

Special Issue

Analysis of Environmental Distribution, Mechanisms of Effects, and Risk of Pollutants Driven by New Technologies

Message from the Guest Editors

Artificial intelligence (AI) and machine learning (ML) algorithms (such as deep learning and random forests) deeply explore complex correlations and patterns in massive eDNA, omics data, and traditional monitoring data to precisely map the dynamic spatiotemporal distribution of pollutants across multiple media, identify migration and transformation hotspots, construct predictive models (such as QSAR), and analyze their toxic effects. Based on this, risk assessment and management have entered a brand-new AI era. With this in mind, this Special Issue will provide updated insights into the application of new technologies in environmental pollutants. Topics of interest include environmental distribution, health effects, and risk management, with a particular focus on emerging pollutants and priority pollutants. We invite pioneering scientists to submit their work to this Special Issue. Research articles, reviews, perspectives, commentary, etc., providing evidence on how to use new technologies to conduct pollutant research are welcome.

Guest Editors

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Deadline for manuscript submissions

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About the Journal

Message from the Editor-in-Chief

Toxics (ISSN 2305-6304) is an international, peer-reviewed, open access journal which provides an advanced forum for studies related to all aspects of toxic chemicals and materials. We aim to publish high quality work that furthers our understanding of the exposure, effects, and risks of chemicals and materials in humans and the natural environment as well as approaches to assess and/or manage the toxicological and ecotoxicological risks of chemicals and materials. Please consider publishing in *Toxics* when preparing your next paper.

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manuscripts are peer-reviewed and a first decision is provided to authors approximately 18.1 days after submission; acceptance to publication is undertaken in 1.9 days (median values for papers published in this journal in the first half of 2025).