

Ethylene Glycol Safety Data Sheet (SDS)

SECTION 1 — CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Ethylene Glycol

Flinn Scientific, Inc. P.O. Box 219, Batavia, IL 60510 (800) 452-1261

Chemtrec Emergency Phone Number: (800) 424-9762

Signal Word

WARNING

SECTION 2 — HAZARDS IDENTIFICATION

Hazard class: Acute toxicity, oral (Category 4). Harmful if swallowed (H302).

Pictograms



SECTION 3 — COMPOSITION, INFORMATION ON INGREDIENTS

Component Name	CAS Number	Formula	Formula Weight	Concentration
Ethylene glycol	107-21-1	HOCH ₂ CH ₂ OH	62.07	

Synonyms: 1,2 Ethanediol

SECTION 4 — FIRST AID MEASURES

Call a POISON CENTER or physician if you feel unwell (P312).

If inhaled: Call a POISON CENTER or physician if you feel unwell (P304+P312).

If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do so. Continue rinsing (P305+P351+P338). **If eye irritation persists eyes:** Get medical advice or attention (P337+P313).

If on skin: Wash with plenty of water.

If swallowed: Rinse mouth. Call a POISON CENTER or physician if you feel unwell.

SECTION 5 — FIRE FIGHTING MEASURES

Class IIIB combustible liquid.

Flash point: 111 °C Flammable limits: Lower: 3.2% Upper: 15.3% Autoignition Temperature: 398 °C

When heated to decomposition, may emit toxic fumes.

In case of fire: Use a tri-class dry chemical fire extinguisher.

NFPA Code

H-1

F-1

R-0

SECTION 6 — ACCIDENTAL RELEASE MEASURES

Ventilate area. Contain the spill with sand or absorbent material and deposit in a sealed bag or container.

See Sections 8 and 13 for further information.

SECTION 7 — HANDLING AND STORAGE

Flinn Suggested Chemical Storage Pattern: Organic #2. Store with alcohols, glycols, amines and amides.

Hygroscopic. Store in a Flinn Chem-Saf™ bag.

SECTION 8 — EXPOSURE CONTROLS, PERSONAL PROTECTION

Wear protective gloves, protective clothing, and eye protection (P280). Wash hands thoroughly after handling (P264).

Exposure Guidelines: Ceiling (as aerosol) 100 mg/m³ (ACGIH)

SECTION 9 — PHYSICAL AND CHEMICAL PROPERTIES

Viscous, colorless liquid. Sweet antifreeze-like odor.

Soluble: Water, alcohol, and acetone

Vapor pressure: 0.06 mm Hg

Vapor density: 2.1

Boiling point: 197 °C

Melting point: -13 °C

Refractive index: 1.4318

Specific gravity: 1.1135

SECTION 10 — STABILITY AND REACTIVITY

Avoid contact with strong oxidizers, strong bases, heat, open flame, or any source of ignition.

Shelf life: Fair, hygroscopic. See Section 7 for further information.

SECTION 11 — TOXICOLOGICAL INFORMATION

Route of entry: inhalation, ingestion, skin and eye contact

Acute effects: Toxic, irritant, nausea, headache, vomiting.

Chronic effects: Reproductive hazard.

Target organs: Liver, kidneys, central nervous system.

ORL-CAT LD₅₀: 1650 mg/kg

IHL-RAT LC₅₀: N.A.

SKN-RBT LD₅₀: 9530 mg/kg

SECTION 12 — ECOLOGICAL INFORMATION

Data not yet available.

SECTION 13 — DISPOSAL CONSIDERATIONS

Please review all federal, state and local regulations that may apply before proceeding.

Flinn Suggested Disposal Method #18b is one option.

SECTION 14 — TRANSPORT INFORMATION

Shipping name: Ethylene glycol Hazard class: 9. UN number: UN3082. Packing group III

SECTION 15 — REGULATORY INFORMATION

TSCA-listed, EINECS-listed (203-473-3).

SECTION 16 — OTHER INFORMATION

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N.A. = Not available, not all health aspects of this substance have been fully investigated.

N/A = Not applicable

Consult your copy of the Flinn Science Catalog/Reference Manual for additional information about laboratory chemicals.

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