

Safety Data Sheet

Hydroquinone Crystals

Section 1 - Chemical Product and Company Identification

SDS Name: Hydroquinone Crystals

Catalog Numbers: K-697-3

Company Identification: Transene Company, Inc., DBA ROWLEY BIOCHEMICAL, Inc.
10 ELECTRONICS AVENUE
DANVERS, MA 01923

For information, call: 978-739-4883

Emergency Number: 800-424-9300

For CHEMTREC assistance, call: 800-424-9300

Section 2 - Hazards Identification

GHS Classifications

H302-Acute toxicity, oral: 4

H317-Sensitisation, skin: 1

H318-Serious eye damage/eye irritation: 1

H335-Specific target organ toxicity, single exposure; Respiratory tract irritation: 3

H341-Germ cell mutagenicity: 2

H351-Carcinogenicity: 2

H400-Hazardous to the aquatic environment, acute hazard: 1

H410-Hazardous to the aquatic environment, long-term hazard: 1

Consists of unknown acute inhalation toxicity.

Pictograms or Hazard symbols and Hazard statement(s):



Signal Word: Danger

Hazard Statements:

H302-Harmful if swallowed

H317-May cause an allergic skin reaction

H318-Causes serious eye damage

H335-May cause respiratory irritation
H341-Suspected of causing genetic defects
H351-Suspected of causing cancer
H400-Very toxic to aquatic life
H410-Very toxic to aquatic life with long lasting effects

Precautionary Statements:

P201-Obtain special instructions before use.
P202-Do not handle until all safety precautions have been read and understood.
P261-Avoid breathing dust/fume/gas/mist/vapours/spray.
P264-Wash thoroughly after handling.
P270-Do not eat, drink, or smoke when using this product.
P271-Use only outdoors or in a well-ventilated area.
P272-Contaminated work clothing should not be allowed out of the workplace.
P273-Avoid release to the environment.
P280-Wear protective gloves/protective clothing/eye protection/face protection.
P301+P312-If swallowed: Call a Poison Center/doctor if you feel unwell.
P302+P352-If on skin: Wash with plenty of soap and water.
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+P313-If exposed or concerned: Get medical advice/attention.
P310-Immediately call a Poison Center/doctor.
P312-Call a Poison Center/doctor if you feel unwell.
P330-Rinse mouth.
P333+P313-If skin irritation or rash occurs: Get medical advice/attention.
P362+P364-Take off contaminated clothing and wash it before reuse.
P391-Collect spillage.
P403+P233-Store in a well-ventilated place. Keep container tightly closed.
P405-Store locked up.
P501-Dispose of contents/container in accordance with local/regional/national/international regulations.

Section 3 - Composition, Information on Ingredients

CAS#	Chemical Name	Percent
123-31-9	Hydroquinone Crystals	≤100

Section 4 - First Aid Measures

Eye Exposure: In case of contact with eyes, flush with copious amounts of water for at least 15 minutes. Assure adequate flushing by separating the eyelids with fingers. Get immediate medical attention.

Dermal Exposure: In case of skin contact, flush with copious amounts of water for at least 15 minutes. Remove contaminated clothing and shoes. Get medical attention.

Oral Exposure: If swallowed, get immediate medical advice. Rinse mouth with water and drink small quantities of water (stop if the exposed person feels sick as vomiting may be dangerous).

Inhalation Exposure: If inhaled, remove to fresh air. If breathing becomes difficult, call a physician.

Section 5 - Fire Fighting Measures

General Information: As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear. During a fire, irritating gases may be generated by thermal decomposition or combustion.

Extinguishing Media: Use dry chemical, carbon dioxide, dry sand, water spray or alcohol-resistant foam.

Hazardous Combustion Products: Carbon oxides, irritating and potentially hazardous fumes and gases.

Flash Point: 165°C (329°F) at ca.1013 hPa Closed Cup

Autoignition Temperature: 515.56°C (960.01°F) at 1013 hPa

Explosion Limits, Lower: Not available

Upper: Not available

NFPA Rating: (estimated) Health: 2; Flammability: 1; Instability: 1

Note: Finely dispersed particles may form explosive mixtures in air.

Section 6 - Accidental Release Measures

Procedure(s) of Personal Precaution(s):

Wear personal protective equipment. Do not ingest or inhale. Do not get on skin or clothing. Do not get in eyes. Ensure adequate ventilation. Avoid dust formation.

Methods for Cleaning up: Carefully sweep up and containerize for proper disposal. Avoid generating dusty conditions. Do not release to the environment. Do not release to drains.

Section 7 - Handling and Storage

Use care when handling. Wear personal protective equipment. Wash thoroughly after handling. Ensure adequate ventilation. Do not ingest or inhale. Do not get on skin or clothing. Do not get in eyes. Minimize dust generation and accumulation. Keep in a tightly closed container. Store in a cool, dry, and well-ventilated area. Protect from heat. Air and light sensitive. Keep away from incompatible materials.

Section 8 - Exposure Controls, Personal Protection

Engineering Controls: Use explosion-proof ventilation equipment. Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use adequate general or local exhaust ventilation to keep airborne concentrations below the permissible exposure limits.

Personal Protective Equipment

Eyes: Wear appropriate protective eyeglasses or chemical safety goggles as described by OSHA's eye and face protection regulations in 29 CFR 1910.133 or European Standard EN166.

Skin: Wear appropriate protective gloves to prevent skin exposure.

Clothing: Wear appropriate protective clothing to prevent skin exposure.

Respirators: A respiratory protection program that meets OSHA's 29 CFR 1910.134 and ANSI Z88.2 requirements or European Standard EN 149 must be followed whenever workplace conditions warrant a respirator's use.

Exposure Limits:

Chemical Name	ACGIH - TLV	NIOSH - IDLH	OSHA - Final PELs
Hydroquinone CAS#123-31-9	1 mg/m ³ TWA	2 mg/m ³ Ceiling 50 mg/m ³ IDLH	2 mg/m ³ TWA

OSHA Vacated PELs: Hydroquinone: 2 mg/m³ TWA

Section 9 - Physical and Chemical Properties

Physical State: Crystalline

Appearance: Off-white

Odor: Odorless

Vapor Pressure: 1 hPa at 132°C (270°F)

Odor Threshold: Not available

Vapor Density: 3.80 (Air=1.0)

pH: Approx. 3.7 at 70 g/L aqueous solution

Relative Density: Not available

Melting point/freezing point: 172-175°C (342-347°F)

Solubility: Soluble in water

Boiling Point: 285°C (545°F)

Flash Point: 165°C (329°F) at ca.1013 hPa Closed Cup

Evaporation Rate: Not available

Flammability (solid, gas): Not available

Partition coefficient: n-octanol/water: log Pow: 0.59 at 20-25°C (68-77°F)

Autoignition Temperature: 515.56°C (960.01°F) at 1013 hPa

Decomposition Temperature: Not available

Viscosity: Not applicable

Specific Gravity/Density: 1.320

Section 10 - Stability and Reactivity

Chemical Stability: Stable under normal temperatures and pressures. Air and light sensitive.

Conditions to Avoid: Incompatible materials, ignition sources, excess heat. Exposure to air and light. Avoid dust formation.

Incompatibilities with Other Materials: Strong oxidizing agents, strong bases, strong acids.

Hazardous Decomposition Products: Carbon oxides, irritating and potentially hazardous fumes and gases.

Section 11 - Toxicological Information

CAS#123-31-9 Hydroquinone: RTECS#: MX350000

LD50 Oral: 302 mg/kg (rat)

LD50 Dermal: 74800 mg/kg (rat)

LC50 Inhalation: Not available

Carcinogenicity: Hydroquinone CAS#123-31-9 is not listed by IARC, NTP, OSHA, or California Prop. 65. Hydroquinone is listed by ACGIH (A3, Animal Carcinogen).

Information on the likely routes of exposure: Routes of entry anticipated: oral, dermal, inhalation, and eye.

Epidemiology: Not available.

Teratogenicity: Not available.

Reproductive Effects: Experiments have shown reproductive toxicity effects on laboratory animals.

Developmental Effects: Not available.

Neurotoxicity: Not available.

Mutagenicity: Suspected of causing genetic defects.

Specific Target Organ Toxicity, Single Exposure: Respiratory system and central nervous system.

Specific Target Organ Toxicity, Repeated Exposure: Not available.

Symptoms associated with exposure: Skin contact may cause sensitization. Skin contact may cause dermatitis and/or depigmentation. May cause an allergic skin reaction. Symptoms of an allergic reaction may include rash, irritation, redness, itching, hives, swelling, burning sensation, trouble breathing, tingling of the hands/feet, dizziness, chest pain, muscle pain. Eye contact may cause serious eye damage, redness, tearing, possible blindness. Ingestion may cause nausea vomiting diarrhea, liver irregularities. May cause respiratory irritation. Suspected of causing cancer. Suspected of causing genetic defects. Absorption into the body may cause kidney and liver damage. Onset may be delayed.

The toxicological properties of this material have not been thoroughly investigated.

Section 12 - Ecological Information

Ecotoxicity: Do not release to the environment. Do not release to drains. Very toxic to aquatic life.

CAS#123-31-9 Hydroquinone:

LC50, freshwater fish: 0.638 mg/L 96h flow-through (oncorhynchus mykiss)(rainbow trout)

EC50, water flea: 0.134 mg/L 48h semi-static (daphnia magna)

ErC50, algae: 0.33 mg/L 72h static (pseudokirchneriella subcapitata)(green algae)

Persistence and degradability: Persistence is unlikely based on available information.

Bio-accumulative potential: Bioaccumulation is not expected.

Mobility: Will likely be mobile in the environment due to its water solubility.

Section 13 - Disposal Considerations

DISPOSAL: Dispose of in accordance with all federal, state, and local regulations.

Section 14 - Transport Information

DOT

UN3077

Environmentally hazardous substance, solid, N.O.S. (Hydroquinone)

PG III

Hazard class 9

Section 15 - Regulatory Information

Canada Regulatory Information

WHMIS Classification: This product has been classified in accordance with the hazard criteria of the CPR, and the SDS contains all the information required by the CPR.

Section 16 - Additional Information

SDS Creation Date: 9-16-22

Revision #1: 6-11-24

The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall Rowley Biochemical, Inc. be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential, or exemplary damages, howsoever arising, even if Rowley Biochemical, Inc. has been advised of the possibility of such damages.