5.12. Erosion

There is some erosion visible in the Vuotso region and that is mainly caused by human activities. Heikki Hirvasvuopio noted that there is not much erosion in other areas but some normal wearing on the tourist areas. “There is wearing and tearing where there is people. The ground is eroded in places where human has impacted the ground; say, on fell sides. Then the water erosion comes in picture and it starts to hollow out the paths that people have been using. But that [erosion] is not weather-related; that is caused by something else.” (Snowchange Vuotso Oral History Archive 2002).

Veli-Matti Mutenia had similar thoughts on erosion. “I don’t know if it really can be called erosion, but when you move around, forests are treated and such, that will leave tracks in the nature. People leave marks. The more people, the more those leaving tracks and marks behind. Tourism does contribute to erosion but it is not only that; all sort and every kind of human activity contributes to it. There are nowadays so many hunters, fishermen, backpackers and what not moving about in the forest. It has never been so many people here that what is today. The population of Lapland has increased; it’s never been like this. Sometime in the beginning of the century it wasn’t half the people here compared to this day. That has for sure increased erosion.” (Snowchange Vuotso Oral History Archive 2002).

5.13. Other Concerns and Perspectives for the Future

Hans Kitti was born in 1938 in Purnumukka and he went to school in Vuotso. His words of his own life tell much of the overall change in that has taken place in the area. “After school I took care of our reindeer with my brother, and I was sort of a caretaker at home. We had those reindeer that were used for pulling logs and timber from the forest. The hay was still made in the woods during my days. Well, that time came to an end and people made their own fields, and that was followed by the
era of tractors. Our neighbours bought a tractor too and used that to pull logs. The reindeer were not used to pulling anything anymore. I didn’t have any trade. At times I worked for the Metsähallitus (National Board of Forestry) and then I was unemployed again. In 1974 I got a job at finding ore. That’s what I did ever since, until 1993 when I retired. 20 years passed there. At first the job was here in North Finland but that was slowly cut off. And then I had to travel around Finland doing my job.” Armans Sieppi sighed and said that reindeer herding used be a profitable source of income. “It sure would be good that there’d always be work for everyone. But today the jobs are hard to find for sure -at least up on these latitudes.” (Snowchange Vuotso Oral History Archive 2002).

There is a concluding note from Veikko Magga that he voiced in relation to a question on how people and animals have adopted to all the changes taking place in the nature and normal life. He said: “Nowadays people are so busy all the time. It never used to be this much hurry in the olden times. This has changed.” (Snowchange Vuotso Oral History Archive 2002).

A statue carved and left behind by the loggers. Picture: EM
6. Conclusion to Part I

A River flows through the aapa bogs. Picture: EM
The events surrounding the forced destruction of the Kemijoki River and more precisely the Sompio Sámi community tell a tale of misuse of power against a people and a whole ecosystem. We have traced the cultural landscapes of the region prior to large-scale outside influences, arrival of the North Sámi to Vuotso in late 1800s as a result of closures of nation-state borders and the events connected with the arrival of Finns to the community in 1920s. Other factors contributed to the migration too.

We have learned of the damages brought by the arrival of roads and the destruction caused by the Second World War. The first dams of the Kemijoki River, which eliminated its salmon stocks from 1948 onwards, followed this. Simultaneously we have learned of the forced assimilation policies of the Finnish state against the Sámi. If you spoke Sámi language at school you were punished. There were physical and psychological pains the locals endured. By 1960s the hydroelectric stations had been constructed all along the river. Finally the headwaters of the river, the home areas of the Sompio Sámi and Finns, were to be flooded.

Violence, threats, alcohol and misleading were among the tools that were employed to acquire the lands away from local control to the hands of the Kemijoki Ltd. Massive clear-cuts destroyed the reindeer pastures and caused changes to the local ecosystems. Once the road to construction was clear the waters started to rise. Whole Sámi villages were burned to the ground. Some of these villages had survived Russians and Germans and the Second World War.

Refugees from the surrounding villages were packed into the Vuotso village in 1970s with indecent housing and culturally inappropriate social conditions. The new realities of the uprooted people drove many to suicide and to the bottle. Families suffered and linguistic and social networks, carefully built over decades, were totally obliterated.

The people tried to cope with various ways, by engaging in the newly created opportunities for fishing, by continuing reindeer herding under new conditions, by moving away, by forgetting and just by surviving. The silent death of a people was completed without a single outcry from the European defenders of human rights. Cultural genocide of the Sámi and local people of Vuotso took place through the last decades of the 20th Century - in quiet, in silence and silenced.

The logic and decision-making that drive such processes are present today in every aspect of the western societies. Therefore the experiences, which have been highlighted in this book, link to contemporary processes, especially regarding energy production and climate change. Only by understanding the past and its untold histories we can come to grips with the present.

The story of harnessing river Kemijoki and enacting the cultural genocide against the Sámi of Vuotso and other local people is taking place today in South America, Africa, India, China and many other parts of the world in the name of adaptation to climate change, sustainable development and clean technology. Many of the people damaged in these processes never get their voices heard. It has taken over 40 years for the Sámi of Vuotso to be able to present their views in international arenas related to the United Nations. And the process is yet even to fully begin.

One of the problems of the post-war Finland that contributed to the events of Lokka and Porttipahta was a society that did not allow checks and balances of use of power that are present in other countries. The problem was not the information or the materials related to the crisis, the problem which persists in Finland has to do with the fact that power centre does not allow critical debates or changes to take place.
After decades of such misuse of power the public in Finland is tired, powerless, cynical and in a state of apathy. Therefore social change and reforms that would be driven by critical debates in society do not exist. Adaptation to challenges of climate change cannot take place if the similar people as the ones who constructed Lokka and Porttipahta make the decisions.

Questions of Indigenous rights and hydroelectric developments offer us a surprising comparative view if we look to other societies and countries. The basic problems are present in other Circumpolar societies. To offer an alternative take of a very similar process as Lokka and Porttipahta we can turn to Norway. In late 1970s and early 1980s the Alta River was WREHÀRRGHGIRUHQHUJ\SURGXFWLRQ7KH Sámi from Sweden, partly from Finland and mostly from Norway enacted hunger strikes and big political protests using the tools available in the Norwegian civil society to highlight the damages Alta plan would bring to the Sámi society and reindeer herding (Magga 2000: 250).

While the hydroelectric station was eventually constructed and the areas flooded, Alta was a turning point for Sámi in Norway. It led to increased recognition of Indigenous rights. Norway ratified the ILO 169 Convention on these rights and the support for Sámi culture, politics and languages was increased. The forced Norwegianisation of the Sámi ended, at least officially (Magga 2000: 250).

While problems persist today Norway leads the Nordic countries in the support for her Indigenous peoples. These remarkable events were achieved through the public protests the Sámi were able to conduct and eventually they started to get critical mass of public support from other parts of the Norwegian society (Magga 2000: 250). The big difference between Lokka and Alta is that there is no strong civil society in Finland, which would have enabled similar tools for the Sámi and other interested parties to change the situation.

In Sweden the hydroelectric power has destroyed habitats and Sámi home areas in the north in a similar fashion. The municipality of Jokkmokk is located on the Arctic Circle and is Sweden’s second largest municipality in terms of size. The total surface area is 19474 km². It is predominantly a Sámi area where only the Sámi can conduct reindeer herding.

Hiltunen et al. (2004: 261-273) worked in the community in the early 2000s to collect oral histories and observations of ecological changes that the local Sámi have. Per Ola Utsi is a reindeer herder in Sirges sameby, the largest Sámi village in Sweden. He is also a handicrafts teacher with nearly twenty years of experience in Sámi Åhpadusguovdasj (the Sámi Educational Centre) in Jokkmokk. He lives in Porjus about 40km north of Jokkmokk.

He has experienced firsthand the effects of the quest for a higher standard of living in 21st century Sweden. “They say that waterpower is environmentally friendly energy, but I say that stands for those that don’t live here. For those of us that live next to a big reservoir it isn’t environmentally friendly. It is inflicting damage. My way of living is damaged. My environment is damaged. My source of livelihood is damaged. You have to take another perspective. You cannot say that waterpower is green energy. It is a lie. It is green for some, but not for me. This point is easily forgotten.” (ibid. 2004: 261-273)

Bertil Kielatis, the chairman of the Sirges sameby specifies the situation: “The whole River Luleälven is regulated all the way from the coast to up here. So, in this area we have thirteen (13) power stations built over our pasturelands, and that is a lot of land we have lost because of this water regulation. We had to change our migration paths, and it was a lot of arduous work. We had to move the homes of those who lived closer to Lake Akkajärvi [in Swedish Akkajauvre].” (ibid. 2004: 261-273)
Kielatis goes on to say: "I feel we have been suffering so much because of the hydropower. On the other hand, the society demands it, but we’ve had to suffer too much for it, lost so much land. The lowlands that we have lost are the areas of least snowfall and the most suitable for vegetation to grow. Those are gone." (ibid. 2004: 261-273)

Gun Aira, a Jokkmokk native, a reindeer herder who during winter works as a teacher in a Sámi elementary school, has noticed the changes in the nature especially in the autumn and wintertime. She states that one of the biggest concerns for reindeer herders living in the area are the regulated rivers since the ice has become unstable. “It’s hard to even think about moving with the reindeer along the river. Sometimes it is possible if you move earlier in the spring but then you must be very observant.” But even the unregulated rivers can be dangerous. “If there is not much snow the ice is stronger. Last year there was much snow so the ice wasn’t thick. It changes from year to year.” (ibid. 2004: 261-273)

Similar experiences can be collected from the Cree of Northern Quebec in Canada with their experiences of the Great Whale River and other developments, the Evenki of Iengra in Republic of Sakha-Yakutia, Siberia, Russia and from other parts of the Arctic. The construction of hydroelectric stations operates at the Arctic peripheries where the impacts remain but the profits and gains are taken to the capitals and more populated areas in the south.

By exploring and allowing these marginalized peoples to have their say on the issues of development and land use we are able to have a full view of the situation in which we are. At the same time by exploring the damages caused by the nation states in the Arctic we can better understand the contemporary discussions in other parts of the world regarding hydroelectric construction, energy politics and climate issues.
Part II
Pekka Aikio:
When Electricity Was Sown

1. How It Was Experienced

Small village was living in peace and quiet. Dark smoke from the smokestacks of small pine-log cabins was circling into the clear spring air. Snow banks were gleaming with the sun that shone across the Posoaapa bog. One by one the villagers woke up. On these same ridges there used to be a village of turf huts. Ancestors who had migrated from the west, from borders of Norway and Sweden had decided to settle in this spot in the previous century. There was the Old Man Lassi, Grandfather Jouni, family of Nilla, Iisko and Jussa lot, relatives and families of Niku and Pieti. There were many more people also there. Children of these people had built the pine-log cabins here. From there people had expanded and renovated the cabins, little by little.

Now this former village of turf huts had grown into a community with several houses where a content and peaceful reindeer herding people lived. Their everyday bread and butter was looming and migrating around in the surrounding marshlands and fjell ranges. Things had been like this for a long time. Each of the families had their own reindeer pastures. After the big corralling and

Kututra, a Sámi man with his family in 1800s.
Picture: KG, University of Oulu Library Archives.
round up which took place in Vuomaselkä ended each family brought their reindeer to their respective pastureland.

In the summer the reindeer were all together in a big herd. This is when they went up to the fjells behind Luirojärvi lake. All the people from the reindeer village rushed to the mighty Sokosti fell to mark the young calves. A glimpse of the success of calving could be seen then. In this occasion different reindeer owners marked their own calves with their mark to the ear of calves. In late summer when autumn was almost coming and the nights became darker reindeer herds came down to the marshlands surrounding the village. There reindeer ate himself fat and brought up the young ones. The surroundings of the village and the Posoaapa marshlands were widely known for the different plentiful and varied plants that grew there.

Pieti had visited the neighboring village. Very early in the morning he set off to return home. He had heard strange news. Therefore he was in a rush to hurry home. Kneeling down in the front of his sled he rushed his pulling reindeer to make speed. Just when the morning coffee was about to be ready Pieti arrived in the village. Neighbors gathered to the small cabin where Pieti lived to hear the news from the world.

A few years before war had ravaged these lands. Many young people from the reindeer village had been killed in the conflict. Reindeer herds of the village had sustained severe losses during the war. Military troops had stolen reindeer. Wolves had killed many because the herders had been away fighting in the war. A herd that used to be 10 000 head strong had diminished into a couple of thousand animals. Since those times some recovery had taken place. The herd was almost up to ten thousand in number again. Combined with the catch of whitefish from the lake Sompusjärvi, reindeer that were running around in the local pastures guaranteed food for the village.

When people in the village saw the rush in which Pieti was they were thinking that the war had ensued. When Pieti came into the cabin he was full of energy. “There in Mutaniva community they have purchased reindeer family areas and other lands too. People have received big money when they sold their lands. They plan to sow electricity here! All lands, all the old fields, all cloudberry marshes and all potato areas will be sown with electricity! They say that it is a magical substance, this electricity! There is a man from Kemi who goes from house to house and pays for each piece of land. I saw this man with my own eyes. He said that things would be much better for us when we sell our houses and our lands. Money will flow here and you can even buy horns on your head if you wish to! Electricity will grow well in these lands – that is what the big men have studied and confirmed. You have not seen this electricity. It is a substance that makes miracles. It provides light and warmth and in the summertime it will freeze the fish so that they will not rot. It will make all things you order it to make. It will even make money!”

These were the tales that Pieti told to the other people in the village. He was filled with excitement. He had witnessed how some of the men from Mutaniva had already sold their lands and were leaving for the south, to be closer to the sun. One could eat buns there, grow apples, drive cars and see moving images there all the time. People could just live and let electricity do all the work for them. And electricity would bring them money too. Life would be so easy.
With these thoughts Pieti had decided to sell his cabins and small lands. He would give up his possessions to the big men who sow electricity. Let electricity grow on his lands. Then we will see what kind of a plant this electricity really is, he thought.

Jussa listened in silence to the tales and stories Pieti told. It seemed so strange that such a plant, ‘electricity’, would grow in these conditions. He said: “You Pieti are rambling and hallucinating if you believe the promises these men are making. I do not believe that such a miracle plant would grow here. I have heard their promises before and they are all lies, big lies. Their purpose is to drive us away from these good lands. We have built our warm cabins here, reindeer pastures are good here. There is plenty of fish in the surrounding waters. We have achieved all these good things with our own work. I will for sure not trade these good things for some ‘electricity flower’ or money. Believe me Pieti, you will be severely disappointed if you sell the lands and small cabin you have inherited from your father. The money you would get from them will be so light that you will not live long with that.”

Pieti looked at the floorboards for a while in silence and said: “But many of the men along the river have already sold their lands and houses and received great funds. Many of them were driving around with one of those new pulling reindeers. It made a buzzing sound like a bee and was so fast that your best pulling deer from the races could not catch it. Many of them have bought these new ‘pulling deer’ there”.

The man who sowed electricity visited the village several times. He boasted about all the good things that would come when people sold their lands and huts to him. "I will give you a million in old money”, he would say. The word ‘million’ was so powerful that Pieti decided to sell the lands and the cabin that he and his father had built. There was plenty of grass on that site for the cows to feed through the winter.

When Pieti had sold his place also others came along slowly. Many people sold their properties. Electricity men would scare those who did not sell that by saying they would come and use force to get the houses and lands if people did not sell voluntarily.

Jussa remained strong to the end. He said to the men: “I will not sell my log cabin nor my lands. I have lived here with my family and eaten bread here. This is enough for me. I do not believe your promises of better things.”

Jussa explained to his neighbors that many times before other people had tried to drive them away from their homes. He remembered how 60 years before he had been fishing on
these same lakes with his father. Local sheriff had come and confiscated their boats, nets and fish. The man had poured all the fish back into the river. Jussa felt that good fish had been thrown away all for nothing. This man had threatened to break their turf hut and drive the whole family away. Jussa remembered this with bitter memories. He remembered in later times how the local sheriff in the round up in Hammasaavaara had come and confiscated his best female reindeer as meat. He had taken a whole bunch of them in exchange of a meager payment. He would have gladly given reindeer that mattered not so much but the man had taken the best females from the herd. This was in the wartime.

Strange thoughts went through Jussas head. He did not know all the law texts and articles from book but his sense of justice drew the line between right and wrong. This miraculous voice whispered in his ear: "Nobody has the right to destroy your livelihood or to drive you away from your own cabin."

Reindeer village emptied through the years. Only some of the log cabins still had fires burning. Big noises could be heard from the river. The sowers of electricity approached cutting down every single tree. Machines were piling trees up and ruining the lichen at the same time. Machines were turning the lichen pastures up side down and black soil came to the surface. Reindeer could no longer be fed on those age-old pastures of lichen. They ran in all directions, to the neighboring reindeer villages and even to other municipalities. They were running around the province. Herds of reindeer died.

Down at the river bank houses were dismantled and taken away. Buildings in worst condition were burned to the ground. Sacrificial smokes from those fires lingered over Posoaapa bogs over many summers. There was a sense of end of the world. River had been dammed from downstream. Waters started to rise.

Many of the people in the reindeer village returned from the south where they had gone in the early days. Pieti came back as well. Jussa still lived in his cabin with his family. He had been fishing and trying to herd the reindeer even though the pastures had been destroyed.

It felt bitter to let go of the old livelihoods. Last summer they had had a good berry crop. Jussa and the family had collected large quantities of cloudberries. When Jussa now looked outside his window he could see how waters rose to cover his berry picking marshes. He could never go there again. Pieti was sitting on the cornerstone of his old cabin, which had been torn down. Sowers of electricity had taken it away. The foundations had been burned and a quiet smoke rose from the embers to the morning air.

Jussa came by and said to Pieti: "It seems they did not have time to sow this electricity on these lands that you used to own before the waters came up." There they sat, the last inhabitants of that village, in silence and in somber moods. Waters rose up slowly and covered familiar landscapes. There was no trace of electricity anywhere. The only thing around was a lot of water. You could not hear the sound of reindeer anymore from the direction of Posoaapa marshes. It felt like the end of the world had come.
Machinery and equipment of the loggers in the 1960s. Pictures: EM
Fish caught from Lokka. Ossi Keskitalo (left) and Oula Aikio (right). Picture: PA
2. What Oula Aikio Is Telling Us Through His Diaries

In this part the actual diary entries and unique reflections by Oula Aikio are shared between 1961 and 1969. The 1960s marks the time of increased pressures on the community to yield to the pressures of hydroelectric development. Observations of weather and ecosystem changes in addition to the reindeer events emerge into view. This material has not been published before.

The first snow came late in 1961. Oula Aikio wrote in his diary on 4th November “the first snow came now this autumn. The soil is not frozen and all rivers are still without the ice cover”. Still in the middle of November there was no snow. Then suddenly on the 17th it had snowed a lot, but the rivers were still free from the ice. Only on November 19th the thermometer displayed almost 20 degrees below zero.

In 1962 the snow cover reached almost half a meter at the end of October. In 1963 there was a heavy snowfall in the middle of June. The calving luck has been great and there were plenty of reindeer calves in 1963. Altogether reindeer herders had 11 calf marking days. My family gained good harvest from hayfields, plenty of potatoes, cloudberries and blueberries. Only fish was lacking, we hardly see any in the nearby river during the whole summer. People were reflecting that fish might completely vanish from these waters.

Bright autumn colors appeared in the beginning of September in 1963. Aslak Hetta and Niilo Hirvasvuopio were elected as new leaders in the reindeer community in the autumn meeting of Paliskunta (reindeer herding municipality) in September 1963.

Remarkable activities of logging are visible (in Mäkärä community). More and more big loads of timber are transported on the road. At the end of October the waters run still open, with no ice cover. The thermometer shows +6°C and the snow has disappeared, the whole autumn has been remarkably mild. Men are looking around; they want to find their reindeer. At the end of November it is snowing hard, but so far we have had only 20 cm of snow. On November 22nd the blizzard is unusually hard when the extra breaking news in radio are telling us that US President John F. Kennedy has been assassinated in Texas.

Until the New Years Day the weather has been mild, no real frosts. A hard frost came finally in February. On 24th March 1964 in Vuotsa School there was an informative meeting for the local people. The old school was full of people; it was crowded in every room. It seems to be true that the artificial lakes will be constructed.

Paliskunta (reindeer herding municipality) has an open border to the North. In fact these neighboring herding cooperatives have cooperated in marking calves and searching and gathering of reindeer. At the end of April 1964 cooperatives made a temporary bookkeeping regarding the common activities. Cooperation will continue on to 1965. Hard snowstorm continues.

In June 1964 cold weather continues. Every day the river has given fish to eat. On 24th August 1964 the Kemijoki employees came with the markers, which then will show how high the water level of the man-made lake will rise. Weather has been unstable; the first snowfall appeared on 11th September. At the end of October it gets colder. It seems that it will become good layer of snow on the ground.

Another meeting on artificial lakes in May
1965. Cold in June, snowflakes are flying. Lots of raining through the entire summer. The radio knows on 13th August 1965 that a preceding summer like this has been in the year 1891. The river has been flooding. The sky and the Lord himself seem to be crying because of the forthcoming deluge. The first week in September is sunny and beautiful. First snow appeared on 9th October. The freezing snow cover.

On Christmas day we brought our draft reindeer home with a tractor. One of these had come by himself and we found him satisfied lying with those other draft reindeer that where tied on trees.

January 1966. Radio is telling that a house in Vuotso has been burned, India and Pakistan are negotiating on peace, Kosygins representative has travelled to North Vietnam, the subway system in New York is on strike and our reindeer round-up separation has been announced. This winter will be very bad for reindeer, lichen has frozen and reindeer can only see it just like through glass (there is an ice layer on top of the lichen preventing reindeer eating it). There is nothing to praise in the life of a reindeer. It has been often cold, close to -40°C. On the 1st February the thermometer shows -49°C.

March 19th 1966. Yesterday we had a visit by the Kemijoki Company and the Governmental Committee for Water Construction. They wanted to buy about 30 km reindeer fence between village of Lokka and Jaurijoki River. Paliskunta did not agree.

On April 4th the meeting of the Water Rights Court of Northern Finland was held in Vuotso. Lapin paliskunta left a claim for compensations for the reindeer pastures, which are going to be destroyed by the Lokka man-made lake to the court. On 28th April there is information that people may get new lands where to build. They have waited over a decade for this information. Reindeer herders have nothing but a bleak future to wait for. The reindeer have been chased away from their old grazing grounds and so they have dispersed to the neighboring cooperatives, where they are dying and destroyed every single day. The old way of herding would be the only way to safeguard the future of reindeer herding. We do not have that opportunity any longer when the former old pastures have been destroyed and the old Sámi livelihoods have been trampled down on earth.

May 6th 1966 the preparative work to start the log floating is under way. It is expected to start only in two weeks time. Floating started on May 23rd. July 18th came home from Luirojärvi calf marking round-ups. There are too many females without calves. Only one third of calves is marked so far. Beginning of August, we are picking plenty of cloudberrries, the season for berries is long and favorable.

September 22nd-23rd 1966 I was in Helsinki seeing authorities. A week after it is snowing hard and it is cold. The winter seldom comes already in September.

January 10th 1967. A minor round up in Hirvasjärvi north from our pastures. Only 200 reindeer but they all were ours. We lose all those unmarked calves, which in fact belong to us. A couple of days later there are three round-ups on the very same day. I should be present in all those occasions. The weather is extremely cold for the rest of the month.

3rd February 1967 there is an official paliskunta meeting. The most important issue to be discussed and dealt with was to get the construction of a fence between our paliskunta and the northern neighbors under way. We have lost a remarkable amount of our reindeer to these neighbors. The work will be started soon. A minor roundup in Kertujärvi and we transported our reindeer from there with lorries. Another small roundup in Ivalo region - 200 reindeer of which 90 % were ours.
Whole Northern Finland is fighting with big problems. The people do not have jobs. The authorities are planning new loggings in order to reduce the unemployment. Reindeer herders have remained without the normal profit because of the starvation of reindeer. Plenty of reindeer died last spring because of the terrible weather conditions, which left the animals with no access to lichen grounds.

12th February 1967. I listen to the Greek Catholic Church service from the radio and it sounds beautiful. It seems to me that the Government of Finland tends to empty the entire Northern Finland of its old regular inhabitants. Our reindeer are starving and dying. Our best winter pastures on the shores of the big rivers have been spoiled with clear cuttings and soil preparations. They also destroyed the areas by spraying herbicides on deciduous forests and all this was carried out prior to the man-made lake construction. We have no possibility to herd reindeer in an old traditional way. The reindeer have been left on their own. Maybe the Finnish society and authorities again one day realize what mistakes and injustice they have done to us and the damage it has caused to us. The society will however never again be able to save the reindeer herding in Lapin paliskunta.

23rd February unlucky transportation of our reindeer in trucks. 28th March 1967 Anselmi Pokuri from Mutenia came walking for a visit. He walks and stands so straight even though he is already 92 years old.

There was again a big water meeting in Vuotso on 3rd October 1967. At the end of the month it is noted that this winter is very peculiar. One day it is snowing; another day it is already raining. Several moose gathered close to our house. They almost attacked and trampled one of my colleagues who did not notice them in time and they were too close. On October 23rd we collected some 1500 reindeer in a round up on Kiilopää fjell, there were several bears in the round-up site monitoring us and the reindeer. I went to the round up with my tractor; there was plenty of snow on the road.

It is so peculiar winter; it is snowing one day and every second day it is raining. When November begins there is snowfall and zero temperature. In December it is obvious that the soil surface is frozen badly and it will then become a bad year for reindeer because lichen is frozen. On 4th December I went to see the papers regarding Kemijoki development. They are displayed in the municipality office. The rest of the year is frosty.

In February 1968 reindeer are still spread out too much, it is difficult to get them gathered to the roundups for separations. Our reindeer business is doing badly and the whole future looks so bad. Because of the hostile devastation of our reindeer lands by Finnish State our reindeer are dispersed to all the winds of the world, we have not been able to gather reindeer to one single round-up separation since the October round up when bears were watching us in Kiilopää. In the beginning of March “a big water meeting” again. The representatives of reindeer herding try to organize and defend themselves. At the end of the month the Kemijoki Company men come and work on measurements along the riverbanks. Our things really are bad indeed.

On the 13th February 1968 there was the first real snowstorm of this winter. The wind and snow are creating small drifts. I just received a message that the day after tomorrow there will be a reindeer separation in Rajajooseppi. Today in France in Grenoble the ladies were competing in cross-country skiing. The war in Vietnam is continuing all the time. Another small round up in Hietaniemi in the west with 300 reindeer. Our family has two reindeer there. The heavy logging has cleared Siikapalo area near our home but on the government land. The loggers move on to other places. During the last week in February we got 800 reindeer gathered in a roundup. Again a big and important water meeting in
municipality center on the man-made lakes on the last of February.

Another water meeting in Sodankylä on the 1st March 1968. We went to testify for our own vital reindeer issues and for our observations. The clear cutting of forests has changed the weather conditions seriously so that in winter the snow cover gets thicker and harder and prohibits the use of vehicles. The weather is nice and mild. Several minor round-up separations in March. In some round-ups were only a few hundred reindeer, the bigger ones comprised up to 1200 reindeer.

April starts with round-ups with almost 2000 reindeer. It gives us a small glimpse of the good old reindeer times when we had even over 10 000 reindeer in one round-up separation. Such an occasion could then last for over a week. Again alarming news from America. Martin Luther King is assassinated and there are huge riots in the USA.

On the 9th April the Water Rights Court of Northern Finland paid a very important visit to us. The court was holding an inspection for only a couple of hours. Everyone can judge how thorough and reliable such a short visit can be if you try to look at it from a local reindeer herders point of view. On the very same day we had a minor round-up separation. Around the 20th April the weather stays clear and cold for several days. In the big world America and Vietnam are looking for a place for peace negotiations.

On 10th May the planning and preparations for log floating are well under way. Floaters are transporting boats and other tools to riverbanks. They say that it will now be the last time ever for the log floating in this river. So not only reindeer herding seems to be vanishing, also log floating will be lost to the annals of history. The last log floating started on the 2nd June.

Thousands of our reindeer were gathering in the fjell region north from the Lokka basin. On 5th June 1968 the Presidential Candidate Rob Kennedy was shot dead in Los Angeles. We planted potatoes on 10th June.

In the middle of June 1968 plenty of reindeer died in Lokka reservoir when they drowned. We have taken photographs of drowned reindeer in the very same man-made lake in high summer. The hydroelectric company Kemijoki simply raised the water level and left large areas to be drowned without harvesting the sparse forests. The government did not allow the local people to go and harvest this timber. That is why there was a ghostly situation on the man-made lake, when the trees were swaying in wind creating an image of forest but there was much water, plenty enough to drown the terrestrial animals small and large when they were swimming around in the search of solid ground. Rising water level on the largest marshlands in Europe resulted in massive releases of floating turf, which was visible for years. The chemical processes also released mercury, which accumulated in the fish stocks and was dangerous for years.

Pekka was cruising on lake Lokka with a couple of his friends and colleagues in the summer when the reservoir water level for the first time was approaching its highest mark. They were located close to the drowned Kurujärvi Sámi village in the open waters of the former wide Härjähypyyapa marshlands. There they saw a moose cow with her two calves swimming in the middle of the drowned sparse forest of pine trees.

The moose family as well as the reindeer was swimming around among the trees trying to find solid land, which was completely covered by water of many meters deep. The men in their tiny riverboat approach the swimming moose family and when they come closer they realize how only the backs of the moose calves are still visible and above the water surface.
Floating turf islands on the Lokka reservoir. Reindeer tried in vain to climb onto these "islands". In the end the reindeer herders rescued the drowning reindeer using riverboats. No help came from the society or authorities.

Pictures: OA and PA

Paulus Magga aka "Vuotson Paulus" in the boat, which was used to rescue the reindeer. Picture: PA
There is no time to be wasted in taking photographs, but the men grip the big ears of moose calves and pull both calves from certain death onto the boat. There they soon lift their heads and come back to life again. The rescuers bring the calves ashore and make the reindeer earmarks on the ears of moose calves then releasing the calves to run after the moose mother.

Thousands of reindeer are gathering and moving in a nearby marshland. There also are our cultivated hayfields. Big part of this reindeer herd was marked on Tankavaara calf marking roundup. We did not manage to gather the remaining main herd in Tankavaara. We had to move to Kiilopää and I also started moving to the north. It is cold and the wind brings that cold from the North. It looks again so bad in the reindeer business. We must construct a new roundup for calf marking in Luirojärvi area. The nearby marshland remained still frozen to the depth of one foot under the soil surface. Calf marking is done with somewhat success in the fjells near Luirojärvi. Today the thermometer shows +16°C which is so rare this summer that we feel like being in the heat of Africa.

At the end of July the students of Oulu University were organizing a seminar gathering of people in a Sodankylä Hotel. The event dealt with the protection of self-sustaining reindeer herding culture and the local people. Nature protection issues were also highly prioritized. Another big meeting in August on reindeer herding and its survival. Russia invaded Czechoslovakia together with the Warsaw Pact forces on August 21st.

In the summer 1968 Pekka Aikio, Sakari Keskitalo and Hannu Könöäs found a moose and two calves swimming on the open waters of Lokka at Härjänhyppyäapa. Calves were already submerged. Then Pekka pulled the calves from their ears into the boat. Once they reached the shore they happily sprung forwards to the forest.

Picture: PA
The radio news broadcasters only speak about the occupied Czechoslovakia and not a single word of our occupied land with the lost reindeer. The Czech President Svoboda went to Moscow and keeps on staying there. Where should our chief then go for help? I KDG¿VKLQJQHWVLQWKHULYHUDQGLWJDYHXV nets still in water. The swallows are still here at home. On 27th August the Czech leaders agreed in their policies of appeasement and were able to return home. Our crisis continues and gets worse.

On September 6th is the hottest day of the entire summer, +32°C. There was a thick layer of snow on 23rd September. Reindeer herders of Vuotso came together in an extra meeting on 26th August. Now the collaboration with the neighboring Northern Ivalo Cooperative is almost falling apart. The neighboring cooperatives in the North have discovered a good possibility for earning extra reindeer when our paliskunta is suffering from actions of the Government in devastating our lands and terminating our reindeer herding. Our reindeer have panicked because of the rising waters and they fled from our own territory to the North to the pastures which belong to our neighbors.

According to the Finnish Reindeer Herding Law, which is based on agricultural stationary farming patterns we should keep our reindeer in our territory and make sure that they do not cross the paliskunta borders, but what can we do when the Government is rising water levels and drowning our lands together with our animals. The Finnish authorities do not understand nor take into account the nomadic open range reindeer herding with its needs and so the Finnish jurisdiction is acting ruthlessly. Now it looks that we have to accept a dictated agreement on herding cooperation with our neighbors.

The reindeer, which fled the sudden deluge, must be “bought” back by the original owners in spite of the fact that the Government of Finland with her economic expansion and reservoir construction is guilty of this inequality. Otherwise there is a danger that we lose our reindeer to our neighbors altogether. The big reindeer separation occasion in Kertujärvi roundup of the northern neighboring cooperative started on October 11th 1968. 90% of all the reindeer, over 5000 heads, belonged to the Vuotso herders. They now were on illegal grounds, outside our own cooperative borders. The separation continued for five additional days. Several cold days in October and November:

I remember how the transportation means have changed during these 20 years we have lived in Siikaselkä. My sons were taken to school often by reindeer. Then we bought a tractor in 1959, which meant a very big step forward. Tonight we jump on snowmobile and again drive faster. This morning, the 11th November, I was driving my snowmobile and suddenly the engine stopped because it was out of fuel. I must say that reindeer has been the safest mean of transportation ever.

25th to 26th November I was skiing in moose hunting. I also saw three moose but did not manage to shoot them. Very active December, several round-ups, moose hunting and celebrating the Christmas. Americans have been circling the moon and they landed back on the Earth on December 27th. We did not see any stars during the New Years night and it means that we are not going to get cloud-berry luck next summer.

In 1969 the spring, especially April was nice. We had brought an orphaned reindeer calf home and we gave him food and care. He soon learned to trust people and took me as his mother. In the beginning of May I tried to leave the calf to stay on his own feet. I led him to snowless spots but he would not be left alone, and he followed me soon back home. He left the house only on May 26th.

May 30th at six in the morning. I am leaving for Rovaniemi together with all members of
the Reservoir Delegation of Lapin paliskunta. On the next day I attended the meeting of Laplands research Society. I wanted to ask in that meeting why the scientists are not interested in reindeer herding and the prerequisites of herding and its wellbeing. The highly educated scientists did not want to answer me or they did not know the answer. All in all, we seem to be left alone in this turmoil. The swallows also returned home today.

June 14th again comes alarm; reindeer are seen on the floating turf rafts in the middle of Lokka artificial lake. We have hardly seen any fish so far; the construction of the dam for the western Porttipahta basin has had a negative impact on the possibilities for fish to swim up the river. Nordic Sámi Council meeting was held in Sodankylä.

In one single day, the 17th of June in 1969, reindeer herders were saving seven reindeer on floating turf rafts from drowning. One reindeer had died in starvation, because there was simply nothing to eat on this turf platform. The reindeer herders were in their tiny riverboats on the waves of a big artificial lake. The average distance to transport the animals to shore was two kilometers.

How lucky our people were, the weather was nice, in a windy weather people might have crashed their boats and drowned literally. The authorities, advised by the Kemijoki Company categorically denied all information of drowned reindeer in the man-made lakes. They also declared that no animal will drown in these reservoirs. All this in spite of the fact that we have photographed drowned animals and rescued animals from drowning. The government of Finland nor the Finnish authorities never offered any help for these rescuing operations. Normally the authorities are prohibiting people to go on big lakes with tiny riverboats. We could have had really in big disasters with drowning people also. The municipality executive board visiting the Lokka reservoir.

All the reindeer herders are watching TV, because the American spaceship Eagle is landing on the surface of the moon. On July 27th the migrating reindeer appear in wide marshlands on their route from fjells to the riversides. At the end of July we noticed how weak the fishing years have been. Migratory fish have not been able to swim up the river because the river was closed with the dam. Many terrestrial animals have found their sanctuary close to our home. Now we noticed however that also a baby wood grouse has settled close to the house. It is not afraid of people at all.
Hand drawn maps indicating the situation at the Lapin paliskunta reindeer herding district in the 1960s.
1. System prior to the reservoirs.
2. After the reservoirs. Maps: PA
In 1970s bean geese was plentiful in the Lokka reservoir in the autumn times. Hunting geese was profitable. Pictures: EM
3. Lokka and Porttipahta as Man-made Lakes in Nature and As Human Communities

Artificial lake or man-made lake is usually constructed on upper course of a river. Lakes are low and asymmetrical; the variation of water level is considerably great. The shores are exposed to erosion; this may result finally in a hard bottom and a harsh shore slope with poor biology.

The stratigraphy of water can be different from the normal situation. In Lokka the proportion of marshland was 90 % of total area. In Porttipahta case the marshland proportion was only 50 % and this affected the stratigraphy. Rising water levels on the largest marshland in Europe resulted in massive releasing of floating turf in Lokka, which was visible for years. Aerial photographs show that from the end of 1960s until 1972 the areas of upheaved peat have diminished from 20 square kilometers to 15 square kilometers (Laikari 1974). The chemical processes also released mercury, which accumulated in fish.

The drowned water ecosystem is often more productive per area unit than terrestrial one. In the initial stage the fish stock is abundant, the growth will soon slow down, sudden deaths of fish may occur and the competitive position of fish spawning in currents gets weaker, the fish stock structure changes from valuable to less valuable.

Forests under water were formed because the company and also the Government left 200 000 cubic meters of timber under the waves of the lake. These water forests lead big animals like moose and reindeer astray and then caused the drowning of those animals. Afterwards the trees broke in two at the surface leaving dangerous underwater poles, which may puncture and wreck boats. The local people considered that these forests together with ploughed rocky hills and deciduous forests killed with aerial spraying of herbicides were sad memorials of a time when Finland destroyed and wasted her valuable natural resources.

The water birds are normally doing well. Terrestrial animals have lost territories due to the impacts of the construction. The ecosystem of an artificial lake is unstable. The lake is in a stage of succession and the loss of oxygen may occur. The waters downstream may become eutrophicated.

Generally man-made lakes are built for hydropower production. In some cases they also serve for protection of flooding and may collect freshwater. Lokka and Porttipahta man-made lakes were constructed on sparsely populated areas and thus were somewhat easy to realize.

In earlier times people settled down along rivers and waterways. The river usually was a current of life but also a highway for the people. When the road connections were cut off the settlements and beautiful old villages of Sompio died out. 560 people out of totally 640 inhabitants had to move from their homes. Most people moved to Vuotso, which then grew to become an urban town on barren ground.

When people moved they had to give up self-sufficient subsistence occupations and try to adapt to a life based on market economy. For the first time people also saw electric light. The people who lived in their villages prior to the construction of the man-made lakes were doing well in their self-sufficient subsistence lives. They were the wealthy 'poor' people from the wilderness. These people owned large estates and big land areas but were paid poorly by the Kemijoki Company.
It was clearly observed that the people living in the most remote places on the upper course of the big river did get the poorest price for their estates and lands. I learned that that farmers living 300 kilometers south, closer to the mouth of the river could get even 10 times bigger price per area unit than the people in the area of man-made lakes.

The company was applying colonial style “voluntary purchases”. Reindeer herders who had established a committee in order to be able to defend themselves and reindeer herding suffered from retaliation by the company. Excluding leaders of reindeer herders from “voluntary purchase” and leaving them at the mercy of expropriation, which normally resulted in much lesser price for the piece of land, imposed the punishment. The Kemijoki Company was able take care for the transportation and hosting of the Water Rights Courts during the local inspections. By providing the transportation the Company also succeeded to avoid some of the legal inspections the courts were supposed to make on the demands of the reindeer herders. The reindeer herders were completely left without the protection of law. The small-scale farmers were able to enjoy a minor share of that protection.
A herd of reindeer in Finnmark, Norway in July 2009. Picture: EM
4. Reindeer and Reindeer Herding in the World

Traditionally reindeer herding has been practiced in the entire Eurasian Circum-polar region north of the zero degree isotherm. Of the total 4.5 million reindeer of the world about 3 million are domesticated. Of these three million 75% are in Russia and over 20% in Finland, Sweden and Norway.

In the beginning of the 1970s, in the Southwest corner of Finnish Lapland a piece of reindeer antler was found which was dated as being from 34,000 to even 80,000 years old. It proves that large herbivorous mammals were able to live and survive long periods of time during the Ice Age in refuges. Also there are many rock drawings, such as the well-known ones in the city of Alta in northern Norway, which are more than 5,000 years old and show a corral area in the shape of a four-leaf clover. Inside the corral are reindeer, elk, men, and perhaps also boats or sleds. It suggests that reindeer herding is one of the oldest forms of human economy in the northern Polar Regions.

The reindeer used by the Sámi were tamed from the wild fjell reindeer. It can be supposed that the influence of man is probably essential in the adaptation to new conditions. Before it was tamed the wild reindeer was mainly a game animal. It was not tamed into a mechanical domestic animal or a purely utilitarian animal; rather it acquired a much more versatile role in human culture. People got their food, clothing, means of transport from the reindeer without endangering the functions of the ecosystem, while the reindeer got help from humans in its adaptation to new ecological circumstances: the danger of predatory animals in the forest zone, the continuous use of shifting grazing grounds in an area with small primary production and many physical factors changing according to the season.

*Nutendli Chukchi community reindeer corral and roundup in Lower Kolyma, Republic of Sakha-Yakutia, Siberia, Russia in March 2007. Picture: SL*
5. Formation of Lapin Paliskunta

In 1751 the Kingdoms of Sweden and Denmark agreed on northern border, which then became the first nation-state border dividing Sápmi, the Sámi land reaching from the Norwegian Atlantic coast over Northern parts of Sweden and Finland to Russian Kola Peninsula. This border agreement was signed in the Swedish town Strömstad. In a special section of this treaty, called *Lappekodicill*, it was affirmed that the Sámi still had the right to cross the border between Norway and Sweden with their reindeer and to use the land on both sides of the border. The Sámi, however were forced to become citizens either in Norway or in Sweden.

In the frontier region there were plenty of problems for the Sámi. The Strömstad Treaty with the special Lappekodicill was not able to solve them. The special rights of Sámi were considered important by the Government of Norway, which wanted to preserve these rights. Also the Russian Empire took a positive attitude toward the legitimate demands of the Sámi. In Finland in the time of the Russian rule there were increasing demands by farmers and local authorities to keep the big reindeer herds away from the border areas because the agrarian sedentary population in Finland wanted to keep the reindeer nomads with their big herds away. Consultations between Norway and Russia failed to yield the adequate results and so the border between Norway and Finland was closed impacting reindeer herders in 1852-54 (Itkonen 1945).

Closing the border and prohibiting free entry to winter pastures in Finland produced dramatic consequences. As an example of this 30 families with their reindeer migrated officially from Kautokeino in Norway to Karesuando in Sweden and so these nomads tried to continue using winter pastures in Finland. In 1889 the closure the border for reindeer herding between Sweden and Finland made also this type of land use impossible. The Lappekodicill however still has legal power in the Swedish-Norwegian Reindeer Herding Convention. Today the Sámi experts and Nordic legal experts have been discussing a similar economic crossborder agreement in Sápmi in connection to the proposed Nordic Sámi Convention.

The drawing and closing of national borders in Sápmi created a lot of difficulty to reindeer herding Sámi. For example ten Sámi families migrated from Norway to Sompio Lapland during 1870-90 (Linkola 1966, Aikio 2009). These ten families moved to old Sompio where the descendants of the old forest Sámi population still lived. They had been linguistically completely assimilated to the local Finnish population. The Finnish geographer J.E.Rosberg who visited Sompio areas at the end of 1800s observes in his report that Finnish farmers in Sodankylä practicing small scale reindeer herding needed experts for real practical herding. They had asked reindeer Sámi to move to Sodankylä and then herd some smaller reindeer herds of the local Finnish farmers (Rosberg 1891).

The people in old Sompio villages were practising small-scale agriculture and they had some draft reindeer. In 1898 the Finnish Imperial Senate ordered that reindeer herders must form administrative units called "paliskunta". So the reindeer Sámi together with people from old Sompio also organized themselves and formed a reindeer herding community which was called Lapin paliskunta, Paliskunta of the Sámi. These united people managed to run this reindeer herding community with a great success and in harmony. When the reindeer Sámi had moved from areas where herding was practiced using open range herding, these people wanted to develop a similar system in
A traditional Sámi dwelling, lavvu shelter from cloth in 1800s in Sompio. Picture: KG, University of Oulu Library Archives.
their new pastures. The Finnish paliskunta areas were smaller. The biggest ones were hardly more than 100 kilometers long, and so was also this newly established Lapin paliskunta.

When the normal migration functioned mostly in north-south direction the new Lapin paliskunta was long in east-west dimension. Luckily the long dimension also formed basis for migration between fjells and lowlands. The lowlands were situated along the big rivers Kitinen in the west and Luiro in the east. These rivers were the main river systems which the engineers who worked for the hydroelectric power planning and building had noticed and now wanted to harness.

Prior to the construction of man-made lakes the open range reindeer herding in Lapin paliskunta was organized in a way, which I will here briefly describe as follows.

The winter herding was conducted in ten small groups. The reindeer Sámi represented a clear majority. In 1958-59 the total number of adult members in those groups was 131, of which 75 % were belonging to the nomadic Sámi. In the Western area situated in the future man-made lake zone there were 25 adult members (19 %) and in the Eastern old Sompio region eight members (6 %). In 1965-66 the proportion of the reindeer Sámi had grown to 82 %, the total number of adults was 128. It is interesting to note that the reindeer Sámi owned 80 % of all reindeer which corresponds to the same proportion as in the number of the human population of the area. This data is based on the work of Nissilä (1970) and on my own studies of the archives of Lapin paliskunta.

The Finnicized farmers in the territories of the west basin as well as the old Sompio people in the eastern basin area soon adopted similar working methods and herding policies including the tools and clothes for living and working outdoors as were used by the nomads. The cooperation in reindeer herding welded smoothly together.

The most important sites for the reindeer reproduction, mating and calving grounds were situated on the northern edge, in the fjell region of the paliskunta. The migration took place from those fjells to the shores of the big rivers, which were the most fertile pastures for the most of the snowless season. The summertime calf marking is collective work as well as the gathering of reindeer for separations in the roundup sites.

After the winter roundups the focus and pattern of work changed. The paliskunta was divided in ten separate groups each having their own winter pastures for the wintertime herding. One can conclude that the winter was a critical time for herding and that is why the wintertime management and control of the herds was done with more accuracy. This was achieved by dividing the entire big herd of some 10 000 animals into ten smaller herds.

In winter the snow conditions could be severe. Also the attacks by the predators like wolves and wolverines were more numerous and hazardous in the time of deep snow cover. The intensive and continuous presence of man was itself a factor which helped to avoid the impact of predation. In very severe snow conditions when the soil surface was frozen hard or the snow depth grew too high, the herding groups again united their actions and moved the herds to the fjell region in the north and northeast.

In high fjells there was always less snow, even windblown snow free areas where reindeer were able to find necessary tiny lichen growths, which were able to keep reindeer alive while the animals lost their weight heavily but survived. This vital lichen is growing on coniferous trees, on birches on the ground and in the fjell region also on ground, on stones and even on bushes. So the subarctic and arctic ruminant called reindeer is adapted
to these intolerable harsh conditions in an incomprehensible way. No other domestic or semi-domestic animal in service of man can do it. The Vuotso reindeer herders had brought this adaptive system to its top climax prior to the time of man-made lakes.

The World War Two had a great negative impact on reindeer herding of Lapin paliskunta. The paliskunta tried to maintain good order even in the war situation but owners had to give reindeer to the Finnish Military forces to provide food rations. In 1943-44 altogether 1900 animals were listed. Some of the wealthiest herdsmen gave 200 reindeer each.

In the early postwar times reindeer herding soon recovered and found its earlier dimensions. Lapin paliskunta is an example of a human relationship with the subarctic ecosystem. During the last 50 years great technological and socio-economic changes have affected the reindeer herding in the area. Perhaps the most dramatic change in reindeer herding occurred in the 1960s - the appearance of the snowmobile. For good reason it was then called as snowmobile revolution.

The herding municipality in question has also made a huge transition from reindeer herding in accordance with the ecosystem to a reindeer husbandry almost detached from the ecosystem. These changes were also connected and followed by social changes, which affected the Sámi communities.

The herding principles in Lapin paliskunta of the 1950s could be divided into the following three categories:

1. A rational and functional division of the available land area for the different events of the annual cycle, with the biological needs of the reindeer as the starting point.

2. The nearly continuous presence of man as a supervisor and controller of the systemic functions but almost in a mutually reciprocal relationship with the reindeer.

3. The mutual cooperation of reindeer herdsmen between different herding groups and across association boundaries with neighbors.

The first of these principles implies ecologically sustainable use of the meager subarctic nature. At the different phases of the annual cycle there is a systematic choice of biotopes differentiated for example according to sex. The most important reproductive functions, mating and calving, require quite special surroundings. Some small-scale reindeer migrations also took place as a part of the annual cycles of the life of the reindeer. This migration had its origin in a nomadic cycle of reindeer between seasonal pastures from forest to tundra, usually in south-north direction.

In the case of Lapin paliskunta we found a variation of that normal practice but now the migration was east to west between high fells and big rivers in the lowlands. These big rivers Kitinen and Luiro were to be harnessed. This meant that the nomadic cycles of the lowland area of the community were then going to disappear thus disrupting the most important rhythmic function of the open range reindeer herding of Lapin paliskunta.

Today we can better than before understand how perfectly Lapin paliskunta really functioned as a good example of a human subarctic ecosystem with sustainable use and development. In the next chapter I will discuss how this almost complete ecosystem was destroyed by the construction of the largest man-made lakes in the entire Western Europe.
6. The Breakdown of the Sámi Ecosystem and the Defeat of Reindeer Herding

In the middle of 1960s the paliskunta forests were logged, partly clear-cut, the small dam in Luirojoki was closed and rising of the waters began. What happened to reindeer, to herders and to the entire society was fast and dramatic.

The herding community in question experienced a huge transition from reindeer herding that was in tune with the ecosystem to a reindeer husbandry, which was almost detached from the ecosystem. These changes were also connected and followed by social changes, which affected whole Sámi communities.

The changes also accelerated the assimilation process of the Sámi. Cultural change from nomadic Sámi reindeer herding into a stationary reindeer husbandry sped up. The Finnish society forced it on the local people - the Sámi were not given any option. This all went ahead despite the nice opinions of some Finnish politicians who forbade forced assimilation.

However there were local politicians in Sodankylä who welcomed the defeat of the nomadic Sámi reindeer herding. This was because they apparently were advancing “the normal positive development” which meant promoting stationary agriculture. Reindeer husbandry was subjected to farming. It was also practiced on their own lands. The same goal still seems to be the goal within the Finnish Ministry of Agriculture and its subordinates, the reindeer research experts included.

This desire was expressed in strong words by the local Sodankylä Member of Parliament of that time Mr. A. Paarman. He was very happy when he predicted the termination of the nomadic Sámi reindeer herding in 1969 connecting it with the adoption of the new reindeer estate.
farming law. It was now even easier to continue the assimilative policies towards the nomadic Sámi. Now these actions had the force of law behind them.

My father Oula Aikio writes in his story "When electricity was sown" how people felt that the end of the world had come. It is remarkable to note how it was possible that a Sámi herder saw things so clearly – to see what will to happen after the reservoirs have been constructed. I can easily imagine that even the reindeer and other animals were feeling the same. Numerous animals drowned in the man-made lakes including plenty of reindeer, even moose and smaller animals. Reindeer and moose did not find the solid land, which they had found there in the previous years.

In summer 1968 it was observed that at least five reindeer had drowned in Lokka lake. The herders saved some 150 reindeer from turf rafts and floating islands by boats. The average distance for transportation was from three to seven kilometers. However the Kemijoki Company also made its own inquiries. Based on these investigations a retired policeman testified "under oath" that all information broadcast in newspapers, radio and TV telling that reindeer had drowned was "completely false". This testament was given 8th June 1970. I still have photographs of those drowned animals and these photos have been already published several times.

The policemen emphasized that they had studied thoroughly the documents and accounts of reindeer herding units. They referred to the movements of reindeer in several occasions of their statement. This means that they nor any other outsider could not understand the core idea of the movements of migrating reindeer.

Naturally it is interesting to study how the retired policemen testified for the Kemijoki company and against the local people. This method is still in use in some countries, for example in Central America. However it is almost impossible to understand how one of so-called Nordic Democracies - the State of Finland - is using similar methods that Finland condemns in her relationships with other countries.

On top of all of the issues connected with this negative process the Governor of Lapland M. Miettunen was the President of the governing body of the Kemijoki Company. He also reacted very strongly to the criticism presented by the reindeer Sámi who were supported by the young students of the universities of Oulu and Helsinki as well as the NGO Suomen luonnonsuojeluliitto – Alliance for the Conservation of Finnish Nature. The Governors strong appearance on behalf of the company and against the people only finds its equal in some countries of the developing world. In practice this led to a situation where the local press did not publish any critical material. The only critical views were published in the the leftwing media in Southern Finland.

When the waters rose the animals panicked. They fled to the neighboring pastures outside the legal borders of the reindeer-herding municipality. The herders of Lapin paliskunta lost plenty of reindeer because when they were found outside their own legal borders it created a certain new right of ownership that the neighbors had on these reindeer.

Lapin paliskunta lost 12 % of its land area directly under water. These pastures were the important productive lowland areas. In practice together with the split points on the long shores of the reservoir paliskunta lost about 25 % of its pastures. These areas could not be used any longer. Losing of the reindeer food sources was not the only loss in relation to the land resources. Certainly as important loss was the disrupted rhythm of the reindeer herding; the cycles from winter fjells via calving lands in May-June to summer pastures, then to mating grounds and onwards to the separation round-ups.
The most important part of all this was the dispersion of the whole big herd into 10 smaller herding groups. It was perhaps the most advanced and sophisticated part of the whole organized system of reindeer pastoralism in our conditions. It combined the human dimension into the biological part of the reindeer and the pasture use.

The reindeer herders finally got the fence on the northern border. It became a double-edged sword. The fence terminated the former borderless cooperation between neighbors. On the other hand it was necessary to stop the reindeer from panicking and running to the North. In the early years of 1970s there were incidents where the Lapin paliskunta herders were forced to defend their reindeer almost in the old Wild West style. There are many exciting stories that must be described in another connection.

Vuotso reindeer herders had voluntarily formed a smaller group, which they called “the reservoir delegation” of the paliskunta. This delegation represented the reindeer herders in relation to the authorities and the power company. They worked hard trying to defend reindeer herding and herders. Almost all their attempts were in vain - the authorities did not want to take the views of the reindeer herders seriously into account. They did not even consider these views in the long, complex and exhausting juridical process.

The company retaliated privately. The individual members of the reservoir delegation were subjected to the punishment by the Kemijoki company. These steps were not only against the paliskunta as an organization, but also against the individual people who suffered from the construction of the man-made lakes. In practice the following happened.

Oula Aikio told that the exchange ratio of the compensation of the damages was the following: If he lost one square meter of land under water, he was able to gain a half square meter of a tar paper for house insulation as a compensation. The private compensation issues were pushed to a process of expropriation. This included no possibilities to negotiate regarding so-called 'voluntary purchases'. In some cases this resulted in a compensation which was only 20% of the price of the voluntary purchase. The company representatives threatened directly the local people and said that “because you guys have started to fight against the company you will find it inflicting with your personal affairs”.

It is easy to conclude that the Vuotso reindeer Sámi were left under a strong and ruthless corrupted policy by the state and the public authorities. They with their culture of self-sustaining subsistence livelihoods were left completely without the protection of law.

Pekka Aikio and Toivo Jaakkola made the first scientific interviews of the people living in the area of the reservoirs in the 1960s. The interviews resulted in the following list of negative impacts:

1. **People have lost their former livelihoods.**
2. **People lost possibilities for sustainable and natural way of life.**
3. **Numerous negative impacts on reindeer herding**
4. **The reservoir is dangerous for boats. Several boats have been wrecked so far.**
5. **Circumstances for fishing negatively changed**
6. **Cellars are getting wet. They must be abandoned and filled with sand.**
7. **Cesspools are getting wet.**
8. Freshwater wells get in contact with sewage.
9. Wells are getting dry.
10. Water regulation causes difficulties on transportation in Luirojoki-area.
11. Cattle breeding diminished or completely terminated.
12. The fishery-treasure of Sompiojärvi lost
13. Leaving the home is like being evacuated in a wartime situation
14. Moving to a new place to settle down there is an economically heavy burden.
15. Forced resettlement to a place which has been ordered by authorities
16. All former work done in vain
17. The life costs have increased
18. The mineral resources left without exploring
19. Discrepancies in organizing hunting rights
20. Difficult to find a new place for settling down
21. The game of forests vanished because the forests have been devastated.
22. Cloudberry mires under water
23. Difficulties caused by the trees and timber left in water
24. Great stones left along the village roads in Lokka
25. The school of Lokka will be closed
26. Unemployment
27. Immigration
28. Profitability of service occupations diminishing
29. People are afraid of the collapse of the dam.
30. The scenery has become spoiled.
31. Lokka dam is leaking.
32. The Lokka-Vuotso road connection cut off

The student organizations of both the Oulu and Helsinki Universities organized a Tribunal in Sodankylä in summer 1970. They put the blame on the company and the whole society of Finland for destroying the old culture in Sompio, especially the nomadic Sámi reindeer herding culture. The authorities of Finland turned a deaf ear on presented evidence and issues. The student organizations wrote a letter to the Government of Finland. They demanded to stop the filling of Porttipahta reservoir. They urged that a study should be made on how the people in the reservoir areas were pressed and exploited without providing any help from the government for safeguarding normal fair legal procedures for people. That was even more important when noting that most of the people suffering from the man-made lakes were Sámi belonging to an ethnic minority and to an indigenous people.

In hindsight it is possible to conclude that Sámi reindeer herders in Lapin paliskunta with their community were treated as a ‘savage tribal people’ slowing down the developments of a colonial rule. All evidence they tried to present was denied and considered false by the state authori-
ties.

The value of properties of the local people was kept low. The "voluntary purchase" prices for their estates were low and this value was ten times greater per area unit some 300 km to the south near the sea. According to the company information the average price for an estate has been over 80 000 Finnish Marks (FIM) (equaling 14 000 €) but these were cases of small farms owned by Finnish farmers. In some cases a voluntary purchase resulted in 40 000 FIM (7 000 €). If a person who had an exactly similar piece of land but happened to be a member in "the reindeer reservoir delegation" it meant that his land was put through the expropriation procedure and he only received 8 000 FIM (1300 €) for his lands. The Company had promised to punish the members of the delegation on personal level, because they "fought against the company for the reindeer herding".

The people in the Sámi villages of Purnumukka and Kurujärvi can be considered to have been forcefully relocated because they were left without a fair and sufficient compensation. They were also left without real possibilities to choose new lands that would be similar to the environments they had previously when they lived on reindeer herding. It can be said quite clearly that Sámi reindeer herders were pushed away and displaced from the membership of the Finnish society. This left them without any legal protection in matters, which were related to their status as nomadic Sámi, people now known as indigenous people.

The northern headwaters of river Kemijoki flow into the reservoirs during spring floods. Picture: EM
Bogs and marshlands are the spring pastures of reindeer. Picture: EM

A moose is hiding in the marshland trying to escape the mosquitoes. Picture: EM

Spring melt in a bog. Picture: EM
Local people and their experts often criticized the insufficient amount of beforehand research about the situation of local people and their way of life. It seems very clear that most of the research was aimed to provide scientific evidence and information which was meant to help the Kemijoki Company to achieve the construction of the water reservoirs. Especially the reindeer herders felt that they constituted the forgotten part of this process.

Oula Aikio, the leader of Lapin paliskunta during decades leading to the buildup stated that every single crane nest tussock was mapped but the reindeer Sámi situation seemed to be pushed away from the agenda of the Finnish government represented by the Kemijoki Company. The company responded to the critics and presented their list of different research themes, which were initiated and carried out by scholars, institutions and universities. This list included e.g. following themes and projects:

- Research of climate 1958-59
- Evaporation studies in Lokka basin 1959
- Geographical studies
- Studies of forest biology, summers 1958 and 1959
- Botanical studies
- Studies in fish biology and limnology
- Zoological studies
- Studies in marsh and peat geology and groundwater
- Sociological study of farmers in Lokka basin
- Study of reindeer pastures

One can see that most of the studies were focusing on basic phenomena or items of natural sciences. Geographical and sociological studies could have been focusing also on the situation of reindeer herders but instead the ‘study objects’ were farmers who owned the private land for agriculture. Some of the Sámi herders also were private landowners but their profession was open range reindeer herding, a nomadic migrating way of using land.

The Finnish legislation and jurisdiction did not recognize it nor had a name for nomadic cultural land use and tenure. So it was simply put aside. There were however some studies initiated by private interested researchers who focused also on reindeer nomadism. A Dutch anthropologist Menno Lenstra (1975) is one of these. He published his study on the situation of reindeer herders in Lapin paliskunta in 1973. The author of this article together with Toivo Jaakkola carried out a study by interviewing local people, especially the reindeer herders in 1968-70.
8. Study in Reindeer Pastures

The constructor of the reservoirs ordered a statement on reindeer pastures from a botanist Dr. Ahti from the University of Helsinki. Kemijoki Company and the government and legal authorities used this statement apparently in the value evaluation of pastures. Dr. Ahti put the main emphasis on ground lichens, which together with the arboreal lichens are the basic food source for reindeer as an Arctic ruminant. In his evaluation the first class pastures were only four percent of all pastures and one fifth of pastures was classified as completely worthless.

The most harmful and biggest mistake in his evaluation is the same as also what today’s scientists make easily; they study reindeer just as an northern animal placing the reindeer in a role of a wild animal. They do not realize that reindeer and herder in an open range herding system act together. They also survive together better than without each other. The open range herding system is not just about animals and people wandering freely. In fact everything is carried out in a very well organized way.

However, botanist Paavo Kallio who noticed that with reindeer, it is possible to raise livestock without interior feeding has understood this fact. Kallio is correct in describing that the domestication of the reindeer is one of the greatest inventions of the northern people for stabilizing the basis of their life. The reindeer obtains all its energy from nature and it provides man with more or less the only way of getting his share from the production of the terrestrial land ecosystem, with the exception of some cattle, sheep, ptarmi-
9. Conclusion to Part II

It is clear that a massive misconduct has taken place with the creation of the reservoirs in the Sompio area. It has meant the economic destruction of the way of life locally. Additionally it has caused a total destruction of the reindeer herding in the region. A whole culture has been obliterated.

The damages have continued and the questions of the Sámi culture, reindeer herding and rights have not been solved in an adequate manner even in 2010. The state considers most of the lands in Upper Lapland to be state lands. Sámi do not agree. This has led to land use conflicts in recent times. In 2005 the United Nations intervened in the internal matters of Finland by issuing a moratorium on logging in Nellim region of Inari on behalf of the local Sámi. Also the ownership of Angeli and Lemmenjoki Sámi areas is being contested.

The General Assembly Resolution 61/295 adopted United Nations Declaration on the Rights of Indigenous Peoples on 13th September 2007. Martin Scheinin (2006) has analyzed the proposed Nordic Sámi Convention and in that connection he has stated that the Government of Finland is guilty of cultural genocide, which is mentioned in the United Nations Declaration on the Rights of Indigenous Peoples. Three justifications for this in the Declaration include for example:

1. Indigenous peoples and individuals have the right not to be subjected to nation states by issuing a forced assimilation or destruction of their culture.

2. States shall provide effective mechanisms for prevention of, and redress for:
   (a) Any action, which has the aim or effect of depriving them of their integrity as distinct peoples, or of their cultural values or ethnic identities;
   (b) Any action, which has the aim or effect of dispossessing them of their lands, territories or resources;
   (c) Any form of forced population transfer, which has the aim or effect of violating or undermining any of their rights;
   (d) Any form of forced assimilation or integration;
   (e) Any form of propaganda designed to promote or incite racial or ethnic discrimination directed against them.

We need the United Nations to come in an assist in the re-evaluation of the situation of the Sámi in Finland without further delay.
Reindeer roundup of Lapin paliskunta in 1970s. Pictures: EM
Part III

Antti Aikio:
Drowning of Sámi Lands
– A Conflict Between Customary and Statutory Laws

1. Introduction

The construction of Lokka and Porttipahta water reservoirs had a tremendous impact on the life of local people of Vuotso/Sompio area, as huge areas of land were flooded in order to produce electric power for the nation. Inhabitants of the area included descendants of the Forest Sámi (metsäsaamelaiset), reindeer herding (nomadic) Sámi as well as ethnic Finns. All these groups of people suffered different consequences. Farming and hunting grounds were lost and rich fisheries with trout, whitefish and grayling, such as small lakes, streams and rivers turned into flooded, muddy waters with only little catch. Many people lost their home fields and buildings. All this had a dramatic impact on their economic, cultural and psychological wellbeing.

Reindeer herding Sámi in particular faced a severe situation. Their system of herding had been based on rotation of pastures according to seasons. Even though the total area used by the reindeer in the Sámi reindeer management area in Finland might seem large, the land was utilized in smaller individual plots at a time. The rotation of pastures was essential for sustainable land use; the areas not in use were given time to recover so they could be used again as needed. Accordingly, the destruction of individual pastures which, in this particular case, were large areas, meant disturbance and damage for the whole system, which then needed a lot of time to adjust itself to the changed conditions. In addition to the destruction of the pastures, the reindeer reacted strongly to the rising water levels. Many of them panicked and fled to neighboring reindeer herding districts. Reindeer have been traditionally herded freely grazing (nomadically) in the Upper Lapland. However within the Finnish system herding is limited to small designated herding districts, ‘paliskunta’, leaving it to the responsibility of the reindeer herders operating under a threat of sanctions to keep their herd from wandering to other districts. Although the reindeer herders of Vuotso/Sompio area tried their best to get the reindeer quickly back inside their designated area to avoid charges sanctioned by law, these efforts were not completely successful and herders had to pay high fees to the neighboring districts to get their own reindeer back.

My grandfather was a Sámi reindeer herder. He was the head of the local reindeer-herding district for a long time. Like many other herders at the time he spent years fighting against the threat that hydroelectric construction planning would bring to the local culture. For instance, he was involved in putting up a special board (allastoimikunta), which the Vuotsa reindeer-herding district (Lapin paliskunta) established in order to defend the rights of the reindeer herders against

---

1 The Forest Sámi culture in the Vuotsa region had disappeared already long before Lokka and Porttipahta reservoirs were built. Deer hunting used to be a vital part of the Forest Sámi culture but the deer population got over-hunted towards the end of the 19th century. The absence of deer gave room for reindeer herding in larger scale. About Forest Sámi, see Lehtola 1997.
2 About pasture rotation especially in Lapin paliskunta (Lapin Reindeer Herding District), see Aikio 1978 and Lenstra 1975.
the reservoir construction, and wrote various letters to decision makers involved in the project. The struggle was in vain, however, and the water flowed over vast reindeer pastures. Towards the end of his life, my grandfather finally gave up his hopes in the possibility of defending his and his community’s rights within and by the means of the Finnish legal system. Disillusioned and disappointed, he used to repeat to my siblings and me: “There is no justice for a Sámi”.

In addition to being a tragic and poignant case of a conflict between an indigenous way of life and the Finnish state, the Lokka-Porttipahta case is interesting from a legal perspective insofar as this conflict can be construed as a conflict between two different legal systems, the Finnish Statutory Law and the Sámi Customary Law. The system of reindeer herding in Finnish Lapland presents an interesting mix of features of both collective and private rights: the reindeer are privately owned as each reindeer owner has his/her individual reindeer ear mark, but the responsibility for the herding work is shared collectively and the land areas utilized as reindeer pastures are used collectively, even though they are not owned by reindeer herding districts but by the state.3 In the past this system of collective work functioned well thanks to the set of shared rules that governed reindeer herding. It can be considered as a part of Sámi customary law. Later on the Finnish state has begun governing the activity by territorializing the herding astringently into herding districts.

This chapter explores the legal and jurisprudential framework concerning the case of Lokka and Porttipahta reservoirs with a particular focus on the conflict be-

---

3 The Finnish state’s land ownership of the northern so-called state forests is disputed in recent jurisprudential research, however, see for instance Korpijaakko-Labba 2003.
between the Finnish legal system and Sámi customary law. I will first briefly describe the two legal concepts, statutory and customary law, and then continue with discussion of their application – or the lack of it - in this particular case of Lokka and Porttipahta.

2. Customary vs. Statutory Law?

Statutory or statute law (written law) is set down by legislature such as a parliament. In Finland, the Finnish parliament enacts the Finnish legislation. The legal system of Finland, like many other continental European legal systems, has its roots in Roman Law. In this type of legal system, the statutory law is the principal source of law, and other sources such as precedents and legal literature follow it with lower priorities. Statutory law forms the basis for legal practice in Finland and is typically considered “the one and only law” by citizens.

As opposed to statutory law enacted by legislature, customary law is usually defined as a law that derives its existence and content from social acceptance. Rules of customary law were formulated over time and the society that created them also controlled their compliance. Customary law existed long before statutory law and as such it can be called the father of statutory law. As Woodman puts it, “all law, including state law, is in the last resort customary law.”

For something to be regarded as customary law, a custom needs to exist that includes certain traditional rules, which continue to be followed from generation to generation. The custom must also be generally practiced at present. In many countries, including Finland, customary law is a recognized source of law. However, the status of customary law is not considered as high as that of statutory law. According to the general legal stand, customary law is effective and can be considered in force if there is an absence of statutory law and the custom is not unreasonable. Accordingly, customary law is not always regarded as a proper source of law. Statutory law tends to be seen as the “official” law since it is enacted and sealed by legislator.

3. On Sámi Customary Law

One of the main frameworks which customary law is usually associated with is the law of indigenous peoples – the indigenous customary law. Over the past years, there has been a rising interest in indigenous customary law especially among scholars of jurisprudence as well as other disciplines. As interest in and awareness of indigenous people’s rights have grown, also indigenous systems of customary law have received increasing attention.

The research of customary law of the Sámi is no exception. Like many indigenous peoples, the Sámi do not have their own written history. However, much of their past is still well known and there are a lot of sources available telling about Sámi history, nowadays also by Sámi authors and scholars. Similarly, the Sámi customary law does have its defined contents, even though it is not always documented. Compared to the statutory law,

---

6 Svensson 1999 p. 4.
8 Traces of customary law can be found also in modern legislation: in Finland, for instance in Section 3 (Freedom of Contract) of Sale of Goods Act (355/1987).
the Sámi customary law is not written by its “legislators” but parts of the law can be found in documents made by others.

An example of a source of Sámi customary law is the well-known Lappecodicill of the Strömstad Treaty of 1751. For the first time, the border between Denmark-Norway and Sweden was drawn and marked out. The Lappecodicill was included in the border treaty between Denmark-Norway and Sweden in order to secure the legal status of the nomadic Sámi and to guarantee the Sámi their right to cross the newly drawn border undisturbed according to their immemorial way of herding reindeer on their winter pastures in the high inland (tundra) and summer pastures on the coast. The Sámi were guaranteed the right to annually cross the new border between the states with their reindeer without disturbance.

Other examples of Sámi customary law exist. Korpjaakko tells about a court case from 1733 where a Sámi man was charging his neighbor of killing a wolverine within the boundaries of his land, and for this he claimed compensation for the violation of his ownership right to his ancestral land. In its decision, the Swedish court applied Sámi customary law instead of Swedish (statutory) law. Also, the Skolt Sámi have had their Sámi Court ("Kotakäräjät") institution based on customary law even as late as in the beginning of 2000s.13

4. Customary Law and Legal Pluralism

Although there is a rich tradition of Sámi customary law, in practice attention to this legal system has been scarce in the context of political, economic and cultural issues in Sápmi (the Sámi homeland in the European North). As I have already explained, within the modern state customary law has tended to be considered as an “improper” source of law. However, what I suggest is that the hierarchy between the two legal systems should not be taken for granted. For instance Åhren has argued that state law should not categorically displace indigenous customary law. According to Åhren, there is no significant distinction between these two laws, and no justification for customary law being inferior compared to statutory law. He states that the reason for Sámi customary law, like other indigenous customary laws, not being respected and applied is the disrespect of the indigenous culture itself - the Sámi culture - by authorities.

Choosing between the two legal systems might not be always necessary. In

---

12 Korpjaakko 1999 p. 70-71.
addition to statutory law, other laws may coexist in a given state. Woodman talks about legal pluralism, and describes four situations – the situations of concurrence, conflict, agglomeration and integration - where there are different relations between the laws. In Woodman’s definition, the case of a conflict is a situation where two or more laws contradict each other. The case of Lokka and Porttipahta belongs to this category. Integration is something that aims to avoid conflict so that the laws may be observed simultaneously. As Woodman states, a modern state will have to choose integration to avoid suppressing the other law(s). The Lokka and Porttipahta reservoir development obviously should have been planned and implemented in this manner.

5. The Two Laws in Lokka and Porttipahta Case

There are many grounds on which to argue that the construction of Lokka and Porttipahta reservoirs did not meet the modern standards of justice. The opinion of local people was not taken into account, compensations for damages caused were not sufficient, and the way the land areas required for reservoirs were bought for the hydroelectric power company was not fair to the landowners. The construction company hired a local ex-policeman to work as a land purchaser to intimidate landowners to sell the land for a cheap price. Serving alcohol was also used as a method for attaining the desired outcome. This kind of practice was clearly both ethically compromising and contrary to the law, since for instance the Section 33 of the Finnish Contracts Act (228/1929) states “A transaction that would otherwise be binding shall not be enforceable if it was entered into under circumstances that would make it incompatible with hon-

or and good faith for anyone knowing of those circumstances to invoke the transaction and the person to whom the transaction was directed must be presumed to have known of the circumstances.”

However, what should also deserve attention is the way in which the construction of the Lokka and Porttipahta reservoirs violated the system of rules on which the Sámi population based its sense of justice. From the perspective of the Finnish society, the construction of water reservoirs was legal since it was based on parliamentary law. To the local reindeer herding Sámi who were living and practicing their livelihood, drowning of their pastures seemed morally wrong and illegal because they based their way of life on the Sámi customary law. The Lokka and Porttipahta hydroelectric project was implemented by operation of national statutory law. Sámi customary law and the rights of Sámi and other local people were not taken into account during the process of planning and construction of reservoirs.

What I argue is that the reason why the Sámi customary law was not taken into account in this case was because it was not familiar to the decision makers at the time. This ignorance was rooted, above all, in the colonial attitudes that the Finnish officials held towards the local people and especially the reindeer herding Sámi. The Sámi were simply ousted from the process and no attention was paid to their needs concerning the survivability of their culture.

6. Possibilities For the Future

Today, general awareness of and interest in indigenous customary law might


16 Act 458/1952 (Laki Kemijoen vesistössä olevan koskiomaisunen luovuttamisesta ja vaihdosta, the so-called Kemijoki Act on Kemijoki River).
be stronger than it was at the time of reservoir construction. In the mid twentieth century when the reservoirs were constructed the legal (statutory law –based) protection of the Sámi as an indigenous people was much weaker than today and there was practically no protection of indigenous people’s rights by international agreements (international law). The International Covenant on Civil and Political Rights adopted by the United Nations General Assembly came into force in 1976 and Finland joined the Convention for the Protection of Human Rights and Fundamental Freedoms (ECHR) in 1989. An example of stronger protection of indigenous customary law can be found from, although not (yet) ratified by Finland, the ILO Convention no. 169 concerning Indigenous and Tribal Peoples in Independent Countries, where in the 1st section of Article 8 it is stated that “[i]n applying national laws and regulations to the peoples concerned, due regard shall be had to their customs or customary laws”.

These developments should encourage a revision of the legal framework within which conflicts between the Sámi people and the Finnish state, such as the case of Lokka and Porttipahta, might be considered and resolved. In fact, there really should be no obstacles in applying simultaneously two (or more) legal systems or laws in a country such as Finland. We already live in a legally pluralistic country as both the national legislation and the European Union legislation (regulations and directives) are in force and observed.17 Sámi customary law could also be given a higher status as a source of law than it has today, at the very least it should be utilized as a guide and a source of information for legislators and administrators of law dealing with issues concerning the Sámi culture.

Sámi reindeer herder Pentti Nikodemus speaks with the Russian and Finnish students during Snowchange community documentation in September 2002. Picture: MK

17 About coexistence of Finnish national law and EU law see Jyränki 2003.
A trail with wooden planks in the wilderness. Picture: EM
Part IV
Pekka Aikio and Tero Mustonen: Conclusions

How do we then move forward? How do the damages end? Are there mechanisms that have allowed the situation to be addressed in other Arctic societies and perhaps more widely? Where do we begin?

UN Declaration on the Rights of Indigenous People (UN 2007) indicates that:

1. Indigenous peoples and individuals have the right not to be subjected to forced assimilation or destruction of their culture.
2. States shall provide effective mechanisms for prevention of, and redress for:
   (a) Any action which has the aim or effect of depriving them of their integrity as distinct peoples, or of their cultural values or ethnic identities;
   (b) Any action which has the aim or effect of dispossessing them of their lands, territories or resources;
   (c) Any form of forced population transfer which has the aim or effect of violating or undermining any of their rights;
   (d) Any form of forced assimilation or integration;
   (e) Any form of propaganda designed to promote or incite racial or ethnic discrimination directed against them.

Clearly the attack against the reindeer herding Sámi constitutes as a cultural genocide. So we need to think hard and long about the mechanisms by which we can address the wrongs which have happened.

First step has to do with the documentation of the real situation and exposing it to the public view. Some Arctic examples have shown to be promising. Today there exists an ever-growing number of academic publications regarding questions of sustainability, climate change, Indigenous peoples and other related topics. The trouble with these voices is that they remain in the ivory towers of academia and rarely have an on-going link to the issues in the damaged communities after they have been published.

But there are exceptions. In 1970s the Canadian government initiated a plan to construct a gas (and eventually oil) pipeline along the Mackenzie Valley and river in the Northwest Territories. The local Inuvialuit and First Nations voiced their opposition to this process. Government responded by initiating a Royal Commission headed by Justice Thomas Berger (1977) to look into the matter.

Thomas Berger and his Commission conducted a relevant and precise survey of the situation regarding the proposed pipeline. They took several years to conduct the work and collected evidence and oral histories from dozens of Indigenous communities, both Inuit and First Nations alike over territories of hundreds of kilometres. More importantly, Berger and his colleagues went into the Indigenous communities to listen what the people had to say in Indigenous peoples’ own terms.

The results were published in 1977 in a book ‘Northern Frontier, Northern Homeland – The Report of the Mackenzie Valley Pipeline Inquiry’ (Berger 1977). Berger recommended the government to stall the construction of the pipeline until such a time that the grievances of the Indigenous peoples are heard.
At the heart of their issues were concerns for the land and Indigenous subsistence lifestyles. Berger recommended that the questions of Indigenous land claims and self-governance should be explored and solved prior to any industrial development of the area. Surprisingly to many, the government of Canada followed the advice of the Berger Inquiry. Following years saw the signing of the Inuvialuit Final Agreement for the local Inuit land claim and negotiations for the similar processes for the First Nations of the area. The pipeline has not been built.

Even though the Canadian society and the civil debates are far removed from the situation of Finnish Sámi areas, what matters here is the structure of the work done by Berger. We are not advocating methods from 1970s. Instead we wish to reposition the crucial tools that are available in Bergers work. Similar, culturally modified and appropriate measures are urgently needed in the Finnish Sámi areas as soon as possible. Only then the human rights of the Sámi can be respected at last.

Based on the wide collection of materials ranging from oral histories of the local people to reference and scholarly publications that have been the material for this book we feel that similar steps as what Berger (1977) did should be initiated in Finland. These measures should include:

1. Revisiting specifically the events, processes and all relevant social issues surrounding the creation of the Lokka and Porttipahta reservoirs and harnessing of Kemijoki using the latest scientific, legal, Indigenous and other epistemologies to have a clear view of the situation. We expect that such a new inquiry should also lead to a reassessment of the impact on the Sámi of the region including assessment of further compensations.

2. Recognition of the conflict of inter-

The last old growth forests of Finland are left in the national and nature parks as well as along the eastern border with Russia. Picture: EM
ests between the Sámi, the Indigenous peoples of Finland and the state over the land and water ownership, Indigenous rights and Indigenous governance of Finnish part of Sápmi, the Sámi homeland. The Finnish state has the obligation it has inherited from the Swedish and Russian Crown to look after the rights of the Sámi in the areas where they live. The Sámi of Finland have never ceded any of their rights or title to their lands away in an agreement with the state.

3. All industrial activities should be ceased until such a time that the rights and relevant other processes have been cleared. A full moratorium should come into effect immediately.

4. Finnish government should issue a state apology regarding the cultural genocide and colonial acts that have been done against the Sámi in Finland.

5. Following the models developed by Berger (1977) and others, a full community-based hearing and documentation process should be initiated regarding the events surrounding the Sámi situation in Finland. This process should start from the Vuotso region (as indicated in item number 1) and address the events that have taken place regarding the construction of Lokka and Porttipahta reservoirs. These inquiries should be done in a culturally appropriate manner that honours the Sámi knowledge, culture and ways of being. Once the Vuotso area investigations have been conducted, similar community-based processes should be enacted in all Sámi communities across the areas where Sámi live in Finland. An international Commission of neutral parties should be called to monitor this process.

6. The aim of all these measures should be a long-term agreement between the state and the Sámi regarding the rights and the title to the waters, land, air and all things of Sápmi.

Only after these measures have been taken we can determine the future of these two nations living in Finland, the Sámi and the Finns. This book has shown the way in identifying crucial key issues that have affected one of the regions where the Sámi of Finland live. We hope that by sharing the voices of the impacted peoples we have been able to offer in a small way the affected parties a way to tell their stories at last.
Seed bearer pine.

Picture: EM
Almost a year has passed since the first edition of this book was released in December 2010. This second edition has been corrected regarding language and spelling mistakes and this afterword has been added. The first edition of Drowning Reindeer, Drowning Homes – Indigenous Sámi and Hydroelectricity Development in Sompio, Finland was released in Helsinki in the annual workshop of the UN Association of Finland. It was given to the Minister of Environment Mrs. Paula Lehtomäki. Additional copies were delivered to the President of Finland Tarja Halonen and other members of Parliament and the Government during December 2010 and January 2011.

Large and mixed media coverage followed the release of the first edition. Regional news agencies, such as YLE Lappi as well as national newspapers and magazines such as Apu picked up the story of the book. However some national news outlets, including Helsingin Sanomat and others were absent from the release of the publication even though a member of the Government, Minister of the Environment was present. During the Spring 2011 Drowning Reindeer, Drowning Homes was distributed to international audiences interested in the topics at least in Peru, India, Canada, the UK, Russia, Norway, Sweden, USA — many of these disseminations took place as a part of the Snowchange Cooperative and UN Association Indigenous events and workshops. The first edition was out of print by the Summer 2011.

Let us then turn to the impacts and observations of the situation in Vuotso and how this book was perceived locally. 7th December 2011 the regional state-owned YLE Lappi carried the following news story “Tutkimus: Vesivoiman rakentaminen vahingoitti saamelaisia” / “Research finds – Construction of Hydro-Electricity Damaged the Sámi”.

In the article and radio interview it says that:

“Mustosen mukaan valtio poltti sodasta selvinneiden saamelaisten kodit tekoaltaiden tietä. Mustosen mukaan altaiden alueella asui 640 ihmistä, joista 560 joutui jättämään kotinsa. Heistä suurin osa oli saamelaisia.” / “According to Mustonen the State of Finland burned Sámi homes to allow the construction of the reservoirs. These homes had survived the Second World War. According to Mustonen 640 people lived in the areas of the planned reservoirs. 560 of these had to leave their homes. Most of them were Sámi.”

Our book caused many debates in Vuotso amongst the survivors of the reservoir construction. This news coverage furthered the debates. I explained to the journalist at YLE that from the viewpoint of human geography the historical residents of the area consisted of so-called Forest Sámi who adopted Finnish farming life ways in the region by 1800s, the North Sámi who arrived in the region in the 1800s and have the status of Indigenous peoples today and then ethnic Finns. The 560 who had to leave their homes come from this background of three ethnicities. I also stated to the journalist that the aim of our book is to illustrate the experiences of the Indigenous peoples, the North Sámi, but we should assess, understand and reflect the total damages of the construction to all livelihoods, peoples and communities of the region in order to better learn from the process.
Pekka Aikio together with Toivo Jaakkola conducted dozens of interviews in the region already in 1968-1970 on the topics of the reservoirs and their impacts. They conducted the very first gathering of research material related to human sciences in the area. Aikio and Jaakkola spoke to members of all three ethnicities in the region. The interviews were targeted to other people too instead of only focusing on the North Sámi. These archive materials are a crucial source of additional information in the future inquiries into these topics. Pekka Aikio then continued with the human-induced environmental changes analyzing them in relation to reindeer herding and the forms of self-sustaining life.

Afterwards some criticism was directed to the number of indicated to be “Sámi” people, 560. I wrote online in January as a reflection that indicating the human histories of the region include the three ethnicities – descendants of the “Forest Sámi”, the North Sámi and the ethnic Finns. From human geographical viewpoint most of the 560 can be seen as having Sámi heritage but it is not the task of scholars to define the ethnic identities of today. Instead our book started from the position where the Sámi and not only the North Sámi are the Indigenous peoples of the region by law and constitution, and as the aim of the UN Association of Finland was to disseminate the impacts of hydroelectricity on the Indigenous peoples, i.e. the (North) Sámi, hence the focus of the book. Debate and discussion of the “Forest Sámi” Finns and North Sámi and the identity politics of these topics is beyond the scope of such a book and resources we had available during this work. It is important to note too that in the Finnish context the Indigenous rights of the North Sámi manifest strongest in their relationship with the reindeer and reindeer herding. Therefore the damages to the reindeer herding should be a special focus of the research in the region.

Through this discussion of the news piece we arrive at the delicate situation of the Sompio–Vuotso region today. Reactions to the news stories and media coverage in the village was mixed. Older Finnish men (with links to the Forest Sámi heritage) said that they are tired of the old damages and discussions – as one of them said “let what is beneath the waters remain there.” Women, especially the younger generation in the village was on the other hand glad that these issues are emerging as a debate again. Then the North Sámi in the village – most of them directly impacted by the reservoirs and the loss of language and so forth – seemed to welcome the debate too.

We in Snowchange had a long self-reflection about the rights to open such a painful experience again as outsiders. What are the responsibilities in such a case? Simultaneously in the national debate - for example on Face book and YouTube where videos and other visual materials can be found of the process – welcomed the "hidden histories" of our colonization of the Sámi. Many Finns in the south are now more aware of the history of the shame that we have towards the Sámi. The recommendations that we are offering as mechanisms for addressing these damages are more relevant day by day today.

In order to address the needs and wishes of the people of Vuotso we organized a large workshop in February 2011 to discuss the reservoirs and their impacts there. Over 40 people participated, most of them North Sámi, but some other community people were present too. The overall message from the first workshop was that the book had identified correctly the events, damages and stories of the local people and was much needed. Most of the criticism was
directed towards the English language of the publication. Plans were drawn for another Finnish and perhaps Sámi language editions in 2012 and 2013 to allow more access and discussion in the community in the languages of the local peoples. New workshops will be organized too as needed. Another workshop was held in Inari, the “Sámi capital of Finland”, where similar overview of the research process and findings was held. Debate has continued on the pages of the local “Sompio” newspaper too.

In the months after the publication of the book several phone calls, letters and emails have been received. Snowchange is planning to continue in cooperation with the UN Association of Finland the workshops devoted to the themes of Lokka and Porttipahta and their impacts on the Indigenous Sámi and other local people of the region. But ultimately it will be the communities, families and individuals, Sámi and non-Sámi themselves, who need to find ways for the healing of damages and constructive dialogue to survive the biggest single damage ever caused against culture, nature and land that Finland has seen in modern times. We hope our work is contributing towards this crucial goal, as it is our national responsibility to address the damage we have caused. This process will continue.
References


MURTOMÄKI, Eero. Interview with the author, 30th June 2010.


NISSILÄ, Pentti, Porotalouden asema Saariselän seudun luonnonvarojen moni- ja tautien hallitseminen. 1970 Oulun yliopisto, maantieteen laitos.


SALIN, Tiina, NIEMINEN, Mika and MUSTONEN, Tero. Sámi Nation Environmental Concerns from the community of Purnumukka and Vuotso Region. In a book MUSTONEN,


UNITED NATIONS. UN Declaration on the Rights of Indigenous People, 2008.


About the authors:

**Antti Aikio** is a Sámi scholar focusing on the legal issues of the Arctic Indigenous peoples. He is connected with the University of Lapland in Rovaniemi, Finland.

**Pekka Aikio** (Reindeer herder, Ph D h.c., M.Sc.) is a longtime leader of the Sámi of Finland. He comes from the reindeer herding community of Sumpio which was impacted by the reservoirs.

**Kaisu Mustonen** (Master of Social Sciences – Human Geography) is a specialist regarding the questions of biodiversity and Indigenous women in the Arctic. She has worked extensively in the North American Arctic, Iceland, Sámi areas and Siberia among the northern subsistence communities. She lives in the village of Selkie, North Karelia, Finland.

**Tero Mustonen** (Doctor of Social Sciences – Human Geography) is the Head of International Affairs of the Snowchange Cooperative based in Finland. He has worked in the North American Arctic, Faroes Islands, Iceland, Sámi areas and Siberia among the northern subsistence communities. Mustonen is a winter seiner and the head of village of Selkie, North Karelia, Finland.