

## Wind and Solar Curtailment March 01, 2020

This report is produced daily to provide a detailed accounting of the wind and solar renewable generation that was curtailed and the reasons why<sup>1</sup>. This report should be read in the context of the Renewables Watch report for a more complete understanding of both renewable curtailment and generation<sup>2</sup>.

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<sup>4</sup>.
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.

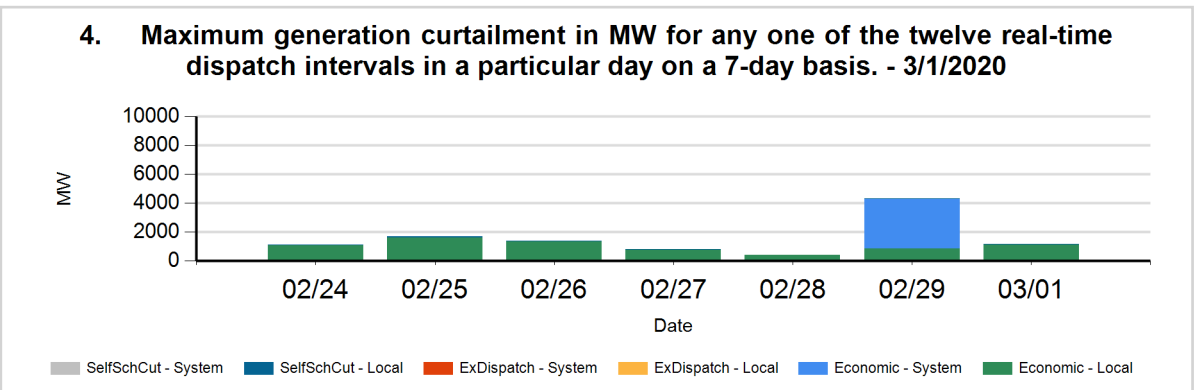
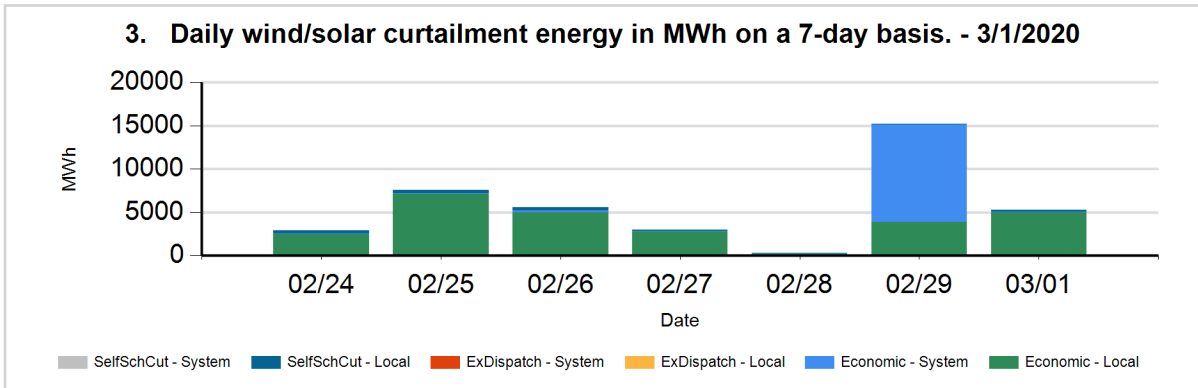
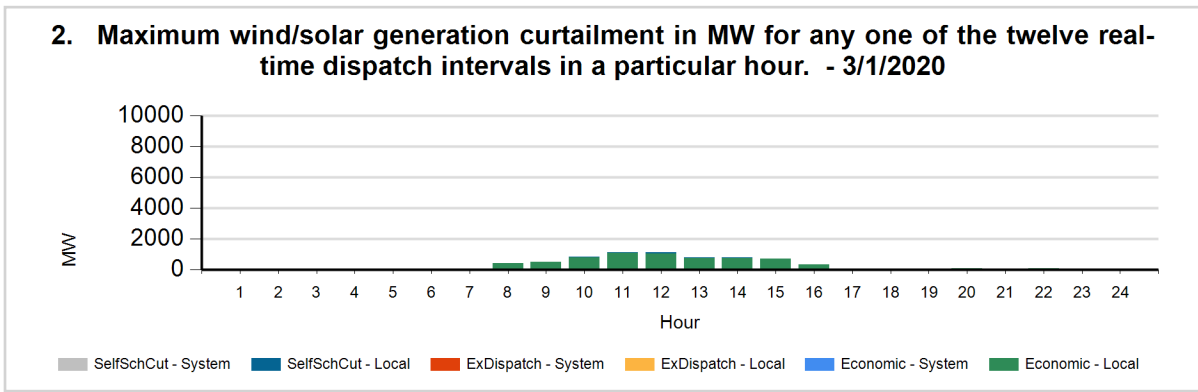
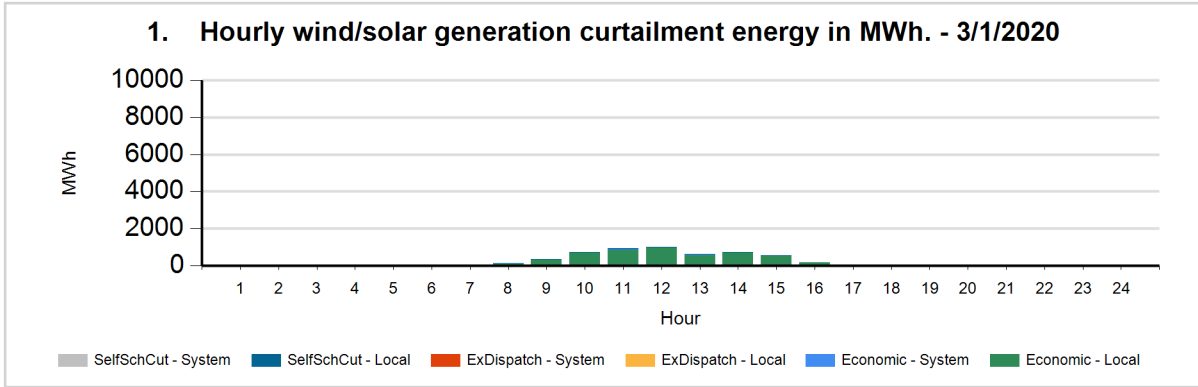
<sup>1</sup>Only wind and solar resources can be reported in this manner because these resources have a forecast. Curtailment is defined as the difference between actual production and the forecast when actual production is less than the forecast.

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

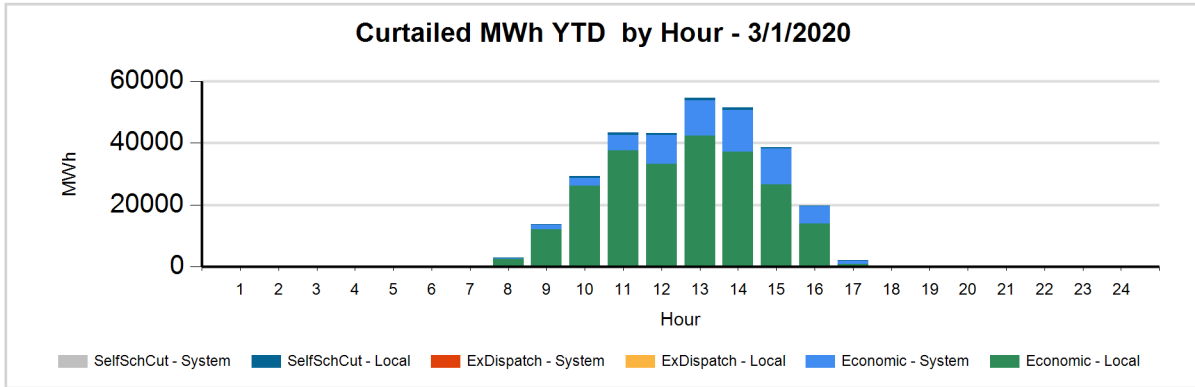
<sup>3</sup>Congestion occurs when available, least-cost energy cannot be delivered to some loads because transmission facilities do not have sufficient capacity to deliver the energy.

<sup>4</sup>For more information on oversupply conditions, please see: [https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables\\_FastFacts.pdf](https://www.caiso.com/Documents/FlexibleResourcesHelpRenewables_FastFacts.pdf)

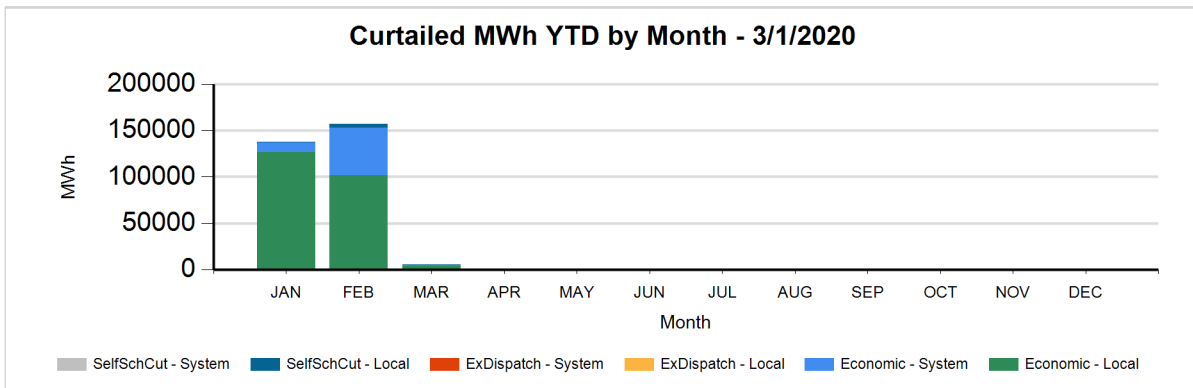
The following charts show the daily and 7-day wind and solar curtailment by category, if any.



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 - 3/1/2020
LocalEconomic	233,266
LocalSelfSchCut	4,910
SystemEconomic	62,147
TOTAL	300,323

**Data used to produce hourly chart**

DATE	HOUR	CURT TYPE	REASON	FUEL TYPE	CURTAILED MWH	CURTAILED MW
03/01	7	Economic	Local	SOLR	1	8
03/01	7	Economic	System	SOLR	0	
03/01	8	Economic	Local	SOLR	94	246
03/01	8	Economic	Local	WIND	44	155
03/01	8	Economic	System	SOLR	3	
03/01	9	Economic	Local	SOLR	144	283
03/01	9	Economic	Local	WIND	172	194
03/01	9	Economic	System	SOLR	9	
03/01	9	SelfSchCut	Local	SOLR	2	
03/01	10	Economic	Local	SOLR	485	586
03/01	10	Economic	Local	WIND	207	207
03/01	10	SelfSchCut	Local	SOLR	33	42
03/01	11	Economic	Local	SOLR	695	850
03/01	11	Economic	Local	WIND	169	242
03/01	11	Economic	System	SOLR	6	
03/01	11	SelfSchCut	Local	SOLR	45	46
03/01	12	Economic	Local	SOLR	739	821
03/01	12	Economic	Local	WIND	211	234
03/01	12	SelfSchCut	Local	SOLR	49	51
03/01	13	Economic	Local	SOLR	455	503
03/01	13	Economic	Local	WIND	134	234
03/01	13	Economic	System	SOLR	2	
03/01	13	SelfSchCut	Local	SOLR	40	42
03/01	14	Economic	Local	SOLR	479	504
03/01	14	Economic	Local	WIND	224	246
03/01	14	Economic	System	SOLR	4	
03/01	14	SelfSchCut	Local	SOLR	30	24
03/01	15	Economic	Local	SOLR	468	551
03/01	15	Economic	Local	WIND	80	140
03/01	15	Economic	System	SOLR	3	
03/01	15	SelfSchCut	Local	SOLR	6	

03/01	16	Economic	Local	SOLR	135	310
03/01	16	Economic	Local	WIND	20	16
03/01	16	Economic	System	SOLR	0	
03/01	20	Economic	Local	WIND	30	64
03/01	21	Economic	Local	WIND	5	12
03/01	22	Economic	Local	WIND	38	68
03/01	24	Economic	Local	WIND	1	5

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](mailto:ShortTermForecasting@caiso.com).