



SAFETY DATA SHEET

1. Product and Company Identification

Product Name	Copper nitrate solution, 0.1M
Product Number	CU0AS01
Product Use	Calibration Solution
Manufacturer	Van London pHoenix Company
Address	10540 Rockley Road, Houston, Texas 77099
Telephone	832-456-6641
Emergency Phone	832-456-6641

2. Hazards Identification

Emergency Overview

OSHA Hazards

No known OSHA hazards

Not a dangerous substance or mixture according to the Globally Harmonised System (GHS).

HMIS Classification

Health Hazard: 2

Flammability: 1

Physical Hazards: 0

NFPA Rating

Health Hazard: 2

Fire: 1

Reactivity Hazard: 0

Potential Health Effects

Inhalation: May be harmful if inhaled. May cause respiratory tract irritation.

Skin: May cause skin irritation.

Eyes: May cause eye irritation.

Ingestion: Large amounts taken internally may be harmful.

3. Composition/Information on Ingredients

Component	CAS Number	Weight %
Cupric nitrate	3251-23-8	2
Water	7732-18-5	98

4. First Aid Measures

Eye	Wash eyes with water for 15 minutes.
Skin	Wash off with soap and plenty of water.
Inhalation	If breathed in, move person into fresh air. If not breathing, give artificial respiration.
Ingestion	Induce vomiting. Consult a physician

5. Fire Fighting Measures

Suitable

extinguishing media Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Hazardous**combustion products** No data available**Special****protective****equipment for firefighters** Wear self contained breathing apparatus for fire fighting if necessary.**6. Accidental Release Measures****Personal precautions**

Avoid breathing vapors, mist or gas. Ensure adequate ventilation.

Environmental precautions

Do not let product enter drains.

Methods and materials for containment and cleaning up

Soak up with inert absorbent material. Keep in suitable, closed containers for disposal.

7. Handling and Storage**Handling** Avoid contact with skin and eyes. Do not breathe vapors or mists.**Storage** Keep container tightly closed and upright in a dry and well-ventilated place. Store at ambient or lower temperature. Protect against physical damage.**8. Exposure Controls and Personal Protection****Exposure Limits** Contains no substances listed under the OSHA threshold limit.**Engineering Controls** Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of the workday.**Personal Protective Equipment** **Respiratory Protection** Respiratory protection not required. For nuisance exposures use type OV/AG (US) or type ABEK (EU EN 14387) respirator cartridges. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).**Hand Protection** Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.**Eye Protection** Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166 (EU).**Skin and body protection** Impervious clothing. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.**Hygiene measures** General industrial hygiene practice.**9. Physical and Chemical Properties****Appearance** Colorless Liquid**Odor** No data available**Odor Threshold** No data available**pH** 3.5 - 7.5**Freezing Point** 0.0 °C (32.0°F)**Boiling Point** 100.0°C (212.0°F)**Flash Point** No data available

Evaporation rate	No data available
Flammability	No data available
Lower explosion limit	No data available
Upper explosion limit	No data available
Vapor pressure	No data available
Solubility	Completely miscible with water
Vapor density	No data available
Relative density	1.00 g/cm ³
Partition coefficient:	
n-octanol/water	No data available
Auto-Ignition temperature	No data available
Decomposition temperature	No data available
Viscosity	No data available

10. Stability and Reactivity

Chemical Stability	Stable under recommended storage conditions.
Possibility of Hazardous reactions	No data available
Conditions to avoid	No data available
Materials to avoid	Reducing agents, charcoal, B, BaS, acetic anhydride, Trichloroethylene
Hazardous decomposition products	Oxides of nitrogen upon heating to decomposition.

11. Toxicological Information

Signs and Symptoms of Overexposure	To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.
Acute Effects	
Eye Contact	No data available
Skin Contact	No data available
Inhalation	No data available
Ingestion	No data available
Germ Cell Mutagenicity	No data available
Target Organ Effects	No data available
Chronic Effects	No data available
Medical Conditions	
Aggravated by Exposure	No data available
Acute Toxicity Values	
Oral LD50	No data available
Inhalation LC50	No data available
Dermal LD50	No data available
Carcinogenicity	
IARC	No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.
NTP	No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.
OSHA	No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.
Reproductive Toxicity	No data available
Teratogenicity	No data available

**Specific target organ toxicity - No data available
single exposure**

**Specific target organ toxicity - No data available
repeated exposure**

Aspiration Hazard		No data available
Potential Inhalation		No data available
Health Ingestion		No data available
Effects Skin		No data available
	Eyes	No data available

12. Ecological Information

Ecotoxicity	No data available
Persistence & degradability	No data available
Bioaccumulative potential	No data available
Mobility in soil	No data available
Other adverse effects	No data available

13. Disposal Considerations

Disposal method	Contact a licensed professional waste disposal service.
Contaminated packaging	Dispose of as unused product.

14. Transport Information

DOT (US)	Not dangerous goods.
IMDG	Not dangerous goods.
IATA	Not dangerous goods.

15. Regulatory Information

OSHA Hazards	No known OSHA Hazards.
SARA 302 Components	No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302. This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.
SARA 313 Components	
SARA 311/312 Hazards	Acute Health Hazard
Massachusetts Right To Know Components	No components are subject to the Massachusetts Right to Know Act.
Pennsylvania Right To Know Components	

	CAS-No.	Revision Date
Water	7732-18-5	
Cupric nitrate	3251-23-8	

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California Prop. 65 Components
This product does not contain any chemicals known to the State of California to cause cancer, birth defects, or any other reproductive harm.

16. Other Information

Issuing Date	12/16/2015
Revision No.	1.1

Disclaimer

The information contained herein is accurate to the best of our knowledge, but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Van London pHOenix Company makes no warranty of any kind, expressed, or implied, concerning the safe use of this material in your process or in combination with other substances. Van London pHOenix Company shall not be held liable for any damage resulting from handling or from contact with the above product.