



**Eco-friendly** Functional Paint

EG GOLD *Diatomite Paint*

# BRECEL

**BRECEL** provides everything necessary to maintain complete comfort in a closed residential environment.



**HONG SUNG E&G Co., Ltd.**  
engineering & green

# Natural Home Styling

**Hongsung E&G** adopts human-centered natural principles and environment-friendly materials to lead our customers' health and happy housing culture.



# WHAT?



EG GOLD diatomite paint "BRECEL" is a water-based natural paint made of diatomite which has about 5,000 times more microporous structures than charcoal.

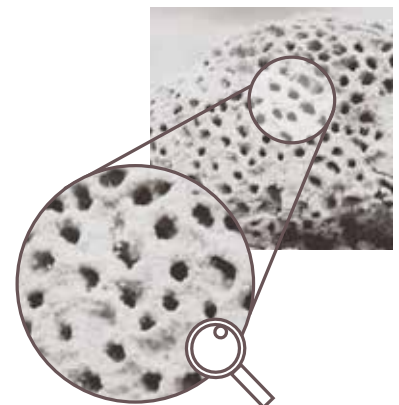
BRECEL provides everything necessary to maintain complete comfort in a closed residential environment, including Deodorizing, Humidity Control, Preventing Condensation, Fireproofing, Antibacterial Activity, Mold Prevention and etc.



## What is diatomite?

Diatomite is the sediment of diatoms, a type of vegetable plankton that has accumulated in oceans and lakes over 8 to 10 million years.

Due to its highly porous structure, 5,000 times more porous than coal, it is light and highly-absorptive. In particular, thanks to excellent insulation features, diatomite is gaining popularity in the U.S. and Japan, being an eco-friendly building material.



# WHY?

## 3Free!

- Zero-odor
- No Sick Building Syndrome
- Anti-bacterial and anti-mold properties



BRECEL is a functional paint that does not only reduce sick house syndrome but also has various functions such as antibacterial & antifungal activities, deodorization, insulation, control of humidity, prevention of condensation, and generation of anions and far-infrared rays. In addition, "BRECEL" is an eco-friendly product that has received the UL Greenguard Gold certification.

If you have a plan to move to a new house or change the interiors, the best answer would be a natural eco-friendly diatomite paint, "BRECEL" with which you do not need to worry about sick house syndrome and various types of functionalities are guaranteed.



1

It can **control humidity**. When humidity is high in the air, it absorbs moisture. When humidity is low, it releases moisture.



2

**Remove** various types of **living odors** such as tobacco smell and food smell ! Absorb and decompose formaldehyde causing sick house syndrome !



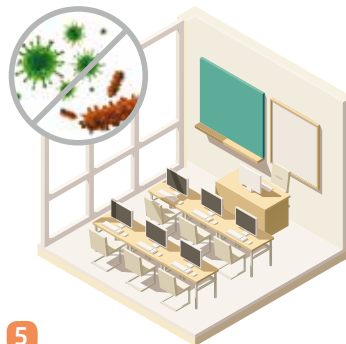
3

**Prevention of condensation**  
It prevents condensation on the wall caused by the function of insulation.



4

This material is **non-burnable**. This is the best choice for fire prevention.



5

With weak alkaline ingredients, **antibacterial** and **antifungal** effects ! Antibacterial and antifungal natural paint !

## GREENGUARD Gold Certification for Building Products and interior Finishes

"BRECEL" is an eco-friendly product that has received the UL Greenguard Gold certification. UL Greenguard is a program which certifies the indoor air quality after it is tested by a globally trusted safety certification company, UL.

The Greenguard certification is a very rigorous certification which can be given only when the safety is ensured. It applies strict standards to all products that may affect indoor air quality and tests 360 VOCs (volatile organic compounds), total chemical emissions, and more than 11,000 chemicals.

"BRECEL" is the Korea's only paint product that meets all the requirements for gold certification which is the highest level of certification. The product with this certification can be used for the finishing and interior of public facilities with many children and elderly people such as school, hospital, senior center, kindergarten as well as home.



## BRECEL "UL Greenguard GOLD" TEST Report

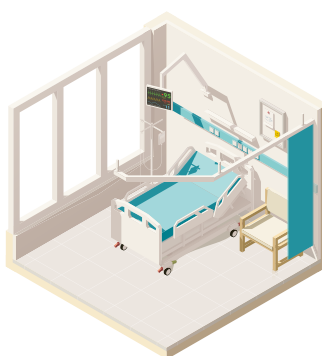
Allowable exhaust standard for IAQ			Predicted Concentration		Result
Index	Greenguard	Greenguard GOLD	Office	Classroom	
TVOC (Total Volatile Organic Compounds)	$\leq 0.5 \text{ mg/m}^3$	$\leq 0.22 \text{ mg/m}^3$	$0.078 \text{ mg/m}^3$	$0.024 \text{ mg/m}^3$	PASS
Formaldehyde	$\leq 0.05 \text{ ppm}$	$\leq 0.0073 \text{ ppm}$	$< 0.003 \text{ ppm}$	$< 0.001 \text{ ppm}$	PASS
Total Aldehyde	$\leq 0.1 \text{ ppm}$	$\leq 0.043 \text{ ppm}$	$< 0.003 \text{ ppm}$	$< 0.001 \text{ ppm}$	PASS
1-Methyl-2-Pyrrolidinone		$\leq 0.16 \text{ mg/m}^3$	$< 0.003 \text{ mg/m}^3$	$< 0.001 \text{ mg/m}^3$	PASS
VOC (Volatile Organic Compounds)	All $\leq 1/10 \text{ TLV}$	$\leq 1/100 \text{ TLV}$ & $\leq 1/2 \text{ Chronicity REL}$	—	—	PASS

Quarry of information : #21 Nut Brown, Test Report # : 91099-04, UL Environment



### RECOMMENDED FOR :

- School Classrooms and Offices
- Elderly families and those in poor health
- Anyone who wants to live or work in pleasant surroundings
- Babies and pregnant women



# HOW?



## Easy and quick constructability of “BRECEL”

1. It can be applied in indoor areas in which it is poorly ventilated in winter, because it does not have odor.
2. With set-to-touch time of 1 hr and dry-through time of 24 hr, you can sleep on the day of painting.  
(Set-to-touch: none of the painting sticks to a hand that touches it, Dry-through: paint is completely dried.)
3. After opening, seal the remaining paint and keep it at room temperature in a dry place away from direct sunlight.
4. After painting, you can wash used tools with water and then reuse them.



Preparation of areas to be painted and tools

With bleach or remover, you should wipe out the stains and fungi on the walls which you want to paint. If you clean up the wall well, the results of the painting work would be good.



Protection with painter's tape

Covering tape or masking tape is used to protect molding, doorframe, outlet and flooring materials.



Painting

When the narrow areas around the outlet are painted, please paint it up and down by using a brush. The large area should be painted by using a roller to have the clean surface finish.



Repainting and finishing work

After reapplied paint is dried, remove the covering tape and then clean up the area with paint using wet towel.

\* You should paint thinly twice to get distinct color and clean surface finish.



From now on, solve it quickly  
and easily with **BRECEL**



## Let's Compare

Classification	BRECEL	Synthetic resin emulsion paint
Ingredients	Eco-friendly organic/ inorganic composite binder diatomite content 80 %	Synthetic resin binder
Environmental friendliness	Eco-friendly (no VOCs, environmental hormones, formaldehyde)	Generation of environmental pollutants (emission of VOCs, environmental hormones, formaldehyde into the air)
Toxicity	Harmless to human body	Harmful to human body
Durability	Excellent (semi-permanent use). Durability is strengthened as material age has passed.	Poor (repainting is required within a few years). Durability declines as material age has passed.
Functionality	Easy to control permeability, antibacterial activities, and humidity	Cannot control permeability, antibacterial activities, and humidity
Inflammability	Semi-incombustible (no toxic gas upon fire)	Flammable (toxic gas generated upon fire)
Hiding power	Number of painting : 1 ~ 2 times	Number of painting : 2 ~ 3 times
Odor	No (even if there are residents, it can be painted)	Yes (ammonia, etc.)
Discoloration	No discoloration (using inorganic pigment)	Discoloration (using organic pigment)
Domestic production	Korea's first production and mass production of diatomite paint	-

## "BRECEL" specifications

use	Wallpaper, walls, ceilings (for inside of building including concrete, cement and mortar)
Packge unit	1 gallon, 5 gallon
Drying time	Set to touch drying : 1hr. / repainting : 2~3hrs. / dry hard : 24hrs.
Colors	Basic 29 colors, other colors can be produced by order
Construction area	1 gallon : 10~14 m2, 5 gallon : 50~60m2 (When two coats of paint are applied)
Construction merhod	By brush, roller

Specializing in eco-friendly  
building materials  
**HONGSUNG E&G Co., LTD.**



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engineering & green

1607-19 Naepo-ro, Galsan-myeon, Hongseong-gun, Chungnam

**Tel.** +82-70-4880-3754 **Fax.** +82-41-634-6116 **E-mail.** [hsegreen@nate.com](mailto:hsegreen@nate.com) [www.hsegreen.com](http://www.hsegreen.com)

Seoul Sales Dept. **Tel.** +82-2-6949-1559 **Fax.** +82-2-6949- 1558