

BEFORE THE PUBLIC UTILITIES COMMISSION OF OHIO

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In the Matter of the :  
Application of Moraine :  
Wind, LLC, for :  
Certification as an : Case No. 21-516-EL-REN  
Eligible Ohio Renewable :  
Energy Source Generating :  
Facility. :

In the Matter of the :  
Application of Rugby Wind, :  
LLC, for Certification as :  
an Eligible Ohio Renewable: Case No. 21-517-EL-REN  
Energy Resource Generating:  
Facility. :

In the Matter of the :  
Application of Elm Creek :  
II for Certification as an: Case No. 21-531-EL-REN  
Eligible Ohio Renewable :  
Energy Resource Generating:  
Facility. :

In the Matter of the :  
Application of Buffalo :  
Ridge II for Certification: Case No. 21-532-EL-REN  
as an Eligible Ohio :  
Renewable Energy Resource :  
Generation Facility. :

In the Matter of the :  
Application of Barton :  
Windpower 1 for :  
Certification as an : Case No. 21-544-EL-REN  
Eligible Ohio Renewable :  
Energy Resource Generation:  
Facility. :

In the Matter of the :  
Application of Barton :  
Windpower, LLC, for :  
Certification as an : Case No. 22-380-EL-REN  
Eligible Ohio Renewable :  
Energy Resource Generation:  
Facility. :

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PROCEEDINGS

before Ms. Jacky Werman St. John and Mr. David Hicks,  
Attorney Examiners, at the Public Utilities  
Commission of Ohio, 180 East Broad Street, Room 11-C,  
Columbus, Ohio, called at 9:04 a.m. on Tuesday,  
December 6, 2022.

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VOLUME II

- - -

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On behalf of the Staff of the PUCO.

- - -

1	INDEX		
2	- - -		
3	WITNESS	PAGE	
4	Travis Stewart		
	Cross-Examination by Ms. Bojko		187
5	Cross-Examination by Ms. Whitfield		300
	Cross-Examination by Ms. Bair		310
6	Redirect Examination by Mr. Whitt		325
7	Kristin Clingan		
	Direct Examination by Mr. Lindgren		325
8	- - -		
9	CSG EXHIBIT	IDENTIFIED	ADMITTED
10	3 Direct Testimony of Travis Stewart	I-153	315
11	- - -		
12	BLUE DELTA EXHIBITS	IDENTIFIED	ADMITTED
13	3 PJM Manual 14A Dated August 24, 2021	203	316
14	4 MISO Business Practice Manual 11 Dated August 15, 2022	208	316
15			
16	5 OAC 4901:1-40-04	217	--
17	6 Dynamic Transfers Market-to-Market Flowgate Test Dated May 2019	220	317
18			
19	7 Finding and Order, Case No. 12-2156-EL-ORD	239	--
20			
21	8 Opinion and Order, Case No. 08-888-EL-ORD	240	--
22			
23	9 Staff Report, Case No. 09-0555-EL-REN	245	317
24	10 Finding and Order, Case No. 21-987-EL-REN	253	--
25	- - -		

1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21  
22  
23  
24  
25

INDEX (Continued)		
- - -		
STAFF EXHIBIT	IDENTIFIED	ADMITTED
2 Prefiled Testimony of Kristin Clingan	325	--
- - -		

1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21  
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Tuesday Morning Session,  
December 6, 2022.

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EXAMINER HICKS: Let's go ahead and go  
back on the record.

We are reconvening this morning in Case  
No. 21-516-EL-REN, et al. I am still David Hicks.  
This is still Jacky St. John. Let's just go do quick  
appearances. Don't need the whole thing, just name,  
party. Start with the Applicants and then let's just  
go around the room.

MS. WHITFIELD: Sure. On behalf of the  
Applicants and Avangrid Renewables, LLC, Angie Paul  
Whitfield, Carpenter Lipps and Leland.

MR. RYAN: On behalf of the Northern  
Indiana Public Service Company, John Ryan.

MS. BOJKO: Your Honor, on behalf of Blue  
Delta Energy, LLC, Kim Bojko and John Wygonski with  
Carpenter Lipps and Leland.

MR. WHITT: On behalf of Carbon Solutions  
Group, LLC, Mark Whitt and Mark DeMonte with Whitt  
Sturtevant.

MR. LINDGREN: On behalf of the  
Commission Staff, Thomas Lindgren and Jodi Bair,  
Assistant Attorneys General.

1 MS. WOODS: And on behalf of Intervenor  
2 3Degrees, Nicole Woods with the law firm Ice Miller.

3 EXAMINER HICKS: Thank you all. I  
4 believe we left off yesterday with Mr. Stewart having  
5 been called. Karen -- you can go ahead and come up,  
6 Mr. Stewart. I believe I swore you in; is that  
7 correct, Karen?

8 COURT REPORTER: Yes.

9 EXAMINER HICKS: So you are still under  
10 oath. Did we already -- I believe he was made  
11 available for cross-examination, if I am remembering  
12 where we left off.

13 MS. BOJKO: I believe so, your Honor.

14 EXAMINER HICKS: Okay. With that I will  
15 turn it over to -- are you handling it, Ms. Bojko?

16 MS. BOJKO: Yes.

17 EXAMINER HICKS: Then I will turn it over  
18 to you.

19 MS. BOJKO: Thank you, your Honor.

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TRAVIS STEWART

being previously duly sworn, as prescribed by law,  
was examined and testified further as follows:

CROSS-EXAMINATION

By Ms. Bojko:

Q. Good morning, Mr. Stewart. My name is  
Kim Bojko, and I represent Blue Delta in this case.  
Let's turn to -- first of all, I guess a refresher  
course from yesterday. You've filed direct testimony  
in this case; is that correct?

A. Yes, it is.

Q. And that was filed August 26, 2022?

A. That's correct.

Q. And you did not file supplemental  
testimony, correct?

A. I did not.

Q. Let's turn to page 3 of your testimony  
then. Page 3, line 60, here you recognize that the  
six facilities at issue in this case have to certify  
their facilities as qualifying renewable energy  
resources in Ohio in order for the facilities to  
generate Ohio renewable energy certificates; is that  
correct?

A. Generally, yes.

Q. And you understand the term renewable

1 energy certificates to mean RECs?

2 A. Yes.

3 Q. And Ohio -- after a facility becomes  
4 certified, then those Ohio REC certificates can be  
5 used to satisfy Ohio's renewable portfolio standards;  
6 is that correct?

7 A. That's my understanding.

8 Q. And some people call that the RPS  
9 standards or also a term Alternative Energy Portfolio  
10 Standards, AEPS, is often used; is that your  
11 understanding?

12 A. Yes.

13 Q. On page 3 still of your testimony, lines  
14 63 to 65, you explain that a facility owner must show  
15 that energy from the facility is deliverable into  
16 Ohio, correct?

17 A. That's correct. Right there on line 64,  
18 yes.

19 Q. And you quote the term because the  
20 statutory provision is "deliverable into"; is that  
21 correct?

22 A. So if you go down to question 8, I  
23 reference PUCO rules, particularly line 70,  
24 "deliverable into the state" and there is an  
25 explanation. That's what I am referencing.

1           Q.    Okay.  So you are referencing  
2   4901:1-40-01(F) of the Ohio Administrative Code when  
3   you quote "deliverable into"; is that correct?

4           A.    That's correct.

5           Q.    Are there any other requirements that  
6   need to be satisfied in Ohio law to become a  
7   certified renewable energy resource?

8           A.    There are but my -- my testimony today  
9   I'm not testifying as an expert on all areas of Ohio  
10  law.  There are qualification standards.  There are  
11  technology limitations.  There are -- there are a lot  
12  of different details in there.  But really the focus  
13  of my testimony has been on deliverability issues and  
14  the narrow issues in this case.

15          Q.    So you understand that here today there  
16  are two other requirements besides deliverability in  
17  Ohio law that needs to be satisfied to become  
18  certified as a qualifying renewable energy resource  
19  in Ohio?

20          A.    I'm sorry, counselor.  I am not familiar  
21  with what other requirements you are referring to.

22          Q.    Okay.  And so it's fair to say that you  
23  are focusing on deliverability, and you are not here  
24  today to opine on any other criteria, correct?

25          A.    So, counsel, I would just like to refer

1 you to page 2, line 45, continuing to page 3, down  
2 through line 56. These are the areas in which my  
3 testimony -- my direct testimony was provided in this  
4 case.

5 Q. So you are not offering any opinions on  
6 any other criteria then the deliverability criteria;  
7 is that correct?

8 A. Counsel, page 2, question 6, extending  
9 down through page 3, line 56, those are all the areas  
10 in which I am offering an opinion in this case.

11 Q. And all of those areas that you are  
12 offering opinion on deal with the deliverability  
13 criterion, not any other criterion in Ohio law,  
14 correct?

15 A. Counselor, I -- any other area in Ohio  
16 law, can you be a bit more specific for me, please?

17 Q. I said any other criterion. You do  
18 understand that there are three main criteria --  
19 criterions that we are here focused on today which is  
20 the placed-in-service date, the type of qualifying  
21 renewable resource, and then deliverability; is that  
22 your understanding?

23 A. Yes, it is.

24 Q. So you are only focusing out of those  
25 three on the deliverability criterion, correct?

1           A.     That's correct. The information  
2     regarding the in-service date and the information  
3     regarding the technology, those are provided in the  
4     applications, and it is not the subject of my direct  
5     testimony.

6           Q.     Okay. And you've already referenced  
7     40-01(F) of the Administrative Code. The other --  
8     your testimony focuses on 4928.64(B)(3) which is  
9     stated on line 67, correct?

10          A.     That's correct.

11          Q.     And I see that you are a lawyer, sir.  
12     Are you testifying today as a lawyer?

13          A.     I am not.

14          Q.     And so then it's fair to say you are not  
15     offering any legal opinions; is that correct?

16          A.     That's correct.

17          Q.     And also on line 80 and 81 of your  
18     testimony, you state that you offer no opinion on  
19     whether the Commission can or should interpret the  
20     terms differently; is that correct?

21          A.     That's correct.

22          Q.     And are you licensed to practice law in  
23     Ohio, sir?

24          A.     I am not.

25          Q.     Have you ever been employed by a Regional

1 Transmission Organization?

2 A. I have not.

3 Q. Have you ever been employed by a member  
4 of a regional transmission organization?

5 A. Yes.

6 Q. Which one?

7 A. There's a company that is internal to our  
8 firm Gabel Associates that is referred to as Jersey  
9 Green. That is a PJM member and I am their  
10 representative that manages that account.

11 Q. But you are employed by Gabel's. You are  
12 not employed by the actual member, are you?

13 A. Jersey Green is embedded within Gabel  
14 Associates. I'm a -- I am hired -- I am employed by  
15 Gabel Associates.

16 Q. Okay. Today you are not here to testify  
17 on behalf of or speak for a Regional Transition  
18 Organization, are you?

19 A. No. I am testifying today on behalf of  
20 Carbon Solutions Group.

21 Q. So you're not here to testify on behalf  
22 of or speak for the market participant that you just  
23 stated you are employed for, correct?

24 A. No, counselor. I am on behalf of Carbon  
25 Solutions Group.

1 Q. And CSG, Carbon Solutions Group, is not a  
2 member of PJM; is that correct?

3 A. I don't have any independent knowledge if  
4 they are a member or if they are in an application  
5 process, so I cannot verify that, sorry.

6 Q. Okay. CSG -- is it okay if I call them  
7 CSG?

8 A. Yes, yeah. That's fine.

9 Q. Is an aggregator of solar renewable  
10 energy credits mostly for residential solar panels;  
11 is that correct?

12 A. That is not part of my testimony. It's  
13 my understanding of CSG's business model; however, I  
14 am not an expert on everything they do.

15 Q. But you do know that CSG procures and  
16 sells RECs; is that correct?

17 A. That's correct.

18 Q. And you are not an engineer, are you,  
19 sir?

20 A. I am not.

21 Q. Let's turn to page 5, lines 123, 124 of  
22 your testimony. You define a TSR as transmission  
23 services reservations; is that correct?

24 A. That's correct.

25 Q. And then turn to page 7 of your

1 testimony, line 168. Here you define TSR as a  
2 transmission service request; is that correct?

3 A. 168, that's -- in the question, yes,  
4 that's correct.

5 Q. So do you use those terms  
6 interchangeably?

7 A. I do. I apologize, counsel. I could  
8 have been a bit more clear in my testimony.

9 Q. On page 5 of your testimony, lines 108  
10 through 121, you state that RTOs do not exist  
11 primarily to conduct simulations, experiments, and  
12 academic research about the nature of  
13 electromagnet -- magnetism and that their work is  
14 done in service of the ultimate goal of ensuring  
15 actual physical deliverability; is that correct?

16 A. Lines 114 through 115, I say "Their  
17 primary mission is to manage electricity markets to  
18 ensure that electricity can physically deliverable --  
19 physically be delivered to all loads."

20 Q. So are you disputing that you also say on  
21 line 112 that they do not exist primarily to conduct  
22 simulations, experiments, and research?

23 A. That is not their primary purpose.

24 Q. So you agree that that's your testimony  
25 today.



1           A.    My testimony at lines 112 through 114 is  
2 my testimony today, yes.

3           Q.    I'm sorry. I thought you were quibbling  
4 with something I said.

5           A.    Not at all.

6           Q.    Mr. Stewart, are you asserting that RTOs  
7 do not use modeling to determine actual physical  
8 deliverability?

9           A.    I do not assert that, no.

10          Q.    Do you believe that modeling can be used  
11 to demonstrate actual physical deliverability?

12          A.    The degree of the modeling can be used to  
13 assert actual physical deliverability but there are  
14 distinctions, and in this case one of the more  
15 important items has been this question as to whether  
16 or not a DFAX study that purports to take power from  
17 one location to another really is -- is just  
18 taking -- it's just modeling power from point B to  
19 point C but not power from point A to point B to  
20 point C.

21                   And in order to get there, the RTOs  
22 conduct more granular simulations. They have  
23 generator deliverability tests. They have system  
24 impact studies which account for things like  
25 congestion, things like limits on the transmission

1 system.

2 And in accounting for all of those  
3 things, what happens is there is a determination of  
4 deliverability. And like the Applicants today have  
5 already been through in MISO, those facilities are  
6 deliverable sometimes on a firm basis and many --  
7 many cases here on a non-firm basis to those loads in  
8 MISO. So deliverability can be determined through  
9 more granular modeling, just not very high level  
10 modeling.

11 MS. BOJKO: Your Honor, I move to strike  
12 everything after I believe he did he say yes at the  
13 beginning of that long-winded response. So I move to  
14 strike everything after it as nonresponsive to my  
15 question. It was a yes or no question.

16 EXAMINER HICKS: I will deny the motion  
17 to strike. Continue your questioning.

18 Q. (By Ms. Bojko) So, Mr. Stewart, you would  
19 agree that it's impossible to actually track physical  
20 electrons, right?

21 A. Impossible to actually track electrons,  
22 I'm sorry, counsel, in which context?

23 Q. Do you believe that electrons are  
24 earmarked and you can track an electron that's  
25 produced from a generating facility to an end load

1 source?

2 A. No. That's -- that's not my testimony.

3 Q. So for a system with multiple points of  
4 generation and consumption, you agree that we would  
5 have to rely on modeling, correct?

6 A. I'm sorry, counsel. Rely on modeling for  
7 what?

8 Q. Rely on modeling to determine when there  
9 is a generation inputted into the electric grid and  
10 then when generation is exported from the electric  
11 grid to load. You have to use modeling to determine  
12 where the electrons impact the system.

13 A. I'm sorry, counsel. Can you reframe the  
14 question?

15 Q. Sure. You would agree that you have to  
16 use modeling -- an RTO would have to use modeling in  
17 order to determine impacts on system when generation  
18 is inputted in multiple points on a system.

19 A. In order to assess a system impact, an  
20 RTO or any electric utility would have to model  
21 individual generators or multiple generators to  
22 assess that impact on its system, correct.

23 Q. Let's turn to page 5 of your testimony,  
24 line 123 through page 6, line 131, so question and  
25 answer 12 is what I am on.

1           A.    Right.

2           Q.    Here you state that RTOs use TSR to  
3 demonstrate physical deliverability; is that correct?

4           A.    My testimony is that deliverability is  
5 demonstrated through interconnection, TSR, or  
6 obligations to schedule specific energy and then  
7 continues down through line 131, but a TSR process  
8 can be used to demonstrate deliverability.

9           Q.    So here are you using that term to mean  
10 transmission services reservation or a request?

11          A.    It would be the -- again, referring to my  
12 earlier testimony on this point that two are --  
13 they're equivalent, so a transmission service  
14 reservation or transmission service request would  
15 initiate the process to demonstrate deliverability to  
16 a specific load from a specific generator.

17          Q.    Are you familiar with the term IDC,  
18 interconnection distribution calculator?

19          A.    Familiar with it but not -- I would say I  
20 am familiar with it in terms of the interconnection  
21 process, how it comes in, but I wouldn't say that  
22 I -- I don't operate one. I don't own one. I don't  
23 run modeling for one so.

24          Q.    So you don't know exactly how it works;  
25 is that fair?

1 A. I would say that's fair.

2 Q. And do you know that it does, in fact,  
3 use a DFAX study as its basis?

4 MR. WHITT: Objection. The witness just  
5 testified he doesn't know what this thing is. It  
6 calls for speculation.

7 MS. BOJKO: I'm sorry. I will rephrase.  
8 I was more asking what he does or doesn't know.

9 Q. (By Ms. Bojko) Do you know whether the  
10 IDC uses a DFAX study as its basis?

11 A. I'm sorry. I don't know if the IDC is in  
12 PJM, if it's in MISO, if it's in ISO New England.

13 Q. So you just don't know.

14 A. I just don't know. Sorry.

15 Q. Are you aware that the IDC is a NERC  
16 tool, not a particular RTO tool?

17 A. Counselor, I am not testifying here as an  
18 engineer. I am not NERC certified.

19 Q. So you don't know.

20 A. I don't know.

21 Q. Let's look at lines 125 to 127 of your  
22 testimony. Here you also state that the TCRs, in  
23 turn, rely on system impact studies to demonstrate  
24 deliverability; is that correct?

25 A. That's correct.

1           Q.    And in footnote 3 on page 6 of your  
2 testimony, you state that the MISO Business Practice  
3 Mean -- Manual 11 and PJM Manual 14A discuss system  
4 impact studies in detail; is that correct?

5           A.    My testimony just between -- I do provide  
6 those two references, but to clarify my testimony  
7 between lines 130 and 131 is MISO Business Practice  
8 Manual 11 addresses these topics in detail referring  
9 to the topics immediately addressed before that in  
10 lines 127 to 129.

11           Q.    So your testimony with the footnote is  
12 really a cite to the PJM Interconnection manual, not  
13 to the -- excuse me. I said that reverse. Strike  
14 that.

15                     Your testimony in lines 127 to 131 is  
16 really referencing the MISO Business Practice Manual  
17 11, not the PJM manual; is that fair?

18           A.    It's referencing both. But the footnote  
19 references both, and the significance of that is that  
20 we are dealing with MISO interconnected resources  
21 that are being determined whether or not they were  
22 deliverable to specific Ohio loads in PJM, so both  
23 processes are relevant and need to be understood for  
24 that process.

25           Q.    Sure. But I think when focusing on the

1 footnote here, you talk only about MISO in the -- as  
 2 I understand it, the sentence with the footnote is  
 3 about MISO's Business Practice Manual 11 addresses  
 4 these topics in detail, but then you also cite to the  
 5 PJM manual.

6 A. Yes.

7 Q. So you are talking that this only  
 8 addresses MISO, is that correct, in detail?

9 A. While the specific language does say that  
 10 you can find more detail in MISO BPM 11, there is  
 11 similar detail in the PJM Manual 14A.

12 Q. Thank you for that clarification because  
 13 I didn't see that in your testimony. That's what I  
 14 was asking so.

15 A. Okay. I understand.

16 Q. And just for the record, you understand,  
 17 and I think you just stated, MISO and PJM, we just  
 18 kind of just jumped into those terms, are both  
 19 Regional Transmission Organizations, right?

20 A. Yes. MISO is the Midcontinent  
 21 Independent System Operator, and PJM is PJM  
 22 Interconnection, LLC. MISO manages the midwestern  
 23 portion of the country, south through Louisiana,  
 24 north all the way up to the Dakotas. PJM has  
 25 northern Illinois and then a number of other states

1 including Ohio in it.

2 Q. And they touch -- many of the states  
3 touch each other, is that fair, between MISO and PJM?

4 A. MISO and PJM have a robust seam or a  
5 border that is common, yes.

6 Q. They also have an interconnection  
7 agreement between the two, is that correct, joint  
8 operating agreement?

9 A. Joint operating agreement, yes.

10 Q. Going back to 125 and 127, when we talk  
11 about the system impact study referenced in your  
12 testimony, isn't it true that a system impact study  
13 includes a distribution factor or power flow  
14 analysis?

15 A. Oh, of course, and it's -- it's important  
16 to note that while we are determining deliverability,  
17 nothing in my testimony says that DFAX is not a step  
18 in that process. It is a step, and it is an  
19 important step, but it's not the complete analysis in  
20 order to determine deliverability.

21 MS. BOJKO: Your Honor, I move to strike  
22 after, yes, of course. He's being nonresponsive to  
23 my question.

24 EXAMINER HICKS: Karen, can you read back  
25 the answer -- or the question and answer, please.



1 (Record read.)

2 EXAMINER HICKS: Anything, Mr. Whitt?

3 MR. WHITT: I think he is just explaining  
4 what he meant by what he said, of course, and  
5 explaining that qualifier which is responsive to the  
6 question.

7 EXAMINER HICKS: I will grant the motion  
8 to strike the answer after, yes, of course. You can  
9 develop things further when it's your turn,  
10 Mr. Whitt.

11 MR. WHITT: Thank you.

12 MS. BOJKO: Your Honor, at this time I  
13 would like to mark for identification purposes Blue  
14 Delta Exhibit 3, I believe, PJM Manual 14A dated  
15 August 24, 2021.

16 EXAMINER HICKS: So marked.

17 (EXHIBIT MARKED FOR IDENTIFICATION.)

18 MS. BOJKO: May I approach, your Honor?

19 EXAMINER HICKS: Sure.

20 Q. (By Ms. Bojko) Sir, do you have in front  
21 of you what's been marked as Blue Delta Exhibit 3  
22 which is the PJM Manual 14A dated August 24, 2021?

23 A. That is that Revision 29 effective on  
24 August 24, 2021, yes.

25 Q. And, Mr. Stewart, are you familiar with

1 this document I just handed you?

2 A. I'm generally familiar with PJM Manual  
3 14A. I will note that these documents are subject to  
4 ongoing revision, so I am not aware if this is the  
5 most recent version of Manual 14A.

6 Q. Okay. And you are familiar with PJM  
7 Manual 14 itself, correct?

8 A. I am but I don't -- I don't know every  
9 word in it but generally I am familiar.

10 Q. Let's turn to page 24. Can we look at  
11 the third paragraph, I guess the third full paragraph  
12 on that page. Here it's stating that a system impact  
13 study includes a powerflow analysis; is that correct?  
14 I'm sorry. I guess it's really the second full  
15 paragraph on page 24.

16 A. Under the subsection that begins on  
17 Section -- on page 23, Section 4.3 System Impact  
18 Study and then Section 4.3.1 System Impact Study  
19 Analysis and Schedule?

20 Q. Yes.

21 A. And then continuing on page 24, system  
22 impact study includes AC powerflow analysis and short  
23 circuit analysis. Is that the paragraph that you are  
24 referring to?

25 Q. Yes.

1           A.    Yes.

2           Q.    So you would agree that the PJM manual --  
3   excuse me.  Strike that.

4                    You would agree that a system impact  
5   study includes a powerflow analysis, correct?

6           A.    According to this document, which I  
7   believe is the most recent version, it is -- I don't  
8   know -- is this the most recent version of the  
9   document?

10          Q.    That's my understanding.

11          A.    Okay.  It says "The System Impact Study  
12   includes AC powerflow analysis and short circuit  
13   analysis."

14          Q.    If we turn to page 25 of the document,  
15   under 4.3.1.3 Light Load Common Mode Outage  
16   Procedure," are you there?

17          A.    I am.

18          Q.    Isn't it true that a system impact study  
19   considers the distribution factor results of a power  
20   flow study?

21          A.    Sorry, counsel.  I just want to make sure  
22   I am reading the right section here.  You are  
23   referring to Section 4.3.1.3?

24          Q.    Yes.

25          A.    Thank you.

1           Q.    It talks about a new service request and  
2   that they do a distribution factor test when  
3   considering new service?

4           A.    Thank you, counsel.  I am just ensuring I  
5   am familiar with this paragraph before I answer any  
6   of your questions.

7           Q.    Sure.  Of course.  Take your time.

8           A.    Thank you.  Counsel, can you repeat your  
9   question, please?

10          Q.    Isn't it true that a system impact study  
11   considers the distribution factor results of a power  
12   flow study?

13          A.    Within the context of Section 4.3.1.3?

14          Q.    Yes.  It does in general as well but that  
15   context is fine.

16          A.    I'm sorry, counsel.  I don't mean to be  
17   difficult, but I'm -- I'm confused.  You had asked me  
18   an initial question about this section and then you  
19   had been referring to something different and I  
20   just -- I just need a little bit more clarity if you  
21   wouldn't mind.

22          Q.    Sure.  And just to back up, you did state  
23   that you are familiar with PJM Manual 14A and that  
24   you have reviewed this revision as well as other  
25   revisions.

1           A.    I don't know if this is the most recent  
2 revision.

3           Q.    It -- subject to check, I will confirm  
4 that we just checked just to make sure that it is the  
5 most recent version.

6           A.    Thank you. I am familiar with the  
7 document.

8           Q.    Okay. Okay. Oh, well, that's a good  
9 point. You did cite to this testimony in your  
10 document, did you not?

11          A.    I did.

12          Q.    Okay. Just make sure we are all on the  
13 same page. This is actually the footnote 3 that we  
14 were talking about before on page 6, right?

15          A.    Yes, counsel.

16          Q.    That's where the citation is to PJM  
17 Interconnection, LLC, Manual 14A.

18          A.    14A, but not Section 4.3.1.3.

19          Q.    Okay. You were citing to the entirety of  
20 the document; is that not true?

21          A.    That's fair.

22          Q.    Okay. So in the document that you cited  
23 to, doesn't the document state that "A New Service  
24 request that contributes to the loading of an  
25 existing overload is reported if that New Service

1 request increases the loading by at least 1 percent  
2 and contributes at least 5 megawatts or has at least  
3 a 5 percent distribution factor"?

4 A. That's correct.

5 Q. So the system load -- or the system  
6 impact study considers the distribution factor  
7 results of a power flow study; is that right?

8 A. That's right.

9 Q. Okay.

10 MS. BOJKO: Your Honor, at this time I  
11 would like to mark for identification purposes as  
12 Blue Delta Exhibit 4 the MISO Business Practice  
13 Manual 11 dated October 31, 2022.

14 EXAMINER HICKS: So marked.

15 (EXHIBIT MARKED FOR IDENTIFICATION.)

16 MS. BOJKO: Your Honor, may I approach?

17 EXAMINER HICKS: Yes.

18 Q. (By Ms. Bojko) Mr. Stewart, have I handed  
19 you what's been marked as Blue Delta Exhibit 4 which  
20 is the MISO Business Practices Manual No. 11?

21 A. Effective August 15, 2022, yes.

22 Q. And, sir, is this the Manual 11 that you  
23 reference in footnote 3 on your -- in your testimony?

24 A. Yes, it is.

25 Q. Okay. And just so we're clear because

1 you don't have dates in your testimony, this is the  
2 August 15, 2022, effective date is the manual on page  
3 3 -- or footnote 3.

4 A. So my testimony was submitted on  
5 August 26 so could have been -- I don't believe it  
6 was updated between then, but it may have been this  
7 one. I can't confirm because I don't monitor the  
8 website that closely.

9 Q. Okay. You wouldn't believe that your  
10 testimony would be significantly altered by any  
11 revisions that occurred from the prior version to  
12 this version, do you?

13 A. Oh, no. I don't believe so.

14 Q. Okay. And just -- okay. Let's just back  
15 up just so we are all clear here because these are  
16 citations you did. I am just trying to pull  
17 documents that you cited to. So the PJM  
18 Interconnection, LLC, Manual 14A, that revision is  
19 effective August 24, 2021, so it's fair to assume  
20 that -- if that was the most recent, which we believe  
21 it to be, that that is the version you were referring  
22 to when you cited it in your testimony.

23 A. That's fair.

24 Q. Okay. Okay. And, sir, do you know  
25 whether there was a new revised Resource Adequacy

1 Business Practice Manual No. 11 from MISO since you  
2 filed your testimony?

3 A. I believe there have been some  
4 modifications that were very recently installed.  
5 They are going to relate -- yes, there are -- I  
6 believe there have been some modifications that were  
7 installed to the manual.

8 Q. But you do not believe that that affects  
9 your testimony as you have written it, do you?

10 A. It may depending on the question.

11 Q. You mean -- just so the record is clear,  
12 you are saying depending on the question in your  
13 testimony that the new MISO Resource Adequacy  
14 Business Practice Manual that I believe is dated  
15 October 31, 2022, may alter responses that you  
16 provided in your testimony to the Commission?

17 A. Counsel, the copy of the document that I  
18 have in front of me is dated August 15, 2022. And so  
19 if that's different than the copies that the Bench  
20 has or somebody else, this is the copy that's in  
21 front of me. Any of the changes that have taken  
22 place in the MISO Resource Adequacy space would not  
23 change my direct testimony. However, whether or  
24 not -- whether or not the modifications between  
25 August and today inside the Resource Adequacy BPM



1 may -- it -- they may change my responses to your  
2 questions.

3 Q. Okay. When you said questions, I thought  
4 you were talking about your testimony questions. You  
5 are talking about any of my questions.

6 A. Yes, yes.

7 Q. So then just so we are all clear, the  
8 document you cited to in footnote 3 was the August  
9 15, 2022, which at the time would have been the  
10 latest version; is that fair?

11 A. Yes, yes.

12 Q. Okay. And sitting here today, do you  
13 believe that the October 31, 2022, version would  
14 alter or change your direct testimony in any way?

15 A. No.

16 Q. Thank you. So it's fair to assume you've  
17 reviewed this document, is that correct, what's been  
18 marked as Blue Delta Exhibit 4?

19 MR. WHITT: I'll object.

20 A. I'm --

21 EXAMINER HICKS: Wait, wait. Go ahead.

22 MR. WHITT: The hypothetical can't be  
23 assumed because the witness was just handed the  
24 document moments ago.

25 EXAMINER HICKS: I can't hear you,

1 Mr. Whitt.

2 MR. WHITT: It can't be assumed that the  
3 witness has reviewed a document that was just handed  
4 to him a few minutes ago and that he has been  
5 answering questions about.

6 EXAMINER HICKS: You don't need to.

7 I am going to overrule the objection. I  
8 mean, he cites it in his own testimony so he can --  
9 if you need to clarify, go ahead but that's a fair  
10 question.

11 MR. WHITT: Well, let the record reflect  
12 it is a 211-page document.

13 EXAMINER HICKS: So are you submitting  
14 that he didn't review it and cited it in his  
15 testimony?

16 MR. WHITT: No, your Honor. What I am  
17 objecting to is the attempt to set up an argument  
18 that because he says he's familiar with it that they  
19 can pull out something in the document later -- they  
20 won't question him about it today, but later on they  
21 will pull some snippet out of the document, cite it  
22 in their brief, and argue there was some implicit  
23 agreement with something --

24 EXAMINER HICKS: Sounds like a great  
25 point to bring up on your reply brief so we are going

1 to overrule the objection and he can answer.

2 Q. (By Ms. Bojko) Sir, just so the record is  
3 clear, in footnote 3 you cited to the entirety of the  
4 document. You have no page number listed. You don't  
5 even have a date listed; is that fair? That's  
6 footnote 3.

7 A. Yes, counsel.

8 Q. Okay. So let's turn to page 88 of the  
9 document that's been marked as Blue Delta Exhibit 4.

10 A. I'm sorry, counsel. Can I just ask a  
11 clarifying question?

12 Q. Of course.

13 A. So the version that I have is dated  
14 August 15. Is the version you have dated August 15  
15 or October 31?

16 Q. It is dated August 15 because we assumed  
17 that was the version that you cited to since  
18 October 31 had not -- had occurred after the filing  
19 of your testimony.

20 A. That's good.

21 Q. Is that a fair assumption?

22 A. As long as everybody has the same copy, I  
23 am good with that. Thanks, counsel.

24 Q. Well, I thought you explained to me that  
25 you cited to the August 15, 2022, version. Is that

1 no longer correct?

2 A. I did. I just wanted to make sure.  
3 There was a reference to October 31 and there have  
4 been a lot of changes in the footprint over those two  
5 months and I wanted to make sure just that the  
6 document that I have is consistent with what  
7 everybody else has.

8 EXAMINER HICKS: Everybody has the August  
9 15 which has been marked Blue Delta Exhibit 4.

10 MS. BOJKO: Thank you, your Honor.

11 THE WITNESS: Thank you, your Honor.

12 EXAMINER HICKS: Yes.

13 Q. (By Ms. Bojko) Oh, excuse me. Let's turn  
14 to page 92 of the document. There's a section on  
15 page 92 called "Transfer Analysis." Do you see that?

16 A. Yes, I do.

17 Q. In this paragraph doesn't it say that  
18 "Transfer capacity is the measure of the ability of  
19 interconnected electric systems to reliably transfer  
20 power from one area to the" other -- excuse me, "one  
21 area to another"?

22 A. So inside of the local -- local  
23 requirements and transfer capability analysis that  
24 MISO does within its own footprint and to determine  
25 capacity import and capacity export limits, that

1 is -- that is where this transfer analysis applies  
2 to, and the transfer capability is the measure of the  
3 ability of the interconnected electric systems to  
4 reliability -- to reliably transfer power from one  
5 area to another under certain system conditions is  
6 cited on page 92.

7 Q. Thank you. And in the next paragraph  
8 below the formula, doesn't MISO -- the MISO manual,  
9 Business Practice Manual 11, state that a  
10 distribution factor analysis is used to help  
11 determine transfer capacity?

12 EXAMINER HICKS: Ms. Bojko, can you point  
13 out where you are when you are reading?

14 MS. BOJKO: Oh, I wasn't reading, I'm  
15 sorry. I just asked my question. I am in the  
16 paragraph underneath the formula. My apologies.

17 EXAMINER HICKS: Okay. Thank you.

18 A. In order to determine capacity import and  
19 capacity export limits between local resource zones  
20 in MISO, this is the initial type of power flow  
21 analysis and distribution factor analysis that is  
22 used to determine those factors.

23 Q. Okay. So a distribution factor analysis  
24 is used to help determine transfer capacity.

25 A. Yes.

1           Q.   Moving on -- let's go back to page 6 of  
2 your direct testimony, if you would, please, sir.  
3 The paragraph A13 starting at line 134, here you  
4 discuss PJM's analysis for qualification of capacity  
5 resources, correct?

6           A.   The qualification of external capacity  
7 resources, yes.

8           Q.   And to your knowledge, does the Ohio REN  
9 certification rules and law require facilities to  
10 qualify as a PJM capacity resource?

11           MR. WHITT:  Objection, beyond the scope  
12 of direct.  The witness made very clear he is  
13 offering no legal interpretations or opinions.

14           EXAMINER HICKS:  Overruled.

15           A.   Counsel, can you repeat the question?

16           Q.   Sure.  Isn't it true that Ohio's REN  
17 certification rules and requirements, the whole  
18 purpose of you testifying today, does not  
19 specifically require renewable facilities to qualify  
20 as a PJM capacity resource?

21           A.   That's correct.

22           MS. BOJKO:  Your Honor, this --

23           Q.   And you did state, because you cited to  
24 it in your testimony, sir, you've reviewed the  
25 Commission's certification rules, Ohio Admin Code

1 4901:1-40-04? You cite to it on page 3 of your  
2 testimony.

3 A. That's where it was.

4 Q. Line 69, excuse me, you cite to a portion  
5 of it.

6 A. Yes.

7 Q. Is that right?

8 A. Subsection (F), yes.

9 MS. BOJKO: Your Honor, at this time I  
10 would like to mark just for identification purposes  
11 for discussion only 4901:1-40-04. May I approach?

12 EXAMINER HICKS: So marked and you may  
13 approach.

14 (EXHIBIT MARKED FOR IDENTIFICATION.)

15 EXAMINER ST. JOHN: Just -- you said  
16 40-04. Did you mean 40-01?

17 MS. BOJKO: No, 40-04, your Honor.

18 EXAMINER ST. JOHN: Okay. Thank you.

19 A. Counselor, I cite to 4901:1-40-01.

20 Q. Fair enough. Fair enough.

21 MS. BOJKO: I still would like to mark  
22 and ask the witness if he's reviewed this, if that's  
23 okay, your Honor.

24 EXAMINER HICKS: It is.

25 Q. (By Ms. Bojko) Sir -- let me pass it out.

1                   Sir, do you have in front of you what's  
2                   been identified as Blue Delta Exhibit 5 which is an  
3                   Administrative Code Rule 4901:1-40-04?

4                   A.     Yes, I do.

5                   Q.     And if you look under the title  
6                   "Qualified resources," this is Rule 4 of Chapter  
7                   4901:1-40 which is the Alternative Energy Portfolio  
8                   Standard; is that correct?

9                   A.     I believe so, yes.

10                  Q.     And in your testimony you cite to Rule 1  
11                  under that Chapter 40 and so this is Rule 4 under  
12                  Chapter 40; is that fair?

13                  A.     That's fair.

14                  Q.     So in preparing your testimony, did you  
15                  review the entire Chapter 40, the entire Alternative  
16                  Energy Portfolio Standards in Ohio?

17                  A.     Counselor, I believe I reviewed a good  
18                  portion of it. I don't know if I reviewed every  
19                  section of it.

20                  Q.     So you did not review what a qualified  
21                  resource technology would be under the Commission --  
22                  or did you -- excuse me. Let me just ask you. Did  
23                  you review 04, the qualified resources, to determine  
24                  what would be considered a qualified resource in the  
25                  State of Ohio?



1           A.    Yes, I did.

2           Q.    Okay. Under the discussion of qualified  
3 resources or qualified resource in the State of Ohio,  
4 is -- anywhere in this rule, does it state that a  
5 facility must qualify as PJM capacity resource to  
6 obtain REN certification?

7           A.    Not to my recollection.

8           Q.    Let's go to -- back to page 6 beginning  
9 on line 139 of your testimony, please, sir. Here you  
10 state to qualify -- actually, I'm sorry. Let's go to  
11 134. Here you state that to qualify as a capacity  
12 resource, a facility must pass a market-to-market  
13 flowgate test; is that correct?

14          A.    That's not in line 134 but I get there  
15 right around line 137 to 140.

16          Q.    Fair enough. And doesn't a  
17 market-to-market flowgate test include a distribution  
18 factor analysis?

19          A.    Yes.

20          Q.    And can a market-to-market flowgate test  
21 be conducted without using distribution factors?

22          A.    I don't believe so.

23          Q.    Do you believe it's possible for MISO to  
24 perform an SIS or transfer analysis without a power  
25 flow study? Sorry, SIS, system impact study.

1           A.    No.  These studies are -- they are  
2   complex, so they are multiple steps, and the first  
3   step, like I have noted earlier in my testimony, is a  
4   power flow study.

5           MS. BOJKO:  Your Honor, I would like to  
6   mark for identification purposes as Blue Delta  
7   Exhibit 6 a PJM document titled "Dynamic Transfers:  
8   Market-to-Market Flowgate Test" dated May 2019.

9           EXAMINER HICKS:  So marked.

10          (EXHIBIT MARKED FOR IDENTIFICATION.)

11          MS. BOJKO:  May I approach, your Honor?

12          EXAMINER HICKS:  Yes.

13          Q.    (By Ms. Bojko) Mr. Stewart, do you have  
14   in front of you what's been previously marked as Blue  
15   Delta Exhibit 6 which is a PJM document titled  
16   "Dynamic Transfers:  Market-to-Market Flowgate Test"  
17   dated May 2019?

18          A.    Yes, I do.

19          Q.    Is this the document you cite on page 6  
20   of your testimony in footnote 4?

21          A.    Sorry, counsel.  I have a lot of papers  
22   up here.  Yes, it is.

23          Q.    So is it fair to assume that you are  
24   familiar with this document?

25          A.    Yes, it is.

1           Q.    Let's turn to the document itself on page  
2    2. Under Section 2, the market-to-market flowgate  
3    test, are you there?

4           A.    Yes, I am.

5           Q.    Isn't it true that this test uses  
6    computer programs to perform sensitivity analyses to  
7    determine the percent impact or generation-to-load  
8    distribution factor which is also called GLDF?

9           A.    That's right but some context here is  
10   really important. So if we go all the way up to the  
11   top of page 2 --

12          Q.    I was just asking you about Section 2. I  
13   think your counsel can handle that on redirect for  
14   context.

15          A.    Okay.

16          Q.    So GLDF is a distribution factor test; is  
17   that correct?

18          A.    That's correct.

19          Q.    And isn't the DFAX study also a  
20   distribution factor test?

21          A.    Which DFAX study?

22          Q.    Well, isn't DFAX -- a DFAX study is short  
23   for distribution factor test; is that right?

24          A.    Yes, that is correct.

25          Q.    And PJM, which is the document that you

1 have in front of you, does a DFAX study analysis.  
 2 They have performed those in the past; is that right?

3 A. Also those are two separate items. The  
 4 document I have in front of me is for external  
 5 resources for market-to-market flowgates, and the  
 6 DFAX in questions today under the applications are a  
 7 separate DFAX analysis.

8 Q. Sure. I am asking if they are both  
 9 distribution factor tests.

10 A. They are in the same class of tests, but  
 11 they are entirely different analyses.

12 Q. Okay. Well, let's turn back to page 8 of  
 13 your direct testimony. Let's go to lines 184 through  
 14 187. And here is where you say the Applicant -- I'm  
 15 sorry, you use Applicant throughout your testimony.  
 16 You do mean Applicants plural, right? You are  
 17 talking about the six facilities when you use the  
 18 term Applicant?

19 A. Yes; yes, that's right.

20 Q. Okay. Here you state that the Applicant  
 21 provided the distribution factor studies from PJM, is  
 22 that right, for the resources, the renewable  
 23 resources in the applications?

24 A. I don't state that they come from PJM. I  
 25 said the Applicant provided DFAX studies for the

1 resources in question.

2 Q. Okay. So you don't think that the  
3 Applicants received DFAX studies from PJM.

4 A. I know the document that I reviewed. I  
5 know that there is a cover letter that says they are  
6 PJM. I don't know who got them. I don't know who  
7 performed them. I don't know if it was Mr. Aaron  
8 Berner as was testified yesterday, but I reviewed the  
9 same document that everybody else did.

10 Q. I'm sorry. Do you have a reason to  
11 believe that someone stole the PJM label that's  
12 copyrighted and put it on a DFAX analysis?

13 MR. WHITT: I am going to object and  
14 calls for speculation.

15 EXAMINER HICKS: Sustained. Move on.

16 Q. (By Ms. Bojko) You have no reason to  
17 believe that the DFAX study analyses that were  
18 discussed yesterday did not come from PJM, do you?

19 MR. WHITT: Objection. It's further  
20 beyond the scope of direct. He hasn't sponsored any  
21 DFAX studies. They sponsored them. He doesn't -- as  
22 he said, he doesn't purport to authenticate or say  
23 anything other than he's -- knows what the other side  
24 has produced.

25 MS. BOJKO: Your Honor, he questioned it.

1 I am asking -- he opened the door when he said what  
2 he said. I am happy to move to strike his response.

3 EXAMINER HICKS: Move to strike?

4 MS. BOJKO: If he is allowed to testify  
5 and I cannot follow up questions to what he  
6 testified, then I would move to strike the testimony  
7 that he elicit -- or stated about the PJM DFAX  
8 analysis.

9 MR. WHITT: If I may, your Honor, the  
10 problem is the attempt to elicit testimony that he  
11 has not given.

12 EXAMINER HICKS: We are not going to get  
13 into the discussion on whether there is scope issues  
14 on cross-examination. That's a law school exam. The  
15 whole thing -- you quoted his testimony and inserted  
16 PJM. He read it back to you saying it didn't have  
17 it. I will let you -- do you have any reason to  
18 believe they didn't come from PJM? What is your  
19 understanding of the documents?

20 THE WITNESS: My understanding of the  
21 document they have a PJM cover letter on them. I  
22 have no -- there's nothing that was independently  
23 provided to me that indicates that there was an  
24 imposter or somebody else. However, I only read the  
25 documents that the Applicants provided. I don't have

1 any independent contact with PJM or anybody else with  
2 respect to these documents.

3 EXAMINER HICKS: There we go.

4 MS. BOJKO: Thank you, your Honor.

5 Q. (By Ms. Bojko) So when you refer to the  
6 Applicants' DFAX studies provided, did you review  
7 those DFAX studies?

8 A. Yes, I did.

9 Q. And because on page 9, line 213, you  
10 argue that the DFAX studies provided presuppose  
11 deliverability, don't you?

12 A. I just quote PJM who says -- PJM's cover  
13 letter document, sorry, the power from the  
14 Applicants' facilities would be expected to flow if  
15 they were -- if they were to deliver their energy  
16 into PJM.

17 Q. Okay. Now I am really confused. You do  
18 believe that these were PJM DFAX studies, correct?

19 A. The documents that I read stated that the  
20 power from the Applicants' facilities would be  
21 expected to flow if they were to deliver their energy  
22 into PJM.

23 Q. Okay. And you are aware that PJM  
24 performs DFAX studies; is that correct?

25 A. Yes.

1           Q.    And you used the words that DFAX studies  
2 presuppose deliverability on line 213, correct?

3           A.    My response here is limited to the DFAX  
4 studies that were provided from the Applicants  
5 because when we're thinking about a DFAX analysis  
6 from a facility that's located in Minnesota, in South  
7 Dakota, that's all the way out here at point A, and  
8 then we have to get the power to point B and then to  
9 point C. The DFAX studies provided from PJM only  
10 evaluate the impacts if the power gets from point B  
11 to point C. They don't evaluate what happens between  
12 point A and B. It presupposes there is delivery at  
13 point B and then evaluates the impact at point C in  
14 Ohio.

15          Q.    So in the DFAX study that you reviewed,  
16 what source did PJM assume? The facility or some  
17 middle point that you just referenced?

18          A.    The source of the generation is the  
19 facility assuming that energy is delivered to PJM but  
20 there's -- there are hundreds of miles of  
21 transmission assets in MISO that are going to affect  
22 the delivery of that energy. So PJM's study on its  
23 own statement says that they don't account for any of  
24 this. They assume it's being delivered into PJM.

25          Q.    Okay. So under your analysis, you're



1     stating that the PJM DFAX analysis assumes  
2     100 percent deliver -- deliverable -- deliverability  
3     to point C in your analysis and that's not correct,  
4     is it?

5             A.     I -- that was not my testimony, counsel.  
6     That was not my testimony.

7             Q.     So you would agree with me --

8             A.     I don't.

9             Q.     -- that -- right. You would agree with  
10    me that the PJM analysis, the DFAX studies, the  
11    source of the generation was the renewable facility,  
12    correct?

13            A.     Yes.

14            Q.     Okay. And you would also agree with me  
15    that PJM does not assume 100 percent of that  
16    generation is deliverable to the end point in Ohio,  
17    correct?

18            A.     That's correct, and that was not my  
19    testimony.

20            Q.     And isn't it true that the PJM DFAX  
21    analyses that were performed had end points outside  
22    of Ohio?

23            A.     There --

24            Q.     Yeah.

25            A.     Is that the question?

1 Q. Yes.

2 A. Yes, the end points potentially outside  
3 of Ohio were included in the listed facilities.

4 Q. Is it your testimony that the DFAX  
5 studies presuppose a certain distribution factor  
6 impact on Ohio transmission lines?

7 A. No.

8 Q. Let's look at page 10, line 234, of your  
9 testimony here going over through page 11, line 236,  
10 you state that "A Firm Point to Point Transmission  
11 Service Reservation ensures that energy from a  
12 facility is physically deliverable to a specific  
13 location or load," correct?

14 A. That's correct.

15 Q. But a TSR does not actually guarantee  
16 that electrons from a generation resource will  
17 actually flow across a transmission line under all  
18 conditions, does it?

19 A. So the concept here is physically  
20 deliverable. And we've covered some basic concepts  
21 just on what deliverability requires, the quality of  
22 analysis that is required to reach that determination  
23 of deliverability. And inside of a transmission  
24 service reservation process, we do have a DFAX study,  
25 and we have something called a firm transmission

1 feasibility study, and we look at all the potential  
2 impacts on the transmission system, its limits, other  
3 transmission service reservations, and other  
4 generation.

5 And with that we can make a determination  
6 as to whether or not additional transmission upgrades  
7 are needed to accommodate those new injections or if  
8 a resource is deliverable on its own. So while a TSR  
9 does not guarantee specific electrons will flow to  
10 specific load, it ensures a robust process is in  
11 place where specific load is being served with  
12 deliverable generation.

13 Q. Thank you for that explanation. So it  
14 only -- a TSR only guarantees that there is enough  
15 transmission available so that the electricity could  
16 flow over the transmission line; isn't that correct?

17 A. That would be -- I think that's a fair  
18 couch of -- a fair categorization of what TSR can do.

19 Q. Thank you. So is it your contention  
20 today facilities within PJM should have to secure a  
21 firm point-to-point transmission service reservation  
22 to be deliverable into Ohio?

23 A. The concept of deliverability can be  
24 demonstrated through a series of interconnection  
25 studies or through a firm point-to-point reservation,

1 and so if specific load is seeking to -- is seeking  
 2 to use energy from a specific resource, a firm  
 3 point-to-point reservation can assist with this.  
 4 However, if a resource was just to interconnect in  
 5 Ohio and be deliverable to Ohio load, it would walk  
 6 through the interconnection process, go through the  
 7 initial step of that DFAX analysis we covered, and  
 8 then the more granular engineering studies.

9 Q. So are you contending that the DFAX study  
 10 does not register or determine the impact on Ohio  
 11 transmission lines?

12 A. A DFAX study does not assure  
 13 deliverability. It can assess impacts on  
 14 transmission lines.

15 Q. And the TSR doesn't guarantee  
 16 deliverability -- deliverable either, does it?

17 A. The TSR process does -- does work through  
 18 a deliverability process.

19 Q. But it doesn't guarantee it, does it?

20 A. I don't understand what you mean by  
 21 guarantee.

22 Q. Well, sure. Isn't it true that  
 23 transmission gets curtailed all the time?

24 A. But that's not what deliverability means.  
 25 It doesn't mean under all circumstances. Ohio this

1 past summer had some outages because their -- it was  
2 very -- there was really hot weather so it -- there  
3 are resources that are deliverable to load in Ohio,  
4 but it doesn't guarantee that the electrons flow  
5 there all the time.

6 Q. Right. Thank you. Let's turn to page 10  
7 of your testimony, line -- I'm sorry. We are over on  
8 page 11, 241, lines 241 to 244. You state that the  
9 Commission should use historical settlement data to  
10 determine deliverability; is that correct?

11 A. Inside --

12 MR. WHITT: Objection, objection. I  
13 think counsel misread the testimony on 241.

14 EXAMINER HICKS: Can you just ask the  
15 question again? I don't know if you read it  
16 correctly or not.

17 MS. BOJKO: Oh, he -- he might be  
18 quibbling with my word of could versus should.

19 MR. WHITT: Could and should.

20 Q. (By Ms. Bojko) You state that the  
21 Commission could use historical settlement data to  
22 determine deliverability; is that correct?

23 MS. BOJKO: Thank you for the  
24 clarification.

25 A. Yeah. Inside this question I am not

1     telling the Commission to do anything. I am just  
2     providing ways in which deliverability can be  
3     demonstrated from an existing facility that has been  
4     operating for 15 years. So in this -- in one of the  
5     options just look at the settlement data and see how  
6     many megawatts from these resources have actually  
7     settled here in Ohio.

8             Q.     Settled meaning a financial transaction;  
9     is that correct?

10            A.     Could be a financial transaction or it  
11     could be through firm point-to-point reservation that  
12     has a -- that has a PPA attached to it.

13            Q.     Sure. If there was a firm-to-firm point  
14     transaction that has a PPA attached and the  
15     settlement -- the settlement only assumes actual  
16     deliverability, right? You only pay for what you  
17     receive, so it's actual deliverability; is that  
18     right?

19            A.     Depending on the PPA, depending on the  
20     context, but it can be, yes.

21            Q.     Right. So a TSR and a PPA do not  
22     guarantee actual delivery and neither does the use of  
23     his -- strike that.

24                    A TSR does not guarantee actual  
25     deliverability and neither does a firm-to-firm point

1 transmission contract, does it?

2 A. Counsel, the concept of physically  
3 delivering megawatts and being designated as  
4 deliverable, while they are similar they are a little  
5 bit distinct and this is an important distinction.  
6 It's kind of like a Venn diagram that overlaps a bit.  
7 There are megawatts from facilities that reach  
8 specific load but in the concept and context of  
9 deliverability, how PJM certifies external resources  
10 to be deliverable to its load, Ohio is within PJM.  
11 The concept of deliverability provides a high  
12 certainty that those specific facilities are  
13 deliverable to serve specific load.

14 Q. And it's your contention physical  
15 deliverability has a financial element; is that fair?

16 A. Physical -- I'm sorry, counsel. I am not  
17 following your question.

18 Q. I asked if you believe that physical  
19 deliverability has a financial element.

20 A. In which context, counsel?

21 Q. You say historical settlement data is a  
22 way to determine actual physical deliverability so  
23 that is a financial element, is it not?

24 A. That is, yeah.

25 Q. And is it your contention that contracts

1 can -- you talked about a PPA. That's a contract.

2 Is it your contention that contracts can demonstrate  
3 actual physical deliverability?

4 A. Depends on -- it would depend on the  
5 language in the contract.

6 Q. Fair enough. But it doesn't determine  
7 actual physical deliverability. Whether you get paid  
8 or not is different than actual physical  
9 deliverability, isn't it?

10 A. Those are separate concepts, yes.

11 Q. Thank you. And looking at lines 270 to  
12 272 on your -- in your testimony, you state that one  
13 of the limitations of the Koda test is it relies on  
14 modeling regardless of the commercial arrangements  
15 applicable to the facility; is that right?

16 A. Can you -- can you point me to that  
17 directly?

18 Q. Sure. 270 to 272.

19 A. Thank you. Yes.

20 Q. And commercial arrangements in this  
21 context is a contract; is that correct?

22 A. Within the context of Koda, yes, it was.

23 MS. BOJKO: At this time, your Honor, I  
24 would like to -- I guess it's already been marked,  
25 but I don't believe the witness has a copy, so I



1 would like to present a copy. I would like -- may I  
2 approach?

3 EXAMINER HICKS: Yes.

4 MS. BOJKO: This has previously been  
5 marked as Blue Delta Exhibit 2, Attachment A. And  
6 for identification purposes this is CSG's Revised  
7 Supplemental Responses and Objections to the First  
8 Set of Discovery.

9 EXAMINER HICKS: Okay.

10 Q. (By Ms. Bojko) Sir, do you have in front  
11 of you what's been previously marked as Blue Delta  
12 Exhibit 2, Attachment A, which are --

13 A. Yes.

14 Q. -- Carbon Solutions Group's revised  
15 supplemental discovery responses?

16 A. Yes.

17 Q. Mr. Stewart, are you familiar with the  
18 responses to discovery that your client submitted in  
19 this case?

20 A. I am generally familiar, but I -- many of  
21 these documents were -- were -- these were prepared  
22 by counsel and the client, not by me.

23 Q. So let -- let's just talk about one and  
24 see if you are familiar with it. You did not sponsor  
25 any discovery responses then; is that fair?

1           A.    I -- I don't recall, but certainly these  
2 processes involve a lot of coordination.

3           Q.    Okay.  Sure.  Fair enough.  I just don't  
4 know because there's no responsible person listed on  
5 these as I -- as you may expect, so I will just have  
6 to ask you the question then, if that's fair.

7           A.    Yes.

8           Q.    So I am turning to page 9 and 10 of the  
9 responses.  I am looking at -- it's the bottom of 9.  
10 It's the Interrogatory-01-20.  Do you see that?  I  
11 will give you a moment.

12          A.    Marked page 10?

13          Q.    It starts on page 9 and goes over to page  
14 10.

15          A.    Yes; yes, I see that.

16          Q.    I will give you a moment to read the  
17 interrogatory.

18                Are you done?

19          A.    Yes.

20          Q.    The interrogatory asks does -- whether  
21 CSG, your client, maintains that the contract path of  
22 electricity demonstrates actual physical  
23 deliverability of that electricity, and then if you  
24 go to the very end, there is actually a substantive  
25 response.  I don't want to ask you about the legal

1 objections, but if you go to the end, it says that  
2 CSG states no. Do you see that?

3 A. So the -- just so I am clear here, the  
4 question is Interrogatory-01-20, and then the answer  
5 is, I don't know, two spaces above the  
6 Interrogatory-01-21.

7 Q. Correct.

8 A. Okay. Yes.

9 Q. Okay. So the answer is no to that  
10 question. Do you agree with that response?

11 MR. WHITT: Objection, relevance.

12 MS. BOJKO: Your Honor, he is here  
13 testifying on behalf of CSG today and testifies to  
14 contract deliverability and physical deliverability,  
15 and I am asking if he agrees with whether a contract  
16 path of electricity demonstrates actual physical  
17 deliverability of that electricity.

18 MR. WHITT: Right, but the witness is not  
19 a party to the case. We are happy to stipulate that  
20 the interrogatory responses, verified responses, of  
21 the company are admissible as admissions that the  
22 answer to the question is no. That answer binds the  
23 company regardless of whether this witness agrees  
24 with it.

25 EXAMINER HICKS: But he is testifying

1 about -- I will overrule the objection. He can  
2 answer whether he agrees or not.

3 MS. BOJKO: Thank you, your Honor.

4 A. I agree with CSG's position.

5 Q. Does the existence of a contract change  
6 the actual flow of electrons?

7 A. It depends on the term of the contract.

8 Q. Does the physics of the system change the  
9 actual -- change whether you have a contract or not?

10 A. Those physics do not change.

11 Q. Thank you. Mr. Stewart, have you  
12 reviewed the Commission's previous orders in  
13 rulemaking proceedings related to the deliverability  
14 requirement and whether there is a financial element  
15 to that or whether there should be a financial  
16 element to that deliverability requirement?

17 A. Counsel, I'm -- I don't -- I can't say  
18 for certain. I can't say for certain.

19 Q. Fair enough.

20 MS. BOJKO: At this time, your Honor,  
21 then I would like to mark for identification purposes  
22 Blue Delta Exhibit 7.

23 EXAMINER HICKS: Which is?

24 MS. BOJKO: Oh, sorry. A Finding and  
25 Order issued on December 19, 2018, Case No.

1 12-2156-EL-ORD.

2 May I approach, your Honor?

3 EXAMINER HICKS: Yes. And if I didn't  
4 say it, it is so marked as Exhibit 7. Sorry.

5 (EXHIBIT MARKED FOR IDENTIFICATION.)

6 Q. (By Ms. Bojko) Mr. Stewart, I've handed  
7 you what's been marked as Blue Delta Exhibit 7, and  
8 it's a Finding and Order in Case 12-2156-EL-ORD.  
9 Would you take a minute just to review that.

10 A. Counsel, it's --

11 Q. Fair enough. I am just -- you said you  
12 aren't certain of whether you have reviewed these  
13 before, so my question to you is this one of the  
14 orders that you may have reviewed in preparation of  
15 your testimony?

16 A. I don't recall, counsel.

17 EXAMINER HICKS: You don't recall if you  
18 have reviewed it or you -- I'm -- or you don't recall  
19 that -- I am going to say it the same way, but I  
20 think there is two ways to interpret that.

21 THE WITNESS: Yeah. Sorry, your Honor.  
22 This exact case heading isn't jumping out to me. I  
23 don't know if I am familiar with it.

24 EXAMINER HICKS: That's valid.

25 Q. (By Ms. Bojko) And, sir, you wouldn't

1 know whether CSG intervened in this case, would you?

2 A. I am not familiar with the procedural  
3 history in this case.

4 Q. Okay. You can put that aside.

5 MS. BOJKO: Your Honor, at this time I  
6 would like to mark for identification purposes as  
7 Blue Delta Exhibit 8 an Opinion and Order issued on  
8 April 15, 2002, in Case No. 08-888-EL-ORD.

9 EXAMINER HICKS: So marked.

10 (EXHIBIT MARKED FOR IDENTIFICATION.)

11 MS. BOJKO: May I approach, your Honor?

12 EXAMINER HICKS: Yes.

13 Q. (By Ms. Bojko) Sir, I've handed you  
14 what's been marked as Blue Delta Exhibit 8 which is  
15 an Opinion and Order issued on April 15, 2009, in  
16 Case No. 08-888-EL-ORD. Does this appear -- or does  
17 this refresh your recollection of whether you've  
18 reviewed this Opinion and Order previously?

19 A. It looks more familiar than the last one.

20 Q. Do you know whether you reviewed this  
21 Opinion and Order in drafting your testimony?

22 A. I don't. I don't.

23 Q. Let's turn to page 28 to focus the  
24 questions to see if you recall. The case caption of  
25 this appears that it is a rulemaking proceeding

1     spurred by an amendment to -- or an amendment to the  
2     rules by Amended Substitute Senate Bill 221, is that  
3     fair, if you look at the case caption?

4             A.     Amended Substitute House Bill 221 was  
5     enacted among other things. Yeah, it looks like to  
6     be the general subject.

7             Q.     Okay. If we could turn to page 28, and  
8     this was before the Commission was actually numbering  
9     helpful paragraphs, so if you turn to --

10            EXAMINER HICKS: Way before my time.

11            Q.     -- page 28, unfortunately not before  
12     mine, and look at the second paragraph on page 28.  
13     I'm sorry, look at the first full paragraph, I think  
14     that's more helpful, starting with "While some  
15     comments."

16            A.     So just -- just for context here, can you  
17     provide me with a little bit more background detail  
18     as to where -- or do you want me to take some time to  
19     familiarize myself?

20            Q.     Actually I was -- I was hoping or  
21     thinking this might spur your memory on what you may  
22     or may not have reviewed before your testimony. Do  
23     you recall this?

24            MS. BOJKO: I don't want to ask any  
25     question he is not familiar.

1 EXAMINER HICKS: So let's ask that  
2 question. I don't think you have asked that  
3 question.

4 MS. BOJKO: Oh, I'm sorry. I thought he  
5 answered.

6 EXAMINER HICKS: I assume that's what  
7 your --

8 MR. WHITT: Your Honor, I was going to  
9 say I really could use a 2-minute break, and I'm  
10 sorry to interrupt between question and answer. I  
11 don't want to talk to the witness. It's a matter of  
12 personal comfort. If you could review in the  
13 meantime and I will be right back.

14 EXAMINER HICKS: We can do -- I will give  
15 you more than 2 minutes. Let's take a legit break.  
16 Let's come back at 10:45. Does that work?

17 MS. BOJKO: Thank you.

18 EXAMINER HICKS: All right. We are off  
19 the record.

20 (Recess taken.)

21 EXAMINER HICKS: Let's go back on the  
22 record.

23 I will hand it back over to Ms. Bojko.

24 MS. BOJKO: Thank you, your Honor.

25 Q. (By Ms. Bojko) Before the break you were



1 looking at a Commission Order, Opinion and Order,  
2 issued April 15, 2009, Case No. 08-888-EL-ORD. And I  
3 had referred you to a paragraph on page 28. Have you  
4 had a chance to review that paragraph and the  
5 document?

6 A. I did not -- I did not review the  
7 document in its entirety. However, I did briefly  
8 review the space inside of the Order where we are at.  
9 It is half of page 27 and half of page 28.

10 Q. Okay. And after your review, does this  
11 refresh your recollection of whether you reviewed  
12 this Opinion and Order prior to the filing of your  
13 testimony?

14 A. It doesn't.

15 Q. Okay. So you don't believe you reviewed  
16 the Commission's decision in this regarding the  
17 rulemaking surrounding the deliverability standard?

18 A. I'm not -- I don't believe that I  
19 reviewed this 2009 order.

20 Q. Okay. I guess I will just ask you do you  
21 know which order you may have reviewed?

22 A. I don't. It's a research process.

23 Q. Okay. And it was a rulemaking proceeding  
24 regarding the deliverability standard at the  
25 Commission?

1           A.    I don't recall, counsel.

2           Q.    Okay.  You do discuss, however, the Koda  
3 test in your testimony; is that correct?

4           A.    Yes.

5           Q.    Did you review the Staff Report in the  
6 Koda case?  And that's -- excuse me.  For the record  
7 it's Koda Energy was a case.  It was a renewable  
8 facility and that created what's been called the Koda  
9 test that you refer to in your testimony; is that  
10 correct?

11          A.    The Staff Report that I did review is on  
12 page 12 of my testimony, footnote 3.  I'm sorry,  
13 footnote 13.  Sorry, counsel.

14          Q.    That's okay.  And this Koda Energy Staff  
15 Report was issued February 28, 2011, that you cite  
16 to; is that correct?

17          A.    Yes.

18          Q.    Did you review the Commission decision  
19 that was issued which is cited in your testimony in  
20 footnote 12?

21          A.    Yes.

22          Q.    And that Commission decision was issued  
23 March 23, 2011; is that correct?

24          A.    Yes.

25          Q.    I'm turning to page 14 of your testimony,

1 lines 303 to 306. There's a sentence beginning on  
 2 303. It states "Koda allows for the owner of a  
 3 generation facility to cause the study to be  
 4 performed 'if the generating facility was not modeled  
 5 by the RTO, because it is not yet operational or not  
 6 yet had its resource studies completed.'" Did I read  
 7 that correctly?

8 A. Yes. And I am citing the Staff Report.

9 Q. In part, part of the sentence that I read  
 10 was citing the Staff Report, correct?

11 A. That's correct.

12 Q. Do you have a copy of that Koda Staff  
 13 Report in front of you, sir?

14 A. No, I do not.

15 MS. BOJKO: Your Honor, at this time I  
 16 would like to mark for identification purposes as  
 17 Blue Delta Exhibit 9, the Staff Report issued on  
 18 February 28, 2011, in Case 09-0555-EL-REN.

19 EXAMINER HICKS: So marked.

20 (EXHIBIT MARKED FOR IDENTIFICATION.)

21 MS. BOJKO: May I approach, your Honor?

22 EXAMINER HICKS: Yes.

23 Q. (By Ms. Bojko) Sir, do you have in front  
 24 you of what's been marked as Blue Delta Exhibit 9,  
 25 the Staff Report issued February 28, 2011, in Case

1 No. 09-555?

2 A. Yes.

3 Q. And is this the Staff Report that you  
4 cited to in your testimony?

5 A. Yes. The Review and Recommendations  
6 Submitted on Behalf of the Staff of the Public  
7 Utilities Commission of Ohio.

8 Q. And is it fair to assume you've reviewed  
9 this document, sir?

10 A. I have reviewed this document.

11 Q. And isn't it true that in Koda, the  
12 Commission ultimately denied certification because  
13 they found that the facility in question did not pass  
14 the deliverability test?

15 A. Koda involved a MISO-based facility, and  
16 in Koda, both MISO and PJM DFAX studies were  
17 performed. And the Commission did ultimately reject  
18 that application for failing to meet the two  
19 standards, first one was DFAX, second one was  
20 megawatt impact.

21 Q. On page 13 of your direct testimony,  
22 beginning on line 286, you mentioned two differences  
23 since the Koda test was created. Do you see that?

24 A. One second, counsel. Page 13?

25 Q. Yes, 286.

1           A.    Yes.

2           Q.    And one of the changes or differences  
3   that you mentioned is a change of RTO footprints on  
4   line 291; is that correct?

5           A.    I will start with the RTO footprints,  
6   yes.

7           Q.    And you think this impacts the validity  
8   of the Koda test, correct?

9           A.    That was not my testimony.

10          Q.    Do you think that this impacts the  
11   applicability of the Koda test to the applications in  
12   this case?

13          A.    No.   Koda required -- inside the Koda  
14   case DFAX studies were performed and submitted by  
15   both MISO and PJM.  And in the present matter we only  
16   have a DFAX study from PJM.

17          Q.    Yeah.  So the only issue that you are  
18   contesting is who performed the DFAX studies?

19          A.    I wouldn't say that's the only issue that  
20   I am contesting but that's a distinction between Koda  
21   and what we have presented today.

22          Q.    Okay.  Well, on line 291, you say that  
23   there was a change of RTO footprints from Koda -- I  
24   assumed you meant from Koda to today; is that not  
25   accurate?

1           A.     So back when Koda was litigated, part of  
2 Ohio was located in the Midcontinent ISO footprint  
3 and part of that was located in PJM. Since then Ohio  
4 is no longer a part of MISO and is entirely  
5 encompassed by the PJM service territory.

6           Q.     And you state in your testimony on line  
7 295 that that change -- you claim that that change  
8 occurred in 2011; is that right?

9           A.     Yes.

10          Q.     Well, isn't it true that after 2011,  
11 there was still part of Ohio that was in MISO?

12          A.     I believe you are referring to OVEC.

13          Q.     No. Isn't it true -- oh, sorry.

14          A.     I'm sorry.

15          Q.     I didn't mean to interrupt you. I  
16 apologize.

17                 EXAMINER HICKS: Go ahead and finish.

18          A.     It's a small portion along -- it's a very  
19 small portion on the seam but the -- there was some  
20 portion of Ohio that was connected to -- to MISO,  
21 very, very small portion.

22          Q.     Well, isn't it true that Duke Energy Ohio  
23 did not change RTOs until 2012?

24          A.     It may be. My recollection was that it  
25 was in 2011.

1 MS. BOJKO: One minute, your Honors.

2 Q. (By Ms. Bojko) I'll come back to that,  
3 but it's your contention you believe all of Ohio was  
4 in PJM in 2011 except for OVEC; is that correct?

5 A. That wasn't my testimony. But since  
6 2011, between the time that Koda was decided and  
7 today, there have been material changes in Ohio's  
8 footprint. Today no portion of Ohio is in MISO.

9 Q. Okay. And you don't know what date all  
10 of Ohio became in MISO.

11 A. I don't recall those exact dates.

12 Q. So the Koda test was created in 2011 and  
13 that Koda test has been applied consistently by the  
14 Commission since it was initially adopted in 2011,  
15 correct --

16 MR. WHITT: Objection, calls for --

17 Q. -- to your knowledge?

18 MR. WHITT: Calls for a legal conclusion.

19 EXAMINER HICKS: Overruled. You can  
20 answer to the extent you know.

21 THE WITNESS: Your Honor, I think in my  
22 review of the REN applications since 20 like 15,  
23 there were a couple -- there were a couple of -- I  
24 think there were a couple thousand or maybe a couple  
25 hundred that have been pulled up on the -- that are

1 available for review. And the ones that I have  
2 reviewed, some of them have been withdrawn. I  
3 believe Koda is applied in a large majority of them,  
4 but I have not reviewed every single one of those REN  
5 applications.

6 Q. (By Ms. Bojko) Well, I guess I am  
7 confused then. You don't believe the Koda test is  
8 the standard that the Commission has been using since  
9 2011? I thought you said that in your testimony; is  
10 that not accurate?

11 A. Your question to me was about the  
12 Commission's applicability of Koda in all of these  
13 cases. My understanding is that's the standard. I  
14 don't have independent knowledge as to whether the  
15 Commission consistently applied that in every case.

16 Q. Okay. Fair enough. But it's your  
17 understanding that the Koda test is what the  
18 Commission has used since 2011 to evaluate the  
19 certification of REN facilities.

20 A. Yes.

21 Q. And it's also your understanding that the  
22 Commission has applied the Koda test to REN  
23 certification applications where the facilities are  
24 located out of state and are noncontiguous to the  
25 state of Ohio, correct?



1           A.     That is correct.

2           Q.     And sitting here today, you cannot tell  
3 me a case you reviewed where the Commission did not  
4 apply the Koda test; is that correct?

5           A.     That's correct.

6           Q.     And that application of the Koda test has  
7 been -- to your understanding has been applied  
8 regardless of the RTO that the facility was located  
9 in; is that correct?

10          A.     Koda can apply to noncontiguous states  
11 that are in nonmarket areas as well, so it can be a  
12 non-RTO.

13          Q.     Okay. Fair enough. So it doesn't matter  
14 which RTO the Koda test has been applied to. Any  
15 REN -- to your knowledge it's been applied to  
16 certifications that have been filed regardless of  
17 whether a facility is in an RTO or not in an RTO or  
18 regardless whether it's in MISO versus PJM; is that  
19 correct?

20          A.     So my understanding of Koda is that it  
21 does apply to external non-Ohio-based facilities and  
22 noncontiguous states.

23          Q.     Regardless of the RTO?

24          A.     Regardless of RTO, nonmarket area, market  
25 area.

1           Q.    Thank you.  And is it your understanding  
2           that during this period the Commission has both  
3           approved and denied applications for REN  
4           certification from facilities in noncontiguous states  
5           in MISO based on the results of the Koda test?

6           A.    I am familiar with that.

7           Q.    Have you reviewed cases where the  
8           Commission has applied the Koda test to facilities  
9           located in noncontiguous states in MISO?

10          A.    Yes.

11          Q.    And let's take Illinois for an example.  
12          Illinois is a noncontiguous state; is that correct?

13          A.    Illinois is a noncontiguous state that is  
14          split between MISO and PJM.

15          Q.    Sure.  Thanks for answering my next  
16          question.  A significant portion of Illinois is not  
17          in PJM; is that correct?

18          A.    It's referred to as downstate Illinois,  
19          that is, the Ameren in the Midcontinent service  
20          territories.  ComEd Co. is the PJM portion.

21                MS. BOJKO:  Okay.  At this time, your  
22          Honor, I would like to mark for identification  
23          purposes Blue Delta Exhibit 10, the Finding and Order  
24          issued on December 1, 2021, in Case 21-987-EL-REN.

25                EXAMINER HICKS:  That's Exhibit 10,

1 correct?

2 MS. BOJKO: Yes.

3 EXAMINER HICKS: So marked.

4 (EXHIBIT MARKED FOR IDENTIFICATION.)

5 MS. BOJKO: I'm sorry. Can you hear me?  
6 I forgot to turn my microphone on.

7 EXAMINER HICKS: I heard all of you. I  
8 just didn't hear the 10.

9 MS. BOJKO: May I approach, your Honor?

10 EXAMINER HICKS: Yes.

11 Q. (By Ms. Bojko) Sir, do you have in front  
12 of you what's been previously marked as Blue Delta  
13 Exhibit 10? And it's a Finding and Order issued  
14 December 1, 2021, in Case 21-987-EL-REN.

15 A. That's right.

16 Q. Have you reviewed cases where the  
17 Commission has applied the Koda test to facilities  
18 such as Harvest Ridge Wind Farm in Illinois?

19 A. I haven't reviewed this specific one in  
20 the past, but I have reviewed similar REN cases  
21 involving other states. Noncontiguous, my apologies.

22 Q. To your knowledge did CSG intervene in  
23 this particular case?

24 A. I'm not familiar with their procedural  
25 history in this case.

1           Q.   And to your knowledge, the Illinois cases  
2   that you did review, would you know whether CSG  
3   intervened in those cases?

4           A.   No, I wouldn't.

5           Q.   Isn't it true that in this particular  
6   Illinois facility case as well as the other ones,  
7   that the Commission utilized a DFAX study to  
8   determine deliverability?

9           A.   In this order before me on paragraph 7,  
10   it appears like the Commission has applied the Koda  
11   test.

12          Q.   And you used a DFAX power flow study  
13   performed by PJM to apply the test?

14          A.   That's right. The order -- the order  
15   doesn't state whether the facility is located in MISO  
16   or in PJM, and I don't know which side of the seam  
17   Newman, Illinois, falls on.

18          Q.   You don't know what side of the seam that  
19   this particular facility is in?

20          A.   Yeah. That's correct.

21          Q.   You don't know where Newman is; is that  
22   your testimony? I just didn't hear you.

23          A.   That's right. I am a New Jersey native,  
24   not an Illinois.

25          Q.   Okay. Have you reviewed cases where the

1 Commission has applied the Koda test to facilities  
2 located in Iowa?

3 A. Yes.

4 Q. And it's your understanding that if the  
5 power flow study does not meet the two-factor test  
6 from a facility, then the Commission has denied  
7 certification to those facilities; is that fair?

8 A. That's fair.

9 Q. And that's regardless of whether they are  
10 located in MISO or PJM?

11 A. From what I have reviewed, that's what --  
12 that's consistent with my understanding.

13 Q. So the one that you have in front of  
14 you -- Newman is located in a MISO state; you just  
15 don't know that.

16 A. Yeah. I have no -- well, so Illinois is  
17 a MISO state, but it's split up between the MISO and  
18 PJM service territories, so it's also a PJM state. I  
19 just don't know where -- where the city is on the --  
20 on the map. If it's next to Springfield, then maybe  
21 it's MISO.

22 Q. If -- and we would be able to find that  
23 information out on the application filed with the  
24 facility's certification; is that correct?

25 A. From the -- the applications I reviewed,

1 typically they state the state, the county, and the  
2 city in which the facility is located.

3 Q. And just so we're clear, make sure, the  
4 Commission has approved certification for facilities  
5 that are located in MISO but on noncontiguous states;  
6 is that correct?

7 A. Yes.

8 Q. Okay. Let's go back to your testimony,  
9 sir, page 13, beginning on -- excuse me, 286.

10 A. Yes.

11 Q. The other difference -- we just talked  
12 about the change in the RTO footprint. The other  
13 difference that you note in your testimony on line  
14 286 is that Koda was a new facility; is that correct?

15 A. Yes.

16 Q. Does Ohio's REN certification require  
17 facilities to be new in order to qualify for REN  
18 certification?

19 A. No. But there is a distinction between  
20 Koda and what we have today and so if there is not a  
21 power flow study that has been demonstrated to show  
22 deliverability of a resource, the facility, if it's  
23 new, must cause that power flow study to be  
24 performed. In all of the applications that have been  
25 submitted in the present consolidated cases, there

1 have been power flow studies that have been  
 2 performed. Those power flow studies were part of the  
 3 interconnection process in MISO, and the second  
 4 supplemental responses notes the amount of ERIS and  
 5 NRIS, which is Network Resource Interconnection  
 6 Service, those resources have in MISO and there is no  
 7 power flow study conducted at that time regarding  
 8 that interconnection that attaches those resources to  
 9 PJM.

10 The only power flow study that -- that I  
 11 had an opportunity to review and not take into  
 12 account those deliverability volumes, the quality of  
 13 interconnection service, congestion on the system,  
 14 again, there is just the documents that -- the PJM  
 15 power flow data was submitted with the applications.

16 Q. It is your understanding, sir, MISO and  
 17 PJM have a joint operating agreement; is that  
 18 correct?

19 A. That's correct.

20 Q. And that joint operating agreement has  
 21 been refined since 2011; is that correct?

22 A. To my understanding, yes.

23 Q. And the joint operating agreement  
 24 requires coordination when it comes to injection into  
 25 the grid and interconnection; is that correct?

1           A.    Injection --

2           Q.    I'm sorry, injection of a generating  
3   facility into the grid, it requires coordination. It  
4   requires MISO or PJM to be notified if there's a  
5   certain level of generation injection; is that right?

6           A.    If there is a certain level of generation  
7   injection?

8           Q.    Yeah. If there is a certain DFAX impact;  
9   is that correct?

10          A.    DFAX impact associated with -- with what?

11          Q.    Loadflow between the RTOs.

12          A.    But in which context? Is it -- is it  
13   transmission service? Transmission expansion?  
14   Interconnection?

15          Q.    Yeah. You talked about that when there  
16   is a new facility coming online, that there is an  
17   interconnection fa -- study; is that correct?

18          A.    Interconnection process which includes  
19   studies, yes.

20          Q.    And I believe you were in the room  
21   yesterday when Mr. Chiles testified?

22          A.    I was.

23          Q.    And there was some discussion about when  
24   MISO has to notify PJM and vice versa --

25          A.    Uh-huh.



1           Q.    -- during that interconnection process;  
2   is that correct?

3           A.    That is correct.

4           Q.    Okay.  So when there is an impact, a DFAX  
5   study impact that's greater than a certain  
6   percentage, the one RTO has to notify the other RTO;  
7   is that correct?

8           A.    Yeah.  Inside of that process, I believe  
9   the threshold that Mr. Chiles identified was  
10   3 percent and to my understanding that is -- that's  
11   accurate.  And what happens is MISO informs PJM that  
12   they have identified an impact on PJM's system, and  
13   PJM performs what is referred to as an affected  
14   system study.  And there is no affected system  
15   studies associated with these MISO-based facilities  
16   inside of these applications.

17          Q.    Sure.  And is -- is that required by Ohio  
18   law or the Commission's rules, the second study that  
19   you are talking about?

20          A.    If you are demonstrating deliverability  
21   and you would like to comply with Koda to provide  
22   your power flow studies, if an affected system study  
23   was triggered, then it should have been provided.

24          Q.    So okay.  So can you tell me one  
25   Commission proceeding that you reviewed since 2011

1 where another study in addition to the DFAX study was  
2 required?

3 A. Inside of Koda itself we are dealing with  
4 a MISO-based facility. Koda itself required that  
5 MISO and PJM provide DFAX studies to the Commission.  
6 And in this case we have a MISO-based facility and no  
7 MISO DFAX.

8 Q. Isn't it true that since the operating  
9 agreement was put into effect, that the MISO and PJM  
10 coordinate and have access to each other's system in  
11 order to perform modeling and studies?

12 A. Which operating agreement?

13 Q. The PJM-MISO operating agreement that  
14 we've been discussing. I believe you reference it in  
15 your testimony.

16 A. The joint operating agreement?

17 Q. Yes. Dated December 11, 2008.

18 A. They perform those studies as part of  
19 their interconnection queue cycle, and the results of  
20 those studies do not get reported directly to the  
21 Ohio Commission.

22 Q. Okay. So I got to go back here because  
23 you said something. Isn't it -- I thought you agreed  
24 with me earlier that the Commission Koda test and the  
25 application of that test since 2011 had, in fact,

1     been applied to noncontiguous facilities located in  
2     MISO, and the Commission had approved those based on  
3     the DFAX study performed by PJM. Is that not  
4     correct?

5             A.     That has taken place, yes.

6             Q.     Thank you. And now I was trying to ask  
7     you about Ohio certification requirements, okay? So  
8     does Ohio's renewable energy certification  
9     requirements require facilities to be new in order to  
10    qualify?

11            A.     No, it does not.

12            Q.     Okay. In fact, it's an older date. It  
13    has to be -- for wind facilities it has to be newer  
14    than January 1, 1998; is that correct?

15            A.     That is correct.

16            Q.     And did you review -- I think you said  
17    earlier today you reviewed Ohio Revised Code 4928.64  
18    as part of your testimony, right?

19            A.     Excuse me, counsel. I am going to  
20    reference my -- reference my testimony here, I am. I  
21    don't have that memorized.

22            Q.     I think it was on page 3, if I recall.

23            A.     Thank you. Oh, I'm sorry. I am looking  
24    at the attachment of my testimony. Let me get...

25            Q.     Page 3 of your testimony.

1           A.    Thank you.

2           Q.    You are familiar with -- I'm sorry. Did  
3 you answer that? I apologize.

4                   EXAMINER HICKS: I think he is checking.

5           A.    It's here, so I do reference 4928.64  
6 Subsection (B) (3).

7           Q.    Okay. But it's fair to assume you are  
8 familiar with 4928.64. At least you reviewed it  
9 before drafting your testimony, right?

10          A.    That's correct.

11          Q.    Okay.

12                   MS. BOJKO: Your Honor, I am not going to  
13 mark this, but in all fairness I think it appropriate  
14 to put the statutory provision before the witness  
15 before I ask him questions.

16                   EXAMINER HICKS: Sure.

17                   MS. BOJKO: May I approach?

18                   EXAMINER HICKS: Yes.

19          Q.    (By Ms. Bojko) Okay. Does this appear to  
20 be Section 4928.64 of the Ohio Revised Code?

21          A.    It does.

22          Q.    It makes it easier you are a lawyer. You  
23 actually know what it looks like, right? Looking at  
24 (A) (1) (a) of the Statute 4928.64, (A) (1) (a) is the  
25 placed-in-service date January 1, 1998, that we just

1 talked about, correct?

2 A. Yes.

3 Q. Isn't it true that -- and you know --  
4 this may sound elementary but to lay the foundation  
5 you do know in Ohio that the legislature, the General  
6 Assembly, would have to revise the statutory section,  
7 right?

8 A. That's correct.

9 Q. And the General Assembly in this context  
10 could have changed the law to include a more recent  
11 placed-in-service date if they wanted to limit REN  
12 certification to new facilities, couldn't it?

13 A. Yes. Of course.

14 Q. And, in fact, the General Assembly has  
15 changed the law a couple times, has it not?

16 A. I think that's a fair categorization.

17 Q. Turning to page -- okay. You still have  
18 the Koda Staff Report in front of you that we talked  
19 about? That was Blue Delta Exhibit --

20 A. Exhibit 9.

21 Q. 9, thank you. Okay. So -- I'm sorry.  
22 You have answered some of these questions. I am  
23 trying to not repeat or be redundant. Turning to the  
24 page 8 of the Koda Staff Report in front of you, the  
25 Staff -- does the Staff Report recommend limiting

1 applicants to requesting the studies to only the  
2 situation you mentioned in your testimony which is  
3 new facilities and an RTO in -- or a noncontiguous  
4 PJM state?

5 A. My appreciation for the Koda standard  
6 here and the recommendations that are contained  
7 inside of the Staff Report weren't so much they were  
8 limiting, but they were looking for a way for new  
9 facilities to create an opportunity here in Ohio.  
10 And by causing these DFAX studies to be done, that  
11 would be creating that opportunity for those new  
12 facilities.

13 Q. But Koda does not state that the  
14 generating facility has to be not yet operational or  
15 just newly put in, does it?

16 A. No. And that's not -- that's  
17 inconsistent with my testimony.

18 Q. Okay. Isn't it true -- we were just  
19 talking about the General Assembly changing this law.  
20 Isn't it true that the General Assembly removed the  
21 solar carve out from the RPS program in 2014 through  
22 Senate Bill 310?

23 A. Counsel, I am not familiar with all of  
24 the energy legislation the Ohio assembly has passed.

25 Q. Well, no. I don't mean all the

1     legislation, sir. I am talking about you did say you  
2     were familiar with that the RPS standard in Ohio has  
3     changed since or has changed, correct?

4             A. I am familiar with it but not the  
5     legislative history.

6             Q. Okay. So you are familiar that -- are  
7     you familiar that the in-state requirement that was  
8     contained in the law was removed?

9             A. At which date?

10            Q. 2019. That one was through House Bill 6.

11            A. I'm familiar -- vaguely generally  
12     familiar with that.

13            Q. And the one that I prior -- previously  
14     mentioned, you are familiar that the General Assembly  
15     removed the solar carve out from the RPS program in  
16     2014.

17            A. I'm not familiar with that.

18            Q. Okay. So you are -- you do realize that  
19     the RPS program in Ohio per the statute does not  
20     require an -- does not contain an in-state  
21     requirement or a solar carve out, does it?

22            A. My appreciation for the requirements are  
23     that if it's not an in-state facility and it's not  
24     contiguous through the state, a power flow study must  
25     be conducted to demonstrate deliverability into the

1 State.

2 Q. Okay. And so the General Assembly could  
3 have explicitly required only contiguous states to be  
4 certified as deliverable, correct?

5 MR. WHITT: Your Honor, at this point I  
6 need to object. I have tried to be patient while the  
7 witness is at least being asked to read -- why it's  
8 necessary I don't know, but read current legislation.  
9 And now we are getting not only into repealed  
10 legislation but hypothetical legislation.

11 MS. BOJKO: Happy to rephrase.

12 MR. WHITT: Irrelevant and cumulative.

13 EXAMINER HICKS: If you are going to  
14 rephrase, I am not going to rule on the objection,  
15 but I will say I think we have -- he's already  
16 answered that the General Assembly has the ability to  
17 alter the statute.

18 MS. BOJKO: Sure. I'll rephrase, your  
19 Honor.

20 EXAMINER HICKS: So I think we're --

21 Q. (By Ms. Bojko) I am going to talk about  
22 the statute in front of you, sir. There is not a  
23 requirement that contiguous states be deemed  
24 deliverable; is that correct? There is not a  
25 requirement that only contiguous states be certified



1 by the Commission --

2 MR. WHITT: Your Honor --

3 Q. -- is that correct?

4 MR. WHITT: I'll object. If it would  
5 help, we are happy to stipulate to the codified laws  
6 of the State of Ohio in connection of those laws as  
7 enacted by the General Assembly.

8 MS. BOJKO: Your Honor, the witness is  
9 opining on Ohio law.

10 MR. WHITT: He's not.

11 MS. BOJKO: I am allowed to explore the  
12 level of his recollection and understanding of that  
13 Ohio law.

14 MR. WHITT: If I may, you got him to  
15 admit he is not testifying as a lawyer. He's not  
16 offering legal opinions. I don't dispute, counsel,  
17 your right to make your argument in your brief, but I  
18 don't know why we need a preview of your brief with  
19 the witness. That's all I'm saying.

20 EXAMINER HICKS: I'll overrule the  
21 objection. You can ask about the current law but any  
22 hypotheticals or what someone could do or may do,  
23 let's try to bypass those.

24 MS. BOJKO: Sure. Thank you, your Honor.

25 Q. (By Ms. Bojko) So I think there is a

1 current question pending. It sounded like it might  
2 not have been so artful, so I will try again. Isn't  
3 it true that the current law does not only allow  
4 certification of facilities located in contiguous  
5 states?

6 A. The current law permits certification  
7 from generation facilities, qualifying generating  
8 facilities --

9 Q. Sure.

10 A. -- located in noncontiguous states.

11 Q. And thank you for that clarification. I  
12 appreciate that. Let's turn to page 15 of your  
13 testimony, lines 320 -- line 329 it starts. Are you  
14 there?

15 A. I am.

16 Q. Here you state that REN certification for  
17 non-deliverable resources can potentially increase  
18 localized emissions and cause loss of economic  
19 impacts and job creation; is that correct?

20 A. I don't -- that's not my exact statement  
21 in lines 329 to 331. In 329 in referencing the  
22 question above I say "These include the potential for  
23 increased localized emissions, increased wholesale  
24 power prices, and loss of economic impacts and job  
25 creation related to localized installation of

1 renewable resources."

2 Q. Okay. So you are testifying that REN  
3 certification for non-deliverable resources can  
4 potentially increase localized emissions and cause  
5 loss of economic impacts and job creation; is that  
6 correct?

7 A. Yes.

8 Q. A non-Ohio facility wouldn't have more of  
9 an impact on Ohio's localized emissions simply by  
10 virtue of being in PJM instead of MISO, would it?

11 A. I'm sorry. Can you ask that question  
12 again?

13 Q. Sure. A non-Ohio facility wouldn't have  
14 more of an impact on Ohio's localized emissions  
15 simply by virtue of being in PJM instead of MISO,  
16 would it?

17 A. Yes, it would. So the way the RTO --

18 Q. No. I don't need an explanation. Thank  
19 you.

20 A. Of course.

21 Q. Okay. And so it's your testimony here  
22 today that a non-Ohio facility would have more of an  
23 impact on Ohio's localized emission? Just a yes or  
24 no is great.

25 A. My testimony is that resources that are

1 non-deliverable to Ohio have a negative impact on  
2 emissions and cost efficiencies.

3 Q. So you are stating that a facility  
4 located in PJM that's a noncontiguous state has a  
5 higher effect on localized emissions than a facility  
6 located in MISO in a contiguous state?

7 A. Counsel, the qualifier here that is  
8 really significant is deliverable. My testimony is  
9 that resources that are not deliverable to Ohio have  
10 these negative impacts.

11 Q. And would you believe that a non-Ohio  
12 facility would have more of an impact on Ohio jobs  
13 simply because it's located in PJM?

14 A. I don't understand the question, counsel.

15 Q. Okay. You are not testifying here today  
16 that a non-Ohio facility located in a noncontiguous  
17 state has less of an impact -- or more of an impact,  
18 excuse me, than a facility located in MISO, are you?

19 A. Counsel, I'm sorry to ask you to repeat  
20 that. I'm just not following the qualifiers in the  
21 question. Can you just walk -- if you walk me  
22 through that one more time, I will do my best.

23 Q. Yeah. I am trying to put it in terms of  
24 your testimony, sir. So you are -- well, strike  
25 that.

1           Okay. So let's take -- let's take an  
2       example. That might be more helpful. If we have two  
3       identical facilities, renewable facilities, located  
4       in two noncontiguous states to Ohio, one facility is  
5       located in PJM and one facility is located in Ohio.  
6       Your testimony -- gosh darn it.

7           MS. BOJKO: Your Honor, can we strike  
8       that and let's try again?

9           EXAMINER HICKS: Yes.

10          MS. BOJKO: I thought I was doing so  
11       well.

12          Q.     (By Ms. Bojko) You have two facilities,  
13       identical facilities, renewable facilities. One is  
14       located in MISO, and one is located in PJM. Both are  
15       noncontiguous states. Are you testifying that one  
16       facility has a greater impact on Ohio jobs because it  
17       is located in PJM?

18          A.     No. My testimony is that resources that  
19       are not physically deliverable to serve Ohio  
20       customers have a negative impact on.

21          Q.     And does that include non-deliverable  
22       facilities in PJM?

23          A.     Non-deliverable facilities in PJM would  
24       not be certified under Koda.

25          Q.     And you would agree with me that

1 emissions don't travel, would you?

2 A. I would agree with you emissions don't  
3 travel?

4 Q. Well, let me try that again. Localized  
5 emissions would not travel with the contract path of  
6 electricity, would they?

7 A. Localized emission -- I'm sorry, counsel.  
8 I'm not...

9 Q. Yeah. Let's put it this way, do  
10 emissions travel across transmission lines?

11 A. We are talking the difference between air  
12 pollution and the flow of electricity, so if you are  
13 talking -- like if you are saying that do  
14 transmission lines carry emissions?

15 Q. Yeah.

16 A. They don't.

17 Q. Thank you. Yeah. And if those emissions  
18 don't travel through the transmission lines, then why  
19 does deliverability matter?

20 A. If emissions don't travel through  
21 transmission lines, why does deliverability matter;  
22 is that -- am I understanding that question  
23 correctly?

24 Q. You are.

25 A. Okay. So -- excellent. Okay. I think I

1 am understanding. So what happens is that when a  
 2 resource is deliverable to a specific load and it's  
 3 included in the network model, it's going to be  
 4 dispatched in real time by PJM or by MISO, and it's  
 5 going to have an impact on the supply stack that's  
 6 being dispatched to serve those customers during that  
 7 period of time. The resource is not deliverable to  
 8 Ohio, but it's being kind of credited as -- as  
 9 contributing to Ohio renewable attributes. Another  
 10 resource is going to be dispatched in its place. And  
 11 that other resource that can be dispatched in its  
 12 place can be gas or a fossil fuel unit.

13 Q. But it could also be a renewable  
 14 facility, could it not?

15 A. There's -- it could be.

16 Q. And it also could be a facility not  
 17 located in Ohio, so it had no effect on the localized  
 18 emissions, correct?

19 A. Had no effect on the localized. The way  
 20 that these markets are dispatched are through a  
 21 security-constrained economic dispatch. We can run  
 22 through a million hypotheticals here as to what is  
 23 going to be dispatched and how emissions are going to  
 24 like generally flow.

25 But what's going to happen is if

1 resources that are not deliverable to Ohio are being  
2 dispatched in a way that is not serving Ohio  
3 customers, somebody else is going to, and the  
4 majority of the resources that are on the footprint  
5 today that are going to fill that -- fill that gap,  
6 those are fuel -- those are fossil fuel-based  
7 resources, so you will see localized increased  
8 emissions.

9 Q. If MISO dispatches the plant, does it  
10 produce emissions?

11 A. What plant?

12 Q. Where would the emissions be produced?  
13 At the plant?

14 A. Which plant, counsel?

15 Q. Right. Any plant, where would the  
16 emissions be produced? At the plant or at the end  
17 point of deliverability?

18 A. Some -- some -- some plants don't produce  
19 emissions like solar or wind.

20 Q. Of course. But if there were emissions,  
21 because that's what you are talking about in your  
22 testimony, the impact of emissions, so if emissions  
23 are produced, are they produced at the facility, at  
24 the plant?

25 A. Typically, yes.



1           Q.    And they would be produced at the  
2   location of the plant, correct?

3           A.    That is correct.

4           Q.    Okay.  So if the plant is not located in  
5   Ohio, the emissions would be produced into the air at  
6   the location of the non-Ohio state, correct?

7           A.    If a wind farm in Minnesota is being  
8   credited as serving Ohio load but it is not  
9   deliverable to Ohio load, a resource inside of Ohio  
10   or close to it will be dispatched to serve that load.  
11   And it is the likelihood of that resource -- the  
12   likelihood is that resource will have emissions.

13          Q.    Okay.

14               MS. BOJKO:  Your Honor, I move to strike  
15   that answer as nonresponsive.  My question was where  
16   air pollutants, air emissions enter the air and if  
17   it's at the state or where the facility is located or  
18   at the end point where there is a contract deliver --  
19   delivered power.

20               MR. WHITT:  Your Honor.

21               EXAMINER HICKS:  No need.  Denied.  You  
22   are asking very open ended hypothetical questions, so  
23   you are going to get explanations on your answers.

24               MS. BOJKO:  Okay.  Could I have my last  
25   question reread, your Honor?

1 EXAMINER HICKS: Sure.

2 MS. BOJKO: Because I don't think he  
3 actually answered it.

4 (Record read.)

5 Q. (By Ms. Bojko) Let me rephrase. I see  
6 you're struggling. If there is a plant -- and I am  
7 not talking about a renewable facility because you  
8 were just talking about -- your whole premise of  
9 emissions is regarding a dispatch of a nonrenewable  
10 facility to replace the electricity if it's  
11 dispatched in a different way; is that fair?

12 MR. WHITT: Your Honor, I'm sorry. I  
13 need to object. At this point the line of  
14 questioning is argumentative. The witness has  
15 answered the question.

16 EXAMINER HICKS: I am going to overrule  
17 the objection. She is asking him what his testimony  
18 is saying. You need -- if she is mischaracterizing  
19 your testimony, you have the opportunity to correct  
20 it.

21 THE WITNESS: Okay.

22 EXAMINER HICKS: Go ahead, Ms. Bojko.

23 MS. BOJKO: I'm sorry. I don't remember  
24 that question. Could I have that one reread?

25 EXAMINER HICKS: Sure.

1 (Record read.)

2 MS. BOJKO: Just let me rephrase. I'm  
3 sorry.

4 Q. (By Ms. Bojko) Your testimony premised  
5 around emissions and localized emissions as you  
6 reference on page 15 of your testimony. The premise  
7 of your comment about emissions negatively impacting  
8 Ohio, is the underlining premise that if a renewable  
9 facility that's certified is not actually physically  
10 delivered and another nonrenewable facility is  
11 dispatched in its place, that those air emissions  
12 from the nonrenewable facility could negatively  
13 impact Ohio; is that correct?

14 A. That's close. It's close. If a  
15 non-deliverable facility is being credited as serving  
16 Ohio customers and is, in fact, not, another facility  
17 would need to be dispatched and turned on to serve  
18 those customers, there is a high likelihood that  
19 facility will be emitting pollution in or close to  
20 Ohio.

21 Q. How -- how do you jump to there? Where  
22 is your -- strike that.

23 Highly likely, are you saying that you  
24 intimately work with PJM's dispatch model, and you  
25 know which facility is going to be dispatched if the

1 Barton 1 renewable facility is not delivered to Ohio?

2 A. That's not my testimony, counsel. What  
3 happens inside of these economic dispatch models is  
4 that if you remove a resource, there has to be a  
5 replacement resource on the margin. On the margin  
6 resources most often are gas and coal. You can  
7 confirm that -- you can confirm that just by going on  
8 PJM's website. You can confirm that just by looking  
9 at LMPs.

10 Q. How many fossil units are marginal  
11 resources in PJM today?

12 A. In which -- at which price point?

13 Q. I'm sorry. Are you talking purely an  
14 economic dispatch model and your whole testimony is  
15 based on at which price point, or are you talking  
16 about localized emissions traveling to Ohio?

17 A. Counsel, I was just trying to answer the  
18 question that was presented to me.

19 Q. So you can't answer how many fossil  
20 fuel -- fossil units run in PJM on the margin at any  
21 given point, can you?

22 A. So I can't. What happens there is there  
23 is a new location marginal price set at a thousand --  
24 couple thousand price points throughout -- throughout  
25 PJM every 5 minutes. So I can't tell you what the

1 exact unit is that's going to be setting price for  
2 one or multiple price points throughout the  
3 footprint.

4 Q. Okay. But you are sitting here today  
5 claiming that if Barton 1 wind facility receives  
6 certification, that if that facility is taken offline  
7 or there is no actual deliverability, physical  
8 electrons delivered to Ohio, you are saying that that  
9 situation will create a negative localized emission  
10 and job creation in Ohio, right? Is that your  
11 testimony?

12 A. My testimony is very close.

13 Q. Okay.

14 A. My testimony is that if a non-deliverable  
15 resource is being credited as serving Ohio customers  
16 when, in fact, it is not, a replacement resource has  
17 to come online and one of those replacement resources  
18 would very likely be a fossil fuel resource and  
19 Ohio -- Ohio residents are not getting the benefit of  
20 developing new renewable resources in the state and  
21 getting that benefit from job creation.

22 Q. Okay. Where does it say in either the  
23 Commission's rules, the Commission's orders, where  
24 does it discuss replacement power?

25 MR. WHITT: Your Honor, I am going to

1 object and also note we are now approaching three  
2 times the estimated cross and this is only the first  
3 party. This is so --

4 EXAMINER HICKS: Okay.

5 MR. WHITT: I object.

6 EXAMINER HICKS: Your objection is noted.  
7 Cross estimates are irrelevant to me, so while I wish  
8 everyone could stick to them, I know the reality.

9 MS. BOJKO: And I did preview my failure  
10 yesterday.

11 EXAMINER HICKS: Understood. We are not  
12 approaching a certain unnamed attorney so. But I  
13 will let you ask this last question, but I feel like  
14 we are running on a hamster wheel here.

15 MS. BOJKO: I'm sorry. As -- you're  
16 saying as it relates to his testimony? Because I  
17 don't understand his testimony either. That's why --

18 EXAMINER HICKS: He has given the same  
19 answer four times.

20 MR. WHITT: I'll just represent I have  
21 tried to talk him out of his testimony in prep. I  
22 couldn't do it. Mr. DeMonte couldn't do it. But  
23 good luck.

24 MS. BOJKO: I don't know what that means.

25 EXAMINER HICKS: I don't know what that

1 means either. I'm not concerned. But go ahead. I  
2 don't even remember what your last question was. Ask  
3 the question. I feel like we have had the same  
4 question and answer at least three or four times.  
5 You may not like the answer, but I think that is the  
6 answer.

7 MS. BOJKO: Okay. I will withdraw that  
8 and ask another question.

9 Q. (By Ms. Bojko) Yeah. PJM has sufficient  
10 resources to serve load in Ohio today; is that  
11 correct?

12 A. I believe that is correct. There have  
13 been some load curtailments in Ohio but they -- if  
14 my -- I think those more closely related to  
15 transmission outages but there may be -- there may  
16 have been some supply shortfall at some point in time  
17 that I am just not -- I don't know all the details  
18 about it.

19 Q. I'm sorry. Transmission curtailments,  
20 that was not my question. I guess we said generating  
21 resources is sufficient to serve the load in Ohio.

22 A. If you're just looking at demand and load  
23 and reserve requirements, yes, PJM has adequate --  
24 adequate resources and reserve requirements to serve  
25 the load.

1           Q.    Way over.  The reserve margin today is in  
2   the teens; isn't that correct?

3           A.    You might be --

4           Q.    20s?

5           A.    Yeah.  I think it's approaching 20.

6           Q.    Fair enough.  So with or without Barton  
7   wind facility, PJM has sufficient resources to serve  
8   Ohio load; is that right?

9           A.    PJM has sufficient deliverable resources  
10  to my understanding to serve Ohio load.

11          Q.    How about let's ask on page 15 to 16, you  
12  argue that reduction in certain emissions benefits  
13  Ohioans; is that correct?

14          A.    The question that I am answering is how  
15  am I allowing non-deliverable resources to  
16  participate in increased localized emissions in Ohio;  
17  that's the question that I am answering.

18          Q.    So are you -- are you saying that you are  
19  not stating in your testimony that a reduction in  
20  certain emissions benefits Ohioans?

21          A.    Reduction in certain emissions benefits  
22  Ohioans, I think that's safe -- that's a fair  
23  characterization of my portion of my testimony.

24          Q.    So have you performed any research or  
25  analysis to see how the price of RECs correlates to



1 increases or decreases in emissions?

2 A. No, I have not.

3 Q. Are you aware that some states allow for  
4 the use of undeliverable or unbundled RECs?

5 A. Am I for the purposes of my testimony? I  
6 was just focusing on what Ohio does.

7 Q. You are not aware that some states allow  
8 for unbundled RECs?

9 A. Unbundled, can you explain unbundled to  
10 me, please?

11 Q. Yeah. The -- okay. You don't know what  
12 the term unbundled RECs means?

13 A. So I have a -- I have an appreciation,  
14 but I don't know the question that you are asking,  
15 what your understanding of unbundled means.

16 Q. Okay. Is your understanding of an  
17 unbundled REC that they are RECs with no  
18 deliverability requirement?

19 A. Yes.

20 Q. Okay. So we are on the same page. Have  
21 you conducted any research to quantify the  
22 environmental effects of the use of unbundled RECs?

23 A. In Ohio, no.

24 Q. In any states that have unbundled RECs.

25 A. No.

1           Q.    So you don't know the environmental  
2    impact of using unbundled RECs, do you?

3           A.    My testimony isn't about the  
4    environmental impact of unbundled RECs.  It's about  
5    the negative impact of dispatching fossil fuel  
6    resources to replace non-deliverable clean energy  
7    resources.

8           Q.    Okay.  Let's turn to page 17 of your  
9    testimony, lines 383 to 384.  Here you state that  
10   allowing "Non-deliverable projects makes it more  
11   difficult for projects in Ohio to be competitively  
12   procured and constructed."  Do you see that?

13          A.    Yes.

14          Q.    Are you aware of any projects in Ohio  
15   that were not constructed due to the price of RECs?

16          A.    Am I aware of any projects?  Any projects  
17   that were specifically perspective, not built due to  
18   Ohio REC prices?

19          Q.    Yes.

20          A.    No.

21          Q.    Have you performed any research to see  
22   how the price of RECs correlates to increases or  
23   decreases in competitively-procured and constructed  
24   renewable projects?

25          A.    I've -- I work regularly with renewable

1 project developers, and I help them understand the  
2 impact of -- the impact of REC pricing and other  
3 products as to how they would affect financing or  
4 project viability.

5 Q. And you did not do that specific to your  
6 testimony in this case for Ohio, did you?

7 A. What I did was I took my observations  
8 from my work experience and my expertise and applied  
9 it to this case.

10 Q. I guess did you do a specific analysis of  
11 how the price of RECs correlates to construction  
12 projects in Ohio?

13 A. Cost of RECs, no, I did not conduct that  
14 type of threshold analysis.

15 Q. And you are familiar with both M-RETS and  
16 GATS, is that correct, the tracking system for  
17 renewable energy credits?

18 A. They are separate systems. I am familiar  
19 with them, yes.

20 Q. Oh, thank you. Yes. M-RETS is for MISO;  
21 GATS is for PJM; is that correct?

22 A. That's correct.

23 Q. So when a REC is generated from a  
24 renewable facility's output, it is registered in  
25 either M-RETS or GATS, and then if a REC is sold or

1 retired, that's also registered in M-RETS and GATS;  
2 is that correct?

3 A. It is.

4 Q. And isn't it true that in M-RETS and  
5 GATS, as of November 2022, there are over 1,500  
6 non-PJM facilities currently registered as eligible  
7 to sell RECs in Ohio?

8 A. Can you ask that question one more time,  
9 please?

10 Q. Sure. Isn't it true in M-RETS and GATS,  
11 as of November 2022, there are over 1,500 non-PJM  
12 facilities currently registered as eligible to sell  
13 RECs in Ohio?

14 A. I have never completed a count, but I  
15 won't argue with you on 1,500.

16 Q. And do you know whether 1,421 of those  
17 are located in MISO?

18 A. I do not.

19 Q. Do you know that approximately 8,000 PJM  
20 facilities are currently registered as eligible to  
21 sell RECs in Ohio?

22 A. I don't have -- I know there are a lot of  
23 facilities registered. 8,000 may or may not be  
24 correct.

25 Q. Well, is it true that PJM units,

1 renewable facilities, that are registered to sell  
2 RECs in Ohio, those facilities generally have an  
3 option to also sell RECs in other states?

4 A. Counsel, I don't know the options for all  
5 of those facilities. And so depending on which state  
6 they are in, depending on the size of the facility,  
7 depending on the technology, all of those things can  
8 impact whether or not they are eligible for RECs in  
9 multiple states.

10 Q. Sure. Of course. So -- so speaking a  
11 little bit more generally, it's fair to say that a  
12 renewable facility that's registered to sell their  
13 RECs in Ohio can also be registered to sell their  
14 RECs in another state assuming they meet that state's  
15 certification requirements?

16 A. I would agree with that to the extent  
17 that I would change can to may if I was to -- if I  
18 was to adopt that.

19 Q. Sure. Facilities can receive multiple  
20 state certifications if they satisfy that state's  
21 renewable portfolio standards?

22 A. Some of them, yes.

23 Q. And some other states -- you are familiar  
24 with other states outside of Ohio you stated. Those  
25 other states outside of Ohio may have more favorable

1 renewable portfolio standards; is that correct?

2 A. What do you mean by more favorable?

3 Q. Well, the REC price might be higher than  
4 Ohio; is that correct?

5 A. Other states do have REC prices that are  
6 higher than -- higher than Ohio to my knowledge.

7 Q. And if an Ohio facility was registered to  
8 sell their RECs in Ohio is also certified to sell  
9 their RECs in another state that has a higher REC  
10 price, that unit would likely choose to sell their --  
11 their RECs in another state that has a higher REC  
12 price, correct?

13 A. It would be delivering the clean energy  
14 to Ohio, in turn producing a REC, and then retiring  
15 that REC to another state in exchange for higher  
16 compensation.

17 Q. I'm sorry. My -- do you believe that  
18 when you retire a REC or sell your REC to another  
19 state, that you also have to deliver the power to  
20 that state?

21 A. That's not what I -- that's not what I  
22 had testified to.

23 Q. Oh, I'm sorry. I misunderstood.

24 MS. BOJKO: Could I have his answer  
25 reread, please? I didn't mean to mischaracterize

1 your testimony. I apologize.

2 (Record read.)

3 Q. (By Ms. Bojko) You are saying that if the  
4 Ohio -- I'm sorry. I misunderstood your response.  
5 You are saying that the Ohio facility that generates  
6 would sell the renewable energy credit to another  
7 state for a higher price.

8 A. Under your --

9 Q. They are unbundled.

10 A. Under your scenario, dealing with an  
11 Ohio-based facility --

12 Q. Right.

13 A. -- that qualifies to sell RECs in Ohio is  
14 delivering -- is deliverable to Ohio is taking its  
15 REC product, selling it to another state; is that  
16 correct?

17 Q. I said Ohio facilities so that assumes  
18 deliverability under the Ohio law, but sure.

19 A. Certainly this is a -- it's an issue  
20 we've been discussing. So just for clarity, if that  
21 is -- if that's the options in front of the -- in  
22 front of we'll just use Pennsylvania, for example,  
23 they want to retire the RECs in Pennsylvania, they  
24 could do that, sure.

25 Q. And similarly if there's a facility

1 located in Pennsylvania that's also certified to sell  
2 their RECs in Ohio, they could generate the  
3 electricity in Pennsylvania, and they could sell  
4 their renewable energy credit to Ohio, correct?

5 A. If they were certified, it would be  
6 deemed deliverable to Ohio, then they would be able  
7 to produce their energy in Pennsylvania and sell  
8 their RECs to Ohio.

9 Q. And CSG, in fact, aggregates, you stated  
10 earlier, solar renewable energy credits from  
11 customers' facilities in Ohio; is that correct?

12 A. To my understanding, yes.

13 Q. And CSG sells their RECs from their Ohio  
14 facilities to any state that will purchase those? Do  
15 you know -- let's back up.

16 Do you know whether CSG's facilities in  
17 Ohio that it aggregates the RECs for are also  
18 certified to sell the RECs in other states?

19 A. I have a familiarity with CSG's business  
20 model. I do not know how they conduct their actions.  
21 I don't have any independent knowledge of any  
22 facility that they have contracted with. Certainly  
23 that is beyond the scope of our engagement.

24 Q. Are you aware that the PJM units eligible  
25 to sell RECs in Ohio, of those all but five are also



1 eligible to sell RECs in other states with more  
2 favorable RPS programs?

3 MR. WHITT: Objection, assumes facts.

4 EXAMINER HICKS: Any response?

5 MS. BOJKO: I don't think -- I am asking  
6 if he is aware.

7 EXAMINER HICKS: I will overrule. If you  
8 are aware, you can answer. If you're not, that's a  
9 valid answer.

10 A. Yeah. I am not aware.

11 Q. Are you familiar with siting issues that  
12 renewable facilities need to be sited in a particular  
13 state, for instance, in Ohio it's -- certification is  
14 through the Ohio Power Siting Board?

15 A. I am not.

16 Q. And your testimony then does not take  
17 into effect any siting difficulties for renewable  
18 facilities, if there are any, does it?

19 A. No, it does not.

20 Q. Let's turn to page -- I'm almost done.  
21 Let's turn to page 15 of your testimony, line 340. I  
22 have a clarification question. Line 340, you use the  
23 word here "out-complete," phrase. Did you mean  
24 "out-compete" here?

25 A. I did.

1           Q.    Okay.  Turning to page 17, line 390, here  
2   you talk about the Ohio renewable requirements that  
3   are designed to be procured.  Do you see that?

4           A.    Yes.

5           Q.    You use the word "designed."  Were you  
6   involved in the legislative process that created RPS,  
7   the -- that designed the State's RPS?

8           A.    No, I was not.

9           Q.    So you're just speculating as to what the  
10   intent of the General Assembly was saying here; is  
11   that correct?

12          A.    I am not speculating.  We heard a lot of  
13   testimony even yesterday from Mr. Nelson articulating  
14   how REC prices are set, how they are a bit dynamic.  
15   You know, that is -- that's how -- that's simply how  
16   the RPS -- sorry, how the other REC market functions  
17   in Ohio.

18          Q.    But I'm sorry.  I don't think -- in this  
19   one you seem to be talking about the Ohio renewable  
20   requirements which I took that to mean the statutory  
21   requirements or the Commission's rule requirements;  
22   is that not correct?

23          A.    Renewable requirements and targets that  
24   are then satisfied through the retirement of RECs and  
25   those RECs are priced based on market dynamics.

1           Q.    So you weren't talking about how the  
2 renewable requirements were designed by the General  
3 Assembly or the Commission's rules?

4           A.    I was talking about the general design,  
5 the market design, and the construction as to how  
6 those requirements are actually satisfied.

7           Q.    Okay. In this answer 38, you discuss  
8 the -- strike that. We already covered that.

9                   Let's go back to the deliverability  
10 requirement for a moment on page 11. I am looking at  
11 your recommendation section.

12          A.    Yes.

13          Q.    If the Commission does not use the Koda  
14 test, are you recommending that the Commission adopt  
15 any other specific test?

16          A.    I'll just cite the first line of my  
17 testimony on page 247. "I am not recommending a  
18 specific 'test' for deliverability." However, what I  
19 provide here are range of options for the Commission  
20 to consider if you would like to demonstrate  
21 deliverability, maybe a power flow -- maybe a power  
22 flow study coupled with additional analysis does  
23 that. Again, I reference E-Tags here, so if you  
24 could -- if you could show and demonstrate that your  
25 resources -- that your generation from your resources

1 in -- I shouldn't say your, but from the Applicant  
2 resources in South Dakota and Iowa is actually  
3 flowing over the seam, that would -- to me that would  
4 demonstrate deliverability. It's not quite inside of  
5 Koda, but it would -- it would show it.

6 Q. But your recommendation is not to replace  
7 the Koda test with another specific test, is it?

8 A. It's -- again, I am not providing a  
9 specific recommendation. I think Koda is  
10 sufficiently broad and allows the Commission to  
11 consider multiple factors inside of a deliverability  
12 analysis including a power flow study coupled with a  
13 demonstration of deliverability. So the purpose of  
14 my testimony here is simply to provide -- simply to  
15 note for the Commission there are other options  
16 available.

17 Q. So -- so you're not even disagreeing with  
18 the Koda test here, are you? You are saying that the  
19 power flow study used in the Koda test is an  
20 appropriate tool that the Commission can use?

21 A. What Koda requires is that if there is an  
22 external resource delivering to PJM requires a DFAX  
23 study from that external -- from that external market  
24 area and also PJM.

25 Q. Do you believe that the Koda test and the

1 use of the DFAX study is an appropriate tool that the  
2 Commission can utilize?

3 A. You are asking -- the first part is if  
4 the Koda test is an appropriate tool for the  
5 Commission?

6 Q. Yes.

7 A. That is the Commission's standard and  
8 inside of Koda the case itself requires a DFAX be  
9 produced by two RTOs.

10 Q. So you are not challenging the Koda test  
11 here today.

12 A. I think the -- I think the demonstration  
13 of deliverability could be maybe a bit more clear,  
14 but I am not challenging the precedent. That's not  
15 the purpose of my testimony.

16 MS. BOJKO: Thank you. May I have just a  
17 few moments?

18 EXAMINER HICKS: Sure. Go off the  
19 record.

20 (Discussion off the record.)

21 EXAMINER HICKS: Let's go ahead and go  
22 back on the record.

23 Just took a brief break and Ms. Bojko is  
24 continuing with her cross-examination and I will hand  
25 it back to her.

1 MS. BOJKO: Thank you.

2 Q. (By Ms. Bojko) Mr. Stewart, just a couple  
3 clarification questions. You referred to I think  
4 it's -- maybe we will just look at Staff Exhibit --  
5 or Blue Delta Exhibit 9 which is the Koda Energy  
6 Staff Report that recommended the creation or the  
7 application of the Koda test. Do you have that in  
8 front of you?

9 A. Yes, I do. Sorry.

10 Q. And in reference to some discussion we  
11 had, you made a point to state that MISO and PJM  
12 produced a DFAX study in that case; is that your  
13 understanding?

14 A. That is my understanding.

15 Q. Well, isn't it true that the only study  
16 that PJM and MISO produced in that case evaluated the  
17 impact on transmission lines located in Ohio?

18 A. MISO and PJM conducted a study on  
19 transmission lines in Ohio, yes.

20 Q. Okay. MISO, which is where Koda Energy  
21 was located; is that correct?

22 A. From my understanding, yes.

23 Q. MISO did not evaluate the lines from  
24 Minnesota, point A in your example, to Ohio line in  
25 point B, did they?

1           A.    I didn't see the exact DFAX report, so I  
2   can't speak to that issue.

3           Q.    Well, let's turn to page 6 of the Staff  
4   Report in front of you.  If you look at the third  
5   sentence down in the Staff Report, it states  
6   specifically what PJM and MISO evaluated.  Do you see  
7   that?

8           A.    PJM, MISO, "The following guidelines and  
9   assumptions were employed by PJM and MISO in their  
10   studies.  PJM and MISO used a 50/50 peak load  
11   forecast for 2014.  They did not evaluate the impact  
12   on every transmission line located in Ohio."

13          Q.    Correct.  Keep going.  The next sentence,  
14   it says what PJM evaluated.  "PJM evaluated the  
15   impact on ten transmission lines located in Ohio and  
16   MISO evaluated the impact on sixty-seven transmission  
17   lines located in Ohio," correct?

18          A.    Yes.

19          Q.    So when you referred to the PJM and MISO  
20   evaluating lines, MISO and PJM for Koda Energy  
21   evaluated 77 transmission lines all located in Ohio.

22          A.    I think that math adds up.

23          Q.    And that's because MISO -- part of the  
24   utilities in Ohio were located in MISO and part of  
25   the utilities were located in PJM, correct?

1           A.     That's what I believe was the scenario.

2           Q.     So if all the utilities were located in  
3     PJM, then PJM could model the transmission lines and  
4     the impact of those located in Ohio, correct?

5           A.     No.    So we -- I think Mr. Chiles did an  
6     excellent job yesterday walking through how a DFAX  
7     study generally functions in that there is injection  
8     points and then there are monitored elements, and so  
9     MISO was monitoring -- they were assuming injections  
10    at one point on their system, and then they were  
11    modeling specific elements of the transmission system  
12    inside of Ohio and here that was 67 lines.

13          Q.     Okay.   For the Applicants do you know how  
14    many transmission lines PJM evaluated?

15          A.     There's -- there are very long  
16    appendices.   I believe -- is it 57 page -- 57 pages  
17    of different -- of different facilities that were  
18    monitored inside of PJM's assessment after they  
19    assumed deliverability into the PJM region.

20          Q.     So it's safe to say they modeled more  
21    than 77 -- or more than 67 transmission lines?

22          A.     The number of transmission facilities  
23    being monitored is -- isn't as significant as  
24    assessing the impact on those facilities.

25          Q.     But I -- it's fair to say that the Staff



1 Report does not include or reference any modeling of  
2 transmission lines out of the State of Ohio; is that  
3 correct?

4 A. I'm just reading -- because of your  
5 question, I just want to refamiliarize myself with  
6 the language around this sentence so one second,  
7 counsel.

8 Can you ask your question again? I got a  
9 little lost after I read some and I tried to remember  
10 the question. Maybe it's easier to just...

11 Q. I was just asking if in the Staff  
12 Report -- reviewing page 6 in the Staff Report  
13 identified any transmission lines that MISO or PJM  
14 evaluated the impact on outside of Ohio.

15 A. No. If you go back to page 5, it says  
16 Staff requested that PJM and MISO conduct  
17 distribution factor or power flow studies to  
18 determine whether power flows from generating  
19 facilities modeled within PJM and within MISO but  
20 located outside of Ohio and outside of states  
21 contiguous to Ohio have an impact on power flows over  
22 transmission lines located within the State of Ohio.  
23 So while the generation was modeled outside of Ohio,  
24 they are specifically monitoring transmission lines  
25 located within the State of Ohio.

1 MS. BOJKO: Okay. Great. Thank you.

2 I have no further questions, your Honor.

3 EXAMINER HICKS: Thank you, Ms. Bojko.

4 Okay. I believe based on our order --  
5 order that was proposed, we would go to 3Degrees  
6 next, although I believe your co-counsel may have  
7 indicated no questions?

8 MR. MILLER: I have been instructed we  
9 have no questions, your Honor.

10 EXAMINER HICKS: Perfect. That's what I  
11 like to hear.

12 And next in line would be the Applicants.

13 MS. WHITFIELD: Yes, thank you, your  
14 Honor, and I just have a few questions given  
15 Mrs. Bojko's thorough examination.

16 MS. BOJKO: Sorry.

17 MS. WHITFIELD: That's all right.

18 - - -

19 CROSS-EXAMINATION

20 By Ms. Whitfield:

21 Q. Mr. Stewart, have you ever testified here  
22 in front of the PUCO before today?

23 A. Good afternoon, counsel. No, I have not.

24 Q. And on page 2, line 41, of your  
25 testimony, you state that you reviewed and are

1 generally familiar with the materials filed in this  
2 case, correct?

3 A. Yes.

4 Q. And so you've reviewed the six REN  
5 certification applications filed in this case by my  
6 clients?

7 A. The REN certifications, I've reviewed the  
8 web page, the -- there is kind of like that form  
9 cover letter, talks about the facility location, has  
10 pictures of the meters, I've reviewed those and the  
11 files associated with those.

12 Q. When you say web page, are you talking  
13 about --

14 A. The Public Utilities Commission of Ohio's  
15 docket -- docket search.

16 EXAMINER HICKS: DIS.

17 Q. (By Ms. Whitfield) Thank you. I wasn't  
18 sure which one you were talking about. So obviously  
19 you had no role in completing those six applications,  
20 correct?

21 A. No, I did not.

22 Q. And you never visited the six facilities  
23 that are at issue in those applications?

24 A. I have done some site tours but not to  
25 those.

1           Q.    Okay.  Did you review Avangrid's witness  
2   Pete Landoni's testimony?

3           A.    I did.

4           Q.    And what about did you review Staff  
5   witnesses' testimony in this case?

6           A.    I did review Staff's testimony in this  
7   case, yes.

8           Q.    Have you ever assisted any renewable  
9   facility in obtaining REN certification before the  
10  PUCO?

11          A.    I have not.

12          Q.    And I believe you acknowledged earlier  
13   with Ms. Bojko that there are three primary  
14   requirements under Ohio law for REN certification.  
15   Do you recall that?

16          A.    Yes, I do.

17          Q.    And one of those requirements is that the  
18   facility must be a renewable energy resource as  
19   defined by the statute?

20          A.    Yes.

21          Q.    And another one of those criteria under  
22   the law is that the facility must meet the applicable  
23   placed-in-service requirement?

24          A.    Yes.

25          Q.    And the final one is that the facility

1 must either have a facility in Ohio or produce energy  
2 which is deliverable into Ohio.

3 A. Yes.

4 Q. Okay. And just so I'm perfectly clear,  
5 because I thought there was a little bit of confusion  
6 at the beginning of your cross, you are not  
7 challenging or otherwise offering an opinion on  
8 whether the Applicants use a renewable energy  
9 resource such as wind energy at the six facilities,  
10 do you?

11 A. To my understanding, wind generation  
12 qualifies under the statute.

13 Q. Okay. So you are not challenging that.

14 A. I don't believe they are hiding coal.

15 Q. Thank you. And again, just to clarify,  
16 you are not challenging or otherwise offering an  
17 opinion on whether each of the Applicants' facilities  
18 were placed into service after January 1, 1998?

19 A. No, I am not.

20 Q. Thank you. Just a couple follow-up  
21 questions on the specific deliverability criteria.  
22 It is your understanding that Staff requests or  
23 requires power flow studies be provided from  
24 applicants that file certification applications with  
25 the PUCO, right?

1           A.    Yes.

2           Q.    Okay.  And that -- and you are aware that  
3   Staff has been doing that since the Koda case  
4   decision.

5           A.    My understanding is that that's what has  
6   been happening.

7           Q.    And the Koda decision was filed -- or the  
8   case was filed in 2009; the decision was issued in  
9   2011.  Does that sound right?

10          A.    It does.

11          Q.    Okay.  And so in question 19 on page 8 of  
12   your testimony where it's -- where you reference --  
13   where it's referenced that the Applicant proposed to  
14   evaluate deliverability of the resources, using the  
15   Koda test is not really the Applicants' proposal, is  
16   it?

17          A.    The Applicants chose to submit a DFAX  
18   study to attempt to demonstrate deliverability.

19          Q.    Okay.  And that is something that --  
20   Staff has been using and applying the Koda test since  
21   2011.

22          A.    My understanding is that Staff has been  
23   applying the Koda test since 2011.

24          Q.    Okay.  And that they have been using the  
25   DFAX study or accepting the DFAX study to determine

1 that deliverability issue, correct?

2 A. In the cases that I have reviewed, the  
3 DFAX study has been used.

4 Q. And I believe you actually acknowledged  
5 that, I know you are a lawyer, to Ms. Bojko that that  
6 has been the precedent here at the PUCO for at least  
7 over 10 years, right?

8 A. Yeah.

9 Q. And just to clarify, the precedent has  
10 been that Staff would request the DFAX studies from  
11 the Applicants seeking certification and then analyze  
12 those DFAX studies, correct?

13 A. I'm not -- I understand that a DFAX study  
14 is submitted. I don't know all of the process,  
15 whether Staff requested it, whether the Applicant  
16 offers it, whether there's a coordination with PJM  
17 from somebody else, but I know that one is provided  
18 as part of satisfying -- or attempting to satisfy  
19 Koda's requirements.

20 Q. And to your knowledge, did Staff analyze  
21 each of the facilities involved in this case, their  
22 DFAX studies and determine whether the facility  
23 satisfied the Commission's deliverability standard?

24 A. From what I understand, Staff -- Staff  
25 does state that they evaluated the DFAX studies.

1           Q.    Okay.  And Staff issued Staff Reports in  
2 each of those six cases, correct?

3           A.    Yes.

4           Q.    And you acknowledge that Staff concluded  
5 in each of those cases and each of the Staff Reports  
6 that Applicants' facilities satisfied the  
7 Commission's deliverability test, correct?

8           A.    That is my recollection of Staff's  
9 recommendations in the six applications in this case.  
10 I'm sorry.  I should say that's consistent with my  
11 recollection.

12          Q.    Thank you.  Mr. Stewart, I believe you --  
13 you attached to your testimony Attachment TS-1 which  
14 was the Applicants' responses to CSG's discovery  
15 served on June 27, 2022?

16          A.    Yes.

17          Q.    And you are aware, are you not, that  
18 Applicants have supplemented those responses on two  
19 occasions, correct?

20          A.    That was right here.  Yes, I am.

21          Q.    And which -- is that the --

22          A.    The second supplemental responses issued  
23 on September 15, 2022.

24          Q.    Okay.  So with respect -- if you could  
25 turn to page 8 of your testimony, question 17 and



1 your answer to 17, line 176.

2 A. I'm sorry. One second, counsel.

3 Q. It's page 8, lines 176 to 178. It's  
4 question 17.

5 A. Yes.

6 Q. Okay. So with you being aware of the  
7 supplemental discovery responses from the Applicants,  
8 this answer to question 17 is no longer accurate,  
9 correct?

10 MR. WHITT: Objection.

11 EXAMINER HICKS: Hold on.

12 THE WITNESS: I'm sorry.

13 MS. WHITFIELD: Do you want me to  
14 rephrase?

15 EXAMINER HICKS: Yes.

16 Q. (By Ms. Whitfield) So with respect -- in  
17 your answer in your direct testimony to question 17,  
18 you reference that the NERC E-Tags were requested in  
19 discovery but not -- you say no studies were  
20 provided. Do you see that?

21 A. Yes.

22 Q. But are you aware since you reviewed the  
23 supplemental discovery responses that the Applicants  
24 actually answered the question about the facilities'  
25 NERC E-Tags?

1           A.    I am just re-familiarizing myself with  
2   the supplemental response, counsel.  I'm just lost in  
3   the document.  I'm sorry, counsel.

4           Q.    I could help and kind of streamline.  If  
5   you look at Interrogatory 2 --

6           A.    Thank you.

7           Q.    -- which should be the first one.

8           A.    Yes.

9           Q.    2B and then our answer to 2B in the  
10  supplemental.

11          A.    Yes.

12          Q.    Do you see we actually gave a substantive  
13  answer to that interrogatory in our supplemental  
14  response, correct?

15          A.    Counsel, I wouldn't say that this is --  
16  this may be an answer, but it doesn't address the  
17  question as to whether or not NERC E-Tags exist for  
18  these facilities.

19          Q.    I am not sure how that's possible when it  
20  says "None of the facilities have NERC E-Tags" in our  
21  supplemental response.

22          A.    It says "NERC E-Tags associated with each  
23  facility constitutes competitively sensitive  
24  information."

25          Q.    Sorry.  You need to look at the

1 supplemental response.

2 A. Oh, I'm sorry.

3 Q. Turn to page 6.

4 A. Sorry.

5 Q. Sorry about that.

6 A. Okay. Yes.

7 Q. So the -- your answer to question 17 is  
8 no longer accurate, correct?

9 A. So the first half would still be  
10 accurate, the not to my knowledge, and the second  
11 half is that I guess you could strike that and say  
12 that -- and just reference the supplemental response.  
13 I think that's fair, and I am happy to submit a  
14 mod -- not a modified but an errata after the hearing  
15 closes, if you would like.

16 Q. I think this is sufficient on the record  
17 here.

18 A. Thank you, counsel.

19 MS. WHITFIELD: That's all I have for  
20 this witness now. Thank you.

21 THE WITNESS: Thank you.

22 EXAMINER HICKS: Thank you.

23 We will go next to if Staff has any  
24 cross-examination.

25 MS. BAIR: I have a few questions. Thank

1 you, your Honor.

2 EXAMINER HICKS: Go ahead.

3 - - -

4 CROSS-EXAMINATION

5 By Ms. Bair:

6 Q. Good afternoon, Mr. Stewart. My name is  
7 Jodi Bair, and I represent the Staff.

8 A. Good afternoon, counsel.

9 Q. I would like to direct you to question  
10 and answer 21 on page 9 and following over to page 10  
11 of your direct testimony.

12 A. Yes.

13 Q. And in particular I am looking at lines  
14 216 and 217.

15 A. Yes.

16 Q. Okay. Where did you -- I assume this is  
17 a quote. Where did this come from?

18 A. This direct quote I pulled from the cover  
19 letters of one of the DFAX studies that was attached  
20 to Mr. Chiles' testimony.

21 Q. Okay. Could we please pull one of those  
22 up right now. It's -- I just pulled up Attachment --  
23 Attachment A, Appendix A, and I have copies of it,  
24 but you have a bulk of stuff up there.

25 A. Certainly.

1 Q. Or I can give you that cover sheet.

2 EXAMINER HICKS: Can you give me a cover  
3 sheet?

4 MS. BAIR: Yeah. I didn't label it, but  
5 I checked it, and it is Attachment A, Appendix A.

6 A. To Mr. --

7 Q. Mr. Chiles' Joint Exhibit 1.

8 MS. BAIR: Do you guys want it?

9 MS. WHITFIELD: No.

10 MS. BAIR: Mark?

11 MR. WHITT: I have it. If you have a  
12 separate page. Thank you, Jodi.

13 Q. (By Ms. Bair) Have you found that in  
14 Mr. Chiles' testimony?

15 A. I haven't found it in Mr. Chiles'  
16 testimony.

17 Q. Okay.

18 A. Yes.

19 Q. Okay. And where -- from where -- I am  
20 assuming you are on page 1. Is that where your quote  
21 came from that you contained in line -- or included  
22 in 216 and 217?

23 A. Yes, it is.

24 Q. Okay. And could you please read the  
25 sentence in its entirety from which this quote came.

1           A.    Yes.  "Finally, it was confirmed that  
2   there were a number of EHV transmission facilities on  
3   it which at least 5 from the energy from these wind  
4   facilities would be expected to flow if they were to  
5   deliver their energy into PJM."

6           Q.    Thank you.  And you had some discussion  
7   in your testimony and with Ms. Bojko regarding the  
8   dispatch within -- dispatch of generation within PJM.

9           A.    Yes.

10          Q.    And so is it your testimony -- do Ohio's  
11   certification of facilities under Ohio's RPS have an  
12   impact on PJM's operational dispatch of generation?

13          A.    Directly, no.  That is not a  
14   consideration inside the scale model.

15                MS. BAIR:  Thank you.  I have nothing  
16   more.

17                EXAMINER HICKS:  Thank you, Ms. Bair.

18                I will just note Mr. Ryan is not here,  
19   but he had indicated he had no cross for the witness.

20                MS. BOJKO:  I'm sorry.  I didn't hear  
21   you.

22                EXAMINER HICKS:  Just for the record  
23   Mr. Ryan is not here, but he had indicated he had no  
24   cross-examination for the witness.

25                Mr. Whitt, do you want -- let's go off

1 the record.

2 (Discussion off the record.)

3 (Thereupon, at 12:44 p.m., a lunch recess  
4 was taken.)

5 - - -

1                   Tuesday Afternoon Session,  
2                   December 6, 2022.

3                   - - -

4                   EXAMINER HICKS:  Let's go back on the  
5                   record.

6                   We came back from lunch.  I was just  
7                   speaking with Mr. Whitt off the record.  I believe,  
8                   Mr. Whitt, you indicated you do not have any  
9                   redirect?

10                  MR. WHITT:  That's right, your Honor.

11                  EXAMINER HICKS:  Okay.  With that,  
12                  Mr. Stewart, thank you for your testimony.

13                  THE WITNESS:  Thank you, your Honor.

14                  EXAMINER HICKS:  We can now, if I can get  
15                  organized here, take up exhibits.

16                  MS. BOJKO:  Your Honors, I am only going  
17                  to move certain exhibits, if that helps.

18                  EXAMINER HICKS:  Okay.  Let's do --  
19                  Mr. Whitt, you may have already moved your testimony  
20                  but go ahead and do it again.

21                  MR. WHITT:  I am not sure if I did  
22                  yesterday.  If I didn't, we would move for the  
23                  admission of CSG Exhibit 3.  Is it 3?

24                  EXAMINER HICKS:  Any objections to the  
25                  admission of CSG Exhibit 3?



1 MS. BOJKO: I'm sorry, your Honor. Is  
2 that just the testimony?

3 EXAMINER HICKS: I believe so, yes.

4 MS. BOJKO: I lost my book.

5 MS. WHITFIELD: With respect to the  
6 Applicants, while she is looking for her book, we  
7 don't have any objection, subject to the correction  
8 he made on the stand with respect to question 18.

9 EXAMINER HICKS: Okay. I think -- I  
10 think the transcript should adequately address that.

11 MS. WHITFIELD: Yeah, so no objection.

12 EXAMINER HICKS: Hearing none other than  
13 that -- that note, CSG Exhibit 3 will be admitted  
14 into the record.

15 (EXHIBIT ADMITTED INTO EVIDENCE.)

16 EXAMINER HICKS: And then, Ms. Bojko, if  
17 you just want to go through each one you want to  
18 admit, we will just do them individually.

19 MS. BOJKO: Yes, your Honor. I'm sorry.  
20 My whole notebook has disappeared since I went to  
21 lunch. I did not take it to lunch with me.

22 EXAMINER HICKS: That does add a certain  
23 wrinkle to the case. Let's go off the record.

24 (Discussion off the record.)

25 EXAMINER HICKS: Let's go back on the

1 record.

2 Ms. Bojko was going to move certain  
3 exhibits that she had marked, move for their  
4 admission, so if you want to just run down the ones  
5 you would like to admit, we can do them one by one.

6 MS. BOJKO: Sure. At this time Blue  
7 Delta moves the admission of Blue Delta Exhibit 3,  
8 which was the PJM BPM 14A discussed and cited in the  
9 witness's testimony.

10 EXAMINER HICKS: Any objection to the  
11 admission of Blue Delta Exhibit 3?

12 MR. WHITT: That was -- no objection.

13 EXAMINER HICKS: Okay. Blue Delta  
14 Exhibit 3 will be admitted.

15 (EXHIBIT ADMITTED INTO EVIDENCE.)

16 MS. BOJKO: Your Honor, at this time I  
17 would like to move for the admission of Blue Delta  
18 Exhibit 4, which was the MISO BPM Manual 11.

19 EXAMINER HICKS: Any objection to the  
20 admission of Exhibit 4?

21 MR. WHITT: No objection.

22 EXAMINER HICKS: It will be admitted.

23 (EXHIBIT ADMITTED INTO EVIDENCE.)

24 MS. BOJKO: And, your Honor, Blue Delta  
25 would like to move the admission of Blue Delta

1 Exhibit 6, which is the PJM flowgate model.

2 EXAMINER HICKS: Dynamic Transfer, is  
3 that it?

4 MS. BOJKO: Market-to-market Flowgate  
5 Test, yes.

6 EXAMINER HICKS: Objections to the  
7 admission of Exhibit 6?

8 MR. WHITT: I'm sorry. No objection.

9 EXAMINER HICKS: Okay. Exhibit 6 is  
10 admitted.

11 (EXHIBIT ADMITTED INTO EVIDENCE.)

12 MS. BOJKO: I am not going to move the  
13 admission of orders, so the other one, the last one,  
14 would be Blue Delta Exhibit 9, which is the Koda  
15 Staff Report.

16 EXAMINER HICKS: Any objection to the  
17 admission of Exhibit 9?

18 MR. WHITT: No objection.

19 EXAMINER HICKS: Exhibit 9 is admitted  
20 into the record.

21 (EXHIBIT ADMITTED INTO EVIDENCE.)

22 MS. BOJKO: That's all, your Honor.

23 EXAMINER HICKS: Thank you.

24 So I believe that takes care of all the  
25 pending exhibits. Just to make clear on the record,

1 Mr. Whitt, I believe you had stated you were not  
2 intending to call Mr. Gopaul?

3 MR. WHITT: Correct, your Honor.

4 EXAMINER HICKS: Okay. I just bring that  
5 up so the motions to strike is essentially irrelevant  
6 at this point.

7 MS. BOJKO: Moot, yes.

8 EXAMINER HICKS: So no need for a ruling  
9 on that one.

10 MS. BOJKO: Thank you, your Honor.

11 EXAMINER HICKS: Anything further from  
12 CSG before we move to Staff?

13 MR. WHITT: No, your Honor.

14 EXAMINER HICKS: Okay. I am going to tag  
15 out to my co-AE, and she will take it from here.

16 EXAMINER ST. JOHN: All right. There are  
17 two matters that I want to briefly discuss before I  
18 turn things over to Staff. First of all, we had  
19 noted in an e-mail to all the parties before the  
20 hearing commenced that we are generally not inclined  
21 to invite friendly cross. In the witness order and  
22 cross-examination estimates that we had received via  
23 e-mail, we do see that there are about 5 minutes of  
24 cross estimated from the Applicants and 5 minutes  
25 estimated from 3Degrees for Staff. I did want to

1 just briefly inquire about what that cross would  
2 entail.

3 MS. WHITFIELD: Well, it's primarily how  
4 Staff received the DFAX studies and confirming like  
5 sort of a chain of custody through Staff's e-mails.  
6 We are not able to depose Staff. We are not able to  
7 subpoena Staff, so e-mails in which Staff appears,  
8 and I want to question them on that to establish  
9 since they have brought up a chain of custody with  
10 respect to these documents.

11 EXAMINER ST. JOHN: Okay. I have no  
12 problem with that line of questioning.

13 MS. WHITFIELD: Thank you.

14 EXAMINER ST. JOHN: 3Degrees.

15 MR. MILLER: I think we set a  
16 placeholder. We will probably waive.

17 EXAMINER ST. JOHN: You said you will  
18 probably waive cross?

19 MR. MILLER: Yes.

20 EXAMINER ST. JOHN: Okay.

21 EXAMINER HICKS: I think Mr. Whitt wanted  
22 to say something.

23 MR. WHITT: I think what I heard  
24 described was friendly cross to lay a foundation, to  
25 help Staff lay a foundation for something. Moreover

1 and more troubling is we will wait to see these  
 2 e-mails but if there are e-mails that are going to be  
 3 sought to be introduced that I can tell you that they  
 4 have not been produced to us in discovery and those  
 5 e-mails would be responsive to several different  
 6 discovery requests and I think if the Bench has made  
 7 anything clear prior to hearing, that parties would  
 8 not be permitted to introduce evidence at hearing  
 9 that had not been produced in discovery. So I just  
 10 want our position on that to be known before we  
 11 start.

12 EXAMINER ST. JOHN: Okay. We're not  
 13 quite at that point yet. As to your notes about  
 14 friendly cross, this issue of who has requested the  
 15 PJM reports -- excuse me, the PJM DFAX studies, that  
 16 has become a bigger issue in this case than I think  
 17 we -- I think most people initially expected walking  
 18 into this hearing, so I will allow some questions  
 19 from the Applicant along those lines. It's only  
 20 expected to be about 5 minutes per witness, so if it  
 21 starts becoming, you know, a greater breadth than  
 22 that, taking considerably longer, we can address your  
 23 concerns at that time.

24 The second issue that I wanted to address  
 25 is generally timing for today. So it looks like CSG

1 has estimated about 45 minutes per Staff witness. We  
2 are already just past 2:00 p.m., and I understand  
3 that Mr. Landoni has been reserved as a rebuttal  
4 witness. And I also understand based on  
5 conversations yesterday that he may have a flight  
6 leaving this afternoon or later this evening; is that  
7 correct?

8 MS. WHITFIELD: Yes.

9 MR. LANDONI: 5:47.

10 MS. WHITFIELD: Scheduled around  
11 6 o'clock.

12 EXAMINER ST. JOHN: So I am not sure at  
13 this point yet, but I wanted to make everyone aware  
14 of that, and perhaps we can move into Mr. Cross's  
15 testimony and see where we are, but it may be  
16 necessary to start talking about, you know,  
17 potentially moving witnesses around and having  
18 Mr. Landoni testify before Ms. Clingan, that's fine  
19 with us.

20 MR. WHITT: If I may, your Honor, what  
21 would -- what -- who would be rebutting whom? I get  
22 rebuttal. For what purpose? The Applicants have the  
23 burden of proof. They filed testimony. We filed  
24 testimony. Supplemental testimony was authorized for  
25 a different purpose, really to address any

1 outstanding discovery issues but that effectively was  
2 used by the other side as rebuttal testimony. It  
3 directly responds to CSG's testimony. So I'm not  
4 sure what there would be to rebut. We haven't used  
5 any new evidence. We've prefiled our testimony. We  
6 presented our witness. It just seems improper.

7 EXAMINER ST. JOHN: All right. Noted.

8 MS. WHITFIELD: Can I be heard on that?

9 EXAMINER ST. JOHN: Yes.

10 MS. WHITFIELD: So as your Honor, first  
11 of all, just acknowledged, this issue of chain of  
12 custody has become a much bigger issue in  
13 cross-examination of Mr. Landoni. We believed that  
14 we had established the foundation of his knowledge of  
15 how Avangrid requested -- received the requests from  
16 Staff for the DFAX studies, then sent a request to  
17 PJM to run the DFAX studies, and then once the  
18 Company received the DFAX studies, they then  
19 transferred them to Staff.

20 Hearing your Honors yesterday in response  
21 to Mr. Whitt's objection that we did not lay the  
22 foundation because Mr. Landoni couldn't remember some  
23 names of the people that worked for his company who  
24 were involved in this, we are preparing rebuttal  
25 testimony from Mr. Landoni to address those issues



1 that were raised that we thought were handled  
2 appropriately in our direct examination; but because  
3 the chain of custody has become such an issue in this  
4 case, even though it has nothing to do whatsoever  
5 with the authentication of the documents, we are  
6 addressing that on rebuttal.

7 MR. WHITT: Well, if I may.

8 EXAMINER ST. JOHN: Mr. Whitt, I don't  
9 want to interrupt. Would you mind turning your  
10 microphone on or speaking into your microphone a bit  
11 more?

12 MR. WHITT: Sure. Thank you, your Honor.  
13 We would anticipate any foundational issues are  
14 likely -- very likely to be cleared up in the  
15 cross-examination of Staff, presumably can say that,  
16 you know, these are the reports and here is how we  
17 got them and that would resolve those issues.

18 In fact, I think the other side has  
19 indicated that's exactly what they want to use their  
20 cross for is to ask those questions. So to the  
21 extent we can have the questions over, you know,  
22 chain of custody, authentication gets resolved with  
23 Staff, there would be no need to call back  
24 Mr. Landoni.

25 EXAMINER ST. JOHN: So would you be

1 willing to withdraw your objections to the admission  
2 of those exhibits after Staff's witnesses testify?

3 MR. WHITT: We -- I expect to be able to.

4 EXAMINER ST. JOHN: Okay.

5 EXAMINER HICKS: If that's the case, then  
6 this whole issue is going to resolve itself.

7 MR. WHITT: Yes. That would be our  
8 expectation.

9 EXAMINER HICKS: That would be lovely.

10 MS. WHITFIELD: Yes. That would be  
11 great. Perhaps we address this after my cross of the  
12 witness.

13 EXAMINER HICKS: We have all geared up  
14 for nothing.

15 EXAMINER ST. JOHN: Yeah. Thank you all.

16 All right. With that I will go ahead and  
17 turn it over to Staff.

18 MR. LINDGREN: Thank you, your Honor.

19 The Staff calls Kristin Clingan to the stand.

20 (Witness sworn.)

21 EXAMINER ST. JOHN: Thank you. Please  
22 proceed.

23 MR. WHITT: Good afternoon, Ms. Clingan.

24 MS. BAIR: Wait a minute.

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KRISTIN CLINGAN

being first duly sworn, as prescribed by law, was  
examined and testified as follows:

DIRECT EXAMINATION

By Mr. Lindgren:

Q. Good afternoon, Ms. Clingan. Could you  
please state your name and business address for the  
record.

A. Kristin Clingan, 180 East Broad Street,  
Columbus Ohio 43215.

Q. Thank you. And where are you employed?

A. The Public Utilities Commission of Ohio.

Q. Thank you. Did you prefile testimony in  
this proceeding?

A. I did.

Q. Thank you.

MR. LINDGREN: Your Honor, may I approach  
the witness?

EXAMINER ST. JOHN: You may.

MR. LINDGREN: Let the record reflect I  
am handing the witness what has been marked as Staff  
Exhibit 2.

(EXHIBIT MARKED FOR IDENTIFICATION.)

Q. (By Mr. Lindgren) Ms. Clingan, is this  
your prefiled testimony?

1 A. Yes.

2 Q. And this was prepared by you or at your  
3 direction?

4 A. Yes.

5 Q. Thank you. And do you have any changes  
6 you would like to make to this testimony?

7 A. Yes.

8 Q. Could you explain what those are.

9 A. I would like to add the three PJM DFAX  
10 studies relied upon by Staff in the review of these  
11 applications to my prefiled testimony at this time.

12 Q. Thank you. And could you explain why you  
13 had not included those studies previously?

14 A. I did not include them initially because  
15 they were already filed as part of the Applicants'  
16 testimony, but they are referenced in my testimony  
17 and relied upon for the Staff Reports that I am  
18 sponsoring today.

19 Q. Thank you. Do you have on the stand  
20 there the testimony of John Chiles?

21 A. Probably.

22 Q. Joint Exhibit 1.

23 EXAMINER HICKS: Probably the biggest one  
24 up there.

25 A. Yes, sir.

1           Q.    Thank you.  Could you turn to Joint  
2   Exhibit 1, Attachment A.

3                   MS. BOJKO:  Your Honor, can we go off the  
4   record for a second?

5                   EXAMINER ST. JOHN:  Yes.  Let's go off  
6   the record.

7                   (Recess taken.)

8                   EXAMINER ST. JOHN:  Let's go back on the  
9   record.

10                   We've been off the record for quite some  
11   time.  An issue arose while Ms. Clingan was on the  
12   stand.  It involved reference to a previously marked  
13   and moved exhibit that DFAX studies have been  
14   attached to, and it became -- it was revealed there  
15   was an error in the attachment to that exhibit due to  
16   a copying error and not all of the Excel  
17   spreadsheets' detailed information for each of the  
18   three DFAX reports had been included in the exhibit.  
19   Instead, one of the Excel spreadsheet documents had  
20   been duplicated.

21                   There have been numerous discussions  
22   about how to resolve the issue and how to proceed  
23   moving forward.  Also in the interim Staff printed  
24   off copies of the DFAX reports that it had received  
25   and relied upon in its analysis of the cases.

1           At this point in time I think it's  
2     important to note that our priority here today is to  
3     create a full record. There were additional  
4     discussions off the record about how to rectify the  
5     pending issue with three pending exhibits that have  
6     been marked and moved that include incorrect DFAX  
7     information.

8           Carbon Solutions had proposed their  
9     preference of how to resolve the issue, and  
10    Applicants and Blue Delta had proposed their proposal  
11    of how to resolve the issue.

12           At this point in time this is how we  
13    would like to move forward with that particular  
14    issue, it is up to the Applicants and Blue Delta  
15    whether or not they would like to recall their  
16    witnesses to bring them back up to the stand to  
17    resolve the exhibit issues or any other -- strike  
18    that, or any specific issues regarding the DFAX  
19    reports.

20           My understanding is that the Applicants  
21    and Blue Delta had issued a proposal to remove the  
22    Excel spreadsheet document that had been duplicated  
23    from the exhibits that have been marked and moved but  
24    not yet admitted. The Applicants and Blue Delta may  
25    proceed in that way if they would like to, or as I

1 previously mentioned, they have -- they will have the  
2 opportunity to recall those witnesses to include the  
3 correct data, if they would like.

4 Carbon Solutions had noted that if the  
5 correct data would be added to the exhibits, Carbon  
6 Solutions' preference would be for the data that had  
7 already been submitted that was duplicated and, thus,  
8 incorrect, or at least incomplete, would stay a part  
9 of the record.

10 Our ruling is that if the witnesses are  
11 recalled and the correct information is presented and  
12 moved to be admitted, that the existing Excel  
13 spreadsheet documents will be made a part of the  
14 record as well so that Carbon Solutions may refer to  
15 the documents as they were initially marked and moved  
16 as well as the corrected information.

17 A second issue was also presented while  
18 we talked off the record involving e-mails that were  
19 received by Staff and I believe included the DFAX  
20 studies.

21 While Judge Hicks and I were out of the  
22 hearing room and we were on break, my question at  
23 this time is have the parties resolved that pending  
24 dispute about the e-mails? And when I say the  
25 pending dispute, I don't mean the dispute regarding

1 whether the e-mails should have been produced in  
2 discovery. What I am asking is how to handle the  
3 e-mails here in this hearing room today.

4 MS. WHITFIELD: Your Honor, I -- I think  
5 you were in the room, but I did give them to  
6 Mr. Whitt so he and his colleague could review them,  
7 and I haven't heard anything further from that.

8 MR. WHITT: That's correct. We have the  
9 e-mails and appear to be the DFAX attachments. We  
10 will be reviewing those tonight.

11 EXAMINER ST. JOHN: Okay. I appreciate  
12 that. Thank you.

13 At this point in time it's 4:51 p.m., and  
14 I don't see us getting through any additional  
15 witnesses this evening which means that we will be  
16 needing to move on to an additional hearing day.  
17 Initially Judge Hicks and myself had reserved all  
18 week for this hearing, but while we were off the  
19 record, one or two parties had mentioned that  
20 tomorrow would be an inconvenient time to resume the  
21 hearing.

22 So with that being said, I would like to  
23 go off the record briefly and discuss with the  
24 parties when would be a convenient time for all to  
25 resume the hearing.



1                   So with that, let's go off the record  
2 briefly.

3                   (Discussion off the record.)

4                   EXAMINER HICKS: Let's go back on the  
5 record. We just went off the record briefly to  
6 discuss timing on when we could reconvene the  
7 hearing. I think as Attorney Examiner St. John  
8 mentioned, there were some timing issues for folks  
9 tomorrow. I believe we reached a consensus that we  
10 will reconvene on Thursday morning, which would be  
11 December 8, at 10:00 a.m. and proceed from there.

12                  And with that, we are off the record.

13                  (Thereupon, at 5:02 p.m., the hearing was  
14 adjourned.)

15                                 - - -

CERTIFICATE

I do hereby certify that the foregoing is  
a true and correct transcript of the proceedings  
taken by me in this matter on Tuesday, December 6,  
2022, and carefully compared with my original  
stenographic notes.

\_\_\_\_\_  
Karen Sue Gibson, Registered  
Merit Reporter.

(KSG-7382)

- - -

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**Case No(s). 21-0516-EL-REN, 21-0517-EL-REN, 21-0531-EL-REN, 21-0532-EL-REN, 21-0544-EL-REN, 22-0380-EL-REN**

Summary: Transcript Volume 2 December 6th 2022 In the Matter of the Application of Moraine Wind, LLC, for Certification as an Eligible Ohio Renewable Energy Source Generating Facility. In the Matter of the Application of Rugby Wind, LLC, for Certification as an Eligible Ohio Renewable Energy Resource Generating Facility. In the Matter of the Application of Elm Creek II for Certification as an Eligible Ohio Renewable Energy Resource Generating Facility. In the Matter of the Application of Buffalo Ridge II for Certification as an Eligible Ohio Renewable Energy Resource Generation Facility. In the Matter of the Application of Barton Windpower 1 for Certification as an Eligible Ohio Renewable Energy Resource Generation Facility. In the Matter of the Application of Barton Windpower, LLC, for Certification as an Eligible Ohio Renewable Energy Resource Generation Facility. electronically filed by Mr. Ken Spencer on behalf of Armstrong & Okey, Inc. and Gibson, Karen Sue Mrs.