



# NEWAY SINOPHC TECH. LIMITED

ADD:RM. 204, BUILDING 3, NO. 188, AONA RD., CHINA (SHANGHAI) PILOT FREE TRADE ZONE.  
Email:marketing01@newayphc.com; Phone:+86-021-50350029 <https://www.newayphc.com>

## Safety Data Sheet (MSDS)

(According to GB/T 16483 and GB/T 17519; Adapts to GHS, IMDG, IATA Standards)

### SECTION 1: Identification

#### 1.1 Product Identifiers

- Product Name: Potassium Formate
- Product Number: PFO-20260208
- Brand: SIGALD
- CAS-No.: 590-29-4
- Synonyms: Formic acid potassium salt

#### 1.2 Details of the supplier of the safety data sheet

- Company : NEWAY SINOPHC TECH. LIMITED
- RM. 204, BUILDING 3, NO. 188, AONA RD., CHINA (SHANGHAI)PILOT FREE TRADE ZONE.
- Telephone : +86-021-50350029
- Fax : +86-021-50350029

#### 1.3 Emergency telephone

Emergency Phone # : +86-021-50350029  
(CHEMTREC)

#### 1.4 Uses

- Identified Uses: Deicing agent, oilfield drilling fluid additive, antifreeze, leather tanning, chemical synthesis intermediate.
- Uses Advised Against: Direct oral consumption; contact with strong oxidizing agents without protection.

### SECTION 2: Hazards Identification

2.1 GHS Classification: Eye irritation (Category 2A); Skin irritation (Category 2)  
2.2 GHS Label Elements

- Hazard Pictogram: GHS07 (Exclamation mark)
- Signal Word: Warning
- Hazard Statements: H315 (Causes skin irritation), H319 (Causes serious eye irritation)
- Precautionary Statements: P264 (Wash hands thoroughly after handling), P280 (Wear protective gloves/eye protection), P305+P351+P338 (If in eyes: Rinse cautiously with water)
- 2.3 Physical/Chemical Hazards: Non-combustible; no explosive risks under normal conditions.
- 2.4 Health Hazards: Mild skin/eye irritation; no acute toxicity if accidentally ingested in small amounts.
- 2.5 Environmental Hazards: Low aquatic toxicity; biodegradable in water.

### SECTION 3: Composition

- Substance / Mixture: Pure Substance
- Formula: HCOOK
- Molecular Weight: 84.12 g/mol
- Concentration: ≥ 98.0% (HCOOK)



# NEWAY SINOPHC TECH. LIMITED

ADD:RM. 204, BUILDING 3, NO. 188, AONA RD., CHINA (SHANGHAI) PILOT FREE TRADE ZONE.  
Email:marketing01@newayphc.com; Phone:+86-021-50350029 <https://www.newayphc.com>

---

- Hazardous Ingredients: None

## **SECTION 4: First Aid Measures**

- Inhaled: Move to fresh air. If coughing persists, consult a doctor.
- Skin Contact: Rinse skin with running water for 5 minutes; remove contaminated clothing.
- Eye Contact: Rinse with plenty of water for 10-15 minutes. Consult a doctor if irritation remains.
- Swallowed: Rinse mouth with water; do not induce vomiting. Seek medical advice if large amounts are ingested.

## **SECTION 5: Firefighting Measures**

- Suitable Extinguishing Media: Water spray, foam, CO<sub>2</sub>, dry powder.
- Special Hazards: Non-combustible; no hazardous combustion products.
- Firefighter Protection: Wear standard fire-fighting gear; no special respiratory protection needed.

## **SECTION 6: Accidental Release Measures**

- Personal Precautions: Wear gloves, eye protection for large spills.
- Cleanup Methods: Sweep up with inert materials; transfer to sealed containers. Dissolve small spills in water and flush to wastewater system (per local regulations).
- Environmental Precautions: Prevent runoff into waterways for large-scale spills.

## **SECTION 7: Handling and Storage**

- Handling: Operate in well-ventilated area; avoid skin/eye contact.
- Storage Conditions: Cool, dry, well-ventilated warehouse ( $\leq 30^{\circ}\text{C}$ ); keep sealed; avoid moisture.
- Incompatibilities: Strong oxidizing agents, strong acids.
- Shelf Life: 36 months (unopened).

## **SECTION 8: Exposure Controls/Personal Protection**

- PPE: Nitrile gloves, safety goggles for routine handling; dust mask for large-scale powder operation.
- Engineering Controls: Basic ventilation; dust collection system for bulk processing.
- Occupational Exposure Limits: No established limits.

## **SECTION 9: Physical and Chemical Properties**

- Physical State: Crystalline powder/granules
- Color: White to off-white
- Odor: Faint formic acid odor
- Solubility: Highly soluble in water (337 g/100 mL at 20°C)
- pH (10% solution): 7.0-9.0
- Density (25°C): 1.91 g/cm<sup>3</sup>
- Melting Point: 168-170°C
- Flash Point: Non-combustible

## **SECTION 10: Stability and Reactivity**

- Stable under normal storage/use conditions.



## NEWAY SINOPHC TECH. LIMITED

ADD:RM. 204, BUILDING 3, NO. 188, AONA RD., CHINA (SHANGHAI) PILOT FREE TRADE ZONE.  
Email:marketing01@newayphc.com; Phone:+86-021-50350029 <https://www.newayphc.com>

---

- Incompatible with: Strong oxidizing agents (e.g., hydrogen peroxide), concentrated acids.
- Hazardous Reactions: No hazardous reactions under normal use.
- Decomposition Products: Formic acid, potassium oxide (at high temperature > 400°C).

### SECTION 11: Toxicological Information

- Oral LD<sub>50</sub> (Rat): > 2000 mg/kg
- Dermal LD<sub>50</sub> (Rabbit): > 5000 mg/kg
- Skin/Eye Irritation: Mild irritation (reversible)
- No mutagenic, carcinogenic or reproductive toxic effects reported.

### SECTION 12: Ecological Information

- Aquatic Toxicity (Zebrafish LC<sub>50</sub>): > 1000 mg/L (96h)
- Persistence and Degradability: Biodegradable in aquatic environments.
- Bioaccumulative Potential: None
- Environmental Fate: Dissolves in water; no soil accumulation.

### SECTION 13: Disposal Considerations

- Product Waste: Dispose via licensed waste facilities; or dilute and discharge to wastewater system (per local regulations).
- Packaging Waste: Rinse and recycle as plastic/metal waste; or dispose as non-hazardous waste.

### SECTION 14: Transport Information

- UN Number: Not dangerous goods
- Transport Hazard Class: -
- Packaging Group: -
- Marine Pollutant: No
- Special Precautions: Avoid moisture, collision during transport; keep sealed.

### SECTION 15: Regulatory Information

- Complies with GHS, REACH, TSCA, GB 15258-2009.
- Not listed as a hazardous chemical in China; no EU SVHC classification.

### SECTION 16: Other Information

- Revision Date: 08 FEB 2026
- This MSDS is based on current scientific and industrial data.