



Office of Energy Projects Energy Infrastructure Update For October 2020

Natural Gas Highlights

- America Midstream (AlaTenn) placed in service its Greene Interconnect Project, which includes abandoning in place four compressors at its Decatur Compression Station in Limestone County, AL, and replacing them with two new compressors. The project will increase compression by 2,095 HP and downstream capacity by 39 MMcf/d.
- NGPL placed in service its Sabine Pass Compression Project, including a 22,490 HP compressor station in Cameron Parish, LA. The project will provide up to 400 MMcf/d of pipeline capacity to the Sabine Pass LNG export terminal.
- Northern Natural received authorization to place in service its Palmyra to South Sioux City A-Line Abandonment Project, including abandoning 118 miles of pipeline in Otoe, Lancaster, Saunders, Dodge, Burt, Thurston, and Dakota Counties, NE, and building 4.2 miles of pipeline and associated appurtenances in Otoe and Dodge Counties. The project does not create any additional capacity.
- Northern Natural received authorization to place in service a new compressor at its Tescott Compression Station as part of its Bushton to Clifton A-Line Abandonment Project in Ottawa County, KS. The project does not create any additional capacity.
- Tennessee received authorization to place in service 2.1 miles of pipeline loop for its 261 Upgrade Project. The project will increase capacity by 72.4 MMcf/d in Connecticut and Massachusetts.
- Texas Eastern received authorization for its Middlesex Extension Project, including 1.75 miles of new pipeline, a new meter and regulating station and related facilities in Middlesex County, NJ. The project would provide up to 264 MMcf/d of firm natural gas transportation service to interconnects with Transco for delivery to a powerplant.
- Double E received authorization for its Double E Pipeline Project, which consists of 133 miles of new pipeline that would provide up to 1.3 Bcf/d of firm takeaway capacity from the Delaware Basin in Eastern New Mexico and Western Texas to delivery points near Waha in Reeves and Pecos Counties, TX.
- Port Arthur Pipeline received authorization to amend its certificate in order to relocate a compressor from its proposed location in Allen Parish, LA, to a point in Beauregard Parish, LA, and to relocate a pipeline interconnection and add three new interconnections. The proposed relocation would increase capacity on the pipeline by 70 MMcf/d.
- Gulf South received authorization to abandon in place four compressor units, related buildings, and appurtenant facilities located at the Koran Compressor Station in Bossier and Webster Parishes, LA. These facilities have been underutilized and are no longer needed.
- ANR received authorization for its Lincoln Freeman Plug and Abandonment Project, including abandoning by removal 10 injection/withdrawal wells and associated pipelines and appurtenances at its Lincoln/Freeman Storage Field in Clare County, MI, in order to ensure field integrity. The project will not change the field's certificated parameters.
- Equitrans received authorization to convert its Tepe 3900 injection/withdrawal storage well to an observation well, remove the associated drip, and abandon in place 385 feet of pipeline. The well is located at the Tepe Storage Field in Allegheny County, PA. The project will not have an impact on the field's certificated parameters.
- Columbia Gas received authorization for its Laurel Wells 9058 and 9129 Abandonment Project, including abandonment of two injection/withdrawal wells and associated pipelines and appurtenances at its Laurel Storage Field in Hocking County, OH. The proposed abandonment will not impact customers or deliverability.
- Golden Pass requests authorization for its Compression Relocation Project, including relocating and adding 10,033 HP of compression to a proposed compression station, establishing a new interconnection, and other modifications. There is no change in the certificated capacity of the pipeline.
- Southern Star requests an amendment to its previous authorization to allow it to abandon in place Lines DT and DS rather than by removal. These lines are located in Anderson and Franklin Counties, KS.
- Transwestern requests authorization for its Linam Ranch Project, including abandoning in place its Linam Ranch Meter Station and 2,446 feet of pipeline in Lea County, NM. The line does not have any firm transportation contracts and has for years only served one interruptible customer.
- NGPL requests authorization to abandon the lease of certain transmission facilities owned by Peoples Gas and to continue to lease, operate, and maintain certain transmission facilities owned by Peoples under a new amended and restated lease. The facilities are in Cook County, IL.
- Gulf South requests authorization for its Marksville Replacement Project, including replacing four compressors with a new 13,058 HP compressor at its Marksville Compressor Station in Avoyelles Parish, LA. The replacement would not impact service.



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- Spire Storage West requests authorization to expand its Clear Creek Storage Field facilities in Uinta County, WY, including installing four new compressor units and adding 11 new injection/withdrawal wells and associated equipment in order to increase compression by 20,600 HP, field deliverability by 450 MMcf/d, and total capacity by 16 Bcf. In addition, Spire requests reaffirmation of its market-based authority.
- Equitrans requests authorization for its Hunters Cave 3675 Well Abandonment Project, which involves plugging and abandoning the well and associated infrastructure at its Hunters Cave Storage Field in Greene County, PA. The project will not affect the field's certificated parameters.

Natural Gas Activities in October 2020

Status	No. of Projects	Storage Capacity (Bcf)	Deliverability (MMcf/d)	Capacity (MMcf/d)	Miles of Pipeline	Compression (HP)
Pipeline						
Placed in Service	5			482	6	40,155
Certificated	3			1,684	135	0
Proposed	2			0	0	23,091
Storage						
Placed in Service	0	0.0	0.0			0
Certificated	0	0.0	0.0			0
Proposed	1	16.0	450.0			20,600
LNG (Import & Export)						
Placed in Service (Export)	0	0.0	0.0			0
Certificated (Import/Export)	0	0.0	0.0			0
Proposed (Import/Export)	0	0.0	0.0			0

Source: Staff Database

Natural Gas Activities through October 31, 2020 January through October 31, 2019

Status	No. of Projects	Storage Capacity (BCF)	Deliverability (MMcf/d)	Capacity (MMcf/d)	Miles of Pipeline	Compression (HP)
Pipeline						
Placed in Service	10			1,694.7	134.3	71,931
through October 31, 2019	9			4,785.0	16.6	323,770
Certificated	39			9,280.6	972.9	703,399
through October 31, 2019	28			16,387.3	573.0	697,623
Storage						
Placed in Service	0	0.0	0.0			0
through October 31, 2019	0	0.0	0.0			0
Certificated	2	81.0	2,836.0			11,150
through October 31, 2019	3	1.0	429.0			10,000
LNG (Import & Export)						
Placed in Service (Export)	7	6.8	2,314.0			0
through October 31, 2019	5	23.7	2,874.0			0
Certificated (Import/Export)	3	20.4	3,083.0			0
through October 31, 2019	7	51.8	13,447.0			0

Source: Staff Database



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Hydropower Highlights (nonfederal)

- Dakota County, Minnesota was issued an order increasing the capacity of its Lake Byllesby Project No. 6299 from 1.900 MW to 4.000 MW. The project is located on the Cannon River in Dakota and Goodhue Counties, MN.

Hydropower Project Activities in October 2020

Status	Conventional		Pumped Storage		Hydrokinetic		Total No. of Projects	Total Capacity (MW)
	No.	Capacity (MW)	No.	Capacity (MW)	No.	Capacity (MW)		
Filed								
License	0	0	0	0	0	0	0	0
10-MW Exemption	0	0	0	0	0	0	0	0
Capacity Amendment	0	0	0	0	0	0	0	0
Conduit Exemption	0	0	0	0	0	0	0	0
Issued								
License	0	0	0	0	0	0	0	0
10-MW Exemption	0	0	0	0	0	0	0	0
Capacity Amendment	1	2.100	0	0	0	0	1	2.100
Conduit Exemption	0	0	0	0	0	0	0	0
Placed in Service								
License	0	0	0	0	0	0	0	0
10-MW Exemption	0	0	0	0	0	0	0	0
Capacity Amendment	0	0	0	0	0	0	0	0
Conduit Exemption	0	0	0	0	0	0	0	0

Source: Staff Database

Hydropower Project Activities Year to Date (through October 31, 2020)

Status	Conventional		Pumped Storage		Hydrokinetic		Total No. of Projects	Total Capacity (MW)
	No.	Capacity (MW)	No.	Capacity (MW)	No.	Capacity (MW)		
Filed								
License	1	0.140	1	1,200.000	0	0	2	1,200.140
10-MW Exemption	1	4.500	0	0	0	0	1	4.500
Capacity Amendment	5	19.585	0	0	0	0	5	19.585
Conduit Exemption	0	0	0	0	0	0	0	0
Issued								
License	0	0	0	0	0	0	0	0
10-MW Exemption	2	0.422	0	0	0	0	2	0.422
Capacity Amendment	7	17.531	0	0	0	0	7	17.531
Conduit Exemption	0	0	0	0	0	0	0	0
Placed in Service								
License	1	24.000	0	0	0	0	1	24.000
10-MW Exemption	0	0	0	0	0	0	0	0
Capacity Amendment	0	0	0	0	0	0	0	0
Conduit Exemption	0	0	0	0	0	0	0	0

Source: Staff Database



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Electric Generation Highlights

- Cranell Wind Farm LLC's 220.0 MW Cranell Wind Farm in Refugio County, TX is online.
- Exus North America Management Partners LLC's 163.3 MW Bearkat Renewable Energy Project wind expansion in Glasscock County, TX is online.
- Wisconsin Power & Light Co.'s 150.5 MW Kossuth Wind Project in Kossuth County, IA is online.
- Willow Creek Wind Power LLC's 103.0 MW Willow Creek Wind Energy Facility in Butte County, SD is online.
- LightSource BP's 28.3 MW Mont Alto Solar Expansion in Franklin County, PA is online. The power generated is sold to Pennsylvania State University under long-term contract.
- Whitetail Solar 3 LLC's 28.3 MW Mont Alto Solar Expansion in Franklin County, PA is online. The power generated is sold to Pennsylvania State University under long-term contract.
- Sun8 PDC LLC's 21.6 MW Ellis Tract Solar Photovoltaic Project in Tompkins County, NY is online.
- Solar Hagerstown LLC's 10.0 MW Hagerstown Plant in Washington County, MD is online.
- Ashley Furniture Industries' 8.0 MW Ashley Furniture Leesport Solar Project in Berks County, PA is online.
- AEP Onsite Partners LLC's 6.7 MW Pine Hill Solar Project in Providence County, RI is online. The power generated is sold to National Grid USA under long-term contract.

New Generation In-Service (New Build and Expansion)

Primary Fuel Type	October 2020		January – October 2020 Cumulative		January – October 2019 Cumulative	
	No. of Units	Installed Capacity (MW)	No. of Units	Installed Capacity (MW)	No. of Units	Installed Capacity (MW)
Coal	0	0	5	20	3	62
Natural Gas	0	0	35	6,039	103	8,190
Nuclear	0	0	0	0	1	155
Oil	0	0	1	0	26	89
Water	0	0	12	68	28	152
Wind	4	637	60	6,047	37	4,721
Biomass	0	0	3	13	18	69
Geothermal Steam	0	0	0	0	1	10
Solar	16	108	289	5,430	453	3,758
Waste Heat	0	0	0	0	1	58
Other *	0	0	21	5	49	0
Total	20	745	426	17,622	720	17,264

Sources: Data derived from Velocity Suite, ABB Inc. and The C Three Group LLC. The data may be subject to update.

*"Other" includes purchased steam, tires, and miscellaneous technology such as batteries, fuel cells, energy storage, and fly wheel.



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Total Available Installed Generating Capacity

	Installed Capacity (GW)	% of Total Capacity
Coal	242.04	20.02%
Natural Gas	538.35	44.52%
Nuclear	104.98	8.68%
Oil	39.73	3.29%
Water	100.86	8.34%
Wind	112.11	9.27%
Biomass	15.64	1.29%
Geothermal Steam	3.88	0.32%
Solar	49.45	4.09%
Waste Heat	1.29	0.11%
Other	0.78	0.06%
Total	1,209.11	100.00%

Sources: Data derived from Velocity Suite, ABB Inc. and The C Three Group LLC. The data may be subject to update.

Generation Capacity Additions and Retirements (November 2020 – October 2023) From ABB Velocity Suite's Generating Unit Capacity Dataset

Primary Fuel Type	All Additions		High Probability Additions		Retirements	
	No. of Units	Installed Capacity (MW)	No. of Units	Installed Capacity (MW)	No. of Units	Installed Capacity (MW)
Coal	1	77	0	0	67	22,346
Natural Gas	226	54,777	100	27,040	76	5,468
Nuclear	4	4,100	2	2,200	7	7,190
Oil	16	683	7	6	46	5,061
Water	219	12,150	95	1,062	10	9
Wind	435	86,488	156	27,675	9	292
Biomass	42	252	22	189	18	85
Geothermal Steam	14	512	4	213	10	35
Solar	3,041	128,001	766	32,784	0	0
Waste Heat	3	49	2	29	0	0
Other *	347	482	87	15	2	2
Total	4,348	287,571	1,241	91,213	245	40,488

Sources: Data derived from Velocity Suite, ABB Inc. and The C Three Group LLC. The data may be subject to update.

* "Other" includes purchased steam, tires, and miscellaneous technology such as batteries, fuel cells, energy storage, and fly wheel.

** Under Constructions includes units that have started site preparation or construction. It also includes units that are in the testing phase.

Electric Transmission Highlights

- Northeast Utilities has completed the 3.7 mile, 115 kV Newington - Southwest Hartford Underground Transmission Line in CT.
- Tennessee Valley Authority has completed the 4.5 mile, 161 kV Sebastopol-Langford-Flowood Transmission Line in MS.

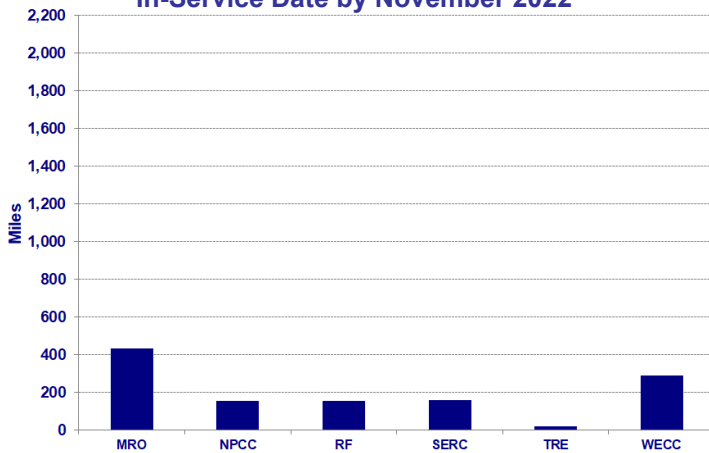


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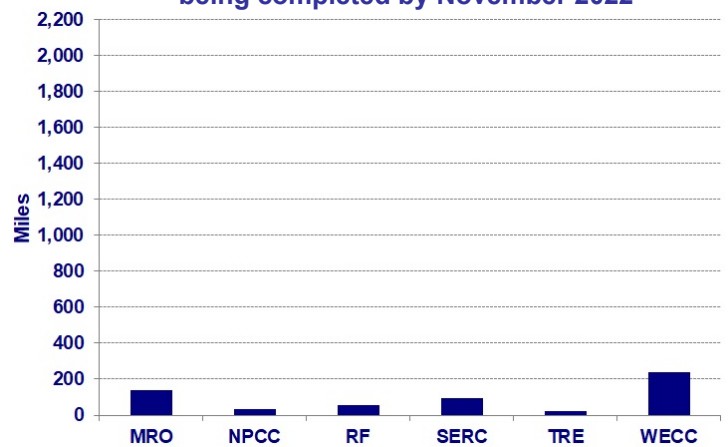
Voltage (kV)	Transmission Projects Completed				Proposed Transmission Projects In-Service by November 2022	
	October 2020	October 2019	January – October 2020 Cumulative	January – December 2019 Cumulative	High Probability of Completion	All
	Line Length (miles)					
≤230	8.2	114.7	65.7	303.4	271.2	458.5
345	0.0	26.0	152.6	604.5	117.0	560.4
500	0.0	0.0	60.0	7.7	191.4	191.4
Total U.S.	8.2	140.7	278.3	915.6	579.6	1,210.3

Sources: Data derived from Staff Database and U.S. Electric Transmission Projects ©The C Three Group, LLC.

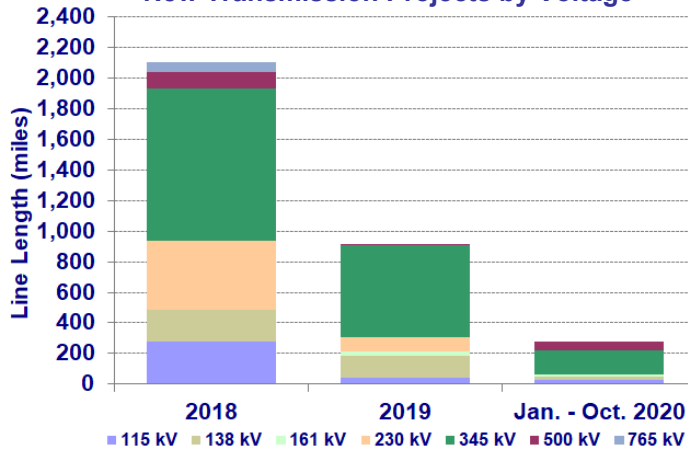
All Transmission Projects with a Proposed In-Service Date by November 2022



Transmission Projects with a High Probability of being completed by November 2022



New Transmission Projects by Voltage



Sources: Data derived from Staff Database and U.S. Electric Transmission Projects ©The C Three Group, LLC.

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