

# BLOOD BANK REFRIGERATOR



# BLOOD BANK REFRIGERATOR

Designed as an essential piece of equipment in the immunohematology department and provides safe and convenient storage of whole blood, blood components, reagents and ensures freshness and integrity of blood and blood components. Microprocessor integrated system provides excellent temperature accuracy and reliable performance. Used in Immunohematology Department, Blood Bank, Laboratory, Research, Medical, Pharmaceutical. Also known as Laboratory Blood Bank Refrigerator.

## REF21-240 4°C BLOOD BANK REFRIGERATOR

Microprocessor-based temperature controller, temperature range  $4 \pm 1^\circ\text{C}$ , Large screen LCD display of temperature, display accuracy of  $0.1^\circ\text{C}$ . Room temperature ranging from  $0^\circ\text{C}$  to  $32^\circ\text{C}$

Automatic temperature control, Defrost automatic

Digital display of upper and lower temperature, two sensors

Audible and visual alarm system

Upright type, Exterior made from structural plate, interior made from ABS material.

Four units Caster are mounted under the bottom

Three layer glass door with inert gas inside, and lockable

Interior fluorescent lighting

Adjustable 4 units shelves made of quality steel wire

Forced air circulation system

The high-effective air-cooled condenser and the fin-type evaporator

Standard: Temperature printer

Optional: Chart recorder, Blood storage basket



## SPECIFICATIONS

Model	REF21-240
Capacity	240 L
Temperature Range	$+4^\circ\text{C}$ , $+2 \sim +10^\circ\text{C}$
Refrigerant	R134a, CFC free
Refrigeration System	International famous compressor and Germany EBM fan motor.
Defrost Method	No frost design
Controller	Microprocessor Controller with LCD Display
Control Sensor	2
Alarms	High & low temperature alarm, Sensor failure alarm, Door open alarm, Power off alarm, System failure alarm
Shelves	Adjustable 4 units steel wire shelves
External Size	605x615x1617 mm
Package Size	605x615x1780 mm
Optional Accessories	Blood storage basket
Weight	96 Kgs
Input/Average Power	500W/250W
Power Supply	220V,50/ 60Hz, 110V,50/60Hz, 220V,50Hz/ 120V,60Hz

# REF21-268 4°C BLOOD BANK REFRIGERATOR

Microprocessor-based temperature controller, Temperature range is 4±1°C

Large screen LCD display of temperature, display accuracy of +/- 0.1°C

Automatic temperature control, Defrost automatic

Audible and visual alarm

Upright type, Exterior made from painted steel plate, Inside is stainless steel. Four units Caster are mounted under the bottom

Three-layer glass door with heater around to prevent ice leak., and lockable

Interior fluorescent light

4 Inner shelves (wire plastics)

Forced air circulation system

Danfoss compressor and EBM fan motors from Germany

The high-effective air-cooled condenser and the fin-type evaporator

Two in depend refrigeration system, automatic cut-in when other one damage

Standard: Temperature printer

Optional: Chart recorder, Blood storage basket



## SPECIFICATIONS

Model	REF21-268
Capacity	268 L
Temperature Range	+4°C, +2~+10°C
Refrigerant	R134a, CFC free
Refrigeration System	International famous compressor and Germany EBM fan motor.
Defrost Method	No frost design
Controller	Microprocessor Controller with LCD Display
Control Sensor	2
Alarms	High & low temperature alarm, Sensor failure alarm, Door open alarm, Power off alarm, System failure alarm
Shelves	4 stainless steel drawers
External Size	628x700x1662 mm
Package Size	775x780x1810 mm
Optional Accessories	Chart Recorder, Touch screen, Blood storage basket
Weight	148 Kgs
Input/Average Power	400W/200W
Power Supply	220V,50/ 60Hz, 110V,50/60Hz, 220V,50Hz/ 120V,60Hz

# REF21-280 4°C BLOOD BANK REFRIGERATOR

Microprocessor-based temperature controller, temperature range  $4\pm 1^{\circ}\text{C}$ , Large screen LCD display of temperature, display accuracy of  $0.1^{\circ}\text{C}$ . Room temperature ranging from  $0^{\circ}\text{C}$  to  $32^{\circ}\text{C}$

Automatic temperature control, Defrost automatic

Digital display of upper and lower temperature, two sensors

Audible and visual alarm system

Upright type, Exterior made from structural plate, interior made from ABS material.

Four units Caster are mounted under the bottom

Three layer glass door with inert gas inside, and lockable

Interior fluorescent lighting

Adjustable 6 units shelves made of quality steel wire

Forced air circulation system

The high-effective air-cooled condenser and the fin-type evaporator

Standard: Temperature printer

Optional: Chart recorder, Blood storage basket



## SPECIFICATIONS

Model	REF21-280
Capacity	280 L
Temperature Range	$+4^{\circ}\text{C}$ , $+2\sim +10^{\circ}\text{C}$
Refrigerant	R134a, CFC free
Refrigeration System	International famous compressor and Germany EBM fan motor.
Defrost Method	No frost design
Controller	Microprocessor Controller with LCD Display
Control Sensor	2
Alarms	High & low temperature alarm, Sensor failure alarm, Door open alarm, Power off alarm, System failure alarm
Shelves	Adjustable 4 units steel wire shelves
External Size	675x725x1675 mm
Package Size	675x725x1840 mm
Optional Accessories	Blood storage basket
Weight	105 Kgs
Input/Average Power	500W/250W
Power Supply	220V,50/ 60Hz, 110V,50/60Hz, 220V,50Hz/ 120V,60Hz

# REF21-358 4°C BLOOD BANK REFRIGERATOR

Vertical cabinet

Microprocessor-based temperature controller, Temperature range  $4 \pm 1^\circ\text{C}$

Large screen LCD display of temperature, display accuracy of  $\pm 0.1^\circ\text{C}$

Polyurethane insulation is 80-95 mm

Forced air circulation system, defrost automatic

Digital display of upper and lower temperature

Audible and visual alarm

Exterior made from high quality steel plate, Interior is stainless steel

3-layer transparent door with lock, door with heater around to prevent ice leak.

5 Inner drawer (stainless steel)

Interior fluorescent light

The high-effective air-cooled condenser and the fin-type evaporator

Standard: Temperature printer

Optional: Chart recorder



## SPECIFICATIONS

Model	REF21-358
Capacity	358 L
Temperature Range	$+4^\circ\text{C}$ , $+2 \sim +10^\circ\text{C}$
Refrigerant	R134a, CFC free
Refrigeration System	International famous compressor and Germany EBM fan motor.
Defrost Method	No frost design
Controller	Microprocessor Controller with LCD Display
Control Sensor	2
Alarms	High & low temperature alarm, No battery alarm, Door ajar alarm, Filter blocking alarm, System failure alarm
Shelves	5 units of drawers
External Size	700x628x1962 mm
Package Size	512x515x1270 mm
Power Supply	220V,50/ 60Hz, 110V,50/60Hz, 220V,50Hz/ 120V,60Hz

# REF21-588 4°C BLOOD BANK REFRIGERATOR

- Microprocessor-based temperature controller, Temperature range is  $4\pm 1^{\circ}\text{C}$
- Large screen LCD display of temperature, display accuracy of  $\pm 0.1^{\circ}\text{C}$
- Automatic temperature control, Defrost automatic
- Audible and visual alarm
- Upright type, Exterior made from painted steel plate, Inside is stainless steel. Four units Caster are mounted under the bottom
- Three-layer glass door with heater around to prevent ice leak., inert gas inside and lockable
- Interior fluorescent light
- 6 Inner shelves (wire plastics)
- Forced air circulation system
- Danfoss compressor and EBM fan motors from Germany
- The high-effective air-cooled condenser and the fin-type evaporator
- Two in depend refrigeration system, automatic cut-in when other one damage
- Forced air circulation system.
- Standard: Temperature printer
- Optional: Chart recorder, Blood storage basket



## SPECIFICATIONS

Model	REF21-588
Capacity	588 L
Temperature Range	$+4^{\circ}\text{C}$ , $+2\sim +10^{\circ}\text{C}$
Refrigerant	R134a, CFC free
Refrigeration System	International famous compressor and Germany EBM fan motor.
Defrost Method	No frost design
Controller	Microprocessor Controller with LCD Display
Control Sensor	2
Alarms	High & low temperature alarm, Sensor failure alarm, Door open alarm, Power off alarm, System failure alarm
Shelves	Adjustable 5 units steel wire shelves
External Size	760x800x1977 mm
Package Size	920x950x2200 mm
Optional Accessories	Chart Recorder, Touch screen, Blood storage basket
Weight	210 Kgs
Input/Average Power	650W/325W
Power Supply	220V,50/ 60Hz, 110V,50/60Hz, 220V,50Hz/ 120V,60Hz

# REF21-950 4°C BLOOD BANK REFRIGERATOR

- Microprocessor controller, Temperature range is  $4\pm 1^{\circ}\text{C}$
- Large screen LCD display of temperature, display accuracy is  $0.1^{\circ}\text{C}$
- Audible and visual alarm
- Upright type, Exterior made from painted steel plate, Inside is 304 stainless steel. Four units Caster are mounted under the bottom
- Three-layer glass door with heater around to prevent ice leak, inert gas inside and lockable
- Interior fluorescent light
- Forced air circulation system
- The high-effective air-cooled condenser and the fin-type evaporator
- Standard: Temperature printer
- Optional: Chart recorder, Blood storage basket



## SPECIFICATIONS

Model	REF21-950
Capacity	950 L
Temperature Range	$+4^{\circ}\text{C}$ , $+2\sim+10^{\circ}\text{C}$
Refrigerant	R134a, CFC free
Refrigeration System	International famous compressor and Germany EBM fan motor.
Defrost Method	No frost design
Controller	Microprocessor Controller with LCD Display
Control Sensor	2
Alarms	High & low temperature alarm, Sensor failure alarm, Door open alarm, Power off alarm, System failure alarm
Shelves	Adjustable 8 units steel wire shelves
External Size	780x1200x1894 mm
Package Size	885x1300x2200 mm
Optional Accessories	Chart Recorder, Touch screen, Blood storage basket
Weight	125 Kgs
Input/Average Power	700W/350W
Power Supply	220V,50/ 60Hz, 110V,50/60Hz, 220V,50Hz/ 120V,60Hz

# REF21-090 +4/+22 BLOOD TRANSPORT BOX

- $4^{\circ}\text{C}$  for storing blood
- $22^{\circ}\text{C}$  for storing blood platelet
- Audible and visual alarm
- Four units of baskets inside as standard, which can load 50 blood bags of 450ml



## SPECIFICATIONS

Model	REF21-090
Capacity	90 L
Temperature Range	4°C or 22°C
Ambient Temperature	-5°C or 43°C
Compressor	Danfoss compressor
Alarms	High & low temperature alarm
Insulation	50 mm
Material	Whole LLDPE
External Size	1000Lx565Wx862H mm
Package Size	1135Lx636Wx1069H mm
Optional Accessories	Hydraulic support bar, Remote alarm system
Weight	73/90 kg
Power Supply	DC12/24V/ AC100-240V 50/60Hz Automatic selection

## REF23 4°C BLOOD BANK REFRIGERATOR

Microprocessor controlled forced-air cooling with electrical heat compensation system

Digital temperature display for upper and lower sections in chamber with 0.1°C resolution

Consistent cabinet temperature 2-6°C

High-tech integrated sensors to display and control temperature

Auto-defrost to remove moisture on cooling surface

Build-in backup battery to display temperature and to operate audible and visual alarm systems for up to 72 hours without ac power

Equipped with a complete temperature alarm system featuring audible buzzer and visible flashing light

Standard with laser printer

Standard with acrylic inner small door, for less affection on other room when one door open

Safety lock to prevent unauthorized access

Storage space designed for easy sorting of a variety of blood products



## SPECIFICATIONS

Model	REF23-108	REF23-208	REF23-658	REF23-1008
Capacity	108 L	208 L	658 L	1008 L
Temperature Range	4°C±1			
Ambient Temperature	10~32 °C			
Refrigerant	R134a, CFC free			
Defrost Method	Auto Defrost		No Frost with heated glass door	
Controller	Microprocessor Control with digital Display			
Cooling Type	Forced air cooling			
Compressor	Embraco/1		Secop/1	
Evaporator	Finned evaporator			



Evaporator material	Copper pipe and aluminum fin			
Condenser	Wire-and-tube		Finned	
Sensor	NTC			
Alarms	High/low temperature, Power off, Temperature controller malfunction, Backup battery malfunction, Backup battery Alarm for power off (72h)			
Insulation	PURF			
Material	Inside: Stainless steel			
Outside				
Color sprayed steel	Shelves			
Shelves	Mode of Condenser			-
49.6 dB	Internal Size	-	-	-
432x462x478 mm	External Size	-	-	-
522x600x1050 mm	Package Size	-	-	-
572x685x1070 mm	Accessories	-	-	-
Caster, Test hole 1/25MM, Thermal printer	Optional Accessories			
Temperature recorder	Weight			
50 / 55 kg	Power consumption (kW.h/24h)	-	-	-
1.95 kWh/24hrs	Power	-	-	-
160 W	Power Supply	-	-	-
51.2 dB	-	Internal Size		-
432x462x978 mm	-	External Size	-	-
522x600x1550 mm	-	Package Size	-	-
572x685x1570 mm	-	Accessories	-	-
67 / 75 kg	-	Power consumption (kW.h/24h)	-	-
2.22 kWh/24hrs	-	Power	-	-
200 W	-	Power Supply	-	-
1100x454x1325 mm	-	-	External Size	-
1220x648x1885 mm	-	-	Package Size	-
1300x730x2080 mm	-	-	Accessories	-
165 / 195 kg	-	-	Power consumption (kW.h/24h)	-
6.31 kWh/24hrs	-	-	Power	-
364 W	-	-	Power Supply	-
Drawers	-	-	-	Mode of Condenser
53.6 dB	-	-	-	Internal Size
1100x684x1325 mm	-	-	-	External Size
1220x878x1885 mm	-	-	-	Package Size
1300x960x2080 mm	-	-	-	Accessories
256 / 286 kg	-	-	-	Power consumption (kW.h/24h)

8.53 kWh/24hrs	-	-	-	Power
513 W	-	-	-	Power Supply



REF23-108



REF23-208



REF23-658



REF23-1008

# **Centrifugen**

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