

NUNAVUT IMPACT REVIEW BOARD'S HEARING REGARDING THE
REVIEW OF AGNICO EAGLE MINES LIMITED'S
WHALE TAIL PIT PROJECT PROPOSAL

FILE: 16MN056

HEARING HELD AT
BAKER LAKE, NUNAVUT
VOLUME 2
SEPTEMBER 20, 2017

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1 (PROCEEDINGS COMMENCED AT 9:03 AM)

2 THE CHAIR COPLAND: Good morning. Hello. Is the
3 mic good?

4 Okay. Good morning. Let's start our meeting.
5 And the people that just came in, welcome.

6 We were supposed to be here yesterday early, but
7 they came in late last night. I'm going to ask right
8 now Tattuinee this morning to open our meeting with a
9 prayer.

10 Somebody hand Mr. Tattuinee a mic for morning
11 prayer.

12 (OPENING PRAYER)

13 THE CHAIR: Thank you.

14 As well, we would like to send our condolences to
15 Cecilia Maktaaq's family. I know we cannot control our
16 lives. We feel for the family that just lost their
17 loved one. We'll think about them.

18 Moving on to the hearing, as we have been delayed
19 a short -- well, delayed a day, we are going to ask the
20 proponent to condense or summarize their presentations
21 as much as possible. And we wish to cover everything
22 in as much detail as necessary. And I'm going to ask,
23 when it comes to questions, to keep your questions to
24 the point and not to repeat.

25 Starting tomorrow, the people that are here, we
26 will hear from them on Thursday and Friday. You will

1 be able to ask questions and voice your concerns, the
2 people that are here as well. We're going to start off
3 with questions. What we're talking about right now,
4 Whale Tail Pit Project.

5 Okay. We heard two presentations yesterday, one
6 on introduction and overview of the project and another
7 on public participation and engagement. We're going to
8 go down to questions on these two presentations.

9 Starting with KIA, Kivalliq Inuit Association, any
10 questions to the proponent?

11 Kivalliq Inuit Association Questions Agnico Eagle Mines
12 Limited

13 MS. GILSON: Good morning. Thank you,
14 Madam Chair. Kimberley Gilson, Kivalliq Inuit
15 Association.

16 Questions -- with respect to timing, in order to
17 shorten the question, I will just -- rather than point
18 out the specific slides -- note that in the
19 presentation yesterday we seem to have differing dates
20 for the project to be in production.

21 So, for example, it -- at one place on Slide 7,
22 you're mentioning end of production in the year 2021;
23 and in Slide 12, it seems to be that production is
24 ending in 2022; and as we go through the materials, in
25 Slide 22, it appears that operation goes to 2023; and
26 that, again, seems to be beared out in Slide 25.

1 So my first question is if you could please --
2 because people are interested in knowing the length of
3 term for jobs, for contracting, and so on. If you have
4 a more certain expectation, given that we seem to have
5 a range of years set out in the materials.

6 Thank you.

7 MR. QUESNEL: Good morning. It's Jamie
8 Quesnel, Agnico Eagle. Thank you for your question.

9 Just to clarify, dealing with the FEIS and also
10 our submitted interim closure plan, the operational
11 window is from 2019 to 2022. And as we stated in our
12 FEIS, it was always a three- to four-year range. So
13 with the four years, it's 2022.

14 Also, our closure stage is 2022 to 2029 and our
15 post-closure, 2030 to 2035. However, based on our
16 agreed security agreement with the Kivalliq Inuit
17 Association, Indigenous and Northern Affairs Canada, we
18 adjusted the post-closure stage from 2030 to 2046.

19 Thank you.

20 MS. GILSON: Thank you, Madam Chair.
21 Kimberley Gilson, Kivalliq Inuit Association.

22 Thank you, Mr. Quesnel. That helps.

23 Then can you also clarify for us -- so we're all
24 certain with respect to a potential production gap. So
25 we were looking at Slide 13 where it indicated that the
26 Whale Tail Pit was 2018 to 2022 operation; and in

1 Slide 14, you're mentioning a production gap between
2 Q3 2018 and Q3 2019.

3 So, again, with your clarification of dates, could
4 you please ensure that we have an accurate
5 understanding of what, if anything, is the production
6 gap between the existing Meadowbank mine and the Whale
7 Tail Pit.

8 Thank you.

9 MR. QUESNEL: Jamie Quesnel, Agnico.

10 The 2018 to 2019 window at Whale Tail, that's the
11 construction window based on receiving the permits July
12 2018 or earlier. The production gap is related to
13 Meadowbank as the life of mine. The ore at Meadowbank
14 is exhausted the third quarter of 2018. So there's a
15 gap in production during that window where the
16 construction at Whale Tail would occur. Then the
17 production from Whale Tail Pit would commence in 2019.

18 Thank you.

19 MS. GILSON: Thank you, Madam Chair. Those
20 are all our questions.

21 THE CHAIR: Did you say that was all the
22 questions? Okay. Thank you.

23 Any questions from the Baker Lake HTO?

24 MR. AKSAWNEE: Thank you, Madam Chair.

25 No questions.

26 THE CHAIR: Any questions from the

1 Government of Nunavut?

2 MR. PINKSEN: Thank you. Steve Pinksen,
3 Government of Nunavut.

4 No questions.

5 THE CHAIR: Environment and Climate Change
6 Canada?

7 MS. PINTO: Thank you, Madam Chair.
8 Melissa Pinto with Environment and Climate Change
9 Canada.

10 We have no questions at this time.

11 THE CHAIR: Fisheries and Oceans Canada.

12 MR. D'AGUIAR: Thank you, Madam Chair. Mark
13 D'Aguiar, Fisheries and Oceans Canada.

14 We have no questions.

15 In addition, I would like to introduce our
16 colleague who made it to Baker last night, Bev Ross.
17 She's the regional manager of regulatory review joining
18 us.

19 THE CHAIR: Welcome.

20 Any questions from Indigenous and Northern
21 Affairs?

22 MS. COSTELLO: Good morning, Madam Chair.

23 Indigenous and Northern Affairs has no comments at
24 this time.

25 But I'm also happy to report that the Indigenous
26 Northern Affairs team is now all present. Our

1 colleague arrived from Winnipeg, Amanda Belanger, last
2 evening.

3 Thank you.

4 THE CHAIR: Thank you. Welcome.

5 Any questions from Natural Resources Canada?

6 MS. BESNER: Rachelle Besner, Natural
7 Resources Canada.

8 I have no questions.

9 THE CHAIR: Any questions from the Nunavut
10 Impact Review Board staff?

11 MR. BARRY: Thank you, Madam Chair. Ryan
12 Barry, Nunavut Impact Review Board staff.

13 We have no questions on this topic.

14 THE CHAIR: Any questions from the Nunavut
15 Water Board?

16 MR. KHARATYAN: Thank you, Madam Chair. Karen
17 Kharatyan, Water Board.

18 No questions at this time.

19 THE CHAIR: Thank you.

20 Any questions from the Nunavut Impact Review
21 Board?

22 Kaviq.

23 Nunavut Impact Review Board Questions Agnico Eagle
24 Mines Limited

25 MS. KALURAQ: Thank you. Kaviq Kaluraq,
26 Nunavut Impact Review Board.

1 In your first presentation on the introduction,
2 you -- on Slide 16, you were showing the capacity of
3 the proposed haul trucks. Is Agnico Eagle currently
4 using haul trucks of that kind and capacity, or are
5 they new?

6 Mat'na.

7 MR. QUESNEL: Thank you, Madam Chair and the
8 Board.

9 Dealing with Slide 16 with those heavy haulers,
10 that would be new to the operation at Meadowbank. And
11 the capacity would be 150 metric tonnes. So they're
12 more roadworthy than the typical haul trucks that we
13 have in Meadowbank just based on the distance of the
14 haul. They are utilized in other operations in the
15 south. So they're not new to the mining industry but
16 new to the Meadowbank operation.

17 Thank you.

18 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
19 Kaluraq, Nunavut Impact Review Board.

20 Thank you for that clarification.

21 And in your presentations, the Inuktitut
22 subtext -- or, actually, in the Inuktitut text, there's
23 a lot of English text referring to "Whale Tail" without
24 an Inuktitut name, and there's also acronyms in
25 English. For the benefit of the participants that
26 don't read English, it would help to have all the

1 Inuktitut section in syllabics.

2 Mat'na.

3 MR. QUESNEL: Jamie Quesnel.

4 Noted. And we'll make those changes.

5 Thank you.

6 THE CHAIR: Thank you.

7 Phillip.

8 MR. KADLUN: Quana, Madam Chair. Phillip

9 Kadlun, Nunavut Impact Review Board.

10 My question is regarding the operations of the
11 road. Yesterday we've heard that the road will be used
12 24/7. My question is -- it's regarding caribou
13 mitigation measures. I'm wondering as to whether --
14 how Agnico Eagle would monitor caribou in the time of
15 darkness. We're only limited to a few yards at times
16 when it's really dark, and you can't see caribou
17 approaching until you're right there. And how is that
18 different than the caribou mitigation measures in
19 regard to the time of darkness in different seasons?

20 Thank you, Madam Chair.

21 MR. QUESNEL: Yeah, Jamie Quesnel,

22 Agnico Eagle.

23 Yeah, we have multiple layers of mitigation and
24 monitoring. One component would be related to the
25 collaring program where we can get information on a
26 daily basis. And, also, we have additional information

1 in the upcoming presentation on terrestrial environment
2 with our terrestrial ecosystem management plan, the
3 decision trees.

4 But possibly Ryan could just add a little bit
5 right now regarding that prior to that presentation, if
6 you wish.

7 MR. VANENGEN: Thank you, Madam Chair and
8 Board members. Ryan Vanengen from Agnico Eagle.

9 It's a good question. Like Jamie said, we'll be
10 addressing it in the following presentation in greater
11 detail. But some of the techniques that Jamie is
12 referring to is the GN collaring. That provides us
13 information. Whether it's dark out or light out, it
14 provides us information on when caribou are interacting
15 with our project. We also are looking into different
16 technology, like cameras, that could also assist us in
17 dark conditions.

18 But based on our operational experience at
19 Meadowbank, we've managed in dark conditions and will
20 continue to apply that type of mitigation and
21 monitoring on our haul road for the Whale Tail Pit
22 Project.

23 Mat'na.

24 MR. KADLUN: Quana, Madam Chair. Phillip
25 Kadlun, Nunavut Impact Review Board member. I have one
26 more question, Madam Chair.

1 This is in regards to the cultural sites you
2 mentioned on one of your slides yesterday. For my
3 clarity or for the benefit of the Board and the people,
4 I guess, that when you mentioned cultural sites -- I'm
5 thinking about lots of things. Like, Inuit and other
6 people have often seen tent rings out in the tundra in
7 certain areas. Some of those sites, you could only see
8 the rocks that are almost under the vegetation now, but
9 we cannot see down -- what's down below. For my
10 clarity, I'd like to know how do you -- do you find
11 cultural sites versus the archaeological -- when does
12 one become such and such?

13 Thank you, Madam Chair.

14 MR. VANENGEN: Ryan Vanengen from
15 Agnico Eagle. Thank you for the question.

16 The cultural sites that are referred to in the
17 figures that we presented are based on the Inuit
18 Qaujimaqatugangit workshops. So those are defined by
19 the participants, and those in some cases included,
20 like you said, campsites. They also included hunting
21 areas that were known to the group members, the elders,
22 and other members during these workshops. And then in
23 other cases, they were also identified as cultural
24 sites for travel routes. So we considered all of those
25 as kind of general information related to cultural
26 sites.

1 When it comes to identifying specific sites, such
2 as camp -- former camp tent rings and other sites like
3 that, we use professional archaeologists that have --
4 are trained and very effective at identifying those
5 sites. So what they do is they fly over the areas
6 first and then physically walk the ground to find the
7 tent rings and other campsite areas that were used
8 historically. And they're very good at identifying
9 those, certainly far better than I could.

10 And then we brought some of the workshop
11 attendees, some of the elders, also to those sites
12 after they were identified by our professional
13 archaeologists.

14 So I hope that helps clarify that.

15 Mat'na.

16 MR. KADLUN: Quana, Madam Chair.

17 That helps.

18 My other question is whether those professional
19 archaeologists are government archaeologists. You
20 know, our government has the authority to look at the
21 archaeological sites. I'm wondering whether those
22 people are government employees as well.

23 Thank you, Madam Chair.

24 MR. QUESNEL: Yeah, Jamie Quesnel.

25 The archaeologists that we use are consultants,
26 but they are in discussions with the Government of

1 Nunavut and to discuss the locations. And if there's
2 any requirement for barriers or mitigation, that's
3 discussed with the Government of Nunavut. So they're
4 independent consultants; however, they're in
5 communication with the Government of Nunavut at all
6 times.

7 Thank you.

8 THE CHAIR: Thank you.

9 Henry.

10 MR. OHOKANNOAK: Thank you, Madam Chair.

11 So I understand you're going to be dewatering the
12 Whale Tail Lake. Am I correct on that?

13 Okay. My question would be -- the lake that
14 you're going to be dewatering is rather large. I would
15 like clarification as to where to -- where you're going
16 to be pumping out the water from that particular lake
17 to the nearby -- and how many nearby lakes are you
18 going to be draining the water to?

19 And the other would be fish-out the lake as well,
20 and what are your plans for that part, fishing out the
21 lake?

22 Quana, Madam Chair.

23 MR. QUESNEL: Thank you, Madam Chair and the
24 Board. Jamie Quesnel, Agnico Eagle.

25 Dealing with the Whale Tail Lake, based on our
26 discussions -- and we have a 3-D model at the back we

1 can bring up if that would clarify some of this also.
2 And, in addition, we will have more details in the
3 upcoming presentation.

4 But the -- you're correct. The Whale Tail Lake
5 and that portion of the Whale Tail dike and the Mammoth
6 dike where the pit will be located, that component,
7 that area of the lake, will be pumped out; and that
8 will be pumped out to the southern basin of Whale Tail
9 Lake -- so in that diagram, it's the bottom portion of
10 that slide.

11 And, also, there will be a fish-out. So it would
12 be a sequenced pump-out and fish-out as that lake is
13 being dewatered. And based on our experience at
14 Meadowbank, like the original pits, open pits, that we
15 have at Meadowbank, the Bay Goose, the Portage, the
16 Vault -- we've gone through this process of the
17 pump-out/fish-out a few times, and dealing with that
18 experience, we've really refined that process of
19 dewatering.

20 So there's only going to be that one lake, that
21 one section where the pit is, and the attenuation pond
22 that will be dewatered.

23 And, also, during the fish-out, which we've done
24 recently with the Phaser pit, which is a smaller pit at
25 Meadowbank -- and prior to that, we engage with the
26 stakeholders. The Baker Lake Hunter and Trapper

1 Organization's involved with the fish-out. They're in
2 the boats with our technicians and helping, and the
3 fish will be transferred to the southern basin.

4 Unfortunately, at times, some fish are not successful
5 in that transfer, but those fish are passed on to the
6 community with the -- with the help of the
7 Baker Lake -- in this case, the Baker Lake Hunter and
8 Trappers Organization.

9 So hopefully that clarified some of your
10 questions.

11 Thank you.

12 MR. OHOKANNOAK: Thank you. That clarifies my
13 question.

14 That's all I have, Madam Chair.

15 THE CHAIR: Thank you.

16 Guy Alikut.

17 MR. ALIKUT: Thank you, Madam Chair.

18 Please put your receivers on.

19 The miners at Meadowbank, will the miners -- will
20 the miners be -- or all your haul truck drivers be from
21 Meadowbank?

22 It's going to be -- our land becomes dark in the
23 fall and winter. There's an abundance of wildlife on
24 the access road that you'll be hauling. We need to
25 know how you're going to mitigate the -- what kind of
26 mitigative measures are you going to put in place so

1 that there are -- the caribou and the wildlife don't
2 get injured or killed unnecessarily? We live off the
3 tundra and the wildlife. I'd like to understand this
4 completely.

5 So the haul road is going to be quite a distance
6 from Meadowbank. I wonder if sometime -- we would like
7 to -- I would like to know what type of plan you have
8 in place to build this haul road so that I have a
9 better conceptual idea of what it might look like.

10 Thank you.

11 MR. QUESNEL: Thank you, Madam, Board.

12 Thank you for the question.

13 Just dealing with the haul truck drivers, the haul
14 truck drivers in the open-pit location, that -- those
15 employees will be transferred to Whale Tail. We'll
16 be -- for the heavy haulers, between the haul from
17 Whale Tail to Meadowbank, those will be new positions;
18 so there will be new drivers for that haul. So the
19 existing employees operating the existing haul trucks
20 at the pits at Meadowbank, they will be transferred to
21 Whale Tail; then additional employees for the long
22 haul.

23 Just dealing with the haul road with the distance
24 and the -- and the mitigation and monitoring related to
25 caribou, I can generally speak about that, but I -- we
26 have a lot of detail in the upcoming presentation with

1 some videos explaining some of the mitigation and also
2 a decision tree. So when certain caribou during
3 migration are coming close to our operation at
4 Whale Tail, there's other -- there's an escalation of
5 activities related to monitoring and mitigation. So it
6 goes step by step. There's no caribou around; it's
7 operating normally. Caribou are coming in closer based
8 on seasonal effects; then other monitoring measures
9 kick in.

10 And Ryan and Corey, Ryan Vanengen and Corey
11 De La Mare, will be presenting that in detail based on
12 how that would work, based on our existing terrestrial
13 ecosystem management plan where we've been working with
14 the Baker Lake Hunter and Trappers Organization,
15 Kivalliq Inuit Association, the Government of Nunavut.
16 We had multiple workshops to enhance, to work on that
17 plan to make it better. So Ryan and Corey will provide
18 more detail, if that's fine with the Board to wait
19 until that presentation to define those details of
20 monitoring and mitigation.

21 THE CHAIR: Any other questions?

22 Allen.

23 MR. MAGHAGAK: Thank you, Madam Chair. Allen
24 Maghagak, NIRB Board member.

25 I'd like clarification, first of all, with your
26 presentation yesterday. I'd like clarification on the

1 project overview and introduction yesterday. You
2 mentioned the workforce possibilities. If we were to
3 approve the Amaruq extension, you said -- it said that
4 440 employees would be working at Meadowbank and that
5 you would add on -- or I'm assuming that it would be --
6 add on 210 more employees at the Amaruq extension -- or
7 the Whale Tail extension. Are these new 210 workers on
8 top of the 440 that will be at Meadowbank? And these
9 new 210 employees that you're looking at, if any of the
10 Inuit would like to take part in being part of that
11 workforce, would you be prepared to put them into the
12 possibility of the training work -- training process so
13 that they can become part of that additional workforce?

14 Quana, Iksivautaq.

15 MR. QUESNEL: Thank you, Madam Chair and the
16 Board.

17 Just dealing with clarification of the workforce,
18 the 440 at Meadowbank plus the 210 at Whale Tail, so
19 that's a total. So it would be 440 at Meadowbank and
20 an additional 210 at Whale Tail operation.

21 And, overall, these are the existing positions,
22 but there are some new positions. And Krystel will --
23 Mayrand will answer a little bit more details on that.

24 But, yes, we have -- we're hoping for Inuit
25 employment. We have the training and readiness
26 programs. That's part of our culture. That's part of

1 us. So we're open to that.

2 But I would like my colleague, Krystel, to provide
3 a little bit more detail on that process.

4 MS. MAYRAND: Good morning. Krystel
5 Mayrand, HR superintendent for Agnico Eagle. Thanks
6 for the question.

7 So to add on what my colleague Jamie has
8 explained, the concrete addition of positions with the
9 Whale Tail Project is 150 new positions compared to
10 what we currently have. So, concretely, we're talking
11 150 more employees between Meadowbank and Whale Tail.
12 The numbers presented by Jamie is the number of people
13 at site at all time. But, concretely, we will have 150
14 more people working for us to be able to operate the
15 Whale Tail Project. This is mainly justified by the
16 addition of the hauling of the ore from Whale Tail to
17 Meadowbank. And most of these positions will be heavy
18 equipment operator positions and mechanics to support
19 the addition of heavy equipment, new heavy equipment.

20 As provided in the documentation we submitted, we
21 expect that a minimum of 75 positions will be filled by
22 Inuit. Of course, this is a minimum. This is what we
23 think we can achieve in the short term with the type of
24 labour force that we can get locally. But our
25 objective is to fill as many positions as possible with
26 Inuit. Since some of these positions will be skilled,

1 we expect more challenges to fill all of them with
2 Inuit. But that's our mid- to long-term goal, to fill
3 all of these positions with local people. And the new
4 opportunities will be integrated in our existing
5 training programs, like our career path. So our
6 existing operators, all truck operators, will have
7 first priority over these new positions.

8 Mat'na.

9 THE CHAIR: Thank you.

10 Henry.

11 MR. OHOKANNOAK: Thank you, Madam Chair.

12 (TRANSLATION LOST) supplement to my first
13 question. What is your time frame for dewatering the
14 lake? And, you know, how long is that going to take to
15 completely drain the lake out?

16 Quana, Madam Chair.

17 MR. QUESNEL: Madam Board and Board of
18 Directors, it's Jamie Quesnel at Agnico Eagle.

19 We're just -- the dewatering will be starting in
20 2019. We're just finalizing the timeline. So we just
21 need one minute for that. We're just getting the
22 information to give you the exact timeline.

23 Jamie Quesnel at Agnico Eagle.

24 The diversion of -- in summary, the Whale Tail
25 Lake, the south basin, this dewatering will start in
26 February 2019 to divert the Whale Tail Lake to the

1 south basin. Flooding of the south basin will occur
2 mainly beginning during the -- fresh out of 2019 and
3 2020. By July 2020, the Whale Tail Lake south basin
4 and the flooded tributary lakes within the Whale Tail
5 Lake sub-watershed will reach a higher elevation. And
6 Ryan will provide -- my colleague Ryan Vanengen will
7 provide more details in his presentation. So it's
8 about -- it's about a one-year window.

9 Thank you.

10 MR. OHOKANNOAK: Thank you. That's all I have,
11 Madam Chair.

12 THE CHAIR: Guy.

13 MR. ALIKUT: Thank you, Madam Chair. Guy
14 Alikut from Nunavut Impact Review Board.

15 I was just reminded by my colleague, the -- when
16 you opened ten years ago -- it's been around ten years
17 since you've been in operation. The locals from
18 Baker Lake, are there more people working there than
19 ten years ago from the community? Is your workforce
20 growing from the community, or is it still the same as
21 when it started? What's the difference from when you
22 first opened to today? I just want to know what the
23 change is, whether you have more locals working for
24 Agnico Eagle.

25 That's my only question.

26 Thank you.

1 MS. MAYRAND: Krystel Mayrand from
2 Agnico Eagle Mines.

3 Yes, our workforce from Baker Lake have grown
4 since we started. We have trained many, many people
5 from this community. We have people who stayed with us
6 for a long time. There are people who decide to leave
7 and come back. Right now, our -- like, our volume of
8 labour from Baker Lake has been stable for, I would
9 say, a year and a half now. And we feel we've reached
10 a plateau that we need to take new initiatives to
11 increase the number of people. But if we go back ten
12 years, although I don't have specific numbers with me
13 right now, I'm confident to say that at least double
14 since the beginning of our operation. And our goal is
15 to increase even more this volume of workers from
16 Baker Lake, being an affected community of this project
17 as well -- will be prioritized.

18 THE CHAIR: Any other questions?

19 I just have a couple.

20 Under the public participation presentation,
21 trades are recognized or certified, and once they get
22 their tradesmanship, can that be used outside mining?
23 Or is it just trades certificate within the mine?

24 MS. MAYRAND: Krystel Mayrand for
25 Agnico Eagle. Thank you, Madam Chair.

26 For trades, we support apprenticeships. So it's

1 transferrable skills. Our employees finished their
2 programs with a Red Seal, which is a national
3 certification; and it's very, I guess, recognized
4 everywhere in Canada. All of the in-house programs
5 were given -- are also transferrable skills, although
6 they don't come with a formal certification. This is
7 one of the projects we'd like to advance with our
8 colleague of the Government of Nunavut in the future,
9 to have our in-house programs recognized as industry
10 standards so that our employees can also have a formal
11 certification. However, the current programs are still
12 aligned with mining standards; so they would be
13 recognized anyway. But as for trades, it's a national
14 certification.

15 THE CHAIR: Okay. Thank you for that
16 answer.

17 And just one more. Exploration site -- or a
18 couple more. Exploration site will be moved from
19 Meadowbank to the Whale Tail area?

20 MR. QUESNEL: Thank you, Madam Chair. Jamie
21 Quesnel at Agnico Eagle.

22 The exploration camp will be moved to another
23 location within Nunavut based on the exploration
24 activities. The camp for Whale Tail will be a new camp
25 in addition to the existing camp at Meadowbank. But
26 the exploration team has a smaller camp, and that would

1 be moved.

2 THE CHAIR: Moved where?

3 MR. QUESNEL: Part of it will be moved to on
4 the Whale Tail site, and additional parts of the camp
5 that we're not utilizing based on the expansion will be
6 moved maybe to another exploration activity within
7 Nunavut. But the exploration team has not decided
8 where that's going just based on their work plan, based
9 on the exploration activities.

10 THE CHAIR: Okay. Thank you.

11 And the hazardous material is shipped to
12 Meadowbank, and then where?

13 MR. QUESNEL: That would be shipped south to
14 Quebec. So we have -- we do this -- we're doing that
15 at, the exploration activities, Amaruq right now.
16 That's any material, hazardous material, goes to
17 Meadowbank; and for the last ten years, from
18 Meadowbank, that material is shipped south. So it's
19 sorted -- we bring a company up to sort this material,
20 to complete all the documentation -- it's loaded into a
21 sea container, transferred to Baker Lake, put on the
22 ship -- sorry -- and travels south to a designated
23 licenced hazardous material facility in the south. So
24 all the paperwork associated with that is signed off by
25 Transport Canada and others related to that material.

26 THE CHAIR: Okay. Thank you.

1 I think that's all the questions for the two
2 presentations.

3 Next presentation will be on the atmospheric
4 environment.

5 Legal counsel.

6 MS. MEADOWS: Thank you, Madam Chair.
7 Teresa Meadows, legal counsel for the Nunavut Impact
8 Review Board.

9 So, Madam Chair, for the record, we have one
10 presentation that is in English and Inuktitut that we
11 will be marking as Exhibit 3 in these proceedings.

12 EXHIBIT 3 - Agnico Eagle hard copy PowerPoint
13 presentation entitled "Part III - Atmospheric
14 Environment" (English/Inuktitut)

15 MS. MEADOWS: And, Mr. Quesnel, do you have
16 additional witnesses that need to be sworn or affirmed?

17 MR. QUESNEL: Thank you, Madam Chair. Jamie
18 Quesnel.

19 No. For this presentation, atmospheric
20 environment, my colleague Ryan Vanengen will be
21 presenting that.

22 MS. MEADOWS: Teresa Meadows, legal counsel
23 for the Nunavut Impact Review Board. Thank you,
24 Madam Chair.

25 I have no further procedural matters.

26 THE CHAIR: Thank you.

1 You may proceed.

2 MR. VANENGEN: Okay. Thank you, Madam Chair
3 and Board members.

4 For the next, we hope, about five minutes, I'll be
5 presenting on the atmospheric environment. In the
6 interest of time, we're compressing the slides -- or
7 the presentation. So there's going to be a few slides
8 that I'll just glance over rather than fully present.

9 THE CHAIR: Okay. And then you have the
10 freshwater environment. And how long would that take?

11 MR. VANENGEN: Madam Chair, that will take
12 the allotted time of 45 minutes. So we're unable to
13 compress that. Maybe we'll be able to compress it by
14 about 5 minutes.

15 THE CHAIR: Well, why don't we finish off
16 the atmospheric environment, take a short break, and
17 then we'll go to the freshwater --

18 MR. VANENGEN: Okay.

19 THE CHAIR: -- presentation. Is that --

20 MR. VANENGEN: Thank you.

21 THE CHAIR: -- good?

22 MR. VANENGEN: Mat'na.

23 THE CHAIR: Okay.

24 Presentation by Agnico Eagle Mines Limited (Atmospheric
25 Environment)

26 MR. VANENGEN: There were a number of valued

1 components that were assessed for the atmospheric
2 environment in our final environmental impact
3 assessment. That included weather and climate, air
4 quality, noise and vibration. The main Inuit concerns
5 and the focus based on our Inuit Qaujima jatugangit were
6 related to dust and dust control. The summary of the
7 final environmental impact statement is provided in the
8 documentation that we submitted to NIRB, and these
9 slides that I'm going to glance over summarize those
10 findings.

11 So we've very carefully looked at air quality and
12 dust, including emissions. We evaluated dust
13 concentrations, and we are intending to -- and we
14 propose to implement our Meadowbank dust monitoring to
15 evaluate those dust emissions.

16 In summary, our air quality and dust, we've found
17 through our -- both IQ and scientific analysis that
18 it's suggested that dust suppression may be required.
19 A key finding based on our evaluation found that:
20 (as read)

21 Cumulative results to date indicate that,
22 without dust suppressant application, average
23 rates of dustfall decline below Alberta
24 guidelines for recreational areas within
25 100 metres of the all-weather access road and
26 haul road and meet the range of background

1 rates within 200 metres.

2 Future monitoring and data analysis will inform the
3 adaptive management plan related to dust.

4 Active monitoring at the Whale Tail Pit and
5 Meadowbank site will continue. That will include
6 passive dustfall monitoring around the mine site and
7 also at Kilometre 18 on the haul road, at Kilometre 36
8 on the haul road, and at Kilometre 54, where we will
9 set up transects, which means multiple dust collection
10 cannisters in a line across the road. At each
11 transect, we'll have five dustfall monitoring locations
12 or cannisters that will be located 30 metres upwind,
13 30 metres downwind, 100 metres downwind, 300 metres
14 downwind, and 1,000 metres downwind that will tell us
15 how dust will dissipate from the road. We'll also
16 continue that same monitoring for our all-weather
17 access road.

18 Agnico Eagle's adaptive management plan for dust
19 at Meadowbank mine and the all-weather access road can
20 be summarized as follows, and we'll continue to apply
21 this for the Whale Tail Pit site: We apply dust
22 suppressants around the mine site area and around the
23 airstrip. Dust suppressants will be used in highest
24 traffic areas near Baker Lake. And where dust problems
25 persist, a chemical suppressant, such as TETRA Flake,
26 will be used. As an example, we use that on our

1 current Vault haul road at the Meadowbank mine. In
2 2016 and 2017, dust suppressants were applied in areas
3 of concern identified by the Hunting and Trapping
4 Organization along our Meadowbank all-weather access
5 road, and we'll continue to do that during the Whale
6 Tail Pit operations.

7 Agnico Eagle's adaptive management plan for
8 mitigation of the haul road for the Whale Tail Pit haul
9 road can be summarized in general as follows: We will
10 first use low-silt esker material as the preferred road
11 topdressing, and this will be used also in a lot of
12 cases for our construction of the road. After
13 construction, problem areas will be identified and
14 reported to Agnico Eagle by our staff, including haul
15 truck drivers, as well as our environmental
16 technicians; and those areas will be further topdressed
17 with low-silt esker material. Initially, if those
18 problems persist, we will use road watering to control
19 those problem areas. And where dust problems persist,
20 a chemical suppressant, such as TETRA Flake, will be
21 used.

22 Before I give our concluding remarks to this
23 topic, I would like to give the Board an overview of
24 our relevant responses and a response to final
25 submissions and also to give the Board an updated -- an
26 update on relevant discussions we have had with the

1 Kivalliq Inuit Association and Environment Canada since
2 we filed our response to final submissions on
3 August 29th.

4 The Kivalliq Inuit Association and Environment
5 Canada each raised an issue about monitoring in their
6 final written submission. With Agnico's additional
7 monitoring commitment, our understanding is that the
8 Kivalliq Inuit Association and Environment Canada now
9 considers these issues resolved.

10 And now in summary of our -- of our presentation
11 for the -- summarizing the atmospheric environment
12 final impact statement, Agnico Eagle will follow the
13 air quality and monitoring plan that incorporates
14 technical comments and recommendations by intervenors,
15 including but not limited to additional dustfall
16 transects along the Whale Tail haul road; we'll
17 continue to monitor our Vault road and our Meadowbank
18 all-weather access road to Baker Lake; we will monitor
19 dustfall in June and in August; and we will evaluate
20 air monitoring alternative methods at locations around
21 the Whale Tail Pit site.

22 Lastly, we will continue to work with the Baker
23 Lake Hunting and Trapping Organization, the Kivalliq
24 Inuit Association, and other local stakeholders to
25 ensure concerns related to dust are addressed, and we
26 encourage parties to participate in our dustfall

1 monitoring.

2 Mat'na.

3 THE CHAIR: Thank you.

4 Before we go on to the freshwater environment
5 presentation, we will take a 15-minute break.

6 Just for your information, the people that are
7 here, perhaps seven or eight presentations are going to
8 happen.

9 I'm just trying to let them know that there's a
10 few more presentations presented by the proponent on
11 freshwater environment, on the terrestrial environment,
12 on the marine environment, socioeconomics, human
13 health, management plans and monitoring programs, and
14 on accidents and malfunctions.

15 They're going to summarize once the presentations
16 are done. We will have questions after each
17 presentation, and you'll be able to ask questions on
18 Thursday and Friday. You'll be able to ask those
19 questions to the proponent.

20 (ADJOURNMENT)

21 THE CHAIR: Shall we get back to the
22 hearing, please.

23 Next presentation we have is the -- the next
24 presentation Agnico Eagle has is the freshwater
25 environment, and then we'll go into questions for the
26 atmospheric environment and freshwater environment.

1 Go ahead, Agnico Eagle -- legal counsel.

2 MS. MEADOWS: Thank you, Madam Chair.

3 Teresa Meadows, legal counsel for the Nunavut Impact
4 Review Board.

5 So I have this presentation to mark as the next
6 exhibit in this public hearing.

7 EXHIBIT 4 - Agnico Eagle hard copy PowerPoint
8 presentation entitled "Part IV - Freshwater
9 Environment" (English/Inuktitut)

10 ERIKA VOYER, VALERIE BERTRAND, Affirmed

11 MS. MEADOWS: Teresa Meadows, legal counsel
12 for the Nunavut Impact Review Board. Thank you,
13 Madam Chair. Those are all my procedural matters.

14 THE CHAIR: Thank you.

15 You may proceed.

16 Presentation by Agnico Eagle Mines Limited (Freshwater
17 Environment)

18 MR. VANENGEN: Thank you, Madam Chair and
19 Board members. So for the next -- my name's Ryan
20 Vanengen with Agnico Eagle, and for the next
21 45 minutes, my colleague, Erika Voyer, and I will be
22 presenting on the freshwater environment and
23 summarizing our waste-rock facility management.

24 The following slide presents our overview of the
25 presentation. I'm going to review the final
26 environmental impact statement related to freshwater.

1 We're going to review the water management. Jamie
2 spoke to it yesterday and answered a few questions on
3 water management, and we're going to describe that a
4 little bit farther and in greater detail during this
5 presentation. Erika's going to present on the Whale
6 Tail Pit waste rock management, and then we're going to
7 close out the presentation reviewing some of -- and
8 overviewing some of the downstream water quality,
9 fisheries offsetting, and our adaptive management
10 related to freshwater.

11 The valued components assessed in the EIS -- or
12 the Environmental Impact Statement -- were focused on
13 water quality and the protection of fish. We also
14 integrated Inuit Qaujimajatuqangit into our freshwater
15 impact assessment, and the main concerns that were
16 brought up by Inuit included the importance of rivers
17 and lakes as travel routes during the winter. Although
18 caribou is the main source of food, fish are an
19 important secondary source of traditional food.
20 However, traditionally fishing did not take place
21 within our project lake areas. That being said, we're
22 still concerned in protecting the fish, and those
23 were -- those were concerns brought up by Inuit as
24 well, and these concerns were related to the effects of
25 mining on water quality, more specifically related to
26 spills, dust, and disturbance to lakes and dewatering.

1 Furthermore, the following are Inuit concerns that
2 were brought up during the review of the Whale Tail Pit
3 Project, and these included questions related to how we
4 will move water between lakes and around the project
5 site. They were asked questions about what is being
6 done with wastewater; a question about, Will water be
7 treated so it is safe? And there were also questions
8 and concerns related to training of Inuit for water
9 sampling, the timing of dewatering and where the water
10 goes, and the timing of pit flooding. So all questions
11 that were also asked by the Board earlier, and they'll
12 be addressed in this presentation.

13 In summary of the freshwater environment
14 assessment, it was found that hydrogeology of the
15 project will cause -- the hydrogeology related to the
16 project will be -- will change as flow paths that will
17 return to baseline conditions after closure; however,
18 effects will not be significant to water quality.

19 Related to hydrology, project activities will
20 change water levels in the watershed; however, it will
21 return to baseline conditions after closure, and
22 effects will not be significant to fish habitat.

23 Related to water quality, the project will cause
24 changes in water quality, including increased
25 nutrients, but effects will be mitigated through
26 treatment and therefore will not be significant.

1 And related to fish, in summary of our assessment,
2 the project will cause changes in fish habitat, but
3 effects will not be significant.

4 So the next few slides are going to get into
5 greater detail describing the flow of water, as it
6 currently is, and then during our operations. So
7 Whale Tail -- the Whale Tail Pit Project is located
8 within the Whale Tail Lake sub-watershed. Through 2014
9 to 2015 and ongoing, we continued to better understand
10 the flow of water which goes through the Whale Tail
11 Lake south basin to the north, then through the Mammoth
12 Channel. So the water flows from this sub-watershed
13 here through the southern part of Whale Tail Lake to
14 the north part of Whale Tail Lake, through the Mammoth
15 Channel, and into Mammoth Lake.

16 And you can see from this photo on the left, all
17 of this water here naturally drains in this direction
18 through the Mammoth Channel, and this is a photo of the
19 Mammoth Channel, which is located right here.

20 So as described, the water naturally flows in this
21 direction through another sub-watershed called the 'A'
22 watershed and out into what we call the downstream
23 lakes and, ultimately, to the north and east to the
24 Meadowbank River.

25 During operations, because our operations are
26 located in the north basin of Whale Tail Lake, as Jamie

1 described, after -- after constructing the east dike --
2 or, sorry, the Whale Tail dike, the water that
3 naturally flows in this direction will then -- the
4 water level will raise and will be diverted through a
5 constructed channel and into the southern part of
6 Mammoth Lake and then will flow in the direction to the
7 downstream lakes.

8 As is common with mining projects, our surface
9 water management objective is to minimize the potential
10 impact of the project on the receiving water
11 surrounding the proposed mining activities; therefore,
12 our strategy includes reducing the amount of contact
13 water requiring management, pumping, monitoring, and
14 treatment. We'll divert non-contact water away from
15 the mine site and limit the freshwater quantity
16 requirements.

17 As a result, we have designed our water management
18 and mining infrastructure accordingly, where we
19 separate water from non-contact water, and that's
20 through this diversion; and by constructing the
21 Whale Tail dike and another dike, we then divert
22 non-contact water away from our mine site. Contact
23 water, as Jamie described yesterday, will stay within
24 this area of our project. Contact water from our
25 waste-rock storage facility will report to the sump,
26 which would then be directed to our attenuation pond

1 and, as needed, treated and discharged to meet effluent
2 criteria in Mammoth Lake. Water that's collected in
3 the pit will also report to the attenuation pond, and
4 water that's treated following use in our Whale Tail
5 camp will report to the attenuation pond after
6 treatment and then discharged into Mammoth Lake to meet
7 effluent discharge criteria.

8 These discharge limits that I've been referring to
9 have been reviewed and developed through discussions
10 with Environment Canada and are presented on the
11 following slide. Based on predicted water quality,
12 these limits will be protective of the receiving
13 environment. Because of the short duration of
14 flooding, there will not be a significant change in
15 mercury concentrations in the receiving environment.
16 We are well below safe limits for mercury. Further
17 discussions related to the environmental quality
18 criteria listed in this table will be had with
19 Environment Canada and the KivIA and will be completed
20 prior to the final Nunavut Water Board hearings.

21 These -- the information presented in this table
22 will also be presented in greater detail during the
23 Nunavut Water Board Type A final hearing next week.

24 Based on technical reviews and through meetings
25 with stakeholders, we are committed to treating for
26 arsenic and phosphorous. Treatment is required through

1 operation, and during closure -- and during closure,
2 these levels will return to baseline conditions.
3 Detailed engineering of treatment will be discussed
4 during the Nunavut Water Board final hearing process.
5 We will continue to support closure planning by
6 conducting hydrogeological modelling to validate
7 hydraulic gradients, and, if warranted, we will revise
8 pit design and/or appropriate mitigation measures will
9 be developed.

10 To ensure the protection of the receiving
11 environment, we will use our Meadowbank experience, and
12 we will construct a series of dikes to control surface
13 water, so to separate the non-contact from the contact
14 water. This includes the Mammoth dike, which is shown
15 in the figure down below here, the design of that dike;
16 and it's similar in its design to what we've
17 constructed at the Meadowbank site, which includes the
18 south camp dike, as well as the Vault dike illustrated
19 in the photo to the right in this figure -- or in this
20 slide. So the design and construction of the Mammoth
21 dike is very similar to what we've done at Meadowbank.

22 As well, we will construct the Whale Tail dike
23 using a similar design and in-water construction
24 technique used at Meadowbank for the east dike and the
25 Bay Goose dike. We will use lessons learned from the
26 east dike and Bay Goose dike to manage and control TSS

1 during the in-water construction, and we will employ
2 mitigation steps, such as turbidity current
3 installation, careful placement of material while
4 constructing the -- and careful placement of material
5 while constructing the cutoff wall.

6 We will use adaptive management steps if there are
7 indications of TSS exceeding water quality triggers
8 during construction and during dewatering of the Whale
9 Tail Lake north basin. If water quality is below the
10 trigger, discharge will be to the south -- Whale Tail
11 Lake south basin, and if it's above our trigger for TSS
12 or other parameters, we will divert the -- we will
13 divert and treat and -- if needed, treat and discharge
14 to Mammoth Lake. We will meet our licence criteria.

15 The Whale Tail Lake water management, as I
16 mentioned before, is dependent on the diversion of
17 water in the south basin of Whale Tail Lake through a
18 diversion channel and into Mammoth Lake. And that
19 diversion channel is shown in this figure here, and the
20 design of that channel is shown here. It will
21 divert -- and I'll show in the next few slides the
22 diversion of the water again. And it will divert and
23 connect Lake A20 to Pond A45, which will then drain
24 into Mammoth Lake. It's a simple channel design with a
25 2-to-1 slope and will excavate and armor that diversion
26 channel. And it's similar in its construction to

1 diversion channels that have already been constructed
2 at Meadowbank as well.

3 So that diversion channel that I'm referring to is
4 located here in this location. And as I mentioned, it
5 will divert water from Lake A20, which is this lake
6 here, into A45, and then to the north into
7 Mammoth Lake, and this will be during operations. So
8 we're operating in this area, and the water that
9 historically flowed through the north basin of Whale
10 Tail Lake into Mammoth Channel will then be diverted
11 through this channel.

12 The Whale Tail Lake natural elevation is
13 152.5 metres above sea level. The Whale Tail dike and
14 dewatering will raise the Whale Tail Lake south basin
15 by 3.5 metres to an elevation of 156 metres above sea
16 level. This increases the surface area from
17 369 hectares to 513 hectares, which is a 40 percent
18 increase in area here in the south. In July 2020, as
19 Jamie described, the water will spill through the
20 diversion channel from Lake A20 into A45 and then into
21 Mammoth Lake. That's in July of 2020.

22 So in summary, the Whale Tail Lake south basin
23 diversion consists of constructing of the Whale Tail
24 dike located here, and that construction will occur
25 from June 2018 -- and as soon as permits arrive -- to
26 February 2019. It's going to take that amount of time

1 to construct this dike and complete the cutoff of that
2 dike. And what we mean by "cutoff" is that it's sealed
3 using concrete -- a concrete mixture or a bentonite
4 mixture -- to completely seal that off. The water then
5 will be diverted, as I mentioned, from the south basin
6 through the tributary lakes and into Mammoth Lake.
7 Flooding of the south basin will occur mainly during
8 freshet of 2019 and in 2020, and by July of 2020, the
9 lake level will be up by 3-and-a-half metres and will
10 spill into the diversion channel and then into Mammoth
11 Lake. The Whale Tail Lake south basin will remain
12 flooded for a minimum of two to three years, depending
13 on operations.

14 So I hope those -- that slide deck -- or that
15 series of slides provides enough information so you can
16 understand the water management and also the water
17 diversion at our Whale Tail Pit site.

18 So what I described was -- our -- the -- our top
19 option for water management, and we used what's called
20 a "multiple-accounts analysis" to determine the best
21 option for water management at our Whale Tail Pit site,
22 and we evaluated four different options. The first
23 option was -- that we considered was pumping to Mammoth
24 Lake. The second option that we considered was the
25 channel from Whale Tail Lake to the Mammoth east basin,
26 which is this one here, so constructing a channel

1 directly through this landmass here. And the third
2 option was rerouting in another direction to a
3 different watershed to the south.

4 Ultimately, our preferred option was the option
5 that I just described, which is a channel and rerouting
6 to the south of Mammoth Lake.

7 MS. VOYER: Thank you, Madam Chair. Erika
8 Voyer, Agnico Eagle. I will continue with the
9 presentation with the Whale Tail Project waste rock
10 management.

11 Agnico Eagle will follow the effective operational
12 practices for waste rock management from Meadowbank and
13 will follow site-specific monitoring plans for Whale
14 Tail, including acid rock drainage and metal-leaching
15 sampling, waste-rock storage facility management plan,
16 and water quality and flow management plan.

17 Agnico Eagle believes that the closure of the
18 waste-rock storage facility will be controlled through
19 on-site monitoring, as well as experience gained at
20 Meadowbank and also through adaptive management. There
21 is a waste rock management plan for Whale Tail that
22 contains specific directive for management of the waste
23 rock showing metal-leaching and acid rock drainage
24 potential. Our experience at Meadowbank showed
25 successful management practices of waste rock. These
26 best practices will be applied and adapt [sic] for

1 Whale Tail.

2 Conditions of mining at Whale Tail will be similar
3 to Meadowbank. If some conditions are different, we
4 will adapt our waste rock management practices to the
5 conditions encountered at Whale Tail. If monitoring of
6 waste rock or mining practices, for example, show
7 differences at the Whale Tail Project, we will adapt to
8 maintain the closure objective for chemical stability
9 of waste rock and good drainage quality.

10 The waste rock management plan defined the
11 quantities, as well as the timing of waste rock
12 availability, and also defined the various uses for
13 waste rock material. The mine waste rock production
14 sequence is determined from every mine plan. We know
15 how much waste rock and which type we will encounter
16 during mining. The material balance is completed for
17 each year of operation. The material balance consists
18 of a calculation of material quantity, including waste
19 rock material and ore available at different stages of
20 mining.

21 With the geological information that we have for
22 the Whale Tail Pit, we're able to see distinctively the
23 zone that will include potentially acid generator or
24 non-potentially acid generator waste rock material.
25 With this information, we can complete the material
26 balance that will be revised during progression of the

1 mining activities at Whale Tail. The material balance
2 indicates the various uses for the different types of
3 material being mined. Depending on their type, waste
4 rock can be used for general construction, dam
5 construction, non-acid-generator cover required for
6 closure, and the rock can also be disposed at the
7 waste-rock storage facility.

8 The ore material is sent to the ore stockpile or
9 to the mill to be processed. Non-acid generator or
10 non-metal-leaching waste rock produced by mining
11 activity will be used for construction of the remaining
12 mine infrastructure and also for closure requirements.
13 All potential acid-generator or metal-leaching waste
14 rock material will be sent to the proper location
15 within the waste-rock storage facility.

16 What are the steps for the waste rock management?
17 First, at a baseline stage, meaning at the very
18 beginning of the project. From the geological
19 information available, we have identified the type of
20 waste rock by lithology that are present in the pit and
21 also their potential use. The rock types are
22 identified in our model of the pit for each geological
23 formation. During the mining process in the pit, the
24 geology team will conduct sampling of every blast by
25 sampling the material coming out of selected drill hole
26 during drilling.

1 The analysis of the sample is completed in the
2 laboratory on-site. We complete analysis for the total
3 sulphur, as well as the inorganic carbon, to determine
4 the acid rock drainage potential, so to differentiate
5 potentially acid generator to non-acid generator waste
6 rock material. Arsenic will also be analyzed and
7 selected lithology.

8 Finally, gold value contained in the rock is also
9 analyzed to differentiate the ore from the waste rock
10 material. With the data from the laboratory
11 analysis on the -- with the data from the laboratory
12 analysis on the rock, we can define the acid rock
13 drainage potential and classify if the waste rock is
14 potentially acid generator or non-acid generator. To
15 validate the method used by Agnico Eagle on-site
16 laboratory, some duplicate samples are also sent to
17 external laboratory for quality control and assurance.

18 THE CHAIR: Excuse me. Can you talk
19 slower? The interpreters can't keep up.

20 MS. VOYER: Yes. Sorry.

21 THE CHAIR: Thank you.

22 MS. VOYER: On a daily basis, the geology
23 team categorized the rock type being mined and
24 transferred this information to the staff working in
25 the pit, the staff who are mining the material. After
26 each blast, each rock type is marked with ribbon or

1 tape in the pit to delineate the rock type to guide the
2 shovel and loader operator during excavation in the
3 pit. We mark or delineate in the pit the waste rock
4 potentially acid generator or metal-leaching that is to
5 be transported to the waste-rock storage facility. The
6 waste rock non-acid generator or non-metal-leaching
7 that can be used for construction of infrastructure or
8 also sent to the waste-rock storage facility. Finally,
9 the ore is also delineated to be placed in the ore
10 stockpile and to be sent at the mill to be processed.

11 THE CHAIR: On this slide -- what the
12 Board member was just mentioning earlier -- the words
13 written in English are not put into Inuktitut, so
14 you're going to have to inform -- when you do a
15 presentation for the community roundtable -- what they
16 mean. Thank you.

17 MS. VOYER: Yes. Thank you.

18 On a daily basis, the geology team categorized the
19 rock types being mined and transferred this information
20 to the staff working in the pit. The information is
21 also shared with the engineering team on-site. The
22 engineering team is in charge of the waste rock
23 management plan. The plan is reviewed on a weekly
24 basis by the engineering planning group, and production
25 maps are issued showing classification of the
26 waste rock in ore, trucking, and the position/location.

1 The waste rock management is an essential part of the
2 mining plan.

3 The geological information is also provided to the
4 mine dispatch system. The mine dispatch system is a
5 system that we have at Meadowbank and that will be also
6 used for the Whale Tail. This system tracks all the
7 equipment activity in the pit at all times, as well as
8 the rock-type location within the pit. With the
9 system, we can track the material being excavated in
10 the pit and transported to the appropriate locations.

11 The dispatch system produce daily maps, as shown
12 on the right, completed with the geological
13 information, including the different type of material
14 in the pit. The waste rock types are in appropriate --
15 the position locations are identify [sic] in the same
16 way that gold ore is identify and trucked to the mill
17 or placed in the ore stockpile. This step is crucial
18 to the operation and in the development of the open
19 pit.

20 After every blast, each rock type is marked in the
21 pit to delineate the type of material, such as ore or
22 type of waste rock, to guide the operator during the
23 excavation and also direct where the rock is to be
24 taken. The information for each area ready to be mined
25 prepared by the geology team is imported in the
26 dispatch system. The system and the dispatcher in

1 charge, as shown on the left figure, guide the operator
2 and also ensure the ore or the waste rock material is
3 transported to the appropriate destination. The
4 dispatch system is used to manage and control
5 surface-mining equipment. The system provides
6 fleet-management and machine-guidance technology that
7 records data related to mining equipment activity. The
8 type of material is also displayed on the computer
9 screen in an -- in the excavator or in the truck, as
10 shown on the right picture, so the operators knows --
11 know in what type of material they are working at all
12 time.

13 The execution of the waste rock management is a
14 step-by-step procedure that includes different teams
15 during the whole mining process. Because of the large
16 material requirement for construction and also for the
17 waste rock cover, and also the importance for adequate
18 disposal to meet closure objective, waste rock
19 management is a key component of the mining planning.

20 Following the technical meeting in April, Agnico
21 completed the thermal analysis of the waste-rock
22 storage facility at Whale Tail and determined that a
23 non-acid generator cover of 3.3-metre thick may be
24 required to ensure thermal and chemical stability of
25 the waste rock material at closure, to which is added a
26 0.5 metre for added safety for a total of a cover of

1 3.8-metre thick. Agnico Eagle will construct a 4-metre
2 non-acid generator cover over the waste-rock storage
3 facility at Whale Tail. The cover will be completed
4 with waste rock material coming directly from the pit
5 as progressive closure, and, also, waste rock will be
6 stockpiled for final completion of the cover. The
7 material balance indicates that there is sufficient
8 good waste rock to complete the 4-metre cover, and
9 additional good rock is also available if a thicker
10 cover is required based on monitoring of site
11 conditions.

12 Also, the waste rock management, including
13 segregation protocol as presented in the previous
14 slides, as well as mitigation strategy was reviewed and
15 discussed with Indigenous and Northern Affairs [sic]
16 Canada, Environment Canada, and Kivalliq Inuit
17 Association. Finally, Agnico has performed sensitivity
18 analysis model to consider the worst-case scenario for
19 waste rock segregation, including the waste rock
20 material from the north wall of the Whale Tail Pit.

21 In terms of water management plan for the Whale
22 Tail Pit Project, water from the waste-rock storage
23 facility could affect downstream water quality during
24 post-closure; however, proper water management
25 practices will prevent impact on the downstream water
26 quality. Consultations were held with Indigenous

1 Northern Affair Canada and Environment Canada in
2 regards to water management of the waste-rock storage
3 facility.

4 Agnico Eagle committed to complete thermal
5 modelling to support final design of the waste-rock
6 storage facility and also update the final cover
7 design; also, adhere to management plan, including acid
8 rock drainage and metal-leaching testing and sampling
9 plan, waste-rock storage facility management plan,
10 water management plan, and water quality and
11 flow-monitoring plan. Finally, Agnico Eagle proposed
12 to update the waste-rock storage facility plan outline
13 waste segregation practices.

14 Thank you, Madam Chair. I will let my colleague
15 Ryan Vanengen continue the presentation.

16 MR. VANENGEN: Madam Chair, Ryan Vanengen
17 from Agnico Eagle.

18 To ensure the protection of the receiving
19 environment following treatment of arsenic,
20 Agnico Eagle developed a site-specific water quality
21 objective for arsenic. Development of a site-specific
22 water quality objective followed the species
23 sensitivity distribution protocol recommended by the
24 Council of Canadians Minister of the Environment [sic].

25 Our treatment during operations for arsenic and
26 monitoring will ensure that we respect the

1 site-specific water quality objectives of 25 micrograms
2 per litre for arsenic in the receiving environment, and
3 this was based on the use of chronic toxicity data,
4 which did not include amphibian data, and was accepted
5 by Environment Canada and recently discussed with the
6 Kivalliq Inuit Association.

7 Having the specific site water quality objectives
8 is a positive thing for our project as that will ensure
9 the fish and the critters that live in the lake -- in
10 Mammoth Lake are protected.

11 Also, through treatment of phosphorous,
12 Agnico Eagle are not predicting a significant change in
13 Mammoth Lake water quality. With treatment, we expect
14 a gradual increase of phosphorous in Mammoth Lake, and
15 it will decrease during closure.

16 The details of our treatment and water quality
17 predictions will be discussed in greater detail next
18 week during the Nunavut Water Board hearings. That
19 being said, in summary, water quality predictions were
20 developed for site -- for the site and downstream
21 environments in our final environmental impact
22 statement. Predictions have been updated with
23 treatment for phosphorous and arsenic and with
24 additional mitigation, including the north wall
25 pushback and variable covers for waste rock, as
26 described by Erika. And our downstream water quality

1 is predicted to be less than guidelines, and a
2 conservative approach of overpredicting aluminum and
3 iron in the downstream environment was used.

4 Arsenic will be less than the site-specific water
5 quality objectives, based on our modelling, and the
6 trophic status, as presented in the last slide, will
7 change from oligotrophic to mesotrophic during
8 operations and back to oligotrophic.

9 Agnico Eagle is committed to treating seepage from
10 the waste-rock storage facility during post-closure, if
11 needed, and we've updated our baseline report -- and we
12 will update our baseline report before construction.
13 We've proposed terms and conditions, and those terms
14 and conditions relate to mercury, and we will conduct a
15 mercury-monitoring program which will align with our
16 water quality and fish monitoring.

17 We will also conduct hydrodynamic modelling for
18 the post-closure phase of the pit lake with
19 hydrogeological-model inputs, and we will conduct
20 hydrodynamic modelling for the post-closure phase of
21 Mammoth Lake with runoff from the waste-rock storage
22 facility using varied covered scenarios.

23 Given the importance of fish to local Inuit, we
24 have developed fisheries offsetting plans and fish-out
25 plans. We've worked closely over the last year and a
26 half with Fisheries and Oceans and the Kivalliq Inuit

1 Association to develop these plans and worked closely
2 with the Hunting and Trapping Organization through four
3 fish-outs, which have informed our plan for the Whale
4 Tail Pit Lake fish-out.

5 Based on community feedback and in following
6 Department of Fisheries and Oceans guidance for
7 fish-outs, we believe our plans will offset for the
8 loss of fish habitat duration operations and in
9 closure. A fish-out is planned to begin in open-water
10 season of 2018, and we have successfully -- as we have
11 successfully done in the past, fish will be
12 transferred -- or proposed to be transferred from
13 Whale Tail Lake north basin to the south basin. And
14 that's illustrated in the photo at the bottom.

15 So after constructing the platform for the dike in
16 2018, we'll work with Fisheries and Oceans and the
17 Kivalliq Inuit Association and HTO to develop a
18 fish-out plan that we're proposing where we'll transfer
19 fish from the north basin into the south basin of Whale
20 Tail Lake. This fish-out work plan was submitted to
21 the Nunavut Impact Review Board on June 28th, 2017. As
22 well, based on the project review, Agnico Eagle has
23 updated and provided Whale Tail Lake -- a Whale Tale
24 Lake fisheries and offsetting plan which was sent for
25 review to Department of Fisheries and Oceans and the
26 Kivalliq Inuit Association and was submitted as part of

1 our final submissions to the Nunavut Impact Review
2 Board.

3 The updated fisheries and offsetting plan will
4 include on-site habitat creation, which is similar to
5 what we've proposed for our Meadowbank project, and it
6 will include new habitat creation, improved connection
7 between Mammoth and Whale Tail Lake, and possibly a
8 raising of the water level of Whale Tail Lake.
9 Complementaries outlined in our fisheries offsetting
10 plan will also -- will include research and sustainable
11 projects that are intended to provide direct benefits
12 to the community of Baker Lake.

13 Agnico Eagle is committed to the concepts
14 presented in the offsetting plan and are confident the
15 loss of fish habitat due to Whale Tail Pit operations
16 is offset. Agnico Eagle will continue to work with DFO
17 and the Kivalliq Inuit Association and the Baker Lake
18 HTO -- or Hunting and Trapping Organization -- to
19 finalize the final offsetting plan during the
20 authorization phase.

21 We continue to work with Department of Fisheries
22 and Oceans and are using methods for calculating
23 habitat losses -- so fish habitat losses that have been
24 thoroughly reviewed and endorsed by experts, including
25 Cam Portt and Dr. Ken Minns. We have adjusted our
26 methods and offsetting calculations based on Department

1 of Fisheries and Oceans' feedback, including, but not
2 limited to, using equal weights for all species.
3 Habitat losses due to enrichment were examined after
4 water quality predictions were updated to account for
5 treatment, and habitat losses are not expected.

6 We intend to finalize the complementary measures
7 outlined in our final offsetting plan, and we -- we
8 intend that these will include research projects and
9 working with the University of Manitoba to provide
10 regional benefits, and we intend to continue our
11 sustainable projects that are intended to provide
12 direct benefits to the community of Baker Lake; as an
13 example, research and studies for the Baker Lake sewage
14 treatment and remediation.

15 Furthermore, we will work in partnership with the
16 Kivalliq Inuit Association and engage with other
17 researchers such as the Arctic Research Foundation and
18 others to monitor and ensure the protection of Baker
19 Lake and the -- also the sub-watershed within Baker
20 Lake.

21 Our monitoring -- excuse me, our monitoring for
22 fisheries will include monthly water quality monitoring
23 in the pit during flooding and closure. We will
24 conduct stratified water quality monitoring in Whale
25 Tail Pit during closure; we will conduct monthly water
26 quality monitoring during flooding and closure; and we

1 will conduct stratified water quality monitoring in
2 Whale Tail Lake, Mammoth Lake, and Nemo lake.

3 The proposed terms and conditions that
4 Agnico Eagle has put forward will be to continue to
5 work with the Department of Fisheries and Oceans and
6 the Kivalliq Inuit Association to finalize our
7 offsetting plan for approval prior to construction and
8 to provide contingency offsetting, if unable to
9 demonstrate sustainable fish habitat, in post-closure.

10 Ultimately, it's our goal for water management and
11 fisheries offsetting and waste management to use
12 fact-based decisions and adaptive-management techniques
13 as described in the below figure, where we collect
14 monitoring information during operations and even
15 before operations. We then evaluate our modelling and
16 plan our infrastructure accordingly, and we use our
17 water management and infrastructure to ensure that we
18 meet some of our predictions to ensure the protection
19 of the receiving environment.

20 Similar to the atmospheric environment
21 presentation -- before I give our concluding remarks on
22 the topic, I would like to give the Board an overview
23 of our responses that were in our response to final
24 submissions, and also give the Board an update on
25 relevant discussions we have had with parties since we
26 filed our responses to final submissions August 29th.

1 I also wanted to note to the Board that as the
2 Whale Tail Pit is subject to a NIRB and Nunavut Water
3 Board coordinated review, there is more detail on water
4 matters that NIRB might normally not see in this
5 review; however, we have prepared this update for the
6 NIRB's benefit.

7 On the topic of water quality, Agnico has been
8 working closely with INAC -- or, sorry, Indigenous and
9 Northern Affairs Canada and Environment Canada through
10 various conference calls and meetings and information
11 requests to address issues of concern. I will give you
12 a summary of those discussions now.

13 On July 27, 2017, we met with INAC and Environment
14 Canada related to the sensitivity report
15 clarifications. On July 27th, 2017, we met with
16 Environment Canada to address questions on Technical
17 Commitments 30, 36, 37, 42, and questions on the north
18 wall pushback, pit design, aquatic monitoring, cover
19 material, and the south wall. On August 10th, 2017, we
20 revised our modelling -- a revised modelling report was
21 provided, and on August 28th, 2017, we met with
22 Environment Canada and revised our environmental
23 quality criteria.

24 NRCan submitted a comment at Issue 2 respecting
25 hydrogeology, and Agnico Eagle has committed to
26 additional analysis. Our understanding is that NRCan

1 has no outstanding concerns.

2 DFO submitted a comment to DFO 3.4, respecting
3 potential changes to lake ecosystem productivity, and
4 Agnico Eagle has committed to additional treatment for
5 phosphorous. Our understanding is that DFO has no
6 outstanding concerns related to this. DFO submitted a
7 comment, as -- referred to as "DFO 3.5", respecting
8 monitoring -- respecting monitoring, mitigation, and
9 management plans and water quality and flow monitoring,
10 and Agnico Eagle has agreed to these recommendations,
11 and it's our understanding that the DFO has no
12 outstanding concerns related to this.

13 Environment Canada also submitted some comments
14 respecting water quality. This is related to the north
15 wall pushback and the sensitivity analysis and effluent
16 quality criteria, also related to mercury study, and
17 then with respect to sediment coring analysis. And our
18 understanding is that Environment Canada was satisfied
19 with Agnico's additional commitments on these matters
20 and has no outstanding concern regarding water quality
21 with respect to the Nunavut Impact Review Board
22 process.

23 Indigenous and Northern Affairs Canada submitted a
24 comment -- Final Comment 1 and Final Comment 3 with
25 respect to post-closure monitoring, water quality in
26 the pit -- in the flooded pit, and Agnico Eagle has

1 proposed terms and conditions in its submission.
2 Through these terms and conditions, it's our
3 understanding that this -- these issues are resolved.
4 With respect to the topic of groundwater, NRCan
5 submitted several comments, and our understanding is
6 that Natural Resource Canada now considers this issue
7 resolved.

8 With respect to waste-rock storage facility,
9 Indigenous and Northern Affairs Canada, Natural
10 Resources Canada, and Environment Canada all submitted
11 comments, and Agnico has made additional commitments
12 and -- for these additional proposed terms and
13 conditions.

14 With respect to the topic of tailings, Indigenous
15 and Northern Affairs Canada raised an issue about the
16 Meadowbank tailings management in their Final Comment
17 Number 6, and Agnico Eagle has agreed with INAC's
18 recommendations, and our understanding is that INAC
19 considers this issue resolved.

20 On the topic of the explosives, Indigenous and
21 Northern Affairs Canada submitted one comment, and it's
22 referred to as "Final Comment Number 6". Indigenous
23 and Northern Affairs Canada raised an issue regarding
24 ammonia and nitrate levels from explosive use. With
25 our commitments, it is Agnico's understanding that
26 there are no outstanding concerns respecting -- with

1 respect to explosives.

2 On the topic of Fisheries and Oceans offsetting,
3 Department of Fisheries and Oceans submitted three
4 comments. With our commitments and proposed terms and
5 conditions, our understanding is that the Department of
6 Fisheries and Oceans now considers this issue resolved.

7 And, lastly, with respect to the topic of
8 navigable waters, our understanding is that Transport
9 Canada considers issues related to navigable waters
10 resolved.

11 So, in conclusion, during the Whale Tail Pit
12 operations, we will be applying lessons learned from
13 Meadowbank related to adaptive management for water
14 management and waste management and also for monitoring
15 of the receiving environment. This concept of adaptive
16 management related to waste and related to water
17 management is real. We have examples of it at our
18 Meadowbank operations where we have successfully done
19 so.

20 For the Whale Tail Pit, we have many examples of
21 changing our design based on our experience at
22 Meadowbank and knowledge gained from our operational
23 experience in Nunavut. Examples include the location
24 of our waste-rock storage facility, the location of the
25 downstream sump of the waste-rock storage facility.
26 Another example is the location of the Whale Tail dike,

1 and there's many examples of our transferrable
2 monitoring locations that will be discussed further
3 during the Type A water licencing process.

4 We will continue to adaptively manage to ensure
5 that the receiving environment, including water quality
6 and fish, are protected during operations, closure, and
7 post-closure. Mat'na.

8 THE CHAIR: Thank you.

9 Questions on the two presentations: Atmospheric
10 Environment and Freshwater Environment.

11 Any questions from the Kivalliq Inuit Association?

12 MR. MANZO: Thank you, Madam
13 Chairman [sic]. My name is Luis Manzo, director of
14 lands, Kivalliq Inuit Association. Our consultant,
15 Alan Sexton, will raise a question. He just arrived
16 last night; so we have here now Kim Poole and Alan
17 Sexton. They will be raising questions for templates
18 and monitoring. Thanks.
19 Kivalliq Inuit Association Questions Agnico Eagle Mines
20 Limited

21 MR. SEXTON: Okay. Thank you, Madam Chair.
22 I guess, on the atmospheric -- oh, sorry.
23 Alan Sexton for the Kivalliq Inuit Association.

24 On the atmospheric environment, on your Slide 7,
25 you have a -- I guess it's a couple of stations down,
26 the all-weather road to -- from Baker Lake to

1 Meadowbank. Are those going to receive the same
2 attention in June and July -- or, sorry, June and
3 August of having transects for monitoring dust as those
4 on the Whale Tail road?

5 MR. QUESNEL: Madam Chair. Jamie Quesnel,
6 Agnico Eagle. Yes, they will.

7 MR. SEXTON: Okay. All right. Great.

8 And just another question, Madam Chair.

9 There was a -- does Agnico have any idea -- when
10 they use water as a dust suppressant, like, based on
11 your experience at Meadowbank, if -- and I'll just use
12 a number, but is it 100 cubes per kilometre to keep
13 dust down or 200 -- sorry, 200 cubic metres of water?
14 Or do you have any idea what the volume of water is
15 relative to the distance along the road that you
16 require?

17 MR. QUESNEL: Madam Chair, Jamie Quesnel.

18 We use water, but to -- we have that calculation
19 somewhere, so we can get back to you --

20 MR. SEXTON: Okay.

21 MR. QUESNEL: -- possibly later today with
22 that number.

23 MR. SEXTON: Okay. No. Thank you.

24 Another question: For the -- in addition to
25 water, there's calcium chloride -- or TETRA Flake --
26 but you always -- I think you were going to -- you had

1 done some testing with Dust Stop and some other dust
2 sort of suppressants. Is that information anywhere
3 or -- I mean, as far as the results of that and how it
4 compares to water or TETRA Flake?

5 MR. QUESNEL: Madam Chair, Jamie Quesnel,
6 Agnico.

7 Yeah. We completed a pilot study on the
8 all-weather access road between Baker Lake and
9 Meadowbank. In discussions with the Baker Lake Hunters
10 and Trappers Organization, we identified a few
11 locations on the all-weather access road last year. We
12 looked at different products and monitored the
13 effectiveness of those dust suppressants on the
14 all-weather access road, and based on that pilot work,
15 we selected one product, TETRA Flake material, in
16 discussions with the Baker Lake Hunters and Trappers
17 Organization and others, just based on the results.
18 And also for this year, along the all-weather access
19 road, we increased the coverage of the dust
20 suppressants, based on discussions in the field with
21 Baker Lake Hunters and Trappers Organization.

22 We do have an internal document summarizing the
23 locations, the monitoring. We had dust sample --
24 collection locations along those locations. We have
25 videos, we have photographs, and that's all part of
26 that document. Plus, it's in our last annual report,

1 the summary of that pilot work.

2 MR. SEXTON: Okay. Thank you. Just one
3 more question, Madam Chair. Just a sec. Oh, yeah.
4 Sorry.

5 You mentioned about the distances, I guess,
6 parallel to the road of where the testing sites will
7 be. Like, I think one was 30 metres upwind, 30 metres
8 downwind. Is it -- what's the perpendicular distance
9 of stations? Like, is there a station 30 metres off
10 the road as you go away from it and another one a
11 hundred? Just -- again, I -- it's just more for
12 clarification for people.

13 MR. VANENGEN: Yeah. Ryan Vanengen for
14 Agnico Eagle. Yeah. As described in Slide 7, the
15 transects are perpendicular to the road.

16 MR. SEXTON: Yeah.

17 MR. VANENGEN: And as described, we have them
18 30 metres upwind, and then 30 metres downwind,
19 100 metres downwind, 300 metres downwind, and then
20 1,000 metres downwind.

21 MR. SEXTON: Yeah. That's basically
22 north/south, is that correct, that distance?

23 MR. VANENGEN: It depends on the location
24 and the orientation of the road.

25 MR. SEXTON: Okay. Well, I guess my
26 question was, you know, This is the road; what distance

1 perpendicular to the road? Like, do you have
2 stations --

3 MR. VANENGEN: Yes. So the --

4 MR. SEXTON: Sorry.

5 MR. VANENGEN: Yeah. Madam Chair.

6 The stations themselves are site-specific, so
7 we've identified locations on the road that are in
8 areas that are consistent. So in some cases,
9 they're -- they're north/south, so perpendicular to the
10 road, and in some cases, they're east/west. But in all
11 circumstances, they're -- those sites are selected to
12 be consistent with one another so that there's no what
13 are called "microclimates" that will not allow for the
14 data to be consistent between stations. So we make
15 sure that those locations are consistent based on wind
16 direction, et cetera.

17 MR. SEXTON: Okay. No, that's fine. Okay.

18 Al Sexton with the Kivalliq Inuit Association. Those
19 are -- that's fine. Thank you.

20 THE CHAIR: Okay. Thank you.

21 Any questions from the Baker Lake Hunters and
22 Trappers Organization?

23 Baker Lake Hunters and Trappers Organization Questions
24 Agnico Eagle Mines Limited

25 MR. AKSAWNEE: Thank you, Madam Chair.

26 Richard Aksawnee, Baker Lake Hunters and Trappers.

1 On your atmospheric environment presentation, on
2 the third page, Slide Number 6, you use Alberta
3 guidelines as the standard for dust monitoring. Are
4 there any other jurisdictions that we could use for
5 comparison?

6 MR. QUESNEL: Madam Chair, Jamie Quesnel.

7 Yeah, there are other jurisdictions. The province
8 of Alberta, which we are using, which we've used,
9 that's for Meadowbank and also Meliadine. We can use
10 the province of British Columbia, but the thresholds
11 are basically the same; so for consistency, we've
12 continued to use the province of Alberta thresholds.

13 MR. AKSAWNEE: Thank you, Madam Chair.

14 Richard Aksawnee, Baker Lake Hunters and Trappers.

15 Does Ontario or Manitoba have these guidelines as
16 well?

17 MR. QUESNEL: Madam Chair, Jamie Quesnel.

18 Yes, they do. We don't have -- we can -- we don't
19 have that information readily available, but, yes, they
20 do.

21 MR. AKSAWNEE: Thank you.

22 Thank you, Madam Chair. Richard Aksawnee, Baker
23 Lake Hunters and Trappers.

24 The reason why I raise this question is, using the
25 Alberta guidelines, Alberta has trees. Baker Lake is
26 all tundra, flat. Flat. Bare land, barren ground

1 tundra. I'm just trying to -- my question is, was
2 Inuit Qaujimajatuqangit studies incorporated as well in
3 this dust monitoring on the all-weather road?

4 MR. QUESNEL: Madam Chair, Jamie Quesnel.
5 Yes, that -- that was incorporated into our
6 decision-making, primarily dealing with the location of
7 the monitoring stations that my colleague Ryan defined.
8 So they were part of that discussion and selection
9 of -- of the stations along the all-weather access
10 road.

11 MR. AKSAWNEE: Thank you, Jamie, for that
12 answer.

13 Thank you, Madam Chair. Richard Aksawnee, Baker
14 Lake Hunters and Trappers. I'll be passing the mic
15 over to my colleague, Warren.

16 MR. BERNAUER: Thank you. Warren Bernauer
17 for the Baker Lake Hunters and Trappers Organization.

18 On page 4, you discuss your dustfall monitoring
19 activities that you have planned for this project.
20 Now, in the Baker Lake Hunters and Trappers
21 Organization's written submission, the HTO suggested
22 that you fund an independent dustfall study that
23 focuses on Inuit Qaujimajatuqangit, specifically Inuit
24 perspectives on dustfall, how the people of Baker Lake
25 feel about this problem, and their observations of
26 dustfall. If we could get some clarification if you're

1 considering committing to this request and -- as a part
2 of your dustfall monitoring, we would appreciate it.
3 Thank you.

4 MR. QUESNEL: Madam Chair, Jamie Quesnel.

5 Yes. Based on our discussions, we're committing
6 to defining that scope of work with the Baker Lake
7 Hunters and Trappers Organization and also the
8 selection of the researcher that would be engaged with
9 that type of study or survey. And historically
10 we've -- again, we've utilized all information -- not
11 just western science -- to make an informed decision.
12 But, yes, we do agree with that approach.

13 MR. BERNAUER: Thank you. Warren Bernauer
14 for the Baker Lake Hunters and Trappers Organization.
15 No further questions.

16 THE CHAIR: Thank you.

17 Any questions from the Government of Nunavut?

18 MR. PINKSEN: Thank you. Steve Pinksen,
19 Government of Nunavut. No questions on these
20 presentations.

21 THE CHAIR: Thank you.

22 Environment and Climate Change Canada?
23 Environment and Climate Change Canada Questions
24 Agnico Eagle Mines Limited

25 MS. AUSER: Thank you, Madam Chair. Trish
26 Auser, Environment and Climate Change Canada.

1 I have a question regarding Slides 29 and 30, and
2 it's regarding the trophic status of Mammoth Lake
3 during post-closure. Slide 29 indicates a lower level
4 of mesotrophic, and Slide 30 indicates will return back
5 to oligotrophic. So if we could have -- if I could
6 request clarification on the trophic status of Mammoth
7 Lake during post-closure. Thank you.

8 MR. QUESNEL: Madam Chair, Jamie Quesnel.
9 I'll have my colleague, Valerie Bertrand, to answer
10 that.

11 MS. BERTRAND: It's Valerie Bertrand for
12 Agnico Eagle. So the Slide 29 shows that right now
13 it's ultra oligotrophic; and post-closure, under very
14 conservative conditions, it would just be just at
15 the -- at the level between mesotrophic/oligotrophic
16 under highly conservative modelling conditions.
17 Thank you. And that is for total phosphorous.

18 MS. AUSER: Trish Auser, Environment and
19 Climate Change Canada. This assumes a TSS discharge of
20 15 milligrams per litre; is that correct?

21 MS. BERTRAND: Valerie Bertrand,
22 Agnico Eagle. Yes, that is correct.

23 MS. AUSER: Okay. Trish Auser,
24 Environment and Climate Change Canada.

25 And during post-closure, would that be expected to
26 taper off?

1 MS. BERTRAND: Valerie Bertrand. No. In
2 fact, it would be expected to go down, but the model
3 assumes constant.

4 THE CHAIR: When you're talking, can you
5 please speak clearly. We can hardly understand what
6 you're saying. Thank you.

7 Climate Change.

8 MS. BERTRAND: Shall I repeat?

9 THE CHAIR: Yes, please.

10 MS. BERTRAND: The phosphorous is largely
11 tied to operations. It's tied to the sewage treatment.
12 After operations, when people have gone from site,
13 those levels will decrease considerably. In our model,
14 we assume the constant level from suspended solids as
15 well, but, in time, the suspended solids will decrease.
16 This is what we see at many other sites. In our model,
17 to be conservative, we assume that the levels would be
18 sustained post-closure.

19 THE CHAIR: Environment and Climate
20 Change, any other questions?

21 MS. AUSER: Trish Auser, Environment and
22 Climate Change Canada.

23 In practice at Meadowbank, do you see the same
24 type of trend continuing on, or do you see a decline
25 over time?

26 MS. BERTRAND: Valerie Bertrand,

1 Agnico Eagle.

2 At Meadowbank, we see -- we see suspended solids.
3 Concentrations are much less than 15 milligrams per
4 litre. Maximum in the effluent is, I recall, somewhere
5 around 10 or less than 10; and there's continued
6 sewage-treatment discharge, so that has not decreased
7 because it's still in operation.

8 MS. AUZER: Thank you. No more questions.

9 THE CHAIR: Fisheries and Oceans Canada.
10 Fisheries and Ocean Canada Questions Agnico Eagle Mines
11 Limited

12 MS. ROSS: Bev Ross, Fisheries and Oceans
13 Canada.

14 I just wanted to confirm the water levels, when
15 they were starting and when they were ending, and if I
16 understand correctly from your presentation and
17 commentary, that the increase in water levels in Whale
18 Tail Lake would start in 2019 and be up by 3.5 metres
19 in 2020. And then I just wanted to better understand.
20 If you could just clarify what the period of time when
21 the water levels would be coming back down again, so
22 just within your operating plan. Because if I
23 understand correctly, 2029 is when it would be
24 returning to pre-mining levels. If you could just
25 clarify a little bit what was happening in between
26 that. Thank you.

1 MR. VANENGEN: Ryan Vanengen, Agnico Eagle.

2 I've brought up that figure that I presented
3 earlier on Slide 17. So in summary, the water -- we're
4 going to construct the east -- sorry, the Whale Tail
5 dike in June 2018 to 2019 into February 2019. In
6 February 2019, we'll begin moving water from the north
7 basin into the south basin, which will raise the water
8 level in 2019 to this contour here, this yellow
9 contour. Then naturally during freshet of 2019, that
10 water level's going to raise and then again raise in
11 2020 to this green level here, this -- this water level
12 on the outside of the green here. So that's in
13 July 2020 that we're anticipating that water level then
14 to spill into the diversion channel.

15 Operations will continue, as you know, from 2019,
16 as described by Jamie earlier, to 2022. At that point,
17 we'll begin our closure process, and closure will be
18 removing -- removing water in 2022 in -- from the south
19 Whale Tail Lake into the north basin and begin
20 monitoring that water quality. So there's going to be
21 a period of time where the south basin will still be
22 elevated and will be controlling water by moving water
23 into the north basin during closure and make sure it
24 meets water quality criteria according to the Nunavut
25 Water Board licence and according to our expectations
26 to ensure that aquatic life can live in the north

1 basin, and that period of time will be between 2022 to
2 2029.

3 There's not -- we don't have the certainty. We
4 expect that the water quality will achieve water
5 quality predictions by 2025, but the exact timing of
6 that will be determined based on our modelling and
7 updating those models.

8 Then once we achieve water quality, then we'll
9 breach the dikes, and the water levels will then go
10 back to their normal levels. We're anticipating that
11 will happen in 2025, and then the water will flow, as
12 described earlier after breaching -- the Whale Tail
13 dike will flow back into the north basin and will
14 breach the Mammoth dike as well, and the water will
15 flow into Mammoth Lake as it did under baseline
16 conditions.

17 So I hope that helps clarify in greater detail our
18 intent for -- our intent for -- and the length of time
19 that that area will be flooded.

20 THE CHAIR: Fisheries and Oceans.

21 MS. ROSS: Bev Ross, Fisheries and
22 Oceans. We have no further questions.

23 THE CHAIR: Indigenous and Northern
24 Affairs Canada.

25 Indigenous and Northern Affairs Canada Questions
26 Agnico Eagle Mines Limited

1 MS. THEORET-GOSSELIN: Thank you, Madam Chair.
2 Rachelle Theoret-Gosselin for Indigenous and Northern
3 Affairs Canada.

4 On Slide 21, when describing the waste rock
5 segregation methods, you mentioned that the
6 non-potentially acid generator waste rock and the
7 non-metal-leaching waste rock would be also transported
8 to the waste-rock storage facility, and I'm just
9 looking for some clarification on how these will be
10 physically segregated to make sure that there's no
11 contamination or contact between the two type of waste
12 rocks. Thank you.

13 MR. QUESNEL: Madam Chair, Jamie Quesnel.
14 I'll have my colleague, Erika Voyer, comment on that.

15 MS. VOYER: Thank you, Madam Chair.
16 Erika Voyer, Agnico Eagle.

17 So in the waste-rock storage at Whale Tail, there
18 is a sector that would be for non -- a clear sector
19 that would be outlined for non-acid generator material,
20 and there will be a sector for potentially acid
21 generator, the same as for the Meadowbank project.

22 During the transportation, there will be -- as
23 presented in the presentation, it will be clear for the
24 people working in the pit, as well as transporting the
25 material, where to place the material. Also, there
26 will be some non-acid generator material placed on the

1 acid generator material for the cover. So there will
2 also be clear indication of where to go and dispose the
3 material for the haul truck driver. So this would be
4 also controlled with the dispatch system that has, all
5 the time, communication with the operator and the
6 driver working in the pit.

7 Thank you, Madam Chair.

8 MS. THEORET-GOSSELIN: Rachel Theoret-Gosselin
9 for Indigenous and Northern Affairs Canada. To
10 follow up on your answer, can you clarify if the
11 material will be tested before -- my understanding is
12 it will be before put into trucks, and then there will
13 be that segregation. Is there some plans of also
14 testing the different piles during the operation at one
15 point, or they're tested when the rock is removed, and
16 that's the only testing of the rocks that will happen?
17 Thank you.

18 THE CHAIR: Agnico Eagle?

19 MS. VOYER: Erika Voyer, Agnico Eagle.

20 The material as in -- as you describe tested in
21 the pit during the -- the drilling process, so the
22 material is tested at the on-site lab and analyzed by
23 the geology team. This is when there is segregation of
24 the material just after the blast. So there's a clear
25 delimitation of the material type in the pit.

26 After that, when the material is transport to the

1 specific location, for the material used for cover,
2 there is a test for control quality that we can do to
3 ensure that the material is non-acid generator.
4 There's also, as described in the presentation, some
5 QA/QC test on the operational sampling done, meaning
6 that some duplicate sample are sent every quarter to an
7 outside laboratory for confirmation of the result of
8 the on-site lab.

9 Thank you, Madam Chair.

10 THE CHAIR: Indigenous and Northern
11 Affairs Canada.

12 MS. COSTELLO: Thank you very much,
13 Madam Chair. Karen Costello for Indigenous and
14 Northern Affairs Canada.

15 On Slide 12 and 31, some of your commitments --
16 you have your -- you have some commitments listed. You
17 also provided some commitments in your response
18 package. We just want -- with regard to terms and
19 conditions -- so we just want to clarify, for -- for
20 the benefit of ourselves and perhaps the Board, that
21 your commitments fully address INAC's Final Technical
22 Comment Number 3, and I think we're all sorted out
23 for -- also for Final Technical Comment Number 1.

24 MR. QUESNEL: Thank you, Madam Chair. Jamie
25 Quesnel, Agnico Eagle.

26 Yes. The commitment that was provided by my

1 colleague, Ryan, does include Indigenous and Northern
2 Affairs Canada Number 1 and Number 3.

3 MS. COSTELLO: Thank you very much,
4 Madam Chair. Karen Costello for Indigenous and
5 Northern Affairs Canada.

6 Thank you for that clarification. Thank you.

7 THE CHAIR: Thank you. Any questions from
8 Natural Resources Canada?

9 MS. BESNER: Rachelle Besner, Natural
10 Resources Canada. I have no questions at this time.

11 THE CHAIR: Thank you.
12 Transport Canada.

13 MR. SADOWAY: Thank you, Madam Chair. Shane
14 Sadoway from Transport Canada, marine safety. No
15 questions at this time.

16 THE CHAIR: Any questions from the Nunavut
17 Impact Review Board staff?
18 Nunavut Impact Review Board Staff Questions
19 Agnico Eagle Mines Limited

20 MR. BARRY: Thank you, Madam Chair.
21 Ryan Barry with the Nunavut Impact Review Board staff.

22 We do have a few questions and much in the same
23 vein as our colleagues at the Kivalliq Inuit
24 Association. Our questions are primarily associated
25 with the road that's being proposed for this project.

26 So through the course of the Nunavut Impact Review

1 Board's monitoring program for the Meadowbank Gold
2 Mine, the community of Baker Lake has expressed
3 concerns regarding the existing all-weather access road
4 which connects the mine to the community, specifically
5 regarding public access, noise generation, and dust
6 suppression.

7 The proposed Whale Tail Pit haul road, while
8 shorter in length and located further from the
9 community of Baker Lake, would be used much more
10 intensely than the existing all-weather access road, so
11 our question's associated with this topic. Can you
12 describe how Agnico Eagle's engagement with the
13 community of Baker Lake and feedback received through
14 the years of operating the all-weather access road have
15 contributed to its planned approach to road management
16 for the proposed Whale Tail Pit haul road, and --
17 noting that we've already heard how it's contributed to
18 proposed monitoring for dusts but not really so much of
19 a direct management and operation of the road.

20 MR. VANENGEN: Ryan Vanengen, from
21 Agnico Eagle. There's a -- some important distinctions
22 and differences between the all-weather access road
23 from Baker Lake to the Meadowbank mine and the haul
24 road. One of the important distinctions is that the
25 all-weather access road is available to the public to
26 Kilometre 85 on the road. So ATVs can travel to

1 Kilometre 85, but after that, the roads beyond
2 Kilometre 85 towards the mine are closed to the public.

3 Similarly, learning from that example, where we've
4 been able to control -- generally control traffic north
5 of Kilometre 85 for the protection of those all-terrain
6 vehicle users and traditional land-use users, we've
7 learned from that and have then decided, for the safety
8 of those traditional land-use users, to not make the
9 haul road accessible to those users. So what we've
10 done instead is worked through the collection of Inuit
11 Qaujima jatugangit, located areas for -- where
12 traditional land users will cross the road, but it's
13 our intent to enforce that no all-terrain vehicles or
14 hunters are able to use the haul road because it's a
15 safety hazard to those users.

16 So I think in answering the question, we've used
17 our -- our -- we've -- we understand the traffic along
18 our road, along our all-weather access road. We
19 understand that there's a lot more traffic due to
20 mining, and the activities around the mine site are a
21 lot busier than our current all-weather access road,
22 and therefore we've -- we've made our haul road a
23 private road to ensure the safety of traditional land
24 users. Mat'na.

25 MR. BARRY: Thank you, Madam Chair. Ryan
26 Barry, Nunavut Impact Review Board staff.

1 Thank you for that. Based on the noise modelling
2 that you've undertaken in support of your proposal, how
3 far from the proposed haul road would traffic be
4 expected to be heard by humans, and at what distance
5 from the road would the noise produced no longer be
6 expected to disturb caribou or muskoxen?

7 And I realize that you have yet to present on your
8 terrestrial wildlife presentation.

9 MR. QUESNEL: Madam Chair, Jamie Quesnel,
10 Agnico Eagle. Based on our ten years at Meadowbank and
11 with the existing stations that we have dealing with
12 noise, we do have continuous stations around the
13 Meadowbank operation, and based on the information that
14 we receive from that monitoring -- it's at different
15 locations about a kilometre and a half or 2 kilometres
16 from -- from the active areas of the operation, and it
17 meets the thresholds for human activity based on the
18 information we're receiving from those stations.

19 So based on that and just based on -- with our
20 annual reporting of this monitoring, reviews by
21 multiple agencies, it appears, just based on our
22 operational experience, our mitigation is -- appears to
23 be effective. We're learning every year and improving
24 and adapting, and that experience from our existing
25 operation has been included with the Whale Tail Pit
26 Project terrestrial ecosystem management plan and

1 discussing how we're going to monitor and mitigate
2 related to -- related to caribou.

3 The team, Ryan and Corey and John, will be
4 dialling into those details in the next presentation to
5 evaluate how we're -- we've done it in the past, how
6 we're planning to move forward with those practices,
7 and also how we work together collectively with
8 multiple stakeholders to improve on those practices.

9 MR. BARRY: Thank you, Madam Chair.

10 Ryan Barry, Nunavut Impact Review Board staff.

11 And thank you for that response. And I agree the
12 discussion for the latter half of that question
13 specific to disturbance to caribou/muskoxen would
14 probably be best to follow up with during the
15 terrestrial wildlife -- or following that presentation.

16 But maybe more specifically -- I'm not sure we
17 quite got the response we were hoping to get.
18 Recognizing there are differences at the Meadowbank
19 operation in terms of trucks that you would use, as
20 you've said, the speed that those trucks would be
21 travelling -- and our question is pretty specific to --
22 how far away from the proposed road would you expect a
23 person could hear the activity, the traffic passing?
24 So not with regards to thresholds for how safe it is
25 for human -- the humans hearing, but just, you know,
26 practically speaking, how many kilometres distance

1 would we expect to be able to hear the operations on
2 that haul road that's being proposed, recognizing it's
3 different than the operations existing at Meadowbank,
4 as you've indicated?

5 MR. QUESNEL: Madam Chair, Jamie Quesnel.
6 We just wanted to further answer. We just have to
7 collect some additional information. I do not have
8 that readily available. I know we have the
9 information, so shortly after lunch, we can report back
10 on that information.

11 MR. BARRY: Thank you, Madam Chair. Ryan
12 Barry, Nunavut Impact Review Board staff.

13 Thanks. That's perfectly acceptable to us. So
14 the final question from the staff, Madam Chair, to
15 Agnico Eagle, what specific dust suppressants would be
16 applied to the proposed Whale Tail Pit haul road, how
17 frequently would they be applied, and how does this
18 compare to your current practice with the existing
19 Meadowbank all-weather access road?

20 MR. QUESNEL: Madam Chair, Jamie Quesnel.
21 So with our practices on the all-weather access road,
22 the product we're using right now is the -- is a flake
23 material that we're utilizing. It's a dry material
24 that we apply on the all-weather access road. And
25 based on our -- my previous answer, based on our pilot
26 program from 2016, that was the most effective product

1 to use on the all-weather access road.

2 In saying that, based on western science and all
3 the monitoring we have, third-party review by the
4 Kivalliq Inuit Association, based on our dust
5 monitoring, we're not above the Alberta thresholds. I
6 know there's other provinces with certain thresholds,
7 but we're using the Alberta protocol for that. So in
8 western science, we're good, but based on discussions
9 with the Baker Lake HT -- Hunters and Trappers
10 Organization, also from the Hamlet of Baker Lake, we --
11 we applied the product.

12 Now, based on haul -- that's for the all-weather
13 access road. Now, for haul roads at Meadowbank right
14 now, say at the Vault pit, we apply water on some
15 locations also with the flake material. So based on
16 the information on the -- we have to date, based on our
17 all-weather -- the haul road from Whale Tail to
18 Meadowbank, the same indication, the same significance
19 of the impact, based on western science, meets the
20 thresholds based on the Alberta guidelines.

21 However, based on -- primarily on the haul road,
22 like it is at Vault, for the safety of the operators of
23 the heavy haulers, if dust is -- it becomes a concern,
24 then we'll apply the appropriate dust suppressants,
25 primarily -- mostly likely the same material we're
26 using in the all-weather access road, just based on the

1 effectiveness of that material versus water, and also
2 based on any -- any concerns from any stakeholder, from
3 submissions from our annual reports, which would be a
4 continuation of what we're doing with Meadowbank
5 related to the haul road from Whale Tail to Meadowbank,
6 all that information would be provided to the
7 government agencies on an annual basis on our summary
8 of the monitoring reports but also any observations
9 during that activity.

10 So those would be the triggers. Western science,
11 it looks good; there's no impact. Based on safety,
12 that would be a trigger to provide the dust suppressant
13 and also from discussions and any concerns from -- from
14 the public or government agencies.

15 MR. BARRY: Thank you, Madam Chair. Ryan
16 Barry, Nunavut Impact Review Board staff.

17 Thank you for that response. Just our final
18 question in follow-up to this. In your professional
19 judgment, has the dust suppression that is currently
20 being applied to the Meadowbank all-weather access road
21 been effective for addressing dust dispersion, as
22 anticipated, but also for addressing public concerns
23 that have been raised? So has your overall
24 management -- your application of dust suppressant --
25 been effective?

26 And the reason I'm asking this is, you're pointing

1 to if public concerns are raised with regards to dust
2 on the haul road, then your practice might change
3 beyond what you're predictions are suggesting; so I'm
4 just looking further to that. Are public concerns
5 still being raised about the practices for dust
6 suppression with regards to the existing all-weather
7 access road?

8 MR. QUESNEL: Madam Chair, Jamie Quesnel.
9 Yeah. Based on my personal opinion, yeah. The product
10 we're applying on the road is effective, and that's
11 based on the pilot work we completed in 2016. Because
12 we looked at a couple products, also the engagements of
13 the community and Baker Lake Hunters and Trappers
14 Organization, the valuation of that information, the
15 updates of that information to all parties involved,
16 and the decision was made collectively, right.

17 We have an opinion. There's a perception from the
18 community and other stakeholders, so we spoke about it
19 and came up with a solution. So the pilot work was the
20 first step based on location. The primary concerns --
21 and this is over and above any impact based on our
22 thresholds, so it's -- we're -- just based on the
23 feedback from the community and other stakeholders.

24 So we feel it's effective. And, again, this year
25 we advanced that project -- the application of the dust
26 suppressant on the all-weather access road. On other

1 areas, that was discussed with the community and Baker
2 Lake Hunters and Trappers Organization and others on,
3 Where do we apply this? So we're moving together on
4 this and also assessing it as we move forward.

5 So I feel it is effective, not just the product,
6 but also how we came to this solution. I think they go
7 both hand in hand, the technology plus the
8 collaboration with all the stakeholders.

9 MR. BARRY: Thank you, Madam Chair. Ryan
10 Barry, Nunavut Impact Review Board staff.

11 Thank you for those responses. No further
12 questions.

13 THE CHAIR: Thank you.

14 Does the Nunavut Water Board have any questions?
15 Nunavut Water Board Questions Agnico Eagle Mines
16 Limited

17 MR. KHARATYAN: Thank you, Madam Chair.
18 Karen Kharatyan from the Nunavut Water Board. A couple
19 of quick questions, please.

20 On the Slide 31st [sic], Agnico Eagle is proposing
21 terms and conditions that includes to conduct
22 hydrodynamic modelling for pit lake for the
23 post-closure phase and for Mammoth Lake. As this
24 information will be important for Water Board as well,
25 would be it interesting to know when Agnico Eagle
26 intends to conduct this modelling and when the result

1 will be available.

2 MR. QUESNEL: Madam Chair, Jamie Quesnel.

3 Yeah. The results of the two studies -- because
4 the hydrogeological modelling would feed the meromixis
5 analysis, so we're looking at Q1 2019 to have that
6 final document. 2018 would be the law of activity
7 related to that modelling and feeding it with field
8 information, so we're looking Q1 2019 for that final
9 document.

10 MR. KHARATYAN: Thank you. Next quick
11 question: In the beginning of your presentation, I
12 think it was told that pit design is still being
13 considered, pit final design, open-pit design, and also
14 it was stated that you -- because we are aware that
15 Agnico Eagle has some direct discussion with agencies,
16 but we may not fully be aware of the details of this
17 discussion.

18 The question is whether north wall pushback is an
19 option, or it -- it's decided to be included with the
20 design?

21 MR. QUESNEL: Madam Chair, Jamie Quesnel.

22 Yeah. Based on multiple discussions with multiple
23 intervenors, the north wall pushback will occur based
24 on the results and reduction of arsenic concentrations
25 in the flooded pit during the closure phase of the
26 operation. So we're going ahead with the north wall

1 pushback based on discussions with the Kivalliq Inuit
2 Association, Environment Canada Climate Change,
3 Indigenous and Northern Affairs Canada, so we've
4 decided to go with that option.

5 MR. KHARATYAN: Thank you. Madam Chair. No
6 more questions.

7 THE CHAIR: Thank you. We do have some
8 questions from the Board, and I think there's going to
9 be quite a few. It is now after 12. Why don't we get
10 to questions from the Board to the proponent at 1:15.
11 Thank you.

12 (LUNCHEON ADJOURNMENT AT 12:03 PM)

13 (PROCEEDINGS RECOMMENCED AT 1:21 PM)

14 THE CHAIR: Okay. Shall we start with the
15 hearing?

16 We just heard a presentation on the atmospheric
17 environment and the freshwater environment, and we're
18 now to questions to the proponent from the Nunavut
19 Impact Review Board.

20 Just a couple things. I know this is a technical
21 session. So when you have a question or it is your
22 turn to speak, please speak clearly, close to the mic,
23 and in a language that we can all understand.

24 And this is for the community reps and the
25 community of Baker Lake, avaniittuq. It is unfortunate
26 that there is no translation for chemicals in

1 Inuktitut, very unfortunate, because it takes a long
2 time for our translators just to translate exactly what
3 that chemical is into the component. So think of how
4 you can explain the product and the method. Just
5 imagine how it feels to our unilingual participants,
6 which is very hard to understand. And they want to
7 participate, and how can they participate when they
8 don't understand? So try your best. I know it's going
9 to be hard, especially for our translators. So I'm
10 bringing this up now.

11 Thank you.

12 Questions from the Board, starting with Guy.
13 Nunavut Impact Review Board Questions Agnico Eagle
14 Mines Limited

15 MR. ALIKUT: Thank you, Madam Chair. My
16 name is Guy Alikut from the Nunavut Impact Review
17 Board.

18 As an Inuk, as an Eskimo, what you just said, the
19 chemicals, they're not food; we don't have a name for
20 it. It's something that you can't eat, the chemicals.
21 That's what we say as unilingual.

22 My questions to Agnico Eagle and the presenters,
23 the first question: When you're sampling water to the
24 closest one and then going further and you take water
25 samples, how far do you go, the furthest for testing
26 the water quality? That's my first question.

1 MR. VANENGEN: Ryan Vanengen, Agnico Eagle.

2 And good afternoon, Madam Chair and Board members.

3 Our sampling is focused -- related to water
4 quality -- is focused around the Whale Tail Pit site,
5 and the farthest monitoring station is in the
6 downstream lakes, in this location. And by estimate,
7 it's about 10 kilometres downstream. So that's equal
8 to driving along the road to our gatehouse, if you're
9 familiar with the Baker Lake all-weather road.

10 Mat'na.

11 MR. ALIKUT: My second question: How often
12 do you sample the water? Once a month or every two
13 weeks?

14 Thank you.

15 MR. VANENGEN: Yeah, we'll present a little
16 bit more on that in our management and monitoring
17 plans. But if I understand the question, we monitor --
18 we monitor monthly in the lakes nearby the project site
19 to ensure that those lakes are protected, and then in
20 the summer, we're planning on monitoring downstream
21 during the open-water season in the downstream lakes.

22 MR. ALIKUT: Thank you.

23 And my other question: With respect to dust
24 control, do you use water -- do you use primarily water
25 for watering down the roads, or do you use chemicals
26 for dust control? Do you just use water, or do you use

1 chemicals as well for dust suppressant? If you
2 understand my question. Do you use only water, or do
3 you use chemicals as well?

4 MR. QUESNEL: Thank you, Madam Chair.

5 Yeah, we use both, just depending on the location.
6 So on the haul roads right now, Meadowbank, around the
7 Vault pit in the summertime, we would use water. And
8 then on the all-weather access road -- excuse me --
9 from Baker Lake to Meadowbank, we use a chemical
10 product that was discussed, based on our pilot program
11 last year on the road with engagement with the Baker
12 Lake Hunters and Trappers Organization and other
13 stakeholders on selection of the product and the
14 location of that product on the road. Also, closer to
15 the Meadowbank mine site, we have a few kilometres
16 where we add the chemical product on the road, but on
17 the -- along the haul road going into the pit and those
18 areas, we use water during the summer months.

19 So we use both.

20 MR. ALIKUT: My final question -- thank you
21 for that answer.

22 My final question: Your vehicles, are they
23 covered when you're delivering the ore from -- on the
24 haul trucks? Are they covered, or do you have some
25 instances where some of the material gets -- falls off
26 the truck? And is it just ore, or is there chemicals

1 in it when you're delivering from Whale Tail Pit to
2 Meadowbank to delivering it to the crusher?

3 And in one day, how many trucks will be travelling
4 back and forth in one day?

5 Thank you.

6 THE CHAIR: (UNREPORTABLE SOUND). No? I
7 thought I'd try.

8 MR. QUESNEL: Thank you, Madam Chair.

9 Just to clarify -- well, I'll answer just dealing
10 with the -- see, at the Meadowbank operation now, from
11 the Vault pit to the mill, the haul trucks are open.
12 So the back of the truck where the rock sits is not
13 covered. However, a lot of times, the rock can be wet
14 travelling towards the mill in the -- in the box. So
15 that's between Vault and Meadowbank.

16 Just want to clarify if you're talking about the
17 number of trucks between Whale Tail and Meadowbank?

18 MR. ALIKUT: (NO VERBAL RESPONSE)

19 MR. QUESNEL: Okay. Okay. On the long
20 haul. Okay. And those numbers, I think we're looking
21 at ten trucks -- ten trucks per hour; right? Yeah, so
22 ten trucks per hour of the heavy hauler. So that means
23 five trucks heavy and five trucks empty per hour plus
24 the light vehicle traffic. But just for the heavy
25 haulers, it's about ten trucks per hour.

26 THE CHAIR: So that's ten trucks 24 hours

1 a day, 7 days a week?

2 MR. QUESNEL: Correct. Yeah. Yeah. Plus
3 we -- also part of that, we have 28 days for caribou
4 migration and also blizzard days where the trucks won't
5 be travelling during those times based on the triggers
6 for that -- those events. So that's calculated into
7 the cycle time.

8 THE CHAIR: Thank you.

9 Kaviq.

10 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
11 Kalurag, Nunavut Impact Review Board.

12 For your atmospheric environment presentation,
13 Slide 3, on noise studies, it says that you do it twice
14 a year. Can you clarify if you do conduct noise
15 studies only twice a year or if there are additional
16 studies on top of that.

17 Mat'na, Iksivautaq.

18 MR. VANENGEN: Ryan Vanengen, Agnico Eagle.

19 You're correct. So we monitor twice per year, and
20 it has to be in the summer. We monitor for two weeks
21 in July and then two weeks in August.

22 And the reason why it has to be in the summer is
23 that the noise-monitoring equipment are sent out by
24 helicopter, set up; and we leave them there with
25 batteries that collect continuous noise over the course
26 of a full day or over the course of those two weeks.

1 And the reason why they're only done in July and August
2 is it's because the batteries only last so long and
3 they last the longest in the summer, which allows us to
4 collect that noise information.

5 So you're right; it's two times per year.

6 Mat'na.

7 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
8 Kaluraq, Nunavut Impact Review Board.

9 Thank you for that clarification.

10 Just building onto what Ryan was asking earlier in
11 terms of humans hearing noise and how far you can hear
12 it from the road, from my experience, going west of the
13 community, I could hear traffic that sounded like it
14 was coming from the all-weather access road; but I
15 don't know the distance. So if you could clarify --
16 how far do you put those noise monitors in relation to
17 the distance from the road?

18 Thank you.

19 MR. VANENGGEN: Madam Chair. Ryan Vanengen
20 from Agnico Eagle.

21 We monitor -- our focus of monitoring is around --
22 right now is around the Meadowbank mine site, and
23 that's as per our noise and monitoring and mitigation
24 plan that we submitted to the -- or that we follow.
25 The monitoring stations within that management plan are
26 at different distances from the mine site. So one is

1 at around 2 kilometres; another is at 4 kilometres; and
2 another is at 5 kilometres. And that's what we're
3 doing to ensure that beyond the mine site we're -- the
4 noise levels dissipate.

5 And Jamie's going to describe to you some of the
6 results that we have for the haul road as well in
7 follow-up to Ryan Barry's question.

8 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
9 Kalurag, Nunavut Impact Review Board.

10 Considering that things are a bit different in the
11 summer and the winter, does Agnico Eagle anticipate
12 conducting noise studies in the winter and using
13 alternative methods?

14 Mat'na, Iksivautaq.

15 MR. VANENGEN: Ryan Vanengen from
16 Agnico Eagle.

17 We would certainly consider applying and
18 conducting some noise monitoring throughout the year,
19 so in the winter.

20 The reason why -- there's, I guess, two reasons --
21 a couple of reasons why we monitor in the summer. The
22 first reason, I've already explained.

23 The second reason is also that's it's a
24 conservative estimate, which means that it's the worst
25 case for noise, because what we know is that snow is an
26 absorbant for noise. So snow typically absorbs the

1 noise; and, therefore, when we monitor, we would expect
2 that the noise would be lower in the winter.

3 So that's why we've selected those months, both
4 because -- both because of the equipment that we use
5 and because it's the worst-case scenario as well. But
6 we're open to monitoring throughout the year based on
7 the technology available.

8 Mat'na.

9 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
10 Kaluraq, Nunavut Impact Review Board.

11 Going back to -- going to your freshwater
12 presentation and building on the questions from
13 Environment and Climate Change Canada regarding total
14 suspended solids, phosphorous, and arsenic, in your
15 presentation, you were talking about looking -- or
16 measuring water quality. Does Agnico Eagle anticipate
17 doing fish quality monitoring not just on the fish
18 habitat itself but also on the quality of the fish?

19 Mat'na, Iksivautaq.

20 MR. VANENGEN: Ryan Vanengen from
21 Agnico Eagle.

22 Yes, we plan to conduct fish monitoring studies.
23 Those will be completed -- it's through a regulatory
24 process called the Metal Mine Effluent Regulations,
25 which requires Agnico Eagle to monitor fish health as
26 well as tissues and also to monitor the food that the

1 fish depend on, so the benthic invertebrates. So we --
2 yes, we intend to monitor fish as per that MMER cycle,
3 Metal Mine Effluent Regulation cycle.

4 Mat'na.

5 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
6 Kaluraq, Nunavut Impact Review Board.

7 So going back to Slide 29 in your freshwater
8 presentation, it looks like you're anticipating that
9 there's going to be a permanent change to the Mammoth
10 Lake waterbody. What happens if the fish quality does
11 change as a result of the water quality long term in
12 terms of an effect from phosphorous or even arsenic
13 uptake?

14 Mat'na, Iksivautaq.

15 MR. VANENGEN: Ryan Vanengen from
16 Agnico Eagle.

17 What we will do is we'll monitor over time, first
18 off, at the -- at our discharge point. So what we do
19 is we make sure that our discharge water quality in the
20 long term doesn't impact the fish. So we're taking a
21 proactive measure by treating to limits that won't
22 affect the fish. And right now our water quality
23 modelling suggests that we can -- through treatment, we
24 won't affect the fish. So we're going to do it at the
25 point source.

26 That being said, we're still going to monitor the

1 fish; we're going to monitor the water throughout the
2 system there; and we're going to monitor the food that
3 the fish survive on to make sure that, in the long
4 term, those fish are protected.

5 And those limits, those discharge limits that I
6 spoke about, will be determined through the Nunavut
7 Water Board process.

8 THE CHAIR: Thank you.

9 Phillip.

10 MR. KADLUN: Quana, Iksivautaq. Phillip
11 Kadlun, Nunavut Impact Review Board member.

12 Earlier in your presentation regarding dust, as
13 you stated earlier that the dust -- the dustfall is
14 well below Alberta guidelines. Now, the concern I have
15 is that those guidelines may be set in a very, very
16 different environment, whereas up north -- as we stated
17 earlier -- we have no trees and we have a lot more wind
18 every day, almost every day. And my question is what
19 kind of methods do you use to monitor dustfall from the
20 roads?

21 And I have a leading question.

22 Madam Chair.

23 MR. VANENGEN: Ryan Vanengen from
24 Agnico Eagle.

25 There's a number of kind of tiers of monitoring
26 that we use to determine effects of dust on the

1 terrestrial environment or on the tundra.

2 The first one was described as dustfall
3 cannisters.

4 So that's what we use to compare to those Alberta
5 guidelines. So that's the first set.

6 The other set is actually -- is called part of our
7 screening level risk assessment, which looks at the
8 effects of the dust deposition in those same areas
9 along the road and in other areas around the mine site,
10 and that -- we collect samples of the soil as well as
11 the vegetation, and that's compared to -- using some
12 methods. What it tells us is whether or not the soil
13 and the vegetation is okay for caribou consumption and
14 for birds to consume, so if they consume the vegetation
15 or the berries, we double-check that.

16 So we have kind of a tiered approach from those
17 cannisters, and then we also look at the soil and the
18 vegetation as well through methods that involve
19 chemistry, and then we analyze that and submit that
20 into a lab and make a determination.

21 The other way that we look at dust is also through
22 bird studies, and we can -- we've done that in the past
23 as well to show whether or not the habitat in the area
24 nearest to the activities, so along the road or around
25 the mine site, whether or not there's changes in bird
26 activity as compared to areas that aren't impacted.

1 So there's a number of different ways that we do
2 it, but it does start with the dust cannisters, and
3 then -- and then it kind of cascades into more in-depth
4 analysis.

5 So I hope that helps.

6 Mat'na.

7 MR. KADLUN: Quana, Madam Chair. Phillip
8 Kadlun, Nunavut Impact Review Board member.

9 My concern is that, as we all know, in hot summer
10 days when -- let's take a hamlet truck, for example,
11 that does somewhat dust management in the communities.
12 When they use water, the water is gone in five minutes
13 or less on some hot days. It's almost like wasting
14 water. My other part of the question is that --
15 whether your dust monitoring goes further than normal,
16 if there is a normal. I mean, I'm thinking about our
17 environment where we have -- we may have high winds
18 springtime, summertime, even wintertime -- wintertime
19 especially because there may be -- there may be parts
20 of the road where the road is bare, where there's
21 gravel and dust, and then -- and then you get some
22 wind. Now, that wind will carry that dust. It will
23 drift on top of the snow, and it will carry it further.

24 What I'm saying is I don't think it -- how can you
25 say it? I have a problem with the guidelines that are
26 set somewhere else, because it does not suit our

1 climate and our environment in such snow conditions,
2 windy days. To me, it's like the impact will be
3 further out and a bit more spread out rather than it
4 being confined to where there's hardly any wind and
5 trees and whatnot, if you know what I'm trying to get
6 at.

7 Madam Chair, that's it.

8 MR. QUESNEL: Yeah. Thank you, Madam Chair.
9 Jamie Quesnel, Agnico Eagle.

10 Yeah, other things we're looking at is just the --
11 tying into generation of dust. Like, we have speed
12 limits on the road. So that's 50 kilometres per hour
13 on the all-weather access road from Baker to
14 Meadowbank, which has been in place since Day 1. Also
15 dealing with the haul road, we have a speed
16 restriction, 50 kilometres per hour.

17 Also, based on our learnings and discussions which
18 we're incorporating into the design of the Whale Tail
19 haul road is the type of material to topdress the road.
20 So material come from eskers based on the analysis
21 we've completed, that type of material to put on the
22 top layer of the road can generate less dust just based
23 on how that's made up, how that material is made up.

24 Then, also, just dealing with the application of
25 dust suppressants, just with the discussions we've been
26 having in 2016 and back for many years, we're

1 understanding the effectiveness of these suppressants
2 in key areas with discussions with stakeholders. But
3 we're dialling into a little bit more detail, like what
4 type of flour do we put on top? Does it have gravel?
5 Does it have -- is it coffee? A grain's particle size.
6 But we're finding from our studies, especially with the
7 Whale Tail haul road, with the esker material that
8 we're taking -- extracting the material from, the
9 impact is becoming less with the type -- with the dust.

10 So it's a combination of both and the construction
11 of the road, the type of material. And also where we
12 have challenges, where we can utilize the better
13 material, that's where the dust suppressant material
14 will be utilized. So the impact of dust would be
15 reduced based on those other controls, over and above
16 the western science, the actual practicality and
17 experience here with the all-weather access road and
18 using that information to finalize the construction of
19 the haul road from Whale Tail.

20 Hopefully that helps.

21 THE CHAIR: Thank you.

22 Allen.

23 MR. MAGHAGAK: Thank you, Madam Chair.

24 I have two questions with regard to the water
25 environment, freshwater environment.

26 As you had stated this morning -- my first

1 question: I would like to know, your fish-out prior to
2 dewatering a portion of Amaruq Lake, so-called Whale
3 Tail, will you be working with the HTO once you are
4 fishing out the Amaruq?

5 And if they choose to, meaning the HTO, rather
6 than relocating the fish that you'll be fishing out
7 from Amaruq, if they choose to donate the fish to the
8 community for those that may need it, will you be
9 acceptable to that after you have done your specimen
10 testing to the various fish that you've highlighted on
11 your report?

12 Quanqutit.

13 MR. QUESNEL: Thank you, Madam Chair.

14 Based on your question, yeah, we're open to have
15 that discussion with the Baker Lake HTO. However, with
16 the regulations we're working with -- primarily with
17 the Department of Fisheries and Oceans -- the biomass,
18 the transfer of that fish to the south basin, will be
19 part of the agreement. But we're willing to have those
20 discussions with the Department of Fisheries and Oceans
21 and Baker Lake Hunters and Trappers Organization to
22 understand that better, but we just have to understand
23 everyone's position on that. But we're open to have
24 that discussion and further work together on a
25 solution.

26 MR. MAGHAGAK: Thank you, Madam Chair. Allen

1 Maghagak, NIRB Board member.

2 On your fish-out of the portion of the Amaruq --
3 the lake at Amaruq/Whale Tail, I see that parts of it
4 will become part of your open-pit mining process. We
5 all know that with the uncertainty whether there are
6 some arsenic or phosphorous effluents that may be
7 detected once you have mined out the open-pit mine, for
8 those tests to be taking place to make sure that before
9 you refill it, as you had indicated in your report,
10 after you've all done your mining, will you be testing
11 to see again if -- or testing to make sure that there
12 are no arsenic and phosphorous effluents at the bottom
13 of the pit that you guys will be looking for gold prior
14 to refilling it back up with water; and then from
15 there, do continued testing and monitoring of the water
16 to make sure that you're not getting any arsenic or
17 phosphorous effluent from all the rocks that you have
18 taken out from the open pit? Will you be doing those
19 testing continuously pre-dewatering and after you open
20 the gates back up to fill it back up with water?

21 Thank you, Madam Chair.

22 MR. QUESNEL: Madam Chair. Jamie Quesnel.

23 I'll have an initial response, and my colleague
24 Valerie Bertrand can just add a few details.

25 Dealing with our studies right now -- so we're
26 analyzing the type of rock just from our drilling. So

1 we understand what type of rock. We wash the rock in
2 the lab. Also, on-site we have large tubs where we
3 have the broken rock from the core, and that is rinsed.
4 Okay. So we just let waters washing through it, and we
5 analyze the water as it washes through the rock. It's
6 like having coffee grains in the filter. We're washing
7 the water through, and we analyze that water that ends
8 up below through that container. So we're analyzing
9 it. We're continuing to analyze that.

10 And overarching to that is a model. We have a
11 model based on information that's input into this
12 model, and then it spits out a number. But as we
13 progress, we add all this field information to further
14 update our model based on field information.

15 Also, dealing with as we advance with the pit and
16 the pit -- the bath -- the final shape of that bathtub,
17 we understand the type rock around the walls, and that
18 will dictate what the water quality will look like
19 also. So there was earlier discussion about one of the
20 walls might be pushed back or pushing that wall into
21 cleaner rock; and that reduces the arsenic
22 concentration -- in our opinion -- dramatically, by
23 20 percent.

24 But, also, on top of all this is the Meadowbank
25 experience, what happens in these -- in these pits in
26 this climate, in this location, and also what the

1 triggers are. So we can understand that operationally
2 and make changes as that information comes to us.

3 And, overall, all the -- all the monitoring data
4 during every month, every year as we operate is input
5 into this model. And it gives us a prediction. And
6 from our experience, our model is very conservative,
7 very worst case. And our experience with the models at
8 Meadowbank is that the prediction from that field
9 information is much less than the model. So the model
10 is very conservative. But we're always updating that
11 model with field information.

12 So at the bottom of the pit, as you advance the
13 pit, you always hit pockets of water. So water's
14 coming into the pit; we analyze that water. What's the
15 recipe of that water? What's that water look like
16 chemically? And as we advance, we always look at that
17 water. It's collected into, like, a sump. We analyze
18 that water; and we keep on inputting that, looking at
19 the trends, analyzing that.

20 So it's a continuous process as we update. So
21 once we get to the re-flood, we have an understanding
22 what that water can look like. As we progress with all
23 this information from the model -- from the field, tubs
24 of rock -- as we advance the pit, we're getting more
25 information. And that's all included with our overall
26 interpretation and trending of water quality.

1 So I'll just turn over to Valerie, if there's
2 anything to add.

3 MS. BERTRAND: Thank you, Jamie. Valerie
4 Bertrand for Agnico Eagle.

5 So, yes, there will be monitoring, measuring of
6 the water throughout the stages of the -- of the mine.
7 So there's been sampling now of the water and of the
8 rock, and there will be sampling of the water in
9 contact with the rock as the mine is developed. Once
10 the pit is empty or once the pit is completely mined,
11 they'll -- there's going to be water put -- being put
12 back into that pit, and the water will again be tested.

13 So throughout mine life -- from today, the
14 baseline studies before any mining; through
15 operation/closure, when the water gets back into the
16 pit; and post-closure, before the dike is breached and
17 the water comes back, flows naturally -- the water will
18 be measured. So there will be a lot of information to
19 know where it's going and how it's going and if
20 measures -- different measures need to be taken to
21 ensure that the water quality limits are met.

22 Right now, through our model, we know that we need
23 to treat arsenic and phosphorous during operation
24 because there's a lot of activity, a lot of breaking of
25 rock, a lot of movement. And this requirement for
26 treatment decreases after mining is done. The extent

1 of treatment, the extent of control, we'll get a
2 better -- we'll get a good feel with -- as time goes
3 and with our experience at Meadowbank.

4 But be assured that right now our models are
5 conservative, meaning they exaggerate. We're pretty
6 sure that they exaggerate the situation based on our
7 experience at Meadowbank. The same team that did these
8 predictions of water quality at Meadowbank did the
9 predictions of quality here for Whale Tail. The same
10 methods were used for both sites. And today we have
11 information on the water quality at Meadowbank, and we
12 know that what we thought was going to happen based on
13 laboratory tests is very exaggerated because of various
14 things -- temperature, not much water, various things.
15 We don't have the site information at Whale Tail today.
16 We have some but not while the mine is operating 'cause
17 it's not -- the mine is not there yet. But we know
18 that the chemistry is going to be better. But all the
19 methods to control the water quality reflect our
20 worst-case model.

21 So from this, we're confident that the water
22 quality will be good; that we will meet the criteria,
23 the water quality criteria, that are set, that you saw
24 in the presentation there.

25 Hopefully this answers your question.

26 MR. MAGHAGAK: Thank you, Madam Chair. Allen

1 Maghagak, NIRB Board member.

2 On the last point on the monitoring process, my
3 last question will be on post-closure of the mine.

4 It seems we have a lot of lakes and rivers between
5 Amarug and Meadowbank, where your main camp is going to
6 be. Once you've done all that mining and you're
7 closing down, how long will you be monitoring the water
8 at Amarug and the river/tributaries that flow in and
9 out of there? How many years do you have on your plan
10 to continue to monitor to make sure that there are no
11 effluents coming out of the open pit that you guys will
12 be mining?

13 Quanqutit.

14 MR. QUESNEL: Thank you, Madam Chair. Jamie
15 Quesnel.

16 Dealing with the Whale Tail Pit Project, the
17 closure stage will be from 2022 to 2029. So it's a
18 closed system. The pit is being re-flooded. The
19 post-closure stage right now, based on additional
20 monitorings for -- from 2030 to 2046 -- so during this
21 monitoring period, we haven't finalized all the
22 criteria as of yet that would be discussed with Nunavut
23 Water Board.

24 However, based on our experience in Nunavut and
25 what's happening at Meadowbank and -- our intention
26 would be that the dikes would not be breached until the

1 water quality meets those objectives. So it's a closed
2 system; it's a bathtub. Those dikes will not be
3 breached until the water quality meets those objectives
4 that will be provided to us by the Nunavut Water Board.

5 So we'll be monitoring the re-flood, the water in
6 that bathtub, the pit. And then looking at downstream,
7 based on what Ryan was mentioning, with additional
8 sampling on the frequency, that would continue. And
9 the dikes would not be breached until that water
10 quality within the bathtub meets the criteria. It's a
11 closed system until that time. And this is based on
12 existing practices and conditions we have in
13 Meadowbank, also at -- also at Meliadine.

14 Hopefully that answers your question.

15 THE CHAIR: Thank you.

16 Henry.

17 MR. OHOKANNOAK: Thank you, Madam Chair.

18 I have a question about the open pit after the
19 closure of the mine.

20 And I've seen these waste rock piles in Diavik and
21 in McClean Lake in -- was it in Saskatchewan or --
22 yeah. Those waste rock become like a big hill or
23 mountain. So after the closure, when you're doing the
24 remediation, are you going to be filling up those open
25 pits from that waste rock? Or is it just going to
26 leave it open and it becomes a lake afterward?

1 Thank you, Madam Chair.

2 Sorry. Henry Ohokannoak, Nunavut Impact Review
3 Board.

4 MR. QUESNEL: Thank you, Madam Chair. Jamie
5 Quesnel.

6 The plan right now which will be at Whale Tail is
7 to have the waste-rock storage facility. However,
8 saying that, Meadowbank, in the Portage pit, we've been
9 placing some waste rock. As per our management plans
10 and as per our agreements at Meadowbank, we have placed
11 some material, some waste rock, into a section of the
12 pit.

13 We have waste-rock storage facilities at
14 Meadowbank. They are covered with clean material. So
15 they're -- basically you have a shield about 4 metres
16 thick of clean rock over the waste rock. We've been
17 analyzing that closure at Meadowbank since Day 1. So
18 we have that information; we have instrumentation. So
19 that concept, which has been evaluated and tested,
20 assessed by multiple parties -- we feel very confident
21 based on how to manage the waste-rock storage facility
22 at Whale Tail. It's a common practice with that type
23 of cover to ensure there's minimal or no water leaching
24 coming out of that waste-rock storage facility.

25 But saying all that, we have -- at Portage pit at
26 Meadowbank, we have placed some waste rock into the

1 pit.

2 So hopefully that addresses and answers your
3 question.

4 MR. OHOKANNOAK: Henry Ohokannoak, Nunavut
5 Impact Review Board. Thank you, Madam Chair.

6 My question, you answered part of it. At the end
7 of the life of the mine and when you're -- when you're
8 going to close down the mine permanently, what I --
9 what I want to know is that -- are you going to fill up
10 the open pit with all that waste rock you just took out
11 in the past 20 years? Are you going to be filling it
12 right up with the waste rock, those open pits? I don't
13 know if I'm making myself clear, but that's the
14 question I have.

15 Thank you, Madam Chair.

16 MR. QUESNEL: Thank you, Madam Chair.

17 So at closure, no, we will not be putting the
18 waste rock into the open pit. No.

19 MR. OHOKANNOAK: That's all the questions I
20 have.

21 THE CHAIR: Thank you.

22 I don't think there's any other questions from the
23 Board.

24 Next is your presentation on terrestrial
25 environment.

26 Legal counsel.

1 MS. MEADOWS: Thank you, Madam Chair.

2 Teresa Meadows, legal counsel for the Nunavut Impact
3 Review Board.

4 It's my understanding that there are a few
5 additional exhibits that are associated with this
6 presentation that will assist us in supporting the
7 presentation being provided by Agnico Eagle.

8 So maybe, Ms. Kowbel, if I can go through those
9 with you.

10 MS. KOWBEL: Christine Kowbel,
11 Agnico Eagle.

12 Yes. Thank you.

13 MS. MEADOWS: So, Madam Chair, Teresa
14 Meadows, legal counsel for the Nunavut Impact Review
15 Board.

16 It's my understanding that Agnico Eagle, for the
17 convenience of the parties, has provided a separate
18 bound copy of the terrestrial ecosystem management
19 plan. It's already been filed with the Board
20 previously, but this is in a convenient single-volume
21 set so that people can refer to it during the
22 presentation.

23 The second additional exhibit is the resume of
24 John A. Virgl from Golder Associates, which we hadn't
25 previously received.

26 And the third additional exhibit in addition to

1 the presentation is a map entitled "The Proposed
2 Exploration Access Road on Inuit-Owned Lands". That
3 again was provided for convenience of -- and reference
4 for the Board.

5 So what I would propose to do is mark those as the
6 next three exhibits as well as the presentation, which
7 is the fourth exhibit.

8 EXHIBIT 5 - Agnico Eagle hard copy PowerPoint
9 presentation entitled "Part V - Terrestrial
10 Environment" (English/Inuktitut)

11 EXHIBIT 6 - Agnico Eagle map, Figure 1.4-2,
12 entitled "The Proposed Exploration Access
13 Road on Inuit-Owned Lands" (English)

14 EXHIBIT 7 - Agnico Eagle terrestrial
15 ecosystem management plan, Meadowbank
16 division, Version 4, July 2017 (English)

17 EXHIBIT 8 - Agnico Eagle resume of John A.
18 Virgl of Golder Associates

19 MS. KOWBEL: Thank you, Madam Chair.
20 Christine Kowbel for Agnico Eagle.

21 There is one more exhibit, and that is the -- it's
22 a map book. Again, these are all maps that have been
23 provided previously in presentations and are also, in
24 larger form, posted around the room.

25 MS. MEADOWS: Madam Chair. Teresa Meadows,
26 legal counsel for the Nunavut Impact Review Board.

1 Madam Chair, I'm not going to file that
2 specifically as an exhibit as the maps have already
3 been filed as part of everything else. They're only
4 provided for the parties that are here for ease of
5 reference. And they reflect a number of the maps that
6 are posted up on the walls, and we also don't file
7 those as exhibits in the hearing due to the logistical
8 constraints of being able to scan them in as hard copy
9 exhibits.

10 So thank you, Madam Chair.

11 Are there any additional witnesses that need to be
12 sworn in advance of this presentation?

13 MR. QUESNEL: Thank you, Madam Chair.

14 Yes. Two additional colleagues, John Virgl and
15 Corey De La Mare.

16 COREY DE LA MARE, JOHN VIRGL, Affirmed

17 MS. MEADOWS: Teresa Meadows, legal counsel
18 for the Nunavut Impact Review Board.

19 Thank you, Madam Chair. Those are all my
20 procedural matters.

21 THE CHAIR: Thank you.

22 You may proceed with your terrestrial environment
23 presentation.

24 Presentation by Agnico Eagle Mines Limited (Terrestrial
25 Environment)

26 MR. VANENGEN: Mat'na, Madam Chair.

1 My name is Ryan Vanengen, and for the next
2 45 minutes, Corey De La Mare and John Virgl and I will
3 be discussing and presenting the terrestrial
4 environment section of the final environmental impact
5 assessment.

6 Although we'll be speaking to the monitoring and
7 protection of all the terrestrial wildlife in this
8 presentation, our primary focus of the presentation
9 will be on caribou. More specifically, at the
10 beginning of the presentation, we'll go through the
11 Inuit Qaujimajatuqangit, which informed our terrestrial
12 monitoring. Corey's going to present on some of the
13 caribou herd movements, and we have a video that we'll
14 present that shows caribou movements based on the GN
15 collaring. I'm going to discuss some of our caribou
16 monitoring and mitigation techniques. We have the
17 decision trees that Jamie referred to earlier. That
18 will be the rules for our implementation of monitoring
19 of mitigation related to caribou. There's also a short
20 animation that describes the implementation of our
21 decision trees. Then we'll -- Corey's going to present
22 on the caribou impact assessment, the recent
23 zone-of-influence studies and cumulative encounter
24 studies that were conducted. And then we're going to
25 finish off with a few slides related to the general
26 terrestrial wildlife mitigation and, lastly, the

1 protection of birds and waterbirds.

2 In the terrestrial environmental assessment, the
3 following valued components and other components were
4 assessed: permafrost, terrain and soils, and
5 vegetation, also wildlife habitat. The wildlife valued
6 components were ungulates, predatory mammals, raptors,
7 waterbirds, and upland birds.

8 Inuit concerns that were discussed during Inuit
9 Qaujimajatuqangit workshops included the loss of
10 vegetation and wildlife habitat; concerns on
11 disturbance of -- to wildlife habitat, including
12 disturbance to dens, concerns related to birds, and
13 concerns related to caribou and muskox. There were
14 also concerns related to the wildlife ingestion of
15 chemicals and concerns with the caribou crossing safely
16 across the haul road, and Inuit shared concerns with
17 changes to caribou and the impact to harvest.

18 I'm not going to spend too much time on the -- on
19 the next few slides in the interest of time but --
20 because we discussed these already yesterday during the
21 public participation and public engagement, but we
22 used -- I will spend just a few minutes, though. And
23 what we -- what we did was we used Inuit
24 Qaujimajatuqangit to -- that was collected at many
25 intervals throughout our baseline studies to integrate
26 into our baseline studies and then inform our

1 monitoring and mitigation. This began in 2014, as
2 described yesterday; in 2015; and 2016. And throughout
3 the process, Inuit Qaujimajatuqangit guided the
4 baseline studies and informed our design of our
5 project.

6 After collecting baseline studies, these findings
7 were then shared with community groups over the course
8 of those few years, and that was done through community
9 meetings, as well as mine site meetings and follow-up
10 workshops that were discussed yesterday. It also
11 involved -- we also engaged community members,
12 including elders and the Hunting and Trapping
13 Organization, through site visits to our -- along
14 our -- along our Whale Tail Pit haul road as well as
15 around our Amarug site and Whale Tail Pit site.

16 As described yesterday, what we learned from these
17 workshops informed our monitoring and mitigation plans
18 for the terrestrial environment, and what we learned
19 was that den sites and wolf activity was in areas along
20 the haul road. And we protected for that, and we will
21 continue to protect that through monitoring and
22 mitigation. We also learned of the direction of
23 caribou migrations, as discussed yesterday. And Inuit
24 shared their concerns of the loss of vegetation and
25 wildlife habitat as well as concerns related to caribou
26 crossing the haul road and changes to caribou, impacts

1 to harvest.

2 From these workshops, we overlaid the information
3 collected in our Inuit Qaujimajatuqangit workshops. We
4 overlaid that information with some of the western
5 science and data that we collected. And those data
6 include the caribou collaring data, as provided by the
7 Government of Nunavut, which is shown on this figure
8 here. That shows a series of arrows moving in
9 different directions that tell us where the caribou
10 collared animals move and how they interact with our
11 project. So we overlaid the information provided
12 through Inuit Qaujimajatuqangit, which told us that the
13 caribou are migrating in the spring to the north and,
14 in the fall, generally to the south and, in particular,
15 in areas around just north of Whale Tail Pit -- or --
16 sorry -- Vault pit and just north of our Meadowbank
17 mine site.

18 So what that allowed us to do, using the IQ, is
19 to -- is to -- overlaying the IQ with all of the
20 western science that was collected, we were able to
21 then focus our monitoring through baseline studies in
22 areas to the south and in areas around our mine site.
23 We also -- using the GN collaring data, we also
24 established fixed monitoring stations at these key
25 areas where caribou are crossing to ensure the
26 protection of caribou that are interacting through our

1 site.

2 Using Inuit Qaujimagatugangit, Government of
3 Nunavut collaring data and field data collection, and
4 applying the ten years of operating experience, we are
5 confident that the Whale Tail Pit mining activities
6 will not have an impact on caribou herds that interact
7 with our project.

8 Now, for the next few minutes, Corey will spend
9 some time summarizing the caribou herd movements in
10 relation to our project.

11 MR. DE LA MARE: Thank you, Ryan.

12 Madam Chair and Board.

13 So here is just a brief summary of some of the
14 information on how we use the collar information to
15 describe the interaction with the project.

16 So this table is essentially summarizing all of
17 the -- all of the caribou collar time. Sorry. I got
18 an audience there. There we go. Right there.
19 Summarizing all of the caribou collar time. So as an
20 example, if a collar is on an animal for a year, that's
21 365 days of caribou collar time. So in our assessment,
22 we took the project area, and we applied a 25-kilometre
23 regional study area, so 25 kilometres on either side;
24 so it's 50 kilometres in total. And we look at the
25 amount of time that a caribou -- that a collared
26 caribou spends in that -- in that area. And so based

1 on the total collar time available for that area, we've
2 found that it's roughly less than 1 percent of collared
3 caribou spend time within 25 kilometres on either side
4 of the project area.

5 So the herds we're dealing with here -- this is
6 the map in the handout that was given to you, the large
7 map of all the herd boundaries in the area. So the red
8 outline up here shows the Whale Tail Project area haul
9 road there. So there's the haul road and the Whale
10 Tail Pit to the north. This is the project area here.
11 This orange boundary here is the Lorillard caribou
12 herd, and this bluish boundary up here is the Wager Bay
13 caribou herd. And then there's a few herds that have a
14 little less interaction with the project. The
15 Qamanirjuaq herd down here does not overlap with the
16 project area. Then we have the Ahiak caribou herd in
17 this boundary here and the Beverly over here.

18 The thing we want to -- the point I want to point
19 out to you folks is that the calving areas are these
20 darker circles here of all of these different herds.
21 And so the project is here, and we just want to point
22 out that it's not near any of the calving areas.

23 So Baker Lake is here. Rankin Inlet's here. This
24 is Chesterfield Inlet -- just to give you an idea of
25 scale.

26 So the next -- the next -- yeah, the next video

1 here we have -- so what we've done is the collared
2 caribou information comes from the Government of
3 Nunavut as part of their monitoring program to look at
4 where caribou are moving throughout the landscape, and
5 we've taken that information and put it all into an
6 animation so you can see over the course of a year in
7 general where all the caribou move from these different
8 herds and how they interact with the project.

9 So, Jen, if you can start --

10 MR. BARRY: Sorry, Madam Chair.

11 MR. DE LA MARE: -- the animation.

12 Nunavut Impact Review Board Staff Questions

13 Agnico Eagle Mines Limited

14 MR. BARRY: Apologies for interrupting.

15 Ryan Barry, Nunavut Impact Review Board staff.

16 There's some confusion over here with the filed
17 exhibit and what we're seeing on the screen. Can you
18 clarify if there's differences with what we have, as
19 this visual that you have right there is different than
20 the actual print presentation. We just want to know if
21 there's any other differences with the filed materials.

22 MR. VANENGEN: Ryan Vanengen from

23 Agnico Eagle.

24 We inserted this figure, which is in the EIS.
25 It's presented in the baseline characterization report,
26 as well as in this map book. So we just, for

1 presentation purposes, put this figure up here to be
2 consistent with the map book that was provided to NIRB.

3 MR. BARRY: Thank you, Madam Chair. Ryan
4 Barry, Nunavut Impact Review Board staff.

5 Okay. We appreciate that, and it's helpful to
6 know. Do you have the specific reference to this table
7 from the final environmental impact statement that you
8 can provide? That way we can just note it for our
9 record here.

10 MR. VANENGEN: Yeah. For the record, it's
11 Figure 7.1 in the terrestrial baseline characterization
12 report, and it's called "Caribou Calving Areas".

13 THE CHAIR: Okay. Go ahead.

14 Resumed Presentation by Agnico Eagle Mines Limited
15 (Terrestrial Environment)

16 MR. DE LA MARE: So -- pardon me -- at the very
17 top of the screen, you have the dates. So it's
18 describing right now the winter period, and it'll go
19 from January to December. So on the right-hand side,
20 we're showing a larger extent of the range; and on the
21 left-hand side, where the screen is split, it's just
22 zoomed into the project area.

23 So in the winter period, there are a few caribou
24 that come and interact with the -- with the project.
25 But, in particular, here is where we want to take note
26 as we approach the spring migration period. So that's

1 when a large portion of the caribou herd comes through
2 the site on the way to the calving grounds.

3 Yeah. The colours here, if you remember the
4 colours before, the herds in particular that interact
5 are the green, which is the Lorillard; and the red,
6 which are up here calving, which is the Wager Bay herd.
7 Those are the primary two herds that come through the
8 project area.

9 So we go through the summer, and we start to see a
10 little bit of movement back towards the project area.
11 And then as we approach sort of the fall migration,
12 we'll see a couple pulses of movement through the
13 project area.

14 So it's now into the fall migration period.
15 There's some that move through there, and there's one
16 more coming. And then there's another movement there.
17 And then we head back into December and the winter
18 period here. That's good.

19 So what this allowed us to do -- and if we're
20 interested, we can -- obviously we have this; we can
21 show it at any time again -- was just to illustrate
22 the -- primarily the predictive ability to understand
23 when caribou are interacting with the project.

24 So as part of the final environmental impact
25 statement, we look at a variety of different types of
26 effects to wildlife and, in particular, to caribou; and

1 that includes the direct loss of wildlife. So that's a
2 result of mortality that can happen. We look at the
3 loss of bird habitat and potential denning habitat in
4 addition to habitat from -- for caribou as well, and we
5 look at the direct habitat. So that's -- direct
6 habitat loss comes when you put, say, a waste-rock
7 storage pile on a piece of the land. That will then
8 take away a habitat for a specific species. So we
9 measure that.

10 And then we also look at the indirect effects of
11 mining and the road on animals through noise, as we do
12 anticipate that haul road traffic will cause an
13 indirect impact to wildlife, including caribou. It
14 will -- it has the definite potential to impact their
15 movements and their distribution. So as we have there,
16 haul traffic is expected to have an effect on caribou
17 movements.

18 However, we have the terrestrial ecosystem
19 management plan where we will implement adaptive
20 management in particular as a whole to manage -- to
21 monitor and mitigate and manage our operations to avoid
22 disturbance to caribou and other wildlife. So with
23 these mitigation measures in place -- so considering
24 the mitigation, considering the historical learnings
25 that Agnico Eagle has had from operating their
26 Meadowbank mine, we're confident there will be no

1 adverse effect on caribou or other terrestrial wildlife
2 in the project area.

3 Back to Ryan.

4 MR. VANENGEN: Mat'na. Ryan Vanengen from
5 Agnico Eagle.

6 Thanks, Corey.

7 Our monitoring of wildlife in the terrestrial
8 environment is holistic. We monitor the animals that
9 interact with our project, as Corey described. We
10 monitor the birds that visit in the open-water season
11 and the habitat that all these terrestrial wildlife
12 rely on -- including air, vegetation, soil, and water.

13 This monitoring is guided by the valued ecosystem
14 components that were identified through Inuit
15 Qaujimagatugangit workshops and consultation. We
16 monitored the valued ecosystem components and
17 determined if they are -- if we are causing impacts,
18 review our results with the Nunavut Impact Review
19 Board, and adjust our monitoring accordingly. This is
20 done through collaboration with stakeholders.

21 Examples of collaboration is our commitment to the
22 GN caribou collaring program. This has allowed
23 Agnico Eagle and all of Nunavut and the GN to better
24 understand our caribou population in Nunavut. It
25 includes the Meadowbank area and also the Whale Tail
26 Pit area. The monitoring includes the installation of

1 collars on animals; and in 2008, 2009, and 2011,
2 Agnico Eagle supported the installation of 25 collars
3 plus thereafter 15 more collars between now -- or
4 between then and 2016.

5 Recently, we signed a three-year agreement and
6 renewed our memorandum of understanding with the
7 Department of Environment and the Government of Nunavut
8 to continue our caribou collaring monitoring. We are
9 now committed to contributing \$150,000 per year to
10 these caribou studies. Going above and beyond that and
11 not to duplicate research or efforts, we are also
12 working with the Government of Nunavut and academic
13 researchers to better understand the effectiveness of
14 our monitoring and mitigation.

15 It is our goal to have zero harm to caribou herds
16 that interact with our project. Based on our ten-year
17 experience at Meadowbank, we will continue to use tools
18 that are proven and effective. That includes the
19 caribou collaring program in collaboration with the
20 Government of Nunavut that was described in the
21 animation that Corey provided. We will continue to use
22 mine site and haul road surveys. We will conduct
23 all-weather access road surveys. We'll continue
24 working with the Baker Lake Hunting and Trapping
25 Organization, the Kivalliq Inuit Association, and
26 elders. And we will continue to hire local field

1 technicians.

2 Based on workshops and discussions, Agnico Eagle
3 has added the following to our terrestrial ecosystem
4 monitoring program based on concerns that were brought
5 up during these caribou workshops: So we've increased
6 our mine site and haul road height -- haul road
7 height-of-land surveys. We have now two dedicated
8 local technicians that are going to be monitoring
9 wildlife along our roads. One of those would be a
10 Baker Lake HTO representative. And we will install
11 gates and install alert signs at the beginning of the
12 road and at the end of the Whale Tail Pit haul road.

13 Furthermore, we are considering the following
14 monitoring: We're considering different uses for
15 cameras. One of the cameras that we're looking at is
16 called a Reconyx camera that will monitor the behaviour
17 of caribou crossing over our road and near our site,
18 and we're looking at different cameras as well that
19 will provide us the opportunity to detect caribou
20 beyond the naked eye or 3 kilometres, and these will --
21 these -- what we're considering are cameras that are
22 similar to what was discussed during the Sabina review.

23 All of these techniques will continue to be
24 informed by Inuit Qaujimaqatugangit and traditional
25 knowledge. The data that we will be collecting will be
26 shared with the terrestrial advisory group, which we've

1 been working with for the past year; and we will
2 continue to inform our -- and this will continue to
3 inform our monitoring approach, including but not
4 limited to height-of-land surveys, road surveys, and
5 new technologies for monitoring.

6 An example of our collaboration with the
7 terrestrial advisory group or the caribou workshop
8 attendees has been in our analysis of the
9 height-of-land locations using viewscape analysis. The
10 TAG members expressed their interest in having this
11 done along the entire haul road, and we've completed
12 that task and have presented it to the Nunavut Impact
13 Review Board.

14 In this photo here or this -- sorry -- this figure
15 here, it shows our ability to see caribou from a
16 height-of-land location. All of the area in brown is
17 visible. And this is that area that was identified
18 through Inuit Qaujimagatuqangit to be a crossing
19 location for caribou. And this height-of-land location
20 indicated with a star here and another one indicated
21 with a star here tells us that we can see caribou out
22 to four kilometres with quite a bit of accuracy, thus
23 addressing some of the concerns that the -- that the
24 terrestrial advisory group workshop attendees had.
25 That being said, we're open to adapting different
26 monitoring locations along our road, and our haul road

1 surveys will allow us to see, in most cases, to at
2 least four kilometres beyond our project area.

3 Agnico Eagle has worked within a tiered approach
4 to monitoring and mitigation for the last ten years at
5 our Meadowbank mine site and intends to do the same
6 thing for the Whale Tail Pit site. The revised
7 terrestrial ecosystem management plan is a
8 comprehensive plan that integrates the terrestrial
9 advisory group recommendations and goes above and
10 beyond what has been done at the Meadowbank site to
11 date. And it includes mining activities at the Whale
12 Tail Pit. It includes monitoring and mitigation in
13 the -- in the Whale Tail Pit area as well as the haul
14 road. It also includes monitoring and mitigation on
15 the all-weather access road and the milling and camp
16 activities at the Meadowbank mine site.

17 As per the Nunavut -- as per the Meadowbank
18 Nunavut Impact Review Board project certificate
19 conditions, we meet with the Hunting and Trapping
20 Organization at least annually to discuss the results
21 of our wildlife monitoring. And, in fact, more often,
22 we meet on a quarterly basis with the Baker Lake HTO.
23 Overall, we have had good feedback over the years from
24 the Baker Lake HTO -- however, with few comments from
25 the Nunavut Impact Review Board intervenors regarding
26 the terrestrial ecosystem management plan methods and

1 caribou mitigation since 2008.

2 As part of the Whale Tail Pit review process and
3 to fulfill our Nunavut Impact Review Board information
4 request responses, we have collaborated with the
5 Hunting and Trapping Organization, the Government of
6 Nunavut, and the Kivalliq Inuit Association by hosting
7 three workshops. The first one -- three workshops
8 specifically related to the terrestrial ecosystem
9 monitoring plan and caribou monitoring and mitigation.
10 Those workshops were held on November 18th, 2016, in
11 Winnipeg; February 22nd and 23rd, 2017, in Ottawa; June
12 20 and 21st, 2017 in Winnipeg. And we intend to
13 continue to meet with TAG members through the life of
14 the mine of Whale Tail Pit.

15 We are committed to protecting caribou through our
16 operations with heightened protection measures during
17 the fall and spring migration. Several comments to
18 improve during these workshops included introducing a
19 group-size threshold, having a tiered caribou
20 protection response, and increasing monitoring
21 frequency and changing our locations for our surveys.

22 For caribou monitoring and mitigation, based on
23 the workshops, we've revised decision trees on numerous
24 occasions through the process and we've developed
25 group-size thresholds based on sensitive fall and
26 spring seasons and GST distances. These have generally

1 been agreed upon by TAG members and, in particular, the
2 methods used to determine the group-size thresholds.
3 That said, it continues to be our goal to have zero
4 harm to all caribou throughout the year.

5 Based on the Inuit Qaujimagatuqangit related to
6 spring and fall caribou movements and group caribou
7 monitoring workshops held with the terrestrial advisory
8 group, we developed these group-size thresholds. In
9 the fall -- which Agnico Eagle agrees with the
10 Government of Nunavut is from September 22nd, 2015 --
11 the group-size threshold is 140 caribou. That's the
12 sensitive season as identified through all of our work.
13 The other sensitive season was identified as the spring
14 season, which is from April 1st to May 25th, and we
15 have a group-size threshold or protective threshold of
16 14 caribou. So you can see how our -- we're now having
17 a much lower number of caribou that will then trigger
18 our mitigation action. We also have group-size
19 threshold triggers for the winter and also the summer.

20 The next series of slides will present the details
21 of our tiered approach to monitoring and mitigation and
22 will explain the group-size thresholds a little bit
23 more clearly and how we would implement those and the
24 mitigation action in our decision trees.

25 We'll first present a high-level approach to using
26 a green-, amber-, and red-light approach to ensure the

1 protection of caribou. This green-, amber-, and
2 red-light approach is no different to Agnico Eagle than
3 a blizzard shutdown procedure. So if caribou enter
4 into our site and exceed a group-size threshold, we
5 would then enter into an amber alert, which in some
6 cases may lead to a red alert. And I'll describe the
7 rest of that, the sequences of monitoring and
8 mitigation related to those alerts.

9 Under the green-light scenario, routine monitoring
10 occurs year-round and our operations would continue as
11 Jamie described in the introduction. Under a Level 1,
12 using caribou collaring information, if one caribou is
13 within 25 kilometres of our activities, we would
14 increase our monitoring and increase notifications.
15 Under a Level 2 scenario, if our group-size threshold
16 based on those different seasons is exceeded within
17 4 kilometres or the maximum distance observed, we will
18 again increase our monitoring. We will also increase
19 our mitigation. That may include convoys, speed
20 reductions, and will certainly include alert through
21 dispatch notifications every three hours, and this
22 dispatch notification would be throughout the mine site
23 and for all operators on the haul road. We would also
24 notify the Kivalliq Inuit Association, the Government
25 of Nunavut, and the Baker Lake HTO.

26 In a Level 3 or a red alert, we would also have

1 even more heightened monitoring. And this would be if
2 alerts -- if we are observing caribou greater than the
3 group-size threshold within 1.5 kilometres of our haul
4 road or mining activity. So mitigation in particular
5 in sensitive seasons may include immediate suspension
6 of vehicles within 500 metres of the group of caribou,
7 immediate suspension of non-essential vehicles. We
8 would close our gates. Haul trucks would complete
9 their haul to the mill at a reduced speed of
10 30 kilometres per hour. We would have site-wide
11 notifications hourly. And, if needed, depending on the
12 circumstances, we may cease all mining activities.

13 So that was a high-level overview of our green,
14 amber, and red alerts that would guide our caribou
15 mitigation and monitoring. The next two slides will
16 present the decision tree using examples of operations
17 on the Whale Tail Pit haul road. So this is taken
18 from -- this is Figure 7 from our terrestrial ecosystem
19 monitoring plan, but we have other decision trees that
20 are also related to mine activities and to the
21 all-weather access road activities as well. But
22 because of the concerns related to the haul road and
23 the interaction of the haul road on caribou, I'll be
24 presenting mainly focused on the haul road activities.

25 The decision trees that I'm going to review on the
26 next two slides are rules for on-site managers,

1 environmental technicians, and operators to make clear
2 and transparent decisions to protect caribou. There
3 will be training for road operators, and we will follow
4 the rules much like the green-, amber-, and red-alert
5 signs for a blizzard shutdown.

6 During routine monitoring, wildlife have the
7 right-of-way. So a machine operator will always yield
8 to wildlife on the haul road. In a Level 1 -- Level 1,
9 as I described earlier, would be triggered if, through
10 caribou collaring data, one collared animal is within
11 25 kilometres based on the Government of Nunavut
12 collaring data. And, therefore, we would -- we would
13 initiate an amber alert under a Level 1 scenario; and
14 what that means is that we would have heightened
15 monitoring, described here -- and I've already
16 described that; so I won't repeat it -- and heightened
17 mitigation as well, including site-wide notification.

18 Level 2 would be triggered, as I described, if our
19 group-size threshold within 4 kilometres or maximum
20 observable distance is exceeded. So in the case of the
21 fall, that would mean, if 140 caribou are observed
22 within 4 kilometres of our activities, we would then
23 initiate a Level 2. We remain at a Level 2 and an
24 amber alert, and what that means is that we'll have
25 heightened monitoring, we'll have road surveys more
26 frequently, and we'll request the GN collaring data to

1 be provided to us at least daily or as frequently as
2 made available to Agnico Eagle. Our mitigation would
3 be the same; but, most importantly, we would
4 immediately notify the Kivalliq Inuit Association as
5 well as the Baker Lake HTO as well as the Government of
6 Nunavut to discuss what mitigation might be necessary
7 based on the circumstances and the monitoring data that
8 we receive from our technicians in the field.

9 A red alert would be initiated if greater than the
10 caribou group-size threshold is exceeded -- so in the
11 fall, if greater than 140 caribou enter into
12 1.5 kilometres of our activities. What that would mean
13 is that we would once again increase all of our
14 monitoring and we would put in action the suspension of
15 the activities on the haul road. So what that means is
16 that non-essential vehicles, such as haul trucks, would
17 then continue their hauling route from Whale Tail Pit
18 back to the Meadowbank Mill and any new trucks on the
19 road would -- haul trucks on the road -- would not be
20 allowed. Trips in progress, so those trips that I
21 described, the haul trucks would be -- would decrease
22 their speed down to 30 kilometres per hour, and the
23 gates would be closed on the road. We would also have
24 increased monitoring and, in particular, increased
25 monitoring nearest to where the caribou herd is
26 observed. So we would have technicians in that area

1 around the herd. And, ultimately, that monitoring will
2 inform whether or not the road would be reopened,
3 especially if there were animals or project-tolerant
4 caribou. But, ultimately, under any circumstance in a
5 red, the traffic speeds would be reduced on the road to
6 30 kilometres per hour.

7 So for the next few slides, there's going to be an
8 animation that once again is going to hopefully provide
9 a visual of the steps that we would take to shut down
10 the Whale Tail Pit haul road when we see caribou.

11 That's good, Jen. Thanks.

12 So under this example, we have routine monitoring
13 of the -- of the Whale Tail Pit haul road. Using the
14 example for the next few slides in the animation, we're
15 going to assume that this is in -- happening right now,
16 so in the fall season. And let's assume that these
17 three caribou to the north of our project represent 150
18 caribou.

19 So under this scenario, we're under a green alert.
20 So we're routinely monitoring, and we're also
21 continuing our hauling from the Whale Tail Pit to the
22 Meadowbank site, as described by Jamie.

23 We would enter into a Level 1, and this would be
24 based on the Government of Nunavut collaring data which
25 tells us that one caribou has entered within
26 25 kilometres of our site. So here's our site, and

1 these -- this dotted line is 25 kilometres from our
2 site, which represents our regional study area within
3 our impact assessment. What that means, as I described
4 earlier, is that we're in the amber alert and we would
5 increase our monitoring. We would also increase our
6 dispatch to announce caribou presence along our haul
7 road. But our haul trucks would continue to operate at
8 the same rate, as described by Jamie.

9 Under a Level 2 scenario, as I described, that
10 would be a scenario where caribou are observed within
11 4 kilometres by our monitoring surveys. So our
12 technician on the side here observes caribou entering
13 within 4 kilometres of our site. We would remain on an
14 amber alert. And our wildlife monitors, including the
15 Baker Lake HTO members, would count the number of
16 caribou; and they will have determined that that herd
17 or these three caribou here represents 150 caribou.
18 And, therefore, we would exceed our group-size
19 threshold. What that means is that we would increase
20 our monitoring; we would have dispatch notify our haul
21 road operators more often, and any mine activities
22 would be notified that caribou are within the area; and
23 we would meet with the Baker Lake HTO, who would be
24 on-site doing the monitoring; as well as we would
25 invite the Kivalliq Inuit Association to join us
26 on-site and contact the GN conservation officer as well

1 to join us on-site.

2 Under this scenario, we would continue to operate
3 our road and the trucks would still operate at the same
4 frequency. But, as an example, under a Level 2, it may
5 be recommended that -- it may be recommended by the
6 Baker Lake HTO or other groups -- like the conservation
7 officer, the GN conservation officer; or the Kivalliq
8 Inuit Association -- they may recommend to us based on
9 their site visit and based on information that we need
10 to reduce the speed of the haul road under an amber
11 alert. So our haul trucks would then move from the
12 Whale Tail Pit site to the Meadowbank mine site at a
13 reduced speed, as illustrated in this animation.

14 And, as I mentioned, we would meet with the
15 Baker Lake HTO as well as the GN. What might also come
16 out of discussions with the Baker Lake HTO as well as
17 the Government of Nunavut and the Kivalliq Inuit
18 Association is that we may have to implement things,
19 other mitigation measures, in addition to speed
20 reductions which might include convoys.

21 Now, the next slide describes our Level 3
22 scenario. And under a Level 3 scenario, which means
23 that we would exceed our group-size threshold of
24 caribou nearest to our activities -- and that
25 exceedance would be when the 150 caribou, using this
26 example, are within 1.5 kilometres of our road. And

1 based on recommendations from our stakeholders, it may
2 require that we shut down our road. So we then enter
3 into a red alert or a shutdown scenario, which means
4 that the haul trucks that are past the caribou, that
5 have safely passed the caribou, would continue their
6 haul to the mill and the other trucks that might be
7 loaded at the Whale Tail Pit site would have to stay
8 there.

9 Under this scenario, we envision that the GN
10 officer as well as the Baker Lake HTO representative
11 and possibly the GN -- the GN officer would be on-site
12 with us to make decisions on what to do next. And what
13 that would mean is that essential vehicles would still
14 be using the haul road -- so that would be ERT -- but
15 mainly our monitoring crew would still be using the
16 haul road under that scenario to determine what the
17 next steps are and to inform our operations.

18 After shutting down the road, using this example,
19 for, let's say, 24 hours, what's observed from our
20 observers on-site is that the caribou have passed
21 through our site. So they're now 4 kilometres away.
22 And what's determined through consultation on-site is
23 that we can then continue our haul road, but perhaps
24 it's recommended that we use convoys or reduce our
25 speed. But, nevertheless, our haul trucks would
26 continue, under an amber alert, hauling material from

1 Whale Tail Pit to the Meadowbank mill.

2 And under a Level 2 scenario for monitoring, we
3 would continue that monitoring and mitigation for ten
4 days, as per our decision tree. We would remain in
5 that amber alert for some time, for those ten days.

6 And haul trucks would then continue to haul material
7 from our Whale Tail Pit site to the Meadowbank mill at
8 a rate described by Jamie earlier.

9 And that would -- all of these steps in our
10 decision tree will ensure that the caribou that
11 we've -- that we know from Inuit Qaujima jatugangit as
12 well as the western science data -- we know that they
13 move from the north to the south. It would ensure that
14 those 150 caribou, using this example, are protected as
15 they move through our site. That animation has
16 replaced Slides 27 and 28. The reason why we separated
17 that animation out was to -- to not -- or to still have
18 the correct pagination with our slides.

19 Yeah. Go ahead, Teresa.

20 MS. MEADOWS: Thank you, Madam Chair, Teresa
21 Meadows, legal counsel for the Nunavut Impact Review
22 Board.

23 In light of the fact that these animations had not
24 been filed previously with the Board, I'm going to
25 suggest that we actually mark them as exhibits. We
26 have received them in electronic form, and so I'm going

1 to suggest that we actually mark them as exhibits and
2 make them available upon any request. And I would
3 invite any of the participants that are here, if you
4 are interested in getting a copy of the exhibit for
5 yourself so that you can take a look at it at your
6 leisure, you can please see Sophia, and we'll make
7 those available.

8 So for the record, now I have three video clips, I
9 believe, from the first exhibit, which was the
10 introduction and overview. We have the rendering of
11 the three stages of the project associated with Slide
12 Number 19, so that will be the next exhibit, being
13 Exhibit Number 9, in this hearing.

14 EXHIBIT 9 - Digital rendering of three stages
15 of the project (video clip associated with
16 Exhibit 1: Part I - Introduction and
17 overview, Slide 19)

18 MS. MEADOWS: We have Exhibit Number 5,
19 which -- or associated with Exhibit Number 5, which was
20 the herd movement animation video for -- associated
21 with Slide Number 10. And we have, also associated
22 with Exhibit Number 5, the convoy visual, which we've
23 just looked at, associated with Slide Number 27 and 28.
24 So we'll keep a running tab of any additional videos,
25 and we will be marking them as exhibits, and I would
26 invite the parties, as I said, to come see us if they

1 would like a copy of those videos.

2 Thank you, Madam Chair.

3 EXHIBIT 10 - Herd Movement Animation (video

4 clip associated with Exhibit 5:

5 Part V - Terrestrial Environment, Slide 10)

6 EXHIBIT 11 - Convoy Visual (video clip

7 associated with Exhibit 5: Part V -

8 Terrestrial Environment, Slides 27-28)

9 THE CHAIR: Okay. Thank you.

10 Go ahead.

11 MR. VANENGEN: Mat'na, Madam Chair.

12 Based on our -- based on our ten-year experience,
13 we are confident that our mining activities will not
14 have an impact on the caribou herds that interact with
15 our project. Agnico Eagle believes the proposed-here
16 approach is realistic and feasible, proven to be
17 effective along the all-weather access road, and that
18 we had general consensus and support by the intervenors
19 during the work -- recent workshops that we hosted over
20 the last year. Based on feedback during the workshops,
21 Agnico Eagle has completed additional analysis,
22 including revised viewshed analysis, seasonal
23 group-size thresholds, zone of influence, and encounter
24 rate and residency analysis, and we've revised the
25 terrestrial ecosystem management plan to include, but
26 not limited to, updated decision trees based on

1 group-size thresholds and distance thresholds. And
2 recently we have agreed to initiate a noise, vibration,
3 and visual cue study to evaluate the effects of
4 blasting on caribou. In our experience, a
5 1.5-kilometre protection zone is sufficient, but we
6 will work with the terrestrial advisory group to
7 develop and evaluate blasting distance thresholds.

8 We understand that we need to adapt and learn from
9 the information and data that we've collected. As a
10 result, we look forward to continued collaboration and
11 are open to other monitoring techniques to consider to
12 help address detection at greater distances; as an
13 example, greater than 4 kilometres from our project.
14 And as discussed in the workshops, that could be
15 achieved through height-of-land surveys, through aerial
16 monitoring -- and we're interested in the use of
17 possibly drones -- geofencing programs in collaboration
18 with the Government of Nunavut; and we're also, as
19 described earlier, interested in testing military-grade
20 cameras such as those described and agreed to during
21 the Sabina hearings.

22 Again, in working with the terrestrial advisory
23 group, it demonstrates our collaboration and
24 willingness to go above and beyond for analysis, and
25 that includes the viewscape and zone of influence that
26 Corey is going to present over the next few slides.

1 The collaboration and consensus-driven decisions
2 will continue through the terrestrial advisory group.
3 General agreement and great collaboration from workshop
4 participants has been demonstrated and will be implicit
5 in the terrestrial advisory group. The terrestrial
6 advisory group will meet at least once per year and, at
7 a minimum, will be composed of the Hunting and Trapping
8 Organization, the Government of Nunavut, NTI, and the
9 Kivalliq Inuit Association members. Finalizing the
10 memorandum of understanding in terms of reference
11 is still our priority, and we're looking very closely
12 with its -- with our members right now to finalize our
13 terms of reference.

14 We know and we know that the terrestrial
15 ecosystem management plan will evolve and continue to
16 improve. The terrestrial advisory group is the
17 mechanism to amend the monitoring and mitigation
18 approaches in the terrestrial ecosystem monitoring
19 plan, and, collectively, it is our goal to ensure we
20 have zero harm to caribou herds that interact with our
21 project.

22 MR. DE LA MARE: Thank you, Ryan. I'm going to
23 spend a little bit of time talking about some of the
24 analytical methods that we completed after the
25 prehearing conference, so between the prehearing
26 conference, technical session, and -- and this hearing.

1 Agnico Eagle was given a fair amount of homework
2 related to doing some additional analyses based on the
3 collar data that we received from the Government of
4 Nunavut, which was quite helpful. So one of the first
5 things we did is what's called a zone-of-influence
6 assessment, and what this essentially is is it's trying
7 to look at the distribution and abundance of caribou in
8 and around the mine site operations to see if
9 perhaps -- although the mine doesn't have -- and the
10 road might not have a direct effect on where caribou
11 are, it might have an indirect effect as a result of
12 dust, light, noise, those sort of things, and they
13 might impact where caribou are around the project site.

14 So we looked at an area of 50 kilometres around
15 the site to try and determine if we could determine a
16 zone of influence. We received the data from all of
17 the herds that have the potential to interact with the
18 project, including the Ahiak, the Beverly, the
19 Wager Bay, and the Lorillard herd. And in particular,
20 based on our -- on our all-weather access road data of
21 caribou observations, we knew the main seasons were
22 spring and fall and winter, so we looked at those
23 seasons. We did find, when we looked at all of that
24 data, that -- and I mentioned this earlier in the
25 caribou animation and in the previous discussion --
26 that the Beverly and Ahiak herds did not show a high

1 degree of interaction with the project. So there was
2 the occasional animal that might be near the project,
3 but, by and large, the Lorillard and Wager Bay herds
4 primarily interact with the project.

5 This -- the fortunate -- the interesting piece of
6 the zone-of-influence assessment with this project is
7 we -- we actually had caribou collar data prior to the
8 project going forward. So we were able to look at
9 patterns of caribou distribution in abundance before
10 the Meadowbank operation and the AOR were in -- were
11 functioning and then after they were functioning. And
12 this is the first time that a zone-of-influence
13 analysis has been done in Nunavut.

14 So this is just sort of an example of how we would
15 look at trying to determine if there's a zone of
16 influence. The colours aren't quite showing up on here
17 compared to how they might be printed off, but each one
18 of these bands shows a 5-kilometre increment out to
19 50 kilometres, which is a pretty conservative distance
20 to try and determine if there would be an effect on the
21 distribution and abundance of caribou.

22 And what we found was -- was there was little to
23 no interaction with the project from the Ahiak and
24 Beverly herds. The Wager Bay and the Lorillard herds
25 have the greatest interaction. Low numbers of collared
26 caribou interacting within the regional study area in

1 the spring and winter. And if you recall that
2 animation that we showed you earlier, you could see,
3 primarily, they moved through the project area in the
4 spring and fall, and there were a few milling around in
5 the winter as well.

6 We found no zone of influence detected for the
7 spring and the fall migration period; however, we did
8 find a weak zone of influence during the winter period
9 of between 30 and 35 kilometres. So that -- that's
10 roughly from where we are now to the north tip of White
11 Hills Lake. That's roughly about 34 kilometres, as the
12 crow flies. So that's a long ways away.

13 And what we would want to suggest with that is the
14 data -- we're limited in the winter, so there's not a
15 lot of caribou collar information, and so with that,
16 there's a fair amount of uncertainty around finding an
17 effect or not finding an effect. However, the main --
18 the main point we want to note from that is based on
19 the collar and the all-weather access road data that's
20 collected, we have -- we're -- we're highly confident
21 of when caribou primarily interact with the project,
22 and consequently, we can anticipate when we're going to
23 have to apply those increase caribou protection
24 measures and adaptively manage our operations to try
25 and minimize effects to caribou.

26 One of the other activities that we were asked to

1 do is what's called an encounter and residency
2 assessment for caribou. So we use that same collar
3 data, and we use the same areas or ranges, including
4 the spring migration, the fall migration, and winter
5 seasonal range, and what we do is we try and determine
6 all of the different types of developments that would
7 be within those regions. So these might include
8 contaminated sites; as an example, an old fuel dump or
9 fuel-storage area, exploration sites, and communities
10 would be included in that and, of course, mines and
11 inactive mines. And we retrieve that information from
12 the public realm, so through permits, primarily, by --
13 by viewing through permit-application databases. And,
14 by and large, you find that although there might be
15 several of these small features on the site, you never
16 really know whether these features were developed or
17 not developed, and several of them were -- are old and
18 inactive. However, we do include the when we look
19 at -- what we try and look at is how often a caribou
20 might interact with one of these features on the
21 landscape and how much time they would spend in and
22 around that site, as an example, to see how often a
23 caribou could be disturbed and that how might have an
24 implication on their energetics.

25 So just a quick summary, this is a map showing
26 some -- the seasonal -- the spring and fall seasonal

1 range for the Lorillard herd. The project area is
2 right up in here, and these -- these dots on here and
3 squares and that represent different types of
4 developments. Most of them are primarily contaminated
5 sites, which might mean a fuel-storage area, and
6 several are also inactive exploration camps. So many
7 of the features -- over 90 percent of these features
8 actually are -- are inactive.

9 And then what we do is we try and determine how
10 many times a caribou might interact with these in the
11 zone of influence and then how long they would
12 interact. So, again, just for reference, here's
13 Chesterfield Inlet and Baker Lake and Rankin right
14 there, and there's the inlet to Baker Lake. So we --
15 we've determined all that information and included it
16 in our report that was submitted in July.

17 So, in general, the encounter rates seldom
18 exceeded 5 to 6 encounters; however, we did -- we did
19 have some occasionally get up to 11 encounter rates
20 with the project. So to -- to sort of put this in
21 perspective, based on looking at other assessments in
22 the northwest territories and in Nunavut, we found that
23 for this particular project, the encounter rate numbers
24 are -- are low, and consequentially, we're confident
25 that this level of encounters won't alter caribou
26 energetics.

1 Adaptive management and mobile protection
2 measures: So mobile protection measures are
3 essentially one of the key mitigations that we use as
4 part of our overall adaptive management strategy. The
5 concept of it has been around for a few decades at
6 Ekati and Diavik. The mitigation is extremely
7 effective at minimizing mortality risk, and we're
8 working through the tag to try and look at ways to
9 measure the efficacy of it applied on the ground to
10 determine how effective it is at mitigating disruptions
11 to caribou movements.

12 So it's been used for -- as I mentioned, for -- at
13 Ekati and Diavik, and examining the Bathhurst caribou
14 collar data suggests that the historical seasonal
15 movements have not been fragmented, so they haven't
16 been cut off or changed through time. And so this
17 suggests that operations on-site at mines such as Ekati
18 and Diavik are not affecting the movement pass of the
19 Bathhurst caribou, even with the potential for a
20 14-kilometre zone of influence. So in our
21 zone-of-influence assessment, we found the potential
22 for one in the winter, and they've also documented a
23 14-kilometre one at this mine. Yeah.

24 MR. VANENGEN: Thanks. Ryan Vanengen from
25 Agnico Eagle. Thanks, Corey.

26 So Agnico Eagle is dedicated to protecting all

1 wildlife. That includes wolves, wolverines, and bears.
2 We've conducted den surveys prior to activities, and
3 for our Whale Tail Pit Project and continuing
4 operations at Meadowbank, we will continue to manage
5 our waste to ensure the protection of wolves,
6 wolverines, and bears.

7 We will also continue to evaluate habit loss due
8 to mining through what we call "ecological land
9 classification mapping", and we will continue through
10 our Whale Tail Pit operations and Meadowbank operations
11 to protect raptor nest as well, and we'll work with the
12 Arctic Raptor Group out of the University of Alberta.

13 Agnico Eagle has conducted shoreline surveys,
14 we've completed prism plots, and we'll continue to work
15 with Environment Canada to ensure maximum protection of
16 waterbirds. As an example, following meetings with
17 Environment Canada in June of this past year, we
18 completed additional shoreline surveys to guide future
19 mitigation. This figure shows high suitability habitat
20 for waterbirds within the project area that we'll
21 continue to investigate in 2018 and protect during
22 flooding.

23 Agnico Eagle has developed a waterbird monitoring
24 and mitigation plan to ensure the protection of birds
25 during flooding activities, and we've also completed a
26 fish-out waterbird mitigation plan to ensure the

1 protection of waterbirds during the Whale Tail Lake
2 north basin fish-out.

3 We will continue to conduct wildlife screening
4 level risk assessments according to Environment Canada
5 recommendations during the review of Whale Tail Pit
6 Project, and we will work with Environment Canada and
7 the Government of Nunavut to monitor raptor nest and
8 implement recommended mitigation.

9 Now, similar to the other presentations that we've
10 made, before I give our concluding remarks on this
11 topic, I would like to give the Board an overview of
12 our relevant responses to our response to final
13 submissions and also give the Board an update on
14 relevant discussions that we have had with the Baker
15 Lake HTO -- or the Baker Lake Hunting and Trapping
16 Organization, the Kivalliq Inuit Association, and the
17 Government of Nunavut, as well as their technical
18 advisors, since we filed our written final responses on
19 August 29th.

20 With respect to the Baker Lake Hunting and
21 Trapping Organization, in Baker Lake Hunting and
22 Trapping Organization Comment Number 3, they raised the
23 issue of community participation in project monitoring
24 and mitigation decisions. Agnico Eagle has agreed to
25 fund at least one Hunting and Trapping Organization
26 representative to assist and support on wildlife

1 surveys along the all-weather access road and along our
2 haul road during the fall and spring migratory periods.

3 In the Baker Lake Hunting and Trapping
4 Organization Number -- Comment Number 4, they raised
5 the issue of the need to remodel the Meadowbank and
6 Whale Tail Pit haul roads. Agnico Eagle has committed
7 to work -- to continue to work with the Baker Lake
8 Hunting and Trapping Organization to address these
9 recommendations and will discuss the slopes of sections
10 of the Meadowbank all-weather access road and Whale
11 Tail Pit haul road, and our understanding is that this
12 commitment -- that these commitments are considered --
13 and issues are considered resolved.

14 With respect to comments from the Government of
15 Nunavut numbered 03 to 14, Agnico Eagle and the
16 Government of Nunavut have come to an agreement on many
17 of the terms and conditions and commitments and are
18 nearing agreement on a few remaining that we will be --
19 that will be submitted to the Board.

20 With respect to the Kivalliq Inuit Association,
21 Comments 01 to 06, Agnico Eagle and the Kivalliq Inuit
22 Association have also come to a general agreement which
23 resolves these concerns, and we will submit a document
24 that outlines these commitments to the Board.

25 With respect to Environment Canada's final
26 submission, issues were raised respecting migratory

1 birds and flooding, also using tailing storage
2 facilities and -- and bycatch and other mortalities to
3 migratory birds during the flooding.

4 While filing our final written submission on
5 August 29th and in recent discussions with Environment
6 Canada, Agnico Eagle has agreed to terms and conditions
7 related to the protection of waterbirds during
8 flooding. Our understanding is that with these
9 commitments and terms and conditions, Environment
10 Canada considers issues related to the terrestrial
11 environment resolved.

12 So in summary, Agnico Eagle -- in summary of the
13 presentation, Agnico Eagle will adhere to the
14 terrestrial ecosystem management plan, Version 4, which
15 includes improved decision trees with clear commitments
16 to monitoring and mitigation based on the best
17 available data. We will implement new monitoring
18 techniques such as height-of-land locations and the
19 implementation of cameras. We will implement new data
20 analysis to evaluate caribou migration such as
21 zone-of-influence-type analysis, and, as discussed, we
22 will hire a Baker Lake HTO representative to assist in
23 wildlife monitoring.

24 We will also implement a terrestrial advisory
25 group. We will have annual terrestrial monitoring
26 auditing through the terrestrial advisory group, and we

1 will continue to collaborate with the Government of
2 Nunavut and the other terrestrial advisory group
3 members on caribou-collaring-data-analysis methods and
4 collar-study objectives. Through our memorandum of
5 understanding with the Government of Nunavut, we have
6 agreed with the Government of Nunavut not to duplicate
7 but to enhance the existing wildlife program at the
8 Government of Nunavut and evaluate our monitoring and
9 mitigation techniques using an independent academic
10 researcher.

11 And, lastly, we will continue to work with the
12 terrestrial advisory group, which consists of the
13 Government of Nunavut, the Hunting and Trapping
14 Organization, and the Kivalliq Inuit Association, and
15 other stakeholders, and we will continue to work with
16 the Nunavut Impact Review Board to improve our
17 terrestrial wildlife monitoring and mitigation to
18 ensure protection of all wildlife, including zero harm
19 to caribou, that interact with our project.

20 Mat'na.

21 THE CHAIR: Thank you. That was the
22 terrestrial environment presentation. Next we will
23 have questions around the table, and then after the
24 questions, there are three short presentations. Maybe
25 you can put together the marine environment, the
26 socioeconomics, and the human health together.

1 But let's take a 15-minute break.

2 (ADJOURNMENT)

3 THE CHAIR: Okay. Let's get started
4 again, please. With respect to the weather, a lot of
5 people didn't come on time, and we were delayed.
6 Because we're a little bit late in our agenda, we're
7 going to meet again this evening at 6:30 until 9. And
8 tomorrow the same; we'll be here all day. And we'll be
9 back here today because we're a little bit late --
10 behind on the agenda.

11 We're now into questions to the proponent from the
12 terrestrial environment presentation starting the
13 Kivalliq Inuit Association.
14 Kivalliq Inuit Association Questions Agnico Eagle Mines
15 Limited

16 MR. POOLE: Thank you, Madam Chair. It's
17 Kim Poole representing the Kivalliq Inuit Association.

18 Thank you for the presentation on the terrestrial
19 wildlife. There are a number of details that still
20 need discussion. We're getting close. I don't want to
21 get into a lot of weeds, as we say here, but I'd just
22 like to make two comment/questions.

23 A lot of the monitoring is based on the radio
24 collars that the Government of Nunavut has placed on
25 caribou throughout Nunavut. These collars were placed
26 primarily, as far as I understand, to distinguish herds

1 and to look at herd movements in the broad context, but
2 as we all know, they've been used increasingly for
3 environmental assessments and, more importantly
4 perhaps, for environmental monitoring, and I'm curious
5 about your thoughts about the representation of these
6 collars. Apparently up until last year, there was less
7 than eight collars active on the Lorillard herd, and
8 now I think they've jumped that up to about 12, but
9 these collars -- and the last population estimate that
10 I've aware of for the Lorillard/Wager Bay complex is 15
11 years ago at roughly 40,000 caribou. So we have no
12 idea where that's gone, but that means that these
13 collars represent, more or less, 4 to 5,000 collars --
14 sorry, caribou per individual collar, if you want to do
15 some simple math.

16 So my question is, basically, we have thresholds
17 that deal with a single collar doing this, that, and
18 the next thing, but what does that mean in a reality
19 sense, and with the small sample size of collars, do
20 you think that that is adequate for some of the
21 long-range monitoring that is supposed to trigger
22 enhanced mitigation as the animals get closer?

23 THE CHAIR: Agnico Eagle?

24 MR. VANENGEN: Mat'na, Madam Chair.

25 Thank you for the question. Agnico Eagle
26 recognizes that there's limited information from just

1 the collaring data, and that's why our surveys are not
2 only relying on the collaring data. We use other
3 technology to ensure we protect for caribou. So we use
4 height-of-land surveys, the haul road surveys, as well
5 as other techniques.

6 We recognize that -- you know, that -- that
7 because there are few collars, we're going to --
8 we've -- we're committed to the collaring program, and
9 that's why we've renewed our memorandum of
10 understanding with the Government of Nunavut and will
11 continue to work with the Government of Nunavut to
12 ensure that that collaring program meets the objectives
13 of Nunavut in the protection of caribou.

14 Mat'na.

15 MR. POOLE: Kim Poole for the Kivalliq
16 Inuit Association.

17 Thank you for that response. My last comment is
18 that -- and I know we've worked on this extensively in
19 the workshops, but I just wanted to make the point that
20 to trigger from Level 2 to Level 3 is a -- basically
21 the same group-size threshold, the same everything,
22 except it happens to be at 1.5 kilometres from site as
23 opposed to 4 kilometres.

24 Well, last I checked, the caribou can move
25 2-and-a-half kilometres in, well, half an hour, an
26 hour, if it wants to, a couple hours at the most. So

1 my concern is that the monitoring is not ramped up
2 quite fast enough or extensive enough at Level 2 to be
3 able to catch Level 3 properly. We're still looking at
4 daily or twice daily, depending on seasons; road
5 surveys; height-of-land surveys, et cetera. And my
6 main concern is ensuring that the caribou that do
7 actually in real life come close to the road -- within
8 a kilometre and half, for instance -- to be able to
9 trigger Level 3, if the group size is large enough, is
10 adequately detected, monitored.

11 MR. VANENGEN: Mat'na, Madam Chair. The --
12 it's a good question and certainly a concern also that,
13 as you mentioned, we discussed in the terrestrial
14 advisory group workshops, and what we -- what we intend
15 to do under those circumstances is heighten, as we
16 mentioned, the frequency of monitoring at a level --
17 between a Level 1 and Level 2. And we talked about
18 that in the terrestrial advisory workshop, as well as
19 in our final submission where we agreed to increase
20 frequencies of surveys. So we've -- we feel that we've
21 addressed that.

22 There's going to be scenarios where we need to
23 react quickly, and that's why we've committed to having
24 the Baker Lake Hunting and Trapping Organization
25 physically do the surveys with us to ensure that we
26 complete the surveys and are able to make decisions to

1 protect the caribou that are passing through our
2 project as quickly as possible.

3 Mat'na.

4 MR. POOLE: Kim Poole for the Kivalliq
5 Inuit Association.

6 Thank you for the response. But just as a
7 follow-up, in Slides 25 and 26 where you have Figure 7,
8 the -- the decision tree, sorry, for the haul road
9 at -- Level 1 monitoring is height-of-land surveys
10 every two days; Level 2 monitoring is height-of-land
11 survey every two days. Where's the heightening?

12 MR. VANENGEN: Madam Chair, the heightening
13 is in reference to -- we haven't updated the decision
14 trees based on our final submission, so our final
15 submission is -- is the -- is what we're committing to.
16 And what we also have committed to do is to update the
17 decision trees following these hearings and three
18 months after receipt of the project certificate. And
19 that decision tree -- the updated decision tree will
20 reflect those commitments of heightened frequency of
21 monitoring.

22 Mat'na.

23 MR. MANZO: Thank you, Madam Chairman.
24 Luis Manzo, director of lands, Kivalliq Inuit
25 Association. I have a question.

26 The environmental impact statement mentioned that

1 the traffic in the road will be about seven minutes
2 between each cargo, give and take. The distance in
3 which you actually will trigger some mitigation is at
4 1.5 kilometres, one -- according to your presentation.

5 According to the field experience that we have in
6 Meliadine, you require at least two-and-a-half days
7 before you actively shut down, if it's necessary, on
8 the site. And this -- and don't see the map there, but
9 you need to have emergency trigger and safety issues
10 between communication to the -- to the site in which --
11 where is the last truck will be stop? Between the ones
12 that are already in the road versus the oncoming 1.5
13 kilometres would not give you that window. By far, you
14 will not have any window to trigger a shutdown action
15 on the road.

16 So you need to make sure that window is there way
17 far between 10 kilometres before you actually -- you
18 need to be prepared before the 1.5 kilometres. That's
19 my understanding of what you present in your slides and
20 red, amber, and green.

21 So I think once the caribou getting into the zone
22 of influence, the proponent need to prepare to shut
23 down because that's very quick by the time you get the
24 caribou in Kilometre 1.5. If you're waiting until
25 Kilometre 1.5, nothing will be done, and you'll -- you
26 will stop in road with the trucks for a length of time

1 that you don't know.

2 And that mean, with the fraction of caribou, by
3 the fact that you have arrear in the road, in which the
4 caribou would not be able to cross. It's just a
5 comment in that. Thanks.

6 MR. VANENGEN: So -- Madam Chair.

7 Thanks for that comment, Kivalliq Inuit
8 Association. The thing that's important to note is
9 that this is not our first time shutting down a road.
10 We have experience on the all-weather access road.
11 We've completed shutdowns on that road and have worked
12 with the Kivalliq Inuit Association, as well as the
13 Hunting and Trapping Organization to implement
14 shutdowns of facilities such as roads. So I think
15 that's an important statement to make.

16 Your calculation, Luis, did you -- did you say
17 two-and-a-half days to shut down the road, just for
18 clarification?

19 MR. MANZO: Luis Manzo, Kivalliq Inuit
20 Association, Madam Chair.

21 Just to respond to that comment. Yeah. We did a
22 calculation in the past that AEM required in the
23 Meliadine project. Two days before you shut down --
24 progressive -- it's a progressive shutdown when
25 caribous approach. So we -- we got the number in some
26 of the agreements in the past, but I don't see that

1 here. It's not progressive. It's -- it's based on
2 distance, in which I don't think you will have the time
3 to react. It's not gonna be even time to even get to
4 the site if caribou is around. That's -- that's my
5 point.

6 MR. QUESNEL: Thank you, Madam Chair.

7 Just based on safety and communications, like, all
8 the vehicles are tied into dispatch, so all the
9 vehicles are -- have that radio communication. Just
10 based on our experience at Meadowbank -- so they're
11 communicating of -- of an operator of a haul truck or
12 someone driving a light vehicle, a pickup truck. They
13 observe caribou. That is communicated through
14 dispatch, so they're always talking to each other,
15 plus, the communication with dispatch on other -- other
16 mechanisms, where those vehicles are, if they're
17 loading, hauling, parked, maintenance, crew change, a
18 hot change between shifts, things like that.

19 But also another -- another -- a little bit more
20 context -- just based on some of our experience and as
21 we learn more operating in Nunavut -- at Meliadine,
22 just recently with the migration -- you know, we have
23 all this paper; we have our decision trees; we have --
24 we have these documentation. The one thing that was
25 pretty powerful from us, and I think also from the
26 Kivalliq Inuit Association, the Rankin Inlet HTO,

1 NTI -- they were on-site during the migration at
2 Rankin. And I think people can say that the migration
3 at Meliadine is a larger migration than at Meadowbank,
4 but we work together on daily decisions. You know,
5 we're getting the collar data. We're -- we had the
6 surveys at the site, and everybody was on-site --
7 Kivalliq Inuit Association, NTI, HTO -- with our
8 operational team making decisions at that moment in
9 time based on the observations of caribou at that
10 location and deciding if the monitoring has to be
11 increased, if we're shutting down the all-weather
12 access road, all these activities.

13 So I think it was a success, and I believe we
14 received, from your executive director from the
15 Kivalliq Inuit Association, praise on the we
16 communicated that. So I think, just with this
17 experience as we're moving in this journey together,
18 learning from each other, we're improving. So that's
19 another layer of all these discussions and
20 documentation. So I just wanted to provide a little
21 bit more context. Thank you.

22 MR. VANENGEN: Madam Chair, may I speak?

23 THE CHAIR: That's fine.

24 MR. VANENGEN: Just one more thing to add
25 just for clarification.

26 Luis talked a shutdown of two-and-half days. I

1 fact, it's three hours, about, was all it will take for
2 us to shut down our haul road, and that's about the
3 same time as one truck takes to go from Whale Tail Pit
4 all the way to the Meadowbank mill. So we expect that
5 would be the time that it would take to shut down our
6 road. So going from -- in an extreme circumstance,
7 going from a green red -- or green light to a red
8 light, it would take about three hours, so ...

9 Mat'na.

10 MR. MANZO: Thank you very much for your
11 response. I will make another two points in that. You
12 said three hours. It's three hours take for a drill --
13 you gonna have drill -- drill areas and -- in this size
14 camp you will have drillers operating, so those
15 drillers cannot be shut down like that because they
16 need more than three hours. Just to mention one of the
17 activities that you have listed in your property,
18 right.

19 Now, I know -- also, I want to make a point to
20 your comment regarding to Meliadine. Meliadine --
21 having a completely different geographic opportunity --
22 I would say advantage opportunity -- we are only at
23 20 klicks from where the camp is. Meadowbank, we are
24 138 klicks. So in order to organize the logistics, for
25 us to get there and coordinate with you, we need to
26 start working since the caribou getting into the zone

1 of influence. In a way, I don't think in one -- when
2 you have it in 1.5 kilometres, we don't [sic] be able
3 to get there. It's just math.

4 MR. QUESNEL: Thank you, Madam Chair. Jamie
5 Quesnel. Yeah. I could see your point dealing with
6 the difference between Rankin and Meliadine and also
7 the distance from Baker to Whale Tail. However, with
8 all our experience of being at Meadowbank for ten
9 years, plus the additional baseline work we have at
10 Whale Tail, we understand when caribou are coming
11 through our area. And based on that, even at
12 Meliadine, how recent we've been there and with our
13 relevant information, we start planning with all the
14 external stakeholders based on historical information
15 and based on the expectation of the migration
16 occurring.

17 So it was our best guess, based on historical
18 data, they're going to be coming through around this
19 time, so we started communicating early. It wasn't a
20 last-minute discussion; you know, They're here. Well,
21 jeez, we have to talk to you. We started planning that
22 prior to that, so we were ready for travel, to -- to
23 execute the travel to the location. So I would expect
24 the same would happen at Whale Tail, based on the
25 history, our understanding of the migration, when the
26 critical seasons are, to -- to get people at the site

1 to make those decisions. Thank you.

2 MR. MANZO: Thank you, Madam Chair.

3 And thank you for responding.

4 THE CHAIR: Thank yo.

5 Any questions from the Baker Lake Hunters and
6 Trappers Organization?

7 Baker Lake Hunters and Trappers Organization Questions
8 Agnico Eagle Mines Limited

9 MR. AKSAWNEE: Thank you, Madam Chair.

10 Richard Aksawnee, Baker Lake Hunters and Trappers.

11 I agree with the points that the Kivalliq Inuit
12 Association brought up. Here in Baker Lake, we're
13 lucky that we get five herds in -- in around Baker
14 Lake. Mitigation measures, I don't know. I'll use
15 Meliadine as an example. Years back before Meliadine
16 got busy, the Qamanirjuaq herd would migrate up north
17 during our spring/summer, early summer season. The
18 past three, four, five years, six years, we haven't
19 seen that herd. And in your presentation earlier in
20 regards to the different types of herd that go -- that
21 are in conflict with the project, I disagree about the
22 Ahiak. The Ahiak herd last -- last fall, October, they
23 migrated down. They were right behind the community
24 for two weeks right by the gatehouse, by your gate
25 house. These herds are intertwining during migration.
26 That's why -- I'm not -- I'm sure, to be exactly [sic],

1 how many collared caribou there is on the Ahiak herd,
2 but I know there is a lot of impact due to development
3 and also by harvesters.

4 We are the biggest impactors, are the harvesters,
5 but development also impacts the caribou. That's why I
6 agree with what KIA stated -- Kivalliq Inuit
7 Association, sorry, about using collar data. I don't
8 trust those collar data at all. For years, we haven't
9 seen Qamanirjuaq herd. We're lucky we get the
10 Lorillard, the Wager, Ahiak, Beverly, but for years, we
11 haven't seen that herd from Qamanirjuaq, so that's a
12 big impact that we're suffering today here in Baker.

13 I don't know if Agnico wants to respond to this
14 before I pass it on to my colleague. Thank you,
15 Madam Chair.

16 MR. QUESNEL: Thank you, Madam Chair.

17 I appreciate your comment. Thank you.

18 THE CHAIR: Thank you.

19 HTO Baker Lake.

20 MS. BERNAUER: Thank you, Madam Chair. This
21 is Warren Bernauer for the Baker Lake HTO. I have a
22 few questions for Agnico Eagle.

23 The first deals Inuit knowledge. So a couple of
24 years ago, the Baker HTO hired me to do a study about
25 Inuit knowledge of caribou habit protection. So I did
26 a literature review, and I facilitated a workshop with

1 elders and hunters, and what I learned was really, for
2 me, quite fascinating. Inuit had and continue to have
3 really, really detailed rules to ensure that their
4 activities don't disturb migration routes, water
5 crossings, and other sensitive habits. You might say
6 that they had a traditional caribou mitigation strategy
7 or a traditional land-use plan the way that they zoned
8 their activities around the sensitive habits.

9 So this included rules like not hunting the first
10 caribou in a herd when it passes through an area, not
11 camping or caching meat right next to a water crossing
12 or right on a migration route, and removing all the
13 remains after you butcher a caribou near a migration
14 route or near a water crossing, and these rules are all
15 very, very well documented in anthropology, geography,
16 even in archeology. There's archeological studies that
17 show just how closely Inuit followed these traditional
18 rules, where you actual see -- don't see animal remains
19 close to the water crossing. And I'm just wondering if
20 you guys have familiarized yourselves with these
21 traditional rules and, if so, how you've attempted to
22 incorporate them into your mitigation plans.

23 Thank you.

24 MR. VANENGEN: Thank you, Madam Chair.

25 Thank you, Warren, for sharing that, and
26 absolutely. That's -- that's information that's

1 also -- has been shared with us through our IQ sessions
2 that -- or Inuit Qaujimagatuqangit sessions, and we
3 continue to integrate those -- the learnings from those
4 sessions, including what you shared with us, into our
5 management plans and monitoring and mitigation for
6 caribou.

7 Mat'na.

8 MR. BERNAUER: Thank you very much, Ryan. I
9 appreciate your response.

10 Warren Bernauer for the Baker Lake HTO.

11 Could you give me maybe a bit more of a concrete
12 example of how some of this has been incorporated?
13 Like, for example, something that's gotten raised with
14 us a lot in meetings and that I've heard at a lot of
15 other NIRB info sessions and whatnot is that the
16 traditional rule to not disturb the first caribou in a
17 herd is something that elders really want to see the
18 mining industry follow, and the way your mitigation's
19 designed with, you know, fairly high group-size
20 thresholds, especially in the fall season -- 140
21 caribou -- now, I might be wrong, but it appears to me
22 that with a high group-size threshold like this, you'll
23 only be triggering mitigation after the first caribou
24 in the herd are disturbed, potentially, which are the
25 ones that you need to make extra, extra, extra sure
26 that you don't disturb. Thank you.

1 MR. VANENGEN: Madam Chair.

2 Thanks again, Warren. And it's evidence, I think,
3 from our presentation that those are guidelines that we
4 are following for specific seasons, but at the very top
5 of that decision tree, it says, "Wildlife have the
6 right of way", which means the leader of that caribou
7 pack -- or herd, I should say, is -- will be protected
8 as well. And we will adjust accordingly. We've shown
9 that we can adjust. We have examples of it on our
10 current all-weather access road, and we intend to
11 implement procedures that will protect all caribou that
12 interact with our project.

13 Mat'na.

14 MR. BERNAUER: Warren Bernauer for the Baker
15 Lake HTO.

16 Thank you, Ryan. I appreciate your response.
17 Moving on from that topic, I want to ask a question
18 about Slide Number 11. Now, on this slide, you say
19 that you foresee no adverse effect on caribou. Should
20 this really read, "no significant adverse effect", and,
21 if so, how are you determining what's significant?
22 Thank you.

23 MR. DE LA MARE: Thanks. Thanks, Warren.
24 Corey De La Mare with Agnico Eagle. Yeah. My
25 apologies. That statement out of the FEI -- it should
26 state "no significant adverse effects". And,

1 essentially, what we're looking at in terms of
2 significance is the long-term sustainability and
3 viability of caribou population.

4 MR. BERNAUER: Thank you. I appreciate that
5 response. That was very clear and direct. I won't
6 belabour the point, but the perception of a hunter as
7 what a significant effect isn't at the population
8 level. The little diversions and the caribou migration
9 route can have a huge impact on local food security,
10 but I won't belabour that point.

11 My last question deals with Slide Number 24. In
12 that slide, you say, if needed, you will cease mine
13 activities. Could you give me a little bit more of an
14 indication under what conditions you would actually
15 cease mine activities. The statement as it was
16 presented to me sounds quite vague. Thank you.

17 MR. QUESNEL: Yeah. Thank you, Madam Chair.
18 Jamie Quesnel.

19 Yeah. We have a few different examples just based
20 on implementing that protocol. At Meliadine, we've
21 shut down the all-weather access road based on the
22 migration. We've shut down areas of the -- of the
23 assisting haul roads at Meadowbank for caribou when
24 they interact with the existing haul road between Vault
25 and Meadowbank.

26 And, also, this all stems -- like, to give a

1 little more context, I get -- the -- the stop-light
2 approach is a very common methodology or system that we
3 use at Meadowbank, not just for caribou but for
4 blizzards. So everyone is aware of these different
5 thresholds, what it means when we advance from a green
6 to an amber to a red. So the -- the process, the
7 understanding of that, as well, understood by all the
8 employees at the operation. So we've had examples of
9 shutdown on the road. We -- we have the information
10 based on the frequency of that occurring at all our
11 locations.

12 So those are a few examples. Hopefully that
13 answers your question, Warren.

14 MR. BERNAUER: Thank you. No further
15 questions.

16 THE CHAIR: Thank you.

17 Any questions from the Government of Nunavut?

18 Comment by Government of Nunavut

19 MR. PINKSEN: Thank you. Steve Pinksen,
20 Government of Nunavut.

21 Just a comment consistent with the Kivalliq Inuit
22 Association. We've -- we had quite a number of
23 outstanding issues with Agnico Eagle specifically
24 around terms and conditions, so we've come very close
25 to agreement on almost all of those items. We've
26 narrowed it down to a very small group, and hopefully

1 within the evening, we'll make that list even smaller.

2 Just one very quick comment for clarification on
3 Slide 26, which is the decision tree around shutdowns
4 and stuff. On the slide, it says that when a certain
5 group size comes within a certain distance of a road,
6 then the haul road is closed, but in the accompanying
7 speaking notes, it was -- that and the other reactions
8 were the -- the haul road may be closed, and we might
9 choose to -- we might choose to slow it -- we might
10 choose to take action.

11 So I just wanted to clarify. Is -- these are firm
12 actions that would be taken, or are they more soft and
13 optional? Thank you.

14 MR. VANENGEN: Madam Chair, these are firm
15 actions that we're committed to. In certain
16 circumstances, it may mean that we have to shut down
17 our activities, and an example of that is what Jamie
18 shared with us at Rankin -- at our Rankin Inlet
19 Meliadine project where we have shut down out
20 operations due to caribou migration. So these are --
21 these are firm commitments.

22 MR. PINKSEN: Thank you. Steve Pinksen,
23 Government of Nunavut. No further questions. We'll
24 cover the rest in our presentation. Thank you.

25 THE CHAIR: Thank you. And please speak
26 closer to the mic. Thank you.

1 Environment and Climate Change Canada.

2 MS. PINTO: Thank you, Madam Chair.

3 Melissa Pinto with Environment and Climate Change

4 Canada. We have no questions at this time.

5 THE CHAIR: Thank you.

6 Fisheries and Ocean Canada.

7 MR. WATKINSON: Thank you, Madam Chair. Laura

8 Watkinson, Fisheries and Oceans Canada. We have no

9 questions at this time.

10 THE CHAIR: Indigenous and Northern

11 Affairs Canada.

12 MS. COSTELLO: Thank you, Madam Chair. Karen

13 Costello for Indigenous and Northern Affairs Canada.

14 We have no questions at this time. Thank you.

15 THE CHAIR: Natural Resources Canada.

16 MS. BESNER: Rachelle Besner, Natural

17 Resources Canada. I have no questions at this time.

18 THE CHAIR: Transport Canada.

19 MR. SADOWAY: Thank you, Madam Chair. Shane

20 Sadoway, Transport Canada. No questions at this time.

21 THE CHAIR: Thank you.

22 Any questions from the Nunavut Impact Review Board

23 staff?

24 Nunavut Impact Review Board Staff Questions

25 Agnico Eagle Mines Limited

26 MR. BARRY: Thank you, Madam Chair. Ryan

1 Barry, Nunavut Impact Review Board staff. We do have a
2 few questions.

3 First, a general comment. You'll notice in some
4 of the Board's questions from the staff, from the Board
5 itself, we're informed by our experience with the
6 Board's ongoing monitoring responsibilities and
7 programs that are in place for active mines in Nunavut
8 in particular and in relation to the Meadowbank
9 project, to the Meliadine project, which the proponent
10 also cites as the experience and lessons learned from
11 those mines.

12 However, given the limited operational life that
13 would apply to that proposed mine, the opportunity to
14 learn from monitoring and adjust programs to ensure
15 they are effective are much more limited than might be
16 the case for another project, like the Back River
17 project which you referenced or perhaps the Mary River
18 project or your own Meadowbank project. Therefore
19 having confidence in the reactivity and proposed
20 adaptive management measures is critical for ensuring
21 that this particular project's adverse effects can be
22 appropriately managed or mitigated.

23 So in that -- that line, in trying to understand
24 and ensure we have a clear understanding of what this
25 reactivity would be, that's where some of the
26 following questions are coming from.

1 If I understand correctly, the caribou collaring
2 data would not be made available in realtime but would
3 be made available daily to the proponent through the
4 Government of Nunavut.

5 Beyond the use of information available through
6 tracking of collard caribou, can you briefly describe
7 the physical monitoring that is proposed to inform the
8 proponent of when caribou are in proximity to the
9 project and note any seasonal limitations.

10 MR. VANENGEN: Ryan Vanengen from
11 Agnico Eagle.

12 The specific monitoring tools outside of the GN
13 collaring data that comes in to inform mitigation and
14 monitoring would include the height-of-land surveys,
15 and what that means is the technicians, the
16 wildlife observers, including the Baker Lake HTO, will
17 go up to a higher point to look as far as they can in
18 all directions to see if there are caribou moving
19 through, and they would do this on a routine basis.

20 While driving to their -- to the height-of-land
21 locations that are situated up on a hill or on a -- on
22 our waste rock pile, depending on where the best
23 viewpoint is. They would be driving in their vehicle
24 at a slow pace, and they would be looking out the
25 window? So that's what we call all-weather or haul
26 road surveys, and that's the other second important

1 tool that we use to inform our monitoring and
2 mitigation -- or additional monitoring and mitigation.

3 And the other tools that we're looking into as
4 well would include setting up cameras in different
5 locations -- sometimes maybe farther away or near our
6 road -- to monitor caribou passing over the road.

7 What we also can't underestimate is the value of
8 our operators also on the road. They will be -- they
9 will have heightened awareness of wildlife nearby, and
10 they'll also inform, on a continuous basis, whether or
11 not there's caribou along the road. And we see that on
12 our all-weather access road as well, where all of the
13 operators on the road provide us information in real
14 time on our -- on our road. So those are some of the
15 other tools.

16 Ryan, you mentioned also the limitations of those
17 tools, and the limitation of the tool -- of those tools
18 right now is our ability to see a far distance. And
19 we're looking into other technologies to allow us to
20 see farther than 4 kilometres, so that's one of the
21 limitations, and we're committed to filling that gap
22 between collaring data and our -- the human eye.

23 We're also -- we're also looking at, you know,
24 improving, perhaps, the collaring so that we have more
25 information, using the geo -- geofencing. Thanks.
26 That's another technique that we could use. We can

1 improve that. That's done at the -- in the Northwest
2 Territories. And the other limitation that was
3 mentioned as earlier was related to the darkness, and
4 there's certain cameras and other techniques that are
5 out there that will fill that gap as well related to
6 darkness.

7 So I hope that helps explain some of our
8 monitoring techniques. Mat'na.

9 MR. BARRY: Thank you, Madam Chair. Ryan
10 Barry, Nunavut Impact Review Board staff.

11 Thank you, yes, for that response. Maybe just a
12 further clarification. When I spoke seasonal
13 limitations -- so the height-of-land surveys, what
14 times of year would they occur or would they not occur?

15 MR. VANENGEN: Height-of-land surveys and
16 all-weather -- or the road surveys would occur
17 throughout the year.

18 MR. BARRY: Thank you, Madam Chair. Ryan
19 Barry, Nunavut Impact Review Board staff.

20 Moving on, you've mentioned the intention by
21 Agnico Eagle to investigate further the use of cameras
22 for monitoring of caribou in proximity to that proposed
23 haul road and how that's informed by the protocols that
24 have more recently been developed in support of the
25 Back River project proposal.

26 So is it the road shutdown specifically -- are

1 they the key mitigation measure, adaptive management
2 measure that would be informed by the use of these
3 cameras, and then, I guess, can you help us understand
4 how your planned adaptive management measures would be
5 effectively implemented without the use of such cameras
6 to assist your monitoring?

7 MR. VANENGEN: Madam Chair and Board members,
8 the use of the cameras would enhance already very
9 effective monitoring techniques is how we see it. The
10 one caution that we have with those camera is that --
11 is their ability to work. It's untested. It's a
12 technology that, although has -- is used quite often in
13 the south, is not known to be that effective on caribou
14 because it uses infrared, and what that means is it has
15 to pick up heat. And infrared -- the heat signatures
16 on a caribou -- they're so very well-insulated, and
17 therefore infrared has a very challenging time picking
18 up caribou.

19 So it's a reason why we're going to investigate
20 into these cameras and understand their effectiveness,
21 but we're not -- we don't necessarily believe that that
22 technology is going to enhance already effective
23 monitoring programs.

24 MR. BARRY: Thank you, Madam Chair. Ryan
25 Barry, Nunavut Impact Review Board staff.

26 I appreciate your comments on the limitations on

1 the cameras, noting that the consultants that you used
2 were the same consultants that supported the use of
3 such camera programs for the Back River project. So
4 the -- that's -- it's an interesting -- to hear your
5 perspective on the limitations.

6 With -- another part of your proposed mitigation
7 was referencing bringing in a Government of Nunavut
8 conversation officer to site to help determine when a
9 shutdown might be necessary, and this was touched on by
10 the Kivalliq Inuit Association is -- about how quickly
11 that could be done. Can you maybe further elaborate on
12 how quickly that could actually be expected to occur,
13 that you would go from the evidence of caribou
14 monitoring collars -- collar data to bringing someone
15 to site to determine a shutdown's necessary. We're
16 just trying to understand the sequence and how quick
17 that would take place.

18 MR. QUESNEL: Yeah. Thank you, Madam Chair.
19 Jamie Quesnel.

20 Based on everyone being on-site, the first thing
21 is that -- like I was mentioning, to a response to the
22 Kivalliq Inuit Association -- they'd be working with
23 all the information. So we have the physical surveys
24 in the field, the collar data. That event is occurring
25 at the site. So they would be working to evaluate
26 exactly what's going on at the site but also to enhance

1 the program, to validate some of our monitoring
2 program, look at areas of improvement. And this --
3 this ties into the overall spirit and intent with our
4 workshops that we had with the multiple stakeholders to
5 develop our updated terrestrial ecosystem management
6 plan, and also with our thinking for the continuation
7 with the terrestrial advisory group.

8 So we have -- we have the monitoring. We have
9 some field validation, not just by Agnico Eagle, by the
10 other stakeholders in the field. So they would be
11 initiated to the site based on the seasonal effects,
12 when the expectation of when that activity would occur
13 related to the migration of caribou, and making
14 decisions in real time, based on the real data and
15 working as a team to define which strategies are
16 effective based on the observations, based on the GN --
17 Government of Nunavut collaring data.

18 So it's all encompassing. And the workshop -- not
19 the workshop, but the activity we had at another site,
20 Meliadine, was the first step with that type of
21 discussion, and it was very effective. So there's some
22 key learnings from there, which we're going to
23 incorporate at Meadowbank and also, hopefully, at
24 Whale Tail on the incorporation of these activities
25 related to the execution of the decision tree
26 monitoring program; and also, When do we have to shut

1 down the road? When do we have to access certain
2 areas? When do we need additional data? Do we have to
3 increase our height-of-land surveys? Things like that.

4 So we're working together in the field, not by
5 phone, not by email, but working side by side at the
6 location at the site.

7 MR. BARRY: Thank you, Madam Chair. Ryan
8 Barry, Nunavut Impact Review Board staff.

9 Thank you for that additional -- that detail.
10 That helps.

11 Following up on that, maybe can you provide some
12 additional clarification on -- is there plans -- or can
13 you comment on the -- we note the collaborative nature
14 that you're take to -- responsibilities for caribou
15 monitoring, and I think you've done well to explain why
16 that would be the case. But can you explain how you
17 would address the financial limitations that are on the
18 Hunters and Trappers Organization, for example, on the
19 Government of Nunavut, given that, as far as we're
20 aware, there's not a direct role in Agnico Eagle
21 funding those different agencies. If they have shared
22 responsibilities for ensuring that the caribou
23 monitoring is to be successful, how would you -- or do
24 you see a role for Agnico Eagle in helping to address
25 those capacity challenges, for lack of a better way to
26 phrase it?

1 MR. QUESNEL: Yeah. Thank you, Madam Chair.

2 So what -- with the Government of Nunavut, we have
3 a memorandum of understanding. That memorandum has
4 been engaged since the early days of Meadowbank, but
5 recently, like my colleague Ryan has mentioned, we
6 renewed a memorandum of understanding for three years.
7 It's \$150,000 per year. And the key -- the key spirit
8 of that MOU is not to -- not to redo the existing work
9 that's being completed by the Government of Nunavut but
10 to understand if there's additional activities that
11 would have to occur.

12 So let's say a study is completed by the
13 Government of Nunavut. We would have an opportunity to
14 review this information, understand what the next steps
15 are, to have a -- like, information. So based on that
16 MOU, we're looking at providing research, looking at
17 adding -- let's say we say we need some additional
18 studies in this one are; we would work with the
19 Government of Nunavut and provide the researcher --
20 maybe a university would come up, an academic of some
21 sort, or somebody -- a consultant. But we would
22 provide that -- that expertise to collect that
23 information, to enhance the existing program, to move
24 forward to build this program, to provide the guidance
25 that's required, especially where we are right now with
26 Meadowbank. It's ten years of operational experience.

1 We want to build upon that. We have operational
2 understanding of the interaction with the caribou. A
3 lot of our intervenors have additional information with
4 Caribou data traditional knowledge. We want to package
5 it all together, but there may be a gap or additional
6 information required. So we're looking at
7 opportunities where we can work on that.

8 And the funding this year with the Government of
9 Nunavut was focused on research that we agreed upon
10 with the Government of Nunavut. Where will the funds
11 go? You know, maybe next year is related to additional
12 collars for the -- for the herds in this location. So
13 there's some opportunities there.

14 Also, with the Baker Lake Hunter and Trappers
15 Organization, we agreed to provide the funding for a
16 full-time monitor in the field to work with us. They
17 understand -- we understand the interactions. They
18 have experience in the field. They understand the land
19 and things like that, so we can work together and learn
20 better on these strategies. So those are two examples
21 where we're trying to provide additional support in
22 these areas.

23 MR. BARRY: Thank you, Madam Chair. Ryan
24 Barry, Nunavut Impact Review Board staff.

25 Again, we appreciate your response. I think we
26 note -- and we may have follow-up questions during

1 Indigenous and Northern Affairs Canada's presentation.
2 Similar to the review of the Meliadine project where
3 we -- there was discussion about responsibilities for
4 local Hunters and Trappers Organization to ensure that
5 the project monitoring enforcement would be a success
6 in terms of caribou and road usage.

7 Recognizing that the proponent's taking a similar
8 approach here and for valid justification, I think it's
9 important for our Board to understand that there is an
10 intention for funding to follow those commitments and
11 those collaborative approaches to ensure that they
12 actually wouldn't be limited by financial constraints.
13 So, again, I appreciate those responses.

14 Final question, Madam Chair.

15 We spent some time already in these proceedings
16 discussing the operation of the proposed haul road
17 associated with this proposal and how, specifically, it
18 and its potential effects are different than that for
19 the existing Meadowbank all-weather access road.

20 Recognizing this, while the results of the
21 zone-of-influence analysis are interesting, we were
22 questioning are they, in fact, directly relatable to
23 what we might expect to see for this proposed project?
24 Recognizing those differences that have come up, given
25 that the all-weather access road would continue to
26 operate throughout the life of the proposed Whale Tail

1 Pit Project project, I'm wondering if Agnico Eagle can
2 comment on the potential for additive cumulative
3 effects to occur and to affect the zone of influence
4 for migrating caribou from both roads being in
5 operation at the same time.

6 MR. DE LA MARE: Thanks, Ryan, for your
7 question.

8 Madam Chair, Corey De La Mare with Agnico Eagle.

9 Pretty hard to speculate right now what the
10 difference in a ZOI might be with the Whale Tail and
11 the AOR functioning. However, as we said earlier,
12 there is some uncertainty in that analysis that's been
13 raised through our TAG meetings with the GN and the KIA
14 and the HTO, and -- and one of our commitments right
15 now is to further investigate that zone-of-influence
16 analysis, perhaps, looking at different methods and
17 definitely including a couple other variables,
18 including environmental variables as such.

19 So this is something that we're going to be
20 looking at in the near future and definitely to look at
21 what that potential could be.

22 MR. BARRY: Thank you, Madam Chair. No
23 further questions from the NIRB staff.

24 THE CHAIR: Thank you.

25 Any question from the Nunavut Water Board?

26 MR. KHARATYAN: Thank you, Madam Chair. Karen

1 Kharatyan. No question at this time.

2 THE CHAIR: Thank you.

3 Nunavut Impact Review Board. Phillip?

4 MR. KADLUN: Thank you, Madam Chair.

5 Phillip Kadlun, Nunavut Impact Review Board member.

6 I have a couple of areas of clarification on --
7 specifically on the statement on Slide Number 39 where
8 it states that the: (as read)

9 Bathhurst caribou collar data suggests that
10 historical seasonal movements have not been
11 fragmented, which suggests that mine-related
12 mitigation to -- mitigation to minimize
13 sensory disturbances working with -- even
14 with the potential for 14-kilometre zone of
15 influence.

16 For my clarity, I'm having a hard time grabbling [sic]
17 with the situation with the Bathhurst caribou herd
18 knowing that it's -- it's in the decline, and I just
19 wanted to know what your rationale is for that
20 statement.

21 For my second clarification, where you mention, on
22 Slide 40 -- on the last bullet where it says:
23 (as read)

24 Continue to work with Arctic Raptor Group
25 along with U of A, University of Alberta.

26 For my clarity, I'm just wondering as to whether

1 Government of Nunavut, specifically Department of
2 Environment, is consulted because the raptors and
3 falcon research. It -- it's -- it's reference in
4 Wildlife Act itself. I just wanted to know whether
5 they have been involved in that sort of work.

6 Thank you, Madam Chair.

7 MR. VIRGL: Madam Chair, John Virgl.

8 Just the -- the clarification around that --
9 that's a good question. Although the zone of influence
10 has been shown to exist through some statistical
11 modelling of a long-term data set, caribou still move
12 into the zone of influence. It's just that the
13 relative occurrence or density of animals is different
14 near the mine than further away, up to 14 kilometres.

15 What the information in the presentation was
16 providing was -- or saying is that there's no evidence
17 from the collared animals that the herd has been
18 disconnected or fragmented as it moves through the
19 Lac de Gras area. So it still ends up being one herd
20 after it moves through the Lac de Gras area. I hope
21 that clarifies your question.

22 MR. VANENGEN: And, Madam Chair ...

23 THE CHAIR: Go ahead.

24 MR. VANENGEN: And, Madam Chair, just to
25 respond, then, to the second part of the question, as
26 well, related to the raptors and falcon research.

1 We continue to work with the Government of Nunavut
2 also to ensure the protection of the raptor -- of the
3 raptor nests and the raptors within our project area,
4 and we just wanted to emphasize that we're also -- as
5 Jamie mentioned, related to caribou, we're also working
6 with researchers related to raptors to ensure their
7 protection.

8 Mat'na.

9 THE CHAIR: Thank you.

10 Allen.

11 MR. MAGHAGAK: Thank you, Madam Chair. Allen
12 Maghagak, Nunavut Impact Review Board member.

13 I just have one question for clarification, and
14 that's in regards to using a drone for your monitoring
15 of caribou and other wildlife, especially during the
16 spring migration when cows are pregnant going to their
17 calving areas and also, in return, heading back south
18 with their calves. I know that some of the Hunters and
19 Trappers Organizations, they are now starting to
20 realize that using drones as part of their hunting
21 practices at times comes very close to unfair
22 harvesting practices. And in the same way that there
23 are some regulations in respect to using fixed
24 airplanes approaching the mine sites, at times, we
25 asked them to use a different incoming approach and
26 take-off approach, depending on where the caribou are

1 migrating near mining activities. And, also, there are
2 certain regulations that -- respects in regards to
3 using helicopters when there are pregnant caribous
4 migrating to their migration ground or their calving
5 grounds and -- during the fall when the cows are
6 migrating back south with their calves.

7 I don't know if Agnico Eagle has discussed this
8 matter with Government of Nunavut, NTI, Kivalliq Inuit
9 Association, and the terrestrial working group that
10 will be set up under this project that you guys are
11 establishing. As you are probably aware, that drones
12 are about -- now a days are pretty well about the same
13 size as some of the raptors that are flying around in
14 spring and summertime, and certainly they can abort
15 some of the pregnant cows and, also on return in the
16 fall, certainly put a lot of scare on the little calves
17 if the drones are being used to monitor.

18 I would like to know, for my clarification,
19 Madam Chair, if -- I know that technology is changing,
20 so I'm sure drones will be used more and more. I would
21 like to know if you at Agnico Eagle will follow the
22 same process that we have put in place for fixed-wing
23 aircrafts approaching during migration periods and to
24 slow down on the usage of helicopters.

25 Now, in respect to using drones, will you be at
26 least acknowledging this, that they can do some damage

1 to some of the caribou if they are -- they have not
2 seen these weird little contraptions now that are being
3 flying around -- being used by various groups? Will
4 you be setting up or utilizing the same kind of
5 regulations that are in place for using fixed aircrafts
6 and using helicopters to fly equipment and employees
7 back and forth to your other site areas? Will you be
8 using the same regulations that are in place to respect
9 this, to not use a drones? Just because of what I had
10 just explained.

11 MR. VANENGEN: Madam Chair. Sorry. I was
12 just conferring with Jamie because it's a very new
13 technology to us as well, and we've really just kind
14 of -- just began thinking about use of drones.

15 But we certainly appreciate the comments that
16 you've made. It's the same concerns that we heard
17 during the terrestrial advisory group meetings. Some
18 of the Baker Lake HTO members, as well as, I think,
19 some elders that were at the terrestrial advisory group
20 metres; they had noted that, and we'll adhere -- if we
21 implemented them, it will be implemented through a
22 decision with the terrestrial advisory group to begin
23 some trial studies. We'll follow all the regulations
24 that there are for drones. I know there's different
25 regulations for different size drones. And we'll also
26 continue to adhere, for our air traffic, to the

1 regulations for fixed-wing aircraft as well as
2 helicopters, and that's a commitment in our terrestrial
3 ecosystem management plan.

4 Mat'na.

5 THE CHAIR: Thank you.

6 Guy.

7 MR. ALIKUT: Thank you, Madam Chair. Guy
8 Alikut, Nunavut Impact Review Board.

9 When you were talking about cameras, the one --
10 are they going to be at Back River every day, 365 days
11 a year? Are they -- that camera going to be used, or
12 is it only when the caribou are close to your area? I
13 know that the comments that were said earlier about the
14 caribou that are going first, if they -- if they don't
15 let the first ones go by, then their -- the caribou are
16 going to keep following them. So if you let first herd
17 go -- we call them -- before -- before the caribou get
18 close and once they pass your area, the rest of them
19 will follow even if you continue to operate. Once
20 the -- what was mentioned earlier, because it is
21 traditional knowledge.

22 Once the calf and the mother -- they will follow
23 the leaders once they pass. If the leader is turned
24 and -- the rest of them will follow that leader, so
25 they are affected. That's traditional knowledge. They
26 have to know before the caribou is in the area because

1 if you change the course of the caribou, it'll affect
2 them all.

3 What kind of cameras are you going to use? And I
4 don't think they are going to be very useful, the
5 cameras that are used with motion sensors. What kind
6 of cameras are you going to use, and are they going to
7 be effective?

8 MR. VANENGEN: Ryan Vanengen from Agnico
9 Eagle.

10 All of these are good questions, and the question
11 about the camera and the comment you made about the
12 camera is very valid. We also are questioning the
13 cameras ability to detect caribou at long ranges. That
14 being said, we're interested in trying it out, so we're
15 going to look into -- to so see if that technology
16 works, and if it does work, we would implement it 360
17 days of the year -- or 365 days of the year, 24 hours.
18 Because that's the -- that's the benefit of those
19 cameras, right; they can be monitoring all the time.
20 But we're going to test those. So we're -- we're
21 not -- we believe that the most effective is to use the
22 humans -- like our wildlife monitors through the Baker
23 Lake HTO and also our technicians on-site -- to monitor
24 caribou.

25 We also appreciate the comments that you made
26 about the lead caribou. That's information that we've

1 collected in the past, and that's why we have that
2 tiered approach with the hope that, under all
3 circumstances, we'll protect caribou and try to ensure
4 that that first caribou will pass through our site
5 because we've already implemented mitigation, based on
6 our monitoring, and then that will allow the rest of
7 the herd to also pass through. So that's our goal as
8 well.

9 Mat'na.

10 MR. ALIKUT: Thank you for that
11 clarification. And what you were talking about with
12 the drones -- I have no problems with them using drones
13 because they're small, and they don't have -- they
14 don't make a lot of sound. I have no problem with them
15 using them, even if they have cameras on them. In the
16 summertime when it's not cold, they would be a good
17 tool to use those motion cameras. Thanks for the
18 clarification. That's all.

19 THE CHAIR: Kaviq.

20 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
21 Kaluraq, Nunavut Impact Review Board.

22 Earlier in your presentation when you referred to
23 Inuit Qaujimajatuqangit, can Agnico Eagle clarify, when
24 you refer to your Inuit Qaujimajatuqangit studies, is
25 that up to 2014 -- prior to and up to 2014?

26 And in the maps that you provided for Inuit

1 Qaujima jatugangit of the Whale Tail Project area with
2 harvest sites and wildlife and fish traditional
3 knowledge, as well as the Baker Lake Hunter Harvest
4 Study, is Agnico Eagle saying, based on those maps and
5 its Inuit Qaujima jatugangit studies, that they are
6 excluding the haul road -- focusing specifically on the
7 Whale Tail Project area -- that there are no
8 interactions for harvesting and migration of people and
9 animals within the Whale Tail Project area?

10 Mat'na.

11 MR. VANENGEN: Madam Chair, Mat'na.

12 Thanks for the question. The -- these maps here
13 weren't intended to -- or show -- this map here is
14 really just describing the information that was
15 collected related to caribou migrations. The other map
16 that was shown -- I don't think it's on this
17 presentation, but -- yesterday showed some of the
18 harvest areas in some of the traditional land-use
19 areas. And what that showed was that there's areas in
20 the centre of our project that are used for harvesting
21 as travel routes are in that direction, and it points
22 to, at the back there, other areas where hunting has
23 occurred within our project area.

24 So we didn't talk about that in this presentation,
25 we talked about it in yesterday's presentation, but I
26 hope that helps clarify.

1 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
2 Kaluraq, Nunavut Impact Review Board.

3 Yes, it does. Another question: On Slide 9, when
4 you were talking about the effects on caribou -- or the
5 number of caribou, you said that less than 1 percent of
6 the caribou interact with the project. What population
7 of caribou were you referring to? Is that the total
8 population of the caribou or the 140 caribou that would
9 result in a trigger?

10 Mat'na.

11 MR. DE LA MARE: Thank you for the question,
12 Madam Chair.

13 That refers to just the collared animals, so
14 it's -- that's all of the herds that are collared that
15 interact within 50 kilometres, 25 kilometres on either
16 side of the project area. So just collared animals.
17 And you raise a point there in terms of what proportion
18 of the caribou herds would those collars represent, and
19 that's -- that's unsure. But just based on the collar
20 time, they'll represent a certain percentage of the --
21 of the herds, and that's how much time they've spent in
22 that area.

23 MS. KALURAQ: Mat'na, Iksivautaq, Kaviq
24 Kaluraq, Nunavut Impact Review Board.

25 Thank you for clarifying. My last question: When
26 you're talking about the thresholds and trigger

1 distances, you specifically focus on the distribution
2 of caribou, whether that's the number of -- the
3 population of caribou or distance to the project site.

4 Are there any other factors that you would
5 consider in thresholds or triggers? For example, if
6 you had 139 caribou or 130, if they're 1.6 kilometres
7 away, 4.1 kilometres away -- you know, I'm -- I don't
8 think caribou do a head count before they approach a
9 project site, so are there any other factors that you
10 would -- other factors that you would consider?

11 Mat'na, Iksivautaq.

12 MR. VANENGEN: Mat'na. Thank you for the
13 question. And it's a really good practical question
14 because that's what the technicians will decide in the
15 field. But what that decision tree and the group-size
16 thresholds really are guidelines. They give us a gauge
17 as to when we need to shut down. So in some cases, a
18 technician -- you're right -- might observe 120
19 caribou, and they might say, You know, we need to shut
20 down, but our goal is that -- is to use that as
21 guidance.

22 Some of the -- as we stated earlier, some of the
23 mitigation are firm commitments within that guidance.
24 They're firm commitments, but it will be a decision
25 that's made in the field as well. So we absolutely
26 agree. It's not necessarily going to be, you know, a

1 strict number. And I think the important point that we
2 made in the presentation, that it's our goal to not
3 have any harm to caribou within the caribou that are
4 interaction with our project, so that means that we may
5 react under different circumstances in different ways.

6 THE CHAIR: Thank you.

7 Henry.

8 MR. OHOKANNOAK: Thank you, Madam Chair. Henry
9 Ohokannoak, Nunavut Impact Review Board.

10 Just to add to Guy Alikut's question earlier, just
11 a short one -- it was about -- asking about the
12 cameras, the surveillant cameras. How far from the
13 road are you -- are these -- cameras are going to be
14 sit or placed? You know, how far from the road? Is --
15 kilometre or -- can I get clarity on that, please.

16 Thank you, Madam Chair.

17 MR. VANENGEN: Ryan Vanengen from Agnico
18 Eagle. The concept of using the Reconyx cameras, which
19 are those motion detecting cameras -- kind of the --
20 they're a nicer version of, like, a hunting camera --
21 those would be used close to the site. But we may, if
22 we -- if we know that caribou are -- have a certain
23 trail, we might set them out farther from the site
24 to -- which might be maybe a kilometre. But those
25 details -- and maybe even beyond that if we can get
26 there by ATV.

1 But the details of the location of those motion
2 cameras, the hunting-type cameras, the Reconyx
3 cameras -- we haven't really sorted out those details,
4 but we'll bring those up with the terrestrial advisory
5 group to make sure that that type of study design and
6 the implementation of that monitoring tool is -- will
7 be effective.

8 Related to the kinda military grade cameras, the
9 ones that we'll see farther, that one would be -- those
10 would be fixed -- we're proposing that that one would
11 be fixed near the mine site where there's the heaviest
12 activity on a trial basis, and the details of that we
13 really haven't ironed out either. As we -- we'll also,
14 you know, speak with the terrestrial advisory group
15 about its location and some of the other details around
16 the use of that camera.

17 MR. OHOKANNOAK: Thank you, Madam Chair. Henry
18 Ohokannoak, Nunavut Impact Review Board.

19 And thank you for the clarification. That's all I
20 have. Quana.

21 THE CHAIR: Phillip.

22 MR. KADLUN: Quana, Madam Chair.

23 I'd like to go back to the Bathhurst caribou herd.
24 The question we should have -- I should have asked is
25 could the limited fragmentation be related to the
26 decline in the Bathhurst caribou population, rather

1 than being the evidence of effective -- effectiveness
2 of mine mitigation measures?

3 Thank you, Madam Chair.

4 MR. VIRGL: John Virgl, Madam Chair.

5 The effectiveness of mitigation at Ekati has been
6 shown to be that; it has been effective. There --
7 there has been no direct caribou mortalities at Ekati
8 since it's been in construction and operation.
9 There -- they do shut down the roads when caribou --
10 large numbers of caribou approach the site. Caribou
11 are allowed to move through the area.

12 The reasons for the -- for the decline in caribou,
13 if that's what I'm understanding your question is --
14 no? Is it -- is it just mitigation? Yeah. My answer
15 would be that mitigation for caribou moving through the
16 Ekati mine site has been effective.

17 MR. KADLUN: Madam Chair.

18 Will you -- I raise those questions because lots
19 of us are wondering what -- what is happening. It's --
20 you know, when you -- when we talk about something that
21 is declining, and then we compare it to something that
22 we're talking about, such as the mitigation measures --
23 and yet we have populations that are declining, and we
24 need to get some clear understanding of where -- or
25 what -- what it is. Quana, Madam Chair.

26 THE CHAIR: Thank you. I have just one

1 question. Can you provide additional details regarding
2 how far noise generated by proposed activities at the
3 Whale Tail Pit site would travel, how far could it be
4 heard, and what specific controls would be in place to
5 suppress or limit noise and its effects?

6 MR. QUESNEL: Yeah. Thank you, Madam Chair.

7 We have this information that was submitted with our
8 FEIS. It's Volume 4. Just getting organized here.
9 Some of key things to keep in mind, just to give it
10 some context, you know, average thresholds of normal
11 hearings in the range of 25 dB; rustling leaves is
12 about 20 dB; whispering is 30. If we measure our noise
13 here, it would be, you know, in that range or a little
14 bit higher. A snowmobile is in the range of 110.

15 But compared to our information in the FEIS, we've
16 done analysis where noise levels are -- predict to be
17 less than 30 dB at 7 kilometres from the haul road,
18 and, also, less than 35 dBA at 5 kilometres from the
19 haul road. So compared to the other noise -- like,
20 even a refrigerator is 40 dB.

21 So based on the thresholds to a human, some of the
22 comforts for a permissible limit based on the criterias
23 provided by different organizations and provinces, a
24 lot of the sound levels are in the 50 to 40 range for
25 comfort. So dealing with the mechanisms we have, we're
26 seeing -- we're at that threshold. The noise is not

1 travelling that far from the source. Some of the
2 mitigation strategies we have are just dealing with the
3 equipment with the muffling of the exhaust, muffling of
4 our power generators, things like that. And also
5 dealing with some of the material used on the road, so
6 there's not a lot of noise on the tires and things like
7 that. Blasting is blasting. And, also, the noise of
8 blasting is -- based on our experience, is reduced as
9 we go deeper into the pit.

10 So the natural walls -- say we're at the pit floor
11 right now. We have these walls. We have a blast in
12 the pit floor in this community hall, the noise would
13 be absorbed from the wall. So it's a natural
14 mitigation as we advance the pit into the ground.

15 So we have these practices that we've used at
16 Meadowbank. But also with -- dealing just with our
17 baseline information that's been provided as part of
18 our FEIS, we feel we're at a very low threshold at
19 those distances that I did mention.

20 So hopefully I answered your question. Thank you.

21 THE CHAIR: Thank you.

22 Okay. It is now after 5:00. There's still a few
23 presentations from the proponent. We should be
24 finishing those tonight, and then tomorrow, we'll be
25 going into the registered intervenors' presentations.
26 So let's break for supper and be back here at 6:30.

1 (DINNER ADJOURNMENT AT 5:16 PM)

2 (PROCEEDINGS RECOMMENCED AT 6:34 PM)

3 THE CHAIR: Okay. Shall we proceed with
4 the hearing?

5 There's five more presentations to be given by the
6 proponent. There's the marine environment, the
7 socioeconomics, human health, management plans and
8 monitoring programs, and accidents and malfunctions,
9 and another short presentation right after these five.
10 So why don't Agnico Eagle do all of the five
11 presentations together, and then we'll go into
12 questions and comments after.

13 But before you do, our legal counsel has something
14 to say.

15 Teresa.

16 MS. MEADOWS: Thank you, Madam Chair.

17 Teresa Meadows, legal counsel for the Nunavut Impact
18 Review Board.

19 Madam Chair, it's my understanding that we'd like
20 to seek clarification from Mr. De La Mare. There was a
21 sort of statement that was made with respect to his
22 prior involvement and his evidence that may have been
23 provided in the Back River Hearing with respect to the
24 use of the cameras, and it's my understanding he would
25 like to clarify that and clarify what his role and
26 function was in the prior hearing.

1 Thank you, Madam Chair.

2 Agnico Eagle Mines Limited Responds to Deferred
3 Questions

4 MR. DE LA MARE: Thanks, Madam Chair. It's
5 Corey De La Mare with Golder Associates on behalf of
6 Agnico.

7 So as mentioned, we were asked by Sabina to
8 provide a third-party review of their terrestrial
9 ecosystem management plan. So they had their plan
10 developed. We provided a review in addition to another
11 consulting firm that also provided a review. And in
12 that review, we just reviewed their methods and
13 their -- how they would use the methods for their
14 mitigation and gave an endorsement.

15 As part of that review, we had to review their
16 proposed technology of using an infrared and
17 motion-sensing camera. And although we agree if it --
18 if it works the way it's described, it could be a very
19 valuable tool in Nunavut. However, our caution was
20 that it's just unproven and untested in this
21 environment. As you know, it's a different environment
22 up here than what that camera is originally intended
23 for. That's all.

24 Thank you.

25 THE CHAIR: Okay. Accepted? Thank you.

26 Okay. You can go to your next presentations.

1 MR. QUESNEL: All right. Thank you,
2 Madam Chair.

3 Oh.

4 MS. MEADOWS: Madam Chair, it's my
5 understanding that there are five presentations that
6 will be presented sort of back to back to back. So I
7 propose to file those five presentations as exhibits.

8 And I've also been given an additional exhibit
9 that was not filed previously, that is, the joint
10 submission on commitments between the Government of
11 Nunavut and Agnico Eagle Mines Limited with respect to
12 socioeconomic commitments.

13 And so I will also be marking that as the next
14 exhibits in this hearing.

15 Thank you, Madam Chair. Those are my procedural
16 matters.

17 And one more thing. Are there any additional
18 witnesses that should be sworn in in advance of these
19 presentations?

20 EXHIBIT 12 - Agnico Eagle hard copy
21 PowerPoint presentation entitled "Part VI -
22 Marine Environment" (English/Inuktitut)
23 EXHIBIT 13 - Agnico Eagle hard copy
24 PowerPoint presentation entitled "Part VII -
25 Human Environment and Socioeconomics"
26 (English/Inuktitut)

1 EXHIBIT 14 - Agnico Eagle hard copy
2 PowerPoint presentation entitled "Part VIII -
3 Human Health" (English/Inuktitut)

4 EXHIBIT 15 - Agnico Eagle hard copy
5 PowerPoint presentation entitled "Part IX -
6 Management Plans and Monitoring Programs"
7 (English/Inuktitut)

8 EXHIBIT 16 - Agnico Eagle hard copy
9 PowerPoint presentation entitled "Part X -
10 Accidents and Malfunctions"
11 (English/Inuktitut)

12 EXHIBIT 17 - Agnico Eagle and Government of
13 Nunavut hard copy joint submission on
14 suggested terms and conditions (English)

15 MR. QUESNEL: Just give me -- thank you,
16 Madam Chair. Just give me two seconds.

17 Thank you, Madam Chair.

18 No additional people will be presenting for the
19 next five presentations.

20 MS. MEADOWS: Thank you, Madam Chair.
21 Teresa Meadows, legal counsel for the Nunavut Impact
22 Review Board.

23 Those are all of my procedural matters.

24 Thank you, Madam Chair.

25 THE CHAIR: So no one has to be sworn in?

26 No? Okay.

1 Go ahead. You may proceed.

2 Presentation by Agnico Eagle Mines Limited (Marine
3 Environment)

4 MR. QUESNEL: Thank you, Madam Chair. Jamie
5 Quesnel, Agnico Eagle.

6 The presentation is Part 6, marine environment.

7 This slide just highlights the travel shipping
8 route related to Whale Tail. It's the same shipping
9 route as Meadowbank. There's really no additional
10 changes to the number of ships for Whale Tail. So the
11 red line just highlights the shipping route.

12 And, also, the change with the -- with our
13 shipping company around Coats Island, that was
14 discussed before and the primary pathways to the south
15 of the island. However, the captain of the ship makes
16 the final decision on that based on the risks at that
17 time at that location.

18 Next slide just highlights some of the valued
19 components and other components that were assessed for
20 the shipping: marine water quality, marine fish, marine
21 mammals, marine birds. Some of the Inuit concerns that
22 were part of this assessment: marine wildlife abundance
23 and distribution, migration patterns; breeding areas;
24 critical habitat features; harvesting patterns; effects
25 of climate change on marine wildlife populations and on
26 harvesting activities; and also effects of shipping on

1 marine wildlife.

2 Potential effects assessed were those associated
3 with marine shipping activities: primarily vessel
4 transportation in the shipping corridor within the
5 assessment boundaries -- the Hudson Bay, Hudson Strait,
6 and the channel of Chesterfield Inlet; ship lightering
7 activities, ship-to-ship transfer/loading.

8 Shipping between July and early October, that's
9 the window of activity. It's the same thing that's
10 happening right now with Meadowbank for the last ten
11 years.

12 Majority of dry cargo delivered to Baker Lake from
13 Becancour, Quebec. So it's about three to six cargo
14 shipments per year and also three additional cargo
15 shipments per year between the Port of Churchill and
16 Baker Lake. Again, the volume of cargo is anticipated
17 to remain consistent with current shipping requirements
18 at Meadowbank. So, overall, there's really no change
19 in the frequency of shipping related to the Whale Tail
20 Pit Project.

21 Summary of the final environmental impact
22 statement results. Mitigation: shipping management
23 plan, which includes a full-time marine mammal and
24 seabird observer onboard the project vessels; also
25 speed restrictions; safe approach distances from marine
26 mammals; wildlife sightings recordkeeping and ship

1 lighting modifications; adherence to ballast water
2 regulations. Also shipboard oil pollution emergency
3 plan and shipping route was selected to avoid key
4 marine habitat areas for migratory birds, migratory
5 bird sanctuaries, and known important bird areas.

6 Continuing with the results, accidental spills:
7 We have minor diesel spill procedures, major diesel
8 spill procedures. Overall, the likelihood is
9 considered low, unlikely, for both minor and major
10 scenarios provided. Prescribed industry standard
11 prevention and response measures are in place. So that
12 ties into the previous plan that I mentioned. Also,
13 oil spill modelling in the area provides a maximum
14 conservative period up to 48 hours, after which
15 99 percent of spilled fuel would have dissipated. So
16 it's a model. If we did have a spill, which is
17 unlikely, this is the occurrence it would happen after
18 48 hours based on the modelling.

19 Continuing with the summary. Collisions with
20 vessels, marine mammals: And the vessel shipping route
21 overlaps with summer habitat for killer whale, beluga
22 whale, and narwhal. Core summer concentration areas
23 for beluga whale and narwhal are outside the local
24 study area and regional study area. To date, based on
25 our shipping company, no vessel strikes on marine
26 mammals have been recorded since the start of the

1 Meadowbank mine. The low vessel speeds that prevail
2 during operations will greatly reduce the likelihood of
3 ship strikes on marine mammals. So, basically, that
4 control has been effective with the last ten years of
5 shipping. Changes in behaviour are considered
6 temporary and reversible with no effects at the
7 population level anticipated.

8 Continuing with the summary, collision with
9 vessels and behavioural disturbance from in-air noise
10 and ship lighting, primarily directed impact with
11 marine birds. Mitigation is expected to be effective.
12 The shielded lights, so there's a cover on the lights,
13 to direct the light "apron" pattern. Probability of a
14 fatality or injury from a collision with vessels due to
15 lighting is considered unlikely. Lightering operations
16 area is located away from important birds' nesting and
17 breeding areas. No considerable aggregations of birds
18 in this area have been observed. And daylight hours
19 operations and reducing illumination during
20 non-operating hours. So those are controls that are in
21 place with the existing shipping company.

22 Continuing with results, no significant impacts on
23 marine fisheries productivity or structure and function
24 of self-sustaining and ecologically effective marine
25 wildlife populations relative to natural factors
26 occurring over the same period of time and space.

1 Scale of combined impacts from the project pathways,
2 independently or cumulatively with other reasonably
3 foreseeable future development, will not be large
4 enough to result in irreversible changes at the
5 population level.

6 Based on all the inputs to the assessments, the
7 project should not have a significant adverse impact on
8 the continued opportunity for traditional and
9 non-traditional use of marine resources in the region.

10 In summary, Agnico Eagle will follow
11 best-management practices for shipping. The shipping
12 management plan, including a full-time marine mammals
13 and seabird observers onboard the ships. Again, the
14 wildlife sightings and recordkeeping will be collected.
15 Adherence to the ballast water regulations. Again, we
16 have the shipboard oil pollution emergency plan. The
17 shipping company will adhere to Transport Canada
18 regulations. And we continue to meet with communities
19 and consult on how best to improve shipping practices
20 and activities -- example, in Chesterfield Inlet and
21 other communities.

22 Also, dealing with any outstanding terms and
23 conditions or requirements, there are none related to
24 marine environment. So everything has been resolved.

25 Thank you.

26 THE CHAIR: And your next presentation on

1 socioeconomics.

2 Presentation by Agnico Eagle Mines Limited (Human
3 Environment and Socioeconomics)

4 MS. LECLAIR: Good evening, Madam Chair and
5 members of the Board. My name is Suzanne Leclair. I'm
6 the superintendent for community relations for Nunavut
7 at Agnico Eagle, and I'm here tonight to speak to you
8 regarding human environment and socioeconomics about
9 the Whale Tail Project.

10 Given the fact that the time is short, I will
11 refer to the highlights of the presentation and keep in
12 mind the important matters to be underlined for your
13 interest.

14 Volume 7 of the final environmental impact
15 statement deals with the impact of Whale Tail Pit
16 Project on valued components. Those are the elements
17 that assess -- that are important for us to assess the
18 well-being and quality of life of the impacted
19 communities. There are three main headings -- heritage
20 resources, traditional land use, and socioeconomics --
21 which we'll deal with in sequence.

22 These elements or these valued components were
23 selected based on discussions with communities of
24 interest in 2014, 2015 through Inuit Qaujimajatuqangit
25 collected in the Cumberland 2005 final environmental
26 impact study. Throughout these consultations, the

1 Inuit communities of interest have expressed concerns
2 for different elements and stressed the importance of
3 three matters -- archaeological heritage sites; lands
4 and resources; and economic development, which includes
5 employment training and community wellness.

6 With respect to the heritage resources, the
7 heritage resource assessment recorded 19 heritage
8 resource sites within or beside the project study area.
9 The study showed that 15 out of the 19 sites, including
10 one grave site, are not impacted by the project
11 development. The remaining 4 sites -- namely, two
12 campsites, a blind, and a marker -- have been recorded
13 and documented, and with the approval of Nunavut
14 Department of Culture and Heritage, we have gone
15 through mitigation, a thorough mitigation, including
16 detailed site mapping, collection of artifacts,
17 archaeological excavation, and community consultation.
18 With our mitigation measures, there are no anticipated
19 significant residual effects. The project effects on
20 heritage -- excuse me. There are no anticipated
21 significant residual effects on the project effects --
22 due to the project effects.

23 With respect to the summary of the final
24 environmental impact statement results on the
25 traditional land use, there is limited traditional land
26 use within the project area. Trails pass through the

1 haul road. Traditional land-use ramps will be
2 constructed and signage posted, and hunters must -- we
3 recommend that hunters must yield to the haul truck.
4 The project is expected to interact with some of the
5 activities. However, with mitigation and consideration
6 for the residual effects, significant changes to
7 hunting and fishing, plant harvesting, or use of
8 culturally important sites are not anticipated.

9 This is an example of mitigation measures to
10 minimize the impacts on traditional land use. A trail
11 pass -- a trail pass will be included in the haul road
12 design for traditional land use. In addition, we are
13 avoiding the archaeological and heritage resources.
14 Avoiding archaeological and heritage resources will
15 limit the project effect on the use of culturally
16 important sites. This was requested through our public
17 consultation process.

18 The summary of our socioeconomics based on their
19 final environmental impact statement results: The
20 socioeconomic assessment evaluate the project's
21 potential effect on population, education, economic
22 activity, business development, employment, education,
23 and training, including individual and community
24 well-being. As an extension of this existing mine, the
25 Whale Tail Pit Project is expected to continue many of
26 the socioeconomic benefits of Meadowbank mine,

1 including a positive effect to the territorial economy,
2 an extension of employment for the existing workforce,
3 including the safeguarding of 300 current Inuit
4 employment with 75 new employment opportunities for the
5 Inuit.

6 The project will continue to have positive effects
7 by extending local business, education, and training
8 opportunities beyond the closure of Meadowbank. As an
9 example, in 2016, 56 percent of Meadowbank's
10 procurement spend was on northern businesses.
11 Concretely, that represents 238 million in the Kivalliq
12 Inuit Association Region, 50 million of which went to
13 Baker Lake businesses.

14 Agnico Eagle is committed to working with the
15 communities and the government to monitor and address
16 impacts, including the ongoing implementation of the
17 social management and monitoring plan found in
18 Volume 8, Appendix 8(e)(6).

19 I believe Jamie had already spoken to you about
20 this particular slide. I'll just skip right by.

21 It is important to develop a skilled labour
22 workforce in order to have sustainable jobs and trades
23 that will outlast the life of a mine. With that --
24 this in mind, there are three components that we need
25 to consider.

26 First, we need to consider the preparation. That

1 means community-based training, education programs --
2 such as TASK week -- the Arviat mine training,
3 financial literacy. We also have a labour pool, so a
4 list of potential candidates. We also have a work
5 readiness program and a site readiness.

6 The second part is support: so site-level
7 programming, so coping with fly-in/fly-out,
8 cross-cultural training, financial literacy. We also
9 have training programs, general and health and safety
10 specific. And at the moment, we're currently
11 undergoing an Inuit workforce barrier study, which will
12 help us determine what are the barriers to full
13 employment? And as part of our support program, we
14 also have local community coordinators in each of the
15 Kivalliq Inuit Association hamlets.

16 The third aspect of developing a skilled labour
17 force includes creating opportunities for these
18 applicants. So with that, we really are endeavouring
19 to bring more upward mobility to our Inuit colleagues.
20 That means we have a career path program. We also have
21 an apprenticeship and pre-apprenticeship program, a
22 role model program, and a leadership newest -- our
23 newest addition is a leadership development program,
24 which will be -- which is being launched in 2017.

25 In Baker Lake, we work with community -- with the
26 community of Baker Lake to develop -- to develop a

1 Baker Lake wellness plan. The community of Baker Lake
2 identified five priority areas for wellness. Most
3 importantly that was identified was the financial
4 literacy program, which was, in fact, run in Baker Lake
5 this year, and that came out of our Baker Lake wellness
6 planning. So it was a direct response to our community
7 need. The community identified financial literacy as a
8 priority. So Agnico in partnership with the Chartered
9 Professional Accountants of Canada jointly delivered
10 seven financial literacy sessions to almost 110 people
11 in Baker Lake at the Baker Lake high school and at
12 Meadowbank. These sessions were called "Planning for
13 Today", and it was an introduction to financial
14 literacy and reviewed concepts such as difference
15 between bank accounts -- saving, chequing -- and
16 budgets.

17 Now, there's also a Whale Tail Inuit Impact
18 Benefit Agreement that was signed earlier this year in
19 June, on June 15th. The Kivalliq Inuit Association and
20 Agnico Eagle negotiated an agreement that ensures that
21 the Inuit benefit from development of the Whale Tail
22 Project through training, jobs, business opportunities;
23 and this is one of the means throughout we -- by which
24 we address socioeconomic impacts.

25 Just a quick highlight, we have a -- as my
26 colleague from Kivalliq Inuit Association indicated, we

1 have a -- reminded me -- we have a minimum target of
2 50 percent employment across all our Agnico Eagle's
3 operation in Nunavut. That's a minimum target of
4 50 percent.

5 Also, we want to outline that, in the final
6 environmental impact statement, we indicated that the
7 fiscal benefits to the government generated by the
8 projects including personal income tax, corporate
9 income tax, and tax on fuel. We would like to point
10 out an error in Table 7.4-3. In that final
11 environmental impact statement, which indicates
12 royalties paid to the government when those -- in fact,
13 those royalties will be paid to the regional Inuit
14 association, namely, Kivalliq Inuit Association and
15 Nunavut Tunngavik Incorporated.

16 A quick word on business opportunities, 'cause we
17 expect these to increase over time. The Inuit Impact
18 Benefit Agreement negotiated for Whale Tail has
19 annual -- has anticipated annual information sessions
20 for businesses in various communities in all the
21 Kivalliq Inuit Association communities. We also have a
22 prequalification process for Inuit-registered business
23 to apply. We have a very detailed tendering process
24 which provides for points for Inuit firms -- Inuit
25 businesses to have preferential contracts. We also
26 have ongoing one-to-one assistance in workshops to help

1 young Inuit firms to get started. We also have
2 contract tailoring. That's a process by which we make
3 a large contract into smaller pieces so that local
4 Inuit firms can apply on these contracts. As opposed
5 to building a whole mine, there's different areas in
6 which the smaller business can obtain these contracts.

7 In addition, the Inuit Impact Benefit Agreement
8 also outlines a process for hiring Inuit employees,
9 with preference given to employees from affected
10 communities, such as Baker Lake and Chesterfield Inlet.
11 This is done through the labour pool process. This is
12 what our Inuit candidates would see, and this is the
13 outlined process. In each of the Kivalliq Inuit
14 Association hamlets, there is someone to support the
15 application online.

16 We also have an Inuit Impact Benefit Agreement
17 socioeconomic monitoring. This provides for a
18 commitment where Agnico has socioeconomic monitoring
19 commitments which are managed collaboratively with the
20 Kivalliq Inuit Association through various
21 implementation committees. The main components of
22 these obligations include an annual labour market
23 analysis to assist in understanding who is available to
24 work in the Kivalliq Inuit Association Region. We also
25 have a socioeconomic Inuit impact benefit review, which
26 is designed to review the socioeconomic impacts and

1 benefits on Inuit in the -- from the Whale Tail
2 Project.

3 We also have a strategy to overcome Inuit
4 workforce barriers. Need to understand that fully.
5 And we also have an annual language report on the use
6 of Inuktitut at the Whale Tail Project. These studies
7 will be shared with the socioeconomic monitoring group
8 as they become available.

9 We are nearing the end.

10 We also have post-operations socioeconomic
11 planning. So our post -- for post-closure
12 socioeconomic planning and monitoring, Agnico, through
13 the Whale Tail Inuit Impact Benefit Agreement, we made
14 the following -- Agnico has made the following
15 commitments: job placement counselling and to provide
16 to the Kivalliq Inuit Association our anticipated need
17 for employment in a review of our employment and
18 training measures throughout the Inuit Impact Benefit
19 Agreement committees at least 120 days prior to the
20 planned closure. These needs will also be shared with
21 Indigenous and Northern Affairs Canada as the project
22 progresses.

23 In summary, Agnico Eagle, by working in
24 collaboration with different partners, we are committed
25 to maximize the benefits and minimize the impact from
26 the Whale Tail Project. Production at the Whale Tail

1 Project will allow Agnico Eagle to extend the life of
2 Meadowbank mine, thereby saving 300 Inuit -- existing
3 Inuit jobs. There are also significant financial
4 benefits provided through the project to the Nunavut
5 Tunngavik Incorporated and the Kivalliq Inuit
6 Association. Through the life of mines of Whale Tail,
7 Meliadine, and Meadowbank projects combined, the
8 Nunavut Tunngavik Incorporated and the Kivalliq Inuit
9 Association are expected to receive over 400 million.
10 Agnico will continue to adhere to the Inuit Impact
11 Benefit Agreement conditions, including those related
12 to socioeconomic planning and monitoring.

13 In closing, we have committed to a conceptual
14 post-closure socioeconomic plan one year after the
15 issuance of Whale Tail Project certificate, if
16 approved. We have also committed to work -- to begin
17 our work -- to work on our socioeconomic monitoring --
18 or planning two years prior to closure with the
19 Kivalliq Inuit Association socioeconomic monitoring
20 committee and develop a final closure plan one year
21 prior to the expected closure that will address the
22 transition and the socioeconomic impacts.

23 Thank you.

24 THE CHAIR: Thank you.

25 And your next presentation, human health.

26 Presentation by Agnico Eagle Mines Limited (Human

1 Health)

2 MR. QUESNEL: Thank you, Madam Chair.

3 The next presentation is human health.

4 So based on the valued components and other
5 components that were assessed: workers, Inuit and
6 non-Inuit; public; ungulates; predatory mammals;
7 raptors; waterbirds; upland birds; small mammals; fish;
8 aquatic invertebrates; aquatic plants and algae. Inuit
9 concerns: Ensuring the health of people and the
10 environment is considered.

11 And human health is part of Volume 8 of the final
12 environmental impact statement.

13 Some of the other systems we have in place to
14 manage and implement and review our controls related to
15 that is part of the responsible mining management
16 system. Again, it's been mentioned a few times: the
17 plan -- the planning piece; the doing piece, the
18 execution; checking our activities; and acting based on
19 any changes.

20 Site-specific health and safety plans are
21 implemented and reviewed. Operational procedures,
22 guides, and instructions are utilized to guide the
23 workforce. And part of this is continuous monitoring
24 of these activities, the mitigation of any exposures,
25 the maintenance and response. And the response is
26 managed by a highly skilled emergency response team.

1 And with the Whale Tail Pit Project, there will be a
2 team at the Whale Tail location and also continuing
3 with the existing team at Meadowbank.

4 This is a short -- there's only one more slide,
5 but before I get to the final summary, before we give
6 our concluding remarks on this topic, I would just like
7 to give the Board an overview of our relevant
8 responses and responses to final submissions. There's
9 only one: Health Canada submitted one relevant comment
10 respecting assessment of risks from consumption of
11 fish. Agnico confirmed it followed Health Canada
12 guidance to determine allowable fish consumption to
13 remain below the daily recommended intake. Our
14 understanding is that there are no outstanding issues.

15 So the summary of the results.

16 Human health: no health risks for the public using
17 the lands around Whale Tail Pit for hunting, gathering,
18 and other traditional purposes. No health risks for
19 the public using the lands around Whale Tail Pit for
20 recreational purposes.

21 Wildlife: no ecological risks for wildlife using
22 the lands around Whale Tail Pit.

23 Aquatic life: no ecological risks for aquatic life
24 in the lakes and watercourses around Whale Tail Pit,
25 including the flooded pit post-closure.

26 Thank you.

1 THE CHAIR: Do you have a second part on
2 human health?

3 MR. QUESNEL: No. That's it for human
4 health.

5 THE CHAIR: Okay. Management plans and
6 monitoring programs.

7 Presentation by Agnico Eagle Mines Limited (Management
8 Plans and Monitoring Programs)

9 MR. VANENGEN: Mat'na, Madam Chair and Board
10 members. My name is Ryan Vanengen, and for the next
11 20 minutes, Erika and I will be presenting a summary of
12 our management plans and monitoring plans.

13 A quick summary of the next presentation, the next
14 20 minutes, we're going to include an overview of
15 Agnico Eagle's approach to management plans and
16 monitoring plans. We're going to review Whale Tail's
17 specific management plans and monitoring programs; and
18 that will include water quality and flow monitoring,
19 water quality monitoring and management for dike
20 construction, hydrogeological monitoring, quality
21 assurance/quality control, waste rock management, spill
22 contingency and emergency response planning, and
23 closure and reclamation planning.

24 Our management plans are separated into four
25 categories, and this was explained at the prehearing
26 conference as well in great detail. The Whale Tail Pit

1 standalone plans or new plans is one category, and
2 these will support the Whale Tail Pit Type A licence
3 and Nunavut Impact Review Board project certificate.
4 Examples of that are the waste rock management plan,
5 water quality monitoring and management plan for dike
6 construction, landfill design and management plan,
7 water management plan, water quality and flow
8 monitoring plan, and the haul road management plan.

9 The next set of management plans includes the
10 Whale Tail Pit addendums, and these are addendums to
11 existing and approved Meadowbank management plans.
12 These will support the Whale Tail Pit Type A water
13 licence and Nunavut Impact project certificate and are
14 updates or addendums to Meadowbank operational plans.
15 An example of that would be our core receiving
16 environmental monitoring plan, our groundwater
17 monitoring plan, our air quality and our terrestrial
18 ecosystem management plan.

19 The next set is the updated Meadowbank mine plans,
20 and this is to support the Type A water licence, so the
21 2AM-MEA1525 amendment process, and that would include
22 the Whale Tail Pit tailings and storage and the
23 Meadowbank tailing -- in the Meadowbank tailing storage
24 facility. And that plan was submitted to the Nunavut
25 Water Board on January 25th, 2017.

26 And, lastly, we have a set of plans that are

1 already approved Meadowbank plans and did not require
2 any changes for the Whale Tail Pit Project. Examples
3 of that would be the spill contingency plan, the
4 quality assurance and quality control plan, the
5 transportation and management plan, and the maintenance
6 and surveillance manual plan. And these are
7 all-encompassing plans and are intended to be holistic
8 to all of our operations at Meadowbank and at Whale
9 Tail Pit.

10 This slide summarizes our site-wide water quality
11 monitoring. This is an example of the new plans that
12 we developed specifically for Whale Tail Pit. During
13 operations, Agnico Eagle proposes 15 monitoring
14 stations that are spread throughout the site to
15 monitor -- as we described in the earlier presentation
16 related to freshwater, to monitor all the contact water
17 inside our site area as well as the receiving water
18 environment outside of the contact area. So that would
19 include -- in terms of the contact water, that would
20 include monitoring the pit; that would include
21 monitoring the sumps or ponds here next to the
22 waste-rock facility; and it would include the
23 attenuation pond as well.

24 Various stations within the receiving environment
25 that will be monitored in addition -- these are --
26 these are stations that would be monitored in addition

1 to the CREMP stations. This would be -- this would
2 also allow us to monitor the freshwater source for the
3 camp, which is in Nemo Lake, located here, which will
4 ensure -- is -- meets standard environmental quality
5 standards and health standards. And all of this is
6 described in Appendix 8-B.3.

7 Our site-wide monitoring has various stations
8 within the receiving environment that will be monitored
9 in addition to the CREMP stations, as I mentioned, and
10 the same principles for monitoring were applied at
11 Whale Tail Pit as they are in our current Meadowbank
12 licence. We'll have compliance monitoring; we'll have
13 event monitoring; and we'll have adaptive management
14 planning as well -- we'll have adaptive management
15 program monitoring.

16 For the water quality and flow monitoring and
17 management, we have divided our monitoring categories
18 for compliance into five different groups, and this is
19 consistent with our current Type A water licence. That
20 includes a Group 1, which is mine site monitoring;
21 Group 2, which is for the receiving environment, to
22 make sure the fish and the food sources for fish are
23 protected. We have Group 3, which is sampling prior to
24 discharge. Then we have Group 4, which is sampling
25 prior to discharge at our fuel storage areas. And then
26 we have the Metal Mine Effluent Regulation monitoring

1 stations as well.

2 The discharge limits that are presented in this
3 slide have been reviewed and developed through
4 discussions with Environment Canada. Based on
5 predicted water quality, these limits will be
6 protective of the receiving water environment and will
7 be discussed further during the Nunavut Water Board
8 process.

9 Although we're confident that the environmental
10 quality criteria that we will discuss with the Nunavut
11 Water Board and have agreed upon with Environment
12 Canada are protective of the receiving environment,
13 we've also developed Whale Tail-specific receiving
14 environmental monitoring. That's presented in the
15 Whale Tail Project core receiving environmental
16 monitoring program, which is an extension of the
17 Meadowbank core receiving environmental monitoring
18 program; and it has the same monitoring approach as at
19 Meadowbank, which has us evaluating year-round
20 receiving environment at a basin level. And what we'll
21 do is we'll collect water quality data, phytoplankton
22 data, zooplankton data, and benthic and also sediment
23 quality data to ensure that the habitat that the fish
24 are living in is protected and monitored.

25 Areas that will be monitored are shown in the
26 figure down below, and that includes Whale Tail Lake in

1 the south basin, Mammoth Lake, Nemo Lake, as well as
2 lakes on the downstream area that we discussed earlier.

3 We also will be using the same reference lakes
4 which are -- will allow us to compare the site-wide
5 monitoring to an area that's not near our mine
6 activities, and those lakes are called Innug Lake and
7 Pipedream Lake. And the same methods and triggers that
8 were developed for the Meadowbank mine site, the
9 methods for analyzing and the triggers for monitoring
10 against the data that comes in, will be the same at
11 Whale Tail Pit as it is for Meadowbank.

12 Related to dike construction, we reviewed this
13 already in the freshwater environment, but we'll use
14 the lessons learned from the Meadowbank east dike as
15 well as the Bay Goose dike to manage and control total
16 suspended solids. During dike construction, we will
17 monitor near the dikes, as well as in areas at the
18 outlet of Mammoth Lake; so near the dike construction,
19 as well as in areas at the outlet of Mammoth Lake, just
20 located here.

21 As described earlier, adaptive management strategy
22 for dike construction means that, if monitoring results
23 exceed licence limits and total suspended solids
24 triggers monitoring, we may need to slow down or alter
25 our construction practices of the dike; we may need to
26 increase monitoring frequency, install additional

1 turbidity curtains, pump in the trench and treat water,
2 and perhaps stop our dike construction. We have
3 learned a lot related to dike construction since the
4 Meadowbank mine site began, and we will implement the
5 same strategies for mitigation and monitoring as was
6 done at Meadowbank.

7 Related to hydrogeology, baseline conditions are
8 characterized in the hydrogeology baseline report. In
9 2015, we installed three groundwater wells along with
10 the installation of various thermistors. These wells
11 were installed to target the open talik within the
12 lake. However, they froze and could not be developed
13 for reliable monitoring results. And as a result, in
14 2016, we installed a multiport Westbay groundwater
15 well, which gives us the ability to monitor at multiple
16 depths and into the deep underground water.

17 Based on the data that we've collected and the
18 hydrogeological monitoring, we have found that
19 permafrost is expected below land and in shallow areas
20 of Whale Tail Lake. A talik is underlain by permafrost
21 near the pit, and there's an open talik towards the
22 central portion or deeper section of the Whale Tail
23 Lake.

24 This is confirmed through the thermistors, the
25 drilling that we did to try to install groundwater
26 wells in 2015, and the groundwater Westbay installation

1 in 2016. There are various ports in the Westbay
2 installation, and our data from 2016 are reliable and
3 are consistent with our FEIS predictions related to
4 hydrogeology.

5 Now, it's important from a quality assurance and
6 quality control side that Agnico Eagle adheres to
7 consistent protocols that we've already developed over
8 the many years of operating at Meadowbank, and we will
9 continue to adhere to the quality assurance and quality
10 control protocols for the Whale Tail Pit Project.

11 These were reviewed during our recent licence renewal
12 of our Type A water licence and is a condition of our
13 Meadowbank project certificate, and we expect this to
14 be a condition also of our Whale Tail Pit Project
15 certificate.

16 What that means is that, related to water quality
17 sampling, we follow protocols that are strict and meet
18 industry guidance for quality assurance and quality
19 control, but there's -- that also means that -- in a
20 general sense, it also means, for specific monitoring,
21 we also have very detailed quality assurance and
22 quality control requirements that we'll continue to
23 manage.

24 And now Erika is going to present on our quality
25 assurance and quality control related to waste rock.

26 MS. VOYER: Thank you, Madam Chair. Erika

1 Voyer, Agnico Eagle.

2 These following slides will present the main steps
3 for the waste rock management as previously presented
4 this morning in the freshwater environment
5 presentation.

6 At baseline stage of the project from geological
7 information available, we have identified the types of
8 waste rock by lithology that are present in the pit and
9 also their potential use. During the mining process in
10 the pit, we will conduct sampling of rock during mining
11 same as for Meadowbank. The analysis of the sample
12 will be completed in the laboratory on-site. QA/QC
13 will also be done in an external lab to verify the
14 results. With the data from the laboratory analysis,
15 we will be able to classify if the waste rock material
16 is potentially acid generating or non-acid generating.

17 The waste rock management plan is completed at the
18 early stage of the project and is then further
19 detailed. During production, the engineering team
20 review the plan on a weekly basis and produce maps and
21 directive on the waste rock classification and the
22 position location.

23 The dispatch system, as for Meadowbank, will
24 produce a daily map completed with the geological
25 information, as shown on the right figure, including
26 the different type of material being mined in the pit.

1 Following the limit that will be indicated in the pit
2 to differentiate the different type of material and the
3 information from geology, the dispatch system and the
4 dispatcher in charge, as shown on the left picture,
5 will give the -- will guide the operators of the
6 equipment and ensure that the ore and waste rock
7 material are transported to the appropriate
8 destination.

9 The operator working in the pit in the equipment
10 will also see the information through the dispatch
11 system in their equipment, which will ensure that the
12 operator will know at all times and what type of
13 material they will be working in.

14 The execution of the waste rock management is a
15 step-by-step integrated process that includes different
16 team during the whole mining process. Waste rock
17 management is a key component of the mining planning.

18 Thank you, Madam Chair. I will let my colleague
19 Ryan Vanengen continue the presentation.

20 MR. VANENGEN: Quality assurance and quality
21 control for acid rock drainage and metal-leaching
22 monitoring data follows industry best standards and our
23 Meadowbank standards. Geochemistry samples of waste
24 rock follow the ARD/metal leaching -- sorry -- plan for
25 segregation analysis that follows our Meadowbank
26 standards, which includes when we encounter greywacke,

1 mafic volcanic, intermediate intrusive. We'll sample
2 every 4 drill holes for acid rock drainage and every
3 16th hole for metal leaching. These samples will be
4 sent to our Meadowbank lab for ABA and NPR testing and
5 duplicates sent to external and accredited
6 laboratories. Monthly site-wide quality data
7 collection will be done by technicians following
8 rigorous quality assurance and quality control
9 standards, and these will be qualified technicians.
10 We'll collect one field duplicate per ten samples, and
11 the samples -- this will be sampled by inspectors, and
12 we'll have a third-party accredited laboratory do the
13 analyses.

14 For water quality monitoring plans, we will follow
15 environmental effects monitoring and Metal Mine
16 Effluent Regulation sampling protocols according to
17 Environment Canada standards and regulations, and that
18 includes very specific guidance on quality assurance
19 and quality control. In our receiving water quality
20 samples during the core receiving environmental
21 monitoring plan, we will collect the -- and -- collect
22 data and analyze and report to produce -- which will be
23 produced by a third-party consultant. Specific quality
24 assurance and quality control and standard operating
25 procedures are included, including field duplicates
26 with blanks, and samples will be analyzed by a

1 third-party accredited laboratory. Related to our
2 groundwater monitoring and air quality monitoring,
3 standard operating procedures will be followed,
4 specific quality assurance and quality control will be
5 followed, and samples will be analyzed by a third-party
6 accredited laboratory as well.

7 Related to spill contingency and emergency
8 response planning, as outlined in our Meadowbank spill
9 contingency plan, we intend to apply consistent and
10 equal protocols for our emergency response at our site
11 at Meadowbank, along the all-weather access road, along
12 our Whale Tail Pit haul road, as well as by our Whale
13 Tail Pit site.

14 We have a highly trained emergency and response
15 team, and we're intending to have that highly trained
16 emergency response team located both at Meadowbank and
17 at our Whale Tail Pit site as well. All members of our
18 team are trained and familiar with emergency and spill
19 response procedures and have resources, and they
20 understand what's required under certain circumstances,
21 whether it's human health related or environment
22 related.

23 We also have a reclamation and closure plan that
24 was submitted to the Nunavut Impact Review Board and
25 the Nunavut Water Board. And as a quick description of
26 our closure planning, after four years of mining at the

1 Whale Tail Pit, beginning in late 2022 and continuing
2 until 2025, we will be actively closing the site. And
3 that may extend into 2029. During operations, we will
4 continue to work with intervenors by updating our water
5 quality pit modelling on an annual basis; and based on
6 this information, we will update our operations. The
7 Meadowbank mine site interim closure and reclamation
8 plan approach is unchanged, and our progressive closure
9 of Vault pit and portions of the Meadowbank site during
10 operations of the Whale Tail Pit will inform our
11 overall site closure plans, both at Meadowbank and at
12 the Whale Tail Pit site. This is all summarized in our
13 Meadowbank interim closure and reclamation plan.

14 To support the Whale Tail Pit Licence A, we also
15 have developed another specific interim closure plan
16 which covers the closure of the Whale Tail Pit site as
17 well as the closure of the Whale Tail haul road. And
18 as mentioned previously, experience and knowledge
19 gained through operations and closure of the Meadowbank
20 facilities will continue to inform our closure planning
21 for the project. We followed INAC guidance on closure
22 and reclamation; and we recently have come to an
23 agreement with the Kivalliq Inuit Association and
24 Indigenous and Northern Affairs Canada on a bonding --
25 on a securities amount and an SMA, which is a security
26 management agreement.

1 As per Item E -- or as per 'E', Item 6 of our
2 Type A water licence at Meadowbank, we believe that the
3 Whale Tail Pit Type A will also have this type of
4 condition. But our dikes at Whale Tail Pit will not be
5 breached until water quality in the pits meets the
6 Canadian Council for -- and Ministers of the
7 Environment criteria baseline or appropriate
8 site-specific water quality objectives as prescribed by
9 the Nunavut Water Board.

10 During closure and prior to breaching dikes, we
11 will monitor around the site in the receiving
12 environment, as well as in the pits. And as per
13 DFO's -- Department of Fisheries and Oceans' request,
14 we've added a station in the water quality and flow
15 monitoring plan in the Whale Tail Pit. And we will
16 conduct limnological monitoring in the pit during
17 closure to compare water quality to our modelling
18 results.

19 And, finally, related to closure and reclamation
20 planning, we will adhere to our acid rock drainage and
21 metal-leaching monitoring plan, as described earlier;
22 we will adhere to our waste rock and storage facility
23 management plan, as described by Erika; and we will
24 continue to follow our water quality and flow
25 monitoring plan. We will use the knowledge and data
26 gained from active closure at Vault pit to inform our

1 closure at Whale Tail. And we will use proactive
2 monitoring and decision-making to ensure post-closure
3 goals are met; and that includes analyzing
4 geochemistry, using our thermistor data, as well as
5 monitoring our water quality and sumps and in the pit,
6 and then, ultimately, remodelling based on the
7 monitoring data. We look to have a continuous
8 evaluation and planning, and this is what it means to
9 implement adaptive management at the Whale Tail Pit
10 site.

11 Mat'na.

12 THE CHAIR: And your accidents and
13 malfunctions presentation.

14 Presentation by Agnico Eagle Mines Limited (Accidents
15 and Malfunctions)

16 MR. QUESNEL: Thank you, Madam Chair. Jamie
17 Quesnel.

18 This is a short presentation, about four slides;
19 and it's the second-last presentation from the
20 proponent, Agnico.

21 Accidents and malfunctions, a key mechanism for
22 this is the responsible mining management system.
23 Again, it's the planning, the doing, the checking, and
24 acting. Site-specific health and safety plans are
25 included, operational procedures, guides, and
26 instructions. We have continuous monitoring,

1 mitigation, maintenance, and response. And, again, as
2 mentioned a few times, we have a highly skilled
3 emergency response team.

4 Also, health and safety, it's paramount within
5 Agnico. Everyone has a responsibility, and every
6 person can make a difference. We identify health and
7 safety responsibilities for all level of employees. We
8 ensure clear guidance and expectations towards safety.
9 We adhere to all safety regulations and ensure
10 preventable measures are in place for all employees.

11 Related to spill contingency and response plan,
12 Agnico Eagle is committed to operating in a safe,
13 socially, and environmentally responsible manner in
14 accordance with terms and conditions of the water
15 licence primarily for the collection, use, management,
16 and reuse of water; the collection, use, and management
17 of waste; and any discharges to the receiving
18 environment. As mentioned a few times, based on our
19 experience at Meadowbank, we have a systematic adaptive
20 management approach to decision-making whereby
21 operational practices can be adapted and adjusted as
22 required to reduce or eliminate any unforeseen negative
23 impacts throughout the life of the project.

24 And just briefly -- this is the final slide -- in
25 summary, regarding our designated emergency response
26 teams, it's consisting of on-site personnel, which has

1 been well established at Meadowbank; and that
2 experience, those lessons learned will be transferred
3 to Whale Tail. All the members of the teams are
4 trained; are familiar with emergency and spill response
5 resources, including their location and access; very
6 familiar with the spill contingency plan and
7 appropriate emergency spill response methodologies. In
8 addition, there's additional training for the team --
9 so a review of the spill response plan and also
10 identifying the roles and responsibilities of all the
11 emergency response team members; the nature, status,
12 and location of all fuel and chemical storage
13 facilities; the on-site and off-site spill response
14 equipment and how to use it effectively; emergency
15 contact lists within the company and also dealing with
16 our government agencies; also desktop exercises of
17 worst-case scenarios and mockups in the field; and also
18 the likely causes and possible effects of spills.

19 Also, just to mention to Madam Chair and the
20 Board, there were no outstanding issues related to
21 accidents and malfunctions identified in the final
22 written submissions.

23 Thank you.

24 THE CHAIR: Okay. Before we go into
25 questions, we're going to take a short break.

26 (ADJOURNMENT)

1 THE CHAIR: Okay. Welcome back. There's
2 one more item that Agnico Eagle forgot to present.

3 Legal counsel.

4 MS. MEADOWS: Thank you, Madam Chair.
5 Teresa Meadows, legal counsel for the Nunavut Impact
6 Review Board. So there is one additional exhibit that
7 should have been filed with the socioeconomic joint
8 submission on commitments, and it is entitled "Joint
9 Submissions on Suggested Terms and Conditions". So,
10 Madam Chair, we will file that as Exhibit Number 18 in
11 these proceedings, and I believe that the parties have
12 received copies of that as well.

13 So thank you, Madam Chair. Those are my
14 procedural matters.

15 EXHIBIT 18 - Joint submission on suggested
16 terms and conditions by Agnico Eagle Mines
17 Limited and the Government of Nunavut
18 (English)

19 THE CHAIR: Thank you. We will now move
20 on to questions on the other presentations that
21 Agnico Eagle gave.

22 Starting with Kivalliq Inuit Association, any
23 questions?

24 Kivalliq Inuit Association Questions Agnico Eagle Mines
25 Limited

26 MS. GILSON: Thank you, Madam Chair.

1 Kimberley Gilson, Kivalliq Inuit Association. Just one
2 quick question for Agnico Eagle, please, and it relates
3 to the exhibit that was just mentioned by NIRB legal
4 counsel.

5 With respect to the GN, Government of Nunavut, and
6 Agnico Eagle proposed term and condition, it mentions
7 "Kivalliq Inuit Association projects". "Kivalliq Inuit
8 Association projects" are not defined in this document,
9 so we would just like you to confirm for the record,
10 please, that when you refer to "Kivalliq Inuit
11 Association projects", you are meaning only Meadowbank
12 project, Meliadine project, and Whale Tail Project.

13 Thank you, Madam Chair.

14 MS. LECLAIR: Good evening, Madam Chair.
15 Suzanne Leclair, Agnico Eagle. Yes, we may -- we can
16 confirm that the Kivalliq Inuit Association projects
17 mean the Meadowbank project, the Whale Tail Project,
18 and the Meliadine project.

19 MS. GILSON: Thank you, Madam Chair.
20 Kivalliq Inuit Association has no more questions on the
21 presentations.

22 THE CHAIR: Okay. Thank you.

23 Any questions from the Baker Lake Hunters and
24 Trappers Organization?
25 Baker Lake Hunters and Trappers Organization Questions
26 Agnico Eagle Mines Limited

1 MR. BERNAUER: Thank you, Madam Chair.
2 Warren Bernauer for the Baker Lake Hunters and Trappers
3 Organization. I have a few questions for Agnico Eagle.

4 The first questions that I have deal with the
5 marine environment. To start, on Slide Number 9, it
6 states that the project will not have a significant
7 adverse impact on traditional use of marine mammals.
8 How do you define significant impacts on marine
9 mammals? In this case, what's your significance
10 threshold?

11 MR. QUESNEL: Thank you, Madam Chair. Jamie
12 Quesnel.

13 That was Slide 9?

14 MR. BERNAUER: Yes. Slide 9 on --

15 MR. QUESNEL: Yeah.

16 MR. BERNAUER: -- page 5.

17 MR. QUESNEL: Okay. Yeah. Primarily that's
18 based on our experience working with the shipping
19 company and just with the -- dealing with the last ten
20 years shipping to Meadowbank, so just based on that
21 feedback and the experience of the shipping company and
22 the feedback to us and based on their performance on
23 those shipping routes and also recently including
24 shipping to Rankin Inlet to -- for the Meliadine
25 project.

26 MR. BERNAUER: Thank you. I'm not sure that

1 quite addressed my question. Do you have a specific
2 significance threshold to define what would be a
3 significant impact on traditional use of marine
4 mammals? Or are you -- like, generally, there's a
5 significance threshold involved in these
6 determinations, from my understanding.

7 MR. QUESNEL: Thank you, Madam Chair. We'd
8 like to get back to the Baker Lake Hunter/Trapper
9 Organization on that item. We would just have to talk
10 to the shipping company regarding that.

11 MR. BERNAUER: Thank you. Okay.

12 Moving on, then. My next question: According to
13 your research, has the community observed changes in
14 marine mammals because of increased shipping associated
15 with the Meadowbank mine? In particular, have Baker
16 Lake, Chesterfield Inlet, or Coral Harbour Inuit
17 observed impacts on marine mammals?

18 MS. LECLAIR: Good evening, Madam Chair,
19 members of the Board. Suzanne Leclair, Agnico Eagle.

20 We've had a number of community meetings with the
21 Hamlet of Chesterfield. Chesterfield does recognize
22 that there is an appearance of reduced impacts.
23 They're not 100 percent certain it is climate change
24 related or shipping related, so, of course, they're
25 interested in further studies, and that has been our
26 information.

1 MR. BERNAUER: Thank you. I appreciate that
2 response. To follow up, then, have further studies
3 been commissioned, or are they in the planning stages?

4 MS. LECLAIR: We are re-attending
5 Chesterfield Inlet in -- on October 24th to investigate
6 various opportunities.

7 MR. BERNAUER: Thank you. I appreciate that.

8 My last question deals with socioeconomic impacts.
9 So I'm on Slide Number 5, page number 3 of your human
10 environment and socioeconomics presentation which
11 discusses impacts on traditional land use, and it
12 focuses on direct impacts of the project infrastructure
13 on Inuit use of the land. Did you also assess indirect
14 impacts due to changes in the distribution of caribou
15 and marine mammals?

16 MS. LECLAIR: I'm not sure I understand. Is
17 there -- I'm not sure I understood the question.

18 MR. BERNAUER: I apologize. I'll clarify.
19 In this slide, you discuss -- it seems to focus on how
20 the project might directly impact Inuit land use by
21 taking up land that Inuit previously used. In your
22 socioeconomic impact analyses, did you also assess the
23 indirect impacts that your project might have on
24 traditional activities, for example, due to changes in
25 the distribution of caribou or marine mammals?
26 Thank you.

1 MS. LECLAIR: This is Suzanne Leclair with
2 Agnico Eagle, Madam Chair.

3 This is -- this area has not been noted as an area
4 with active traditional land use at the moment, and I
5 have no indication in our -- I have no indication that
6 the project will -- is expected to interact -- or to
7 impact on traditional land-use activities.

8 MR. BERNAUER: So you didn't -- I'll just
9 leave it at that. No further questions. Thank you.

10 THE CHAIR: Yeah. I'm still puzzled at --
11 I didn't get at all when they replied that they were
12 going to talk to a shipping company about what? I'm
13 sorry. I missed something. I totally didn't get that.
14 Can you please repeat that, something about a shipping
15 company.

16 MR. QUESNEL: Thank you, Madam Chair. Yeah.
17 That's -- that was a mistake by myself. I meant to say
18 we have to identify the significant threshold, and
19 we're just evaluating -- looking at that right now in
20 the FEIS so we can report back on what the definition
21 of that is. So the change would be we will not be
22 talking to the shipping company -- that's a mistake by
23 myself -- but we're going to be looking at the FEIS,
24 the final impact -- environment impact statement
25 regarding the threshold definition, so we're just
26 reviewing that right now.

1 THE CHAIR: Thank you.

2 Government of Nunavut.

3 MR. PINKSEN: Thank you. Steve Pinksen,
4 Government of Nunavut. We have no questions on this
5 group of presentations.

6 THE CHAIR: Thank you.

7 Any question from Environment and Climate Change
8 Canada?

9 MS. PINTO: Thank you, Madam Chair.
10 Melissa Pinto with Environment and Climate Change
11 Canada. We have no questions at this time.

12 THE CHAIR: Fisheries and Oceans Canada?

13 MR. D'AGUIAR: Thank you, Madam Chair.
14 Mark D'Aguiar, Fisheries and Oceans Canada. We have no
15 questions.

16 THE CHAIR: Indigenous and Northern
17 Affairs?

18 Indigenous and Northern Affairs Canada Questions
19 Agnico Eagle Mines Limited

20 MS. COSTELLO: Thank you, Madam Chair. Karen
21 Costello for Indigenous and Northern Affairs Canada.

22 I just have a couple of questions, kind of, of --
23 more of clarification. It is in your Slide 23 of your
24 management plans and monitoring programs where you are
25 speaking to your quality assurance and quality control
26 program. In your bullet related to "geochemistry

1 samples of waste rocks", you refer to sampling every
2 4th drill hole for acid rock drainage and every
3 16th hole for metal-leaching. You've specified three
4 lithologies. And considering the different -- the
5 various lithologies have different geochemical
6 characteristics, I'm looking for some clarification if
7 your sampling program will pay special attention to
8 those lithologies with a higher potential for
9 metal-leaching or acid rock drainage, or is it strictly
10 an arbitrary one every 4th hole and one every
11 16th hole?

12 Thank you, Madam Chair.

13 MS. BERTRAND: Madam Chair, Valerie Bertrand
14 for Agnico Eagle. Yes. Slide 23 refers to right now
15 what's happening at Meadowbank. And, yes, for
16 Whale Tail, it will be adapted to Whale Tail, and there
17 will be special provision for sampling the -- for
18 example, the ultramafic rock that's there. Those
19 specifications will be included in a revision to the
20 mine waste management plan, and that will focus on the
21 management plan for waste-rock facility and the
22 monitoring plan. They all will be updated as part of
23 the Nunavut Impact Review Board. It's a commitment
24 that Agnico has made to update these management plans
25 with specific information on what in particular will be
26 sampled and the frequency of sampling, and there's --

1 it's expected that the ultramafic rock and the cover
2 material, for example, will be sampled, and -- and
3 these.

4 So this slide referred to -- specifically to the
5 Meadowbank plan. It will be something like this. Hope
6 this answers your question.

7 MS. COSTELLO: Thank you, Madam Chair.

8 And thank you to Agnico Eagle for that
9 clarification. That is appreciated.

10 Next comment has to do with the other bullet on
11 that slide that spoke to "monthly site-wide water
12 quality data collection by technicians following
13 rigorous quality assurance and quality control
14 programs". I just wanted to make a statement for the
15 Board, is that the inspectors from Indigenous and
16 Northern Affairs Canada do not, as a matter of course,
17 do monthly site-wide water quality monitoring. When
18 they go to site, they will take some samples, but it is
19 not -- it is related to their inspection role for
20 compliance with the water licence. It's not a part of
21 any monitoring program that is the responsibility of
22 the proponent. Thank you, Madam Chair.

23 THE CHAIR: Thank you. Any questions from
24 Natural Resources Canada?

25 MS. BESNER: Rachelle Besner, Natural
26 Resources Canada. I don't have any questions.

1 THE CHAIR: Transport Canada?

2 Transport Canada Questions Agnico Eagle Mines Limited

3 MR. SADOWAY: Thank you, Madam Chair. Shane

4 Sadoway from Transport Canada, marine safety.

5 Just a question related to your marine
6 environment. Slide 5 talks, under the mitigation,
7 about modification to ships' lighting. I just wanted
8 clarification if that was deck and working lights
9 versus navigation lights.

10 MR. QUESNEL: Thank you, Madam Chair.

11 Deck and working lights, is that the question?

12 MR. SADOWAY: Yeah. If you were talking
13 about modifying the lighting as in the working lights
14 on deck -- any lights that you would have while you're
15 out doing operations, lightering ship to ship, moving
16 stuff from ship to shore -- versus the navigation
17 lights, which are what identifies a ship and its
18 movements when you're underway.

19 MR. QUESNEL: Yeah. That's my
20 understanding; it's for both. I would have to confirm
21 with the shipping company on -- if it's both, but
22 that's my understanding. So I can get back to you on
23 those details, but there was a modification completed
24 on those.

25 MR. SADOWAY: Thank you very much.

26 THE CHAIR: That's okay? Thank you.

1 Questions from the Nunavut Impact Review Board
2 staff?

3 Nunavut Impact Review Board Staff Questions

4 Agnico Eagle Mines Limited

5 MR. BARRY: Thank you, Madam Chair. Ryan
6 Barry, Nunavut Impact Review Board staff. We do have
7 just a few quick questions related to that grouping of
8 presentations.

9 The first question actually goes back to earlier
10 presentations, just a point for clarification. Can you
11 explain the factors contributing to your confidence in
12 the current planned fleet of ore trucks being
13 sufficient to meet the desired number of
14 transits-for-ore transport on the proposed haul road
15 per year? Specifically have your protections taken
16 into account lessons learned from other Nunavut and
17 northern mining operations where plans to truck ore
18 significant distances 24 hours a day, seven days a
19 week, have met with significant challenges with
20 management of the truck fleet and maintenance of road
21 quality?

22 MR. QUESNEL: Thank you, Madam Chair.

23 Yeah. The operational team and the team reviewing
24 the -- the head -- the long haulers -- the heavy
25 haulers spoke to Baffinland based on their experiences,
26 lessons learned, some of the challenges that they had.

1 And the -- the team that's involved with that review
2 for the Whale Tail Pit Project are still in
3 conversations with Baffinland just to understand some
4 of the additional lessons learned and the
5 implementation of that aspect of the project. And part
6 of that is related to a pilot study that's going to be
7 occurring on the road, just to understand some of the
8 challenges and some of the -- some of the mitigation
9 aspects related to the long haul from Whale Tail to
10 Meadowbank. So that's one example.

11 MR. BARRY: Thank you, Madam Chair. Ryan
12 Barry, Nunavut Impact Review Board staff.

13 Thank you very much. I appreciate that response.
14 This next question relates to Slide 6 of your marine
15 environment presentation regarding accidental spills of
16 fuel. Specifically the statement: (as read)

17 The likelihood is considered low, unlikely,
18 for both minor and major scenarios provided
19 prescribed industry standard prevention and
20 response measures are in place.

21 So recognizing that major spill incidents have occurred
22 during delivery of fuel in Baker Lake associated with
23 the Meadowbank project and also in Rankin Inlet
24 associated with the Meliadine project, can you clarify
25 how you've come to characterize this risk as unlikely?

26 MR. QUESNEL: Yeah. Thank you, Madam Chair.

1 Based on the -- this is related to marine
2 transportation and transfer from the primary ship to
3 the fuel farm at Meadowbank. The spills -- so for that
4 activity related to marine transportation, we still
5 feel it's low; it's unlikely. The other spills you
6 refer to were on land, unfortunately, at Meliadine and
7 also at Baker Lake. But dealing with this one here --
8 okay. Maybe you can clarify which one you're talking
9 about.

10 MR. BARRY: Thank you, Madam Chair. Ryan
11 Barry, Nunavut Impact Review Board staff.

12 Just to clarify, the spill we're referring to at
13 Meliadine was in the marine environment during
14 refueling. I just meant the -- the transfer hose being
15 run over in that incident. Perhaps I'm missing
16 something, or maybe I'm confusing that with ...

17 MR. QUESNEL: Can you just clarify again.
18 Sorry.

19 MR. BARRY: Sorry, Madam Chair. Ryan
20 Barry, Nunavut Impact Review Board staff.

21 So the incident we were referring to at the --
22 associated with the Meliadine project was in the marine
23 environment during ship-to-shore transfer where a
24 private citizen, recreational boat, ran over the
25 transfer hose, and a spill incident occurred.

26 MR. QUESNEL: Okay. I'm not aware. I would

1 have to talk to the team on that and get back to you on
2 that one; okay?

3 MR. BARRY: Thank you, Madam Chair. I'll
4 move on to the final question. Again, Ryan Barry,
5 Nunavut Impact Review Board staff.

6 So this is, again, a -- just meant to be a --
7 looking for a straightforward answer for a -- kind of a
8 broad question. Can you clarify how the timing for
9 this project's proposed operations and closure relates
10 to the plant operations at the Meliadine Gold Mine?
11 And more specifically, can you explain how employees
12 from the Meadowbank and Whale Tail Pit Project might
13 transition to operations at Meliadine and where that
14 fits in the planned timeline for the development of the
15 Meliadine Gold Mine? So we're -- we're kind of getting
16 confused with the timing of this versus the stages at
17 Meadowbank.

18 MS. MAYRAND: Krystel Mayrand for
19 Agnico Eagle. Just -- I just want to clarify the
20 question. The question is around how we are going to
21 transfer people from Meadowbank to Whale Tail?

22 MR. BARRY: Thank you, Madam Chair. Ryan
23 Barry, Nunavut Impact Review Board staff.

24 Yes. But more specifically the timing and where
25 it fits in the -- the development timeline for
26 Meliadine versus development timelines for Meadowbank

1 and Whale Tail Pit. When would that transfer occur?
2 It wasn't clear from some of the slides used in your
3 introductory presentation, and we're looking back to
4 some of the information provided during the Vault pit
5 expansion assessment as well and trying to clarify.

6 THE CHAIR: Excuse me. Transferring from
7 Meadowbank to Meliadine to Whale Pit?

8 MR. BARRY: Thank you, Madam Chair. Ryan
9 Barry, Nunavut Impact Review Board staff.

10 Yes. Sorry for the confusion. So we're trying to
11 understand the timing of when would jobs no longer be
12 available at Meadowbank, and then at Whale Tail Pit,
13 when those projects conclude, and if those jobs would
14 then be available and open at Meliadine and -- for
15 employees to transfer into. And so we're looking for a
16 clarification in where the development timeline for
17 Meliadine fits against the Whale Tail Pit Project
18 because it wasn't really discussed in the introductory
19 presentations.

20 MS. MAYRAND: Thank you for the
21 clarification. Krystel Mayrand for Agnico Eagle.

22 So your questions relates to a few points that I
23 would like to clarify. So first we are anticipating a
24 gap of -- operational gap that will last -- that will
25 be limited to only a few months between the end of
26 operation of the Meadowbank mine scheduled for the end

1 of the third quarter 2018 and the beginning of 2019.
2 This gap will most likely happen and will be limited
3 also to a few specific position mainly related to the
4 mill operation. So we're talking about 10 percent of
5 the current workforce that could be impacted by this
6 gap.

7 However, we already have measures that we've
8 developed to secure full-time jobs and pay for the
9 employees, so the impacts should be very limited, or
10 there should not be any impacts. One of these measures
11 is to use these employees to help support construction
12 works for the Whale Tail. So that's -- that's one
13 example. So that -- that's for the gap.

14 In term of transfers from Meadowbank to
15 Whale Tail, Whale Tail will be treated as the extension
16 of Meadowbank. So employees will be automatically -- I
17 mean, their employment will automatically be maintained
18 with Whale Tail, so they won't be laid off or anything
19 like that because they will be employees of the same
20 division. So the transition will be gradual. We
21 actually have employees who will, with the -- the
22 proper approval, start transitioning with the Whale
23 Tail Project to support operation and earthwork
24 eventually, and -- and that will continue as -- as the
25 needs arrive for Whale Tail.

26 In term of Meliadine, Meliadine is a

1 projects [sic] under construction right now. Hiring
2 have started, and as per our internal policy, we are
3 opening the doors for employees to transfer in the case
4 they would like to join this project because they live
5 closer to the project or because they'd like to
6 transition toward underground operation. This is
7 already made available at this time, and we call that a
8 "transfer window". There's already one transfer window
9 completed where there's about ten employees of
10 Meadowbank that were granted transfers to Meliadine,
11 and this will be continued over the next 18 months,
12 where about 150 new opportunities for Meliadine will be
13 made available first to our employees of Meadowbank.

14 MR. BARRY: Thank you, Madam Chair. Ryan
15 Barry, Nunavut Impact Review Board staff.

16 Thank you. That is helpful. And maybe just the
17 final follow-up, as my phrasing of questions isn't very
18 good tonight. I'll try to be very direct. The 150 new
19 positions related to ore transport that would be
20 created through the Whale Tail Pit Project, when the
21 Whale Tail Pit concludes, would those positions have
22 any potential to transfer to Meliadine, and what would
23 the timing of that be in the Meliadine development
24 schedule?

25 MS. MAYRAND: Krystel Mayrand for
26 Agnico Eagle. These positions will be directly linked

1 to operational, but in consideration of the timing of
2 the project and the longer life of mine of Meliadine,
3 yes, these people -- these additional employees and
4 also all of the employees currently in place at
5 Meadowbank, we'll put in our best-effort measures in
6 place to transfer them over to Meliadine at the end of
7 the life of mine of Whale Tail.

8 Does that answer the question?

9 THE CHAIR: Thank you.

10 Any questions from the Nunavut Water Board?
11 Nunavut Water Board Questions Agnico Eagle Mines
12 Limited

13 MR. KHARATYAN: Thank you, Madam Chair.
14 Just -- Karen Kharatyan, Water Board. Just one
15 clarification and maybe question.

16 It was indicated today that post-closure of mine
17 will go beyond or sometime until 2040 -- or 45, 46;
18 yes?

19 MR. QUESNEL: Thank you, Madam Chair.
20 Post-closure stage, that phase, yeah, 2030 to 2046.
21 Four, six.

22 MR. KHARATYAN: Madam Chair, one follow-up
23 question. Karen Kharatyan, Nunavut Water Board.

24 We know that maybe not high probability, but there
25 is a probability that a treatment will be needed for
26 waste-rock storage facility runoff or contact water or

1 water accumulated in the pond before being discharged
2 into environment at the post-closure phase. Even --
3 this is not the preferred option or approach for
4 regulators for a company maybe; however, that means
5 that, if needed, until -- or for entire post-closure
6 phase, this waste-rock storage contact will be treated.

7 MR. VANENGEN: Ryan Vanengen from
8 Agnico Eagle. So the reference to the water treatment
9 into post-closure is a kind of contingency. As
10 explained from the slides, especially those slides
11 presented by Erika, we're -- our business is very good
12 at segregating and determining where rock needs to go.
13 And what we -- what we'll do right from the start of
14 the project is make sure that our waste-rock pile does
15 not seep and that we're controlling the acid rock
16 drainage and metal-leaching right from the start of
17 that project; therefore, we'll be able to monitor in
18 that sump. And based on our experience at Meadowbank,
19 the water quality, through controls of -- of managing
20 our waste rock to the waste-rock pile -- through those
21 controls, we'll be able to ensure that the water
22 quality in the sump is -- is good enough, and we'll
23 make sure that we'll continue to monitor that so that
24 during closure, we aren't treating in perpetuity.
25 Thank you.

26 MR. KHARATYAN: Thank you. No more question.

1 THE CHAIR: Thank you.

2 Any questions from the Nunavut Impact Review
3 Board? Allen.

4 Nunavut Impact Review Board Questions Agnico Eagle
5 Mines Limited

6 MR. MAGHAGAK: Quanqutit, Iksivautaq, Allen
7 Maghagak.

8 I have two questions, just to get clarification,
9 with respect to the socioeconomic. Just for
10 clarification, the question that our Impact Review
11 staff had asked about the employees that are working at
12 Meadowbank, where you say that internal hiring for --
13 for Meliadine -- and let's say that the employees -- or
14 the Inuit employee who is in training at Meadowbank,
15 should the -- or when the Meadowbank stops its
16 operation, would those employee -- Inuit employees who
17 were in training at Meadowbank so that they can
18 continue to train as your full-time employees -- would
19 they also be able to be transferred to Meliadine?

20 Quanqutit, Iksivautaq.

21 MS. MAYRAND: Krystel Mayrand for
22 Agnico Eagle.

23 It is effectively our intention to maximize
24 opportunities for every Inuit employee, when the
25 Meadowbank and Whale Tail life of mine is reached, to
26 offer transfers to Meliadine. It -- that includes --

1 that includes, also, employees will be under a training
2 program, for example, apprentices who are under a trade
3 program. Of course, that will have to respect, also,
4 workforce needs at Meliadine, but the goal is to align
5 workforce needs between Meliadine and Whale Tail so we
6 can accommodate as many transfers as possible at the
7 end of the life of mine of Whale Tail.

8 One -- one aspect, also, to mention is that the
9 Meliadine project also includes an open-pit component
10 which will start around 2022, which also will bring
11 many new opportunities for people from Meadowbank to --
12 to transfer to Meliadine, as the mass of workers of
13 Meadowbank/Whale Tail is heavy-equipment operator,
14 which will be needed at Meliadine about at the same
15 time that the Whale Tail Project will hand this -- will
16 start at Meliadine. So the timing aligns very well on
17 this.

18 MR. MAGHAGAK: Quana, Madam Chair. Allen
19 Maghagak of the late (OTHER LANGUAGE SPOKEN). On
20 the -- Madam Chair.

21 On the socioeconomic section on one of your
22 slides, you mention that Inuit preferential contracting
23 process. Can I get a clarification on whether you have
24 a percentage on the various Inuit bids and other
25 bids -- let's say, outside Nunavut contractor bids?

26 Do you have a percentage, also, on the -- on the

1 amount -- a percentage that you may have within
2 yourselves -- the contract bidding system for Inuit
3 contractors versus, let's say, outside Inuit
4 contractors? Do you have a percentage there that is
5 your ceiling?

6 Quanqutit, Iksivautaq.

7 MS. LECLAIR: Madam Chair.

8 Thank you for the question. On the business
9 opportunity, there is -- at the moment right now, we
10 can safely say that there are -- 56 percent of
11 Meadowbank's total procurement is generated from the
12 north, so northern business in Nunavut and Northwest
13 Territory. There's no ceiling. There -- the
14 expectation is to have the majority, and we're striving
15 to have increased capacity building so that we can
16 increase the procurement and service and supply up in
17 the Kivalliq Inuit Association -- specifically in the
18 Kivalliq Inuit Association Region, but that will take
19 some capacity training and education on certain types
20 of job.

21 But as we're moving towards that, in order to
22 level the playing field -- and at this point, it's to
23 level the playing field. There's no set percentage, to
24 answer your question, but there are some points that
25 gives a head-start to local business to benefit from
26 added competitive advantage over southern-base

1 business.

2 So the procurement process under the Inuit Impact
3 Benefit Agreement for Whale Tail specifically provides
4 for a process where the services actually perform up
5 north -- or delivered up -- the work -- or the -- the
6 work is done -- performed up north. There is an
7 advantage to being an Inuit-owned business -- with a
8 registered Inuit-owned business.

9 THE CHAIR: Thank you.

10 Guy.

11 MR. ALIKUT: Thank you, Madam Chair. Guy
12 Alikut from the Nunavut Impact Review Board.

13 Allen's questions that he asked, the two
14 questions, I wanted to touch on them with respect to
15 training; however, the three of them -- the training
16 that you mentioned early with money management, how
17 would that benefit for people in school who are being
18 trained? It's okay, however, when you use the time --
19 you have to use the time -- what -- what's the
20 program with the money management? Did it have any
21 benefits to the people that took that course, and is it
22 still running?

23 MS. LECLAIR: Madam Chair.

24 The financial literacy program that you referred
25 to was a program that -- the community of Baker Lake
26 decided that was a priority. So as you noted, it was

1 delivered this year at both the high school in Baker
2 Lake, at Meadowbank, and in the Baker Lake community.
3 It was -- we were told it was a success. We should
4 have done a survey to see how it was well received, but
5 the information we received from the community is they
6 would like to have more of these financial literacy
7 training, which we are committed to do in the future as
8 well. I hope that answers your question.

9 MR. ALIKUT: Thank you. It's
10 understandable.

11 Next question: It's related to -- for Meadowbank
12 and Meliadine, the companies that you have, the French
13 companies. There are a lot of French speakers in those
14 two areas, and when we hear that Inuit aren't supposed
15 to use their language even -- because there's a safety
16 issue, I know people -- the Inuit are complaining as
17 well that the -- the workers that are speaking in
18 French, they -- they continue to speak French when the
19 Inuit cannot understand them, but when they speak in
20 English, they understand each other better.

21 For you [sic] leadership, do you hear this type of
22 complaint about the use of language on the -- in the
23 workplace?

24 MS. MAYRAND: Krystel Mayrand for
25 Agnico Eagle Mines. We effectively recognize that this
26 is one challenge that we have to deal with at both our

1 operations, and this is a challenge and an issue for
2 employees that we are taking very seriously. We have
3 changed, over the last years, our process, hiring
4 process, to be more -- I would use -- severe or
5 diligent in term of the testing that we use pre-hiring
6 to ensure that English levels required are met. And on
7 this, we had work with the Kivalliq Inuit Association
8 to identify the proper English level for our sites in
9 order to have, one, a safe work environment and, two, a
10 respectful work environment, as well, for all
11 employees. So we believe that this has improved a lot.

12 And we also have changed labour pools where we
13 recruit, and we're targeting English-speaking labour
14 pools now for our own recruitment. Where it becomes
15 more challenging is with the different contractors that
16 we are using, especially during construction, because
17 these contractors come from various specialties in
18 environment, and it's more difficult to control the
19 employees that they will recruit to perform very
20 specialized work. However, we are implementing similar
21 measures as we do for our employees with our permanent
22 contractors where we will rent manpower on a more
23 regular basis. We are also implementing measures with
24 them to be -- to meet the level that is expected in
25 term of English.

26 So, yes, this is a challenge, continuous

1 challenge, but it's really taken seriously by our
2 organization, and we are engaging our management at
3 every level to lead by example and to promote the use
4 of English at all time at the worksites. And this is
5 continuous efforts being done.

6 MR. ALIKUT: Thank you. It's clear, but we
7 would like to support them because it is -- just
8 without -- not -- don't just say it because it -- it's
9 a problem that we heard from the very beginning of when
10 Meadowbank opened. The -- and it -- it creates
11 problems in the workplace when the staff are working
12 and they're hearing these types of things. It's
13 understandable.

14 And my final question: The small businesses --
15 and you said you break down the project so that smaller
16 companies can apply for contracts. What kind of
17 communications do you use? Do you use local radio,
18 newspaper, TV?

19 For example, in Arviat, they don't inform our
20 youth about the opportunities that they have. Our
21 youth have to be aware of what the opportunities are.
22 Maybe they would have tried maybe through social media.
23 All the youth go through Facebook. They hear -- they'd
24 be able to be informed in one day. If -- if my
25 daughter could go on Facebook, you could do the same
26 thing. You say you're helping the youth; however, the

1 older companies that are given contracts -- the new
2 businesses for the youth -- they would like to try for
3 some of these opportunities. It just seems like
4 they're not talking to us -- youth when they're talking
5 about these opportunities when they've been talking
6 about it for the while. Those are my comments that I
7 wanted to impart.

8 Thank you, Madam Chair.

9 THE CHAIR: Thank you.

10 Kaviq.

11 MS. KALURAQ: Mat'na, Iksivautaq. Kaviq
12 Kaluraq, Nunavut Impact Review Board -- (LOST
13 TRANSLATION) for the community roundtable for
14 Agnico Eagle, Kivalliq Inuit Association, and
15 Government of Nunavut. Can you elaborate on what you
16 have done to date to have your training programs that
17 are non-accredited recognized as accredited programs?
18 Because earlier when -- at the start of the hearing,
19 you talked about some programs where they can receive a
20 Red Seal, whereas other programs where they don't
21 receive any certification. So if you can elaborate on
22 what work you have done to date and what your plans are
23 for your next steps in making those accredited programs
24 during the community roundtable.

25 Mat'na.

26 MS. MAYRAND: Krystel Mayrand for

1 Agnico Eagle. So to date, we have had various meetings
2 with representative of the Government of Nunavut in
3 this section around different initiatives, including
4 this one. In the last two years, the priority that
5 were identified with the Government of Nunavut was more
6 around apprenticeship, expanding the apprenticeships
7 program, the accessibility of these programs locally,
8 as well as all of the pre-trades initiatives; and our
9 next priorities will be looking at developing
10 certification for the in-house programs that meet
11 mining standards but are not officially recognized yet.

12 So there were discussions and meetings. That was
13 identified as one project we wanted to tackle together
14 but not identified as a -- Priority Number 1 in the
15 last two years. So our next step will be to meet again
16 with the Government of Nunavut. There are new
17 priorities that we will want to tackle together, and I
18 would see this becoming a project for next year between
19 ourselves and themselves. But, of course, we'll need
20 their input as well because that will also request
21 some -- some work on their side as well. So I cannot
22 talk for them, but that's -- certainly will become a
23 priority for Agnico Eagle, to have these certification
24 being put in place.

25 THE CHAIR: Any other questions from the
26 Board? No.

1 Thank you, Agnico Eagle Mines.

2 It is now a minute after 9. We were going to go
3 into the Kivalliq Inuit Association presentation, but
4 we'll do that tomorrow morning. So tomorrow morning
5 Item Number 2 is technical presentations from
6 registered intervenors, and we will be starting with
7 the Kivalliq Inuit Association 9:00 tomorrow.

8 What's that?

9 MR. BARRY: Thank you, Madam Chair. Ryan
10 Barry, Nunavut Impact Review Board staff. Just to
11 clarify, Madam Chair, there is still one remaining
12 presentation to be delivered by Agnico Eagle with
13 regards to their exception application, Item Number 5,
14 just before we get into the presentation from the
15 Kivalliq Inuit Association tomorrow.

16 THE CHAIR: Okay. Yeah, that's -- that's
17 the short presentation.

18 Okay. We'll start with you in the morning and
19 then with the Kivalliq Inuit Association. Good.

20 _____
21 PROCEEDINGS ADJOURNED UNTIL 9:00 AM, SEPTEMBER 21, 2017

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1 CERTIFICATE OF TRANSCRIPT:

2

3 We, Sara Anderson and Elizabeth Royal, certify
4 that the foregoing pages are a complete and accurate
5 transcript of the proceedings, taken down by us in
6 shorthand and transcribed from our shorthand notes to
7 the best of our skill and ability.

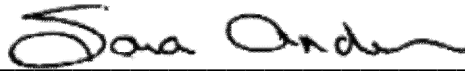
8 Dated at the City of Calgary, Province of Alberta,
9 this 11th day of October 2017.

10

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12

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14 Sara Anderson, CSR(A)


15 Official Court Reporter

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20 Elizabeth Royal, CSR(A)

21 Official Court Reporter

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