

# NATIONAL PRIORITIES LIST (NPL)

\*\*\*Final Site\*\*\*

September 2011

BLUE LEDGE MINE | Rogue River – Siskiyou National Forest, California

Siskiyou County

#### Site Location:

The site is an abandoned copper, zinc, gold and silver mine located in Siskiyou County on private land within the Rogue River - Siskiyou National Forest, approximately 3 miles south of the Oregon-California border.

### ▲ Site History:

The site operated as a mine from approximately 1904 to 1930. More than 2 miles of underground excavations were developed about 800 vertical feet above Joe Creek. Acid mine drainage (AMD) discharging from adits flows directly through 60,000 tons of waste rock into Joe Creek.

#### Site Contamination/Contaminants:

Hazardous substances from the mine wastes at the site are transported via Joe Creek to Elliott Creek and possibly further downstream to the Applegate River and ultimately Applegate Reservoir. Copper levels in Joe Creek downstream from the site are above background and exceed the criterion continuous concentration (CCC) for copper in surface water according to EPA's National Recommended Water Quality Criteria. The CCC is national guidance and an estimate of the highest concentration of copper in surface water that an aquatic community can be exposed without an unacceptable effect.

### **## Potential Impacts on Surrounding Community/Environment:**

Fish and amphibian surveys conducted in the area by the U.S. Forest Service (USFS) and other parties document that Joe Creek has been contaminated below the site. Fish survey data confirmed there are no fish in Joe Creek. Elliott Creek, the Applegate River, and the Applegate Reservoir are considered recreational fisheries. Sensitive, threatened and endangered species have been identified in the vicinity of the site including the northern goshawk, the Siskiyou Mountains salamander and the northern spotted owl.

# Response Activities (to date):

In May 2006, EPA conducted an initial removal action. Removal efforts included stabilizing waste rock to prevent further erosion into water courses; providing soil cover to reduce the likelihood of direct human contact with contaminants from the waste rock; and creating a system of barriers and drainage systems to reduce the localized AMD and heavy metal impacts on Joe Creek. In 2010, the USFS received \$9.738 million in American Reinvestment and Recovery Act (ARRA) funds plus an additional \$1.325 million from the ASARCO Environmental Trust for work on the site that began during the summer of 2010. USFS work includes removal of two of the four waste rock piles, and reclamation through erosion control measures, topsoil replacement and restoration of native vegetation.

# Need for NPL Listing:

Despite the previous actions undertaken by both EPA and the USFS, there remain areas of contamination that need to be addressed to ensure there are no further environmental or possible human health risks associated with the site. USFS work will not address contaminated sediment in the surface water down gradient from the site, discharge from mine adits, nor long-term operation and maintenance. Other federal and state cleanup programs are not viable at this time. EPA received a letter from the state supporting listing the site on the NPL.

[The description of the site (release) is based on information available at the time the site was evaluated with the HRS. The description may change as additional information is gathered on the sources and extent of contamination.]

For more information about the hazardous substances identified in this narrative summary, including general information regarding the effects of exposure to these substances on human health, please see the Agency for Toxic Substances and Disease Registry (ATSDR) ToxFAQs. ATSDR ToxFAQs can be found on the Internet at http://www.atsdr.cdc.gov/toxfaq.html or by telephone at 1-888-42-ATSDR or 1-888-422-8737.