





Sharing outcomes of interviews with local organized actors in Finland and Sweden

Earlier studies have consistently shown that mineral exploration can bring hopes but also fears to different actors depending on their personal preferences. The aim of the interviews with local organized actors, as part of the EU funded Horizon 2020 project **NEXT 'New Exploration Technologies'** was to better understand local actors' perceptions of exploration and other factors that are likely to affect their views on exploration and mining, including their views on regulations and exploration companies' communication and engagement efforts.

The interviews were conducted by Karin Beland Lindahl from Luleå University of Technology in Sweden, and Leena Suopajarvi from University of Lapland in Finland. They interviewed mining companies, municipality and business representatives, village associations, (Sami) reindeer herders, and NGOs in Gällivare municipality, Sweden which has a long history of mining and in Ylitornio, Finland where to date only mineral exploration activities have taken place. A further two interviews in Finland were made in the nearby village located in the Rovaniemi municipality.

Table 1. Socio-economic conditions in the two case study areas. Sources: Statistics Sweden 2020, Statistics Finland 2020.

Case Study	Gällivare 	Ylitornio 
Area of municipality	16,818 square km	2,213 square km
Population and demography	17,529 in 2019 Declining Elderly population	Around 4,000 Declining Elderly population
Unemployment	Stable low/declining 1.8 % in 2019	Varying, but currently lower than in 2000s. About 12.6 % in 2020
Largest employers	Gällivare municipality: 23.5% LKAB (mining): 13% Boliden Mineral AB (mining): 7.5% Norrbotten County (health care): 9.1%	Ylitornio municipality: 30% Decentralized small businesses (appr. 300 enterprises) in tourism, industrial production, traffic, welfare services etc.
Average income	Above the national average due to well-paid jobs in the mining industry	Low especially in “Lake Villages” where the majority of the residents are retired
Indigenous peoples and minorities	Swedish majority but with relatively large Sami and Finnish minorities.	Finnish population Not part of Sami homeland in Finland

An ageing and declining population bring similarities to both case studies. However, significant differences are observed when it comes to employment opportunities. With over 20% of the local workforce employed by two mining companies, the unemployment in Gällivare is much lower as compared to Ylitornio, where the unemployment rate stands at 12.6%. Well-paid jobs in the mining industry explain why the average income is above the national average in Gällivare. In Ylitornio, 40% of the residents belong to the lowest income group in Finland as their income is primarily derived from their retirement pension. Another difference lies with the fact that Gällivare municipality is home to indigenous people, including four Sami Reindeer Herder Communities (SRHCs) who practice traditional Sami reindeer herding.

To date, there has not been any mining activity in Ylitornio, but the locality has witnessed ten years of mineral exploration using new and more environmentally sensitive technologies. In Gällivare by contrast, active mining has been ongoing for decades and Boliden is continuously exploring new deposits primarily using conventional exploration technologies. The exploration company operating in Ylitornio, Mawson Oy, has been very proactive in their communication with the local community. Overall, actors in Ylitornio considered themselves as being well informed and perceived the quality of interaction as good. Swedish Boliden has an established relationship with the community and communicates as required by the legal

framework in Sweden, but has not engaged in particular outreach about exploration or exploration technology. The company is in constant contact with landowners, the municipality and the SRHCs, and interaction regarding exploration is hard to separate from their communication about many other mining related issues. Also, relationships have shaped over many decades. Boliden has been communicating directly with local actors that are affected by their exploration and planned mining operations. Sami RHCs are always informed by mail about exploration activities and provided with the specific working plans by the responsible authority. However, most local actors are informed through the use of the local media, public notices and sometimes through the organization of public meetings. Overall, the actors interviewed held varying opinions on the quality of this communication. The SRHCs experienced an overload of written notices and work plans and considered themselves to not having the resources to follow-up on all of them. Lack of responsiveness on the part of the companies, uneven power relations and unequal access to resources were common themes particularly among Sami RHCs and landowners that were directly affected by exploration and mine development. While some actors thought communication with the company worked very well, others felt there is room for improvement both in relation to communication strategies and company responsiveness.

In general, exploration technology was not a topic that engaged the informants and the informants' state of knowledge on this topic varied. In Ylitornio, the use of drones and other new technologies for the purpose of mineral exploration was familiar to some actors since Mawson had proactively informed local people about their use of new exploration technologies. In Gällivare, some actors, notably representatives of village associations, reported no, or little, knowledge about which exploration technologies are in use, while other actors considered themselves to be well-informed about the conventional exploration technologies used by Boliden.

The majority of actors in Sweden and Finland stated that less intrusive technologies are considered positive, especially if impacts, and in particular the reliance on drilling, can be reduced. However, several actors also stated that technology is not a major issue, and that other factors, such as the impacts of a possible mine, are more important in influencing their attitudes to exploration.

Most local actors that were not directly affected by exploration or mine development stated that their knowledge about the regulatory system is limited, but that they trust it is adequate. In Ylitornio, most of the actors did not have direct experiences on regulations, so their knowledge was limited, but they anyhow perceived the Finnish regulatory framework to be sound and working well. In Gällivare, actors had more experiences of exploration and mining, and their perceptions of the regulations was clearly influenced by their personal experiences and attitudes towards exploration and mining. While some actors trusted the system, others

did not consider it fair and legitimate albeit for different reasons. Landowners deemed it inadequate to protect land- and property owners' rights; business representatives were concerned with lead times being too long and inconsistent implementation; Sami RHC representatives did not trust the system because of its inadequate treatment of Sami rights and inability to address existing land use conflicts; several actors found it biased in favour of mine development. Unclearities as to how different regulations "talk to each other", how responsibilities are distributed between different state actors, as well as inconsistencies, delays, or biases, in implementation were issues which came to the fore in both case studies.

Most actors in the Ylitornio/Rovaniemi case experienced the environmental impacts of Mawson's exploration activities as very limited. This, together with their expectation that the possible opening of a mine would bring income and employment opportunities, are likely underpinning the generally positive attitudes to exploration that was found among most of the Finnish actors. However, negative positions were also expressed, particularly with regard to exploration in protected nature conservation areas. Some actors typically conditionalized their approval of a possible mine resulting from the exploration activities: *if* environmental issues are taken care of and *if* mining could bring work opportunities, it could be accepted. Those who strictly opposed mining in nature conservation areas or thought that mining would bring lasting harm to other livelihoods, for example to the traditional reindeer-herding, stated they would oppose the opening of a mine.

A significant factor in shaping the attitudes in Gällivare is that employment in the municipality is highly dependent on mining, a fact which was recognized by all actors during the interviews. At the same time, their personal positions on exploration varied significantly reflecting different experiences of the impacts. Whereas some actors approve exploration for new mines, others do not wish to have exploration aiming for the establishment of *new* mines in the area. A further segment of actors, e.g. SRHCs, stated they would prefer to see a restriction on all new exploration activities. Several actors also stated that their acceptance is due to the community's ongoing dependence on mining and lack of alternatives. Some pointed out that their own, or others' acceptance, could be higher *if*, for example, procedures for fair compensation and distribution of benefits were in place.

The interviews showed how both the way of communication and the quality of interaction can lead to improved understanding and knowledge about exploration technologies and, in some cases, to a higher level of acceptance towards exploration by local communities. However, our research also demonstrated that the most important factors affecting local actors' attitudes are their visions of the future, their understanding of sustainable development and their perceptions of impacts of mineral exploration and mining.

About the researchers who conducted and also analysed the interviews

“Drawn by a love for forests and a strong interest in environmental issues, I graduated from university with a bachelor’s degree in biology. But after some years of lichen, fungi and wetland inventories, I started to ask myself what really matters for the environment. What is most needed right now, more knowledge about the forest living species, or a better understanding of the social system governing the natural resources? So, I shifted to political science and started a graduate project which looked at local peoples’ relations to forests and forest conflicts in Sweden. Today my research continues to focus on the politics of natural resource management and conflicts, particularly related to forests, minerals and energy. Understanding how local people are affected, and actively consulting and involving them in all aspects related to natural resource management, are key for the legitimacy of resource-based businesses and the State governing the resources.”

Karin Beland Lindahl is an associate professor in political science at Luleå Technical University in Sweden



“As a little child born in Lapland, I always got very worried whenever adults discussed about hydro-power generating projects. How was I going to get back home if the water would cover the entire road to our village? Hardly coincidence I guess that I went on to study disputes about hydro-power construction in Lapland from master theses to doctoral theses. All along, I increasingly started asking myself what is the role of local people in natural resource governance? And for sure it cannot be coincidence either that I have been delving into the social and environmental impacts caused by mining projects ever since Lapland witnessed a mining boom at the start of the present millennium.”

Leena Suopajärvi lectures on environmental sociology at the University of Lapland in Finland (*Photo credit: Marko Junttila*)

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