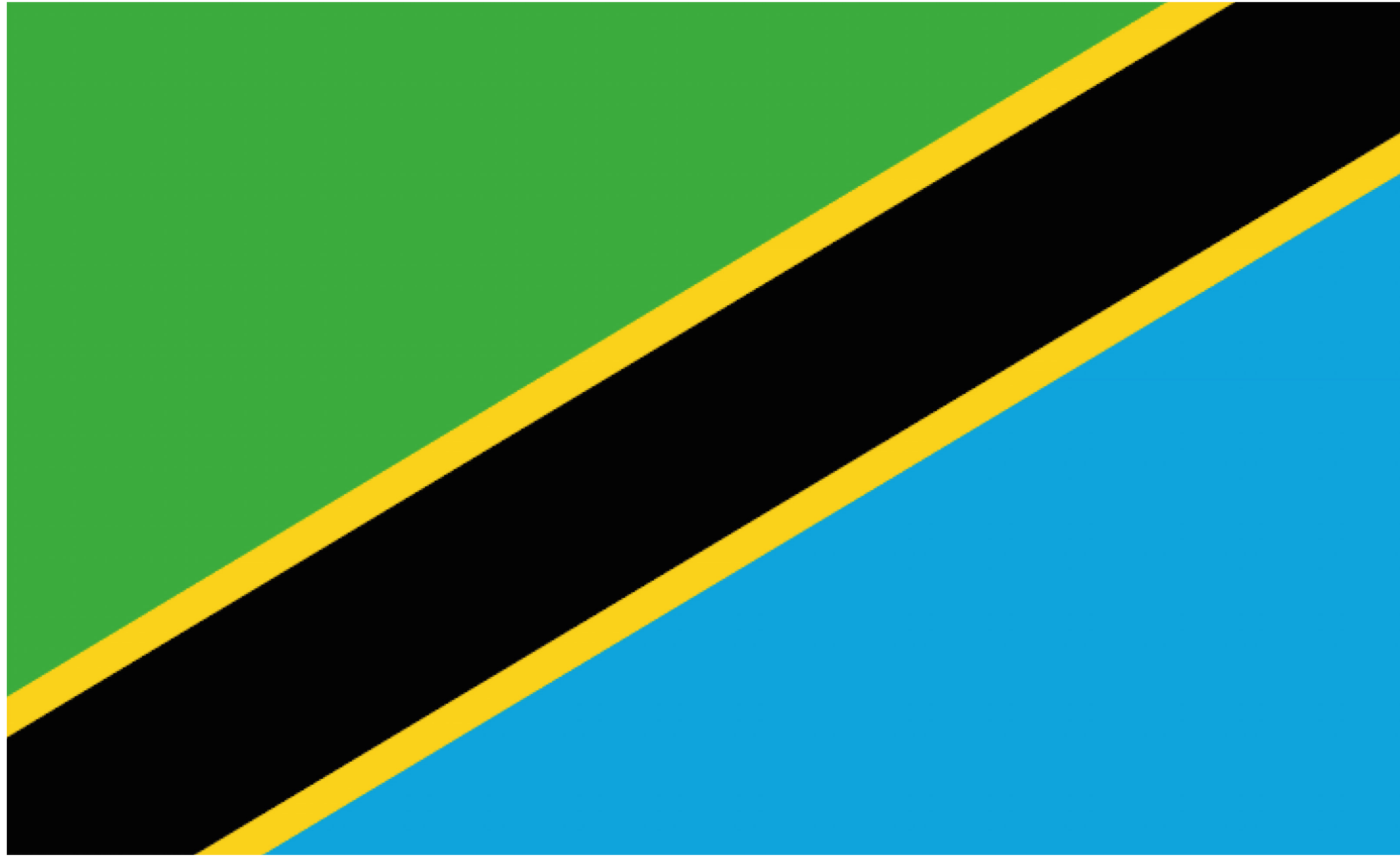


TANZANIA



Guidelines for management and disposal of empty cyanide containers

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In collaboration with the Government Chemist Laboratory Authority (GCLA)

INTERNATIONAL TRAINING PROGRAMME 308

Mine Water & Mine Waste Management



Sweden
Sverige



THE CHANGE PROJECT

Tanzania is in a mining boom with over 10 000 approved primary licenses (mostly small scale mining operations), 50 approved mining licenses (medium scale mines) and approximately 1500 approved gold processing and recovery facilities. Most of the mining licenses are gold licenses and the choice of mining and processing chemicals are important to provide the best yield with the least toxic footprint for the growth of the industry in the most sustainable way.

In Tanzania there is currently a change in use of chemicals for processing gold, particularly among the primary license miners. For a long time the gold processing has been carried out with the help of mercury, which is highly toxic and can cause damage to the nervous, digestive and immune systems, in addition to damage to lungs, skin, eyes, kidneys and even babies still in the womb. The miners have, since the Minamata convention was ratified, moved towards the use of cyanide instead of mercury. However, cyanide is also toxic and carries its own challenges. Contamination of water sources e.g. can lead to perishing of human and aquatic life.

There is currently no law regulating the handling of cyanide containers and when the containers are emptied of cyanide, many of them end up being sold at market places for domestic use. For the government officials, the absence of a regulatory framework on how to manage cyanide and cyanide containers makes it difficult to give proper instructions and feedback during the ESIA review process.

This change project, and its guideline, is a continuation of a previous ITP 308 group's work on putting in place a guideline for disposal and management of cyanide containers.



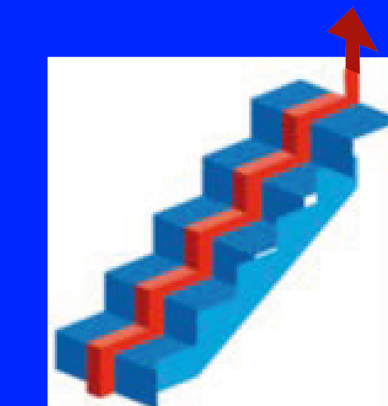
Empty cyanide containers being sold at a market place.



SIGNIFICANCE FOR THE PEOPLE AND THE ENVIRONMENT

Apart from the Minamata convention, there is one more aspect that makes the gold miners lean towards the use of cyanide instead of mercury for the processing. The possibility for a higher product yield with the use of cyanide instead of mercury in the processing phase provides an opportunity to earn more money for the same amount of dug out material making the gold processing more efficient and the miners more interested in using cyanide despite its toxicity.

Aside from the health and environmental toxic challenges with cyanide, the increase in use of cyanide in mining also brings with it an increase in the number of empty cyanide containers in Tanzania. Unfortunately, the drawbacks of the use and the dangers associated by using discarded cyanide containers for domestic use is poorly understood. Especially among the small-scale miners. Thus, information about how to handle the discarded containers and plastic enclosures and the dangers associated with use of cyanide, must be available together with a guideline on how to manage the cyanide containers.



RESULTS AND ACHIEVEMENTS

The group has continued to demonstrate the importance of the project to the involved organisations and have held further stakeholder meetings with the users, vendors and importers of cyanide in Dodoma and Mwanza.

The continued stakeholder meetings have yielded improvements to the original draft guideline and a smaller check list has been added. In addition, the collaborations between the sister agencies has continued. The current guideline proposal is with the GCLA for sign off.



Stakeholder engagement meeting



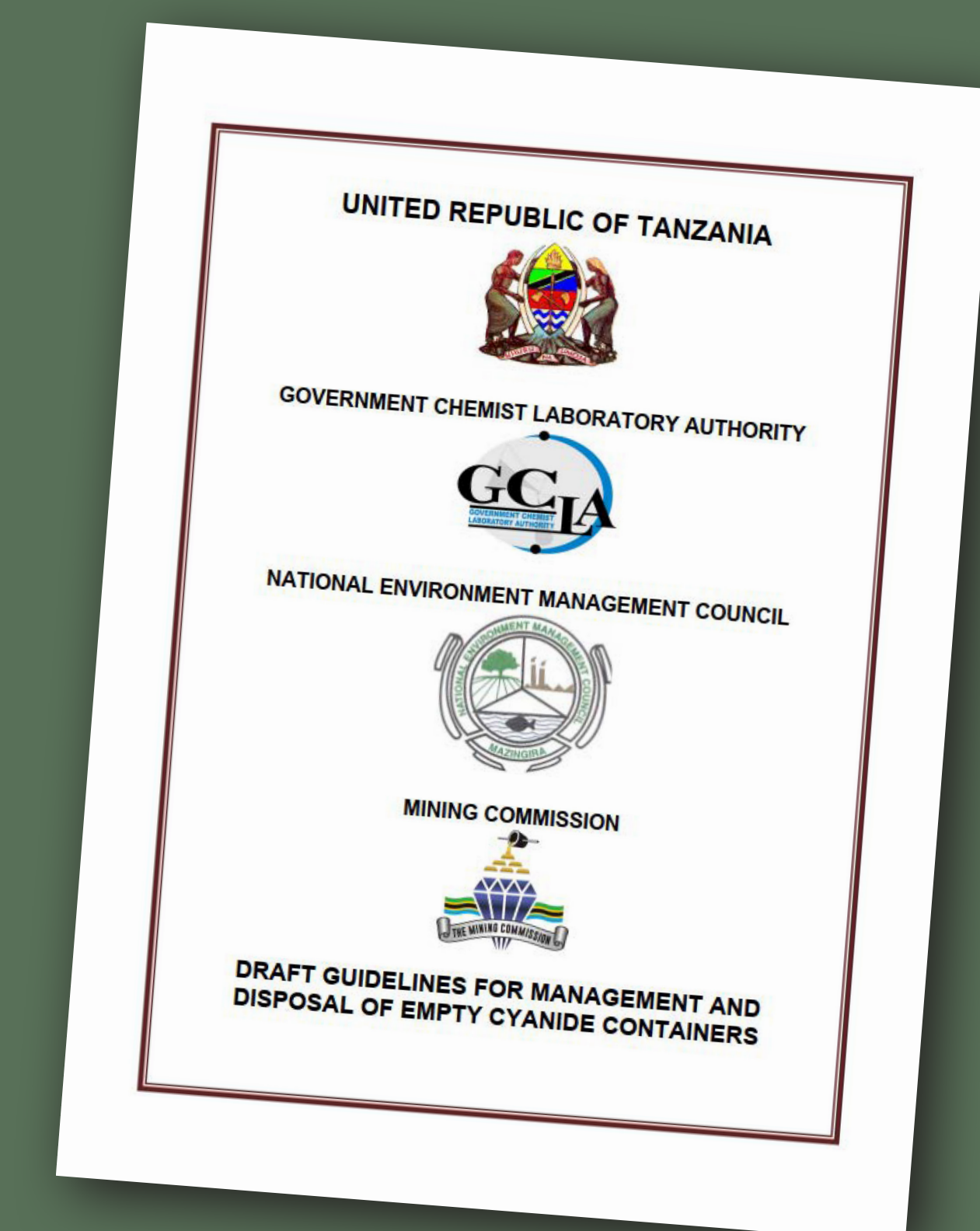
THE WAY FORWARD

The need to better manage and dispose of cyanide containers is a growing challenge for officials, local communities, the environment and Tanzania at large. To avoid damage to the environment and to human health there is a need to finalise the prepared guideline and even further the collaborative work with regards to cyanide containers.

The current collaboration between the various involved organisations (MoM, MC, NEMC and GCLA) is a prerequisite for the problem to be addressed thoroughly in Tanzania, and for the short-term goal of finalising a guideline for the management of cyanide containers to be realised. The document should be prioritised at the authority which holds the mandate to sign off on management of chemicals, the GCLA, for officials at the Mining Commission and NEMC to be able to carry out ESIA reviews, site inspections and give transparent and by law regulated advice to miners.

To reach the long-term goals to:

- A) safeguard human health and the environment as well as adhere to the Minamata convention and
- B) provide legal and informed guidance to all relevant stakeholders, the document also needs to be readily available for end users and mining communities. Training and sensitisation of end users by government officials should be carried out continuously.



Draft guidelines for management and disposal of empty cyanide containers