

## Wind and Solar Curtailment May 29, 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 congestion<sup>3</sup>.
- 2. Economic System: Market dispatch of generators with economic bids to mitigate system-wide oversupply.
- 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.

<sup>1</sup>Only 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.

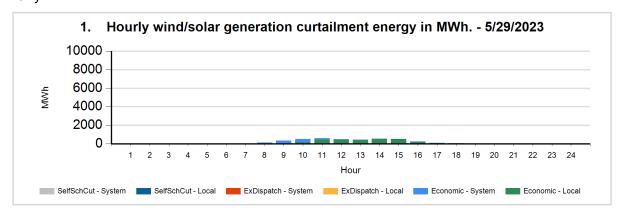
<sup>2</sup>The Renewables Watch report provides daily actual renewable production within the ISO grid. It is available at: <a href="http://www.caiso.com/green/renewableswatch.html">http://www.caiso.com/green/renewableswatch.html</a>.

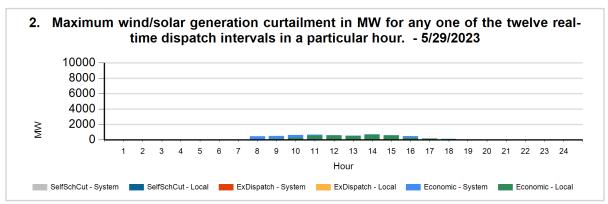
<sup>3</sup>Congestion occurs when available, least-cost energy cannot be delivered to some loads because transmission facilities do not have sufficient capacity to deliver the energy.

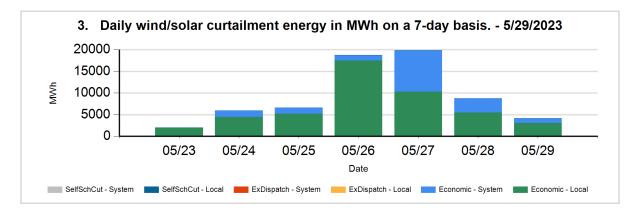
For more information on oversupply conditions, please see: https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables FastFacts.pdf

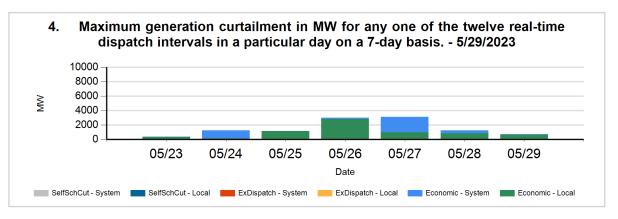


The following charts show the daily and 7-day wind and solar curtailment by category, if any.



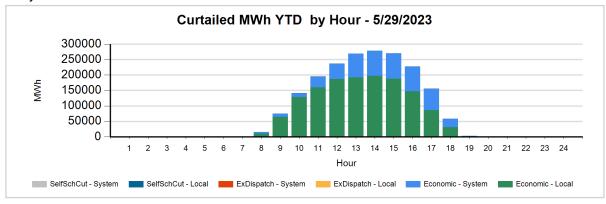




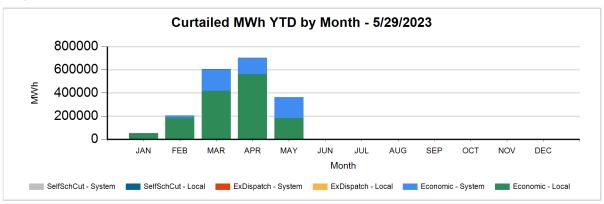




The following charts show hourly year to date wind and solar curtailment by category, if any.



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



TYPE	YTD CURTAILED MWH - 5/29/2023
LocalEconomic	1,396,199
LocalSelfSchCut	549
SystemEconomic	532,626
TOTAL	1,929,374



## Data used to produce hourly chart

DATE	HOU R	CURT TYPE	REASON	FUEL TYPE	CURTAILED MWH	CURTAILED MW
05/29	1	Economic	Local	WIND	12	13
05/29	2	Economic	Local	WIND	20	38
05/29	3	Economic	Local	WIND	14	16
05/29	4	Economic	Local	WIND	12	12
05/29	5	Economic	Local	WIND	12	12
05/29	6	Economic	Local	WIND	11	12
05/29	7	Economic	Local	WIND	8	
05/29	7	Economic	System	SOLR	3	17
05/29	7	Economic	System	WIND	10	30
05/29	8	Economic	Local	SOLR	30	
05/29	8	Economic	Local	WIND	14	
05/29	8	Economic	System	SOLR	60	351
05/29	8	Economic	System	WIND	30	112
05/29	9	Economic	Local	SOLR	35	109
05/29	9	Economic	System	SOLR	209	260
05/29	9	Economic	System	WIND	114	115
05/29	10	Economic	Local	SOLR	160	260
05/29	10	Economic	System	SOLR	227	267
05/29	10	Economic	System	WIND	114	114
05/29	11	Economic	Local	SOLR	439	527
05/29	11	Economic	System	SOLR	44	29
05/29	11	Economic	System	WIND	101	110
05/29	11	SelfSchCut	Local	SOLR	1	
05/29	12	Economic	Local	SOLR	432	526
05/29	12	Economic	Local	WIND	1	
05/29	12	Economic	System	SOLR	25	18
05/29	12	Economic	System	WIND	32	38
05/29	12	SelfSchCut	Local	SOLR	1	3
05/29	13	Economic	Local	SOLR	431	541
05/29	13	Economic	Local	WIND	0	
05/29	13	Economic	System	SOLR	11	



05/29	13	Economic	System	WIND	5	3
05/29	14	Economic	Local	SOLR	525	696
05/29	14	Economic	System	SOLR	21	9
05/29	14	Economic	System	WIND	18	
05/29	14	SelfSchCut	Local	SOLR	0	
05/29	15	Economic	Local	SOLR	492	561
05/29	15	Economic	System	SOLR	19	9
05/29	15	Economic	System	WIND	3	
05/29	15	SelfSchCut	Local	SOLR	1	2
05/29	16	Economic	Local	SOLR	154	206
05/29	16	Economic	Local	WIND	3	
05/29	16	Economic	System	SOLR	53	171
05/29	16	Economic	System	WIND	16	54
05/29	16	SelfSchCut	Local	SOLR	1	9
05/29	17	Economic	Local	SOLR	87	161
05/29	17	Economic	Local	WIND	8	
05/29	17	Economic	System	SOLR	2	
05/29	17	Economic	System	WIND	1	
05/29	18	Economic	Local	SOLR	29	47
05/29	18	Economic	Local	WIND	15	15
05/29	18	Economic	System	SOLR	8	39
05/29	19	Economic	Local	SOLR	0	5
05/29	19	Economic	Local	WIND	17	17
05/29	19	Economic	System	SOLR	0	2
05/29	20	Economic	Local	WIND	14	14
05/29	20	Economic	System	SOLR	1	6
05/29	21	Economic	Local	WIND	13	13
05/29	22	Economic	Local	WIND	13	13
05/29	23	Economic	Local	WIND	13	13
05/29	24	Economic	Local	WIND	12	13

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.

