

Newsletter

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Portable Ozone Generator for Sports Equipment Decontamination

www.medallionhealthyhomes.com

What Is Ozone?

The name "ozone" is derived from the Greek word "ozein" which means "to smell". Ozone is a bluish, water-soluble gas with a distinctive smell. It is a highly reactive gas composed of three oxygen atoms (O₃). Ozone occurs naturally in our environment when oxygen, released from the earth during normal production cycles travels up through our atmosphere and is converted to ozone by ultraviolet radiation from the sun. Ozone is one of the trace gases that make up our atmosphere.

Ozone is classified as an oxidant or a substance that converts organic material into their base compounds. Ozone is a very fast acting and powerful oxidizing agent, more powerful than chlorine and second only to fluorine. Ozone's oxidizing effect causes damage to the fatty acids in the cellular membrane literally destroying the cell, a process known as cell lysing. It is the highly unstable single O₁ atom that breaks free from the O₃ molecule leaving O₁ (free radical) and O₂ (oxygen). The O₁ radical seeks to oxidize everything it comes in contact with and serves as the perfect medium for the elimination of viruses, bacteria, mold spores, mildew, offensive odors, dust mites and VOC's to name a few. Ozone is an unstable gas with a half-life of approximately 40 to 90 minutes, dependent mainly on the temperature, it then reverts back to oxygen. There is no magic or smoke and mirrors with respect to ozone, it is a chemical process that is predictable and well understood.

Although ozone is one of only a few measurable components of smog it tends to get a bad rap for this. Comparing the ozone in pollution and smog with the ozone we use as an oxidizing agent would be like comparing two glasses of water; the first contains dirty water from a swamp or ditch and the second contains pure, natural spring water. They are both water - but which one would you drink?

Sports Equipment and Facilities

Athletes of all ages are becoming increasingly at risk for infections such as *Staphylococcus aureus (Staph) and *MRSA simply from exposure to contaminated equipment. The overuse of antibiotics has allowed staph bacteria to evolve into what has become known as the Superbug. It is not just the smell of sweaty gear that may be bothersome but the underlying danger of microbial contamination that could pose serious health risks for athletes. "That smell" is caused by sweat, mucous, blood and dirt that have soaked into the equipment, a mix of proteins and organic matter that is the ideal breeding ground for the growth of bacteria and fungus. The player's become further exposed to infection as these pathogens enter the body through cuts and abrasions leading to potentially serious infections.

The transmission rates of staph and MRSA are facilitated by close personal contact of the players and the frequent skin injuries that occur with many sporting activities. Failure to cover wounds adequately, sharing of sports equipment and towels and lack of cleanliness of shower and change room facilities also rate as contributing factors.

Decontamination of Sporting Equipment and Facilities

Ozone Purification Treatment will effectively eliminate 99.9% of all bacteria, viruses and microbial contamination and destroy all offending odors accumulated from years of hard play, without erasing any of the proud stains immortalized into your equipment.

The use of ozone is becoming more commonplace at the elite sporting levels but we feel this service should be available to every player on every team. The best prevention from these infections include regular ozone treatments of equipment and locker room facilities and commonsense practices like proper hygiene techniques and covering wounds before playing.

Introducing the Sport Wizard. The Portable Ozone Generator for Sports Gear!

Finally you don't have to keep your equipment outside the back door!

The new Sport Wizard will give you piece of mind knowing that your equipment is germ free and your family will thank you for not smelling up the house!

<http://www.medallionhealthyhomes.ca>