

Anexa tehnica lot 5

Frigider pentru reactivi

KLAB R700V PL ADV, producator KW Apparecchi Scientifici, Italia

Parametri solicitati	Parametri oferiti
Descriere Frigidere proiectate pentru a stoca produse de laborator, culturi și probe la temperaturi de obicei între 2 și 8 grade Celsius. Aceste frigider constau în mod obișnuit dintr-o cameră cu un interior rezistent la coroziune (oțel inoxidabil de obicei), minimizarea riscului de alterare, contaminare și / sau coroziune a conținutului. Parametrul Specificația Configurație mobil Capacitatea internă a camerei în intervalul de 500–700 litri, cu o toleranță maximă de $\pm 10\%$ Număr de rafturi ≥ 6 Ușă Număr ≥ 2 Transparentă obligatoriu Mecanism blocare cu cheie Roți ≥ 4 Frâne ≥ 2 Lumină interior obligatoriu Construcție interioară materiale anti-bacteriale prevăzute pentru prelucrare Construcție exterioară cu acoperire anticorozivă Afișaj temperatură digital Alarmer acustică vizuală Răcire ventilată Temperatura reglabilă $+2^{\circ}\text{C} \dots +8^{\circ}\text{C}$ Omogenitatea/ uniformitatea termică $\pm 2^{\circ}\text{C}$ Alimentare 220 V, 50 Hz Refrigerent fără CFC / HCFC Zgomot $< 55 \text{ dB}$	Descriere Frigidere proiectate pentru a stoca produse de laborator, culturi și probe la temperaturi de obicei între 2 și 8 grade Celsius. Aceste frigider constau în mod obișnuit dintr-o cameră cu un interior rezistent la coroziune (oțel inoxidabil de obicei), minimizarea riscului de alterare, contaminare și / sau coroziune a conținutului. Parametrul Specificația Configurație mobil Capacitatea internă a camerei 700 litri Număr de rafturi 6 Ușă Număr 1(una) Transparentă obligatoriu, usi de sticla Mecanism blocare cu cheie Roți 4 Frâne 2, pe roțile din fata Lumină interior obligatoriu Construcție interioară material anti-bacteriale prevăzut pentru prelucrare - AISI 304 18/10 stainless steel Construcție exterioară anticorozivă - Satin-finished AISI 304 stainless steel Afișaj temperatură digital Alarmer acustică vizuală Răcire ventilată Temperatura reglabilă $+0^{\circ}\text{C} \dots +15^{\circ}\text{C}$, din uzina vine setata la $+5^{\circ}\text{C}$ Uniformitatea termică $\pm 3^{\circ}\text{C}$ Stabilitate termica $\pm 1^{\circ}\text{C}$ Alimentare 220 V, 50 Hz Refrigerent fără CFC / HCFC, R455a(gr. 340) Zgomot 42 dB

Technical Features

Nominal / Net Storage Volume	700 lt (24,72 cu ft) / 600 lt (21,2 cu ft)
Temperature Range	0°C/+15°C
Factory Set Point	+5°C
Temperature Uniformity	± 3°C
Temperature Stability	± 1°C
Ambient Operating Temperature	+10°C/+38°C, 50% RH (N-ST Climate Class)
Noise Level	< 42 dBA

Power Supply	230V ±10% / 50Hz
Standard Electrical Plug	Schuko
Power Absorption	2,5A
Daily Energy Consumption	2,00 kWh/24h (with +20°C ambient temperature)

External Dimensions	W 750 x D 840 x H 2050 mm W 29,52 x D 33,08 x H 80,70 inch.
Internal Dimensions	W 590 x D 670 x H 1510 mm W 23,22 x D 26,38 x H 59,45 inch.
Weight	155 kg

Packing Dimensions	Carton Box + Pallet: W 850 x D 900 x H 2200 mm, 160 kg Wooden Cage: W 1000 x D 1000 x H 2400 mm, 230 kg
---------------------------	--

External Surface	Satin-finished AISI 304 stainless steel
Internal Surface	AISI 304 18/10 stainless steel
External/Internal Edges	Rounded to facilitate easy cleaning
Insulation Type	High-density CFC-free PUR foam
Insulation Thickness	80 mm on sides / 80 mm rear
Door Type	Double-layer glass, with self-closing system (with opening angle ≤90°), ergonomic handle, key-lock
Door Sealing	Magnetic silicone gasket placed all over the door's frame
Lighting	LED light, with automatic activation when the door is opened

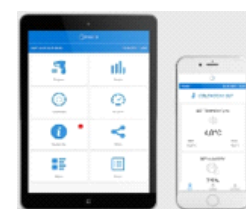
Standard Configuration	n°3 wire shelves made in PVC-coated steel, adjustable in height (Dimensions W 530 x D 650 mm) with max load 35 kg each n°4 swivel castors (front castors equipped with brakes) Porthole (Ø 25 mm) for introducing in the chamber independent probes connected to external monitoring system/BMS 2,7A backup battery with self-charging circuit (36 hours autonomy in case of power failure) Volt-free contact for connection to an external alarm monitoring system RFI filter
Max Shelves / Drawers	7 / 7 (or a mix of them)

Cooling System

Cooling	Forced-air cooling, with automatic shut-off of the evaporator fan during door opening
Compressor	Fully sealed hermetic compressor (1/4 HP) with thermal protector
Refrigerant (CFC/HCFC free)	R455a (gr. 340)
Defrost System	Fully automatic with evaporation of condensation water

PL ADV Control System

Controller	Microprocessor Controller
Display	LED display with 5-keys capacitive keyboard, with 0.1°C resolution
Temperature Probes	n°2 NTC probes (for evaporator / control) + n°1 Pt1000 (for monitoring)
Access Control	3-levels password security system (User/Service/Admin)
Connectivity	In-built Wi-Fi module for remote connection to mobile APP/Cloud The main screen displays the temperature set point, functional icons, current time, alarm events, LED light ON/OFF switch Data logger function with automatic recording of temperature data (at 30-seconds intervals) and events
Features	Flash memory capable of recording data for a minimum period of 1 year Safety thermostat with anti-freezing (factory pre-set limit at +2°C) and anti-heating (factory pre-set limit at +8°C) In-built power stabilizer with linear voltage regulation (±20 Volts) Possibility of remotely setting and modifying the device parameters and to view the temperature graph in real time Possibility to download data in CSV/PDF format via APP on smartphone/tablet/PC (no need for USB) Automatic sending of push notifications (via APP) and/or email (via Cloud) in the event of an alarm Possibility of setting automatic sending of weekly temperature and event reports via email
Remote Management and Monitoring with IOS/Android ConneX APP and/or KW Cloud	- Power failure
Main Alarms List (Audio/visual notification)	- Door open (the alarm interval can be freely set by the user) - High/Low temperature (alarm limits can be set freely by the user) - Temperature probes failure - Back-up battery failure / low charge





TECNILABO

Accessories Available On Request

Additional adjustable wire shelf in PVC-coated steel

Perforated drawer (sliding on telescopic guides) in AISI 304 18/10 stainless steel with plexiglass front panel (dimension W 535 x D 635 x H 130 mm)

Perforated drawer (sliding on telescopic guides) in AISI 304 18/10 stainless steel, lockable for narcotics storage

Pt100 temperature probe enclosed in vial filled with glycol solution (for product simulation)

Weekly cycle chart disk recorder (including n°52 spare paper disks + n°1 pen)

Voltage stabilizer

Electrical outlet different from standard Shucko

Packing in wooden cage