

Model ED 720 | Drying and heating chambers with natural convection

The strengths of a BINDER ED series drying chamber include routine drying and sterilization tasks up to +300 °C. Thanks to the natural convection, all thermal processes which use this drying chamber are highly efficient. The ED series ensures fast, uniform drying.

BENEFITS

- · Best energy efficiency on the market
- Excellent temporal and spatial temperature accuracy
- USB connection for recording data
- Temperature range up to +300 °C



Model 720



Model 720

IMPORTANT FEATURES

- Temperature range: +5°C above ambient temperature to +300 °C
- Up to 30% lower energy consumption compared to conventional units on the 2 chrome-plated racks
- High temperature accuracy thanks to APT.line™ technology
- Natural convection
- Controller with LCD display

- · Electromechanical control of the exhaust air flap
- Class 2 integrated independent adjustable temperature safety device (DIN 12880) with visual alarm
- Ergonomic handle design
- · USB port for recording data

ORDERING INFORMATION

Interior volume [L]	Power supply - unit fuse	Plug*	Version	Model version	ArtNo.
Model ED 720					
743	400 V 3~/N/PE 50/60 Hz -16,0 A	CEE 16 / 6 H plug 5- pin	Standard	ED720-400V	9010-0341



TECHNICAL DATA

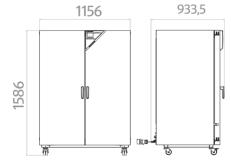
TECHNICAL DATA			
Data			
Designation	ED720-400V		
Article Number	9010-0341		
Option model	Standard		
Performance Data Temperature			
Temperature range	+5 °C above ambient temperature to 300 °C		
Temperature uniformity at 150°C	3.2 ± K		
Temperature fluctuation at 150°C	0.8 ± K		
Heating up time to 150°C	85 min		
Recovery time after door was opened for 30 s at 150°C	25 min		
Air change data			
Air change rate at 100°C	2 x/h		
Electrical data			
Rated Voltage	400 V		
Power frequency	50/60 Hz		
Nominal power	4,1 kW		
Unit fuse	16,0 A		
Phase (Nominal voltage)	3~/N/PE		
Dimensions and weights			
Interior volume	743 L		
Net weight of the unit (empty)	169 kg		
Load per rack	45 kg		
Permitted load	315 kg		
Wall clearance back	160 mm		
Wall clearance sidewise	100 mm		
Housing dimensions not incl. fittings and connections			
Width net	1,165 mm		
Height net	1,590 mm		
Depth net	870 mm		
Internal Dimensions			



Interior width	960 mm		
Interior height	1,280 mm		
Interior depth	605 mm		
Unit doors	2		
Environment-specific data			
Energy consumption at 100°C	380 Wh/h		
Energy consumption at 150°C	700 Wh/h		
Fixtures			

All technical data is specified for unloaded units with standard equipment at an ambient temperature of +22 °C ±3 °C and a power supply voltage fluctuation of ±10%. The temperature data is determined in accordance to BINDER factory standard following DIN 12880, observing the recommended wall clearances of 10 % of the height, width, and depth of the inner chamber. All indications are average values, typical for units produced in series. We reserve the right to change technical specifications at any time.

DIMENSIONS Incl. fittings and connections [mm]



OPTIONS

Designation	Description	*	ArtNo.
Access port with silicone plug	back		
	10 mm	01	8012-1282
	30 mm	01	8012-0540
	50 mm	01	8012-0546
	left		
	10 mm	01	8012-1275
	30 mm	01	8012-1018
	50 mm	01	8012-1022
	100 mm	01	8012-1030
	right		



Designation	Description	*	ArtNo.
	10 mm	01	8012-1268
	30 mm	01	8012-1017
	50 mm	01	8012-1021
	100 mm	01	8012-1031
	top		
	10 mm	01	8012-1262
	30 mm	01	8012-0539
	50 mm	01	8012-0545
	100 mm	01	8012-1029
alarm function for overheating	switchable acoustic alarm, with adjustable limit value on the independent temperature safety device. Not in combination with the following option: Door with window	-	8012-1635
analog output 4-20 mA	for temperature values (output not adjustable)	02	8012-1623
alibration certificate, xpanded	for temperature; for extending the measurement in center of chamber to include another test temperature	-	8012-1115
	for temperature, measurement in center of chamber at specified temperature	-	8012-1134
alibration certificate,	temperature measurement incl. certificate, 9 measuring points at specified temperature	-	8012-1551
temperature	temperature measurement incl. certificate, 15- 18 measuring points at specified temperature	-	8012-1572
	temperature measurement incl. certificate and 27 measuring points at specified temperature	-	8012-1593
Class 3.1 independent emperature safety device	with visual alarm (DIN 12880)	-	8012-0985
lock	battery-backed	-	8012-1640
oor lock	lockable door handle	-	8012-1817
thernet interface	for Multi Management Software APT-COM™		8012-1836
nner chamber, reinforced	max. total load 350 kg	-	8012-1827
and a linkatory	with two 27 W light bulbs		
Interior lighting	400 V option model	-	8012-1824
leasurement of air exchange ate	in accordance with ASTM D5374, definition and protocol according to ambient temperature	-	8012-0195
t 100 temperature sensor	additional flexible Pt 100, interior, for displaying the temperature on the unit display		8012-1619
/iewing window and interior ighting	Viewing window (triple-glazed insulating glass) 300 x 480 mm in every door and interior lighting 30 W. Not in combination with the following option: Alarm function for overheating		



Designation	Description	*	ArtNo.
	400 V option model	-	8012-1830

ACCESSORIES

Designation	Description	*	ArtNo.
	for simple logging and documentation requirements with up to 5 networked units.		
APT-COM™ 4 BASIC-Edition	version 4, BASIC edition	-	9053-0039
APT-COM™ 4 GLP-Edition	for working under GLP-compliant conditions. Measured values are documented in a tamper-proof way in line with the requirements of FDA Regulation 21 CFR 11.		
	version 4, GLP edition	-	9053-0042
APT-COM™ 4 PROFESSIONAL-	convenient unit and user management built on the BASIC edition. Suitable for networking up to 100 units.		
Edition	version 4, PROFESSIONAL edition	-	9053-0040
H-neutral detergent	concentrated, for gentle remove of residual contaminants; 1 kg	-	8012-2250
	IQ/OQ/PQ documents – supporting documents for validation performed by customers, according to customer requirements, PQ section added to qualification folder IQ/OQ; parameters: temperature, CO ₂ , O ₂ – or pressure, depending on unit		
	Digital in PDF format	-	7057-0005
100	Hard copy inside folder	-	7007-0005
Qualification documents	IQ/OQ documents – supporting documents for validation performed by customers, consisting of: IQ/OQ checklists incl. calibration guide and comprehensive unit documentation; parameters: temperature, CO_2 , O_2 , pressure, depending on unit		
	Digital in PDF format	-	7057-0001
	Hard copy inside folder	-	7007-0001
Rack	max. load per rack 45 kg		
	chrome plated	-	8012-2045
	stainless steel	-	8012-2174
Rack, heavy load	max. load per rack 70 kg		
	Stainless steel	-	8012-2186
	max. load per rack 40 kg		
helf, perforated	Stainless steel	-	8012-2182



SERVICES

Designation	Description	*	ArtNo.
Calibration services			
Calibration certificate, temperature	Calibration of one (1) test temperature specified by the user in center of chamber, including certificate	-	DL30-0110
Cambration certificate, temperature	Extension of calibration of one (1) additional test temperature specified by the user in the center of the usable space, including certificate	-	DL30-0102
Measurement of air exchange rate	including certificate (in accordance with ASTM D5374)	-	DL33-0000
Temperature measurement, 9 measuring points	Temperature measurement with 9 measuring points with a set value specified by the user, including certificate	-	DL30-0109
Temperature measurement, 18 measuring points	Temperature measurement with 18 measuring points with a set value specified by the user, including certificate	-	DL30-0118
Temperature measurement, 27 measuring points	Temperature measurement with 27 measuring points with a set value specified by the user, including certificate	-	DL30-0127
Installation services			
Unit commissioning	Connect the unit to the customer-side connections (electricity, water, wastewater, gas), basic functions check, brief operating instructions. (excl.: unpacking, setup, controller instructions, programming, installation work)	-	DL10-0100
Unit instructions	Instruction regarding operating principle and basic functions of the unit, operation of the control electronics including programming	05	DL10-0500
Maintenance contracts			
BRONZE 3-year maintenance contract	Maintenance service as contractually agreed, visual inspection of mechanical and electrical components, check of control response, 20% discount on spare parts	-	DL20-0720
GOLD 3-year maintenance contract	Maintenance service as contractually agreed, visual inspection of mechanical and electrical components, check of control response, 20% discount on spare parts, testing of all key functions, replacement of wear parts, calibration of one test temperature specified by the user in the center of the usable space, including certificate	-	DL20-0915
SILVER 3-year maintenance contract	Maintenance service as contractually agreed, visual inspection of mechanical and electrical components, check of control response, 20% discount on spare parts, testing of all key functions, calibration of one test temperature specified by the user in the center of the usable space, without certificate	-	DL20-0815
Maintenance services			
Maintenance	One-off maintenance service in accordance with maintenance schedule. Visual inspection of mechanical and electrical components, testing of all key functions. Calibration of a test temperature specified by the user in center of usable space without certificate	-	DL20-0601
Validation services			
Execution of IQ/OQ	Execution of IQ/OQ in accordance with qualification folder	-	DL40-0100
Execution of IQ/OQ/PQ	Execution of IQ/OQ/PQ in accordance with qualification folder	-	DL44-0500
Warranty service			
1-year warranty extension	The warranty is extended by 1 year from the delivery date, wear parts are excluded	-	DL50-0010



NOTES

- O1 Condensation may occur in the area around the access port. Access ports may be placed in custom locations for an additional charge.
- 02 UL mark is not granted when this option is used.
- Quoted prices do not include travel costs. Please refer to the chapter on BINDER Service for travel costs for your region. Quoted prices for services performed in Switzerland do not include a country-specific added fee (available on request).

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