

Wind and Solar Curtailment June 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 congestion³.
- 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.

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.

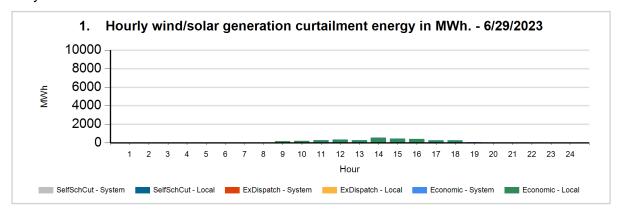
²The Renewables Watch report provides daily actual renewable production within the ISO grid. It is available at: http://www.caiso.com/green/renewableswatch.html.

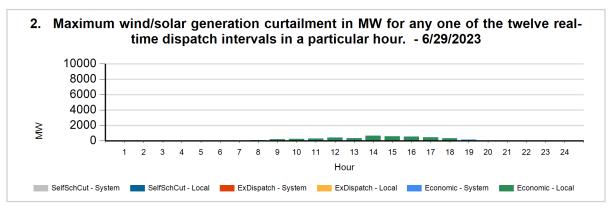
³Congestion occurs when available, least-cost energy cannot be delivered to some loads because transmission facilities do not have sufficient capacity to deliver the energy.

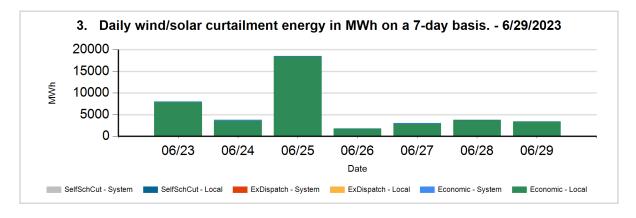
For more information on oversupply conditions, please see: https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables FastFacts.pdf

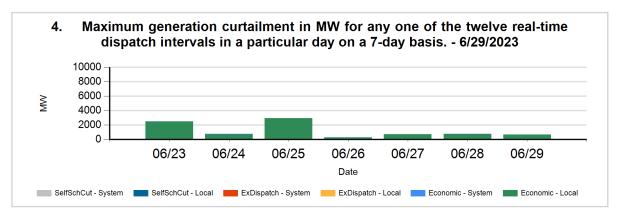


The following charts show the daily and 7-day wind and solar curtailment by category, if any.



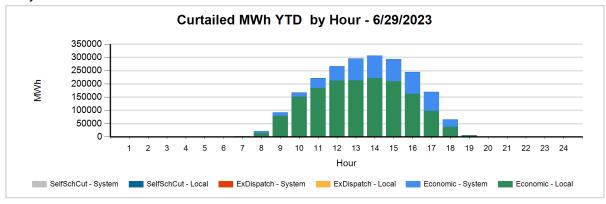




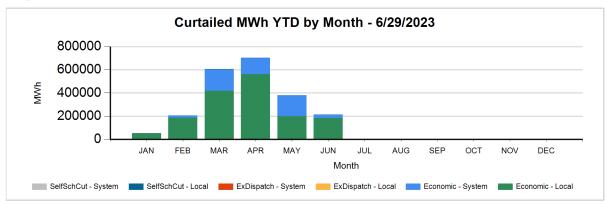




The following charts show hourly year to date wind and solar curtailment by category, if any.



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



TYPE	YTD CURTAILED MWH - 6/29/2023
LocalEconomic	1,593,343
LocalSelfSchCut	864
SystemEconomic	564,426
TOTAL	2,158,633



Data used to produce hourly chart

DATE	HOU R	CURT TYPE	REASON	FUEL TYPE	CURTAILED MWH	CURTAILED MW
06/29	1	Economic	Local	WIND	10	10
06/29	2	Economic	Local	WIND	10	10
06/29	3	Economic	Local	WIND	9	9
06/29	4	Economic	Local	WIND	8	10
06/29	5	Economic	Local	WIND	8	9
06/29	6	Economic	Local	WIND	7	9
06/29	7	Economic	Local	SOLR	4	
06/29	7	Economic	Local	WIND	1	
06/29	7	Economic	System	SOLR	7	33
06/29	7	Economic	System	WIND	0	
06/29	8	Economic	Local	SOLR	13	62
06/29	8	Economic	System	SOLR	5	
06/29	9	Economic	Local	SOLR	160	214
06/29	9	Economic	Local	WIND	3	
06/29	10	Economic	Local	SOLR	204	237
06/29	11	Economic	Local	SOLR	279	290
06/29	11	SelfSchCut	Local	SOLR	1	3
06/29	12	Economic	Local	SOLR	354	387
06/29	12	SelfSchCut	Local	SOLR	1	6
06/29	13	Economic	Local	SOLR	287	330
06/29	13	SelfSchCut	Local	SOLR	2	4
06/29	14	Economic	Local	SOLR	485	606
06/29	14	Economic	Local	WIND	70	68
06/29	14	SelfSchCut	Local	SOLR	2	
06/29	15	Economic	Local	SOLR	398	549
06/29	15	Economic	Local	WIND	32	48
06/29	15	SelfSchCut	Local	SOLR	2	
06/29	16	Economic	Local	SOLR	369	505
06/29	16	Economic	Local	WIND	45	50
06/29	16	SelfSchCut	Local	SOLR	0	2
06/29	17	Economic	Local	SOLR	265	440



06/29	17	Economic	Local	WIND	5	11
06/29	17	Economic	System	SOLR	2	
06/29	18	Economic	Local	SOLR	226	329
06/29	18	Economic	Local	WIND	4	19
06/29	18	Economic	System	SOLR	46	
06/29	19	Economic	Local	SOLR	27	64
06/29	19	Economic	System	SOLR	26	109
06/29	20	Economic	Local	WIND	4	14
06/29	21	Economic	Local	WIND	8	10
06/29	22	Economic	Local	WIND	5	8
06/29	23	Economic	Local	WIND	0	3
06/29	23	Economic	System	WIND	0	

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.