



## FORT RICHARDSON Site Summary Update – January 2002

### Site Description

Fort Richardson Army Post is bounded by Elmendorf Air Force Base and Anchorage to the west and Eagle Bay and the Knik Arm of Cook Inlet to the north. The southern and eastern boundaries consist of undeveloped lands and Chugach State Park.

There are 38 contaminated sites identified at the facility. The sites include: Eagle River Flats (ERF) and ordnance testing area, Roosevelt Road Transmitter Site Leachfield (RRTSL), Poleline Road disposal area (PRDA), Circle Road drum storage area, Former Fort Richardson Landfill, and Ruff Road Fire Training area (RRFTA) and leaking underground storage tank (UST) sites.

The Post was added to the Comprehensive Environmental Response, Compensation, and Liability Act National Priorities List in 1993. The State and Army have entered into an environmental restoration agreement to address petroleum contamination from fuel spills and leaking above ground fuel storage tanks. A separate UST compliance agreement was developed to address leaking USTs.

### Threats and Contaminants

Sediment and surface water samples collected from ERF in 1989 and 1991 indicated elevated levels of white phosphorus. The Roosevelt Road Transmitter site is contaminated with petroleum and metals. Chlorinated solvents are present in soil and groundwater at the PRDA. Building 35-752 is contaminated by polychlorinated biphenyls (PCBs). Soils at Building 986's dry well is contaminated with petroleum and metals.

### Public Health and Environmental Concerns

Visitors, construction workers may potentially be exposed to pollutants through dermal contact or accidental ingestion of contaminated soil or groundwater. Contaminants that have bioaccumulated in fish and other wildlife may also threaten human health. White phosphorous has killed thousands of migratory waterfowl and other birds in this area since 1982, but treatment of the sediments is ongoing and significantly reducing the number of waterfowl mortalities.

### Response Actions

- In 1992, PCB-contaminated soil was removed from the RRTSL and shipped to an out-of-state, permitted hazardous waste landfill.
- Over 20,000 cubic yards of petroleum contaminated soil from the Post's Landfill were thermally treated in 1992.
- In 1993, petroleum contaminated soil was removed from the Circle Road site and remediated in a soil burner in Anchorage. 30 USTs were removed were also removed in 1993.
- In 1994, approximately 3,500 cubic yards of soil contaminated by chlorinated solvents were removed from PRDA and subsequently successfully treated.
- Soil heating with vapor extraction for the soil and shallow groundwater began in July 1997 and ended in 1999. It was effective at removing over 90% of the contaminants present from the surface to a depth of 30 ft.
- In 2001, ponds at Eagle River Flats are being drained to dry the sediments in order to oxidize the white phosphorus, which will in turn render it harmless to the waterfowl.

## **Current Status**

A new Operable Unit E composed of Building 35-752 and the Armored vehicle maintenance area will be investigated under CERCLA. It is currently at the Management Plan stage for further investigation and action in the 2002/2003 field seasons.