

# Material Safety Data Sheet (MSDS)

## Company Details:

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## SECTION 1: CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: **Potassium Chloride**

Chemical Formula: KCl

Common Names: Sylvite, Muriate of Potash

## SECTION 2: HAZARDS IDENTIFICATION

### 2.1 Classification of the substance or mixture

Not a hazardous substance or mixture according to Regulation (EC) No. 1272/2008.

This substance is not classified as dangerous according to Directive 67/548/EEC.

### 2.2 Label elements

The product does not need to be labelled in accordance with EC directives or respective national laws.

### 2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

### **SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS**

Chemical Name: Potassium Chloride  
CAS Number: 7447-40-7  
Molecular Weight: 74.55 g/mol  
Purity:  $\geq 99\%$

### **SECTION 4: FIRST AID MEASURES**

#### **In case of Inhalation:**

Move to fresh air immediately. If breathing is difficult, give oxygen. Seek medical attention.

#### **In case of Skin Contact:**

Rinse with water for at least 15 minutes. Remove contaminated clothing. Seek medical attention if irritation persists.

#### **In case of Eye Contact:**

Rinse cautiously with water for at least 15 minutes. Remove contact lenses if present. Seek immediate medical attention.

#### **In case of Ingestion:**

Rinse mouth and drink plenty of water. Do NOT induce vomiting. Seek medical attention immediately.

### **SECTION 5: FIRE-FIGHTING MEASURES**

Extinguishing Media: Use dry chemical, carbon dioxide, or sand.

Hazardous Combustion Products: None under normal conditions.

Special Precautions: Wear full protective equipment and self-contained breathing apparatus (SCBA).

### **SECTION 6: ACCIDENTAL RELEASE MEASURES**

#### **6.1 Personal precautions, protective equipment and emergency procedures**

Use personal protective equipment. Avoid dust formation. Avoid breathing vapours, mist or gas. Avoid breathing dust.

For personal protection see section 8.

## **6.2 Environmental precautions**

Do not let product enter drains.

## **6.3 Methods and materials for containment and cleaning up**

Pick up and arrange disposal without creating dust. Sweep up and shovel. Keep in suitable, closed containers for disposal.

## **6.4 Reference to other sections**

For disposal see section 13.

# **SECTION 7: HANDLING AND STORAGE**

## **Handling:**

Avoid contact with skin, eyes, and clothing. Use in a well-ventilated area. Do not breathe dust.

## **Storage:**

Store in a cool, dry, well-ventilated area. Keep container tightly closed. Store away from acids and moisture.

# **SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION**

## **8.1 Control parameters**

Components with workplace control parameters

## **8.2 Exposure controls**

Appropriate engineering controls

General industrial hygiene practice.

## **Personal protective equipment**

### **Eye/face protection**

Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

### **Skin protection**

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

Wash and dry hands.

### Body Protection

Choose body protection in relation to its type, to the concentration and amount of dangerous substances, and to the specific work-place., The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

### Respiratory protection

Respiratory protection is not required. Where protection from nuisance levels of dusts are desired, use type N95 (US) or type P1 (EN 143) dust masks. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

### Control of environmental exposure

Do not let product enter drains.

## SECTION 9: PHYSICAL AND CHEMICAL

Odor: Odourless

pH: Neutral in solution

### 9.1 Information on basic physical and chemical properties

- a) Appearance Form: crystalline, powder
- Colour: white
- b) Odour No data available
- c) Odour Threshold No data available
- d) pH 7
- e) Melting point/freezing point Melting point/range: 770 °C
- f) Initial boiling point and boiling range 1.500 °C
- g) Flash point No data available
- h) Evaporation rate No data available
- i) Flammability (solid, gas) No data available
- Solubility: Soluble in water, slightly soluble in ethanol

## SECTION 10: STABILITY AND REACTIVITY

Chemical Stability: Stable under recommended storage conditions.

Incompatible Materials: Reacts with strong acids, strong bases, and metals (e.g., aluminum, zinc).

Hazardous Decomposition Products: None under normal conditions.

## **SECTION 11: TOXICOLOGICAL INFORMATION**

Acute Toxicity: Low toxicity. Causes mild skin and eye irritation.

Chronic Effects: Prolonged exposure may cause respiratory irritation or skin sensitization.

## **SECTION 12: ECOLOGICAL INFORMATION**

### **12.1 Toxicity**

Toxicity to fish

LC50 - Pimephales promelas (fathead minnow) - 880 mg/l - 96 h

mortality NOEC - Pimephales promelas (fathead minnow) - 500 mg/l - 7 d

mortality LOEC - Pimephales promelas (fathead minnow) - 1.000 mg/l - 7 d

Toxicity to daphnia EC50 - Daphnia magna (Water flea) - > 440 mg/l - 48 h

and other aquatic (OECD Test Guideline 202)

invertebrates

### **12.2 Persistence and degradability**

No data available

### **12.3 Bioaccumulative potential**

No data available

### **12.4 Mobility in soil**

No data available

### **12.5 Results of PBT and vPvB assessment**

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

## **SECTION 13: DISPOSAL CONSIDERATIONS**

### **Disposal Method:**

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

## **SECTION 14: TRANSPORT INFORMATION**

UN Number: Not regulated

Shipping Name: Not regulated

Hazard Class: Not regulated

Packing Group: Not regulated

## **SECTION 15: REGULATORY INFORMATION**

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

### **15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**

No data available

### **15.2 Chemical Safety Assessment**

For this product a chemical safety assessment was not carried out

## **SECTION 16: OTHER INFORMATION**

### **Disclaimer for Warranties:**

The information provided in this Material Safety Data Sheet (MSDS) is based on current knowledge and is intended to describe the product for safe handling, use, and disposal. Element Four Enterprise Pty Ltd makes no warranties, expressed or implied, regarding the accuracy, completeness, or suitability of this information for any particular purpose. The user is responsible for ensuring compliance with all applicable laws and regulations. Element Four Enterprise Pty Ltd shall not be held liable for any damages resulting from the use or misuse of this product or the information contained herein