Model KMF 115 | Constant climate chambers with expanded temperature / humidity range

BENEFITS

- Homogeneous climate conditions thanks to APT.line™ technology
- · Automatic water and wastewater management
- · Humidification with fast response times
- Wide humidity range up to 98 % RH
- Long-term stress testing, e.g. at 85 °C / 85 % RH



Model 115

MAIN FEATURES

- Temperature range: -10 °C to 100 °C
- Humidity range: 10 % RH to 98 % RH
- APT.line™ preheating chamber technology
- Humidity regulation with capacitive humidity sensor and vapor humidification
- Inner chamber made of stainless steel
- BINDER APT-COM™ 3 Basic Edition communication software
- Controller with time-segment programming

- Tightly-sealed inner door made of tempered safety glass
- 1 stainless steel rack
- Access port with silicone plug, 30 mm, left
- Class 3.1 independent temperature safety device (DIN 12880) with visual and audible temperature alarm
- Computer interface: Ethernet
- Door heating

ORDERING INFORMATION

Interior volume [L]	Voltage	Option model	Version	ArtNo.
Model KMF 115				
102	200230 V 1~ 50/60 Hz	Standard	KMF115-230V	9020-0193
	200240 V 1~ 50/60 Hz	Standard	KMF115-230V	9020-0307

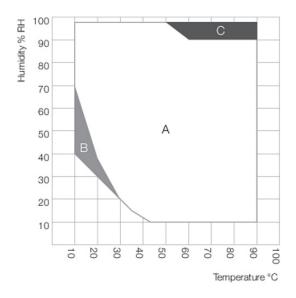
TECHNICAL DATA

Description	KMF115-230V	KMF115-230V
Article Number	9020-0193	9020-0307
Performance Data Temperature		
Temperature range [°C]	-10100	-10100
Average heating-up rate according to IEC 60068-3-5 [K/min]	1.3	1.3
Average cooling down time according to IEC 60068-3-5 [K/min]	0.5	0.5

Data Sheet Model KMF 115

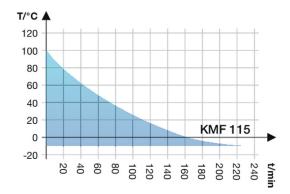
Description	KMF115-230V	KMF115-230V
Article Number	9020-0193	9020-0307
Max. heat compensation at 25 °C [W]	150	150
Performance Data Climate		
Temperature range [°C]	1090	1090
Temperature uniformity depending on setpoint [± K]	0.21	0.21
Temperature fluctuation depending on setpoint [± K]	0.10.3	0.10.3
Humidity range [% RH]	1098	1098
Humidity fluctuation depending on setpoint	≤2,5 ± % RH	≤2,5 ± % RH
Dew point temperature range	590 °C	590 °C
Electrical data		
Rated Voltage [V]	200230	200240
Power frequency [Hz]	50/60	50/60
Nominal power [kW]	2	2
Unit fuse [A]	16	16
Phase (Nominal voltage)	1~	1~
Measures - Outer dimensions		
Width net [mm]	880	880
Height net [mm]	1050	1050
Depth net [mm]	650	650
Wall clearance back [mm]	100	100
Wall clearance sidewise [mm]	100	100
Measures - Doors		
Inner doors	1	1
Unit doors	1	1
Measures - Internal Dimensions		
Width [mm]	600	600
Height [mm]	483	483
Depth [mm]	351	351
Measures		
Interior volume [L]	102	102
Net weight of the unit (empty) [kg]	127	127
Load per rack [kg]	30	30
Environment-specific data		
Energy consumption at 85 °C and 85 % RH	570 Wh/h	570 Wh/h
Sound-pressure level [dB(A)]	52	52

CHARTS

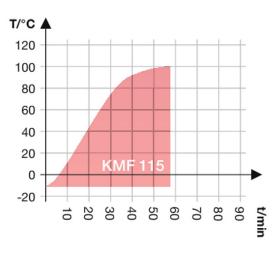


- A: Guaranteed condensation-free range
 B: Time-limited operation (max. 24 hours)
 C: Condensation in the inner chamber may be possible

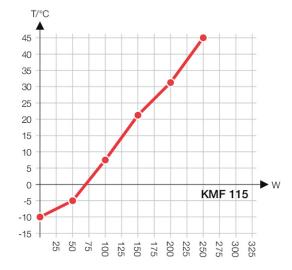
Climate chart



Cooling down rate



Heating up rate



Heat compensation chart

OPTIONS AND ACCESSORIES

So mm, right 20 mm, logh	Designation	Description	*	ArtNo.
Community Comm		30 mm, left	01	8012-0648
So mm. left So mm. left So mm. left So mm. left So mm. risht So mm. r		30 mm, right	01	8012-0647
Somm. right		30 mm, top	01	8012-0649
Seminaria Semi		50 mm, left	01	8012-0653
100 mm, left 100	•	50 mm, right	01	8012-0652
100 mm, top		50 mm, top	01	8012-0650
Some manufacture Some manufa		100 mm, left	01	8012-0515
for temperature (according to DINZERON For Emperature (according to DINZERON FOR Emperature (according to DINZERON FOR Emperature and humidity (actificate, and actificate, accessions allibration certificate, actificate and actificate, and actificate, actificate and actificate, and actificate, and actificate, actificate and actificate, and actificate, and actif		100 mm, right	01	8012-0514
intage output, 4—20 for temperature and humidity values (output not adjustable) AN interpretature and humidity wash additional measurement at additional points or sets of values AN interpretature measurement incl. certificate and 27 measuring points at specified temperature temperature measurement incl. certificate and 27 measuring points at specified temperature temperature measurement incl. certificate, 52 measuring points at specified temperature temperature measurement incl. certificate, 52 measuring points at specified temperature temperature measurement incl. certificate, 52 measuring points at specified temperature for temperature and humidity, measurement incl certificate, 52 measuring points at specified temperature for temperature (according to DINLSR80) and humidity measurement incl. certificate, 52 measuring points at specified temperature measuring points at humidity measurement incl. certificate, 52 measuring points at specified values Ana 1 part (according to DINLSR80) and humidity measurement incl. certificate, 27 temperature measuring points at humidity measurement incl. certificate, 52 measuring points at specified values Ana 1 part (according to DINLSR80) and humidity measurement incl. certificate, 52 measuring points at specified values Ana 1 part (according to DINLSR80) and humidity measurement incl. certificate, 52 measuring points at specified values Ana 1 part (according to DINLSR80) and humidity measurement incl. certificate, 52 measuring points at specified temperature temperature and thumidity measurement incl. certificate, 52 measuring points at specified temperature temperature and thumidity measur		100 mm, top	01	8012-0651
INDICE Pure Aqua system for preparation or complete desalination of tap water, containing single-use cartridge, hoses and measuring device and system for preparation or complete desalination of tap water, containing single-use cartridge, hoses and measuring device accessories and preparation or complete desalination of tap water, containing single-use cartridge, hoses and measuring device accessories single-use, replacement cartridge for BINDER Pure Aqua System for preparation or complete desalination of tap water, containing single-use cartridge, hoses and measuring device accessories and preparative and humidity, each additional measurement at additional points or sets of values and tap the preparative measurement incl. certificate and 27 measuring points at specified temperature and the immidition of the preparative measurement incl. certificate, 15-18 measuring points at specified temperature and the immidition of the preparative measuring points at specified temperature and the immidity measurement incl. certificate, 27 temperature measuring points and the immidity measurement incl. certificate, 27 temperature measuring points and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R Rit or at specified values and the immidity measuring point, at 25 °C, 60 °R	•		-	8012-0705
Service device device - Source 50 so	Analog output, 4 – 20 nA	for temperature and humidity values (output not adjustable)	-	8012-0704
Service, accessories Single-use, replacement cartriage for binUse Pure Aqua System - Collaboration certificate, paragraphic and bumidity, each additional measurement at additional points or sets of values - Collaboration certificate, temperature and humidity, each additional measurement at additional points or sets of values - Collaboration certificate, temperature measurement incl. certificate, sp. 18 measuring points at specified temperature - Collaboration certificate, for temperature and humidity, measurement incl. certificate, sp. 18 measuring points at specified temperature - Collaboration certificate, for temperature and humidity, measurement incl. certificate, sp. 25° Collaboration certificate, and is humidity measurement incl. certificate, 27° temperature and sp. 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points at specified temperature - Collaboration certificate, for temperature and humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity measurement incl. certificate, 27° temperature measuring points, at 25° Collaboration and is humidity, measurement incl. certificate, 27° collaboration and is humidity measurement incl. certificate, 27° collaboration and is humidity, measurement incl. certificate, 27° col	BINDER Pure Aqua Service		-	8012-0759
Emperature and numidity, each additional measurement of additional points of sets of values	BINDER Pure Aqua Service, accessories	Single-use, replacement cartridge for BINDER Pure Aqua System	-	6011-0165
temperature measurement incl. certificate, 15-18 measuring points at specified temperature temperature measurement incl. certificate, 15-18 measuring points at specified temperature temperature and humidity, measurement incl. certificate, 27 temperature measuring points at specified temperature for temperature and humidity, measurement in center of chamber at 25 °C / 60 °R RH or at specified values temperature (according to DIN12880) and humidity measurement incl. certificate, 27 temperature measuring point, at 25 °C / 60 °R RH or at specified values temperature safety with visual alarm (DIN 12880) Tazo: temperature logging from -90 °C to 220 °C Tazo: temperature logging from -90 °C to 220 °C Tazo: temperature logging from -90 °C to 220 °C Tazo: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination This oci temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination This oci temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH LOG ANALYZE software kit, configuration and evaluation software for all BINDER Data Logger Kits (incl. USB data cable) 100 ANALYZE software kit, configuration and evaluation software for all BINDER Data Logger Kits (incl. USB data cable) 110 Color lock 110 Color lock 110 Color lock provided	Calibration certificate, expanded	for temperature and humidity, each additional measurement at additional points or sets of values	-	8012-0155
temperature temperature measurement incl. certificate, 15: 18 measuring points at specified temperature 2 - 8012-092 temperature measurement incl. certificate, 29 measuring points at specified temperature 3 - 8012-093 temperature and humidity, measurement in center of chamber at 25 °C / 60 °R RH or at specified values 2 - 8012-093 temperature and humidity, measuring point, at 25 °C / 60 °R RH or at specified values 3 independent 2 with visual alarm (DIN 12880) and humidity measurement incl. certificate, 27 temperature measuring point 3 - 8012-093 temperature safety with visual alarm (DIN 12880) 3 months of the properature and humidity logging from -90 °C to 220 °C 19 months of the properature and humidity logging from -90 °C to 200 °C 19 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 2 sensor for recording environmental conditions 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 3 sensor for recording environmental conditions 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 3 sensor for recording environmental conditions 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 4 months of the properature and humidity logging from -40 °C to 100 °C and 0 °C to 100 °C RH and additional combination 4 months of the properature and the properature and additional combination 4 months of the properature and additional combination 4 months of the properature and additional combination 4 months of		temperature measurement incl. certificate and 27 measuring points at specified temperature	-	8012-092
temperature measurement incl. certificate, 9 measuring points at specified temperature for temperature and humidity, measurement incl. certificate, 27 femperature measuring points at 25°C / 60 % RH or at specified values chemperature and humidity measurement incl. certificate, 27 temperature measuring points at 125°C / 60 % RH or at specified values chemperature (according to DN123880) and humidity measurement incl. certificate, 27 temperature measuring points at 125°C / 60 % RH or at specified values chemperature safety with visual alarm (DIN 12880) The 1220: temperature logging from -90°C to 220°C The 1220: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH and additional combination The 100: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH and additional combination The 100: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH and additional combination The 100: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH and additional combination The 100: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH and additional combination The 100: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 100: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: temperature and humidity logging from -90°C to 100°C and 0 % to 100 % RH 110: tem	•	temperature measurement incl. certificate, 15- 18 measuring points at specified temperature	_	8012-092
temperature and unidity temperature (according to DIN1288o) and humidity measurement incl. certificate, 27 temperature measuring points and 1 humidity measuring point, at 25 °C / 60 % RH or at specified values and 1 humidity measuring point, at 25 °C / 60 % RH or at specified values temperature safety with visual alarm (DIN 1288o) T 220: temperature logging from -90 °C to 220 °C TH 100/70: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH 100: temperature sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 °K RH 100: temperature sensor for recording environmental conditions TH 100: temperature sensor for recording environmental conditions TH 100: temperature sensor for reco	temperature	temperature measurement incl. certificate, 9 measuring points at specified temperature	-	8012-0917
temperature and tumidity and 1 humidity measuring point, at 25 °C / 60 % RH or at specified values and 1 humidity measuring point, at 25 °C / 60 % RH or at specified values with visual alarm (DIN 12880)	Calibration certificate.	for temperature and humidity, measurement in center of chamber at 25 °C / 60 % RH or at specified values	-	8012-015
with visual alarm (DIN 12880) Para Loger Kit Alar Loger Kit	emperature and		-	8012-092
Thi 100/70: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH and additional combination sensor for recording environmental conditions Thi 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH 19 8012-071 Thi 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH 19 8012-073 Thi 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH 19 8012-073 Thi 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH 10 CANALYZE software kit, configuration and evaluation software for all BINDER Data Logger Kits (incl. USB data cable) 19 8012-082 RS 422 cable set and RS 232 / RS 422 interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model 240 Cachelle controller keyboard with key-operated switch 250 Cachelle controller keyboard with key-operated switch 260 Cachelle controller concentrated, for gentle remove of residual contaminants; 1 kg 271 too temperature concentrated, for gentle remove of residual contaminants; 1 kg 272 Concentrated detergent 273 Concentrated, for gentle remove of residual contaminants; 1 kg 274 too temperature concentrated, for gentle remove of residual contaminants; 1 kg 274 too temperature concentrated, for gentle remove of residual contaminants; 1 kg 275 Cachella Cachella Cachella Cachella Cachella Cachella Cachel	Class 3.3 independent emperature safety device	with visual alarm (DIN 12880)	-	8012-070
sensor for recording environmental conditions TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH 19 8012-071 Alata Logger Kit, boftware LOG ANALYZE software kit, configuration and evaluation software for all BINDER Data Logger Kits (incl. USB data cable) 19 8012-082 RS 422 cable set and RS 232 / RS 422 interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model 240 V, 60 Hz option model 250 V, 50/60 Hz option model 260 V, 50/60 Hz option model 270 V, 60 Hz option mode		T 220: temperature logging from -90 °C to 220 °C	19	8012-0715
Data Logger Kit, ioftware LOG ANALYZE software kit, configuration and evaluation software for all BINDER Data Logger Kits (incl. USB data cable) 19 8012-082 RS 422 cable door handle RS 422 cable set and RS 232 / RS 422 interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model 120 V, 60 Hz option model 230 V, 50/60 Hz option model 250 V, 50/60 Hz option model 260 V, 50/60 Hz option model 270 V, 50/60 Hz option model	Data Logger Kit		19	8012-0719
LOG ANALYZE Software kit, configuration and evaluation software for all BINDER Data Logger Rits (incl. USB data cable) 19 8012-082 Noor lock lockable door handle - 8012-102 RS 422 cable set and RS 232 / RS 422 interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model - 8012-055 RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model - 8012-040 230 V, 50/60 Hz option model - 8012-040 230 V, 50/60 Hz option model - 8012-040 230 V, 50/60 Hz option model - 8012-040 15B / RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Interface converter, losh RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Interface converter, losh RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Interface converter, losh RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Interface converter, losh RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Interface converter, losh RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Interface converter, losh RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to 2 8012-040 RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to 2 8012-040 RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for con		TH 100: temperature and humidity logging from -40 °C to 100 °C and 0 % to 100 % RH	19	8012-0718
RS 422 cable set and RS 232 / RS 422 interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model 230 V, 15 W option model 240 V, 15 W option model 250 V, 15 W option model 260 V, 15 W option model 270 V, 15 W opti	Oata Logger Kit, software	LOG ANALYZE software kit, configuration and evaluation software for all BINDER Data Logger Kits (incl. USB data cable)	19	8012-082
a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model 240 V, 50/60 Hz option model 250 V, 50/60 Hz option model 260 V, 50/60 Hz option model 270 V, 50/60 Hz option model 2	Door lock	lockable door handle	-	8012-102
nterface converter RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model 230 V, 50/60 Hz option model RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) Rockable controller Lockable controller keyboard with key-operated switch Lockable controller keyboard with key-operated switch Lockable controller keyboard with magnetic strip concentrated, for gentle remove of residual contaminants; 1 kg additional Pt 100, with flexible cable installed with external connection, incl. 6-pin DIN socket - 8012-063		· · · · · · · · · · · · · · · · · · ·		
RS 422 cable set and RS 422 / Ethernet interface converter for connection to 10-way plug distributor or for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) 15B / RS422 10SB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) 10Ckable controller 10Ckable co		120 V, 60 Hz option model	-	8012-055
RS 422 cable set and RS 422 / Ethernet interface converter for connection to a unit 120 V, 60 Hz option model 230 V, 50/60 Hz option model		230 V, 50/60 Hz option model	_	8012-0550
nterface converter, JSB / RS422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) - 8012-066 uniterior lighting 230 V, 15 W option model	Interface converter	· · · · · · · · · · · · · · · · · · ·		
RS 422 cable set and RS 422 / USB interface converter for connection to 10-way plug distributor or for connection to a unit (USB-powered converter) 18012-066		120 V, 60 Hz option model	_	8012-040
unit (USB-powered converter) 230 V, 15 W option model 240 Cachable controller keyboard with key-operated switch 250 Cachable		230 V, 50/60 Hz option model	-	8012-038
Lockable controller keyboard with key-operated switch - 8012-060 Magnetic Pouch (A4) insert pouch with magnetic strip - 1007-006 OH-neutral detergent concentrated, for gentle remove of residual contaminants; 1 kg - 1002-001 Pt 100 temperature additional Pt 100, with flexible cable installed with external connection, incl. 6-pin DIN socket - 8012-063		, , , , , , , , , , , , , , , , , , ,	_	8012-066
Lockable controller keyboard with key-operated switch - 8012-060 Magnetic Pouch (A4) insert pouch with magnetic strip - 1007-006 OH-neutral detergent concentrated, for gentle remove of residual contaminants; 1 kg - 1002-001 Pt 100 temperature additional Pt 100, with flexible cable installed with external connection, incl. 6-pin DIN socket - 8012-063	nterior lighting	230 V, 15 W option model	02	8012-0116
concentrated, for gentle remove of residual contaminants; 1 kg - 1002-001 Pt 100 temperature sensor additional Pt 100, with flexible cable installed with external connection, incl. 6-pin DIN socket - 8012-063	ockable controller	Lockable controller keyboard with key-operated switch	-	8012-060
Pt 100 temperature additional Pt 100, with flexible cable installed with external connection, incl. 6-pin DIN socket – 8012-063	Magnetic Pouch (A4)	insert pouch with magnetic strip	_	1007-006
sensor additional Pt 100, with flexible cable installed with external connection, Incl. 6-pin DIN Socket – 8012-063	oH-neutral detergent	concentrated, for gentle remove of residual contaminants; 1 kg	-	1002-0010
	Pt 100 temperature sensor		-	8012-063
		stainless steel	_	600/-011

^{*} Notes > See last page

Designation	Description	*	ArtNo.
Rack, accessories	set of 4 fasteners for additional security	-	8012-0620
Rack, reinforced	stainless steel, with 1 set of 4 fasteners, max. load 70 kg	-	8012-0700
RS 422 interface	in place of Ethernet, for communication software	-	8012-0641
	modular plug distributor for 10 RS 422 interfaces	-	8012-0295
RS 422 interface, cable (15 m)	RS 422 connection cable (15 m) between plug distributor and RS 422 interface	-	5023-0036
RS 422 interface, cable (50 m)	RS 422 extension cable (50 m) between interface converter and unit or RS 232 / RS 422 plug distributor	-	5023-0117
Shelf, perforated	stainless steel	-	6004-0115
Software	APT-COM™ communications software		
	version 2 to 3, GLP edition	19	9053-0016
	version 3, BASIC edition	19	9053-0014
	version 3, GLP edition	19	9053-0015
	version 3, STANDARD edition	19	9053-0013
	APT-COM™ communications software, price: for free		
	version 3, GLP DEMO Edition	19	9053-0008
Water supply set	external, consisting of fresh- and waste-water containers (20 liters each), cabling and pump	_	8012-0643

^{*} Notes > See last page

SERVICES

Designation	Description	*	ArtNo.
Installation services			
Installation	and set up of unit at operating location, connect to existing connections	13, 18	DL100300
Instruction	unit function instructions for operation and programming of the controller	18	DL100700
Preventive maintenance			
Preventive maintenance	Execution of equipment inspection according to maintenance plan	14, 18	DL200400
Calibration services			
Calibration temperature and humidity	including certificate, one measuring point in center of chamber at 25 $^{\circ}\text{C}$ / 60 $\%$ RH or at specified values	14, 16, 17, 18	DL300301
Temperature and humidity measurement according to DIN12880	including certificate (27 temperature measuring points and 1 humidity measuring point, at 25 °C $/$ 60 % RH or at specified values)	14, 16, 17, 18	DL300427
Temperature measurement 18 temperature measuring points and 1 humidity measuring point	including certificate, 18 temperature measuring points and 1 humidity measuring point in center of chamber, at 25 $^{\circ}$ C / 60 $^{\circ}$ RH or at specified values	14, 16, 17, 18	DL300318
Temperature measurement 27 temperature measuring points and 1 humidity measuring point	including certificate, 27 temperature measuring points and 1 humidity measuring point in center of chamber, at 25 °C / 60 % RH or at specified values	14, 16, 17, 18	DL300327
Temperature measurement 9 temperature measuring points and 1 humidity measuring point	including certificate, 9 temperature measuring points and 1 humidity measuring point in center of chamber, at 25 °C / 60 % RH or at specified values	14, 16, 17, 18	DL300309
Validation services			
Execution of IQ/OQ	in accordance with qualification folder	15, 18, 20	DL420300
Execution of IQ/OQ/PQ	in accordance with customer's requirement, price: on request	15, 18	DL440500
Qualification folder IQ/OQ	supporting documents for validation performed by customer, consisting of: IQ/OQ checklists, unit schematics, QM certificate in accordance with ISO 9001	15, 18, 20	8012-0879
Qualification folder IQ/OQ/PQ	supporting documents for validation performed by customer, in accordance with customer's requirement, extension of Qualification folder IQ/OQ by chapter PQ	15, 18	8012-0966
Warranty service			
Extension of the warranty from 2 to 3 years	beginning with the date of delivery, wearing parts are not included	_	DL024041
Extension of the warranty from 2 to 5 years	beginning with the date of delivery, wearing parts are not included	-	DL024042

^{*} Notes > See last page

NOTES

- Condensation may occur in the area around the access port. Access ports may be placed in custom locations for an additional charge.
- UL mark is not granted when this option is used.
- Heat resistant only to max. 200 °C. 03
- Only available on units rated for 230 V. 04
- Attention: The pump is delivered separately. The electric connection for the pump (230 V/1~/50 Hz) must be carried out by an authorized electrician. 05
- Heating-up time may increase as a result of the lower heat conductivity.
- The additional heat input may affect the temperature behavior.
- 08
- The pump (packaged separately) is ready for connection.

 Not in conjunction with the optional access port, door with window and interior lighting. 09
- Not available on 23-liter units. 10
- Not available on 23- or 53-liter units. 11
- 12 Only available on units rated for 230 V or 400 V.
- Installation and connections take place at unit location; transport within the company only upon consultation.
- We recommend a BINDER service contract (see the chapter on BINDER Service) to cover unit inspections, calibrations and validations.
- OQ according to Yellow Paper = completed factory validation documentation of all OQ checklists. Sensor calibration is performed in an accredited calibration laboratory. 15
- 16
- Calibration is performed according to the BINDER factory standard. 17
- 18 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).
- For additional accessories, refer to the Process documentation chapter.
- When ordering IQ/OQ qualification folders and associated IQ/OQ execution on one order, we offer a 15 % discount for both items.

 When ordering IQ/OQ/PQ qualification folders and associated IQ/OQ/PQ execution on one order, we offer a 15 % discount for the item of the IQ/OQ/PQ folder.
- ATEX conformity: 21

Pumping chamber (pumped gases): Il 2G IIC T3 X Environment with inert purge gas: II 2G IIB T4 X Environment without inert purge gas: II 3G IIB T4 X

Motor: II 2G Ex d IIB T4 Gb

BINDER GmbH

Tuttlingen, Germany TEL +49 7462 2005 0 FAX +49 7462 2005 100 info@binder-world.com www.binder-world.com

BINDER Asia Pacific (Hong Kong) Ltd.

Kowloon, Hong Kong, P.R. China TEL +852 39070500 FAX +852 39070507 asia@binder-world.com www.binder-world.com

BINDER Environmental Testing Equipment (Shanghai) Co., Ltd.

Shanghai, P.R. China TEL +86 21 685 808 25 FAX +86 21 685 808 29 china@binder-world.com www.binder-world.com

Representative Office for CIS

Moscow, Russia TEL +7 495 988 15 16 FAX +7 495 988 15 17 russia@binder-world.com www.binder-world.ru

BINDER Inc.

Bohemia, NY, USA TEL +1 631 224 4340 FAX +1 631 224 4354 usa@binder-world.com www.binder-world.us