



# **TATALINA LRRS ALASKA**

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## **ADMINISTRATIVE RECORD COVER SHEET**

AR File Number 52

# TECHNICAL DOCUMENT TO SUPPORT INSTALLATION RESTORATION DECISION

## PART I

### DECLARATION

#### SITE NAME AND LOCATION

Installation Restoration Program Site SS-009, which includes the former Truck Fill Stand, at Tatalina Long Range Radar Station (LRRS), Alaska.

#### STATEMENT OF BASIS

This decision is based on information contained in the Administrative Record, including but not limited to the results of Installation Restoration Program (IRP) Records Search, Technical Support Document for Record of Decision, Preliminary Assessment, Site Inspection study, and a Remedial Investigation (RI) completed in 1997 at the Tatalina LRRS, Alaska, with reports dated 1985, 1988, 1991, 1993, and 1998, respectively.

This Decision Document (DD) presents the selected remedial actions for the above listed site. This DD has been developed in accordance with the Defense Environmental Restoration Program, 10 *United States Code* (USC) 2701, consistent with the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), 42 USC 9601 and Executive Order 12580 (52 *Federal Register* 2923), and to the extent practicable with the National Oil and Hazardous Substances Pollution Contingency Plan (40 *Code of Federal Regulations* 300).

#### ASSESSMENT OF THE SITE

The IRP Site SS-009 Lower Camp structures, were demolished in the mid-1980s. Some of the demolition debris was removed from the site area and some of the debris was disposed within the site area. The estimated depth of cover is approximately 5 to 15 feet.

On the basis of the 1997 RI and risk assessments conducted at IRP Site SS-009, there is no need for further remedial action. This determination is protective of human health and the environment and complies with Applicable or Relevant and Appropriate Requirements (ARARs) for the site. There are three soil samples with minor exceedences over the Method 2 Diesel Range Organics soil cleanup levels for migration to groundwater (323, 720, and 2500 mg/kg), and one soil sample with a minor exceedence over the Method 2 Gasoline Range Organics soil cleanup level for migration to groundwater (630 mg/kg). However, based on the site history, the limited extent of contamination, the contaminant concentrations that are unlikely to adversely affect groundwater quality, the upgradient location of the samples from IRP Site SS-008 which is under further investigation, and since the site area will have institutional controls, no unacceptable risk or threat to public health or the environment exists. Location BH-8 was addressed in the 1997 Remedial Investigation. This location is more appropriately addressed as part of IRP site SS-008. Additional subsurface investigation was conducted at BH-8 and SS-008 in 1999, and potential remedial actions will be addressed under IRP SS-008.

## DESCRIPTION OF THE SELECTED REMEDY

Based upon investigations conducted at IRP Site SS-009 to date, there is presently no unacceptable risk or threat to public health or the environment. Therefore, the selected remedy for IRP Site SS-009 is no further action under CERCLA. Institutional control in the form of notice in land records will be developed by the Air Force, with ADEC concurrence, for waste left in place and within a base master plan. The State of Alaska supports and concurs with the selected remedy of no further action.

Visual inspections of cover material will be conducted and documented over a 5 year period (the first, third, and fifth years) to check that healthy vegetation exists and no erosion of the cover is occurring. After the last inspection, a 5-year review will be conducted to review the results of the inspections. If the cover material has remained in good condition, no further inspections will be required.

Due to the close proximity and similar historical activities of IRP Sites SS-007 and SS-009, the maintenance and inspection program for IRP Site SS-007 has been incorporated into the maintenance and inspection program for IRP Site SS-009.

## DECLARATION AND STATUTORY DETERMINATIONS

The selected remedy is protective of human health and the environment, complies with federal and state requirements that are legally applicable or relevant and appropriate, and is cost-effective. The statutory preference for treatment is not satisfied because treatment was not found to be necessary. Contaminant levels at the site have been determined to present no unacceptable threat to human health or the environment; thus, no treatment is necessary.

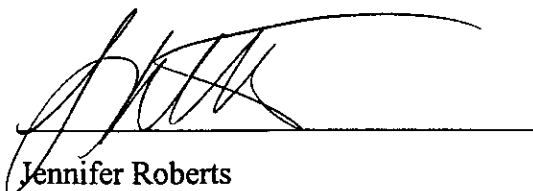
This decision may be reviewed and modified in the future if new information becomes available which indicates the presence of previously undiscovered contamination or exposure routes that may cause a risk to human health or the environment.



MICHAEL M. WYKA, Colonel, USAF  
Commander, 611th Air Support Group  
United States Air Force

17 Jan 01

Date



Jennifer Roberts  
Contaminated Sites Section Manager  
Alaska Department of Environmental Conservation

Nov 21 2000

Date

**PART II**  
**DECISION SUMMARY**  
**for**  
**SOURCE AREA SS-009**  
**(Truck Fill Stand)**  
**at**  
**TATALINA LONG RANGE RADAR STATION, ALASKA**  
**FEBRUARY 1999**

This Decision Summary provides an overview of the No Further Action determination for Source Area SS-009 at Tatalina Long Range Radar Station (LRRS), Alaska. This Decision Document presents the physical features of the site, the contaminants present, and the associated risks to human health and the environment. It also describes the rationale for a no further action determination and states how the determination satisfies requirements of the Defense Environmental Restoration Program, 10 *United States Code* (USC) 2701, consistent with the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), 42 USC 9601 and Executive Order 12580, and the National Oil and Hazardous Substances Pollution Contingency Plan.

The U.S. Air Force (USAF) completed a Remedial Investigation (RI) at SS-009 to provide information regarding the nature and extent of contamination in the soils. A baseline Human Health Risk Assessment and Ecological Risk Assessment were developed and used in conjunction with the RI to determine the need for remedial action. The RI and risk assessments were completed for Alaska Department of Environmental Conservation (ADEC) review and approval. On the basis of the results of the RI and risk assessments, it has been determined that no unacceptable risk or threat to public health or the environment exists. Therefore, there is no need for remedial action under CERCLA. Complete details regarding the remedial investigation and risk assessment methodology and results are included in the *Tatalina Long Range Radar Station Remedial Investigation Report* (October 1998).

## **1.0 SITE NAME, LOCATION, AND DESCRIPTION**

The Tatalina LRRS is in the upper Kuskokwim River area, 240 miles northwest of Anchorage. The nearest settlement is Takotna (population of 58), a community about 6 miles by road north of the Tatalina LRRS. The larger community of McGrath (population of 441) is about 20 air miles east. Figure 1 shows the location of the Tatalina LRRS and surrounding communities within southcentral interior Alaska. (Figures are provided at the end of Part II.)

The Tatalina LRRS is owned by the U.S. Government and is under the jurisdiction of the USAF. It is one of many communication installations owned by the USAF as part of a defense communication network and aircraft warning system across Alaska. It consists of 4,968 acres at the base of Takotna Mountain, on the eastern flank of the Kuskokwim Mountains. The Tatalina LRRS consists of four distinct areas: Upper Camp on Takotna Mountain, Lower Camp, Airstrip, and Sterling Landing. Figure 2 shows the general layout of the Tatalina LRRS.

The Tatalina LRRS was established in November 1952 as the Tatalina Air Force Station. It was one of the 10 original Aircraft Control and Warning systems in Alaska. In 1957, a White Alice Communications System (WACS) was established at Upper Camp and operated continuously from 1957 until 1979. In 1979, a satellite earth terminal owned by AT&T Alascom replaced communications at the Tatalina WACS, which was deactivated. Several additional system upgrades and personnel changes have occurred at the Tatalina LRRS. The most recent reduction in personnel occurred in 1985, when the Minimally Attended Radar (MAR) was activated. Currently, six people live onsite at the Tatalina LRRS at the Lower Camp to monitor and maintain the facilities. There are no current plans to change the land use status at the installation from USAF ownership. The land surrounding the installation is owned by several Native corporations. The Sterling-Ophir Highway, which extends from the community of Takotna to the Sterling Landing at the Kuskokwim River, runs through the installation. This road has a 100-foot right-of-way for private and public use.

Site SS-009 is the former Truck Fill Stand location on the eastern side of the large flat gravel pad along the former road east of the former garage. The former Lower Camp structures were built on this pad. Filling and grading of the pad was conducted in this area during the building removal activities. The location of Site SS-009 is shown in Figures 2 and 3.

## **2.0 SITE HISTORY AND ENFORCEMENT ACTIVITIES**

Studies and IRP activities have been previously conducted for SS-009 and are summarized in the following sections.

### **2.1 SITE HISTORY**

SS-009 (Truck Fill Stand) was used until the mid-1980s to supply fuel. A release of mogas from storage tanks at this location was reported in 1983 and routine spills during activities at the fill stand may also have occurred in the past. The spilled fuel may have migrated into some of the surface drainage systems. The truck fill stand was located on the eastern side of the large flat gravel pad along the former road east of the former garage. The former Lower Camp structures were built on this pad. These structures, along with the rest of the Lower Camp buildings, were demolished in the mid-1980s. Some of the demolition debris was removed from the site area and some of the debris was disposed within the site area. The pad

has been regraded, and is overgrown with alders. The estimated depth of cover is approximately 5 to 15 feet.

## **2.2 REGULATORY AND ENFORCEMENT HISTORY**

The former Truck Fill Stand was first identified as Installation Restoration Program source area 7 during a Phase I Records Search (1985). A Technical Support Document for Record of Decision in 1988 recommended no further action for the site. The Truck Fill Stand also was evaluated during a Preliminary Assessment in 1991. No evidence of contamination was observed, and no sampling was conducted at SS-009 during the 1992 Site Inspection.

## **2.3 COMMUNITY RELATIONS ACTIVITIES**

Past hazardous waste investigations and cleanup activities at the Tatalina LRRS have been documented in several USAF reports. These reports are listed and summarized in the *Tatalina Long Range Radar Station Remedial Investigation Report* (October 1998). An administrative record has been established at the USAF 611 Civil Engineering Squadron. A community relations program was initiated by the USAF for the Tatalina LRRS; the *Community Relations Plan* was produced (June 1997); and a community relations meeting was held in May 1997 in Takotna, Alaska, before the RI field investigation. The Proposed Plan was distributed for public review in February 1999. The public comment period was from February 18, 1999, to March 19, 1999. A community meeting in Takotna was held on February 18, 1999, to discuss the results of the RI and the Proposed Plan. Responses to all comments received on the Proposed Plan are presented in the Responsiveness Summary provided in Part III, and a copy of the administrative record index is provided in Appendix A.

## **3.0 SITE CONTAMINATION AND RISKS**

The 1997 RI was conducted to determine if contamination exists at the Tatalina LRRS that could pose a risk to the environment and public health. The following sections summarize the methodology for conducting the RI at SS-009 and the RI results.

### **3.1 REMEDIAL ACTION OBJECTIVES**

As part of the 1997 RI, remedial action objectives (RAOs) were developed for all source areas at the Tatalina LRRS. The RAOs were presented in the *Remedial Investigation/Feasibility Study Work Plan, Tatalina LRRS* (1997) and were developed along with preliminary applicable or relevant and appropriate requirements (ARARs), to-be-considered (TBC) criteria, and a conceptual site model. RAOs were established that were protective of human health and the environment and complied with ARARs as defined in current state and federal regulations. The information used to establish RAOs included site-specific data from the RI about contaminants detected in the baseline risk assessments, safety and logistical considerations for mobilizing to the remote site for additional investigation and remedial activities, and costs associated with further action relative to the benefit derived at a remote site. Additional consideration also was given to the length of time contaminants may have been present at the site and to the fact that most of the sources of the contamination, such as fuel storage tanks, were removed as early as the 1980s.

The baseline risk assessment included screening of contaminants for both human health and ecological risks. The screening levels used for the human health risk assessment represented

cancer risks of  $1 \times 10^{-5}$  for an individual chemical,  $5 \times 10^{-5}$  for all chemicals for an exposure route, and  $1 \times 10^{-4}$  for all chemicals across all exposure routes. Hazard indexes of 1.0 for individual chemicals and 10.0 cumulative per exposure pathway were used to screen non-carcinogens. In the ecological risk assessment, concentrations of detected chemicals were compared to critical toxicity values for representative species. Hazard quotients of less than or greater than 1 were calculated for toxicity and risk screening.

Chemical-specific ARARs and TBC criteria used for establishing RAOs included ADEC regulations for cleanup of hazardous substances (Title 18, Chapter 75, of the *Alaska Administrative Code* [AAC]), U.S. Environmental Protection Agency (EPA) spill cleanup policy for polychlorinated biphenyls (PCBs) (Title 40, Part 761.120-135, of the *Code of Federal Regulations*), and water quality standards (18 AAC 70; federal Clean Water Act) and risk management standards developed in the baseline human health and ecological risk assessment. In addition, draft hazardous substances cleanup regulations in 18 AAC 75 were used to estimate soil and groundwater cleanup levels for several organic and inorganic contaminants, including petroleum hydrocarbons. The promulgated regulations did not result in any changes to the RI results, conclusions, or recommendations. The draft regulations used during the RI were promulgated and became effective January 22, 1999. The Tatalina LRRS RI used Method 2 (Tables B1 and B2) of the 18 AAC 75 cleanup standards to propose maximum allowable petroleum hydrocarbon cleanup levels for sites at the Tatalina LRRS Upper Camp that have less than 40 inches of rainfall and a potential migration to groundwater exposure pathway. These standards are provided below.

Analyte	Cleanup Standard (soil)	Cleanup Standard (groundwater)
Gasoline-range organic compounds	300 mg/kg	1,300 µg/L
Diesel-range organic compounds	250 mg/kg	1,500 µg/L
Residual-range organic compounds	11,000 mg/kg	1,100 µg/L

µg/L = Micrograms per liter

mg/kg = Milligrams per kilogram

### 3.2 RI RESULTS

Six borings, two test pits, and one seep/sediment location were sampled to investigate the potential releases along the eastern side of the Lower Camp pad that may have resulted from SS-009. Because of the proximity of SS-009 to source area SS-008, the same sampling locations were used for both source areas. Results for SS-009 are presented here.

The six borings were installed at the eastern portion of the Lower Camp pad as presented in Figures 3 and 4. The two borings located downgradient of SS-009 (Borehole [BH] 2 and BH3) were completed as monitoring wells. These wells were sighted between another IRP

site, SS-008–Waste Accumulation Area (WAA) No. 4, and the creek east of the Lower Camp pad. Four additional borings (BH4, BH6, BH7, and BH8) were located along the eastern periphery of the Lower Camp area adjacent to support facilities. Because groundwater was not encountered in these borings, they were not completed as monitoring wells. These six borings are described below.

Borings downgradient of the Lower Camp pad, toward the creek:

- BH2/MW was located next to the installation's infiltration gallery. This boring was advanced 15 feet. A soil sample was collected at a depth of 10 feet in BH2/MW, where an elevated organic vapor monitor (OVM) reading was measured. Groundwater was encountered at 7.5 feet below ground surface (bgs) and a groundwater sample was collected from this well.
- BH3/MW was located along the creek. This boring was advanced 19 feet. Bedrock was reached at approximately 19 feet. Soil samples were collected at depths of 4 and 17 feet, at the perched water table and at the approximate top of the saturated zone, respectively. Groundwater was encountered at 11.5 feet bgs, and a groundwater sample was collected from this well.

Borings on the Lower Camp pad:

- BH4 was located near the southwestern side of the garage where waste drums were stored (IRP Site SS-008, WAA No. 4). This boring was advanced 17.4 feet. Drilling continued until auger-refusal depth (the probable top of bedrock) was reached. Soil samples were collected at the ground surface, 10 feet bgs and 17.4 feet bgs. Groundwater was not encountered before auger refusal at this boring or any of the other borings on the Lower Camp pad; therefore, this boring and the following three were not completed as monitoring wells.
- BH6 was located near the southwestern side of the power plant in an area where transformers were stored and fuel was disposed of (IRP Site SS-008, WAA No. 4). This boring was advanced 15 feet. The probable top of bedrock was at approximately 12 feet. Soil samples were collected at the ground surface, 6 to 8 feet bgs, and 17 feet bgs. Gravel fill materials was encountered to approximately 8-foot depth.
- BH7 was drilled adjacent to the area where fuel pumps were located. This boring was advanced 15 feet. The 17-foot depth was the probable top of deeply weathered bedrock. Samples were collected at ground surface, from 6 to 8 feet bgs, and from 15 to 17 feet bgs. Fill material was encountered from the surface to 10-foot depth. The auger also encountered concrete pieces, likely from building demolition activities in the past.
- BH8 was located adjacent to the edge of the pad where fuels were disposed. This boring was advanced 25 feet, including a minimum of 6 feet of fill material. The top of weathered bedrock began at 20 feet bgs. Samples were collected at the surface, from 6 to 8 feet bgs, and from 15 to 17 feet bgs. It is believed that fuels were disposed in the past at the edge of the pad. This area has since been regraded. Fill material was encountered to approximate 6-foot depth. This area will be addressed as part of IRP site SS-008 and will not be addressed further in this document.



Two test pits (TPs) also were dug near the location of the old truck fill stand. From TP1, a soil sample was taken from the top 4 to 6 inches, and a second sample was taken at refusal at 5 feet. From TP2, a sample was collected from the top 3 to 4 inches of soil, and a sample was collected from a depth of 4 feet, just above refusal because of construction debris.

One seep and one sediment sample were taken from a location along the creek downgradient of the Lower Camp pad. A water sample was also collected from the infiltration gallery. The infiltration gallery is the Tatalina LRRS drinking water source.

Surface and subsurface soils, water, and sediment samples were analyzed for petroleum hydrocarbons, solvents, metals, PCBs, and pesticides by using the following analytical methods: Table 1 shows the requested analyses for each media.

Chemical	Analytical Method
Petroleum hydrocarbons	ADEC Methods: AK 101, AK 102, AK103
Volatile organic compounds	EPA Method 8260A
Semivolatile organic compounds	EPA Method 8270B
Metals	EPA Method 6010A/7000 series, 9010
PCBs and pesticides	EPA Method 8081

Analytical results were compared to Lower Camp background values obtained during the RI, proposed ADEC cleanup levels (18 AAC 75), and risk management standards developed in the baseline human health and ecological risk assessments completed for this source area. Figure 4 shows the sampling locations and significant analytical results.

Analytical parameters included those required by the ADEC for contaminated spill investigations: diesel-range organic (DRO) compounds, gasoline-range organic (GRO) compounds, residual-range organic (RRO) compounds, and benzene, toluene, ethylbenzene, and xylenes (BTEX), as well as volatile organic compounds (VOCs), semivolatile organic compounds (SVOCs), metals, PCBs, and pesticides.

Analytical results from the soil samples collected from test pits and borings indicate the presence of petroleum hydrocarbon contamination within the Lower Camp pad. Low levels of petroleum compounds were detected in soil samples from BH2/MW, BH3/MW, BH4 and BH6. Elevated GRO, DRO, and RRO concentrations were found in BH7, TP1, and TP2. Maximum GRO levels (630 milligrams per kilogram [mg/kg]) were found in surface soils at BH7, but decreased significantly to 95 mg/kg at 6 feet and to below reporting limits at the 15-foot depth in that boring. Maximum DRO levels (23,900 mg/kg) were found in soils at the 6-foot depth in BH8 but decreased significantly to 136 mg/kg at the 15-foot depth in the boring. RRO levels were also elevated in BH8 at the 6-foot depth, but decreased at the 15-foot depth.

The source of the elevated soil concentrations of petroleum, oil, and lubricants (POL) is likely surface spills associated with refueling at the old truck fill stand and past fuel disposal activities along the edge of the Lower Camp pad. The analytical data and site observations indicate that a subsurface lens of petroleum hydrocarbon contamination at this location within the Lower Camp pad resulted from past surface releases and disposal followed by filling and grading of the pad during Lower Camp building removal activities.

DRO was detected in groundwater samples collected for this source area at BH2/MW, BH3/MW, and the infiltration gallery at 55 micrograms per liter ( $\mu\text{g/L}$ ), 153  $\mu\text{g/L}$ , and 73  $\mu\text{g/L}$ , respectively. The presence of contamination in groundwater suggests that very limited infiltration of POL contaminants may have occurred from source areas on the Lower Camp pad. Contaminants from surface releases on the Lower Camp pad may have infiltrated to bedrock under the pad and migrated toward the creek along the bedrock. As the POL compounds migrated in the perched water table, they were likely sorbed to soil particles and diluted along the pathway. This reduction in concentrations by physical processes may explain why only low levels of POL contaminants in water were reported in downgradient water samples.

Analytical results from the sediment sample collected along the creek downgradient of the Lower Camp pad indicated low levels of pesticides and their breakdown products. 4,4'-Dichlorodiphenyldichloroethane (4,4'-DDD), 4,4'-dichlorodiphenyldichloroethylene (4,4'-DDE), and 4,4'-dichlorodiphenyltrichloroethane (4,4'-DDT) were detected at 0.32, 0.24, and 2.5 mg/kg, respectively. The levels of these pesticides exceeded ecological risk levels developed in the baseline risk assessment. VOCs and PCBs were not detected in the sediment. VOCs detected in surface water were at very low levels and the majority of the results were qualified by the laboratory as potentially biased because of matrix interference. No SVOCs, pesticides, or PCBs were detected in the surface water sample collected at this location.

No contaminants of concern or contaminants of ecological concern (COECs) were identified for the test pit and soil boring/monitoring well locations evaluated in the baseline risk assessments for SS-009. In the Lower Camp pad, the elevated POL compounds were found immediately around SS-009 and the eastern bank of the pad. DRO levels in subsurface soil at the BH8 location exceed cleanup standards in 18 AAC 75 regulations. Analytical data from groundwater and from seep and sediment samples downgradient of the source area confirm that contaminants have not migrated through the pad to groundwater or to surface water pathways in the area. The fuel contamination originated from fuel releases that occurred before the removal of Lower Camp structures in the mid-1980s. It is assumed that the petroleum hydrocarbon levels have been decreasing over the years and they are expected to continue to decrease in that area.

4,4'-DDT, 4,4'-DDD, and 4,4'-DDE were detected in the one sediment sample at elevated concentrations, and they were retained as COECs. The source of these contaminants is likely historical usage of pesticides in the drainage area upgradient to the sampling point. These compounds were also detected in BH7, the two test pits, and in a sediment sample approximately 1,600 feet downgradient along the same creek. These concentrations are consistent with sampling results from the 1992 sampling program, are likely residual levels from past routine use of pesticides at the installation. The ecological risk assessment

concluded that the pesticides retained as COECs are not expected to adversely affect the ecosystem and do not warrant remedial action.

#### **4.0 SELECTED REMEDY**

The USAF is currently conducting additional investigation of the subsurface petroleum hydrocarbon contamination at the BH8 location, as part of a follow-up RI at IRP Site SS-008, WAA No. 4. In the future, location BH-8 will be addressed under IRP Site SS-008. On the basis of the 1997 RI and risk assessments conducted at SS-009 and the follow-up RI at SS-008, WAA No. 4, there is no need for further remedial action at SS-009. This determination is protective of human health and the environment and complies with Applicable or Relevant and Appropriate Requirements (ARARs) for the site. There are three soil samples with minor exceedences over the Method 2 Diesel Range Organics soil cleanup levels for migration to groundwater (323, 720, and 2500 mg/kg), and one soil sample with a minor exceedence over the Method 2 Gasoline Range Organics soil cleanup level for migration to groundwater (630 mg/kg). However, based on the site history, the limited extent of contamination, the contaminant concentrations that are unlikely to adversely affect groundwater quality, the upgradient location of the samples from IRP Site SS-008 which is under further investigation, and since the site area will have institutional controls, no unacceptable risk or threat to public health or the environment exists. Institutional control in the form of notice in land records will be developed by the Air Force, with ADEC concurrence, for waste left in place and within a base master plan. The State of Alaska supports and concurs with the selected remedy of no further action.

Visual inspections of cover material will be conducted and documented over a 5 year period (the first, third, and fifth years) to check that healthy vegetation exists and no erosion of the cover is occurring. After the last inspection, a 5-year review will be conducted to review the results of the inspections. If the cover material has remained in good condition, no further inspections will be required.

Due to the close proximity and similar historical activities of IRP Sites SS-007 and SS-009, the maintenance and inspection program for IRP Site SS-007 has been incorporated into the maintenance and inspection program for IRP Site SS-009.

This decision may be reviewed and modified in the future if new information becomes available which indicates the presence of previously undiscovered contamination or exposure routes that may cause a risk to human health or the environment.

### **PART III**

#### **RESPONSIVENESS SUMMARY**

##### **OVERVIEW**

The U.S. Air Force and the Alaska Department of Environmental Conservation distributed a Proposed Plan for No Further Response Action planned (NFRAP) at seven source areas at Tatalina LRRS. The seven source areas include SS-001, DP-005, OT-012, SS-007, SS-009, LF-010, and OT-006.

The Proposed Plan described the results of the RI conducted at these source areas and the recommendations for NFRAP. Verbal comments about the Proposed Plan were received at a public meeting conducted at Takotna, Alaska, during the public comment period. The comments are summarized and presented in this Responsiveness Summary.

##### **BACKGROUND OF COMMUNITY INVOLVEMENT**

The public was encouraged to participate in the NFRAP decision at the seven source areas during a public comment period from February 18, 1999, to April 15, 1999. The original public comment period was scheduled for February 18 to March 19, 1999. The U.S. Air Force extended the public comment period to allow more time for community members to review the Proposed Plan and submit comments. The Proposed Plan was released to the public and copies delivered to Takotna residents on February 18. Copies of the Proposed Plan were also sent to all known interested parties, including Tatalina LRRS workers and residents.

The Proposed Plan summarizes available information about the seven source areas. Additional information will be placed into three information repositories: the U.S. Air Force 611 CES/CEVR offices at Elmendorf Air Base, the Takotna Community Library, and the McGrath Public Library. An Administrative Record, including all items to be placed into the information repositories and other documents used in the selection of the NFRAP recommendation for the seven source areas, was established at the 611 CES/CEVR offices at Elmendorf Air Force Base. The public was encouraged to inspect materials available in the Administrative Record during business hours.

Interested citizens were invited to comment on the Proposed Plan and the NFRAP recommendations by mailing comments to the 611 CES/CEVR Community Relations Coordinator, by calling a toll-free telephone number to record a comment, or by attending and commenting at a public meeting conducted on February 18, 1999, at the Takotna Community Center in Takotna, Alaska. The proceedings of the meeting were recorded, and the transcript became part of the Administrative Record for the seven NFRAP source areas at Tatalina LRRS.

## **SUMMARY OF COMMENTS RECEIVED DURING THE PUBLIC COMMENT PERIOD AND U.S. AIR FORCE RESPONSES**

### **Verbal Comments from the Public Meeting**

**Comment:** If the EPA and ADEC told the Air Force to clean something up, and the Air Force didn't want to do that, does the Air Force have the power to say "No"? In this case, who has the authority to say "Look at it; do it"?

**Response:** The Air Force follows regulations regarding investigations and cleanups of potentially contaminated sites. The regulations are based on whether an animal or human could be harmed. If a site can cause harm, then the ADEC has the authority to tell the Air Force to clean up the site.

**Comment:** Has the U.S. Air Force investigated the old tram site on the hill at the Tatalina LRRS, where there was a building? A transformer building was reportedly formerly located at that site.

**Response:** The tram building was not included in the 1997 remedial investigation (RI). The Air Force and the ADEC are planning to conduct further investigation at that site and will request input from community members at that time.

**Comment:** I am not comfortable only using water samples to investigate, and would prefer using heavy equipment to do excavations. I am not certain how long biodegradation takes, and whether contaminants would get into the groundwater. This is regarding IRP site LF-004.

**Response:** The Air Force has determined that there is not enough information to make a decision regarding future action at this source area. It is not one of the NFRAP source areas discussed in the Proposed Plan. The Air Force will be conducting further investigation at LF-004.

**Comment:** Regarding the reporting of environmental concerns, I know a man who is reluctant to come forward about things he might have done. Even though local people have said they know where contaminants are buried, they did not share this information with the Air Force when there was an opportunity to do so. A community member said he had not been asked for any information about the area.

**Response:** A bulk mailing was conducted 2 years ago and public meetings were held, including one public meeting conducted before the 1997 RI field work. Newspaper notices requesting information about the Tatalina LRRS site and any potentially contaminated areas were also published. It is not too late to provide information to the Air Force. The easiest way to contact the Air Force is through the toll-free number provided in the Proposed Plan. The U.S. Air Force encourages individuals to contact them regarding any information or concerns they have about the sites. If new information becomes available about a site that has already been closed for further action, the ADEC and the Air Force can re-open the site and conduct additional work.

**Comment:** What are the plans for Sterling Landing?

**Response:** The Air Force is planning to conduct a follow-up investigation at Sterling Landing in late summer 1999 because the 1997 field investigation did not fully determine the extent of contamination.

**Comment:** It is all right if sites are closed, as long as they can be re-opened in the future if new information is available or new contamination is found.

**Response:** The Air Force will return to an area for further investigation if new information indicates that contamination exists that may cause harm to the environment or human health.

**Comment:** There is a concern about the tanks that were removed from Sterling Landing and that are now left in pieces alongside the road to Takotna.

**Response:** The Air Force no longer owns the tanks and is unable to remove the tank remnants. The tanks were cleaned during the tank closure process the Air Force conducted, so there are no hazardous substances associated with the tanks. In this case, because the Air Force does not own the tanks, the current owner of the tanks is responsible for removing the pieces from the road.

**Comment:** Can an information repository be established in McGrath?

**Response:** Yes, according to the Proposed Plan, an information repository will be established at the McGrath Public Library.

**Comment:** How long will the monitoring wells at Sterling Landing be monitored and what is the normal procedure when sites are obviously contaminated?

**Response:** The Air Force has not determined how long the wells will need to be monitored. The normal procedure for addressing a potential contaminated site is to conduct an investigation and then, depending on the results of the investigation, a cleanup may be conducted. The decisions regarding the investigation and cleanup are made in consultation with the ADEC and the community members. It is too early to determine if a cleanup will be conducted at Sterling Landing or what type of cleanup may be conducted. These decisions will be made after the follow-up investigation in 1999 and further discussions with the ADEC and community members.

**Comment:** There is a concern regarding the scheduling of additional site investigations at Sterling Landing. When fuel barges deliver fuel to Sterling Landing in the summer, the community residents and others that need the fuel need access to Sterling Landing and the road to Takotna. Will Sterling Landing need to be closed down in the summer?

**Response:** The Air Force will coordinate the scheduling of further investigation activities at Sterling Landing with the community members, and every effort will be made to accommodate access to Sterling Landing and the roadways for fuel deliveries at Sterling Landing and transporting of the fuel to Takotna.

**Comment:** What are the property boundaries at Sterling Landing, and who owns the property where the Air Force tanks were formerly located?

**Response:** The Air Force is currently researching the property boundaries at Sterling Landing and associated real estate issues. This information is needed before additional investigation is conducted at this location. If there are fuel storage tanks at Sterling Landing

that the Air Force does not own and that are leaking, the tanks will need to be repaired before the additional investigation can be conducted. The current owners of the fuel tanks at Sterling Landing are responsible for maintaining the tanks, or replacing them if necessary.

**Comment:** How does the Air Force know when a site is clean?

**Response:** The Air Force begins by sampling at the site and then removing the contamination. The site is again sampled, after the contaminated area has been removed, to confirm all the contamination was removed. Then the site is monitored for a length of time that is negotiated with the ADEC and the community to be sure that the cleanup was successful. If additional contamination is found during the monitoring, the Air Force needs to go back and conduct more cleanup and repeat the process.

**Comment:** Does the Air Force do its own laboratory work? There is a concern about turnaround time, and if it takes a long time for the results, it may be too late to address a potential problem. The example is fuel quality testing of fuel that is delivered to Sterling Landing. When it takes several months to receive the data, by that time the fuel has already been used.

**Response:** Laboratory work is generally conducted by contractors hired by the Air Force. If the sampling for the fuel quality is taking too long, the laboratories can be requested to complete a faster turnaround for results. It should not take so long to complete the fuel quality analyses, and the Air Force will look further into this issue.

**Comment:** In response to Air Force interest in local hire, hiring local people is great and I hope that the Air Force will follow through on this. Many people in Takotna and McGrath have taken the required OSHA training so they can work at the Air Force sites that require the training.

**Response:** The Air Force would like to hire locally and encourages local community members to be involved in the work available at sites.

**Comment:** Why weren't source areas WAA No. 2 and LF-010 cleaned up right away?

**Response:** The Air Force did not have the information regarding potential contamination and work practices that contribute to contamination when these sites were active many years ago. Now, the Air Force realizes that common work practices that were done in the past caused contamination. Therefore, the sites are being investigated and cleaned up.

**Comment:** In response to the Air Force question regarding the best ways to keep the community informed about IRP activities at Tatalina LRRS, a Regional Advisory Board (RAB) would be the best method. Until a RAB is established, locally involved organizations could be contacted when information is available from the Air Force, and when new information needs to be sent out.

**Response:** The Air Force is currently working on establishing a RAB for the Tatalina LRRS. It has not been determined when the RAB will be established. The Air Force is interested in the most efficient ways to distribute information to community members, so everyone is informed about what the Air Force is planning to do at Tatalina LRRS and the results of investigations and cleanups that may be performed.

**Comment:** An additional contaminated site that was not investigated during the 1997 RI may exist at Upper Camp. This is an area near DP-005, north of the MK Debris site and Northeast Landfill. While working at the facility, I recall the facility personnel gave instructions to discard drums over the steep slope, into the ravine below. Some time later on, facility workers were instructed to collect the drums, crush them, and dispose of the drums in an onsite landfill. If the drums were not empty, fire axes were used to release the contents so the drums could be hauled to DP-005 for disposal. Drums are still visible at this site.

**Response:** The Air Force and ADEC are planning to conduct additional investigation of this new site in the future. Additional input from community members who have knowledge about past operations at this site will be solicited at that time.

#### **Written Comments**

No written comments were received during the public comment period.



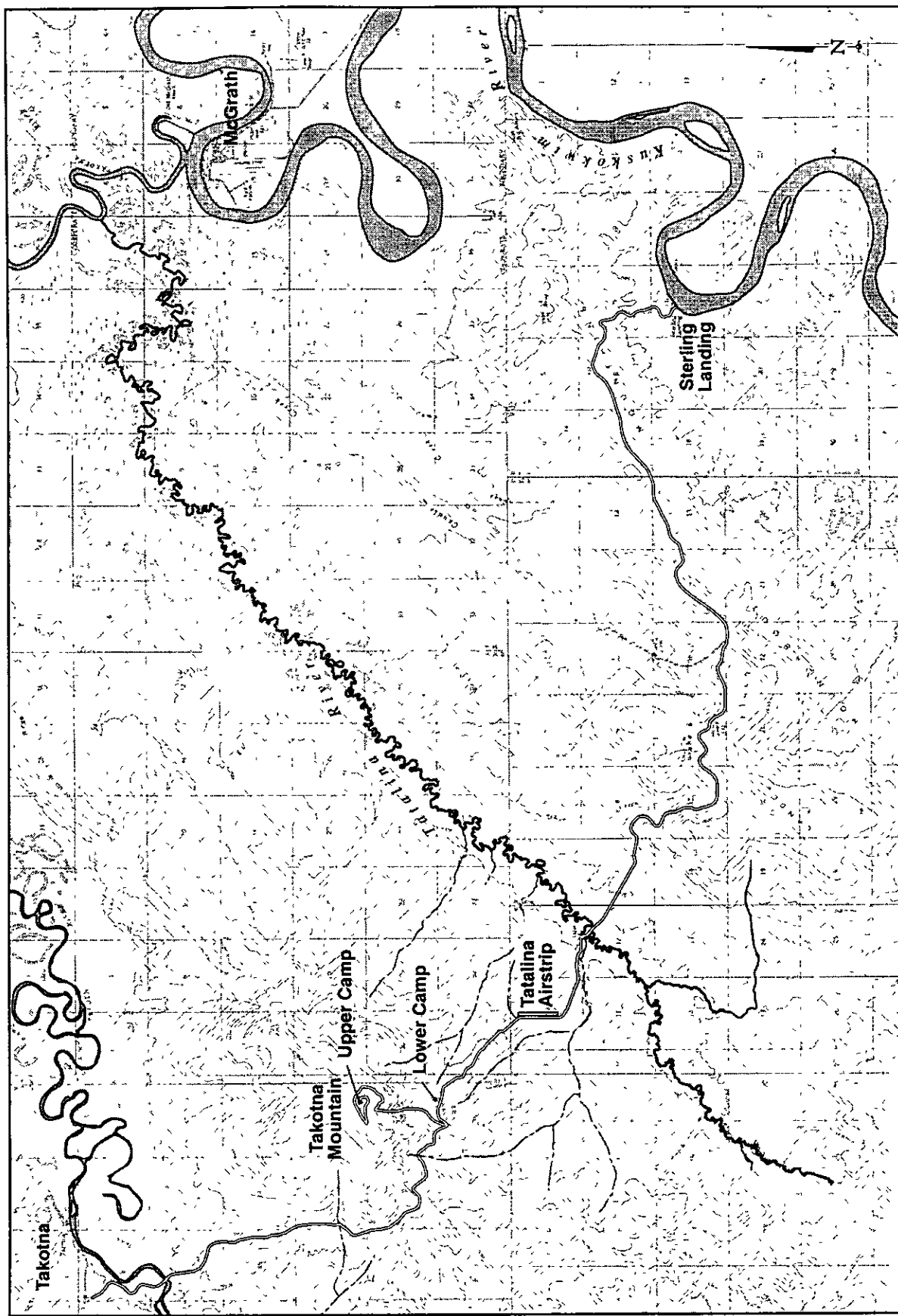


Figure 1. Location Map for Tatalina LRRS and Surrounding Area

From U S Geological Survey maps Iditarod (D-1) and McGrath (D-6), Alaska

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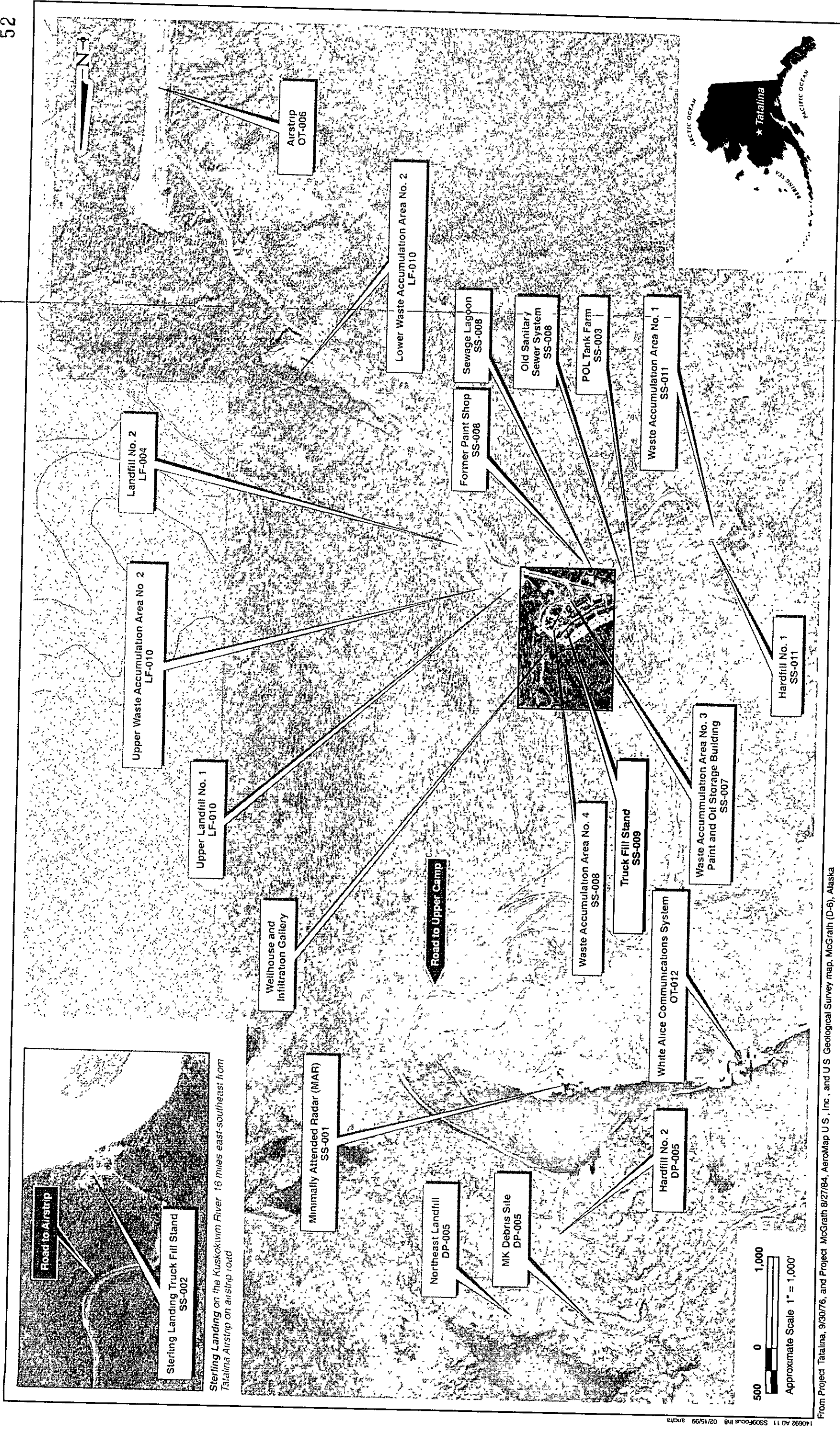
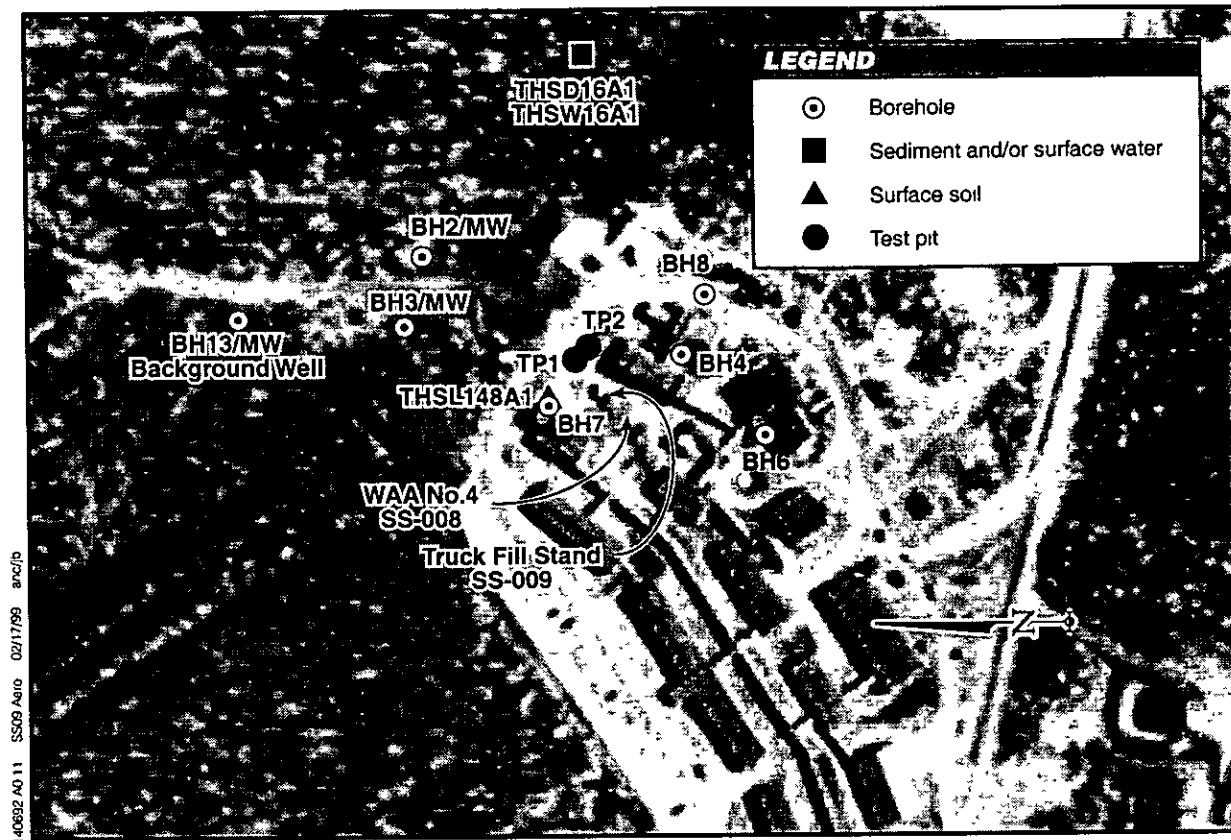
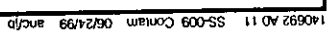


Figure 2  
Aerial Photograph of Tatalina LRRS Site Locations



From Project Tatalina, AeroMap U S , Inc , 9/30/76

Figure 3  
Aerial Photograph of SS-009



From Project Tatalina, AeroMap U S , Inc , 9/30/76

**Figure 4**  
**Contaminant Summary for**  
**SS-009**

## APPENDIX A

**TATALINA LRRS ADMINISTRATIVE RECORD INDEX**

The following list includes U.S. Air Force Installation Restoration Program plans and reports completed to date for the Tatalina LRRS. A comprehensive Administrative Record for the Tatalina LRRS is currently in progress and will be available to the public when completed.

U.S. Air Force. *Tatalina Long Range Radar Station Takotna Public Meeting Regarding "Proposed Plan for No Further Response Action Planned" Meeting Minutes*. February 18, 1999.

U.S. Air Force. *Proposed Plan for No Further Response Action Planned: IRP Sites DP-005, OT-012, SS-001, SS-009, LF-010, OT-006, United States Air Force Installation Restoration Program, Tatalina LRRS, Alaska*. February 1999.

U.S. Air Force. *Remedial Investigation Report, Tatalina LRRS, Alaska*. October 1998.

U.S. Air Force. *Interim Remedial Action Report (Draft), Tatalina LRRS*. March 1998.

U.S. Air Force. *Analytical Data Informal Technical Information Report, Tatalina LRRS*. February 1998.

U.S. Air Force. *Community Relations Plan, Tatalina Long Range Radar Station, Alaska*. June 1997.

U.S. Air Force. *Remedial Investigation/Feasibility Study Sampling and Analysis Plan, Tatalina LRRS, Alaska*. June 1997.

U.S. Air Force. *Remedial Investigation/Feasibility Study Work Plan, Tatalina LRRS, Alaska*. June 1997.

U.S. Air Force. *Sterling Landing Fuel Tanks Site Environmental Baseline Survey*. 1997.

U.S. Air Force. *Draft Management Action Plan (Update), Tatalina Long Range Radar Station, Alaska*. August 1996.

U.S. Air Force. *Management Action Plan, Tatalina LRRS, Alaska*. Environmental Restoration Program. September 1995.

U.S. Air Force. *Site Investigation Report, Tatalina LRRS, Alaska*. July 1993.

U.S. Air Force. *Preliminary Assessment for Tatalina Long Range Radar Site*. 1991.

U.S. Air Force. *Installation Restoration Program Technical Support Document for Record of Decision, Tatalina Air Force Station LRRS Site*. February 29, 1988.

U.S. Air Force. *Installation Restoration Program Technical Support Document for Record of No Further Action, Tatalina Air Force Station LRRS Site*. 1988.

U.S. Air Force. *Phase I: Records Search, AAC-Southern Region*. September 1985.

**APPENDIX B**  
**ACRONYM LIST**

AAC	<i>Alaska Administrative Code</i>
ADEC	Alaska Department of Environmental Conservation
ARAR	applicable or relevant and appropriate requirement
bgs	below ground surface
BH	borehole
BTEX	benzene, toluene, ethylbenzene, and xylenes
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
COEC	contaminant of ecological concern
DD	Decision Document
DDD	dichlorodiphenyldichloroethane
DDE	dichlorodiphenyldichloroethylene
DDT	dichlorodiphenyltrichloroethane
DRO	diesel-range organic
EPA	U.S. Environmental Protection Agency
GRO	gasoline-range organic
IRP	Installation Restoration Program
LRRS	Long Range Radar Station
mg/kg	milligrams per kilogram
µg/L	micrograms per liter
PCB	polychlorinated biphenyl
POL	petroleum, oil, and lubricants
RAO	remedial action objective
RI	remedial investigation
RRO	residual-range organic
SVOC	semivolatile organic compound
TBC	to-be-considered
TP	test pit
USAF	U.S. Air Force
USC	<i>U.S. Code</i>
VOC	volatile organic compound
WAA	Waste Accumulation Area
WACS	White Alice Communications System

**FINAL PAGE**

**ADMINISTRATIVE RECORD**

**FINAL PAGE**