



**CAPE ROMANZOF LRRS  
ALASKA**

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**ADMINISTRATIVE RECORD  
COVER SHEET**

AR File Number 117



**611TH AIR SUPPORT GROUP  
611TH CIVIL ENGINEER  
SQUADRON  
ELMENDORF AFB, ALASKA**

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**CAPE ROMANZOF LONG RANGE RADAR SITE  
CAPE ROMANZOF, ALASKA  
INSTALLATION RESTORATION PROGRAM**

**RECORD OF DECISION FOR  
INTERIM REMEDIAL ACTION**

**Sites: Spill Site SS013, Spill Site SS015 and  
Landfill Site LF003**

**MARCH 2002**

**RECORD OF DECISION  
FOR  
INTERIM REMEDIAL ACTION**

**SPILL SITE SS013, SPILL SITE SS015 and LANDFILL SITE LF003  
CAPE ROMANZOF LONG RANGE RADAR SITE  
CAPE ROMANZOF, ALASKA**

**DECLARATION,  
DECISION SUMMARY,  
AND  
RESPONSIVENESS SUMMARY**

Prepared By:

United States Air Force  
611th Civil Engineer Squadron  
10471 20th Street, Suite 338  
Elmendorf AFB AK 99506-2270

## **TECHNICAL DOCUMENT TO SUPPORT INSTALLATION RESTORATION DECISION**

### **DECLARATION**

#### **SITE NAME AND LOCATION**

Installation Restoration Program (IRP) Sites Spill Site SS013, Spill Site SS015 and Landfill Site LF003, are located at Cape Romanzof Long Range Radar Site (LRRS), Alaska.

#### **STATEMENT OF BASIS**

This decision is based on information contained in the Administrative Record, including but not limited to the results of an IRP Records Search, Site Investigations, a Remedial Investigation/Feasibility Study (RI/FS) (1992 and 1997) which resulted in subsequent groundwater sampling events (1997, 1999, and 2000) at sites SS013 and SS015. Numerous studies have been conducted at LF03 to characterize the nature and extent of contamination. Samples of soil, groundwater, surface water and sediment have been collected frequently since 1989. These samples have been analyzed for Total Petroleum Hydrocarbons (TPH), Diesel Range Hydrocarbons (DRO), Gasoline Range Hydrocarbons (GRO), Volatile Organic Compounds (VOCs), Semi-Volatile Organic Compounds (SVOCs), Poly-Chlorinated Biphenyls (PCBs), benzene toluene ethylbenzene and xylene (BTEX), pesticides and metals.

This Interim Record of Decision (ROD) presents the selected interim remedial action for Spill Sites SS013, SS015 and Landfill Site LF003. The Air Force has funded a contaminant migration and subsistence foods pathway study to be conducted in 2002 and 2003 to further evaluate risks at Cape Romanzof LRRS. With the results of this study and the results of additional monitoring, the effectiveness of the interim remedial actions will be evaluated over five years and the sites will be addressed in a Final ROD at a later date. This document has been developed in accordance with the Defense Environmental Restoration Program, 10 *United States Code* (USC) 2701, consistent with Alaska Department of Environmental Conservation (ADEC) Oil and Hazardous Substances Pollution Control Regulations [18 Alaska Administrative Code (AAC) 75], the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), 42 USC 9601 and Executive Order 12580 (52 *Federal Register* 2923), and with the National Oil and Hazardous Substances Pollution Contingency Plan [40 *Code of Federal Regulations* (CFR) 300].

#### **ASSESSMENT OF SITES**

Historical spills and operational practices at Spill sites SS013, SS015 and Landfill Site LF003 have led to contamination of the water table with petroleum-based products, specifically gasoline range hydrocarbons (GRO), diesel range organics (DRO) and residual range organics (RRO) above State of Alaska cleanup levels in groundwater. DRO and RRO were found in soil and sediments in excess of State of Alaska cleanup levels. PCBs were found in the soil and sediments at LF03 in excess of State of Alaska cleanup levels.

Based on current site conditions at Sites SS013, SS015 and LF003, threatened or actual releases of hazardous substances including GRO, DRO, RRO, Benzene and PCBs from these sites, if not addressed by implementing the response actions selected in this Interim ROD, could present an imminent or substantial threat to public health, welfare, or the environment.

### DESCRIPTION OF THE SELECTED REMEDY

The selected interim remedy for sites SS013 and SS015 addresses the risk to human health and the environment caused by hypothetical exposure to petroleum products in groundwater, soil, and sediment. The selected interim remedy includes the following components:

**Monitored Natural Attenuation** is the selected remedy for soil, sediment, groundwater and surface water at SS13 and SS15. This alternative will effectively reduce risk to human health and the environment utilizing all natural technologies. The elements of the selected remedy include implementation of **institutional controls** restricting access, sampling of soil, sediment, and surface water, and long-term groundwater monitoring. Additionally, since this alternative will result in hazardous substances remaining onsite above levels that would otherwise allow for unlimited use and unrestricted exposure, a five-year review will be necessary to ensure that the remedy continues to provide adequate protection of human health and the environment (Sect. 121 CERCLA).

**Landfill Closure combined with PCB Hotspot Removal** is the selected remedy for LF03. The main elements of the landfill closure portion of the alternative are capping and long-term monitoring of groundwater and any effluent generated by the landfill. Approximately .5 cubic yards of PCB contaminated sediment will be excavated and shipped to an approved PCB disposal facility. Additionally, since this will result in hazardous substances remaining onsite above levels that would otherwise allow for unlimited use and unrestricted exposure, a five-year review will be necessary to ensure that the remedy continues to provide adequate protection of human health and the environment (Sect. 121 CERCLA).

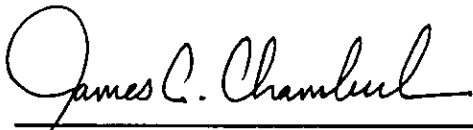
### INTERIM REMEDIAL ACTION OBJECTIVES

The interim remedial action objectives are to reduce exposure to the contaminants of concern and to work toward the cleanup levels to be adopted in the final Record of Decision for these sites. Listed in the chart below are the projected final cleanup levels based upon the current state regulations and studies conducted to date.

Media	Contaminants of Concern	Site	Maximum Conc. Location (Date)	Maximum Conc. 1997/99/00 data	Basis	Projected Cleanup Level
Groundwater (mg/L)	GRO	SS015	WW02 (1997)	7.95	18 AAC 75 Table C	1.3
	DRO	SS015	WW02 (1997)	400	18 AAC 75 Table C	1.5
	RRO	SS015	WW02 (1997)	1.38	18 AAC 75 Table C	1.1
	Benzene	SS015	WW02 (1997)	1.11	18 AAC 75 Table C	0.005
Surface Water (mg/L)	PCB	LF003	SD/SW-2 (1997)	0.046	18 AAC 70	0.0005
Sediment (mg/kg)	DRO	SS013	SS-01 (1999)	55,800	18 AAC 75 341	250
	PCB	LF003	SD/SW-2 (2000)	250J	18 AAC 75 341	10
Near-Surface Soil (mg/kg)	DRO	SS013	LB-08 (1997)	110,000	18 AAC 75 341	250
	RRO	SS013	LB-08	35,000	18 AAC 75 341	10,000

**STATUTORY DETERMINATIONS**

This interim action is protective of human health and the environment in the short term, and is intended to provide adequate protection until a final action ROD is signed. The interim action is cost-effective and complies with all applicable or relevant and appropriate federal and state requirements. Because this remedy will result in hazardous substances remaining on-site above state of Alaska cleanup levels, it will be reviewed by USAF and ADEC at a frequency of not less than once every five years after implementation of the selected remedy to evaluate if the remedy continues to be effective and appropriate. Input from the Tribal Councils of Chevak, Scammon Bay, Paimiut and Hooper Bay, Federal and State trustees, and the Cape Romanzof Restoration Advisory Board (RAB) will be solicited prior to implementing any fundamental changes in the remedy.



James C. Chamberlain, Colonel, USAF  
Commander, 611<sup>th</sup> Air Support Group  
United States Air Force

31 July 02  
Date



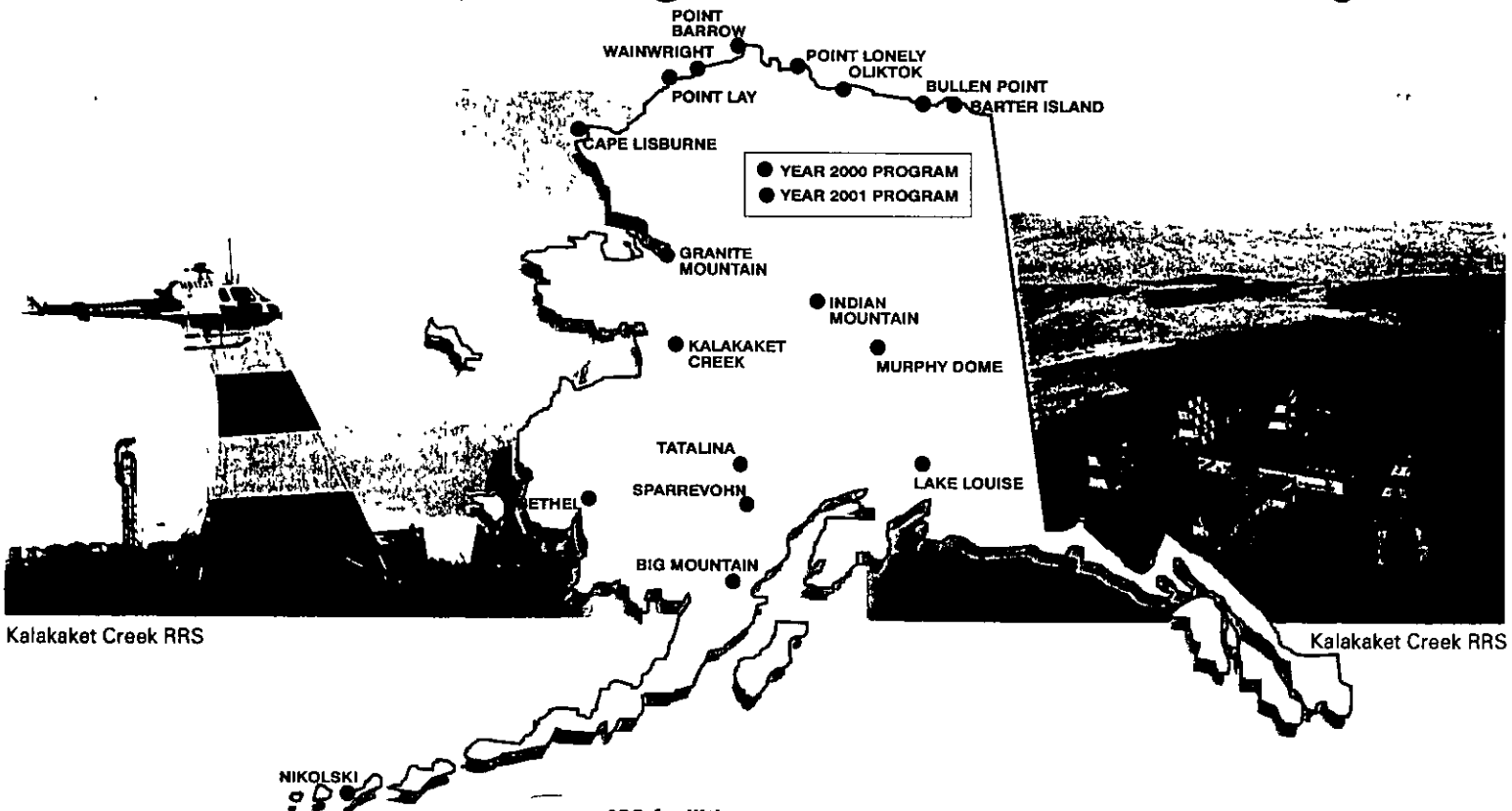
Jennifer Roberts  
Section Manager  
DoD Oversight  
Division of Spill Prevention and Response  
Alaska Department of Environmental Conservation

July 14 2002  
Date



# Clean Sweep

## Environmental Surveys Supporting BD/DR Demolition



### Materials quantified in Clean Sweep Surveys:

- 402 facilities
- 45.7 million pounds of construction and demolition debris
- 7.1 million pounds of recyclable metal
- 359,318 pounds of regulated asbestos-containing materials (RACM)
- 884,090 pounds of PCB remediation waste
- More than 6.3 million pounds of concrete

Clean Sweep Environmental Surveys were conducted in 2000 and 2001 at 18 remote radar installations throughout Alaska in order to:

- Evaluate and plan demolition logistics
- Quantify regulated wastes that affect demolition
- Accurately scope demolition
- Scope permitting and planning effort
- Estimate demolition costs

A Strategic Plan was prepared to guide the environmental surveys conducted at 18 installations that contains:

- A regulatory summary covering state and federal regulations
- Assumptions and procedures to be used for the surveys and ultimately for demolition
- Guidelines related to handling, transporting, and disposing Clean Sweep wastes, as well as relevant worker safety

Benefits of Clean Sweep Environmental Surveys:

- Consistency between installations
- Improved quality control
- Better cost control
- Minimize demolition change orders
- More efficient completion of Clean Sweep demolition

**Logistical Scenario**

Contains a detailed description of logistics for conducting the planned demolition. Key elements include method, transportation, and timing of mobilization/demobilization(s), housing, equipment availability, planned disposal or recycling for all waste streams, and all other demolition related logistics.



Yukon River at Galena

**Permitting Assessment**

Presents a detailed assessment of expected permitting needs for Clean Sweep demolition. Where an on-site landfill is envisioned, siting and borrow requirements are identified and conceptual landfill design included.

**Structure and Tank Inventories**

Inventories and quantifies structures and facilities slated for demolition, including tanks and tank foundations suspected of containing petroleum products.



Cape Lisburne LRRS

**Detailed Estimates of Probable Cost**

Presents detailed estimate of probable cost for each installation based on logistical scenario, identified quantities of materials, waste streams, and disposal options. Cost escalation factors were utilized to reflect anticipated rates of inflation.

**Clean Sweep  
Environmental  
Survey Reports**

**Highly detailed reports for each installation summarize materials included in the scope of demolition, describe the anticipated logistical scenario for demolition, and present thorough estimates and schedules for demolition**

**PCBs**

Presents identification and analysis of PCB wastes identified at installations. A range of PCBs were typically encountered, including: waste resulting from spills (remediation waste), products containing PCBs, PCB containing sludge, and construction materials containing PCBs (bulk product waste).

Big Mountain RRS



Cape Lisburne LRRS



**Types of Samples Collected:**

- Asbestos
- Materials at potential pcb spill locations
- Building composite samples for leachable lead
- Tank contents

**Asbestos Survey**

Quantifies regulated and non-regulated asbestos-containing materials (RACM and ACM), and summarizes abatement and disposal plans

**Demolition Schedule, Personnel, and Equipment Requirements**

A schedule for conducting the anticipated demolition is included, along with lists of personnel and equipment needs.

**Regulated Wastes and Commercial Chemical Products**

Inventories products, fixtures, and other wastes remaining at each installation. This includes items such as batteries, PCB-containing light ballasts, radioactive materials, containerized gases, and leftover fuels in tanks, vehicles, and pipelines. Summarizes packaging, transportation, and disposal of materials in accordance with relevant regulations. Available MSDS sheets are included in report.



**FINAL PAGE**

**ADMINISTRATIVE RECORD**

**FINAL PAGE**