

Breezy Products: Frequently Asked Questions



GENERAL DISINFECTION QUESTIONS

Who is the EPA?

The Environmental Protection Agency is part of the United States Federal Government and provides regulation and oversight for issues of environmental impact. The [EPA](#) is the Government Agency that registers Hard Surface Disinfectant products for use, validating the claims made on the product label. The US Food and Drug Administration regulates disinfection of sterile tissue, or disinfection inside the human body.

EPA Registration is a process where the US Government, through the Environmental Protection Agency, confirms that the efficacy claims, use, handling, safety and disposal instructions on disinfectant products are accurate and have been confirmed by independent, third-party testing.

Is Breezy BioCare™ RTU registered by the EPA?

Breezy BioCare™ RTU is registered by the EPA for use in fogging applications with both Breezy Blue™ and Breezy One™. The product's Registration Number is 90748-1.

What is the Log Kill scale?

Microbiologists use a logarithmic scale when measuring a reduction of contamination by microorganisms. Log reduction stands for a 10-fold (or one decimal point) reduction in bacteria, meaning the disinfectant reduces the number of live bacteria by 90 percent for every step.

- 99.9% = 3 log kill
- 99.99% = 4 log kill
- 99.999% = 5 log kill
- 99.9999% = 6 log kill
- 99.99999% = 7 log kill

What are Toxicity Categories?

To help ensure the safe use and disposal of disinfection products, the EPA requires all Disinfectants to go through toxicity testing to determine any possible ill effects on humans and identify precautions that may need to be taken. The four toxicity categories, from one to four are:

- Category I is Highly toxic and Severely irritating, signal word DANGER
- Category II is Moderately toxic and Moderately irritating, signal word WARNING
- Category III is Slightly toxic and Slightly irritating, signal word CAUTION
- Category IV is Practically non-toxic and not an irritant, no signal word required

Breezy BioCare™ RTU is listed as at CAT IV (practically non-toxic) in five of the six toxicity areas of evaluation, and one area (eye irritation) as CAT III (slightly irritating) because of the Hydrogen Peroxide.



What is the EPA “N” list?

EPA List N refers to products that meet the EPA’s criteria for use against SARS-CoV-2, the virus that causes COVID-19. Breezy BioCare™ RTU is listed on the EPA List N.

What is EPA “Q” list?

EPA List Q refers to products that meet the EPA’s criteria for use against Emerging Viral Pathogens. Breezy BioCare™ RTU is listed on the EPA List Q for emerging Tier 1, Tier 2, and Tier 3 viruses such as Monkeypox and Ebola.

Has Breezy BioCare™ RTU been tested against Human Coronavirus?

Breezy BioCare™ RTU successfully passed third-party laboratory testing against Human Coronavirus in 2020 and that testing was approved by the EPA to update the EPA Registration.

What other pathogens does Breezy BioCare™ RTU kill?

Breezy BioCare™ RTU is a broad-spectrum disinfectant that kills a variety of bacteria, viruses and mold including: Staphylococcus Aureus, Pseudomonas Aeruginosa, Salmonella Enterica, E. Coli, Listeria, Trichophyton Mentagrophytes, Coronavirus, Norovirus, Rhinovirus, and H1N1. A [Summary of Efficacy](#) is available on the Build With Robots website.

Is there a way to independently verify the EPA data?

Test results from third-party test laboratories adhering to the Good Laboratory Practice (GLP) regulations are available from Build With Robots upon request.



GENERAL FOGGING QUESTIONS

Are Breezy Blue™ and Breezy One™ foggers or sprayers?

Both Breezy Blue™ and Breezy One™ use fogging technology. These Breezy products generate a dry fog with particle sizes between 20 microns and 100 microns, which provides superior coverage for disinfecting surfaces and can penetrate crevices and porous surfaces.

How does fogging with Breezy Blue™ compare to electrostatic spraying or UV light?

FEATURE	UV	Electrostatic Sprayer	Breezy Blue Fogger
Time to treat 5000 ft ³ room	30 minutes	5 minutes	1 minute
Time unoccupied after treatment	No dwell time	10-minute dwell time	10-minute dwell time
Coverage	Line-of-sight surfaces only	Surfaces, fabrics, hard-to-reach places	Surfaces, fabrics, hard-to-reach places
List price per unit	\$30,000-\$100,000	\$1,000-\$6,500	\$2,490
Estimated chemical cost per 5000 ft ³ room	\$0	\$0.50-\$1.00	\$1.50
Residue	None	Yes	None
Device usability	Complex to set up and use	Some training; requires PPE	Little training, simple to use
Remote or scheduled operation available	Sometimes	No	Yes
Monitoring and reporting available	Sometimes	No	Yes
Anticipated in-service life	~3 years	~1-3 years	~5 years
Maintenance	Low	Considerable	Low
Pathogen elimination	Up to 99.99%	Up to 99.9999%	Up to 99.9999%
Deodorization	No	Sometimes	Yes

What is the approximate coverage capacity and time to fog with Breezy One™?

Breezy One™ holds up to 8 gallons and can typically disinfect a 3,000,000 ft³ facility with one hour of fogging time.



What is the approximate coverage capacity, time, and cost to fog with Breezy Blue™?

Physical Space	Fog Time	Gallons Used During Disinfection	Disinfections per Gallon	Cost of Disinfection
Ambulance (1,400 ft ³)	25 seconds	0.025	40	\$0.75
Classroom (5,000 ft ³)	50 seconds	0.050	20	\$1.50
Large Room (9,000 ft ³)	90 seconds	0.090	11	\$2.70

The following formula may also be used as guidance for mid-large sized areas (>3000 ft³). L, W, and H represent the dimensions of the area in feet, and T is the fog time in seconds.

$$T = \frac{L * W * H}{100}$$

For physical spaces 30,000 ft³ or larger, coverage is best achieved with multiple Breezy Blue™ foggers operated simultaneously at different fogging locations.

In most applications, a 10-minute settling time after fogging allows enough contact time with surfaces to ensure optimal disinfection.

How long do I have to wait to re-enter a room after fogging?

With still air (HVAC off, doors closed), a 10-minute settling time allows for the small fog particles to dwell around surfaces as they slowly fall from the air. After the 10 minutes of dwell time, all particles larger than 10 microns will have settled on surfaces and the floor, and the hydrogen peroxide concentration will be less than 1 ppm (the OSHA limit). Then, you can open doors/windows and turn on the HVAC to ventilate, allowing any remaining fog particles to dissipate. You can re-enter after 10 additional minutes, for a total of 20 minutes after fogging.

Is there any residue after fogging?

When the Breezy foggers are used according to the recommended concentrations for disinfection, the dry fog leaves no residue.

Do I need to wipe surfaces after fogging?

Wiping is not required in nearly all situations. One exception: food contact areas should be rinsed with potable water after fogging according to our SDS and instructions for use.

Is the fog safe around electronics, monitors, and similar items?

When the Breezy foggers are used according to the recommended concentrations for disinfection, the fog is non-corrosive and electronics safe.

Will the fog wet papers and other items?

When the Breezy foggers are used according to the recommended concentrations for disinfection, the dry fog does not saturate the air nor create any wetness on surfaces, papers or other items in the space being fogged.



Will the fog set off smoke detectors?

When the Breezy foggers are used according to our instructions for use, the dry fog will not set off smoke detectors. Do not point the Breezy foggers directly at a smoke detector.

Are there any objects or materials that I should not fog around?

You can safely fog around most objects and materials including electronics, fabrics, papers, most metals, leathers, and wood surfaces. Avoid fogging people or pets. Avoid fogging around untreated soft metals like aluminum and brass, and avoid fogging any antiques on which you would not allow water. Contact Build With Robots if you have specific compatibility questions.

Do I need to wear any special PPE when filling or fogging?

Our Breezy fogging automation products are designed to keep users away from chemical exposure while fogging. As with all disinfectants, handle Breezy BioCare™ RTU in accordance with good industrial hygiene, safety practices and our instructions for use. When filling, safety glasses and gloves are recommended. If you must enter a space less than 10 minutes after fogging when the hydrogen peroxide concentration is greater than 1 ppm (the OSHA limit), eye protection and a mask should be worn.

Where can I get an SDS for the disinfectant?

All chemical products are required to produce a Safety Data Sheet (SDS) that provides technical and safety information on a product. The [SDS for Breezy BioCare™ RTU](#) is available on the Build With Robots website.

What is the basic first aid if I am exposed to the disinfectant?

Refer to First Aid Measures in the [Breezy BioCare RTU Safety Data Sheet](#).



ABOUT BREEZY BLUE™

How much does Breezy Blue™ weigh?

When empty, Breezy Blue™ Response weighs 15 lbs. When full with 1.25 gallons of disinfectant, it weighs 24 lbs. Breezy Blue™ can be carried by one person using its top handle.

How is Breezy Blue™ operated?

Breezy Blue™ will thoroughly disinfect a space while keeping users out of harm's way. This includes three modes of operation:

1. Manually using the top push-button,
2. Remotely using the wireless Smart Controller, or
3. Automatically upon a daily schedule.

In all three modes of operations, Breezy Blue™ turns off automatically after a pre-programmed period of fogging time, typically between 25 and 90 seconds.

How do I know the operational status of Breezy Blue™?

Breezy Blue™ has indicator lights and sounds that signal when it is counting down before fogging, when it is fogging, when the fog is settling, and when it is idle. The Smart Controller will also provide the status of all Breezy Blue™ units within its wireless range (approximately 100 feet). See Breezy Blue™ User's Manual for details on the indicator lights and sounds.

How do I schedule Breezy Blue™ to fog?

Using the Smart Controller, Breezy Blue™ can be scheduled to fog once daily at a specified time of day.

Does Breezy Blue™ require Wi-Fi?

Breezy Blue™ units do not use Wi-Fi. Instead, Breezy Blue™ uses Bluetooth for connectivity and will automatically connect with wireless Breezy Blue™ Smart Controllers within range. The Smart Controllers can be connected to your facility Wi-Fi for software updates, data logging and other future features.

How do I configure Breezy Blue™?

A Breezy Blue™ Smart Controller is needed to configure, perform software updates, and remotely monitor Breezy Blue™ units.

Is the Breezy Blue™ Smart Controller required?

We recommend at least one wireless Smart Controller per site to configure, perform software updates, and remotely monitor the Breezy Blue™ units at that site.

What is the wireless range of the Breezy Blue™ Smart Controller?

The wireless range of the Smart Controller is approximately 100 feet. The Smart Controller will automatically connect with and display all Breezy Blue™ units within its wireless range.

How many Breezy Blue™ units can I control with one Smart Controller?

The Smart Controller can connect with an unlimited number of Breezy Blue™ units. It will automatically



connect with and display all Breezy Blue™ units within its wireless range.

How do I update the software for Breezy Blue™?

A Breezy Blue™ Smart Controller that is connected to your facility Wi-Fi can be used to update the software on the Breezy Blue™ units and the Smart Controller itself.

Does Breezy Blue™ require any regular maintenance?

We recommend occasionally cleaning the unit, cleaning the fill port screen, and checking for firmware updates. Breezy Blue™ is cleaned by wiping down the exterior using a soft cloth dampened with water or an aqueous solution of 70% isopropyl alcohol. Remove and clean the fill port screen filter using water and a soft brush.

What disinfectants can be used in Breezy Blue™?

Only Breezy BioCare™ RTU has been thoroughly tested for chemical compatibility and operational efficacy with Breezy Blue™. Other disinfectants should not be used and will void the warranty.



ABOUT BREEZY BIO CARE™ RTU

What are the main advantages of using Breezy BioCare™ RTU?

- **EPA Registered** - broad spectrum disinfection, specifically tested against Human Coronavirus and many other pathogens
- **Safe and biodegradable** - low toxicity, low corrosivity, non-flammable
- **Airborne advantage** - small micron size helps with comprehensive coverage
- **Cost savings** - savings on labor and chemical costs
- **Made in the USA**

What is the active ingredient in Breezy BioCare™ RTU?

Breezy BioCare™ RTU has two active ingredients: Hydrogen Peroxide (5.3%) and a tiny amount of Quaternary Ammonium compounds (0.12%). Both active ingredients are found in common household items.

What does RTU mean?

RTU is an acronym for "Ready To Use" which means that Breezy BioCare™ RTU is ready to use right out of the bottle without requiring any mixing or diluting.

How does Breezy BioCare™ RTU work?

Breezy BioCare™ RTU cleaves the spore wall through oxidation, which occurs because of an absence of electrons in Breezy BioCare™ RTU. By stripping the organism of electrons, it neutralizes the mycotoxin inside. The two active ingredients (Hydrogen Peroxide and Quaternary Ammonium) create a dual kill capability tailored to destroy the target microorganism. Our proprietary formula stabilizes the Hydrogen Peroxide for a long shelf life.

What Makes Breezy BioCare™ RTU superior to other disinfectants?

Breezy BioCare™ RTU's unique properties are not found in other commonly used disinfectants. Breezy BioCare™ RTU is a hydrogen peroxide alternative to bleach and alcohols. Dual active ingredients provide for more effective disinfection in a variety of applications and on a wide range of surfaces. Breezy BioCare™ RTU is EPA registered as a broad spectrum Virucide, Bactericide, Fungicide and Deodorizer.

Is Breezy BioCare™ RTU considered a green product?

Breezy BioCare™ RTU has been certified Green by the Green Clean Institute.



Is Breezy BioCare™ RTU environmentally friendly?

Breezy BioCare™ RTU, when deployed as a dry fog, biodegrades into benign end products.

Does Breezy BioCare™ RTU cause corrosion?

Breezy BioCare™ RTU is a low corrosion formula.

Does Breezy BioCare™ RTU have a strong smell?

Breezy BioCare™ RTU is fragrance free with only a mild smell. Also, Breezy BioCare™ RTU is a very effective deodorizer because it neutralizes odors by killing the odor-causing bacteria with no masking agents.



Is Breezy BioCare™ RTU child and pet friendly?

When used as directed, Breezy BioCare™ RTU is safe for use around pets and children. Toxicity testing determined Breezy BioCare™ RTU to be Category IV “practically non-toxic” in five of six tests and only “slightly toxic” in the final test.

Does Breezy BioCare™ RTU contain any VOC's or Carcinogens?

Breezy BioCare™ RTU does not contain any bleach, phenols, or VOC's (volatile organic compounds).

Does Breezy BioCare™ RTU require mixing?

There is no mixing. Breezy BioCare™ RTU is ready to use straight from the container.

Is Breezy BioCare™ RTU flammable?

Breezy BioCare™ RTU is non-flammable. Excess oxygen may be present in the space as the disinfectant breaks down, and the area should be ventilated properly after the 10-minute dwell time.

What is the shelf life of Breezy BioCare™ RTU?

Breezy BioCare™ RTU should be used within one (1) year for maximum efficacy.

Does Breezy BioCare™ RTU require special storage?

There are no special storage requirements. Keep containers tightly closed in a cool, dry, well-ventilated area away from incompatible substances. Containers which are opened must be carefully resealed and kept upright to prevent leakage. And Breezy BioCare™ RTU should be used within one (1) year for maximum efficacy.

How do I clean up spills?

Absorb a spill with inert material (e.g. vermiculite, sand or earth), and then place in suitable container. Clean up spills immediately, using proper protective equipment including eye protection and gloves.

What are the origins of the Breezy BioCare™ RTU?

Sandia National Laboratories has conducted years of research in the development of a chemical formula to safely disinfect a large, populated area after a biological weapon attack. Leveraging the Sandia National Laboratory formula, SpectraShield Technologies LLC, a partner of Build With Robots, initiated a development effort to create a ready-to-use disinfectant that would have a lower toxicity profile but still offer a broad spectrum efficacy. The result of this development effort is the proprietary disinfectant known as Breezy BioCare™ RTU.

Who manufactures the chemical?

Build With Robots has a partnership with SpectraShield and Crown Technologies of Indiana, an ISO 9001:2015 facility, to manufacture Breezy BioCare™ RTU. Crown Technologies is our primary manufacturer, and we have blending agreements with a few other select chemical manufacturers in the United States.



PURCHASING AND SUPPORT QUESTIONS

How do I reorder more disinfectant?

Breezy BioCare™ RTU can be ordered from your local distributor or from the Build With Robots' website.

Are the Breezy products Made in the USA?

The Breezy Blue™ and Breezy One™ products are Designed and Assembled in the USA. Breezy BioCare™ RTU is Made in the USA.

Is Breezy BioCare™ RTU considered a hazardous shipping material?

Breezy BioCare™ RTU does not require any special shipping or transportation placards.

What is the warranty for Breezy Blue™ and Breezy One™?

Breezy Blue™ and Breezy One™ products have a one (1) year from the date of shipment. If any product proves defective during the one-year warranty period, Build With Robots will repair or replace the defective product without charge.

What do I do if my Breezy Blue™ stops working properly?

For any issues with our products, you may contact Build With Robots customer support at 833-273-3991. If your product is under warranty, we will repair or replace the defective product without charge.

