Crystal Merchandiser® RVLC30 Specs

Low Temp Reach-In Remote Display Cases

2-Door, 3-Door, 4-Door, and 5-Door Cases

Quick Specs

Energy (Btu/h per Door)*
Frozen Food: 925 at -7°F Evaporator
Ice Cream: 1,005 at -16°F Evaporator
*when used with parallel rack system

Merchandising (5-Door)
Facings: 70.2 ft^2
Packout: 136.1 ft^3 with 30" x 24" deep shelves

Features & Options

Go Green
Remote cases ready for CO_2. 90-bar rating available.

High Humidity
Control climate challenges with advanced humidity package.

CoolView® Doors
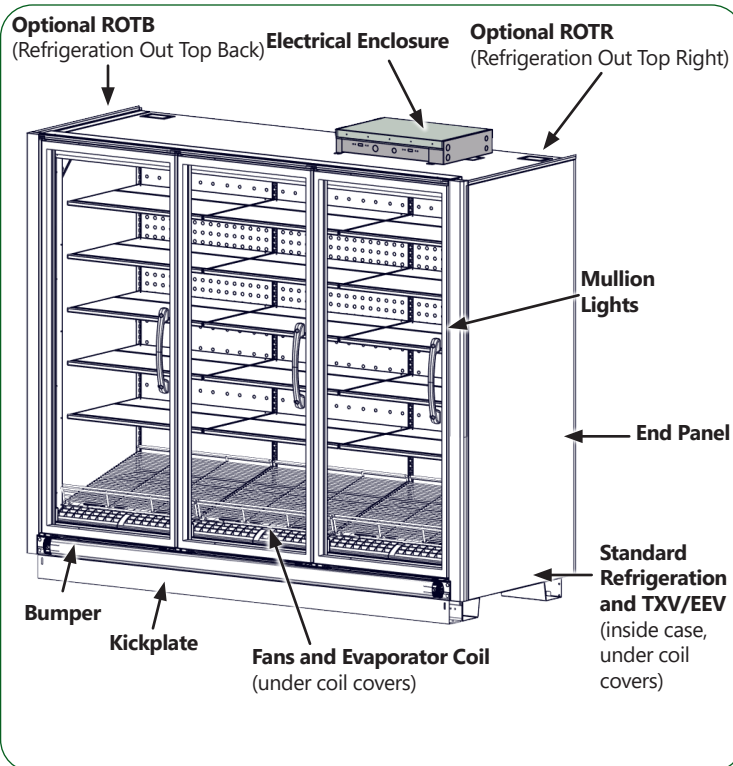30" wide x 74" tall CoolView® Illusion® Doors

LED Lighting
ChillBrite® 4000K LED Lighting

Additional Models
The Crystal low temp lineup offers a standard, ice merchandiser, dual temp case.

Hybrid™ Display Case
Available as Hybrid™ cases with R-404A or R-448A.

Applications

Ice Cream

Frozen Food

Optional ROTB (Refrigeration Out Top Back)
Electrical Enclosure
Optional ROTR (Refrigeration Out Top Right)
Mullion Lights
End Panel
Standard Refrigeration and TXV/EEV (inside case, under coil covers)
Bumper
Kickplate
Fans and Evaporator Coil (under coil covers)

Manuals and Instructions:
https://www.zero-zone.com/rvmc-rvlc

Specifications are subject to change without notice. All dimensions are nominal.
Case designed to operate in an ambient temperature of 75°F and relative humidity of 55% or lower.

Refrigeration Data

Set Points	Frozen Food (FF)	Ice Cream (IC)
Evaporator Temperature (°F) [1]	-7	-16
Discharge Air Temperature (°F) (w/ 8°F Superheat)	-3	-12

Notes:
1. For high-glide refrigerants, use dew point for unit sizing. Adjust evaporator pressure as needed to maintain discharge air temperatures.

	Lineup Data		Individual Case Data (includes 1 pair of end panels)							
	Per Door Avg		2-Door		3-Door		4-Door		5-Door	
Energy Use with Parallel Rack System [2]	FF	IC	FF	IC	FF	IC	FF	IC	FF	IC
RVLC30 Baseline Btu/h	925	1,005	2,130	2,430	3,280	3,540	4,300	4,640	5,330	5,750
Energy Use with Condensing Unit [2]	FF	IC	FF	IC	FF	IC	FF	IC	FF	IC
RVLC30 Baseline Btu/h	980	1,065	2,260	2,575	3,475	3,750	4,560	4,920	5,650	6,095
Btu/h Adders	FF	IC	FF	IC	FF	IC	FF	IC	FF	IC
Anti-Sweat High-Humidity Package	+100	+100	+200	+200	+300	+300	+400	+400	+500	+500
End Panels	Btu/h Per Case									
Glass Windowed End Panel (1-Pair) [3]	+315	+350								

Notes:
2. Baseline Evaporator Btu/h based on LED lighting (Zero Zone ChillBrite® 4000K), standard-energy doors (Zero Zone CoolView® Illusion®), and ECM or SSC electronic fan motors.
3. Glass windowed end panels only available with 2 1/2" end panels.

	Outlet Size (in.)			
Refrigeration Piping: R-404A & R-448A [4]	2-Door	3-Door	4-Door	5-Door
Suction Line O.D. (Standard Refrigeration Exit)	7/8	7/8	7/8	7/8
Suction Line O.D. (Top Refrigeration Exit)	3/8	5/8	5/8	5/8
Liquid Line O.D. (Electric Defrost)	3/8	3/8	3/8	3/8
Liquid Line O.D. (Hot Gas Defrost)	1/2	1/2	1/2	1/2
Refrigeration Piping: CO_2 [4]	2-Door	3-Door	4-Door	5-Door
Suction Line O.D. (Standard Refrigeration Exit)	1/2	1/2	1/2	1/2
Suction Line O.D. (Top Refrigeration Exit)	1/2	1/2	1/2	1/2
Liquid Line O.D. (Electric Defrost)	3/8	3/8	3/8	3/8
Liquid Line O.D. (Hot Gas Defrost)	1/2	1/2	1/2	1/2

Notes:
4. Read the Installation & Operation Manual for more about refrigeration piping to properly size individual risers for circuits of more than one case.

Crystal Merchandiser® RVLC30 Remote Specs

Electrical & Energy Data [5]

Fan Motors (115V)	Per Door Avg		2-Door		3-Door		4-Door		5-Door	
Number of Fans			2		3		4		5	
Fan Motors (115V)	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts
High-Efficiency Electronic (ECM or SSC)	0.42	24	0.84	48	1.26	72	1.68	96	2.1	120
Lighting System (120V)	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts
LED Lighting	0.16	19	0.32	39	0.48	58	0.63	77	0.79	96
Anti-Sweat Heat (115V)	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts
Standard-Energy Doors (CoolView® Illusion®)[6]	0.74	85	1.50	173	2.23	257	2.97	341	3.70	425
High-Humidity Package (CoolView® Illusion®)[7]	1.08	125	2.22	255	3.29	378	4.35	501	5.42	623
Defrost Heaters [8, 9]	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts	Amps	Watts
Single Phase (120V/1/60Hz or 208V/1/60Hz)	4.00	832	8.00	1,680	12.00	2,496	16.00	3,328	20.00	4,160
Three Phase (208V/3/60Hz)	2.31	832	4.66	1,680	6.93	2,496	9.23	3,328	11.55	4,160

Notes:
5. Amps are based on electrical nameplate values. Watts are based on laboratory observations of actual energy use.
6. Standard doors include glass heat, rail heat, mullion heat, and a deep coil.
7. High-humidity package includes 10% increase in glass heat, rail heat, and mullion heat. This package also includes a deep coil and an anti-sweat controller.
8. Electric Defrost: 1 per day. Defrost termination temperature setting is 50°F. Failsafe time is 55 minutes. Refer to the Installation & Operation Manual for details.
9. Hot Gas Defrost: 1 per day. Defrost termination temperature setting is 65°F. Failsafe time is 30 minutes. Refer to the Installation & Operation Manual for details. Zero Zone recommends 1 riser per refrigeration circuit when utilizing hot gas defrost.
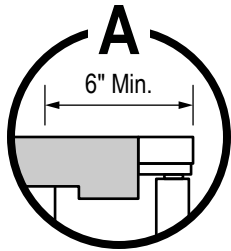
Physical Data

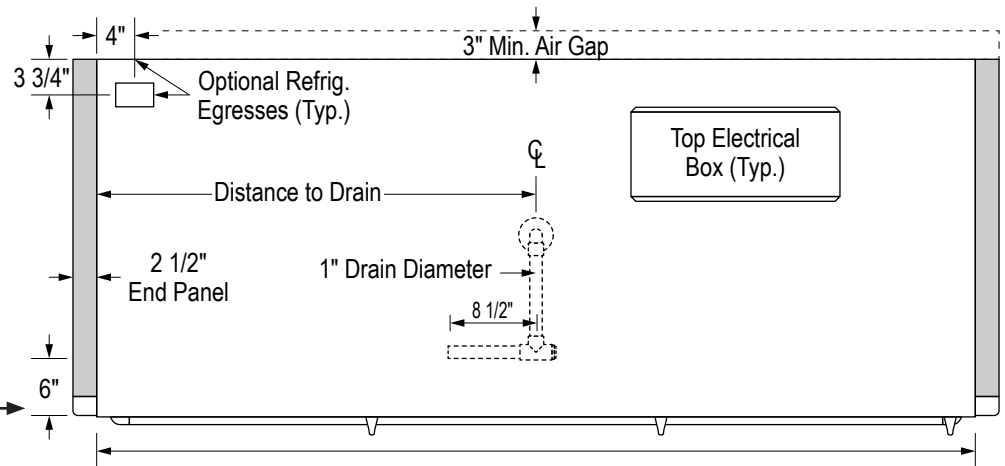| Merchandising	2-Door	3-Door	4-Door	5-Door
Facings (ft.²)	28.4	42.3	56.3	70.2
Packout (ft.³) 22" Shelves [10]	51.5	76.7	101.9	127.1
Packout (ft.³) 24" Shelves [10]	55.1	82.1	109.2	136.1
Shipping Weight without End Panels [11]	**2-Door**	**3-Door**	**4-Door**	**5-Door**
RVLC30 Weight (lbs.)	755	1,055	1,420	1,800
Shipping Weight with Solid End Panels [11]	**2-Door**	**3-Door**	**4-Door**	**5-Door**
RVLC30 Weight (lbs.)	815	1,115	1,480	1,860
Shipping Weight with Windowed End [11]	**2-Door**	**3-Door**	**4-Door**	**5-Door**
RVLC30 Weight (lbs.)	865	1,165	1,530	1,910

Notes:
10. Available with 6" tall bottom baskets instead of bottom wire racks.
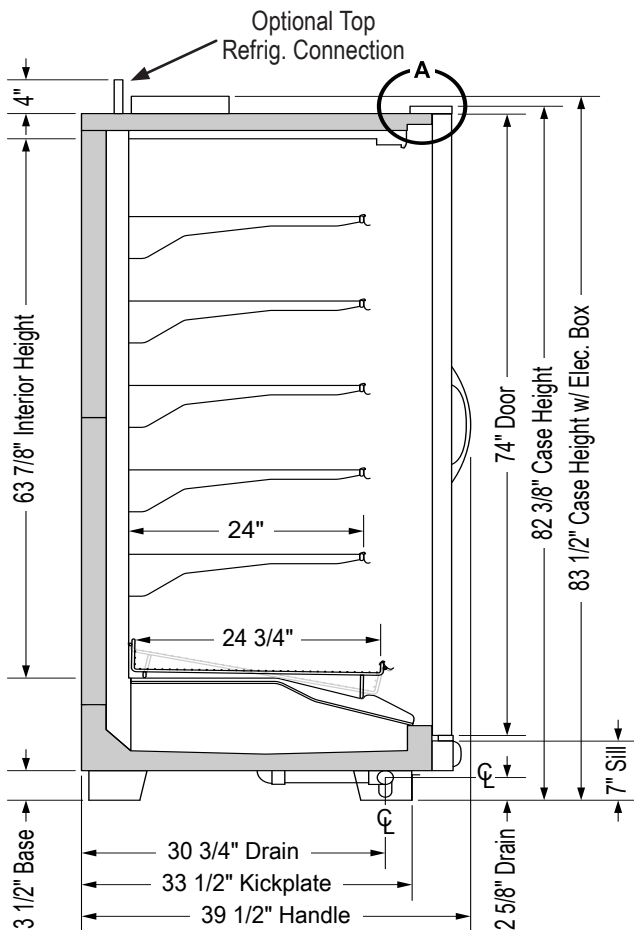11. Each solid end panel: 30 lbs. Each windowed end panel: 55 lbs.

RVLC30 Top View

A

6" Min.

Building soffits must be set back at least 6" from the front of the doors to allow access to electrical wiring on the top of the case.

4"
3 3/4"
3" Min. Air Gap

Optional Refrig. Egresses (Typ.)

Top Electrical Box (Typ.)

Distance to Drain

2 1/2" End Panel

1" Drain Diameter

8 1/2"

6"

Case Dimensions

Measurements	2-Door	3-Door	4-Door	5-Door
Case Length (in.) without End Panels	62 1/8	92 1/2	123	153 3/8
Case Length (in.) with End Panels	67 1/8	97 1/2	128 3/4	158 3/8
Distance to Drain (in.) without End Panels	31	46 1/4	61 1/2	76 3/4

RVLC30 End View

Optional Top Refrig. Connection

A

4"

63 7/8" Interior Height

24"

24 3/4"

74" Door

82 3/8" Case Height

83 1/2" Case Height w/ Elec. Box

7" Sill

3 1/2" Base

30 3/4" Drain

33 1/2" Kickplate

39 1/2" Handle

2 5/8" Drain

Base Notes:
- Base height options available: 1 ¾", 3 ½", or 6 ½".
- Changing bases affects case height and shipping height.
- Drain height from the floor: 2 ⅝" with 3 ½" base.
- Use 1 ¾" tall bases to fit through 80" doorways (shipping height = 79 ⅝"). These bases must use hat channel rails.