



Installation & Operation Manual

Glass Frosters

FR Series



FR48 SS shown





FR24 shown



FR36SS shown

JOB	
AREA	
ITEM NO.	
MODEL NO.	

- FR24 SERIES
- FR36 SERIES
- FR48 SERIES
- FR60 SERIES



MODEL NUMBERS	FR24	FR36	FR48	FR60
LENGTH (mm)	24" (610)	36" (915)	48" (1219)	60" (1524)
INTERIOR CU. FT. (m ³)	3.75 (0.10)	7.83 (0.22)	11.68 (0.33)	15.53 (0.44)
PLATE CAPACITY †	135 Plates	215 Plates	300 Plates	400 Plates
GLASS CAPACITY (w/ 2 optional shelves)	90 Glasses	142 Glasses	214 Glasses	286 Glasses
WITH OPTIONAL THIRD SHELF	N/A	172 Glasses	273 Glasses	363 Glasses
CONDENSING UNIT H.P.	1/3	1/3	1/3	1/3
AMPS	5.8	6.8	6.2	7.1
SHIPPING WEIGHT Lbs. (kg.)	190 (86)	245 (111)	265 (120)	300 (136)
INTERIOR	All models have stainless steel walls and floor.			
EXTERIOR	Choice of black, stainless steel and all stainless. Black Option: Front and ends are black vinyl coated steel, back and bottom are galvanized. Stainless Steel Option: Front and ends are stainless steel, back and bottom are galvanized. All Stainless Option: Front, ends, back and bottom are all stainless steel.			
DOORS (Sliding)	Stainless steel top and bottom pans. Die cast handles.			
ELECTRICAL	115V, 60Hz, 1 Phase. Furnished with 6 foot rubber plug-in cord (115V model only). Also available in 230V, 50Hz, 1 Phase AC.			
PLUMBING	None required. Moisture drains to self-evaporating pan in machinery compartment.			
INSULATION	2 inch foamed-in-place polyurethane insulation.			
TEMPERATURE RANGE	Adjustable from -10°F to +10°F.			
REFRIGERATION	R134a expansion valve system with hermetic condensing unit. Pulls out for service and cleaning.			
VENTILATION	2' model is front vented, all other models require 2" clearance from wall on either left end or back of cabinet for proper air flow.			
DEFROST SYSTEM	Solid-state, push-button defrost system, manually initiated at end of each day, automatically terminates after six hours. Evaporator automatically defrosts every 4 hours for approximately 20 minutes (time/temperature terminated).			
OPTIONAL ACCESSORIES	<ul style="list-style-type: none"> <li style="width: 33%;">• Additional set of nesting shelves w/brackets <li style="width: 33%;">• Set of 4 casters w/ brakes <li style="width: 33%;">• Interior light <li style="width: 33%;">• Set of 4 adjustable legs <li style="width: 33%;">• 2', 3', 4' and 5' Bottle rail (field installed) <li style="width: 33%;">• Roller basket shelving 			

† Capacity calculations based on use of 3" dia. glass and 9 1/2" dia. x 1/2" thick plate.

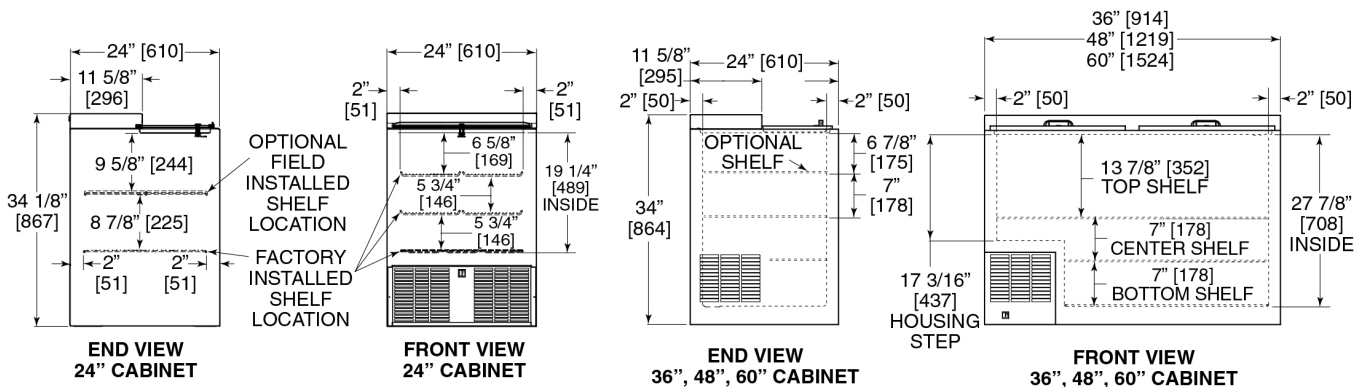


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GENERAL INFORMATION

Introduction

This manual has been prepared to assist you in the installation of your Bottle Cooler and to acquaint you with its operation and maintenance.

We dedicate considerable time to ensure that our products provide the highest level of customer satisfaction. If service is required, call Perlick at 1-800-777-7267 or your dealer who can provide you with a list of qualified service agents. For your own protection, never return merchandise for credit without our approval.

We thank you for selecting a Perlick product and assure you of our continuing interest in your satisfaction.

Warranty

To register your product, visit our web site at www.perlick.com. Click on "Commercial", then "Service". Click on the link "Warranty Registration Form". You must complete and submit this form or the installation date will revert back to the ship date.

Please record the purchase date and the dealer's name, address and telephone number below.

Model Number: _____

Serial Number: _____

Purchase Date: _____

Dealer Name & Address _____

Phone Number _____

SAFETY

PLEASE READ all instructions completely before attempting to install or operate the unit. Take particular note of the DANGER, WARNING or CAUTION information in the manual. The information is important for the safe and efficient installation, operation and care of your Perlick unit.

⚠ DANGER Indicates a hazard that **WILL** result in serious injury or death if precautions are not followed.

⚠ WARNING Indicates a hazard **MAY** cause serious injury or death if precautions are not followed.

⚠ CAUTION Indicates a hazard where minor injury or product damage may occur if precautions are not followed.

IMPORTANT!

Read and understand all information in this manual before attempting the installation.

All plumbing and electrical work must be performed by a qualified technician and conform to all applicable state and local codes.

Perlick is committed to continuous improvement. Therefore, we reserve the right to change specifications without prior notice.

PREPARING THE CABINET - GLASS FROSTERS

Uncrating and Inspection

Remove all crating material. Carefully inspect cabinet for hidden damage. If damage is discovered, file your claim immediately with the transport company. Perlick is not responsible for damage in transit.

Plumbing

No plumbing connections are required. Condensate from the cooling coil automatically evaporated through a condensate pan located in the condensing unit section.

Electrical

The cabinet must be connected to a separately fused power source (see Electrical Specification Plate affixed to unit) in accordance with National and Local electrical codes.

⚠ CAUTION Do not attempt to operate the equipment on any other power source than that listed on the Electrical Specification Plate.

Installing Shelves (when provided)

The front and rear horizontal shelf brackets have been factory installed for a 2 shelf kit glass froster.

Installing Casters or Legs (optional)

Attach casters or legs to the cabinet bottom in holes provided. Use the supplied 1/4" - 20 hex head self-tapping machine screws. If unit is tipped on its back for an extended period of time, wait 24 hours after unit is uprighted to plug the unit in.

Placing the Cabinet

To assure maximum performance, fresh air must be allowed to circulate through the machinery compartment. It is important to allow at least two inches of clearance at the back or left end of the cabinet. Do not place anything in front of the cabinet that would obstruct air flow at these grilles. Do not place the unit in an unventilated small room.

⚠ CAUTION Removing the factory installed back clearance spacers without providing proper left side grill clearance for compressor air flow will void the warranty.

Cabinet should be leveled.

For sanitation purposes, it may be necessary to seal the base of the cabinet to the floor. This can be accomplished by laying a bead of silicone sealant along the base of the cabinet as shown by the figure below (figure 1).

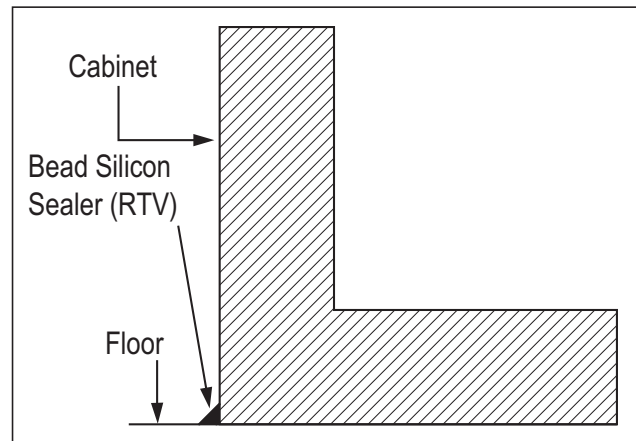


Figure 1. Sealing Cabinet to Floor

HOW TO OPERATE - GLASS FROSTERS

Defrost System

This system consists of a six-hour, as well as a four hour defrost cycle. The six hour defrost cycle is manually activated and automatically terminated, while the four hour cycle is completely automatic.

The Six Hour Solid-State Defrost Timer

This timer shuts off the power to the condensing unit, door frame heater, evaporator heater, and the automatic four hour defrost timer, while it supplies power to the evaporator fan.

To activate the six hour defrost system, depress the defrost switch located on the front grill of the cabinet. An amber light will illuminate and the defrost cycle will begin. When the defrost cycle ends, the light goes off and the cabinet resumes normal operation. To manually cancel the defrost cycle, momentarily turn off the electricity to the machine.

The Four Hour Defrost Timer

This timer ensures that frost will not buildup on the evaporator coil. Every four hours it shuts down the condensing unit and evaporator fan and supplies power to the defrost element clamped to the bottom of the evaporator. The defrost cycle lasts for approximately 20 minutes.

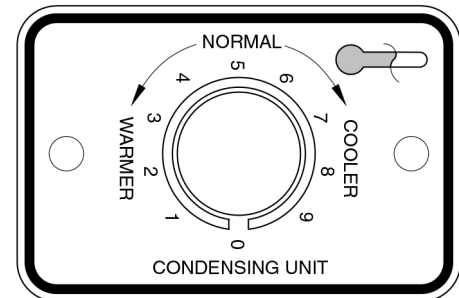
During normal operation it is recommended that the doors are not left open to prevent excessive frost buildup on the coil.

Temperature Control

An adjustable temperature control is located inside the Bottle Cooler on the evaporator fan panel assembly. It is factory set at approximately 38°F for standard refrigeration and approximately 30°F for low temperature models. Make adjustments as detailed below to attain the desired temperature. NOTE: A temperature setting that is too low will not allow enough condensing unit "off" time to maintain a frost-free coil.

- **Colder Temperatures:** Turn the adjusting screw clockwise (to the right)
- **Warmer Temperatures:** Turn the adjusting screw counterclockwise (to the left).
- **Temperature Control "OFF":** Turn the adjusting screw completely counterclockwise to the "O" position until a "click" is noted.

The condenser fan motor turns off and on with compressor. The evaporator fan motor runs continuously, except during the 20 minute period of the four-hour defrost.



CLEANING INSTRUCTIONS - FLAT TOP BOTTLE COOLERS

Cleaning the Condenser

- The condenser (located behind the front grille) should be inspected every 30 days, and cleaned, if necessary. Failure to keep the condenser clean will cause a loss in condensing unit efficiency, or compressor failure.

Cleaning the Doors

- Doors should be periodically removed from the cabinet and inspected for a buildup of foreign materials, such as syrups, beer, etc. Buildups on the underside of the doors, along with the cabinet breaker strips on which they ride, will cause them to bind, and therefore, not function as designed. If dirty, these surfaces should be cleaned with a mild detergent and water and then coated with a silicone lubricating material. Aerosol silicone sprays can be obtained locally at most hardware or automotive stores.

To remove doors:

- With door closed, lift it upward by its handle and slide forward until doors clear the cabinet top. Use the reverse procedure to reinstall the doors.

Cleaning the Cabinets

- Use a damp cloth with a mild detergent and water to clean the inside and outside of the cabinet. Dry thoroughly. Do not allow cleaning agents or large amounts of water to go down the drain. Use an acceptable stainless steel polish to clean all stainless steel surfaces. Never use steel wool or scouring pads to clean stainless steel.

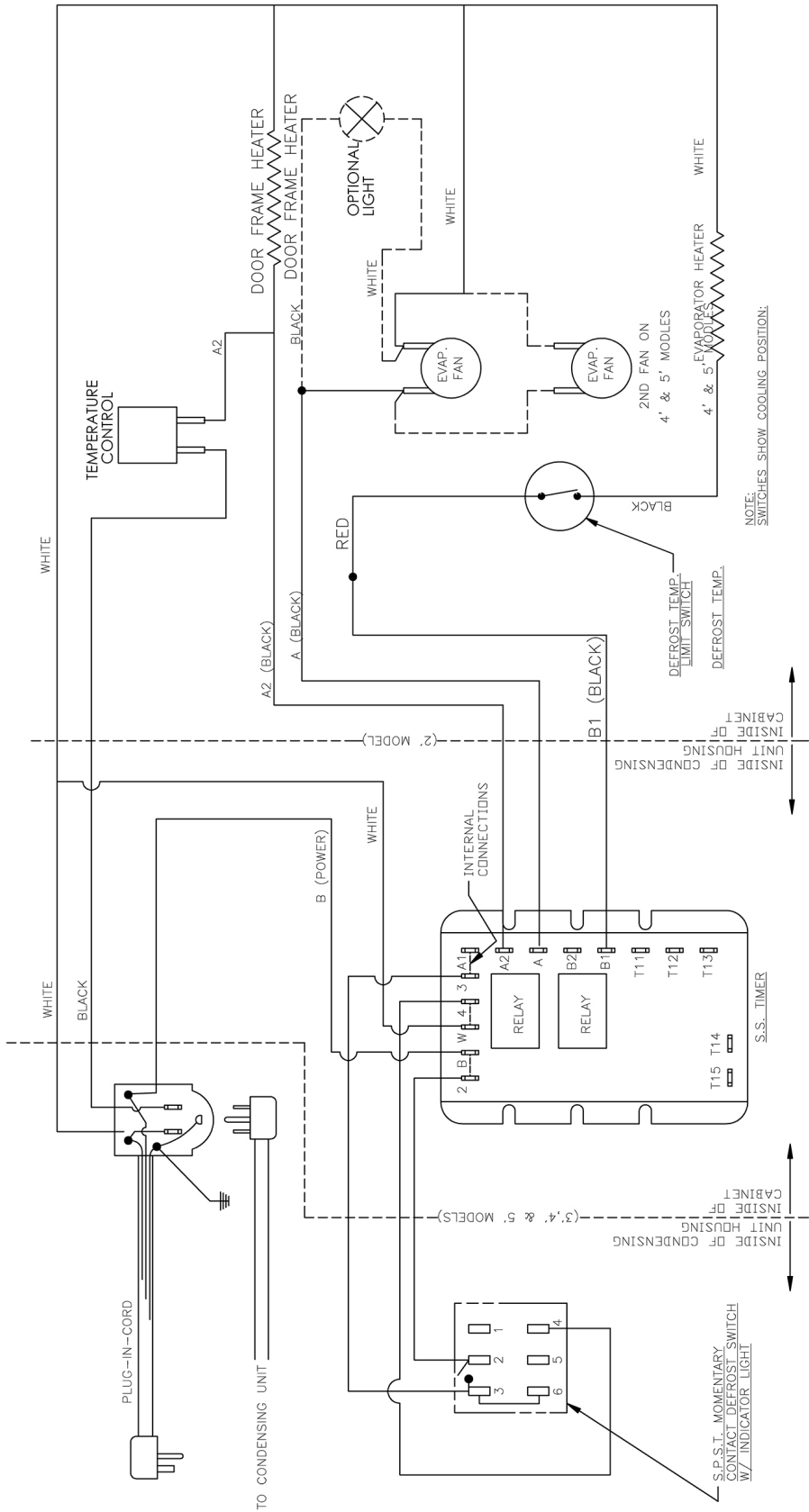
Avoiding Stainless Steel Corrosion

Corrosion can be prevented by following product cautions, cleaning instructions and avoiding use of certain chemicals or objects which will cause stainless steel corrosion.

STAINLESS STEEL ENEMY

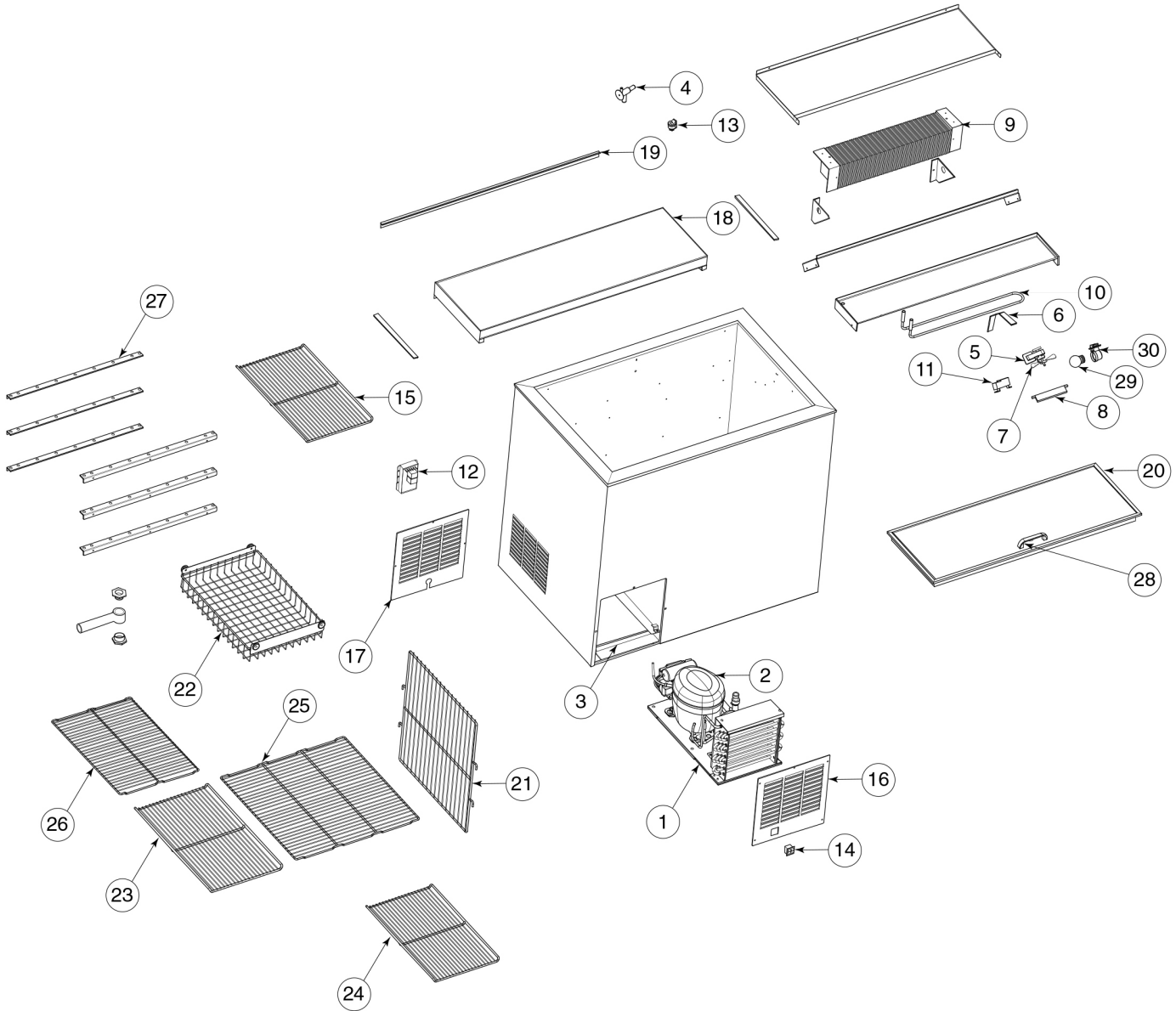
- Steel wool or steel scouring pads
- Cherry/Orange/Olive juice
- Chlorine Bleach
- Sharp Objects

WIRING DIAGRAM - GLASS FROSTERS



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REPLACEMENT PARTS - GLASS FROSTERS



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REPLACEMENT PARTS - GLASS FROSTERS

MODEL NOS.		FR24	FR36	FR48	FR60
Item	Description	Part Numbers			
1	Complete condensing unit	C22646A	C22646A	C22646A	C22646A
2	Replacement compressor, R134a	513200003	513200003	513200003	513200003
	Condensing unit fan motor assy.	515315009	515315009	515315009	515315009
	Terminal Board	519100088	519100088	519100088	519100088
	Overload Protector	US-PB12HBX1	US-PB12HBX1	US-PB12HBX1	US-PB12HBX1
	Relay	US-PB12HBX1	US-PB12HBX1	US-PB12HBX1	US-PB12HBX1
	Start capacitor	US-PB12HBX1	US-PB12HBX1	US-PB12HBX1	US-PB12HBX1
3	Condensate pan	64537	64626-1	64626-1	64626-1
4	Expansion valve	63549	63549	63549	63549
5	Evaporator fan motor(s)	C15239A	C15239A	C15239A	C15239A
6	Evaporator fan motor bracket	65671-1	65671-1	60988-1	60988-1
7	Evaporator fan motor blade	63461	63461	63461	63461
8	Evaporator fan guard	65666	65666	65666	65666
9	Evaporator coil	64785-1EP	C17511-1EP	C17511-1EP	C17511-2EP
10	Evaporator defrost heater	C25655-1	65045-1	65045-1	61900
11	Temperature control	61282	61282	65290	65290
12	Solid state defrost timer	57466	57466	57466	57466
13	Defrost limit switch	57676	57676	57656	57676
14	Rocker switch with pilot	C31659	C31659	C31659	C31659
15	Compressor side shelf	N/A	64810-1	64810-1	64810-1
16	Front grille	66498-2A	65662-2A	65662-2A	65662-2A
17	Rear grille/panel	66498-1	65662-3	65662-3	65662-3
18	Top assembly	RT-SL2	RT-SL2	RT-SL2	RT-SL2
19	Top wiper gasket	63671-24	63671-36	63671-48	63671-60
20	Door assembly	RD-SL2	RD-SL2	RD-SL2	RD-SL2
21	Vertical partition	65503	66441	66441	66441
22	Roller basket	N/A	66442-1	66442-1	66442-1
23	Wide shelf	N/A	N/A	64811-1	64811-1
24	Narrow shelf	64809-1	64809-1	64809-1	64809-1
25	Bottom floor rack (wide)	64814-1	64814-1	64814-1	64814-1
26	Bottom floor rack (narrow)	N/A	N/A	64815-1	64815-1
27	Shelf bracket	65653-24	65653-36	65653-48	65653-60
28	Door handle	63931	63931	63931	63931
29	Light Bulb	C15046	C15046	C15046	C15046
30	Light socket	63484	63484	63484	63484
ITEMS NOT SHOWN					
	Wire harness, main	65039-1	65039-1	65038-1	65038-1
	Wire harness, defrost timer to switch	61959	61959	61959	61959
	Suction/liquid line with drier	65089	65089	65089	65089
	Mullion assembly	N/A	N/A	66551	66551
	Refrigerant charge (oz. R134a)	8.0	10.3	12.5	12.5

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