# INSTALLATION INSTRUCTIONS

### INSTALLATION INSTRUCTIONS FOR DRAIN PUMP KITS A39462-021, KPU090 and DPFGIM

#### Kit contents:

- Pump and motor with check valve
- · Switch mounting bracket assembled to switch assembly
- Wire harness
- Pressure hose (clear)
- Drain hose (white preformed)
- · Stainless steel shield
- · Misc. hardware: Snap bushing, hose clamps, mounting bolts and screws

Note: This pump can be installed in a cubed ice machine or a nugget / pearl ice machine. Cubed ice machine instructions begin now; nugget ice machine instructions are on page 6.

Cubed Ice: Installation requires removal of the cabinet from the base; attachment of the switch mounting bracket to the base; attachment of the pump to the base; and connection of wire harnesses and tubing. Stainless steel shield not used on cubers.

#### Removal of the cabinet:

- 1. If the machine is in a freeze mode, perform a manual harvest.
- 2. Remove all ice.
- 3. Drain reservoir (remove reservoir drain cap).
- 4. Remove service panel and kick plate.



AWARNING Electrical Shock

Hazard. Disconnect electrical power before beginning removal

- 5. Remove back panel.
- 6. Disconnect electrical power.
- 7. Disconnect water and drain tubing.
- 8. Remove door.

9. Remove top panel.

- 10. Remove control box cover.
- 11. Disconnect thermistor from controller, pull wire back to suction line.



12. Remove curtain & hanger.



13. Locate elbows where water flows onto the evaporator platen.



14. Pull water inlet elbow out of inner elbow.

15. Pull clip up. Push inner elbow back and rotate it until it points straight up, then push it back through the hole in the back of the freezing compartment.

Note: It is not necessary to pull the hose off the inlet elbow.



- 16. Remove two screws holding freezing compartment brace to cabinet, lift brace up.
- 17. Lift evaporator platen up and tilt back enough for bin assembly to clear the base.



18. Remove air baffle.



19. Unplug 7 wire harness connector (at back of bin).

- 20. Remove 1 screw at each corner of the base.
- 21. Lift bin assembly off the base.



Chassis Shown in Front of Bin Assembly

Note: Prop evaporator assembly up. A 3' length of 3/4" PVC tubing with one end inserted into the cup mold and the other against the base will hold it up.

## **GRAVITY DRAIN CONVERSION INSTRUCTIONS**

1. Uncoil the 10-foot long discharge tubing and push one end completely onto the barbed discharge elbow of the pump and securely fasten it with the small metal hose clamp. Route the other end through the water tube routing panel to a convenient drain location.



Assembled Drain Pump System

- 2. Place the pump over the bolts located in the base and secure with the two nuts provided in the kit.
- 3. Route straight portion of drain tube through hole in switch bracket.
- 4. Connect drain tube to pump inlet, secure with hose clamp.
- 5. Mount the switch assembly bracket to the base, using two provided sheet metal screws.
- 6. Connect pressure switch hose to drain hose.
- 7. Trace power cord to first connector (it's near the compressor) and separate the connector.
- 8. Connect the kit wires as follows:

- Pump motor to switch harness
- Switch harness (black & white wires) to power cord connector half from step 7.
- Switch harness (red & white wires) to machine connector half from step 7.
- 9. Refer to the unit's wiring diagram and re-check all electrical connections for proper placement.
- 10. Return cabinet to the base and secure with the original screws.
- 11. Return evaporator platen to reservoir, secure brace to cabinet.
- 12. Reconnect thermistor and electrical harness.
- 13. Reattach controller cover.
- 14. Connect drain tube to bin drain, and secure with large hose clamp.
- 15. Reconnect water inlet fittings at evaporator platen.
- 16. Return top panel to unit, attach using original screws.

17. Restore power to the unit and with the unit still OFF, pour several quarts of water into the bin. The drain pump should turn on and pump the water out of the bin, perhaps cycling on and off several times during the process. Pump cycling is normal since the pump-out rate of the drain pump is greater than the rate of drain through the bin.

18. While the pump is discharging water, THOROUGHLY CHECK THE ENTIRE DRAIN SYSTEM FOR LEAKS.

19. Re-install all baffles, panels and covers.

20. Re-install unit into built-in or free-standing location. ENSURE THAT NO KINKS OCCUR IN WATER INLET OR DRAIN TUBING. **Double-check for leaks!** 

21. Restore potable water supply and restart the unit. Check unit for at least one cycle to ensure proper operation and to allow a final check for leaks of any kind.

Conversion of a cubed ice gravity drain system to a drain pump system is complete.

NUGGET / PEARL ICE MACHINE INSTRUCTIONS. Installation requires attachment of the switch mounting bracket to the base; attachment of the pump to the base; and connection of wire harnesses and tubing.

- 1. Remove any ice from the bin.
- 2. Shut water supply OFF and remove drain plug from bottom of shelf. Drain all water and return plug to its original position.

Drain Plug Location

- 3. Pull unit out to access side panel.
- 4. Unplug unit from electrical power.



# **A**WARNING

Electrical Shock Hazard.

Disconnect electrical power before beginning removal

5. Remove side service panel.



Unit Shown With Side Service Panel Removed and Pump Installed

6. Remove existing drain hose from unit.



Assembled Drain Pump System

7. Uncoil the 10-foot long discharge tubing and push one end completely onto the barbed discharge elbow of the pump and securely fasten it with the small metal hose clamp. Route the other end through the water tube routing panel to a convenient drain location.

- 8. Place the pump over the bolts located in the base and secure with the two nuts provided in the kit.
- 9. Route straight portion of drain tube through hole in switch bracket.
- 10. Connect drain tube to pump inlet, secure with hose clamp.
- 11. Mount the switch assembly bracket to the base, using two provided sheet metal screws.
- 12. Connect pressure switch hose to drain hose.
- 13. Trace power cord to first connector (it's near the compressor) and separate the connector.
- 14. Connect the kit wires as follows:
- Pump motor to switch harness

- Switch harness (black & white wires) to power cord connector half from step 13.
- Switch harness (red & white wires) to machine connector half from step 13.

15. Refer to the unit's wiring diagram and re-check all electrical connections for proper placement.

16. Connect drain tube to bin drain, and secure with large hose clamp.

17. Restore power to the unit and with the unit still OFF, pour several quarts of water into the bin. The drain pump should turn on and pump the water out of the bin, perhaps cycling on and off several times during the process. Pump cycling is normal since the pump-out rate of the drain pump is greater than the rate of drain through the bin.

18. While the pump is discharging water, THOROUGHLY CHECK THE ENTIRE DRAIN SYSTEM FOR LEAKS.

19. Attach stainless steel shield to side of condenser shroud using provided screws.



20. Re-install all baffles, panels and covers.

21. Re-install unit into built-in or free-standing location. ENSURE THAT NO KINKS OCCUR IN WATER INLET OR DRAIN TUBING. **Double-check for leaks!** 

22. Restore potable water supply and restart the unit. Check unit to ensure proper operation and to allow a final check for leaks of any kind.

Conversion of a gravity drain system to a drain pump system is complete.