

Chemicals and waste in the case-law of the ECtHR

Natalia Kobylarz

natalia.kobylarz@echr.coe.int

Judicial Colloquium, Judicial Protection of HR & Public Interests Against
Environmental Pollution from Chemicals & Wastes, UNECE
Geneva, 3 April 2023

The views expressed in this presentation are those of the speaker and do not represent the official position of the European Court of Human Rights or the Council of Europe.



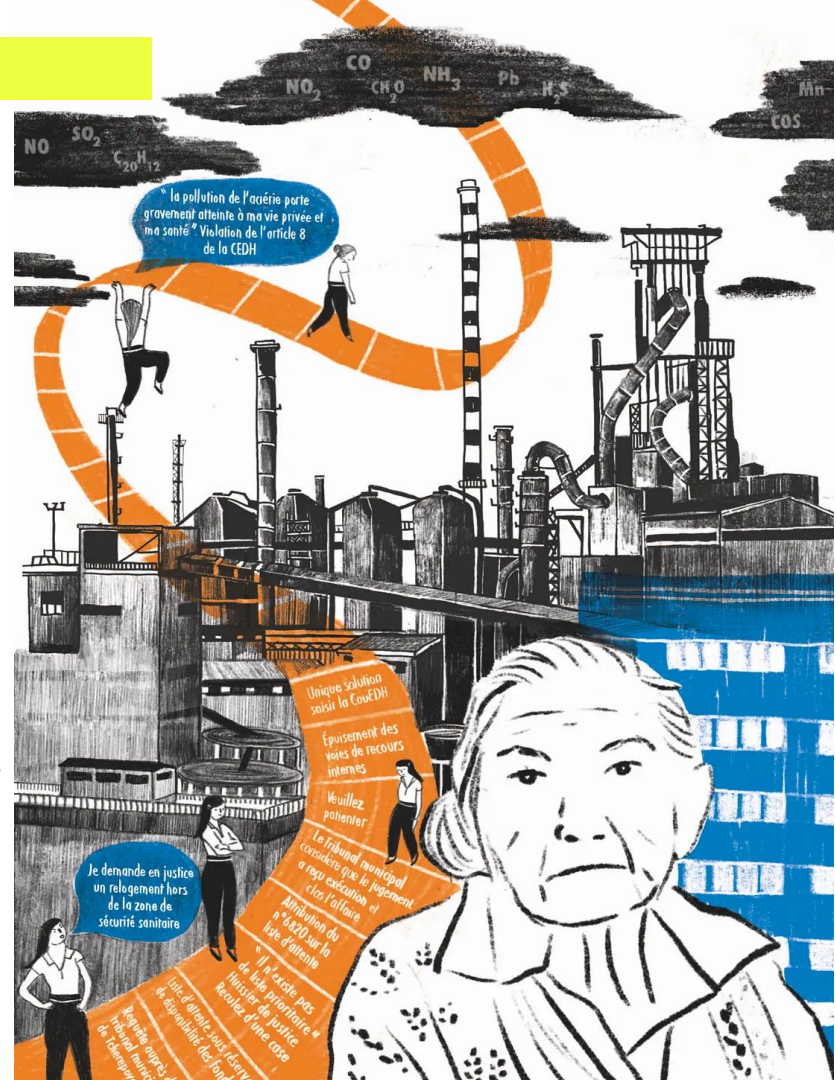
NEXUS: POLLUTION-HUMAN RIGHTS

Severe pollution or environmental harm may affect individuals' well-being and prevent them from enjoying their **homes** in such a way as to affect their **private and family life** adversely, **without, however, seriously endangering their health.**

(Article 8 ECHR) López Ostra v. Spain, 1994

Plants: López Ostra v. Spain, 1994; Fadeyeva v. Russia, 2005; Giacomelli v. Italy, 2006; Băcilă v. Romania, 2010; Jugheli and Others v. Georgia, 2017; Cordella and Others v. Italy, 2019; Pavlov and Others v. Russia, 2022 **Small-scale private activities:** Lam and Others v. UK (dec.), 2001; Furlepa v. Poland (dec.), 2008 **Industrial risks:** Tătar v. Romania, 2009 **Water pollution:** Dzemyuk v. Ukraine, 2014 **Waste management:** Di Sarno v. Italy, 2012; Kotov and Others v. Russia, 2022; **Di Caprio and Others v. Italy - pending**

European Committee of Social Rights: Marangopoulos Foundation for Human Rights (MFHR) v. Greece, 2006; International Federation of Human Rights Leagues (FIDH) v. Greece, 2013



DIRECT AND SEVERE IMPACT

Causal link between the excessive level of pollution and the harmful effects on the applicant **cannot be automatically presumed**. It is conceivable that, despite the excessive pollution and its proven negative effects on the population as a whole, the applicant did not suffer any special and extraordinary damage (beyond environmental hazards inherent in life in every modern city). [Pavlov and Others v. Russia, 2022](#)

Notion of **minimum severity** is relative and depends on all the circumstances of the case (intensity and duration of the nuisance, and its physical or mental effects, general context of the environment); assessed based on the **cumulative effects** of various elements of a case.



STANDARD OF EVIDENCE & PRESUMPTIONS OF FACT

Standard of proof **beyond reasonable doubt**.

Where scientific uncertainty, a **sufficiently close link** can be established on the basis of **probabilistic reasoning**: a cumulation of factors such as statistics and reports on general causation. *Tătar v. Romania*, 2009, *Cordella and Others v. Italy*, 2019

Coexistence of sufficiently strong, **clear and concordant inferences** or of similar un rebutted **presumptions** of fact.

Severe water and soil pollution may negatively affect public health in general and worsen the quality of an individual's life.

Soot and respirable dust particles can have a serious detrimental effect on health, especially in densely populated areas with heavy traffic.

Severe pollution may negatively affect public health in general and worsen the quality of an individual's life.

Even assuming that pollution did not cause any quantifiable harm to the applicant's health, it inevitably made the applicant more vulnerable to various illnesses and adversely affected her/his quality of life at home.



SOURCES OF EVIDENCE

Cautious in taking on the role of a tribunal of fact, the Court may (re)assess all evidence where decisions of the domestic authorities are obviously inconsistent or contradict each other. [Jugheli and Others v. Georgia, 2017](#)

Environmental impact assessment report has strong evidentiary value, [Taşkın and Others v. Turkey, 2004](#); [Hardy and Maile v. United Kingdom, 2012](#) even where the dangerous activity is still in the planning stage. [Thibaut v. France \(dec.\), 2022](#)

Can take account of reports drawn up by private experts [Oluić v. Croatia, 2010](#) and of record of previous accidents. [Guerra and Others v. Italy, 1998](#); [Tătar v. Romania, 2009](#)

Relies on international standards. [Fägerskiöld v. Sweden \(dec.\), 2008](#); [Oluić v. Croatia, 2010](#); [Frankowski and Others v. Poland \(dec.\), 2011](#); [Cordella and Others v. Italy, 2019](#)



POSITIVE OBLIGATIONS

States have a **positive obligation to take all appropriate steps to safeguard life / physical integrity / private life / property** in the context of:

- (i) dangerous activities, known to and occurring under the responsibility of the public authorities (public or private); and
- (ii) imminent and clearly (foreseeable) identifiable natural disasters.

(Articles 2 and 8 ECHR, Article 1 of Protocol No 1 ECHR))

Plants: Guerra and Others v. Italy, 1998; Mučibabić v. Serbia, 2016 **Hazardous work conditions:** L.C.B. v. United Kingdom, 1998; Brincat and Others v. Malta, 2014; **Waste management:** Öneriyıldız v. Turkey [GC], 2004; Kotov and Others v. Russia, 2022



POSITIVE OBLIGATIONS

- Legislative and administrative framework

to provide effective **deterrence** against threats (investigation; criminal, civil or disciplinary liability); and

to identify shortcomings or errors



POSITIVE OBLIGATIONS

- Legislative and administrative framework

to provide effective **deterrence** against threats (investigation; criminal, civil or disciplinary liability); and

to identify shortcomings or errors

- Preventive regulations:

(i) governing licensing, setting up, operation, security and supervision of the activity and making it compulsory for all those concerned to take practical measures to ensure the effective protection of those whose lives might be endangered by the inherent risks; and

(ii) guaranteeing the public's right to information (*proprio motu* if mortal risk)



POSITIVE OBLIGATIONS

- Legislative and administrative framework

to provide effective **deterrence** against threats (investigation; criminal, civil or disciplinary liability); and

to identify shortcomings or errors

- Preventive regulations:

(i) governing licensing, setting up, operation, security and supervision of the activity and making it compulsory for all those concerned to take practical measures to ensure the effective protection of those whose lives might be endangered by the inherent risks; and

(ii) guaranteeing the public's right to information (*proprio motu* if mortal risk)

- Operational measures necessary and sufficient

to avert or mitigate the risks inherent in dangerous activities;

to keep catastrophic impact to a minimum;

to reinforce State's capacity to deal with the unexpected and violent nature of natural phenomena (appropriate spatial planning, controlled urban development, monitoring, warning, evacuation plans, etc.)



Assessment of ECHR compliance encompasses:

- domestic legality of acts or omissions
- domestic decision-making process (investigations and studies, information, consultation)

Dzemyuk v. Ukraine, 2014 ; Taşkın and Others v. Turkey, 2004; Budayeva and Others v. Russia, 2008; Tătar v. Romania, 2009; Kolyadenko and Others v. Russia, 2012; Brincat and Others v. Malta, 2014; Jugheli and Others v. Georgia, 2017; Cordella and Others v. Italy, 2019; Pavlov and Others v. Russia, 2022



Failure by the State to fulfill its duties in matters of control and information about industrial activities, presenting a potential risk for human health and for the environment (storage and treatment of hazardous and non-hazardous waste producing harmful emissions & cyanide leaching of silver and gold). Violation Art 8.

A governmental **decision-making process must involve appropriate investigations and studies** so that the effects of activities that might damage the environment and infringe individuals' rights may be predicted and evaluated in advance and a fair balance may accordingly be struck between the various conflicting interests at stake.

The **importance of public access to the conclusions** of such studies and to information enabling members of the public to assess the danger to which they are exposed is beyond question. Individuals concerned must also be able to **appeal to the courts** against any decision, act or omission where they consider that their interests or their comments have not been given sufficient weight in the decision-making process.

✓ Applicants living 30 m from the plant treating 200,000 cubic metres of harmful waste/year Continuous emission of noise and odours.

✗ 1). decision to grant operating licence for the waste treatment plant and decision to authorise it to expand its activities were not preceded by environmental-impact assessment (EIA) 2). delays and ineffectiveness of procedures allowing participation of the public concerned in the licensing procedure and their access to judicial authorities

✓ Applicants living near the mine's toxic tailing pond.

✗ 1). no effective public consultation prior to the start of the operation. 2) no information re: the degree of danger that the mining activity involved. 3). Romania did not sufficiently evaluate the risks

Assessment of ECHR compliance encompasses:

- domestic legality of acts or omissions
- domestic decision-making process (investigations and studies, information, consultation)
- “Fair balance” must be achieved between the general interest of the community and the individual’s fundamental rights a reasonable proportionality between the means and the aim

Dzemyuk v. Ukraine, 2014; Taşkın and Others v. Turkey, 2004; Budayeva and Others v. Russia, 2008; Tătar v. Romania, 2009; Kolyadenko and Others v. Russia, 2012; Brincat and Others v. Malta, 2014; Jugheli and Others v. Georgia, 2017; Cordella and Others v. Italy, 2019; Pavlov and Others v. Russia, 2022; Kotov and Others v. Russia, 2022



Failure to take adequate protective measures to reduce effects of long-standing excessive industrial pollution. Violation Art 8.

- ✓ Domestic court recognised, on the basis of evidence before it, that: emissions from the industrial undertakings were spreading and reaching the parts of the city where the applicants lived, and contributing to serious degradation of air quality in all parts of it above the norms. Air pollution was the main health risk factor (morbidity, respiratory illnesses and cardiovascular, liver and kidney diseases, cancer) for the residents of Lipetsk.
- ✓ Consistent with the environmental reports of regional State bodies and publicly available sources.
- ✓ It cannot be said, owing to the lack of medical evidence, that the industrial air pollution necessarily caused damage to the applicants' health, but living in the area marked by pollution in clear excess of applicable safety standards exposed the applicants to an **elevated risk to health and may have led to a deterioration of their quality of life.**

Table 4. Comparative table of average annual and short-term peak concentrations of harmful substances 2015-2018
Lipetsk Regional Department of the Ministry of Natural Resources and the Environment
 [highlights added to indicate concentrations above the MPL]

	average annual concentrations in proportion to the average daily MPL				short-term peak concentrations in proportion to the short-term peak MPL			
	2015	2016	2017	2018	2015	2016	2017	2018
Dust	1.0	0.7	0.8	0.5	-	1.0	1.2	4.2
Carbon monoxide	0.3	0.3	0.1	0.2	-	<	1.0	1.6
Sulphur dioxide	0.1	0.1	0.1	0.1	-	<	<	<
Nitrogen dioxide	0.3	0.4	0.4	0.5	-	1.0	1.3	<
Nitric oxide	0.2	0.1	0.1	0.1	-	<	<	<
Hydrogen sulphide	-	-	-	-	-	4.9	11.0	7.1
Phenol	0.3	0.3	0.3	0.4	-	3.1	2.3	2.7
Formaldehyde	0.5	0.6	0.8	0.9	-	1.0	<	<

Appendix III

Extracts of documents submitted by the applicants

Table 1. Concentration of Harmful Substances in the Atmospheric Air in Lipetsk in 1998-2008
Lipetsk Regional Hydrometeorology and Environmental Monitoring Centre
 (highlights added to indicate concentrations above the MPL)

Year	Dust		Carbon monoxide		Sulphur dioxide		Nitrogen dioxide		Nitric oxide		Hydrogen sulphide		Phenol		Formaldehyde		Sulfites	
	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL	average daily MPL	short-term peak MPL
	0.15	0.50	3.0	5.0	0.05	0.50	0.04	0.20	0.06	0.40	-	0.008	0.003	0.010	0.003	0.035	0.10	0.30
	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.	average annual conc.	short-term peak conc.
1998	0.26	3.40	1.4	8.0	0.006	0.084	0.10	0.59	0.08	0.43	0.003	0.070	0.008	0.078	0.021	0.140	-	-
1999	0.22	2.46	1.0	12	0.006	0.034	0.07	0.50	0.09	0.57	0.003	0.028	0.006	0.047	0.023	0.114	-	-
2000	0.16	1.80	1.6	7.0	0.004	0.080	0.06	0.50	0.08	0.45	0.005	0.040	0.008	0.080	0.026	0.150	-	-
2001	0.15	2.80	1.6	8.0	0.014	0.090	0.06	0.34	0.05	1.38	0.003	0.035	0.005	0.038	0.024	0.115	0.01	0.10
2002	0.17	2.90	1.9	13.0	0.08	0.110	0.09	0.68	0.04	0.47	0.004	0.038	0.004	0.038	0.021	0.153	0.01	0.06
2003	0.15	1.90	1.2	9.0	0.007	0.110	0.04	0.42	0.02	0.15	0.002	0.038	0.003	0.026	0.015	0.098	0.01	0.04
2004	0.10	1.60	0.9	9.0	0.007	0.060	0.03	0.42	0.02	0.35	0.002	0.039	0.004	0.025	0.012	0.127	0.01	0.04
2005	0.11	1.60	0.8	4.0	0.006	0.047	0.02	0.42	-	-	0.002	0.038	0.004	0.037	0.008	0.165	0.01	0.04

Table 2. Average annual concentrations of heavy metals and benzopyrene in Lipetsk in 2008

Month	Chrome	Manganese	Iron	Nickel	Copper	Zinc	Lead	Benzopyrene
	average daily MPL	average daily MPL	average daily MPL	average daily MPL	average daily MPL	average daily MPL	average daily MPL	average daily MPL
	1.5	1.0	-	1.0	2.0	50	0.30	1.0
	average annual concentration	average annual concentration	average annual concentration	average annual concentration	average annual concentration	average annual concentration	average annual concentration	average annual concentration
January	0.011	0.008	0.42	0.0088	0.016	0.11	0.0067	3.2
February	0.016	0.0042	0.46	0.011	0.006	0.11	0.015	2.27
March	0.012	0.019	1.2	0.0062	0.0081	0.11	-	2.13
April	0.0081	0.033	1.1	0.0066	0.0076	0.48	0.046	1.73
May	0.012	0.031	1.1	0.010	0.014	0.12	0.067	1.4
June	0.013	0.040	1.2	0.0074	0.013	0.16	0.061	0.9
July	0.014	0.030	1.3	0.010	0.014	0.35	0.037	0.73
August	0.011	0.050	2.0	0.009	0.011	0.24	0.046	0.93
September	0.013	0.028	1.1	0.016	0.030	0.14	0.021	1.57
October	0.012	0.012	0.61	0.010	0.011	0.14	0.029	2.1

Table 3. Number of residents affected by heightened levels of air pollution

Stationary post	Years	Main pollutants	Proportion of unsatisfactory tests (peak concentration above the MPL), %	Number of residents affected
Post no. 2 – near Lipetsk Pipe Plant	2011*	phenol, hydrogen sulphide, suspended particles	-	74,000
	2016	phenol, suspended particles	0.21	
	2017	phenol, hydrogen sulphide, suspended particles	0.13	
	2018	formaldehyde, suspended particles, phenol	0.23	
Post no. 3 – near the NLSP	2011	suspended particles, phenol	-	32,000
	2016	phenol, hydrogen sulphide	0.25	
	2017	phenol, hydrogen sulphide, nitrogen dioxide	0.37	
	2018	phenol, hydrogen sulphide	0.27	
Post no. 4 – near Lipetsk Tractor Plant	2011	suspended particles, formaldehyde, phenol	-	35,000
	2016	phenol, hydrogen sulphide	0.94	
	2017	phenol, hydrogen sulphide	1.06	
	2018	phenol, hydrogen sulphide, suspended particles	2.05	
Post no. 6 – near the Lipetsk Svobodny Sokol plant	2011	suspended particles, formaldehyde, phenol	-	39,000
	2016	phenol, hydrogen sulphide	0.36	
	2017	phenol, hydrogen sulphide	0.24	
	2018	phenol, hydrogen sulphide	0.25	
Post no. 8 (23rd micro district of Lipetsk)	2011	suspended particles, formaldehyde, phenol	-	52,000
	2016	phenol, hydrogen sulphide	0.26	
	2017	phenol, hydrogen sulphide	0.17	

Failure to take adequate protective measures to reduce effects of long-standing excessive industrial pollution. Violation Art 8.

✓ Domestic court recognised, on the basis of evidence before it, that: emissions from the industrial undertakings were spreading and reaching the parts of the city where the applicants lived, and contributing to serious degradation of air quality in all parts of it above the norms. Air pollution was the main health risk factor (morbidity, respiratory illnesses and cardiovascular, liver and kidney diseases, cancer) for the residents of Lipetsk.

✓ Consistent with the environmental reports of regional State bodies and publicly available sources.

✓ It cannot be said, owing to the lack of medical evidence, that the industrial air pollution necessarily caused damage to the applicants' health, but living in the area marked by pollution in clear excess of applicable safety standards exposed the applicants to an **elevated risk to health and may have led to a deterioration of their quality of life.**

✗ Duty to take reasonable and appropriate measures to secure applicants' rights.

Domestic court did not address a central issue in the proceedings of whether measures taken by authorities **were in fact effective and capable of remedying the adverse consequences of industrial pollution for the applicants.** It omitted to determine whether the pollution had reduced or was projected to reduce as a result of those measures and whether they were indeed sufficient to prevent further degradation of air quality and to reduce health risks linked to industrial pollution that the applicants, as residents of Lipetsk, were reportedly exposed to.

Authorities did not **diligently address** the unfavourable environmental situation in Lipetsk. Delays to develop project documentation, inertia in creation of sanitary protection zones required by domestic law. Measures undertaken had no significant effect on emissions reduction or industry compliance w/ standards (**obligation of result?**)

Marangopoulos Foundation for Human Rights (MFHR) v. Greece, 2006 - operation of lignite mines and power stations fuelled by lignite, without taking sufficient account of the environmental impact and without taking all necessary steps to reduce this impact.

International Federation for Human Rights (FIDH) v. Greece, 2013 - long-lasting discharge of industrial liquid waste containing heavy metals into the River Asopos correlated to increase of cancers among local population

- Overcoming pollution is an objective that can only be achieved gradually. BUT States must strive to attain this objective within a **reasonable time**, by showing **measurable progress** and making **best possible use of the resources** at their disposal.
- When this is exceptionally **complex** and particularly **expensive**, a State must use the **maximum of available resources** while being mindful of the impact that their choices on groups with heightened vulnerabilities.
- Obligation to take **legal action** (regulation) and **operational measures** (including supervision of progress).
- **Economic interests (energy independence, access of the entire population to electricity at a reasonable cost and the country's economic growth and industrial development at levels comparable to those of other EU countries) cannot deprive of value environmental authorisation procedures.**

EXPLORE:

<https://www.coe.int/en/web/portal/human-rights-for-the-planet>

https://echr.coe.int/Documents/Guide_Environment_FRA.pdf

https://www.echr.coe.int/documents/fs_environment_eng.pdf

<https://www.coe.int/en/web/portal/-/new-factsheet-on-the-execution-of-echr-judgments-concerning-environment>

<https://www.coe.int/en/web/human-rights-rule-of-law/human-rights-environment>

<https://www.coe.int/en/web/portal/human-rights-environment>

<https://www.coe.int/en/web/portal/-/the-right-to-a-healthy-environment-the-impact-of-the-european-convention-on-human-rights>

