

**ENGINEERING INVESTIGATIONS AT
INACTIVE HAZARDOUS WASTE SITES IN THE
STATE OF NEW YORK
PHASE I INVESTIGATIONS**

**DOETSCH RESIDENCE
ARGYLE, WASHINGTON COUNTY, NEW YORK
Site Code: 558012**

MARCH 1987



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BUREAU OF HAZARDOUS SITE CONTROL
UNCLASIFIED
HAZARDOUS WASTE

Prepared for:

**NEW YORK STATE
DEPARTMENT OF ENVIRONMENTAL CONSERVATION**

59 WOLF ROAD, ALBANY, NEW YORK 12233

HENRY G. WILLIAMS, COMMISSIONER

**Division of Solid and Hazardous Waste
NORMAN H. NOSENCHUCK, P.E. DIRECTOR**



WEHRAN ENGINEERING, P.C.

Middletown & Grand Island, New York

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ARGYLE, WASHINGTON COUNTY, NEW YORK
SITE CODE: 558012**

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**DIVISION OF SOLID AND HAZARDOUS WASTE
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
50 WOLF ROAD
ALBANY, NEW YORK 12233-0001**

Prepared by

**WEHRAN ENGINEERING, P.C.
666 EAST MAIN STREET
MIDDLETOWN, NEW YORK 10940**

DOETSCH RESIDENCE

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1.0 EXECUTIVE SUMMARY

1.0 EXECUTIVE SUMMARY

The Doetsch Residence site (NY 558012) is located east of Route 40, approximately two and one-half miles north of the Village of North Argyle (Figure 1). The site lies in the Township of Argyle, Washington County. The owner of the one-quarter acre site is Francis Doetsch.

Mr. Doetsch, a former employee of General Electric (GE), purchased 27 barrels of waste oil from GE Fort Edward in 1963. Mr. Doetsch purchased the oil to use as a wood preservative for fence posts. One barrel reportedly contained pyrenol and was purchased to kill vegetation. None of the material was ever used for either purpose.

On August 23, 1979, Mr. Ray Cowen of NYSDEC Region 5 and Mr. Brian Fear of NYSDOH visited the site in response to a complaint of illegal storage of chemicals. Mr. Cowen observed the drums to be in various stages of deterioration and requested sampling to be performed. On August 24, 1979, the Bureau of Hazardous Waste Control obtained four samples from different barrels. Sample analyses were performed by NYSDOH. Presently, results of these samples have not been obtained. No remedial action occurred at this time, but the site was placed on the Inactive Hazardous Waste Registry.

In November 1982, additional investigation and sampling was performed by NYSDEC. At that time, one drum had leaked completely and four or five drums had leaked 10 gallons each of their contents onto the ground. Total oil spilled is estimated at 100 gallons. Results of the sample analysis indicated low to extremely high concentrations of PCBs (see Reference 7.2).

A cooperative effort between General Electric Company and NYSDEC resulted in remedial action at this site. The barrels and approximately 50 cubic yards of soil were removed to a permitted disposal site (SCA). The excavated area was backfilled with bankrun and capped with clay.

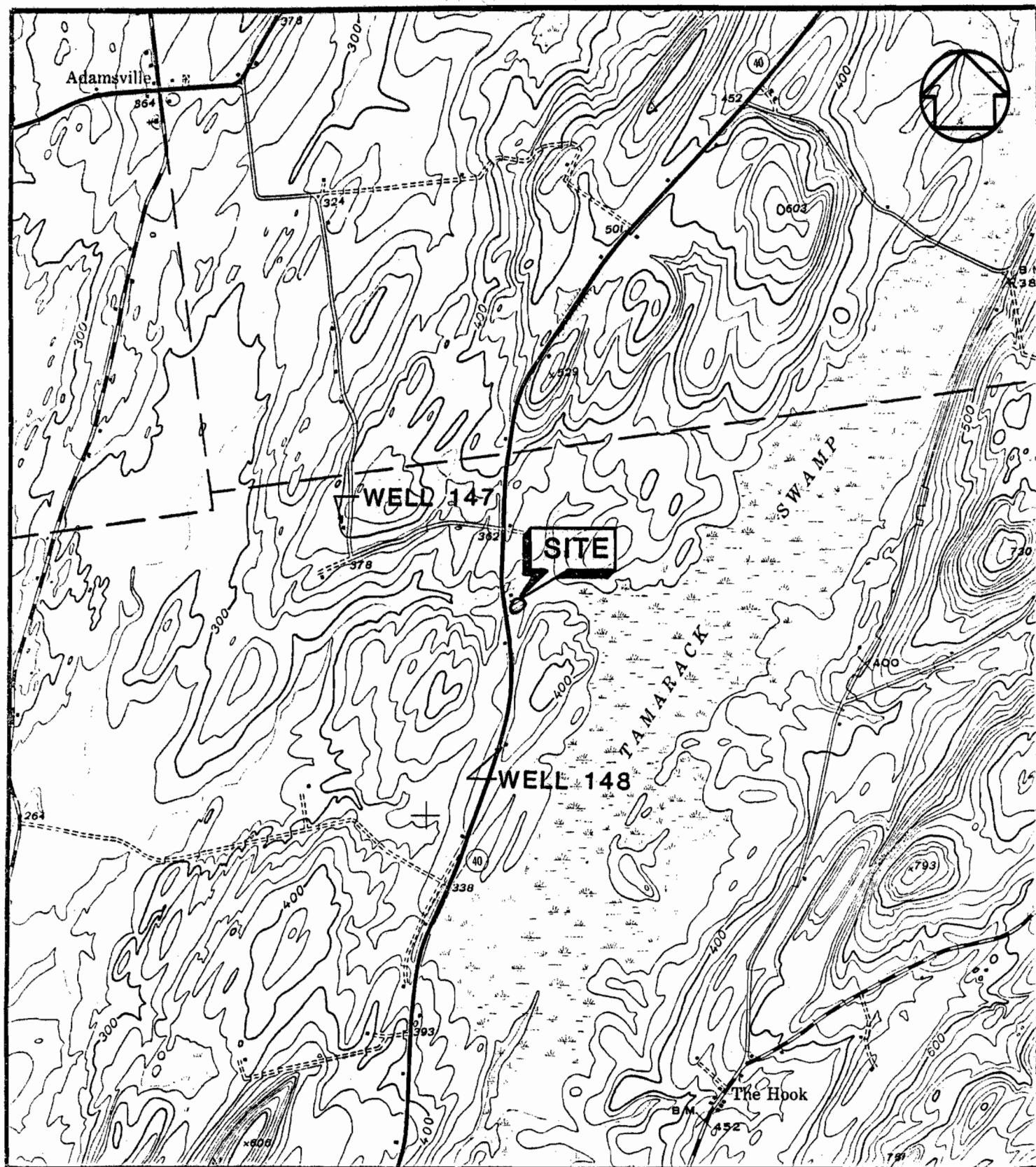
Soil in the vicinity of the site is predominately clay with shale bedrock underlying the unconsolidated deposits. The closest well is on site (300 feet) and reportedly screened in shale.

Present environmental concerns stem from the existence of additional contaminated soil at the site. The extent of the contamination and the potential for contamination of groundwater remain unknown.

The preliminary HRS Score (Sm) is 13.84.

Due to the remediation efforts which have already occurred at the Doetsch residence, a Phase II effort is not recommended. Documentation of waste and route migration characteristics appears to be fairly adequate for development of an HRS score.

Alternative to a Phase II investigation should include intermediate soil sampling and analysis to verify that the site has been properly remediated. The plan should encompass both surficial soil samplings and soil borings to determine if horizontal and vertical contamination still exists. The chemical analysis should be limited to those compounds found during the drum sampling (PCBs and PCP). Groundwater sampling from the well serving the Doetsch residence which is believed to be downgradient is also recommended. Positive identification of PCBs in this well will facilitate the need to establish additional monitoring stations.



SCALE: 1" = 2000'
 TOPOGRAPHY TAKEN FROM
 1944 HARTFORD, N.Y.
 U.S.G.S. QUADRANGLE
 7.5 MIN. SERIES
 (PHOTOINSPECTED 1976)



FIGURE 1
 SITE LOCATION MAP
 DOETSCH RESIDENCE
 ARGYLE, N.Y.

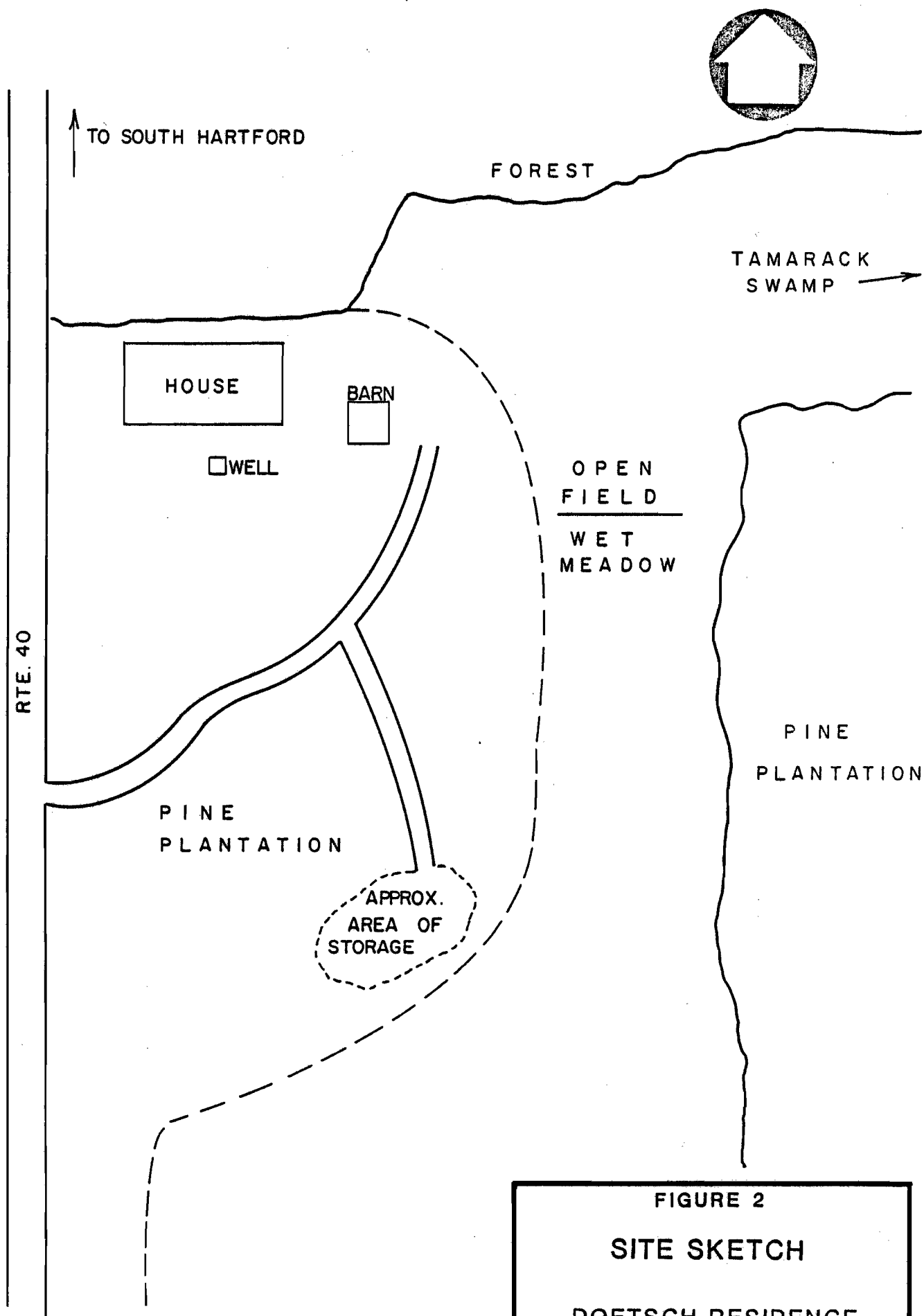


FIGURE 2
SITE SKETCH
DOETSCH RESIDENCE
N.T.S.

2.0 PURPOSE

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This Phase I investigation was conducted under contract to the New York State Department of Environmental Conservation Superfund Program to evaluate the potential environmental or public health hazard associated with past disposal/storage activities at the Doetsch Residence. Divided into two parts, this initial investigation consisted of a detailed file review of available information and an initial site investigation. The culmination of this phase is the development of a preliminary Hazard Ranking System (HRS) score.

Where information is lacking and a final score cannot be computed, recommendations will be made for a Phase II investigation designed to verify the assumptions made in the preliminary scoring and to collect the additional data needed to complete the site assessment.

3.0 SCOPE OF WORK

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To complete the preliminary HRS score for the Doetsch Residence, the following scope of work was conducted:

- . A search of the following:
 - Available file information from federal, state, and municipal agencies
 - Published documents and maps from the U.S. Geological Survey, Soil Conservation Service and state agencies for geological, hydrological and topographical data
 - Available files, reports and drawings provided by site owners, operators and other knowledgeable parties.
- . Interviews with individuals having knowledge of the site

Information searched includes well logs, land use data, water usage patterns, critical habitats and endangered species data, meteorological data, hydrological, geological and topographical data, waste characteristics and demographic information.

Following the initial record search, a site inspection was conducted. The intent of the inspection is to verify existing file information and to conduct an HNU survey to screen for potential air releases. Items of specific interest in the site investigation include:

- . Overall site environmental conditions
- . The presence of disturbed areas
- . Visual signs of waste materials (drums, sludges, etc.)
- . The occurrence of leachate
- . Site topography

A detailed analysis was performed on all data collected in preparation of a preliminary HRS score. Where information was lacking and a final HRS

score could not be computed, recommendations were made for a Phase II investigation. This investigation was designed to verify the assumptions made in the preliminary scoring and to collect the additional data needed to complete the site assessment. A summary of agencies contacted, contact person, address and information obtained follows.

SOURCES -- DOETSCH RESIDENCE
(Page 1)

<u>Name/Address/Phone</u>	<u>Type of Contact</u>	<u>Date</u>	<u>Information Provided</u>
Mr. John Czapor, Environmental Engineer USEPA, Region II 26 Federal Plaza New York, New York 10278 (212) 264-1573	Letter Office Visit	1/3/86 1/14/86 1/24/86	USEPA file information
Mr. Richard D. Spear, Chief Surveillance & Monitoring Branch USEPA, Region II Woodbridge Avenue Edison, New Jersey 08817 (201) 321-6685	Letter	1/3/86	None available
Mr. Lawrence A. Martens, District Chief U.S. Department of the Interior U.S. Geological Survey Albany District Office P.O. Box 1669 U.S. Post Office and Court House Albany, New York 12201 (518) 472-3107	Letter Telephone Call	1/3/86	Roger Waller responded - list of available county groundwater reports
Mr. Paul Dodd, State Conservationist U.S. Department of Agriculture Soil Conservation Service 771 James M. Hanley Federal Building 100 South Clinton Street Syracuse, New York 13260 (315) 423-5521	Letter Telephone Call	1/3/86 1/13/86	Fred Gilbert responded - list of available county soil surveys
Mr. Carl B. Sciple, Division Engineer Army Corps of Engineers New England Division 424 Trapelo Road Waltham, Massachusetts 02154 (617) 894-2400	Letter	1/3/86	None available
Mr. Frederick J. Scullin, Jr. U.S. Department of Justice U.S. Attorney, Northern District of New York 369 Federal Building 100 South Clinton Street Syracuse, New York 13260 (315) 423-5165	Letter	1/3/86	Craig Benedict responded - No information available

SOURCES -- DOETSCH RESIDENCE
(Page 2)

<u>Name/Address/Phone</u>	<u>Type of Contact</u>	<u>Date</u>	<u>Information Provided</u>
Mr. Conrad Simon, Director Air and Waste Management Division United States Environmental Protection Agency Region 2 26 Federal Plaza New York, New York 10278	Letter	1/24/86	None available
Mr. Marsden Chen, Supervisor Division of Solid and Hazardous Waste New York State Department of Environmental Conservation 50 Wolf Road Albany, New York 12233 (518) 457-0639	Office Visit	12/4/85	NYSDEC file information
Mr. Ronald Tramontano, P.E. Chief, Surveillance and Investigation Division Bureau of Toxic Substance Assessment Surveillance and Investigation Section Empire State Plaza Corning Tower, Room 372 Albany, New York 12237	Letter Office Visit	1/3/86 1/9/86	File information; Site history
Robert H. Fakundiny, State Geologist Geological Survey of New York State State Education Department Division of Museum Services Albany, New York 12230 (518) 474-5816	Letter	1/3/86	County Groundwater Reports
Mr. Robert Abrams, Attorney General New York State Attorney General Department of Law State Capitol, Room 221 Albany, New York 12224 (581) 474-7330	Letter	1/3/86	No information
Mr. Geoff Bornemann, Principal Planner Capital District Regional Planning Commission 251 River Street, Monument Square Troy, New York 12180 (518) 272-1414	Letter	1/3/86	Rocco Ferraro responded with list of contact persons for sites

SOURCES -- DOETSCH RESIDENCE
(Page 3)

<u>Name/Address/Phone</u>	<u>Type of Contact</u>	<u>Date</u>	<u>Information Provided</u>
Mr. Ray Cowen New York State Department of Environmental Conservation Hudson Street Warrensburg, New York 12885 (518) 623-3671	Phone Call	2/14/86	Site history. Sampling background information
Mr. Bud Colden New York State Department of Environmental Conservation Hudson Street Warrensburg, New York 12885 (518) 623-3671	Office Visit	12/5/85	Regional file. Background information
Mr. John Ozard NYSDEC Significant Habitat Unit Delmar, New York (518) 439-8014	Phone Call	7/22/86	Information on endangered species

SOURCES -- DOETSCH RESIDENCE
(Page 4)

<u>Name/Address/Phone</u>	<u>Type of Contact</u>	<u>Date</u>	<u>Information Provided</u>
Mr. Joseph T. Rota Board of Supervisors Washington County Upper Broadway Fort Edward, New York 12828 (518) 747-7791	Letter	1/3/86	No response
Mr. Leon D. Putnam County Clerk Washington County Upper Broadway Fort Edward, New York 12828 (518) 747-7791	Letter	1/3/86	No response
Mr. Robert Page County Planning Department Washington County Upper Broadway Fort Edward, New York 12828 (518) 747-4687	Letter	1/9/86	Additional contacts
District Conservationist Soil and Water Conservation District Washington County County Annex Building Lower Main Street Hudson Falls, New York 12839 (518) 747-2154	Letter	1/21/86 3/6/86	Soil and irrigation information
Mr. Robert Page Solid Waste Management Washington County Upper Broadway Fort Edward, New York 12828 (518) 747-4687	Letter	1/9/86	Responded with additional contacts
Mr. Paul Maniacek Real Property Director Washington County Upper Broadway Fort Edward, New York 12828 (518) 747-7791	Letter	1/13/86	No response
Mr. Brian Fear NYSDOH 21 Bay Street Glens Falls, New York 12801 (518) 793-3893	Phone Call	2/14/86	

4.0 SITE ASSESSMENT

4.0 SITE ASSESSMENT

4.1 SITE HISTORY

The Doetsch Residence is a private home owned by Francis Doetsch. The site is located east of Route 40, two and one-half miles north of the Village of North Argyle. The site lies within the Township of Argyle, Washington County.

Mr. Doetsch, a former General Electric (GE) employee, purchased 27 barrels of waste oil from GE Fort Edward in 1963. The purpose of this oil was for application as a wood preservative on fence posts. None of the material was ever used for its intended purpose.

4.2 SITE TOPOGRAPHY

The Doetsch Residence is a one-quarter-acre site located in a 40 to 50 year-old pine plantation. The site is fairly level and occurs at 320 to 340 feet MSL. A small unnamed stream is located 200 feet north of the site and a 500+-acre wetland (Tamarack Swamp) is located 400 feet east of the site.

The Doetsch Residence is separated from Tamarack Swamp by a physiographic change in area drainage basins. The Doetsch property drains north into the unnamed stream which is incorporated into the Champlain Valley drainage system. Tamarack Swamp drains into the Mosses Kill, which drains south into the Upper Hudson system.

The closest homes surrounding the Doetsch Residence are located 700 feet to the south and 1,000 feet to the north. Both of these homes are adjacent to Route 40.

4.3 SITE HYDROGEOLOGY

Washington County can be divided into three physiographic areas: the Adirondack Mountains, the Hudson-Champlain Lowland, and the Taconic Uplands. The Doetsch Residence is identified as being located on the eastern edge of the Hudson-Champlain Lowland, in an area where it encounters the Taconic Upland regions. Due to the juxtaposition of the site to both these regions, characteristics of both areas are anticipated to be present.

Cushman (1953) describes the two regions as follows:

The Hudson-Champlain Lowland is a broad depression eroded in soft shale and limestone by the Hudson River (pre and interglacial) and by ice flows. The excavated rock trench is filled with thick deposits of clay and sand.

The altitude of the land surface in the center of the depression rises gradually from about 100 feet at Fort Edward on the south to about 150 feet in the vicinity of Dunham Basin each of Hudson Falls, descending again to about 100 feet at Lake Champlain. The high point is the divide between the Hudson River and Lake Champlain basins. The banks of the Hudson River south of Fort Edward nearly everywhere ascend gradually but in some places abruptly, to benches or terraces with altitudes of 200, 300, and 400 feet above sea level. These terraces are being dissected by small tributaries leading to the Hudson River.

The Taconic area in the east covers more than 55 percent of the County. The western boundary, along with Hudson-Champlain lowland, is abrupt and is marked by a low range of hills which extends the length of the county. The upland is a westward-sloping plateau whose altitude decreases from about 600 feet to 400 feet above sea level. The area is underlain by sedimentary rocks, which have been strongly metamorphosed and thus strengthened to resist erosion, and presents a highly irregular surface. The topography is marked locally by numerous elongated steep hills and oval hillocks, which have a general north-south trend.

A thin mantle of glacial till overlies much of the area and commonly forms kames and/or drumlins.

Groundwater occurs in both bedrock and unconsolidated deposits in Washington County. Bedrock generally yields only small supplies of groundwater but is considered a significant aquifer due to its extensive occurrence throughout the County. The unconsolidated deposits produce greater quantities of water but their availability is limited.

Cushman (1953) summarizes the potential aquifer to be found in the area of site as follows:

- Bedrock in Washington County has a low effective porosity but is commonly broken by a well developed system of joints which control the movement and storage of water. The yields of wells

drilled into bedrock range from less than a gallon per minute to 80 gallons per minute and average about nine gallons per minute. It has been found uneconomical to drill more than 250 feet into bedrock in Washington County, as there is generally no appreciable increase in the yield below that depth.

- . Water occurs in till in pore spaces between individual grains but as till consists of unsorted rock debris, the pores are generally small and the porosity is low. Because most till in Washington County contains a large amount of clay, it is relatively impermeable and yields water very slowly (one to two gpm). Although the large amount of clay in till may cause groundwater to move at a rather slow rate, it holds appreciable quantities of moisture which it yields to wells having a large infiltration surface. Because of its wide distribution in Washington County, it is the source of supply for numerous dug wells, many of which yield sufficient quantities of water for domestic and stock use.
- . Water occurs in lacustrine deposits in the pore spaces between individual particles. Clay yields water very slowly, and few wells in Washington County obtain water from this material. Those wells that end in clay probably obtain their water from some overlying deposits of a coarser and more permeable nature. Where the clay occurs at the base of the section of unconsolidated deposits, it forms a thick relatively impervious layer over the bedrock, and it may in some cases be responsible for low yields from wells in bedrock.

Site-specific information is relatively scarce in the area that surrounds the Doetsch Residence. Mr. Ray Cowen, NYSDEC Region 5, reported that the predominant soil type at the site is clay and that the well at the Doetsch Residence is screened in the shale bedrock.

4.4 SITE CONTAMINATION

During the period of 1979 to 1982, four or five barrels of the waste oil stored at the Doetsch Residence deteriorated and subsequently spilled their contents onto the ground surface. One drum had leaked completely and four or five drums had leaked 10 gallons each. The extent of vertical and horizontal migration of contaminants due to the spill is unknown. Mr. Francis Doetsch estimates that a total of 100 gallons of oil waste was released.

Sampling by NYSDEC in November 1982 of the waste oil detected concentrations of PCBs ranging from 28 to 1,200,000 ppm (Reference 7.2).

Remedial action was performed by cooperative efforts of NYSDEC and General Electric Corporation in 1983. Actions taken included the removal of all barrels and approximately 50 cubic yards of contaminated soil. Reportedly, some contaminated soil still exists at the site. No additional soil sampling has occurred.

**5.0 PRELIMINARY APPLICATION OF THE
HAZARD RANKING SYSTEM**

5.0 PRELIMINARY APPLICATION OF THE HAZARD RANKING SYSTEM

5.1 NARRATIVE SUMMARY

The Doetsch Residence is located in the Township of Argyle, Washington County. The site is two and one-half miles north of the Village of North Argyle, east of Route 40. The owner of the site is Francis Doetsch.

In 1963, Mr. Doetsch purchased 27 barrels of waste oil from General Electric, Fort Edward. The intended purpose of this oil was for application to fence posts as a wood preservative. None of the oil was used for this purpose.

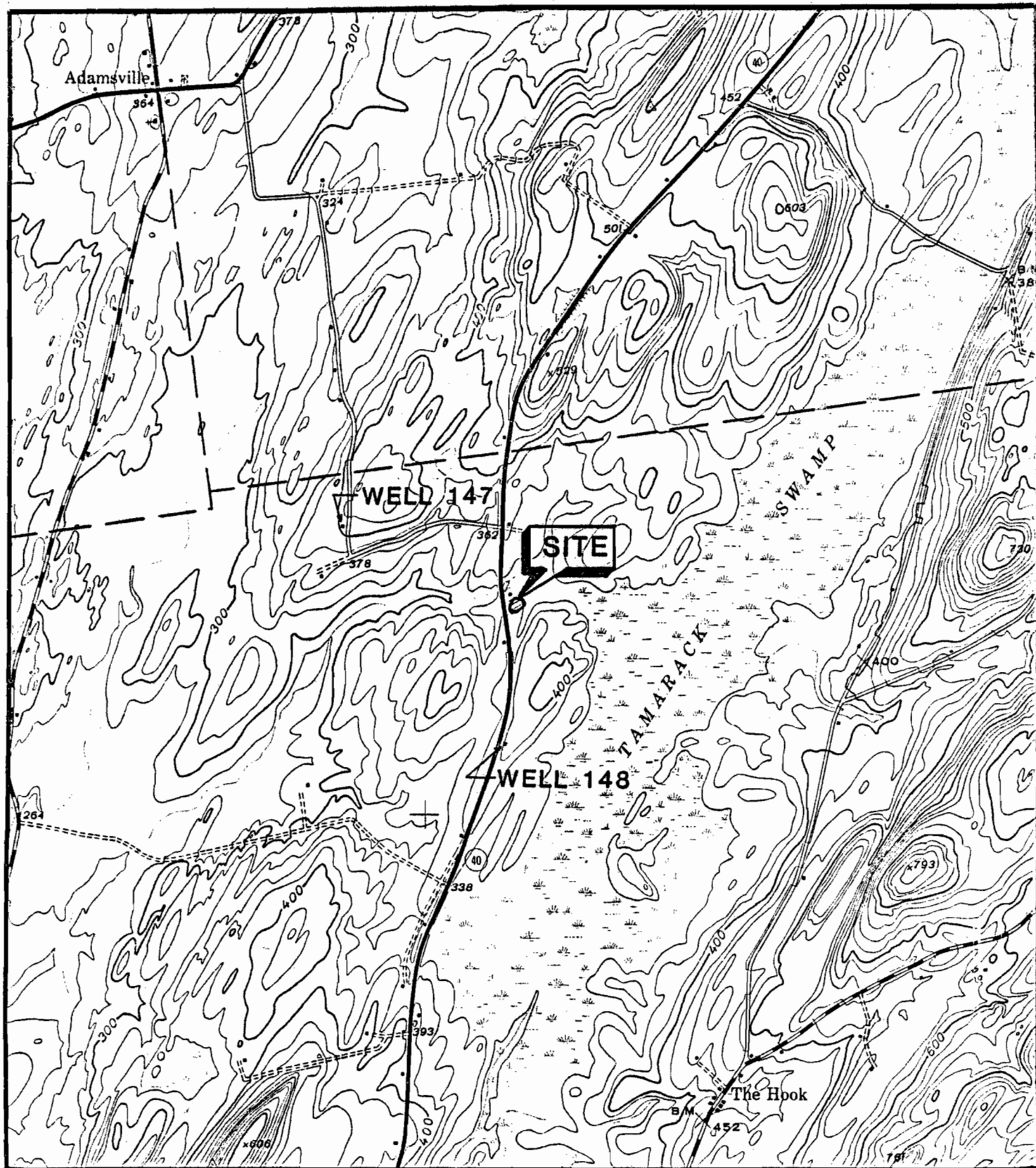
In 1979, the site was listed on the State's Inactive Hazardous Waste Site Registry. However, remedial action at the site did not occur until 1983. During this time period, several barrels of waste oil (four to five) deteriorated and spilled their contents onto the ground surface. A total of 100 gallons is estimated to have spilled.

Remedial actions at the site included removal of the barrels and approximately 50 cubic yards of contaminated soil. Some contaminated soil may still remain at the site. No additional monitoring has been conducted to determine if vertical or horizontal migration of contaminants has occurred.

Preliminary investigations indicate the prevailing soil type to be clay underlain by shale bedrock. An adjacent 500+-acre wetland is separated from the site by a physiographic change in drainage basins. A small unnamed stream located north of the site is the probable target of surface contaminants.

A preliminary HRS Score of $S_m = 13.84$ has been assigned to this site.

LOCATION



SCALE: 1" = 2000'
 TOPOGRAPHY TAKEN FROM
 1944 HARTFORD, N.Y.
 U.S.G.S. QUADRANGLE
 7.5 MIN. SERIES
 (PHOTOINSPECTED 1976)



FIGURE 1
 SITE LOCATION MAP
 DOETSCH RESIDENCE
 ARGYLE, N.Y.

HRS WORKSHEETS

Facility Name: Doetsch Residence

Location: Route 40, Town of Argyle, Washington County

EPA Region: II

Person(s) in Charge of the Facility: Francis Doetsch (Owner)
Route 40, RD#2
Argyle, New York 12809

Name of Reviewer: David B. Tompkins **Date:** Current

General Description of the Facility:

(For example: landfill, surface impoundment, pile, container; types of hazardous substances; location of the facility; contamination route of major concern; types of information needed for rating; agency action, etc.)

Twenty-seven barrels of waste oil from GE, Fort Edward were stored at this site from 1963 to 1982. Subsequent deterioration and release of the oils onto the ground surface occurred. Sampling indicated the presence of PCBs in waste oil. Remedial actions occurred in 1982 and included drum removal and excavation of an estimated 50 cubic yards of contaminated soil. Some contaminated soil reportedly remains at the site. Soil types at the site are predominantly clay with shale bedrock underlying the site.

Scores: $S_M = 13.84$ ($S_{gw} = 23.07$ $S_{sw} = 6.38$ $S_a = 0.00$)

$S_{FE} = 0.00$

$S_{DC} = 12.50$

GROUND WATER ROUTE WORK SHEET

Rating Factor	Assigned Value (Circle One)	Multi- plier	Score	Max. Score	Ref. (Section)
1 Observed Release	0 45	1	0	45	3.1
If observed release is given a score of 45, proceed to line 4 . If observed release is given a score of 0, proceed to line 2 .					
2 Route Characteristics					3.2
Depth to Aquifer of Concern	0 1 2 3	2	2	6	
Net Precipitation	0 1 2 3	1	2	3	
Permeability of the Unsaturated Zone	0 1 2 3	1	1	3	
Physical State	0 1 2 3	1	3	3	
Total Route Characteristics Score			8	15	
3 Containment	0 1 2 3	1	3	3	3.3
4 Waste Characteristics					3.4
Toxicity/Persistence	0 3 6 9 12 15 18	1	18	18	
Hazardous Waste Quantity	0 1 2 3 4 5 6 7 8	1	1	8	
Total Waste Characteristics Score			19	26	
5 Targets					3.5
Ground Water Use	0 1 2 3	3	9	9	
Distance to Nearest Well/Population Served	0 4 8 12 16 18 20 24 30 32 35 40	1	20	40	
Total Targets Score			29	49	
6 If line 1 is 45, multiply 1 x 4 x 5 If line 1 is 0, multiply 2 x 3 x 4 x 5			13,224	57,330	
7 Divide line 6 by 57,330 and multiply by 100 $S_{gw} = 23.07$					

SURFACE WATER ROUTE WORK SHEET

Rating Factor	Assigned Value (Circle One)	Multi-plier	Score	Max. Score	Ref. (Section)
1 Observed Release	0 45	1	0	45	4.1
If observed release is given a value of 45, proceed to line 4 . If observed release is given a value of 0, proceed to line 2 .					
2 Route Characteristics					4.2
Facility Slope and Intervening Terrain	0 1 2 3	1	1	3	
1-yr. 24-hr. Rainfall	0 1 2 3	1	2	3	
Distance to Nearest Surface Water	0 1 2 3	2	6	6	
Physical State	0 1 2 3	1	3	3	
Total Route Characteristics Score			12	15	
3 Containment	0 1 2 3	1	3	3	4.3
4 Waste Characteristics					4.4
Toxicity/Persistence	0 3 6 9 12 15 18	1	18	18	
Hazardous Waste Quantity	0 1 2 3 4 5 6 7 8	1	1	8	
Total Waste Characteristics Score			19	26	
5 Targets					4.5
Surface Water Use	0 1 2 3	3	6	9	
Distance to a Sensitive Environment	0 1 2 3	2	0	6	
Population Served/Distance to Water Intake Downstream	$\left\{ \begin{array}{l} \text{0} \text{ 4 6 8 10} \\ \text{12 16 18 20} \\ \text{24 30 32 35 40} \end{array} \right.$	1	0	40	
Total Targets Score			6	55	
6 If line 1 is 45, multiply 1 x 4 x 5 If line 1 is 0, multiply 2 x 3 x 4 x 5			4,104	64,350	
7 Divide line 6 by 64,350 and multiply by 100			$S_{sw} = 6.38$		

AIR ROUTE WORK SHEET

Rating Factor	Assigned Value (Circle One)	Multi-plier	Score	Max. Score	Ref. (Section)
[1] Observed Release	(0) 45	1	0	45	5.1
Date and Location:					
Sampling Protocol:					
If line [1] is 0, the S = 0. Enter on line [5] . If line [1] is 45, then proceed to line [2] .					
[2] Waste Characteristics					5.2
Reactivity and Incompatibility	0 1 2 3	1		3	
Toxicity	0 1 2 3	3		9	
Hazardous Waste Quantity	0 1 2 3 4 5 6 7 8	1		8	
Total Waste Characteristics Score				20	
[3] Targets					5.3
Population Within 4-Mile Radius	{ 0 9 12 15 18 21 24 27 30	1		30	
Distance to Sensitive Environment	0 1 2 3	2		6	
Land Use	0 1 2 3	1		3	
Total Targets Score				39	
[4] Multiply [1] x [2] x [3]				35,100	
[5] Divide line [4] by 35,100 and multiply by 100 $S_a = 0$					

	S	S ²
Groundwater Route Score (S _{gw})	23.07	532.22
Surface Water Route Score (S _{sw})	6.38	40.70
Air Route Score (S _a)	0.00	0.00
$S_{gw}^2 + S_{sw}^2 + S_a^2$		572.92
$\sqrt{S_{gw}^2 + S_{sw}^2 + S_a^2}$		23.94
$\sqrt{S_{gw}^2 + S_{sw}^2 + S_a^2} / 1.73$		S _M = 13.84

WORKSHEET FOR COMPUTING S_M

FIRE AND EXPLOSION WORK SHEET Non-Applicable

Rating Factor	Assigned Value (Circle One)	Multi- plier	Score	Max. Score	Ref. (Section)
[1] Containment	1 3	1		3	7.1
[2] Waste Characteristics					7.2
Direct Evidence	0 3	1		3	
Ignitability	0 1 2 3	1		3	
Reactivity	0 1 2 3	1		3	
Incompatibility	0 1 2 3	1		3	
Hazardous Waste Quantity	0 1 2 3 4 5 6 7 8	1		8	
Total Waste Characteristics Score				20	
[3] Targets					7.3
Distance to Nearest Population	0 1 2 3 4 5	1		5	
Distance to Nearest Building	0 1 2 3	1		3	
Distance to Sensitive Environment	0 1 2 3	1		3	
Land Use	0 1 2 3	1		3	
Population Within 2-Mile Radius	0 1 2 3 4 5	1		5	
Buildings Within 2-Mile Radius	0 1 2 3 4 5	1		5	
Total Targets Score				24	
[4] Multiply [1] x [2] x [3]				1,440	
[5] Divide line [5] by 1,440 and multiply by 100 S F E =					

DIRECT CONTACT WORK SHEET

Rating Factor	Assigned Value (Circle One)	Multi-plier	Score	Max. Score	Ref. (Section)
1 Observed Incident	0 45	1	0	45	8.1
If line 1 is 45, proceed to line 4 If line 1 is 0, proceed to line 2					
2 Accessibility	0 1 2 3	1	3	3	8.2
3 Containment	0 15	1	15	15	8.3
4 Waste Characteristics Toxicity	0 1 2 3	5	15	15	8.4
5 Targets					8.5
Population Within a 1-Mile Radius	0 1 2 3 4 5	4	4	20	
Distance to a Critical Habitat	0 1 2 3	4	0	12	
Total Targets Score			4	32	
6 If line 1 is 45, multiply 1 x 4 x 5 If line 1 is 0, multiply 2 x 3 x 4 x 5			2,700	21,600	
7 Divide line 6 by 21,600 and multiply by 100 SOC = 12.50					

HRS DOCUMENTATION RECORDS

June 28, 1982

**DOCUMENTATION RECORDS
FOR
HAZARD RANKING SYSTEM**

INSTRUCTIONS: The purpose of these records is to provide a convenient way to prepare an auditable record of the data and documentation used to apply the Hazard Ranking System to a given facility. As briefly as possible summarize the information you used to assign the score for each factor (e.g., "Waste quantity = 4,230 drums plus 800 cubic yards of sludges"). The source of information should be provided for each entry and should be a bibliographic-type reference that will make the document used for a given data point easier to find. Include the location of the document and consider appending a copy of the relevant page(s) for ease in review.

FACILITY NAME: Doetsch Residence

LOCATION: Town of Argyle, Washington County

GROUND WATER ROUTE

1 OBSERVED RELEASE

Contaminants detected (5 maximum):

No groundwater analysis has occurred.

Score = 0

Source: References 1.1-1.11

Rationale for attributing the contaminants to the facility:

Not applicable

2 ROUTE CHARACTERISTICS

Depth to Aquifer of Concern

Name/description of aquifer(s) of concern:

Well records from the USGS Groundwater Report indicates most wells in the area are located in the consolidated bedrock aquifer. In the area of the site, shale is indicated as the predominant bedrock type. Bedrock was encountered at 40-45 feet below the ground surface in two wells closest to the site. Groundwater appears to be moving in a northwest direction through the shale. Till in Washington County contains large amounts of clay and is relatively impermeable. Because of the wide distribution of the till throughout the County, many large infiltration wells (dug wells) yield sufficient quantities of water for domestic and stock use. Many of these obtain water from more permeable lenses of sand and gravel or from the zone between the base of the till and the bedrock surface. Although there is a large amount of clay in the till, it is unknown if stratified clay layers exist which may restrict vertical migration of groundwater and contaminants. Subsequently, a hydraulic connection will be assumed to exist between the till and underlying bedrock.

Source: Reference 15.1

Depth(s) from the ground surface to the highest seasonal level of the saturated zone (water table(s)) of the aquifer of concern:

Well records indicate the two wells closest to the site have a water table level of 128 feet (No. 147) and 90 feet (No. 148) below the ground surface. For purposes of scoring, assume a mean depth of 109 feet below the ground surface.

Score = 1

Source: Reference 15.1

Depth from the ground surface to the lowest point of waste disposal/storage:

Drums were stored on the ground surface and no known burial of waste has occurred.

Depth to aquifer = 109 feet

Score = 1

Source: References 1.1-1.11

Net Precipitation

Mean annual or seasonal precipitation (list months for seasonal):

40 inches

Source: Reference 3.1

Mean annual lake or seasonal evaporation (list months for seasonal):

26 inches

Source: Reference 2.3

Net precipitation (subtract the above figures):

14 inches

Score = 2

Source: Reference 2.1

Permeability of Unsaturated Zone

Soil type in unsaturated zone:

Soil in the vicinity of the site is predominantly clay and underlain by shale bedrock.

Source: Reference 15

Permeability associated with soil type:

10^{-5} to 10^{-7} cm/sec

Score = 1

Source: Reference 2.3

Physical State

Physical state of substances at time of disposal (or at present time for generated gases):

Type of waste = oil (liquid)

Score = 3

Source: References 4.1-4.2, 5.1-5.2, 6.1-6.2

3 CONTAINMENT

Containment

Method(s) of waste or leachate containment evaluated:

Waste oils were contained in drums that deteriorated and spilled onto the ground surface.

No liner was used at the site.

Source: References 1.1-1.11, 4.1-4.2

Method with highest score:

No liner or surface diversion

Score = 3

Source: Reference 2.1

4 WASTE CHARACTERISTICS

Toxicity and Persistence

Compound(s) evaluated:

Sampling results indicated oils contained low to extremely high concentrations of PCBs.

One drum was also reported to contain pentachlorophenol (PCP).

Source: References 5.1-5.2, 6.1-6.2, 7.1-7.13

Compound with highest score:

PCB = 18

PCP = 18

Source: Reference 8.1-8.5

Hazardous Waste Quantity

Total quantity of hazardous substances at the facility, excluding those with a containment score of 0 (Give a reasonable estimate even if quantity is above maximum):

Twenty-seven barrels were originally stored at the site. However, these were removed in 1982. Presently, there is no waste stored at the site. Consistent with the National Priorities Seminar (May 1985), the site will be scored on the presence of 27 drums prior to remedial action.

Score = 1

Source: References 2.1, 6.1, 16

Basis of estimating and/or computing waste quantity:

Actual count reported by NYSDEC.

Source: Reference 6.1

5 TARGETS

Ground Water Use

Use(s) of aquifer(s) of concern within a 3-mile radius of the facility:

Drinking water

Score = 3

Source: References 1.1-1.11

Distance to Nearest Well

Location of nearest well drawing from aquifer of concern or occupied building not served by a public water supply:

The Doetsch residence is served by a groundwater well located 300 feet north of the storage area. Depth of this well and aquifer utilized is unknown.

Source: References 1.1-1.11, 16.2

Distance to above well or building:

300 feet

Value = 4

Source: References 1.1-1.11

Population Served by Ground Water Wells Within a 3-Mile Radius

Identified water-supply well(s) drawing from aquifer(s) of concern within a 3-mile radius and populations served by each:

A hydraulic connection between aquifers has been assumed. All wells within three miles will be scored. Two non-municipal community wells - Tamarack Valley Trailer Park - 37 people (located east of site) and Mt. View Mobile Estates - 96 people. Three-mile house count (USGS Topographic Map revised 1976) -193 homes x 3.8 people/house = 733 total people.

133
+733
<hr/> 866

Total population

Value = 2

Source: References 9.1-9.2, 10.1-10.3

Computation of land area irrigated by supply well(s) drawing from aquifer(s) of concern within a 3-mile radius, and conversion to population (1.5 people per acre):

No known irrigation supplied by groundwater sources.

Score = 0

Source: References 11.1-11.2

Total population served by ground water within a 3-mile radius:

Total population served by groundwater is estimated at 770 people.

Score = 20

Source: Reference 9.1-9.2, 10.1-10.3, 11.1-11.2

SURFACE WATER ROUTE

1 OBSERVED RELEASE

Contaminants detected in surface water at the facility or downhill from it (5 maximum):

No analysis for surface water contaminants has occurred.

Score = 0

Source: References 1.1-1.11

Rationale for attributing the contaminants to the facility:

Not applicable

2 ROUTE CHARACTERISTICS

Facility Slope and Intervening Terrain

Average slope of facility in percent:

0-2 percent

Source: References 1.1-1.11

Name/description of nearest downslope surface water:

A small unnamed stream is located 200 feet south of the site and 500+ acres wetland is located east of the site. A physiographic change in drainage basins separates Tamarack Swamp from the site. The Doetsch property drains north into the unnamed stream.

Source: References 1.1-1.11

Average slope of terrain between facility and above-cited surface water body in percent:

3-5 percent

Score = 1

Source: References 1.1-1.11

Is the facility located either totally or partially in surface water?

No, the facility is not located in surface water.

Source: References 1.1-1.11

Is the facility completely surrounded by areas of higher elevation?

No, the facility site is not surrounded by higher elevations.

Source: References 1.1-1.11

1-Year 24-Hour Rainfall in Inches

2.5 inches

Score = 2

Source: Reference 2.4

Distance to Nearest Downslope Surface Water

Estimated at 200 feet.

Score = 3

Source: References 1.1-1.11

Physical State of Waste

Mineral oils containing PCB and PCP

Source: References 4.1-4.2, 5.1-5.2, 6.1-6.2

3 CONTAINMENT

Containment

Method(s) of waste or leachate containment evaluated:

Containers leaking and no diversion or containment structures.

Source: References 1.1-1.11, 4.1-4.2, 6, 7, 16

Method with highest score:

Containers leaking and no diversion or containment structures.

Score = 3

Source: Reference 2.1

4 WASTE CHARACTERISTICS

Toxicity and Persistence

Compound(s) evaluated

Sampling results indicated oils contained low to extremely high concentrations of PCBs.

One drum was also reported to contain pentachlorophenol (PCP).

Source: References 5.1-5.2, 6.1-6.2, 7.1-7.13

Compound with highest score:

PCB = 18

PCP = 18

Source: Reference 8.1-8.5

Hazardous Waste Quantity

Total quantity of hazardous substances at the facility, excluding those with a containment score of 0 (Give a reasonable estimate even if quantity is above maximum):

Twenty-seven barrels were originally stored at the site. However, these were removed in 1982. Presently, there is no waste stored at the site. Consistent with the National Priorities Seminar (May 1985), the site will be scored on the presence of 27 drums prior to remedial action.

Score = 1

Source: Reference 2.1

Basis of estimating and/or computing waste quantity:

Actual count reported by NYSDEC.

Source: Reference 6.1

5 TARGETS

Surface Water Use

Use(s) of surface water within 3 miles downstream of the hazardous substance:

Recreation only

Score = 2

Source: References 12.2

Is there tidal influence?

Not applicable

Source: Reference 13.1.

Distance to a Sensitive Environment

Distance to 5-acre (minimum) coastal wetland, if 2 miles or less:

Not applicable

Source: Reference 13.1

Distance to 5-acre (minimum) fresh-water wetland, if 1 mile or less:

No five-acre wetlands are within one mile of the site.

Source: References 1.1-1.11, 13.1

Distance to critical habitat of an endangered species or national wildlife refuge, if 1 mile or less:

No critical habitats of a federally endangered species are within one mile.

Source: References 14.1-14.3

Population Served by Surface Water

Location(s) of water-supply intake(s) within 3 miles (free-flowing bodies) or 1 mile (static water bodies) downstream of the hazardous substance and population served by each intake:

No surface water intakes have been identified within three miles downstream.

Score = 0

Source: References 10.1-10.3, 12.1-12.3

Computation of land area irrigated by above-cited intake(s) and conversion to population (1.5 people per acre):

Five acres of irrigated farmland have been identified but due to its topographic position in relation to the site, it will not be considered in scoring.

Score = 0

Source: References 11.1-11.2

Total population served:

Population served = 0

Source: References 10.1-10.3, 11.1-11.2, 12.1-12.2

Name/description of nearest of above water bodies:

Not applicable

Source: Reference 13.1

Distance to above-cited intakes, measured in stream miles:

No intakes for any purpose.

Source: References 10.1-10.3, 11.1-11.2, 12.1-12.2

AIR ROUTE

1 OBSERVED RELEASE

Contaminants detected:

No documentation or evidence of a release to the air route has been obtained.

Score = 0

Source: References 1.11, 5.1-5.2, 6.1-6.2

Date and location of detection of contaminants:

Not applicable

Methods used to detect the contaminants:

Not applicable

Rationale for attributing the contaminants to the site:

Not applicable

2 WASTE CHARACTERISTICS

Reactivity and Incompatibility

Most reactive compound:

Not applicable

Most incompatible pair of compounds:

Not applicable

Toxicity

Most toxic compound:

Not applicable

Hazardous Waste Quantity

Total quantity of hazardous waste:

Not applicable

Basis of estimating and/or computing waste quantity:

Not applicable

3 TARGETS

Population Within 4-Mile Radius

Circle radius used, give population, and indicate how determined:

0 to 4 mi 0 to 1 mi 0 to 1/2 mi 0 to 1/4 mi

Not applicable

Distance to a Sensitive Environment

Distance to 5-acre (minimum) coastal wetland, if 2 miles or less:

Not applicable

Distance to 5-acre (minimum) fresh-water wetland, if 1 mile or less:

Not applicable

Distance to critical habitat of an endangered species, if 1 mile or less:

Not applicable

Land Use

Distance to commercial/industrial area, if 1 mile or less:

Not applicable

Distance to national or state park, forest, or wildlife reserve, if 2 miles or less:

Not applicable

Distance to residential area, if 2 miles or less:

Not applicable

Distance to agricultural land in production within past 5 years, if 1 mile or less:

Not applicable

Distance to prime agricultural land in production within past 5 years, if 2 miles or less:

Not applicable

Is a historic or landmark site (National Register of Historic Places and National Natural Landmarks) within the view of the site?

Not applicable

FIRE AND EXPLOSION

1 CONTAINMENT

Hazardous substances present:

To score the fire and explosion hazard mode either a state or local fire marshall must have certified that the facility presents a significant fire or explosion threat to the public or to a sensitive environment, or there must be a demonstrated threat based on field observations (e.g. combustible gas indicator readings). The available records give no indication that either one of these tasks has been done. Further, the available data do not suggest any imminent threat of fire and explosion at this site. Therefore the route score cannot be completed.

Type of containment, if applicable:

Not applicable

2 WASTE CHARACTERISTICS

Direct Evidence

Type of instrument and measurements:

Not applicable

Ignitability

Compound used:

Not applicable

Reactivity

Most reactive compound:

Not applicable

Incompatibility

Most incompatible pair of compounds:

Not applicable

Hazardous Waste Quantity

Total quantity of hazardous substances at the facility:

Not applicable

Basis of estimating and/or computing waste quantity:

Not applicable

3 TARGETS

Distance to Nearest Population

Not applicable

Distance to Nearest Building

Not applicable

Distance to Sensitive Environment

Distance to wetlands:

Not applicable

Distance to critical habitat

Not applicable

Land Use

Distance to commercial/industrial area, if 1 mile or less:

Not applicable

Distance to national or state park, forest, or wildlife reserve, if 2 miles or less:

Not applicable

Distance to residential area, if 2 miles or less:

Not applicable

Distance to agricultural land in production within past 5 years, if 1 mile or less:

Not applicable

Distance to prime agricultural land in production within past 5 years, if 2 miles or less:

Not applicable

Is a historic or landmark site (National Register of Historic Places and National Natural Landmarks) within the view of the site?

Not applicable

Population Within 2-Mile Radius

Not applicable

Buildings Within 2-Mile Radius

Not applicable

DIRECT CONTACT

1 OBSERVED INCIDENT

Date, location, and pertinent details of incident:

No documentation of an incident due to direct contact has been obtained.

Score = 0

Source: References 1.1-1.11

2 ACCESSIBILITY

Describe type of barrier(s):

No barriers to access are present at site.

Score = 3

Source: References 1.1-1.11

3 CONTAINMENT

Type of containment, if applicable:

No measures of containment have been employed at the site.

Score = 15

Source: References 1.1-1.11

4 WASTE CHARACTERISTICS

Toxicity

Compounds evaluated:

PCB
PCP

Source: References 7.1-7.12

Compound with highest score:

PCB = 3
PCP = 3

Source: References 8.1-8.5

5 TARGETS

Population within one-mile radius

14 private homes are within one mile, 53 people.

Score = 1

Source: Reference 9.1

Distance to critical habitat (of endangered species)

No critical habitats of any federal endangered species are within one mile.

Score = 0

Source: References 14.1-14.3

WEHRAN ENGINEERING - SITE INSPECTION FORM

1. IDENTIFICATION

Doetsch Residence

Site Name

Washington

County

558012

NY Number

5

NYSDEC Region

2. LOCATION

Route 40

Street/Route No.

Argyle

Town

City

Village

Hartford

USGS Quadrangle

3. INSPECTION

7/15/86

Date of Inspection

3:30 P.M.

Time of Inspection

Warm, clear

Weather Conditions and Snow Cover

WE Inspectors (Name)

Title

Phone Number

David B. Tompkins

Environmental Scientist

914-343-0660

Karen E. Maloy

Environmental Scientist

914-343-0660

Other Inspectors (Name)

Affiliation

Phone Number

Reference 1.2

Site Reps. Interviewed	Affiliation	Phone Number
Mr. Francis Doetsch	Owner	518-638-8320
		518-747-6067

4. SITE DESCRIPTION

4.1 Site History

Active _____

Inactive ☒

Years of Operation: N/A

Owner(s): Mr. Francis Doetsch

4.2 Storage/Disposal (Check all that apply)

	<u>Size/Amount</u>	<u>Unit of Measure</u>
<u> </u> A. Surface Impoundment	<u> </u>	<u> </u>
<u> </u> B. Piles	<u> </u>	<u> </u>
<u>X</u> C. Drums, Above Ground	<u>27</u>	<u>55 gal. drums (removed)</u>
<u> </u> D. Tank, Above Ground	<u> </u>	<u> </u>
<u> </u> E. Tank, Below Ground	<u> </u>	<u> </u>
<u> </u> F. Landfill	<u> </u>	<u> </u>
<u> </u> G. Landfarm	<u> </u>	<u> </u>
<u> </u> H. Open Dump	<u> </u>	<u> </u>
<u> </u> I. Spill	<u> </u>	<u> </u>
<u> </u> J. Well Field	<u> </u>	<u> </u>
<u> </u> K. Other ()	<u> </u>	<u> </u>

4.3 Treatment (Check all that apply)

N/A

- | | |
|--|--|
| <input type="checkbox"/> A. Burning | <input type="checkbox"/> E. Waste Oil Processing |
| <input type="checkbox"/> B. Incineration | <input type="checkbox"/> F. Solvent Recovery |
| <input type="checkbox"/> C. Underground Injection | <input type="checkbox"/> G. Other Recycling/Recovery |
| <input type="checkbox"/> D. Chemical/Physical/Biological | <input type="checkbox"/> H. Other (_____) |

4.4 Waste Substances Observed (include hazardous)

None

Drums that were present on-site were removed

4.5 Containment of Wastes (describe)

No containment during storage

Surrounding soil removed

4.6 Accessibility of Public to Wastes (describe)No restrictions to accessSite is on private propertyNearest neighbor is 700 feet**5. ENVIRONMENTAL MEASUREMENTS (DURING INSPECTION)****5.1 HNU/OVA Readings (Note locations on site sketch)**

<u>Location</u>	<u>Value (ppm)</u>	<u>Classification</u>
Background		

Method/Instrument: None taken - Photovac Tip Meter inoperative

5.2 Site Topography (Describe relative to regional features)The site is relatively flat, sloping gently to the NW (0-2%).Adjacent to the site is a large wet meadow (east of site)

Reference 1.5

5.3 Site Slope (percent)

	<u>Reading (Percent)</u>
Read from highest disposal area surface to edge of disposal area.	_____
If disposal area is within enclosed basin, report as zero.	_____

Average	<u>0-2</u>

5.4 Prevailing Direction of Site Slope northwest

5.5 Distance to Nearest Downslope Surface Waters (from edge of disposal area)

<u>Name/Description</u>	<u>Distance</u>	<u>Units</u>	<u>Permanent/Intermittent</u>
unnamed stream	200	feet	Permanent
_____	_____	_____	_____
_____	_____	_____	_____

5.6 Intervening Terrain Slope to Nearest Downslope Waters (from edge of disposal area)

<u>Name/Description</u>	<u>Reading (Percent)</u>
Unnamed stream	0-5%
_____	_____
_____	_____

5.7 Distance to Nearest Downslope Wetlands (5-acre minimum)

<u>Size (Acres)</u>	<u>Distance</u>	<u>Units</u>
N/A	_____	_____
*See below	_____	_____
_____	_____	_____

*Tammarack Swamp, a 500⁺ acre wetland is estimated to be 400 feet east of the site. However, a physiographic change in drainage basin is anticipated to be between the site and Tammarack Swamp.

5.8 Distance to Critical Habitat (endangered species)

Name/Location	Distance	Units
#58013 is located within one mile		
(Heron Rookery) — Not an endangered species		
— Sig. habitat due to use as breeding grounds — see Ref 14.1.		

5.9 Observed Site Geology (Describe from visual observations)

Overburden (soils)	Clay
Bedrock	
Depth to Rock	

5.10 Distance to Nearest Potable Well (Identify on topographic map)

Type (Private/Community/Municipal)	Distance	Units
Private; on-site	300	feet

5.11 Distance to Nearest Off-Site Building

700 feet

miles.

5.12 Describe Source and Use of Water on Site

Private drinking water supply

6.0 LAND USE**6.1 Distance to Nearest:**

Residential Area	<u>0.1</u>	miles
Commercial/Industrial	<u> </u>	miles
Recreation Use	<u> </u>	miles
Forest	<u>0.1</u>	miles
Wildlife Reserve	<u> </u>	miles
Historic/Landmark Site	<u> </u>	miles
Prime Agricultural Land	<u>0.5</u>	miles
Agricultural Land	<u> </u>	miles

7.0 SITE EVALUATION**7.1 Landfills/Open Dumps/Piles (Use N/A if not applicable)**

Adequacy of Cover: _____

Adequacy of Runoff Diversion: _____

Potential/Observed Ponding: _____

Waste Piles Stabilized/Unstabilized: _____

Permeability/Compatibility of Liner: _____

Observed Seeps: _____

Adequacy of Leachate Collection: _____

Adequacy of Run-On Controls: _____

7.2 Surface Impoundments Size/Capacity

Adequacy of Diking/Diversion Structures: _____

Adequacy of Freeboard: _____

Potential/Observed Leaking: _____

Permeability/Compatibility of Liner: _____

Adequacy of Run-On Control: _____

Adequacy of Leachate Collection System: _____

7.3 Containers

Number and Type of Containers Observed: _____

Container Condition: _____

Observed Leaking (during inspection): _____

Evidence of Previous Ground Spills: _____

Evidence of Underground Tank Leaking: _____

Adequacy of Containment/Diversion Structures: _____

Reference 1.9

8.0 MONITORING/OBSERVATION WELLS

8.1 Number of On-Site Wells: One private well only

Diameter and Materials: _____

8.2 Number of Off-Site Wells: N/A

Diameter and Materials _____

8.3 Well Identification and Inspection (Include on-site sketch)

							Water Level (ft) ¹
<u>Well No.</u>	<u>Location/ Gradient</u>	<u>Total Depth</u>	<u>Screen Interval</u>	<u>Top of Water</u>	-	<u>Stickup</u>	= <u>Depth to Water</u>
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____
_____	_____	_____	_____	_____	-	_____	= _____

¹Measurements taken during site inspection to accuracy of 0.01 ft.

8.4 Water Level Instrument/Method:

8.5 Condition of Wells/Seals:N/A

_____**8.6 Well Records (from site owner, operator, or contractor)**Wells Installed by (Driller): N/A

Installed for: _____

Tested by (lab): _____

Data Obtained by WE (yes/no): _____

Boring Logs Obtained by WE (yes/no): _____

8.7 Headspace HNU/OVA Readings

<u>Well No.</u>	<u>Reading (ppm)</u>	<u>Classification</u>
Background	_____	_____
N/A	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____

Reference 1.11

9. COMMENTS AND INTERVIEW NOTES (IDENTIFY SOURCES)

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

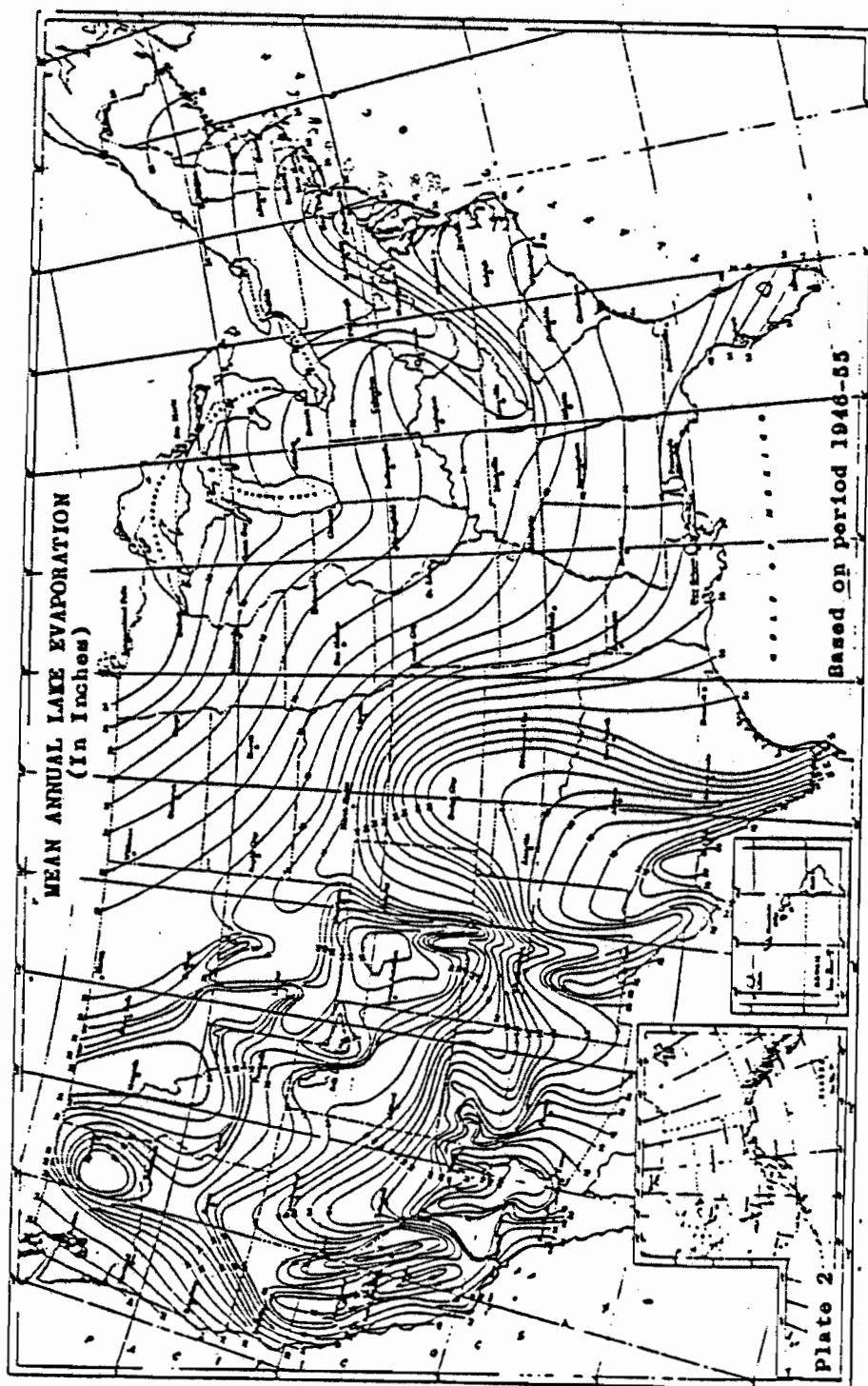
Uncontrolled Hazardous Waste Site Ranking System

A Users Manual (HW-10)

Originally Published in
the July 16, 1982, *Federal Register*

United States
Environmental Protection
Agency

1984



Source: Climatic Atlas of the United States, U.S. Department of Commerce, National Climatic Center, Ashville, N.C., 1979.

FIGURE 4
MEAN ANNUAL LAKE EVAPORATION
(IN INCHES)

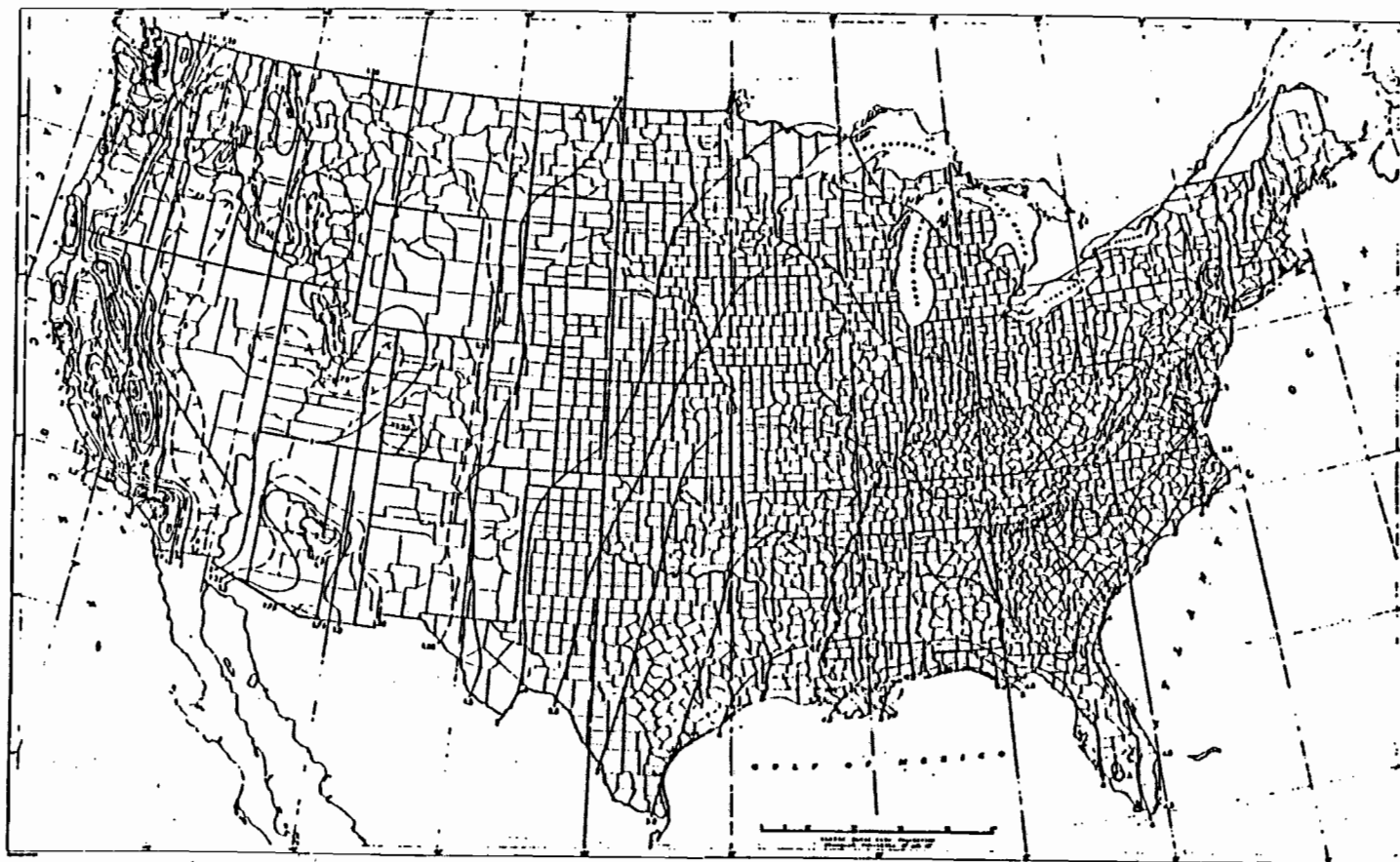
TABLE 2
PERMEABILITY OF GEOLOGIC MATERIALS*

Type of Material	Approximate Range of Hydraulic Conductivity	Assigned Value
Clay, compact till, shale; unfractured metamorphic and igneous rocks	$<10^{-7}$ cm/sec	0
Silt, loess, silty clays, silty loams, clay loams; less permeable limestone, dolomites, and sandstone; moderately permeable till	$10^{-5} - 10^{-7}$ cm/sec	1
Fine sand and silty sand; sandy loams; loamy sands; moderately permeable limestone, dolomites, and sandstone (no karst); moderately fractured igneous and metamorphic rocks, some coarse till	$10^{-3} - 10^{-5}$ cm/sec	2
Gravel, sand; highly fractured igneous and metamorphic rocks; permeable basalt and lavas; karst limestone and dolomite	$>10^{-3}$ cm/sec	3

*Derived from:

Davis, S. N., Porosity and Permeability of Natural Materials in Flow-Through Porous Media, R.J.M. DeWiest ed., Academic Press, New York, 1969

Freeze, R.A. and J.A. Cherry, Groundwater, Prentice-Hall, Inc., New York, 1979



Source: Rainfall Frequency Atlas of the United States, Technical Paper No. 40, U.S. Department of Commerce, U.S. Government Printing Office, Washington, D.C., 1961.

FIGURE 8
1-YEAR 24-HOUR RAINFALL
(INCHES)

Rt 2.4

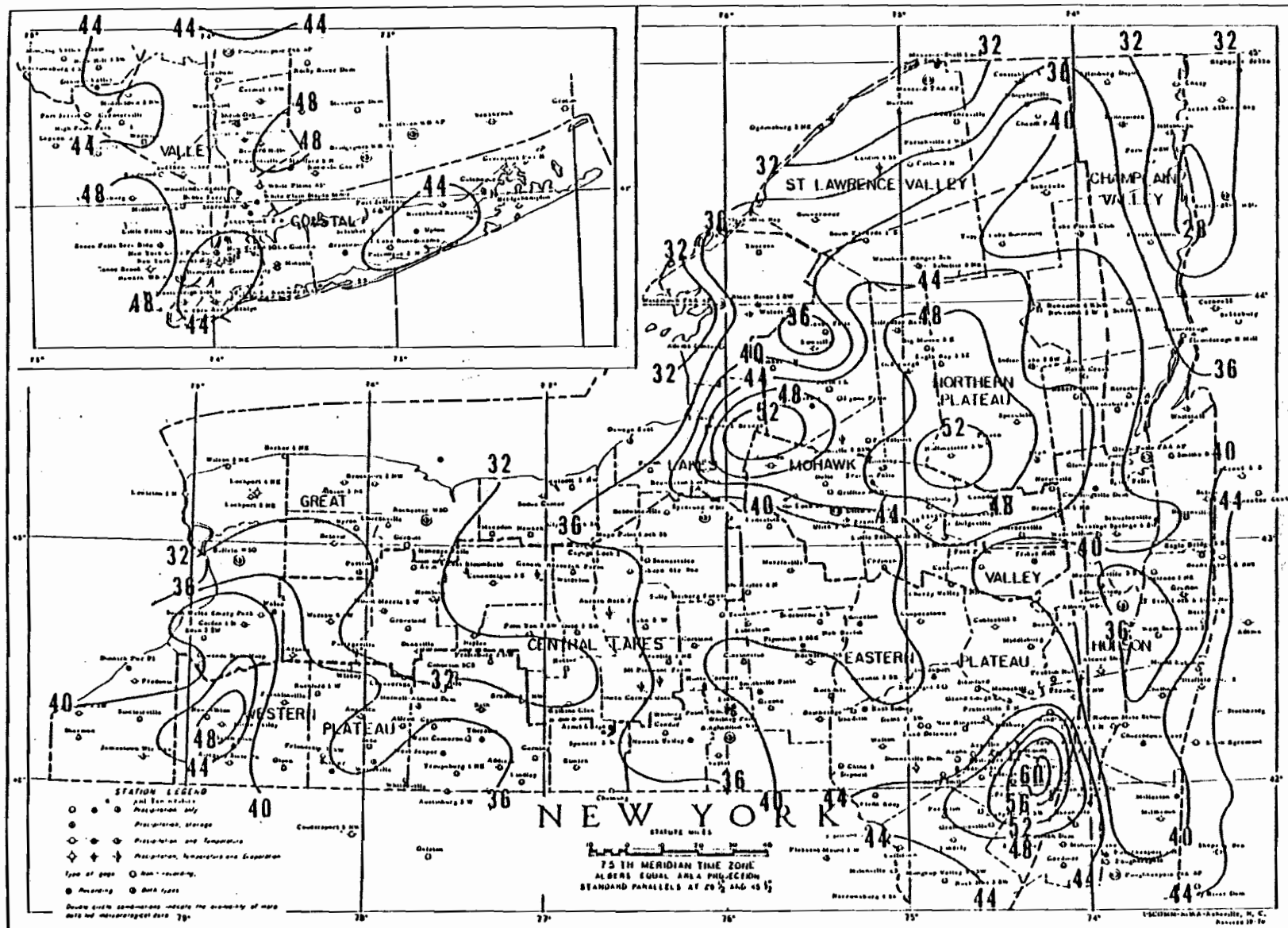
TABLE 9

CONTAINMENT VALUES FOR SURFACE WATER ROUTE

Assign containment a value of 0 if: (1) all the waste at the site is surrounded by diversion structures that are in sound condition and adequate to contain all runoff, spills, or leaks from the waste; or (2) intervening terrain precludes runoff from entering surface water. Otherwise, evaluate the containment for each of the different means of storage or disposal at the site and assign a value as follows:

A. <u>Surface Impoundment</u>		C. <u>Waste Piles</u>	
	<u>Assigned Value</u>		<u>Assigned Value</u>
Sound diking or diversion structure, adequate freeboard, and no erosion evident	0	Files are covered and surrounded by sound diversion or containment system	0
Sound diking or diversion structure, but inadequate freeboard	1	Files covered, wastes unconsolidated, diversion or containment system not adequate	1
Diking not leaking, but potentially unsound	2	Files not covered, wastes unconsolidated, and diversion or containment system potentially unsound	2
Diking unsound, leaking, or in danger of collapse	3	Files not covered, wastes unconsolidated, and no diversion or containment or diversion system leaking or in danger or collapse	3
B. <u>Containers</u>		D. <u>Landfill</u>	
	<u>Assigned Value</u>		<u>Assigned Value</u>
Containers sealed, in sound condition, and surrounded by sound diversion or containment system	0	Landfill slope precludes runoff, landfill surrounded by sound diversion system, or landfill has adequate cover material	0
Containers sealed and in sound condition, but not surrounded by sound diversion or containment system	1	Landfill not adequately covered and diversion system sound	1
Containers leaking and diversion or containment structures potentially unsound	2	Landfill not covered and diversion system potentially unsound	2
Containers leaking, and no diversion or containment structures or diversion structures leaking or in danger of collapse	3	Landfill not covered and no diversion system present, or diversion system unsound	3

MEAN ANNUAL PRECIPITATION, INCHES

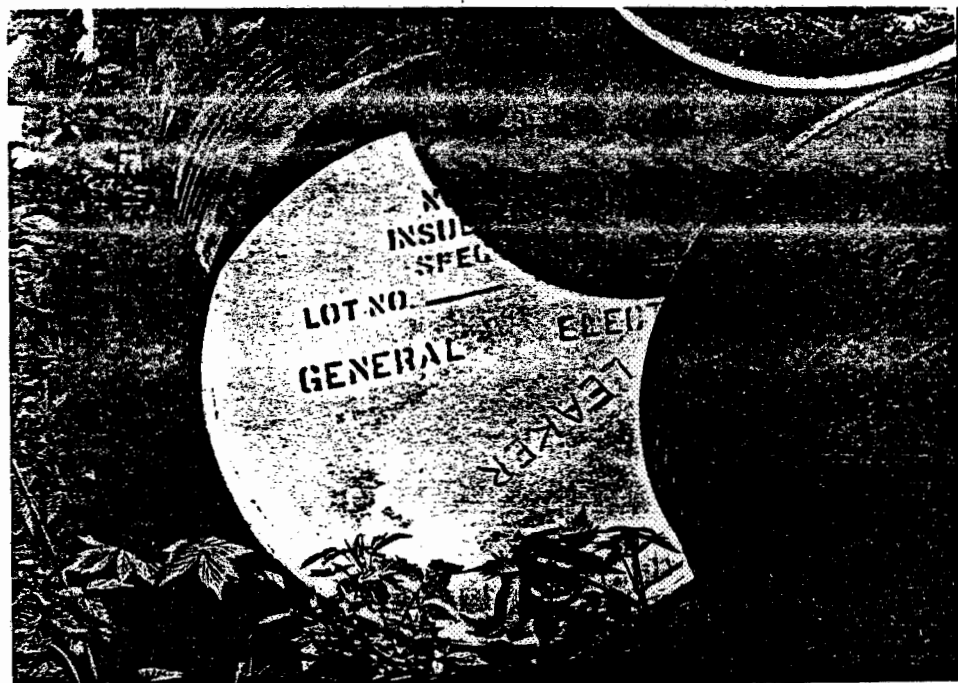
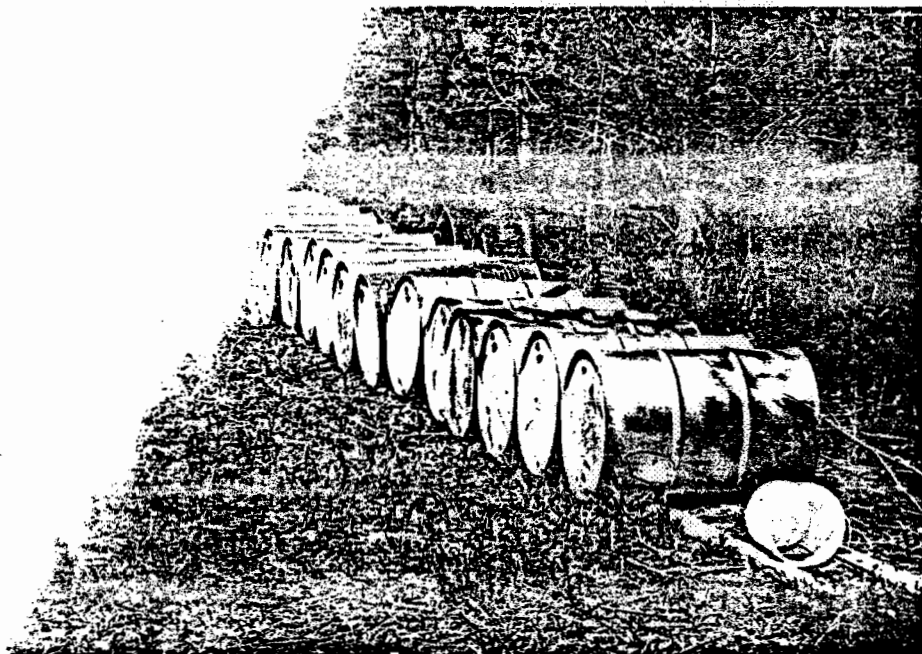


Data are based on the period 1931-55. Isolines are drawn through points of approximately equal value. Caution should be used in interpolating on these maps, particularly in mountainous areas.

043.1

Ref 4.1

Photographs on file at NYSDEC
Region 5 Office
Warrensburg, New York



Rt 4.2



Photographs on file at NYSDEC, Region 5 Office, Warrensburg, New York

... York State Department of Environmental Conservation

Ref 511

MEMORANDUM

Mr. Jay Bloomfield, Research Scientist III, Bureau of Water Research
Mr. Paul R. Counterman, Chief, Technology Section, Bureau of Hazardous Waste
Proposal For Laboratory Analysis-Doetsch Residence, Argyle

October 22, 1979

Objective

To determine if toxic chemicals are in the drums that have been stored/dumped on this property.

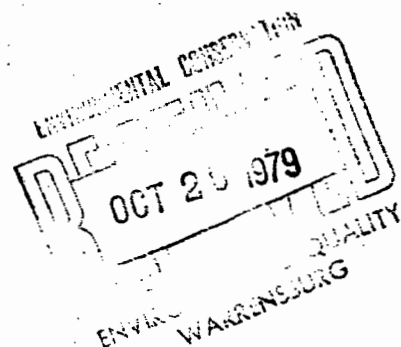
Background Information

Ray Cowen, Senior Sanitary Engineer, Region 5, visited this site on 8/23/79 in response to a complaint that drums of chemicals were stored/dumped on this property. He observed 27 drums that had been exposed to the elements since 1963. One drum was leaking. Ray suggested the drums contain PCB's and trichloroethane. He requested that the Bureau of Hazardous Waste staff take samples from the drums for analysis.

On 8/24/79 Bruce Knapp, Denis Young and Christine McGrath from the Bureau of Hazardous Waste visited and sampled at this site. Mr. Doetsch stated that he had purchased the drums in 1963 from General Electric. He stated that he was a former employee of General Electric and that the drums contained waste mineral oil from a process used to fill capacitors. He said that one drum was essentially pyrenol (pentachlorobiphenyl) which he purchased with the intention of mixing with 5% pentachlorophenol to kill trees, but never get around to it.

Sampling Protocol

On 8/24/79 four samples were taken from four different drums that had been marked by Ray Cowen. The samples (oily liquids) were taken via glass thief and placed in bottles supplied by DOH. The samples were taken to DOH.



Rt 5.2

ald

Resource Needs & Sources Including Laboratory & Cost

Analysis is requested from the Department of Health, Division of Laboratories & Research. Four samples, 1 for trichloroethane analysis and 3 for PCB analysis is the total for this proposal. A cost estimate is not included since this information is not available from DOH.

Cooperating Agencies

DEC - Bureau of Hazardous Waste - John Rankin, 457-6605
DEC - Regional Office Warrensburg - Ray Cowen (518) 623-3671
DOH - Division of Laboratories & Research - Ron Pause, 473-8988

Ray Cowen would like a high priority on these samples since one drum is leaking and the rest are deteriorating.

PRC:gd

cc: Mr. Knowles
Mr. Corliss
Mr. Colden ✓

Ref 6.1

(47-15-11 (10/83)

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
DIVISION OF SOLID AND HAZARDOUS WASTE
INACTIVE HAZARDOUS WASTE DISPOSAL SITE REPORT

PRIORITY CODE: 4 SITE CODE: 558012

NAME OF SITE: Doetsch Residence REGION: 5

STREET ADDRESS: Rte. 40

TOWN/CITY: Argyle COUNTY: Washington

NAME OF CURRENT OWNER OF SITE: Francis and Alice Doetsch

ADDRESS OF CURRENT OWNER OF SITE: Rte. 40, Argyle, N.Y.

TYPE OF SITE: OPEN DUMP ☒ STRUCTURE ☐ LAGOON ☐
LANDFILL ☐ TREATMENT POND ☐

ESTIMATED SIZE: 1 ACRES

SITE DESCRIPTION:

Mr. Doetsch purchased 27 barrels of waste "mineral oil" from GE in the early 1960's to use as a fence post preservative (never was used). The oil is known to contain PCB's and they were stored onsite and some were leaking.

Through a cooperative effort with the General Electric Company and NYSDEC, the barrels were removed to a permitted disposal site. Contaminated soil was also removed; however, some contaminated soil remains on-site.

HAZARDOUS WASTE DISPOSED: CONFIRMED ☒ SUSPECTED ☐

TYPE AND QUANTITY OF HAZARDOUS WASTES DISPOSED:

TYPE	QUANTITY (POUNDS, DRUMS, TONS, GALLONS)
PCB contaminated oil	27 barrels
_____	_____
_____	_____
_____	_____
_____	_____

Ref 6.2

TIME PERIOD SITE WAS USED FOR HAZARDOUS WASTE DISPOSAL:

_____, 19 63 TO _____, 19 ____

OWNER(S) DURING PERIOD OF USE: Doetsch, Francis & Alice

SITE OPERATOR DURING PERIOD OF USE: Doetsch, Francis & Alice

ADDRESS OF SITE OPERATOR: Rte. 40, Argyle

ANALYTICAL DATA AVAILABLE: AIR ☐ SURFACE WATER ☐ GROUNDWATER ☐
SOIL ☐ SEDIMENT ☐ NONE ☐ 4 oil samples

CONTRAVENTION OF STANDARDS: GROUNDWATER ☐ DRINKING WATER ☐
SURFACE WATER ☐ AIR ☐

SOIL TYPE: _____

DEPTH TO GROUNDWATER TABLE: _____

LEGAL ACTION: TYPE: None STATE ☐ FEDERAL ☐

STATUS: IN PROGRESS ☐ COMPLETED ☐

REMEDIAL ACTION: PROPOSED ☐ UNDER DESIGN ☐

IN PROGRESS ☐ COMPLETED ☐

NATURE OF ACTION: Removal of waste

ASSESSMENT OF ENVIRONMENTAL PROBLEMS:

Some PCB contaminated soil remains on site. Additional investigation is needed to determine the remaining extent of contamination and its impact, i.e., whether or not additional removal, containment is necessary.

ASSESSMENT OF HEALTH PROBLEMS:

INEFFICIENT INFORMATION

PERSON(S) COMPLETING THIS FORM:

NEW YORK STATE DEPARTMENT OF
ENVIRONMENTAL CONSERVATION

NAME William C. Colden, P.E.

TITLE Assoc. Sanitary Engr.

NAME Robert A. Olazagasti

TITLE SWMS

DATE: December 1983

NEW YORK STATE DEPARTMENT OF HEALTH

NAME Ronald Tramontano

TITLE Bur. Tox. Subst. Assess.

NAME _____

TITLE _____

DATE: December 1983

Ref 7.1

J. Corliss, P.E., Regional Engineer - Region 5
Mr. E. Cowen, III, P.E., PCB Projects Engineer - Region 5
Doetsch Residence, Town of Argyle

December 17, 1982

I have attached a partial set of results from samples collected by John Rankin and me on November 1, 1982, from twenty-two barrels of oil at the above noted location. I have been waiting for the last two sample results to arrive, but because of the magnitude of some of the results I felt it prudent to advise you of the situation now.

You may recall that Brian Fear and I discovered this site in 1979, as a result of our PCB investigations in connection with the West Glens Falls project. We collected samples from a few selected barrels at that time, and the results were not alarming but prompted us to put the site on the inactive hazardous waste site register. To refresh your memory, Mr. Doetsch purchased (for a nominal fee) the barrels from GE Fort Edward, in the early 1960's, where he was employed at the time, intending to use the oil to coat fence posts. None of the oil was ever used for that or any other purpose.

The most recent sampling effort was prompted by a call from Mr. Doetsch to me, informing me that he wanted to sell the "mineral oil" to someone who wanted to use it in a soap manufacturing operation. I asked Mr. Doetsch to postpone the sale until we performed a complete analysis of all the barrels. It is now apparent that in our 1979 sampling we missed the heavily contaminated barrels. Furthermore, since 1979 some of the barrels (3 or 4) have rusted through and spilled their contents onto the ground. Luckily, the soil in the area is clay and I'm sure no significant migration of contaminants has occurred. Mr. Doetsch has transferred the contents of most of the rest of the original barrels to new barrels. Barrel numbers 18 through 22 are original containers. I have provided Mr. Doetsch with overpacks for these barrels, because they are in danger of rupturing at any time.

Mr. Doetsch will not proceed with the sale of the oil until he hears from us. Obviously we shouldn't allow him to sell them. I would recommend that we pursue having GE pick up the barrels and contaminated soil as soon as possible.

Ref 7.2

Residence, Town of Argyle

per 17, 1982

ge -2-

For your easy reference I have tabulated the sample results below:

<u>SAMPLE #</u>	<u>BARREL #</u>	<u>RESULTS TOTAL PCB (PPM)</u>
1 Composite	1, 2, 3	35
2 Composite	4, 5, 6	45
3 Composite	7, 8, 9	
4 Composite	10, 11, 12	
5 Composite	13, 14, 15, 16	260
6	17	52
7	18	900,000
8	19	1,200,000
9	20	28
10	21	30
11	22	30

Ray E. Cowen, III, P.E.
PCB Projects Engineer

REC:isb
Attachments

cc: Charlie Goddard, w/att.
John Rankin, w/att.
Brian Fear, w/att.

NEW YORK STATE DEPARTMENT OF HEALTH
DIVISION OF LABORATORIES AND RESEARCH
ENVIRONMENTAL HEALTH CENTER
FINAL REPORT

Ref 7.3
FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

NO: 22531 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

13 17 EHC ALBANY
SITE INVESTIGATION.

SOURCE NO:

ORIGIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON

DEG: DEG "N" DEG "W"

NAME INCL SUBMITTED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

SAMPLING POINT: BARREL NO 82-305-01

TYPE OF SAMPLE: 69 LIQUID FUEL

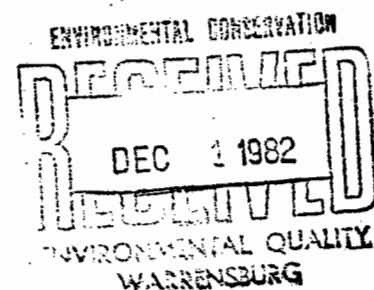
DATE/TIME OF SAMPLING: FROM 00/00 TO 11/01/10

REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	27.7	
038103 P.C.B., AROCLOR 1254	MCG/G	8.2	
039803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 11/29/82

MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885



SUBMITTED BY: RANKIN

NEW YORK STATE DEPARTMENT OF HEALTH
DIVISION OF LABORATORIES AND RESEARCH
ENVIRONMENTAL HEALTH CENTER
FINAL REPORT

Ref 7.4
FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

IN NO: 22552 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

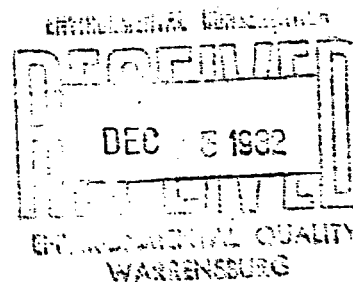
LAB: 17 EHC ALBANY
30 SITE INVESTIGATION.
(SOURCE) NO:
GE BASIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON
NATES: DEG I "N, DEG I "W
IN NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

A T SAMPLING POINT: BARREL NO 82-305-02
TYPE OF SAMPLE: 69 LIQUID FUEL
O/DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/10
REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	34.	
038103 P.C.B., AROCLOR 1254	MCG/G	11.	
039803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 12/01/82

MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885



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NEW YORK STATE DEPARTMENT OF HEALTH
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ENVIRONMENTAL HEALTH CENTER
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Ref 7.5
FINAL REPORT

RESULTS OF EXAMINATION
(PAGE 1 OF 1)

NO: 22554 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

17 EHC ALBANY
SITE INVESTIGATION.

SOURCE) NO:

BASIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON

AGES: DEG 1 "N, DEG 1 "W

NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

7 SAMPLING POINT: BARREL NO 82-305-04

OF SAMPLE: 69 LIQUID FUEL

/DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/10

REPORT SENT TO: CO (1) RO (0) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	28. ✓	
038103 P.C.B., AROCLOR 1254	MCG/G	7.1 ✓	
039803 P.C.B., AROCLOR 1221	MCG/G	1. ✓	LT
041603 P.C.B., AROCLOR 1260	MCG/G	1. ✓	LT

DATE PRINTED: 11/24/82

RH

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ENVIRONMENTAL HEALTH CENTER
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Ref 2.6

FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

DN NO: 22553 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

LAB: 17 EHC ALBANY

530 SITE INVESTIGATION.

DN (SOURCE) NO:

DE BASIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON

ANATES: DEG I "N, DEG I "W

DN NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

EXACT SAMPLING POINT: BARREL NO 82-305-03

TYPE OF SAMPLE: 69 LIQUID FUEL

MO/DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/10

REPORT SENT TO: CO (1) RO (0) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	19. ✓	
038103 P.C.B., AROCLOR 1254	MCG/G	6.1 ✓	
039803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 11/30/82

GK

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DIVISION OF LABORATORIES AND RESEARCH
ENVIRONMENTAL HEALTH CENTER
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Ref 7.7
FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

22555 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

7 EHC ALBANY
SITE INVESTIGATION,
ID NO:

SOURCE: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON
DEG 1 "N, DEG 1 "W
AND INCL SUBMITTED: DOETSCH PROPERTY RT 40 TOWN OF RGYLE

SAMPLING POINT: BARREL NO 82-305-05

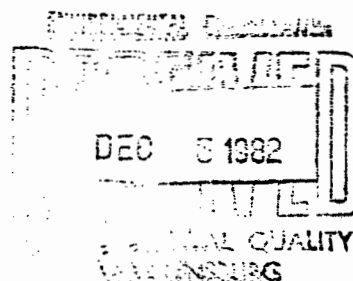
SAMPLE: 69 LIQUID FUEL

DATE/HR OF SAMPLING: FROM 00/00 TO 11/01/10

PORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	260	
038103 P.C.B., AROCLOR 1254	MCG/G	6.	LT
039803 P.C.B., AROCLOR 1221	MCG/G	6.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	6.	LT

DATE PRINTED: 12/01/82



MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885

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NEW YORK STATE DEPARTMENT OF HEALTH
DIVISION OF LABORATORIES AND RESEARCH
ENVIRONMENTAL HEALTH CENTER
FINAL REPORT

Ref 7.8
FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

NO: 22556 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

AD: 17 EHC ALBANY
30 SITE INVESTIGATION.
SOURCE) NO:
BASIN: NY GAZETTEER NO: 5726 COUNTY: WASHINGTON
ATES: DEG 'N, DEG 'W
NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

SAMPLING POINT: BARREL NO 82-305-06

OF SAMPLE: 69 LIQUID FUEL

DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/10

REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
338003 P.C.B., AROCLOR 1016/1242	MCG/G	40.	
338103 P.C.B., AROCLOR 1254	MCG/G	12.	
339803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
341603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 12/01/82

MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885

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ENVIRONMENTAL HEALTH CENTER
FINAL REPORT

Rt 7.9
FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

22557 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

17 EHC ALBANY
SITE INVESTIGATION.

CE) NO:

NY GAZETTEER NO: 5720 COUNTY: WASHINGTON

DEG I "N, DEG I "W

NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

SAMPLING POINT: BARREL NO 82-305-07

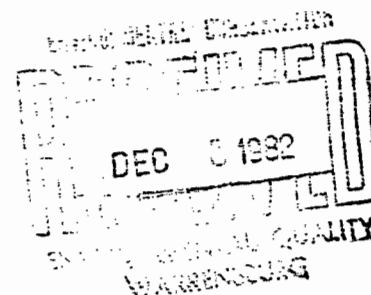
OF SAMPLE: 69 LIQUID FUEL

DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/99

REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	900000.	
038103 P.C.B., AROCLOR 1254	MCG/G	10000.	LT
039803 P.C.B., AROCLOR 1221	MCG/G	10000.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	10000.	LT

DATE PRINTED: 12/01/82



MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
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WARRENSBURG, NY 12885

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FINAL REPORT

Ref 7.10

FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

JN NO: 22558 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

LAB: 17 EHC ALBANY
30 SITE INVESTIGATION.

(SOURCE) NO:

BASIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON

NATES: DEG 'N, DEG 'W

N NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

CT SAMPLING POINT: BARREL NO 82-305-08

PE OF SAMPLE: 69 LIQUID FUEL

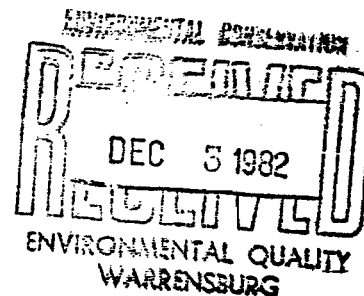
MO/DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/99

REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	1200000.	
038103 P.C.B., AROCLOR 1254	MCG/G	10000.	LT
039803 P.C.B., AROCLOR 1221	MCG/G	10000.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	10000.	LT

DATE PRINTED: 12/02/82

MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885



SUBMITTED BY: RANKIN

NEW YORK STATE DEPARTMENT OF HEALTH
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FINAL REPORT

Ref 7.11
FINAL REPORT

RESULTS OF EXAMINATION
(PAGE 1 OF 1)

NO: 22559 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

BI: 17 EHC ALBANY
SITE INVESTIGATION.

SOURCE) NO:

SIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON

TES: DEG 1 "N, DEG 1 "W

IN NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

ST SAMPLING POINT: BARREL NO 82-305-09

TYPE OF SAMPLE: 69 LIQUID FUEL

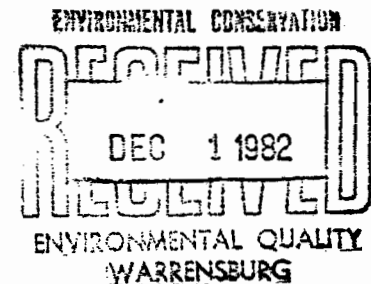
MO/DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/99

REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	22.	
038103 P.C.B., AROCLOR 1254	MCG/G	8.6	
039803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 11/29/82

MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885



SUBMITTED BY: RANKIN

NEW YORK STATE DEPARTMENT OF HEALTH
DIVISION OF LABORATORIES AND RESEARCH
ENVIRONMENTAL HEALTH CENTER
FINAL REPORT

Ref 7.12
FINAL REPORT

RESULTS OF EXAMINATION
(PAGE 1 OF 1)

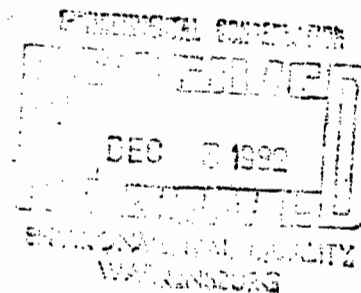
ID: 22560 YR/MO/DAY/HR SAMPLE REC'D: 82/11/01/16

17 EHC ALBANY
600 SITE INVESTIGATION.
(SOURCE) NO:
BASIN: NY GAZETTEER NO: 5720 COUNTY: WASHINGTON
DATES: DEG 1 "N, DEG 1 "W
NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

CT SAMPLING POINT: BARREL NO 82-305-10
TYPE OF SAMPLE: 69 LIQUID FUEL
DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/99
REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
38003 P.C.B., AROCLOR 1016/1242	MCG/G	21.	
38103 P.C.B., AROCLOR 1254	MCG/G	8.7	
39803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
41603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 12/01/82



MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12685

SUBMITTED BY: RANKIN

NEW YORK STATE DEPARTMENT OF HEALTH
DIVISION OF LABORATORIES AND RESEARCH
ENVIRONMENTAL HEALTH CENTER
FINAL REPORT

Ref 7.13
FINAL REPORT

RESULTS OF EXAMINATION

(PAGE 1 OF 1)

NO: 22561 YR/MO/DAY/HR SAMPLE REC'D: 82711/01/16

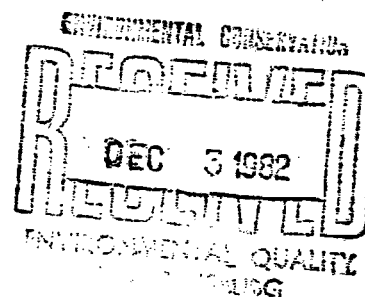
LAB: 17 EHC ALBANY
330 SITE INVESTIGATION,
(SOURCE) NO:
AGE BASIN: NY GAZETTEER NO: 5729 COUNTY: WASHINGTON
DATES: DEG 1 "N, DEG 1 "W
ON NAME INCL SUBMISHED: DOETSCH PROPERTY RT 40 TOWN OF ARGYLE

LT SAMPLING POINT: BARREL NO 82-305-11
PE OF SAMPLE: 69 LIQUID FUEL
MO/DAY/HR OF SAMPLING: FROM 00/00 TO 11/01/99
REPORT SENT TO: CO (1) RO (1) LPHE (0) LHO (0) FED (0) CHEM (1)

PARAMETER	UNIT	RESULT	NOTATION
038003 P.C.B., AROCLOR 1016/1242	MCG/G	21.	
038103 P.C.B., AROCLOR 1254	MCG/G	8.9	
039803 P.C.B., AROCLOR 1221	MCG/G	1.	LT
041603 P.C.B., AROCLOR 1260	MCG/G	1.	LT

DATE PRINTED: 12/01/82

MR. WILLIAM LAMY, P.E.
NYS DEPT. OF ENV. CONS.
P.O. BOX 220
WARRENSBURG, NY 12885



SUBMITTED BY: RANKIN

Ref B.1

DRAFT
1/11/84

TABLE 4

Waste Characteristics Values

Chemical/Compound	Toxicity/ Persistence ¹	Toxicity ²	Reactivity ²
Acenaphthene	9	3	0
Acetaldehyde	6	6	2
Acetic Acid	6	6	1
Acetone	6	6	0
2-Acetylaminofluorene	18	9	0
Aldrin	18	9	0
Ammonia	9	9	0
Aniline	12	9	0
Anthracene	15	9	0
Arsenic	18	9	0
Arsenic Acid	18	9	0
Arsenic Trioxide	18	9	0
Asbestos	15	9	0
Barium (Ba)	18	9	2
Benzene	12	9	0
Benzidine	18	9	0
Benzo(a)pyrene	18	9	0
Benzopyrene, NOS	18	9	0
Beryllium & Compounds			
NOS (Be)	18	9	0
Beryllium Dust, NOS	18	9	0
Bis (2-Chloroethyl)			
Ether	15	9	0
Bis (2-Ethylhexyl)			
Phthalate	12	3	0
Bromomethane	15	9	0
Cadmium (Cd)	18	9	0
Carbon Tetrachloride	18	9	0
Chlordane	18	9	0
Chlorobenzene	12	6	0
Chloroform	18	9	0
3-Chlorophenol	12	6	0
4-Chlorophenol	15	9	0
2-Chlorophenol	12	6	0
Chromium (Cr)	18	9	0
Chromium, Hexavalent (Cr ⁺⁶)	18	9	0

Ref 8.2

DRAFT
1/11/84

Table 4 (cont.)

Chemical/Compound	Toxicity/ Persistence ¹	Toxicity ²	Reactivity ²
Chromium, Trivalent (Cr ⁺³)	15	6	0
Copper & Compounds, NOS (Cu)	18	9	0
Creosote	15	6	0
Cresols	9	9	0
Cyanides (soluble salts), NOS	12	9	0
Cyclohexane	12	6	0
DDE	18	9	0
DDT	18	9	0
Diaminotoluene	18	6	0
1, 2-Dibromo 3 chloropropane	18	9	0
Di-N-Butyl-Phthalate	18	6	0
1, 4-Dichlorobenzene	15	6	0
Dichlorobenzene, NOS	18	6	0
1, 1-Dichloroethane	12	6	0
1, 2-Dichloroethane	12	9	1
1, 1-Dichloroethene	15	9	2
1, 2-trans-Dichloro- ethylene	12	3	2
Dichloroethylene, NOS	12	3	2
2, 4-Dichlorophenol	18	6	0
2, 4-Dichlorophenoxyacetic Acid	18	9	0
Dicyclopentadiene	18	9	1
Dieldrin	18	9	0
2, 4-Dinitrotoluene	15	9	3
Dioxin	18	9	0
Endosulfan	18	9	0
Endrin	18	9	0
Ethylbenzene	9	6	0
Ethylene dibromide	18	9	0
Ethylene Glycol	9	6	0
Ethyl Ether	18	6	1
Ethylmethacrylate	12	6	0
Fluorine (F)	18	9	4
Formaldehyde	9	9	0
Formic Acid	9	6	0

Ref 8.3

DRAFT
1/11/84

Table 4 (cont.)

Chemical/Compound	Toxicity/ Persistence ¹	Toxicity ²	Reactivity ²
Heavy Metals, NOS	18	9	0
Heptachlor	18	9	0
Hexachlorobenzene	18	6	0
Hexachlorobutadiene (C ₁₆)	18	9	1
Hexachlorocyclohexane, NOS	18	9	0
Hexachlorocyclopentadiene (C _{5,6})	18	9	2
Hydrochloric Acid	9	6	2
Hydrogen Sulfide	18	9	0
Indene	12	6	2
Iron & Compounds, NOS (Fe)	18	9	0
Isophorone	12	6	0
Isopropyl Ether	9	3	1
Kelthane	15	6	0
Kepone	18	9	0
Lead (Pb)	18	9	0
Lindane	18	9	0
Magnesium & Compounds, NOS (Mg)	15	6	0
Manganese & Compounds, NOS (Mn)	18	9	0
Mercury (Hg)	18	9	0
Mercury Chloride	18	9	0
Methoxychlor	15	6	0
4, 4-Methylene-Bis-(2- Chloroaniline)	18	9	0
Methylene Chloride	12	6	1
Methyl Ethyl Ketone	6	6	0
Methyl Isobutyl Ketone	12	6	0
4-Methyl-2-Nitroaniline	12	9	3
Methyl Parathion	9	9	0
2-Methylpyridine	12	6	0
Mirex	18	9	0
Napthalene	9	6	0
Nickel & Compounds, NOS (Ni)	18	9	0

Ref 8.4

DRAFT
1/11/84

Table 4 (cont.)

Chemical/Compound	Toxicity/ Persistence ¹	Toxicity ²	Reactivity ²
Nitric Acid	9	9	2
Nitroaniline, NOS	18	9	3
Nitrogen Compounds, NOS	12	0	
Nitroguanidine	12	9	3
Nitrophenol, NOS	15	9	2
Parathion	9	9	0
Pentachlorophenol (PCP)	18	9	0
Pesticides, NOS	18	9	0
Phenanthrene	15	9	0
Phenol	12	9	2*
Phosgene	9	9	1
Polybrominated Biphenyl (PBB), NOS	18	9	0
Polychlorinated Biphenyls, NOS	18	9	0
Potassium Chromate	18	9	0
Radium & Compounds, NOS (Ra)	18	9	2
Radon & Compounds, NOS (Rn)	15	9	0
2, 4-D, Salts & Esters	18	9	0
Selenium (Se)	18	9	0
Sevin (Carbaryl)	18	9	0
Sodium Cyanide	12	9	0
Styrene	9	6	1
Sulfate	9	0	0
Sulfuric Acid	9	9	2
1, 1, 2, 2-Tetrachloro- ethane	18	9	0
Tetrachloroethane, NOS	18	9	0
1, 1, 2, 2-Tetrachloro- ethene	12	6	0
Tetraethyl Lead	18	9	0
Tetrahydrofuran (I)	18 15	6	0
Thorium & Compounds, NOS (Th)	18	9	2
Toluene	9	6	0
Toxaphene	18	9	0
Tribromomethane	18	9	1
1, 2, 4-Trichlorobenzene	15	6	0
1, 1, 1-Trichloroethane	12	6	0

Ref. 8.5

DRAFT
1/11/84

Table 4 (cont.)

Chemical/Compound	Toxicity/ Persistence ¹	Toxicity ²	Reactivity ²
1, 1, 2-Trichloroethane	15	6	0
Trichloroethane, NOS	15	6	0
Trichloroethene	18 12	9 6	0
1, 1, 1-Trichloropropane	12	6	0
1, 1, 2-Trichloropropane	12	6	0
1, 2, 2-Trichloropropane	12	6	0
1, 2, 3-Trichloropropane	18	9	0
Uranium & Compounds, NOS			
(U)	18	9	2
Varsol	12	6	0
Vinyl Chloride	15	9	1
Xylene	9	6	0
Zinc & Compounds, NOS			
(Zn)	18	9	1
Zinc Cyanide	18	9	0
2, 4, 5-T	18	9	0

¹ Values for groundwater and surface water routes

² Values for air route

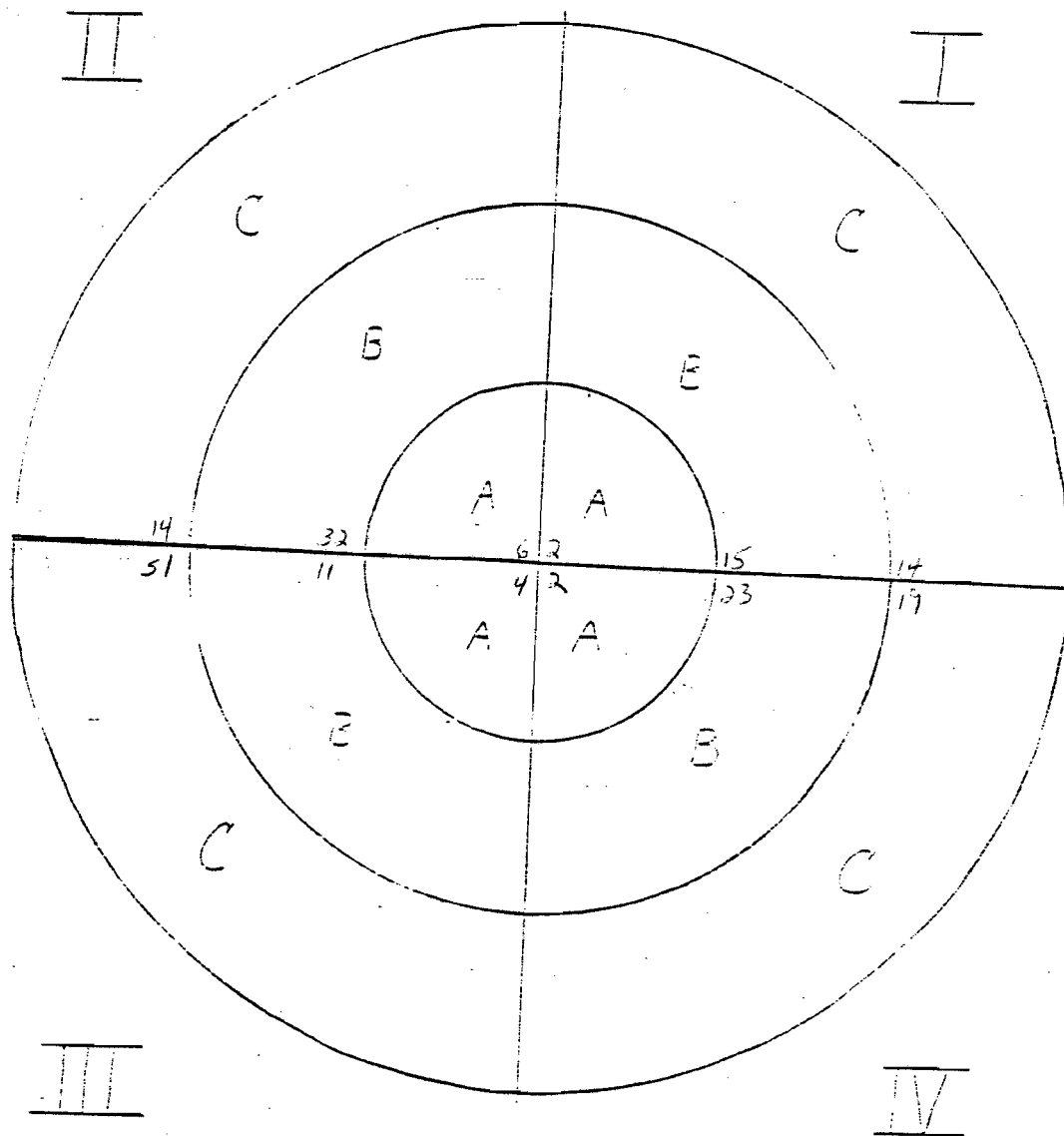
* Only in pure form; otherwise, 0

Population within a 3-mile radius of each Phase I site is determined using the coordinate system illustrated below. The number of residences for each quadrant and section is determined by overlaying this pattern onto a U.S.G.S. 7.5 minute topographic map. A multiplier of 3.8 persons per residence is used to determine population in accordance with Mitre Model 1985.

A = 1 mile radius	<i>14 houses - 53 people</i>
B = 2 mile radius	<i>31 houses - 308 people</i>
C = 3 mile radius	<i>98 houses - 372 people</i>

(Figure not To Scale)

<u>193</u>	-	<u>733</u>
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Property of E

New York State Atlas of Community Water System Sources 1982

NEW YORK STATE
DEPARTMENT OF HEALTH

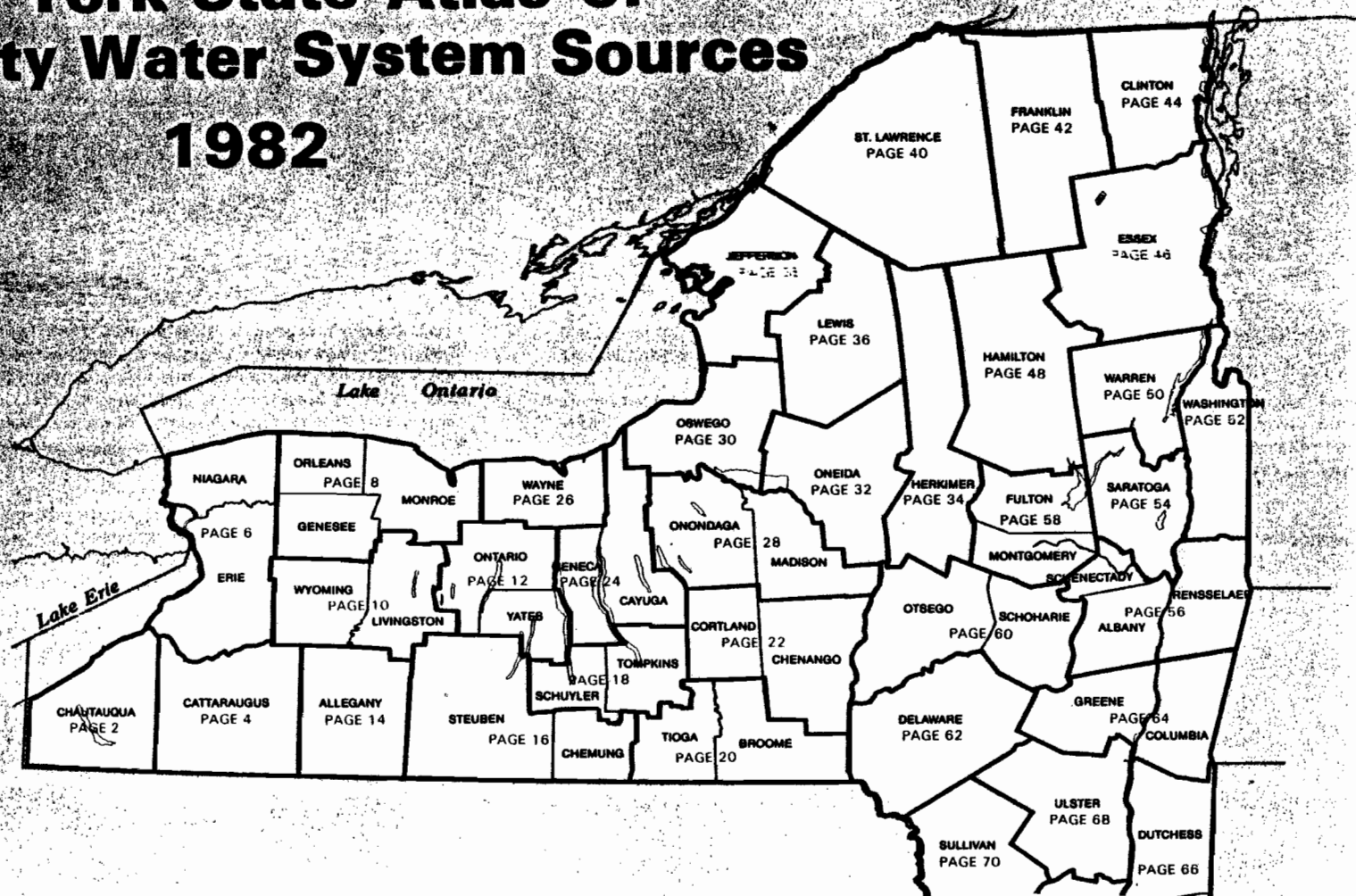
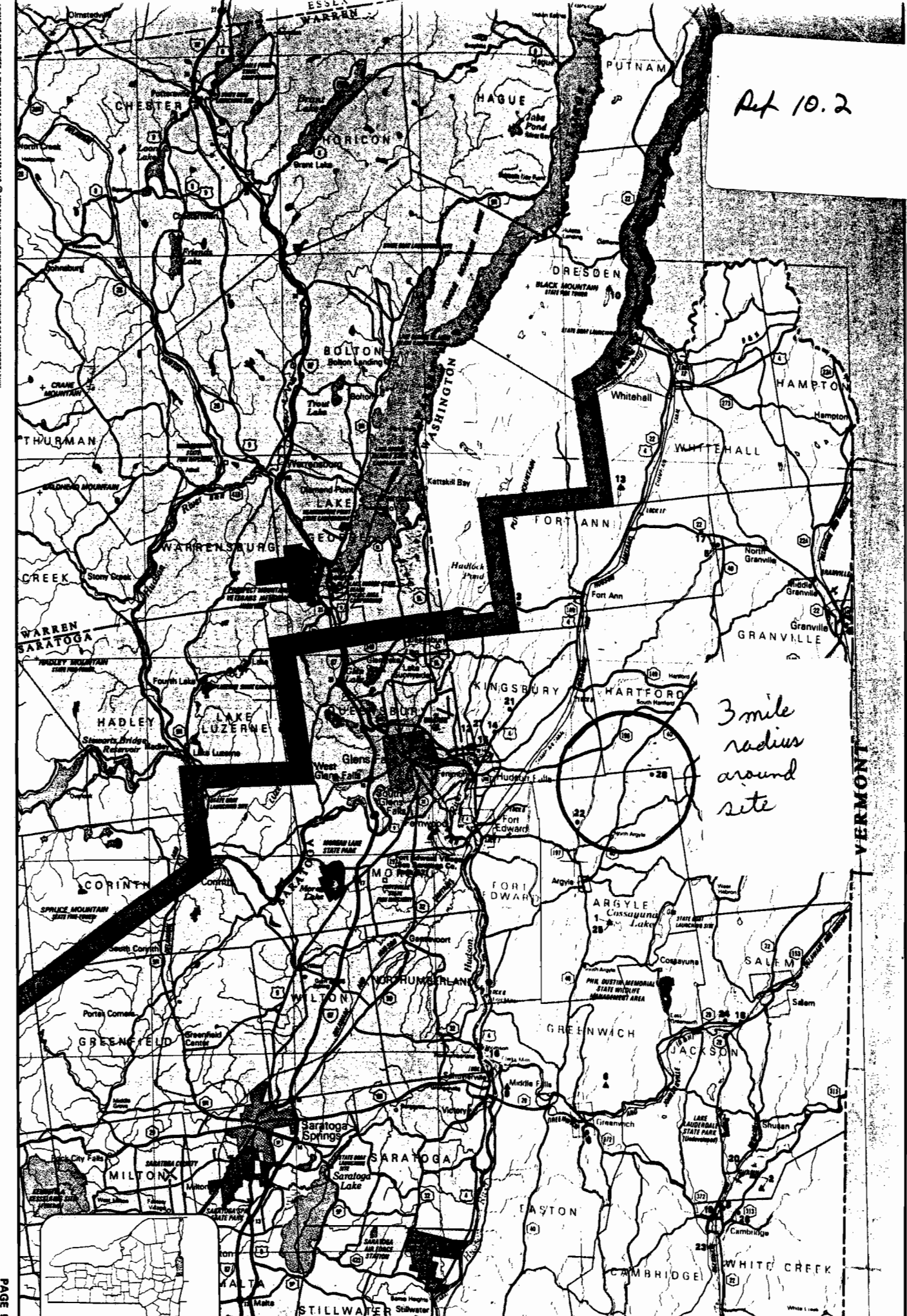


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BRONX	76	GENESEE	8	ONTARIO	12	SENECA	24

FROM THE COMMISSIONER, NEW YORK STATE DEPARTMENT OF TRANSPORTATION



WASHINGTON COUNTY

ID NO	COMMUNITY WATER SYSTEM	POPULATION	SOURCE
Municipal Community			
1	Argyle Village.	400.	Summit Lake
2	Cambridge Water Works.	1700.	Reservoirs
3	Fort Ann Water Supply.	550.	Wells
	Fort Edward Village (See No 11)		
	Saratoga Co. Page 54).	3800	
4	Granville Village.	2900.	Wells
5	Granville Water District.	1200.	Wells, Well (Infiltration Gallery)
6	Greenwich Village.	2200.	Hay Reservoir, Wells
7	Hudson Falls Village.	8500.	Reservoir, Wells
8	Scenic Mountain Estates Water System.	180.	Wells
9	Schuylerville Village (Saratoga Co. Page 54).	3900.	Reservoirs (Springs)
10	Whitehall Village.		Pine Lake

Non-Municipal Community

11	Copeland Pond Trailer Park.	NA.	Wells
12	Dix Trailer Court.	9.	Wells
13	Great Meadow Correctional Facility.	1100.	Dolph Pond
14	Homestead Court Apartments.	40.	Wells
15	Howard's Trailer Court.	NA.	Wells
16	Hudson River Villa.	NA.	Wells
17	Jeff-Glen Trailer Park.	9.	Wells
18	Jim's Trailer Park.	20.	Wells
19	M L Santerre Trailer Park.	18.	Wells
20	McMahon Mobile Court.	25.	Wells
21	Mountain View Mobile Estates.	96.	Wells
22	North Ridge Mobile Home Park.	75.	Wells
23	Owkill Mobile Estates.	07.	Wells
24	Pine's Trailer Park.	22.	Wells
25	Pleasant Valley Infirmary.	128.	Summit Lake
26	Scenic Mountain Estates.	NA.	Wells
27	Susan Marie Trailer Court.	NA.	Wells
28	Tamarack Valley Trailer Park.	NA.	Wells

37 people 1984 data NYSDOH

Total 133 people served by these wells.

Two non-municipal
community well systems
are within 3 miles

UNITED STATES DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE

Ref 11.1

SUBJECT: Hazardous Waste Sites Washington Co.

DATE: 3/6/86

TO: Mr. David B. Tompkins
Wehran Engineers & Scientists
666 E. Main St.
P.O. Box 2006
Middletown, N.Y. 10940

Dear Mr. Tompkins:

In reference to the hazardous waste site at the Doetsch Residence - there is only one spot within a three mile radius that I know of where irrigation is used. The acreage irrigated is approximately 5 acres and the water supply is from a dike pond on the property. The pond water is from springs within itself and some runoff from the above fields. This site is approximately 2 miles north of the Doetsch Residence. I have enclosed a topo map showing the area. There may be others that have home gardens that they irrigate occasionally during the summer but I'm not aware of.

Yours in Conservation

James K. Perry

James K. Perry
District Conservationist



281

Ref 11.2

H A

ADAMSVILLE
CEM

Adamsville

Irrigated area

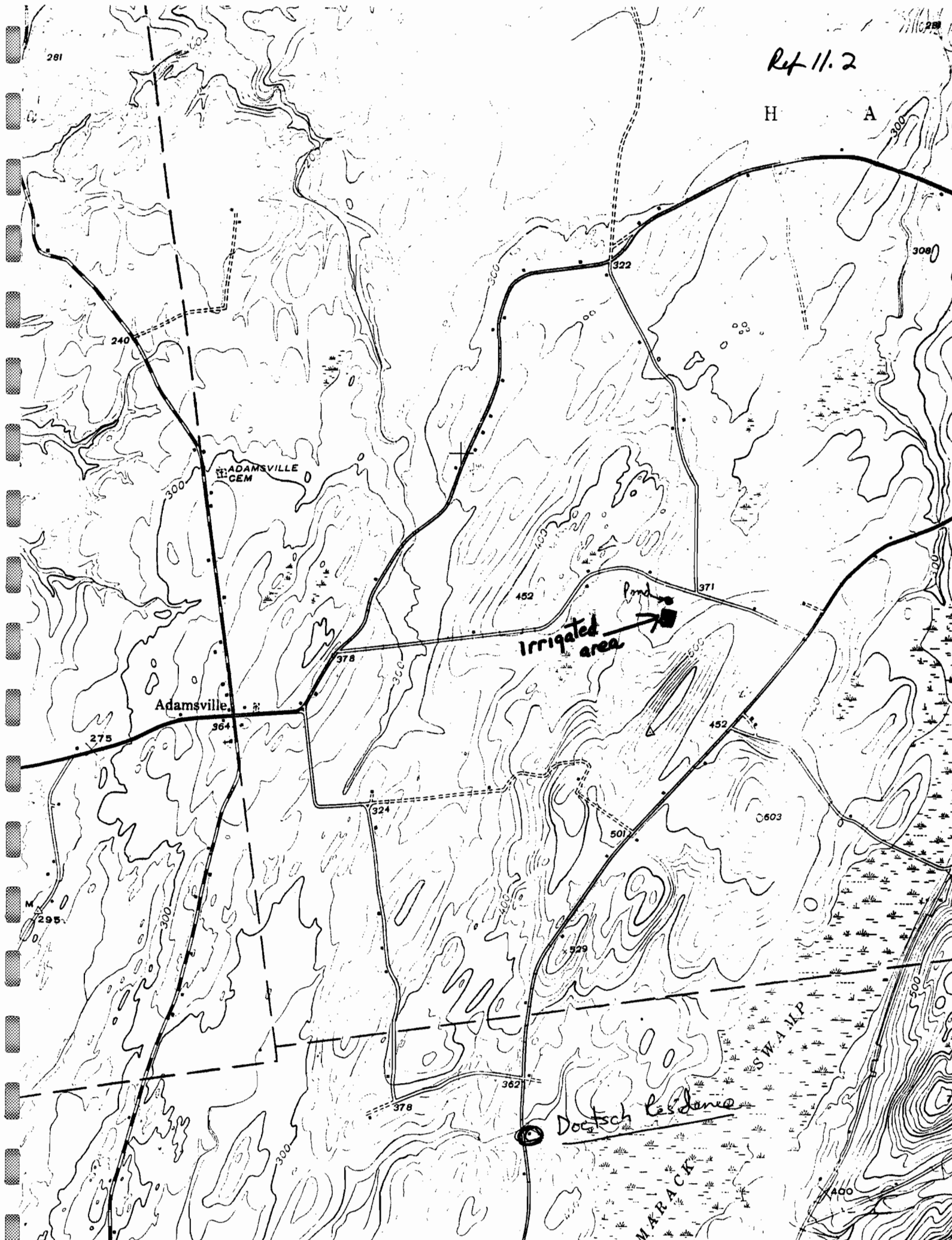
Pond

603

Doerschles Lane

SWAMP

MARACK

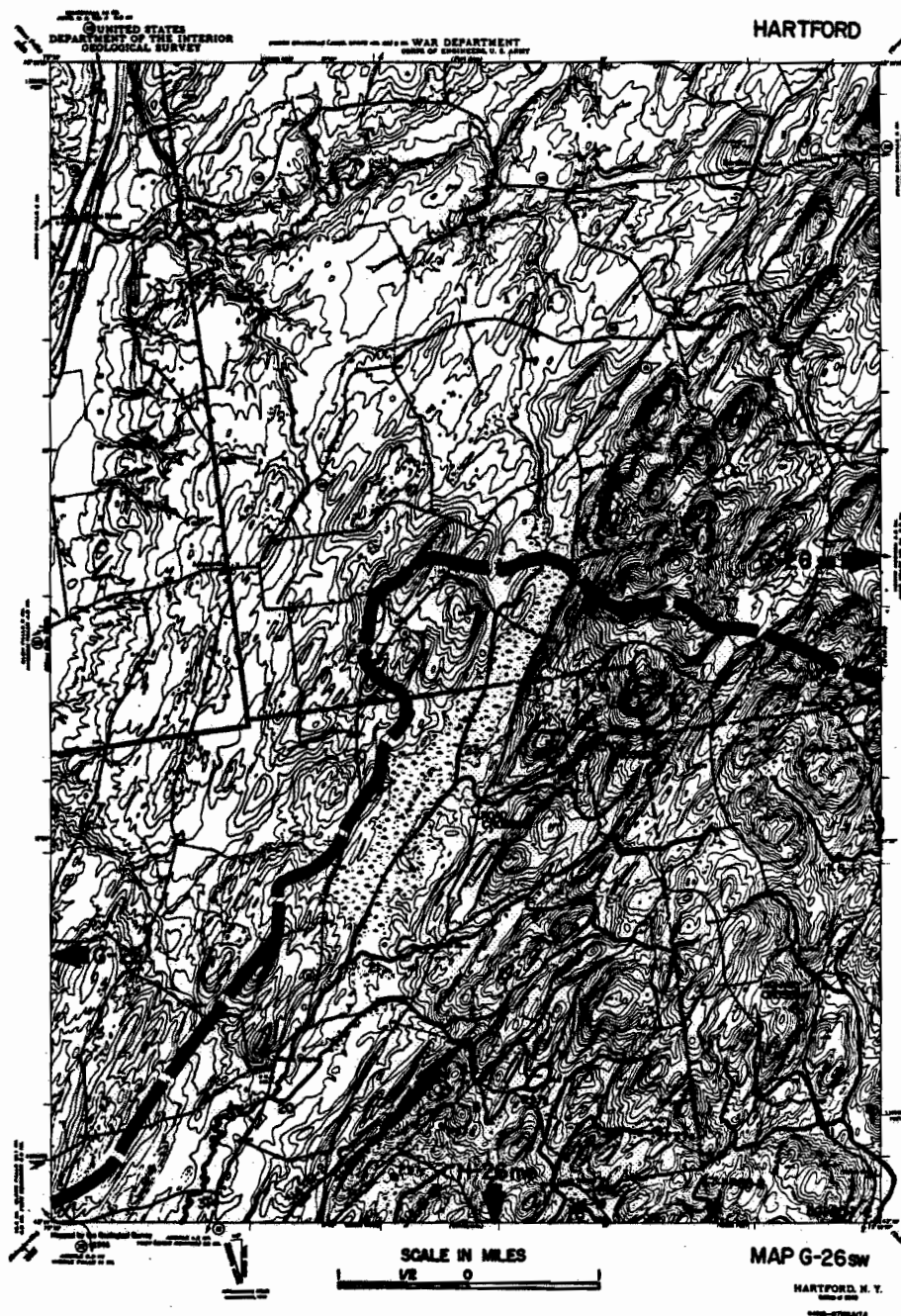


Ref 12.1

§ 941.9

TITLE 6 CONSERVATION

CHAPTER X



Ref 12.2

CHAPTER X DIVISION OF WATER RESOURCES

§ 941.6

TABLE 1 (Cont'd)

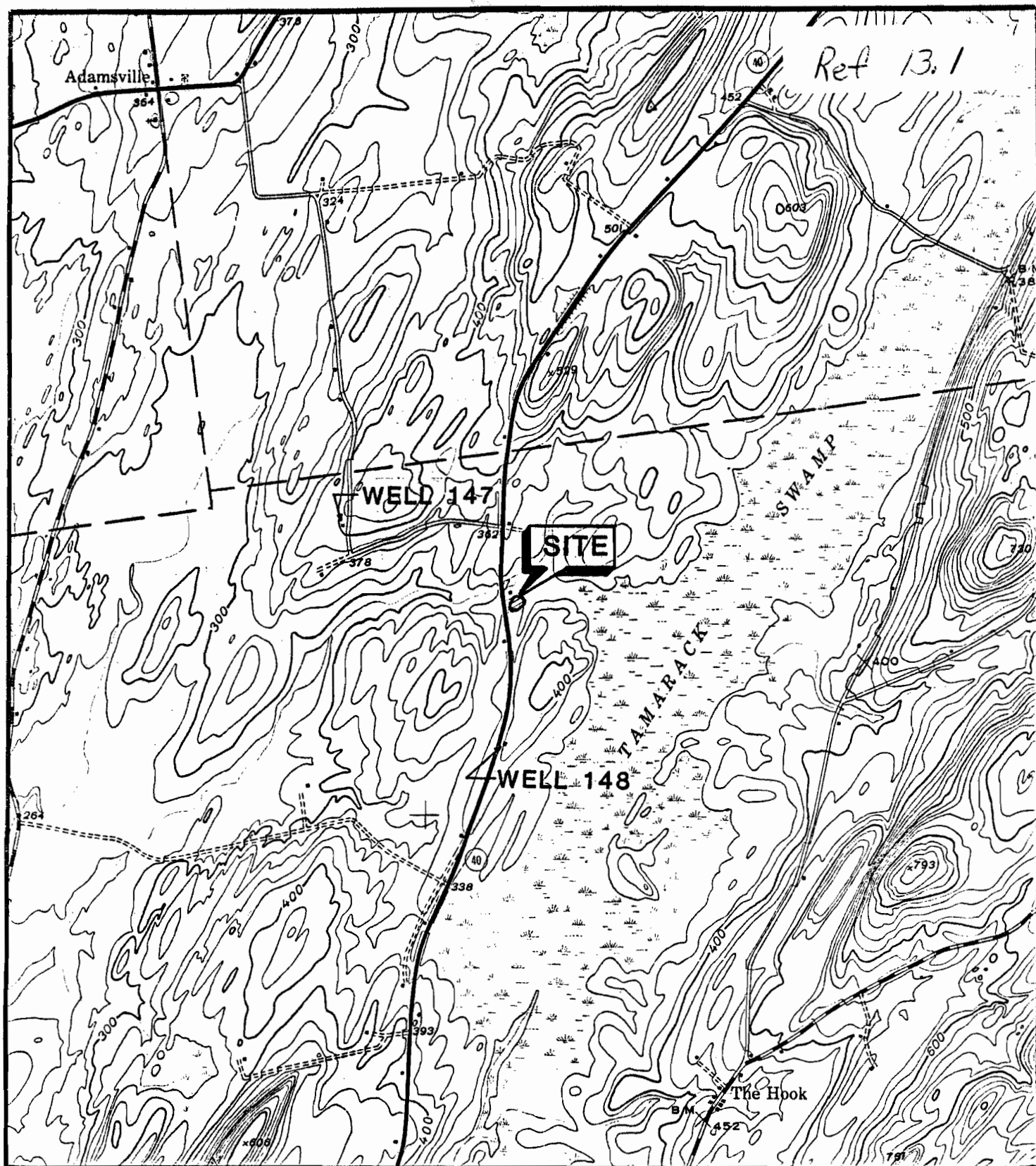
Item No.	Water Index Number	Name	Description	Map Ref. No.	Class	Standards
320	H-314 portion and trib. 314-23	Moses Kill and trib.	From trib. 21 to trib. 23.	G-26sw	C	C(T)
321	H-314 portion	Moses Kill	From trib. 23 to Road Crossing above trib. 23.	G-26sw	D	D
322	H-314 portion	Moses Kill	From Road Crossing above trib. 23 to Road Crossing above trib. 24.	G-26sw	C	C(T)
323	H-314 portion and trib. 314-23a, 314-24, 314-P 977, 314-24-a	Moses Kill and trib.	From Road Crossing above trib. 24 to source.	G-26sw	D	D
324	H-314-9	Trib. of Moses Kill		H-25 H-26nw	C	C(T)
325	H-314-9-a, 1, 1b, 4, 5, 6, P 96 and trib. 1-a	Subtribs. of Moses Kill		H-26nw H-25	D	D
326	H-314-9-2 portion	Subtrib. of Moses Kill	From mouth to trib. 1.	H-25 H-26nw	C	C(T)

5074 CN 2-15-67

1.9 Quadrangle

UNITED STATES
DEPARTMENT OF THE INTERIOR
BIOLOGICAL SERVICE

Present, edited, and published by the Geological Survey
1968-1969 and 1970-1971
The following are listed photographs by photograph
number, from photographs from 1968, from about 1968
photographs, and 1970 from about 1970
The following are listed from New York complete list,
photographs
The following are listed from the different state from
photographs are shown in the list
The following are listed from the different state from
the 1968, from the 1968



SCALE: 1" = 2000'
 TOPOGRAPHY TAKEN FROM
 1944 HARTFORD, N.Y.
 U.S.G.S. QUADRANGLE
 7.5 MIN. SERIES
 (PHOTOINSPECTED 1976)



MAP LOCATION

FIGURE 1
 SITE LOCATION MAP
 DOETSCH RESIDENCE
 ARGYLE, N.Y.

MAP LOCATION

TELEPHONE CONVERSATION MEMORANDUM

Ref. 14.1

CLIENT NYSDEC PROJ. No. 06281
PROJECT Doetsch Residence - Phase I DATE 7/22/86
TIME 10:10 A.M.
CALL TO/FROM John Ozard REPRESENTING NYSDEC
Significant Habitat Unit
PHONE No. (518) 439 - 8014

SUMMARY OF CONVERSATION:

Critical habitat

58013 - occurs on the east side of Tamarack Swamp

- large wetland area
- site listed due to existence of a Great Blue Heron rookery
- site listed in 1982

* Great Blue Heron are not an endangered species. This area is considered significant due to the large # of birds which breed at the site.
DBT

COPIES TO: _____

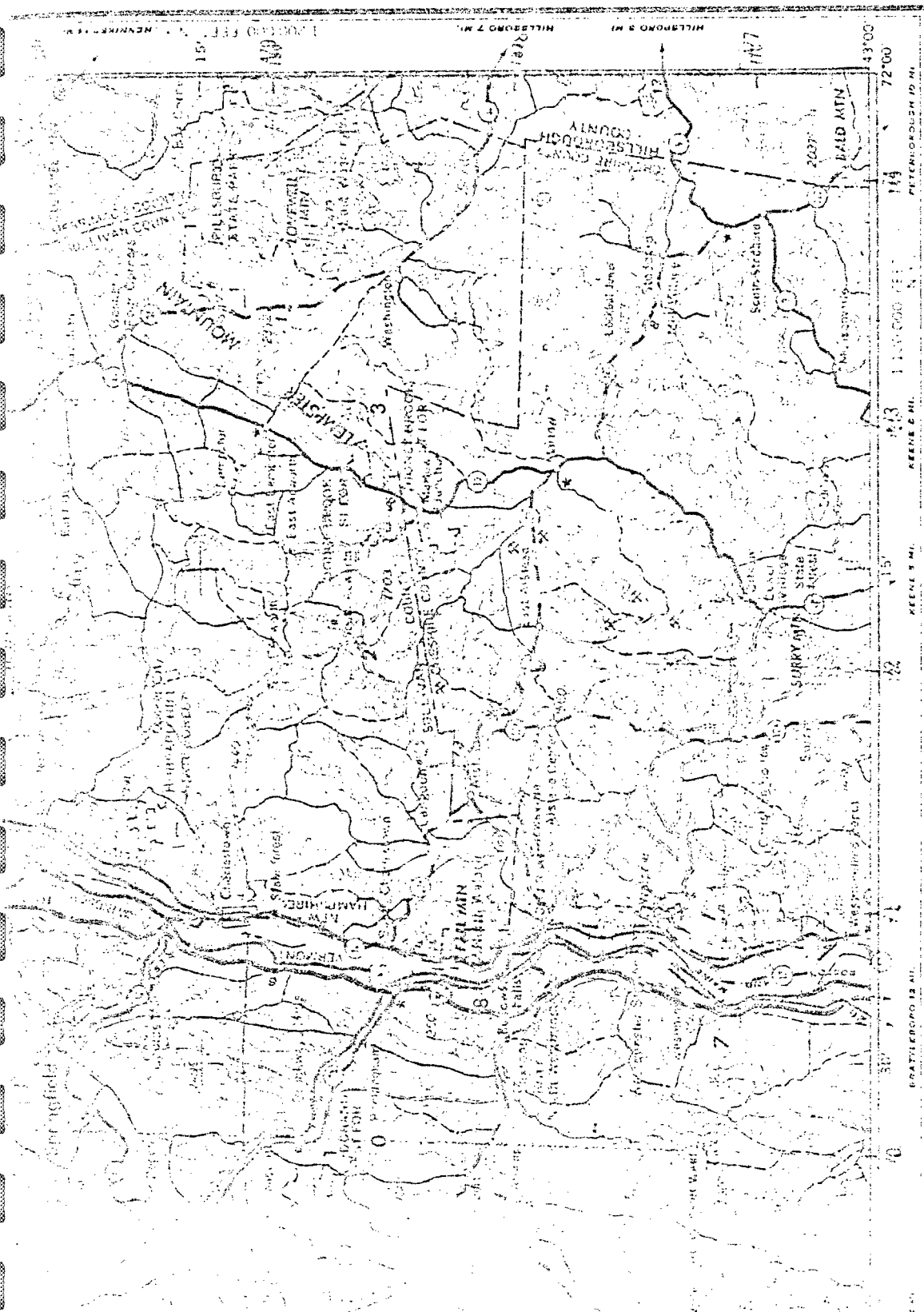
BY: _____

David B. Tompkins

WE WEHRAN ENGINEERING
CONSULTING ENGINEERS

Ref 14.2

STOCK NO. V501XNK183... 44-04



SIGNIFICANT HABITAT OVERLAY NO. 1 OF 2

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

DIVISION OF FISH AND WILDLIFE

PLANNING OF WILDLIFE

PREPARED FOR SIGNIFICANT HABITAT UNIT

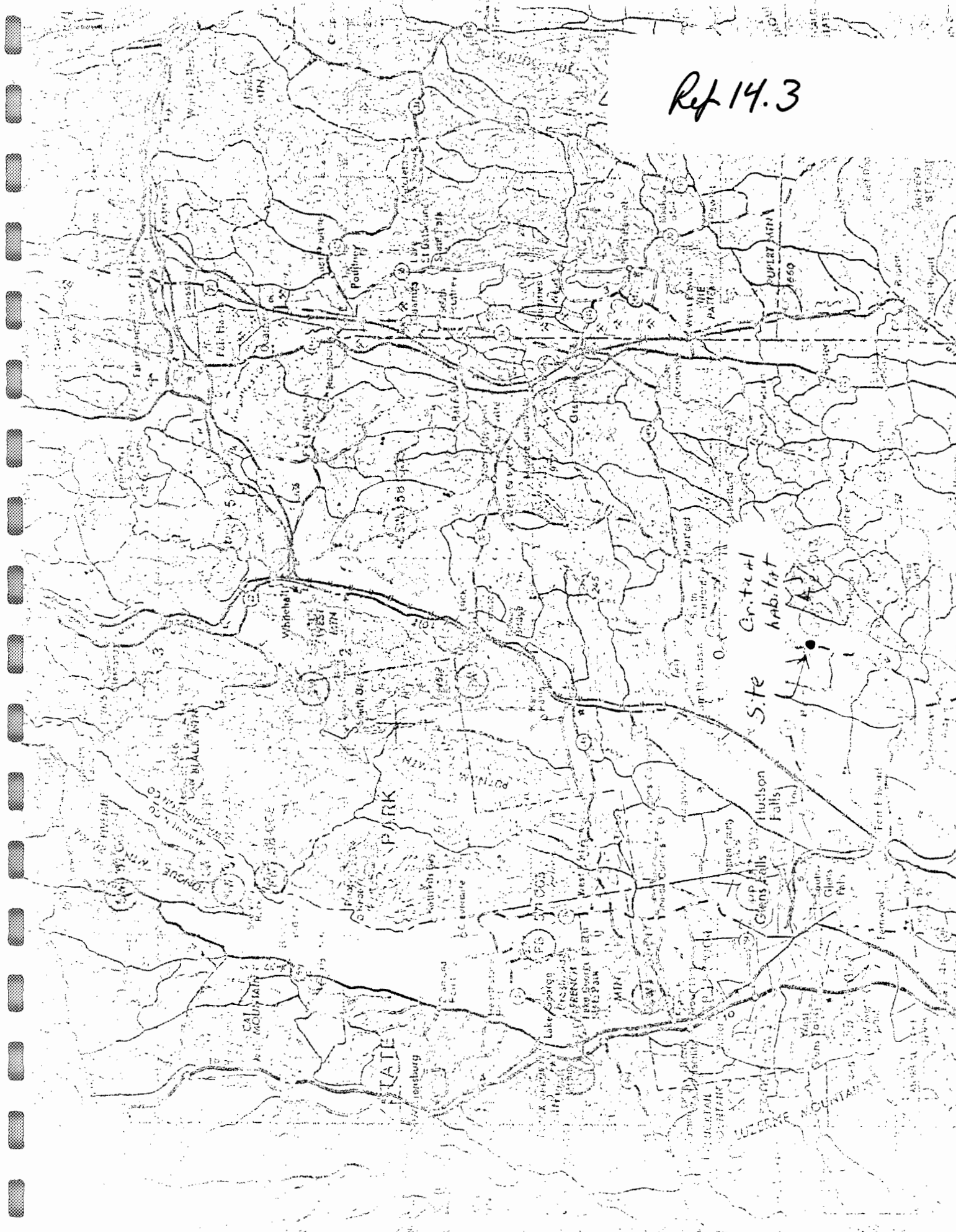
WILDLIFE RECONSTRUCTION CENTER

DELMAR, NEW YORK 10514

WILDLIFE RECONSTRUCTION CENTER

DELMAR, NEW YORK 10514

Ref 14.3



Ref 15.1

STATE OF NEW YORK
DEPARTMENT OF CONSERVATION
WATER POWER AND CONTROL COMMISSION

PERRY B. DURYEA.....*Conservation Commissioner—Chairman*
BERTRAM D. TALLAMY.....*Superintendent of Public Works*
NATHANIEL GOLDSTEIN.....*Attorney General*
JOHN C. THOMPSON.....*Executive Engineer*
ARTHUR H. JOHNSON.....*Associate Engineer*



U. S. DEPARTMENT OF THE INTERIOR
DOUGLAS MCKAY, *Secretary*

GEOLOGICAL SURVEY

WILLIAM E. WRATHER.....*Director*
CARL G. PAULSEN.....*Chief Hydraulic Engineer*
A. NELSON SAYRE.....*Chief, Ground Water Branch*
JOSEPH E. UPSON.....*District Geologist*

Ref 15.2

THE GROUND-WATER RESOURCES OF WASHINGTON COUNTY, NEW YORK

By R. V. CUSHMAN

ABSTRACT

This report was prepared as part of a Statewide survey of the ground-water resources of New York in cooperation with the State Water Power and Control Commission. Its purpose is to provide the basic facts relating to the occurrence, quality, and availability of ground water in Washington County.

Washington County is one of the eastern tier of New York counties. It contains small areas of the Adirondack and Taconic uplands and the intervening Hudson-Champlain lowland. The bedrock exposed at the surface or lying beneath the glacial drift consists of ancient crystalline rocks in the Adirondack area and more than 5,000 feet of early Paleozoic sedimentary rocks in the Hudson-Champlain lowland and the Taconic section of the New England Upland. Bedrock in Washington County has a low effective porosity but is commonly broken by a well-developed system of joints, which control the movement and storage of water. The yields of wells drilled into bedrock range from less than a gallon per minute to 80 gallons per minute and average about 9 gallons per minute. It has been found uneconomical to drill more than 250 feet into bedrock in Washington County, as there is generally no appreciable increase in the yield below that depth.

Bedrock is mantled by unconsolidated deposits of glacial origin. Beds of coarse sand and gravel in outwash and delta deposits are the most productive water-bearing beds in the County and they present the best possibilities for large-scale ground-water development. The average yield of wells penetrating sand and gravel, for which records were obtained, is about 100 gallons per minute. It is believed that the deposits will yield much larger quantities to individual wells by the use of modern methods of well construction and development.

The total daily withdrawal of ground water in Washington County is estimated to be 4 million gallons. Approximately half this amount is for public supply, and 5 of the 9 municipal systems in the County use ground water. The amount of ground water used by industry is relatively small, the principal use other than for public supply being rural. Several municipal and a few domestic supplies are obtained from springs.

Chemical analyses show that the quality of ground water in Washington County, in general, is acceptable for most uses. However, water analyzed from four wells in the Snake Hill formation is classed as mineral water and water from two of these is similar to the mineral water in the Saratoga Springs area.

GEOGRAPHY

TOPOGRAPHY

Washington County comprises parts of four physiographic areas of the northeastern United States: the Adirondack province, the Hudson Valley section of the Appalachian Valley and Ridge province, the Champlain section of the St. Lawrence Valley, and the Taconic section of the New England province (fig. 2). In Washington County the Hudson and Champlain Valleys form one physiographic unit, which is here referred to as the Hudson-Champlain lowland.

The Adirondack Mountain area is underlain by ancient (pre-Cambrian) crystalline rocks which have resisted the effects of prolonged erosion. The surface is rugged, altitudes ranging from 2,334 feet at Buck Mountain in the northwestern part of the township of Fort Ann to 100 feet on Lake Champlain. The mountain masses tend to be arranged in short ridges roughly parallel and trending northeast by southwest. This topography reflects a series of large normal faults that divide the Adirondack area into huge blocks, which tilt downward to the northwest. Bedrock is frequently exposed at the land surface and the soils, where they exist, are generally thin and of poor quality. Most of the area is heavily wooded, and habitations are few and scattered.

The Hudson-Champlain lowland is essentially a broad depression eroded in soft shale and limestone by the preglacial and interglacial Hudson River and by glacial ice. The rock trench, filled with a thick series of clay and sand, at present is occupied by the more or less winding course of the Hudson River on the south and the channel of Wood Creek on the north. The altitude of the land surface in the center of the depression rises gradually from about 100 feet at Fort Edward on the south to about 150 feet in the vicinity of Dunham Basin east of Hudson Falls, descending again to about 100 feet at Lake Champlain. The high point is the divide between the Hudson River and Lake Champlain basins. The banks of the Hudson River south of Fort Edward nearly everywhere ascend gradually but in some places abruptly, to benches or terraces with altitudes of 200, 300, and 400 feet above sea level. These terraces are being dissected by small tributaries leading to the Hudson River.

The Taconic area in the east covers more than 55 percent of the County. The western boundary, along the Hudson-Champlain lowland, is abrupt and is marked by a low range of hills which extends the length of the County, and includes such elevations as Willard Mountain, Schuyler Mountain, Bald Mountain, Marion Hill, and the Pinnacle. The upland is a westward-sloping plateau whose altitude decreases from about 600 feet to 400 feet above sea level. The area is underlain by sedimentary rocks, which have been strongly metamorphosed and thus strengthened to resist erosion, and presents a highly irregular surface. The topography is marked locally by numerous elongated steep hills and oval hillocks, which have a general north-south trend, though in much of the area there is no alinement of the ridges and valleys. The surface was considerably modified by the passage of the ice sheet, which abraded the rock surfaces, deposited a thin mantle of glacial till over much of the area, and here and there formed rounded or conical glacial hills known as kames and drumlins.

DRAINAGE

The Champlain-Hudson divide traverses the County about midway between its northern and southern limits, and the drainage from the land surface is about equally divided between the two basins. North of the divide the drainage is by Lake Champlain and the St. Lawrence River to the Atlantic Ocean, and south of the divide by the Hudson River, also to the Atlantic. The surface water of the northern area is discharged by three large streams: the Poultney River which forms the northeastern boundary of the County, the Mettawee River, and Wood Creek (pl. 1). Numerous smaller streams flow directly into Lake Champlain and Lake George. Al-

Table 3.—Geologic formations in Washington County and their water-bearing properties

Age		Geologic formation	Maximum thickness (feet)	Character of material	Water-bearing properties
System	Series				
Quaternary	Recent	Alluvium	20	Clay, silt, sand, and gravel.	Yields moderate supplies of good-quality water to a few dug and driven wells.
	Pleistocene	Wisconsin drift	240+	Outwash—interbedded sand and gravel deposited by streams.	Yields moderately large supplies to driven wells and springs; could probably be developed to a much greater extent.
			200	Lacustrine deposits—clay and silt deposited in glacial Lake Albany.	Generally not water bearing.
			150	Delta deposits—fine gravel and sand deposited as deltas in standing bodies of water.	Yields moderately large supplies to driven wells and springs; could probably be developed to a much greater extent.
			35	Till—heterogeneous mixture of gravel, sand, and clay with a predominance of clay.	Yields small supplies of water to many shallow dug wells for domestic and stock use.
Ordovician	Middle Ordovician	Snake Hill formation	600	Black to green argillaceous shale possessing a glazed appearance due to metamorphism.	Yields small supplies of ground water to many drilled wells averaging 125 feet in depth; average yield 8 gallons per minute (gpm). Water is quite hard and may contain hydrogen sulfide. Mineral waters in Washington County may be obtained from this formation.
	Middle and Lower Ordovician	Walloonasac slate	Unknown	Greenish-gray to black slate and schist showing considerable metamorphism.	Supplies a few springs but is relatively unimportant as a source of ground water.
		Trenton group and Beckmantown limestone	1,100	Dark-blue fine-grained thin- to thick-bedded limestone and dolomite locally containing beds of sandstone and chert; shaly partings in upper 50 feet.	Yields moderately large supplies to many drilled wells which encounter fractures or joints; average yield is 12 gpm; very few dry holes reported. Water is moderately concentrated and quite hard.
Ordovician and Cambrian		Taconic sequence of rocks	3,000	Consists of the Bomoseen grit, Mettawee slate, Schodack formation, and Normanskill shale. Reddish grit; black, gray-green, and purple slate and shale with interbedded limestone and white-weathering chert; metamorphosed to varying degrees.	Yields small but reliable supplies of ground water to drilled wells averaging 130 feet in depth; average yield is 8 gpm. Water is moderately hard and contains some iron, but is generally satisfactory. Only small supplies can be developed from slate.
Cambrian	Upper Cambrian	Potomac sandstone and associated dolomite	400	Coarse- to fine-grained almost pure sandstone, grains well cemented. Grades upward into alternating sandstone and dolomite beds.	Yields very small supplies to a few drilled wells but is relatively unimportant as a source of ground water. Water is quite hard and may contain some iron.
Pre-Cambrian		Grenville series and associated igneous rocks	Unknown	Crystalline metamorphic rocks intruded by syenite and granite masses.	Supplies small springs but is unimportant as a source of ground water. Water is soft.

15.4

Mention should be made here of the elongate body of limestone that crops out on the west face of Bald Mountain and extends southward for about 5 miles. It consists of about 70 or more feet of dark-gray massive sandy dolomite overlain by fine-grained bluish-gray limestone. It is truncated on both the top and the bottom by thrust faults, and does not extend for any distance either to the north or to the south. It has been called the Bald Mountain limestone by Cushing and Ruedemann (1914, p. 78) from its occurrence at Bald Mountain. It is considered in this report to be a segment of the Beekmantown and Trenton that has been dragged up along the thrust fault which truncated the overturned eastern edge of the valley rocks (pl. 2).

In the southeastern part of the County, probably separated from the other Taconic rocks by a thrust fault, is an extensive massif known as the Walloomsac slate. The massif consists of green to black smooth shale, schist, and soft slate. Included fossils indicate an age equivalent to the upper Normanskill. Its thickness is unknown.

The Snake Hill formation probably was deposited largely in the Hudson-Champlain lowland but may have overlapped across the intervening barrier into the area of sedimentation to the east. The formation is similar to the Normanskill shale in lithology but lacks the development of the grit and white chert. In general, it is a dark argillaceous shale containing occasional sandy or carbonaceous bands. It may contain some pyrite. It is contorted and crumpled in most places in Washington County and is also cut by cleavage planes and smoothed slip planes which give it a glazed appearance. In the extreme western part of the County in the vicinity of Hudson Falls, the Snake Hill formation is nearly flat-lying and is in a relatively undisturbed position. Rocks of this description are well exposed in the gorge of the Hudson River between Glens Falls and Fort Edward. Its total thickness is believed to be about 600 feet.

Quaternary System

In Washington County deposits of Quaternary age are all unconsolidated and consist of Pleistocene deposits of glacial origin and minor amounts of alluvium of Recent age. The alluvium consists of fine sediments deposited by present-day streams during high water and is derived in part from the disintegration of bedrock and in part from the reworking of Pleistocene deposits. The materials, in general, are silt and fine sand, but they may contain a few beds of coarse sand and gravel. The Pleistocene deposits exposed at the surface were laid down beneath and in front of the last ice sheet and are principally of four types: till, lacustrine clay, outwash, and delta deposits.

Till usually occurs as ground moraine and consists of unsorted rock debris derived from the ice sheet and deposited directly by it, either during its advance or at the time of melting. It forms the mantle of material overlying the bedrock in essentially all the upland areas. Its distribution within the County is shown on plate 3. This veneer of till varies in thickness from a featheredge on the steepest slopes and hilltops, where much bare rock is exposed, to a few tens of feet in the upland valleys and depressions. The material consists of a heterogeneous mixture of unsorted rock debris ranging in size from clay to large boulders. Some of the boulders are granite or quartzite, indicating a more distant source to the north, but the finer particles in till consist of shale and varicolored slate, suggesting a local origin. The results of mechanical analysis of three samples of till made by the Bureau of Soils, U. S. Department of Agriculture, are given in table 4. They show the relative amounts of the different sizes of rock material that make up the till. Because the local rocks are largely shale, slate, and limestone, the till is rich in clay. This clay, together with small amounts of calcareous materials which are dissolved by ground water and redeposited as a cement, at places forms a tough aggregate commonly termed "hardpan". The ground moraine is unusually thick at places and forms low oval hills or drumlins. The unstratified material constituting these glacial features has the same general characteristics as the thinner drift. These thicker till deposits may locally contain lenses of sand or gravel.

features are characteristically sand plains, with the marginal limits of the plains indicated by changes in the topography and in the character of the surface material. Each delta plain is now trenched by the valley of its parent river.

The finest example of the delta deposits in Washington County is the one formed near the mouth of the Batten Kill below Greenwich. The glacial delta of the Batten Kill maintains a comparatively flat-topped surface for 5 miles, both north and south of its apex at Middle Falls, at the western base of Bald Mountain and Schuyler Mountain. The material at the surface consists of sand and gravel, which gives way to the outer margins of the delta to the varved red clay so typical of this section of the Hudson River valley. The present stream has cut deeply into the delta and is flowing on bedrock at an elevation of about 120 feet above sea level. The average altitude above sea level of the bedrock surface is about 200 feet. Detailed logs of the material overlying the rock are generally lacking, as most of the drilled wells in the area are cased through the delta deposit and obtain water from the bedrock. Well W 228, situated on the inner portion of the delta, is reported to penetrate sand and gravel to a depth of 114 feet. Well W 227 is reported to pass through 195 feet of hardpan, clay, and gravel. Well W 224 ends in gravel at a depth of 110 feet below land surface (table 9). From the available records it appears that there is considerable sand and gravel in the deposit, at least at its upper end, and that the deposit may reach the greatest thickness at the southern end of the delta approximately on a line between wells W 227 and W 220.

The delta of the glacial Hudson River at Hudson Falls extends outward from the village to the north, south, and east, and terminates its outer portions in lake clay at an elevation of about 300 feet above sea level. The material at the surface is chiefly sand having a yellowish-brown color. All drilled wells for which records are available pass through this overlying deposit and obtain water from the bedrock. Well W 51 is reported to pass through 65 feet of brown sand, 55 feet of blue clay, and 15 feet of fine sand before entering bedrock. Well W 53 is reported to pass through 27 feet of sand and 23 feet of yellow clay into bedrock. Thus, the records of these wells indicate that the coarser material composing the delta overlies lake clay at this point at a depth 25 to 60 feet below land surface.

Few deep wells or borings penetrate the glacial delta of the Mettawee River at West Granville. The material at the surface consists of porous sand and gravel. The total thickness of the deposit is considered to be less than of the delta deposits previously described, although Well W 79 is reported to penetrate 117 feet of unconsolidated material before reaching bedrock.

GROUND WATER

OCCURRENCE AND AVAILABILITY

With respect to the occurrence of ground water, the geologic formations of Washington County can be classified in two groups: (1) igneous, sedimentary, and metamorphic rocks of pre-Cambrian and early Paleozoic age; and (2) unconsolidated Pleistocene and Recent deposits. The first group, the bedrock, yields only small supplies and is significant chiefly because it occurs everywhere in the County. The unconsolidated deposits contain the most productive water-bearing materials in Washington County. Accordingly, the occurrence and availability of ground water in these deposits are discussed before the corresponding discussion of the consolidated rocks.

Unconsolidated Deposits

The unconsolidated deposits include outwash, delta sediments, till, and lake clay, of glacial and glaciofluvial origin, and the Recent deposits of river alluvium. These deposits vary

considerably in lithologic composition and hence have different effects on the movement of ground water and yield of wells.

Ground water occurs in outwash deposits in pore spaces between the particles of sand and gravel. In general, the particles are relatively well sorted within individual beds and the porosity is relatively high, as shown in tables 4 and 5. Because of these characteristics the permeability of much of the outwash is high. In fact, outwash deposits, together with the delta deposits, are believed to be the most productive aquifers in Washington County. Unfortunately, the areas underlain by outwash materials in Washington County are of small extent (pl. 3), being limited to those valleys whose streams either carried away glacial melt waters or were dammed by the ice itself. The principal outwash deposits occur in the Owl Kill valley near Cambridge and the White Creek valley near Salem. The available data concerning the water-bearing characteristics of outwash in these two areas are discussed in detail below. Little information of this nature is available for the smaller areas of outwash, and for that reason they are not discussed in this report. However, much of the discussion of the water-bearing characteristics of outwash near Cambridge and Salem may also be applied in a limited way to the smaller areas.

OUTWASH IN OWL KILL VALLEY

Origin.—Outwash occupies the Owl Kill valley below an elevation of about 600 feet above sea level from its intersection with the Hoosic River northward to the Batten Kill. During the deposition of the material it is believed that a tongue or lobe of stagnant ice occupied the center of the Owl Kill valley. The southern terminus of this ice lobe probably stood at a latitude slightly south of Center White Creek. Under these conditions the flow of glacial melt water was down the sides of the valley between the ice lobe and the bedrock valley walls, and sediments derived from glacial till and from the ice surface were deposited in these lateral channels. These deposits form kames and kame terraces and consist of irregularly stratified sand and gravel. Some of the lateral outwash may have been deposited around and over the terminus of ice lobe, for eventually the narrow portion of the valley between Center White Creek and the Hoosic River was filled with outwash sand and gravel. The material deposited here acted as a temporary dam to the movement of water down the valley, and a lake formed behind the dam. In the quiet water of the lake, deposits consisting mainly of clay and silt were laid down. Coarser material was deposited along the shores as reworked kame-terrace gravels or as deltas at the mouths of small side streams. A large delta of sand and gravel was formed at the north end of the valley, evidently by a stream flowing southward from the present site of East Salem. This stream is thought to have flowed across a large block of ice which melted and collapsed near the close of the glacial period, leaving the present large depression at the north end of the valley near the great bend in the Batten Kill. At about this same time, it appears, a tributary of White Creek worked headward through the present narrow bedrock gorge at Shushan and captured the Batten Kill, diverting the drainage above East Salem into the Hudson River below Greenwich.

Character.—The coarser and probably the more permeable materials are thus in the kame and delta deposits, which are concentrated at the northern and southern ends and along the sides of the Owl Kill valley. The character of the outwash in the valley was determined chiefly from surface exposures and from a few well logs. The best exposures are in pits on the west side of the valley below Cambridge. The kame deposits consist of irregularly bedded sand and gravel. The material of individual beds is uniform in grain size, but there may be considerable variation between adjacent beds. Very few clay or silt lenses are noted in the exposures. Wells W 338 and W 346, on the east and west sides of the valley respectively, penetrated 94 and 84 feet of sand gravel. No clay was reported in the logs of these wells.

DELTA DEPOSITS

15.8

In Washington County delta deposits are a very productive water-bearing formation, second in importance only to the outwash deposits. The particles making up the delta deposits are relatively well graded as to size, and the pore spaces are open, thus resulting in a fairly high permeability. Unfortunately, they have a limited distribution in the County and are not available for wide-scale development.

Most of the wells in these areas were drilled for domestic and stock purposes requiring small quantities of water that can generally be obtained from bedrock. Therefore, in order to avoid the expense of setting a screen and developing a well in gravel, most deep wells in these areas underlain by permeable delta deposits were drilled through them and obtain water from the bedrock. Few logs of the unconsolidated material are recorded and data concerning its water-bearing character are scarce. For this reason, only the area for which the most information is available, the Batten Kill delta, will be discussed in detail. Ground-water conditions in the other two areas are probably somewhat similar.

The records of drilled wells in the delta deposits of the Batten Kill indicate that the bedrock surface is at an elevation of about 200 feet above sea level. As the surface of the delta is more than 300 feet above sea level, it appears that more than 100 feet of unconsolidated material overlies the bedrock in much of the area. There are indications that a deeper bedrock channel extends southward along the base of Schuyler Mountain. Well W 227 penetrates 195 feet of unconsolidated material without reaching bedrock. A drilled well on the Allan Hand farm, W 224, penetrates 105 feet of sand and clay and draws water from a gravel stratum above the top of the bedrock. The static level of the water in the well is 20 feet below the surface. During a pumping test by the driller after completion of the well, the level of the water was lowered 40 feet but could not be lowered further while being pumped at a rate of 30 gpm. Well W 228 penetrated sand below a layer of clay, and the water flowed at the surface at the rate of 3.5 gpm. Pressure was sufficient to raise the water to the top of a 6-inch pipe extending 5 feet above the ground.

The delta deposits have not yet been developed to any great extent but it is believed that they are a potential source of sizable supplies of ground water. The water table is relatively close to the surface and therefore a considerable thickness of delta sediments is saturated. In order to obtain the maximum amount of water from the more permeable materials, test holes to determine accurately the position of strata of sand and gravel and the upper and lower limits of clay layers would be desirable, followed by installation of properly constructed wells.

TILL

Water occurs in till in pore spaces between individual grains, but as till consists of unsorted rock debris the pores are generally small and the porosity is low. Because most till in Washington County contains a large amount of clay (table 4), it is relatively impermeable and yields water very slowly. It is probable that some wells dug into till obtain water from the more permeable lenses of sand and gravel or from the zone between the base of the till and the bedrock surface. Although the large amount of clay in till may cause ground water to move at a rather slow rate, it holds appreciable quantities of moisture which it yields to wells having a large infiltration surface. Because of its wide distribution in Washington County, it is the source of supply for numerous dug wells many of which yield sufficient quantities of water for domestic and stock use. As most of the wells have been dug by hand and are equipped with small hand or electric pumps which do not withdraw more than is needed, data as to the maximum water-yielding capacity of the till are lacking. An average yield is estimated to be about 1 or 2 gpm. Dug wells of large diameter are especially effective in recovering water from till deposits, inasmuch as they provide considerable infiltration surface and large storage capacity.

LACUSTRINE DEPOSITS

15.9

Water occurs in lacustrine deposits in the pore spaces between individual particles. The particles of clay are relatively well graded as to size but they are extremely small, and the pore spaces, although open, are small; thus their permeability is not unlike that of till. Clay yields water very slowly, and few wells in Washington County obtain water from this material. Those wells that end in clay probably obtain their water from some overlying deposits of a coarser and more permeable nature. Where the clay occurs at the base of the section of unconsolidated deposits, it forms a thick relatively impervious layer over the bedrock, and it may in some cases be responsible for low yields from wells in bedrock. Where the lacustrine clay underlies a considerable thickness of sand and gravel along a river valley, a series of springs may originate at the contact of the clay with the overlying gravel. Such contact occurs along the outer flanks of the Batten Kill delta, where downward percolating water gives rise to springs (W 5Sp—W 10Sp, shown on pl. 1).

ALLUVIUM

In most places in Washington County the alluvium is not coarse enough or of sufficient thickness to be of importance as a source of ground water. Shallow wells that obtain water from the alluvial deposits probably intercept one or more lenses of sand. The average yield of 4 wells in alluvium is 9 gpm. Where the coarser alluvial deposits are in contact with a surface stream, they may yield sufficient water for small industries.

Consolidated Rocks

Consolidated rocks which occur everywhere in Washington County, consist of igneous and metamorphic crystalline rocks, and sedimentary sandstone, limestone, and shale (see section "Geology"). All these rock types, however, are dense and compact, and the movement and storage of ground water in them are controlled by fractures. The degree of fracturing causes some small differences in the water-yielding capacity, but generally the consolidated rocks have relatively small yields. The average yield of 231 wells drilled in bedrock for which records were collected is 9 gpm. The average depth of these wells is 144 feet. The yield is sufficient for domestic needs and for small industries and dairies, but consolidated rocks generally do not yield sufficient water for municipal or large industrial supplies.

GRENVILLE SERIES

The Grenville series underlies most of the northwestern part of Washington County. It is exposed at the surface over much of Dresden and Putnam Townships and those parts of Fort Ann and Whitehall Townships that lie to the north and west of Halfway Creek and Wood Creek (see pls. 1 and 2). The area is inhabited largely by summer residents, and the small water supplies that are required commonly are obtained from unconsolidated deposits overlying the bedrock; therefore, the Grenville series is used as a source of water supply in only a few places in the County.

In general, the crystalline rocks of the Grenville series yield only small supplies of water, as the rocks are dense and circulation of water is restricted to joint fractures. One well, W 4, is reported to flow at the rate of 1 gpm. Small springs are numerous and furnish comparatively soft water. The flow of these springs fluctuates with the season and may cease entirely in summer.

POTSDAM SANDSTONE

The Potsdam sandstone usually is found along the border of the crystalline mass of the Adirondack Mountains. In Washington County it crops out in bold ledges along the valley of

Table 10.—Records of selected wells in Washington County (Continued)

Well number	Location	Owner	Altitude above sea level (feet)	Type of well	Depth (feet)	Diameter (inches)	Depth to bedrock (feet)	Aquifer	Water level below land surface (feet)	Method of lift	Yield (gallons per minute)	Use	Remarks
W 147	7Z, 13.8S, 1.9E	Wilbur McDougall	420	Dri	128	6	40	Snake Hill formation	13	Jet	4	Farm	Some water reported at depths of 30 and 60 feet; main water bed at 128 feet.
W 148	7Z, 14.3S, 2.4E	A. G. Skellie	400	Dri	204	6	45	do.	21	Suction	5	Farm	Main water bed reported to be 90 feet.
W 149	7Z, 16.8S, 1.7E	Mary Black	340	Dri	155	6	7	do.	40	Jet	5	Farm	
W 150	7Z, 16.5S, 1.2E	Ernest Reid	400	Dri	115	6	6	Beekmantown limestone	17	do.	17	Farm	Drawdown reported to be 28 feet when well is pumped at 17 gallons per min.
W 151	7Z, 16.9S, 0.2E	Leland Middleton	520	Dri	81	6	2	Snake Hill formation	3	do.	3.5	Farm	
W 152	8Z, 0.2S, 1.6W	Wallace Labosier	160	Dri	109	..	7	do.	10	Suction	27	Farm	Some water reported at a depth of 30 ft.
W 153	8Z, 0.5S, 1.6W	Howard Bunker	160	Dri	119	6	..	do.	15	Jet	6	Farm	
W 154	8Z, 0.4S, 2.7W	Ennis Rozelle	150	Dri	247	6	200	do.	..	None	2-3	Med	Mineral well; flows at 2 to 3 gpm, temperature 48° F.
W 155	8Z, 0.9S, 4.7W	John Germain	136	Dri	195	6	87	do.	..	Force	3	Farm	(a).
W 156	8Z, 1.0S, 4.6W	George Tully	140	Dri	137	6	50	Snake Hill formation	20	Force	6	Dom	Mineral well. *
W 157	8Z, 2.2S, 3.9W	John Dixon	160	Dri	227	6	2	do.	12	do.	10	Dom	
W 158	8Z, 2.0S, 3.0W	A. Hayward Carey	140	Dri	126	6	62	do.	10	do.	17	Farm	Some water reported at depth of 30 and 60 feet; main water bed at 126 feet.
W 159	8Z, 1.9S, 2.7W	do.	139	Dri	90	..	33	do.	..	Suction	15	Farm	Some water reported at depth of 25 and 60 feet; main water bed at 90 feet.
W 160	8Z, 1.9S, 1.8W	John Copeland	320	Dri	117	6	2	do.	9	..	4	Dom	
W 161	8Z, 2.0S, 1.4W	Crosby Hopkins	440	Dri	97	6	17	do.	37	..	27	Farm	Main water bed reported at a depth of 75 to 97 feet.
W 162	8Z, 3.4S, 4.1W	Lawrence Murray	140	Dri	93	6	9	do.	8	Jet	1	Dom	
W 163	8Z, 3.2S, 2.8W	Frank Taylor	240	Dri	100	6	48	do.	7	do.	9	Farm	
W 166	8Z, 3.7S, 3.0W	Carl Cromwell	290	Dri	150	6	84	do.	60	Force	15	Farm	Some water reported at depth of 90 and 100 feet; main water bed at 150 feet.
W 167	8Z, 4.6S, 3.3W	Roland Williams	304	Dri	115	6	77	do.	47	Jet	11	Farm	
W 168	8Z, 4.8S, 1.7W	Karl Markert	240	Dri	148	6	14	do.	30	Force	4	Farm	
W 170	8Z, 6.3S, 3.3W	Martha Britton	200	Dri	137	6	60	do.	..	Jet	4	Farm	Water reported to contain hydrogen sulfide.
W 172	8Z, 6.0S, 4.1W	Fort Miller Reformed Church	120	Dri	85	6	4	do.	13	..	12	Dom	Yield reported to be 3 gpm at 30 feet.
W 174	8Z, 6.2S, 1.8W	Monroe Waite	240	Dri	245	6	87	do.	70	..	4	Farm	Water reported to contain hydrogen sulfide. Main water bed reported at a depth of 200 to 220 feet.
W 176	8Z, 7.3S, 0.3W	Harry Wilson	450	Dri	130	6	9	Taconic sequence	40	Jet	10	Dom	Drawdown reported to be 80 feet when pumped at 10 gpm for 3 hours. *
W 178	8Z, 8.0S, 0.3W	John Barber	460	Dri	30	6	4	do.	10	Suction	..	Dom	
W 181	8Z, 7.0S, 3.0W	Clifford Fuller	227	Dri	211	6	62	Snake Hill formation	25	Force	3	Farm	

See footnotes at end of table.

15.10



July 23, 1986

Ref 16.1

Mr. Francis Doetsch
Route 40, RD#2
Argyle, New York 12809

RE: NYSDEC Phase I Investigations
(WE Project No. 01726281)

Dear Mr. Doetsch:

On July 16, I spoke to you regarding information pertaining to a previous drum storage area on your property, which has been listed by the NYSDEC as a Potentially Hazardous Waste Site.

In an effort to document actual data about this site, I have highlighted our conversation on the attached page and would like you to review this document for accuracy. Wehran Engineering documents sources of information for reference providing that additional contacts may be warranted.

Please feel free to edit as you deem necessary. Also, please add any additional information which may be pertinent to our investigation. Wehran requests that you please sign and return this document within ten days to the attention of the undersigned at the following address:

Wehran Engineers & Scientists
666 East Main Street
Middletown, New York 10940

If this interview record is not returned, Wehran will use the unsigned document for our investigation.

Thank you very much for your time and cooperation with our investigation.

Very truly yours,

WEHRAN ENGINEERING, P.C.

David B. Tompkins

David B. Tompkins
Environmental Scientist

DBT/hbf
Attachment



INTERVIEW ACKNOWLEDGEMENT FORM

Ref 16.2

Site Name	Doetsch Residence	L.D. Number	558012
Person Contacted	Mr. Francis Doetsch	Date	7/17/86
Title	Owner		
Affiliation		Phone Number	518-638-8320
Address	Route 40, RD#2 Argyle, New York 12809		
Type of Contact	Site Visit	Contact Person(s)	David Tompkins Karen Maloy

Interview Summary

Mr. Doetsch purchased 27 barrels of mineral oil from GE Fort Edward in 1963 for application to fence posts as a wood preservative. During the early 1980s, these drums were noted to be leaking. Mr. Doetsch contacted Mr. Ray Cowen of NYSDEC Region 4 who provided him with overpack drums. Subsequent site inspections prompted Mr. Cowen to arranged GE to perform a remedial clean-up at the site.

The NYSDEC-GE clean-up (1983) involved sampling, removal of the 27 drums, and removal of approximately 50 cubic yards of contaminated soil. Of the total oil present, approximately 100 gallons were estimated to have leaked. The excavated area was backfilled with bankrun.

The Doetsch residence is served by a private well located approximately 300 feet north of the disposal area.

Acknowledgement

I have read the above transcript and I agree that it is an accurate summary of the information verbally conveyed to Wehran Engineering interviewer(s) (as revised below, if necessary).

Revisions (please write in any corrections needed to above transcript)

*No response or if
8/23/86
David B. Tompkins*

Signature _____

Date _____

EPA FORMS 2070-12 AND 2070-13



POTENTIAL HAZARDOUS WASTE SITE
PRELIMINARY ASSESSMENT
PART 1 - SITE INFORMATION AND ASSESSMENT

I. IDENTIFICATION
01 STATE 02 SITE NUMBER
NY 558012

II. SITE NAME AND LOCATION

01 SITE NAME (Legal, common, or descriptive name of site)

Doetsch Residence

02 STREET, ROUTE NO., OR SPECIFIC LOCATION IDENTIFIER

Route 40

03 CITY

Arglye

04 STATE

NY

05 ZIP CODE

12809

06 COUNTY

Washington

07 COUNTY CODE

08 CON-
DIST

09 COORDINATES LATITUDE

43° 18' 02" N

LONGITUDE

73° 72' 09" W

10 DIRECTIONS TO SITE (Starting from nearest public road)

From North Argyle: Rt. 40 north approximately two miles. House is located on right side.

III. RESPONSIBLE PARTIES

01 OWNER (If owner)

Mr. Francis Doetsch

02 STREET (Business, mailing, residential)

Route 40

03 CITY

Argyle

04 STATE

NY

05 ZIP CODE

06 TELEPHONE NUMBER
(518) 638-8320

07 OPERATOR (If owner and different from owner)

08 STREET (Business, mailing, residential)

09 CITY

10 STATE

11 ZIP CODE

12 TELEPHONE NUMBER
()

13 TYPE OF OWNERSHIP (Check one)

☒ A. PRIVATE ☐ B. FEDERAL:

(Agency name)

☐ C. STATE

☐ D. COUNTY

☐ E. MUNICIPAL

☐ F. OTHER:

(Specify)

☐ G. UNKNOWN

14 OWNER/OPERATOR NOTIFICATION ON FILE (Check all that apply)

☐ A. RCRA 3001 DATE RECEIVED:

MONTH DAY YEAR

☐ B. UNCONTROLLED WASTE SITE/RCRA 103(d) DATE RECEIVED:

MONTH DAY YEAR

☐ C. NONE

IV. CHARACTERIZATION OF POTENTIAL HAZARD

01 ON SITE INSPECTION

☒ YES

DATE

7 / 15 / 86
MONTH DAY YEAR

☐ NO

BY (Check all that apply)

☐ A. EPA

☐ B. EPA CONTRACTOR

☐ C. STATE

☐ D. OTHER CONTRACTOR

☐ E. LOCAL HEALTH OFFICIAL

☒ F. OTHER:

State Contractor
(Specify)

CONTRACTOR NAME(S):

Wehran Engineering

02 SITE STATUS (Check one)

☐ A. ACTIVE

☒ B. INACTIVE

☐ C. UNKNOWN

03 YEARS OF OPERATION

19 63

19 83

BEGINNING YEAR

ENDING YEAR

☐ UNKNOWN

04 DESCRIPTION OF SUBSTANCES POSSIBLY PRESENT, KNOWN, OR ALLEGED

Twenty-seven barrels of oil containing PCB's were stored at site. Approximately 100 gallons leaked. Drums and contaminated soil were removed.

05 DESCRIPTION OF POTENTIAL HAZARD TO ENVIRONMENT AND/OR POPULATION

Some PCB contaminated soil may remain at site.

V. PRIORITY ASSESSMENT

01 PRIORITY FOR INSPECTION (Check one. If high or medium is checked, complete Part 2 - Waste Information and Part 3 - Description of Hazardous Conditions and Inventory)

☐ A. HIGH

(Inspection required promptly)

☐ B. MEDIUM

(Inspection required)

☒ C. LOW

(Inspection on time available basis)

☐ D. NONE

(No further action needed, complete current inspection form)

VI. INFORMATION AVAILABLE FROM

01 CONTACT

Dennis G. Fenn

02 OF (Agency/Organization)

Wehran Engineering

03 TELEPHONE NUMBER

(914) 343-0660

04 PERSON RESPONSIBLE FOR ASSESSMENT

David B. Tompkins

05 AGENCY

06 ORGANIZATION

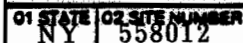
Wehran Eng.

07 TELEPHONE NUMBER

(914) 343-0660

08 DATE

7 / 23 / 86
MONTH DAY YEAR

[illegible]

NYSDEC Region 5 and BHSC File Documents



POTENTIAL HAZARDOUS WASTE SITE
PRELIMINARY ASSESSMENT

PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. HAZARDOUS CONDITIONS AND INCIDENTS

01 ☒ A. GROUNDWATER CONTAMINATION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Closest well is 300 feet north of the site. No known contamination.

01 ☐ B. SURFACE WATER CONTAMINATION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Unknown, clay soil and removal of waste may have precluded waste migration.

01 ☐ C. CONTAMINATION OF AIR

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Unknown

01 ☐ D. FIRE/EXPLOSIVE CONDITIONS

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Not probable; waste removed

01 ☐ E. DIRECT CONTACT

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

unknown

01 ☒ F. CONTAMINATION OF SOIL

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 AREA POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

50 cubic yards of soil were removed. Potential for additional contamination unknown.

01 ☒ G. DRINKING WATER CONTAMINATION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Closest well is 300 feet north of the site. No known contamination.

01 ☐ H. WORKER EXPOSURE/INJURY

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 WORKERS POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

No workers present; private property.

01 ☐ I. POPULATION EXPOSURE/INJURY

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Unknown



POTENTIAL HAZARDOUS WASTE SITE
PRELIMINARY ASSESSMENT
PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. HAZARDOUS CONDITIONS AND INCIDENTS (Continued)

01 ☒ J. DAMAGE TO FLORA 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

04 NARRATIVE DESCRIPTION

None documented or observed.

01 ☒ K. DAMAGE TO FAUNA 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

04 NARRATIVE DESCRIPTION (Include names of species)

None documented or observed.

01 ☐ L. CONTAMINATION OF FOOD CHAIN 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

04 NARRATIVE DESCRIPTION

Unknown

01 ☒ M. UNSTABLE CONTAINMENT OF WASTES 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

(Spills/Leaks/Sludging events, Leaking drums)

03 POPULATION POTENTIALLY AFFECTED: _____ 04 NARRATIVE DESCRIPTION

Waste material has been removed.

01 ☐ N. DAMAGE TO OFFSITE PROPERTY 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

04 NARRATIVE DESCRIPTION

Unknown

01 ☐ O. CONTAMINATION OF SEWERS, STORM DRAINS, WWTPs 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

04 NARRATIVE DESCRIPTION

Unknown

01 ☐ P. ILLEGAL/UNAUTHORIZED DUMPING 02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED

04 NARRATIVE DESCRIPTION

Unknown

05 DESCRIPTION OF ANY OTHER KNOWN, POTENTIAL, OR ALLEGED HAZARDS

Unknown

III. TOTAL POPULATION POTENTIALLY AFFECTED: _____

IV. COMMENTS

V. SOURCES OF INFORMATION (Cite specific references, e.g., 2000 RRS, Agency analysis, reports)

Wehran Engineering Site Inspection 7/15/86
NYSDEC Region 5 and BHSC File Review



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 1 - SITE LOCATION AND INSPECTION INFORMATION

I. IDENTIFICATION

01 STATE NY 02 SITE NUMBER 558012

II. SITE NAME AND LOCATION

01 SITE NAME (Legal, common, or descriptive name of site) Doetsch Residence		02 STREET, ROUTE NO., OR SPECIFIC LOCATION IDENTIFIER Route 40			
03 CITY Argyle	04 STATE	05 ZIP CODE 12809	06 COUNTY Washington	07 COUNTY CODE	08 CON. DIST.
09 COORDINATES LATITUDE 43° 18' 02" N LONGITUDE 73° 29' 09" W		10 TYPE OF OWNERSHIP (Check one) <input checked="" type="checkbox"/> A. PRIVATE <input type="checkbox"/> B. FEDERAL <input type="checkbox"/> C. STATE <input type="checkbox"/> D. COUNTY <input type="checkbox"/> E. MUNICIPAL <input type="checkbox"/> F. OTHER <input type="checkbox"/> G. UNKNOWN			

III. INSPECTION INFORMATION

01 DATE OF INSPECTION 7 15 86 MONTH DAY YEAR	02 SITE STATUS <input checked="" type="checkbox"/> ACTIVE <input type="checkbox"/> INACTIVE	03 YEARS OF OPERATION 1963 1983 BEGINNING YEAR ENDING YEAR		UNKNOWN
04 AGENCY PERFORMING INSPECTION (Check all that apply) <input type="checkbox"/> A. EPA <input type="checkbox"/> B. EPA CONTRACTOR <input type="checkbox"/> C. MUNICIPAL <input type="checkbox"/> D. MUNICIPAL CONTRACTOR <input type="checkbox"/> E. STATE <input checked="" type="checkbox"/> F. STATE CONTRACTOR Wehran Engineering (Name of firm) <input type="checkbox"/> G. OTHER (Specify)				

05 CHIEF INSPECTOR David B. Tompkins	06 TITLE Environmental Scientist	07 ORGANIZATION Wehran Eng.	08 TELEPHONE NO. (914) 343-0660
09 OTHER INSPECTORS Karen E. Maloy	10 TITLE Environmental Scientist	11 ORGANIZATION Wehran Eng.	12 TELEPHONE NO. (914) 343-0660
			()
			()
			()
			()
13 SITE REPRESENTATIVES INTERVIEWED Mr. Francis Doetsch	14 TITLE owner	15 ADDRESS Route 40, Argyle, NY	16 TELEPHONE NO. (518) 638-8320
			()
			()
			()
			()
			()
			()
17 ACCESS GAINED BY (Check one) <input checked="" type="checkbox"/> PERMISSION <input type="checkbox"/> WARRANT	18 TIME OF INSPECTION 3:30 p.m.	19 WEATHER CONDITIONS clear, warm	

IV. INFORMATION AVAILABLE FROM

01 CONTACT Dennis G. Fenn	02 OF (Agency/Organization) Wehran Engineering		03 TELEPHONE NO. (914) 343-0660	
04 PERSON RESPONSIBLE FOR SITE INSPECTION FORM David B. Tompkins	05 AGENCY	06 ORGANIZATION Wehran Eng.	07 TELEPHONE NO. (914) 343-0660	08 DATE 7 23 86 MONTH DAY YEAR



<input type="checkbox"/> A. TOXIC	<input type="checkbox"/> E. SOLUBLE	<input type="checkbox"/> I. HIGHLY VOLATILE
<input type="checkbox"/> B. CORROSIVE	<input type="checkbox"/> F. INFECTIOUS	<input type="checkbox"/> J. EXPLOSIVE
<input type="checkbox"/> C. RADIOACTIVE	<input type="checkbox"/> G. FLAMMABLE	<input type="checkbox"/> K. REACTIVE
<input type="checkbox"/> D. PERSISTENT	<input type="checkbox"/> H. IGNITABLE	<input type="checkbox"/> L. INCOMPATIBLE
		<input type="checkbox"/> M. NOT APPLICABLE

NYSDEC Region 5 and BHSC File Documents



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

L IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. HAZARDOUS CONDITIONS AND INCIDENTS

01 ☒ A. GROUNDWATER CONTAMINATION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Closest well is 300 feet north of the site. No known contamination.

01 ☐ B. SURFACE WATER CONTAMINATION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Unknown, clay soil and removal of waste may have precluded waste migration.

01 ☐ C. CONTAMINATION OF AIR

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Unknown

01 ☐ D. FIRE/EXPLOSIVE CONDITIONS

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Not probable; waste removed

01 ☐ E. DIRECT CONTACT

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

unknown

01 ☒ F. CONTAMINATION OF SOIL

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 AREA POTENTIALLY AFFECTED: _____
(Acres)

04 NARRATIVE DESCRIPTION

50 cubic yards of soil were removed. Potential for additional contamination unknown.

01 ☒ G. DRINKING WATER CONTAMINATION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Closest well is 300 feet north of the site. No known contamination.

01 ☐ H. WORKER EXPOSURE/INJURY

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 WORKERS POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

No workers present; private property.

01 ☐ I. POPULATION EXPOSURE/INJURY

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

03 POPULATION POTENTIALLY AFFECTED: _____

04 NARRATIVE DESCRIPTION

Unknown



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT

PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. HAZARDOUS CONDITIONS AND INCIDENTS (Continued)

01 ☒ J. DAMAGE TO FLORA
04 NARRATIVE DESCRIPTION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

None documented or observed.

01 ☒ K. DAMAGE TO FAUNA

04 NARRATIVE DESCRIPTION (Include names of species)

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

None documented or observed.

01 ☐ L. CONTAMINATION OF FOOD CHAIN

04 NARRATIVE DESCRIPTION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

Unknown

01 ☒ M. UNSTABLE CONTAINMENT OF WASTES

(Spills/Leaks/Standing liquids, Leaking drums)

03 POPULATION POTENTIALLY AFFECTED: _____

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

04 NARRATIVE DESCRIPTION

Waste material has been removed.

01 ☐ N. DAMAGE TO OFFSITE PROPERTY

04 NARRATIVE DESCRIPTION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

Unknown

01 ☐ O. CONTAMINATION OF SEWERS, STORM DRAINS, WWTPs

04 NARRATIVE DESCRIPTION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

Unknown

01 ☐ P. ILLEGAL/UNAUTHORIZED DUMPING

04 NARRATIVE DESCRIPTION

02 ☐ OBSERVED (DATE: _____)

☐ POTENTIAL

☐ ALLEGED

Unknown

05 DESCRIPTION OF ANY OTHER KNOWN, POTENTIAL, OR ALLEGED HAZARDS

Unknown

III. TOTAL POPULATION POTENTIALLY AFFECTED: _____

IV. COMMENTS

V. SOURCES OF INFORMATION (Cite specific references, e. g., State (Reg. Sample analysis, reports)

Wehran Engineering Site Inspection 7/15/86
NYSDEC Region 5 and BHSC File Review



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION
PART 4 - PERMIT AND DESCRIPTIVE INFORMATION

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. PERMIT INFORMATION

01 TYPE OF PERMIT ISSUED (Check all that apply)	02 PERMIT NUMBER	03 DATE ISSUED	04 EXPIRATION DATE	05 COMMENTS
<input type="checkbox"/> A. NPOES				
<input type="checkbox"/> B. UIC				
<input type="checkbox"/> C. AIR				
<input type="checkbox"/> D. RCRA				
<input type="checkbox"/> E. RCRA INTERIM STATUS				
<input type="checkbox"/> F. SPCC PLAN				
<input type="checkbox"/> G. STATE (Specify)				
<input type="checkbox"/> H. LOCAL (Specify)				
<input type="checkbox"/> I. OTHER (Specify)				
<input type="checkbox"/> J. NONE				

III. SITE DESCRIPTION

01 STORAGE/DISPOSAL (Check all that apply)	02 AMOUNT	03 UNIT OF MEASURE	04 TREATMENT (Check all that apply)	05 OTHER
<input type="checkbox"/> A. SURFACE IMPOUNDMENT			<input type="checkbox"/> A. INCINERATION	<input checked="" type="checkbox"/> A. BUILDINGS ON SITE
<input type="checkbox"/> B. PILES			<input type="checkbox"/> B. UNDERGROUND INJECTION	
<input checked="" type="checkbox"/> C. DRUMS, ABOVE GROUND	27 drums	55 gal	<input type="checkbox"/> C. CHEMICAL/PHYSICAL	
<input type="checkbox"/> D. TANK, ABOVE GROUND			<input type="checkbox"/> D. BIOLOGICAL	
<input type="checkbox"/> E. TANK, BELOW GROUND			<input type="checkbox"/> E. WASTE OIL PROCESSING	
<input type="checkbox"/> F. LANDFILL			<input type="checkbox"/> F. SOLVENT RECOVERY	
<input type="checkbox"/> G. LANDFARM			<input type="checkbox"/> G. OTHER RECYCLING/RECOVERY	
<input type="checkbox"/> H. OPEN DUMP			<input type="checkbox"/> H. OTHER (Specify)	
<input type="checkbox"/> I. OTHER (Specify)				

07 COMMENTS

Site is a private residence. Only 0.1 acre has been affected by spilled waste.

IV. CONTAINMENT

01 CONTAINMENT OF WASTES (Check one)

☐ A. ADEQUATE, SECURE ☐ B. MODERATE ☐ C. INADEQUATE, POOR ☐ D. INSECURE, UNSOUND, DANGEROUS

02 DESCRIPTION OF DRUMS, CASKS, LINES, BARRIERS, ETC.

A total of 27 drums were at the site. Apparently only four or five leaked a total of 100 gallons of oil. No containment measures were present. Waste oils have been removed. During years of storage they were located on private property, but the area was not fenced.

V. ACCESSIBILITY

01 WASTE EASILY ACCESSIBLE: ☐ YES ☒ NO
02 COMMENTS

VI. SOURCES OF INFORMATION (Cite specific references, e.g., state files, agency analysis, reports)

NYSDEC Region 5 and BHSC file documents.



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 5 - WATER, DEMOGRAPHIC, AND ENVIRONMENTAL DATA

I. IDENTIFICATION

01 STATE: 02 SITE NUMBER
NY 558012

II. DRINKING WATER SUPPLY

01 TYPE OF DRINKING SUPPLY
(Check as applicable)

SURFACE WELL
COMMUNITY A. ☐ B. ☒
NON-COMMUNITY C. ☐ D. ☒

02 STATUS

Unknown

ENDANGERED AFFECTED MONITORED
A. ☐ B. ☐ C. ☐
D. ☐ E. ☐ F. ☐

03 DISTANCE TO SITE

A. >3 (mi)
B. >0.1 (mi)

III. GROUNDWATER

01 GROUNDWATER USE IN VICINITY (Check one)

☒ A. ONLY SOURCE FOR DRINKING ☐ B. DRINKING
(Other sources available)
COMMERCIAL, INDUSTRIAL, IRRIGATION
(No other water sources available)
☐ C. COMMERCIAL, INDUSTRIAL, IRRIGATION
(Limited other sources available)
☐ D. NOT USED, UNUSABLE

02 POPULATION SERVED BY GROUND WATER 733 people w/in 3 miles

03 DISTANCE TO NEAREST DRINKING WATER WELL 300 feet (mi)

04 DEPTH TO GROUNDWATER

109 (ft)

05 DIRECTION OF GROUNDWATER FLOW

NW

06 DEPTH TO AQUIFER
OF CONCERN
40-45 (ft)

07 POTENTIAL YIELD
OF AQUIFER
(gpd)

08 SOLE SOURCE AQUIFER

☒ YES ☐ NO

09 DESCRIPTION OF WELLS (including usage, depth, and location relative to population and buildings)

Well on site is screen in shale. Closest wells indicate a possible water table at 109 feet. No other information is available.

10 RECHARGE AREA

☐ YES ☐ NO
COMMENTS Unknown

11 DISCHARGE AREA

☐ YES ☐ NO
COMMENTS Unknown

V. SURFACE WATER

01 SURFACE WATER USE (Check one)

☒ A. RESERVOIR, RECREATION
DRINKING WATER SOURCE ☐ B. IRRIGATION, ECONOMICALLY
IMPORTANT RESOURCES ☐ C. COMMERCIAL, INDUSTRIAL ☐ D. NOT CURRENTLY USED

02 AFFECTED/POTENTIALLY AFFECTED BODIES OF WATER

NAME:	AFFECTED	DISTANCE TO SITE
Unknown	<input type="checkbox"/>	(mi)
	<input type="checkbox"/>	(mi)
	<input type="checkbox"/>	(mi)

VI. DEMOGRAPHIC AND PROPERTY INFORMATION

01 TOTAL POPULATION WITHIN

ONE (1) MILE OF SITE TWO (2) MILES OF SITE THREE (3) MILES OF SITE
A. 53 B. 361 C. 733
NO. OF PERSONS NO. OF PERSONS NO. OF PERSONS

02 DISTANCE TO NEAREST POPULATION

300 feet (mi)

03 NUMBER OF BUILDINGS WITHIN TWO (2) MILES OF SITE

95

04 DISTANCE TO NEAREST OFF-SITE BUILDING

700 feet (mi)

05 POPULATION WITHIN VICINITY OF SITE (Provide narrative description of nature of population within vicinity of site, e.g., rural village, densely populated urban area)

USGS Rural House Count (Hartford and Glens Falls quad, 1976)
1 mile: 14 houses - 53 people
2 miles: 45 houses - 361 people
3 miles: 193 houses - 733 people



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 5 - WATER, DEMOGRAPHIC, AND ENVIRONMENTAL DATA

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

VI. ENVIRONMENTAL INFORMATION

01 PERMEABILITY OF UNSATURATED ZONE (Check one)

☐ A. $10^{-6} - 10^{-8}$ cm/sec ☒ B. $10^{-4} - 10^{-6}$ cm/sec ☐ C. $10^{-4} - 10^{-3}$ cm/sec ☐ D. GREATER THAN 10^{-3} cm/sec

02 PERMEABILITY OF BEDROCK (Check one)

☐ A. IMPERMEABLE
(Less than 10^{-8} cm/sec)
☒ B. RELATIVELY IMPERMEABLE
($10^{-4} - 10^{-6}$ cm/sec)
☐ C. RELATIVELY PERMEABLE
($10^{-2} - 10^{-4}$ cm/sec)
☐ D. VERY PERMEABLE
(Greater than 10^{-2} cm/sec)

03 DEPTH TO BEDROCK

40-45 (ft)

04 DEPTH OF CONTAMINATED SOIL ZONE

unknown (ft)

05 SOIL pH

06 NET PRECIPITATION

14 (in)

07 ONE YEAR 24 HOUR RAINFALL

2.5 (in)

08 SLOPE
SITE SLOPE
0-2 %

DIRECTION OF SITE SLOPE
North

TERRAIN AVERAGE SLOPE
3-5 %

09 FLOOD POTENTIAL

N/A

¹⁰N/A

SITE IS IN _____ YEAR FLOODPLAIN

☐ SITE IS ON BARRIER ISLAND, COASTAL HIGH HAZARD AREA, RIVERINE FLOODWAY

11 DISTANCE TO WETLANDS (0.5 mile minimum)

ESTUARINE

See below
OTHER

A. _____ (mi)

B. _____ (mi)

12 DISTANCE TO CRITICAL HABITAT (of endangered species)

_____ (mi)

ENDANGERED SPECIES: _____

13 LAND USE IN VICINITY

DISTANCE TO:

COMMERCIAL/INDUSTRIAL

RESIDENTIAL AREAS: NATIONAL/STATE PARKS,
FORESTS, OR WILDLIFE RESERVES

AGRICULTURAL LANDS
PRIME AG LAND AG LAND

A. _____ (mi)

B. 0.1 (mi)

C. _____ (mi)

D. 1.0 (mi)

14 DESCRIPTION OF SITE IN RELATION TO SURROUNDING TOPOGRAPHY

Area is relatively flat. A 500+ area wetland is 400 feet east of the site; however, this wetland drains to a different drainage system than the site.

VII. SOURCES OF INFORMATION (Cite specific references, e.g., maps, files, sample analyses, records)

NYSDEC Region 5 File documents
Wehran Engineering site inspection, July 15, 1986



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 6 - SAMPLE AND FIELD INFORMATION

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. SAMPLES TAKEN

SAMPLE TYPE	01 NUMBER OF SAMPLES TAKEN	02 SAMPLES SENT TO	03 ESTIMATED DATE RESULTS AVAILABLE
GROUNDWATER			
SURFACE WATER			
WASTE			
AIR			
RUNOFF			
SPILL			
SOIL			
VEGETATION			
OTHER			

III. FIELD MEASUREMENTS TAKEN

01 TYPE	02 COMMENTS

IV. PHOTOGRAPHS AND MAPS

01 TYPE <input checked="" type="checkbox"/> GROUND <input type="checkbox"/> AERIAL	02 IN CUSTODY OF <u>Wehran Engineering</u> <small>(Name of organization or individual)</small>
03 MAPS <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	04 LOCATION OF MAPS <u>Wehran Engineering</u>

V. OTHER FIELD DATA COLLECTED (Provide narrative description)

None

VI. SOURCES OF INFORMATION (Cite specific references, e.g., state files, agency reports, reports)

Wehran Engineering Site Inspection, 7/15/86



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 7 - OWNER INFORMATION

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. CURRENT OWNER(S)

PARENT COMPANY (if applicable)

01 NAME Mr. Francis Doetsch		02 D+B NUMBER		03 NAME		04 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.) Route 40 Road #2		04 SIC CODE		10 STREET ADDRESS (P.O. Box, APO #, etc.)		11 SIC CODE	
05 CITY Argyle		06 STATE NY	07 ZIP CODE 12809	12 CITY		13 STATE	14 ZIP CODE
01 NAME		02 D+B NUMBER		03 NAME		04 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, APO #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE	12 CITY		13 STATE	14 ZIP CODE
01 NAME		02 D+B NUMBER		03 NAME		04 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, APO #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE	12 CITY		13 STATE	14 ZIP CODE
01 NAME		02 D+B NUMBER		03 NAME		04 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, APO #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE	12 CITY		13 STATE	14 ZIP CODE

III. PREVIOUS OWNER(S)

(List most recent first)

IV. REALTY OWNER(S)

(If applicable: list most recent first)

01 NAME		02 D+B NUMBER		01 NAME		02 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE		03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE	05 CITY		06 STATE	07 ZIP CODE
01 NAME		02 D+B NUMBER		01 NAME		02 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE		03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE	05 CITY		06 STATE	07 ZIP CODE
01 NAME		02 D+B NUMBER		01 NAME		02 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE		03 STREET ADDRESS (P.O. Box, APO #, etc.)		04 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE	05 CITY		06 STATE	07 ZIP CODE

V. SOURCES OF INFORMATION (Cite specific references, e.g., state files, owner interviews, reports)

NYSDEC Registry form, December 1983



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 8 - OPERATOR INFORMATION

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. CURRENT OPERATOR (Provide if different from owner)

OPERATOR'S PARENT COMPANY (If applicable)

01 NAME			02 D+S NUMBER			10 NAME			11 D+S NUMBER		
03 STREET ADDRESS (P.O. Box, RFD #, etc.)			04 SIC CODE			12 STREET ADDRESS (P.O. Box, RFD #, etc.)			13 SIC CODE		
05 CITY			06 STATE 07 ZIP CODE			14 CITY			15 STATE 16 ZIP CODE		
08 YEARS OF OPERATION			09 NAME OF OWNER								

III. PREVIOUS OPERATOR(S) (List most recent first; provide only if different from owner)

PREVIOUS OPERATORS' PARENT COMPANIES (If applicable)

01 NAME			02 D+S NUMBER			10 NAME			11 D+S NUMBER		
03 STREET ADDRESS (P.O. Box, RFD #, etc.)			04 SIC CODE			12 STREET ADDRESS (P.O. Box, RFD #, etc.)			13 SIC CODE		
05 CITY			06 STATE 07 ZIP CODE			14 CITY			15 STATE 16 ZIP CODE		
08 YEARS OF OPERATION			09 NAME OF OWNER DURING THIS PERIOD								

01 NAME			02 D+S NUMBER			10 NAME			11 D+S NUMBER		
03 STREET ADDRESS (P.O. Box, RFD #, etc.)			04 SIC CODE			12 STREET ADDRESS (P.O. Box, RFD #, etc.)			13 SIC CODE		
05 CITY			06 STATE 07 ZIP CODE			14 CITY			15 STATE 16 ZIP CODE		
08 YEARS OF OPERATION			09 NAME OF OWNER DURING THIS PERIOD /								

1 NAME			02 D+S NUMBER			10 NAME			11 D+S NUMBER		
03 STREET ADDRESS (P.O. Box, RFD #, etc.)			04 SIC CODE			12 STREET ADDRESS (P.O. Box, RFD #, etc.)			13 SIC CODE		
15 CITY			06 STATE 07 ZIP CODE			14 CITY			15 STATE 16 ZIP CODE		
8 YEARS OF OPERATION			09 NAME OF OWNER DURING THIS PERIOD								

IV. SOURCES OF INFORMATION (Cite specific references, e.g., state files, owner interviews, records)



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 9 - GENERATOR/TRANSPORTER INFORMATION

I. IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

II. ON-SITE GENERATOR

01 NAME	02 D+S NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE 07 ZIP CODE

III. OFF-SITE GENERATOR(S)

01 NAME	02 D+S NUMBER	01 NAME	02 D+S NUMBER
GE Fort Edward			
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
North Street			
05 CITY	06 STATE 07 ZIP CODE	05 CITY	06 STATE 07 ZIP CODE
schenectady	NY 12345		
01 NAME	02 D+S NUMBER	01 NAME	02 D+S NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE 07 ZIP CODE	05 CITY	06 STATE 07 ZIP CODE

IV. TRANSPORTER(S)

01 NAME	02 D+S NUMBER	01 NAME	02 D+S NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE 07 ZIP CODE	05 CITY	06 STATE 07 ZIP CODE
01 NAME	02 D+S NUMBER	01 NAME	02 D+S NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE 07 ZIP CODE	05 CITY	06 STATE 07 ZIP CODE

V. SOURCES OF INFORMATION (Cite specific references, e.g., state files, contract analysis, records)

NYSDEC Region 5 File Information



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 10 - PAST RESPONSE ACTIVITIES

L IDENTIFICATION

01 STATE 02 SITE NUMBER
NY 558012

L PAST RESPONSE ACTIVITIES

01 ☐ A. WATER SUPPLY CLOSED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ B. TEMPORARY WATER SUPPLY PROVIDED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ C. PERMANENT WATER SUPPLY PROVIDED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☒ D. SPILLED MATERIAL REMOVED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

Removal of 50 cubic yards of soil and waste

7/6/83

NYSDEC and GE

01 ☒ E. CONTAMINATED SOIL REMOVED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

50 cubic yards removed

7/6/83

NYSDEC and GE

01 ☐ F. WASTE REPACKAGED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☒ G. WASTE DISPOSED ELSEWHERE
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

SCA Chemical Service, Model City, New York 14107

7/6/83

01 ☐ H. ON SITE BURIAL
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ I. IN SITU CHEMICAL TREATMENT
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ J. IN SITU BIOLOGICAL TREATMENT
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ K. IN SITU PHYSICAL TREATMENT
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ L. ENCAPSULATION
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ M. EMERGENCY WASTE TREATMENT
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ N. CUTOFF WALLS
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ O. EMERGENCY DIKING/SURFACE WATER DIVERSION
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ P. CUTOFF TRENCHES/SUMP
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ Q. SUBSURFACE CUTOFF WALL
04 DESCRIPTION

02 DATE _____

03 AGENCY _____



POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 10 - PAST RESPONSE ACTIVITIES

I. IDENTIFICATION
01 STATE 02 SITE NUMBER
NY 558012

II. PAST RESPONSE ACTIVITIES (Continued)

01 ☐ R. BARRIER WALLS CONSTRUCTED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ S. CAPPING/COVERING
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ T. BULK TANKAGE REPAIRED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ U. GROUT CURTAIN CONSTRUCTED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ V. BOTTOM SEALED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ W. GAS CONTROL
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ X. FIRE CONTROL
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ Y. LEACHATE TREATMENT
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ Z. AREA EVACUATED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ 1. ACCESS TO SITE RESTRICTED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☐ 2. POPULATION RELOCATED
04 DESCRIPTION

02 DATE _____

03 AGENCY _____

01 ☒ 3. OTHER REMEDIAL ACTIVITIES
04 DESCRIPTION

02 DATE 7/6/83

03 AGENCY NYSDEC and GE

Twenty-seven barrels of oil waste removed

III. SOURCES OF INFORMATION (Cite specific references, e.g., state files, aerial photos, reports)



**POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 11 - ENFORCEMENT INFORMATION**

L IDENTIFICATION

01 STATE	02 SITE NUMBER
NY	558012

II. ENFORCEMENT INFORMATION

01 PAST REGULATORY/ENFORCEMENT ACTION ☐ YES ☐ NO

02 DESCRIPTION OF FEDERAL, STATE, LOCAL REGULATORY/ENFORCEMENT ACTION

III. SOURCES OF INFORMATION (Cite specific references, e.g., state files, agency analyses, reports)

**6.0 ASSESSMENT OF DATA ADEQUACY
AND RECOMMENDATIONS**

6.0 ASSESSMENT OF DATA ADEQUACY AND RECOMMENDATIONS

6.1 GROUNDWATER ROUTE

Site-specific information is not available to assess the potential for groundwater contamination at the Doetsch residence. The removal of waste and contaminated soil from the site, combined with the extensive clay deposits present, may have precluded contamination of groundwater. However, the horizontal extent of the clay deposits remain undefined and require further definition to fully assess potential groundwater impacts.

The groundwater route migration score (Sgw) is 23.07.

6.2 SURFACE WATER ROUTE

A preliminary surface water migration score (Ssw) of 6.38 has been calculated for the Doetsch residence. The low route score is impacted largely by the undefined uses of surface water in the vicinity of the site.

6.3 AIR ROUTE

No measurable readings of organic vapors were detected with the HNU Photoionizer during the site inspection. To score an air release, qualitative sampling is required along with details on the sampling protocol and the meteorological conditions during the sampling event. Additional monitoring should be performed during the Phase II investigation to check for possible contamination resulting from disturbance of the ground by subsurface drilling and also as a standard safety measure for personnel involved in the investigation.

6.4 FIRE AND EXPLOSION

To score the fire and explosion hazard mode either a state or local fire marshall must have certified that the facility presents a significant fire or explosion threat to the public or to a sensitive environment, or there must be a demonstrated threat based on field observations (e.g. combustible gas indicator readings). The available records give no indication that either one of these tasks has been done. Further, the available data do not suggest any

imminent threat of fire and explosion at this site. Therefore the route score cannot be completed.

6.5 DIRECT CONTACT

No incidents due to direct contact have occurred at the Doetsch site. Removal of the oil waste and contaminated soil may have eliminated the potential for direct contact and human injury due to exposure. The direct contact score is $S_{DC} = 12.50$.

7.0 RECOMMENDATIONS

7.0 RECOMMENDATIONS

Due to the remediation efforts which have already occurred at the Doetsch residence, a large scale Phase II effort may not be warranted. Documentation of waste and route migration characteristics appears to be fairly adequate for development of an HRS score.

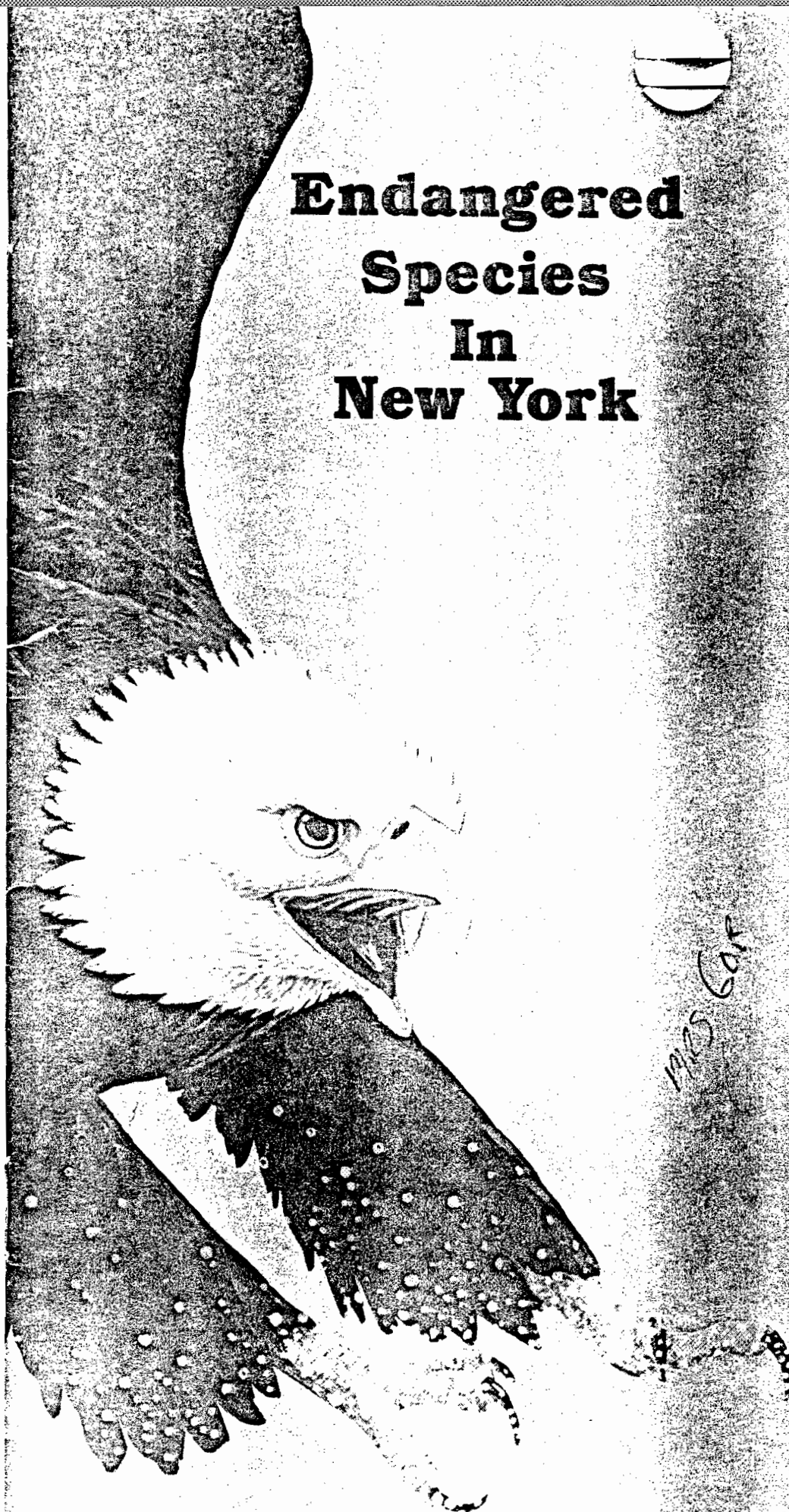
Alternative actions to the Phase II investigation should include a soil sampling and analysis plan to verify that the site has been properly remediated. The plan should encompass both surficial soil samplings and soil borings to determine if horizontal and vertical contamination still exists. The analysis should be limited to those compounds found during the drum sampling (PCBs and PCP). Monitoring well installation is not recommended unless sufficient evidence of contamination is uncovered during the soil boring analysis.

Groundwater sampling from the well serving the Doetsch residence which is believed to be downgradient is also recommended. Positive identification of PCBs in this well will facilitate the need to establish upgradient monitoring stations. At this time, the costly establishment of upgradient wells is not warranted.

During the progression of the recommended work, the presence of substantial contamination may warrant additional investigation.

APPENDIX

**Endangered
Species
In
New York**



1925 GAR

**New York State
Department of Environmental Conservation**

Wildlife Listed Under the New York State Environmental Conservation Law as:

ENDANGERED SPECIES

Mollusk

**Chittenango Ovate

Amber Snail

Succinea chittenangoensis

Insect

Karner Blue Butterfly

Lycaeides melissa

Fish

*Shortnose Sturgeon

Acipenser brevirostrum

*Longjaw Cisco

Coregonus alpenae

Round Whitefish

Prosopium cylindraceum

Pugnose Shiner

Notropis anogenus

Eastern Sand Darter

Ammocrypta pellucida

Bluebreast Darter

Etheostoma camurum

Gilt Darter

Percina evides

*Blue Pike

Stizostedion vitreum glaucum

Spoonhead Sculpin

Cottus ricei

Deepwater Sculpin

Myoxocephalus thompsoni

Amphibian

Tiger Salamander

Ambystoma tigrinum

Reptiles

Bog Turtle

Clemmys muhlenbergi

*Leatherback Sea Turtle

Dermochelys coriacea

*Hawksbill Sea Turtle

Eretmochelys imbricata

*Atlantic Ridley Sea Turtle

Lepidochelys kempii

Massasauga Rattlesnake

Sistrurus catenatus

Birds

Golden Eagle

Aquila chrysaetos

*Bald Eagle

Haliaeetus leucocephalus

*Peregrine Falcon

Falco peregrinus

*Eskimo Curlew

Numenius borealis

Least Tern

Sterna albifrons

Roseate Tern

Sterna dougallii

Loggerhead Shrike

Lanius ludovicianus

Mammals

*Indiana Bat

Myotis sodalis

*Sperm Whale

Physeter catodon

*Sei Whale

Balaenoptera borealis

*Blue Whale

Balaenoptera musculus

*Finback Whale

Balaenoptera physalus

*Humpback Whale

Megaptera novaeangliae

*Right Whale

Balaena glacialis

*Gray Wolf

Canis lupus

*Cougar

Felis concolor

* indicates that the species is currently listed as "endangered" by the U.S. Department of the Interior.

THREATENED SPECIES

Fish

Lake Sturgeon	<i>Acipenser fulvescens</i>
Mooneye	<i>Hiodon tergisus</i>
Lake Chubsucker	<i>Erimyzon sucetta</i>
Mud Sunfish	<i>Acantharchus pomotis</i>
Longear Sunfish	<i>Lepomis megalotis</i>

Amphibian

Cricket Frog	<i>Acris crepitans</i>
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Reptiles

Mud Turtle	<i>Kinosternon subrubrum</i>
Blanding's Turtle	<i>Emydoidea blandingi</i>
**Loggerhead Sea Turtle	<i>Caretta caretta</i>
**Green Sea Turtle	<i>Chelonia mydas</i>
Timber Rattlesnake	<i>Crotalus horridus</i>

Birds

Osprey	<i>Pandion haliaetus</i>
Red-shouldered Hawk	<i>Buteo lineatus</i>
Northern Harrier	<i>Circus cyaneus</i>
Spruce Grouse	<i>Dendragapus canadensis</i>
Piping Plover	<i>Charadrius melodus</i>
Common Tern	<i>Sterna hirundo</i>

Mammal

Eastern Woodrat	<i>Neotoma floridana</i>
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SPECIAL CONCERN SPECIES

Fish

Silver Chub	<i>Hybopsis storeriana</i>
Gravel Chub	<i>Hybopsis x-punctata</i>
Blackchin Shiner	<i>Notropis heterodon</i>
Black Redhorse	<i>Moxostoma duquesnei</i>
Longhead Darter	<i>Percina macrocephala</i>

Amphibians

Southern Leopard Frog	<i>Rana sphenoccephala</i>
Hellbender	<i>Cryptobranchus alleganiensis</i>
Jefferson Salamander	<i>Ambystoma jeffersonianum</i>
Blue-spotted Salamander	<i>Ambystoma laterale</i>
Spotted Salamander	<i>Ambystoma maculatum</i>

Reptiles

Spotted Turtle	<i>Clemmys guttata</i>
Wood Turtle	<i>Clemmys insculpta</i>
Diamondback Terrapin	<i>Malaclemys terrapin</i>
Worm Snake	<i>Carphophis amoenus</i>
Eastern Hognose Snake	<i>Heterodon platyrhinos</i>

Birds

Common Loon	<i>Gavia immer</i>
Least Bittern	<i>Ixobrychus exilis</i>
Cooper's Hawk	<i>Accipiter cooperii</i>
Black Rail	<i>Laterallus jamaicensis</i>
Upland Sandpiper	<i>Bartramia longicauda</i>
Black Tern	<i>Chlidonias niger</i>
Common Barn-Owl	<i>Tyto alba</i>
Short-eared Owl	<i>Asio flammeus</i>
Common Nighthawk	<i>Chordeiles minor</i>
Common Raven	<i>Corvus corax</i>
Sedge Wren	<i>Cistothorus platensis</i>
Eastern Bluebird	<i>Sialia sialis</i>
Henslow's Sparrow	<i>Ammodramus henslowii</i>
Grasshopper Sparrow	<i>Ammodramus savannarum</i>
Vesper Sparrow	<i>Poocetes gramineus</i>

Mammals

Small-footed Bat	<i>Myotis leibii</i>
New England Cottontail	<i>Sylvilagus transitionalis</i>
Harbor Porpoise	<i>Phocoena phocoena</i>

NEW YORK STATE REGISTRY FORMS

HAZARDOUS WASTE DISPOSAL SITES REPORT
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

47-15-11(2/80)

Code: 4
 Site Code: 558012
 Name of Site: Doetsch Residence Region: 5
 County: Washington Town/City: Argyle
 Street Address: Route 40

Status of Site Narrative:

Twenty-seven barrels of oil containing low to very high concentrations of PCB were stored at the site from 1963 to 1983. Several barrels leaked an estimated 100 gallons of oil. Remedial action in 1983 removed the drums and 50 cubic yards of soil. The area was backfilled with bankrun. Some contaminated soil is reportedly still on site.

Type of Site: Open Dump ☐ Treatment Pond(s) ☐ Number of Ponds _____
 Landfill ☐ Lagoon(s) ☐ Number of Lagoons _____
 Structure ☐

Estimated Size 1 Acres

Hazardous Wastes Disposed? Confirmed ☒ Suspected ☐

***Type and Quantity of Hazardous Wastes:**

TYPE	QUANTITY (Pounds, drums, tons, gallons)
PCB contaminated oil	27 barrels.

* Use additional sheets if more space is needed.

Name of Current Owner of Site: Mr. Frances Doetsch

Address of Current Owner of Site: Route 40 Road #2, Argyle, NY 12809

Time Period Site Was Used for Hazardous Waste Disposal:

_____ , 19 63 To _____ , 1983

Is site Active ☐ Inactive ☒

(Site is inactive if hazardous wastes were disposed of at this site and site was closed prior to August 25, 1979)

Types of Samples: Air ☐ Groundwater ☐ None ☐
Surface Water ☐ Soil ☐

Remedial Action:	Proposed	<input type="checkbox"/>	Under Design	<input type="checkbox"/>
	In Progress	<input type="checkbox"/>	Completed	<input checked="" type="checkbox"/>

Nature of Action:

Status of Legal Action: _____ State ☐ Federal ☐

Permits Issued: Federal ☐ Local Government ☐ SPDES ☐
Solid Waste ☐ Mined Land ☐ Wetlands ☐ Other ☐

Assessment of Environmental Problems:

Some additional contaminated soil is reportedly still at the site. However, no sampling has been performed to access the extent of contamination. Clay soil may be providing some environmental protection by limiting the extent of migration.

Assessment of Health Problems:

Groundwater is used for drinking purposes within 300 feet of the old storage area. No groundwater sampling has occurred. Migration potential presently undetermined.

Persons Completing this Form:

David B. Tompkins

Wehran Engineering

New York State Department of Environmental
Conservation

New York State Department of Health

Date July 23, 1986