

## Safety Data Sheet (SDS)

3/17/2025: File reviewed, more current MSDS/SDS not available. CAS

### SECTION 1 — CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

#### Potassium Nitrite

Signal Word  
**DANGER**

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

Chemtrec Emergency Phone Number: (800) 424-10172

Pictograms

### SECTION 2 — HAZARDS IDENTIFICATION

Hazard class: Oxidizing solids (Category 2). May intensify fire; oxidizer (H272). Keep away from heat, sparks, open flames, and hot surfaces. No smoking (P210).

Hazard class: Acute toxicity, oral (Category 3). Toxic if swallowed (H302). Do not eat, drink or smoke when using this product (P270).



### SECTION 3 — COMPOSITION, INFORMATION ON INGREDIENTS

Component Name	CAS Number	Formula	Formula Weight	Concentration
Potassium nitrite	7758-09-0	KNO <sub>2</sub>	85.11	

### SECTION 4 — FIRST AID MEASURES

Call a POISON CENTER or physician if you feel unwell.

**If inhaled:** Remove victim to fresh air and keep at rest in a position comfortable for breathing.

**If in eyes:** Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do so. Continue rinsing.

**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

Strong oxidizer. Dangerous fire or explosion risk if shocked or heated, or in contact with organic materials. When heated to decomposition, may emit toxic fumes.

In case of fire: Use a tri-class dry chemical fire extinguisher(P370+P378).

NFPA Code  
None established

### SECTION 6 — ACCIDENTAL RELEASE MEASURES

Sweep up, place in sealed bag or container and dispose. Ventilate area and wash spill site after material pickup is

complete. See Sections 8 and 13 for further information.

---

## SECTION 7 — HANDLING AND STORAGE

---

Flinn Suggested Chemical Storage Pattern: Inorganic #3. Store with amides, nitrates, nitrites and azides. Store in a poisons cabinet.

Hygroscopic. Store in a cool, dry place within a Flinn Chem-Saf™ bag.

Keep and store away from clothing and combustible materials (P220). Take any precautions to avoid mixing with combustibles (P221).

---

## SECTION 8 — EXPOSURE CONTROLS, PERSONAL PROTECTION

---

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

---

## SECTION 9 — PHYSICAL AND CHEMICAL PROPERTIES

---

White or slightly yellow prisms or sticks. Odorless.

Melting point: 440 °C (decomposition starts at 350 °C).

Soluble: Water. Insoluble in alcohol.

Specific gravity: 1.915

---

## SECTION 10 — STABILITY AND REACTIVITY

---

Avoid contact with strong reducers, finely powdered metals, strong acids, organic materials, heat, open flame or any source of ignition.

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

---

## SECTION 11 — TOXICOLOGICAL INFORMATION

---

Acute effects: Toxic, irritant

ORL-RBT LD<sub>50</sub>: 200 mg/kg

Chronic effects: N.A.

IHL-MUS LC<sub>50</sub>: 85 g/m<sup>3</sup>/2H

Target organs: Blood, smooth muscle

SKN-RBT LD<sub>50</sub>: N.A.

---

## 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 #12b is one option.

---

## SECTION 14 — TRANSPORT INFORMATION

---

Shipping name: Potassium Nitrite; Hazard class: 5.1, Oxidizer; UN number: UN1488

---

## SECTION 15 — REGULATORY INFORMATION

---

TSCA-listed, EINECS-listed (231-832-4), RCRA code D001.

---

## SECTION 16 — OTHER INFORMATION

---

This Safety Data Sheet (SDS) is for guidance and is based upon information and tests believed to be reliable. Flinn Scientific, Inc. makes no guarantee of the accuracy or completeness of the data and shall not be liable for any damages relating thereto. The data is offered solely for your consideration, investigation, and verification. The data should not be confused with local, state, federal or insurance mandates, regulations, or requirements and CONSTITUTE NO WARRANTY. Any use of this data and information must be determined by the science instructor to be in accordance with applicable local, state or federal laws and regulations. The conditions or methods of handling, storage, use and disposal of the product(s) described are beyond the control of Flinn Scientific, Inc. and may be beyond our knowledge. FOR THIS AND OTHER REASONS, WE DO NOT ASSUME RESPONSIBILITY AND EXPRESSLY DISCLAIM LIABILITY FOR LOSS, DAMAGE OR EXPENSE ARISING OUT OF OR IN ANY WAY CONNECTED WITH THE HANDLING, STORAGE, USE OR DISPOSAL OF THIS PRODUCT(S).

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.**

**Revision Date:** March 21, 2014

---