



GARY E. JOHNSON  
GOVERNOR

State of New Mexico  
**ENVIRONMENT DEPARTMENT**  
Ground Water Quality Bureau  
Harold Runnels Building  
1190 St. Francis Drive, P.O. Box 26110  
Santa Fe, New Mexico 87502  
(505) 827-2918 phone  
(505) 827-2965 fax



PETER MAGGIORE  
Secretary

PAUL R. RITZMA  
Deputy Secretary

August 30, 2001

Mr. Milton Head  
P.O. Box 2038  
Milan, NM 87021

40-8903

RE: Sprayer Mist and Air Monitoring Results from Homestake Mining Company Reclamation

Dear Mr. Head:

The New Mexico Environment Department (NMED) is responding to your telephone call of May 22, 2001 regarding the mist coming from the Homestake Mining Company (HMC) site. HMC operates several evaporation ponds as part of their ground water cleanup plan. To expedite evaporation, HMC has installed several misters and a large sprayer/blower. You called to say that operating the sprayer at night causes a fog to accumulate over the residential houses, especially during peak inversion times. You also mentioned that the mist leaves a white film on equipment that turns a yellowish-red color when washed off. You voiced a concern that the cleanup method of evaporating the contaminated ground water allows it to enter the air and may not be safe to breath, and that it may contaminate the surface. NMED has contacted HMC and the Nuclear Regulatory Commission (NRC), which is in charge of overseeing the cleanup activities at the site, to address your concerns.

Roy Cellan from HMC has told me that he contacted you shortly after your call and offered to collect a swipe sample of the mist residual on your equipment. You can contact Mr. Cellan at 287-4456 extension 14 to have this sample collected. In addition, HMC has modified their turbo sprayer schedule to cease operations at 10 PM nightly, and resume in the morning, rather than operating throughout the night.

HMC collects samples from several air monitoring stations located throughout their property (see attached Figure for air monitor locations). Air monitoring stations HMC-4 and HMC-5 are located closest to your home. In response to your concerns, HMC analyzed the recent air sample for a full suite of metals, not just radionuclides. Results from this sampling event (June 2001/ Second quarter 2001) are enclosed with this letter, along with air monitoring results from 1997. The 1997 air monitoring results are included for comparison purposes. The 1997 data also reflect conditions prior

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to the practice of adding copper sulfate to the evaporation pond water to control the annual algae bloom and odor problem.

The air monitoring data show very little change in air particulate concentrations over time. The concentrations of the metals are below regulatory standards, where standards are available. The data indicate that no health threat exists from air-borne particulates.

Thank you for your interest in this site. Please contact Abbie Phillip at (505) 827-1049, or Mary Heather Noble at (505) 827-2782 with any additional questions or concerns.

Sincerely,



Birgit Landin  
Environmental Specialist  
Superfund Oversight Section  
Ground Water Quality Bureau

cc w/ attachments:

Mark Purcell, Environmental Protection Agency- Region 6  
Abbie Phillip, NMED-Superfund Oversight Section  
Tammy Mondragon, Citizen

cc w/o attachments:

Ken Hooks, Nuclear Regulatory Commission  
Bill Vontel, Nuclear Regulatory Commission  
Roy Cellan, Homestake Mining Company  
Mary Heather Noble, NMED-Pollution Prevention Section