



Climate by Design
INTERNATIONAL

DH Dehumidification Series



Keep it Dry with CDI

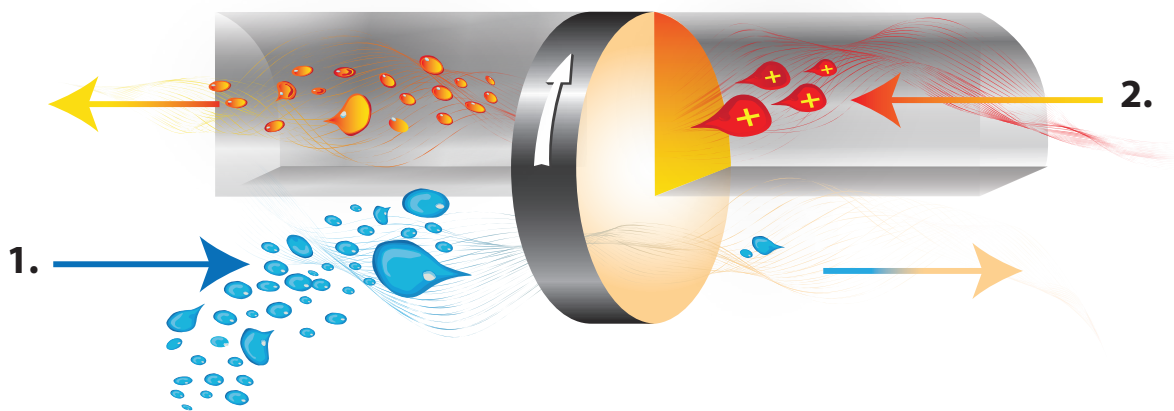
Keep it Dry with CDI

Why Use Desiccant Technology?

- Very dry air can be achieved (-0°F dewpoint).
- **Thermodynamic efficiency:** Achieved because no change of phase (condensation) is necessary.
- **Better construction:** Double-wall insulated casing suitable for indoor or outdoor mounting.
- **Simple maintenance:** Simply replace filters regularly and performance is assured. A yearly inspection by our service technicians is recommended to head off unscheduled outages.

Desiccant Technology

Creating the climate you need to achieve your critical mission



Dedicated desiccant air-supply units provide low-humidity conditions necessary to maintain a dry environment. It's a simple solution to an old problem.

The solid desiccant rotor adsorbs moisture from process air [1]. The moisture is taken out of the rotor by a second and separate reactivating airstream [2]. This process enables the rotor to continually take moisture out of the airstream without interruption.



DH Dehumidification Series

- **More Sizes:** Process air flow range of 1,500 to 18,000 SCFM.
- **More Support:** Application engineering assistance, start-up and owner training, and preventative maintenance programs offered by CDI.



Configurable Components *Match Your Critical Process*

Typical Components:

- Process and reactivation MERV 8 filters.
- Direct gas fired, steam, hot water, or electric reactivation.
- Heat Recovery.
- 2" double wall insulated casings.
- Standard intelligent microprocessor controllers with "Fail Capable" mode and full building integration capable of using BACnet™, Modbus®, or LonWorks®.

Desiccant Technology at Work

DH Dehumidification Series

Uncontrolled humidity does not need to be a problem. By providing dry air, you can control threats to health, safety, product and a myriad of costs. Dry air is a solution to corrosion, bacteria, and mold.

By using a CDI DH Dehumidification Series Unit, you can have independent control of humidity and temperature. Now you can be as dry as you want at whatever temperature you want.

Ice Arenas



- Controls humidity to stop fog, mold growth, and dripping ceilings.
- Skaters appreciate improved ice conditions and spectators are more comfortable.
- Minimizes the cost of running rink refrigeration systems while eliminating humidity concerns.
- Most efficient and economical solution to ice arena humidity.
- Resurfacing is needed less frequently.
- Low dewpoint capability provides the best method to dehumidify indoor ice arenas for hockey, figure skating, speed skating and curling.

Water Treatment Plants



- Controls humidity of air surrounding cold pipes, eliminating condensation to prevent rust, mold, mildew, and poor reliability of electronic devices.
- Actively reduces the space dew point to prevent sweating.
- Prevent room humidity from exceeding a set value with CDI's proprietary microprocessor, virtually eliminating corrosion.

Museums, Libraries & Archival Storage



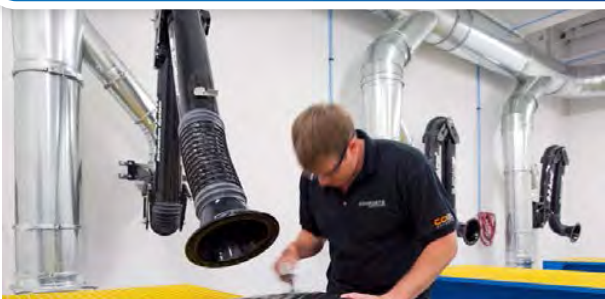
- Preserve artifacts, books, collections, and artwork.
- Keep relative humidity level low and stable.
- Prevent decay from mold.

Industrial Manufacturing



- Eliminate condensation which results in a higher quality part, reduce the cycle time, allowing parts to be produced faster.
- Stabilize manufacturing consistency.
- Applications include industrial painting booths, glass laminating, electronics, and plastic injection blow molding.

Other Applications:



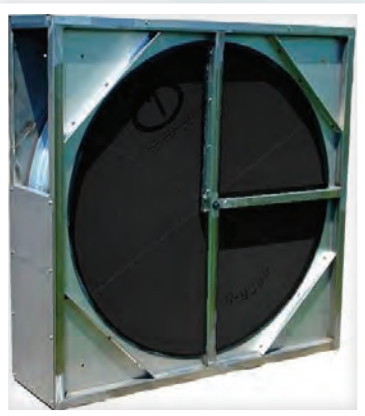
- Bulk Product Handling
- Clean Rooms
- Commercial Buildings
- Grocery Stores
- Hygroscopic Materials Manufacturing
- Pharmaceutical
- Pneumatic Conveying
- Spiral Freezers
- Silo Blanketing
- Suspension Bridge Corrosion Prevention

Why Buy CDI?

Desiccant Rotor System Built to Last

Stabilized silica gel permanently bonded to low specific-heat substrate for long-lasting dehumidification performance at maximum efficiency.

- Industry leading 7 year prorated rotor and cassette warranty.
- Desiccant cassette is stainless steel.
- Washable desiccant rotor.
- Desiccant Rotor Seals: dual-contact, Viton.
- Seals designed to last the life of the unit.
- Full-perimeter sprocket with a #40 Molly Chain drives desiccant rotor.



Quality Construction

Standard unit construction is G-90 galvanized steel, double wall, and insulated.

Doors

- Easy open quarter turn latch doors, not bolted panels.
- Single point latch for tall doors for easy opening.
- Door holder restraint to hold electrical and gas doors open.
- Thermal break doors.
- Roller latches.



ETL Certification

- Complete unit is ETL listed and approved.
- ETL-C listings are provided for Canada.
- CE approvals.





Circuitry Designed for Ease and Safety



Combination circuit breaker/overload starters for fan motors - eliminates the need for spare power fuses and saves downtime. If an upset occurs, a simple reset will bring the unit back online.

- Wiring to industrial terminal strips makes for easier connection and troubleshooting.
- All doors are equipped with locking handles; keyed access prevents unauthorized entry.

Microprocessor Safeguards



- Microprocessor standard controller for temperature, humidity, flow control, and safeguard functions.
- Terminal strip connection points for alarming, monitoring, and building management system communications.



- Optional, remotely located, user interface panel is available when increased accessibility is important.

Blowers



- Airfoil, non-overloading rated for total static pressure.
- Direct drive fans to eliminate belts and external bearings wherever possible.
- Piezometer Ring to measure flow.

User Interface

- An excellent tool for start-up, troubleshooting, and monitoring unit operation.
- Easy access to unit set points.
- Provides quick assessment of unit status and conditions.





Configurability

Quality

Service

[illegible]