# Hoshizaki America, Inc.

Self-Contained Cubelet

Models C-100BAF C-100BAF-DS C-100BAF-AD C-100BAF-ADDS



"A Superior Degree of Reliability"

www.hoshizaki.com



INSTRUCTION MANUAL

Issued: 5-26-2010 Revised: 11-2-2010

### - IMPORTANT -

Only qualified service technicians should install, service, and maintain the icemaker. No installation, service, or maintenance should be undertaken until the technician has thoroughly read this Instruction Manual. Likewise, the owner/ manager should not proceed to operate the icemaker until the installer has instructed them on its proper operation. Failure to install, operate, and maintain the equipment in accordance with this manual may adversely affect safety, performance, component life, and warranty coverage.

Hoshizaki provides this manual primarily to assist qualified service technicians in the installation, maintenance, and service of the icemaker.

Should the reader have any questions or concerns which have not been satisfactorily addressed, please call, write, or send an e-mail message to the Hoshizaki Technical Support Department for assistance.

HOSHIZAKI AMERICA, INC. 618 Highway 74 South Peachtree City, GA 30269

Attn: Hoshizaki Technical Support Department

Phone: 1-800-233-1940 Technical Support (770) 487-2331 Fax: 1-800-843-1056 (770) 487-3360 E-mail: techsupport@hoshizaki.com

Web Site: www.hoshizaki.com

**NOTE:** To expedite assistance, all correspondence/communication MUST include the following information:

- Model Number \_\_\_\_\_\_
- Serial Number \_\_\_\_\_\_
- Complete and detailed explanation of the problem.

#### - IMPORTANT -

This manual should be read carefully before the icemaker is installed and operated. Only qualified service technicians should install, service, and maintain the icemaker. Read the warnings contained in this booklet carefully as they give important information regarding safety. Please retain this booklet for any further reference that may be necessary.

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#### **Important Safety Information**

Throughout this manual, notices appear to bring your attention to situations which could result in death, serious injury, or damage to the unit.

A WARNING Indicates a hazardous situation which could result in death or serious injury.

**CAUTION** Indicates a situation which could result in damage to the unit.

**IMPORTANT** Indicates important information about the use and care of the unit.

#### **A**WARNING -

This icemaker should be destined only to the use for which it has been expressly conceived. Any other use should be considered improper and therefore dangerous. The manufacturer cannot be held responsible for injury or damage resulting from improper, incorrect, and unreasonable use. **To reduce the risk of death, electric shock, serious injury, or fire, follow basic precautions including the following:** 

- This unit requires an independent power supply. See the nameplate for proper voltage and breaker/fuse size. Failure to use a proper breaker or fuse can result in a tripped breaker, blown fuse, or damage to existing wiring. This could lead to heat generation or fire.
- THIS UNIT MUST BE GROUNDED: This unit is equipped with a 3-prong grounding plug to reduce the risk of potential shock hazards. It must be plugged into a properly grounded, independent wall outlet. If the outlet is a 2-prong outlet, it is your personal responsibility to have a qualified electrician replace it with a properly grounded, independent 3-prong wall outlet. Do not remove the ground prong from the power cord and do not use an adapter plug.
- Do not use an extension cord.
- Make sure the power switch is in the "OFF" position before plugging in or unplugging the unit to reduce the risk of electric shock.
- Do not use a unit with a damaged power cord. The power cord should not be altered, jerked, bundled, weighed down, pinched, or tangled. Such actions could result in electric shock or fire. To unplug the unit, be sure to pull the plug, not the cord, and do not jerk the cord.
- To reduce the risk of electric shock, do not touch the plug or power switch with damp hands.
- Do not place fingers or any other objects into the ice discharge opening.
- This unit should be disassembled or repaired only by qualified service personnel to reduce the risk of electric shock, injury, or fire.
- Do not make any alterations to the unit. Alterations could result in electric shock, injury, fire, or damage to the unit.

# I. Specifications

# A. Construction



#### **B. Nameplate Rating**



Note: Only the "MODEL NUMBER" is replaced for C-100BAF-DS, C-100BAF-AD, and C-100BAF-ADDS.

See the nameplate for electrical and refrigeration specifications. This nameplate is located on the left side panel.

We reserve the right to make changes in specifications and design without prior notice.

# C. Dimensions/Connections

# 1. C-100BAF



Units: mm [in.]

7

### 2. C-100BAF-DS

Units: mm [in.]



Units: mm [in.]

504 [19.85]









# **II. Installation and Operating Instructions**

# - 🛦 WARNING -

- 1. This icemaker must be installed in accordance with applicable national, state, and local codes and regulations.
- 2. **CHOKING HAZARD:** Ensure all components, fasteners, and thumbscrews are securely in place after installation. Make sure that none have fallen into the storage bin.

# A. Checks Before Installation

- Visually inspect the exterior of the shipping container and immediately report any damage to the carrier. Upon opening the container, any concealed damage should also be immediately reported to the carrier.
- Remove the shipping carton, tape, and packing material. If any are left in the icemaker, it will not work properly.
- Remove the package containing the accessories.
- Remove the protective plastic film from the panels. If the icemaker is exposed to the sun or to heat, remove the film after the icemaker cools.
- See the nameplate on the left side panel, and check that your voltage supplied corresponds with the voltage specified on the nameplate.

# **B.** Location

#### 1. General

This icemaker is approved for indoor or outdoor use.

#### - CAUTION -

- Normal operating ambient temperature should be within 45°F to 100°F (7°C to 38°C); Normal operating water temperature should be within 45°F to 90°F (7°C to 32°C). Operation of the icemaker, for extended periods, outside of these normal temperature ranges may affect icemaker performance.
- 2. This icemaker will not work at sub-freezing temperatures. To prevent damage to the water supply line, drain the icemaker if the air temperature is going to go below 32°F (0°C). See "III.C. Preparing the Icemaker for Long Storage."

For best operating results:

- The icemaker should not be located next to ovens, grills, or other high heat producing equipment.
- The location should provide a firm foundation for the icemaker.
- This icemaker requires no side or top clearance. But allow enough space at rear for water supply and drain connections and at least 15" (38 cm) clearance at front.

#### 2. Built-In Installation Site

#### - CAUTION —

1. Do not let the weight of the counter rest on the icemaker.

2. Do not install the icemaker in a corner where the door will interfere with other equipment or where the icemaker cannot be pulled out for service.

Installation Space			
Model	Height	Width	Depth
C-100BAF C-100BAF-DS	34" (864 mm) minimum	15" (291 mm) minimum	24" (610 mm) minimum
C-100BAF-AD C-100BAF-ADDS	32" (814 mm) minimum	- 15" (381 mm) minimum 24" (610 mm) minim	

#### **Between Two Cabinets**

# Between a Cabinet and the End of a Counter







# Between a Cabinet and a Wall or Tall Cabinet



# C. Door

#### 1. C-100BAF, C-100BAF-AD

#### a) Hinge Reversal

If you would like to reverse the door hinges, follow the steps below. Otherwise, skip to section "II.D. Setup."

 While maintaining a hold on the door, remove the hinge stop pin from hinge (B). Pull out the bottom of the door slightly and gently remove the door from hinge (A). See Fig. 1.



2) Remove the 2 screws securing the top panel, then lift it off. See Fig. 2.



3) Remove hinge (A) and the bracket from the right side of the unit and the top brace from the left side. Rotate hinge (A) to position the gasket notch to the inside, then fasten hinge (A) and the bracket to the left side and the top brace to the right side. See Fig. 3.



- 4) Remove hinge (B) from the right side of the unit and the 2 filler screws from the left side. Attach the 2 filler screws to the right side and attach hinge (B) to the left side. See Fig. 4.
- 5) Rotate the top panel 180° from its previous position. This brings the notch that was previously in the right rear to the left front. See Fig. 5. Hook the rear part of the panel on the body, then secure the front with the 2 screws removed in step 2.



- 6) Remove the 2 screws attaching the door handle and also remove the other 2 screws indicated in the illustration. Use 2 of the screws to attach the handle to the other side of the door and attach the other 2 screws in the remaining 2 holes. See Fig. 6.
- 7) Attach the door to hinge (A), then continue to maintain a hold on the door. Screw the hinge stop pin into hinge (B) until it is tight. See Fig. 7.



Hinge Stop Pin

Fig. 7

#### 2. C-100BAF-DS, C-100BAF-ADDS

#### a) Overlay Panel Fabrication and Attachment

#### - IMPORTANT -

The overlay panel must be crafted by a professional cabinet maker to ensure quality results.

#### (1) Parts

Ensure that all parts required for the overlay panel assembly are contained in the accessories bag.

	Overlay Panel Parts				
No.	Description	Part Number	Qty.		
1	Threaded Wood Insert	4A4004-01	6		
2	T2 Screw 4×8 SS	7P32-0408	3		
3	Pan Head Screw M4×25 SS	7C12-0425	4		
4	Truss Head Screw M4×8 SS	7C32-0408	2		
5	Canoe Clip	4A0629-02	2		
6	Sheet Metal Bracket	4A3998-01	1		



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#### (2) Overlay Panel Specification

Use the specification that applies to your icemaker (C-100BAF-**DS** or C-100BAF-**ADDS**) and the directions that follow to prepare your overlay panel.

#### (a) C-100BAF-DS



C-100BAF-DS Overlay Panel Specification		
Overlay Panel Height 29 17/32" (750 mm)		
Overlay Panel Width	14 13/16" (376 mm)	
Overlay Panel Thickness	5/8" (16 mm) minimum; 3/4" (19 mm) maximum	
Overlay Panel and Door Weight (total)	20 lb. (9 kg) maximum	

(b) C-100BAF-ADDS



C-100BAF-ADDS Overlay Panel Specification		
Overlay Panel Height	27 9/16" (700 mm)	
Overlay Panel Width	14 13/16" (376 mm)	
Overlay Panel Thickness	5/8" (16 mm) minimum; 3/4" (19 mm) maximum	
Overlay Panel and Door Weight (total)	20 lb. (9 kg) maximum	

#### (3) Fabrication of Overlay Panel

Fabricate the overlay panel as outlined in the specification on the previous page and the instructions below.

- 1) Rout a channel at the bottom of the overlay panel to the proper dimensions. See "(C) Routed Area" in the specification diagram and Fig. 8.
- 2) Drill six 1/4" diameter (hardwood may require slightly larger diameter) holes 3/8" (10 mm) deep in the locations designated. See "(A) Threaded Inserts" and "(B) Threaded Inserts" in the specification diagram and Fig. 9.





- 3) Screw the 6 threaded wood inserts into the 1/4" holes drilled in the previous step. Make sure that the inserts are threaded straight and that the tops of the inserts are flush to the overlay panel surface. Otherwise, the overlay panel cannot be properly fastened to the door.
- 4) Mount the door handle hardware. Hoshizaki recommends that the door handle hardware be mounted on the edge opposite of the door hinge side (optional hinge reversal is covered in step 6). Countersunk screw heads are required to ensure that the hardware fasteners do not interfere with the overlay panel fitting flush with the door.
- 5) While maintaining a hold on the door, remove the hinge stop pin from hinge (B). Pull out the bottom of the door slightly and gently remove the door from hinge (A). See Fig. 10. If you are leaving the door right-hinged, skip to step 7. If you would like to reverse the door hinges, proceed to step 6.



- 6) If you would like to reverse the door hinges, do the following:
  - a) Contact Hoshizaki Technical Support at 1-800-233-1940 to obtain Hoshizaki Kit HS-0229. The kit contains "hinge (A)-left."
  - b) Remove the 2 screws securing the top panel, then lift it off. See Fig. 11.
  - c) Remove hinge (A)-right and the bracket from the right side of the unit. Set aside hinge (A)-right; it is not needed. Remove the top brace from the left side. Fasten hinge (A)-left and the bracket to the left side and the top brace to the right side. See Fig. 12.

Note: When on the proper side, the gasket notch for hinge (A) is to the inside.



Fig. 11

Fig. 12

- d) Remove hinge (B) from the right side of the unit and the 2 filler screws from the left side. Attach the 2 filler screws to the right side and attach hinge (B) to the left side. See Fig. 13.
- e) Rotate the top panel 180° from its previous position. This brings the notch that was previously in the right rear to the left front. See Fig. 14. Hook the rear part of the panel on the body, then secure the front with the 2 screws removed in step 6a.







f) Remove hinge (C1) from the top right part of the door, flip it and reattach to the bottom left. Remove hinge (C2) from the bottom right part of the door, flip it and reattach to the top left. See Fig. 15. Proceed to step 7.



- 7) Remove the bushings from hinge (C1) and hinge (C2) (the hinges attached to the door). See Fig. 16.
- 8) Remove the gasket from the door. See Fig. 17.



9) Temporarily fasten the overlay panel to the door using 2 of the M4×25 pan head screws provided. See Fig. 18.



- 10) Mark the centerpoint of the hinge (C1) and hinge (C2) holes that extend over the overlay panel. See Fig. 19.
- 11) Remove the overlay panel from the door.



12) Drill 3/8" diameter holes 1/4" (7 mm) deep where you marked on the overlay panel to accommodate the hinge (C1) and hinge (C2) bushings.

#### (4) Attachment of Overlay Panel to Door

- 1) Fasten the sheet metal bracket to the overlay panel using the two M4×8 truss head screws provided. *Snug the screws, but do not tighten.* See Fig. 20.
- 2) Temporarily fasten the overlay panel to the door using 2 of the M4×25 pan head screws provided. See Fig. 21.



- 3) Adjust the sheet metal bracket so that it is flush with the bottom of the door. See Fig. 22.
- 4) Remove the overlay panel from the door and tighten the two M4×8 truss head screws securing the sheet metal bracket to the overlay panel. See Fig. 23.





Sheet Metal Bracket

Fig. 22



- 5) Fasten the overlay panel to the door using the four M4×25 pan head screws provided. **Snug the screws, but do not tighten.** See Fig. 24.
- 6) Fasten the sheet metal bracket to the bottom of the door with the three T2 screws provided. Tighten the screws to the door. See Fig. 25.





- 7) Tighten the four M4×25 pan head screws installed in step 5. See Fig. 26.
- 8) Replace the door gasket in its proper orientation. Reinsert the bushings into hinge (C1) and hinge (C2) (the hinges attached to the door). See Fig. 27.



- 9) Attach the door to hinge (A), then continue to maintain a hold on the door. Screw the hinge stop pin into hinge (B) until it is tight. See Fig. 28.
- 10) Insert the 2 canoe clips included in the accessory bag into the holes on top of the door. See Fig. 29.





# D. Setup

- 1) Position the icemaker in the selected permanent location.
- 2) Level the icemaker from side-to-side and front-to-rear by adjusting the feet.

# **E. Electrical Connection**

# - 🛦 WARNING —

- 1. Electrical connection must meet national, state, and local electrical code requirements. Failure to meet these code requirements could result in death, electric shock, serious injury, fire, or severe damage to equipment.
- 2. This unit requires an independent power supply. See the nameplate for proper voltage and breaker/fuse size. Failure to use a proper breaker or fuse can result in a tripped breaker, blown fuse, or damage to existing wiring. This could lead to heat generation or fire.
- 3. **THIS UNIT MUST BE GROUNDED:** This unit is equipped with a 3-prong grounding plug to reduce the risk of potential shock hazards. It must be plugged into a properly grounded, independent wall outlet. If the outlet is a 2-prong outlet, it is your personal responsibility to have a qualified electrician replace it with a properly grounded, independent 3-prong wall outlet. Do not remove the ground prong from the power cord and do not use an adapter plug. Failure to follow these instructions may result in death, electric shock, or fire.
- 4. Do not use an extension cord.
- 5. Make sure the power switch is in the "OFF" position before plugging in or unplugging the unit to reduce the risk of electric shock.
- 6. Do not use a unit with a damaged power cord. The power cord should not be altered, jerked, bundled, weighed down, pinched, or tangled. Such actions could result in electric shock or fire. To unplug the unit, be sure to pull the plug, not the cord, and do not jerk the cord.
- 7. To reduce the risk of electric shock, do not touch the plug or power switch with damp hands.
- 8. The GREEN ground wire in the factory-installed power cord is connected to a screw on the gear motor base where the cord enters the unit. If it becomes necessary to remove or replace the power cord, be sure to connect the power cord's ground wire to this screw upon reattachment.
- Usually an electrical permit and services of a licensed electrician are required.
- The maximum allowable voltage variation is  $\pm 10$  percent of the nameplate rating.
- For optional drain pump installation, refer to the instruction manual included with the pump.

# F. Water Supply and Drain Connections

# **WARNING**

- 1. Water supply and drain connections must be installed in accordance with applicable national, state, and local regulations.
- Normal operating water temperature should be within 45°F to 90°F (7°C to 32°C). Operation of the icemaker, for extended periods, outside of this normal temperature range may affect icemaker performance.
- 3. To prevent damage to equipment, do not operate the icemaker when the water supply is off, or if the pressure is below 7 PSIG. Do not run the icemaker until the proper water pressure is reached.
- A plumbing permit and services of a licensed plumber may be required in some areas.
- External filters, strainers, or softeners may be required depending on water quality. Contact your local Hoshizaki distributor for recommendations.
- Water supply inlet is 1/2" female pipe thread (FPT).
- A water supply line shut-off valve and drain valve should be installed. A minimum of 1/4" nominal ID copper water tubing or equivalent is required for the water supply line.
- Water supply pressure should be a minimum of 7 PSIG and a maximum of 113 PSIG. If the pressure exceeds 113 PSIG, the use of a pressure reducing valve is required.
- Drain outlet is 1/2" FPT. A minimum of 1/2" nominal ID hard pipe or equivalent is required for the drain line.
- Drain line should not be piped directly to the sewer system. An air gap of a minimum of 2 vertical inches (5 cm) should be between the end of the drain pipe from the icemaker and the floor drain.
- For gravity drain installation, drain must have 1/4" fall per foot (2 cm per 1 m) on horizontal runs to get good flow. A vented tee connection is also required for proper flow.
- For optional drain pump installation, refer to the instruction manual included with the pump.



# G. Final Checklist

# **A** WARNING -

**CHOKING HAZARD:** Ensure all components, fasteners, and thumbscrews are securely in place after installation. Make sure that none have fallen into the storage bin.

- 1) Is the icemaker level?
- 2) Is the icemaker in a site where the ambient temperature is within 45°F to 100°F (7°C to 38°C) and the water temperature within 45°F to 90°F (7°C to 32°C) all year around?
- 3) Have the shipping carton, tape, and packing material been removed from the icemaker?
- 4) Have all electrical and water connections been made? Do electrical and water connections meet all national, state, and local code and regulation requirements?
- 5) Has the power supply voltage been checked or tested against the nameplate rating? Is the power supply a properly grounded, independent 3-prong wall outlet?
- 6) Are the water supply line shut-off valve and drain valve installed? Has the water supply pressure been checked to ensure a minimum of 7 PSIG and a maximum of 113 PSIG?
- 7) Are all components, fasteners, and thumbscrews securely in place?
- 8) Has the end user been given this instruction manual, and instructed on how to operate the icemaker and the importance of the recommended periodic maintenance?
- 9) Has the end user been given the name and telephone number of an authorized service agent?
- 10) Has the warranty tag been filled out and forwarded to the factory for warranty registration?

# H. Startup

# **A**WARNING -

- 1. All parts are factory-adjusted. Improper adjustments may adversely affect safety, performance, component life, and warranty coverage.
- 2. If the icemaker is turned off, wait for at least 3 minutes before restarting the icemaker to prevent damage to the compressor.
- 3. At startup, confirm that all internal and external connections are free of leaks.
- 1) Open the water supply line shut-off valve.
- 2) Make sure the power switch is in the "OFF" position. Plug the unit into the electrical outlet. If you have to slide the unit back for a built-in installation, make sure you do not damage or pinch the water supply, drain connections, or power cord.
- 3) If required by sanitation code in your area, seal the perimeter where the machine touches the floor with approved caulk compound in a smooth and easily cleanable manner.
- 4) Move the power switch to the "ON" position to start the automatic icemaking process.
- 5) Once the unit starts to produce ice, allow it to run for another 30 minutes.
- 6) Move the power switch to the "OFF" position.
- 7) Remove the ice produced, then clean the storage bin liner, door liner, and door gasket using a neutral cleaner. Rinse thoroughly after cleaning.
- 8) Move the power switch to the "ON" position to start the automatic icemaking process.
- 9) To confirm bin control operation, hold ice in contact with the bin control thermostat bulb. The icemaker should stop within 10 seconds.

# I. Notes About Usage

- Wash your hands before removing ice. Use the plastic scoop provided.
- The storage bin is for ice use only. Do not store anything else in the storage bin.
- If ice is not used on a regular basis, it may bond together in the storage bin. In this case, discard the bonded ice and allow the icemaker to make fresh ice.

#### **III. Cleaning and Maintenance**

This icemaker must be cleaned and maintained in accordance with the instruction manual and labels provided with the icemaker. Consult with your local distributor about cleaning and maintenance service. To obtain the name and phone number of your local distributor, visit www.hoshizaki.com or call Hoshizaki Technical Support at 1-800-233-1940 in the USA.

# - 🛦 WARNING -

- 1. Only qualified service technicians should attempt to service this icemaker.
- 2. **CHOKING HAZARD:** Ensure all components, fasteners, and thumbscrews are securely in place after any cleaning or maintenance is done to the unit. Make sure that none have fallen into the storage bin.
- 3. The storage bin is for ice use only. Do not store anything else in the storage bin.
- 4. Keep the area around the icemaker clean. Dirt, dust, or insects in the unit could cause electrical damage to the equipment or harm to individuals.
- 5. Do not place fingers or any other objects into the ice discharge opening.

### A. Cleaning and Sanitizing Instructions

Hoshizaki recommends cleaning and sanitizing this unit at least twice a year. More frequent cleaning and sanitizing, however, may be required in some existing water conditions.

# - 🛦 WARNING —

- 1. To prevent injury to individuals and damage to the icemaker, do not use ammonia type cleaners.
- 2. Carefully follow any instructions provided with the bottles of cleaning and sanitizing solution.
- 3. Always wear liquid-proof gloves and goggles to prevent the cleaning and sanitizing solutions from coming into contact with skin or eyes.
- 4. Do not use ice made from the cleaning and sanitizing solutions. After cleaning and sanitizing, be careful not to leave any solution in the icemaker.

#### 1. Cleaning Solution

#### - IMPORTANT ·

For safety and maximum effectiveness, use the solution immediately after dilution.

Dilute 1.6 fl. oz. (47 ml or 3.2 tbs) of Hoshizaki "Scale Away" with 1 qt (1 l) of warm water. This is a minimum amount. Make more solution if necessary.

#### 2. Cleaning Procedure

- 1) Move the power switch to the "OFF" position, then unplug the unit from the electrical outlet.
- 2) Close the water supply line shut-off valve.

- 3) While maintaining a hold on the door, remove the hinge stop pin from hinge (B). Pull out the bottom of the door slightly, then gently remove the door from hinge (A). See Fig. 31.
- 4) Remove the 2 screws securing the top panel, then lift it off.
- 5) Remove all ice from the storage bin.
- 6) Remove the slope from the storage bin by carefully bending it in the center and releasing it from the 2 slope shafts.
- 7) Remove the scoop. Remove the 2 thumbscrews securing the scoop holder, then remove it.
- 8) Remove the screws securing the upper rear panel, then remove it.
- 9) Remove the clamp securing the drain plug, then lower the drain hose into a container. See Fig. 32. Remove the drain plug to drain the water from the reservoir and evaporator assembly.
- 10) After all of the water has drained, replace the drain plug in its correct position.
- 11) Remove the reservoir cover. Pour the cleaning solution into the reservoir until the solution starts to flow through the overflow hose. Replace the reservoir cover in its correct position.
  - Note: If there is excess scale on the extruding head, fill the reservoir as described above, then use a clamp on the reservoir hose between the reservoir and evaporator assembly to block flow. Remove the thumbscrews securing the spout, then remove the spout. Pour additional cleaning solution over the extruding head until the evaporator assembly is completely full.



Fig. 31

Fig. 32

- 12) Allow the icemaker to sit for 10 minutes before operation. If you placed a clamp on the reservoir hose in step 11, remove it before operation and replace the spout in its correct position.
- 13) Plug the unit back in. Move the power switch to the "ON" position.
- 14) Allow the unit to make ice using the solution. When ice stops coming out, move the power switch to the "OFF" position. Unplug the unit from the electrical outlet.
- 15) Remove the drain plug to drain any remaining solution.
- 16) After all of the solution has drained, replace the drain plug in its correct position.
- 17) Remove the reservoir cover. Using a clean container, pour water into the reservoir until it starts to flow through the overflow hose. Replace the reservoir cover in its correct position.
- 18) Remove the drain plug to drain the water. Note: If you do not sanitize the icemaker, go to step 11 in "Sanitizing Procedure - Final."
- 19) After all of the water has drained, replace the drain plug in its correct position.

#### 3. Sanitizing Solution

#### - IMPORTANT -

For safety and maximum effectiveness, use the solution immediately after dilution.

Dilute 1.25 fl. oz. (37 ml or 2.5 tbs) of a 5.25% sodium hypochlorite solution (chlorine bleach) with 2.5 gallons (9.5 l) of warm water. This is a minimum amount. Make more solution if necessary.

Using a chlorine test strip or other method, confirm that you have a concentration of about 200 ppm.

#### 4. Sanitizing Procedure - Initial

- 1) Remove the reservoir cover. Pour the sanitizing solution into the reservoir until the solution starts to flow through the overflow hose. Replace the reservoir cover in its correct position.
- 2) Remove the spout and packing.
- 3) Pour some of the sanitizing solution into a separate, clean container. Use this sanitizing solution and a clean cloth to wipe down the slope, scoop, scoop holder, spout, and packing.
- 4) Rinse the parts thoroughly with clean water.
- 5) Replace the packing and spout in their correct positions.
- 6) Make sure at least 10 minutes have elapsed since you poured the sanitizing solution into the reservoir, then plug the unit back in. Move the power switch to the "ON" position.
- 7) Allow the unit to make ice using the solution. When ice stops coming out, move the power switch to the "OFF" position. Unplug the unit from the electrical outlet.

#### 5. Sanitizing Procedure - Final

- 1) Remove the drain plug to drain any remaining solution.
- 2) After all of the solution has drained, replace the drain plug in its correct position.
- 3) Remove the reservoir cover. Pour the sanitizing solution into the reservoir until the solution starts to flow through the overflow hose.
- 4) Allow the icemaker to sit for 10 minutes before operation.
- 5) Plug the unit back in. Move the power switch to the "ON" position.
- 6) Allow the unit to make ice using the solution. When ice stops coming out, move the power switch to the "OFF" position. Unplug the unit from the electrical outlet.
- 7) Remove the drain plug to drain any remaining solution.
- 8) After all of the solution has drained, replace the drain plug in its correct position.
- 9) Remove the reservoir cover. Using a clean container, pour water into the reservoir until it starts to flow through the overflow hose. Replace the reservoir cover in its correct position.
- 10) Remove the drain plug to drain the water.
- 11) After all of the water has drained, replace the drain hose, drain plug, drain clamp and all other removed parts in their original and correct positions. WARNING! CHOKING HAZARD: Ensure all components, fasteners, and thumbscrews are securely in place. Make sure that none have fallen into the storage bin.
- 12) Open the water supply line shut-off valve. Check for leaks.
- 13) Plug the unit back in. Move the power switch to the "ON" position and allow the icemaker to run.
- 14) After 30 minutes, move the power switch to the "OFF" position. Unplug the unit.
- 15) Pour warm water into the storage bin to melt all of the ice, then clean the storage bin liner, door liner, and door gasket with a neutral cleaner. Rinse thoroughly after cleaning.
- 16) Plug the unit back in. Move the power switch to the "ON" position to start the automatic icemaking process.

#### **B.** Maintenance

The maintenance schedule below is a guideline. More frequent maintenance may be required depending on water quality, the icemaker's environment, and local sanitation regulations.

# - 🛦 WARNING —

- 1. Only qualified service technicians should attempt to service this icemaker.
- 2. Move the power switch to the "OFF" position and unplug the unit from the electrical outlet before servicing.

	Maintenance Schedule			
Frequency	Area	Task		
Weekly	Scoop	Clean the scoop using a neutral cleaner. Rinse thoroughly after cleaning.		
Monthly	External Water Filters	Check for proper pressure and change if necessary.		
	Icemaker Exterior	Wipe down with clean, soft cloth. Use a damp cloth containing a neutral cleaner to wipe off oil or dirt build up. Clean any chlorine staining (rust colored spots) using a non-abrasive cleaner like Zud or Bon Ami.		
Every 3 Months	Storage Bin Drain	Maintain as outlined in "III.B.1. Storage Bin Drain."		
Every 6 Months	Icemaker and Storage Bin	Clean and sanitize per the cleaning and sanitizing instructions provided in this manual. See "III. A. Cleaning and Sanitizing Instructions."		
	Evaporator Condensate Drain Pan and Gear Motor Drain Pan	Wipe down with clean cloth and warm water. Evaporator Condensate Drain Pan Gear Motor Drain Pan		
Yearly	Water Supply Inlet	Close the icemaker water supply line shut-off valve and drain the water system. Clean the water supply inlet screen.		
	Condenser	Inspect. Clean if necessary. See "III.B.2. Condenser."		
	Water Hoses	Inspect the water hoses and clean/replace if necessary.		
	Upper Bearing (extruding head)	Check for wear using .02" round stock or pin gauge. Replace both upper bearing and lower bearing if wear exceeds factory recommendations. See the Service Manual for details.		
After 3 Years, then Yearly	Upper Bearing (extruding head); Lower Bearing and O-Ring (lower housing); Mechanical Seal; Evaporator Cylinder; Auger	Inspect. Replace both upper bearing and lower bearing if wear exceeds factory recommendations. Replace the mechanical seal if the seal's contact surfaces are worn, cracked, or scratched.		

#### 1. Storage Bin Drain

In some conditions, slime may build up inside the storage bin drain and prevent water from draining properly. To prevent this buildup, perform the following procedure once every 3 months or as often as necessary for conditions.

- 1) Move the power switch to the "OFF" position.
- 2) Remove all ice from the storage bin.
- 3) Mix a batch of sanitizing solution by diluting 1.25 fl. oz. (37 ml or 2.5 tbs) of a 5.25% sodium hypochlorite solution (chlorine bleach) with 2.5 gallons (9.5 l) of warm water. Using a chlorine test strip or other method, confirm that you have a concentration of about 200 ppm.
- 4) Slowly pour the sanitizing solution into the storage bin.
- 5) After all of the solution has drained, clean the storage bin liner with a neutral cleaner. Rinse thoroughly with clean water.
- 6) Move the power switch to the "ON" position to start the automatic icemaking process.

#### 2. Condenser

Check the condenser once a year, and clean if required by following the steps below. More frequent cleaning may be required depending on location.

### - 🛦 WARNING -

- 1. Move the power switch to the "OFF" position and unplug the unit from the electrical outlet before cleaning the condenser.
- 2. Condenser fins are sharp. Use care when cleaning.
- 1) Move the power switch to the "OFF" position and unplug the unit from the electrical outlet.
- 2) Remove the 2 screws securing the front panel, then remove the panel. See Fig. 33.
- 3) Remove the 2 screws securing the louver, then remove the louver.
- Use a brush attachment on a vacuum cleaner to gently clean the condenser fins. Do not use too much force, otherwise the fins could be damaged.
- 5) Replace the louver and front panel in their correct positions. Ensure that the screws are securely in place.



Fig. 33

6) Plug the unit back in. Move the power switch to the "ON" position to start the automatic icemaking process.

### C. Preparing the Icemaker for Long Storage

#### - CAUTION -

When storing the icemaker for an extended time or in sub-freezing temperatures, follow the instructions below to prevent damage.

When the icemaker is not used for two or three days under normal conditions, it is sufficient to move the power switch to the "OFF" position. When storing the icemaker for an extended time or in sub-freezing temperatures, follow the instructions below.

- 1) Move the power switch to the "OFF" position, then unplug the unit from the electrical outlet.
- 2) Close the water supply line shut-off valve.
- 3) While maintaining a hold on the door, remove the hinge stop pin from hinge (B). Pull out the bottom of the door slightly, then gently remove the door from hinge (A). See Fig. 31.
- 4) Remove the 2 screws securing the top panel, then lift it off.
- 5) Remove all ice from the storage bin.
- 6) Remove the screws securing the upper rear panel, then remove it.
- Remove the clamp securing the drain plug, then lower the drain hose into a container. See Fig. 32. Remove the drain plug to drain the water from the reservoir and evaporator assembly.
- 8) After all of the water has drained, replace the drain hose, drain plug, drain clamp and all other removed parts in their original and correct positions.
- 9) Open the water supply line drain valve.
- 10) From the water supply line drain valve, blow the water supply line out using compressed air or carbon dioxide.
- 11) Close the water supply line drain valve.
- 12) Clean the storage bin by using a neutral cleaner. Rinse thoroughly after cleaning.

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