Appendix L Corrective Action Summary

General Information:

The University of Vermont and State Agricultural College (UVM) Environmental Safety Facility (UVM ESF), EPA ID# VTD000636563, is an active, permitted hazardous waste treatment and storage facility and therefore subject to RCRA Corrective Action.

Current Milestone Determination:

CA900NC- Corrective Action Performance Standards Attained –No Controls Necessary. This milestone indicates remedies selected for the protection of human health and the environment standard have been fully implemented and associated performance standards have been attained at the entire facility or specific areas within the facility and no controls are necessary.

Date of Milestone Determination: September 17, 2021

Historic Information:

A baseline hydrogeologic investigation was performed in 1990 prior to construction of the ESF and groundwater monitoring wells were installed. Groundwater sampling results from September 1994 showed low levels of Volatile Organic Compounds (VOCs) and lead, which prompted a request for further monitoring by the Vermont Department of Environmental Conservation (VTDEC) Sites Management Section (SMS). Groundwater monitoring occurred in June 1995 through September 1996. Following the September 1996 sampling event, the following was determined by the VTDEC SMS:

- Contaminant concentrations detected in the groundwater beneath and in the vicinity of the site are below the applicable Vermont Groundwater Enforcement Standards (VGES) and Vermont Health Advisory Level (VHAL) and do not pose a significant threat to human health and the environment.
- No quantifiable impact or risk to receptors has been identified from the contamination detected onsite. The closest identified receptor would be the UVM's animal facility/barn located 150' to the east of the site.
- The ESF is not required to perform additional environmental work in response to the groundwater contamination detected in 1994.

On February 11, 1997, the VTDEC SMS issued a letter indicating that Sites Management Activity completed letter (Attachment L-1). Additionally, up until 2014, groundwater sampling for VOCs continued to be conducted as part of a class project at UVM (Attachment L-2). Subsequent groundwater sampling events showed no detections of VOCs at the three wells sampled.

Attachment L-1 Site Management Activity Completed Letter



State of Vermont

Department of Fish and Wildfile
Department of Forests, Parks and Recreation
Department of Environmental Conservation
State Geologist
RELAY SERVICE FOR THE HEARING IMPAIRED
1-800-253-0191 TDD>Voice
1-800-253-0195 Voice>TDD

AGENCY OF NATURAL RESOURCES
Department of Environmental Conservation
Waste Management Division
103 South Main Street / West Building
Waterbury, Vermont 05671-0404
802-241-3888
Fax 802-241-3296

February 11, 1997

MILLY ARCHER, HAZARDOUS WASTE MANAGER RISK MANAGEMENT DEPARTMENT UNIVERSITY OF VERMONT PO BOX 50570 BURLINGTON VT 05405-0570

RE: Sites Management Activity Completed at the UVM-Environmental Safety Facility / SMS Site #95-1786

Dear Ms. Archer:

The Sites Management Section (SMS) has received the results of the annual groundwater monitoring at the UVM Environmental Safety Facility located in Burlington, Vermont. The most recent round of groundwater samples was collected on September 23, 1996, by Hoffer & Associates, and analyzed for the presence of volatile organic compounds using EPA Method 8260. The compound dichlorodifluoromethane was detected in the groundwater, but at a concentration below regulatory standards. Based on the results of the ongoing monitoring at this site, the SMS has concluded the following:

- ➤ Contaminant concentrations detected in the groundwater beneath and in the vicinity of the site do not pose a significant threat to human health and the environment;
- No quantifiable impact or risk to receptors has been identified from the contamination detected onsite;

As a result of the above, the SMS has determined that site management activities have been completed. However, the completion of these activities does not release UVM from any past or future liability which may arise from the contamination detected at this site. It does mean that the SMS is not requiring any additional environmental work be performed at this site in response to the groundwater contamination detected in 1994.

The SMS appreciates UVM's cooperation in conducting the necessary investigation at this site. If you have any questions, then please feel free to contact Linda Elliott at 241-3897 or myself at 241-3491.

Sincerely.

George Desch, P.E., Chief Sites Management Section

c: Gary Urich, WMD

Jefferson Hoffer
Ruth Stokes, Burlington City Clerk
DEC Regional Office

GD:le/wp51/sites/1786smac.1296

Attachment L-2 Groundwater Summary of VOCs



The University of Vermont - Environmental Safety Facility (ESF) Groundwater Summary of VOCs*

Well #P2-S (ug/L)

Date	dichlorodifluoromethane	chloromethane	vinyl chloride	chloroethane	acetone
9/30/94	1.30	<1	<1	<1	<1
6/22/95	trace	<1	<1	<1	<1
9/18/95	<1	<1	<1	<1	<10
9/23/96	2.00	<1	<1	<1	<10
9/19/97	0.80	<1	<1	<1	<10
10/1/98	2.40	<1	<1	<1	<10
9/27/99	<1	<1	<1	<1	<10
10/20/00	<1	<10	<2	<5	NA
10/10/02	<2	<10	<2	<5	<20
11/5/03	<2	<3	<2	<5	<10
11/3/06	1.70	<3	<2	<5	<10
11/19/09	<2	<3	<2	<5	<10
12/3/12	<5	<5	<5	<2	**
11/5/13	<5	<3	<2	<5	<10
9/30/14	<5	<3	<2	<5	<10

Well #P3-S (ug/L)

11 cm m 0 0 (46/ -)								
Date	dichlorodifluoromethane	chloromethane	vinyl chloride	chloroethane	acetone			
9/30/94	26.00	18.00	1.10	<1	<1			
6/22/95	<1	6.50	<1	<1	<1			
6/22/95	<1/<1	5.9/6.4	1.1/1.1	1.4/<1	19/<1			
9/18/95	<1/<1	1.1/1.1	<1	<1	<10			
9/23/96	2.00	<1	<1	<1	<10			
9/19/97	2.70	<1	<1	<1	<10			
10/1/98	1.60	<1	<1	<1	<10			
9/27/99	0.80	<1	<1	<1	<10			
10/20/00	<1	<10	<2	<5	NA			
10/10/02	<2	<10	<2	<5	<20			
11/5/03	<2	<3	<2	<5	<10			
11/3/06	<1	<3	<2	<5	<10			
11/19/09	<2.0	<3.0	<2.0	<5.0	<10			
12/3/12	<5	<5	<5	<2	**			
11/5/13	<5.0	<3.0	<2.0	<5.0	<10			
9/30/14	<5.0	<3.0	<2.0	<5.0	<10			

Well #P5-S (ug/L)

Date	dichlorod if luoromethane	chloromethane	vinyl chloride	chloroethane	acetone				
9/30/94	26.00	18.00	1.10	<1	<1				
11/3/95	12.00	<1	0.97	<1	<1				
6/22/95	<1	30.00	5.10	14.00	<1				
9/18/95	<1	5.50	<1	<1	<10				
9/23/96	12 / 12	<1	<1	<1	<10				
9/19/97	8.2 / 8.3	<1	<1	<1	<10				
10/1/98	6.40	<1	<1	<1	<10				
9/27/99	3.00	<1	<1	<1	<10				
10/20/00	<1	<10	<2	<5	NA				
10/10/02	<2	<10	<2	<5	<20				
11/5/03	<2	<3	<2	<5	<10				
11/3/06	<1	<3	<2	<5	<10				
11/19/09	<2	<3	<2	<5	<10				
12/3/12	<5	<5	<5	<2	**				
11/5/13	<5	<3	<2	<5	12.00				
9/30/14	<5	<3	<2	<5	<10				

*Based on data reported in ESF 2014 Groundwater monitoring report. Sampling last conducted by ENVS 160 class on 9/30/2014.