

# **Destroying Forever Chemicals** with PFAS Annihilator™

PFAS disposal has previously been limited to incineration, landfilling, and collection in stockpiles. These solutions only relocate the PFAS contamination and allow harmful byproducts to persist. As EPA advisory limits tighten, there is a growing need for an effective means of PFAS destruction.

#### Don't Move PFAS. Annihilate It!

The PFAS Annihilator™ is a ready-now, mobile destruction solution powered by supercritical water oxidation (SCWO). The patented technology breaks the nearly indestructible carbon-fluorine bond, destroying all PFAS chemicals to non-detectable levels. It is a scalable solution and can can operate stand-alone or in combination with other systems to break down PFAS in any aqueous matrix, including concentrated waste streams from filtration, separation and concentration media and technologies.



#### **AFFF**

Lifecycle solutions for safe and complete removal, cleanout, replacement, remediation and annihilation of AFFF stockpiles, systems and sites.



#### **Landfill Leachate**

Onsite or offsite treatment, typically paired with foam fractionation, and proven to meet the most stringent discharge limits.



#### Wastewater

Flexible integration with most treatment trains, for annihilation of all PFAS compounds without any harmful byproducts.

# PFAS Annihilator Differentiators:

# >99.99% Destruction:

Long-, Short- and Ultra-Short chain compounds

#### **Minimal Waste:**

Only byproducts are water, inert salts, CO<sub>2</sub>; No Environmental Justice burdens

#### **Highly Efficient:**

<10 sec residence time; exothermic reaction

#### **Complementary:**

Works well with filtration, separation, and concentration technologies

# **Ready Now:**

Full-scale, fully permitted deployment in Michigan processing leachate.
Taking orders now for more units in 2023



#### **A Proven Solution**

In customer engagements, PFAS Annihilator technology has successfully destroyed 99.99% of PFAS in landfill leachate and AFFF, with concentrations in the millions of parts per trillion.



### **Landfill Leachate Deployment Highlights**

- Destroyed concentrated and unconcentrated landfill leachate on site
- >99.9% reduction of PFAS for all tested runs
- No PFAS detected in reactor effluent
- No PFAS detected in the waste stream vapor
- All volatile organic compounds (VOC) and semi-volatile compounds (SVOCs) destroyed to non-detect levels in aqueous effluent



## **AFFF Deployment Highlights**

- Destroyed four formulations of AFFF concentrate (Buckeye AR, National Foam, PHOS-CHEK®, THUNDERSTORM®) using a mobile unit
- Beginning concentrations ranged from 3% to 16% AFFF
- >99.99% removal of all PFAS compounds\*
- No PFOA, PFOS, PFBS, or GenX detected in the final effluent
- 100% destruction of VOCs (SVOCs were not detected in the influent or effluent)

Revive Environmental is bringing this technology to scale to treat industrial volumes.

Contact one of our experts to learn more. www.revive-environmental.com



