

Wind and Solar Curtailment March 26, 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 systemwide 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.

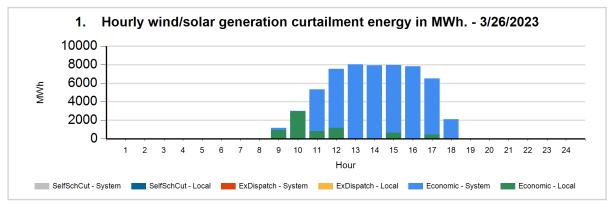
²The Renewables Watch report provides daily actual renewable production within the ISO grid. It is available at: <u>http://www.caiso.com/green/renewableswatch.html</u>.

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: <u>https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables_FastFacts.pdf</u>



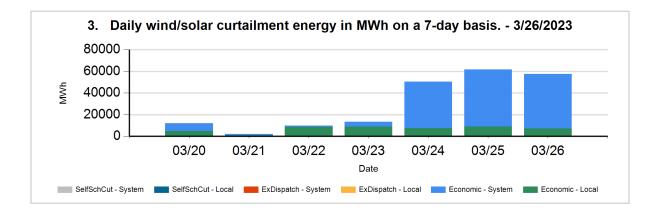
The following charts show the daily and 7-day wind and solar curtailment by category, if any.



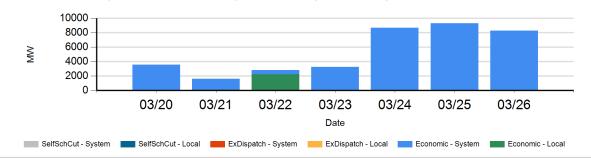
2. Maximum wind/solar generation curtailment in MW for any one of the twelve realtime dispatch intervals in a particular hour. - 3/26/2023 MΜ Hour

Economic - Local

🗾 SelfSchCut - System 🗾 SelfSchCut - Local 🗾 ExDispatch - System 📒 ExDispatch - Local 🗾 Economic - System

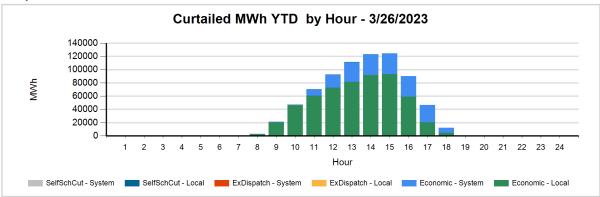


4. Maximum generation curtailment in MW for any one of the twelve real-time dispatch intervals in a particular day on a 7-day basis. - 3/26/2023

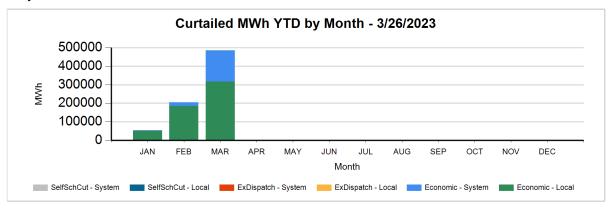




The following charts show hourly year to date wind and solar curtailment by category, if any.



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



TYPE	YTD CURTAILED MWH - 3/26/2023
LocalEconomic	551,703
LocalSelfSchCut	12
SystemEconomic	190,675
TOTAL	742,390



Data used to produce hourly chart

DATE	HOU R	CURT TYPE	REASON	FUEL TYPE	CURTAILED MWH	CURTAILED MW
03/26	8	Economic	System	SOLR	11	34
03/26	9	Economic	Local	SOLR	916	2802
03/26	9	Economic	Local	WIND	24	63
03/26	9	Economic	System	SOLR	236	
03/26	9	Economic	System	WIND	5	
03/26	10	Economic	Local	SOLR	2886	3891
03/26	10	Economic	Local	WIND	116	205
03/26	10	Economic	System	SOLR	0	3
03/26	10	Economic	System	WIND	0	1
03/26	11	Economic	Local	SOLR	754	5982
03/26	11	Economic	Local	WIND	56	389
03/26	11	Economic	System	SOLR	4300	
03/26	11	Economic	System	WIND	210	
03/26	12	Economic	Local	SOLR	1114	
03/26	12	Economic	Local	WIND	63	
03/26	12	Economic	System	SOLR	6003	7644
03/26	12	Economic	System	WIND	355	455
03/26	13	Economic	System	SOLR	7571	7778
03/26	13	Economic	System	WIND	462	475
03/26	14	Economic	System	SOLR	7415	7472
03/26	14	Economic	System	WIND	524	552
03/26	15	Economic	Local	SOLR	610	
03/26	15	Economic	Local	WIND	45	
03/26	15	Economic	System	SOLR	6804	7552
03/26	15	Economic	System	WIND	508	570
03/26	16	Economic	System	SOLR	7288	7487
03/26	16	Economic	System	WIND	524	519
03/26	17	Economic	Local	SOLR	419	
03/26	17	Economic	Local	WIND	33	
03/26	17	Economic	System	SOLR	5606	7444
03/26	17	Economic	System	WIND	435	555



03/26	18	Economic	Local	SOLR	50	50
03/26	18	Economic	Local	WIND	1	
03/26	18	Economic	System	SOLR	1910	4182
03/26	18	Economic	System	WIND	148	375
03/26	19	Economic	Local	SOLR	3	17

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.