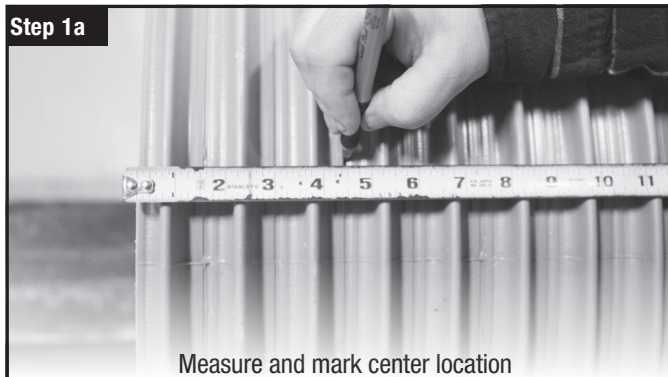


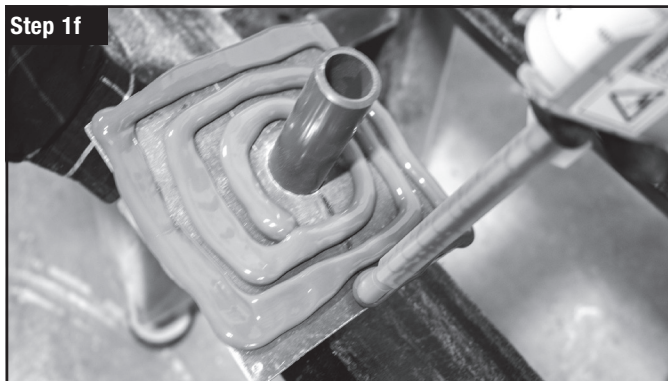
HDA Assembly and Pumps

Step 1a



Measure and mark center location

Step 1f



Note — Riser instructions are for fiberglass (FRP) and PVC Ultra-Rib-Style Access Risers sold by Orenco only.



Key Point — For approved adhesives, see [Adhesives and Dispensers for Orenco Products Technical Data Sheet, NTD-ADH-1](#).

Step 1. Install Mounting Plate Assembly

Install the hanging discharge assembly (HDA) mounting plate assembly in the riser or basin before attaching the riser or installing the basin.

- Access riser:
 - If the assembly hasn't been installed, perform this step.
 - If the assembly has been installed, go to Step 2.
- Pump basin:
 - If the assembly hasn't been installed, see the system's plan set to determine the discharge hole height, then perform this step.
 - If the assembly has been installed, go to Step 3.

Step 1a. Measure and mark the location on the outside of the basin or uninstalled riser for the center of the simplex discharge hole or the on-center point for the duplex discharge holes.

- Access riser: measure from the tank end of the riser.
 - Concrete tanks: 8in (203mm)
 - Orenco M-Series tanks: 9in (229mm)
 - Infiltrator tanks: 11in (279mm)
 - Roth tanks: 11in (279mm)
- Pump basin: Measure the determined discharge hole height from the access lid end of the basin.

Step 1b. Drill the hole in the riser or basin, centered on the mark.

- Simplex hole diameter: 2 1/8in (54mm)
- Duplex hole diameter: 1 7/8in (48mm), 5 1/2in (140mm) on center

Step 1c. Deburr the discharge hole.

Step 1d. Roughen the contact surfaces on the HDA mounting plate and the inside of the riser or basin around the discharge hole.

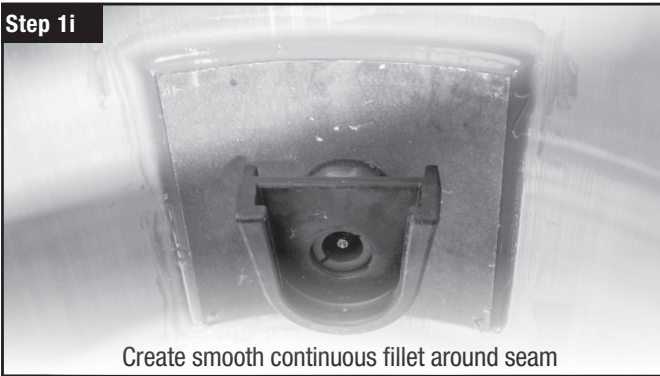
Step 1e. Use a clean rag and acetone to wipe the roughened contact surfaces on the riser or basin and the mounting plate.

Step 1f. Apply methacrylate adhesive to the mounting plate.

- For approved adhesives, see [Adhesives and Dispensers for Orenco Products Technical Data Sheet, NTD-ADH-1](#).
- Begin at the discharge stub.
- Work the adhesive bead outward in a spiral pattern all the way around the edges of the mounting plate.

Step 1g

Open end toward top of riser or basin

Step 1i

Create smooth continuous fillet around seam

Step 1. Install Mounting Plate Assembly, cont.

Step 1g. Press the mounting plate assembly into the discharge hole, with the quick-connect's open end toward the top of the riser or basin.

Step 1h. Use the four stainless steel screws that are supplied with the HDA to secure the mounting plate assembly at each corner.

Step 1i. Add a bead of adhesive around the seam between the mounting plate and the riser or basin, and then make a smooth, continuous fillet around the seam.

- Make sure there are no voids in the adhesive fillet.

Step 2. Install Adapter and Riser

This step applies only to installations in access risers. If you are installing the HDA in a pump basin, go to Step 3.

If you don't see instructions below for your system's components, contact Orenco for assistance.

Step 2a. Install the tank adapter if it hasn't been installed. Follow the manufacturer's instructions.

For Orenco tank adapters:

- For PRTA24 or PRTA30, see [PRTA24 and PRTA30 Tank Adapter Installation Instructions, NIN-TA-PRTA-2](#).
- For RRFTA24, see [Installing RRFTA24 Tank Adapters Instructions, NIN-TA-RRFTA-2](#).
- For RRFTA30, see [Installing RRFTA30 Tank Adapters Instructions, NIN-TA-RRFTA-1](#).
- For FRTA24-RVF or PRTA30 with Roth tanks, see [Adapters for Roth Tanks Installation Instructions, NIN-GOP-TAD-1](#).

For Infiltrator tank adapters:

- For SNAPPAR-Series adapters with Infiltrator tanks, see [Infiltrator Pipe Adapter Ring Assembly Instructions for EZsnap Compatible IM-Series Tanks](#).

Step 2. Install Adapter and Riser, cont.

Step 2b. Install the access riser and any additional components. Follow the manufacturer's instructions.

- For installing grommets and attaching access risers to Orenco tank adapters:
 - For PVC risers, including Ultra-Rib-Style Access Risers sold by Orenco, see [PVC Riser Installation Instructions, NIN-RLA-RR-1](#).
 - For fiberglass (FRP) risers, see [Orenco Fiberglass Riser Installation Instructions, NIN-RLA-RF-1](#).
- For installing Orenco connection systems or splice boxes:
 - For ClickTight™, see [ClickTight Installation Instructions, NIN-CLK-2](#).
 - For internal splice boxes, see [Internal Splice Box \(SB\) Installation Instructions, NIN-SB-SB-1](#).
 - For external splice boxes, see [External Splice Box \(SBEX\) Installation Instructions, NIN-SB-SBEX-1](#).



Key Points

- Watertight seams and penetrations are critical to performance.
- Before installing the riser, confirm:
 - The riser is at the correct height – the recommended height is 2in (50mm) above final grade.
 - The riser penetration heights are correct for the connections.
 - The riser with the HDA is being installed over the correct tank access hole.
 - All riser penetrations are aligned correctly.
- After installing the risers, make sure that all adhesive seams are free of voids, with smooth, continuous fillets.
- Do not test watertightness or backfill until the adhesive is set.

Step 3. Test for Watertightness

Test the tank (and tank-to-riser connections) or basin for watertightness. Follow the manufacturer's instructions.



Note — Some manufacturers require a partial or full backfill around the tank or basin before testing watertightness.

- For testing the seams between an Orenco access riser, tank adapter, and tank for watertightness:
 - For PVC risers, including Ultra-Rib-Style Access Risers sold by Orenco, see [PVC Riser Installation Instructions, NIN-RLA-RR-1](#).
 - For fiberglass (FRP) risers, see [Orenco Fiberglass Riser Installation Instructions, NIN-RLA-RF-1](#).

Step 2b



- For testing Orenco pump basin watertightness:
 - For PVC pump basins, see [PVC Basin Installation Instructions, NIN-PB-1](#).
 - For fiberglass (FRP) pump basins, see [Fiberglass Basin Installation Instructions, NIN-PB-2](#).



Key Points

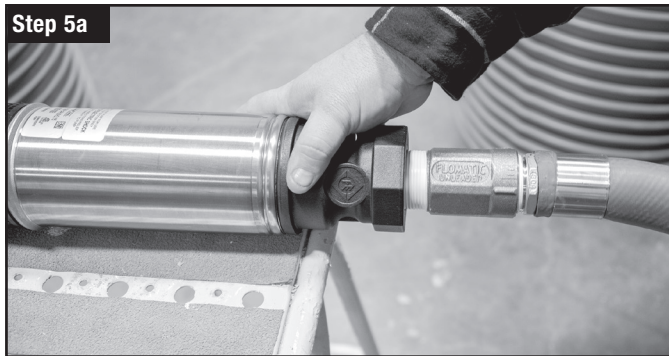
- The seams between the access riser, tank adapter, and tank must all pass the watertightness test before you continue.
- Follow all applicable regulations for watertightness testing.

Step 4. Finish Tank or Basin Installation

Complete the septic tank or basin installation, if needed. Follow the manufacturer's instructions.

- For tanks:
 - For Orenco M-Series tanks, see [Orenco M-Series Tank Burial Instructions, NIN-TNK-9](#).
 - For Infiltrator tanks, see [Infiltrator Septic Tank General Installation Instructions](#).
- For Orenco pump basins:
 - For PVC pump basins, see [PVC Basin Installation Instructions, NIN-PB-1](#).
 - For fiberglass (FRP) pump basins, see [Fiberglass Basin Installation Instructions, NIN-PB-2](#).

Step 5a



Step 5c



Step 5d



Step 5. Prep and Install Pump Assembly

Step 5a. Screw the discharge hose into the pump's discharge end.

- Prep the threads with thread seal tape or thread lubricant.



IMPORTANT — DO NOT raise or lower the pump assembly by the power cord! This can damage the pump and void the pump warranty.

Step 5b. Make sure the pump vault is installed in the tank or basin.

- For PVP-Series vaults, see [PVP-Series Biotube Pump Vault Installation Instructions, NIN-PVU-3](#).
- For PVU-Series vaults, see [Biotube Pump Vault Installation Instructions, NIN-PVU-1](#).

Step 5c. Carefully lower the pump assembly into the pump vault's flow inducer.

Step 5d. Slide the quick-disconnect on the pump assembly into the quick-disconnect on the mounting plate assembly.

- Make sure the pump assembly quick-disconnect is fully and firmly seated into the mounting plate assembly quick-disconnect.

Step 5e. If the pump cord is not being routed and wired immediately, stow the cord in the riser or basin.

- For internal splice boxes, coil the power cord and place it neatly around the splice box.
- For external splice boxes, coil the power cord and secure it to the riser wall with the hook-and-loop strip.
- For ClickTight, coil the power cord and secure it to the riser wall with the hook-and-loop strip.