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Chair

Mr. Scott Simms

Standing Committee on Fisheries and Oceans

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● (0900)

[*English*]

The Chair (Mr. Scott Simms (Coast of Bays—Central—Notre Dame, Lib.)): I call the meeting to order.

Good morning everybody. I was going to say welcome to Miramichi, but I think I'll let Mr. Finnigan do that. I haven't been back here in years and it's absolutely as gorgeous as I left it.

This is the Standing Committee on Fisheries and Oceans from Ottawa. We are a committee that vets legislation primarily, but we also do studies, which is why we are here today. We are currently embarking on two studies. We just came from Newfoundland and Labrador for the cod study. Now we're here for the second study. We passed a motion on April 21, 2016, introduced by Mr. Finnigan, the member of Parliament. It states that the Standing Committee on Fisheries and Oceans agree to undertake a comprehensive study on the conservation, restoration, and socio-economic issues related to the Atlantic salmon in Canada.

We thank our witnesses this morning, but we're going to depart from that for just a moment. I'm going to ask the MPs to introduce themselves, so you see the composition that we have. We have three parties represented: Liberals, Conservatives, and NDP.

With that, I'm going to ask Mr. Finnigan, who probably doesn't need an introduction, to go ahead, please.

Mr. Pat Finnigan (Miramichi—Grand Lake, Lib.): Thank you, Mr. Chair.

Again, welcome to beautiful Miramichi. We'll get to tour a good part of it in two days. I want to thank the guests invited to appear here. They're very passionate, as everyone on the Miramichi is. The rich history of the salmon, at one time commercial and now recreational, fishery is very important. I think we're still looking at numbers around $20 million a year.

Again, I just want to say welcome, please talk to the people here because that's what it's all about. The fishery has been here for hundreds of years and we're hoping that it will be here for many hundreds of years. I welcome Mr. Collins this morning.

That's my welcome. I'll pass it on to my next colleague.

Mr. Ken McDonald (Avalon, Lib.): Thank you, Pat.

My name is Ken McDonald, Liberal MP for the Avalon riding in the beautiful province of Newfoundland and Labrador. I'm delighted to be here this morning and quite pleased to see a number of people here to present to the committee, as we clue up our salmon study.

Pat was very passionate and very determined to make sure that this study got done. He expressed to us the need and what's happening, especially on the Miramichi River. We're delighted to hear what you have to say about that today to give us some factual information that we can bring back and have a look at.

Mr. Pat Finnigan: Let me just add that I also want to welcome our colleagues from the Restigouche River, which is in New Brunswick and Quebec, and I want to welcome our other two panellists. The Atlantic salmon has the same migratory route and it's all about protecting the Atlantic salmon, so you can't do it in just one area.

The Chair: Go ahead, Mr. Arnold.

● (0905)

Mr. Mel Arnold (North Okanagan—Shuswap, CPC): Thank you, Mr. Chair.

I am Mel Arnold, the member of Parliament for North Okanagan —Shuswap in south central British Columbia.

I definitely have salmon through my riding as well. On the west coast, we have issues with salmon populations, so it's really important that we have this hearing here to see if there are commonalities between the two. Again, I recognize the importance of the Atlantic salmon fishery and the recreational input that's there with that and the economic spin-off from that because we have much of the same in B.C. I look forward to hearing your testimony this morning. Thanks for being here.

Mr. Todd Doherty (Cariboo—Prince George, CPC): Good morning. My name is Todd Doherty. I'm the member of Parliament for Cariboo—Prince George. I'm the official opposition critic for the Asia-Pacific gateway, but also for Oceans and Fisheries and for the Canadian Coast Guard.

In our riding, as Mel has said, we have a long-standing salmon fishery, in terms of our first nations and our recreational fishing as well. I'm very excited to be here with our colleagues. I know that we've gone around and said Liberal and Conservative, but I echo my comments from yesterday that once we're elected we represent all.

I'm excited to be here. We've had a great three days of testimony on the northern cod. I'm looking forward to the passionate testimony today. I'm also looking forward to working with our committee members afterwards in developing an action-based plan after our study's done. Thank you for being here today and I really look forward to your testimony.

Mr. Gord Johns (Courtenay—Alberni, NDP): My name is Gord Johns. I'm the member of Parliament for Courtenay—Alberni on Vancouver Island. It's a coastal community. Salmon is important to our community. We always tell people that the health of our salmon reflects the health of our communities.

I'm excited to hear from you today. I think we have a lot of similar issues, and being a coastal community, salmon is critical to our health and well-being. I'm excited to hear from you.

The Chair: As you can see, our prescribed seating plan follows our party system, such as politics dictate, but we're a cordial group. This committee has a history of working together despite party divisions, and we must be cordial by now because we've travelled so much together.

Nevertheless, let's go to our witnesses. You're the reason we are here. I'm going to give you a brief introduction. What we normally do following this is that we give you up to 10 minutes to do your presentation. You don't have to take 10 minutes. You can take two minutes, you can take one, if you wish. Following that, we go to rounds of questions.

As a brief introduction, I want to welcome Catherine Lambert Koizumi, executive director of the Mi'gmaq Maliseet Aboriginal Fisheries Management Association. Thank you for joining us.

From the Miramichi River Environmental Assessment Committee, we have Mr. Harry Collins, executive director. From the Miramichi Watershed Management Committee, we have Deborah Norton, president; and from the Restigouche River Watershed Management Council, we have David LeBlanc, chief executive officer.

Have there been any documents distributed? We normally distribute them to the members, but we have this rule in the standing orders that if something is presented, such as any written submission from our guests, it has to be in both languages or we aren't allowed to distribute it, unless we get unanimous consent from the committee to accept it in one language. I think we have one in English. Do we have it *en français*?

Can I get unanimous consent from the committee to receive the input? It looks like we have consent.

That being said, Ms. Lambert Koizumi, we're going to let you go first, for up to 10 minutes. Thank you.

Ms. Catherine Lambert Koizumi (Executive Director, Mi'gmaq Maliseet Aboriginal Fisheries Management Association): Good morning, everyone.

[*Translation*]

I'd like to thank the committee for undertaking a study on the wild Atlantic salmon, and for inviting the Mi'gmaq Maliseet Aboriginal Fisheries Management Association to give testimony this morning.

As executive director of the association, and as a biologist by training, I am going to try as best I can to share with you the importance of addressing the challenges involved in the sound management and conservation of the Atlantic salmon, a species at the heart of the identity of the Mi'kmaq and Maliseet peoples.

I will start by briefly introducing our organization, and will then share certain results from the study we completed this year on Mi'kmaq and Maliseet ecological knowledge of the Atlantic salmon. I will end with certain challenges and preoccupations related to the management and conservation of that population.

Our association is a non-profit created in 2012 through DFO's Aboriginal Aquatic Resource and Oceans Management Program, or AAROM. Our members are from three first nations located in Quebec's Gaspésie and Bas-Saint-Laurent administrative regions, namely, the Mi'kmaqs of Gesgapagiag, the Mi'kmaq Nation of Gespeg and the Maliseet First Nation of Viger.

Our mission is to promote the sustainable development and conservation of aquatic and oceanic ecosystems on our member communities' territory and in their areas of activity, while fostering their interests and promoting their involvement in co-management processes.

The association is a forum for discussions and information-sharing between members, and advances the development, autonomy and innovation of Mi'kmaq and Maliseet fisheries, while fostering the inclusion of traditional aboriginal knowledge in the scientific approach.

In 2013, we embarked on a research project to document traditional Mi'kmaq and Maliseet knowledge about 14 species at risk in the marine portion of the St. Lawrence. In all, 28 participants from our three member communities took part in the study. They were selected or recommended because of their knowledge of the species under study, including the Atlantic salmon, known as *plamu* in the Mi'kmaq language, and *polam* in Maliseet.

Our study showed that the Atlantic salmon is at the heart of the Mi'kmaq and Maliseet peoples' culture, and is considered a vital link with the culture, with a way of life, and even with survival on reserves, according to certain respondents.

The Atlantic salmon has always been an integral part of the Mi'kmaq diet. According to our study, the fish is mainly used for food purposes in Gesgapegiag and Gespeg. Most of the time, it is shared within the community, or between relatives, friends and elders. Atlantic salmon is also shared at traditional ceremonies such as powwows.

Most of our study participants learned to fish for Atlantic salmon at a very young age, thanks to their family and friends. The rivers where the Atlantic salmon is fished by our participants are numerous: the Cascapedia, the Little Cascapedia, and the Nouvelle and the Bonaventure near Gesgapegiag; the Malbaie, Saint John, York and Dartmouth near Gespeg; and the Rimouski and Mitis in the Lower St. Lawrence, among others.

The participants' observations regarding the status of the population vary by river and by period. Overall, significant declines have been observed in several rivers in recent decades.

During our study, the participants noted several conservation challenges and made several management recommendations. I'd like to present those to you.

Firstly, to preserve the salmon's habitat, forestry practices need to undergo significant improvements and must be supervised more rigorously, because they are tied to siltation in resting pools and spawning areas, with run-off, and, when the snow melts, with flash flooding.

Another issue that affects habitat are the jams and obstacles to spawning, which should be catalogued and addressed to enable the salmon to follow their migratory route.

Overfishing risks, not only in the rivers, but in the oceans as well, are the third issue. This overfishing calls for increased monitoring. In this regard, I should mention Greenland's commercial salmon fishery in the Atlantic, which is clearly extensive enough to have a deleterious effect on the salmon population.

● (0910)

The Chair: Ms. Lambert?

Ms. Catherine Lambert Koizumi: Yes?

[*English*]

The Chair: Madame Lambert, excuse me. I'm really sorry for interrupting. We've had a request from translation. Could you slow down just a little bit?

Ms. Catherine Lambert Koizumi: Yes. I'm sorry.

Mr. Todd Doherty: Could I ask if we can get the speaker moved to perhaps over here? We're finding it's mixing in with the translation, and we're having a harder time.

The Chair: Okay, we'll take two or three minutes to do that.

Ms. Lambert Koizumi, my apologies. The clock has stopped, obviously. You will have about five minutes as soon as we fix this.

We'll adjourn for a few minutes just to get the situation fixed.

● (0910)

(Pause)

● (0920)

The Chair: Okay, everyone, welcome back. It seems we have the problem fixed.

Thank you, Mr. Doherty, for that.

My apologies to Ms. Lambert Koizumi.

You have up to five minutes. Please, go ahead.

[*Translation*]

Ms. Catherine Lambert Koizumi: I had reached the third management recommendation, so I'll continue from there.

There are risks associated with overfishing, not only in rivers, but in oceans as well. This overfishing calls for increased monitoring. I should mention commercial salmon fishing in the Atlantic, notably in Greenland; it is clearly extensive enough to have a deleterious effect on the salmon population here. In this regard, we suggest adopting an integrated management of this species at the provincial, federal and international levels— with a place for first nations at each level—to determine catch levels consistent with salmonid conservation.

Several participants decried the catch-and-release method. They consider it a major cause of mortality, illness and vulnerability in salmon. Several salmon are found dead along the banks after being caught and released into the water, in so-called sport or recreational fishing. The effects of release on the salmon should be looked at and analyzed seriously.

The fifth point is predation, primarily by seals, but also by striped bass. Both species are becoming more numerous in the region. In fact, last summer, our association commenced a study on the presence and distribution of adult striped bass along the southern Gaspé coast, to get a better idea of the scope of the phenomenon.

Sicknesses affecting salmon in certain rivers could be related to water contamination and climate change, whose effects on salmon are still not well-known.

Invasive species constitute the seventh issue. Certain participants referred to the rainbow trout, which was introduced in certain waterways, and constitutes a potential threat to smolts.

The eighth point is about the fisheries agreements. The Mi'kmaq of Gesgapegiag entered into an agreement with the provincial government to temporarily stop fishing for food, social and ceremonial purposes, so as to facilitate salmon population growth in the Cascapedia River. The agreement appears to have been successful, but today, several members of the community would like to resume salmon fishing, which is a fundamental component of the traditional Mi'kmaq diet, and way of life. Efforts should be deployed to facilitate the resumption and pursuit of this traditional activity.

The last matter I will mention is raising awareness about the rights of indigenous peoples. In our study, it was noted that awareness-raising efforts are needed to enable the general public to better understand and accept the rights of first nations to fish wild Atlantic salmon.

I would personally add two recommendations to those made as part of our study. The first is about oil and gas. Exploration and development activities risk seriously damaging or destroying ocean feeding areas that salmon need to use before returning to the rivers to spawn.

There is also genetically modified Atlantic salmon, an aquaculture product approved last spring by Health Canada, which will be the first genetically modified animal to make its way to our grocery shelves. The approval was given unbeknownst to aboriginal peoples, without consultation, and, in our view, without having assessed the risks for wild salmon populations. One accident is all it would take to inadvertently contaminate the Atlantic salmon genetically. As far as these points are concerned, I think it would be in the federal government's interest to be much more prudent about the potential repercussions, not only for the salmon, but for our ecosystems generally.

I will conclude by quoting Mr. Terry Shaw of Gespeg, a director of our association, who took part in our study:

> This species holds symbolic meaning for our traditions and for our identity as an aboriginal community. My ancestors fed on this fish for many generations, and our people continue to to do so. [...] I believe it's our responsibility and duty to ensure the salmon population remains present and accessible, because, for me, the species is culturally emblematic, and represents us as an aboriginal people.

As you can see, then, the wild Atlantic salmon is intimately connected with the culture and way of life of our Mi'kmaq and Maliseet communities. Several factors threaten this population, but there are solutions to secure the future of this species, today and for future generations.

Thank you very much.

● (0925)

The Chair: Thank you, Ms. Lambert Koizumi.

[*English*]

Next, we're going to go to Mr. Collins. Mr. Collins is from the Miramichi River Environmental Assessment Committee.

Mr. Collins, you have up to 10 minutes. Thank you.

Mr. Harry Collins (Executive Director, Miramichi River Environmental Assessment Committee): Thank you for the invitation. I appreciate it. I got the invitation late yesterday afternoon, so we rather scrambled to put together something. However, we have had discussions previously with Mr. Finnigan, and we thank him for that audience earlier. I look forward to sharing some of these points with the rest of the committee today.

The Miramichi River Environmental Assessment Committee has been active on the Miramichi River since 1998. We have had long-standing activity on the river. We have been observing with a lot of very credible science since that time not only the freshwater system but also the Miramichi estuary, which is a large estuarine system that's very productive, or at least has been in the past.

Something we've noted over that time is that, to no surprise, with the collapse of industry.... We've had base metal mining on Tomogonops and that is pretty much gone from the watershed now. In fact, you could say it has gone. We've had the pulp and paper sector here, which has collapsed within the last 27 years. Let's say we're looking at that time frame. That industry is now gone. We have other major industries that have collapsed as well, all of which have had input in the river and all have been measured in the past. Those impacts are pretty much gone.

On the positive side for the environment, all the collapses of industry are of course positive impacts on the overall environment, because we no longer have the significant impacts resulting. Add to that, we've had two new sewage treatment plants, the major one is having to do with the north side and the south side of Miramichi city. Those came online in this period of time.

That being the case, one would think that all of these things would reduce the impact on our watershed, and it's a large watershed. The Miramichi watershed is 23% of the province. It's a very significant watershed. It's the largest intact watershed within the entire boundary of New Brunswick.

One would think that with those changes you would get a real increase in basic food stocks, the fisheries stocks, and that environmental improvement would be very discernible. In many ways, it is.

However, we have been looking at that over the years, and we do not see what one would expect to see. One has to ask the reason why. One of the things that we had the privilege of hosting in 1996 was "Water, Science, and the Public: The Miramichi Ecosystem". This was a science workshop, and Dr. Michael Chadwick was the editor of that. He took it out as a Canadian special publication of *Fisheries and Aquatic Sciences*. It is available, of course, as that technical document.

We looked at the state of the environment during that time. We had scientists from all over Atlantic Canada, many from federal agencies, provincial agencies, and also universities and local colleges to present to that. This is a compilation of those papers. We even saw, back then, of course, that there were declines in some fish stocks. We also completed a state of the environment report in 2007. That, again, looked at the current status, reflected upon all the collapse of industries and the economic decline, which one would think would improve the environmental performance, but we didn't see that.

With all of these things compiling, we then had about a 10-year hiatus of science altogether for reasons you probably appreciate. We have not had significant science activity by the federal government, especially, on this watershed, and especially the estuary, for the last decade or so. With that in mind, we wrote a letter to the Honourable Dominic LeBlanc on August 8, 2016, and followed that up with a meeting with Mr. Finnigan. I'll share some of the excerpts and our ask to you from that letter.

We mentioned that there have been 27 years of dramatic improvements in the river's environmental condition, and we noted that despite the changes in water quality, our membership perceives worrisome declines in important fish populations. We talked about the two documents that reflected the kinds of changes that are worrisome, "Water, Science, and the Public: The Miramichi Ecosystem", and the "State of the Environment Report for the Miramichi Watershed", 2007.

● (0930)

The most recent report noted disturbing trends in eel, tomcod, shad, smelt, and Atlantic salmon, populations of which the latter two were once the world's largest. With our watershed smelt populations and the importance of that to our watershed, when we see such significant declines....

The cause of these declines is unknown, and we also, as an offset of that, see the decline in the abundance of aquatic shorebirds and predator raptors. Again, on the converse side, we see the increase of striped bass and grey seals. What is the cause of all this? Why are things not improving and, rather, seeming to be going sideways?

There are three requests that we made in this letter. First, we requested the Department of Fisheries and Oceans, of which the honourable Dominic LeBlanc is still, I understand, the minister, to provide a status update of the approved mentioned fish stocks including trends in landings and fishing effort.

For the second ask, we requested support, data, and funding, if possible, for a master's level project that would compare the current and historical states of the Miramichi ecosystem. We would receive technical support from the University of Moncton, the University of New Brunswick, NBBC, the Miramichi Salmon Association, the Atlantic Salmon Federation, and other organizations.

The third ask is to understand that MREAC, the Miramichi River Environmental Assessment Committee, is prepared to support and facilitate this science and would be pleased to meet with you at any time to discuss it further.

With that in mind, we're hoping to rekindle science on the Miramichi watershed. Much of this science can be concentrated in the Miramichi estuary where we see a number of these problems being manifested. That is the essence of that. We as an organization have been around. We have very credible, scientific backgrounds in terms of our membership. The federal and provincial support we've had in the past is now somewhat collapsed as a result of things that have gone on with them in the past 10 years of decline in federal science.

With that, gentlemen and ladies, I rest the case.

The Chair: Thank you, Mr. Collins. I appreciate it.

We have Ms. Debbie Norton, from Miramichi Watershed Management Committee, president. You have10 minutes or less, please.

Ms. Deborah Norton (President, Miramichi Watershed Management Committee Inc.): All right. Thank you.

As pointed out, I am Debbie Norton. I'm the president of the Miramichi Watershed Management Committee. MWMC, as it's referred to, was formed in 1995, and we have a tripartite agreement with the Department of Fisheries and Oceans and their provincial counterpart, DNR, which has recently been renamed, to co-manage the Miramichi watershed drainage.

MWMC is not a conservation group, as such. It's a federation of stakeholder organizations along the Miramichi River. We share a common interest in ensuring the conservation and the wise use of the recreational fisheries resources of the Miramichi recreational fisheries area.

We have four species of concern: wild Atlantic salmon, brook trout in both sea run and residential forms, shad, and striped bass. We contend that the value of the recreational fisheries is a strong motivator for anglers, governments, and the general public to ensure the conservation of the fisheries resource upon which the angling fisheries are dependent. We further contend that the socio-economic value of our recreational fisheries is a major influence on the political will and the public's conscience to ensure a healthy environment and our quality of life here on the Miramichi.

You're going to be hearing me use the phrase, “harvest based on abundance” over and over again. Harvest based on abundance is a little like motherhood and apple pie. It's something that I don't feel we can argue against.

MWMC is urging the government to manage our ecosystems in equilibrium. You've already heard some of our colleagues say that they're not in equilibrium. They're out of control. The way things get out of control is through mankind. We're supposed to be the smartest species going, but we tend to favour one species over another. That allows one population to grow too big and the other to collapse.

Currently, on the Miramichi and in eastern Canada, we're in a position of our ecosystems being out of control.

First, I want to deal with wild Atlantic salmon. Their numbers are in serious decline and that's why you folks are here. We are currently in a recovery phase. There have been different regulations implemented to help rebound this population. We have a system of catch-and-release by anglers implemented in all of New Brunswick. There have been extensive studies done on catch-and-release that show that 3% to 5% of the population of anglers using catch-and-release don't make the grade.

I argue strongly that it's a more efficient way of making sure that our species continues than hitting them over the head. Some people will say that with catch-and-release, some of the fish die. If you hit them over the head when you angle them, then they're all going to die. If they're in the frying pan, they're not going to make babies to supplement our river system.

We are under catch-and-release for all the recreational angling here in New Brunswick. I would like to point out that we have three first nations living along the Miramichi. Two of them, Eel Ground and Red Bank, have voluntarily reduced their catches during the last two years. They have a certain allocation. They did not harvest those because they see the need, and they're playing their role in bringing the salmon numbers back, as well.

Going back to harvest based on abundance and the word “harvest”, there's nothing wrong with harvesting a fish if there is an abundance of them to harvest. We all grew up on the Miramichi eating fish because that was what the good Lord gave us at the time to eat. If there is an abundance of fish, then there's nothing wrong with harvesting them. We're currently working hard to bring those numbers back so that we get into a position where we once again can harvest fish to enjoy.

Second, when we get to this point, we have to have river by river harvests based on the abundance.

● (0935)

My colleague pointed out how big the Miramichi River is. There are actually four main rivers within the Miramichi drainage area. If there's an abundance fish that go up the Southwest Miramichi, it has absolutely nothing to do with the abundance in the Northwest Miramichi, and vice versa. When we move forward here and have fish to harvest, we have to harvest in each river independently, based on the abundance found in that river.

At one time we could predict how many fish might come in the following year based on what was going out, but because of sea mortality and all of these things, we can no longer say that in 2017 we expect *x* number of fish. MWMC is advocating that in 2017 we do counts to determine if there is an abundance of fish to harvest. They're called mid-season reviews. In other words, we're going to count the fish that come up the river from May until the middle of July, and then take a look to see if it looks like we're going to have an abundance. If there is an abundance, there's nothing wrong with harvesting that abundance on that particular river.

Say the number is 500 or 1,000, whatever the number is, the way that we would suggest harvesting it is that a system be designed here in New Brunswick similar to our moose lottery. Moose are allocated based on the abundance of the moose population, it should be the same thing with fish. If I wanted to harvest a fish and there was an abundance, I could put my name in and perhaps get a tag to harvest the abundance of that fish.

I have much to say about Atlantic salmon, but I'm going to move on for the sake of time.

I'd like to point out that the striped bass from the Gulf of St. Lawrence stock are not—and the word "not" is very important—an invasive species to the Miramichi or to this area. They've been here forever. They were in serious decline. I would have to point out that the work of the Department of Fisheries and Oceans is probably the biggest success story ever at bringing a species back in the face of extinction. At one time, not very long ago, it was estimated that we had 4,000 of this particular species. The current number out there is somewhere over 300,000. It's a tremendous success story.

I would like to mention again harvest based on abundance and bringing our ecosystem into equilibrium. Nobody from MWMC is looking to destroy the striped bass. They are not an invasive species. They belong here, but since we do have this great excess, we are looking to harvest more of them. It's a great opportunity for recreational anglers to get out and enjoy fishing, the culture and everything else about fishing.

In 2014 we actually wrote to DFO. The letter is attached. Even back then, when the numbers were only around 200,000, we asked for a number of things. We asked that any bass caught exceeding 55 centimetres be allowed to be harvested. That would eliminate the 2013 slot where many anglers found it difficult to catch a fish to keep. We also asked that any bass caught in non-tidal waters be eligible for harvest since they are preying on fish in that area. We asked that the bag limit per day be set at at least a minimum of four per day, which, in MWMC's opinion, would reduce the population to a healthier level for the overall ecosystem. We asked that a person be able to be in possession of at least 12. This would allow the fishery to continue on a sustainable basis. We asked that pinch-barb hooks be mandatory, thus allowing anglers to continue to angle and release fish without excessive damage. Finally, we asked that the season be opened on April 15 and closed on November 15 of each year.

Since this time, the population has continued to grow. As a result of that, it is MWMC's position that our local first nations on the river should perhaps be given a sustainable commercial harvest licence, which would help to bring down the population and put our ecosystem back into equilibrium.

● (0940)

Another thing that's totally out of whack in our equilibrium here is our seal population. Again, harvest is based on abundance. You will never hear MWMC advocate that we should destroy one species to save another, but we do believe that everything has to be in equilibrium. Currently our seal population is not in equilibrium.

There are currently plans on the table for harvesting and using all of the carcass to be sold to various markets. MWMC would advocate that Miramichi's Eel Ground First Nation, who is a stakeholder with MWMC through its affiliation with Anqotum, be allowed to proceed with a seal harvest here in Miramichi Bay, and should they not desire to do so, that other organizations in a position to harvest be granted the authority to do so.

Very quickly, on the protection of resources, we need more. Miramichi is 12,000 square kilometres. We need additional staffing. We need joint patrols with provincial government enforcement. We need additional training for first nation guardians to make them eligible to do joint patrols. We need technology. There are all sorts of things out there, such as drones. As you'll see today, the officers in the field are in the middle of nowhere. Cellphones don't work. Officers need satellite phones so they can call for backup, and they can relay the messages back and forth. We need better education programs for the communities. Perhaps one of them would be established in a river watch program.

Thank you very much for this invitation. I really hope it helps to increase our salmon population.

● (0945)

The Chair: Thank you, Ms. Norton.

Colleagues, we've had two requests for additions. In this panel and the next, we will fit someone in. However, given the time and the break we had earlier for technical issues, I'm going to have to ask that we extend beyond 12 o'clock. We likely will have to go to 12:15 p.m. or 12:20 p.m. in order to accommodate.

Is that okay with the committee members here? We're good with that?

Mr. Todd Doherty: As long as Pat buys coffee.

The Chair: Pat, apparently you have to buy coffee in order for this to proceed.

Mr. Todd Doherty: Mr. Chair, I think I can speak quite confidently on this for the rest of the panel. We all know that the two to three hours that we're spending in each community isn't enough, so as much time as we can give the witnesses, I think we're all in agreement with that.

The Chair: I think you'll find agreement on that—in addition to Pat buying more coffee; we'll all agree on that too.

That said, Ms. Sonja Wood, would you come up to the panel, please? You'll be after Mr. LeBlanc.

Mr. LeBlanc, you have 10 minutes, please.

[*Translation*]

Mr. David LeBlanc (Chief Executive Officer, Restigouche River Watershed Management Council Inc.): Thank you, Mr. Chair.

Thank you for the opportunity to share our concerns about the Restigouche River area.

My name is David LeBlanc, and I'm the president and CEO of the Restigouche River Watershed Management Council Inc., founded in 2002. I was born in Matapédia, a village known for its salmon fishing, and located at the convergence of the world-renowned Matapedia and Restigouche Rivers. I'm a biologist by training, and have been part of the organization since 2007. The council is involved in dialogue, conservation and protection of the Restigouche River watershed, including the Matapedia and Patapedia in Quebec, and the Kedgwick, Little Main Restigouche and Upsalquitch Rivers in New Brunswick.

The board of directors is made up of 19 people representing the first nations, the fishing lodges, forestry, the public, eco-tourism, public water managers, and other organizations whose work overlaps with ours.

The Restigouche River watershed is an interprovincial territory of roughly 10,000 square kilometres, 60% of which is in New Brunswick, and 40% of which is in Quebec. Restigouche River salmon is an important food resource for the Listuguj first nation of Quebec and the Eel River Bar first nation of New Brunswick.

According to a 2010 socio-economic study at the University of New Brunswick, private-sector sport fishing in the Restigouche River watershed generated $11.2 million and the equivalent of 535 seasonal jobs that year.

As for the challenges in the Restigouche River watershed, although we are aware that there are other important challenges at sea and in the estuary, I will leave it to other groups—such as the Atlantic Salmon Federation, which you will be welcoming this afternoon—to raise the concerns related to maritime migration.

As a river management organization, our council is primarily concerned with issues affecting the salmon's freshwater life cycle. I will therefore be focusing the rest of my presentation on the main issues observed in our watershed.

These past few years have seen an accentuation of changes to the hydrology, resulting from climate change, and from a failure to take the watersheds into account in forestry management planning.

The notable impacts include riverbank erosion, silt and debris in rivers, and impassable obstacles at insufficiently wide culverts, and at the mouths of tributaries. We recommend that approaches which seek to obtain forestry management models for each watershed, such as the equivalent cutting area approach in Quebec, be adopted for New Brunswick's salmon rivers.

The lack of resources for protection and conservation is a major challenge for the Restigouche River watershed. Since the DFO conservation and protection office in Kedgwick was closed, and its resources were moved outside the area, no fisheries officers have been assigned to our watershed. As a result, very few patrols are deployed, and the response times, which are several hours, result in losses of spawners to poachers.

We recommend having a DFO conservation and protection office on the territory of each watershed of an important salmon river, like the Restigouche. The recruitment system for vacancies should be streamlined, and partnerships, including partnerships with first nations, should be made, to ensure there are more officers in the field.

We believe that, in calculating conservation thresholds, the requisite breeding stock levels are being underestimated, thereby overestimating current stocks. We note that the current management target does not take account of all the habitats juveniles can use to spend the first years of their life cycle. To obtain better management targets, we recommend that the target quantity of eggs required per habitat unit be updated, and that the potential habitats be updated.

Yesterday, on one of the watershed's main tributaries, the Kedgwick River, I took part in the annual salmon count. It's a visual count, done while snorkeling. I can confirm that we are still at roughly 50% of the conservation threshold in the Kedgwick River. Last year, the rate was 49%. Thus, the situation remains critical, even when the underestimate of available habitats is taken into account.

● (0950)

It's a problematic and critical situation, not only for the Miramichi River, which is often mentioned, but, increasingly, for the Restigouche River as well.

We think the sectors involved in science at DFO, and the sectors responsible for habitats at the department, need to cooperate more, so the habitat fragmentation issue can be addressed. We notice that the data obtained in DFO juvenile density inventories are not used to identify obstruction problems.

Let me explain the situation in that regard to you. There are inventories in the field. It's noted that there are habitats that were historically used by juveniles, but when there's no salmon in those habitats, there's no communication with the section at DFO responsible for habitats, to tell them that certain historically used habitats are not currently being used. There's no process in place to connect the science with action on habitat and management. We believe the indicators on the density data, and an increase in the number of sites to assess the presence or absence of juveniles, should make it possible to locate obstacles such as culverts, beaver dams, excessively high waterfalls, and log jams. A monitoring program should be developed to ensure habitat connectivity.

A potential increase in the transportation of oil and gas products by rail, without a complete impact assessment, aggravates the risk to the salmon habitat. For example, in our watershed, the Chaleur Terminals project in Belledune, in which 220 tank cars from Alberta would be transported by rail each day, includes 70 kilometres of track near the Matapédia and Restigouche Rivers. The Quebec government has not carried out any impact assessment in relation to this project.

The presence of a greater variety, and greater numbers, of freshwater predators, poses a risk to the Atlantic salmon. For the past few years, we've been observing more cormorants and striped bass in the Restigouche River. There are even seals. The presence of seals more than 125 kilometres from the ocean was noted in 2015. In 2016, it was confirmed that striped bass were caught for the first time in the Matapedia and Restigouche rivers. We believe predator control could facilitate the recovery of stocks in certain cases.

For several years, we have seen the Government of Canada reduce staffing levels at DFO, with negative effects on management, protection, and coordinated action to benefit the Atlantic salmon. However, we are encouraged by the department's recent reinvestment in human resources, notably for a process that seeks to establish a joint research plan for the species.

We have also benefited from the Recreational Fisheries Conservation Partnerships Program. We believe it should be maintained and optimized.

The Government of Canada endowment fund, which is administered by the Atlantic Salmon Conservation Foundation, and the interest from which is invested in projects related to Atlantic salmon, is another good example of a strategy that helps various groups like ours carry out several projects per year. Increased investment in these programs, in hiring management, habitat, protection and research staff, and in the endowment fund, can only improve the status of Atlantic salmon stocks, provided the investments are geared toward concrete action.

I'd like to add a few points that are not in the speaking notes I've provided.

Let's talk about the rights to fish for food in the Restigouche River watershed as it affects the New Brunswick stock. Fishing for food is the only kind permitted for Listuguj and Eel River Bar in our area. We think first nations should be included in the monitoring, management and protection of populations. First nations should be made part of those processes. Programs should be put in place to develop capacity for both the protection and monitoring of stocks. DFO should have partnerships, and should keep close tabs, to encourage the first nations to develop and adopt sustainable fishing plans. An example that comes to mind is the Listuguj community, which has been operating independently under a fishing plan since 1993. DFO should also conduct monitoring, to ensure the agreements and licences developed with first nations are complied with.

Lastly, the budget reductions in research, protection, conservation and science are often seen as an easy way to reduce government spending in the short term, but they do not take the medium and long-term impacts into account.

● (0955)

These days, we're unfortunately living with the consequences of the budget cuts from recent years, and the draconian management measures put in place. For example, the mandatory release of all catches in the Maritimes, and, at present, the release of large salmon in most Quebec rivers, are reducing sport fishing markedly.

Last year, in the Restigouche region, the reduction was roughly 35% in public waters, and this year, it was 31% in Quebec. This situation is creating a major revenue shortfall for local organizations and businesses, which, in turn, risk reducing their investments in research and protection.

Thank you.

The Chair: Thank you, Mr. LeBlanc.

[*English*]

For 10 minutes, we have Ms. Wood. I'm going to ask that you also provide a small biography of yourself because we don't have one here.

Please, introduce yourself and proceed with your presentation.

Ms. Sonja Wood (Chair, Friends of the Avon River Minas Basin, As an Individual): Thank you for having us today. It was an impromptu decision to come here. We only found out about this meeting. My name is Sonja Wood, and this is my husband Chris Mansky. We're here from Nova Scotia and we represent the group, the Friends of the Avon River. The Avon River is part of the Minas Basin and part of the Bay of Fundy.

The Avon River has been slated as an inner Bay of Fundy recovery river by the government team whose focus is maintaining the wild Atlantic salmon within the Bay of Fundy. Forty-two rivers were selected by the inner Bay of Fundy recovery team. The Avon River is one of them. The Avon River is a huge watershed that has tributaries that are also salmon-producing rivers: the St. Croix, the Cogmagun, the Kennetcook, and the Halfway River.

The problem with the Avon River is that it's the only river in Canada that has zero fish passage. This has been studied and confirmed in a study by Lisa Isaacman in 2002. We know this is a salmon-producing river and it's critical in the reproduction of the salmon. We have no fish passage on this watershed, which is huge in terms of the stress of the wild Atlantic salmon.

Since 2004, I've been the chair of the board of the Friends of the Avon River. We have been asking the federal fisheries office to instigate a comprehensive and thorough EIA study on this watershed. When the causeway was put in, in 1968, it was put in without any assessment on the river or how it would impact any of the species that thrived within this watershed.

We do have a serious concern about the numbers and the population and the decline of the wild Atlantic salmon, but we also have concern about the American eel. The Avon River is critical in the reproduction of the female species of the American eel, which in turn will ensure that the numbers won't decline. With this barrier, these species are not getting past into the critical habitats to continue their life cycles and are basically dying in this muddy channel.

The Avon River disaster, as I stated, began in 1968 when the causeway went in. They've seen rapid erosion along the watershed that has basically destroyed 16 freshwater-saltwater marshes. The muddy plug has migrated up the St. Croix, which is basically a dead river now. There are no salmon getting into that river.

We have the Kennetcook River, which is also being plugged by this dirty mud, silty bed, that has been eroding for almost 50 years along the watershed. This plug has migrated down into the Cogmagun, and into the Halfway River, and is really wreaking havoc along the entire Avon River watershed.

Our biggest concern is that we've never seen any type of an assessment done along this river. Our pleas have gone unheard. We've had multiple governments listen to us, but deny our concerns, turn a blind eye. We have huge industry projects happening within the Minas Basin right now. We have tidal projects going on. Alton Gas is preparing to dump salty brine into the Shubenacadie River. The Avon River has a huge highway twinning project going on, and to my knowledge, they plan to build a six-lane bridge, not for the throughway of any fish passage but simply for traffic.

We don't want this to happen without any type of an EIA at this point. This is why we launched the petition, which was submitted on September 21 to the federal government, requesting that we have this comprehensive study finally done on this watershed in order to come up with a way that we can mitigate this issue.

We worked hand in hand with the inner Bay of Fundy recovery team. We sat in on multiple meetings with the Petitcodiac Riverkeeper. We feel that portions of the model that was set in 2007, on the Petitcodiac River, could be used to speed the project along on the Avon River. There would have to be a little more investigation done on the Avon River because we've never had fish passage, so they would have to have a little more involvement.

● (1000)

Nonetheless, we could move this along by taking the model that was set on the Petitcodiac River. Our recommendation is that we look at this seriously right now before any highway project is implemented, or before any other projects within the Minas Basin are put in place. We hope the government's theory of no net loss might be considered here. If we are going to wreak havoc, then perhaps we could do something to fix this issue.

The Avon River used to be noted as the “Big Salmon River”. The population of salmon that used to migrate up this river was so numerous that when you came to the salt water-freshwater hole, the river was jam-packed with so many salmon you could walk across the river on the backs of the salmon. This is what they used to say. Our count this year saw 20 wild Atlantic salmon within this watershed, and our concern is that they're not getting past the barrage barrier. This is, to us, an illegal barrier, and we believe that it's time to do something. We have these species at risk. We know that it's a priority river for the inner Bay of Fundy recovery team, and it's listed on their rivers of recovery. We're asking that this comprehensive environmental assessment be put in place immediately.

Thank you for your time, and we appreciate being here.

The Chair: Thank you, Ms. Wood.

Now we'll go to the next part of our meeting, which is the questions and answers from members of Parliament. We give each member of Parliament a block of time to ask you questions, or they can make comments if they wish. I only ask that because it's a fairly large room, when you're answering a question, share your microphone. Make sure you get close enough to the microphone because we have to record all of this. We have to write a report based on your testimony, so we want to get all of it. One more thing is that I'm flexible on time for the seven minutes when you're responding, but I may need you to wrap up fairly quickly because we're a little tight on time.

That being said, Mr. Finnigan, you're up first for seven minutes, please.

● (1005)

Mr. Pat Finnigan: Thank you, Mr. Chair. Welcome to the committee. I'm excited to have you here in Miramichi. I also want to acknowledge that the Atlantic salmon is not only on the Miramichi, although we claim it's the most famous salmon in the world. We also have many other rivers, including in Nova Scotia. We have a few on the island, and of course in Newfoundland where we just came back from.

[*Translation*]

Ms. Lambert, I will begin with you.

You are talking about cooperation or a study with first nations about the traditional customs or practices that have existed for hundreds of years. Does Fisheries and Oceans Canada consult you, and take first nations' ancient practices and recommendations into account? Do you have good collaboration with the department?

Ms. Catherine Lambert Koizumi: Actually, the study I discussed documents Mi'kmaq and Maliseet ecological knowledge about 14 marine species at risk in the Gulf of St. Lawrence and the Baie des Chaleurs. The funding comes from DFO's Aboriginal Fund for Species at Risk and from AAROM, the Aboriginal Aquatic Resource and Oceans Management Program. We conducted the study, and documented the traditional uses, and the fishing methods —previously harpooning, and then, for the more modern community fishing, nets—from a food, ceremonial and social standpoint. We submitted the report to DFO, and we hope it will consider the information. It's important to make recommendations about the incorporation of traditional knowledge into current practices.

I agree with Mr. LeBlanc's statement that it's very important to work to include first nations in every management cycle for this species.

Mr. Pat Finnigan: Thank you.

I know the Quebec government manages its salmon stocks differently. It's more independent, and does things its way. Fishing in the Restigouche River is a good example of this. On one side of the river, I believe you can keep a salmon you've fished, whereas, on the other side, the “catch and release” rule applies.

Ms. Catherine Lambert Koizumi: Yes, that's the case. Mr. LeBlanc might be able to say more about the subject.

Quebec manages things differently. Management is done for each river with a watershed, and river by river, in contrast to Canada's other provinces.

Mr. David LeBlanc: I think I can provide a clarification on this subject.

Changes have occurred in Quebec this year. Rather than allowing large salmon to be retained from the moment the fishing season begins, people must now wait till mid-season for a count of the river salmon to be done. The results of the count determine whether retention of the fish will be permitted for the second part of the season.

In 2016, the Matapedia River did not achieve its targets, so it was not possible to permit retention of large salmon.

Mr. Pat Finnigan: Thank you.

[*English*]

The next question is maybe for Mr. Collins, but you can all comment if you feel that you could add to this.

Mr. Collins, as you said, we've come a long way over the last 20 years, and maybe it wasn't good economically. We lost a lot of industries that had an impact on the river, whether it was pollution or just the activities along the river. As I said, we've cleaned the river and we have a proper sewage system.

Do you feel that a lot of what's happening to the population is outside the river estuary itself? Is there a whole lot more that we can do that we know would have a big impact on the population? Do you feel that we're now looking at what's happening between the migratory...maybe not only about salmon but all fish species?

Mr. Harry Collins: I guess my point foremost is that we don't know, because they've dropped the ball nationally in science. There used to be a fairly significant effort of doing credible science from various agencies on the estuary. That is the gap that we would like to fill at this point.

We don't doubt for a minute that a lot of these impacts are coming from outside. We have all sorts of things going on with climate change. There are changes in biodiversity, introduced species, a variety of factors that we have a real sense are impacting these changes or this lack of improvement that one would expect. The answer, though, really needs to come through some ongoing credible science.

● (1010)

Mr. Pat Finnigan: This is maybe a question that could be controversial to a point. Do you think, for instance, with the forest practice that we have in New Brunswick and the latest management plan that we've just signed, that we did the proper management as far as our rivers are concerned? Would you comment on that?

Mr. Harry Collins: There is a great deal of concern with the increase of harvesting, the reduction of the wildlife areas, the deer yards, and the management practice. The entire forest sector seems very oversubscribed at this point in time.

A personal opinion—and it's shared by most of our committee around the table—is that the industry is forced into taking a great deal of fibre out of our forests, so yes, we think that's a major impact.

We have several studies from the Catamaran Brook project, which also has pretty much collapsed now. It's a small sub-watershed on the Miramichi. It illustrated that the current buffer zones of 30 metres seemed to be adequate for the larger waterways in terms of filtering out and that doesn't seem to have all that great an impact on water temperatures from what we understand from the various studies from that. But in other ways, just in terms of the volumes, the forest management seems to be entirely out of hand.

Mr. Pat Finnigan: Debbie, it's the second year now that we've had catch-and-release, and you're into that business. What's the response from your customers on the river as far as enjoying the experience and not being able to put that fish on the barbecue? What are you hearing? Has that impacted your business?

Ms. Deborah Norton: As far as my business goes, no, not at all. Most people who come to the Miramichi are thrilled to have a place in the world where they might have an opportunity to catch a fish and put it back. Is it affecting my business, entertaining fishermen from around the world? Absolutely not.

On the other hand, as I pointed out, there is nothing wrong with the concept of harvest based on abundance. I and most Miramichiers grew up harvesting fish. We're very much looking forward to that point in time when we've built the stock up so that we once again can harvest. We're working hard at it. People would like to have a choice. What I see is that we can only play the cards that we've been dealt. Because of many reasons, the stocks are in decline right now, and everybody has to play the cards that they've been dealt to try to restore these stocks.

The Chair: Thank you, Mr. Finnigan, and thank you, Ms. Norton.

Mr. Arnold, you have seven minutes, please.

Mr. Mel Arnold: Thank you, Mr. Chair, and thank you all for your testimony this morning. I have a few questions and I will try to get through them as quickly as I can.

Debbie, I think it was you who mentioned that the ecosystem is out of balance, and I heard it from a few of you this morning. Are you speaking about predator-prey relationships or actual water quality issues? Or is it both? Can you elaborate a little further on the ecosystem being out of balance?

Ms. Deborah Norton What I was referring to is the predator-prey relationships. Everything has to eat, so if you have 100,000 more of one species that has to eat something, it's going to eat everything, including itself. Things have to be in harmony. We can't have 100,000 or 300,000 of one thing, or half a million of one thing, and only have a few of the other. It's harvest based on abundance. Everything needs to be in balance, so it can sustain itself.

Mr. Mel Arnold: Okay, thanks. I'm quite familiar with the predator-prey imbalance. We have some issues with wildlife management in B.C. and you can't manage one species without managing all the other species that are related to it.

Someone mentioned the railway, 70 kilometres of railway. Was that a new railway that was put in, was it existing, or expanded? You mentioned that there was no impact study done on that. Can you tell me a little bit more about the history of it and what ships along that rail?

● (1015)

Mr. David LeBlanc: It's an existing railway, but to ensure the stability and sustainability of that connection, as an example, last year, Canadian National filled up a salmon pool on the Matapedia River to stabilize the railway because it's so close to the river. They did that quickly without proper government permits and in a way that was not sustainable for the salmon pool. They filled up the pool to ensure that eventually the transportation to Belledune would be secure.

Mr. Mel Arnold: Was there any enforcement or retribution for that? Was it just allowed to happen and basically ignored?

Mr. Todd Doherty: Sorry to interrupt. Could I just get a clarification? What do you mean by “they filled up a pool”?

Mr. David LeBlanc: They put about 3,000 tonnes of rock in the salmon pool.

Mr. Mel Arnold: This would have been a deepwater refuge.

Mr. David LeBlanc: It would have been one of the good salmon pools on the Matapedia River, so you can see that the priority was the railway, not the salmon habitat.

Mr. Mel Arnold: Was there any remediation work done there—

Mr. David LeBlanc: Because of the local group complaining about it, with the support from all the salmon organizations, Canadian National had to apply and do some restoration work on another tributary to compensate for that, but that was not the plan at the beginning. They just did that with three steps instead of one, just to divert from the environmental study process.

Mr. Mel Arnold: Thank you.

I'll leave this open to anyone in the group this morning. What are the trends for the recreational fishery participation, both by the residents and from the tourism part of it since you've started to see the decline? Is one growing and another one shrinking? Are there any differences in trends with the fishery on the river, whether it be tourism-related or local-interest related?

Mr. David LeBlanc: For the Restigouche River, what we've seen is that the public waters have seen a reduction of users. As I said, it was 35% last year for the crown reserve in New Brunswick, and in Quebec, with the adjustment to the new management plan not allowing retention of large salmon, we saw a 31% reduction on the Matapedia River for that organization. In Quebec, it's a river-by-river management plan and the management is through local groups, so the Matapedia River is called the CGRMP. Last year at this time of year, they had 6,400 rod days, but with the impact of this new change, this year they lost 2,000 rod days. For an organization with a $1-million budget, it's probably a loss of $150,000. Since they have to provide protection, we expect that next year there might be some cuts into their protection resources.

Mr. Mel Arnold: Thank you.

Ms. Deborah Norton: For non-residents on the Miramichi, it doesn't appear to be having an impact. However, the first year that we went catch-and-release, there was a real impact on residents deciding that they didn't want to fish that year.

I just returned from a wildlife trust fund meeting, where we get revenue based on licence sales. The revenue on fishing licences is up quite dramatically in 2016 compared with 2015. It appears that numbers of people have decided to come back and go fishing again.

Mr. Mel Arnold: Thank you.

I have only a minute left, so it's probably not enough time to ask this. I'm just wondering, does anybody have any idea if there's a single smoking gun out there? We heard about the Cohen commission on the Fraser River sockeye, with pages and pages, volumes, of testimony, but there was no single smoking gun that anyone could point at. We also haven't heard whether you feel there's any impact from aquaculture in the area as well.

There's no single smoking gun? Is there any one thing you could target to turn things around?

● (1020)

Mr. David LeBlanc: For us on the Restigouche, being a forestry watershed, the impact of forestry is major. The change in peak flows is amazing. This year especially, with the ice run we had last year, we've had peak flows and floods. That's changed the river system big time in terms of debris, siltation, and sedimentation. That's a big concern for the Restigouche River.

With regard to the salmon, as everybody knows, so many things are having an impact on the rivers, the estuaries, the oceans. We cannot point at one thing.

[*Translation*]

The Chair: Thank you, Mr. LeBlanc.

[*English*]

Thank you, Mr. Arnold.

Mr. Johns, you have seven minutes, please.

Mr. Gord Johns: Thank you, Mr. Chair.

Thank you for coming today. It's been so valuable to get your insight and opinion. I'll try to be as quick as I can in my questions.

Ms. Koizumi, you talked about aboriginal fishing rights. I'm wondering if there's a co-management model that respects aboriginal fishing rights here in your region.

Ms. Catherine Lambert Koizumi: It's our mission to help improve the co-management model. I think it really varies region by region. The model we have in our region in Quebec might be different from the one they have in the gulf and in different areas of the country. Generally the salmon in Quebec are also managed with the provincial government. That adds a bit of difficulty, because it's quite complex. It goes river by river.

I think there have been some great successes. In general, first nations are involved in the management of the river. That's the case for the Cascapedia River and it's the case for the Restigouche River as well. I think that can be further improved, of course, and I think first nations ought to be part of each step in the management process, in collaboration with scientists, other local users, and government.

Mr. David LeBlanc: Can I add something to that?

Mr. Gord Johns: Yes, please.

Mr. David LeBlanc: For the Restigouche River, there is agreement between the governments. The Listuguj government, as an example, has a contract. There would be a service contract with the Province of Quebec and also an agreement with Fisheries and Oceans. These are mainly contracts—$430,000 with Quebec, $430,000 with the feds—so that they can have rangers, they can have resources for science, and they can have equipment and subcontracts to help them manage their fishing plan.

As an example, for Listuguj that money allows them to have 40 rangers to manage their fisheries: 40 rangers is more human power than all protection officers on the whole Gaspé coast. That's a lot of people available for protection, but they are concentrated only in the estuary. That's why I said there might be some program for capacity-building to involve them in protection upstream from the only sector where they're fishing.

There is also an agreement with Eel River Bar where licences are issued by the Department of Fisheries and Oceans through quotas. Again, I think there should be more involvement from the Department of Fisheries and Oceans to help first nations adopt a fishing plan, to have them understand all aspects of their fishery on all tributaries. There are also problems where licences are given to other first nations without consultation in the territories of some first nations.

There are some things to address in regard to these issues.

● (1025)

Mr. Gord Johns: Thank you. I really appreciate the comments.

We talked about salmon farming, and you talked about the introduction of GMOs in the region. Has there been consultation, accommodation, or consent through that process?

Ms. Catherine Lambert Koizumi: No, zero. That's why I was concerned, because we heard about it through the media and through some other groups in Nova Scotia and in the maritimes. I think there should have been some consultation. I think the risk to the wild salmon population was clearly minimized, but there is a risk. Those eggs are hatched in P.E.I. They are going to be grown in Panama, I think, and they will get back on the market, but if there is an opening to do it here, it could be done in other places. In our view, there is a risk that this genetically modified salmon, by mistake, can get dropped in the water. That could happen; it's not impossible. We fear that there might be an undervaluation of the wild salmon, and also a potential risk of genetic contamination.

Mr. Gord Johns: Thank you.

You talked about the salmon pool that was filled up. We talk about environmental protection, and we've seen changes to the Fisheries Act.

Would you like to elaborate on the impact? I'll open it to any of you who want to speak to these issues.

Mr. Collins, you talked about the environmental review process and different impacts—industry that has left and industry that's coming. We talked about hydrocarbons. Is the Fisheries Act part of the umbrella that your organization looks at as well?

Mr. Harry Collins: Well, it's certainly a factor. The erosion of fisheries management in recent years was a major hit—again, the appropriate management that we need to see in the river. That being the case, we are more concerned about the lack of credible science that's good to go forward. That's a recurring theme with our organization, and we would certainly like to see that rekindled.

Mr. Gord Johns: We heard that in Newfoundland, and we hear that at home, on Vancouver Island, as well. It's certainly something that we are hearing about.

Mr. LeBlanc, would you like to add to any of that?

Mr. David LeBlanc: Yes, the deterioration of habitat.... We feel that with these latest changes to the Fisheries Act the government is walking away from its responsibility. The feeling is that the priority is on economic development and major industrial projects—there is actually one in Belledune—so there is little consideration of the impact of the salmon for local communities and the local economy.

Yes, it's important to protect the habitat.

Mr. Gord Johns: What kinds of investments have there been in salmon restoration, in terms of the impact from forestry? You talked about that.

Mr. David LeBlanc: Do you mean how much money we would need?

Mr. Gord Johns: Have there been investments?

Mr. David LeBlanc: The habitat restoration in the Restigouche system is mainly done by local groups, so compared to a big industrial project, it's very few dollars. We try to stabilize the bank with a few thousand dollars every year, but it's not enough. We have to look at the global approach, the impact of forestry, and all the damage caused to the peak flows and the change in water regime. It doesn't need only investment; it needs modernization and change in the regulations. The industry needs to adopt models that do not impact other industries and activities, such as recreational fisheries.

The Chair: Thank you, Mr. Johns and Mr. LeBlanc.

Back over to this side, we are going to Mr. McDonald for seven minutes, please.

Mr. Ken McDonald: Thank you, Mr. Chair.

Again, thank you to our four witnesses for some insightful testimony here this morning.

Several of you mentioned predation. Debbie, you put it in a pretty good sense: if you let one thing get way out of control from where it should be in the balance of everything else, it causes major problems. We've mentioned it. When we started our study in Ottawa and had the officials in, one of the questions I asked was about the seal and the Atlantic salmon, and the officials said they didn't have any proof that the seals were having any effect on the salmon. It's not part of their major diet, I think was exactly what I was told. I was told the same thing this week in St. John's and in Ottawa, that the seals maybe don't eat that much codfish, either. My argument, in both cases, is that they're eating something, and they are way out of control, as we've heard people tell us, whether it be you, or fishermen, or whatever.

I've lived on a river for 55 years, and these past seven or eight years we've seen seals in the actual river. It's not a salmon river, but sea trout migrate there. Growing up, we would never see that; it was just non-existent. We'd never see a seal, let alone see it in our river.

What do you think government should do? There is the striped bass issue as well. Should government really take a good, hard look at these predators and come up with a plan? They are in major numbers, so should there be some sort of a fishery thing when it comes to the striped bass, or a harvest when it comes to the seal, to put the numbers back in balance for the whole ecosystem to work the way it should be working?

● (1030)

Ms. Deborah Norton: I don't think we should be looking at a cull where any animal is senselessly slaughtered and left for no purpose. With the seal population, I wouldn't want to be anything, including myself, swimming by if the animal was hungry and expect not to get a swat taken at me. Obviously, when you have hundreds and thousands of things out there, they have to eat something. Maybe salmon or trout are not their primary sources of food, but if it's the only source of food, I suspect they'll munch down here and there.

You have to harvest based on abundance. There is a tremendous opportunity to help put this ecosystem back into balance and to restore it to equilibrium. Seals can be harvested. The products can be sold. It's a tremendous economic benefit that could be had here for Atlantic Canada in not trying to eliminate seals, but just bringing their numbers down to a manageable population. It's the same with striped bass. If we were to increase our allocations on striped bass right now, then it would greatly increase the recreational fishery for them. There would be economic benefits with the populations the way they are. MWMC would like to see some of our first nations get a sustainable commercial harvest to bring the population down.

Mr. David LeBlanc: We saw a seal last year 125 kilometres from the ocean. That's a bit high in the system. It stayed there for the summer, so you can imagine what it was eating. I tried to get a permit and to notify DFO that maybe we should harvest that seal because it would do damage all summer, but with the red tape I had to go through, I couldn't get the permit. I would have had to ask a commercial licence-holder from, maybe, the Acadian Peninsula to submit the request for a permit saying that it was causing damage to his own fishery.

It was a bit of a problem, and it's now common to see seals at the mouth of the Restigouche River every year.

Ms. Catherine Lambert Koizumi: I would like to add that I think monitoring is key.

As you mentioned, there's an increase in seal and there's an increase in striped bass, but they're both non-invasive species. They were here before, and we have changed the balance of the ecosystem so many times, not just over the last 20 years, but over the last 300 years. We need to take a step back and look...they're not enemies. They are there. We have to monitor their diet—maybe they don't eat that much salmon, but maybe they do—and adopt a precautionary approach. I think that's necessary, as with all harvest policies, and there is a chance to increase the seal harvest, absolutely.

In the Mi'gmaq, they started to hunt seal again because they're everywhere. Striped bass is the same thing, and I know our nations have requested, for the past two years, a commercial licence for striped bass. We were told not yet, but I'm hoping that the federal government will be open to it with reasonable small quotas to start and see how it goes from there. There is an imbalance with the salmon and other species that are in low abundance in comparison to the seals.

Mr. David LeBlanc: We talked about seals and striped bass, but there are other predators or other species having an impact on the salmon. There are cormorants, mergansers, and beavers. Beavers are a problem for the Restigouche River system because the price of the pelt is low. There's no interest from trappers, and the beavers are building structures that prevent the salmon from reaching their spawning grounds.

● (1035)

Mr. Ken McDonald: I think everybody mentioned the disconnect between the various departments of government, whether it be forestry, environment, or DFO, and even in consultations with groups like yourselves when making decisions that affect things that are on the river or taking place in the river.

What recommendation could we bring back to the department to try to change that, especially when major projects are under way? As you said, there was the railway project, where they filled in a popular, good salmon pool with no consultation whatsoever. They just did it, and then we have to go back and fight about it afterwards.

Mr. David LeBlanc: Actually, I think today and tomorrow there's a meeting in Moncton for the first time of a joint venture partnership that the Department of Fisheries and Oceans is putting in place, so I think it's a good start. It's going to be a board of directors representing different scientists and people from the different governments to identify fields of research for the salmon.

More talk between the different Department of Fisheries and Oceans branches is a solution, but sometimes it's our role to have them. As I said previously, yes, you're doing density surveys, but if there are no juveniles there you have to address that.

I also think it's part of our role, as the local group, to connect. The Restigouche River Watershed Council works through some science committees. We have representatives from the Quebec government, the Department of Natural Resources New Brunswick, DFO, and Atlantic Salmon Federation. Every year, at least once, we sit together for two days and talk about these things.

I think there are local solutions that can help for this issue.

[*Translation*]

The Chair: Thank you, Mr. LeBlanc.

[*English*]

Thank you, Mr. McDonald.

Mr. Doherty, you have five minutes, please.

Mr. Todd Doherty: Thank you.

Thank you to our guests today, as well.

As we've had over the last three days, we've had great testimony that definitely is better education than what you can get having an academic who's coming to us in Ottawa, as well. Listening to the local issues and hearing first-hand from those who are living, and making their living, off the shores of the rivers and in their local communities is very important.

It's come up, witness after witness, about the forest practices issues. In British Columbia, invasive species in our forests, whether it's the pine beetle or the spruce beetle, have led to accelerated harvesting.

I know that in this area, you have the spruce budworm and the brown spruce longhorn beetle. Has the harvesting of your forests been accelerated to try to get the infected trees out of the area? Has that contributed to it?

Is that the major issue with your forestry companies' practices, or is it just a matter of history, where your forestry companies have been unchecked? We saw that earlier on in B.C. with clear-cuts and what have you. As we've evolved, our forest practices have had to evolve as well.

What you're talking about today, is that primarily because your harvesting has had to be accelerated because of the infestation?

Mr. David LeBlanc: I would say, no. Yes, we see an increase in the rate of the cut because of the budworm outbreak. However, the change in the forestry plan in New Brunswick... It's always from lobby...to cut the expense. It's always based on economy. The threat of closing mills leads to cheaper ways to cut, with larger areas cut.

Mr. Todd Doherty: Would you say forestry is one of your larger employers in your region?

Mr. David LeBlanc: Yes. In New Brunswick, it's the biggest employer.

Mr. Todd Doherty: Okay.

● (1040)

Mr. David LeBlanc: They wanted to cut the expense to harvest, so they requested and they changed the New Brunswick forestry management plan to allow a bigger cut. They will cut, prepare the ground for any replanting, and then spray. That's the way New Brunswick is...clear-cut, planting, and spraying. It is the cheapest way. Instead of having people going there to tend the forest, they will spray with glyphosate.

Mr. Todd Doherty: Almost from tip to tail, every one of our witnesses today talked about the first nations, as well as DFO and local partnerships. Would you say there is a good relationship between our first nations and our non-first nations fishers in these areas?

Ms. Catherine Lambert Koizumi: I would say, generally, yes. I think it's improving with time. However, like I mentioned, I think the awareness of non-aboriginal people is important to work on. Now, Gesgapegiag stopped doing communal fishing a few years ago, but in Gespeg they do it. I know there's a lot of frustration over why they can't they harvest, but it's for the community.

I think that for us, it's an issue to work on education of the public, just so that everybody is aware and accepting of the history of first nations and their treaty rights in regard to salmon, as well.

Mr. Todd Doherty: It's very important. My wife's family is first nations as well and I understand that. It's equally important in every community. We must be able to have that.

Mr. Collins, you talked about a report that was done in 1996, and then the next one was done in 2007. Who commissioned those reports? Who did those reports?

Mr. Harry Collins: The report was edited by Michael Chadwick, and Fisheries and Oceans Canada was the support for that. This is the "State of Environment Report for the Miramichi Watershed-2007" from Environment Canada. With the Atlantic Coastal Action Program we used to have a component of funding for the science linkages initiative. With the support of that science linkages funding, we were able to produce the 2007 state of environment report.

Mr. Todd Doherty: Mr. Chair, a our few of our witnesses have mentioned reports that have been done previously. I believe Ms. Wood talked about the report that her group has done. I'm wondering if we can get copies provided to the committee as well. Not today, obviously, but at a later date, so that we can review them. Our analysts can have them as well, for historical information.

The Chair: We'll look into the studies. We'll get more information from Mr. Collins and Ms. Wood and we'll have them available for our discussions when we get back to Ottawa

Mr. Todd Doherty: I just think it's valuable to have as we move forward to know where we've been and where we're charting.

The Chair: Agreed.

Mr. Johns, you have three minutes, please.

Mr. Gord Johns: Thanks.

I'll just tell a quick story. Mr. LeBlanc, you talked about forestry practices. Where I live in the Alberni valley on the west coast, we're seeing a lot of the private forestry companies. We're seeing an accelerated cut. We're seeing a lot of the wood move from dryland sorts to the water. We have booms. The sediment is hitting the ocean floor. It's choking out the bottom. As climate change is happening, the top of the river system is heating up, and the rivers are getting choked out as they're coming upstream.

It's easier to get permits now to put the wood on the water. What kind of changes have you been seeing since the changes to the Fisheries Act in 2012? Have you seen anything apparent that is having an impact right now?

Mr. David LeBlanc: I don't think there would be any change since 2012 because forestry will not get close to the rivers. They don't touch—

Mr. Gord Johns: It's not specific to the rivers. It's specific in terms of the change in harvesting practices, and how that might be affecting the system.

How you harvest here and how you get your wood to market is completely different, but it may just be something you could elaborate on. Are there any changes that you can identify?

Mr. David LeBlanc: Not since 2012, but the changes in the river are major. There is bank erosion. There are new channels. The highest runs are earlier and earlier every spring. There are bigger ice floes going down the river impacting the banks. There are some tributaries with a high deposit of gravel, so juvenile fish cannot access these tributaries. There is a lot of wood debris. There are some tributaries clogged with full-length trees, causing a problem with fish migration. There's constant change in the river system. That's what people say. The river has changed so quickly in maybe 10 years. It's amazing. That's the impact. There's certainly some movement of the eggs when it comes time for the spring floods, so there is a lot of disturbance to fish habitat. I'm sure it's the joint impact of climate change and forestry practices.

● (1045)

The Chair: Thank you, Mr. Johns.

Mr. Gord Johns: Sorry, I think Mr. Collins wanted to comment. Is that okay?

The Chair: Yes, go ahead.

Mr. Harry Collins: One of the things gaining much attention in recent memory is water temperature. With brook trout and Atlantic salmon, which are cold water fish, the temperature is such that many of the pools are in critical states. There's now a mechanism where at critical thresholds we have pool closures throughout the watershed, even during the fishing season. That has been a very significant and noteworthy change from the years where it wasn't as bad, the rivers being shallower. With the increase of forestry practices, with the greater input of warmer water into the system, water temperatures are our major problem.

The Chair: Okay, thank you, Mr. Collins.

I know we've had a few interruptions and time has run out on this panel. We're over time right now, but I noticed there are a few people who want to ask a couple of quick questions for clarification. I ask that you make it quick for our witnesses, so we can get to the next panel.

Mr. Arnold, you had a quick intervention.

Mr. Doherty, and then Mr. Finnigan.

Mr. Mel Arnold: Thank you for the leeway.

There's been mention of issues with enforcement. I want to be clear, whose jurisdiction is the enforcement? Is it federal or provincial with the conservation officers and the fisheries enforcement officers? Just so we have that on record as to whose jurisdiction it's under for the enforcement.

Ms. Deborah Norton: It's both.

Mr. David LeBlanc: Normally, it's a joint venture. It's a joint approach where we would have set officers and rangers, and also the Department of Natural Resources. Now it's under Justice and Public Safety. There has been a change lately in New Brunswick. Rangers are under Justice and Public Safety, so they are appointed to enforce new rules, such as driving impaired on the forest road and things like that.

Mr. Mel Arnold: Thank you. I just thought it was important we get that into the record.

The Chair: Thank you, Mr. Arnold. I had the same question, as well, so I thank you for bringing that up.

Mr. Doherty.

Mr. Todd Doherty: Ms. Norton, you mentioned salmon tagging and potentially going down that path. What we have in British Columbia—and I'll use hunting as an example—are successful international guide and outfitters businesses, we have our first nations hunting for food for ceremonial and traditional purposes, and we have our recreational hunters, as well. We often see a conflict, whether it's with moose, bear, or deer, where we lay that precedence over it. Do you foresee any issues if we went to a salmon tagging system like this with a lottery system, as you mentioned, where we might now start to see some conflict because there might be one group that might be perceived as taking too much out, or the economics of the guiding outfitting group might be outweighed by ceremonial and traditional food?

Ms. Deborah Norton: I don't see any conflict simply because of the law. The law says the conservation comes first, and the harvest is based on abundance. If there's an abundance, the first allocation of the abundance goes to our first nations people. They have an allocation for food and ceremonial purposes. After that allocation is addressed, if there is still an abundance, then it perhaps could be dished out in a lottery system allowing people who wish to harvest part of that abundance to harvest it. There's a hierarchy and stepping stones, and I don't see any conflict whatsoever.

● (1050)

The Chair: Thank you.

We'll end with you, Mr. Finnigan.

Mr. Pat Finnigan: Thank you, Mr. Chair.

I'm going to move to Sonja because she came a long way, too, and Atlantic salmon is the same everywhere. I'm going to maybe put you on the spot or make you be the devil's advocate, but a lot of people would say in Nova Scotia that our southern waters are getting warmer, and so it's inevitable that we're going to lose our salmon. Acid rain has made it so the salmon can't live in those rivers, but we have salmon in the Margaree River that aren't doing so badly. What would you say to those comments that it's useless to bring the salmon back into the Minas Basin?

Ms. Sonja Wood: Well, we totally disagree with that, that it's a useless effort.

Mr. Pat Finnigan: I'm not saying it's my opinion.

Ms. Sonja Wood: No, no.

We know that these species are protected by the Species at Risk Act, and we know that it's the government's—well, it was supposed to be the government's—mandate to ensure that these species have safe and easy migration into their critical habitats.

On the Avon River, the habitat alone is being disintegrated with every tide that comes in and goes out. It does put pressure on the numbers, of course, of the recovery of these species. We don't think for one minute that this is a reason that we should turn our back on this species. We have a government department, the inner Bay of Fundy recovery team, and I'd like to stress the word “recovery”. We believe that this is the direction that really has to be focused on for our wild Atlantic salmon.

If we don't take a look at it now, if we don't do something now, we are going to lose every salmon that's within the Minas Basin in the Bay of Fundy. There were 50 wild Atlantic salmon counted in the Shubenacadie River, which is the river that runs through part of the Minas Basin as well. We've had 20 counted in the Avon River. These numbers mean something to us.

We believe it's paramount that, while these industries are working along the watershed, there has to be something they can do to be friendly, to maybe offer another opportunity for these salmon to have a chance to recover. Even if one salmon gets past some of these barriers that are being put in place, like the tidal project, or the Alton Gas brine dumping, or the building of the extension of the 101 Highway, this is critical. If one salmon can get into this habitat and spawn, and has the opportunity to reproduce, that's vital to us.

That's where we stand on our project. We don't want to turn our back on our salmon. We know that environment and climate change are all critical to the life of the Atlantic salmon in this watershed.

The Chair: Thank you.

[*Translation*]

Thank you, Ms. Lambert Koizumi.

[*English*]

Thank you, Mr. Collins.

Thank you, Ms. Norton.

[*Translation*]

Thank you, Mr. LeBlanc.

[*English*]

Thank you, Ms. Wood.

Mr. Mansky as well, thank you very much.

We're going to break for five minutes to quickly get to our next panel. Thank you.

● (1050)

(Pause)

● (1105)

The Chair: Welcome back, everyone, or in the case of our new witnesses, welcome. We're glad that you can make it. We have a big group, as you can see. We're going to try to get through this. We are going to run over time, for our members, and we've allotted time for that. In the meantime, we're going to hear from groups.

Some of you are with the same group. I'll give you 10 minutes, and you can split it, if you wish.

By way of introduction, let's start with the Atlantic Salmon Federation, certainly an organization no stranger to this committee by any stretch of the imagination. Mr. Jonathan Carr is executive director of research.

From the Eel Ground First Nation, we have Chief George Ginnish.

We also have Devin Ward. Devin, you're the science officer, I believe, with that. You'll be the one group presentation, for 10 minutes.

We have Mr. Suju Mahendrappa, from the Maritime Seal Management. Last week we talked a lot about seals. We finally have a seal expert.

Réné Aucoin is from the Nova Scotia Salmon Association. Correct?

[*Translation*]

Mr. Réné Aucoin (President, Nova Scotia Salmon Association): Yes, that's correct.

The Chair: Okay.

[*English*]

We have also our latest addition, and thank you for coming. We have Sydney Paul and Gordon Grey from Kingsclear First Nation. You'll have 10 minutes as a group, as well.

Mr. Carr, we're going to start with you, sir, for 10 minutes or less.

Mr. Jonathan Carr (Executive Director of Research, Atlantic Salmon Federation): Thank you for the invitation.

I'm going to go through the document that was handed out. I'm going to refer to the pages as I go through this so you can follow along.

Page 2 gives a background on the Atlantic Salmon Federation, ASF. I'm not going to go through that because I think we've had members here before.

I'm going to jump right into page 3, and start with that. Our policies and positions are science-based within our organization. We're internationally recognized for our research capabilities. We're in collaboration with local, national, and international partners to address threats to wild Atlantic salmon.

We participate in all kinds of science forums, including working groups, such as the International Council for the Exploration of the Sea, known as ICES, which provides advice to the North Atlantic Salmon Conservation Organization, NASCO.

What I'm going to do over the next few minutes is just focus on two of our research priorities, marine research and aquaculture interactions between wild and farmed salmon.

On page 4, I'm going to start with marine tracking. Mortality rates for Atlantic salmon at sea are double those of the 1970s and 1980s. Mortality in the ocean is one of the largest challenges facing Atlantic salmon today. Comprehensive descriptions of the movement and spatial distribution of individuals at sea are essential in order to understand how animals interact with their environment.

Studying large-scale marine migration and behaviour of fishes has become possible with the development of electronic tags that store information about the environment experienced by the fish. The ASF has been involved with the development of these electronic tags for the past 20 years, working with industry partners to develop these tags, so that we're able to now track fish in the ocean.

Since 2003, we've been using acoustic telemetry to track salmon out of various Gulf of St. Lawrence rivers. Some of the specific objectives for this comprehensive tracking program include expanding our ability to track North American salmon populations in the estuaries, out along the North American coast to Labrador and the coast of Greenland. We're identifying critical habitats and feeding areas in the ocean. We're determining the impact of predators and prey on marine life stages of salmon. We're estimating stage- and area-specific mortality rates. We're correlating the movement of the fish with environmental variables, notably currents and water temperatures. We're exploring climate-driven ecosystem changes.

This project is the most comprehensive marine research being conducted on wild Atlantic salmon globally, focusing on the migration and survival of smolts and kelts. What I mean by kelts is that these are salmon that have spawned, post-spawned salmon. Atlantic salmon can spawn multiple times. These are salmon going back out into the estuary and ocean, reconditioning and coming back to the river. We're tagging and following those fish.

This information is on the watersheds and in the North Atlantic. This project provides the best overall review of what is happening in the estuaries and in the ocean. Understanding ocean distribution and migratory behaviour of wild Atlantic salmon is critical, as it will provide the foundation and parameters of future conservation and restoration efforts in the development of management and conservation strategies.

I'm not going to spend a lot of time on slide 5. We can go back to it if you have questions after. It's a map showing where our areas of focus have been in the Gulf of St. Lawrence. We've been tagging fish, primarily in the Grand Cascapedia, Restigouche, and northwest and southwest branches of the Miramichi since 2003. You can see the number of electronic tags we've put on the animals. Each of these tags track individual fish, so we have information on over 2,500 smolts and over 400 kelts.

We put receiver curtains at the heads of tides, so that we can get a measure of survival of all the fish that we're tagging leaving fresh water. We're putting these curtains at the outer estuaries and bays, the Miramichi Bay, Chaleur Bay, so we can get a measure of survival through the bays and estuaries. You can see, in the Gulf of St. Lawrence, we've got receivers across the Strait of Belle Isle and the Cabot Strait, so we can get a measure of survival through the Gulf of St. Lawrence.

We're also employing satellite tags. I'm going to talk about that.

On slide 6, there are all kinds of things we've been finding out. I'm just going to focus on two or three things today. One is that the survival of the smolts that we've tagged, as they migrate through the freshwater zone in the spring, has been quite high. Once they get into the estuaries and the bay is where the problems start. However, in the estuaries and the bays, we've been finding, and this is Miramichi Bay and Chaleur Bay, that the survival is down to between 60% and mid-seventies, which we think is adequate. However, since about 2011, the survival for Miramichi smolts has dropped dramatically, as they enter the estuary and before they leave Miramichi Bay. Survival is down below 30%, in the mid-twenties. Something is happening to our smolts.

● (1110)

Besides the smolts, we have also been working with DFO tracking striped bass in that system. We have compared the data, overlaying tracks, and we are finding that a lot of the smolts we've been tagging and tracking since 2011 have been consumed by striped bass. Tags that are supposed to be in smolts are now moving like striped bass. We actually have data to show that striped bass are significantly impacting smolt survival through the Miramichi Bay.

Another thing we are finding is that the survival of smolts is quite high through the Gulf of St. Lawrence, which suggests that the big problems are beyond the Gulf of St. Lawrence, once we get out into the Labrador Sea and off the coast of Greenland.

Another tidbit of information is that once the smolts that we are tagging from the different rivers get out in the ocean, they start travelling as one group, schooling together. They are crossing the Strait of Belle Isle—the narrows, the passage zone to the Gulf of St. Lawrence—pretty well together over about a two-week period every year. That's a critical area we have to protect and watch.

That's all I am going to say about sonic tracking right now. There is other information I would be more than happy to share later, but I just want to touch on these subjects.

I want to talk about pop-up tags, the satellite tags we've been using on the post-spawn adult salmon. These tags record water temperature and water depth. We can actually get day-to-day information from these fish. If you look at the map, you can see the track for one particular fish called 136027. It shows you where this fish was on a day-by-day basis. The larger circles represent depths. These fish are diving to a depth of up to 600 metres. Now we are beginning to understand where these larger salmon are on a daily basis, where they are dying, and in some cases what is killing the fish.

Where are we going with this? Based on our time series—we have over 10 years of data right now—we understand trends. One trend I mentioned is the loss of smolts in the Miramichi estuary. We are going to continue focusing on predator-prey interactions, particularly in that estuarial bay, and also looking at cormorants in the Chaleur Bay.

As we identify critical habitat migration zones, we are going to identify what we call “traffic” in those areas, meaning looking at predator-prey interactions and the environmental parameters linking everything together. What we need to do is tag more salmon and track them for greater distances.

In 2016, we plan to pick a river in Labrador and tag smolts there. We plan to start tagging salmon off Greenland and tracking them back to home waters, and we are obviously looking at putting more receiver arrays in the Labrador Sea and off the coast of Greenland.

As far as recommendations go, it is critical for DFO to develop management measures to balance and protect both wild Atlantic salmon and striped bass. Debbie Norton gave a really good overview of this. We want an equilibrium. We aren't against striped bass, but there needs to be a balance.

More federal research and innovation funding is needed in order to expand tracking efforts in the marine environment. This stems from recommendations from the ministerial advisory committee, and also from the Prime Minister's mandate letter to DFO, which says:

> Restore funding to support federal ocean science and monitoring programs, to protect the health of fish stocks.... Work with the provinces,...Indigenous Peoples, and other stakeholders to better co-manage our three oceans.

One of the support venues we feel will be helpful is the new Atlantic salmon research joint venture program, which started back in June. We have meetings in Moncton today and tomorrow. I don't mind talking more about this if you want.

Another recommendation is to provide support for the Collaboration for Atlantic Salmon Tomorrow, CAST. I don't know whether you are familiar with it, but CAST is an innovative program of research and improvement projects rolled into a single program, which could serve as a model for other Atlantic salmon rivers with populations at risk. Marine tracking is one component of CAST. I'll leave it there for now on CAST. I certainly don't mind sending information on that at a later point or if questions arise.

One of the things ASF does, as our data comes in, is openly share it with DFO and policy-makers. We do have our data peer-reviewed, but we feel it's important to share the data as we find it so that management decisions can be made in a timely manner.

Over 20 different partnerships have been and are involved with the tracking program.

For the next minute and a half, I am going to switch gears totally and go to salmon aquaculture, really briefly.

A sustainable aquaculture industry will have significant economic value to Canada. For long-term value, the industry must be socially, ecologically, and economically sustainable. However, there are all kinds of significant challenges with interactions between wild and escaped farm salmon. There have been many peer-reviewed research studies on wild and farm salmon interactions, and ASF has been part of many of those publications. We would be more than happy to share those publications with you.

● (1115)

The biggest threats with open-net pen farms are disease, parasites, and escapes. When escapes happen and get into river systems, that's where genetic pollution or genetic introgression occurs. ASF has knowledge and expertise to help address these challenges.

One of the things ASF have been working on is demonstrating the biological, technical, and economic feasibility of land-based, closed containment systems.

I'm not going to get into the next two slides right now. The first one is the Magaguadavic River, located in southwestern New Brunswick, where we have a system in place to monitor wild and escaped farm salmon entering that river. You can see the trends over time. There are 99% of these fish entering the river. These are escaped farm salmon that have no home, meaning the industry is not reporting these fish escaping; we don't know where they're coming from. These fish have introgressed or spawned with wild salmon in the river. There's a paper out that shows that those fish have destroyed the wild population in this particular river.

It's not only in New Brunswick; we see the same problems in Newfoundland. We're finding all kinds of escapes and genetic introgression. You've probably read in the papers that DFO scientists are starting to find that information.

Tens of millions of federal dollars are spent to compensate open-net and salmon aquaculture for losses from diseases like ISA and parasites like sea lice.

There's a lack of transparency when it comes to reporting escapes and the level of disease and parasites. There's a lack of enforcement and accountability by the federal government when it comes to regulations. There's a need for a regional, what I call pan-Atlantic, approach to regulations and farm management practices.

With regard to recommendations, a more consistent approach is needed for regulations and best farming practices throughout Atlantic Canada and the state of Maine. We feel all aquaculture fish should have an external identification marker on them so in the event that they escape and show up in a stream, we can identify that they are indeed aquaculture fish and remove them.

There needs to be more transparency by the salmon aquaculture industry when it comes to reporting escapes, diseases, and parasite levels. More accountability and enforcement is needed by the regulators. More funding is needed for research and development for land-based closed containment.

On the final point, all future salmon aquaculture operations should occur on land.

Thank you for your time.

The Chair: Thank you, Mr. Carr, that was quite good.

If you don't get all of what you wanted to do in the presentation, you can work it into the questions and answers that follow.

From the Eel Ground First Nation, now that the two of you are here, I'll let you use your time accordingly for your 10 minutes.

Chief Ginnish.

Chief George Ginnish (Chief, Eel Ground First Nation): I have a statement, and we'll see how much time is left once we go through that. I'll try to be brief.

My name is George Ginnish. I'm the Chief of the Natoaganeg, or the Eel Ground First Nation.

I welcome you here today to the unceded territory of the Mi'kmaq and to our district, the seventh district of the Mi'gmaq Gespe'gewa'gi.

Natoaganeg is located on the Miramichi River in northern New Brunswick, close to the junction of the Northwest Miramichi River and Southwest Miramichi River. We're about five minutes from here. Our community has reserves on three branches of the Miramichi.

I've served as chief of my community for 20 years, and for a few years on council, before that.

I'm also co-chair the Mi'gmawe'l Tplu'taqnn. Its members are the nine Mi'kmaq communities located in what is now New Brunswick. We work together to advance and protect Mi'kmaq rights, including our right to fish for food, for social and ceremonial purposes, and commercially.

I'm also the chair of the North Shore Micmac District Council and our AAROM, Anqotum Resource Management, which represents eight of our Mi'kmaq communities on fisheries issues, including building capacity to participate effectively in advisory and decision-making processes used for aquatic resource and oceans management.

I'll be speaking today on behalf of all those organizations.

I'm supported today by Devin Ward, who works as a fisheries coordinator with Mi'gmawe'l Tplu'taqnn and is a senior biologist with Anqotum.

We, the Mi'kmaq, are the indigenous people of this territory, and since time immemorial we have occupied our traditional lands known as Mi'kma'ki. Our Mi'kmaq traditional lands and waters are located throughout the provinces of New Brunswick, Nova Scotia, Prince Edward Island, and Newfoundland, and extend into Quebec and Maine.

We have relied on our lands, waters, and resources for our way of life, as they have provided us with food, shelter, and all aspects of our daily lives.

Our relationship with the lands, waters, and resources is the foundation of our identity. As indigenous peoples, we managed our fisheries for thousands of years based on Mi'kmaq principles, and the fish remained abundant.

The Mi'kmaq people have lived throughout the Miramichi River system and relied on it for their physical, spiritual, and cultural sustenance, and their livelihood since time immemorial.

In the 18th century, on a nation-to-nation basis, the Mi'kmaq entered into a series of peace and friendship treaties with the British Crown between 1725 and 1779. These treaties form a covenant chain, and the treaty relationship with the Crown, as represented by the Government of Canada, is ongoing.

We have never surrendered our title to these lands and waters, and our sacred treaties protect our rights to shared stewardship of our resources and to fish throughout our territory, both for food, social, and ceremonial purposes, and to earn our livelihood.

Our communities fish a variety of species in order to meet our needs and to earn a living. Our food fishery is distributed to community members, and a number of our community members rely on the income they earn in our modest commercial fishery.

Five of our Mi'kmaq communities are among the 10 poorest postal codes in all of Canada. Our fishery is very much a matter of physical, cultural, and spiritual survival for our people.

A recent study by the University of Ottawa that was conducted in our community shows that 40% of our Eel Ground First Nation members are food insecure.

While all species are important to our people, Plamu, or salmon, has a particular significance to the Mi'kmaq. Salmon is not only a staple of our diet, but is intimately tied to our cultural and spiritual practices. Our ability to fish salmon for food is essential to feeding our most vulnerable families, children, and elders. The fate of the Atlantic salmon is of utmost importance to us.

After thousands of years of sustainable management by the Mi'kmaq, many of the species we rely on, including the Atlantic salmon, have been driven to the verge of extinction in less than 150 years.

Miramichi is one of the last great salmon rivers in New Brunswick. Despite significant conservation efforts, our salmon population is under significant pressure, with record low returns in recent years.

Our community has been reduced to a small, food, social, and ceremonial fishery, which we are under constant pressure to suspend entirely.

Survival of the salmon smolts migrating out of the Miramichi river system is estimated to be 50% or less. This means that only half of the young ready to migrate to sea to become adults ever make it to the ocean.

● (1120)

The species experiences pressure from forestry, from climate change, from predations, and from other species, such as striped bass and seal.

Salmon is a cold water species. High temperatures have resulted in the closure of several salmon pools this past summer. The government continues to allow industrial and resource development activities in our watersheds and oceans, which threaten the salmon, such as offshore oil, subsea cables, the Sisson Brook mine and the energy east TransCanada pipeline.

The Supreme Court of Canada has confirmed our rights to fish for food social ceremonies in the Marshall decision in 1999 and to fish commercially to earn a moderate livelihood. The court has also confirmed that only genuine conservation objectives can take priority over first nations fishery, and that first nations fishery must take priority over recreational and commercial fisheries.

Canada has never implemented the Marshall decision, and most of our communities' members are unable to earn a moderate livelihood from our fishery. Our communities remain poor while others get rich.

DFO continually ignores the priorities set out by the Supreme Court of Canada. It does not meaningfully engage the Mi'kmaq in conservation efforts, and we are continually asked to reduce our fishing activities in the name of conservation.

As an example, we continue to face pressure to reduce or eliminate our food, social, and ceremonial fishery for Atlantic salmon for conservation reasons. We are not allowed a commercial fishery, yet the recreational fishery continues without any substantive study of the impact of catch-and-release on salmon mortality and population numbers. This is completely contrary to the priority mandated by the Supreme Court of Canada.

Another example is the impact of seal and striped bass predation on salmon populations. We had asked DFO to open up the aboriginal food fishery and commercial fishery for Mi'kmaq for striped bass and grey seal. As you may be aware, striped bass were put under a moratorium for low numbers five years ago. It was considered recovered should the population consist of approximately 35,000 spawning adults for five consecutive years. They have met and exceeded this number. The latest population estimates that exists for a 20-mile stretch of river that is in our traditional territory now exceeds 300,000 bass.

To date, we've only been allowed a limited food fishery in striped bass, and our requests for a commercial bass fishery or seal fishery have been ignored. At the same time, DFO has opened up a recreational fishery in striped bass. Somehow, the recreational fishery takes priority over aboriginal treaty rights, contrary to the direction of the Supreme Court of Canada.

Our communities presented to the minister’s advisory committee on Atlantic salmon in March 2015 through the Assembly of First Nations' Chiefs in New Brunswick at North Shore on quota. We provided a copy of the assembly's submission to that committee along with my speaking notes today, and I encourage you to read it. We call for a greater Mi'kmaq role in conservation enforcement measures, and measures to restore the balance between the species in our ecosystem, with a greater role for first nations and indigenous knowledge in advancing science.

The ministerial advisory committee issued its report in August 2015. They adopted some of our suggestions and ignored others. We were told that while the committee itself did not engage in consultation, we would be consulted by DFO on the recommendations that were made, many of which touched on first nations. We requested a meeting with the minister to discuss this report, and to date no consultation or meeting with the minister has taken place.

Similarly, my appearance before this committee today does not discharge the duty to consult with first nations, nor does it meet Canada's treaty obligations. DFO needs to sit down with us in the spirit of the treaty partnership and begin to involve us as true partners in decisions regarding conservation enforcement, management, and allocation. Our indigenous knowledge needs to be respected alongside science. DFO needs to respect the law as set out by the Supreme Court of Canada.

The Mi'kmaq need to be given priority access to the fishery, which can only be limited for genuine conservation reasons. Nothing more or less than our survival depends on it.

Thank you.

● (1125)

The Chair: Good timing. Right on

Thank you, Chief Ginnish.

We're going to go now to Mr. Mahendrappa from Maritime Seal Management.

Mr. Suju Mahendrappa (Director, Maritime Seal Management Inc.): Thank you, Mr. Chairman. Thank you, honourable members of the committee.

I really appreciate the chance to present before you today. I'm going to read my prepared remarks and look forward to your questions. I hope there are many of them. I have a lot more to say than I have time allocated for.

I'm going to start by telling you a little about our organization, Maritime Seal Management Inc., MSM. MSM is a federal not-for-profit corporation formed in May 2014. Its objectives include, to implement a series of recommendations to DFO science and the 2012 recommendations of the Senate standing committee regarding grey seals; and to develop and execute a strategy for responsible grey seal population management in the Maritimes that provides biodiversity within our marine ecosystem and promotes fish stock recoveries in the region.

MSM's co-founding directors hold considerable expertise in marine science, management decision-making, private equity investment, investment banking, business strategy, international market development, fish processing including seal processing, and seal harvesting.

Next I want to tell you a little about a proposal that we submitted to the Minister of Fisheries and Oceans in December 2015. MSM partnered with a group of concerned aboriginals in New Brunswick who were organized under the name Aboriginal Conservation and Ecology, which I'm going to refer to as ACE, to jointly propose to the Minister of Fisheries and Oceans a comprehensive and risk-managed approach to resuming the traditional aboriginal harvest of grey seals in the Maritimes and Quebec.

Our proposal carries the following features. It proposes an aboriginal subsistence harvest and not a commercial harvest. Under our plan, a range of finished and semi-finished products would be produced from the harvested seals and marketed in several distinct markets to help recover the harvest, production, and marketing costs, and to ensure adequate capitalization of the program. It proposes that financial surpluses remaining after the program financing and costs are paid would be dedicated entirely to aboriginal social programs, particularly including those related to teen mental health and suicide prevention, youth skills development, and aboriginal nutrition programs.

It proposes targeting the harvest of seals one year of age and older, so no seals younger than one year of age would be harvested. It proposes a value-based utilization of all parts of the harvested seal, so that nothing would go to waste. It proposes that harvest levels be set based on ecological goals and conservation targets, and following a precautionary management approach. It proposes the refinement of harvest methods to help ensure consistency with internationally accepted standards for the humane harvest of animals. Lastly, it proposes to follow an inclusive, open, and transparent approach that would include scientific monitoring by an international panel of independent scientists and/or scientific organizations.

To give you an overview of the people who were involved in our organization and our proposal, there's an exhibit 2, which I've provided to the clerk. I'll just read a paragraph on that.

The proposal combines the contributions of diverse experts with decades of experience in seal products marketing, aboriginal and mainstream fashion design, biochemistry, life sciences, industrial engineering, and international co-branding and market development for premium consumer products. It also proposes to utilize existing processing capacity capable of handling all parts of the harvested seal with only minimal additional capital investment required.

Lastly, I want to give you a few points on a decision analysis level regarding the approval of our proposal, which we hope is forthcoming. I'm going to read out some points.

Our proposal offers the Government of Canada an opportunity to simultaneously achieve some of its stated objectives, such as job creation; the support of more biologically sustainable, bio-diversified, and financially rewarding commercial and recreational fishery sectors; and the strength and well-being and socio-economic development of Canada's aboriginal peoples.

The potential for negative repercussions on the Government of Canada for supporting our proposal arise principally from the risk of poor public understanding of what is being done and why it's being done. This is particularly true regarding populations in large urban centres such as the Toronto region, which are geographically, economically, and culturally distanced from fisheries, and generally from natural environments.

MSM and ACE, together with specialized professional partners and public celebrity figures, have formulated specific and thoroughly reasoned plans for achieving the accurate and broad public understanding of the cultural, social, and ecosystem benefits of our proposed seal harvest, as well as the measures adopted to ensure our clear and consistent adherence to high standards of animal welfare. That's a point that would reduce the risk that is naturally associated with the approval of our proposal.

● (1130)

MSM went to great lengths to understand the inner workings, operational priorities, and sophisticated decision-making processes of organizations that historically have opposed commercial seal harvesting by non-aboriginals, many of which continue to run anti-seal hunt campaigns to assist their own fundraising efforts. MSM's proposed harvest features a series of attributes that negate the major points on which such groups typically base their criticisms of commercial seal harvests. The objectives of saving species at risk from extirpation and promoting biodiversity are consistent with the priorities of such groups' existing supporters.

Based on our analysis of all parties positions and objections, we do not believe that anti-seal harvest groups likely would elect to vocally oppose our proposed harvest and draw resources away from their more legitimate powerful and successful campaigns that are ongoing. They would gain little or no incremental benefits by opposing our proposed harvest, while still bearing the significant risk of alienating supporters or creating fractions among their supporter groups.

If we have a little time left, I'd like to speak to one of the topics that arose earlier on whether seals eat salmon. The example I like to give is that if you're having a party in your backyard, and you lay out 10 trays of smoked haddock and 10 trays of bacon-wrapped scallops, you'll probably find that everybody is going to eat the bacon-wrapped scallops first. Seals are mammals just like we are. They have preferred foods. They prefer oily fish because they're high in energy and high in nutrition. They eat a lot of herring and a lot of mackerel these days because there are more of them, and because everybody has eaten the bacon-wrapped scallops, or in this example everybody has eaten the salmon. If you're a DFO scientist you may look at that backyard barbeque and conclude our guests have modified their behaviour and they no longer like bacon-wrapped scallops, but I believe that you will find if you lay out fresh trays of bacon-wrapped scallops, your guests will change their behaviour back and they'll begin eating what they preferred before. Seals are mammals, and they're no different from that.

That's a point that I appreciate having the time to make. I want to say that we've done a lot of work. We have a tremendous group of people assembled. We've worked on this for years. Some of my colleagues have worked on this since the 1980s. We have a solution that we believe is entirely viable. It's well-reasoned and it's well-researched. We have partners in place in various parts of the world, including across Canada. We have people in many provinces participating in our program.

The decision to move forward with what we're proposing is one that simply requires the courage to do the right thing, because I don't believe that any rational person involved in this discussion of conservation and the protection of species at risk would dispute that actions to restore balance and promote biodiversity are the right thing to do. The challenge is the fear that the public in areas of Canada, which are significant to our country in many respects economically, socially, and democratically, will misinterpret what we're doing. What this takes is the courage on the part of leaders like you who are here today to do the right thing and to help us to do the right thing. I don't want you to feel as leaders that you're going to be left alone to defend what we're proposing to do. We feel that we are responsible just as much as our elected officials and just as much as all Canadians for our actions. We take that very seriously. We have great plans in place to build public awareness to satisfy concerns. We're talking about an inclusive open and transparent process. We would appreciate your support in bringing the topic of our proposal to the cabinet level for discussion, because as the system is set up it's gone likely as far as it can in the DFO bureaucracy. What we need is, and we're counting on, your support to give us a chance to propose this at the cabinet level for approval.

Thank you.

● (1135)

The Chair: Thank you, Mr. Mahendrappa. Thank you for your analogy. We're now sufficiently hungry and yearning for bacon-wrapped scallops.

[*Translation*]

Mr. Aucoin, you have the floor, and have been allocated 10 minutes.

[*English*]

You're from the Nova Scotia Salmon Association.

[*Translation*]

Mr. Réné Aucoin: Thank you very much, Mr. Chair.

I'm the only francophone in the association. My presentation will be in English, but

[*English*]

if you have questions,

[*Translation*]

you can ask them in either official language, and it will be my pleasure to answer.

I'd like to note two things that I did not include in my document. They are comments that were made, or were not responded to. The first was about the concept of catch and release.

[*English*]

I'm also president of the Cheticamp River Salmon Association. I believe that may have been the first catch-and-release river in Canada. It's in a national park, and it was established as a catch-and-release river in 1988. I don't know if there were others at that time. In the 28-year history of catch-and-release, there are no known mortalities from catch-and-release on that particular river.

It's in Cape Breton Highlands National Park, and of course it is a cold-water river, more fished in spring and fall, so that may help, and by experienced anglers. I think under good conditions with the average there would be no mortality in catch-and-release, and I think there would be many studies that show from zero to five, I heard, but in this river there were none in 28 years.

The other one, which I'll just note, was on aquaculture in the Bay of Fundy. No one responded to that here at the time. The reason no one responded is that all of the groups here, except Sonja Wood, are in the Gulf of St. Lawrence. There is no aquaculture in the Gulf of St. Lawrence. The aquaculture is all in the Bay of Fundy, on the Atlantic coast of Nova Scotia, and on the south coast of Newfoundland.

I will not go any further. I do have more comments on that. Hopefully they will come out in the questions.

The Nova Scotia Salmon Association was created in 1963 by prominent members of the N.S. angling community. It's a registered non-profit charitable organization, with 1,100 members or so and 22 directors who come from all parts of the province. It's the leading volunteer organization promoting the wise management and conservation of wild Atlantic salmon stock and trout stock in Nova Scotia with a board of directors representing all parts of Nova Scotia, again. There are about 23 affiliated organizations. The Cheticamp River Salmon Association, of which I am president, is a member of the Nova Scotia Salmon Association. The Nova Scotia Salmon Association in turn is an affiliate of the Atlantic Salmon Federation.

The primary local issues of concern for NSSA are the acid rain impact on Nova Scotia Atlantic coast rivers, in the area we call the southern uplands; open-pen or sea cage aquaculture impact on wild Atlantic salmon, again in the Bay of Fundy and the Atlantic coast; human impact past and present on river and stream fish habitat; and the loss of the inner Bay of Fundy wild salmon from 40,000 a generation ago to a handful today, which you heard very recently. My presentation will just focus on the acid rain mitigation project.

You have a map there. It shows the acid rain impacted areas of Nova Scotia, and this coincides with the geology. There's very poor geology. It's all basically rock in that whole area. How the acid rain works, if you're not too familiar with that, is that when the air currents and the streams from west to east hit the Atlantic coast, they bring in all this acid rain stuff from the industrialized U.S. It then follows up along the Atlantic coast, and basically what you're seeing there is the drift of the air currents hitting that particular area.

The acid rain mitigation project is in West River Sheet Harbour. It is actually a lime doser, and you can see from the picture on the next page that it's the size of a tractor-trailer. It's installed on the West River Sheet Harbour. It's about 30 kilometres upstream and it's dishing out lime on a daily basis and has been doing so for the last 10 years.

In 2005, NSSA initiated an ambitious project to restore one of the rivers damaged by acid rain. The West River was selected for the demonstration project through an extensive review exercise carried out by a committee composed of NSSA, ASF, Trout Nova Scotia, Nova Scotia Power, and both federal and provincial governments. A report was contracted by NSSA and prepared by Dr. Atle Hindar, a leading Norwegian researcher on liming strategies to combat acid rain effects. For the first 10 years of operation, the lime doser was operated solely by volunteers from NSSA.

● (1140)

The cost to 2015, fundraised mostly by NSSA—we have two fundraising events a year, a golf tournament and a dinner—of liming, maintenance, and operation approached $1 million for the first 10 years.

● (1145)

[*Translation*]

The major objective is as follows.

[*English*]

The West River acid rain mitigation project serves as a demonstration and experimental project. We are concentrating resources within this one watershed in order to find the methods needed for effective acid mitigation.

It may sound relatively simple: you just dump the lime into the water and that will bring the pH high enough. However, what we are finding is that pH is only one of the factors—the main one—but there are some other very important factors. You may have heard of this. The second one is aluminum leaching into the rivers, and that is caused by the lack of buffering soil. The buffering agents are gone from the soil, so aluminum leaching into the rivers from the rains is affecting the gills of the small fish that basically have difficulty in surviving the transition to the ocean. That's another thing that we've found out.

We are also conducting concerted experiments to answer the questions currently limiting liming restoration potential. It can be complicated. The lessons learned on the West River are to be incorporated in a restoration blueprint on how to address the issue of acid rain in the impacted rivers of Nova Scotia and Maine. Northeast Maine does share some of that same geology.

In 2016, we have a new partner, new funding after 10 years. It's been a long time doing this by ourselves. The Province of Nova Scotia, in 2016, granted us $100,000 a year. They gave us $300,000 to hire a scientist to start managing this project. It was kind of “go home or go bust”. Why did it take so long? There was a two-year life cycle that we were trying to accomplish, but because we were doing all this research on a shoestring budget with volunteers, it took a long time.

The province has also helped us. We're now doing some helicopter liming. We started that in that same West River watershed. Again, it's to find out exactly the technique and what we need to do to preserve this one river, so that we can possibly take this knowledge to another area.

DFO also partnered in the building and installation of an adult counting fence. In all these years, we did not have a clue of how many fish were coming back. Finally, with some help from DFO and other partners.... The Atlantic salmon conservation fund was a big player, and I think your program, the recreational fisheries partnership program, was also a player.

Other funders have included the NSLC Adopt a Stream. The Nova Scotia Liquor Corporation provides our Adopt a Stream program $100,000 a year. We will be getting, in a 10-year period, $1 million from them for that specific program. The Atlantic salmon conservation fund, RFPP, and various student projects are how we've been managing this project for 10 years.

Finally, the federal government has become involved, and other than the RFPP.... In fact, last week I signed a substantial grant from ACOA for a second lime doser, which is to be installed on the West River, on the Killag branch. Where we have the original lime doser wasn't where it was supposed to be, but it was the only place where we had access. This Killag branch is the preferred place, and now we have access there. We hope that with these two dosers, we will be able to complete our study within a relatively short number of years.

What is the request from NSSA to the federal government? It is recommended that DFO and other federal agencies, including Environment Canada, get involved directly in NSSA's acid mitigation project, that they invest in infrastructure to facilitate acid rain mitigation, including management and administration. So far, we've seen some funding for some parts, but none of the management administration.

Full-time staff could be hired who would be responsible for the implementation of new projects. Initiatives could be funded that would allow non-profit organizations to contribute to DFO's mandate on fish protection in the face of acid rain.

Thank you very much.

● (1150)

[*Translation*]

Thank you very much.

The Chair: Thank you, Mr. Aucoin.

[*English*]

Now we're going to go to our latest addition. We made some room for the Kingsclear First Nation. We have Ms. Sydney Paul, who is the consultation coordinator and also Mr. Gordon Grey, consultation liaison of the group.

I have both of you here for 10 minutes. Feel free to switch back and forth if you wish in your allotted time, but for 10 minutes, please.

Ms. Sydney Paul (Consultation Coordinator, Kingsclear First Nation, As an Individual): First of all, I just want to note that any information that I'm quoting I can share with the clerk after the presentation, if you like, because I know that people were sending their presentations in.

My name is Sydney Paul and I'm the consultation coordinator for Kingsclear First Nation. Gordon Grey is also with me; he works in consultation for Kingsclear.

I would like to thank the Standing Committee on Fisheries and Oceans for the invitation and to our Mi'gmag; we are sitting on unceded traditional Mi'gmag territory.

We are here to speak on behalf of the six Maliseet communities in New Brunswick. However, our presentation today is not intended to be a comprehensive list of the Maliseet nation's concerns about wild Atlantic salmon. A full-scale consultation would need to be undertaken to obtain a complete understanding of the Maliseet nation's priorities and concerns. Nothing in our presentation should be able to limit, define, or otherwise constrain the Maliseet from bringing additional information forward. In no way does our presentation prejudice the extent of our traditional resource use of wild Atlantic salmon and/or our treaty and aboriginal rights.

The ability to continue our reciprocal relationship with salmon has existed since time immemorial and has been nearly extinguished in the entire Maliseet territory. Legally we are not allowed to fish salmon in our traditional territory.

I would like to state that we have had little time to prepare for this session, and therefore the information that I will provide in this presentation is not a complete presentation of the issues and concerns of the Maliseet.

We call ourselves the Wolastoqiyik, which means people of the Wolastoq. Translated, it means beautiful river. English speakers know this river as the Saint John River. Our name for ourselves illustrates our deep-seated relationship to the river. We are the people of the beautiful river. Our relationship with the river has guided our language, culture, traditions, and society for thousands of years. The importance of the interwoven relationship between the river, the Atlantic salmon, and our people cannot properly be described in 10 minutes. A lot of education needs to happen about the importance of our culture and section 35 constitutionally protected rights. Our oral traditions teach us of our relationship with Wolastoq territories since time immemorial and also give records of environmental degradation to our river system from contact onward.

In our relationship with the Atlantic salmon and our fight to maintain our traditional way of life in context, I would like to read a passage from historian Jason Hall. This comes from our Maliseet traditional land use study that we're currently undertaking.

> In 1840, New Brunswick's Indian agent, Moses Perley, advocated damming the mouth of the mouth of the Tobique River as he believed that destroying the most viable food supply available to the local Maliseet community would force them to become more productive farmers and assimilate them into settler society. Perley's vision of a hydroelectric dam on the Tobique did not come to fruition until 1953. It was preceded by dams on the Aroostook River in 1923 and Grand Falls in 1931. The Tobique dam was also followed by Beechwood in 1958 and the Mactaquac in 1968.
>
> The dams had and continue to have large-scale negative effects on our society and culture. They flood our villages, cemeteries, plant resources such as fiddleheads, and areas of cultural importance. They also continued to decimate the Atlantic salmon population in our river system to a point where our members can no longer continue the relationship including language and ceremonies that accompany harvesting activities with salmon in the Saint John.

I would like to read a quote from our traditional land use study that is being completed. This is from one of our members we had interviewed:

> They completely destroyed our way of life when they made the dam. We had a natural playground for our community, we had water, we had islands, the fiddleheads that were on those, and we had natural swimming pools and a pump house. On weekends in summertime you could see the families just going there. We had ball games on that reserve. Families would go down and take their kids. I remember seeing our guides, the elder women, they all had their place. Some were flat rods and some using spinners and they'd sit there...

Sorry, this is just direct quotes from what they were saying:

> They'd fish maybe until before dark. After the dam, that came to an end. That way of life is gone and the livelihood.

● (1155)

As mentioned in the above quote, the way of life is now gone. I cannot fish salmon in the waters that my ancestors fished, and it is unlikely that I would be able to pass this knowledge along to my children. Dams and industries like forestry are eradicating our aboriginal and treaty rights to fish wild Atlantic salmon.

A resource development project is being proposed within our territory, and we feel that it further degrades the habitat of the salmon. We have hired Canadian Rivers Institute to do a study on salmon because we are so concerned. We hoped that even the chance of negative impacts on the salmon would be enough to stop the resource development project, but that does not seem to be happening.

Your report identifies habitat improvement as one of the most important undertakings to sustain and ultimately improve salmon stocks. Since 2008, the Maliseet Nation Conservation Council has been working with Maliseet communities through the aboriginal fisheries strategy to collect habitat data. This data collection is done through stream enhancement, water quality testing, and culvert surveys. The data enabled our community to establish whether brooks are able to support salmonid populations. Our community members are actively taking part in the stewardship of our territory in hopes that the streams and brooks will become viable salmon habitats.

The Tobique River is now under construction for a fish passageway, which is anticipated to decrease the fish kill of Atlantic salmon and the American eel. The Maliseet appreciate that DFO has pushed to incorporate a downstream passageway at the location, but overall efforts seem minimal at Beechwood and Mactaquac. We were told that fish passages were coming to these locations, but where's the sense of urgency? The Mactaquac dam's fish passage is currently a fish hatchery that trucks Atlantic salmon to the Tobique River.

The Mactaquac dam, which is adjacent to my community of Kingsclear, is now making headlines with NB Power picking among its four options by the end of this year. The Maliseet have told NB Power that we prefer option three, which is the river restoration. A councillor from Kingsclear First Nation, Patrick Polchies, describes removing the dam as the single greatest cultural event for the Maliseet in our memories, which would go a long way toward achieving reconciliation with the Maliseet.

The Maliseet believe the dam removal would greatly improve habitat, which is on the committee's recommendation list. The Maliseet are also concerned that the recreational fishing is an option in your recommendations. Although you note that mortality is low if best practices are used, with Atlantic salmon populations as low as they are, we do not see those as adequate conservation measures. The Sparrow decision basically says that aboriginal peoples of Canada have an inherent right to fish for food, social, and ceremonial purposes. This right supersedes recreational fisheries, and recreational fishing should not be allowed until viable populations return.

In conclusion, the Maliseet are deeply concerned about the status of the wild Atlantic salmon. Our knowledge and relationship to salmon is instrumental to rebuilding the population of our river. We need to be meaningfully involved in the recovery. To date our issues have not been adequately addressed by DFO, and our relationship with DFO is unreliable. The federal government must include first nations in decision-making about Atlantic salmon recovery. We have had a deep cultural connection to the species since time immemorial and our traditional knowledge cannot be understated. We want to work with those people who can help us in gaining back our rights to salmon within our traditional territory.

Woliwon.

● (1200)

Mr. Gordon Grey (Consultation Liaison, Kingsclear First Nation, As an Individual): I was going to give a quick rundown of the three big industrial projects that are happening on Maliseet territory. Of course, Sydney mentioned the Mactaquac dam options, but I also have the paper from the CRI concerning the Sisson mine and its effect on salmon in the Nashwaak River, and there's also energy east.

If you have any questions regarding those things or our stance on them, then feel free to direct them to me afterwards.

The Chair: Thank you, Mr. Grey.

You can probably work that in to your questions and answers session coming up.

We are pressed for time, of course. It is now noon. We are officially supposed to be done, but we're going into overtime, simply because it's quite interesting. Thank you.

We're going to go seven, seven, and seven, and I'll work on the timing at the end to make sure we get another round, colleagues. We may be going until 12:30 p.m. Is that okay? Do I have consent for that?

Some hon. members: Agreed.

The Chair: Great.

Mr. Finnigan, I think we're starting with you for seven minutes.

Mr. Pat Finnigan: Thank you, Mr. Chair.

Welcome. *Bonjour. Woliwon*

I would like to say that our committee—we've heard this before—is not here to replace other mechanisms to consult. We're here to hear. We're here on the river so that the whole committee can see other interactions. We've had people present to us through video conference, but I felt that it was very important that we come here to listen to everyone who has interactions on the river, including the first nations, of course. I'm hoping to be able to get most of you in.

Mr. Carr, regarding the Atlantic Salmon Federation, you referred briefly to the CAST project. I remember that when it first came up there were major concerns about releasing salmon that had been raised in captivity, even though they were wild salmon. They were captured smolts. I think that's how it works: by raising them for 18 months or 16 months after capture and then releasing them into the wild. There were concerns about their effects in nature, about how they would interact, and about the succeeding generation.

Can you elaborate on that to alleviate fears? What are your thoughts on that?

Mr. Jonathan Carr: The CAST initiative, to give a really quick overview for those who aren't familiar with the CAST program, involves industrial partners, academia, DFO, the Atlantic Salmon Federation, other NGOs, and first nations. There's a whole suite of projects lined up for the Miramichi watershed. The projects that are being laid out for the Miramichi watershed are going to serve as models, as innovative programs where that knowledge can be transferred to other watersheds.

One of those projects being proposed is adult supplementation. It's a smolt-to-adult supplementation program. It's about collecting wild smolts in the spring on their way out to the ocean, taking those wild smolts into the Miramichi salmon hatchery, where I think you folks are going to be visiting tomorrow, growing those fish to the adult stage, and then releasing them back into the river.

This is an innovative project, but it is an experiment. The Atlantic Salmon Federation's concern is that we want to make sure that it is run as an experiment and not as a full-fledged stocking program. This will be the first time such a stocking initiative actually has a large-scale assessment.

We're going to be looking at how well those fish are interacting in the hatchery, from the time they go into the hatchery to the time they leave the hatchery. There's going to be a lot of tracking involved with these fish, too, to see how they develop mate choices with the true wild fish, how their offspring interact, and all the way back from the offspring leaving the river and coming back to the adult stage. We want to make sure that it's done in an experimental fashion, a controlled fashion, because we don't know what the outcomes would be for this. We want to make sure there's no harm done to the river during this phase.

It is innovative in the sense that there's not a whole lot of time spent in the hatchery. That's one of the innovative stages, because for hatchery programs in general, the more time a fish spends in the hatchery, the worse off it is when it's released back into the wild. This is minimizing the time spent in the hatchery. It's more or less to see if this will actually give the wild population a boost while we research reasons as to why the salmon is declining. It's a band-aid, and it should be a short-term initiative. Once this experiment is completed, we will assess it to see whether or not it works. If it does work, then it's something that you could have in your back pocket for the Miramichi if there's a need for it.

There probably isn't a need for a full-fledged stocking program right now, but by putting this in your back pocket if it does work, it's something that could actually be applied to other river systems. There are other similar projects going on right now, one in the inner Bay of Fundy, but that's a stock that has been completely decimated so there's no harm, no foul, with that one. On the St. John River above Tobique, there's a very similar program that they're doing there as well.

That's all I have to say. If there are more questions or you want more clarification, I don't mind.

● (1205)

Mr. Pat Finnigan: Thank you, Mr. Carr.

Chief Ginnish, I know that you've referred a lot to consulting with DFO and that, and I know that, on their side, first nations have been a doing a lot, including using different means of catching the salmon with trap nets. I know that you're also monitoring the population.

Do you feel that your traditional ways of managing the river are taken into account by DFO? Do you feel that there's good consulting in terms of your traditional methods of conserving the salmon and the whole ecosystem around it?

Chief George Ginnish: I'm sorry I was a little heavy on the legal in the introduction, but we had to lay the ground that we're absolutely open to co-management and speaking about options. We've been involved initially with resource managers from DFO to look at other options for food for our communities, and for the most part those discussions have not led to many other options. We've repeatedly said that for many of our people access to food is the priority, but we respect conservation. We absolutely work with that in mind. We have closed our fishery. We've reduced our fishery.

I guess to put it in perspective, our trap and net fisheries probably would catch in the area of 1,000 fish per year, and that's how many members we have. We have a little over 200 households. The report that I spoke to briefly—and I'll share that, with the food nutrition study that was done—says that our people's diet requires traditional food. We have issues around diabetes, high blood pressure, and heart disease.

When this study was done with the University of Ottawa, based on a proper sampling, it came out that our people get one tablespoon of traditional food per day. That's what it works out to, based on the access we have to fish and game currently. That massively contributes to health issues.

It's not for lack of trying to get to a table and to look at other options, to look at co-management. We've been in a bilateral process with the federal and provincial governments for a number of years. DFO is just starting to come to the table with a mandate to talk about these urgent issues, about how the Marshall decision is implemented.

It has been 15, 16, or 17 years since the Marshall Supreme Court case spoke of moderate livelihood. Our inland communities have not fared well with that process.

We have a community of 200 households. We have four commercial lobster licences that provide work for maybe a dozen of our members. We have 40% food insecurity in our community. We have 200-plus households. We have 80 households that are wondering constantly where their next meal is coming from. So that is of massive, huge concern to us.

The Chair: Thank you, Chief Ginnish. I appreciate it.

Gentlemen, you are splitting your time, I believe.

Mr. Doherty, you are up first.

Mr. Todd Doherty: Yes. I'm going to first apologize to our guests for being called out. When the office phones, you must take it.

I'm going to start off by telling you a little bit about where we're from. I'm from the Cariboo area, Prince George region. Some of you on the panel, or most of you on the panel have heard of the Williams case, the Tsilhqot'in lands claim decision. Chief Joe Alphonse is one of my very oldest and best friends, and Chief Roger William as well is a good friend. My wife and my children are from the Esdilagh First Nation.

So I understand the food and ceremonial and traditional challenges that we face as we move forward. I want to say from Lheidli T'enneh, "hadih", which is hello from our area of Prince George.

We've had a number of testimonies over the last three or four days from first nations, DFO, and recreational and commercial fishers, and earlier today we heard that there is some relationship, but it is growing. It is getting better, I guess, as we move along. I want to hear from Chief Ginnish. Is there a business relationship that you're seeing with non-aboriginal versus aboriginal, which we're growing, and an opportunity to move that forward?

● (1210)

Chief George Ginnish: Absolutely. In the Miramichi Salmon Association and the Atlantic Salmon Federation, we do speak with each other. Bill Taylor, with the Atlantic Salmon Federation, actually worked with us, sat with us, and supported us in looking at other options for food for the community.

We're open to doing it. That's part of Marshall: looking at other commercial options and food options. Our community purchased gaspereau licences that were part of our commercial lobster fishery. It provided for a spring fishery. It provided bait. But with the influx of bass, there is no more gaspereau fishery. It is gone. It is pulverized. We even asked for a bass food fishery last year. Discussions started in February. By the time we got approval, the season was pretty much gone.

We're just starting this year to utilize bass. It's challenging, because we've been pushing for the commercial to replace that, and given the numbers, you really want to be able to have a fulsome discussion about it. Is there going to be a commercial fishery? Can we talk about it? We don't have that option to actually sit and speak about things. We write letters, and they go unanswered for years. That's part of our issue. It leads to frustration. It doesn't solve any of our issues. I've mentioned briefly that there is a table that's starting. I hope that will produce some....

Mr. Todd Doherty: We've heard testimony from you, Suju, and ACE, on the seals. Are all first nations communities within these provinces included in that?

Mr. Suju Mahendrappa: Yes. The founding members of ACE include both Mi'kmaq and Maliseet, as well as one person who is Métis. She's in Toronto. We really do cover the country. Our discussions to date have included numerous first nations in Nova Scotia, New Brunswick, and Prince Edward Island. We're covering all three and all nations.

Mr. Todd Doherty: Pardon my ignorance, but again, being from central British Columbia, a forestry and farming area, I will ask if, in terms of aquaculture, there is a first nations interest in moving forward with any aquaculture commercial opportunities.

Mr. Devin Ward (Science Officer, North Shore Micmac District Council Fisheries Centre, Eel Ground First Nation): There definitely is interest in aquaculture. As for whether or not that's in relation to salmon, salmon is a very tricky aquaculture species. It's not really one that a first nations would like to enter this with; it's not a good starting species.

Mr. Todd Doherty: Perhaps a land-based...?

Mr. Devin Ward: Yes, for sure. First nations are definitely in support of any aquaculture that is land-based. It is our view that this is the way to go. We have to move out of these water-based aquaculture facilities because of the onus they put on the environment. Because of the general way that these things are run on land, they're much more sustainable, in our view.

Mr. Todd Doherty: There's a last thing I have to say, and then I'll switch it over if there's any time.

Mr. Carr, you mentioned the CAST system. I'm wondering if we can get that information provided to our committee.

Mr. Jonathan Carr: Yes, certainly. There's an application through ACOA as well. I think there might be some money coming down through that. Rather than elaborate, we'll certainly send that information along. That's great.

● (1215)

Mr. Todd Doherty: Go ahead, Mel.

Mr. Mel Arnold: Thank you.

Thanks, everyone, for being here this morning. I'll quickly get into it.

I'll give you a little bit of my background. I was with the BC Wildlife Federation, so wildlife management issues and fisheries issues are dear to my heart. We've seen issues in British Columbia with predator management and with wolves in particular. In most of the province, our moose populations have dropped by about 60%. Some would say that it's because of the reluctance of the government to react and to do wolf management programs and so on.

We've also heard seals being referred to as the “wolves of the sea”. I certainly don't want to promote a seal cull, but because we're seeing the salmon populations drop to such critical levels in some areas, have we reached a point where we do have to manage other species proactively in order for the salmon to get past that critical threshold and reach critical mass where they're going to be able to multiply?

Would most of you agree with that? Is there anybody who wouldn't? I'm not trying to put words in your mouth. I want to make sure that if that's actually the case, the information we're hearing reflects that.

Mr. Suju Mahendrappa: I'd like to answer that question, Mr. Chairman, if I could.

In terms of grey seals, there's absolutely no reason to proceed with any kind of cull. We, and other groups like us, have formulas that are clearly viable for total use of the animal harvest that produces products, and along with the ecological benefits are self-sustaining solutions.

There really is no need for a cull. There's ours, and I know there are other proposals on the table to provide solutions to the grey seal predation problem.

The Chair: Mr. Johns, you have seven minutes, please.

Mr. Gord Johns: Thank you.

My name is Gord Johns. I'm a New Democratic member of Parliament for Courtenay—Alberni on Vancouver Island. We have a lot of similar issues that you're facing today, in terms of the threat to our salmon on the west coast.

Before I get started, I want to also acknowledge the traditional territory of the Mi'kmaq. Thank you, Chief Ginnish, for welcoming us to your territory. It's an honour to be here.

We were just in Newfoundland studying the cod. We talked a lot about adjacency and ensuring that local communities are not just accessing quota but managing the fishery. You talked earlier about Canada's obligation to respect the aboriginal rights entitlement around fish.

You've probably heard that where I'm from there was a court case, which has been over 10 years, that the Nuu-chah-nulth won. It established their right to catch and sell fish. Canada is just starting to come to the table to have those conversations.

Maybe you can share a little more about what you'd like to see in terms of how we move forward in co-management.

Chief George Ginnish: Absolutely.

To begin to have a process of management for the entire system would seem to make a lot of sense, to not look at any species in isolation, and to actually have first nations traditional knowledge, science at the table, as part of that discussion. It's being really meaningfully involved with that, not one-off meetings now and again, which really don't get you at the table with the people who are making the decisions. Even after 149 years, we're hopeful that we can discuss a process that works and be part of that. That's huge.

The salmon are so important to us, and we've watched the bass numbers explode over the past five years. It would seem logical that DFO should sit down with the first nations on the river, and the other user groups, and look at the predation, look at what we can do in this system, in this watershed, to improve the habitat for the salmon, improve the returns. We will all benefit if that happens.

There are things that could be done that we're not doing now. There's the offshore commercial fishery that first nations.... We have no contact with NASCO, or any of those discussions that are happening internationally. We probably should be at that table to be part of that larger strategy.

We can't help but think back. My grandfather had a commercial salmon licence for a very short period of time. It was probably two years before the fishery was shut down. In the fifties and sixties, he would have to sneak down to the river to feed his family. This was after your tribe, your people, have utilized that resource, and sustainably, for thousands of years. To be put in that position, and to see all the commercial activity happening on the river and not be part of it has so much to do with where our communities are in regard to development economically. We haven't had that opportunity.

Marshall is only a few years to the table—initial implementation—but there is still so much that needs to be done to get to the point where there's moderate livelihood, so that our requirements are spread over a species, over the entire watershed, and not dependent on a single species.

In our case, the salmon are right by our doorstep. It's available. If people are hungry, they're going to fish it. As long as it isn't a conservation issue, I'm going to support them fishing it.

● (1220)

Mr. Gord Johns: Thank you.

We say back home, and I said it earlier today, that the health of our salmon reflects the health of our communities.

Chief George Ginnish: Absolutely.

Mr. Gord Johns: You talked about five of your communities being, socio-economically, in the lowest 10 communities in our nation. It's important. It's critical, so I am glad to be hearing about that.

I want to ask you all so many questions, but I am limited in time. I have a quick question for Mr. Carr.

We talked about salmon farming. The potential impacts of GMOs and the concerns around escape have come up often. You called for a moratorium while we do the right science and do the work.

I want to ask you also about the role of DFO. We often hear that the role of DFO is to promote industry, but also to protect our wild fish. Do you have any thoughts on that?

Mr. Jonathan Carr: Many times when we are at the table talking to DFO, we feel there is a conflict of interest. Sometimes they'll have the aquaculture hat on, and then they take it off and put the wild hat on. We find that to be troublesome and really difficult, at times, in terms of negotiations and working, because of where the interests lie. We feel there really should be a separation within DFO. They should be one or the other, but not both. A lot of conflicts have arisen from that, and it's something that we really feel should change.

Mr. Gord Johns: Ms. Paul, you talked about salmon enhancement and your investments in getting that started. How are you funding that? Is there funding that's coming through DFO?

Ms. Sydney Paul: Most of the funding comes through AAROM, so the Maliseet Nation Conservation Council are the ones who conduct it on our behalf. They weren't able to be here, but I can share their reports with you if you want, so you can better understand.

Mr. Gord Johns: Is there enough investment coming to you to really get a program going?

Mr. Devin Ward: I can answer that. I am involved with AAROM here locally for the Mi'kmaq.

The money supplied to our AAROM is vastly insufficient. It really covers only our operational costs and the extensive reporting requirements brought down from DFO. The people we do have staffed in our AAROM literally spend almost 365 days a year writing reports for the money we receive. That money cannot be put towards projects, so then we have to go and seek alternate funding through the aboriginal fund for species at risk, the habitat stewardship program, and stuff like that, to get done the research that we want.

Now, I don't think that was the intention of the AAROM program going in, but there is definitely a need for increased, reliable funding that we don't have to apply for year in and year out, in hopes that we are going to get that small piece of the pie that is then allocated to us through these various programs. Consistent funding in that area would definitely help establish these programs, which could go on reliably year after year so that we don't have to worry about the funding drying up because they can't fund it multiple years. Afterwards they look at you and say, “Well, you've done this project for three consecutive years. We can't fund it anymore, because you need to do something else.”

Thank you.

● (1225)

The Chair: Thank you, Mr. Ward.

Colleagues, we are running into double overtime, so I propose a choice. We can either go ahead with short questions and clarifications to sum up, or we can offer a round of five, five, and three.

Mr. Todd Doherty: Five, five, and three....

The Chair: Can I ask you to do your clarification questions within that five minutes? Okay.

Sorry, colleagues, we have to get through the timing issue.

Nevertheless, we will now go to Mr. McDonald, for five minutes.

Mr. Ken McDonald: Thank you, Mr. Chair.

Again, thank you, everybody, for coming as witnesses before the committee today.

I would first like to seek an explanation from Mr. Mahendrappa. I asked about what I would call a seal harvest. I certainly don't support a cull. I do think that a controlled harvest is needed. Since you brought that up as being a part of what you'd like to do, and apparently you have a way to do it so that there is no wastage from it, could you expand on this and let us know exactly how you plan to do it and what type of uses you would have....

Mr. Suju Mahendrappa: Absolutely. We'll start by talking about harvest methods themselves. The method that's currently advocated under the DFO system is essentially to shoot them. There's a three-step process involving shooting them, palpating, and bleeding them out, which is very good. What we've proposed, based on field tests that some of the harvesters have done, is a system for trapping the grey seals when they're hauled out. That would make the harvest more efficient. It would enable a much larger number of animals to be taken and held in an area without ending their lives. This allows for a more selective harvest, a more controlled harvest.

Then, we have various options at that point in terms of how to harvest and process the animals. You could look at using firearms, as has been done conventionally. You could look at using electricity, which is an internationally accepted humane method of harvesting. You could look at CO2 gas, which has also been tested extensively and widely approved as a humane method of harvesting.

In terms of the usage and the value realization, we'll break it down into blubber, pelts, and the remainder, for simplicity.

Blubber is by far the most valuable part of the animal. You get omega-3 oil from the blubber. It's a unique type of omega-3 that is only found in marine mammals and in human milk. One of the compounds is called DPA, docosapentaenoic acid. It's a unique omega-3 that can be derived. You can do it quite efficiently compared to other methods of deriving omega-3 from fish. There's a liquid market in the world. The market price of seal oil has risen dramatically in the last 18 months. It's very much a situation where there are more buyers than there is supply available. I say that the blubber is the most valuable part because it's the simplest part to derive value from and it has the clearest commodity-type liquid market for it.

Next in line in value would be the pelts. There are many options. We group our options and what we like to do with them into traditional aboriginal products, contemporary aboriginal products, and mainstream products. Under mainstream products, you have the fashion footwear and apparel segment, and accessories. There are some very high-value products made in this category. One of our corporate project partners is a gentleman named Bernie Halloran, who is a great guy. He's often considered the godfather of seal products. Nobody in Canada has worked with seal as long as he has. He's a great partner for us to have. He naturally has access to many markets. He has production capacity and a great deal of expertise. He's very much our partner and the go-to guy for contemporary products.

We have a renowned and critically acclaimed fashion designer who is Métis, Angela Demontigny. She is quite skilled at making both traditional aboriginal products and contemporary aboriginal products. We'd like to work with her under a program where we invite other aboriginal designers—aspiring designers perhaps—to participate. It offers a great scope of potential products that can be used.

Under our program, the way that we're looking at getting started means that to some extent those products would be used as showpieces as part of campaigns to build awareness of what we're doing, and the ecological reasons, the cultural traditions, and the aboriginal traditions that are underlying the harvest. That's value in the form of risk mitigation and awareness building. Certainly economic value from the sale of those products is also part of our equation.

In terms of the remainder, which encompasses meat, bones, blood, and organs—all the parts of the seal—there are options for those. Those options include using them as bait in the lobster and crab fisheries, which is interesting because it would reduce the burden on the herring stock. You're kind of getting a two-in-one benefit there. As you've reduced the population, you've created an alternative bait product. There's been testing done on the use of seal in the southern Gulf of St. Lawrence as bait, both for lobster and crab, and that testing has shown promising results.

Alternatively, you could look at things like making liquid fertilizer, for which there is a growing market. We have examined this and it seemed there is viability in using the product to generate humic matter to support agriculture.

● (1230)

There are many options. All parts of the animal could be used for any of those last three and then, of course, there's the food market for the meat, which is part of the nutritional benefit that first nations and other people would gain from what we've proposed.

The Chair: First you had me hungry over bacon and scallops and now you have me hungry over seal flipper pie. Seal flipper pie—I don't know if anyone's ever had it—is good.

Mr. Arnold, you have five minutes.

Mr. Mel Arnold: I may not need the full five minutes, and if I have anything left, I'll pass it on to Mr. Doherty.

Basically, I think you answered one quick question that I had, and it was, is there a sustainable market for the products? But, beyond seal, on the striped bass, if there was an increase in harvest allowed there, and it sounds like there's a demand for it, it certainly would be put to full use as well if they could increase that. Is that correct?

The big question, and it's something we'll probably have to deal with more as a committee is, how do we strike a better balance when it comes time to change harvest numbers or change quotas, whether it be Atlantic salmon, seals, or striped bass, so that we don't always err on the side of caution to the point where now, for example, the striped bass have expanded to the point where they're negatively impacting the Atlantic salmon because we were cautious about the bass. Possibly we've been cautious for too long. Do you have any suggestions on how we can strike a better balance there and make those decisions perhaps a little sooner?

Mr. Jonathan Carr: I don't know if I can answer what the exact management measures would be, but striking the balance in any case, whether it be striped bass, seals, or whatever, is important. I think when management decisions are made, we need to log the date and record how many striped bass are being taking from anglers if there's going to be a recreational fishery and how many are taken from a commercial fishery if it's going to be first nations. It's difficult to just say here's what we're doing because, if we don't track it, we don't know if it works, right?

I think it's really critical to track the numbers on whatever action is taken so that we can assess whether it's worked and make tweaks so that it gets done right.

Mr. Mel Arnold: I think that will echo back to what we've heard the last few days about the cod fishery. Fishermen out there who are on the water are saying there are cod everywhere that could be caught, but we're being cautious on the reopening or expansion of the quotas because of the precautionary approach. It's about getting that information in to monitor those catches, keel surveys, and so on, I think, from all sources.

I'll pass any remaining time on to Mr. Doherty.

● (1235)

Mr. Todd Doherty: Thank you, Mr. Arnold.

Mr. Aucoin, has there been a study on the benefits or the impact of the lime process in that river?

Mr. Réné Aucoin: I could provide you with all kinds of that. The scientist we've hired recently with the funding from the province actually did his Bachelor of Science, his Master of Science, and his Ph.D. with us, all doing the same research. So, yes, we have plenty of research to support what we're doing, but again, it has taken a long time because, generally, it's been all volunteer effort, so the time is doubled and tripled.

I don't know if that answers your question.

Mr. Todd Doherty: We'd just like to see it. It's had 10 years of operation, and we'd like to see the pre-, during, and post-opportunities and the impacts on that river.

Mr. Réné Aucoin: I'll see what I can dig up and I'll provide the committee and chair with whatever I think is pertinent to that question.

The Chair: Mr. Johns, you have three minutes, please.

Mr. Gord Johns: Thank you for coming, for your leadership, and your passion to improve the health of our oceans and our communities. It's greatly appreciated.

Mr. Grey, you kind of got cut short earlier. You wanted to talk about the impacts of industrialization, the impacts of forestry that you touched on briefly, and the potential energy east project and how that might impact our salmon. Do you want to talk a little about that?

Mr. Gordon Grey: Sure.

He said I shouldn't be going over the top of the NEB process or anything like that. Of course, standing aside from the NEB process, if it does actually go through, the cabinet and ministers have the final say on most of these projects.

Mr. Gord Johns: You could even talk about the past, and the impact right now from forestry and what's happening from current projects.

Mr. Gordon Grey: I wasn't actually talking about forestry. It was the Mactaquac dam, Sisson mine, and energy east.

My closing is that with the cumulative impacts we have already experienced, we stand to be significantly impacted by these additional projects. Our livelihoods, culture, traditions, way of life, with respect to our traditional waters, and salmon in particular, have been impacted and will continue to be should we continue along the same path of industrial growth.

With the Sisson mine in particular, obviously it destroys two salmon habitat brooks. It's a 1,700-hectare footprint. It stomps right into the middle of salmon habitat. The study that I have was made by the Canadian Rivers Institute. It basically assumed a lot of silly things, like 100% lethality for water released from the tailings pond, which is a little absurd. It also projected, in a simplistic model, that it could have a zero return in the Nashwaak River by as early as 2028, without any negative effect from the proposed project.

We already have the decline, so any further negative impacts are really horrible for any salmon; I mean the Nashwaak in particular, because it's one of the few unobstructed habitats left for salmon. The Nashwaak River is a fairly large tributary of the Saint John River. It is unobstructed by dams, unlike say upwards of the Tobique.

I have a lot of problems with industrial projects getting approved and approved, because they all build on one another.

Mr. Gord Johns: Can Chief Ginnish respond?

The Chair: Very, very quickly, Chief.

Chief George Ginnish: Very briefly about forestry, I need to advise the board that the Mi'kmaq chiefs of New Brunswick are actually in court with the province in regard to the forest management plan, the new plan: increased harvests, decreased buffers and deer yards, use of contentious sprays, the province delegating management to industry. We all have issues with that. We've been trying to get to the table for a number of years and so far no luck, so we find ourselves litigating because we are concerned about it.

We did get to present to the National Energy Board panel, which is no longer in regard to energy east. We had raised concerns with the pipeline being in the upper reaches of the Miramichi, the Southwest Miramichi, which is actually the stronger salmon river. With regard to the Northwest numbers, the returns have been down. The numbers are not being reached on the Northwest as well as they are on the Southwest. To put the Southwest at risk concerns us extremely. If there were a spill in the upper reaches of the Miramichi or the Cains, the damage that could happen to the salmon and any other fish populations would be devastating to our people, to our way of life.

Thank you for indulging me.

● (1240)

The Chair: Thank you very much.

I want to thank our guests here today. It was very interesting, obviously, from the results of the overtime that we went into. We appreciate that. We know time is constrained for us.

From here, we take the information that you've given us. We draft a report. We amend the report, if needed, with recommendations. It will be tabled in the House. I can't give you an exact date of that because of the debates and witnesses and so on. Obviously, by the end of this year you will see a report tabled in the House, perhaps maybe in early December.

That being said, Mr. Carr, Chief Ginnish, Mr. Ward, Mr. Mahendrappa, Monsieur Aucoin, Ms. Paul, and Mr. Grey, we thank you very, very much, from all of us. We appreciate your time.

The meeting is adjourned.