

How polluting is Covanta's trash incinerator in Camden?

The "Covanta Camden Energy Recovery Center" in Camden, NJ is a trash incinerator privately-owned and operated by Covanta, the nation's largest trash incineration corporation.

EPA's National Emissions Inventory¹ of 43 industrial air polluters in Camden County, shows that Covanta's incinerator is the #1 industrial air polluter in Camden County. The latest data, from 2017, shows:

Pollutant	Rank in County	% of total	Pounds (except CO ₂)	Health Effects
Global Warming Pollution (in tons of CO ₂ equivalents)	1	49%	434,464	Extreme weather, disease, crop damage, species extinction
Nitrogen Oxides (NOx)	1	81%	751,520	Triggers asthma attacks, chronic respiratory disease and stroke
Sulfur Dioxide (SO ₂)	1	90%	144,480	Triggers asthma attacks; chronic respiratory and heart diseases; stroke
Carbon Monoxide (CO)	1	24%	71,520	Headaches, dizziness; increases lifetime risk of heart disease
Hydrochloric Acid	1	91%	65,662	Irritates eyes, skin, and nose, damages lungs
Particulate Matter (PM)	1	45%	51,320	Heart attacks, stroke, irregular heartbeat, aggravated asthma, decreased lung function, difficulty breathing
Fine Particulate Matter (PM _{2.5})	1	59%	51,320	Same as above, but worse, get deep into lungs and into blood stream
Ammonia	2	21%	7,560	Nose and throat irritation
Volatile Organic Compounds (VOCs)	19	1%	3,180	Eye, nose and throat irritation, headaches, loss of coordination and nausea, liver, kidney and central nervous system damage, cancer
Lead	1	89%	260	Damages nervous system and kidneys, lowers IQ, increases likelihood of antisocial behavior
Cadmium	1	99%	32	Kidney disease; lung cancer
Nickel	1	99%	22	Birth defects; lung, nose, larynx, and prostate cancers,
Mercury	1	88%	12	Damage to nervous, digestive, and immune systems, lowers IQ
Arsenic	1	99%	3	Lung, skin, bladder, and liver cancers; irritation of the skin and mucous membranes and effects in the brain and nervous system
Chromium (VI)	1	87%	2	Lung cancer, shortness of breath, coughing, and wheezing

To put the smaller numbers in perspective, mercury is one of the toxic pollutants for which there is no known safe level of exposure. Lead and dioxins also have no "safe" level, and dioxins are the most toxic chemicals known to science, and incinerators are a major source (but good data is lacking). The incinerator reported releasing 12.3 lbs of mercury into the air in 2017, not counting that which gets into the air and water via the ash. A highly cited Minnesota study found that if approximately one gram of mercury (the amount in a single fever thermometer) is deposited to a 20-acre lake each year from the atmosphere, this small amount, over time, can contaminate the fish in that lake to the point where they should not be eaten.² 12.3 pounds of mercury equals 5,579 grams. That means the incinerator, in a typical year, is releasing enough mercury sufficient to keep over 5,500 20-acre lakes so contaminated that the fish are not safe to eat.

But what about buildings and mobile sources? Aren't they a bigger source of pollution to worry about?

For some pollutants, fossil fuels burned to heat buildings or move vehicles are the largest share of pollution compared to industry. However, Covanta is the largest polluter of all industrial sources, and is a big share compared to other sources, too. For example, their emissions of nitrogen oxides (NOx) that trigger asthma attacks are more than all of the short-haul diesel trucks in the entire county. The largest mobile source of NOx pollution is light-duty gasoline passenger trucks. Closing the incinerator would be the equivalent to removing 42% of these trucks from the county's roads.

¹ U.S. Environmental Protection Agency, National Emissions Inventory, 2017. www.epa.gov/air-emissions-inventories/2017-national-emissions-inventory-nei-data

² "One Gram of Mercury Can Contaminate a Twenty Acre Lake: A Clarification of This Commonly Cited Statistic," Summary by Interstate Mercury Education and Reduction Clearinghouse, 2004. www.newmoa.org/prevention/mercury/mercurylake.pdf Based on www.newmoa.org/prevention/topichub/22/where_is_mercury.pdf