

Wind and Solar Curtailment March 13, 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 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.

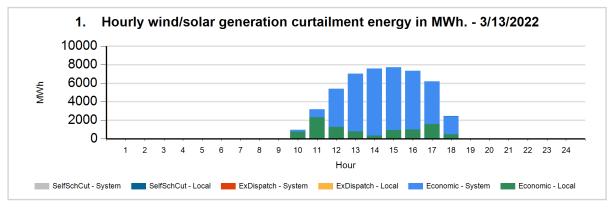
²The Renewables Watch report provides daily actual renewable production within the ISO grid. It is available at: <u>http://www.caiso.com/green/renewableswatch.html</u>.

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.

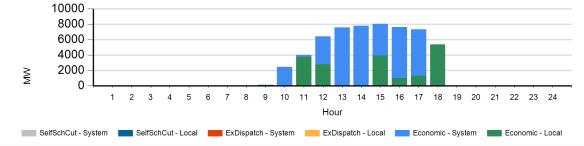
For more information on oversupply conditions, please see: <u>https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables_FastFacts.pdf</u>

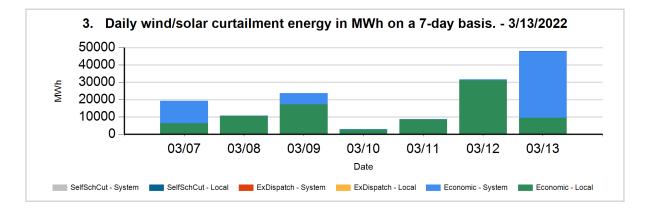


The following charts show the daily and 7-day wind and solar curtailment by category, if any.

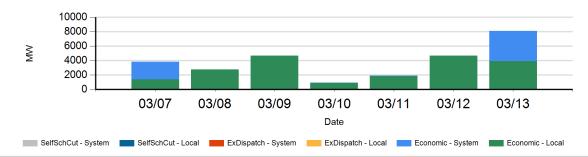


2. Maximum wind/solar generation curtailment in MW for any one of the twelve realtime dispatch intervals in a particular hour. - 3/13/2022



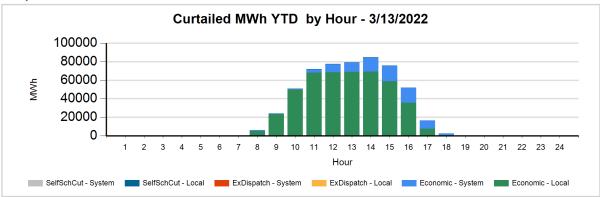


4. Maximum generation curtailment in MW for any one of the twelve real-time dispatch intervals in a particular day on a 7-day basis. - 3/13/2022

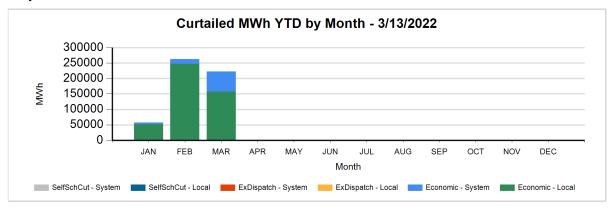




The following charts show hourly year to date wind and solar curtailment by category, if any.



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



TYPE	YTD CURTAILED MWH - 3/13/2022
LocalEconomic	455,868
LocalSelfSchCut	65
SystemEconomic	85,524
TOTAL	541,457



Data used to produce hourly chart

TAILED MW	CURTAILED MWH	FUEL TYPE	REASON	J CURT TYPE	HOU R	DATE
22	2	WIND	System	1 Economic	1	03/13
4	0	SOLR	System	8 Economic	8	03/13
103	30	SOLR	Local	9 Economic	9	03/13
	729	SOLR	Local	10 Economic	10	03/13
	20	WIND	Local	10 Economic	10	03/13
2464	207	SOLR	System	10 Economic	10	03/13
9	1	WIND	System	10 Economic	10	03/13
350	2190	SOLR	Local	11 Economic	11	03/13
25	120	WIND	Local	11 Economic	11	03/13
240	855	SOLR	System	11 Economic	11	03/13
	28	WIND	System	11 Economic	11	03/13
265	1218	SOLR	Local	12 Economic	12	03/13
140	51	WIND	Local	12 Economic	12	03/13
3222	3678	SOLR	System	12 Economic	12	03/13
424	453	WIND	System	12 Economic	12	03/13
	761	SOLR	Local	13 Economic	13	03/13
	36	WIND	Local	13 Economic	13	03/13
697	5696	SOLR	System	13 Economic	13	03/13
60	536	WIND	System	13 Economic	13	03/13
	318	SOLR	Local	14 Economic	14	03/13
	25	WIND	Local	14 Economic	14	03/13
7193	6653	SOLR	System	14 Economic	14	03/13
608	573	WIND	System	14 Economic	14	03/13
3712	888	SOLR	Local	15 Economic	15	03/13
209	57	WIND	Local	15 Economic	15	03/13
353	6170	SOLR	System	15 Economic	15	03/13
61	601	WIND	System	15 Economic	15	03/13
93	924	SOLR	Local	16 Economic	16	03/13
62	60	WIND	Local	16 Economic	16	03/13
6009	5753	SOLR	System	16 Economic	16	03/13
60	592	WIND	System	16 Economic	16	03/13



03/13	17	Economic	Local	SOLR	1506	1274
03/13	17	Economic	Local	WIND	74	28
03/13	17	Economic	System	SOLR	4179	5488
03/13	17	Economic	System	WIND	447	568
03/13	18	Economic	Local	SOLR	419	4835
03/13	18	Economic	Local	WIND	46	542
03/13	18	Economic	System	SOLR	1819	
03/13	18	Economic	System	WIND	181	
03/13	18	SelfSchCut	Local	SOLR	1	
03/13	19	Economic	Local	SOLR	0	
03/13	19	Economic	System	SOLR	3	41
03/13	19	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.