

**Built on Tradition**



**Highland Tank®**



## Underground Cylindrical OWS

HT-2040

Highland Tank cylindrical underground oil/water separators are typically installed in industrial areas and receive oil waste- water generated during processes such as bulk petroleum storage and handling, aircraft and vehicle fueling, maintenance, washing and environmental remediation of petroleum contaminated sites. The effluent from oil/water separators is typically discharged to either a storm or sanitary sewer system.

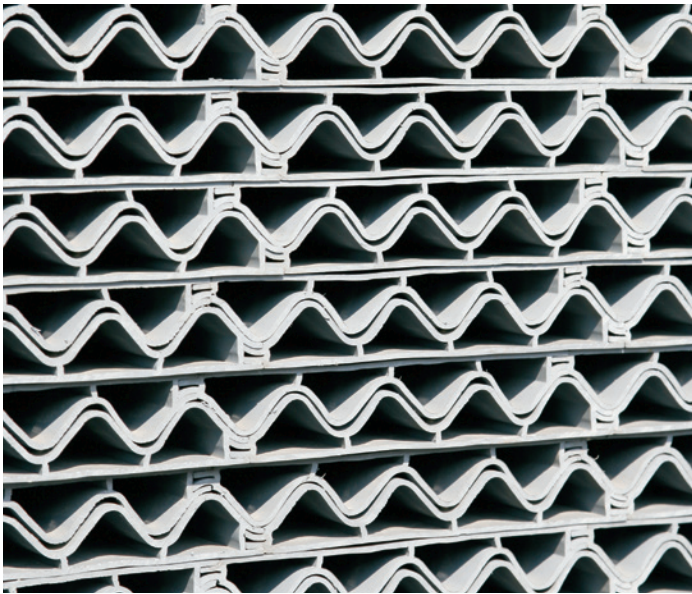
Our high-efficiency oil/water separators are recommended for a wide range of industrial applications, such as:

- Airports & Aircraft Services
- Electric Utilities & Power Plants
- Environmental Remediation
- Industrial Facilities
- Military/Government Facilities & Municipalities
- Petroleum Production & Marketing Facilities
- Railroad Yards & Other Transportation Companies

They are also located in vehicle service areas associated with each of these facilities:

- Fueling Facilities
- Repair & Maintenance Shops
- Wash Areas

Highland oil/water separators set the standard for reliability. Our separators are highly efficient - treating wastewater under a wide range of conditions. Unlike other oil/water separators, they are easy to install, operate and maintain.

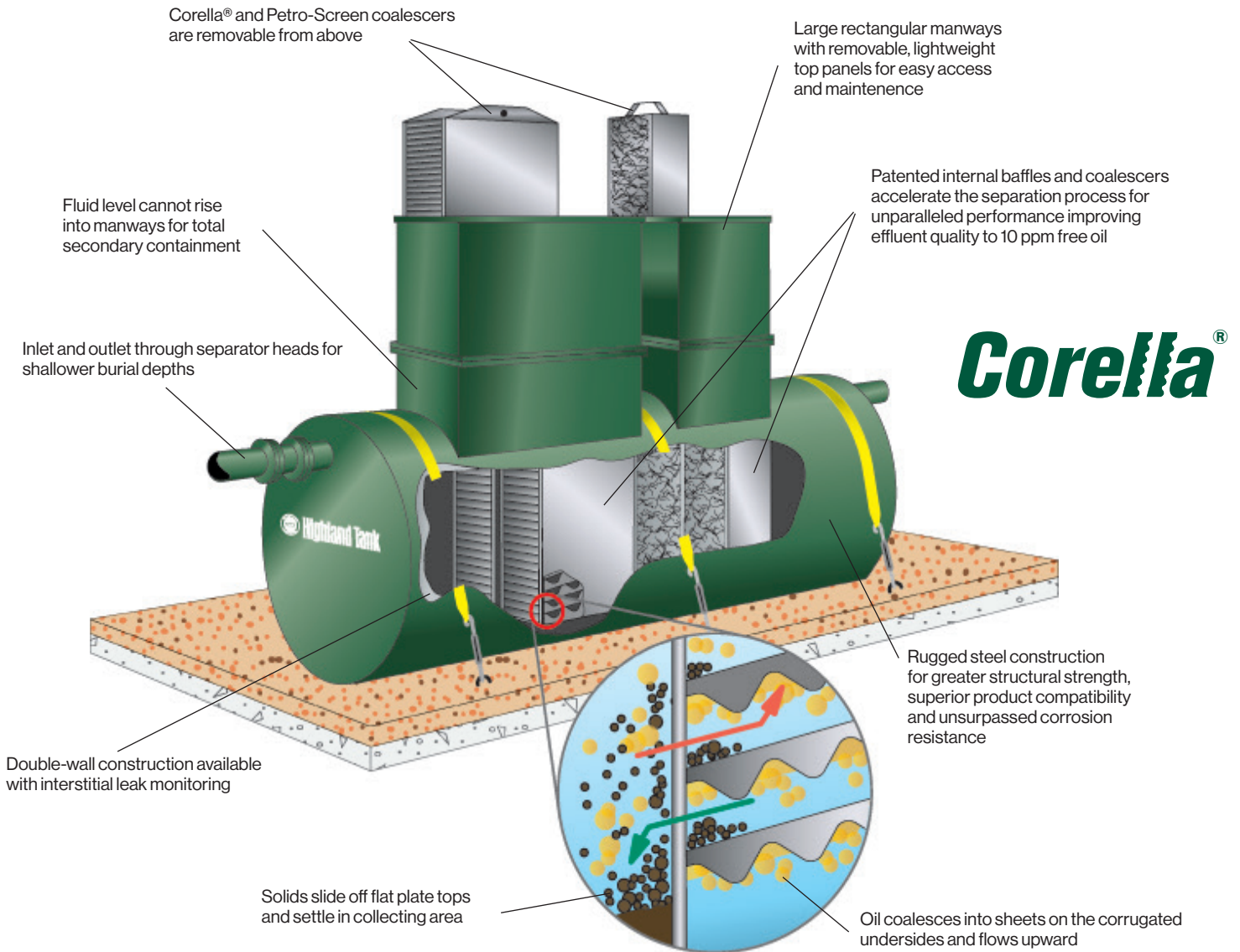


**Corella® The Newest Advancement  
in Oil/Water Separation Technology**

The Corella® Coalescer is a removable, inclined parallel, flat/corrugated plate coalescer that enhances separation of both oil and solids from all strata of the wastewater stream. It is individually engineered to specific application and job-site requirements to maximize utility.

◀ **Patented Corella® technology**

**Corella® - Cleaner. Safer. Smarter.**



**Corella®**

**UL-2215 LISTED**



**Highland Tank®**



Highland Tank Oil/Water Separators are listed and approved under one or more of the following patents and approvals:

Underwriters' Laboratories, Inc. UL-SU2215

U.S. Patents - 4,722,800; 5,520,825 & 6,605,224

Canadian Patents - 1,325,179; 1,296,263 & 2,389,065

City of New York, Board of Standards and Appeals under Calendar Number 1215-88-SA

Massachusetts Board of State Examiners of Plumber and Gas Fitters

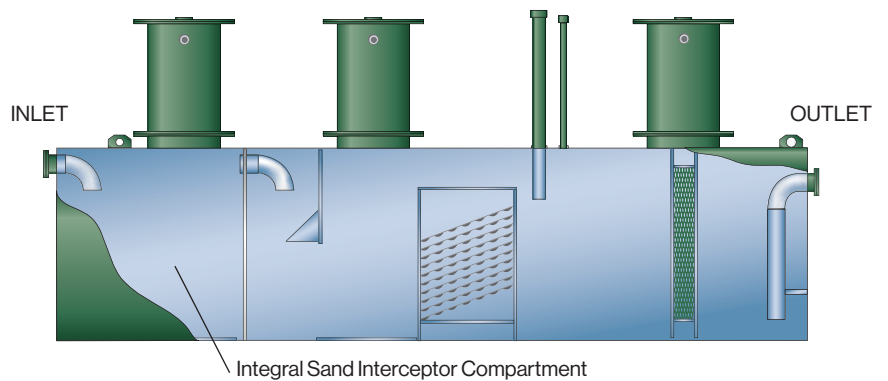
Approval Code P1-0594-25

Evaluated to DIN Parts 4 & 5, DIN 38-409 Part 18

## pre-engineered design options

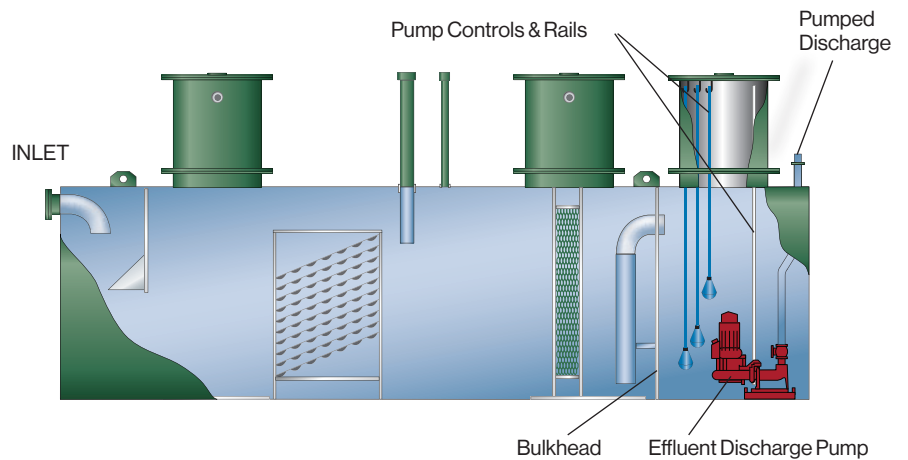
### Series – G Oil/Water Separators

Feature an integral sand interceptor compartment to permit sand and gravel to settle out before the wastewater enters the separation chamber.



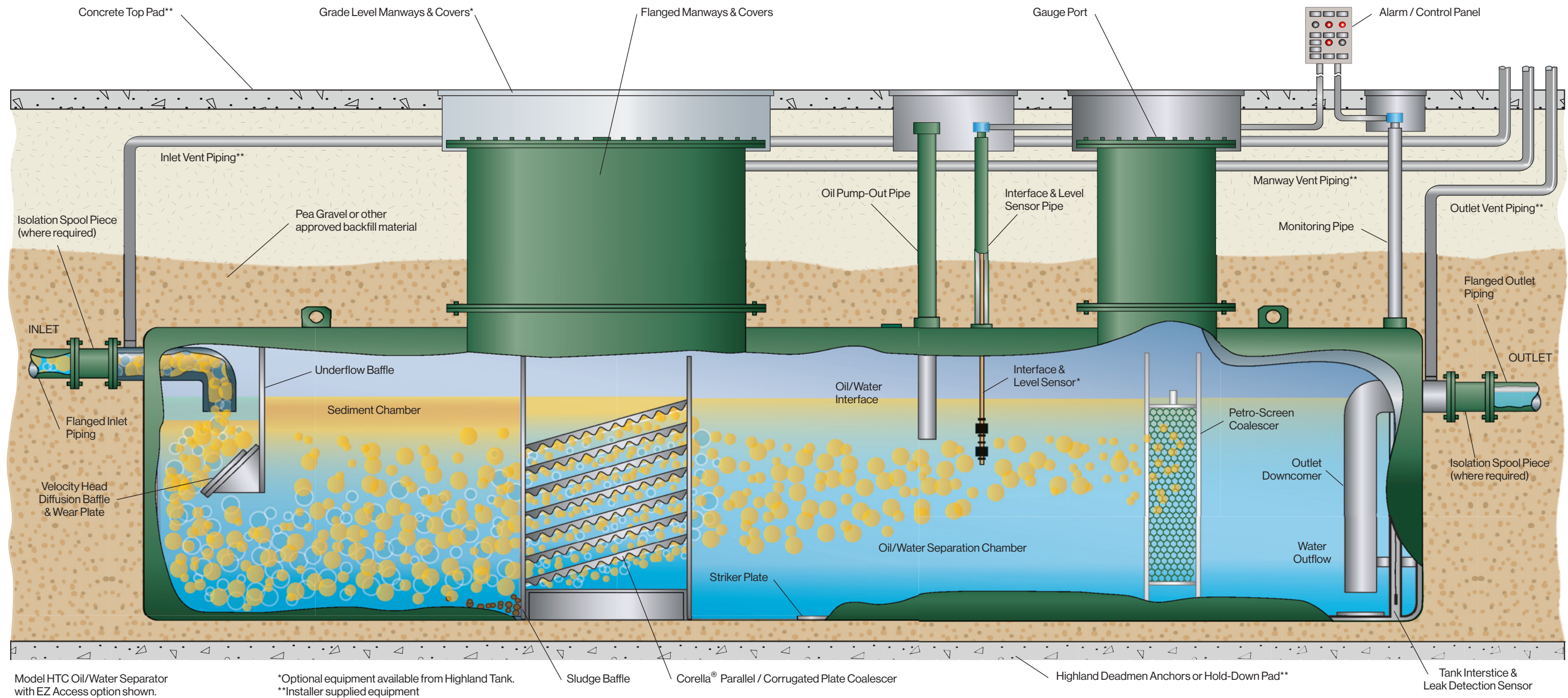
### Series – J Oil/Water Separators

Feature an integral effluent pump-out compartment with level controls to operate a pump at prescribed levels. The pumped effluent can then be routed through Highland's Advanced Hydrocarbon Filtration System to further improve performance.



**Highland Tank**

# How the Cylindrical Oil/Water Separator Works



## How It Works

Highland Tank's patented oil/water separators are stationary wastewater treatment tanks filled with water.

They contain specially designed internal baffles and coalescers to accelerate the separation process. The tank is designed to allow convenient access for inspection and maintenance from above. Inlet flow is directed against the velocity head diffusion baffle to reduce flow turbulence and to distribute the flow evenly over the separator's cross-sectional area.

In the sediment chamber, heavy solids settle out and concentrated oil rises to the surface. The oily water then passes through the Corella® Coalescer, an inclined arrangement of stacked, parallel, flat and corrugated plates.

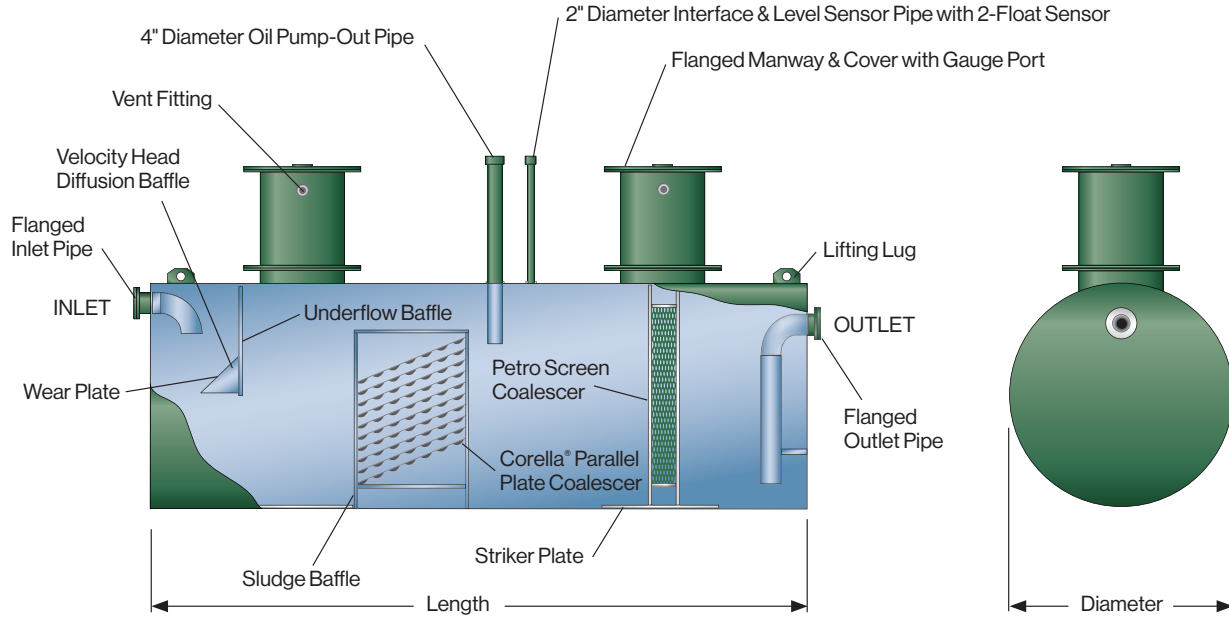
The corrugated underside of the Corella® plates causes the oil to coalesce into sheets. The oil globules then rise to the surface of the separation chamber, where the separated oil accumulates.

Any remaining solids sink to the top of the plates and slide off the plates to the solids collection area. The effluent flows down and toward the outlet and is discharged by gravity displacement.

A Petro-Screen polypropylene impingement coalescer (an encased bundle of layered oil-attracting fibers) is used to intercept droplets of oil that are too minute to be removed by the Corella® Coalescer.

Electronic oil level controls sound an alarm at high oil levels so that waste oil can be removed from the separator. Double-wall separators are monitored with electronic leak detection systems for the interstitial space.

# Drawing & Details



Model HT or HTC	Flow Rate Gal/Min	Recommended		Nominal Dimensions		Inlet & Outlet Diameter
		Total Volume Gallons	Oil Pump-Out Gallons	Diameter	Length	
350	35	350	70	3'-6"	6'-0"	4"
550	55	550	110	3'-6"	7'-9"	4"
1,000	100	1,000	200	4'-0"	10'-9"	6"
2,000	200	2,000	400	5'-4"	12'-0"	6"
3,000	300	3,000	600	5'-4"	18'-0"	8"
4,000	400	4,000	800	5'-4"	24'-0"	8"
5,000	500	5,000	1,000	6'-0"	23'-10"	8"
6,000	600	6,000	1,200	6'-0"	28'-8"	10"
7,000	700	7,000	1,400	7'-0"	24'-4"	10"
8,000	800	8,000	1,600	7'-0"	28'-0"	10"
9,000	900	9,000	1,800	8'-0"	24'-0"	12"
10,000	1,000	10,000	2,000	8'-0"	26'-8"	12"
12,000	1,200	12,000	2,400	8'-0"	32'-0"	12"
15,000	1,500	15,000	3,000	10'-0"	25'-6"	14"
20,000	2,000	20,000	4,000	10'-6"	31'-0"	16"
25,000	2,500	25,000	5,000	10'-6"	38'-9"	18"
30,000	3,000	30,000	6,000	10'-6"	46'-6"	20"
40,000	4,000	40,000	8,000	12'-0"	47'-3"	24"
50,000	5,000	50,000	10,000	12'-0"	59'-6"	24"
60,000	6,000	60,000	12,000	13'-0"	60'-6"	24"

Plate spacing and orientation may vary depending on site conditions. Custom sizing is available. Consult Highland Tank for Series G & J sizing information.



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One Highland Rd.  
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**Manheim, PA**  
4535 Elizabethtown Rd.  
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(717) 664-0600

**Watervliet, NY**  
958 19th St.  
Watervliet, NY 12189  
(518) 273-0801

**Greensboro, NC**  
2700 Patterson St.  
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(336) 218-0801

**Friedens, PA**  
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**Clarkston, MI**  
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**Mancelona, MI**  
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(231) 587-8412