

Wind and Solar Curtailment May 01, 2022

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.

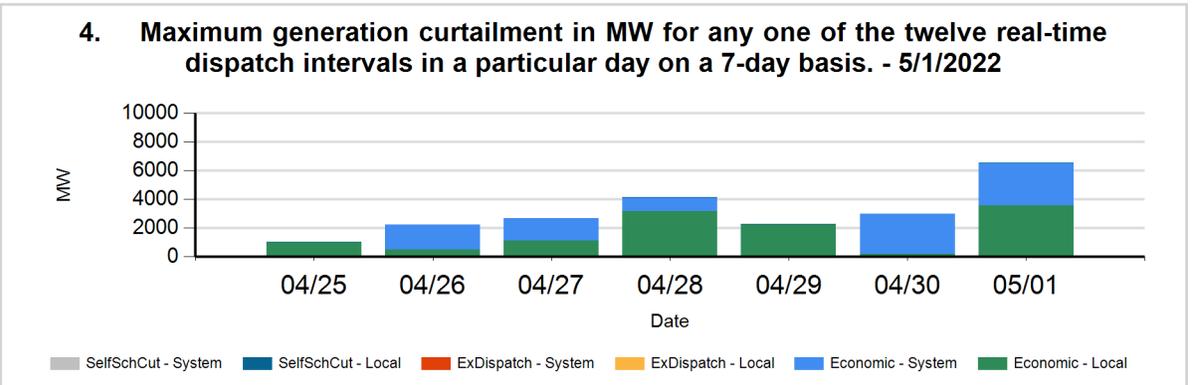
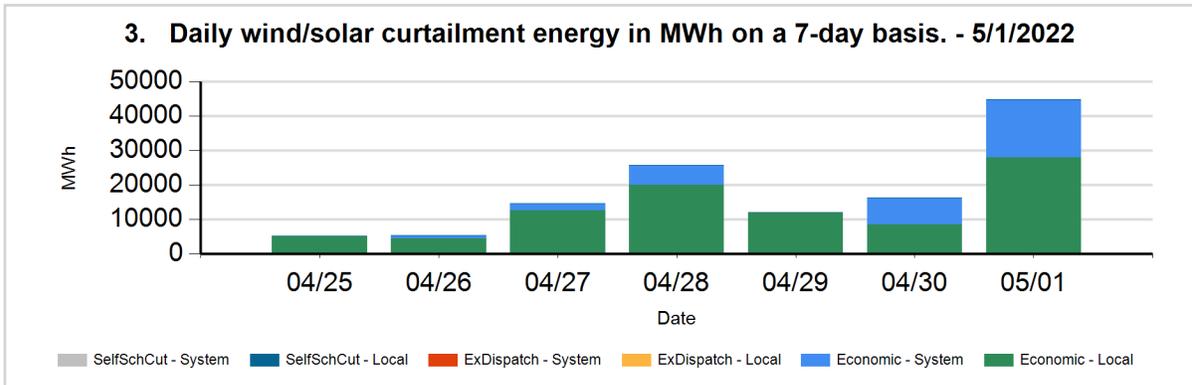
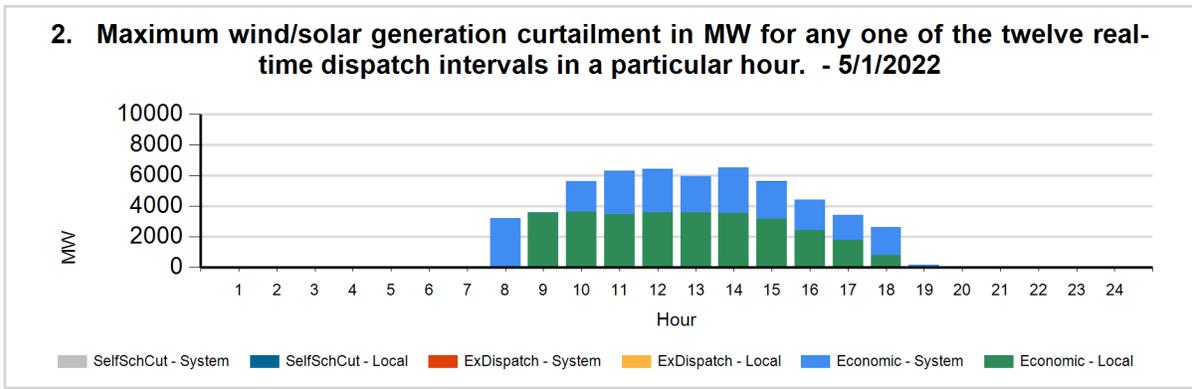
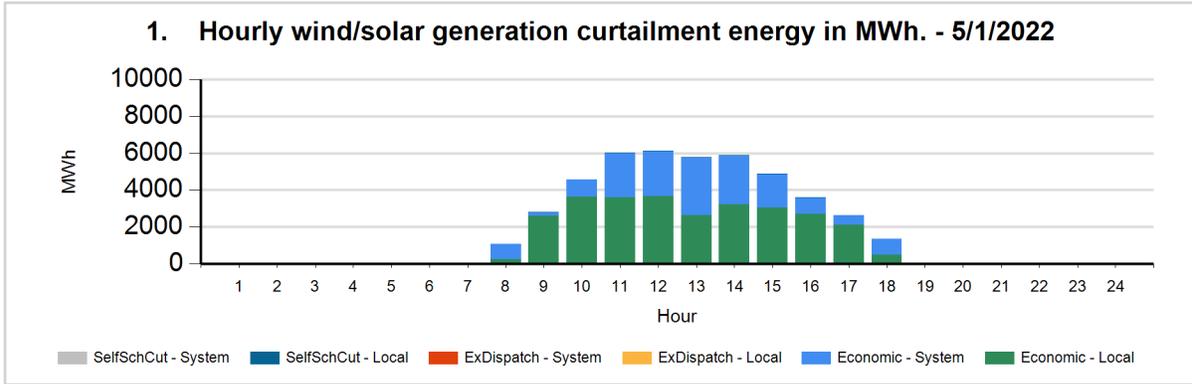
²The Renewables Watch report provides daily actual renewable production within the ISO grid. It is available at: <http://www.caiso.com/green/renewableswatch.html>.

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.

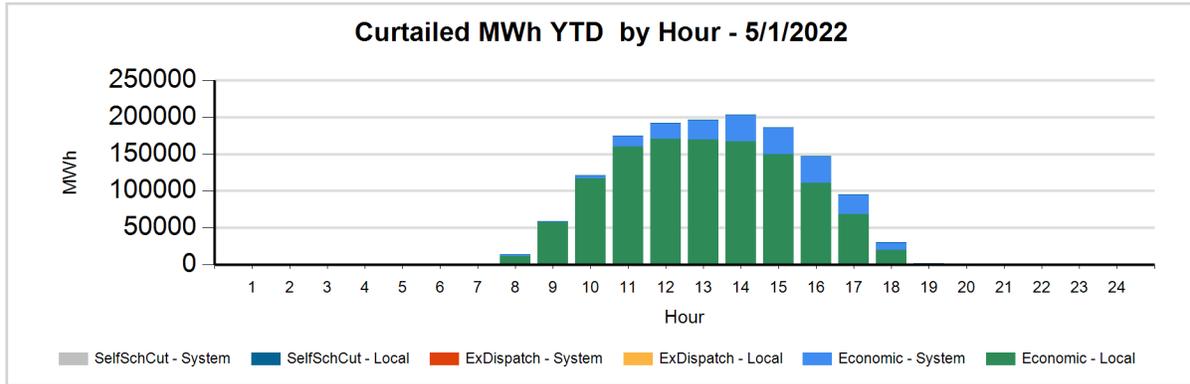
⁴For more information on oversupply conditions, please see:

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

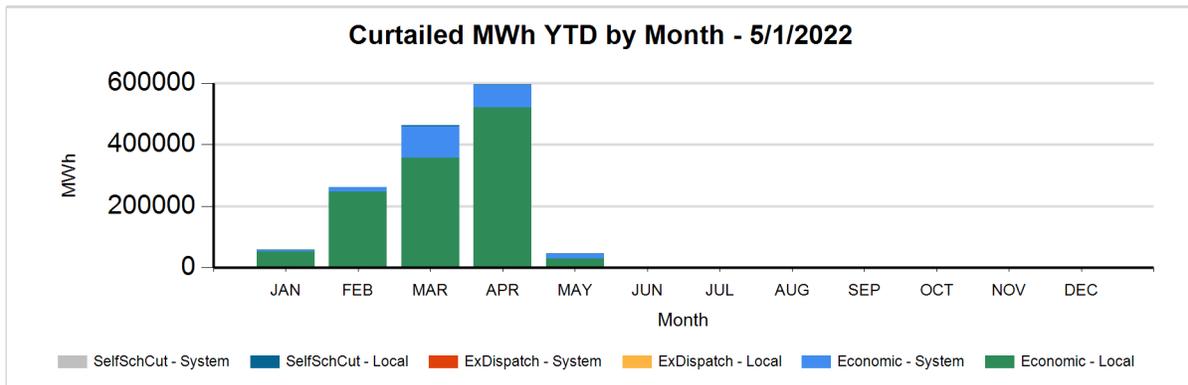
The following charts show the daily and 7-day wind and solar curtailment by category, if any.



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 - 5/1/2022
LocalEconomic	1,203,214
LocalSelfSchCut	4,363
SystemEconomic	216,240
TOTAL	1,423,817

Data used to produce hourly chart

DATE	HOUR	CURT TYPE	REASON	FUEL TYPE	CURTAILED MWH	CURTAILED MW
05/01	7	Economic	Local	SOLR	2	22
05/01	8	Economic	Local	SOLR	244	29
05/01	8	Economic	Local	WIND	2	
05/01	8	Economic	System	SOLR	813	3119
05/01	8	Economic	System	WIND	16	75
05/01	9	Economic	Local	SOLR	2545	3492
05/01	9	Economic	Local	WIND	30	75
05/01	9	Economic	System	SOLR	223	
05/01	9	Economic	System	WIND	9	29
05/01	9	SelfSchCut	Local	SOLR	1	1
05/01	10	Economic	Local	SOLR	3461	3373
05/01	10	Economic	Local	WIND	154	245
05/01	10	Economic	System	SOLR	911	1840
05/01	10	Economic	System	WIND	52	185
05/01	11	Economic	Local	SOLR	3364	3245
05/01	11	Economic	Local	WIND	222	226
05/01	11	Economic	System	SOLR	2119	2421
05/01	11	Economic	System	WIND	306	402
05/01	11	SelfSchCut	Local	SOLR	2	1
05/01	12	Economic	Local	SOLR	3468	3382
05/01	12	Economic	Local	WIND	195	218
05/01	12	Economic	System	SOLR	2166	2413
05/01	12	Economic	System	WIND	307	426
05/01	12	SelfSchCut	Local	SOLR	3	1
05/01	13	Economic	Local	SOLR	2466	3365
05/01	13	Economic	Local	WIND	158	209
05/01	13	Economic	System	SOLR	2822	2080
05/01	13	Economic	System	WIND	328	309
05/01	13	SelfSchCut	Local	SOLR	1	
05/01	14	Economic	Local	SOLR	3008	3253
05/01	14	Economic	Local	WIND	209	306

05/01	14	Economic	System	SOLR	2429	2694
05/01	14	Economic	System	WIND	243	253
05/01	14	SelfSchCut	Local	SOLR	1	1
05/01	15	Economic	Local	SOLR	2944	2921
05/01	15	Economic	Local	WIND	106	260
05/01	15	Economic	System	SOLR	1799	2294
05/01	15	Economic	System	WIND	44	166
05/01	15	SelfSchCut	Local	SOLR	1	1
05/01	16	Economic	Local	SOLR	2707	2411
05/01	16	Economic	System	SOLR	863	1964
05/01	16	Economic	System	WIND	26	33
05/01	16	SelfSchCut	Local	SOLR	1	
05/01	17	Economic	Local	SOLR	2087	1781
05/01	17	Economic	Local	WIND	6	
05/01	17	Economic	System	SOLR	526	1622
05/01	17	Economic	System	WIND	14	34
05/01	18	Economic	Local	SOLR	476	779
05/01	18	Economic	Local	WIND	1	
05/01	18	Economic	System	SOLR	846	1803
05/01	18	Economic	System	WIND	21	41
05/01	19	Economic	Local	SOLR	19	38
05/01	19	Economic	System	SOLR	17	134

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.