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**HOSHIZAKI
ICE DISPENSING BIN/
WATER DISPENSER**

**MODEL
DM-90A**

INSTRUCTION MANUAL

FOREWORD

IMPORTANT

Only qualified service technicians should attempt to install, service or maintain this ice/water dispenser. 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 ice/water dispenser until the installer has instructed them on its proper operation.

HOSHIZAKI provides this manual primarily to assist qualified service technicians in the installation, maintenance and service of the ice/water dispenser.

Should the reader have any questions or concerns which have not been satisfactorily addressed, please call or write 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 Service
(770) 487-2331
Fax: (770) 487-3360

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

- Model Number
- Serial Number
- Complete and detailed explanation of the problem

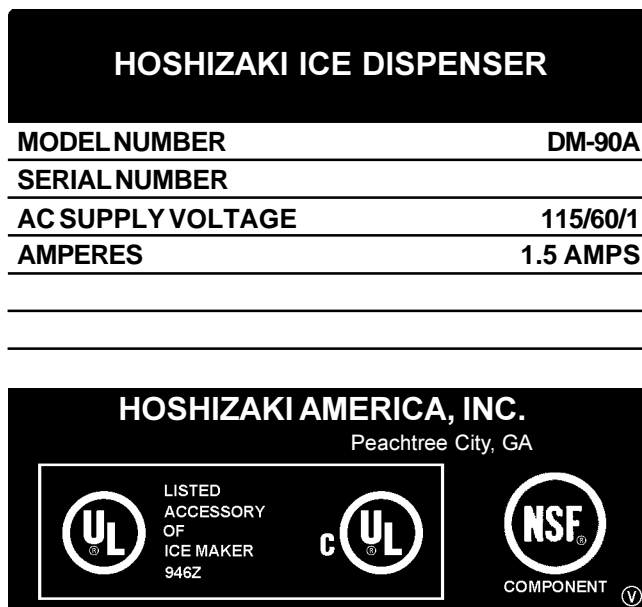
- Please review this manual. It should be read carefully before the ice/water dispenser is installed and operated. Only qualified service technicians should install, service and maintain the ice/water dispenser. This manual should be made available to the technician prior to installation, maintenance or service.
- Keep this manual with the ice/water dispenser for later reference.

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I. SPECIFICATIONS

1. NAMEPLATE RATING

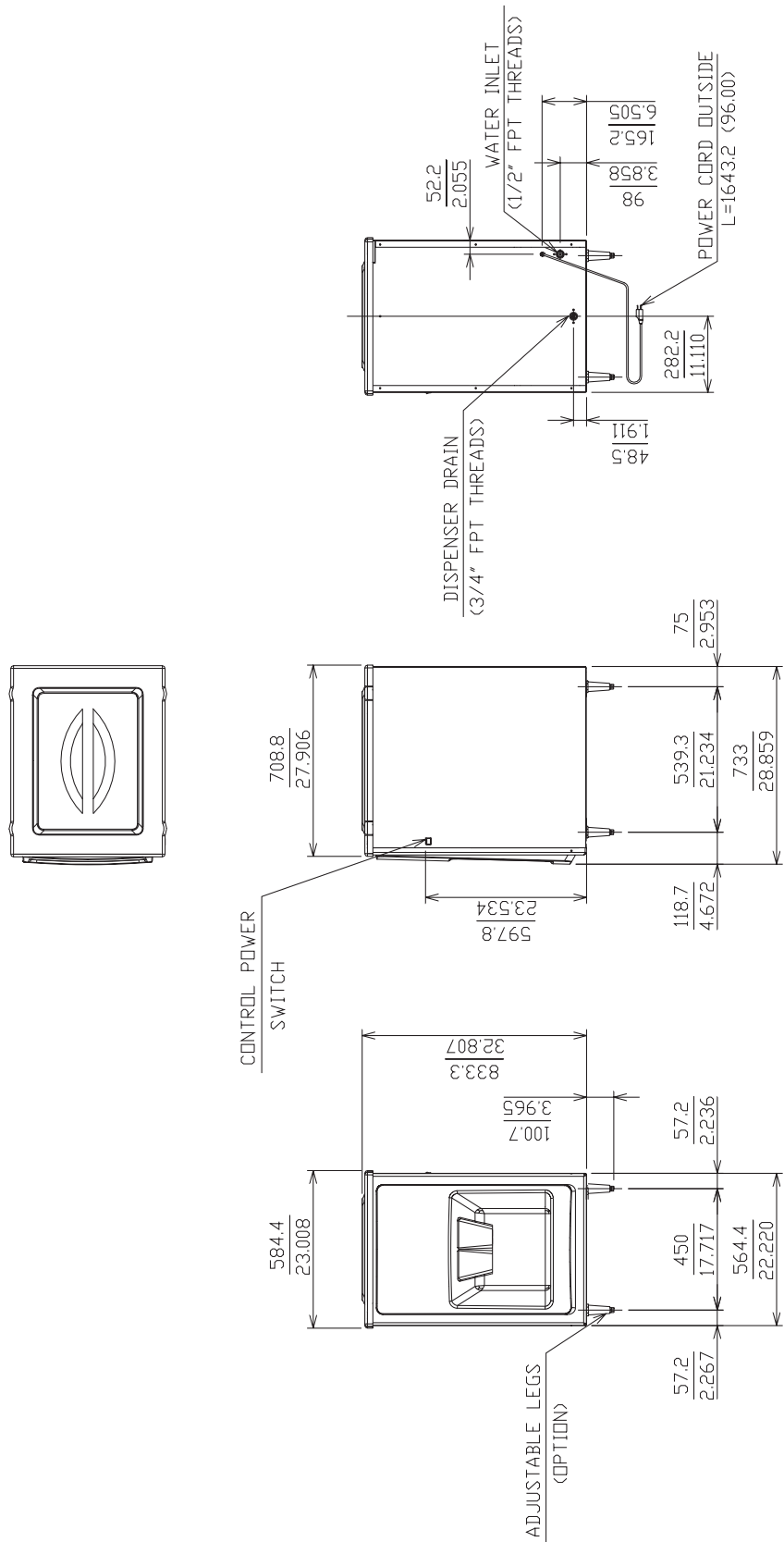


See Nameplate for electrical specifications. The Nameplate is located on the upper portion of the right Side Panel.

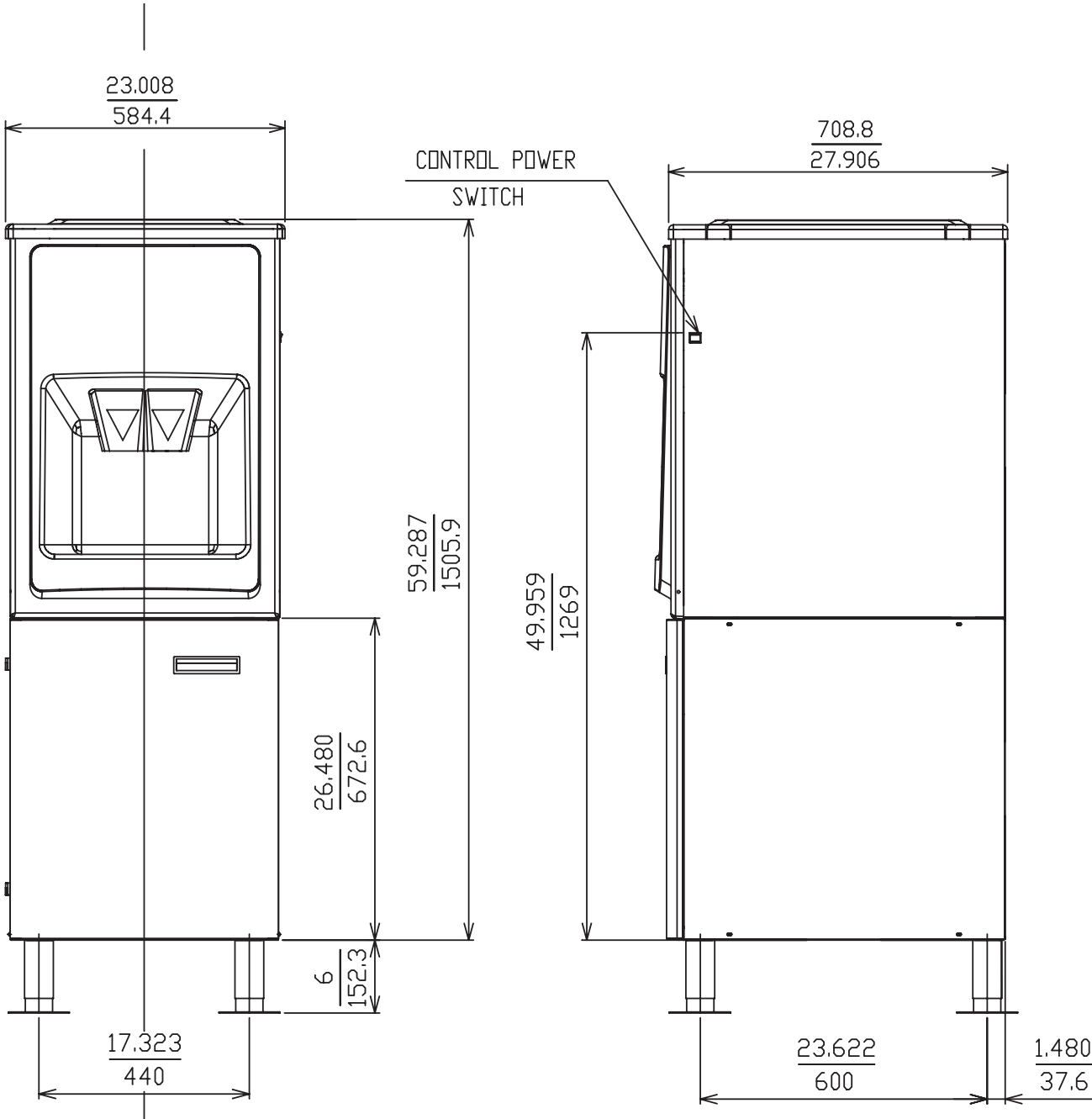
We reserve the right to make changes in specifications and design without prior notice.

2. DIMENSIONS/CONNECTIONS

[a] DM90A



[b] WITH SD-90 STAND



II. INSTALLATION AND OPERATING INSTRUCTIONS

1. CHECKS BEFORE INSTALLATION

IMPORTANT

1. Using this ice dispensing bin in combination with any ice machine cannot be recommended. Inside of bin must be accessible for cleaning.
2. Remove all tape, packing material and shipping cartons from the ice dispenser to prevent possible damage to the machine.

- 1) Remove the Front Panel to prevent damage before installing.
- 2) Remove the package containing the accessories.
- 3) Remove the protective plastic film from the Side Panels. If the ice dispensing bin has been exposed to the sunlight or to direct heat, it should be allowed to cool before removing the protective film.
- 4) Refer to the Nameplate, located on the upper portion of the right Side Panel. Be certain that the voltage supply corresponds with the voltage specified on the nameplate.

2. LOCATION

WARNING

This ice dispensing bin is not intended for outdoor use. Normal operating ambient temperature should be within +45°F to +100°F. Operation of the ice dispensing bin for extended periods, outside of these normal temperature ranges may cause unsatisfactory results.

For best operating results:

- Ice dispensing bin should not be located next to ovens, grills or other high heat producing equipment.
- Location should provide a firm and level foundation for the equipment.
- Always avoid an installation site where dripping is not allowed.
- Allow 6" clearance on all sides for ease of maintenance and/or service should they be required. More space is needed especially on the left side of the dispensing bin to service the gear motor.

3. SET UP - See Fig. 1

IMPORTANT

It is especially important that the ice dispensing bin is leveled in both the left-to-right and front-to-rear directions. If it is not level, unsatisfactory performance and/or a reduced rate of ice flow may result.

- 1) Unpack the ice dispensing bin, and remove all shipping cartons, tape(s) and packing before operating the unit. Attach four (4) adjustable legs [adjustable within max. 4" (102 mm) to min. 5" (127 mm)] to the bottom of the ice dispensing bin. Remove the Front Panel to prevent damage, and be careful not to damage the other panels when installing the ice dispensing bin. Remove the screws, and pull up and toward you to remove the Front Panel.

Note: When placing the dispenser on the Cabinet Stand, see "4. CABINET STAND."

- 2) Position the ice dispensing bin in a selected permanent site. Clean and wipe the interior with a clean cloth.
- 3) Level the ice dispensing bin in both the left-to-right and front-to-rear directions.
- 4) Place exterior panels in position on the ice dispensing bin.

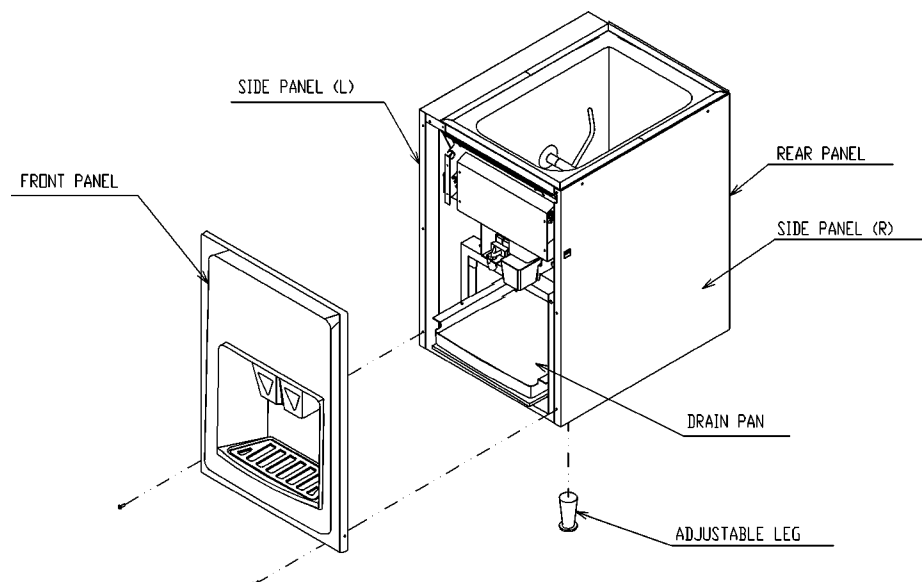


Fig. 1

4. CABINET STAND

When placing the ice dispensing bin on the Cabinet Stand:

- 1) Attach the four (4) adjustable legs to the Cabinet Stand (Cabinet Stand accessory).
- 2) Remove the protective plastic film from the panels.
- 3) Open the Front Panel Door.
- 4) Place the ice dispensing bin on the Cabinet Stand.

Combination: SD-90 DM-90A

- 5) You must secure the ice dispensing bin to the Cabinet Stand with four (4) bolts (Cabinet Stand accessory).
- 6) Seal the seam all around between the dispensing bin and the Cabinet Stand with food grade silicone. See Fig. 2.
- 7) Close the Front Panel Door.

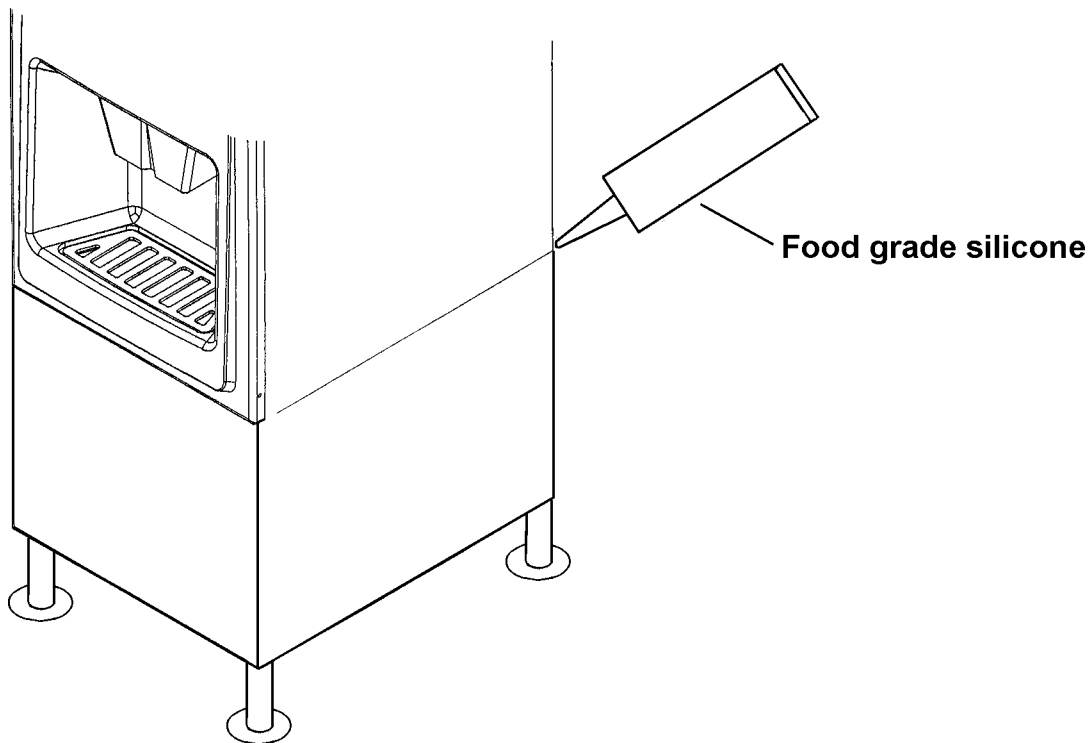


Fig. 2

5. ELECTRICAL CONNECTION AND DISPENSING SWITCHES

- This ice dispensing bin must have a separate power supply or receptacle of proper capacity. See the Nameplate.
- Check that the ice dispensing switch and the water switch are operating correctly. See Fig. 3

Water Dispensing
Switch

Push the button, and the unit should
operate. You should hear an
operating sound.

Ice Dispensing Switch

Push the button, and the unit should
operate. You should hear an
operating sound.

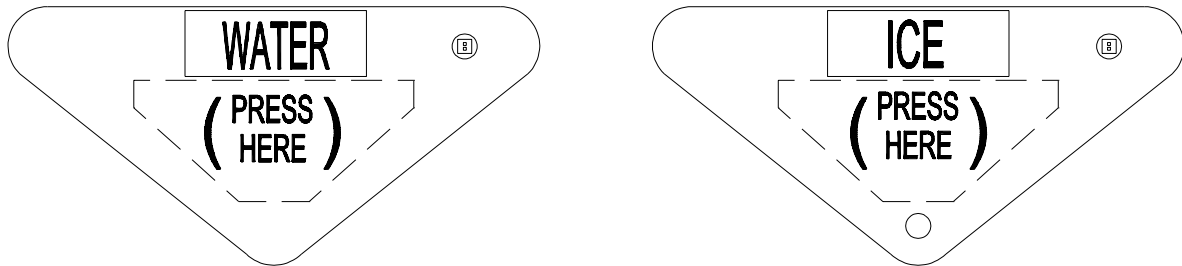


Fig. 3

6. WATER SUPPLY AND DRAIN CONNECTIONS - See Fig. 4

- The water supply inlet is 1/2" female pipe thread (FPT). A strainer should be installed with the clean-out plug facing down. Locate the strainer in the water supply line which is next to the ice dispensing bin. An arrow on the strainer indicates the direction of the water flow.

Note: A Strainer (Hoshizaki Part # 311166A01) is an optional extra.

- A water supply line shut-off valve and drain valve should be installed.
- Water supply pressure should be a minimum of 10 PSIG and a maximum of 113 PSIG. If the pressure exceeds 113 PSIG, use a pressure reducing valve.
- A drain outlet 3/4" FPT is located at the rear of the ice dispensing bin.
- The ice dispensing bin drain connection must be separate from the plumbing of other drains.
- All horizontal runs of drain pipe must have a 1/4" drop per foot to promote good drainage.
- Drains should not be piped directly to a sewer system. An air gap of a minimum of 2 vertical inches (5 cm) should be between the end of the ice dispenser drain pipe and the floor drain.
- A back flow preventer may be required in some areas.
- Only cold drinking water should be used for this dispenser.
- A plumbing permit and services of a licensed plumber may be required in some areas.

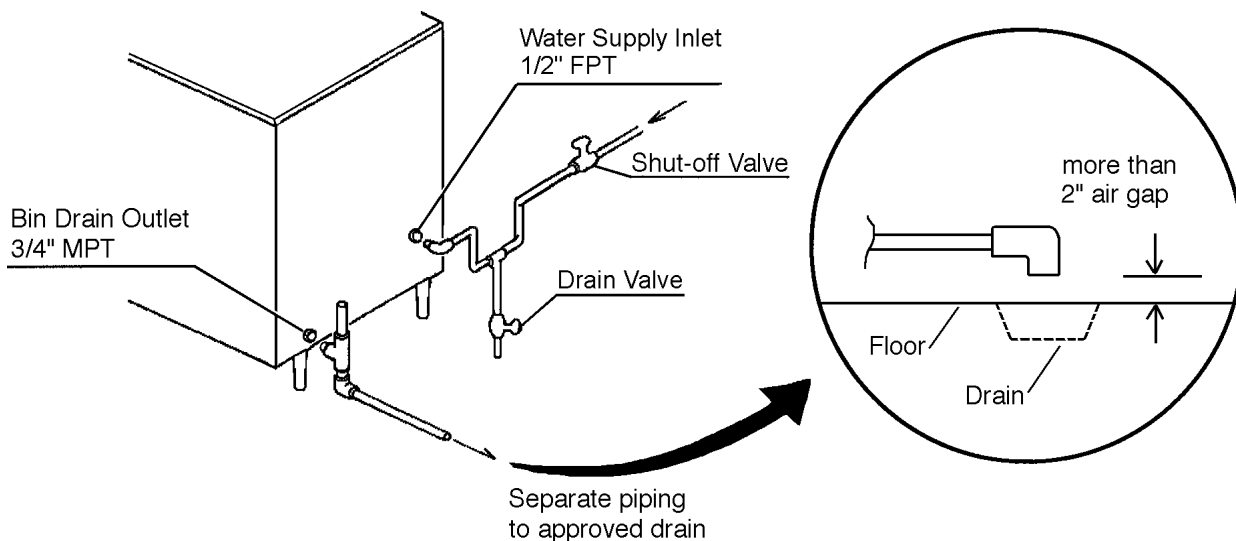


Fig. 4

7. ADJUSTMENT OF FLOW RATE BRACKET SETTING - See Fig. 5

IMPORTANT

Before operating the Dispenser with ice in the bin, check the Flow Rate Bracket setting.

- 1) Remove the Front Panel by removing the screws followed by pulling up and away from the face of the Dispenser.
- 2) Loosen the two (2) thumbscrews while holding the Flow Rate Bracket in place. See Fig. 5.
- 3) For crescent ice, the Flow Rate Bracket should be set at the highest position possible.
- 4) For cubelet ice, the Flow Rate Bracket should be set at the highest position possible for fast dispensing or the lowest position for slow dispensing.
- 5) Upon making final adjustments, be sure to tighten the two (2) thumbscrews and replace the front panel.

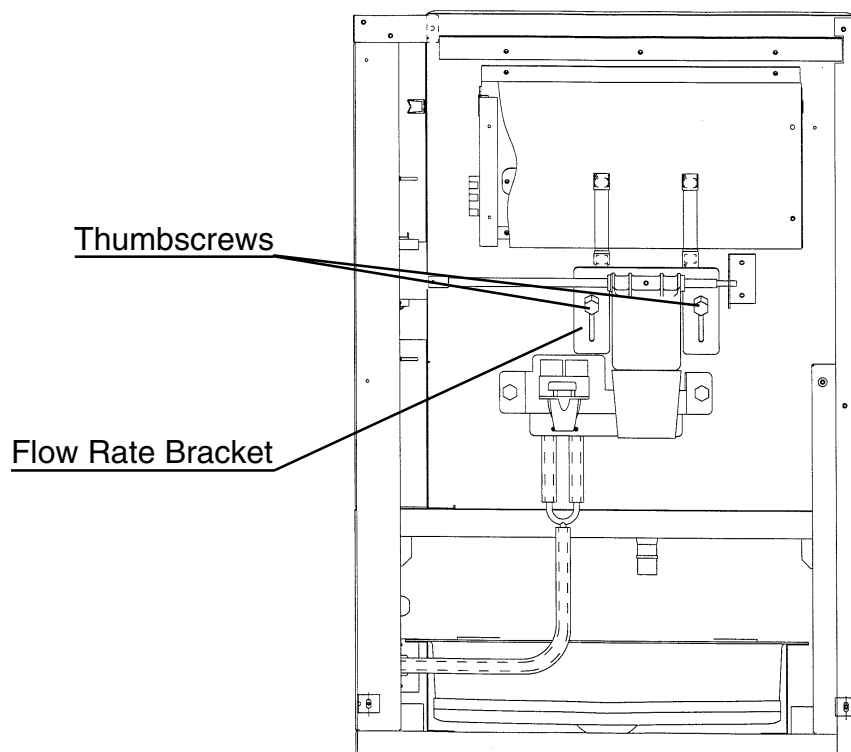


Fig. 5

8. ADJUSTMENT OF WATER DISPENSE VALVE - See Fig. 6

- 1) Locate the two adjustment set screws on the bottom of the Water Valve as shown in Fig. 6.
- 2) Using a 5/32" allen wrench, turn both set screws clockwise for a slower flow rate or counterclockwise for a faster flow rate. See Fig. 6.
- 3) The flow rate can be determined by visual inspection.

Note: The flow rate will depend on the incoming water pressure. Adjustment may be required in the event the unit is relocated.

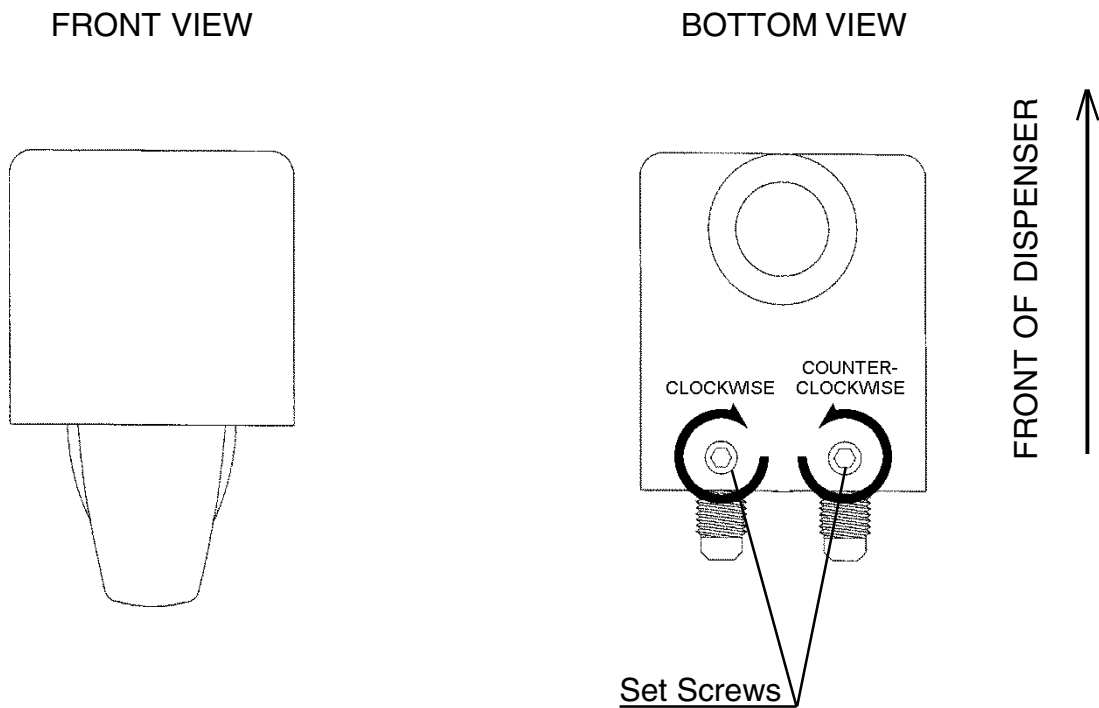


Fig. 6

9. FINAL CHECK LIST

- 1) Is the ice dispensing bin level?
- 2) Is the ice dispensing bin in a site where the ambient temperature is within +45°F to +100°F all year around?
- 3) Is there at least 6" clearance around the ice dispensing bin for easy maintenance and service, and for good ventilation?
- 4) Have all shipping carton, tape(s) and packing been removed from the ice dispenser?
- 5) Have all electrical and piping connections been made?
- 6) Has the power supply voltage been checked or tested against the Nameplate rating?
- 7) Has the ice dispensing bin been cleaned and wiped with a clean cloth?
- 8) Has the end user been given the Instruction Manual and instructed on how to operate the ice dispensing bin, as well as 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?

10. START UP

- 1) Remove the top and use a clean bucket or other clean container for filling the ice dispenser with ice. Reinstall the top.
- 2) Place a cup under the ice or water spout and press membrane switch to dispense.

11. PREPARING THE ICE/WATER DISPENSER FOR LONG STORAGE

IMPORTANT

Remove all ice from the ice dispenser when preparing it for storage. The dispenser should be cleaned and wiped dry prior to sanitizing.

- 1) Turn the power supply switch off after removing all ice. Unplug the ice dispenser's plug from the power source receptacle.
- 2) The ice dispensing bin should be cleaned and wiped dry.

III. CLEANING AND MAINTENANCE INSTRUCTIONS

1. CLEANING INSTRUCTIONS

CAUTION

1. HOSHIZAKI recommends cleaning this unit at least once a year. (See the "CLEANING INSTRUCTIONS" on the icemaker.) More frequent cleaning, however, may be required in some existing water conditions.
2. To prevent injury to individuals and damage to the ice dispensing bin, do not use ammonia type cleaners.
3. Always wear liquid-proof gloves for safe handling of the cleaning and sanitizing solution. This will prevent irritation in case the solution contacts the skin.

[a] CLEANING PROCEDURE - See Fig. 7

- 1) Clean and sanitize the ice dispensing bin as conditions require.
- 2) Remove all ice from the bin.
- 3) Disconnect electrical power to the ice dispensing bin.
- 4) Remove the Front Panel to allow access to the Chute Assembly for cleaning.
- 5) Scrub the inside of the bin, the Agitator, the Spout of the bin, the Spout of the Front Panel and the Chute using a nylon scouring pad, brushes and cleaning solution, such as 5 oz. Hoshizaki "Scale Away" or "Lime-A-Way" (Economics Laboratories Inc.), in one gallon of water.

- 6) Scrub the Shutter Assembly and the Spout using the cleaning solution made in step 5). See Fig 7.
 - a) Remove the snap pin and shift the shaft to the right.
 - b) With snap pin removed, removal of Shutter Assembly (A) can now be accomplished.
- 7) Rinse all parts thoroughly with clean water.

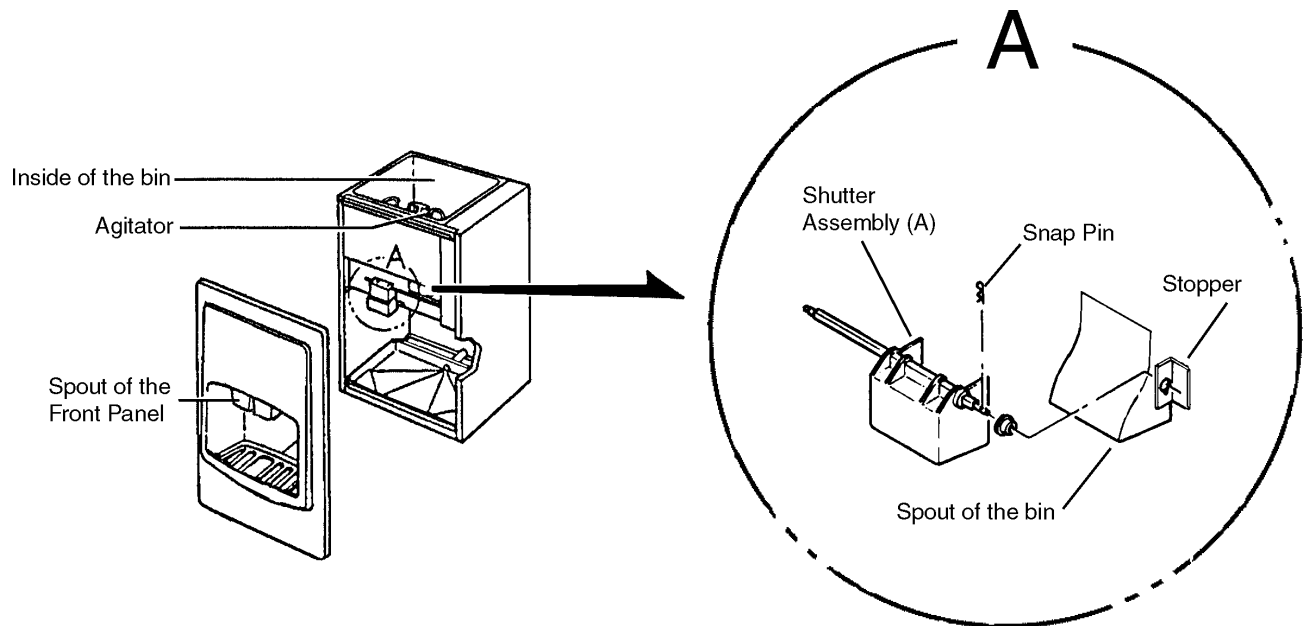


Fig. 7

[b] SANITIZING PROCEDURE - Following Cleaning Procedure

- 1) Wash all parts in steps 5) and 6) using the following sanitizing solution: 1/2 fl. oz. of IMS-II Sanitizer or a 5.25% sodium hypochlorite solution in 1 gallon of water.

Note: IMS-II Sanitizer, Part #SA0004, is available through your Hoshizaki Dealer.

- 2) Rinse all parts thoroughly with clean water.
- 3) Reassemble in the reverse order of the removal procedure.
- 4) Turn on the ice dispensing bin.
- 5) Check for proper operation.

2. MAINTENANCE

[a] Exterior Panels

To prevent corrosion, wipe occasionally with a clean, soft cloth. Use a damp cloth containing a neutral cleaner to wipe off oil or dirt build up.

[b] Periodic Maintenance

Due to the simple design of this ice dispensing bin, and the relatively short operating time, very little maintenance is required.

HOSHIZAKI

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