

**PORT METRO VANCOUVER
ROBERTS BANK TERMINAL 2 PROJECT
CONSULTATION REGARDING PRELIMINARY ENVIRONMENTAL MITIGATION CONCEPTS**

**Small Group Meeting 1
September 25, 2014**

Notes from a small group meeting for the proposed Roberts Bank Terminal 2 Project, September 25, 2014, 2:00pm-4:00pm, at the Coast Tsawwassen Inn, Delta, B.C.

Attendees:

Eric Aderneck, Metro Vancouver
Rod Asher, Citizens Against Port Expansion
Cynthia Bodman
Les Bogdan, Ducks Unlimited Canada
Ian Bourhill, Hillmar Industries Ltd.
Donna Chan, City of Richmond
Bob Culbert
Rick Davies
Bob Dhaliwal, ILWU Canada
Lesley Douglas, City of Richmond
Roger Emsley, Against Port Expansion
Julie Hobart
Susan Jones
Teresa Jones
Marina Katusa, Global Container Terminals
Jako Krushnisky
Bernadette Kudzin, Vicki Huntington's Office
Otto Langer
Leon LeBrun, Trails BC
David Levy, Levy Research Services
Doug Massey
Robert McCandless
Liz McDonald, Citizens Against Port Expansion
Evelyn Murphy
Phil Nelson, Council of Marine Carriers
Finn Nielsen
Jim Northey, Tsatsu Shores BCU 3086
Vic Rivers
Ian Robertson, Delta Optimist
Leo Stradiotti
Patrick Thompson,
Donna Underhill, Metro Vancouver
Peter van der Velden
Liz Walker, White Rock & Surrey Naturalists
Jean Wightman,
Judy Williams, Fraser River Coalition, VAPOR, WBPS, BBCC, Against Port
Expansion

Port Metro Vancouver: Judy Kirk, Facilitator (Kirk & Co. Consulting)
Rhona Hunter, Director, Infrastructure Sustainability
Kyle Robertson, Manager, Environmental Assessment and Permitting,
Container Capacity Improvement Program
Gord Ruffo, Program Manager, Habitat Enhancement Program
Cindy McCarthy, Manager, Project Communications
Matt Skinner, Kirk & Co. Consulting
Kai-lani Rutland, Meeting Recorder (Kirk & Co. Consulting)

The record notes that the meeting commenced at 2:01pm

KEY THEMES:

- Some participants expressed concern regarding the accuracy of the 2014 Ocean Shipping Consultants container forecast and requested that additional information be made available regarding the justification and need for the Project, including a business case and container forecast information from alternate sources.
- Some participants commented that Port Metro Vancouver should focus on bulk shipping through Vancouver and that container capacity should be expanded in Prince Rupert.
- Some participants suggested that the environmental baseline for the environmental assessment be defined as the conditions prior to any port development at Roberts Bank.
- Some participants were concerned that port expansion could cause a range of negative environmental changes, including sediment, noise and light impacts.
- Some participants expressed concern about the proposed mitigation options and were skeptical about whether or not the port would actually implement the mitigation measures.
- Some participants requested that a comprehensive plan for the entire Fraser River Estuary be developed, stating that the approach to conducting an environmental assessment for the Roberts Bank Terminal 2 and other projects are piecemeal in their approach.

(Abbreviations will be used and mean – Q: Question, A: Answer, C: Comment)

1. Welcome and Introductions – Judy Kirk

Judy Kirk welcomed participants to the small group meeting and explained the format of the meeting, and also introduced the Discussion Guide and Feedback Form. Judy Kirk informed participants that the meeting was being recorded for accuracy.

2. Review of Consultation Discussion Guide – All

Rhona Hunter reviewed the introduction to the Discussion Guide, including ways to participate in the consultation and how consultation feedback will be considered by Port Metro Vancouver. She then gave an outline of the elements of the proposed Roberts Bank Terminal 2 Project, as well as clarified the deadline for submission of consultation feedback (October 10, 2014 at midnight).

Q: *Susan Jones: The terms of reference were offered for consultation from August to September, now you begin this after the deadline of the terms of reference, which are key to this consultation*

process after the review for that is over. I am talking about consultation for the terms of reference. A lot of people didn't know about that and now it is too late.

A: *Judy Kirk*: The Canadian Environmental Assessment Agency, or CEA Agency, is responsible for the Terms of Reference consultation. I will ask Rhona to provide some explanation of that, since that process is run by the CEA Agency.

A: *Rhona Hunter*: The consultation Susan was referring to was the issue of the Draft Terms of Reference for the Review Panel, which closed on Monday, September 22. That is being led by the CEA Agency. There are two streams of consultation that the public have an opportunity to get engaged in. This is one of them. The Terms of Reference is being led by the CEA Agency, as were previous opportunities to weigh in on the draft Environmental Impact Statement Guidelines, as well as on the Project Description, which occurred in the later part of 2013.

Q: *Doug Massey*: Does anyone here represent the Canadian Environmental Assessment Agency?

A: *Judy Kirk*: No. The CEA Agency is a government body. These people here represent the Port. Susan, I hear your question and I am going to note it. In the interest of making sure that everyone knows this is not a consultation meeting for the CEA Agency. This is a Port-led meeting, not a CEA Agency meeting. I'm going to ask Rhona to proceed a little further and then we will take questions after.

Q: *Doug Massey*: Are you not awaiting the findings of CEA Agency? Why are you moving forward?

A: *Judy Kirk*: If you have questions about the CEA Agency process, they are really the only ones who can answer those questions thoroughly. However, this and any other infrastructure project that are under environmental assessment must get certification or approval before they can proceed. This consultation process is asking for feedback on potential mitigation measures, that the Environmental Agency would have to review. What ended on September 22nd was merely the comment period for the Panel Terms of Reference, i.e. the scope and nature of what the Panel would look at. I recognize that the whole concept of environmental assessment is complex, especially for people that haven't been involved in it before, but there is no one here that represents the CEA Agency, so we can't answer all of your questions on that. There is a website, which can be found in the guide. If you want to ask them questions I would encourage you do to so.

The proposed Roberts Bank Terminal 2 Project and the Need for Container Capacity

Rhona Hunter provided an overview of past Port Metro Vancouver-led consultation regarding the Project, as well as the topics on which Port Metro Vancouver is seeking feedback. (page 3-5 of the Discussion Guide).

C: *Judy Williams*: Going back to the comment about the Terms of Reference, and how there is strictly Port Metro Vancouver here at the table without the EA present; I am sorry to be negative, but you should have had an environmental representative here today from the Canadian Environmental Assessment Agency.

C: *Judy Kirk*: We will pass that along.

C: *Judy Williams*: Please do, because it is a pointless exercise without them.

C: *Roger Emsley*: I'm on page 5, looking at the graph. Port Metro Vancouver has produced a number of these, and they've all been inaccurate. Port Metro Vancouver has a history of underestimating port capacities and over estimating expansion forecasts and volumes, and we see it here yet again. Their cumulative annual compound growth is somewhere around 3%. In order to even meet their low case throughput, they'd need a 4% growth. It isn't going to happen.

- Q: *Liz Walker:* Along the same lines, I see this graph that says the sources are Ocean Shipping Consultants. Do you have any other sources for this graph? That doesn't really sound independent to me.
- A: *Rhona Hunter:* We do these forecasts on a yearly basis, and we have done them over the past three years. Ocean Shipping is a world renowned economic advisor, and they have done two of the last three years. We will continue to do forecasts moving forward to both verify our past forecast, as well as update those forecasts in terms of what the current economic conditions are. They are as independent as an entity that is employed to have a perspective on this situation can be. The forecasts are available online for anyone to take a look at, so everyone is welcome if you'd like to look into them.
- Q: *Liz Walker:* Would that website include accuracy of forecasting over the past couple decades?
- A: *Rhona Hunter:* The project description has information regarding current throughputs. This forecast doesn't go back and verify previous forecasts, it simply looks at the forward-looking forecast. But we do have a verification with comparison to what past forecasts look like compared to actuals.
- Q: *Judy Kirk:* Liz, I think your question was, can anyone here go on the website and see if Ocean Shipping Consultants have been accurate? Is that what your question was?
- C: *Liz Walker:* That's part of it, but my concern is a lot of people are very optimistic about the future, and that can give over-predictions of economic growth and I just don't see it happening. I would like to see research coming from other agencies who are looking at the deeper problems, and the people who have already arrived there. Richard Belfour is looking into the future along with other professionals and experts, and they don't see a rosy picture ahead. I'd like to see how their forecasting stacks up against something like this.
- C: *Ian Robertson:* About two years ago when we were meeting here, a question was raised about impact coming from the expansion of the Panama Canal, and I don't see any impact shown on any of these charts. More recently, there's been a significant amount of press about the expansion going on with the Suez Canal. Now each of those is going to have a dramatic impact upon shipping routes and destinations. Coupled with that are several announcements that have been made about the expansion and deepening of East Coast ports in the US, which they claim will have big impact on US-bound goods, and I don't see any reference to that or any symbolism in any of these three charts.
- A: *Rhona Hunter:* That information was taken into consideration within the forecast, and if you go back to the documents you will see a specific reference in the analysis.
- C: *Ian Robertson:* Ok, so without having done that, the three little bars remain unaltered by those facts.
- C: *Kyle Robertson:* The high case, base case, and low case did consider the Panama Canal and that is outlined in the Ocean Shipping report.
- C: *Rob McCandless:* I understood this meeting was to discuss the environmental mitigation, but you don't have people here to discuss the socio-economic. It is just politics unless you are ready to do that, so maybe you should have a separate session to discuss this. For example, I would want to know, has your board of directors decided to divert container traffic to compete with other ports? We can't really discuss it here because you are here to discuss mitigation. But you owe us another meeting like this to discuss economics.

- Q: *Rick Davies:* On page 4 it shows the expansion. It shows three ships there. Will there be ships coming to the other side as well?
- A: *Rhona Hunter:* Yes, is a three-berth terminal, so the three berths that you see are a representation of the three berths of the terminal.
- Q: *Rick Davies:* All the ships coming and going now, with expansion of the coal port in New Westminster, and the LNG plant they want to put in. That's a lot of big ships. Do you consider how many ships will be coming in the future?
- A: *Rhona Hunter:* Absolutely, those are considered within the Environmental Impact Statement.
- A: *Kyle Robertson:* We anticipate 260 ships coming in, 260 going out, so about 520 movements every year. We also do cumulative effect assessment as part of the project.
- C: *Rick Davies:* I've seen the ferry come out and have to turn sideways because a ship was coming out past the ship and the terminal, and the ferry in the middle. I was concerned about that.

Opportunities to Increase Container Capacity on the West Coast of Canada

Rhona Hunter provided an overview of Port Metro Vancouver's consideration of various options to provide additional container capacity (page 6 of the Discussion Guide).

- Q: *Peter van der Velden:* Can you tell us about Ashcroft?
- A: *Rhona Hunter:* My understanding is that Ashcroft doesn't actually take away the need for ship-to-shore capacity. So this terminal addresses the ship-to-shore business. If a program or project such as Ashcroft were brought online and the supply chain responded to it in the required way, it would still not remove the need for ship-to-shore movements, which is what this terminal provides.
- C: *Ian Bourhill:* I know a little bit about the ports and the port industry. In defense of Port Metro Vancouver, if these projects are not planned well in advance, the timeframe to bring them on board is so long that if you miss the opportunity, you create a problem where you can't export your goods. The other problem they have is that none of the ports we have in Vancouver in the inner harbour are capable of taking in the latest ships. If Canada doesn't invest the money in infrastructure, it loses out in its competitiveness to be able to export, and its competitiveness to be able to stay in the forefront of exporting goods to Pacific Rim. So these are things that are very difficult and have many questions that come up, but decisions that have to be made 6-10 years in advance of when they are needed. Yes, they are projections, but projections are always subject to variances. They are based on the best information you can use at this point in time. With all of the agreements that we are making with China, Korea, with rest of the Pacific Rim, it is a given that our exports from the West Coast are going to increase dramatically. I think that is without any question of a doubt.

The Advantages of Roberts Bank

Rhona Hunter provided an overview of trade infrastructure at Roberts Bank, including the South Fraser Perimeter Road and the Roberts Bank Rail Corridor Program (page 7 of the Discussion Guide).

- C: *Susan Jones:* I want to talk about bigger ships and about planning ahead for that. There have been studies done showing that experts have advised the Government of Canada to develop Prince Rupert first. Prince Rupert is well equipped to handle bigger ships with less cost of infrastructure. The whole global trade is changing with these bigger ships, so these forecasts have a big question mark about what Ian said before about the Suez Canal. It's all changing with bigger ships. Trade with China is changing. We should be concentrating on our bulk shipping, which is our economy

here. And the bulk shippers are complaining that we are putting too much into our containers, and not enough into bulk shipping. We could be creating more problems rather than solving the economic problems.

- C: *Rhona Hunter*: I just wanted to point out one thing about what Susan raised, and that is that this particular forecast we talked about on page 5 includes Prince Rupert. So all of the planned growth has been considered in terms of West Coast container growth. Those forecasts consider bigger ships as well as the Suez Canal.
- C: *Susan Jones*: Experts have advised that we develop Prince Rupert first.
- C: *Rhona Hunter*: Yes, when you look at the graph you see that Prince Rupert comes online before the Roberts Bank Terminal 2 Project.
- C: *Susan Jones*: So we shouldn't even be talking about this until we wait and see.
- Q: *Doug Massey*: You can't put the same ships up there at Fraser Surrey Docks because of the lack of turnaround space. But at the same time, you're saying it could be because of the tunnel. What's the purpose of taking the tunnel out if you can't expand what we already have?
- C: *Judy Kirk*: Ok, I'm going to paraphrase your question Doug, just so people can hear. If Fraser Surrey Docks is going to expand and the tunnel is being pulled out, then surely there is capacity there as well?
- C: *Doug Massey*: That's what I'm saying.
- A: *Rhona Hunter*: So the limiting factor for Fraser Surrey Docks is the turnaround. The removal or non-removal of the tunnel will not take that barrier away for container expansion at Fraser Surrey Docks.
- C: *Ian Bourhill*: I've made inquiries with the Premier's office about why the tunnel is coming out. And there's no answers. There's no need to remove the tunnel. There is no support. If it is in fact a position of the Port Authority that the removal of the tunnel will not improve the transiting of ships up the Fraser River, I think that needs to be made clear, because we're in the process of spending an extra couple of billion dollars to accommodate an assumption which is not valid. The assumption being you have to get rid of the tunnel to increase the depth and allow bigger ships to go up the river, and that's not valid according to what you're saying. And I think that needs to be made public.
- C: *Rhona Hunter*: My statement is around container ships servicing Fraser Surrey Docks, not around shipping in general. Turning was the limiting factor for container ships servicing Fraser Surrey Docks.
- C: *Ian Bourhill*: Well, if on the other hand, you need greater depth, and you were the ones who are proposing the removal, I think that needs to be clear. There is total confusion.
- Q: *Bernadette Kudzin*: My question is about the side bar on page 7. With the latest acronym, the GTCF, you refer to the Roberts Bank Trade Area. Can you be specific about that please?
- A: *Rhona Hunter*: The Roberts Bank Trade Area looks at South of the Fraser in terms of a trade area.
- C: *Bernadette Kudzin*: But you say South Shore Trade Area and then you have the Fraser River Trade Area...
- A: *Rhona Hunter*: The four trade areas are the Roberts Bank Trade Area, which would be Delta, Surrey, the Township of Langley, and City of Langley. The Fraser Trade Area is Richmond, New Westminster, and probably Port Coquitlam, but I would need verification because this is an area I'm

not as involved in as some of my other colleagues. The North Shore Trade Area is the north shore of Burrard Inlet, and South Shore Trade Area is the south shore of Burrard Inlet.

Q: *Peter Scurr:* What is the relationship between Port Metro Vancouver and Fraser Surrey Docks?

A: *Rhona Hunter:* They are a tenant of Port Metro Vancouver, and are required to go through Port Metro Vancouver for business transactions such as changing of commodities, expansions, improvements etc. We regulate them.

Creating Jobs and Economic Development Benefits

Rhona Hunter provided an overview of the jobs and other economic benefits that would be provided by the Roberts Bank Terminal 2 Project (page 8 of the Discussion Guide).

Q: *Susan Jones:* Of the 12,400 jobs a year, how many are jobs a year are there right now in operations?

A: *Rhona Hunter:* That's a question I don't know the answer to right now, but I certainly will make sure we make note of that and will have to get back to you on that.

C: *Peter van der Velden:* There was a letter by the Optimist a few weeks ago that seriously questioned the Port's job numbers, as well as the assumptions. The multipliers that were used seemed to be rather unrealistic.

C: *Rhona Hunter:* The current numbers are based around the current design. As the project is developed, you develop more certainty and rigor around the design, so these numbers are based on our current design. They are using what is called the BC Input-Output Model. Kyle will speak more to that in the Environmental Impact Statement. The studies, the multipliers and backup information that was used to develop these numbers will all be in the Environmental Impact Statement.

Q: *Liz Walker:* Where does the \$3.65 billion come from? Who pays this?

A: *Rhona Hunter:* It comes out of the project, so that's a benefit of the Project, it's not taxpayer dollars into the project. This is through taxes paid through municipal taxes and provincial taxes that the terminal pays out. It is a public benefit.

Q: *Liz Walker:* Well, I know it's going out to the public, but where is it coming from?

A: *Rhona Hunter:* It's coming from port businesses, users, and the supply chain in terms of their expenditures out. So their municipal taxes, the employment taxes paid by the people working at the Port, the provincial taxes, the federal taxes that are paid, the economic output from the Port. The people using the port and employees spending in the economy.

Q: *Peter van der Velden:* Where is the money coming from to construct the Project? That's certainly my concern.

A: *Rhona Hunter:* The project will use what is called the "design-build-finance-maintain model". So the money will be coming from a consortium, with the Port being one of the players, and private funds will be the second player when it comes to the financing part. That partnership has not been developed, and it won't be developed for a few years, but it will be private as well as Port money.

C: *Rod Asher:* I'm still on this page 8 in the operations. Just two questions. I have a problem with the figures regarding employment job numbers, so I think I would tend to challenge them.

C: *Judy Kirk:* Let me say this, Rod. On page 24 back here, this is a space for additional comments about jobs or about the forecast. If you have comments about jobs or about the forecast or anything else that's not the mitigation, please do put it here.

- C: *Rod Asher*: Ok, I'll save it until then. Thank you.
- C: *Otto Langer*: That sounds identical to the discussion we had in Richmond in 2012, and the people sitting there, including Rhona, promised to circulate much more information to us in terms of jobs and money. We still have the same numbers two years later and we have no new information. I also asked in that meeting to have the materials about habitat compensation, and a year later I still haven't received it. This certainly adds to my great doubts during this consultation process. It has to be two-way, and way more transparent. When people asked for information two years ago, why are we going over the same questions and having the same answers and same charts given to us? You have to be more serious about informing the public and making them part of this process if you're serious about consultation. It's a question and a statement. Just writing more comments on the back page isn't good enough, because it goes into a dead letter office and we never get the feedback.
- Q: *Judy Kirk*: Otto, would it be fair for me to ask when the information that you are looking for will be available?
- Q: *Otto Langer*: What you promised two years ago was so that we wouldn't have this discussion again, I'd say where it is? Are you going to carry on into the CEA panel hearings before you give us more information?
- A: *Rhona Hunter*: All information pertaining to economic forecasts, mitigation, how we've come to our conclusions is all contained in the Environmental Impact Statement document. The analysis and assessment plus all of the supporting documentation are part of that. The information around economic forecasts is on our website.
- C: *Cindy McCarthy*: Not the economic output, but the container forecast information is on the website.
- C: *Rhona Hunter*: The EIS will be filled in entirety in early 2015 and all of that information will be available prior to the panel even being struck. In fact, it is available at minimum the in the five-month period before the panel starts. There will be a CEAA process that will invite all interested stakeholders to review and comment and provide feedback into the Environmental Impact Statement before the panel has been struck. Once the panel has been struck there will be many opportunities for engagement and consultation for input into the analysis of that data.
- C: *Bob Dhaliwal*: I think we need to consider, since the consortium hasn't been decided, the new jobs being created will all depend the structure of the terminal and the extent of automation, and who the private partner will be. We are really concerned about that. You're going to be building a large port and having this environmental impact, but there's also a possibility that there will be very few jobs created.
- C: *Rhona Hunter*: In the Environmental Impact Statement, all the designs have been based on semi-automation. Although the jobs in this semi-automated system numbers are less than a non-automated system, the jobs in this case are different, and are higher skilled jobs and better paying.
- C: *Judy Williams*: The comments that Otto and others were making are all tied in here. It's easy to say information is on the website, and it'll be on six months ahead of time, but the trick is being able to navigate the PMV website. You have to know where to go. It is highly complex for the lay person that doesn't know how to begin to navigate. You need personal contact, phone calls, emails that are explanatory ahead of time. It is just deliberate obfuscation in my opinion.

Environmental Assessment Process

Rhona Hunter gave a brief overview of the environmental assessment process for the Roberts Bank Terminal 2 Project, including the role of the Canadian Environmental Assessment Agency, the Independent Review Panel, and the timelines that are laid out in the Canadian Environmental Assessment Act, 2012 (page 9 of the Discussion Guide).

- C: *Judy Kirk:* I just want to encourage people to look at the graphic on page 9 to illustrate how this Environmental Assessment process is years long with many phases, and the little box that's popped up in that graphic is the current phase of the Environmental Assessment process. This shows some of those timelines now. Just one final thing, the website for the CEA Agency is there in bold with a reference number. I do encourage you to go to that website.
- C: *Susan Jones:* We went through this process for the Deltaport Third Berth Project and the South Fraser Perimeter Road. It was the same kind of process, and the pattern is the same. The Port comes forward with the environmental impact studies, public have input, and then there's these little charts that come back, which is supposed to be all the feedback from input like this. All the feedback from the Port was repetition quoting pages from the Environmental Impact Statement. There was no escalating information, it was just a repeat of page 40; the study on marine birds. All the work that some of us went to, the hours of reading those documents and commenting, and all we got back was a repeat of the same studies. There was no new information back to the public.

Environmental Assessment Topics

Rhona Hunter discussed the role of valued components and intermediate components in the environmental assessment processes and how these are used to develop mitigation plans (page 10 and 11 of the Discussion Guide).

- Q: *Ian Robertson:* You have given us an example of one thing, do I take it that this is this just an example? In other words, there may be many other project effects?
- A: *Rhona Hunter:* Absolutely, this is just an example.
- Q: *Ian Robertson:* Who sets out the charts that you are using to study these various phenomenon?
- A: *Rhona Hunter:* It's a process that is undertaken within many kinds of environmental impact assessments. Our team of scientists and experts, primarily through the Hemmera team, are the ones that set out these pathways of effects. These pathways of effects are part of our Environmental Impact Statement document.
- C: *Ian Robertson:* I'll leave it at that for now then, thank you.
- C: *Rob McCandless:* This is good as far as it goes, however you didn't mention anything about a baseline or indicators. Ideally, the Port should be able to explain in the environmental assessment process what the delta was like before Tsawwassen and before the existing port. When Tsawwassen was built, what happened? Once you get that done and you have to get that properly certified by qualified people, registered with a BC College of Biology. We have to have some credentials at least. These people are publically accountable and are articulate in things that they can explain. To explain what the baseline was, you need to talk about when the ports were built, then we would have something to understand what was there before. My own particular issue was that the Port didn't seem to have done proper sediment and flow studies in the past, with respect to the mitigation. It is easy to do flow measurements, and it's easy to do sediment studies, but you have to be able to say without a shadow of a doubt that "there's this much water and this much sediment going through the channel now, and after we change it, it's going to be like that". You do

the baseline, and then you are in position to be able to explain what's going to happen. The indicators is another big subject, and I'm not a biologist so I can't go into it. How will you know your mitigation is going to work? It's because you have to prove it. And not only that, but you have to say "if you've done it right then this will happen, and this will happen by this date, etc." It is much more rigorous than what you have outlined here.

- C: *Doug Massey*: I agree with everything that he said. You should treat the Fraser River estuary as it was so that when you are moving into the estuary for the development, you bear in mind where you are. You are in the Fraser estuary, which was created and brought life to the fish and the people. You are not treading that carefully. How can you decide on this without biologists? They gave reports years ago that said don't do this unless you do it in a way that's not going to need further mitigation. Why don't you construct these things in a manner that will allow the current and flows to remain the same? The points I have made in my previous submissions, and my father before me, he said the same thing: unless you have these currents and tidal flows, you are going to destroy it for what it is. You are looking at the whole Fraser estuary, you have not allowed for the current flows. You didn't do it then and you aren't doing it now. You don't have biologists on your staff from the Department of Fisheries and Oceans. That's who you should have. The Department of Fisheries and Oceans should be telling you what you can do, not you telling us what you are going to do.
- C: *Jako Krushnisky*: There is going to be port growth requirements for sure. The Port has an opportunity to advertise itself with its significant facilities, all across North America, and to be a first mover; to do things right. And like Doug points out, they haven't. The foreshore damage is there. I can see it from my house. I'm on record many many times with complaints for noise violations. If the Port were under municipal bylaws, the Port would be written up many times over for the noise violations that are occurring. It is simple: plug the ships in. There's many excuses why that's not happening, and everyone pushes the responsibility to someone else. Maybe it takes legislation? I don't know, but California has done it the right way, by ensuring through legislation that ships need to be plugged in. We see that the port downtown reports a small percentage of ships plugging in. So, if we go by your record of what is happening in phase one, it's not good. I can show you pictures and reports from my neighbors down my street. Their toddler has coal dust all over his clothes and on his hands and feet. They've had people to swab the place twice. My backyard, same thing. I wipe the coal off my hands every week. This is really well-understood locally. It seems the Port behaves just like sticking their head in the ground and doesn't care, and it's just plain wrong. If you want the second phase to go through, you should clean up your act in the first phase.
- Q: *Roger Emsley*: Building on the point about baseline, once you have the baseline, you are imposing such massive changes on the most valuable ecosystem, certainly on the West Coast, and probably on the whole of Canada. Given that you are imposing such a massive change, how can you predict what is likely to happen once you have made that change?
- A: *Rhona Hunter*: That is why we do employ biologists, and we have at least three that I know of on staff, including ex-DFO employees, who are now working on the Project. So we do use baseline studies as well as extensive modeling and sampling that's been done in the field to model to predict changes, and those changes are in fact the premise in which we determine what our potential impacts are, as well as identifying opportunities for mitigation to avoid those impacts.
- C: *Susan Jones*: On page 11 were looking at these so-called measurable components. The 1979 panel says whatever you do, don't build where you are building Terminal 2 now. The Department of Fisheries and Oceans wrote that you can't build there, and you can't go there. It's too harmful to fisheries. Then we have the third berth, the baseline was 2003? So they didn't go back to where

they started all of this damage in the Roberts Bank area. So we don't even have a very good baseline. Nowadays, studies come from Port Metro Vancouver. No scientists have their names on studies with signatures. Port Metro just releases a study saying this is what we did and these are the results, and nobody puts their name or signature down. Conclusions don't seem to jive with the information in the study. Now you're telling me on page 11 that you were able to measure all of this? This is new to me, I have never heard of anywhere in the world that can measure all of these things that are happening out in the Fraser River. You must have a secret formula that the rest of the world doesn't know about. The impacts here are so far reaching – locally, provincially, nationally, and internationally – and all of a sudden you've got this little chart and you're saying you can measure this. I'm sorry, but I have a big question mark about that.

Potential Environmental Mitigation Concepts: Light

Rhona Hunter presented the proposed mitigation concepts to address Project-related effects of light (page 12 of the Discussion Guide).

- Q: *Liz Walker:* Have you focused on the destruction it may cause to migrating birds, and to the biofilm, and the actual vegetation on the shore?
- A: *Rhona Hunter:* We have looked at lighting effects to the human populations, as well as to the marine and bird population.
- Q: *Judy Williams:* Why isn't it mentioned there then?
- A: *Rhona Hunter:* It is actually, if you look, the Environmental Impact Statement will describe the potential project-related effects of light, the intermediate components on marine fish, coastal birds, and human health and the visual quality from viewpoints near the project.
- C: *Vic Rivers:* These mitigation measures, in effect, never happened. We knew we needed shielded lighting. We knew that during construction we needed lighting to face a different direction. But this never happened. Nobody paid any attention when these were raised during the construction, and since. I met recently with Eric from TSI and he tells me that they would have had additional light standards on the existing ports because they don't have enough light. Yet when we talk to them about putting shielding and changing the types of lights, it doesn't seem to happen. They're not interested. We have told them over and over again, including the Corporation of Delta who spent I think \$75,000 on a study to tell them how they should install the lighting on there, and they totally ignored it. They just went ahead and duplicated DP1 and DP2. This looks good on paper, but when it actually gets built, none of this stuff is going to happen.
- C: *Judy Kirk:* What I think you are saying, in summary, is that you think these mitigation measures on paper are alright, but you are not confident that the mitigation measures on the page are going to be put into practice.
- C: *Vic Rivers:* That's right. It doesn't happen.
- C: *Rhona Hunter:* So this process leads to an authorization by the Minister of Environment that will set out conditions of approval, and aspects such as lightening requirements will be part of the conditions for approval. So the authority to regulate the development of the project will lie within the conditions of approval of the project if it is put forward as an approved project by the Minister.
- Q: *Judy Kirk:* Do those conditions have the force of law?
- A: *Rhona Hunter:* Yes, they do.

- C: *Vic Rivers*: I was on one of those big cranes a couple weeks ago looking at the terminal area, and the lights that are on those big, high 30 meter tall standards. They are supposed to be set at 57 degrees in order to cut off light, but they don't follow that. So you wonder why you have light leaving the port. They are not aiming down at the work area, but out at the residential area.
- C: *Susan Jones*: You might have lots of great intentions, but safety overrules everything. So, you may want to pick the local people that know about wildlife and everything, but the safety board gets in there and says you need more lights so it lack credibility, and even your ability to report lacks credibility. People working out there need the lighting. It hasn't been done to date. There is lack of credibility.
- C: *Roger Emsley*: Number 1: the community feedback line is useless. People call in, and nothing happens. Number 2: we went through this with Deltaport Third Berth Project and we were told the lights would be pointed down and that we could mitigate the impacts on Tsawwassen. It didn't happen. As Susan has indicated, we have now recently been told that for workplace safety, light intensity is going to go up. So, you put all of that together, and you realize what's in the discussion guide is meaningless, both in terms of the residents and the wildlife. And what is not in the guide is the impact as far away as the Gulf Islands, because I have heard from people in the Gulf Islands who are already bothered by the light, and given where T2 is going to be, it's going to be that much worse.
- C: *Rhona Hunter*: The Gulf Islands are included in our light analysis, so we have taken those visual aspects and viewscapes within our analysis and will be addressed within the Environmental Impact Statement.
- C: *Jim Northey*: One of my concerns, because I overlook the port, is blinking lights. Why do they have to make lights blink? I have no idea. If you can't get the effect by changing colors or something else, then I don't understand why you put the lights on.
- Q: *Jako Krushnisky*: Does this assessment cause for improvements to be retro-made to the existing facility?
- A: *Rhona Hunter*: No.
- C: *Judy Kirk*: That's a good question though, Jako. But Cindy, I think you're here and you should explain that you're not with the project, but you do represent the rest of the Port, correct?
- C: *Cindy McCarthy*: Yes, that's right.
- C: *Judy Kirk*: So I think the point I'm making here is I assume you're listening hard.
- C: *Cindy McCarthy*: I'm taking notes, and the meeting minutes will be in great detail as well.
- C: *Jako Krushnisky*: And I would concur with Roger that the phone in line is useless. I've been told that it's probably going to get worse and I should move. On a couple of occasions I was actually told that.
- C: *Judy Kirk*: So when you say it's useless, do you mean that you don't get an answer?
- C: *Jako Krushnisky*: Well, these are bigger questions. How would you stop low-diesel generators from affecting you? I have to wear earplugs some nights. How does that change? How do you change the debris that ends up in the yard? Or God help us if it is in our lungs? I'm not sure the exact impact of diesel particulates and the coal dust have, but it must be being inhaled, because it's all over the place on the property and on the streets.
- C: *Rhona Hunter*: So I do want to take an opportunity and just address shore power operations. It is in

place to retrofit Deltaport at this time, so there will be, in the relatively near future, the ability for ships to plug in to Deltaport. The proposed Project will also have shore power capabilities for all three berths. So as the ship fleet matures or is regenerated, and ships are capable of plugging in, ships will be plugged in at both facilities.

Q: *Jako Krushnisky:* How do you compel ships to plug in? They're just not going to.

A: *Rhona Hunter:* They will because it will be accessible and, currently there is no regulations but I can't speak to in ten years' time whether there will be regulations for them to do it, but this project won't be built for ten years.

Q: *Jako Krushnisky:* But what about the existing one?

A: *Rhona Hunter:* We need to first be able to allow ships the option, and the fleet has to have the capability to be plugged in.

C: *Kyle Robertson:* For ships to plug in, you have to have the plug on the correct side. So it's not simply that. The ship has to have the capability to plug into the right system, and we have to have the capability to plug it in. So Deltaport's Third Berth will soon have that capability. We are working to install that capability. There are incentives for ships that the Port provides to plug in and those incentives would be enough for them to do exactly that if they have the plug to do so. Container ship fleets are getting newer and newer, and by the time the Roberts Bank Terminal 2 project is built, we anticipate all ships would use shore power.

Q: *Jako Krushnisky:* What about Terminal 1?

C: *Kyle Robertson:* The third berth does have this capability.

A: *Rhona Hunter:* The first two berths will be retrofitted as well.

Q: *Susan Jones:* So when will that all happen? The first two berths? For shore power?

A: *Rhona Hunter:* I don't have an exact timeline now, but it's in the works.

Q: *Susan Jones:* If it is there, why aren't you using it?

C: *Judy Williams:* I just want to preface this with a comment you just made, Rhona, about how it won't be plugged in before 10 years, that sounds suspiciously like it's a done deal, I hope it's not. I hope that's one of the reasons we're at this table. When you said "we did take into account marine mammals" and so forth, in the examples that you gave there, you don't mention it. I travel quite frequently to Costa Rica, and see the impact of non-shielded lights even though the promises were there that they would be shielded. It is killing marine mammals such as the leatherback turtle. I am sorry, but I have no faith in your ability to shield or use to use lights that are going to take mammals and sea life off course in their migratory pursuits, whether above or in water, whether they're migrating at night or during the day. I'm sorry, but this whole thing is just abysmal. You need a comprehensive plan for the estuary. What Port Metro Vancouver is doing is outrageous.

C: *Vic Rivers:* When I met with Eric Waltz, President of TSI, I asked him point blank when DP3 is going to make use of its infrastructure. He told me straight, it is not going to happen anywhere in the near future. And I asked "why is that?" And he said "we are waiting for the international marine organization to come up with a standard for all ships to be able to plug in to a standard type of connector between the ship and the shore". So don't expect to see it in DP3 or near future, because that's what he told me.

Potential Environmental Mitigation Concepts: Noise

Rhona Hunter presented the proposed mitigation measures for Project-related effects of noise (page 13 of the Discussion Guide).

- C: *Roger Emsley:* Quick comment on shore power. California requires 50% of the vessel calls to be connected to shore power. In 2017 it's going to 80%. The result is that we get the dirty ships because they know they can't go there. They call on a regular basis, two different vessels from overseas container lines. We regularly we see the impact of those vessels. In terms of the dirtiness and the muck that is coming out of the smoke stacks, it's evidenced by what is being deposited up on the bluff. The generators are running the whole time, causing noise. We've got this the wrong way around. You should have a firm plan to put in shore power on Deltaport before you even start with Terminal 2.
- Q: *Patrick Thompson:* They're using higher frequencies, so that we aren't able to hear them, what about the wildlife?
- A: *Rhona Hunter:* That would be considered within the assessment.
- C: *Rob McCandless:* This also involves light. Port Metro Vancouver is a federal agency, and it can ignore provincial environmental laws. There's nothing federal that governs light or noise. Environment Canada looked at noise back in the early 70's and said that was up to the provinces, so they left it alone. So even if you go to the Environmental Assessment hearing, there is no way that you that can be held accountable for complying with what you said you were going to do, and there's no one to shut you down because you made too much noise or too much light. You're a federal jurisdiction, you are above all of that. In fact what you should do is negotiate something with Delta and with the province, to say these are the standards you will need.
- C: *Rhona Hunter:* I think it's important we go back to the example pathway of effects on page 11. Noise and air are actually intermediate components that the federal agencies do regulate.
- C: *Kyle Robertson:* The Environmental Impact Statement Guidelines describe what we need to assess for this project. We do need to understand what the changes to light and noise from this Project would be. We have some of the best people in that field conducting this work so that we can identify the change, and ultimately what the change and effects mean for the people and the wildlife.
- C: *Rob McCandless:* I understand that. You will make commitments, probably very good commitments. But I am talking about compliance and making sure that you do it. There's been examples mentioned here of where people had expectations about your performance and they weren't met.
- C: *Judy Kirk:* Ok, the point is, you are concerned the Port will not comply and there is not a body to make them comply.
- Q: *Rob McCandless:* There is no body that can make them comply, particularly with respect to noise. Noise, as you know, varies by temperature, humidity, wind, and the frequency of the source. It all adds up. To say that you aren't going to make noise would be much more significant if you had something that stated "sound intensity from this distance from this object shall not exceed X on the A scale", or something like that. That's the way it needs to be spelled out. That's the way it needs to be presented. Noise from trains is another one. Can the Port hold the trains and hold the ports to do the loading at specific times, and not in the middle of the night? Do you have that power?
- A: *Kyle Robertson:* Within Port jurisdiction.

- Q: *Rob McCandless*: What does that mean?
- A: *Kyle Robertson*: To the end of the causeway.
- C: *Peter van der Velden*: There's actually a perfect example of that, and I'd like Mr. Robertson to talk about this. Several weeks ago at Fraser Surrey Docks, there was a cloud of soy dust that was released. Metro Vancouver fined Fraser Surrey Docks with a slap on the wrist of \$1,000. Fraser Surrey Docks has refused to pay that. They have said to Metro "you don't have the jurisdiction". So how can anybody in this room feel comfortable with what you're offering us if that's what's happening? Maybe you can explain that. I asked earlier about the relationship between Port Metro Vancouver and Fraser Surrey Docks because this is exactly an example of how they are not complying with local requirements.
- C: *Rhona Hunter*: I don't think we can comment on a permitting issue between a tenant of Port Metro Vancouver. We are here to talk about the proposed Roberts Bank Terminal 2 Project. We are not involved in that permitting relationship.
- C: *Judy Kirk*: I think Peter, what I'm hearing from these two individuals, is they are not comfortable commenting or providing an answer to a question about Fraser Surrey Docks.
- Q: *Peter van der Velden*: Isn't that why we're here?
- A: *Judy Kirk*: No it's not. We are here about the Roberts Bank Terminal 2 Project.
- C: *Judy Williams*: I left out two examples before with light. One of them was when UBC was building marine towers, we got on them about fatal light at night. They promised they were going to put in blinds and have the students shut them, but of course that hasn't worked. The other thing is that I want the Port to take this down and be very aware of the Terms of the Tennessee Valley Authority on nesting herons and what levels of light and noise will impact those birds when they're trying to sit on their eggs. I think that's critical because they are the definitive authority of that. Lateral, vertical, both. And you should be taking that into account.
- C: *Ian Robertson*: If I can just address two or three points. One of them is the noise point. I actually lived on the block for 10 years. TSI put monitors in my backyard to measure the noise level from the terminal, and based on the studies that they did, they took mitigating measures. Secondly, when I lived there, most of the nights we noticed the background noise from ferry traffic, and there was much more noise coming from ferry traffic than ever came from the port. Regarding coal dust: I think the Port should look at what they do in Australia. You can actually lay a white table cloth on a coal terminal in Australia and not pick up any coal dust. They have a much cleaner operation than you would ever see in Westshore Terminals. Westshore Terminals, after all the coal dust problems, are only now putting in dust suppression equipment which is up to date with modern standards. This is something that should have been done many years ago. The Port should have had this information to enact preventative measures for coal dust coming into Tsawwassen. And it's only just now that they are doing it. They still don't have the procedures that they have in Australia. I advise the Port authorities to look at the procedures that they have in Australia to mitigate coal dust within the terminals.
- Q: *Rod Asher*: Just on noise. I agree with the lady in the corner. During the construction stage, especially if you're working 24 hours a day, it will be very noisy on the beach. Do you know what would happen to the wildlife? The bird life that are nesting and migrating to and from? Do we know what the danger will be to the bird life?
- A: *Rhona Hunter*: The construction methodologies and schedule are part of the Environmental Impact

Assessment, and their effects on human health and the natural environment.

Q: *Judy Kirk:* So, in other words, if I could paraphrase that, you will be studying the impact of the construction noise on the wildlife that this gentleman is mentioning?

C: *Rhona Hunter:* Yes.

Q: *Rod Asher:* Do you really know how much noise it will be?

A: *Rhona Hunter:* We've employed the best science and the best minds to make that determination.

Q: *Rod Asher:* Will you be working 24 hours a day? I assume you would?

A: *Rhona Hunter:* In our current schedule, I don't think we have it refined down to whether it will be a 24 hour schedule or not.

Potential Environmental Mitigation Concepts: Air Quality

Rhona Hunter presented the proposed mitigation measures for Project-related impacts on air quality (page 14 of the Discussion Guide).

Ecosystem Productivity

Rhona Hunter presented a description of ecosystem productivity, as well as how this approach is being used to model potential changes in the ecosystem at Roberts Bank (pages 15-17 in the Discussion Guide).

C: *Ian Robertson:* I have questions and comments around air quality. I have material that comes from the Port of Los Angeles. They ship about 8 million TEUs, which makes it smaller than what you're proposing to do. They report that truck, ship, and rail pollution coming from the port were the largest source of air pollution in Southern California in 2006. The port was held responsible for 2,000 cases of cancer per million. To put that into context, that's 80 times the surrounding area. 80 fold increase in cancer. 47 tons of nitrous dioxide. The port installed the first alternative marine power in 2004, and they've gone on from there. If I go down to the Port of Long Beach, they report that diesel air pollution from 2005-2013 has declined by 82% since 2005, and a drop in diesel emissions from smog forming nitrous oxides and sulfur oxides have been cut by 54% and 9% respectively. Is this something you can say you've done? Is there something you've done to convince us that you will be able to manage those types of pollutants in the future? Or have you simply said in 10 years' time you will be able to plug in? Like a lot of people here, I'm a little frustrated because I live close enough that I see the effects and I don't get the sense that there is any real commitment to mitigating the effects and taking us back to something close to what once was. You are basically saying that it's coming and to get used to it.

C: *Rhona Hunter:* Kyle, can you take an opportunity to outline some of the initiatives that we have currently underway in terms of addressing that?

C: *Kyle Robertson:* Certainly. We'll go back to page 14 and to those four initiatives. A lot of those decreases in air quality in that you've described in that paper, we are anticipating here as well with changes in fuel standards. In the future we are anticipating fuel standards will change due to the new North American Air Quality Initiative that is bringing those new technologies aboard to improve air quality. We've seen that over the past few years, and we anticipate that to continue. These initiatives, like the truck licensing system and the collaboration that we have with the Port of Seattle and Port of Tacoma are all ones that are really gearing to improve the air shed in this area.

Q: *Ian Robertson:* Do you have statistics showing what you've done to improve in the last 10 years?

- A: *Rhona Hunter*: Our Sustainability Report has statistics on air quality.
- Q: *Ian Robertson*: This is a case where the Port of Los Angeles talks about deaths being related to the Port, and the Port of Long Beach showing how they've reduced the pollutions in the last 10 years. I take it in this context, that you basically want to almost double the size of the Port. The question is where is the proof that you have managed these things successfully in the past to convince us that we should support your growth?
- Q: *Judy Williams*: I call your attention to the bottom of page 14, the last paragraph where it says "the proposed project has been designed to include shore power connections which allows ships to plug in". That should read "will require ships to plug in". The next paragraph following, where it says "proposed measures to mitigate effects on the Valued Components of human health due to changes in air quality will be outlined in the EIS and could include" should read "should include". On page 15, when you talk about the cumulative effects of this project on the Fraser River estuary, are you taking into account the possibility of spillage? Because the province government and the CEA Agency has allowed the transport jet fuel into the south arm (of the Fraser River) which we are now challenging. Is that factored into that cumulative effects? Because if it isn't, it should be.
- A: *Kyle Robertson*: As it relates to shipping around the Port and as it relates to this project, we are looking at the cumulative effects. We have what's called a Quantitative Risk Assessment. It's looking at the amount of shipping activity and the probability for an accident to occur, and that's going to be captured in our...
- C: *Judy Williams*: We've given you the statistics by our safety experts and our paper. You have those statistics, and there will be spillage. Not only from ship traffic from transporting it from ship to shore and shore to ship, but also from a major spill of a vessel going up the defunct roof of the tunnel that they want to remove so that they can get the bigger ships in.
- C: *Roger Emsley*: I'm on page 15, on the right hand column. This Technical Advisory Group, it talks about who's on the group. It starts off by saying it included experts from government agencies. I did some checking. This is misleading because the individuals that were there, were there as individuals. They were not representing government agencies. At least that's what I've been told. I think there is the potential for people to read this and think "oh, well all the key government agencies, DFO, Environment Canada, and so on, were there and so if they developed it, they had to have approved it". That is not the case. I am troubled.
- C: *Kyle Robertson*: We asked for experts around the world and regulatory agencies to participate in our Technical Advisory Group. They were there to provide us guidance in determining whether the effectiveness of our analysis is meeting their requirements as outlined in our EIS guidelines. This will be determined in the two years that follow in the panel process, where the panel will direct questions to regulatory agencies to ask if this is the case. So we have taken their advice and are trying to get the best possible science we could to direct us, and that's really where this ecosystem productivity model came about. Otherwise, what we got out of this process was to look at the ecosystem, and see the interconnections. So we're doing both.
- C: *Roger Emsley*: That's not the point I'm making.
- C: *Judy Kirk*: Roger, I think actually you're incorrect, but I'm going to note it on the record and check.
- Q: *Roger Emsley*: The problem with this ecosystem productivity approach is the potential for it to ignore what the species actually eats. You could not have chosen a worse place to build this in terms of survival of the Western Sandpiper, the vast majority of which, in their 4-5 year lifespan, will all visit Roberts Bank on their Northern and Southern migration route. Their diet is almost

exclusively biofilm. There is a great risk that you will damage, if not destroy, the biofilm on which the western sandpipers rely. You will do what Environment Canada feared in their report in 2005, and that is you will have the potential to break the chain of the Pacific Flyway with the result being population level destruction of the Western Sandpiper species. And the question really comes down to how do you mitigate for the loss of an entire species?

A: *Rhona Hunter*: So the question around what impact the Project has on biofilm and what subsequent impact it may have on the Western Sandpiper is actually part of the Environmental Impact Statement. So those very questions that you have, Roger, will be addressed and articulated both with the science as well as the ecosystem modeling.

Q: *Doug Massey*: The studies you are doing, have you based any of it on what was here before? You should be comparing the Fraser systems on what is was like before.

C: *Judy Kirk*: Yes, we've heard this before, so you are asking about baseline.

A: *Kyle Robertson*: We are looking at existing conditions, which does consider the trends and characterizes the existing conditions. It captures what has happened in the past.

Q: *Doug Massey*: My second question is, the comments made here tonight, and the ones that we submit by writing, will they be forwarded to the environmental study based on what you heard today? I think it is important these comments and concerns go to them.

A: *Rhona Hunter*: Thank you for raising that because I think that's an important piece of information. So all previous consultation, as well as this consultation, is summarized within the Consultation Summary Report, which we provide and post online. The previous two rounds of Consultation Summary Reports were included in the previous submission of the Project Description. All subsequent and past Summary Reports we be a part of the record of consultation that will be part of the Environmental Impact Statement document. So our end will continue to be provided to the regulatory agencies as part of the process.

Q: *Les Bogdan*: Has there been any modeling done on the sedimentation in the area that's going to be entrapping sediments coming out of the Fraser? And increase building up of that mudflat and actually reduce productivity because of that? Because I know our biologist had some discussion with you guys in the past and I haven't heard anything yet. Is the answer yes?

A: *Kyle Robertson*: Yes. Coastal geomorphology captures that sediment change. So that will be in our Environmental Impact Statement.

C: *Les Bogdan*: Everything I hear is that the building up of that mudflat is actually going to reduce eelgrass etc., and that's all the information we have so far.

Onsite Habitat Mitigation Options

Rhona Hunter provided an overview of proposed onsite habitat mitigation, including tidal marsh, mudflats, sub tidal reefs, sand gravel beds, and eelgrass beds (page 18-22 of the Discussion Guide).

C: *Judy Williams*: I am very concerned about this particular segment of it, and I want to get it on public record, that's why I bring it up. We ran a petition this summer at Wreck Beach about the Point Grey booming grounds behind the breakwater where Port Metro Vancouver wants to put 100 acres of dredging, which is potentially contaminated over the old booming grounds which are already beginning to restore themselves, in order to get habitat banking points, in order to justify RBT2. We got over 4,000 signatures, and of those about 87% were strictly opposed to covering up the marsh lands that are restoring themselves in that area. So I hope you don't get the credit. Fisheries may

give it to you, but they don't have to give you the habitat banking credits. I sure hope they don't.

- A: *Jako Krushnisky*: I'm just wondering if the report covers what comes out of the ballast of ships. Is it the marine crab that's aggressive and invasive? Invasive against the existing crabs?
- A: *Rhona Hunter*: Ballast water is not permitted to be discharged within the port area, and in fact they have to do a ballast exchange outside of the Canadian waters, and they can only re-ballast in port with Canadian waters. So that is specifically regulated to avoid the release of invasive species. This review does not include a study specifically around ballast because it is already regulated.
- Q: *Bernadette Kudzin*: My understanding is that you are looking at the impact and mitigation during the construction of making the proposed Terminal 2. Will you also be looking at the longer term possible impacts? Are you looking at in the future as well? Or are you just looking at the construction, and mitigating the construction? Because there are many future impacts, and that's what a lot of us are concerned about.
- A: *Rhona Hunter*: Yes, the future impacts in terms of what this potential land development would do from a coastal geomorphological view, which is the sediment transfer within that area is considered within the study. Not just at the time, but what would happen over time into the future.
- C: *Otto Langer*: I find this habitat mitigation and banking scheme almost tampering with the credits in the estuary. I wrote, and it took me at least a month of work, and no pay of course, a scientific review of your program, and I rushed to meet your deadline back in June, and the only feedback I got back was a little email saying "Oh, did you want us to accept this as a submission?" Well of course, that's why I spent a month writing it. I raised a lot of questions and recommendations, and here we are in consultation again. Do you guys run a dead letter office or are you an organization that is concerned with the environment? It's great and dandy for me to hear that you have these scientists and you know what you're doing, but I don't believe that for a minute.
- Q: *Judy Kirk*: Are you familiar with that submission? Anyone?
- A: *Rhona Hunter*: No.
- C: *Otto Langer*: You're kidding, I sent it in twice.
- C: *Judy Kirk*: We'll mark that down, Otto. We'll see if there can be a search for that.
- C: *Otto Langer*: I also submitted comments about your email system, because I was told not to send files more than a couple megabytes, I mean come on guys, get a better email system.
- C: *Doug Massey*: Otto has a great background in fisheries and I am surprised no one is listening to his input. That's what bothers me. These mitigation measures are a joke. Why not develop it in such a way that does not need mitigation. Build it so that there is so flow through there. Bring back the current flow, that's the answer. I remember those reports, 1979 and prior to that, they were really concerned about the current flow and the bio system and the biodiversity of the Fraser.
- C: *Rhona Hunter*: I'll take an opportunity to address one concern you've raised, Doug, about the breaching of the causeway. The breaching of the causeway has been studied. The concern that was raised was that by breaching the causeway you would actually cause a greater dendritic effect on the foreshore area, which means that the coastal geomorphology would be more adversely affected by that breaching, and that there would be currents and velocities within those breaches that would be prohibitive for the migration of the fish through those areas. We have that on our website now, and we can certainly send you information on what we've done in terms of asking and addressing that specific question.

C: *Julie Hobart:* If we were all prepared to reduce our need to purchase products from overseas and buy Canadian-made products, there would be no need for RBT2.

C: *Rhona Hunter:* One of the things we need to be aware of is that Canada is an export country, and our current import/export is fairly balanced, and that we are exporting almost in the same quantities as we are importing in the Canadian container business.

Judy Kirk wrapped up the meeting and encouraged participants to complete the feedback form and encourage their friends and others to participate.

The meeting ended at 4:00pm.