## **Ottawa Light Rail Commission**

Manuel Rivaya on Monday, April 25, 2022



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6	OTTAWA LIGHT RAIL COMMISSION
7	OLRTC/RTM - MANUEL RIVAYA
8	APRIL 25, 2022
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15	Held via Zoom Videoconferencing, with all
16	participants attending remotely, on the 25th day of
17	April, 2022, 9:00 a.m. to 12:00 p.m.
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1	COMMISSION COUNSEL:
2	Christine Mainville, Co-Lead Counsel Member
3	Anthony Imbesi, Litigation Counsel Member
4	
5	PARTICIPANTS:
6	Manuel Rivaya: OLRTC/RTM
7	Jean-Claude Killey: Paliare Roland Rosenberg
8	Rothstein LLP
9	
10	Also Present:
11	Deana Santedicola, Stenographer/Transcriptionist
12	Elizabeth Deasy, Virtual Technician
13	
14	
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2	INDEX OF EXHIBITS
3	NO. DESCRIPTION PAGE/LINE NO.
4	1 Curriculum Vitae of
5	Manuel Rivaya 10/16
6	
7	
8	
9	
10	* * The following is a list of documents undertaken
11	to be produced, items to be followed up on, or
12	questions refused * *
13	
14	
15	INDEX OF UNDERTAKINGS
16	
17	The documents to be produced are noted by U/T and
18	appear on the following page/line: 24:24
19	
20	
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1 -- Upon commencing at 9:00 a.m. 2. 3 MANUEL RIVAYA; AFFIRMED. 4 CHRISTINE MAINVILLE: So, Mr. Rivaya, 5 the purpose of today's interview is to obtain your 6 evidence under oath or solemn declaration for use 7 at the Commission's public hearings. 8 This will be a collaborative interview 9 such that my co-counsel, Mr. Imbesi, may intervene 10 to ask certain questions, and if time permits, your 11 Counsel may ask follow-up questions at the end of 12 the interview. 13 The interview is being transcribed, and 14 the Commission intends to enter the transcript into 15 evidence at the Commission's public hearings, 16 either at the hearings or by way of procedural 17 order before the hearings commence. 18 The transcript will be posted to the 19 Commission's public website, along with any 20 corrections made to it, after it is entered into 21 evidence. 22 The transcript, along with any 23 corrections later made to it, will be shared with 24 the Commission's participants and their Counsel on

a confidential basis before being entered into

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evidence.

You'll be given the opportunity to review your transcript and correct any typos or other errors before the transcript is shared with participants or entered into evidence.

Any non-typographical corrections made will be appended to the transcript.

And finally, pursuant to section 33(6) of the Public Inquiries Act (2009), a witness at an inquiry shall be deemed to have objected to answer any question asked of him or her upon the ground that his or her answer may tend to incriminate the witness or may tend to establish his or her liability to civil proceedings at the instance of the Crown or of any person, and no answer given by a witness at an inquiry shall be used or be receivable in evidence against him or her in any trial or other proceedings against him or her thereafter taking place other than a prosecution for perjury in giving such evidence, and as required by section 33(7) of the Act, you are advised that you have the right to object to answer any question under Section 5 of the Canada Evidence Act.

So if that works, we'll get right into

1 it. 2. MANUEL RIVAYA: Okay, good, that works. 3 CHRISTINE MAINVILLE: Thank you. So I 4 would first like to ask you to describe your 5 involvement in Stage 1 of Ottawa's LRT project. 6 MANUEL RIVAYA: So I was -- at the 7 time, I was Executive Vice President of Dragados, 8 so -- for Eastern Canada, so the Ottawa project was 9 part of my portfolio. 10 So I participated in all the stages 11 from the discussions to partner with other 12 companies, pre-qualification, RFP, and then 13 execution of the project until I left Dragados 14 in -- it was actually in January 2019. 15 CHRISTINE MAINVILLE: Okay, and so am I 16 right that once the Project Agreement was entered 17 into, you were on the Executive Committee for 18 OLRTC? 19 MANUEL RIVAYA: Yes, I was, yes. 20 CHRISTINE MAINVILLE: And so is 21 that -- so we'll talk about the procurement phase, 22 and you have referenced the RFP and other aspects 23 of that, of the project, but in terms of when 24 construction was happening, was your role limited 25 to being on the Executive Committee?

```
1
                MANUEL RIVAYA: Yes.
 2
                CHRISTINE MAINVILLE: So were you
 3
    always -- you were employed by -- well, you were
 4
    VP -- Executive VP of Dragados, but were you always
5
    involved in the project, the Ottawa OLRTC, for
6
    OLRTC?
7
                MANUEL RIVAYA: Yes, I was involved for
   OLRTC, yes.
8
9
                CHRISTINE MAINVILLE: Okay, never as
10
   part of RTG, for instance, or other entity?
11
                MANUEL RIVAYA: No, never, no.
12
                CHRISTINE MAINVILLE: And so could you
13
    tell us -- and we'll bring up your resumé.
14
    you for providing that. Could you tell us a bit
    about your background and experience in rail in
15
16
    particular.
17
                MANUEL RIVAYA:
                                Yes, so I'm a civil
18
    engineer by training by the University of Spain.
19
                I started in -- I started to work in
20
   Dragados in 1997. I was in several projects in
21
    different roles, quality, execution, project
22
    manager, and then I became responsible for the area
23
    of -- for civil works in Catalonia, and in
24
   particular, I had under my responsibility some rail
25
   projects.
```

And then I came to Canada in 2010 as Executive Vice President for Eastern Canada, and really, I mean, I have been basically an executive since 2006 when I was appointed in Barcelona the Civil Works Manager, but I have been involved in rail projects as executive -- being part of executive committees or with some responsibility underneath me since that time.

CHRISTINE MAINVILLE: And I see from your resumé you were involved, as you mention, in a lot of civil works projects. Could you talk about what, if any, transit, rail or light rail projects that you may have been involved in prior to the Ottawa LRT?

MANUEL RIVAYA: So I was Project

Manager in the refurbishment or -- I mean, it was a project in one of the main stations in Barcelona,

Sants Station, and as part of that project was the execution. We had to a lot of track works and some modification works, moving tracks around in that station.

And then when I became Area Manager in 2006 for Dragados, I had under my responsibility that project that had some track works. I had the refurbishment of track for Martorell/Olesa, that is

```
1
    a commuter rail in Catalonia. I had the Line 9
 2
    Subway Project in Barcelona as part of my portfolio
 3
           I had the high-speed link between Spain and
 4
    France as part of my portfolio. And I had the
5
    refurbishment of one also long distance line in the
 6
    north of Catalonia, Ripoll/Puitcerta.
                                            It was also
7
    the refurbishment of the track of that corridor.
8
                CHRISTINE MAINVILLE:
                                       So am I right to
9
    say these projects -- your involvement with respect
10
    to these projects mostly had to do with the
11
    infrastructure, the tracks, as opposed to, for
12
    instance, the rolling stock?
13
                MANUEL RIVAYA: Yes, yes.
                                            We -- I
14
    never was -- I never had any involvement with
15
    rolling stock in any of those projects.
16
                CHRISTINE MAINVILLE:
                                       Okav.
17
                MANUEL RIVAYA: In all of them, I
18
    was -- stayed for one year in Sants Station.
                                                   Т
19
    was -- I had a similar role to the one that I had
20
    in Ottawa as member of the Executive Committee,
21
   never directly involved in building the project --
22
                CHRISTINE MAINVILLE:
                                       Okav.
23
                MANUEL RIVAYA: -- building manager.
24
                CHRISTINE MAINVILLE:
                                       And you
25
    recognized the resumé that I have put up on the
```

1	screen as your own that you have provided?
2	MANUEL RIVAYA: Yes.
3	CHRISTINE MAINVILLE: And are the
4	contents accurate? They remain accurate?
5	MANUEL RIVAYA: Yes.
6	CHRISTINE MAINVILLE: And so today, you
7	work for AECON?
8	MANUEL RIVAYA: Yes.
9	CHRISTINE MAINVILLE: Okay, and they
10	are also a transportation engineering company?
11	MANUEL RIVAYA: It is AECON is a
12	contractor, a construction company. It is not an
13	engineering company.
14	CHRISTINE MAINVILLE: Okay. And so
15	we'll file this as Exhibit 1 to this interview.
16	EXHIBIT NO. 1: Curriculum Vitae
17	of Manuel Rivaya.
18	CHRISTINE MAINVILLE: And we can take
19	it down.
20	Could you tell us a bit about the
21	structure of the Executive Committee or how it was
22	structured and who its members were for OLRTC?
23	MANUEL RIVAYA: Yes, so we were three
24	partners, SNC, EllisDon and Dragados, and each one
25	of the partners had the right to appoint I don't

```
1
    remember if it was a member of Executive Committee
 2
    and an alternate or two members of the Executive
 3
    Committee, but basically in most of the -- in many
 4
    of the meetings we were two people representing
5
    each company.
 6
                So I -- and the names of the people
7
    changed with time, so I don't even remember
8
    everybody that was at some point part of the
9
    Executive Committee, but basically it was two
10
    people per company that met on a monthly basis with
11
    the Project Management Team.
12
                CHRISTINE MAINVILLE: And was there any
13
    division of responsibilities as between the three
14
               Did anyone --
    partners?
15
                MANUEL RIVAYA:
                                 Not really.
16
                CHRISTINE MAINVILLE:
                                       No? Okav.
17
                                              The --
                MANUEL RIVAYA: Not really.
18
                CHRISTINE MAINVILLE:
                                       Are there
19
    any -- sorry, go ahead.
20
                MANUEL RIVAYA: No, I was going to say
21
    the expertise that each partner was bringing was
22
    different, but at the end, we were fully
23
    integrated, so there was no division of
24
    responsibility.
25
                CHRISTINE MAINVILLE:
                                       And what,
```

1 generally speaking, are the different areas of 2 expertise as between Dragados, EllisDon and SNC? 3 So for this project, I MANUEL RIVAYA: 4 mean, very high level, Dragados brought expertise 5 on tunnelling works and general civil works; 6 EllisDon brought expertise in the buildings, 7 associated the buildings scope with the stations; 8 and SNC had a stronger focus on the systems side, 9 engineering and systems side of the project. 10 But we all -- I mean, we were fully 11 integrated. If there was someone from SNC or 12 EllisDon who had experience, previous experience in 13 any of the other subjects, they will participate in 14 that, in those discussions also. 15 And so it is fair CHRISTINE MAINVILLE: 16 to say the Executive Committee effectively had 17 oversight of the construction work? 18 MANUEL RIVAYA: Yes. 19 CHRISTINE MAINVILLE: And did your 20 involvement in the Ottawa LRT increase over time as 21 the project unfolded and as delays were 22 encountered, or did it always remain the same? 23 MANUEL RIVAYA: When in the last part 24 of the project we had challenges with the schedule 25 and other challenges, and we had more frequent

```
1
    follow-ups with the Project Team about schedule
 2
    performance and other issues, yes.
 3
                CHRISTINE MAINVILLE: So perhaps we can
 4
    go back to the procurement and the outset of this
5
    project. Were you part of industry consultations
6
    by the City about the LRT?
7
                MANUEL RIVAYA:
                                 I don't -- I remember
8
    that I was in a meeting with the City about the
9
   project, so I would say yes, we were part of the
10
    industry consultations, yeah.
11
                CHRISTINE MAINVILLE: And do you recall
12
    at that time, you know, what you were told about
13
    what the City's needs and requirements were
14
    primarily?
15
                MANUEL RIVAYA: No, I don't remember.
16
                CHRISTINE MAINVILLE:
                                       Okav.
                                              Do you
17
    recall any discussion around the rolling stock in
18
    particular and what the City was hoping to get or
19
    achieve?
20
                MANUEL RIVAYA: Yeah, as part of
21
    industry consultations, I don't -- I think what I
22
    remember about the industry, the meeting that I had
23
    is more focussed on the tunnelling, on the
24
    tunnelling works, than on the rolling stock and
25
    others.
```

1 CHRISTINE MAINVILLE: Okay. And what 2 about as the procurement is actually underway, are 3 you able to speak to ultimately the selection of 4 Alstom and Thales and how that came about in terms 5 of the --6 MANUEL RIVAYA: I remember some things, 7 yes. 8 CHRISTINE MAINVILLE: Yes, so if you 9 could speak to that, please. 10 MANUEL RIVAYA: Okay, so for the 11 rolling stock, so the procurement process, the RFQ, 12 so the procurement process had two parts. First, 13 it was the RFO and then it was the RFP. 14 The RFO, it was intended to short-list 15 the proponents for the RFP, so it was -- it had on 16 the paper a broader reach than the RFP, more teams. 17 And there was -- specifically the RFQ 18 documents, the client did not expect the proponents 19 to engage with rolling stock suppliers at the RFQ 20 So we formed our team, and at the time, we 21 made the decision of not going with any rolling 22 stock supplier. 23 Then during the RFP, I don't remember 24 the details, but there was a process by which we 25 had a sub-team to select the rolling stock supplier

and that rolling stock supplier had to be approved by the client before submitting in order for the proposal to be compliant, before submitting the proposal.

And that approval involved meeting -demonstrating the rolling stock that the supplier
that we were proposing and the project that we were
proposing was compliant with certain requirements.

So when we started the RFQ, with the RFP process, we identified three rolling stock suppliers that we thought that were compliant -- sorry, we identified four rolling stock suppliers that we thought could be compliant with the requirements of the City. The four rolling stock suppliers were Bombardier, Alstom, Siemens and CAF, and then since Bombardier had an exclusive agreement with one of the proponents, we were left with Alstom, Siemens and CAF as the three, let's say, players for our proposal.

So we started our procurement process, explaining the project, asking for proposals, both technical and financial, from the three entities.

And very soon after we started this procurement process, Siemens reached an exclusive agreement with the third of the short-listed teams, with the

team -- I think it was Bouygues and PCL, and we were left with Alstom and CAF.

So we did receive proposals from them, both technical and financial, and initially we subjected to -- obviously to the demonstration to the client that the product that was being offered by CAF, who we selected at the time, was compliant with the requirements of the City, and it was approved by the City and IO as rolling stock supplier. We selected CAF as our let's say rolling stock supplier initially.

So we went through all the technical and compliance meetings with the City, and at some point -- I don't remember how -- how this was done, but the client -- and I am talking about the City, but it was -- at the time, it was the City and Infrastructure Ontario. I want to -- it is the contracting authority or -- I don't remember exactly how the contractor referred to the client, but it is the client.

So at the time we were -- the City or the client told us that the rolling stock of CAF did not meet all the requirements, and therefore, it will be deemed not compliant -- or our proposal could be deemed not compliant.

So we made a change to Alstom in order to guarantee a compliant proposal. We went through the same process with the City, and the City gave us the green light for the supplier of Alstom. So we finalized our proposal with Alstom as rolling stock supplier.

Regarding Thales, the process was similar. We started -- I mean, we started a procurement process during the RFP. It was not a requirement that I recall or I remember to have a signalling supplier engaged, but we identified that as being a need for us in order to do our design and to facilitate the integration with the rolling stock supplier.

So we went through a procurement process during the RFP. There were probably four or five rolling stock suppliers -- sorry, signalling suppliers that could meet -- could have the product that was needed in Ottawa. And basically it was a combination of financial capabilities, trust and confidence on the supplier, on Thales, and also the fact that they had past experience of the Thales signalling system with the rolling stock supplier that gave us the comfort that it was the right one.

24

25

1 CHRISTINE MAINVILLE: Okay, I have a 2 few questions following up on some of the points 3 you have made. 4 So first of all, why would you say that 5 CAF ended up being OLRTC's or RTG's first choice as 6 a vehicle provider? Effectively, why was it 7 selected above Alstom? 8 Basically, there was a MANUEL RIVAYA: 9 price difference, so we were in a competitive 10 environment. Again, we went through the technical 11 aspects of their proposal, and we thought that CAF 12 met the requirements. 13 I mean, at the time, my recollection is 14 that none of the rolling stock suppliers that we 15 had available met 100 percent of the requirements, 16 but they had several products with -- meeting 17 several different requirements, and we thought that 18 CAF could be accepted by the client as rolling 19 stock supplier. They had a compelling argument to 20 us, and we selected it, but we knew -- we 21 acknowledged that we had to work with the client, 22 with the City, to demonstrate all the -- that all

the requirements were going to be or were met as

So there was an important price

they had it in the RFP.

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1
    difference, and we selected CAF.
 2.
                CHRISTINE MAINVILLE: And did CAF, from
 3
    your perspective, have the ability to provide a
 4
    service-proven vehicle?
 5
                MANUEL RIVAYA: I don't remember that
6
             I think we -- I don't remember exactly.
    detail.
                                                        Т
7
    think at the time we thought that they could
8
    demonstrate that they had a service-proven vehicle,
9
    but -- and that is why we chose -- but that is why
10
    we chose them, or they would be in the same -- in
11
    the same position as others to demonstrate
12
    service-proven vehicle.
13
                CHRISTINE MAINVILLE:
                                       Including Alstom?
14
                MANUEL RIVAYA:
                                 Including Alstom, yes.
15
                                       And so when you
                CHRISTINE MAINVILLE:
16
    say that the City indicated that CAF didn't meet
17
    all the requirements, do you recall which
18
    requirements in particular the City thought no,
19
    were not met?
2.0
                MANUEL RIVAYA:
                                 No.
21
                CHRISTINE MAINVILLE:
                                       Do you recall
22
    whether it had to do with whether it was a
23
    service-proven vehicle or rolling stock?
24
                                 It could be that.
                MANUEL RIVAYA:
                                                     Tt.
25
    could be that, yes.
```

```
1
                CHRISTINE MAINVILLE: Do you recall
 2
    that issue being discussed with the City as it
 3
    relates to Alstom, when Alstom was put forward,
 4
    whether it was considered -- well -- and I'll ask
5
    you about the model, the train model that Alstom
 6
    put forward afterwards, but was it considered
7
    service-proven, to your recollection?
8
                MANUEL RIVAYA:
                                 I think there were
9
    some -- they had -- what I remember from that is
10
    that they had a line, a product. I think it is the
11
    Citadis is the one that they had in Ottawa, and I
12
    know that they had to do some adjustments to that
13
    product in order to meet the requirements of the
14
    City.
15
                But I do remember that being a
16
    service-proven vehicle was one of the requirements
17
    of the contract, and I suppose that we were able to
18
    demonstrate that it was a service-proven vehicle,
19
          "We" meaning Alstom were able to demonstrate
20
    that it was a service-proven vehicle.
21
                CHRISTINE MAINVILLE:
                                       Right, that would
22
    have been the representation made at least by
23
    Alstom to the City?
24
                MANUEL RIVAYA:
                                       Yes.
                                 Yes.
25
                                       And just from
                CHRISTINE MAINVILLE:
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```
1
    your perspective, is it the case -- well, first of
 2
    all, do you know the extent of the adjustments that
 3
    had to be made to the Citadis model to accommodate
 4
    the requirements for this project?
5
                MANUEL RIVAYA: No, I don't remember
6
    that.
7
                CHRISTINE MAINVILLE:
                                       Okay.
                                              Would that
8
    have been something you would be familiar with, or
9
    would you have relied on Alstom --
10
                MANUEL RIVAYA:
                                 I relied on the
11
    technical team that was in charge of the proposal.
12
    There were a lot of people in the team that knew
13
    more than I did on rolling stock, so I really don't
14
    know what needed to be modified in this train.
15
                CHRISTINE MAINVILLE:
                                      Do you mean the
16
    technical team on OLRTC's side or Alstom?
17
                MANUEL RIVAYA:
                                No, Alstom.
                                              I mean,
18
    Alstom was the one who was providing to us all the
19
    technical characteristics of the train, and there
20
    was a technical team that was checking against the
21
    PSOS, and when they were satisfied, we brought
22
    forward the proposal to the City together with
23
    Alstom.
24
                                       Okay. And then
                CHRISTINE MAINVILLE:
25
    in terms of Thales being brought in, do I
```

1	understand that they were brought in before OLRTC
2	determined which rolling stock provider they would
3	use?
4	MANUEL RIVAYA: I don't remember if it
5	was before or after.
6	CHRISTINE MAINVILLE: Okay. And was it
7	always the case that what the OLRTC was looking for
8	Thales to provide was its CBTC system?
9	MANUEL RIVAYA: I think so, but I don't
10	know. I don't remember.
11	CHRISTINE MAINVILLE: Okay. And you
12	said there were four or five signalling suppliers
13	that you thought could meet the City's
14	requirements.
15	MANUEL RIVAYA: Yes.
16	CHRISTINE MAINVILLE: Was Thales'
17	system unique in any respect, to your recollection?
18	MANUEL RIVAYA: I don't know.
19	CHRISTINE MAINVILLE: Okay.
20	MANUEL RIVAYA: I don't remember.
21	CHRISTINE MAINVILLE: Do you recall if
22	Alstom was one of the potential suppliers for the
23	signalling system?
24	MANUEL RIVAYA: Yes, they were.
25	CHRISTINE MAINVILLE: And was there

1 you have spoken about why Thales was selected, but 2 was there a reason -- once it was decided that 3 Alstom would be the rolling stock provider, was 4 there a reason why they weren't the preferred 5 supplier for the signalling system as well? 6 MANUEL RIVAYA: I quess it would have 7 been a financial reason, less competitive. 8 CHRISTINE MAINVILLE: Do you recall 9 whether it may have had to do with Thales having 10 already been selected before OLRTC had to shift 11 from CAF to Alstom? Is that possible? 12 MANUEL RIVAYA: That is possible. Т 13 don't recall when we selected Thales. T recall 14 that Thales had worked with Alstom -- I mean, the 15 Thales system had been installed in Alstom's 16 rolling stock in the past in some project, so I 17 knew that interface between Alstom and Thales had 18 already been proven. 19 CHRISTINE MAINVILLE: That was your 20 understanding that that had been done. Do you know 21 whether that related to Thales' CBTC system? 22 MANUEL RIVAYA: I don't remember. 23 CHRISTINE MAINVILLE: But do you know 24 whether Thales would have more than one type of 25 signalling system? Like it is possible that what

```
1
    had been integrated in Alstom's trains before was a
 2
    different kind of signalling system than what was
 3
    used in this case?
 4
                MANUEL RIVAYA:
                                It could have been,
5
          It is a possibility, yes.
    yes.
 6
                CHRISTINE MAINVILLE:
                                      And was this
7
    something that OLRTC would have looked into,
8
    whether the two systems, Thales and Alstom's, had
9
    been integrated together before?
10
                MANUEL RIVAYA:
                                 I remember having
11
    discussions about that particular aspect. I don't
12
    remember the particularities of these discussions,
13
    but I know there was a -- again, there was a
14
    technical team in the proposal that went through
15
    all those things, and I remember that when we
16
    agreed or made the selection of Thales, we -- that
17
    that discussion happened, but I don't remember the
    details of that. If they had used the same system
18
19
    or different system or in the same train or in
20
    different train, all that I don't remember.
21
                CHRISTINE MAINVILLE:
                                       Do you know who
22
    might have been the lead for the technical team, or
23
    who might be best to speak to this issue?
24
    U/T
                MANUEL RIVAYA:
                                 There was Roger -- I
25
    don't recall. I don't remember the -- I don't
```

```
1
    remember the name. I can look into it, but I don't
 2
    remember the name of the Proposal Director. He was
 3
    with SNC.
               He would have been the one who was more
 4
    close with this technical aspect of the project.
5
                CHRISTINE MAINVILLE:
                                       Okay.
 6
                MANUEL RIVAYA:
                                 It is Roger something,
7
    but I don't remember the last name, I'm sorry.
8
                                       Okay, thank you.
                CHRISTINE MAINVILLE:
9
    Do you recall whether the City had any preference
10
    in terms of signalling systems and the type of
11
    system that they wanted?
12
                MANUEL RIVAYA:
                                 Do you mean supplier or
13
    system that they wanted?
14
                CHRISTINE MAINVILLE:
                                       Either.
15
                MANUEL RIVAYA: No.
                                      I think -- I am
16
    doubting now, but I think it was the spec called
17
    for a CBTC, but I cannot quarantee that. So if it
18
    is there, it is either that or the requirements
19
    that the system had implied that we had to use a
20
    CBTC.
21
                CHRISTINE MAINVILLE:
                                       Right.
                                               And do
22
   you know whether a CBTC signalling system is unique
23
    to Thales?
                MANUEL RIVAYA: No, it is not unique to
24
25
    Thales.
```

1 CHRISTINE MAINVILLE: Can you explain 2 to me what your understanding is of that system and 3 who else provides it? 4 MANUEL RIVAYA: The system is a communications-based train control, and basically 5 6 what it does is it controls the position of the 7 train through radio based on communications, not 8 based on, let's say, the train entering a certain 9 area of the track. 10 So it allows for better regulation 11 between the trains, the different trains that are 12 running, and it -- I mean, it improves safety and 13 capacity of the system. 14 So I know that that system right now is 15 being -- I mean, as suppliers, you have Thales, you 16 have Alstom, you have Siemens, you have Hitachi. 17 At the time, I think it was Ansaldo. So there are 18 several signalling suppliers that have that 19 technology. 20 CHRISTINE MAINVILLE: So you have no 21 recollection that effectively OLRTC needed to go to 22 Thales to meet the City's requirements? 23 MANUEL RIVAYA: No, I don't think we 24 needed to go to Thales to meet the City's 25 requirements. I think we had several proposals

1 from others. I mean, Siemens probably was not an 2 option anymore because they were exclusive with 3 another group. 4 Bombardier, who also has the 5 technology, by the way, was not an option anymore 6 because they were with another team. 7 So we were left with Thales, with 8 Alstom, and probably a couple of others, but we 9 didn't have to go to Thales. 10 CHRISTINE MAINVILLE: Do you recall 11 whether CAF would have been paired with Thales if 12 CAF had been the rolling stock provider? Was that 13 the intention? 14 MANUEL RIVAYA: I don't recall it. 15 think they would have been paired with Thales also, 16 yes. 17 CHRISTINE MAINVILLE: And generally 18 speaking, is there a desire when you are doing a 19 procurement like this to minimize the number of 20 different systems to be integrated and different 21 interfaces between different entities? 22 The systems that have MANUEL RIVAYA: 23 to be integrated are the same. You still have to 24 integrate a signalling system with a rolling stock 25 or a signalling system with other systems in the

1 SCADA and Comms and others in the overall system. 2 So there is no -- there are no less 3 interfaces or less integration that you have in 4 other -- in the case that you go with the same 5 company. There could be a commercial 6 simplification eventually if you go with the same 7 company. So if Alstom had -- if Alstom had 8 supplied the rolling stock on the CBTC system, we 9 could have tried to structure the subcontract as 10 one single supply. But it is not always the case 11 that we can do it, so -- because internally, in 12 their own organization, they have also different 13 lines of product, different companies, let's say, 14 and not always you can have one of the other under 15 the same contract. 16 So I don't think the technical 17 challenges and complexity would have been different 18 if you had the same company under -- I mean, 19 supplying the rolling stock and the CBTC. 20 Commercially, it is a different thing. 21 I mean, you can transfer that interface risk to 22 someone else, but technically, it is exactly the 23 same. 24 CHRISTINE MAINVILLE: Okay. And you 25 would, however, look, as you have mentioned, look

1 to see whether the two companies have integrated 2 those systems together before, because ideally you 3 would look to ones that have already been 4 integrated to reduce risks? 5 Yeah, you look at risk. MANUEL RIVAYA: 6 You look at the risk of that interface and 7 integration, and if they have done it in the past, 8 obviously it is less -- you suppose that there is 9 less risk in this case. 10 CHRISTINE MAINVILLE: In terms of the 11 budget that was put forward for this project, do 12 you have any view or recollection as to whether it 13 was deemed to be a very restrictive budget, a very 14 tight one? 15 MANUEL RIVAYA: You are -- you mean by 16 the client, by the City? 17 CHRISTINE MAINVILLE: Yes, yes. 18 MANUEL RIVAYA: There was an initial 19 affordability level or budget that was communicated 20 to us that was not enough when this -- again, this 21 is my recollection, but I remember that we 22 communicated with the City that with the 23 requirements that they had and they expected from 24 the project and the affordability level that they 25 had communicated to us, we couldn't win the job,

1 and then they subsequently increased the budget, 2 and when they increased the budget, we were 3 satisfied that it was good for -- it was enough for 4 the project at the time. 5 CHRISTINE MAINVILLE: Okay. 6 MANUEL RIVAYA: And we bid within that 7 envelope. 8 CHRISTINE MAINVILLE: TJhm-hmm. And did 9 it later turn out to be more restrictive than 10 anticipated, or did it not cause concern over the 11 course of the project? 12 MANUEL RIVAYA: You mean to OLRTC? 13 CHRISTINE MAINVILLE: Yes. 14 MANUEL RIVAYA: Yes, it did. It did 15 cost -- it was -- our cost was higher than 16 originally expected. 17 CHRISTINE MAINVILLE: And what was the 18 cause of that? Was that just because of some risks 19 materializing, or was it -- did it go beyond that? 20 MANUEL RIVAYA: No, it is basically 21 because the risk materialized beyond what we 22 expected originally to materialize. There was 23 supply chain issues. I mean, there were many 24 different things that impacted the project, and the 25 cost went up.

1 CHRISTINE MAINVILLE: Can you talk to 2 some of those challenges and what ended up 3 increasing the costs? 4 MANUEL RIVAYA: So we had an incident 5 in the tunnel, the sinkhole, that obviously had an 6 impact in cost and in the schedule, which then also 7 we were obligated to do some acceleration and 8 mitigation work. 9 We had challenges with some of the 10 quantities in the design that also impacted the 11 cost. And we had challenges with the prices that 12 we were receiving from subcontractors for the -- I 13 mean, the scope of the stations, for the scope of 14 the electrical -- for the electrical and mechanical 15 scope, for -- I mean, generally speaking, for the 16 scope of the project. 17 CHRISTINE MAINVILLE: And was -- well, 18 first of all, in respect of the geo-tech risk that 19 the company took on, that ProjectCo took on, is 20 that -- in hindsight, was that too big, too large a 21 risk to take on in its entirety by the Project 22 Company? 23 MANUEL RIVAYA: I think -- I mean, we 24 had the incident with the sinkhole, that if I 25 am -- I don't know how things kept going since I

24

25

1 left, but that incident was, if I am not wrong, was 2 more related to other aspects than to the 3 geo-technical conditions themselves. 4 So if that has been confirmed, I mean, 5 on the paper it would have been too much to take on 6 on the geo-technical risk, because we performed the tunnel, we did the tunnel, and we had no problems 7 8 until we arrived to that location, which was the 9 last 100 metres. 10 Now, if we had different geo-technical 11 conditions in the contract in terms of risk 12 allocation, let's say claiming for that event would 13 have been easier for us, but I don't think the 14 geo-technical risk is -- the incident that we had 15 there is -- I think it was unrelated to the 16 geo-technics itself. It was more related to other 17 parameters that were not in the geo-technical 18 report. 19 CHRISTINE MAINVILLE: Sorry, so could 20 you clarify that? What was -- the risk was 21 unrelated to --22 MANUEL RIVAYA: Yes, I remember there

was a pipe that was leaking water and that -- you never have that in the geo-technical report, so if the pipe had not been leaking water, probably the

```
1
    incident that we had would have been the same.
 2
                But I don't -- I am speculating now, so
 3
    that is --
 4
                CHRISTINE MAINVILLE: Right, you are
5
    saying the geo-tech analysis was not wrong in terms
 6
    of the risk that was taken on. It was taken on
7
    with proper knowledge of the geo-tech conditions.
8
    What you are saying is there was an external
9
    element that was not known --
10
                MANUEL RIVAYA:
                               Yes.
11
                CHRISTINE MAINVILLE: -- that led to
12
    the sinkhole, to your understanding?
13
                MANUEL RIVAYA:
                                 Yes.
14
                CHRISTINE MAINVILLE: But RTG
15
    ultimately sought a relief event in respect of the
16
    sinkhole; correct?
17
                MANUEL RIVAYA:
                                 Yes.
18
                CHRISTINE MAINVILLE: And is it your
19
    understanding that that was refused by the City?
20
                MANUEL RIVAYA: Yes, I mean, I
21
    don't -- at the time, I think they refused the
22
    relief event, yes.
23
                CHRISTINE MAINVILLE: And was that not
24
    on the basis that RTG had accepted all of the
25
    geo-tech risk?
```

1 MANUEL RIVAYA: I don't remember what 2 they argued. I suppose they argued that. I think 3 we had a different perspective of what that 4 contractual conditions or contractual parameters, 5 those contractual parameters were, but I don't 6 remember the argument that we were putting forward 7 to seek the relief. 8 CHRISTINE MAINVILLE: Okav. And you 9 did indicate that if there had been a different 10 risk allocation, there may have been -- it would 11 perhaps have been easier to make a claim in respect 12 of. 13 MANUEL RIVAYA: Yes. 14 CHRISTINE MAINVILLE: So just 15 accounting for that, would you say in hindsight it 16 would be preferable to not take on that entire 17 risk, or do you think in some circumstances that it 18 is not an issue to take on the full geo-tech risk? 19 MANUEL RIVAYA: Generally speaking, I 20 would say in hindsight, yes, it would have been 21 better not to take on that risk, but each project 22 is different, the circumstance is different, so it 23 is not a generalization. I think in this case, it 24 would have been better, yes. 25 What kind of CHRISTINE MAINVILLE:

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1
    mitigation plan is put in place at the outset to
 2
    address the risk potentially materializing? You
 3
    know, when that geo-tech risk is taken on at the
 4
    outset, is there some -- well, let me put it this
5
          If the risk materializes in the way it did or
    way.
 6
    to the extent it did on this project, is that
7
    something that, you know, RTG plans for in terms of
8
    being able to withstand and, if so, how?
9
                MANUEL RIVAYA: I don't understand the
10
    question, sorry.
11
                CHRISTINE MAINVILLE:
                                       That is okay.
12
    just wonder -- let's -- and leaving aside what the
13
    exact cause of the sinkhole was, it was quite
14
    disruptive on this project, right? So is that
15
    something that RTG can plan for ahead of time, what
16
    if something like this happens, or is it really
17
    just something that no one really anticipates
18
    occurring and you just have to deal with it when
19
    the time comes, if it happens?
20
                MANUEL RIVAYA: Something like the
21
    sinkhole?
22
                CHRISTINE MAINVILLE:
                                       Yes.
23
                MANUEL RIVAYA: You don't anticipate it
24
    happening.
25
                                       You don't
                CHRISTINE MAINVILLE:
```

1 anticipate that happening? 2. MANUEL RIVAYA: No. 3 CHRISTINE MAINVILLE: So it is very 4 disruptive if something like that does happen? 5 MANUEL RIVAYA: Yes. 6 CHRISTINE MAINVILLE: And so could you 7 talk a bit more about the impact it did have on 8 this project, both in terms of costs and 9 scheduling? 10 MANUEL RIVAYA: So obviously, it 11 was -- there was a massive -- obviously, there was 12 a massive impact on the costs because we had to do 13 a number of works to restate safe conditions, to 14 proceed with the project, with the tunnel 15 excavation. 16 And then there was also an impact, a 17 big impact in the schedule because we were -- at 18 the time we were basically weeks away from 19 connecting the tunnel from -- I mean, the two sides 20 of the tunnel, and all the logistics of the plans, 21 of the works, were based on having the full 22 connection between one side and the other of the 23 project, the east and the west. 24 So it had a massive disruption. It was 25 a massive disruption to the schedule, and when you

1 have disruption to the schedule, then you have to 2 plan the works on a different way. You have to 3 take more -- you have to work under different 4 conditions, different logistics. So everything was 5 then impacted. 6 Did it have some CHRISTINE MAINVILLE: 7 impact on the testing and commissioning phase in 8 terms of delaying that? 9 MANUEL RIVAYA: Yes, if the tunnel was 10 delayed, therefore, the track, the connectivity of 11 the track, was delayed, and the testing and 12 commissioning of the tunnel was delayed, yes. 13 CHRISTINE MAINVILLE: And it would have 14 delayed integration testing, is that fair to say, 15 in terms of the rolling stock with the rest -- with 16 all of the infrastructure? 17 MANUEL RIVAYA: For that area, yes. 18 CHRISTINE MAINVILLE: Just going back 19 to the procurement, were there any issues or risks 20 that were foreseen in respect of the schedule for 21 delivery of the project? 22 MANUEL RIVAYA: When you make a 23 proposal like this one, you always consider -- I 24 mean, we always -- we used to always consider some 25 schedule risk and the schedule impacts that was

1 applying to the risk metrics. We had a strategy, a risk strategy, 2. 3 that gave us enough room to deliver the project in 4 the schedule with enough time for everything to be 5 in place, the construction and following a schedule that we thought was feasible, and the rolling stock 6 7 supply following the schedule that Alstom gave us, 8 and all the testing and commissioning following a 9 schedule that was the recommendation that we had 10 from the experts and the technical team that was 11 preparing this proposal. 12 So you always consider schedule 13 disruption and schedule delays because things can 14 happen, and you put it in your risk metrics. 15 we thought that the schedule was feasible. 16 CHRISTINE MAINVILLE: And did you have 17 any concerns with the RFP process, anything that 18 stands out that perhaps it was rushed or any 19 feedback that was given to the City about it? 2.0 MANUEL RIVAYA: I don't remember any 21 specific feedback about that. 22 CHRISTINE MAINVILLE: Do you recall whether the -- well, first of all, had you been 23 24 involved in other P3s before? 25 MANUEL RIVAYA: Before this one?

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1
                CHRISTINE MAINVILLE: Was this one --
 2
    well, first of all, for the rolling stock, were the
 3
    requirements more prescriptive than you might have
 4
    expected?
5
                MANUEL RIVAYA: I cannot answer that
6
    question.
               I don't know.
7
                                       Okay.
                CHRISTINE MAINVILLE:
                                              And this
8
    is perhaps not something you were particularly
9
    familiar with, but in terms of journey time
10
    requirements, was there any concern with what was
11
    being quaranteed in terms of the times between
12
    stations or anything challenging in that regard
13
    that you recall?
14
                MANUEL RIVAYA:
                                 N_{\odot}
15
                CHRISTINE MAINVILLE: You don't recall
16
    or you wouldn't know?
17
                                 I don't recall, sorry.
                MANUEL RIVAYA:
18
                CHRISTINE MAINVILLE:
                                       No problem.
19
                MANUEL RIVAYA:
                                 I don't know.
2.0
                CHRISTINE MAINVILLE: Okay. So do you
21
    recall what, if any, discussions were had between
22
    Alstom and Thales in the early stages to discuss
23
    the integration of their two systems?
24
                MANUEL RIVAYA: No, I don't recall.
                                                       Т
25
    don't recall anything.
```

```
1
                CHRISTINE MAINVILLE: Is it possible
 2
    there were none, or you just don't --
 3
                MANUEL RIVAYA: I don't know.
 4
    suppose -- no, I don't know.
5
                CHRISTINE MAINVILLE:
                                       Okay. Is that
6
    something you would normally expect to happen
7
   before both are selected by OLRTC, or not
8
    necessarily?
9
                MANUEL RIVAYA: I think what we
10
    expected -- well, we -- what I would expect is --
11
    and I think that was how we did it, is that, first
12
    of all, check that they could work together, there
13
    was no limitations for them to work together, and
14
    get commitments from them that they will work
15
    together.
16
                And I think there was a contractual
17
    provision, if I am not wrong, that -- in both of
18
    the subcontracts that forced them or mandated them
19
    or put an obligation on them to do that
20
    coordination and interface management to facilitate
21
    integration.
22
                And I will suppose that during the
23
    proposal, discussions at the technical level will
24
    have happened to understand and make sure that both
25
    systems could -- would be seamlessly integrated.
```

```
1
                CHRISTINE MAINVILLE: Were you involved
 2
    in devising each subcontract for Thales and Alstom?
 3
                                 I was devising -- what
                MANUEL RIVAYA:
 4
    do you mean by "devising"?
                                 In --
 5
                                       Devising, so just
                CHRISTINE MAINVILLE:
   preparing the subcontracts, who would have been --
6
7
                MANUEL RIVAYA:
                                I was involved in some
8
    of the final discussions with Thales to close the
9
    contract, but most of the discussions were
10
    commercial. There was never a discussion around
11
    the integration between Thales and Alstom.
12
    was a technical slash -- I mean, that was a very
13
    technical aspect of the proposal that I was not
14
    involved in.
15
                So, I mean, we had discussion about
16
    payment terms, about IP rights, about some of the
17
    back-to-back provisions of the contract. Those
18
    type of discussions I was involved to close the
19
    contract. I was not involved in any of the -- how
20
    that interface was contractualized in the
21
    subcontract.
22
                CHRISTINE MAINVILLE: So that would
23
   have been, again, the technical team looking at the
24
    technical aspects of the contract?
25
                MANUEL RIVAYA: Mostly, yes, mostly.
```

1 CHRISTINE MAINVILLE: Do you 2 know -- you said you were more involved in the 3 Thales subcontract. Was there anyone overseeing 4 both subcontracts or coordinating as between the 5 two subcontracts? 6 MANUEL RIVAYA: When I said I was more 7 involved in the Thales subcontract, it is because 8 heading into the final submission date we had the 9 two subcontracts that had not been finalized 10 commercially, legally let's say, rather than 11 technically. Technically everybody was very happy 12 with where we were. So commercially, there were, 13 as I said, some challenges in both contracts --14 subcontracts, and I took the lead in closing the 15 Thales subcontract let's say from an executive 16 perspective, so basically pushing the teams to sit 17 together, to discuss the terms and conditions and 18 participate on some of them so that we would be 19 able to close those terms and conditions before the 20 bid was closed. 21 CHRISTINE MAINVILLE: Was there anyone 22 involved in overseeing both, both subcontracts, or 23 how does that --24 MANUEL RIVAYA: Well, I mean, we had a 25 full team. I mean, if you are asking for one

1 person in particular, I don't remember. I don't 2 know. We had a proposal lead with a team of people 3 and then we had lawyers from the three companies. 4 We had commercial people from the three companies. 5 So it was made by a team, not one 6 person in particular. 7 CHRISTINE MAINVILLE: Right, but is 8 there -- I quess my question is, is there a 9 separate team for each subcontract, or are they 10 dealing with both the Thales and Alstom? 11 MANUEL RIVAYA: The team -- the lead 12 team of the proposal were leading with both 13 elements of the proposal. 14 CHRISTINE MAINVILLE: Okav. So in 15 terms of ensuring some alignment between the two 16 subcontracts, you would expect that to happen at 17 that team level? 18 MANUEL RIVAYA: Yes, yes. I don't 19 recall any issues whatsoever with that interface in 20 terms -- I mean, in terms of technical interface 21 and in terms of submitting the two subcontracts. 22 CHRISTINE MAINVILLE: You don't recall 23 that arising over of the course of the project, 24 some apparent misalignment as between the two 25 subcontracts?

1 MANUEL RIVAYA: No. 2. CHRISTINE MAINVILLE: Do you recall 3 that Alstom was expecting delivery of certain 4 elements from Thales on certain dates that were not 5 feasible for Thales? 6 I don't recall that MANUEL RIVAYA: 7 they were not feasible. I recall that there was a 8 delay by Thales, but I don't recall why Thales was 9 late. 10 CHRISTINE MAINVILLE: Okay. Would that 11 have been in respect of its final ICD or the VOBC 12 system itself? Do you recall the delays? Maybe 13 you could just speak to what you recall of Thales' 14 delays. 15 MANUEL RIVAYA: I don't -- I recall 16 that there were delays, but I don't recall what was 17 the cause or the trigger for those delays, and for 18 sure I cannot say who was causing the delay or what 19 was causing the delay. 2.0 CHRISTINE MAINVILLE: And do you recall 21 how that was dealt with or addressed? 22 MANUEL RIVAYA: When we were heading 23 towards the end of the project, we had several 24 discussions with Thales, with the senior management 25 of Thales, and we escalated it to the Executive

```
1
    Committee, and we had several meetings to align on
    a schedule with -- but I think at the time, I don't
 2.
 3
    remember exactly, but it was more to get the final
 4
    safety certificate from Alstom -- sorry, from
5
             I don't remember the supplies -- I don't
    Thales.
 6
    really recall. I remember that I had meetings
7
    together with my colleagues from the Executive
8
    Committee with senior management of Thales to talk
9
    about the schedule and about the financial
10
    implications of that, but I don't remember the
11
    details of what caused the delay and why things
12
    were like they were.
13
                CHRISTINE MAINVILLE:
                                       Okay. Do you
14
    recall what planning was done for systems
15
    integration --
16
                MANUEL RIVAYA:
                                 No.
17
                CHRISTINE MAINVILLE: -- by OLRTC?
                                                      No.
18
    you don't recall.
19
                What was OLRTC's understanding of the
20
    level of integration that was required for the
21
    rolling stock and the integration system?
22
                MANUEL RIVAYA: I don't understand the
23
    question, sorry.
                                       Well, let's put
24
                CHRISTINE MAINVILLE:
25
    it this way. Did anyone have responsibility for
```

```
1
    the integration of those two systems, the rolling
 2
    stock and the signalling system?
 3
                MANUEL RIVAYA: The ultimate
 4
    responsibility was on OLRTC.
5
                CHRISTINE MAINVILLE: Do you know if
6
    someone early on had that role?
7
                MANUEL RIVAYA: I don't remember.
8
    don't remember, no.
9
                CHRISTINE MAINVILLE: Do you recall
10
    whether -- going back to my earlier question,
    whether there was a sense that these were just two
11
12
    systems that could ultimately be connected to each
13
    other and there was not particular concern about
14
    the complexity of how that needed to be done?
15
                MANUEL RIVAYA:
                                 There was always
16
    concern about the complexity. There was also the
17
    comfort that we were dealing with two very good
18
    companies with very good reputations, that
19
    basically this is what they do.
2.0
                And then we had also a group of
21
    engineers that was also expert in doing this.
22
                So, I mean, I think the complexity is
23
    there and we acknowledged that it was complex, but
24
    we also thought that we had a team structure with
25
    very well-qualified players to perform the work.
```

```
1
                CHRISTINE MAINVILLE: Right, okay, in
 2
    terms of Alstom and Thales being --
 3
                MANUEL RIVAYA: We had Alstom.
 4
             And there was an engineering group led by
    Thales.
5
    SNC who had also experience in doing this, this
 6
    type of work.
7
                CHRISTINE MAINVILLE: Do you recall who
8
    was on that group for SNC?
9
                MANUEL RIVAYA: No, I don't recall the
10
    people exactly. I recall -- I know that SNC had
11
    done this in the past, and there was an EJV there
12
    with MMM, now WHP, and the whole structure of the
13
    project was based on the capabilities of both
14
    Alstom and Thales on delivering this scope.
15
                CHRISTINE MAINVILLE: So do you recall
16
    that SNC had effectively taken on that role or was
17
    supposed to be overseeing that?
18
                MANUEL RIVAYA:
                                 SNC as engineers, they
19
    had the responsibility of - well, that is what I
20
    recall - designing the whole project, including the
21
    systems.
22
                CHRISTINE MAINVILLE:
                                      And do you
23
    recall -- because you mentioned EJV, do you recall
24
    whether that was SNC as part of OLRTC or more
25
    specifically the SNC entity that was part of the
```

22

23

24

25

1 RTG/EJV venture? I understand those to be two 2 technically separate entities. 3 MANUEL RIVAYA: So we had a team, a 4 systems team, as well OLRTC, so we had people 5 looking at the system side. Again, I don't recall 6 exactly the structure of it, but there was a group 7 of people who were looking at that from an OLRTC 8 perspective, and SNC, as part of the EJV or the EJV 9 as our subcontractor for the design scope, they had 10 also people looking at the design of the systems 11 and all that. 12 Do you recall CHRISTINE MAINVILLE: 13 that somewhere around the negotiation of the 14 subcontracts, MMM or EJV more broadly indicated 15 that they did not want to take responsibility for 16 systems integration as it related to the rolling 17 stock and the signalling system in particular? 18 MANUEL RIVAYA: I recall MMM having 19 concerns about that, and my recollection is that 20 they had an internal agreement between MMM and SNC, 21

concerns about that, and my recollection is that they had an internal agreement between MMM and SNC that we were not part of it. I mean, we didn't -- it was not disclosed to us. But we knew that something was different or they had a different alignment in the EJV.

CHRISTINE MAINVILLE: Do you recall

```
1
    that EJV's subcontract did not assign to them the
 2
    specific responsibility for systems integration of
 3
    the rolling stock and signalling system?
 4
                MANUEL RIVAYA: I don't recall that.
                                                        Ι
5
    don't recall that.
 6
                CHRISTINE MAINVILLE:
                                       Do you recall
7
    that it spoke to interfacing but not integration?
8
    Is that --
9
                MANUEL RIVAYA: It could have been.
                                                       Τ
10
    don't recall it.
11
                CHRISTINE MAINVILLE: And do you recall
12
    whether over the course of the project SNC
13
    struggled to find someone to fill the systems
14
    integrator role?
15
                MANUEL RIVAYA:
                                 Are you talking about
16
    SNC as partner or SNC as a sub?
17
                CHRISTINE MAINVILLE: As -- well, both,
18
    because you have said that both had some level of
19
    involvement in this work and then --
2.0
                MANUEL RIVAYA: I don't recall having
21
    specific discussions about the systems integrator
22
           I recall that we had someone in charge
23
    for -- the Alstom people in charge looking after
24
    the Alstom subcontract, and we had people in charge
25
    looking at the Thales subcontract.
                                         But I
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```
1
    don't -- I mean, this is very blurred right now to
    me who was in charge of what and how that was
 3
    structured at the SJV and EJV level.
 4
                CHRISTINE MAINVILLE: Do you recall
5
    someone by the name of Jacques Bergeron coming in
6
    and filling perhaps part of that role?
7
                MANUEL RIVAYA:
                                 Jacques?
8
                CHRISTINE MAINVILLE: Jacques Bergeron,
9
    or you don't know?
10
                MANUEL RIVAYA: It could have been.
                                                      Ιt
11
    could have been. The name rings a bell, but I
12
    think Bergerons -- there are many Bergerons in
13
    Canada, so I don't know if it is this one or a
14
    different one.
15
                CHRISTINE MAINVILLE:
                                       Okay. So do you
16
    have a view as to whether ultimately OLRTC fully
17
    performed this role of systems integration or
18
    whether, in hindsight or not, there was some
19
    recognition that it wasn't performed to the level
20
    that it maybe should have been done?
21
                MANUEL RIVAYA:
                                 What I will say is that
22
    the expectations that we had from all the different
23
    partners were different, and I -- in hindsight, I
24
   mean, if I look at from today how we did things
25
    originally, I wouldn't have done it the same way.
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1
                CHRISTINE MAINVILLE: How so?
 2.
                MANUEL RIVAYA: Well, I mean, the
 3
    systems -- I mean, that downloading of certain
 4
    responsibilities to the subcontractors, and by
5
    subcontractor, I am looking at -- I am thinking of
    Alstom, Thales and EJV, I would have done it
 6
7
    different.
8
                CHRISTINE MAINVILLE:
                                       In terms of
9
   providing perhaps more oversight on the integration
10
    of the systems?
11
                MANUEL RIVAYA: Yes, in terms of
12
    thinking more practical on the integration side, or
13
    scoping them, or from some of the scope that we
14
    thought that we were -- or downloading to them.
15
                CHRISTINE MAINVILLE: Do you recall
16
    there being some dispute over division of
17
    responsibilities between Alstom and Thales in terms
18
    of who, for instance, was to install the VOBC
19
    system and some of the testing, the PICO testing,
20
    as it related to internal components of the
21
    signalling systems?
22
                MANUEL RIVAYA: No, I don't. I don't
23
    recall, no.
24
                CHRISTINE MAINVILLE:
                                      In term of
25
    systems integration more broadly, so, you know, I
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1 have been focussed on the signalling system and the 2 rolling stock, but just from a more project-wide 3 perspective, was there much thought given to 4 integration at a higher level of all of the 5 different parts? 6 MANUEL RIVAYA: We had. We had --7 between EJV and ourselves, we had a group of people 8 looking after that, so I would say yes, we were 9 given -- let's say that from a holistic approach, 10 we were taking -- I think there was a group of 11 people that was looking at that. 12 CHRISTINE MAINVILLE: Okay. Was there 13 an integrated work schedule? 14 MANUEL RIVAYA: I don't know. I think 15 so, but I don't know. 16 CHRISTINE MAINVILLE: Okay. Do you 17 recall there being issues as it related to Alstom's 18 schedule and Thales' schedule and whether those 19 aligned or how those were dealt with in relation to 20 each other? 21 MANUEL RIVAYA: When? Because the 22 project was very long. 23 CHRISTINE MAINVILLE: Yes. 24 MANUEL RIVAYA: There were many things 25 And I think when we submitted the happened.

1 proposal, that the schedules were aliqued. 2. CHRISTINE MAINVILLE: Right, initially. 3 MANUEL RIVAYA: Right. 4 CHRISTINE MAINVILLE: And then can you 5 tell me a bit about over time how -- what was the 6 approach to those two schedules, the Thales 7 schedule and Alstom schedule? 8 MANUEL RIVAYA: I don't know. I don't. 9 know the details of what that approach was. 10 mean, from an Executive Committee perspective, we 11 were -- we had a monthly meeting with the team, and 12 my understanding was that the schedules were 13 aligned. 14 Then when the delays started to happen, 15 from any of them I don't know how the different 16 schedules were being aligned. 17 CHRISTINE MAINVILLE: Okay. Would that 18 have been, as a general matter, brought to the 19 Executive Committee's attention to deal with, or 20 would that have just not been really something that 21 the Executive Committee was privy to? 22 MANUEL RIVAYA: Again, the project 23 evolves, and the challenges and the issues are 24 different, and I remember at some point that we 25 were asking from the Project Team to give us more

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1
    detail about the integration of both the schedules
 2
    between Alstom and Thales and getting more involved
 3
    with the issues that Alstom was having on one side
 4
    with late delivery of the vehicles and eventually
5
    Thales, with either late delivery of their products
 6
    or not being able to have a schedule that was
7
    aligned with what the actual delivery schedule of
8
    Alstom was.
9
                So in the last part, in the last year
10
    that I was involved in Ottawa in the project, there
11
    were also discussions about the delays of Alstom
12
    and the impacts or the delays of Thales.
13
    remember more the delays of Alstom than the ones of
14
    Thales, but they could have been from both.
15
                CHRISTINE MAINVILLE:
                                       Do you recall a
16
    desire to keep the pressure on Alstom and therefore
17
    deciding not to change its RSA date on its
18
    schedule?
19
                MANUEL RIVAYA: Well, the -- sorry,
20
   which date did you say?
21
                CHRISTINE MAINVILLE:
                                       For revenue
22
    service availability, or basically just their --
23
                MANUEL RIVAYA: Yeah, we were keeping
24
    the pressure in Alstom, of course. We had
25
    contractual consequences of not delivering the
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1 project on time, and we had obviously reputation 2 consequences of not delivering the project on time. 3 So we were keeping the pressure on Alstom to 4 deliver the vehicles on time, and they were 5 committing to delivering the vehicles on schedules 6 that were updated almost -- I mean, I don't 7 remember if it was -- I don't remember how often 8 they were updated, but we were tracking and 9 receiving periodic updates of schedules from 10 Alstom, and we were keeping the pressure on them to 11 deliver to the schedules that they were committing 12 to. 13 CHRISTINE MAINVILLE: You said they 14 were committing to meeting that schedule. Do you 15 recall -- were you made aware of several requests 16 by Alstom to change the schedule that were refused 17 by OLRTC? 18 MANUEL RIVAYA: If it was at the back 19 end of the project, I think they were asking 20 for delay -- I mean, they were asking for extension 21 of time, and we were asking for more resources and 22 mitigation plan to deliver the vehicles as per the 23 schedule. 24 CHRISTINE MAINVILLE: And were those 25 produced to OLRTC's satisfaction?

1 MANUEL RIVAYA: I think we were getting 2 them. We were getting some schedules, and we were 3 getting commitments from Alstom that they would 4 deliver to the schedules that we were receiving. 5 CHRISTINE MAINVILLE: You think there 6 were commitments from Alstom? 7 MANUEL RIVAYA: Yes. 8 CHRISTINE MAINVILLE: Do you recall 9 Alstom writing to OLRTC indicating that it could 10 not produce -- it would not be able to produce all 11 of the vehicles by the RSA date and by -- I'll give 12 you a more specific date, if I can. 13 In May 2017, do you recall Alstom 14 making clear that it would not be feasible to have 15 all 34 LRVs ready for RSA? 16 I don't recall that. MANUEL RIVAYA: 17 would imagine that if it was in '17, as a response 18 to that, we would ask for a mitigation plan 19 acceleration. I mean, I know that at that time we 20 were discussing about double shift and we were 21 discussing about weekends. 22 So if it was in '17, I don't remember 23 that specific letter, but I remember that we were 24 dealing with it -- I mean, with the issue of the 25 schedule, the way we would deal with is by asking

1 them to deliver to the original schedule, yes. 2. CHRISTINE MAINVILLE: Do vou recall 3 when Thales was granted an extension to the RSA in 4 December 2017? 5 MANUEL RIVAYA: No, I don't recall 6 Thales or Alstom? that. 7 CHRISTINE MAINVILLE: Thales. 8 MANUEL RIVAYA: To the RSA? 9 CHRISTINE MAINVILLE: Yeah, to what was 10 then the May 2018 RSA. MANUEL RIVAYA: Well, but that is 11 12 different. Okay, so you are not -- revenue service 13 availability, May --14 CHRISTINE MAINVILLE: May 2018 was the 15 original revenue service availability date; 16 correct? 17 I don't -- yeah, it MANUEL RIVAYA: 18 could have been. I don't remember that date. Τ 19 thought it was later, to be honest, but it could 20 have been May, yes. 21 CHRISTINE MAINVILLE: Okay. Do you 22 recall Thales being granted an extension to that 23 date? 24 MANUEL RIVAYA: When? 25 Around December CHRISTINE MAINVILLE:

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1
    2017.
 2.
                MANUEL RIVAYA: It could have been,
 3
   yes.
 4
                CHRISTINE MAINVILLE: Do you recall --
5
                MANUEL RIVAYA:
                                 I mean, I
6
    recall -- look, there was -- I recall that as we
7
    were getting towards the let's say expected date,
8
    and the dates right now are moving because I don't
9
    know what I was thinking that the date was
10
    September, but I guess that is when -- our date was
11
    September, but now that you tell me about May, yes,
12
    it brings about that it was May and we extended
13
    that to September initially and then eventually to
14
    December, and there were more issues at that time,
15
    right.
16
                CHRISTINE MAINVILLE:
                                       Do you recall
17
    whether Alstom would have been notified of Thales'
18
    extension?
19
                MANUEL RIVAYA: I don't know. I don't
20
    know.
21
                CHRISTINE MAINVILLE:
                                       Would it be your
22
    expectation that there would be some coordination
23
    to make sure the schedules still aligned or would
24
    the approach be to leave it to maintain pressure on
25
    Alstom?
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MANUEL RIVAYA: That is a tricky question because the schedules should align the way it was anticipated originally, right. So if, for example, Alstom had to deliver the vehicles in month 10 and then Thales had six months to do their work after all the vehicles were delivered, I don't I mean, if we were giving certain extension to Thales, it doesn't mean that we had to give the same extension to Alstom if the time between when Alstom was finishing and Thales had to finish had been compressed, right. So I think this is a more complex discussion and I am not able to talk about that. CHRISTINE MAINVILLE: Okav. MANUEL RIVAYA: I think when -- at the time what I can is that yes, we were pushing Alstom to deliver because our view is that they were a lot more delayed than the rest of the elements of the project. CHRISTINE MAINVILLE: Okay, and just to be clear, would that be something that would come

to the Executive Committee's attention and would

any direction be given as it relates to that, to

whether, you know, whether to look at, okay, given

an extension granted to -- let's go off record for

1	a second.
2	[Reporter's Note: Reporter's Internet
3	had Previously Disconnected - Off the
4	Record Discussion to Discuss Technical
5	Issues.]
6	RECESSED AT 10:34 A.M.
7	RESUMED AT 10:46 A.M.
8	CHRISTINE MAINVILLE: So, Mr. Rivaya,
9	do you have any recollection of when OLRTC would
10	have come to the conclusion that the RSA date would
11	not be met, the original RSA date?
12	MANUEL RIVAYA: I think probably at the
13	end of 2017 we had we had a number of workshops
14	to look at the revenue demonstration date, and I
15	think that was the time, either at the end of
16	early yeah, at the more or less about that
17	time.
18	CHRISTINE MAINVILLE: And what is your
19	sense of how accurate a picture the Executive
20	Committee had of what was happening on the ground?
21	So what was being reported to it by the various
22	Project Directors, do you have a sense of how
23	accurate a picture you had of the delays and the
24	impact on the various milestones?
25	MANUEL RIVAYA: When I remember that

1 when -- the project was very long, so I think we 2 were made aware of the challenges at the same time 3 that we were made aware of certain mitigation 4 strategies that were taken by the Project Team. 5 And then when things started to look 6 more -- we were also asking, by the way, as 7 Executive Committee, the Project Team to come with 8 mitigation strategies to meet the schedule, and 9 when things were getting more difficult, then is 10 when we put this team together to look at where was 11 the most -- the date that more likely we could 12 achieve the schedule. 13 And I think, if I am not wrong, this 14 was at the end of 2017. I don't remember the 15 outcome of that workshop or those workshops in 16 terms of dates. I don't remember when we first 17 arrived to the conclusion that it was going to be 18 on a later date than the main date, if it was 19 before or after that workshop, but I think it was 20 around there. 21 CHRISTINE MAINVILLE: Sorry, you are 22 saying there was something put in place for closer 23 monitoring at that point in time? 24 It was a -- yeah, well, MANUEL RIVAYA: 25 yes, so there was -- I don't -- yes, there was

1 a -- look, I don't remember well. It is -- I 2 remember the workshop, and I remember that we had 3 the workshop to arrive to a schedule that give 4 us that with a level of confidence, and I remember 5 that after the workshop, we started to monitor more 6 frequently the project. 7 If it was in February or May, I don't 8 remember exactly, but that is -- it was around that 9 time. 10 CHRISTINE MAINVILLE: Do you recall what the main cause of the -- what drove pushing 11 12 back the RSA date? Was it the rolling stock or the 13 infrastructure, or was it a combination of various 14 things? 15 It was a combination of MANUEL RIVAYA: 16 various things, but what was clear is that the 17 rolling stock was not going to be supplied on time 18 to be able to do all the testing, commissioning, 19 integration and everything. 2.0 CHRISTINE MAINVILLE: Okay, and what 21 mitigation -- what were the main mitigation 22 strategies put in place in particular as it related 23 to the rolling stock that you can recall? 24 I don't remember. MANUEL RIVAYA: 25 know that we were asking for mitigated schedules

1 from Alstom on a -- I mean, continuously, right, 2 but I don't remember which mitigation strategies 3 Alstom was putting in place. 4 CHRISTINE MAINVILLE: Do you recall 5 whether there was an inability to accelerate parts 6 of the project as a result of financial pressure? 7 So was there an inability to commit sufficient 8 resources, whether by OLRTC or Alstom? 9 MANUEL RIVAYA: From OLRTC we had 10 financial issues, but there was never, let's say, a 11 slow-down or less commitment of resources by OLRTC 12 partners towards the project, right. 13 There were disputes with suppliers, and 14 we had our different perspective of who was 15 responsible for certain delays, including Alstom. 16 By Alstom, I don't know what they did, but they 17 were committing to us to schedules that were not 18 being met at the time and that those commitments 19 were done at the Executive level also. 20 So I don't -- I don't think the 21 financial -- I mean, if Alstom was not putting 22 enough resources because they were in financial 23 troubles, I don't know. I tell you that it was not 24 OLRTC partners who did not commit to enough 25 resources to have the project going on. We thought

1 that the delays of Alstom were the responsibility 2 of Alstom, so we were not ready to pay them for 3 more money for those delays even if they were 4 asking for money. 5 And to be honest, I don't recall any 6 specific claims from Alstom. I mean, I suppose 7 they were, but they were not -- the discussions 8 that we had with Alstom were not related to 9 financial aspects. 10 CHRISTINE MAINVILLE: And who made 11 those commitments from Alstom at the Executive 12 level in terms of committing to the schedule? 13 MANUEL RIVAYA: We had meetings --14 there were meetings with the President of Alstom in 15 Canada, or I think it was the President of Alston 16 in Canada, and I remember there were some meetings 17 with -- responsible for Alstom in North America 18 that was based in New York, the meetings or calls 19 or discussions, either as Executive Committee or by 20 the different partners. 21 CHRISTINE MAINVILLE: Would Alstom's 22 correspondence about scheduling go to the Executive 23 Committee? 24 MANUEL RIVAYA: I don't remember that. 25 And it is fair to CHRISTINE MAINVILLE:

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1
    say that the construction delays significantly
    impacted OLRTC financially; is that fair?
 3
                                 They didn't -- I mean,
                MANUEL RIVAYA:
 4
    OLRTC was impacted financially by a number of
5
    things, but one of them could have been the delays
 6
    and the acceleration measures that had to be taken,
7
    put in place by OLRTC.
8
                CHRISTINE MAINVILLE:
                                       So why do you say
9
    that didn't impact ultimately the resources
10
    committed? How was that alleviated, the financial
11
    pressure?
12
                MANUEL RIVAYA:
                                 The partners were
13
    sending money to the joint venture so that the
14
    joint venture could meet their financial
15
    obligations.
16
                CHRISTINE MAINVILLE:
                                       Do you recall
17
    when the City underwrote RTG's debt? Would you
18
    have been aware of that?
19
                MANUEL RIVAYA:
                                 Yes.
2.0
                CHRISTINE MAINVILLE: And this was
21
    around 2017, if you recall?
22
                MANUEL RIVAYA:
                                 Yes.
23
                CHRISTINE MAINVILLE: Did that have an
24
    impact on the project, whether in terms of the
25
    relationship with the City or any kind of power
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1
    differential?
 2.
                MANUEL RIVAYA:
                                 There was an
 3
    attempt -- there was -- so the City became both
 4
    client and lender, and they were trying to use
5
    their lender's -- they were trying to use their
 6
    lender's, let's say, role to impose or to trigger
7
    certain things from RTG and therefore from OLRTC.
8
                So there was some -- I don't know which
9
    word to use, but there was some challenges there.
10
                CHRISTINE MAINVILLE: How did that
   manifest itself? Like how would you --
11
12
                MANUEL RIVAYA: I don't remember the
13
              I know that there are -- there is --
14
    there was something in the contract related to
15
    supplier of mitigation plans or something that they
16
    were trying to use their lender's hat to force us
17
    to disclose something, but I don't remember.
18
    don't remember exactly the details.
19
                I remember there was some discussions
20
    around that and with the independent certifier --
21
    not the independent certifier, the LTA and RTG.
22
                CHRISTINE MAINVILLE: So did that have
23
    an impact on information-sharing with the City?
24
                MANUEL RIVAYA:
                                 From OLRTC?
25
                CHRISTINE MAINVILLE:
                                       Yes.
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                MANUEL RIVAYA: I don't think so.
                                                    Τ
 2
    don't think so.
 3
                CHRISTINE MAINVILLE: Did you perceive
 4
    an impact on that as it relates to RTG and the
5
    City?
 6
                                 I don't remember.
                MANUEL RIVAYA:
7
    know it was probably a game of trying to get more
8
    information and we trying to use some, but it is
9
    not so much getting more information. I don't --
10
    look, I don't remember exactly what the nuance was
11
    there, but I remember there was some sort of nuance
12
    in that relationship at the time because of that.
13
                CHRISTINE MAINVILLE: And do you recall
14
    any changes to -- resulting changes to the
15
    monitoring by the senior creditor's technical
16
    advisor?
17
                                 I don't recall that.
                MANUEL RIVAYA:
18
                CHRISTINE MAINVILLE:
                                       Okay. What would
19
    you say would have been OLRTC's level of
20
    transparency about the delays vis-à-vis RTG?
                                                   Were
21
    they fully -- was RTG fully apprised of the
22
    challenges and the delays as OLRTC's Executive
23
    Committee would have been, or was there -- what was
24
    the level of information being forwarded on?
25
                MANUEL RIVAYA:
                                 I think they were
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1
    similarly aware of the challenges. I mean, maybe
 2
    they didn't have the same level of detail, but by
 3
    the time when things were getting more complicated,
 4
    I think we were trying to manage the schedule to
5
    the best of our abilities, trying to meet
 6
    contractual obligations, and also, I mean,
7
    explaining what the mitigation strategies were.
8
                CHRISTINE MAINVILLE:
                                       And were you at
9
    the table with the City occasionally or frequently?
10
                MANUEL RIVAYA: We had meetings with
11
    the City, yes.
12
                CHRISTINE MAINVILLE:
                                       Yes.
                                             What was
13
    the level -- or how would you characterize the
14
    level of transparency with the City about the
15
    delays and challenges?
16
                                 I don't remember.
                MANUEL RIVAYA:
                                                     We
17
    had a number of without prejudice meetings, so --
18
    but I don't remember the level of transparency at
19
    the time.
20
                CHRISTINE MAINVILLE: Is it fair to say
21
    that there was some reluctance to keep the City
22
    fully apprised of the delays?
23
                MANUEL RIVAYA:
                                 When?
24
                CHRISTINE MAINVILLE: Well, as the May
25
    2018 RSA date is approaching, so in 2017, and I
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1 understand your evidence, I think that by the end 2 of 2017 it was known that the RSA date would not be 3 met. 4 But even backing up and leading up to 5 that, I take it OLRTC would have had concerns about 6 meeting that RSA date; is that fair to say? 7 MANUEL RIVAYA: Yes, but at the same 8 time we were getting mitigation schedules and plans 9 to meet the date, so I mean, it was tight, but 10 there was -- I believe that the date could have 11 been met based on everybody meeting the schedules 12 that they were committing to. 13 CHRISTINE MAINVILLE: And do you think 14 those plans and schedules were realistic in 15 hindsight? 16 MANUEL RIVAYA: Of course. I mean, 17 if -- realistic? It is complicated to respond to 18 that, because if we are basing a schedule in 19 another schedule that a key supplier like Alstom or 20 like Thales is giving us or like many others that 21 we had in the project, and we are putting all of 22 them together and the different -- or the main 23 suppliers they were committing to schedules. It is 24 not that we had a huge float in the project, but if 25 everybody had met their schedule, we could have met

1 our schedule. 2. So I mean, it is a difficult question 3 to respond because you have to be at that time 4 living the project, and the push by everybody was 5 to meet and to commit to the schedule and to seek 6 from the different participants in the project 7 commitment to meet that schedule. 8 So that was the line of work of 9 everybody until it became apparent that it was not 10 going to be met, and I suppose that we communicated 11 that to the City, and I don't remember exactly when 12 that happened. 13 CHRISTINE MAINVILLE: Put it this way. 14 When you are attending meetings with the City and 15 scheduling is discussed, is OLRTC doing some of the 16 talking, or that really is up to RTG? 17 MANUEL RIVAYA: No, we, as OLRTC, we 18 did a lot of the talking, yes. 19 CHRISTINE MAINVILLE: About the 20 scheduling? 21 MANUEL RIVAYA: Yes. 22 CHRISTINE MAINVILLE: And so how 23 transparent was OLRTC with the City about the 24 And maybe I could phrase it this way. delays? 25 Would you give them the most optimistic scenario,

1 like we will need it, or would you give them the lay of the land in terms of the risks of not 3 meeting the schedule? 4 MANUEL RIVAYA: We were -- I don't 5 remember. I honestly don't remember exactly, and 6 we had many meetings with the City in different --7 under different -- I mean, we had at different 8 times and the circumstances were different, so I 9 don't -- I mean, it could have been -- what I can 10 tell you is that every time that we gave 11 commitments about dates or a schedule, we had a 12 support or we had an understanding that that could 13 have been met. If we weren't transparent, if it 14 was very optimistic or slightly optimistic or very 15 pessimistic, I don't think we entered into that 16 level of discussion. 17 They had their views and we could 18 acknowledge or not that it was very optimistic, but 19 if we presented a schedule, it is because a 20 schedule was -- we thought that the schedule could 21 have been met. Obviously, it could have been 22 optimistic or with no float. Then, therefore, 23 someone could say, How can you think that it was 24 possible if you didn't have any float? Okay, that 25 is -- you can take that, but I didn't think we ever

25

1 went with a schedule saying it cannot be met if we 2 didn't think it could be met. 3 CHRISTINE MAINVILLE: Okay. So you 4 wouldn't say that the RSA date was artificially 5 maintained for a period of time, even though there 6 was a recognition that it could not be met? 7 MANUEL RIVAYA: No, there was at some 8 point -- again, there was a dispute with the City 9 about -- so what we -- there were -- we had -- it 10 is true that we had to inform the City about 11 revenue service demonstration or substantial 12 That was a contractual obligation. completion. 13 And there was -- I remember there was, 14 again, a - I don't know how to call it - nuance in 15 the contract that said that we had to demonstrate 16 that we were able to meet substantial completion as 17 eventually modified, or substantial completion was 18 defined as a date or as eventually modified by the 19 contract, and we were taking the position that 20 there were delays, delay events, that gave us an 21 extension to that substantial completion date. 22 So at some point we were playing with 23 that to justify meeting a contractual date, but I 24 think in any time -- I think we were trying to --

that there was -- I don't remember, but I think

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1
    that was separate from other discussions about the
 2
    schedule, right, so we were keeping our contractual
 3
    position that we were in the schedule and we were
 4
    going to meet the schedule also.
5
                But I don't -- again, it is -- I don't
6
    remember the details of those discussions or
7
    those -- and when things happened and what is the
8
    chain of events that happened at the time.
9
                CHRISTINE MAINVILLE: If I tell you the
10
    V5 schedule that Alstom was working towards, does
11
    that --
12
                MANUEL RIVAYA:
                                 No.
13
                CHRISTINE MAINVILLE: -- ring a bell to
14
    you?
15
                MANUEL RIVAYA:
                                 No.
16
                CHRISTINE MAINVILLE:
                                       Okay.
                                              How did
17
    the City respond to the delay to the RSA date?
18
                MANUEL RIVAYA:
                                 I don't remember.
19
                CHRISTINE MAINVILLE: As that date was
20
    further delayed, so after the original delay which
21
    was, if you recall, from May 2018 to, I think,
22
    November 2018, as that is pushed even further back,
23
    do you recall what the City's stance is in respect
24
    of these delays? Was there increasing pressure?
25
    How did that translate, to your recollection?
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1 MANUEL RIVAYA: I don't remember. 2 There was a change in people at the project, and I 3 think what I remember is when we changed the 4 management team at the project level, there were 5 discussions with the City, but I don't remember how 6 the City responded to each one of those delays. 7 And I guess after -- I don't know 8 anything after December 2018. CHRISTINE MAINVILLE: And there were, 10 as you say, changes to the management team at 11 OLRTC, right? 12 MANUEL RIVAYA: Yes. 13 And that was --CHRISTINE MAINVILLE: 14 in particular, there were big changes in the summer 15 of 2018? 16 MANUEL RIVAYA: Was it summer? I don't 17 remember when it was. I don't know. 18 CHRISTINE MAINVILLE: Would it have 19 been shortly after the RSA -- the first RSA date 20 So that would have been May 2018, and so passed? 21 that was missed. 22 Were there resulting changes to the 23 management team then? 24 MANUEL RIVAYA: There were changes. 25 don't remember when the changes were, when we did

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1
    the changes. I don't remember the --
 2.
                CHRISTINE MAINVILLE: Let me phrase it
 3
               Was the fact of missing the original RSA
    this wav.
 4
    date, was that an event that prompted like an
 5
    effort to change up the management team, or was
 6
    that unrelated?
7
                MANUEL RIVAYA:
                                 I mean, there was -- I
8
    don't remember when we made the decision and when
9
    it was implemented and how, but obviously if there
10
    was -- we were not happy with how things were
11
    evolving in the project, we decided to make
12
    a -- there was a decision to make a change in how
13
    the project was delivered and by whom.
14
                CHRISTINE MAINVILLE: And that would
15
    have been at the Executive Committee level those
16
    decisions?
17
                MANUEL RIVAYA:
                                 Yes.
18
                CHRISTINE MAINVILLE:
                                       And so was
19
    there -- when new people were brought in, after
20
    the -- at least after the original RSA date that
21
    has passed, so later on in the project, like 2018,
22
    is there a change in direction being given from the
    Executive Committee to the new management team?
23
24
                MANUEL RIVAYA:
                                 The change in
25
    direction?
```

1 CHRISTINE MAINVILLE: Or tone in terms 2 of what is being conveyed about what needs to be 3 done? 4 MANUEL RIVAYA: I think different 5 people have different approach to how they 6 communicate things and how they position things, 7 and we make decisions based on the information that 8 is available to us. 9 So if there was a change, it is 10 probably because what was being told -- I mean, at 11 the time also there was a very senior person from 12 SNC who took the leadership under his 13 responsibility, the leadership of the project, and 14 how he communicated to us how the project was would 15 have made us take -- make a different decision or 16 approach or whatever, right. 17 But if there was a change in the tone, 18 it was because we were trying to -- or we were 19 following the lead of the Project Management Team, 20 and eventually more confidence that -- we had more 21 confidence that the new either dates or calendar or 22 whatever was more feasible than it was before. 23 So once everybody knew about, probably 24 it was a different tone. But again, I mean, I 25 don't remember the details. I'm speculating.

```
1
                CHRISTINE MAINVILLE: Well, so you are
 2
    saying the schedule may have at that point been
 3
    more realistic so there was a different tone.
 4
    Would there not have been additional pressure to
    get to -- to meet that new date, the new RSA date?
5
 6
                                 The pressure was always
                MANUEL RIVAYA:
7
    there.
            There was no change in pressure.
8
                CHRISTINE MAINVILLE:
                                       Okay. And who
9
    was this new SNC person you mentioned?
10
                MANUEL RIVAYA:
                                 Rupert Holloway.
11
                CHRISTINE MAINVILLE:
                                       Rupert Holloway,
12
           So what was the change that he brought, if I
    okay.
13
    understand your evidence correctly?
14
                MANUEL RIVAYA: So he -- so when he got
15
    on board, we made also another change to split the
16
    delivery of the systems from the delivery of the
17
    civil works to have a more dedicated -- or more
18
    expert and dedicated person to the systems side.
19
                And I guess he was more open, more
20
    transparent about how the project was. I don't
21
    remember.
               But I did note -- I did -- there was a
22
    change in the tone at the time with the new
23
    management and the City.
24
                                       In what way?
                CHRISTINE MAINVILLE:
25
                MANUEL RIVAYA:
                                 They seemed to work
```

1 together better. 2. CHRISTINE MAINVILLE: So he would have 3 been the one driving that as opposed to him being 4 directed to approach things in a different way; is 5 that fair to say? 6 MANUEL RIVAYA: I quess, yes. I mean, 7 he was a member of the Executive Committee before 8 he got the Project Director role, right. 9 mean, that is why that is kind of a blur how that 10 one thing transitioned into another. I don't think 11 there was a different direction. It was more 12 probably a personal approach. Probably he was more 13 aware of things that we were not aware. I don't 14 know. I mean, it is --15 CHRISTINE MAINVILLE: Okav. 16 MANUEL RIVAYA: The City also changed 17 their approach I think at the time, so -- just 18 because we changed the person. So I think it is a 19 new -- it was a new -- generally speaking, it was a 20 new approach to everything. 21 CHRISTINE MAINVILLE: So was it more 22 effective from your perspective? 23 MANUEL RIVAYA: More effective in which 24 sense? 25 Well, was it CHRISTINE MAINVILLE:

```
1
    working better with the City and being more -- just
 2
    more effective in terms of the project advancing
 3
    and in terms of relationships?
 4
                MANUEL RIVAYA: I think when he got on
5
    board, it was -- I don't know if it was more
 6
    effective.
                The relationship improved -- with the
7
    City improved, and we -- the messaging was that we
8
    were working together against a schedule.
                                                There
9
    were difficulties always coming from everywhere,
10
    but we were trying to work together against that
11
    new schedule. And the things certainly improved
12
    with the City at that time.
13
                CHRISTINE MAINVILLE:
                                       Did you
14
    understand whether things improved with the
15
    subcontractors, Alstom or Thales, or were there
16
    complaints coming out of them?
17
                MANUEL RIVAYA: I don't have -- I don't
18
    remember --
19
                CHRISTINE MAINVILLE:
                                       Okay.
20
                MANUEL RIVAYA: -- if there were more
21
    complaints or less complaints with Alstom.
                                                 We were
22
    trying -- we tried to do everything that -- I
23
    remember that we were trying to do as much as we
24
    could to have a clear picture of where we were, but
25
    also to make everybody accountable for what they
```

1 were saying or they were committing to. 2. CHRISTINE MAINVILLE: Was your 3 departure tied to this change in management? 4 MANUEL RIVAYA: To which change in 5 management? 6 CHRISTINE MAINVILLE: Well, the --7 MANUEL RIVAYA: Oh, my departure from 8 Dragados was a personal decision. 9 CHRISTINE MAINVILLE: Okay, when you 10 leave -- and you said December 2018, but did you 11 not stay until January 2019? 12 MANUEL RIVAYA: Yes, but I gave notice 13 in December 2018. 14 CHRISTINE MAINVILLE: Okay, when you 15 are leaving the project, was it known that the 16 new -- well, what was the new RSA date at that 17 point; do you recall? 18 MANUEL RIVAYA: I don't remember. 19 CHRISTINE MAINVILLE: Ultimately, it 20 was end of August 2019. Do you know if that was 21 what you were working towards? 22 MANUEL RIVAYA: No, no, it was not that 23 date. It was an earlier date. 24 Okay. And what CHRISTINE MAINVILLE: 25 did you think of the state of readiness at that

1 point in time when you left? 2. MANUEL RIVAYA: I think we were getting 3 I -- what I recall is that -- what I recall 4 is whatever the date was when I left, I thought it 5 was possible, provided that -- I mean, the two 6 main -- at the time, the two main, let's say, 7 challenges were with Alstom and Thales and both of 8 them getting to the end date. 9 So when I left, I think my perspective 10 was that the schedule was feasible. 11 CHRISTINE MAINVILLE: And can you speak 12 to testing and commissioning and, first of all, do 13 you recall what the original plans were for testing 14 and commissioning, when they were devised, and let me say this more specifically, for integration 15 16 testing or systems assurance? 17 MANUEL RIVAYA: No. 18 CHRISTINE MAINVILLE: You don't recall 19 what the plan was? 20 MANUEL RIVAYA: No. We had a number of 21 months there, but I don't know the specifics of 22 that plan. 23 CHRISTINE MAINVILLE: Did you know 24 whether there was a plan for trial running? 25 MANUEL RIVAYA: If there was a plan for

```
1
    trial running? I think so, but I don't -- it may
 2
    be -- I don't remember. No, I don't remember.
 3
                CHRISTINE MAINVILLE: You don't recall
 4
    who devised the criteria or who took charge of
5
    creating that plan?
 6
                MANUEL RIVAYA:
                                No.
7
                CHRISTINE MAINVILLE: Are you aware of
8
    how -- well, first of all, the integration testing
9
    phase became compressed; is that fair to say?
10
                MANUEL RIVAYA:
                                It became compressed?
11
    I cannot talk about that. I think -- no, I don't
12
    know if it became compressed or with a different
13
    strategy or how it became -- no, I cannot tell you.
14
                CHRISTINE MAINVILLE: Okay. But when
15
    you left, I don't think trains were able to run the
16
    whole line; is that your recollection?
17
                MANUEL RIVAYA: No, I think they were
18
    able to run the whole line, that the tunnel was
19
    connected and there were trains going from one
20
    way -- from one edge to another of the project.
                                                      So
21
    I don't think -- I don't know at which speed, at
22
    which level, but I think they were already able to
23
    go from one end to another.
24
                CHRISTINE MAINVILLE: Do you recall the
25
    contract or schedule, K1 more specifically, of
```

```
1
    Alstom's subcontract, requiring OLRTC to make the
 2
    entire Confederation Line available to Alstom for
 3
    integration testing by the RSA date? Would that
 4
    ring a bell?
5
                MANUEL RIVAYA:
                                 No.
 6
                CHRISTINE MAINVILLE:
                                       And I just
7
    wondered -- so if you don't recall, that is fine,
8
    but I wondered how that made sense that the line
9
    needed to be available for testing by the RSA date
10
    if presumably integration testing should occur
11
    prior to the RSA date?
12
                MANUEL RIVAYA:
                                 I don't remember the
13
    details of that sequence and what scopes were
14
    involved in each one of these dates.
15
                CHRISTINE MAINVILLE: Okay. Who would
16
    have been -- we spoke earlier about the technical
17
    team being involved in the technical aspects of the
18
    contract.
               Who would have been in charge of the
19
    provisions relating to testing and commissioning?
20
    Would that have been the same team?
21
                MANUEL RIVAYA:
                                 The same team as which
22
    one?
23
                CHRISTINE MAINVILLE: As the technical
24
    team that you mentioned that was involved --
25
                MANUEL RIVAYA:
                                 In the proposal?
```

1	CHRISTINE MAINVILLE: In the proposal,
2	yes.
3	MANUEL RIVAYA: Yes, it will be the
4	ones, let's say, planning for how the project had
5	to be delivered as a whole.
6	CHRISTINE MAINVILLE: So this is the
7	Roger person in particular, the Proposal Director
8	that we didn't recall the last name, right?
9	MANUEL RIVAYA: Yes.
10	CHRISTINE MAINVILLE: Do you recall
11	there ever being any discussions about a soft start
12	or a progressive start to operations?
13	MANUEL RIVAYA: When?
14	CHRISTINE MAINVILLE: At any time,
15	including very early on, so when the contract was
16	devised and then later on.
17	MANUEL RIVAYA: No, I don't recall
18	that.
19	CHRISTINE MAINVILLE: Do you recall
20	whether then the intention was always for the full
21	system to start on day one?
22	MANUEL RIVAYA: In the contract?
23	CHRISTINE MAINVILLE: Yes.
24	MANUEL RIVAYA: I think so, yes.
25	CHRISTINE MAINVILLE: Was that was

```
1
    there any expectation in terms of how long after
 2
    the RSA date operations would begin?
 3
                MANUEL RIVAYA: So RSA date is revenue
 4
    service availability?
5
                CHRISTINE MAINVILLE:
                                       Yes.
 6
                MANUEL RIVAYA: So I think the contract
7
    anticipated operations to start the day after
8
    revenue service availability, but I don't know,
9
    because I know in other contracts they have that
10
    ability to -- I mean, it was -- if it was the
11
    ultimate made decision of the City to when those
12
    operations could start. I don't remember the
13
    specifics of this contract.
14
                CHRISTINE MAINVILLE: And do you have
15
    experience in other projects enough to be able to
16
    say what may be standard in that respect and in
17
    terms of whether to have a progressive start or not
18
    in the case of a new system?
19
                MANUEL RIVAYA:
                                 I know that in
20
    other -- I cannot say specifically where, but I
21
    know that there were -- I remember having
22
    discussions about a more progressive approach to
23
    start operations and the City was reluctant to
24
    that.
25
                CHRISTINE MAINVILLE:
                                       The City was
```

1	sorry?
2	MANUEL RIVAYA: Reluctant.
3	CHRISTINE MAINVILLE: Reluctant?
4	MANUEL RIVAYA: Yes.
5	CHRISTINE MAINVILLE: So when would
6	that have been?
7	MANUEL RIVAYA: It was it would have
8	been in the last period of I mean, at the end of
9	when I was involved, or in the last year or so, the
10	last year and a half or so.
11	CHRISTINE MAINVILLE: So around 2018?
12	MANUEL RIVAYA: Yeah, but I don't know,
13	it was they were very I think they were very
14	high level discussions, think could have even been
15	side discussions but not formal discussions,
16	because our obligation in the contract was revenue
17	service availability.
18	CHRISTINE MAINVILLE: Right. Do you
19	recall whether it was OLRTC who raised this with
20	the City?
21	MANUEL RIVAYA: I don't remember.
22	CHRISTINE MAINVILLE: Do you recall
23	Alstom raising this issue about a soft start?
24	MANUEL RIVAYA: No.
25	CHRISTINE MAINVILLE: You don't recall,

```
1
    or --
 2.
                MANUEL RIVAYA: No, I don't recall.
 3
                CHRISTINE MAINVILLE:
                                       Okav.
                                              Do you
 4
    have any sense of whether there was an expectation
5
    in terms of the -- well, was there any provisions
 6
    made for or planning for a burn-in period or just
7
    any kind of prolonged period where the trains would
8
    do dry runs?
9
                MANUEL RIVAYA:
                                 There was -- yes, I
10
    think there was something in the plan to do burn-in
11
    of the vehicles, but I don't remember the details
12
    of that, of how that was planned at the time.
13
                CHRISTINE MAINVILLE:
                                       Okay.
                                              Do you
14
    have any recollection of what the expectations were
15
    in terms of when the system would be ready, what
16
    the level of reliability was expected to be in
17
    terms of, you know, whether the criteria were set
18
    at a particular level to basically inform how the
19
    system would be expected to perform by that point
20
    in time?
21
                MANUEL RIVAYA:
                                 No, I don't recall
22
    anything like that.
23
                CHRISTINE MAINVILLE:
                                       Okay.
                                              Do you
24
    have any views as to the suitability of the MSF for
25
    vehicle manufacturing?
```

```
1
                MANUEL RIVAYA: Do I have any opinion,
 2
    did you ask?
 3
                CHRISTINE MAINVILLE: Yes, or views.
 4
    Even as the project ultimately unfolded, do you
5
    have any views as to whether it was a suitable
 6
    facility ultimately for the work that was done
7
    there?
8
                MANUEL RIVAYA: We followed the lead of
9
    Alstom in that sense, and I think they told us they
10
    had done that in the past in other projects, and I
11
    don't see -- I don't see why it wouldn't be
12
    possible to do it the way they had it anticipated.
13
                So for me, it was not -- it shouldn't
14
    have been a problem.
15
                CHRISTINE MAINVILLE:
                                       Do you have any
16
    understanding of what Alstom's main challenges were
17
    on this project?
18
                MANUEL RIVAYA:
                                 I know -- I mean, there
19
    was -- they had -- there was a challenge -- I mean,
20
    this was the beginning of the project, getting
21
    approval from the City, from the technical advisor
22
    of the City of their car body steel components.
23
    There were a lot of discussions about that. We had
24
    to do -- or Alstom had to do a lot of reports
25
    around the materials that they were planning to use
```

1 there. 2. CHRISTINE MAINVILLE: Sorry, did you 3 say the boqey? 4 The car body steel. MANUEL RIVAYA: 5 Car body steel? CHRISTINE MAINVILLE: 6 MANUEL RIVAYA: Yes. 7 CHRISTINE MAINVILLE: Okay. 8 MANUEL RIVAYA: Yes. That is what I 9 It could have been a different thing, remember. 10 but that is -- that delayed the approval of the 11 design of the train of Alstom. 12 Then they had -- they changed their 13 approach to manufacturing and certifying the 14 vehicles, so there were different -- I mean, there 15 were -- there was -- the plan that they followed at 16 the end was different to the plan that they 17 follow -- they had planned, that they had in the 18 proposal. I think they wanted -- they had planned 19 originally to certify the vehicle in a facility 20 that they have in the U.S., and because they 21 changed that plan -- I think what I remember from 22 that time is that it was because the delays that 23 they had in the approval from the City of that 24 steel component of the car body. 25 And so they had -- since the plan was

```
1
    always to manufacture the vehicles in Ottawa and
 2
    they had to move all the tooling and everything to
 3
    Ottawa, I think they changed the approach, and they
 4
    proposed to certify the vehicles in that -- in the
5
    first -- in the west -- sorry, in the -- in the end
    of the project.
6
7
                So that is -- and then when the
8
    vehicles were manufactured and we started to test
9
    them or they started to test them and doing some of
10
    the testing in the project, then they started to
11
    identify problems in a number of elements. But I
12
    don't remember exactly which ones they were.
13
                CHRISTINE MAINVILLE:
                                       Okay. And do you
14
    recall the move of the manufacturing for the first
15
    two LRVs, which is what I think you are
16
    referencing, do you recall that having an impact on
17
    validation testing in that there was a plan
18
    initially to have early -- I think you have called
19
    it commissioning, early validation testing of the
20
    prototype vehicles prior to production of the
21
    entire fleet; does that sound --
22
                MANUEL RIVAYA: Yes, I think the word
23
    that I use is certification, and it could be
24
    validation, even though --
25
                CHRISTINE MAINVILLE:
                                       Yes, sorry,
```

```
1
    certification, yes.
 2.
                MANUEL RIVAYA: Yes, so there was a
 3
    plan -- a change in that plan. I don't remember
 4
    the original plan and the final plan, because right
5
   now I don't know if it was France, U.S. and Canada,
 6
    so it was the three locations, so I don't know
7
    exactly how they planned to do it.
8
                CHRISTINE MAINVILLE: Do you recall
9
    ultimately that there was no early certification or
10
    validation tests done, that it was done quite late?
11
                                 I recall that there was
                MANUEL RIVAYA:
12
    a delay in that certification process. If I am not
13
    wrong, part of the issue was that delay in the
14
    approval of the design that also triggered, let's
15
    say, a delay of all the setup of -- I mean, the
16
    start of manufacturing and all that tooling -- all
17
    the preparation work.
18
                CHRISTINE MAINVILLE:
                                       Do you recall
19
    whether it was also delayed because of the track
20
    availability?
21
                MANUEL RIVAYA: For the certification?
22
                CHRISTINE MAINVILLE:
23
                MANUEL RIVAYA: No, I don't recall
24
    that.
25
                CHRISTINE MAINVILLE:
                                       Okay.
                                              Do you
```

```
1
    recall some delays to the test track, the test
 2
    track being made available late?
 3
                MANUEL RIVAYA:
                                 No.
 4
                CHRISTINE MAINVILLE: Do you know
5
    whether the original intention was for the test
    track to mainly be used by Alstom?
6
7
                MANUEL RIVAYA: I don't remember.
8
    don't think -- I don't think we had -- I don't
9
    remember. I don't think we had a test track
10
    originally planned here, but I may be wrong.
11
                CHRISTINE MAINVILLE:
                                       So initially, it
12
    was going to be just the entire line made available
13
    for various testing?
14
                MANUEL RIVAYA: I don't remember.
15
                CHRISTINE MAINVILLE:
                                       Okav. And in
16
    case it refreshes your memory, I believe the test
17
    track ultimately was towards Blair Station, in that
18
    section of the track, potentially --
19
                                 I mean, I am looking
                MANUEL RIVAYA:
20
    right now at -- I don't remember which station. I
21
    am looking at where the MSF was, but I think it was
22
    south of the line and it was to the east, if I am
23
    not wrong.
24
                                       Do you recall
                CHRISTINE MAINVILLE:
25
    that the MSF was delivered late?
```

```
1
                MANUEL RIVAYA: No, it was not
 2
    delivered late.
 3
                CHRISTINE MAINVILLE: Was it delivered
 4
    complete?
5
                MANUEL RIVAYA: To whom?
 6
                CHRISTINE MAINVILLE:
                                       To Alstom?
7
                MANUEL RIVAYA:
                                 I think so.
8
                CHRISTINE MAINVILLE: So you think it
9
    was delivered in a suitable condition for what was
10
    intended when it was to be delivered, like train
11
    manufacturing?
12
                MANUEL RIVAYA:
                                 Oh, yes, yes, it was.
13
    It was because I remember walking into the MSF and
14
    everything was finalized. It had already been
15
    transferred to Alstom, and there was not a lot of
16
    activity going on there at the time.
                                           So I don't
17
    think there was a delay in the supply of our -- in
18
    the delivery of the MSF.
19
                CHRISTINE MAINVILLE:
                                       Am I right -- or
20
    do you have any information about whether the
21
    procurement of rolling stock is done differently
22
    nowadays, so if there is now a tendency to put it
23
    under the responsibility of the owner as opposed to
24
    ProjectCo?
25
                MANUEL RIVAYA:
                                       Now, in most, if
                                 Yes.
```

1 not all, of the contracts like this one, the 2 responsibility of the supply of the rolling stock 3 is on the owner's side. 4 CHRISTINE MAINVILLE: And do you know 5 why that is or why that is now the tendency? 6 MANUEL RIVAYA: We are not ready to 7 take that risk anymore. At least in the contracts 8 that I am participating and the ones that we are 9 looking at, we are not ready to take the risk of 10 rolling stock supply anymore. 11 CHRISTINE MAINVILLE: Because it is a 12 very risky area in a project? 13 It is a risky area, and MANUEL RIVAYA: 14 there is no -- we have no ability to control or 15 mitigate that -- I mean, we can -- in other areas 16 we can change supplier, we can do other things in 17 the rolling stock. Usually once you are tied to 18 one supplier, there is no ability for us to change 19 or to really have any influence in how the deliver 20 or perform their works. So we are subject to 21 whatever they want to tell us or do or perform or 22 if they want to spend more money or less or be 23 faster or they have other priorities. We can't do 24 anything. 25 And then so how CHRISTINE MAINVILLE:

1 does that work in practice? For instance, if the 2 City in this case had been responsible for the 3 rolling stock, how would OLRTC have worked with the 4 City on that? How would that have translated? 5 MANUEL RIVAYA: I mean, all this now is 6 speculation, right, but they would have committed 7 to a delivery schedule for the rolling stock. 8 will have planned around that. We will -- I mean, 9 this is how it is working in other projects here. 10 They will -- we will have our interface with them, 11 ICVs, et cetera. And the contract is managed in a 12 different way. They have the obligation to supply 13 vehicles that meet the requirements, and we have 14 the obligation to integrate those vehicles in our So it is a different risk allocation and a 15 16 different way of working. 17 CHRISTINE MAINVILLE: Do you think 18 there should have been earlier involvement of the 19 operator, OC Transpo, in this case in terms of 20 being involved in the design phase earlier on? 21 MANUEL RIVAYA: I think it is always 22 better if you have -- in this type of project, one 23 of the things that I have learned with time is that 24 if you cannot -- you cannot design the project 25 holistically without the operator's input.

```
1
    operator is important, yes.
 2.
                CHRISTINE MAINVILLE: Were there things
 3
    that were delayed here because of that element not
 4
    having been there right from the get-go, or was
 5
    there any --
 6
                MANUEL RIVAYA: I cannot speak to that.
7
    I don't know.
8
                CHRISTINE MAINVILLE:
                                       How would you
9
    characterize Alstom as a maintainer and its level
10
    of experience in that regard?
11
                MANUEL RIVAYA:
                                 I cannot speak to that.
12
                CHRISTINE MAINVILLE:
                                       Okay.
                                              Were you
13
    involved in the maintenance subcontract to Alstom?
14
                MANUEL RIVAYA:
                                 No.
15
                CHRISTINE MAINVILLE:
                                       No, because that
16
    would have been with RTM?
17
                MANUEL RIVAYA:
                                 Yes.
18
                CHRISTINE MAINVILLE:
                                       In terms of
19
    payment milestones, am I right that the milestones,
20
    the payments did not correspond to the scope of
21
    work for the given -- the amount of the payment
22
    didn't correspond to the scope of work for any
23
    given milestone?
24
                                 It depends how you look
                MANUEL RIVAYA:
25
    at it.
            I think that, again, if I am not wrong, if
```

I am not wrong, I mean, it is -- what I remember
from this project is that there was an amount that
was to be financed by the project private partner
during construction, and the contract had -- we had
to choose amongst a number of milestones for the
repayment of part of that certain debt.

So the clients gave us -- I mean, I wouldn't say that the milestones were associated with scope. The milestones were associated with -- but I don't -- or not -- let me correct this.

The milestones were -- the amount of the milestones, I don't know if they were associated with the scope. They were associated with the financing mechanisms. So the scope had to be done as defined by the milestone, and then there was a payment associated with that. But the payment was not for that -- I don't think -- I don't think or I don't remember that the payment had to be for the cost of that scope. The payment had to do with, let's say, the whole amount of the debt that could be incurred.

CHRISTINE MAINVILLE: And did that appropriately incentivize OLRTC? Like was there any disconnect there in terms of the money that had

```
1
    been inputted and the work to be done? Do you see
 2
    any issues about the way it was done?
 3
                                I don't think there
                MANUEL RIVAYA:
 4
    were any issues with that, no. I mean, we knew
5
    that -- we had milestones that were linked to the
 6
    schedule, obviously, and we wanted to meet those
7
    milestones, but I don't think it had a negative
8
    impact on how it was -- they were, let's say,
9
    selected and designed and how we performed the
10
    works.
11
                CHRISTINE MAINVILLE:
                                              Do you
                                      Okay.
12
    recall changes made to the milestones?
13
                MANUEL RIVAYA:
                                I recall that there
14
    were changes made to the milestones. I don't
15
    recall the specifics of the changes.
16
                CHRISTINE MAINVILLE: Okay.
                                              Do you
17
    recall what they were made in response to, or how
18
    they came about?
19
                MANUEL RIVAYA: No, I know there were
20
    different things in the project linked to different
21
    things and changes were made and negotiated, yes.
22
                CHRISTINE MAINVILLE: Do you recall
23
    I think you were there for RTG's first submission
24
    in respect of substantial completion which was
25
    rejected by the City and the independent certifier.
```

1	MANUEL RIVAYA: I was not there.
2	CHRISTINE MAINVILLE: You don't think
3	you were there, okay.
4	MANUEL RIVAYA: When you say
5	"substantial completion", do you mean the
6	submission that we or that RTG or OLRTC had
7	achieved substantial completion?
8	CHRISTINE MAINVILLE: Yes.
9	MANUEL RIVAYA: No, I was not there.
10	CHRISTINE MAINVILLE: Yes, sorry, I
11	think you are right, later in 2019.
12	Do you recall a point in time when the
13	independent certifier was not receiving schedule
14	updates from RTG?
15	MANUEL RIVAYA: I don't recall that.
16	CHRISTINE MAINVILLE: Do you recall a
17	point in time when OLRTC was no longer able to
18	provide accurate schedules to RTG?
19	MANUEL RIVAYA: No, I don't recall
20	that.
21	CHRISTINE MAINVILLE: Do you recall any
22	risks relating to firsts, if I could put it that
23	way, on this project, so things that were being
24	done for the first time that made this
25	project or that added risk to the project? For

1 instance, was OC Transpo a new operator of this 2 kind of light rail system? 3 MANUEL RIVAYA: Sorry, can you --4 CHRISTINE MAINVILLE: Yes. 5 MANUEL RIVAYA: I don't understand the 6 question. 7 CHRISTINE MAINVILLE: Okay, let me 8 start with this question, my last question. 9 your perspective, was OC Transpo coming in as a new 10 operator with no experience in terms of light rail 11 transit? 12 MANUEL RIVAYA: Yes. So they were 13 converting their drivers, past drivers' fleet into 14 LRT drivers, yes. 15 CHRISTINE MAINVILLE: And would you see 16 that as a risk in terms of the project? 17 I think -- yes, I think MANUEL RIVAYA: 18 it is -- it is not the same when you are opening a 19 new line in a system that is consolidated with an 20 operator that has operations that are consolidated 21 in the rail system, on a rail system, than opening 22 a new line in a system that is not an LRT and 23 doesn't have any rail components. So I think there 24 is an element of risk there. 25 CHRISTINE MAINVILLE: And are there any

```
1
    other things like that that you can point to on
 2
    this project where you think it added risk that
 3
    perhaps other projects don't have?
 4
                MANUEL RIVAYA:
                                 I think that -- I mean,
    the risk -- again, this is not my scope, but I
5
 6
    think the risk of transferring -- I mean, shutting
7
    down a system, a vast system, and opening a new
8
    system in -- I mean, in one night, that
9
    conceptually was -- and, you know, I think that it
10
    wasn't like that at the end, but that was the
11
    original plan, is very challenging.
12
                CHRISTINE MAINVILLE: And how would you
13
    describe that challenge? What is it that makes it
14
    challenging?
15
                MANUEL RIVAYA: Well, I mean, you have
16
    the system -- the system, it is not my area of
17
    expertise, operations, but at the end, you need to
18
    have -- there is a human factor, a human component,
19
    of people trained and used to the system and how it
20
    responds and how it has to be operated, that there
21
    is a learning curve that needs to happen in any
22
    system.
23
                So I think that is one of the main
24
    challenges.
25
                CHRISTINE MAINVILLE:
                                       Do you think
```

1 that, in hindsight, that ought to have been better 2 provided for in the contract, and so, you know, 3 some mitigation measures for that risk, you know, 4 in terms of how the system was going to open? 5 there anything that could have been provided for 6 that you think would have helped mitigate this? 7 I don't know. MANUEL RIVAYA: 8 not my area of expertise how to start operations 9 and maintenance. I think that from a construction 10 perspective, I mean, at some point we need to 11 achieve substantial completion and demonstrate that 12 the revenue service demonstration has to be 13 performed, but from an operations and maintenance 14 and how the system goes live, I think that is a 15 different area of expertise and is another 16 discipline. 17 CHRISTINE MAINVILLE: And was there 18 involvement of this particular area of expertise in 19 the negotiation of the original agreement, to your 20 knowledge? I guess it wouldn't have been OLRTC's 21 contract. 22 MANUEL RIVAYA: No, I don't know the 23 details of that. I was focussed on the 24 construction side. 25 CHRISTINE MAINVILLE: Right. Do you

- have other -- or any lessons learned that you might
  share or anything else that you think would be
  relevant for us to know looking at this project in
  hindsight?
  - MANUEL RIVAYA: I mean, this project and every project are very complex. It has a lot of -- there are a lot of stakeholders involved in the project. There are many different interfaces with different, again, stakeholders, entities.
  - We think -- or I think that the fixed price approach is very risky for contractors, and we have learned that. So anything that involves a period where we can progress with a client to look into the details of the design, of the permits, utilities, approvals, getting the operator involved with enough time and getting alignments to -- with the client in how the project is delivered and which are the different phases and approach to that delivery I think is helpful.
  - Then, again, I told you before, rolling stock suppliers is a very high risk for a construction company or for a contractor, so it is a risk that should stay with the client.
  - And maybe others, but I think it is clear that the risk allocation after the fact is

1 not optimal for anyone at the end of the day. 2. CHRISTINE MAINVILLE: And the last 3 Would you say there were too many question. 4 interfaces in hindsight perhaps on this project, 5 too many different systems to integrate and too 6 many entities, perhaps? 7 Well, too many MANUEL RIVAYA: 8 interfaces -- this project would have many 9 interfaces. I think there were too many 10 constraints about how to deal with the challenges 11 or in the contract at the end of the day. So there 12 were several challenges that we had to deal with as 13 we went through them. 14 We are not going to change the number 15 of interfaces of the contract because they are at a 16 higher level or a lower level, but at the end, you 17 need to do all the scope in many of these projects. 18 The scope has to be built and the interfaces 19 It can be internal to one entity or 20 external to different entities, but the technical 21 aspects of the interfaces are the same. 22 CHRISTINE MAINVILLE: And just in terms 23 of the challenges you just mentioned that were 24 encountered, are there any that you think might 25 have been preventable or dealt with differently?

1 MANUEL RIVAYA: I mean, there is 2 always -- there are always ways to do things 3 In this particular case, I mean, how we 4 dealt with, for example, what I told you about the 5 approval of the design of the rolling stock or how 6 some of the approvals of the designs were dealt by 7 the different entities or how approvals were given 8 to different solutions, how the whole issue around 9 the sinkhole was dealt by -- I mean, it is -- I 10 think at the end, with a different framework, it 11 could have been addressed differently. 12 CHRISTINE MAINVILLE: And I kind of 13 want you to elaborate on that, but I know we are 14 out of time. I don't know if you might just 15 say --16 MANUEL RIVAYA: No, what I would say is 17 that it was -- it became a very confrontational --18 at some point it became a very confrontational 19 relationship between all the different parties 20 involved, which probably got everybody stuck on 21 their positions and polarized more the 22 relationship, right. 23 So in a project as complex as this 24 one -- and I mean, it is what it is, right. But in 25 a project as complex as this one, a different

```
1
    approach by a different -- yes, approach by
 2
    everybody, a different setup, probably would have
 3
    been more helpful to deal with all those challenges
 4
    instead of polarizing positions.
5
                CHRISTINE MAINVILLE:
                                       There needed to
6
    be greater partnership?
7
                MANUEL RIVAYA:
                                 Yes.
8
                                        I'll stop there,
                CHRISTINE MAINVILLE:
9
    and again, I know we are out of time, but if --
10
    Anthony, do you have any other questions?
11
                                  No, I don't. I think
                ANTHONY IMBESI:
12
    you covered everything.
13
                CHRISTINE MAINVILLE:
                                        Jean-Claude, is
14
    there anything you wanted to ask?
15
                JEAN-CLAUDE KILLEY:
                                      No, we're okay.
16
                CHRISTINE MANVILLE: Okay, great, so we
17
    can go off record.
18
19
    -- Adjourned at 12:04 p.m.
2.0
21
22
23
24
25
```

1	REPORTER'S CERTIFICATE
2	
3	I, DEANA SANTEDICOLA, RPR, CRR,
4	CSR, Certified Shorthand Reporter, certify:
5	That the foregoing proceedings were
6	taken before me at the time and place therein set
7	forth, at which time the witness was put under oath
8	by me;
9	That the testimony of the witness
10	and all objections made at the time of the
11	examination were recorded stenographically by me
12	and were thereafter transcribed;
13	That the foregoing is a true and
14	correct transcript of my shorthand notes so taken.
15	
16	
17	
18	Dated this 25th day of April, 2022.
19	
20	$\sim$ 1
21	
22	
23	NEESONS, A VERITEXT COMPANY
24	PER: DEANA SANTEDICOLA, RPR, CRR, CSR
25	

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