

# SPECIFICATIONS

SPECIFICATIONS	10680GR-US	10681GR-US	FEATURES	DD900+
Height (inch)	58	58	PLC Control	✓
Width (inch)	29	29	Manual / Automatic Mode Selection	✓
Depth (inch)	24.5	24.5	Remote Humidity Sensor Facility	✓
Weight (lbs)	198	198	Easy Access / Inboard Air Filters	✓
Voltage (V)	220	460	Filter Monitoring	✓
Current (A)	26	13	Belt Tension Monitoring	✓
Phase	3	3	High Temperature Safety Cut-outs	✓
Frequency (Hz)	60	60	EC High Efficiency Fans	✓
Power (kW)	9.8	9.8	Variable Fan Speeds	✓
Process Airflow Maximum – Dry Air (cfm)	883	883	High Capacity PTC Heaters	✓
Process Airflow Nominal – Dry Air (cfm)	530	530	Compatible with Post Cooler Module	✓
Regen Airflow Nominal – Wet Air (cfm)	147	147	Compatible with Pre Heat Module	✓
Process Air Outlet Dia (inch)	8	8	Inlet / Outlet on the same face	✓
Regen Air Outlet Dia (inch)	6	6	Free Standing	✓
Rotor Wheel Speed (rph)	13.6	13.6	Self Contained	✓
Rotor Size dia X depth (inch)	17.7 X 3.9	17.7 X 3.9	Stainless Steel Construction	○
High Extraction Setting @ 27°C 60% (ppd)	364	364	Inlet Duct Attachments	✓
High Efficiency Setting @ 27°C 60% (ppd)	286	286		
Deep Drying Settings @ 27°C 60% (ppd)	323	323		
Typical Dry Air Off – High Extraction Setting (%)	12	12		
Typical Dry Air Off – High Efficiency Setting (%)	14	14		
Typical Dry Air Off – Deep Drying Settings (%)	6	6		
Min Operating Temperature (°F)	-4	-4		
Max Operating Temperature (°F)	104	104		

## APPLICATION

Dehumidifiers are required wherever there is a need to lower the humidity level to prevent corrosion, mold growth and condensation or maintain a low humidity condition during manufacture, packaging or storing of hygroscopic products.

## METHODS OF DEHUMIDIFICATION

Dehumidification is possible using two possible principles, Condensation with refrigeration style dehumidifiers and Adsorption with desiccant dehumidifiers. Desiccant dehumidifiers perform exceptionally well when used in cooler climates, or when a low dew-point, deep drying or low humidity levels are required. Since desiccant dehumidifiers do not produce water, they will work effectively down to sub zero temperatures.

Their operation is simplistic yet extremely effective and reliable. Air (Process Air) is drawn into the dehumidifier, where it passes over a wheel impregnated with Silica Gel. As the air passes over this wheel, any moisture present in the air is absorbed into the Silica Gel wheel before leaving the dehumidifier as warm dry air.

The Silica Gel wheel is continually, slowly rotating, typically at three revolutions per hour. As the wheel rotates, a small portion passes through the regeneration segment. During this phase a second air stream (Regeneration Air) is heated to a high temperature before passing over the wheel. Any moisture present in the wheel is released into this air stream; this hot wet air is then exhausted outside the area being dried.

## KEY DESIGN FEATURES

- PLC Control
- Compatible with Post Cooler and Pre Heat Modules
- Infinitely Variable EC Fan Speed



DD900+ DESICCANT DEHUMIDIFIER



PHARMACEUTICAL, CONFECTIONARY, DEFENSE INDUSTRY,  
WATER DAMAGE, COLD STORES, POWER STATIONS, PLASTICS

# HOW A DEHUMIDIFIER WORKS

Process air is drawn into the dehumidifier.

Process air passes over a wheel impregnated with silica gel.

The silica gel absorbs the moisture from the air.

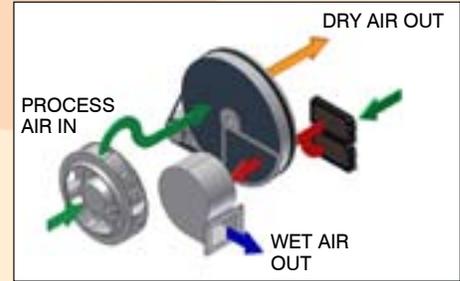
Process air leaves the dehumidifier as warm dry air.

The silica gel wheel continually rotates.

Regeneration air is heated to a high temperature and passed over a segment of the wheel.

Silica gel releases the moisture from the wheel into the regeneration air.

Regeneration air leaves the dehumidifier as warm wet air and exhausted outside.



Applications	DD900+
Offices	✓
Shops	✓
Restaurants	✓
Warehouses	✓
Basements	✓
Factories	✓
De-Flooding	✓
Pharmaceutical	✓
Defense Industry	✓
Confectionary	✓

Applications	DD900+
Laboratories	✓
Medical	✓
Food Industry	✓
Agriculture	✓
Cold Stores	✓
Hospitals	✓
Hotels	✓
Stadiums	✓
Ships	✓

## WHY CHOOSE EIPL

EIPL is Europe's leading manufacturer of dehumidifiers and is a name you can rely on. No matter how extreme the conditions EIPL's efficiency copes comfortably even at the coldest temperatures.

### DD900+

The DD900+ is an extension to the standard DD900 range, The "+" versions offers the user a totally PLC based control system, filter cleanliness monitoring and belt tension monitoring, and also the ability to interface to the EIPL energy saving, Pre Heat and Post Cool modules. The DD Range incorporates high capacity PTC heaters, ensuring maximum drying is immediately reached and constantly maintained while the unit is running. The DD900+ incorporates two EC fans with variable speed allowing the unit to be easily installed, and commissioned in a wide variety of installations. Temperature control via the PLC, allows the user to select the desired drying level ie, high efficiency drying, deep drying, or high extraction, the following table provides an example of settings and capacities.

## RUGGED CONSTRUCTION & YEARS OF SERVICE

Over thirty seven years of development experience means you can rely on the proven track record of the EIP range of dehumidifiers. Every dehumidifier is designed for efficiency and ruggedness, and built to last. The popularity of EIP Ltd's dehumidifiers with the plant hire trade speaks for their reliability, portability and outstanding durability.



80°F 60% - Example Settings			
	High Extraction	High Efficiency	Deep Drying
Process Airflow (cfm)	647	530	412
Regen Airflow (cfm)	206	147	206
Regen Temperature Rise (°F)	230°F	194°F	230°F
	(110°C)	(90°C)	(110°C)
Extraction (ppd)	364	286	323
Dry Air Off (%)	12	14	6

Facility for an external humidistat allows remote control of the drying cycle All models incorporate a high efficiency patented PPS Rotor.

This design incorporates an 82% active Silica Gel to ensure optimum performance over the equipments wide operating range of environments.