

# HB HEATED BLOWER DESICCANT AIR DRYER

## HB150 – HB8000

Industrial Technologies  
Davidson, NC 28036

Date: 23-Feb-2012  
Cancels: All Previous

### INSTRUMENTATION, OPTIONS AND ACCESSORIES

#### INSTRUMENTATION

The following instrumentation helps in monitoring dryer operation and performance. Instruments which are available with exercised options are also noted.

#### Dryer ON/OFF Light

The power ON light on the control panel indicates when the dryer is turned on and operating.

#### ALARM Light

The ALARM light simply provides a clearly visible indication that the dryer has registered an alarm. The nature of the alarm is displayed on the operator monitor.

#### Vessel Pressure and Temperature Gauges

Panel mounted vessel pressure and chamber mounted temperature gauges indicate which vessel is drying the air flow and which is regenerating.

#### Purge Pressure Gauge (Heatless Mode Only)

A panel-mounted pressure gauge indicates purge flow in the regeneration vessel.

#### Adjustable Purge Flow Valve (Heatless Mode only)

An Adjustable purge flow valve is provided for all models for reduced inlet flows.

#### Filters

All HB dryers will have a high efficiency coalescing prefilter and a dust particulate afterfilter.

HB150 – HB1500 will have the filters mounted on dryer package. HB1800 – HB8000 will have filters supplied and shipped loose for field mounting.

#### Dual Mode Operation

The dryer can be operated as a heatless dryer in the unlikely event of a blower or heater failure.

#### Electrical Enclosure

NEMA 4 supplied as standard  
NEMA 4 is also supplied with the EMS option.

#### Controls

A PLC controller with integrated keypad interface provides instant access to dryer performance controls. The controller is specifically programmed to execute all valve switching functions as well as monitor dryer operation. The controller includes the following:

- Backlit LCD Display
- Human-Machine Interface (HMI)
- Modbus Compatible
- Remote Alarm Contact
- Failure Code Storage
- Dryer Schematic Display
- Dryer On Light
- Dryer Alarm Light
- Left/Right Tower Drying Light
- Left/Right Tower Regeneration Light
- Heater On Light
- Blower On Light

#### Switch-Failure Alarm

Pressure sensors located on each vessel trigger a visible alarm if a vessel does not depressurize or repressurize properly.

#### High Heater Temperature Alarm

Shuts the heater off if temperatures exceed the set point.

#### Heater Failure Alarm

Indicates heater malfunction.

#### Energy Management System (EMS)

See separate sheet on optional EMS.

#### Dew Point Monitor (Provided with EMS option)

Factory mounted, this device digitally displays dew point in degrees F.

#### 4-20 mA PDP Output Signal (Optional – Requires EMS)

4-20 mA analog signal for remote monitoring of dewpoint.

#### High-Humidity Alarm (Provided with EMS option)

The sensor triggers a visible alarm if the dew point of the outlet air exceeds the factory setting.

#### Remote Contacts

Two usable dry (voltage free) contacts to allow for hookup of remote audible or visible system malfunction alarms. A normally open and normally closed set of contacts rated for 10 amps and 120V are provided. Contacts change state with dryer power on.

#### High Pressure (Optional)

For applications above 150 psig contact Ingersoll Rand at Davidson, NC..

#### 3 Valve Bypass (Optional)

A three-valve bypass arrangement around the entire dryer package is provided as an option.