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Chair

Mr. John Aldag

Standing Committee on Environment and Sustainable Development

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● (1610)

[*English*]

The Chair (Mr. John Aldag (Cloverdale—Langley City, Lib.)): Good afternoon, everyone. Welcome to our second hearing on plastic pollution.

I apologize to all our witnesses who have been on standby. We had a surprise vote, and that always sends our schedule a bit sideways.

We have four groups today who are going to be participating in this panel. We have until about five o'clock. We are expecting there may be another vote this afternoon, so we're going to try to hear all the testimony and have some discussion before five o'clock.

I think we said to each of the groups that they have 10 minutes for their opening statements. In order to actually have some of the discussion, I'd ask if there is a way to tighten that up, because we can always take your written materials, and where a lot of the value comes in is through the questions and answers between the members and the panellists.

We tend to start with the people appearing by video conference because the connections can sometimes be a bit finicky, so I'm going to turn it over right away to the Canadian Plastics Industry Association.

I will set the clock for 10 minutes, but as I say, if your presentation can be shorter than that, it would be fantastic.

I use a card system. When there's one minute left in your time I'll give the yellow card, and when the time is up, I'll give the red card. That means don't stop mid-sentence but just wrap up your thought, and then we'll move on to the next person.

With that as our introduction and welcome, if the representatives from the Canadian Plastics Industry Association would like to start, the floor is yours.

Ms. Carol Hochu (President and Chief Executive Officer, Canadian Plastics Industry Association):

Thank you very much, Mr. Chair.

[*Translation*]

Good afternoon ladies and gentlemen.

[*English*]

My name is Carol Hochu. I am president and CEO of the Canadian Plastics Industry Association. Joining me today is Joe Hruska, our vice-president of sustainability. We're pleased to present a few slides to talk about getting to zero plastic waste.

This slide provides a very high-level overview of the Canadian plastics industry. Based on the testimony you heard on Monday from the ECCC officials as well as other background material that's been provided to you, I won't spend much time here other than to say that the industry is sizeable in Canada in terms of the number of establishments, the number of shipments, the contribution to GDP, and the number of Canadians employed. Most of the end-use markets for plastics are in the packaging space, which is the largest one, followed by building and construction materials and then automotive.

In terms of geography, establishments and output are concentrated primarily in three provinces. Ontario is first. Quebec is second. British Columbia is third.

In terms of our association, we have been the national voice for and leader in plastics sustainability since 1943. We count as our members companies that are located across Canada and come from throughout the plastics value chain. What does that mean? It means companies that supply resin and other raw materials. It means processors and converters that take those raw materials and turn them into those packaging, automotive, building and construction materials. It means equipment suppliers. It means brand owners, companies that are in the consumer packaged goods space such as P&G, Unilever and so on. Of course, it also means recyclers. Anyone who touches plastics throughout the value chain is eligible for membership and is considered a member of the plastics value chain.

Our association has three priorities: outreach, communicating the sustainable benefits of plastics; issues and opportunities management; and last but certainly not least, sustainability leadership, which is the focus of our conversation today.

I wanted to begin with our view, which is that plastics and indeed litter of any kind in the environment are unacceptable. I think you heard from your witnesses on Monday that plastics deliver significant societal benefits. Plastics innovations provide us with quality of life, convenience, safety and enjoyment, improvements in the health care and food spoilage areas, as well as in transportation, in terms of greenhouse gas and resource savings.

The many benefits that plastics confer will be threatened or harmed if plastic litter harms our natural environment. We want to let this committee know that the entire value chain of our association and our members is a partner that wants to work with all of civil society to reduce waste.

In 2018, our association, along with the Chemistry Industry Association of Canada and the American Chemistry Council, made aggressive commitments regarding our shared societal goals, specifically as they relate to plastic packaging.

Our interim goal is that 100% of plastic packaging be recyclable or recoverable by 2030. Our 2040 goal is that 100% of plastic packaging be reused, recycled or recovered. Joe will elaborate on how we're going to get there.

Additionally, the industry is naturally very concerned about marine litter. Globally there is a program called Operation Clean Sweep, which is containing resin pellets, flakes and powder from escaping into the natural environment. CPIA is the Canadian licensee for Operation Clean Sweep.

In addition to the two goals previously stated, 2030 and 2040, we also have a goal that all of the members of our association will be signatories to Operation Clean Sweep by 2022. Additionally, 100% of the Canadian resin manufacturing sites operated by our members will participate in a higher level program called OCS blue by 2022.

● (1615)

The infographic on the next slide speaks to plastics in a circular economy. Joe will elaborate in just a moment. In terms of plastic production, it's interesting to note that only 3% of all energy produced goes into the actual manufacture of plastic production.

Turning to the next slide, I'm sure you heard from the government officials on Monday in terms of the marine litter issue that the world is quite seized with. Most plastic waste enters the ocean as a result of mismanaged waste from a handful of countries. You can see the top five countries here on the screen. They tend to be from 10 rivers—eight in Southeast Asia and two in Africa. It is interesting to note that Canada ranks very low at 112th. On a per capita basis, that's 187th out of about 195 countries. Clearly, Canada is not a lead contributor to the ocean marine litter issue. Naturally, Canada as a country—as was demonstrated by Canada's leadership role in the G7 last year—as well as all of the global plastics industry are indeed concerned about marine litter and are actively engaged in finding solutions. That includes, as recently as January, an announcement of the alliance to end plastic waste with endplasticwaste.org. We'll be happy to send some information under separate cover.

With that, I would like to turn the remainder of the presentation over to Joe to talk about our efforts in plastics sustainability leadership.

● (1620)

Mr. Joe Hruska (Vice-President, Sustainability, Canadian Plastics Industry Association): Thank you, Carol.

Thank you to the committee for inviting us here today.

First of all, our industry is deeply committed to the four Rs approach: reduce, reuse, recycle and recovery. This is called the sustainable material management approach developed by the Organisation for Economic Co-operation and Development or OECD. Many of you are familiar with this. It deals with all externalities of packaging and material use over the entire life cycle of packaging and products. It certainly can be complementary to the circular economy approach. Without it, our chances of getting to zero waste—not just for plastics, but all waste—will be harder to achieve. We certainly would like you to investigate that and we will be supplying materials in that regard.

The next slide is self-explanatory so I will skip over it to the next one. How will we get to our 100% diversion and zero plastic waste to landfills goals? We believe we have to increase our recycling and recovery and deal with the infrastructure to get to 100%.

The next slide is interesting because Trucost advised the United Nations Environment Programme originally on marine waste, but they did look at plastic sustainability as a follow-up to that research and found out that plastics actually are 3.8 times less than the alternatives to plastic packaging. The conclusion was that we need to manage plastics better to maintain our sustainable development goals. How will we do that? Right now we are not capturing enough plastics.

This slide essentially indicates that even if we triple our recycling we will not manage 40% to 50% of the plastics. I might add that the municipalities and academic organizations I deal with say the same thing. We need to manage the other 50% . Even within the circular economy approach we need to examine the gaps that are there. That's why we brought up sustainable material management.

We need the new recovery options.

On this slide you will see there are many diverse yields from plastic recycling and recovery, and many options on the energy or chemical side.

This slide talks about the infrastructure. We really need to improve our infrastructure on collection and processing end markets, even government procurement programs, for recycled content. This slide refers to the energy bag that will collect plastics that are not in the blue box at curbside recycling.

Again, on infrastructure, we put millions of dollars into a project that just launched on February 22. It will collect flexibles, including pouches that you see, and develop the market.

Ms. Carol Hochu: You have the red card.

Mr. Joe Hruska: I have the red card, so I'm going to just finish off very quickly.

The advanced technologies and recovery will handle those plastics that are hard to recycle. Again, there are many technologies and we believe conversion technologies will get us to zero plastic waste.

I'll hand it off to Carol to finish off.

Ms. Carol Hochu: Just in closing, plastic waste is, indeed, a very complex subject.

As you consider the scope of your work, we would suggest that it include an examination of all of the four Rs: reduce, reuse, recycle and recover. We'd be pleased to provide you with a suggested list of witnesses, including ourselves, to come back. Also, we have a wealth of studies and materials that we would like to share with you, and we'll send that under separate cover as well.

Thank you for your time and attention.

The Chair: Thank you. I know that you had to compress a lot into the 10 minutes, so I really appreciate your flying through that.

That was the Canadian Plastics Industry Association, from Oakville, Ontario.

Next we're going to my neck of the woods. We have the National Zero Waste Council joining us on video conference from Burnaby, B.C.

You have 10 minutes.

Ms. Heather Schoemaker (General Manager, External Relations Department, Metro Vancouver, National Zero Waste Council):

Thank you, Chair. Good afternoon, everyone.

I'm Heather Schoemaker. I'm with the National Zero Waste Council. I'm the director to the secretariat. I'm also with Metro Vancouver as a general manager. I'm joined here by my colleagues Joanne Gauci and Andrew Marr. They'll be introducing themselves shortly.

I'm going to give you a quick overview of the council and then we'll launch into the two areas of focus around plastics for the council.

The council is an initiative of Metro Vancouver, but it's a cross-sector leadership initiative that brings together businesses, governments and community sector stakeholders, all with the goal to advance waste prevention and a circular economy in Canada.

Founded in collaboration with the Federation of Canadian Municipalities in 2013, the council has united, among others, six of Canada's largest metropolitan regions: Metro Vancouver, Toronto, Montreal, Halifax, Calgary and Edmonton. Those, of course, also include key businesses and government leaders, academia and non-profit organizations, all coming together to work for national action and systems change to address waste generation.

Of course, everything we do is framed on waste prevention, but foundational to all of our work is collaboration.

I'm going to hand it over to my colleagues to take on two areas that we're working on right now around plastics. Joanne Gauci is a policy coordinator with the council, and she'll be discussing work that we're doing through the Circular Economy Leadership Coalition around a plastics pact. Andrew Marr is the co-chair of our recently formed plastics advisory panel. He's also a director with the solid waste team at Metro Vancouver, and he'll be talking about the work of the panel.

Joanne.

● (1625)

Ms. Joanne Gauci (Policy Coordinator, Metro Vancouver, National Zero Waste Council): Thank you, Heather.

In terms of our work broadly, to nest the work that we're doing in plastics, which there is a lot of at the moment, the council facilitates knowledge sharing broadly; has a number of member-led working groups, including one on product design and packaging, and has strategic initiatives and a growing network of partners.

As Heather mentioned, we are going to focus our comments on two key areas. We're going to share reflections on how to advance a circular economy for plastics, garnered through recent engagements we have done with the Circular Economy Leadership Coalition, to explore potential for a plastics pact in Canada. I emphasize that this work is supported by ECCC. We have not formally reported out, so these are very much high-level observations. Then we'll speak specifically to some actions that are being developed through the plastics advisory panel of the council.

As already mentioned, plastics is an area of high priority and attention. Citizens and consumers are concerned with plastic waste and are pushing governments and businesses to transform their policies and practices.

Global efforts to address plastic are developing rapidly. Countries, companies, NGOs and communities are embracing global commitments and targets. We are seeing a rise of national responses in the form of voluntary agreements or pacts that mobilize business and other stakeholders around a shared vision and set of targets.

Leading examples include—and some of these are probably familiar to you—the UK Plastics Pact, a French plastics pact and a Dutch plastics pact. There are many others in development. These pacts are instructive in terms of aligning actors within a national context in support of a common vision and set of targets. It's within this context that the CELC has completed the outreach and engagement activities to explore the potential for a plastics pact in Canada, which would be similar to what's been developed in the U.K.

We're still collating these findings, but it would appear from our preliminary analysis that there is high-level support for a pact in Canada. That would be a pre-competitive business platform to support dialogue, action and innovation that is tailored to the Canadian context and strengths but has linkages to the global and national commitments and ambition on zero plastic waste and the circular economy.

If developed similar to the one in the U.K., a pact would have a focus on packaging with four target areas: eliminating problematic or unnecessary single-use packaging; designing packaging to be reusable, recyclable or compostable; effective reuse, recycling and composting; and a target on average recycled content.

These are just some of the preliminary findings. We would be happy to share more on that work as we move forward.

Right now, I'll hand things over to Andrew to talk about the advisory panel.

Mr. Andrew Marr (Director, Solid Waste Planning, Metro Vancouver, National Zero Waste Council): Thank you.

The plastics advisory panel that I co-chair is made up of local governments across Canada. From that local government perspective, we've been developing a list of what we consider to be priority plastics, ones that have a particularly significant impact on the environment, specifically oceans, and also on local government operations, things like litter, illegal dumping and even sewage treatment.

We've also been focusing on short- and medium-term actions, essentially the quick wins that may exist.

We've brought along a few select examples that illustrate the range of actions that we're going to be looking at and the range of the types of plastics the panel is considering.

● (1630)

The first example is prohibitions. These can be bans; they can be mandatory requirements for substitution of a different material for plastic, or they can be a mandatory redesign of a product. The example that we put up here is the cigarette butt. The cigarette butt is a type of plastic. It's made of cellulose acetate. It is not biodegradable per se. It's also the most littered item in the world. Somewhere around four or five trillion cigarette butts are littered in the world every year. It's essentially a non-essential item. The World Health Organization confirms there is no health benefit to a cigarette filter, and that it's essentially just a marketing tool.

Another example of the type of action we're looking at is harmonized EPR. As you have probably already heard, extended producer responsibility makes the manufacturers of products financially and legally responsible once they become waste. It differs drastically by province, and within municipalities there are efforts as well. We're suggesting that packaging EPR should be harmonized across Canada, preferably at the highest level, not the lowest common denominator. We recognize at this time there is no federal mechanism to require or to enforce provincial harmonization of EPR programs for packaging, but the federal government could, for example, incentivize formation of interprovincial agreements.

Next is non-traditional EPR. Traditional EPR makes the manufacturers responsible for handling the material after it becomes waste, but that doesn't help you if the pollution from that product occurs from its regular use and not from the disposal of the material. For example, recycling of clothing doesn't address the fact that synthetic fibres shed many plastic microfibres from regular washing and laundering of clothing. In this particular case, one of the suggestions we're coming up with—and it's controversial even within our panel—is that manufacturers of textile synthetic fibres could be required to contribute toward the increased cost of sewage treatment or, for example, toward the redesign of washing machines to include filtration systems to reduce the number of plastic microfibres.

The last example is mandated research and development. Some plastic items have no clear solution yet. An example is tires. Just like textiles, the particles that are released from tires happen from their normal use. The wear and tear of a tire loses up to 20% of the weight of the tire. Those particles go into the environment. They are washed off into streams and rivers and so on. You can't ban the automotive tire; there's no realistic alternative to it, so we're suggesting that in this particular case, the industry should be mandated to carry out research and development for better materials, surface water treatment and other options, recognizing that while there are no solutions, no solutions will be found unless somebody is looking for them.

I'll turn it over to Joanne.

Ms. Joanne Gauci: Thank you.

In conclusion, I think we would reference some of the themes that came up from CPIA. Plastic supply chains and materials are global. Many governments, businesses and citizens are taking action, and this means that alignment and consistency are key, requiring responses with a strong alignment upward to global best practices, as well as across the different jurisdictions in Canada.

Creating and enabling environment for business innovation and investment is important, as is ensuring that efforts toward zero plastic waste are housed within a broader view of the circular economy, with a focus on prevention, as well as trying to keep this valuable material in the economy and out of the environment.

We'll leave it at that.

Thank you very much. We look forward to your questions.

● (1635)

The Chair: That's excellent.

Thanks very much.

Now we're going to our witnesses who are here in person.

First, we have Max Liboiron, an assistant professor and associate vice-president of research at Memorial University in Newfoundland.

Welcome.

Ms. Max Liboiron (Assistant Professor and Associate Vice-President Research, Memorial University of Newfoundland, As an Individual):

Thank you.

I want to start by commending the standing committee on the motion you passed in December to study plastics where you emphasized the mitigation of plastics as opposed to just dealing with plastics as they already exist.

As you probably know, plastics can be considered a stock and flow problem, where the flow of plastics into a stock makes a standing stock that exists sort of forever in geological time. It's like an overflowing bathtub. You want to turn off the tap before you start mopping up. I want to commend the committee on already recognizing that problem, which is not always recognized. Thank you.

I'm going to structure my comments in terms of greatest impact and effect from a scientific perspective. That doesn't mean it's always going to align with low-hanging fruit, but this is the scientific perspective, the research perspective.

I think it's crucial to do actions that will make an empirically noticeable difference. For example, if Canada bans straws, I wouldn't notice it in my daily activities, which is taking plastics out of the guts of animals, because I've never met a straw in the gut of an animal. We want to make sure that the scale of intervention and the scale of the problem are commensurate, that they match up. I think that's an ongoing challenge for most plastic pollution solutions.

In the spirit of that, I brought a graph with me which shows the exponential increase in the production of plastics. The red part is the worldwide production of plastics and the blue part is in Europe. These numbers are out of Europe. What it shows is that since the history of the mass production of plastics, since World War II, there have only been two moments where the increasing production of plastics decreased. The first was during the energy crisis of the 1970s and the second was in our most recent economic recession. These are the scales of impacts that matter to the mitigation of plastics as a flow problem. That's the sense of scale that we're thinking of.

What you don't see on those graphs are things like the rise of recycling and the near ubiquity of curbside recycling programs. What you don't see are bag bans reflected in that. That doesn't mean they don't make a difference. What it means is that they don't scale to the production problem, which is the plastic problem.

The other thing about thinking upstream is that the total upstream of plastics doesn't end with the production of plastics. The total upstream of plastics is oil and gas, the production of raw feedstocks. We're facing a problem where in the U.S. there's been a very recent $65-billion investment to dramatically increase oil production. Then globally we have something like an increase by a third in the next six years. Those aren't Canadian numbers but Canada will be impacted by those because plastic production means plastic flow into the ocean. Jurisdictionally, what Canada can do is not double down on oil like the other places, because an investment in oil does result in plastics. Basically a plastic plan that doesn't address oil and natural gas, the feedstocks of plastics, does not fully address plastics. That's something to keep in mind.

When we're thinking about plastics after they already exist and after they've already entered the environment, what's important to keep thinking about in the sort of scale and jurisdictional context of Canada is that there is no single Canadian plastic profile. Different regional locations have different plastic problems. In Newfoundland and Labrador, where I do most of my research, the problem is fishing gear. In Newfoundland I do not open up a species' guts without finding fishing gear. In urban areas it's cigarette butts and food packaging, including urban areas in Newfoundland and Labrador.

In the Great Lakes it's nurdles. Nurdles is their nickname, pre-production pellets and microbeads from sewage as well as microfibres. On our east coast it's a lot of come-from-away plastics that do not originate in Canada by and large, while on the west coast most of our plastics flow out to Greenland, Iceland and Europe. I'm doing research on that now.

Any sort of intervention that is Canada-wide will either impact regions differentially or we look at what plastics matter in different regions and impact those differentially. But there is no Canada-wide issue. That's not how they.... It's a place-based problem.

Another way to think about what matters in plastics is the type of harms that happen. I don't think it's a coincidence that the major leading scientific researchers in Canada on plastics, so me, Chelsea Rochman, Peter Ross, who I think you've spoken to, Alex Bond, Jennifer Provencher, all of us in whole or in part look at ingestion studies, animals when they eat plastics. The problem when an animal eats plastic is not that it's eaten plastic and then it dies. You know this because you've met dogs, I assume. My dogs eat plastics every day and twice on Sundays. There's been no crisis of the dog species. Sometimes, yes, you need to take a dog to the vet to get the sock out, but there's no species level problem with plastics in dogs that readily ingest plastics. The exception to that might be turtles. Turtles do get harmed by eating large plastics.

● (1640)

The problem with plastics from an ecological and human health point of view is that they absorb oily chemicals. If you've ever put curry or spaghetti in Tupperware, you can't get the orange colour out of the Tupperware. That's because plastics absorb those chemicals. They're hydrophobic or oily chemicals.

In the environment, there's less tomato sauce, usually, and more things like PCBs, which are flame-retardants, DDT, pesticides, and heavy metals, like methylmercury. Some of those chemicals start in plastics, but most, from a concentration perspective, glom onto the plastics after they circulate in the environment.

This is what we're concerned about. When an animal ingests these plastics, there is basically a vector, or a little vessel, for these other chemicals to circulate into the animal and into the food web, including human food webs.

I think that matters more in Canada than in some other nations. Where I live in Newfoundland and Labrador, 80% of the population eats wild food. The further north you go, the higher that number gets. Also, a lot of exports and livelihoods depend on fishing and hunting —the production of animals for food. This is a primary concern for scientists. Basically, any intervention that doesn't impact this problem—and that I don't notice when I'm opening up the guts of an animal—has not affected one of the primary concerns of plastic pollution in Canada.

On that note, in thinking about effectiveness and how effects are happening, I have a student named Lucas Harris who is looking at evaluating plastic pollution mitigation measures. He's looking specifically at extended producer responsibility in British Columbia, which, since 2014, is the only province that has a province-wide policy on EPR.

The problem is that there's no EPR-specific data on plastics. The idea with extended producer responsibility is that if producers are responsible for their waste, then they produce less waste, so they are responsible for less, both feasibly and economically in other sorts of ways.

To test that, to see if this also reduces the leakage of plastics into the environment, my student is trying to find data from before and after 2014 in British Columbia. Since the data scheme didn't go along with the EPR policy, the only data that exists to evaluate it by is citizen science data from cleanups.

His final research will be done in August, but we have preliminary results that we're very confident in. They show that if you have data that isn't designed for a task, it's not very good data.

Basically, the only data that exists is the citizen science data. It does track packaging, but it doesn't track it in a way that allows you to actually evaluate EPR. Therefore, any intervention by the federal government needs to include data that tells us if it's actually worked or not, because it's very hard to tell.

There are very few solutions out there that actually have benchmarks, or baseline data, to use the scientific term, that can prove whether an intervention works or not. Currently, it's mostly ideas of whether they work or not; we don't have evidence as to whether they work or not.

Any really robust intervention needs evidence and data collection, before and after, targeted to the intervention. Otherwise, it's just a good idea, which is insufficient for sustainability.

Thank you for your time.

The Chair: Thank you.

Now we'll jump to our last guests.

From the Green Budget Coalition, we have Mark Butler and Vito Buonsante.

I'll turn it over to you for 10 minutes.

Mr. Vito Buonsante (Plastics Program Manager, Environmental Defence, Green Budget Coalition):

Thank you.

Mr. Mark Butler (Policy Director, Ecology Action Centre, Green Budget Coalition): Thank you very much for this opportunity, and thank you for looking at the issue of plastics.

My name is Mark Butler. I'm the policy director with the Ecology Action Centre, in Halifax. With me is Vito Buonsante, who is with Environmental Defence. Both of our groups are members of the Green Budget Coalition, which has 22 members. The Green Budget Coalition—I hope you've already met them—provides recommendations on an annual basis for the budget.

Both Vito and I have provided the clerk with briefs. We'll just grab some highlights from our presentations so there's enough time for questions.

I understand that your focus is on the role of the federal government and what it can do to address the plastics crisis. We appreciate that. I'm going to provide some comments on the role of science, ocean plastic, and reduction and recycling. I'm going to try to illustrate a couple of my points through short stories.

I'll start with our own organization, founded in 1971. One of the first things we did was go out and buy a cube van and go around and pick up newsprint. At that time, it was considered slightly “out there,” and I'm sure people thought we were a bunch of crazy hippies. Today it's a big industry. It's providing jobs and it's a widespread activity. The point is that some of the things we might now think are “out there,” like going to the supermarket and not finding single-use plastics or using refillable containers, could in five years' time become more common in response to the crisis we're facing.

I've been involved in quite a few beach cleanups, and probably you have too. Your local communities have probably engaged in cleanups of beaches, rivers or roadsides. It's often surprising and impressive how much plastic—and most of it is plastic—that you can pick up on a short stretch of beach. If you extrapolate that to the entire Nova Scotian or Canadian coastline, it's just boggling to think how much garbage and plastic is out there in the environment.

However, for me, being a little older, what is most shocking is that, when you come back the next year with a well-intentioned group of volunteers—grandmothers and boy scouts—to clean up that beach again, there's a whole new batch of plastic. I guess my point here is that we need to turn off the tap. We need to reduce the amount of plastic we're producing and putting into the environment.

Max mentioned fishing gear as a source of plastic in the oceans. I would be happy to talk about that, and I'd also like to address an interesting initiative in Nova Scotia around EPR and fishing gear.

Another thing I noticed as I was doing beach cleanups is that when you pick up a piece of plastic right on the edge of the beach and you put it in the bag, it's fine. But if you go into the woods, you find the older plastic, and if you try to pick up a shopping bag or another piece of plastic, it disintegrates into hundreds of little pieces. That is precisely the problem we are facing and that science is starting to illuminate the whole issue of microplastics. Really, you could think about a plastic bag or any piece of plastic as an oil spill or a toxic spill in slow motion.

In terms of a role for the federal government, I think it's important to emphasize that science is central to this. I don't think it needs large amounts of funding, but we need to keep investing in science, keep understanding what is going on with microplastics. We need to address the issue Max identified around the attachment of certain chemicals to microplastics and their impacts on human health. I'll mention a short scientific study that looked at sea salt and found that 19 out of 20 brands had microplastics in them. So the problem is serious, and it's serious for human health.

I have one last point. Reduction is important, but we will still end up using plastics. The plastics we do use, however, we need to be able to recycle. In Atlantic Canada, because of our distance from central Canada where a lot of the recycling facilities are, we need to get together and look at how we can develop a local recycling capacity. As we know, China has said no, so there's now an opportunity to develop a domestic recycling capacity here in Canada.

I'll turn it over Vito.

● (1645)

Mr. Vito Buonsante: Thank you, Mark.

Thank you, Chair, and honourable members, for having us here.

My name is Vito Buonsante. I work for Environmental Defence Canada, a charity that aims to change policy at the government level to protect the environment. We're also a member of the Green Budget Coalition. Through the coalition we provide recommendations every year to the Canadian government to improve its budget. Also, this year we did provide some recommendations related to funding around plastic. Unfortunately, there probably wasn't a significant commitment around plastics.

Instead, Canada keeps on making commitments that increase the amount of plastics that we produce, that we use and that end up in the environment, by subsidizing the oil and plastics industries in many ways, at both the federal and provincial levels. Taxpayers bear the costs of poor design choices by producers and retailers, meaning that at the end of life of these products, the producers don't bear the costs and are not responsible for what happens to the products they design. There has been a failure to appropriately price waste disposal, and so in some cases it is easier for waste managers to throw plastic waste in landfills rather than recycle it.

We see that the demand for plastics keeps on growing. Canada is one of the countries, according to a study by the International Energy Agency, with the biggest demand for plastics per capita, at 99.6 kilograms per person in 2015. That is much more, 38 kilograms more, than what is estimated for western Europe.

Because of this growing concern around plastics, my organization, Environmental Defence, has spearheaded a list of policy demands aimed at solving the plastic pollution problem. It's a declaration called Towards a Zero Plastic Waste Canada and it was signed by 43 environmental organizations throughout Canada.

I'd like to highlight a few of the measures we suggest that are consistent with the idea of reducing the amount of plastic. They are as follows: one, harmonize provincial recycling targets to ensure that 100% of single-use plastics, at a minimum, is captured and that at least 85% is recycled; two, establish recycled content standards for single-use plastics; and, three, declare problematic plastics toxic under the Canadian Environmental Protection Act.

The Canadian Environmental Protection Act already has recognized microbeads as being toxic and has already started reducing them. To this end, Environmental Defence and nine other groups have asked the Canadian government to include single-use plastics and microplastics in the list of toxic substances, but unfortunately, although our request was submitted in June 2018 and the minister has only 90 more days to respond, so far we have not had any response. That would make a big difference, because when a product or a substance is declared toxic under CEPA, the government has to put in place some reduction measures, and reduction is certainly what we need.

We are hopeful because of a meeting last month at the UN level. The UN Environment Assembly came out with a ministerial declaration calling for every country to reduce its single-use plastics by 2030. It's a voluntary agreement, but we hope that also through this study that you are pushing here, commitments can be made at the federal level to actually put in place policies that will reduce single-use plastic. I'm happy to talk further to what those policies can be.

Thank you very much.

● (1650)

The Chair: Thank you, everyone, for those opening comments. Let's just jump right in to the discussion.

I'll go through a round of six minutes each with each party. That will take us slightly beyond five o'clock. Then we'll see whether we're able to continue with questioning or if we move into the committee business where we need to —

Mr. Darren Fisher (Dartmouth—Cole Harbour, Lib.): Will it be slightly beyond 5 p.m.?

The Chair: Yes.

Will, we'll go over to you for six minutes.

Mr. William Amos (Pontiac, Lib.): Thank you, Chair, and thank you to our witnesses, both here and on video.

I should disclose that in a past, pre-political life I served as counsel to Ecology Action Centre, and I appreciate the contribution of everyone here.

I'm just going to focus really quickly on the possibility of obtaining some of the legal opinions that you might have already around issues that have been raised.

For example, on the submission to the Government of Canada from Environmental Defence related to single-use plastics and their identification as being CEPA toxic, do you have a legal opinion that you could submit to this committee so that it could evaluate it further?

Mr. Vito Buonsante: In the submission I made to this committee, I provided a link to our request. It includes all the information that was submitted to the Canadian government in making the request. We will make sure you have available both the request and the interim response from the minister.

● (1655)

Mr. William Amos: Okay, thank you. That's helpful.

I'd like to go to the waste council out in Vancouver on the issue of upward alignment. I appreciate that it's a theme on which you have focused.

Do you have particular opinions, and are you able to provide this committee with legal opinions you have sought around how the federal government can maximize its jurisdiction to enable the most successful upward alignment or harmonization with not a lowest common denominator, but a highest common denominator approach?

Mr. Andrew Marr: We have not sought out any legal opinions at this time. However, as you know, the jurisdiction for EPR programs currently exists at the provincial level.

As I said in my presentation, we do recognize that there isn't a federal mechanism right now to require and enforce harmonization. That's why we suggested that the best way to accomplish that might be for the federal government to provide some type of incentive to encourage provinces to meet a certain standard in terms of, for example, implementing EPR for packaging.

Not to be too egotistical, we consider B.C.'s EPR program for packaging to be the best one in Canada and we would like to see that be the bar that other provinces are required to meet.

Mr. William Amos: Okay. I would never want to diminish the importance of incentives. They can be very helpful. However, money is not infinite and there is always a strong competition for resources.

Where I'm trying to focus my questions is around the issue of reduction. You mentioned the issue of certain types of prohibitions. In the context of an alignment upward, do you have a list of plastic products that should be prohibited, and through what mechanism would you suggest that ought to be achieved?

Ms. Joanne Gauci: Thank you for the question. I can jump in on this one.

In the process of the consultation we just did around the potential for a pact in Canada, we did a compare-and-contrast document of the global commitments and the national commitments with the different targets around single use. We are certainly happy to share that.

We also discussed the need for a priority list of single-use items that are problematic, but we don't have that at this time.

Mr. William Amos: Okay.

I'll pivot quickly back to Environmental Defence and Ecology Action Centre, and also maybe to Professor Liboiron.

Are there studies around the incentives, or rather subsidies, that are provided to the plastics industry? I have not seen any and I wonder if that information is available.

Ms. Max Liboiron: I would love to see that. I don't know.

Mr. William Amos: It's asserted, but I haven't seen the evidence.

Mr. Vito Buonsante: I don't have a full overview of all the subsidies. I know of a couple, more or less anecdotally, from the media, such as a plant in Sarnia that received $100 million from the Ontario government for production of plastic and $35 million from the federal government, and a plant owned by NOVA Chemicals that is going to receive around $200 million in royalties. Those are the ones I know of from the media.

Unfortunately, one of the big problems we're having is access to various types of data in terms of recycling, in terms of production, in terms of inputs of plastics and in terms of various drivers for the overflow of plastic.

We ask ourselves why there is such a small amount of recycled plastic right now, and unfortunately the data is very sketchy.

Mr. William Amos: Okay, thank you.

My last question will simply be a request to the Canadian Plastics Industry Association to please provide any written opinion that they may have as to why the federal government ought not to use its CEPA jurisdiction to ban single-use plastics.

Thank you.

● (1700)

The Chair: Thank you, and that's the end of your time.

We go over to Mr. Fast for six minutes.

Hon. Ed Fast (Abbotsford, CPC): That is the first question I was going to ask the industry.

Ms. Hochu, your industry does produce single-use plastics. You've heard reference around the table here to perhaps eliminating single-use plastics completely in our economy. I'd be interested to hear your thoughts on, first of all, whether that's advisable and whether it's possible and how you as an industry would respond to proposals to eliminate single-use plastics.

Ms. Carol Hochu: Thank you for the question. It was covered at a very high level in our presentation, and we made reference to the true cost study. We'll certainly provide the link to the full study that showed the environmental cost of plastic use in consumer goods is nearly four times less than alternative materials.

The committee should understand that every material choice has impacts, and so in considering alternatives, we support a life-cycle approach or a science-based approach in considering those impacts. With respect to bans, they eliminate choice and they can have unintended negative environmental consequences.

Joe, would you like to add to that?

Mr. Joe Hruska: There is a purpose for this packaging, and much of it has to do with hygiene and the delivery of food products in a safe way. That has developed over the years to minimize environmental, economic and social impacts. I would believe there would be a drastic impact on the delivery of, for example, food at quick serve within our grocery stores.

It also prevents a lot of food waste, and that has been well documented. We can provide that information to you, not just from my organization but from independent third parties. Plastic prevents waste.

Hon. Ed Fast: I will also ask you to follow up on something that was raised by my colleague, Mr. Amos.

I believe his preference is that our study focus on the reduction of the use and production of plastics instead of perhaps focusing on the recycling, recovery and reuse of plastics. Again, I'd be interested to hear your comments.

Ms. Carol Hochu: Mr. Fast, I did make a very quick comment at the end of our presentation that suggested that we need a systems approach with all of the four Rs: reduce, reuse, recycle, recover. I appreciate it adds to the complexity of the focus of your study and that there's a limited time period in the parliamentary calendar, but I think our recommendation would be to focus on all four Rs.

Joe?

Mr. Joe Hruska: I would agree with that.

Hon. Ed Fast: All right.

I'll share a little anecdote with my colleagues here around the table. I recently went to my favourite restaurant in Abbotsford, British Columbia, White Spot. I ordered a milkshake at the drive-through. They provided me this time with a straw that was not plastic; it wasn't a single-use plastic. It appeared to be some kind of a paper product. As I consumed the milkshake, the straw became soggier and soggier and eventually collapsed completely in on itself. I wasn't able to finish the milkshake, other than drinking it directly. Of course, it got all over my nose and made a bit of a mess.

The purpose of that anecdote is the fact that, if you're talking about replacing and reducing plastics, you'd better have an alternative that works and that is functional. If it's not functional, we're not serving our communities well.

I'll leave it at that. I'll just say that, as we move forward, we're going to scope out our study, Mr. Chair, and hopefully come up with a limited mandate. I hope that mandate would not be exclusive to reduction but would be much broader. In fact, I wouldn't want to focus on reduction. I would want to focus on how we properly recover and recycle plastic and use it in a responsible, ethical way.

The Chair: You still have a minute and a half. Does anybody else from your group want to...?

Mr. Yurdiga, do you want to take the minute and a half remaining?

Mr. David Yurdiga (Fort McMurray—Cold Lake, CPC): Thank you, Mr. Chair. I'd like to thank the witnesses for being here today.

In 2010, in my community of Fort McMurray, we got away from single-use plastics. I found in our household that we didn't reduce plastic use because we used to use the grocery bags as garbage liners for the receptacles. So we didn't reduce plastic.

What I'm looking at is we have a waste management problem more than a plastic issue. We looked at China, Indonesia. There's technology out there to make it valuable. In the U.K., they're turning plastic waste into ecobricks.

We also have APT, alternative power technology, turning it into diesel fuel. We have to manage the resource. We don't call it waste; we call it resource with a value on it. I think we'll accomplish more because right now there's nothing that really replaces plastic.

My question is for Carol Hochu.

Are you aware of technologies to use plastic in ways other than municipal waste?

● (1705)

Ms. Carol Hochu: I will turn the microphone to Joe. Joe is our recycling guru, an expert in the CPIA. In fact, he helped launch the blue box program in Ontario many years ago. Joe can speak to some of the newer technologies that are helping to recover plastic waste.

The Chair: I'm just going to jump in quickly. We're out of time.

Would you do a very tight answer on it, and then I do have Mr. Stetski who is also waiting with his questions.

Mr. Joe Hruska: To answer your question, there is an actual increase in commercial operations that can deal with plastic deformation, with dirty plastics, unrecyclable plastics. I was not able to cover it in detail here. Even in Edmonton, they have the Enerkem facility making ethanol and methanol for the circular economy. So, yes, those technologies exist and they are developing at a fast rate.

I can supply more information to the committee.

The Chair: Perfect. Thank you.

Mr. Stetski, we'll go over to you for your six minutes.

Mr. Wayne Stetski (Kootenay—Columbia, NDP): Thank you. The testimony is very interesting.

I'd like to start with the Canadian Plastics Industry Association.

Since the industry creates the plastics, there were some who said that the industry should be responsible, then, for reducing, reusing, recycling and recovering these plastics. What do you see as the role of industry? Do you agree that industry should take on all four aspects of making the life of plastics better?

Mr. Joe Hruska: Thank you, Member of Parliament.

Let me say this. Extended producer responsibilities have been good for plastics. We export very little to China—well, maybe a bit too much, 12% to 16% compared to other countries. Other countries ask me why we're actually doing so well. It's because we have producer responsibility.

I launched the first program in Canada after launching the blue box program, gaining a United Nations award. We took those stewardship monies and developed end markets for materials. I have to say that for our B.C. friends on the Internet there, their same industry in that area is developing markets for plastic.

If you talk to Ontario municipalities, yes, you find some are having a problem marketing their plastics, but many will tell you it's not a problem. So, we really believe in producer responsibility. It provides infrastructure, end markets and investment. It's good for plastics, and good for all other materials.

Mr. Wayne Stetski: Do you think they have a role in all four elements then?

Mr. Joe Hruska: Yes, I do. Definitely.

The brand owners who want us to supply those plastics want it managed. Their consumers are actually saying, “What are you going to do to make it easy for me to make the right choice. I don't want to put it in the garbage. I want to put it in the blue box or take it to the depot.” I think there is co-operation amongst government, industry and the consumers that will make this work. Industry can lead this by putting in the programs.

Mr. Wayne Stetski: Is there any particular area out of those four where you think industry can and should do more?

Mr. Joe Hruska: I'll say on the market development side we're pretty good in working with municipalities, as you know, across the country in collection systems, market development and procurement.

Let me add on procurement. I think government could have a great role in ensuring plastics and other materials get put into products. Industry can help with that. The market development side is key. If you want a circular economy, the materials collected have to go somewhere. That's where we can put a lot more of our efforts.

● (1710)

Mr. Wayne Stetski: There are plastic additives, of course, and the professor showed a number of them that are quite concerning, for example, phthalates and BPA. They've been linked to health issues and banned in some cases from certain products. The American Academy of Pediatrics says that packaging can interfere with children's hormones, growth, development, etc., and they recommend avoiding plastics with codes three, six and seven.

What's being done within the industry to test and remove harmful chemicals from plastics if you're focusing on reusing and a circular economy? How are you dealing with some of these health issues around plastics?

Mr. Joe Hruska: I know there's the precautionary principle, and BPA was dealt with, I think about five or six years ago, to protect young children, although the government scientists did not support the fact that BPA was causing problems. When it comes to number six plastic, styrene, we're talking about styrene versus polystyrene, which is the polymerized version of styrene. Just so you know, you're probably getting as much styrene in your strawberries and coffee beans as you might get from polystyrene packaging. In other words, it's minimal. It's in nature.

We have to look at the impact on humans of these things, compared with that of the regular environment. It's a cost-benefit and also an environmental examination of the use of these things. The industry does not put additives in to harm anyone, and the government has pretty strict regulation on safe food additives. It has to be proven, if you have a package, that it is safe for use.

Mr. Wayne Stetski: I'd like to ask Professor Liboiron the same question.

How do you think industry is doing with keeping us safe?

Ms. Max Liboiron: Not great. Canada is lagging behind places such as the EU in terms of the precautionary principle, which was brought up. BPA is largely going to be replaced with BPS, which is structurally similar and has been found to cause similar problems in scientific studies. Part of the problem is there are so many chemicals that are already out there legally and circulating that haven't been properly tested. The approach tends to be one chemical at a time. It really is scientifically infeasible to approach it one chemical at a time.

I know you've done more work on this, Vito. That's your speciality.

I am very worried about the polymer of plastics, but I'm less worried about that than plastic additives, because they've been shown over and over again...the United Nations Environment Programme.... There's consensus in the scientific community that they do cause harm, and they aren't being reduced at all. So with the circular economy approach, which you rightfully brought up, you might be able to circle some of the polymers through that, but a lot of these chemicals, including persistent organic pollutants, do not go away. They don't circle. They circulate, but they don't get recaptured, and they are toxic.

Mr. Wayne Stetski: Thank you.

The Chair: That's the end of our time.

To our panellists, procedurally, when bells start ringing, we're not allowed to continue the meeting without the consent of the committee. We don't know when that's going to happen. It could be in the next minute or two.

I'm looking for direction from the committee. The point was to go in camera. It always takes five minutes, by the time we do thank yous, to clear the room and start the discussion. If we do have bells at 5:15 p.m., I'd need consent to do that. The analysts have prepared some comments for us to consider as a starting point.

Hon. Ed Fast: Let's do that.

The Chair: Okay, if we're ready to do that, we will. If we continue the meeting, we're not going to have any sort of meaningful discussion.

With that, I'll thank our witnesses again for their very useful thoughts. As was asked, if you have any additional supporting material, send it to us in writing. We ask you to limit it to 10 pages, for translation purposes. You can send us links and references and things like that.

Thank you so much for your time. Again, I apologize for the delay in the start, but we really appreciate your flexibility and your being here.

We're going to suspend and clear the room, and then we'll go in camera.

[*Proceedings continue in camera*]