Tar Creek Superfund Site Fact Sheet for OU2

Introduction

EPA initiated OU2 after the local Indian Health Service clinic sent them data indicating that a high 34% of the children residing on or near the Tar Creek Site had blood lead levels at or above 10 micrograms per deciliter (action level set by CDC). Lead is known to cause serious, possibly irreversible health effects in children. Less is known about cadmium, manganese and other heavy metal contaminants associated with the Tar Creek Site. EPA selected lead as the only contaminant of concern.

Studies

High Access Areas (HAA) and Residential Area soils near the Site were sampled for lead and cadmium content. Chat uses were also considered. Limited air monitoring was performed. A limited number of air samples was taken. EPA refused to consider downstream impacts from the Site. They also refused to sample wild plants and animals as sources of heavy metal ingestion by local inhabitants. Some areas sampled and remediated were not on the actual Superfund Site. The PRPs were requested to fund the work but they declined. They did fund some limited blood sampling and education concerning lead for local residents. An EPA contractor conducted the sampling.

Results

The resulting Record of Decision indicated ingestion of lead-contaminated soil was the major exposure pathway for children. Wildlife and plants were determined to be an insignificant source of lead exposure. The alternative selected included the following: Excavation of soils would be conducted at those locations with higher than 500-ppm lead in the top 12”. Higher levels were allowed to remain in the soils below 18”, but the demarcation between these layers would be marked. Recontamination potential of the yards and HAAs was considered minimal. Eventually, more than 30 High Access Areas and 2400 residential yards were excavated. The PRPs funded a program to monitor the health of children, clean dust from area homes and help educate local residents about lead. EPA declined to regulate chat transport and use. Several follow-up actions were recommended but not funded. Subsequent studies and a five-year review were not stipulated.

Conclusions

EPA declined to perform a holistic study of the Site problems. Instead they agreed to mitigate a serious threat to area children. There were almost 300 complaints about the yard and HAA work. Contaminated soil removed from the yards was left on the Tar Creek Site. There is a good chance the areas that were covered with clean soil will become recontaminated by blowing dust and runoff from the chat piles within a few years. The solution implemented was not permanent, as typically required at Superfund Sites. A considerable amount of money has been spent and another nine years has passed without basic studies or resolution of the problems at this Site.