

PJM Manual 14H: Enhancements to the Cluster-Based Interim Deliverability Study Methodology

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Disclaimer: While materials are current at the time of publishing, applicable requirements may change. PJM Governing Documents control.

- An Interim Deliverability Study (IDS) evaluates whether the project can deliver capacity and/or energy reliably to the system under the conditions below:
 - Planned in-service date is earlier than their original base case study year
 - Planned in-service date is prior to the completion of the required Contingent Facilities
- PJM conducts an IDS on an annual basis for each Delivery Year, evaluating Interim Deliverability Study requests submitted by project developers.

- Beginning with the 2027/2028 Delivery Year IDS methodology will transition from a serial study approach to a cluster-based study approach. Existing language in Manual 14-H Section 4.10.1
 - “...For flowgates that are not overloaded prior to the interim deliverability study but are overloaded at the end of the interim deliverability study, deliverable MW’s will be determined via a cluster study methodology and will be allocated proportionally based on the project’s MW impact to the flowgate and distribution factor (DFAX)....”
- PJM is proposing a “Quick Fix” approach in response to recent stakeholder inquiries and timing constraints, given that the application window for the 2027/2028 IDS closed on June 30, 2026, and PJM must complete the IDS by October 2026.

- M-14H Section 4.10.1.3 Analysis for Interim Deliverability Studies: adding additional language that describes how cluster-based study Interim Deliverability Study will be performed.

- 4.10.1.3 “Analysis for Interim Deliverability Studies” proposed addition:

Beginning with the 2027/2028 Delivery Year Interim Deliverability Study, PJM will implement a cluster-based methodology for the allocation of deliverable capacity and/or energy megawatts in the Interim Deliverability Study. Under this methodology, all eligible Interim Deliverability Study requests will be grouped into two subclusters.

- Subcluster 1 shall include projects that are already provisionally operational based on the prior Delivery Year’s Interim Deliverability Study results.
- Subcluster 2 shall include all other projects that have met the requirements for requesting an Interim Deliverability Study and are not included in Subcluster 1.

- 4.10.1.3 “Analysis for Interim Deliverability Studies” proposed addition:

For purposes of allocating deliverable megawatts for the delivery year under the study, PJM shall first evaluate and assign deliverable megawatts to projects in Subcluster 1 using a cluster-based methodology and will be allocated proportionally based on the project’s MW impact to the flowgate and distribution factor (DFAX). To the extent that deliverable megawatts remain available after completion of Subcluster 1 deliverable megawatt allocations, PJM shall then assign deliverable megawatts to projects in Subcluster 2 using the same methodology.

Note:

- Subcluster 1 status does not guarantee that such project will be determined deliverable in the Interim Deliverability Study for a Delivery Year.
- Projects that were deemed fully or partially deliverable as a result of an Interim Deliverability Study for a prior Delivery Year but did not commence provisional operation during that Delivery Year shall be classified as Subcluster 2 for Interim Deliverability Study for the subsequent Delivery Year.



Reliability Enhancements: Accounting for projects that are provisionally in service, supports system reliability by maintaining operating generation in the dispatch stack



Operational Continuity: Given limited headroom in certain areas, this methodology may allow provisionally operational resources to remain online, providing greater certainty to PJM Operations.

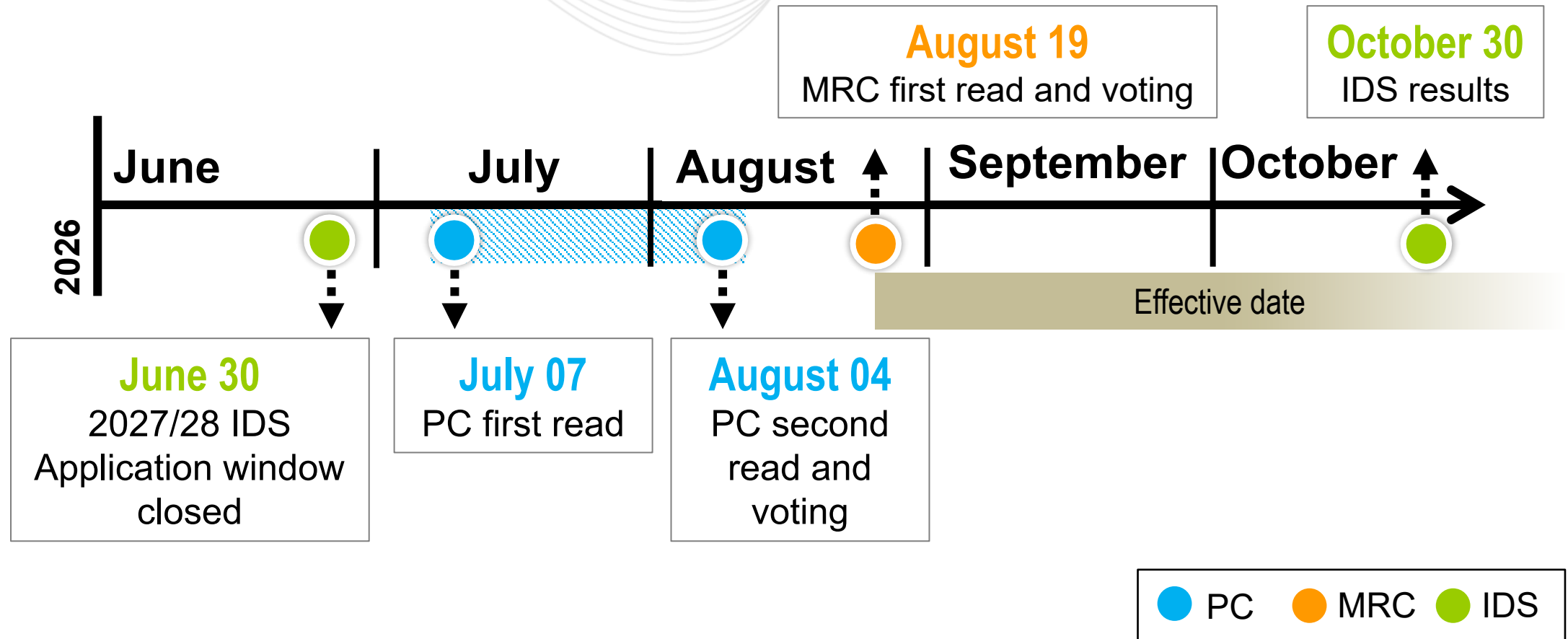


Reduced Project Developer Risks: Project Developers have expressed concern regarding the operational and financial impacts of being required to cease generation after previously being deemed deliverable. This methodology may mitigate such disruptions.



Capacity Market Alignment: Projects deemed deliverable in one Delivery Year will have must-offer obligations in subsequent auctions; proposed cluster based methodology improves projects' Planning and Markets obligations

- In case of insufficient stakeholder support for proposed cluster based methodology, PJM will perform 2027/28 Interim Deliverability Study on a cluster basis where all IDS requests will be part of a single cluster.
- Potential consequence
 - Projects that are provisionally operational based on IDS results may be subject to a higher likelihood of curtailment, including potential cessation of generation.
 - Operational and Markets challenges



- PJM has received all applications for the 2027/28 Delivery Year Interim Deliverability Study. At this time, in case of approval of the proposed revisions to Manual 14-H, no additional action will be required from Project Developers who submitted IDS request.

Key Takeaways From Proposed Cluster-Based IDS Methodology

1	2	3
• PJM will transition from serial study approach to cluster study approach for IDS starting with 2027/28 Delivery Year IDS	• Proposed Manual change introduces subclusters to account for projects that are provisionally operational over the other request in IDS process	• The proposed methodology is designed to ensure operational continuity, mitigate developer risk, enhance system reliability, and improve alignment with Capacity Market rules.

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Interim Deliverability Study Manual M-14H update



Member Hotline

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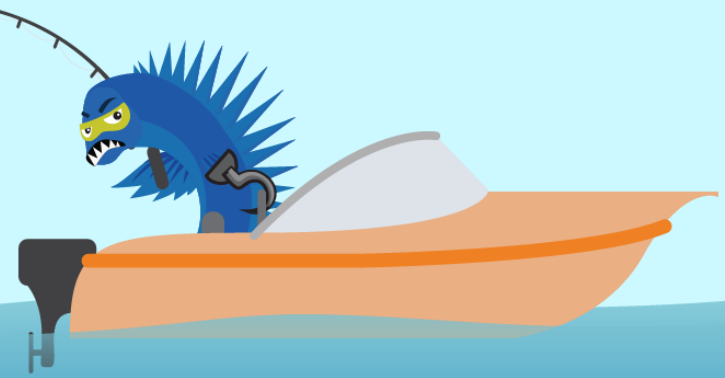
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Report suspicious email activity to PJM.
Call (610) 666-2244 or email it_ops_ctr_shift@pjm.com

Appendices

- [Tariff, Part VII, Subpart A, section 300] and [Tariff, Part VIII, Subpart A, section 400]:
 - Provisional Interconnection Service: “Provisional Interconnection Service” shall mean interconnection service provided by Transmission Provider associated with interconnecting the Project Developer’s Generating Facility to Transmission Provider’s Transmission System and enabling that Transmission System to receive electric energy and capacity from the Generating Facility at the Point of Interconnection pursuant to the terms of the *Interconnection Service Agreement* and, if applicable, the Tariff.

- Tariff, Part IX, Subpart B: FORM OF GENERATION INTERCONNECTION AGREEMENT COMBINED WITH CONSTRUCTION SERVICE AGREEMENT, 1.4A.2 Provisional Interconnection Service:
 - Upon the request of Project Developer, and prior to completion of requisite Interconnection Facilities, Distribution Upgrades, Network Upgrades, Stand Alone Network Upgrades, or system protection facilities Project Developer may request limited Interconnection Service at the discretion of Transmission Provider based upon an evaluation that will consider the results of available studies, which terms shall be memorialized in the Generation Interconnection Agreement to be tendered by Transmission Provider to Project subject to the execution timelines and provisions set forth in Tariff, Part IX, section 500.

Transmission Provider shall determine, through available studies or additional studies as necessary, whether stability, short circuit, thermal, and/or voltage issues would arise if Project Developer interconnects without modifications to the Generating Facility or Merchant Transmission Facility or the Transmission System. Transmission Provider shall determine, whether any Interconnection...

...Facilities, Network Upgrades, Distribution Upgrades, or Stand Alone Network Upgrades, or system protection facilities that are necessary to meet the requirements of NERC, or any applicable Regional Entity for the interconnection of a new, modified and/or expanded Generating Facility or Merchant Transmission Facility are in place prior to the commencement of Interconnection Service from the Generating Facility or Merchant Transmission Facility. Where available studies indicate that such Interconnection Facilities, Network Upgrades, Distribution Upgrades, or Stand Alone Network Upgrades, and/or system protection facilities that are required for the interconnection of a new, modified and/or expanded Generating Facility or Merchant Transmission Facility are not currently in place, Transmission Provider will perform a study, at the Project Developer's expense, to confirm the facilities that are required for Provisional Interconnection Service. The maximum permissible output of the Generating Facility or Merchant Transmission Facility shall be studied and updated annually and at the Project Developer's expense. The results will be communicated to the Project Developer in writing upon completion of the study. Project Developer assumes all risk and liabilities with respect to the Provisional Interconnection Service, including changes in output limits and Interconnection Facilities, Network Upgrades, Distribution Upgrades, or Stand Alone Network Upgrades, and/or system protection facilities cost responsibilities.

- GIA template in Tariff, Part IX, Subpart B: There are multiple reference to Interim Deliverability Study. An example is presented below:
 - Pursuant to and subject to the applicable terms of the GIP, the Project Developer shall have Capacity Interconnection Rights at the Point(s) of Interconnection specified in this Generation Interconnection Agreement in the amount of ____ MW commencing _____ {e.g., June 1, 2023}. During the time period from the effective date of this GIA until _____ {e.g., May 31, 2023} (the “interim time period”), the Project Developer may be awarded interim Capacity Interconnection Rights in the amount not to exceed ____ MW. The availability and amount of such interim Capacity Interconnection Rights shall be dependent upon completion and the results of an interim deliverability study. To the extent applicable, during the interim time period, PJM reserves the right to limit total injections of the Generating Facility consistent with the results of the *interim deliverability study* (which may be less than the Maximum Facility Output). Any interim Capacity Interconnection Rights awarded during the interim time period shall terminate on _____ {e.g., May 31, 2023}.