# Wal-Mart: "Love, Earth" Jewelry

## Project Summary

"Love, Earth" is a branded line of jewelry developed and sold exclusively by Wal-Mart. The line offers traceability, from product back to mine, with mining company, refiner and manufaturer self-reporting against a set of environmental and social criteria. The current project focus is on large-scale gold operations rather than gold from smaller-scale placer or artisanal mines. The manufacturers are 3rd party audited against Wal-Mart's factory standards. The net result is that each key actor in the supply chain is subject to either a 1st or 3rd party audit.

## Project Description

Launched in July 2008, Wal-Mart's "Love, Earth" jewelry line allows customers to trace each piece of jewelry back to its mined source. Wal-Mart established an initial goal of having 10% of its jewelry be sustainably and ethically sourced by 2010 as part of a larger initiative to "green" its entire jewelry line, and promote broader company-wide sustainability goals. This has now been exceeded. The larger goal is to have 100% of the gold in jewelry come from mines that meet the Wal-Mart criteria.

While the program is directed by Wal-Mart, the supply chain relationships were built through partnerships with entities along their supply chain; for example Rio Tinto, Newmont Mining Corporation, Aurafin, and InterGold. Historic Futures provided a system that enables consumers to virtually trace their product back to the mine. Conservation International played a leading role in working with Wal-Mart to conceptualize and design the system, engage partners, and organize discussions with stakeholders. PACT is now continuing in the role that CI began.

Each supply chain partner involved in the "Love, Earth" jewelry line is required to adhere to Wal-Mart's Ethical Sourcing Standards, and is audited to ensure compliance. In addition, each mining partner is required to publically self-report on its progress in complying with Wal-Mart's responsible mining criteria.

Wal-Mart sought to engage companies, experts, and stakeholders to help define mine site focused environmental and social criteria against which companies would self-report. Therefore, it requested that companies and interested NGOs work to establish a set of initial criteria. Conservation International (CI) organized and led a discussion and negotiation that included mining companies and stakeholders. It is worth noting that Wal-Mart has been a participant in, and supporter of, the Initiative for Responsible Mining Assurance (IRMA) a multi-sector dialogue focused on environmental and social standards development in the mining sector. Wal-Mart was initially hopeful that it could simply utilize standards or criteria developed by IRMA, however IRMA is still discussing initial standards. Wal-Mart has expressed an interest in utilizing standards from any "credible, broadly supported" certification system. Wal-Mart has attended stakeholder meetings and maintains an open dialogue with the RJC.

Wal-Mart emphasized from the outset that this project is a test or pilot with regard to both the tracing system and the site criteria, and it did not intend to signal that the criteria utilized were in any way definitive, final, or static. Wal-Mart stated its commitment to improving its criteria as other organizations develop improved standards, and will consider adopting those standards.

The system is built on three key components: 1) the mine site criteria negotiated through a conversation organized and facilitated by CI and including NGOs, mining companies and Wal-Mart, 2) the Historic Future software that allows public or consumer tracking as long as coherent information can be entered into the database, 3) interested business partners at each step in the supply chain.

The Historic Futures system requires collaboration with the different actors along the supply chain. The system takes existing data already in the databases of the participating companies (from mining to manufacturer) and links them to wiki-based software so that the data can be shared downstream.

Wal-Mart took an important strategic and business decision, early in planning, to work with mining companies with large scale operations which matches their overall sustainability strategy of influencing other large business. These companies offer quantity and surety of supply necessary to work at Wal-Mart's scale.

**Nature of Supply Chain, Products and Issues**

Jewelry typically accounts for 70% or more of annual demand for gold, with electronics and dental accounting for approximately 11%. The percentage used in electronics has been growing in recent years.

Gold is unusual in that it plays an economic role as a store of value—creating market and demand dynamics that are different for gold than for metals that are treated as pure commodities. For Example, large above-ground stocks of gold are held by governments and investors.

Silver is more akin to a pure commodity; however there are very few silver mines in the world—most silver today is a byproduct produced when other metals, such as gold or copper, are the target.

Gold typically loses its track-ability as it moves through processing and into the economy. The supply chain for gold is complex with little or limited ability to track a particular atom of gold from a mine to consumer product without direct intervention. Provenance can be lost in the processing, trading, fabrication, and melting or re-melting of gold and gold ore. For example multiple mines can feed into a gold roaster or smelter. The exception is when a particular smelter or processing system utilizes inflow from one mining operation, or when inflow from a mine is significant and can be "batched" or tracked through the smelting process. When this occurs, it is then possible to take a marked "bar" or quantity of gold into the manufacturing process.

Large-scale industrial mines are usually part of the formal economy (i.e., they are permitted, pay royalties and/or taxes and subject to government regulations.) Large-scale gold mining is highly industrialized and technologically advanced. Mines are mechanized, require sophisticated planning and engineering, and are capital intensive. Most large-scale gold mines utilize cyanide as a processing chemical, to leach gold from crushed ore. While the use of cyanide has generated public controversy in some instances, other issues present more significant environmental issues and challenges—these include the potential for acid mine drainage and its affect on water, impacts on biodiversity, energy and water use, alteration of the landscape, and the potential for the release of mercury (from the ore body) into the environment. Development of large-scale gold mining can also raise issues related to indigenous rights, effective community participation in decision-making, mining's contribution to sustainable economic development, mining in conflict zones and conflict over natural resources, and other issues (MMSD, Newmont CRR, ICMM, Enough, Make IT Fair, Global Witness report.)

Note: The "Love, Earth" brand includes gold and diamonds. This summary focuses primarily on gold but the findings are similar for diamonds since Wal-Mart chose to source from the Argyle Diamond Mine in Australia, a large-scale mine operated by Rio Tinto.

## Analysis

### Supply Chain Complexity—Steps *(Complex)*

The supply chain is highly complex with regard to material flow in that gold processing from large-scale operations will typically draw from multiple sources. This results in difficulty, for most cases, in tracking sources or establishing provenance—as the materials mix in processing. Wal-Mart addressed this by working with larger scale operators who either a) draw from one source into a designated smelter or b) control sources and processing facilities such that they can batch or track materials flow. Wal-Mart also invited selected manufacturers to work on the product line. In essence, Wal-Mart partially engineered its own chain of custody by essentially identifying existing relationships and opportunities where mining companies also had control of or the ability to influence smelters. Wal-Mart then utilized a software system that allows consumer tracking by illustrating how its product went from mine to market.

### Formalization of Sector *(Formal)*

The supply chain is highly formalized in that Wal-Mart partnered with large-scale operations in the western U.S. These partnerships provided a solution for avoiding problems associated with the lack of transparency in some segments of the supply chain. It also negotiated with aggregators so that the system is built on business-to-business relationships, leading to Wal-Mart.

This type of approach could work for EICC-GeSI members if they find willing supply chain partners and they decide to focus on more formalized, large-scale sources—for example by

targeting smelters for tantalum, with sources originating from large-scale operations. To address the less formal ASM sector, additional strategies are likely to be required.

**Material Processing, Coherence *(Mixed)***

Gold is typically mixed in processing, fabrication, and trading—this is true for all EICC-GeSI target minerals (tin, tantalum, and cobalt.) Diamonds are not mixed as materials. Wal-Mart responded to this by creating a unique chain of custody.

**Significance in Product Composition *(Relatively Significant %)***

Metals in electronic products are typically parts of or ingredients in subcomponents or used to connect components. Each metal typically represents a fraction of the product. Jewelry products, such as gold and diamonds, typically represent a visible and significant portion of the consumer product. Therefore, EICC-GeSI companies would be pursuing a strategy where specific components or subcomponents had ethical properties rather than producing a fully certified or marked product. A tracking system such as this would have marketing limits in that the percentage of a product containing a responsibly sourced mineral would represent a very small percentage of a final consumer product. On the other hand, an approach like this, one that targets consumers and provides direct reporting and transparency, would increase stakeholder and consumer confidence.

**Issue/Source Geography *(Some Relevance)***

The sources selected by Wal-Mart are indicative of those that could be utilized by EICC-GeSI, at least to the extent that EICC-GeSI companies focused their sourcing in the large-scale sector. It is not clear if a system like this, which depends upon data collection and transparency, would work with ASM sources in DRC. You are likely to need collaboration along the supply chain rather than tracking technology.

**Stage of Development, Maturity *(Launched, and in First Phase of Implementation)***

This program was launched in mid-2008 and has been active for over one year, after taking approximately three to four years to conceptualize and develop. Significant learning is possible in the near future.

**Nature of Governance *(Single Company, with additional Company and Stakeholder Input)***

The “Love, Earth” jewelry line is fully owned by Wal-Mart and as a result all key decisions on the structure, timing, participants, sources and criteria ultimately rest with Wal-Mart. At the same time, Wal-Mart consulted with NGOs and companies on numerous occasions as it explored opportunities for action related to jewelry sourcing, worked directly with Conservation International to develop this program, and encouraged and supported dialogue across sectors in the development of the program. Wal-Mart generally established an open posture towards

participation while maintaining ultimate decision-making bottom-line control. Single-company direction and control probably allowed the project to move quickly to implementation.

**Standards Breadth or Focus *(Multi-Issue: Environmental and Social Objectives)***

The Wal-Mart criteria address a broad range of social and environmental issues. They also typically include evidence of community benefit agreements. As such, a similar approach could be utilized by electronics OEMs.

**Nature of Standards/Program Development *(First Party, with Input from Stakeholders)***

The criteria were established through a multi-sector negotiation that included participating mining companies and NGOs. The dialogue was led by Conservation International, who served as a project advisor to Wal-Mart. Wal-Mart established the context for a negotiation by stakeholders and companies by selecting Conservation International to organize and lead in this area, while continuing to maintain bottom-line decision-making authority. At the same time Wal-Mart asserted that it was seeking criteria that were satisfactory, at least as part of a test phase, to corporate and NGO stakeholders.

Conservation International organized a series of conference calls with interested stakeholders and circulated draft documents between calls. While stakeholders had reservations regarding some of the criteria, key NGOs participated in the negotiation and some expressed support for the criteria as long as they were seen as a first step to be tested and reevaluated. However when the program launched a number of NGOs publicly criticized the program both for the criteria and for shortcomings they saw related to local consultation and concerns related to participating mine sites. In response, Wal-Mart encouraged participation and emphasized that they would review the criteria and site selection in the future.

Both the criteria themselves and the process could serve as examples for EICC-GeSI companies, particularly if the negotiating process can be more inclusive but stick to a strict, business-driven timeline. It is likely to be essential to ensure stakeholders that any initial standards can be revised later.

**Approach to Verification *(First Party and Second Party)***

In regard to mine site performance, verification is first-party through participating mining companies' self-reporting against the Wal-Mart criteria. However, some of the reports they are utilizing to substantiate reporting are prepared by external auditors or reviewers. With regard to verification of the source or chain-of-custody, the program is highly transparent in that the Historic Futures system allows consumers to verify sourcing directly.

## Key Findings

Generally speaking, the supply chain for gold does not lend itself to a program that seeks to ensure a chain-of-custody from mine to retail. For large-scale gold operations, there is a high-

degree of formalization at the mine site, but gold typically mixes as it is transformed into a consumer product. For small-scale, artisanal operators the sector is highly informal at its source and this pattern continues with materials mixing and loss of provenance occurring at multiple steps in the chain-of-custody.

A jewelry product is relatively coherent, with a relatively short supply chain—when compared to most consumer electronic products. While a gold ring is not 100% gold, it does not contain myriad sub-components and parts that are in turn comprised of various materials. Therefore a jewelry product is more readily branded as "responsibly" sourced. This would be more difficult with electronics where a successful chain-of-custody approach could lead to, for example, the tantalum in capacitors marked as responsibly sourced, which makes up a very small percentage of the material in a particular cell phone. Note: the "Love, Earth" program also addresses diamonds which are sourced from Rio Tinto's Argyle mine.

Wal-Mart intervened in the supply chain to identify current manufacturers willing to participate in tracking material and product, so they could source directly from large-scale operations that operate in a formalized regulatory context. The program does not focus on the informal actors in the mining sector. In both cases, captive or nearby processing/smelting operations, or direct relationships between mines and smelters, were available and utilized so that the material could be tracked as it was processed. Application of this strategy in other sectors would require similar interest and cooperation on the part of miners, traders, and/or manufacturers. This specific strategy would not work when the inflow into processors/smelters comes from multiple sources, unless all of those sources were deemed acceptable.

The system encourages the idea of public/consumer tracking or traceability. However, it relies only on company self-reporting in regard to mine site performance, with some provision for Wal-Mart assessment or auditing. This leaves some stakeholders unsatisfied and the value of utilizing self-reporting could be questioned in sectors and/or regions with a history of corruption and/or a high degree of informality. However, it should be noted that Wal-Mart has expressed a commitment to systems with external verification if and when they are developed.

Wal-Mart committed itself to openness and transparency and clearly stated its willingness to update and improve social and environmental criteria. Wal-Mart's use of innovative web-based tracking technology designed by Historic Futures promoted transparency. However, the technology will only work if it is applied to an underlying, formalized supply chain; the technology does not in and of itself address supply chain challenges. This or similar mapping and reporting technologies could be utilized if willing actors in the supply chain for target metals were able to implement reporting at each key step in the supply chain. The system has been in place for approximately one year so it lends itself to initial learning.

Wal-Mart did not set out to create a new or fully vetted set of environmental and social standards for the program. Instead, it encouraged stakeholder negotiation based upon existing standards

and criteria—and it set a deadline. This led to a clear result, within a deadline, but a result that is not satisfactory to all stakeholders.