

Biosolid Contaminants Spawn Litigation, Regulation Risks

By **Peter Coneski, David Fusco and Dawn Lamparello** (August 22, 2025)

Biosolids — aka sewage sludge, the nutrient-rich mix of organic materials produced during the treatment of industrial or municipal wastewater — are an attractive soil amendment for farmlands, due to their high concentrations of two indispensable elements in farming: nitrogen and phosphorus.

As a result of recent research, however, the use of biosolids is coming under scrutiny, due to concerns over whether chemicals found in wastewater and biosolids may present ground, water and food supply contamination risks.

This scrutiny has led to the introduction of proposed legislation in 15 states so far this year that would govern biosolids quality and testing, or establishing moratoriums on land application of biosolids.

Biosolids contamination is also the topic of pending lawsuits against fertilizer producers — *Farmer v. Synagro Technologies Inc.* in the Baltimore County Circuit Court, and *Alessi v. Synagro* in the U.S. District Court for the Northern District of Texas — for allegedly supplying farmers with biosolid-containing fertilizers contaminated with per- and polyfluoroalkyl substances.

And it is the subject of ongoing litigation against the U.S. Environmental Protection Agency — *Farmer v. EPA* in the U.S. District Court for the District of Columbia — for failing to adequately regulate contaminants in biosolids. In both cases, experience tells us more is to come.

With PFAS-related litigation and regulation implicating water districts on the rise, and the recent developments and reports concerning PFAS in biosolids, it is clear that stakeholders in this industry need to be prepared for continued heightened attention and risk of litigation.

EPA Draft Risk Assessment of PFAS in Sewage Sludge

In January, the EPA published a draft of a peer-reviewed risk assessment for PFAS — specifically, perfluorooctanoic acid, or PFOA, and perfluorooctane sulfonic acid, or PFOS — in sewage sludge. The assessment remains in draft form.

But its conclusions — namely, that risks associated with the land application of sewage sludge containing 1 part per billion of PFOA or PFOS exceed the agency's acceptable human health risk thresholds, and that drinking contaminated groundwater sourced near a surface disposal site for sewage sludge containing 1 ppb PFOA or 4-5 ppb PFOS pose human health risks — have prompted significant discussions concerning the land application and disposal of biosolids from water treatment facilities.

Since January, this issue appears to have taken a back seat to other federal priorities. Language in a recent spending bill released in the U.S. House proposes to bar the EPA from



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enforcing any findings related to the risk assessment of the presence in PFAS in biosolids.

Similarly, further federal research and studies concerning potential health implications of PFAS in biosolids are expected to pause as a result of a recent reallocation of federal funding initially earmarked for this topic.

Nevertheless, state lawmakers appear ready to step in. Among the responses to the draft risk assessment are bills appearing in many legislatures seeking further regulation and monitoring of biosolids and its constituents.

State Regulation of Biosolids

In the flurry of state bills seeking to quell consumer exposures to PFAS are a number that specifically address PFAS in discharge and biosolids. While some of these, such as bills that have been adopted in Maine and New Hampshire, predate the EPA's draft risk assessment, the majority appear to be responses to the assessment.

Thus far in 2025, Virginia and Washington have adopted bills requiring, at a minimum, the monitoring of PFAS levels in biosolids, and bills have been introduced in 14 other states that seek to address PFAS in biosolids.

A common theme across many of these bills — such as those in Wisconsin, Maryland, Pennsylvania, Indiana, Texas, Oregon, Rhode Island and Iowa — is, predictably, testing of biosolids and wastewater for the presence of PFAS.

Bills in New York and Oklahoma seek to establish moratoriums on the land application of sludge and biosolids until more is understood about the prevalence and risks associated with PFAS in such materials.

A third proposed approach, taken by lawmakers in Maine, Vermont and Mississippi, is the establishment of an outright prohibition of the land application, sale and distribution of PFAS-containing sludge.

Litigation

As noted above, allegations of PFAS-contaminated biosolids are central to the lawsuits filed against fertilizer producers and the EPA. In *Farmer v. Synagro* and *Alessi v. Synagro*, farmers and landowners from Texas alleged that fertilizer products produced and marketed by Synagro that were applied as a soil amendment contaminated their properties — farms adjacent to where the deposition of biosolids occurred — with PFAS.

While not named as defendants in *Alessi v. Synagro*, operators of wastewater treatment facilities that supplied Synagro with biosolids — including the city of Fort Worth, Texas; the Trinity River Authority; and the city of Austin, Texas — filed a brief in the case claiming immunity in managing wastewater operations, citing that they are passive receivers of sewage discharge and have limited control of the contents of material that comes into wastewater treatment plants.

Many of the same plaintiffs in the lawsuits filed against Synagro also filed suit against the EPA, claiming that the agency failed to appropriately identify and regulate toxic pollutants in biosolids as required by the Clean Water Act.

Although resolution of these cases is eagerly awaited, due to their potential to set important

precedents in biosolids contamination cases, early fallout from the cases already includes the declaration of a state of emergency in Johnson County, Texas, over PFAS contamination of agricultural lands, and the termination of Synagro's contract with Fort Worth.

Outlook on the Biosolids Landscape

Requirements in certain state legislation that PFAS levels in biosolids be analyzed and reported can set the stage for plaintiffs attorneys to obtain such information, and file suit against those implicated in the land application of said biosolids.

Similarly, even where public reporting of PFAS levels in treated materials is not mandated, concentration limits for PFAS in land-applied biosolids in certain states may also lead to compliance hurdles and new lawsuits.

However, in reading between the lines of the EPA's draft risk assessment, as well as the legislative responses, it is not a stretch to see even broader implications on the horizon.

While the focus surrounding increased regulation of biosolids has largely been on PFAS, the identification of biosolids as a potential transmission vector of persistent contaminants from wastewater into the food supply has the potential to result in regulation — and litigation — involving other emerging contaminants as well.

Due to biosolids' relationship to treated water, additional studies performed on the constituent profile of biosolids may prompt regulation of other contaminants that are considered to be ubiquitous. Some researchers allege that biosolids may act as a vehicle for microplastics, polybrominated diphenyl ethers and heavy metals to enter the food supply.

Observations about other persistent contaminants may be soon to follow. While the risks of personal injury and property damage litigation for substances with indeterminate hazard profiles — such as microplastics — are undoubtedly lower than for substances with well-established health effects, uncertainties about the hazard profile of alleged contaminants do not always prevent litigation.

Until specific regulations — and any corresponding testing requirements — applicable to other additional contaminants in biosolids are introduced, the scope of any litigation may remain narrow and specific to those nearly ubiquitous contaminants.

But the general outlook, and the rapid responses of state legislatures to emerging concerns, reinforce the need for increased diligence in understanding sources of wastewater and the connections to potential hazards in biosolids.

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