

## GENERAL NOTES

- 8-foot cases can consist of 3 (32") doors or 4 (24") doors; 12-foot cases can consist of 4 (36") doors or 6 (24") doors.
- Data listed is for Optimax Radiant and low power Optimax Pro (high power available). For other lighting options please contact your sales representative.
- "0.00" indicates that feature is not an option on this case model.
- Anti-condensate heat values for Eliminaator and Vista C represent a door with no heat on the glass.
- Listed discharge air velocity represents the average velocity at the peak of defrost.
- Temperature and defrost settings listed below are recommended start-up settings. Final operational settings may need to be adjusted for the store conditions in which the case operates.
- The recommended evaporator temperatures may need to be adjusted based on system setup, store conditions, etc. The minimum recommended evaporator temperature is 4°F below the listed evaporator temperature.
- Lighting controls - occupancy sensors are required.
- Option 1: OEM Provided: Lighting controls (on/off) are standard unless otherwise specified.
- Option 2: End User Provided: Lighting controls should be based on occupancy sensors.
- Light wattages below reflect 100% run time. To determine actual daily energy usage at 75°F/55%RH conditions, reduce the light wattage below by 42%.
- Rear loading cases are designed for the rear door to open into an operating cooler

## REFERENCE NOTES FOR CROSS SECTIONS

\* : STUB-UP AREA

\*\* : RECOMMENDED STUB-UP CENTERLINE FOR ELECTRICAL AND HUB DRAINS

- Ends add approximately 1" to case height, 1/2" to the back & 1" to the front
- Wiring to the top adds approximately 4" to case height
- A 2" minimum air gap is required between the rear of the case and the wall
- Casters add approximately 2 1/4" to case height
- Suction line: (2 door or 3 door) - 5/8", suction lines (4 door, 5 door, & 6 door) - 7/8"
- Liquid line with hot gas defrost (all lengths) - 3/8"
- Liquid line (all lengths) - 1/2"
- Available shelf sizes: 24" & 27"
- Recommended configuration is (5) rows - 27" shelves
- Peg shelving systems are not to be used with rear-loading cases



ORBRH

ALL MEASUREMENTS ARE TAKEN PER ASHRAE-72-2005 SPECIFICATIONS. HILLPHOENIX REFRIGERATED DISPLAY CASES FOR SALE IN THE UNITED STATES MEET OR EXCEED DEPARTMENT OF ENERGY 2017 REQUIREMENTS.

Rev Date:	Rev #	Revision Description:
12-1-17	1	DOE 2017

ELECTRICAL DATA			
Case Length	Fans Per Case	High Efficiency Fans	
		120 Volts	
		Amps	Watts
8'	3	0.65	78.0
12'	4	0.87	104.0

LIGHTING DATA							
Case Length	Size of Door	LED Lighting					
		Optimax Pro		GE Immersion		Crossfire/Polaris	
		120 Volts		120 Volts		120 Volts	
		Amps	Watts	Amps	Watts	Amps	Watts
8'	24"	0.73	87.0	0.00	0.00	0.00	0.0
8'	32"	0.48	58.0	0.40	48.00	0.38	45.0
12'	24"	1.08	130.0	0.00	0.00	0.00	0.0
12'	36"	0.64	77.0	0.53	64.00	0.50	60.0

ANTI CONDENSATE DATA						
Case Length	Door Size	Number of Doors	101 Frames		Vista Frames	
			Un Heated Doors		Un Heated Doors	
			ELMD, ELMH, I90		Vista C, I60, Elite	
			120 V		120 V	
			Amps	Watts	Amps	Watts
8'	24"	4	0.43	52	0.63	52
8'	32"	3	0.56	69	0.56	69
12'	24"	6	0.68	82	0.58	82
12'	36"	4	0.80	96	0.80	96

GUIDELINES & CONTROL DATA								
Application	Case Length	Door Size	BTUH/door		Evaporator (°F)	Superheat Set Point @ Bulb (°F)	Discharge Air (°F)	Discharge Air Velocity
			Coventional	Parallel				
Beverage	8'	24"	561	549	34	6-8	40	145 (FPM)
Beverage	8'	32"	748	732	34	6-8	40	145 (FPM)
Beverage	12'	24"	561	549	34	6-8	40	145 (FPM)
Beverage	12'	36"	841	824	34	6-8	40	145 (FPM)
Dairy/Deli	8'	24"	602	589	31	6-8	37	145 (FPM)
Dairy/Deli	8'	32"	803	786	31	6-8	37	145 (FPM)
Dairy/Deli	12'	24"	602	589	31	6-8	37	145 (FPM)
Dairy/Deli	12'	36"	903	884	31	6-8	37	145 (FPM)
Meat	8'	24"	645	619	28	6-8	34	145 (FPM)
Meat	8'	32"	860	825	28	6-8	34	145 (FPM)
Meat	12'	24"	645	619	28	6-8	34	145 (FPM)
Meat	12'	36"	968	928	28	6-8	34	145 (FPM)

DEFROST CONTROLS		
Defrost Per Day	Timed-Off Defrost	
	Fail-Safe (Min)	Termination Temp
2	30	40

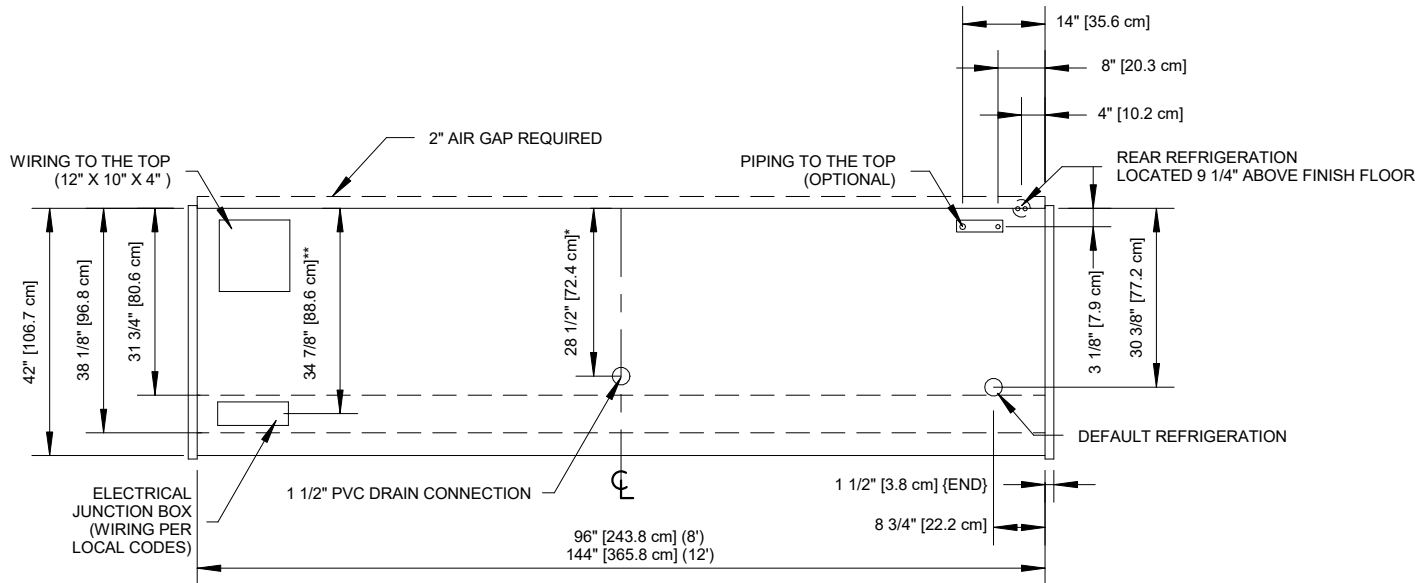
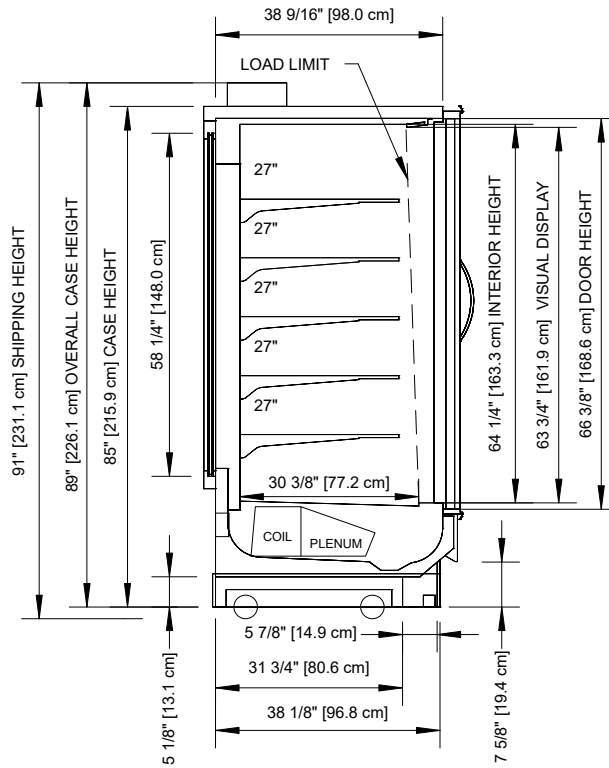


ORBRH

ALL MEASUREMENTS ARE TAKEN PER ASHRAE-72-2005 SPECIFICATIONS. HILLPHOENIX REFRIGERATED DISPLAY CASES FOR SALE IN THE UNITED STATES MEET OR EXCEED DEPARTMENT OF ENERGY 2017 REQUIREMENTS.

Rev Date:	Rev #	Revision Description:
12-1-17	1	DOE 2017



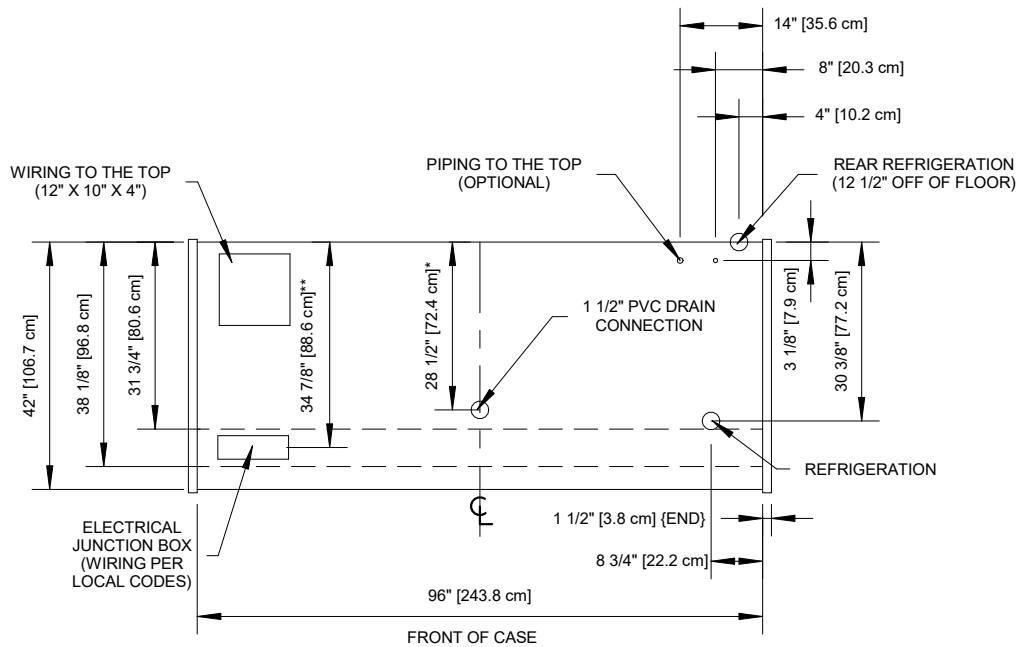
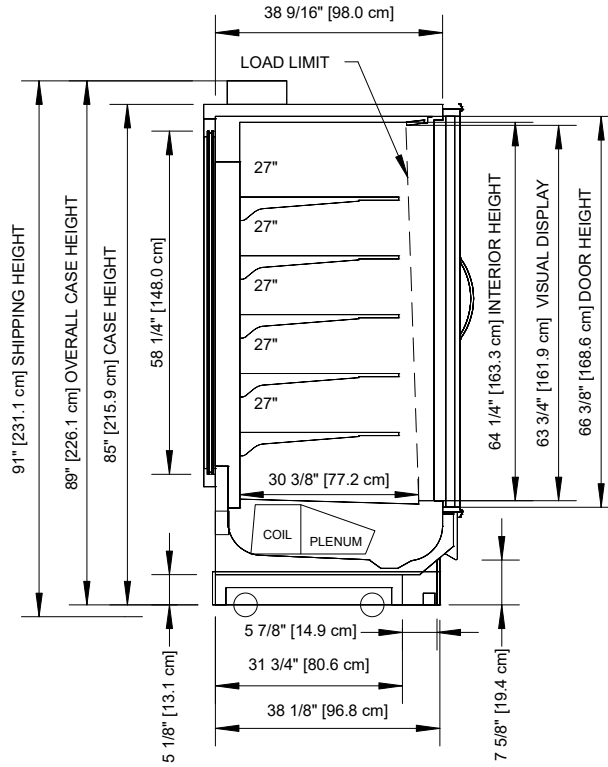


COMPONENT

ALL MEASUREMENTS ARE TAKEN PER ASHRAE-72-2005 SPECIFICATIONS. HILLPHOENIX REFRIGERATED DISPLAY CASES FOR SALE IN THE UNITED STATES MEET OR EXCEED DEPARTMENT OF ENERGY 2017 REQUIREMENTS.

ORBRH

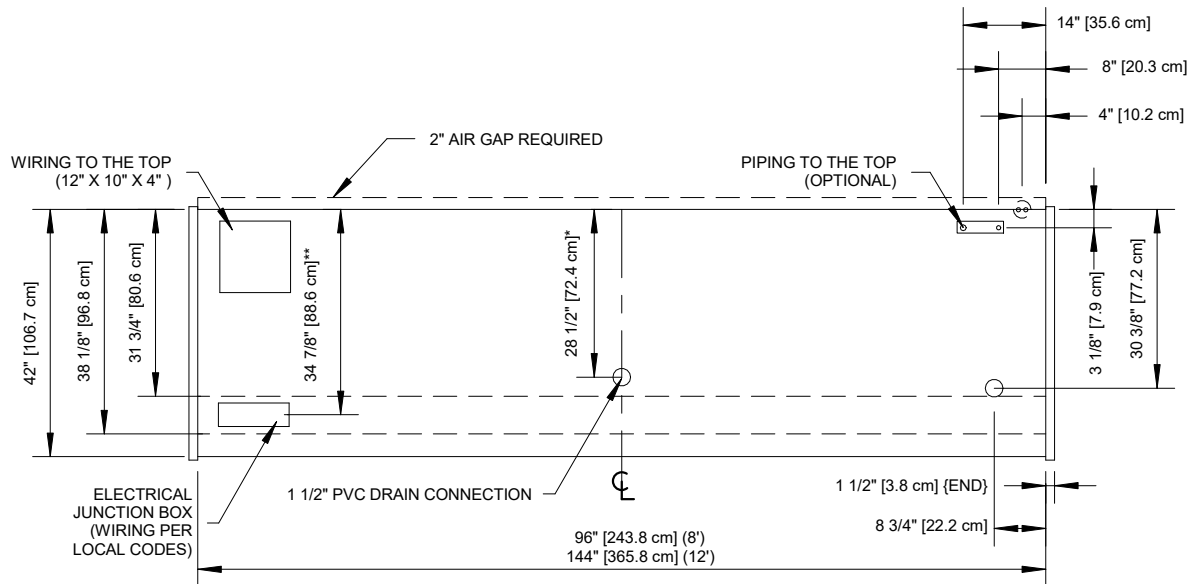
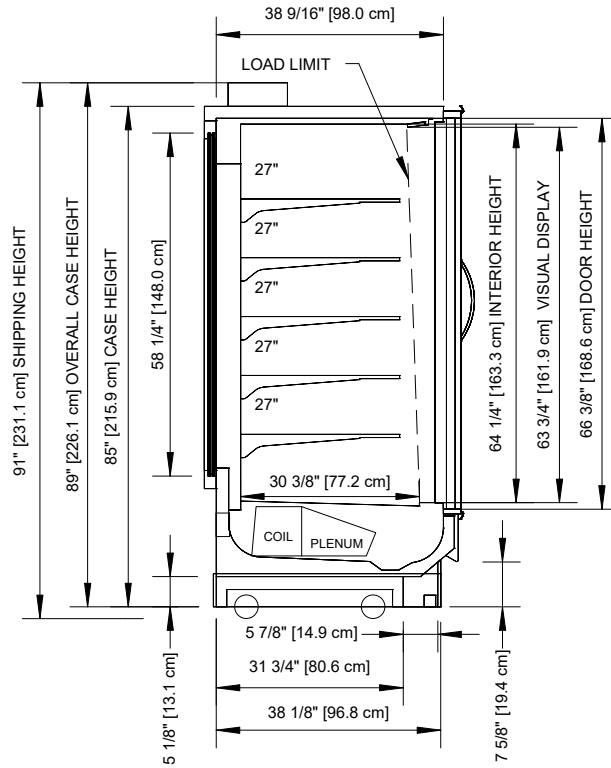
Rev Date:	Rev #	Revision Description:



ORBRH

ALL MEASUREMENTS ARE TAKEN PER ASHRAE-72-2005 SPECIFICATIONS. HILLPHOENIX REFRIGERATED DISPLAY CASES FOR SALE IN THE UNITED STATES MEET OR EXCEED DEPARTMENT OF ENERGY 2017 REQUIREMENTS.

Rev Date:	Rev #	Revision Description:
12-1-17	1	DOE 2017



ORBRH

ALL MEASUREMENTS ARE TAKEN PER ASHRAE-72-2005 SPECIFICATIONS. HILLPHOENIX REFRIGERATED DISPLAY CASES FOR SALE IN THE UNITED STATES MEET OR EXCEED DEPARTMENT OF ENERGY 2017 REQUIREMENTS.

Rev Date:	Rev #	Revision Description:
12-1-17	1	DOE 2017