

Model

i.Series® iUF116 Upright Ultra-Low Temperature Freezer

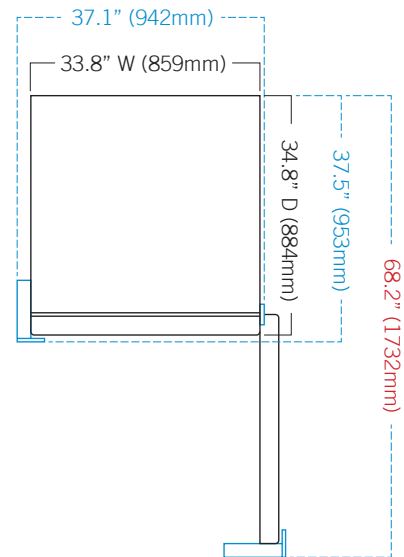
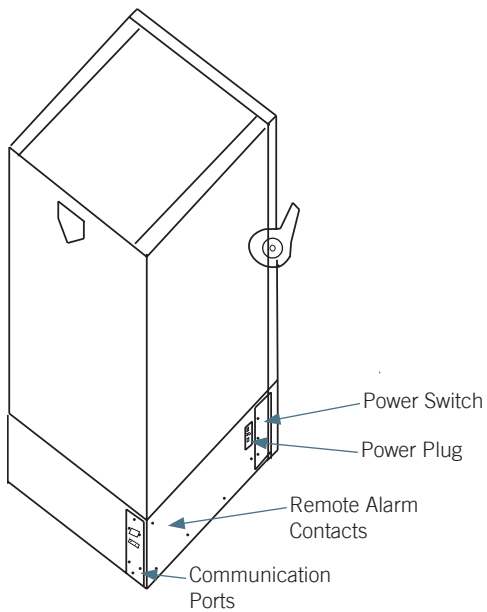
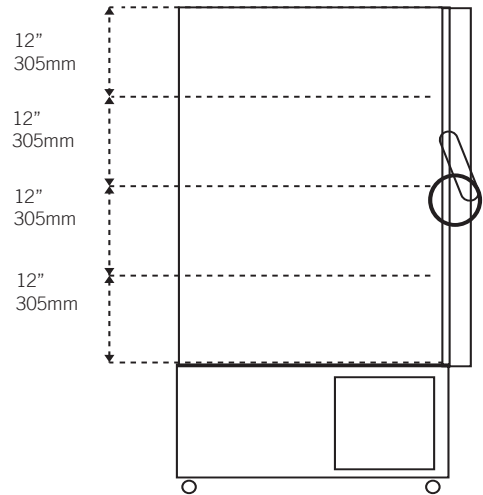
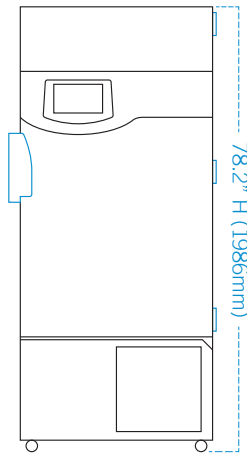
Specifications

Application, Rating and Electrical Data		Controller	
Application	Storage of biological samples	Interface	i.C ³ ®, eye-level, color touchscreen
Storage Volume	16cf (453L)	Power Switch	On/Off with circuit breaker
Storage Capacity	320 standard 2" (51mm) boxes	Controller Type	Microprocessor with touchscreen input and display. Includes USB hub for data retrieval.
Temperature Range	-50°C to -86°C @ 32°C (90°F) Ambient	Security	Lockable door, PIN access control, password setpoints, padlock hasp
Electrical Power	208/230V 60Hz, 1 Phase	Compressor Safeguard	High ambient temperature warning, compressor and condenser over-temperature alarms
Maximum Current	11 FLA	Control Sensor	RTD (Platinum) (1 ea)
Auto-Voltage Safeguard	Optional boost system	Communication Ports	(1) RS232 Port (rear) and (1) USB Port (side of door-mounted user interface)
Building Supply Rating	15 amp dedicated ground circuit	Warm / Cold Alarms	Fully adjustable
Power Plug / Power Cord Length	NEMA 6-15 plug, 7.5ft (2286mm)	Event Log	All alarms, door openings, download via USB
Certification / Agency Listing	QPS	Temperature Log	60 days, download via USB
Sound Pressure Level (dBA)	<70 dB	Access Log	60 days, download via USB
Indoor/Outdoor Use	Indoor use only	Battery Back-up	20 hour display and alarm battery back-up for i.C ³ ® touchscreen (12V, lead acid battery)
Application Environment	Non-corrosive, non-flammable, non-explosive, 15°C to 32°C (59°F to 90°F)	Dimensions and Construction	
Lifetime of Product	10 years	Interior (w x h x d) in (mm)	23.1 x 49.5 x 23.3 / (587 x 1257 x 592)
Refrigeration System		Exterior (w x h x d) in (mm)	33.8 x 78.2 x 34.8 / (859 x 1986 x 884)
Refrigeration System	Two Stage Cascade System	Exterior (w x h x d) in (mm) (Inc. handle, casters, hinges)	37.1 x 78.2 x 37.5 / (942 x 1986 x 953) Fits through standard 36" (914mm) doorway
Compressor / Number	1.5 HP hermetic / 2	Insulation	5" (127mm) Ecomate®, non HFC
Condenser Type / Number	Air-cooled fin and tube / 1	Door	1, solid
Expansion Device	TXV valve - high stage Cap tube - low stage	Access Ports	2, external
Evaporator Type	Split, cold wall	Perimeter Heater	Hot gas loop
Defrost Method	Manual	Compartments & Inner Doors Shelves / Capacity	4 3 adjustable stainless steel / 160 lb (73 kg) max cap.
Refrigerant Charge	R601 natural refrigerant - low stage R508B nonflammable CFC/HCFC-free - low stage R404A nonflammable CFC/HCFC-free - high stage	Casters / Legs	Standard / swivel, locking plus leveling legs
Performance Data		Net Weight	607 lb (275 kg)
Energy Consumption	18.5 kWhr/day at -80°C Setpoint	Shipping Weight	701 lb (318 kg)
Uniformity	+/-5°C at -80°C Setpoint	Options / Accessories	Chart Recorder, LN2 and CO2 back-up systems, -70°C factory preset, voltage boost system
Warranty		Clearance Requirements	Allow 4" (102mm) behind unit Allow 8" (203mm) above unit
Rel.i™ (US/Canada)	5 years compressor, 2 years parts and labor		
Outside US/Cnada	Consult your local representative		

Technical Data Sheet

-86°C Ultra-Low Freezer

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