# Get Informed

## **High Sulfide Mines Can Create Acid Drainage** Tamarack Talon Project – High Sulfide Mine

The Talon Tamarack North Project mine covers **nearly 32** square miles and plans to remove 12 Million US tons of high sulfide ore over a 12 year period. (page 192 of the PEA)

Nickel-Copper-Cobalt minerals are bonded to sulfur mined as sulfide ores. When this ore is exposed to air and moisture, a chemical reaction occurs that generates **sulfuric acid** which migrates around the environment and leaches heavy metals present in the waste rock, pit walls and tailings basin.

Tamarack sulfide deposits (and tailings) also contain cobalt - a highly toxic mineral.

The sulfuric acid along with dissolved heavy metals released onto the land will seep into the rich aquifers below and then into streams and lakes at levels that are toxic to fish and other aquatic life.

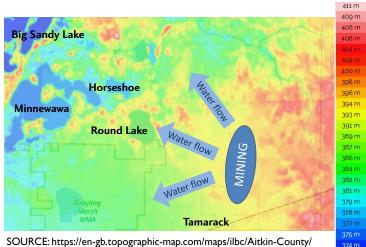
This type of pollution is commonly referred to as Acid Mine Drainage (AMD).

Our lakes, rivers and wetlands are all down stream of the mine site. All of the water bodies in the Tamarack area are linked by multiple aquifers.

The chemical reaction of sulfide ore/tailings to sulfuric acid can happen over long periods of time - potentially 1000's of years.

#### SOURCES:

https://earthworks.org/issues/acid\_mine\_drainage/ https://www.usgs.gov/mission-areas/water-resources/science/mine-drainage https://www.epa.gov/nps/abandoned-mine-drainage-additional-resources



SOURCE: https://en-gb.topographic-map.com/maps/ilbc/Aitkin-County/

#### A literature review on acid mine drainage concluded that "no hard rock surface mines exist today that can demonstrate that acid mine drainage can be stopped once it occurs on a large scale."

Acid runoff from the Summitville Mine in Colorado killed all biological life in a 17-mile stretch of the Alamosa River. The site was designated a federal Superfund site, and the EPA has spent over \$210 million on clean-up.

Zortman Landusky mine in north central Montana filed for bankruptcy in 1998 leaving the state of Montana with the liability for \$33 million in long-term water treatment and reclamation costs.

TALON Preliminary Economic Analysis (PEA) downloadable at https://talonmetals.com/wp-content/uploads/2021/02/Talon-Tamarack-PEA3\_2021.pdf

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