

MATERIAL SAFETY DATA SHEET

Emergency CHEMTREC: 800-424-9300 (USA)

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Tel: 877-77-ULTRA

Reagent Alcohol 190 Proof

1. Product Identification

Trade Name: Reagent Alcohol 190 Proof

Chemical Name: Denatured Alcohol

2. Composition/Information on Ingredients

	<u>Cas No</u>	<u>OSHA PEL/TLV</u>
Ethyl Alcohol:	64-17-5	1000ppm
Methanol	67-56-1	200ppm
Isopropyl Alcohol	67-63-0	400ppm
Water	7732-18-5	

3. Hazardous Identification

Hazardous Identification Information:

POISON! DANGER! MAY BE FATAL IF SWALLOWED. HARMFUL IF INHALED OR ABSORBED THROUGH SKIN. VAPOR HARMFUL. FLAMMABLE! AFFECTS CENTRAL NERVOUS SYSTEM. CAUSES IRRITATION TO SKIN, EYES, AND RESPIRATORY TRACT. MAY AFFECT LIVER, BLOOD, REPRODUCTIVE SYSTEM.

4. First Aid Measures

Route(s) of Entry: Inhalation, Skin, Eye, Ingestion

Health Hazards (Acute and Chronic):

Inhalation: Immediately remove victim to fresh air. If victim has stopped breathing give artificial respiration, preferably mouth-to-mouth. GET MEDICAL ATTENTION IMMEDIATELY.

Ingestion: If victim is conscious and able to swallow, have victim drink water or milk to dilute. Never give anything by mouth if victim is unconscious or having convulsion. CALL A PHYSICIAN OR POISON CONTROL CENTER IMMEDIATELY. Induce vomiting only if advised by physician or Poison Control Center.

Eye: Immediately flush affected area with plenty of cool water. Eyes should be flushed for at least 15 minutes. Remove and wash contaminated clothing before reuse. GET MEDICAL ATTENTION IMMEDIATELY.

Skin: Rinse exposed area well with water. If irritation occurs consult a physician. Get medical attention immediately.

5. Fire Fighting Measures

Flash Point: 55.0°F (13°C) TCC; 60.0°F (16°C) TCC

Fire Extinguishing Media:

Use dry chem, "Alcohol" Foam, CO2. Water may be ineffective but water should be used to keep fire-exposed container cool.

Special Fire Fighting Procedures: If leak/spill hasn't ignited, use water spray to disperse vapors and protect people attempting to stop the leak. Water spray may be used to flush spills away from exposure and to dilute spills to non-flammable mixtures. In the event of fire, wear full protective clothing and NIOSH-approved self-contained breathing apparatus with full facepiece in pressure demand or other positive pressure mode. Water can be used to extinguish flames and cool fire-exposed containers

Unusual Fire and Explosion: Above flash point, vapor-air mixtures are explosive. Vapors can flow along surfaces to ignition sources and flash back. Sealed containers may rupture when heated. Sensitive to static discharge.

6. Accidental Release Measures

Steps to be Taken in Case Material is Released or Spilled: Ventilate area of leak or spill. Remove all sources of ignition. Wear NIOSH approved respirator. Isolate hazard area. Contain and recover liquid when possible. Use non-sparking tools and equipment. Collect liquid in an appropriated container or absorb with an inert material (vermiculite, dry sand, earth, etc.), and place in a chemical waste container. Do not use combustible materials, such as sawdust. Do not flush to sewer.

7. Handling and Storage

Precautions to be Taken: Protect against physical damage. Store in a cool, dry, well-ventilated location. Keep away from heat, sparks, and flame. Avoid contact with eyes. Keep container closed. Use with adequate ventilation. Ground container when transferring.

Other Precautions: Vapors may collect in containers. Treat empty containers as hazardous. Sudden release of hot organic chemical vapors/mists from process equipment operating at elevated temperatures may result in ignition with out the presence of obvious ignition sources.

8. Exposure Controls/Personal Protection

Ventilation Requirements: Good general ventilation is sufficient

Personal Protective Equipment: Use self-contained breathing apparatus in high vapor concentration.

WARNING: Air purifying respirators do not protect workers in oxygen-deficient atmospheres.

Skin Protection: impervious clothing including boots, gloves, lab coat, apron, or coveralls as appropriate

Eye Protection: safety glasses and/or full face shield where splashing is possible

Other Protective Equipment: eyewash, safety shower

Work Hygienic Practices: wash thoroughly after handling

9. Physical and Chemical Properties

Boiling Point: 173°F

Vapor Pressure (mm Hg): 44.6 @ 68°

Evaporation rate: 3.3

Vapor Density (Air=1): 1.6

Solubility in Water: Completely

Appearance and Odor: Clear and Colorless

Specific Gravity: @ 60°F: 0.7936 - 0.7962

10. Stability and Reactivity

Stability: Stable under normal conditions

Condition to Avoid: Heat, sparks, open flame.

Incompatibility (Materials to Avoid): Oxidizing materials can cause vigorous reaction

Hazardous Decomposition: None. However as with any other organic material, combustion will product Carbon Dioxide and possibly Carbon Monoxide

Hazardous Polymerization: Will not occur.

11. Toxicological Information

Overexposure maybe fatal if swallowed. Harmful if inhaled or absorbed through the skin. Causes skin, eye and upper respiratory track infection. Can cause central nervous system depression.

Chronic Effects: Damage to liver, heart and kidneys.

12. Ecological Information

N/A

13. Disposal Considerations

Vapors may collect in empty containers. Treat empty containers as hazardous. Ensure compliance with federal, state and local regulations.

14. Transport Information

Domestic (Land, D.O.T.)

Proper Shipping Name: Ethanol (Denatured Alcohol)

Hazard Class: 3 (Flammable Liquid)

UN/NA: UN1170

Packing Group: II

Emergency Response Guide #127

15. Regulatory Information

SARA 145

16. Other Information

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