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• (1535)

[*Translation*]

The Chair (Mr. Francis Scarpaleggia (Lac-Saint-Louis, Lib.)): I call this meeting to order.

Good afternoon, everyone.

Welcome, Mr. Blaikie. I believe this is not the first time you have attended one of our committee meetings. If I am not mistaken, you have already stood in for Ms. Collins. At any rate, we are happy to have you here.

Mr. Mazier, you have the floor.

[*English*]

Mr. Dan Mazier (Dauphin—Swan River—Neepawa, CPC): Just as a reminder, is there any word yet on the expenses from Dubai?

The Chair: I have not been given anything. I have asked for them. There's only so much I can do. I have not heard back.

It's noted that you're requesting the expenses of the minister's delegation from the Dubai COP28. You've mentioned it here publicly. We'll see what happens.

[*Translation*]

I would like to welcome the three witnesses who will appear during the first hour of the meeting.

From the International Institute for Sustainable Development, we have Scott Higgins, senior research scientist, Experimental Lakes Area; Claire Malcolmson, executive director of the Rescue Lake Simcoe Coalition; and André Bélanger, executive director of the Rivers Foundation.

Each witness will have five minutes for their opening remarks.

We will start with Mr. Higgins, who is joining us virtually.

[*English*]

Go ahead, Mr. Higgins. You have five minutes to give an opening statement.

Mr. Scott Higgins (Senior Research Scientist, Experimental Lakes Area, International Institute for Sustainable Development): Good afternoon, Mr. Chair and honourable committee members. Thank you for inviting me to speak with you today.

My name is Dr. Scott Higgins. I am a senior research scientist at the International Institute for Sustainable Development Experimental Lakes Area. I'm pleased to be speaking to you today from Treaty

1 territory, the traditional lands of Anishinabe, Cree, Ojibwa-Cree, Dakota and Dene peoples and the homeland of the Métis nation.

I am very honoured to provide testimony to this committee on behalf of my organization. This is a very important topic that affects all sectors and peoples of Canada. The IISD Experimental Lakes Area has played an important role in understanding and providing scientific guidance for policy-makers, managers, industry and the public for over 50 years, first within the federal government and now as a non-profit research-based organization. As our name implies, we focus on freshwater issues that affect Canadians. We have years of experience in research, monitoring and data, which is what I will speak about today.

With respect to the federal responsibility for water, we recommend that a priority of the Canada water agency is to develop a national water strategy that would include facilitating collaboration across jurisdictions and sectors, improving access to national freshwater data and facilitating priority areas of research. Given the importance of water to all sectors and peoples of Canada, a national water strategy is of strong national interest.

With respect to research, I would like to start by highlighting that Canada is recognized as a world leader in freshwater science. Our research at the IISD Experimental Lakes Area and that of our colleagues at Canadian academic and government institutions has made significant global contributions to understanding the impacts and risks to freshwater systems and providing science-based management and policy solutions.

An important driver of my organization's success has been the highly collaborative nature of our research, which includes academic and government researchers, indigenous peoples, industry, NGOs and other stakeholders. We have found that this collaborative model helps break down barriers, is highly cost effective and leads to strong management and policy outcomes. For this reason, we feel that a key role of the Canada water agency should be to facilitate collaboration between government departments at all levels and the many stakeholders in the water sector to undertake activities required for managing the complex nature of Canada's water systems.

We recommend that the federal government, through the Canada water agency, should take a leadership role in identifying issues at the regional and national scales that require further research and facilitate the creation of national collaborative teams to tackle them. This would require coordination of funding from government, private sources and programs, many of which already exist but are fragmented across different agencies.

With respect to monitoring, we recommend that a national water strategy include routine national assessments of lake and stream water and groundwater. Routine national water assessments are an issue of national security and importance. Without them, we are not able to understand the state of our freshwater systems and to identify risks to the public, to our ecosystems and to all sectors of our economy. Further, a national monitoring program would help identify emerging issues of regional and national importance where management and policy interventions, or further research, are needed.

This brings me to my final points, which are about data. Currently, water quality data in Canada is widely dispersed across different levels of government and sectors. It's very challenging to access. Millions and millions of dollars are spent on collecting data, and yet it often sits on shelves gathering dust. Canada needs a national database that is open and accessible to everyone.

In our experience, the public wants to know about water issues where they live. This knowledge can help drive effective stewardship. There are examples from other countries on how this has been achieved. There are also great examples from Canada—DataStream, for one—that bring in data from disparate sources like governments, academics, first nations and community groups and provide it in an accessible way to scientists, managers and the public.

Thank you very much for your attention. I look forward to answering your questions.

The Chair: Thank you, Dr. Higgins.

We'll go now to Ms. Malcolmson for five minutes, please.

Ms. Claire Malcolmson (Executive Director, Rescue Lake Simcoe Coalition): Thank you very much for the very last-minute invitation to join this committee.

[*Translation*]

Hello.

• (1540)

[*English*]

I'm the executive director of the Rescue Lake Simcoe Coalition.

Lake Simcoe is in an art map behind me. It's in southern Ontario, an hour north of Toronto. It's the poster child for the impacts of development on a lake. It's the most intensively studied lake in Canada, as far as I know, with the exception, probably, of the experimental lakes.

I'm here to talk about the fact that there are so many interrelated, multi-jurisdictional issues that data alone, although important, cannot solve the problems. We have watershed legislation at Lake Simcoe that should be protecting the lake. However, most of the targets we are trying to achieve continue to get further and further out of

our grasp. What I want to impress on the committee here is the very serious need for the federal government to act on the policies you already have. I'm speaking about, in particular, impacts to Lake Simcoe from the Bradford Bypass highway.

That's my overview. I'm going to step back a bit and acknowledge that Lake Simcoe is in the territory of Williams Treaties first nations. There are two first nations that currently reside on the lake. The Georgina Island first nation is one of our 30 member groups. I'm not speaking on their behalf, but we learn from each other and have developed relationships. We have a lot to learn from our first nations and I hope they're coming to this committee, too.

There are a number of things in my brief that I applaud the federal government for taking action on. I think it's very important to recognize that land use affects water more than anything else. I appreciate, in particular, tying affordable housing money to municipal density bylaws. That's because, at Lake Simcoe—where we have 500,000 people living in the watershed, including in the cities of Barrie, Orillia, Newmarket and Bradford—sprawl is the biggest growing impact we have. Of course, it overlaps with another federal priority I appreciate: reducing the impacts of climate change and reducing our greenhouse gas emissions. We have to do that to save Lake Simcoe, save our climate and protect our water from the impacts of salt pollution, which is a huge issue we've just taken up in a serious way in the last couple of months.

I'm talking about land use planning and how these activities interact with water quality. For the Bradford Bypass highway, for example, we know we didn't get an impact assessment. We tried twice. We know the impact assessment tool is a bit of a hot topic, so leaving that aside, we're still very concerned that our waters are not protected. The Bradford Bypass proponents have identified, in their fisheries information, that they found the American eel. That is a federal jurisdiction: endangered species. This was identified by first nations, another area of federal jurisdiction.

We have reviewed all this information and find it lacking. I'm going to be sending a letter to the DFO. Currently, the DFO says they are going to wait and see if they are asked to review this information. I submit that this is the wrong approach when we have a very big project. It is frankly not appropriate for the 21st century. It's a 16-kilometre highway over 13 water bodies, one of which is currently choked with salt already. It's not appropriate to let a project like that go ahead.

Clearly, everyone in the Government of Ontario has removed the brakes. The guardrails are being dismantled, so we need the federal government to act on the powers it already has to protect the fish. The quality of the water, of course, has a major impact on the fish.

The Chair: That is time, Ms. Malcolmson.

It's a very interesting position, which I'm sure will generate a lot of discussion. It is closely related to the topic of water quality and the role of the Fisheries Act in protecting water quality.

• (1545)

[*Translation*]

Mr. Bélanger, over to you.

You have five minutes for your presentation.

Mr. André Bélanger (General Manager, Rivers Foundation): Thank you, Mr. Chair.

Mr. Chair, esteemed members of the committee, thank you for your invitation. It's a pleasure to be here today.

For 20 years now, the Rivers Foundation has been working on water quality, access to riverbanks and protecting our rivers' natural state. We believe in increasing and expanding the respectful uses of water and waterways so that more people enjoy, care for and protect water.

Among the challenges we are currently facing, the first is to dispel the false perception that urbanized waterways and rivers are dirty and polluted. Our rivers are no longer the dumping grounds they once were, even though there are still major challenges in terms of treating municipal, industrial and agricultural waste water and there are too many microplastics and emerging contaminants. Be that as it may, we have to reclaim our waterways.

In addition, we must dispel the false perception that water can be contained, channelled and controlled. As you know, because of climate change, there is too much water in some places and not enough elsewhere. If we were smart and allowed waterways to flow freely, they could help us better adapt to climate change.

I bring this up because we are mediators in the field of information. We interpret data with the intention of protecting our water sources and rivers. We take knowledge and we act on it. To be able to act, we have to start by taking a balanced, holistic and pragmatic look at the situation. That is what we did when we tackled the issues related to municipal waste water treatment in Quebec. We organized the data that was provided by municipalities and collected for years by the Government of Quebec.

The previous witness mentioned that a lot of data is being collected. Indeed, we are almost obsessed with data. However, no one analyzes the data. Not a lot of people get useful information out of it, but that is precisely what our organization has managed to do. We processed the data using the Microsoft PowerBI platform. We developed an extraordinary diagnostic tool called AuditEAU. This tool enables us to publish annual rankings based on wastewater overflows and a map that allows us to compare how various municipalities in Quebec are performing.

The impact was immediate: The media relayed the information, citizens became involved and, above all, elected officials got on board and made the necessary changes. AuditEAU has become a tool for the public good that enables elected officials, citizens and departmental officials to do their work better. Moreover, the Quebec Ministry of the Environment has acquired a licence for the software to use it with its own data.

The Canada Water Agency needs to be a data exchange facilitator. We talk about data all the time. Protecting water is a complicated business. We have to find solutions that go beyond administrative divisions, solutions that almost always fall under shared jurisdictions.

So how can we get the agency to contribute in the right way to provincial efforts, particularly in Quebec?

First, the agency must have the role of facilitator to foster the intersection of scientific, public, private, citizen and indigenous expertise. It could encourage the development of simple, powerful indicators that work to motivate people. A performance indicator does not have to be perfect. In fact, it must definitely not be left solely in the hands of scientists, because people on the ground have to get involved and ask the right questions. A good indicator makes it possible to measure and take concrete action to protect our waterways.

That's what our annual rankings do. We developed an overflow per capita intensity indicator, which allows us to compare municipalities. We now see that the municipalities are on board. In the Gaspé, we established a direct link between sewage discharges and the ban on shellfish harvesting. Fisheries and Oceans Canada had taken samples far too long ago, and the analysis showed that there were contaminants from water treatment plants. That could enable us to develop indicators.

Second, the agency must facilitate data sharing. Data is collected in Canada and we don't know what to do with it. Why is the data being collected? What are the datasets used for? What kind of picture do they paint? Are there any comparisons to be made?

The agency can and should support the sharing of as much data as possible, develop interoperability mechanisms for open data, and support citizen data mining efforts that might seem to provide different results at first glance.

Third, the agency must facilitate the participation of civil society in the search for solutions. Protecting water requires the active and engaged participation of civil society. Citizen organizations are creative. They are committed and they know how to get governments to act. You are prime witnesses to this effect.

Innovations will emerge from the bottom up, and the agency must support citizen involvement and science initiatives. The Action-Climat Québec funding program, which funds citizen involvement in efforts to fight and adapt to climate change, is a good example.

• (1550)

In its role as a facilitator, the agency must serve as a unifying force. This must be done while respecting each province's jurisdiction, of course, but to succeed collectively, we need this unifying body that will allow information to be shared.

The Chair: Thank you. That's very interesting. I'm sure your presentation will generate a lot of questions.

We will now begin the first round of questions. We'll start with Mr. Kram.

[*English*]

Mr. Michael Kram (Regina—Wascana, CPC): Thank you very much, Mr. Chair.

Thank you to all the witnesses for being here today.

I start with Ms. Malcolmson from the Rescue Lake Simcoe Coalition. In your opening statement, Ms. Malcolmson, you talked about how the targets that you are trying to achieve are further and further out of your grasp. Can you elaborate on what exactly these targets are?

Ms. Claire Malcolmson: The Province of Ontario passed the Lake Simcoe Protection Act in 2008 and the plan in 2009. I was the lead campaigner for environmental defence to get that legislation, with Rescue Lake Simcoe and Ontario Nature.

The main problem we have at Lake Simcoe is phosphorus pollution, so we have a target of reducing the annual phosphorus loads to the lake from, now, about 90 to 100 tonnes, to 44 tonnes a year. When you compare the two most recent 10-year periods, our phosphorus loads are actually going slightly up. This was 100% anticipated by the previous provincial government, in some study that they did at our request as part of multi-stakeholder work to analyze the impacts of growth development on the watershed, so really, it's stormwater and urban development that are driving that increase or the fact that we are not making substantial gains. The only reductions that are known have come from improvements to sewage treatment plants—and thank you very much, as I think there was federal funding for that too—but it's limited. We've picked the low-hanging fruit, so reducing phosphorus at this point is increasingly challenging.

I will just note that I also appreciate that the federal government made a \$24-million contribution and really kick-started getting a phosphorus treatment plant on the Holland River built, and the province is now aiming to get that done in this administration.

There are other targets as well: Trying to achieve 40% high-quality natural cover is one of those. That also fits with the 30 by 30 target the federal government has. We have nowhere near 40% high-quality natural cover in the watershed. That's one of those really important indicators for health, and also, of course, it's important for climate change. We're making no progress on that.

Mr. Michael Kram: Let's come back to phosphorus levels. It was my understanding that the previous federal Conservative government had a program called the Lake Simcoe clean-up fund, and reducing phosphorus levels was one of the goals of that program. It's my understanding that, during that time, the phosphorus levels were actually going down, and that this was measurable, demon-

strable and all the rest. Do you have any views on the Lake Simcoe clean-up fund and the work that was done at that time?

Ms. Claire Malcolmson: It was really important to have that fund. Mostly, the conservation authority and the Ontario government used that money. I don't really care which government produces the fund or names the fund. The name of the fund is not important to me, but what's important to the lake and to the people who care about it is the effect.

Again, if you look at the phosphorus loads and compare two recent decades, they're not going down. We have not done enough to control the pollution, and the pollution is stormwater and overland pollution. It comes from farming—and all sorts of sectors as well, of course—but the growing sector is growth, and that, again, is why we come back to fighting sprawl in southern Ontario and in this very delicate watershed. I think it's important to make the connection between land use and water.

What I really don't want is for the government to say, “We'll just keep throwing money at this and it's going to be fine.” I'm here to say that's not enough. We appreciate the money, of course, but to be clear, my organization has never received federal funding for this kind of work. We continue to advocate and to talk about the need to control sprawl for so many reasons. Money's great, but we need enforcement of existing policy and we need teeth.

• (1555)

Mr. Michael Kram: I like a lot of what you said in that throwing money at a problem is not necessarily the best practice, and how the name of a program is not necessarily what's the most important.

In terms of the actual, tangible policies—we had the Lake Simcoe clean-up fund in the past and various provincial government programs—can you point to any government initiatives that worked well, or maybe did not work so well?

Ms. Claire Malcolmson: Yes. What has worked well is throwing money at improving the technologies used at the sewage treatment plants.

Throwing money at stormwater management has also worked well. Stormwater is about 30% of the phosphorus load. As some of you may be aware, it turns out that technology doesn't save us from all of the harms. Actually, some of the methods that we think are going to work end up not working that well in a few decades, and that's the case with stormwater management ponds.

Some of them have become a source of phosphorus pollution because of the type of anaerobic digestion that happens and the fact that we have a lot of salt. We need to manage salts—

The Chair: Thanks very much.

I have to pass it to Mr. Longfield now.

Mr. Lloyd Longfield (Guelph, Lib.): Thank you, Mr. Chair.

Thank you to the witnesses.

I'd like to start with Mr. Bélanger.

I know there's been some experience around the Mercier lagoons with PCBs, the contamination of groundwater and the plume that's created, which is a real challenge to drinking water.

Up in Kearl, we met with the representatives around the leak in the tailings pond. I recently spoke with Chief Tuccaro from the Mikisew Cree First Nation about the challenges there, which have naphthenic acid and heavy metals.

You mentioned in your testimony the monitoring and the tools that have been developed to monitor contamination. Could you tell us how those could be modified for areas where naphthenic acid is the concern, or where PCBs would be the concern somewhere else? Is this monitoring adaptable to the different conditions we're trying to monitor?

[Translation]

Mr. André Bélanger: We have the technological tools. They are readily available. Certainly, we've been focusing a lot on fecal coliforms and a little less on chemical pollution. The tools and technologies exist. The challenge we have is to make information available quickly so that it can lead to decision-making.

In the case of the Mercier lagoons, the situation is desperate. The lagoons site is being decontaminated and that work will carry on indefinitely. In Blainville, they are talking about expanding a toxic waste dump. The authorities are claiming that the membrane is watertight, but it will break down over time.

There is the challenge of transparency, of communication. You have to make sure that people are aware of the risks and understand them, and that follow-up work is done based on the information previously communicated.

Again, a lot of information is being collected, but we should be setting targets, including preventative ones.

[English]

Mr. Lloyd Longfield: Thanks.

Chief Tuccaro also mentioned that some of his people used to go out on the land and use the snow to make their tea. Now, he isn't sure, because people are getting sick. Can they use the snow? Having some type of field analysis would be important.

Is this the type of thing we could bring through the Canada water agency?

[Translation]

Mr. André Bélanger: Absolutely. As soon as we establish an acceptable standard across the country, we have to ask ourselves some questions. We can verify, on the ground, whether those standards are being met and respected. Obviously, the standards have to be based on environmental and scientific factors, not political ones.

So the answer to your question is yes, the agency could also serve in that capacity.

[English]

Mr. Lloyd Longfield: That's helpful. Thank you very much.

I'd like to go to Mr. Higgins next.

The Experimental Lakes Area was near and dear to me. I grew up in Winnipeg. I used to canoe in that area where the experimental lakes are. It was closed under the Harper government. We found ways of keeping it open through the province, through Ontario, and then later on, the federal government stepped in.

I spoke with a chief up in Dryden, who talked about the need to start with clean water. The monitoring of that water is very important, if there's a paper mill nearby, for the indigenous communities to know whether the water is acceptable or not.

Could you comment on whether the experimental lakes have been working with field monitoring and the ability to look at the lakes in real time, or is that an opportunity for the Canada water agency?

• (1600)

Mr. Scott Higgins: I think there are a lot of opportunities there.

At the IISD Experimental Lakes Area, especially since we have transferred to being a non-profit agency, we have been reaching out to our first nations partners. Many of them, especially in Treaty No. 3 territory, are developing their own community-based monitoring programs, and we are facilitating that development where we can.

I think you're absolutely right that citizens are concerned about their water quality. Is it safe? Is it drinkable? Is it swimmable? In order for them to know that, not only does the monitoring have to be done but they also need access to the data, and they need it in a rapid fashion.

Mr. Lloyd Longfield: The water training centre and water monitoring centre in Sioux Lookout go into the NAN nations in different places, where filtration solutions have been put in place, and then there is a flood event or there is an industrial event. Part of your testimony was about being able to have open access to data. Could you confirm some of that? I have only a few seconds left.

Mr. Scott Higgins: Yes. One of our concerns is that, while there's a lot of data being collected on monitoring by different agencies across the country, that data is not readily accessible to scientists, to the public or to governments. It needs to be more available.

The Chair: Thank you.

[Translation]

Ms. PaUZé, you have the floor.

Ms. Monique PaUZé (Repentigny, BQ): Thank you to all the witnesses for being here today.

I'll start with you, Mr. Bélanger. Thank you for coming.

You provide a lot of advisory services to municipalities. How many municipalities have reached out to you?

Mr. André Bélanger: We are working with approximately 25 municipalities right now. We are currently developing a watershed-based approach. The idea is to establish a solidarity network between upstream and downstream stakeholders, i.e., between the towns that emit pollution upstream and those that are downstream. Elected officials are coming together to work on the North River in 15 or 16 towns. Not all the towns are on board yet, but a number of them are committed to tackling the problem of pollution and optimizing municipal waste water treatment.

Ms. Monique Pauzé: You talked about your AuditEAU diagnostic tool, which I found extremely interesting. Could it be used by other municipalities in Canada? Has there been any interest there?

I'm asking you these questions because this tool seems well designed.

Mr. André Bélanger: The difficulty lies with the comparability of the data. Quebec is an expert on the quality of data on municipal waste water. It is much more stringent than what the federal regulations require. So we have quite a bit more granular data and metrics. Unfortunately, we are not yet able to make comparisons, but it would be extremely interesting for Quebecers to know whether the quality of their water is average, or above or below average. When we compare ourselves to others, we tend to feel better.

Ms. Monique Pauzé: Yes.

You talked a lot about data sharing, which is not happening. Other witnesses have mentioned the same problem, and no doubt we will hear about it again. Are you using a model that could align with other data collection systems?

Mr. André Bélanger: Absolutely. We rely on government data. We don't make up the formats. Open data formats already exist. The challenge boils down to a single question: What do we want to do with this data?

We wanted to start with a collaborative pilot project between Quebec and Ottawa involving a couple of municipalities, which would allow us to compare data. Then we would create a common database, which would serve as a comparative dataset across the country.

Ms. Monique Pauzé: I'm always concerned about risk. You work with people on the ground, whereas the federal government is not at all in touch with communities and people living in the country. We are always afraid that it will start meddling, regardless of the measures that are already being implemented in communities and municipalities, because it does not know the organizations involved or the laws.

Is this a concern for you as well?

• (1605)

Mr. André Bélanger: When I looked at the briefs submitted on the Canada Water Agency, I saw a difference between Quebec's position and that of the rest of Canada as to the powers that should be given to the agency. It was quite clear that there are concerns on the Quebec side.

However, that is not a major concern for us at the moment. Since the federal government has more of an arms-length perspective, it could actually take on a unifying and facilitating role, without getting involved in the nitty-gritty of the work being carried out on the ground. What's more, because it can issue calls for projects and provide funding programs to stakeholders working on the ground, it would encourage innovation. That's something we mustn't lose sight of.

We should not necessarily rely on the institutions that are already set up in the provinces, because they are often caught up in their own way of doing things.

Ms. Monique Pauzé: Thank you very much, Mr. Bélanger.

I'll turn to Mr. Higgins now.

Mr. Higgins, I would like to start out by pointing out one small thing.

There's a footnote to your study on oil spills. However, when I click on it, I get "error 404," as if the page doesn't exist.

Could you send the document to the committee? That is not my question, but rather my request.

The International Institute for Sustainable Development, or IISD, has a plan to help improve information and data collection on freshwater so as to increase research, training and engagement.

You are seeking \$37.5 million in federal grants. However, 11 federal facilities are already conducting freshwater research.

Are these labs, these centres, receiving a portion of the \$37.5 million?

[English]

Mr. Scott Higgins: To answer your question, I'm not exactly sure where all of that funding goes.

The funding we receive from the federal government and from the provinces of Ontario and Manitoba goes to supporting our science infrastructure. We then obtain funding for science with our academic and government partners through other funding programs.

[Translation]

Ms. Monique Pauzé: You will understand that, these days, when we ask questions about government funding, we like it to be very transparent.

When I look again at your work on information, data collection, research, training, engagement and all that, I wonder whether you aren't already the de facto Canada Water Agency.

The Chair: That's a good question. We'll have to answer it later, unfortunately.

[English]

We'll go to Mr. Blaikie for six minutes, please.

Mr. Daniel Blaikie (Elmwood—Transcona, NDP): Along a similar line, Mr. Higgins, with the government looking to set up a new Canada water agency, I am curious to know what you think some of the potential pitfalls are in setting up a new agency like that that the government should be seeking to avoid.

What do you think are some of the best practices it should be looking to so as not to simply duplicate work, but actually add value to what's already out there?

Mr. Scott Higgins: That's a really good question.

There are a number of players in the water sector across Canada, because it integrates into almost every sector in Canada and affects almost every person in Canada.

If you're going to talk about the pitfall side, I think the concern would be issues around red tape and accessibility.

On the benefit side, what we're really missing in the national context is what we recommended, which is this national water strategy, because we really don't understand issues around water quality or water quantity on a national scale. There are some big issues and risks that Canada and Canadians face.

A recent study in the United States indicated that PFAS chemicals—these forever chemicals that are carcinogenic and cause all sorts of human health issues—are widespread across the United States, and were previously unknown. If someone was going to ask me what the status is in Canada, I would say we don't know because we have no system right now that evaluates these sorts of risks on a national scale.

• (1610)

Mr. Daniel Blaikie: I'm not necessarily looking for specific organizations, although if you want to volunteer those, that's fine.

What would you say are the sectors that need to be around the table and that the government needs to be listening to as it sets up the Canada water agency in order to make sure that all of the folks who already have a hand in collecting data or actively managing fresh water in Canada are heard at the outset, and that we maximize the potential of the water agency?

Mr. Scott Higgins: I think the Canada water agency has an uphill battle because, as I said, water affects almost every sector in Canada and it's very important. This goes for many of the federal departments for which water is critical in their mandates.

The provincial governments also have responsibility. This goes right down to the watershed level and watershed groups that monitor and measure water quality or water quantity.

There's also industry and our partners in agriculture. It really goes on and on. There are a lot of individuals and organizations across Canada that this affects.

Mr. Daniel Blaikie: Is there some thinking about how to try to organize those voices in the setting up of the water agency in order to have the agency be able to accept the advice and the input of those various sectors in a good way and to be able to bring that together?

Are there models that you've seen elsewhere that you think do a good job of incorporating that kind of multisectoral feedback?

Mr. Scott Higgins: Yes, I think there are models. In the United States, for example, they have national monitoring programs that identify the risks that have come from different sectors, and that can respond to those risks.

Across Canada, as you can imagine, there are large risks related to water quantity. Between climate change, increased rainfall and flooding in parts of the country, and increased risks of droughts in other parts of the country, water quantity is going to be a critical aspect of what the Canada water agency should do. I really think its role needs to be to bring together these disparate groups in order to target issues that are of national importance. There are already many groups working on water across Canada: This work doesn't need to be duplicated, but it needs to be strengthened, and we need a national picture.

Mr. Daniel Blaikie: One of the groups that I'm most familiar with is the Red River Basin Commission, in part because my office, actually, is in a building with theirs. Clearly there's a lot of water work that crosses international boundaries with our partners in the United States. What role, if any, do you think a new Canada water agency should have in addressing those kinds of transboundary questions, and to what extent? Should its work involve that international work or should that be left to the organizations that are already doing it? What's your vision for the new water agency with respect to those international questions?

Mr. Scott Higgins: Because it's transboundary water, the International Joint Commission is involved and there is a very clear federal role here that has already been accepted.

I think the Canada water agency can play a role: This is one of those issues. Watersheds can be really big and cross provincial borders, like this does as well. Lake Winnipeg, which has massive algal blooms, receives water from Ontario, Saskatchewan, Alberta and from several U.S. states, and it's incredibly challenging. A lot of efforts have been placed on reducing phosphorus loads from point sources like sewage treatment plants, but most of the phosphorus is now coming from non-point sources in this watershed.

[*Translation*]

The Chair: Thank you very much, gentlemen.

We're going to start the second round.

Mr. Deltell, you have five minutes.

Mr. Gérard Deltell (Louis-Saint-Laurent, CPC): Thank you very much, Mr. Chair.

Good morning, colleagues.

Ladies and gentlemen, welcome to your Canadian Parliament.

I'll start with you, Mr. Bélanger. I am very pleased to meet you. Obviously, we all know you. Your organization is very well established in Quebec, as we know. You have over 20 years of service and expertise that should benefit everyone.

Can you walk us through the AuditEAU tool and expand on it? How exactly does the AuditEAU system work? What results have you achieved with this tool? Can you provide some examples of those results?

• (1615)

Mr. André Bélanger: I can give you a very simple example, that of the mayor of Louiseville, who told the media that there was something rotten going on with water treatment plants. He was yelling, saying that he couldn't develop his city because there were capacity issues.

So we used AuditEAU to take a look. The graphs, which are on a PowerBI platform, allowed us to identify an unknown source of contamination. We realized that every March, there were spikes from sewage contamination and those variations were not normal. We realized that it came from an industrial source. After speaking with the Quebec Ministry of the Environment, we were able to confirm its suspicions. This is an example of the smart use of AuditEAU data in a specific context.

We also do real-time water quality monitoring so that we can help municipalities open swimming areas. Swimming gives us access to data. It also helps us better understand rivers and makes us realize that water quality is variable, which is normal.

Mr. Gérard Deltell: Have you managed to turn the riverbanks over to citizens as a result of your follow-ups?

Mr. André Bélanger: Yes, in L'Assomption, right in the middle of the city. Some people have nicknamed it "L'A-swamp-tion." People were shunning the river because the water was brown. There is also the Châteauguay River, where we were able to demonstrate that the water quality was fine for swimming.

In all these instances, our work makes it possible to develop a recreation and tourism-based industry that is environmentally friendly. We are currently working on the Richelieu River and the North River. In the case of the Richelieu River, all of the municipalities are coming together to increase access.

Mr. Gérard Deltell: In your 20 years of experience, have you noticed any commonalities regarding the water quality of rivers? Is it mostly industrial pollution, in other words, chemical pollution? Or is it pollution resulting from how it's used, including uncontrolled use?

Mr. André Bélanger: In the summer, the biggest source of water pollution is swimming, which is a municipal responsibility, whereas in the fall and spring, it's caused primarily by the agricultural sector.

Phosphorus is the greatest river killer. We touched on that earlier. The phosphorus and nitrogen found in all Quebec rivers come largely from agricultural activities, and there are still no clear strategies to remedy the situation. Besides that, 30% of phosphorus also comes from the Great Lakes.

We have quite a challenge ahead of us to ensure that the regulations are properly enforced at the watershed level.

Mr. Gérard Deltell: We were pleased to have some scientists appear before the committee last week, folks who are conducting pilot projects on road salt treatments. A pilot project is under way in L'Assomption, so clearly, Ms. Pauzé is well served.

Over the years, have you noticed any changes in the phosphates and other products that pollute our rivers? Do you believe that the use of salt is having a direct impact on water quality in urban and suburban areas?

Mr. André Bélanger: It's clear that salt has a major impact on water quality.

As Ms. Malcolmson mentioned earlier, urban development and soil mineralization are major challenges that are not being sufficiently addressed. Protecting rivers requires land-use planning, in other words, planning that puts limits on the use of land.

We just wrote to the president of Northvolt to remind him that his company is going to mineralize an area that absorbs water, which, by extension, has a direct impact on the river, the water table and the possibility of flooding.

I think this really is the biggest Achilles heel in terms of government decision-making.

Mr. Gérard Deltell: Your presentation earlier was laid out theme by theme and seemed very Cartesian. I really appreciated it.

You talked about citizen participation. Can you tell us what that looks like? Do you have any specific examples of how citizen participation can—

The Chair: It would have to be a specific example, very briefly.

Mr. André Bélanger: There is a concept called "freedom space," which involves giving rivers back enough space to flow freely. Trying to convince people to give up their homes or cabins in order to allow rivers to flow freely is the kind of citizen engagement that will help us gain the social licence to make the necessary changes to adapt to climate change.

• (1620)

The Chair: Thank you.

[English]

Ms. Taylor Roy.

Ms. Leah Taylor Roy (Aurora—Oak Ridges—Richmond Hill, Lib.): Thank you, Mr. Chair.

I'd like to direct my questions to the executive director of Rescue Lake Simcoe Coalition.

Ms. Malcolmson, thank you for being here today and highlighting the challenges we face with Lake Simcoe and the pollution loading up on the lake.

You started by mentioning the Chippewas of Georgina Island. There are other first nations, like the Rama and Beausoleil first nations. It was not too long ago that the first nations under the Williams Treaties actually got back the rights to harvest fish.

Looking at not only the levels of pollution that exist but the new contaminants, like the PFAS and other contaminants we are finding now, it would seem that newly found right could be very difficult to exercise if the fish are in fact contaminated.

When you talked about the Department of Fisheries and Oceans, you mentioned that they weren't going to do a review unless asked to do a review on the health of fish.

I am wondering who they are waiting to be asked by. I think you have asked repeatedly for that review. Who needs to ask? Is it the province that has to ask?

Ms. Claire Malcolmson: It's under the Ministry of Transportation Ontario. They exempted themselves from doing a typical environmental assessment. It is a streamlined, self-approved environmental assessment. They're really behaving like it's already approved, and all they really need to do is to mitigate.

I'm here to assert that if we're going to save the water and the things that live in the water, like the bait fish or the fish, we have to actually investigate. This is an example. I have now reviewed all the information. There are a lot of holes.

The information we have that says that the project proponent—in this case, the Ministry of Transportation of Ontario—would request a review was from, actually, a petition. We did a formal petition to Jerry DeMarco's office. At the time, Joyce Murray was minister of DFO, and her response indicated that they were waiting to be asked.

I have never participated in an environmental assessment before, let alone a very unique, streamlined, self-approved one, so I'm not really sure what the typical process is. I just sent a letter to the project team in Ontario for the Bradford Bypass. I wanted the project team to respond to these concerns, but they're not even monitoring their email, just as an example of guardrails being gone in Ontario. Therefore, I have to wrap this all up as a package for the DFO.

I don't think it's really appropriate that the project proponent would have to ask for a review. Maybe that's a question you can answer for me too. Is it not appropriate for the DFO to request a review? That's what our letter to DFO will say: that we think, given all the evidence I'm giving you about how many holes there are in this information and that multiple layers of federal jurisdiction could be affected by this work, you should request a review.

Ms. Leah Taylor Roy: Right. Thank you.

Yes, it seems that under the jurisdiction of DFO, and in our jurisdiction, are indigenous rights, although we're transferring that and hopefully they will have more rights to directly ask the Government of Ontario about what's happening.

With the Ministry of Transportation, the Government of Ontario basically exempted the entire project from an environmental assessment. Then the Ministry of Transportation is saying they're not going to request any kind of review from DFO, as well.

Ms. Claire Malcolmson: AECOM, the consultant team working for the MTO, have been hired by the MTO to write these reports. The way they word it is that they will determine if they think a-

view is needed, and then they will ask for it. I'm just here to sound an alarm. This is not appropriate.

Ms. Leah Taylor Roy: Yes. This sounds like perhaps something the Canada water agency can do in terms of having the federal and provincial levels collaborate.

I was reflecting on what you were saying about the phosphorus levels. The phosphorus levels have gone down over time, but they haven't gone down enough. They're going to increase, obviously, with more development. It seems a little bit like medication in that, rather than addressing the underlying cause, you try to treat the symptom, only to see that there are side effects and that, in fact, the problem is going to persist.

Therefore, I think this issue of how the federal government can work with provincial governments is very important. Thank you for bringing that up.

• (1625)

[Translation]

The Chair: Thank you.

Ms. Pauzé, go ahead for two and a half minutes.

Ms. Monique Pauzé: Thank you, Mr. Chair.

Mr. Higgins, I'd like to remind you that I would very much appreciate having access to the study on oil spills. The page doesn't exist at the moment. I will have a question for you in a moment about DataStream.

Mr. Bélanger, I have one last question for you. Could you explain how you liaise with the other stakeholders involved in water management in Quebec?

Mr. André Bélanger: We are fortunate in that we're not institutionalized. We do a lot of work with watershed organizations. In a way, we're the bad cop and they're the good cop. We work closely together on certain issues.

We publicly denounce some situations knowing full well that consultations can then take place with the stakeholders involved, so we see ourselves as a catalyst, so to speak. I like to say that we're the acupuncturists who ensure that everything keeps flowing.

Ms. Monique Pauzé: Thank you very much.

Back home, we have an organization called the Comité de valorisation de la rivière L'Assomption, which you've probably worked with before. Yes, swimming is allowed in the river.

Mr. Higgins, you mentioned the DataStream tool. Could you tell us how you are associated with that tool and what information your institute provides to DataStream, which looks quite promising? A representative from DataStream will actually be appearing before our committee in the second panel of witnesses.

[English]

Mr. Scott Higgins: My organization has its own open database as well. We freely share our data with anyone and everyone. We've collected that data for over 50 years.

We're also in the watershed of Lake Winnipeg. We share our flow data and the water chemistry data from our monitoring program. We share that routinely now to the data stream portal.

[Translation]

Ms. Monique Pauzé: My last question is for either Mr. Bélanger or Mr. Higgins and has to do with the Canada Water Agency.

The two organizations you represent have given different mandates to the Canada Water Agency. That's what we've been seeing with every panel of witnesses. We don't know anything at the moment, and there's no direction.

Can you comment on that?

I'll ask Mr. Bélanger to answer my question first.

The Chair: Mr. Bélanger, your answer will have to be very brief.

Mr. André Bélanger: Obviously, the mandate has to be... There's no better uniting force than data. We need to be able to conduct thorough studies and look at the international scene as well as the rest of Canada.

The Chair: That's perfect.

Thank you.

[English]

Mr. Blaikie.

Mr. Daniel Blaikie: Mr. Higgins, I wanted to circle back to you.

When it comes to community-led data collection of fresh water, the program I am most familiar with is the Lake Winnipeg Community-Based Monitoring Network. I'm wondering if you think we have an adequate number of those kinds of programs across the country, or if you think that one of the roles of the new Canada water agency would be to try to foster more of that activity and to enhance it where it already exists.

Finally—and then I'll hand it over to you—I am curious. My colleague Laurel Collins has talked a lot about the idea of having a youth climate corps to guarantee employment for young folks and to help combat the climate crisis. Do you think these kinds of community-led exercises in data gathering could benefit from something like a youth climate corps?

Mr. Scott Higgins: That's a great question.

There are a lot of community-based organizations and citizen science groups in Canada. An example might be the lake partner program in Ontario, in which citizens have been going out and measuring water quality in their lakes for decades now. This said, there are real gaps across the country, and organizations like this need to be supported. They're very efficient at what they do in terms of cost efficiency and their ability to reach a wide number of lakes. It's just a really good way to do it.

I'll say that one of my first jobs out of high school was with an environmental youth corps in Ontario, and it was a great experience. I think it's great to provide training to young people, but at the same time, I absolutely agree with you that these youth can be harnessed to help collect this sort of monitoring data.

• (1630)

Mr. Daniel Blaikie: Thank you very much.

The Chair: Mr. Mazier.

Mr. Dan Mazier: Thank you, Chair.

Thank you to the witnesses for coming out here today.

Mr. Higgins, we've heard about the devastating impact that raw sewage dumping has on Canadian waterways. IISD released information on how untreated sewage contributes to harmful algal blooms. Can you discuss the harmful impact that sewage in water has and share recommendations on how to address this issue?

Mr. Scott Higgins: We've been doing work on algal blooms at the Experimental Lakes Area for over 50 years. It started back when it was a federal institution. That's why the Experimental Lakes Area was actually started: to deal with the algal bloom issues in the Laurentian Great Lakes. They're very pervasive now. This is one of the biggest and the most ubiquitous issues around the world for fresh water.

Our position is that phosphorous is really the key element that we need to target. It comes from more than one source: point sources and non-point sources, and treated and untreated. It depends on where you are, which is most important. When we encounter a problem—let's say it's Lake Winnipeg or elsewhere—we say, first, let's target and find out exactly where this phosphorous is coming from, so that we can efficiently and effectively deal with the problem.

In the Lake Winnipeg watershed, for example, only 6% to 9% of the phosphorous is coming from waste-water treatment plants in Winnipeg. The vast majority is coming from non-point sources. In those circumstances, we say, “Focus the effort here on non-point sources because we need to deal with that problem.” In other areas, it's raw sewage or treated sewage.

Mr. Dan Mazier: I'll follow up on that.

Can you table or forward to the committee what studies have been done? Where are we as far as dumping raw sewage, even outside Manitoba and across Canada?

It says on your website that, “Winnipeg's North End Water Pollution Control Centre is the single largest point source of phosphorus flowing into Lake Winnipeg and the fourth largest phosphorus polluter among all wastewater treatment facilities in Canada.”

I don't quite understand why you're going after all the rest of the Assiniboine River basin and the Red River basin on non-point sources when you have one big nest of pollution sitting right there that could be addressed very succinctly.

Mr. Scott Higgins: I absolutely agree with you that we need to target the point sources. In fact, the City of Winnipeg's waste-water treatment plants have not been meeting their phosphorous discharge targets for a very long time and they need to. That absolutely needs to be addressed.

I guess what I'm arguing is that if we address those, it's still not going to be enough because 60% to 70% of the phosphorous that flows into Lake Winnipeg comes from non-point sources. If we want to address the problem, we also need to deal with those issues.

I totally agree that we need to deal with the point sources.

Mr. Dan Mazier: I've been a lifelong farmer, living out on the landscape. I farm out by the Brandon area, upstream of Winnipeg.

You're talking about two prairie provinces, the Red River basin and into the United States. I do honestly think that it is a place where we can really focus and get some wins and then start going forward on that, instead of blaming agriculture for doing what it does.

Do you have any recommendations on effluent regulations? Where do you think we should go with this?

If we're going to tackle those effluent regulations, is there a way? Should we maybe focus more on the cities? What should we do?

Mr. Scott Higgins: I think that we need to deal with waste-water treatment plants that discharge into receiving waters, especially where there are issues, like Winnipeg and algal bloom issues. Places that we would want to deal with the fastest would be the target.

There's discussion at the policy level, depending on where you are in the country or in the United States, on whether we treat nitrogen or not to deal with this eutrophication or algal bloom issue. Our position is that it's very costly to deal with nitrogen and we are unconvinced that it would actually solve the problem.

Our position is that we really need to focus our resources on dealing with phosphorous from waste water and other sources.

● (1635)

The Chair: Thank you.

Mr. Ali, you have five minutes.

Mr. Shafqat Ali (Brampton Centre, Lib.): Thank you, Chair.

Thank you to all the witnesses for being here today and sharing your knowledge and experience with us.

During its meetings in early February, the committee heard concerns from several witnesses about a couple of human resources shortages.

One witness said that hydrogeology graduate programs had trouble finding Canadian graduate students to take advantage of the available research funding opportunities. Several other witnesses

informed the committee that there are not enough certified water technicians to meet residential consumer demand.

I have two questions arising from that testimony.

What could the federal government be doing differently to attract Canadians to freshwater fields of study and to keep specialists, both Canadian and international, in Canada?

Are Canadian federal freshwater research facilities and funding opportunities sufficient to retain academics and to attract high-calibre graduate students?

I will start with Mr. Higgins, please.

Mr. Scott Higgins: That's a really good question about what we would typically refer to as highly qualified personnel and their training.

I'll say very personally from the Experimental Lakes Area example that, in addition to the research and monitoring that we do, we have a large number of undergraduate and graduate students and even high school students now who come to our facility. We offer them employment for the summer, but through that employment, they gain a lot of expertise. They go on to other jobs in government, consultancies or industry.

We have benefited greatly from a number of federal funding programs that help organizations hire students, specifically in environmental fields. I think that can be a real benefit.

Another thing that we have found very helpful is that a number of universities have co-operative education programs where students not only can do their academic training but also can receive on-the-ground training within industry or partners like ourselves in the water sector. This really benefits them because when they finish their undergraduate degrees, they have experience in the sector and can more easily find jobs in the sector.

Mr. Shafqat Ali: Thank you.

Ms. Malcolmson, do you want to add something to that?

Ms. Claire Malcolmson: Sure. I'm not a science...a water-researcher person, so I don't have a whole lot to add to this.

I'm trying to find some people who will provide a second opinion about the impacts of the Bradford Bypass on water. I'll keep talking about that. It's really challenging because people don't want to speak out against the government.

I come back to this: Either the Government of Canada or the Government of Ontario really need to use the tools that they have. The affordability crisis in Canada is pretty huge. Not a lot of people can risk their future by sticking their neck out to protect a water body. The kind of thing that I do is really rare. There aren't a lot of folks who are taking this kind of risk. So, yes, please support the scientists, but also please do the work so that you don't ask people to put their careers at risk by providing a second opinion about controversial information.

• (1640)

Mr. Shafqat Ali: Thank you.

Dr. Higgins, it's been nine years since the International Institute for Sustainable Development took the management of the Experimental Lakes Area. There is some work being done there on the impact of climate change on the lakes. Could you please elaborate on that aspect of the research being done?

The Chair: Unfortunately, we are out of time.

Would you be able to send a short note about this to the committee? Then we'll be able to incorporate it in our evidence.

Mr. Scott Higgins: Yes.

The Chair: It was a very interesting discussion, and you opened up some new perspectives that I think we hadn't really seen so far in the study.

Thank you to all the witnesses.

We're going to break for about five minutes to onboard the witnesses for the second panel.

• (1640)

(Pause)

• (1645)

The Chair: Good afternoon to our second panel.

In the interests of time, I won't read all the names out now. I'll read them as the witnesses come up for their five-minute remarks.

We'll start with DataStream. Aislin Livingstone, program manager, is here in person.

Ms. Livingstone, go ahead. You have five minutes.

Ms. Aislin Livingstone (Program Manager, DataStream): Thank you to the committee for inviting us. My name is Aislin Livingstone, and I'm honoured to be here today representing DataStream in my capacity as water program manager.

The focus of our testimony today is data. Canada-wide, we have a major problem around access to water data. This is affecting our ability to make evidence-based decisions. At DataStream, we've come to know this challenge intimately through our own work in trying to track down water data across the country.

DataStream is a charity dedicated to advancing freshwater protection through open data and the inclusion of public voices in decision-making. We've been working in this area for about 10 years. In that time, DataStream has dramatically improved the availability of water-quality data in Canada. We have done this through our comprehensive programming, which includes an online data-sharing

platform. Over 260 organizations are using DataStream to share almost 40 million data points collected at monitoring locations from coast to coast to coast. We work with community groups, governments, indigenous nations and academics who are sharing data so that it can be put to use for freshwater protection. It's great to see that three monitoring organizations that we have collaborated closely with are also appearing as witnesses today.

While we've made major progress, there is still significant work ahead. Much of this needs to be led by government agencies. The recommendations I am sharing today focus on three areas where we can make progress in addressing Canada's data access issue. These are working with community-based groups, making data openly accessible and improving coordination. These recommendations draw on our 10 years of experience working to improve access to data in Canada.

I'll start with community. Communities are an essential part of Canada's ability to adapt to freshwater issues and climate change. DataStream works with more than 150 community organizations, indigenous and non-indigenous, that are out on their waters, monitoring and responding to environmental changes as they happen.

In Atlantic Canada, where I live, we work with more than 70 watershed groups that are tackling such issues as endangered salmon habitat, pesticides from agricultural runoff, and contamination from gold mining, among many others. There's also an incredible example right here in Ottawa. Over the last 20 years, Ottawa Riverkeeper, whom you'll hear from later, has made major headway in applying the data they collect to finding solutions to issues that range from road salts to sewage overflows.

To realize the full potential of these on-the-ground initiatives and ensure that communities are meaningfully engaged in water decisions, a unified federal approach to community-based monitoring is needed, including resources, investment and cross-sector partnership building. We recommend that the federal government use data collected by communities for informed decision-making, including climate change adaptation, and provide long-term funding support for community-led monitoring and restoration.

I'll move on to open data. Water data needs to be open by default so that policies and decisions are based on the best available evidence. Progress has been made to improve access to federally collected data, but more work is needed. From 2019 to 2020 alone, the Government of Canada invested over \$73 million in water-related research. However, the data from this kind of research isn't always shared publicly. Ensuring that this data is openly accessible would maximize these investments by facilitating broader data reuse.

To share another example, despite extensive water monitoring and research, in the 2020 global data drive sustainable development goal 6.3.2—it tracks the health of ambient water quality—Canada reported on the status of rivers but has not reported on groundwater or open water bodies, such as lakes and reservoirs.

We know that a freshwater data strategy is being developed by the Canada water agency, and we're optimistic that it will achieve an integrated, coordinated and standardized approach to freshwater data. This should include both surface water and groundwater. To achieve this, we recommend that the federal government fully implement existing open data policies so that all data collected using public funds are also publicly available; harmonize data across departments, programs and jurisdictions by adopting universal data standards; and invest in sustainable, scalable data systems so that Canada's freshwater data strategy is built to last.

Finally, I'll go to coordination. We consistently hear that it's really hard to figure out who's doing what when it comes to water in Canada. For example, over 20 federal departments have responsibilities related to water. While there's a reason for this complexity—water is involved in everything, from human health to industry—the monitoring groups we work with want to help find solutions, but they're not always sure who to talk to. In our work, we have seen that water data is managed totally differently from one jurisdiction to the next. Better co-operation will allow communities and governments to invest more efficiently in monitoring and respond more quickly to freshwater issues. Ultimately, this will build trust in the institutions that are responsible for water.

Now is a great time to improve transparency and coordination of surface water and groundwater activities in Canada. We recommend that the Canada water agency provide a water concierge service to actively connect people to the appropriate decision-making bodies, both indigenous and non-indigenous.

In closing, thank you again to this committee for the opportunity to share our views with you for your study of fresh water in Canada.

• (1650)

The Chair: Thank you very much.

We'll go to Living Lakes Canada. We have Kat Hartwig, Georgia Peck and Paige Thurston all on video conference.

Ms. Hartwig, please go ahead with your introductory remarks.

Ms. Kat Hartwig (Executive Director, Living Lakes Canada): Thank you for the opportunity to speak to you today.

My name is Kat Hartwig. I'm the executive director and co-founder of Living Lakes Canada.

I've worked in the NGO environmental sector for 33 years, with the last 20 focused on freshwater stewardship. I live in Brisco, B.C., which is the traditional territory of the Ktunaxa and Secwepemc nations.

Living Lakes Canada programs include education, research, monitoring, data collection, restoration and policy development for the long-term protection of lakes, rivers, wetlands, aquifers and watersheds in Canada. We work to help people address the impacts of climate change on water quality and quantity and biodiversity in their respective communities.

Joining us today are my colleagues Paige Thurston, manager of our Columbia Basin hydrometric and groundwater program, and Georgia Peck, manager of all of our lakes monitoring programs across Canada. They are here to help answer your questions.

We will provide you with three recommendations for your study on fresh water based on our experience from the last two decades working in freshwater research, monitoring and data.

Our work originates in the Canadian Columbia Basin, which lies between two mountain ranges, the Rockies and the Purcells. This area is considered to be the water towers for our food-growing belts in southeastern B.C., the prairie provinces and parts of the U.S. We are currently experiencing extreme drought conditions from last year with no expected relief and likely worsening conditions this year. The cycle of drought, forest fires and flooding has become our new norm.

Recommendations for the study on fresh water are as follows.

Recommendation one is to include the Canadian Columbia Basin, a watershed of national significance, in the freshwater action plan, with designated funding via the Canada water agency, or other funding mechanisms, that will support the monitoring and data collection needed to inform water allocation and community adaptation options.

Recommendation two is that any coordinated water and climate monitoring networks being implemented in other river basins be built upon existing successful regional efforts, such as the Columbia Basin water monitoring framework and open source data hub or other templates. It is more cost-effective and faster to replicate best practices of successful and tested methodologies from one region to another.

Recommendation three is to advance indigenous knowledge and data sovereignty through water stewardship. Supporting indigenous initiatives for water stewardship then, de facto, land stewardship provides us all the opportunity to learn how applied reconciliation can help us shift into new paradigms that provide action and care for many generations to come.

In closing, I'm going to reiterate what you already know. The Canadian Climate Institute issued a report in 2022 stating that by 2025, over 90% of climate impacts and disasters will involve water and will slow down Canada's economic growth by \$25 billion annually.

We commend the efforts for this study on fresh water. We also urge you to rapidly accelerate non-partisan efforts towards water and food security for both indigenous and non-indigenous people living in our amazing country. In doing so, you have the opportunity to become international leaders in freshwater stewardship.

Thank you for your efforts in these very challenging times.

• (1655)

The Chair: Thank you very much.

We'll go to the Manitoba Forage and Grassland Association. We have Duncan Morrison, executive director, and Steven Frey, director of research.

Go ahead please.

Mr. Duncan Morrison (Executive Director, Manitoba Forage and Grassland Association): Good afternoon, Mr. Chair. Thank you for inviting us to be here. We are extremely grateful.

As a farmer-led non-profit organization with more than 30 years of history, Manitoba Forage and Grassland Association is extremely sensitive to the needs of those farmers who rely on the land for their livelihood.

MFGA staunchly believes that many farmers are doing outstanding work on their farms right now from a soil health, water and healthy ecosystem perspective, and by working with Aquanty, we hope to support that.

Our MFGA rationale is simply vitally important. When you don't have water, you have problems on your farm, and that's every single farm. The flow of water is the key to understanding agricultural prosperity and the incredible potential that farms and farmers can contribute to society.

We'd really appreciate your support.

I will turn it over to Steven Frey.

Dr. Steven Frey (Director of Research, Aquanty, As an Individual): Good afternoon, Mr. Chair and other members of the committee.

Thank you for the privilege of participating here today. Land management in our agricultural regions governs hydrologic response to extreme weather and will play a critical role in ensuring Canadian agriculture and ecosystem sustainability under a changing climate.

Beneficial management practices that incorporate wetlands, grasslands, cover crops, minimum tillage and controlled drainage all promote surface water and groundwater availability, improve water quality and resiliency to flood, drought and disease stress.

As climate change continues to impact surface water, groundwater is becoming increasingly important to agriculture and ecosystem productivity, yet initiatives currently proposed to address water resources in Canada ignore groundwater.

To underscore the importance of groundwater, in many rural areas and first nation lands it is often the sole source of water for both people and livestock.

In the face of increasing hydrologic uncertainty, tools that extend traditional weather forecasts into water resource forecasts will become critical. Hydrologic forecasting is already commonplace in the water resources management community, however the most common forecasting tools focus on river flow and overlook the dynamic link between groundwater and surface water. Without groundwater, we are not well suited to look at agricultural drought end points.

An example of an agriculture-focused, hydrologic prediction system that does include groundwater exists in southern Manitoba, where the Manitoba Forage and Grassland Association water forecast portal now generates field-scale weekly and monthly forward-looking hydrologic projections.

It is equally important to enhance our ability to project hydrologic conditions farther out into the future and over much larger areas. This is the objective of the relatively new Canada1Water initiative. Canada1Water is a collaborative government interdepartmental, industry and academic-driven project led by the Geological Survey of Canada and Aquanty and has developed, for the first time ever, a national scale hydrologic modelling framework with open data to project climate change impacts on the surface water and groundwater inventory over the entirety of Canada.

Even though a better understanding of short-term and long-term impacts to water resources is vital to Canada's economic and societal sustainability, projects like those mentioned are challenging to launch and perhaps even more challenging to sustain.

The MFGA water portal was funded by a now discontinued agricultural risk management program and current funding for these tools is difficult to obtain.

Canada1Water was launched with a considerable investment in time and expertise from the Geological Survey of Canada's ground-water geoscience program and \$1 million in funding over three years from the Canadian safety and security program, a source of seed money but not sustained funding.

Here we're not talking about the need for tens of millions of dollars per year, but rather budgets on the order of a few million dollars per year and a commitment of government lab resources to help deliver world-class hydrologic insights that meet the needs of a broad range of stakeholders.

In closing, if I could make three recommendations for the committee to consider they would be to, one, support the development of programs that provide economic return to producers who adopt land management practices that promote hydrologic resiliency; two, recognize that decision support tools focused on water resources will become increasingly important to our agricultural community, and Canadian technology is leading the way both in Canada and around the world; and three, look into the Canada1Water project and help it find sustained funding to support this valuable initiative.

Thank you.

• (1700)

[Translation]

The Chair: Thank you very much.

We'll now go to Larissa Holman, from Ottawa Riverkeeper.

[English]

Ms. Larissa Holman (Director, Science and Policy, Ottawa Riverkeeper): Thank you, Mr. Chair and members of the committee.

Thank you for embarking on a comprehensive study of the role of the federal government in protecting and managing Canada's freshwater resources.

In your collective role as the Standing Committee on Environment and Sustainable Development, you have an opportunity to weigh the various responsibilities for freshwater protection and management throughout Canada.

[Translation]

In my role at Ottawa Riverkeeper, I have seen the challenges and benefits of working across jurisdictions at a watershed scale.

[English]

I am eager to share some of these experiences with you today, here on the unceded unsundered Anishinabe Algonquin territory.

Ottawa Riverkeeper is a charitable organization founded in 2001 and we are a champion for swimmable, drinkable, fishable waters throughout the Ottawa River watershed. Our mission is to protect, promote and improve the ecological health of the largest tributary of the St. Lawrence River, the formidable Ottawa River and its tributaries.

[Translation]

Over 23 years, Ottawa Riverkeeper has grown to become a trusted, independent voice for the protection of freshwater within the Ottawa River watershed.

[English]

We are a fully bilingual organization, and we use science-based decision-making to inform how and what we advocate for to protect the ecological health of the river, a river upon which so many of us depend.

Chances are that you are drinking tap water sourced from the Ottawa River today, yet the health of this river is threatened. As we have been told, pollution has no boundaries. Ottawa Riverkeeper has championed a multitude of issues afflicting our water, from microplastic to radioactive waste, from forever chemicals to sewer overflows and from invasive species to endangered species. We Canadians are polluting our waterways. You have an opportunity to fix this.

For Ottawa Riverkeeper, these examples highlight the importance of data collection throughout the watershed, and the data should be shared and analyzed on a watershed scale regardless of which province it is obtained from.

Ottawa Riverkeeper will soon be releasing its first watershed report card that benefited from a number of community-based monitoring programs and community scientists to help fill existing data gaps. We also analyzed publicly available data across the watershed. This report card provides a comprehensive look at the threats to the watershed on a watershed scale.

We look forward to Canada water agency's taking on an important leadership role in Canada to proactively address national and regional transboundary freshwater challenges and opportunities.

As we are fond of saying, you cannot protect half a river.

We would also like to highlight the value that watershed organizations like Ottawa Riverkeeper and those presenting here today can have when trying to address these challenges. Not only do many watershed organizations have a deep understanding of the issues affecting their regions, they often have networks that can provide localized data using a variety of cost-effective techniques. However, to remain effective, watershed organizations require long-term, consistent funding to operate.

Ottawa Riverkeeper has also submitted comments on a number of pollution issues, including reviewing the scope of the risk management for perfluoroalkyl and polyfluoroalkyl substances, PFAS, and for the development of a non-fuel radioactive waste management and decommissioning policy.

We look to you, members of this committee, to ensure that fresh water will be considered in a more holistic way throughout the development of national policies, not just as an afterthought once these policies have already been drafted.

The protection required for fresh water needs to be front and centre of national policies as well as global agreements.

Thank you for your time and your interest.

• (1705)

The Chair: That was terrific; thank you.

We'll go to Mr. Mazier for six minutes.

Mr. Dan Mazier: Thank you, Chair.

Thank you to the witnesses for coming out here today.

Mr. Morrison, I'll start with you.

How do we ensure that the water policy is developed from the ground up with farmers and landowners and not from the top down by Ottawa?

Mr. Duncan Morrison: That's a really good question. It's certainly one that we're constantly dealing with with our farmers. One thing that we do need is data. We need on-farm research. We need a little bit more support to show the great work that farmers are doing and to build up that graph type of knowledge around some of the land use and some of the practices that are being used. Then, we need to feed them into a model like the Aquanty model, which is absolutely powerful.

Mr. Dan Mazier: That's great, and it's a nice segue to Mr. Frey.

On your model, Aquanty, I was fortunate enough to be involved with you back in 2011. We discovered in Manitoba that we had no data. The flood of 2011 did a lot of damage. Thankfully, we were still talking about getting data and getting things revved up in 2014 when another flood hit.

Having said all that, I was very impressed with how far Aquanty has come, and I understand that now Manitoba Forage and Grassland has taken that over as well.

Mr. Frey, I wonder if you can describe how Aquanty works. How does your model work, and why is it so different from anything else that's been proposed in Canada?

Dr. Steven Frey: When we model the hydrologic system, we start in the groundwater system and work our way up. Our approach is to look at groundwater and surface water in a holistic manner, fully coupled.

Across Canada, groundwater makes up anywhere from 30% to 100% of the water that you see in rivers. A lot of the research effort and modelling efforts have thus far focused only on surface water. It's the water we see. But in times of drought, the water that flows in the rivers is groundwater that's discharging and that supports ecosystems. It supports waste-water assimilation. It supports irrigation demands. It supports municipal drinking water supplies.

So we start from the bottom up, look at the aquifers, look at the aquitards, the groundwater flow systems, and then we layer the land surface on top. That takes tremendous amounts of data. We have to characterize the subsurface digitally, and those data sets are not readily available. It's one of the big missing links in Canada. How do we characterize the subsurface so that we can incorporate it into models? We work very closely with the Geological Survey of Canada. They are one of the few federal organizations actually

looking at the groundwater system. I think it fits into what they do in terms of skill sets and expertise, because when we're talking groundwater, we're talking hydrogeology. That's the world of earth system science. It ties into mineral exploration, geophysics and remote sensing.

A lot of the elements for building our models take data sets constructed by federal departments, including Geological Survey of Canada, Ag Canada, Canadian Space Agency and Environment Canada. We just consume data from all these different agencies, not from a single source but from wherever we can source it.

Mr. Dan Mazier: You mentioned the groundwater, and I agree with you totally. We often focus on the flooded basement or the houses under water, but in terms of groundwater, you have to consider at least the other half of what's going on with the water.

On the data collection, right now ECCC is really looking at this water agency—everything all water, right? Do you think that's the best approach? Is there something else we can do here to maybe have a second ask or a second look at how we coordinate all this data or at what agencies out there right now would be almost better suited or at least consulted before we make a water plan in Canada?

• (1710)

Dr. Steven Frey: That's a good question. Critically, groundwater has to be considered. I haven't seen a lot of groundwater language within the mandate of the Canadian water agency. That may be a limiting factor. I would recommend that groundwater takes a role in the front seat of that conversation.

It will be impossible to duplicate the expertise within all the different government agencies that steward the data that goes into characterizing Canada's water resources and the physical system with which water flows. I think all the government agencies that deal with these data sets need to have a seat at the table, and their expertise can't be pulled out of that agency and rejuvenated in a new agency. I think all those different federal departments do have to work together.

It's not just one or two. It goes all the way from the Canadian Space Agency to deep into the groundwater flow system at the Geological Survey of Canada.

Mr. Dan Mazier: Basically, use the resources we already have, but make sure they're coordinated more than anything.

Dr. Steven Frey: Absolutely. Don't try to duplicate them.

Mr. Dan Mazier: Okay.

I'm wondering about the United States. They have a national water model. Is there anything Canada could learn from the United States on their modelling and maybe something that could go into this study in terms of their framework? How does it work in the United States as compared with Canada?

Dr. Steven Frey: The national water model is a federal initiative in the U.S., but to a certain extent it's actually a private-public partnership. A lot of the technology is being executed by entities in the private sector. Lynker technologies, for instance, has a large role to play within the U.S. national water model. I think they do that for efficiency and potentially cost savings.

The Chair: Thank you.

Madam Chatel, go ahead, please.

[*Translation*]

Mrs. Sophie Chatel (Pontiac, Lib.): Thank you very much, Mr. Chair.

I have questions for Ms. Holman as well as Mr. Frey.

I'll start with Ms. Holman.

First of all, thank you for being here. Ottawa Riverkeeper is absolutely essential to protecting the Ottawa River. You truly are the voice of our communities, so thank you for the great work you've been doing since 2001.

I'm going to move on to a more difficult subject right away, if I may. We've talked a lot about Chalk River in the course of this committee's deliberations. I'm sure Ms. Pauzé saw this coming.

One of the things we don't hear enough about, and something that concerns me, is the radioactive waste that's already there. I was discussing this myself with Ms. Pauzé. Any attempt to put off managing this waste indefinitely really scares me.

We have a solution, which is outlined clearly in your report. The waste is there. It's part of the environmental legacy. The proposal involves burying it safely. The proposed site at Chalk River will contain 90% of the waste that already exists.

However, you have recommendations for improving the project and making it even safer. Could you comment on that?

Ms. Larissa Holman: Certainly.

It's a pretty complicated subject, so I'll do my best to answer in French, but I may have to switch to English, if that's easier for me.

Most of Chalk River's current waste is real estate, in other words, buildings that need to be rebuilt. A lot of the structures there will have to be rebuilt. These buildings need to be knocked down and replaced. The soil, the sand and the walls of the old buildings make up the bulk of the waste, but there is other waste as well. A lot of it comes from operations outside of Chalk River.

What matters most to us is really the oversight. What will happen, and will the waste be properly recovered when it's removed from the site?

• (1715)

[*English*]

One big concern is how the waste is going to be identified and placed into the near-surface disposal facility and how the waste-water treatment plant is going to be able to properly oversee and treat the leachate that comes off that piece.

One recommendation we had made was to have an additional treatment for the waste water. Chalk River had tested it, but they haven't seen the waste in action, so they've gone with a system that is considered adequate, but it's not necessarily able to treat the waste in an efficient and effective way, should the waste not meet their projections.

We really ask for them to move up to a more secure level of treatment so that any of the waste water that will be placed into Perch Lake and drain into the Ottawa River doesn't reach the threshold.

We also ask for the thresholds to be more conservative and to take into consideration that this is an aquatic environment and it is also the drinking water source for Ottawa, Gatineau and, in many ways, Montreal. The Ottawa River is a major source of water for Montreal. We wanted those thresholds to be a little lower. We also ask that monitoring be done in a more proactive and robust way.

There's a lot of data available about radioactive waste at Chalk River. Unfortunately, it is only available in the environmental reports or through the independent monitoring project that the Canadian Nuclear Safety Commission, CNSC, puts out. That data is not very robust. It doesn't capture what is happening.

Some good news here is that the City of Ottawa—the municipality—tests the water weekly for radioactive waste. That's where we get some of our best data about the radioactive materials that might pop up in the Ottawa River throughout the years.

[*Translation*]

Mrs. Sophie Chatel: Thank you for that clarification. I also want to thank you for the extraordinary and very scientific work you have done on this file.

Mr. Frey, there's a lot of talk about agriculture. In my riding, farmers are very aware of climate change and are working hard to fight it. We've talked about cover crops, a practice used in my region. However, a lot of people are worried about the water table and the need for water. We are well aware of what is happening in the United States. There is less and less water in the southwestern part of the U.S.

We talked about the powers of the Canada Water Agency. You mentioned a partnership. I myself am imagining a partnership with farmers, for example—

The Chair: Ms. Chatel, you're over your six minutes. We won't have time for an answer.

Mrs. Sophie Chatel: In that case, I'd like a written answer.

The Chair: We won't have an answer right now. That said, the answer to your question could be part of the answer to another question asked by another committee member.

Ms. Pauzé, go ahead.

Ms. Monique Pauzé: Thank you to all the witnesses for participating in our study.

Ms. Holman, your organization supports the Algonquin Anishinabe communities. They're saying that they were not adequately consulted about the Chalk River site. In fact, they will be protesting on the Hill tomorrow. You wanted assurances and so on.

I'd like to come back to the comments made by the mayor of Lachine, who was here last week. She is responsible for water and is the spokesperson for the metropolitan community. According to her, once it has been established that radioactivity is present, nothing can be done to mitigate or eliminate it. I was thinking about that when you mentioned the water treatment plants. The Assembly of First Nations and 140 municipalities have spoken out against the project.

Do you have a clear message for us about the risks this project poses to the Ottawa River and any possible health risks? Would you like to see some kind of leadership from the government?

• (1720)

Ms. Larissa Holman: Thank you so much for your question.

I would also like to thank you for recognizing the Algonquin Anishinabe communities on our land. The Ottawa River watershed covers nearly all Algonquin territory. The voices of the Algonquin people are very important. They say they were not adequately consulted. I think we must listen to them, since they are telling us about their experience loud and clear.

I am aware that is not exactly what the Canadian Nuclear Safety Commission said. In fact, in its decision, the commission said that it had consulted the Algonquin nation, but this does not align with the experience of the Kebaowek community, the Kitigan Zibi community or other communities.

It's not my job to make sure the project succeeds. That's the developer's job. What I can tell you is that you have to look at the rules and make sure they will protect the waters.

People keep saying that those involved must rely on the precautionary principle, but that is certainly not what was done in this project.

Ms. Monique Pauzé: Thank you.

Federal leadership could well be based on the precautionary principle, which is currently not the case.

[English]

Ms. Larissa Holman: For some of the rules and some of the regulations, it's there.

[Translation]

However, that's not used as it should.

Ms. Monique Pauzé: The International Atomic Energy Agency also says that the site must not be built near a source of drinking water. So, we're not there.

I will now address Ms. Livingstone.

Considering how long we've been talking about the Canadian Water Agency, maybe we will end up giving it a mandate. You can tell me whether this is possible for your organization, which I find very promising.

Would you be able to come up with a structured plan that would bring together all the available data?

We hear from a large number of witnesses, who provide us with a lot of data. This information comes from federal agencies, universities, academic chairs, non-profit organizations, and some provinces and territories.

The data should now be categorized, for example by watersheds, groundwater, aquifers, substances detected and contaminants. The Canada Water Agency could make the call to bring all this together.

Would your organization have the technical capacity to create a supertool that would be able to categorize the data?

[English]

Ms. Aislin Livingstone: That's a big job.

Inventorying the water data that is either collected by the federal government or commissioned by the federal government to be collected was one of our recommendations for an action that the Canada water agency could undertake in the earlier stages of its development.

Could our organization do this? We would need a lot more resources and a lot more staff. On a smaller scale, we do this to a certain extent when we're building out our open data platform hubs in different regions in Canada. We look at the landscape. We look at who's collecting data—specifically water quality data, I should say—how it's formatted, the level of accessibility that it already has, and what level of effort would be required to format it in a standard way and share it on our open data platforms.

Our recommendation would be to scale this up to a much larger extent at the federal level, looking at all levels of government and jurisdictions, as you said.

We could certainly provide some insight into how we've done this from our experience. In terms of whether we could take this on ourselves, I would say that's a separate conversation.

• (1725)

[Translation]

The Chair: Thank you.

We will now go to Mr. Blaikie, for six minutes.

[English]

Mr. Daniel Blaikie: I think one reason why it's of interest to folks around this table is that when we think of the federal government and of big IT projects, we tend to think of the Phoenix pay system, the ArriveCAN app and other things that really haven't worked very well.

Seeing that there's already success and there are models out there already that are working is an inspiration. It's one reason why some of us might be more interested in seeing organizations like yours get the resources they need to scale up instead of asking a new federal agency to start from scratch on a new system, with all the financial hazards, among other things, that this represents.

My question is along a similar line.

How do you imagine the relationship between your organization, data collection, and presenting organizations like yours across the country with the new water agency? What kind of relationship do you think would be the best kind, from the point of view of getting that kind of product where people can access that information at their fingertips in a more comprehensive way and also in terms of governance?

What is important to your organization to maintain in terms of its own self-governance, versus a more integrated approach with whatever the new authority might be?

Could you just give us a sense of what you think is important for policy-makers to bear in mind in that process?

Ms. Aislin Livingstone: Sure. You pointed out some really important elements.

One is the importance of having really strong enabling policies behind the systems before they're developed. Look at who's collecting the data and how, what format it's already stored in, what systems it's already shared on and how those systems could potentially work with each other.

As you said, look at what would be required to scale up these systems that already work, including grading data based on whether it's accessible at all versus already openly accessible and then understanding where to prioritize efforts.

Another thing, which is something we've seen in our own work, is that as we work in different regions across Canada, people are sharing their data in very different ways across jurisdictions. Understanding the contextual nuance and being able to provide supports that are more place-based, depending on how people are sharing their data, whether that's in the Columbia Basin, Atlantic Canada or in Quebec would be important.

One final thing I would say is about looking at using different types of data standards, so that people who want to go and use that data.... It's not just a place for people to put the data they're collecting, but it's that it can be activated and used in things like modelling.

We've heard from Aquanty before. There are other people who really want to harness the data and make sense of it for watershed reporting and that type of thing, so make it as easy as possible for people who want to make the most of the information that's being

collected and make the most of the investments that have been put into the monitoring in the first place.

Mr. Daniel Blaikie: As someone who has done work with community-led data-gathering exercises, would you say that there are some important principles that should be manifested in the policy?

Ms. Aislin Livingstone: For data sharing...?

Mr. Daniel Blaikie: Yes.

Ms. Aislin Livingstone: Yes, absolutely. There are different sets of principles for open data. DataStream follows some of them, the FAIR principles for data sharing to ensure that it's findable, accessible, interoperable and reusable. There are also principles for the governance of indigenous data.

At DataStream, it's an open data platform. We work with people who want to share their data publicly, so that's a really important distinction to make as well. In some cases, there are data that aren't necessarily appropriate to be shared publicly.

We look at the principles that exist and make sure that they're embedded in the policies as well as in the systems and the technologies. It also goes without saying, in terms of building relationships with data holders, data collectors and the people who are using it, that we apply those principles at every step of the way.

Mr. Daniel Blaikie: In Pinawa, Manitoba we have a decommissioned—or it's going to be decommissioned—research reactor. There has been a lot of debate around how best to decommission that reactor.

One of the proposals is to disassemble it and move the waste to Chalk River, I believe. The other is to grout it in situ, and there has been a lot of concern raised about what that could mean for groundwater and ultimately contamination of the Winnipeg river system.

I'm just wondering, given your work, Ms. Holman, if there are any important cautionary tales that we should heed when it comes to figuring out how best to decommission this reactor and how to best care for the groundwater and ultimately the potable water that comes out of that system.

● (1730)

Ms. Larissa Holman: Rolphton is a reactor that is just upstream from Chalk River, and the proposal is to keep it in situ. There are a lot of concerns around that process and how effective that is.

I would also double-check whether the materials from that site would make it to Chalk River, because we have been assured that no more additional waste would come to Chalk River. Depending on the level of radioactivity of that material, if it's intermediate or high level, it would need to go into a permanent—

The Chair: Time is up. Thank you.

Mr. Leslie, you have the floor.

Mr. Branden Leslie (Portage—Lisgar, CPC): Thank you very much, Chair.

I'll start with you, Mr. Morrison.

I'd be remiss if I didn't highlight that today is Canada's Agriculture Day and, while some folks want to blame Canadian farmers for any environmental woes, I'd like to say how proud I am of our strides in sustainability across all aspects of our agricultural sector. I know that we will continue to do that and be a world leader on that front.

In terms of the projects with Aquanty, what has been the interest from livestock producers? I assume that there has to be some testing on the ground. Have there been any concerns surrounding that? What has the uptake been in the data outcomes of some of the projects you've had ongoing? Could you explain what the tangible outcomes could be for producers with some of this data and modelling?

Mr. Duncan Morrison: Absolutely, and thank you for the nod on the Canada's Agriculture Day. I'm very pleased to be here today.

To the uptake of the beef producers, we have beef producers among MFGA, so we're able to access their infrastructure, and we've also had Steve speak to the Canadian Cattlemen's Association as well. There has been tremendous interest.

Where we are with the model right now is that we're just starting to really give it the ability to go into those more tangible results. It was always there. It takes a little bit of time, but we're at that time threshold now. We have a portal running the forecasting tool that allows producers to access our portal on our MFGA.net and be able to tell what the water is coming downstream in both short-term and long-term intervals.

It's a tremendous planning tool in both long and short term, especially in areas of southern Manitoba that are fraught with incredible extremes of water in some parts, and then, of course, with the dryness associated with drought conditions as well.

Those would be the two.

Steve, would you have an answer as well?

Mr. Branden Leslie: I can jump in and continue on with you, Mr. Frey.

When you say it's short and long term, is this at a field level? How big of a scale, both in terms of timeline and physical geography, are these models able to provide?

Is an individual farmer going to say, I have this section of land over here and I can anticipate based on this modelling that we are going to be in a continued dry spell, or whatever the data would point to?

Dr. Steven Frey: That's exactly where they're going.

One of the strengths of that development we did collaboratively with MFGA was that it was a model designed with the producers in mind. They actually had a seat at the table. When we designed the model, we designed the interface. How are they going to use it? They were there working with us all the way through.

We're at the point now—although we're modelling 155,000 square kilometres of the Assiniboine River basin—where an individual producer can go down into a section, and get insights on changes in soil moisture and changes in groundwater levels over

what we would say is a short term, which is seven days. Then 30 days is a longer-term working forecast.

Now, hydrologic forecasts are as accurate as the weather forecasts, and maybe a little less accurate. It's an emerging technology. Weather forecasts get better, and when that happens hydrologic forecasts get better. I think we have to condition producers and work with them to design tools that they can use when climate change has more and more of an impact on their operations.

• (1735)

Mr. Branden Leslie: Thank you for that.

I appreciate the recognition that it's in the early phases. I imagine that looking backwards it's tough to tell how accurate you would be.

I have a couple of questions.

Is this a subscription type of service? I know this is a government, provincial-federal, funded project to begin with. I'm sure there are some contributions from other partners. Is this going to be a subscription type of service that farmers can choose to employ?

I think of the benefits. If you're pretty confident you're going into a dry area, you want a drought-resistant seed to plant. Maybe it's outside of the forage side of things, but I think this could be used a little bit more broadly than just forage and grasslands. Is that the model that you see this developing into?

Dr. Steven Frey: I'll make a quick comment and then I'll pass it on to Duncan.

At this point, I don't think it's targeted for individual producer subscriptions. It's more if you're a watershed district then you could use this tool and then have your producers access the tool through the watershed district's account.

Obviously, someone has to pay for it. It's running in the cloud as we speak.

Maybe I'll go over to you, Duncan.

The Chair: We have about 15 seconds.

Mr. Duncan Morrison: Okay, I'll do it very quickly.

Our marketing strategy is to get it into the hands of the most producers in the least number of moves. That means we're working with groups like the watershed districts so that they can use it for their staff and also get it to people in their jurisdictions.

The Chair: That's perfect.

Mr. van Koeverden.

Mr. Adam van Koeverden (Milton, Lib.): Thank you very much, Mr. Chair.

Thanks to all of the witnesses today for coming.

I apologize for my funny appearance. I'm grateful for the technology that allows me to do this from home, as I recover from my little eye surgery today. I want to say don't worry to my friends on the committee. I'll be back in person on Thursday.

My question's going to be related to the "What We Heard" report, which was the document entitled, "Toward the Creation of a Canada Water Agency". It's about public and stakeholder engagement.

I'm mostly preoccupied with freshwater protection and conservation from a human and animal health perspective, which obviously includes agriculture and food security. I also want to give a shout-out to farmers and agricultural workers across our country.

Participants highlighted in that "What We Heard" study the need for more baseline data at a watershed scale to support assessments of new development proposals. They also told us that more research, monitoring and modelling is needed to anticipate and track climate change and other threats to freshwater quality, quantity and the health and functioning of ecosystems. This is particularly around fresh water, including floods and drought prediction.

On other panels we've explored the fact that here in Ontario we have the benefit of conservation authorities, which is a unique model in Canada that might be replicated precisely to learn from best practices and reduce some redundancies. Would any of the panelists today like to comment on similar science-gathering groups or agencies, or even a specific conservation authority in your region that has done some particularly exceptional work as it relates to human and animal health in fresh water?

Ms. Larissa Holman: I would be happy to jump in on that one.

The Chair: Of course.

Ms. Larissa Holman: In the Ottawa River watershed there are conservation authorities. They are present on the Ontario side, but they are not consistent across that side, because it is up to the municipalities to decide whether they're going to fund conservation authorities or not.

In the northern part of the watershed where we have a large agricultural belt around Lake Timiskaming there is no conservation authority, so there is no drought forecasting done in that region. Then on the other side of the river, we have the *organismes de bassins versants*, which are OBVs for short, which do a lot of research on it, but they don't have similar funding, and they don't have the same powers that conservation authorities have.

I think when looking at these models, even within the models themselves there are some discrepancies about how effective they can be when they are not applied throughout the entire watershed or regions that they are looking at.

In addition to that, with the data availability and the lack of consistent data being collected, it's very difficult to do analysis if you're not collecting data consistently from year to year. We have, within an Ottawa River watershed report we did, this concept of a slipping baseline—the fact that you collect data at a certain time, and if it doesn't exist previously, we have to look at the conditions today as opposed to what they looked like 30 years ago, which would give us a sense of the impacts of climate change and pollu-

tion. Therefore that all stems back to this: What are the stresses on the aquatic health of these rivers, and how do we move forward to protect them?

I think it's an excellent observation, and there are some really good models out there. However, of course, we are a watershed organization, and I would really strongly advocate to consider the value of community-based monitoring and citizen and community scientists, who can help gather that data and provide that localized knowledge that is so critical to understanding what might be happening. We can take the time to analyze the data at a watershed scale and provide that feedback, which is not necessarily done just when data is collected.

• (1740)

Mr. Adam van Koeverden: Thank you for that. Thank you for highlighting the very unique example of the Ottawa River that not only flows through different jurisdictions, but actually has a north shore in one province and a south shore in another.

Is there anybody from another province or territory who would like to comment on an agency or science-gathering group that has done good work outside Ontario?

The Chair: We have about 30 seconds.

Ms. Kat Hartwig: Okay. That's too bad. I would like to speak to that, just because in the Columbia basin we are moving to semi-arid conditions. We've been working for the last seven years to collect and fill water data gaps to allow for a water budget to be built so that our community decision-makers can have the opportunity for climate adaptation options. We have been working on this for the last seven years, as I say, with an open-source data hub.

Paige, I don't know if you want to speak to how many hydrometric stations we have been able to install.

The Chair: Maybe you can just give us a number, because the time is up.

Ms. Paige Thurston (Program Manager, Columbia Basin Water Monitoring Framework, Living Lakes Canada): Sure. We have over 130 monitoring sites established here in the Columbia Basin through our program.

The Chair: Thank you very much.

We'll go to Madame Pauzé for two and a half minutes.

[Translation]

Ms. Monique Pauzé: Thank you, Mr. Chair.

I'll start with a few comments for Ms. Holman and Ms. Livingstone, but I'll ask them the same question.

Ms. Livingstone, when I read in your speaking notes that \$73 million has been invested in water-related research but “the data generated by this kind of research isn't always shared publicly”, I about fell off my chair. I can't believe that there's money available and we just can't coordinate our efforts. What I understood earlier in answer to my question was that, if you had the resources required, it would be possible to do this huge job of compiling all the data.

Ms. Holman, in your brief to the committee, you say that many data gaps could be filled using collaborative approaches to data collection and sharing.

I have the following question for you both.

Would the Canada Water Agency be a solution to the problems many have raised concerning the lack of data on freshwater?

Would this be a solution?

[*English*]

The Chair: We have about a minute for both answers.

Ms. Aislin Livingstone: I can be brief.

Absolutely. I think the Canada water agency, because it's the only organization looking at water from a national scale, is really well placed to look at what information and data is already out there being collected either by communities or by other government departments, agencies, researchers and academics in order to pinpoint where some of those gaps are, especially looking at the freshwater issues that are transboundary, interprovincial and interterritorial in nature.

Ms. Larissa Holman: I would just quickly add that so far, what we've heard about the Canada water agency is this emphasis on government and academic relationships in solving many of these questions that have to do with fresh water.

Again, I would just like to highlight the value that watershed organizations can bring to these conversations, and highlight localized issues. We have people who live in these areas and we have connections with many communities and indigenous communities that really need to be at the forefront of these conversations as well.

[*Translation*]

Ms. Monique Pauzé: I would like to make a brief comment. I still have 10 seconds remaining.

You say that the Canada Water Agency is taking action in this regard. You know more than we do. The Canadian Water Agency has barely been set up and we're already hearing from several people who come before us to say that it does this or that. We also want to give it a whole lot of mandates.

That was just an editorial comment.

[*English*]

The Chair: Mr. Blaikie.

Mr. Daniel Blaikie: Thank you very much.

Ms. Hartwig, I want to come over to you and ask you a question. As the new Canada water agency gets set up, what do you think are

some of the potential pitfalls that it may run into and should be looking to avoid in its approach?

What do you think are some best practices it should look to adopt in order to create the best possible relationship with the existing network of organizations that are doing important work in the water space, and to ensure that it's adding value to that network, instead of starting to compete with various elements of the network on work that's already being done?

• (1745)

Ms. Kat Hartwig: Great. Thank you so much for that question. I think it's an important one.

We don't really have time for the luxury of silos anymore. I think we need to meet communities and groups on the work that's being done, where it's being done, and then augment and work off it. We've already been doing that with some of the data hubs that you hear being spoken about, like DataStream and the Columbia Basin Water Hub. We've worked on these for the past six years to collect data and have a repository for data that's been collected by people in our communities for our communities.

I think that dialogue seems to be taking place.

On the sense of urgency, I can't tell you how concerned we are about droughts, flash droughts and long-term projections.

One of the things we haven't spoken about very much around the Canada water agency is that a data collection strategy is one thing and data standardization is another thing. I think the problem will be when we have multijurisdictional gridlocks on where the rubber is going to hit the road in local communities.

For example, the Columbia River wetlands, where I live, are the most important migratory flyway remaining in North America. They're 150 kilometres long. They're Ramsar-designated wetlands. They have no fewer than 98 management plans and policies that are currently meant to be applied. I feel like that's going to be a challenge. Multisector tables to help problem-solve will be necessary. We need to have these paradigm shifts.

I feel like the Canada water agency is a really good step in that direction. I think it behooves us to look to our neighbours to the south and to the EU for some of the best practices being done there.

The Chair: Thank you.

[*Translation*]

Go ahead, Mr. Deltell.

Mr. Gérard Deltell: Thank you very much, Mr. Chair.

My question is for Ms. Holman and it has to do with Chalk River.

On the Canadian government site, there's a page on the Canadian Nuclear Safety Commission stating that, under the Nuclear Safety and Control Act, the CNSC fulfills its mandate by carrying out certain activities. These include the dissemination of objective scientific, technical and regulatory information on CNSC activities.

Would you say that, in the case of Chalk River, the dissemination of information, as prescribed under the act, is properly done?

[*English*]

Ms. Larissa Holman: If I understand the question correctly—

Mr. Gérard Deltell: My question is whether you think this commission is doing its job correctly.

Ms. Larissa Holman: There are many different parts of the CNSC to do its work. There are many different projects that it is overseeing. It is a regulator. It reports to a minister for its decisions and whatnot.

It's really challenging to understand how some of these decisions are made based on the lack of transparency on how the process happens. As an organization that has intervened on multiple occasions around what's happening with Chalk River, we don't always feel like intervenors are heard in these processes. It's a very challenging subject matter to properly grasp and then be able to provide critical feedback on.

There's definitely a lot of improvement that can be made to the CNSC. Even just proper oversight and how licences are provided for such long periods would be one step. Share more information about how these decisions are made when they are re-evaluating them.

Mr. Gérard Deltell: By law, they have the obligation to give information and to spread it.

[*Translation*]

I'm not talking about a lack of transparency. If I understand you correctly, right now, the commission is not doing a good job of disseminating information.

Ms. Larissa Holman: When a project is proposed, we focus primarily on its effects on freshwater, especially on the Ottawa River. I can talk a bit more about what we can do to improve the situation.

[*English*]

With the new radioactive waste policy that is coming into play, I think there's a lot of room for improvement for these types of policies to be able to provide the correct oversight. Oversight is the key here. These facilities exist, and the waste needs to be dealt with in appropriate ways. There is a lot of improvement that could be done.

Mr. Gérard Deltell: There is a lot of work to do to be more transparent.

Ms. Larissa Holman: Yes, very much so.

[*Translation*]

Mr. Gérard Deltell: Thank you, Madame.

Mr. Chair, as you know, last Friday I tabled a notice of motion. I will move it now. It reads as follows:

Given that:

(a) the Liberal government is planning to hike taxes on Canadians by increasing their carbon tax by 23% on April 1, 2024;

(b) a typical family of four will have to pay \$700 more in groceries in 2024;

(c) nearly two million Canadians used a food bank in a single month in 2023;

(d) Canadians cannot afford further tax hikes;

(e) Minister Guilbeault admitted that “the government does not measure the annual amount of emissions that are directly reduced by federal carbon pricing”;

(f) Canada now ranks 62 out of 67 countries, dropping four places from the previous year, according to the Climate Change Performance Index;

The committee call on the Liberal government to cancel their planned tax hike on April 1, 2024; abandon their plan to quadruple the carbon tax to provide Canadians financial relief on their gas, groceries, and home heating; acknowledge that the carbon tax is not an environmental plan, it's a tax plan; and that the committee report its opinion to the House.

We know that the economic situation is very difficult for all Canadians. We believe that creating a tax and then quadrupling it as of April 1 is really not a good idea if we want to help Canadians.

• (1750)

[*English*]

The Chair: We'll go to Mr. Mazier and then Mr. Longfield.

Mr. Dan Mazier: Thank you, Chair.

Thank you to my colleague for bringing up this important motion. I think the committee and, actually, the witnesses here, can really benefit from this.

On the carbon tax scam, as I guess we're calling it, we're finding out that they're not measuring for the carbon tax the amount that the tax is actually reducing emissions by. I think that was probably the biggest finding that we found out here in the last couple of weeks.

The carbon tax is costing especially rural Canada a billion dollars if they don't cut out the carbon tax for the space heating for barns and for grain drying as well. It is imperative that this carbon tax stop. Canadians can't afford any more taxes. That's quite evident. We have—

Mr. Adam van Koevorden: I have a point of order, Mr. Chair. It's a question of relevance on talking about the carbon tax while we're studying fresh water. I also have a question—

The Chair: It's because there's a motion.

Mr. Mazier can continue. It is a motion about the price on carbon.

Go ahead, Mr. Mazier.

Mr. Dan Mazier: Yes. I'll reiterate what we're asking the committee to consider:

The committee call on the Liberal government to cancel their planned tax hike on April 1, 2024; abandon their plan to quadruple the carbon tax to provide Canadians financial relief on their gas, groceries and home heating; acknowledge that the carbon tax is not an environmental plan, it's a tax plan; and that the committee report [this] to the House.

Thank you, Mr. Chair.

The Chair: Mr. Longfield.

Mr. Lloyd Longfield: I move to adjourn debate so we can get back to the witnesses.

(Motion agreed to: 7 yeas; 4 nays)

The Chair: Mr. Longfield, take us home.

Mr. Lloyd Longfield: Thank you, Mr. Chair.

Thank you to the witnesses.

I'd like to ask some questions of Ms. Livingstone and Mr. Frey around data and the usability of data. In my previous life, we had remote machine condition monitoring that we put on machines around Canada. We would get a text message if a paper machine in Alberta was running too hot. We would get another message from an oil rig in Dubai to say that the vibration was excessive.

So there are ways to monitor things but to then also get notifications when data is showing that a condition has changed to the point where somebody needs to pay attention.

We asked Imperial Oil to give us data on the wells up in Kearn, where there was a spill. They gave us pages and pages of columns and rows of data—just numbers. It wasn't usable to us or anybody else. The Alberta Energy Regulator was supposed to get a report when things were out of condition. We were supposed to get a report when things were out of condition. No report happened.

When we talk about data and usability, Ms. Livingstone or Ms. Holman, is that something we could reasonably expect if we asked for it—to have usable data?

• (1755)

Ms. Aislin Livingstone: Yes. I think it's a reasonable request. The amount of effort that would be required to make the data that's out there usable will vary, obviously, but otherwise, what's the point of collecting the data? That's one of the things we have spent a lot of time thinking about and doing. We're doing the in-the-weeds grunt work of taking data in all its forms, whether it's in a PDF document or an Excel sheet, with, as you said, different rows and columns, and bringing it together into one format. That way, for the people who want to make sense of it and who want to analyze, interpret and synthesize it into reports that policy-makers and communities can understand, it's a lot easier.

I have a fun fact for you. There's a rule of thumb that researchers will spend between 60% to 80% of their time just cleaning, formatting and making data usable. Harnessing the people who are out there trying to do this, to make it easier for others to use, is an important priority, I would say.

Mr. Lloyd Longfield: I'll go back to Chief Tuccaro and to what he said during our recent conversation: Can the kids go swimming? Who can tell me whether the water is good enough for the kids in my community to go swimming?

If the water sensors had Wi-Fi and were putting data out, then there could be a yellow, red or green indicator for community members to easily see whether the water was safe for swimming, as an example.

Ms. Aislin Livingstone: That's a really great example. I know that Swim Guide is a tool that will take raw data and turn it into those types of results.

Maybe Larissa can speak to that.

Ms. Larissa Holman: I just wanted to add something on the question about the usability of data. When government is collecting data from industry and they're required to report, why is it not a requirement to provide it in a digital format? They provide it in a paper format. It renders it basically useless. How do you use that data to understand cumulative effects?

I'd love to have things like sewage overflows being identified when they're happening so that people know that it's not a good time to go swimming. That's an example of immediate pieces, but there are other reporting tools as well.

Mr. Lloyd Longfield: Thank you.

Mr. Frey, you mentioned the decision support tools and whether organizations are the ones that take the data and make it into a form that people can understand or whether there are licence fees involved. Is there a model that you're leaning toward with the data that you're using through Aquanty?

Dr. Steven Frey: We try to use data that's open source wherever possible. Then we'll clean it and reissue it as cleaned open source data. With CanadaWater, for example, we spent the better part of three years, in a team of probably five people, cleaning national-scale data. It will be reissued as open source, readily accessible, clean data for hydrologic modelling.

Mr. Lloyd Longfield: We had the monitors, so we made sure that the data was clean. We put it up on the Net so that people could see whether their machines were operating efficiently or not. Maybe it's through the monitor system.

Dr. Steven Frey: That's a good point. That's actually the next generation of hydrologic prediction. Not only do models and prediction tools ingest raw data from real-time sensors that are run by the respective groups; they also use that data to make decisions and issue alarms in real time. South Nation watershed, almost where we are, is an example. They're running real-time systems that will soon have alarms.

The Chair: This has been a very interesting discussion, tying data to watersheds. I want to thank the witnesses for very interesting input for our study. We really appreciate it. Thank you to those online, as well.

Members, we have a couple of very brief items of committee business.

We have to submit a budget for our travel to Kearn. You should have received the budget. I just need your approval to be able to submit it to the liaison committee. The dates would be May 13 for three nights and four days, including travel from the constituency. Can I submit that?

Yes, Ms. Taylor Roy.

• (1800)

Ms. Leah Taylor Roy: I'd also like to submit a motion.

It's in reference to our water study. It's unusual to have one of those that's in reference to the study we're doing.

It reads:

That in reference to the water study the committee hold two additional meetings after its 13th meeting to hear from witnesses, with each panel including one witness suggested by each party as per usual; that the committee also hold a further additional two meetings exclusively dedicated to hearing from representatives of those provinces and territories able to attend.

The Chair: Thank you.

Is there discussion, or can we go straight to a vote?

[*Translation*]

Ms. Monique Pauzé: No.

[*English*]

The Chair: I have Madam Pauzé and then Mr. Kram.

[*Translation*]

Ms. Monique Pauzé: Before I agree, I would like to know what meeting we are at.

The Chair: Today we're having our 11th meeting.

Ms. Monique Pauzé: Okay.

Before I agree to two more meetings, I would like to know whether we should study certain topics in more depth.

We have to face the fact that we can't invite all the organizations that work in the water sector and hear them talk about what they do. We have a pretty good idea of what that is.

Are there any topics that haven't been addressed or sufficiently studied yet?

In what direction are we going, exactly?

The Chair: The two additional meetings are mainly to hear from witnesses we really should hear from. I'm thinking, for example, of the commissioner of the environment, who would like to appear, and the two provincial representatives.

We are also trying to invite someone to discuss the U.S. global water strategy, because that will tie in with what we will be talking about on Thursday.

If we don't have enough witnesses, we could also hold a single meeting.

Ms. Monique Pauzé: With regard to meeting with witnesses from the provinces and territories, including Quebec, at the beginning of the study I spoke with the Quebec minister of the environment, the fight against climate change, wildlife and parks, Mr. Benoit Charette, and he told me that he did not want to appear before our committee.

I started looking into it and I was told that Quebec ministers don't usually appear before parliamentary committees. They may have done it at one time, but they are not interested at this point.

The Chair: We could hear from government officials, and if they don't want to come, they won't come.

Ms. Monique Pauzé: I agree. However, when some of the witnesses from the provinces and territories are public officials and others are ministers, I find that the two levels are quite different.

The Chair: I don't think the intention was to invite ministers.

What do you think, Mr. Mazier?

[*English*]

Mr. Dan Mazier: It's catching up.

The Chair: Madam Pauzé is saying that we don't normally invite provincial ministers. I don't think you were looking at provincial ministers.

Mr. Dan Mazier: No, that's not the intention. It's whomever are the water authorities.

The Chair: The water authorities—

Mr. Dan Mazier: It's more about provincial jurisdiction. If we make a federal plan, how does that interact?

The Chair: No, I was....

[*Translation*]

We weren't looking to invite elected officials.

Ms. Monique Pauzé: I still have questions.

Do we need two more meetings to hear from witnesses from the provinces and territories? There are 10 provinces, and Quebec does not want to send witnesses. That leaves us with nine.

The Chair: It could be fewer than that. If some provinces don't want to send witnesses, we'll probably need only one meeting.

Ms. Monique Pauzé: I agree, but we would still be hearing from two groups per meeting.

The Chair: Precisely. We would have eight witnesses.

Ms. Monique Pauzé: Eight witnesses is a lot. That's a whole lot of people. We're talking about eight witnesses per committee meeting.

The Chair: That could take one and a half meetings. Depending on how interested the provinces are, it could be one meeting. If no one from the provinces wants to appear before the committee, we won't have those two meetings.

Ms. Monique Pauzé: That's for meetings with officials from Quebec, the provinces and the territories.

For the other two meetings, we are talking about eight witnesses.

• (1805)

The Chair: That's the maximum.

If we are at the end of our list, it may be one more meeting. We're not looking to have meetings for the sake of having meetings.

Ms. Monique Pauzé: That's fine. I'm okay with that.

So when will it be decided? If today we decide that there will be four meetings, when will we decide that three meetings may be enough?

The Chair: If we run out of witnesses and the party members do not propose other witnesses, the clerk and analysts will tell us that our study is complete.

Ms. Monique Pauzé: I must admit that it's difficult for the Bloc Québécois, which only covers Quebec, to find witnesses. Some people observed certain things and didn't like that. It's different for committee members from the other parties, because there are a lot more of them. Also, they cover all of Canada. In that case, they could take the Bloc's place at any time and hold the two meetings.

The Chair: The committee is not looking to waste time. There are some important witnesses we should hear from, such as the commissioner, who wants to testify. This is to give us a little bit of leeway to do it right. Our goal is not to extend the study just for the sake of extending it.

Ms. Monique Pauzé: Based on the motion concerning the study that the committee voted on, there are two meetings left. We had voted for 13 meetings, and today's is the 11th. Is that right?

The Chair: Yes, it is.

Ms. Monique Pauzé: With the new meetings, we would still have six meetings left for the water study.

The Chair: Yes.

Ms. Monique Pauzé: I find that's a lot.

The Chair: I understand that.

Ms. Monique Pauzé: I don't want us to start hearing from people who come before us to boast about their business and to tell us they need financial resources. We've had those kinds of witnesses.

The Chair: There will be no more meetings on the water industry. Only one meeting of our study dealt with that.

As I said, we are not trying to extend the study unnecessarily. If it's not necessary, we'll spare the members of the committee.

Does anyone else want to speak?

Mr. Kram, you have the floor.

[*English*]

Mr. Michael Kram: Mr. Chair, I was just wondering, on the budget for Kearn, which dates...

The Chair: May 13, 14, 15 and 16.

Mr. Michael Kram: Thank you.

The Chair: It's a break week.

Is there anyone else? Should we go to a vote?

(Motion agreed to on division)

[*Translation*]

The Chair: We'll see you on Thursday for a very interesting meeting on the international front.

I would remind you that there is a vote tomorrow evening on a bill that relates to the subject we are considering at the moment.

Thank you. The meeting is adjourned.

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