

Mining our Earth

A Kids for Saving Earth Action Program



What is mining?

Mining removes stone (like granite), minerals (like diamonds), metals (like iron or copper) oil, coal, and gas from the Earth. There are different ways to remove these materials from our Earth such as open pit mining, drilling or fracking. There are many difficult environmental problems when mining our Earth. We need to work together to solve them.

Why do we mine?

We need the minerals, metals, oil and coal that we remove from the Earth to create products that we use everyday. For example, iron is used for our cars and school buses. Oil is used to run our cars. Copper is used to make electric wires. Look around your room and list all the items that are made from materials that are mined.



Where are mines?

Mines may be close to where you live or hundreds of miles away. Sometimes they're hidden and you can't see them. Sometimes they're huge, easily seen, miles-long pits. Mines can be in forests, mountains or deserts. There is even mining in lakes and oceans. Often mining occurs in some of Earth's most precious lands which should be carefully protected. Mines are all over the world including countries like the US, Sweden, Russia and Mexico.

Does mining help or hurt the Earth?

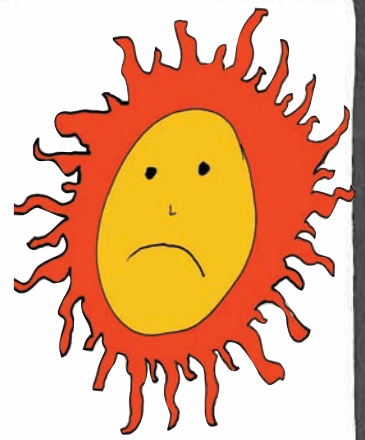
Some of the ways we mine can be harmful to the Earth, the plants, animals and people who live near by. Mining too often poisons (pollutes) land, air, and water near the area being mined. This destroys the habitats (homes) for many living creatures including us. However, don't forget that mines are needed for making many products that all of us use.

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Here's an example of a mining environmental issue.

In Northern Minnesota there's a wonderful fairyland-like place called the **Boundary Waters**. It's on the border between the U.S. and Canada and it's a precious home for all living creatures including humans. People love this area for canoeing, fishing, swimming, camping, skiing, hiking and more. Thousands of people come to this nationally protected land every year to enjoy the beauty of nature. There are strong land use rules to protect this area. Motor boats aren't even allowed on most of the Boundary Waters Wilderness Lakes and Waterways.



What's the problem.

We must have a healthy Earth and Boundary Waters but we also use metals like copper and nickel. Mining these metals is called **sulfide mining**. When the sulfide rock is cracked open to air and water, it creates an acid and other kinds of pollution. When these toxic poisons leak into the streams and lakes, it can kill plants and animals often destroying what it touches. From sulfide mines all over the world, this pollution spreads to Earth's precious streams, lakes, wetlands, forest lands and more.

Can these sulfide mines be mined safely?

We don't know. There are many sulfide mines all over the Earth, and they have always leaked poisonous acid into the land and water. The U.S. agency (**EPA**) that works to protect our Earth says that sulfide mining has caused most of the toxic pollution leaks into our country's beautiful land. Mining laws to protect the Earth often aren't enforced and many places don't have strong laws. Existing science and engineering aren't good enough to stop the pollution. Mining companies often don't spend the money they should to protect the Earth. Finally, most people don't understand the **dangers of sulfide mining**.

What can we do?

- Learn more with your parents about the boundary waters on **Friends of the Boundary Waters** website and check out our **mining info links page** for more resources.
- Draw and send mine pollution pictures: Make a large postcard and draw a picture of pollution running into lakes and forests. Write the words Stop Mining Pollution. Sign your name and age. Send it to your **governor, U.S. and state senators and representatives**, and **governmental organizations**. For more info go to the **KSE Mining links page**.
- Promise to help the Earth by signing the **Kids for Saving Earth Promise** with your parents.
- Reuse and recycle products. That means we will have less to mine from the Earth.
- Conserve energy because then we won't have to mine so much oil, gas, and coal.

