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August 24, 2023

Horse Heaven Wind Farm v.

EF-210011

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BEFORE THE STATE OF WASHINGTON
ENERGY FACILITY SITE EVALUATION COUNCIL

In the Matter of the)	
Application of:)	
)	
)	
Scout Clean Energy, LLC, for)	Docket No. EF-210011
Horse Heaven Wind Farm, LLC,)	
)	
)	
Applicant.)	

ADJUDICATIVE HEARING
VERBATIM RECORD OF PROCEEDINGS

VOLUME 7

August 24, 2023

Lacey, Washington

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person in Lacey, Washington, with the Court
Reporter. All other participants are
appearing remotely via Microsoft Teams.

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1 BE IT REMEMBERED that on Thursday,
2 August 24, 2023, at 621 Woodland Square Loop Southeast,
3 Lacey, Washington, at 8:45 a.m., before the Washington
4 Energy Facility Site Evaluation Council; Kathleen Drew,
5 Chair; and Adam E. Torem, Administrative Law Judge, the
6 following proceedings were continued, to wit:

7
8 <<<<< >>>>>

9
10 JUDGE TOREM: All right. Good
11 morning, everyone. It is going to be our Day 7
12 housekeeping session, August 24th. We have a couple
13 issues today: I think really the question about
14 schedule and the Yakama Nation's witnesses. And then,
15 second, the map that you have, Mr. Aramburu, for today.

16 So if we have little bit of echo going on, if we
17 can figure that out, that'd be great.

18 All right. I think that might be solved.

19 Shona Voelckers, are you on?

20 There you are. Good morning.

21 MS. VOELCKERS: Good morning, Your
22 Honor.

23 JUDGE TOREM: What's happening at
24 the Yakama Nation as far as the witnesses?

25 MS. VOELCKERS: Your Honor, we are

1 going to try to contact Councilman Wallahee in the
2 middle of today and have not -- because we have not yet
3 been able to contact him this morning. So I apologize
4 we don't have more of an update, but our plan is to try
5 to speak with him in the middle of today.

6 And I think -- you know, I understand that this is
7 short timing, so I think it's best to plan on him for
8 tomorrow rather than today. And I also -- you know,
9 when we do speak with him, we'll try to see if -- if he
10 would just prefer that we have the parties stipulate to
11 acceptance of his testimony in the same way that we did
12 for the fire chief or if he still wants to try to
13 testify tomorrow. I'd like the opportunity to speak to
14 him about that first. So I have not -- I have not
15 yet -- not had a conversation with him.

16 JUDGE TOREM: Okay. And when you do
17 this afternoon, hopefully, then if this question of the
18 stipulation based on timing is there, we'll have to ask
19 the Council members, same with -- they did with Fire
20 Chief Click, about questions.

21 And I've still been rolling around in my mind as
22 to the necessity, if possible, for a supplemental
23 hearing time. And as we get your unavailability
24 notices, we might figure out when that might happen.

25 My concern with that is, as much as we've had not

1 all eight Council members in any of these days, we
2 might get even fewer supplemental, because we just
3 don't know what their availability is.

4 But, again, the videos, if you've looked at any of
5 them, are pretty good quality for capturing what's
6 going on. And staff behind me and around the building
7 has done a great job making sure what's on the screen
8 kind of corresponds to who's talking, so -- and it's as
9 good as anything the Brady Bunch was able to do years
10 ago, right? So we're looking okay on -- on how the
11 videos transmit the truth of what's happening in the
12 hearing and picks up, I think, both the words and the
13 spirit.

14 So if we need to take Councilman Wallahee and make
15 sure he's available for actual questions, I don't know
16 if he was going to speak in his own language as well.
17 Because I think, Ms. Voelckers, frankly, that's pretty
18 powerful witness testimony from the Yakama Nation, and
19 I don't want to deprive any witness of that ability as
20 well.

21 MS. VOELCKERS: Thank you, Your
22 Honor. I know in speaking with him before that he did
23 have more that he wanted to say to the Council than
24 what is in his written testimony. I also understand
25 that his loss earlier this week was an immediate family

1 member, and so I continue to try to just do my best to
2 see what he would like to do moving forward, and I will
3 update you as soon as I have something to share.

4 JUDGE TOREM: Okay. Run by him the
5 chance of potentially that supplemental hearing.
6 Because, frankly, I'm advocating for that just to make
7 sure we have a complete record. And just even if we
8 hadn't cut off those other two days at the front of the
9 hearing, I think we'd still be facing some of these
10 issues. Because the COVID question; people die; babies
11 are born; life goes on outside of EFSEC. I think we
12 all know that. So we'll just take life as it happens
13 and try to repair things as we go.

14 So, again, my condolences to the family there. If
15 we can work with it after a grieving period and we get
16 his full attention, that might be better. So it's --
17 it's another option unless he feels like today's the
18 day or tomorrow's the day.

19 MS. VOELCKERS: Thank you, Your
20 Honor. I -- I would expect that today does not feel
21 like the day, but I will -- I will convey all that to
22 him and appreciate the acknowledgment that we are all
23 human here in this process.

24 So I also just wanted to note that in -- in
25 general scheduling -- and actually I do share what I

1 think what I'm hearing is that the two days that we
2 struck were not -- not the cause for any rescheduling
3 here. I don't expect that I will need the full half
4 hour that I've estimated for today's witnesses, and so
5 I just want to flag, I may still have a few questions
6 depending on what is brought out, but in preparation
7 for today, I wanted to share that so that hopefully
8 that would take a little pressure off or, you know,
9 allow some -- some time to others that -- that may have
10 questions.

11 JUDGE TOREM: I'm, frankly,
12 optimistic we can get through all of Brynn Guthrie and
13 then Mr. Apostol and Mr. Poulos today rather than
14 carrying to tomorrow. I'm optimistic, but we'll see
15 how the questions go. That would leave us a little
16 more time for the Don McIvor testimony tomorrow and
17 maybe going back and resolving the question that you've
18 asked about the availability of the Fish and Wildlife
19 witnesses that are behind the EFSEC firewall at some
20 limit and figure that out.

21 So we're working that issue this morning and
22 trying to sort out what the -- what the directors and
23 just EFSEC policy would be on having them actually in
24 front of the Council as opposed to just the limited
25 depositions that you took. So we may have an answer

1 for that today as well.

2 MS. VOELCKERS: Okay. We will --

3 JUDGE TOREM: Okay.

4 MS. VOELCKERS: -- have our letter
5 to the Council in probably mid-morning. It's being
6 finalized.

7 JUDGE TOREM: That would be great.
8 That would formalize the request and put it all out
9 there for Ms. Bumpus and, you know, the AGs to review
10 and know exactly the question they're trying to answer.

11 All right. Let's turn to -- Mr. Aramburu, you had
12 that map being developed. I don't -- I don't know if
13 it came to my e-mail this morning. I haven't really
14 checked a whole bunch of EFSEC e-mails today.

15 Has that been circulated to the parties?

16 You're on "mute." We can't hear you. You're on
17 "mute."

18 Just proving we're all human, right? Okay.

19 MR. ARAMBURU: There. That's been
20 proven many times already today.

21 So we -- we provided to the parties yesterday
22 afternoon two supplemental exhibits for -- from
23 Mr. Apostol and then cross-examination exhibits for
24 Mr. Poulos. And I hope the parties got them.

25 And I do apologize for the late delivery of these

1 materials. We have been working under extreme pressure
2 with these late-filed documents, including the Moon
3 memo. And so we've done our best in that regard to get
4 materials out to the parties. So -- so that's what
5 we've done.

6 **A couple of other housekeeping matters, if you**
7 **want to talk about those too.**

8 JUDGE TOREM: Sure. I just want to
9 confirm I just got an indication in the chat that Lisa
10 Masengale confirms we did get the map, so not a
11 concern.

12 What's next on your list?

13 MR. ARAMBURU: Okay. You should
14 have received several materials. The cross-examination
15 exhibits for Mr. Poulos and the supplemental maps for
16 Mr. Apostol. So sounds like you received those.

17 JUDGE TOREM: We did.

18 MR. ARAMBURU: Okay. Good. Good.

19 And so just to let you know, we're continuing to
20 work with Mr. Click to get some answers to Ms. Drew's
21 questions, or question to him yesterday. I believe
22 he's still fighting fires in Spokane.

23 We are still working on the response to the Wiley
24 materials. We expect to have a rebuttal witness. But
25 please understand, we are looking at the last two weeks

1 in summertime. People are not available. And a lot of
2 them not available on short notice because of other
3 things.

4 So, similarly, we are continuing to look for a
5 rebuttal witness to the Kobus addendum to his
6 testimony, or his supplement to his testimony, whatever
7 we're calling it. We're continuing to work on that.
8 But we have the same problem. Late-summer, short-
9 notice kind of situation.

10 JUDGE TOREM: No worries. And,
11 again, everything I said to the Yakama Nation about
12 potentially having that supplemental hearing date, if
13 this week's pressures don't -- don't work out, we may
14 have some other options, Mr. Aramburu, to make sure we
15 can get as much as we can.

16 MR. ARAMBURU: And I do want to put
17 a comment -- I don't know if it's an objection or it's
18 a motion, but I do want to address an issue.

19 Ms. Guthrie and Mr. Apostol are on this morning as
20 visual witnesses. We are doing our best with limited
21 materials to try to put together that testimony and the
22 cross-examination testimony.

23 Earlier in the hearing, we did point out the
24 difficulty of dealing with visual materials on a
25 fragmented situation with -- with counsel and with

1 members of the -- legal counsel and members of the
2 Council, itself. Those concerns continue, and we would
3 renew our request for the opportunity for an in-person
4 hearing where these materials can be easily passed
5 around, easily described, those kinds of things. And
6 it is just a concern.

7 We would request, should the -- should you decide
8 to provide extra time, we really do need some extra
9 time to -- to deal with this very important visual
10 material. We had hoped, as we were preparing, that we
11 would be able to provide individual papers, oversize
12 drawings, other things to the Council members. Time
13 has just not permitted that to happen. I think that's
14 a much more effective way to have the Council review
15 these materials.

16 And just to be quite frank, having received the
17 Moon memo and the other materials, that has just not
18 been possible, and we think we've been prejudiced by
19 that.

20 So to the extent that we -- that you do find it
21 appropriate to provide additional time, we would like
22 some additional attention to those visual issues.

23 So I wanted that request to be on the record.

24 JUDGE TOREM: And perhaps,
25 Mr. Aramburu, those supplemental exhibits of full scale

1 might be submitted and be available for the Council in
2 deliberations at the scale that you're wishing. So
3 that may be something where we could work out -- if
4 they're admitted today and they can have a larger
5 version in deliberations, that's -- that's not unusual
6 trial practice, I think just to provide an exhibit in a
7 courtroom and then a larger one, at least that
8 giant-size one that they have in an in-person courtroom
9 to have the jury take back.

10 So in this case, I think we could do something
11 analogous if the other parties would stipulate it's the
12 same exhibit, just larger so that it brings out the
13 scale and the -- I guess the definition that you're
14 looking for. We can talk about that as well.

15 MR. ARAMBURU: And I do -- that is
16 something we're planning on doing, and I was hoping to
17 have that set of documents, at least 11 by 17 or more,
18 kind of available, and it would have to be distributed
19 individually to Council members. So it was -- it was
20 quite a process. And we just have not had the time to
21 do that.

22 We do continue to think, although it's looking
23 increasingly unlikely based upon things here, that we
24 could get everybody in the same room and look at these
25 visual materials together on a screen, have both

1 Ms. Guthrie and Mr. Apostol address those issues in a
2 larger scale where everybody can ask questions and that
3 kind of thing. But -- and I continue to make that
4 request. But I understand your ruling.

5 JUDGE TOREM: All right. Well,
6 again, that issue's definitely left the Horse Heaven
7 barn. So it's not going to come back in any other
8 change as far as the in person. That's been dictated
9 not by me but by others. So noted again. It's in the
10 record plenty of times, Mr. Aramburu. So I don't know
11 what else I can tell you.

12 Did any other parties have a housekeeping item for
13 this morning? Because I know we just have a couple
14 minutes left.

15 Mr. McMahan.

16 MR. McMAHAN: Yes, Your Honor.
17 First of all, we will of course object to any attempt
18 to reopen testimony where the deadline has long
19 expired, so I'll just put that out there.

20 Secondly, we do have an objection to the map that
21 was submitted with the Apostol testimony. We could
22 either wait to air that objection once the Council
23 is -- is with us, and we can take that up then, or if
24 you would like, we can deal with that objection now.

25 JUDGE TOREM: I think timing-wise

1 we'll need to wait till we get to the Apostol
2 testimony. So we can go forward on that question then
3 when it's introduced. Unless -- if you and
4 Mr. Aramburu want to have that as the preliminary to
5 Mr. Apostol's testimony before he even has it in front
6 of him, I'll leave that to you guys as to the best way
7 to present that.

8 MR. McMAHAN: I'm fine taking it up
9 when we're in session.

10 JUDGE TOREM: Okay. I imagine we're
11 starting to get a number of the Council members
12 joining. So at 9:00 here, which is all of a minute
13 away, we'll go ahead and start, see what other
14 questions they might have or ex parte disclosures, and
15 then we'll get started with Ms. Guthrie, who I see
16 there with Ms. Schimelpfenig.

17 MR. ARAMBURU: And may I suggest
18 that with regard to the exhibits for Mr. Apostol, that
19 we address that when -- when -- at the beginning of his
20 testimony?

21 JUDGE TOREM: Certainly.

22 MR. ARAMBURU: And we can introduce
23 those. And if there's questions that Mr. McMahan has
24 or objections, then I think we can deal with that at
25 that time.

1 JUDGE TOREM: Certainly,
2 Mr. Aramburu. I will endeavor to -- when I give you
3 the 30,000-foot description of his testimony, you can
4 introduce the additional exhibits beyond the 5100
5 through 5104 that were originally part of his
6 testimony.

7 Well, Council members, good morning. It's 9:00.
8 As you can hear, we're just finishing up a couple of
9 preparation tips for today.

10 It is Day 7 of the hearing. And, as usual, we
11 start out the day with some optimism that we might get
12 a lot more done than is actually on the schedule, and
13 then we'll be overcome by events as usual as well.

14 So this morning we have Brynn Guthrie. And we'll
15 swear her in shortly. Then we're going to, I hope,
16 start on the visual witness, visual impacts witness
17 from the Apostol cross-exam testimony that Tri-Cities
18 C.A.R.E.S. is presenting today. There are some new
19 exhibits that are coming in for visual things. And if
20 you overheard, we may have some evidentiary objections,
21 so bear with us as we get started on that testimony.

22 And then Mr. Poulos, another witness regarding
23 visual impacts, is going to start his testimony today,
24 and I think there's some optimism, rather than carrying
25 over to Friday morning, we may have that taken care of

1 as well.

2 Other items that you should be aware of.

3 Mr. Jerry Meninick is going to testify tomorrow. He's
4 on the schedule there as a time to be determined.

5 And Council Member Wallahee, Yakama Nation's going
6 to reach out to him this afternoon and see whether he
7 can be rescheduled to Friday. But there's also a
8 possibility that we'll be setting up, as you've been
9 requested for your September availability, a
10 supplemental hearing of a few hours, not a full day,
11 but whatever time we think we need, and that may be the
12 time where Council Member Wallahee is able to provide
13 testimony in person rather than simply relying on the
14 written prefiled testimony that's in the packets that
15 everybody received.

16 So that's sort of where we're setting things up.
17 And I believe Council members may have a small
18 deliberative-type session, informational session at the
19 end of this morning's morning just so we can bring you
20 up to speed on where plans are for scheduling
21 deliberations and anything else we need to know before
22 the end of the formal adjudicative hearing tomorrow and
23 get any procedural questions you might have on what we
24 do after tomorrow, waiting for post-hearing briefs and
25 the rest of those kind of things.

1 All right. So let me have somebody formally call
2 the roll so we know who's here, and then I'll ask you
3 about the -- any ex parte disclosures or contacts you
4 may have had between yesterday and during the public
5 comment session yesterday.

6 Will the staff please call the Council member
7 roll.

8 MS. GRANTHAM: Certainly.

9 EFSEC Chair.

10 COUNCIL CHAIR DREW: Kathleen Drew,
11 here.

12 MS. GRANTHAM: Department of
13 Commerce.

14 COUNCIL MEMBER OSBORNE: Elizabeth
15 Osborne, present.

16 MS. GRANTHAM: Department of
17 Ecology.

18 COUNCIL MEMBER LEVITT: Eli Levitt,
19 present.

20 MS. GRANTHAM: Department of Fish
21 and Wildlife.

22 COUNCIL MEMBER LIVINGSTON: Mike
23 Livingston, present.

24 MS. GRANTHAM: Department of Natural
25 Resources.

1 COUNCIL MEMBER YOUNG: Lenny Young,
2 present.

3 MS. GRANTHAM: Utilities &
4 Transportation Commission.

5 COUNCIL MEMBER BREWSTER: Stacey
6 Brewster, present.

7 MS. GRANTHAM: For the Horse Heaven
8 project: Department of Agriculture.

9 And Benton County.

10 COUNCIL MEMBER BROST: Ed Brost is
11 here.

12 JUDGE TOREM: All right. Good
13 morning. I thought I might have heard our agriculture
14 rep trying to chime in, but he'll let us know. He was
15 at the public comment hearing last night, and hopefully
16 he has time today to join us for some or all of the
17 session.

18 Council members, did you have any ex parte
19 disclosures or contacts that you needed to make today?

20 All right. Not seeing any.

21 So let's move on to calling the parties.

22 For the applicant today?

23 MS. SCHIMELPFENIG: Good morning,
24 Your Honor. Emily Schimelpfenig for the applicant.
25 And also here is Tim McMahan and Willa Perlmutter.

1 JUDGE TOREM: All right. Thank you.
2 I think I remember you said Ms. Stavitsky might be away
3 toward the end of the hearing.

4 For the County, Benton County.

5 MR. HARPER: Morning, Your Honor.
6 Ken Harper with Z. Foster.

7 JUDGE TOREM: Good morning.
8 Counsel for the environment.

9 MS. REYNEVELD: Good morning. Sarah
10 Reyneveld, Your Honor, here for counsel for the
11 environment.

12 JUDGE TOREM: And Yakama Nation.

13 MS. VOELCKERS: Good morning, Your
14 Honor and EFSEC Council. Shona Voelckers along with
15 Ethan Jones and Jessica Houston for the Yakama Nation.

16 JUDGE TOREM: Thank you.

17 And for Tri-Cities C.A.R.E.S.

18 MR. ARAMBURU: Rick Aramburu
19 representing Tri-Cities C.A.R.E.S., intervenor in these
20 proceedings.

21 (Witness Brynn Guthrie
22 appearing remotely.)
23

24 JUDGE TOREM: All right. And we
25 have Brynn Guthrie as our first witness this morning.

1 Ms. Guthrie's exhibits -- Ms. Schimelpfenig, let me
2 know if any of these are -- I'm missing them -- are
3 1000 -- one triple zero -- T; 1001 -- I believe there's
4 a revised edition. And then later on, for response and
5 rebuttal testimony, 1021 and 1036.

6 And that should be what's showing in the Council
7 members' SharePoint folder for this witness.

8 Ms. Schimelpfenig, did I miss any?

9 MS. SCHIMELPFENIG: No, Your Honor.
10 Thank you.

11 JUDGE TOREM: All right. So,
12 Ms. Guthrie, good morning.

13 **THE WITNESS: Good morning.**

14 JUDGE TOREM: All right. We have a
15 court reporter, as you can see, to my right, taking
16 everything down, so we've asked witnesses to speak a
17 little slower and more deliberately than you might
18 otherwise.

19 I'm going to have you raise your right hand. I'll
20 swear you in. And Ms. Schimelpfenig can maybe give a
21 two- or three-sentence summary orienting everybody to
22 what you're testifying about. We'll adopt these
23 exhibits and turn you over for cross-exam.

24 If you'll raise your right hand.

25 ////

1 BRYNN GUTHRIE, appearing remotely, was duly
2 sworn by the Administrative
3 Law Judge as follows:
4

5 JUDGE TOREM: Do you, Brynn Guthrie,
6 solemnly swear or affirm that all of the prefiled
7 testimony contained in the exhibits I referenced and
8 any of the answers you'll give today to questions from
9 attorneys and Council members will be the truth, the
10 whole truth, and nothing but the truth?

11 **THE WITNESS: I do.**

12 JUDGE TOREM: All right. Thank you.

13 Ms. Schimelpfenig, I'm going to admit those
14 exhibits that we noted and ask you to give us a quick
15 view of where we're going.

16 (Exhibit Nos. 1000_T_Revised,
17 1001_Revised, 1021_R, and
18 1036_R admitted.)
19

20 MS. SCHIMELPFENIG: Thank you, Your
21 Honor.

22 Ms. Guthrie is going to be testifying about visual
23 impacts and the visual impact assessment completed by
24 the applicant. She sponsored Section 4.2.3 of the
25 application and Appendix Q, both related to visual

1 impacts.

2 Thank you.

3 JUDGE TOREM: All right. And I
4 believe we have scheduled for cross-examination
5 Mr. Aramburu for Tri-Cities C.A.R.E.S. and
6 Ms. Voelckers for the Yakama Nation.

7 Have the two of you worked out who's going to go
8 first?

9 MR. ARAMBURU: Well, I think I'm
10 going to go first, unless Ms. Voelckers wants to.

11 MS. VOELCKERS: Please proceed.
12 Thank you.

13 JUDGE TOREM: All right.
14 Mr. Aramburu, the floor is yours.

15
16 CROSS-EXAMINATION

17 BY MR. ARAMBURU:

18 Q Okay. I am going to try to share some exhibits today,
19 and this is an area in which angels fear to tread, but
20 I'm -- I'm going to do that, so...

21 MR. ARAMBURU: Okay. Hopefully we
22 have successfully screen shared.

23 Can the parties see on screen? And can they see
24 it as it gets bigger and smaller?

25 JUDGE TOREM: Yes, we can.

1 MR. ARAMBURU: Okay. Thank you.

2 Thank you.

3 Q (By Mr. Aramburu) Okay. So, Ms. Guthrie, just a
4 couple of background issues here for you.

5 When did you first get started in this project?

6 A I first became aware of this project in approximately
7 October 2021, around the time I joined Tetra Tech, my
8 current employer.

9 Q So -- so you're an employee of Tetra Tech doing the
10 visual impact analysis for this application, correct?

11 A That's the first time I became involved in it. That's
12 correct.

13 Q Okay. I wanted to -- as we do our inquiries today, I
14 kind of wanted to set the stage a little bit.

15 How many times have you been down to the
16 Tri-Cities to look at the Horse Heaven Hills and this
17 project?

18 A Sure. As I began reviewing the materials in
19 preparation for this process, I conducted two field
20 visits to the project area over the course of
21 approximately three days.

22 Q Okay. And so I'd just like to talk a little bit about
23 kind of the general landforms down there, if I may.

24 And I'm going to try to bring up a map here. And
25 what you're looking at, Ms. Guthrie, is the section of

1 the draft EIS, the visual impact assessment portion of
2 the draft EIS.

3 Do you see that on your screen?

4 **A I do.**

5 Q Okay. And that was prepared for EFSEC by SWCA
6 Environmental Consultants in April of 2022.

7 Do you see that?

8 **A I see that.**

9 Q Okay. And have you had a chance to review this?

10 **A I have.**

11 Q Did you incorporate it at all into the work that you
12 did?

13 **A No. No. Our work was focused on the application
14 materials.**

15 Q And so you didn't examine or rely on this document at
16 all?

17 **A No.**

18 Q Okay. Okay. But you've read it?

19 **A I've -- yes, I have read through it. That's correct.
20 But I did not prepare this document.**

21 Q Okay. But you've read it before today, correct?

22 MS. SCHIMELPFENIG: Objection, Your
23 Honor. Asked and answered.

24 JUDGE TOREM: I guess that's
25 sustained, because he did just ask the same question.

1 She's read it.

2 Q (By Mr. Aramburu) Okay. And I wanted to talk a little
3 bit about kind of the general landforms that exist
4 in -- in the community. And I'm putting up -- and as I
5 refer to this document I'm going to refer to PDF pages
6 because it's easier. And I hope you can see the PDF
7 pages. PDF Page 46.

8 **A Yes, I see that.**

9 Q See that.

10 So just kind of the general landforms of south
11 Benton County in general, can you see my cursor?

12 **A I can.**

13 Q Okay. So Benton County. This is the southern part of
14 Benton County, southwest Washington.

15 There's an area here adjacent and south-southwest
16 of the Yakima River. And to acquaint everyone, this is
17 the Yakima that runs in a southeast direction, and
18 it -- let's see. Excuse me. That -- that is -- okay.

19 So the -- the Yakima runs in -- so the Yakima is
20 over here, correct?

21 **A That looks correct, yeah.**

22 Q Okay. The Yakima runs into the Columbia, just right at
23 Columbia Point, in Richland; is that right?

24 **A Yes, I believe that's right.**

25 Q And -- and there's an area just to the southwest of the

1 Columbia.

2 And can you describe what the improvements are or
3 the developments are in that area?

4 **A In the southwest as your cursor indicates currently?**

5 Q In this -- in this area in here. What's the activity
6 that's in here? What's the development activity?

7 **A I would characterize that area as developed, urban,**
8 **suburban areas. There are open spaces primarily**
9 **focused along the riverfront but also golf courses,**
10 **public parks, sports amenities, neighborhoods, shopping**
11 **centers, et cetera.**

12 Q Let me scroll down a little bit more and see if we can
13 find another document that might be more useful to us
14 here.

15 Okay. This might be a better map to -- to
16 describe this.

17 So this is PDF Page 53 of the visual impact
18 assessment.

19 So let me just go back for a moment here.

20 So the Yakima runs into the Columbia at this
21 location. And then this -- does this aerial photograph
22 show the development area around southwest Columbia?

23 (Audible videoconference
24 disruption.)

25 ////

MR. ARAMBURU: I hope that's not me.

**THE WITNESS: Could I have you
repeat that question, please?**

Q (By Mr. Aramburu) And does this aerial photograph
generally show the development which is found southwest
of the Columbia?

A It appears to, though I -- I don't know off the top of
my head the date of the aerial photograph.

Q Okay. Let's assume that --

A But, in general, it appears to.

Q Okay. And in this area here, we see the kind of
familiar pattern of residential development; is that
right?

A Yes.

Q And then more towards the northerly portion here,
there's more commercial areas, the industrial areas.
Is that --

MS. SCHIMELPFENIG: Objection, Your
Honor. Vague. You can't identify what types of
activity is going on from this, like, level of zoom.

MR. ARAMBURU: No, I understand.
I'm just asking for the witness's recollections on
her -- when she was in the area.

Q (By Mr. Aramburu) Is that about right?

JUDGE TOREM: The objection's

1 overruled.

2 You can answer, Ms. Guthrie.

3 **THE WITNESS: Sure. Yeah. To my**
4 **recollection, I think that's -- that's a correct**
5 **characterization.**

6 Q (By Mr. Aramburu) And is this, topographically, is
7 this pretty flat area down in here --

8 A No. Not as I recall. The -- the residential
9 developments begin to kind of take on a more terraced
10 formation as they move to the south, up into that kind
11 of ridgeline.

12 Q Right in here?

13 A And to the northwest, as I recall.

14 Q Okay.

15 A The two begin to kind of merge together, if that makes
16 sense.

17 Q Okay.

18 A But as you get closer to the river, it does become
19 flatter, as I recall.

20 Q Okay. Thank you.

21 Now, then continuing southwest, we get into the
22 area of the Horse Heaven Hills, do we not?

23 A Correct.

24 Q And is that topographically different from the areas to
25 the northeast?

1 **A Not significantly different. You see more of the butte**
2 **formations, ridgelines, et cetera.**

3 Q Okay. And --

4 **A In terms of landform.**

5 Q -- we see some of that on our -- on our map here over
6 in -- in this area, kind of in the left side of the
7 map?

8 **A Correct. Right. You get more -- more topography and**
9 **relief.**

10 Q Okay. And -- and so there's an elevation change here.
11 And then if we continue to go south -- we've had
12 some testimony about this -- we get into dryland
13 agriculture; is that right?

14 **A Yes.**

15 Q Okay. And this map shows the -- the drawings or the
16 locations of the turbines; is -- is that correct?

17 **A Yes. I believe that's correct.**

18 Q So I just wanted to -- we've got some -- a number of
19 visuals, stimula- -- "stimulations" -- simulations --
20 oh, boy -- that -- that are found here in the draft
21 EIS. And I just wanted to kind of go through and --
22 and talk about some of these. This is --

23 MS. SCHIMELPFENIG: Your Honor, I'm
24 going to object at this time. This is the SWCA DEIS
25 visual impact assessment, not the visual impact

1 assessment completed by the applicant as part of the
2 application.

3 JUDGE TOREM: What's the nature of
4 the objection?

5 MS. SCHIMELPFENIG: Relevance.

6 JUDGE TOREM: Overruled on that
7 ground. I think it's highly relevant that Council's
8 going to see this and already has in the draft EIS.
9 The fact that it's a SEPA-sponsored visual, I don't
10 think -- Mr. Aramburu can use it. If this is an
11 accurate one or not, he can ask her about it. We're
12 not getting into SEPA, I know, but these pictures are
13 out there, and if they're accurate enough to go in the
14 DEIS, they're accurate enough for cross-examination
15 today.

16 MS. SCHIMELPFENIG: Then I'd like
17 to --

18 JUDGE TOREM: But Mr. Aramburu --

19 MS. SCHIMELPFENIG: -- object on
20 lack of clarification. He has not clarified whether
21 the witness has had any role in preparing these
22 simulations.

23 JUDGE TOREM: It's entirely possible
24 she hasn't, but they're prepared by somebody with
25 enough credibility to put them in a DEIS. As long as

1 Mr. Aramburu doesn't ask about the SEPA process, I'm
2 going to continue to overrule those objections. He can
3 show these pictures and ask his questions.

4 MS. SCHIMELPFENIG: All right.
5 Thank you, Your Honor.

6 JUDGE TOREM: Mr. Aramburu, go
7 ahead.

8 Q (By Mr. Aramburu) Okay. So there are 13
9 representative viewpoints, RVs, that are found in the
10 visual assessment in the DEIS.

11 Do you recall that?

12 A Yes.

13 Q And those same 13 representative viewpoints are the
14 ones that you've included in your work?

15 A Same thing.

16 Q Same thing? Okay.

17 Same -- same representative viewpoints, correct?

18 A Correct.

19 Q Okay. So -- so I'm trying to focus in here just on
20 what the -- the -- kind of the Horse Heaven Hills
21 looked like. And I don't want to use that one, because
22 that's the one that's got the turbines on it.

23 So now we're -- we're kind of over in the
24 southwest area here, and that -- does that accurately
25 depict the -- the Horse Heaven Hills in this photograph

1 that's taken from across the Columbia, north of Wallula
2 Gap?

3 **A Yes, from this viewpoint, I think that's accurate, yes.**

4 Q And in this view we have some wind turbines.

5 Do you know what those are?

6 **A If I'm not mistaken, I believe that's the Nine Canyon**
7 **wind project.**

8 Q Okay.

9 **A And then I see maybe some communication towers or what**
10 **have you.**

11 Q Okay. Okay. But then let's -- let's move along to
12 some other areas here.

13 So this is one exhibit, top exhibit, existing
14 condition. Second one, Option 1.

15 Same Option 1 that you're using in your work; is
16 that correct, Ms. Guthrie?

17 **A Yes.**

18 Q Okay. So --

19 **A Although now I would point out that it's been --**
20 **Option 1 has been modified per the recent memo.**

21 Q Okay. We'll get to that, Ms. Guthrie.

22 So we're just kind of looking at landforms here.
23 And, again, let's go down to the -- a couple of the
24 other landforms down to the south.

25 This is -- this is Viewpoint 3 looking southwest.

Does this indicate some of the landforms that are found in the area, the hills in this area?

A Yes, that's correct.

Q And --

A This is --

Q And then --

A -- Cannon Beach, I believe.

Q -- again -- yes.

And -- and then as we go farther south, then we get into dryland wheat country, do we not?

A Yes, I believe so.

Q So just to kind of summarize -- and feel free to disagree -- we have the area near the Columbia River that has a residential-commercial development. We have the Horse Heaven Hills that's kind of a second topographic feature. And then beyond that is really some flat country / bench country up on the top of the Horse Heaven Hills, mainly in agriculture.

That was kind of a lot. If you disagree with any of that, let me know.

A I don't disagree. I would add, however, that the features surrounding Badger Mountain to the east and west are also fairly important in the context of my testimony. So just some additional context I would add.

1 Q Okay. Good. Good.

2 And there's -- and we have some photos of that,
3 don't we, in here?

4 **A We do.**

5 Q Okay. Okay. So now we're down to PDF Page 64, and
6 we're looking at RV 5. And we go down here. We can --
7 we can kind of hone in on where RV 5 is. And RV 5
8 is --

9 **A Can I interrupt you at this point? Forgive me. This**
10 **image has been updated in the most recent application.**
11 **And I think it would be valuable to show that updated**
12 **view. And that would be in the revised application.**
13 **These photographs were reshot.**

14 Q I understand they may have been reshot, but -- and
15 you'll get a chance to talk about those on redirect
16 examination. So you'll get your chance on that.

17 So -- and but these -- these photographs have
18 "Tetra Tech" on them, don't they? These are --

19 **A Yes.**

20 Q -- Tetra Tech materials?

21 **A Yes. If I'm not mistaken, I believe these were part of**
22 **the original application.**

23 Q Okay. Okay.

24 Now, so, again, now we're -- we're at Viewpoint 5,
25 taken from the residential areas below, looking back up

1 on the -- the Horse Heaven Hills. And so what we see
2 are these typical views of the Horse Heaven Hills shown
3 here?

4 **A Yes.**

5 Q Okay. And this same photograph appears in your work,
6 does it not?

7 **A It appeared in the original application that was then**
8 **updated and revised.**

9 Q Okay. Thank you.

10 Okay. Now, there's some other viewpoints that we
11 have here that are taken from the south to north. And
12 there are several of those included in this analysis,
13 in your analysis.

14 However, there are very, very few people that
15 actually see this -- this view, the No. 6 view,
16 which -- which looks from the south to the north over
17 the dryland wheat; is that right?

18 **A There are -- there would be fewer viewers. That's**
19 **correct. Although, you know, we have viewpoints, for**
20 **example, from I-82, which would -- would be a high**
21 **number of viewers.**

22 But, yes, in general, the views from the south
23 would have fewer -- a fewer number of viewers. But the
24 project would be --

25 Q So --

1 **A -- closer.**

2 Q So can we say that the views from the south would be of
3 substantial less interest to the Council than the ones
4 to the north?

5 **A No, I don't think that's accurate.**

6 Q And why are these views important?

7 **A As I said, there -- there are residences to the south**
8 **that are -- that ought to be considered. And the**
9 **project would be seen from relatively closer distances,**
10 **and so I think they're -- they're just as worthy of**
11 **being considered.**

12 Q Okay. Well, let's get down here at No. 6, looking --
13 looking north.

14 Say two-mile radius of where this is taken. How
15 many residences are there?

16 **A I don't know the answer to that, sir.**

17 Q Okay. Would you say two or three?

18 **A I don't know.**

19 Q You don't know. Okay.

20 And have you driven up there and seen where
21 residences are in that community?

22 **A I did drive in that area, yes. And, yeah, the**
23 **residences are certainly dispersed.**

24 Q And they're principally farmhouses?

25 **A Rural residential.**

1 Q Okay.

2 A And we're also characterizing views from typical
3 drivers, et cetera. So the residences aren't the only
4 views that we're considering.

5 Q Okay. So over here on PDF Page 67 now, and we're
6 looking at that view. Has some power lines in the --
7 in the foreground.

8 Is this a more or less typical view of the Horse
9 Heaven Hills from north to south?

10 A Can I have you zoom out a bit, please?

11 Q Oh, certainly. You tell me. I'm getting kind of good
12 at this, so if you need a different view of this, I'm
13 more than happy to provide it, Ms. Guthrie.

14 A If I can have you scale them to 100 percent. That's
15 how they're intended to be viewed.

16 Q I understand that. I'm using them for a different
17 purpose, though.

18 So, 8A, the PDF Page 67 of the document, is taken
19 from where?

20 A I believe that is in the vicinity of a Canyon Lakes, if
21 I'm not mistaken, at the edge of a residential
22 development.

23 Q Okay. So --

24 A On the leading edge.

25 Q And so I'm -- I want to kind of expand in on the

1 photograph here, which is 8A, just to kind of look at
2 the characterization. And these are the Horse Heaven
3 Hills over here? And I've expanded the -- the
4 photograph.

5 Are these Horse Heaven Hills over here?

6 **A Yes.**

7 Q Now, let me go down to another drawing here.

8 And let's look at PDF Page 69. This is RV 9.

9 This is from Benton City?

10 **A Yes.**

11 Q And, again, I'm expanding your photograph, and I know
12 you may have some concerns about that.

13 But I'm just kind of looking at the general
14 landforms here.

15 Is the landform we see in this expanded photograph
16 here a good representation of the geomorphology of the
17 Horse Heaven Hills?

18 **A Yes, from -- from this distance for sure.**

19 Q Okay. And it's 25 miles long, so it changes a bit,
20 correct?

21 **A Sorry. What is 25 miles long?**

22 Q The project is 25 miles long, is it not?

23 **A Yes. Just clarifying.**

24 Q Okay. Okay. So -- so I just want to look at this --
25 this -- this photograph and ask you a question.

1 So often in the Northwest -- let me revise the
2 question.

3 What are the views like from the ridgelines up
4 here on the top of Horse Heaven Hills?

5 **A Looking to the north, then?**

6 Q Yes.

7 **A Is that the question?**

8 Q Yes.

9 **A Sure.**

10 So from what I recall when I was there on-site
11 doing my fieldwork, you are overlooking kind of a
12 valley formation below, with the -- the Tri-Cities
13 developed areas and then the confluence of the river
14 kind of flows through in the -- in the background.

15 Q So at this location, what's the difference? What's the
16 elevation gain we're seeing from the -- from this
17 location up at the top?

18 **A I sure don't know that off the top of my head. I**
19 **believe the top of Badger Mountain is approximately**
20 **1500 feet. But I -- I don't know the elevation of**
21 **the -- the top of the butte in the image that you're**
22 **showing right now.**

23 Q Okay. And as -- I don't want to go and go back and go
24 through each one of these, these photographs.

25 But -- but it is my observation that the ridgeline

1 of -- of the Horse Heaven Hills does not contain a lot
2 of development.

3 Is that correct?

4 **A It does contain some development. There are, as we**
5 **saw, communication towers. In some cases there's**
6 **residential development. In -- in some places. But**
7 **predominantly it's agriculture use, and some portions**
8 **are recreation areas.**

9 Q Okay. But -- but in the state of Washington, where
10 there's a nice view available, people like to go up to
11 the ridgelines and build a big house and look over
12 the -- the views.

13 Is that your experience?

14 **A I can think of examples of that in the area.**

15 Q Well, my question is this. We don't have that kind of
16 perched residential development on the ridgeline of the
17 Horse Heaven Hills; is that correct?

18 **A On the Horse Heaven Hills, there is some development.**
19 **And on the adjacent buttes to the north, there is**
20 **certainly residential development.**

21 Q Can you name one place where you can see a residence
22 from the valley looking up on the Horse Heaven Hills?

23 **A Not off the top of my head, no.**

24 Q Okay. There's some communications towers, some power
25 lines up there; is that right?

1 **A Yes.**

2 Q But generally no signs of civilization, correct?

3 MS. SCHIMELPFENIG: Objection, Your
4 Honor. Vague.

5 JUDGE TOREM: Sure. Mr. Aramburu,
6 "signs of civilization." Could you give us a
7 definition.

8 Q (By Mr. Aramburu) Okay. You've said there's some
9 power lines and some things like that. But -- but are
10 there any other sort of signs of civilization? That
11 is, destruction of the natural landscape that might
12 take place.

13 **A I'm going to say that for all of the viewpoints that we**
14 **identified and used for our study, there are signs of**
15 **development in -- in all of them. So it's just a part**
16 **of the character of the area that it's -- it's**
17 **developed and developing.**

18 Q None of the farmhouses are perched up on the ridgeline,
19 are they?

20 **A I don't recall any on the -- on the ridgeline**
21 **especially to the north.**

22 **As you move -- excuse me -- farther east, there**
23 **does become development on some of the ridgelines, yes.**

24 Q Okay. But in the particular section here near Benton
25 City there, that's natural character, is it not?

1 **A Yes.**

2 Q Okay. And would it be fair to call this an undeveloped
3 area?

4 **A There's not development on the Horse Heaven Hills**
5 **currently. But obviously we're viewing it from a**
6 **developed area, and that is part of the view. So,**
7 **again, if you could zoom out to, say, 100 percent as**
8 **the simulations are intended to be viewed, then we can**
9 **see the full context taking this example.**

10 Q Okay.

11 **A The character of this view is developed. And it has**
12 **the landforms as the backdrop.**

13 Q I understand.

14 But I'm talking to you about the -- about the
15 backdrop landform.

16 And that is not a developed area, is it?

17 **A No, it doesn't appear to be, in the -- in this image.**

18 Q Okay. Okay. We're moving down the way a little bit,
19 and over here at the lower part of the photograph, we
20 have a Viewpoint 10.

21 Do you see that?

22 **A Yes.**

23 Q Okay. And that's taken looking more or less southwest
24 to the ridgeline?

25 **A Yes.**

1 Q Okay. And I'm going to zoom in here. And, again, I
2 understand that you're taking things in context. But
3 I'm just really looking at the hills here.

4 So the Horse Heaven Hills. And this is Page 70 of
5 the -- of the PDF. And this is representative
6 viewpoint -- let's go down here and find it. And this
7 is -- this is -- this is No. 10, again looking
8 southwest. Okay.

9 So -- so this is another view of the area. And I
10 just want to -- and I understand it's taken from the
11 road, and I understand all that. But I want us to
12 focus on the Horse Heaven Hills, themselves. Okay?

13 Now, we're -- we've expanded this a bit. We've --
14 looking at this hillside along here, going into a
15 backdrop over here further, Horse Heaven Hills all
16 along here.

17 Is that a fair characterization of the Horse
18 Heaven Hills?

19 **A Those are the Horse Heaven Hills. Correct.**

20 Q Okay. Now, in this photograph, I don't -- I don't see
21 any development up there.

22 Am I right about that?

23 **A In this particular view, I don't see development on the**
24 **ridgeline, no.**

25 Q Okay. Okay. I don't see a single house up here.

1 We got something over here. Do you know what that
2 is?

3 **A I -- I don't off the top of my head. Could be a**
4 **communication tower, something like that.**

5 Q I was looking -- looking at this area here.

6 **A Yes.**

7 Q Okay. So we're seeing -- I don't know -- what, three,
8 four miles of the Horse Heaven Hills here? Okay.

9 What do you think, Ms. Guthrie? Three or four,
10 five miles in this photograph?

11 **A That's probably fair. Five is probably stretching it.**

12 Q Okay. Five miles.

13 Five miles with no development of any kind in the
14 Horse Heaven Hills, correct?

15 **A Again, in the context of this photo, you do see**
16 **development in your foreground.**

17 Q I understand that. I understand that.

18 But -- but on the hills, themselves, there is not
19 development?

20 **A In this image, there's not development on the hilltop,**
21 **except for the tower that we saw to the left.**

22 Q Okay. And the Benton County Comprehensive Plan
23 actually intends to protect this kind of condition on
24 the Horse Heaven Hills, does it not?

25 **A It does intend. We include that language in the**

1 application materials. In the -- in the VIA, I believe
2 it's listed. Yeah, there are aspirational goals for
3 the -- the ridgelines.

4 Q Okay. And I'm -- I apologize, but I don't want to try
5 to get too fancy about bouncing around between --
6 between documents.

7 The updated ASC, at Page 4-59, does set out the
8 comprehensive plan goals, does it not?

9 A Can I have you bring that up on screen, please, then?

10 MR. ARAMBURU: Can I get some help
11 from staff on this? I did not bring this up, 'cause
12 I'm just trying to not spend too much time screwing
13 around with screen sharing here.

14 Q (By Mr. Aramburu) I can read it to you. I think you
15 have it in front of you, don't you?

16 Don't you have the ASC in front of you?
17 Ms. Guthrie?

18 A I can try to bring it up on this side here.

19 Can you repeat the page number, please?

20 Q 4-59.

21 A Where are the page numbers on here?

22 MS. SCHIMELPFENIG: Mr. Aramburu, if
23 you can also work on trying to pull it up. We're
24 trying to get it on our end, but I think it would be
25 helpful for us all to be looking at the -- making sure

1 we're looking at the same thing. And I know that
2 that's a hassle, but, you know, I just -- I think it'll
3 be helpful for us on our end so we don't have to figure
4 out where we're at.

5 MR. ARAMBURU: Okay. I'm trying --

6 JUDGE TOREM: And, Council members,
7 just want to let you know Ms. Masengale was looking for
8 it, but it's not readily available with the documents
9 she had prepped for today, so we're going to rely on
10 the parties that want to talk about it.

11 MS. COHOE: It'd be --

12 MR. ARAMBURU: No. It's -- it's in
13 the ASC.

14 MS. COHOE: The updated one, or the
15 red-liner?

16 MR. ARAMBURU: Okay. I think I've
17 done it.

18 MS. COHOE: Wait. Do you want
19 Page 490?

20 MR. ARAMBURU: Okay. Can everybody
21 see this?

22 (Background dialogue.)

23
24 MR. ARAMBURU: Can you see this?

25 MS. COHOE: Share.

MR. ARAMBURU: Oh, share. Oh. Oh.

MS. SCHIMELPFENIG: Not at this
time, no.

MS. COHOE: And this screen.

MR. ARAMBURU: Okay. Now.

**THE WITNESS: Thank you so much,
Mr. Aramburu.**

MR. ARAMBURU: I'm going to get
better at this.

Q (By Mr. Aramburu) Okay. So we have up on the screen
the updated application for site certification, do we
not?

A Yes.

Q Okay. And you're responsible for Section 4.2.3,
"Aesthetics," beginning on Page 4-40; is that right?

A Yes.

Q Okay. Now, let's go down here. See if I can find
4- --

Okay. Now we're at the place. So I'm referring
you to, Ms. Guthrie, to Page 4-59 of the amended site
certification application. And I -- my question to you
was -- was whether or not Benton County has -- has
policies to protect these -- these ridgelines that
we've just been looking at. And -- and I was referring
you particularly here to this page.

1 And does this correctly set forth the -- the goals
2 of Benton County?

3 **A Yes. As they were at the time of the writing of this**
4 **document.**

5 Q Okay. And PL Goal 3 has been to conserve visually
6 prominent naturally vegetated steep slopes and elevated
7 ridges that define the Columbia Basin landscape and are
8 uniquely a product of the Ice Age floods.

9 Would you say that that applies to the ridgelines
10 of the Horse Heaven Hills that we've just been looking
11 at?

12 **A I'm aware that BLM has protected lands on the Horse**
13 **Heaven Hills, and the other areas are predominantly**
14 **privately held.**

15 Q Well, that wasn't the question. The question was:

16 Does this goal, PL Goal 3, to conserve visually
17 prominent naturally vegetated steep slopes and elevated
18 ridges, would that apply to the Horse Heaven Hills?

19 **A This is the goal as it was stated when this document**
20 **was prepared, yes.**

21 Q My question is: Would you consider that Goal No. 3
22 applies to the Horse Heaven Hills that we have just
23 been looking at?

24 **A In addition to other -- other similar landforms and**
25 **ridges, yes.**

1 Q Okay. And what are those other landforms and ridges?

2 A I would say, for example, Badger Mountain was conserved
3 and is a public recreation area, for example.

4 Q Any others?

5 A I believe Goose Hill to the west and north of Badger
6 Mountain would qualify.

7 There's also a ridgeline to the east of Badger
8 Mountain, but I don't know that it has a name.

9 Q Okay. Any others?

10 A No. I can't think of any others.

11 Q Those -- those are isolated elements, are they not?

12 A I wouldn't characterize them as isolated. They're, you
13 know, part of a string, if you will, of landforms
14 within the area.

15 Q Okay. So in our -- looking at what the Horse Heaven
16 Hills presents at this time, would you say the County's
17 been pretty successful in conserving the visually
18 prominent naturally vegetated steep slopes and elevated
19 ridges along the Horse Heaven Hills?

20 A I would say yes.

21 Q Okay. Okay. Good.

22 I want to talk a little bit about the project,
23 itself. And I'm going to go back to the -- let's go
24 back to the DEIS now.

25 Okay. So we're now looking at PDF Page 53 of the

1 DEIS visual assessment.

2 Is this a fair representation of the project?

3 **A Yes. This shows the Option 1 turbine layout.**

4 Q Okay.

5 **A And acknowledging that that's since been revised per**
6 **the, I guess what's been called the Moon memo. So this**
7 **has been updated and revised.**

8 Q Okay. Okay. Understood.

9 Now, just so we get some kind of a context here,
10 from the -- I'm going to call it the northwest corner
11 of the project over here just not too far from Benton
12 City, over here to the far eastern point, approximately
13 how many miles is that?

14 **A I think it's in the neighborhood of 25 miles.**

15 Q Okay. And -- and I'm going to call it the depth of
16 the -- of the project. Let's say this area through
17 here.

18 How many miles is that?

19 **A I couldn't say specifically. Maybe two miles, three**
20 **miles.**

21 Q Okay. Okay. Well, and we've got a scale here, so we
22 can use the scale if we need to figure it out more
23 precisely, correct?

24 **A Yes.**

25 Q Okay. And there's been discussion of the Nine Canyon

1 project.

2 Are you familiar with Nine Canyon?

3 **A I'm familiar with Nine Canyon, yes.**

4 Q Okay. Is Nine Canyon shown on this -- on this -- on
5 this map? This is Figure 9, representative viewpoint
6 locations, PDF Page 53.

7 **A Correct. As I'm reading the legend, the existing
8 turbines represent Nine Canyon in the -- so the yellow.**

9 Q So these are the -- the Nine Canyon turbines, correct?

10 **A I believe that's right.**

11 Q Okay. If you're up here in Benton City, can you see
12 the Nine Canyon turbines?

13 **A I don't know for sure.**

14 Q Okay. Okay. So what other wind projects have you
15 worked on that are 25 miles long?

16 **A I'm currently working on a number of related wind
17 projects in the state of Washington in Garfield and
18 Columbia Counties. Taken together, they're over 25
19 miles long.**

20 Q Is that the lower Snake River project?

21 **A Yes, sir.**

22 Q Okay. And Garfield and Columbia Counties, that's --
23 that's sort of due east, slightly north of here?

24 **A Yeah, I think that's right.**

25 Q Are there any substantial population centers near the

1 lower Snake River project that see the project?

2 **A There are developed communities there, yes.**

3 Q Okay. Dayton being the closest?

4 **A And other cities, Pomeroy, et cetera.**

5 Q Pata- -- I'm sorry. What was the last -- last one?

6 **A Sorry. Pomeroy.**

7 Q Dayton and Pomeroy, correct?

8 **A Mm-hmm.**

9 Q I thought you mentioned a third one. I'm sorry.

10 **A No, sir.**

11 Q Okay. If I'm standing on Highway 12 going out of
12 Dayton, can I see the lower Snake River project?

13 **A Sir, we're just beginning our investigation, so I can't**
14 **answer those questions here.**

15 Q Okay. But you've been along Highway 12 in Dayton,
16 correct?

17 **A Yes.**

18 Q Okay. Okay. So let's go to Pomeroy, then.

19 If you're standing on the main street in the west
20 side of Pomeroy, Washington, and you are looking west,
21 can you see any lower Snake River turbines?

22 **A I don't recall.**

23 Q In fact, are lower Snake River turbines visible from
24 Highway 12?

25 **A Yes, I believe they are.**

1 Q How many?

2 A I couldn't say.

3 Q Okay. How many farmhouses would view the lower Snake
4 River project?

5 A What's the question?

6 Q How many farmhouses would be impacted by -- their views
7 impacted by the lower -- so lower Snake River project,
8 I think, correct?

9 A I don't know.

10 Q Not very many, correct?

11 A That's probably fair, though I don't know.

12 Q Okay. Okay. So you're working on the lower Snake
13 River project for PSE, as I understand it; is that
14 right?

15 A Yes.

16 Q Okay. Any other 25-mile-long wind turbine projects?

17 A I'm working on a number of offshore wind projects on
18 the East Coast, and obviously those study areas are --
19 are very large as well.

20 Q Let's limit ourselves here to -- to on-shore projects,
21 if we may.

22 Do you -- are you working currently on any other
23 25-mile-long wind turbine projects?

24 A No.

25 Q Okay. And are you working on any other projects that

1 have 244 turbines?

2 **A No.**

3 Q Okay. What's the biggest one you're working on right
4 now?

5 **A Limiting ourselves to on shore?**

6 Q Yes, please.

7 **A I would say the biggest is probably Summit Ridge in the**
8 **state of Oregon.**

9 Q Okay. How big is that?

10 **A I beg your pardon?**

11 Q I said, how big is that? Meaning, how many turbines?

12 **A I believe 40.**

13 Q Okay. And are you working on -- I notice, again,
14 looking at the representative viewpoints in the aerial
15 photograph, it looks in certain locations there are
16 five, four -- there's lines of turbines, one after the
17 other.

18 Do you see that?

19 **A Yes.**

20 Q I'm looking in the location. It looks like five
21 turbine lines, one after the other; is that right?

22 **A Yes.**

23 Q Are you working on any other projects where we have
24 these turbine lines that are in such close proximity to
25 each other?

1 **A Again, certainly with offshore wind projects, that's**
2 **very characteristic. On-shore, the current projects**
3 **that I'm working on have different configurations.**

4 Q Okay. And I'm not asking you questions about offshore
5 projects now.

6 But are you working with anyone, any projects that
7 are five turbine rows thick?

8 **A No.**

9 Q Okay. Okay. So this is a pretty unusual project.

10 Is that -- would that be fair to say?

11 **A We evaluated the project as -- as it was presented to**
12 **us.**

13 Q But -- I understand that.

14 But this is a pretty unusually large wind turbine
15 project, is it not? And feel free to disagree with me.

16 **A It is a large project, yes.**

17 Q Okay. Now, this project can be seen by a lot of
18 people, can it not?

19 **A Yes.**

20 Q Okay. And -- okay. And, again, I'm looking at your
21 materials here.

22 Do you recognize this page, which is Page 4-45 of
23 the amended site certification application?

24 **A We're looking at the -- the red-line application?**

25 Q We are --

1 **A Okay. Yes. Okay. Yes.**

2 Q So -- so the red-line application was -- was
3 prepared -- the original application was prepared when?

4 **A Oh, let's see. I believe the original application was**
5 **2021.**

6 Q Okay. And when did you come to work on the project?

7 **A In October of 2021.**

8 Q So you -- so you didn't write this material, did you?

9 **A I did not, no, sir.**

10 Q Who wrote it?

11 **A Other staff with my company.**

12 Q Okay. Do you happen to know who wrote it?

13 **A I believe there were different parties. Again, it was**
14 **written before I joined my company. But I believe**
15 **the -- one of the primary authors was Shaun Brooks.**
16 **She's a land-use planner.**

17 Q Is he a visual impact expert?

18 **A She has visual impact --**

19 Q I'm sorry.

20 **A -- experience, yes.**

21 Q Does Ms. Brook [sic] -- pardon me -- have your kind of
22 credentials in visual analysis?

23 **A No, not -- not equivalent backgrounds, no.**

24 Q Okay. Okay. Okay. So this is February 2021 material.
25 And it says, Turbine visibility would potentially --

1 turbine -- under Turbine Layout 1, would potentially be
2 visible from certain places.

3 Turbine Layout 1 is the 244 version of the
4 project, correct?

5 **A That's correct.**

6 Q Okay. And -- okay. So would be visible from
7 approximately 86 percent of the area within five miles
8 and 81 percent of the area within ten miles of the
9 project.

10 Would that be correct?

11 **A That's obviously what the text indicates. These**
12 **figures are based on the viewshed analysis that was run**
13 **that only considers bare earth; that is, topography.**
14 **So it's not considering vegetation, structures, things**
15 **like that, that will obviously dramatically affect how**
16 **the project is viewed, especially from developed areas.**

17 So that is correct in terms of what viewshed was
18 analyzed, so that's a highly conservative figure. But
19 I think we want to keep that context in mind of what it
20 accounted for and what it doesn't.

21 Q Okay. So as I understand it, if somebody's sitting
22 on -- on their back porch in the hot summer weather in
23 a certain location, they probably can't see the Horse
24 Heaven Hills; is that right?

25 **A No, I'm sure there are locations where folks can see**

1 **the Horse Heaven Hills from a deck or what have you.**

2 Q What you're saying is there may be some things in the
3 way of views of individual persons up to the Horse
4 Heaven Hills, correct?

5 **A That's correct.**

6 Q Okay. But -- but the landscape, the bare ground, the
7 area, 86 percent of people -- of the area within five
8 miles can see the turbines. 81 percent within ten
9 miles.

10 Is that right?

11 **A That's what the analysis found, yes.**

12 Q Okay.

13 **A Again, just studying bare earth.**

14 And now we know that would even be reduced with
15 the turbine reduction.

16 Q The Moon memo, correct?

17 **A That's correct.**

18 Q Okay. Going over to Page 2-46. Again, material
19 written before you got involved.

20 Transmission lines would be visible from 52
21 percent of the area within ten miles of the project; is
22 that right?

23 **A That's what the analysis found. Again, all of the**
24 **viewsheds were only considering bare earth. But, yes,**
25 **this is what the analysis found.**

1 Q Okay.

2 JUDGE TOREM: Mr. Aramburu.

3 Q (By Mr. Aramburu) So in this --

4 MR. ARAMBURU: Yeah.

5 JUDGE TOREM: We've been going for
6 quite a while, a little bit longer than you had
7 anticipated.

8 Do you know how much longer you're asking the
9 Council to listen to your cross?

10 MR. ARAMBURU: Probably another half
11 an hour.

12 JUDGE TOREM: Can we make it a
13 little more snappy? Because otherwise, we're going to
14 run over today. So I'll let you go for a little bit
15 longer, but let's get to the heart of what you're
16 trying to get to as opposed to reading parts of the
17 updated application for site certification. She can
18 agree to what's in there. I think she sponsored this
19 entire portion at some level, so she agrees with it.

20 MR. ARAMBURU: Okay.

21 Q (By Mr. Aramburu) So when you -- when you started your
22 work on the new visual analysis, what community
23 outreach did you conduct?

24 A I wasn't involved in community outreach for the
25 project, but I'm aware that it had occurred and had

1 **been occurring for a number of years.**

2 Q Okay. But specifically the visual impacts to be
3 anticipated from the project, what community outreach
4 are you aware of with regard to the project?

5 A **Yeah, I'm aware of specific community outreach by the**
6 **applicant directly with Yakama Nation and with**
7 **obviously the -- the public comments that came in from**
8 **the draft or on the draft application. We responded to**
9 **comments from EFSEC, and that -- that process resulted**
10 **in some of the additional viewpoints that we**
11 **investigated.**

12 Q That wasn't my question.

13 My question is: What community outreach was
14 undertaken to inform the community of the -- the visual
15 impacts of the project?

16 A **I don't know specifically other than what I just**
17 **mentioned that I was aware of.**

18 Q Okay. Okay. Fair enough.

19 Are you aware that a substantial number of
20 community leaders in the Tri-Cities have come out in
21 opposition to the project?

22 MS. SCHIMELPFENIG: Objection, Your
23 Honor. Vague. "Substantial number of community
24 leaders" doesn't give us any indication of who is for
25 or against this project. And it's, frankly,

1 argumentative.

2 JUDGE TOREM: Ms. Schimelpfenig, I
3 think based on the public comment hearing last night
4 and a variety of other witnesses that have been
5 proposed by TCC, it's pretty much an obvious answer. I
6 think she can answer.

7 THE WITNESS: I'm aware that the
8 project has opposition, yes.

9 Q (By Mr. Aramburu) Okay. And from -- from the
10 Realtors, from city of Richland, the city of Kennewick,
11 the regional chamber of commerce, the tourist bureau,
12 the economic development Council, the mayor of Benton
13 City.

14 Are you aware of those?

15 A I wasn't aware of the full list, no, sir.

16 Q Okay. And who are you aware of in a community
17 organization sense that supports the project?

18 A That supports the project?

19 Q Yes.

20 A I don't know, sir.

21 Q Okay.

22 Okay. We've talked a little bit about the Moon
23 memo.

24 Do you recognize what I've put up on the screen?

25 A I do.

1 Q And would you identify this as a map from the Moon
2 memo?

3 **A Yes.**

4 Q Did you participate in the drafting of this overview
5 map, Turbine Layout Option 1?

6 **A Repeat the question, please.**

7 Q I'm going to lay a foundation here that everyone's fond
8 of.

9 Did you have any participation in the drafting of
10 this map, and in particular, the removal of certain
11 turbines?

12 **A Not directly, no.**

13 Q Not directly?

14 Did you provide opinions concerning which turbines
15 should be removed?

16 **A I did not.**

17 Q Who made the decision to remove the turbines?

18 **A I don't know the answer to that specifically. I assume**
19 **that it came from the applicant.**

20 Q Okay. And have you -- would it be your opinion that
21 the turbines that are removed significantly mitigate or
22 avoid impacts of the project?

23 **A Can you ask that question one more time for me, please?**

24 Q The turbine layout here has removed a certain number of
25 turbines; is that correct?

1 **A That's correct. 13 turbines.**

2 Q Okay. And is it -- is it your opinion that the removal
3 of the 13 turbines significantly avoids or mitigates
4 the visual impact of the project?

5 **A No.**

6 Q Okay. Now --

7 **A It would reduce impacts to certain residents there**
8 **specifically at the -- the four turbines to the**
9 **northwest. I think it's, like, 5 through -- 5 through**
10 **8.**

11 There at No. 3, for example, that would reduce
12 impacts to the residents there immediately adjacent.

13 Q Okay. And other than this, have you presented any
14 proposals or worked on any proposals that would involve
15 mitigation of visual impacts?

16 **A I'm aware of opportunities that the applicant is**
17 **pursuing and exploring to reduce impacts, including**
18 **visual, but those are decisions that are coming from**
19 **the applicant.**

20 Q Okay. But have you recommended to the applicant that
21 certain steps be made to avoid or mitigate visual
22 impacts of this project?

23 **A No.**

24 Q And have you prepared new simulations or photographs
25 that would indicate the impact of removing these

1 turbines?

2 **A Have we prepared simulations?**

3 Q Yes.

4 **A No.**

5 JUDGE TOREM: Mr. Aramburu, as you
6 move the map, I think there's a couple pages, depending
7 on which version you're using, that might be redacted,
8 so let's be careful not to stray into those
9 confidential maps.

10 MR. ARAMBURU: I'm using the
11 redacted version, Your Honor.

12 JUDGE TOREM: All right. Thanks for
13 the clarification.

14 Q (By Mr. Aramburu) Have you reviewed the conclusions of
15 impacts of the turbines that were done by -- that are
16 done in the environmental impact statement?

17 **A In the EIS.**

18 Q Yeah.

19 **A Yes.**

20 Q You have.

21 **A Yes.**

22 Q Do you agree with them?

23 **A Is there a specific conclusion that you would like me**
24 **to focus on?**

25 Q Well, just in general, you reviewed them.

1 Do you have any specific objections to the
2 analysis that was done in the draft environmental
3 impact statement?

4 **A As I recall, the findings are largely similar to what's**
5 **presented in the application.**

6 Q Okay. Well, so we're now looking at the Appendix D
7 10-2 of the environmental impact statement. And
8 this -- the material on these pages provides an
9 assessment, key observation point, viewpoint impact
10 table, Turbine Option 1.

11 Do you see that?

12 **A Yes.**

13 MS. SCHIMELPFENIG: Your Honor --

14 MR. ARAMBURU: Okay.

15 MS. SCHIMELPFENIG: -- I think we're
16 starting to kind of stray into the SEPA process and the
17 validity of the DEIS and its analysis. I know that
18 that's not really relevant to these proceedings, which
19 are about the application and the applicant's visual
20 impact assessment. I was fine with using the photo
21 simulations, but I'd like to object here on relevance
22 grounds.

23 JUDGE TOREM: Mr. Aramburu --

24 MR. ARAMBURU: Well --

25 JUDGE TOREM: -- any response?

1 MR. ARAMBURU: Well, I'm asking the
2 witness about a comparison between the work she did and
3 the work that was done in the impact statement. That
4 does not get into the SEPA process. The document is
5 open and available in these proceedings. And I
6 don't -- don't want to extend things out too far, but I
7 do have a couple of questions about this.

8 JUDGE TOREM: You can ask them. At
9 10:20, I'm cutting you off so we can get to the Yakama
10 Nation. Thank you.

11 MR. ARAMBURU: Okay.

12 Q (By Mr. Aramburu) So looking at the -- at the analysis
13 of the viewpoints here, do you have any specific
14 disagreements with -- with what the DEIS said about the
15 impacts?

16 A Can I ask you to be more specific about a particular
17 impact? I feel like this is --

18 Q Sure.

19 A -- too broad.

20 Q Might take a couple minutes here. But, for example,
21 let's take -- let's take No. -- excuse me -- No. 2,
22 South Clodfelter Road. Okay?

23 A Okay.

24 Q And three miles away, visual contrast strong, magnitude
25 of impact high.

1 Do you see that?

2 **A I see that.**

3 Q Okay. And then there's text. Impact description is
4 provided for that. And I'm going to run out of time
5 here.

6 But it says turbines would dominate views from
7 this location. Large percentage of the viewshed would
8 include moving turbines. Views of the project would be
9 unobstructed. Views towards the east would include the
10 Nine Canyon project but only a narrow portion of the
11 landscape. The series of proposed skylined wind
12 turbines would be highly prominent in the view,
13 resulting in high long-term impacts on view,
14 particularly where views of multiple wind turbines
15 would overlap and appear larger in mass.

16 Do you agree with that?

17 **A Yes, I think that's fair.**

18 Q Okay. Okay. I'm not going to -- because -- because
19 I'm restricted in time, I'm -- I'm not going to go
20 through the rest of them, but there are similar
21 statements in -- in that -- in that material as well.

22 **A And I would also say that we found impacts in the**
23 **application also.**

24 Q I -- well, again, I'm short of time here. My
25 observation is that your analysis of the impacts and

viewpoints differ from this, from mine; is that correct?

A I don't think there were big variations, no.

Q Okay. Okay. Well, we don't have time to -- to get -- get into that.

Have you looked at the option of -- for avoidance or mitigation mechanism to avoid the impacts of wind turbines by providing for more solar development on the project?

A No, I'm not aware of that.

MR. ARAMBURU: Okay. Well, Judge Torem, I'm going to be cognizant of your -- your limitations, and I'll stop now. I have more questions, but I will stop now.

JUDGE TOREM: All right. Thank you, Mr. Aramburu. I appreciate it.

Let's shift over, Ms. Voelckers, to your questions for this witness after we take a little bit of a break.

So we'll come back at 10:25 and, with that, Ms. Voelckers' questions.

(Pause in proceedings from
10:18 a.m. to 10:25 a.m.)

JUDGE TOREM: All right. We're back on the record, ready to go forward with the Yakama

1 Nation's questions for Ms. Guthrie.

2 Ms. Voelckers, go right ahead.

3 MS. VOELCKERS: Thank you, Your
4 Honor.

6 CROSS-EXAMINATION

7 BY MS. VOELCKERS:

8 Q And good morning, Ms. Guthrie.

9 **A Good morning.**

10 Q My name is Shona Voelckers, and I represent the Yakama
11 Nation in these proceedings.

12 I just have a few questions for you this morning
13 about the scope of your testimony and what you are
14 sponsoring to the Council.

15 Are you aware that the project's viewshed impacts
16 will be devastating to multiple legendary and
17 monumental sites of cultural importance to the Yakima
18 people?

19 **A I'm not aware of that. And I can speak to the -- the**
20 **visual assessment, but I'm not an expert on cultural.**

21 Q And your testimony in this proceeding does not account
22 at all for those viewshed impacts to cultural
23 properties of the Yakama Nation, correct?

24 **A No, again, not to cultural impacts.**

25 Q Okay. And to be clear, that includes a portion of the

1 application, itself, that you are sponsoring on visual
2 resources and effects, correct?

3 **A Yes. To the extent that we studied effects to views**
4 **and viewsheds, yes.**

5 Q Yes, that doesn't include any study of those effects to
6 cultural properties that might be impacted by viewshed
7 effects, correct?

8 **A We studied impacts to views, but I can't speak to**
9 **cultural impacts.**

10 MS. VOELCKERS: Okay. Those are my
11 questions this morning. Thank you for your time.

12 JUDGE TOREM: And, Ms. Voelckers,
13 thank you for the concise questions.

14 Let me see if Ms. Schimelpfenig has anything she
15 wants to go over with the witness before checking with
16 Council on their questions.

17 Ms. Schimelpfenig, any limited redirect?

18 MS. SCHIMELPFENIG: Yes. Can I just
19 have one moment? I didn't realize you were going to
20 cycle back around so quickly.

21 JUDGE TOREM: I'll tell you what --

22 MS. SCHIMELPFENIG: I just need,
23 like, one minute to confer with counsel.

24 JUDGE TOREM: Yes. Let's go ahead
25 and take that. We'll just pause.

(Pause in proceedings from
10:27 a.m. to 10:29 a.m.)

MS. SCHIMELPFENIG: Thank you, Your Honor. We're ready whenever the Council is.

JUDGE TOREM: All right. Why don't you proceed with yours. And then I'll ask Council members just to get ready by putting up their electronic hands if they are going to have any questions.

MS. VOELCKERS: And, Your Honor, if I may before -- okay. We're having the same issue seeing Ms. Schimelpfenig, but I see her now, so I appreciate being able to see everyone at the same time. Thank you.

MS. SCHIMELPFENIG: Sorry. We're sharing a computer screen. So thanks.

REDIRECT EXAMINATION

BY MS. SCHIMELPFENIG:

Q Okay. The first question I want to ask relates to a question from Mr. Aramburu about the role you played in the development of the application.

You reviewed the assessment completed by Ms. Brooks, correct?

1 **A I reviewed it. It had already been completed. That's**
2 **correct.**

3 Q And what was your opinion about that assessment?

4 **A It was a robust and objective assessment based on the**
5 **BLM guidelines.**

6 Q And this came up numerous times in, you know, as we
7 were working through the visual simulations.

8 What is the appropriate way to view those
9 simulations?

10 **A The viewing guidelines are shown on the simulations,**
11 **and they should be viewed at 100 percent, is how**
12 **they're intended to be viewed.**

13 Q And how does zooming in distort them?

14 **A It can sometimes -- depending on, you know, technology**
15 **and how they're being viewed, it can create distortion**
16 **or reduce clarity.**

17 Q And you mentioned that there are updated visuals.

18 Where are those located?

19 **A Yes. We prepared additional simulations from**
20 **viewpoints that were requested as part of the -- the**
21 **data request process. I believe everything that we've**
22 **prepared was submitted to EFSEC in June of this year.**

23 Q And there were updated photo simulations prepared for
24 the updated application, right?

25 **A For the red-line version of the application. Correct.**

1 **There were reshoots and additional KOPs photographed,**
2 **studied, et cetera.**

3 **Sorry. "KOP" is a key observation point.**

4 Q Yes. Thank you.

5 A **So the -- the representative -- the representative**
6 **viewpoints. Forgive me. Some -- some terminology.**

7 MS. SCHIMELPFENIG: Okay. No
8 further questions at this time, Your Honor.

9 JUDGE TOREM: All right. I see that
10 Sarah Reyneveld had a question as counsel for the
11 environment, and then we'll come to Eli Levitt.

12 MS. REYNEVELD: Thank you, Your
13 Honor. I just have a few questions just in regards to
14 the turbine lighting.

15
16 RECROSS-EXAMINATION

17 BY MS. REYNEVELD:

18 Q So good morning, Ms. Guthrie. My name is Sarah
19 Reyneveld, and I am an assistant attorney general in
20 the --

21 COUNCIL MEMBER LEVITT: Sorry,
22 Sarah. I'm unable to hear you.

23 **THE WITNESS: I hear you, Sarah.**

24 MS. REYNEVELD: Can you hear me now,
25 Eli? Hello?

1 JUDGE TOREM: Mr. Levitt, I'm not
2 sure if the sound issue's on your end. Were you saying
3 you couldn't hear Ms. Reyneveld?

4 COUNCIL MEMBER LEVITT: Yes, that's
5 correct. Maybe I'll try switching to my cell phone or
6 leaving and coming back.

7 MS. REYNEVELD: Okay. I apologize.

8 Q (By Ms. Reyneveld) I am -- just to continue, I'm
9 counsel for the environment in this matter. And
10 counsel for the environment is assigned to represent
11 the public in its interest in protecting the
12 environment.

13 I just have a few questions for you in regards to
14 the turbine lighting.

15 So is it correct to say that you analyzed visual
16 or aesthetic impacts of turbine lighting?

17 A I'm aware of what's presented in the application, yes,
18 and I reviewed it.

19 Q Okay. And is it correct to say that there will only be
20 exterior lighting on the turbines that's kind of either
21 aviation warning lighting or that is either on the
22 exterior or potentially kind of mid-tower lighting,
23 depending on the size of the turbines?

24 A That aligns with my understanding, yes. Depending on
25 the size of the turbines, yes.

1 Q Okay. And that was my question, or one of my
2 questions, is: Do you know how that will vary
3 depending on the size of the turbines?

4 Like, what additional lighting will be necessary
5 if there's a larger turbine?

6 **A This is outside my area of expertise. I believe that**
7 **the taller -- there's a threshold that escapes me at**
8 **the moment, but above which the mid-tower lighting**
9 **becomes required by the FAA.**

10 Q Okay. And this lighting that we've been discussing, is
11 that lighting that's required by the Federal Aviation
12 Administration?

13 **A Yes, that's correct.**

14 Q And you had some questions earlier and were discussing
15 just kind of the visual impacts potentially to
16 residents.

17 Do you know whether these lights will be visible
18 to residents and up to how many miles?

19 **A Yes. The lights would be visible from some residents**
20 **as kind of depicted in some of the simulations that are**
21 **representative of residential views, and we know that**
22 **the lights can be seen from -- from some distance.**

23 Q And are these lights that we're discussing just
24 nighttime lights, or is the project also anticipating
25 daytime lights?

1 **A** I'm not aware of daytime lights other than potentially
2 at the substations for maintenance, security, that kind
3 of thing. And the -- the FAA lights on the turbines
4 would be at night as affected or mitigated by the
5 aircraft detection system. And so they would only be
6 activated when there's aircraft in the area.

7 **Q** Thank you.

8 And I understand that you didn't necessarily
9 prepare all of this analysis. But to the extent that
10 you know, the application focuses on the aesthetic
11 impacts of lighting. But did you also work or are you
12 aware of work that was also done with wildlife experts
13 on the project to determine the visual impact of these
14 lights on birds and bats?

15 **A** No, I'm not aware.

16 MS. REYNEVELD: Okay. Thank you. I
17 don't have any further questions.

18 **THE WITNESS:** Thank you.

19 JUDGE TOREM: All right.

20 Mr. Levitt, I'm not going to let Mr. Livingston jump
21 your place in line now that you're back.

22 Go ahead, Mr. Levitt.

23 COUNCIL MEMBER LEVITT: Thank you.

24 My name is Eli Levitt. I'm Ecology's EFSEC
25 Council member.

1 So, Ms. Guthrie, I believe your rebuttal testimony
2 mentions that, when looking at some of the key
3 observational viewpoints -- I don't know what round it
4 was, but you did include feedback from the Yakama
5 Nation and other stakeholders.

6 **THE WITNESS: Yes.**

7 JUDGE TOREM: Could you please
8 define what you mean by "other stakeholders"? Who does
9 that include?

10 **THE WITNESS: Sure. Through**
11 **revisions that came to us for -- through the EFSEC**
12 **process, I'm aware of, for example, private winery**
13 **owners, and we prepared simulations for them. And I**
14 **don't know specifically, but the way that the data**
15 **requests were worded, the requests indicated that**
16 **additional view studies came as part of the public**
17 **comment period, or from -- from comments that came from**
18 **the public.**

19 COUNCIL MEMBER LEVITT: Do you know
20 if any members of the Latinx, BIPOC, or Spanish
21 community, leaders of those groups were invited to
22 provide feedback on any of the key observational
23 viewpoints or the analysis that you conducted for this
24 project?

25 **THE WITNESS: I'm not aware of any**

1 direct results of those interactions, but I believe,
2 you know, the public comment period was -- was just
3 that, public for -- for folks to -- to participate in
4 and provide comments or feedback.

5 COUNCIL MEMBER LEVITT: Yeah, I
6 guess, you know, the Yakama Nation was invited. But
7 I'm curious as to -- I don't know how they were
8 included. Perhaps you can enlighten me.

9 But why were some -- some groups invited perhaps
10 and not others?

11 THE WITNESS: I'm afraid I can't
12 speak to that.

13 COUNCIL MEMBER LEVITT: Okay. Thank
14 you.

15 I guess, one very theoretical exercise. It
16 strikes me that the map we were looking at this morning
17 is not terribly different than some urban areas. So,
18 you know, just for a moment, let's -- let's think about
19 the city of Portland. There's a ridgeline, and there's
20 a river. The Willamette River enters into the Columbia
21 River.

22 And in the 1970s the population of Portland was in
23 the 300,000, more than -- more than the Tri-Cities
24 area, 370,000.

25 Would your visual analysis change at all if -- in

1 terms of methodologies if you were conducting the city,
2 you know, this type of analysis in a much more
3 urbanized area like Portland? So picture, you know,
4 the lines of wind turbines being placed where Forest
5 Park is, you know. But in this case, Forest Park would
6 be 20 to 30 miles long.

7 Would it change the way you went about your
8 analysis in terms of methodologies?

9 **THE WITNESS:** In terms of
10 methodology, no. That is a repeatable process that we
11 would conduct in various different kinds of landscapes.
12 But I wouldn't go into hypotheticals about anything
13 beyond the methodology. But the methodology would be
14 the same, you know, inventory, viewpoint, selection, et
15 cetera.

16 **COUNCIL MEMBER LEVITT:** Would you
17 change the stakeholders that were invited to
18 participate in any way?

19 **THE WITNESS:** I wasn't directly
20 involved in -- I'm just not sure what you mean by
21 invitations. You know, obviously there's the
22 stakeholder process, but I think the -- the
23 opportunities for the public to be engaged would be the
24 same.

25 **COUNCIL MEMBER LEVITT:** And just

1 maybe separating your role from Tetra Tech in your
2 personal role, would you agree, though, that putting,
3 you know, five lines of wind turbines on the ridges of
4 Portland's hills would dramatically impact the views
5 and aesthetic of the city of Portland?

6 **THE WITNESS: I feel like that's not**
7 **a fair comparison.**

8 COUNCIL MEMBER LEVITT: Well, I'm
9 talking about Portland when it was 370,000 people, not
10 the current Portland.

11 **THE WITNESS: I'm still not going to**
12 **answer to hypotheticals. We would take a project that**
13 **was proposed as proposed and conduct an analysis.**
14 **So...**

15 COUNCIL MEMBER LEVITT: Okay. Thank
16 you.

17 JUDGE TOREM: Mr. Livingston.

18 COUNCIL MEMBER LIVINGSTON: Thank
19 you, Your Honor.

20 Ms. Guthrie, I'm Mike Livingston. I'm with the
21 Washington Department of Fish and Wildlife on the
22 Council.

23 **THE WITNESS: Good morning.**

24 COUNCIL MEMBER LIVINGSTON: So just
25 two quick questions.

1 One is: I know there was some discussion about
2 project size that you've worked on offshore and some
3 more local, Snake River.

4 Have you done any analysis for projects of this
5 size in proximity to this large of a urban population?

6 **THE WITNESS: No.**

7 COUNCIL MEMBER LIVINGSTON: All
8 right. And then do you think this project could be
9 reconfigured to substantially reduce the visual impact
10 from the Tri-Cities and Benton City?

11 **THE WITNESS: The question of**
12 **mitigation is really not in my scope. We conducted the**
13 **analysis that was done based on kind of the maximum**
14 **scenario, and decisions about the -- the scale and**
15 **scope of the project are to be decided by the**
16 **applicant.**

17 COUNCIL MEMBER LIVINGSTON: Let me
18 ask it a different way.

19 So if they were, say -- if the applicant asked you
20 to design this in a way to minimize visual impact,
21 would you be able to reconfigure the project as it --
22 or not reconfigure -- design the project in such a way
23 that it would have less visual impact than it currently
24 does?

25 **THE WITNESS: Again, I would say**

1 that we conducted our analysis based on the project in
2 its maximum scenario as it was presented to us. And so
3 I can't -- I'm not a wind project designer, so --

4 COUNCIL MEMBER LIVINGSTON: Okay.

5 THE WITNESS: -- I can't speak to
6 that.

7 COUNCIL MEMBER LIVINGSTON: Okay.

8 Well, thank you.

9 JUDGE TOREM: Lenny Young.

10 COUNCIL MEMBER YOUNG: Good morning,
11 Ms. Guthrie. My name's Lenny Young, and I represent
12 the State Department of Natural Resources on the
13 Council.

14 Going beyond RCW and what's established in WAC,
15 could you explain in your own words why it is important
16 to consider visual impacts when analyzing a project
17 proposal such as this and how visual changes in what
18 people see affect their lives?

19 THE WITNESS: Let's see. I think
20 certainly we have the range of visual conditions,
21 right? We have national parks. We have state parks.
22 We have trails. And I'm, you know, an advocate for all
23 of those things that can be restorative to us and allow
24 people to experience the landscape in different ways.

25 And there are areas that have been designated for

1 **scenery, and those areas are -- because of their**
2 **designation, they are to be considered for impacts to**
3 **the visual values that they represent.**

4 COUNCIL MEMBER YOUNG: That sounds a
5 little bit to me like maybe a synopsis of why we have
6 laws and rules around visual impacts. But could you go
7 a little bit further and explain how changes in what
8 people see can affect their lives?

9 Why is this so important? Why is this an
10 essential part of analyzing a project such as this?

11 **THE WITNESS: I think there are**
12 **certain expectations with certain kinds of views;**
13 **namely, again, from amenities that are valued for their**
14 **scenery, so -- and those are worthy of protection.**

15 COUNCIL MEMBER YOUNG: Thank you.

16 JUDGE TOREM: And I have one
17 question for you.

18 And, Ms. Schimelpfenig, I don't know if you have
19 access to Exhibit 1001. It's really just a
20 geographical clarification at the bottom of Page 1 in
21 your credentials.

22 And I'm asking because you indicate you're a
23 specialist on the Badger Gap solar project in Kittitas
24 County, Washington, and yet you're before the State of
25 Oregon's energy facility siting council. And as an

1 Ellensburg resident, I'm not aware of this particular
2 one, and I don't see it on our Council's schedule.

3 So where is Badger Gap? I know we have Badger
4 Pocket, and up in Douglas County we've got Badger
5 Mountain. But my Google says Badger Gap might be in
6 Wisconsin.

7 **THE WITNESS: Yeah, that -- that**
8 **project is in its early stages, and we conducted**
9 **fieldwork for it south of Ellensburg, I believe. It's**
10 **been a while.**

11 JUDGE TOREM: So is that one I can
12 say is now coming to the State of Washington's energy
13 siting council as opposed to Oregon?

14 **THE WITNESS: In Washington.**

15 JUDGE TOREM: Okay. Thanks for the
16 clarification. Maybe we'll be seeing you again.

17 All right. Does that raise any other questions
18 for Council members?

19 MR. McMAHAN: Your Honor, if I could
20 just interject here. Tim McMahan here, for the record.

21 Because of the nature of my practice, I tend to
22 know much, much earlier stage what I know is kind of
23 out there. Sometimes it's hypothetical. Sometimes
24 it's never going to come along at all. Sometimes it
25 dies on the vine.

1 And -- and so I just want to indicate that the
2 project you mention may or may not have legs, and there
3 are many others like that in my portfolio. So it's
4 really difficult for Ms. Guthrie to answer that
5 question.

6 JUDGE TOREM: Fair enough,
7 Mr. McMahan. I just was confused by the geography.

8 MR. McMAHAN: And I hope that helps.

9 JUDGE TOREM: Yes. Kittitas County
10 is clearly not in Oregon, and that was just my
11 question.

12 MR. McMAHAN: Okay.

13 JUDGE TOREM: Just take a look at
14 the bottom of Page 1. It might be something to be
15 corrected in her future credentials.

16 Council members, any --

17 MR. McMAHAN: Sorry, Your Honor.
18 Sorry, Your Honor.

19 JUDGE TOREM: Mr. McMahan.

20 MR. McMAHAN: Tim McMahan here. I'm
21 sorry. Were you -- I think I might have been muted
22 when I just articulated a response to that question.

23 Did you hear any of what I said?

24 JUDGE TOREM: The bulk of it, yes.

25 MR. McMAHAN: Well, I'm happy to

1 answer any other questions, but as I indicated, you
2 know, yeah. Thank you.

3 JUDGE TOREM: No. Just a question
4 of geography.

5 Any other questions --

6 MR. McMAHAN: Yeah.

7 JUDGE TOREM: -- for Ms. Guthrie?

8 All right. Mr. Aramburu, I see your microphone is
9 open.

10 MR. ARAMBURU: Thank you.

11
12 RECROSS-EXAMINATION

13 BY MR. ARAMBURU:

14 Q Just a couple of questions, Ms. Guthrie.

15 You indicated that you did some supplemental work
16 on view impacts in, what, '22? '21, '22?

17 **A Can you specify what you mean by "supplemental"?**

18 Q Well, during my questioning, you indicated you didn't
19 work on the original visual impact analysis that is in
20 the original ASC, but then there was some supplemental
21 work that was done.

22 Am I right about that?

23 **A That's correct.**

24 Q Okay. Was that supplemental work vetted or reviewed by
25 SWCA?

1 **A As I understand, they used what's in the application**
2 **for their work as a reference.**

3 Q Okay. But you've done new work, I understand, that
4 when you took over from another person at Tetra Tech.
5 That's correct, isn't it?

6 **A I was involved in the preparation of some of the**
7 **supplemental simulations that were prepared; for**
8 **example, for data requests.**

9 Q And were you involved in some of the red-lining that
10 went into the visual impact analysis?

11 **A No.**

12 Q Well, who put the -- the red-lining I'm referring to is
13 we have a red-line updated application, and there's
14 red-line material in that, changed or added material
15 from the original application.

16 Do you -- are you aware of that?

17 **A Correct. Yes.**

18 Q And were you responsible for any of that red-line, new
19 red-line material?

20 **A I didn't prepare the text.**

21 Q Who did?

22 **A Can we be specific about particular red-lines?**

23 **Are you talking about the additional simulations**
24 **that were created, for example?**

25 Q The -- I'm short of time here, Ms. Guthrie. And as I

1 look at the application, there's considerable red-line
2 material in the application. I don't want to go
3 through every page and line, or else I'm -- something
4 bad's going to happen to me.

5 But what I want to know is whether you were
6 responsible for any -- any or all of that material,
7 writing it and including it in the red-line version.

8 **A For my role here, yes, I'm sponsoring that.**

9 Q Ms. Guthrie, I understand that. And I understand
10 you're sponsoring it.

11 The question is: Who wrote the new red-line
12 material in the updated ASC?

13 **A I think there were different staff. Just as one**
14 **example, I know the person responsible for, for**
15 **example, site photography and edits to the photography**
16 **wrote the parts explaining how, for example, the**
17 **dehazing simulations were prepared, for example, and I**
18 **believe other -- other staff at Tetra Tech that were**
19 **involved in the project before my involvement.**

20 Q I don't want to belabor this point. What I'm really
21 asking, there's a number of red-line -- there's a
22 certain amount -- substantial amount of red-line
23 material in the visual assessment, the aesthetics part
24 of the red-line, the new amended or updated ASC.

25 My question is: Were you responsible for writing

1 any of that?

2 MS. SCHIMELPFENIG: Objection, Your
3 Honor. Asked and answered. The witness has testified
4 that the team at Tetra Tech contributed to that, and
5 she also indicated that she had not worked on the
6 updated ASC.

7 JUDGE TOREM: Mr. Aramburu, I don't
8 know that you're going to get any better answer. And
9 I'm not --

10 MR. ARAMBURU: I think --

11 JUDGE TOREM: -- totally sure --

12 MR. ARAMBURU: I think there's a --

13 JUDGE TOREM: -- on the --

14 MR. ARAMBURU: -- yes or --

15 JUDGE TOREM: -- relevance.

16 Yeah, yes or no, but I don't think there's a whole
17 lot of relevance as to who wrote what in the updated
18 ASC. The updated application states what's there for
19 the Council.

20 Does it really matter if this person wrote one
21 sentence or another? It was a team effort apparently.

22 MR. ARAMBURU: Well, she's
23 sponsoring it, and it would be interesting to know
24 whether she wrote any of what she's sponsoring. So if
25 that's not a proper question, fine.

1 JUDGE TOREM: Well, let's ask her
2 that.

3 How much of the new application for site
4 certification, the updated version, are you personally
5 responsible for? Just give us a ballpark fraction and
6 who you worked with.

7 THE WITNESS: I worked primarily
8 with our project manager, Linnea Fossum, and Shaun
9 Brooks was involved in writing the bulk of the
10 revisions.

11 JUDGE TOREM: And you were familiar
12 with it enough that you're able to sponsor with this
13 their inputs?

14 THE WITNESS: That's correct.

15 JUDGE TOREM: Done deal,
16 Mr. Aramburu.

17 Anything else?

18 Q (By Mr. Aramburu) Were these revisions and other
19 materials shared with WCA -- SWCA?

20 A Yes.

21 Q They were.

22 Do you know who I'm talking about?

23 A Yes. For the EIS.

24 Q For the EIS.

25 Were these shared by them, with them?

MS. SCHIMELPFENIG: Objection, Your Honor. Vague. What is "these" referencing?

Q (By Mr. Aramburu) The new red-line updated materials. Were they shared with SWCA?

A Yes, I believe they are -- they're available on the -- the EFSEC web- -- website. And, yes, were provided to SWCA so that they could perform their work.

Q Okay. Did you ask them for any comments or any peer review of your material?

A I was not involved in that process, no, sir.

Q Okay. Good.

You talked about certain designated scenic areas.

Would it be fair to say that the section of the comprehensive plan of Benton County, which talks about conserving visually prominent naturally vegetated steep slopes and elevated ridges, is a scenic designation?

MS. SCHIMELPFENIG: Objection, Your Honor. Ms. Guthrie is not a land-use expert. She's a visual expert. She is not an expert on whether -- how the County does its designation of scenic lands or not.

JUDGE TOREM: Sustained. Let's stay within her area of expertise and what she's testified to, please.

MR. ARAMBURU: Okay. No further questions.

1 JUDGE TOREM: Fantastic. And
2 nothing bad happened to you.

3 Any other questions from the Council for this
4 witness?

5 MR. ARAMBURU: Not yet.

6 JUDGE TOREM: Yes, it's early,
7 Mr. Aramburu. It's early.

8 Mr. Levitt.

9 COUNCIL MEMBER LEVITT: I'm sorry.
10 I just want to ask one or two follow-up questions from
11 my earlier questions.

12 Ms. Guthrie, are you aware that TCC has said that
13 approximately 40 percent of the TCC -- excuse me -- 40
14 percent of the Tri-Cities population identifies as
15 Latinx or people of color?

16 **THE WITNESS: I wasn't aware of that**
17 **statistic in particular, no. Though I visited the**
18 **area.**

19 COUNCIL MEMBER LEVITT: Okay. And,
20 again, just a yes-or-no question.

21 Is there a reason that Tetra Tech and the
22 applicant or any other parties involved in assessing
23 key observational viewpoints did not reach out, broadly
24 speaking, to leaders that represent that 40 -- 40
25 percent of the Tri-Cities population?

1 **THE WITNESS:** I wasn't directly
2 involved in the public outreach, so I just can't answer
3 that question.

4 COUNCIL MEMBER LEVITT: Okay. Thank
5 you.

6 JUDGE TOREM: All right. Thank you,
7 Ms. Guthrie, for your time and attention today.

8 We have an hour-plus before we would be scheduled
9 to break for lunch, so I'd like to get right into
10 Mr. Apostol's testimony, if he's available. I'll see
11 if we can move the tiles around to get him on my
12 screen.

13 (Witness Dean Apostol
14 appearing remotely.)

15
16 JUDGE TOREM: Good morning,
17 Mr. Apostol. I see you there.

18 **THE WITNESS:** Good. I see myself in
19 my upper right-hand corner of my screen.

20 JUDGE TOREM: Okay. Good.

21 **THE WITNESS:** It worked out pretty
22 good, but I'm small.

23 JUDGE TOREM: And we like your shirt
24 too.

25 **THE WITNESS:** Thank you.

1 JUDGE TOREM: So, Mr. Aramburu, if
2 you could mute your mike, I think we might eliminate
3 some feedback since we've got at least three open.

4 Dean Apostol, you have sponsored a number of
5 exhibits, and I think they've been numbered 5100, 5101,
6 5102, -3, and -4. And there was a rebuttal exhibit. I
7 think it's 5906.

8 Are you aware of any others?

9 THE WITNESS: No. Well, I think
10 there might have been some maps submitted today or
11 yesterday.

12 JUDGE TOREM: Yes. But I'm not sure
13 if those have been numbered or uploaded to the folder
14 I'm looking at on the EFSEC website well beyond your
15 control.

16 Mr. Aramburu, are there any other exhibit numbers
17 that you're aware of yet? And Ms. Masengale might --

18 MR. ARAMBURU: No. I think you've
19 covered them, and the -- the supplemental material is
20 5906.

21 JUDGE TOREM: Okay. Thank you. I
22 saw that Ms. Masengale had put that in the folder
23 already, so everyone has access.

24 All right. Mr. Apostol, let me swear you in.

25 We've got a little bit of an echo, but we'll work

1 with that for the swearing in and see if closing my
2 microphone helps with that.

3 **THE WITNESS: Okay.**

4
5 **DEAN APOSTOL,** **appearing remotely, was duly**
6 **sworn by the Administrative**
7 **Law Judge as follows:**

8
9 JUDGE TOREM: Do you, Dean
10 Apostol -- if you raise your right hand -- solemnly
11 swear or affirm that all of the testimony in
12 Exhibits 5100 through 5104 as well as the supplemental
13 Exhibit 5906 will be the truth, the whole truth, and
14 nothing but the truth and that all of your answers
15 today to questions will be the same?

16 **THE WITNESS: I do.**

17 JUDGE TOREM: All right. We'll have
18 adopted 5100 through 5104. I know there might be some
19 objections as to 5906, so we'll wait on those and make
20 a ruling later.

21 (Exhibit Nos. 5100, 5101,
22 5102_T, 5103_R, and 5104_R
23 admitted.)

24
25 JUDGE TOREM: I'm going to go mute

1 my microphone here. Mr. Aramburu, if you want to give
2 a kind of 30,000-foot couple of sentences. Then I'll
3 turn Mr. Apostol over to the applicant for their
4 cross-exam. And then we'll come back to the Yakama
5 Nation as well.

6 UNIDENTIFIED SPEAKER: Rick, your
7 mike's off.

8 MR. ARAMBURU: There we go. The
9 microphone's on. Thank you.

10 Mr. Apostol is a long-standing visual expert with
11 years of experience. He has -- he has reviewed the
12 visual material submitted in the application and in the
13 draft environmental impact statement and have reached
14 conclusions regarding the sufficiency of those
15 materials for visual analysis and has other comments on
16 them.

17 And we do have 5906. I know Mr. McMahan had
18 indicated he has some objections to it. I will want
19 the witness to testify concerning that matter, but
20 perhaps we can address those issues at the beginning.

21 JUDGE TOREM: Yeah, I think that
22 might be brought up depending on when you use the
23 exhibit. So we'll wait. I don't know if the
24 applicant's going to refer to it in their cross-exam,
25 but we'll deal with it when we get to it in a little

1 bit.

2 Mr. Apostol, do you happen to have two different
3 ways you're listening to the audio, maybe your computer
4 as well as a cell phone?

5 **THE WITNESS: No. My cell phone's**
6 **off.**

7 JUDGE TOREM: Okay. I'm just trying
8 to identify where the sound quality's being diminished.
9 But if you have speakers on your computer, they might
10 be providing some feedback also to your own microphone.
11 But beyond that, I'm not sure what we can do. But
12 anything that might happen on your end, it might be
13 helpful, and maybe we've got that resolved at the
14 moment. We'll see.

15 **THE WITNESS: I just turned the**
16 **volume down. Does that help?**

17 JUDGE TOREM: Actually, I think it
18 does.

19 **THE WITNESS: Right. Right.**

20 JUDGE TOREM: All right. Mr. --

21 **THE WITNESS: I got a brand-new --**
22 **brand-new webcam, and so this is the first time I'm**
23 **using it, so...**

24 JUDGE TOREM: All right.

25 **THE WITNESS: Give me a little bit**

1 of a chance here.

2 JUDGE TOREM: You're well centered
3 in the screen. We'll work with it. Technology gods
4 have been mostly on our sides, but they show up from
5 time to time.

6 All right. I'm going mute on this end and ask
7 Mr. Aramburu do the same except for objections.

8 Ms. Schimelpfenig, I'm going to turn over the
9 witness to you.

10 MR. ARAMBURU: Mr. Examiner, may I
11 have the witness identify 5906 and what it's being used
12 for?

13 JUDGE TOREM: At the appropriate
14 time, when it's used.

15 MR. ARAMBURU: Okay.

16 MS. SCHIMELPFENIG: Thank you. Your
17 Honor, at this time, we don't have any questions for
18 Mr. Apostol, but we reserve the opportunity to recross
19 after -- after the other -- any other questions.

20 JUDGE TOREM: All right. Let me
21 turn to Ms. -- Ms. Voelckers and see what questions she
22 has. We may get to 5906 sooner than we thought,
23 Mr. Aramburu.

24 Ms. Voelckers, I saw that Yakama Nation had some
25 questions reserved or time for them.

1 MS. VOELCKERS: My apologies, Your
2 Honor. I didn't realize that was addressed to me.

3 As I said this morning, we actually don't plan to
4 take the time that we had reserved. I do, you know,
5 want to ask questions based upon what comes out. But
6 thank you for allowing me to reiterate that we -- that
7 estimate was made a couple weeks ago, and we don't at
8 this time plan to use that time that we had asked for.

9 JUDGE TOREM: All right.
10 Mr. Aramburu, it's a little unusual to allow redirect
11 after no cross. But because you've introduced this
12 other exhibit demonstrative, let's deal with that now
13 and see if it's appropriate to admit.

14 I'll be liberal with my ruling. I'll let the
15 applicant know that. And if we limit your questions
16 about it just to introduce it, then that might be the
17 best course for having Mr. Apostol's testimony
18 reclarified based on anything he was rebutting with
19 5906.

20 So I'm going to ask and see if we can put that up
21 on the screen for context, and you go ahead,
22 Mr. Aramburu.

23 And, Ms. Schimelpfenig, if you'll hold your
24 objection until the exhibit's been adequately
25 introduced, and we can see what's going on.

1 Thank you, all.

2 MS. SCHIMELPFENIG: Thank you, Your
3 Honor.

4 (Background dialogue.)

5
6 MR. ARAMBURU: Okay. It should be
7 on the screen. Is everybody getting it? Okay.

8
9 REDIRECT EXAMINATION

10 BY MR. ARAMBURU:

11 Q This is Exhibit 5906. It consists of two pages. And
12 I'd like to ask, Dean: Can you explain how this was
13 prepared and why it was prepared?

14 A Yeah. This was a map that was prepared with my -- by
15 myself and Paul Krupin. And Paul did a lot of the
16 work, but I kind of helped him or helped describe what
17 was needed.

18 And what this does is it shows the -- it breaks
19 the project area into four visual areas, kind of moving
20 from the west to the east, Visual Area 1 through 4.
21 And it shows some of the key or representative
22 viewpoints in the big red dots. And it shows distance
23 to the project. And the -- it breaks the project into
24 these layers.

25 There's kind of a layer that's closest to the

1 observers. I think -- I think what I remember is the
2 distance was zero to two miles from the edge of the
3 urban area. And then the -- that's the first zone,
4 which has kind of green turbines represented. And then
5 the next zone is in blue. I believe that's two to
6 three miles distance. And then the -- the red zone is
7 three to four miles.

8 Q Okay. And the first page of 5906 contains red dots,
9 and they're referring to RV, and those are the visual
10 reference points?

11 A Representative viewpoints, yeah.

12 Q They're representative viewpoints. And we had a lot of
13 discussion about those in the visuals --

14 A Yeah.

15 Q -- from -- from those as well.

16 And the base map that we are using here, is that a
17 base map from the -- from the Moon memo, the -- the
18 memo which made some changes to the -- to the project?

19 A I believe so.

20 Q Okay. So I will represent to you and the parties that
21 this is the map that -- from the Page 11 of the Moon
22 memo, the redacted version, by the way. And -- and to
23 the extent you can see my hand moving through this,
24 this shows the areas of -- in which the -- the turbines
25 were removed. We had some discussion of that with

1 Ms. Guthrie. Okay. So that's what's on Page 1.

2 Page 2. Can you describe what's shown on Page 2,
3 Mr. Apostol?

4 A Yeah. This is a table that indicates how many turbines
5 are in each of the zones. And we did some -- we did
6 some modeling. If you were to take -- or take away
7 turbines in a zone, how much would you reduce?

8 And so, like, when you look at the top line there
9 where it says visual area, some reduction, that's --
10 there's 57 turbines in the first zone, which is the
11 green zone, and that's 24.7 percent of the total number
12 of turbines. I believe that's -- yeah, based on 231
13 turbines, which I believe is the number that's after
14 the Moon memo.

15 Q Okay. So --

16 A And for each -- each of the -- each of the visual areas
17 that were on the map were those kind of corridors,
18 those are identified Visual Area 1, 2, 3, and 4 with a
19 kind of which representative viewpoint is within those
20 areas those are labeled and how many turbines are
21 within each of those kind of corridors.

22 Q Okay. So risking being accused of distortion, in
23 looking at the first page of that document, we're
24 seeing the three layers, and we're seeing the numbers
25 for the individual turbines as we zoom in a bit here?

1 A Yeah.

2 Q Okay. And how should -- how should the -- the
3 Council -- that is, the EFSEC Council -- use this
4 material? What's helpful?

5 A Well, there were some questions from some of the
6 Council members earlier about visual mitigation and
7 modifying the design to reduce some of the visual
8 impacts. And this -- this is a good starting point for
9 thinking about that.

10 Generally speaking, the closer the turbines are,
11 the higher the impact. That's not always the case, but
12 that's a -- a good generalization. So it's good to
13 know what we're dealing with as far as distance zones.

14 Just as an aside, with wind turbines, modern wind
15 turbines, which are getting bigger and bigger all the
16 time, I think these turbines are about twice the height
17 of the existing turbines at the Nine Mile site, for
18 example. A lot of the work done at Robert Sullivan at
19 the Argonne National Laboratory, who's looked at
20 turbines in the field and then measured viewing
21 distances and visual dominance. You know, wind tur- --
22 the modern wind turbines are visually dominant --

23 MS. SCHIMELPFENIG: Your Honor.
24 Your Honor, I'm sorry. I don't mean to interject. But
25 I think we're straying beyond laying the foundation for

1 this exhibit into testimony of the witness. And I
2 think we should determine whether this exhibit should
3 be admitted before we start discussing it any further.

4 JUDGE TOREM: Fair enough.

5 Mr. Apostol, let's just stop there. I want to
6 hear the applicant's objection to this map that you and
7 Mr. Krupin worked on.

8 **THE WITNESS: Okay.**

9 JUDGE TOREM: Ms. Schimelpfenig, go
10 ahead. And then I'll hear from Mr. Aramburu if I need
11 to.

12 MS. SCHIMELPFENIG: Thank you.

13 Your Honor, applicant objects to the admission of
14 Exhibit 5906_R, the supplemental testimony of
15 Mr. Apostol, under WAC 463-30-310, which allows the
16 presiding officer to first set deadlines that permit
17 for the study and presentation of cross and rebuttal
18 evidence, and then second, directs the presiding
19 officer to exclude evidence not submitted prior to that
20 deadline unless an exception applies.

21 The witness had the opportunity to submit this
22 exhibit prior to the deadline of July 14th, 2023, and
23 TCC has not shown that any exception here warrants the
24 admission of this exhibit today. Therefore, the
25 Council should exclude Exhibit 5906_R.

1 JUDGE TOREM: Mr. Apostol, before I
2 go to Mr. Aramburu, can you tell me the date that you
3 were preparing this?

4 THE WITNESS: This was prepared
5 mostly over the last week to ten days.

6 JUDGE TOREM: And let me ask you why
7 the last week to ten days, just so I understand if
8 there was a particular justification. I think I know
9 what it's going to be, but tell me.

10 THE WITNESS: Well, I'm not sure
11 when this map was initially prepared. The Moon memo,
12 when that came out.

13 JUDGE TOREM: Yeah, I think that
14 was -- that was made available to the parties
15 approximately August 9th is when it surfaced. So --

16 THE WITNESS: Yeah, so this wasn't
17 even available until August 9. So it would have
18 been --

19 MS. SCHIMELPFENIG: Your Honor.

20 THE WITNESS: -- hard to work on it
21 without having it available.

22 JUDGE TOREM: Yes,
23 Ms. Schimelpfenig.

24 MS. SCHIMELPFENIG: Yeah. If I may
25 respond briefly.

1 This map is an amendment showing the removal of 13
2 turbines. However, the exact same map, obviously with
3 those 13 turbines in it, was available in the
4 application for site certification as Figure 2.3-1 on
5 Page 2-19 of the updated application for site
6 certification. The witness has had and been able to do
7 this analysis since the application was initially
8 submitted.

9 JUDGE TOREM: I understand. I
10 understand the applicant's position.

11 Mr. Aramburu, do you want to give me TCC's
12 position besides the questions I've already asked
13 Mr. Apostol for background?

14 MR. ARAMBURU: This exhibit was
15 prepared in response to the Moon memo received on
16 August 9 and to the contentions made in the Moon memo
17 that there was significant mitigation of the project
18 based upon the changes that were made. So this memo
19 was produced to -- to address those issues and to
20 address the contentions in the Moon memo.

21 MS. SCHIMELPFENIG: If I may.

22 JUDGE TOREM: Well, no. With all
23 due respect to Tom Petty, we're all having full moon
24 fever. It's admitted.

25 /////

(Exhibit No. 5906_R
admitted.)

MS. SCHIMELPFENIG: Thank you, Your
Honor.

MR. ARAMBURU: And if I may ask a
question of Mr. Apostol.

Q (By Mr. Aramburu) You -- you have reviewed the Moon
memo, and you reviewed the -- the turbines, the 13
turbines that were removed as shown on Page 1 of
Exhibit 5906; is that correct?

A Yes.

Q Do you believe that the -- the deletion of the turbines
that are shown on the map of 5906 will significantly
reduce or mitigate the visual impact of the project?

A It will not significantly reduce impacts, no.

MR. ARAMBURU: Okay. Thank you.

JUDGE TOREM: All right.

Mr. Aramburu, thanks for the background on
reintroducing this exhibit. It's been admitted.

In fairness, then, Ms. Schimelpfenig, if you have
any additional cross-exam or any cross-exam, I guess,
for the witness, now would be the time.

MS. SCHIMELPFENIG: Your Honor, may
we request the opportunity to submit supplemental

1 written testimony from our expert Brynn Guthrie after
2 she has the time to review this exhibit in full since
3 we did not receive this until after 5 p.m. yesterday?

4 JUDGE TOREM: You may offer it.
5 Whether I will allow it, we'll see. At some point we
6 have to cut things off. And, again, with the Moon
7 memo, my interest in admitting this is how much it's
8 been mentioned in the adjudication, and I think the
9 Council members would like to know as much as possible
10 and allow Tri-Cities C.A.R.E.S. to make their arguments
11 on these visual impacts. It's the main aspect of their
12 case.

13 If we need that supplemental testimony, we'll --
14 subject to objection, I'll make a ruling on it. But it
15 may not come in, in time for tomorrow's hearing. There
16 may be a supplemental hearing mid September, but you
17 can make a written motion in between. I'll allow the
18 response time of, I think it was four business days on
19 those motions to allow TCC to respond.

20 MS. SCHIMELPFENIG: Okay.

21 JUDGE TOREM: Ms. Voelckers, I see
22 you might have an additional question.

23 MS. VOELCKERS: Thank you, Your
24 Honor.

25 ////

RECROSS-EXAMINATION

BY MS. VOELCKERS:

Q I do have a question now trying to also digest this information. And we have talked about the Moon memo a lot, Mr. Apostol. And, I guess, first, I don't know how much you've watched of the hearing. So my name is Shona Voelckers, and I am representing Yakama Nation in this adjudication.

Knowing that this memo has been discussed on other impacts that have been raised, I would like to better understand your -- the reason for your answer of "no" in terms of why you -- I think what I heard, but I want to make sure I caught it, was that this map supports that answer that, no, there's -- there's not a reduction of the visual impacts from the Moon memo.

Could you better explain or maybe go into a little more explanation of -- of why, please?

A Yeah. Sure. So there is a slight reduction in visual impact in the northwest corner, where I believe some turbines were removed.

And -- but the -- the problem is that the number of turbines in view and the close proximity of those turbines to most of the viewers -- and I'm primarily talking about those to the north of the project in the Tri-City areas -- proximity in number and the extent of

1 the project viewed along the ridgeline, none of that
2 changes. The removing 12 or 13 turbines in a couple of
3 pockets really doesn't change the big picture at all.

4 So it has some minor value from a couple of
5 viewpoints, but that's about it. It's -- it's just not
6 nearly enough to get the job done.

7 Q And I don't know if this happened in closed record or
8 open record, but I'll represent to you that -- and I
9 believe it was closed record -- that Yakama Nation's
10 archaeologist testified on Monday that the turbine
11 removals that are shown here do not impact or lessen
12 the impact of the project's detrimental harm to
13 traditional cultural properties that she identified.

14 So when you say there was a slight reduction in
15 impacts on the northwest corner, is it fair to say,
16 though, that you're not speaking about reduction to
17 harm of Yakama Nation's cultural properties in your
18 answer?

19 A Correct. Yeah. I'm not speaking to those properties.
20 I'm speaking about the view primarily from Benton City,
21 which is up in that northwest corner. I think there's
22 some benefit to removing those turbines that are close
23 to Benton City, for viewers in Benton City.

24 MS. VOELCKERS: Okay. Thank you for
25 indulging those additional questions.

1 Nothing further from me right now, Your Honor.

2 JUDGE TOREM: Chair Drew? Council
3 members? Any question for Dean Apostol?

4 COUNCIL CHAIR DREW: I have a
5 question.

6 Just looking at the map, I'm thinking about how it
7 was developed. And is it, like, as the bird flies, two
8 miles?

9 **THE WITNESS: Yes.**

10 COUNCIL CHAIR DREW: So --

11 **THE WITNESS: Yes.**

12 COUNCIL CHAIR DREW: -- the land
13 formations that are up on the hill didn't affect where
14 you drew your two-mile line?

15 **THE WITNESS: No. It was strictly a**
16 **distance zone. However, the -- the land formations,**
17 **you know, they are correspondent to some extent with**
18 **the front row of turbines is along the escarpment.**

19 COUNCIL CHAIR DREW: Uh-huh.

20 **THE WITNESS: And the back row of**
21 **turbines is along on the fat area, further back.**

22 COUNCIL CHAIR DREW: Okay. Thank
23 you.

24 JUDGE TOREM: We have Stacey
25 Brewster, and then Lenny Young also has some questions.

1 Council Member Brewster, you're on "mute." If you
2 want to come off, we'll get you your question.

3 COUNCIL MEMBER BREWSTER: Thank you.

4 Thank you, Mr. Apostol.

5 My question is: You mentioned the removal of the
6 approximately 13 turbines was not significantly
7 impacting the visual impact.

8 Can you tell me what -- what it would take, what
9 in your opinion, how many turbines would need to be
10 removed and where?

11 THE WITNESS: So, yeah, I'm glad you
12 asked that, because that gets to one of the reasons
13 when he did this map, was -- and why we zoned it the
14 way we did front to back, is my theory of design and
15 visual impact on this project, consistent with other
16 projects that I've worked on, is that the closer
17 turbines to the observer are the ones that are the
18 biggest problem from the visual impact standpoint.

19 And so what we were trying to do is layer the
20 project, I'll call it front to back. What I mean by
21 "front to back" is north to south. We were trying to
22 layer it in a way that we could model it. We could do
23 a visual model similar to the simulations that
24 Ms. Guthrie's team did and then look at it and say,
25 What happens if you take out the closest turbines to

1 the observer?

2 So those in, for example, in Zone 1, I think there
3 were 60 or so in that zone. The green zone. If you
4 take those out and then you look at it from the same
5 viewpoints, what happens? Does it improve -- does it
6 markedly improve the visual impact, lessen the visual
7 impact?

8 And then if that's not sufficient, what happens if
9 you also remove those in Zone 2? And then we didn't
10 think we'd ever get to Zone 3, but we actually did do
11 some modeling there as well. So we have done some
12 modeling. We have looked at it. And so we've used
13 this map as a guide for that purpose.

14 Does that answer your question?

15 COUNCIL MEMBER BREWSTER: I
16 understand the modeling and how the map works. I'm
17 wondering if you came to a determination as to, say in
18 Zone 1, of the number of turbines left. Would you
19 remove all of them? Would you remove the first row of
20 them? What sort of decrease in turbines would it take
21 for TCC to feel the impact is less than significantly?

22 THE WITNESS: I understand. So we
23 did not kind of do it turbine by turbine or row by row.
24 We did it zone by zone. So we -- we took a look at
25 what it looks like now with all the -- with all the

1 turbines in the view except for those 13 that were
2 removed. And then we removed those in the first zone,
3 which I think, Rick, if you scroll down to the table, I
4 could see the number.

5 MR. ARAMBURU: You want the table,
6 Dean?

7 THE WITNESS: Keep going.

8 MR. ARAMBURU: Here?

9 THE WITNESS: Yeah, right there.
10 Stop there.

11 So that was 57 -- that's 57 turbines in that first
12 zone, which is about 24.7 percent of the total of 231.

13 So we said, Well, what happens if we take those 57
14 out and then you relook at it from -- we used four key
15 viewpoints that we were looking at, which gave us a
16 kind of a east-to-west range so we could see the entire
17 ridgeline from these four viewpoints.

18 And I think if the question is was that sufficient
19 to reduce the visual impact to a level that I would
20 consider acceptable, I'd say no. We didn't -- we
21 weren't able to do -- we didn't achieve that with the
22 first group of reductions.

23 Then we tried the second group of reductions, the
24 blue zone. And surprised me that we still didn't
25 achieve it, at least from two -- no, from -- yeah, two

1 of the four viewpoints were still very high impacts.
2 Particularly Badger Mountain is a -- is a real
3 difficult one because the viewers on top of Badger
4 Mountain, their eye level is about where the elevation
5 of the -- of the top of the ridge is. And you just see
6 so many turbines from Badger Mountain, and you see them
7 all the way to the back of the project, it looks like.
8 And so --

9 MR. ARAMBURU: Dean, can I --

10 THE WITNESS: -- it's very difficult
11 to -- to mitigate --

12 MR. ARAMBURU: Dean, can I interrupt
13 you? Just -- just showing --

14 THE WITNESS: Yeah.

15 MR. ARAMBURU: -- here on 56 --
16 56 -- 5906, RV 5 is Badger Mountain? That's what
17 you're referring --

18 THE WITNESS: Badger Mountain --

19 MR. ARAMBURU: -- to in your
20 testimony? Okay.

21 THE WITNESS: Yeah. That's correct.
22 And I believe also that --

23 MS. SCHIMELPFENIG: Your Honor --

24 THE WITNESS: -- the view --

25 MS. SCHIMELPFENIG: -- I would like

1 to object at this time. This is extensive new
2 testimony. And we have not had the opportunity to
3 review these maps, present our side of the story and
4 our response.

5 And, frankly, this is inappropriate information to
6 put before the Council at this time, because it is
7 Mr. Apostol's own subjective testimony about the types
8 of turbines that should or should not be removed.

9 I just wanted to state our objection on the
10 record.

11 JUDGE TOREM: I'll note your
12 objection. I'm going to allow him to answer Council
13 Member Brewster's question. She's interested in this,
14 and I think the Council is significantly interested in
15 the impacts of view for the scope and scale of this
16 project, and that's what Mr. Apostol's here for.

17 I know that the applicant only got this map last
18 night in preparation for today's cross-exam. Your
19 objection's noted, but the Council will have to give
20 appropriate weight. As I said, if your -- the
21 applicant needs to supplement its testimony for any
22 reason, that motion can be made. And we'll get --

23 MS. SCHIMELPFENIG: Thank you.

24 JUDGE TOREM: -- an appropriate --
25 appropriate ruling on it as time allows.

1 MS. SCHIMELPFENIG: Thank you, Your
2 Honor.

3 THE WITNESS: Was I done answering?
4 I can't remember.

5 JUDGE TOREM: Ms. Brewster, did you
6 need him to further elaborate on how the map was
7 created and the other viewpoints that are hypothesized
8 here?

9 COUNCIL MEMBER BREWSTER: No. Thank
10 you.

11 JUDGE TOREM: All right. Let's move
12 on to Council Member Young's question.

13 COUNCIL MEMBER YOUNG: Thank you.

14 Mr. Apostol, my name is Lenny Young, and I
15 represent the State Department of Natural Resources on
16 EFSEC. And I have the same question for you that I
17 posed to Ms. Guthrie.

18 Why is it important to do this type of analysis as
19 part of an evaluation of a project of this nature? And
20 how can changes in what people see affect them or their
21 daily lives?

22 THE WITNESS: Yeah, thanks for that
23 question. I could probably talk all day on that, so
24 I'm going to try and find a way to keep it short and
25 sweet.

1 There are a number of -- to my expertise, the
2 visual resources dates back with my work with the
3 Forest Service. And the Forest Service pioneered a lot
4 of the visual impact analysis work in this country.
5 And over the years, they sponsored a lot of different
6 studies, a lot of academic studies.

7 And there are just a lot of ways that visual
8 resources affect people's lives. And some of those are
9 very obvious. If -- you know, people go on vacation to
10 the Grand Canyon to enjoy the view, or they go to
11 Yellowstone, or they go to the Columbia Gorge National
12 Scenic Area.

13 Others are closer to home. One of the
14 councilmen -- it might have been you, Mr. Young --
15 mentioned about Portland and the West Hills and the
16 river and the visual qualities there and how those
17 might be disrupted by a project.

18 So when -- unfortunately, over the years, people
19 have tended to kind of brush off visual impacts as just
20 merely subjective, somebody's opinion, not that big a
21 deal. It's not the same as a wildlife impact or water
22 impact.

23 But these visual impacts have physiological
24 impacts on people. They can raise blood pressure. I
25 mean, the sight of a natural area versus the sight of

1 an industrial area. There have been studies done that
2 show that blood pressure is raised when you go from one
3 to the other.

4 And healing is faster. There have been hospital
5 studies done where people have views out their windows
6 of gardens. People with the same disease had views of
7 a brick wall. The ones with the views of gardens --
8 this was at University of Texas. The ones with the
9 views of gardens healed faster. There's a whole
10 movement in the hospital industry about healing gardens
11 based on that original research.

12 People are more creative when they see scenes that
13 they enjoy. Their creativity goes up.

14 Of course real estate values have been talked
15 about elsewhere. Those are tied to scenery.

16 Sense of well-being.

17 These are all very important things. And people
18 do want to preserve local views. They're not always
19 successful in doing that, and -- but -- but people make
20 an effort.

21 And sometimes counties like Benton County
22 recognize they have resources that they should protect,
23 but they don't necessarily take all the steps necessary
24 to get those protected. And I think that's one of the
25 things that happened here, is there's -- there's an

1 obvious scenic resource, which is the ridgeline that
2 borders the entire metropolitan area. And it's not
3 fully protected, and so here we are. You know, we're
4 trying to deal with this project and find something
5 that will work.

6 Did that answer your question, Mr. Young?

7 COUNCIL MEMBER YOUNG: Yes. Thank
8 you.

9 THE WITNESS: Okay. Sorry to
10 ramble.

11 JUDGE TOREM: Counsel for the
12 environment has another question for you, Mr. Apostol.

13 THE WITNESS: Okay.

14 MS. REYNEVELD: I actually don't
15 have a question, Your Honor, so if anyone else has a
16 question prior to me. I just wanted to join in the
17 objection. I had my hand up prior but was not
18 recognized at that time.

19 JUDGE TOREM: Sorry. I did see your
20 hand come up, but it was in a sequence that I was
21 trying to follow of where it came up.

22 Did you want to state any more about counsel for
23 the environment's objection?

24 MS. REYNEVELD: Certainly. I just
25 wanted to join in the applicant's objection to the late

1 admission to this exhibit. I do think that a late
2 admission the night prior to this testimony is
3 prejudicial and really introduces the element of
4 surprise to the parties. And I would just join the
5 opportunity to either provide, you know, responsive
6 testimony or to have this witness recalled for
7 additional questions.

8 JUDGE TOREM: Understood. So we'll
9 make a note of that. And, again, if the applicant's
10 going to submit supplemental testimony, you might
11 coordinate with Mr. McMahan and Ms. Schimelpfenig for
12 the counsel for the environment to do that as well.

13 All right. Any other questions for Mr. Apostol?

14 I'm sure that Mr. Aramburu apologizes for any
15 last-minute surprise. But as he's made abundantly
16 clear, it's been very difficult to roll with the
17 punches, if you will, and with the compressed schedule.

18 Again, my ruling was I think this is information
19 the Council's interested in, as you can see the number
20 of hands going up. That's why I'm making the ruling I
21 am to keep the record as open as possible and as full
22 as possible. If we need that supplemental testimony,
23 we're starting to look at that question of a
24 supplemental hearing date in the week of September 11th
25 to the 15th. So that may be a time, Mr. Apostol, that

1 you might be recalled on that Monday or Friday, is what
2 it's looking like.

3 Ms. Voelckers, I see you have your hand up, and
4 then I'll come back to Council Member Levitt.

5 MS. VOELCKERS: Thank you, Your
6 Honor. While I don't understand this discussion this
7 morning to be inconsistent with anything that
8 Mr. Apostol submitted in his written testimony, if he
9 is recalled, then we will also be asking for time for
10 any additional questions that we might have after
11 reviewing especially this second page of the admitted
12 exhibit. So I just wanted to note that as we're
13 scheduling. Thank you.

14 JUDGE TOREM: Thank you.

15 Council Member Levitt.

16 COUNCIL MEMBER LEVITT: Yes.
17 Hopefully these questions are fast.

18 So I'm Eli Levitt. I'm Ecology's Council member
19 to EFSEC.

20 Could you briefly, just very briefly just
21 summarize how your methods would differ if you were
22 able to do this analysis on behalf of the applicant or
23 another party?

24 THE WITNESS: Well, good question.
25 So it's -- I'll start with it all depends on the

1 applicant's -- what the applicant's trying to achieve
2 and then what they ask you to do.

3 But my -- my approach wouldn't change. So I'm
4 trying to -- I would be trying to find a design of the
5 turbine layout that achieves a visual quality impact
6 level that is less than high. So at least get down to
7 the moderate level of impact, which many people could
8 probably live with. It would still be some impact, but
9 they could live with it.

10 And so I would want to reconfigure the turbines,
11 in particular -- the solar panels don't have much of
12 any visual impacts. The power lines don't appear to
13 have much of any visual impact. But the turbines do.
14 And so that's where I would focus the issue, is on the
15 turbine layout.

16 And I would work with the engineers who are
17 expertise in turbine placement and see what can be done
18 to reconfigure, you know, where they are, find out
19 which ones are the most egregious. Can we move those
20 elsewhere? And if we can't and we get into removals,
21 which ones should we start with as far as removals?

22 Then build a visual model that shows what it looks
23 like. So if I take out 10 turbines or 20 turbines or
24 however many or move them, and let's take a look at it,
25 and would say, Do we meet the visual objective of

1 getting it down into a moderate level of impact?

2 If that doesn't work, you go to the next layer.
3 Maybe there's another 10 or 20 that are the next-most
4 egregious. Pull them out or push them to the back or
5 push them somewhere else, and you try it again.

6 And you just keep doing it until you get to the
7 point where, from all the key viewpoints, you've
8 achieved a moderate level of impact. And like I've
9 said, the most difficult place to do that from is going
10 to be Badger Mountain. But for most of the other
11 viewpoints where you're down lower and you're looking
12 up, you don't see as many turbines, the possibility
13 certainly exists to reach a point where you could get
14 to a moderate level of impact.

15 Does that answer your question?

16 COUNCIL MEMBER LEVITT: Yes. Thank
17 you.

18 And would you do anything differently when it
19 comes to involving stakeholders in assessing the
20 viewpoints?

21 THE WITNESS: Yes. For sure.

22 The best way to do this is to have the
23 stakeholders decide whether it's reached an acceptable
24 level of impact or not. It's not to have me do it.
25 Not to have Ms. Guthrie do it. Not to have SWCA do it.

1 But to have the people who are going to -- going to be
2 looking at it every day, have them do it.

3 And so that involves structuring your public
4 involvement and outreach in a way that goes out to
5 those communities, finds a comfortable setting for
6 them, either takes them into the field to their
7 preferred viewpoints and then models it from there or
8 the nearest possible viewpoint to what they might
9 prefer.

10 Because there could be -- you know, there could be
11 an infinite number of viewpoints in a metropolitan area
12 this big. And so for practical reasons, you do need
13 representative viewpoints.

14 But, yeah, you have to talk to those people who
15 have been left out and ask them what's important to
16 them, where is it important, how do they feel about
17 what it looks like under this scenario, this scenario,
18 this scenario. You can't just hand them a
19 take-it-or-leave-it proposition.

20 COUNCIL MEMBER LEVITT: Is it fair
21 to say you have decades of experience doing visual
22 impact assessments in different places?

23 THE WITNESS: Yeah, dating to 1986.

24 COUNCIL MEMBER LEVITT: And given
25 your decades of professional experience, do you think

1 the applicant and Tetra Tech methodologies were robust
2 in nature?

3 THE WITNESS: They're -- they're
4 reasonably robust in doing the assessment of the
5 impact. They -- what they completely left out is any
6 attempt at mitigation beyond the 13 turbines that
7 recently were removed.

8 And those -- as Ms. Guthrie's testimony today
9 pointed out, they weren't even consulted. I mean, the
10 vis- -- the -- the visual impact specialists on this
11 team were not even consulted about those 13 turbines.
12 They may have identified a different 13 turbines or a
13 different 20 turbines and said, you know, "These are
14 more problematic visually." But apparently, from what
15 I heard today, if I heard it right, they weren't even
16 asked.

17 So, you know, while their assessment is good
18 enough -- it's got problems, which is in my written
19 testimony points out the -- the problems, especially
20 with the simulations. It's good enough to understand
21 that the impacts here are very high.

22 COUNCIL MEMBER LEVITT: You
23 mentioned your -- your methodologies with stakeholders
24 would be different. What would you do to ensure that
25 leaders of different groups were invited to participate

1 in your individual impact assessment?

2 THE WITNESS: Yeah, thanks for that
3 question. I'm not an expert on public outreach.
4 However, I -- I have worked on -- with public outreach
5 experts on all my projects. And, you know, you have to
6 have the right team, and you have to have the right
7 attitude to go out, and you've got to -- I'm not the
8 expert on how to reach out to, say, BIPOC communities.
9 But you need somebody on your team that has that
10 expertise and can design a process for reaching out.

11 It so happens my partner here is a visual rec- --
12 or sorry -- a public outreach expert, and her approach
13 is always talk to the people and figure out what works
14 best for them. Don't just come in with your plan. Ask
15 them, What works for you? Do you have meet -- do you
16 like to go to public meetings? Do you like to work at
17 home on your computer and do it remotely? Do you want
18 to meet at a park, out in a field? Do you want to go
19 on a field trip?

20 I mean, you have to ask people how they want to be
21 involved.

22 COUNCIL MEMBER LEVITT: And from all
23 the materials that you reviewed to prepare for this
24 testimony and your testimony, itself, did you see
25 anything that indicated to you that that was a

1 methodology that the applicant and/or Tetra Tech used
2 in their approach?

3 **THE WITNESS:** Quite the opposite. I
4 don't understand really what they did to reach out.
5 There's some mention of having some public involvement
6 or community involvement in selecting viewpoints,
7 and -- but it's not clear at all who they talked to. I
8 mean, I don't --- I don't find it anywhere about who
9 they talked to or why they pick those particular
10 viewpoints. So, yeah, I think there's a lot of work to
11 do on that end.

12 **COUNCIL MEMBER LEVITT:** Okay. Thank
13 you.

14 (Simultaneous speaking.)

15
16 **COUNCIL MEMBER LEVITT:** Thank you
17 for your testimony.

18 **THE WITNESS:** Yeah.

19 **JUDGE TOREM:** Ms. Schimelpfenig.

20 **MS. SCHIMELPFENIG:** Yes, just one
21 question, Your Honor.

22
23 **RECROSS-EXAMINATION**

24 **BY MS. SCHIMELPFENIG:**

25 **Q** Hello, Mr. Apostol.

1 **A Hi.**

2 Q I'm Ms. Schimelpfenig. I'm counsel for the applicant.
3 I just have one question for you today.

4 Did you review Section 1.12 of the updated
5 application for site certification?

6 **A I'm sure I looked at it.**

7 **Is it part of the visual impact assessment?**

8 Q It is not.

9 **A So then I probably didn't. Because that's --**

10 Q Okay.

11 **A -- what I focused on.**

12 MS. SCHIMELPFENIG: Thank you. No
13 further questions.

14 JUDGE TOREM: Council members, does
15 that raise any additional questions?

16 And, Mr. Aramburu, it's your witness. I want to
17 make sure you get the last word here.

18 Was there anything else you wanted Mr. Apostol to
19 elaborate on, given the Council's questions and
20 Ms. Schimelpfenig's question there?

21 MR. ARAMBURU: I do not intend to
22 gild the lily. No. Thank you.

23 JUDGE TOREM: All right. Fair
24 enough.

25 Seeing no other questions for you, Mr. Apostol. I

1 appreciate your testimony. As I said, if you might be
2 recalled for supplemental cross-exam, it would be in
3 mid September. And we're coordinating dates that
4 that's going to happen. To be determined still, but
5 that's the planning.

6 (Simultaneous speaking.)

7 (Witness excused.)

8
9 JUDGE TOREM: We have Mr. Poulos as
10 the remaining witness for today. I'm optimistic still,
11 as I was this morning, that we can recall him, say,
12 start at 1:15, and for all the scheduled time, complete
13 our discussion of visual impacts with Mr. Poulos before
14 4, 4:30 today at the latest.

15 So I'm going to adjourn this hearing now. The
16 Council members are going to gather in another meeting
17 room shortly, say at 11:50, and we'll take 10 or 15
18 minutes to go over some procedural issues and talk
19 about the post-hearing deliberations that will be
20 scheduled once the post-hearing briefs are in.

21 So, Council members, you've got an invite to that.
22 Why don't we come back at about 11:50.

23 Ms. Voelckers, anything before we adjourn for
24 lunch?

25 MS. VOELCKERS: Thank you, Your

1 Honor. Just a note that I did e-mail to all the
2 Council members as well as yourself -- I believe to the
3 Council members; I sent it to the general EFSEC -- as
4 well as yourself and the attorney generals for EFSEC my
5 letter. Just in case this is part of the discussion, I
6 wanted you to know that it was waiting in your in-box,
7 the letter about the request for testimony by WDFW.
8 Thank you.

9 JUDGE TOREM: Thank you. Yeah, I
10 confirmed receipt of that, and it's been submitted to
11 Ms. Bumpus. And Chair Drew is aware of it as well.

12 Ms. Perlmutter.

13 MS. PERLMUTTER: Yes, Your Honor.
14 To the extent that the -- that the Council or yourself
15 will take that letter up and the request in that
16 letter, we'd like the opportunity, of course, to be
17 heard before a decision is made.

18 JUDGE TOREM: If there's one made
19 that's leaning toward the in favor of that occurring,
20 that will be necessary perhaps. But if the request is
21 going to be denied, Ms. Perlmutter, I don't think
22 you'll need any input on that. Is that correct?

23 MS. PERLMUTTER: That's absolutely
24 right. Obviously, or clearly, we -- we oppose the
25 request. I would like to have our say if we need to.

1 JUDGE TOREM: All right. I'll let
2 you know.

3 MS. PERLMUTTER: Thanks.

4 JUDGE TOREM: All right. Let's
5 break for lunch. Council, I'll see you in about five
6 or six minutes.

7 And if I wasn't clear, we'll come back at 1:15.
8 1:15.

9 (Pause in proceedings from
10 11:44 a.m. to 1:25 p.m.)
11

12 JUDGE TOREM: All right. Good
13 afternoon, everybody. You can see we added another ten
14 minutes to the lunch hour. Hope that was well
15 appreciated when you saw the slide back up there.

16 And, Mr. McMahan, I did receive your note that
17 Mr. Poulos will be ready at or about 1:30.

18 MR. McMAHAN: Correct.

19 JUDGE TOREM: All right. Let me
20 make sure all the Council members are back. Staff's
21 just going to check the attendance list.

22 MR. McMAHAN: Your Honor, maybe
23 before we do that, I have a question.

24 JUDGE TOREM: Sure. They're just
25 doing that on the side.

1 Mr. McMahan.

2 MR. McMAHAN: Okay. And I know
3 Mr. Aramburu's raised this issue as well, and I think
4 we probably have to figure out what we're going to do
5 about it.

6 There is a request for a battery energy storage
7 system witness from Scout. And if that's going to
8 happen tomorrow, we should probably figure out where we
9 can do that, and we'll make arrangements to have him
10 available.

11 JUDGE TOREM: Mr. Aramburu, can you
12 remind us where we are on that request?

13 MR. ARAMBURU: Well, originally we
14 had the supplement to the Kobus testimony. Turns out
15 Kobus didn't actually write the supplement at all, and
16 it was somebody else that wrote it. And I've sort of
17 assumed that we're not going to have anything on that
18 time. I'm really not prepared to deal with that
19 tomorrow.

20 If you give me the name, I may have some questions
21 for that person, but I've been busy today, and I
22 haven't really counted on that coming up at this time.

23 So I'd be happy to learn of that person, and it
24 would be available, and then possibly examine the issue
25 again and let the parties know if I really do want

1 cross-examination.

2 I don't think it's necessary for Mr. Kobus to
3 appear. I will, for the record, state an objection to
4 the supplementation of his testimony, because he didn't
5 write the supplementation, and he wasn't -- he had
6 somebody else write it. So I don't think it's proper
7 supplementation of a deposition, so I would object on
8 that grounds.

9 And depending on how that turns out, I don't
10 really think I have any questions of Mr. Kobus, so...

11 MR. McMAHAN: All right. So I
12 understand all that.

13 Your Honor, the -- really -- and you have -- you
14 have, in fact, ruled on Mr. Kobus's deposition
15 testimony. I am just simply willing to and will do
16 what I can to reach out to provide the availability of
17 Craig Gustafson, is the name, from Scout to talk about
18 battery energy storage systems and the fire protection
19 issues involved. We can do it in September, or I can
20 make Mr. Gustafson available tomorrow if the parties
21 wish that to happen.

22 JUDGE TOREM: Understanding that
23 Mr. Aramburu may not have a lot of time to prepare for
24 Mr. Gustafson, I would appreciate if you could send his
25 résumé out to all the parties and make him available

1 tomorrow. There's no guarantee there'll be any time
2 added to the schedule in September.

3 So the Council may have questions about battery
4 energy storage facilities and the fire control issues
5 that have been discussed, so I think having him
6 available tomorrow, time allowing, will be appreciated
7 by the Council members, assuming they might have
8 questions, Mr. McMahan.

9 MR. McMAHAN: All right. I'll take
10 care of it. Thank you.

11 JUDGE TOREM: And, Mr. Aramburu, if
12 you have limited questions for him, understanding that
13 you might have additional preparation time at a later
14 date, I just -- I can't guarantee it that September's
15 going to be opened up and a new supplemental hearing
16 scheduled. We shall see where we stand and will
17 address that some more in housekeeping tomorrow.

18 MS. VOELCKERS: Your Honor, if I may
19 on housekeeping, a schedule follow-up to what was just
20 discussed?

21 JUDGE TOREM: Yes. Please.

22 MS. VOELCKERS: It is our
23 understanding from your previous ruling that if
24 Mr. Kobus was to appear tomorrow, any questions would
25 be limited to his supplemental testimony and would not

1 be allowed regarding anything else, including the Moon
2 memo; is that correct?

3 JUDGE TOREM: That's correct.
4 The -- his deposition was taken. I know the Moon memo
5 came to attention shortly after that. But, again,
6 that's mostly in the SEPA side of the house, so I don't
7 really want to air that any further than it has been.

8 So if Mr. Kobus appears and the Council has
9 questions, of course they might stray from the battery
10 energy storage supplement to his testimony or -- but
11 they may have questions about what's in his deposition
12 as well.

13 All the other parties have had a chance to depose
14 him, but the Council hasn't, so I'll give them latitude
15 to take a look at the deposition tonight, and if they
16 have questions that are for Mr. Kobus they think is
17 appropriate, we'll see what they are. And if -- if
18 they -- if you think they're straying into something
19 completely different, certainly you can lodge an
20 objection before Mr. Kobus answers the Council's
21 question.

22 That -- that's not that unusual that we have
23 Council members' questions objected to. I think in the
24 old-school days -- Mr. McMahan could remind me -- they
25 used to hand them in on paper, and we'd circulate them

1 to the parties, and that way no one would know who may
2 have made the objection. But with the virtual hearing
3 format, that's just not how it's going to work. So
4 people have to own their objections, and we'll see if
5 the Council members' questions could be reformulated,
6 if necessary.

7 MS. VOELCKERS: So with that
8 understanding, Your Honor, to that, first is that if
9 that is the limitation on our ability to cross him,
10 then we do not have a need to call him for that
11 purpose.

12 And I'm hearing that Mr. Aramburu does also not
13 have a need to call him. So I would like some clarity
14 on whether or not he even needs to appear if none of
15 the parties are calling him, while of course reserving
16 the ability to ask follow-up questions that we may have
17 to what the Council members do bring out if he is to
18 appear.

19 But I think there's a threshold question here now
20 about whether he even needs to appear. And I don't
21 know that we need to resolve it this minute, but we
22 would appreciate resolving it before the end of day so
23 we can prepare for tomorrow. Thank you.

24 JUDGE TOREM: No -- no suspense.
25 He'll be -- he'll be presented. His -- his deposition

1 he doesn't need to adopt. It's not prefiled testimony.
2 I'm sure he was sworn on the record with his answers
3 already. It's been admitted to evidence. And if the
4 Council members have question on that piece of
5 evidence, they'll ask him. He may appear and not have
6 anything asked of him as has occurred with a few other
7 witnesses. So no suspense. He's on the schedule for
8 tomorrow at some point.

9 Any other questions before I introduce Greg Poulos
10 and his exhibits?

11 I'm not hearing any.

12 (Witness Gregory Poulos
13 appearing remotely.)
14

15 JUDGE TOREM: So good afternoon,
16 Mr. Poulos. How are you?

17 **THE WITNESS: I'm fine. Thank you.**
18 **Thanks for having me.**

19 JUDGE TOREM: We're glad to have you
20 here.

21 I'm going to refer to your prefiled testimony and
22 have you go through the process of adopting it today
23 and letting us know if there's any alterations or
24 updates.

25 I believe it's exhibits marked as 1031, 1032. And

1 there are some cross-examination exhibits, 5904 and
2 5950, that I think Mr. Aramburu will be going through
3 with you.

4 He may also have some questions -- or Mr. McMahan
5 might -- about an exhibit that was recently admitted,
6 5906, that I'm hoping was provided to you over the last
7 hour and a half so that you might be ready to answer
8 questions about that.

9 So I'm going to have you raise your right hand.
10 I'll swear you in, get them adopted. I'll have
11 Mr. McMahan give kind of the 30,000-foot view of what
12 you'll be adopting there, and then Mr. Aramburu has a
13 number of questions.

14 Mr. Aramburu, I think you've put in for two hours
15 of time today. So at 3:30-ish, 3:45 at the latest, I'm
16 going to be putting on the brakes, so be efficient with
17 the time you have. We might take a break in between
18 for five minutes, so let me know when you think there's
19 a good time. But around 2:30, 2:24, we'll want a
20 five-minute comfort break. And then I'm going to hold
21 you to that time estimate of 3:45 at the latest, and
22 we'll go from there.

23 Mr. Poulos, if you raise your right hand.

24 ////

25 ////

1 GREGORY POULOS, appearing remotely, was duly
2 sworn by the Administrative
3 Law Judge as follows:
4

5 JUDGE TOREM: Do you, Greg Poulos,
6 solemnly swear or affirm that all the testimony
7 contained in the exhibits you submitted, 1031 and 1032,
8 and all your answers today will be the truth, the whole
9 truth, and nothing but the truth?

10 **THE WITNESS: I do.**

11 JUDGE TOREM: All right. Thank you.
12 So 1031 and 1032 are admitted. And our records
13 clerk, Ms. Masengale, will add that to the exhibit
14 list.

15 (Exhibit Nos. 1031_R and 1032
16 admitted.)
17

18 JUDGE TOREM: Mr. McMahan, a little
19 bit of preview of what we're going to hear, and then
20 I'll turn it over to Mr. Aramburu.

21 MR. McMAHAN: Yeah, Your Honor. And
22 I hate to say this, but Mr. Poulos has not reviewed and
23 has not received 5905, which I think is the same
24 exhibit that was provided from Mr. Apostol.

25 **THE WITNESS: I have 5905. I did**

1 not get 5906. I think that was referred to.

2 MR. McMAHAN: Correct. And given
3 the rush of things and, frankly, the untimeliness that
4 we've all talked about this morning, that has not been
5 circulated to Mr. Poulos.

6 JUDGE TOREM: Why don't you send him
7 an e-mail now, if you can. Otherwise, he's going to
8 see it on the screen when Mr. Aramburu displays it.

9 So, Mr. Poulos, I think given your expertise as
10 stated in your materials, you should be able to respond
11 to whatever questions, seeing it for the first time.
12 If not, let us know. If at the break you need to
13 review it before you have questions, we may do it that
14 way.

15 All right. Mr. McMahan, any statement otherwise
16 about introducing your witness?

17 MR. McMAHAN: Yeah, Your Honor, I
18 don't know if it's on my end or the parties' end, but
19 you cut out a bit there. And I'm looking at a
20 not-very-clear screenshot of you, Judge Torem. And it
21 may be on our end. So I'm wondering if others are
22 having --

23 JUDGE TOREM: I'll try to look more
24 clear. But it looks good on our end. And we'll go
25 from there.

1 What you might have missed when I cut out was just
2 asking if you wanted to introduce your witness, and
3 then we can turn him over to Mr. Aramburu so we don't
4 take any more of his time.

5 MR. McMAHAN: Yes. Thank you, Your
6 Honor.

7
8 DIRECT EXAMINATION

9 BY MR. McMAHAN:

10 Q All right. Dr. Poulos, are you out there still?

11 A **Yes. I -- I am here.**

12 Q All right. Thank you. I see you now.

13 Would you please -- well, first of all, I'm going
14 to preface --

15 MR. McMAHAN: Just a little bit of
16 prefacing, Your Honor. And I talked to Mr. Poulos
17 about this last night. There are issues that are in
18 play, and there are issues that are off limits as a
19 consequence of the striking orders, so I want to make
20 sure that we all are on the same page there.

21 I think in play -- issues that are in play involve
22 choice of turbine technology, project size, and impact
23 on surrounding projects. The issues that are off
24 limits, per the striking order or orders, are wind
25 resource potential, economic feasibility and viability,

1 grid availability, proprietary data, and relying on
2 CETA or other clean energy policy matters.

3 So I talked to -- I did send that to -- to
4 Dr. Poulos last night. And he's aware of it, but I
5 just want to make sure this is appropriately framed.

6 JUDGE TOREM: I think that's
7 generally --

8 Off mike, please.

9 Q (By Mr. McMahan) So do you understand that,
10 Dr. Poulos?

11 A I do. Yes. I've got a list here.

12 JUDGE TOREM: Mr. McMahan.
13 Mr. McMahan, I think that's generally correct. I think
14 the wind resource question might be as to the location
15 of the turbines. But, again, not to go into the
16 economic feasibility. But I think, "Where does the
17 wind blow?" is a key question. But the actual studies
18 and underlying things, it would be just a question of
19 the motivation for where the turbines are sited.

20 I think that's pretty obvious and should be a very
21 small part of the questioning. But otherwise, I think
22 you've adequately and accurately stated the outcome of
23 all the prehearing orders.

24 MR. McMAHAN: All right. Thank you.
25 I just want to make sure we're clear on that.

1 Q (By Mr. McMahan) All right. Dr. Poulos, I have your
2 CV here, which is rather extensive. And I will ask if
3 you want to punctuate anything in your own CV before we
4 get going here.

5 I think you're aware of the scope of the
6 questioning here. And -- and we spent a fair amount of
7 time talking about this over the last couple of days.
8 So I believe that you understand -- if you have any
9 questions about the scope or any issues of questions,
10 you're free to ask them now, but I think you do
11 understand where we're going here.

12 A Yeah, I don't have any questions with respect to
13 emphasis -- about the scope, I don't have any
14 questions. And with respect to emphasis of anything in
15 my CV, I suppose it's important to understand where I'm
16 coming from.

17 My -- my background is in meteorology and
18 atmospheric science. I've studied the way the wind
19 blows over the surface of the Earth for a pretty
20 lengthy research career. And then I entered the -- the
21 wind energy business first, so that I've been in the
22 wind -- that was in 2007. And I've been in the
23 renewable energy business ever since that time.

24 So I serve on some standards committees related to
25 wind energy resource assessment. Might be worth

1 pointing out that there's a international standard
2 that's being concocted at the moment that I'm a
3 participant in, in helping to define that standard.

4 So deeply involved in this kind of work. And
5 that's probably the background. Thank you.

6 Q Yeah.

7 Then quick snapshot of your educational
8 background, please.

9 A Oh. Yeah. Sure.

10 Undergraduate degree in 1989 out of Cornell
11 University in upstate New York, meteorology.

12 And then when you get to graduate school, they
13 change the name to something a little more erudite.
14 They call it atmospheric science, and you study
15 atmospheres of planets and various other things.
16 Master's degree from Colorado State University. And
17 after a brief break at Los Alamos National Laboratory,
18 I went back for my Ph.D. in atmospheric science, which
19 I graduated in 1996 with.

20 Q Thank you, Dr. Poulos.

21 And is it "Poulos" or "Poulos," for the good of
22 the order?

23 A It's "Poulos." "Pool," as in "swim in the pool."
24 "Poulos."

25 MR. McMAHAN: I wanted to make sure

1 we were all saying it correctly.

2 All right. Mr. Aramburu, your witness.

3 MR. ARAMBURU: Okay. Thank you,
4 Mr. McMahan.

5
6 CROSS-EXAMINATION

7 BY MR. ARAMBURU:

8 Q Good afternoon, Mr. Poulos. I'm Rick Aramburu. I'm
9 the attorney for the community organization Tri-City
10 C.A.R.E.S., and I have some questions today concerning
11 your testimony.

12 So let me start out: Rich Simon is going to be a
13 witness for Tri-City C.A.R.E.S. tomorrow.

14 Have you worked with Mr. Simon before?

15 A Yes.

16 Q And what was the nature of your relationship?

17 A Let's see. So after I left the first job I had in wind
18 energy, Clipper Windpower, I joined V-Bar. And Rich is
19 one of the partners at -- at V-Bar.

20 Q And eventually the two of you separated your business
21 interest; is that right?

22 A Yeah, I took over V-Bar in December 31st, 2015.

23 Q Okay. Okay. Now, I've read your résumé and other
24 materials. So I'm interested in knowing your
25 involvement in this -- in this site to begin with.

1 When did you get involved in what we'll call the
2 Horse Heaven site first?

3 **A** **Right. So when I joined Clipper Windpower -- that was**
4 **my first job in the wind business, as I've already**
5 **stated -- they had a suite of projects already**
6 **underway, and that included what is now called Horse**
7 **Heaven Hills by Scout. At the time, it was called**
8 **Columbia. It was a two-phase project that they had.**
9 **And there were already some meteorological towers**
10 **erected at the time I joined Clipper Windpower in --**
11 **was that July 2007, I believe is correct, yeah.**

12 **Q** Were you involved in the selection of this particular
13 site for a wind farm?

14 **A** **No. It existed when I arrived. It had already been**
15 **chosen by Clipper as a project.**

16 **Q** Okay. And were you involved in the layout of the
17 turbines on the site?

18 **A** **Yes. Yes. At that time, I was involved. I served two**
19 **years in that position before joining V-Bar. During**
20 **that time, you would routinely get involved in turbine**
21 **placement activities.**

22 **Q** Okay. Let's see if I can do this by myself here.

23 Okay. Have I successfully shared the screen?

24 Mr. Poulos, can you see that? Poulos.

25 **A** **I certainly can. Thanks. Yes. Thanks. "Poulos."**

1 **Right.**

2 Q Okay. There we go.

3 And there's some lines being drawn on the map.
4 But do you recognize the underlying project here,
5 locations of the turbines?

6 **A Yes. I believe that that's one of the images out of**
7 **either the filing or maybe the Moon memo. I'm not**
8 **sure. But, yeah, I recognize the general area, of**
9 **course. Yes.**

10 Q Okay. And I'll represent to you that this is the map
11 out of the Moon memo, Page 11, that describes the
12 turbines and some of the turbines that were removed.

13 So were you involved in the detailed siting of the
14 individual turbines that's shown on this -- on this
15 map?

16 **A Let's see. The best way to answer that is, early in**
17 **the process, I was. Our company as a whole, though,**
18 **has been involved in that working with the -- the Scout**
19 **internal meteorology team.**

20 Q Okay. But did you have -- there's a particular layout
21 here. I'll just kind of "hone in" on -- on the
22 northwest side of the project. There's a bunch --
23 bunch of named turbines here.

24 And did you locate these individual turbines, 131,
25 132, 130, all those?

1 **A** **I -- I can't say for sure. The last time I worked on**
2 **the array was -- I don't know -- in the range of two**
3 **years, three years ago. So I'm sure it's been modified**
4 **by the Scout team and our other meteorologists on staff**
5 **since that time. But it's -- it's of similar nature**
6 **to -- to what I'm familiar with, I would say for sure.**

7 **Q** **Okay. And it's my understanding that the Moon memo**
8 **included, amongst other things, a removal of a certain**
9 **number of turbines.**

10 Is that your understanding?

11 **A** **Yes. I -- I read the memo, and I see the green**
12 **markings there that indicate the turbines that were**
13 **removed. And I'm familiar with that.**

14 **Q** **Okay. And were you consulted with regard to the**
15 **selection of turbines to be removed?**

16 **A** **To my knowledge, our company was not contacted at all,**
17 **and I certainly was not.**

18 **Q** **Okay. So this was a Scout decision as opposed to a**
19 **ArcVera decision?**

20 **A** **That is correct.**

21 **Q** **Okay. Okay.**

22 Now, have you ever been asked to design a layout
23 of turbines on the site that would minimize the visual
24 impacts of -- of the individual turbines?

25 **A** **I don't recall being given that instruction.**

1 There's some discussion of the -- there was at
2 times discussion of the far left-hand side of that
3 figure, there's a ridgeline that is prominent. I think
4 that was excluded at one time. I don't know if it was
5 exclusively visual, but there may have been a -- a
6 cultural artifact in the far left, upper left-hand side
7 there. But that's -- that's -- that's the only
8 recollection I have of anything close to what you're
9 suggesting or asking.

10 Q Okay. So just so we get ourselves straight right and
11 left, sometimes it's confusing.

12 We talking about east or west?

13 A On the west side, there is a prominent terrain feature.
14 There's this Chandler Butte.

15 Q Okay. And can you see my cursor here, or my hand, so
16 to speak?

17 A Yes, I can.

18 Q Okay. Chandler Butte is what you're talking about?

19 A Yeah. Yeah.

20 So there was --

21 Q And there was discussion --

22 A -- some talk about -- there was some talk about either
23 a cultural artifact or there may have been a discussion
24 once or twice over the years about the viability of
25 turbines due to construction, visibility, et cetera.

1 **That's my only recollection, though. Nothing of the**
2 **current array, in particular.**

3 Q Okay. And was there discussion about removing some of
4 the turbines here, 200, 264, very, very northwest
5 corner of the project?

6 A **Not to my recollection, no.**

7 Q Okay. Do you design a layout of this project that --
8 that would maximize the protection of views and visual
9 resources?

10 A **Did you say could I, or --**

11 Q Could have. Could you?

12 A **-- have I done that?**

13 **Could?**

14 Q Yeah.

15 A **Given -- given inputs as to what --**

16 MR. McMAHAN: Your Honor, I'm going
17 to object to this. This calls for a question for the
18 Scout team. This is not within Mr. Poulos's area of
19 expertise nor has he -- and he's testified that he was
20 not involved in those decisions.

21 JUDGE TOREM: Mr. Aramburu, any --

22 MR. ARAMBURU: No, I'm simply asking
23 him if he was given that and given any of those
24 responsibilities. I think it's a fair question.
25 Visual resources. He does talk about visual resources

1 in here, in his testimony.

2 JUDGE TOREM: Well, let's not
3 belabor the point. I think, pretty clear he said he
4 hasn't worked on this since a couple years ago. That's
5 well before any of the amendments or changes to the
6 application in any form.

7 So I'll have you rephrase your question generally
8 so we can move on, not spend any more of your time
9 chasing after things he clearly hasn't done.

10 MR. ARAMBURU: Okay.

11 Q (By Mr. Aramburu) So I understand, Mr. Poulos, that
12 you -- Poulos, that you were not involved in the
13 amendments to the site certificate application?

14 A **Correct.**

15 Q Okay. Okay. And I have just a few questions about
16 your testimony here, and I'm going to put it up on the
17 screen.

18 And were you able to see that, Mr. Poulos?

19 A **Yes. "Introduction and Qualifications."**

20 Q There we go. Okay. Thank you. Thank you.

21 So I had a couple of questions about your --
22 your -- your testimony.

23 Over on Page 12. Scroll fast.

24 We're going to get there, Mr. Poulos.

25 A **It's okay.**

(Simultaneous speaking.)

MR. ARAMBURU: Okay. Good. Thank you.

Q (By Mr. Aramburu) So Page 12, Lines 13 to 15, sentence there: Given the rather uniform dominant west to east or southeasterly wind direc- -- or northeasterly wind direction, expected the wind turbines would have a common profile.

I've looked at the windrows for this area. I don't see any predominance of northeasterly winds at all.

Am I wrong about that?

A Not -- no, you're not particularly wrong, no. The prevailing wind direction is west-southwesterly from 220, 230, or 240 degrees, depending on the meteorological equipment. And there's a small secondary peak from the northeast, which is what I was trying to refer to. It's actually north-northeast. But they're -- they're kind of like this. South-southwest and north-northeast. That was why it was in parentheses. It's not the dominant direction, but...

Q Okay. And you've had a chance to look at the Exhibit 5904?

1 **A** **Yes. I saw that. Yep.**

2 **Q** **Okay. And you've had a chance to read it.**

3 Do you disagree with any of the information that's
4 contained within this exhibit?

5 **A** **The -- the -- I don't have any -- any concern with the**
6 **presentation of the Pasco airport data. I think the**
7 **interpretation of what it means for the -- the way the**
8 **wind farm would be affected is off. Because the Pasco**
9 **airport measurements aren't the same as the**
10 **measurements up on the hills.**

11 So I don't know if that -- that counts towards
12 your question. But just the interpretation of -- of
13 how the wind farm would be impacted --

14 **Q** **So you --**

15 **A** **-- because those winds aren't necessarily what occurs**
16 **up on the hills, yeah.**

17 **Q** **So you have some meteorological data that indicates**
18 **this is inaccurate, the Pasco airport windrows is**
19 **inaccurate?**

20 **A** **No. No. No. Pa- -- I have no doubt the Western**
21 **Regional Climate Center has the -- the windrows right,**
22 **and what's presented there -- I mean, I haven't gone**
23 **and checked on the -- on -- on their Web page lately to**
24 **pull that data down, but I think that windrow is**
25 **accurate for the airport.**

1 But in complex topography, wind directions vary
2 pretty significantly. And because of -- of the
3 distance from the valley bottom where the Pasco airport
4 is close to the river, and the hills and the irregular
5 topography in the vicinity of the project, you wouldn't
6 expect that particular windrows to represent the winds
7 that would be impacted -- would be felt, if you will,
8 by turbines constructed on the Horse Heaven project.

9 Q So do you have a different windrows for Horse Heaven?

10 A Well, I have access to proprietary data of Scout's. So
11 yes.

12 Q And that's not data available to us, is it?

13 A No.

14 Q Okay.

15 A It's related to the economic value of the project, so
16 it's very sensitive information.

17 Q Okay. Back to -- back to Page 12, there's a -- on this
18 page, you are responding some testimony to a
19 Mr. Apostol --

20 A Mm-hmm.

21 Q -- who testified earlier today.

22 Did you -- did you happen to listen to his
23 testimony?

24 A I did not listen to his testimony.

25 Q Okay. But you're responding to his written testimony

1 here, correct?

2 **A The written. The written. Yes.**

3 Q Okay. Last sentence on Page 12 says, "Removing wind
4 turbines that have been carefully sited...on wind
5 resources and other factors would only serve to reduce
6 the energy production of the project, impacting
7 financial calculations and feasibilities."

8 Is that an accurate statement for you?

9 **A Yes, it -- yes, it is, yeah. The removal of turbines**
10 **reduces the amount of energy produced, which affects**
11 **the amount of money that would be generated by the**
12 **project. So I don't know how it would affect it. I'm**
13 **not running the financial models and economics or, you**
14 **know, off the table for this discussion, but I do**
15 **consider that a accurate statement.**

16 Q So do I understand that the siting of the wind turbines
17 and the number of wind turbines is all done to maximize
18 use of the wind resource?

19 **A It's not quite that simple.**

20 Within a bunch of constraints, right? So -- so
21 there's certain landowners participating. You might
22 start with a large palette. You don't know which
23 landowners are going to participate. And then you go
24 through a series of processes as -- and we get feedback
25 from the developer, that if we're helping design the

1 array -- and I'm talking in general terms with any
2 development project globally -- you get constraints.
3 You might have wetlands. You might have environmental
4 constraints due to birds, bats, and any endangered
5 species. Roadways, transmission lines. Off-limits
6 areas that landowners just designate because they don't
7 want turbines placed there for agricultural or other
8 reasons.

9 There's a number of factors that come into play.
10 But within all that, once you've kind of bound
11 everything, yes, then the -- the general goal is to
12 maximize the energy production across the project.

13 Q I think your answer was rather general, but -- but the
14 location of the wind turbines in particular locations
15 on this site was not something that you did, as I
16 understand?

17 A Yeah, not for a couple years, I haven't literally put
18 dots in a map or reviewed the dots in the map, other
19 than, yeah, reviewing reports related to the project.

20 Go ahead. Yeah.

21 Q Well, did you put the dots on the map before two years
22 ago?

23 A Yes, I did. Yes. And when I was at Clipper in 2007, I
24 put dots on the map for this project. So it's gone
25 through a number of years of development.

1 **Every time there's a new turbine model released**
2 **that has desirable characteristics for a wind farm,**
3 **you're often asked, and sometimes I would participate**
4 **in placing the dots on the map, yeah.**

5 Q So were the dots that you placed on the map for Clipper
6 the same dots as we have on the map now?

7 A **No. The turbine models were much different at that**
8 **time.**

9 Q And the Clipper -- Clipper project, I understand, was
10 not the same exact property?

11 A **Now you're getting back there in history. I don't know**
12 **if they had the same landowner boundary. I can't**
13 **recall.**

14 **In the -- definitely in the same area. But**
15 **whether it extends as far east, west, north, south,**
16 **that could well have changed and then likely did**
17 **change.**

18 Q Okay. Over on Page 15, statement on Page 4, you're
19 talking about Mr. Sharp's testimony now. And he -- and
20 I'm reading from Lines 8 to 15 on Page 15 of your
21 written testimony. And he talks about very cold days.

22 A **Mm-hmm.**

23 Q And it says the examination of on-site wind data, five
24 years of data on the escarpment, shows that the coldest
25 1 percent of days, the overall wind speeds are reduced

1 by 10 percent.

2 And I understand that that is based upon the
3 proprietary meteorological data that you have?

4 **A That's right.**

5 Q Okay. Now, I understand that oftentimes during the
6 very cold winters and cold spells we have in the
7 northwest, that there are multiple days in which the
8 wind doesn't blow at all, north, south, east, or west;
9 is that correct?

10 **A It certainly -- certainly can not blow at all in -- it**
11 **depends where you are, so it's complex topography.**

12 So in those high-pressure system moments where you
13 get calm, clear days generally, the winds at elevation
14 can be dramatically different than, say, felt at the
15 airport station, for example. That's one of the times
16 where conditions can be quite different. That may
17 relate to why you're -- you're hearing different things
18 about that.

19 You know, meteorology is quite complex, and flow
20 in complex terrain, river valleys, hills, hot change in
21 elevation, varies quite a bit.

22 Q But I have looked at data -- and I suspect you have as
23 well -- that comes from BPA --

24 **A Mm-hmm.**

25 Q -- that says how much wind production is going on, on a

1 five-minute basis.

2 Am I right about the existence of that data?

3 **A Oh, I thought you were referring to meteorological**
4 **data.**

5 **You're referring to energy production data from**
6 **some source? I'm not familiar with the five-minute**
7 **production data, no.**

8 **Q** Okay. But are you aware that BPA does keep track, on a
9 time basis, of the production of wind energy in the
10 Northwest and in the state of Washington that is
11 publicly available?

12 **A As a whole. I actually was not aware that five-minute**
13 **data was available, but it's great to hear.**

14 **Q** I'll send you the link, Mr. Poulos. Thank you.

15 The -- so a couple of questions here about the
16 project, itself.

17 And so I put up for your review, Mr. Poulos,
18 Page 2-101 of the amended or the updated site
19 certification agreement.

20 Have you seen this page?

21 **A Yes, I have.**

22 **Q** Did you help write it?

23 **A I did not.**

24 MR. McMAHAN: Excuse me. Excuse me,
25 Mr. Aramburu. If I can interrupt you.

1 You're asking about information from the site
2 certificate agreement. Are you talking about the
3 application for site certificate?

4 MR. ARAMBURU: I am, Mr. McMahan.
5 Thank you for the correction. I appreciate it.

6 MR. McMAHAN: All right.

7 Q (By Mr. Aramburu) So this is Page -- Page 2-101 of the
8 amended -- we'll go up at the top -- the updated EFSEC
9 application for site certification. Okay?

10 A **Right. Yeah. I recall that one.**

11 Q Okay.

12 A **Yep.**

13 Q Okay. Did you have -- did you have a hand in preparing
14 this?

15 A **I did not.**

16 Q Okay.

17 A **And to my knowledge, to my knowledge, no one in our
18 company was involved either.**

19 Q Okay. And this -- there's Phase 2A and Phase 2B of the
20 project.

21 Do you see those phases?

22 A **One second here.**

23 **Yes, I do. I see the two phases. Yeah.**

24 Q Okay. And were you consulted about which phase might
25 be the best?

1 **A I was not.**

2 Q Okay. I wanted to ask you some questions about --
3 about wind turbines and wind speeds.

4 **A Okay.**

5 Q And I recall in your testimony here that -- kind of
6 looking for it here -- that what goes on, on one wind
7 turbine may affect the next wind turbine down the line.

8 Is that -- is that a physical factor in wind
9 turbine production?

10 **A Yes, I -- yes, it is, if you're referring to what I**
11 **think you are, which is generally referred to as wakes.**
12 **In our firm, we call that now wind farm atmosphere**
13 **interaction. But, yes, each wind turbine reduces the**
14 **wind speed as it passes through the turbine and leaves**
15 **behind a wake.**

16 An analogy -- it's not a perfect analogy -- might
17 be a rock in a river that interferes with the -- the
18 flow of the river, and you'll see the eddies and slower
19 area of -- of water behind a rock in a river in the
20 same way behind the obstacle, the wind turbine -- of
21 course, it's spinning, and it's a different physical
22 process -- also creates slower winds behind the wind
23 turbine.

24 It takes some time for those winds to recover to a
25 reasonable speed, and so that's an important factor not

1 only in the energy production, but in the -- so but
2 that therefore means it's an important factor in the
3 overall design and optimization of a wind farm to
4 maximize energy production.

5 You don't -- basically, you don't want the wind
6 farm turbines too close if the wind is dominant from a
7 certain direction in particular. But it really depends
8 a lot on the site-specific meteorological data.

9 Q Okay. So I'm putting up on the screen Exhibit
10 5905_X --

11 A Oh, yeah.

12 Q -- which -- which is listed to be a document that you
13 prepared October of 2022, just recently, regarding
14 long-range wind losses for apparently proposed
15 development in South Africa.

16 Is that a paper that you prepared?

17 A Yes, I believe that I presented that in -- in Cape Town
18 at a wind energy conference, technical.

19 Q And does this paper focus on downstream losses of
20 energy due to upstream wind turbines?

21 A It does.

22 Q Okay. And I understand from reading through this --
23 and you're obviously much more familiar with it than I
24 am -- is I'm looking on Page 3 of the document now,
25 5905, and this basically explains that wind comes in

1 fast and goes out the other side half as fast.

2 Is that -- is that an accurate statement?

3 **A It's -- it's not always exactly half. That was**
4 **representative of a kind of typical value. But -- but,**
5 **yes, it is slower behind the turbine as the wind passes**
6 **through. That's how it generates energy ultimately.**

7 Q Okay. So half as fast is a good rule of thumb?

8 **A Rule of thumb.**

9 Q So -- and on Page 4, you're talking about wind turbines
10 getting much bigger.

11 **A Mm-hmm.**

12 Q And I see we're not dealing offshore wind turbines
13 here, although you were in South Africa.

14 But here, on-shore wind turbines 2019. Is this
15 about -- the one on the left there, the 2.5-megawatt
16 turbine, is that about what we're going to have up here
17 on Horse Heaven Hills?

18 **A I -- I believe approximately, yes. In the -- in the**
19 **application, there are two sets of turbine scenarios**
20 **presented, so it's not entirely certain.**

21 Q And do you --

22 **A But yes. Yeah.**

23 Q Do you have a recommendation as to between those two?

24 **A Well, those -- that is a very generic picture. That is**
25 **not sufficient information to make a recommendation on.**

1 It is -- it is just a piece of the puzzle. You need
2 technical specs, and then you need to do a bunch of
3 analysis to make that recommendation. But -- but, in
4 general, in general terms, I can't -- I can't make a
5 recommendation just on that picture that you displayed.

6 Q And I want to be more specific as to this, this
7 project.

8 A Mm-hmm.

9 Q Let's see. Got to go up just a little bit here.

10 A That's fine.

11 Q Okay. Hope everyone isn't getting dizzy with all this
12 scrolling around.

13 So, Mr. Poulos -- Poulos -- excuse me -- Page 2-17
14 of the ASC has potential turbine specifications.

15 Do you see that page?

16 A I do, yeah.

17 Q And based upon your background and experience, is it
18 more likely that Turbine Layout 1, Option 1, is going
19 to be built over Turbine Layout Option 2?

20 A It's impossible to say. Because it's really a
21 commercial decision. Depends on a lot of factors that
22 go into financial models that we don't run on behalf of
23 Scout Clean Energy. So I can't really -- I can't
24 really say. It could be the -- could be, but I
25 don't -- you know, and those could work.

1 **There's new turbine models that have been released**
2 **now, so -- so, yeah, those -- I can't say without**
3 **having --**

4 Q Okay.

5 A -- access to the proprietary commercial financial model
6 and the goals of their investment in the development.
7 And that's out of --

8 Q Okay.

9 A -- scope, so we shouldn't talk about that.

10 Q Okay. Good. Good. Okay. But let's get kind of
11 focused down on Turbine Layout Option 1.

12 A Okay.

13 Q And there's 2. There's a GE 2.82 and a GE 3.03
14 turbine, with a slightly larger rotor diameter on the
15 3.03 model.

16 Of those two --

17 A Yes.

18 Q -- which would be most likely to be seen, according to
19 your knowledge, on this project?

20 MR. McMAHAN: Your Honor, I'm going
21 to object.

22 (Videoconference disconnected.)

23 (Pause in proceedings from
24 2:12 p.m. to 2:17 p.m.)

25 /////

1 JUDGE TOREM: We're back on the
2 record. And I apologize. We had about a five-minute,
3 we'll call it a power outage for what we have today,
4 where Microsoft Teams shut us down. We've now
5 restarted the meeting, and everybody's had an
6 opportunity to rejoin. We've got the full Council back
7 that we had before, and as far as I can tell, all the
8 parties and participants.

9 Let me just give a quick ask for any of the
10 parties, if they see somebody that's not listed that
11 you wanted in the meeting. I thought I saw everybody
12 come up in the participants. Let me know. But
13 otherwise, we're going to get started here.

14 Mr. Aramburu, back to you. And we'll look for a
15 break probably, that we start, in about 20 to 30
16 minutes, if you get to that point, and then we'll come
17 back on and finish the remaining hour of your time from
18 there.

19 Q (By Mr. Aramburu) Okay. Mr. Poulos, before we were so
20 rudely interrupted here, we were looking at Page 2-17
21 of the amended site certification --

22 A Mm-hmm.

23 Q -- application for site certification, and I was asking
24 you what the most likely turbine would be under
25 Layout 1.

1 And do you have an opinion on that?

2 MR. McMAHAN: And, Your Honor,
3 that's where I jumped in with an objection, and so that
4 means I'm probably responsible for everybody going
5 down, because I was busy doing that.

6 The objection is that Mr. Poulos has already
7 testified to this. He was not -- he is not the
8 designer of the project. He's not selected the
9 turbine. That is a business decision of Scout Clean
10 Energy.

11 JUDGE TOREM: Are you saying that he
12 can't comment, in his expertise, what he thinks about
13 that question?

14 I mean, I know he's not making the decision. I
15 think that was posed as a hypothetical, wasn't it,
16 Mr. Aramburu?

17 MR. ARAMBURU: It was.

18 MR. McMAHAN: I don't see where that
19 goes as a hypothetical. Thank you, Your Honor.

20 JUDGE TOREM: Yeah, I don't want it
21 to stray into any, you know, economic viability
22 questions, but I think it's just a what-if, and he's
23 talking about the turbine wind wake and based on the
24 model.

25 Is that right, Mr. Aramburu?

1 MR. ARAMBURU: That's correct.

2 JUDGE TOREM: All right. So restate
3 that question. Mr. Poulos, after all this exchange,
4 needs to know what you're asking.

5 Q (By Mr. Aramburu) What I'm asking, Mr. Poulos, is that
6 under Turbine Layout Option 1, would you think it most
7 likely that the GE 3.03 turbine or the GE 2.82 turbine
8 would be employed on this project?

9 A Well, based on my experience, given the hypothetical,
10 they're both quite productive turbines. So -- hmm.
11 Again, without the technical specs, those are both
12 pretty productive turbines, so either one may come out
13 ahead in terms of energy production and wakes based on
14 those detailed technical specs, again which don't
15 really show up here.

16 Turbine power curve, the turbine thrust curve, the
17 cutout wind speeds, the temperature cutout speed --
18 temperature cutouts -- sorry -- low and high
19 temperature cutouts.

20 So the -- it's a more intricate question. But
21 those are both -- both via -- good, viable options, I
22 would say, for that generation of turbines. Those have
23 both been available on the market for some time.

24 Q Not to be facetious, but in these selections, other
25 things being equal, the bigger the better?

1 **A** **No. No, not really. Gosh. You know, there's so many**
2 **factors that come in there.**

3 With -- well, it gets into the economics, you
4 know. So -- so maybe we shouldn't discuss. But let's
5 just say the price of the turbine matters a lot too.

6 **Q** Okay. Okay. Let's not -- let's not go further with
7 that issue.

8 So I want to go back to your paper that you
9 delivered.

10 **A** **Yeah.**

11 **Q** And, again, I want to be respectful to you.

12 I see in this paper and other papers you've
13 delivered on the subject that -- that you're trying to
14 get people to use your new modeling that you have that
15 you call wind parameter -- what is it? -- wind --

16 **A** **Wind farm parameterization.**

17 **Q** Wind farm parameterization.

18 And we'll just call it "WFP"?

19 **A** **Mm-hmm.**

20 **Q** And are you attempting to persuade people to use the --
21 that modeling in consideration of wind farm locations?

22 **A** **Well, to some degree, yes. But mainly as regards**
23 **long-range wakes. So that -- that refers to very**
24 **distance. Wind farms that previously had been**
25 **considered too distant to have a material effect, and**

1 so the wind farm parameterization wasn't developed by
2 our company. It is part of a piece of publically
3 available software from the National Center for
4 Atmospheric Research that's used widely in the industry
5 by many industry participants, including our company.

6 We happen to have distinct experience in that area
7 and hired a Ph.D. student from a local university, the
8 University of Colorado, to study the usefulness and
9 accuracy of that parameterization for real commercial
10 purposes, and we found it to be quite useful.

11 So the purpose of this presentation was just to
12 relay to the folks that are planning to develop South
13 Africa's wind -- offshore wind energy industry --
14 there's no offshore wind farms in South Africa at the
15 moment -- about to be wary of these long-range wakes
16 and the design in choosing areas of the ocean to pick
17 based on the way the wind blows so that there's no
18 ad- -- there's no excessive adverse impact at long
19 range.

20 So that's -- that was the nature of that
21 particular presentation.

22 Q Okay. So I'm looking at Page 5 here, and there's --
23 there's a diagram here that shows wind turbines and
24 what I take to be the wakes from those wind turbines.

25 Is that -- is that what this simulation, I suppose

1 we would call it, is designed to tell us?

2 A Right. Yes. So this is an actual photograph of -- of
3 an offshore wind farm in Europe where they took some
4 pretty spectacular pictures where the turbine wakes are
5 kind of visualized by the fog being stirred up as it
6 passed through the wind farm.

7 Yes, the -- and so, yes, the wind farm
8 parameterization that -- that we're talking about
9 applying to wind farms and we validated against some
10 real cases is what I was talking about in the
11 presentation meant to capture not really these close-in
12 ones. This is more a picture of within a wind farm
13 wakes. That's handled really well with existing
14 software packages. The WRF WFP does a better job with
15 very long-range wakes.

16 Q Okay. And this is an actual photograph.

17 Can you tell me what the distances are between the
18 turbines as shown on this photograph on Page 5 of
19 Exhibit 5905?

20 A Sure. Yeah. I think these wind farms -- I think this
21 is, I believe -- and this is just purely from memory.
22 I believe this is the Horns Rev wind farm, which is
23 roughly seven by seven rotor diameter spacing, I
24 believe.

25 Q Seven rotor diameters sort of lengthwise and seven

rotor diameters -- well, here. Let me do it like this.

Between the two turbines is seven rotor diameters?

A Let's see. Yeah, I guess we can kind of estimate that by eye. Let's see.

One, two, three, four -- yeah, maybe that's more like eight.

Q Okay.

A Yeah, approx- -- approximately -- you know, we can look that up or measure it on Google Earth, if needed.

But -- but, yeah, approximately seven -- seven to eight rotor diameters in a grid, gridded pattern. There's no topography to work with there in landowners, so you have some flexibility in the preparation of --

Q Okay. And --

A -- offshore yeah.

Q Okay. Excuse me.

And the distance between where my hand is, the upstream wind turbine, and the second turbine downstream, do you know what that distance is?

A I think it's the same. I think this is a regular grid of turbines.

Q So rotor diameter times seven?

A I believe so. It's -- I believe so, yeah.

Q Okay. We're not holding you to detail here. I understand that.

1 **A Thank you.**

2 Q Okay. But let's go back to the -- to the project that
3 we have --

4 **A Right.**

5 Q -- now.

6 And this project is laid out in a more or less
7 linear fashion from northwest to southeast.

8 Is that fair to say?

9 **A Yeah. Yeah. In general terms, yep.**

10 Q Okay. And there -- and on the drawing, there is an
11 arrow that says that the wind resource crosses
12 approximately five miles and five turbine strings.

13 Do you see that?

14 **A I do. Yeah.**

15 Q Okay. Now, the modeling that you're talking about, the
16 WFP modeling, was that used in any fashion for the
17 Horse Heaven project?

18 **A It was not, no.**

19 Q Okay. And was there any modeling done down here --
20 you're familiar --

21 **A By the way, I -- just a -- just a little correction.**

22 I just measured by eye. I -- I think -- I think
23 that five miles, which would be ten kilometers -- I'm
24 sorry -- would be eight kilometers, is a little long.
25 I think it's more like four miles, 6 -- 6.5 kilometers

1 or so.

2 In any case, I get the point. Cross -- crosswise,
3 the widest spot, roughly five miles, we'll call it.
4 But I think it's closer to four. But in any --
5 technical detail.

6 Please go ahead. Sorry. You were -- you were on
7 a more important point. Go ahead.

8 Q I'm not sure it was more important.

9 But was there any -- you're familiar with the Nine
10 Canyon project?

11 A Yeah. Yeah. Its proximity to Horse Heaven, yeah.

12 Q And -- and is that generally in the location where I've
13 got my hand going?

14 A It is.

15 Q Okay. Was there any effort to estimate the impacts of
16 wake turbulence on the production in the Nine Canyon
17 project?

18 A Not -- not by our company on behalf of Scout Clean
19 Energy.

20 Q Do you know if it was done?

21 A I don't. I don't know.

22 Q Okay. Now, and looking at your materials here, I want
23 to go up to just kind of where this line is. And we
24 have some -- we've got a scale on here, so we can
25 measure it if we want to, correct, Mr. Poulos? Measure

1 the --

2 **A I'm sorry.**

3 Q -- distance?

4 **A Sorry. One more time.**

5 Q I said, we've got a scale down here at the bottom. We
6 can measure things, if we like, right?

7 **A We do.**

8 Q In miles?

9 **A Yes.**

10 Q Okay. But we don't need to do that for this question.

11 And that is, given the -- the impacts of wake
12 turbulence, wouldn't you expect the production of
13 turbines downstream here to be impacted by the upstream
14 turbines?

15 **A Yes. And that would be handled by the wake or wind**
16 **farm atmosphere interaction models run during the**
17 **course of energy calculations for a client in general,**
18 **but overall, yeah.**

19 Q Okay. I'm not going to ask you the outcomes or the
20 results, but to ask you whether that modeling was done
21 for this project.

22 **A Yes, it is a standard practice in wind resource**
23 **assessment to run wake or wind farm atmosphere**
24 **interaction models, and it was done for this project by**
25 **our company.**

1 Q Okay. And when was that done?

2 A I think the most -- I think the most recent assessment
3 we've done for this project was dated November '22. I
4 can look that up, but that's my recollection.

5 Q And do I understand that correctly that that is
6 considered to be proprietary information, not
7 disclosable to TCC?

8 A Certainly it contains information that's directly
9 related to the economic viability of the project from a
10 third-party independent consultant, and we keep our
11 clients' data private. So we couldn't -- we couldn't
12 share it unless Scout were to give permission to share
13 it.

14 Q Well, they're not willing, so...

15 So, but let me ask the question here.

16 We've got some turbines down here, 12, 14, 15, 16,
17 17.

18 A Yeah.

19 Q Would those turbines produce less energy in a southwest
20 wind than the turbines that are upstream, 125, 129,
21 130?

22 A Hmm. You know, it's -- that's a great -- that's a
23 great question.

24 Q Thank you.

25 A It's entirely possible they could produce less than the

1 upwind turbines. The upwind turbines are seeing wind
2 that is free stream; that is, it's unaffected -- except
3 for something we call blockage -- by other turbines,
4 and then wakes are produced as you move from string to
5 string or row to row, if you want to use that
6 terminology. But as you move to the northeast,
7 following your arrow there.

8 So that back row, that is -- I'm sorry -- the
9 northeast row could produce less for that reason, the
10 accumulated effect of multiple wakes, but it could also
11 produce more for some kind of trickier reasons.

12 The topography there is decreasing in -- in
13 elevation, but one of the complexities of meteorology
14 is that occasionally you get acceleration downhill and
15 downwind. So it's possible that while the wakes
16 decrease the wind, the -- the wind, itself, there is
17 naturally higher, which produces an offsetting effect.

18 And then there are other even more complicated
19 atmospheric kinds of things that might cause wind to,
20 the term we might use is mix downward from above,
21 higher wind speeds, and hit that back row at the same
22 time.

23 So I can't say off the top of my head for sure,
24 every single time. It depends on atmospheric structure
25 and other complexities at any given moment in time.

1 But it's certainly possible they'll produce less. And
2 it may be a greater than 50 percent chance or even 80
3 percent chance. But I -- I'd really have to do the --
4 the time series analysis to really figure -- figure
5 that out. But the -- the average production could be
6 lower.

7 Q Okay.

8 A Certainly.

9 Q Now, and then so also on the -- on the map here, where
10 you have prevailing wind direction, December-February.

11 And I understand from the airport windrows that --
12 that the northwesterly winds, Pasco Tri-Cities Airport,
13 that we have on the same drawing, northwest winds,
14 during the wintertime, during December, January,
15 February, you indicated some reluctance to use that
16 data.

17 Is there -- do you have any better data than that
18 about the change in wind direction?

19 MR. McMAHAN: I would object, Your
20 Honor, if he's seeking proprietary information here.
21 The Pasco data, I believe, is the data that we have in
22 hand.

23 JUDGE TOREM: I'm sure
24 Mr. Aramburu's being careful not to request any
25 proprietary data.

1 So let's keep the answer away from that,
2 Mr. Poulos. If you can answer the question.

3 **THE WITNESS: Sure. Would you**
4 **repeat the question, please.**

5 Q (By Mr. Aramburu) Previously, you indicated some
6 reluctance to rely upon the Pasco airport data because
7 of more localized conditions.

8 My question to you is: Do you have any better
9 information that would indicate the prevailing winds
10 during December, January, and February would come or
11 not come from the northwest quadrant?

12 A Let's see. So we have access to the proprietary data
13 from the project, like we do from many wind projects
14 and the world, and that is generally considered better
15 information.

16 Quite often airport data, especially in complex
17 topography, is inaccurate, so not representative of
18 what would be occurring where the turbines are. So I
19 think that indicates why I'm reluctant.

20 And earlier in the -- in the presentation, I
21 actually put my hands up and sort of showed what the --
22 the windrows really looks like. It's not like -- it's
23 not like the Pasco airport experiences. And those --
24 that meteorological tower at the Pasco airport is ten
25 meters aboveground. These wind turbines are tens of

1 meters aboveground. Their hub heights are 90 meters
2 or -- it's in that table you showed.

3 So there's a number of reasons why airport data is
4 not representative of what would be occurring on-site.
5 And, yes, we do have access to the proprietary data.

6 Q Okay. Without getting into the proprietary data, is it
7 fair to say that the wind direction generally changes
8 during the December, January, February time frame from
9 other times of the year?

10 A Yes, it does. Not to the indicated direction, but it
11 does change.

12 Q Okay. Okay. We're fooling around here with
13 proprietary data.

14 So -- so if the wind is really coming from the
15 northwest as shown here, the downstream wake turbulence
16 effects that come out of your WFRP model would -- would
17 be useful in looking at turbines that are 10 to 15
18 miles downstream, correct?

19 A Well, not necessarily, no. We haven't found that in
20 our studies. We're testing it for that purpose and
21 hoping it will be able to do internal wind farm
22 atmosphere interaction studies accurately, but we've
23 only confirmed its accuracy once you're past the wind
24 farm.

25 So -- so if there's a cluster of turbines that are

1 all close together, our current existing tools have
2 been validated in the industry to do well at that
3 circumstance. So what you're saying I wouldn't say is
4 true. The WRF wind farm parameterization method that I
5 describe in that South Africa exhibit works well once
6 you're well away from the wind farm, better than our
7 current -- current models commercially available from
8 our competitors and ourselves, and then -- somebody got
9 an update.

10 The -- so, no, I wouldn't -- I wouldn't recommend
11 using WRF WFP method to determine, for example, the
12 wakes of -- of Horse Heaven when the wind's from any
13 direction.

14 But if you were looking at, say, let's say there
15 was another wind farm 10 kilometers or 20 kilometers
16 away on the other side of the valley, let's say, you
17 might be concerned with the wakes at that kind of a
18 range and be able to calculate them using that
19 particular method. Otherwise, I'd just recommend using
20 currently existing known models in the industry that
21 have been validated for that purpose.

22 Q But as a general matter, if the winds coming from the
23 northwest, as we're talking about here, these -- these
24 downstream turbines, location of 8, 4, and 5, those
25 would be impacted, would they not, by the upstream

1 turbines?

2 A If the wind were from the northwest, yes. That doesn't
3 happen very often, but -- so it doesn't really affect
4 the array design all that much. When the wind isn't
5 too often from any given direction, you don't ignore
6 it. You do your best to work around that, but you --
7 you don't generally let it materially affect the array
8 design.

9 MR. ARAMBURU: Judge Torem, I am
10 just about at the end of what I'm going to -- I think
11 I'm going to ask the witness. So could we take a bit
12 of an early break here? And I think I'll be done very
13 quickly after that.

14 JUDGE TOREM: Okay. Let's do that.
15 Let's take a break till 2:50. We'll come back.

16 And, Mr. McMahan, this will be your chance also to
17 get ready for any redirect. I'll ask the other parties
18 if they have questions and the Council members after
19 your redirect.

20 We'll be on recess till 2:50. Thank you.

21 (Pause in proceedings from
22 2:41 p.m. to 2:50 p.m.)

23
24 JUDGE TOREM: We're back on record.
25 It's now 2:50.

1 Mr. Aramburu, did you have time to decide if you
2 had any additional questions?

3 MR. ARAMBURU: Well, as much as I
4 would like to ask Mr. Poulos about the winds in Hells
5 Canyon and Salmon River, where I've spent many days on
6 the top of a river raft, but that will be for another
7 day. So I don't have any further questions.

8 Thank you, Mr. Poulos.

9 JUDGE TOREM: Yes, I'm aware of your
10 friendly association with the Columbia Gorge. That's
11 just fine.

12 MR. ARAMBURU: This is Snake River
13 country.

14 JUDGE TOREM: Yes.

15 Mr. McMahan.

16 MR. McMAHAN: Yeah. Thank you, Your
17 Honor.

18
19 REDIRECT EXAMINATION

20 BY MR. McMAHAN:

21 Q Thank you, Dr. Poulos, for your testimony. I like to
22 ask this kind of blanket question.

23 Were you -- do you feel that you were able to
24 answer all the questions that were asked, or do you
25 have anything to add to any of the questions that were

1 asked at this point in time?

2 **A No. I think I got -- I think I got the points out that**
3 **needed to be made rather thoroughly. Thoroughly enough**
4 **for everybody to understand.**

5 Q All right. I tend to agree.

6 So I want to take you to this supercool photo that
7 you have in front of us from your PowerPoint
8 presentation.

9 Can you explain kind of the difference between
10 ocean conditions here with flat water and kind of the
11 characteristics here versus a project like Horse Heaven
12 with a lot of topography and terrain?

13 Are you implying that there's kind of this -- a
14 uniformity based upon this ocean picture, or could you
15 maybe explain just a little bit better about how
16 topography and other conditions fit into this question
17 of wake effect and how -- and how that affects the
18 project, without -- again, without entering into
19 confidential information?

20 **A Sure. And I -- if you're showing a picture, I can't**
21 **see it. I'm not seeing your screen, Tim, if that's**
22 **what your --**

23 Q Yeah, so it's the cross-examination Exhibit 5950. I'm
24 really just taking you to the -- to the photo, would
25 be --

1 **A** **Oh. The photo. Okay.**

2 **Q** That's where I'm taking you too. And I don't --

3 **A** **Okay.**

4 **Q** -- (videoconference technical difficulties) show it
5 again.

6 **A** **Yeah, no --**

7 MR. ARAMBURU: I'm in -- I'm in a
8 helpful mood this afternoon. I'll put it up.

9 MR. McMAHAN: That's very kind of
10 you, Rick.

11 MR. ARAMBURU: There we go.

12 **THE WITNESS: So --**

13 MR. ARAMBURU: Okay.

14 **THE WITNESS: So, yeah, right, no,**
15 **condition -- conditions offshore, as you would expect,**
16 **are much different. There's no roughness elements, as**
17 **we call them, vegetation, hilltops, terrain, canyon**
18 **structures, rivers, those sorts of things. So the**
19 **wakes tend to persist differently offshore than on**
20 **shore for those reasons. It's actually an active area**
21 **of research and discovery for the whole industry.**

22 But -- but, yeah, the complex topography tends to
23 break up the wakes, more or less. So undulations in
24 topography, frictional elements like trees or other
25 rough, rocky areas will break up the wakes. So they're

1 two entirely different areas. Although the fundamental
2 principles of calculating them can be addressed if you
3 have a model that is sophisticated enough to do so.

4 Q Okay. Got it. Great. Thank you.

5 Can you -- I don't know if you're aware of this,
6 but can you compare the rotor diameter separation in
7 various projects in the Northwest and really kind of
8 what -- what impacts -- what affects the decisions on
9 separation of turbines? Not this project, but
10 generically and in general.

11 A Yeah, so -- so the design of wind farms has -- has
12 evolved to some degree over the 15 years, 16 years I've
13 been in the industry, but -- but the fundamental
14 principles were established long ago.

15 So there were some, let's say, overzealous folks
16 early in the day that were using tighter-than-expected
17 spacing of turbines, tighter than optimal spacing of
18 turbines, because the rapid change in turbine
19 technology over time changed the way those turbines
20 interact with each other as they grow taller and
21 bigger.

22 So the industry has moved to somewhat broader
23 spacing over time. So the early Pacific Northwest wind
24 farms tend to have tighter side-by-side and
25 string-to-string spacing, more like one and a half to

1 two to two and a half rotor diameters -- as small as
2 that; not all of them are subject to that -- and
3 six-to-ten rotor diameter string-to-string spacing over
4 times -- over time, though that's changed, and it's
5 moved to a somewhat wider spacing, more like 3 by 10 or
6 3 by 12 or 4 rotor diameters side by side and 14, this
7 kind of thing, to help reduce those -- those wakes and
8 improve project performance.

9 Q Okay. Just one moment, Your Honor.

10 Oh, yeah. Right. (Indiscernible.)

11 Can you explain what you mean by
12 string-to-string --

13 A Oh.

14 Q -- space?

15 A Sorry. Yeah. So in the -- in the picture that was
16 shown of the dots on the map for Horse Heaven Hills,
17 there's sort of irregularly shaped rows. So I call
18 them strings because it -- "row" implies linear.
19 String. They kind of undulate like this. They're
20 following topographic features for various reasons.

21 And the distance between those strings has to be
22 far enough that you're optimizing -- well, one of the
23 things you're optimizing is the amount of energy
24 produced by the next string downwind. So if the wind's
25 always from one direction, there's a longer distance

1 between strings than there is side by side, because the
2 wind very seldom blows along the rows.

3 So along -- the -- the r-o-w-s, rows, along the --
4 the string or row. Very seldom you get wind that way,
5 so you preferentially put them close together,
6 perpendicular to the wind direction, and you have a
7 greater distance string to string or row to row. So a
8 row of closely spaced turbines is separated by a much
9 longer distance to another row.

10 Q Okay. Got it.

11 I think this is my last question?

12 Topographically, does the wind tend to speed up,
13 whether kind of heading up a hill or down a hill? And
14 particularly I'm curious how that works in a topography
15 and terrain such as Horse Heaven generically again.

16 A Right. Right. So in Horse Heaven, the wind tends to
17 come from one direction the majority of the time. That
18 is kind of 220 to 230 degrees. That means southwest,
19 pure southwest wind. Not all the time.

20 But in any case, with that wind direction, terrain
21 features that are perpendicular to that wind direction
22 can have acceleration downwind downhill. So stronger
23 winds can be measured and present just based on
24 fundamental meteorological principles, and that -- that
25 is modulated quite a bit by the vertical temperature

1 structure of the atmosphere. Common term for that is
2 "atmospheric stability."

3 But in any case, in a situation like Horse Heaven
4 Hills, you want to avoid areas upwind and downhill. So
5 if there's a hill feature like -- like this, you'll
6 generally find -- and the wind's coming from this
7 direction, you'll find weaker winds going into the back
8 of my hand here, stronger winds at the top, like
9 everybody expects. On a ridgetop, you expect it to be
10 windy. When you climb the top of a mountain, you
11 expect it to be windy.

12 But there's this effect, which is common in
13 meteorology. Downslope windstorms are caused by this
14 effect. You get acceleration over and down the hill.
15 Not really steep hills. It gets very turbulent. But
16 nice, smooth hills like there at Horse Heaven Hills,
17 you get acceleration downhill. So you get some wind
18 speeds in those areas so -- so turbines can be placed
19 in those. It's one of those methods we use to help
20 improve wind farms.

21 Q Got it. That's great.

22 And then just one final question.

23 When you talk about 260 degrees, I assume you mean
24 compass 260 degrees?

25 A I'm sorry. Yeah. On the compass. So southwest winds

1 is probably the easiest way to say it. But, yeah, 220
2 to 240 degrees is southwest winds.

3 Q Okay.

4 A On --

5 MR. McMAHAN: Your Honor --

6 Yeah. Thank you, Dr. Poulos.

7 Your Honor, I think I -- I don't believe I have
8 any further questions.

9 JUDGE TOREM: All right. I'm going
10 to come to the Council. If Mr. Aramburu can take the
11 pretty wake picture down.

12 One thing while we're getting that down,
13 Mr. Poulos. You kept referring to "WRF," and I think
14 that was the Weather Research and Forecasting Model; is
15 that correct?

16 THE WITNESS: That's right. It's an
17 acronym placed upon it by the developers of it.

18 JUDGE TOREM: The court reporter and
19 I were belaboring whether it was one R or two Rs, but I
20 think my Googling brought us to "WRF."

21 THE WITNESS: That's right.

22 JUDGE TOREM: Okay. Thank you.

23 THE WITNESS: And "WFP" is "wind
24 farm parameterization."

25 JUDGE TOREM: Excellent. That will

1 help with the transcript.

2 Chair Drew, Council members, by show of hands, any
3 questions? I see them going up already.

4 We'll start with Lenny Young. You'll introduce
5 yourself to Dr. Poulos, and fire away.

6 COUNCIL MEMBER YOUNG: Good
7 afternoon, Dr. Poulos. My name is Lenny Young, and I
8 represent the State Department of Natural Resources
9 on -- on EFSEC.

10 Appreciate this information. It's really
11 fascinating.

12 Do you think that your work is raising any public
13 policy issues where long-range wake losses have the
14 potential to influence the quality of the wind, if you
15 will, that is available several or many miles away from
16 the property where the turbines are installed on other
17 jurisdictions or other landowners' lands?

18 THE WITNESS: I haven't gotten that
19 feedback from State agencies or the Bureau of Ocean
20 Energy Management, which governs those offshore wind
21 farms. I have some -- a YouTube video where I explain
22 the impacts on New York offshore wind farms. And so I
23 haven't gotten that response, but I do think it's a
24 very important issue for wind farm developers to be
25 aware of. And, you know, it's becoming much more

1 prominent in the industry.

2 We first talked about, in 2021, in a conference,
3 and subsequent to that now some of the -- our major
4 competitors that are much larger companies than ours
5 have come out with their own research validating it,
6 so -- or verifying the same thing, which is not to be
7 unexpected. They were just doing it in their own way.

8 So -- so I do think there are implications, and --
9 but to date, there's been no -- I don't know -- public
10 policy modifications based on the little alarm bells
11 I'm ringing out there.

12 COUNCIL MEMBER YOUNG: Yeah, just --
13 it just struck me that right now the focus seems to be
14 on intrafarm considerations, but there seems to be the
15 potential for interfarm interactions in terms of sort
16 of who gets the clean air and how could a wind farm in
17 one location influence the ability of neighbors up to a
18 considerable distance away to have a viable project.

19 THE WITNESS: Yeah, that's exactly
20 the point. And so you've got it. I'm glad you've got
21 it. I feel like sometimes maybe I don't explain things
22 clearly enough in my public presentations. But, to me,
23 it's very obvious we need to start thinking about this
24 more. But the -- the -- the response from public
25 policy has not -- not been there yet, so...

1 COUNCIL MEMBER YOUNG: Thank you.

2 JUDGE TOREM: Any other questions
3 from Council members?

4 All right. Not seeing any.

5 Mr. Poulos, I like to ask this because this is
6 such a key question for us on the visual stuff today.

7 What's the takeaway -- other than what Mr. Young
8 just asked you on getting down in the weeds, what's the
9 takeaway from all the Council members today from your
10 testimony as far as looking at this wind farm from
11 various directions and considering any other
12 wind-related issues?

13 THE WITNESS: Well, I mean, based on
14 my experience with the wind farm for all these years, I
15 mean, it's developed like more or less any other wind
16 farm has that I've been around.

17 Development takes a lot of twists and turns, and
18 ultimately there's a permitting process everywhere you
19 go. Some are different than others. And you have to
20 get through that step, you know, for a variety of
21 reasons of subsequent downstream things that have to
22 happen. If you're not permitted, you're not going to
23 get a big loan from the bank to -- to fund your wind
24 farm, for example.

25 So things have to happen. And some of the

1 permitting process is a necessary step for every wind
2 farm. So I don't see anything unusual here. I don't
3 see anything unusual in the way the turbines were
4 aligned, arranged on the topography.

5 Generally there are meteorological measurements
6 taken, and those guide the energy part of the process,
7 and then there are these constraints that come from a
8 lot of different quarters, environmental, private
9 landowners, and then ultimately the turbine models and
10 various other construction costs are taken into account
11 and proprietary financial modeling, which causes the
12 developer to take it forward based on what their
13 requirements are to go forward internally, make it
14 worth the investment, as it were.

15 So I don't see anything unusual here, is -- is the
16 fundamental thing. There are many other wind farms or
17 wind farm clusters of this size already operating in
18 the United States. We'll work on much, much, much
19 larger wind farms than this around the world on a
20 day-to-day basis with clients.

21 So that would be my main -- my main takeaway, or
22 main point, I guess. It's just been done the way I've
23 seen it done with advancements over time, and here we
24 are, you know, so it makes sense to me.

25 JUDGE TOREM: And when you talked

1 about the permitting process and the changes along the
2 way, would the -- if there's a permit granted here,
3 there'd be some other micro-siting decisions that may
4 move or eliminate turbines along the way based on the
5 mitigation that would be required, and you'd have to
6 re-rack and re-stack some of those other decisions
7 accompanied -- for the company to do?

8 **THE WITNESS: Yeah, so let's see. I**
9 **think you're saying -- well, what are you -- I'm sorry.**
10 **What's -- repeat it again. What is it you're trying to**
11 **get at?**

12 **JUDGE TOREM: Well, you said there**
13 **was the permitting process as it went. I'm getting to**
14 **the tail end of the permitting process, where if one is**
15 **granted, there might be some other mitigation measures**
16 **required. There might be some micro-siting decisions**
17 **to move things, from what I heard from your wake effect**
18 **analysis and then, again, the economic viability that**
19 **will leave for the applicant and the company to get**
20 **into. The natural process of that would fit into**
21 **everything you just said as well, I think.**

22 **THE WITNESS: Yeah. Yeah.**
23 **Absolutely. You -- you -- you respo- -- what I've seen**
24 **developers do is respond, you know, to challenges**
25 **and -- and do so as, you know, in a -- in this case, I**

1 mean, based on the Moon memo, in a very neighborly way
2 kind of.

3 You know, there's some more aggressive developer
4 types out there. Scout is not behaving like those. So
5 I don't want to pass judgment. I -- it's not my
6 decision, right? I just observe the behaviors of many
7 different kinds of developers around the world, and
8 some are, you know, different, so...

9 JUDGE TOREM: Yeah.

10 The -- I asked simply because I think the Council
11 members are looking at this now. And we're on Day 7 of
12 8 in this hearing. They've got a lot of information.
13 They've started to think about questions that are
14 important to consider on their recommendation to the
15 governor. Some of them come down to individual wind
16 turbine strings or solar arrays. And I wanted them to
17 be clear that they don't have to think about the
18 economic viability. That's up to the applicant. They
19 don't need to think about the wind wake issues. They
20 need to say, Well, this wind turbine is bothersome or
21 not for any given reason and make their decisions based
22 on topics in front of them. Maybe not the downwind
23 issues, if you will.

24 THE WITNESS: Yeah, well said.

25 JUDGE TOREM: All right.

1 **THE WITNESS: Right. Right.**

2 JUDGE TOREM: All right. I just --
3 contextually, I wanted to put that out there as we get
4 toward the end as we're sewing things up.

5 Let me see if the other parties have any questions
6 for you before we let the afternoon go by here.

7 Ms. Voelckers, I see you on my screen. I'll ask
8 you first.

9 MS. VOELCKERS: Thank you, Your
10 Honor. I -- I don't have a question, but I did want to
11 address something real quick --

12 JUDGE TOREM: Well, let's hold that
13 if it's not for this witness.

14 Yeah, let's hold that if it's not for this
15 witness.

16 Okay. Ms. Reyneveld.

17 MS. REYNEVELD: I don't have any
18 questions for this witness. Thank you, Your Honor.

19 JUDGE TOREM: Mr. Harper, by chance?

20 MR. HARPER: No questions, Judge.
21 Thank you.

22 JUDGE TOREM: All right. Let me
23 come back to Mr. Aramburu. And, then, Ms. Voelckers,
24 I'll come back to you and make sure it's nothing that
25 needs to be asked and answered while Mr. Poulos is with

1 us.

2 Mr. Aramburu.

3
4 RECROSS-EXAMINATION

5 BY MR. ARAMBURU:

6 Q Mr. McMahan asked you some questions concerning wake
7 turbulence over water as opposed to over land. And I
8 understand your answer to be that -- that the cool
9 water through the ocean provide a more stable set of
10 circumstances, and wind turbine wake turbulence tends
11 to be farther, go farther in those circumstances.

12 Is that -- is that a fair characterization?

13 A Well, that -- I don't believe that's what I said. That
14 may be the case. It really depends on location.
15 Everything's very site-specific because the meteorology
16 of the globe changes in pretty fascinating ways
17 depending where the jet stream is, where your latitude
18 is, longitude, whether there's a coastline, whether
19 it's cold water, warm water, we have an El Niño going
20 on, really warm water over there. That changes the
21 stability of the atmosphere.

22 So stability is definitely a major factor in -- in
23 the behavior of wakes. They tend to travel further
24 when the atmosphere is stable and less far when the
25 atmosphere is unstable. They tend to recover, I should

1 say, as they -- that have deficit behind the turbine
2 tends to recover faster if the atmosphere is turbulent,
3 that is unstable, and it tends not to -- that -- that
4 deficit tends not to recover if it's stable.

5 So that's an expansion sort of what I -- what I
6 had said. I hadn't -- I don't think I said that as
7 part of the answer originally, but that's
8 clarification.

9 Q Thank you.

10 So if we're in the middle of one of these eastern
11 Washington Tri-Cities cold spells with --

12 A Mm-hmm.

13 Q -- inversions, would that create a stable environment
14 that might tend to extend wind turbine -- wake
15 turbine -- wake turbulence --

16 A Right. Probably. Probably. Yeah. It will depend,
17 again, on everything else that's going on in the
18 weather, so...

19 Q Okay. And you've seen those rather lengthy times of
20 cold weather with -- with inversions in the Tri-Cities
21 area?

22 A Yeah. It can happen anywhere, yeah. And anywhere in
23 the mid latitudes.

24 Q Mr. Young asked you some questions about the importance
25 of -- of assessing these -- these wake losses

1 downstream. And I just want to go back to your exhibit
2 again, and I'm looking at Page 8 of your exhibit. And
3 this was your PowerPoint.

4 **A Yep.**

5 Q And on that page is -- you say that the bottom line is
6 that a gap in knowledge can easily translate to
7 billions of dollars. Is that dollars, ZAR?

8 **A That's South African rand. That's the --**

9 Q Okay.

10 **A -- acronym for that.**

11 Q Okay. And how much is that in dollars, roughly?

12 **A You just divide by about 20.**

13 Q Okay. Okay. So lots of money?

14 **A To me it is.**

15 Q Okay. Okay. And so you -- you propose that to -- to
16 properly analyze that, you use the WRF WFP method to
17 analyze what those losses might be?

18 **A The -- the -- yeah, I think the key is in that -- in**
19 **that bottom line, first line, it says for long-range**
20 **external wake losses. So not for the -- the wind farm**
21 **cluster, itself. The current models work**
22 **satisfactorily for that. But for long range, you know,**
23 **yeah, yeah, so 25-kilometer range between these --**
24 **these two in that example you just pulled up, so...**

25 Q Okay.

1 A Yeah, just -- just a clar- -- it's a nuanced
2 clarification. But, you know, in our -- in our
3 technical niche, it's very important to understand the
4 difference, yeah.

5 Q 25 kilometers is about 18 miles?

6 A Yes.

7 Q Okay.

8 A 15.5, I think. Yeah.

9 Q Okay. You're better at math than I am.

10 And you've talked about -- there were some
11 questions about rotor diameters. And I think on Page 6
12 over here, you talked about the rotor diameters for
13 this project of your testimony? Page 6.

14 So Page 6, 14 to 18, you talk about the rotor
15 diameters to be applied for this project?

16 A Array designs. Right. You're talking about that
17 sentence right there with the dot?

18 Q Yeah.

19 A Yeah. Yeah, that's what I wrote.

20 Q Okay. Okay. Accurate statement?

21 A Yeah. Yeah. Commonly. Right. Yeah. We see some
22 exceptions. In Brazil, they're still doing 1.5 rotor
23 diameter, side by side spacing, which is frustrating,
24 but we can't change everybody all the time. So, yeah,
25 the more experienced -- well, yes, that's current --

1 **current common practice, I guess, best way to put it.**

2 MR. ARAMBURU: No further questions.

3 JUDGE TOREM: Mr. Aramburu, at this
4 time, did you want to move the admission of 5904 and
5 5905?

6 MR. ARAMBURU: I would, please.

7 JUDGE TOREM: Any objections to
8 those two exhibits coming in? I hope not. 'Cause I
9 really like that wake picture.

10 All right. Hearing none. Those will come in.

11 (Exhibit Nos. 5904_X and
12 5905_X admitted.)

13
14 JUDGE TOREM: Are there any other
15 questions for Mr. Poulos?

16 MR. McMAHAN: None from the
17 applicant.

18 JUDGE TOREM: Well, Mr. Poulos,
19 Dr. Poulos, I'm only disappointed no one referenced my
20 favorite song by Kansas, so we'll just move along and
21 let you go.

22 **THE WITNESS: Thank you, everyone.**
23 **It's been a pleasure.**

24 (Witness excused.)

25 /////

1 JUDGE TOREM: All right. I think,
2 Ms. Voelckers, you had an issue you wanted to raise.
3 And maybe now is a good time since we finished the
4 witness testimony for the day.

5 Did you want the Council members to be present as
6 you make this? Or I've got one other thing to do with
7 them present.

8 MS. VOELCKERS: Thank you, Your
9 Honor. And just a quick -- I just wanted to, if I
10 could, just give a -- finish my explanation. I don't
11 have any questions for Mr. Poulos.

12 So I just wanted to say that we -- Yakama Nation's
13 not having questions is not a reflection of not -- my
14 client not having interest in understanding how a
15 project can move forward in a way that -- that
16 minimizes T -- TCP impacts and still is a viable
17 project.

18 We just don't have information, you know, to -- to
19 be able to really engage and, you know, remain
20 concerned that that information was withheld despite
21 all parties having entered into confidentiality
22 agreement.

23 So while I do agree with Your Honor's point that
24 the Council is not, you know, required by -- by the law
25 or shouldn't be, under the law, making economic

1 analysis about the project, they are going to receive a
2 SEPA analysis that only has two options.

3 And so I just want to be clear that my client
4 remains interested in having a dialogue about
5 responsible siting, location design of this project and
6 other projects, and so I want to make sure that my lack
7 of questions was not taken as anything less than that.
8 Thank you.

9 JUDGE TOREM: No, and I don't think
10 that a lack of questions from anybody is an endorsement
11 of any other sponsoring witness. It just simply means
12 that there were no questions.

13 I think that can be made clear in post-hearing
14 briefs as well for any of the parties. There are so
15 many issues in this adjudication. I don't expect each
16 party to have questions for each and every witness.

17 So thanks for that clarification. It helps put
18 the Council a little bit on notice of what they have
19 heard or not heard.

20 Mr. Aramburu, if you could do me the favor of
21 taking that screen share down.

22 MR. ARAMBURU: I do love the note
23 here that says stop sharing, which is not what my
24 mother told me.

25 JUDGE TOREM: Well, today we're

1 going to play nice and not share for the whole time.
2 That's just fine.

3 Council members, I want to address one thing
4 first. For tomorrow's schedule, we've now eliminated
5 the need to recall Mr. Poulos, so that frees up another
6 hour and ten minutes that would have been at 9:00 in
7 the morning.

8 I'm going to ask Ms. Reyneveld if she thinks her
9 witness, Mr. McIvor, can be ready sooner than the 10:15
10 he was originally scheduled. And, if not, we might
11 take Dave Kobus, who I know is super flexible on his
12 time and has been watching the proceedings. He might
13 be able to go first and move him out of the way and
14 then take Mr. McIvor.

15 We'll find out whether Council Member Wallahee is
16 available. Maybe we can set Jerry Meninick as before
17 or after Mr. McIvor as well.

18 So we're going to start at 9:00 tomorrow. Just a
19 question of which witnesses you're going to have first.

20 Ms. Reyneveld, what can you tell me?

21 MS. REYNEVELD: Yeah. Your Honor,
22 Mr. McIvor is available at 9:00 tomorrow.

23 JUDGE TOREM: All right. Thank you,
24 Ms. Reyneveld. So maybe we'll start with him tomorrow
25 and allow things to fall into line after that.

1 The -- he's been allocated an hour. If we give
2 him an hour and a half or so, maybe we could schedule
3 Mr. Meninick at -- at or around 10:30 -- that might
4 even accommodate a break between witnesses -- and then
5 Mr. Kobus.

6 Parties, are there -- assuming that Councilman
7 Wallahee from the Yakama Nation is not available
8 tomorrow to fill any time and appear personally in
9 front of you, were there any other witnesses besides
10 Mr. McIvor, Mr. Kobus, and Jerry Meninick?

11 Ms. Voelckers?

12 MS. VOELCKERS: Thank you, Your
13 Honor. I just -- I just wanted to be clear.
14 Mr. Meninick is available in the afternoon tomorrow.
15 So that's the -- the -- what I've confirmed with him,
16 and he is holding the full afternoon, but I did not
17 confirm his availability for tomorrow morning.

18 JUDGE TOREM: Okay. Maybe you can
19 let us know in housekeeping tomorrow morning or an
20 e-mail tonight the earliest possible time he's
21 available. Because I think, frankly, if we get a big
22 block in the middle of the day, it won't be as economic
23 with everybody else's time, but if he's got a
24 commitment in the morning, I understand, given what we
25 were working with. So hopefully he's at or before

1 1:00. If we can do that, that would be fantastic.

2 Mr. Aramburu.

3 MR. ARAMBURU: Rich Simon is
4 scheduled to testify tomorrow.

5 JUDGE TOREM: Right. He is
6 scheduled, and I understand his flight is either -- if
7 I'm reading my Alaska Airlines page correct -- either
8 82 or 94. Those come in at around -- at or before
9 noon. That was our bet a couple weeks ago -- right? --
10 that that flight would be on time, and I'm glad to tell
11 you that both those flights today from Anchorage were
12 on time.

13 MR. ARAMBURU: Okay. Well, given
14 the circumstances, we were having some real concerns
15 about his appearance and nonappearance and that kind of
16 thing. So I do -- I would like some flexibility. And
17 I don't know what's going to happen in September, but I
18 would prefer not to have my witness get off even an
19 on-time Alaska Airline flight and have to immediately
20 come into these hearings.

21 So if there's some way we can schedule him so he
22 doesn't have to come off a six-hour airplane ride, I
23 would request that. But I understand your prior
24 ruling.

25 JUDGE TOREM: I have the flight down

1 as three hours and 29 -- maybe it's four hours and 29
2 minutes with the time change. Maybe it's the other
3 way. But hopefully the latest flight he's on gets in
4 at 11:30. So hopefully by noon or thereafter, he will
5 be in a place we have a good, quiet phone connection.
6 But keep us posted as you hear from him tomorrow.

7 MR. ARAMBURU: Okay.

8 JUDGE TOREM: So you're right. We
9 have -- we have Mr. McIvor. We have Mr. Kobus. We
10 have Mr. Meninick as his schedule allows, and Mr. Simon
11 at the whims of Alaska Airlines, and then Caseymac
12 Wallahee. So, Council members, those are the remaining
13 witnesses unless anyone reminds me there's anyone else.

14 Hearing none. It sounds like that's what we have
15 for tomorrow.

16 Let me turn to another question, Ms. Voelckers.
17 You sent and reduced to writing the question you had
18 earlier about the wildlife biologist Mr. Watson and
19 Jason Fidorra and whether or not -- whether or not the
20 Council would benefit from having them available for
21 personal testimony.

22 We had a little bit of a consultation over the
23 lunch hour with Council on some procedural matters, and
24 I had a chance to consult with Director Bumpus on this
25 question. And after consulting with the attorneys

1 general as well, I think the general decision, and
2 rather than have you wait for a response letter, we
3 could just take care of it here. I've been asked to
4 transmit it.

5 The Council doesn't really think -- EFSEC doesn't
6 think it's appropriate or necessary to call either of
7 those wildlife biologists. That would be just the
8 purpose of allowing for cross-exam of those witnesses.
9 And they weren't sponsored as prefiled testimony from
10 any party.

11 And I recognize there were some limitations made
12 on the ability for Yakama Nation to delve into the SEPA
13 process during the discovery depositions. But those
14 depositions -- and they're quite lengthy; I think one
15 is at least 400 pages -- are already in the record.
16 And the Council has access to that.

17 And my understanding from reviewing the transcript
18 was that at least two parties asked detailed questions,
19 and the other parties were present as well. So
20 everybody's had a bite at the proverbial apple and had
21 a chance to flesh out anything they want to with
22 Mr. Watson and with Mr. Fidorra. And their testimony
23 speaks for itself, and the -- the Council members will
24 review it, but I don't think there's any benefit from
25 bringing forward any friendly cross-examination to

1 flesh it out.

2 They are not anybody's witness. They are the
3 Council's contracting consultants and experts. And
4 allowing them to be essentially called by a party after
5 the discovery deposition, I don't think it would be
6 fair to the other parties to have someone pull them
7 into their alignment and say, Yes, this is what we're
8 saying Fish and Wildlife would do.

9 And on the question of what Fish and Wildlife
10 would do, if you recall, the statute allows those State
11 agencies to petition for intervention. And they're
12 parties of right. It's -- they're not even
13 intervenors. And Fish and Wildlife indicated by their
14 absence that they're not taking a position in this
15 matter as an agency. They're not participating on the
16 Council, and they haven't provided a witness to be
17 called that can speak on behalf of that State agency.

18 So for those reasons, I don't know if Ms. Bumpus
19 is going to respond to your letter in writing or not,
20 but that's the general ruling, is that they're not
21 going to be called as additional witnesses. The
22 discovery depositions are more than sufficient.

23 I don't think there's anything much more I can say
24 on that. But that was the end of the discussion.

25 If you have questions, I'm happy to hear them for

1 the record.

2 MS. VOELCKERS: Thank you, Your
3 Honor. And I do appreciate the -- the verbal answer.
4 I would respectfully request that -- that we be
5 answered in writing and that be clear who is making
6 that decision and whether or not it is the presiding
7 officer. So that's my first request. I do understand
8 what I'm hearing and do appreciate having that response
9 as soon as possible.

10 I will, secondly, note that I would also
11 respectfully request an explanation of how that is any
12 different than having Mr. Kobus testify tomorrow on his
13 deposition testimony when he was not sponsored for
14 prefiled testimony and no one else here is planning to
15 cross-examine him. So I respectfully ask for that
16 explanation on the distinction that's being drawn
17 there.

18 And, lastly, I would just respectfully disagree
19 that anyone is calling them to take a position.
20 Rather, we were wanting to call them so that they could
21 answer directly, and I don't believe that we were the
22 only party that wanted that to happen. We're the party
23 that made the request yesterday.

24 So that is -- those are my thoughts and do, again,
25 appreciate getting that verbal response and would very

1 much appreciate having in writing an understanding who
2 made the decision. Thank you.

3 JUDGE TOREM: Thank you. And,
4 again, I'm simply transmitting the decision that was
5 made by the Council and as I'm not, under the APA, the
6 presiding officer. The Council is. I'm here kind of
7 calling balls and strikes as best I can, but not the
8 presiding officer.

9 I expect you will get a written decision. I just
10 didn't want you to have to wait for one. EFSEC staff
11 is busy today too, so that should get drafted in the
12 course of events and be memorialized.

13 As for the distinction for Mr. Kobus, again, it's
14 a very limited purpose he's being called back tomorrow
15 to respond to new information that came up since his
16 deposition, and it's a clarification. I'm certainly
17 not aware of any new information that Mr. Fidorra or
18 Mr. Watson would need to clarify.

19 We had plenty of other updated information and
20 best available science from Mr. Jansen and from Troy
21 Rahmig yesterday. No one raised any questions that
22 made it -- any indication that those other biologists
23 had changed their tune or had gotten a new study or
24 some other late-breaking news that would change
25 generally what's in their deposition about this.

1 Yes, Moon memo notwithstanding, again, that's part
2 of the SEPA process, and they do have input for the
3 final EIS which is being drafted. So having them
4 testify at the adjudication is, to me, different
5 qualitatively than the limited purpose we're having
6 Mr. Kobus be aware of things tomorrow. And, frankly,
7 there may not be any questions for Mr. Kobus. So we'll
8 see what happens.

9 Mr. McMahan.

10 MR. McMAHAN: Thank you, Your Honor.
11 I was just going to suggest perhaps in our -- in our --
12 our pre-meet tomorrow, housekeeping session, we kind of
13 determine whether or not Mr. Kobus needs to be called,
14 will be called. I'm just hearing a lot of ambiguity
15 about that.

16 I mean, Mr. Kobus will be here no matter what, but
17 I think if we can, you know, kind of come to terms on
18 that, that would be helpful.

19 JUDGE TOREM: Yeah, Mr. McMahan, my
20 only question whether -- I don't want to put Council
21 members on the spot right now to see if they have
22 questions for Mr. Kobus. That's probably, if no one
23 else does, if there are no Council member questions
24 tomorrow, if they -- they have a chance to review his
25 deposition tonight if they choose to do that and have

1 questions. They may be redigesting things in sequence,
2 so I don't want them to commit right now for what they
3 might be reviewing tonight.

4 MR. McMAHAN: Perfect. Thank you,
5 Your Honor.

6 JUDGE TOREM: All right. Chair
7 Drew, anything else for today that you want input on or
8 want me to address before our last day of hearing
9 tomorrow?

10 COUNCIL CHAIR DREW: No. That's
11 great. Thanks, everybody.

12 JUDGE TOREM: Parties, anything else
13 for the Council members before we adjourn for the day?

14 I think we'll do our housekeeping session at 8:30,
15 because there's a few other moving parts. And we want
16 to probably also have -- Ms. Masengale's been giving us
17 updated master exhibit lists each night. Tomorrow
18 morning would be a great time for everybody to walk
19 through the master exhibit list to make sure we haven't
20 missed anything so that a complete record of documents
21 can be admitted and we don't have to chase back after
22 each other with a motion to admit something that was
23 overlooked.

24 So I believe Ms. Masengale's notes are pretty good
25 about indicating what's admitted and when. So take a

1 look, each party, at your own exhibits, including your
2 own cross-exam exhibits, and make sure if there's a
3 piece of housekeeping we need to clean up and get it
4 admitted, we can do that tomorrow morning as well.

5 I'll see all the parties at 8:30. Council
6 members, I'll see you at 9:00. And Ms. Masengale
7 continues to be a Jeannie-on-the-spot. She's going to
8 send that exhibit list out shortly.

9 Everybody have a good afternoon. Thanks very
10 much. We're adjourned for the day.

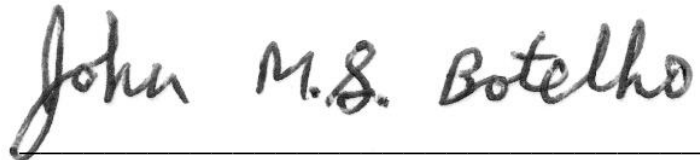
11 (Proceedings adjourned at
12 3:31 p.m.)
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10 That I am not a relative, employee, attorney or counsel
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12 such attorney or counsel and that I am not financially
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14 IN WITNESS WHEREOF, I have hereunto set my hand
15 this 12th day of September, 2023.

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