

Issue Brief: Public Health Concerns

The proposed mining operation poses severe health risks to the community, primarily due to exposure to particulate matter and chemical contaminants:

Silicosis and Respiratory Health Concerns:

- Pozzolan mining involves drilling, crushing, and grinding, which generate fine crystalline silica dust.
- Prolonged inhalation of silica dust leads to silicosis, an incurable lung disease characterized by inflammation and scarring of lung tissue.
- The Occupational Safety and Health Administration (OSHA) identifies respirable crystalline silica as a known carcinogen, causing lung cancer, chronic bronchitis, and other respiratory diseases.
- Local residents, including children and the elderly, are at heightened risk of respiratory complications due to increased particulate matter in the air.

Chemical Hazards from Magnesium Chloride:

- Magnesium Chloride is commonly used to suppress dust on mining roads. While effective for dust control, it poses serious health risks:
 - Respiratory Irritation: Inhalation of magnesium chloride particles can aggravate asthma and other respiratory conditions.
 - Skin and Eye Irritation: Direct contact can cause dermatitis, redness, and pain.
 - Environmental Contamination: Magnesium chloride is highly soluble and can leach into soil and water systems, increasing salinity, which negatively impacts local agriculture and water quality.

See also *Issue Brief: Magnesium Chloride for Dust Control*

The health implications for communities in the vicinity are also extended to livestock grazing two miles down canyon, and wildlife residing and transiting throughout the canyon, to and from Hamlin Valley. Significant and long-term, necessitating strict regulatory review and intervention.

The proposed mining operation presents clear health risks, as with Pozzolan, Magnesium Chloride also poses risks for eye, skin, and respiratory effects, particularly in individuals with pre-existing respiratory conditions. There are additional risks to animals, including paw irritation, and in cases of ingestion can cause vomiting, and diarrhea, in turn costing ranches to maintain herd health, against contraindicated contamination.