

Desiccant dehumidifier TTR 12000



Standard equipment

- Housing made of powder-coated, galvanized sheet steel
- Integrated G4 air filters as Z-line filters, separately for process and regeneration air
- Filter monitoring with warning light
- Rotor rotation control
- 24 V DC control voltage
- Potential-free signal contacts for maintenance / filter change, fault, operation ON / OFF
- Terminals for hygrostat, 24 V DC
- Terminals for external switch-on/off, 24 V DC
- Directly driven high-performance EC fans with manual speed adjustment integrated in the housing (no additional throttle valves required), separately for process and regeneration air
- Flowmatic S, separate electronic fan speed control for process and regeneration air, controlled to a constant volumetric flow or pressure depending on the process-related target value, control signal 0...10 V or 4–20 mA
- Silica gel sorption rotor with internal purging sector for heat recovery and automatically adjusting rotor seal kit
- Rotor drive system with brushless, variable-speed gear motor, toothed belt, toothed belt pulley and belt tensioner
- Electric regeneration air heater comprising tubular heating elements, equipped with safety temperature limiters and differential pressure switch, controlled via semi-conductor relay(s)
- Millenium microprocessor control with four-line plain text display
 - Error messages in plain text
 - Energy management (temperature-dependent regeneration air heater control)
 - Humidity regulation dry air (only in combination with optional moisture measuring device and signal transducer kit 4–20 mA / 0–10 V)
 - Temperature regulation dry air (only with optional temperature probe and downstream air conditioning)
- Temperature-controlled rundown period
- Integrated control cabinet with all the equipment and supplies required for operation complying with the TROTEC standard: emergency stop main switch, selection switch for remote / on-site operation, indicator lights, buttons, switching devices, fuses, wiring and terminals
- Housing prepared for mirror-inverted assembly; air direction reversal; standard process air flow direction from left to right

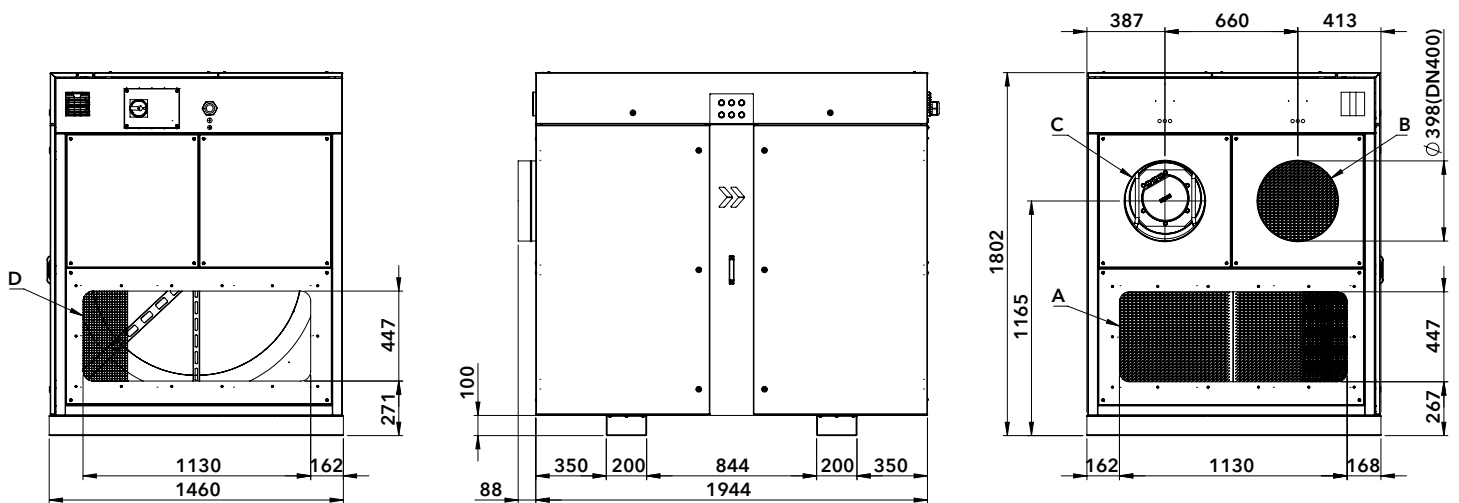
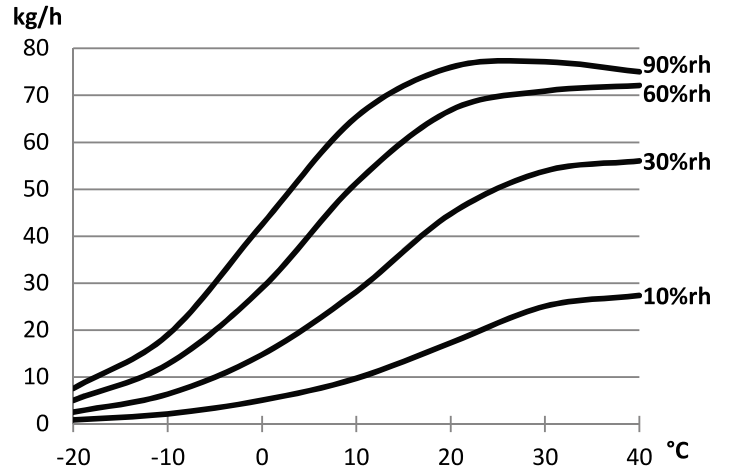
Additional equipment option

- Steam heater for regeneration air (saturated steam $P > 3$ barg)
- Additional electrical heating for dry air
- Integrated heat exchanger (cold/warm water) for dry air temperature control
- Boosted or additional fan for higher compression of dry air
- Protection and transport frame, stackable
- Castors for transport frame
- Wheels
- Housing components as stainless steel version
- Hygienic equipment (fans and rotor with hygienic design)
- Weather protection equipment
- Humidity / temperature control (signal transducer kit 4–20 mA / 0–10 V, parameterization)
- Electronic hygrostat HG125 with two-line LC display
- Dew point sensor (-100 - +20 °Cdp / signal 4–20 mA)
- Mirror-inverted module assembly – for reversed air flow direction
- PWIS-free model
- PT 100 temperature probe

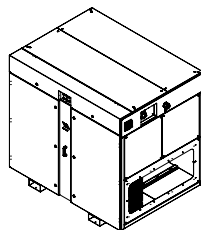
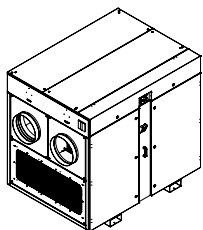
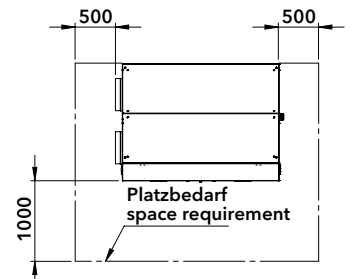
Desiccant dehumidifier TTR 12000

General technical data (at 20 °C / 60% rh, 1013 mbar)

Dehumidification		66.5 kg/h
Dry air	Air volume free-blowing	12500 m³/h
	Air volume nominal	11800 m³/h
	Compression	300 Pa
Regeneration air	Air volume	2380 m³/h
	Compression	300 Pa
Heating		81 kW
Power input		89 kW
Voltage		3/PE/380 - 480 V/50 - 60 Hz
Max. current consumption (@ 3 x 400 V)		129 A
Recommended fusing		160 A
Weight		1000 kg
Dimensions (L x W x H)		2032 mm x 1460 mm x 1802 mm



- A) Prozessluft-Eintritt
processair inlet
- B) Regenerationsluft-Eintritt
regen.-air inlet
- C) Feuchtluft-Austritt
wetair outlet
- D) Trockenluft-Austritt
dryair outlet



Subject to change without notice. All performance data refer to 1013 mbar, a density of 1.2 kg/m³ and a power supply with 3x400 V/50Hz +PE or 230V/50 Hz. For your project design we recommend to consider a safety discount of 10-20 % for the dehumidification performance depending on the application.