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PROUDLY CANADIAN

INSTALLATION INSTRUCTIONS

MODEL 400505TW

SEWAGE PUMPS

Please read these instructions carefully. **Failure** to comply to instructions and **designed** operation of this system, may **void** the warranty.

Your pump has been carefully packaged at the factory to prevent damage during shipping. However, occasional damage may occur due to rough handling. **Carefully inspect your pump** for damages that could cause failures. Report any damage to your **carrier or your point of purchase.**

INITIAL START UP PROCEDURES:

1. Inspect the pump and the sewage tank for any obvious condition that may necessitates cleaning, correction, adjustment or repair.
2. Assure that the pump is secure and vertical for proper operation.
3. Assure that there is adequate clearance from any combustible materials or structure. Stored materials must be kept away from the pump. Shelves or cabinet structures must not be in close proximity over the pump.
4. Assure that the motor is securely plugged into a proper 'GFCI' electrical outlet.
5. Test the 'GFCI' outlet by pressing its test switch. This should prove that the outlet is energized and will trip off to protect against a ground fault. Be sure to reset the 'GFCI' by pressing its reset switch.
(Repeat this step monthly)
6. Lift the float to assure that the pump will start when required. (Step 7 below will test submersible pumps with enclosed floats).
7. Pour pails of water in the sewage tank to turn the pump on. Assure that any check valve present will permit the sewage to flow.
8. Observe that the plumbing can pump the sewage safely out of the residence.
(Repeat this step monthly)



Safety instructions:

This fine pump that you have just purchased is designed from the latest in material and workmanship. Before installation and operation, we recommend the following procedures:

- A** Check with your local electrical and plumbing codes to ensure you comply with the regulations. These codes have been designed with your safety in mind. Be sure you comply with them.
- B** We recommend that a separate circuit be lead from the home electrical distribution panel properly protected with a fuse or a circuit breaker. We also recommend that a ground fault circuit be used. Consult a licensed electrician for all wiring.
- C** The ground terminal on the three prong plugs should never be removed. They are supplied and designed for your protection.
- D** Never make adjustments to any electrical appliance or product with the power connected. Do not only unscrew the fuse or trip the breaker, remove the power plug from the receptacle.

IMPORTANT: Electrical connection

Each pump needs to be connected to a separate dedicated circuit protected by a fuse or breaker. This way, the power supply of one pump will not stop operating if the fuse of one of the pumps burns or if the breaker of one of the pumps trips.

Material required for sewage pump application

- Desired length of ABS/DWV 2" pipe, to link up from pump discharge to waste or drain existing pipe.
- Required quantities of 2" ABS/DWV elbow(s) and/or other fitting(s) to run the discharge line.
- Desired length of ABS/DWV 3" pipe and required quantities of 3" ABS/DWV elbow(s) and/or other fitting(s) to run the vent line.
- 1 only 18" X 30" minimum size sewage basin like # 450448 or 24" X 24" like # 450450.
- Teflon tape and ABS cement.

Tools

Screwdrivers, hacksaw to cut pipe, knife to assist in pipe cutting, round file to smooth pipe ends, pipe wrench, adjustable wrench, 1/4" drill bit and drill. Ensure that you have a gas tight cover for your sewage basin and 3" ABS/DWV vent piping.

NOTICE

This unit is not designed for applications involving salt water or brine . Use with salt water or brine will void warranty.

APPLICATIONS

- Designed for a permanent installation for homes and cottages application.
To pumping where the total head requirements do not exceed 15 feet, including pipe friction losses.

- CAPACITY:
5' 3600 US GPH
10' 3060 US GPH
15' 1260 US GPH

FRICION LOSS IN
PIPE NOT INCLUDED

FEATURES

- Vortex designed impellers made from noryl, will not corrode.
- Rugged cast iron pump body.
- Stainless steel mechanical rotary type motor seals.
- 2" NPT pump discharge.
- Thermal and overload protection.
- Mechanical type float switches, 15A.
- 4/10HP, 115VAC, 60Hz, 4A (8A when start) each pump.

INSTALLATION STEPS

see typical installation diagram in page 4

- STEP 1** We recommend that you install your pump and basin in a clean location where there is adequate room for servicing at a later date. Protection from freezing temperatures and good ventilation should be considered as well, to provide the pump an environment for long life.

Friction losses in the discharge pipe must be taken into consideration when many elbows and fittings are installed in the discharge line. Each elbows and fittings must be considered as 1 feet of head.

Never run the pump dry. Damage to the seal may occur.

THE RUN OF THE PIPES FROM THE CHECK VALVES TO THE EXISTING WASTE OR DRAIN LINE MUST NEVER BE SLOPING DOWNWARD EXCEPT WHEN CONNECTING TO SAME.

For a new installation, install your sewage basin in the excavation you have provided in the basement floor of your home. Connect the necessary piping from your shower trap, toilet, etc., to the inlet of your sewage basin, with the proper pipe and fittings (see diagram).

- STEP 2** Cut a length of 40" to 42" of 2" ABS/DWV pipe. Cement the 2" ABS/DWV male adaptor to 2" slip to one end of this pipe.

- STEP 3** With your drill, make a 1/4" hole in the adaptor previously glued. This hole will prevent any air locking wich might occur. Note check that this might have been done in factory.

- STEP 4** Lower pump with piping attached into the sewage basin. Make sure that the pump is as close as possible to the centre of the basin. Adjusting the pumps in centre of basin and keep float switches from rubbing on side of basin.

STEP 5 When you are pumping raw sewage, you must have a gas tight cover on the basin and a vent pipe from basin, connecting to home's vent system (see diagram). Feed the 2" riser pipe from pump's discharge, through the 2" opening in the cover. Secure a 3" vent pipe to the vent opening and bring the switch and pump motor power cables through the opening in the cover provided.

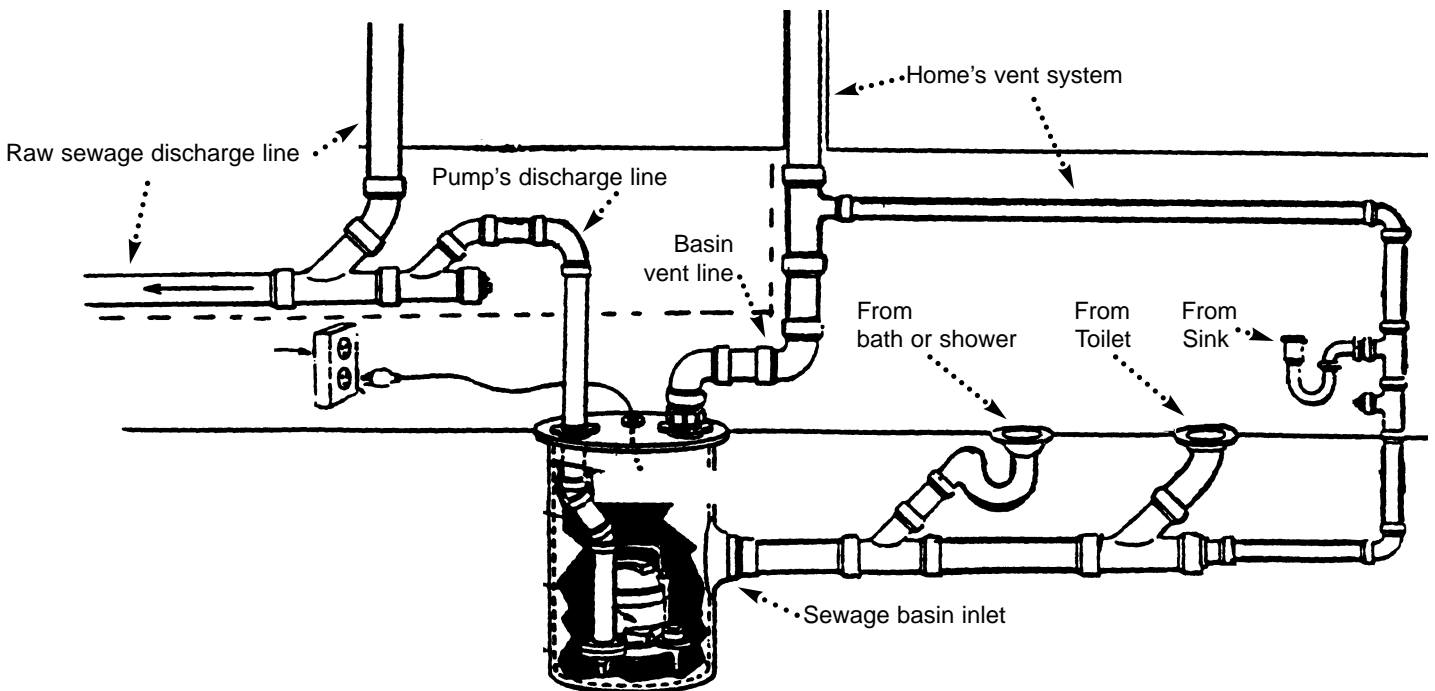
STEP 6 Cut a piece of 2" ABS/DV pipe to the desired length to start the discharge line. Run the discharge line as short as possible to the home's waste sewer line.

STEP 7 Connect the 3 prong plug of the switch in a receptacle. Insert the motor 3 prong plug into female receptacle on exposed piggy-back of switch plug. The mechanical switch provided for automatic operation is preset to pump. No adjustments are necessary. repeat this operation for the second pump.

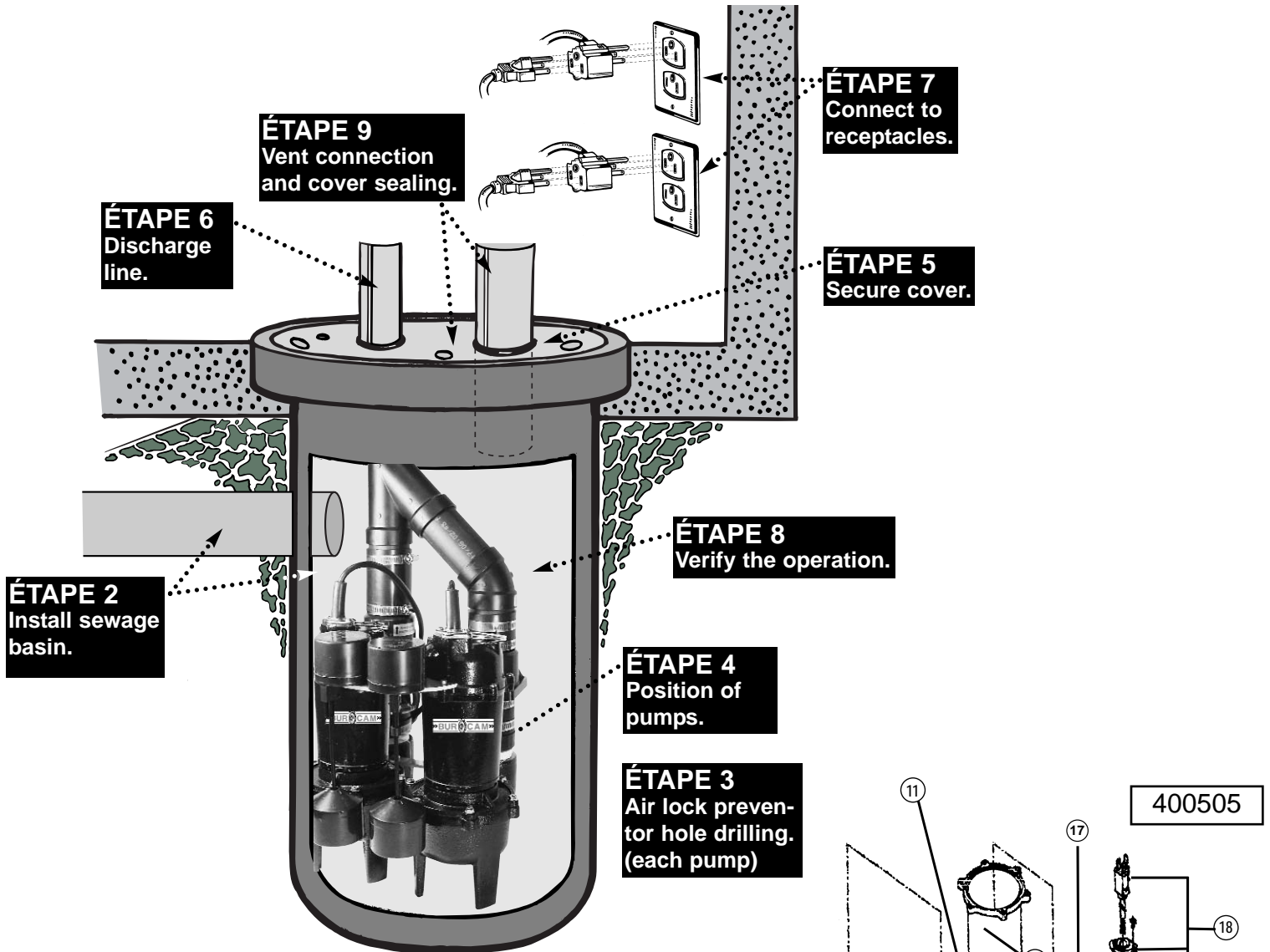
STEP 8 Fill the sewage basin with water to test the operation of the submersible sewage pump and switch operation. Pump should start pumping when the water level reaches 12" to 15" above the bottom of the basin and above the pump. Allow the pump to go several "on-off" cycles to assure satisfactory operation.

STEP 9 Secure the gas tight cover and the plug for electrical cords with the gaskets and screws provided with the cover. Make vent connection to home's vent system.

SEWAGE SYSTEM TYPICAL PIPING

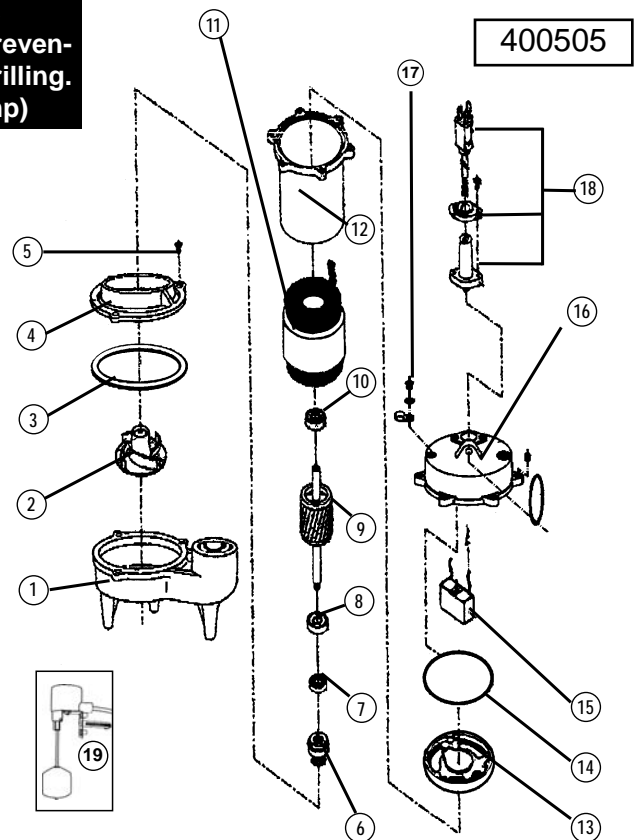


SEWAGE PUMP APPLICATION



REPAIR PARTS

#	REF	DESCRIPTION	#	REF	DESCRIPTION
1	450525	Volute base	11	350272	Stator
2	450528	Impeller	12	450532	Stator housing
3	450529	Rubber gasket	13	350286	Bearing housing
4	450526	Volute cover	14	350118	Pump Gasket
5	450533	Pump body screw	15	350273	Capacitor
6	350278	Mechanical seal	16	310806	Upper casing
7	350125	Oil seal	17	350289	Screw
8	350340	Lower bearing	18	350294	Power cable
9	350271	Rotor	19	450446	Vertical switch
10	350340	Upper bearing	21	450457	Check valve (not shown)



Repair parts may be ordered from your authorized point of sale or from
BUR-CAM PUMPS

TROUBLE SHOOTING GUIDE CHECKLIST

NEVER MAKE ADJUSTMENTS TO ANY ELECTRICAL APPLIANCE OR PRODUCT WITH THE POWER CONNECTED. DON'T JUST UNSCREW THE FUSE OR TRIP THE BREAKER, REMOVE THE POWER FROM THE RECEPTACLE.

TROUBLE	PROBABLE CAUSE	ACTION
Motor does not run.	Switch is off position Blown fuse Tripped breaker Disconnected plug Corroded plug Float stuck Defective switch Defective motor	Turn switch to on position Replace Reset Re-install Clean Check movement Replace Replace
Motor runs but no water is delivered.	Improper voltage Pump may be airlocked Pump discharge head too high Clogged inlet/impeller	Check voltage Check drilled hole in discharge pipe Wrong pump selection (over 15') Clean
Pump does not deliver to full capacity.	Improper voltage Pump may be airlocked Pump discharge head too high Clogged inlet/impeller	Check voltage Check drilled hole in discharge pipe Wrong pump selection (over 15') Clean
Pump does not shut off.	Defective switch Missing check valve Clogged check valve in open position Float obstruction	Replace Install valve Clean debris Check for movement

TO THE END CONSUMER

If you have any problems with the product, before advising the store, where you've purchased the pump, please contact us at 514 337-4415 , and ask for our sales department, and they will be pleased to help you with any questions you might have, concerning your installation.