

Wind and Solar Curtailment June 24, 2023

This report is produced daily to provide a detailed accounting of the wind and solar renewable generation that was curtailed and the reasons why¹. This report should be read in the context of the Renewables Watch report for a more complete understanding of both renewable curtailment and generation².

Wind and solar curtailments are grouped into the following categories:

1. Economic - Local: Market dispatch of generators with economic bids to mitigate local congestion³.
2. Economic - System: Market dispatch of generators with economic bids to mitigate system-wide oversupply⁴.
3. SelfSchCut - Local: Market dispatch of self-schedules to mitigate local congestion.
4. SelfSchCut - System: Market dispatch of self-schedules to mitigate system-wide oversupply.
5. ExDispatch - Local: Exceptional dispatch to mitigate local congestion.
6. ExDispatch - System: Exceptional dispatch to mitigate system-wide oversupply.

Note: Amounts smaller than 1 MW are filtered out for simplicity. Such small curtailments are occasionally observed when forecasts are lower than Pmin when market will de-commit the unit and send the 0 MW dispatch.

¹Only wind and solar resources can be reported in this manner because these resources have a forecast. Curtailment is defined as the difference between actual production and the forecast when actual production is less than the forecast.

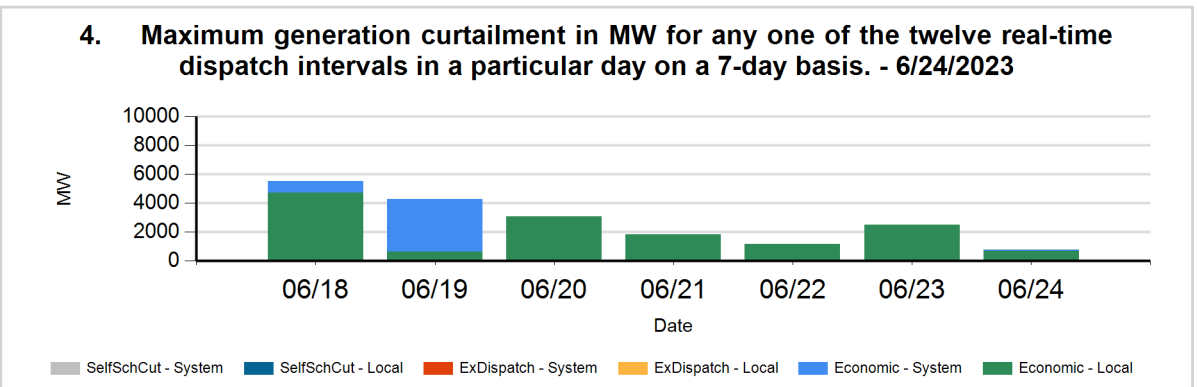
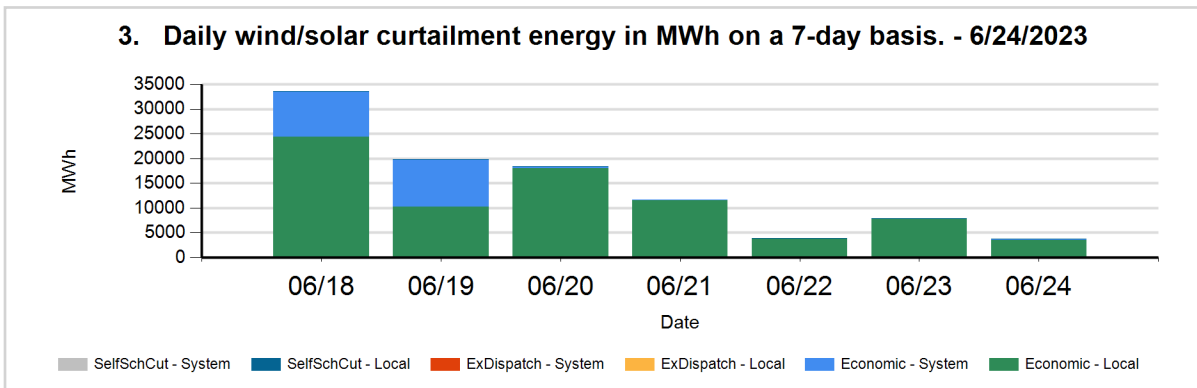
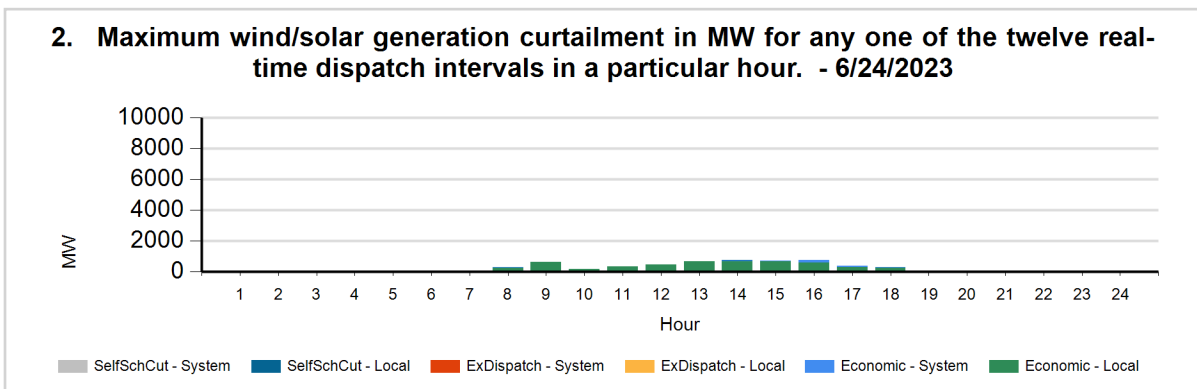
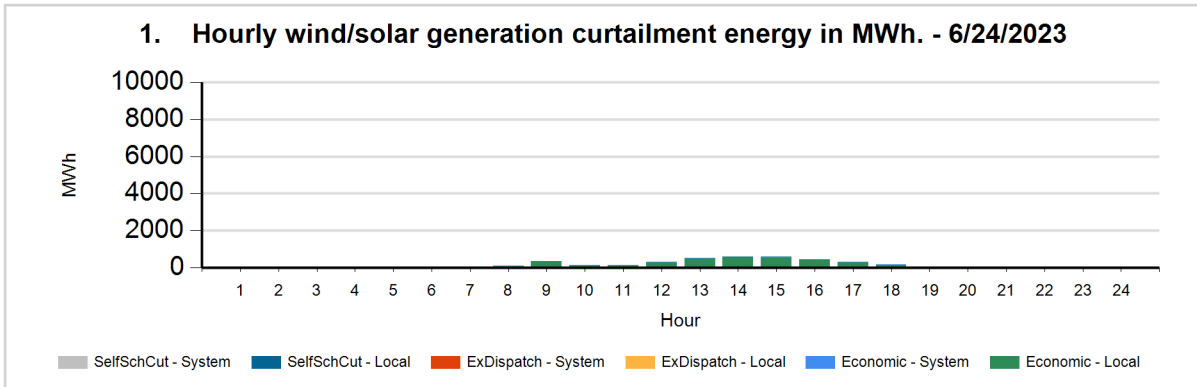
²The Renewables Watch report provides daily actual renewable production within the ISO grid. It is available at: <http://www.caiso.com/green/renewableswatch.html>.

³Congestion occurs when available, least-cost energy cannot be delivered to some loads because transmission facilities do not have sufficient capacity to deliver the energy.

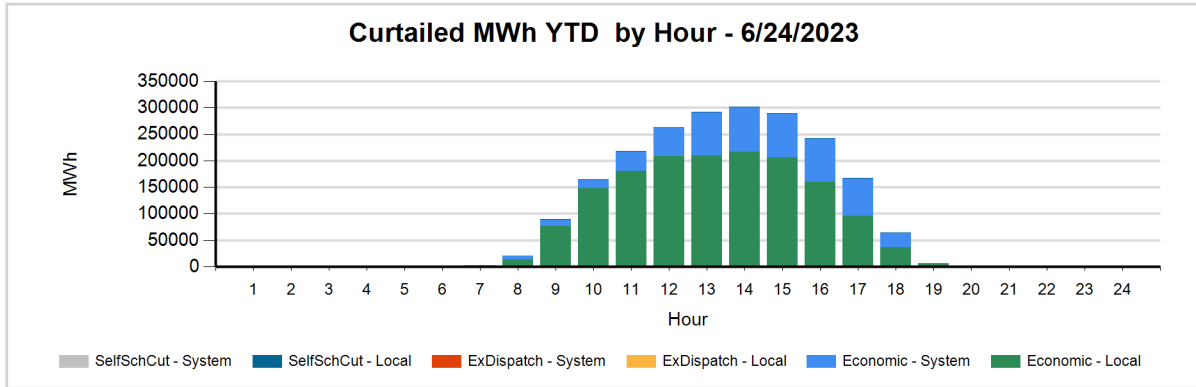
⁴For more information on oversupply conditions, please see:

https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables_FastFacts.pdf

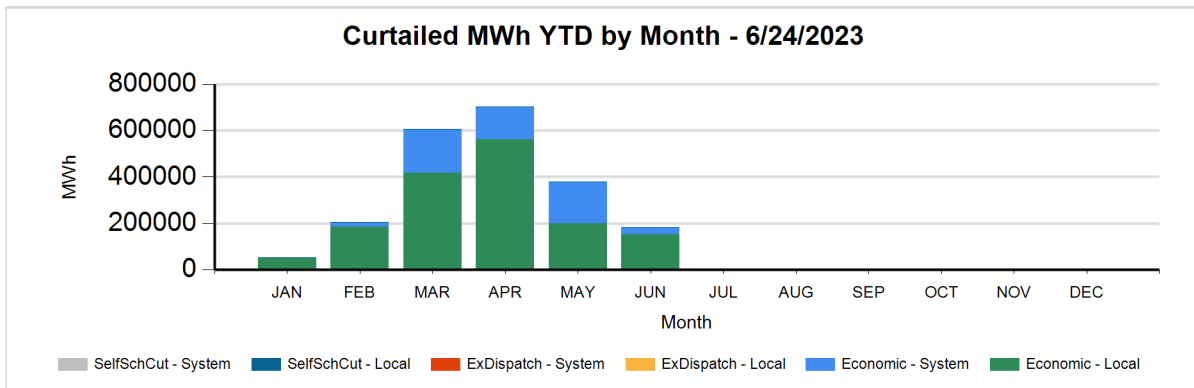
The following charts show the daily and 7-day wind and solar curtailment by category, if any.



The following charts show hourly year to date wind and solar curtailment by category, if any.



The following charts show monthly year to date wind and solar curtailment by category, if any.



TYPE	YTD CURTAILED MWH - 6/24/2023
LocalEconomic	1,563,400
LocalSelfSchCut	824
SystemEconomic	563,947
TOTAL	2,128,170

Data used to produce hourly chart

DATE	HOUR	CURT TYPE	REASON	FUEL TYPE	CURTAILED MWH	CURTAILED MW
06/24	1	Economic	Local	WIND	7	8
06/24	2	Economic	Local	WIND	5	8
06/24	3	Economic	Local	WIND	7	8
06/24	4	Economic	Local	WIND	7	7
06/24	5	Economic	Local	WIND	7	7
06/24	6	Economic	Local	WIND	7	7
06/24	7	Economic	Local	SOLR	3	
06/24	7	Economic	Local	WIND	7	7
06/24	7	Economic	System	SOLR	7	44
06/24	8	Economic	Local	SOLR	87	259
06/24	8	Economic	Local	WIND	19	44
06/24	8	Economic	System	SOLR	2	4
06/24	8	Economic	System	WIND	2	
06/24	9	Economic	Local	SOLR	291	558
06/24	9	Economic	Local	WIND	68	76
06/24	9	Economic	System	SOLR	0	
06/24	10	Economic	Local	SOLR	104	166
06/24	10	Economic	Local	WIND	12	8
06/24	10	Economic	System	SOLR	7	
06/24	10	Economic	System	WIND	4	
06/24	11	Economic	Local	SOLR	132	331
06/24	11	Economic	Local	WIND	8	9
06/24	11	Economic	System	SOLR	2	
06/24	11	Economic	System	WIND	1	
06/24	12	Economic	Local	SOLR	296	458
06/24	12	Economic	Local	WIND	10	9
06/24	12	Economic	System	WIND	1	
06/24	12	SelfSchCut	Local	SOLR	0	
06/24	13	Economic	Local	SOLR	446	590
06/24	13	Economic	Local	WIND	49	54
06/24	13	Economic	System	SOLR	13	

06/24	13	Economic	System	WIND	1	
06/24	13	SelfSchCut	Local	SOLR	0	
06/24	14	Economic	Local	SOLR	553	640
06/24	14	Economic	Local	WIND	16	35
06/24	14	Economic	System	SOLR	7	85
06/24	14	Economic	System	WIND	4	
06/24	14	SelfSchCut	Local	SOLR	3	4
06/24	15	Economic	Local	SOLR	488	650
06/24	15	Economic	Local	WIND	31	42
06/24	15	Economic	System	SOLR	50	
06/24	15	Economic	System	WIND	12	23
06/24	15	SelfSchCut	Local	SOLR	1	
06/24	16	Economic	Local	SOLR	400	567
06/24	16	Economic	System	SOLR	36	112
06/24	16	Economic	System	WIND	8	55
06/24	17	Economic	Local	SOLR	292	284
06/24	17	Economic	Local	WIND	0	
06/24	17	Economic	System	SOLR	18	78
06/24	17	Economic	System	WIND	1	5
06/24	18	Economic	Local	SOLR	153	232
06/24	18	Economic	Local	WIND	8	
06/24	18	Economic	System	SOLR	8	40
06/24	19	Economic	Local	SOLR	7	28
06/24	19	Economic	Local	WIND	9	
06/24	19	Economic	System	SOLR	0	3
06/24	19	Economic	System	WIND	1	15
06/24	20	Economic	Local	WIND	8	10
06/24	21	Economic	Local	WIND	5	6
06/24	21	Economic	System	SOLR	0	2
06/24	22	Economic	Local	WIND	5	5
06/24	23	Economic	Local	WIND	4	5
06/24	24	Economic	Local	WIND	4	5

The information contained in this report is preliminary and subject to change without notice. No inference, decision or conclusion should be made based on the information in this report or any series of these reports. All values are hourly average unless otherwise stated. Questions about this report should be directed to Short-Term Forecasting at ShortTermForecasting@caiso.com.

