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Tables with Lists of the Biggest Polluters According to the IPR for the Czech Republic - Reports Concerning 2022

The column "Trend" always states whether the relevant facility increased or decreased releases and transfers of the hazardous substances in comparison with 2021. A cross is given in the case of companies which did not report the substances in the previous year, a swung dash means approximately the same amount as in the previous year.

In the case of the majority of the groups of substances, we assess the total releases into the air, water, and soil, according to the data published in the IPR. We do not include transfers of the substances in waste and wastewater, because it is not obvious from the IPR whether their direct releases into the environment take place subsequently or not. As a general rule, they should not take place. An exception is formed by substances in the case of which also their presence in waste may be regarded as a serious environmental risk for the future, specifically persistent organic pollutants (POPs), including dioxins, and mercury and its compounds.

The Integrated Pollution Register (IPR) is operated, and data into it are collected, by the Ministry of Environment of the Czech Republic via the Czech Environmental Information Agency CENIA. It may be found, and searched, at the address www.irz.cz. The data concerning the previous years are available at <https://portal.cenia.cz/irz/>. The data on the releases of selected chemical substances are reported by the individual companies themselves into the Register, because this duty is set upon them by the law. Arnika then analyses the data, and prepares clearly organised lists of polluters which cannot be easily found in the Register. Presence in these lists, and their publication, often motivate the companies to eliminate emissions of harmful substances, and to introduce more environmentally-friendly technologies. In spite of that, there were already several attempts to limit the IPR, and, thus, the public right to information on environmental pollution. The last time this happened within the framework of the so-called environmental audit, when the Ministry of Industry and Trade wanted to reduce the number of the monitored substances, as well as of the companies obliged to submit reports. It was successful concerning a small part of them.

Arnika's pages concerning the IPR (including the lists concerning the previous years): <http://zncistovatele.cz/> a <https://arnika.org/irz-prirucka-2016>

Table 1 Carcinogenic, probably carcinogenic, and potentially carcinogenic substances

The order of facilities according to the amounts of substances and their compounds classified by the International Agency for Research on Cancer (IARC) as **carcinogenic (1), probably (2A) and possibly (2B) carcinogenic** to humans contained in the total releases into the air, water, and soil, according to the data published in the Integrated Pollution Register (www.irz.cz). Group 1 includes the following chemical substances and their compounds reported into the IPR: **arsenic, asbestos, benzene, ethylene oxide, formaldehyde, chromium, cadmium, polychlorinated biphenyls (PCBs), trichloroethylene, and vinyl chloride**. Groups 2A and 2B include the following chemical substances and their compounds reported into the IPR: **1,2,3,4,5,6-hexachlorocyclohexane (HCH), 1,2-dichloroethane (DCE), di(2-ethylhexyl) phthalate (DEHP), dichlorodiphenyltrichloroethane (DDT), dichloromethane (DCM), ethylbenzene, heptachlor, hexachlorobenzene (HCB), chloroalkanes (C₁₀₋₁₃), chlordane, chlordecone, lindane, mirex, naphthalene, nickel, lead, mercury, styrene, tetrachloroethylene, tetrachloromethane (TCM), toxaphene, and trichloromethane**.

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	SPOLANA s.r.o.	Spolana Neratovice	Neratovice	Central Bohemian Region South	39,016.50	↓
2	ACO Industries Tábor s.r.o.	ACO Industries Tábor s.r.o.	Sezimovo Ústí	Bohemian Region	8,833.00	↓
3	SAINT-GOBAIN ADFORS CZ s.r.o.	SAINT-GOBAIN ADFORS CZ s.r.o. - závod 1 Litomyšl	Litomyšl	Pardubice Region	8,337.00	↑
4	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	7,863.60	↑
5	ACO Industries k.s.	ACO Industries, k.s.	Přibyslav	Vysočina Region	7,098.00	~
6	CEMEX Czech Republic, s.r.o.	CEMEX Czech Republic, s.r.o.	Prachovice	Pardubice Region	5,769.75	↓
7	Technistone, a.s.	Technistone, a.s.	Hradec Králové	Hradec Králové Region	5,745.00	↓
8	Dřevozpracující družstvo	Dřevozpracující družstvo	Lukavec	Vysočina Region	5,708.00	↑
9	SYNTHOS Kralupy a.s.	SYNTHOS Kralupy a.s.	Kralupy nad Vltavou	Central Bohemian Region	5,666.00	↑
10	ROCKWOOL, a.s.	Rockwool, a.s., výrobní závod Bohumín	Bohumín	Moravian-Silesian Region	5,230.00	↑

Table 2 Carcinogenic substances

The order of facilities according to the amounts of substances and their compounds classified by the International Agency for Research on Cancer (IARC) as carcinogenic (1), contained in the total releases into the air, water, and soil, according to the data published in the Integrated Pollution Register (www.irz.cz). Group 1 includes the following chemical substances and their compounds reported into the IPR: **arsenic, asbestos, benzene, ethylene oxide, formaldehyde, chromium, cadmium, polychlorinated biphenyls (PCBs), trichloroethylene, and vinyl chloride**.

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	SPOLANA s.r.o.	Spolana Neratovice	Neratovice	Central Bohemian Region	38,618.00	↓
2	SAINT-GOBAIN ADFORS CZ s.r.o.	SAINT-GOBAIN ADFORS CZ s.r.o. - závod 1 Litomyšl	Litomyšl	Pardubice Region	8,337.00	↑
3	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	6,734.06	↑
4	Dřevozpracující družstvo	Dřevozpracující družstvo	Lukavec	Vysočina Region	5,708.00	↑
5	CEMEX Czech Republic, s.r.o.	CEMEX Czech Republic, s.r.o.	Prachovice	Pardubice Region	5,325.00	↓

6	ROCKWOOL, a.s.	Rockwool, a.s., výrobní závod Bohumín	Bohumín	Moravian-Silesian Region	5,230.00	↑
7	KRONOSPAN CR, spol. s r.o.	KRONOSPAN CR	Jihlava	Vysočina Region	3,286.00	↓
8	HP-Pelzer s.r.o.	HP - Pelzer s.r.o. - odštěpný závod Žatec	Žatec	Ústí nad Labem Region	2,623.26	~
9	Elektrárna Počerady, a.s.	Elektrárna Počerady	Výškov	Ústí nad Labem Region	1,744.38	~
10	DEZA, a.s.	DEZA, a.s., Valašské Meziříčí	Valašské Meziříčí	Zlín Region	1,668.00	↓

Table 3 Substances toxic to reproduction (without carbon monoxide)

Industrial facilities which released the highest amounts of reprotoxic substances (substances harmful to reproduction), except carbon monoxide, in the year in question. Incorporation of substances among substances toxic to reproduction is based on the assessment of the State of California EPA¹ and on the profiles of the substances stated on the internet pages of the Integrated Pollution Register. On the basis of the above-mentioned documents, the following substances were included among the substances toxic to reproduction: **1,2,3,4,5,6-hexachlorocyclohexane (HCH), arsenic, benzene, benzo(g,h,i)perylene, dichlorodiphenyltrichloroethane (DDT), di-(2-ethyl hexyl) phthalate (DEHP), diuron, ethylene oxide, fluoranthene, hexachlorobenzene (HCB), chlordecone, chromium, cadmium, mirex, nonylphenol and nonylphenol ethoxylates, organic compounds of tin, carbon monoxide, pentachlorobenzene, polycyclic aromatic hydrocarbons (PAHs), polychlorinated biphenyls (PCBs), polychlorinated dioxins + furans (PCDD/Fs), mercury, simazine, toluene, toxaphene, tributyltin and its compounds, triphenyltin and its compounds, and xylenes.**

¹ State of California EPA - Office of Environmental Health Hazard Assessment 2006: Safe Drinking Water and Toxic Enforcement Act of 1986 - Chemicals Known to the State to Cause Cancer or Reproductive Toxicity, 29.IX.06. Proposition 65. Available at: http://www.oehha.ca.gov/prop65/prop65_list/Newlist.html#list

Order	Organisation/Company	Facility	City	Region	Amounts of substances in kg	Trend
1	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	7,142.16	↑
2	CEMEX Czech Republic, s.r.o.	CEMEX Czech Republic, s.r.o.	Prachovice	Pardubice Region	5,335.88	↓
3	Elektrárna Počerady, a.s.	Elektrárna Počerady	Výškov	Ústí nad Labem Region	2,143.72	↑
4	DEZA, a.s.	DEZA, a.s., Valašské Meziříčí	Valašské Meziříčí	Zlín Region	1,668.00	↓
5	ORLEN Unipetrol RPA s.r.o.	ORLEN Unipetrol RPA	Litvínov	Ústí nad Labem Region	1,490.13	↓
6	Teplárna Kladno s.r.o.	Teplárna Kladno - ELEKTRÁRNA Kladno	Kladno	Central Bohemian Region	1,475.85	~
7	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	1,150.67	↑
8	ČEZ, a. s.	Elektrárny Tušimice	Kadaň	Ústí nad Labem Region	764.55	↓
9	ČEZ, a. s.	Elektrárny Pruněřov	Kadaň	Ústí nad Labem Region	737.82	↓
10	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	568.61	↓

Table 4 Mutagenic substances

The order of facilities according to the amounts of substances and their compounds classified as mutagenic, contained in the total releases into the air, water, and soil, according to the data published in the IPR (www.irz.cz). Incorporation of substances among the mutagenic ones is based on the profiles of the substances published on the internet pages of the IPR. The group of mutagenic substances includes the following chemical substances and their compounds reported into the IPR: **alachlor, anthracene, 1,2-dichloroethane, diuron, ethylene oxide, phenols, formaldehyde, mirex, polycyclic aromatic hydrocarbons (PAHs), trifluralin, trichloroethylene, and vinyl chloride.**

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	SPOLANA s.r.o.	Spolana Neratovice SAINT-GOBAIN ADFORS	Neratovice	Central Bohemian Region	38,946.00	↓
2	SAINT-GOBAIN ADFORS CZ s.r.o.	CZ s.r.o. - závod 1 Litomyšl	Litomyšl	Pardubice Region	8,337.00	↑
3	Dřevozpracující družstvo	Dřevozpracující družstvo	Lukavec	Vysočina Region	5,708.00	↑
4	ROCKWOOL, a.s.	Rockwool, a.s., výrobní závod Bohumín	Bohumín	Moravian-Silesian Region	5,230.00	↑
5	KRONOSPAN CR, spol. s r.o.	KRONOSPAN CR	Jihlava	Vysočina Region	3,286.00	↓
6	HP-Pelzer s.r.o.	HP - Pelzer s.r.o. - odštěpný závod Žatec	Žatec	Ústí nad Labem Region	2,623.26	~
7	LUKAFORM spol. s r.o.	Lukaform	Lukavec	Vysočina Region	1,614.00	↑
8	KRONOSPAN OSB, spol. s r.o.	KRONOSPAN OSB	Jihlava	Vysočina Region	1,136.00	↓
9	Pražské vodovody a kanalizace, a.s.	Ústřední čistírna odpadních vod Praha	Prague	Capital City of Prague	647.95	↑
10	Saint-Gobain Construction Products CZ a.s.	Saint-Gobain Construction Products CZ a.s.	Častolovice	Hradec Králové Region	643.00	↑

Table 5 Endocrine disruptors

The order of facilities according to the amounts of substances and their compounds classified as endocrine disruptors, contained in the total releases into the air, water, and soil, according to the data published in the IPR concerning the year in question (www.irz.cz). Incorporation of substances among endocrine disruptors is based on classifications of the substances in the EU and USA. The group of endocrine disruptors includes the following chemical substances and their compounds reported into the IPR: **atrazine, chloroalkanes (C₁₀₋₁₃), di-(2-ethyl hexyl) phthalate (DEHP), polychlorinated biphenyls (PCBs), polychlorinated dioxins + furans (PCDD/Fs), tetrachloroethylene (PER), trichlorobenzenes, styrene.**

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	ACO Industries Tábor s.r.o.	ACO Industries Tábor s.r.o.	Sezimovo Ústí	South Bohemian Region	8,833.00	↓
2	ACO Industries k.s.	ACO Industries, k.s.	Příbrav	Vysočina Region	7,098.00	~
3	Technistone, a.s.	Technistone, a.s.	Hradec Králové	Hradec Králové Region	5,745.00	↓
4	SYNTHOS Kralupy a.s.	SYNTHOS Kralupy a.s.	Kralupy nad Vltavou	Central Bohemian Region	5,666.00	↑
5	Nová Mosilana, a.s.	Nová Mosilana, a.s.	Brno	South Moravian Region	5,072.18	↑
6	Iveco Czech Republic, a. s.	Iveco Czech Republic, a. s.	Vysoké Mýto	Pardubice Region	4,877.66	↓
7	PETER - GFK spol. s r.o.	PETER - GFK spol. s r.o., Facility Kocbeře	Kocbeře	Hradec Králové Region	4,596.00	↓
8	Polytec Composites Bohemia s.r.o.	Polytec Composites Bohemia s.r.o.	Chodová Planá	Plzeň Region	4,259.00	↓
9	DCK Holoubkov Bohemia a.s.	DCK Holoubkov Bohemia a.s.	Holoubkov	Plzeň Region	4,199.00	↑

10	C. BECHSTEIN EUROPE s.r.o.	C.BECHSTEIN EUROPE s.r.o.	Hradec Králové	Hradec Králové Region	3,986.00	×
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Table 6 Greenhouse gases

The order of facilities according to the amounts of greenhouse gases (**carbon dioxide, nitrous oxide, methane**), calculated according to their potential to contribute to the greenhouse effect, in the total releases into the air, according to the data published in the IPR concerning the year in question (www.irz.cz). The first places in the list are influenced by carbon dioxide emissions only.

Order	Organisation/Company	Facility	City	Region	Amount in t	Trend
1	Elektrárna Počerady, a.s.	Elektrárna Počerady	Výškov	Ústí nad Labem Region	5,142,530.35	↑
2	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	4,555,826.42	↑
3	ORLEN Unipetrol RPA s.r.o.	ORLEN Unipetrol RPA	Litvínov	Ústí nad Labem Region	3,668,553.33	~
4	ČEZ, a. s.	Elektrárny Pruněřov	Kadaň	Ústí nad Labem Region	3,522,951.25	~
5	ČEZ, a. s.	Elektrárny Tušimice	Kadaň	Ústí nad Labem Region	3,393,886.54	~
6	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	3,069,782.20	↓
7	TŘINECKÉ ŽELEZÁRNY, a. s.	Facility Třinec	Třinec	Moravian-Silesian Region	2,488,863.00	~
8	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	2,428,761.00	↓
9	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	2,347,341.25	~
10	Mondi Štětí a.s.	Mondi Štětí a.s. - Celulozka	Štětí	Ústí nad Labem Region	2,239,320.58	↑

Table 7 Gases causing acid rain

The following industrial facilities released the highest amounts of gases causing acid rains (**ammonia, nitrogen oxides, sulphur oxides, hydrogen fluoride and hydrogen chloride**):

Order	Organisation/Company	Facility	City	Region	Amount in t	Trend
1	Elektrárna Počerady, a.s.	Elektrárna Počerady	Výškov	Ústí nad Labem Region	7,461.01	↑
2	ORLEN Unipetrol RPA s.r.o.	ORLEN Unipetrol RPA	Litvínov	Ústí nad Labem Region	6,414.27	↑
3	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	6,080.59	↑
4	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	4,547.30	↓

5	TŘINECKÉ ŽELEZÁRNY, a. s.	Facility Třinec	Třinec	Moravian-Silesian Region	3,959.83	↓
6	ČEZ, a. s.	Elektrárny Tušimice	Kadaň	Ústí nad Labem Region	3,555.63	↓
7	ČEZ, a. s.	Elektrárny Prunéřov	Kadaň	Ústí nad Labem Region	3,507.97	~
8	Elektrárny Opatovice, a.s.	Elektrárna Opatovice	Opatovice nad Labem	Pardubice Region	3,418.91	~
9	Teplárna Kladno s.r.o.	Teplárna Kladno - ELEKTRÁRNA KLADNO	Kladno	Central Bohemian Region	3,407.90	↑
10	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	2,969.53	↓

Table 8 Ozone depleting substances

The order of facilities according to the amounts of ozone depleting substances, calculated according to their potential to contribute to depletion of the Earth ozone layer, in the total releases into the air, according to the data published in the Integrated Pollution Register (www.irz.cz). Only **hydrochlorofluorocarbons (HCFCs)**, **chlorofluorocarbons (CFCs)** and **tetrachloromethane (TCM)** are included. The ozone depletion potential is calculated relative to the effects of CFCs (so-called "hard freons"), having the potential of 1. We use the coefficient of 0.062 in the case of HCFCs (so-called "soft freons"), and 1.1 in the case of TCM.

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	Model Obaly a.s.	Model Obaly Opava Těšínská	Opava	Moravian-Silesian Region	139	×
2	RUMPOLD-RCHZ s.r.o.	RUMPOLD-RCHZ s.r.o. - systém SEG	Havlíčkův Brod	Vysočina Region	5.76	~
3	Westrock Packaging Systems Svitavy, s.r.o.	Westrock Packaging Systems Svitavy, s.r.o.	Svitavy	Pardubice Region	4.03	×
4	CHS Epi, a.s.	CHS Epi	Ústí nad Labem	Ústí nad Labem Region	1.12	×
5	RACIOLA Uherský Brod, s.r.o.	RACIOLA Uherský Brod, s.r.o.	Uherský Brod	Zlín Region	1.12	×
6	Lafarge Cement, a.s.	Lafarge Cement, a.s.	Čížkovice	Ústí nad Labem Region	0.68	×
7	PRAKTIK system s.r.o.	PRAKTIK system s.r.o., Facility Stráž pod Ralskem	Stráž pod Ralskem	Liberec Region	0.01	↓

Table 9 Substances hazardous to water organisms

The following industrial facilities released the highest amounts of substances hazardous to water organisms into water. The substances were selected according to the R-phrases. Simultaneously, there were selected only substances in the case of which emissions into water are reported (**1,2,3,4,5,6-hexachlorocyclohexane (HCH)**, **arsenic and its compounds**, **atrazine**, **brominated diphenylethers (PBDEs)**, **DDT**, **diuron**, **endosulfan**, **endrin**, **heptachlor**, **hexachlorobenzene**, **chloroalkanes (C₁₀₋₁₃)**, **chlordan**, **chlordecone**, **chlorfenvinphos**, **chlorpyrifos**, **chromium and its compounds**, **isodrin**, **isoproturon**, **cadmium and its compounds**, **cyanides**, **lindane (γ-HCH)**, **copper and its compounds**, **mirex**, **naphthalene**, **nickel and its compounds**, **nonylphenol and nonylphenol ethoxylates**, **lead and its compounds**, **pentachlorobenzene (PeCB)**, **polycyclic aromatic hydrocarbons (PAHs)**, **polychlorinated biphenyls (PCBs)**, **mercury and its compounds**, **simazine**, **organotin compounds**, **toxaphene**, **tributyltin and its compounds**, **triphenyltin and its compounds**, **trifluralin**, and **zinc and its compounds**).

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	TOMA, a.s.	ČOV Otrokovice	Otrokovice	Zlín Region	6,224.27	↑

2	Pražské vodovody a kanalizace, a.s.	Ústřední čistírna odpadních vod Praha	Prague	Capital City of Prague	5,997.60	↓
3	Lovochemie, a.s.	Lovochemie, a.s., Lovosice	Lovosice	Ústí nad Labem Region	4,672.25	↓
4	Ostravské vodárny a kanalizace a. s.	Provoz ČOV	Ostrava	Moravian-Silesian Region	4,534.00	↓
5	ENERGETIKA TŘINEC, a.s.	Provozy Teplárny a Tepelná energetika	Třinec	Moravian-Silesian Region	4,038.00	↑
6	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	3,980.77	↑
7	Brněnské vodárny a kanalizace, a.s.	Čistírna odpadních vod Brno v Modřicích	Modřice	South Moravian Region	2,824.00	↑
8	Vodovody a kanalizace Pardubice, a.s.	Facility BČOV Pardubice	Rybitví	Pardubice Region	2,806.00	↑
9	Mondi Štětí a.s.	Mondi Štětí a.s. - Celulozka	Štětí	Ústí nad Labem Region	2,041.00	↑
10	VODÁRNA PLZEŇ a.s.	ČOV Plzeň	Plzeň	Plzeň Region	1,765.65	↓

Table 10 Persistent organic pollutants (POPs)

The following industrial facilities released and/or transferred to other places the highest amounts of POPs, listed in the lists of the Stockholm Convention and the POPs Protocol to the Convention on Long-Range Transboundary Air Pollution. These substances are **1,2,3,4,5,6-hexachlorocyclohexane (HCH), aldrin, brominated diphenylethers (PBDEs), DDT, dieldrin, endosulfan, endrin, heptachlor, hexachlorobenzene (HCB), hexachlorobutadiene (HCB), chlordan, chlordecone, lindane, mirex, organic compounds of tin, pentachlorobenzene (PeCB), polyaromatic hydrocarbons (PAHs), polychlorinated biphenyls (PCBs), and toxaphene, with the exception of the amounts of PCBs and polybrominated diphenylethers (PBDEs) in waste, which, according to our estimates, need not be produced as by-products of the operation of the facilities. Moreover, a separate table was drawn up for dioxins.**

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	CHS Epi, a.s.	CHS Epi Vypařovací a dezinfekční stanice	Ústí nad Labem	Ústí nad Labem Region	383,792.40	↓
2	AWT ROSCO a.s.	Liberty Bohumín	Bohumín	Moravian-Silesian Region	5,015.00	↑
3	Liberty Ostrava a.s.	Ostrava a.s. Rafinérie	Ostrava Kralupy nad Vltavou	Moravian-Silesian Region	282.93	↓
4	ORLEN Unipetrol RPA s.r.o.	Kralupy nad Vltavou	Kralupy nad Vltavou	Central Bohemian Region	168.50	↑
5	TŘINECKÉ ŽELEZÁRNY, a. s.	Facility Třinec	Třinec	Moravian-Silesian Region	118.00	↑
6	Meopta - optika, s.r.o.	Meopta - optika, s. r. o.	Přerov	Olomouc Region	117.70	↑
7	AVISTA OIL s.r.o.	AVISTA OIL s.r.o.	Pardubice	Pardubice Region	97.92	↑
8	Slévárna Kuřim, a.s.	Slévárna Kuřim, a.s. ČOV	Kuřim	South Moravian Region	74.15	~
9	TOMA, a.s.	Otrokovice Úpravna odpadů	Otrokovice	Zlín Region	59.90	×
10	Purum s.r.o.	Hamr na Jezeře - Stará Lužice	Hamr na Jezeře	Liberec Region	56.61	×

Table 11 Mercury and its compounds

The following industrial facilities released the highest amounts of mercury and its compounds in emissions into the air, water, and soil:

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	408.10	↑
2	Elektrárna Počeradý, a.s.	Elektrárna Počeradý	Výškov	Ústí nad Labem Region	399.34	↑
3	ČEZ, a. s.	Elektrárny Prunéřov	Kadaň	Ústí nad Labem Region	230.77	↓
4	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	205.85	↓
5	Plzeňská teplárenská, a.s.	Plzeňská teplárenská, a.s. - areál Teplárna	Plzeň	Plzeň Region	135.26	×
6	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	108.83	↓
7	ČEZ, a. s.	Elektrárny Tušimice	Kadaň	Ústí nad Labem Region	103.55	↓
8	Elektrárny Opatovice, a.s.	Elektrárna Opatovice	Opatovice nad Labem	Pardubice Region	94.23	↓
9	Sokolovská uhelná, právní nástupce, a.s.	Sokolovská uhelná, právní nástupce, a.s. - zpracovatelská část	Vřesová	Karlovy Vary Region	90.04	↑
10	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	66.82	↓

Table 12 Mercury and its compounds (in emissions and waste)

Industrial facilities which released and/or transferred in wastes the highest amounts of mercury and its compounds:

Order	Organisation/Company	Facility	City	Region	Amounts of substances in kg	Trend
1	SPOLANA s.r.o.	Spolana Neratovice	Neratovice	Central Bohemian Region	6,981.30	↓
2	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	408.10	↑
3	Elektrárna Počeradý, a.s.	Elektrárna Počeradý	Výškov	Ústí nad Labem Region	399.34	↑
4	ČEZ, a. s.	Elektrárny Prunéřov	Kadaň	Ústí nad Labem Region	230.77	↓
5	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	205.85	↓
6	Festool s.r.o.	Festool s.r.o.	Česká Lípa	Liberec Region	203.56	↑
7	DEZA, a.s.	DEZA, a.s., Valašské Meziříčí	Valašské Meziříčí	Zlín Region	188.15	×
8	SUEZ CZ a.s.	Spalovna Ostrava	Ostrava	Moravian-Silesian Region	180.26	↑
9	Plzeňská teplárenská, a.s.	Plzeňská teplárenská, a.s. - areál Teplárna	Plzeň	Plzeň Region	135.26	×
10	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	108.83	↓

Table 13 Styrene

The order of facilities according to the amounts of styrene in the total releases into the air:

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	ACO Industries Tábor s.r.o.	ACO Industries Tábor s.r.o.	Sezimovo Ústí	South Bohemian Region	8,833.00	↓
2	ACO Industries k.s.	ACO Industries, k.s.	Přibyslav	Vysočina Region	7,098.00	~
3	Technistone, a.s.	Technistone, a.s.	Hradec Králové	Hradec Králové Region	5,745.00	↓
4	SYNTHOS Kralupy a.s.	SYNTHOS Kralupy a.s.	Kralupy nad Vltavou	Central Bohemian Region	5,666.00	↑
5	Iveco Czech Republic, a. s.	Iveco Czech Republic, a. s.	Vysoké Mýto	Pardubice Region	4,877.66	↓
6	PETER - GFK spol. s r.o.	PETER - GFK spol. s r.o., Facility Kocbeře	Kocbeře	Hradec Králové Region	4,596.00	↓
7	Polytec Composites Bohemia s.r.o.	Polytec Composites Bohemia s.r.o.	Chodová Planá	Plzeň Region	4,259.00	↓
8	DCK Holoubkov Bohemia a.s.	DCK Holoubkov Bohemia a.s.	Holoubkov	Plzeň Region	4,199.00	↑
9	C. BECHSTEIN EUROPE s.r.o.	C.BECHSTEIN EUROPE s.r.o.	Hradec Králové	Hradec Králové Region	3,986.00	×
10	BKP GROUP,a.s.	BKP GROUP, a.s.	Uherský Brod	Zlín Region	3,933.00	↑

Table 14 Formaldehyde

The following industrial facilities released the highest amounts of formaldehyde into the air in 2022:

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	SAINT-GOBAIN ADFORS CZ s.r.o.	SAINT-GOBAIN ADFORS CZ s.r.o. - závod 1 Litomyšl	Litomyšl	Pardubice Region	8,337.00	↑
2	Dřevozpracující družstvo	Dřevozpracující družstvo	Lukavec	Vysočina Region	5,708.00	↑
3	ROCKWOOL, a.s.	Rockwool, a.s., výrobní závod Bohumín	Bohumín	Moravian-Silesian Region	5,230.00	↑
4	KRONOSPAN CR, spol. s r.o.	KRONOSPAN CR	Jihlava	Vysočina Region	3,286.00	↓
5	HP-Pelzer s.r.o.	HP - Pelzer s.r.o. - odštěpný závod Žatec	Žatec	Ústí nad Labem Region	2,623.26	~
6	LUKAFORM spol. s r.o.	Lukaform	Lukavec	Vysočina Region	1,614.00	↑
7	KRONOSPAN OSB, spol. s r.o.	KRONOSPAN OSB	Jihlava	Vysočina Region	1,136.00	↓
8	Saint-Gobain Construction Products CZ a.s.	Saint-Gobain Construction Products CZ a.s.	Častolovice	Hradec Králové Region	643.00	↑
9	Wienerberger s.r.o.	WCP závod 20 Novosedly	Novosedly	South Moravian Region	304.11	↑
10	KORDÁRNA Plus a.s.	KORDÁRNA Plus a.s.	Velká nad Veličkou	South Moravian Region	264.45	↓

Table 15 Dioxins

The highest amounts of **dioxins** were released into **the air** and/or transferred **in waste and wastewater** by the following industrial facilities in 2022:

Order	Organisation/Company	Facility	City	Region	Amount in g TEQ	Trend
1	TŘINECKÉ ŽELEZÁRNY, a. s.	Facility Třinec	Třinec	Moravian-Silesian Region	33.73	↓
2	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	18.70	↑
3	SUEZ CZ a.s.	Spalovna Ostrava	Ostrava	Moravian-Silesian Region	15.00	↑
4	SUEZ CZ a.s.	Spalovna průmyslových odpadů Trmice	Trmice	Ústí nad Labem Region	13.40	↑
5	TERMIZO a.s.	TERMIZO a.s.	Liberec	Liberec Region	11.30	↑
6	SUEZ CZ a.s.	Spalovna SITA - EMSEKO a.s., spalovna nebezpečného odpadu	Zlín	Zlín Region	6.20	↑
7	SAKO Brno, a.s.	SAKO Brno, a.s. - divize 3 ZEVO	Brno	South Moravian Region	5.15	↑
8	Pražské služby, a.s.	Spalovna Malešice	Prague	Capital City of Prague	2.09	↑
9	ČEZ, a. s.	Elektrárny Pruněřov	Kadaň	Ústí nad Labem Region	0.53	~
10	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	0.29	↑

Table 16 Aerosol emissions (PM₁₀)

The following industrial facilities released the highest amounts of dust particles into the air in 2022:

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	322,050.09	↓
2	Elektrárna Počerady, a.s.	Elektrárna Počerady	Výškov	Ústí nad Labem Region	271,817.59	↓
3	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	126,775.19	↑
4	ČEZ, a. s.	Elektrárny Pruněřov	Kadaň	Ústí nad Labem Region	114,098.39	~
5	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	106,363.18	↑
6	TŘINECKÉ ŽELEZÁRNY, a. s.	Facility Třinec	Třinec	Moravian-Silesian Region	97,602.00	~
7	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	89,500.50	↓
8	BASALT s.r.o.	BASALT s.r.o. Facility Měrunice	Měrunice	Ústí nad Labem Region	17,861.00	↑
9	CS CABOT, spol. s r.o.	CS CABOT	Valašské Meziříčí	Zlín Region	11,105.00	↑
10	Zemědělské družstvo Radiměř	Hospodářství Paseka	Paseka	Olomouc Region	4,725.00	×

Table 17 Carbon monoxide

The following industrial facilities released the highest amounts of reprotoxic carbon monoxide:

Order	Organisation/Company	Facility	City	Region	Amount in t	Trend
1	TŘINECKÉ ŽELEZÁRNY, a. s.	Facility Třinec	Třinec	Moravian-Silesian Region	59,842.93	↓
2	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	49,875.52	↓

3	Vápenka Čertovy schody a.s.	Vápenka Čertovy schody, a.s.	Tmaň	Central Bohemian Region	3,778.23	↓
4	LB Cemix, s.r.o.	KOTOUČ ŠTRAMBERK	Štramberk	Moravian-Silesian Region	3,436.78	↑
5	Cement Hranice, akciová společnost	Cement Hranice, akciová společnost	Hranice	Olomouc Region	2,993.75	↑
6	Českomoravský cement, a.s.	závod Mokrá	Mokrá-Horákov	Moravian South Region	2,693.40	↓
7	Elektrárna Počeradý, a.s.	Elektrárna Počeradý	Výškov	Ústí nad Labem Region	2,124.50	↑
8	ČEZ, a. s.	Elektrárny Pruněrov	Kadaň	Ústí nad Labem Region	1,573.11	↑
9	Lafarge Cement, a.s.	Lafarge Cement, a.s.	Čížkovice	Ústí nad Labem Region	1,567.67	↑
10	Energotrans, a.s.	Elektrárna Mělník	Horní Počaply	Central Bohemian Region	1,088.23	↓

Table 18 Emissions of cyanides into water

The following industrial facilities released the highest amounts of cyanides into water in 2022. The reporting threshold for cyanide emissions into water is 50 kg.

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	Ostravské vodárny a kanalizace a. s.	Provoz ČOV Liberty Ostrava a. s.	Moravská Ostrava a Přívoz	Moravian-Silesian Region	1,322	↑
2	Liberty Ostrava a. s.	DEZA, a.s., Valašské Meziříčí	Slezská Ostrava	Moravian-Silesian Region	345	↓
3	DEZA a. s.	Lučební závody Draslovka	Valašské Meziříčí	Zlín Region	184	↑
4	a.s. Kolín	Draslovka a.s. Kolín	Kolín	Central Bohemian Region	145	↓
5	ORLEN Unipetrol RPA s.r.o.	Rafinérie Kralupy nad Vltavou	Kralupy nad Vltavou	Central Bohemian Region	112	×
6	Severomoravské vodovody a kanalizace Ostrava a.s	ČOV Třinec	Třinec	Moravian-Silesian Region	105	↓
7	VODÁRENSKÁ AKCIOVÁ SPOLEČNOST, a.s.	ČOV Jihlava	Jihlava	Vysočina Region	81.2	×

Table 19 Heavy metals

The order of facilities according to the amounts of selected heavy metals contained in the total releases into the air, water, and soil, according to the data published in the IPR (www.irz.cz). The total amount is the sum of **cadmium, mercury, lead, nickel, and arsenic**, and their compounds. The reporting threshold for cadmium is 10 kg into the air and 5 kg into water; for mercury 10 kg into the air and 1 kg into water; the threshold valid for lead is 200 kg into the air and 20 kg into water; the threshold valid for nickel is 50 kg into the air and 20 kg into water; and for arsenic 20 kg into the air and 5 kg into water.

Order	Organisation/Company	Facility	City	Region	Amount in kg	Trend
1	Elektrárna Chvaletice a.s.	Elektrárna Chvaletice	Chvaletice	Pardubice Region	6,685.91	↑
2	Liberty Ostrava a.s.	Liberty Ostrava a.s.	Ostrava	Moravian-Silesian Region	1,911.90	↓

3	Elektrárna Počerady, a.s.	Elektrárna Počerady	Výškov	Ústí nad Labem Region	1,316.36	↓
4	TOMA, a.s.	ČOV Otrokovice	Otrokovice	Zlín Region	1,272.27	↓
5	TŘINECKÉ ŽELEZÁRNY, a.s.	Facility Třinec	Třinec	Moravian-Silesian Region	989.00	↓
6	ČEZ, a. s.	Elektrárna Ledvice	Bílina	Ústí nad Labem Region	775.81	↓
7	ČEZ, a. s.	Elektrárny Pruněřov	Kadaň	Ústí nad Labem Region	766.46	↑
8	Pražské vodovody a kanalizace, a.s.	Ústřední čistírna odpadních vod Praha	Prague	Capital City of Prague	632.46	↓
9	Ostravské vodárny a kanalizace a. s.	Provoz ČOV	Ostrava	Moravian-Silesian Region	590.00	↓
10	Vodovody a kanalizace Pardubice, a.s.	Facility BČOV Pardubice	Rybitví	Pardubice Region	559.00	↑