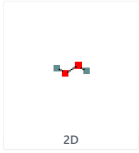






Hydrogen Peroxide

| | |
|--|--|
| PubChem CID | 784 |
| Structure | <div style="display: flex; justify-content: space-around;"><div style="text-align: center;"><p>2D</p></div><div style="text-align: center;"><p>3D</p></div></div> <p>Find Similar Structures</p> |
| Chemical Safety | <div style="display: flex; justify-content: space-around;"><div style="text-align: center;"><p>Oxidizer</p></div><div style="text-align: center;"><p>Corrosive</p></div><div style="text-align: center;"><p>Irritant</p></div></div> <p>Laboratory Chemical Safety Summary (LCSS) Datasheet</p> |
| Molecular Formula | H ₂ O ₂ |
| Synonyms | hydrogen peroxide 7722-84-1 oxydol perhydrol Superoxol <input data-bbox="359 873 414 896" type="button" value="More..."/> |
| Molecular Weight | 34.015 |
| Dates | Modify Create 2023-04-16 2004-09-16 |
| <p>Hydrogen peroxide is a colorless liquid at room temperature with a bitter taste. Small amounts of gaseous hydrogen peroxide occur naturally in the air. Hydrogen peroxide is unstable, decomposing readily to oxygen and water with release of heat. Although nonflammable, it is a powerful oxidizing agent that can cause spontaneous combustion when it comes in contact with organic material. Hydrogen peroxide is found in many households at low concentrations (3-9%) for medicinal applications and as a clothes and hair bleach. In industry, hydrogen peroxide in higher concentrations is used as a bleach for textiles and paper, as a component of rocket fuels, and for producing foam rubber and organic chemicals.</p> <p>▶ CDC-ATSDR Toxic Substances Portal</p> <p>Hydrogen Peroxide is a peroxide and oxidizing agent with disinfectant, antiviral and anti-bacterial activities. Upon rinsing and gargling or topical application, hydrogen peroxide exerts its oxidizing activity and produces free radicals which leads to oxidative damage to proteins and membrane lipids. This may inactivate and destroy pathogens and may prevent spreading of infection.</p> <p>▶ NCI Thesaurus (NCIt)</p> <p>Hydrogen peroxide, stabilized appears as a crystalline solid at low temperatures. Has a slightly pungent, irritating odor. Used in the bleaching and deodorizing of textiles, wood pulp, hair, fur, etc. as a source of organic and inorganic peroxides; pulp and paper industry; plasticizers; rocket fuel; foam rubber; manufacture of glycerol; antichlor; dyeing; electroplating; antiseptic; laboratory reagent; epoxidation; hydroxylation; oxidation and reduction; viscosity control for starch and cellulose derivatives; refining and cleaning metals; bleaching and oxidizing agent in foods; neutralizing agent in wine distillation; seed disinfectant; substitute for chlorine in water and sewage treatment. (EPA, 1998)</p> <p>▶ CAMEO Chemicals</p> | |