RICCA CHEMICAL COMPANY®

Safety Data Sheet

Classified According to OSHA Hazard Communication Standard (HCS 2024)

SECTION 1: Identification

1.1. Product Identifier

Trade Name or Designation Phenol, Liquefied, Reagent Grade

Product Number RSOP0150

Other Identifying Product Numbers RSOP0150-100C, RSOP0150-500C

1.2. Recommended Use and Restrictions on Use

General Laboratory Reagent

1.3. Details of the Supplier of the Safety Data Sheet

Company Ricca Chemical Company

Address 412 West Fork Drive

Arlington, TX 76012 USA

Telephone 888-467-4222

1.4. Emergency Telephone Number (24 hours)

CHEMTREC (USA)	800-424-9300
CHEMTREC (International)	1+ 703-527-3887

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SECTION 2: Hazard(s) Identification

2.1. Classification of the Substance or Mixture

Hazard Class	Category	Hazard Statements	Precautionary Statements
Acute Toxicity - Oral	Category 3	H301	P264,P270,P301+P310,P321,P330, P405,P501
Acute Toxicity - Dermal	Category 3	H311	P280,P302+P352,P312,P321, P361+P364,P405,P501
Acute Toxicity - Inhalation (Vapors)	Category 1	H330	P260,P271,P284,P304+P340,P310, P320,P403+P233,P405,P501
Skin Corrosion / Irritation	Category 1	H314	P260,P264,P280,P301+P330+P331, P303+P361+P353,P363,P304+P340, P310,P321,P305+P351+P338,P405, P501
Serious Eye Damage / Eye Irritation	Category 1	H318	P280,P305+P351+P338,P310
Specific Target Organ Toxicity - Single Exposure	Category 1	H370	P260,P264,P270,P308+P311, P321,P405,P501
Specific Target Organ Toxicity - Repeated Exposure	Category 2	H373	P260,P314,P501

2.2. GHS Label Elements

Pictograms:

Signal Word: **Danger**

Hazard Statements:

NOTE: Hazard statements may be combined on labels to improve clarity and readability.

Hazard Number	Hazard Statement
H301+H311	Toxic if swallowed or in contact with skin
H314	Causes severe skin burns and eye damage
H330	Fatal if inhaled
H370	Causes damage to eyes, kidneys, liver
H373	May cause damage to central nervous system through prolonged or repeated exposure

Precautionary Statements:

NOTE: Precautionary statements may be combined or consolidated on labels to improve clarity and readability.

Prevention

Precautionary Number	Precautionary Statement
P260	Do not breathe fumes or mist.
P264	Wash hands, arms, and face thoroughly after handling.
P270	Do not eat, drink or smoke when using this product.
P280	Wear protective gloves and eye protection.
P284	In case of inadequate ventilation wear respiratory protection.

Response

Precautionary Number	Precautionary Statement
P301+P310	IF SWALLOWED: Immediately call a POISON CENTER or doctor.
P303+P361+P353	IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower.
P304+P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P305+P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308+P311	If exposed or concerned: Call a poison center or doctor.
P314	Get medical advice or attention if you feel unwell.
P330	Rinse mouth.
P361+P364	Take off immediately all contaminated clothing and wash it before reuse.

Storage

Precautionary Number	Precautionary Statement
P403+P233	Store in a well-ventilated place. Keep container tightly closed.
P405	Store locked up.

Disposal

Precautionary Number	Precautionary Statement
P501	Dispose of contents/container to suitable waste stream in accordance with local, state, federal, and international regulations.

2.3. Hazards not Otherwise Classified

No other hazards identified.

2.4. Ingredients of Unknown Acute Toxicity

This product does not contain any ingredients of unknown acute toxicity.

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SECTION 3: Composition / Information on Ingredients

3.1. Components of Mixture

Chemical Name (IUPAC)	Common Name and Synonyms	CAS Number	Weight%
hydroxybenzene	Phenol; carbolic acid	108-95-2	89.00
water	Water	7732-18-5	11.00

SECTION 4: First-Aid Measures

4.1. Description of Necessary Measures

Eye Contact: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Corrosive! Causes irritation and burns. Can cause burns that may lead to permanent impairment of vision, including blindness.

Ingestion: IF SWALLOWED: Immediately call a POISON CENTER or doctor. Unless otherwise advised, give 15 - 30 mL of vegetable oil and induce vomiting. Call a physician.

Inhalation: IF INHALED: Remove person to fresh air and keep comfortable for breathing.

Skin Contact: IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower. Corrosive. Rapidly absorbed through skin causing systemic poisoning. May cause white, wrinkled discoloration and burns, which may be painless due to local anesthetic effect.

4.2. Most Important Symptoms and Effects, Acute and Delayed

May cause damage to central nervous system through prolonged or repeated exposure EYE CONTACT: Corrosive! Causes irritation and burns. Can cause burns that may lead to permanent impairment of vision, including blindness. SKIN CONTACT: Corrosive. Rapidly absorbed through skin causing systemic poisoning. May cause white, wrinkled discoloration and burns, which may be painless due to local anesthetic effect.

4.3. Immediate Medical Attention or Special Treatment Needed

Irrigate immediately with large quantity of water for at least 15 minutes. Get medical attention immediately. Remove to fresh air. Give artificial respiration if necessary. If breathing is difficult, give oxygen. Immediately flush skin with large amounts of water for at least 30 minutes. As soon as possible, repeatedly apply polyethylene glycol to affected area. Continue treatment until the burned area changes from white to pink; this may take a long time. Get medical attention immediately. Unless otherwise advised, give 15 - 30 mL of vegetable oil and induce vomiting. Call a physician.

SECTION 5: Fire-Fighting Measures

5.1. Extinguishing Media

Water, dry chemical, foam, or carbon dioxide. Water spray may be used to keep fire-exposed containers cool.

5.2. Specific Hazards Arising from the Substance or Mixture in a Fire

Combustible solid.

5.3. Special Protective Equipment and Precautions for Firefighters

Wear special protective clothing and positive pressure self-contained breathing apparatus. Viton or Saranex barrier recommended.

SECTION 6: Accidental Release Measures

6.1. Personal Precautions, Protective Equipment and Emergency Procedures

Wear protective gloves and eye protection.

6.2. Cleanup and Containment Methods and Materials

Control runoff and isolate discharged material for proper disposal. Approach release from upwind.

SECTION 7: Handling and Storage

7.1. Precautions for Safe Handling and Storage Conditions

Store in a well-ventilated place. Keep container tightly closed. Store locked up. As with all chemicals, wash hands thoroughly after handling. Avoid contact with eyes and skin. Protect from freezing and physical damage. Store in a tightly closed container in a cool, dry, well ventilated area, out of direct sunlight and away from heat, ignition sources, and incompatible materials. Containers may be hazardous when empty since they retain prodcut residues.

SECTION 8: Exposure Controls / Personal Protection

8.1. Exposure Limits

U.S. OSHA - Permissible Exposure Limits (PEL) - Time Weighted Averages (TWA)

Chemical Name	CAS Number	Exposure Limit
Phenol	108-95-2	5 ppm TWA; 19 mg/m3 TWA

U.S. OSHA - Permissible Exposure Limits (PEL) - Ceiling Limits

No limits found.

U.S. OSHA - Permissible Exposure Limits (PEL) - Short Term Exposure Limits (STEL)

No limits found.

U.S. OSHA - Specifically Regulated Chemicals

No limits found.

ACGIH - Threshold Limit Values - Ceilings (TLV-C)

No limits found.

ACGIH - Threshold Limit Values - Short Term Exposure Limits (TLV-STEL)

No limits found.

ACGIH - Threshold Limit Values - Time Weighted Averages (TLV-TWA)

Chemical Name	CAS Number	Exposure Limit
Phenol	108-95-2	5 ppm TWA

8.2. Engineering Controls

A system of local and/or general exhaust is recommended to keep employee exposures below the Airborne Exposure Limit.

8.3. Individual Protective Measures and Personal Protective Equipment

Respiratory Protection: Normal room ventilation is adequate. If the exposure limit is exceeded, a full facepiece respirator with organic vapor cartridge may be worn.

Skin Protection: Chemical resistant gloves.

Eye Protection: Safety glasses or goggles.

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SECTION 9: Physical and Chemical Properties

9.1. Basic Physical and Chemical Properties

Physical State:	liquid
Color:	Colorless to slightly pink
Odor:	Data not available.
Odor Threshold:	Data not available.
Melting/Freezing Point:	Data not available.
Boiling Point/Range:	182°C
Flammability:	Data not available.
Flammability/Explosive Limits:	8.6% (v/v)
Flash Point:	Not flammable
Auto-Ignition Temperature:	Data not available.
Decomposition Temperature:	Data not available.
pH:	Data not available.
Kinematic Viscosity:	Data not available.
Solubility:	miscible
Vapor Pressure:	Data not available.
Evaporation Rate:	Data not available.
Relative Density:	1.06
Relative Vapor Density:	Data not available.
Particle Characteristics:	Data not available.
Partition Coefficient n-octanol/water, log	Data not available.

SECTION 10: Stability and Reactivity

10.1. Reactivity and Chemical Stability

Stable under normal conditions of use and storage. Heat, light and long standing contribute to instability.

10.2. Possibility of Hazardous Reactions

Data not available.

10.3. Conditions to Avoid and Incompatible Materials

Oxidizers, aluminum chloride and nitrobenzene, calcium hypochlorite, butadiene, halogens, formaldehyde, acids, isocyanates, sodium nitrite and many other materials.

10.4. Hazardous Decomposition Products

Will not occur.

SECTION 11: Toxicological Information

11.1. Information on Toxicological Effects

Acute Toxicity - Oral Exposure:

Oral acute toxicity estimate (ATE): 112 mg/kg(calculated)

Chemical Name	CAS Number	Toxicity
Phenol	108-95-2	Oral LD50 Acute Toxicity Estimate 100 mg/kg (Source: ECHA)

Acute Toxicity - Dermal Exposure:

Dermal acute toxicity estimate (ATE): 707 mg/kg(calculated)

Chemical Name	CAS Number	Toxicity
Phenol	108-95-2	Dermal LD50 Rabbit 630 mg/kg (Source: NLM_CIP)

Acute Toxicity - Inhalation Exposure:

Inhalation acute toxicity estimate (ATE, vapor): 0.0562 mg/L, 4 h(calculated)

Chemical Name	CAS Number	Toxicity
Phenol	108-95-2	Inhalation LC50 Acute Toxicity Estimate 0.05 mg/L 4h (Source: Canada_WHMIS)

11.2 Carcinogenicity:

International Agency for Research on Cancer (IARC)

Chemical Name	CAS Number	Classification
Phenol	108-95-2	Group 3 (Not Classified) - Monograph 71 [1999]; Monograph 47 [1989]

National Toxicology Program (NTP)

Chemical Name	CAS Number	Classification
Phenol	108-95-2	Male Rat - No Evidence; Female Rat - No Evidence; Male Mice - No Evidence; Female Mice - No Evidence (TR-203)

U.S. OSHA specifically regulated carcinogens

Chemical Name	CAS Number	Classification
	No data found.	

11.3 Additional Toxicology Information:

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Toxic if swallowed or in contact with skin. Causes severe skin burns and eye damage. Fatal if inhaled. Causes damage to eyes, kidneys, liver. May cause damage to central nervous system through prolonged or repeated exposure.

SECTION 12: Ecological Information

12.1. Ecotoxicity

Chemical Name	CAS Number	Species	Exposure	Toxicity
Phenol	108-95-2	Earthworm	Acute	LC100 56 Days Eisenia foetida 6900 mg/kg [soil dry weight] (IUCLID)
Phenol	108-95-2	Freshwater Algae	Acute	EC50 96 h Pseudokirchneriella subcapitata 46.42 mg/L (EPA); EC50 96 h Pseudokirchneriella subcapitata 0.0188 - 0.1044 mg/L [static] (EPA); EC50 72 h Desmodesmus subspicatus 187 - 279 mg/L [static] (EPA)
Phenol	108-95-2	Freshwater Fish	Acute	LC50 96 h Pimephales promelas 11.9 - 50.5 mg/L [flow-through] (EPA); LC50 96 h Pimephales promelas 20.5 - 25.6 mg/L [static] (EPA); LC50 96 h Pimephales promelas 32 mg/L (IUCLID); LC50 96 h Oncorhynchus mykiss 5.449 - 6.789 mg/L [flow-through] (EPA); LC50 96 h Oncorhynchus mykiss 7.5 - 14 mg/L [static] (EPA); LC50 96 h Oncorhynchus mykiss 4.23 - 7.49 mg/L [semi-static] (EPA); LC50 96 h Oncorhynchus mykiss 5.0 - 12.0 mg/L (IUCLID); LC50 96 h Lepomis macrochirus 13.5 mg/L [static] (EPA); LC50 96 h Lepomis macrochirus 11.9 - 25.3 mg/L [flow-through] (EPA); LC50 96 h Lepomis macrochirus 11.5 mg/L [semi-static] (EPA); LC50 96 h Poecilia reticulata 34.09 - 47.64 mg/L [static] (EPA); LC50 96 h Poecilia reticulata 31 mg/L [semi-static] (EPA); LC50 96 h Brachydanio rerio 27.8 mg/L (IUCLID); LC50 96 h Cyprinus carpio 0.00175 mg/L [semi-static] (EPA); LC50 96 h Oryzias latipes 33.9 - 43.3 mg/L [flow-through] (EPA); LC50 96 h Oryzias latipes 23.4 - 36.6 mg/L [static] (EPA)
Phenol	108-95-2	Water Flea	Acute	EC50 48 h Daphnia magna 4.24 - 10.7 mg/L [Static] (EPA); EC50 48 h Daphnia magna 10.2 - 15.5 mg/L (EPA)

12.2. Persistence and Degradability

Data not available.

12.3. Bioaccumulative Potential

Data not available.

12.4. Mobility in soil

Data not available.

12.5. Other Adverse Ecological Effects

Data not available.

SECTION 13: Disposal Considerations

13.1. Waste Treatment Methods

Data not available.

SECTION 14: Transportation Information

14.1 Transportation by Land - Department of Transportation (DOT, United States of America)

Sizes: 100 mL, 500 mL

UN Number: UN2821

Proper Shipping Name: Phenol solutions

Hazard Class: 6.1

Packing Group: II

Hazard Label(s):

14.2 Transportation by Air - International Air Transport Association (IATA)

Sizes: 100 mL, 500 mL

UN Number: UN2821

Proper Shipping Name: Phenol solution

Hazard Class: 6.1

Packing Group: II

Hazard Label(s):

14.3 Transportation of Dangerous Goods (TDG, Canada)

Sizes: 100 mL, 500 mL

UN Number: UN2821

Proper Shipping Name: PHENOL SOLUTIONS

Hazard Class: 6.1

Packing Group: II

Hazard Label(s):

SECTION 15: Regulatory Information

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15.01. Occupational Safety and Health Administration (OSHA) Hazards

Chemical Name	CAS Number	Regulatory Information
		No data found.

15.02. Superfund Amendments and Reauthorization Act (SARA) 302 Extremely Hazardous Substances

Chemical Name	CAS Number	RQ	TPQ
Phenol	108-95-2	500 lb lower TPQ; 10000 lb upper TPQ	1000 lb EPCRA RQ

15.03. Superfund Amendments and Reauthorization Act (SARA) 311/312 Hazardous Chemicals

Chemical Name	CAS Number	Regulatory Information
Phenol	108-95-2	1000 lb final RQ; 454 kg final RQ

15.04. Superfund Amendments and Reauthorization Act (SARA) 313 Toxics Release Inventory (TRI)

Chemical Name	CAS Number	List	Regulatory Information
Phenol	108-95-2	Emission Reporting	1.0 % de minimis concentration

15.05. Massachusetts Right-to-Know Substance List

Chemical Name	CAS Number	Regulatory Information
Phenol	108-95-2	Extraordinarily hazardous

15.06. Pennsylvania Right-to-Know Hazardous Substances

Chemical Name	CAS Number	Regulatory Information
Phenol	108-95-2	Environmental hazard

15.07. New Jersey Worker and Community Right-to-Know Components

Chemical Name	CAS Number	Regulatory Information
Phenol	108-95-2	sn 1487

15.08. California Proposition 65

Chemical Name	CAS Number	Regulatory Information
		No data found.

15.09. Canada Domestic Substances List / Non-Domestic Substances List (DSL/NDSL)

Chemical Name	CAS Number	List	Status
Phenol	108-95-2	DSL	Present
Water	7732-18-5	DSL	Present

15.10. United States of America Toxic Substances Control Act (TSCA) List

Chemical Name	CAS Number	Status
Phenol	108-95-2	Present (ACTIVE)
Water	7732-18-5	Present [XU] (ACTIVE)

15.11. European Inventory of Existing Commercial Chemical Substances (EINECS), European List of Notified Chemical Substances (ELINCS), and No Longer Polymers (NLP)

Chemical Name	CAS Number	List	Number
Phenol	108-95-2	EINECS	203-632-7
Water	7732-18-5	EINECS	231-791-2

15.12. China - Inventory of Existing chemical Substances (IECSC)

Chemical Name	CAS Number	Status
Phenol	108-95-2	Present [02171]
Water	7732-18-5	Present [32224]

15.13. Korea - Existing Chemicals Inventory (KECI/KECL)

Chemical Name	CAS Number	List	Status
Phenol	108-95-2	Annex 1	Present [KE-28209]
Water	7732-18-5	Annex 1	Present [KE-35400]

15.14. Japan - Existing and New Chemical Substances Inventory (ENCS)

Chemical Name	CAS Number	MITI No.
Phenol	108-95-2	(3)-481
Water	7732-18-5	- (listed on Japanese Pharmacopoeia 8th Edition)

SECTION 16: Other Information

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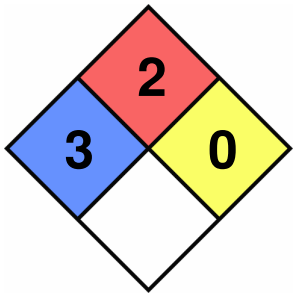
16.1 National Fire Protection Associate (NFPA) Rating

Health:	3
Flammability:	2
Reactivity	0
Special Hazard:	



16.2 Document Revision

Last Revision Date:
2026-05-23

DISCLAIMER

When handled properly by qualified personnel, the product described herein does not present a significant health or safety hazard. Alteration of its characteristics by concentration, evaporation, addition of other substances, or other means may present hazards not specifically addressed herein and which must be evaluated by the user. The information furnished herein is believed to be accurate and represents the best data currently available to us. No warranty, expressed or implied, is made and RICCA CHEMICAL COMPANY assumes no legal responsibility or liability whatsoever resulting from its use.