			OE-41	7 Electric E	mergency and Disturb	ance R	eport - Calendar Year 2019			
Month	Date Event Began	Time Event Began	Date of Restoration	Time of Restoration	Area Affected	NERC Region	Alert Criteria	Event Type	Demand Loss (MW)	Number of Customers Affected
January	01/05/2019	1:19 PM	01/05/2019	3:07 PM	Washington:	WECC	Complete loss of Interpersonal Communication and Alternative Interpersonal Communication capability affecting its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	Unknown
January	01/06/2019	3:00 AM	01/09/2019	7:00 AM	Washington:	WECC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	230	230000
January	01/06/2019	5:56 PM	01/06/2019	9:52 PM	California: Sacramento County;	WECC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	300	90382
January	01/06/2019	1:00 AM	01/06/2019	12:00 PM	Washington: King County, Thurston County, Pierce County;	WECC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	230000
January	01/07/2019	8:57 PM	01/07/2019	9:32 PM	Michigan:	RF	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
January	01/09/2019	11:55 AM	01/09/2019	11:56 AM	New Mexico: San Juan County;	WECC	Physical threat to its Facility excluding weather or natural disaster related threats, which has the potential to degrade the normal operation of the Facility. Or suspicious device or activity at its Facility.	Suspicious Activity	0	0
January	01/10/2019	12:19 PM	01/10/2019	12:48 PM	Montana: Valley County;	WECC	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	System Operations	11	2
January	01/11/2019	11:36 AM	01/11/2019	12:43 PM	Maine:	RF	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
January	01/12/2019	11:30 AM	01/13/2019	10:00 PM	Missouri: Jackson County; Kansas: Johnson County;	SPP RE	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	112530
January	01/12/2019	11:30 AM	Unknown	Unknown	Missouri: Nebraska:	SERC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	116600
January	01/12/2019	7:20 PM	01/12/2019	9:38 PM	New Hampshire:	NPCC	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
January	01/13/2019	5:30 AM	01/15/2019	5:00 PM	North Carolina: South Carolina:	SERC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	133200	Unknown
January	01/14/2019	11:10 AM	Unknown	Unknown	Michigan:	RF	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Actual Physical Attack	Unknown	Unknown

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January	01/15/2019	8:00 AM	01/15/2019	8:02 AM	Pennsylvania:	RF	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Vandalism	0	0
January	01/16/2019	5:26 PM	01/17/2019	12:19 PM	California:	WECC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	190	126700
January	01/16/2019	5:19 AM	01/16/2019	7:14 AM	Texas: Nueces County;	TRE	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
January	01/18/2019	9:54 PM	01/19/2019	12:19 AM	Nebraska:	MRO	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	Transmission Interruption	8	Unknown
January	01/23/2019	7:26 AM	01/23/2019	5:05 PM	Colorado: Larimer County;	WECC	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	System Operations	0	0
January	01/24/2019	4:39 AM	01/24/2019	5:16 AM	Ohio:	RF	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
January	01/28/2019	1:35 PM	01/28/2019	1:40 PM	Utah: Iron County;	WECC	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Actual Physical Attack	0	0
January	01/29/2019	6:34 PM	01/29/2019	6:36 PM	Louisiana: Washington Parish;	SERC	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	Transmission Interruption	Unknown	Unknown
January	01/30/2019	4:30 PM	Unknown	Unknown	Washington:	WECC	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Vandalism	0	0
January	01/30/2019	4:23 AM	02/02/2019	9:00 AM	Illinois: Scott County;	SERC	Fuel supply emergencies that could impact electric power system adequacy or reliability.	Fuel Supply Deficiency	Unknown	Unknown
January	01/30/2019	9:30 AM	01/31/2019	6:00 PM	Michigan:	RF	Public appeal to reduce the use of electricity for purposes of maintaining the continuity of the Bulk Electric System.	Severe Weather	Unknown	Unknown

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Month	Date Event Began	Time Event Began	Date of Restoration	Time of Restoration	Area Affected	NERC Region	Alert Criteria	Event Type	Demand Loss (MW)	Number of Customers Affected
January	01/30/2019	7:00 AM	01/30/2019	8:08 AM	Illinois: Pike County;	SERC	Fuel supply emergencies that could impact electric power system adequacy or reliability.	Severe Weather	Unknown	Unknown
January	01/31/2019	9:33 PM	01/31/2019	9:34 PM	California:	WECC	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Vandalism	0	0
February	02/01/2019	11:57 PM	02/02/2019	8:49 AM	Nevada	WECC	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Vandalism	Unknown	1
February	02/01/2019	5:35 AM	02/01/2019	6:10 AM	Massachusetts	NPCC	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
February	02/02/2019	10:28 AM	02/02/2019	10:29 AM	California	WECC	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Vandalism	0	0
February	02/05/2019	6:17 PM	02/05/2019	8:26 PM	California	WECC	Electrical System Separation (Islanding) where part or parts of power grid remain(s) operational in an otherwise blocked out area or within the partial failure of an integrated electrical system.	Severe Weather	42	33200
February	02/07/2019	7:39 AM	02/07/2019	7:40 AM	Arkansas	SERC	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	Severe Weather/Transmission Interruption	3	3370
February	02/07/2019	8:55 AM	02/09/2019	4:30 PM	Michigan	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	233000
February	02/08/2019	10:00 AM	02/08/2019	10:30 AM	Pennsylvania	RF	Physical threat to its Facility excluding weather or natural disaster related threats, which has the potential to degrade the normal operation of the Facility. Or suspicious device or activity at its Facility.	Vandalism	0	0
February	02/08/2019	6:30 PM	Unknown	Unknown	Washington	WECC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	50940
February	02/13/2019	2:48 AM	02/15/2019	12:28 AM	California	WECC	Loss of electric service to more than 50.000 customers for 1 hour or more.	Severe Weather	182	121000
February	02/14/2019	8:50 AM	02/14/2019	12:10 PM	New Jersey	RF	Physical threat to its Facility excluding weather or natural disaster related threats, which has the potential to degrade the normal operation of the Facility. Or suspicious device or activity at its Facility.	Vandalism	0	0

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Month	Date Event Began	Time Event Began	Date of Restoration	Time of Restoration	Area Affected	NERC Region	Alert Criteria	Event Type	Demand Loss (MW)	Number of Customers Affected		
February	02/14/2019	12:15 PM	02/14/2019	12:16 PM	Utah	WECC	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Vandalism	0	0		
February	02/19/2019	9:45 AM	Unknown	Unknown	Texas	TRE	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Vandalism	0	0		
February	02/20/2019	12:50 PM	02/20/2019	1:32 PM	Wisconsin, Minnesota, Iowa, Illinois	MRO	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	740	0		
February	02/23/2019	2:05 PM	Unknown	Unknown	Virginia	SERC	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	Severe Weather/Transmission Interruption	Unknown	Unknown		
February	02/24/2019	6:00 PM	02/25/2019	10:00 PM	Pennsylvania	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	132000		
February	02/24/2019	11:21 AM	02/26/2019	5:29 PM	Ohio, Virginia, West Virginia	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	118781		
February	02/24/2019	6:47 PM	02/25/2019	1:55 PM	Pennsylvania	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	137216		
February	02/24/2019	12:31 PM	02/24/2019	2:57 PM	Ohio	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	157274		
February	02/24/2019	2:33 PM	02/24/2019	6:03 PM	Pennsylvania	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	94048		
February	02/24/2019	8:02 PM	02/25/2019	2:30 PM	Michigan	RF	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	115000		
February	02/25/2019	7:45 AM	02/25/2019	6:40 PM	Massachusetts	NPCC	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	Transmission Interruption	0	0		
February	02/25/2019	1:35 PM	02/26/2019	2:50 AM	Connecticut, Massachusetts, New Hampshire, Maine, Vermont, Rhode Island	NPCC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	72332		
February	02/27/2019	11:25 AM	02/27/2019	5:39 PM	lowa	MRO	Unexpected Transmission loss within its area, contrary to design, of three or more Bulk Electric System Facilities caused by a common disturbance (excluding successful automatic reclosing).	Transmission Interruption	0	0		

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Month	Date Event Began	Time Event Began	Date of Restoration	Time of Restoration	Area Affected	NERC Region	Alert Criteria	Event Type	Demand Loss (MW)	Number of Customers Affected
February	02/27/2019	9:35 PM	02/27/2019	9:45 PM	South Carolina	SERC	Physical threat to its Facility excluding weather or natural disaster related threats, which has the potential to degrade the normal operation of the Facility. Or suspicious device or activity at its Facility.	Suspicious Activity	0	0
February	02/28/2019	7:02 AM	02/28/2019	7:33 AM	Oklahoma, Arkansas, Louisiana	SPP RE	Complete loss of monitoring or control capability at its staffed Bulk Electric System control center for 30 continuous minutes or more.	System Operations	0	0
March	03/04/2019	11:39 AM	03/08/2019	4:52 PM	Oklahoma:	SPP RE	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Vandalism	0	0
March	03/05/2019	9:12 AM	03/05/2019	6:57 PM	California: Kern County, Los Angeles County; Utah: Salt Lake County; Wyoming: Converse County;	WECC	Cyber event that causes interruptions of electrical system operations.	System Operations	0	0
March	03/13/2019	3:51 PM	03/16/2019	6:00 PM	Texas:	TRE	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather/Transmission Interruption	50	54290
March	03/13/2019	11:29 AM	03/14/2019	9:11 PM	Colorado: Jefferson County;	WECC	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	58	58379
March	03/13/2019	5:50 AM	03/13/2019	10:30 AM	Texas: Midland County, Ector County, Tarrant County, Dallas County, Wichita County, Brown County;	TRE	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather	Unknown	154124
March	03/13/2019	3:00 PM	03/14/2019	12:00 AM	Texas: Kansas: Oklahoma:	TRE	Loss of electric service to more than 50,000 customers for 1 hour or more.	Severe Weather/Transmission Interruption	Unknown	66000
March	03/13/2019	6:12 AM	03/13/2019	6:13 AM	California: Los Angeles County;	WECC	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Vandalism	0	0
March	03/19/2019	10:53 PM	03/19/2019	10:54 PM	Oklahoma:	SPP RE	Damage or destruction of its Facility that results from actual or suspected intentional human action.	Vandalism	0	0
March	03/21/2019	10:00 AM	03/21/2019	10:05 AM	Utah: Salt Lake County;	WECC	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Vandalism	0	0
March	03/25/2019	7:47 AM	03/25/2019	7:48 AM	Oregon: Lane County;	WECC	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Actual Physical Attack	5	Unknown
March	03/29/2019	11:36 PM	03/30/2019	2:00 AM	California: San Diego County, Los Angeles County;	WECC	Physical attack that could potentially impact electric power system adequacy or reliability; or vandalism which targets components of any security systems.	Suspicious Activity	0	0