

# Consultation and Forestry Co-Management in Northern Sweden

Last Updated: December, 2020

## 1 Part I: Static Analysis - Collective action

The forestry and reindeer herding sectors in northern Sweden utilize the same land and adversely affect each other's productivity. The common pool resource character of this situation has made it difficult to find ways to resolve conflicts, which could threaten the two sectors' continued co-existence. This land is utilized by two different groups of actors, those in the logging business, and the native Sámi people who have sole rights to practice reindeer husbandry. The former group is composed of large corporations, non-industrial private forest owners and the government who collectively amount to about 61,000 owners. The latter group, the Sámi, graze about 230,000 reindeer, distributed between 4,700 owners. The reindeer owners make up about 51 Reindeer Herding Communities (RHC) which are both geographic entities delimiting their respective grazing areas, and economic organizations representing their members' interests. The Sámi have usufructuary rights to the northern forest land for grazing their reindeer, but many in the logging business do not recognize these rights. Conflicting use of this common pool resources threatens the future of reindeer husbandry, which is closely linked to (and thus also threatens) Sámi culture, but it is not economically defensible to limit the loggers forest use. In hopes of reducing conflict, the Swedish parliament introduced consultation procedures.

### 1.1 The Commons Dilemma

- **Poor coordination of appropriation:** The commons dilemma arises as the two groups, loggers and reindeer herders, utilize the same forest land. Loggers do not respect the usufructuary rights of the Sámi to the land for reindeer herding and husbandry because they, the loggers, are the legal owner of the resource. Logging companies are most interested in final fillings of old forest stands, which are also the most substantial providers of the lichens needed to feed the reindeer. Consultation meetings between actors in both groups must be held before loggers can proceed with forest logging, but the Sámi have little to no power in these consultation meetings making them more like informational meetings about what will happen to certain forest stands.

### 1.2 Biophysical Context (IAD)

- **Natural infrastructure:** The forest land in question is in northern Sweden. The forests in this region of Sweden fall into two categories, old forest and young forest, and together they cover approximately 9.4 million hectares. This constitutes about 48(%) of the total land area, and the natural infrastructure here is an important part of the Swedish economy. The reindeer follow a natural migration cycle, grazing in the mountain regions, or forests close to them, during the summer, and in the forest region (closer to the Baltic Sea) during the winter period. The reindeer husbandry industry is dependent on old forests for the provision

of fodder since reindeer mostly graze on ground lichens (*Cladina* spp.) and, to a lesser degree, arboreal lichens (*Alectoria* spp. and *Bryoria* spp.), which are generally much more abundant in old forests than in young forests. The reindeer move over large areas of land and are highly dependent on free-grazing areas, so the land needed for reindeer husbandry is extensive.

- **Human-made infrastructure:** The only hard human-made infrastructure mentioned in the source document is roads built by logging companies to support the logging industry. Roads are built by first clearing forest before laying the road. The logging companies have maps and plans drawn up, but the Sámi do not except for a few RHC groups that have recently started putting their own reindeer herding plans together.

### 1.3 Attributes of the Community (IAD)

- **Social Infrastructure:** The various logging groups are composed of large corporations, non-industrial private forest owners, and the government who collectively add to about 61,000 owners. The reindeer-herding Sámi graze about 230,000 reindeers, distributed between about 4,700 owners. The reindeer owners make up about 51 Reindeer Herding Communities (RHC) which are both geographic entities delimiting their respective grazing areas, and economic organizations representing their members' interests. In the northern parts of Sweden, reindeer herders have legal rights to graze reindeer on lands owned by the state, forest companies and private non-industrial owners.

The Swedish parliament introduced consultation procedures in 1979, and extended them to cover a greater geographical area in 1999. These consultation procedures require logging groups to hold consultation meetings with the reindeer herders who use the forest area in question. While these consultation meetings were intended to reduce conflict between the two groups by promoting a platform for co-management, uneven power distribution within the meetings keeps this from being the outcome. Loggers have significantly more power than the Sámi because loggers have land rights to the forest and often do not respect the Sámi's usufructuary rights to use the land for reindeer grazing. Both groups agree that having more knowledge about the other industry, and having more trust between representatives of the two groups will help promote more equal power within the consultation meetings and promote co-management.

- **Human Infrastructure:** Human infrastructure within the reindeer herders is generally assumed to be high, as they have a long cultural history of reindeer husbandry in the northern Swedish forest area. Rules regarding the Sámi's usufructuary rights to herd reindeer on privately owned land is not enforced, and therefore not often recognized by other groups.

### 1.4 Rules in Use (IAD)

#### 1. Position Rules:

- Each logging and Sámi organization have representatives that communicate on behalf of the group in the consultation procedures. It is not clear how one becomes a representative instead of a general member. It is assumed that the process is different for each overarching group, and could potentially be different for each smaller organization too.

#### 2. Boundary Rules:

- Forest land may be owned by the government, logging companies, or private individuals.
- The Sámi hold the sole right to herd reindeer.
- The forest land is limited to that in northern Sweden, as those operating in the forests in southern Sweden follow different rules.

### 3. Choice Rules:

- The reindeer herding groups may herd reindeer on any private forest land in northern Sweden.
- Logging companies may log any forest after informing the affected reindeer herding groups.
- Logging companies may lay roads throughout the forest.

### 4. Aggregation Rules:

- A logging company must hold a consultation meeting with the groups of reindeer herders who will be affected by the companies upcoming plans.
- Logging companies understand that they do not have to take into consideration anything the reindeer herding groups say during the consultation meetings.

### 5. Payoffs Rules:

- There is little enforcement of regulations regarding the usufructuary rights of the Sámi to herd reindeer.

### 6. Scope Rules:

- The logging companies own the forest land.
- The Sámi have usufructuary rights to herd reindeer on privately owned forest land in northern Sweden, though these are not often respected by other entities.

### 7. Information Rules:

- Logging companies must share their plans with all affected reindeer herding entities.
- Logging companies provide maps and written plans during consultation meetings.
- Information is not provided to the reindeer herders with enough time for them to influence the plans.
- Some reindeer herding entities are starting to draw up their own written plans about reindeer husbandry to help communicate their needs to logging companies and the government.

## 1.5 Summary

Forest logging companies and reindeer herding native groups both have rights to the northern forests in Sweden. Logging companies have legal rights because they own the land, but the Sámi have usufructuary rights to herd reindeer on private land, and these conflicting usage rules promote a misappropriation commons dilemma. As per Swedish law the logging companies must hold a consultation meeting with the affected Sámi reindeer herding groups before logging a parcel of forest, but the Sámi have no power in these meetings to change the logging plans. Meetings are also not held far enough in advance for the Sámi to make new reindeer herding and husbandry plans that do not include the area soon to be logged.

## 2 Part II. Dynamic Analysis - Robustness

Given the source document, there is insufficient data to make any assessment on the temporal dynamics (resource and social conditions, etc.) of this particular common-pool resource. The contributors thus far have been unable to locate any specific updates for this case study.

### **3 Part III. Case Contributors**

- Leah Shaffer, School of Sustainability, Arizona State University.