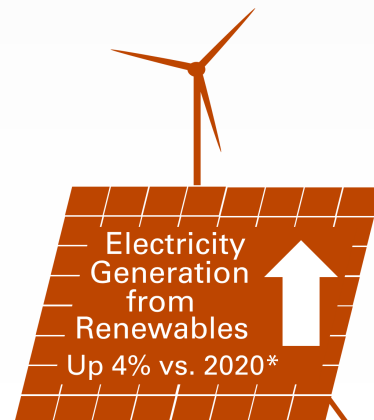
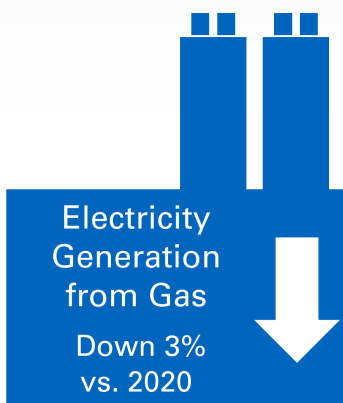
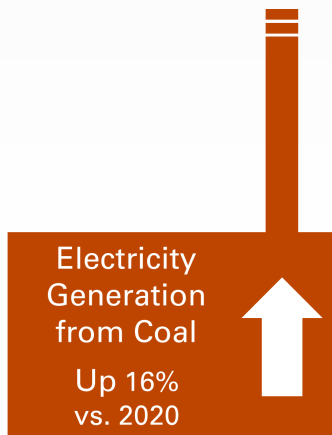
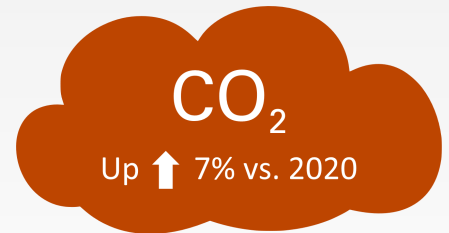
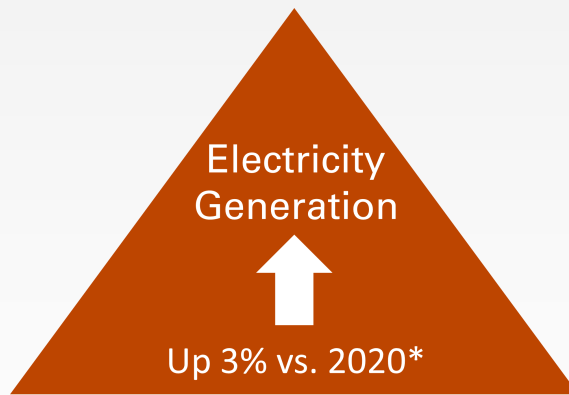
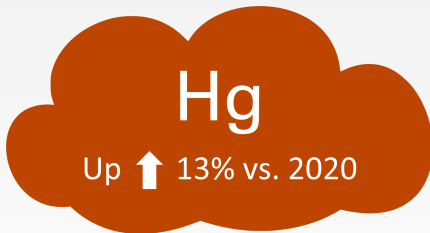
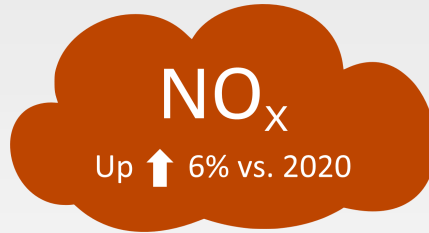
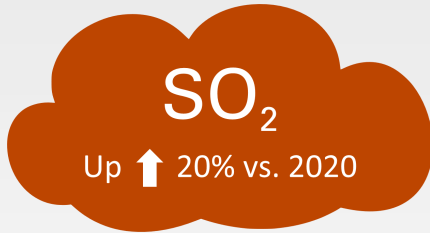




Power Plant Data Highlights 2021 Data



EPA 2021 power plant data show that emissions of nitrogen oxides (NO_x), sulfur dioxide (SO₂), carbon dioxide (CO₂), and mercury (Hg) increased from 2020 levels, but are still below 2019 pre-COVID levels.

*Based on EIA data for the first 11 months of 2021

Emissions and Electricity Generation Data

Emissions	2016	2017	2018	2019	2020	2021	2016 to 2021 Change
Annual SO ₂ (million tons)	1.49	1.34	1.26	0.97	0.79	0.94	-37%
Annual NO _x (million tons)	1.20	1.07	1.03	0.88	0.74	0.78	-35%
CSAPR Update Ozone Season NO _x (million tons)	0.37	0.29	0.29	0.25	0.23	0.24	-37%
Annual Hg (tons)	N/A [†]	4.2	3.7	3.2	2.6	3.0	-29% [†]
Annual CO ₂ (billion tons)	1.99	1.92	1.93	1.77	1.59	1.70	-15%

[†]Complete data before 2017 not available

Generation (billion MWh)	2016	2017	2018	2019	2020	2021	2016 to 2021 Change
Coal Generation	1.32	1.29	1.23	1.03	0.83	0.96	-27%
Gas Generation	1.24	1.18	1.36	1.48	1.52	1.47	+18%
Renewable Generation*	0.61	0.69	0.71	0.73	0.79	*	+36%*
Gross Generation*	4.08	4.03	4.18	4.13	4.01	*	+1%*

*Based on EIA data for the first 11 months of 2021

EPA's Clean Air Markets Division (CAMD) collects detailed emissions data and other operating information from power plants across the country under the Acid Rain Program (ARP), the Cross-State Air Pollution Rule (CSAPR), the CSAPR update, and the Mercury and Air Toxics Standards (MATS). CAMD updates summary emissions data every quarter and offers interactive tools to provide the public with access to high quality, relevant information.

Data Tools and Resources

[Trends in Power Plant Emissions](#)

[Power Generation Data](#)

[Hourly Power Plant Data](#)

[Local Fuel Mix and Emission Rates](#)