, accurate, and complete.

Nick Nicholas  
Printed Name of Owner, Operator or Authorized Representative

Nick Nicholas  
Signature of Owner, Operator or Authorized Representative



# Department of Environmental Protection

97

Lawton Chiles  
Governor

Twin Towers Office Building  
2600 Blair Stone Road  
Tallahassee, Florida 32399-2400

Virginia B. Wetherell  
Secretary

May 28, 1997

Mr. Dennis Morgan  
Nick Nicholas Ford, Inc.  
Post Office Box 639  
Inverness, Florida 34451-0639

RE: Nick Nicholas Ford  
2901 U.S. Highway 44 West  
Inverness, Florida  
DEP Facility #098626580

Dear Mr. Morgan:

The Bureau of Petroleum Storage Systems has reviewed the Contamination Assessment Report (CAR) and No Further Action Proposal (NFAP), dated March 22, 1997 (received April 7, 1997), submitted for this site. Documentation submitted with the NFAP confirms that criteria set forth in Rule 62-770.630(3), Florida Administrative Code (F.A.C.), have been met. The NFAP is hereby incorporated by reference in this Order. Therefore, you are released from any further obligation to conduct site rehabilitation at the site, except as set forth below.

If a subsequent discharge of petroleum or petroleum product occurs at the site, the Department may require site rehabilitation in order to reduce contaminant concentrations to the levels approved through review of the NFAP or otherwise allowed by Chapter 62-770, F.A.C.

Persons whose substantial interests are affected by this Site Rehabilitation Completion Order have the right to challenge the Department's decision. Such a challenge may include filing a petition for an administrative determination (hearing) as described in the following paragraphs. However, pursuant to Chapter 62-103, F.A.C., you may request an extension of time to file the Petition. All requests for extensions of time or petitions for administrative determinations must be filed directly with the Department's Office of General Counsel at the address given below within twenty-one (21) days of receipt of this notice (do not send them to the Bureau of Waste Cleanup).

Notwithstanding the above, a person whose substantial interests are affected by this Site Rehabilitation Completion Order may petition for an administrative proceeding (hearing)

in accordance with Section 120.57, Florida Statutes (F.S.). The petition must contain the information set forth below and must be filed (received) in the Office of General Counsel of the Department at the Douglas Office Building, 3900 Commonwealth Boulevard, Tallahassee, Florida 32399-3000, within 21 days of receipt of this notice. Failure to file a petition within this time period shall constitute a waiver of any right such person may have to request an administrative determination (hearing) under Section 120.57, F.S.

The Petition shall contain the following information:

- (a) The name, address, and telephone number of each petitioner, the Department file number (DEP facility number), and the name and address of the facility;
- (b) A statement of how and when each petitioner received notice of the Department's action or proposed action;
- (c) A statement of how each petitioner's substantial interests are affected by the Department's action or proposed action;
- (d) A statement of the material facts disputed by each petitioner, if any;
- (e) A statement of facts which each petitioner contends warrant reversal or modification of the Department's action or proposed action;
- (f) A statement of which rules or statutes each petitioner contends require reversal or modification of the Department's action or proposed action; and
- (g) A statement of the relief sought by each petitioner, stating precisely the action each petitioner wants the Department to take with respect to the Department's action or proposed action.

This Site Rehabilitation Completion Order is final and effective on the date of receipt of this Order unless a petition (or time extension) is filed in accordance with the preceding paragraphs. Upon the timely filing of a petition, this Order will not be effective until further order of the Department.

When the Order is final, any party to the Order has the right to seek judicial review of the Order pursuant to Section 120.68, F.S., by filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules of Appellate Procedure, with the Clerk of the Department in the Office of General Counsel, Douglas Office Building, 3900 Commonwealth Boulevard, Tallahassee, Florida 32399-3000; and by filing a copy of the Notice of Appeal, accompanied by the applicable filing fees, with the appropriate District Court of Appeal. The Notice of Appeal must be filed within 30 days from the date the Final Order is filed with the Clerk of the Department.

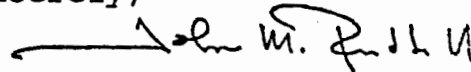
Please be advised that mediation of this decision, pursuant to Section 120.573, F.S., is not available.

Mr. Dennis Morgan  
May 28, 1997  
Page 3

The DEP Facility Number for this site is 098626580. Please use this identification on all future correspondence with the Department.

Any questions you may have on the technical aspects of this Site Rehabilitation Completion Order should be directed to Michael J. Bland at (904) 921-9024. Contact with the above named person does not constitute a petition for administrative determination.

Sincerely,



John M. Ruddell, Director  
Division of Waste Management

JMR/mjb

cc: Keith McDonald, Unified Environmental Services - Orlando  
Laurel Culbreth, DEP Southwest District Office  
~~Dick Sosna, Citrus County Fire Prevention Bureau~~

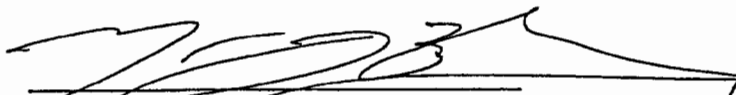
P.G. CERTIFICATION

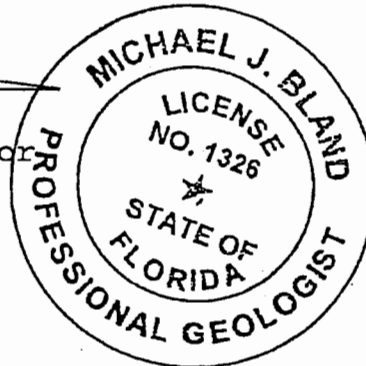
NFAP for 098626580

I hereby certify that in my professional judgement, the components of this NFAP satisfy the requirements set forth in Chapter 62-770, F.A.C., and that the geological interpretations in this report provide reasonable assurances of achieving the assessment objectives stated in Chapter 62-770, F.A.C.

I personally completed this review.

This review was conducted by XXXXXXXX working under my direct supervision.

  
\_\_\_\_\_  
Michael J. Bland, P.G.  
Professional Geologist Administrator  
Petroleum Cleanup Section 4



6/3/97  
\_\_\_\_\_  
Date

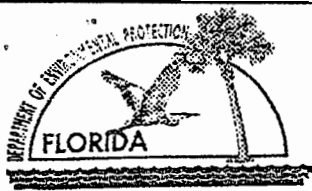
**Site No. 100 Shell - Seven Rivers (aka Texaco #242030614)**

6164 N. Suncoast Boulevard

Crystal River, Florida

FDEP I.D. No. 098842367

EPA I.D. No. FLD984180067



Storage Tank Facility Compliance Inspection Report

Facility ID 8842367 County 09 CITRUS Inspection Date 4/19/01  
 Facility Name SHELL SEVEN RIVERS Facility Type A-RETAIL  
 Latitude 28°57'01" Longitude 82°37'35" L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>4</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	<input checked="" type="checkbox"/>
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	<u>See PAGE # 2</u>	
	<u>FOR COMMENTS.</u>	

Financial Responsibility - Verify owner's coverage. Select *Insurance* or *Other*, and provide *Mechanism*, if appropriate.

Insurance Carrier: GREAT AMERICAN Effective Date: 1/1/01 Expiration Date: 1/1/02

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes     No     CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5289</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Billie Watson</u> Facility Representative Name - Please Print
<u>Mark Sumner</u> Inspector Signature & Date	<u>Billie Watson</u> Facility Representative Signature & Date







1. data is current as of: 19-APR-2001

Bureau of Petroleum Storage Systems  
Facility Inspection Cover Page

Facility Information

ID#: 8842367	District: SWD
Name: SHELL SEVEN RIVERS	County: Citrus
6164 N Suncoast Blvd	Type: Retail Station
Crystal River, FL 32629-6711	Status: Open
Contact: Tom Rushmore	Latitude: 28:57:01.0000
Phone: 352-629-0361 <i>cms</i>	Longitude: 82:37:35.0000 <i>cms</i>
	LL
	Method: AGPS

Account Owner Information

Name: Rushmore Ltd  
 109 Ne 9th St  
 Ocala, FL 34428  
 Phone: 352-629-0361

Tank Owner Information

Name: Rushmore Ltd  
 109 Ne 9th St  
 Ocala, FL 34428  
 Phone: 352-629-0361

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
1	8000	Unleaded Gas	04/01/1988	UNDER	U	A F M O	C F J K	K G L 3 5
2	8000	Unleaded Gas	04/01/1988	UNDER	U	A F M O	C F J K	K G L 3 5
3	8000	Unleaded Gas	04/01/1988	UNDER	U	A F M O	C F J K	K G L 3 5
	6000	Vehicular Diesel	04/01/1988	UNDER	U	A	C	3

*cms*

4 6000 Vehicular Diesel 04/01/1988 UNDER U

F F 5  
M I G  
O K L

} *Class.*

\* Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

Open Violations

Insp Date	Viol Numb	Sig Level	Violation Text
01/24/2001	86	B	Release Detection Performed At Least Once A Month

Most Recent Insurance Document

FR Type	Effective Date	Expiration Date	Company Name
INSURANCE	11/01/1997	01/01/2002	COMMERCE & INDUSTRY

End of Data for Facility #: 8842367

GROUNDWATER ELEVATION SUMMARY  
 TEXACO FOOD STORE  
 6164 N. SUNCOAST BOULEVARD  
 CRYSTAL RIVER, FLORIDA  
 FDEP FACILITY NUMBER 098842367

Monitor Well Number	Reference Elevation	9/1/94 DTW	GWE	11/23/94 DTW	GWE
MW-1	98.25	4.58	93.67	4.72	93.53
MW-2	97.76	4.08	93.68	4.22	93.54
MW-3	97.94	4.14	93.80	4.40	93.54
MW-4	98.43	4.74	93.69	4.92	93.51
MW-5	98.46	4.81	93.65	4.98	93.48
MW-6	98.51	NM	NM	5.01	93.50
MW-7	98.38	NM	NM	4.85	93.53
DMW-1	98.35	NM	NM	4.80	93.55
Notes:					
All measurements recorded in feet					
DTW = depth to groundwater					
GWE = groundwater elevation					

TABLE NO. 2  
 Summary of OVA Readings  
 Texaco Food Store  
 6164 N. Suncoast Boulevard  
 Crystal River, Florida  
 DEP Facility I.D. #098842367

Soil Boring Location	Depth in Ft.	TOV (ppm)	Filtered (ppm)	Corrected (ppm)
SB-1	1.5	70	20	50
	2.5	120	15	105
	3.5	130	20	110
SB-2	1.5	100	65	35
	2.5	180	60	120
	3.5	840	200	640
SB-3	1	ND	ND	ND
	2	ND	ND	ND
	3	ND	ND	ND
SB-4	1	ND	ND	ND
	2	ND	ND	ND
	3	ND	ND	ND
SB-5	1.5	65	32	33
	2.5	74	20	54
SB-6	1.5	800	200	600
	2.5	> 1000	420	> 580
	3.5	> 1000	340	> 660
SB-7	1.5	ND	ND	ND
SB-8	1.5	ND	ND	ND
SB-9	1	ND	—	ND
	2-4	1,000	1,000	ND
SB-10	1	ND	—	ND
	2-4	20	ND	20
SB-11	1	ND	—	ND
	2-4	ND	—	ND

All readings measured with an organic vapor analyzer (OVA) equipped with a flame-ionization detector.

SB-1 Through SB-8 Were Performed on September 1, 1994.

SB-9 Through SB-10 Were Performed on November 21, 1994.

- ND — Not Detected
- ppm — Parts Per Million
- TOV — Total Organic Vapors
- Filtered — Filtered With Carbon
- Corrected — Petroleum Hydrocarbon Vapors (Difference Between TOV and Filtered Readings)
- > — Greater Than

TABLE NO. 3  
Summary of Compliance Well Construction Details  
Texaco Food Store  
6164 N. Suncoast Boulevard  
Crystal River, Florida  
DEP Facility I.D. #098842367

Location	Depth to Top of Screen (ft)	Total Depth (ft)
MW-1	2.4	9.6
MW-2	2.1	9.0
MW-3	1.1	11.0
MW-4	2.5	9.8

Note: Well construction details were determined by field measurements on September 1, 1994.

U.S. HIGHWAY 19

RETENTION/DRAINAGE DITCH

GRASSY AREA

SEPTIC TANK

CONCRETE CURB

ONE-STORY BUILDING

CANOPY

DISPENSER ISLANDS

SB-7

MW-7

SB-5

MW-6

SB-6

SB-9

MW-10

SB-10

EXTENT OF DISSOLVED HYDROCARBONS

MW-5

ND/ND/ND

SB-1

MW-1

220/257/ND

SB-2

MW-2

ND/ND/ND

SB-3

MW-3

ND/ND/ND

TANK FARM

SB-4

MW-4

ND/ND/ND

SB-3

GRASSY AREA

VENT PIPES

GRASSY AREA

TREES

SITE PLAN



MONITORING WELL

M...

XX/XX/XX

TOTAL NAPHTHALENES (ppb)  
TOTAL VOA CONCENTRATION (ppb)  
BENZENE CONCENTRATION (ppb)

ND NOT DETECTED

▲ SOIL BORING LOCATIONS

○ NEW MONITORING WELLS

○ NEW DEEP MONITORING WELL

PROJECT NO: 73-07-94-00138
SCALE: APPROX. 1" = 50'
DATE: 12-6-94
FIGURE NO: 1

TEXACO FOOD MART  
6184 N. SUNCOAST BOULEVARD  
CRYSTAL RIVER, FLORIDA

**ATEC Associates, Inc.**  
5555 West Waters Avenue, Suite 604  
Tampa, Florida 33634  
(813) 886-0907/Hillsborough County  
(813) 449-0151/Pinellas County  
FAX // (813) 886-0893

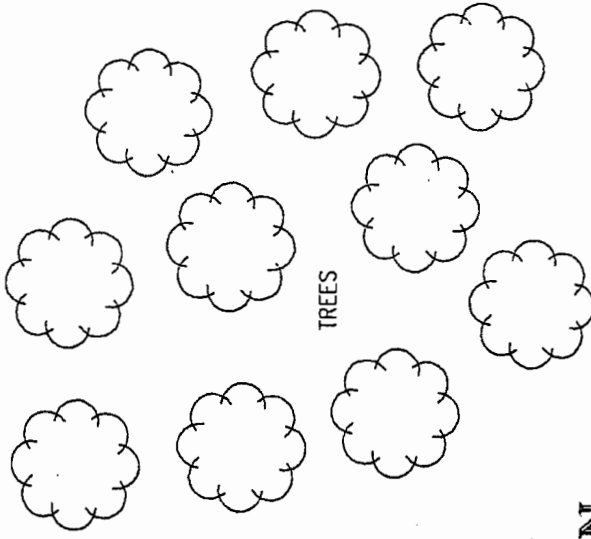
DRAWN BY: J.T.D. CHECKED BY:

**LEGEND**

MW-1  
 MONITORING WELL WITH GROUNDWATER ELEVATION (0.0)

NM  
 NOT MEASURED

—  
 EQUIPOTENTIAL LINE  
 CONTOUR INTERVAL = 0.05 FT.



**GROUNDWATER ELEVATION  
 CONTOUR MAP - SEPTEMBER 1, 1994**

PROJECT NO: 73-07-94-00138
SCALE: APPROX. 1" = 50'
DATE: 12-8-94
FIGURE NO: 2

**ATEC Associates, Inc.**  
 5555 West Waters Avenue, Suite 604  
 Tampa, Florida 33634  
 (813) 886-0907/Hillsborough County  
 (813) 449-0151/Pinellas County  
 FAX / (813) 886-0893

**TEXACO FOOD MART**  
 6164 N. SUNCOAST BOULEVARD  
 CRYSTAL RIVER, FLORIDA

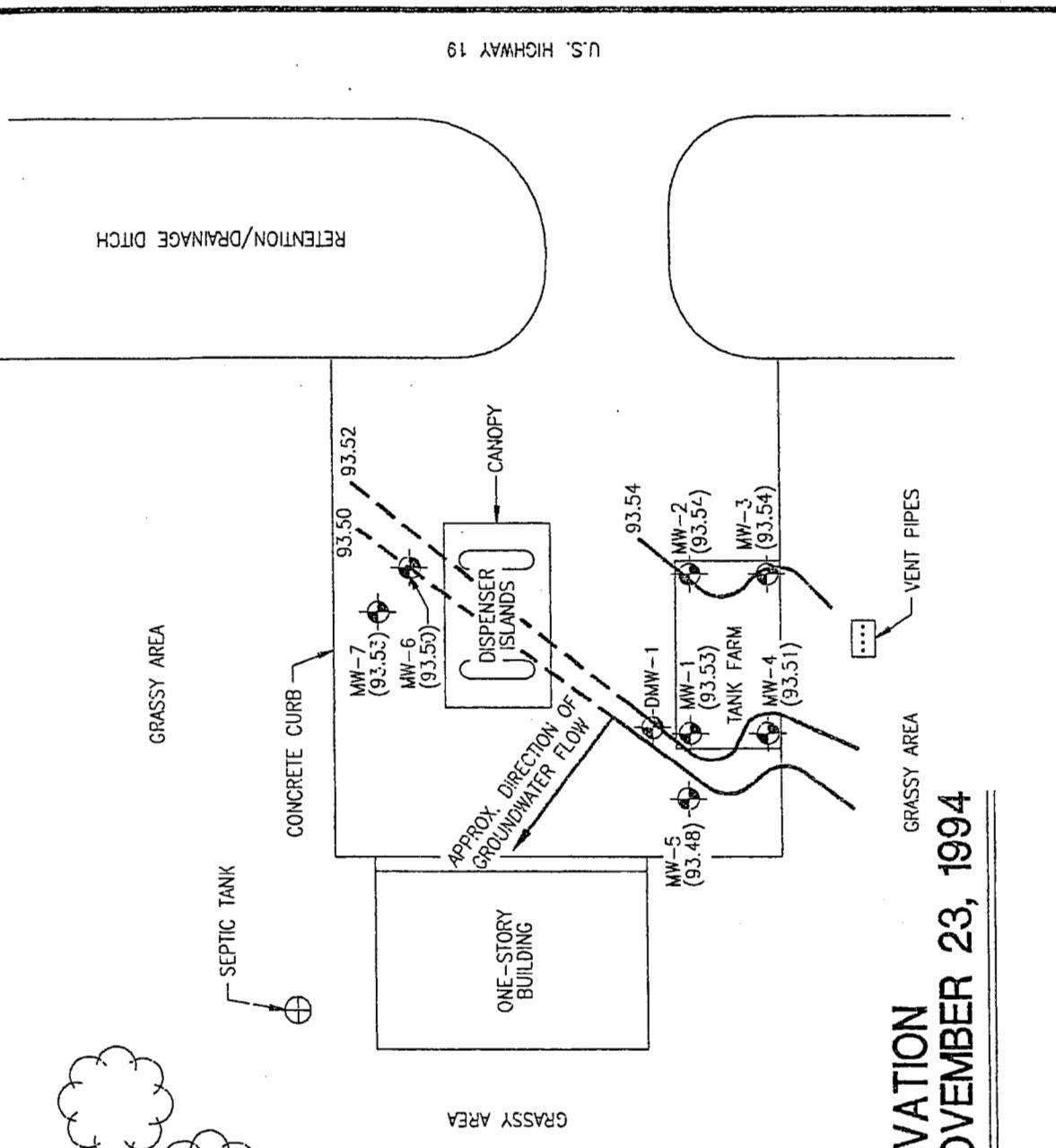
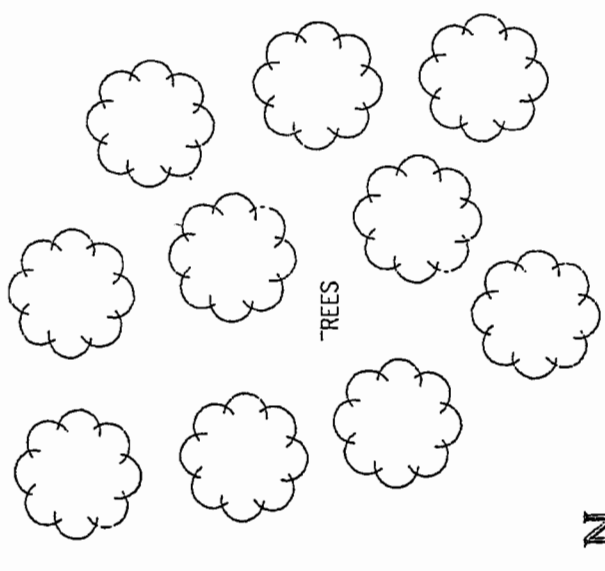
DRAWN BY: J.T.D.	CHECKED BY:
------------------	-------------

**LEGEND**

MW-1  
 MONITORING WELL WITH GROUNDWATER ELEVATION (0.0)

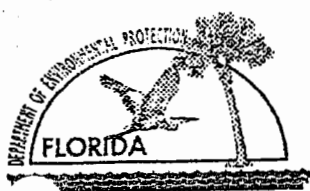
NM  
 NOT MEASURED

---  
 EQUIPOTENTIAL LINE (DASHED WHERE INFERRED)  
 CONTOUR INTERVAL = 0.02 FT.



<p><b>ATEC Associates, Inc.</b>          5555 West Waters Avenue, Suite 604          Tampa, Florida 33634          (813) 886-0907/Hillsborough County          (813) 449-0151/Pinellas County          FAX # (813) 886-0893</p>	DRAWN BY: J.T.D.	CHECKED BY:
	TEXACO FOOD MART 6164 N. SUNCOAST BOULEVARD CRYSTAL RIVER, FLORIDA	
PROJECT NO.: 73-07-94-00138	SCALE: APPROX. 1" = 50'	DATE: 12-6-94
FIGURE NO.: 3		





Storage Tank Facility Compliance Inspection Report

Facility ID 9300093 County 09 CITRUS Inspection Date 11/14/00  
 Facility Name SEVEN RIVERS HOSPITAL Facility Type C-USER  
 Latitude 28° 57' 06" Longitude 82° 37' 34" L/L Method AGPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected		# ATSS Inspected	1
------------------	--	------------------	---

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

• "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
	Comments. Release detection is a continuous sensor in the tank interstice, and a weekly visual check of the tank, its piping, and sensor remote board. Be sure the sensor is checked for operability annually. The tank exterior and piping were dry with no signs of any leaks.	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: Hospital underwriting Effective Date: 6/1/2000 Expiration Date: 6/1/2001

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

Yes       No       CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after \_\_\_\_\_ days to verify correction of the non-compliance items noted.

CITRUS ENVIRONMENTAL HEALTH Storage Tank Program Office	352-527-5295 Storage Tank Program Office Phone Number
C. MARK SUMNER Inspector Name - Please Print	JAY L. HUMPHRESS, JR. Facility Representative Name - Please Print
<u>Mark Sumner</u> 11/14/00 Inspector Signature & Date	<u>Jay L. Humphress Jr.</u> Facility Representative Signature & Date

November 16, 2000

Mr. John Martynowski  
Seven Rivers Community Hospital  
6201 N Suncoast Blvd  
Crystal River, FL 34428

RE: ID # 099300093  
Seven Rivers Community Hospital  
6201 N Suncoast Blvd  
Crystal River, FL 34428

Dear Mr. Martynowski:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Enclosed, please find a copy of the Storage Tank Facility Compliance Inspection Report for the inspection recently performed at the above named facility. Please refer to this report for comments regarding the inspection.

If there are any questions concerning this matter, you may contact the Storage Tank Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

Enclosure(s)

---

**CITRUS COUNTY DEPARTMENT OF HEALTH**

ENVIRONMENTAL HEALTH DIVISION  
STORAGE TANKS INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316



This data is current as of: 06-NOV-2000

### Bureau of Petroleum Storage Systems Facility Inspection Cover Page

**Facility Information**

ID#: 9300093  
Name: SEVEN RIVERS COMMUNITY HOSPITAL  
6201 N Suncoast Blvd  
Crystal River, FL 34428  
Contact: *MALty in engineering } cms*  
Phone: 352-795-8322

District: SWD  
County: Citrus  
Type: Fuel User/Non-Retail  
Status: Open  
Latitude: 28:57:06.0000 } *cms*  
Longitude: 82:37:34.0000 } *cms*  
LL Method: AGPS

**Account Owner Information**

Name: Tenet Healthcare  
6201 N Suncoast Blvd  
Crystal River, FL 34429  
Phone: 904-795-8322

**Tank Owner Information**

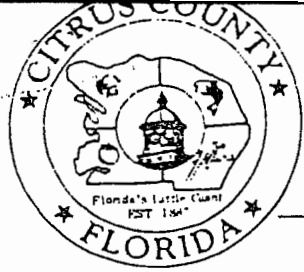
Name: Tenet Healthcare  
6201 N Suncoast Blvd  
Crystal River, FL 34429  
Phone: 904-795-8322

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
2	4000	Diesel-Emergen Gen	06/01/1992	ABOVE	U	C M I O P	B D A	F 1 Q
1	5000	Diesel-Emergen Gen	07/01/1978	UNDER	B			

*} cms*

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!



Board of County Commissioners  
Department of Public Safety

285 South Kensington Avenue, Lecanto, Florida 34461

(352) 726-1606 Fax (352) 726-1001

October 14, 1998

W.R.E.C.  
Attn: Roy Sibley  
P.O. Box 278  
Dade City, Fl. 33526

Ref. Fac. 099700797  
W.R.E.C.-Seven Rivers Hospital  
6201 N. Suncoast Blvd.  
Crystal River, Fl. 34428

Dear Mr. Sibley:

On 10/14/98 a representative of the Department of Public Safety conducted a compliance inspection at the above referenced facility. This inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to Chapter 62-761 Florida Administrative Code (F.A.C), which regulate underground and aboveground stationary storage tank systems. A copy of the completed inspection form is attached.

Should you have any questions, please contact me at (352) 726-1400.

Sincerely,

David E. Chronister  
Environmental Specialist III  
Department of Public Safety

DEC/bf

---

STORAGE TANKS PROGRAM  
285 S. Kensington Avenue  
Lecanto, Florida 34461  
(352) 726-1400



Department of Environmental Regulation  
 Pollutant Storage Tank System  
 Inspection Report Form

Facility ID #: 099700797 County: CITRUS  
 Facility Name: WREC - SEVEN RIVERS HOSPITAL  
 Facility Location: 6201 N. SUNCOAST BLVD. CRYSTAL RIVER, FL. 34424  
 Facility Contact: \_\_\_\_\_ Phone: \_\_\_\_\_  
 Owner: W. R. E. C. Phone: \_\_\_\_\_  
 Owner Address: P.O. BOX 278 DADE CITY, FL. 33526-0278  
 Owner Contact: ROY SIBLEY Owner Change Date: \_\_\_\_\_  
 Latitude: 28° 57' 06" Longitude: 82° 37' 34" Fac. Type: C

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
738	1100	G	1/95	A	I	F	K	U

Comments: '96-'99 PLACING NOT APPLIC FOR DUE TO NEW RULE EXEMPTION

<b>Inspection Type: (Choose One)</b> <input checked="" type="checkbox"/> Routine <input type="checkbox"/> Installation <input type="checkbox"/> Abandoned <input type="checkbox"/> Discharge (DRF) <input type="checkbox"/> Closure <input type="checkbox"/> Reinspection	<b>Site Information: (All that apply)</b> <input type="checkbox"/> Near Public Wells <input type="checkbox"/> Contaminated <input type="checkbox"/> Complaint <input type="checkbox"/> Acid Tanks <input type="checkbox"/> Repaired <input type="checkbox"/> Upgraded <input type="checkbox"/> Both UST & AST <input type="checkbox"/> Hazardous Materials
---	--

DER District or Local Program CITRUS COUNTY PUBLIC SAFETY STORAGE TANKS PROGRAM

DAVID E. CARONISTER  
 Inspector Name (Print):  
[Signature] 10/14/98  
 Inspector's Signature & Date

J. Roy Sibley  
 Contact Name (Print):  
[Signature]  
 Contact's Signature & Date



Name WRPC - SEVIN RIVERS HSE  
 Facility ID # 09920077  
 Date 10-14-98

**ABOVEGROUND STORAGE TANK  
 COMPLIANCE INSPECTION FORM**

Yes	No	Unk	N/A
-----	----	-----	-----

**I. REGISTRATION/NOTIFICATION:** Comments: \_\_\_\_\_

1. Facility has registered all applicable tanks on site; 17-762.400	1.	✓			
2. Current registration placard is properly displayed; 17-762.410(4)	2.		✓		
Proper notification has been made for the following: 17-762.450:					
3. Abandonment and closure (30 days prior); (1) (a)	3.				✓
4. Change of ownership (30 days after); (1) (b)	4.				✓
5. Retrofitting, replacement or upgrading; (10 days prior); (1) (c)	5.				✓
6. Change of tank status (in service/out-of-service); (1) (d)	6.				✓
7. Change of facility status (e.g. substances stored); (1) (e)	7.				✓
8. Change of method of financial responsibility (within 30 days); (2)	8.				✓
9. The facility owner/operator notified D.E.R. of internal tank inspection 24 hrs prior to the test; (3)	9.				✓
10. Loss of greater than 100 gallons on an impervious surface or 500 gallons inside secondary containment within one working day; .450(4)	10.				✓

**II. RECORD KEEPING:** Comments: MADE AVAIL.

11. All records were maintained for two (2) years and were available for inspection within five (5) working days; 17-762.710	11.	✓			
12. Some but not all records were maintained for two (2) years and were available for inspection within five (5) working days; 17-762.710	12.				✓

**III. REPORTING/DISCHARGE RESPONSE/REPAIRS:** Comments: n/a

Proper reporting requirements met for the following: 17-762.460					
13. Integral piping tightness test failure within 10 days; (1)	13.				✓
14. Pollutant discharge exceeding 25 gallons on a pervious surface; (2)	14.				✓
15. Positive response of a release detection device within one working day; (3)	15.				✓
The owner or the operator of the system which has discharged has:					
16. Taken it out-of-service; 17-762.700 (1), had it repaired or replaced; .700, or properly closed it; .800	16.				✓
17. Removed any regulated substances from the system; 17-762.820 (1)	17.				✓
18. Tightness tested all repaired components before placing them back in service; 17-762.700 (5) & (6)	18.				✓
19. Begun initial corrective actions for a release; 17-762.820 (2)	19.				✓

**INVENTORY REQUIREMENTS FOR TANKS IN CONTACT WITH SOIL:** Comments: \_\_\_\_\_

20. All inventory requirements maintained in accordance with 17-762.720 (1)	20.				✓
21. Some, but not all inventory requirements maintained in accordance with 17-762.720 (1)	21.				✓



Name: WPEC - Sewer Division  
 Facility I.D.#: 099700757  
 Date: 10-19-99

**ABOVEGROUND STORAGE TANK  
 COMPLIANCE INSPECTION FORM**

Yes No Unk N/A

V. PERFORMANCE STANDARDS/CATHODIC PROTECTION: Comments:		Yes	No	Unk	N/A
Storage tank criteria; 62-762.500					
22.	Meets construction upgrading schedule; .510 and .520				/
23.	Meets applicable storage tank standards; (1), (2) & (3)	/			
24.	Tank has secondary containment system; 500 (6)	/			
25.	Tank equipped with overfill protection; (3) (f) 1-4, (g)	/			
Piping criteria					
26.	Meets new piping standards with secondary containment; 500 (4) & .600 (4)				/
27.	Meets construction upgrading schedule; 62-762.510 (3) , & .520 (2)				/
Repairs to storage tank systems; 62-762.700					
28.	Failed storage tank system component properly required; (1)-(4)				/
29.	Tightness testing of the required component prior to being brought back into service; (5)				/
Cathodic Protection; 62-762.730					
30.	Cathodic protection system for tank and piping provides continuous protection; (1)-(4)				/
Secondary containment; 62-762.500					
31.	Does containment area have sufficient volume; 500 (6) (a) (2)	/			
32.	Is the containment area made out of impervious material in accordance with Chapter 62-762, F.A.C., requirements; (6) (a) (1)				/
33.	Is the containment area equipped with drainage system or protected from accumulation of rain; (6) (a) (3)				/
34.	Hydrant pits equipped with spill prevention equipment; (5)				/

RELEASE DETECTION/MONITOR WELLS: Comments: <u>MONTHLY VISUALS</u>		Yes	No	Unk	N/A
35.	Facility has an approved released-detection system; 62-762.600 & 62-762.860	/			
36.	Monitoring wells properly designed, constructed and installed; 62-762.640 or 62-762.600 (6)				/
37.	Interstitial monitoring adequate to detect a release from integral piping; 62-762.600 (4) & (5)				/

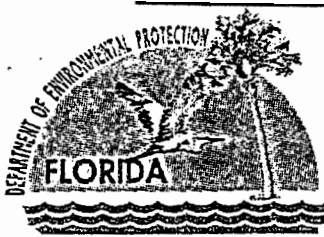
VII. OUT-OF SERVICE STATUS: Comments: <u>N/A</u>		Yes	No	Unk	N/A
38.	Are the corrosive protection devices properly maintained; 62-762.800 (1) (a)				/
39.	Is the vent line and other ancillary equipment properly secured and maintained; (1) (b)				/
40.	Test performed to insure the integrity of out-of-service system prior to being returned to service; (1) (c)				/

VIII. VARIANCE: Comments: <u>N/A</u>		Yes	No	Unk	N/A
41.	Has the facility for an Alternate Procedure; 62-762.350 (1)			/	/

IX. OTHERS: Comments: <u>N/A</u>		Yes	No	Unk	N/A
42.	Any other violation noted during inspection (Explain in comments)			/	/

**Site No. 102 Commercial Carrier Corporation**  
6639 N. Tallahassee Road (Old US Highway 19)  
Crystal River, Florida  
FDEP I.D. No. 099101140





# Department of Environmental Protection

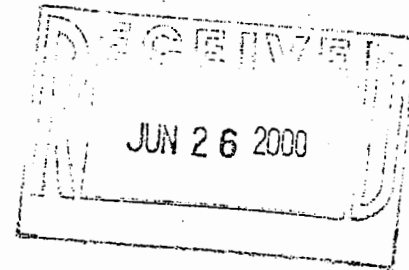
Jeb Bush  
Governor

Southwest District  
3804 Coconut Palm Drive  
Tampa, Florida 33619

David B. Scruhs  
Secretary

June 16, 2000

Mr. James Card  
Comcar Industries, Inc.  
Post Office Drawer 67  
Auburndale, FL 33823



Re: Commercial Carriers Corporation  
Crystal River Terminal  
6659 North Tallahassee Road  
Crystal River, Citrus County, Florida  
Facility ID #099101140

Dear Mr. Card:

Paul Gruzlovic of the Bureau of Petroleum Storage Systems has reviewed the Site Assessment Report (SAR), dated January 12, 2000 (received January 13, 2000), prepared and submitted by Universal Solution, Inc., for the discharge discovered on April 13, 1999 at this site. In order to meet the requirements of Chapter 62-770, Florida Administrative Code (F.A.C.), the following comments need to be addressed:

- 1) Well construction detail figures and boring logs were not submitted for TW-1 through TW-6. The construction detail figures and boring logs [OVA readings, lithology (based on a soil classification system specified on the log), and moisture content] should be submitted to the Department.
- 2) Water sampling logs for the groundwater samples obtained between October 1999 through December 1999 were not submitted with the report. As stated in Rule 62-770.400(2)(c), Florida Administrative Code (F.A.C.), water sampling logs are required to be submitted to the Department for each well that is sampled. The water sampling logs should be submitted to the Department.

"More Protection, Less Process"

Printed on recycled paper.

- 3) The screen interval and total depth of the wells were not listed on the groundwater elevation summary table (Table 4) of the SAR. This information should be added to Table 4 and submitted to the Department.
- 4) A statement was included in the SAR that the soil samples for OVA screening and for laboratory analyses were collected from the drill cuttings. Collecting soil samples from the drill cuttings or from off of the auger flights are not approved methods by the Department for OVA screening or for obtaining soil samples for laboratory analyses. Additional soil borings will be required before the Site Assessment will be approved.
- 5) High, medium, and low soil samples (based on the OVA screening results) were not collected. The only soil sample that was obtained was from soil boring SB, which appears to have been completed next to TW-3. Figure 2 should be revised to show the correct designation for the soil boring in which the soil sample was obtained. Additionally, the lab report that was submitted did not include pages 5, 6, 7, 10, 11, 13 and 14. Figure 2 should be revised and the missing pages from the laboratory report should be submitted to the Department.
- 6) The units were not specified on the soil analytical summary table (Table 2) and the concentrations for 1-methylnaphthalene and 2-methylnaphthalene should be listed on the table. The report incorrectly stated that the only parameter that was detected above the Department's soil cleanup target levels from sample SS-1 was TRPH. Benzene, ethylbenzene, total xylenes, naphthalene, 1-methylnaphthalene, and 2-methylnaphthalene exceeded the Department's leachability-based criteria. A revised Table 2 should be submitted to the Department.
- 7) A potable well search was not completed. All public supply wells within 0.5 mile and all private potable wells within 0.25 mile should be located on a map. The well construction details should also be provided to the Department in a table.
- 8) Site location (USGS topographic quadrangle) and local vicinity maps were not included in the report. The maps should be submitted to the Department.

- 9) The SAR did not include a statement as to how long diesel has been distributed at the site or if any other petroleum products have been stored and dispensed at the site. A summary of the site history and operations pertaining to petroleum distribution should be provided to the Department.

The comments listed above should be addressed and the supplemental assessment activities listed below should be completed.

- (1) Based on the total PAH concentration measured in TMW-1 and the TRPH concentration measured in MW-1, a double-cased vertical extent well (MW-4D) should be installed. The proposed location of MW-4D is shown on the attached map. During the advancement of the boring for MW-4D, soil samples for OVA screening should be collected at two-foot intervals above the water table and at five-foot intervals below the water table.
- (2) A water-table well (MW-5) should be installed at the location illustrated on the attached map. Soil samples should be obtained at two-foot intervals during the advancement of the boring for the well and screened with an OVA.
- (3) Soil borings SB-A through SB-D should be completed to a depth of one-foot below the water table at the locations indicated on the attached map. Soil samples should be obtained at two foot intervals and screened with an OVA.
- (4) High, medium, and low soil samples (based on OVA screening) should be collected from the vadose zone from the four soil borings, MW-4D, or MW-5. The soil samples should be analyzed for BTEX/MTBE (EPA Method 8021/5035), PAHs, and TRPHs.
- (5) Groundwater samples should be obtained from MW-1, MW-4D and MW-5 and analyzed for BTEX/MTBE (EPA Method 602), PAHs (EPA Method 8310), and TRPHs (FL-PRO). MW-2 and MW-3 should also be sampled and the samples should be analyzed for BTEX/MTBE (EPA Method 602). The top of casing elevations for the new wells should be measured

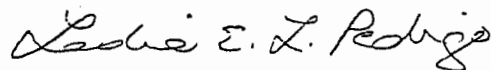
and water levels should be obtained from all of the wells.

Please note, applicable portions of the Site Assessment Report Addendum must be signed and sealed by a registered professional Engineer or a registered Professional Geologist authorized by Chapters 471 or 472, F.S.

Please provide two copies of the results of the supplemental assessment to me within sixty (60) days of receipt of this request.

The Department requests that written notification be provided at least three days prior to performing all future sampling events. If you have any questions concerning this review, please contact me at (813) 744-6100, ext. 427 or Paul Gruzlovic at (850) 921-9036.

Sincerely,



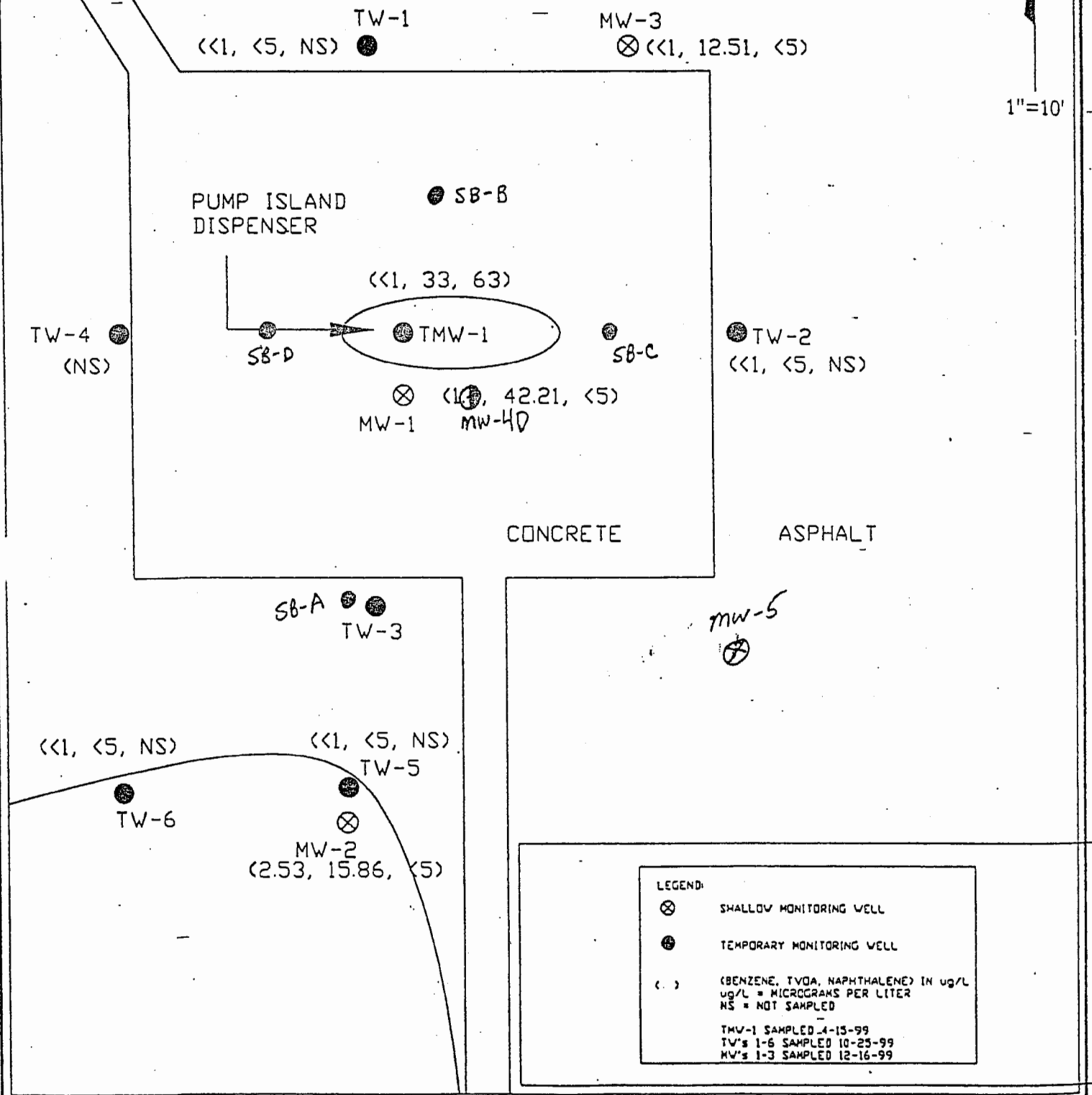
Leslie E.L. Pedigo  
Environmental Specialist III  
Tanks Program  
Division of Waste Management

LELP

cc: Brad Ernst, Universal Solutions, Inc.  
Mark Sumner, Citrus County Health Department  
Paul Gruzlovic, FDEP-BPSS

⊗ proposed water table well  
 ⊕ proposed vertical extent well

1"=10'



**UNIVERSAL Solutions, Inc.**  
 6101 Webb Road, Suite 310  
 Tampa, Florida 33615  
 ph. (813) 887-5510  
 fx. (813) 887-3918

DATE:	12-99	PROJ. NO.:	4147
SCALE:	1"=10'	PROJ. MGR.:	B.D.E.
DWG. NO.:	FIG. 4	REVIEWED:	-
FILE NO.:		DRAWN BY:	K.A.J.

**FIGURE 4**  
 DISTRIBUTION OF DISSOLVED  
 PETROLEUM CONSTITUENTS  
 COMCAR- CRYSTAL RIVER TERMINAL  
 6659 N. TALLAHASSEE ROAD  
 CRYSTAL RIVER, FL  
 PROJ. # 4147

January 26, 2001

Mr. James Card  
Commercial Carrier Corp.  
P.O. Drawer 67  
Auburndale, FL 33823

**RE:** DEP FAC #099101140  
Commercial Carrier Corp.  
6659 Tallahassee Road  
Crystal River, FL 32629

Dear Mr. Card:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Attached are the 62-761, FAC, compliance inspection results for the above named facility. The inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to 62-761, FAC. Alleged violations are noted below.

Due to the alleged violations noted, this facility may not be operating in compliance with Chapter 62-761, FAC. Review the violations referenced below. Submit a response in writing within fourteen (14) days which provides a schedule for correcting the noted violations. Be advised that failure to take corrective action may result in enforcement action and the assessment of penalties.

---

**CITRUS COUNTY HEALTH DEPARTMENT**

ENVIRONMENTAL HEALTH SECTION  
STORAGE TANK INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316

62-761.400(3), FAC – Financial Responsibility has not been demonstrated. Financial responsibility is the ability to pay for corrective action and third-party liability resulting from a discharge at the facility. The demonstration of financial responsibility shall be made by the owner or operator in accordance with the Code of Federal Regulations, Title 40, Part 280, Subpart H.

**Suggested Corrective Action:** Complete the enclosed Certification of Financial Responsibility (Form 62-761.900(3)) and mail a copy to this office. The original must be maintained as part of facility recordkeeping and available for inspection within 5 working days notice.

62-761.600(1)(d), FAC – The release detection method for the storage tank system(s) is not monitored at least monthly. Except as otherwise specified in Rule 62-761.600-640, FAC, the release detection method or combination of methods used at a facility shall be performed at least once a month, but not exceeding 35 days, to determine if a release from the storage tank system has occurred.

**Suggested Corrective Action:** Begin monitoring the release detection system(s) at least monthly as required.

62-761.640(3)(d), FAC – The small diameter piping in contact with the soil, and connected to an underground storage tank system(s), does not have a line leak detector that meets leak detection requirements. Line leak detectors shall be capable of detecting a discharge of 3.0 gph with a probability of detection of 0.95 and a probability of false alarm of 0.05 at a line pressure of 10 psi within one hour.

**Suggested Corrective Action:** Have the line leak detectors tested annually as required.

Note that unless otherwise indicated, the schedule for corrective action is 30 days. Any item for which insufficient information was provided to determine compliance status is followed by an asterisk (\*) and must also be addressed.

If you have any questions concerning this letter please call the Storage Tank Inspection Program at (352) 527-5295.

Sincerely,



C. Mark Sumner  
Environmental Specialist II

enclosure(s)

CMS/file



**Storage Tank Facility Compliance Inspection Report**

Facility ID 9101140 County 09 CITRUS Inspection Date 1/17/2001  
 Facility Name COMMERCIAL CARRIER Facility Type C-USER  
 Latitude 28°57'26" Longitude 82°37'SS' L/L Method A-GPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary. Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)). Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	<u>2</u>	# ATSS Inspected	
------------------	----------	------------------	--

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

\* "Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>62-761</u>	<u>The records for financial responsibility expired 1/11/2001</u>	
<u>600(1)(d)</u>	<u>The wells are not being sampled at least monthly as required.</u>	
<u>600(3)(d)</u>	<u>The line leak detector was due to be tested 11/22/00. Be sure to test the LD Annually as required.</u>	

Financial Responsibility - Verify owner's coverage. Select *Insurance* or *Other*, and provide *Mechanism*, if appropriate.

Insurance Carrier: C&I Effective Date: 1/11/00 Expiration Date: 1/11/01 (expired)

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.  Yes  No  CWOE - Compliance without Enforcement

A re-inspection will be scheduled on or after 30 days to verify correction of the non-compliance items noted.

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5255,</u> Storage Tank Program Office Phone Number
<u>C. MARK SUMNER</u> Inspector Name - Please Print	<u>Sharon O'Brien</u> Facility Representative Name - Please Print
<u>Mark Sumner 1/17/01</u> Inspector Signature & Date	<u>Sharon O'Brien</u> Facility Representative Signature & Date



Facility Name: COMMERCIAL CARRIER Facility ID: 9101140 Date: 1/17/2001

I Cite Description / Inspector's Comments

	<p>Release detection is supposed to be a monthly sampling of the 4 monitor wells. The records provided showed that the wells were only sampled 1/2/2000, 5/8/2000, 6/21/2000, 9/14/2000, + 12/12/2000 last year. Also, the depth to water measurements indicate that for the wells last year was only 2-3 feet above the bottom of the well. 62-761.640(2)(a)2.9. FAC requires that the wells extend at least five feet below the normal ground water surface level. Since last year we were in drought conditions please provide records to demonstrate that the <u>NORMAL</u> ground water surface level is five feet above bottom of wells. If not your wells will not meet required construction standards and will not be exempt from site suitability requirements. System also equipped with Veeva Root TLS ASD I for monitoring of inventory, sump, pipe interstire, and dispenser lines. Pipe sump and dispenser lines were dry. Water in wells is clear with no silt or odor. Fill is marked per API 1637. placard is displayed. Pictures were taken of dispenser and lines.</p>
--	--



This data is current as of: 04-JAN-2001

**Bureau of Petroleum Storage Systems  
Facility Inspection Cover Page**

**Facility Information**

ID#: 9101140	District: SWD
Name: COMMERCIAL CARRIER CORP	County: Citrus
6659 N Tallahassee Rd	Type: Fuel User/Non-Retail
Crystal River, FL 32629-2942	Status: Open
Contact: <del>Paul Carter</del> } <i>cms</i>	Latitude: 28:57:26.0000 } <i>cms</i>
Phone: 352-795-3723 } <i>SHAWN O'BRIEN</i>	Longitude: 82:37:55.0000 } <i>cms</i>
	LL Method: AGPS

**Account Owner Information**

Name: Commercial Carrier Corp  
 Po Drawer 67  
 Attn: James Card  
 Auburndale, FL 33823  
 Phone: 941-967-1101  
*163*

**Tank Owner Information**

Name: Commercial Carrier Corp  
 Po Drawer 67  
 Attn: James Card  
 Auburndale, FL 33823  
 Phone: 941-967-1101

**Tank # Size Content Installed Placement Status Const Pipe Monitor**

1	12000	Vehicular Diesel	04/01/1991	UNDER	U	F A M O	K F J C	N B H 3 K 5	} <i>cms</i>
2	12000	Vehicular Diesel	02/01/1991	UNDER	U	A F M O	C F K J	N B H 5 3 K	

\*\*\*Note: Construction, Piping, and Monitoring Info not shown for CLOSED tanks (Status of A, B, or D).

No OPEN violations found!

**Site No. 103 Crystal River Precast Plant**  
7010 N. Suncoast Boulevard (@ Powerline Road)  
Crystal River, Florida  
EPA I.D. No. FLD984178996

GROUND WATER ANALYTICAL RESULTS

The ground water sample was analyzed for the kerosene/mix product components specified in FAC 17-770.600(8)(b) as requested by FDER. The certificates of analysis are attached in Appendix C. The analytical parameters detected in the ground water samples are:

Toluene	3200 ug/l
Xylene	120 ug/l
Chlorobenzene	20 ug/l

All other analytical parameters were below analytical detection limits.

At this time the detected parameters can not be attributed to a known on site source. The drums of chemicals and/or petroleum products stored on site did not contain toluene, xylene or chlorobenzene as indicated by their respective material safety data sheets (MSDS). Further the disposal analysis records of the petroleum contaminated soil did not indicate the presence of toluene, xylene or chlorobenzene. Also information obtained from Zurn personnel who formerly worked on the site did not identify an on-site source of the chemicals.

If there are any questions, please contact myself or Robert Stephens at (813) 622-7174.

Respectfully,

  
Michael S. Jones  
Project Manager

cc: Bill Morton  
Zurn Industries, Inc.  
P. O. Box 2000  
Erie, PA 16514-2000  
(814) 452-2111 Ext. 277

595397\P1SMRY1.MJ3

POWERLINE ROAD

M. 0

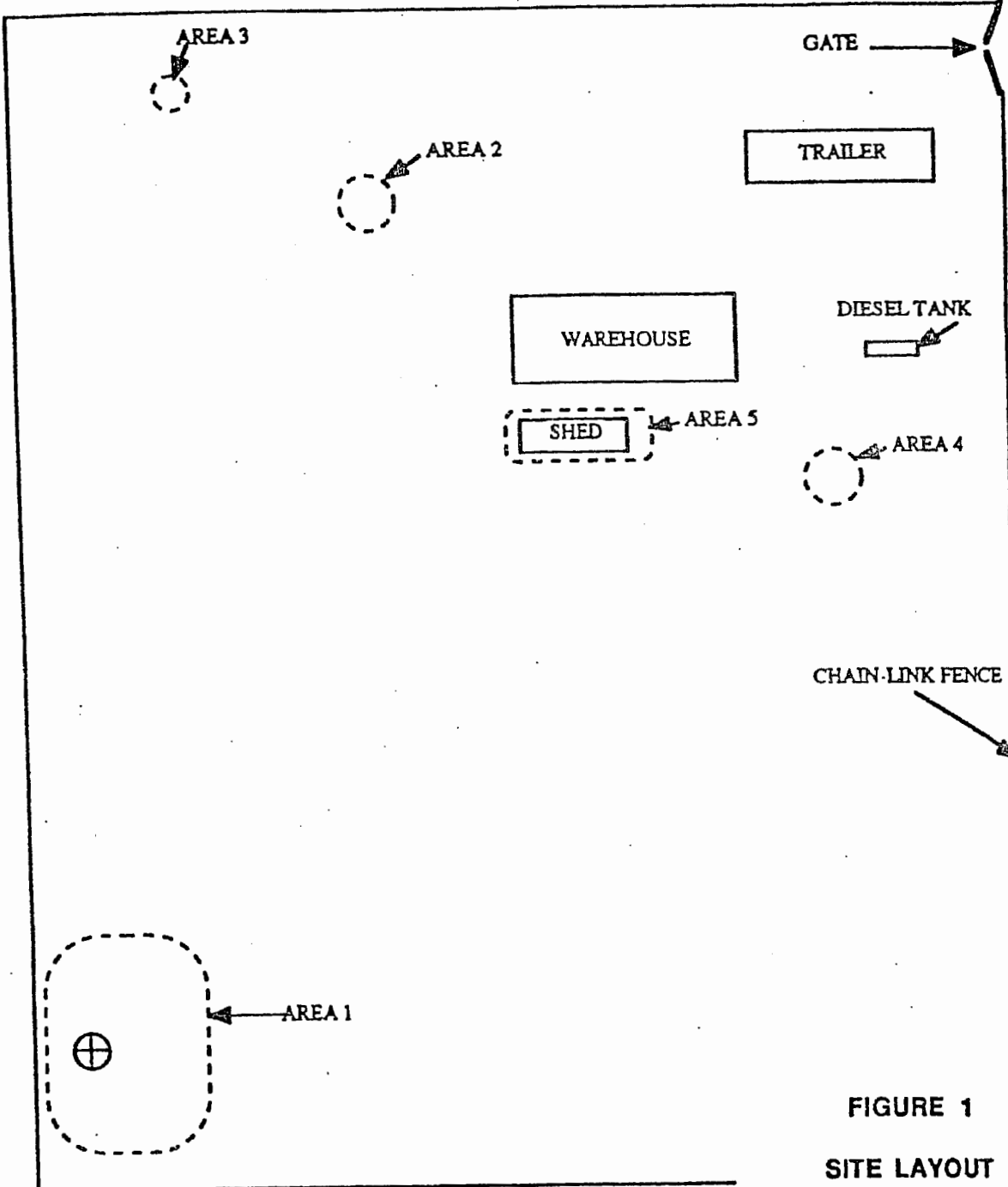
DRAWING NUMBER

5-21-78  
5/28/80

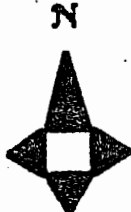
CHECKED BY  
11/1

APPROVED BY  
[Signature]

DRAWN BY



- LEGEND:
- DRUM STORAGE AREAS
  - MONITORING WELL LOCATION
  - RAILROAD TRACKS



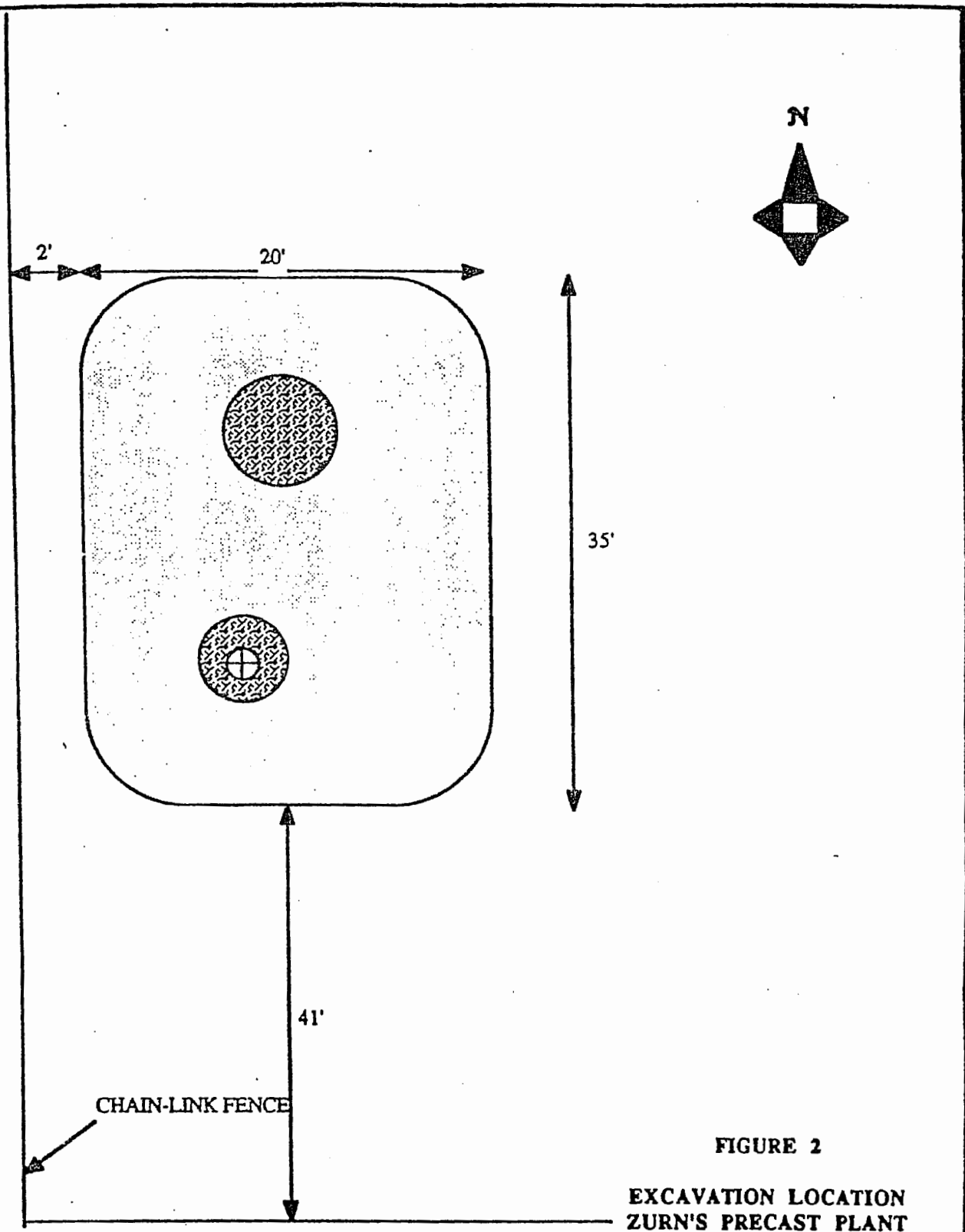
Drawing Not To Scale

FIGURE 1

**SITE LAYOUT**  
**ZURN'S PRECAST PLANT**  
**CRYSTAL RIVER, FLORIDA**  
 PREPARED FOR  
 ZURN INDUSTRIES, INC  
 TAMPA, FLORIDA



5MA1000  
 DRAWING NUMBER  
 5-24-70  
 5/24/90  
 CHECKED BY JIN  
 APPROVED BY MAB  
 DRAWN BY [Signature]



- LEGEND:
- AREA OF OIL PRODUCT IN FRACTURED LIMESTONE
  - EXCAVATED AREA
  - MONITORING WELL LOCATION

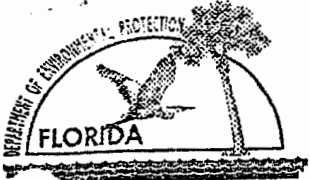
FIGURE 2  
 EXCAVATION LOCATION  
 ZURN'S PRECAST PLANT  
 CRYSTAL RIVER, FLORIDA

PREPARED FOR  
 ZURN INDUSTRIES, INC  
 TAMPA, FLORIDA



Not To Scale and Indicated Distances are Approximate

**Site No. 104 Crystal River Quarries, Inc.**  
7040 N. Suncoast Boulevard  
Crystal River, Florida  
FDEP I.D. Nos. 098518659 and 099045639



Storage Tank Facility Compliance Inspection Report

Facility ID 9045639 County 09 CITRUS Inspection Date 11/22/00  
 Facility Name CRYSTAL RIVER QUARRIES RL Facility Type C-USER  
 Latitude 28°57'50" Longitude 82°37'57" L/L Method AGPS

Check box to identify type of inspection performed. Update latitude/longitude as necessary.  
 Provide Lat/Long Determination Method. ("Map", "AGPS" (Magellan), "GGPS" (Trimble)).  
 Provide the count of USTs and/or ASTs reviewed during this inspection

# USTs Inspected	# ATSS Inspected	<u>3</u>
------------------	------------------	----------

Compliance Inspection (Annual)	TCI	<input checked="" type="checkbox"/>	Installation Inspection	TIN	
Compliance Inspection (DRF received)	TCDI		Closure Inspection	TXI	
Compliance Inspection (Complaint received)	TCPI		Compliance Re-Inspection	TCR	
Discharge Evaluation ("short form")	TDI		** Record the results of the TDI in a Discharge Project		

"Code" in block below corresponds to the Rule Cite; represents a Data Entry Code for ease of electronic data recording of inspection results.

Rule Cite	Description / Inspector's Comments	Code
<u>62-761</u>		
<u>510(1)(d)</u>	<u>Valves meeting the requirements of NFPA 30-A (2-17), have not been installed on the storage tanks that produce a gravity head on small diameter piping by 1/13/1999.</u>	

Financial Responsibility - Verify owner's coverage. Select Insurance or Other, and provide Mechanism, if appropriate.

Insurance Carrier: C&I Effective Date: 12-31-99 Expiration Date: 12-30-2000

Other Coverage meeting federal financial responsibility requirements. Mechanism: \_\_\_\_\_

None

Based upon the inspection results and information provided by the owner/operator, this facility appears to meet the requirements of Florida Administrative Code 62-761.

A re-inspection will be scheduled on or after: 30 days to verify correction of the non-compliance items noted.

Yes  No  CWOE - Compliance without Enforcement

<u>CITRUS ENVIRONMENTAL HEALTH</u> Storage Tank Program Office	<u>352-527-5295</u> Storage Tank Program Office Phone Number
<u>C MARK SUMNER</u> Inspector Name - Please Print	<u>Frank J. Glik</u> Facility Representative Name - Please Print
<u>[Signature]</u> <u>11/22/00</u> Inspector Signature & Date	<u>[Signature]</u> <u>12/22/00</u> Facility Representative Signature & Date



Facility Name CRYSTAL RIVER QUARRIES Facility ID: 9045639 Date: 11/22/00

Site Description / Inspector's Comments

Site	Description / Inspector's Comments
Comments:	Release Detection for the three 10,000 Gal ASTs is a documented visual inspection performed monthly of the tanks, the containment wall, the associated piping, and the dispenser liners.
	Monthly inspections were checked from 1/2000 to 11/2000
	At the time of this inspection the containment area was dry and clean with a well maintained coating, the Diesel #2 Dispenser was dry, the gas #3 dispenser had less than one inch of liquid, and the Diesel #1 dispenser had less than one inch of liquid.
	There were no signs of a release around the piping, The fill area is to be marked as per API 1637
	Photos were taken of the tanks, the piping, the dispensers, the containment wall, and the auto shut off fire valves.
	2000/2001 placard was displayed.



Jeb Bush  
Governor

Robert G. Brooks, M.D.  
Secretary

November 27, 2000

Mr. Frank Colitz  
Crystal River Quarries  
P.O. Box 216  
Crystal River, FL 34423

**RE:** DEP FAC #099045639  
Crystal river Quarries  
7040 N. Suncoast Blvd.  
Crystal River, FL 34428

Dear Mr. Colitz:

The Storage Tank Program of the Citrus County Health Department (County) has been authorized, by contract with the Florida Department of Environmental Protection (Department), to perform compliance, discharge, closure and installation inspections at facilities regulated under Chapter 62-761 of the Florida Administrative Code (FAC).

Attached are the 62-761, FAC, compliance inspection results for the above named facility. The inspection was conducted under the authority of Chapter 376, Section 303, Florida Statutes, and is designed to determine the compliance status of the facility with regard to 62-761, FAC. Alleged violations are noted below.

Due to the alleged violations noted, this facility may not be operating in compliance with Chapter 62-761, FAC. Review the violations referenced below. Submit a response in writing within fourteen (14) days which provides a schedule for correcting the noted violations. Be advised that failure to take corrective action may result in enforcement action and the assessment of penalties.

---

**CITRUS COUNTY HEALTH DEPARTMENT**

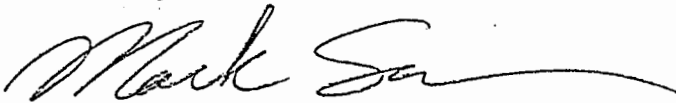
ENVIRONMENTAL HEALTH SECTION  
STORAGE TANK INSPECTION PROGRAM  
3600 West Sovereign Path, Suite 125, Lecanto, FL 34461  
Phone (352) 527-5289 / SC 632-5295 / Fax (352) 527-5316

62-761.510(1)(d), FAC – The storage tank system(s) installed before July 13, 1998, and which produces a gravity head on the dispenser and/or integral piping is not equipped with the proper valves. Valves meeting the requirements of Section 2-1.7 of National Fire Protection Association Code 30A, shall be installed by January 13, 1999, on any storage tank system located at an elevation that produces a gravity head on the dispenser or on small diameter piping. **Suggested Corrective Action:** Install the correct valves on the storage tank system(s).

Note that unless otherwise indicated, the schedule for corrective action is 30 days. Any item for which insufficient information was provided to determine compliance status is followed by an asterisk (\*) and must also be addressed.

If you have any questions concerning this letter please call the Storage Tank Inspection Program at (352) 527-5295.

Sincerely,

A handwritten signature in black ink, appearing to read "Mark Sumner", with a long horizontal flourish extending to the right.

C. Mark Sumner  
Environmental Specialist II

enclosure(s)  
CMS/file



This data is current as of: 06-NOV-2000

**Bureau of Petroleum Storage Systems  
Facility Inspection Cover Page**

**Facility Information**

ID#: 9045639	District: SWD
Name: CRYSTAL RIVER QUARRIES INC	County: Citrus
7040 N Suncoast Blvd	Type: Fuel User/Non-Retail
Crystal River, FL 34428	Status: Open
Contact: Crystal River Quarries Inc } <i>cms</i>	Latitude: 28:57:50.0000 } <i>cms</i>
Phone: 352-795-2409	Longitude: 82:37:57.0000 } <i>cms</i>
	LL Method: AGPS

**Account Owner Information**

Name: Crystal River Quarries Inc  
Po Box 216  
Crystal River, FL 34423-216  
Phone: 904-795-2409

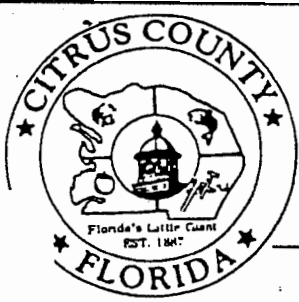
**Tank Owner Information**

Name: Crystal River Quarries Inc  
Po Box 216  
Crystal River, FL 34423-216  
Phone: 904-795-2409

Tank #	Size	Content	Installed	Placement	Status	Const	Pipe	Monitor
1	10000	Vehicular Diesel	11/01/1989	ABOVE	U	K C O	A B I K	Q 4
2	10000	Unleaded Gas	11/01/1989	ABOVE	U	K C O	A B I K	Q 4
3	10000	Vehicular Diesel	11/01/1989	ABOVE	U	K C O	A B I K	Q 4
10	15000	Fuel Oil-Onsite He	07/01/1959	ABOVE	B			
11	500	Waste Oil	07/01/1981	UNDER	B			
4	4000	Vehicular Diesel	07/01/1959	ABOVE	B			
5	4000	Vehicular Diesel	07/01/1959	ABOVE	B			
6	1000	Leaded Gas	07/01/1960	UNDER	B			
7	1000	Unleaded Gas	07/01/1981	UNDER	B			
8	6000	Vehicular Diesel	07/01/1959	ABOVE	B			

} *cms*

**Site No. 204 Berryman & Henigar (aka Henigar & Ray Engineering  
Association, Inc.)**



# Board of County Commissioners

## Department of Public Safety

285 South Kensington Avenue, Lecanto, Florida 34461

(352) 726-1606

Fax (352) 726-1001

March 16, 1999

Ms. Debbie Sparks  
Berryman & Henigar  
640 E. Hwy 44  
Crystal River, Fl. 34429

Ref: Tank Closure Assessment Report  
Berryman & Henigar  
640 E. Hwy 44  
Crystal River, Fl. 34429  
ID# 098628562

Ms. Sparks:

A Tank Closure Assessment Report dated December 1998, was received by this office March 16, 1999, which outlined closure activities that took place on December 9, 1998 at the referenced facility. Based on the data presented in the aforementioned report, and on field observations conducted during the tank removal, it appears no further assessment will be required at this time for this former underground storage tank area.

Should you have any questions please call me at (352) 726-1400.

David E. Chronister  
Environmental Specialist III  
Citrus County Public Safety-Storage Tanks Program

DEC/bf

---

**STORAGE TANKS PROGRAM**

285 S. Kensington Avenue  
Lecanto, Florida 34461  
(352) 726-1400



Department of Environmental Regulation  
 Pollutant Storage Tank System  
 Inspection Report Form

Facility ID #: 098628562 County: CITRUS  
 Facility Name: HENIGER & RAY  
 Facility Location: 640 E. HWY. 44 CRYSTAL RIVER, FL. 34429  
 Facility Contact: STEVE SHAW Phone: (352) 795-6551  
 Owner: HENIGER & RAY Phone: \_\_\_\_\_  
 Owner Address: 640 E. HWY. 44 CRYSTAL RIVER, FL. 34429  
 Owner Contact: STEVE SHAW Owner Change Date: \_\_\_\_\_  
 Latitude: 28° 53' 23" Longitude: 82° 35' 05" Fac. Type: C

Tank #	Size	Contents	Date Installed	Under or Above	Tank Type	Integral Piping	Monitoring System	Tank Status
1	2000	B	12/86	U	AEM	C	B	B

Comments: J&J REMOVED UST. UNIFIED PERFORMED CLOSURE ASSESSMENT

Inspection Type: (Choose One)

- Routine                       Discharge (DRF)  
 Installation                 Closure  
 Abandoned                  Reinspection

Site Information: (All that apply)

- Near Public Wells     Repaired  
 Contaminated         Upgraded  
 Complaint              Both UST & AST  
 Acid Tanks              Hazardous Materials

DER District or Local Program CITRUS COUNTY PUBLIC SAFETY - STORAGE TANKS PROGRAM

DAVID E. CHAMBERLAIN  
 Inspector Name (Print):  
[Signature] 12/9/91  
 Inspector's Signature & Date

[Signature]  
 Contact Name (Print):  
 Contact's Signature & Date



**UNDERGROUND STORAGE TANK  
 CLOSURE INSPECTION FORM**

Yes	No	Unk	N/A
-----	----	-----	-----

**REGISTRATION AND NOTIFICATION** 17-761.400 & 450 FAC: Comments: \_\_\_\_\_

1. All of the facility's tanks properly registered; .400	1.	<input checked="" type="checkbox"/>			
2. Proper notification made 30 days prior to tank(s) closure; .450 (1) (a)	2.	<input checked="" type="checkbox"/>			
3. Proper notice given 24 hours prior to storage tank(s) closure; 450 (4)	3.	<input checked="" type="checkbox"/>			

**II. CLOSURE PROCEDURES/STATUS:** 17.761.800 Comments: \_\_\_\_\_

4. Certified contractor performed the tank removal(s); .740 (2) <i>JFS</i>	4.	<input checked="" type="checkbox"/>			
5. Storage tank(s) properly closed and removed from the site; (2) (d)	5.	<input checked="" type="checkbox"/>			
6. Storage tank(s) properly closed and filled in place; (2) (d)	6.				<input checked="" type="checkbox"/>
7. Storage tank(s) properly closed within 90 days of discovery; (2) (a)	7.				<input checked="" type="checkbox"/>
8. All liquid & sludge removed from the tank(s); (2) (d)	8.	<input checked="" type="checkbox"/>			
9. Storage tanks properly <u>purged</u> or inerted prior to transport; (2) (d)	9.	<input checked="" type="checkbox"/>			
10. All piping capped and/or <u>removed</u> ;	10.	<input checked="" type="checkbox"/>			
11. All monitoring wells left in place for contamination assessment purposes; (2) (f)	11.				<input checked="" type="checkbox"/>
12. All monitoring wells have been properly abandoned; .800 (2) (f)	12.				<input checked="" type="checkbox"/>
13. A closure assessment was properly performed; .800 (3), <i>UNIFISO - ONGOING</i>	13.		<input checked="" type="checkbox"/>		

**III. DISCHARGE REPORTING** 17-761.460, F.A.C.: Comments: N/A

14. Evidence of contamination or a discharge reported (Explain in comments) 460 (1), (2) and (3)	14.		<input checked="" type="checkbox"/>		
15. Discharge Reporting Form (DRF) submitted; 460 (2)	15.				<input checked="" type="checkbox"/>

**IV. DISCHARGE RESPONSE:** Comments: N/A

16. Free product present; (Explain in comments)	16.		<input checked="" type="checkbox"/>		
17. Free product being removed; 17-761.800 (3) (d) & 17-761.820 (2)	17.				<input checked="" type="checkbox"/>

Comments: JFS REMOVED TANK AND PIPING. UNIFISO PERFORMED CLOSURE ASSESSMENT. SOIL SCREENING DID NOT INDICATE IMPACTED SOILS. WATER & SOIL SAMPLES OBTAINED FOR REPORT.



# Underground Storage System Installation and Removal Form for Certified Contractors

Pollutant Storage Systems Contractor as defined in Section 489.113, Florida Statutes (certified contractors as defined in Section 62-761.200, Florida Administrative Code) shall use this form to certify that the installation, replacement or removal of the underground storage tank system(s) located at the address listed below was performed in accordance with Department Reference Standards. This includes system components such as dispenser liners, piping sumps, and overfill protection devices.

## General Facility Information

Facility Name: <u>Berryman &amp; Henigar</u>	DEP Facility Identification No.: <u>098628562</u>
Street Address (physical location): <u>640 E. Highway 44 Crystal River</u>	
County: <u>Citrus</u>	Telephone #: <u>(352) 795-6551</u>
Owner Name: <u>Berryman &amp; Henigar, Inc.</u>	Telephone #: <u>(352) 795-6551</u>
Owner Address: <u>640 E. Highway 44 Crystal River, FL 34429</u>	

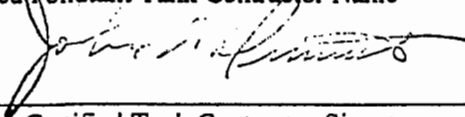
## Storage Tank System Information

Number of Tanks Installed: <u>0</u>	Number of Tanks Removed: <u>1</u>
Date Work Initiated: <u>12/10/98</u>	Date Work Completed: <u>12/10/98</u>
Tank(s) Manufactured by: <u>N/A</u>	
Description of work Completed: <u>Removed and disposed of 1-1000 gallon underground</u> <u>oil tank. Took water/soil samples as required by County Inspector.</u>	

## Certification

I hereby certify and attest that I am familiar with the facility that is registered with the Florida Department of Environmental Protection; that to the best of my knowledge and belief, the storage tank system installation, replacement or removal at this facility was conducted in accordance with Chapter 489, Florida Statutes, Section 376.303, Florida Statutes, and Chapter 62-761, Florida Administrative Code, and its adopted reference standards and documents for underground storage tank systems.

John H. Dunseth  
(Type or Print)  
Certified Pollutant Tank Contractor Name

  
Certified Tank Contractor Signature

PCC050790  
PSSC Number  
Pollutant Storage Systems  
Contractor License Number  
12/17/98  
Date

William Morgan  
Field Supervisor Name

12/17/98  
Date

owner or operator of the facility must register the tanks with the Department upon completion of the installation. The installer must submit this form to the County no more than 30 days after the completion of installation, replacement, or removal of a storage tank system.

**Site No. 208 Secret Garden Gift Shop**  
941 N.E. Highway 19  
Crystal River, Florida  
FDEP I.D. No. 099801727

# SCANNED DOCUMENT

## SCORE TRACKING SHEET

Facility ID 099801727 Discharge Date 9/17/97  
 Site Name Crystal River Cof Row Segment Old Score 0  
 Type File: Score \_\_\_\_\_ Rescore \_\_\_\_\_ Requested By: Indigible

	Date	Initials		STB Discharge #
1	<u>1/4/02</u>	<u>AS</u>	Scoring Packet Received by STB	<u>1</u>
2	<u>1/4/02</u>	<u>AS</u>	Well Survey Checked/Requested	

Owner Verification Needed? :  Yes  No, go to # 8

3			Written Request to DEP for courthouse check
4			Written Approval received from DEP
5			Assigned to STB Field Office for Owner Verification Branch Location _____
6			Verification Received from STB Field Office
7			DEP Database Updated with Correct Owner Information
8	<u>3/8/02</u>	<u>AS</u>	All Information Received for Scoring
9	<u>3/8/02</u>	<u>AS</u>	Scored with PCT Updated & Letter Printed
10	<u>3/8/02</u>	<u>AS</u>	Letter Mailed & Packet sent to STB Scanning

Letter Type (Circle One)  
 A = Low Score, No CDF  
 B = High Score, CDF Requested  
 C = PCPP High, CDF Requested

New Score 7

(Date CDF requested must be transferred to CDF list)

11	<u>3/11/02</u>	<u>JW</u>	Scanned
12	<u>3/11/02</u>	<u>JW</u>	Indexed

Number of Pages: 5

13 \_\_\_\_\_

NOTES

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

MARK

### Site Priority Ranking Sheet

Facility #: 099801727  
 Site Name: Crystal River City Low Property  
 Site Address: 941 ONE Hwy 19  
 Latitude 28 53 59 Longitude 82 25 34 *Street CF*  
 Discharge Date: 9/17/97 *3/8/02*

Criteria:	Yes	No	Points
<b><u>Fire/Explosion Hazard:</u></b>			
1. Free product or volatilized petroleum products at or above 20% of the Lower Explosive Limit (LEL) in existing utility conduits or vaults, buildings or other inhabited confined spaces (60 points).	_____	<u>X</u>	<u>0</u>
2. Ignitable free product on surface waters or impoundments (60 points).	_____	<u>X</u>	<u>0</u>
<b><u>Threat to Uncontaminated Drinking Water Supplies:</u></b>			
1. Uncontaminated municipal or community well fields of greater than 100,000 gallons per day permitted capacity with a well within 1/2 mile of the site (30 points).	<u>_____</u>	_____	<u>30</u>
			<i>PWS 6090317</i>
SI	DWDB	HRS	
	<u>N</u>	<u>Y 1</u>	
		<u>11/25/02</u>	
Additionally:			
a. If the well field's 1 foot draw down contour is known to encompass the site regardless of the well field's distance from the site (20 points).	<u>_____</u>	_____	<u>20</u>
or			
b. If the well field is located down gradient of the site (15 points).	<u>_____</u>	_____	<u>15</u>
			<i>well is 2.25 mi'</i>
2. Uncontaminated private wells constructed prior to date of contamination discovery, or uncontaminated public water system well field with less than 100,000 gallons per day permitted capacity with a well within 1/4 mile of the site (20 points).	_____	<u>X</u>	<u>0</u>
SI	DWDB	HRS	
	<u>N</u>	<u>N</u>	
Additionally:			
a. If the well field's 1 foot draw down contour is known to encompass the site regardless of the well field's distance from the site (10 points).	_____	<u>X</u>	<u>0</u>
or			
b. If the well field is located down gradient of the site (5 points).	_____	<u>X</u>	<u>0</u>
3. Uncontaminated surface water body used as a public water system supply within 1/2 mile of the site (10 points).	_____	<u>X</u>	<u>0</u>

Yes                      No                      Points

**Migration Potential:**

**1. Source Characteristics (select only one)**

- a. Recent spills or free product found in wells/boreholes (4 points) except free product of 2 inches or more in 2 or more wells/boreholes (6 points).
- b. Recent product loss or wells/groundwater contaminated but no free product (2 points).

\_\_\_\_\_ X \_\_\_\_\_ 0  
\_\_\_\_\_ — \_\_\_\_\_ 2

**2. Product Type (select only one):**

- a. Light petroleum product (kerosene, gasoline, aviation fuel and similar petroleum products) with water soluble additives or enhancers (MTBE, ethanol and similar substances) (3 points).
- b. Light petroleum product with no additives or enhancers (2 points).
- c. Heavy petroleum product (fuel oil, diesel and similar petroleum products) (1 point).

\_\_\_\_\_ X \_\_\_\_\_ 0  
\_\_\_\_\_ X \_\_\_\_\_ 0  
\_\_\_\_\_ — \_\_\_\_\_ 1

**Environmental Setting:**

- 1. Site located in G-1 aquifer (4 points).
- 2. Site located in a G-2 aquifer (2 points).
- 3. Site located in high recharge/permeability geological area (4 points).
- 4. Site located within 1/2 mile of an Outstanding Florida Water (1 point).

\_\_\_\_\_ X \_\_\_\_\_ 0  
\_\_\_\_\_ — \_\_\_\_\_ 2  
\_\_\_\_\_ — \_\_\_\_\_ 4  
\_\_\_\_\_ X \_\_\_\_\_ 0

Total Points: 74

Comments: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

[Signature]  
Signature

3/8/02  
Date

Sent  
2-1-02

HSK

✓

# SUPER Act Survey Form ~~REQUEST~~

Facility ID: 9801727      County: 09  
 Name: CRYSTAL RIVER CITY ROW PROPERTY  
 Address: 941 NE HWY 19  
 City: CRYSTAL RIVER      FL 32629

Number of Large public well (>100,00 gpd) within 1/2 mile: 1  
 Number of small public and private wells within 1/4 mile: 0  
 Investigation: 1/25/02      Investigator: Will Bryant  
 Comments: Central Water Area  
 Signature: \_\_\_\_\_

Well ID	Well Use	Name	Case Material	Diameter	Capacity - GPM
AAC1479	40 Community Well	CRYSTAL RIVER WELL 1 NW 5TH ST WELL Crystal River      FL 34429	Black Steel	10	960
			CITY ARTESIAN WELL		

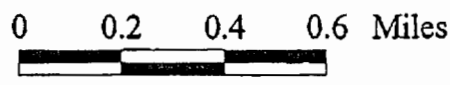
No petroleum indicator compounds (BTEX & MTBE) were detected in the most recent sample from this well  
 Sample ID: 000309-022  
 Sample Date: 2/29/00

RECEIVED BY  
 DOH WELL SURV.  
 FEB 5 2002  
 APPROVED BY  
 LEE SKORNIA

285359  
 823534



- Sep98int\_arc.sbp
- Wells**
- 40 Community Water System (> 100,000 gallons/day)
  - 41 Non-Community Public Water System
  - 42 Limited Use Public Water System (64E-8)
  - 43 Private Water Well
  - 45 Non Transient/Non Community Water System
  - 46 Community Water System (< 100,000 gallons/day)
  - 47 Multi Family Well (3-4 Living Units)
  - 50 Irrigation Well
  - 60 Permeation
  - 70 Non-Well
- Facilities**
- Drycleaning
  - Petroleum
  - Major road
  - Minor road

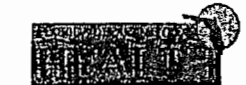


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# Florida Department of Health

## Bureau of Water Programs

Well Surveillance Section



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