



# SENTINEL SLGR



## 1400X

Commercial  
Dehumidifier

SLGR Black Box



Patent Pending

- 1.SLGR Microchannel Technology for Ultra Efficiency
- 2.Epoxy Powder Coating for Corrosion Protection
- 3.Quick Access for Easy Maintenance
- 4.High Capacity with Low Power Consumption
- 5.Digital Control
- 6.Built-In Condensate Pump
- 7.Quick Connector for Drain Tube&Cable



The **Sentinel SLGR 1400X** takes in humid air, then uses advanced *SLGR Microchannel technology* to remove the moisture, and send dry air into another room via ducting. The 1400X is equipped with a built in condensate pump and drain tube so it drains automatically without the need to empty a water tank.

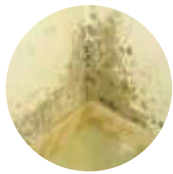


The **Sentinel SLGR 1400X** has a powerful, stainless steel, professional look... Large 8" recessed wheels, hemmed metal edges, and chamfered corners. Its hinged lid swings open for easy filter change. If you are a restoration professional serious about drying, you need an equally serious professional dehumidifier.

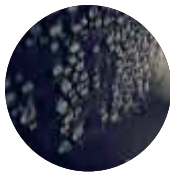
## ► Pest Infestation & Allergen

Damp environment attract spets salot. Pests like termites, ants, and cock roach can live at a house corner or in carpets undetected for a long time live do nrotting wood. Those pest infestations bring you annoying health problems and struct ural damage.

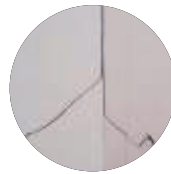
While the most serious allergen is from the fece sof the dust mite. It can survive by absorbing moistin the environment with more than 50% relative humidity level. After Sentinel SLGR 1400X installed, humidity level would be controlled under 50% undoubt edly to wipe outpestand allergen.



MUSTY



DAMP



CRACKS



## ► Mold

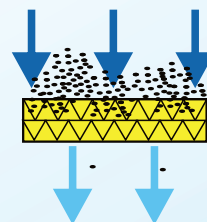
When the relative humidity level is 60% or higher, some places become a breeding ground for mold, mildew, fungi, allergen, and dust mites. Mold and mildew are types of fungi that grow in damp environments. Once mold appears, it grows into colonies and releases millions of spores to the air.

At this point, the space will begin to smell musty and unpleasant. More importantly, mold can lead to illnesses, such as asthma and skin irritations. With the help of a Sentinel SLGR 1400X, you can keep the humidity level under 60% and reduce the risk of mold growth.

## THE SOLUTION

The **Sentinel SLGR1400X** dehumidifier, with innovative SLGR Microchannel **technology is capable of handling excess moisture in damp, cool basements.**

The 1400X has expanded moisture removal capacity that makes it perfect for keeping basements dry and air circulated all year round! It also includes an advanced filtration system with a MERV-10 filter that is able to capture extremely small particles, down to 0.3 microns.



MERV-10 Filter



### Cold catalyst.

The cold catalyst is also known as a natural catalyst. According to the principle of absorption, a Cold catalyst at room temperature can formaldehyde decomposition and absorption. This principle is applied in the decomposition of formaldehyde and other toxic gases in the air into non-toxic carbon dioxide (CO<sub>2</sub>) and water (H<sub>2</sub>O). This clears odors and purifies the in-door air making it healthy and comfortable to breathe.

#### Product features:

1. Natural catalyst/Cold catalyst-for the catalytic decomposition of Cold catalyst, there should be no UV, high pressure, and high temperatures. This conditions can easily be attained indoor especially in the basement or crawl space to control air pollution in these spaces.
2. The Cold catalyst can also clear harmful gases like TVOC, Ammonia, hydrogen sulfide, benzene and other harmful gases. The Cold catalyst reacts with these gases to produce carbon dioxide and water.
3. **Long-term effects:** better indoor air quality, less mold growth, less respiratory illness and the Cold catalyst validity period is 5 years, under the condition that no external force damage.
4. Comfort indoor atmosphere - Cold catalyst under normal indoor temperatures and conditions, remove harmful gases such as benzene, xylene, toluene, TVOC and formaldehyde (Which cause odors in the house). Once Cold catalyst reacts with these gases, the reaction produces water, and carbon dioxide only with cause secondary pollution.

Cold catalyst





# Sentinel SLGR 1400X Dehumidifier

## Specifications

| Features                       | Sentinel SLGR 1400X |
|--------------------------------|---------------------|
| CE, ETL                        | ✓                   |
| Digital Control                | ✓                   |
| Condensate Pump                | ✓                   |
| Compressor Type                | Rotary              |
| Cold Catalyst                  | ✓                   |
| Ducting options                | ✓                   |
| Overflow Protection            | ✓                   |
| Environ.Friendly R410A Refrig. | ✓                   |
| Auto Humidistat                | ✓                   |
| Auto Restart                   | ✓                   |
| Washable Air Filter            | ✓                   |
| Portable Large 8" Wheel        | ✓                   |
| Stainless Housing              | ✓                   |
| Cable/Hose Wrap                | ✓                   |
| Low Temperature                | ✓                   |
| Quick connection to Cable/Hose | ✓                   |
| Remote Controller              | ✓                   |

| Specifications                 | Sentinel SLGR 1400X                       |
|--------------------------------|---|
| Power                          | 115V/60Hz                                 |
| SLGR (More effective than LGR) | Low Humidity & High Temp.                 |
| Size For                       | Up to 3,800 Sq.FT                         |
| Filter                         | MERV-10, MERV-1                           |
| Air flow                       | 440CFM, 680CMH                            |
| Sound Pressure Level           | <60 DBA                                   |
| Refrigerant                    | R410A                                     |
| Wheels                         | Large 8" Wheel                            |
| Draining                       | Condensate Pump                           |
| Functioning Temperature Range  | 33.8-110° F                               |
| Functioning Humidity Range     | 36-90%                                    |
| Capacity (80 °F-60%)           | 140 Pints                                 |
| COP                            | 2.75 L/kWh                                |
| Weight                         | 114.6 lbs                                 |
| Dim (L×H×D)                    | 33.9" L×19.3" H×18.1" W                   |
| Loading quantity               | 20": 80 Sets;40": 96 Sets; 40"HQ: 96 Sets |

## Application

Removing 140 PPD at AHAM conditions, the Sentinel SLGR 1400X is our newest Stainless Series SLGR dehumidifier. The 1400X features a low noise level (less than 60dba), great COP 2.75 L/kWh and a huge capacity 140 Pints/Day at 80°F-60% condition). In addition, it is cETL certified. The Sentinel SLGR 1400X dehumidifier is stand-alone configuration with a super powerful fan that makes it an ideal solution for commercial. There are no conventional dehumidifiers that can perform as efficiently and effectively in commercial, as the Sentinel SLGR 1400X.

## PROVEN PERFORMANCE

The **Sentinel SLGR 1400X** dehumidifier has two stages of filtration for capturing mold spores, debris, dust, pet dander, pollen, allergens, and more. The first stage of filtration is a pre filter that filters larger size debris and dust particles. Next, there is a MERV-10 filter that handles smaller sized particles .

In cold, humid places, it can be tough to remove moisture completely. In these situations, you need a dehumidifier that has a powerful fan to keep dry air circulating at all times. The **Sentinel SLGR 1400X** can circulate 440 CFM of air. This makes it capable of maintaining areas up to 3,800 sq. ft

The **Sentinel SLGR 1400X** dehumidifier has a large contact surface on the cooling coils , which means it can quickly cool down hot air, in addition to handling a higher air volume. The unit is also equipped with a automatic digital control system for easy set up and accurate operation.



Handle



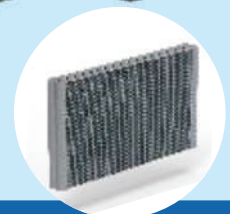
Condensate Pump



Cold Catalyst



Big Wheel



Microchannel cold air heat exchanger

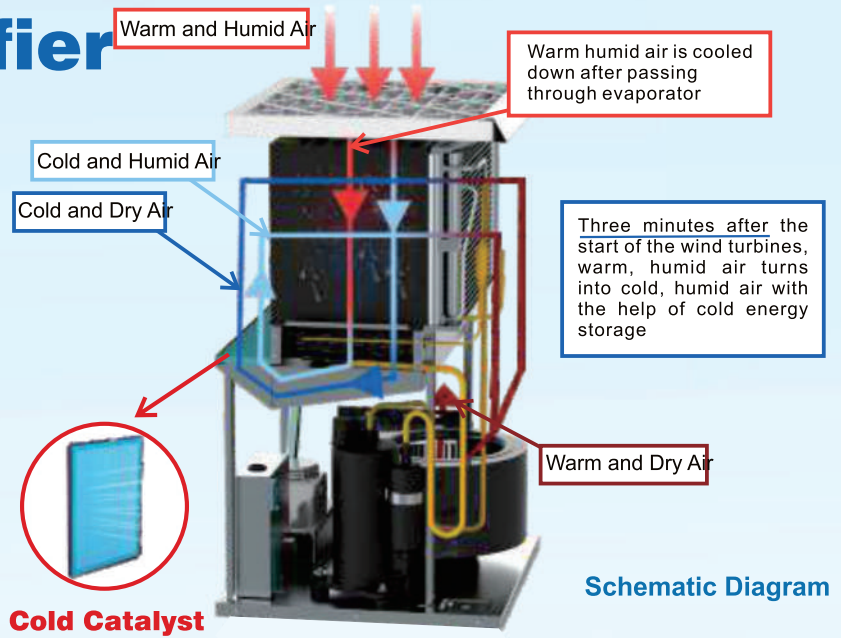




# 1400X SLGR Sentinel Dehumidifier

## How Does SLGR works?

SLGR microchannel technology has improved the performance and efficiency, The **ALORAIR SLGR technology** uses a special air-to-air heat exchanger system to help bring the air closer to dew point temperature before it passes over the super-cooled evaporator coils, besides with the combination of Microchannel Alu Condenser, Maximize the Capacity and efficiency. The purpose of microchannel condenser is to improve energy efficiency. The use of microchannel condenser technology can improve the 50% dispersion effect of condenser, 30% heat exchange area and 50% refrigerant quantity. When the **SLGR microchannel is ombined, the efficiency of the dehumidifier** can be increased by 30~50%. This leads to more condensation that forms on the coils inside the machine, and fastest for interchange of heat, which in turn leads to more moisture pumped out and less moisture in the air that is returned to the room. This extra efficiency makes **ALORAIR SLGR dehumidifier** perfectly suited for low humidity conditions.



## Knowing More about the Difference Between LGR/SLGR and Conventional Dehumidifiers LGR Definition

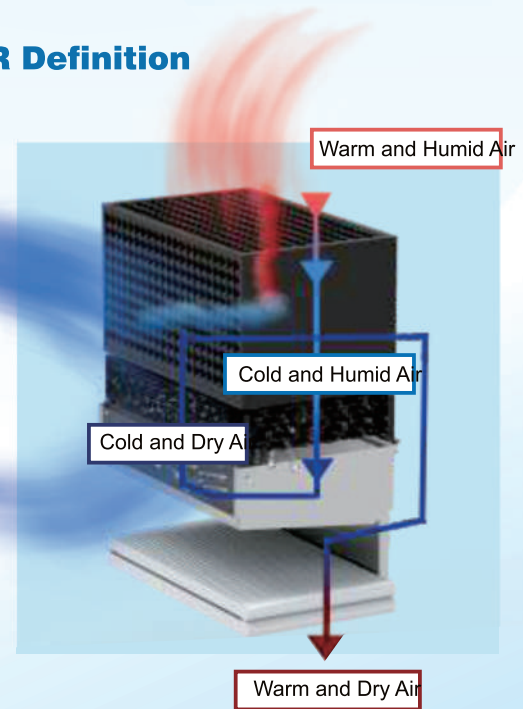
**What is the LGR dehumidifier? Is it a dehumidifier just says "LGR" on the Lable? The answer is certainly NO!!!** Do not believe someone simply used as a marketing term.

The IICRC S500 2006 defines LGR as it has an enhanced refrigeration system that allows the dehumidifier to dry a space too much lower humidity than conventional dehumidifiers, it is achieved by the precooling designs, air-to-air heat exchanger, LGR can effectively remove some moisture below 34GPP, removes more water with less electricity consumed, continue to dry at lower humidity, such as 80F/20%, that conventional dehumidifier does not works.

As a water damage restoration professional, you need professional-grade equipment that helps you tackled the toughest of jobs and deliver outstanding results for your clients. A powerful dehumidifier is a key component in your suite of tools.

What type of dehumidifier do you need? We provide a series of professional dehumidifiers, both LGR and conventional options. What are the differences, and which is best for you? **Here's a rundown of LGR dehumidifiers vs. Conventional dehumidifiers and their unique benefits: CONVENTIONAL DEHUMIDIFIERS**

The conventional dehumidifiers are designed for most water-damage remediation projects, A feature same as LGR dehumidifier they can easily be transported from job to job and loaded and unloaded from a vehicle. the conventional dehumidifier draws moisture-laden air across a set of super-cooled coils. As the air passes over, its temperature drops below the dew point and water condenses on the cold coils. The dry air is reheated and exhausted to the room to collect more moisture. Compared to **ALORAIR SLGR dehumidifiers**, conventional models are not as effective or efficient at removing moisture and drying air in environments with large volumes of water as LGR models are. However, conventional dehumidifiers are less expensive than their LGR dehumidifiers.



## SLGR DEHUMIDIFIERS, Why We call as SLGR (Super LGR) Technology?

SLGR stands for Super low-grain refrigerant, How do they work? The **ALORAIR SLGR technology** uses a special air-to-air heat exchanger system to help bring the air closer to dew point temperature before it passes over the super-cooled evaporator coils, besides with the combination of Microchannel Alu Condenser, Maximize the Capacity and efficiency. This leads to more condensation that forms on the coils inside the machine, and fastest for the interchange of heat, which in turn leads to more moisture pumped out and less moisture in the air that is returned to the room. This extra efficiency makes **ALORAIR SLGR dehumidifier** perfectly suited for low humidity conditions. When faced with particularly challenging water damage restoration jobs where higher amounts of water are involved, an **SLGR dehumidifier** is your best bet for achieving maximum results.

