



Patrick Boughan
Outage Coordination

To: NEPOOL Participants

From: Patrick Boughan

Subject: 2012-13 Current Year Annual Maintenance Schedule

Date: May 31, 2012

Following this transmittal letter, you will find the 2012-13 Annual Maintenance Schedule (AMS) dated May 31, 2012, with rounded weekly planned outage totals only and an Operable Capacity Analysis (with forecasted external transactions) for June 1, 2012- May 31, 2013. This schedule covers the third Forward Capacity Market procurement period.

Please note that there may be generation outages due to gas pipeline outages that are currently tentatively scheduled for some weeks in summer and early-fall of 2012 that may further decrease the operable capacity margin.

Periodically, individual Participants will receive a copy of the AMS that depicts only the maintenance requests that they submitted to ISO New England. Participants that own entitlements in units must contact the Lead Participant to obtain the maintenance schedule for each unit.

2012-13 AMS - DATED May 31, 2012

The 2012 AMS - dated May 31, 2012 reflects all planned maintenance requests for June 1, 2012- May 31, 2013 that have been submitted to the ISO through May 22, 2012. Those generator owners who have not yet submitted their anticipated maintenance schedules for Procurement Period 2012-13 are encouraged to do so.

2012-13 OPERABLE CAPACITY ANALYSIS

The Operable Capacity Analysis for June 1, 2012 - May 31, 2013 presently forecasts the lowest Long Term Operable Capacity Margin, LTOCM, of -2,440 MW for week beginning June 2nd. The overall margin has become less positive since resources have been removed or repositioned since the last publication.

Peak Load Exposures (PLE)

After being adjusted for Other Demand Resources, ODR, the Peak Load Exposure (PLE) for the winter was 21,412 MW and summer of 2012 is 26,462 MW, and reflects the seasonal peak load based on the 2012 CELT Report.

Generating Unit Capabilities

Resource Capacity Supply Obligations, CSO, are based upon data as of May 22, 2012 and includes Energy Management System (EMS) assets. New unit additions are factored into the New Generation column at the appropriate points in time.

Unplanned Outage Allotment



Allowances for unplanned outages, as documented in ISO New England SOP-OUTSCH.0030.0040 range from 2,700 MW to 3,400 MW during the winter and summer months.

External Transmission

No maintenance of Hydro-Quebec Phase II or Highgate has been included in the analysis.

Weekly Operating Reserve

The weekly operating reserve is equal to one hundred percent (100%) of the largest contingency plus one-half (50%) of the second-largest contingency.

Generation at Risk Due to Gas Supply Issues

A column has been included in the Operable Capacity Analysis to reflect natural gas-fired generating capability that may not be available due to the unavailability of gas.

If you have any questions or comments concerning this edition of the 2012 AMS or Operable Capacity Analysis, or if you have any comments or suggestions please feel free to contact Rachel Wilkins-Thurman at (413) 540-4261, Joanne Bialas (413) 535-4162, Patrick Boughan at (413) 540-4712 or by email at opamoreq@iso-ne.com.

ISO-NE June 2012 - May 2013 OPERABLE CAPACITY ANALYSIS

May 31, 2012 - 50/50 FORECAST

This analysis is a tabulation of weekly assessments shown in one single table. The information shows the operable capacity situation under assumed conditions for each week. It is not expected that the system peak will occur every week during June, July, and August and Mid September.

STUDY WEEK (Week Beginning, Saturday)	OPCAP SUPPLY							LOAD OBLIGATIONS			OPCAP MARGINS				
	AVAILABLE OPCAP MW	EXTERNAL NODE AVAIL CAPACITY MW	NON COMMERCIAL CAPACITY MW	PLANNED OUTAGES	ALLOWANCE FOR UNPLANNED OUTAGES MW	GEN AT RISK DUE TO GAS SUP MW	NET OPCAP SUPPLY MW	PEAK LOAD FORECAST MW	OPER RESERVE REQUIREME NT MW	NET LOAD OBLIGATION MW	OPCAP MARGIN MW	OPCAP FROM OP4 ACTIVE REAL-TIME DR	OPCAP MARGIN w/ OP4 actions through OP4 Step 2 MW	OPCAP FROM OP4 REAL- TIME EMER. GEN MW	OPCAP MARGIN w/ OP4 actions through OP4 Step 6 MW
	[1]	[2]	[3]	[4]	[5]	[6]	[7]	[8]	[9]	[10]	[11]	[12]	[13]	[14]	[15]
6/2/2012	30,033	541	200	1,953	2,800	0	26,020	26,462	2,000	28,462	(2,440)	500	(1,940)	350	(1,590)
6/9/2012	30,088	541	200	1,748	2,800	0	26,280	26,462	2,000	28,462	(2,180)	500	(1,680)	350	(1,330)
6/16/2012	30,025	541	200	1,232	2,800	616	26,120	26,462	2,000	28,462	(2,340)	500	(1,840)	350	(1,490)
6/23/2012	29,977	541	200	511	2,800	0	27,410	26,462	2,000	28,462	(1,050)	500	(550)	350	(200)
6/30/2012	29,648	664	200	244	2,100	0	28,170	26,462	2,000	28,462	(290)	500	210	350	560
7/7/2012	29,648	664	200	270	2,100	0	28,140	26,462	2,000	28,462	(320)	500	180	350	530
7/14/2012	29,655	664	200	278	2,100	0	28,140	26,462	2,000	28,462	(320)	500	180	350	530
7/21/2012	29,662	664	200	277	2,100	0	28,150	26,462	2,000	28,462	(310)	500	190	350	540
7/28/2012	29,651	664	200	264	2,100	0	28,150	26,462	2,000	28,462	(310)	500	190	350	540
8/4/2012	29,564	756	200	236	2,100	0	28,180	26,462	2,000	28,462	(280)	500	220	350	570
8/11/2012	29,562	756	200	262	2,100	0	28,160	26,462	2,000	28,462	(300)	500	200	350	550
8/18/2012	29,562	756	200	244	2,100	0	28,170	26,462	2,000	28,462	(290)	500	210	350	560
8/25/2012	29,577	756	200	258	2,100	0	28,170	26,462	2,000	28,462	(290)	500	210	350	560
9/1/2012	29,572	756	200	259	2,100	0	28,170	26,462	2,000	28,462	(290)	500	210	350	560
9/8/2012	29,574	756	200	350	2,100	0	28,080	26,462	2,000	28,462	(380)	500	120	350	470
9/15/2012	29,802	756	200	2,457	2,100	0	26,200	22,530	2,000	24,530	1,670	500	2,170	350	2,520
9/22/2012	29,637	756	200	2,804	2,100	0	25,490	22,439	2,000	24,439	1,050	500	1,550	350	1,900
9/29/2012	30,080	555	300	3,354	2,800	0	24,480	16,615	2,000	18,615	5,860	500	6,360	350	6,710
10/6/2012	30,784	555	300	5,523	2,800	0	23,020	16,651	2,000	18,651	4,370	500	4,870	350	5,220
10/13/2012	30,560	555	300	7,187	2,800	0	21,130	17,582	2,000	19,582	1,550	500	2,050	350	2,400
10/20/2012	31,457	555	300	7,415	2,800	0	21,800	17,949	2,000	19,949	1,850	500	2,350	350	2,700
10/27/2012	30,195	555	300	3,831	3,600	0	23,320	18,157	2,000	20,157	3,160	500	3,660	350	4,010
11/3/2012	30,457	555	300	3,971	3,600	0	23,440	18,273	2,000	20,273	3,170	500	3,670	350	4,020
11/10/2012	30,181	555	300	2,665	3,600	0	24,470	18,620	2,000	20,620	3,850	500	4,350	350	4,700
11/17/2012	30,250	555	300	1,098	3,600	0	26,110	19,363	2,000	21,363	4,750	500	5,250	350	5,600
11/24/2012	30,109	555	300	1,662	3,600	0	25,400	20,088	2,000	22,088	3,310	500	3,810	350	4,160
12/1/2012	30,080	555	400	342	3,200	0	27,090	20,304	2,000	22,304	4,790	500	5,290	350	5,640
12/8/2012	30,134	555	400	431	3,200	0	27,060	20,595	2,000	22,595	4,460	500	4,960	350	5,310
12/15/2012	30,134	555	400	411	3,200	0	27,080	20,607	2,000	22,607	4,470	500	4,970	350	5,320
12/22/2012	30,134	555	400	411	3,200	0	27,080	20,669	2,000	22,669	4,410	500	4,910	350	5,260
12/29/2012	30,078	555	400	311	3,200	0	27,120	20,944	2,000	22,944	4,180	500	4,680	350	5,030
1/5/2013	30,078	555	400	311	2,800	2,000	25,520	21,412	2,000	23,412	2,110	500	2,610	350	2,960
1/12/2013	30,078	555	400	311	2,800	2,000	25,520	21,412	2,000	23,412	2,110	500	2,610	350	2,960
1/19/2013	30,078	555	400	311	2,800	2,000	25,520	21,412	2,000	23,412	2,110	500	2,610	350	2,960
1/26/2013	30,078	555	400	311	3,100	2,000	25,220	21,188	2,000	23,188	2,030	500	2,530	350	2,880
2/2/2013	30,078	555	400	311	3,100	2,000	25,220	20,920	2,000	22,920	2,300	500	2,800	350	3,150
2/9/2013	30,084	555	400	748	3,100	2,000	24,790	20,891	2,000	22,891	1,900	500	2,400	350	2,750
2/16/2013	30,084	555	400	748	3,100	2,000	24,790	20,627	2,000	22,627	2,160	500	2,660	350	3,010
2/23/2013	30,084	555	400	748	3,100	0	26,790	19,633	2,000	21,633	5,160	500	5,660	350	6,010
3/2/2013	30,084	555	400	748	2,200	0	27,690	19,282	2,000	21,282	6,410	500	6,910	350	7,260
3/9/2013	30,232	555	400	1,079	2,200	0	27,510	19,085	2,000	21,085	6,420	500	6,920	350	7,270
3/16/2013	30,231	555	400	1,268	2,200	0	27,320	18,718	2,000	20,718	6,600	500	7,100	350	7,450
3/23/2013	30,208	555	400	1,019	2,200	0	27,540	18,150	2,000	20,150	7,390	500	7,890	350	8,240
3/30/2013	30,335	555	400	2,526	2,700	0	25,660	17,638	2,000	19,638	6,020	500	6,520	350	6,870
4/6/2013	30,131	555	400	1,969	2,700	0	26,020	17,385	2,000	19,385	6,630	500	7,130	350	7,480
4/13/2013	30,366	555	400	4,435	2,700	0	23,790	16,873	2,000	18,873	4,920	500	5,420	350	5,770
4/20/2013	30,397	555	400	3,560	2,700	0	24,690	16,607	2,000	18,607	6,080	500	6,580	350	6,930
4/27/2013	30,089	555	400	2,522	3,400	0	24,720	16,580	2,000	18,580	6,140	500	6,640	350	6,990
5/4/2013	30,107	555	400	2,768	3,400	0	24,490	19,998	2,000	21,998	2,490	500	2,990	350	3,340

ISO-NE June 2012 - May 2013 OPERABLE CAPACITY ANALYSIS

May 31, 2012 - 50/50 FORECAST

This analysis is a tabulation of weekly assessments shown in one single table. The information shows the operable capacity situation under assumed conditions for each week. It is not expected that the system peak will occur every week during June, July, and August and Mid September.

STUDY WEEK <small>(Week Beginning)</small>	OPCAP SUPPLY							LOAD OBLIGATIONS			OPCAP MARGINS				
	AVAILABLE OPCAP MW	EXTERNAL NODE AVAIL CAPACITY MW	NON COMMERCIAL CAPACITY MW	PLANNED OUTAGES	ALLOWANCE FOR UNPLANNED OUTAGES MW	GEN AT RISK DUE TO GAS SUP MW	NET OPCAP SUPPLY MW	PEAK LOAD FORECAST MW	OPER RESERVE REQUIREME NT MW	NET LOAD OBLIGATION MW	OPCAP MARGIN MW	OPCAP FROM OP4 ACTIVE REAL-TIME DR MW	OPCAP MARGIN w/ OP4 actions through OP4 Step 2 MW	OPCAP FROM OP4 REAL- TIME EMER. GEN MW	OPCAP MARGIN w/ OP4 actions through OP4 Step 6 MW
5/11/2013	30,089	555	400	2,565	3,400	0	24,680	20,973	2,000	22,973	1,710	500	2,210	350	2,560
5/18/2013	30,382	555	400	1,904	3,400	0	25,630	21,878	2,000	23,878	1,750	500	2,250	350	2,600
5/25/2013	29,926	555	400	206	3,400	0	26,880	22,872	2,000	24,872	2,010	500	2,510	350	2,860

1. Available OPCAP MW based on resource Capacity Supply Obligations, CSO, from Forward Capacity Tracking System, FCTS . Does not include Settlement Only Generators.
(LTOCM application Case Output-System Results-column PreOutage CSO MW)
2. External Node Available Capacity MW based on external Capacity Supply Obligations, CSO. (LTOCM application Case Output-System Results-(EXTERNAL NODE AVAIL OPCAP MW+ ZONAL EXPORT LIMITATIONS MW)
3. New resources that have not yet acquired a CSO but will become commercial in the future.
4. Planned Outages includes outages scheduled greater than or equal to 15 days in advance.
5. Allowance for Unplanned Outages includes forced outages and maintenance outages scheduled less than 14 days in advance per ISO New England Operating Procedure No. 5 Appendix A.
(LTOCM application Case Output-System Results-UNPLANNED OUTAGES MW)
6. Generation at Risk due to Gas Supply pertains to gas fired capacity expected to be at risk during cold weather conditions. (LTOCM application Case Output-System Results-GEN RISK DUE TO GAS SUP MW)
7. Total OpCap Supply Available per the formula (1 + 2 + 3 - 4 - 5 - 6 = 7)
8. Peak Load Forecast per data included in the 2011 CELT Report adjusted for Other Demand Resources. (LTOCM application-Case Output-System Results-LOAD FORECAST MW)
9. Operating Reserve Requirement based on first largest contingency plus 1/2 the second largest contingency. (LTOCM application Case Output-System Results-OPER RESERVE REQUIREMENT MW)
10. Total Load Obligation per the formula (8 + 9 = 10)
11. Net OPCAP Supply minus Net Load Obligation (7 - 10 = 11)
12. OP 4 Action 2 Real-time Demand Response based on OP4 Appendix A. Reserve Margins and Distribution Loss Factor Gross Ups are Included.
13. OPCAP Margin taking into account Real Time Demand Response through OP4 Step 2 (11 + 12 = 13).
14. OP 4 Action 6 Emergency Generation Response without the Voltage Reduction requiring > 10 Minutes based on OP4 Appendix A. Real Time Emergency Generation is capped at 600MW.
Reserve Margins and Distribution Loss Factor Gross Ups are Included.
15. OPCAP Margin taking into account Real Time Demand Response and Real Time Emergency Generation through OP4 Step 6 (13 + 14 = 15). This does not include Emergency Energy Transactions (EETs).

New England Operable Capacity Margins 50/50 FORECAST

