



NIU T-BOX

Operation Manual

This manual provides you with basic operating information for your T-BOX. If you have additional questions that cannot be answered after reading through this manual, please don't hesitate to call or email us: info@niutoilet.com

Tel: 450-432-5946 Fax: 450-628-4677.

Fresh Water and Pump Operation

(Typical Utility Room layout)

The First valve in the sequence is located inside the utility room door and is to be opened when filling the water tank or running on fresh water (hose hookup). Valve must be closed when running the pump.

2nd valve is only opened when filling the tank. It is left closed all other times.



Third valve is typically located behind pump and must be open to use the pump. Valve must be closed only when filling tank or operating on a fresh water source (hose hookup)

Fresh Water and Pump Operation



Fresh Water System

For T-BOX units that are **not direct-connect** and are **not connected directly to the municipal water supply**, the fresh water tank is located inside the **mechanical room**. This tank supplies water to the unit during operation. The tank should be filled manually through the designated filling point using clean water only. A standard $\frac{3}{4}$ " **garden hose** can be used for filling the tank. Before connecting the hose, flush it briefly to remove any contaminants. Always monitor the water level to ensure the tank contains sufficient water before operating the unit.

Fresh Water Tank Drain Valve

If the unit is equipped with a fresh water tank, the tank can be emptied by opening the drain valve located in the mechanical room. Ensure the valve is fully closed after draining to avoid leakage. It is recommended to empty the tank when the unit will not be used for an extended period or during freezing conditions to prevent damage.

Fresh Water Tank

The fresh water tank (if equipped) is located inside the **mechanical room**. The tank is filled manually using clean water. An overflow drain is installed at the top of the tank to prevent overfilling. Marker lines on the tank indicate the volume of water inside in gallons, allowing the water level to be monitored easily during operation.

Waste Tank



Waste Tank

If the T-BOX is not a direct-connect unit, it is equipped with a waste tank located beneath the floor of the unit. Depending on the model, the unit may include one or more interconnected tanks to maximize storage capacity. The waste tank discharge access is located inside the mechanical room, where it is accessible through a 3-inch pipe and valve connection. To empty the waste tank, connect a vacuum pump hose to the end of the discharge pipe, then open the valve to allow the tank to drain completely. Once emptying is completed, close the valve fully before disconnecting the hose. If you are unsure about the tank capacity or configuration of your unit, please contact the manufacturer for assistance.

Electrical

(typical electrical room set-up)



Electrical System

Each T-BOX is equipped with an electrical system designed specifically according to its installed accessories and power requirements. However, most configurations include the following:

- A power supply connection generally located on the exterior near the utility room door

- Electrical hookups matching the specifications ordered for that specific T-BOX

- If multiple 110V plugs are provided, each must be connected to a separate dedicated outlet

- Interior outlet connections located inside the utility room

- Fuses for the 12V LED lighting system (if equipped)

- Switches controlling interior and/or exterior lighting

- A labeled electrical panel indicating the function of each breaker or fuse

If you have any questions regarding the electrical configuration of your T-BOX, please contact the manufacturer.

Solar Panels (if equipped)



Electrical System

For T-BOX units that are not direct-connect, the electrical system is powered by the solar panels installed on the roof of the unit. The solar panels charge the battery system, which supplies power to the electrical components of the unit during operation.

If additional power is required, the unit can also be connected to an external electrical source through the designated power connection point. Once connected, the external power supply will support the electrical system and battery charging.

The electrical system powers the lighting, pumps, sensors, and other installed accessories. To ensure proper operation, regularly verify that the solar panels remain clean and free of dust, snow, or debris, as obstruction may reduce charging efficiency.

If the unit is equipped with a battery system, avoid disconnecting electrical components while the system is operating. In case of extended periods without sunlight, it is recommended to connect the unit to an external power source if available.

For any questions regarding the electrical setup or maintenance, please contact the manufacturer.

Water Heater (if equipped)



If your T-BOX was ordered with a water heater, the following applies:

The water heater needs to be plugged into an electrical outlet for operation. Once plugged in, the desired temperature is set via the dial on the unit. Do not turn the water heater on unless the unit is filled with water. Operating the water heater without water will damage the unit and void the warranty.

The water heater may have a valve bypass system installed. Valves on either side of the unit control water flow into and out of the heater. Both valves must be open to use the water heater, or closed when not in use. The upper middle valve is the water heater bypass. Open this valve with the other two side valves closed to bypass the water heater. Keep this valve closed when using the water heater.

When winterizing the T-BOX, open the top bypass valve and close the two side valves. This will allow antifreeze to flow past the heater, effectively shutting off the water supply to the heater. Once bypassed, unscrew the lines from the top of the heater and remove the heater. After removing it from the T-BOX, empty all water from the heater and store it during winter in a heated environment.

If equipped with an on-demand water heater, drain both the hot and cold sides of the unit by either unscrewing the fittings below the unit or unscrewing the drain and filter located at the bottom of the unit

UV Lighting System (if equipped)



UV Lighting System

If the T-BOX is equipped with a **UV lighting system**, it is designed to support dry toilet sanitation by helping maintain cleanliness inside the toilet area. There is an **ON/OFF switch located in the mechanical room** to control the UV light system. The switch should remain **OFF** under normal conditions and only be turned **ON when UV sanitation is needed**.

Do not look directly at the UV light while it is operating, as exposure may be harmful to the eyes and skin. After use, switch the system **OFF** again. The UV system is intended as an additional sanitation feature and does not replace regular cleaning and maintenance of the unit.

Winterizing



When a T-BOX is to be subjected to freezing temperatures, it must be winterized or properly heated to prevent damage. Below is the recommended procedure for winterizing the T-BOX:

Drain remaining water from waste and fresh water tanks.

Disconnect any fresh water hoses currently hooked up to the T-BOX. Open the valve inside the utility room just behind the fresh water inlet, close tank fill valve, and open the pump valve.

- i. Run pump until water stops coming out of the unit through the hose hookup.
- ii. Once water stops, close the valve next to the pump, unhook the water lines going into the pump, and run the pump dry.

Hook up an antifreeze pump to water hookup on T-BOX and pump antifreeze into water lines.

Go through each room and run each fixture until antifreeze is seen.

Pour extra antifreeze into p-traps and shower drains.

Wipe excess antifreeze from fixtures to avoid staining and residue.

Vacuum out antifreeze from residential toilets or saniflow pumps if applicable.

- i. To winterize residential/saniflow toilets, open valve and allow holding tank to fill with antifreeze.
- ii. Once full, shut valve then flush toilet.
 - a) For saniflow toilets make sure breaker for saniflow is engaged and allow saniflow to run before shutting off.
- iii. Vacuum excess antifreeze left in toilet bowl and holding tank.
 - a) For saniflow, open drain by twisting drain cap and pulling.
 - b) Use screwdriver or other long narrow device, push into drain to let antifreeze flow out of saniflow.

Winterizing

c) Replace drain cap and twist close.

After all fixtures have been winterized, open tank fill valve and run antifreeze into the fresh tank until it passes the tank drain and flows out.

i. Open fresh tank dump valve and leave open.

If T-BOX is equipped with a water heater, refer to the water heater page provided for details on winterizing.

Warranties



NIU Toilet / Comac Services hereby provides a 2-year limited warranty on all accessories installed in the T-BOX, covering manufacturing defects only.

This warranty is subject to the following conditions:

The defective part must be returned to NIU Toilet / Comac Services for inspection in order to determine the cause of the issue.

This warranty covers replacement of defective parts only.

Labor costs, transportation costs, shipping costs, installation fees, and any related service charges are not covered under this warranty.

This limited warranty is void if the product:

Is not properly maintained.

Is neglected, abused, vandalized, or misused.

Is used beyond recommended operating conditions.

The limited warranty is also void if damage results from continued use after a defect has been discovered or should reasonably have been discovered. NIU Toilet / Comac Services reserves the right to make the final determination regarding warranty eligibility.

This warranty does not cover:

Labor charges.

Transportation or shipping charges.

Damage caused by vandalism, misuse, wear and tear, or improper maintenance.

Cosmetic damages such as scratches, dents, chips, or surface damage not caused by manufacturing defects.

Furthermore, any modification made to the interior or exterior of the T-BOX without written approval from NIU Toilet / Comac Services will void this warranty if such modification contributes to the damage. This warranty is provided to the original purchaser and shall be interpreted according to the laws of the Province of Quebec, Canada.