



Zangezur Copper Molybdenum Combine



Country: **Armenia**



Website



BHRRC company page

Summary

There are a number of noted human rights allegations related to Zangezur Copper Molybdenum Combine (ZCMC) and the Artsvanik tailings dam, including:

➔ **Artsvanik Tailings Dump and Impacts on Local Communities:**

Artsvanik is Armenia's largest tailings dump, filled with millions of cubic meters of toxic heavy metals. Many villagers claim the dump has severely impacted their health and crops; however, others say their health has not been impacted as much. The dump has also taken up massive tracts of arable land previously used by communities for their livelihood.

➔ **Heavy Metals Pollution and Health Impacts:**

A number of studies have found heavy metals pollution in the water, soil and crops near Kajaran. Heavy metals poisoning can lead to severe negative impacts for human health, including organ damage, cancer, neurological issues as well as physical degeneration.

➔ **Water Pollution:**

The Armenian Environmental Front claimed that, because of inadequate systems, toxic wastewater flows regularly into several rivers. Downstream of the tailings dump, there is no biodiversity, due to pollution and toxic elements. Additionally, ZCMC uses a massive amount of water which is straining local resources; water levels have been too low for small hydropower plants to produce electricity.

➔ **Right to Livelihood:**

Many residents allege that the tailings dam has had strong negative impacts on agriculture and livestock, primary forms of income and subsistence for nearby villages.

Human Rights Commitments

- ⊕ [Sustainability strategy](#)
- ⊕ [Sustainability approach](#)
- ⊕ [Social programs and community engagement](#)
- ⊕ [Environmental policy](#)
- ⊖ The company **did not respond** to our questionnaire of its human rights policies and commitments

Human Rights Impacts

- ⚠ Health and safety
- ⚠ Environmental and water rights
- ⚠ Right to livelihood and adequate standard of living
- ⚠ Community, cultural and property rights
- ⚠ Attacks on human rights defenders and labour activists

→ SLAPP Against Critics:

In 2019, ZCMC sued journalist Gohar Hayrapetyan over her report ‘Who Are the Real Owners of Zangezur Copper and Molybdenum Combine?’, as well as the media outlet that published the story. Hayrapetyan believes that the lawsuit is intended to silence media outlets that report problems related to mining in Armenia.

ZCMC has webpages about sustainability, social programs and environmental policy. The company did not respond to our questionnaire of its human rights policies and commitments.

Company Information

Zangezur Copper Molybdenum Combine (also known as Zangezour Copper Molybdenum Combine or ZCMC) operates the Kajaran mine (also known as Qajaran mine). The company purchased Ler-Ex, with a licence for the extraction of the Hankasar (Ankasar) copper-molybdenum deposit, but there is now a program for closure of the deposit.

According to the World Bank, ZCMC’s Artsvanik tailings dam is the largest in Armenia by far, and it makes up 75% of the total volume of all tailings within the country.²

Despite major concerns around health, livelihood and environmental damage, EBRD invested 2.5 billion AMD (\$5 million USD) into ZCMC in 2019. The investment was to ‘finance investment projects aimed at improving energy efficiency and CO2 reduction’. The project description says that ‘sustainability is now a key part of ZCMC’s business’ since a 2014 change with management. Rights concerns continue to the present day (see below).²

Cronimet formerly held a majority share with ZCMC; however, the company ceased to be a shareholder in 2019. ZCMC also repurchased securities owned by other major shareholders.² As of June 2020, shareholders primarily consist of individuals, including a Russian politician and several individuals with connections to the local and national government in Armenia.² The list of shareholders has changed frequently.

Human Rights Allegations

Artsvanik Tailings Dump and Impacts on Local Communities

Artsvanik is Armenia’s largest tailings dump, filled with millions of cubic meters of toxic heavy metals. This massive dump, which takes up 441 hectares of land, makes up 75% of the total volume of all tailings in the country.² There are a number of villages at the nearby area, including Artsvanik, Chapni, Sevakar, Achanan and Syunik.² The situation at the tailings dump has become so dire that residents of the nearby Kapan community have demanded that the area be recognised as a disaster zone. Kapan residents are also impacted by the Geghanush tailing dump (operated by [Chaarat Kapan](#)).²

Before the dump was constructed, residents raised concerns about land use, as villagers primarily used the land for their source of income and livelihood (e.g., grazing livestock and growing crops). Residents were allegedly promised that the site would be filled with tailings, covered to become a nice area, and then harvested. Within a few years, community members wrote an urgent letter to government authorities complaining that most arable land had been captured by the tailings dump. The letter, sent in 1989, stated, ‘Over the past ten years, we have witnessed violence against the environment that is a crime against us and our generations’.² The government, then part of the USSR, denied the claims.

Environmentalists have issued conflicting opinions about the exact impacts of the tailings dam. Some say that soil fertility has been damaged by up to 70%. Additionally, the dump has a high concentration of heavy metals, sulphur and other toxic elements; these elements can cause cancer, stillbirths, liver disease, bone disease, gastrointestinal disease, mental illness, coordination disorders and congenital abnormalities. There has also been an increase of mosquitoes, which can have additional health impacts. Other environmentalists see the dump as less of a problem, with problems primarily related to the sharp odour.²

Many villagers claim the dump has impacted their health and crops; however, others say their health has not been impacted as much. According to Hetq, those who approach the dump soon get a headache and feel unwell. One resident complained, 'Neither the young nor the elderly are in good health here'.² As early as 1989, residents complained of an increase of gastrointestinal, respiratory and peptic ulcer diseases.² Despite this, the Ministry of Health has never conducted targeted research to investigate the dam's impacts concerning the health of neighbouring villages. The Ministry stated that rates of these diseases at the nearby community are actually lower than national and provincial indexes. However, there is no data available about the health of the community before the tailings dam began operation, making comparison over time difficult.²

In recent years, ZCMC has given 40,000 drams (\$84 USD) per month to residents in villages north of the tailings dump. Villages to the west and south, Achanan and Syunik, do not receive this money, even though the tailings dam is less than 800 meters away. ZCMC says the money was given 'due to limited opportunities to engage in agricultural activities, in order to mitigate the adverse impact on the social situation of the Artsvanik tailings dump beneficiaries actually residing in the surrounding rural areas'. However, the payments are classified as a donation rather than compensation; according to ZCMC CEO Mher Poloskov, this is because the term 'compensation' implies unlawful conduct, losses or damages, which the company denies.²

Critics say that the phrasing of the donation is to deny impacts concerning the community's health and livelihood, and that the payments are intended to keep villagers silent.² Additionally, the agreement states that recipients 'acknowledge that the amount provided by this Agreement is a sufficient guarantee to change and improve their unfavourable social situation created by the limited opportunities to practice agriculture in their actual place of residence'.² The phrasing of this clause raises questions about recipients' ability to potentially seek remedy for impacts.

Cultural heritage has also been threatened; according to a historian, the area that is now covered by the dam previously held archaeological excavations, settlements, Bronze Age relics, a cemetery and gardens.²

Even though the dump is already the largest in the country by far, it has continued to grow. Villagers have expressed fear that the dump could cover their homes. The Ministry of the Environment found that the dump covered 18.55 hectares of community and state-owned land, stretching beyond the borders of company-owned land.

In 2015, the Armenian government acquired 492 hectares of land from Artsvanik, Chapni, Sevakar, Achanan and Syunik, pressuring residents to give in to demands. Originally, the government planned to seize the land using the basis of 'overriding public interest', saying the copper and molybdenum mine 'outweighs the interests of landowners'. After public outcry, instead of seizing the land, the government purchased it using ZCMC-provided funds. Due to public pressure, the land zoning was not officially changed.²

At the current rate, the dump is projected to fill within the next five years or so. An expansion could expand the life of a dam for an additional six or seven years; however, ZCMC has already started to look for a site for a new tailings dump.²

Heavy Metals Pollution and Health Impacts

A number of studies have found heavy metals pollution in the water and soil near Kajaran.¹² Heavy metals are highly toxic and remain in the environment for a long time—for example, through the food chain. These metals are absorbed into crops and, subsequently, consumed by humans.¹² Concerningly, heavy metals poisoning can lead to severe negative impacts for human health, including organ damage, cancer, neurological issues and physical degeneration.¹²

A study by Yerevan State University found heavy metals pollution present in agricultural land near ZCMC. The research found above-permissible concentrations of cadmium, nickel, zinc and chromium; researchers also found traces of copper, although the amount was below the maximum permissible level. Most concerningly, the researchers found large quantities of cadmium, an extremely toxic metal, in the agricultural crops. High concentrations of toxic elements were found in several crops, including apples, garlic and red beets. Potatoes, onions and carrots were also affected. The researchers emphasised the importance of soil renewal and remediation activities to remove the toxic pollutants from agricultural land.¹²

Communities near the tailings dump have complained about an increase with health problems since the dump was opened, possibly due to the heavy metals; however, the Ministry of Health says that the rate of disease at the nearby communities is actually lower than the provincial and national indexes (see above).¹²

Water Pollution

Activists have complained for years about toxic water pollution from ZCMC activities.¹² Wastewater discharges from the tailings dump several times per year. Hetq has claimed that the Ministry of the Environment has been hesitant to complete information about ZCMC's environmental violations and penalties for years. In 2018, the ministry disclosed that the company had been fined over waste leakages.¹²

The Armenian Environmental Front claimed that, because of inadequate systems, wastewater flows into the Norashenik and Halaj rivers, which then flow into the Voghji river. Additionally, the company takes 70 million cubic meters of excellent and good quality water from the Voghji and Geghi rivers; this water allegedly then flows into nearby rivers in unsatisfactory and bad quality.¹² The water that flows into the Norashenik river downstream from the dump exceeds the permissible concentration of waste materials.¹² According to Armenian Environmental Front, downstream of the tailings dump, there is no biodiversity, due to pollution and toxic elements.¹²

Allegedly, ZCMC illegally increased the amount of ore it extracted by several million tons per year, as reported in 2017. This resulted in excessive wastewater in the tailings dam and an illegal increase of environmental pollution.¹² Cronimet, the majority shareholder at the time, responded to the allegations by referring to waste management plans and reforms within the company. The company also said it adheres to national legislation.¹² Armenian Environmental Front responded, 'Cronimet says it is responsible, [but] ZCMC acts the opposite way'. The civic initiative went on to dispute the claims in Cronimet's response.¹²

Additionally, ZCMC has sought to draw even more water from already depleted and polluted rivers. A planned expansion of ZCMC's Kajaran mine would draw from the Voghji, Sakqar and Geghi rivers, which already experienced problems with lack of water. Even before the expansion, the water was too low for small hydropower plants to produce electricity.¹² In 2019, ZCMC applied to also draw water from the Pkhrut river, Dzagedzor river and Geghi river reservoirs.¹² The Ministry of Environment rejected this application.¹²

In 2019, the Prosecutor's Office of the Syunik Province launched a criminal investigation against ZCMC for contaminating the Voghji river with toxic waste. One of the pipelines of the Arstvanik tailing dump burst, resulting in toxic wastewater to spill into the river near the village of Nerkin Geratagh. According to the Armenian Environmental Front, it took ZCMC thirty - forty minutes to fix the pipeline; local activists claim that wastewater flowed through the river for ten hours after the incident. The wastewater contaminated the river again ten days later. During the initial spill, the wastewater entered a tunnel of the Jrakhor Hydro Power Plant; when the plant cleaned one of its tunnels, the trapped wastewater yet again entered the Voghji river.¹²

The Minister of Emergency Situations testified he believed the company tried to keep the accident a secret. ZCMC did not inform the Minister about the spill; instead, local rescue services notified him about the flood of toxic wastewater.¹²

Artur Grigoryan, former Head of the Nature Protection and Mineral Resources Inspectorate, said that because of the size and importance of ZCMC, it is unlikely the company will be held accountable. Even if found guilty, he said the company would likely only have to pay a fine. Grigoryan was dismissed from his position as he was concluding an investigation of the Zangezur combine.¹² At the time, he was gathering data about whether ZCMC met German standards—as Cronimet, majority shareholder at the time, is based in Germany.¹²

In response to Hetq's reporting, ZCMC CEO Mher Poloskov said that the company implements measures from its environment impact assessment and management plan. He also said the company monitors drinking water, surface water and local ecosystems.¹²

Right to Livelihood

Many residents allege that the tailings dam has had strong negative impacts for agriculture and livestock, primary forms of income and subsistence for nearby villages (see above).¹² From the beginning of the project, residents complained that the tailings dam overtook the most fertile, arable land. Within ten years, villagers claimed that yields had noticeably declined.

Residents at nearby Achanan say that their village used to be known for its beans, and they would sell crops in Kapan; now, villagers go to town to buy beans and other agricultural products, since they no longer grow in the area. Villagers also claim that the crops that do grow look mutated. Residents in Chapani complained that nut trees have dried up and bees have died off. 'The scary thing is that we do not know. At least they could call in specialists to see what's the danger', said one villager.¹²

Livestock have also been impacted. Residents in some villages claim they must graze cows near the tailings dump because of a scarcity of pastureland. Some cows have fallen into the tailings dump. Additionally, some claimed that cattle diseases increased after the tailings dump began to operate, and some have expressed concern about the milk and cheese produced by the livestock. As a result, some villagers in Chapni who used to raise cattle now keep only a few chickens.¹²

Heavy metals pollution has also impacted local crops (see above).

SLAPP Against Critics

In 2019, ZCMC sued journalist Gohar Hayrapetyan over her report 'Who Are the Real Owners of Zangezur Copper and Molybdenum Combine?'. According to Hayrapetyan, the company took a particular issue with her statement that 'the mines plunder the soil and leave us tailings dumps as a gift'. ZCMC also sued the media outlet that published the story.

Hayrapetyan believes that the lawsuit is intended to silence media outlets that report problems related to mining in Armenia.¹²

Human Rights Commitments

On its website, ZCMC has a few webpages related to human rights and the environment.

- ➔ [Sustainability strategy](#)
- ➔ [Sustainability approach](#)
- ➔ [Social programs and community engagement](#)
- ➔ [Environmental policy](#)

According to the company, 'Our focus on sustainable development provides the framework in which our business operates. This allows us to maintain a highly regarded reputation that ensures ongoing access to people and capital. This, in turn, helps us to deliver better return for our shareholders, manage risk effectively, reduce environmental impacts, cut operating costs, attract and retain high caliber employees and provide more business development opportunities. These factors help differentiate ZCMC from its competitors and contribute to our goal of being the undisputed sector leader in creating value for our stakeholders.'

The company does recognise its potential negative impacts, saying: 'We also recognize that, if not managed appropriately, some aspects of our activities have the ability to detract from sustainable development, such as options for the future use of water and land; amenity impacts on local communities; and greenhouse gas emissions from our operations and the use of our products. As a leading mining company, we face considerable challenges in mitigating environmental impacts, managing health and safety risks, and addressing difficult social and economic issues across our operations.' The company indicates it has set performance targets to meet these challenges. The company also points to its investments within the community and environmental protections, and it says that it has 'significantly revised operating plans without compromising our environmental, economic and social performance'.

Regarding the environment, 'ZCMC's Environmental Policy commits us to minimize the impact of our operations on the environment using risk management strategies based on valid data and sound science'. The company says it regularly undergoes internal and external environmental audits to assess compliance, management systems and practices. 'Employees at each site take personal responsibility for environmental stewardship and develop action plans based on audit results'. The full environmental policy is not placed on the site.

ZCMC did not respond to our questionnaire of its human rights policies.