

GOLD

GOES

GREEN

WHAT DOES “GREEN” REALLY MEAN TO YOUR REFINER

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Provided by



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In 2008, green is the word. We’re buying more hybrids and fewer Hummers. We’re reducing, reusing, recycling, and composting. We’re drinking fair trade coffee and organic microbrews. Forget paper or plastic. Supermarkets are BYOB (Bring Your Own Bag).

Nearly every industry has been hit by green fever. The jewelry industry is no exception. Customers want to know where their precious metals come from and want to be reassured that the beautiful jewelry they love has caused no harm to the environment or to any workers involved in producing them. As always, customers want to wear jewelry that makes them look and feel good. That includes easing their conscience. They want their jewelry to be, in a word, green.

But what exactly does green mean? Ask ten people in our industry to define green gold and you might come away with ten perfectly reasonable but very different answers. Some might say it’s 100 percent recycled gold. Others would assert that it’s gold that comes from mines that respect the rights of workers and the environment. Others might tell you it’s a combination of the two.

And what about the handling of the gold after the mining process? Refineries and other companies must do their part to protect their workers and the citizens of the towns where they do business. How can we follow every ounce of metal to make sure it passes through a green supply chain? There is no definitive answer and no current industry standard. Green gold to one person might not be green to another. Within the green jewelry industry there are many shades of gray.

Recycling Gold

Conventional wisdom says that the greenest precious metals would come from 100 percent recycled sources. This is the narrowest definition of green. But how can you tell that your precious metal comes from 100 percent recycled sources? You can tell a lot about a refining company by their clients. Many companies specialize in refining precious metals from recycled materials. These might come from sources as varied as auto catalysts, photochemical waste, discarded electronics, jewelry, and other places.

Most refining companies, however, do not specialize in only recycled material. The reason is purely one of economics: The amount of precious metals obtained from recycled sources makes up a small percentage of the total market. According to recent World Gold Council statistics, about 70 percent of all new gold comes from mining while 30 percent comes from recycled sources.

According to the February 2007 U.S. Geological Survey, silver statistics are similar. If consumers demand that we submit to this narrow definition of green, then most of the gold and silver on the market would be considered unacceptable. If you think the price of gold and silver are high now, imagine taking 70 percent of the supply off the market. Not a very realistic situation.

So many companies are looking beyond recycling to see if they can buy gold that has been mined in a responsible manner. In response to customers’ and manufacturers’ increased demand for green precious metals, mining companies are doing a better job of protecting their employees and the environment.

Minding the Mines

Consumers are becoming more conscious of mining’s impact and are asking that the symbol of their love not be tainted by pollution or by human rights abuses. The trouble is, most of the people buying, selling, and making the products that use gold and other precious metals have very little information about mining’s impact on the environment and on the miners. Often we don’t realize that precious metals can, and in some cases are, being produced in ways that are far less damaging. So how can jewelry manufacturers and retailers be sure that they’re getting precious metals from ethical mining operations?

Groups from around the world have come together to educate those who make, buy, and sell gold products and to enlist their help in keeping what they call “Dirty Gold”—gold from mines that show little regard for human rights or environmental protection—off the market. There’s a real momentum that has built up, and now it’s not just human rights or environmental groups that are calling for change, but consumers, leading jewelry firms, and financial institutions.

One of these campaigns was started by Earthworks and Oxfam America. It’s called the “No Dirty Gold” campaign. It asks consumers to sign a petition calling for ethical gold and more responsible mining. These efforts clearly indicate that there is a market for ethical gold. The petition has already been signed by more than 55,000 consumers.

In order to maintain consumer confidence, jewelry retailers need to know that the gold they are selling is not produced at the expense of communities, workers, and the environ-

ment. To help them do this, No Dirty Gold created a document they call “The Golden Rules.” These rules call on mining companies to meet basic standards in their operations. As of February 2007, 21 of the largest jewelry companies in America representing \$12 billion in retail jewelry sales have signed “Golden Rules” pledging environmental and social responsibility.

All-American Gold Mining

The American gold mining industry has invested hundreds of millions of dollars in environmental protection and conservation projects. It has established or enhanced thousands of acres of wetlands and wildlife habitat, seeded thousands of acres of native grasses, planted tens of thousands of native trees and shrubs, and saved, protected, and provided habitat for wildlife.

American gold mining can boast many environmental success stories. For example, the 400-acre site of the Ruston/Tacoma smelter in Washington, operating since the early 1900s, will become part of the largest contiguous urban park in America. The McLaughlin mine will become a wildlife preserve and field research station for the University of California. The 50-acre Alto gold mine, located on a 9,000-acre cattle ranch in California, produced 8,500 ounces of gold, creating skilled jobs, and providing income to the local economy. Now fully reclaimed, cattle graze where the mine once operated.

The American gold industry is also helping to clean up mining environments in other countries. In northern Chile, Homestake Mining Company discovered isolated colonies of Andean chinchillas, and arranged for their protection through a special study

project with the Chilean National Forestry Corporation.

Barrick Gold Corporation discovered several colonies of endangered Trichahue parrots on the planned route of a road to its Pascua Mine in the Chilean Andes. Barrick rerouted the road and developed a protection plan for the parrots. Placer Dome Inc. has helped minimize the effect of mining on Misima Island, Papua New Guinea. The company works with local leaders to contribute positively to this remote district of 12,000 inhabitants, forming level areas from the mine’s soil for use by farmers.

The more consumers ask the tough questions about the sources of their precious metals, the more transparent the mining operations in all countries will become. This small step, started in the U.S., is now spreading to other parts of the world.

Greening Refineries

In the U.S., federal, state, and local environmental protection agencies create regulations for refineries to protect the environment and workers. In the U.S., we understand these are not negotiable and that noncompliance will be punished. We are a highly regulated country that takes our law enforcement seriously. A refining company doing business in the U.S. that is in compliance with EPA standards is not a polluter. They are, in effect, green.

Refineries in all states are regulated by one or more local, state, and federal agencies. Not surprisingly California is the most regulated. For a refinery to meet regulations, customers that have generated material considered hazardous must acquire an EPA ID number. This number is always required, regardless if they send it to

a refinery in the state or outside. The refinery may not need an EPA number but the generator in California is required. If you want to test the system then you’d better have deep pockets. Fines for non-compliant generators can be \$25,000 per day.

If you want to go even further, you can ask your refinery if they strive for low-discharge. Zero discharge refining is quite rare but low-discharge is still a serious effort to go above and beyond the already stringent government regulations. This might include processes such as evaporation, ion exchange, and reverse osmosis systems. These systems might include the treatment of gaseous discharge which requires scrubbers, activated carbon columns, and others.

There are many countries that take their environmental responsibility just as seriously. But how do you find out which countries have these regulations in place and the mechanisms to enforce them? Some might simply take the precious metal refinery’s word for it. Some would take the government’s word for it. Some might want to investigate by talking to people that have seen the operations first hand. Or you might want to see the operations yourself. There is no industry standard to determine this. Yet another shade of gray in green jewelry.

Fair Trade: Not Just for Coffee

But even if responsible, ethical mining and refining is possible, verifying it will be difficult even with the best of intentions. Gold must be purified and smelted, alloyed, and combined into forms that jewelry makers can then use. That means many more steps on the journey from mine to display case, and no easy trail to follow.

But the appointment of Michael Rae as president of the Council for Responsible Jewellery Practices is one sign that the industry is changing. He was formerly with the World Wildlife Fund in Australia, working the other side of the issue as an environmentalist. He says certified gold will require an entirely different strategy.

“Instead of a chain of custody, we have gone instead to a chain of confidence,” says Rae. He says that by this year the council hopes to have a set of processes and standards with independent third-party verification at every step of the jewelry creation and selling process.

Groups like Earthworks and Oxfam have donated money to groups that are attempting to establish a certification process for mining operations. This would be similar to the certifications that have brought about fair trade goods such as coffee.

One such company is The Fairtrade Foundation. The foundation coordinates fair trade labeling in 20 countries, and is working with a group called the Association for Responsible Mining (ARM) to explore how to develop the concept of ethical gold. It is a partnership that seeks to bring the Fairtrade Foundation’s standards and practices together with ARM’s knowledge of artisanal small-scale mining.

One place where the demand for ethical gold is already making a difference is Choco, Columbia, home of the Green Gold Corporation. Miners here receive a 10 percent premium for their work and ARM works to ensure that safety and environmental regulations are not only followed but exceeded. An estimated 27 square miles of rainforest have been saved as a result of these sustainable mining practices.

Fairtrade Foundation policy and producer relations officer Chris Davis is hoping to make the first certified Fairtrade gold available sometime in 2009.

Green Is Good

The world is rapidly shrinking. The economy has become truly global. We can travel from New Guinea to New York in less than a day. Nearly everyone in the world is our neighbor. Environmental destruction in one country affects all of us, everywhere. We are connected. Consumers are demanding that we be good stewards of the planet. This is making us take a closer look at our businesses and asking the right questions to assure our industry has a more positive impact on the environment.

There may be many shades of green in our industry, but in the final analysis, each shade is good. Because it helps make our industry and the planet stronger. Green is good. And it will continue to be good. Not just for the environment, but for business. Hopefully one day we won’t need to use the green distinction for jewelry. All precious metals, from silver and gold to platinum and the others, will be obtained responsibly, and these symbols of love can be symbols of our love for the Earth as well.

The Golden Rules

- Respect basic human rights outlined in international conventions and law.
- Obtain the free, prior, and informed consent of affected communities.
- Respect workers’ rights and labor standards, including safe working conditions.
- Ensure that operations are not located in areas of armed or militarized conflict.
- Ensure that projects do not force communities off their lands.
- Ensure that projects are not located in protected areas, fragile ecosystems, or other areas of high conservation or ecological value.
- Refrain from dumping mine wastes into the ocean, rivers, lakes, or streams.
- Ensure that projects do not contaminate water, soil, or air with sulfuric acid drainage or other toxic chemicals.
- Cover all costs of closing down and cleaning up mine sites.
- Fully disclose information about social and environmental effects of projects.
- Allow independent verification of the above.