

APR 10 1992

**A Groundwater Contamination Investigation of the  
Debby, Inc. Enterprises Facility**

**Poultney, Vermont**

---

**April 1992**

*Prepared for:*

**DEBBY ENTERPRISES, INC.**  
*22 Crocker Street  
Rockville Center, New York 11570*

*Prepared by:*

**THE JOHNSON COMPANY, INC**  
*5 State Street  
Montpelier, Vermont 05602  
(802) 229-4600*

THE JOHNSON COMPANY, INC.

**Environmental Sciences and Engineering**

April 9, 1992

David Shepard  
Sites Management Section  
103 South Main Street  
Waterbury, Vermont 05671-0404

Re: Groundwater Contamination Investigation at the Debby Enterprises, Inc. Facility, Poultney,  
Vermont  
JCO No. 1-1830-1

Dear David:

Please find the attached report concerning our investigation into the occurrence of groundwater contamination at the above referenced facility. As you will observe, the expansion of the monitoring network has shown that tetrachloroethylene concentrations, with which we have been concerned, are lower than originally reported.

If you should have any questions concerning the report, please do not hesitate to call.

We will contact you in the next week to discuss the investigation, and The Johnson Company's recommendations.

Best wishes,

THE JOHNSON COMPANY, INC.

By:   
Michael H. Pottinger  
Senior Scientist

cc: Mr. Arthur Borden, Esq - Rosenman & Colin  
Mr. Ralph Kaufman - Debby Enterprises

I:\PROJECTS\1-1830-1\REPORT.RPT

## EXECUTIVE SUMMARY

The Johnson Company, Inc. performed an investigation into groundwater contamination at a property located in Poultney, Vermont and owned by Debby Enterprises, Inc. (Debby) of Rockville, New York.

The Debby property is located immediately south of the Staco-Chase property, which in or around 1984, became the subject of an investigation due to concern of mercury releases. The Staco-Chase facility manufactured thermometers.

In July 1991, The Johnson Company supervised the installation of four temporary monitoring wells located on the northern edge of the Debby property, near the property line bordering Staco-Chase. All four wells were sampled and the samples were analyzed for mercury. All mercury concentrations were below the detection limit of 0.0005 parts per million (ppm). One well was also sampled for volatile organic compounds (VOC) analysis because of its proximity to an underground storage tank (UST) located on the Debby property. This sample contained 1 parts per billion (ppb) toluene and 12 ppb tetrachloroethylene. In August 1991 The Johnson Company supervised the installation of four permanent monitoring wells. All four of these wells contained tetrachloroethylene in concentrations ranging from 1 to 33 ppb. It appeared that one of these wells was up hydraulic gradient of the UST.

On August 22, 1991 the UST was removed under the supervision of The Johnson Company. The UST was nearly full with approximately 500 gallons of fluid. Upon analysis, the fluid was found to contain 85 ppb xylene. A limited amount of soil contamination existed near the tank. The majority of this soil was poly-encapsulated on site.

In December 1991, four additional monitoring wells were installed under Johnson Company supervision. These wells, along with the previously installed wells, were sampled and analyzed for VOCs. The results indicated that only two of the original permanent wells contained tetrachloroethylene. The concentrations in these two wells were lower than found previously. The results also indicated that the tetrachloroethylene had not migrated beyond the property line in detectable concentrations. Ten ppb methylene chloride was detected in a sample collected from a well located on Vermont Parks land west of the Debby property. The source of the contamination has not been identified, but methylene chloride has never been detected on the Debby property.

The results of this investigation show that the tetrachloroethylene contamination is very limited in magnitude and extent, and has improved. This improvement may be related to the removal of the UST and poly-encapsulation of contaminated soil. However, a clear linkage between the UST and contaminated groundwater has not been made, and the source of contamination is not certain.

The Johnson Company's primary recommendation is that a monitoring program be initiated to confirm the decreasing concentrations of tetrachloroethylene over time, until concentrations decrease to below the enforcement standard or detection limits.

## TABLE OF CONTENTS

COVER LETTER .....	i
EXECUTIVE SUMMARY .....	ii
LIST OF FIGURES .....	iv
LIST OF TABLES .....	iv
LIST OF PLATES .....	iv
LIST OF APPENDICES .....	iv
1.0 INTRODUCTION .....	1
1.1 OBJECTIVE .....	1
1.2 BACKGROUND .....	1
2.0 INVESTIGATION .....	4
2.1 SITE HISTORY .....	4
2.1.1 <u>Objective</u> .....	4
2.1.2 <u>Methodology</u> .....	4
2.1.3 <u>Results</u> .....	6
2.2 MONITORING WELL INSTALLATION .....	8
2.2.1 <u>Objective</u> .....	8
2.2.2 <u>Methodology</u> .....	9
2.2.3 <u>Results</u> .....	11
2.3 SAMPLING .....	12
2.3.1 <u>Objective</u> .....	12
2.3.2 <u>Methodology</u> .....	12
2.3.3 <u>Results</u> .....	13
2.4 RECEPTOR SURVEY .....	14
2.4.1. <u>Objective</u> .....	14
2.4.2. <u>Methods</u> .....	14
2.4.3. <u>Results</u> .....	15
3.0 DISCUSSION .....	15
3.1 GROUNDWATER FLOW .....	15
3.2 CONTAMINANT DISTRIBUTION .....	17
3.3 CONTAMINANT SOURCE .....	17
4.0 RECOMMENDATIONS .....	18

## LIST OF FIGURES

- Figure 1. Site Location Map  
Figure 2. Locations of Four Temporary Monitoring Wells Installed in July 1991 and Approximate Location of Underground Storage Tank  
Figure 3. Four Permanent Monitoring Wells (MW-101, MW-102, MW-103 and MW-104) Locations  
Figure 4. Four Permanent Monitoring Wells (MW-201, MW-202, MW-203 and MW-204) Locations  
Figure 5. Receptor Map

## LIST OF TABLES

- Table 1. Groundwater Sample Collection Field Data  
Table 2. Summary of Groundwater Analytical Results

## LIST OF PLATES

- Plate 1. Water Table Configuration

## LIST OF APPENDICES

- Appendix A. September 25, 1991 Letter from Michael Pottinger of The Johnson Company to Mr. Robert Finucane of the Vermont Department of Environmental Conservation (DEC)  
Appendix B. October 29, 1991 Letter from Mr. David Shepard of the Vermont DEC to Michael Pottinger of The Johnson Company  
Appendix C. November 6, 1991 Work Plan Submitted by Michael Pottinger of The Johnson Company to Mr. David Shepard of the Vermont DEC  
Appendix D. November 27, 1991 Approval of Work Plan by Mr. David Shepard of the Vermont DEC  
Appendix E. List of Hazardous Materials used by Jaymar Specialty, Inc., Provided by the Poultney Fire Chief  
Appendix F. Correspondence Concerning the 1988 DEC Inspection of the Jaymar Specialty, Inc. Facility  
Appendix G. Hazardous Waste Generator Tax Assessment of Jaymar Specialty, Inc.  
Appendix H. Sanborn Fire Insurance Maps  
Appendix I. Monitoring Well Logs  
Appendix J. Groundwater Sampling Forms  
Appendix K. Laboratory Report Sheets  
Appendix L. Vermont Department of Health Analytical Information Concerning the Poultney Municipal Water Supply

## 1.0 INTRODUCTION

### 1.1 OBJECTIVE

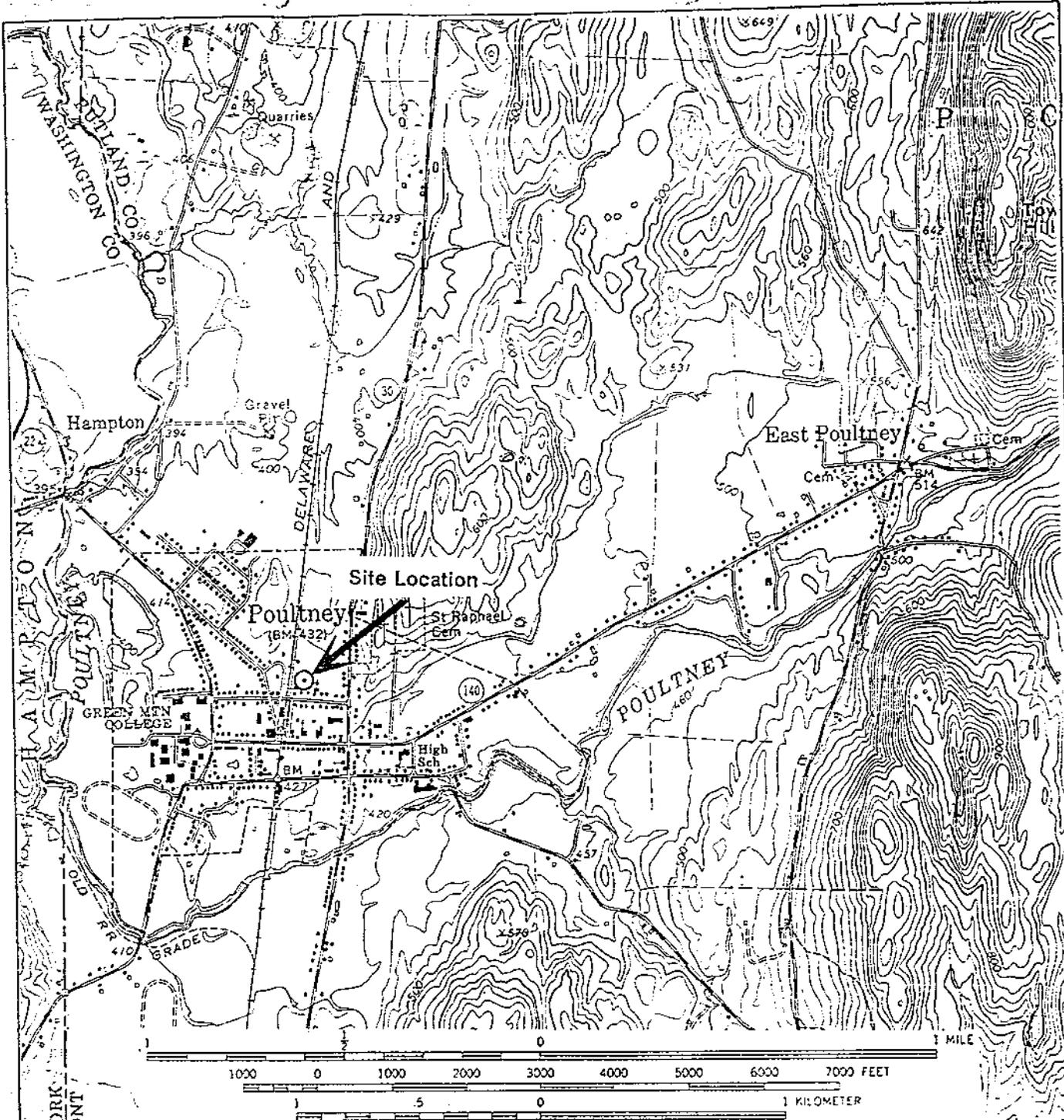
This document presents The Johnson Company's investigation conducted at the Debby Enterprises, Inc. (Debby) property located off of Church Street in Poultney, Vermont (Figure 1). The primary objective of this investigation was to better characterize the source and extent of groundwater contamination that had been discovered at the site.

### 1.2 BACKGROUND

In or around 1984, the Staco-Chase property, which is located immediately north of the Debby property, was the subject of investigation due to concern of possible mercury releases into the environment. Investigations coordinated by The Vermont Department of Environmental Conservation confirmed the presence of elevated levels of mercury in soil on the Staco-Chase site. Some of the highest levels found were in soil located south of the building on the Staco-Chase site. Soil in this area was excavated and removed, as part of a remediation plan designed and executed under DEC supervision.

In 1990, The Johnson Company performed an investigation into possible mercury contamination on the Debby site (then known as Jaymar Specialty, Inc.). The primary purpose of that investigation was to examine the soils on the site and determine if mercury, originating from the Staco-Chase facility, had contaminated soil on the Jaymar property. The Johnson Company's investigation included the collection of multiple soil samples from the northern edge of the Jaymar property, and submitting them for mercury analysis. The results showed that although some detectable concentrations of mercury existed in the soil, all levels were below 2.0 milligrams per kilograms (mg/kg), which is below a soil concentration limit of 4.0 mg/kg informally established by the DEC. Groundwater was not sampled as part of the 1990 investigation.

In the summer of 1991, Debby requested that The Johnson Company investigate the possibility of mercury contamination of groundwater on their property. As part of this investigation, four temporary monitoring wells were installed on the Debby site (Figure 2). Samples were collected and submitted for mercury analysis. In addition, one sample (collected from MW3) was also submitted for volatile organic compound (VOC) analysis using EPA method 601/602. This sample was collected because of the discovery of an underground storage tank (UST) on site plans located within the Debby building. These plans indicated that this tank was for "spill containment", and was only connected to two floor drains located in the paint room area of the building (see Figure 2). The results of the analyses of these samples indicated that no detectable concentrations of mercury existed in groundwater at the site. However, MW3 contained 1 part per billion (ppb) toluene and 12 ppb tetrachloroethylene.



1000 0 1000 2000 3000 4000 5000 6000 7000 FEET  
 1 5 0 1 KILOMETER

CONTOUR INTERVAL 20 FEET  
 DATUM IS MEAN SEA LEVEL  
 Mapped, edited, and published by the Geological Survey

POULTNEY, VT.-N. Y.

N4330—W7307.5/7.5

1964  
 PHOTOREVISED 1972  
 AMS 6371 II SW—SERIES V813

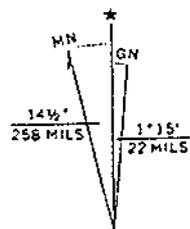


Figure 1 - Location Map

THE JOHNSON COMPANY, INC.  
 Environmental Sciences and Engineering  
 MONTPELIER, VERMONT

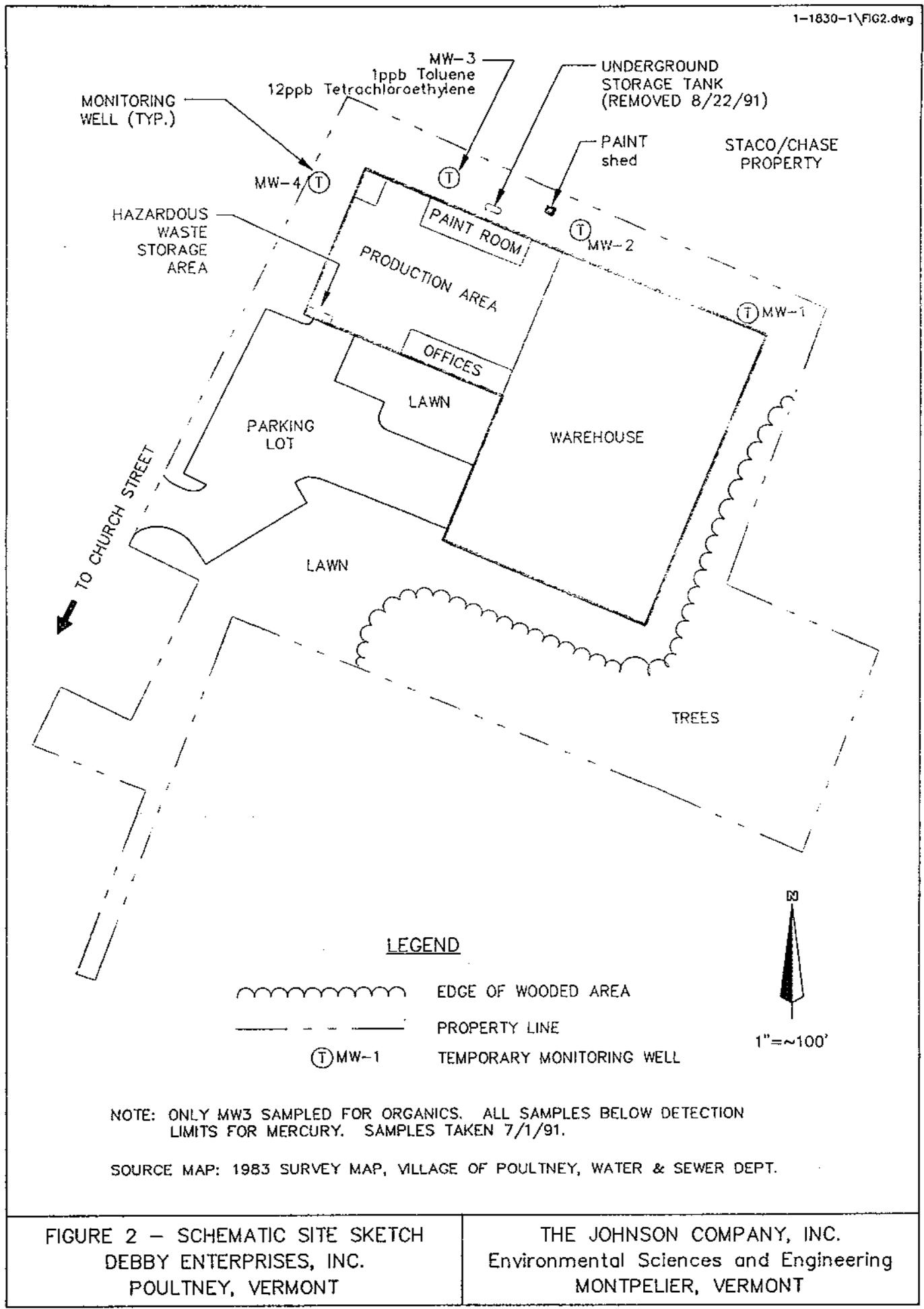


FIGURE 2 - SCHEMATIC SITE SKETCH  
DEBBY ENTERPRISES, INC.  
POULTNEY, VERMONT

THE JOHNSON COMPANY, INC.  
Environmental Sciences and Engineering  
MONTPELIER, VERMONT

To further investigate the contamination, four permanent monitoring wells were installed in August 1991 and sampled. The results of these analyses indicated the presence of tetrachloroethylene in all four wells, ranging in concentrations from 1 to 33 ppb (Figure 3). Based on groundwater elevations, one of these wells (MW101), was located up gradient of the UST.

This UST was removed on August 22, 1991 by Jet Line, Inc. under the observation of The Johnson Company. The 500 gallon tank was full of a liquid, which was shown to contain 85 ppb xylene. The liquid was analyzed at Jet Line Laboratory. Jet Line pumped the liquid in 55 gallon drums and later transported the material off site. Some contaminated soil, as determined by a photoionization detector (PID), was poly-encapsulated on-site. For a more detailed discussion of the tank removal, the reader is referred to the September 25, 1991 letter from Michael Pottinger of The Johnson Company to Mr. Robert Finucane of the Sites Management Section (SMS) of the DEC (included in Appendix A of this document).

The September 25, 1991 letter also contained The Johnson Company's recommendations for additional investigation. In response to this letter, the SMS assigned this project to Mr. David Shepard. Mr. Shepard requested that a formal work plan for additional work be submitted for his review (see October 29, 1991 letter from D. Shepard of SMS to M. Pottinger of The Johnson Company in Appendix B).

A Work Plan was developed by The Johnson Company and submitted in a November 6, 1991 letter to Mr. Shepard (included in Appendix C). The Work Plan was approved by the SMS in a letter dated November 27, 1991 from Mr. Shepard (included in Appendix D). The investigation described below is a result of the execution of that work plan.

## 2.0 INVESTIGATION

### 2.1 SITE HISTORY

#### 2.1.1 Objective

The purpose of reviewing available information concerning site history was to help identify possible past and/or present sources of the contamination detected in groundwater.

#### 2.1.2 Methodology

For information concerning recent activities, Mr. Ralph Kaufman, President of Debby Enterprises, Inc., and Ms. Debby McMurry, a former assistant plant manager at Jaymar Specialty, Inc. were interviewed. The regulatory status of the site was determined through conversations with appropriate state agencies. For historic information, documents at the Poultney Town Offices and Sanborn Fire Insurance Maps were reviewed.

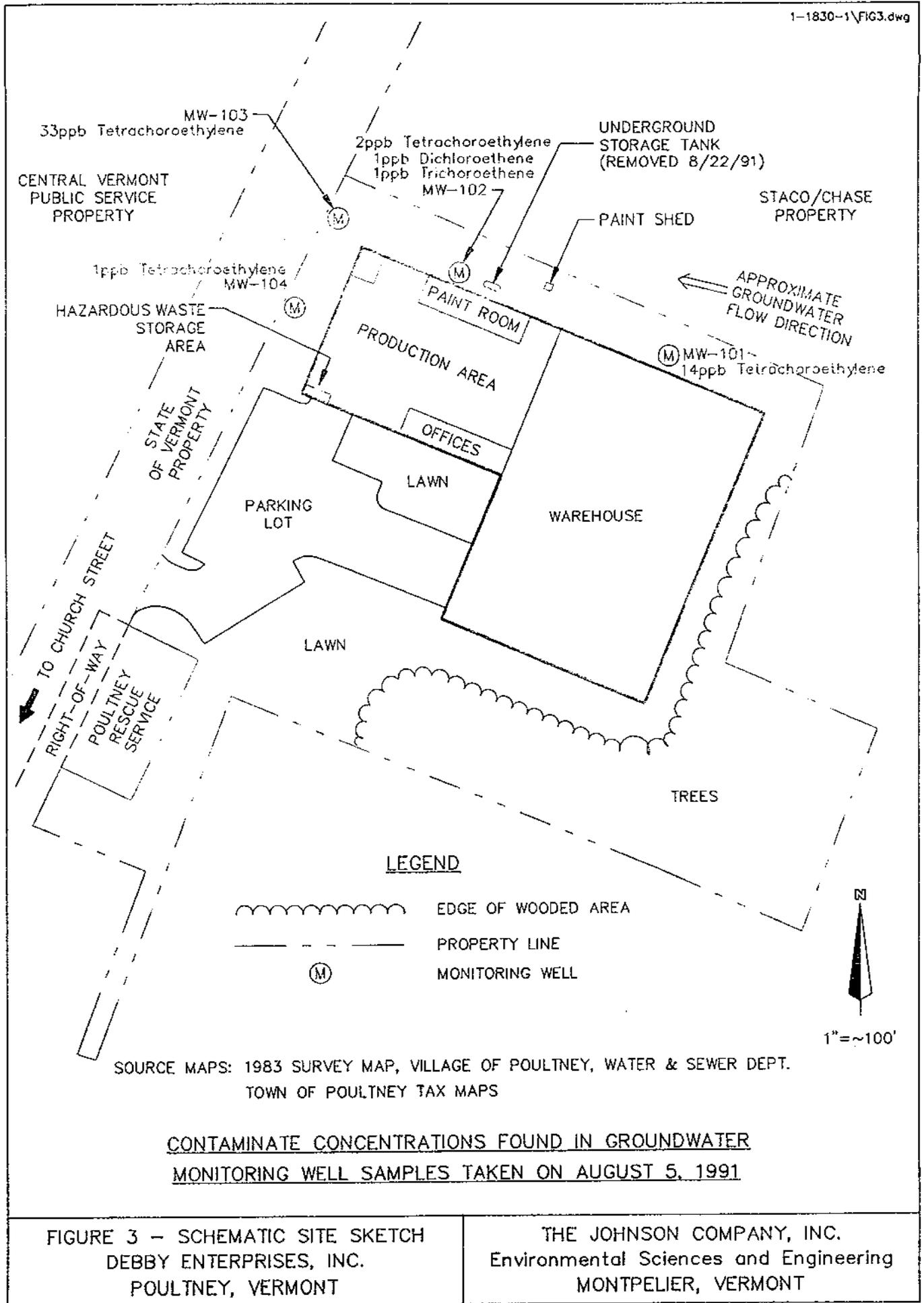


FIGURE 3 - SCHEMATIC SITE SKETCH  
DEBBY ENTERPRISES, INC.  
POULTNEY, VERMONT

THE JOHNSON COMPANY, INC.  
Environmental Sciences and Engineering  
MONTPELIER, VERMONT

### 2.1.3 Results

Jaymar Specialty, Inc., the precursor of Debby Enterprises, Inc., manufactured toy pianos at the site from 1983 to 1990. Debby McMurry, the former assistant plant manager for Jaymar, described the production process to us. The bodies of the pianos were assembled from pre-cut wooden pieces that were spray-painted on-site, and the sounding mechanisms were assembled from metal rods and wires. Jaymar ceased operations at the Poultney site in 1990.

Hazardous chemicals used included paints, paint thinners, and oil used to coat the sounding bars. Larry Williams, the Poultney fire chief, provided The Johnson Company with a list of hazardous chemicals that Jaymar used, and a copy of the list is included in Appendix E. Chemicals on the list include lacquers containing xylene and toluene, a stain containing methanol, and a solute containing methylene and aliphatic hydrocarbon. Jaymar filed the list with the fire department in accordance with Vermont Community Right-to-Know laws.

Ms. McMurry said there were two small fires at the plant about five years ago, caused by mixing two paints that reacted with each other. Larry Williams also said he knew of the fires, but neither he nor Ms. McMurry knew exactly what the chemicals were that reacted.

Paints and solvents were stored in a paint building located behind the main building (Figure 3). The paints were mixed with solvents for application. All painting was done in three paint booths located in the paint room at the back of the building (Figure 2). Each booth was ventilated to the outside of the building. The air in the booth was forced out through filters in the back wall of the booth, and air-borne paint was caught by the filters. The used filters were stored in the hazardous waste storage area.

In August 1988, a representative of the Vermont Agency of Natural Resources (now known as the Vermont Department of Environmental Conservation) conducted an inspection of the Jaymar facility. During that inspection, violations of hazardous waste management regulation were observed. These violations generally concerned hazardous material storage and policy, rather than observations of actual releases of hazardous material. In October 1988 Jaymar management formally responded to the DEC concerning corrections that were made. Correspondence concerning this issue is included in Appendix F.

There are two doorways between the paint room and the production area, and one door leading from the paint room to the outside. Floor drains extend the entire width of each of the two interior doorways; they were designed to catch any paint that was spilled in the paint room. Ms. McMurry said

that she knew of no paint spills, and that no more than two gallons of paint at a time were allowed to be used at each paint booth. The floor drains lead to a spill tank that was buried outside, to the northwest of the back door (Figure 3).

The metal sounding bars for the pianos were cut and filed at the back of the production area. Filings from the bars were considered a hazardous waste because they were coated with used oil from the bars; the filings, therefore, were stored in the hazardous waste storage area.

The hazardous waste storage area was located in the southwest corner of the production area (Figure 3). It was an area approximately 5 feet by 15 feet, marked with a yellow line on the floor and a sign hanging from the ceiling. Hazardous waste was removed by North East Solvents Reclamation Corporation, a Massachusetts company that has since been acquired by GSX Northeast Services, Incorporated. Invoices from North East Solvents show that hazardous chemicals from Jaymar included flammable liquids and solids, oil sludge, and steel filings. In addition, a Hazardous Waste Generator Tax Assessment from the Vermont Department of Environmental Conservation (DEC) shows hazardous waste including stain, toluene, de-greasing solvent, steel filings, Speedi-Dri oil, and a compound called MEOH, which may be methanol. Copies of the tax assessment and the North East Solvent manifests are included in Appendix G.

Jaymar Specialty acquired the property in question from the Poultney Development Corporation in 1983, under the name of Fair Haven Specialty. Debbie McMurry said that prior to 1983, the land was vacant and wooded.

According to the deeds at the Poultney Town Offices, the Poultney Development Corporation acquired part of the property from H. and E. Wescott in 1966 (book 56, pages 139-140), and the remainder from A. and E. Hadeka in 1967 (book 56, page 372). No commercial owners are listed in the deeds for the Wescott portion since at least 1920, but the Borden Condensed Milk Company owned the Hadeka portion from 1905 - 1951. The 1909, 1922, and 1929 editions of the Sanborn Fire Insurance Maps show Borden Milk Bottling Works occupying the site (Appendix H). Borden sold the property to Staso Milling in 1951, and Staso (which became Central Commercial Company in 1957) sold the property to the Hadekas in 1960. We are not aware of the activities that occurred at Staso Milling.

Ann Wright of the Vermont Department of Environmental Conservation (DEC) said that neither Jaymar Specialty nor Fair Haven Specialty are listed on the DEC's Hazardous Sites List, Spills List, or

Underground Storage Tank List. Neither property is on the U.S. Environmental Protection Agency CERCLIS, (Comprehensive Environmental Response Compensation and Liability Information System) nor in the Resource Conservation and Recovery Act (RCRA) files.

Based on the review of the site history, there is no obvious source of the contaminants detected. The most likely source appears to be the UST. However, as stated previously, contaminants have been detected in wells that appear to be up hydraulic gradient of the UST, and the compounds found in groundwater do not match those found in the UST.

## 2.2 MONITORING WELL INSTALLATION

### 2.2.1 Objective

As stated previously, groundwater samples collected from all of the permanent monitoring wells contained contamination. It was therefore impossible to determine the full extent of contamination at the site. Four additional monitoring wells were installed and sampled to provide additional information about the distribution of contamination, and to help identify possible sources (see Figure 4). The four wells and the rationale for their locations are as follows:

- |        |   |
|--------|---|
| MW-201 | <u>Northeast corner of Debbv Enterprise property</u><br>This well is designed to determine the eastern extent of the contaminant plume and to indicate if contamination is originating off site.                              |
| MW-202 | <u>South of the former Jaymar building</u><br>This well is designed to indicate the southern extent of the contaminant plume and to provide critical water table elevation data for groundwater flow direction determination. |
| MW-203 | <u>West of MW-103 and MW-104, on State property</u><br>This well is designed to better define the western extent of the contaminant plume.  |
| MW-204 | <u>West of Staco-Chase property line on State property</u><br>This well may indicate whether contamination is originating at the Staco-Chase property and will provide important head data.                                   |

We had originally hoped that we would be able to install a well on the Staco-Chase property. A well on their property would be extremely useful both in terms of head data and characterizing their property as a potential source. Negotiations were conducted with Staco-Chase's consultants, and in the end we were refused permission to install a well on their property.

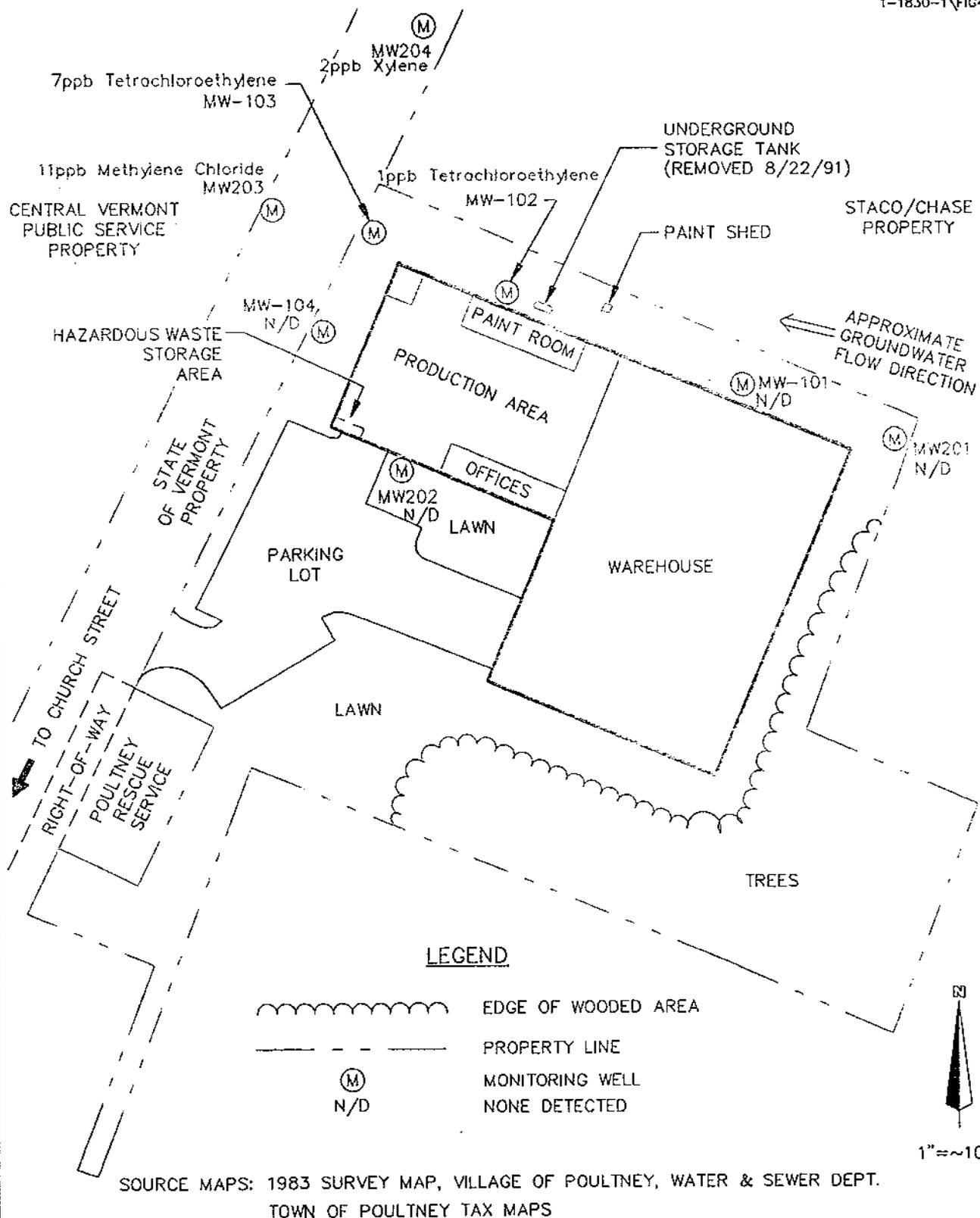
### 2.2.2 Methodology

Four monitoring wells (MW-201, MW-202, MW-203 and MW-204) were installed (see Figure 4) on December 26 and 27, 1991, by Green Mountain Boring Company, Inc., of Barre, Vermont. The installation was supervised by Carl Hanson, Staff Scientist for The Johnson Company. Because two of the wells (MW203 and MW204) were to be installed on the former railroad line, now owned by the Vermont Department of Forests, Parks, and Recreation (DFPR), a state license (#067-00-LC-92) was issued to Debby prior to well installation. Gary Salmon, Forester for the DFPR, visited the site during the well installation to ensure that the locations of MW203 and MW204 along the old railroad bed would not interfere with snowmobilers. The weather during the installation was clear and cold.

The wells were installed in accordance with The Johnson Company Standard Operation Procedure for Monitoring Well Installation and Construction (SOP-JCO-003, revised March 1990), except that the drilling equipment was not steam cleaned before drilling or between wells. Green Mountain Boring's steam cleaner was not functioning upon arrival at the site, and another steam cleaner was not available. Rather than cancel the drilling, the augers and split spoons were thoroughly washed with tap water at the Poultney fire Station before drilling began. Between wells, the equipment was washed with tap water that was obtained from the Poultney town garage and transported to the Jaymar site in the tank on the drill rig. After each tap water wash, the equipment was rinsed with distilled water before drilling.

Soil samples were collected at 5 foot intervals at each boring location. A split spoon sampler was used to collect the samples. The samples were inspected visually and with a PID for evidence of contamination. Any samples showing signs of contamination were to be submitted for analysis.

All wells were screened at the water table with factory slotted PVC well screens, and were equipped with PVC riser pipe. A sand pack was placed in the annular space surrounding the screen to enhance the hydraulic communication between the well and the aquifer and to filter out fine grained sediments. A bentonite plug was placed in the annular space above the sand pack to prevent the downward migration of surface water through the bore hole.



CONTAMINATE CONCENTRATIONS FOUND IN GROUNDWATER  
MONITORING WELL SAMPLES TAKEN ON JANUARY 2, 1992

FIGURE 4 - SCHEMATIC SITE SKETCH  
 DEBBY ENTERPRISES, INC.  
 POULTNEY, VERMONT

THE JOHNSON COMPANY, INC.  
 Environmental Sciences and Engineering  
 MONTPELIER, VERMONT

Wells MW201 and MW202 were finished with locking steel well guards, approximately four feet in length, that were cemented into the ground. MW203 and MW204 have locking well caps and were finished with bolted well guards that were cemented flush with the ground surface. The flush-mounted guards were used so that they would not present a hazard to snowmobilers and other users of the old railroad bed.

The wells were developed using a Well Wizard bladder pump made by QED. The pump was constructed with a PVC bladder, PVC body, and polyethylene tubing. Additional well development was done using disposable, high-density polyethylene (HDPE) bailers. The approximate volume of water pumped and/or bailed from each well was as follows:

MW201 :	5 gallons; water clear.
MW202 :	pumped 4 gallons, then bailed an additional 5 gallons; water still cloudy.
MW203 :	bailed 3 gallons, then pumped 4.5 gallons; water still cloudy.
MW204 :	5 gallons; water still cloudy.

The location and elevation of all the wells and pertinent site features were surveyed by Little River Survey of Stowe, Vermont.

### 2.2.3 Results

Well logs for the four wells discussed above and for the four wells installed as part of the earlier investigation are included in Appendix I. All the wells were installed through generally sandy soils, with some silty sands and some gravelly sands. Clayey soil was encountered near the bottom of MW204, along the old railroad bed. Groundwater here was quite shallow, and Gary Salmon said the area is commonly wet in the spring.

As can be seen in the well logs, none of the split spoon samples exhibited elevated PID readings, or any other visual signs of contamination. Therefore none of these samples were submitted for laboratory analysis.

## 2.3 SAMPLING

### 2.3.1 Objective

The work plan included the sampling of all of the groundwater monitoring wells and for sampling of soil around the vicinity of the removed tank, and the soil that was stock piled when the tank was removed. The primary objective of the groundwater sampling was to better characterize the distribution of contaminants in groundwater. The primary objective of sampling the soil was to determine if the tank and soil surrounding the tank was the source of the contamination.

### 2.3.2 Methodology

Warren Davey, Senior Field Technician for The Johnson Company, collected groundwater samples from all eight wells on the Jaymar property on January 2, 1992. Samples were collected according to The Johnson Company Standard Operating Procedure for Groundwater Sampling of Monitoring Wells: Water Quality (JCO-SOP-008; revised 3/12/91). Sample collection forms (JCO-HYDRO-007) are included in Appendix J.

Prior to sampling each well, the water level in the well was measured as depth below the top of the well casing, following The Johnson Company Standard Operating Procedure for Water Level Measurement (SOP-JCO-009; revised 3/7/91). A Solinst water marker was used for the water level measurements, and the readings were recorded on the sample collection forms.

After the water level in the well was measured, a dedicated, disposable, HDPE bailer was used to purge and sample the well. Three to five well volumes of groundwater were purged from each well. More water was then collected for measurement of temperature, specific conductance, and pH. The water was poured into an open jar that had been thoroughly rinsed, first with distilled water, then with water from the well. The probes from a YSI Model 3560 Water Quality Monitoring System were then placed into the jar, and readings for the three field parameters were recorded on the sample collection form as soon as they equilibrated.

The groundwater sample was then collected. The sample was poured into an unpreserved, 40 milliliter glass vial, which was then sealed so that no air bubbles were trapped in the vial. The vials were packed into a cooler with ice and delivered by Warren Davey directly to Scitest Laboratories in Randolph, Vermont, on the same day, January 2, 1992. The samples were analyzed for volatile organic compounds by EPA Methods 601 and 602.

One sample was collected from each of the eight wells. To assure the quality of the samples, a duplicate sample was collected from MW101, and a trip blank was prepared before leaving The Johnson Company Office in Montpelier. The trip blank was carried in the cooler with the sample bottles until the cooler was delivered to the laboratory. This made for a total of eleven analyses.

The limited snow cover of this winter has resulted in a deep, hard, soil frost. We were unable to collect samples from the stockpiled soil or auger into the soil because of the soil frost.

### 2.3.3 Results

The water level, volume purged, and field parameters for each well are summarized in Table 1.

TABLE 1  
Groundwater Sample Collection Field Data  
Jaymar Specialty Property, Poultney, Vermont, January 2, 1992

WELL	WATER LEVEL (ft bTOC)	VOLUME PURGED (gal)	TEMPERATURE (deg. C)	SPECIFIC CONDUCTANCE (umhos/cm)	pH
MW101	8.06	4.0	6.8	25	6.38
MW102	9.65	2.75	6.2	141	5.83
MW103	7.15	5.0	5.3	57	6.17
MW104	6.80	4.0	7.0	124	7.35
MW201	13.96	3.25	8.9	254	7.49
MW202	9.28	2.0	11.5	351	7.45
MW203	2.22	5.5	6.3	222	7.57
MW204	0.52	6.0	4.8	266	6.51

bTOC = below top of well casing.

The laboratory report sheets are included in Appendix K, and the results are summarized in Table 2. Tetrachloroethylene was detected in MW102 and MW103, and 1,2-dichloroethylene was detected in MW102. Methylene chloride was detected in MW203 and the replicate of MW203. Xylenes were detected in MW204.

TABLE 2  
 Summary of Analytical Results for  
 Groundwater Samples Collected January 2, 1992  
 Jaymar Specialty Property, Poultney, Vermont

SAMPLE	TETRACHLORO-ETHYLENE	1,2-DICHLORO-ETHYLENE	METHYLENE CHLORIDE	XYLENES
MW101	nd	nd	nd	nd
MW305 (dup. of MW101)	nd	nd	nd	nd
MW102	1 ppb	1 ppb	nd	nd
MW103	7 ppb	nd	nd	nd
MW104	nd	nd	nd	nd
MW201	nd	nd	nd	nd
MW202	nd	nd	nd	nd
MW203 <sup>†</sup>	nd	nd	11 ppb	nd
MW204 <sup>†</sup>	nd	nd	nd	2 ppb
TRIP BLANK	nd	nd	nd	nd
ENFORCEMENT STANDARD*	0.7 ppb	70 ppb	5 ppb	400 ppb

nd = not detected above practical quantitation limits  
 \* = VT Groundwater Protection Rule and Strategy  
 † = wells not located on Debby property

## 2.4 RECEPTOR SURVEY

### 2.4.1. Objective

A receptor survey was conducted to identify potential receptors of the contaminated groundwater within a 1/2 mile radius of the Debby site. An additional objective was to identify the location and to collect and review available laboratory data for the Poultney municipal water supply.

### 2.4.2. Methods

A review of the DEC's Division of Water Supply well logs was conducted on January 9, 1992. The review provided an overview of water supply wells in the vicinity of the Debby site. On January 15, 1992 Warren Davey of the Johnson Company met with the Poultney Town Clerk for Town maps and information, and then physically examined the potential locations of water supply wells. A map published by the United States Geological Survey (USGS) was referred to for the determination of potential surface water receptors.

The Vermont Department of Health (DOH) was contacted and copies of volatile organic compound (VOC) analytical reports for the Town of Poultney were forwarded to the Johnson Company on January 14, 1992.

#### 2.4.3. Results

No receptors were discovered within a 1/4 mile radius of the Jaymar site. Receptors discovered within a 1/2 mile radius include one of two water supply wells owned by Mr. Clay Cooper. These were discovered during Warren Davey's January 15th site visit. A water supply well owned by Mr. Doug Davenport was discovered during the State well log review, but was not confirmed during the site visit. Figure 5 gives the approximate location of these two wells. The Cooper well appears to be upgradient of Debby site, and therefore will not be affected. The Davenport well will not be affected because of its location relative to groundwater flow direction (documented during site work) and distance from the Debby site. The USGS map shows that the only surface water body in the area is the Poultney River, part of which lies within a 1/2 mile radius of the Debby site. We suspect that the Poultney River is the discharge area for groundwater flowing beneath the Debby site.

The material sent by the Vermont DOH included a sketch of the location of the Town of Poultney public water supply wells (Appendix L). The Town wells lie just outside of the 1/2 mile radius of the Jaymar site. A review of the VOC analytical reports indicate that no VOC Contamination has been discovered in the Town of Poultney water supply.

### 3.0 DISCUSSION

#### 3.1 GROUNDWATER FLOW

Based on the head data and survey data, we developed a water table contour map, which is displayed in Plate 1. Based on our interpretation, the predominant direction of groundwater flow is west-southwest. Because the majority of wells are located in the narrow strip between the Debby building and the northern property line, interpreting exact groundwater flow direction is difficult. This general direction however, is consistent with the general topography. A well located on the Staco-Chase property would be very useful for establishing better control over the water table configuration.

The water table in the area is relatively shallow, ranging from a maximum of approximately 11 feet below ground surface at MW201 (near the Debby building), to a minimum of approximately two feet below ground surface at MW204 (on the former railroad bed). We discussed the depth of the foundation of the building with Mr. Thomas Quinn of The Rutland Group which constructed the building. He stated

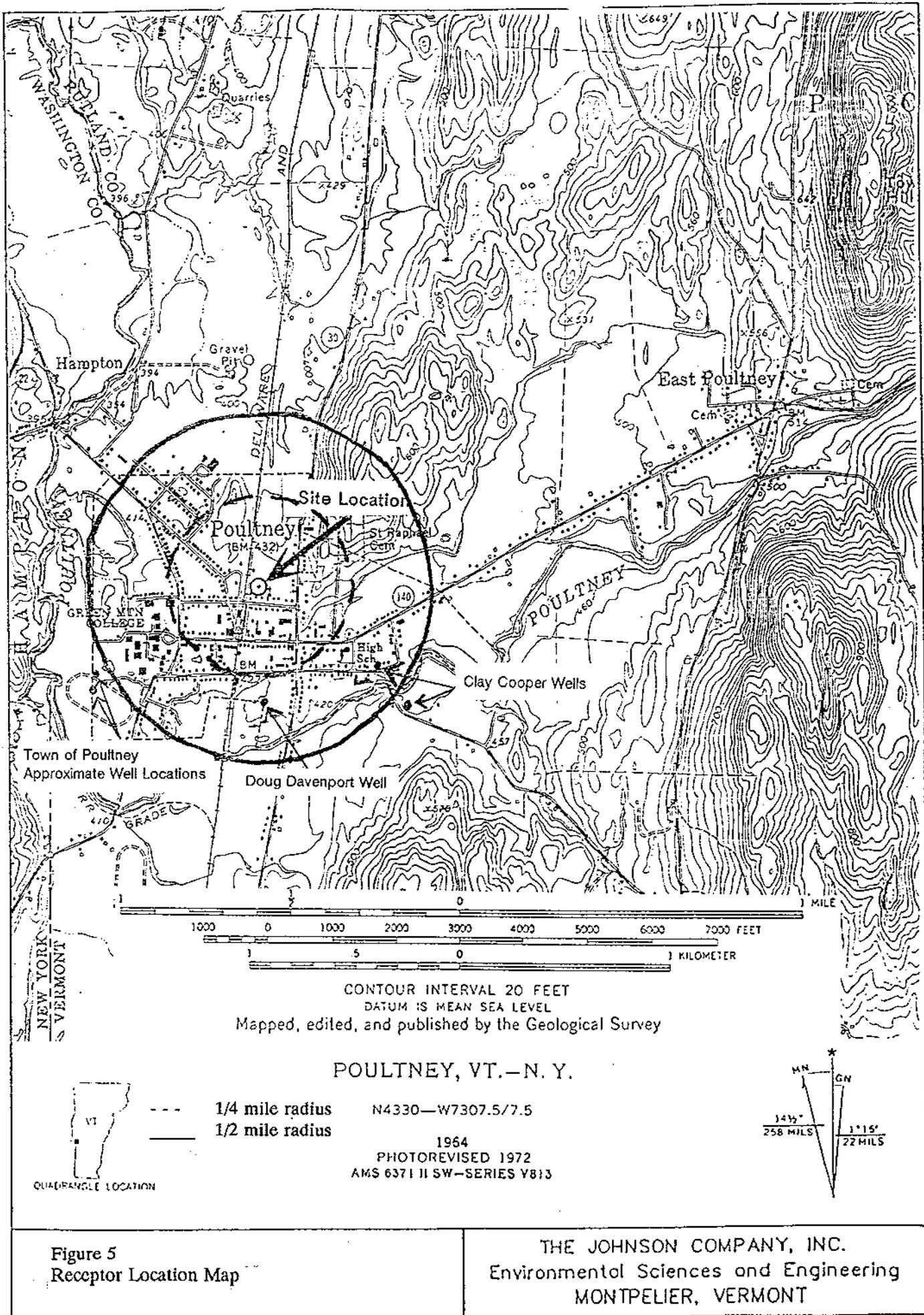


Figure 5  
Receptor Location Map

THE JOHNSON COMPANY, INC.  
Environmental Sciences and Engineering  
MONTPELIER, VERMONT

that the depth of the foundation was approximately four feet. We therefore conclude that the foundation is not currently interfering with groundwater flow, especially in the northeastern section of the property. It is possible that when the building was constructed, excavation occurred which may have altered local groundwater flow paths.

### 3.2 CONTAMINANT DISTRIBUTION

The results from the latest round of sampling indicate that the tetrachloroethylene contamination was limited to MW102 (1 ppb) and MW103 (7 ppb). These two wells had shown tetrachloroethylene concentrations of 2 ppb and 33 ppb respectively on August 5, 1991. Both of these wells are down gradient of the UST that was removed. MW101 and MW104, both of which showed tetrachloroethylene contamination on August 5, 1991, did not contain quantifiable levels in January 2, 1992. None of the four wells recently installed (the 200 series) contained detectable levels of tetrachloroethylene.

MW203 contained 11 ppb methylene chloride (a.k.a. dichloromethane). Methylene chloride is a relatively common degreasing solvent. Methylene chloride is not among the daughter products of tetrachloroethylene (Milde, *et al*, 1988). The community right-to-know document included in Appendix E lists "methylene aliphatic hydrocarbons" as being used at the Jaymar facility. We have attempted to contact the manufacturer listed, Environmental Chemical of Glens Falls, New York, to inquire if methylene chloride is included in this product, but our phone calls have not been returned. Because it has not been detected in any of other wells, it does not appear to be originating from the Debby property. A possible source, though considered unlikely, is that the methylene chloride is the result of cross contamination in the laboratory.

### 3.3 CONTAMINANT SOURCE

The data collected thus far are insufficient to conclusively determine the source of tetrachloroethylene contamination. There is no doubt that the UST had leaked contaminants into the surrounding soil and probably into the underlying groundwater. However, the contaminants found in the tank are not those found in groundwater. Additionally, contamination has been detected in wells that are hydraulically upgradient of the tank (14 ppb detected in MW101 on August 5, 1991). It is important to note that the levels and extent of contamination has decreased since the UST was removed.

The inability to sample the stockpiled soil was unfortunate. The soil may provide a link between the tank and the groundwater. Other possible sources, such as the Staco-Chase property, the paint building, or periodic dumping, cannot be ruled out. Based on the absence of contamination in MW201, it appears unlikely that the source is located on the east side of Route 30.

Based on our current understanding of groundwater flow direction, the contamination found in MW204 (2 ppb xylene) is likely to have originated on the DFPR or the Staco-Chase property.

#### 4.0 RECOMMENDATIONS

The results of this investigation indicate that tetrachloroethylene or other compounds detected on the Debby site are not migrating across property line in detectable concentrations. The methylene chloride found in MW203 has an unknown source, but since it has not been detected in wells on the Debby property, it does not appear to have originated there.

The data also indicate concentrations of all contaminants on the Debby property are decreasing. This may be the result of the removal of the UST and poly-encapsulation of the associated contaminated soil.

The receptor survey indicates that there will be no human exposure to the tetrachloroethylene contamination.

Poultney was been designated a Job Zone in 1986, partially because of a loss of local jobs. Many businesses would find the Debby facility an attractive location in which to move, but at this time the facility is idle. The Town of Poultney has and is continuing to try to attract business to the area. The contamination found at the site has obvious deleterious affects on the efforts to sell the building and again bring it to active use. It would therefore not only benefit the current owners, but the community as a whole to resolve the remaining issues as soon as possible. We therefore recommend the following:

1. Establish a monitoring program for the following five wells: MW101, MW102, MW103, MW104, and MW203. The proposed analytical method is 8010/8020. Because of cost and other considerations, Debby Enterprises, Inc. requests that three wells not be included in the monitoring program. MW201 and MW202 have not shown any levels of contaminants, and we believe that they are either up or side gradient to the source. Based on groundwater flow direction, the 2 ppb xylene detected in MW204 does not appear to have originated at the Debby site, so it is also not included in this proposed monitoring program. Debby Enterprises, Inc. also proposes that the sampling occur on a semi-annual basis. The program will be ended if concentrations of contaminants associated with the Debby property have decreased to below enforcement standards (or detection limits) established by the Vermont Groundwater Protection Rules and Strategy in two successive

samples. If the levels of contaminants show no improvement but also show no increasing levels, the monitoring program will continue on a semi-annual basis until enforcement standards are met.

2. The poly-encapsulated soil should be sampled for EPA 8010/8020 analysis. The soil should be sufficiently thawed to allow for sampling. This may provide a linkage between the tank and the groundwater contamination, and provide data that will determine the disposal options for the soil. Soil borings in the area near the UST location will be conducted if groundwater concentrations of contaminants do not decrease, because this may be an indication that not all of the contaminated soil was excavated and poly-encapsulated.
3. If methylene chloride consistently appears in samples collected from MW203, CVPS or the DFPR may wish to conduct an investigation into its source.
4. The Staco-Chase property remains a potential source for the contamination detected on the Debby property and the xylene contamination detected in MW204. We are aware that an investigation of this property is planned for this summer, and we recommend that VOC analysis of groundwater samples be included in this investigation.

#### REFERENCES CITED

Milde, G., Merger, M., and Mergler, R., 1988, "Biological Degradation of Volatile Chlorinated Hydrocarbons in Groundwater", in Water Science Technology, Vol. 20, No.3, pg. 67-73.

**Appendix A**

**September 25,1991 Letter from Michael Pottinger  
of The Johnson Company to  
Mr. Robert Finucane of the  
Vermont Department of Environmental Conservation**

THE JOHNSON COMPANY, INC.

**Environmental Sciences and Engineering**

September 25, 1991

Mr. Robert Finucane  
Sites Management Section  
Department of Environmental Conservation  
Agency of Natural Resources  
103 South Main Street  
Waterbury, Vermont 05676

Re: Investigation of the Debby Enterprises, Inc. property, Poultney, Vermont  
JCO #: 1-1830-1

Dear Mr. Finucane:

We wish to take this opportunity to present you with the current knowledge of site conditions and recommendations for further action resulting from a limited investigation of the Debby Enterprises, Inc., (formerly Jaymar Specialty) property, located off Church Street in Poultney, Vermont (Figure 1). The results of the investigation indicate that there has been a release of hazardous materials on or near the site which has resulted in perchloroethylene contamination of groundwater in concentrations above the Vermont Enforcement Standards.

#### 1.0 INTRODUCTION

The property in question is currently owned by Debby Enterprises, Inc. of Rockville, New York. The property was owned by the predecessor of Debby Enterprises, Inc. (Jaymar Specialty, Inc.), from 1983 to 1990, and was used to manufacture toy pianos. The building on the site is currently unoccupied, and has been unoccupied for almost two years. It is located immediately south and downhill of the site of the former Staco-Chase facility, where mercury thermometers were manufactured. Mercury contamination has been documented at the Staco-Chase facility. In 1990, The Johnson Company was retained by Jaymar Specialty to investigate the possibility that mercury from the Staco-Chase facility may have contaminated the soils on the Jaymar property. The 1990 investigation found small concentrations of mercury in the Jaymar soils, but all were less than 2.0 milligrams per kilogram (mg/kg), which is below a soil concentration limit of 4.0 mg/kg set informally by the Vermont Department of Environmental Conservation. Groundwater was not sampled as part the 1990 investigation.

Debby Enterprises retained The Johnson Company to investigate the possibility of mercury in the groundwater on the Jaymar property and to perform a full Level I Environmental Site Assessment (ESA) of the property. In the process of this investigation, no mercury was found in groundwater samples, but concentrations of tetrachloroethylene (perchloroethylene, or perc), toluene, trichloroethylene (TCE), and cis or trans-1,2-dichloroethylene (DCE) were found.

#### 2.0 CURRENT INVESTIGATION - IDENTIFICATION OF CONTAMINATION

The current investigation first involved the installation and sampling of four temporary monitoring wells on the Jaymar property on July 1, 1991, near the Staco-Chase property line (Figure 2). The wells were installed to a depth of approximately 10 feet through sands and sandy loams, and water levels ranged between five and nine feet below ground surface. No mercury was found in any of the four wells, but MW-3 was also analyzed

Civil/Environmental Engineering Hydrogeology Water Supply & Distribution General Hazardous Waste Remediation Technology Contaminant Site Assessment  
Soil & Water Science Geology & Geophysics Survey and Dams Solid Waste Permitting

5 State Street Montpelier, VT 05602 • (802) 229-4600 Fax: (802) 229-5876



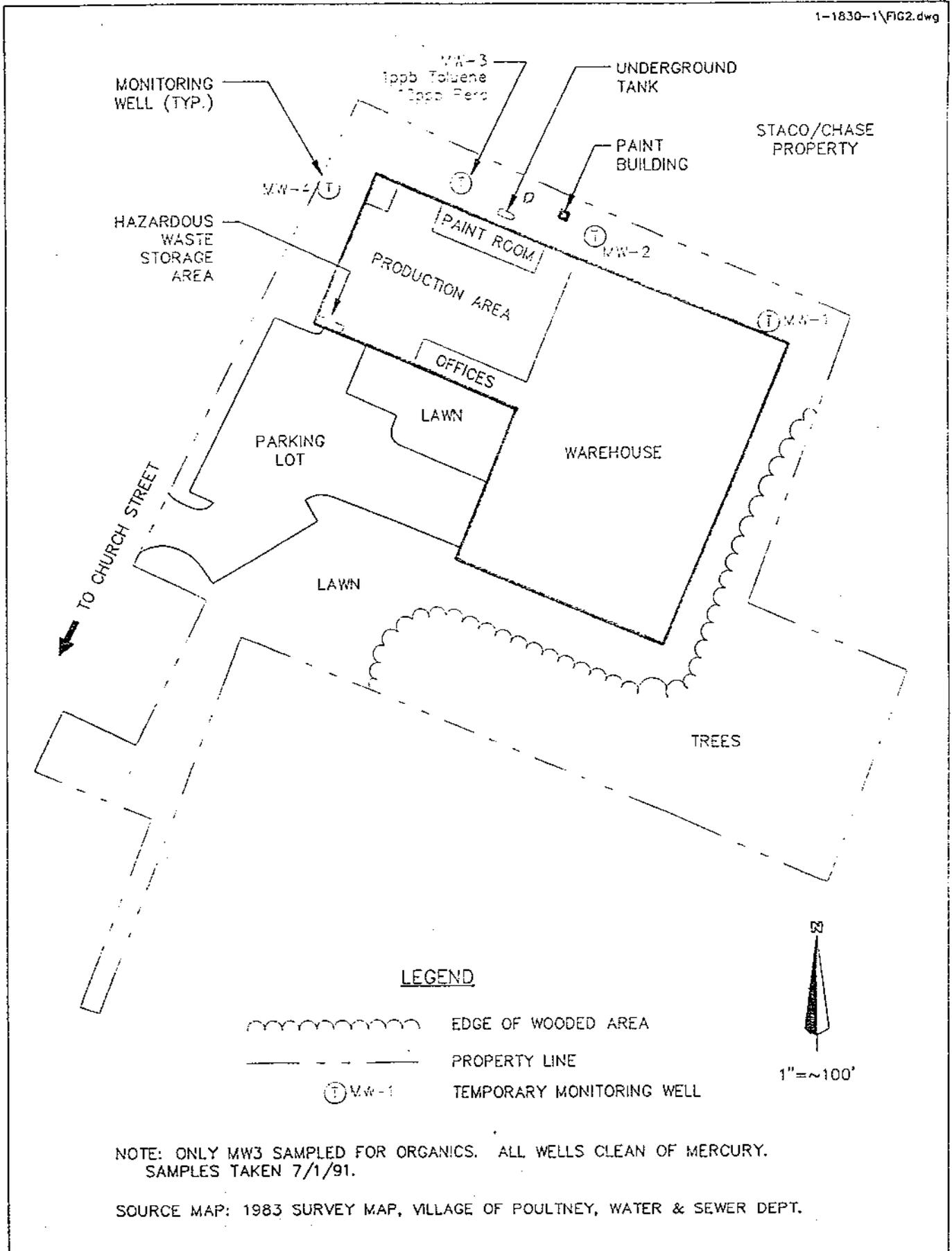


FIGURE 2 - SCHEMATIC SITE SKETCH  
 JAYMAR SPECIALTY PROPERTY  
 POULTNEY, VERMONT

THE JOHNSON COMPANY, INC.  
 Environmental Sciences and Engineering  
 MONTPELIER, VERMONT

for volatile organic compounds (VOCs), because of its proximity to an underground spill containment tank. The results of this analysis showed 12 parts per billion (ppb) perc and 2 ppb toluene. Plans found inside of the building indicated that the tank is connected to two drains inside of the building, and was apparently designed to contain spills which may occur inside of the building.

To further investigate the perc and toluene levels in the groundwater, four new monitoring wells were installed and sampled on August 5, 1991 (Figure 3). Perc was found in all four wells, in concentrations ranging from 1 to 33 ppb (Table 1). In addition, the sample from MW-102 contained 1 ppb trichloroethylene (TCE) and 1 ppb c or t-1,2-dichloroethylene (DCE).

Table 1  
Groundwater Contaminant Levels in Groundwater Samples  
The Jaymar Specialty Property, Poultney, Vermont  
Concentrations are given in parts per billion

Contaminant	MW-3 7-7-91	MW-101 8-5-91	MW-102 8-5-91	MW-103 8-5-91	MW-104 8-5-91
tetrachloroethylene (perc)	12	14	2	33	1
toluene	2	<1	<1	<1	<1
trichloroethylene (TCE)	<1	<1	1	<1	<1
c- or t-1,2-dichloroethylene (DCE)	<1	<1	1	<1	<1

Based on water levels measured in the wells, the groundwater flow direction is approximately from east to west. This means that MW-101, which showed 14 ppb perc, is approximately 150 feet up-gradient of the underground spill tank (Figure 3). It also means that MW-103, which had the highest perc concentration, is near the down-gradient property line.

Based on the data collected up to this point in the investigation, we identified five potential sources of the perc contamination. These included the following:

1. The underground spill containment tank.
2. Periodic dumping of waste solvent in the general area north of the building.
3. The Staco-Chase facility.
4. Past uses of the property, which include a milk bottling facility, and a milling operation.
5. A source not identified or in addition to those four listed above.

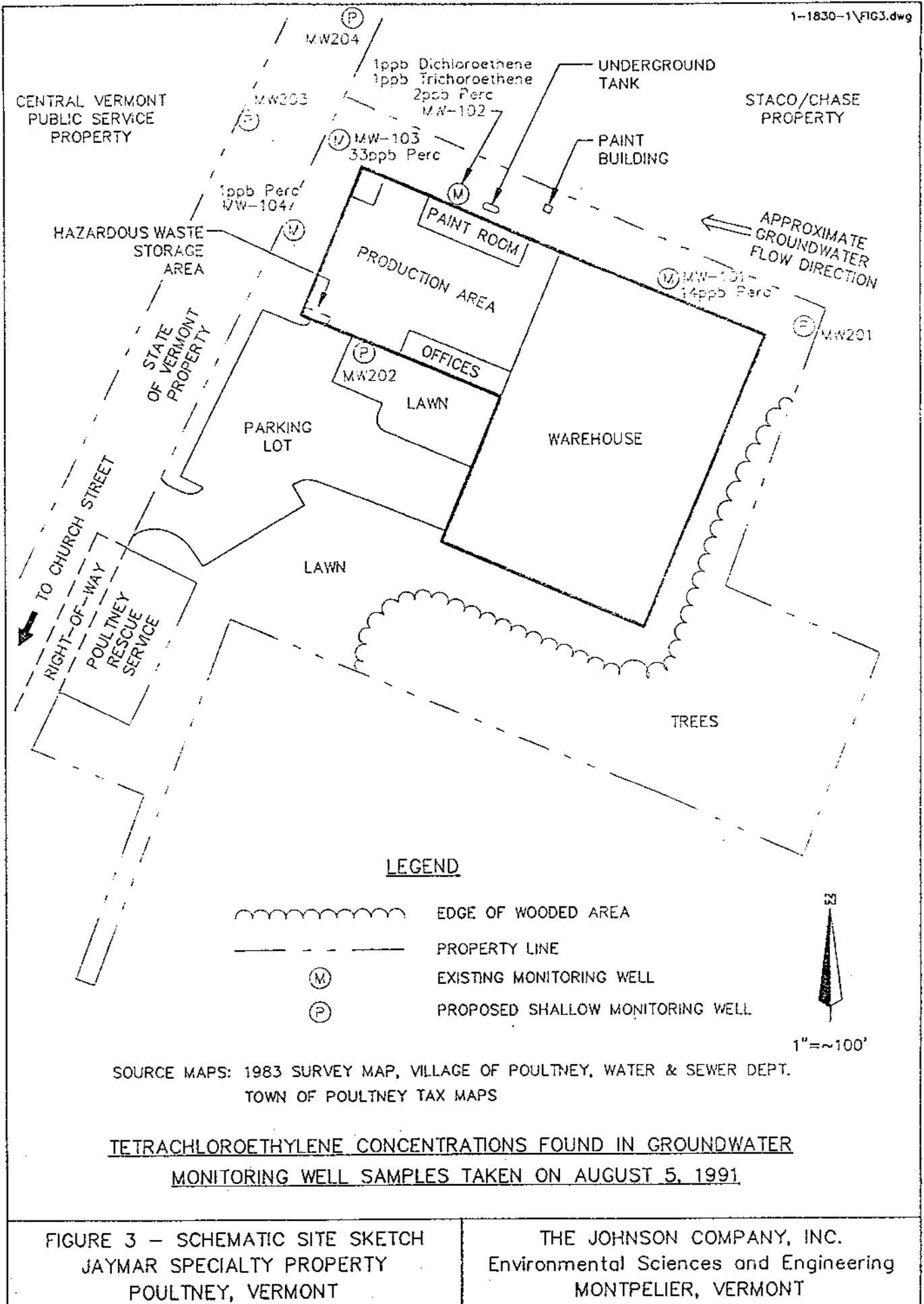


FIGURE 3 - SCHEMATIC SITE SKETCH  
JAYMAR SPECIALTY PROPERTY  
POULTNEY, VERMONT

THE JOHNSON COMPANY, INC.  
Environmental Sciences and Engineering  
MONTPELIER, VERMONT

In order to determine if the tank was a source of the contamination, arrangements were made for its excavation, emptying, and removal. Jet Line of Williston, Vermont was contracted to perform these operations and Johnson Company personnel were to perform an assessment of possible contamination resulting from the tank. On August 19, 1991 Mr. Paul Van Hollebeke of the DEC was contacted and notified of the tank removal and the reasons for the removal. He waived the 14 day notification requirement and gave permission for the tank to be removed on August 22, 1991.

On August 22, 1991 three representatives of Jet Line and Michael Pottinger of The Johnson Company met on site to locate and remove the tank. Plans located within the building were reviewed to identify the location of the tank. Two different plans gave conflicting information concerning the tank location. For this reason, a relatively large excavation was performed before the tank was located.

The tank was located approximately five feet east of MW-102, and approximately 2.5 feet north of the building. The tank was situated on end, as opposed to the usual flat lying orientation, and was only six inches below ground surface. It was approximately 53 inches in diameter, and 56 inches deep. We estimate its capacity to be 500 gallons (as opposed to 275 gallons as indicated on site plans). The entire top of the tank was essentially resting on the tank body. This top was not capable of containing liquid should the tank be filled to beyond its capacity. A 4 inch PVC pipe entered the tank approximately six inches from its top. The tank was nearly full when it was discovered. The contents of the tank appeared to be mostly water, and produced PID readings of approximately 2 to 5 parts per million (ppm). The PID that was used was equipped with a 10.6 eV lamp, was calibrated before use, and was manufactured by Thermo Environmental Equipment.

The tank also had an opening for another pipe near its top. This opening was directly opposite the location of the four inch PVC pipe. This opening had a metal "patch" bolted on it. This patch did not appear water tight.

The contents of the tank were pumped into ten 55 gallon drums, and a sample was collected and the analysis was conducted by Jet Line's laboratory. These drums are currently stored in the building. On September 19, 1991 we received verbal results of this analysis. 85 ppb xylene was the only compound detected above detection limits using EPA method 8240. The detection limit for perc was 5 ppb.

The soil surrounding the tank were also screened with the PID. High readings (maximum reading was 280 ppm) were observed in the area immediately next to the patched tank opening. PID readings decreased to approximately 2 to 5 ppm approximately 2.5 feet from the tank. Before the tank was removed, soil in the vicinity of the patch opening was excavated and screened with the PID. PID readings decreased with depth. The water table was encountered at approximately eight feet below ground surface, where excavation ceased. PID readings of 20 to 30 ppm were observed in soil at the bottom of the excavation. The soil that had PID readings greater than 10 ppm was encapsulated in plastic and left on site. We estimate the volume of soil excavated to be approximately six yards. The DEC Tank Removal form is attached to this letter.

### 3.0 RECOMMENDATIONS

Although the work conducted to date has discovered a leaking UST in the vicinity of the contaminated wells, the contents of the UST did not contain any of the compounds detected in groundwater. This does not necessarily eliminate the UST as a potential source. It is possible that a perc containing solution has flushed through the tank, leaving no trace of the perc. We do not consider this likely. The absence of perc in the tank and the presence of perc in groundwater apparently up-gradient of the tank suggests a source other than the tank. We hope to resolve this question and better define the extent of groundwater contamination by conducting the recommendations discussed below.

We recommend that four more monitoring wells be installed to better define the extent of the contaminant plume. The locations of the proposed wells are shown in figure 3. The rationale for selecting these locations is described below.

MW-201 Northeast corner of Debby Enterprise property

This well is designed to determine the eastern extent of the contaminant plume and to indicate if contamination is originating off site.

MW-202 South of the former Jaymar building

This well is designed to indicate the southern extent of the contaminant plume and to provide critical head data for groundwater flow direction determination.

MW-203 West of MW-103 and MW-104, on State property

This well is designed to better define the western extent of the contaminant plume.

MW-204 West of Staco-Chase property line on State property

This well may indicate whether contamination is originating at the Staco-Chase property and will provide important head data.

Wells installed on the Staco-Chase property would provide the most useful data for determining if the contamination is originating there. However, we understand that the State has been involved in a long legal battle over many issues at the Staco-Chase property, and we understand that a comprehensive environmental investigation is being considered for that property. We therefore anticipate that access to that property would be difficult to arrange. If you have any guidance to provide concerning access to the Staco-Chase property, we would appreciate you relaying that to us. Additionally, we would appreciate your assistance in obtaining access to the State property (formerly owned by Delaware & Hudson Railroad) located immediately west of the Debby property.

The four existing wells and four additional wells will be sampled and analyzed using EPA methods 601/602 to provide data that will better define the distribution of contaminants in groundwater, and to confirm the presence of perc in MW-101. We propose to resample the contents of the drums for 601/602 analysis. After all the wells have been installed, a survey of the site will be conducted. This survey will locate all pertinent features on the property, and provide elevations of all the groundwater monitoring wells.

We will perform a receptor survey to identify water supplies and surface water bodies within the immediate area and one-half mile radius of the site. A preliminary receptor survey was conducted on the day of the tank pull. The area is served by a town water system, and no water supplies exist in the immediate area. Additionally, no streams, ponds, or lakes are located in the immediate area. A small stream bed is located on the western edge of the Debby property, but was dry on August 22, 1991. We anticipate that this stream bed functions solely as a storm water runoff channel.

Because existing analytical data indicate that there has been a release of hazardous materials on site, a Health and Safety Plan (HASP) reflecting OSHA 1910.120 regulations was developed prior to removing the tank, and a HASP will be in affect during any further field investigation.

Mr. Robert Finucane  
Sites Management Section  
Department of Environmental Conservation

September 25, 1991  
Page 8

We will contact you within the next week to discuss this matter. In the mean time, please do not hesitate to call with questions. We look forward to hearing from you.

Sincerely,

THE JOHNSON COMPANY, INC.

By: Michael Pottinger  
Michael H. Pottinger  
Senior Scientist

cc: Mr. Arthur Borden, Rosenman and Colin.  
Mr. John Ponsetto, Gravel and Shea  
Mr. Ralph Kaufman, Debby Enterprises

I:\PROJECTS\1-1830-1\STATE.LTR August 16, 1991 11.29 crh

RETURN TO:  
 VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION  
 UNDERGROUND STORAGE TANK PROGRAM  
 103 SOUTH MAIN STREET  
 WATERBURY, VERMONT 05676

DATE OF REMOVAL: 8-22-91 DATE OF SITE ASSESSMENT: 8-22-91

PERSON/CO DOING SITE ASSESSMENT: Michael Patten - Johnson Company - 229-4600  
 TELEPHONE NUMBER: 216 LaMountain - Set Line

BUSINESS NAME WHERE TANK(S) LOCATED: JAMAR SPECIALTY  
 STREET ADDRESS OF BUSINESS: Church St  
 TOWN/CITY: POUHNEY, VT

OWNER OF TANK(S): David Enterprises  
 ADDRESS OF OWNER: 22 COLLIER ST  
 TOWN/CITY: ROCKVILLE, NY

UST FACILITY ID#:

TANK #	PRODUCT	SIZE	CONDITION
1)	waste	500 gal	good except leakage
2)			occurred near top.
3)			
4)			
5)			

DEC PERMITTED TANKS STILL ON SITE? Y or  N HOW MANY?  
 OUT OF SERVICE TANKS? Y or  N HOW MANY?  
 ON PREMISES HEATING OIL TANK? Y or  N HOW MANY? SIZE?

WHY IS TANK(S) BEING REMOVED? No longer in use - possible source of leak in 1980.  
 REPLACEMENTS: Y or  N HOW MANY? PERMIT OBTAINED?

ANY WASTE PUMPAGE:  Y or N EST. VOL. 500 gal  
 TRANSPORTED BY: Set Line

RECEPTORS:  SOILS  GROUNDWATER SURFACEWATER RESIDENTIAL

SOIL TYPE: 2' sandy gravel over sandy sil.

CONTAMINATED SOILS:  Y or N AMOUNT: ~ 8 yds

CONTAMINATED STOCKPILED SOILS:  Y or N AMOUNT: ~ 5-piles

DEGREE OF CONTAMINATION: (PID READINGS) max 280 ppm near leak, decrease rapidly w/ distance.  
 PID CALIBRATION SCHEDULE: on site

MONITOR WELLS INSTALLED?  Y or N HOW MANY? 4

DEPTH TO GROUNDWATER? ~ 8'-10'  
 FREE PHASE PRODUCT ENCOUNTERED? Y or  N AMOUNT?

*Michael Patten*

Signature of Owner or Owner's Authorized Representative

Signature of Person Performing Site Assessment

Date

COMMENTS/RECOMMENDATIONS: (Please attach on a separate page)

White - DEC File Copy Yellow - DEC File Copy Pink - Owner Copy

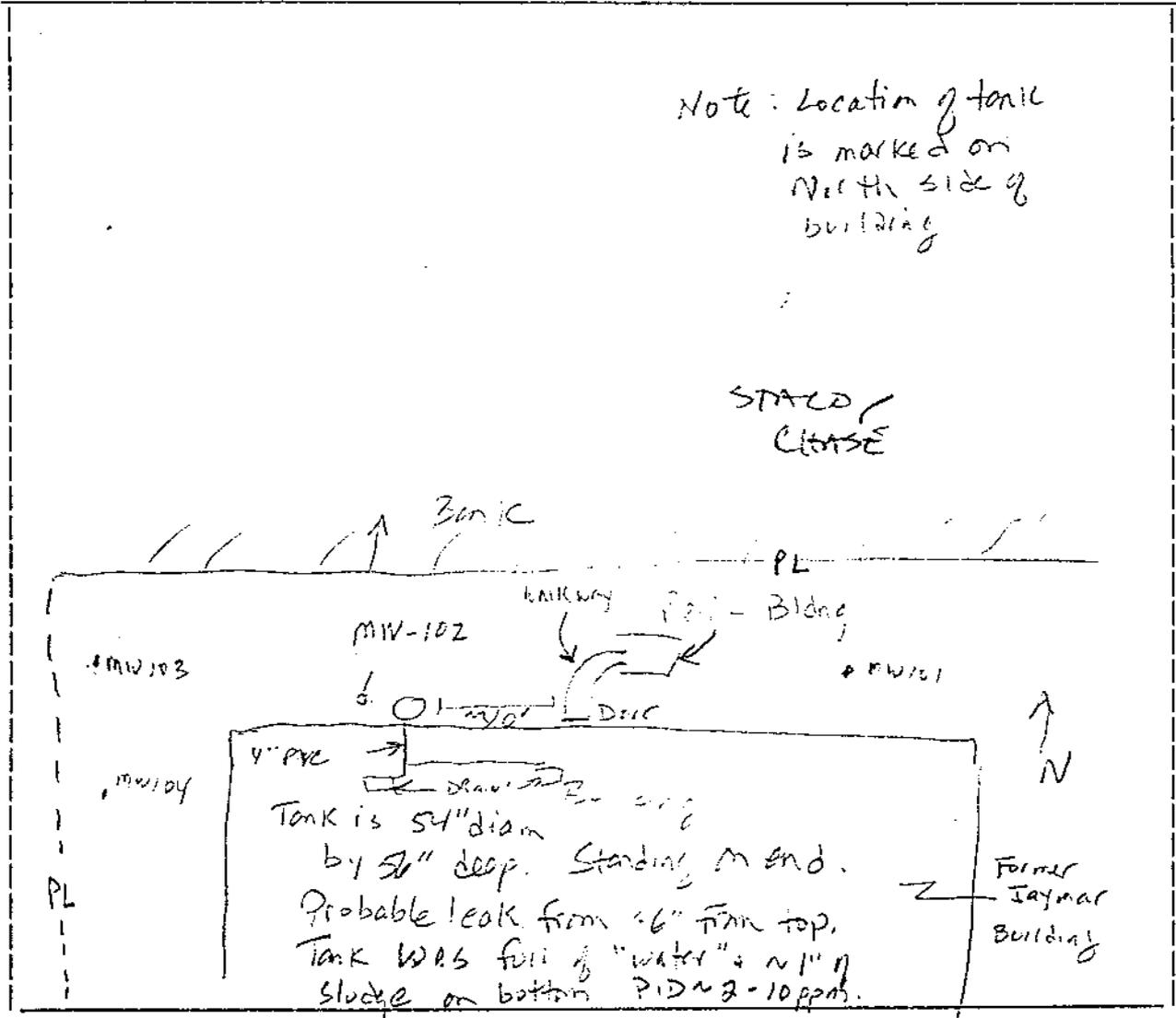
VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION  
UNDERGROUND STORAGE TANK PROGRAM  
SITE MAP

RECOMMENDED SCALE - 1" = 50 feet (but not smaller than 1" = 100 feet)

MAP DRAWN BY: MHP - Michael H. Pottinger

BUSINESS NAME WHERE TANK(S) LOCATED: JAYMAR Specialty, Clutch St. Pathway, VT. Now owned by Debby Enterprises, Roxville, NY

Show location of all tanks and property boundary; distance to permanent structures; monitoring wells; water wells within 500 foot radius; storm; sewer and water lines; sample points; areas of contamination and other pertinent site information. Indicate North arrow and major street names or route number.



White-DEC File Copy

Yellow-DEC File Copy

Pink-Owner Copy

**Appendix B**

**October 29, 1991 Letter from Mr. David Shepard  
of the Vermont DEC to  
Michael Pottinger of The Johnson Company.**

*Assessment/Debbby*  
1-1830-1



State of Vermont

Department of Fish and Wildlife  
Department of Forests, Parks and Recreation  
Department of Environmental Conservation  
State Geologist  
Natural Resources Conservation Council

AGENCY OF NATURAL RESOURCES  
Department of Environmental Conservation  
Hazardous Materials Management Div.  
103 South Main Street/West Building  
Waterbury, VT 05671-0404  
(802) 244-8702

RECEIVED

OCT 30 1991

October 29, 1991

THE JOHNSON CO., INC.  
MONTPELIER, VERMONT

Michael Pottinger  
The Johnson Company, Inc.  
5 State Street  
Montpelier, VT 05602

Dear Mr. Pottinger:

I have reviewed your letter detailing the investigation performed at the Debby Enterprises, Inc. property in Poultney, Vermont. The results of this investigation indicate the presence of hazardous substances in groundwater at this site. Based on this information, the site has been added to the Vermont Hazardous Sites List, designated site #91-1140.

There are a number of pieces of information not included in this letter that the Sites Management Section (SMS) normally expects in a site evaluation report. I realize this letter is the result of an Environmental Site Assessment (ESA) rather than a more detailed investigation performed in conjunction with SMS review and that these gaps may be addressed in future work. If information pertaining to some of these data gaps is already available it would be helpful to pass it along to the SMS; otherwise, in planning further efforts at this site these items should be addressed.

**Specific Comments:**

- No well boring installation logs are included for the four monitoring wells onsite.
- Were soils screened with a PID during well installation; if so what were the results?
- There is no indication that quality control samples were collected such as duplicates, field blanks or trip blanks.
- Laboratory analysis data sheets are not included.
- No soil samples were analyzed from the soils excavated from around the UST.

**Recommendations for Further Work:**

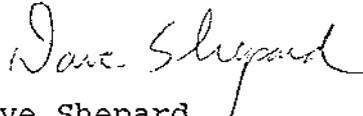
The recommendations for further work contained in the letter present a framework to better define the nature, extent and potential origin of the contamination detected on the Debby Enterprises property. I would suggest putting these recommendations into a work plan for review by the SMS. Further

work at the site should include:

- Sampling of contaminated soils from around the former UST.
- A more complete review of the site history and surrounding landuses.
- Inclusion of QC samples.
- Screening with PID of soils from well borings with laboratory analysis of samples as appropriate.
- Future reports should provide sample laboratory analysis data sheets, boring logs and a description of sampling and decontamination procedures.

I have made some initial inquiries with regard to your request for assistance concerning access for drilling monitoring wells on both State property and the Staco/Chase property. Access to State property should not be a problem and I can make a more formal request once you have put together a work plan. The Attorney General's Office informs me that to request permission to install a well on the Staco/Chase property you will need to contact the owners of the Staco/Chase property. The contact for Staco/Chase is John Diego of Thermo Consulting Engineers (phone #: 879-7733). Please call with any questions.

Sincerely,



Dave Shepard  
Sites Management Section

/ds  
Site #91-1140

**Appendix C**

**November 6, 1991 Work Plan Submitted by  
Michael Pottinger of The Johnson Company  
to Mr. David Shepard of the Vermont DEC.**

THE JOHNSON COMPANY, INC.

~~Environmental Sciences and Engineering~~

CF

November 6, 1991

Mr. David Shepard  
Sites Management Section  
103 South Main Street  
Waterbury, Vermont 05671-0404

Re: Work Plan for further investigation at the Debby Enterprises, Inc. property in Poultney, Vermont  
JCO #: 1-1830-1

Dear David:

Thank you for your correspondence of October 29, 1991 concerning the above referenced project. We would like to take this opportunity to respond to the Specific Comments contained in your letter and to present you with the work plan that you had requested.

Specific Comments

- No well construction logs were included with our September 25, 1991 letter because the purpose of the letter was to essentially notify of a hazardous material release and to present you with a general plan for further investigations. Well logs for monitor wells MW201, MW202, MW203, and MW204 are attached to this letter.
- Split spoon soil samples were screened with a photoionization detector (PID) when the four wells mentioned above were installed. No detectable PID readings were observed.
- No detectable levels of contamination were detected in a trip blank that was collected and submitted along with the other samples. Again, this information was not included in our letter to you because the letter was not considered a report of our investigation.
- Laboratory data sheet for the samples discussed in our letter are attached.
- No soil samples were collected from the vicinity of the tanks. A PID was used to determine the extent of soil contamination, and the liquid sample collected from tank was considered to be representative of the nature of the contamination. We have included a soil sample collected from this area in the work plan which is presented below.

WORK PLAN FOR ADDITIONAL INVESTIGATION

The following is a plan for the additional work proposed in our September 25, 1991 letter to you.

Objective

The two primary objectives of the additional proposed work is to more fully determine the extent of contamination and to determine its source. We propose to meet these objectives by installing and sampling four additional monitoring wells in the area.

Monitoring Well Installation

Monitoring wells will be installed using a hollow stem auger. The locations of the wells and the rationale used for selecting these locations are as follows:

© 1991 Environmental Sciences and Engineering, Inc. All rights reserved. This document is the property of Environmental Sciences and Engineering, Inc. and is loaned to you. It is not to be distributed outside your organization. If you have any questions, please contact Environmental Sciences and Engineering, Inc., 5 State Street, Montpelier, VT 05602. (802) 229-4800. Fax: (802) 229-5575.

- MW-201      Northeast corner of Debby Enterprise property  
This well is designed to determine the eastern extent of the contaminant plume and to indicate if contamination is originating off site.
- MW-202      South of the former Jaymar building  
This well is designed to indicate the southern extent of the contaminant plume and to provide critical head data for groundwater flow direction determination.
- MW-203      West of MW-103 and MW-104, on State property  
This well is designed to better define the western extent of the contaminant plume.
- MW-204      West of Staco-Chase property line on State property  
This well may indicate whether contamination is originating at the Staco-Chase property and will provide important head data.

The Johnson Company's Standard Operating Procedures (SOPs) will be followed for monitoring well installation. This will include steam cleaning of drilling equipment between well locations, the generation of well construction diagrams and boring logs, and screening of split spoon samples with a PID. All wells will be equipped with a locking protective guard.

#### Groundwater Sampling

After the additional wells have been installed, all eight wells on site will be sampled in accordance with Johnson Company SOPs. In addition, at least one trip blank and one duplicate sample will be generated for quality assurance/quality control (QA/QC). These samples will be analyzed using EPA method 601/602. We anticipate that disposable HDPE bailers will be used to collect samples. This eliminates the need for decontamination of sampling equipment between wells.

#### Soil Sampling

As stated previously, split spoon samples will be screened in the field with a PID. Soil samples exhibiting PID readings above background will be placed in containers for possible shipment to the laboratory for analysis. After the boring program has been completed, an assessment of the number and locations of soil samples and PID readings will be used to determine which samples to send to the lab.

We will collect a sample from the soil stockpiled on-site. As stated in our letter to you, this stockpiled soil appeared to be the majority of contaminated soil associated with the underground storage tank. We will auger by hand in the vicinity of the excavation and screen soil with a PID. If high PID readings are observed in these samples, a representative sample(s) will be submitted to the lab for analysis.

Mr. David Shepard  
Sites Management Section  
Waterbury, Vermont

November 6, 1991  
Page 3

Receptor Analysis

We will perform a receptor survey to identify water supplies and surface water bodies within one-half mile radius of the site. This will be accomplished through the review of topographic maps, air photographs, and orthophotographs. As stated in our letter to you, a preliminary receptor survey indicates that there are no water supplies in the immediate area.

Site History

We have already researched information concerning the history of the Debby site. This information will be included in a future report. This research indicates that paints, paint thinners, and oils were used on-site during the operations of the predecessor of Debby Enterprises (Jaymar Specialty, Inc.). We will further investigate the history of the site and surrounding area, and present the information in our report.

Report

All of the information gathered during the execution of the above tasks will be presented in a report. This report will include a description of the methodologies used to collect the data, a presentation and discussion of the results, and The Johnson Company's conclusions and recommendations.

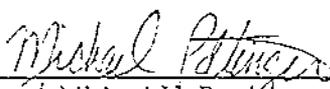
Health and Safety Plan

The Johnson Company's has developed a Health and Safety Plan (HASP) for work that has been conducted at the site. This HASP will be modified to incorporate the tasks that have been listed in this plan.

We appreciate your cooperation in obtaining access to the Parks and Recreation property west of the Debby site. We are in the process of scheduling a driller for as soon as possible. Please do not hesitate to call should you have any questions.

Best wishes,

THE JOHNSON COMPANY, INC.

By:   
Michael H. Pottjäger  
Senior Scientist

cc: Arthur Borden, Rosenman & Colin  
Ralph Kaufman, Debby Enterprises, Inc.  
John Ponsetto, Gravel & Shea

Reviewed by: CTS

PROJECTS\1-1630-1\WORK\PLN November 4, 1991 17:13 mhp

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW-101**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 2/5/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 3.1 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 5.0 ft.  
 Slot Size: 10/20

Total Pipe: 13.1 ft.  
 Back Up: 3.0 ft.  
 Total Hole Depth: 10.1 ft.  
 Well Open Length: 0.0 ft.  
 Initial Water Level: 5.52 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

█ = Sampled interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3					
2					
1					
0					
1	Backfill				
2					
3	Bentonite				
4					
5					5'-7':
6				0.000	0"-9": moist, brown, fine sand w/some coarse sand
7	Screen				9"-17": wet, gray-brown, fine sand w/some coarse sand
8					blows: 9-6-4-4
9	Sand Pack				
10					10'-12':
11				0.000	0"-8": moist, brown, friable fine sandy loam w/coarse sand and small pebbles
12					8"-17": wet, gray-brown fine sandy loam
13					blows: 7-3-3-4
14					
15					
16					
17					

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 Stote Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW-102**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 8/5/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 7.9 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 8.0 ft.  
 Slot Size: 0.020

Total Pipe: 10.9 ft.  
 Stick Up: 2.9 ft.  
 Total Hole Depth: 10.0 ft.  
 Well Guard Length: 0.0 ft.  
 Initial Water Level: 7.75 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

☐ = Sampled interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3					
2					
1					
0					
1		Backfill			
2		Bentonite			
3					
4					
5					5'-7':
6		Sand Fock		0 ppm	0"-3": moist, brown fine sandy loam w/some gravel
7					3"-11": moist, grey-brown silty sand and gravel
8		Screen			11"-21": moist, grey silty coarse sand and gravel
9					blows: 2-3-7-10
10					10'-12':
11				0 ppm	0"-3": wet, brown medium sand
12					13"-15": wet, grey-brown silty fine sand
13					blows: 3-3-7-9
14					
15					
16					
17					

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW-103**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1630-1  
 Logged By: CRH  
 Date Drilled: 8/5/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 3.0 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 5.0 ft.  
 Slot Size: 1020

Total Pipe: 13.0 ft.  
 Stick Up: 3.0 ft.  
 Total Hole Depth: 10.0 ft.  
 Well Guard Length: 0.0 ft.  
 Initial Water Level: 5.44 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

■ = Sampled interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3					
2					
1					
0					
1	Backfill				
2	Bentonite				
3					
4					
5					5'-7':
6				0 ppm	0"-6": moist, brown gravelly coarse sand
7					6"-13": moist, gray medium sand
8	Sand Pack				blows: 24-12-11-8
9					
10	Screen				10'-12':
11				0 ppm	0"-4": wet, gray-brown gravelly sandy loam
12					4"-8": wet, gray medium fine sand
13					8"-14": wet, gray silty fine sand
14					
15					
16					
17					

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW-104**

Project: Joyner  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 8/5/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 7.3 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 5.0 ft.  
 Slot Size: .020

Total Pipe: 12.3 ft.  
 Stick Up: 2.3 ft.  
 Total Hole Depth: 10.0 ft.  
 Well Guard Length: 0.0 ft.  
 Initial Water Level: 4.91 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

■ = Sampled Interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3					
2					
1					
0					
1	Backfill				
2	Bentonite				
3					
4					
5					
6				0 ppm	5'-7': 0"-14": moist, olive-brown silty fine sand blows: 6-6-9-8
7	Sand Pack				
8	Screen				
9					
10				0 ppm	10'-12': 0"-5": wet, brown gravelly coarse sandy loam 5"-17": wet, grey fine sand blows: 5-7-6-9
11					
12					
13					
14					
15					
16					
17					

LABORATORY REPORT

CLIENT NAME: The Johnson Company  
 SITE LOCATION: Jaymar  
 LABORATORY NO: 1043-91  
 PROJECT NO: 78611  
 ATTENTION: Mike Pottinger

DATE OF SAMPLE: 8/5/91  
 DATE OF RECEIPT: 8/7/91  
 DATE OF ANALYSIS: 8/8/91  
 DATE OF REPORT: 8/9/91

PARAMETER	MW 101	MW 102	MW 103	MW 104	Field Blank
Chloromethane	BPQL	BPQL	BPQL	BPQL	BPQL
Bromoform	BPQL	BPQL	BPQL	BPQL	BPQL
Bromomethane	BPQL	BPQL	BPQL	BPQL	BPQL
Dibromochloromethane	BPQL	BPQL	BPQL	BPQL	BPQL
Vinyl Chloride	BPQL	BPQL	BPQL	BPQL	BPQL
2-Chloroethylvinyl Ether	BPQL	BPQL	BPQL	BPQL	BPQL
Chloroethane	BPQL	BPQL	BPQL	BPQL	BPQL
Methylene Chloride	BPQL	BPQL	BPQL	BPQL	BPQL
Trichloroethylene	BPQL	1	BPQL	BPQL	BPQL
Trichlorofluoromethane	BPQL	BPQL	BPQL	BPQL	BPQL
1,1-Dichloroethene	BPQL	BPQL	BPQL	BPQL	BPQL
1,1-Dichloroethane	BPQL	BPQL	BPQL	BPQL	BPQL
c or t-1,2-Dichloroethylene	BPQL	1	BPQL	BPQL	BPQL
Chloroform	BPQL	BPQL	BPQL	BPQL	BPQL
1,2-Dichloroethane	BPQL	BPQL	BPQL	BPQL	BPQL
1,1,1-Trichloroethane	BPQL	BPQL	BPQL	BPQL	BPQL
Carbon Tetrachloride	BPQL	BPQL	BPQL	BPQL	BPQL
Bromodichloromethane	BPQL	BPQL	BPQL	BPQL	BPQL
1,2-Dichloropropane	BPQL	BPQL	BPQL	BPQL	BPQL
t-1,3-Dichloropropene	BPQL	BPQL	BPQL	BPQL	BPQL
c-1,3-Dichloropropene	BPQL	BPQL	BPQL	BPQL	BPQL
1,1,2,2-Tetrachloroethane	BPQL	BPQL	BPQL	BPQL	BPQL
1,1,2-Trichloroethane	BPQL	BPQL	BPQL	BPQL	BPQL
Tetrachloroethylene	14	2	33	1	BPQL
Benzene	BPQL	BPQL	BPQL	BPQL	BPQL
Toluene	BPQL	BPQL	BPQL	BPQL	BPQL
Ethylbenzene	BPQL	BPQL	BPQL	BPQL	BPQL
Chlorobenzene	BPQL	BPQL	BPQL	BPQL	BPQL
1,4-Dichlorobenzene	BPQL	BPQL	BPQL	BPQL	BPQL
1,3-Dichlorobenzene	BPQL	BPQL	BPQL	BPQL	BPQL
1,2-Dichlorobenzene	BPQL	BPQL	BPQL	BPQL	BPQL
Xylenes	BPQL	BPQL	BPQL	BPQL	BPQL
% Surrogate Recovery (601/602)	85/96	97/92	84/87	85/94	67/94

EPA Method 601 & 602; All results reported as ug/l or ppb.

BPQL = Below Practical Quantitation Limit.

5 ppb for Bromoform, 2-Chloroethylvinyl Ether, & Methylene Chloride  
 1 ppb for All other parameters.

**RECEIVED**

AUG 13 1991

THE JOHNSON CO., INC.  
 MONTPELIER, VERMONT

Respectfully Submitted,  
 SCITEST, INC.

*James P. Moine* for  
 Roderick J. Lamothe  
 Laboratory Director

RJL/cha



RECEIVED

JUL 16 1991

THE JOHNSON CO., INC.  
MONTPELIER, VERMONT



1-1830-1

P.O. Box 339  
Randolph, Vermont 05060-0339  
(802) 728-6343

LABORATORY REPORT

CLIENT NAME:	JOHNSON CO.	LABORATORY NO.:	853-91
ADDRESS:	5 State Street Montpelier, VT 05602	PROJECT NO.:	78611
SAMPLE:		DATE OF SAMPLE:	7/1/91
LOCATION:	Jaymar, Poultney, VT	DATE OF RECEIPT:	7/2/91
ATTENTION:	Michael Pottinger	DATE OF REPORT:	7/15/91

Jaymar, Poultney Results

(Expressed as milligrams per liter [mg/l] except as noted)

Location	Mercury
MW 1	<0.0005
MW 2	<0.0005
MW 3	<0.0005
MW 4	<0.0005

Respectfully submitted,

SCITEST, INC.

Roderick J. Lamothe  
Laboratory Director

## LABORATORY REPORT

CLIENT NAME: The Johnson Company  
 SITE LOCATION: Jaymar, Poultney, VT  
 LABORATORY NO: 853-91  
 PROJECT NO: 78611  
 ATTENTION: Michael Pottinger

DATE OF SAMPLE: 7/1/91  
 DATE OF RECEIPT: 7/2/91  
 DATE OF ANALYSIS: 7/3/91  
 DATE OF REPORT: 7/15/91

## PARAMETER

Chloromethane	BPQL
Bromoform	BPQL
Bromomethane	BPQL
Dibromochloromethane	BPQL
Vinyl Chloride	BPQL
2-Chloroethylvinyl Ether	BPQL
Chloroethane	BPQL
Methylene Chloride	BPQL
Trichloroethylene	BPQL
Trichlorofluoromethane	BPQL
1,1-Dichloroethene	BPQL
1,1-Dichloroethane	BPQL
c or t-1,2-Dichloroethylene	BPQL
Chloroform	BPQL
1,2-Dichloroethane	BPQL
1,1,1-Trichloroethane	BPQL
Carbon Tetrachloride	BPQL
Bromodichloromethane	BPQL
1,2-Dichloropropane	BPQL
t-1,3-Dichloropropene	BPQL
c-1,3-Dichloropropene	BPQL
1,1,2,2-Tetrachloroethane	BPQL
1,1,2-Trichloroethane	BPQL
Tetrachloroethylene	12
Benzene	BPQL
Toluene	2
Ethylbenzene	BPQL
Chlorobenzene	BPQL
1,4-Dichlorobenzene	BPQL
1,3-Dichlorobenzene	BPQL
1,2-Dichlorobenzene	BPQL
Xylenes	BPQL
% Surrogate Recovery	95/111

EPA Method 601 & 602; All results reported as ug/l or ppb.

BPQL = Below Practical Quantitation Limit. 1 ppb for All other parameters.

RJL/cha  
 Page 2 of 2



**Appendix D**

**November 27, 1991 Approval of Work Plan  
by Mr. David Shepard of the Vermont DEC**

Rosenblatt Cecov  
1-1830-1



# State of Vermont

Department of Fish and Wildlife  
Department of Forests, Parks and Recreation  
Department of Environmental Conservation  
State Geologist  
Natural Resources Conservation Council

AGENCY OF NATURAL RESOURCES  
Department of Environmental Conservation  
Hazardous Materials Management Div.  
103 South Main Street/West Building  
Waterbury, VT 05671-0404  
(802) 244-8702

November 27, 1991

Michael Pottinger  
The Johnson Company, Inc.  
5 State Street  
Montpelier, VT 05602

RE: Work Plan for further investigation - Debby Enterprises, Inc.

Dear Michael:

I have reviewed the work plan submitted by the Johnson Company, Inc. for further work at the Debby Enterprises, Inc. (Debby) property in Poultney, Vermont. In general, the work described is adequate to meet the stated goals of this additional investigation; better determination of the extent of contamination and a determination of the source. While the work outlined may not be adequate to definitively identify the source of contamination detected on the Debby property, it should help to determine the potential for a source on the Debby property.

Based on my review of this document, I have several comments as detailed below:

- Both the new monitoring wells and the existing wells should be surveyed so that groundwater elevations can be determined and a groundwater contour map prepared. I assume you may have planned to do this but it is not mentioned in the work plan.
- I encourage submitting any soil samples exhibiting elevated PID readings for lab analysis. This will assist in determining the presence of an onsite source and the potential need for remediation of a source area.
- An investigation of the history of the site and the surrounding area is a very good idea; I encourage as thorough an investigation as possible as this may provide valuable information for determining possible sources for the contamination detected on the Debby property.

Based upon our recent phone conversation, I understand that you are working with the Responsible Parties for the Staco site to potentially locate a well on the Staco property and that you will inform me as to the outcome of these negotiations. Please let me know when field work is scheduled. If you have any

**Appendix G**

**Hazardous Waste Generator Tax Assessment  
of Jaymar Specialty, Inc.**

**Appendix E**

**List of Hazardous Materials used  
by Jaymar Specialty, Inc.,  
Provided by the Poultney Fire Chief**

CRF

Vermont Department of Health  
 Community Right-to-Know Program  
 Administration Building, 10 Baldwin Street  
 Montpelier, Vermont 05602

COMMUNITY RIGHT-TO-KNOW REPORTING FORM

1. Company Name Jawmar Specialty Co., Inc.	2. Date 2/23/89	3. Trade Secret Claimed: Yes <input type="checkbox"/> No <input type="checkbox"/>	FOR OFFICIAL USE ONLY
4. Mailing Address 28FS Church Street	5. City, State, Zip Code Roultney, Vermont 05764	7. Phone Number (802) 287-9795	
6. Actual Site Address (if different from above)	8. Municipal (Local) Fire Department Roultney	9. Emergency Contact Della McMurry Title: Production Supervisor Work Phone: 287-9795 Home Phone: 287-9854	
10. Signature of Employer or Employer's Representative Date: 2/23/89			

11. HAZARDOUS CHEMICALS

Registry Number:  
I.D. Number:

(A) Chemical Manufacturer (Include Address)	(B) Trade Name	(C) Chemical Name(s)	(D) CAS #	(E) Location	(F) Avg. Quantity on Hand (10-100-1000)	(G) U	(H) C	(I) A	(J) L	(K) S	(L) Secret	(M) Claim
C.E. Bradley Laboratories Fire Eng. Brattleboro, VT	Red Semi-gloss Lacquer	Xylene Toluene	1330-20-7	Paint Shed Behind the plant	X							X
C.E. Bradley Lab.	Thinner	Toluene	108-88-3	Paint Shed Behind the plant	X							X
C.E. Bradley Lab.	Lacquer	Xylene Toluene	1330-20-7	Paint Shed Behind the plant	X							X
C.E. Bradley Lab.	Sealer	Xylene Toluene	108-88-3	Paint Shed Behind the plant	X							X
C.E. Bradley Lab.	Mahogany NGR Stain	Methanol	67-56-1	Paint Shed Behind the plant	Y							X
C.E. Bradley Lab.	High Gloss Lacquer	Xylene	1330-20-7	Paint Shed Behind the plant	Y							X
C.E. Bradley Lab.	Walnut Stain	Toluene	108-88-3	Paint Shed Behind the plant	Y							X
Wood's CRW Corp. S. Burlington, Vt	Prime Cut	Petroleum Oil		Steel Cutting Area	X							X
Wood's CRW Corp.	Monroe RI	Hexahydro		Steel Cutting Area								X
Environmental Chemical Glens Falls, NY	686 Solute	Methylene Aliphatic Hydrocarbon		Steel Cutting Area	X							X

**Appendix F**

**Correspondence Concerning the 1988 DEC Inspection  
of the Jaymar Specialty, Inc. Facility.**

*FORWARDED*

**JAYMAR SPECIALTY CO., INC.**

27 E. Church Street  
Wilmington, Vt. 05764  
(802) 287-9796

**MAIN OFFICE**  
3500 MARSH AVE  
LAKE SUCCESS NY 11042  
(516) 352-7676

*FIVE UNDER  
VT. FACTORY*

October 18, 1988

VT Dept. of Environmental Conservation  
Hazardous Materials Management Division  
103 South Main Street  
Waterbury, VT 05676

ATTN: Mr. Reginald A. LaRosa, Director

Dear Mr. LaRosa:

In my letter to you dated October 14th., 1988 (copy enclosed) I inadvertently failed to address section 6-509 (2)(d). I would like to correct that omission at this time by reporting that our hazardous materials operator is maintaining an inventory of all hazardous wastes currently in storage.

Please accept my apology for the omission in my original letter. If you have any questions please feel free to contact me at 287-5716.

Very Truly Yours,

*[Signature]*  
Jack Brown, Plant Manager  
Jaymar Specialty Co., Inc.

**JAYMAR SPECIALTY CO., INC.**

28 F.S. Church Street  
Poultney, Vt. 05764  
(802) 287-9796

**MAIN OFFICE**  
3000 MARCUS AVENUE  
LAKE SUCCESS, N.Y. 11042  
(516) 352-7670

October 14, 1988

VT Dept. of Environmental Conservation  
Hazardous Materials Management Division  
103 South Main Street  
Waterbury, Vermont 05676  
Att: Mr. Reginald A. LaRosa, Director

Dear Mr. LaRosa:

In response to your letter of September 7th., 1988 regarding the "Hazardous Materials" inspection of August 18th., 1988, I am pleased to report the following:

Section 6-609 (2) (a):

- 1.,2. The oil soaked speedi-dri and grinding sludges are being treated as hazardous waste.

Section 6-609 (2) (e):

- 1.,2. Daily inspections with the use of a checklist are being conducted.

Section 6-609 (2) (g):

- 1.,2.,3. Contingency Plan, training plan and documentation of Hazardous Waste Training are complete.
- 4. The Hazardous Waste Storage Area has been marked out on the floor and the appropriate warning sign hung.
- 5. Emergency spill equipment is maintained at the storage area.

I feel this completes all the modifications necessary to bring us into full compliance. If any questions should arise please feel free to contact me.

Very Truly Yours,

Jack Brown, Plant Manager  
Jaymar Specialty Co., Inc.

JE/dr

*JACK DIDN'T REPLY  
TO 6-609 (2) (d),  
but will reply  
10/18/88*

## State of Vermont

Department of Fish and Wildlife  
Department of Forests, Parks and Recreation  
Department of Environmental Conservation  
State Geologist  
Natural Resources Conservation Council



AGENCY OF NATURAL RESOURCES  
103 SOUTH MAIN STREET  
Waterbury, Vermont 05676

Department of Environmental Conservation  
**CERTIFIED MAIL**

September 7, 1988

Mr. John Brown  
Jaymar, Incorporated  
28 FS Church Street  
Poultney, Vermont 05764

RE: Notice of Violation

Dear Mr. Brown:

On August 18, 1988, a representative(s) of the Vermont Agency of Natural Resources' Hazardous Materials Management Division conducted an inspection at Jaymar, Inc. ("Jaymar") of Poultney, Vermont. At that time it was determined that Jaymar was in violation of the following Vermont Hazardous Materials Management Regulations:

Section 6-609 (2)(a):

The storage of hazardous waste shall be conducted in such a manner that no disposal shall occur.

1. Oil soaked speedi-dri was disposed to the local landfill.
2. Grinding sludges were disposed to the local landfill.

Section 6-609 (2)(d):

Each operator shall maintain a written list of all hazardous wastes currently in storage at the facility.

No list of hazardous waste in inventory was maintained.

Section 6-609 (2)(e):

Each operator shall visually inspect the facility for leaks or spills on a daily basis. A written checklist must be used and the documentation must be maintained at least three years at the facility.

1. No daily inspections were conducted.
2. No inspection checklist was used.

Mr. John Brown  
Jaymar, Incorporated  
September 7, 1988  
Page 2

Section 6-609 (2)(g):

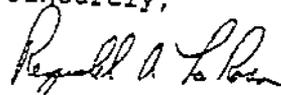
Each operator of a facility shall prepare a contingency plan for the facility, maintain all necessary emergency and safety equipment dependant on the waste type generated, provide for an initial and continuing training program for employees involved in the handling of hazardous waste, assure the integrity of tanks and containers, properly locate the waste storage area, segregate incompatible wastes and operate in accordance with all applicable provisions of 40 CFR Part 265, Subparts C, D, I, and J and 40 CFR Section 265.16 of the Federal Hazardous Materials Management Regulations.

1. No written contingency plan for hazardous waste.
2. No training plan for hazardous waste.
3. No documented hazardous waste training.
4. The hazardous waste storage area should have a sign indicating "Hazardous Waste Storage - Authorized Personnel Only" and the area must be delineated with painted lines or other markings or barriers.
5. Emergency and spill equipment must be maintained at the storage area.

Please provide written certification by October 15, 1988, verifying that the necessary modifications have been made. A follow-up inspection will be conducted shortly after this date.

I feel confident these violations will be corrected voluntarily.

Sincerely,

  
Reginald A. LaRosa, Acting Director  
Hazardous Materials Management  
Division

RAL/KBR/mlc#687

**Appendix G**

**Hazardous Waste Generator Tax Assessment  
of Jaymar Specialty, Inc.**

Vermont Agency of Natural Resources (VT ANR)  
 Department of Environmental Conservation (DEC)

HAZARDOUS MATERIALS MANAGEMENT  
 103 S. MAIN ST., WATERBURY, VT 05676  
 (802) 244-8702

HAZARDOUS WASTE GENERATOR TAX ASSESSMENT - 04/01/90 through 06/30/90

----- Mailing Address -----		----- Site Location -----
JAYMAR SPECIALTY CO., INC.		EPA ID VTD981063225
28FS CHURCH STREET		JAYMAR SPECIALTY CO., INC.
POULTNEY		28FS CHURCH STREET
VT 05764		POULTNEY VT

Manifest #	Shipped	Description of Waste	K	Rate	Qty	U	\$ Assessed
MAC857691	4/26/90	STAIN/MEOH/TOLUENE/MS	S	.210	55	G	11.550
		DEGREASING SOLVENT	S	.210	55	G	11.550
		FILTERS/PAINT PWDR/RAGS/TOLUEN	S	.210	330	G	69.300
		LEADED STEEL FILING	S	.210	110	G	23.100
AC857692		SPEEDI DRI/OIL	S	.210	55	G	11.550

TOTAL ASSESSMENT FOR THIS PERIOD - \$ 127.05

PLEASE NOTE: The 1990 session of the Vermont Legislature enacted a revision to the Hazardous Waste Generator Tax, effective July 1, 1990 through June 30, 1993:

Method of Treatment	Tax Per Gallon	Tax Per Pound
Recycled	11 cents	1.4 cents
Treatment	22 cents	2.8 cents
Storage	33 cents	4.2 cents
Land Disposal	44 cents	5.6 cents

RECEIVED

JUL 10 1991

THE JOHNSON CO., INC.  
 MONTPELIER, VERMONT

VERMONT DEPARTMENT OF TAXES  
**NOTICE OF TAXES DUE**  
 MONTPELIER, VERMONT • 05602

JAYMARR SPECIALTY COMPANY INC  
 22 CROCKER ST  
 ROCKVILLE CT NY 11570

DATE  
 08/27/90

BILL NO.  
 115253

LAST BILL NO.  
 076610

TAX CODE  
 HW 9C0600

AMOUNT NOW DUE  
 127.05

11196816801

RETURN THIS PORTION WITH PAYMENT TO VERMONT DEPT. OF TAXES

DATE  
 7/27/90

BILL NO.  
 115253

PLEASE REFER TO THIS NUMBER IN ANY CORRESPONDENCE CONCERNING THIS NOTICE. → 11196816801

KEEP THIS PORTION FOR YOUR RECORDS

TAX CODE	PERIOD ENDING YR - MO	TAX	INTEREST	PENALTY	LATE FEES	PAYMENTS	BALANCE DUE
HW	90/06	127.05	0.00	0.00	0.00	0.00	127.05

*IN CHARGING TO ROCHESTER SEPT.*

SEE ACCOMPANYING EXPLANATION SHEET

■ TOTAL ACCOUNT BALANCE ▶

127.05

SEE REVERSE SIDE FOR CODES AND APPEAL RIGHTS.  
 THIS NOTICE MAY NOT REFLECT RECENT PAYMENTS.  
 TAXES ASSESSED BY AUTHORITY OF THE COMMISSIONER OF TAXES.

**PAY THIS AMOUNT** ▶

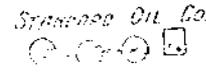
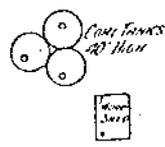
127.05

**Appendix H**

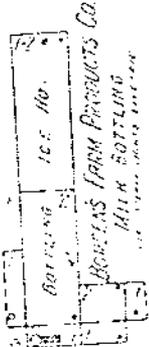
**Sanborn Fire Insurance Maps**



EELER AV.



2



RIPLEY LUMBER CO.

STORAGE

LUMBER PILE

LUMBER SHED

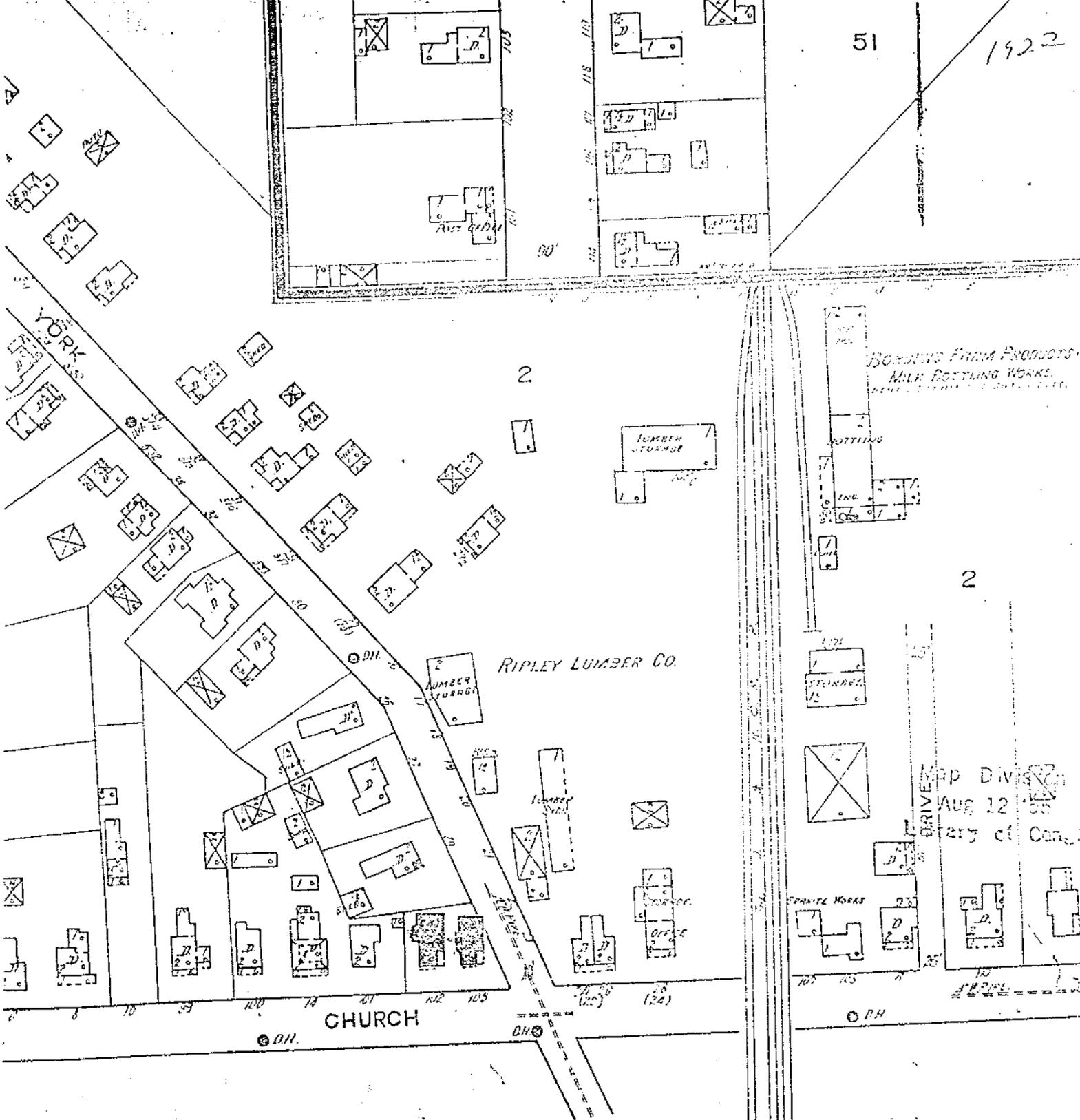
DRIVE

CHURCH

2

3





2

2

2

3

SARBON FIRE INSURANCE MAPS

300

**Appendix I**  
**Monitoring Well Logs**

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW201**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 12/26/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 8.0 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 10.0 ft.  
 Slot Size: .020

Total Pipe: 18.0 ft.  
 Stick Up: 3.3 ft.  
 Total Hole Depth: 15.0 ft.  
 Well Guard Length: 4.0 ft.  
 Initial Water Level: 10.96 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

■ = Sampled Interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3		Well Guard			
2					
1					
0		Cement			
1		Bentonite			
2					
3					
4					
5					5'-7': blows 4-3-3-6; 17" recovery; moist brown medium-fine sand
6				0.0ppm	
7		Screen			
8					
9		Sand Pack			
10					10'-12': blows 3-1-1-2; 26" recovery; 0"-8": wet brown medium-fine sand
11				0.0ppm	8"-26": moist brown medium-fine sand
12					
13					
14					
15					15'-17': blows 2-1-2-2; 24" recovery; wet gray-brown fine sand
16				0.0ppm	
17					

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW202**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 12/26/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 8.0 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 10.0 ft.  
 Slot Size: .020

Total Pipe: 18.0 ft.  
 Stick Up: 3.4 ft.  
 Total Hole Depth: 15.0 ft.  
 Well Guard Length: 4.0 ft.  
 Initial Water Level: 6.0 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

█ = Sampled Interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3	Well Guard				
2					
1					
0	Cement		•••••		
1	Bentonite		•••••		
2			•••••		
3			•••••		
4			•••••		
5		▽	•••••	0.0ppm	5'-7': blows 9-12-8-5; 27" recovery; moist brown gravelly sandy loam
6			•••••		
7			•••••		
8			•••••		
9	Sand Pack		•••••		
10			•••••	0.0ppm	10'-12': blows 7-5-6-6; 23" recovery; 0"-10": wet gray silty clay 10"-23": moist light-brown coarse sandy loam
11			•••••		
12			•••••		
13	Screen		•••••		
14			•••••		
15			•••••	0.0ppm	15'-17': blows 1-2-2-2; 27" recovery; 0"-9": wet gray silty fine sand 9"-27": wet brown fine sand
16			•••••		
17			•••••		

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW203**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 12/27/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 5.0 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 5.0 ft.  
 Slot Size: .020

Total Pipe: 10.0 ft.  
 Stick Up: -0.2 ft.  
 Total Hole Depth: 10.0 ft.  
 Well Guard Length: 4.0 ft.  
 Initial Water Level: 2.73 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

█ = Sampled Interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PiD Reading	Description
5					
4					
3					
2					
1					
0		Well Guard Cement			
1		Bentonite			
2					
3		▽			
4					
5					
6		Sand Pack		0.0ppm	5'-7': blows 7-6-9-8; 23" recovery; 0"-13": wet olive-gray silty fine sand 13"-23": wet brown fine sand
7		Screen			
8					
9					
10				0.0ppm	10'-12': blows 2-2-5-5; 27" recovery; 0"-12": wet olive-gray silty fine sand 12"-27": wet brown medium-fine sand
11					
12					
13					
14					
15					
16					
17					

The Johnson Company, Inc.  
 Environmental Sciences and Engineering  
 5 State Street  
 Montpelier, Vermont 05602

**DRILLING LOG**  
**WELL # MW204**

Project: Jaymar  
 Location: Poultney, Vermont  
 Job # 1-1830-1  
 Logged By: CRH  
 Date Drilled: 12/27/91  
 Driller: Green Mountain Boring  
 Drill Method: Hollow Stem Auger

Casing Type: PVC  
 Casing Diameter: 2.0 in.  
 Casing Length: 3.0 ft.  
 Screen Type: PVC  
 Screen Diameter: 2.0 in.  
 Screen Length: 5.0 ft.  
 Slot Size: .020

Total Pipe: 8.0 ft.  
 Stick Up: -0.2 ft.  
 Total Hole Depth: 8.0 ft.  
 Well Guard Length: 4.0 ft.  
 Initial Water Level: 0.87 ft.  
 Surface Elevation: -  
 T.O.C. Elevation: -

█ = Sampled Interval

Sheet 1 of 1

Depth (feet)	Well Construction	Notes	Geology	PID Reading	Description
5					
4					
3					
2					
1					
0	Well Guard Cement				
1	Bentonite				
2					
3					
4					
5	Sand Pack				
6	Screen			0.0ppm	5'-7': blows 8-5-6-4; 22" recovery; 0"-7": wet gray fine sand 7"-22": wet brown medium-coarse sand
7					
8				0.0ppm	8'-10': blows 2-1-1-1; 27" recovery; wet gray clayey silt-loam
9					
10					
11					
12					
13					
14					
15					
16					
17					

**Appendix J**

**Groundwater Sampling Forms**

Date: 1-2-92 Project ID: ZAYMAR 1-1830-1 (54)  
Location: Poultney, VT  
Site/Well No.: MW 101 Coded/Replicate No.: \* —  
Sampler: Warren P. Davey  
Weather: clear + 10°F Time Started: 9:25 Time Completed: 8:00

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing (PVC)  
Height of MP (Above) Below Land Surface: 2.45 MP Elevation: —  
Depth to Water Below MP: 8.06 Total Well Depth: 13.16 (incl. probe)  
Diameter of Casing: 2" Column of Water in Well: 5.10  
Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 0.816  
Gallons Pumped/Bailed Prior to Sampling: 4.0 gal.

SAMPLING DATA/FIELD PARAMETERS

Temperature: 6.8 (°C/F) Color: /  
Specific Conductance: 25 umhos/cm Odor: /  
pH: 6.38 Std. units. Appearance: /  
ORP: — mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc): —  
Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 voc. 40 ml. vials</u>	<u>none</u>
<u>/</u>	<u>/</u>	<u>/</u>

Remarks: \* MW 305 is a duplicate sample of MW 101

<sup>1</sup> Well casing volumes - Gal./ft.

1.25' = 0.077 2.00' = 0.15 3.00' = 0.32 4.00' = 0.55  
1.50' = 0.10 2.50' = 0.24 3.50' = 0.50; 5.00' = 1.05

Date: 1-2-92 Project I.D.: JAYMAR 1-1830-1 (54)  
 Location: Poultney, VT  
 Site/Well No.: NW 102 Coded/Replicate No.:       
 Sampler: Warren P. Davey  
 Weather: clear +10°F Time Started: 8:20 Time Completed: 9:00

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing (PVC)  
 Height of MP (Above/Below Land Surface): 2.18 MP Elevation:       
 Depth to Water Below MP: 9.65 Total Well Depth: 13.03  
 Diameter of Casing: 2" Column of Water in Well: 3.38  
 Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 0.5408  
 Gallons Pumped (Bailed) Prior to Sampling: 2.75 gal.

SAMPLING DATA/FIELD PARAMETERS

Temperature: 6.2 °C / 43.2 °F Color:       
 Specific Conductance: 141 umhos/cm Odor:       
 pH: 5.83 Std. units. Appearance:       
 ORP:      mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc.):     

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 voc. 40 ml. vials</u>	<u>none</u>
<u>    </u>	<u>    </u>	<u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>

Remarks:     

<sup>1</sup> Well casing volumes - Gal./ft.  
 1.25' = 0.077 2.00' = 0.15 3.00' = 0.32 4.00' = 0.55  
 1.50' = 0.10 2.50' = 0.24 3.50' = 0.50; 6.00' = 1.45

Date: 1-2-92 Project I.D.: JAYMAR 1-1830-1 (54)

Location: Poultney, VT

Site/Well No.: NW 103 Coded/Replicate No.: —

Sampler: Warren P. Davey

Weather: clear +10°F Time Started: 9:10 Time Completed: 9:45

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing PVC

Height of MP Above/Below Land Surface: 2.43 MP Elevation: —

Depth to Water Below MP: 7.15 Total Well Depth: 13.04

Diameter of Casing: 2" Column of Water in Well: 5.89

Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 0.9424

Gallons Pumped Bailed Prior to Sampling: 5.0

SAMPLING DATA/FIELD PARAMETERS

Temperature: 5.3 °C 41.5 °F Color: —

Specific Conductance: 57 umhos/cm Odor: —

pH: 6.17 Std. units. Appearance: —

ORP: — mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc): —

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 vac. 40 ml. vials</u>	<u>none</u>
<u>/</u>	<u>/</u>	<u>/</u>

Remarks: —

<sup>1</sup> Well casing volumes - Gal./ft.

1.25' - 0.077 2.00' - 0.16 3.00' - 0.32 4.00' - 0.65  
1.50' - 0.10 2.50' - 0.24 3.50' - 0.50; 6.00' - 1.46

Date: 1-2-92 Project I.D.: JAYMAR H-1830-1 (54)

Location: Poultney, VT

Site/Well No.: MW 104 Coded/Replicate No.: —

Sampler: Warren P. Davey

Weather: clear + 10°F Time Started: 10:55 Time Completed: 11:30

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing PVC

Height of MP (Above) Below Land Surface: 2.36 MP Elevation: —

Depth to Water Below MP: 6.80 Total Well Depth: 11.80

Diameter of Casing: 2" Column of Water in Well: 5.0

Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 0.80

Gallons Pumped (Bailed) Prior to Sampling: 4.0

SAMPLING DATA/FIELD PARAMETERS

Temperature: 7.0 °C/F Color: —

Specific Conductance: 124 umhos/cm Odor: —

pH: 7.35 Std. units. Appearance: —

ORP: — mv.

Parameter	Measurement	Units
-----------	-------------	-------

Other (specific ion; OVA; HNU; Etc): —

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 vac. 40 ml. vials</u>	<u>none</u>
<u>—</u>	<u>—</u>	<u>—</u>

Remarks: —

<sup>1</sup> Well casing volumes - Gal./ft.

1.25' = 0.077    2.00' = 0.18    3.00' = 0.32    4.00' = 0.55  
1.50' = 0.10    2.50' = 0.24    3.50' = 0.50;    5.00' = 1.45

Date: 1-2-92 Project I.D.: JAYMAR 1-1830-1 (54)

Location: Poultney, VT

Site/Well No.: MW 201 Coded/Replicate No.: —

Sampler: Warren P. Davey

Weather: Clear +10°F Time Started: 6:45 Time Completed: 7:20

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing PVC

Height of MP Above Below Land Surface: 2.92 MP Elevation: —

Depth to Water Below MP: 13.96 Total Well Depth: 18.02

Diameter of Casing: 2" Column of Water in Well: 4.06

Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 0.6496

Gallons Pumped Bailed Prior to Sampling: 3.25

SAMPLING DATA/FIELD PARAMETERS

Temperature: 8.9 °C/F Color: —

Specific Conductance: 254 umhos/cm Odor: —

pH: 7.49 Std. units Appearance: —

ORP: — mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc.): —

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 use, 40 ml. vials</u>	<u>none</u>
<u>/</u>	<u>/</u>	<u>/</u>

Remarks: —

<sup>1</sup> Well casing volumes - Gal./ft.

1.25' = 0.077 2.00' = 0.16 3.00' = 0.32 4.00' = 0.55  
1.50' = 0.10 2.50' = 0.24 3.50' = 0.50; 6.00' = 1.45

Date: 1-2-92 Project I.D.: JAYMAR T-1830-1 (54)

Location: Poultney, VT

Site/Well No.: MW202 Coded/Replicate No.: —

Sampler: Warren P. Davey

Weather: clear +10°F Time Started: 6:20 Time Completed: 6:40

EYACUATION DATA

Description of Measuring Point (MP): Top of well casing PVC

Height of MP (Above/Below Land Surface): 2.84 MP Elevation: —

Depth to Water Below MP: 9.28 Total Well Depth: 11.45

Diameter of Casing: 2" Column of Water in Well: 2.17

Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 0.3472

Gallons Pumped/Bailed Prior to Sampling: 2.0

SAMPLING DATA/FIELD PARAMETERS

Temperature: 11.5 °C/F Color: /

Specific Conductance: 351 umhos/cm Odor: /

pH: 7.45 Std. units. Appearance: /

ORP: — mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc.): —

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 voc. 40 ml. vials</u>	<u>none</u>
<u>/</u>	<u>/</u>	<u>/</u>

Remarks: —

<sup>1</sup> Well casing volumes - Gal./ft.

1.25" = 0.077 2.00" = 0.16 3.00" = 0.32 4.00" = 0.55  
1.50" = 0.10 2.50" = 0.24 3.50" = 0.50; 5.00" = 1.46

Date: 1-2-92 Project I.D.: JAYMAR 1-1830-1 (54)

Location: Poultney, VT

Site/Well No.: MW 203 Coded/Replicate No.: —

Sampler: Warren P. Davey

Weather: clear +10°F Time Started: 10:20 Time Completed: 10:50

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing PVC

Height of MP ~~above~~ below Land Surface: -0.29 MP Elevation: —

Depth to Water Below MP: 2.22 Total Well Depth: 8.95

Diameter of Casing: 2" Column of Water in Well: 6.73

Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 1.0768

Gallons Pumped Bailed Prior to Sampling: 5.5

SAMPLING DATA/FIELD PARAMETERS

Temperature: 6.3 °C/F Color: —

Specific Conductance: 222 umhos/cm Odor: —

pH: 7.57 Std. units. Appearance: —

ORP: — mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc): —

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 vac. 40 ml. vials</u>	<u>none</u>
<u>/</u>	<u>/</u>	<u>/</u>

Remarks: —

<sup>1</sup> Well casing volumes - Gal./ft.  
 1.25' = 0.077 2.00' = 0.16 3.00' = 0.32 4.00' = 0.65  
 1.50' = 0.10 2.50' = 0.24 3.50' = 0.50; 6.00' = 1.48

Date: 1-2-92 Project I.D.: JAYMAR 1-1830-1 (54)  
 Location: Poultney, VT  
 Site/Well No.: MW204 Coded/Replicate No.: —  
 Sampler: Warren P. Davey  
 Weather: clear +10°F Time Started: 9:50 Time Completed: 10:15

EVACUATION DATA

Description of Measuring Point (MP): Top of well casing PVC  
 Height of MP Above/Below Land Surface: -0.32 MP Elevation: —  
 Depth to Water Below MP: 0.52 Total Well Depth: 7.95  
 Diameter of Casing: 2" Column of Water in Well: 7.43  
 Gallons per Foot<sup>1</sup>: 0.16 Gallons in Well: 1.1888  
 Gallons Pumped/Bailed Prior to Sampling: 6.0

SAMPLING DATA/FIELD PARAMETERS

Temperature: 4.8 °C/F Color: —  
 Specific Conductance: 266 umhos/cm Odor: —  
 pH: 6.51 Std. units. Appearance: —  
 ORP: — mv.

Parameter Measurement Units

Other (specific ion; OVA; HNU; Etc): —

Sampling Method and Material: dedicated disposable HDPE bailer

Parameter	Container Description	Preservative
<u>601/602</u>	<u>2 voc. 40 ml. vials</u>	<u>none</u>
<u>—</u>	<u>—</u>	<u>—</u>

Remarks: —

<sup>1</sup> Well casing volumes - Gal./ft.

1.25' = 0.077 2.00' = 0.16 3.00' = 0.32 4.00' = 0.65  
 1.50' = 0.10 2.50' = 0.24 3.50' = 0.50; 5.00' = 1.48

**Appendix K**

**Laboratory Report Sheets**

1-1830-1

LABORATORY REPORT

CLIENT NAME: The Johnson Company
SITE LOCATION: Jaymar, Poultney, VT
LABORATORY NO: 2-0005
PROJECT NO: 78611
ATTENTION: Mike Rottenger

DATE OF SAMPLE: 1/2/92
DATE OF RECEIPT: 1/2/92
DATE OF ANALYSIS: 1/7-8/92
DATE OF REPORT: 1/21/92

Table with 5 columns: PARAMETER, MW 101, MW 102, MW 103, MW 104. Rows include various chemical parameters like Chloromethane, Bromoform, Bromomethane, Dibromochloromethane, Vinyl Chloride, etc., with corresponding results (mostly EPQL).

EPA Method 801 & 802: All results reported as ug/l or ppb.

EPQL = Below Practical Quantitation Limit.
5 ppb for Bromoform, 2-Chloroethylvinyl Ether.
1 ppb for All other parameters.

RECEIVED

JAN 23 1992

THE JOHNSON CO., INC.
MONTPELIER, VERMONT

Respectfully Submitted,
SCITEST, INC.

Roderick J. Lamothe

Roderick J. Lamothe
Laboratory Director



LABORATORY REPORT

CLIENT NAME: The Johnson Company  
 SITE LOCATION: Jaymar, Foultney, VT  
 LABORATORY NO: 2-0002  
 PROJECT NO: 78611  
 ATTENTION: Mike Patterson

DATE OF SAMPLE: 1/2/92  
 DATE OF RECEIPT: 1/2/92  
 DATE OF ANALYSIS: 1/7-8/92  
 DATE OF REPORT: 1/20/92

PARAMETER	MW 201	MW 202	MW 203	MW 204
Chloromethane	BPQL	BPQL	BPQL	BPQL
Bromoform	BPQL	BPQL	BPQL	BPQL
Bromomethane	BPQL	BPQL	BPQL	BPQL
Trichloromethane	BPQL	BPQL	BPQL	BPQL
Vinyl Chloride	BPQL	BPQL	BPQL	BPQL
2-Chloroethylvinyl Ether	BPQL	BPQL	BPQL	BPQL
Chloroethane	BPQL	BPQL	BPQL	BPQL
Methylene Chloride	BPQL	BPQL	11	BPQL
Trichloroethylene	BPQL	BPQL	BPQL	BPQL
Trichlorofluoromethane	BPQL	BPQL	BPQL	BPQL
1,1-Dichloroethene	BPQL	BPQL	BPQL	BPQL
1,1-Dichloroethane	BPQL	BPQL	BPQL	BPQL
c or t-1,2-Dichloroethylene	BPQL	BPQL	BPQL	BPQL
Chloroform	BPQL	BPQL	BPQL	BPQL
1,2-Dichloroethane	BPQL	BPQL	BPQL	BPQL
1,1,1-Trichloroethane	BPQL	BPQL	BPQL	BPQL
Carbon Tetrachloride	BPQL	BPQL	BPQL	BPQL
Bromodichloromethane	BPQL	BPQL	BPQL	BPQL
1,2-Dichloropropane	BPQL	BPQL	BPQL	BPQL
c-1,3-Dichloropropane	BPQL	BPQL	BPQL	BPQL
t-1,3-Dichloropropane	BPQL	BPQL	BPQL	BPQL
1,1,2,2-Tetrachloroethane	BPQL	BPQL	BPQL	BPQL
1,1,2-Trichloroethane	BPQL	BPQL	BPQL	BPQL
Tetrachloroethylene	BPQL	BPQL	BPQL	BPQL
Benzene	BPQL	BPQL	BPQL	BPQL
Toluene	BPQL	BPQL	BPQL	BPQL
Ethylbenzene	BPQL	BPQL	BPQL	BPQL
Chlorobenzene	BPQL	BPQL	BPQL	BPQL
1,4-Dichlorobenzene	BPQL	BPQL	BPQL	BPQL
1,3-Dichlorobenzene	BPQL	BPQL	BPQL	BPQL
1,2-Dichlorobenzene	BPQL	BPQL	BPQL	BPQL
Xylenes	BPQL	BPQL	BPQL	BPQL
Surrogate, C Recovery	93/92	100/84	90/82	108/89

EPA Method 801 & 802; All results reported as ug/l or ppb.

BPQL = Below Practical Quantitation Limit.

5 ppb for Bromoform, 2-Chloroethylvinyl Ether,  
 1 ppb for All other parameters.

Note: MW 202 had 10 ppb Acetone.

Page 2 of 3

JAN 09 1992

**LABORATORY REPORT**

CLIENT NAME: The Johnson Company  
 SITE LOCATION: Jaymar, Poultney, VT  
 LABORATORY NO: 2-0003  
 PROJECT NO: 78811  
 ATTENTION: Mike Pottenger

DATE OF SAMPLE: 1/2/82  
 DATE OF RECEIPT: 1/2/82  
 DATE OF ANALYSIS: 1/7-8/82  
 DATE OF REPORT: 1/20/82

PARAMETER	MW 305	Tripl. Blank	MW 206 Jan
Chloromethane	BPQL	BPQL	BPQL
Bromoform	BPQL	BPQL	BPQL
Bromomethane	BPQL	BPQL	BPQL
Dibromochloromethane	BPQL	BPQL	BPQL
Vinyl Chloride	BPQL	BPQL	BPQL
2-Chloroethylvinyl Ether	BPQL	BPQL	BPQL
Chloroethane	BPQL	BPQL	BPQL
Methylene Chloride	BPQL	BPQL	12
Trichloroethylene	BPQL	BPQL	BPQL
Trichlorofluoromethane	BPQL	BPQL	BPQL
1,1-Dichloroethene	BPQL	BPQL	BPQL
1,1-Dichloroethane	BPQL	BPQL	BPQL
c or t-1,2-Dichloroethylene	BPQL	BPQL	BPQL
Chloroform	BPQL	BPQL	BPQL
1,2-Dichloroethane	BPQL	BPQL	BPQL
1,1,1-Trichloroethane	BPQL	BPQL	BPQL
Carbon Tetrachloride	BPQL	BPQL	BPQL
Bromodichloromethane	BPQL	BPQL	BPQL
1,2-Dichloropropane	BPQL	BPQL	BPQL
c-1,3-Dichloropropene	BPQL	BPQL	BPQL
t-1,3-Dichloropropene	BPQL	BPQL	BPQL
1,1,2,2-Tetrachloroethane	BPQL	BPQL	BPQL
1,1,2-Trichloroethane	BPQL	BPQL	BPQL
Tetrachloroethylene	BPQL	BPQL	BPQL
Benzene	BPQL	BPQL	BPQL
Toluene	BPQL	BPQL	BPQL
Ethylbenzene	BPQL	BPQL	BPQL
Chlorobenzene	BPQL	BPQL	BPQL
1,4-Dichlorobenzene	BPQL	BPQL	BPQL
1,3-Dichlorobenzene	BPQL	BPQL	BPQL
1,2-Dichlorobenzene	BPQL	BPQL	BPQL
Nylenes	BPQL	BPQL	BPQL
Surrogate, % Recovery	101/75	102/87	113/84

EPA Method 801 & 802; All results reported as ug/l or ppb.

BPQL = Below Practical Quantitation Limit.

5 ppb for Bromoform, 2-Chloroethylvinyl Ether.

1 ppb for All other parameters.

**RECEIVED**

JAN 23 1982

THE JOHNSON COMPANY



**Appendix L**

**Vermont Department of Health Analytical Information  
Concerning the Poultney Municipal Water Supply**

Vermont Department of Health  
 50 Main Street P.O.B. 70  
 Burlington, Vermont 05401

SANITARY SURVEY  
 OF  
 PUBLIC WATER SUPPLY

Date of Survey: 8/10/88  
 7/23/88  
 WSID # 522788

Community or  Non-Community

System Name Poultney Water Dept. Town Poultney

Mailing Address Poultney, VT.

Type of Permit: Full  Conditional  None  Year Const.

Person Interviewed Charles Shenkel Title Village Mgr. Telephone (work) 287-4003 (home)

Address \_\_\_\_\_

FACILITIES (50 points maximum)

A. SYSTEM INTEGRITY (25 points maximum)

a. Ground Water Supply \*\*

Col. No.	Item	No. Well(s)	No. Spring(s)	Max. Pts.	Points
6.	Inadequate Source Protection			8	
7.	Inadequate Source Construction			7	
*8.	Inadequate Chlorine Capability			3	
				Total Points	18

b. Surface Water Supply \*\*

Col. No.	Item	No. Stream(s)	No. Inpnt.	Max. Pts.	Points
10.	Inadequate Source Protection			8	
11.	Inadequate Filtration			10	
				Total Points	18

c. Storage

13.	Inadequate Finished Storage Construction			5	
				System Integrity Total	25

B. SYSTEM CAPACITY (25 points maximum)

Col. No.	Item	Ground Water	Surface Water	Max. Pts.	Points
14.	Inadequate Source			10	
15.	Inadequate Trans/Dist.			8	
16.	Inadequate Storage Vol.			6	
17.	No Alternate or Emerg. Source			1	
				System Capacity Total	25
				TOTAL FACILITIES POINTS	50

\* For all Public Community Water Systems and for Non-Community Water Systems when required.

\*\* Place check mark in applicable column(s).

2. Capacity of source and method of estimation

3. Raw water intake (condition of dam, pumping facilities, etc.)

II. DESCRIPTION OF EMERGENCY SOURCES AND METHOD OF CONNECTION.

III. TREATMENT

A. Ground water (iron/manganese  , softener  , H<sub>2</sub>S  , pH adjustment  ; describe the facilities, include model and brand name of equipment.)

B. Surface water - describe the filtration process, chemical feed dosages, filter rates, raw and finished water turbidity.

C. How is the filter back-washed? What is the back-wash flow rate?

IV. CHLORINATION

A. Describe the chlorination facilities (method, location, contact time and how it is achieved).

Chlorination by liquid Chlorine. Cl<sub>2</sub> ~~same~~ pump goes on automatically with well pump, ~ 20 min. contact time on both sources.

- c. Distribution Pipes  
Description of pipe sizes, type, age, and integrity. Are any blow-off valves or hydrants connected to the system?

Distribution pipes made of ductal + cast iron.  
12" main feed to 10"-2" lines.

VII. SERVICE AREA

- A. Describe the service area, number of connections, type of connections, and population.

town water supply, 464 connections, pop. 2,700.

- B. Estimate the average day and peak day demands. How is this arrived at?

average daily use: 200,000 gal  
peak use: 280,000 gal.

VIII. OPERATION AND MAINTENANCE

- A. Operators and Certification:

<u>Name</u>	<u>Title</u>	<u>Certified</u>	<u>Class</u>	<u>Telephone</u>
<u>Charles Shentel</u>	<u>Village Manager</u>	<u>not certified</u>		<u>287-4003</u>

- B. Name and Address of the owner:

C. Hours of coverage: \_\_\_\_\_

D. Is there a flushing program? \_\_\_\_\_

E. Are the valves and equipment exercised regularly? \_\_\_\_\_

F. Are there record drawings of the water system available? yes

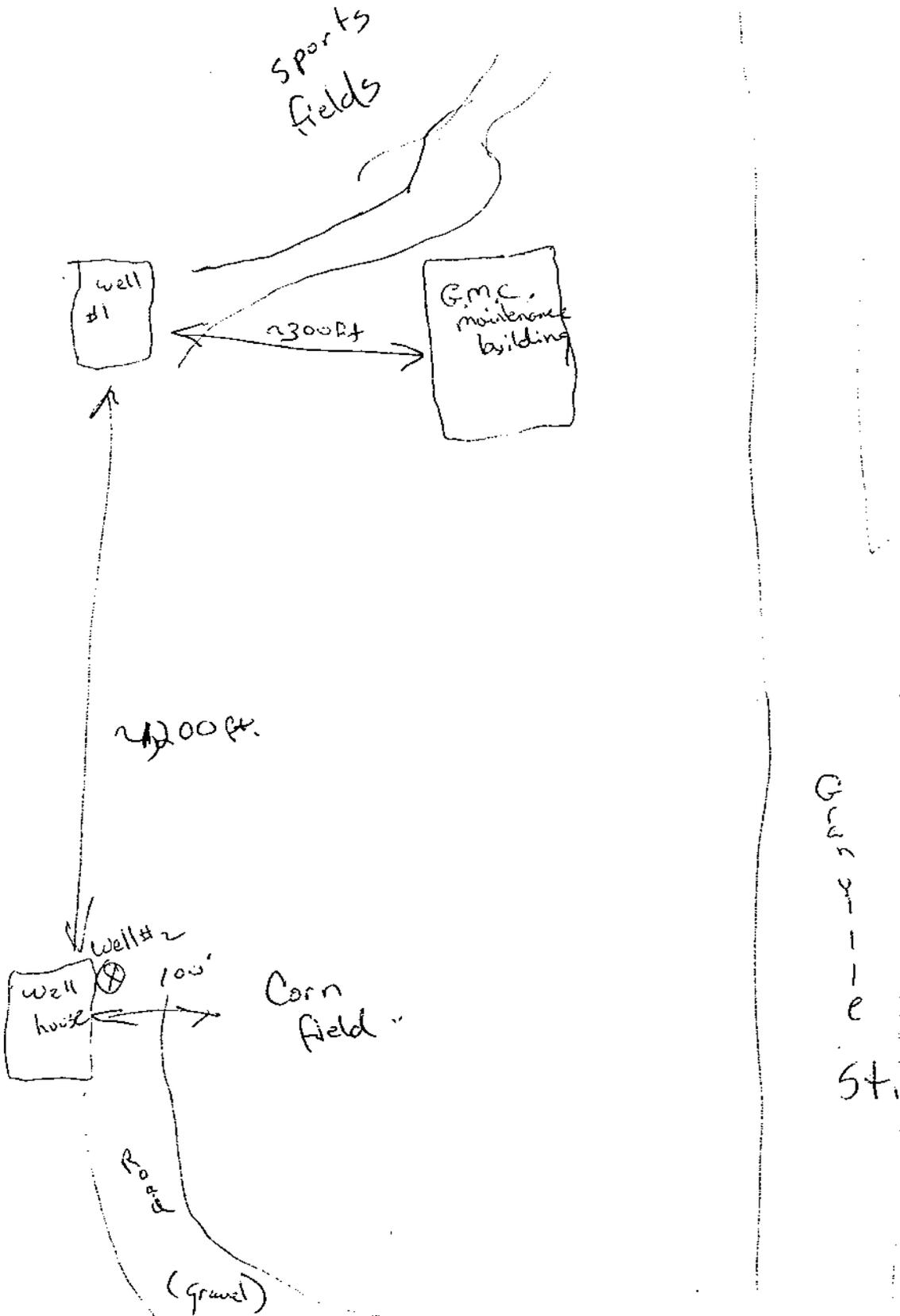
G. Is there a cross connection program? No known X-connections

H. Has an emergency plan been developed? \_\_\_\_\_

I. Emergencies within the past three years (water outage, water main break, water contamination, etc.)

XI. Sketch of System

All distances estimated, not drawn to scale.





ORGANIC CHEMICAL ANALYSIS OF PUBLIC WATER SYSTEM

000 10/15

POULTNEY	WATER SYSTEM NAME & ADDRESS POULTNEY VILLAGE WELL #2	WSID 5227
SPECIFIC SAMPLE LOCATION WELL #2	SAMPLES TAKEN 9:35 am 10/15/91	
PURPOSE OF SAMPLE <input type="checkbox"/> ROUTINE <input type="checkbox"/> QUARTERLY <input type="checkbox"/> MAXIMUM THM POTENTIAL <input checked="" type="checkbox"/> SPECIAL	SAMPLER NAME & TITLE MARTIN DEVLIN HO 5 CHURCH ST POULTNEY VT	CURRENT CHLORINE RESIDUAL _____ MG/L FREE _____ MG/L TOTAL
TYPE OF SAMPLE <input checked="" type="checkbox"/> SOURCE <input type="checkbox"/> DISTRIBUTION <input type="checkbox"/> MAXIMUM RESIDENCE TIME <input type="checkbox"/> NORMAL RESIDENCE TIME <input type="checkbox"/> OTHER	PRE-CHLORINATION _____ LBS./DAY	DATE OF SAMPLE _____ O'CLOCK AM PM
TESTS BY SAMPLER	REMARKS BY LABORATORY HCl 10/16/91 (6 samples) received gr	

MAXIMUM CONTAMINANT LEVEL	LABORATORY REPORT	MG/L = MILLIGRAMS PER LITER PPM = PARTS PER MILLION
<input type="checkbox"/> TOTAL TRIHALOMETHANES	_____	_____
<input type="checkbox"/> CHLOROFORM	_____	_____
<input type="checkbox"/> DIBROMOCHLOROMETHANE	_____	_____
<input type="checkbox"/> BROMODICHLOROMETHANE	_____	_____
<input type="checkbox"/> BROMOFORM	_____	_____
<input type="checkbox"/> TRICHLOROETHYLENE	_____	_____
<input type="checkbox"/> TETRACHLOROETHYLENE	_____	_____
<input type="checkbox"/> 1,1,1-TRICHLOROETHANE	_____	_____
<input type="checkbox"/> 1,2-DICHLOROETHANE	_____	_____
<input type="checkbox"/> 1,1,2,2-TETRACHLOROETHANE	_____	_____
<input type="checkbox"/> CARBON TETRACHLORIDE	_____	_____
<input type="checkbox"/> METHYLENE CHLORIDE	_____	_____
<input type="checkbox"/> BENZENE	_____	_____
<input type="checkbox"/> TOLUENE	_____	_____
<input type="checkbox"/> XYLENES	_____	_____
<input type="checkbox"/> CHLORO BENZENE	_____	_____
<input type="checkbox"/> ETHYL BENZENE	_____	_____
<input type="checkbox"/> 1,2-DICHLOROETHENE	_____	_____
<input type="checkbox"/> 1,1-DICHLOROETHANE	_____	_____

REC'D V92-0114 TIME \_\_\_\_\_ DATE REPORTED \_\_\_\_\_  
 LAB. V92-0114 LABORATORY DIRECTOR \_\_\_\_\_

ORGANIC CHEMICAL ANALYSIS OF PUBLIC WATER SYSTEM

NOV 1991

DOULTNEY		WATER SYSTEM DOULTNEY VILLAGE WELL #1		WSID 5227	
SPECIFIC SAMPLE LOCATION		WELL #1 SAMPLES		SAMPLES TAKEN 9:15 10/15/91	
TYPE OF SAMPLE		SAMPLER NAME MARTIN DEULIN HO 5 SCHUYLER ST DOULTNEY VT			
<input type="checkbox"/> ROUTINE <input checked="" type="checkbox"/> QUARTERLY <input type="checkbox"/> MAXIMUM THM POTENTIAL <input checked="" type="checkbox"/> SPECIAL		CURRENT CHLORINE RESIDUAL			
		_____ MG/L FREE			
		_____ MG/L TOTAL			
SOURCE OF SAMPLE		PRE-CHLORINATION			
<input checked="" type="checkbox"/> SOURCE <input checked="" type="checkbox"/> DISTRIBUTION <input type="checkbox"/> MAXIMUM RESIDENCE TIME <input type="checkbox"/> NORMAL RESIDENCE TIME <input type="checkbox"/> OTHER		_____ LBS./DAY			
		DATE OF SAMPLE 10/15/91			
		TIME 9:15 O'CLOCK AM PM			
ANALYSES BY SAMPLER		REMARKS BY LABORATORY			
		10/16/91 6 samples received HCl Send Results Phil Jones			

MAXIMUM CONTAMINANT LEVEL ANALYSES REQUESTED	LABORATORY REPORT	MG/L = MILLIGRAMS PER LITER	PPM = PARTS PER MILLION
<input type="checkbox"/> TOTAL TRIHALOMETHANES	_____	<input type="checkbox"/> METHYLENE CHLORIDE	_____
<input type="checkbox"/> CHLOROFORM	_____	<input type="checkbox"/> BENZENE	_____
<input type="checkbox"/> DIBROMOCHLOROMETHANE	_____	<input type="checkbox"/> TOLUENE	_____
<input checked="" type="checkbox"/> BROMODICHLOROMETHANE	_____	<input type="checkbox"/> XYLENES	_____
<input type="checkbox"/> BROMOFORM	_____	<input type="checkbox"/> CHLORO BENZENE	_____
<input type="checkbox"/> TRICHLOROETHYLENE	_____	<input type="checkbox"/> ETHYL BENZENE	_____
<input type="checkbox"/> TETRACHLOROETHYLENE	_____	<input type="checkbox"/> 1,2-DICHLOROETHENE	_____
	_____	<input type="checkbox"/>	_____
	_____	<input type="checkbox"/> 1,1-DICHLOROETHANE	_____
<input type="checkbox"/> 1,1,1-TRICHLOROETHANE	_____		_____
<input type="checkbox"/> 1,2-DICHLOROETHANE	_____		_____
	_____		_____
<input type="checkbox"/> 1,1,2,2-TETRACHLOROETHANE	_____		_____
<input checked="" type="checkbox"/> CARBON TETRACHLORIDE	_____		_____

V92-0115

TIME \_\_\_\_\_ DATE REPORTED \_\_\_\_\_

V92-0115 LABORATORY DIRECTOR \_\_\_\_\_



State of Vermont

AGENCY OF HUMAN SERVICES

DEPARTMENT OF HEALTH  
Laboratory  
195 Colchester Ave.  
PO Box 70  
Burlington, VT 05402-0070  
(802) 863-7335

ANALYSIS FOR HERBICIDES

Laboratory Number: M90-188

Analyst: JFH/MJS

5227 Poaltney

Analysis Date: 7/19/90

Preservative: Sodium thiosulfate, yes or no

\*\*\*\*\* LABORATORY RESULTS \*\*\*\*\*

<u>Compound</u>	<u>Concentration(ppb)</u>
2,4-Dichlorophenoxyacetic acid (2,4-D)	< 0.2
2-(2,4,5-Trichlorophenoxy)propionic acid (Silvex)	< 0.08

Method Detection Limit(MDL)

MDL = 0.2 ppb for 2,4-D

MDL = 0.08 ppb for Silvex

ppb = parts per billion (micrograms per liter)

Method: Standard Methods for the Examination Water  
and Wastewater, American Public Health Association  
16<sup>th</sup> Edition, 1985

Report Date: *ME* SEP 07 1990

This is a public record. Information contained in this record may be used for statistical purposes, and may be released upon request, pursuant to Vermont access to public documents law (1. V.S.A. 315 and following sections).

WSED

ORGANIC CHEMICAL ANALYSIS OF PUBLIC WATER SUPPLY

863-7335

TOWN Town of Poultney

WATER SYSTEM  
NAME & ADDRESS

8688 Main St. 05764

WSID  
5227

SPECIFIC SAMPLE  
LOCATION East Poultney

PURPOSE OF SAMPLE

- ROUTINE
- QUARTERLY
- MAXIMUM THM POTENTIAL
- SPECIAL

SAMPLER NAME Martin Reelin  
 & TITLE Health Officer  
 CURRENT CHLORINE RESIDUAL 90 OCT 16 PM 4 08  
 \_\_\_\_\_ MG/L FREE  
 \_\_\_\_\_ MG/L TOTAL

TYPE OF SAMPLE

- SOURCE Sp
- DISTRIBUTION
- MAXIMUM RESIDENCE TIME
- NORMAL RESIDENCE TIME
- OTHER

PRE-CHLORINATION  
 \_\_\_\_\_ LBS./DAY

DATE OF SAMPLE 10/16/90  
 TIME 9:39 AM O'CLOCK AM PT

REMARKS BY SAMPLER

Don Williams  
9:39 AM - 10/16/90

REMARKS BY LABORATORY HCL

MCL - MAXIMUM CONTAMINANT LEVEL  
CHECK ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
PPM = PARTS PER MILLION

- TOTAL TRIHALOMETHANES \_\_\_\_\_
- CHLOROFORM \_\_\_\_\_
- DIBROMOCHLOROMETHANE \_\_\_\_\_
- BROMODICHLOROMETHANE \_\_\_\_\_
- BROMOFORM \_\_\_\_\_
- TRICHLOROETHYLENE \_\_\_\_\_
- TETRACHLOROETHYLENE \_\_\_\_\_
- 1,1,1-TRICHLOROETHANE \_\_\_\_\_
- 1,2-DICHLOROETHANE \_\_\_\_\_
- 1,1,2,2-TETRACHLOROETHANE \_\_\_\_\_
- CARBON TETRACHLORIDE \_\_\_\_\_

- METHYLENE CHLORIDE \_\_\_\_\_
- BENZENE \_\_\_\_\_
- TOLUENE \_\_\_\_\_
- XYLENES \_\_\_\_\_
- CHLORO BENZENE \_\_\_\_\_
- ETHYL BENZENE \_\_\_\_\_
- 1,2-DICHLOROETHENE \_\_\_\_\_
- 1,1-DICHLOROETHANE \_\_\_\_\_

V91-0058

DATE REC'D

V91-0058

TIME

DATE REPORTED

NOV 09 1990

LAR NUMBER

ORGANIC CHEMICAL ANALYSIS OF PUBLIC WATER SUPPLY

863-7335

TOWN Town of Paultrey WATER SYSTEM NAME & ADDRESS 86-88 Main St. 05764 WSID 5227

SPECIFIC SAMPLE LOCATION East Paultrey SAMPLER NAME & TITLE Martin Paulin  
 PURPOSE OF SAMPLE 10/16/90 PM 4 03

- ROUTINE
- QUARTERLY
- MAXIMUM THM POTENTIAL
- SPECIAL

CURRENT CHLORINE RESIDUAL  
 \_\_\_\_\_ MG/L FREE  
 \_\_\_\_\_ MG/L TOTAL

TYPE OF SAMPLE  
 SOURCE Tap  
 DISTRIBUTION  
 MAXIMUM RESIDENCE TIME  
 NORMAL RESIDENCE TIME  
 OTHER

PRE-CHLORINATION  
 \_\_\_\_\_ LBS./DAY

DATE OF SAMPLE 10/16/90  
 TIME 9:56 O'CLOCK (AM) P

REMARKS BY SAMPLER  
Terry & Lorena Williams

REMARKS BY LABORATORY HCL

MCL - MAXIMUM CONTAMINANT LEVEL  
 CHECK ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
 PPM = PARTS PER MILLION

- |   |       |  |       |
|---|-------|--|-------|
| <input checked="" type="checkbox"/> TOTAL TRIHALOMETHANES     | _____ | <input checked="" type="checkbox"/> METHYLENE CHLORIDE | _____ |
| <input checked="" type="checkbox"/> CHLOROFORM                | _____ | <input checked="" type="checkbox"/> BENZENE            | _____ |
| <input checked="" type="checkbox"/> DIBROMOCHLOROMETHANE      | _____ | <input checked="" type="checkbox"/> TOLUENE            | _____ |
| <input checked="" type="checkbox"/> BROMODICHLOROMETHANE      | _____ | <input checked="" type="checkbox"/> XYLENES            | _____ |
| <input checked="" type="checkbox"/> BROMOFORM                 | _____ | <input checked="" type="checkbox"/> CHLORO BENZENE     | _____ |
| <input checked="" type="checkbox"/> TRICHLOROETHYLENE         | _____ | <input checked="" type="checkbox"/> ETHYL BENZENE      | _____ |
| <input checked="" type="checkbox"/> TETRACHLOROETHYLENE       | _____ | <input checked="" type="checkbox"/> 1,2-DICHLOROETHENE | _____ |
| <input checked="" type="checkbox"/> 1,1,1-TRICHLOROETHANE     | _____ | <input checked="" type="checkbox"/> 1,1-DICHLOROETHANE | _____ |
| <input checked="" type="checkbox"/> 1,2-DICHLOROETHANE        | _____ |  | _____ |
| <input checked="" type="checkbox"/> 1,1,2,2-TETRACHLOROETHANE | _____ |  | _____ |
| <input checked="" type="checkbox"/> CARBON TETRACHLORIDE      | _____ |  | _____ |

DATE REC'D V91-0059 TIME \_\_\_\_\_ DATE REPORTED NOV 09 1990  
 LAB NUMBER V91-0059 LABORATORY DIRECTOR \_\_\_\_\_



State of Vermont

AGENCY OF HUMAN SERVICES

DEPARTMENT OF HEALTH
Laboratory
195 Colchester Ave.
PO Box 70
Burlington, VT 05402-0070
(802) 863-7335

ANALYSIS of WATER for VOLATILE ORGANIC COMPOUNDS

\*\*\*\*\*LABORATORY RESULTS\*\*\*\*\*

LAB NUMBER: V91-0058

ANALYST: JFH

ANALYSIS DATE: 10/30/90

COMMENTS: Results of tests for all compounds listed below indicated that none were detected.

NOTE: See field form for sample information.

\*\*\*\*\*

The analysis performed on the water samples for volatile organic compounds includes testing for the following:

Table with 4 columns: COMPOUND, POL, COMPOUND, POL. Lists various organic compounds and their corresponding Practical Quantitation Limits (PQL).

PQL=Current Practical Quantitation Limit in ppb (parts per billion). (micrograms/liter)

Date of Report: NOV 09 1990

Method: EPA Method 524.2 (GC/MS)

This is a public record. Information contained in this record may be used for statistical purposes, and may be released upon request, pursuant to Vermont access to public documents law (1. V.S.A. 315 and following sections).

PQL's updated 11/05/90



DEPARTMENT OF HEALTH
Laboratory
195 Colchester Ave.
PO Box 70
Burlington, VT 05402-0070
(802) 863-7335

ANALYSIS of WATER for VOLATILE ORGANIC COMPOUNDS

\*\*\*\*\*LABORATORY RESULTS\*\*\*\*\*

LAB NUMBER: V91-0059

ANALYST: JFH

ANALYSIS DATE: 10/30/90

COMMENTS: Results of tests for all compounds listed below indicated that none were detected.

NOTE: See field form for sample information.

\*\*\*\*\*

The analysis performed on the water samples for volatile organic compounds includes testing for the following:

Table with 4 columns: COMPOUND, PQL, COMPOUND, PQL. Lists various organic compounds and their corresponding PQL values in parentheses.

PQL=Current Practical Quantitation Limit in ppb (parts per billion) (micrograms/liter)

Date of Report: NOV 09 1990

Method: EPA Method 524.2 (GC/MS)

Handwritten initials 'MC'

This is a public record. Information contained in this record may be used for statistical purposes, and may be released upon request, pursuant to Vermont access to public documents law (1. V.S.A. 315 and following sections).

PQL's updated 11/05/90



State of Vermont

AGENCY OF HUMAN SERVICES

VERMONT DEPARTMENT OF HEALTH  
Division of Environmental Health  
60 Main Street, P.O. Box 70  
Burlington, Vermont 05402  
Telephone: (802) 863-7220

November 26, 1990

RE: Volatile Organic Chemical Results

Dear Water Supplier:

Samples of your drinking water were recently collected by the Vermont Department of Health in order to test for volatile organic chemicals (VOC's). Please find enclosed a photocopy of your lab form. No VOC's were found in your water sample.

If you have any questions or comments regarding your water quality, please call or write the Vermont Department of Health, Division of Environmental Health. Our toll free number is 1-800-439-8550.

Sincerely,

Karen Creighton  
Water Supply Compliance Coordinator

KC:jta

Enclosure



State of Vermont

AGENCY OF HUMAN SERVICES

VERMONT DEPARTMENT OF HEALTH  
Division of Environmental Health  
60 Main Street, P.O. Box 70  
Burlington, Vermont 05402  
Telephone: (802) 863-7220

November 26, 1990

RE: Volatile Organic Chemical Results

Dear Water Supplier:

Samples of your drinking water were recently collected by the Vermont Department of Health in order to test for volatile organic chemicals (VOC's). Please find enclosed a photocopy of your lab form. No VOC's were found in your water sample.

If you have any questions or comments regarding your water quality, please call or write the Vermont Department of Health, Division of Environmental Health. Our toll free number is 1-800-439-8550.

Sincerely,

Karen Creighton  
Water Supply Compliance Coordinator

KC:jta

Enclosure



State of Vermont

AGENCY OF HUMAN SERVICES

VERMONT DEPARTMENT OF HEALTH  
Division of Environmental Health  
60 Main Street, P.O. Box 70  
Burlington, Vermont 05402  
Telephone: (802) 863-7220

February 21, 1989

Mr. Charles Shenkel  
Poultney Water Dept.  
P.O. Box 121  
Poultney, VT 05764

RE: Volatile Organic Chemical Results  
WSID 5227 Poultney Water Dept.

Dear Mr. Shenkel:

Samples of your drinking water were recently collected by the Vermont Department of Health in order to test for volatile organic chemicals (VOC's). Please find enclosed a photocopy of your lab form. No VOC's were found in your water sample.

If you have any questions or comments regarding your water quality, please call or write the Vermont Department of Health, Division of Environmental Health. Our toll free number is 800-642-3323.

Sincerely,

A handwritten signature in cursive script, appearing to read "Stephen J. Znamierowski".

Stephen J. Znamierowski  
Compliance Coordinator

SJZ:jta

Enc: Lab Analysis Sheet



State of Vermont

file 5227  
AGENCY OF HUMAN SERVICES

VERMONT DEPARTMENT OF HEALTH  
Division of Environmental Health  
60 Main Street, P.O. Box 70  
Burlington, Vermont 05402  
Telephone: (802) 863-7220

March 11, 1988

Mr. Edward J. Savage, Resp. Person  
Poultney Water System  
P.O. Box 121  
Poultney, VT 05764

RE: Volatile Organic Chemical Results

Dear Mr. Savage:

Samples of your drinking water were recently collected by the Vermont Department of Health in order to test for volatile organic chemicals (VOC's). Please find enclosed a photocopy of your lab form. No VOC's were found in your water sample.

If you have any questions or comments regarding your water quality, please call or write the Vermont Department of Health, Division of Environmental Health. Our toll free number is 800-642-3323.

Sincerely,

Kenneth E. Bannister  
Hydrogeologist

KEB/blm

Enc: Lab Analysis Sheet  
cc: Martin E. Devlin, Health Officer  
Kenneth Bannister  
Cairole Bernstein





Vermont Department of Health Laboratory  
195 Colchester Ave., Burlington, VT 05402-0070  
863-7336

88 JUL 22 AM 9 00  
Shaded areas for lab use only

VT. DEPT. OF HEALTH LAB  
C88 2131  
C88 2131

### INORGANIC CHEMICAL EXAMINATION OF PUBLIC WATER SUPPLY

Sampling instructions on reverse side

USER CODE [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Lab. No.

SAMPLER'S ADDRESS <i>Poultney Water System Poultney, VT</i>		Chain of Custody	Date	Name
		Collected/Sealed	<i>7-21-88</i>	<i>Ron Orzell</i>
		Received/Seal Intact		
		Analyzed		

WSID <i>5227</i>	Town <i>Poultney</i>	Water System Name <i>Poultney Sys</i>	Sample Location <i>Well House #1</i>
---------------------	-------------------------	--	---

Sampler Name <i>Ron Orzell</i>	Sampler's Title: (check one) <input checked="" type="checkbox"/> Sanitizer Operator <input type="checkbox"/> Health Officer <input type="checkbox"/> Health Department <input type="checkbox"/> Other
-----------------------------------	---

Purpose of Sample <input checked="" type="checkbox"/> Compliance <input type="checkbox"/> Check Sample <input type="checkbox"/> Other	Type of Sample <input type="checkbox"/> Source <input checked="" type="checkbox"/> Distribution <input type="checkbox"/> Other	Field Data Chlorine Residual: <i>1.2</i> mg/l Free Cl <i>1.2</i> mg/l Total Cl <input type="checkbox"/> Not Chlorinated <input type="checkbox"/> Not Measured	Collection Data Date <i>7, 21, 88</i> MO DAY YR Time <i>11:00</i> P.M. (Circle A.M. or P.M.)
--	---	---	--

Sampler Remarks <i>First Sample for Lead + Copper.</i>	Laboratory Remarks <i>(S) Pb, Cu only</i>
---	--

New System or New Source  
 Special

< = Less Than  
> = Greater Than

### LABORATORY RESULTS

PRIMARY STANDARDS  
PHYSICAL  
TURBIDITY

SECONDARY STANDARDS  
PHYSICAL  
pH

INORGANIC CHEMICALS	mg/l (ppm)	MCL
<i>#1</i> LEAD	<i>0.036</i>	0.05
ARSENIC		0.05
CADMIUM		0.01
BARIUM		1.0
NITRATE		10.0
MERCURY		0.002
FLUORIDE		4.0
SODIUM		20.0

INORGANIC CHEMICALS	mg/l (ppm)	MCLG
HARDNESS AS CaCO <sub>3</sub>		
<i>#1</i> COPPER	<i>0.35</i>	1.0
IRON		0.3
MANGANESE		0.05
ZINC		5.0
CHLORIDE		250.0

NEW PUBLIC SYSTEMS OR SPECIAL REQUEST ONLY

SELENIUM		0.01
SILVER		0.05
CHROMIUM		0.05
FOAMING AGENTS		0.5

SPECIAL REQUEST ONLY

NITRITE

OTHER ANALYSES

Date Reported *8-18-88*

Laboratory Director

ORGANIC CHEMICAL ANALYSIS OF PUBLIC WATER SUPPLY

863-7335

TOWN Poultney WATER SYSTEM Poultney Water System WSID 5227  
 NAME & ADDRESS Poultney VT  
 SPECIFIC SAMPLE LOCATION Well House Tap at Well #1 V.O.C.

PURPOSE OF SAMPLE

- ROUTINE
- QUARTERLY
- MAXIMUM THM POTENTIAL
- SPECIAL

SAMPLER NAME & TITLE Ron Orzell S2H,

CURRENT CHLORINE RESIDUAL

\_\_\_\_\_ MG/L FREE  
Trace MG/L TOTAL

TYPE OF SAMPLE

- SOURCE
- DISTRIBUTION
- MAXIMUM RESIDENCE TIME
- NORMAL RESIDENCE TIME
- OTHER

PRE-CHLORINATION

\_\_\_\_\_ LBS./DAY NONE

DATE OF SAMPLE 7-21-88

TIME 11:00 O'CLOCK (AM) PH

REMARKS BY SAMPLER

Full SPWA Test

REMARKS BY LABORATORY

MCL - MAXIMUM CONTAMINANT LEVEL  
 CHECK ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
 PPB = PARTS PER BILLION

TOTAL TRIHALOMETHANES \_\_\_\_\_

CHLOROFORM \_\_\_\_\_

DIBROMOCHLOROMETHANE \_\_\_\_\_

BROMODICHLOROMETHANE \_\_\_\_\_

BROMOFORM \_\_\_\_\_

TRICHLOROETHYLENE \_\_\_\_\_

TETRACHLOROETHYLENE \_\_\_\_\_

Styrene \_\_\_\_\_

1,1,2-trichloroethane \_\_\_\_\_

1,1,1-TRICHLOROETHANE \_\_\_\_\_

1,2-DICHLOROETHANE \_\_\_\_\_

CARBON TETRACHLORIDE \_\_\_\_\_

METHYLENE CHLORIDE \_\_\_\_\_

BENZENE \_\_\_\_\_

TOLUENE \_\_\_\_\_

XYLENES \_\_\_\_\_

CHLORO BENZENE \_\_\_\_\_

ETHYL BENZENE \_\_\_\_\_

cis-1,2-DICHLOROETHENE \_\_\_\_\_

p-dichlorobenzene \_\_\_\_\_

1,1-DICHLOROETHANE \_\_\_\_\_

JUL 22 AM 9 00  
 WATER RESOURCES LAB

REC'D NUMBER V88-0963 TIME \_\_\_\_\_ DATE REPORTED \_\_\_\_\_

LABORATORY DIRECTOR V88-0963



State of Vermont

AGENCY OF HUMAN SERVICES

DEPARTMENT OF HEALTH

Laboratory
195 Colchester Avenue
PO Box 70
Burlington, VT 05402-0070
(802) 863-7335

ANALYSIS of WATER for VOLATILE ORGANIC COMPOUNDS

\*\*\*\*\*LABORATORY RESULTS\*\*\*\*\*

LAB NUMBER: V88-00963 ANALYST: JPC ANALYSIS DATE:08/02/88

COMMENTS: Results of tests for the compounds listed below indicated that none were present in concentrations greater than the reporting limit (ie, the PQL).

NOTE: See field form for sample information.
\*\*\*\*\*

The analysis performed on the water samples for volatile organic compounds includes testing for the following:

Table with 4 columns: COMPOUND, PQL, COMPOUND, PQL. Lists various organic compounds and their corresponding PQL values in parentheses.

PQL=Current Practical Quantitation Limit; ppb=parts/billion (micrograms/liter)

Date of Report: 02/01/89 Method: EPA Method 524.2 (GC/MS)

This is a public record. Information contained in this record may be used for statistical purposes, and may be released upon request, pursuant to Vermont access to public documents law (I V.S.A. § 315 and following sections).

TOWN Poultney WATER SYSTEM NAME & ADDRESS Poultney Water System WSID 5227

SPECIFIC SAMPLE LOCATION West Dinette, Main Street, Mensroom, cold tap

PURPOSE OF SAMPLE  
 ROUTINE  
 QUARTERLY  
 MAXIMUM THM POTENTIAL  
 SPECIAL \_\_\_\_\_

SAMPLER NAME & TITLE Bannister  
 CURRENT CHLORINE RESIDUAL  
 \_\_\_\_\_ MG/L FREE not measured  
 \_\_\_\_\_ MG/L TOTAL

TYPE OF SAMPLE  
 SOURCE  
 DISTRIBUTION  
 MAXIMUM RESIDENCE TIME  
 NORMAL RESIDENCE TIME  
 OTHER \_\_\_\_\_

PRE-CHLORINATION  
 \_\_\_\_\_ LBS./DAY

DATE OF SAMPLE 12/31/87  
 TIME 7:45 O'CLOCK (AM) PM

REMARKS BY SAMPLER Routine sample - triannual Duplicates

REMARKS BY LABORATORY

THM - MAXIMUM CONTAMINANT LEVEL CHECK ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
 PPM = PARTS PER MILLION

<input type="checkbox"/> TOTAL TRIHALOMETHANES	_____	<input type="checkbox"/> METHYLENE CHLORIDE	_____
<input type="checkbox"/> CHLOROFORM	_____	<input type="checkbox"/> BENZENE	_____
<input type="checkbox"/> DIBROMOCHLOROMETHANE	_____	<input type="checkbox"/> TOLUENE	_____
<input type="checkbox"/> BROMODICHLOROMETHANE	_____	<input type="checkbox"/> XYLENES	_____
<input type="checkbox"/> BROMOFORM	_____	<input type="checkbox"/> CHLORO BENZENE	_____
<input type="checkbox"/> TRICHLOROETHYLENE	_____	<input type="checkbox"/> ETHYL BENZENE	_____
<input type="checkbox"/> TETRACHLOROETHYLENE	_____	<input type="checkbox"/> 1,2-DICHLOROETHENE	_____
<input type="checkbox"/> 1,1,1-TRICHLOROETHANE	_____	<input type="checkbox"/> 1,1-DICHLOROETHANE	_____
<input type="checkbox"/> 1,2-DICHLOROETHANE	_____	<u>all were below</u>	_____
<input type="checkbox"/> 1,1,2,2-TETRACHLOROETHANE	_____	<u>minimum</u>	_____
<input type="checkbox"/> CARBON TETRACHLORIDE	_____	<u>detectable limit</u>	_____
		<u>ew</u>	_____

DATE REC'D 12/31/87 TIME \_\_\_\_\_ DATE REPORTED \_\_\_\_\_  
 LAB NUMBER 188-0367 LABORATORY DIRECTOR [Signature]  
188 0367

Poultney WATER SYSTEM NAME & ADDRESS Poultney Village Well #1 WSID 23B

ANALYTICAL SAMPLE DESCRIPTION old well - from pipe w/o chlorine

USE OF SAMPLE  
 ROUTINE  
 QUARTERLY  
 MAXIMUM THM POTENTIAL  
 SPECIAL

TYPE OF SAMPLER  
 SOURCE  
 DISTRIBUTION  
 MAXIMUM RESIDENCE TIME  
 NORMAL RESIDENCE TIME  
 OTHER

WORKS BY SAMPLER Sample # LIS-23B

SAMPLER NAME & TITLE KORI J. Stratton - Env. Tech

CURRENT CHLORINE RESIDUAL  
 MG/L FREE /  
 MG/L TOTAL / *sent copy 2-28-84*

PRE-CHLORINATION  
 LBS./DAY /

DATE OF SAMPLE 1-12-84  
 TIME 1:40 O'CLOCK AM  PM

REMARKS BY LABORATORY  
pth 6.25

MAXIMUM CONTAMINANT LEVEL	LABORATORY REPORT	MG/L = MILLIGRAMS PER LITER
ANALYSES REQUESTED		PPM( = PARTS PER MILLION)
<input checked="" type="checkbox"/> TOTAL TRIHALOMETHANES	<u>N.P.</u>	<input checked="" type="checkbox"/> METHYLENE CHLORIDE
<input checked="" type="checkbox"/> CHLOROFORM	<u>N.P.</u>	<input type="checkbox"/> BENZENE
<input checked="" type="checkbox"/> DIBROMOCHLOROMETHANE	<u>N.P.</u>	<input checked="" type="checkbox"/> TOLUENE
<input checked="" type="checkbox"/> BROMODICHLOROMETHANE	<u>N.P.</u>	<input checked="" type="checkbox"/> XYLENES
<input checked="" type="checkbox"/> BROMOFORM	<u>N.P.</u>	<input checked="" type="checkbox"/> CHLORO BENZENE
<input checked="" type="checkbox"/> TRICHLOROETHYLENE	<u>N.P.</u>	<input checked="" type="checkbox"/> ETHYL BENZENE
<input checked="" type="checkbox"/> TETRACHLOROETHYLENE	<u>N.P.</u>	<input checked="" type="checkbox"/> TRANS-1,2-DICHLOROETHENE
<input checked="" type="checkbox"/> METHYL ISO-BUTYL KETONE	<u>N.P.</u>	<input type="checkbox"/> 1,1,2-TRICHLOROETHANE
<input checked="" type="checkbox"/> METHYL ETHYL KETONE	<u>N.P.</u>	<input checked="" type="checkbox"/> 1,1-DICHLOROETHANE
<input checked="" type="checkbox"/> 1,1,1-TRICHLOROETHANE	<u>N.P.</u>	<input checked="" type="checkbox"/> 1,1-DICHLOROETHENE
<input checked="" type="checkbox"/> 1,2-DICHLOROETHANE	<u>N.P.</u>	
<input checked="" type="checkbox"/> 1,1,1,2-TETRACHLOROETHANE	<u>N.P.</u>	
<input checked="" type="checkbox"/> 1,1,2,2-TETRACHLOROETHANE	<u>N.P.</u>	
<input checked="" type="checkbox"/> CARBON TETRACHLORIDE	<u>N.P.</u>	
<input checked="" type="checkbox"/> VINYL CHLORIDE	<u>N.P.</u>	

REC'D 11/3 TIME \_\_\_\_\_ DATE REPORTED FEB 1 1984

LABORATORY NUMBER No. 1886 LABORATORY DIRECTOR \_\_\_\_\_

VERMONT STATE PUBLIC HEALTH LABORATORY  
ORGANIC CHEMICAL ANALYSIS OF PUBLIC WATER SUPPLY

863-7335

WATER SYSTEM POULTNEY VILLAGE WATER DEPARTMENT WSID 5227

LOCATION POULTNEY VILLAGE SEWAGE TREATMENT PLANT SINK

PROPOSED PURPOSE OF SAMPLE

ROUTINE  
 QUARTERLY  
 MAXIMUM THM POTENTIAL  
 SPECIAL FOLLOW-UP

SAMPLER NAME & TITLE LINDEN E. WITBERG

CURRENT CHLORINE RESIDUAL  
\_\_\_\_\_ MG/L FREE  
\_\_\_\_\_ MG/L TOTAL

PURPOSE OF SAMPLE

SOURCE  
 DISTRIBUTION  
 MAXIMUM RESIDENCE TIME  
 NORMAL RESIDENCE TIME  
 OTHER \_\_\_\_\_

PRE-CHLORINATION  
\_\_\_\_\_ LBS./DAY

DATE OF SAMPLE 5/18/89  
TIME 9:30 O'CLOCK (AM) PM

REMARKS BY SAMPLER  
ANALYSES ONLY FOR  
TETRACHLOROETHYLENE  
CYCLOPENTANE

REMARKS BY LABORATORY

MAXIMUM CONTAMINANT LEVEL  
ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
PPM = PARTS PER MILLION

<input type="checkbox"/> TOTAL TRIHALOMETHANES	<u>0.007</u>	<input type="checkbox"/> METHYLENE CHLORIDE	_____
<input type="checkbox"/> CHLOROFORM	<u>0.007</u>	<input type="checkbox"/> BENZENE	_____
<input type="checkbox"/> DIBROMOCHLOROMETHANE	<u>ND</u>	<input type="checkbox"/> TOLUENE	_____
<input type="checkbox"/> BROMODICHLOROMETHANE	_____	<input type="checkbox"/> XYLENES	_____
<input type="checkbox"/> BROMOFORM	_____	<input type="checkbox"/> CHLORO BENZENE	_____
<input type="checkbox"/> TRICHLOROETHYLENE	_____	<input type="checkbox"/> ETHYL BENZENE	_____
<input checked="" type="checkbox"/> TETRACHLOROETHYLENE	_____	<input type="checkbox"/> <del>TRANS</del> -1,2-DICHLOROETHENE	_____
<input type="checkbox"/> METHYL ISO-BUTYL KETONE	_____	<input type="checkbox"/> 1,1,2-TRICHLOROETHANE	_____
<input type="checkbox"/> METHYL ETHYL KETONE	_____	<input type="checkbox"/> 1,1-DICHLOROETHANE	_____
<input type="checkbox"/> 1,1,1-TRICHLOROETHANE	_____	<input type="checkbox"/> 1,1-DICHLOROETHENE	_____
<input type="checkbox"/> 1,2-DICHLOROETHANE	_____	_____	_____
<input type="checkbox"/> 1,1,1,2-TETRACHLOROETHANE	_____	_____	_____
<input type="checkbox"/> 1,1,2,2-TETRACHLOROETHANE	_____	_____	_____
<input type="checkbox"/> CARBON TETRACHLORIDE	_____	_____	_____
<input type="checkbox"/> <del>VINYL CHLORIDE</del>	_____	_____	_____

REC'D 5/18 TIME \_\_\_\_\_ DATE REPORTED 5/18

NUMBER 22366 LABORATORY DIRECTOR \_\_\_\_\_

WATER SYSTEM NAME & ADDRESS: Poultney supply WSID: 6A

SPECIFIC SAMPLE LOCATION: Village Well #1 (old well) (# LJS-83-6A)

PURPOSE OF SAMPLE:

- ROUTINE
- QUARTERLY
- MAXIMUM THM POTENTIAL
- SPECIAL

SAMPLER NAME & TITLE: Lori J. Stratton-Enw. Tech.

CURRENT CHLORINE RESIDUAL:

\_\_\_\_\_ MG/L FREE

\_\_\_\_\_ MG/L TOTAL

PRE-CHLORINATION: \_\_\_\_\_ LBS./DAY

DATE OF SAMPLE: 12-23-83

TIME: 1:35 O'CLOCK AM (PM)

WORKS BY SAMPLER: sample # LJS-83-6A

REMARKS BY LABORATORY:

Sent copy 2-28-84 527

MAXIMUM CONTAMINANT LEVEL	LABORATORY REPORT	MG/L = MILLIGRAMS PER LITER
ANALYSES REQUESTED		PPM = PARTS PER MILLION
<input type="checkbox"/> TOTAL TRIHALOMETHANES	<u>N.D.</u>	<input type="checkbox"/> METHYLENE CHLORIDE
<input type="checkbox"/> CHLOROFORM	<u>N.D.</u>	<input type="checkbox"/> BENZENE
<input type="checkbox"/> DIBROMOCHLOROMETHANE	<u>N.D.</u>	<input type="checkbox"/> TOLUENE
<input type="checkbox"/> BROMODICHLOROMETHANE	<u>N.D.</u>	<input type="checkbox"/> XYLENES
<input type="checkbox"/> BROMOFORM	<u>N.D.</u>	<input type="checkbox"/> CHLORO BENZENE
<input type="checkbox"/> TRICHLOROETHYLENE	<u>N.D.</u>	<input type="checkbox"/> ETHYL BENZENE
<input type="checkbox"/> TETRACHLOROETHYLENE	<u>N.D.</u>	<input type="checkbox"/> <del>TRANS</del> -1,2-DICHLOROETHENE
<input type="checkbox"/> METHYL ISO-BUTYL KETONE	<u>N.D.</u>	<input type="checkbox"/> 1,1,2-TRICHLOROETHANE
<input type="checkbox"/> METHYL ETHYL KETONE	<u>N.D.</u>	<input type="checkbox"/> 1,1-DICHLOROETHANE
<input type="checkbox"/> 1,1,1-TRICHLOROETHANE	<u>N.D.</u>	<input type="checkbox"/> 1,1-DICHLOROETHENE
<input type="checkbox"/> 1,2-DICHLOROETHANE	<u>N.D.</u>	
<input type="checkbox"/> 1,1,1,2-TETRACHLOROETHANE	<u>N.D.</u>	
<input type="checkbox"/> 1,1,1,2,2-TETRACHLOROETHANE	<u>N.D.</u>	
<input type="checkbox"/> CARBON TETRACHLORIDE	<u>N.D.</u>	
<input type="checkbox"/> VINYL CHLORIDE	<u>N.D.</u>	

FEB 14 1984

REC'D: \_\_\_\_\_ TIME: \_\_\_\_\_ DATE REPORTED: \_\_\_\_\_

NUMBER: No. 1817 LABORATORY DIRECTOR: \_\_\_\_\_

W N Pooltoey WATER SYSTEM NAME & ADDRESS Pooltoey (Village) Water Dept. (5227)  
 SAMPLE LOCATION (NAME, STREET #., APT. #., ETC.) Municipal's Manager's Bldg, men's washroom, cold water  
 PURPOSE OF SAMPLE SAMPLER NAME & ADDRESS LINDEN E. WITHERELL / ROBERT DUNCAN  
 ANNUAL  
 ANNUAL FOLLOW-UP  
 SPECIAL  
 OTHER VT / EPA Volatile Organic Survey  
 TYPE OF SAMPLER  
 HEALTH OFFICER  
 OPERATOR  
 STATE HEALTH DEPARTMENT  
 OTHER  
 DATE OF SAMPLE 1/5/82  
 TIME 16:00 O'CLOCK AM PM  
 MARKS BY SAMPLER  
1982 VSDH/EPA Agreement  
Volatile Organic Chemical Survey  
 REMARKS BY LAB

= MAXIMUM CONTAMINANT LEVEL  
 CHECK ANALYSES REQUESTED  
 PRIMARY STANDARDS  
 LABORATORY REPORT  
 MG/L = MILLIGRAMS PER LITER  
 PPM(B) = PARTS PER MILLION(BILLION)

PHYSICAL	STD. UNITS	MCL
<input checked="" type="checkbox"/> TURBIDITY	_____	1
INORGANIC CHEMICALS		
<input checked="" type="checkbox"/> LEAD	_____	0.05
<input checked="" type="checkbox"/> SILVER	_____	0.05
<input checked="" type="checkbox"/> CHROMIUM	_____	0.05
<input checked="" type="checkbox"/> CADMIUM	_____	0.01
<input checked="" type="checkbox"/> BARIUM	_____	1.0
<input checked="" type="checkbox"/> ARSENIC	_____	0.05
<input checked="" type="checkbox"/> SELENIUM	_____	0.01
<input checked="" type="checkbox"/> FLUORIDE	_____	2.2
<input checked="" type="checkbox"/> MERCURY	_____	0.002
<input checked="" type="checkbox"/> NITRATE	_____	10
<input checked="" type="checkbox"/> SODIUM	_____	20*
ORGANIC CHEMICALS		
X Total THM	<u>.017</u>	
X Chloroform	<u>.005</u>	
X Dibromochloromethane	<u>.004</u>	
X Bromodichloromethane	<u>.12</u>	
X Bromoform	<u>0</u>	
X Trichloroethylene	<u>.0056</u>	
X Tetrachloroethylene	<u>.003</u>	
X Methyl iso-butyl ketone	<u>0</u>	
X Methyl ethyl ketone	<u>0</u>	
X 1,1,1-Trichloroethane	<u>0</u>	
X 1,2-Dichloroethane	<u>0</u>	
X 1,1,1,2-Tetrachloroethane	<u>0</u>	
X 1,1,2,2-Tetrachloroethane	<u>0</u>	
X Carbon tetrachloride	<u>0</u>	

PHYSICAL	STD. UNITS	MCL
<input checked="" type="checkbox"/> COLOR	_____	15
<input checked="" type="checkbox"/> ODOR	_____	
<input checked="" type="checkbox"/> PH	_____	6.5-8.5
X		
INORGANIC CHEMICALS		
<input checked="" type="checkbox"/> PHTH ALK. AS CaCO <sub>3</sub>	_____	
<input checked="" type="checkbox"/> M.O. ALK. AS CaCO <sub>3</sub>	_____	
<input checked="" type="checkbox"/> HARDNESS AS CaCO <sub>3</sub>	_____	
<input checked="" type="checkbox"/> COPPER	_____	1.0
<input checked="" type="checkbox"/> IRON	_____	0.3
<input checked="" type="checkbox"/> MANGANESE	_____	0.05
<input checked="" type="checkbox"/> ZINC	_____	5
<input checked="" type="checkbox"/> FOAMING AGENTS	_____	0.5
<input checked="" type="checkbox"/> NITRITE	_____	
<input checked="" type="checkbox"/> CHLORIDE	_____	250
<input checked="" type="checkbox"/> SULFATE	_____	250
<input checked="" type="checkbox"/> HYDROGEN SULFIDE	_____	0.05
<input checked="" type="checkbox"/> TOT. DISSOLVED SOLIDS	_____	500
OTHER ANALYSES		
X Vinyl chloride	_____	
X Methyl chloride	<u>0</u>	
X Benzene	<u>0</u>	
X Toluene	<u>0</u>	
X O-Xylene	<u>0</u>	
X P-(&M)-Xylene	<u>0</u>	
X Chlorobenzene	<u>0</u>	
X Ethylbenzene	<u>0</u>	
X Other	<u>0</u>	

REC'D 1/11/82 TIME \_\_\_\_\_ DATE REPORTED FEB 22 1982  
 SAMPLE NUMBER 1276 LABORATORY DIRECTOR Atkinson

\*MCL FOR NOTIFICATION PURPOSES ONLY

**POULTNEY**

WATER SYSTEM  
NAME & ADDRESS

*Town Water Supply*

WSID  
**5227**

TYPE OF SAMPLE  
LOCATION

*Well in pump house - chlorinated*

USE OF SAMPLE

- ROUTINE
- QUARTERLY
- MAXIMUM THM POTENTIAL
- SPECIAL

SAMPLER NAME  
& TITLE

*P.F. McFarlin*

CURRENT CHLORINE RESIDUAL

MG/L FREE

MG/L TOTAL

USE OF SAMPLE

- SOURCE
- DISTRIBUTION
- MAXIMUM RESIDENCE TIME
- NORMAL RESIDENCE TIME
- OTHER

PRE-CHLORINATION

LBS./DAY

DATE OF SAMPLE

*11 July 83*

TIME

*11:35*

O'CLOCK  AM  PM

MARKS BY SAMPLER

*# PFM-83-17B*

REMARKS BY LABORATORY

MAXIMUM CONTAMINANT LEVEL  
ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
PPM = PARTS PER MILLION

- TOTAL TRIHALOMETHANES 0
- CHLOROFORM 0
- DIBROMOCHLOROMETHANE 0
- BROMODICHLOROMETHANE 0
- BROMOFORM 0
- TRICHLOROETHYLENE 0
- TETRACHLOROETHYLENE 0
- METHYL ISO-BUTYL KETONE 0
- METHYL ETHYL KETONE 0
- 1,1,1-TRICHLOROETHANE 0
- 1,2-DICHLOROETHANE 0
- 1,1,1,2-TETRACHLOROETHANE 0
- 1,1,2,2-TETRACHLOROETHANE 0
- CARBON TETRACHLORIDE 0
- VINYL CHLORIDE 0

- METHYLENE CHLORIDE 0
- BENZENE 0
- TOLUENE 0
- XYLENES 0
- CHLORO BENZENE 0
- ETHYL BENZENE 0
- TRANS-1,2-DICHLOROETHENE 0
- 1,1,2-TRICHLOROETHANE 0
- 1,1-DICHLOROETHANE 0
- 1,1-DICHLOROETHENE 0

JUL 27 1983

REC'D

*9/12*

TIME

DATE REPORTED

NUMBER

*111*

LABORATORY DIRECTOR

*Stewart / Jm*

**POULTNEY**

WATER SYSTEM  
NAME & ADDRESS

*town Water Supply*

WSID  
**522.7**

TYPIC SAMPLE  
LOCATION

*Town Office - Cold water tap.*

USE OF SAMPLE

- ROUTINE
- QUARTERLY
- MAXIMUM THM POTENTIAL
- SPECIAL

SAMPLER NAME  
& TITLE

*Peter F. McFarlin*

CURRENT CHLORINE RESIDUAL

MG/L FREE

MG/L TOTAL

TYPE OF SAMPLE

- SOURCE DISTRIBUTION
- MAXIMUM RESIDENCE TIME
- NORMAL RESIDENCE TIME
- OTHER

PRE-CHLORINATION

LBS./DAY

DATE OF SAMPLE

*11 July '83*

TIME

*11:00*

O'CLOCK (AM) PM

WORKS BY SAMPLER

*# PFM-83-16B*

REMARKS BY LABORATORY

MAXIMUM CONTAMINANT LEVEL  
ANALYSES REQUESTED

LABORATORY REPORT

MG/L = MILLIGRAMS PER LITER  
PPM = PARTS PER MILLION

- TOTAL TRIHALOMETHANES *0.018*
- CHLOROFORM *0.018*
- DIBROMOCHLOROMETHANE *0.*
- BROMODICHLOROMETHANE *0.*
- BROMOFORM *0.*
- TRICHLOROETHYLENE *0.*
- TETRACHLOROETHYLENE *0.*
- METHYL ISO-BUTYL KETONE *0.*
- METHYL ETHYL KETONE *0.*
- 1,1,1-TRICHLOROETHANE *0.*
- 1,2-DICHLOROETHANE *0.*
- 1,1,1,2-TETRACHLOROETHANE *0.*
- 1,1,2,2-TETRACHLOROETHANE *0.*
- CARBON TETRACHLORIDE *0.*
- VINYL CHLORIDE *0.*

- METHYLENE CHLORIDE *0.*
- BENZENE *0.*
- TOLUENE *0.*
- XYLENES *0.*
- CHLORO BENZENE *0.*
- ETHYL BENZENE *0.*
- TRANS-1,2-DICHLOROETHENE *0.*
- 1,1,2-TRICHLOROETHANE *0.*
- 1,1-DICHLOROETHANE *0.*
- 1,1-DICHLOROETHENE *0.*

REC'D

*7/12*

TIME

DATE REPORTED

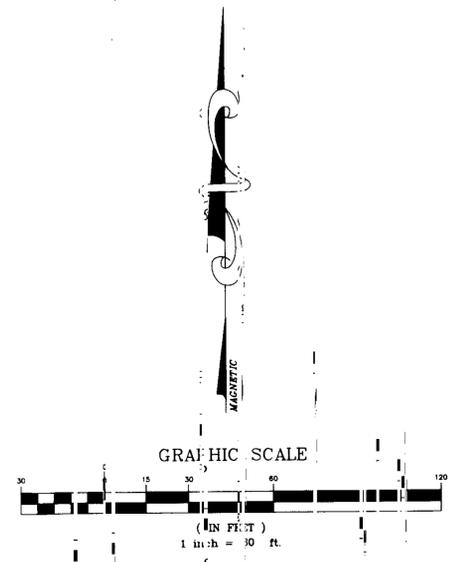
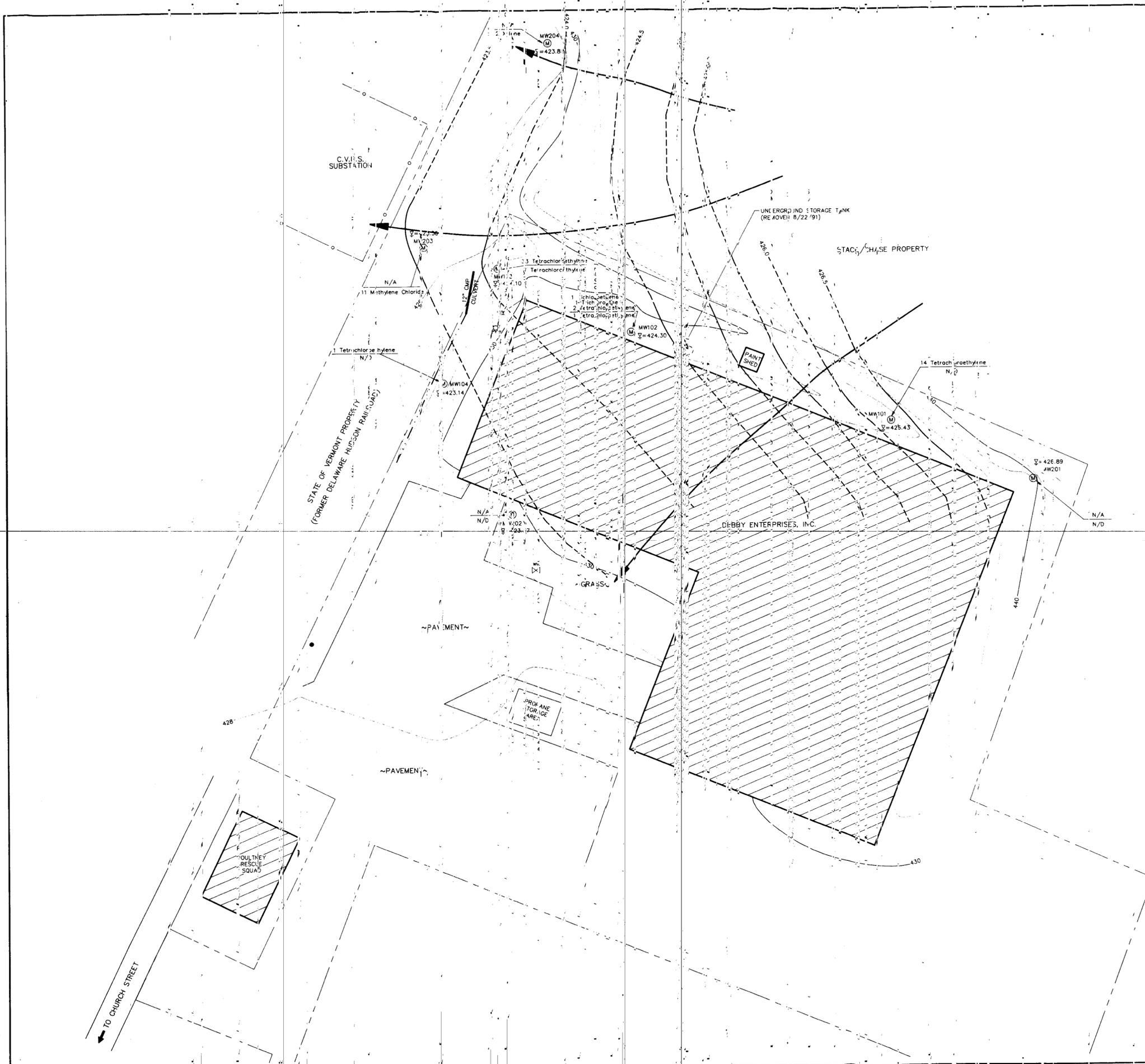
**JUL 27 1983**

NUMBER

*110*

LABORATORY DIRECTOR

*Alfonso /m*



- LEGEND**
- ← GROUNDWATER FLOW DIRECTION
  - GROUNDWATER CONTOUR (INTERVAL = 0.5')
  - - - - - APPRX. PROPERTY LINE
  - - - - - DRAINAGE DITCH
  - - - - - CHAIN LINK FENCE
  - - - - - GROUND SURFACE CONTOUR (INTERVAL = 2')
  - (M) MONITORING WELL
  - W=423.14 W/WATER LEVEL ELEVATIONS - 1/2/92
  - 2 Tetrachloroethane 8/5/92 RESULTS (pb)
  - 1 Tetrachloroethane 1/2/92 RESULTS (pb)
  - N/D NONE DETECTED
  - N/A NOT APPLICABLE
  - WATER VALVE
  - HYDRANT
  - UTIL. POLE W/GL WIRE
  - MANHOLE

NOTE: HORIZONTAL AND VERTICAL CONTROL BY LITTLE RIVER SURVEY COMPANY OF STOW, VERMONT

Rev. No.	Date	Description	Made by	Chk'd by	App'd by
<b>PLATE 1</b> <b>GROUNDWATER FLOW DIRECTION</b> <b>DEBBY ENTERPRISES, INC.</b> <b>FOULTNEY, VERMONT</b>					
<b>THE JOHNSON COMPANY, INC.</b> Environmental Science and Engineering 5 STATE STREET MONTPELIER, VERMONT 05602					
					Sheet 1 of 1 Scale: 1"=30' Drawn by: TJK Chk'd by: MHP Date: 2/26/92 Job 1-1830-1

CAD\PLA1.E1.dwg