Docket E-7 Sub 1156
Docket E-2 Sub 1159

ACCION GROUP

DUKE ENERGY CAROLINAS, LLC

FINAL REPORT OF THE INDEPENDENT ADMINISTRATOR

RE:

REQUEST FOR PROPOSALS FOR THE COMPETITIVE PROCUREMENT OF RENEWABLE ENERGY PROGRAM TRANCHE 3

April 13, 2023

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I. EXECUTIVE SUMMARY

Accion Group, LLC ("Accion") serves as the Independent Administrator ("IA") of the Competitive Procurement of Renewable Energy ("CPRE") program for the North Carolina Utilities Commission ("Commission" or "NCUC") as applied to Duke Energy Carolinas, LLC ("DEC") and Duke Energy Progress, LLC ("DEP" and together with DEC, "Duke"). [1] This is the Independent Administrator's final report concerning Tranche 3 of the CPRE program. This report provides an overview of Tranche 3 with a detailed explanation of the process and procedures that were employed.

This report also summarizes the three tranches of the CPRE program. The CPRE program was unique in that responsibility for conducting all aspects of the solicitations, including due diligence on the viability of projects, financial sufficiency of bidders, and the ability of each Proposal to achieve the required in-service date while not exceeding the Avoided Cost cap. Stated differently, full responsibility for each of the three tranches was outsourced, with the IA identifying which bids should be awarded a Purchase Power Agreement ("PPA").

Accion began the assignment with the first solicitation ("Tranche 1") in January 2018 and completed the contracting in July 2019. The second solicitation ("Tranche 2") process was launched following the Tranche 1 Final Report in July 2019 and was completed in October of 2020. The third and final Tranche ("Tranche 3") was launched in September of 2021. The IA participated in all aspects of the solicitation, starting with working with Stakeholders and Duke in preparing the draft and final Request for Proposal ("RFP") and the PPA. [2] Accion served as the point of contact for each Market Participant ("MP"), as direct contact with Duke was prohibited. Figure 1 presents a summary of the Tranche 3 results.

Figure 1

TRANCHE 3 RESULTS	
MW Procured	154.99
Nominal Savings over 20 years	$9,735,883
Average price/MWh	$38.71

[1] Tranches 1 and 2 of the CPRE Program included both DEC and DEP. While Tranche 3 was originally envisioned to again encompass both DEC and DEP, following the NCUC's Order issued December 20, 2021, in Docket Nos. E-2, Sub 1159 and E-7, Sub 1156, Tranche 3 was limited in scope to DEC. Some details of the CPRE program in this report will reference DEP for this reason.

[2] Through the CPRE process and in this report the abbreviations PPA and RPPA are used synonymously. The contract executed between Duke and an MP is entitled "Renewable Power Purchase Agreement."

Figure 2 summarizes the conforming Proposals received by the IA.

Figure 2

Number of Proposals	Total MW of Proposals
8	520.79

This report addresses how Accion completed each task and the results of CPRE Tranche 3.

Tranche 3 applied the lessons learned from Tranches 1 and 2 and worked with Duke and the Public Staff to design Tranche 3 in an effort to meet the program goals.

Tranche 3 was less successful than desired and the full program goals were not achieved. The IA believes the failure was not due to the design of the program, the actions of Duke or any person or entity, including the Commission. Tranche 3 was conducted while the competitive solicitation process was in flux at the same time global supply chain challenges created significant cost and timing uncertainty, which affected the ability of developers to commit to firm pricing and in-service dates. North Carolina was not immune from the forces the IA encountered during the pendency of Tranche 3 and beyond in other jurisdictions.

The IA believes the CPRE Tranche 3 solicitation was conducted fairly. All MPs were given access to all information at the same time, the evaluation of Proposals was completed without bias toward or against any qualifying technology or participant, and the separation protocols that isolated Proposals from Duke Company personnel, including the Duke Evaluation Team, was strictly enforced. While the Duke Transmission and Distribution Evaluation Team ("T&D Team") and the Duke credit review personnel [3] received queue numbers by necessity as part of the Step 2 review, the T&D Team did not receive bid price data. The IA is unaware of any other instance where other Duke personnel had access to project-identifying information from Proposals prior to the completion of CPRE Step 2 and the release of data to the Duke Evaluation Team.

1. BACKGROUND

The CPRE program is designed to procure 2,660 MW (subject to adjustment as specified in the statute) [4] of new renewable resources over a 45-month period, provided those purchases are below Duke Energy's respective forecasted avoided cost calculated over a twenty-year term. Projects are to be obtained either through a PPA, or from resources to be owned by Duke. Tranche 3 sought 596 MW of qualifying renewable resources to complete the CPRE program. Duke and its affiliates are permitted to participate in the CPRE program with Proposals for projects to be constructed or acquired by Duke to serve the goals of the CPRE program.

[3] MPs were required to provide Proposal security if their Proposal was identified as eligible for Step 2 consideration. Each Proposal security, other than cash, was approved by specific Duke personnel and the IA.

[4] In Duke's September 1, 2020, CPRE Program Update, the Companies projected the CPRE target would be reduced from 2,660 MWs to a range of 820 – 1,420 MWs due to higher than projected Transition MWs. The Commission adjusted the CPRE procurement target by order on December 20, 2021.

The IA provided the web-based platform ("Website") for Proposals submitted to Tranche 3. The unregulated affiliate of Duke, Duke Energy Renewables ("DER"), was eligible to participate in the same manner as other MPs. DER did not submit a Proposal in Tranche 3. The Website's electronic Proposal Form, refined from Tranches 1 and 2, allowed for streamlined receipt of Proposals, allowing MPs to easily submit multiple Proposals of varying types, sizes, and configurations.

While MPs had the ability to provide some variances, other fields were submitted uniformly. Tranche 3 accepted all renewable energy resources as identified in G.S. 62-133.8(a)(8),[5] however the IA received Proposals for only photovoltaic (PV) generation. Similarly, while MPs had the option of interconnecting to the Duke system at a Distribution or Transmission level,[6] all Proposals were submitted for Transmission level service.

On July 29, 2022, the IA completed the selection process and final status notifications were sent to MPs for each Proposal. At that time, appropriate Duke Personnel were given access to the Proposal Books of the Finalist Proposals for review. Confidential Attachment 1 sets forth the identity of the winning Proposals.

As IA, Accion conducted Tranche 3 on a website custom made for the purpose. The IA designed and implemented the evaluation of CPRE Tranche 3 Proposals in order to determine those Proposals which offered the greatest value to the ratepayers and recommend those Proposals for contracting with Duke. The North Carolina Utilities Commission required the IA to perform the following tasks: [7]

i. Monitor compliance with CPRE Program requirements.

ii. Review and comment on draft CPRE Program filings, plans, and other documents.

iii. Facilitate and monitor permissible communications between the electric public utilities' Evaluation Team and other participants in the CPRE RFP solicitations.

iv. Develop and publish the CPRE Program methodology that shall ensure equitable review between an electric public utility's DEP/DEC Proposal(s) as addressed in subsection (f)(2)(iv) and Proposals offered by third-party market participants.

v. Receive and transmit Proposals.

vi. Independently evaluate the Proposals.

vii. Monitor post-Proposal negotiations between the electric public utilities' Evaluation Team(s) and participants who submitted winning Proposals.

viii. Evaluate the electric public utility's DEP/DEC Proposals.

[5] Renewable resources eligible to bid were "solar electric, solar thermal, wind, hydropower, geothermal, or ocean current or wave energy resource; a biomass resource, including agricultural waste, animal waste, wood waste, spent pulping liquors, combustible residues, combustible liquids, combustible gases, energy crops, or landfill methane; waste heat derived from a renewable energy resource and used to produce electricity or useful, measurable thermal energy at a retail electric customer's facility; or hydrogen derived from a renewable energy resource." See,: RFP at 1.

[6] Projects designed to be 20 MW or smaller could interconnect at distribution level.

[7] NCUC Docket No. E-100, Sub 150; Rule R8-71(d)(5).

ix. Provide an independent certification to the Commission in the CPRE Compliance Report that all electric public utility and third-party Proposals were evaluated under the published CPRE Program methodology and that all Proposals were treated equitably through the CPRE RFP Solicitation(s).

2. LESSONS LEARNED FROM TRANCHES 1 AND 2

Tranches 1 and 2 provided MPs with a thorough understanding of the program, the evaluation process and their responsibilities. Many of the same stakeholders from earlier Tranches participated in Tranche 3, confirming that marketers were prepared to participate, without a steep learning curve.

As with prior Tranches, there was a robust stakeholder process that included the bidder conference, the opportunity to assist in crafting the RFP documents through the online comment feature, and the Website Q&A feature, as well as a confidential message board where MPs could pose project-specific questions to receive feedback and guidance.

In both Tranche 1 and Tranche 2, there was considerable uncertainty as to when a project could interconnect and deliver to Duke. Even after the Step 2 system impact determinations were made, and the IA imputed those costs to determine the ranking of Proposals that were at or below Avoided Cost, the actual in-service date for projects remained in doubt. Accordingly, MPs were challenged to predict cash flow from Projects with a reliable level of confidence. Financing is dependent on cash flow.

At the same time, in order for Duke to complete the transition in an improved transmission access process, it was desirable to complete contracting for Tranche 3 at the earliest date, while recognizing the need of MPs to have firm expectations on cost and interconnection. To meet this need, the IA, Duke and Public Staff devised a process to be used after the IA completed the Step 1 and Step 2 process, in which the Proposals that were determined to be at or below Avoided Cost were identified to Duke. At that point, Duke and MPs could proceed to contracting, with the understanding that upon the completion of the facilities study reports, the IA was to determine whether a bid remained at or below Avoided Cost. If not, the MP had the option of paying the amount necessary for the bid to be no higher than Avoided Cost. This provision was unique to the Tranche 3 PPA (the Buyer's Limited Termination Right provision (PPA Section 20.1.2)) rather than having the PPA terminated due to being in default of the Avoided Cost threshold.

The Limited Termination Right was devised in order to complete Tranche 3 by permitting the facilities studies to be completed after contracting, while preserving the requirement that successful Proposals be at or below avoided cost. When the Section 20.1.2 was developed, it was anticipated that the facilities studies would be completed by December 2022. The Initial Tranche 3 Resource Solicitation Cluster Phase 1 interconnection studies were completed in July 2022 and the final Phase 2 system impact results were completed on January 27, 2023. Based on these system impact study results, the Tranche 3 Proposals remain below the Avoided Cost threshold. In February 2023 Accion was informed by Duke that the final facilities study reports will not be completed for some additional months [8], so the IA is unable to determine at this time whether the Buyer's Limited Termination Right provision will ultimately be

[8] DEC advised the IA in February 2023 that facilities study reports will be issued for Tranche 3 winners no later than July 15, 2023, which is 150 calendar days from facilities study agreement execution.

triggered or whether any of the projects under contract will move into service. Duke determined that the final determination of whether the successful Proposals remain at or below Avoided Cost be completed by Duke, without further calculation by the IA. Assuming this is acceptable to the Commission, it is the IA's understanding that Duke will report to the Commission if the Buyer's Limited Termination Right provision of the PPA is triggered for any Tranche 3 PPAs.

II. WEBSITE

Accion provided the RFP Website for CPRE Tranche 3 to operate as a secure platform for the solicitation process including bidding, evaluation, and contracting. The Website captured Proposals and all exchanges with MPs and preserved the data for review by the NCUC. All activity on the Website was time and date stamped to ensure a complete history of the Tranche 3 solicitation was captured.

The main features of the Website, including the Schedule, Question and Answer feature, Announcements, Documents, Message Board, and Proposal form tool, were also utilized in Tranches 1 and 2 and were familiar to those users who participated in those solicitations. Each user was also provided a tutorial for use of the Website, both upon registration and available throughout the solicitation on the IA Website.

III. OVERVIEW OF TRANCHE 3 CPRE PROPOSAL PROCESS

While the earlier Tranches of CPRE included Proposals for DEP and Asset Acquisition, Tranche 3 was limited in scope to DEC. The Duke Energy CPRE Tranche 3 RFP solicitation Website was released on September 9, 2021. The IA notified approximately 5,000 individuals of the release, including all participants in Tranches 1 and 2.

General information regarding the solicitation was made public upon the release of the Website. Certain features were made available to non-registrants, including the solicitation schedule, any announcements made thus far, public documents, and website tutorials in both written and video formats. All other public information was available to registered users on the Website; this included the Q&A forum and the Messages forum. For registered Market Participants, access was granted to the Proposal Management page following the release of the Proposal form.

The Website performed as the medium for all CPRE related activities. The Website automatically saved all user activity tagged with the user information and a time and date stamp. All participants, including members of its evaluation teams, used the Website for all CPRE activities, thereby ensuring a complete record of the solicitation process.

Beginning on September 21, 2021, registered users to the Website were given several opportunities to comment on the draft PPA and RFP documents. All registered users had access to these documents. Registered users were invited to provide comments on a special "Comments" page. Interested persons, and especially MPs, were invited to review the draft documents and propose suggestions that would enable robust Proposals. In effect, interested parties were invited to help draft the RFP documents. The Comments page separated each RFP document into individual sections with the

opportunity to provide explicit changes by "red-line" revisions, accompanied by a brief explanation of the intended result. For Tranche 3, redline revisions were made to the Tranche 2 documents. On January 5, 2022, the Proposal form was released on the Website. Final Proposals were due on February 3, 2022.

When an MP created a Proposal, a corresponding folder was automatically generated within the MP's Proposal Book with five subfolders: Proposal Support Documents, Other Eligibility Documentation, Proposal History, Cure Documents, and Post Bid Document. Proposal Support Documents and Other Eligibility Documentation subfolders served as organized destinations for files uploaded from the Proposal form. Proposal History recorded all activities related to a Proposal, including document uploads, messages submitted on the Message Board, and Proposal Submissions. The Cure Documents folder provided a medium for an MP and the IA to share documents during the cure period. The Post Bid Document folder was utilized in the event a Proposal was selected as a winner.

Throughout the process, the IA monitored the Website daily to ensure its functionality, to monitor and respond to all general and project specific questions, and to provide all necessary information to registered users. The IA achieved this by updating the schedule when appropriate, posting announcements, updating the FAQ's page, and responding to posts on the Q&A page and the Message Board in a timely manner.

IV. PRE-PROPOSAL SUBMISSION ACTIVITIES

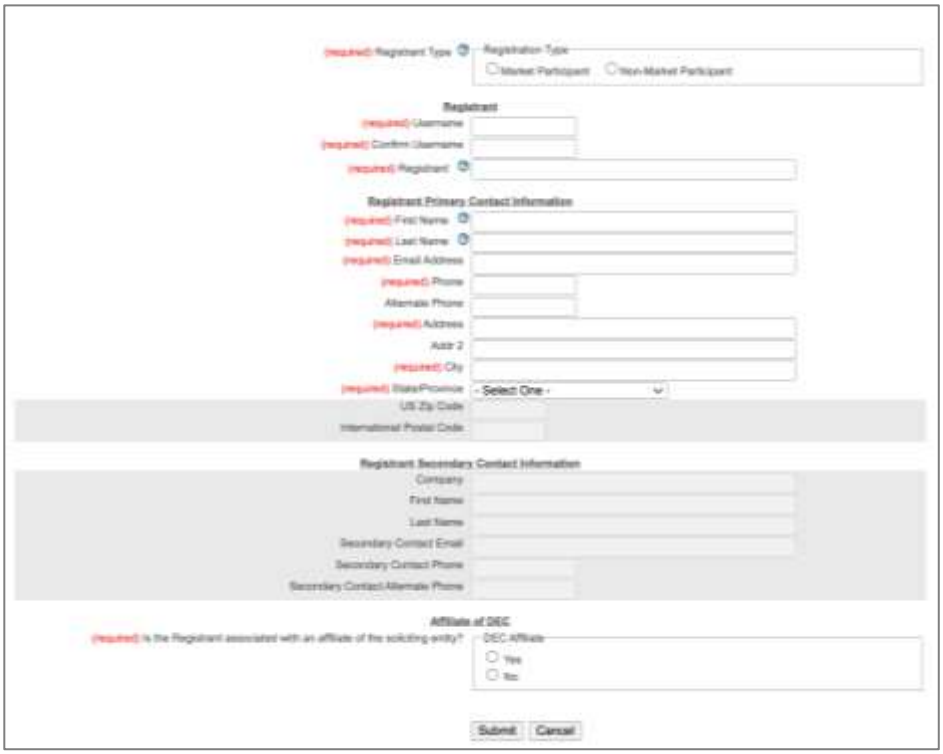
1. WEBSITE LAUNCH & REGISTRATION

On September 9, 2021, Accion Group opened registration on the CPRE Tranche 3 Solicitation Website. Registration on the Website remained open throughout the Tranche 3 CPRE process.

Registration was made straightforward and secure. The Registration page was accessed via the homepage of the Website through a tab on the menu bar titled "Register." Upon clicking the tab, users were introduced to the Terms and Conditions put forth by the IA, which they were then required to read and agree with to proceed. Users were then directed to a security page where the Website utilized *reCAPTCHA* technology to authenticate registrants.

Users were then transferred to the Registration Page, pictured in Figure 3. Registration was a crucial first step in the online solicitation for documentation purposes. Once registered, all user activity on the Website was automatically saved with an individual's identifying data. This provided a complete history of all CPRE related activities which could be tied to individual users.

Figure 3: Registration Page on the Website



As highlighted on the top of the Registration Page, users were required to Register as either an MP or a Non-Market Participant ("Non-MP"). Non-MPs had restricted use on the Website compared to MPs. This allowed Non-MPs to have necessary access to understand the progression and process of the CPRE program without participating as a Market Participant. Likewise, MPs had all necessary tools to fully participate in Tranche 3 on the Website. Figure 4 identifies Website access granted to Non-MPs and MPs.

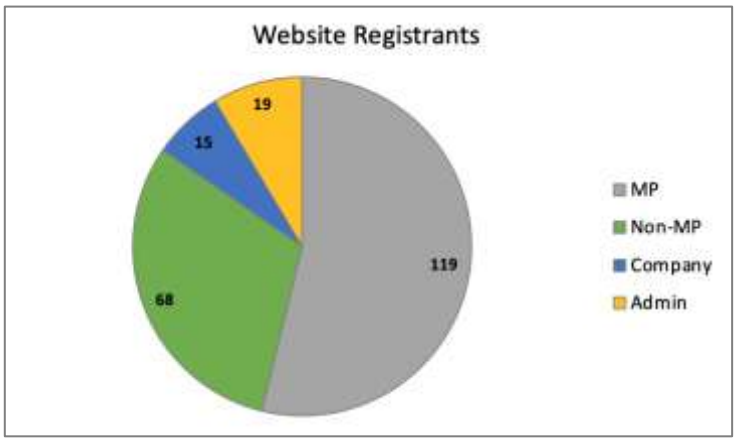
Figure 4: Access to the Website for Non-MPs and MPs. Check marks signify access.

	Non-MPs	MPs
Schedule	✓	✓
Announcements	✓	✓
Documents	✓	✓
Viewership to Q&A	✓	✓
Q&A		✓
User Profile	✓	✓
Tutorial	✓	✓
FAQ	✓	✓
Proposal Management		✓

Figure 5: Registration by State/Territory

State/Territory	Number of Registrants
Alabama	6
California	14
Colorado	6
District Of Columbia	2
Florida	15
Georgia	18
Idaho	2
Illinois	6
Indiana	2
Kansas	2
Louisiana	1
Maryland	1
Massachusetts	11
Michigan	1
Mississippi	1
Missouri	5
New Hampshire	3
New Jersey	4
New York	5
North Carolina	67
Oklahoma	1
Oregon	1
Pennsylvania	1
Quebec CA	1
South Carolina	12
Tennessee	4
Texas	5
Vermont	1
Virginia	2
Wisconsin	1

Figure 6: Website Registrants



Registration was available throughout the Tranche 3 process. Figure 6 displays total registrations and the distribution of user types on the Website as of the Website closure on December 31, 2022. 119 MPs registered to the Website from 93 different companies. A list of states and territories represented on the Website is shown in Figure 5. [9]

[9] Table represents users registered as MPs, Non-MPs, or Company. Admin are omitted; therefore, table shows only 202 registrants.

The IA believes the dissemination of information about this RFP was extensive and elicited significant interest. Throughout the submission process, the Website received 221 registrants from thirty jurisdictions. These figures confirm that there was significant engagement from a wide range of companies.

2. IA GUIDANCE AND COMMUNICATION

A. Tutorial and Documents Pages

The IA maintained daily oversight of the Website and provided Website and CPRE guidance. Within the Tutorial page, registrants could access a seven-page written tutorial overviewing the Website navigation, its features, and how to properly complete a Proposal form, as well as a six-minute video walk-through highlighting the same. The IA also utilized the Documents page to post helpful information regarding the CPRE process, including the RFP and RPPA, and Grid Locational Guidance. Before the Proposal submission deadline on February 3, 2022, the IA uploaded more than 60 documents for use by MPs.

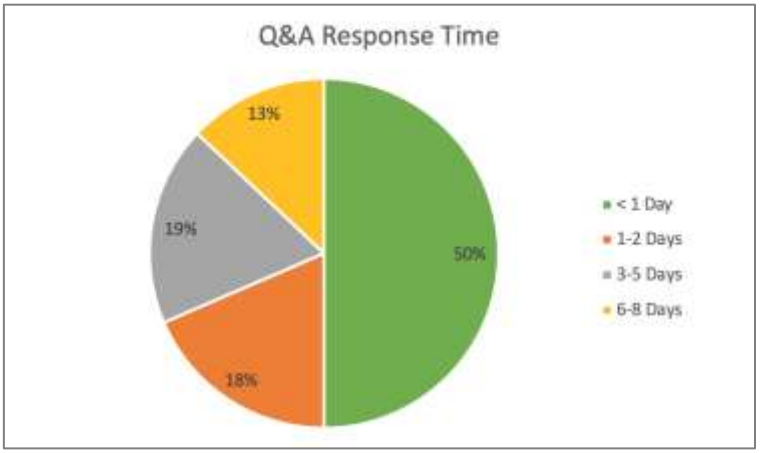
B. Q&A and Messages

For questions or concerns, MPs contacted the IA via the Q&A or Messages pages. The IA created these pages to ensure that reasonable and efficient communications could be completed and documented on the Website. On the infrequent occasions when the IA received phone calls or emails from MPs, the inquirer was immediately directed to continue the correspondence via the Website. When a substantiative inquiry was received outside of the Website, the IA responded via the confidential Message Board and included a copy of the inquiry. This provides the Commission with a complete record, even when MPs ignored the directive to communicate via the Website.

The Q&A page and the Message Board were created for distinct purposes. The Q&A page was opened upon the release of the Website on September 9, 2021, and closed at the end of the Submission period, on February 3, 2022. Questions on the Q&A page were non-project specific and could therefore be useful to many Tranche 3 participants. Questions were visible to all users after the IA submitted its response. For all other questions during this time, MPs were directed to the Message Board. The intended uses of the Q&A page and Message Board were explicitly stated in both the written and video tutorials, and were displayed on their respective pages. After February 3, 2022, the Q&A page was disabled and all communication between the IA and MPs occurred on the Message Board. All posts on the Q&A page remained visible to registered users for the entirety of the Tranche 3 process.

11 MPs asked a total of 54 questions via the Q&A page. One MP accounted for nearly half (43%) of the total number of questions asked. The average response time was 2 days. Figure 7 displays the response time to each question on the Q&A.

Figure 7



3. BIDDER WEBINARS/CONFERENCES

Duke and the IA jointly held several Stakeholder Sessions to inform interested parties about CPRE Tranche 3; these meetings were held between September and November of 2021. Due to the COVID-19 pandemic, all Stakeholder Sessions were held via Webinar. For each Webinar, registration was made available via the Website, and all registered users were notified with an announcement of the timing and registration process.

A. September 17, 2021, Stakeholder Session

The first of the Tranche 3 Stakeholder Sessions was held on September 17, 2021. Registration was available via the IA Website and registrants were sent call-in details on September 16, 2021. A recording of the meeting and the slides were posted on the IA Website following the webinar for those unable to attend live.

A total of 155 individuals from 65 unique and identifiable companies attended the meeting via Webinar. The following is a list of topics discussed during the stakeholder session:

- IA Introduction
- Tranche 3 – Transitional Cluster or DISIS
- CPRE Process
- Tranche 3 Timing
- Tranche 3 Size
- RFP Components

Participants were able to ask questions during the Webinar. Live answers were provided to some questions during the session, though participants were told that written responses would be provided and would supersede live answers. Thirty-two (32) questions were asked and received written responses posted to the IA Website on September 23 and 24, 2021.

B. September 24, 2021, Stakeholder Session

The second Stakeholder Session was held on September 24, 2021.

The following announcement was posted on the RFP Website on September 20, 2021, announcing the Webinar:

> *9/20/2021 05:22:54 PM*
>
> *Duke Energy and the IA will hold a **Second Stakeholder Webinar** on **Friday, September 24, 2021, at 9:00am EST**. The meeting will be conducted by **WEBINAR ONLY**. All interested potential Market Participants and other interested persons are urged to register for the Webinar through the IA Website by clicking the **Second Stakeholder Webinar** tab on the menu bar and submitting the form. The registration form will be made available on the morning of Tuesday, September 21, 2021. All persons registered for the Webinar will receive access information 24 hours before the event.*
>
> *Interested parties are urged to use the Website **Q&A** to ask questions and identify issues they would like addressed at the Webinar.*
>
> *(Ref.# 3)*

Ninety-one (91) individuals representing twenty-four (24) unique companies attended the Webinar. The presentation slides created for the Webinar were posted on the RFP Website prior to the Webinar, and a recording of the Stakeholder Session as well as additional information from the meeting were posted on the Website the same day for access by all website registrants.

During the Webinar Duke and the IA provided background of the solicitation and an overview of the RFP process.

The following topics were discussed:

- Tranche 3 Interconnection Alignment Feedback
- Critical Path Forward – Agreement among Parties
- CCEBA Resource Solicitation Cluster Proposal
- Timing Conflicts & Possible Alternatives
- Proposed Tranche 3 Schedule – Public Staff
- Transitional Cluster – Agreement on Path Forward?

Finally, the participants were encouraged to ask questions. The Webinar produced five questions, which were answered by Duke Personnel or the IA. The questions and written responses were posted on the Website on October 13, 2021. Participants were advised that the written responses should be used when preparing Proposals, as the oral response at the Webinar may have been incomplete.

C. October 14, 2021, Stakeholder Session

The October Stakeholder Session was held on October 14, 2021. A total of seventy-one (71) individuals from twenty-one (21) companies attended the Webinar. A copy of the meeting slides was posted on the IA Website prior to the stakeholder session, and a recording of the webinar was subsequently posted on the IA Website on October 15, 2021.

The following topics were discussed during the October Stakeholder Session:

- Tranche 3 Interconnection Alignment
- Duke Energy Resource Solicitation Cluster Framework, October 11, 2021, NCUC Order

- CCEBA Proposal
- September 24 Stakeholder Session

Both during the presentation and at the conclusion of the meeting, participants were encouraged to ask questions. A total of twenty-four (24) questions were asked during the meeting, with a follow-up question subsequently asked via the Website. These twenty-five (25) questions and their written responses were subsequently posted on the IA Website, and participants were advised that written responses should be used when preparing their Proposals.

D. November 4, 2021, Stakeholder Session

The November Stakeholder Session was held on November 4, 2021. A total of fifty-nine (59) individuals from nineteen (19) companies attended the Webinar. A copy of the meeting slides was posted on the IA Website prior to the stakeholder session, and a recording of the webinar was subsequently posted on the IA Website on November 5, 2021.

The following topics were discussed during the November Stakeholder Session:

- Tranche 3 and Transitional Cluster Study
- Duke Update RSC for Tranche 3
- RSC Framework and RFP
- Tranche 3 Bid Window
- Public Staff: Affected Systems and the RSC

Both during the presentation and at the conclusion of the meeting, participants engaged in discussion with Duke personnel and the IA. A total of thirteen (13) questions were asked during the meeting. These questions and their written responses were subsequently posted on the IA Website on November 16, and participants were advised that written responses should be used when preparing their Proposals.

V. PROPOSAL SUBMISSION REQUIREMENTS

1. FEES

Each MP in this RFP was required to pay a non-refundable "Proposal Fee" with each Proposal submitted based on the facility's nameplate capacity. For PPA Proposals, a minimum fee of five hundred dollars ($500) per MW with a maximum of ten thousand dollars ($10,000) was due at the time each Proposal was submitted.

Proposal Fees were automatically calculated as part of the online Proposal form using the nameplate capacity entered on each Proposal Form, and instructions for electronic payment were provided both on the Proposal Form, and additionally on the RFP Website documents page. Failure to submit the Proposal Fee would result in automatic disqualification of the Proposal from further consideration.

The IA received and reconciled all Proposal Fees with corresponding Proposals and confirmed that all fees were paid and received no later than 12:00 PM EDT (Noon) on the Proposal due date, as directed

by the RFP Documents. The total gross amount of Proposal Fees received was $80,000. In addition, the total received by Duke for success fees was estimated to be $270,000 as of the date of this report.

VI. PROPOSAL SUBMISSION STATISTICS

1. SUBMITTED PROPOSALS

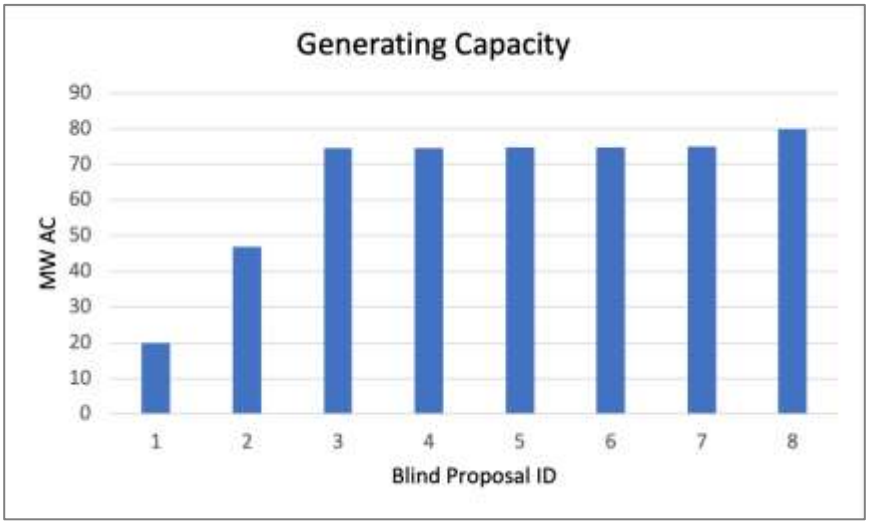
The electronic Proposal form on the Website performed as intended, that is, it simplified the bidding process to a single medium and allowed for a wide variance of Proposals as well as easy submission of similar, but not identical Proposals. Proposals were received through February 3, 2022.

Despite significant interest from the bidding community, as represented by registrants to the Website, a total of eight (8) Proposals were submitted by three (3) MPs. All Proposals were for solar photovoltaic generation. No Proposals were submitted with energy storage systems integrated. All Proposals sought interconnection at transmission level service.

2. GENERATING CAPACITY

The IA received Proposals totaling 520.79 MW AC of capacity, which was below the targeted 596 MW for CPRE Tranche 3, less capacity than was anticipated based on prior Tranches. The minimum Proposal size was 20 MW AC and the maximum was 80 MW. The average Proposal size was 65.10 MW.

Figure 8



3. SUBMISSION BY STATE

Pursuant to the CPRE requirements, all proposed facilities were required to be located in the respective DEC service territories in North Carolina or South Carolina. One (1) submitted Proposal was located in North Carolina, while the remaining seven (7) Proposals were located in South Carolina.

4. PRICE DECREMENT

All Proposals were required to be proposed at a price lower than the Avoided Cost Threshold prices included in the RFP. The price decrement ("Price Decrement," or "Decrement") is defined as the amount ($/MWh) below the Avoided Cost Threshold. The mean Price Decrement was $1.11/MWh.

VII. EVALUATION MODEL

1. OVERVIEW

Each Proposal was evaluated using the MP's pricing information, the facility's MW AC generating capacity, and the MP's hourly production profile over 20 years ("Load shape") information.

The IA created a custom evaluation model based on prior experience, industry standards, and the needs of the CPRE program ("Evaluation Model") which utilized the bid input parameters to calculate each Proposal's benefit ("Net Benefit") to the Company system over the twenty-year PPA term. See: Section V of the RFP.

In Step 1, the Proposals were ranked based on the Net Benefit calculation but excluded the T&D system upgrade costs. In the Step 2 process, the T&D system upgrade costs for projects were calculated in an iterative process starting with the most attractive Proposals and then imputed to the Proposal in the final ranking of Proposals.

2. REQUIRED INPUT DATA

1. Load shape 8760

For each Proposal, the MP was required to supply a 20-year 8760 Load shape that best represented the long-term output of the facility. The 8760 Load shape was subject to review by the Independent Administrator to ascertain that the data within the Load shape did not exceed the capability of the proposed facility.

A Proposal that included storage was required to submit a pre-storage Load shape as well as the post-storage Load shape. The pre-storage Load shape represented the facility generation with the storage capability turned off. The post-storage Load shape represented the individual MP's best effort to utilize the facility with its storage capability to maximize facility value (but remain within the practical limits of the energy storage capability). No Proposals were submitted with storage in Tranche 3, so no evaluation of Storage Facilities was completed.

A Proposal that did not include storage was required to submit the single 20-year 8760 Load shape which was used in the evaluation of the facility.

2. Facility Pricing

The CPRE program required that each Proposal was priced as a single decrement (i.e., below) the levelized 20-year Avoided Cost Threshold price cap identified in the RFP (see Section IV of the. RFP).

The Proposal form prevented the entry of pricing above Duke's Avoided Costs Threshold as stated in the RFP. The Website Proposal form presented the calculated prices for each pricing period so the MP could confirm the Proposal pricing was as desired.

There was a range of price decrements submitted; the mean price decrement for Proposals was 1.11 $/MWh. The RFP and the Website Proposal form clearly described and presented the pricing periods.

3. Other Required Inputs

In addition, evaluation of each facility included the following data:

a. Maximum AC Capability
b. Interconnection (Distribution or transmission) Voltage
c. Storage Capability (if applicable) in MW nominal output
d. Storage Capacity (if applicable) in Hours duration at the nominal output
e. Maximum Storage charging rate in MW (if applicable)

The maximum AC capability represented the maximum output from a project as submitted on each 8760. The interconnection voltage was included in the modeling to determine the energy that could flow from the facility.

VIII. EVALUATION

1. OVERVIEW OF EVALUATION PROCESS

The IA strictly followed the evaluation protocol set forth in the Tranche 3 RFP and in NCUC Rule R8-71(f)(3). Further, all appropriate evaluation process information was communicated to MPs in a timely manner. The Announcements, Messages, and Schedule pages were monitored daily to reflect the current Tranche 3 plan, or to remind MPs of an upcoming evaluation deadline.

The major components of the evaluation process are described in depth below. The process was designed to evaluate each Proposal individually while maximizing efficiency and fairness. The IA believes this process succeeded in this goal.

2. EVALUATION TEAMS

The IA created five subject matter evaluation teams: Modeling ("Modeling"), Financial ("Financial"), Legal ("Legal"), Transmission & Distribution ("T&D"), and Engineering/Project Sufficiency ("PST"). Each team contained subject matter experts and focused their work on their respective portions of the Proposal evaluation. The Modeling Team designed and created the Evaluation Model and worked to determine the "Price Score" defined on the Scoring Sheet. The Financial Team determined the "Credit Worthiness" for each Proposal by evaluating the MP's financial assurances and credit requirements. The Legal Team focused on three areas: determining that the MP could complete permitting to meet COD, determining that the Proposal had project site control for full term, and determining that the Proposal had site control to the POI for full term. The PST determined scores for four categories: experience of the project team, equipment to be used, required control equipment, and quality of project design. Finally, the T&D Team worked to assist the Modeling Team in determining the Price Score of each Proposal by conducting the T&D analysis of system upgrade costs as described below in Section X.

3. SCORING SHEETS

In accordance with the Appendix F of the RFP, the Scoring Sheet was used when reviewing each Proposal. The Scoring Sheets allocated weighted scores to each evaluation category, and category scores

were summed to reach a Proposal's overall evaluation score. This method confirmed that each Proposal was evaluated using the same criteria. An example of a Scoring Sheet is attached as Appendix A.

4. CURE PROCESS

After Proposals were submitted, it was necessary to correct any inaccuracies made by MPs, and to gather any further materials requested by the IA's evaluation teams to clarify or confirm the MPs intent. This process ("Cure Process") began immediately following the end of the Proposal submission period. All communication during this process was held between the IA and individual MPs via the Message Board and the Proposal's Cure Documents folder. A cure was defined as any alteration or clarification to a Proposal, including the need for additional documents or explanations not explicitly requested on the Proposal form. The Cure Process confirmed the data inputted on the Proposal Forms for each of the conforming Proposals to be correct and ready for evaluation.

The Cure Process was conducted in several phases. The Bid Confirmation Memo ("Confirmation Memo") was sent to MPs on February 3, 2022, the day Proposals were received, and contained the most critical information for each Proposal entered by the MPs. This Memo acted as a screening tool for MPs to double-check the information they entered prior to the evaluation process. The MPs had two (2) business days to confirm the information therein. An example Confirmation Memo can be seen in Appendix B. In response to the Confirmation Memo, the MPs of 4 Proposals identified inaccuracies in or additions to information in their original submission. The Confirmation Memo worked as desired in that it quickly identified any errors to major characteristics of Proposals prior to the evaluation process.

After the Confirmation Memo, each subject matter evaluation team participated in the Cure Process by performing an overview analysis of the data submitted pertaining to their expertise. All questions, clarifications, or errors were noted for each Proposal, then centralized to a memo ("First Cure Process Memo") that was sent to the MP of each Proposal on March 18, 2022. The Cure Process Memos were sent to all 8 Proposals and highlighted the need for 112 total cures. Outside of the Memos, all other cures were communicated directly on the Message Board.

MPs were required to provide additional information for each cure, which included either clarification, further documentation, or a change to information submitted using the online bid form. For each of these changes, information was solicited directly from the MP, including instances where the MP made changes to individual fields of their online Proposal and then re-submitted this information to the IA.

During the initial review of Proposal information, one Proposal was found to have a submission in conflict with its existing Interconnection Agreement, whereby the former was submitted with no storage while the latter included storage. Duke and the IA used the confidential message board to offer the MP an opportunity to either amend their Proposal or amend their Interconnection Agreement. The MP indicated an interest in amending their Interconnection Agreement, however later requested to change their Proposal submission. The IA made this change on the Website to include battery storage in the Proposal, however the MP declined to move forward with their Proposal without the opportunity to re-price. The MP formally withdrew their Proposal on March 28, 2022.

The IA employed this streamlined Cure Process following lessons learned from Tranches 1 and 2. By providing the Bid Confirmation Memo and Cure Process Memo to each MP for each Proposal, information was concise and consolidated for review by both the MP and the IA. The Memo method concisely highlighted each cure to one centralized document for each Proposal. Further, sending the Memos within the same time span allowed the process to be more unified. This method proved easier for MPs, and while it required a more rigorous approach to the initial evaluations, made the evaluation process smoother for all.

IX. STEP 1 EVALUATION PROCESS

The Step 1 Evaluation was composed of two goals: first, to rank in order the Net Benefit ($/MWh) of each Proposal from most attractive to least attractive for ratepayers prior to Step 2 T&D evaluation, and second, to gather a Proposal Security of the most competitive Proposals. The process began once Proposals were confirmed by the Cure Process to be eligible for evaluation. All such Proposals were sent to the Modeling Team who used the Evaluation Model to rank all Proposals based on Net Benefit to ratepayers prior to the Step 2 T&D evaluation of system upgrade costs. The most competitive Proposals, based on the Step 1 Net Benefit ranking, were selected to the Competitive Tier, and given a deadline to submit Proposal Security. A Proposal moved into Step 2 T&D Evaluation once it had been selected to the Competitive Tier and provided an acceptable form of Proposal Security.

Proposal Security was required from the MP of all Competitive Tier Proposals prior to advancing to the Step 2 Evaluation. As per the RFP, Proposal Security equaled $20/kW minus the M1 security to enter the Resource Solicitation Cluster Phase 1, based on the facility's inverter nameplate capacity. The Proposal Security was accepted as cash, a Surety Bond, or a Letter of Credit ("LOC"). The IA provided acceptable Surety Bond and LOC forms on the IA Website as part of the RFP. Once a Proposal was selected to the Competitive Tier, Proposal Security was required within ten days.

The IA offered to vet an MP's draft Proposal Security prior to the due date to avoid a Proposal being disqualified for missing the deadline for delivery of a conforming form of Security. The RFP recommended MPs provide draft forms of Proposal Security prior to March 21, 2022, to allow for this review.

MPs were notified on April 1, 2022 if their Proposals were selected for Step 2 evaluation. Each MP was informed of the Proposal Security required to be posted to continue in the Tranche 3 evaluation and were given 14 days to post. Due to continued market uncertainties, including disruption of the international supply chain, Duke, the IA and Public Staff agreed to modify the security process for MPs. On April 13 , the day before the Proposal Security deadline, the IA notified each MP that the deadline would be extended to April 29, 2022 and reminded MPs of their Resource Solicitation Cluster enrollment requirements due May 2, 2022.

Further requests for delay to the Proposal Security deadline were made by multiple MPs and the IA notified each MP on April 28 that each request was being considered. After consulting with the MPs, the Public Staff, and Duke, on May 2, 2022, the following message was sent via the confidential Message Board to each MP with a submitted Proposal:

Duke Energy acknowledges the current market uncertainty identified by market participants. However, delaying the Tranche 3 RFP collateral requirements through July 15, 2022 (or making the collateral refundable) does not reduce that market uncertainty. Instead, these proposals allow market participants optionality to continue to be evaluated in the RFP as if they are committed to their bid while allowing a no-risk option to withdraw without penalty. Duke is reluctant to consider additional delays or changes to the collateral requirements that would require the Companies to continue to incur the cost of administering the RFP without certainty that projects will proceed to execute a PPA in accordance with their original bid. CPRE RFP administrative cost burden will be borne by our customers.

Therefore, in order to balance the current market uncertainty for market participants with the cost of administering the RFP, Duke Energy will amend the Tranche 3 RFP Step 2 collateral requirements as follows:

1. *Resource Solicitation Cluster M1 security for interconnection study is required to be delivered to DEC by April 30;*
2. *By Friday, May 6, 2022, each market participant shall either **(i)** provide the non-refundable Step 2 Proposal Security ($20/kW minus the M1 security to enter RSC Phase 1) as required under current terms of the RFP; or **(ii)** pay to Duke a non-refundable fee of $1/kW to defray the cost of administering the RFP. If the market participant elects option (ii) and pays a fee to continue in the Step 2 evaluation, then the remainder of the non-refundable proposal security ($19/kW minus the M1 security to enter RSC Phase 1) shall be due by July 15, 2022.*
3. *A market participants failure to take action, as required by 1) and 2) above shall result in withdrawal from further consideration in the RFP. No further delays or extension for posting non-refundable proposal security will be granted.*

One MP submitted the required security by the July 15, 2022, deadline for two Proposals. All other MPs declined to proceed with their Proposals.

X. STEP 2 EVALUATION PROCESS – T&D OVERVIEW

The goal of the Step 2 evaluation process was to calculate the final Net Benefit ($/MWh) of each Competitive Tier Proposal. The purpose of this step was for the T&D Team to assign an estimated network upgrade cost to each qualifying Proposal. The purpose of this section of the report is to document the steps taken by the IA and the Duke T&D Evaluation Team to complete the system upgrade cost analysis for each Proposal. This work was completed at the end of May 2022. This discussion is presented as a chronology of events, starting with actions taken prior to Proposal submission.

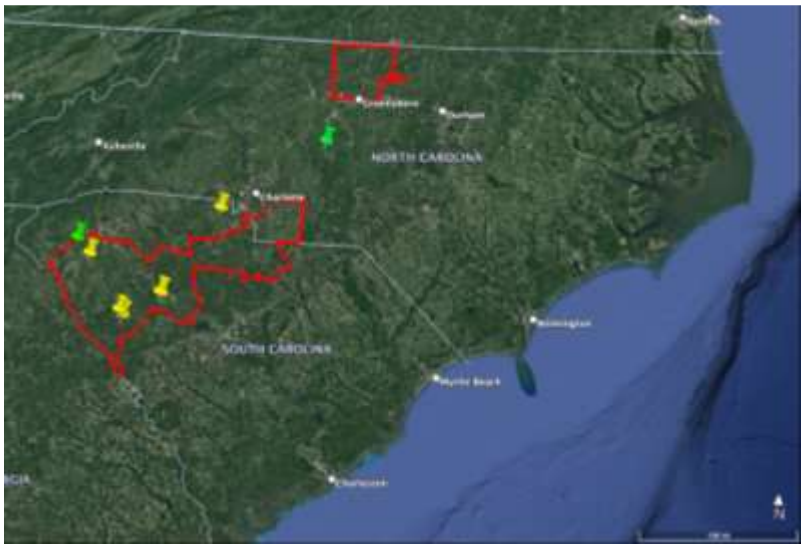
1. ACTIVITY PRIOR TO PROPOSAL SUBMISSION

i. Transmission Guidance Provided to MPs

The T&D Team created a locational guidance document for MPs to better understand the available transmission capability and assist them in selecting viable points of interconnection. This guidance was adapted from the locational guidance provided for Tranches 1 and 2. The new constrained areas and infrastructure were posted to the Document Page of the IA Website.

Notwithstanding the locational guidance, several Proposals were submitted for facilities in areas that were identified as constrained. Figure 9 is a map of all DEC Proposals and the pre-identified constrained areas, with winning Proposals identified in green.

Figure 9



The locational guidance maps were revised in August 2021 in preparation for Tranche 2 using the most current assumptions for the existing system and planned future modifications. The maps attempt to communicate geographical areas of the system where it is known that projects will face extended timelines to interconnect, or higher costs associated with interconnection based on network upgrades. They were provided as guidance, but were not intended to definitively define the constrained areas. As was determined during Tranche 2, circuits near the areas identified as constrained were similarly constrained, depending on the size of proposed projects and the proposed POI. When that occurred, appropriate upgrade costs were assigned.

ii. Distribution Guidance Provided to MPs

MPs were advised that projects smaller than 20 MW would be evaluated as requiring distribution level service. Locational guidance for distribution projects was not differentiated from transmission locational guidance.

2. ANALYSIS REPORT FORMAT

As part of the practice of treating each Proposal in a fair and equitable manner, a standard document was used to record and present the analysis results for each Proposal. This draft standard document was successfully utilized in Tranches 1 and 2 and was used with minimal modification in Tranche 3.

3. COMMUNICATION DOCUMENTATION

After the Proposal submission period closed on February 3, 2022, a "T&D EVAL" folder and confidential Message Board was opened on the IA Website for data sharing with the members of the T&D Evaluation Team. This platform ensured that the exchange of files, and the file contents, had a time and date stamp, and that all Proposal data was shared securely. All members of the team shared access to these files.

All direct communication from members of the T&D Evaluation Team to MPs concerning CPRE topics was prohibited. Instead, T&D Team members were instructed to provide questions to the IA, who in turn posted them for MPs on the confidential Message Board of the Website. This ensured complete documentation of all exchanges. There were no observed instances of MPs inappropriately approaching T&D Evaluation Team members, or vice versa.

4. INTERCONNECTION VERIFICATION AND VALIDATION

The process of verifying and validating the information submitted by the MPs proved to be less arduous than in prior Tranches when there was confusion about queue identification numbering, whether projects were FERC-jurisdictional, and the precise POI of projects. The IA managed the confirmation process with assistance from Account Managers, T&D Team members, Duke attorneys, and the MPs. Because the identity and location of projects proposed into the CPRE program was to remain unknown to most Duke personnel, including those on the Duke Evaluation Team, information from Proposals was only provided when there was uncertainty about a Proposal, and then only to the Duke personnel with subject-matter expertise to assist the IA so the required separation protocols were maintained. Proposal verification started shortly after the close of bidding in February 2022, and continued into May 2022 Those issues needing verification and validation are discussed below.

i. Interconnection Request and Project Data Verification

There were instances where the interconnection request for a project contained a different queue number than was submitted for the project as part of the Proposal. There were also instances where the bid data needed to be clarified. The inclusion of the Account Managers in the evaluation process greatly improved the ease of determination of the correct project data.

ii. Project Size Determination

The CPRE maximum Proposal size for transmission connection was 80 MW; the distribution connection maximum was 20 MW. Project size was established in the interconnection request and could not be expanded, but it could be reduced up to 10 percent.

iii. Point of Interconnection Verification

Each bid project was required to specify a point of interconnection within the Duke system. The T&D Evaluation Team and the IA reviewed each Proposal to ascertain that the point of interconnection was appropriate for the project. In some instances, there were questions as to whether the Proposal point of interconnection was proper for the bid projects. All MPs were required to follow Duke System equipment and interconnection standards. In this manner all MPs were treated equally.

5. STEP 2 PROCESS

i. Transmission Proposals

At the conclusion of Step 1, Proposals were selected by the IA and sent to the T&D Team to begin Step 2 analysis starting on May 6, 2022. In total, two (2) Proposals submitted Proposal Security that was accepted by Duke; these were included in the initial Step 2 analysis.

For each Proposal reviewed in Step 2, the information necessary to determine system impact cost was extracted from the Proposal submissions and provided to the T&D Team. The T&D Team reviewed the contents of these files and identified issues for which additional information was needed from the MP. The T&D Team shared requests with the IA via a confidential Message Board on the IA Website and the IA, in turn, interacted with the MP to collect the information and pass it to the T&D Team. This approach ensured that the T&D Team did not to have direct CPRE correspondence with the individual MPs during the evaluation.

ii. Distribution Service Analysis

There were no distribution Proposals in CPRE Tranche 3.

6. MEGAWATT REDUCTIONS AVAILABLE

On the Proposal Form, MPs were asked if they would be willing to have their project sizes reduced by up to 10% if interconnection constraints were present, without changing the associated decrement price. This size reduction would not result in a change in the dollar per megawatt hour Proposal price. Four (4) Proposals were submitted accepting a reduction if necessary to meet the CPRE goals. This option existing in all three tranches. As noted earlier, the final system upgrade costs have yet to be determined in facilities study, so it is unknown as of the date of this report whether there will be a reduction in any of the Proposals for which PPAs were executed.

7. BASE CASE FORMULATION

The base case serves as a foundation for the analysis of the transmission system and represents a snapshot of the electric system as it would exist prior to the addition of the projects included within Tranche 3, considering the existing interconnection queues. The same process was used to evaluate all of the Proposals that were included in the Step 2 analysis. The steps were as follows.

i. Review all Projects in Transition Serial and Transitional Cluster Queue

Duke established a Tranche 3 Resource Solicitation Cluster after the Transitional Cluster and ahead of the 2022 Definitive Interconnection System Impact Study for purposes of administering the generator interconnection study process for Tranche 3. Initially included in each base case were all projects with a queue position established prior to the Proposal submission date: February 3, 2022. Any project that bid into CPRE Tranche 3 was removed from this initial base case.

ii. Overall Base Case Discussion

The T&D Team reviewed and established the base case after receiving the listing of Proposals. The process for confirming the base case required review of all projects in serial queue, elimination of duplicate projects, and elimination of untimely projects.

iii. DEC Base Case

The DEC base case was formulated to represent the DEC system as it existed prior to considering the inclusion of the Tranche 3 bid Proposals proceeding in the Resource Solicitation Cluster. The addition of each Proposal was evaluated against this base case.

Because there were significantly fewer Proposals, and correspondingly fewer MWs to be considered as part of the transmission evaluation, significantly less earlier queued generation had to be added to the transmission models. The evaluation for Tranche 3 began after Transmission Cluster Study Phase 2 started, and before 2022 DISIS, therefore fewer than 10 earlier queued transmission projects had to be considered.

8. COST ANALYSIS COMPLETED

The analysis approach used during Tranche 3 was the same one that was used in Tranches 1 and 2. The components of the process are included below.

Standard Analysis Results Document

The following topics are included in each Proposal interconnection cost analysis:

- Proposal Information
- Study Purpose
- Study Conclusions
- Interconnection Configuration for the Proposed Proposal
- System Location of Proposed Proposal
- Analysis Structure and Assumptions
- Transmission or Distribution System Delivery Impacts
- Transmission or Distribution Facilities Estimate Including Upgrade Project Description
- Estimated Cost and Construction Time of Network Improvements

Individual analysis reports were completed for each Proposal that received Step 2 evaluation.

i. Analysis Results for Each Proposal

The T&D Evaluation Team received the Proposal ranking on May 6, 2022, 91 days after the Proposal closing date. At this point, the analysis of the individual Proposals began. The analysis results were produced and documented using the standard analysis results documentation format.

ii. Analysis Content

The analysis content was driven by the Proposal analysis document. To help the T&D Team understand and produce the required analysis and documentation of the analysis results, the IA met with the T&D Evaluation Team approximately once a week.

iii. Analysis Process and Results

a. Evaluate in Ranked Order

The process for determining costs for each Proposal started with their Step 1 ranked order. Proposals that were highest ranked had the lowest Proposal costs and were eligible for Step 2 evaluation first.

b. Apply Standard System Planning Models

Both thermal overload and reactive capability analyses were completed using standard Transmission Planning guidelines and models. The results of these analyses were reported in detail in the

standard document for each Proposal. Proposal analysis documents were prepared for two DEP Proposals; both Proposals connected at transmission voltage. Proposal analysis documents were completed for DEC Proposals: all were transmission projects.

c. Complete Reactive Capability Evaluation

Reactive analysis was part of the Tranche 3 review that was completed for each Proposal in Step 2. As the transmission team was evaluating each project and determining if there was sufficient reactive capability, it was apparent that reactive power modifications were required for some projects. These project modifications were needed to correct reactive shortcomings and were the responsibility of the MP, thus these changes did not impact the overall transmission Network Upgrade costs for these projects.

9. STEP 2 PROCESS

In Step 2 the system impact of Proposals was determined by the Duke transmission evaluation team and the calculations of initially assigned Upgrade costs were provided to the IA. The IA in turn imputed costs to the respective Proposals. The remaining Proposals were determined to be at or below Avoided Cost, and no Proposals were eliminated by the IA at that phase. The Proposals were identified to Duke for the execution of PPAs.

XI. SUBJECT MATTER AREAS

1. LEGAL TEAM REVIEW

Using lessons learned from Tranches 1 and 2, the IA's Legal Team performed several tasks for Tranche 3 of the CPRE program. The legal team continued the use of a Site Control Acknowledgement Affidavit. This Affidavit is considered to be particularly helpful as it requires the Market Participant to represent, warrant, and covenant critical site control issues. These include control, site location, adequacy, authority, duration of control, notification of any change, and recognition of the obligation to provide needed site control documentation.

Following the Proposal closure date, the Legal Team reviewed the following types of documentation: Site Deed, Site Lease, Options, Site Control Acknowledgement Affidavit, Title Insurance, Boundary Survey, Description of the Site, Easements, Environmental Studies, Historical Sites Impact, Facility Descriptions, Facility Permits, Other Permits, the Project Map, Project Map with Landmarks, and Sitemaps.

When documentation was found to be missing or inadequate, a cure of the particular deficiency was requested from the Market Participant. All 8 Proposals submitted required cures. A compilation of this review was organized and submitted to the IA. Based on the Legal Team's review of the various types of documentation, the Proposals were scored by category as follows:

a. permitting will be complete at the commercial operations date,
b. project site control for the full term, and
c. site control to the point of the interconnectivity.

The Legal Team reviewed the above types of documentation again for accuracy and to determine how they scored. A large portion of the Legal Team's time during the scoring process was spent reviewing

easements, leases, options, title work, title insurance, and deeds to verify control and that such control coincided with the duration of the project.

2. PROJECT SUFFICIENCY TEAM REVIEW

The IA Project Sufficiency Team ("PST") performed a detailed technical evaluation of each Proposal submitted in CPRE Tranche 3. The technical evaluation included a complete review of the experience of the project team, equipment to be used, required control equipment and quality of the project design. The purpose of the technical review was to confirm that any Proposal recommended by the IA for a PPA was technically capable of providing the proposed service within the proposed schedule.

Prior to the receipt of Proposals, the PST had identified which inputs on the Proposal form were pertinent to the technical evaluation and used the IA Evaluation File system to develop a file repository of five "custom reports":

1. Generating Facility (technical description of the facility).
2. Solar Design (design and equipment specifications), including a review of the PVsyst inputs and outputs underlying the 8760 energy production profiles for selected Proposals.
3. Storage Design (design and technical specifications).
4. Project Status Summary.
5. Proposal Summary.

Examples of documents uploaded to the CPRE website by MP's the PST reviewed included:

- Site Description
- Facility Description
- Inverter Warranty
- Operations (project costs)
- Project Map
- PV On-going Maintenance
- Single Line Drawing
- Site Map
- Site Plan
- Solar Project Design Information including, for selected Proposals, PVsyst documents and calculations
- Spec Sheets for solar panels and inverters
- Storage Spec Sheet
- Storage Experience
- Renewable Facilities Experience

The CPRE Tranche 3 Proposal Forms required each MP of a solar PV project to submit PVsyst modeling information, primarily in the form of document uploads. The following document uploads were required and reviewed by the PST:

- PVsyst input and output files used to produce a solar Proposal's 8760 energy production profile.
- .PAN and .OND files utilized in PVsyst evaluations (these files relate to design and performance of PV modules and inverters respectively).
- Related calculations and work papers supporting a solar Proposal's 8760 energy production file.

The PST also conducted detailed PVsyst reviews of selected solar PV with respect to information provided by the MP's to confirm that the energy production estimate associated with the hourly production estimate and associated 8760 hourly energy profile was reasonable and consistent with the proposed plant design, equipment and location.

In the initial examination the PST reviewed each Proposal and its associated uploaded documents to determine whether the Proposal was "complete and conforming"; that is, whether the MP provided all of the required information to meet the RFP criteria. In any Proposal where data entries were deficient or the information required clarification, the PST used the Cure Process to provide the MP the opportunity to cure or clarify the information provided. The PST submitted 25 requests for cures to the IA Admin Cure Manager who created, sent and tracked the "cure request" to the relevant MP via the MP's confidential Message Board. No Proposals were eliminated by the PST in the initial review.

A complete breakdown of scoring requirements can be found in Appendix F of the RFP, which is also included as Appendix A of this report.

XII. FINALISTS

Two Proposals from one MP were selected as finalists at the end of Step 2 on July 7, 2022. These two Proposals together represented 154.99 MW. PPAs with the two proposals were executed on August 26, 2023 and performance assurance security under the PPA was provided. As noted previously, the determination on whether these projects will go into service will be made at a later date.

XIII. CPRE BENEFITS AND COST

The CPRE process spanned 5 years, with Tranche 1 released on April 6, 2018, and projected to be completed with the final determination of Tranche 3 projected by Duke to be in July 2023. The process was conducted pursuant to the protocols and procedures established by the Commission. As noted above, the IA was responsible for completing all due diligence on Proposals, including review of project sufficiency, ability to reach the Point of Interconnection, financial capability, and conformity to CPRE requirements. Effectively, the Commission out-sourced to the IA responsibility for all of the due diligence of Proposals usually performed by a utility, combined the transmission review performed by Duke, and identified the Proposals that were ready for a PPA.

Correspondingly, the cost of benefit realized in each tranche reflected the level of market interest in the program. Figure 10 summarizes the cost and benefits of the CPRE program.

Figure 10
Summary of CPRE Costs and Benefits

	Tranche 1	Tranche 2	Tranche 3
Fees & Forfeitures Received	$2,401,383	$1,519,765	$504,930*
IA Fees & Expenses	$2,143,363	$1,698,721	$324,511
Sub-total of Program Cost	($258,020)	$178,956	$180,419
Duke Allocation of Personnel & Expenses	**Unknown to IA**	**Unknown to IA**	**Unknown to IA**
20 Yr. Nominal Savings	$261,170,000	$98,663,000	$9,735,993
IA Cost portion of Nominal 20 Yr. Benefit	0.82%	1.72%	3.33%
Duke & IA Program Cost portion of Program Benefit	**Unknown to IA**	**Unknown to IA**	**Unknown to IA**

* *Number calculated based on Duke estimate of Tranche 3 Success Fees*

Details on the summary are presented in the following figures.

Interest in CPRE varied significantly, with Tranche 1 garnering the most participation, as presented in Figure 11.

Figure 11
CPRE Participation

	Tranche 1	Tranche 2	Tranche 3
Stakeholders/website registrants	364	285	187
Registered MPs	249	122	119
MPs submitted Proposals	28	20	3

The market response to the CPRE opportunity was reflected in the number of Proposals received, the size of projects, and the average prices of Proposals submitted.

Figure 12
Proposals Received

	Tranche 1	Tranche 2	Tranche 3
Number of Proposals submitted	78	40	8
Number of successful Proposals	13	11	2

CPRE changed as stakeholder and MP interest evolved. The processes used by the IA and Duke evolved with successive tranches as 'lessons learned' in each tranche were applied. Tranche 1 was the most labor intensive for the IA and the Duke transmission review team due to the number of Proposals received, and the completeness of submitted Proposals. Tranche 1 Proposals included a number of Proposals from MPs who were unprepared to meet the full requirements of development, but met the minimum CPRE requirements to participate. These MPs chose to not participate in subsequent tranches, which reduced the due diligence review requirements and resulted in a more streamlined process.

Ultimately, Tranche 3 was the most streamlined as MPs declined to move forward with Proposals due to the significant uncertainty of supplies chains, international tariff disputes, and the changes in the

Duke transmission queuing process. Figure 13 is a summary of the activity in each tranche and the nominal savings that will be realized over the term of the contracts.

Figure 13
Ratepayer Savings

	Tranche 1		Tranche 2		Tranche 3
	DEC	DEP	DEC	DEP	DEC [10]
Number of Proposals submitted	58	20	34	6	8
Total MW Bid	2,732.72	1,231.15	1,710.40	440.90	520.79
MW Procured	465.5	85.72	589.40	75.00	154.99
Average price ($/MWh)	$37.94	$38.30	$36.74	Confidential	$38.71
20 Yr. Nominal Savings	$228,000,000	$33,170,000	$98,663,000		$9,735,883

With lessons learned in each successive tranche, and the diminished response by MPs, the required due diligence and transmission review continued to be reduced, as summarized in Figure 14.

Figure 14
Duration Of Due Diligence & Transmission Evaluation

	Tranche 1	Tranche 2	Tranche 3
Phase 1 review period, including cure period	61 days*	50 days	57 days
Phase 2 review period	137 days	67 days	62 days
Contracting period	90 days	90 days	40 days

* *Following the IA's due diligence review of Step 1, some exchanges continued beyond this time as MPs ensured their Proposal Security was conforming to CPRE requirements. The IA worked with each MP to guide them to provide conforming Proposal Security attempting to include a robust number of Proposals. Step 2 progressed throughout this process.*

The intensity of the review process, including transmission evaluation, directly impacted the extent of expert review and due diligence. Similarly, the number of Proposals determined the cost and benefit of each tranche. Figure 14 summarizes the cost of administering the CPRE process, and the fees received. As noted below in Figure 16, a forfeiture in Tranche 1 resulted in Duke receiving an additional $1 million. A forfeiture in Tranche 2 resulted in Duke receiving an additional $500,000. [11] Figure 15 summarizes some of the CPRE expenditures along with fees and forfeitures received. The IA is unable to provide the allocation of personnel and expenses of Duke for Duke employees and outside services.

[10] Tranche 3 was limited to DEC territory.
[11] In Tranche 2 the MP acknowledged the obligation to forfeit the Proposal Security without litigation.

As discussed above, after MPs were granted numerous extensions of the deadline for posting Proposal Security. Public Staff, Duke and the IA devised a process through which MPs would pay an additional sum or withdraw from consideration. The additional sum was paid for two Proposals while all others withdrew.

Figure 15
Expenses & Fees Received

	Tranche 1	Tranche 2	Tranche 3
IA fees and expenses	$2,143,363	$1,698,721	$324,511
Duke allocated personnel costs and expenses	Unknown to IA	Unknown to IA	Unknown to IA
Proposal fees	$901,383	$519,765	$79,945
Success fees	$500,000	$1,000,000	$270,000*
Forfeited Proposal Security	$1,000,000	$500,00	N/A
Additional Fee	N/A	N/A	$154,985

* *Duke estimate of Tranche 3 Success Fees at the time of this report*

Adding to the complexity of Tranche 1 were two challenges before the Commission and the Court of Appeals of North Carolina. [12] The first challenge was to the calculation of net benefits. The other was an MP refused to sign a PPA after being selected as a winner. The MP wanted the Proposal Security returned because the MP had failed to secure firm prices for solar panels. The eleventh hour refusal to sign the PPA resulted in the forfeiture of the Proposal Security Bond. Under North Carolina standards, the Commission did not defend its ruling that the Security Bond should be forfeited, resulting in the IA having to defend the Commission. Ultimately, the IA was successful in convincing the Court to uphold the Commission's ruling that the Proposal Security Bond was rightfully forfeited. These challenges resulted in evidentiary hearings before the Commission, responses to data requests, written pleadings, and defense of the Commission on appeal to the Court of Appeals.

These exercises added expense to the Tranche 1 process but resulted in Duke recovering $1 million from the forfeited security bond. The Court ruling also firmly established the Commission's right to require security during the solicitation process.

Figure 16
Tranche 1 Appeals

	Administrative Hearings	Court Appeal	Forfeited Security Bond
IA, Local Counsel Fees & Expenses	$342,020	$128,435	$1 million
Duke Fees & Expenses	Unknown to IA	Unknown to IA	

[12] Accion notes that in over 20 years of conducting competitive solicitations for state regulatory entities, this is only the second time disgruntled bidders filed complaints. There were no complaints after Tranche 1, even when Proposal Security was forfeited. The IA believes this is proof that the CPRE program was conducted fairly pursuant to the Commission's rules.

XIV. CONCLUSION

The CPRE process failed to meet the intended goals for the MW of renewable resources. The IA believes this failure is the result of unanticipated significant changes in market conditions during the pendency of the process, and not a reflection on the appropriateness of the Commission's program design. Those changes included the impact of a world-wide pandemic that disrupted the supply chain of critical components, uncertainty on the availability of components and widely fluctuating costs to MPs, including the cancelation of existing supply contracts in some instances and the filing of a complaint with the U.S. Department of Commerce. There is a maxim – *Certainty brings value*. As Tranche 3 unfolded, there was little certainty to be found, leaving MPs without the ability to forecast costs as in the past. Tranche 3 was also conducted while the revision of the Duke transmission access process was under revision.

The under-whelming response to the Tranche 3 opportunity, and the number of Proposals that were withdrawn before Proposal Security was to be submitted, is proof that Tranche 3 was conducted during very trying times. The IA believes the Duke personnel performed without bias and willingly joined the IA and the Public Staff in continuing crafting evolutions in the CPRE process in an effort to retain as many Proposals as possible to achieve as much of the CPRE program goals as possible.

CONFIDENTIAL Attachment 1—CPRE Tranche 3 Winners

INFORMATION INCLUDED IN CONFIDENTIAL REPORT

Appendix A—Tranche 3 Proposal Scoring Sheet

Duke Energy Carolinas, LLC and Duke Energy Progress, LLC CPRE RFP Tranche 3: Appendix F

Bid Scoring Categories	% of Bid Score	Description	Individual Categories	Maximum Scoring	Bid Score	Section Score
1. Price Score	40%	Includes fixed and variable costs	The price score will be calculated on the basis of the bid's projected total cost per MWH	400		400
2. Project Development Criteria	15%	Respondent must show sufficient evidence of ability to provide services included in Proposal for the contract term Evidence of operational capability to provide proposed services	Demonstrate that permitting will be complete to meet COD	25		160
			Experience of project team	35		
			Project Site control for full term	50		
			Site control to POI for full term	50		
3. Facility Project Characteristics	10%	Evidence of equipment designed to meet specifications	Equipment to be used	30		90
			Required control equipment	30		
			Quality of project design	30		
4. Transmission Characteristics	25%	Interconnection & Transmission Known Cost Risk	Known Interconnection Contingencies	250		250
5. Project Characteristics	4.5%	Value of Project Characteristics	Demonstrates ability to meet performance guarantee and liquidated damages pursuant to the PPA	45		45
6. Historically Underutilized Business	.5%	Owned by Minorities	Ascertain that at least 51% of venture is owned by eligible minority	5		5
7. Credit Worthiness	5%	Financial assurances to meet schedule and milestones in PPA	Confirms meeting all Duke credit requirements: pass/fail scoring EXAMPLE Pass: MP provides acceptable Proposal Security Fail: MP does not provide acceptable Proposal Security	50		50
Total Score	**100%**			**1,000**		**1,000**

Appendix B—Sample Bid Confirmation Memo

MEMORANDUM

TO: [Company]
FROM: Independent Administrator
DATE: February 3, 2022
RE: Confirm Bid Details

Your Proposal was received on February 3, 2022 for the DEC CPRE RFP. The following information was taken directly from the online Proposal form; please review the following items which were included in your Proposal.

- If the information is correct, use the confidential Message Board on the IA Website to confirm the information is correct.
- If you believe any of the information was inaccurately entered, use the confidential Message Board on the IA website to upload an explanation of the error along with the information you believe was intended for entry.
- For each response, please remember to use the drop-down feature on the confidential Message Board to identify the Proposal for which your response is provided.

Responses must be provided on the IA Website no later than two (2) business days from the time and date this memorandum was posted.

Proposal Information			
Proposal Number:		**Facility Location:**	
Queue Number:			
Project Name:			
Technology:			
Proposal Fee:			
Forecasted COD:		**Storage Included?:**	
Nameplate Capacity MW AC:		**ESS Nameplate DC Capacity:**	
Installed DC Rating (MW DC):		**ESS Output Rating**	
Offering to Reduce MW Size for same MWh?:		**Does Not Have Existing Fully Executed Off-Take Agreement:**	
MW Reduction Amount:			

Capacity Pricing		
	Transmission	Distribution
Summer On		
Winter On (AM)		
Winter On (PM)		
All Other Periods		

MEMORANDUM

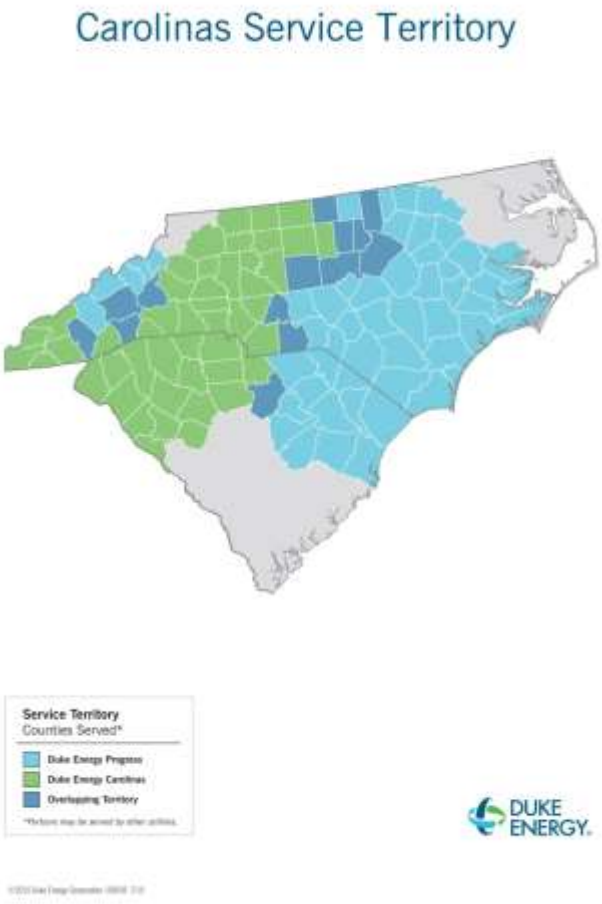
TO: [Company]
FROM: Independent Administrator
DATE: February 3, 2022
RE: Confirm Bid Details

Energy Pricing		
	Transmission	Distribution
Price Decrement		
Summer Premium Peak (PM)		
Summer On-Peak (PM)		
Summer Off-Peak		
Winter Premium Peak (AM)		
Winter On-Peak (AM)		
Winter On-Peak (PM)		
Winter Off-Peak		
Shoulder On-Peak		
Shoulder Off-Peak		

Appendix C—Constrained Area Guidance

Overview of Carolinas Service Territory

Duke Energy's Carolinas area is comprised of Duke Energy Carolinas, LLC (DEC) and Duke Energy Progress, LLC (DEP). DEC and DEP have jointly determined that the final Tranche 3 procurement under the Companies' Competitive Procurement of Renewable Energy ("CPRE") Program will be a DEC-only procurement, so this guidance document focuses on DEC. The DEC service territory is approximately 24,000 square miles and serves 2.5 million residential, commercial and industrial customers in central and western North Carolina and upstate South Carolina. Primary transmission voltages in DEC are 500kV, 230kV, 161kV, 100kV, 66kV, and 44kV.



November 2021 1

Planning the Transmission System

The analysis performed by Duke Energy in planning the transmission system is based on good utility practice and North American Electric Reliability Corporation ("NERC") Reliability Standards. The analysis is performed to ensure reliable service can be provided to all customers considering that outage events (lightning, car accidents, equipment failure, faults, etc.) that cause transmission and generation elements to be removed from service can and do occur. Outage events can impact the voltage levels and the power flows on the transmission system in ways that would stress the system beyond its capabilities if the system was not properly planned, resulting in customer outages or poor power quality. Addition of new transmission and distribution connected load and generation requires ongoing analysis to ensure continued operation within limits. When analysis indicates limits will be exceeded, modifications or upgrades to the system must be identified to ensure continued reliable operation. The decisions to upgrade or modify system elements are made by applying reliability standards on an equivalent basis to all interconnection requests, and selected solutions to system issues are identified to minimize costs to the total body of Duke Energy customers.

When a new generation project requests transmission interconnection, Duke Energy is required to assess the impact of the new generation on the electric system. The assessment identifies locations where modification or upgrade of the transmission system will be necessary to maintain reliable service to all interconnected electricity customers, including consideration of possible outage events. The assessment includes the impacts of distribution-interconnected generation projects, which also affect transmission system loadings.

As a result of analyses performed to date, Duke Energy has identified areas where there is an increased likelihood that transmission or distribution interconnection requests will be contingent upon already planned modifications or upgrades, will be contingent upon modifications or upgrades associated with earlier generator projects, or will create the need for additional modifications or upgrades.

The need for transmission system upgrades is subject to the final disposition of the individual projects, i.e., whether or not they are pursued to commercial operation. Thus the need for transmission system upgrades can be subject to change as additional projects are analyzed or individual projects decide not to continue with the interconnection process. Therefore, the identification of constrained areas should be considered a snapshot based on conditions known at the time. However, developers of potential projects in the identified constrained areas should be aware that there is a risk of additional transmission grid upgrades, which could result in additional costs and lead time requirements for the project. This would include distribution interconnected projects, which also impact transmission system loadings.

DEC Generator Interconnection Requirements - Overview

Transmission level projects participating in the DEC CPRE are likely to interconnect to the 115, 100 or 44 kV system. Unless a project requires interconnection to a multi-breaker switching station, the project will interconnect via a tap to a single transmission circuit. For 115 or 100 kV projects tapping a single circuit, this design will typically include a three-way gang operated air break switch in line with the main line and

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a breaker on the tap line at the point of change in ownership. For 44 kV projects tapping a single circuit, this design will typically include a 4-pole bent in line with the main line, disconnect switches, and a breaker on the tap line at the point of change in ownership. The design will include a transfer trip scheme for faults anywhere on the main or tap line.

Transmission level projects participating in the CPRE might be permitted to interconnect to a 230 kV multi-breaker switching station. 230 kV interconnections typically require the generation aggregated at the station to exceed 120 MW.

For additional details, refer to the DEC Facility Connection Requirements located under Generator Interconnection Information at the DEC OASIS website[1].

Constrained Areas in DEC

For DEC, the constrained area map (Attachment 1) represents areas of the transmission system where there are either known transmission constraints that would be aggravated by increased generation or transmission constraints that are known to be created by queued generation. The constrained area map reflects information known as of August 2021 and does not yet reflect the impacts of projects that enrolled in the Transitional Cluster Study commencing in December 2021. These transmission constraints have been identified by either Transmission Planning or System Operations and have been confirmed through transmission studies of one or more generator interconnection requests. Transmission upgrades to mitigate the constraints already identified would exceed $10 million, and lead time is dependent upon the scope of work but would require multiple years to complete. Generator interconnection requests in areas not identified as constrained may also require transmission upgrades, but transmission studies are required in order to make this determination. Transmission studies may also be required to determine whether projects proposing to interconnect to the DEC transmission network could cause transmission upgrades in DEP or other affected systems.

There are three constrained areas identified in DEC. In Caswell, Guilford and Rockingham counties, off-peak conditions can drive post-contingency thermal loading issues on 100 kV lines that emanate from Dan River. Increased generation in these three counties will make the 100 kV lines in the Dan River area more susceptible to both off-peak and on-peak loading issues. The other two constrained areas shown are areas on DEC's system with the highest volume of queued solar generation. The eight-county area near DEC's southern border including Abbeville, Anderson, Greenville, Greenwood, Laurens, McCormick, Newberry, and Union (SC) counties has received a high volume of solar generation interconnection requests in the queue over the last several years. The other constrained area is a four-county area located near the DEC/DEP border including Chester, Lancaster, Union (NC) and York counties that has also received a high volume of solar generation interconnection requests in the queue.

A DEC constrained infrastructure list is available that documents the individual transmission lines and retail substations that are in the constrained areas.

[1] https://www.oasis.oati.com/duk/index.html

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Additional transmission line mapping information can be found at the Energy Zones Mapping Tool website[2].

Connecting Smaller Generators to the DEC Distribution Systems

Guidelines for the connection of smaller generators to the DEC Distribution System are provided in the Duke Energy Method of Service Guidelines[3]. In general, projects between 10 and 20 MW may be able to connect directly to a retail substation depending on the voltage class of the distribution circuit, the voltage class of the transmission line serving the retail station, and other specific local factors described in the guidelines. Projects less than 10 MW may be able to connect to a general distribution circuit depending on the voltage class of the distribution circuit, the voltage class of the transmission line serving the retail station, and other specific local factors described in the guidelines.

[2] https://ezmt.anl.gov/
[3] https://www.duke-energy.com/home/products/renewable-energy/generate-your-own

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