For: Mr. Norman Harrison, Owner
Harrison Properties

SITE ASSESSMENT REPORT

Vestal Jobber Manufacturing Company

North 902 Dyer Road, Spokane, Washington

By: Iain A. Olness, Hydrogeologist
Blue Ridge Associates, Inc.

Reviewed by:

Jackie E. Stephens
President/Geologist

17 August 1993

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VESTAL JOBBER MANUFACTURING COMPANY

UNDERGROUND STORAGE TANK
SITE ASSESSMENT

1.0 INTRODUCTION

Blue Ridge Associates, Inc. (Blue Ridge), was retained by Mr. Norman F. Harrison of Harrison Properties to perform an Underground Storage Tank (UST) **SITE ASSESSMENT** at Vestal Jobber Manufacturing Company, located in Spokane, Washington (see Figure 1 Area Location and Figure 2, Site Location). This report is submitted to satisfy the scope of work of the consultant/client contract for an **UST SITE ASSESSMENT REPORT** and to meet the requirements of the Washington Department of Ecology (DOE).

Chapter 173-360 WAC states that the purpose of a **SITE ASSESSMENT REPORT** is "*to investigate an UST site at the time of closure or change-in-service to determine if a release has occurred*". The **SITE ASSESSMENT** consists of a site inspection, site sampling upon tank removal, submitting of the samples for analysis, review and interpretation of the analytical results, review of past activities on the site and its environs, and communication with appropriate governmental agencies. Based on the information obtained, the UST site is either determined to be free of contamination, or it is reported as a leaking UST (LUST) site. If petroleum based contamination is found at the site, a **SITE CHARACTERIZATION** report is required.

One (1) Underground Storage Tank (UST's) was permanently removed from the subject site and a release of diesel fuel confirmed. An **UST SITE ASSESSMENT** is no longer required, however an **UST SITE CHARACTERIZATION** is required in this situation.

The **SITE CHARACTERIZATION** consists of the information required for a **STATUS REPORT** plus the following:

1) A site conditions map indicating approximate boundaries of the property, all areas where hazardous substances are known or suspected to be located, and sampling locations. This map may consist of a sketch of the site at a scale sufficient to illustrate this information;

2) Available data regarding surrounding populations, surface and ground water quality, use and approximate location of wells potentially affected by the release, subsurface soil conditions, depth to groundwater, direction of groundwater flow, proximity to and potential for affecting surface water, locations of sewers and other potential conduits for vapor or free product migration, surrounding land use, and proximity to sensitive environments;

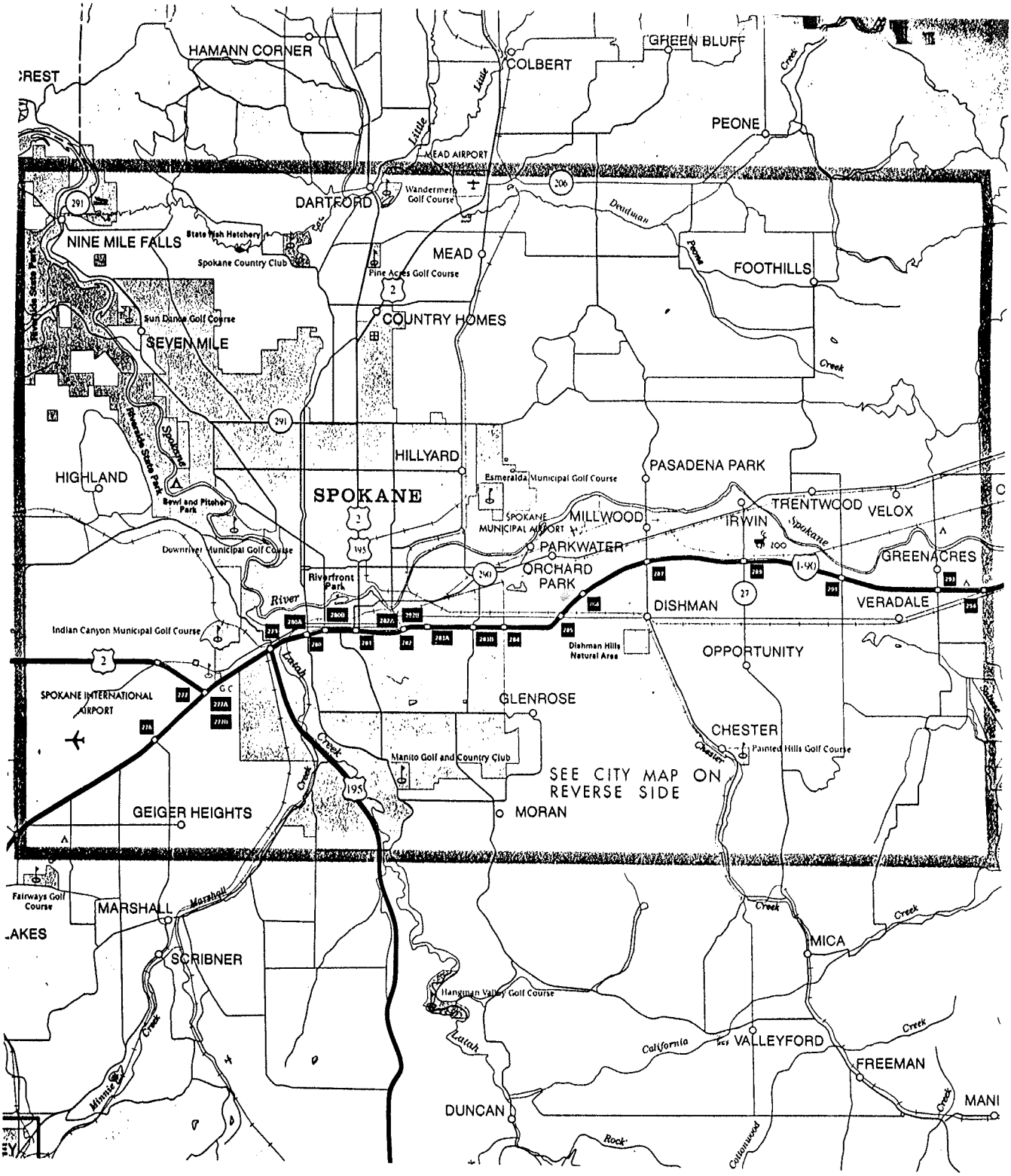

Figure 1: Area Location of Spokane, Washington.

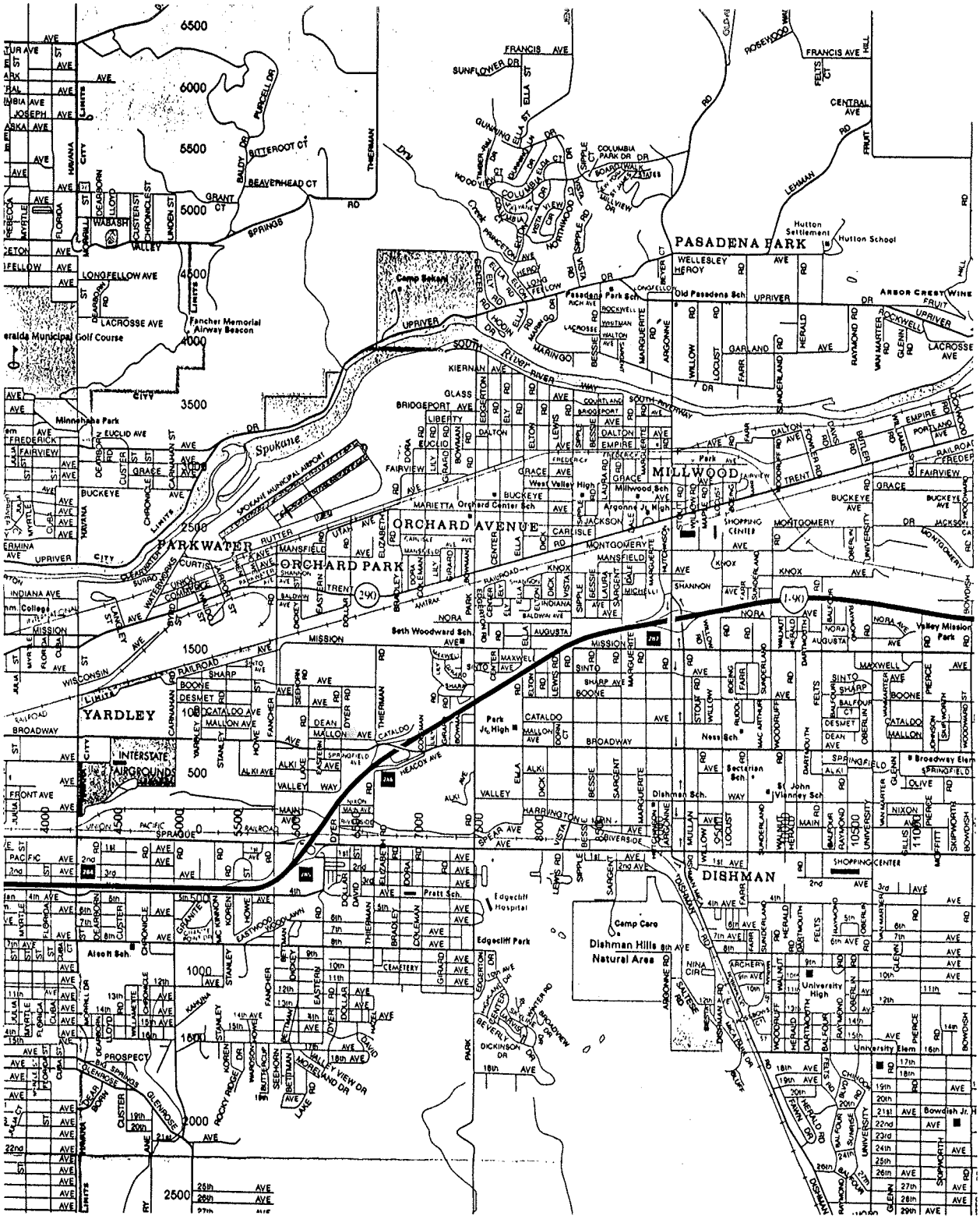

Figure 2: Location of Vestal Jobber Manufacturing Company, Spokane, Washington

3) Results of tests of the free product investigation required under subsection (3)(a)(iii) and (iv) of WAC 173-340-450 of the Model Toxics Control Act;

4) Results of the free product investigation required under subsection (3)(a)(v) of WAC 173-340-450 of the Model Toxics Control Act;

5) Results of all completed site investigations, interim actions and cleanup actions and a description of any remaining investigations, cleanup actions and compliance monitoring which are planned or underway;

6) Information on the free product removal efforts at sites where investigations indicate free product is present. This shall include, at a minimum, the following information:

   a) Name of person responsible for implementing the free product removal measures;

   b) The estimated quantity, type, and thickness of free product observed or measured in wells, boreholes and excavations;

   c) The type of free product recovery system used;

   d) The location of any on-site or off-site discharge during the recovery operation;

   e) The type of treatment applied to, and the effluent quality expected from, any discharge;

   f) The steps taken and planned to obtain necessary permits for any discharge;

   g) Disposition of recovered free product; and

7) Any other information required by the department.

This report is submitted to satisfy the scope of work of the consultant/client contract for a **SITE ASSESSMENT REPORT** and to meet the requirements of the Washington State Department of Ecology (WDOE).

2.0 SCOPE OF WORK

The scope of work performed for this assessment is intended to meet the requirements for an **UST SITE ASSESSMENT REPORT**. The following discussion details the work performed during the course of this investigation. Blue Ridge Associates, Inc., was retained to conduct

an **UST SITE ASSESSMENT**. The UST was not decommissioned as Mr. Harrison had approval from Dan Runkle, Building/Fire Prevention Inspector for Spokane County, and Jim Greeves, Underground Storage Tank Specialist for the Washington Department of Ecology to transport the UST to Lake Oswego, Oregon without inerting or cleaning said UST. This decision was made as the tank supposedly contained no flammable material. Sample results from a sludge obtained from the tank in October of 1991 indicated Total Petroleum Hydrocarbon - Diesel One (TPH-D One) levels of 150,000 parts per million (ppm) and TPH-D Two levels of 700,000 ppm.

2.1 Site Inspection Information

The on-site site assessment at Vestal Jobbers, Inc. was conducted on 2 June 1993, by Mr. Iain A. Olness, hydrogeologist for Blue Ridge Associates, Inc. (DOE Provider's License number 001535). Mr. Olness is a registered Site Assessor and has a Washington State Underground Storage Tank Supervisor License (#W002062). One (1) UST was removed from the subject site. The DOE site number for the Vestal Jobber Manufacturing Company site is 011796 (Appendix II).

The excavation and tank removal was supervised by Iain Olness, hydrogeologist with Blue Ridge Associates, Inc. The excavation was conducted by Don Castleman from Lake Oswego, Oregon. The UST was removed on 2 June 1993, with the UST data shown in the following table:

Table 1: Underground Storage Tank Data

Tank #	Age (yr)	Gallons	Substance
#1	11	1,270	Unknown

The UST was located along the southern end of the subject-property next to a fenced storage area which was topped with wire (see Photograph 3). The tank was located approximately sixty (60) feet east of Dyer Road and approximately fifteen (15) feet west of the building (Figure 3). The UST was sitting on end in the pit and was six (6) feet in diameter and six (6) feet in height, giving it a volume of 1,270 gallons.

2.2 Site History

The site where the UST's were located is the current location of Vestal Jobber Manufacturing Company. Mr. Ralph Vestal has operated his custom manufacturing, CNC milling and turning, general machine shop and fabrication company since he purchased it in 1988.

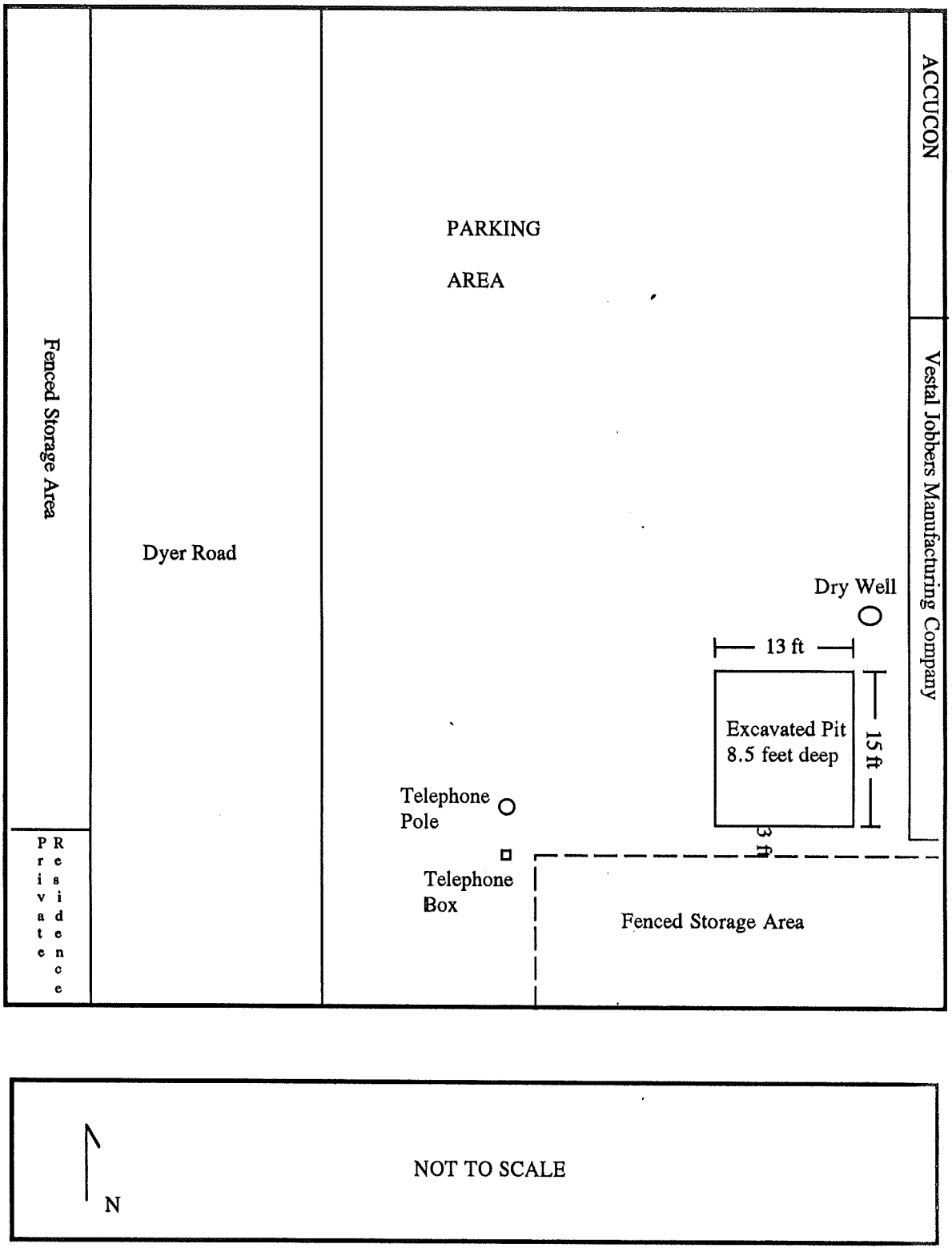

Figure 3: Site plan showing locations of excavation pit in relation to the building.

2.3 Review of Area and Location

The site is located within Spokane County, in the city of Spokane, Washington at an elevation of 1,940 to 1,945 feet above mean sea level. The site location is shown in Figure 1.

2.3.1 Surrounding Properties

The Vestal Jobber Manufacturing Company is located at North 902 Dyer Road, Spokane, Washington. North of, and contiguous with, Vestal Jobber Manufacturing Company is ACCUCON, Screw Conveyor Specialist at North 904 Dyer Road. Vestal Jobber Manufacturing Company and ACCUCON share the same building. North of this building is Dean Road. South of, and contiguous with, Vestal Jobber Manufacturing Company is a fenced storage area. North Dyer Road is located west of the subject-site and a second fenced storage area is west of Dyer Road. A private residence is southwest of the subject-site across North Dyer Road. Debbie Charloe of the WDOE stated that a private well is located on this site.

2.3.2 Geology and Hydrology

The site is located on Pleistocene-age glacial valley fill south of the Spokane River. The fill is up to three hundred (300) feet thick and rests unconformably on the Precambrian metamorphic basement rocks. The general stratigraphy for the site is as follows:

Later Deposits : Consist of Holocene alluvium and loess.

Flood Deposits : Consist of a poorly sorted stratified mixture of boulders, cobbles, gravel, and sand resulting from multiple episodes of catastrophic outbursts from glacier-dammed lakes, such as glacial Lake Missoula.

The Clay Zone : Newcomb and others (1953) interpreted seismic profiles such that 200 feet of Miocene clay (Latah Formation) unconformably overlie the basement rock.

The Basal Sequence : Precambrian metamorphic basement rocks.

The Spokane Valley - Rathdrum Prairie Aquifer is located in the "flood deposit" stratigraphic zone. The saturated thickness of the aquifer in this area is approximately two hundred (200) to three hundred (300) feet and the depth to groundwater is about forty-five (45) feet below ground surface. Recharge for the aquifer is derived mainly from Lake Pend Oreille, Lake Coeur d'Alene, percolation of precipitation, annual snowmelt, irrigation water, and some septic-tank drain fields. The general flow of groundwater in the Spokane Valley - Rathdrum Prairie is from east to west, with some flow into and out of the Spokane River.

The City of Spokane obtains its water from the Spokane Valley - Rathdrum Prairie Aquifer. The aquifer was designated as a "sole-source" of water for the area in 1978 by the U. S.

Environmental Protection Agency. Another major source of water for the Spokane area is the Spokane River itself, whose headwaters originate from the overflow of waters from Lake Coeur d'Alene, Idaho. The water level of the lake varies according to the seasons and corresponding to the regional demand for water, power, etcetera. The overflow near Post Falls, Idaho is controlled mechanicallyand is regulated according to local needs.

2.3.3 Land Use Data

The site from where the tank was removed is the location of Vestal Jobber Manufacturing Company, owned by Ralph H. Vestal. Vestal Jobber Manufacturing Company does custom manufacturing, CNC milling and turning, general machine shop and fabrication. Harrison Foods of Lake Oswego, Oregon owned the building prior to Vestal Jobber Manufacturing Company.

3.0 SITE ASSESSMENT FINDINGS

The following narrative discusses the findings of the SITE ASSESSMENT. Photographs of the subject site are included in the Appendices of this report.

3.1 Site Description

The UST was located west of the building occupied by Vestal Jobber Manufacturing Company. The total disturbed area for the 1,270 gallon UST was approximately 15 feet x 13 feet x 8.5 feet deep. These dimensions were used to calculate the amount of soil removed during the excavation, approximately sixty-one (61) cubic yards. No surface contamination was evident above the tank as this soil had been previously removed during an earlier excavation.

"A"-horizon soil development was minimal, as the excavated area was beneath asphalt. No roots, root material or other organic material was found during the excavation. Material encountered in the excavations was principally sand, gravel and cobbles. Depth to groundwater in this area is approximately forty-five (45) to fifty (50) feet, with the aquifer having a saturated thickness of two hundred (200) to three hundred (300) feet.

3.2 Sampling Program

3.2.1 Description and Procedures

The following applies to each tank that was removed from the site:

Number of Samples. Six (6). One sample was collected from the bottom of the excavation, and one was collected from each of the sidewalls (Figure 4).

Three (3) samples were collected from the excavated stockpiled soil.

Type of Samples. Soil. The samples consisted of sand and gravel.

Method of Collection Hand tools. Gloves were worn to avoid contamination of the samples, and the sampling trowel was cleaned between samples.

Method of Preservation. The samples were immediately placed in 300 ml borosilicate jars and sealed with teflon-lined lids. They were placed in a cooler and ice was added to lower temperature to approximately 4° Centigrade and shipped via Greyhound Bus with a "Chain of Custody" form in accordance with EPA guidelines to:

Analytical Laboratory.

ANATEK Labs
1917 S. Main
Moscow, Idaho 83843
(208) 883-2839

3.2.2 Results

Samples were analyzed for the following:

1) Thirteen (13) Priority Pollutant Metals
2) Toxicity Characteristic Leaching Potential (TCLP) of Metals
3) Thirty (30) Volatile Organics
4) Total Petroleum Hydrocarbon - Gasoline (TPH-G)
5) Benzene, Toluene, Ethylbenzene, and Xylene (BTEX)
6) Total Petroleum Hydrocarbon - Diesel (TPH-D)

EPA analysis methods are as follows: TPH-G/BTEX and TPH-D - EPA 8020 modified; Priority Pollutant Metals - EPA 7000; TCLP Metals - EPA 1311, 7000; and Volatile Organics - EPA 8260. Appendix III is a copy of the lab report. All six (6) samples indicated diesel contamination with results ranging from 1,200 ppm to 21,800 ppm. Two (2) samples indicated chromium contamination above Method A Soil Action Levels. There were no other contaminants associated with this site according to the analyses run. Results are listed in Tables 2 and 3 and are given in mg/Kg (ppm).

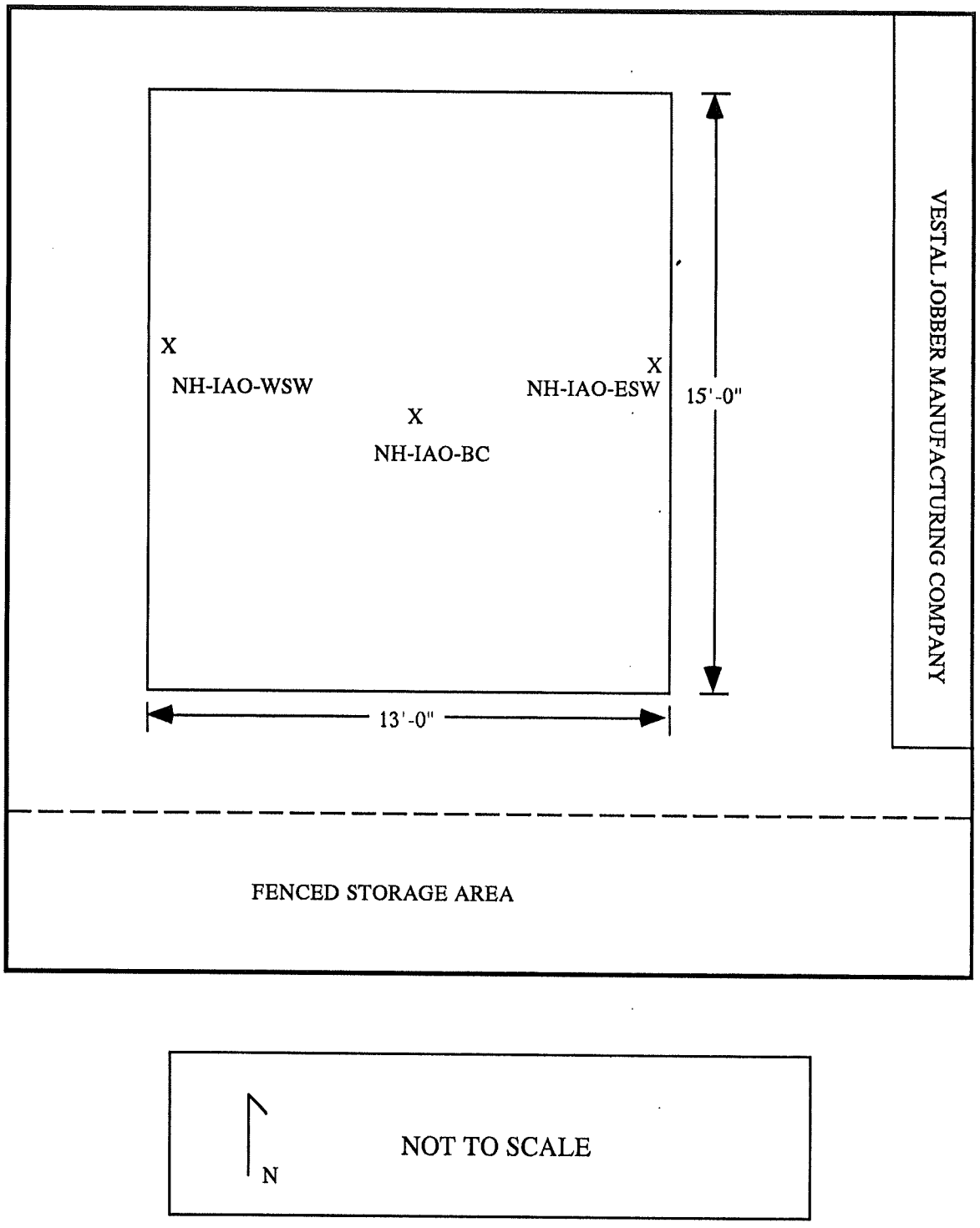

Figure 4: Location of samples for the 1,270 gallon UST.

Table 2: Sample results for Volatile Organics, TPH-G, and TPH-D

ANALYTE	NH-IAO-BC	NH-IAO-ESW	NH-IAO-WSW	NH-IAO-NSP	NH-IAO-CSP	NH-IAO-SSP
Chloromethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Chloroethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Bromoethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Vinyl Chloride	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,1-Dichloroethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,2-Dichloroethene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,1-Dichloroethene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Chloroform	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,1,1-Trichloroethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,2-Dichloroethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Carbon Tetrachloride	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,2-Dichloropropane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Trichloroethene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Bromodichloromethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,3-Dichloropropene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,1,2-Trichloroethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Dibromochloromethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Tetrachloroethene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Chlorobenzene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Chloroform	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Bromoform	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,1,2,2-Tetrachloroethane	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
Benzene	0.10 ppm	0.04 ppm	0.03 ppm	0.39 ppm	0.04 ppm	0.03 ppm
Toluene	0.13 ppm	0.06 ppm	0.07 ppm	0.25 ppm	0.05 ppm	0.04 ppm
Ethylbenzene	0.80 ppm	0.32 ppm	0.19 ppm	2.47 ppm	0.22 ppm	0.08 ppm
Xylene (total)	5.1 ppm	2.56 ppm	0.40 ppm	16.1 ppm	1.55 ppm	0.54 ppm
Styrene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,2-Dichlorobenzene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,3-Dichlorobenzene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
1,4-Dichlorobenzene	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm	< 0.1 ppm
TPH - Gasoline	< 25 ppm	< 10 ppm	< 25 ppm	< 25 ppm	< 25 ppm	< 25 ppm
TPH - Diesel	**15,100 ppm**	**10,100 ppm**	**1,200 ppm**	**21,800 ppm**	**5,110 ppm**	5,110 ppm

Table 3: Sample results for Priority Pollutant Metals and TCLP

ANALYTE	NH-IAO-BC	NH-IAO-ESW	NH-IAO-WSW	NH-IAO-NSP	NH-IAO-CSP	NH-IAO-SSP
Lead	19.6 ppm	15.8 ppm	8.5 ppm	8.2 ppm	15.3 ppm	13.6 ppm
Arsenic	17.3 ppm	16.8 ppm	15.9 ppm	9.0 ppm	16.7 ppm	12.8 ppm
Beryllium	0.13 ppm	0.16 ppm	0.02 ppm	0.32 ppm	0.35 ppm	0.36 ppm
Cadmium	0.40 ppm	0.55 ppm	0.20 ppm	0.15 ppm	0.60 ppm	0.35 ppm
Chromium	**210 ppm**	**174 ppm**	17.2 ppm	60.3 ppm	0.13 ppm	0.08 ppm
Mercury	< 0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm
Selenium	< 0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm
Silver	0.95 ppm	0.88 ppm	0.81 ppm	0.82 ppm	0.68 ppm	0.85 ppm
Copper	18.4 ppm	17.1 ppm	11.0 ppm	10.4 ppm	17.8 ppm	13.8 ppm
Nickel	9.4 ppm	7.8 ppm	7.5 ppm	9.6 ppm	8.7 ppm	7.5 ppm
Zinc	185 ppm	138 ppm	46.0 ppm	60.0 ppm	111 ppm	89.6 ppm
Thallium	4.7 ppm	2.2 ppm	3.1 ppm	2.5 ppm	3.9 ppm	2.9 ppm
Antimony	<0.01 ppm	0.15 ppm	0.3 ppm	2.8 ppm	4.3 ppm	1.5 ppm
TCLP Lead	<0.05 ppm	<0.05 ppm	<0.05 ppm	<0.05 ppm	<0.05 ppm	<0.05 ppm
TCLP Arsenic	<0.05 ppm	<0.05 ppm	<0.05 ppm	<0.05 ppm	<0.05 ppm	<0.05 ppm
TCLP Barium	<0.5 ppm	<0.5 ppm	<0.5 ppm	<0.5 ppm	<0.5 ppm	<0.5 ppm
TCLP Cadmium	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm
TCLP Chromium	< 0.05 ppm	< 0.05 ppm	< 0.05 ppm	< 0.05 ppm	< 0.05 ppm	< 0.05 ppm
TCLP Mercury	<0.001 ppm	<0.001 ppm	<0.001 ppm	<0.001 ppm	<0.001 ppm	<0.001 ppm
TCLP Selenium	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm
TCLP Silver	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm	<0.01 ppm

3.2.3 Discussion

The soil action levels for the following analyses according to the WDOE are listed in Tables 4, 5, and 6.

1) Thirteen (13) Priority Pollutant Metals
2) Toxicity Characteristic Leaching Potential (TCLP) of Metals
3) Thirty (30) Volatile Organics
4) Total Petroleum Hydrocarbon - Gasoline (TPH-G)
5) Benzene, Toluene, Ethylbenzene, and Xylene (BTEX)
6) Total Petroleum Hydrocarbon - Diesel (TPH-D)

Results from the samples obtained during the Site Assessment of the 1,270 gallon UST indicate total petroleum hydrocarbon - diesel levels above the action levels set by the Washington Department of Ecology (WDOE), ranging from 1,200 parts per million (ppm) to 21,800 ppm. All other analyses indicated levels below those set by the WDOE with the exception of samples NH-IAO-BC and NH-IAO-ESW, which had chromium levels above those set by the WDOE.

The soil removed during the excavation was placed on asphalt to the west of the excavation and covered with ten (10) mil plastic. The excavation was cordoned off with security fencing to prevent any possible accidents. The excavation was left open as petroleum contamination was suspected at the time of the Site Assessment.

4.0 CONCLUSIONS AND RECOMMENDATIONS

The **Site Assessment Report** was completed on 6 July 1993. It is believed to be a factual, unbiased report based on the investigations and sampling at Vestal Jobbers Manufacturing Company in Spokane.

All three (3) samples obtained from the excavation of the 1,270 gallon UST were above the action level threshold values for TPH-D as set by the WDOE. Additional excavation, as well as additional sampling, will be necessary in the pit in order to remove the soil which contains levels of diesel contamination above the action threshold limits set by the WDOE. All three (3) samples obtained from the excavated stockpiled soil were also above the action level threshold values for TPH-D. This soil will either need to be "land-farmed" at a site approved by the Spokane County Health Department and the WDOE, taken to REMTECH in Spokane for incineration, or taken to an approved landfill.

The pit which contained the 1,270 gallon UST still contains contaminated soil as is evidenced by the sample results. This contamination problem was discussed with Debbie Charloe of the WDOE. Ms. Charloe stated that according to Washington State Regulations, the extent of vertical and lateral contamination needs to be determined. The pertinent regulations are found in the "Model Toxics Control Act--Cleanup" (MTCA-C) listed in Table 7.

Table 4: WDOE Action Levels for Volatile Organics, TPH-G, and TPH-D

ANALYTE	Action Levels	
	Carcinogen	Non-carcinogen
Chloromethane	76.9 ppm	NA
Chloroethane	***	***
Bromoethane	***	***
Vinyl Chloride	.526 ppm	NA
1,1-Dichloroethane	11 ppm	8,000 ppm
1,2-Dichloroethene	NA	800 ppm
1,1-Dichloroethene	1.67 ppm	720 ppm
Chloroform	164 ppm	800 ppm
1,1,1-Trichloroethane	NA	7,200 ppm
1,2-Dichloroethane	11 ppm	NA
Carbon Tetrachloride	7.69 ppm	56.0 ppm
1,2-Dichloropropane	14.7 ppm	NA
Trichloroethene	90.9 ppm	NA
Bromodichloromethane	7.69 ppm	1,600 ppm
1,3-Dichloropropene	5.56 ppm	24.0 ppm
1,1,2-Trichloroethane	17.5 ppm	320 ppm
Dibromochloromethane	NA	1,600 ppm
Tetrachloroethene	19.6 ppm	800 ppm
Chlorobenzene	NA	1,600 ppm
Chloroform	164 ppm	800 ppm
Bromoform	127 ppm	1,600 ppm
1,1,2,2-Tetrachloroethane	5 ppm	NA
Benzene	0.5 ppm	NA
Toluene	NA	40.0 ppm
Ethylbenzene	NA	20.0 ppm
Xylene (total)	NA	20.0 ppm
Styrene	33.3 ppm	16,000 ppm
1,2-Dichlorobenzene	NA	7,200 ppm
1,3-Dichlorobenzene	***	***
1,4-Dichlorobenzene	41.7 ppm	NA
TPH - Gasoline	NA	100 ppm
TPH - Diesel	NA	200 ppm

Table 5: WDOE Action Levels for Priority Pollutant Metal

ANALYTE	ACTION LEVELS		
	Method A	Method B	
		Carcinogen	Non-carcinogen
Lead	250.0 ppm	***	***
Arsenic	20.0 ppm	1.43 ppm	60.0 ppm
Beryllium	***	0.233 ppm	400 ppm
Cadmium	2.0 ppm	***	***
Chromium	100.0 ppm	***	400.0 ppm
Mercury	1.0 ppm	***	24.0 ppm
Selenium	***	***	***
Silver	***	***	240.0 ppm
Copper	***	***	2,960.0 ppm
Nickel	***	***	1,600.0 ppm
Zinc	***	***	16,000 ppm
Thallium	***	***	5.60 ppm
Antimony	***	***	32.0 ppm

Table 6: WDOE Action Levels for TCLP Metals

ANALYTE	ACTION LEVELS	
	Extremely Hazardous Waste	Dangerous Waste
TCLP Lead	500 ppm	5.0 ppm
TCLP Arsenic	500 ppm	5.0 ppm
TCLP Barium	10,000 ppm	100.0 ppm
TCLP Cadmium	100 ppm	1.0 ppm
TCLP Chromium	500 ppm	5.0 ppm
TCLP Mercury	20 ppm	0.2 ppm
TCLP Selenium	100 ppm	1.0 ppm
TCLP Silver	500 ppm	5.0 ppm

Table 7: Pertinent "Model Toxics Control Act--Cleanup" Regulations

(1) WAC 173-340-350:	State remedial investigation and feasibility study; Section 6 (c) (i), (ii), and (iii)
(2) WAC 173-340-450:	Releases from underground storage tanks; Section (3) (a) (iii)

It is proposed that to delineate the extent of vertical and lateral contamination that one of the following methods be utilized.

(1) An OSHA Certified backhoe operator be retained to further excavate the pit, until such time that the pit is determined to be clean by laboratory testing of soil samples. This method is only practical if the contamination is restricted to the upper twenty (20) feet of the subject-property and has not significantly migrated laterally. Federal regulations require that the sides of the excavation pit be shored to prevent the walls from collapsing if the excavation continues past a depth of twenty feet. The shoring has to be designed by an Engineer and that Engineer must be on-site whenever work is occurring in the pit.

(2) Four (4) boreholes be drilled around the excavation and sampled at five (5) foot intervals beginning at a depth of ten (10) feet and continuing to a depth of thirty (30) feet or until it is determined that the contamination has been cleared. A single borehole/well is also proposed in the center of the excavation and sampled at five (5) foot intervals beginning at a depth of ten (10) feet and continuing to a depth of thirty (30) feet or until it is determined that the contamination has been cleared. The pit will need to be filled in with clean fill which contains no cobbles as to expedite the drilling process. This borehole/well might eventually be transformed into a vapor extraction well in order to remediate the site per DOE regulations. There is also a possibility that one or more of the boreholes surrounding the pit will need to transformed into a vapor extraction well in order to remediate the site.

There is indication of contamination by hydrocarbons or petroleum products in the areas around the UST's. A Site Check/Site Assessment form and Site Characterization Report will also be submitted to the WDOE.

5.0 LIMITATIONS

This report is for the exclusive use of Mr. Norman Harrison to assist in the evaluation of potential environmental liability associated with the UST formerly located on the subject property. All work has been performed in accordance with the guidelines of the Washington Department of Ecology. No other warranty, expressed or implied, is made.

The conclusions are based on existing conditions, observations, and data made available by the owner and governmental agencies. Blue Ridge Associates, Inc. accepts no liability for lack of accuracy in data obtained from governmental agencies. Any representation regarding future generation, storage, handling, or use of hazardous materials, substances, or wastes on this property is outside the scope of this UST site assessment.

Field/Office investigations and report completed by:

Iain A. Olness
Hydrogeologist

17 August 1993
(date)

APPENDIX I

LABORATORY RESULTS

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

June 8, 1993

Blue Ridge Associates, Inc.
N. 9 Post, Suite # 250
Spokane, WA 99201
Attn: Iain Olness

Items: Results of analysis for samples received 6/3/93. Sample Log-in number is 917.
Project: Harrison
Report # 93-0608-BRA

Priority Pollutant Metals by EPA 7000
TCLP Metals by EPA 1311, 7000
Volatile Organics by EPA 8260
Gasoline by WA-TPH-G
Diesel by WA-TPH-D

Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-BC	Soil	6/7/93	Lead	19.6 mg/Kg
			Arsenic	17.3 mg/Kg
			Beryllium	0.13 mg/Kg
			Cadmium	0.40 mg/Kg
			Chromium	210 mg/Kg
			Mercury	< 0.01 mg/Kg
			Selenium	< 0.01 mg/Kg
			Silver	0.95 mg/Kg
			Copper	18.4 mg/Kg
			Nickel	9.4 mg/Kg
			Zinc	185 mg/Kg
			Thallium	4.7 mg/Kg
			Antimony	< 0.01 mg/Kg
	Soil	6/7/93	TCLP Lead	< 0.05 mg/L
			TCLP Arsenic	< 0.05 mg/L
			TCLP Barium	< 0.5 mg/L
			TCLP Cadmium	< 0.01 mg/L
			TCLP Chromium	< 0.05 mg/L
			TCLP Mercury	< 0.001 mg/L
			TCLP Selenium	< 0.01 mg/L
			TCLP Silver	< 0.01 mg/L

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9240

Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-BC	Soil	6/4/93	Gasoline	< 25 mg/Kg
(continued)		6/4/93	Diesel	15100 mg/Kg
		6/7/93	Chloromethane	< 0.1 mg/Kg
			Chloroethane	< 0.1 mg/Kg
			Bromomethane	< 0.1 mg/Kg
			Vinyl chloride	< 0.1 mg/Kg
			1,1-Dichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethene	< 0.1 mg/Kg
			1,1-Dichloroethene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			1,1,1-Trichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethane	< 0.1 mg/Kg
			Carbon tetrachloride	< 0.1 mg/Kg
			1,2-Dichloropropane	< 0.1 mg/Kg
			Trichloroethene	< 0.1 mg/Kg
			Bromodichloromethane	< 0.1 mg/Kg
			1,3-Dichloropropene	< 0.1 mg/Kg
			1,1,2 Trichloroethane	< 0.1 mg/Kg
			Dibromochloromethane	< 0.1 mg/Kg
			Tetrachloroethene	< 0.1 mg/Kg
			Chlorobenzene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			Bromoform	< 0.1 mg/Kg
			1,1,2,2-Tetrachloroethane	< 0.1 mg/Kg
			Benzene	0.10 mg/Kg
			Toluene	0.13 mg/Kg
			Ethylbenzene	0.80 mg/Kg
			Xylene(Total)	5.1 mg/Kg
			Styrene	< 0.1 mg/Kg
			1,2-Dichlorobenzene	< 0.1 mg/Kg
			1,3-Dichlorobenzene	< 0.1 mg/Kg
			1,4-Dichlorobenzene	< 0.1 mg/Kg

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

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Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-ESW	Soil	6/4/93	Gasoline	< 10 mg/Kg
		6/4/93	Diesel	10100 mg/Kg
		6/7/93	Chloromethane	< 0.1 mg/Kg
			Chloroethane	< 0.1 mg/Kg
			Bromomethane	< 0.1 mg/Kg
			Vinyl chloride	< 0.1 mg/Kg
			1,1-Dichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethene	< 0.1 mg/Kg
			1,1-Dichloroethene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			1,1,1-Trichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethane	< 0.1 mg/Kg
			Carbon tetrachloride	< 0.1 mg/Kg
			1,2-Dichloropropane	< 0.1 mg/Kg
			Trichloroethene	< 0.1 mg/Kg
			Bromodichloromethane	< 0.1 mg/Kg
			1,3-Dichloropropene	< 0.1 mg/Kg
			1,1,2-Trichloroethane	< 0.1 mg/Kg
			Dibromochloromethane	< 0.1 mg/Kg
			Tetrachloroethene	< 0.1 mg/Kg
			Chlorobenzene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			Bromoform	< 0.1 mg/Kg
			1,1,2,2-Tetrachloroethane	< 0.1 mg/Kg
			Benzene	0.04 mg/Kg
			Toluene	0.06 mg/Kg
			Ethylbenzene	0.32 mg/Kg
			Xylene(Total)	2.56 mg/Kg
			Styrene	< 0.1 mg/Kg
			1,2-Dichlorobenzene	< 0.1 mg/Kg
			1,3-Dichlorobenzene	< 0.1 mg/Kg
			1,4-Dichlorobenzene	< 0.1 mg/Kg

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-ESW (continued)		6/7/93	Lead	15.8 mg/Kg
			Arsenic	16.8 mg/Kg
			Beryllium	0.16 mg/Kg
			Cadmium	0.55 mg/Kg
			Chromium	174 mg/Kg ← Matrix ?
			Mercury	< 0.01 mg/Kg
			Selenium	< 0.01 mg/Kg
			Silver	0.88 mg/Kg
			Copper	17.1 mg/Kg
			Nickel	7.8 mg/Kg
			Zinc	138 mg/Kg
			Thallium	2.2 mg/Kg
			Antimony	0.15 mg/Kg
	Soil	6/7/93	TCLP Lead	< 0.05 mg/L
			TCLP Arsenic	< 0.05 mg/L
			TCLP Barium	< 0.5 mg/L
			TCLP Cadmium	< 0.01 mg/L
			TCLP Chromium	< 0.05 mg/L
			TCLP Mercury	< 0.001 mg/L
			TCLP Selenium	< 0.01 mg/L
			TCLP Silver	< 0.01 mg/L

Anatek Labs
1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

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Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-WSW	Soil	6/4/93	Gasoline	< 25 mg/Kg
		6/4/93	Diesel	1200 mg/Kg
		6/7/93	Chloromethane	< 0.1 mg/Kg
			Chloroethane	< 0.1 mg/Kg
			Bromomethane	< 0.1 mg/Kg
			Vinyl chloride	< 0.1 mg/Kg
			1,1-Dichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethene	< 0.1 mg/Kg
			1,1-Dichloroethene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			1,1,1-Trichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethane	< 0.1 mg/Kg
			Carbon tetrachloride	< 0.1 mg/Kg
			1,2-Dichloropropane	< 0.1 mg/Kg
			Trichloroethene	< 0.1 mg/Kg
			Bromodichloromethane	< 0.1 mg/Kg
			1,3-Dichloropropene	< 0.1 mg/Kg
			1,1,2-Trichloroethane	< 0.1 mg/Kg
			Dibromochloromethane	< 0.1 mg/Kg
			Tetrachloroethene	< 0.1 mg/Kg
			Chlorobenzene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			Bromoform	< 0.1 mg/Kg
			1,1,2,2-Tetrachloroethane	< 0.1 mg/Kg
			Benzene	0.03 mg/Kg
			Toluene	0.07 mg/Kg
			Ethylbenzene	0.19 mg/Kg
			Xylene(Total)	0.40 mg/Kg
			Styrene	< 0.1 mg/Kg
			1,2-Dichlorobenzene	< 0.1 mg/Kg
			1,3-Dichlorobenzene	< 0.1 mg/Kg
			1,4-Dichlorobenzene	< 0.1 mg/Kg

Anatek Labs
1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-WSW (continued)	Soil	6/7/93	Lead	8.5 mg/Kg
			Arsenic	15.9 mg/Kg
			Beryllium	0.02 mg/Kg
			Cadmium	0.20 mg/Kg
			Chromium	17.2 mg/Kg
			Mercury	< 0.01 mg/Kg
			Selenium	< 0.01 mg/Kg
			Silver	0.81 mg/Kg
			Copper	11.0 mg/Kg
			Nickel	7.5 mg/Kg
			Zinc	46.0 mg/Kg
			Thallium	3.1 mg/Kg
			Antimony	0.3 mg/Kg
	Soil	6/7/93	TCLP Lead	< 0.05 mg/L
			TCLP Arsenic	< 0.05 mg/L
			TCLP Barium	< 0.5 mg/L
			TCLP Cadmium	< 0.01 mg/L
			TCLP Chromium	< 0.05 mg/L
			TCLP Mercury	< 0.001 mg/L
			TCLP Selenium	< 0.01 mg/L
			TCLP Silver	< 0.01 mg/L

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

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Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-NSP	Soil	6/4/93	Gasoline	< 25 mg/Kg
		6/4/93	Diesel	21800 mg/Kg
		6/7/93	Chloromethane	< 0.1 mg/Kg
			Chloroethane	< 0.1 mg/Kg
			Bromomethane	< 0.1 mg/Kg
			Vinyl chloride	< 0.1 mg/Kg
			1,1-Dichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethene	< 0.1 mg/Kg
			1,1-Dichloroethene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			1,1,1-Trichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethane	< 0.1 mg/Kg
			Carbon tetrachloride	< 0.1 mg/Kg
			1,2-Dichloropropane	< 0.1 mg/Kg
			Trichloroethene	< 0.1 mg/Kg
			Bromodichloromethane	< 0.1 mg/Kg
			1,3-Dichloropropene	< 0.1 mg/Kg
			1,1,2-Trichloroethane	< 0.1 mg/Kg
			Dibromochloromethane	< 0.1 mg/Kg
			Tetrachloroethene	< 0.1 mg/Kg
			Chlorobenzene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			Bromoform	< 0.1 mg/Kg
			1,1,2,2-Tetrachloroethane	< 0.1 mg/Kg
			Benzene	0.39 mg/Kg
			Toluene	0.25 mg/Kg
			Ethylbenzene	2.47 mg/Kg
			Xylene(Total)	16.1 mg/Kg
			Styrene	< 0.1 mg/Kg
			1,2-Dichlorobenzene	< 0.1 mg/Kg
			1,3-Dichlorobenzene	< 0.1 mg/Kg
			1,4-Dichlorobenzene	< 0.1 mg/Kg

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1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-NSP (continued)	Soil	6/7/93	Lead	8.2 mg/Kg
			Arsenic	9.0 mg/Kg
			Beryllium	0.32 mg/Kg
			Cadmium	0.15 mg/Kg
			Chromium	60.3 mg/Kg
			Mercury	< 0.01 mg/Kg
			Selenium	< 0.01 mg/Kg
			Silver	0.82 mg/Kg
			Copper	10.4 mg/Kg
			Nickel	9.6 mg/Kg
			Zinc	60.0 mg/Kg
			Thallium	2.5 mg/Kg
			Antimony	2.8 mg/Kg
	Soil	6/7/93	TCLP Lead	< 0.05 mg/L
			TCLP Arsenic	< 0.05 mg/L
			TCLP Barium	< 0.5 mg/L
			TCLP Cadmium	< 0.01 mg/L
			TCLP Chromium	< 0.05 mg/L
			TCLP Mercury	< 0.001 mg/L
			TCLP Selenium	< 0.01 mg/L
			TCLP Silver	< 0.01 mg/L

Anatek Labs
1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

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Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-CSP	Soil	6/4/93	Gasoline	< 25 mg/Kg
		6/4/93	Diesel	5110 mg/Kg
		6/7/93	Chloromethane	< 0.1 mg/Kg
			Chloroethane	< 0.1 mg/Kg
			Bromomethane	< 0.1 mg/Kg
			Vinyl chloride	< 0.1 mg/Kg
			1,1-Dichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethene	< 0.1 mg/Kg
			1,1-Dichloroethene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			1,1,1-Trichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethane	< 0.1 mg/Kg
			Carbon tetrachloride	< 0.1 mg/Kg
			1,2-Dichloropropane	< 0.1 mg/Kg
			Trichloroethene	< 0.1 mg/Kg
			Bromodichloromethane	< 0.1 mg/Kg
			1,3-Dichloropropene	< 0.1 mg/Kg
			1,1,2-Trichloroethane	< 0.1 mg/Kg
			Dibromochloromethane	< 0.1 mg/Kg
			Tetrachloroethene	< 0.1 mg/Kg
			Chlorobenzene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			Bromoform	< 0.1 mg/Kg
			1,1,2,2-Tetrachloroethane	< 0.1 mg/Kg
			Benzene	0.04 mg/Kg
			Toluene	0.05 mg/Kg
			Ethylbenzene	0.22 mg/Kg
			Xylene(Total)	1.55 mg/Kg
			Styrene	< 0.1 mg/Kg
			1,2-Dichlorobenzene	< 0.1 mg/Kg
			1,3-Dichlorobenzene	< 0.1 mg/Kg
			1,4-Dichlorobenzene	< 0.1 mg/Kg

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

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Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-LAO-SSP	Soil	6/4/93	Gasoline	< 25 mg/Kg
		6/4/93	Diesel	5110 mg/Kg
		6/7/93	Chloromethane	< 0.1 mg/Kg
			Chloroethane	< 0.1 mg/Kg
			Bromomethane	< 0.1 mg/Kg
			Vinyl chloride	< 0.1 mg/Kg
			1,1-Dichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethene	< 0.1 mg/Kg
			1,1-Dichloroethene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			1,1,1-Trichloroethane	< 0.1 mg/Kg
			1,2-Dichloroethane	< 0.1 mg/Kg
			Carbon tetrachloride	< 0.1 mg/Kg
			1,2-Dichloropropane	< 0.1 mg/Kg
			Trichloroethene	< 0.1 mg/Kg
			Bromodichloromethane	< 0.1 mg/Kg
			1,3-Dichloropropene	< 0.1 mg/Kg
			1,1,2-Trichloroethane	< 0.1 mg/Kg
			Dibromochloromethane	< 0.1 mg/Kg
			Tetrachloroethene	< 0.1 mg/Kg
			Chlorobenzene	< 0.1 mg/Kg
			Chloroform	< 0.1 mg/Kg
			Bromoform	< 0.1 mg/Kg
			1,1,2,2-Tetrachloroethane	< 0.1 mg/Kg
			Benzene	0.03 mg/Kg
			Toluene	0.04 mg/Kg
			Ethylbenzene	0.08 mg/Kg
			Xylene(Total)	0.54 mg/Kg
			Styrene	< 0.1 mg/Kg
			1,2-Dichlorobenzene	< 0.1 mg/Kg
			1,3-Dichlorobenzene	< 0.1 mg/Kg
			1,4-Dichlorobenzene	< 0.1 mg/Kg

Anatek Labs

1917 S. Main Moscow, ID 83843 (208) 883-BTEX (2839) FAX: (208) 882-9246

Sample Name	Matrix	Analysis Date	Analyte	Concentration
NH-IAO-SSP (continued)	Soil	6/7/93	Lead	13.6 mg/Kg
			Arsenic	12.8 mg/Kg
			Beryllium	0.36 mg/Kg
			Cadmium	0.35 mg/Kg
			Chromium	0.08 mg/Kg
			Mercury	< 0.01 mg/Kg
			Selenium	< 0.01 mg/Kg
			Silver	0.85 mg/Kg
			Copper	13.8 mg/Kg
			Nickel	7.5 mg/Kg
			Zinc	89.6 mg/Kg
			Thallium	2.9 mg/Kg
			Antimony	1.5 mg/Kg
	Soil	6/7/93	TCLP Lead	< 0.05 mg/L
			TCLP Arsenic	< 0.05 mg/L
			TCLP Barium	< 0.5 mg/L
			TCLP Cadmium	< 0.01 mg/L
			TCLP Chromium	< 0.05 mg/L
			TCLP Mercury	< 0.001 mg/L
			TCLP Selenium	< 0.01 mg/L
			TCLP Silver	< 0.01 mg/L

Mike Pearson
Laboratory Director

APPENDIX II

30 DAY NOTICE OF INTENT TO CLOSE/DECOMMISSION TANKS

UNDERGROUND STORAGE TANK
30 Day Notice of Intent to Close/Decommission Tanks

The purpose of this form is to provide the Department of Ecology with notice of intent to close/decommission an UST. It must be received 30 days prior to the closure activities. It must be signed and dated by either the owner/operator of the UST to be closed or his/her authorized representative. (This could be the firm contracted to do the work.) Ecology will notify the identified person of the earliest date closure/decommissioning activities may commence.

For questions on completing this form please call (206) 459-6293.

Please type or use ink.

The completed checklist should be mailed to:

Underground Storage Tank Section
Department of Ecology
Mail Stop PV-11
Olympia, WA 98504-8711

1. TANK OWNER AND LOCATION

UST Owner/Operator: Norman Harrison

Owners Mailing Address: 2040 S.W. 98th Avenue (Street) (P.O. Box)

Portland (City) OR (State) 97225 (ZIP-Code)

Telephone: (503) 636-3670

Site ID Number (on invoice or available from Ecology if tank is registered):

Site/Business Name: Vestal Jobber Manufacturing, Inc

Site Address: 902 N. Dyer Road (Street) Spokane (County)

Spokane (City) WA (State) 99212 (ZIP-Code)

2. TANK PERMANENT CLOSURE TO BE PERFORMED BY (If known):

Firm: Blue Ridge Associates, Inc.

Address: North 9 Post, Suite 250 (Street) (P.O. Box)

Spokane (City) WA (State) 99201 (ZIP-Code)

Telephone: (509) 838-8120 Contact Name: Iain Olness

3. TANK INFORMATION

Tank Identification	Approx. Closure Date	Tank Capacity (gallons)	Tank Age (years)	Last Substance Stored
01179B - Tank 1	2 July 1993	~1200	~11 years	unknown

4. SIGNATURE OF TANK OWNER/OPERATOR OR AUTHORIZED REPRESENTATIVE:

Iain Olness (Signature) Hydrogeologist (Title) 1 June 1993 (Date)

APPENDIX III

SITE CHECK/SITE ASSESSMENT CHECKLIST

UNDERGROUND STORAGE TANK
Site Check/Site Assessment Checklist

For Office Use Only	
Owner #	
Site #	

INSTRUCTIONS:

When a release has **not** been confirmed and reported, this Site Check/Site Assessment Checklist must be completed and signed by a person registered with Ecology. **The results of the site check or site assessment must be included with this checklist.** This form must be submitted to Ecology at the address shown below within 30 days after completion of the site check/site assessment.

SITE INFORMATION: Include the Ecology site ID number if the tanks are registered with Ecology. This number may be found on the tank owner's invoice or tank permit.

TANK INFORMATION: Please list all tanks for which the site check or site assessment is being conducted. Use the owner's tank ID numbers if available, and indicate tank capacity and substance stored.

REASON FOR CONDUCTING SITE CHECK/SITE ASSESSMENT: Please check the appropriate item.

CHECKLIST: Please initial each item in the appropriate box.

SITE ASSESSOR INFORMATION: This form must be signed by the registered site assessor who is responsible for conducting the site check/site assessment.

Underground Storage Tank Section
Department of Ecology
P. O. Box 47655
Olympia, WA 98504-7655

SITE INFORMATION

Site ID Number (on invoice or available from Ecology if the tanks are registered): 011796

Site/Business Name: Vestal Jobber Manufacturing, Inc.

Site Address: 902 N. Dyer Road (Street) Telephone: (509) 534-4830

Spokane (City) WA (State) 99212 (ZIP-Code)

TANK INFORMATION

Tank ID No.	Tank Capacity	Substance Stored
011796 - Tank 1	~1200 gallons	unknown

REASON FOR CONDUCTING SITE CHECK/SITE ASSESSMENT

Check one:

- ____ Investigate suspected release due to on-site environmental contamination
- ____ Investigate suspected release due to off-site environmental contamination.
- ____ Extend temporary closure of UST system for more than 12 months.
- ____ UST system undergoing change-in-service.
- X UST system permanently closed-in-place.
- ____ UST system permanently closed with tank removed.
- ____ Abandoned tank containing product.
- ____ Required by Ecology or delegated agency for UST system closed before 12/22/88.
- ____ Other (describe): ____

CHECKLIST

Each item of the following checklist shall be initialed by the person registered with the Department of Ecology whose signature appears below.

		YES	NO
1.	The location of the UST site is shown on a vicinity map.	IAC	
2.	A brief summary of information obtained during the site inspection is provided. (see Section 3.2 in site assessment guidance)	IAO	
3.	A summary of UST system data is provided. (see Section 3.1)	IAO	
4.	The soils characteristics at the UST site are described. (see Section 5.2)	IAO	
5.	Is there any apparent groundwater in the tank excavation?		IAO
6.	A brief description of the surrounding land use is provided. (see Section 3.1)	IAO	
7.	Information has been provided indicating the number and types of samples collected, methods used to collect and analyze the samples, and the name and address of the laboratory used to perform the analyses.	IAO	
8.	A sketch or sketches showing the following items is provided:		
	- location and ID number for all field samples collected	IAC	
	- groundwater samples distinguished from soil samples (if applicable)		IAO
	- samples collected from stockpiled excavated soil		IAO
	- tank and piping locations and limits of excavation pit	IAO	
	- adjacent structures and streets	IAO	
	- approximate locations of any on-site and nearby utilities	IAO	
9.	If sampling procedures different from those specified in the guidance were used, has justification for using these alternative sampling procedures been provided? (see Section 3.4)	IAO	
10.	A table is provided showing laboratory results for each sample collected including; sample ID number, constituents analyzed for and corresponding concentration, analytical method and detection limit for that method.	IAO	
11.	Any factors that may have compromised the quality of the data or validity of the results are described.	IAO	
12.	The results of this site check/site assessment indicate that a confirmed release of a regulated substance has **not** occurred.		IAO

SITE ASSESSOR INFORMATION

Iain Olness — Person registered with Ecology

Blue Ridge Associates, Inc. — Firm Affiliated with

Business Address: North 9 Post Suite 250 (Street)

Telephone: (509) 838-8120

Spokane (City) WA (State) 99201 (ZIP+Code)

I hereby certify that I have been in responsible charge of performing the site check/site assessment described above. Persons submitting false information are subject to penalties under Chapter 173.360 WAC.

17 August 1993 — Date

Iain Olness — Signature of Person Registered with Ecology

APPENDIX IV

UNDERGROUND STORAGE TANK LIST

COUNTY	SITE CITY	SITE ADDRESS	ZIP	SITE NUMBER	SITE NAME	TANK CODE	CUR AGE	GAL X1000	STATUS	SUBSTANCE
SPOKANE	SPOKANE	N 302 PARK RD	99212	005534	ACME PARK RD. PLANT	1	14	10-20	IN USE	UNLEADED G
						2	14	10-20	IN USE	DIESEL FUE
						3	14	10-20	IN USE	DIESEL FUE
SPOKANE	SPOKANE	N 3320 ARGONNE RD	99212	005317	INLAND EMPIRE PAPER CO	1	37	20-30	EXEMPT	HEATING FU
						2	17	11-20	IN USE A	LEADED GAS
						3	13	2- 5	IN USE A	UNLEADED G
SPOKANE	SPOKANE	N 902 DYER	99212	011796	AIC	TANK 1	10	<1100	PERM OUT	
SPOKANE	SPOKANE	N. 2128 WATERWORKS RD	99212	000561	WA-CAN	1	14	5-10	IN USE A	DIESEL FUE
						2	14	5-10	IN USE A	DIESEL FUE
						3	14	5-10	IN USE A	DIESEL FUE
SPOKANE	SPOKANE	N1201 STANLEY	99212	001853	HOLMAN DRILLING CORP	1	14	11-20	IN USE A	LEADED GAS
						2	14	11-20	IN USE A	DIESEL FUE
SPOKANE	SPOKANE	NORTH 824 THIERMAN ROAD	99212	002972	HUSKY INTERNATIONAL TRUCKS INC	I	10	10-20	IN USE	DIESEL FUE
SPOKANE	SPOKANE	S 117 FANCHER	99212	010105	VALLEY PORSCHE AUDI FERRARI VOLKSWA	1	24	<1100	IN USE A	USED OIL/W
SPOKANE	SPOKANE	SOUTH 204 FANCHER RD	99212	009355	UHAUL CENTER I-90 703-25	1	31	10-20	IN USE A	LEADED GAS
						2	31	10-20	IN USE A	UNLEADED G
						3	7	10-20	IN USE A	UNLEADED G
						4	10	2- 5	IN USE A	USED OIL/W
SPOKANE	SPOKANE	WEST 4807-9 MILE ROAD	99212	005741	CIRCLE K #1151	1-REG	16	10-20	IN USE	LEADED GAS
						2-UNL	16	10-20	IN USE	UNLEADED G
						3-PREM	16	10-20	IN USE	UNLEADED G
SPOKANE	SPOKANE	7018 EAST SPRAGUE	99212	004138	JACKPOT 005	269	18	10-20	IN USE	LEADED GAS
						363	18	5-10	IN USE	UNLEADED G
						923	18	5-10	IN USE	UNLEADED G
SPOKANE	SPOKANE	303 N. FANCHER	99212	004823	CONVOY COMPANY	1	24	10-20	IN USE A	DIESEL FUE
						2	24	10-20	PERM OUT	DIESEL FUE
						3	14	10-20	IN USE A	UNLEADED G
						4	24	<1100	PERM OUT	USED OIL/W
SPOKANE	SPOKANE	6212 EAST MAIN	99212	008316	SCAFCO CORPORATION	1	31	2- 5	PERM OUT	UNLEADED G
						2	24		PERM OUT	LEADED GAS
SPOKANE	SPOKANE	5628 EAST BOONE	99212	010780	S&H EXCAVATING DBA SPOKANE BLASTING	1	14	10-20	IN USE A	UNLEADED G
						2	14	10-20	IN USE A	UNLEADED G
						3	14	5-10	IN USE A	UNLEADED G
						4	14	5-10	IN USE A	UNLEADED G
						5	19	2- 5	IN USE A	DIESEL FUE

APPENDIX V

PHOTOGRAPHS

PHOTOGRAPHS

Photograph 1. The UST prior to excavation. The UST has been uncovered since 6 May 1992. Looking south

Photograph 2. The UST prior to excavation. The white piece of metal is covering an open hole into the UST. Looking southwest.

Photograph 3. Don Castleman of Lake Oswego, Oregon excavating the UST. Looking south-southwest.

Photograph 4. Excavating the UST. Note the broken water pipe in the lower right corner of the picture, Looking southwest.

Photograph 5. The excavated UST, looking south-southwest. Note the water in the bottom of the pit from the broken water pipe.

Photograph 6. Excavating the UST, looking northeast.

Photograph 7. Removing the UST, looking west-southwest.

Photograph 8. The liquid which spilled from the tank while it was being removed from the pit.

Photograph 9. A close-up of the liquid which spilled from the tank. Note the petroleum sheen on the water surface.

Photograph 10. Don Castleman righting the UST. From left to right Don Castleman (on the forklift); Norman Harrison, owner; Wayne Peterson, Washington DOE; and Jim Greeves, Washington DOE. Looking east.

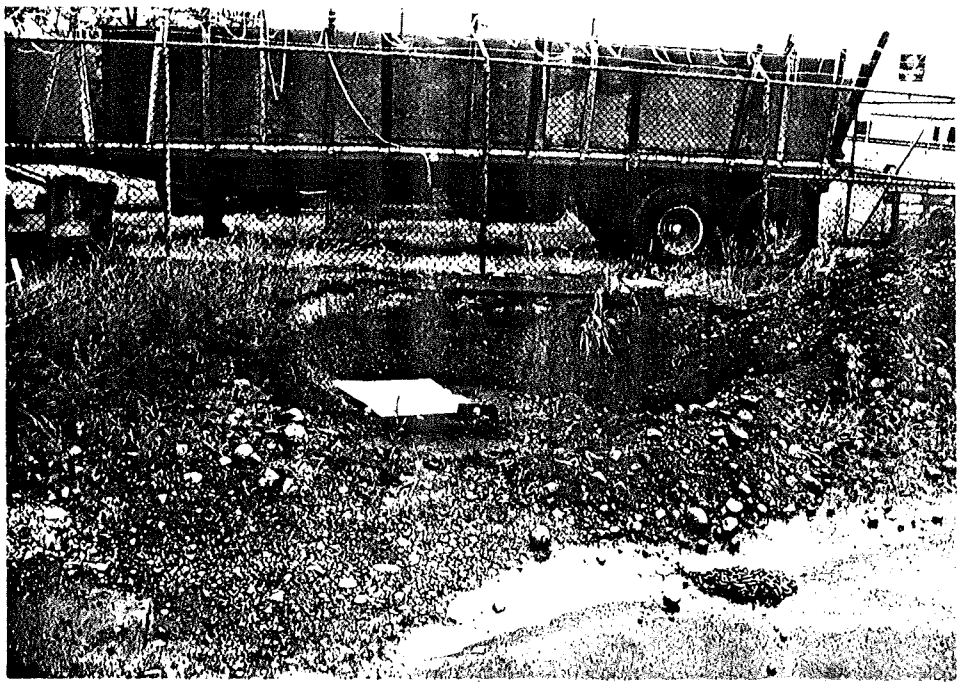
Photograph 11. The UST after it was removed from the pit. Looking south-southeast.

Photograph 12. A close-up of the UST after removal. Note the open bung-hole midway up the tank.

Photograph 13. The pit after the UST was removed. Note the discoloration of the soil directly above the shovel. Looking south-southwest.

Photograph 14. The pit after the UST was removed. Note the soil discoloration beneath the metal sheet in the center of the photograph. The discoloration along the right side of the photograph is from the liquid spilled from the UST. Looking west-southwest.

Photograph 15. The location were the barrels were stored which contained the material from the UST. Note the discoloration of the pavement from the leaking barrels.



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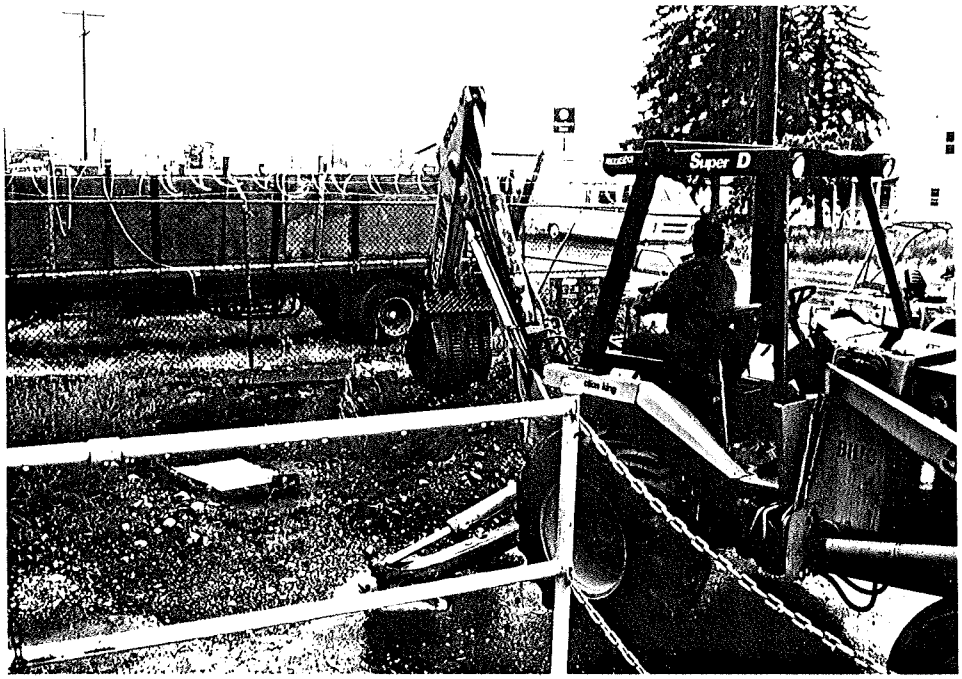

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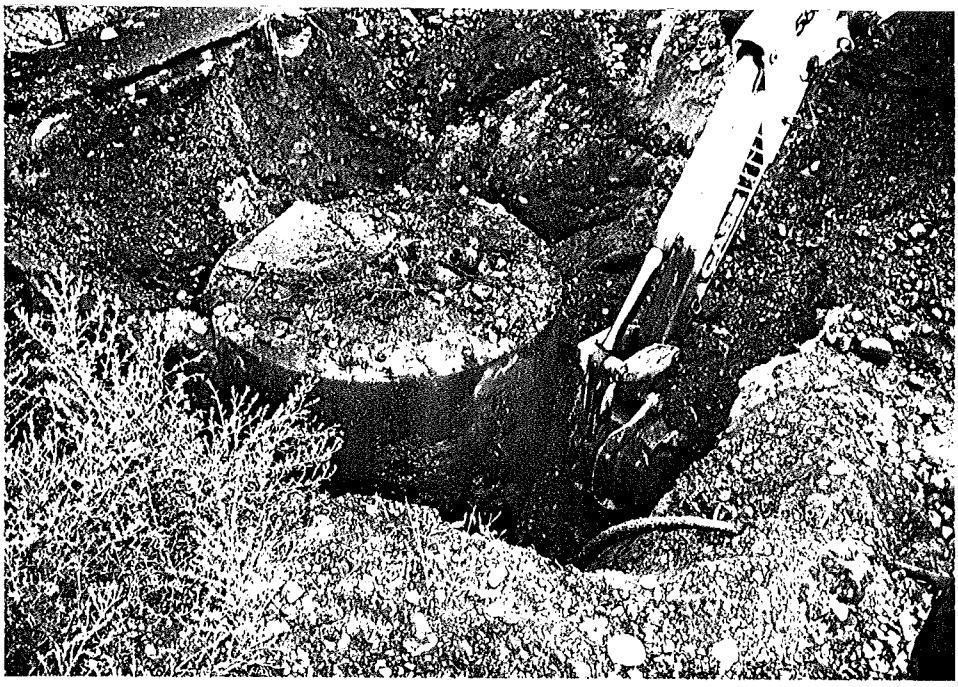

Photograph 4. Excavating the UST. Note the broken water pipe in the lower right corner of the picture, Looking southwest.

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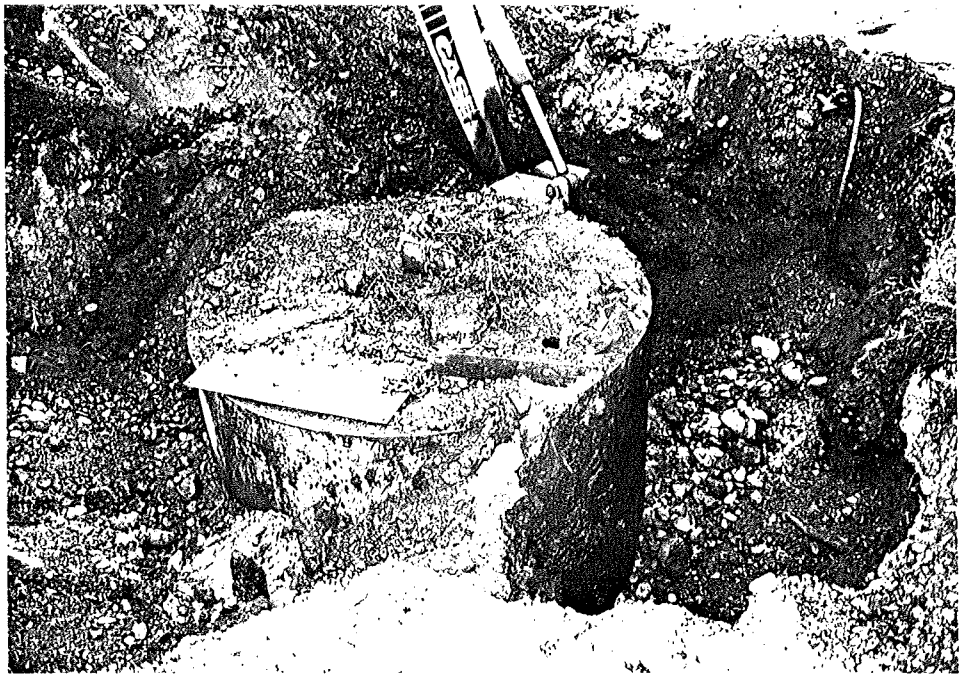
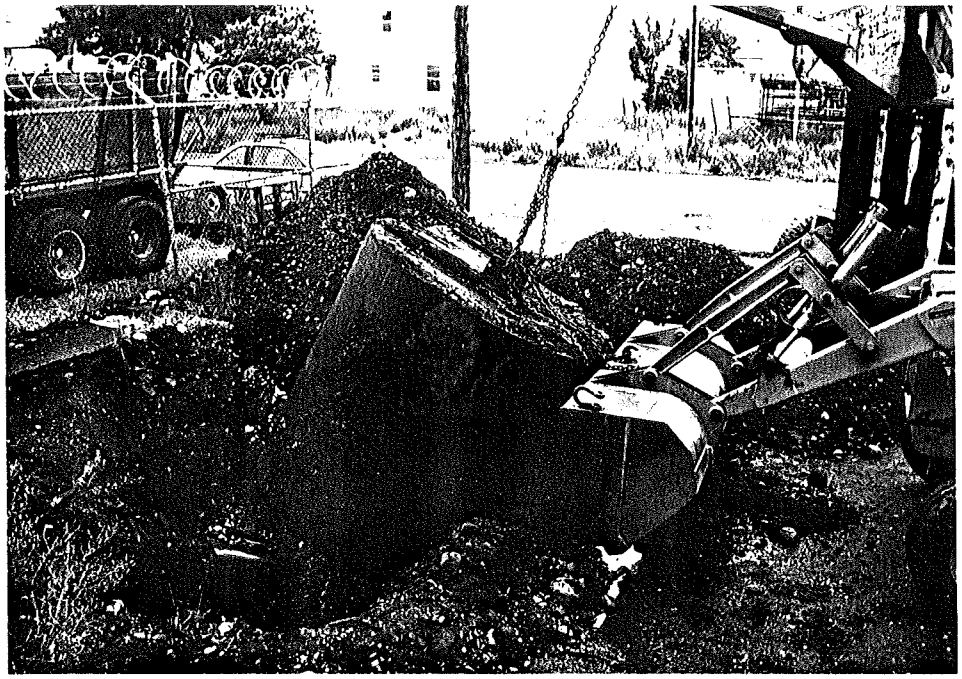


Photograph 6. Excavating the UST, looking northeast.



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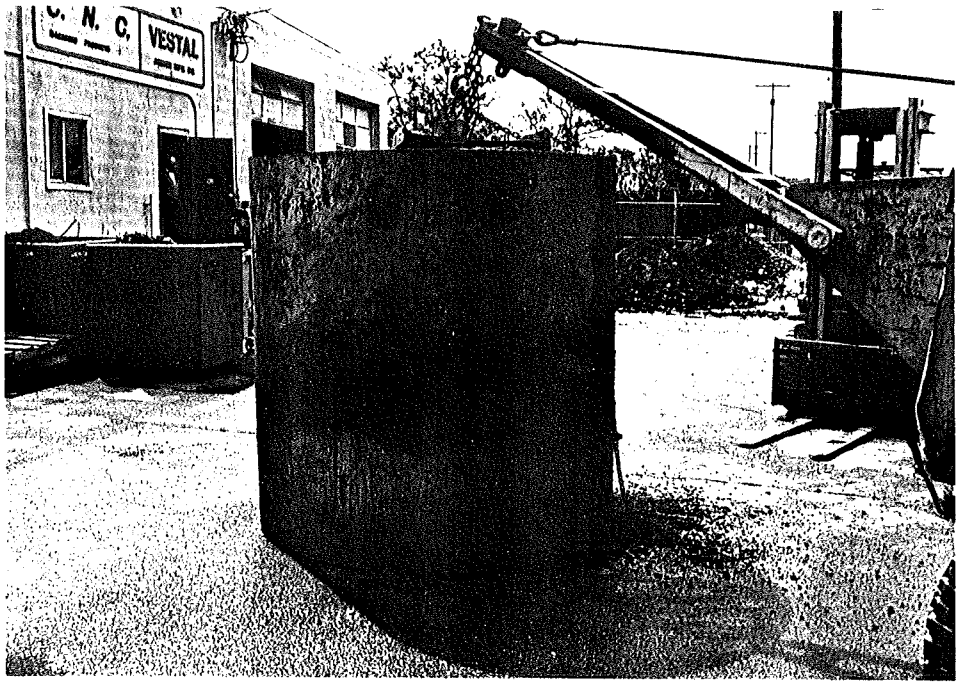

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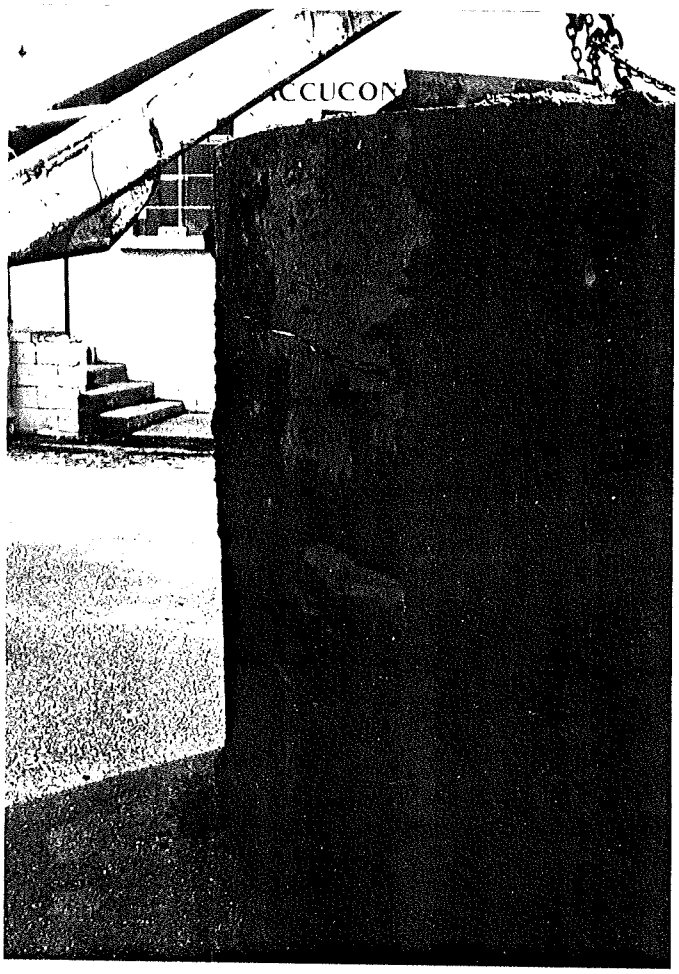

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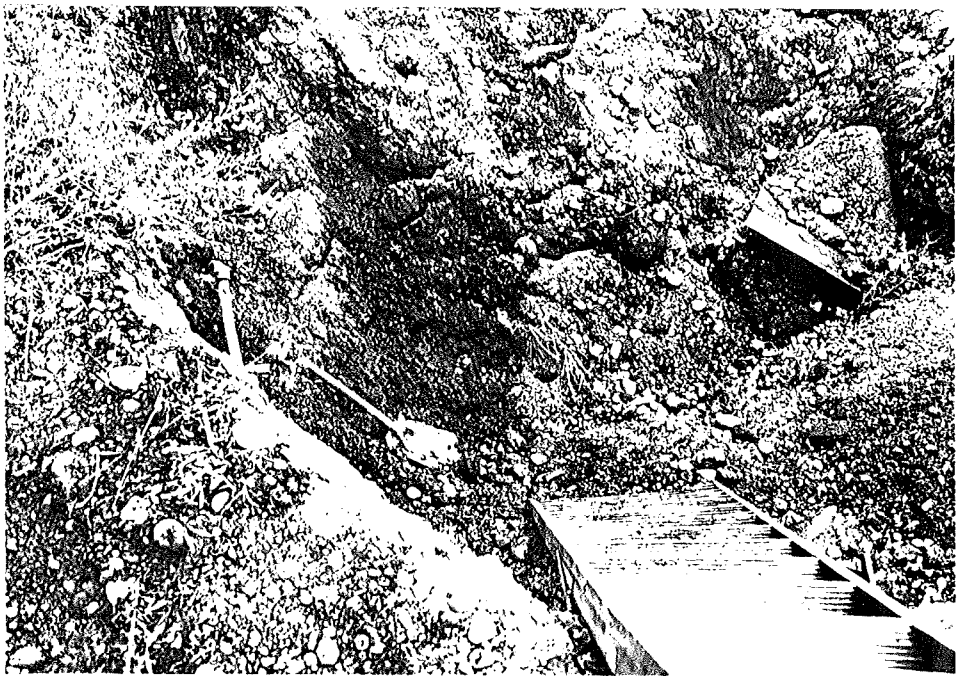

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Photograph 15. The location were the barrels were stored which contained the material from the UST. Note the discoloration of the pavement from the leaking barrels.

WORKSHEET 1
SUMMARY SCORE SHEET

Note: This document currently has no provision for sediment route scoring.

Site Name/Location (Street, City, County, Section/Township/Range).
VESTAL JOBBER MFG. CO. NW1/4 of Sec 13, Tnshp 25, Rng 43.
N. 902 DYER RD.
SPOKANE, WASH. 99212

Site Description (Include management areas, substances of concern, and quantities):
Vestal Jobbers Mfg. Co. is a custom manufacturing operation established in 1988 and is comprised of a milling, fabrication, and general machine shop. Information from Ecology files stated that an underground storage tank (UST) was discovered about July 1991 by the current property owner (Vestal). Subsequent sampling, UST decommissioning, and site assessment revealed that the UST had leaked into surrounding soils. Contaminants of diesel and chromium exceeding Model Toxics Control Act standards were confirmed in these soils.

Special Considerations (Include limitations in site file data or data which cannot be accommodated in the model, but which are important in evaluating the risk associated with the site, or any other factor(s) over-riding a decision of no further action for the site):
To date the Washington Department of Ecology (Ecology) has not received any information indicating that the contaminated soils have been remediated to acceptable levels. A phone conversation with Mr. Rick Vestal on December 7, 1995 revealed that the area of tank removal was lined with plastic and filled with soil. Contaminants were discovered during UST decommissioning and are located in subsurface soils. Site hazard assessment concludes that the contaminants do not present a hazard by airborne or surface water pathways.

ROUTE SCORES:

Surface Water/Human Health: _NA__ Surface Water/Environ.: _NA____

Air/Human Health: _NA____ Air/Environmental: _NA____

Ground Water/Human Health: _49.1__

OVERALL RANK: __3____

Rev. 3/10/93

WORKSHEET 2
ROUTE DOCUMENTATION

1. SURFACE WATER ROUTE **Not Applicable.**

List those substances to be considered for scoring: Source: 1

Explain basis for choice of substance(s) to be used in scoring.

List those management units to be considered for scoring: Source:

Explain basis for choice of unit to be used in scoring. Source:

2. AIR ROUTE **Not Applicable.**

List those substances to be considered for scoring: Source: 1

Explain basis for choice of substance(s) to be used in scoring.

List those management units to be considered for scoring: Source:

Explain basis for choice of unit to be used in scoring.

WORKSHEET 2 (CONTINUED)
ROUTE DOCUMENTATION

3. GROUND WATER ROUTE

List those substances to be considered for scoring: Source: 1
TPH-DIESEL
CHROMIUM

Explain basis for choice of substance(s) to be used in scoring.
Contaminants exceed MTCA standard in soil.
TPH-Diesel levels were reported up to 21,800 ppm exceeding the 200 ppm MTCA standard.
Chromium levels were reported up to 210 ppm exceeding the 100 ppm MTCA standard.

List those management units to be considered for scoring: Source: 1
Contaminated subsurface soil/ ground water only.

Explain basis for choice of unit to be used in scoring.
Contaminants were discovered during UST decommissioning and are located in subsurface soils. Site hazard assessment concludes that the contaminants do not present a hazard by airborne or surface water pathways.

WORKSHEET 6
GROUND WATER ROUTE

1.0 SUBSTANCE CHARACTERISTICS

1.1 Human Toxicity

Substance	Drinking Water Standard (ug/l)	Val.	Acute Toxicity (mg/kg-bw)	Val.	Chronic Toxicity (mg/kg/day)	Val.	Carcino-genicity WOE	PF*	Val.
1. TPH-DIESEL	20	6	490	5	0.004	3	**	**	**
2. Chromium	100	6	**	**	1.0	1	**	**	**
3.									
4.									
5.									
6.									

*Potency Factor

Source: 1
Highest Value: 6
+2 Bonus Points? 2
Final Toxicity Value: 8

1.2 Mobility (Use numbers to refer to above listed substances)
Cations/Anions: 2. = >1 K = 1 Source: 2 **Value:** 1

OR
Solubility(mg/l): 1. = 1sol.

1.3 Substance Quantity Source: 1 & 3 **Value:** 5
Explain basis: **Est. 61 cu/yd;** Total quantity of affected soil is unknown extent of contamination is not known Estimations of volume derived from site assessment report and table GW-7 WARM Scoring Manual.

2.0 MIGRATION POTENTIAL

2.1 Containment Source: 3 **Value:** 10
Explain basis: Spills Discharges and Contaminated soils

2.2 Net Precipitation: 7.2 inches Source: 4 **Value:** 1

2.3 Subsurface Hydraulic Conductivity: > 10-5 to 10-3 Source: 5 **Value:** 3

2.4 Vertical Depth to Ground Water: 42 feet Source: 1 & 6 **Value:** 6

WORKSHEET 6 (CONTINUED)
GROUND WATER ROUTE

3.0 TARGETS

3.1 Ground Water Usage: FED DESIGNATED AQUIFER Source: 7 **Value:** 10
(Max.=10)

3.2 Distance to Nearest Drinking Water Well: <600 ft Source: 1 & 6 **Value:** 5
(Max.=5)

3.3 Population Served within 2 Miles: √pop.=√40,250 = 200 Source: 6 & 8 **Value:** 100
(Max.=100)

3.4 Area Irrigated by (Groundwater) Wells within 2 miles: 0.75√no.acres= 4900 Source: 9 **Value:** 50
0.75√ =0.75 (70)= 52
(Max.=50)

4.0 RELEASE

Explain basis for scoring a release to ground water: NONE Source: 1 **Value:** 0
(Max.=5)

SOURCES USED IN SCORING

1. SITE ASSESSMENT REPORT VESTAL JOBBER MFG CO. BLUE RIDGE ASSOCIATES, INC. AUGUST 17, 1993
2. TOXICOLOGY DATABASE WARM
3. WARM SCORING MANUAL
4. WASHINGTON CLIMATE, SPOKANE CO. WSU DEPT. OF AGRICULTURE
5. SOIL SURVEY OF SPOKANE CO. WASHINGTON, USDA SOIL CONSERVATION SVC.
6. WASHINGTON DEPT. OF ECOLOGY, WELL LOGS.
7. AQUIFER SENSITIVE AREA OVERLAY ZONE MAP, SPOKANE CO. WASHINGTON
8. WASHINGTON DEPT. OF HEALTH DRINKING WATER INFORMATION NETWORK
9. WRIS WASHINGTON DEPARTMENT OF ECOLOGY


THIS DOOR BLOCKED
HARRISON FOOD PRODUCTS INC


CASE

Vestal Jobbers
Spokane, WA.

Vestal Jobbers
Spokane, WA

Vestal Jobbers
Spokane

Vestal Jobbers
Spokane, WA

Vestal Jobbers
Spokane WA.
Steady stream of
Waste flowing out
of hole in tank

Vestal Jobbers
Spokane, WA.

Vestal Jobber
Spokane

Vestal Jobbers
Spokane, WA.

Vestal Jobbers
Spokane, WA.


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C. N. C.
VESTAL
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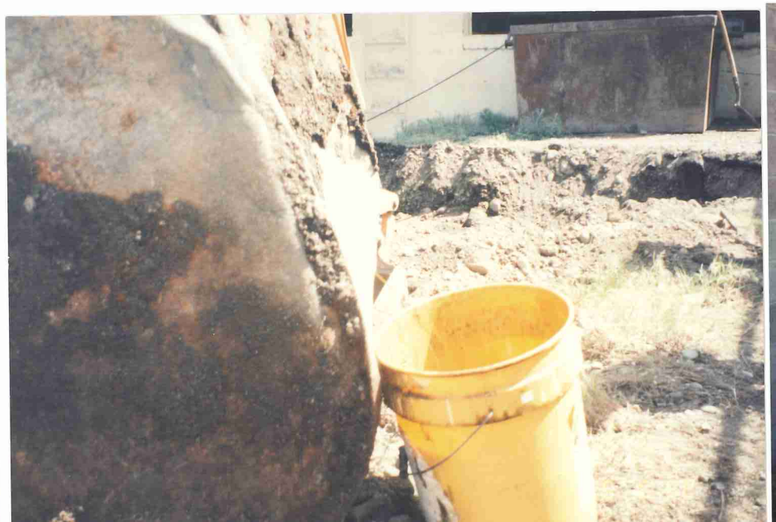


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Kestal Jobbers
Spokane, WA.

Kestal Jobber
Spokane

Kestal Jobber
Spokane

Kestal Jobbers
Spokane, WA.
Steady stream of
waste flowing out
of hole in tank.

Kestal Jobbers
Spokane, WA.

Kestal Jobbers
Spokane, WA.

Kestal Jobbers
Spokane, WA.

Kestal Jobbers
Spokane, WA.
steady stream of waste
product flowing out
of hole in tank

Kestal Jobbers
Spokane, WA.


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Vestal Jobbers
Spokane, WA.

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Spokane, WA.

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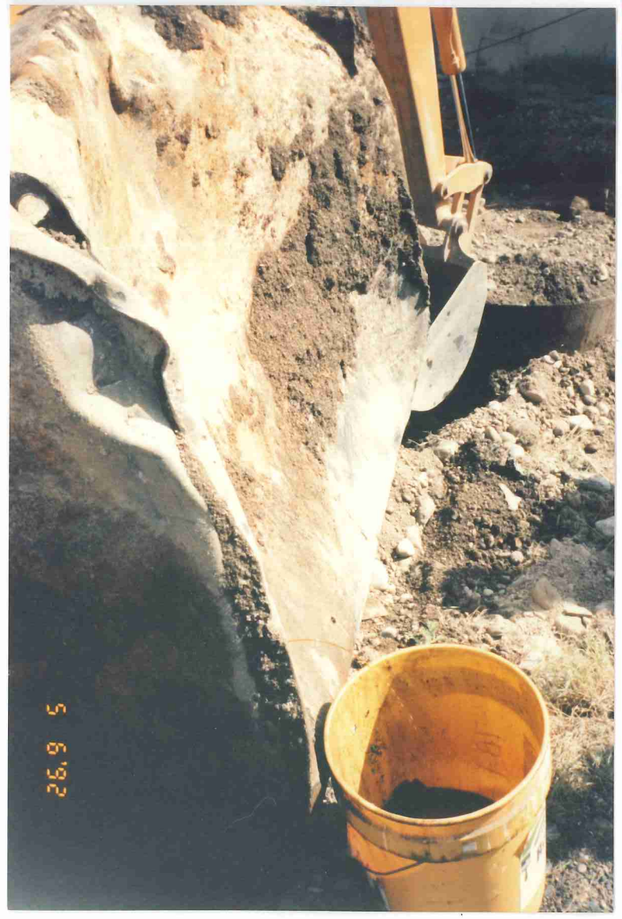
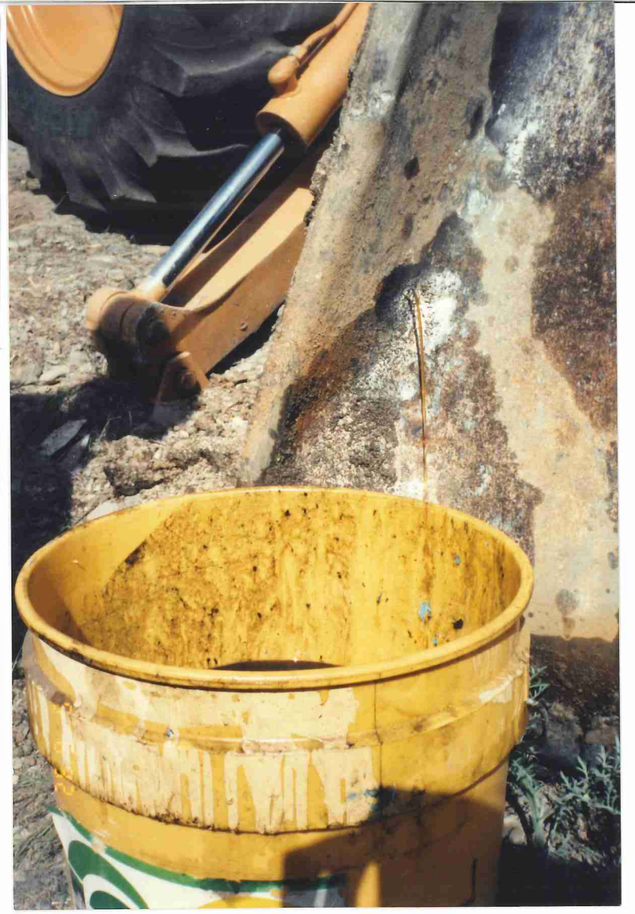
Spokane
Back of site





Vestal Jobber
Spokane

Vestal Jobber
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Spokane

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Spokane

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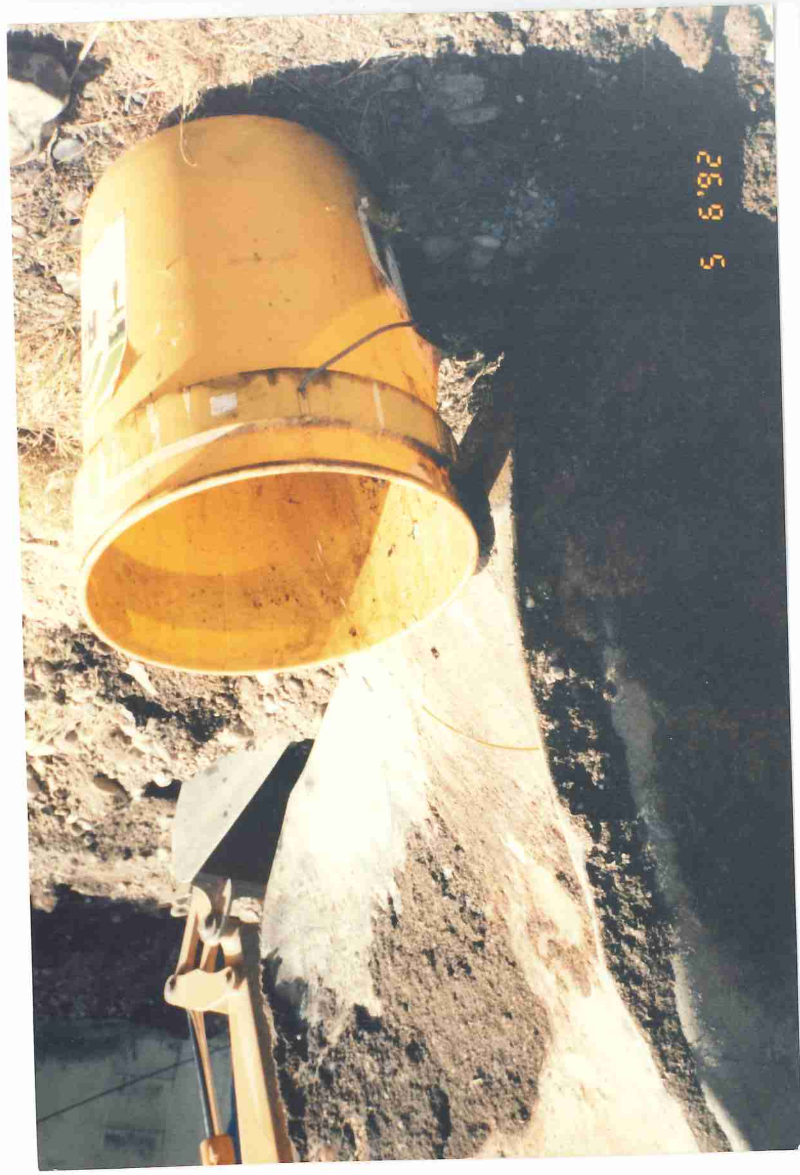
Vestal Jobber
Spokane

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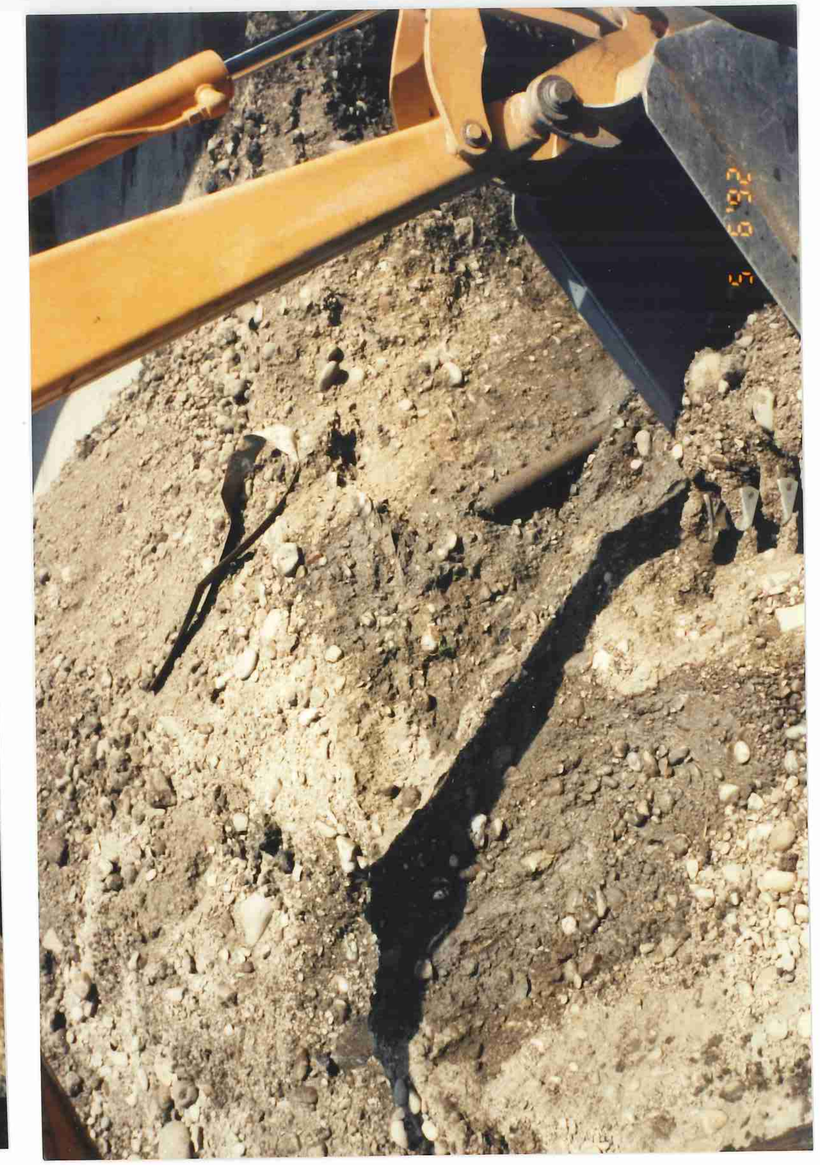
CASE




Norman F. Harrison
HARRISON
FOOD PRODUCTS INC.
5 6'92

MAY 1992 [illegible] 5023 [illegible]12

Vestal Jobber
N902 Argonne Rd
Spokane, WA

MAY 1992 E04J131 5023 [illegible]12

Vestal Jobber
Spokane

MAY 1992 E02J131 5023 [illegible]12

Vestal Jobber
Spokane

Vestal Jobber
Spokane

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Spokane

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Vestal Jobber
Spokane

MAY 1992 [illegible] 12


Norman F. Harrison
McMINNVILLE, OR.
G.V.W. 20,000
FRUEHAUF
HARRISON
FOOD PRODUCTS INC.
LAKE OSWEGO, OREGON

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Vestal Jobber
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