

Improving the reporting of emissions to water in the EU

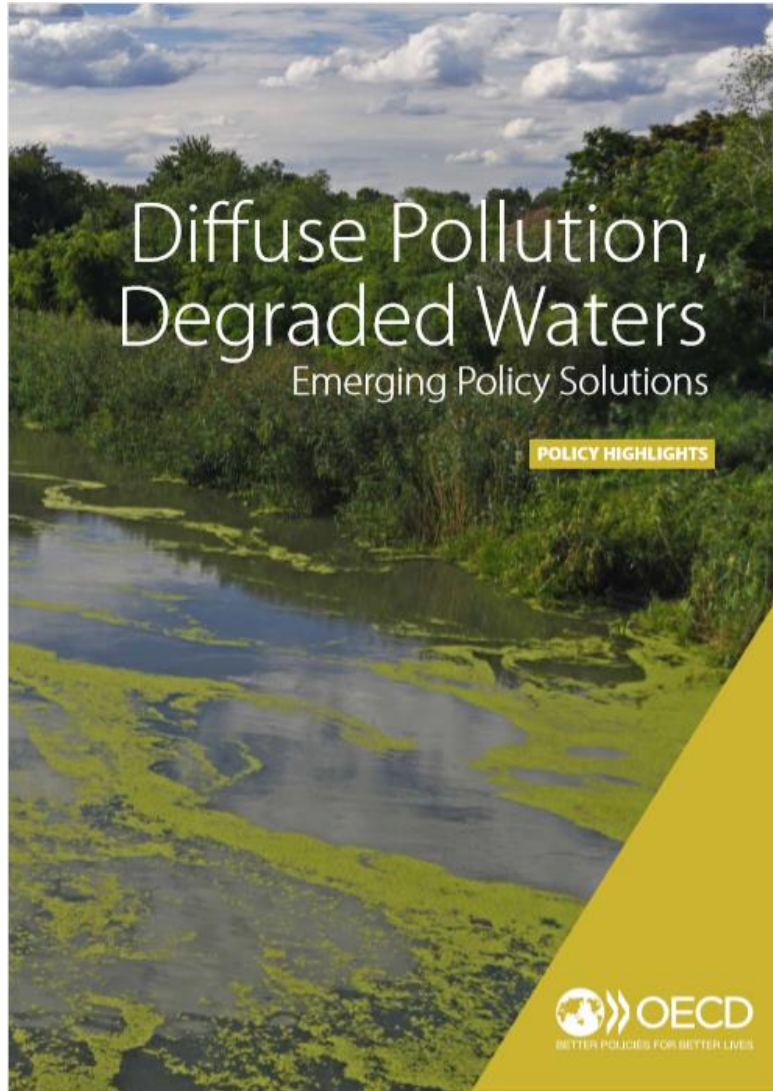


Context

- Series of projects showing some serious problems regarding consistency, completeness and quality of data for emissions to water reported to EU.
- EEA wants to support improving the quality and reporting of emissions data without increasing reporting burden for Member States.
- EEA started an ETC-ICM activity



Not only an EU problem... (OECD, 2017)

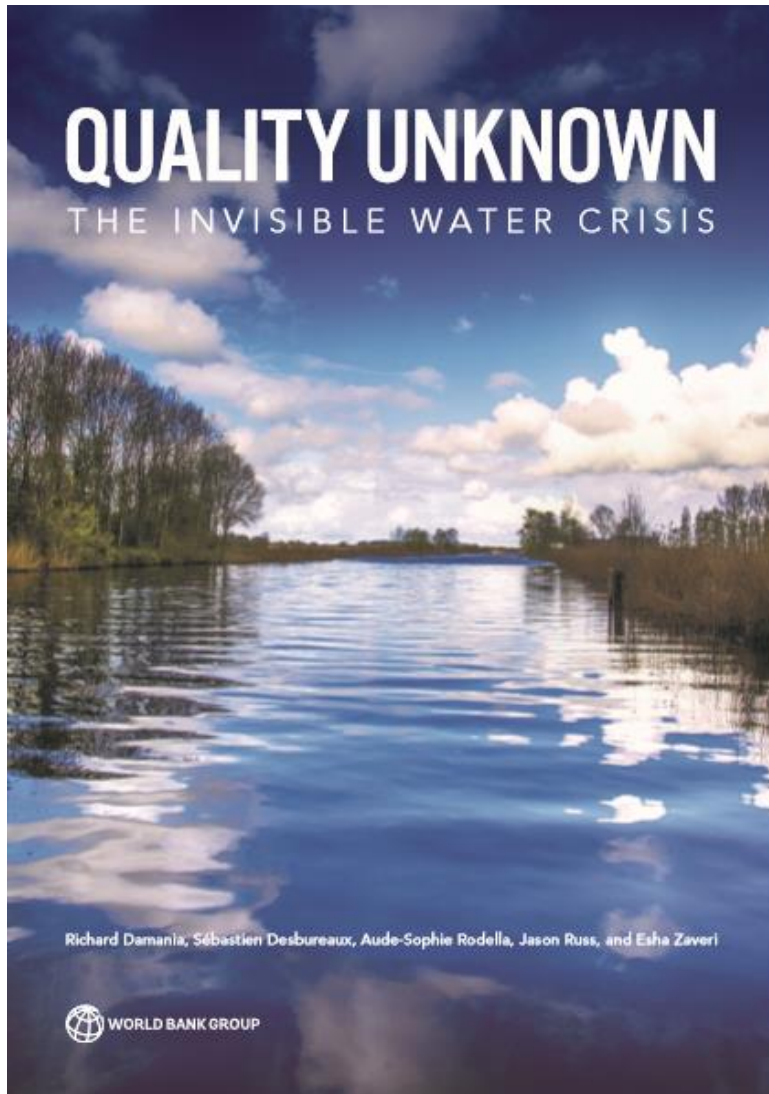


“In comparison to point sources, diffuse source pollution and their impacts on human and ecosystem health largely remain under-reported and under-regulated.”

<https://www.oecd.org/environment/resources/Diffuse-Pollution-Degraded-Waters-Policy-Highlights.pdf>



Not only an EU problem ... (World Bank, 2019)



“The multiple dimensions of uncertainty mean that the scale of the water quality problem is still largely unknown, even for pollutants that are widely monitored and regulated.”

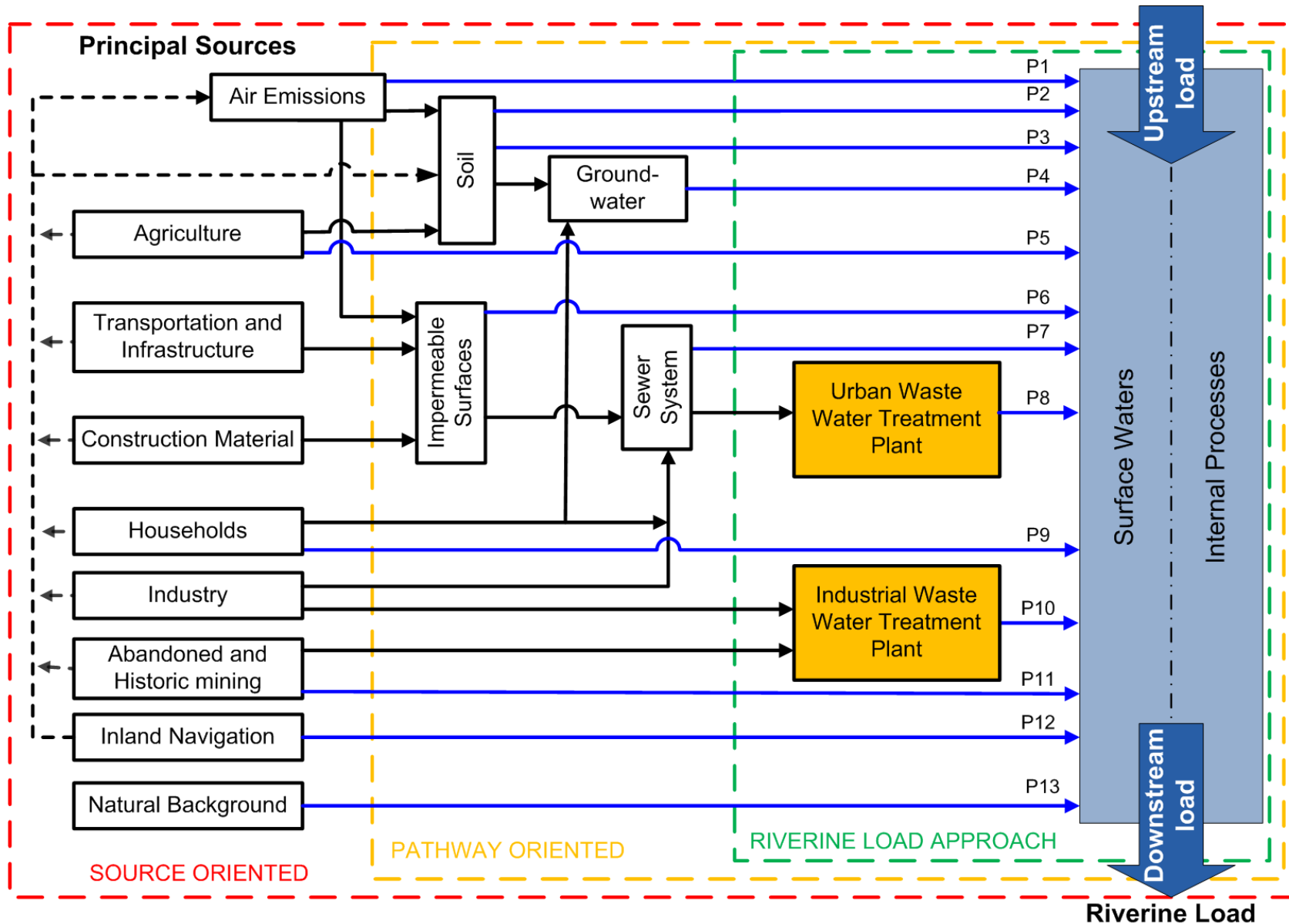
“Water quality is a wicked problem: impacts, sources, and the scale of the problem are all uncertain with solutions that are often elusive.”

“Only three options are available to address the water quality problem: prevention, treatment, and **information provision.**”

<https://openknowledge.worldbank.org/handle/10986/32245>



CIS WFD Guidance document No. 28 Preparation of Priority Substances Emission Inventory (2012)

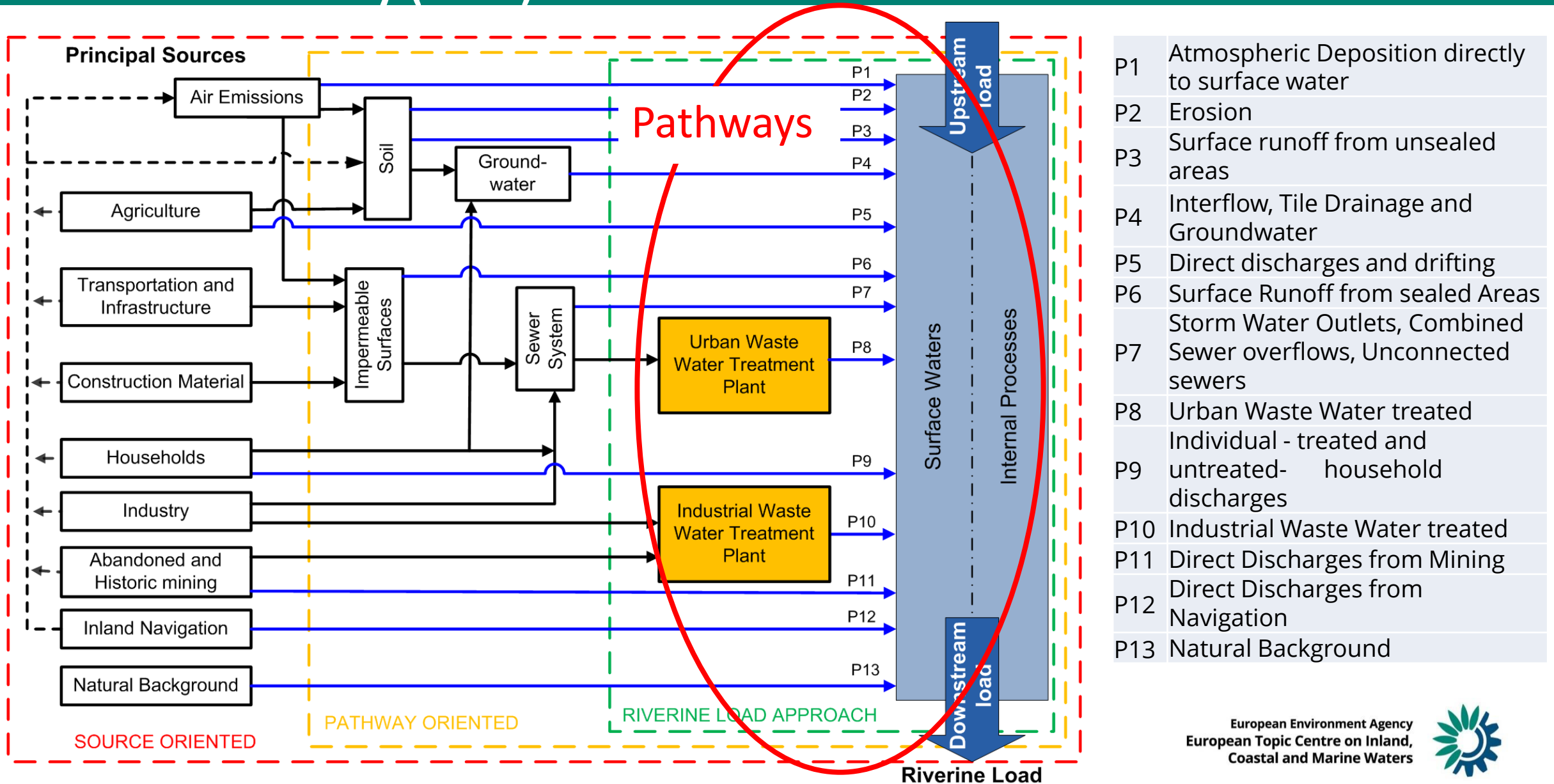


P1	Atmospheric Deposition directly to surface water
P2	Erosion
P3	Surface runoff from unsealed areas
P4	Interflow, Tile Drainage and Groundwater
P5	Direct discharges and drifting
P6	Surface Runoff from sealed Areas Storm Water Outlets, Combined
P7	Sewer overflows, Unconnected sewers
P8	Urban Waste Water treated
P9	Individual - treated and untreated- household discharges
P10	Industrial Waste Water treated
P11	Direct Discharges from Mining
P12	Direct Discharges from Navigation
P13	Natural Background

Link: <https://ecircabc.europa.eu/sd/a/6a3fb5a0-40cc-47e0-b59d-ac93dfbbadd/Guidance%20document%20n28.pdf>



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Work in 2020 and 2021

- Led a Subgroup on Emissions to water under the WFD CIS Working Group Chemicals
- Participation of 11 Member States: AT, BE, DE, DK, FR, IE, IT, MT, NL, PL and MT and 6 stakeholder organizations: Eurometaux, EEB, Eurelectric, CEFIC, EPCA and Concawe
- Web meetings with country presentations, discussions, sharing of data and experiences
- Experts supported by Eurometaux assisted (report *Diffuse Sources of Cadmium, Nickel and Lead to Water in European Countries by Sean Comber*) <https://forum.eionet.europa.eu/nrc-eionet-freshwater/library/emissions-water/wfd-cis-wg-chemicals-subgroup/emissions-water-webinar-september-2021/diffuse-sources-cadmium-nickel-and-lead-water-european-countries-updated-version>



Proposal for a simplified method for the quantification of emissions to water

- Developed a 'simple' method of quantification of loads of a number of pollutants for the 13 pathways
- Using a limited number of emission factors and statistical data:

$$E_{p,a} = AR_a \times EF_{p,a}$$

Where:

$E_{p,a}$ = Emission of a pollutant for an activity

AR_a = Activity Rate for an activity

$EF_{p,a}$ = Emission factor of a pollutant for an activity

- Cover document and factsheets per pathway
 - Supplementary to WFD Technical Guidance Document 28 -> not an obligation
 - Final goal to have a better EU-wide overview of sources
- > more efficient mitigation measures for problem pollutants



Format factsheet

1. Introduction: description, sources, pollutants
2. Calculation methods: explanation of calculation method, activity rates, spatial distribution, models used
3. Emission factors/concentrations of pollutants
4. Conclusions
5. References



What next?

- Cover document and factsheets to WG Chemicals in October:
 - Factsheets P2, P3, P4, P5 draft
 - Other factsheets final (but not perfect!)
- Mandate of subgroup ends in 2021
- Continuation of the work?



Questions/discussion?

