

DER and Inverter-based Resources Subcommittee – EDC Workshop WebEx Only December 9, 2021 3:00 p.m. – 5:00 p.m. ET

## Administration (3:00 – 3:05)

- 1. Scott Baker opened the meeting and reviewed the agenda.
- 2. Hamad Ahmed reviewed the meeting participation guidelines.

Order 2222 – EDC Coordination (3:05 – 4:45)

- PJM and electric distribution company staff discussed the data needs during the registration process for properly associating individual DER and a DER Aggregation with the appropriate pricing node in the PJM market model.
  - Danielle Croop, PJM, discussed registration data for DER. Multiple Stakeholders providing insight and also discussed location requirements. Suggestions were made that the EDC and TO coordinate providing the bus ID to PJM, and that PJM fill in the appropriate pnode for the DER / DER Aggregation.
  - Chris Wehr and Mike Thorn, First Energy, reviewed scenarios of different DER connected to a utility distribution and discussed obstacles with different use cases.

Action items (4:45 - 5:00)

- 4. The facilitation team reviewed action items from the meeting and took requests for future agenda items.
  - Stakeholders requested more use case examples during next DIRS.
  - Stakeholder requested future follow-up on two items: 1) future discussion on distribution utility relationship framework with PJM; and 2) how existing WMPA or ISA generators would potential 'convert' to the DERA model.

Future Meeting Dates and Materials			Materials Due <b>Secretary</b>	Materials Published
Date	Time	Location	5 p.m.	4 p.m.
December 21, 2021	9:00 - 4:00	WebEx	December 13, 2021	December 16, 2021
January 5, 2022	9:00 - 3:00	WebEx	December 27, 2021	December 30, 2021
January 7, 2022 – EDC Coordination Workshop	1:00 - 4:00	WebEx	December 29, 2021	January 4, 2021
January 18, 2022	9:00 - 12:00	WebEx	January 7, 2021	January 12, 2021
February 25, 2022	9:00 - 4:00	WebEx	February 16, 2022	February 22, 2022
March 28, 2022	9:00 - 4:00	WebEx	March 18, 2022	March 23, 2022

As of December 21, 2021

April 29, 2022	9:00 - 4:00	WebEx	April 22, 2022	April 27, 2022
May 31, 2022	9:00 - 4:00	WebEx	May 23, 2022	May 26, 2022
June 23, 2022	9:00 - 4:00	WebEx	June 15, 2022	June 20, 2022

Author: Hamad Ahmed

## WebEx Meeting Attendance

Name	Company Name	Sector
Hamad Ahmed	PJM Interconnection	None
		Transmission Owner
William Allen	Commonwealth Edison Company	None
David Anders	PJM Interconnection	
Jeff Baker	PJM Connect	None
Scott Baker	PJM Interconnection	
George Beam	PPL Elec Utilities Corp dba PPL Utilities (PPL POLR Small C&I)	Transmission Owner
Madalyn Beban	PJM Interconnection	None
Jim Benchek	FirstEnergy Corporation	
Matthew Bernstein	PJM Interconnection	None
		Transmission Owner
Tyler Berton	AEP Appalachian Transmission Company, Inc.	
Donnie Bielak	PJM Interconnection	None
Michael Borgatti	PJM Committee Voting Generic Account	
John Borkoski	MD Public Service Commission	
Joe Bowring	Monitoring Analytics	
Glen Boyle	PJM Interconnection	None
		Other Supplier
Aaron Breidenbaugh	Centrica Business Solutions Optimize, LLC	Generation Owner
John Brodbeck	EDP Renewables North America LLC	
Michael Bryson	PJM Internal	
		Other Supplier
Kevin Bunch	EDF Trading North America, LLC	None
Kevin Burns	Open Access Technology International, Inc.	
Zachary Callen	Illinios Commerce Commission	Other Supplier
Bruce Campbell	Enerwise Global Technologies, LLC	
		Other Supplier
Sean Chang	Shell Energy North America (US), L.P.	
Mahila Christopher	Public Utilities Commission of Ohio	
Bassanna Circalli	Dublic Service Electric & Con Company	Transmission Owner
Roseanne Circelli	Public Service Electric & Gas Company	Other Supplier
Chandra Colaresi	Enerwise Global Technologies, LLC	



		Transmission Owner
Nancy Connelly	Duke Energy Ohio, Inc.	Transmission Owner
James Conrad	PPL Electric Utilities Corp. dba PPL Utilities (LSE)	
Danielle Croop	PJM Interconnection	None
Jeff Currier ES	Dominion Virginia Power	Transmission Owner
Kerinia Cusick		
Kennia Gusick	Center for Renewables Integration	Transmission Owner
Louis D'Alessandris	American Transmission Systems, Inc.	
Elizabeth Davis	PJM Interconnection	None
		Generation Owner
James Davis	Dominion Energy Generation Marketing, Inc.	
Joseph DeLosa	New Jersey Board of Public Utilities	Electric Distributor
Brett Denby	Northern Virginia Electric Cooperative (NOVEC)	
Thomas DeVita	PJM Interconnection	None
Laura DiNicola	firstenergy	
	intenergy	Transmission Owner
Mamadou Diong	Dominion Virginia Power	
Duran Dalar		Transmission Owner
Ryan Dolan	Dayton Power & Light Company (The) (EDC)	Transmission Owner
Christin Domian	Duquesne Light Company	
		Generation Owner
Sophia Dossin	Invenergy, LLC	
Jere Downs	PJM Connect	
Rick Drom	Rick Drom	
Church Duran	Fast Kash also Davias Os as asting line	Transmission Owner
Chuck Dugan	East Kentucky Power Cooperative, Inc.	None
Nicolae Dumitriu	PJM Interconnection	Transmission Owner
Rachel Elkins	American Transmission Systems, Inc.	
		Transmission Owner
David Ellis	Public Service Electric & Gas Company	None
zhenyu fan	PJM Interconnection	None
Guy Filomena	Customized Energy Solutions, Ltd.	
Brian Fitzpatrick	PJM Interconnection	None Other Supplier
		Other Supplier
Kenneth Foladare	Geenex Solar LLC	Electric Distributor
Adrien Ford	Old Dominion Electric Cooperative	
Jill Gates	PJM Interconnection	
		Transmission Owner
Terry Gates	Appalachian Power Company (AEP Generation)	Nono
Suzanne Glatz	PJM Interconnection	None



Craig Glazer	PJM Interconnection	None
Michele Greening	PJM Interconnection	None
<u> </u>		Transmission Owner
Albert Grisolia	Public Service Electric & Gas Company	
Erik Hanser	Michigan Public Service Commission	Transmission Owner
Gary Hartman	PPL Electric Utilities Corp. dba PPL Utilities (LSE)	
Thomas Hauske	PJM Interconnection	None
Chad Heitmeyer	Appalachian Power Company (AEPSCO)	Transmission Owner
Rebecca Hilderbrand	EY	
Rebecca Filiderbrand		Generation Owner
Tom Hoatson	West Deptford Energy, LLC	
Lynn Marie Horning	Customized Energy Solutions, Ltd.	None
		Transmission Owner
John Horstmann	Dayton Power & Light Company (The)	Transmission Owner
Steven Hughes	PPL Electric Utilities Corp. dba PPL Utilities (LSE)	
		Electric Distributor
Gerit Hull	American Municipal Power, Inc.	
laura de l'human	Deliveran Cas and Electric Conservation	Transmission Owner
Inwook Hwang	Baltimore Gas and Electric Company	
Tom Hyzinski	gtpghyzinsk	
Arthur Iler	Indiana Office of Utility Consumer Counselor	None
Ali Ipakchi	Open Access Technology International, Inc.	
Farhad Jamshidian	OSI Digital Grid Solutions	Other Question
Gina Jardot	NRG Curtailment Solutions, Inc.	Other Supplier
		Transmission Owner
William Jett	Duke Energy Business Services LLC	
		Transmission Owner
Bethany Johnson	PPL Electric Utilities Corp. dba PPL Utilities (TO)	None
Carl Johnson	Customized Energy Solutions, Ltd.	Transmission Owner
Nathaniel Johnson	Appalachian Power Company (AEP Generation)	
David Johnston	Other	
Ibrahima Kalle	POWER Engineers, Inc	
Clark Kaml	Power System Engineering	
		Other Supplier
Brian Kauffman	Enel X North America, Inc.	Other Supplier
Stephen Kelly	Brookfield Renewable Trading and Marketing LP (BSMH)	
		Transmission Owner
Janessa Kent	Duquesne Light Company	
<b>D</b> 111		Other Supplier
Bakhtawar Khan	Jersey Green Energy LLC	



Brady Klein	EnergyHub	
		Transmission Owner
Nicolas Koehler	Appalachian Power Company (AEP Transmission)	Other Supplier
George Kogut	New York Power Authority	
		Transmission Owner
Takis Laios	Appalachian Power Company (AEP Transmission)	Neg
Andrew Levitt	PJM Interconnection	None
Cecilia Liang-Nicol	Allegheny Power (MonPwr Gen)	
Otavan Linkaman	American Musicinal Davies Inc.	Electric Distributor
Steven Lieberman	American Municipal Power, Inc.	None
Glenn Long	PJM Interconnection	
Xi Lu	Ford Motor Company	
David Mabry	McNees Wallace & Nurick LLC	Other Supplier
Doug Matheson	Enel X North America, Inc.	
Boug manocon		Other Supplier
Brian McArdle	NextEra Energy Marketing, LLC	
John McCombIII	PJM Interconnection	None
Christian McDewell	Pennsylvania Public Utility Commission	
Paul McGlynn	PJM Interconnection	None
		Transmission Owner
Timothy McInerney	Commonwealth Edison Company	
Justin McNeil	Kentucky Public Service Commission	
John Metz	University of Delaware	Transmission Owner
Sharon Midgley	Exelon Business Services Company, LLC	
John Miller	Calico Energy	
John Miller		Transmission Owner
Alan Mok	Duke Energy Kentucky, Inc.	
		Transmission Owner
Terrence Moran	Public Service Electric & Gas Company	Electric Distributor
Koushy Nareshkumar	Potomac Electric Power Company	
		Transmission Owner
Mike Nester	Dominion Virginia Power (EDC)	Transmission Oumor
Nathaniel Nichols	PECO Energy Company	Transmission Owner
		Electric Distributor
Chris Norton	American Municipal Power, Inc.	
Currenthia Nouvall	Deterror Floritia Dours Conserve	Electric Distributor
Cynthia Nowell	Potomac Electric Power Company	None
Michael Olaleye	PJM Interconnection	Transmission Owner
Brock Ondayko	AEP Energy Partners, Inc. (AEP Gen Resources)	
Sara Parkison	University of Delaware	



keyurbhai patel	PJM Interconnection	None
		Transmission Owner
John Peoples	Duquesne Light Company	None
Darlene Phillips	PJM Interconnection	None
Christopher Pilong	PJM Interconnection	NOTE
Greg Poulos	PJM Committee Voting Generic Account	
Nicholas Pratt	PPL Electric Utilities Corp. dba PPL Utilities (TO)	Transmission Owner
Ruth Price	Delaware Division of the Public Advocate	
Farrokh Rahimi	Open Access Technology International, Inc.	None
Ryann Reagan	New Jersey Board of Public Utilities	
Jim REILLY	Reilly Associates	
Tomas Rodriguez	Organization of PJM States, Inc.	Transmission Owner
Alexa Rooney	PPL Electric Utilities Corp. dba PPL Utilities (TO)	
		Transmission Owner
Alex Rosenblatt	Duquesne Light Company	Transmission Owner
James Rouland	PPL Electric Utilities Corp. dba PPL Utilities (LSE)	
		Transmission Owner
Amanda Rumsey	PPL Electric Utilities Corp. dba PPL Utilities (TO)	
Tom Rutigliano	Natural Resources Defense Council	
Jonathan Sasser	Customized Energy Solutions, Ltd.	None
		Generation Owner
David Scarp	Calpine Energy Services, L.P.	Other Supplier
Kenneth Schisler	Enerwise Global Technologies, LLC	
David Schmitt	New Jersey Board Of Public Utilities	
		Transmission Owner
CONNIE SCHROEDER	Dominion Virginia Power	Transition O and
Pahaa Sairaa	Rockland Electric Company	Transmission Owner
Bahaa Seireg		Transmission Owner
William Sharkazy III	PPL Electric Utilities Corp. dba PPL Utilities (LSE)	
		Transmission Owner
Evan Shearer	Duke Energy Business Services LLC	Transmission Owner
Mohit Singh	Commonwealth Edison Company	
Ŭ		Transmission Owner
James Sorrels	AEP Appalachian Transmission Company, Inc.	None
Rebecca Stadelmeyer	PJM Interconnection	none
		None
Vincent Stefanowicz	PJM Interconnection	
		Transmission Owner
Alexander Stern	Public Service Electric & Gas Company	



As of December 21, 2021

		Transmission Owner
Heather Svenson	Public Service Electric & Gas Company	Other Currelier
Dred Suchual	Tangant Energy Calutions Inc	Other Supplier
Brad Swalwell	Tangent Energy Solutions, Inc.	Transmission Owner
Eric Swanger	Appalachian Power Company (AEP Transmission)	
Rory Sweeney	GT Power Group, LLC	None
Kristin Swenson	Midcontinent Independent Sys Op, Inc. (CTS)	
Robert Taylor	Commonwealth Edison Company	Transmission Owner
	Commonwealur Edison Company	Generation Owner
Zelalem Tekle	Bath County Energy, LLC	
		Generation Owner
Kevin Thundiyil	Exelon Generation Co., LLC (NEV_XLON)	
Andrea Tighe	CAPS	Transmission Owner
James Tobia	Jersey Central Power & Light Company	
Catherine Tyler	Monitoring Analytics	
,		Other Supplier
Jim Waight	Siemens Industry, Inc.	Transition O
Jerry Warchol	Dominion Virginia Power (EDC)	Transmission Owner
Kathleen Wehnes	Maryland Department of the Environment	
		Electric Distributor
Christopher Wehr	Ohio Edison Company (EDC)	
		Transmission Owner
Christopher Werner	Appalachian Power Company (AEP Transmission)	None
Matthew Wharton	Guidehouse Inc.	
Jeffrey Whitehead	GT Power Group	<b>T</b>
Bernie Whitmoyer	Jersey Central Power & Light Company	Transmission Owner
Amy Willey	Delaware Public Service Commission	
De Andre Wilson	Maryland Public Service Commission	
Damon Xenopoulos	Other	
Jin An Yi	jinan	
Kyungjin Yoo	Monitoring Analytics	
		Transmission Owner
Vivian Younes	PPL Electric Utilities Corp. dba PPL Utilities (LSE)	

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You may not discuss any topics that violate, or that might appear to violate, the antitrust laws including but not limited to agreements between or among competitors regarding prices, bid and offer practices, availability of service, product design, terms of sale, division of markets, allocation of customers or any other activity that might unreasonably restrain competition. If any of these items are discussed the chair will re-direct the conversation. If the conversation still persists, parties will be asked to leave the meeting or the meeting will be adjourned.

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