Pennsylvania

PJM System-Wide Generation Fuel Mix

Percentage of total

100%

6.77%

Power Sources	r Sources
---------------	-----------

Sources of electricity for all Direct Energy customers in the reporting period 1/1/2022 - 12/31/2022 was met by generation from the following sources:

Sources of electricity supplied for the 12 months ending 12/31/2022.

oal	20.1600
Dil	0.2200
Natural Gas	40.0800
Nuclear	32.6900
Hydro	0.0000
*Biomass	0.0000
*Captured Methane Gas	0.2100
*Solar Voltaic	0.1100
*Solid Waste	0.4800
*Water	0.9900
*Wind	3.7900
*Wood/Wood Waster	0.1900

Air Emissions

Carbon dioxide (CO2), nitrogen oxides (NOx), and sulfur dioxide (SOx) emission rates for the PJM Region.

PJM SYSTEM MIX - Emissions

*Renewable Energy Resources Subtotal:

Source

Total:

Emission Type	Lbs. per MWH	Percentage of PJM Regional Average
Carbon Dioxide	810.8353	100%
Nitrogen Oxides	0.3311	100%
Sulfur Dioxide	0.4416	100%

The benchmark emission levels that are shown approximate the emission rate for all electricity generation in the PJM region. Data used to calculate the emission profile came from generator owner-entered values, EPA generator-specific emission factors based on 2004/2005 CEMS data, EPA plant emission factors from eGRID or fuel type default. CO is a "greenhouse gas" which may contribute to global climate change. SO and NOx released into the atmosphere react to form acid rain. Nitrogen Oxides also react to form ground level ozone, an unhealthful component of "smog."

One hundred percent of the total electricity supplied was purchased from other suppliers and the amount of nuclear waste attributable to producing this electricity is not known and is not included in this table.

