USEPA PFAS Roadmap & Timeline

ERM Market Update



In October, the United States Environmental Protection Agency (USEPA) released the Per- and Polyfluoroalkyl Substances (PFAS) Strategic Roadmap: USEPA's Commitments to Action 2021-2024.

The PFAS Roadmap lays out USEPA's proposed approach to research, restrict, and remediate PFAS and includes regulatory and administrative actions and enforcement activities. Planned actions include:

- obtaining data from companies that manufacture (including import) or have manufactured PFAS,
- continuing research on testing methods, PFAS categorization, and PFAS destruction,
- listing PFOA and PFOS under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) to broaden and accelerate the cleanup of PFAS.

The PFAS Roadmap builds on USEPA actions including finalizing several PFAS toxicity assessments and releasing expanded laboratory testing methods. USEPA has also begun to develop a national drinking water standard for PFOA and PFOS and started actions to limit release of PFAS into waterways through restrictions in discharge permits. A detailed timeline of specific actions is provided in the next two pages.

PFAS Strategic Roadmap: USEPA's Commitments to Action 2021-2024

LEGEND

- TSCA
- Office of Water
- Office of Land and Emergency Management
- ★ Office of Air and Radiation
- Office of Research and Development
- Cross-Program

05 | FALL 2022

- Propose MCLs for PFOA and PFOS
- Complete validation of Method 1633 for 40 PFAS
- Complete facility studies on PFAS discharges (for setting effluent limitations)
- ★ Identify mitigation options for PFAS air emissions
- Draft methods for evaluating PFAS leaching from solid materials
- ▲ Develop effective PFAS treatment for drinking water systems

06 | WINTER 2022

- Finalize new reporting of PFAS manufactured since 2011 under TSCA Section 8
- Reduce PFAS discharges through NPDES restrictions & new guidance
- Publish recommended ambient water quality criteria for aquatic life
- Issue annual report on progress towards PFAS commitments





01 | FALL 2021

- Publish national PFAS testing strategy
- Finalize rule for PFAS testing in drinking water under UCMR5 — Completed 12/23/21 and published in FR
- Finalize toxicity assessment for GenX — Completed Oct. 2021
- Draft total absorbable fluorine method for wastewater
- ▲ Identify initial PFAS categories for TSCA test orders
- Begin engagements with communities directly affected by PFAS



02 | WINTER 2021

 Begin categorization of PFAS by (1) toxicity and (2) removal technologies



04 | SUMMER 2022

- Restrict use of inactive PFAS
- Collect PFAS fish tissue data from lakes
- ▲ Identify initial PFAS categories that are effectively removed by select technologies



03 | SPRING 2022

- Enhance PFAS reporting under TRI
- Publish Health Advisories for GenX and PFBS
- Propose listing PFOA & PFOS as CERCLA hazardous substances
- Publish advanced notice of proposed rulemaking to list other PFAS as hazardous substances under CFRCLA
- Establish voluntary PFAS stewardship program





07 | SPRING 2023

 Publish list of PFAS for fish advisories programs



08 | SUMMER 2023

- Propose effluent limitation rule for organic chemicals, plastics and synthetic fibers industries
- Finalize rule for listing PFOA & PFOS as CERCLA hazardous substances



10 | WINTER 2023

 Complete data reviews of PFAS discharges from other industries including leather tanning and finishing, plastics molding and forming and paint formulating to inform effluent limitations

LEGEND

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 Management
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09 | FALL 2023

- Finalize MCLs for PFOA and PFOS
- Update guidance on destruction and disposal of PFAS waste



11 | SUMMER 2024

 Propose effluent limitation rule for metal finishing and electroplating



13 | WINTER 2024

 Finalize risk assessment for PFOA and PFOS in biosolids

12 | FALL 2024

- Publish drinking water analytical method for expanded list of PFAS
- Publish recommended ambient water quality criteria for human health

USEPA has identified three central directives in the PFAS Roadmap that motivate its goals and actions: (1) continued research to increase understanding of PFAS and its effects on human health and the environment; (2) pursuit of a comprehensive approach to prevent PFAS from entering the environment at levels that are harmful to humans; and (3) to "broaden and accelerate" the cleanup of PFAS contamination. USEPA refers to these directives respectively as "research, restrict, and remediate."

RESEARCH RESTRICT REMEDIATE Establish PFAS Use authority under List PFOA & PFOS TSCA to review new categories for as hazardous toxicity, analytical, and existing uses substances under standards. CERCLA and/or Deny LVEs (lowremediation **RCRA** volume exemptions) Establish toxicity for new PFAS Accelerate values & methods identification & Close door on for individual PFAS deployment of abandoned PFAS & PFAS categories technologies to and uses treat, remediate, Obtain information Initiate PFAS destroy, dispose, from industry on studies funded or mitigate PFAS PFAS uses & by manufacturers discharges Maximize under TSCA orders responsible party Continue research Enhance TRI performance on PFAS treatment. reporting and funding for remediation. Limit emissions and investigation and destruction, discharges from cleanup disposal, & control industrial facilities Provide resources Collect PFAS fish New voluntary and assistance to tissue data program to reduce communities Educate/understand use and release of communities with **PFAS** environmental justice concerns

On-Going Efforts

- Ensure a robust review process for new PFAS under TSCA
- Review previous decisions on PFAS under TSCA
- Complete toxicity assessment for 5 more PFAS: PFHxA, PFHxS, PFNA, PFDA, PFBA – draft in Spring to Fall 2022.
- Develop and validate methods to detect and measure PFAS in the environment
- Advance the science to assess human health and environmental risks from PFAS
- Evaluate and develop technologies for reducing PFAS in the environmenty
- Use enforcement tools to better identify and address PFAS releases at facilities
- Educating the public about the risks of PFAS

Key Contacts

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