

20230914 Appendix 1

Additional text for REACH PFAS restriction consultation AEAS

Ad III, Non-confidential Comments

AEAS, the Association of Spanish Drinking Water Companies strongly supports the proposed PFAS restriction. PFAS measurements in drinking water emphasize the need for action to protect the sources of our drinking water, the water system in general, and our consumers.

PFAS is a serious risk for drinking water

Based on the 2020 EFSA report on “Risk to human health related to the presence of perfluoroalkyl substances in food”, some MS -Netherlands_RIVM- derived a health-based guidance value of 4,4 ng/l PFOA Equivalents (considering 20% ADI allocation to drinking water). Nevertheless, other State Members considered 10% of ADI allocation to drinking water, and the resulting Danish DW parametric value is 2 ng/L.

In a recent survey by AEAS, it was estimated that PFAS concentrations corresponding to Spanish systems supplying 14% and 37% of the population respectively, exceeded these thresholds. These concentrations need to be brought down to ensure people’s PFAS intake from drinking water does not become too high.

Areas with the highest PFAS concentrations in drinking water are located in the northeastern part of Spain. Environmental concentrations slowly decline because PFAS are widely present, do not or barely degrade, and are difficult to remove in water treatment. Given this fact, a precautionary approach based on source protection like the proposed PFAS restriction, is the way forward. The main principles applied are the rectification of damage at source principles and the polluter-pays-principle.

Projections of future PFAS concentrations in ground- and surface water as a source of drinking water indicate that without tackling the source of PFAS all drinking water sources will eventually surpass these threshold values. Some research in 2022 on PFAS in European waters¹ suggests that PFAS is raising similar high concerns in other EU countries as well.

PFAS is a risk for the water system in general

In addition to the risks for drinking water specifically, it is important to stress that PFAS is a serious risk to the water system in its entirety. If people would only come into contact with PFAS through drinking water, the problem would be less serious. However, there are several other ways in which people are exposed to PFAS.

Furthermore, several examples can be mentioned in which PFAS has negative consequences for water quality. Additional sources of PFAS in the water system, for example, are the supply of PFAS from upstream rivers and the deposition of PFAS through the air. PFAS has a negative effect on ecology, including toxic effects, accumulation in organisms, and subsequently within the food chain.

PFAS also has a negative impact on other water functions like swimming, recreation in general on or close to the water, fishing, irrigation, and livestock watering.

PFAS also contains a risk to water soils and circular ambitions. Dredging activities are sometimes necessary to preserve the water system including the water quality. When PFAS accumulates within water soils, the dredge should ultimately be disposed of which is very expensive. When it comes to sludge which can be derived from sewage

¹ <https://www.rijksoverheid.nl/documenten/rapporten/2022/12/31/pfas-in-europees-water-een-verkenning>

treatment plants, it becomes impossible to reuse the wastewater. In a circular economy, this is an undesirable effect.

TFA: an extreme threat

The occurrence of the ultrashort PFAS TriFluoroacetic Acid (TFA) in surface water, groundwater, and drinking water is an extreme threat because TFA originates from various industrial use, domestic use, and degradation products and is found in high concentrations in the environment and drinking water, illustrating once more that only a global ban can be the way forward to prevent the ubiquitous emissions of this compound and its precursors.

Banning PFAS is crucial for several reasons

Health Risks and Consumer Protection

PFAS has been associated with numerous adverse health effects, including developmental issues, liver damage, thyroid disruption, immune system impairment, and certain types of cancer. These substances can enter the human body through various routes, including drinking water. By banning PFAS in Europe, the aim is to reduce exposure to these harmful chemicals and protect public health. A ban on PFAS is necessary to ensure a safe living environment for European citizens now and in the future.

Water Treatment Challenges and Costs

Removing PFAS from water sources is challenging and costly for drinking water treatment facilities. PFAS is a very persistent group of chemicals with no natural decay. PFAS removal from drinking water is moving PFAS from one medium to another. Due to their unique properties, PFAS are resistant to traditional water treatment processes, making their removal extremely difficult. These molecules are removed but are not destroyed so it is possible to find short-chains PFAS adsorbed in the granular activated carbon or diluted in the concentrate from reverse osmosis -released to the environment.

In conclusion, banning all PFAS in Europe, particularly in the context of drinking water production, is essential for protecting public health, safeguarding the environment, and limiting public costs and even droughts. Droughts, because additional purification with for example membranes, require extra source waters from rivers and aquifers that are threatened for over-exploitation during long dry periods like the summer of 2023, where drinking water facilities throughout Europe feared for shortages. Furthermore, banning PFAS aligns with global efforts to regulate and restrict these substances. It demonstrates Europe's commitment to environmental protection and encourages international harmonization in the control of PFAS. By taking decisive action, Europe can lead the way in creating a safer and more sustainable future, ensuring clean and healthy drinking water for its population.

The need for fast implementation and no exemptions

This restriction proposal does not come as a surprise or unannounced. The societal risks and costs of the use of PFAS have been described many times, for example by Chemsec in 2023². Given the time between the (announcement of the) proposal (2022) and the suggested start of the implementation (2025), there will be enough time for the industry

² <https://chemsec.org/reports/the-top-12-pfas-producers-in-the-world-and-the-staggering-societal-costs-of-pfas-pollution/>

to prepare. Therefore, exemptions should not be tolerated and only be granted under very strict conditions and for a period as short as possible.

The textile, paper, and firefighting foam industries have proven that there are always alternatives available for PFAS. It takes some years of a transformation period, but it is possible, as proven by the H&M group during the ZeroPM workshop in February 2023. Recently (June 2023), Martin Scheringer published a comment in science, with the same conclusion.

Claims that PFAS are essential for societal favorable transitions like the energy transition should be critically assessed. The fact that PFAS are used for “essential” and high-valued products, doesn’t automatically mean that PFAS are essential in these products. There will always be an alternative that will also better fit with the European ambitions of a circular economy. PFAS-containing products are probably impossible to re-use. To prevent further pollution of the European environment and the sources of our drinking water a fast implementation with no exemptions is the way forward.

The overall conclusion of AEAS is that there is strong scientific support for a complete ban of all PFAS according to the proposed PFAS definition, including subgroups such as TFA and fluoropolymers.