



FACT SHEET

NON-BIOLOGICAL EXPEDITIONARY BLACKWATER TREATMENT SYSTEM

PROJECT OVERVIEW

The Non-biological Expeditionary Blackwater Treatment System provides a robust and efficient solution to the costly and environmentally challenging problem of wastewater management on contingency bases. Unlike traditional methods, this low-power, electro-chemical system treats blackwater to meet discharge standards, eliminating expensive waste hauling and its associated risks. Currently in prototype testing, this innovative technology will culminate in a Technical Data Package for transition to PdM Force Sustainment Systems, significantly enhancing military logistical independence and environmental stewardship.

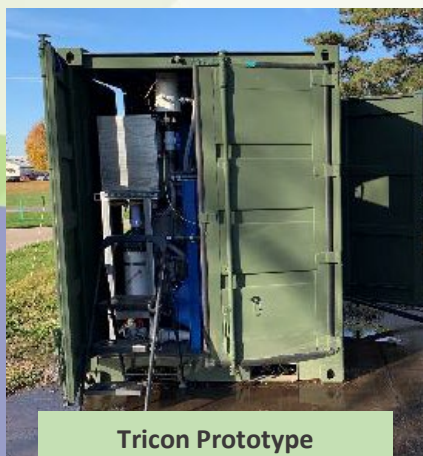
BENEFITS

- Reduces Costs: No more expensive waste hauling.
- Boosts Security: Fewer contractors on base.
- Enhances Logistical Independence: Less reliance on fuel and external support.
- Environment: Eliminates burn pits and contamination.
- Reliable Operation: Robust, quick-start system

PATH FORWARD

A mature prototype will be fabricated by Highland Engineering and will then undergo a 13-week validation test at Michigan State University. Following this, the system will be deployed for two field demos (Army and Navy). The project's final deliverable: Technical Data Package (TDP) ready for transition to the PdM Force Sustainment Systems (FSS) for future procurement.

	a	b	c
COD (mg/L)	2930	183	58
Turbidity	1687	4.5	1.2
TP (mg/L)	57	0.6	0.17



Tricon Prototype



EC and Clarifier Unit



Electrodialysis Unit

DoD Executive Agent

Office of the Assistant Secretary of the Army for Installations, Energy, and Environment

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FOR FURTHER INFORMATION

National Defense Center for Energy and Environment
<http://www.denix.osd.mil/ndcee/home>

DEVCOM Ground Vehicle Systems Center (GVSC)
Fuel and Water Equipment Branch

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