



# X-FLO™ MOBILE CLARIFIER



*"It's the most versatile, easy-to-use Clarifier we've seen."*

*"The X-Flo outperformed the Circular Clarifier we were bypassing." – Environmental Manager*

The **Monroe Environmental**® X-Flo™ Mobile Clarifier is a completely integrated mobile clarification solution for temporary job sites and/or bypass operations. The system can be utilized as a stand-alone clarifier or as a retrofit to improve the performance of existing mobile tanks. The truly unique design of the X-Flo Cartridge allows for the removal settle-able solids as well as floating solids/oils from your wastewater & process liquids – something that cannot be achieved with other mobile treatment tanks or plate clarifier systems!

## X-Flo Mobile Clarifier Design Criteria

Approximate Tank Capacity	16,450 gallon
Approximate System Dimensions	45'-6" L x 8'-6" W x 11'-0" H
Effective Cartridge Settling Area	1,300 ft <sup>2</sup>
Separator Plate Material	Thermoplastic or 304 SS
Tank Material	Coated steel walls and floor
Inlet / Outlet Flanges	Ø10"
Pipe Skimmer	Qty. (1) at 8" diameter (4" flanged discharge)
Sludge Handling	Suction from full length pyramid hopper (sludge pump not included)
Sludge Outlet Flange	4"
Tire & Wheels	Fixed rear axle w/ 10 hole steel wheels, 11 x 22.5 tubeless tire
Axle	20,000 # rated single axle

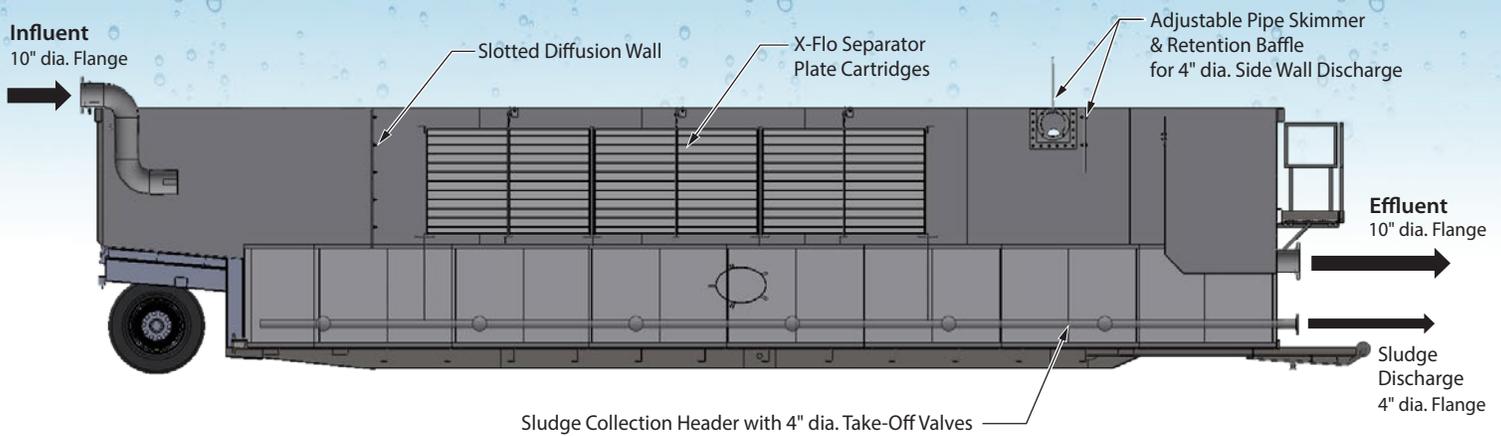
\* Actual treatment capacity varies based on process specifics

## Removes Solids and Free Oils in One Tank!

Targeted Treatment for  
300 - 1,000 GPM

### Applications

- System bypass treatment
- Temporary treatment
- TSS reduction
- Metals reduction
- Oil/water separation
- Dredging
- Mining
- Surge flows
- Coal pile runoff
- Fracking & produced water



As the process stream flows horizontally into the mobile tank, contaminants will begin to separate. A front-end diffusion wall meets the influent flow where it is quieted and distributed across the separator cartridge. The liquid then enters the X-Flo Separator Cartridges, where heavier solids settle on the surface of the plates and lighter contaminants rise on the underside of the plates. The settled solids collect at the bottom of the tank while the floating materials are collected by a second adjustable pipe skimmer and retention baffle positioned after the cartridges.

The solids that collect on the bottom of the tank can be removed by means of pump suction through a full-length manifold header. Individual manual valves allow for isolation and sludge purging from specific areas of the tank.

Clarified liquid exits the X-Flo Mobile Clarifier through the effluent box, which consists of an effluent weir, launder, and flanged discharge.

## Process and Design Features

- Removal of floating and settle-able contaminants all in one clarification step
- Solids, grit, oil, and scum removal
- Co-current cross-flow principal
- Still water channels for quiescent zone to prevent re-entrainment
- Greatly increases settling surface area within mobile tank
- Extreme-duty, chloride resistant tank coating
- Allows for speedy relocation and installation process



*Monroe Environmental Rental and Pilot Systems are an excellent option for testing a technology's performance capability and suitability for a particular application. This is a cost-effective way to evaluate the technology before making a capital investment in a full scale system. Monroe also can provide the support services required to install, operate, and evaluate performance.*



X-Flo is a trademark of Monroe Environmental.